

# Linux command-line Cheat Sheet

## Environment

Verify and set the environment variables in BASH.

<b>export</b>	VAR=content	Store the variable with content
<b>env</b>		Display environment vars
<b>echo</b>	\$PATH	Display path where commands are located.
	\$HOME	Location of the home dir
	\$SHELL	Shell in use
	\$LD_LIBRARY_PATH	Directory with dynamic shared libraries.
	\$DISPLAY	To which display applications should be sent
<b>alias</b>	newalias=cmd	Set a new alias
<b>locale</b>		Show language settings
<b>~/bashrc</b> <b>~/bash_profile</b>		Where alias and environment vars can be stored to persist

## Configuring the system

Command line applications provided by distributions to configure the system.

<b>drakconf</b>	Mandriva, Caixa Mágica
(?)	Debian, Ubuntu
(?)	Fedora
<b>yast2</b> (?)	OpenSuSE

## Files and directories

Commands for managing files and directories

<b>ls</b>	-al	List files
<b>cp</b>	file1 dir2/	Copy file to directory dir2/
<b>mv</b>	file1 dir2/	Move file / rename file
<b>cat</b>	file1	Show content of a text file1
<b>rm</b>	file1	Delete file1
<b>mkdir</b>	dir	Create directory
<b>cd</b>	dir	Change into directory

## System status & Users

Get information about system and manage users.

<b>ps</b>	-aux	List processes.
<b>pstree</b>		List processes as a tree.
<b>top</b>		Sort processes by CPU (or RAM).
<b>free</b>		Check free memory and swap.
<b>df</b>	-h	Show disk space in active partitions.
<b>vmstat</b>	-d	Display virtual memory, CPU and IO statistics
<b>uname</b>	-a	Show info about Kernel & hw.
<b>useradd</b>	-m user	Add an user, copy skel.
<b>userdel</b>	user	Delete an user.

## Compress and archive

Useful tools for compressing and archive files.

<b>tar</b>	cvf filename.tar files	Archive
	xvf filename.tar	Unarchive
<b>tar</b>	cvfz filename.tgz files	Arch+Compress
	xvzf filename.tgz	Uncompress
<b>bzip2</b>	files	Compress
<b>bunzip2</b>	finaname.bz2	Decompress
<b>zip</b>	files filename.zip	Compress
<b>unzip</b>	filename.zip	Decompress

## Redirection

Redirect input (stdin), errors (stderr) and output (stdout) between files and applications.

<b>echo msg &gt; file1</b>	Redirect stdout to file1
<b>echo msg 2&gt; file1</b>	Redirect stderr to file1
<b>myprog &amp;&gt; file1</b>	Redirect both stdout and stderr to file
<b>myprog &lt; file1</b>	Redirect file1 content into stdin of myprog
<b>echo msg   myprog</b>	Redirect stdout to myprog

## Locating files

Commands for managing files and directories.

<b>whereis</b>	command	Where in \$PATH is command
<b>locate</b>	-i file	Locate file in disk (-i = not case sensitive). Requires updatedb before.
<b>updatedb</b>		Updates the database of existent files and directories.
<b>find</b>	/ -name file	Finds recursively starting in location "/" the file with the given name.
<b>find</b>	. -exec ls {} \;	Executes command "ls" over each entry of find result

## Parsing

Commands for parsing files and messages.

<b>grep</b>	pattern file	Prints line where pattern occur in file.
	-E ext_regexp file	Use extend regexp.
	-P Perl_regexp file	Use Perl regexp.
<b>awk</b>	{print \$2} file	Print field 2 of each line of file (space separated).
<b>sed</b>	s/str1/str2 file1	Sends to stdout the content of file1 replacing str1 by str2.

## Network

Miscellaneous commands for networking.

<b>ifconfig</b>		List all active interfaces
	eth0	Display information about eth0 interface.
	eth0 up	Brings up eth0.
	eth0 1.1.1.1	Give a static IP to eth0.
<b>route</b>	-n	List all routes.
<b>ping</b>	hostname	Send a packet to hostname machine.
<b>netstat</b>	-a	List all open ports and conexions in and out of the machine.
<b>lsof</b>	-i:80	List process that is listening in port 80.
<b>ssh</b>	server	Establish a secure shell to server
<b>scp</b>	file user@1.1.1.1:/	Copy file to remote location "/" in server 1.1.1.1 as "user".

## Session

Useful shortcuts and commands for advanced session management.

<b>Control +</b>	d	Exit from the command line.
	s	Freezes stdout.
	q	Unfreezes stdout.
	r	Look backward in command history
<b>Page</b>	Up	Complete the prompt with the last matching command in history
	Down	The next matching command.
<b>screen</b>		Launch screen.
	(Ctrl-A d)	Dettach session.
	-r	Reattach a previous session.

## Help

If none of the above works for you, try this.

<b>man</b>	command	Get information about command.
	1 command	Get section 1 of command man page.
	-k string	List all commands with "string" in the description .
<b>info</b>	command	Display documentation in info format for command.

**Get updates of this Linux command-line Cheat Sheet in:**

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This cheat sheet is under:

