



# A/UX® Reference Summary and Index

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# **A/UX Reference Summary and Index**

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## Preface

### Conventions Used in This Manual

A/UX® manuals follow certain conventions regarding presentation of information. Words or terms that require special emphasis appear in specific fonts within the text of the manual. The following sections explain the conventions used in this manual.

#### Significant fonts

Words that you see on the screen or that you must type exactly as shown appear in *Courier* font. For example, when you begin a work session on most UNIX systems, you see the following on the screen:

`login:`

The text shows `login:` in *Courier* typeface to indicate that it appears on the screen. If the next step in the manual is

`Enter start`

`start` appears in *Courier* to indicate that you must type in the word. Words that you must replace with a value appropriate to a particular set of circumstances appear in *italics*. Using the example just described, if the next step in the manual is

`login: username`

you type in your name—`Laura`, for example—so the screen shows:

`login: Laura`

#### Key presses

Certain keys are identified with names on the keyboard. These modifier and character keys perform functions, often in combination with other keys. In the manuals, the names of these keys appear in the format of an Initial Capital letter followed by SMALL CAPITAL letters.

The list that follows provides the most common keynames.

RETURN

DELETE

SHIFT

ESCAPE

OPTION

CAPS LOCK

CONTROL

For example, if you enter

Appleee  
instead of  
Apple  
you would position the cursor to the right of the word and press the DELETE key once to erase the additional *e*.

For cases in which you use two or more keys together to perform a specific function, the keynames are shown connected with hyphens. For example, if you see

Press CONTROL-C  
you must press CONTROL and C simultaneously (CONTROL-C normally cancels the execution of the current command).

### **Terminology**

In A/UX manuals, a certain term can represent a specific set of actions. For example, the word *Enter* indicates that you type in an entry and press the RETURN key. If you were to see

Enter the following command: whoami  
you would type *whoami* and press the RETURN key. The system would then respond by identifying your login name.

Here is a list of common terms and their corresponding actions.

Term	Action
Enter	Type in the entry and press the RETURN key
Press	Press a <i>single</i> letter or key <i>without</i> pressing the RETURN key
Type	Type in the letter or letters <i>without</i> pressing the RETURN key
Click	Press and then immediately release the mouse button

<b>Term</b>	<b>Action</b>
<b>Select</b>	Position the pointer on an item and click the mouse button
<b>Drag</b>	Position the pointer on an icon, press and hold down the mouse button while moving the mouse. Release the mouse button when you reach the desired position.
<b>Choose</b>	Activate a command title in the menu bar. While holding down the mouse button, drag the pointer to a command name in the menu and then release the mouse button. An example is to drag the File menu down until the command name Open appears highlighted and then release the mouse button.

### Syntax notation

A/UX commands follow a specific order of entry. A typical A/UX command has this form:

command [*flag-option*] [*argument*] . . .

The elements of a command have the following meanings.

<b>Element</b>	<b>Description</b>
command	Is the command name.
<i>flag-option</i>	Is one or more optional arguments that modify the command. Most flag-options have the form [-opt...] where opt is a letter representing an option. Commands can take one or more options.
<i>argument</i>	Is a modification or specification of the command; usually a filename or symbols representing one or more filenames.

Element	Description
brackets ([ ])	Surround an optional item—that is, an item that you do not need to include for the command to execute.
ellipses (...)	Follow an argument that may be repeated any number of times.

For example, the command to list the contents of a directory (`ls`) is followed below by its possible flag options and the optional argument *names*.

```
ls [-R] [-a] [-d] [-C] [-x] [-m] [-l] [-L]
[-n] [-o] [-g] [-r] [-t] [-u] [-c] [-p] [-F]
[-b] [-q] [-i] [-s] [names]
```

You can enter

```
ls -a /users
```

to list all entries of the directory `/users`, where

<code>ls</code>	Represents the command name
<code>-a</code>	Indicates that <i>all</i> entries of the directory be listed
<code>/users</code>	Names which directory is to be listed

### Command reference notation

Reference material is organized by section numbers. The standard A/UX cross-reference notation is

*command(location)*

where *command* is the name of the command, file, or other facility; *location* is the section within one of the reference manuals where the entry resides.

- Commands followed by section numbers (1M), (7), or (8) are located in *A/UX System Administrator's Reference*.
- Commands followed by section numbers (1), (1C), (1G), (1N), and (6) are located in *A/UX Command Reference*.

- Commands followed by section numbers (2), (3), (4), and (5) are located in *A/UX Programmer's Reference*.

For example,

`cat(1)`

refers to the command `cat`, which is described in Section 1 of *A/UX Command Reference*.



# Introduction

## to A/UX Reference Summary and Index

### 1. How to use this reference

*A/UX Reference Summary and Index* is an access aid designed to help you find information in the reference volumes for A/UX® Release 2.0 including

*A/UX Command Reference*

*A/UX Programmer's Reference*

*A/UX System Administrator's Reference*

The reference books cited above, upon which *A/UX Reference Summary and Index* is derived, are encyclopedic collections of manual pages, not narrative or tutorial works. They provide complete technical information about all the programs, utilities, and standard file formats included with your A/UX system. The introduction of each book gives a detailed description of its content and structure.

If you are still learning A/UX or are unfamiliar with a specific set of programs (such as the shells or the text-formatting programs), you should start by reading *Road Map to A/UX* and *A/UX Essentials*. After you have worked with A/UX, the reference books help you understand new features or refresh your memory about features you already know. This manual, *A/UX Reference Summary and Index*, further assists you by providing several ways to find exactly the information you want.

The *A/UX Reference Summary and Index* contains three sections:

- **Commands by Function.** This section lists the user commands in *A/UX Command Reference* and *A/UX System Administrator's Reference* according to primary-function categories.
- **Command Synopses.** This section is a condensation of syntax information from every manual page that describes a command.
- **Index.** This section is a comprehensive index for all materials in the A/UX references.

These sections are described in more detail following.

## 2. Contents of this manual

This manual contains three parts, separated by tab dividers.

### 2.1 Commands by function

With A/UX you are confronted with a multitude of commands. To help you sort them out, the first section of this book is a command summary. It groups commands together according to the functions that they perform. Each command is mentioned just once in the summary, in accordance with its general, or most important function. This way you get a bird's-eye view of the overall command capabilities of A/UX.

The Command Summary by Function section mentions all the user commands in *A/UX Command Reference* and *A/UX System Administrator's Reference*. The commands are categorized under headings such as "Logging in and Logging Out," "Formatting text into pages for printing," and so on.

To locate the commands for a function or task that interests you, first consult the list of major categories given at the start of the summary section. It lists the principal heads under which commands are grouped. When you find the appropriate major category, turn to the starting page indicated. There you will find mentions of A/UX commands for functions and tasks within your major category.

A mention of a command in this summary typically looks like:

change login password.....passwd(1)

For the change password function, you are directed to the `passwd` command. The brief function description ("change login password" in this example) applies to the command (`passwd`). Sometimes the brief description applies collectively to a group of related commands that are all described on the same manual page. When commands that are related this way appear on the same page, you will see the same description repeated several times.

A parenthesized section number follows the command name. The section number helps you locate the reference book where the associated manual page can be found. If no section number is provided, then the

command resides within a man page that collectively describes more than one command. The `whatis` command helps locate the overall name for a manual page that contains several related commands. The `whatis` command is described briefly in the “Online Help” section at the end of this introduction, and in the manual page by the same name in *A/UX Command Reference*.

The section number inside parentheses indicates where to look for more information about the command, as shown following.

- (1) See *A/UX Command Reference*
- (1M) See *A/UX System Administrator's Reference*
- (2) See *A/UX Programmer's Reference*
- (3) See *A/UX Programmer's Reference*
- (4) See *A/UX Programmer's Reference*
- (5) See *A/UX Programmer's Reference*
- (7) See *A/UX System Administrator's Reference*
- (8) See *A/UX System Administrator's Reference*

## 2.2 Command synopses

Most tasks require that you enter information on the command line after the name of the command, such as flag options that modify the behavior of the command. Often you must supply other arguments as well, such as the names of files. Each man page includes a syntax synopsis that help you construct legal command lines.

The Command Synopses section gathers into one place all the synopsis sections from sections 1, 1M, 5, 6 and 8 of *A/UX Command Reference*, *A/UX Programmer's Reference*, and *A/UX System Administrator's Reference*. It helps you find the syntax of commands quickly and is helpful when the syntax is all you need to see. The synopses are presented in alphabetical sequence by command name. Left and right guide words at the top of each page indicate the first command and the last command covered on that page.

## **2.3 Index**

The A/UX references contain a large amount of information, so finding a specific fact in them can be a daunting task. The Index section is designed to help you locate specific man pages by providing cross-references to them from a variety of topic headings.

Most manual pages are indexed under more than one topic heading; for example, `lorder(1)` is included under “archive files,” “sorting,” and “cross-references.” This way you are more likely to find the reference you are looking for on the first try.

The Index sections works like an ordinary book index, except that each reference includes a short description of each manual page referenced. Between the index topic and the manual page description, you should be able to determine quickly whether any given reference contains the information you want. Once you have located the desired manual page, the parenthetical section number helps you find the correct book in which to look, as described previously. Online viewing of man pages is also an alternative as described in the section “Online help.”

The key terms in this index were constructed by examining the meaning and usage of the A/UX manual pages. It is designed to be more discriminating and easier to use than the traditional permuted index, which mechanically lists keywords found in the manual page NAME sections.

## **2.4 Online help**

The entire contents of *A/UX Command Reference*, *A/UX System Administrator’s Reference*, and *A/UX Programmer’s Reference* are available online. Three commands help you find information in them: `apropos`, `whatis`, and `man`.

The `man` command allows you to read a manual page on your screen. By pressing the spacebar you can view successive screens of text until you reach the end of a manual page.

To see a manual page displayed on your screen, enter the `man` command followed by the name of the entry you want to see. For example,

```
man passwd
```

displays the manual page for the `passwd` command.

The `whatis` command displays a short phrase that describes what a command does or what it is used for. This phrase is the same phrase that appears in the NAME section of the manual page for the specified command.

To see the description phrase from the NAME section of any manual page, enter the `whatis` command followed by the name of the entry you want to see. For example,

`whatis ls`

displays

`ls(1) - list contents of directory`

The `apropos` command displays a list of manual pages and associated descriptions as long as they contain the string you supplied. This way you can search through all the A/UX command descriptions, helping you to locate manual pages related by the specified string. However, if the same string can be found as a topic in the Index section of this book, a more exhaustive list of cross-references can often be found there.

To see a list of all manual pages whose descriptions contain a given keyword or string, enter the `apropos` command followed by the word or string. For example,

`apropos remove`

locates the following manual pages:

colrm(1)	- remove columns from a file
deroff(1)	- remove nroff/troff, tbl, and eqn constructs
dev_kill(1M)	- remove special devices from directories
flock(2)	- apply or remove an advisory lock on an open file
ipcrm(1)	- remove interprocess communications facilities
lprm(1)	- remove jobs from the line printer spooling queue
remque insque(3N)	- insert/remove element from a queue
rmdel(1)	- remove a delta from an SCCS file
rmdir rm(1)	- remove files or directories
rmdir(2)	- remove a directory file
unlink(2)	- remove directory entry
umount(2)	- remove a file system

These online help commands are described more fully in the manual pages `man(1)`, `whatis(1)`, and `apropos(1)` in *A/UX Command Reference*.

## Commands by Function

This section lists all A/UX user commands categorized by the types of functions you are likely to perform. The major functional categories appear in bold type. These major categories are found on the pages shown following:

<b>Accessing the System and its Help Resources</b> .....	4
<b>Managing Files and Directories</b> .....	7
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<b>Processing Text as Records Within a Database</b> .....	17
<b>Processing Unstructured or Structured Text</b> .....	18
<b>Processing Text to Produce Printed Documents</b> .....	20
<b>Processing Plotter Drawings</b> .....	23
<b>Writing Shell Programs</b> .....	24
<b>Programming</b> .....	25
<b>Administering Your System</b> .....	28

Each category includes one or more subcategories, which are also flush against the left margin, but not in a bold typeface. Indented under each subcategory is a list of all the functions that fall within their scope.

To find a command that can count words in a file, you might follow this sequence of actions: (1) locate “Processing Unstructured or Structured Text” (page 18) as the most appropriate main category; (2) turn to page 18 and browse through pages until you locate “Report Occurrences of Words and Letters” as the next most appropriate subcategory; (3) locate the phrase “word count” as the function desired; and (4) locate the command `wc` across from the phrase “word count.”

Once you have found a command likely to perform a desired function, you can get further information about that command by referring to the *A/UX Command Reference* and *A/UX System Administrator's Reference* (for commands

categorized as under “Administering Your System”) An even faster way to locate information is to use the online help provisions of A/UX (see `whatis(1)` and `man(1)`).

Some commands shown are not described within the *A/UX Command Reference* or *A/UX System Administrator’s Reference* within a manual page entry of the same name. An example is `rmdir`, which is described on the `rm(1)` manual page. You can use the `whatis` command to help you locate the correct reference manual page for more information about a given command. Another way to locate the correct manual page for commands like `rmdir` is to enter `rmdir` as the argument to the `man` command. The `man` command automatically locates the correct manual page and displays it.

The categories are listed in no special order. Generally, the order of subcategories is alphabetical. The order of command names and descriptions is generally alphabetical as well, based on the command name.

If you are already able to be productive by using the Macintosh applications you have learned but you are curious about the added value that A/UX itself might provide you, the following categories are likely to interest you.

**Accessing the System and its Help Resources.** This topic includes many subcategories of general interest, and commands that are likely to be used with medium frequency. Of these, the most frequently used commands are the commands used to obtain online help.

**Managing Files and Directories.** This topic includes the most frequently used commands in the system. When you have to manage large numbers of folders and files, the commands offered by A/UX are often preferable to performing any equivalent operations that might be available under the A/UX Finder. For example, command lines can be used to manipulate files in a nested folder, without a prior operation to open the nested folder.

**Controlling how Commands are Run.** Among the commands included are those that allow you to schedule commands to run in a recurring fashion (day or date driven), or in a time-delayed fashion.

**Communicating.** This topic includes commands that support the popular UNIX utility for electronic mail. To use the mail facilities of A/UX optimally, you could even create customized scripts that automatically start up according to specific dates and times (see “Writing Shell Programs” and “Controlling how Commands are Run”).

**Processing Unstructured or Structured Text.** The editors are frequently used to edit database style tables, such as `/etc/passwd` as well as document text. `TextEdit` is the editor of choice if you possess mouse skills, or if you wish to learn programs that features the Macintosh user interface, such as its pull-down menus. The `grep` command is a frequently used A/UX utility that displays lines in any text file containing a string or substring you specify.

**Processing Text Records.** Within certain limits, the commands listed here can process information from files generated with Macintosh spreadsheet and database applications once they are saved as text. Another powerful provision, but one that is categorized differently from these, is `awk`. It is a high-level programming language used to write programs that process text or compile custom reports from field-structured text files.

**Writing Shell Programs.** The A/UX shell programming languages are frequently used, and often allow greatly increased productivity because of their high-level orientation. The shells allow users to easily create new A/UX functions, extending the repertoire of existing programs and often filling very specific needs for a given site. A number of the supplied A/UX programs are actually shell scripts, so they can readily be copied and customized.

Be forewarned that many commands could have been placed in more than one category. Also, some rarely-used commands are interspersed freely along with the frequently-used commands. Furthermore, categories may contain an incomplete list of references for a given topic. For example, the subcategory “Directing Data To and From Files” does not exhaustively describe input and output redirection because this topic is part of a much broader topic than is represented by the commands in this subcategory (`tee` and `cat`). Redirection is described along with a wide range of other shell functions in other A/UX books (see *A/UX User Interface*; and `sh(1)`, `csh(1)`, and `ksh(1)`, in *A/UX Command Reference*). Rather than being lumped along with `tee`, the shell commands have been placed within the subtopic, “Choosing Session Preferences,” and within a more encompassing main topic, “Controlling the User Interface.”

As a final disclaimer, certain categories are necessarily nondescript, such as “Using Devices.” Since you are using devices whenever you use A/UX, all commands could have been placed in this category. However, only those commands more concerned with manipulating devices than manipulating files or data were placed in this category. So the chief concern for the choice of category names was to find groups of titles that are clear when considered with their peers, rather than find category titles that by themselves delineated precise sets of commands.

## **Accessing the system and its help resources**

### **Finding out about your network**

show status of machines on local network (RPC version) .....	rup
show host status of local machines .....	ruptime
give login list for local machines (RPC version) .....	rusers
who's logged in on local machines? .....	rwho

### **Finding out about your system**

user information lookup program .....	finger
show group memberships .....	groups
display user and group IDs and names .....	id
display login and logout times for each user of the system .....	last
display system page size .....	pagesize
display identification information about the current system ....	uname
show how long system has been up .....	uptime
compact list of users who are on the system.....	users
who is on and what they are doing? .....	w

### **Finding out about your session**

get login name .....	logname
display the value of variables set in the current environment .....	printenv
report process status .....	ps
print working directory name .....	pwd
get the terminal's name .....	tty

### **Getting online help**

who is doing what.....	whodo
locate commands by keyword lookup.....	apropos
display the named manual page entries .....	man

display a brief description for the named manual page	
entry .....	whatis
locate source, binary, and online help file for a command ...	whereis
display the directory path to a file by interpreting PATH and alias settings .....	which
who is on the system? .....	who
print effective current user ID .....	whoami

### **Logging in and logging out**

sign on .....	login
login to a new group .....	newgrp
change login password .....	passwd
remote login .....	rlogin

### **Performing arithmetic calculations**

arbitrary-precision arithmetic language .....	bc
desk calculator .....	dc
factor a number .....	factor
conversion program .....	units

### **Using time and date utilities**

generate a calendar for the specified year .....	cal
reminder service .....	calendar
display and set the date .....	date
remind you when you have to leave .....	leave

### **Using devices**

clear terminal screen .....	clear
eject diskette from drive .....	eject
Apple ImageWriter print filter .....	iw2
magnetic tape manipulating program .....	mt
set the modes for a terminal .....	stty
set tabs on a terminal .....	tabs

**block data to 8K for tc output..... tcb**

## Managing files and directories

### Changing file attributes

change the permissions of a file .....	chmod
change the owner or group of a file.....	chown
change the owner or group of a file.....	chgrp
set the type and creator of a Macintosh resource file .....	settc
update access and modification times of a file.....	touch

### Comparing files and directories

diff large files .....	bdiff
compare two files.....	cmp
differential file and directory comparator.....	diff
3-way differential file comparison.....	diff3
directory comparison .....	dircmp
three-way file merge .....	merge
side-by-side difference program.....	sdiff
sum and count characters in the files in the given directories .....	sumdir
differential file and directory comparator .....	ucbdiff
3-way differential file comparison .....	ucbdiff3

### Compressing and encrypting files

compress and uncompress files.....	compact
compress and uncompress files.....	uncompact
compress and uncompress files .....	ccat
compress and expand data .....	compress
compress and expand data .....	uncompress
compress and expand data .....	zcat
encode/decode .....	crypt
compress and expand files .....	pack
compress and expand files .....	pcat

compress and expand files ..... unpack

#### Copying files and directories

copy files ..... cp  
copy files to or from a cpio archive ..... cpio  
context split ..... csplit  
convert and copy a file ..... dd  
convert a resource file to another format ..... fcnvrt  
make links ..... ln  
copy files to or from an archive in an IEEE format ..... pax  
remote file copy ..... rcp  
split a file into pieces ..... split  
copy files to or from a tar archive ..... tar  
copy files to or from a tp archive ..... tp

#### Creating, renaming and removing files and directories

make a directory ..... mkdir  
move or rename files ..... mv  
remove files or directories ..... rm  
remove files or directories ..... rmdir

#### Directing data to and from files

concatenate and display the contents of named files ..... cat  
pipe fitting ..... tee

#### Displaying filenames and file status

determine file type ..... file  
list contents of directory ..... ls  
calculate a checksum ..... sum  
reports version number of files ..... version

## Finding files

find files ..... find

## Finding out about your file system

report number of free disk blocks ..... df  
summarize disk usage ..... du

## Looking at files

give first few lines ..... head  
show the contents of a file in display-size chunks ..... more  
show the contents of a file in display-size chunks ..... page  
show the contents of a file in display-size chunks ..... pg  
deliver the last part of a file ..... tail

## Printing files

send or cancel requests to a line printer for a Berkeley file  
system (4.2) ..... lp  
send or cancel requests to a line printer for a Berkeley file  
system (4.2) ..... cancel  
spool queue examination program ..... lpq  
off line print ..... lpr  
remove jobs from the line printer spooling queue for a  
Berkeley file system (4.2) ..... lprm

## **Controlling the user interface**

### **Choosing session preferences**

present a Macintosh® login dialog box when called by init .....	..... Login
A/UX® Toolbox application for managing command-interpretation windows and moderating access to the A/UX console window .....	..... CommandShell
change default login shell .....	..... chsh

### **Customizing the Macintosh system for one user account**

create a personal System Folder .....	..... systemfolder
---------------------------------------	--------------------

### **Interpreting command lines**

run the C shell, a command interpreter with C-like syntax .....	csh
run the Korn shell, a command interpreter compatible with Bourne shell .....	ksh
run the Bourne shell, the earliest of the command interpreters available .....	..... sh
run the Bourne shell, the earliest of the command interpreters available .....	..... rsh
shell layer manager .....	..... shl
discontinue command interpretation in current shell .....	..... exit
discontinue csh command interpretation session .....	..... logout

### **Launching Macintosh applications**

execute a Macintosh binary application .....	..... launch
----------------------------------------------	--------------

## Controlling how commands are run

Delaying a command or part of a shell script suspend execution for an interval.....	sleep
Establishing the environment for a Macintosh application change the fields of the SIZE resource of a file.....	changesize
convert from Macintosh® encoding to International Standards Organization (ISO) encoding .....	mactoiso
convert from Macintosh® encoding to International Standards Organization (ISO) encoding .....	isotomac
Establishing the execution environment for a command change root directory for a command .....	chroot
set environment for command execution.....	env
run a command at low priority.....	nice
run a command immune to hangups .....	nohup
remote shell .....	remsh
generate y entries in response to requests for input .....	yes
change current working directory of the shell .....	cd
evaluate arguments as a command line .....	eval
evaluate arguments as a command line while exiting shell.....	exec
evaluate arguments as a command line any number of times .....	repeat
display or reset default file permissions .....	umask
display or set the maximum file size .....	ulimit

**Interpreting command lines while maintaining an audit trail**  
start a shell that records terminal input and output..... script

**Setting a time at which to run a command**

clock daemon ..... cron  
execute commands at a later time..... at  
execute commands at a later time ..... batch  
user crontab utility ..... crontab

## **Managing processes while they run**

### **Signaling and terminating processes**

remove interprocess communications facilities .....	ipcrm
terminate a process .....	kill

### **Time the duration of a process**

time a command.....	time
time a command; report process data and system activity .....	timex

## **Generating command lines**

### **Construct and execute command lines**

apply a command to a set of arguments .....	apply
construct argument list and execute command.....	xargs

### **Construct command lines using Macintosh dialog boxes**

build commands interactively .....	cmdo
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## **Communicating**

### **Communicating with other users**

write to all users.....	wall
be notified if mail arrives and who it is from .....	biff
who is my mail from? .....	from
send mail to users or read mail .....	mail
send mail to users or read mail.....	rmail
interactive message processing system .....	mailx
permit or deny messages .....	mesg
display local news items .....	news
talk to another user .....	talk
write to another user .....	write

### **Using AppleTalk**

choose a default printer on the AppleTalk® internet....	at_cho_prn
look up network visible entities (NVEs) registered on the AppleTalk internet.....	atlookup
copy data to a remote PAP server .....	atprint
display status from a PAP server .....	atstatus

### **Using TC/IP**

write to all users over a network .....	rwall
attach a dialup serial line as a network interface .....	slip
DARPA Trivial File Transfer Protocol server .....	tftpd
ARPANET file transfer program.....	ftp
remote file distribution program.....	rdist
remote sign on.....	remlogin
user interface to the TELNET protocol.....	telnet
trivial file transfer program .....	tftp

## Using UUCP

UNIX® system to UNIX system copy .....	uucp
UNIX® system to UNIX system copy.....	uulog
UNIX® system to UNIX system copy .....	uname
send a file to a remote host .....	uusend
uucp status inquiry and job control.....	uustat
public UNIX-to-UNIX system file copy.....	uuto
public UNIX-to-UNIX system file copy.....	uupick
UNIX-to-UNIX system command execution.....	uux

## Using other communications tools

spawn getty to a remote terminal.....	ct
call another system .....	cu
Kermit file transfer .....	kermit
connect to a remote system .....	tip
update files between two machines .....	updater
encode/decode a binary file for transmission via mail .....	uuencode
encode/decode a binary file for transmission via mail .....	uudecode

## Playing Games

alien invaders attack the earth .....	aliens
provide drill in number facts .....	arithmetic
escape from the automatic robots .....	autorobots
the game of backgammon .....	back
simulate a punched card corresponding to a text argument .....	bcd
the game of black jack .....	bj
try to escape the killer robots .....	chase
the game of craps .....	craps
the card game cribbage .....	cribbage
play "Go Fish" .....	fish
print a random, hopefully interesting, adage .....	fortune
guess the word .....	hangman
play the game of life .....	life
play the game of Mastermind .....	mastermind
generate a maze .....	maze
guessing game .....	moo
convert Arabic numerals to English .....	number
test your knowledge .....	quiz
animated raindrops display .....	rain
escape from the robots .....	robots
trekkie game .....	trek
tic-tac-toe .....	ttt
tic-tac-toe .....	cubic
twinkle stars on the screen .....	twinkle
play the growing worm game .....	worm
animate worms on a display terminal .....	worms
the game of hunt-the-wumpus .....	wump

## **Processing text as records within a database**

### **Processing sorted text records**

select or reject lines common to two sorted files .....	comm
relational database operator .....	join
report repeated lines in a file .....	uniq

### **Processing text records and fields**

remove columns from a file.....	colrm
cut out selected fields of each line of a file.....	cut
merge lines of several files or subsequent lines of one file .....	paste
sort or merge files .....	sort

## **Processing unstructured or structured text**

### **Editing text**

mouse-based text editor .....	TextEditor
big file scanner .....	bfs
text editor .....	ed
text editor .....	red
text editor .....	ex
text editor .....	e
text editor .....	edit
screen-oriented (visual) display editor .....	vi
screen-oriented (visual) display editor .....	view
screen-oriented (visual) display editor .....	vedit

### **Generating custom text transformations**

pattern scanning and processing language .....	awk
macro processor.....	m4
generate encryption key .....	makekey
stream editor .....	sed
translate characters .....	tr

### **Printing poster-size text**

generate a poster .....	banner
generate a large banner .....	banner7

### **Processing tabbed text**

expand tabs to spaces, and vice versa .....	expand
expand tabs to spaces, and vice versa.....	unexpand
change the format of a text file .....	newform

**Report occurrences of words or letters**

report on character frequencies in a file .....	freq
search a file for a pattern .....	grep
search a file for a pattern .....	egrep
search a file for a pattern .....	fgrep
find references in a bibliography .....	lookbib
word count .....	wc

## **Processing text to produce printed documents**

<b>Filtering out printer motions from text for display purposes</b>	
filter text containing printer control sequences for a DASI terminal .....	300
filter text containing printer control sequences for a DASI terminal .....	300s
filter text containing printer control sequences a page at a time .....	4014
filter text containing printer control sequences for the DASI terminal .....	450
filter text containing printer control sequences for use at a display device .....	col
filter nroff output for terminal previewing .....	colcrt
filter text for vintage display devices .....	greek
interpret troff output for use at a vintage display device .....	tc
filter special underlining sequences imbedded in text for use at a display device .....	ul

## **Formatting text into pages for printing**

Apple ImageWriter II troff postprocessor filter .....	daiw
Autologic APS-5 phototypesetter troff postprocessor .....	daps
convert text files to format for printing .....	enscript
format documents that contain nroff and mm formatting requests mm macros .....	mm
typeset documents .....	mmt
typeset view graphs and slides .....	mvt
text formatting language .....	nroff
text formatting and typesetting .....	otroff
format text for a print device .....	pr
convert troff intermediate format to POSTSCRIPT format ....	psdit
troff to a POSTSCRIPT printer .....	psroff
run off bibliographic database .....	roffbib
text formatting and typesetting .....	troff

## Preparing text with troff markup

create or extend bibliographic database .....	addbib
locate wordy sentences in a document .....	diction
locate wordy sentences in a document .....	explain
build inverted index for a bibliography .....	indxbib
create a subject-page index for a document .....	ndx
make permuted index .....	ptx
find and insert literature references in documents.....	refer
sort bibliographic database.....	sortbib
find spelling errors .....	spell
find spelling errors.....	hashmake
find spelling errors .....	spellin
find spelling errors .....	hashcheck
analyze surface characteristics of a document .....	style
generate a list of subjects from a document.....	subj

## Preprocess subsidiary markup within troff markup

prepare constant-width text for otroff .....	cw
prepare constant-width text for otroff .....	checkcw
format mathematical text for troff .....	eqn
format mathematical text for troff .....	checkeq
simple text formatter .....	fmt
fold long lines for finite-width output device .....	fold
pic preprocessor for drawing graphs .....	grap
format mathematical text for nroff.....	neqn
line numbering filter.....	nl
troff preprocessor for drawing pictures .....	pic
eliminate .so's from nroff input.....	soelim
make output single spaced .....	ssp
format tables for nroff or troff .....	tbl

**Process troff markup for special purposes**

check documents formatted with the <code>mm</code> macros .....	<code>checkmm</code>
check documents formatted with the <code>mm</code> macros .....	<code>checkmm1</code>
check <code>nroff/troff</code> files .....	<code>checknr</code>
remove <code>nroff/troff</code> , <code>tbl</code> , and <code>eqn</code> constructs .....	<code>deroff</code>
mark differences between files .....	<code>diffmk</code>
find hyphenated words .....	<code>hyphen</code>
produce cross-reference listing of macro files.....	<code>macref</code>

**Setting up device-specific fonts for use with troff**

prepare <code>troff</code> description files .....	<code>iwprep</code>
prepare <code>troff</code> description files.....	<code>makedev</code>

## **Processing plotter drawings**

### **Filter plotter input for display purposes**

interpret plotter instructions for use at a vintage display  
device ..... tplot

## **Processing graphics**

draw a graph ..... graph  
interpolate smooth curve ..... spline

## **Writing shell programs**

### Evaluate or provide true or false results

condition evaluation command .....	test
provide truth values .....	true
provide truth values .....	false

### Evaluating expressions

isolate substrings within a pathname argument .....	basename
isolate substrings within a pathname argument .....	dirname
echo arguments .....	echo
evaluate arguments as an expression .....	expr
parse command options .....	getopt
reverse characters within each line of text .....	rev
Korn shell instruction to echo arguments .....	print

### Perform input or output operations

post a Macintosh® alert box to query the user .....	macquery
read one line .....	line
query the user for input.....	query
query terminfo database .....	tput

## **Programming**

### **Using Macintosh development tools**

decompile a resource file .....	derez
compile resources.....	rez

### **Using other programming tools**

debugger .....	adb
archive and library maintainer for portable archives .....	ar
common assembler .....	as
a compiler/interpreter for modest-sized programs.....	bs
swap bytes in COFF files .....	conv
disassembler .....	dis
dump selected parts of an object file .....	dump
convert an object file to Motorola S-record format .....	hex
link editor for common object files .....	ld
generate programs for simple lexical tasks.....	lex
find ordering relation for an object library .....	lorder
maintain, update, and regenerate groups of files .....	make
create shared library .....	mkshlib
display the symbol table of a common object file .....	nm
convert binary data to a displayable form in octal, decimal, hexadecimal, or ASCII.....	od
display profile data .....	prof
receive and convert Motorola S-records from a port to a file .....	rcvhex
regular expression compile .....	regcmp
symbolic debugger .....	sdb
display section sizes of common object files.....	size
find the printable strings in an object or other binary file ...	strings

strip symbol and line number information from an object	
file .....	strip
topological sort .....	tsort
yet another compiler-compiler.....	yacc

### Using the C language

C program beautifier .....	cb
C compiler.....	cc
generate C flowgraph .....	cflow
the C language preprocessor .....	cpp
maintain a tags file for a C program .....	ctags
C program debugger .....	ctrace
generate C program cross-reference .....	cxref
indent and format C program source .....	indent
a C program checker .....	lint
create an error message file by massaging C source .....	mkstr
extract strings from C programs to implement shared strings ....	xstr

### Using the Fortran language

interpret ASA carriage control characters.....	asa
Extended Fortran Language .....	efl
Fortran 77 compiler .....	f77
filter the output of Fortran programs for line printing .....	fpr
split f77 or efl files.....	fsplit

### Using version management (RCS)

check in RCS revisions .....	ci
check out RCS revisions .....	co
display RCS keywords and their values .....	ident
change RCS file attributes .....	rcs
compare RCS revisions.....	rcsdiff
merge RCS revisions.....	rcsmerge
display log messages and other information about RCS files....	rlog

## Using version management (SCCS)

build RCS file from SCCS file .....	sccstorcs
create and administer SCCS files.....	admin
change the delta commentary of an SCCS delta .....	cdc
combine SCCS deltas.....	comb
make a delta (change) to an SCCS file .....	delta
get a version of an SCCS file .....	get
ask for help in using SCCS .....	help
display information about an SCCS file .....	prs
remove a delta from an SCCS file .....	rmdel
display who has checked an SCCS file out for editing. ....	sact
front end for the SCCS subsystem .....	sccs
compare two versions of an SCCS file .....	sccsdiff
undo a previous get of an SCCS file .....	unget
validate SCCS file .....	val
version control .....	vc
identify SCCS files .....	what

## Other programming languages

SNOBOL interpreter .....	sno
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## **Administering your system**

### **AppleTalk network maintenance**

configure and view AppleTalk® network interfaces .....	appletalk
look up the application loaded onto an intelligent peripheral.....	fwd_lkup
load an application onto an intelligent peripheral .....	fwdload

### **TC/IP network maintenance**

address resolution display and control .....	arp
display the current state of slip lines on a slip server .....	dslipuser
get an Ethernet address .....	etheraddr
Internet File Transfer Protocol server .....	ftpd
configure network interface parameters .....	ifconfig
Internet services daemon .....	inetd
initialize the slip user database.....	mkslipuser
Internet domain name server.....	named
exercise the network by sending test packets to a named host....	ping
DARPA port to RPC program number mapper .....	portmap
remote shell server .....	remshd
remote execution server.....	rexecd
remote login server.....	rlogind
manually manipulate the routing tables .....	route
network routing daemon .....	routed
kernel statistics server .....	rstatd
rusers server .....	rusersd
network rwall server.....	rwalld
system status server .....	rwhod
attach serial lines as network interfaces.....	slattach
attach and configure serial lines as network interfaces ...	slattconf
convert Internet addresses to standard form .....	stdhosts
remote user communication server .....	talkd

