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| **Linux Cheat Sheet**  ***Network Commands*** | | |
| **Network Configuration** |  | **Network Connectivity** |
| [*hostname*](https://linuxsimply.com/hostname-command-in-linux/)Shows the hostname of the current system | [*arp*](https://linuxsimply.com/arp-command-in-linux/)Map IP addresses to MAC addresses on a LAN and manage ARP cache |

[*ip*](https://linuxsimply.com/ip-command-in-linux/)Displays and configures network interfaces, routing, and tunnels

*iwconfig* Displays and configures wireless network interfaces

Reports network status, manage and configure

*arp -a* Prints arp table

*arp -a -d* Deletes all arp table entries

Tests network connectivity among

*nmcli*

network connections, and control the NetworkManager

[*ping*](https://linuxsimply.com/ping-command-in-linux/)

host/server and host by sending packets to a host and measuring the response

[*ifconfig*](https://linuxsimply.com/ifconfig-command-in-linux/)Displays and configures the current system's network interfaces

Checks the current configuration of network

Displays active network connections,

*arp -s* Adds entry in arp table

*ifquery*

interfaces and their parameters

[*netstat*](https://linuxsimply.com/netstat-command-in-linux/)

routing tables, and other network

statistics

*netstat -r* Prints routing table

*netplan* Configures network interfaces using YAML files Defines network interfaces, IP addresses,

Establishes a connection to a remote

*netplan*

gateways, DNS servers, and other network- related parameters in a YAML configuration

*telnet*

server/system through a TCP/ IP network using the Telnet network protocol

*ifup* Activates a network interface that is currently down

*ifdown* Deactivates a network interface that is currently up

Automatically obtains an IP address and other

*route flush* Removes all routes

[*traceroute*](https://linuxsimply.com/traceroute-command-in-linux/)Displays the route packets take to reach

a remote server through multiple hops

*route* Configures the kernel's routing table

*dhclient*

network configuration information from a DHCP server

# Utility Commands

*w* Displays information about currently logged-in users

*mail*

Sends and receives email using the

command line

[*curl*](https://linuxsimply.com/curl-command-in-linux/)Transfers data from or to a server

*aria2* Supports various protocols for downloading files from the internet

*ngrep* Displays and filters network packet data on a given regex pattern

*ethtool*

Modifies network interface settings, such as

speed and queries information of those

[*wget*](https://linuxsimply.com/wget-command-in-linux/)Command-line utility for downloading files from the web

Performs DNS lookups to resolve

hostnames, IP addresses mapping or any specific DNS record

[*nslookup*](https://linuxsimply.com/nslookup-command-in-linux/)

**DNS & Name Resolution**

Displays and configures wireless network

interfaces

*iw*

Securely connects to a remote system using

the SSH protocol

[*ssh*](https://linuxsimply.com/ssh-command-in-linux/)

**Remote Access Commands**

[*scp*](https://linuxsimply.com/scp-command-in-linux/)Copies files securely between client and server using the SSH protocol

[*sftp*](https://linuxsimply.com/sftp-command-in-linux/)

Securely transfers files between hosts using

the SFTP protocol

[*host*](https://linuxsimply.com/host-command-in-linux/)Performs DNS lookups to resolve hostnames or IP addresses

[*dig*](https://linuxsimply.com/dig-command-in-linux/)

Performs DNS lookups to query

information about DNS name servers



**Linux Cheat Sheet**

***Network Commands***

**Network Testing and Monitoring**

*hping*

Assambles and analyses TCP/IP packets and

sends packets to a remote host and analyzes the responses

*mtr*

Works as a combination of traceroute and ping commands, sends packets with the ping time for each hop continuously

*nmap*

Scans a network to discover hosts and services or for security

*nc / netcat* Provides the ability to read and write data

*/ncat* across network connections

*bmon*

Displays bandwidth usage in real-time for

individual network interfaces

*smokeping*

Measures network latency and packet loss

between two hosts, runs checks in certain intervals

*bwm-ng*

Monitors current bandwidth for multiple network interfaces

*socat*

Transfers data between two bidirectional byte

streams

*iftop*

Displays real-time network bandwidth

usage by individual connections

*speedometer* Displays bandwidth usage in real-time

*speedtest-cli* Measures network performance by performing a speed test

Displays active network connections, socket

*iperf* Tests network performance within two

systems

*iptraf-ng*

Monitors and displays network traffic in

real-time

Monitors network traffic by process and

*ss*

*tracepath*

statistics, and other network-related

information

Traces the route packets take discovering MTU along this path

# Network Information

*nethogs*

displays bandwidth usage

[*finger*](https://linuxsimply.com/finger-command-in-linux/)Shows user login information on a remote system

*jwhois* Fetches information about domain ownership from various WHOIS servers

*snort* Intrusion detection system that analyzes network traffic for suspicious activity

Firewall utility that manages packet

filtering and NAT

[*iptables*](https://linuxsimply.com/iptables-command-in-linux/)

**Security Commands**

Keeps track of hourly, daily and monthly

network traffic for selected interfaces and displays statistics on console

*vnstat*

*wireshark*

Captures and analyzes network traffic in

a formatted text

Captures and analyzes network traffic in

real-time

[*tcpdump*](https://linuxsimply.com/tcpdump-command-in-linux/)

**Network Analysis & Monitoring**

*ufw*

Manages system firewall and

adds/deletes/modifies/resets packet filtering rule