

NAME=ADITYA ANAL

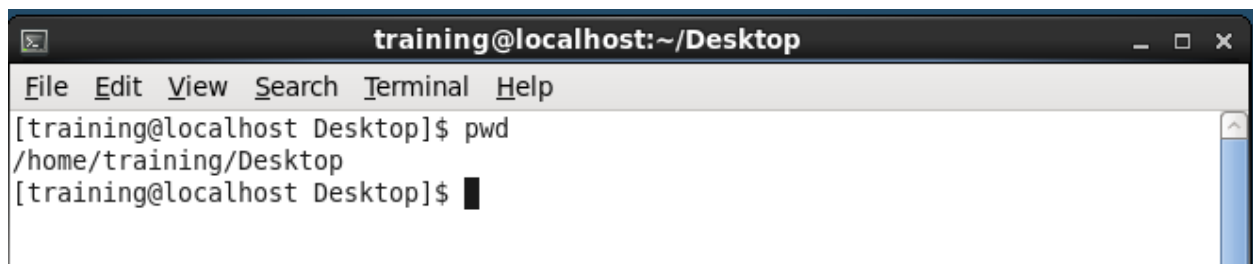
PROFILE=DATA ENGINEER

Linux Command Tutorials

Linux: The Linux command is a utility of the Linux operating system. All basic and advanced tasks can be done by executing commands. The commands are executed on the Linux terminal.

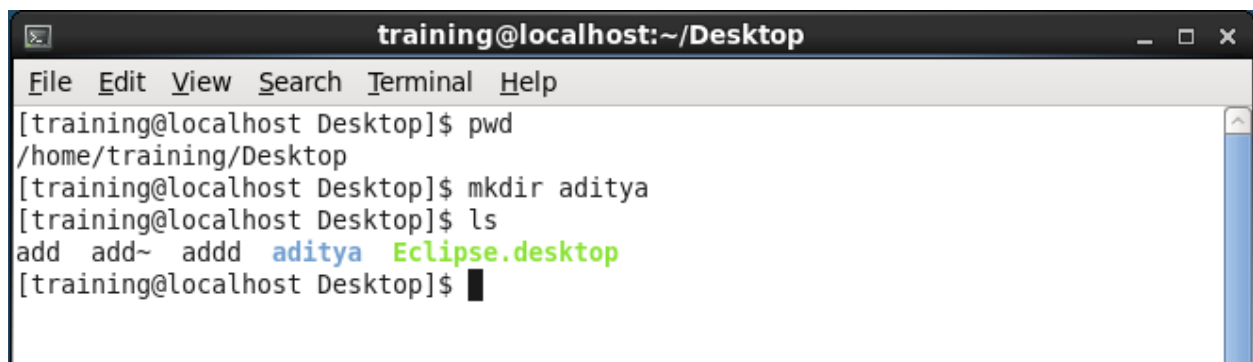
Basic Commands :

1.Pwd: The pwd command is used to display the location of the current working directory.

A screenshot of a Linux terminal window titled "training@localhost:~/Desktop". The window has a menu bar with "File", "Edit", "View", "Search", "Terminal", and "Help". The terminal shows the command "pwd" being executed, which returns the path "/home/training/Desktop". The prompt is "[training@localhost Desktop]\$".

```
training@localhost:~/Desktop
File Edit View Search Terminal Help
[training@localhost Desktop]$ pwd
/home/training/Desktop
[training@localhost Desktop]$
```

2. mkdir Command: The mkdir command is used to create a new directory under any directory.

