

Practical no 3:- linux command.

Command:-grep,locate,find,date,cat.

```
amit@amit-virtual-machine:~/Desktop/Amit$ grep "hello" 1.txt
hello this is linux file.
amit@amit-virtual-machine:~/Desktop/Amit$ locate 1.txt
/home/amit/Desktop/Amit/1.txt
/usr/lib/firmware/brcm/brcmfmac4330-sdio.Prowise-PT301.txt
/usr/lib/firmware/brcm/brcmfmac43430-sdio.Hampoo-D2D3_Vi8A1.txt
/usr/lib/firmware/brcm/brcmfmac43430-sdio.beagle,beagle-lev-starlight-jh7100-a1.txt
/usr/lib/firmware/brcm/brcmfmac43430-sdio.friendlyarm,nanopi-r1.txt
/usr/lib/firmware/brcm/brcmfmac43430-sdio.starfive,visionfive-v1.txt
/usr/share/doc/kbd/charsets/iso8859-1.txt.gz
/usr/share/doc/kbd/charsets/iso8859-11.txt.gz
/usr/share/doc/libsane-common/teco/teco1.txt.gz
amit@amit-virtual-machine:~/Desktop/Amit$ find 2.txt
2.txt
amit@amit-virtual-machine:~/Desktop/Amit$ date
Thursday 21 September 2023 11:33:57 AM IST
amit@amit-virtual-machine:~/Desktop/Amit$ cat 1.txt
hello this is linux file.
amit@amit-virtual-machine:~/Desktop/Amit$
```

Command 2:-uptime,w,finger,df,du,whereis ,man(simply type man man command).

```
amit@amit-virtual-machine:~/Desktop/Amit$ uptime
11:48:07 up 34 min, 1 user, load average: 0.04, 0.09, 0.25
amit@amit-virtual-machine:~/Desktop/Amit$ w
11:48:43 up 34 min, 1 user, load average: 0.08, 0.10, 0.25
USER      TTY      FROM          LOGIN@   IDLE   JCPU   PCPU   WHAT
amit      tty2     tty2          11:14    23:42  0.08s  0.06s  /usr/libexec/gnome
amit@amit-virtual-machine:~/Desktop/Amit$ finger
Login      Name      Tty      Idle   Login Time   Office      Office Phone
amit      Amit      tty2     23 Sep 21 11:14 (tty2)
amit@amit-virtual-machine:~/Desktop/Amit$ df
Filesystem      1K-blocks      Used Available Use% Mounted on
tmpfs            396456         1844    394612    1% /run
/dev/sda3       19946096 12011732   6895824   64% /
tmpfs            1982280         0    1982280    0% /dev/shm
tmpfs             5120          4      5116    1% /run/lock
/dev/sda2       524272        6216   518056    2% /boot/efi
tmpfs            396456        156   396300    1% /run/user/1000
/dev/sr0        4919592 4919592     0 100% /media/amit/Ubuntu 22.04.3 LTS am
amit@amit-virtual-machine:~/Desktop/Amit$ du
12
amit@amit-virtual-machine:~/Desktop/Amit$ whereis Amit
Amit:
amit@amit-virtual-machine:~/Desktop/Amit$
```

```
NAME      man - an interface to the system reference manuals

SYNOPSIS
man [man options] [[section] regexp ...] ...
man -k [apropos options] regexp ...
man -K [man options] [section] term ...
man -f [whatis options] page ...
man -l [man options] file ...
man -w|-W [man options] page ...

DESCRIPTION
man is the system's manual pager. Each page argument given to man is normal arguments is then found and displayed. A section, if provided, will direct the available sections following a pre-defined order (see DEFAULTS), and to the table below shows the section numbers of the manual followed by the type of section.

1 Executable programs or shell commands
2 System calls (functions provided by the kernel)
3 Library calls (functions within program libraries)
4 Special files (usually found in /dev)
5 File formats and conventions, e.g. /etc/passwd
6 Games
7 Miscellaneous (including macro packages and conventions), e.g. man(7).
8 System administration commands (usually only for root)
9 Kernel routines (Non standard)

A manual page consists of several sections.

Conventional section names include NAME, SYNOPSIS, CONFIGURATION, DESCRIPTION, NOTES, BUGS, EXAMPLE, AUTHORS, and SEE ALSO.

The following conventions apply to the SYNOPSIS section and can be used as follows:

bold text      type exactly as shown.
italic text     replace with appropriate argument.
[-abc]         any or all arguments within [ ] are optional.
-a|-b          options delimited by | cannot be used together.
argument ...   argument is repeatable.
[expression] ... entire expression within [ ] is repeatable.

Exact rendering may vary depending on the output device. For instance, man(1) underlined or coloured text instead.

Manual page man(1) line 3 (press h for help or q to quit)
```

