cd	change directory: cd x change directory to directory x cd change directory to parent directory
mkdir x	make directory named <b>x</b>
pwd	print working directory (outputs the absolute path to the current directory)
ls	list files and directories  1s list contents of the current directory  1s a b list each of a and b. if either is a directory, list its contents options: -F marks directories to distinguish them from files  -1 to show permissions, etc  -R recursive (from a directory, show all its directories and their directories)
tree	show a recursive listing in a tree-like format in text. It helps to add the $-\mathbf{F}$ and/or the $-\mathbf{a}$ option (see $1\mathbf{s}$ )
rm f	remove file <b>f</b> permanently add option <b>-r</b> to remove directories and all their contents ( <b>very dangerous!</b> ) DO NOT USE <b>-r</b> unless you need it!
rmdir d	remove directory <b>d</b> permanently. The directory must be empty
cat	take files (or stdin) as input and con <i>cat</i> enate them, sending result to stdout  cat copy stdin to stdout  cat a b copy the contents of a, followed by contents of b, etc to stdout  cat > xxx create (or overwrite) file xxx and place characters typed at the keyboard into it. The file is terminated with a contol-D character at the beginning of a line.
more	display files page by page
date	display the current date and time
id	display information about the current user  id yyy display information about user yyy
script	record a terminal session in a file named typescript. Use exit to close the file.  script yyy names the file yyy instead  DO NOT USE the arrow keys to edit your commands when using script. Examine your output file using cat or more afterwards. If you can't read it, neither can I.
#	comment. If it is at the beginning of the line (or after a space), ignore the rest of the line (used in scripts for documentation)
man	get information from the Unix manual  man x output the first manual page found that is named x  man -k yy output the names of pages whose terse description contains yy  cmdhelp often works to get simple help
wc	options: count lines (-1), words (-w), and bytes(-c). default is -1wc
ср	copy files: cp file1 file2 copy file1 to file2 cp file(s) dir copy files into a directory. overwrites files that are in the way. add -r option to copy directories (again, can be dangerous)
mv	rename or rearrange files or directories  mv file1 file2 (rename file1 to file2. deletes existing file2 if it exists)  (we will cover more uses later)

file	display what type of an object it is: if it is a [regular] file, what kind of file is it, otherwise, is it a directory, or something else
sftp	secure file transfer protocol  sftp [user@]host connect to host as user (defaults to the current login).  the system you run sftp on is the local system. host is the remote system.  sftp commands:  ls, pwd, mkdir, cd,rm operate on the remote system.
	use 1 (lower-case L) prefix to each command to operate on the local system examples: lpwd, lcd, lrm get x transfer file x from the current directory on the remote system to the current directory on the local system put x transfer file x from the current directory on the local system to the current directory on the remote system
scp	secure copy program. Execute a single copy command between two hosts  scp xxx [user@]hostx:[path] copy xxx from the current host to hostx, logging in as user, and placing the result at path. If user is missing, the current login is used. If path is missing, the user's home directory is used.  scp [user@]hostx:path xxx login to hostx as user and copy path from that system to xxx on the current system. Again, user defaults to the current login.  NOTE: if specified, hostx must be followed by a colon (:) to be recognized. options: -r must be used if you are copying a directory.

## Control of standard input and output:

- cmd > file1 send standard output of command cmd to file file1 (overwriting file1)
- cmd < file1 run command cmd and use the input from file1 (connect standard input to file1)</pre>
- cmd >> file1 append standard output of command cmd to file file1
- cmd1 | cmd2 run commands cmd1 and cmd2 in parallel, sending the output of cmd1 to the input of
  cmd2

## Special characters

- control-C (^c) abort the program that you are currently running
- control-D (^**p**) if you are typing input to a command from the keyboard, use control D to say "I'm done"
- NOTE: control-D is a synonym for exit in many applications like the shell, so resist holding the control-D character too long you don't want it to repeat.