

Solaris Admininstror's Quick Reference

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User Initialization

/etc/profile (\$HOME/.profile)
sh, bash, ksh system wide (per user) init
(system wide init has no effect in CDE environment).

/etc/.login (\$HOME/.login)
csh, tcsh system wide (per user) init
(system wide init has no effect in CDE environment).

\$HOME/.cshrc
per user csh, tcsh init (order: /etc/.login ? \$HOME/.cshrc ? \$HOME/.login).

/usr/dt/config/Xsession.d/2000.login
system wide init for CDE environment (a script in Xsession.d).

\$HOME/.dtpprofile
per user init for CDE environment.

/etc/skel/*
Template files (local.cshrc, local.login, local.profile) copied to new user's home directory.

Network Configuration

/etc/defaultdomain
NIS/NIS+ domain name.

/etc/defaultrouter
IP address of the default router.

/etc/resolv.conf
Internet domain name, name server and search order.
An example of resolv.conf
domain la.asu.edu
nameserver 129.219.17.200
nameserver 129.219.17.5
search la.asu.edu asu.edu

/etc/nsswitch.conf
specifying information source from files, NIS, NIS+, or DNS.

/etc/hostname.{hme0|le0}
Ipv4 hostname.

/etc/nodename
IPv6 hostname.

/etc/inet/hosts
Host name file (/etc/hosts is a link to this file).

/etc/inet/netmasks
TCP/IP subnet masks.

/etc/inet/protocols
Network protocols.

/etc/inet/services
Network service name and port number.

/etc/inet/inetd.conf
Internet super daemon configuration file.

Change hostname/IP address

	/etc/inet/hosts;
	/etc/net/*/hosts;
/etc/hostname.{hme0 le0}	/etc/defaultrouter;
/etc/nodename;	/etc/resolv.conf

Setup Printer

Local printer
lpadmin -p prt_name -v /dev/ecpp0 -D "description" -T PS
-I postscript

parallel port: {/dev/ecpp0 | /dev/bpp0}
serial port : {/dev/term/a | /dev/term/b}

Printer connected to a computer
lpadmin -p prt_name -s host_name -T unknown -I any

Network capable printer
lpadmin -p prt_name -m netstandard -v /dev/null
-D "description" -o protocol={bsd | tcp}
-o dest=prtIP:9100 ? port needed for tcp protocol
-o banner={never | optional | always}
-o timeout=300

Misc printing commands

lpadmin -d prt_name
set prt_name as the default printer.

lpstat -d
show current default printer.

lpstat -p prt_name -l
show prt_name configuration.

lpstat -t
show all printer status.

Environment variables

LPDEST or PRINTER
User default printer.
_default in /etc/printers.conf
system default printer.

Disable banner
edit file /etc/lp/interfaces/prt_name
nobanner=yes

Common setting stored in file
/etc/lp/printers/prt_name/configuration
/usr/lib/lp/model

File Sharing

/etc/vfstab
File mount table (local or NFS).

/etc/dfs/dfstab
File sharing table (NFS server).

/etc/auto_master
Automounter master map, sample as follow
Master map for automounter ####
/home auto_home -nobrowse
/- auto_direct -ro

/etc/auto_home
Automount home (indirect) map, sample as follow
mount home directory #####
jialong bluebear:export/home/jialong

/etc/auto_direct
Automount direct map, sample as follow
mount /usr/local from a server ####
/usr/local bluebear:/usr/local

/etc/vold.conf
Volume manager configuration.

share [options] pathname
export NFS file systems to other computers.

mount [options] filesrv:/pathname /mnt
Mount remote file system. For security, when possible, mount system as readonly and nosuid.

/etc/rmmount.conf
Removable disk configuration.

Sendmail Configuration

/etc/mail/sendmail.cf
sendmail configuration file.

/etc/mail/aliases
aliases file. Must run newaliases after modifying aliases file.