Command 3:- Tar,gzip,gunzip(to again extract zip).

```
amit@amit-virtual-machine:~/Desktop/Amit$ tar cvf test.tar Amit/amit2
tar: Amit/amit2: Cannot stat: No such file or directory
tar: Exiting with failure status due to previous errors
amit@amit-virtual-machine:~/Desktop/Amit$ ls
1.txt 2.txt amit2 amit2.tar file.tar test.tar
amit@amit-virtual-machine:~/Desktop/Amit$
```

```
amit@amit-virtual-machine:~/Desktop/Amit$ gzip 1.txt
amit@amit-virtual-machine:~/Desktop/Amit$ ls
1.txt.gz 2.txt amit2 amit2.tar file.tar test.tar
amit@amit-virtual-machine:~/Desktop/Amit$ gunzip 1.txt.gz
amit@amit-virtual-machine:~/Desktop/Amit$ ls
1.txt 2.txt amit2 amit2.tar file.tar test.tar
amit@amit-virtual-machine:~/Desktop/Amit$
```

Command4:-pwd,cd,ls,mkdir,rmdir,file,touch.

```
amit@amit-virtual-machine: ~/Desktop/Amit/amit2
amit@amit-virtual-machine:~/Desktop$ pwd
/home/amit/Desktop
amit@amit-virtual-machine:~/Desktop$ cd Amit/amit2/
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ ls
hello.py loops.sh myfile.txt random.sh
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ mkdir amit3
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ ls
amit3 hello.py loops.sh myfile.txt random.sh
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ rmdir amit3
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ ls
hello.py loops.sh myfile.txt random.sh
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ file os
os: cannot open 'os' (No such file or directory)
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ file hello.py
hello.py: ASCII text
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ touch newfile.txt
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ ls
hello.py loops.sh myfile.txt newfile.txt random.sh
amit@amit-virtual-machine:~/Desktop/Amit/amit2$
```

Command5:-rm ,cp,mv,head,tail.

```
amit@amit-virtual-machine: ~/Desktop
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ ls
hello.py loops.sh myfile.txt newfile.txt random.sh
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ rm newfile.txt
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ ls
hello.py loops.sh myfile.txt random.sh
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ cp myfile.txt ~/Desktop/Amit
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ ls
hello.py loops.sh myfile.txt random.sh
amit@amit-virtual-machine:~/Desktop/Amit/amit2$ cd ../
amit@amit-virtual-machine:~/Desktop/Amit$ ls
1.txt amit2 file.tar hello.cc myfile.txt test2
2.txt amit2.tar hello.c hello.py test
amit@amit-virtual-machine:~/Desktop/Amit$ mv myfile.txt ~/Desktop
amit@amit-virtual-machine:~/Desktop/Amit$ cd ../
amit@amit-virtual-machine:~/Desktop$ ls
Amit myfile.txt
```

```
amit@amit-virtual-machine: ~/Desktop
amit@amit-virtual-machine:~/Desktop$ ls
1.c 1.txt Amit myfile.txt
amit@amit-virtual-machine:~/Desktop$ mv 1.c 2.c
amit@amit-virtual-machine:~/Desktop$ l
1.txt 2.c Amit/ myfile.txt
amit@amit-virtual-machine:~/Desktop$ head 1.txt
hello,
hii
how are you
bye.
amit@amit-virtual-machine:~/Desktop$ tail 1.txt
hello,
hii
how are you
bye.
amit@amit-virtual-machine:~/Desktop$ ps
PID TTY TIME CMD
26485 pts/0 00:00:00 bash
26588 pts/0 00:00:00 ps
amit@amit-virtual-machine:~/Desktop$ top -c
```

Command 6:-top,pkill,bg.

```
amit@amit-virtual-machine:~/Desktop$ top -c

top - 11:19:26 up 37 min, 1 user, load average: 0.00, 0.02, 0.14
Tasks: 283 total, 1 running, 282 sleeping, 0 stopped, 0 zombie
%Cpu(s): 0.2 us, 0.2 sy, 0.0 ni, 99.7 id, 0.0 wa, 0.0 hi, 0.0 si, 0.0 st
MiB Mem : 3871.6 total, 725.1 free, 1043.9 used, 2102.7 buff/cache
MiB Swap: 2140.0 total, 2139.5 free, 0.5 used, 2506.2 avail Mem

  PID USER   PR  NI  VIRT  RES  SHR S %CPU  %MEM    TIME+  COMMAND
 238 root    20   0     0     0   0 I   0.3   0.0   0:01.65 [kworker+
 589 systemd+ 20   0 14824 6912 6144 S   0.3   0.2   0:04.00 /lib/sy+
1246 amit    20   0 4418276 253244 124412 S   0.3   6.4   0:47.79 /usr/bi+
26592 amit    20   0 13240 4224 3328 R   0.3   0.1   0:00.66 top -c
   1 root    20   0 167960 13144 8280 S   0.0   0.3   0:04.13 /sbin/i+
   2 root    20   0     0     0   0 S   0.0   0.0   0:00.05 [kthrea+
   3 root    0 -20     0     0   0 I   0.0   0.0   0:00.00 [rcu_gp]
   4 root    0 -20     0     0   0 I   0.0   0.0   0:00.00 [rcu_pa+
   5 root    0 -20     0     0   0 I   0.0   0.0   0:00.00 [slub_f+
   6 root    0 -20     0     0   0 I   0.0   0.0   0:00.00 [netns]
  10 root    0 -20     0     0   0 I   0.0   0.0   0:00.00 [mm_per+
```

```
amit@amit-virtual-machine: ~/Desktop
amit@amit-virtual-machine:~/Desktop$ bg
bash: bg: current: no such job
amit@amit-virtual-machine:~/Desktop$ pkill firefox
```