DARPA TELNET protocol server .....	telnetd
transliterate protocol trace .....	trpt
show network status .....	netstat
query name servers interactively .....	nslookup

### Backing up your system

interactive block copy .....	bcopy
copy file systems for optimal access time .....	dcopy
copy the files within the named file system to a dump.bsd archive .....	dump.bsd
copy the files within the named file system to a dump.bsd archive .....	rdump
autorecovery administration .....	escher
update autorecovery files .....	eu
update important files for autorecovery purposes .....	eupdate
fast incremental backup .....	finc
recover files from a backup tape .....	frec
copy files from a dump.bsd archive into an existing file system .....	restore
copy file systems with label checking .....	volcopy
copy file systems with label checking .....	labelit

### Examining system status

extract error records from a crash dump .....	errdead
error-logging daemon .....	errdemon
process a report of logged errors .....	errpt
terminate the error-logging daemon .....	errstop
turn on/off the reporting of extended errors .....	exterr
display kernel name cache statistics .....	ncstats
print system facts .....	pstat

## File system maintenance

clear inode .....	clri
device name .....	devnm
list file names and statistics for a file system .....	ff
check file-system consistency and interactively repair .....	fsck
debug the file system .....	fsdb
create a file-system-table entry .....	fsentry
install random inode generation numbers .....	fsirand
report file-system state .....	fsstat
identify processes using a file or file structure .....	fuser
construct an SVFS file system .....	mkfs
construct a file system with 512-byte blocks .....	mkfs1b
make a lost+found directory for fsck .....	mklost+found
mount and dismount file systems .....	mount
mount and dismount file systems .....	umount
locate the filename associated with an i-node .....	ncheck
construct a new UFS file system .....	newfs
tune an unmounted Berkeley 4.2 file system (UFS) .....	tunefs
report file-system type .....	fstyp
update the superblock .....	sync

## Installing new software

install files in specified directories .....	cpset
install A/UX commercial software from floppy disks .....	finstall
install files in specified directories .....	install

## Kernel generation

build a new up-to-date kernel .....	autoconfig
tune kernel parameters for work-load optimization .....	kconfig
identify configuration information stored within the named kernel file .....	module_dump
prepare and configure a new kernel .....	newconfig
prepare for new kernel configuration .....	newunix

## **Mail system maintenance**

server for biff(1) .....	comsat
list the contents of the mail queue .....	mailq
rebuild the database for the mail aliases file .....	newaliases
send mail over the Internet .....	sendmail

## **Monitoring system activity**

overview of accounting commands .....	acct
overview of accounting commands.....	acctdisk
overview of accounting commands.....	acctdusg
overview of accounting commands .....	accton
overview of accounting commands.....	acctwtmp
command summary from per-process accounting records ...	acctcms
search and format process accounting files .....	acctcom
connect-time accounting .....	acctcon
connect-time accounting .....	acctcon1
connect-time accounting .....	acctcon2
merge or add total accounting files .....	acctmerg
process accounting .....	acctprc
process accounting.....	acctprc1
process accounting.....	acctprc2
shell procedures for accounting .....	acctsh
shell procedures for accounting .....	chargefee
shell procedures for accounting .....	ckpacct
shell procedures for accounting .....	dodisk
shell procedures for accounting .....	lastlogin
shell procedures for accounting .....	monacct
shell procedures for accounting .....	nulladm
shell procedures for accounting .....	prctmp
shell procedures for accounting .....	prdaily
shell procedures for accounting .....	prtacct
shell procedures for accounting .....	shutacct

shell procedures for accounting .....	startup
shell procedures for accounting .....	turnacct
generate disk accounting data by user ID .....	diskusg
manipulate connect accounting records .....	fwttmp
manipulate connect accounting records .....	wtmpfix
gathers printer/plotter accounting information.....	pac
run daily accounting.....	runacct
system activity report package .....	sadc
system activity report package .....	sa1
system activity report package .....	sa2
report interprocess communication facilities status.....	ipcs
display load average statistics.....	lav
system activity graph.....	sag
system activity reporter .....	sar
display system status on status line of a terminal.....	sysline

#### Network File System (NFS) network maintenance

process network lock daemon .....	lockd
NFS mount request server .....	mountd
NFS daemons .....	nfsd
NFS daemons .....	biod
Network File System statistics .....	nfsstat
report RPC information.....	rpcinfo
show all remote mounts.....	showmount
spray packets .....	spray
spray server .....	sprayd
provide crash and recovery for network locking services.....	statd
set or display name of current domain system .....	domainname

## Print spooler maintenance

allow lp requests .....	accept
configure the lp spooling system .....	lpadmin
line-printer control program .....	lpc
4.2 line-printer daemon .....	lpd
start or stop the LP request scheduler and move requests ....	lpsched
start or stop the LP request scheduler and move requests ....	lpshut
start or stop the LP request scheduler and move requests ....	lpmove
generate line-printer ripple pattern .....	lptest
prevent LP requests.....	reject
TRANSCRIPT spooler filters for POSTSCRIPT printers....	transcript
TRANSCRIPT spooler filters for POSTSCRIPT printers.....	psbanner
TRANSCRIPT spooler filters for POSTSCRIPT printers.....	pscomm
TRANSCRIPT spooler filters for POSTSCRIPT printers.....	psinterface
TRANSCRIPT spooler filters for POSTSCRIPT printers .....	psrv
TRANSCRIPT spooler filters for POSTSCRIPT printers.....	pstext
enable or disable LP printers .....	enable
enable or disable LP printers .....	disable
print LP status information .....	lpstat

## Setting up the system

set or update bad block information .....	badblk
change current A/UX system nodename.....	chgnod
format a disk through a driver-dependent format operation .....	diskformat
perform disk partitioning .....	dp
set terminal type, modes, speed, and line discipline.....	getty
set terminal type, modes, speed, and line discipline .....	apm_getty
set console keyboard mapping .....	keyset
push streams line disciplines .....	line_sane
associate named partitions with device files.....	pname
set a serial port.....	setport
set the local time zone .....	settimezone

add or delete disk blocks to or from the swap area .....	swap
terminfo compiler .....	tic
modify the /etc/inittab file .....	tty_add
modify the /etc/inittab file .....	tty_kill
time zone dumper .....	tzdump
time zone compiler .....	tzic
check installation of boards .....	checkinstall
set or display the identifier of the current host system .....	hostid
set or display the name of the current host system .....	hostname
set or reset the terminal to a sensible state .....	tset
set or reset the terminal to a sensible state.....	reset

## Starting up and shutting down

display a progress bar during the A/UX® boot sequence .....	StartMonitor
system initialization shell scripts .....	brc
system initialization shell scripts .....	bcheckrc
system initialization shell scripts .....	macsysinitrc
system initialization shell scripts .....	rc
system initialization shell scripts .....	sysinitrc
system initialization shell scripts .....	powerfail
process control initialization .....	init
process control initialization .....	telinit
kill all active processes .....	killall
power down the system .....	powerdown
reboot the operating system .....	reboot
close down the system at a given time .....	shutdown
send messages to StartMonitor during the A/UX® boot process .....	startmsg
run startup programs at boot time.....	startup

## System administration tools

remove devices files within a directory .....	dev_kill
build device file.....	mknod
substitute user ID .....	su

## User account maintenance

add a user account .....	adduser
remote user information server .....	fingerd
password/group file checkers.....	pwck
password/group file checkers .....	grpck
edit the password file .....	vipw
change finger entry .....	chfn

## Uucp network maintenance

transfer files queued by uucp or uux.....	uucico
transfer files queued by uucp or uux .....	uushell
clean up the uucp spool directory .....	uuclean
monitor UUCP network .....	uusub
UUCP execution file interpreter.....	uuxqt

## Yellow Pages maintenance

make a yellow pages dbm file.....	makedbm
reverse the netgroup file .....	revnetgroup
build and install yellow pages database.....	ypinit
rebuild yellow pages database .....	ypmake
server for modifying yellow pages password file .....	yppasswdd
what version of a YP map is at a YP server host .....	yppoll
force propagation of a changed YP map .....	yppush
yellow pages server and binder processes .....	ypserv
yellow pages server and binder processes .....	ypbind
point ypbnd at a particular server .....	ypset
transfer a YP map from some YP server to here .....	ypxfr
list the contents of the named YP map .....	ypcat

list the value of keys in a YP map ..... ypmatch  
change login password in yellow pages..... yppasswd  
which host is the YP server or map master? ..... ypwhich

## Command Synopses

**300**

300 [+12] [-n] [-dt, l, c]  
300s [+12] [-n] [-dt, l, c]

**300s**

See 300.

**4014**

4014 [-cn] [-n] [-pl] [-t] [file]

**450**

450

**accept**

/usr/lib/accept *destinations*

**acct**

/usr/lib/acct/acctdisk  
/usr/lib/acct/acctdusg [-p *file*] [-u *file*]  
/usr/lib/acct/accton [*file*]  
/usr/lib/acct/acctwtmp *reason*

**acctcms**

/usr/lib/acct/acctcms [-a [-o] [-p]] [-c] [-j] [-n]  
[-s] [-t] *file*...

**acctcom**

acctcom [-a] [-b] [-C *sec*] [-e *time*] [-E *time*] [-f]  
[-g *group*] [-h] [-H *factor*] [-i] [-I *chars*] [-k] [-l *line*]  
[-m] [-n *pattern*] [-o *ofile*] [-O *sec*] [-q] [-r] [-s *time*]  
[-S *time*] [-t] [-u *user*] [-v] [*file*] ...

**acctcon**

/usr/lib/acct/acctcon1 [-l*file*] [-o*file*] [-p] [-t]  
/usr/lib/acct/acctcon2

**acctcon1**

See acctcon.

**acctcon2**

See acctcon.

**acctdisk**

See acct.

**acctdusg**

See acct.

**acctmrg**

/usr/lib/acct/acctmrg [-a] [-i] [-p] [-t] [-u] [-v]  
[file...]

**accton**

See acct.

**acctprc**

/usr/lib/acct/acctprc1 [*ctmp*]  
/usr/lib/acct/acctprc2

**acctprc1**

See acctprc.

**acctprc2**

See acctprc.

**acctsh**

/usr/lib/acct/chargefee *login-name number*  
/usr/lib/acct/ckpacct [*blocks*]  
/usr/lib/acct/dodisk [-o] [*file ...*]  
/usr/lib/acct/lastlogin  
/usr/lib/acct/monacct *number*  
/usr/lib/acct/nulladm*file*  
/usr/lib/acct/prctmp [*file...*]  
/usr/lib/acct/prdaily [-l] [-c] [*mmdd*]  
/usr/lib/acct/prtacct *file [heading]*  
/usr/lib/acct/shutacct [*reason*]  
/usr/lib/acct/startup  
/usr/lib/acct/turnacct on|off|switch

**acctwtmp**

See acct.

**adb**

adb [-k] [-w] [*objfil* [*corfil*]]

**addbib**

addbib [-p *promptfile*] [-a] *database*

**adduser**

adduser [-r *real-name*] [-a *address*] [-x *extension*]  
[-p *home-phone*] [-g *group*] [-s *shell*] [-d *dir*] [-h *home*]  
[-u *lowest*] [-U *uid*] [-i] [-c] [*login-name*]...

**admin**

admin [-alogin] [-d*flag*[*flag-val*]] [-elogin] [-f*flag*[*flag-val*]]  
[-h] [-i[*name*]] [-m[mrlist]] [-n] [-rrel[.lev]] [-t[*name*]]  
[-y[*comment*]] [-z] *file*...

**ae****aliens**

/usr/games/aliens

**apm\_getty**

See getty.

**appletalk**

appletalk [-u] [-i *interface*] [-b *hardware\_interface*] [-z]  
[-d] [-n] [-s]

**apply**

apply [-ac] [-n] *command args*...

**apropos**

apropos *keyword*...

**ar**

ar *key* [clsuv] [abi *posname*] *afile name* ...

**arithmetic**

/usr/games/arithmetic [+ - x /] [*range*]

**arp**

```
/etc/arp hostname
/etc/arp -a [unix] [kmem]
/etc/arp -d hostname
/etc/arp -s hostname ether-addr [temp] [pub]
/etc/arp -f filename
```

**arp****as**

```
as [-m] [-n] [-o objfile] [-R] [-V] filename
```

**asa**

```
asa [file...]
```

**ascii**

```
cat /usr/pub/ascii
```

**at**

```
at time [date] [+increment]
at -l [job...]
at -r job...
batch
```

**atlookup**

```
atlookup [-d] [-r nn] [-s nn] [-x] [object[:type[@zone ]]]
atlookup -z [-C]
```

**atprint**

```
atprint [object[:type[@zone ]]]
```

**atstatus**

```
atstatus [object[:type[@zone ]]]
```

**at\_cho\_prn**

```
at_cho_prn [type[@zone ]]
```

**autoconfig**

```
/etc/autoconfig [-v] [-v] [-I] [-a] [-k] [-D] [-i file]
[-o file] [-m directory] [-b directory] [-l linker] [-S file]
[-s directory] [-d directory] [-L loadfile] [-M file]
[-t timeout]
```

**autorobots**

/usr/games/autorobots

**awk**    awk [-f *file...*] [-Fc] [*prog*] [*parameters*] [*file...*]**back**

/usr/games/back

**badblk**    badblk [-r] /dev/rdsk/c?d?s? [*blkno...*]**banner**    banner *string* ...**banner7**    banner7 [-w[n]] [*message...*]**basename**    basename *string* [*suffix*]    dirname *string***batch**

See at.

**bc**    bc [-c] [-l] [*file...*]**bcd**    /usr/games/bcd *text***bcheckrc**

See brc.

**bcopy**

/etc/bcopy

**bdiff**    bdiff *file1* *file2* [*n*] [-s]**bfs**    bfs [-] *filename*

**biff**

biff [*choice*]

**biod**

See nfsd.

**bj**

/usr/games/bj

**boot****brc**

/etc/brc  
/etc/bcheckrc  
/etc/macsyssinitrc  
/etc/powerfail  
/etc/rc  
/etc/sysinitrc

**bs**

bs [*file [args]*]

**cal**

cal [[*month*] *year*]

**calendar**

calendar [-]

**cancel**

See lp.

**cat**

cat [-u] [-s] [-v [-t] [-e]] *files*

**cb**

cb [-s] [-j] [-l *leng*] [*file...*]

**cc**

cc [-B *string*] [-c] [-C] [-D *symbol[=def]*] [-E] [-F]  
[-fm68881] [-g] [-I *dir*] [-L *dir*] [-lx] [-n] [-o *outfile*]  
[-O] [-p] [-P] [-R] [-s] [-S] [-t [*p012a1*]] [-T]  
[-U *symbol*] [-v] [-W *c, arg1[, arg2...]*] [-X] [-Z *flags*]  
[-#] ... *file ...*

**ccat**

See compact.

**cdc**

cdc [-m[mrlist]] -r SID [-y[comment]] file ...

**cflow**

cflow [-dnum] [-i\_] [-ix] [-r] file ...

**changesize**

/mac/bin/changesize [-v] [-pprefsize] [-mminsize]  
[±option] file

**chargefee**

See acctsh.

**chase**

/usr/games/chase [nrobots] [nfences]

**checkcw**

See cw.

**checkeq**

See eqn.

**checkinstall**

/etc/checkinstall ethertalk

**checkmm**

checkmm file ...

**checkmm1**

See checkmm.

**checknr**

checknr [-a.x1.y1.x2.y2.....xn.yn] [-  
c.x1.x2.x3.....xn] [-f] [-s] [file...]

**chfn**

chfn [loginname]

**chgnod**

chgnod new-name [kernel-file]

**chgrp**

See chown.

**chmod**

chmod *mode file ...*

**chown**

chown *owner file ...*  
chgrp *group file ...*

**chroot**

/etc/chroot *newroot command*

**chsh**

chsh *name [shell]*

**ci**

ci [-r[rev]] [-f[rev]] [-k[rev]] [-l[rev]] [-u[rev]] [-q[rev]]  
[-mmsg] [-nname] [-Nname] [-sstate] [-t[txtfile]] *files*

**ckpacct**

See acctsh.

**clear**

clear

**clri**

/etc/clri [-T*file-system-type*] *file-system i-number ...*

**cmdo**

cmdo [*command-name*]

**cmp**

cmp [-l] [-s] *file1 file2*

**co**

co [-l[rev]] [-p[rev]] [-q[rev]] [-ddate] [-r[rev]] [-sstate]  
[-w[login]] [-j] *files*

**col**

col [-b] [-f] [-p] [-x]

**colcrt**`colcrt [-] [-2] [file]`**colrm**`colrm startcol [endcol]`**comb**`comb [-clist] [-o] [-psid] [-s] file ...`**comm**`comm [-[123]] file1 file2`**CommandShell**`CommandShell [-b pid] [-u] [-q]`**compact**`compact [name...]``uncompact [name...]``ccat [file...]`**compress**`compress [-f] [-v] [-c] [-v] [-b maxbits] [files]``uncompress [-f] [-v] [-c] [-V] [files]``zcat [-V] [files]`**comsat**`/usr/etc/in.comsat`**conv**`conv [-] [-a] [-o] [-p] [-s] -t targetfile ...`**cp**`cp [-i] [-r] file1 file2``cp [-i] [-r] file... directory`**cpio**`cpio -o[acBFv]``cpio -i[BcdmrtuvwxyzB6] [patterns]``cpio -p[adlmuv] directory`**cpp**`/lib/cpp [-C] [-Dname[=def]] [-I dir] [-P] [-U name] [-M [prefix]] [-Y] [ifile [ofile]]`

**cpset**

cpset [-o] *object directory [mode [owner [group]]]*

**craps**

/usr/games/craps

**cribbage**

/usr/games/cribbage [-r] [-e] [-q] *name...*

**cron**

/etc/cron

**crontab**

crontab [*file*]

crontab -l

crontab -r

**crypt**

crypt [*password*]

**csh**

csh [-c] [-e] [-f] [-i] [-n] [-s] [-t] [-v] [-V] [-x] [-X]  
[*arg...*]

**csplit**

csplit [-f *prefix*] [-k] [-s] *file arg1 ... argn*

**ct**

ct [-h] [-v] [-wn] [-sspeed] *telno ...*

**ctags**

ctags [-a] [-u] [-w] [-x] *name ...*

**ctrace**

ctrace [-b] [-e] [-ffunctions] [-ln] [-o] [-p 's'] [-P]  
[-rf] [-s] [-tn] [-u] [-vfunctions] [-x] [*file*]

**cu**

cu [-d] [-e] [-h] [-line] [-m] [-n] [-o] [-sspeed] [-t] *args*

**cubic**

See ttt.

<b>cut</b>	<b>devnm</b>
<b>cut</b>	
<i>cut -type [-d char] [-s] [file]...</i>	
<b>cw</b>	
<i>cw [-d] [-fn] [-lxx] [-rxx] [-t] [+t] [files...]</i>	
<i>checkcw [-lxx] [-rxx] file...</i>	
<b>cxref</b>	
<i>cxref [-c] [-o file] [-s] [-t] [-w[num]] file...</i>	
<b>daiw</b>	
<i>daiw [-v] [-rnum] file</i>	
<b>daps</b>	
<i>daps [-b] [-hstring] [-olist] [-r] [-sn] [-t] [-w] [file...]</i>	
<b>date</b>	
<i>date [mmddhhmm[yy]] [+format]</i>	
<b>dc</b>	
<i>dc [file]</i>	
<b>dcopy</b>	
<i>/etc/dcopy [-sX] [-an] [-d] [-v] [-ffsize [: isize]] inputs outputs</i>	
<b>dd</b>	
<i>dd [option=value]...</i>	
<b>delta</b>	
<i>delta [-glist] [-m[mrlist]] [-n] [-p] [-rSID] [-s] [-y[comment]] file ...</i>	
<b>derez</b>	
<i>derez [option]... resource-file [resource-description-file]...</i>	
<b>deroff</b>	
<i>deroff [-mx] [-w] [file...]</i>	
<b>devnm</b>	
<i>/etc/devnm [mount-point]</i>	

**dev\_kill**  
**dev\_kill** *number directory [directory...]*

**df**  
**df** [-t] [-f] [-T] [*file...*]

**dition**  
**dition** [-ml] [-mm] [-n] [-f *pfile*] *file...*  
**explain**

**diff**  
**diff** [-l] [-r] [-s] [-S*name*] [-cefh] [-b] *dir1 dir2*  
**diff** [-cefh] [-b] *file1 file2*  
**diff** [-D*string*] [-b] *file1 file2*

**diff3**  
**diff3** [-3] [-e] [-x] *file1 file2 file3*

**diffmk**  
**diffmk** [-] *file1 file2 file3*

**difrcmp**  
**difrcmp** [-d] [-s] [-wn] *dir1 dir2*

**dirname**  
See basename.

**dis**  
**dis** [-d *sec*] [-da *sec*] [-F *function*] [-l *string*] [-L] [-o]  
[-t *sec*] [-V] *file ...*

**disable**  
See enable.

**diskformat**  
**diskformat** [-dens *n*] [-head 0] *floppy-device*  
**diskformat** [-cyl *s*[-[*e*]]] [-size 532] *hard-disk-device*

**diskusg**  
**diskusg** [-i *ignlist*] [-p *pw-file*] [-s] [-u *outfile*] [-v]  
[*file...*]

**dodisk**

See acctsh.

**domainname**

domainname [*name-of-domain*]

**dp**

dp [-q] [-u] *file*

**dslipuser**

/etc/dslipuser

**du**

du [-a] [-r] [-s] [*names*]

**dump**

dump [[-a] [-c] [-f] [-g] [-h] [-l] [-o] [-r] [-s] [-t] [-z *name*]] [[-d *number*] [+d *number*] [-n *name*] [-p] [-t *index*] [+t *index*] [-u] [-v] [-z *name, number*] [+z *name*]] *file* ...

**dump.bsd**

/etc/dump.bsd [-T*file-system-type*] [*key*]... [*argument...*] [*filesystem*]  
/etc/rdump [-T*file-system-type*] [*key*]... [*argument...*] [*filesystem*]

**e**

See ex.

**echo**

echo [*arg*] ...

**ed**

ed [-] [-p *string*] [-x] [*file*]  
red [-] [-p *string*] [-x] [*file*]

**edit**

See ex.

**efl**

efl [-#] [-C] [-w] [*file* ...]

**egrep**

See grep.

**eject**

eject [0] [1] [/dev/rdsk/*name*]

**enable**

enable *printers*

disable [-c] [-r[*reason*]] *printers*

**enscript**

enscript [-12BGghKklmoqRr] [-L*lines*] [-f*font*] [-F*font*]  
[-b*header*] [-p*out*] [*spoolopts*] [*files*]

**env**

env [-] [*name=value*]... [*command args*]

**environ**

extern char \*\*environ;

**eqn**

eqn [-d*xy*] [-p*n*] [-s*n*] [-f*n*] [-T*Tty-type*] [-] [*file...*]  
checkeq [*file...*]

**eqnchar**

eqn /usr/pub/eqnchar [*options*] [-] [*files*] | troff [*options*]  
eqn /usr/pub/cateqnchar [*options*] [-] [*files*] | troff [*options*]  
neqn /usr/pub/eqnchar [*options*] [-] [*files*] | troff [*options*]  
eqn -Taps /usr/pub/apseqnchar [*options*] [-] [*files*]  
| troff [*options*]

**errdead**

/etc/errdead *dumpfile* [*namelist*]

**errdemon**

/usr/lib/errdemon [*file*]

**errpt**

errpt [-a] [-dev] [-e *date*] [-f] [-p *n*] [-s *date*] [*file...*]

**errstop**

/etc/errstop [namelist]

**esch**

esch [-b] [-c*cluster-number*] [-f] [-v]

**escher**

escher [-y] [-m]

escher *file...*

**etheraddr**

/etc/etheraddr [slot]

**eu**

/etc/eu*file*

**eupdate**

/etc/eupdate

**ex**

ex [-] [+*command*] [-r] [-R] [-t *tag*] [-v] [-x] *name...*

e *ex-arguments*

edit [-] [+*command*] [-r] [-R] [-t *tag*] [-v] [-x] *name...*

**expand**

expand [-tabstop] [-tab1, *tab2*, ..., *tabn*] [*file...*]

unexpand [-a] [*file...*]

**explain**

See diction.

**expr**

expr *arguments*

**exterr**

exterr /dev/*devicename* [*choice*]

**f77**

f77 [-1] [-66] [-c] [-C] [-E] [-f] [-F] [-g] [-I[24s]] [-m]  
[-o*output*] [-O] [-onetrip] [-p] [-R] [-S] [-u] [-U] [-w] *file*

...

---

**factor**  
    **factor** [*number*]

**false**  
    See **true**.

**fcntl**  
    **#include <fcntl.h>**

**fcnvt**  
    **fcnvt** [-i *input-format*] [-o *output-format*] [-f] *input-file*  
          *output-file*  
    **fcnvt** [-i *input-format*] -s [-f] *input-file* *output-file*  
    **fcnvt** [-i *input-format*] -d [-f] *input-file* *output-file*  
    **fcnvt** [-i *input-format*] -t [-f] *input-file* *output-file*  
    **fcnvt** [-i *input-format*] -p [-f] *input-file* *output-file*  
    **fcnvt** [-i *input-format*] -b [-f] *input-file* *output-file*  
    **fcnvt** [-i *input-format*] -m [-f] *input-file* *output-file*

**ff**  
    **/etc/ff** [-an] [-cn] [-i *inode-list*] [-I] [-l] [-mn] [-n*file*]  
          [-pprefix] [-s] [-u] *special*

**fgrep**  
    See **grep**.

**file**  
    **file** [-c] [-f *ffile*] [-m *mfile*] *arg ...*

**finc**  
    **finc** [-a *n*] [-c *n*] [-m *n*] [-n *file*] *file-system raw-tape*

**find**  
    **find** *pathname-list expression*

**finger**  
    **finger** [-b] [-f] [-h] [-i] [-l] [-m] [-p] [-q] [-s] [-w]  
          [*name...*]

**fingerd**  
    **/usr/etc/in.fingerd**

---

```
finstall
    finstall

fish
    /usr/games/fish

fmt
    fmt [name...]

fold
    fold [-width] [file...]

font
    troff -Ttty-type ...

fortune
    /usr/games/fortune

fpr
    fpr

freqc
    /etc/freqc [-ppath] [-freqfile] raw-tape inumber: name ...

freq
    freq [file...]

from
    from [-s sender] [user]

fsck
    /etc/fsck -T 5.2 [-y] [-n] [-mtimeout] [-sX] [-SX]
    [-tfile] [-q] [-Doptions...] [-f] [-ppassstart]
    [svfs-filesystem...]
    /etc/fsck [-bblock-number] [-y] [-n] [-mtimeout] -T 4.2
    [-ppassstart] [ufs-filesystem...]

fsdb
    /etc/fsdb [-T4.2] [-?] [-o] [-pstring] [-w] special
    /etc/fsdb [-T5.2] special [-]
```

**fsentry**

**fsentry** [-t *type*] [-o *optlist*] [-d *dumpfreq*] [-p *passno*] [-n]  
  [-f] *file-system mount-point*

**fsirand**

**fsirand** [-p] [-T*file-system-type*] *special*

**fsplit**

**fsplit** [-e] [-f] [-s] *file* ...

**fsstat**

**fsstat** [-T*file-system-type*] *file-system*

**fstyp**

**fstyp** *file*

**ftp**

**ftp** [-v] [-d] [-i] [-n] [-g] [*host*]

**ftpd**

  /usr/etc/in.ftpd [-d] [-l] [-t*timeout*]

**fuser**

  /etc/fuser [-] [-k] [-n*namelist*] [-u] *file*...

**fwdload**

**fwdload** [-a] [-v] [-f*dev*] [-n*name*] *filename*

**fwd\_lkup**

**fwd\_lkup** [-f*dev*] [-v]

**fwttmp**

  /usr/lib/acct/fwttmp [-ic]  
  /usr/lib/acct/wtmpfix [*files*]

**get**

**get** [-a*seq-no*] [-b] [-c*cutoff*] [-e] [-g] [-i*list*] [-k] [-l[i]]  
  [-m] [-n] [-p] [-r*SID*] [-s] [-t] [-w*string*] [-x*list*] *file*...

**getopt**

**getopt** [*flag-letter*[:]]... [*input-string*]

**getty**

```
/etc/getty [-h] [-ttimeout] line [speed [type [linedisc]]]  
/etc/getty -c file  
/etc/apm_getty getty-options
```

**grap**

```
grap [-Ttty-type] [-l] [-] [file...]
```

**graph**

```
graph [-a [sp] [st]] [-b] [-clabel] [-g [style]] [-h hspace] [-  
l title] [-m [mode]] [-r rspace] [-s] [-t] [-u uspace] [-  
w wspace] [-x [l] [a] [b] [c]] [-y [l] [a] [b] [c]]
```

**greek**

```
greek [-Tterminal]
```

**greek**

```
cat /usr/pub/greek | greek -Tterminal ]
```

**grep**

```
grep [-b] [-c] [-i] [-n] [-s] [-v] expression [file...]  
egrep [-b] [-c] [-e expression] [-f file] [-i] [-n] [-v] [ex-  
pression] [file...]  
fgrep [-b] [-c] [-e expression] [-f file] [-i] [-n] [-v] [-x]  
[strings] [file...]
```

**groups**

```
groups [user]
```

**grpck**

See pwck.

**hangman**

```
/usr/games/hangman [arg]
```

**hashcheck**

See spell.

**hashmake**

See spell.

**head**

```
head [-count] [file...]
```

**help**    **help** [*args*]**hex**    **hex** [-f] [-l] [-n#] [-r] [-s0] [-s2] [-ns8] [+saddr] *ifile***hostid**    **hostid** [*identifier*]**hostname**    **hostname** [*nameofhost*]**hyphen**    **hyphen** [*file...*]**icmp**    None; included automatically with **inet(5F)**.**id**    **id****ident**    **ident** *files***ifconfig**    /etc/ifconfig *interface* [*address* [*dest-address*]]    [*parameter...*]    /etc/ifconfig *interface* [*protocol-family*]**indent**    **indent** *input* [*output*] [*flags*]**indxbib**    **indxbib** *database...***inet**

#include &lt;sys/types.h&gt;

#include &lt;netinet/in.h&gt;

**inetd**

/etc/inetd [-d]

```
init
    /etc/init [0123456SsQqabc]

install
    /etc/install [-c dira] [-f dirb] [-g group] [-i] [-m mode]
    [-n dirc] [-o] [-s] [-u user] file [dirx...]

ip
    #include <sys/socket.h>
    #include <netinet/in.h>

ipcrm
    ipcrm [-m shmid] [-M shmkey] [-q msqid] [-Q msgkey] [-
    s semid] [-S semkey]

ipcs
    ipcs [-a] [-b] [-c] [-C corefile] [-m] [-N namelist] [-o] [-p]
    [-q] [-s] [-t]

isotomac
    See mactoiso.

iw2
    iw2 [-a dotspace] [-b] [-c color] [-d] [-D udcfile] [-f] [-h]
    [-k mode] [-l language] [-m margin] [-n length] [-o file]
    [-p pitch] [-q quality] [-s spacing] [-t tabs] [-u]
    [-U udcfile] [-w value] [-x] [-z] [file...]

iwprep
    iwprep [file]

join
    join [-an] [-e string] [-jn m] [-o list] [-tc] file1 file2

kconfig
    /etc/kconfig [-a [-v] [-V]] [-nnamelist]

kermit
    kermit [option...] [file...]

keyset
    /etc/keyset [keyboard] [country]
```

**kill**

**kill** [-sig] *pid*...

**killall**

**/etc/killall** [-n *namelist*] [*signal*]

**ksh**

**ksh** [-a] [-e] [-f] [-h] [-i] [-k] [-m] [-n] [-o] [-p] [-r] [-s] [-t] [-u] [-v] [-x] [-o *option*]... [-c *string*] [*arg*...]

**labelit**

    See **volcopy**.

**last**

**last** [*name*...] [*tty*...]

**lastlogin**

    See **acctsh**.

**launch**

**launch** -[it] *filename* [*document*...]

**launch** -p[it] *filename* *document*...

**launch**

**launch** [-a] [-d] [-f] [-m] [-r] [-v] [-s] [*pathname*]

**launch** [-n] [-d] [-f] [-m] [-r] [-v] [-s] [*pathname*]

**lav**

**lav**

**ld**

**ld** [-e~~e~~psym] [-f~~f~~ill] [-lx] [-m] [-o~~o~~utfile] [-r] [-s] [-t]  
    [-usy~~u~~name] [-x] [-z] [-F] [-Ldir] [-M] [-N] [-V] [-VSnum]  
    *file* ...

**leave**

**leave** [*hhmm*]

**lex**

**lex** [-c] [-n] [-t] [-v] [*file*] ...

**life**

**/usr/games/life** [-r]

---

```
line
    line

line_sane
    /etc/line_sane [ fildes]

lint
    lint [-a] [-b] [-Dname[=def]] [-h] [-Idir] [-lx] [-n] [-o lib] [-p] [-u] [-Uname] [-v] [-x] file...

ln
    ln [-s] name1 [name2]
    ln name... directory
    ln -f directory1 directory2

lo
    pseudo-device loop

lockd
    /etc/rpc.lockd [-t timeout] [-g graceperiod]

login
    login [name [env-var...]]

Login
    Login [-- [-r] [-g]]

logname
    logname

lookbib
    lookbib [-n] database

lorder
    lorder file...

lp
    lp [-c] [-ddest] [-m] [-nnumber] [-ooption] [-s] [-ttitle]
        [-w] [file...]
    cancel jobno... [printers]
    cancel printers [jobno]...
```

**lpadmin**

```
/usr/lib/lpadmin -pprinter [-cclass] [-eprinter] [-h]
[-iinterface] [-l] [-mmodel] [-rclass] [-vdevice]
/usr/lib/lpadmin -xdest
/usr/lib/lpadmin -d[i]dest
```

**lpc**

```
/etc/lpc [command [argument ...]]
```

**lpd**

```
/usr/lib/lpd [-l] [port #]
```

**lpmove**

See lpsched.

**lpq**

```
lpq [+n] [-l] [-Pprinter] [job # ...] [user ...]
```

**lpr**

```
lpr [-Pprinter] [-#num] [-Cclass] [-Jjob] [-Ttitle]
[-i [numcols]] [-1234font] [-wnum] [-pltndgvcfrmhs]
[name ...]
```

**lprm**

```
lprm [-Pprinter] [-] [jobno]... [user]...
```

**lpsched**

```
/usr/lib/lpsched
/usr/lib/lpshut
/usr/lib/lpmove requests dest
/usr/lib/lpmove dest1 dest2
```

**lpshut**

See lpsched.

