Basic Linux Commands

Usefullink-
https://itworkshopktu2024.blogspot.com/2024/11/familiarization-of-basic-linux-commands.html

1. Do the following in the order given
   a) Create a directory EV2. (***mkdir ev4***)
   b) Navigate to that directory (***cd ev4***)
   c) Create a directory with your roll number
   d) Navigate to that
   e) Type the following commands and write the resultant directory path(use ***pwd*** if required) . Also pen down your understanding of the result
      i. ***cd -***
      ii. ***cd -***
      iii. ***cd .***
      iv. ***cd ..***
      v. ***cd ~***
      vi. ***cd /***
      vii. ***ls -l***
      viii. ***cd media***
      ix. ***cd***
      x. ***pwd***
      xi. ***cd media***
      xii. ***cd /media***
      xiii. ***ls -l***
      xiv. ***ls -al***
      xv. ***cd ~/ev4/***<ur roll number>
      xvi. ***mkdir emptydummy***
      xvii. ***mkdir dummy***
      xviii. ***cd dummy***
      xix. ***touch file1***
      xx. ***touch file2***
      xxi. ***ls -l***
      xxii. ***rm -i file2***
      xxiii. ***ls -l***
      xxiv. ***cd ..***
      xxv. ***rm emptydummy***
      xxvi. ***rmdir emptydummy*** – only empty dirs removed with rmdir
      xxvii. ***rmdir dummy*** – will give an error since not empty
      xxviii. ***rm -r dummy***

2. **cat >file1.txt** -- You can use cat to create a file and input text directly from the terminal. Type the content'***My first line***', and press CTRL+D to save and exit
3. **cat >file2.txt** -- Type the content '***Hello Second line***', and press CTRL+D to save and exit
4.
5. ***cat > file3.txt*** -- Write '***Hello line***' as input and save the file
6. ***cat file1.txt file2.txt > file_combined.txt*** -- > overwrites, >> appends
7. ***cat file_combined.txt*** --Need not type the entire filename…Write file_c and

press Tab to see how it autocompletes

8. ***cat file3.txt >> file_combined.txt***
9. ***cat file_combined.txt***
10. ***grep -i hello file****
11. **cp file1.txt ~/ev4**
12. ***mv file_combined.txt combined*** -- check new file using ***ls -l***

Change permissions → chmod

You can do this in two ways.

Method A: Symbolic mode (easy to read)

Examples

1. Give execute permission to owner: ex: chmod u+x file.sh
2. Remove write permission from group: ex: chmod g-w file.txt
3. Add read permission to everyone: ex: chmod a+r file.txt
4. Set exact permissions:ex: chmod u=rwx,g=rx,o=r myfile

Method B: Numeric (octal) mode (most used)

Permission values for rwx = 421

Examples

1. Owner: rwx, Group: r-x, Others: r-- => chmod 754 file.txt
2. Read/write for owner only: => chmod 600 file.txt

Permissions meaning differ with ref to files and directories-

Permission	File	Directory
r	read file	list files (ls)
w	modify file	create/delete files
x	run file	enter directory (cd)

13. ***chmod u+x combined***

--Grant execute permission to owner. Check the new permission using ***ls -l combined***

14. ***chmod g-r combined*** -- Remove read permission from group
15. ***chmod 777 combined*** *-- giving rwx= 111=7, full permission to all user, group and others*

16. ***sudo useradd alice*** *-- new user created using sudo super user*
17. ***sudo passwd alice*** *-- set new password using passwd*
18. ***sudo userdel alice***

If in a network server, write command can work like a "chat" with someone logged into the same system(server)

The write command sends a real-time message to another user.

Both the sender and receiver must be logged into the same system.

The message is displayed directly on the receiver's terminal

Syntax : write username [tty]

username: The name of the user you want to send the message to.

tty (optional): Specifies the exact terminal session of the user (useful if the user has multiple sessions open).

Ex: ***write alice***

There is also an option for the user to enable/block messaging using ***mesg y*** or ***mesg n***