

Linux Commands Cheat Sheet

File and Directory Management

Command	Usage
<code>ls</code>	List directory contents
<code>ls -l</code>	Long listing format
<code>cd <dir></code>	Change directory
<code>pwd</code>	Print working directory
<code>mkdir <dir></code>	Create a directory
<code>rmdir <dir></code>	Remove empty directory
<code>rm <file></code>	Delete file
<code>rm -r <dir></code>	Delete directory recursively
<code>cp <src> <dst></code>	Copy files/directories
<code>mv <src> <dst></code>	Move/rename files/directories
<code>touch <file></code>	Create empty file
<code>cat <file></code>	View file content
<code>more</code> , <code>less</code>	Scroll through file content
<code>head -n <num> <file></code>	First n lines
<code>tail -n <num> <file></code>	Last n lines
<code>tree</code>	Visual directory tree (install first)

File Search and Viewing

Command	Usage
<code>find <dir> -name <pattern></code>	Search files by name
<code>locate <file></code>	Fast file search (uses a database)
<code>grep "<pattern>" <file></code>	Search inside files
<code>grep -r "<pattern>" <dir></code>	Recursive grep
<code>wc -l <file></code>	Count lines
<code>du -sh <dir></code>	Show size of directory
<code>df -h</code>	Disk usage of file systems



User Management

Command	Usage
<code>whoami</code>	Show current user
<code>id</code>	Show user/group info
<code>adduser <user></code>	Add new user
<code>passwd <user></code>	Set user password
<code>usermod -aG <group> <user></code>	Add user to group
<code>deluser <user></code>	Delete user
<code>groups</code>	Show user groups



Permissions and Ownership

Command	Usage
<code>chmod <mode> <file></code>	Change file permissions
<code>chown <user>:<group> <file></code>	Change ownership
<code>umask</code>	Show/change default permission mask



Package Management

Command	Usage
<code>sudo apt update</code>	Update package list
<code>sudo apt upgrade</code>	Upgrade installed packages
<code>sudo apt install <pkg></code>	Install package
<code>sudo apt remove <pkg></code>	Uninstall package
<code>dpkg -i <pkg.deb></code>	Install from .deb file



System Information

Command	Usage
<code>uname -a</code>	Kernel info
<code>hostname</code>	Show/set system hostname
<code>uptime</code>	System uptime
<code>free -h</code>	Memory usage

<code>df -h</code>	Disk usage
<code>top</code>	Running processes
<code>vmstat</code>	System performance
<code>lscpu</code>	CPU info
<code>lsblk</code>	Block devices (disks)
<code>ip a</code> or <code>ifconfig</code>	Network interfaces

Networking

Command	Usage
<code>ping <host></code>	Check connectivity
<code>curl <url></code>	Fetch data from URL
<code>wget <url></code>	Download files
<code>netstat -tulpn</code>	List ports and services
<code>ss -tuln</code>	Check open ports
<code>traceroute <host></code>	Trace route to host
<code>dig <domain></code>	DNS lookup
<code>nslookup <domain></code>	DNS info

Archives and Compression

Command	Usage
<code>tar -czf file.tar.gz dir/</code>	Compress directory
<code>tar -xzf file.tar.gz</code>	Extract tar.gz
<code>zip -r file.zip dir/</code>	Create zip
<code>unzip file.zip</code>	Extract zip

System Cleanup

Command	Usage
<code>sudo apt autoremove</code>	Remove unused packages
<code>sudo apt clean</code>	Clear cache
<code>sudo journalctl --vacuum-time=2d</code>	Clear logs older than 2 days