Configure a mail server
Generate new configuration file
cd /usr/lib/mail/cf
cp main -v7sun.mc foo.mc
/usr/ccs/bin/make foo.cf

Test new mail configuration file
/usr/lib/sendmail -C foo.cf -v email_address </dev/null

Install configuration file
cd /etc/mail
cp sendmail.cf sendmail.sav
cp /usr/lib/foo.cf sendmail.cf

pskill -HUP sendmail

Anti-spam
make sure FEATURE(access_db) is in sendmail.mc
create /etc/mail/access with something like

cyberpromo.com	REJECT
sendmail.org	RELAY
spam@buyme.com	550 Spammers shan't see sunlight here

makemap hash /etc/mail/access < /etc/mail/access

CDE configuration

\$HOME/.dtpprofile
per user CDE init file, from /usr/dt/config/sys.dtpprofile.

\$HOME/.dt/dtwmrc
desktop manager configuration file (pop-up menu when right click mouse). From /usr/dt/config/C/sys.dtwmrc

\$HOME/.dt/sessionetc
per user CDE session start file (script with execute perm).

\$HOME/.dt/sessionexit
per user CDE exit file (script with execute permission).

/usr/etc/dt/config/C/Xresources
control attribute of login screen, for example, to disable session menu, uncomment following line
Dtlogin*session_menus*sensitive: False

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/{usr|etc}/dt/config/C/sys.resources
    session resource, for example, to disable automatic screen lock,
    set timeout to 0
    dtsession*lockTimeout: 0
$HOME/.dt/sessions/{current|home}
    current (home) session files.
/{usr|etc}/dt/config/Xconfig
    configuration file for login screen (dtconfig).
/{usr}/dt/config/Xstartup
    this script run after user login but before user session.
/{usr}/dt/config/Xaccess
    Control access to Xserver.
/{usr}/dt/bin/Xsession
    start CDE session
/{usr}/dt/config/Xsession.d/*
    Scripts auto executed by Xsession.
usr/dt/config/Xsession.ov
    start OpenWindow session.
/{usr}/dt/config/Xreset
    Command executed after the session end.

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System Configuration

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/etc/passwd, /etc/shadow, /etc/group
    user account information.
/etc/ftpusers
    users NOT allowed to use FTP.
/etc/system
    Kernel parameters
    Example: disable execution in stack
    set noexec_user_stack=1
    set noexec_user_stack_log=1
/etc/hosts.equiv, ($HOME/.rhosts)
    system wide (per user) trust hosts.
/etc/motd, (/etc/issue)
    message after (before) login.
/etc/shells
    allowed shell program.
/etc/initab
    run level configuration.
/etc/rc{S,|1|2|3|5|6}.d
    scripts for different run levels.
/etc/bootparams
    rpc.bootparamd configuration file.
/etc/pam.conf
    pluggable authentication configuration file.
/etc/power.conf
    power configuration.
/etc/printers.conf
    BSD printer configuration.
/etc/magic
    used by "file" command to determine file type.
/etc/security/*
    security audit related files.
/etc/syslog.conf
    system log daemon configuration file.
/etc/notrouter
    specify this host is not a router.

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Default info for various program

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/etc/default/power
    power management parameters.
/etc/default/Solregis
    put DISABLE=1 to disable solaris registration screen.
/etc/default/su
    settings for "su" command.
/etc/default/sys-suspend
    users permitted to put system in suspend mode.
/etc/default/passwd
    minimum password length.
/etc/default/login
    login related settings, put CONSOLE=/dev/console
    disable root login by telnet (rlogin).
/etc/default/init
    time zone, CMASK (default 022)
/etc/default/kbd
    KEYBOARD_ABORT=disable