**lpstat**

```
lpstat [-a[i]list] [-c[i]list] [-d] [-o[i]list] [-p[i]list] [-r] [-s]
[-t] [-u[i]list] [-v[i]list]]
```

**lptest**

```
lptest [length [count]]
```

**ls**

```
ls [-R] [-a] [-d] [-C] [-x] [-m] [-l] [-L] [-n] [-o] [-g] [-r]
[-t] [-u] [-c] [-p] [-F] [-b] [-q] [-i] [-s] [names]
```

**m4**

```
m4 [-Bint] [-e] [-Hint] [-s] [-Sint] [-Tint] [-Dname[=val]]
[-Uname] [file...]
```

**m68k**

See machid.

**machid**

```
m68k
pdp11
u3b
u3b2
u3b5
u3b15
vax
```

**macquery**

```
macquery [-t timeout] [-a] [-c] [-n] [-s] resource-file alert-
ID [parm1 ... parm4]
```

**macref**

```
macref [-t] [-s] [-n] [--] file...
```

**macsysinitrc**

See brc.

**mactoiso**

```
mactoiso [-c char] [file]
isotomac [-c char] [file]
```

**mail**

```
mail [-e] [-f file] [-p] [-q] [-r] [-t] address ...
rmail [-t] address ...
```

**mailq**

```
mailq [-v]
```

**mailx**

```
mailx [-d] [-e] [-f [filename]] [-F] [-h number] [-H] [-i]
      [-n] [-N] [-r address] [-s subject] [-u user] [-U] [name ...]
```

**make**

```
make [-b] [-B] [-cdigits] [-e] [-f description-file] [-g] [-i]
      [-k] [-K] [-n] [-p] [-P] [-q] [-r] [-s] [-t] [-u] [target...]
```

**makedbm**

```
makedbm [-i yp-input-file] [-o yp-output-name]
      [-d yp-domain-name] [-m yp-master-name] infile outfile
makedbm [-u dbmfilename]
```

**makedev**

```
makedev files
```

**makekey**

```
/usr/lib/makekey
```

**man**

```
man [-c] [-d] [-Tterm] [-w] [section] name [section name...]
```

**man**

```
nroff -man files
troff -man [-rs1]files
```

**mastermind**

```
/usr/games/mastermind
```

**math**

```
#include <math.h>
```

**maze**

```
/usr/games/maze
```

**me**

```
nroff -me [nroff-options...]
troff -me [troff-options...]
```

**merge**

```
merge [-p] file1 file2 file3
```

---

**mesg**  
mesg [*choice*]

**mkdir**  
mkdir *dirname* ...

**mkfs**  
/etc/mkfs *device-file* *blocks[:inodes]* [*gap modulus*]  
/etc/mkfs *device-file* *proto* [*gap modulus*]

**mkfs1b**  
/etc/mkfs1b *special blocks[:inodes]* [*m n*]  
/etc/mkfs1b *special proto* [*m n*]

**mklost+found**  
mklost+found

**mknod**  
/etc/mknod *name type* [*major minor*]  
/etc/mknod *name p*

**mkshlib**  
mkshlib -s *specs* [-n] -t *target* [-h *host*]

**mkslipuser**  
/etc/mkslipuser

**mkstr**  
mkstr [-] *messagefile prefix file* ...

**mm**  
mm [-T*tty-type*] [-12] [-c] [-e] [-t] [-E] [*file...*]

**mm**  
mm [*options*] [*files*]  
nroff -mm [*options*] [*files*]  
nroff -cm [*options*] [*files*]  
mmt [*options*] [*files*]  
troff -mm [*options*] [*files*]

**mmt**  
mmt [-a] [-e] [-t] [-p] [-g] [-T*tty-type*] [-D*dest*] [-z] [*file...*]

**module\_dump**

**module\_dump kernel**

**monacct**

    See acctsh.

**moo**

**/usr/games/moo**

**more**

**more [-c] [-d] [-f] [-l] [-n] [-s] [-u] [+linenumber]  
        [name ...]**

**more [-c] [-d] [-f] [-l] [-n] [-s] [-u] [+ / pattern] [name ...]  
        page more-arguments**

**mount**

**/etc/mount [-p]  
        /etc/mount -a [frv] [-t type] [-T type]  
        /etc/mount [-frv] [-t type] [-T type] [-o options]  
            device-file mount-point  
        /etc/umount [-v] -h host  
        /etc/umount -a[v]  
        /etc/umount [-v] [device-file]...  
        /etc/umount [-v] [mount-point]...**

**mountd**

**/usr/etc/rpc.mountd**

**mptx**

**nroff -mptx [options] [files]  
        troff -mptx [options] [files]**

**ms**

**nroff -ms [nroff-options...]  
        troff -ms [troff-options...]**

**mt**

**mt [-f device-file] command [count]**

**mv**

**mv [-i] [-f] [-] file1 file2  
        mv [-i] [-f] [-] file... directory**

**mv**

mv [-a] [*options*] [*files*]  
troff [-a] [-rX1] -mv [*options*] [*files*]

**mvt**

mvt [-a] [-e] [-t] [-p] [-g] [-T*tty-type*] [-D*dest*] [-z] [*file...*]

**named**

named [-d *debuglevel*] [-p *port#*] [*bootfile*]

**ncheck**

/etc/ncheck [-a] [-i *i-node-numbers*] [-s] [-T*file-system-type*] [*file-system*]

**ncstats**

ncstats

**ndx**

ndx *subfile* *formatter-command-line*

**neqn**

neqn [-dxy] [-pn] [-sn] [-fn] [-] [*file...*]

**netstat**

netstat [-Aan] [-f *address-family*] [*system*] [*core*]  
netstat [-himnrs] [-f *address-family*] [*system*] [*core*]  
netstat [-n] [-I *interface*] *interval* [*system*] [*core*]

**newaliases**

newaliases

**newconfig**

/etc/newconfig [-v] [nonet] [*module*]... [ nomodule ]...

**newform**

newform [-an] [-bn] [-cchar] [-en] [-f] [-itabspec]  
[-ln] [-otabspec] [-pn] [-s] [*file...*]

**newfs**

/etc/newfs [-v] [*options*] *device-file type*

**newgrp**

newgrp [-] [*group*]

**news**

news [-a] [-n] [-s] [*items*]

**newunix**

/etc/newunix [[no]*module*] ...

**nfsd**

/etc/nfsd [*nserver...*]  
/etc/biod [*nserver...*]

**nfsstat**

nfsstat [-csnrz]

**nice**

nice [-*increment*] *command [arguments]*

**nl**

nl [-b*type*] [-d*delim*] [-f*type*] [-h*type*] [-i*incr*] [-l*num*]  
[-n*format*] [-p] [-s*sep*] [-v*start#*] [-w*width*] *file*

**nm**

nm [-d] [-e] [-f] [-h] [-n] [-o] [-T] [-u] [-v] [-V] [-x]  
*file* ...

**nohup**

nohup *command [arguments]*

**nroff**

nroff [-o*list*] [-n*N*] [-s*[N]*] [-ra*N*] [-i] [-q] [-z] [-m*name*]  
[-T*Tty-type*] [*file...*]

**nslookup**

nslookup  
nslookup - *server*  
nslookup *host-to-find [server]*

**nterm****nulladm**

See acctsh.

**number**

/usr/games/number

**od**

od [-b] [-c] [-d] [-o] [-s] [-x] [file] [[+]offset [. ][b]]

**otroff**

otroff [-cname] [-kname] [-t] [-f] [-w] [-b] [-pN] [file...]

**pac**

/etc/pac [-Pprinter] [-pprice] [-s] [-r] [-c] [-m]  
[name]...

**pack**

pack [-] [-f] name ...  
pcat name ...  
unpack name ...

**page**

See more.

**pagesize**

pagesize

**passwd**

passwd [name]

**paste**

paste file1 file2 ...  
paste -dlist file1 file2 ...  
paste -s [-dlist] file1 file2 ...

**pax**

pax [-cimopuvy] [-f archive] [-s replstr] [-t device] [pattern]...  
pax -r [-cimnopuvy] [-f archive] [-s replstr] [-t device] [pattern]...  
pax -w [-adimuvy] [-b blocking] [-f archive] [-s replstr]  
[-t device] [-x format] [pathname]...  
pax -rw [-ilmopuvy] [-s replstr] [pathname]... directory

**pcat**

See pack.

**pdp11**

See machid.

**pg**

pg [-number] [+linenumber] [+/pattern] [-c] [-e] [-f] [-n]  
[-p string] [-s] [file...]

**pic**

pic [-Ttty-type] [-] [file...]

**ping**

/usr/etc/ping host [timeout]

**pname**

/bin/pname [-a] [-c controller] [-d disk] [-s slice] [-t type]  
name  
/bin/pname [-p]  
/bin/pname -a[v]  
/bin/pname -u device-file [device-file ...]

**portmap**

/etc/portmap

**powerdown**

/etc/powerdown

**powerfail**

See brc.

**pr**

pr [+k] [-k] [-a] [-d] [-eck] [-f] [-h head] [-ick] [-lk] [-m]  
[-nck] [-ok] [-p] [-r] [-sc] [-t] [-wk] [file...]

**prctmp**

See acctsh.

**prdaily**

See acctsh.

**printenv**

printenv [argument]

**prof**

prof [-a] [-c] [-g] [-h] [-m mdata] [-n] [-o] [-s] [-t] [-x]  
[-z] [prog]

**prof**

```
#define MARK
#include <prof.h>
void MARK (name)
```

**prs**

```
prs [-a] [-c [date-time]] [-d [dataspec]] [-e] [-l] [-r [SID]]
file ...
```

**prtacct**

See acctsh.

**ps**

```
ps [-e] [-d] [-a] [-f] [-l] [-ccorefile] [-sswapdev] [-nname-list]
[-ttermist] [-pproclist] [-uuidlist] [-ggrplist]
```

**psbanner**

See transcript.

**pscomm**

See transcript.

**psdit**

```
psdit [-F fontdir] [-p prologue] [-o list] [file]
```

**psinterface**

See transcript.

**psroff**

```
psroff [-t] [troff-option...] [spool-option...] [file...]
```

**psrv**

See transcript.

**pstat**

```
pstat [-p [-a]] [-b] [-i] [-m] [-nname-list] [-rrate] [-t]
[-uaddress] [-v [file]]
```

**pstext**

See transcript.

**ptx**

```
ptx [-b break] [-f] [-g gap] [-i ignore] [-o only] [-r] [-t]
[-w n] [input [output]]
```

**pwck**

```
/etc/pwck [file]
/etc/grpck [file]
```

**pwd**

```
pwd
```

**query**

```
query [-tseconds] [-r[response]] [-m]
```

**quiz**

```
/usr/games/quiz [-ifile] [-t] [category1 category2]
```

**rain**

```
/usr/games/rain
```

**rc**

```
See brc.
```

**rcp**

```
rcp file1 file2
rcp [-r] file... directory
```

**rcs**

```
rcs [-i] [-alogins] [-Aoldfile] [-e[logins]] [-cstring]
[-l[rev]] [-u[rev]] [-L] [-U] [-nname[:rev]] [-Nname[:rev]]
[-orange] [-q] [-sstate[:rev]] [-t[txtfile]] files
```

**rcsdiff**

```
rcsdiff [-biwt] [-cefhn] [-rrev1] [-rrev2] files
```

**rcsintro****rcsmerge**

```
rcsmerge -rrev1 [-rrev2] [-p] file
```

**rcvhex**

```
rcvhex [-p port] [-c command] file
```

**rdist**

```
rdist [-nqbRhivwy] [-f distfile] [-dvar=value] [-mhost]
[name...]
rdist [-nqbRhivwy] -c name... [login@] host [:dest]
```

**rdump**

See dump.bsd.

**read\_disk**

```
read_disk
```

**reboot**

```
/etc/reboot [ -h ] [ -l ] [ -n ] [ -q ]
```

**red**

See ed.

**refer**

```
refer [-a[n]] [-b] [-c keys] [-e] [-fn] [-kx] [-l[m, n]]
[-n] [-p bib] [-s keys] [-Bl.m] [-P] [-S] [file...]
```

**regcmp**

```
regcmp [-] file ...
```

**regexp**

```
#define INIT declarations
#define GETC() getc-code
#define PEEKC() peekc-code
#define UNGETC (c) ungetc-code
#define RETURN (pointer) return-code
#define ERROR (val) errors-code
#include <regexp.h>
char *compile(instring, exbuf, endbuf, eof)
char *instring, *exbuf, *endbuf;
int eof;
int step(string, exbuf)
char *string, *exbuf;
extern char *loc1, *loc2, *locs;
extern int circf, sed, nbra;
```

**reject**

```
/usr/lib/reject [-r [reason]] [destination...]
```

**remlogin**    **remlogin****remsh**    **remsh** *rhost* [**-l** *username*] [**-n**] [*command*]**remshd**    **/etc/in.remshd** *host.port***reset**    See **tset**.**restore**    **/etc/restore** [**-o**] [**-T***file-system-type*] *key* [*argument*]...    **/etc/rrestore** [**-o**] [**-T***file-system-type*] *key* [*argument*]...**rev**    **rev** [*file*]...**revnetgroup**    **/etc/yp/revnetgroup** [**-u**] [**-h**]**rexecd**    **/usr/etc/in.rexecd** *host.port***rez**    **rez** [*option*]... [*resource-description-file*]...**rlog**    **rlog** [**-L**] [**-R**] [**-h**] [**-t**] [**-ddates**] [**-l[lockers]**]  
    [**-rrevisions**] [**-sstates**] [**-w[logins]**] *files***rlogin**    **rlogin** *rhost* [**-8**] [**-ec**] [**-l** *username*]**rlogind**    **/etc/in.rlogind** *host.port***rm**    **rm** [**-f**] [**-i**] [**-r**] *file*...    **rmdir** *dir*...

**rmail**

See mail.

**rmdel**

rmdel -r *SID file* ...

**rmdir**

See rm.

**robots**

/usr/games/robots

**roffbib**

roffbib [-e] [-h] [-n] [-o] [-r] [-s] [-T*term*] [-x] [-m *mac*] [-V] [-Q] [*file* ...]

**route**

/etc/route [-f] [-n] [*command [net|host] destination gateway [metric]*]

**routed**

/etc/in.routed [-d] [-g] [-s] [-q] [-t] [*logfile*]

**rpcinfo**

rpcinfo -p [*host*]

rpcinfo -u *host program-number version-number*

rpcinfo -t *host program-number version-number*

**rsh**

See sh.

**rstatd**

/usr/etc/rpc.rstatd

**runacct**

/usr/lib/acct/runacct [*mmdd [state]*]

**rup**

rup [-h] [-l] [-t] [*host...*]

**ruptime**

ruptime [-a] [-l] [-t] [-u]

**rusers**

**rusers** [-a] [-h] [-i] [-l] [-u] [*host* ...]

**rusersd**

/usr/etc/rpc.rusersd

**rwall**

**rwall** *host1 host2* ...  
**rwall** -n *netgroup1 netgroup2* ...  
**rwall** -h *host* -n *netgroup*

**rwallid**

/usr/etc/rpc.rwallid

**rwho**

**rwho** [-a]

**rwhod**

/etc/in.rwhod

**sal**

See sadc.

**sa2**

See sadc.

**sact**

**sact** *file* ...

**sadc**

/usr/lib/sa/sadc [*t n*] [*file*]  
/usr/lib/sa/sal [*t n*]  
/usr/lib/sa/sa2 [-u] [-b] [-y] [-c] [-w] [-a] [-ql] [-v]  
[-m] [-A] [-stime] [-etime] [-isec]

**sag**

**sag** [-e *time*] [-f *file*] [-i *sec*] [-s *time*] [-T *term*] [-x *spec*]  
[-y *spec*]

**sar**

```
sar [-u] [-b] [-y] [-c] [-w] [-a] [-q] [-v] [-m] [-A] [-ofile] t  
[n]  
sar [-u] [-b] [-y] [-c] [-w] [-a] [-q] [-v] [-m] [-A] [-stime]  
[-etime] [-isec] [-ffile]
```

**sccs**

```
sccs [-r] [-dpath] [-ppath] command [flags] [args]
```

**sccsdiff**

```
sccsdiff -rSID1 -rSID2 [-p] [-sn] file...
```

**sccstorcs**

```
sccstorcs [-t] [-v] sccsfiles
```

**script**

```
script [-a] [file]
```

**sdb**

```
sdb [-w] [-W] [objfil [corfil [directory]]]
```

**sdiff**

```
sdiff [-l] [-o output] [-s] [-w n] file1 file2
```

**sed**

```
sed [-n] -e command-line-script [file...]  
sed [-n] -f sfile [file...]
```

**sendmail**

```
/usr/lib/sendmail [flag...] [address...]
```

**setport**

```
setport -r [-s speed] device-file...  
setport -o [-s speed] device-file...
```

**settc**

```
settc type creator [file]...
```

**settimezone**

```
settimezone
```

**sh**

sh [-a] [-c] [-e] [-f] [-h] [-i] [-k] [-n] [-r] [-s] [-t] [-u]  
[-v] [-x] [*args*]  
rsh [-a] [-c] [-e] [-f] [-h] [-i] [-k] [-n] [-r] [-s] [-t] [-u]  
[-v] [-x] [*args*]

**sh1**

sh1

**showmount**

showmount [-a] [-d] [-e] [*host*]

**shutacct**

See acctsh.

**shutdown**

/etc/shutdown [-hknry] [-g*interval*] [-i*initstate*]  
[*timeout* [*warning-message* ...]]

**size**

size [-d] [-o] [-V] [-x] *file*...

**slattach**

/etc/slattach *ttyname* [*baudrate*]

**slattconf**

/etc/slattconf *ttyname* *baudrate* *address* *dest-address* [*options*]

**sleep**

sleep *time*

**slip**

/etc/slip

**sno**

sno [*file*...]

**soelim**

soelim [*file*...]

**sort**

```
sort [-c] [-m] [-u] [-o output] [-y[kmem]] [-zrecsz] [-d]
      [-f] [-i] [-M] [-n] [-r] [-b] [-t x] [+pos1 [-pos2]] [file...]
```

**sortbib**

```
sortbib [-skeys] database...
```

**spell**

```
spell [-v] [-b] [-x] [-l] [+local-file] [file...]
/usr/lib/spell/hashmake
/usr/lib/spell/spellin n
/usr/lib/spell/hashcheck spelling-list
```

**spellin**

See spell.

**spline**

```
spline [-a] [-k] [-n] [-p] [-x]
```

**split**

```
split [-n] [file [name]]
```

**spray**

```
/usr/etc/spray host [-l length] [-c count]
```

**sprayd**

```
/usr/etc/rpc.sprayd
```

**ssp**

```
ssp [-] [name ...]
```

**StartMonitor**

```
StartMonitor
```

**startmsg**

```
startmsg -
```

```
startmsg [-pnumphases] [-nnextphase] [-dpcntdone]
      [-mmsgselector [substr1 ... substr4]] [-q]
```

**startup**

```
/etc/startup
```

**startup**

See acctsh.

**StartupShell**

StartupShell

**stat**

```
#include <sys/types.h>
#include <sys/stat.h>
```

**statd**

/etc/rpc.statd

**stdhosts**

/etc/yp/stdhosts *file*

**strings**

strings [-] [-o] [-number] *file* ...

**strip**

strip [-l] [-r] [-s] [-V] [-x] *file*...

**stty**

stty [-n] *file* [-a] [-g] [*options*]

**style**

```
style [-ml] [-mm] [-a] [-e] [-l num] [-r num] [-p] [-P]
      file...
```

**su**

su [-] [*name*[*arg* ...]]

**subj**

subj *file*...

**sum**

sum [-r] *file*...

**sumdir**

sumdir [*directories*]

**swap**

```
/etc/swap -a [swapdev [swaplow [swaplen]]]  
/etc/swap -d swapdev [swaplow]  
/etc/swap -l
```

**sync**

```
sync
```

**sysinitrc**

See brc.

**sysline**

```
sysline [-b] [-c] [-d] [-e] [-h] [-D] [-i] [-l] [-m] [-p]  
[-q] [-r] [-s] [-j] [-H remote] [+N]
```

**systemfolder**

```
systemfolder [-f ]
```

**tabs**

```
tabs [tabspec] [+m[n]] [-Ttype]
```

**tail**

```
tail [±number][lbc[f]]] [file]
```

**talk**

```
talk person [ttyname]
```

**talkd**

```
/etc/talkd
```

**tar**

```
tar [key] [file...]
```

**tbl**

```
tbl [-TX] [file...]
```

**tc**

```
tc [-t] [-o list] [-a n] [-e] [file] ...
```

**tcb**

```
command-line | tcb >/dev/rmt/tcx
```

**tcp**

```
#include <sys/socket.h>
#include <netinet/in.h>
s = socket(AF_INET, SOCK_STREAM, 0);
```

**tee**

```
tee [-i] [-a] [file] ...
```

**telinit**

See init.

**telnet**

```
telnet [host [port]]
```

**telnetd**

```
/usr/etc/in.telnetd
```

**term****test**

```
test [expr]
```

**TextEditor**

```
TextEditor [filename]
```

**tftp**

```
tftp [host]
```

**tftpd**

```
/usr/etc/in.tftpd
```

**tic**

```
tic [-v[n]] file ...
```

**time**

time *command*

**timex**

```
timex [-o] [-p[fhkmrt]] [-s] command
```

**tip**

```
tip [-v] [-speed] system-name
```

```
tip [-v] [-speed] phone-number
```

**touch**

**tset**

---

**touch**

**touch** [-a] [-c] [-m] [mmddhhmm [yy]] *file* ...

**tp**

**tp** [*key*] [*name* ...]

**tplot**

**tplot** [-T*terminal* [-e *raster*]]

**tput**

**tput** [-T*type*] *capname*

**tr**

**tr** [-c] [-d] [-s] [*string1*] [*string2*]]

**transcript**

    /usr/lib/ps/psbanner  
    /usr/lib/ps/pscomm  
    /usr/lib/ps/psinterface  
    /usr/lib/ps/psrv  
    /usr/lib/ps/pstext

**trek**

    /usr/games/trek [[-a] *file*]

**troff**

**troff** [-o*list*] [-n*N*] [-s*N*] [-m*name*] [-r*aN*] [-i] [-q] [-a]  
    [-T*dest*] [*file*...]

**troff**

**trpt**

    /usr/etc/trpt [-a] [-j] [-p*hex-address*] [-s] [-t]  
    [*system*[*core*]]

**true**

**true**  
    **false**

**tset**

**tset** [-] [-a *type*] [-A] [-d *type*] [-ec] [-Ec] [-kc] [-I]  
    [-m *port*] [-p *type*] [-Q] [-r] [-s] [-S]  
    **reset**

**tsort**

tsort [*file*]

**ttt**

/usr/games/ttt  
/usr/games/cubic

**tty**

tty [-l] [-s]

**tty\_add**

tty\_add [-r] [-gspeed] *device-file-name...*  
tty\_kill

**tty\_kill**

See **tty\_add**.

**tunefs**

/etc/tunefs [-p] [-m*minfree*] [-drotdelay] [-e*maxbpg*]  
[-amaxcontig] [-ooptimization] *special*

**turnacct**

See **acctsh**.

**twinkle**

/usr/games/twinkle [-] [+] [*s save*] [*density1 density2*]]

**types**

#include <sys/types.h>

**tzdump**

tzdump [-v] [-c *cutoffyear*] [*zonename...*]

**tzic**

tzic [-v] [-d *directory*] [-l *localtime*] [-p *posixrules*]  
[-L *leapsecondfilename*] [-s] [*filename...*]

**u3b**

See **machid**.

**u3b15**

See **machid**.

**u3b2**

See machid.

**u3b5**

See machid.

**ucbdiff**

```
ucbdiff [-l] [-r] [-s] [-Sname] [-cefhn] [-biwt] dir1
dir2
ucbdiff [-cefhn] [-biwt] file1 file2
ucbdiff [-Dstring] [-biw] file1 file2
```

**ucbdiff3**

```
ucbdiff3 [-exEX3] file1 file2 file3
```

**udp**

```
#include <sys/socket.h>
#include <netinet/in.h>
s=socket(AF_INET, SOCK_DGRAM, 0);
```

**ul**

```
ul [-t terminal] [name ...]
```

**umount**

See mount.

**uname**

```
uname [-a] [-m] [-n] [-r] [-s] [-v]
```

**uncompact**

See compact.

**uncompress**

See compress.

**unexpand**

See expand.

**unget**

```
unget [-n] [-rSID] [-s] file...
```

**uniq**

```
uniq [-u] [-d] [-c] [+n] [-n] [input [output]]]
```

**units****uname****units**

units

**unpack**

See pack.

**updater**updater [*key*] local remote ...**uptime**

uptime

**users**users [*file*]**uucico**

```
/usr/lib/uucp/uucico [-dspooldir] [-ggrade] [-rrole]
[-R] [-ssystem] [-xdebug] [-L] [-tturnaround]
/usr/lib/uucp/uushell
```

**uuclean**

```
/usr/lib/uucp/uuclean [-ddirectory] [-mfile] [-ntime]
[-p[pre]] [-ssys] [-wfile]
```

**uucp**

```
[-c] [-C] [-d] [-esys] [-f] [-j] [-mfile] [-nuser] [-r] source-
files destination-file
uulog [-ssys] [-uuser]
uname [-l] [-v]
```

**uudecode**

See uuencode.

**uuencode**

```
uuencode [source] remotest
uudecode [file]
```

**uulog**

See uucp.

**uname**

See uucp.

**uupick**

See **uuto**.

**uusend**

**uusend** [-m*mode*] *sourcefile sys1 !sys2 !... !remotefile*

**uushell**

See **uucico**.

**uustat**

**uustat** [-c*hour*] [-j*jobn*] [-k*jobn*] [-m*mch*] [-M*mch*] [-o*hour*]  
[-O] [-q] [-r*jobn*] [-s*sys*] [-u*user*] [-y*hour*]

**uusub**

/usr/bin/uusub [-asys] [-csys] [-dsys] [-f] [-l] [-r]  
[-uhr]

**uuto**

**uuto** [-m] [-p] *source-files destination*  
**uupick** [-ssystem]

**uux**

**uux** [-] [-g*grade*] [-j] [-l] [-m*file*] [-n] [-p] [-r] [-x*level*]  
[-z] *command-string*

**uuxqt**

/usr/lib/uucp/uuxqt [-x*debug*]

**val**

**val** -  
**val** [-m*name*] [-r*SID*] [-s] [-y*type*] *file...*

**values**

#include <values.h>

**vax**

See **machid**.

**vc**

**vc** [-a] [-c*char*] [-s] [-t] [*keyword=value*]...

**vedit**

See **vi**.

<b>version</b>	<b>which</b>
<b>version</b>	
<b>version</b> <i>name...</i>	
<b>vi</b>	
<b>vi</b> [+ <i>command</i> ] [-l] [-r [ <i>file</i> ]] [-R] [-t <i>tag</i> ] [-wn] [-x] <i>name...</i>	
<b>view</b> [+ <i>command</i> ] [-l] [-r [ <i>file</i> ]] [-R] [-t <i>tag</i> ] [-wn] [-x] <i>name...</i>	
<b>vedit</b> [+ <i>command</i> ] [-l] [-r [ <i>file</i> ]] [-R] [-t <i>tag</i> ] [-wn] [-x] <i>name...</i>	
<b>view</b>	
See vi.	
<b>vipw</b>	
<b>vipw</b>	
<b>volcopy</b>	
/etc/volcopy [-a] [-bp <i>density</i> ] [-buf] [-feetsize] [-reelnum] [-s] <i>fsname special1 volname1 special2 volname2</i> /etc/labelit <i>special [fsname volume [-n]]</i>	
<b>w</b>	
<b>w</b> [-h] [-u] [-s] [-l] [ <i>user</i> ]	
<b>wall</b>	
/etc/wall	
<b>wc</b>	
<b>wc</b> [-c] [-l] [-w] [ <i>name...</i> ]	
<b>what</b>	
<b>what</b> [-s] <i>file ...</i>	
<b>whatis</b>	
<b>whatis</b> <i>command ...</i>	
<b>whereis</b>	
<b>whereis</b> [-b] [-m] [-s] [-u] [-B <i>dir [-f]</i> ] [-M <i>dir [-f]</i> ] [-S <i>dir [-f]</i> ] <i>name ...</i>	
<b>which</b>	
<b>which</b> [ <i>name...</i> ]	

**who**

who [-a] [-b] [-d] [-H] [-l] [-p] [-q] [-r] [-s] [-t] [-T] [-u]  
[*file*]  
who am i  
who am I

**whoami**

whoami

**whodo**

/etc/whodo

**worm**

/usr/games/worm [*size*]

**worms**

/usr/games/worms [-field] [-length *n*] [-number *n*]  
[-trail]

**write**

write *user* [*line*]

**wtmpfix**

See fwtmp.

**wump**

/usr/games/wump

**xargs**

xargs [*flags*] [*command* [*initial-arguments*]]

**xstr**

xstr [-] [-c] [*file*]

**yacc**

yacc [-d] [-l] [-t] [-v] *grammar*

**yes**

yes [*expletive*]

**ypbind**

See ypserv.

**ypcat**

```
ypcat [-k] [-t] [-d domainname] mname
ypcat -x
```

**ypinit**

```
ypinit -m
ypinit -s master-name
```

**ypmake**

```
cd /etc/yp; make [map] [variable...]
```

**ypmatch**

```
ypmatch [-ddomain] [-k] [-t] key... mname
ypmatch -x
```

**ypasswd**

```
ypasswd [name]
```

**ypasswdd**

```
/usr/etc/rpc.yppasswdd file [-m arg1 arg2...]
```

**yppoll**

```
yppoll [-h host] [-d domain] mapname
```

**yppush**

```
yppush [-d domain] [-v] mapname
```

**ypserv**

```
/etc/ypserv
/etc/ypbind
```

**ypset**

```
ypset [-V1] [-h host] [-d domain] server
ypset [-V2] [-h host] [-d domain] server
```

**ypwhich**

```
ypwhich [-d[domain]] [-V1] [hostname]
ypwhich [-d[domain]] [-V2] [hostname]
ypwhich [-t mapname] [-d domain] -m [mname]
ypwhich -x
```

**ypxfr**

**ypxfr [-f] [-h *host*] [-d *domain*] [-c] [-C *tid prot ipaddr port*] *mapname***

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  `rdist(1)` – remote file distribution program  
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  `uustat(1C)` – uucp status inquiry and job control  
  `uuto(1C)` – public UNIX-to-UNIX system file copy  
  `uux(1C)` – UNIX-to-UNIX system command execution

**communicating, through serial ports**

`ct(1C)` – spawn getty to a remote terminal  
  `cu(1C)` – call another system  
  `kermit(1C)` – Kermit file transfer  
  `tip(1C)` – connect to a remote system  
  `update(1)` – update files between two machines  
  `uuencode(1C)` – encode/decode a binary file for transmission via mail

**communicating, using AppleTalk®**

`at_cho_prn(1)` – choose a default printer on the AppleTalk® internet  
  `atlookup(1)` – look up network visible entities (NVEs) registered on the  
    AppleTalk internet  
  `atprint(1)` – copy data to a remote PAP server  
  `atstatus(1)` – display status from a PAP server

**communicating, utilities for**

`biff(1)` – be notified if mail arrives and who it is from  
  `from(1)` – who is my mail from?  
  `mail(1)` – send mail to users or read mail  
  `mailx(1)` – interactive message processing system  
  `mesg(1)` – permit or deny messages  
  `news(1)` – display local news items  
  `talk(1N)` – talk to another user  
  `wall(1M)` – write to all users  
  `write(1)` – write to another user

**comparing files and directories**

`bdiff(1)` – `diff` large files  
  `cmp(1)` – compare two files  
  `comm(1)` – select or reject lines common to two sorted files

**diff(1)** – differential file and directory comparator  
**diff3(1)** – 3-way differential file comparison  
**dirrcmp(1)** – directory comparison  
**merge(1)** – three-way file merge  
**rcsdiff(1)** – compare RCS revisions  
**sccsdiff(1)** – compare two versions of an SCCS file  
**sdiff(1)** – side-by-side difference program  
**sumdir(1)** – sum and count characters in the files in the given directories  
**ucbdiff(1)** – differential file and directory comparator  
**ucbdiff3(1)** – 3-way differential file comparison  
**uniq(1)** – report repeated lines in a file

**compatibility**

**curses5.0(3X)** – BSD-style screen functions with optimal cursor motion  
**set42sig(3)** – set 4.2 BSD signal interface  
**setcompat(2)** – set or get process compatibility mode  
**setposix(3P)** – set POSIX compatibility flags  
**sigvec(2)** – optional BSD-compatible software signal facilities

**compilers**

**bs(1)** – a compiler/interpreter for modest-sized programs  
**cc(1)** – C compiler  
**f77(1)** – Fortran 77 compiler  
**regcmp(1)** – regular expression compile  
**regcmp(3X)** – compile and execute a regular expression  
**regexp(5)** – regular expression compile and match routines  
**rez(1)** – compile resources  
**sno(1)** – SNOBOL interpreter  
**tic(1M)** – terminfo compiler  
**tzic(1M)** – time zone compiler  
**yacc(1)** – yet another compiler-compiler

**complex numbers**

**aimag(3F)** – Fortran imaginary part of complex argument  
**conjg(3F)** – Fortran complex conjugate intrinsic function

**compressing and expanding files**

**compact(1)** – compress and uncompress files  
**compress(1)** – compress and expand data  
**crypt(1)** – encode/decode  
**makekey(1)** – generate encryption key  
**pack(1)** – compress and expand files

**concatenation**

`cat(1)` – concatenate and display the contents of named files

`paste(1)` – merge lines of several files or subsequent lines of one file

**conditional execution**

`test(1)` – condition evaluation command

`true(1)` – provide truth values

**configuration**

`adduser(1M)` – add a user account

`autoconfig(1M)` – build a new up-to-date kernel

`badblk(1M)` – set or update bad block information

`checkinstall(1)` – check installation of boards

`chgnod(1M)` – change current A/UX system nodename

`diskformat(1M)` – format a disk through a driver-dependent format  
operation

`dp(1M)` – perform disk partitioning

`getty(1M)` – set terminal type, modes, speed, and line discipline

`gettydefs(4)` – speed and terminal settings used by `getty`

`init(1M)` – process control initialization

`inittab(4)` – script for the `init` process

`kconfig(1M)` – tune kernel parameters for work-load optimization

`line_sane(1M)` – push streams line disciplines

`lpadmin(1M)` – configure the `lp` spooling system

`master(4)` – master kernel configuration files

`module_dump(1M)` – identify configuration information stored within the  
named kernel file