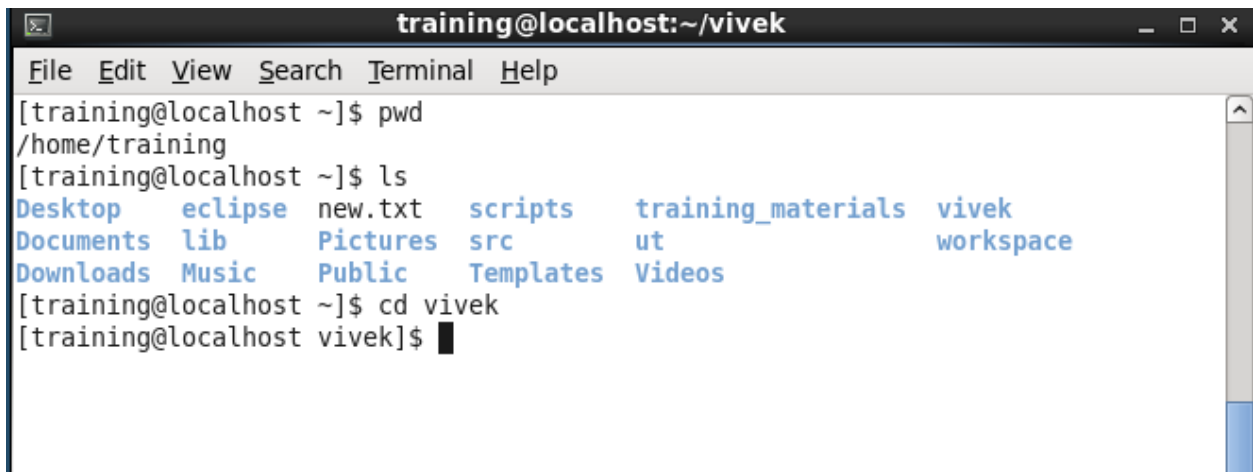
A screenshot of a Linux terminal window titled "training@localhost:~/Desktop". The window has a menu bar with "File", "Edit", "View", "Search", "Terminal", and "Help". The terminal shows the command "pwd" being executed, which returns the path "/home/training/Desktop". Then, the command "mkdir aditya" is executed, and the output of "ls" is shown, listing "add", "add~", "add", "aditya", and "Eclipse.desktop". The prompt is "[training@localhost Desktop]\$".

```
training@localhost:~/Desktop
File Edit View Search Terminal Help
[training@localhost Desktop]$ pwd
/home/training/Desktop
[training@localhost Desktop]$ mkdir aditya
[training@localhost Desktop]$ ls
add add~ add aditya Eclipse.desktop
[training@localhost Desktop]$
```

3. ls Command: The `ls` command is used to display a list of content of a directory.

```
[training@localhost ~]$ ls
Desktop  eclipse  new.txt  scripts  training_materials  vivek
Documents lib      Pictures src       ut               workspace
Downloads Music    Public  Templates Videos
```

4. cd Command: The `cd` command is used to change the current directory.



```
training@localhost:~/vivek
File Edit View Search Terminal Help
[training@localhost ~]$ pwd
/home/training
[training@localhost ~]$ ls
Desktop  eclipse  new.txt  scripts  training_materials  vivek
Documents lib      Pictures src       ut               workspace
Downloads Music    Public  Templates Videos
[training@localhost ~]$ cd vivek
[training@localhost vivek]$
```

5. touch Command: The touch command is used to create empty files. We can create multiple empty files by executing it once.

```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost ~]$ mkdir aditya
[training@localhost ~]$ cd aditya
[training@localhost aditya]$ newfile.txt
bash: newfile.txt: command not found
[training@localhost aditya]$ touch newfile.txt
[training@localhost aditya]$ ls
newfile.txt
[training@localhost aditya]$
```

6. cat Command: The cat command is a multi-purpose utility in the Linux system. It can be used to create a file, display content of the file, copy the content of one file to another file, and more.

```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost Desktop]$ cd ..
[training@localhost ~]$ ls
aditya    Downloads  Music      Public     Templates  Videos
Desktop  eclipse    new.txt    scripts    training_materials  vivek
Documents lib        Pictures   src        ut          workspace
[training@localhost ~]$ cd aditya
[training@localhost aditya]$ ls
newfile.txt  newfile.txt~
[training@localhost aditya]$ cat newfile.txt
my name is aditya anal
i live in siwan(bihar)
college name is nit allahabad
[training@localhost aditya]$
```

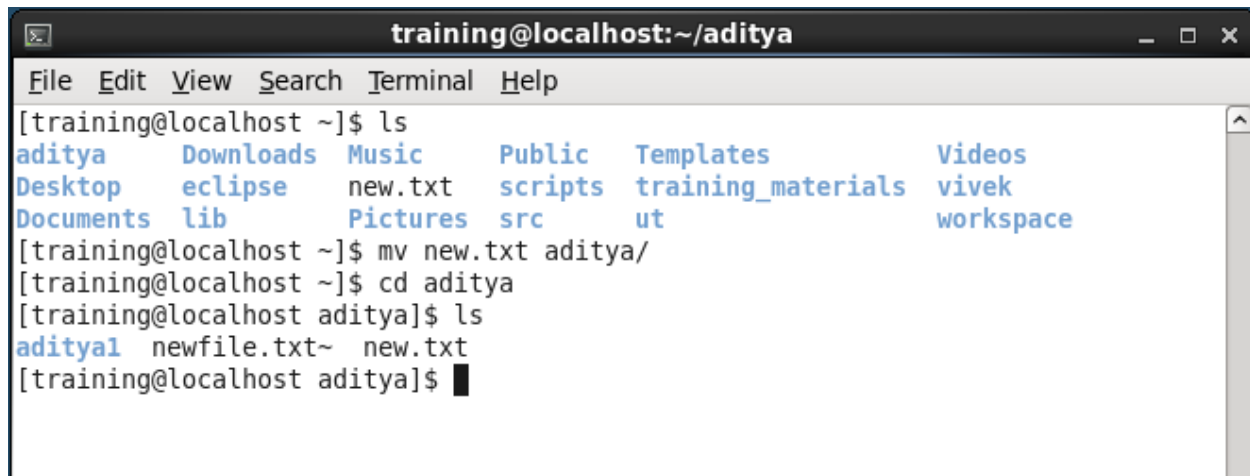
7. rm Command : The **rm** command is used to remove a file.

```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost ~]$ cd aditya
[training@localhost aditya]$ ls
newfile.txt  newfile.txt~
[training@localhost aditya]$ rm newfile.txt
rm: remove regular file `newfile.txt'? yes
[training@localhost aditya]$ ls
newfile.txt~
[training@localhost aditya]$
```

8. cp Command : The `cp` command is used to copy a file or directory.

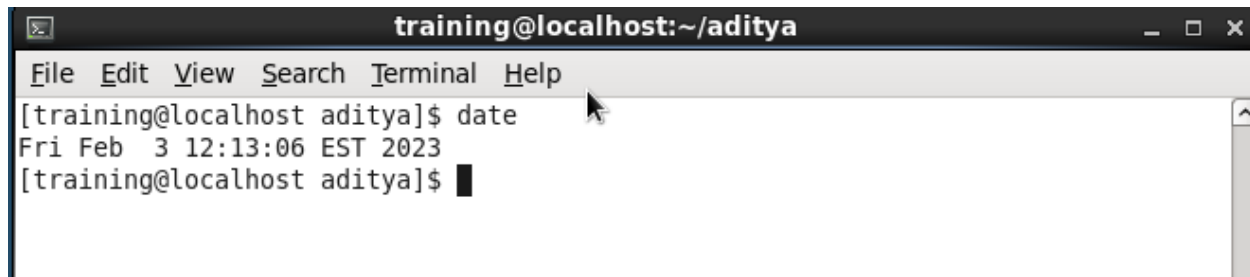
```
training@localhost:~/aditya/aditya1
File Edit View Search Terminal Help
[training@localhost Desktop]$ cd ..
[training@localhost ~]$ ls
aditya  Downloads  Music  Public  Templates  Videos
Desktop  eclipse    new.txt  scripts  training_materials  vivek
Documents  lib      Pictures  src      ut          workspace
[training@localhost ~]$ cd aditya
[training@localhost aditya]$ cd aditya1
[training@localhost aditya1]$ ls
new.txt
[training@localhost aditya1]$ cp new.txt
cp: missing destination file operand after `new.txt'
Try `cp --help' for more information.
[training@localhost aditya1]$ cp new.txt aditya1
[training@localhost aditya1]$
```

9. mv Command : The `mv` command is used to move a file or a directory from one location to another location.



```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost ~]$ ls
aditya    Downloads  Music      Public     Templates  Videos
Desktop  eclipse    new.txt    scripts    training_materials  vivek
Documents lib        Pictures   src        ut          workspace
[training@localhost ~]$ mv new.txt aditya/
[training@localhost ~]$ cd aditya
[training@localhost aditya]$ ls
aditya1  newfile.txt~  new.txt
[training@localhost aditya]$
```

10. date Command: The date command is used to display date, time, time zone, and more.



```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost aditya]$ date
Fri Feb  3 12:13:06 EST 2023
[training@localhost aditya]$
```

11. cal Command: The cal command is used to display the current month's calendar with the current date highlighted.

```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost aditya]$ cal
    February 2023
Su Mo Tu We Th Fr Sa
                1  2  3  4
 5  6  7  8  9 10 11
12 13 14 15 16 17 18
19 20 21 22 23 24 25
26 27 28

[training@localhost aditya]$
```

12. sleep Command: The sleep command is used to hold the terminal by the specified amount of time. By default, it takes time in seconds.

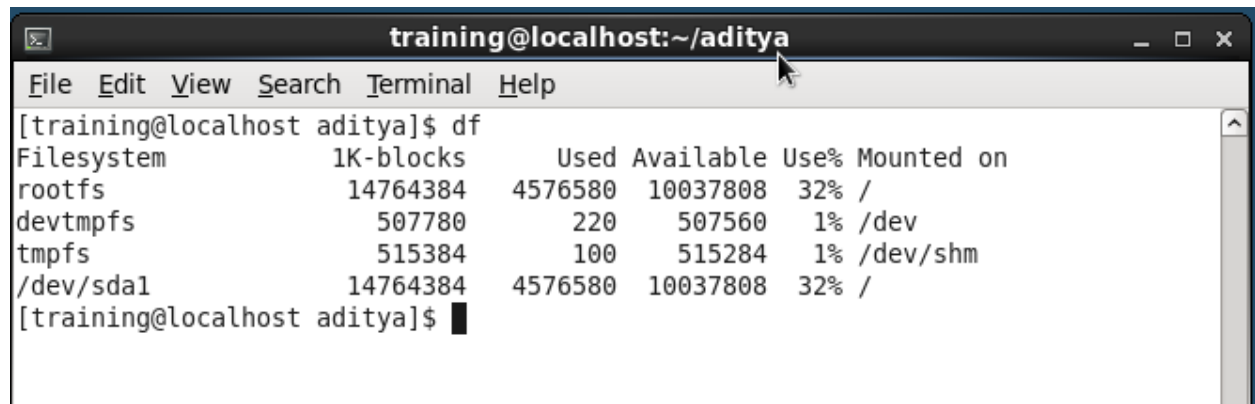
```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost aditya]$ sleep 1
[training@localhost aditya]$
```

13. time Command: The time command is used to display the time to execute a command.

```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost aditya]$ time

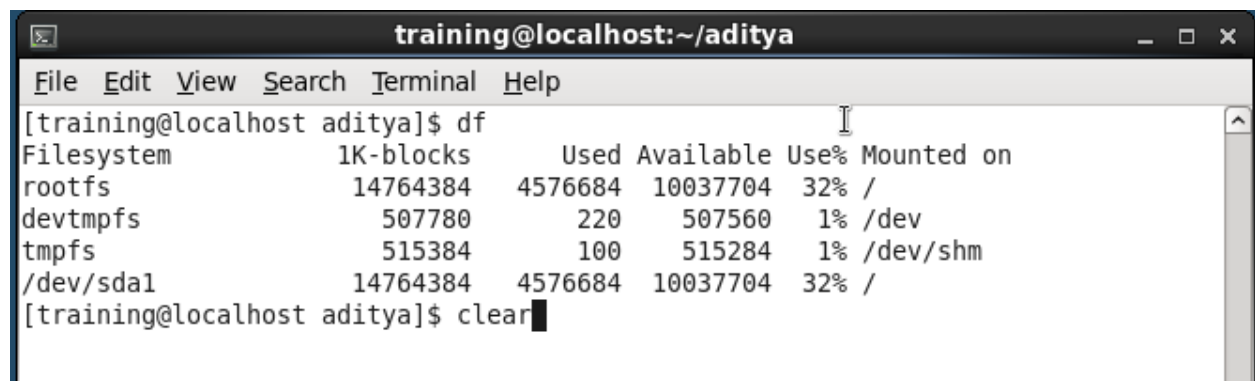
real    0m0.000s
user    0m0.000s
sys     0m0.000s
[training@localhost aditya]$
```

14. df Command: The df command is used to display the disk space used in the file system

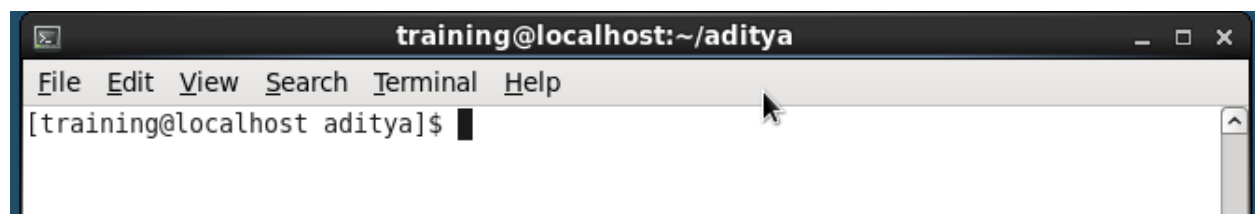


```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost aditya]$ df
Filesystem      1K-blocks      Used Available Use% Mounted on
rootfs          14764384    4576580  10037808  32% /
devtmpfs         507780         220    507560    1% /dev
tmpfs            515384         100    515284    1% /dev/shm
/dev/sda1        14764384    4576580  10037808  32% /
[training@localhost aditya]$
```

15. clear Command: Linux clear command is used to clear the terminal screen.



```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost aditya]$ df
Filesystem      1K-blocks      Used Available Use% Mounted on
rootfs          14764384    4576684  10037704  32% /
devtmpfs         507780         220    507560    1% /dev
tmpfs            515384         100    515284    1% /dev/shm
/dev/sda1        14764384    4576684  10037704  32% /
[training@localhost aditya]$ clear
```



```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost aditya]$
```

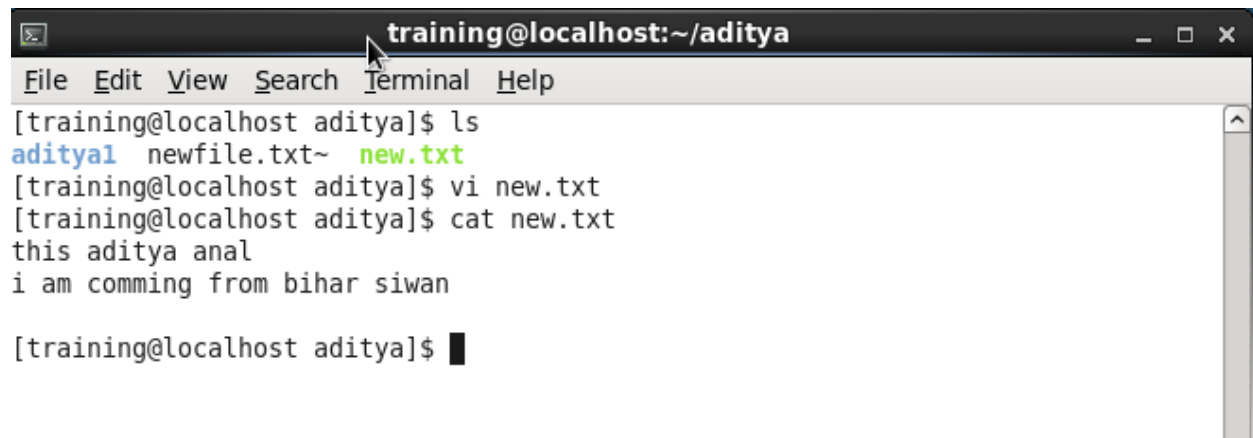
16. ip Command: Linux ip command is an updated version of the ipconfig command. It is used to assign an IP address, initialize an interface, disable an interface

```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost aditya]$ ip
Usage: ip [ OPTIONS ] OBJECT { COMMAND | help }
       ip [ -force ] -batch filename
where  OBJECT := { link | addr | addrlabel | route | rule | neigh | ntable |
                  tunnel | maddr | mroute | mrule | monitor | xfrm }
       OPTIONS := { -V[ersion] | -s[tatistics] | -d[etails] | -r[esolve] |
                   -f[amily] { inet | inet6 | ipx | dnet | link } |
                   -o[neline] | -t[imestamp] | -b[atch] [filename] |
                   -rc[vbuf] [size]}
[training@localhost aditya]$
```

17.Chmod command: the chmod command is used to change the access mode of a file.

