

## **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**

**f)**

**i. cd DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55**

**Go to the folder mentioned after 'cd'**

**ii. cd - /c/Users/DELL/ev4**

**Go to previous directory**

**iii. cd . DELL@DESKTOP-19URV6K MINGW64 ~/ev4**

**Keeps the user in same directory**

**iv. cd .. DELL@DESKTOP-19URV6K MINGW64 ~**

**Go one directory back(parent folder)**

**v. cd ~ DELL@DESKTOP-19URV6K MINGW64 ~**

**Go to home directory**

**vi. cd / DELL@DESKTOP-19URV6K MINGW64 /**

**Go to root directory**

**vii. ls -l DELL@DESKTOP-19URV6K MINGW64 /**

**Shows the long listing format**

**viii. cd media**

**bash: cd: media: No such file or directory**

**DELL@DESKTOP-19URV6K MINGW64 /**

**Move into the folder named 'media'. Since such a file is not created ,error appeared.**

**ix. cd**

**DELL@DESKTOP-19URV6K MINGW64 ~**

**Takes to home directory**

**x. pwd /c/Users/DELL**

**xi. cd media bash: cd: media: No such file or directory**

**xii. DELL@DESKTOP-19URV6K MINGW64 ~**

**xiii.**

**xiv. cd /media bash: cd: /media: No such file or directory**

**DELL@DESKTOP-19URV6K MINGW64 ~**

**Moves to the media folder located inside the root directory.**

**No such file ,therefore error appeared.**

**xv. ls -l**

**DELL@DESKTOP-19URV6K MINGW64 ~**

**Display a detailed list of all the files and folders present .**

**xvi. ls -al DELL@DESKTOP-19URV6K MINGW64 ~**

**Shows all files, including hidden ones.**

**xvii. cd ~/ev4/<ur roll number>**

**DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55**

**Go to the folder rollno\_55 which is inside ev4, which is inside my home directory.**

**xviii. mkdir emptydummy**

**DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55**

**Create a new directory named 'emptydummy'**

**xix. mkdir dummy**

**DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55**

Creates a new directory named ‘dummy’ inside your current working directory.

xx. cd dummy

DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55/dummy

Changes working directory to the folder named ‘dummy’.

xxi. touch file1

DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55/dummy

Created a new empty file named ‘file1’ inside the current working directory(‘dummy’)

xxii. touch file2

DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55/dummy

Created a new empty file named ‘file1’ inside the current working directory(‘dummy’)

xxiii. ls -l

DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55/dummy -rw-r--r-- 1 DELL 197121 0 Feb 9

10:05 file1

-rw-r--r-- 1 DELL 197121 0 Feb 8 11:05 file2

xxiv. rm -i file2

DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55/dummy

Deletes the file named “file2” after asking for confirmation.

xxv. ls -l

DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55/dummy

Displayed all the files.

xxvi. cd .. DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55

Moves to parent directory(‘rollno\_55’)

xxvii. rm emptydummy

DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55

Attempts to remove directory “emptydummy”, but results in error since it is used for files.

xxviii. rmdir emptydummy – only empty dirs removed with rmdir

DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55

xxix. rmdir dummy – will give an error since not empty

rmdir: failed to remove 'dummy': Directory not empty

DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55

xxx. rm -r dummy

DELL@DESKTOP-19URV6K MINGW64 ~/ev4/rollno\_55

Delete the directory ‘dummy’ along with all the files inside it.

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 – appends

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-

**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**

**Permission**

**File**

**Directory**

**r**

**read file**

**list files (ls)**

**w**

**modify file**

**create/delete files**

**x**

**run file**

**enter directory (cd)**

**16. sudo useradd alice -- new user created using sudo super user**

**17. sudo passwd alice -- set new password using passwd**

**18. sudo userdel alice – Attempt to delete the user account named 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