`newconfig(1M)` – prepare and configure a new kernel

`newunix(1M)` – prepare for new kernel configuration

`pname(1M)` – associate named partitions with device files

`pstat(1M)` – print system facts

`setport(1M)` – set a serial port

`settimezone(1M)` – set the local time zone

`slattconf(1M)` – attach and configure serial lines as network interfaces

`swap(1M)` – add or delete disk blocks to or from the swap area

`tic(1M)` – terminfo compiler

`tset(1)` – set or reset the terminal to a sensible state

`tty_add(1M)` – modify the `/etc/inittab` file

`tzdump(1M)` – time zone dumper

`tzic(1M)` – time zone compiler

`uvar(2)` – return system-specific configuration information

## **Configuration Master List**

**cml(4)** – configuration master list format

**escher(1M)** – autorecovery administration

**eupdate(1M)** – update important files for autorecovery purposes

### **connections**

**accept(2N)** – accept a connection on a socket

**cu(1C)** – call another system

**dial(3C)** – establish an out-going terminal line connection

**listen(2N)** – listen for connections on a socket

**lo(5)** – software loopback network interface

**ping(1M)** – exercise the network by sending test packets to a named host

**shutdown(2N)** – shut down part of a full-duplex connection

**telnet(1C)** – user interface to the TELNET protocol

**tip(1C)** – connect to a remote system

### **connect-time accounting**

**acctcon(1M)** – connect-time accounting

**fwtmp(1M)** – manipulate connect accounting records

### **console**

**console(7)** – keyboard/screen driver

**ioctl.syscon(4)** – console terminal settings file

**keyset(1M)** – set console keyboard mapping

### **constants**

**values(5)** – machine-dependent values

### **constant-width text**

**cw(1)** – prepare constant-width text for **otroff**

### **converters**

**a64l(3C)** – convert between long integer and base-64 ASCII string

**conv(1)** – swap bytes in COFF files

**dd(1)** – convert and copy a file

**enscript(1)** – convert text files to format for printing

**fcnvvt(1)** – convert a resource file to another format

**hex(1)** – convert an object file to Motorola S-record format

**mactoiso(1)** – convert from Macintosh® encoding to International Standards Organization (ISO) encoding

**units(1)** – conversion program

### **copying**

**atprint(1)** – copy data to a remote PAP server

**bcopy(1M)** – interactive block copy

**blt(3C)** – block transfer data

**cp(1)** – copy files

**cpio(1)** – copy files to or from a **cpio** archive

**cpio(4)** – format of **cpio** archive

**csplit(1)** – context split  
**dcopy(1M)** – copy file systems for optimal access time  
**dd(1)** – convert and copy a file  
**dump . bsd(1M)** – copy the files within the named file system to a dump . bsd archive  
**fcnvrt(1)** – convert a resource file to another format  
**ln(1)** – make links  
**pax(1)** – copy files to or from an archive in an IEEE format  
**rcp(1C)** – remote file copy  
**restore(1M)** – copy files from a dump . bsd archive into an existing file system  
**split(1)** – split a file into pieces  
**tar(1)** – copy files to or from a tar archive  
**tar(4)** – format of tar header  
**tp(1)** – copy files to or from a tp archive  
**uucp(1C)** – UNIX® system to UNIX system copy  
**uuto(1C)** – public UNIX-to-UNIX system file copy  
**volcopy(1M)** – copy file systems with label checking

**core image**  
    **core(4)** – format of core image file  
    **fsync(2)** – synchronize a file's in-core state with that on disk

**cosine**  
    **cos(3F)** – Fortran cosine intrinsic function  
    **cosh(3F)** – Fortran hyperbolic cosine intrinsic function  
    **trig(3M)** – trigonometric functions

**counters**  
    **sumdir(1)** – sum and count characters in the files in the given directories  
    **wc(1)** – word count

**craps**  
    **craps(6)** – the game of craps

**crashes**  
    **erread(1M)** – extract error records from a crash dump  
    **statd(1M)** – provide crash and recovery for network locking services

**creating new objects**  
    **creat(2)** – create a new file or rewrite an existing one  
    **fork(2)** – create a new process  
    **mkdir(1)** – make a directory  
    **mkdir(2)** – make a directory file  
    **mkfifo(3P)** – make a FIFO special file  
    **mkfs1b(1M)** – construct a file system with 512-byte blocks  
    **mkfs(1M)** – construct an SVFS file system  
    **mklost+found(1M)** – make a lost+found directory for fsck

**mknod(1M)** – build device file  
**mknod(2)** – make a directory, or a special or ordinary file  
**mkshlib(1)** – create shared library  
**mkslipuser(1M)** – initialize the *slip* user database  
**mkstr(1)** – create an error message file by massaging C source  
**mktemp(3C)** – make a unique filename  
**newconfig(1M)** – prepare and configure a new kernel  
**newfs(1M)** – construct a new UFS file system  
**newunix(1M)** – prepare for new kernel configuration  
**tmpfile(3S)** – create a temporary file  
**tmpnam(3S)** – create a name for a temporary file  
**umask(2)** – set and get file creation mask  
**ypmake(1M)** – rebuild yellow pages database

**cribbage**  
    **cribbage(6)** – the card game cribbage

**cross-references**  
    **cxref(1)** – generate C program cross-reference  
    **lorder(1)** – find ordering relation for an object library  
    **macref(1)** – produce cross-reference listing of macro files

**current directory**  
    **chdir(2)** – change working directory  
    **getcwd(3C)** – get the pathname of the current working directory  
    **getwd(3)** – get current working directory pathname  
    **pwd(1)** – print working directory name

**current host**  
    **gethostid(2N)** – get/set unique identifier of current host  
    **gethostname(2N)** – get/set name of current host

**current user**  
    **whoami(1)** – print effective current user ID

**daemons**  
    **cron(1M)** – clock daemon  
    **errdemon(1M)** – error-logging daemon  
    **errstop(1M)** – terminate the error-logging daemon  
    **inetd(1M)** – Internet services daemon  
    **init(1M)** – process control initialization  
    **lockd(1M)** – process network lock daemon  
    **lpd(1M)** – 4.2 line-printer daemon  
    **nfsd(1M)** – NFS daemons  
    **nfssvc(2)** – NFS daemons  
    **routed(1M)** – network routing daemon

## DARPA Internet

arp(5P) – Address Resolution Protocol  
ftp(1N) – ARPANET file transfer program  
ftpd(1M) – Internet File Transfer Protocol server  
icmp(5P) – Internet Control Message Protocol  
inet(3N) – Internet address manipulation routines  
inet(5F) – Internet protocol family  
inetd(1M) – Internet services daemon  
ip(5P) – Internet Protocol  
named(1M) – Internet domain name server  
networks(4N) – network name database  
nslookup(1) – query name servers interactively  
portmap(1M) – DARPA port to RPC program number mapper  
protocols(4N) – protocol name database  
resolver(3N) – resolver routines  
resolver(4) – resolver configuration file  
sendmail(1M) – send mail over the Internet  
servers(4) – Internet server database  
services(4N) – service name database  
stdhosts(1M) – convert Internet addresses to standard form  
tcp(5P) – Internet Transmission Control Protocol  
telnetd(1M) – DARPA TELNET protocol server  
tftp(1C) – trivial file transfer program  
tftpd(1M) – DARPA Trivial File Transfer Protocol server  
udp(5P) – Internet User Datagram Protocol

## DASI 300 terminal

300(1) – filter text containing printer control sequences for a DASI terminal

## DASI 450 terminal

450(1) – filter text containing printer control sequences for the DASI terminal

## data, blocking of

dd(1) – convert and copy a file  
tcb(1) – block data to 8K for tc output

## data, redirecting

cat(1) – concatenate and display the contents of named files  
csh(1) – run the C shell, a command interpreter with C-like syntax  
ksh(1) – run the Korn shell, a command interpreter compatible with Bourne shell  
sh(1) – run the Bourne shell, the earliest of the command interpreters available  
tee(1) – pipe fitting

## **data streams**

**fclose(3S)** – close or flush a stream  
**ferror(3S)** – stream status inquiries  
**fopen(3S)** – open a stream  
**forwarder(7)** – forwarder device driver  
**fread(3S)** – binary input/output  
**fseek(3S)** – reposition a file pointer in a stream  
**getc(3S)** – get character or word from a stream  
**gets(3S)** – get a string from a stream  
**line\_push(3)** – routine used to push streams line disciplines  
**line\_sane(1M)** – push streams line disciplines  
**printf(3S)** – format and output string and numeric data  
**putc(3S)** – put character or word on a stream  
**puts(3S)** – put a string on a stream  
**rcmd(3N)** – routines for returning a stream to a remote command  
**rexec(3N)** – return stream to a remote command  
**scanf(3S)** – convert formatted input  
**setbuf(3S)** – assign buffering to a stream  
**streams(7)** – an interface for character I/O  
**ungetc(3S)** – push character back into input stream

## **data types**

**ftype(3F)** – explicit Fortran type conversion  
**types(5)** – primitive system data types  
**xdr(3N)** – library routines for external data representation

## **Datagrams**

**ddp(3N)** – AppleTalk Datagram Delivery Protocol (DDP) interface  
**udp(5P)** – Internet User Datagram Protocol

## **date and time**

**cal(1)** – generate a calendar for the specified year  
**calendar(1)** – reminder service  
**cron(1M)** – clock daemon  
**ctime(3)** – convert date and time to ASCII  
**date(1)** – display and set the date  
**gettimeofday(2)** – get/set date and time  
**leave(1)** – remind you when you have to leave  
**nvram(7)** – nonvolatile memory/time of day clock interface  
**settimezone(1M)** – set the local time zone  
**stime(2)** – set time  
**time(2)** – get time  
**tzfile(4)** – time-zone information

**debuggers**

adb(1) – debugger  
ctrace(1) – C program debugger  
fsdb(1M) – debug the file system  
lo(5) – software loopback network interface  
ping(1M) – exercise the network by sending test packets to a named host  
sdb(1) – symbolic debugger

**decompiler**

derez(1) – decompile a resource file

**default values**

at\_cho\_prn(1) – choose a default printer on the AppleTalk® internet  
chsh(1) – change default login shell  
finstallrc(4) – finstall default configuration file  
umask(2) – set and get file creation mask

**defaults, shell and session type**

chsh(1) – change default login shell  
CommandShell(1) – A/UX® Toolbox application for managing  
command-interpretation windows and moderating access to the A/UX  
console window  
Login(1M) – present a Macintosh® login dialog box when called by  
init

**delayed execution**

at(1) – execute commands at a later time  
cron(1M) – clock daemon  
crontab(1) – user crontab utility  
pause(2) – suspend process until signal  
sleep(1) – suspend execution for an interval

**deleting**

colrm(1) – remove columns from a file  
cut(1) – cut out selected fields of each line of a file  
deroff(1) – remove nroff/troff, tbl, and eqn constructs  
dev\_kill(1M) – remove devices files within a directory  
flock(2) – apply or remove an advisory lock on an open file  
insque(3N) – insert/remove element from a queue  
ipcrm(1) – remove interprocess communications facilities  
kill(1) – terminate a process  
killall(1M) – kill all active processes  
lprm(1) – remove jobs from the line printer spooling queue for a Berkeley  
file system (4.2)  
rm(1) – remove files or directories  
rmdel(1) – remove a delta from an SCCS file  
rmdir(2) – remove a directory file

unlink(2) – remove directory entry  
unmount(2) – remove a file system

**delta files (SCCS)**

- cdc(1) – change the delta commentary of an SCCS delta
- comb(1) – combine SCCS deltas
- delta(1) – make a delta (change) to an SCCS file
- rmdel(1) – remove a delta from an SCCS file
- sact(1) – display who has checked an SCCS file out for editing.

**description files, troff fonts**

- a fm(4) – Adobe POSTSCRIPT font metrics file format
- font(5) – description files for device-independent *troff*
- iwmap(4) – format of *iwprep(1)* character map description files
- makedev(1) – prepare *troff* description files

**descriptor tables**

- getdtablesize(2N) – get descriptor table size

**descriptors, general**

- close(2) – close a file descriptor
- dup(2) – duplicate a descriptor
- dup2(3N) – duplicate a descriptor

**desktop, Macintosh**

- CommandShell(1) – A/UX® Toolbox application for managing command-interpretation windows and moderating access to the A/UX console window

**device description files**

- printcap(4) – printer-capability database
- termcap(4) – terminal capability database
- terminfo(4) – terminal capability database

**device file management**

- dev\_kill(1M) – remove devices files within a directory
- devnm(1M) – device name
- mknod(1M) – build device file
- pname(1M) – associate named partitions with device files
- tty(1) – get the terminal's name
- tty(7) – controlling terminal interface

**device files, overview**

- intro(7) – introduction to device drivers and interfaces

**device-specific commands**

- clear(1) – clear terminal screen
- eject(1) – eject diskette from drive
- iw2(1) – Apple ImageWriter print filter
- keyset(1M) – set console keyboard mapping
- mt(1) – magnetic tape manipulating program

**stty(1)** – set the modes for a terminal

**tabs(1)** – set tabs on a terminal

**tcb(1)** – block data to 8K for tc output

#### **Diablo 1620 printer**

**450(1)** – filter text containing printer control sequences for the DASI terminal

#### **dialogs, constructing Macintosh alert dialogs**

**macquery(1M)** – post a Macintosh® alert box to query the user

#### **dialogs, Macintosh**

**cmdo(1)** – build commands interactively

**Login(1M)** – present a Macintosh® login dialog box when called by init

**macquery(1M)** – post a Macintosh® alert box to query the user

#### **dialup communication**

**cu(1C)** – call another system

**dial(3C)** – establish an out-going terminal line connection

**dialup(4)** – modem escape sequence file

**kermit(1C)** – Kermit file transfer

**phones(4)** – remote host telephone number database

**slip(1M)** – attach a dialup serial line as a network interface

**tip(1C)** – connect to a remote system

**uucico(1M)** – transfer files queued by uucp or uux

**uucp(1C)** – UNIX® system to UNIX system copy

**uux(1C)** – UNIX-to-UNIX system command execution

#### **differences**

**bdiff(1)** – diff large files

**cmp(1)** – compare two files

**diff(1)** – differential file and directory comparator

**diff3(1)** – 3-way differential file comparison

**diffmk(1)** – mark differences between files

**dir cmp(1)** – directory comparison

**rccsdiff(1)** – compare RCS revisions

**sccsdiff(1)** – compare two versions of an SCCS file

**sdiff(1)** – side-by-side difference program

**ucbdiff(1)** – differential file and directory comparator

**ucbdiff3(1)** – 3-way differential file comparison

#### **directories**

**cpset(1M)** – install files in specified directories

**dev\_kill(1M)** – remove devices files within a directory

**dir(4)** – format of System V directories

**dir cmp(1)** – directory comparison

**directory(3)** – directory operations

**directory(3P)** – directory operations  
**ftw(3C)** – walk a file tree  
**getdirentries(2)** – get directory entries  
**link(2)** – link to a file  
**ln(1)** – make links  
**ls(1)** – list contents of directory  
**mkdir(1)** – make a directory  
**mkdir(2)** – make a directory file  
**mknod(2)** – make a directory, or a special or ordinary file  
**mv(1)** – move or rename files  
**rmdir(2)** – remove a directory file  
**scandir(3)** – scan a directory  
**sumdir(1)** – sum and count characters in the files in the given directories  
**unlink(2)** – remove directory entry

**directory, current**

**chdir(2)** – change working directory  
**getcwd(3C)** – get the pathname of the current working directory  
**getwd(3)** – get current working directory pathname  
**pwd(1)** – print working directory name

**disassembler**

**dis(1)** – disassembler

**disk accounting**

**df(1)** – report number of free disk blocks  
**diskusg(1M)** – generate disk accounting data by user ID  
**du(1)** – summarize disk usage

**disk blocks**

**altblk(4)** – alternate block information for bad block handling  
**badblk(1M)** – set or update bad block information  
**bcopy(1M)** – interactive block copy  
**bzb(4)** – format of Block Zero Blocks  
**df(1)** – report number of free disk blocks  
**du(1)** – summarize disk usage

**disk drives**

**eject(1)** – eject diskette from drive

**disk partitions**

**bzb(4)** – format of Block Zero Blocks  
**dd(1)** – convert and copy a file  
**dp(1M)** – perform disk partitioning  
**dpme(4)** – format of disk partition map entries  
**getptabent(3)** – get partition table file entry  
**pname(1M)** – associate named partitions with device files  
**ptab(4)** – partition table file

**disks, floppy**

**cpio(1)** – copy files to or from a **cpio** archive  
  **cpio(4)** – format of **cpio** archive  
  **diskformat(1M)** – format a disk through a driver-dependent format operation  
  **eject(1)** – eject diskette from drive  
  **fd(7)** – 3.5-inch disk device driver  
  **finstall(1M)** – install A/UX commercial software from floppy disks  
  **fininstallrc(4)** – **fininstall** default configuration file  
  **pax(1)** – copy files to or from an archive in an IEEE format  
  **tar(1)** – copy files to or from a **tar** archive  
  **tar(4)** – format of **tar** header

**disks, formatting**

**diskformat(1M)** – format a disk through a driver-dependent format operation

**disks, general**

**df(1)** – report number of free disk blocks  
  **diskformat(1M)** – format a disk through a driver-dependent format operation  
  **disktab(4)** – disk description file  
  **du(1)** – summarize disk usage  
  **eject(1)** – eject diskette from drive  
  **fsck(1M)** – check file-system consistency and interactively repair  
  **fstab(4)** – static information about file systems  
  **fsync(2)** – synchronize a file's in-core state with that on disk  
  **gd(7)** – generic disk interface

**display processing**

**300(1)** – filter text containing printer control sequences for a DASI terminal  
  **4014(1)** – filter text containing printer control sequences a page at a time  
  **450(1)** – filter text containing printer control sequences for the DASI terminal  
  **col(1)** – filter text containing printer control sequences for use at a display device  
  **colcrt(1)** – filter **nroff** output for terminal previewing  
  **greek(1)** – filter text for vintage display devices  
  **tc(1)** – interpret troff output for use at a vintage display device  
  **tpplot(1G)** – interpret plotter instructions for use at a vintage display device  
  **ul(1)** – filter special underlining sequences imbedded in text for use at a display device

**dividing files**

`csplit(1)` – context split  
`split(1)` – split a file into pieces

**documentation, online**

`apropos(1)` – locate commands by keyword lookup  
`man(1)` – display the named manual page entries  
`man(5)` – macros for formatting entries in this manual  
`whatis(1)` – display a brief description for the named manual page entry  
`whereis(1)` – locate source, binary, and online help file for a command

**domains**

`domainname(1)` – set or display name of current domain system  
`HOSTNAME(4)` – hostname and domainname database  
`named(1M)` – Internet domain name server  
`resolver(3N)` – resolver routines  
`resolver(4)` – resolver configuration file

**double-precision numbers**

`aint(3F)` – Fortran integer part intrinsic function  
`dprod(3F)` – Fortran double precision product intrinsic function  
`strtod(3C)` – convert string to double-precision number

**drawing**

`grap(1)` – pic preprocessor for drawing graphs  
`graph(1G)` – draw a graph  
`pic(1)` – troff preprocessor for drawing pictures

**drawings, generation of graphs and curves**

`graph(1G)` – draw a graph  
`spline(1G)` – interpolate smooth curve

**drawings, plotter, filtering for display purposes**

`tplot(1G)` – interpret plotter instructions for use at a vintage display device

**drivers**

`console(7)` – keyboard/screen driver  
`fd(7)` – 3.5-inch disk device driver  
`forwarder(7)` – forwarder device driver  
`gd(7)` – generic disk interface  
`intro(7)` – introduction to device drivers and interfaces  
`mouse(7)` – mouse input device driver  
`pty(7)` – pseudo terminal driver  
`serial(7)` – the on-board serial ports  
`sxt(7)` – pseudo-device driver  
`tc(7)` – Apple Tape Backup 40SC device driver

**DTS 300 terminal**

**300(1)** – filter text containing printer control sequences for a DASI terminal

**duration**

**time(1)** – time a command

**timex(1)** – time a command; report process data and system activity

**editors**

**bfs(1)** – big file scanner

**ed(1)** – text editor

**ex(1)** – text editor

**nl(1)** – line numbering filter

**sed(1)** – stream editor

**ssp(1)** – make output single spaced

**TextEditor(1)** – mouse-based text editor

**vi(1)** – screen-oriented (visual) display editor

**effective group ID**

**getuid(2)** – get real and effective user IDs and group IDs

**setregid(2)** – set real and effective group ID

**effective user ID**

**getuid(2)** – get real and effective user IDs and group IDs

**setreuid(2)** – set real and effective user ID

**setsid(2P)** – create session and set process group ID

**su(1)** – substitute user ID

**enablers**

**accept(1M)** – allow lp requests

**acct(2)** – enable or disable process accounting

**enable(1)** – enable or disable LP printers

**mesg(1)** – permit or deny messages

**phys(2)** – allow a process to access physical addresses

**encryption**

**crypt(1)** – encode/decode

**crypt(3C)** – generate DES encryption

**makekey(1)** – generate encryption key

**environment**

**env(1)** – set environment for command execution

**environ(5)** – user environment

**getenv(3C)** – return value for environment name

**getenv(3F)** – return Fortran environment variable

**printenv(1)** – display the value of variables set in the current environment

**profile(4)** – setting up an environment at login time

**putenv(3C)** – change or add value to environment

**error functions**

`erf(3M)` – error function and complementary error function  
`matherr(3M)` – error-handling function

**error logging**

`errdemon(1M)` – error-logging daemon  
`errfile(4)` – error-log file format  
`error(7)` – error-logging interface  
`errpt(1M)` – process a report of logged errors  
`errstop(1M)` – terminate the error-logging daemon  
`mkstr(1)` – create an error message file by massaging C source

**errors, general**

`errdead(1M)` – extract error records from a crash dump  
`exterr(1M)` – turn on/off the reporting of extended errors  
`intro(2)` – introduction to system calls and error numbers  
`matherr(3M)` – error-handling function  
`perror(3C)` – system error messages

**Ethernet**

`ae(5)` – 3Com 10 Mb/s Ethernet interface  
`arp(5P)` – Address Resolution Protocol  
`checkinstall(1)` – check installation of boards  
`etheraddr(1M)` – get an Ethernet address  
`ethers(3N)` – Ethernet address mapping operations  
`ethers(4)` – Ethernet address to hostname database or YP domain

**Euclidean distance**

`hypot(3M)` – Euclidean distance function

**evaluators**

`basename(1)` – isolate substrings within a pathname argument  
`expr(1)` – evaluate arguments as an expression  
`test(1)` – condition evaluation command

**execution, general**

`apply(1)` – apply a command to a set of arguments  
`at(1)` – execute commands at a later time  
`cron(1M)` – clock daemon  
`env(1)` – set environment for command execution  
`exec(2)` – execute a file  
`launch(1)` – execute a Macintosh binary application  
`nice(1)` – run a command at low priority  
`nohup(1)` – run a command immune to hangups  
`regcmp(3X)` – compile and execute a regular expression  
`remsh(1N)` – remote shell  
`rexecd(1M)` – remote execution server  
`sleep(1)` – suspend execution for an interval

**sleep(3C)** – suspend execution for interval  
**uux(1C)** – UNIX-to-UNIX system command execution  
**uuxqt(1M)** – UUCP execution file interpreter  
**xargs(1)** – construct argument list and execute command

**execution profile**

- monitor(3C)** – prepare execution profile
- prof(1)** – display profile data
- profil(2)** – execution time profile
- time(1)** – time a command
- timex(1)** – time a command; report process data and system activity

**expanding and compressing files**

- compact(1)** – compress and uncompress files
- compress(1)** – compress and expand data
- crypt(1)** – encode/decode
- makekey(1)** – generate encryption key
- pack(1)** – compress and expand files

**exponents**

- exp(3F)** – Fortran exponential intrinsic function
- exp(3M)** – exponential, logarithm, power, and square root functions

**expressions**

- basename(1)** – isolate substrings within a pathname argument
- expr(1)** – evaluate arguments as an expression

**expressions, regular**

- grep(1)** – search a file for a pattern
- regcmp(1)** – regular expression compile
- regcmp(3X)** – compile and execute a regular expression
- regexp(5)** – regular expression compile and match routines

**extended character set**

- greek(1)** – filter text for vintage display devices

**factoring**

- factor(1)** – factor a number

**false and true**

- test(1)** – condition evaluation command
- true(1)** – provide truth values

**fields**

- awk(1)** – pattern scanning and processing language
- colrm(1)** – remove columns from a file
- cut(1)** – cut out selected fields of each line of a file
- join(1)** – relational database operator
- paste(1)** – merge lines of several files or subsequent lines of one file
- qsort(3C)** – quicker sort
- sort(1)** – sort or merge files

**file control**

- fcntl(2)** – file control
- fcntl(5)** – file control options
- touch(1)** – update access and modification times of a file

**file creation masks**

- umask(2)** – set and get file creation mask

**file formats used by A/UX**

- intro(4)** – introduction to file formats

**file handles**

- nfs\_getfh(2)** – get a file handle

**file handling**

- chmod(1)** – change the permissions of a file
- chown(1)** – change the owner or group of a file
- chown(2)** – change owner and group of a file
- close(2)** – close a file descriptor
- clri(1M)** – clear inode
- cp(1)** – copy files
- cpio(1)** – copy files to or from a **cpio** archive
- creat(2)** – create a new file or rewrite an existing one
- csplit(1)** – context split
- dd(1)** – convert and copy a file
- exec(2)** – execute a file
- fcnvtt(1)** – convert a resource file to another format
- ff(1M)** – list file names and statistics for a file system
- file(1)** – determine file type
- find(1)** – find files
- fopen(3S)** – open a stream
- fread(3S)** – binary input/output
- fseek(3S)** – reposition a file pointer in a stream
- fspec(4)** – syntax for format lines for **newform**
- fuser(1M)** – identify processes using a file or file structure
- head(1)** – give first few lines
- link(2)** – link to a file
- ln(1)** – make links
- lp(1)** – send or cancel requests to a line printer for a Berkeley file system  
        (4.2)
- lpq(1)** – spool queue examination program
- lpr(1)** – off line print
- lprm(1)** – remove jobs from the line printer spooling queue for a Berkeley  
        file system (4.2)
- ls(1)** – list contents of directory
- lseek(2)** – move read/write file pointer

**mkdир(1) – make a directory**  
**more(1) – show the contents of a file in display-size chunks**  
**mv(1) – move or rename files**  
**nfs\_getfh(2) – get a file handle**  
**open(2) – open for reading or writing**  
**pax(1) – copy files to or from an archive in an IEEE format**  
**pg(1) – show the contents of a file in display-size chunks**  
**rcp(1C) – remote file copy**  
**rdist(1) – remote file distribution program**  
**read(2) – read from file**  
**rm(1) – remove files or directories**  
**settc(1) – set the type and creator of a Macintosh resource file**  
**split(1) – split a file into pieces**  
**sum(1) – calculate a checksum**  
**symlink(2) – make symbolic link to a file**  
**tail(1) – deliver the last part of a file**  
**tar(1) – copy files to or from a tar archive**  
**tmpfile(3S) – create a temporary file**  
**touch(1) – update access and modification times of a file**  
**tp(1) – copy files to or from a tp archive**  
**truncate(2) – truncate a file to a specified length**  
**update(1) – update files between two machines**  
**uusend(1C) – send a file to a remote host**  
**uto(1C) – public UNIX-to-UNIX system file copy**  
**version(1) – reports version number of files**  
**write(2) – write on a file**

**file merging**

acctmerg(1M) – merge or add total accounting files  
cat(1) – concatenate and display the contents of named files  
join(1) – relational database operator  
merge(1) – three-way file merge  
paste(1) – merge lines of several files or subsequent lines of one file  
soelim(1) – eliminate . so's from nroff input  
sort(1) – sort or merge files  
tsort(1) – topological sort

**file moving**

mv(1) – move or rename files

**file names**

ctermid(3S) – generate filename for terminal  
find(1) – find files  
fstypes(4) – name-mapping information for file systems  
mktemp(3C) – make a unique filename

**mv(1)** – move or rename files  
**rename(2)** – change the name of a file  
**tmpnam(3S)** – create a name for a temporary file

**file permissions**

- chmod(1)** – change the permissions of a file
- chmod(2)** – change mode of file
- chown(1)** – change the owner or group of a file
- find(1)** – find files
- ls(1)** – list contents of directory
- umask(2)** – set and get file creation mask

**file pointers**

- fseek(3S)** – reposition a file pointer in a stream
- lseek(2)** – move read/write file pointer

**file reading**

- cat(1)** – concatenate and display the contents of named files
- fread(3S)** – binary input/output
- getc(3S)** – get character or word from a stream
- head(1)** – give first few lines
- line(1)** – read one line
- more(1)** – show the contents of a file in display-size chunks
- pg(1)** – show the contents of a file in display-size chunks
- read(2)** – read from file
- soelim(1)** – eliminate . so's from nroff input
- tail(1)** – deliver the last part of a file

**file regions**

- lockf(3C)** – record locking on files
- locking(2)** – provide exclusive file regions for reading or writing

**file scanning**

- cat(1)** – concatenate and display the contents of named files
- fread(3S)** – binary input/output
- getc(3S)** – get character or word from a stream
- head(1)** – give first few lines
- line(1)** – read one line
- more(1)** – show the contents of a file in display-size chunks
- pg(1)** – show the contents of a file in display-size chunks
- read(2)** – read from file
- soelim(1)** – eliminate . so's from nroff input
- tail(1)** – deliver the last part of a file

**file status**

- access(2)** – determine accessibility of a file
- chmod(1)** – change the permissions of a file
- chmod(2)** – change mode of file

chown(1) – change the owner or group of a file  
chown(2) – change owner and group of a file  
file(1) – determine file type  
find(1) – find files  
fsync(2) – synchronize a file's in-core state with that on disk  
ls(1) – list contents of directory  
ncheck(1M) – locate the filename associated with an i-node  
settc(1) – set the type and creator of a Macintosh resource file  
stat(2) – get file status  
stat(5) – data returned by stat system call  
sum(1) – calculate a checksum  
touch(1) – update access and modification times of a file  
utime(2) – set file access and modification times  
version(1) – reports version number of files

**file system repair**

- autorecovery(8) – file-system repair procedure
- clri(1M) – clear inode
- esch(8) – validate and repair file systems from the A/UX StartupShell
- fck(1M) – check file-system consistency and interactively repair
- fsdb(1M) – debug the file system
- ncheck(1M) – locate the filename associated with an i-node

**file systems, Berkeley**

- newfs(1M) – construct a new UFS file system
- tunefs(1M) – tune an unmounted Berkeley 4.2 file system (UFS)
- ufs(4) – format of a UFS file-system volume

**file systems, block zero information**

- bzb(4) – format of Block Zero Blocks

**file systems, copying to backup media**

- bcopy(1M) – interactive block copy
- dcopy(1M) – copy file systems for optimal access time
- dump . bsd(1M) – copy the files within the named file system to a dump . bsd archive
- escher(1M) – autorecovery administration
- eu(1M) – update autorecovery files
- eupdate(1M) – update important files for autorecovery purposes
- finc(1M) – fast incremental backup
- frec(1M) – recover files from a backup tape
- restore(1M) – copy files from a dump . bsd archive into an existing file system
- volcopy(1M) – copy file systems with label checking

**file systems, display status of**

df(1) – report number of free disk blocks  
du(1) – summarize disk usage

**file systems, general**

autorecovery(8) – file-system repair procedure  
clri(1M) – clear inode  
devnm(1M) – device name  
dump.bsd(4) – format of a file system dump  
esch(8) – validate and repair file systems from the A/UX StartupShell  
exports(4) – NFS file systems being exported  
ff(1M) – list file names and statistics for a file system  
fs(4) – file systems  
fsck(1M) – check file-system consistency and interactively repair  
fsdb(1M) – debug the file system  
fsentry(1M) – create a file-system-table entry  
fsirand(1M) – install random inode generation numbers  
fsmount(2) – mount a network file system (NFS)  
fsstat(1M) – report file-system state  
fstab(4) – static information about file systems  
fstyp(1) – report file-system type  
fstyp(3) – determine the file-system type  
fstypent(3P) – get file-system-type entry  
fstypes(4) – name-mapping information for file systems  
ftw(3C) – walk a file tree  
fuser(1M) – identify processes using a file or file structure  
getmntent(3) – get file system descriptor file entry  
mkfs1b(1M) – construct a file system with 512-byte blocks  
mkfs(1M) – construct an SVFS file system  
mklost+found(1M) – make a lost+found directory for fsck  
mount(1M) – mount and dismount file systems  
mount(3) – mount a file system  
mount(3N) – keep track of remotely mounted file systems  
mounted(1M) – NFS mount request server  
mtab(4) – mounted file system table  
ncheck(1M) – locate the filename associated with an i-node  
newfs(1M) – construct a new UFS file system  
rmtab(4) – remotely mounted file system table  
statfs(2) – get file-system statistics  
svfs(4) – format of a System V system volume  
sync(1) – update the superblock  
tunefs(1M) – tune an unmounted Berkeley 4.2 file system (UFS)  
ufs(4) – format of a UFS file-system volume

`umount(2)` – unmount a file system  
`umount(3)` – unmount a file system  
`unmount(2)` – remove a file system  
`ustat(2)` – get file system statistics  
`volcopy(1M)` – copy file systems with label checking

**file systems, maintenance**

- `clri(1M)` – clear inode
- `devnm(1M)` – device name
- `ff(1M)` – list file names and statistics for a file system
- `fsck(1M)` – check file-system consistency and interactively repair
- `fsdb(1M)` – debug the file system
- `fsentry(1M)` – create a file-system-table entry
- `fsirand(1M)` – install random inode generation numbers
- `fsstat(1M)` – report file-system state
- `fstyp(1)` – report file-system type
- `fuser(1M)` – identify processes using a file or file structure
- `mkfs1b(1M)` – construct a file system with 512-byte blocks
- `mkfs(1M)` – construct an SVFS file system
- `mklost+found(1M)` – make a `lost+found` directory for `fsck`
- `mount(1M)` – mount and dismount file systems
- `ncheck(1M)` – locate the filename associated with an i-node
- `newfs(1M)` – construct a new UFS file system
- `sync(1)` – update the superblock
- `tunefs(1M)` – tune an unmounted Berkeley 4.2 file system (UFS)

**file systems, NFS, maintenance of**

- `domainname(1)` – set or display name of current domain system
- `lockd(1M)` – process network lock daemon
- `mountd(1M)` – NFS mount request server
- `nfsd(1M)` – NFS daemons
- `nfsstat(1M)` – Network File System statistics
- `rpcinfo(1M)` – report RPC information
- `showmount(1M)` – show all remote mounts
- `spray(1M)` – spray packets
- `sprayd(1M)` – spray server
- `statd(1M)` – provide crash and recovery for network locking services

**file systems, System V**

- `dir(4)` – format of System V directories
- `inode(4)` – format of a System V inode
- `mkfs(1M)` – construct an SVFS file system
- `svfs(4)` – format of a System V system volume

**file systems, unmounting**

umount(2) – unmount a file system  
umount(3) – unmount a file system  
unmount(2) – remove a file system