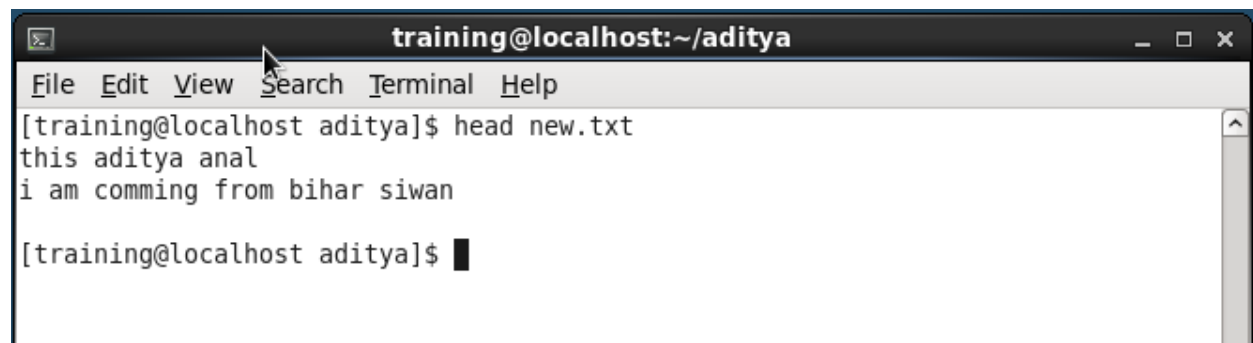
```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost aditya]$ ls
aditya1 newfile.txt~ new.txt
[training@localhost aditya]$ ls -l
total 4
drwxrwxr-x 2 training training 4096 Feb  3 12:05 aditya1
-rw-rw-r-- 1 training training   0 Jan 23 14:07 newfile.txt~
-rw-rw-r-- 1 training training   0 Jan 23 12:39 new.txt
[training@localhost aditya]$ chmod 777 new.txt
[training@localhost aditya]$ ls -l
total 4
drwxrwxr-x 2 training training 4096 Feb  3 12:05 aditya1
-rw-rw-r-- 1 training training   0 Jan 23 14:07 newfile.txt~
-rwxrwxrwx 1 training training   0 Jan 23 12:39 new.txt
[training@localhost aditya]$
```

18.Vi command: The VI editor is the most popular and classic text editor in the Linux family.

A terminal window titled 'training@localhost:~/aditya' with a menu bar (File, Edit, View, Search, Terminal, Help). The terminal shows the following commands and output:

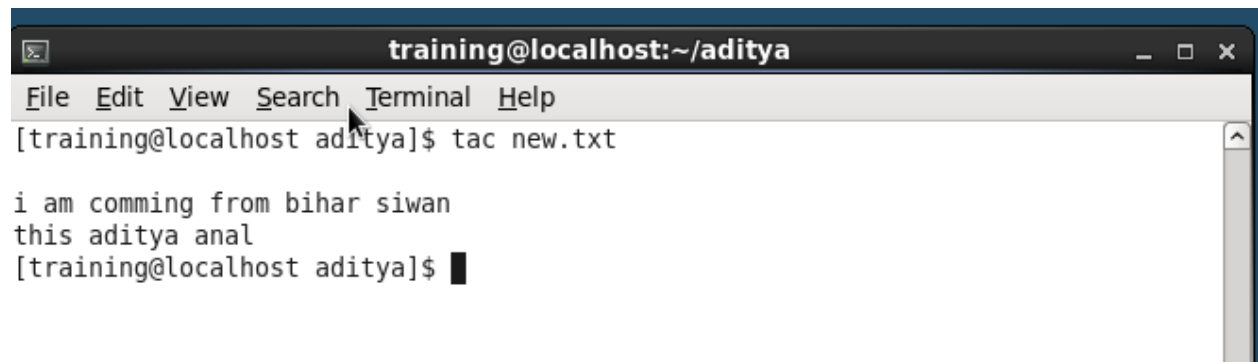
```
[training@localhost aditya]$ ls
aditya1 newfile.txt~ new.txt
[training@localhost aditya]$ vi new.txt
[training@localhost aditya]$ cat new.txt
this aditya anal
i am comming from bihar siwan
[training@localhost aditya]$
```

19. head Command: The head command is used to display the content of a file. It displays the first 10 lines of a file.