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Application Configuration

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/etc/ssh2/ssh2_configure ($HOME/.ssh2/ssh2_config)
    SSH client system wide (per user) configuration file.
/etc/ssh2/sshd2_config ($HOME/.ssh2/sshd2_config)
    SSH server system wide (per user) configuration file.
Setup SSH2 to accept hostbased authentication
(1) Server side
    In sshd2_config, includes hostbased, like this
    AllowedAuthentications hostbased, publickey, password
    In /etc/hosts, use client's full qualified domain name (FQDN).
    In .rhosts (.shosts), also use FQDN, make user these files are
    owned by that user and not writeable by other users.
    Copy client's hostkey.pub to server's /etc/ssh2/knownhosts and
    name it as FQDN.ssh-dss.pub (e.g., bluebear.la.asu.edu.ssh-
    dss.pub).
(2) Client side
    In ssh2_config, includes hostbased authentication, like this
    AllowedAuthentications hostbased, publickey, password
    Also need to set DefaultDomain keyword, like
    DefaultDomain la.asu.edu

/usr/local/lib/pine.conf
    system wide PINE configuration, overwrite by $HOME/.pinerc
/usr/local/lib/pine.conf.fixed
    system wide PINE configuration, NOT overwrite by ~/.pinerc
httpd.conf (https.conf)
    Apache web server configuration file. (www.apache.org)
smb.conf
    Samba (window server) configuration file. (www.samba.org)

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Miscellaneous Commands

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SUN patch files and freeware
http://sunsolve.sun.com
http://sunfreeware.com
Forget root password
    boot -s cdrom
    find out root partition with "format" command
    mount /dev/dsk/c0t0d0s0 /mnt (suppose c0t0d0s0 is root part.)
    edit /mnt/etc/shadow
Disable auto-logout feature for tcsh
    Put following line in .cshrc or .tcshrc
    unset autologout

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showmount -e host_name
    show export file systems on host_name.
rpcinfo -p host_name
    check RP C services on host_name.
ldd program
    show what dynamic libraries needed by program.
    LD_LIBRARY_PATH is the search path for dynamic libraries.
useradd -d homedir -u UID -g GID -c "comment" -s shell
    add new user account.
man foo | col -b > foo.txt
    save manual page for command "foo" in pure text.
pkgadd -d pkgfile
    add solaris package file.
boot -r
    Reconfiguration system after adding new hardware.
who -r
    show current run level.
volcheck -v
    check if new floppy/cdrom is inserted.
fuser -u [-k] /cdrom
    Show which program is using the cdrom (or floppy).
/usr/sbin/eeprom
    show settings in eeprom.
/usr/sbin/prtconf -vb
    show system information.
find / -type f -perm -4000 -user root -print
    find set UID to root program.
m64config -res 1024x768x75 -depth 24
    set screen resolution, color depth for M64 frame buffer.
    (ffbconfig on Ultra -60)
fsck -F ufs -y /dev/rdisk/c0t0d0s0
    file system check, answer "y" to all questions.
xv -root -quit foo.gif
    set CDE screen background.
/etc/init.d/script {start|stop}
    run a script in /etc/init.d directory.
newfs -v /dev/rdisk/c0t0d0s6
    construct new file system after format.
/usr/sbin/sys-unconfig
    reconfiguring the system.
patchadd [options] patch
    apply patch to system.
ufsdump 0uf /dev/rmt/0 /
    backup of all files.
ufsrestore xf /dev/rmt/0 etc/inetd.conf
    restore inetd.conf file from backup
eeprom
    change settings in eeprom, like
    eeprom security-mode=full

```

Shell Programming

if-then-else <u>sh, bash, ksh</u> if <i>condition</i> ; then <i>action_1</i> ; else <i>action_2</i> ; fi	foreach <u>sh, bash, ksh</u> for <i>key</i> in <i>list</i> ... ; do <i>actions</i> ; done	do-while <u>sh, bash, ksh</u> while <i>condition</i> ; do <i>actions</i> ; done
<u>csh, tcsh</u> if (<i>condition</i>) then <i>action_1</i> ; else <i>action_2</i> ; endif	<u>csh, tcsh</u> foreach <i>key</i> (<i>list</i>) <i>actions</i> end	<u>csh, tcsh</u> while (condition) actions end
	<u>Rename files</u> foreach i (*) mv \$i \$i.old end	