**file transfers**

cpio(1) – copy files to or from a cpio archive  
cu(1C) – call another system  
ftp(1N) – ARPANET file transfer program  
ftpd(1M) – Internet File Transfer Protocol server  
kermit(1C) – Kermit file transfer  
pax(1) – copy files to or from an archive in an IEEE format  
rcp(1C) – remote file copy  
remsh(1N) – remote shell  
tar(1) – copy files to or from a tar archive  
tftp(1C) – trivial file transfer program  
tftpd(1M) – DARPA Trivial File Transfer Protocol server  
tip(1C) – connect to a remote system  
update(1) – update files between two machines  
uucico(1M) – transfer files queued by uucp or uux  
uucp(1C) – UNIX® system to UNIX system copy  
uuencode(1C) – encode/decode a binary file for transmission via mail

**file types**

file(1) – determine file type  
find(1) – find files  
magic(4) – magic number file for file command

**file writing**

write(2) – write on a file

**files, archive**

ar(1) – archive and library maintainer for portable archives  
ar(4) – common archive file format  
cpio(1) – copy files to or from a cpio archive  
cpio(4) – format of cpio archive  
l dahread(3X) – read the archive header of a member of an archive file  
lorder(1) – find ordering relation for an object library  
pax(1) – copy files to or from an archive in an IEEE format  
tar(1) – copy files to or from a tar archive  
tar(4) – format of tar header

**files, big**

bdiff(1) – diff large files  
bfs(1) – big file scanner

**files, browsing**

`head(1)` – give first few lines  
`more(1)` – show the contents of a file in display-size chunks  
`pg(1)` – show the contents of a file in display-size chunks  
`tail(1)` – deliver the last part of a file

**files, comparing**

`bdiff(1)` – diff large files  
`cmp(1)` – compare two files  
`comm(1)` – select or reject lines common to two sorted files  
`diff(1)` – differential file and directory comparator  
`diff3(1)` – 3-way differential file comparison  
`dirdiff(1)` – directory comparison  
`merge(1)` – three-way file merge  
`rcsdiff(1)` – compare RCS revisions  
`sccsdiff(1)` – compare two versions of an SCCS file  
`sdiff(1)` – side-by-side difference program  
`sumdir(1)` – sum and count characters in the files in the given directories  
`ucbdiff(1)` – differential file and directory comparator  
`ucbdiff3(1)` – 3-way differential file comparison  
`uniq(1)` – report repeated lines in a file

**files, compressing and expanding**

`compact(1)` – compress and uncompress files  
`compress(1)` – compress and expand data  
`crypt(1)` – encode/decode  
`makekey(1)` – generate encryption key  
`pack(1)` – compress and expand files

**files, copying**

`atprint(1)` – copy data to a remote PAP server  
`bcopy(1M)` – interactive block copy  
`blt(3C)` – block transfer data  
`cp(1)` – copy files  
`cpio(1)` – copy files to or from a `cpio` archive  
`cpio(4)` – format of `cpio` archive  
`csplit(1)` – context split  
`dcopy(1M)` – copy file systems for optimal access time  
`dd(1)` – convert and copy a file  
`dump.bsd(1M)` – copy the files within the named file system to a  
                  `dump.bsd` archive  
`fcnvt(1)` – convert a resource file to another format  
`ln(1)` – make links  
`pax(1)` – copy files to or from an archive in an IEEE format  
`rcp(1C)` – remote file copy

**restore(1M)** – copy files from a `dump.bsd` archive into an existing file system  
**split(1)** – split a file into pieces  
**tar(1)** – copy files to or from a `tar` archive  
**tar(4)** – format of `tar` header  
**tp(1)** – copy files to or from a `tp` archive  
**uucp(1C)** – UNIX® system to UNIX system copy  
**uuto(1C)** – public UNIX-to-UNIX system file copy  
**volcopy(1M)** – copy file systems with label checking

**files, device description**

**printcap(4)** – printer-capability database  
**termcap(4)** – terminal capability database  
**terminfo(4)** – terminal capability database

**files, displaying status of**

**file(1)** – determine file type  
**ls(1)** – list contents of directory  
**sum(1)** – calculate a checksum  
**version(1)** – reports version number of files

**files, dividing**

**csplit(1)** – context split  
**split(1)** – split a file into pieces

**files, FIFO**

**mkfifo(3P)** – make a FIFO special file

**files, finding**

**find(1)** – find files

**files, manipulating**

**cp(1)** – copy files  
**cpio(1)** – copy files to or from a `cpio` archive  
**csplit(1)** – context split  
**dd(1)** – convert and copy a file  
**fconv(1)** – convert a resource file to another format  
**ln(1)** – make links  
**mkdir(1)** – make a directory  
**mv(1)** – move or rename files  
**pax(1)** – copy files to or from an archive in an IEEE format  
**rcp(1C)** – remote file copy  
**rm(1)** – remove files or directories  
**split(1)** – split a file into pieces  
**tar(1)** – copy files to or from a `tar` archive  
**tp(1)** – copy files to or from a `tp` archive

**files, merging**

acctmerg(1M) – merge or add total accounting files  
cat(1) – concatenate and display the contents of named files  
join(1) – relational database operator  
merge(1) – three-way file merge  
paste(1) – merge lines of several files or subsequent lines of one file  
soelim(1) – eliminate . so's from nroff input  
sort(1) – sort or merge files  
tsort(1) – topological sort

**files, printing**

lp(1) – send or cancel requests to a line printer for a Berkeley file system  
(4.2)  
lpq(1) – spool queue examination program  
lpr(1) – off line print  
lprm(1) – remove jobs from the line printer spooling queue for a Berkeley  
file system (4.2)

**files, RCS**

ci(1) – check in RCS revisions  
co(1) – check out RCS revisions  
ident(1) – display RCS keywords and their values  
merge(1) – three-way file merge  
rcs(1) – change RCS file attributes  
rcsdiff(1) – compare RCS revisions  
rcsfile(4) – format of an RCS file  
rcsintro(1) – introduction to RCS commands  
rcsmerge(1) – merge RCS revisions  
rlog(1) – display log messages and other information about RCS files  
scstorcs(1M) – build RCS file from SCCS file  
ucbdiff(1) – differential file and directory comparator  
ucbdiff3(1) – 3-way differential file comparison

**files, SCCS**

admin(1) – create and administer SCCS files  
cdc(1) – change the delta commentary of an SCCS delta  
comb(1) – combine SCCS deltas  
delta(1) – make a delta (change) to an SCCS file  
get(1) – get a version of an SCCS file  
help(1) – ask for help in using SCCS  
prs(1) – display information about an SCCS file  
rmde1(1) – remove a delta from an SCCS file  
sact(1) – display who has checked an SCCS file out for editing.  
scs(1) – front end for the SCCS subsystem  
scsdiff(1) – compare two versions of an SCCS file

**sccsfile(4)** – format of an SCCS file  
**sccstorcs(1M)** – build RCS file from SCCS file  
**unget(1)** – undo a previous get of an SCCS file  
**val(1)** – validate SCCS file  
**what(1)** – identify SCCS files

**files, searching for**

- find(1)** – find files

**files, yellow-pages**

- makedbm(1M)** – make a yellow pages dbm file

**finding files**

- find(1)** – find files

**flag options**

- getopt(1)** – parse command options
- getopt(3C)** – get option letter from argument vector

**floating-point numbers**

- atof(3C)** – convert ASCII string to floating-point number
- ecvt(3C)** – convert floating-point number to string
- frexp(3C)** – manipulate parts of floating-point numbers

**floor numbers**

- floor(3M)** – floor, ceiling, remainder, absolute value functions

**floppy disks**

- cpio(1)** – copy files to or from a **cpio** archive
- cpio(4)** – format of **cpio** archive
- diskformat(1M)** – format a disk through a driver-dependent format operation
- eject(1)** – eject diskette from drive
- fd(7)** – 3.5-inch disk device driver
- finstall(1M)** – install A/UX commercial software from floppy disks
- finstallrc(4)** – **finstall** default configuration file
- pax(1)** – copy files to or from an archive in an IEEE format
- tar(1)** – copy files to or from a **tar** archive
- tar(4)** – format of **tar** header

**flowgraphs**

- cflow(1)** – generate C flowgraph

**font files, troff**

- afm(4)** – Adobe POSTSCRIPT font metrics file format
- font(5)** – description files for device-independent **troff**
- iwmap(4)** – format of **iwprep(1)** character map description files
- iwprep(1)** – prepare **troff** description files
- makedev(1)** – prepare **troff** description files

## **footnotes**

**me(5)** – macros for formatting papers  
**mm(1)** – format documents that contain nroff and mm formatting requests  
    mm macros  
**mm(5)** – macro package for formatting documents  
**ms(5)** – text formatting macros  
**refer(1)** – find and insert literature references in documents

## **format checkers**

**checkmm(1)** – check documents formatted with the mm macros  
**checknr(1)** – check nroff/troff files  
**lint(1)** – a C program checker

## **format macros**

**checkmm(1)** – check documents formatted with the mm macros  
**m4(1)** – macro processor  
**macrof(1)** – produce cross-reference listing of macro files  
**man(5)** – macros for formatting entries in this manual  
**me(5)** – macros for formatting papers  
**mm(1)** – format documents that contain nroff and mm formatting requests  
    mm macros  
**mm(5)** – macro package for formatting documents  
**mptx(5)** – the macro package for formatting a permuted index  
**ms(5)** – text formatting macros  
**mv(5)** – a troff macro package for typesetting viewgraphs and slides

## **formatters, disk**

**diskformat(1M)** – format a disk through a driver-dependent format operation

## **formatters, text**

**daiw(1)** – Apple ImageWriter II troff postprocessor filter  
**daps(1)** – Autologic APS-5 phototypesetter troff postprocessor  
**enscript(1)** – convert text files to format for printing  
**eqn(1)** – format mathematical text for troff  
**fmt(1)** – simple text formatter  
**fold(1)** – fold long lines for finite-width output device  
**mm(1)** – format documents that contain nroff and mm formatting requests  
    mm macros  
**mrmt(1)** – typeset documents  
**mvt(1)** – typeset view graphs and slides  
**neqn(1)** – format mathematical text for nroff  
**newform(1)** – change the format of a text file  
**nroff(1)** – text formatting language  
**otroff(1)** – text formatting and typesetting  
**pr(1)** – format text for a print device

**psdit(1)** – convert **troff** intermediate format to POSTSCRIPT format  
**psroff(1)** – **troff** to a POSTSCRIPT printer  
**roffbib(1)** – run off bibliographic database  
**tbl(1)** – format tables for **nroff** or **troff**  
**troff(1)** – text formatting and typesetting

### Fortran facilities

**abort(3F)** – terminate Fortran program  
**abs(3F)** – Fortran absolute value  
**acos(3F)** – Fortran arccosine intrinsic function  
**aimag(3F)** – Fortran imaginary part of complex argument  
**aint(3F)** – Fortran integer part intrinsic function  
**asa(1)** – interpret ASA carriage control characters  
**asin(3F)** – Fortran arcsine intrinsic function  
**atan2(3F)** – Fortran arctangent intrinsic function  
**atan(3F)** – Fortran arctangent intrinsic function  
**bool(3F)** – Fortran bitwise boolean functions  
**conjg(3F)** – Fortran complex conjugate intrinsic function  
**cos(3F)** – Fortran cosine intrinsic function  
**cosh(3F)** – Fortran hyperbolic cosine intrinsic function  
**dim(3F)** – Fortran positive difference intrinsic functions  
**dprod(3F)** – Fortran double precision product intrinsic function  
**efl(1)** – Extended Fortran Language  
**exp(3F)** – Fortran exponential intrinsic function  
**f77(1)** – Fortran 77 compiler  
**fpr(1)** – filter the output of Fortran programs for line printing  
**fsplit(1)** – split **f77** or **efl** files  
**ftype(3F)** – explicit Fortran type conversion  
**getarg(3F)** – return Fortran command-line argument  
**getenv(3F)** – return Fortran environment variable  
**iargc(3F)** – return command line arguments  
**index(3F)** – return location of Fortran substring  
**len(3F)** – return length of Fortran string  
**lge(3F)** – string comparision intrinsic functions  
**log10(3F)** – Fortran common logarithm intrinsic function  
**log(3F)** – Fortran natural logarithm intrinsic function  
**max(3F)** – Fortran maximum-value functions  
**mclock(3F)** – return Fortran time accounting  
**min(3F)** – Fortran minimum-value functions  
**mod(3F)** – Fortran remaindering intrinsic functions  
**rand(3F)** – Fortran uniform random-number generator  
**round(3F)** – Fortran nearest integer functions  
**sign(3F)** – Fortran transfer-of-sign intrinsic function

`signal(3F)` – specify Fortran action on receipt of a system signal  
`sin(3F)` – Fortran sine intrinsic function  
`sinh(3F)` – Fortran hyperbolic sine intrinsic function  
`sqrt(3F)` – Fortran square root intrinsic function  
`system(3F)` – issue a shell command from Fortran  
`tan(3F)` – Fortran tangent intrinsic function  
`tanh(3F)` – Fortran hyperbolic tangent intrinsic function

#### Fortran programming

`asa(1)` – interpret ASA carriage control characters  
`efl(1)` – Extended Fortran Language  
`f77(1)` – Fortran 77 compiler  
`fpr(1)` – filter the output of Fortran programs for line printing  
`fsplit(1)` – split `f77` or `efl` files

#### forwarder

`forwarder(7)` – forwarder device driver

#### full-duplex

`shutdown(2N)` – shut down part of a full-duplex connection  
`termio(7)` – general terminal interface  
`termios(7P)` – A/UX® POSIX general terminal interface

#### games

`aliens(6)` – alien invaders attack the earth  
`arithmetic(6)` – provide drill in number facts  
`autorobots(6)` – escape from the automatic robots  
`back(6)` – the game of backgammon  
`bcd(6)` – simulate a punched card corresponding to a text argument  
`bj(6)` – the game of black jack  
`chase(6)` – try to escape the killer robots  
`craps(6)` – the game of craps  
`cribbage(6)` – the card game cribbage  
`fish(6)` – play Go Fish”  
`fortune(6)` – print a random, hopefully interesting, adage  
`hangman(6)` – guess the word  
`intro(6)` – introduction to games  
`life(6)` – play the game of life  
`mastermind(6)` – play the game of Mastermind  
`maze(6)` – generate a maze  
`moo(6)` – guessing game  
`number(6)` – convert Arabic numerals to English  
`quiz(6)` – test your knowledge  
`rain(6)` – animated raindrops display  
`robots(6)` – escape from the robots  
`trek(6)` – trekkie game

**ttt(6)** – tic-tac-toe  
**twinkle(6)** – twinkle stars on the screen  
**worm(6)** – play the growing worm game  
**worms(6)** – animate worms on a display terminal  
**wump(6)** – the game of hunt-the-wumpus

**gamma function**  
    **gamma(3M)** – log gamma function

**geometry**  
    **hypot(3M)** – Euclidean distance function

**go fish**  
    **fish(6)** – play Go Fish”

**goto**  
    **setjmp(3C)** – non-local goto  
    **sigsetjmp(3P)** – non-local jumps

**graphics**  
    **graph(1G)** – draw a graph  
    **pic(1)** – troff preprocessor for drawing pictures  
    **plot(3X)** – graphics interface subroutines  
    **plot(4)** – graphics interface  
    **spline(1G)** – interpolate smooth curve  
    **tplot(1G)** – interpret plotter instructions for use at a vintage display device

**graphs**  
    **grap(1)** – pic preprocessor for drawing graphs  
    **graph(1G)** – draw a graph

**group access lists**  
    **getgroups(2)** – get group access list  
    **initgroups(3)** – initialize group access list  
    **setgroups(2)** – set group access list

**group IDs**  
    **group(4)** – group file  
    **id(1)** – display user and group IDs and names  
    **passwd(4)** – password file  
    **setuid(2)** – set user and group ID

**groups**  
    **chown(1)** – change the owner or group of a file  
    **chown(2)** – change owner and group of a file  
    **getgrent(3C)** – obtain group file entry from a group file  
    **getgroups(2)** – get group access list  
    **getuid(2)** – get real and effective user IDs and group IDs  
    **group(4)** – group file  
    **groups(1)** – show group memberships

**id(1)** – display user and group IDs and names  
**initgroups(3)** – initialize group access list  
**newgrp(1)** – login to a new group  
**pwck(1M)** – password/group file checkers  
**setgroups(2)** – set group access list  
**setregid(2)** – set real and effective group ID  
**setuid(2)** – set user and group ID

**GSI 300 terminal**

**300(1)** – filter text containing printer control sequences for a DASI terminal

**half-duplex**

**shutdown(2N)** – shut down part of a full-duplex connection  
**termio(7)** – general terminal interface  
**termios(7P)** – A/UX® POSIX general terminal interface

**halting execution**

**exit(2)** – terminate process  
**kill(1)** – terminate a process  
**kill(2)** – send a signal to a process or a group of processes  
**killall(1M)** – kill all active processes  
**reboot(2)** – reboot system or halt processor

**handle, file**

**nfs\_getfh(2)** – get a file handle

**hangman**

**hangman(6)** – guess the word

**hash tables**

**hsearch(3C)** – manage hash search tables

**help, command options**

**cndo(1)** – build commands interactively

**help, online**

**apropos(1)** – locate commands by keyword lookup  
**man(1)** – display the named manual page entries  
**whatis(1)** – display a brief description for the named manual page entry  
**whereis(1)** – locate source, binary, and online help file for a command  
**which(1)** – display the directory path to a file by interpreting PATH and alias settings

**host names**

**ethers(4)** – Ethernet address to hostname database or YP domain  
**HOSTNAME(4)** – hostname and domainname database  
**hosts(4)** – host name database  
**hosts.equiv(4)** – list of trusted hosts

**hosts**

`byteorder(3N)` – convert values between host and network byte order  
`gethostbyaddr(3N)` – get network host entry  
`hostid(1N)` – set or display the identifier of the current host system  
`hostname(1N)` – set or display the name of the current host system  
`hosts(4)` – host name database  
`hosts.equiv(4)` – list of trusted hosts  
`remote(4)` – remote host description file  
`rhosts(4N)` – trusted hosts file format  
`slip.hosts(4)` – map user names to host addresses of `slip` client  
`uname(1)` – display identification information about the current system  
`uname(2)` – get name of current system

**HUGE (constant)**

`math(5)` – math functions and constants

**hyperbolic functions**

`cosh(3F)` – Fortran hyperbolic cosine intrinsic function  
`sinh(3F)` – Fortran hyperbolic sine intrinsic function  
`sinh(3M)` – hyperbolic functions  
`tanh(3F)` – Fortran hyperbolic tangent intrinsic function

**hyphenation**

`hyphen(1)` – find hyphenated words

**ICMP**

`icmp(5P)` – Internet Control Message Protocol

**IDs**

`group(4)` – group file  
`id(1)` – display user and group IDs and names  
`passwd(4)` – password file  
`setuid(2)` – set user and group ID

**ImageWriter**

`daiw(1)` – Apple ImageWriter II `troff` postprocessor filter  
`iw2(1)` – Apple ImageWriter print filter  
`iwprep(1)` – prepare `troff` description files

**indexing**

`indxbib(1)` – build inverted index for a bibliography  
`ndx(1)` – create a subject-page index for a document  
`ptx(1)` – make permuted index

**initialization**

`brc(1M)` – system initialization shell scripts  
`init(1M)` – process control initialization  
`inittab(4)` – script for the `init` process  
`tset(1)` – set or reset the terminal to a sensible state

**inittab file**

`init(1M)` – process control initialization  
`inittab(4)` – script for the `init` process  
`tty_add(1M)` – modify the `/etc/inittab` file

**inodes**

`clri(1M)` – clear inode  
`fsck(1M)` – check file-system consistency and interactively repair  
`fsirand(1M)` – install random inode generation numbers  
`inode(4)` – format of a System V inode  
`mkfs(1M)` – construct an SVFS file system  
`ncheck(1M)` – locate the filename associated with an i-node  
`newfs(1M)` – construct a new UFS file system

**Input/Output management**

`cgetattr(3P)` – get or set the value of the output and input baud rate  
`fread(3S)` – binary input/output  
`fseek(3S)` – reposition a file pointer in a stream  
`ioctl(2)` – control device  
`printf(3S)` – format and output string and numeric data  
`query(1)` – query the user for input  
`scanf(3S)` – convert formatted input  
`select(2N)` – synchronous I/O multiplexing  
`streams(7)` – an interface for character I/O  
`tee(1)` – pipe fitting

**installers**

`cpset(1M)` – install files in specified directories  
`finstall(1M)` – install A/UX commercial software from floppy disks  
`finstallrc(4)` – `finstall` default configuration file  
`fsirand(1M)` – install random inode generation numbers  
`install(1M)` – install files in specified directories  
`mklost+found(1M)` – make a `lost+found` directory for `fsck`  
`ypinit(1M)` – build and install yellow pages database

**integers**

`abs(3C)` – return integer absolute value  
`abs(3F)` – Fortran absolute value  
`aint(3F)` – Fortran integer part intrinsic function  
`bc(1)` – arbitrary-precision arithmetic language  
`dc(1)` – desk calculator  
`drand48(3C)` – generate uniformly distributed pseudo-random numbers  
`expr(1)` – evaluate arguments as an expression  
`factor(1)` – factor a number  
`rand(3C)` – simple random-number generator  
`rand(3F)` – Fortran uniform random-number generator

**round(3F)** – Fortran nearest integer functions

**strtol(3C)** – convert string to integer

### **interfaces**

**ae(5)** – 3Com 10 Mb/s Ethernet interface

**appletalk(1M)** – configure and view AppleTalk® network interfaces

**appletalk(7)** – general AppleTalk socket interface and STREAMS controls

**atp(3N)** – AppleTalk Transaction Protocol (ATP) interface

**ddp(3N)** – AppleTalk Datagram Delivery Protocol (DDP) interface

**error(7)** – error-logging interface

**gd(7)** – generic disk interface

**ifconfig(1M)** – configure network interface parameters

**intro(7)** – introduction to device drivers and interfaces

**lap(3N)** – AppleTalk Link Access Protocol (LLAP/ELAP) interface

**lo(5)** – software loopback network interface

**mem(7)** – an interface for access to core memory

**mtio(7)** – interface conventions for magnetic tape devices

**nbp(3N)** – AppleTalk Name Binding Protocol (NBP) interface.

**nvram(7)** – nonvolatile memory/time of day clock interface

**pap(3N)** – AppleTalk Printer Access Protocol (PAP) interface

**plot(3X)** – graphics interface subroutines

**plot(4)** – graphics interface

**set42sig(3)** – set 4.2 BSD signal interface

**slip.config(4)** – list of slip interfaces supported by a slip server

**streams(7)** – an interface for character I/O

**telnet(1C)** – user interface to the TELNET protocol

**termio(7)** – general terminal interface

**termios(7P)** – A/UX® POSIX general terminal interface

**tty(7)** – controlling terminal interface

**ypclnt(3N)** – yellow pages client interface

**zip(3N)** – AppleTalk Zone Information Protocol (ZIP) interface

### **Internet Control Message Protocol**

**icmp(5P)** – Internet Control Message Protocol

### **Internet, general**

**arp(5P)** – Address Resolution Protocol

**ftp(1N)** – ARPANET file transfer program

**ftpd(1M)** – Internet File Transfer Protocol server

**icmp(5P)** – Internet Control Message Protocol

**inet(3N)** – Internet address manipulation routines

**inet(5F)** – Internet protocol family

**inetd(1M)** – Internet services daemon

**ip(5P)** – Internet Protocol

**named(1M)** – Internet domain name server  
**networks(4N)** – network name database  
**nslookup(1)** – query name servers interactively  
**portmap(1M)** – DARPA port to RPC program number mapper  
**protocols(4N)** – protocol name database  
**resolver(3N)** – resolver routines  
**resolver(4)** – resolver configuration file  
**sendmail(1M)** – send mail over the Internet  
**servers(4)** – Internet server database  
**services(4N)** – service name database  
**stdhosts(1M)** – convert Internet addresses to standard form  
**tcp(5P)** – Internet Transmission Control Protocol  
**telnetd(1M)** – DARPA TELNET protocol server  
**tftp(1C)** – trivial file transfer program  
**tftpd(1M)** – DARPA Trivial File Transfer Protocol server  
**udp(5P)** – Internet User Datagram Protocol

#### **interpolator**

**soelim(1)** – eliminate . so's from nroff input  
**spline(1G)** – interpolate smooth curve

#### **interpreters**

**bs(1)** – a compiler/interpreter for modest-sized programs  
**csh(1)** – run the C shell, a command interpreter with C-like syntax  
**ksh(1)** – run the Korn shell, a command interpreter compatible with Bourne shell  
**sh(1)** – run the Bourne shell, the earliest of the command interpreters available  
**sno(1)** – SNOBOL interpreter  
**StartupShell(8)** – a command interpreter accessible from within the A/UX Startup application

#### **Interpreting commands**

**csh(1)** – run the C shell, a command interpreter with C-like syntax  
**ksh(1)** – run the Korn shell, a command interpreter compatible with Bourne shell  
**sh(1)** – run the Bourne shell, the earliest of the command interpreters available

#### **interprocess communication**

**ftok(3C)** – standard interprocess communication package  
**ipcrm(1)** – remove interprocess communications facilities  
**ipcs(1)** – report interprocess communication facilities status  
**kill(1)** – terminate a process  
**msgctl(2)** – message control operations  
**msgget(2)** – get message queue

`msgop(2)` – message operations  
`semctl(2)` – semaphore control operations  
`semget(2)` – get set of semaphores  
`semop(2)` – semaphore operations  
`shmctl(2)` – shared memory control operations  
`shmget(2)` – get shared memory segment  
`shmop(2)` – shared memory operations

**interval timers**

`getitimer(2)` – get/set value of interval timer

**I/O management**

`cfgetospeed(3P)` – get or set the value of the output and input baud rate  
`fread(3S)` – binary input/output  
`fseek(3S)` – reposition a file pointer in a stream  
`ioctl(2)` – control device  
`printf(3S)` – format and output string and numeric data  
`query(1)` – query the user for input  
`scanf(3S)` – convert formatted input  
`select(2N)` – synchronous I/O multiplexing  
`streams(7)` – an interface for character I/O  
`tee(1)` – pipe fitting

**IOT faults**

`abort(3C)` – generate an IOT fault

**ISO encoding**

`mactoiso(1)` – convert from Macintosh® encoding to International Standards Organization (ISO) encoding

**issue**

`issue(4)` – issue identification file

**job control**

`at(1)` – execute commands at a later time  
`chroot(1M)` – change root directory for a command  
`cron(1M)` – clock daemon  
`crontab(1)` – user crontab utility  
`csh(1)` – run the C shell, a command interpreter with C-like syntax  
`env(1)` – set environment for command execution  
`ksh(1)` – run the Korn shell, a command interpreter compatible with Bourne shell  
`nice(1)` – run a command at low priority  
`nohup(1)` – run a command immune to hangups  
`shl(1)` – shell layer manager  
`sleep(1)` – suspend execution for an interval  
`yes(1)` – generate y entries in response to requests for input

**join files relationally**

join(1) – relational database operator

**Kermit**

kermit(1C) – Kermit file transfer

**kernels**

autoconfig(1M) – build a new up-to-date kernel

chnod(1M) – change current A/UX system nodename

kconfig(1M) – tune kernel parameters for work-load optimization

launch(8) – launch an A/UX kernel from the A/UX Startup environment

master(4) – master kernel configuration files

mem(7) – an interface for access to core memory

module\_dump(1M) – identify configuration information stored within the  
named kernel file

ncstats(1M) – display kernel name cache statistics

newconfig(1M) – prepare and configure a new kernel

newunix(1M) – prepare for new kernel configuration

rstatd(1M) – kernel statistics server

uname(1) – display identification information about the current system

uvar(2) – return system-specific configuration information

**keyboard maps**

keyset(1M) – set console keyboard mapping

**keys (encryption)**

crypt(1) – encode/decode

crypt(3C) – generate DES encryption

makekey(1) – generate encryption key

**keywords**

apropos(1) – locate commands by keyword lookup

ident(1) – display RCS keywords and their values

ndx(1) – create a subject-page index for a document

subj(1) – generate a list of subjects from a document

ypmatch(1) – list the value of keys in a YP map

**Korn shell**

ksh(1) – run the Korn shell, a command interpreter compatible with

Bourne shell

**labels**

volcopy(1M) – copy file systems with label checking

**languages**

awk(1) – pattern scanning and processing language

bc(1) – arbitrary-precision arithmetic language

bs(1) – a compiler/interpreter for modest-sized programs

cc(1) – C compiler

cpp(1) – the C language preprocessor

**csh(1)** – run the C shell, a command interpreter with C-like syntax  
**efl(1)** – Extended Fortran Language  
**eqn(1)** – format mathematical text for **troff**  
**f77(1)** – Fortran 77 compiler  
**ksh(1)** – run the Korn shell, a command interpreter compatible with Bourne shell  
**neqn(1)** – format mathematical text for **nroff**  
**nroff(1)** – text formatting language  
**pic(1)** – **troff** preprocessor for drawing pictures  
**sh(1)** – run the Bourne shell, the earliest of the command interpreters available  
**sno(1)** – SNOBOL interpreter  
**tbl(1)** – format tables for **nroff** or **troff**  
**troff(1)** – text formatting and typesetting

## LAP

**lap(3N)** – AppleTalk Link Access Protocol (LLAP/ELAP) interface  
launching Macintosh applications from the command line  
**launch(1)** – execute a Macintosh binary application

## lexical analysis

**awk(1)** – pattern scanning and processing language  
**lex(1)** – generate programs for simple lexical tasks

## library management

**ar(1)** – archive and library maintainer for portable archives  
**mkshlib(1)** – create shared library

## life

**life(6)** – play the game of life

## line counting

**wc(1)** – word count

## line discipline

**line\_push(3)** – routine used to push streams line disciplines  
**line\_sane(1M)** – push streams line disciplines  
**stty(1)** – set the modes for a terminal  
**termio(7)** – general terminal interface

## line numbering

**ld(1)** – link editor for common object files  
**linenum(4)** – line number entries in a common object file  
**n1(1)** – line numbering filter  
**pr(1)** – format text for a print device  
**strip(1)** – strip symbol and line number information from an object file

**lines, blank (in text)**

**ssp(1)** – make output single spaced

**lines, filling and wrapping**

**fmt(1)** – simple text formatter

**fold(1)** – fold long lines for finite-width output device

**lines, processing text within**

**awk(1)** – pattern scanning and processing language

**colrm(1)** – remove columns from a file

**comm(1)** – select or reject lines common to two sorted files

**cut(1)** – cut out selected fields of each line of a file

**grep(1)** – search a file for a pattern

**head(1)** – give first few lines

**join(1)** – relational database operator

**line(1)** – read one line

**newform(1)** – change the format of a text file

**nl(1)** – line numbering filter

**paste(1)** – merge lines of several files or subsequent lines of one file

**rev(1)** – reverse characters within each line of text

**sed(1)** – stream editor

**sort(1)** – sort or merge files

**tail(1)** – deliver the last part of a file

**uniq(1)** – report repeated lines in a file

**wc(1)** – word count

**lines, repeated (in text)**

**uniq(1)** – report repeated lines in a file

**lines, reversing characters within**

**rev(1)** – reverse characters within each line of text

**Link Access Protocol**

**lap(3N)** – AppleTalk Link Access Protocol (LLAP/ELAP) interface

**link editor (object code)**

**a.out(4)** – common assembler and link editor output

**ld(1)** – link editor for common object files

**links, file**

**link(2)** – link to a file

**ln(1)** – make links

**readlink(2)** – read value of a symbolic link

**symlink(2)** – make symbolic link to a file

**listening**

**listen(2N)** – listen for connections on a socket

**literary style**

*diction(1)* – locate wordy sentences in a document  
    *spell(1)* – find spelling errors  
    *style(1)* – analyze surface characteristics of a document

**locking**

*lockf(3C)* – record locking on files  
    *locking(2)* – provide exclusive file regions for reading or writing  
    *plock(2)* – lock process, text, or data in memory

**logarithms**

*exp(3F)* – Fortran exponential intrinsic function  
    *exp(3M)* – exponential, logarithm, power, and square root functions  
    *log10(3F)* – Fortran common logarithm intrinsic function  
    *log(3F)* – Fortran natural logarithm intrinsic function  
    *math(5)* – math functions and constants

**logging in and logging out**

*getlogin(3C)* – get login name  
    *issue(4)* – issue identification file  
    *login(1)* – sign on  
    *Login(1M)* – present a Macintosh® login dialog box when called by  
        *init*  
    *logname(1)* – get login name  
    *logname(3X)* – return login name of user  
    *newgrp(1)* – login to a new group  
    *passwd(1)* – change login password  
    *passwd(4)* – password file  
    *profile(4)* – setting up an environment at login time  
    *remlogin(1N)* – remote sign on  
    *rlogin(1N)* – remote login  
    *rlogind(1M)* – remote login server

**long integers**

*a64l(3C)* – convert between long integer and base-64 ASCII string  
    *drand48(3C)* – generate uniformly distributed pseudo-random numbers  
    *l3tol(3C)* – convert between 3-byte integers and long integers  
    *sputl(3X)* – access long integer data in a machine independent fashion  
    *strtol(3C)* – convert string to integer

**loopback (software)**

*lo(5)* – software loopback network interface

**lost+found**

*mklost+found(1M)* – make a lost+found directory for fsck

## **Macintosh desktop**

`CommandShell(1)` – A/UX® Toolbox application for managing command-interpretation windows and moderating access to the A/UX console window

## **Macintosh dialogs**

`Login(1M)` – present a Macintosh® login dialog box when called by `init`

`macquery(1M)` – post a Macintosh® alert box to query the user

## **Macintosh environment, establishing preferences**

`changesize(1)` – change the fields of the SIZE resource of a file

`keyset(1M)` – set console keyboard mapping

`mactoiso(1)` – convert from Macintosh® encoding to International Standards Organization (ISO) encoding

`systemfolder(1)` – create a personal System Folder

## **Macintosh or Macintosh-related applications**

`changesize(1)` – change the fields of the SIZE resource of a file

`CommandShell(1)` – A/UX® Toolbox application for managing command-interpretation windows and moderating access to the A/UX console window

`derez(1)` – decompile a resource file

`keyset(1M)` – set console keyboard mapping

`launch(1)` – execute a Macintosh binary application

`Login(1M)` – present a Macintosh® login dialog box when called by `init`

`macquery(1M)` – post a Macintosh® alert box to query the user

`mactoiso(1)` – convert from Macintosh® encoding to International Standards Organization (ISO) encoding

`rez(1)` – compile resources

`settc(1)` – set the type and creator of a Macintosh resource file

`systemfolder(1)` – create a personal System Folder

`TextEdit(1)` – mouse-based text editor

## **Macintosh resources**

`derez(1)` – decompile a resource file

`fcnvt(1)` – convert a resource file to another format

`rez(1)` – compile resources

`settc(1)` – set the type and creator of a Macintosh resource file

## **Macintosh toolbox**

`slots(3X)` – ROM library functions

## **macros, format**

`checkmm(1)` – check documents formatted with the mm macros

`m4(1)` – macro processor

`macref(1)` – produce cross-reference listing of macro files

**man(5)** – macros for formatting entries in this manual  
**me(5)** – macros for formatting papers  
**mm(1)** – format documents that contain nroff and mm formatting requests  
    mm macros  
**mm(5)** – macro package for formatting documents  
**mptx(5)** – the macro package for formatting a permuted index  
**ms(5)** – text formatting macros  
**mv(5)** – a troff macro package for typesetting viewgraphs and slides