A terminal window titled 'training@localhost:~/aditya' with a menu bar (File, Edit, View, Search, Terminal, Help). The terminal shows the following commands and output:

```
[training@localhost aditya]$ head new.txt
this aditya anal
i am comming from bihar siwan
[training@localhost aditya]$
```

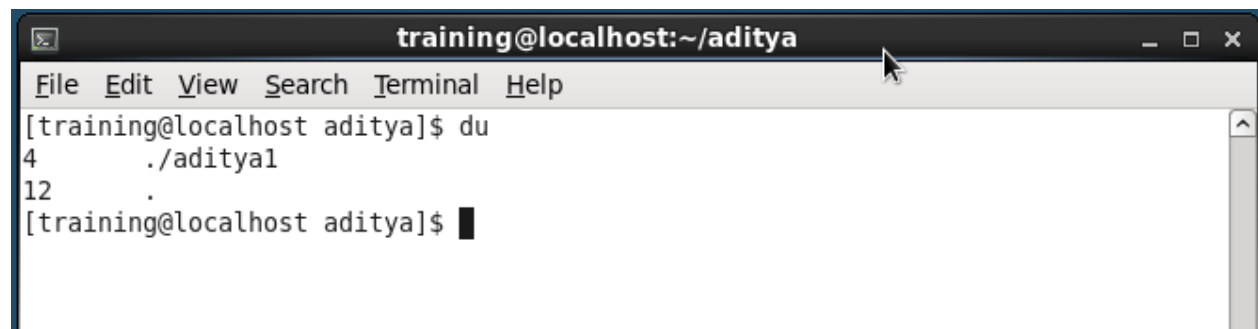
20. tac Command: The tac command is the reverse of cat command, as its name specified. It displays the file content in reverse order

A terminal window titled "training@localhost:~/aditya" with a menu bar (File, Edit, View, Search, Terminal, Help). The command "tac new.txt" has been executed, displaying the contents of the file in reverse order: "i am comming from bihar siwan", "this aditya anal", and the prompt "[training@localhost aditya]\$".

```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost aditya]$ tac new.txt

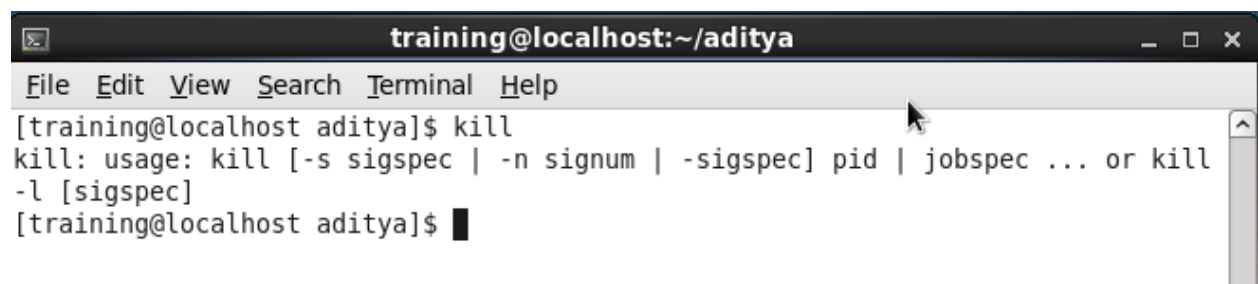
i am comming from bihar siwan
this aditya anal
[training@localhost aditya]$
```

21.du command: If you want to check how much space a file or a directory takes up.

A terminal window titled "training@localhost:~/aditya" with a menu bar (File, Edit, View, Search, Terminal, Help). The command "du" has been executed, showing disk usage for the current directory and its parent: "4 ./aditya1" and "12 .".

```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost aditya]$ du
4      ./aditya1
12     .
[training@localhost aditya]$
```

22.kill command: Use the kill command to terminate an unresponsive program manually.

A terminal window titled "training@localhost:~/aditya" with a menu bar (File, Edit, View, Search, Terminal, Help). The command "kill" has been executed, resulting in a usage message: "kill: usage: kill [-s sigspec | -n signum | -sigspec] pid | jobspec ... or kill -l [sigspec]".

```
training@localhost:~/aditya
File Edit View Search Terminal Help
[training@localhost aditya]$ kill
kill: usage: kill [-s sigspec | -n signum | -sigspec] pid | jobspec ... or kill
-l [sigspec]
[training@localhost aditya]$
```