**magic numbers**

- a.out(4)** – common assembler and link editor output
- magic(4)** – magic number file for **file** command

**magnetic tape**

- mt(1)** – magnetic tape manipulating program
- mtio(7)** – interface conventions for magnetic tape devices
- tar(1)** – copy files to or from a **tar** archive
- tar(4)** – format of **tar** header
- tc(7)** – Apple Tape Backup 40SC device driver
- tcb(1)** – block data to 8K for **tc** output
- tp(1)** – copy files to or from a **tp** archive

**mail handling**

- aliases(4)** – aliases file for **sendmail**
- biff(1)** – be notified if mail arrives and who it is from
- comsat(1M)** – server for **biff(1)**
- from(1)** – who is my mail from?
- mail(1)** – send mail to users or read mail
- mailq(1M)** – list the contents of the mail queue
- mailx(1)** – interactive message processing system
- mesg(1)** – permit or deny messages
- newaliases(1M)** – rebuild the database for the **mail** aliases file
- sendmail(1M)** – send mail over the Internet
- talk(1N)** – talk to another user
- write(1)** – write to another user

**mail system, maintenance of**

- comsat(1M)** – server for **biff(1)**
- mailq(1M)** – list the contents of the mail queue
- newaliases(1M)** – rebuild the database for the **mail** aliases file
- sendmail(1M)** – send mail over the Internet

**manual pages**

- apropos(1)** – locate commands by keyword lookup
- man(1)** – display the named manual page entries
- man(5)** – macros for formatting entries in this manual
- whatis(1)** – display a brief description for the named manual page entry

**whereis(1)** – locate source, binary, and online help file for a command  
**masks**

**sigblock(2)** – block signals  
**sigpause(2)** – release blocked signals and wait for interrupt  
**sigprocmask(3P)** – examine and change blocked signals  
**sigsetmask(2)** – set current signal mask  
**umask(2)** – set and get file creation mask

**mastermind**

**mastermind(6)** – play the game of Mastermind

**mathematical text**

**deroff(1)** – remove nroff/troff, tbl, and eqn constructs  
**eqn(1)** – format mathematical text for troff  
**eqnchar(5)** – special character definitions for eqn and neqn  
**neqn(1)** – format mathematical text for nroff

**mathematics**

**abs(3C)** – return integer absolute value  
**abs(3F)** – Fortran absolute value  
**acos(3F)** – Fortran arccosine intrinsic function  
**aimag(3F)** – Fortran imaginary part of complex argument  
**aint(3F)** – Fortran integer part intrinsic function  
**asin(3F)** – Fortran arcsine intrinsic function  
**atan2(3F)** – Fortran arctangent intrinsic function  
**atan(3F)** – Fortran arctangent intrinsic function  
**atof(3C)** – convert ASCII string to floating-point number  
**bc(1)** – arbitrary-precision arithmetic language  
**bessel(3M)** – Bessel functions  
**bool(3F)** – Fortran bitwise boolean functions  
**conjg(3F)** – Fortran complex conjugate intrinsic function  
**cos(3F)** – Fortran cosine intrinsic function  
**cosh(3F)** – Fortran hyperbolic cosine intrinsic function  
**dc(1)** – desk calculator  
**dim(3F)** – Fortran positive difference intrinsic functions  
**dprod(3F)** – Fortran double precision product intrinsic function  
**ecvt(3C)** – convert floating-point number to string  
**exp(3F)** – Fortran exponential intrinsic function  
**exp(3M)** – exponential, logarithm, power, and square root functions  
**floor(3M)** – floor, ceiling, remainder, absolute value functions  
**frexp(3C)** – manipulate parts of floating-point numbers  
**gamma(3M)** – log gamma function  
**hypot(3M)** – Euclidean distance function  
**l3tol(3C)** – convert between 3-byte integers and long integers  
**log10(3F)** – Fortran common logarithm intrinsic function

**log(3F)** – Fortran natural logarithm intrinsic function  
**math(5)** – math functions and constants  
**matherr(3M)** – error-handling function  
**max(3F)** – Fortran maximum-value functions  
**min(3F)** – Fortran minimum-value functions  
**mod(3F)** – Fortran remaindering intrinsic functions  
**rand(3C)** – simple random-number generator  
**rand(3F)** – Fortran uniform random-number generator  
**round(3F)** – Fortran nearest integer functions  
**sign(3F)** – Fortran transfer-of-sign intrinsic function  
**sin(3F)** – Fortran sine intrinsic function  
**sinh(3F)** – Fortran hyperbolic sine intrinsic function  
**sinh(3M)** – hyperbolic functions  
**sputl(3X)** – access long integer data in a machine independent fashion  
**sqrt(3F)** – Fortran square root intrinsic function  
**strtod(3C)** – convert string to double-precision number  
**strtol(3C)** – convert string to integer  
**tan(3F)** – Fortran tangent intrinsic function  
**tanh(3F)** – Fortran hyperbolic tangent intrinsic function  
**trig(3M)** – trigonometric functions

**maximum values**

**max(3F)** – Fortran maximum-value functions

**maze**

**maze(6)** – generate a maze

**memory, general**

**brk(2)** – change data segment space allocation  
**core(4)** – format of core image file  
**end(3C)** – last locations in program  
**malloc(3C)** – main memory allocator  
**malloc(3X)** – fast main memory allocator  
**mem(7)** – an interface for access to core memory  
**memory(3C)** – memory operations  
**pagesize(1)** – display system page size  
**phys(2)** – allow a process to access physical addresses  
**plock(2)** – lock process, text, or data in memory  
**swap(1M)** – add or delete disk blocks to or from the swap area

**memory, shared**

**mkshlib(1)** – create shared library  
**shmctl(2)** – shared memory control operations  
**shmget(2)** – get shared memory segment  
**shmop(2)** – shared memory operations

**merging files**

- acctmerg(1M) – merge or add total accounting files
- cat(1) – concatenate and display the contents of named files
- join(1) – relational database operator
- merge(1) – three-way file merge
- paste(1) – merge lines of several files or subsequent lines of one file
- soelim(1) – eliminate . so's from nroff input
- sort(1) – sort or merge files
- tsort(1) – topological sort

**message queue**

- msgget(2) – get message queue

**messages**

- ipcrm(1) – remove interprocess communications facilities
- ipcs(1) – report interprocess communication facilities status
- mesg(1) – permit or deny messages
- msgctl(2) – message control operations
- msgget(2) – get message queue
- msgop(2) – message operations
- recv(2N) – receive a message from a socket
- send(2N) – send a message from a socket
- write(1) – write to another user

**minimum values**

- min(3F) – Fortran minimum-value functions

**modems**

- cu(1C) – call another system
- dial(3C) – establish an out-going terminal line connection
- dialup(4) – modem escape sequence file
- kermit(1C) – Kermit file transfer
- phones(4) – remote host telephone number database
- slip(1M) – attach a dialup serial line as a network interface
- tip(1C) – connect to a remote system
- uucico(1M) – transfer files queued by uucp or uux
- uucp(1C) – UNIX® system to UNIX system copy
- uux(1C) – UNIX-to-UNIX system command execution

**modification times, file**

- ls(1) – list contents of directory
- touch(1) – update access and modification times of a file
- utime(2) – set file access and modification times

**monitor processing**

- 300(1) – filter text containing printer control sequences for a DASI terminal
- 4014(1) – filter text containing printer control sequences a page at a time

450(1) – filter text containing printer control sequences for the DASI terminal  
col(1) – filter text containing printer control sequences for use at a display device  
colcrt(1) – filter nroff output for terminal previewing  
greek(1) – filter text for vintage display devices  
tc(1) – interpret troff output for use at a vintage display device  
tplot(1G) – interpret plotter instructions for use at a vintage display device  
ul(1) – filter special underlining sequences imbedded in text for use at a display device

**moo**  
moo(6) – guessing game

**Motorola S-records**

hex(1) – convert an object file to Motorola S-record format  
rcvhex(1) – receive and convert Motorola S-records from a port to a file

**mounting file systems**

fstab(4) – static information about file systems  
mount(1M) – mount and dismount file systems  
mount(3) – mount a file system  
mount(3N) – keep track of remotely mounted file systems  
mountd(1M) – NFS mount request server  
mtab(4) – mounted file system table  
showmount(1M) – show all remote mounts  
umount(2) – unmount a file system

**mouse**  
mouse(7) – mouse input device driver

**moving files**

mv(1) – move or rename files

**multiplexing**

select(2N) – synchronous I/O multiplexing

**multiplication**

dprod(3F) – Fortran double precision product intrinsic function

**name binding**

bind(2N) – bind a name to a socket  
HOSTNAME(4) – hostname and domainname database  
ypserv(1M) – yellow pages server and binder processes

**Name Binding Protocol**

nbp(3N) – AppleTalk Name Binding Protocol (NBP) interface.

**name cache**

ncstats(1M) – display kernel name cache statistics

**name servers**

nslookup(1) – query name servers interactively

ypcat(1) – list the contents of the named YP map

**NBP**

nbp(3N) – AppleTalk Name Binding Protocol (NBP) interface.

**network bridges**

rtmp(3N) – identify AppleTalk node and bridge addresses

**network domains**

getdomainname(2N) – get/set name of current network domain

ypset(1M) – point ypbind at a particular server

ypwhich(1) – which host is the YP server or map master?

**Network File System**

domainname(1) – set or display name of current domain system

exports(4) – NFS file systems being exported

fsmount(2) – mount a network file system (NFS)

fstab(4) – static information about file systems

lockd(1M) – process network lock daemon

mountd(1M) – NFS mount request server

nfsd(1M) – NFS daemons

nfsstat(1M) – Network File System statistics

nfssvc(2) – NFS daemons

rpcinfo(1M) – report RPC information

showmount(1M) – show all remote mounts

spray(1M) – spray packets

sprayd(1M) – spray server

statd(1M) – provide crash and recovery for network locking services

**network groups**

getnetgroup(3N) – get network group entry

netgroup(4) – list of network groups

revnetgroup(1M) – reverse the netgroup file

ypcat(1) – list the contents of the named YP map

**network maintenance, UUCP system**

uucico(1M) – transfer files queued by uucp or uux

uuclean(1M) – clean up the uucp spool directory

uusub(1M) – monitor UUCP network

uuxqt(1M) – UUCP execution file interpreter

**network maintenance, Yellow Pages**

makedbm(1M) – make a yellow pages dbm file

revnetgroup(1M) – reverse the netgroup file

ypcat(1) – list the contents of the named YP map

ypinit(1M) – build and install yellow pages database  
ypmake(1M) – rebuild yellow pages database  
ypmatch(1) – list the value of keys in a YP map  
yppasswd(1) – change login password in yellow pages  
yppasswdd(1M) – server for modifying yellow pages password file  
yppoll(1M) – what version of a YP map is at a YP server host  
yppush(1M) – force propagation of a changed YP map  
ypserv(1M) – yellow pages server and binder processes  
ypset(1M) – point ypbnd at a particular server  
ypwhich(1) – which host is the YP server or map master?  
ypxfr(1M) – transfer a YP map from some YP server to here

**network protocols**

getprotoent(3N) – get protocol entry  
protocols(4N) – protocol name database

**network, status**

rup(1N) – show status of machines on local network (RPC version)  
ruptime(1N) – show host status of local machines  
rusers(1N) – give login list for local machines (RPC version)  
rwho(1N) – who's logged in on local machines?

**network testing**

lo(5) – software loopback network interface  
ping(1M) – exercise the network by sending test packets to a named host

**networks, general**

appletalk(1M) – configure and view AppleTalk® network interfaces  
appletalkrc(4) – AppleTalk® network configuration file  
atstatus(1) – display status from a PAP server  
byteorder(3N) – convert values between host and network byte order  
checkinstall(1) – check installation of boards  
connect(2N) – initiate a connection on a socket  
gethostbyaddr(3N) – get network host entry  
getnetent(3N) – get network entry  
ifconfig(1M) – configure network interface parameters  
lo(5) – software loopback network interface  
lockd(1M) – process network lock daemon  
NETADDRS(4) – network address database  
netstat(1N) – show network status  
ping(1M) – exercise the network by sending test packets to a named host  
route(1M) – manually manipulate the routing tables  
routed(1M) – network routing daemon  
rwall(1M) – write to all users over a network  
rwall(3N) – write to specified remote machines  
rwalld(1M) – network rwall server

**slattach(1M)** – attach serial lines as network interfaces  
**slattconf(1M)** – attach and configure serial lines as network interfaces  
**slip(1M)** – attach a dialup serial line as a network interface  
**socket(2N)** – create an endpoint for communication  
**statd(1M)** – provide crash and recovery for network locking services  
**ypcat(1)** – list the contents of the named YP map  
**ypclnt(3N)** – yellow pages client interface  
**ypfiles(4)** – the Yellow Pages database and directory structure  
**ypinit(1M)** – build and install yellow pages database  
**ypmake(1M)** – rebuild yellow pages database  
**ypmatch(1)** – list the value of keys in a YP map  
**yppasswd(1)** – change login password in yellow pages  
**yppasswd(3N)** – update user password in yellow pages  
**yppasswdd(1M)** – server for modifying yellow pages password file  
**yppoll(1M)** – what version of a YP map is at a YP server host  
**yppush(1M)** – force propagation of a changed YP map  
**ypserv(1M)** – yellow pages server and binder processes  
**ypset(1M)** – point ypbind at a particular server  
**ypwhich(1)** – which host is the YP server or map master?  
**ypxfr(1M)** – transfer a YP map from some YP server to here

#### **news**

**news(1)** – display local news items

#### **NFS**

**exports(4)** – NFS file systems being exported  
**fsmount(2)** – mount a network file system (NFS)  
**fstab(4)** – static information about file systems  
**mountd(1M)** – NFS mount request server  
**nfsd(1M)** – NFS daemons  
**nfsstat(1M)** – Network File System statistics  
**nfssvc(2)** – NFS daemons

#### **nodes**

**chgnod(1M)** – change current A/UX system nodename  
**intro(7)** – introduction to device drivers and interfaces  
**mknod(1M)** – build device file  
**rtmp(3N)** – identify AppleTalk node and bridge addresses  
**uname(1)** – display identification information about the current system

#### **notification (mail)**

**biff(1)** – be notified if mail arrives and who it is from

#### **nroff**

**checknr(1)** – check nroff/troff files  
**colcrt(1)** – filter nroff output for terminal previewing  
**deroff(1)** – remove nroff/troff, tbl, and eqn constructs

**diffmk(1)** – mark differences between files  
**eqnchar(5)** – special character definitions for **eqn** and **neqn**  
**mm(1)** – format documents that contain **nroff** and **mm** formatting requests  
    **mm macros**  
**mptx(5)** – the macro package for formatting a permuted index  
**ms(5)** – text formatting macros  
**neqn(1)** – format mathematical text for **nroff**  
**nroff(1)** – text formatting language  
**nterm(5)** – terminal driving tables for **nroff**  
**soelim(1)** – eliminate .so's from **nroff** input  
**tbl(1)** – format tables for **nroff** or **troff**

**null device**  
    **null(7)** – the null device file

**numbers**  
    **arithmetic(6)** – provide drill in number facts  
    **number(6)** – convert Arabic numerals to English

**numeric sign**  
    **sign(3F)** – Fortran transfer-of-sign intrinsic function

**NVE**  
    **atlookup(1)** – look up network visible entities (NVEs) registered on the AppleTalk internet

**object file**  
    **a.out(4)** – common assembler and link editor output  
    **aouthdr(4)** – **a.out** header for common object files  
    **conv(1)** – swap bytes in COFF files  
    **cpset(1M)** – install files in specified directories  
    **dump(1)** – dump selected parts of an object file  
    **filehdr(4)** – file header for common object files  
    **ld(1)** – link editor for common object files  
    **ldclose(3X)** – close a common object file  
    **ldfcn(3X)** – common object file access routines  
    **ldfhread(3X)** – read the file header of a common object file  
    **ldgetname(3X)** – retrieve symbol name for object file symbol table entry  
    **ldlread(3X)** – manipulate line number entries of a common object file  
        function  
    **ldlseek(3X)** – seek to line number entries of a section of a common object file  
    **ldohseek(3X)** – seek to the optional file header of a common object file  
    **ldopen(3X)** – open a common object file for reading  
    **ldrseek(3X)** – seek to relocation entries of a section of a common object file  
    **ldshread(3X)** – read an indexed/named section header of a common

**object file**

`ldsseek(3X)` – seek to an indexed/named section of a common object file  
`ldtbindex(3X)` – compute index of a symbol table entry of a common object file  
`ldtbread(3X)` – read an indexed symbol table entry of a common object file  
`ldtbseek(3X)` – seek to the symbol table of a common object file  
`linenum(4)` – line number entries in a common object file  
`nlist(3C)` – get entries from name list  
`nm(1)` – display the symbol table of a common object file  
`reloc(4)` – relocation information for a common object file  
`scnhdr(4)` – section header for a common object file  
`strings(1)` – find the printable strings in an object or other binary file  
`syms(4)` – common object file symbol table format

**octal**

`od(1)` – convert binary data to a displayable form in octal, decimal, hexa-decimal, or ASCII

**online documentation**

`apropos(1)` – locate commands by keyword lookup  
`man(1)` – display the named manual page entries  
`man(5)` – macros for formatting entries in this manual  
`whatis(1)` – display a brief description for the named manual page entry  
`whereis(1)` – locate source, binary, and online help file for a command

**optimization**

`cc(1)` – C compiler  
`curses(3X)` – CRT screen handling and optimization package  
`curses5.0(3X)` – BSD-style screen functions with optimal cursor motion  
`dcopy(1M)` – copy file systems for optimal access time  
`kconfig(1M)` – tune kernel parameters for work-load optimization  
`prof(1)` – display profile data  
`profil(2)` – execution time profile  
`sadc(1M)` – system activity report package  
`tunefs(1M)` – tune an unmounted Berkeley 4.2 file system (UFS)

**overviews**

`acct(1M)` – overview of accounting commands  
`intro(1)` – introduction to commands and applications programs  
`intro(1M)` – introduction to system maintenance commands  
`intro(2)` – introduction to system calls and error numbers  
`intro(3)` – introduction to subroutines and libraries  
`intro(4)` – introduction to file formats  
`intro(5)` – introduction to miscellaneous facilities

intro(6) – introduction to games  
intro(7) – introduction to device drivers and interfaces  
intro(8) – introduction to commands executed from the A/UX Startup shell  
rcsintro(1) – introduction to RCS commands

**ownership, file**

- chown(1) – change the owner or group of a file
- chown(2) – change owner and group of a file
- ls(1) – list contents of directory

**packets**

- spray(1M) – spray packets
- spray(3N) – scatter data in order to check the network
- sprayd(1M) – spray server

**pagination**

- 4014(1) – filter text containing printer control sequences a page at a time
- daiw(1) – Apple ImageWriter II troff postprocessor filter
- daps(1) – Autologic APS-5 phototypesetter troff postprocessor
- enscript(1) – convert text files to format for printing
- mm(1) – format documents that contain nroff and mm formatting requests
  - mm macros
- mmt(1) – typeset documents
- mvt(1) – typeset view graphs and slides
- nroff(1) – text formatting language
- otroff(1) – text formatting and typesetting
- pr(1) – format text for a print device
- psdit(1) – convert troff intermediate format to POSTSCRIPT format
- psroff(1) – troff to a POSTSCRIPT printer
- roffbib(1) – run off bibliographic database
- troff(1) – text formatting and typesetting

**PAP**

- atprint(1) – copy data to a remote PAP server
- atstatus(1) – display status from a PAP server
- pap(3N) – AppleTalk Printer Access Protocol (PAP) interface

**parser**

- awk(1) – pattern scanning and processing language
- getopt(1) – parse command options
- lex(1) – generate programs for simple lexical tasks
- yacc(1) – yet another compiler-compiler

**partitions**

- bzb(4) – format of Block Zero Blocks
- dd(1) – convert and copy a file
- dp(1M) – perform disk partitioning

**dpm(4)** – format of disk partition map entries  
**getptabent(3)** – get partition table file entry  
**pname(1M)** – associate named partitions with device files  
**ptab(4)** – partition table file

#### **password file**

**finger(1)** – user information lookup program  
**getpwent(3C)** – get the password file entry  
**passwd(4)** – password file  
**putpwent(3C)** – write password file entry  
**pwck(1M)** – password/group file checkers  
**vipw(1M)** – edit the password file  
**yppasswdd(1M)** – server for modifying yellow pages password file

#### **passwords**

**crypt(1)** – encode/decode  
**getpass(3C)** – read a password  
**getpwent(3C)** – get the password file entry  
**passwd(1)** – change login password  
**putpwent(3C)** – write password file entry  
**yppasswd(1)** – change login password in yellow pages  
**yppasswd(3N)** – update user password in yellow pages

#### **pathnames**

**basename(1)** – isolate substrings within a pathname argument  
**pathconf(3P)** – get configurable pathname variables  
**whereis(1)** – locate source, binary, and online help file for a command

#### **patterns**

**awk(1)** – pattern scanning and processing language  
**grep(1)** – search a file for a pattern  
**regexp(5)** – regular expression compile and match routines

#### **pause**

**shl(1)** – shell layer manager  
**sigpause(2)** – release blocked signals and wait for interrupt  
**sigsuspend(3P)** – wait for a signal  
**sleep(1)** – suspend execution for an interval  
**sleep(3C)** – suspend execution for interval  
**tcdrain(3P)** – line control functions  
**wait(2)** – wait for child process to stop or terminate  
**wait3(2N)** – wait for child process to stop or terminate

#### **PDP-11 computer**

**swab(3C)** – swap bytes

**peer**  
    **getpeername(2N)** – get name of connected peer

**performance**

- cc(1)** – C compiler
- kconfig(1M)** – tune kernel parameters for work-load optimization
- monitor(3C)** – prepare execution profile
- nice(1)** – run a command at low priority
- prof(1)** – display profile data
- profil(2)** – execution time profile
- timex(1)** – time a command; report process data and system activity

**peripheral device files**

- dev\_kill(1M)** – remove devices files within a directory
- devnm(1M)** – device name
- mknod(1M)** – build device file
- pname(1M)** – associate named partitions with device files
- tty(1)** – get the terminal's name
- tty(7)** – controlling terminal interface

**permissions**

- chmod(1)** – change the permissions of a file
- chmod(2)** – change mode of file
- chown(1)** – change the owner or group of a file
- umask(2)** – set and get file creation mask

**permuted index**

- mptx(5)** – the macro package for formatting a permuted index

**pi**

- math(5)** – math functions and constants

**pipe**

- pipe(2)** – create an interprocess channel
- popen(3S)** – initiate pipe to/from a process
- tee(1)** – pipe fitting

**plotters**

- pac(1M)** – gathers printer/plotter accounting information

**plotting**

- graph(1G)** – draw a graph
- plot(3X)** – graphics interface subroutines
- plot(4)** – graphics interface
- spline(1G)** – interpolate smooth curve
- tplot(1G)** – interpret plotter instructions for use at a vintage display device

**portability**

`ar(1)` – archive and library maintainer for portable archives

`lint(1)` – a C program checker

`pax(1)` – copy files to or from an archive in an IEEE format

**ports**

`ct(1C)` – spawn `getty` to a remote terminal

`cu(1C)` – call another system

`getty(1M)` – set terminal type, modes, speed, and line discipline

`gettydefs(4)` – speed and terminal settings used by `getty`

`inittab(4)` – script for the `init` process

`kermit(1C)` – Kermit file transfer

`serial(7)` – the on-board serial ports

`setport(1M)` – set a serial port

`slattach(1M)` – attach serial lines as network interfaces

`slattconf(1M)` – attach and configure serial lines as network interfaces

`slip(1M)` – attach a dialup serial line as a network interface

`stty(1)` – set the modes for a terminal

`tip(1C)` – connect to a remote system

`tty(1)` – get the terminal's name

`ttytype(4)` – database of terminal types by port

`updater(1)` – update files between two machines

**Posix compatibility**

`setposix(3P)` – set POSIX compatibility flags

**posters, printing text for**

`banner(1)` – generate a poster

`banner7(1)` – generate a large banner

**PostScript**

`afm(4)` – Adobe POSTSCRIPT font metrics file format

`enscript(1)` – convert text files to format for printing

`postscript(4)` – POSTSCRIPT print file format

`psdit(1)` – convert `troff` intermediate format to POSTSCRIPT format

`psroff(1)` – `troff` to a POSTSCRIPT printer

`transcript(1M)` – TRANSCRIPT spooler filters for POSTSCRIPT printers

**power**

`powerdown(1M)` – power down the system

**preferences, Macintosh**

`changesize(1)` – change the fields of the SIZE resource of a file

`keyset(1M)` – set console keyboard mapping

`mactoiso(1)` – convert from Macintosh® encoding to International Standards Organization (ISO) encoding

`systemfolder(1)` – create a personal System Folder

**preprocessors, text**

awk(1) – pattern scanning and processing language  
col(1) – filter text containing printer control sequences for use at a display device  
comm(1) – select or reject lines common to two sorted files  
cpp(1) – the C language preprocessor  
cw(1) – prepare constant-width text for *otroff*  
daiw(1) – Apple ImageWriter II *troff* postprocessor filter  
daps(1) – Autologic APS-5 phototypesetter *troff* postprocessor  
deroff(1) – remove *nroff/troff*, *tbl*, and *eqn* constructs  
eqn(1) – format mathematical text for *troff*  
expand(1) – expand tabs to spaces, and vice versa  
fmt(1) – simple text formatter  
fold(1) – fold long lines for finite-width output device  
grap(1) – *pic* preprocessor for drawing graphs  
iw2(1) – Apple ImageWriter print filter  
iwprep(1) – prepare *troff* description files  
m4(1) – macro processor  
neqn(1) – format mathematical text for *nroff*  
pic(1) – *troff* preprocessor for drawing pictures  
pr(1) – format text for a print device  
rev(1) – reverse characters within each line of text  
soelim(1) – eliminate .*so*'s from *nroff* input  
sort(1) – sort or merge files  
ssp(1) – make output single spaced  
tabs(1) – set tabs on a terminal  
tbl(1) – format tables for *nroff* or *troff*  
uniq(1) – report repeated lines in a file

**pretty printing**

cb(1) – C program beautifier  
indent(1) – indent and format C program source

**Print Access Protocol**

atprint(1) – copy data to a remote PAP server  
atstatus(1) – display status from a PAP server  
pap(3N) – AppleTalk Printer Access Protocol (PAP) interface

**print spooler maintenance**

accept(1M) – allow *lp* requests  
enable(1) – enable or disable LP printers  
*lpadmin*(1M) – configure the *lp* spooling system  
*lpc*(1M) – line-printer control program  
*lpd*(1M) – 4.2 line-printer daemon  
*lpsched*(1M) – start or stop the LP request scheduler and move requests

**lpstat(1)** – print LP status information  
**lptest(1M)** – generate line-printer ripple pattern  
**reject(1M)** – prevent LP requests  
**transcript(1M)** – TRANSCRIPT spooler filters for POSTSCRIPT printers

**printer testing**

- lptest(1M)** – generate line-printer ripple pattern

**printers, general**

- accept(1M)** – allow lp requests
- asa(1)** – interpret ASA carriage control characters
- at\_cho\_prn(1)** – choose a default printer on the AppleTalk® internet
- enable(1)** – enable or disable LP printers
- lp(1)** – send or cancel requests to a line printer for a Berkeley file system (4.2)
  - lpadmin(1M)** – configure the lp spooling system
  - lpc(1M)** – line-printer control program
  - lpd(1M)** – 4.2 line-printer daemon
  - lpq(1)** – spool queue examination program
  - lpr(1)** – off line print
  - lprm(1)** – remove jobs from the line printer spooling queue for a Berkeley file system (4.2)
  - lpsched(1M)** – start or stop the LP request scheduler and move requests
  - lpstat(1)** – print LP status information
  - lptest(1M)** – generate line-printer ripple pattern
  - pac(1M)** – gathers printer/plotter accounting information
  - reject(1M)** – prevent LP requests

**printing, Appletalk**

- at\_cho\_prn(1)** – choose a default printer on the AppleTalk® internet
- atlookup(1)** – look up network visible entities (NVEs) registered on the AppleTalk internet
- atprint(1)** – copy data to a remote PAP server
- atstatus(1)** – display status from a PAP server

**printing files**

- lp(1)** – send or cancel requests to a line printer for a Berkeley file system (4.2)
  - lpq(1)** – spool queue examination program
  - lpr(1)** – off line print
  - lprm(1)** – remove jobs from the line printer spooling queue for a Berkeley file system (4.2)

**priority (process)**

- nice(1)** – run a command at low priority
- nice(2)** – change priority of a process

**process accounting**

- acct(2) – enable or disable process accounting
- acct(4) – per-process accounting file format
- acctcms(1M) – command summary from per-process accounting records
- acctcom(1M) – search and format process accounting files
- acctproc(1M) – process accounting
- lav(1) – display load average statistics
- prof(5) – profile within a function
- times(2) – get process and child process times

**process groups**

- getpid(2) – get process, process group, or parent process IDs
- killpg(3N) – send signal to a process group
- tcgetpgrp(3P) – get distinguished process group ID
- tcsetpgrp(3P) – set distinguished process group ID

**process IDs**

- getpid(2) – get process, process group, or parent process IDs
- ps(1) – report process status

**process limits**

- kconfig(1M) – tune kernel parameters for work-load optimization
- ulimit(2) – get and set user limits

**process priority**

- nice(1) – run a command at low priority
- nice(2) – change priority of a process

**process scheduling**

- alarm(2) – set a process's alarm clock
- at(1) – execute commands at a later time
- cron(1M) – clock daemon
- crontab(1) – user crontab utility
- nice(1) – run a command at low priority

**process termination**

- abort(3C) – generate an IOT fault
- abort(3F) – terminate Fortran program
- exit(2) – terminate process
- kill(1) – terminate a process
- killall(1M) – kill all active processes
- nohup(1) – run a command immune to hangups
- shutdown(1M) – close down the system at a given time

**processes, general**

- exit(2) – terminate process
- fork(2) – create a new process
- fuser(1M) – identify processes using a file or file structure
- getpid(2) – get process, process group, or parent process IDs

**init(1M)** – process control initialization  
**kill(1)** – terminate a process  
**kill(2)** – send a signal to a process or a group of processes  
**killall(1M)** – kill all active processes  
**killpg(3N)** – send signal to a process group  
**lockd(1M)** – process network lock daemon  
**nice(2)** – change priority of a process  
**pause(2)** – suspend process until signal  
**phys(2)** – allow a process to access physical addresses  
**pipe(2)** – create an interprocess channel  
**plock(2)** – lock process, text, or data in memory  
**popen(3S)** – initiate pipe to/from a process  
**ps(1)** – report process status  
**ptrace(2)** – process trace  
**setcompat(2)** – set or get process compatibility mode  
**wait(2)** – wait for child process to stop or terminate  
**wait3(2N)** – wait for child process to stop or terminate

**processes, monitoring**

- time(1)** – time a command
- timex(1)** – time a command; report process data and system activity

**processes, signaling**

- ipcrm(1)** – remove interprocess communications facilities
- kill(1)** – terminate a process

**processing unit**

- machid(1)** – provide truth value about processor type
- values(5)** – machine-dependent values

**processors, text**

- awk(1)** – pattern scanning and processing language
- col(1)** – filter text containing printer control sequences for use at a display device
- comm(1)** – select or reject lines common to two sorted files
- cpp(1)** – the C language preprocessor
- daiw(1)** – Apple ImageWriter II **troff** postprocessor filter
- daps(1)** – Autologic APS-5 phototypesetter **troff** postprocessor
- deroff(1)** – remove **nroff/troff**, **tbl**, and **eqn** constructs
- eqn(1)** – format mathematical text for **troff**
- expand(1)** – expand tabs to spaces, and vice versa
- fmt(1)** – simple text formatter
- fold(1)** – fold long lines for finite-width output device
- grap(1)** – **pic** preprocessor for drawing graphs
- iw2(1)** – Apple ImageWriter print filter
- iwprep(1)** – prepare **troff** description files

**m4(1)** – macro processor  
**neqn(1)** – format mathematical text for **nroff**  
**pic(1)** – **troff** preprocessor for drawing pictures  
**pr(1)** – format text for a print device  
**rev(1)** – reverse characters within each line of text  
**sort(1)** – sort or merge files  
**ssp(1)** – make output single spaced  
**tabs(1)** – set tabs on a terminal  
**tbl(1)** – format tables for **nroff** or **troff**  
**uniq(1)** – report repeated lines in a file

**program source**

**admin(1)** – create and administer SCCS files  
**cb(1)** – C program beautifier  
**cdc(1)** – change the delta commentary of an SCCS delta  
**ci(1)** – check in RCS revisions  
**co(1)** – check out RCS revisions  
**comb(1)** – combine SCCS deltas  
**get(1)** – get a version of an SCCS file  
**help(1)** – ask for help in using SCCS  
**ident(1)** – display RCS keywords and their values  
**indent(1)** – indent and format C program source  
**lint(1)** – a C program checker  
**make(1)** – maintain, update, and regenerate groups of files  
**prs(1)** – display information about an SCCS file  
**rcs(1)** – change RCS file attributes  
**rcsdiff(1)** – compare RCS revisions  
**rcsfile(4)** – format of an RCS file  
**rcsintro(1)** – introduction to RCS commands  
**rcsmerge(1)** – merge RCS revisions  
**rlog(1)** – display log messages and other information about RCS files  
**rmdel(1)** – remove a delta from an SCCS file  
**sact(1)** – display who has checked an SCCS file out for editing.  
**sccs(1)** – front end for the SCCS subsystem  
**sccsdiff(1)** – compare two versions of an SCCS file  
**sccsfile(4)** – format of an SCCS file  
**sccstorcs(1M)** – build RCS file from SCCS file  
**ucbdiff(1)** – differential file and directory comparator  
**ucbdiff3(1)** – 3-way differential file comparison  
**unget(1)** – undo a previous get of an SCCS file  
**val(1)** – validate SCCS file  
**what(1)** – identify SCCS files

**programming, general development tools**

adb(1) – debugger  
admin(1) – create and administer SCCS files  
ar(1) – archive and library maintainer for portable archives  
as(1) – common assembler  
bs(1) – a compiler/interpreter for modest-sized programs  
cdc(1) – change the delta commentary of an SCCS delta  
ci(1) – check in RCS revisions  
co(1) – check out RCS revisions  
comb(1) – combine SCCS deltas  
conv(1) – swap bytes in COFF files  
delta(1) – make a delta (change) to an SCCS file  
dis(1) – disassembler  
dump(1) – dump selected parts of an object file  
get(1) – get a version of an SCCS file  
help(1) – ask for help in using SCCS  
hex(1) – convert an object file to Motorola S-record format  
ld(1) – link editor for common object files  
lex(1) – generate programs for simple lexical tasks  
lorder(1) – find ordering relation for an object library  
make(1) – maintain, update, and regenerate groups of files  
mkshlib(1) – create shared library  
nm(1) – display the symbol table of a common object file  
od(1) – convert binary data to a displayable form in octal, decimal, hexa-  
decimal, or ASCII  
prof(1) – display profile data  
prs(1) – display information about an SCCS file  
rcs(1) – change RCS file attributes  
rcsdiff(1) – compare RCS revisions  
rcsintro(1) – introduction to RCS commands  
rcsmerge(1) – merge RCS revisions  
rcvhex(1) – receive and convert Motorola S-records from a port to a file  
regcmp(1) – regular expression compile  
rlog(1) – display log messages and other information about RCS files  
rmdel(1) – remove a delta from an SCCS file  
sact(1) – display who has checked an SCCS file out for editing.  
sccts(1) – front end for the SCCS subsystem  
sccsdiff(1) – compare two versions of an SCCS file  
sccstorcs(1M) – build RCS file from SCCS file  
sdb(1) – symbolic debugger  
size(1) – display section sizes of common object files  
strings(1) – find the printable strings in an object or other binary file

**strip(1)** – strip symbol and line number information from an object file  
**tsort(1)** – topological sort  
**unget(1)** – undo a previous get of an SCCS file  
**val(1)** – validate SCCS file  
**vc(1)** – version control  
**what(1)** – identify SCCS files  
**yacc(1)** – yet another compiler-compiler

**programming, Macintosh development tools**

**derez(1)** – decompile a resource file  
**rez(1)** – compile resources

**programming, shell**

**basename(1)** – isolate substrings within a pathname argument  
**echo(1)** – echo arguments  
**expr(1)** – evaluate arguments as an expression  
 **getopt(1)** – parse command options  
**line(1)** – read one line  
**macquery(1M)** – post a Macintosh® alert box to query the user  
**query(1)** – query the user for input  
**rev(1)** – reverse characters within each line of text  
**test(1)** – condition evaluation command  
**tput(1)** – query terminfo database  
**true(1)** – provide truth values

**programming, using C**

**cb(1)** – C program beautifier  
**cc(1)** – C compiler  
**cflow(1)** – generate C flowgraph  
**cpp(1)** – the C language preprocessor  
**ctags(1)** – maintain a tags file for a C program  
**ctrace(1)** – C program debugger  
**cxref(1)** – generate C program cross-reference  
**ident(1)** – display RCS keywords and their values  
**indent(1)** – indent and format C program source  
**lint(1)** – a C program checker  
**mkstr(1)** – create an error message file by massaging C source  
**xstr(1)** – extract strings from C programs to implement shared strings

**programming, using Fortran**

**asa(1)** – interpret ASA carriage control characters  
**efl(1)** – Extended Fortran Language  
**f77(1)** – Fortran 77 compiler  
**fpr(1)** – filter the output of Fortran programs for line printing  
**fsplit(1)** – split f77 or efl files

**programs, delaying running of**  
    **sleep(1)** – suspend execution for an interval

**programs, establishing times for running**  
    **at(1)** – execute commands at a later time  
    **cron(1M)** – clock daemon  
    **crontab(1)** – user crontab utility

**programs, installation utilities**  
    **cpset(1M)** – install files in specified directories  
    **finstall(1M)** – install A/UX commercial software from floppy disks  
    **install(1M)** – install files in specified directories

**programs, running Macintosh applications**  
    **launch(1)** – execute a Macintosh binary application

**programs, run-time environment settings**  
    **chroot(1M)** – change root directory for a command  
    **env(1)** – set environment for command execution  
    **nice(1)** – run a command at low priority  
    **nohup(1)** – run a command immune to hangups  
    **shl(1)** – shell layer manager  
    **yes(1)** – generate y entries in response to requests for input

**progress bar**  
    **StartMonitor(1M)** – display a progress bar during the A/UX® boot sequence

**queues**  
    **insque(3N)** – insert/remove element from a queue  
    **lpq(1)** – spool queue examination program  
    **mailq(1M)** – list the contents of the mail queue  
    **msgctl(2)** – message control operations  
    **msgget(2)** – get message queue  
    **msgop(2)** – message operations

**quiz**  
    **quiz(6)** – test your knowledge

**rain**  
    **rain(6)** – animated raindrops display

**random numbers**  
    **drand48(3C)** – generate uniformly distributed pseudo-random numbers  
    **rand(3C)** – simple random-number generator  
    **rand(3F)** – Fortran uniform random-number generator

**random text generation**  
    **fortune(6)** – print a random, hopefully interesting, adage

## RCS

ci(1) – check in RCS revisions  
co(1) – check out RCS revisions  
ident(1) – display RCS keywords and their values  
merge(1) – three-way file merge  
rcs(1) – change RCS file attributes  
rcsdiff(1) – compare RCS revisions  
rcsfile(4) – format of an RCS file  
rcsintro(1) – introduction to RCS commands  
rcsmerge(1) – merge RCS revisions  
rlog(1) – display log messages and other information about RCS files  
sccstorcs(1M) – build RCS file from SCCS file  
ucbdiff(1) – differential file and directory comparator  
ucbdiff3(1) – 3-way differential file comparison

## reading files

cat(1) – concatenate and display the contents of named files  
fread(3S) – binary input/output  
getc(3S) – get character or word from a stream  
head(1) – give first few lines  
line(1) – read one line  
more(1) – show the contents of a file in display-size chunks  
pg(1) – show the contents of a file in display-size chunks  
read(2) – read from file  
soelim(1) – eliminate . so's from nroff input  
tail(1) – deliver the last part of a file

## real group IDs

getuid(2) – get real and effective user IDs and group IDs  
setregid(2) – set real and effective group ID

## real numbers

aint(3F) – Fortran integer part intrinsic function

## real user IDs

getuid(2) – get real and effective user IDs and group IDs  
setreuid(2) – set real and effective user ID  
setsid(2P) – create session and set process group ID

## records, processing

colrm(1) – remove columns from a file  
comm(1) – select or reject lines common to two sorted files  
cut(1) – cut out selected fields of each line of a file  
join(1) – relational database operator  
paste(1) – merge lines of several files or subsequent lines of one file  
sort(1) – sort or merge files  
uniq(1) – report repeated lines in a file

**redirection of output or input**

- `cat(1)` – concatenate and display the contents of named files
- `csh(1)` – run the C shell, a command interpreter with C-like syntax
- `ksh(1)` – run the Korn shell, a command interpreter compatible with Bourne shell
- `sh(1)` – run the Bourne shell, the earliest of the command interpreters available
- `tee(1)` – pipe fitting

**regular expressions**

- `grep(1)` – search a file for a pattern
- `regcmp(1)` – regular expression compile
- `regcmp(3X)` – compile and execute a regular expression
- `regexp(5)` – regular expression compile and match routines

**relational joining of files**

- `join(1)` – relational database operator

**relocation**

- `reloc(4)` – relocation information for a common object file

**remainders**

- `floor(3M)` – floor, ceiling, remainder, absolute value functions
- `mod(3F)` – Fortran remaindering intrinsic functions

**reminder service**

- `calendar(1)` – reminder service
- `leave(1)` – remind you when you have to leave

**Remote Procedure Calling**

- `getrpcnt(3N)` – get RPC entry
- `getrpcport(3N)` – get RPC port number
- `nfsstat(1M)` – Network File System statistics
- `portmap(1M)` – DARPA port to RPC program number mapper
- `rpc(3N)` – library routines for remote procedure calls
- `rpc(4)` – RPC program number database
- `rpcinfo(1M)` – report RPC information
- `rup(1N)` – show status of machines on local network (RPC version)
- `rusers(1N)` – give login list for local machines (RPC version)
- `rusersd(1M)` – rusers server
- `spray(1M)` – spray packets
- `spray(3N)` – scatter data in order to check the network
- `sprayd(1M)` – spray server

**remote systems**

- `atprint(1)` – copy data to a remote PAP server
- `ct(1C)` – spawn getty to a remote terminal
- `cu(1C)` – call another system
- `mount(3N)` – keep track of remotely mounted file systems

**phones(4)** – remote host telephone number database  
**rcmd(3N)** – routines for returning a stream to a remote command  
**rcp(1C)** – remote file copy  
**rdist(1)** – remote file distribution program  
**remlogin(1N)** – remote sign on  
**remote(4)** – remote host description file  
**remsh(1N)** – remote shell  
**remshd(1M)** – remote shell server  
**restore(1M)** – copy files from a dump . bsd archive into an existing file system  
**rexec(3N)** – return stream to a remote command  
**rexecd(1M)** – remote execution server  
**rhosts(4N)** – trusted hosts file format  
**rlogin(1N)** – remote login  
**rlogind(1M)** – remote login server  
**rmtab(4)** – remotely mounted file system table  
**rnusers(3N)** – return information about users on remote machines  
**rpc(3N)** – library routines for remote procedure calls  
**rup(1N)** – show status of machines on local network (RPC version)  
**rusers(1N)** – give login list for local machines (RPC version)  
**rusersd(1M)** – rusers server  
**rwall(3N)** – write to specified remote machines  
**showmount(1M)** – show all remote mounts  
**talkd(1M)** – remote user communication server  
**tip(1C)** – connect to a remote system  
**uucp(1C)** – UNIX® system to UNIX system copy  
**uusend(1C)** – send a file to a remote host  
**uuxqt(1M)** – UUCP execution file interpreter  
**xdr(3N)** – library routines for external data representation

**removing**

**colrm(1)** – remove columns from a file  
**cut(1)** – cut out selected fields of each line of a file  
**deroff(1)** – remove nroff/troff, tbl, and eqn constructs  
**dev\_kill(1M)** – remove devices files within a directory  
**flock(2)** – apply or remove an advisory lock on an open file  
**insque(3N)** – insert/remove element from a queue  
**ipcrm(1)** – remove interprocess communications facilities  
**kill(1)** – terminate a process  
**killall(1M)** – kill all active processes  
**lprm(1)** – remove jobs from the line printer spooling queue for a Berkeley file system (4.2)  
**rm(1)** – remove files or directories

`rmdelta(1)` – remove a delta from an SCCS file  
`rmdir(2)` – remove a directory file  
`unlink(2)` – remove directory entry  
`umount(2)` – remove a file system

#### repairing file systems

`autorecovery(8)` – file-system repair procedure  
`clri(1M)` – clear inode  
`esch(8)` – validate and repair file systems from the A/UX StartupShell  
`fsck(1M)` – check file-system consistency and interactively repair  
`fsdb(1M)` – debug the file system  
`ncheck(1M)` – locate the filename associated with an i-node

#### repeated lines in text

`uniq(1)` – report repeated lines in a file

#### resources, Macintosh

`derez(1)` – decompile a resource file  
`fcnvt(1)` – convert a resource file to another format  
`rez(1)` – compile resources  
`settc(1)` – set the type and creator of a Macintosh resource file

#### reversing characters within lines

`rev(1)` – reverse characters within each line of text

#### Revision Control System

`ci(1)` – check in RCS revisions  
`co(1)` – check out RCS revisions  
`ident(1)` – display RCS keywords and their values  
`merge(1)` – three-way file merge  
`rcs(1)` – change RCS file attributes  
`rcsdiff(1)` – compare RCS revisions  
`rcsfile(4)` – format of an RCS file  
`rcsintro(1)` – introduction to RCS commands  
`rcsmerge(1)` – merge RCS revisions  
`rlog(1)` – display log messages and other information about RCS files  
`sccstorcs(1M)` – build RCS file from SCCS file  
`ucbdiff(1)` – differential file and directory comparator  
`ucbdiff3(1)` – 3-way differential file comparison

#### robots

`autorobots(6)` – escape from the automatic robots  
`chase(6)` – try to escape the killer robots  
`robots(6)` – escape from the robots

#### root directory

`chroot(1M)` – change root directory for a command  
`chroot(2)` – change root directory

**rounding**

**round(3F)** – Fortran nearest integer functions

**routing tables**

**route(1M)** – manually manipulate the routing tables

**routed(1M)** – network routing daemon

**RPC**

**getrpcent(3N)** – get RPC entry

**getrpcport(3N)** – get RPC port number

**nfsstat(1M)** – Network File System statistics

**portmap(1M)** – DARPA port to RPC program number mapper

**rpc(3N)** – library routines for remote procedure calls

**rpc(4)** – RPC program number database

**rpcinfo(1M)** – report RPC information

**rup(1N)** – show status of machines on local network (RPC version)

**rusers(1N)** – give login list for local machines (RPC version)

**rusersd(1M)** – rusers server

**spray(1M)** – spray packets

**spray(3N)** – scatter data in order to check the network

**sprayd(1M)** – spray server

**run queue**

**lav(1)** – display load average statistics

**running Macintosh applications from the command line**

**launch(1)** – execute a Macintosh binary application

**SC40 Tape Backup**

**tc(7)** – Apple Tape Backup 40SC device driver

**tcb(1)** – block data to 8K for tc output

**SCCS**

**admin(1)** – create and administer SCCS files

**cdc(1)** – change the delta commentary of an SCCS delta

**comb(1)** – combine SCCS deltas

**delta(1)** – make a delta (change) to an SCCS file

**get(1)** – get a version of an SCCS file

**help(1)** – ask for help in using SCCS

**prs(1)** – display information about an SCCS file

**rmdel(1)** – remove a delta from an SCCS file

**sact(1)** – display who has checked an SCCS file out for editing.

**sccs(1)** – front end for the SCCS subsystem

**sccsdiff(1)** – compare two versions of an SCCS file

**sccsfile(4)** – format of an SCCS file

**sccstorcs(1M)** – build RCS file from SCCS file

**unget(1)** – undo a previous get of an SCCS file

**val(1)** – validate SCCS file

**vc(1)** – version control  
**what(1)** – identify SCCS files

**SCCS deltas**

- c当地(1)** – change the delta commentary of an SCCS delta
- comb(1)** – combine SCCS deltas
- delta(1)** – make a delta (change) to an SCCS file
- r当地el(1)** – remove a delta from an SCCS file
- sact(1)** – display who has checked an SCCS file out for editing.

**screen management**

- clear(1)** – clear terminal screen
- col(1)** – filter text containing printer control sequences for use at a display device
  - colc当地t(1)** – filter nroff output for terminal previewing
  - curses(3X)** – CRT screen handling and optimization package
  - curses5.0(3X)** – BSD-style screen functions with optimal cursor motion
  - ul(1)** – filter special underlining sequences imbedded in text for use at a display device

**screen processing**

- 300(1)** – filter text containing printer control sequences for a DASI terminal
- 4014(1)** – filter text containing printer control sequences a page at a time
- 450(1)** – filter text containing printer control sequences for the DASI terminal
- tc(1)** – interpret troff output for use at a vintage display device

**searching**

- bsearch(3C)** – binary search a sorted table
- grep(1)** – search a file for a pattern
- hsearch(3C)** – manage hash search tables
- lsearch(3C)** – linear search and update
- tsearch(3C)** – manage binary search trees

**searching text**

- freq(1)** – report on character frequencies in a file
- grep(1)** – search a file for a pattern
- lookbib(1)** – find references in a bibliography
- wc(1)** – word count

**segments**

- a.out(4)** – common assembler and link editor output
- brk(2)** – change data segment space allocation
- end(3C)** – last locations in program

## **semaphores**

*ipcrm(1)* – remove interprocess communications facilities  
*ipcs(1)* – report interprocess communication facilities status  
*semctl(2)* – semaphore control operations  
*semget(2)* – get set of semaphores  
*semop(2)* – semaphore operations

## **serial communications**

*ct(1C)* – spawn *getty* to a remote terminal  
*cu(1C)* – call another system  
*getty(1M)* – set terminal type, modes, speed, and line discipline  
*gettydefs(4)* – speed and terminal settings used by *getty*  
*inittab(4)* – script for the *init* process  
*kermit(1C)* – Kermit file transfer  
*serial(7)* – the on-board serial ports  
*setport(1M)* – set a serial port  
*slattach(1M)* – attach serial lines as network interfaces  
*slattconf(1M)* – attach and configure serial lines as network interfaces  
*slip(1M)* – attach a dialup serial line as a network interface  
*stty(1)* – set the modes for a terminal  
*tip(1C)* – connect to a remote system  
*tty(1)* – get the terminal's name  
*ttytype(4)* – database of terminal types by port  
*updater(1)* – update files between two machines  
*uucp(1C)* – UNIX® system to UNIX system copy  
*uuencode(1C)* – encode/decode a binary file for transmission via mail  
*uusend(1C)* – send a file to a remote host  
*uustat(1C)* – uucp status inquiry and job control  
*uuto(1C)* – public UNIX-to-UNIX system file copy  
*uux(1C)* – UNIX-to-UNIX system command execution

## **Serial Line Internet Protocol**

*dslipuser(1M)* – display the current state of *slip* lines on a *slip* server  
*mkslipuser(1M)* – initialize the *slip* user database  
*slip(1M)* – attach a dialup serial line as a network interface  
*slip.config(4)* – list of *slip* interfaces supported by a *slip* server  
*slip.hosts(4)* – map user names to host addresses of *slip* client  
*slip.user(4)* – user file created by *mkslipuser*

## **servers**

*comsat(1M)* – server for *biff(1)*  
*fingerd(1M)* – remote user information server  
*ftpd(1M)* – Internet File Transfer Protocol server  
*inetd(1M)* – Internet services daemon

mountd(1M) – NFS mount request server  
named(1M) – Internet domain name server  
portmap(1M) – DARPA port to RPC program number mapper  
remshd(1M) – remote shell server  
rexecd(1M) – remote execution server  
rlogind(1M) – remote login server  
rstatd(1M) – kernel statistics server  
rusersd(1M) – rusers server  
rwalld(1M) – network rwall server  
rwhod(1M) – system status server  
servers(4) – Internet server database  
slip.config(4) – list of slip interfaces supported by a slip server  
sprayd(1M) – spray server  
talkd(1M) – remote user communication server  
telnetd(1M) – DARPA TELNET protocol server  
tftpd(1M) – DARPA Trivial File Transfer Protocol server  
ypasswdd(1M) – server for modifying yellow pages password file  
ypoll(1M) – what version of a YP map is at a YP server host  
ypserv(1M) – yellow pages server and binder processes  
ypset(1M) – point ypbnd at a particular server  
ypwhich(1) – which host is the YP server or map master?  
ypxfr(1M) – transfer a YP map from some YP server to here

**services**

getservent(3N) – get service entry  
services(4N) – service name database

**session status**

logname(1) – get login name  
printenv(1) – display the value of variables set in the current environment  
ps(1) – report process status  
pwd(1) – print working directory name  
tty(1) – get the terminal's name  
whoami(1) – print effective current user ID

**session, terminal**

chsh(1) – change default login shell  
CommandShell(1) – A/UX® Toolbox application for managing command-interpretation windows and moderating access to the A/UX console window  
csh(1) – run the C shell, a command interpreter with C-like syntax  
ksh(1) – run the Korn shell, a command interpreter compatible with Bourne shell  
Login(1M) – present a Macintosh® login dialog box when called by

init

rlogin(1N) – remote login

script(1) – start a shell that records terminal input and output

sh(1) – run the Bourne shell, the earliest of the command interpreters available

shl(1) – shell layer manager

telnet(1C) – user interface to the TELNET protocol

**session, user interface preferences**

chsh(1) – change default login shell

CommandShell(1) – A/UX® Toolbox application for managing command-interpretation windows and moderating access to the A/UX console window

Login(1M) – present a Macintosh® login dialog box when called by init

**shared memory**

mkshlib(1) – create shared library

shmctl(2) – shared memory control operations

shmget(2) – get shared memory segment

shmop(2) – shared memory operations

**shared strings**

xstr(1) – extract strings from C programs to implement shared strings

**shell programming, boolean operations**

test(1) – condition evaluation command

true(1) – provide truth values

**shell programming, expression evaluation**

basename(1) – isolate substrings within a pathname argument

echo(1) – echo arguments

expr(1) – evaluate arguments as an expression

getopt(1) – parse command options

rev(1) – reverse characters within each line of text

**shell programming, input and output operations**

line(1) – read one line

macquery(1M) – post a Macintosh® alert box to query the user

query(1) – query the user for input

tput(1) – query terminfo database

**shells**

chsh(1) – change default login shell

csh(1) – run the C shell, a command interpreter with C-like syntax

ksh(1) – run the Korn shell, a command interpreter compatible with Bourne shell

remsh(1N) – remote shell

remshd(1M) – remote shell server

sh(1) – run the Bourne shell, the earliest of the command interpreters available  
shl(1) – shell layer manager  
StartupShell(8) – a command interpreter accessible from within the A/UX Startup application  
system(3F) – issue a shell command from Fortran  
system(3S) – issue a shell command

**shutdown**

- powerdown(1M) – power down the system
- shutdown(1M) – close down the system at a given time

**sign, numeric**

- sign(3F) – Fortran transfer-of-sign intrinsic function

**signal stack**

- sigstack(2) – set or get signal stack context

**signals**

- ipcrm(1) – remove interprocess communications facilities
- kill(1) – terminate a process
- kill(2) – send a signal to a process or a group of processes
- killpg(3N) – send signal to a process group
- pause(2) – suspend process until signal
- set42sig(3) – set 4.2 BSD signal interface
- sigaction(3P) – examine or change signal action
- sigblock(2) – block signals
- signal(3) – specify what to do upon receipt of a signal
- signal(3F) – specify Fortran action on receipt of a system signal
- sigpause(2) – release blocked signals and wait for interrupt
- sigpending(2P) – examine pending signals
- sigprocmask(3P) – examine and change blocked signals
- sigsetmask(2) – set current signal mask
- sigsetops(3P) – manipulate signal sets
- sigstack(2) – set or get signal stack context
- sigsuspend(3P) – wait for a signal
- sigvec(2) – optional BSD-compatible software signal facilities
- ssignal(3C) – software signals

**sine**

- sin(3F) – Fortran sine intrinsic function
- sinh(3F) – Fortran hyperbolic sine intrinsic function
- sinh(3M) – hyperbolic functions
- trig(3M) – trigonometric functions

**single-spaced text**

  ssp(1) – make output single spaced  
  slides

  mv(5) – a troff macro package for typesetting viewgraphs and slides

  mvt(1) – typeset view graphs and slides

**SL/IP**

  dslipuser(1M) – display the current state of slip lines on a slip server

  mkslipuser(1M) – initialize the slip user database

  slip(1M) – attach a dialup serial line as a network interface

  slip.config(4) – list of slip interfaces supported by a slip server

  slip.hosts(4) – map user names to host addresses of slip client

  slip.user(4) – user file created by mkslipuser

**SNOBOL**

  sno(1) – SNOBOL interpreter

**SNOBOL programming**

  sno(1) – SNOBOL interpreter

**".so" macro**

  soelim(1) – eliminate .so's from nroff input

**sockets**

  accept(2N) – accept a connection on a socket

  appletalk(7) – general AppleTalk socket interface and STREAMS controls

  bind(2N) – bind a name to a socket

  connect(2N) – initiate a connection on a socket

  getpeername(2N) – get name of connected peer

  getsockname(2N) – get socket name

  getsockopt(2N) – get and set options on sockets

  listen(2N) – listen for connections on a socket

  recv(2N) – receive a message from a socket

  send(2N) – send a message from a socket

  shutdown(2N) – shut down part of a full-duplex connection

  socket(2N) – create an endpoint for communication

**software loopback**

  lo(5) – software loopback network interface

**sorting**

  lorder(1) – find ordering relation for an object library

  qsort(3C) – quicker sort

  sort(1) – sort or merge files

  sortbib(1) – sort bibliographic database

  tsort(1) – topological sort

## **Source Code Control System**

admin(1) – create and administer SCCS files  
cdc(1) – change the delta commentary of an SCCS delta  
comb(1) – combine SCCS deltas  
delta(1) – make a delta (change) to an SCCS file  
get(1) – get a version of an SCCS file  
help(1) – ask for help in using SCCS  
prs(1) – display information about an SCCS file  
rmdel(1) – remove a delta from an SCCS file  
sact(1) – display who has checked an SCCS file out for editing.  
sccs(1) – front end for the SCCS subsystem  
sccsdiff(1) – compare two versions of an SCCS file  
sccsfile(4) – format of an SCCS file  
sccstorcs(1M) – build RCS file from SCCS file  
unget(1) – undo a previous get of an SCCS file  
val(1) – validate SCCS file  
what(1) – identify SCCS files

## **source text management**

admin(1) – create and administer SCCS files  
cb(1) – C program beautifier  
cdc(1) – change the delta commentary of an SCCS delta  
ci(1) – check in RCS revisions  
co(1) – check out RCS revisions  
comb(1) – combine SCCS deltas  
get(1) – get a version of an SCCS file  
help(1) – ask for help in using SCCS  
ident(1) – display RCS keywords and their values  
indent(1) – indent and format C program source  
lint(1) – a C program checker  
make(1) – maintain, update, and regenerate groups of files  
prs(1) – display information about an SCCS file  
rcs(1) – change RCS file attributes  
rcsdiff(1) – compare RCS revisions  
rcsfile(4) – format of an RCS file  
rcsintro(1) – introduction to RCS commands  
rcsmerge(1) – merge RCS revisions  
rlog(1) – display log messages and other information about RCS files  
rmdel(1) – remove a delta from an SCCS file  
sact(1) – display who has checked an SCCS file out for editing.  
sccs(1) – front end for the SCCS subsystem  
sccsdiff(1) – compare two versions of an SCCS file  
sccsfile(4) – format of an SCCS file

**sccstorcs(1M)** – build RCS file from SCCS file  
**ucbdiff(1)** – differential file and directory comparator  
**ucbdiff3(1)** – 3-way differential file comparison  
**unget(1)** – undo a previous get of an SCCS file  
**val(1)** – validate SCCS file  
**what(1)** – identify SCCS files

**spaces (in text)**  
    **expand(1)** – expand tabs to spaces, and vice versa

**spelling**  
    **spell(1)** – find spelling errors

**spline curves**  
    **spline(1G)** – interpolate smooth curve

**spooler management**  
    **accept(1M)** – allow lp requests  
    **enable(1)** – enable or disable LP printers  
    **lpadmin(1M)** – configure the lp spooling system  
    **lpc(1M)** – line-printer control program  
    **lpd(1M)** – 4.2 line-printer daemon  
    **lpq(1)** – spool queue examination program  
    **lpr(1)** – off line print  
    **lprm(1)** – remove jobs from the line printer spooling queue for a Berkeley file system (4.2)  
    **lpsched(1M)** – start or stop the LP request scheduler and move requests  
    **lpstat(1)** – print LP status information  
    **lptest(1M)** – generate line-printer ripple pattern  
    **reject(1M)** – prevent LP requests  
    **transcript(1M)** – TRANSCRIPT spooler filters for POSTSCRIPT printers  
    **uuclean(1M)** – clean up the uucp spool directory  
    **uustat(1C)** – uucp status inquiry and job control  
    **uusub(1M)** – monitor UUCP network

**spraying**  
    **spray(1M)** – spray packets  
    **spray(3N)** – scatter data in order to check the network  
    **sprayd(1M)** – spray server

**square root**  
    **exp(3F)** – Fortran exponential intrinsic function  
    **exp(3M)** – exponential, logarithm, power, and square root functions  
    **sqrt(3F)** – Fortran square root intrinsic function

**standard units**  
    **units(1)** – conversion program

## **Star Trek**

**trek(6)** – trekkie game

### **startup**

**boot(8)** – startup procedures

**brc(1M)** – system initialization shell scripts

**init(1M)** – process control initialization

**inittab(4)** – script for the init process

**intro(8)** – introduction to commands executed from the A/UX Startup  
shell

**killall(1M)** – kill all active processes

**login(1)** – sign on

**Login(1M)** – present a Macintosh® login dialog box when called by  
init

**newgrp(1)** – login to a new group

**powerdown(1M)** – power down the system

**reboot(1M)** – reboot the operating system

**reboot(2)** – reboot system or halt processor

**shutdown(1M)** – close down the system at a given time

**StartMonitor(1M)** – display a progress bar during the A/UX® boot  
sequence

**startmsg(1M)** – send messages to StartMonitor during the A/UX®  
boot process

**startup(1M)** – run startup programs at boot time

**StartupShell(8)** – a command interpreter accessible from within the  
A/UX Startup application

### **statistics**

**ff(1M)** – list file names and statistics for a file system

**lav(1)** – display load average statistics

**ncstats(1M)** – display kernel name cache statistics

**nfsstat(1M)** – Network File System statistics

**rstatd(1M)** – kernel statistics server

**statfs(2)** – get file-system statistics

**ustat(2)** – get file system statistics

### **status**

**hostname(1N)** – set or display the name of the current host system

**last(1)** – display login and logout times for each user of the system

**lpq(1)** – spool queue examination program

**lpstat(1)** – print LP status information

**mount(1M)** – mount and dismount file systems

**netstat(1N)** – show network status

**ps(1)** – report process status

**pstat(1M)** – print system facts

ruptime(1N) – show host status of local machines  
rwhod(1M) – system status server  
showmount(1M) – show all remote mounts  
tty(1) – get the terminal's name  
uptime(1) – show how long system has been up  
users(1) – compact list of users who are on the system  
w(1) – who is on and what they are doing?  
who(1) – who is on the system?  
whoami(1) – print effective current user ID  
whodo(1M) – who is doing what

**status, file system**

df(1) – report number of free disk blocks  
du(1) – summarize disk usage

**status, session**

logname(1) – get login name  
printenv(1) – display the value of variables set in the current environment  
ps(1) – report process status  
pwd(1) – print working directory name  
tty(1) – get the terminal's name  
whoami(1) – print effective current user ID

**status, system**

finger(1) – user information lookup program  
groups(1) – show group memberships  
hostid(1N) – set or display the identifier of the current host system  
hostname(1N) – set or display the name of the current host system  
id(1) – display user and group IDs and names  
last(1) – display login and logout times for each user of the system  
machid(1) – provide truth value about processor type  
pagesize(1) – display system page size  
uname(1) – display identification information about the current system  
uptime(1) – show how long system has been up  
users(1) – compact list of users who are on the system  
w(1) – who is on and what they are doing?  
who(1) – who is on the system?  
whodo(1M) – who is doing what

**streams (data)**

fclose(3S) – close or flush a stream  
ferror(3S) – stream status inquiries  
fopen(3S) – open a stream  
forwarder(7) – forwarder device driver  
fread(3S) – binary input/output

**fseek(3S)** – reposition a file pointer in a stream  
**getc(3S)** – get character or word from a stream  
**gets(3S)** – get a string from a stream  
**line\_push(3)** – routine used to push streams line disciplines  
**line\_sane(1M)** – push streams line disciplines  
**printf(3S)** – format and output string and numeric data  
**putc(3S)** – put character or word on a stream  
**puts(3S)** – put a string on a stream  
**rcmd(3N)** – routines for returning a stream to a remote command  
**rexec(3N)** – return stream to a remote command  
**scanf(3S)** – convert formatted input  
**setbuf(3S)** – assign buffering to a stream  
**streams(7)** – an interface for character I/O  
**ungetc(3S)** – push character back into input stream

**strings**

**atof(3C)** – convert ASCII string to floating-point number  
**basename(1)** – isolate substrings within a pathname argument  
**bstring(3)** – bit and byte string operations  
**ecvt(3C)** – convert floating-point number to string  
**gets(3S)** – get a string from a stream  
**grep(1)** – search a file for a pattern  
**index(3F)** – return location of Fortran substring  
**len(3F)** – return length of Fortran string  
**lge(3F)** – string comparision intrinsic functions  
**puts(3S)** – put a string on a stream  
**rev(1)** – reverse characters within each line of text  
**string(3C)** – string operations  
**strings(1)** – find the printable strings in an object or other binary file  
**strtod(3C)** – convert string to double-precision number  
**strtol(3C)** – convert string to integer  
**xstr(1)** – extract strings from C programs to implement shared strings

**subroutines**

**intro(3)** – introduction to subroutines and libraries

**subtraction**

**dim(3F)** – Fortran positive difference intrinsic functions

**superblock**

**fsck(1M)** – check file-system consistency and interactively repair  
**inode(4)** – format of a System V inode  
**mkfs(1M)** – construct an SVFS file system  
**svfs(4)** – format of a System V system volume  
**sync(1)** – update the superblock  
**sync(2)** – update superblock

**ufs(4)** – format of a UFS file-system volume

**suspend execution**

shl(1) – shell layer manager

sigpause(2) – release blocked signals and wait for interrupt

sigsuspend(3P) – wait for a signal

sleep(1) – suspend execution for an interval

sleep(3C) – suspend execution for interval

tcdrain(3P) – line control functions

wait(2) – wait for child process to stop or terminate

wait3(2N) – wait for child process to stop or terminate

**SVFS**

dir(4) – format of System V directories

inode(4) – format of a System V inode

mkfs(1M) – construct an SVFS file system

svfs(4) – format of a System V system volume

**swapping (memory)**

swab(3C) – swap bytes

swap(1M) – add or delete disk blocks to or from the swap area

**symbol table**

ldgetname(3X) – retrieve symbol name for object file symbol table entry

ltdbindex(3X) – compute index of a symbol table entry of a common  
object file

ltdtbread(3X) – read an indexed symbol table entry of a common object  
file

ltdtbseek(3X) – seek to the symbol table of a common object file

nlist(3C) – get entries from name list

nm(1) – display the symbol table of a common object file

strip(1) – strip symbol and line number information from an object file

syms(4) – common object file symbol table format

**synchronization**

select(2N) – synchronous I/O multiplexing

**system activity**

acct(1M) – overview of accounting commands

acctcms(1M) – command summary from per-process accounting records

acctcom(1M) – search and format process accounting files

acctcon(1M) – connect-time accounting

acctmerg(1M) – merge or add total accounting files

acctprc(1M) – process accounting

acctsh(1M) – shell procedures for accounting

diskusg(1M) – generate disk accounting data by user ID

fwttmp(1M) – manipulate connect accounting records

ipcs(1) – report interprocess communication facilities status

**lav(1)** – display load average statistics  
**pac(1M)** – gathers printer/plotter accounting information  
**ps(1)** – report process status  
**runacct(1M)** – run daily accounting  
**sadc(1M)** – system activity report package  
**sag(1G)** – system activity graph  
**sar(1)** – system activity reporter  
**sysline(1)** – display system status on status line of a terminal  
**timex(1)** – time a command; report process data and system activity  
**w(1)** – who is on and what they are doing?  
**whodo(1M)** – who is doing what

**system administration, backing up file systems**

**bcopy(1M)** – interactive block copy  
**dcopy(1M)** – copy file systems for optimal access time  
**dump . bsd(1M)** – copy the files within the named file system to a  
    dump . bsd archive  
**escher(1M)** – autorecovery administration  
**eu(1M)** – update autorecovery files  
**eupdate(1M)** – update important files for autorecovery purposes  
**finc(1M)** – fast incremental backup  
**frec(1M)** – recover files from a backup tape  
**restore(1M)** – copy files from a dump . bsd archive into an existing file  
    system  
**volcopy(1M)** – copy file systems with label checking

**system administration, file systems**

**clri(1M)** – clear inode  
**devnm(1M)** – device name  
**df(1)** – report number of free disk blocks  
**du(1)** – summarize disk usage  
**ff(1M)** – list file names and statistics for a file system  
**fsck(1M)** – check file-system consistency and interactively repair  
**fsdb(1M)** – debug the file system  
**fsentry(1M)** – create a file-system-table entry  
**fsirand(1M)** – install random inode generation numbers  
**fsstat(1M)** – report file-system state  
**fstyp(1)** – report file-system type  
**fuser(1M)** – identify processes using a file or file structure  
**mkfs1b(1M)** – construct a file system with 512-byte blocks  
**mkfs(1M)** – construct an SVFS file system  
**mklost+found(1M)** – make a lost+found directory for fsck  
**mount(1M)** – mount and dismount file systems  
**ncheck(1M)** – locate the filename associated with an i-node

**newfs(1M)** – construct a new UFS file system  
**sync(1)** – update the superblock  
**tunefs(1M)** – tune an unmounted Berkeley 4.2 file system (UFS)

**system administration, general**

**badblk(1M)** – set or update bad block information  
**checkinstall(1)** – check installation of boards  
**chgnod(1M)** – change current A/UX system nodename  
**diskformat(1M)** – format a disk through a driver-dependent format operation  
**dp(1M)** – perform disk partitioning  
**getty(1M)** – set terminal type, modes, speed, and line discipline  
**line\_sane(1M)** – push streams line disciplines  
**pname(1M)** – associate named partitions with device files  
**setport(1M)** – set a serial port  
**settimezone(1M)** – set the local time zone  
**swap(1M)** – add or delete disk blocks to or from the swap area  
**tic(1M)** – terminfo compiler  
**tset(1)** – set or reset the terminal to a sensible state  
**tty\_add(1M)** – modify the /etc/inittab file  
**tzdump(1M)** – time zone dumper  
**tzic(1M)** – time zone compiler

**system administration, installing software**

**cpset(1M)** – install files in specified directories  
**finstall(1M)** – install A/UX commercial software from floppy disks  
**install(1M)** – install files in specified directories

**system administration, kernel**

**autoconfig(1M)** – build a new up-to-date kernel  
**kconfig(1M)** – tune kernel parameters for work-load optimization  
**module\_dump(1M)** – identify configuration information stored within the named kernel file  
**newconfig(1M)** – prepare and configure a new kernel  
**newunix(1M)** – prepare for new kernel configuration

**system administration, mail**

**comsat(1M)** – server for biff(1)  
**mailq(1M)** – list the contents of the mail queue  
**newaliases(1M)** – rebuild the database for the mail aliases file  
**sendmail(1M)** – send mail over the Internet

**system administration, NFS file systems**

**domainname(1)** – set or display name of current domain system  
**lockd(1M)** – process network lock daemon  
**mountd(1M)** – NFS mount request server  
**nfsd(1M)** – NFS daemons

**nfsstat(1M)** – Network File System statistics  
**rpcinfo(1M)** – report RPC information  
**showmount(1M)** – show all remote mounts  
**spray(1M)** – spray packets  
**sprayd(1M)** – spray server  
**statd(1M)** – provide crash and recovery for network locking services

**system administration, spoolers**

- accept(1M)** – allow lp requests
- enable(1)** – enable or disable LP printers
- lpadmin(1M)** – configure the lp spooling system
- lpc(1M)** – line-printer control program
- lpd(1M)** – 4.2 line-printer daemon
- lpsched(1M)** – start or stop the LP request scheduler and move requests
- lpstat(1)** – print LP status information
- lptest(1M)** – generate line-printer ripple pattern
- reject(1M)** – prevent LP requests
- transcript(1M)** – TRANSCRIPT spooler filters for POSTSCRIPT printers

**system administration, user accounts**

- adduser(1M)** – add a user account
- chfn(1)** – change finger entry
- chsh(1)** – change default login shell
- finger(1)** – user information lookup program
- fingerd(1M)** – remote user information server
- pwck(1M)** – password/group file checkers
- vipw(1M)** – edit the password file

**system administration, utilities for**

- dev\_kill(1M)** – remove devices files within a directory
- mknod(1M)** – build device file
- su(1)** – substitute user ID

**system administration, UUCP**

- uucico(1M)** – transfer files queued by uucp or uux
- uuclean(1M)** – clean up the uucp spool directory
- uusub(1M)** – monitor UUCP network
- uuxqt(1M)** – UUCP execution file interpreter

**system calls**

- intro(2)** – introduction to system calls and error numbers

**system configuration**

- adduser(1M)** – add a user account
- autoconfig(1M)** – build a new up-to-date kernel
- badblk(1M)** – set or update bad block information
- checkinstall(1)** – check installation of boards
- chgnod(1M)** – change current A/UX system nodename

**diskformat(1M)** – format a disk through a driver-dependent format operation  
**dp(1M)** – perform disk partitioning  
**getty(1M)** – set terminal type, modes, speed, and line discipline  
**gettydefs(4)** – speed and terminal settings used by **getty**  
**init(1M)** – process control initialization  
**inittab(4)** – script for the **init** process  
**kconfig(1M)** – tune kernel parameters for work-load optimization  
**line\_sane(1M)** – push streams line disciplines  
**lpadmin(1M)** – configure the **lp** spooling system  
**master(4)** – master kernel configuration files  
**module\_dump(1M)** – identify configuration information stored within the named kernel file  
**newconfig(1M)** – prepare and configure a new kernel  
**newunix(1M)** – prepare for new kernel configuration  
**pname(1M)** – associate named partitions with device files  
**pstat(1M)** – print system facts  
**setport(1M)** – set a serial port  
**settimezone(1M)** – set the local time zone  
**slattconf(1M)** – attach and configure serial lines as network interfaces  
**swap(1M)** – add or delete disk blocks to or from the swap area  
**tic(1M)** – terminfo compiler  
**tset(1)** – set or reset the terminal to a sensible state  
**tty\_add(1M)** – modify the **/etc/inittab** file  
**tzdump(1M)** – time zone dumper  
**tzic(1M)** – time zone compiler  
**uvar(2)** – return system-specific configuration information

**system crashes**

**errdead(1M)** – extract error records from a crash dump  
**statd(1M)** – provide crash and recovery for network locking services

**system folder, personalizing**

**systemfolder(1)** – create a personal System Folder

**system kernel, generation of**

**autoconfig(1M)** – build a new up-to-date kernel  
**kconfig(1M)** – tune kernel parameters for work-load optimization  
**module\_dump(1M)** – identify configuration information stored within the named kernel file  
**newconfig(1M)** – prepare and configure a new kernel  
**newunix(1M)** – prepare for new kernel configuration

**system name**

hostname(1N) – set or display the name of the current host system  
HOSTNAME(4) – hostname and domainname database  
uname(1) – display identification information about the current system  
uname(2) – get name of current system

**system startup and shutdown**

brc(1M) – system initialization shell scripts  
init(1M) – process control initialization  
killall(1M) – kill all active processes  
powerdown(1M) – power down the system  
reboot(1M) – reboot the operating system  
shutdown(1M) – close down the system at a given time  
StartMonitor(1M) – display a progress bar during the A/UX® boot sequence  
startmsg(1M) – send messages to StartMonitor during the A/UX® boot process  
startup(1M) – run startup programs at boot time

**system status**

errdead(1M) – extract error records from a crash dump  
errdemon(1M) – error-logging daemon  
errpt(1M) – process a report of logged errors  
errstop(1M) – terminate the error-logging daemon  
exterr(1M) – turn on/off the reporting of extended errors  
finger(1) – user information lookup program  
groups(1) – show group memberships  
hostid(1N) – set or display the identifier of the current host system  
hostname(1N) – set or display the name of the current host system  
id(1) – display user and group IDs and names  
last(1) – display login and logout times for each user of the system  
lpq(1) – spool queue examination program  
lpstat(1) – print LP status information  
machid(1) – provide truth value about processor type  
mount(1M) – mount and dismount file systems  
ncstats(1M) – display kernel name cache statistics  
netstat(1N) – show network status  
pagesize(1) – display system page size  
ps(1) – report process status  
pstat(1M) – print system facts  
ruptime(1N) – show host status of local machines  
rwhod(1M) – system status server  
showmount(1M) – show all remote mounts  
tty(1) – get the terminal's name

**uname(1)** – display identification information about the current system  
    **uptime(1)** – show how long system has been up  
    **users(1)** – compact list of users who are on the system  
    **w(1)** – who is on and what they are doing?  
    **who(1)** – who is on the system?  
    **whoami(1)** – print effective current user ID  
    **whodo(1M)** – who is doing what

**system time**

**adjtime(2)** – correct the system time  
    **date(1)** – display and set the date  
    **gettimeofday(2)** – get/set date and time  
    **settimezone(1M)** – set the local time zone  
    **time(2)** – get time

**system variables**

**kconfig(1M)** – tune kernel parameters for work-load optimization  
    **sysconf(3P)** – get configurable system variables

**tables (in text)**

**col(1)** – filter text containing printer control sequences for use at a display device  
    **deroff(1)** – remove nroff/troff, tbl, and eqn constructs  
    **tbl(1)** – format tables for nroff or troff

**tabs**

**expand(1)** – expand tabs to spaces, and vice versa  
    **tabs(1)** – set tabs on a terminal

**tags**

**ctags(1)** – maintain a tags file for a C program

**tangent**

**tan(3F)** – Fortran tangent intrinsic function  
    **tanh(3F)** – Fortran hyperbolic tangent intrinsic function  
    **trig(3M)** – trigonometric functions

**tape (backup)**

**cp(1)** – copy files  
    **cpio(1)** – copy files to or from a cpio archive  
    **dump.bsd(1M)** – copy the files within the named file system to a dump.bsd archive  
    **dump.bsd(4)** – format of a file system dump  
    **finc(1M)** – fast incremental backup  
    **frec(1M)** – recover files from a backup tape  
    **pax(1)** – copy files to or from an archive in an IEEE format  
    **restore(1M)** – copy files from a dump.bsd archive into an existing file system  
    **tar(1)** – copy files to or from a tar archive

**tc(7)** – Apple Tape Backup 40SC device driver  
**tape drives**

- mt(1) – magnetic tape manipulating program
- mtio(7) – interface conventions for magnetic tape devices
- tar(1) – copy files to or from a tar archive
- tar(4) – format of tar header
- tc(7)** – Apple Tape Backup 40SC device driver
- tcb(1) – block data to 8K for tc output
- tp(1) – copy files to or from a tp archive

**TCP**

- trpt(1M) – transliterate protocol trace

**TCP/IP, maintenance of**

- arp(1M) – address resolution display and control
- dslipuser(1M) – display the current state of slip lines on a slip server
- etheraddr(1M) – get an Ethernet address
- ftpd(1M) – Internet File Transfer Protocol server
- ifconfig(1M) – configure network interface parameters
- inetd(1M) – Internet services daemon
- mkslipuser(1M) – initialize the slip user database
- named(1M) – Internet domain name server
- netstat(1N) – show network status
- nslookup(1) – query name servers interactively
- ping(1M) – exercise the network by sending test packets to a named host
- portmap(1M) – DARPA port to RPC program number mapper
- remshd(1M) – remote shell server
- rexecd(1M) – remote execution server
- rlogind(1M) – remote login server
- route(1M) – manually manipulate the routing tables
- routed(1M) – network routing daemon
- rstatd(1M) – kernel statistics server
- rusersd(1M) – rusers server
- rwalld(1M) – network rwall server
- rwhod(1M) – system status server
- slattach(1M) – attach serial lines as network interfaces
- slattconf(1M) – attach and configure serial lines as network interfaces
- stdhosts(1M) – convert Internet addresses to standard form
- talkd(1M) – remote user communication server
- telnetd(1M) – DARPA TELNET protocol server
- trpt(1M) – transliterate protocol trace

## Tektronix 4014 terminal

4014(1) – filter text containing printer control sequences a page at a time  
tc(1) – interpret troff output for use at a vintage display device

## Teletype Model 37

greek(5) – graphics for the extended TTY-37 type-box  
teletype transmission

tset(1) – set or reset the terminal to a sensible state

## TELNET

telnet(1C) – user interface to the TELNET protocol

telnetd(1M) – DARPA TELNET protocol server

## terminal capabilities

300(1) – filter text containing printer control sequences for a DASI terminal

4014(1) – filter text containing printer control sequences a page at a time

450(1) – filter text containing printer control sequences for the DASI terminal

printcap(4) – printer-capability database

term(4) – format of compiled term file

termcap(3X) – terminal independent operation routines

termcap(4) – terminal capability database

terminfo(4) – terminal capability database

tput(1) – query terminfo database

## terminal modes

stty(1) – set the modes for a terminal

termio(7) – general terminal interface

## terminal names

term(5) – conventional names for terminals

## terminal screen

clear(1) – clear terminal screen

col(1) – filter text containing printer control sequences for use at a display device

colcrt(1) – filter nroff output for terminal previewing

curses(3X) – CRT screen handling and optimization package

curses5.0(3X) – BSD-style screen functions with optimal cursor motion

ul(1) – filter special underlining sequences imbedded in text for use at a display device

## terminal session

chsh(1) – change default login shell

CommandShell(1) – A/UX® Toolbox application for managing command-interpretation windows and moderating access to the A/UX console window

**csh(1)** – run the C shell, a command interpreter with C-like syntax  
**ksh(1)** – run the Korn shell, a command interpreter compatible with Bourne shell  
**Login(1M)** – present a Macintosh® login dialog box when called by init  
**rlogin(1N)** – remote login  
**script(1)** – start a shell that records terminal input and output  
**sh(1)** – run the Bourne shell, the earliest of the command interpreters available  
**shl(1)** – shell layer manager  
**telnet(1C)** – user interface to the TELNET protocol

**terminal settings**

**getty(1M)** – set terminal type, modes, speed, and line discipline  
**gettydefs(4)** – speed and terminal settings used by getty  
**ioctl.syscon(4)** – console terminal settings file  
**keyset(1M)** – set console keyboard mapping  
**stty(1)** – set the modes for a terminal  
**tabs(1)** – set tabs on a terminal

**terminal types**

**getty(1M)** – set terminal type, modes, speed, and line discipline  
**termcap(3X)** – terminal independent operation routines  
**termcap(4)** – terminal capability database  
**terminfo(4)** – terminal capability database  
**ttytype(4)** – database of terminal types by port

**terminals, general**

**clear(1)** – clear terminal screen  
**ct(1C)** – spawn getty to a remote terminal  
**ctermid(3S)** – generate filename for terminal  
**dial(3C)** – establish an out-going terminal line connection  
**greek(1)** – filter text for vintage display devices  
**last(1)** – display login and logout times for each user of the system  
**nterm(5)** – terminal driving tables for nroff  
**pty(7)** – pseudo terminal driver  
**stty(1)** – set the modes for a terminal  
**tabs(1)** – set tabs on a terminal  
**tcgetattr(3P)** – get and set the terminal state  
**termcap(3X)** – terminal independent operation routines  
**termio(7)** – general terminal interface  
**termios(7P)** – A/UX® POSIX general terminal interface  
**tic(1M)** – terminfo compiler  
**tset(1)** – set or reset the terminal to a sensible state  
**tty(1)** – get the terminal's name

**tty(7)** – controlling terminal interface  
**tty\_add(1M)** – modify the /etc/inittab file  
**ttynname(3C)** – find name of a terminal

**termination, process**

- abort(3C)** – generate an IOT fault
- abort(3F)** – terminate Fortran program
- exit(2)** – terminate process
- kill(1)** – terminate a process
- killall1(1M)** – kill all active processes
- nohup(1)** – run a command immune to hangups
- shutdown(1M)** – close down the system at a given time

**testing a line printer**

- lpptest(1M)** – generate line-printer ripple pattern

**testing a network**

- lo(5)** – software loopback network interface
- ping(1M)** – exercise the network by sending test packets to a named host

**text, checking embedded markups for errors**

- checkmm(1)** – check documents formatted with the **mm** macros
- checknr(1)** – check **nroff/troff** files
- deroff(1)** – remove **nroff/troff**, **tbl**, and **eqn** constructs
- diffmk(1)** – mark differences between files
- hyphen(1)** – find hyphenated words
- macref(1)** – produce cross-reference listing of macro files

**text, editing**

- bfs(1)** – big file scanner
- ed(1)** – text editor
- ex(1)** – text editor
- nl(1)** – line numbering filter
- ssp(1)** – make output single spaced
- TextEditor(1)** – mouse-based text editor
- vi(1)** – screen-oriented (visual) display editor

**text, establishing fonts for troff typesetting**

- iwprep(1)** – prepare **troff** description files
- makedev(1)** – prepare **troff** description files

**text, filtering out printer motions**

- 300(1)** – filter text containing printer control sequences for a DASI terminal
- 4014(1)** – filter text containing printer control sequences a page at a time
- 450(1)** – filter text containing printer control sequences for the DASI terminal
- col(1)** – filter text containing printer control sequences for use at a display device

**colcrt(1)** – filter **nroff** output for terminal previewing  
**greek(1)** – filter text for vintage display devices  
**tc(1)** – interpret **troff** output for use at a vintage display device  
**ul(1)** – filter special underlining sequences imbedded in text for use at a display device

**text, formatting and typesetting**

**daiw(1)** – Apple ImageWriter II **troff** postprocessor filter  
**daps(1)** – Autologic APS-5 phototypesetter **troff** postprocessor  
**enscript(1)** – convert text files to format for printing  
**eqn(1)** – format mathematical text for **troff**  
**fmt(1)** – simple text formatter  
**fold(1)** – fold long lines for finite-width output device  
**mm(1)** – format documents that contain **nroff** and **mm** formatting requests  
    **mm macros**  
**mmt(1)** – typeset documents  
**mvt(1)** – typeset view graphs and slides  
**neqn(1)** – format mathematical text for **nroff**  
**newform(1)** – change the format of a text file  
**nroff(1)** – text formatting language  
**otroff(1)** – text formatting and typesetting  
**pr(1)** – format text for a print device  
**psdit(1)** – convert **troff** intermediate format to POSTSCRIPT format  
**psroff(1)** – **troff** to a POSTSCRIPT printer  
**roffbib(1)** – run off bibliographic database  
**tbl(1)** – format tables for **nroff** or **troff**  
**troff(1)** – text formatting and typesetting

**text lines, filling and wrapping**

**fmt(1)** – simple text formatter  
**fold(1)** – fold long lines for finite-width output device

**text lines, processing**

**awk(1)** – pattern scanning and processing language  
**colrm(1)** – remove columns from a file  
**comm(1)** – select or reject lines common to two sorted files  
**cut(1)** – cut out selected fields of each line of a file  
**grep(1)** – search a file for a pattern  
**head(1)** – give first few lines  
**join(1)** – relational database operator  
**line(1)** – read one line  
**newform(1)** – change the format of a text file  
**nl(1)** – line numbering filter  
**paste(1)** – merge lines of several files or subsequent lines of one file  
**rev(1)** – reverse characters within each line of text

**sed(1)** – stream editor  
**sort(1)** – sort or merge files  
**tail(1)** – deliver the last part of a file  
**uniq(1)** – report repeated lines in a file  
**wc(1)** – word count

**text, preprocessing before formatting and typesetting**

**cw(1)** – prepare constant-width text for **otroff**  
**eqn(1)** – format mathematical text for **troff**  
**grap(1)** – pic preprocessor for drawing graphs  
**neqn(1)** – format mathematical text for **nroff**  
**pic(1)** – **troff** preprocessor for drawing pictures  
**soelim(1)** – eliminate .so's from **nroff** input  
**tbl(1)** – format tables for **nroff** or **troff**

**text, processing of tabs within**

**expand(1)** – expand tabs to spaces, and vice versa  
**newform(1)** – change the format of a text file

**text processor**

**awk(1)** – pattern scanning and processing language  
**col(1)** – filter text containing printer control sequences for use at a display device  
**comm(1)** – select or reject lines common to two sorted files  
**cpp(1)** – the C language preprocessor  
**daiw(1)** – Apple ImageWriter II **troff** postprocessor filter  
**daps(1)** – Autologic APS-5 phototypesetter **troff** postprocessor  
**deroff(1)** – remove **nroff/troff**, **tbl**, and **eqn** constructs  
**eqn(1)** – format mathematical text for **troff**  
**expand(1)** – expand tabs to spaces, and vice versa  
**fmt(1)** – simple text formatter  
**fold(1)** – fold long lines for finite-width output device  
**grap(1)** – pic preprocessor for drawing graphs  
**iw2(1)** – Apple ImageWriter print filter  
**iwprep(1)** – prepare **troff** description files  
**m4(1)** – macro processor  
**neqn(1)** – format mathematical text for **nroff**  
**pic(1)** – **troff** preprocessor for drawing pictures  
**pr(1)** – format text for a print device  
**rev(1)** – reverse characters within each line of text  
**sed(1)** – stream editor  
**sort(1)** – sort or merge files  
**ssp(1)** – make output single spaced  
**tabs(1)** – set tabs on a terminal  
**tbl(1)** – format tables for **nroff** or **troff**

`tr(1)` – translate characters  
`uniq(1)` – report repeated lines in a file

**text, searches**

`freq(1)` – report on character frequencies in a file  
`grep(1)` – search a file for a pattern  
`lookbib(1)` – find references in a bibliography  
`wc(1)` – word count

**text, transforming**

`awk(1)` – pattern scanning and processing language  
`m4(1)` – macro processor  
`sed(1)` – stream editor  
`tr(1)` – translate characters

**text, utilities for generating and spell checking**

`addbib(1)` – create or extend bibliographic database  
`diction(1)` – locate wordy sentences in a document  
`indxbib(1)` – build inverted index for a bibliography  
`ndx(1)` – create a subject-page index for a document  
`ptx(1)` – make permuted index  
`refer(1)` – find and insert literature references in documents  
`sortbib(1)` – sort bibliographic database  
`spell(1)` – find spelling errors  
`style(1)` – analyze surface characteristics of a document  
`subj(1)` – generate a list of subjects from a document

**TFTP (Trivial File Transfer Protocol)**

`tftp(1C)` – trivial file transfer program  
`tftpd(1M)` – DARPA Trivial File Transfer Protocol server

**three-byte integers**

`l3tol(3C)` – convert between 3-byte integers and long integers

**tic-tac-toe**

`ttt(6)` – tic-tac-toe

**time and date**

`cal(1)` – generate a calendar for the specified year  
`calendar(1)` – reminder service  
`cron(1M)` – clock daemon  
`ctime(3)` – convert date and time to ASCII  
`date(1)` – display and set the date  
`gettimeofday(2)` – get/set date and time  
`leave(1)` – remind you when you have to leave  
`nvram(7)` – nonvolatile memory/time of day clock interface  
`settimezone(1M)` – set the local time zone  
`stime(2)` – set time  
`time(2)` – get time

**tzfile(4)** – time-zone information

**time zones**

- settimezone(1M)** – set the local time zone
- tzdump(1M)** – time zone dumper
- tzfile(4)** – time-zone information
- tzic(1M)** – time zone compiler

**timers**

- getitimer(2)** – get/set value of interval timer
- leave(1)** – remind you when you have to leave

**toolbox, Macintosh**

- slots(3X)** – ROM library functions

**topological sorting**

- tsort(1)** – topological sort

**tracing**

- ptrace(2)** – process trace
- trpt(1M)** – transliterate protocol trace

**TransScript**

- transcript(1M)** – TRANSCRIPT spooler filters for POSTSCRIPT printers

**transferring files**

- cpio(1)** – copy files to or from a cpio archive
- cu(1C)** – call another system
- ftp(1N)** – ARPANET file transfer program
- ftpd(1M)** – Internet File Transfer Protocol server
- kermit(1C)** – Kermit file transfer
- pax(1)** – copy files to or from an archive in an IEEE format
- rcp(1C)** – remote file copy
- remsh(1N)** – remote shell
- tar(1)** – copy files to or from a tar archive
- tftp(1C)** – trivial file transfer program
- tftpd(1M)** – DARPA Trivial File Transfer Protocol server
- tip(1C)** – connect to a remote system
- update(1)** – update files between two machines
- uucico(1M)** – transfer files queued by uucp or uux
- uucp(1C)** – UNIX® system to UNIX system copy
- uuencode(1C)** – encode/decode a binary file for transmission via mail

**translators**

- conv(3C)** – translate characters
- number(6)** – convert Arabic numerals to English
- tr(1)** – translate characters
- uuencode(1C)** – encode/decode a binary file for transmission via mail

## Transliterate Protocol Trace

`trpt(1M)` – transliterate protocol trace

## trigonometry

`acos(3F)` – Fortran arccosine intrinsic function  
`asin(3F)` – Fortran arcsine intrinsic function  
`atan2(3F)` – Fortran arctangent intrinsic function  
`atan(3F)` – Fortran arctangent intrinsic function  
`cos(3F)` – Fortran cosine intrinsic function  
`sin(3F)` – Fortran sine intrinsic function  
`tan(3F)` – Fortran tangent intrinsic function  
`trig(3M)` – trigonometric functions

## Trivial File Transfer Protocol

`tftp(1C)` – trivial file transfer program  
`tftpd(1M)` – DARPA Trivial File Transfer Protocol server

## troff

`checknr(1)` – check nroff/troff files  
`cw(1)` – prepare constant-width text for otroff  
`deroff(1)` – remove nroff/troff, tbl, and eqn constructs  
`diffmk(1)` – mark differences between files  
`eqn(1)` – format mathematical text for troff  
`eqnchar(5)` – special character definitions for eqn and neqn  
`font(5)` – description files for device-independent troff  
`iwprep(1)` – prepare troff description files  
`makedev(1)` – prepare troff description files  
`mm(1)` – format documents that contain nroff and mm formatting requests  
    mm macros  
`mmt(1)` – typeset documents  
`mptx(5)` – the macro package for formatting a permuted index  
`ms(5)` – text formatting macros  
`mvt(1)` – typeset view graphs and slides  
`otroff(1)` – text formatting and typesetting  
`pic(1)` – troff preprocessor for drawing pictures  
`psdit(1)` – convert troff intermediate format to POSTSCRIPT format  
`psroff(1)` – troff to a POSTSCRIPT printer  
`soelim(1)` – eliminate . so's from nroff input  
`tbl(1)` – format tables for nroff or troff  
`tc(1)` – interpret troff output for use at a vintage display device  
`troff(1)` – text formatting and typesetting  
`troff(5)` – description of troff output language

**true and false**

- test(1)** – condition evaluation command
- true(1)** – provide truth values

**truncation**

- truncate(2)** – truncate a file to a specified length

**tuning**

- kconfig(1M)** – tune kernel parameters for work-load optimization

**types, data**

- ftype(3F)** – explicit Fortran type conversion
- types(5)** – primitive system data types
- xdr(3N)** – library routines for external data representation

**UFS**

- newfs(1M)** – construct a new UFS file system
- tunefs(1M)** – tune an unmounted Berkeley 4.2 file system (UFS)
- ufs(4)** – format of a UFS file-system volume

**underlining**

- ul(1)** – filter special underlining sequences imbedded in text for use at a display device

**UNIX-to-UNIX system communications**

- uucico(1M)** – transfer files queued by uucp or uux
- uuclean(1M)** – clean up the uucp spool directory
- uucp(1C)** – UNIX® system to UNIX system copy
- uuencode(1C)** – encode/decode a binary file for transmission via mail
- uusend(1C)** – send a file to a remote host
- uustat(1C)** – uucp status inquiry and job control
- uusub(1M)** – monitor UUCP network
- uuto(1C)** – public UNIX-to-UNIX system file copy
- uux(1C)** – UNIX-to-UNIX system command execution
- uuxqt(1M)** – UUCP execution file interpreter

**unmounting file systems**

- umount(2)** – unmount a file system
- umount(3)** – unmount a file system
- unmount(2)** – remove a file system

**updaters**

- badblk(1M)** – set or update bad block information
- bzb(4)** – format of Block Zero Blocks
- dp(1M)** – perform disk partitioning
- eu(1M)** – update autorecovery files
- eupdate(1M)** – update important files for autorecovery purposes
- make(1)** – maintain, update, and regenerate groups of files
- rdist(1)** – remote file distribution program
- sync(1)** – update the superblock

**sync(2)** – update superblock  
**touch(1)** – update access and modification times of a file  
**updater(1)** – update files between two machines  
**yppasswd(3N)** – update user password in yellow pages  
**ypush(1M)** – force propagation of a changed YP map

**user accounts**

- chfn(1)** – change finger entry
- chsh(1)** – change default login shell
- finger(1)** – user information lookup program
- fingerd(1M)** – remote user information server

**user IDs**

- getpw(3C)** – get name from UID
- setuid(2)** – set user and group ID

**user interface, choosing**

- chsh(1)** – change default login shell
- CommandShell(1)** – A/UX® Toolbox application for managing command-interpretation windows and moderating access to the A/UX console window
- Login(1M)** – present a Macintosh® login dialog box when called by init

**user names**

- cuserid(3P)** – get character login name of the user
- cuserid(3S)** – get character login name of the user

**users, general**

- adduser(1M)** – add a user account
- cuserid(3P)** – get character login name of the user
- cuserid(3S)** – get character login name of the user
- finger(1)** – user information lookup program
- fingerd(1M)** – remote user information server
- getuid(2)** – get real and effective user IDs and group IDs
- groups(1)** – show group memberships
- id(1)** – display user and group IDs and names
- last(1)** – display login and logout times for each user of the system
- logname(1)** – get login name
- logname(3X)** – return login name of user
- mkslipuser(1M)** – initialize the slip user database
- rnusers(3N)** – return information about users on remote machines
- rusers(1N)** – give login list for local machines (RPC version)
- rusersd(1M)** – rusers server
- rwall(1M)** – write to all users over a network
- rwalld(1M)** – network rwall server
- rwho(1N)** – who's logged in on local machines?

**setreuid(2)** – set real and effective user ID  
**setsid(2P)** – create session and set process group ID  
**setuid(2)** – set user and group ID  
**slip.user(4)** – user file created by mkslipuser  
**su(1)** – substitute user ID  
**talk(1N)** – talk to another user  
**talkd(1M)** – remote user communication server  
**ttyslot(3C)** – find the slot in the *utmp* file of the current user  
**users(1)** – compact list of users who are on the system  
**w(1)** – who is on and what they are doing?  
**wall(1M)** – write to all users  
**who(1)** – who is on the system?  
**whoami(1)** – print effective current user ID  
**whodo(1M)** – who is doing what

#### **UTMP file**

**getut(3C)** – access *utmp* file entry  
**ttyslot(3C)** – find the slot in the *utmp* file of the current user  
**utmp(4)** – *utmp* and *wtmp* entry formats

#### **UUCP**

**uucico(1M)** – transfer files queued by uucp or uux  
**uuclean(1M)** – clean up the *uucp* spool directory  
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**uuto(1C)** – public UNIX-to-UNIX system file copy  
**uux(1C)** – UNIX-to-UNIX system command execution  
**uuxqt(1M)** – UUCP execution file interpreter

#### **variables, system**

**kconfig(1M)** – tune kernel parameters for work-load optimization  
**sysconf(3P)** – get configurable system variables

#### **version control**

**admin(1)** – create and administer SCCS files  
**cdc(1)** – change the delta commentary of an SCCS delta  
**ci(1)** – check in RCS revisions  
**co(1)** – check out RCS revisions  
**comb(1)** – combine SCCS deltas  
**delta(1)** – make a delta (change) to an SCCS file  
**get(1)** – get a version of an SCCS file  
**help(1)** – ask for help in using SCCS  
**prs(1)** – display information about an SCCS file

`rcs(1)` – change RCS file attributes  
`rcsdiff(1)` – compare RCS revisions  
`rcsintro(1)` – introduction to RCS commands  
`rcsmerge(1)` – merge RCS revisions  
`rlog(1)` – display log messages and other information about RCS files  
`rmdel(1)` – remove a delta from an SCCS file  
`sact(1)` – display who has checked an SCCS file out for editing.  
`sccs(1)` – front end for the SCCS subsystem  
`sccsdiff(1)` – compare two versions of an SCCS file  
`scstorcs(1M)` – build RCS file from SCCS file  
`unget(1)` – undo a previous get of an SCCS file  
`val(1)` – validate SCCS file  
`vc(1)` – version control  
`version(1)` – reports version number of files  
`what(1)` – identify SCCS files

**version control, RCS**

`ci(1)` – check in RCS revisions  
`co(1)` – check out RCS revisions  
`rcs(1)` – change RCS file attributes  
`rcsdiff(1)` – compare RCS revisions  
`rcsintro(1)` – introduction to RCS commands  
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**version control, SCCS**

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`what(1)` – identify SCCS files

**view graphs**  
mv(5) – a troff macro package for typesetting viewgraphs and slides  
mvt(1) – typeset view graphs and slides

**windows**  
CommandShell(1) – A/UX® Toolbox application for managing command-interpretation windows and moderating access to the A/UX console window

**word breaks**  
hyphen(1) – find hyphenated words

**word counting**  
wc(1) – word count

**worms**  
worm(6) – play the growing worm game  
worms(6) – animate worms on a display terminal

**writing**  
write(2) – write on a file

**wumpus**  
wump(6) – the game of hunt-the-wumpus

**Xerox 1700 terminal**  
450(1) – filter text containing printer control sequences for the DASI terminal

**yellow pages**  
domainname(1) – set or display name of current domain system  
ethers(4) – Ethernet address to hostname database or YP domain  
makedbm(1M) – make a yellow pages dbm file  
revnetgroup(1M) – reverse the netgroup file  
ypcat(1) – list the contents of the named YP map  
ypclnt(3N) – yellow pages client interface  
ypfiles(4) – the Yellow Pages database and directory structure  
ypinit(1M) – build and install yellow pages database  
ypmake(1M) – rebuild yellow pages database  
ypmatch(1) – list the value of keys in a YP map  
yppasswd(1) – change login password in yellow pages  
yppasswd(3N) – update user password in yellow pages  
yppasswdd(1M) – server for modifying yellow pages password file  
yppoll(1M) – what version of a YP map is at a YP server host  
yppush(1M) – force propagation of a changed YP map  
ypserv(1M) – yellow pages server and binder processes  
ypset(1M) – point ypbnd at a particular server  
ypwhich(1) – which host is the YP server or map master?  
ypxfr(1M) – transfer a YP map from some YP server to here

**yellow pages maps**

yppoll(1M) – what version of a YP map is at a YP server host  
yppush(1M) – force propagation of a changed YP map  
ypwhich(1) – which host is the YP server or map master?  
ypxfr(1M) – transfer a YP map from some YP server to here  
**yes (reply to queries)**  
yes(1) – generate y entries in response to requests for input



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THE APPLE PUBLISHING SYSTEM

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