Week Report 4

Practice from the presentation The Linux File system:

Practice 1

Practice 2

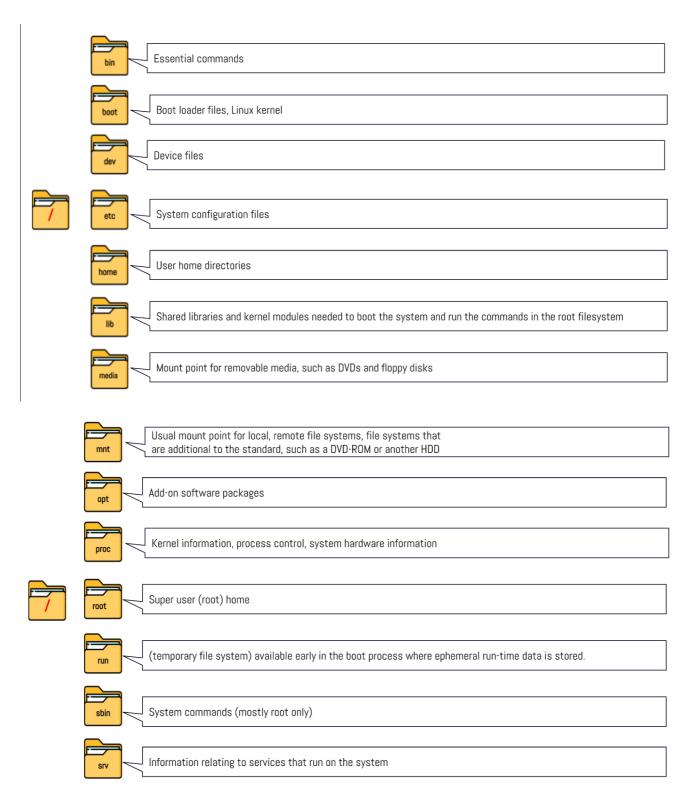
```
1: kmtorres46747@cis106: ~/Desktop/practicels ~
                                                                                          A] □
kmtorres46747@cis106:~$ cd /home/kmtorres46747/Desktop/practicels/
kmtorres46747@cis106:~/Desktop/practicels$ ls
               history-debian.pdf movie.mp4
                                                              tux-penguin.gif
countries.xml homework.docx
                                   people.csv tux-nobg.png
kmtorres46747@cis106:~/Desktop/practicels$ ls -a
                             movie.mp4 tux-nobg.png
          countries.xml
          history-debian.pdf people.csv tux-penguin.gif
book.txt homework.docx
kmtorres46747@cis106:~/Desktop/practicels$ ls -l
total 2932
-rw-rw-r-- 1 kmtorres46747 kmtorres46747
                                            1043 Feb 27 2022 book.txt
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 23972 Feb 27 2022 countries.xml
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 163057 Feb 27 2022 history-debian.pdf
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 111303 Feb 22 2022 homework.docx
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 1570024 Feb 27 2022 movie.mp4
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 284042 Feb 27 2022 people.csv
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 764176 Feb 27 2022 song.mp3
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 21314 Feb 27 2022 tux-nobg.png
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 44299 Jan 31 2020 tux-penguin.gif
kmtorres46747@cis106:~/Desktop/practicels$ ls -lh
total 2.9M
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 1.1K Feb 27 2022 book.txt
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 24K Feb 27 2022 countries.xml
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 160K Feb 27 2022 history-debian.pdf
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 109K Feb 22 2022 homework.docx
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 1.5M Feb 27 2022 movie.mp4
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 278K Feb 27 2022 people.csv
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 747K Feb 27 2022 song.mp3
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 21K Feb 27 2022 tux-nobg.png
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 44K Jan 31 2020 tux-penguin.gif
kmtorres46747@cis106:~/Desktop/practicels$ ls -lhc
total 2.9M
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 1.1K Mar 17 22:00 book.txt
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 24K Mar 17 22:00 countries.xml
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 160K Mar 17 22:00 history-debian.pdf
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 109K Mar 17 22:00 homework.docx
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 1.5M Mar 17 22:00 movie.mp4
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 278K Mar 17 22:00 people.csv
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 747K Mar 17 22:00 song.mp3
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 21K Mar 17 22:00 tux-nobg.png
-rw-rw-r-- 1 kmtorres46747 kmtorres46747 44K Mar 17 22:00 tux-penguin.gif
kmtorres46747@cis106:~/Desktop/practicels$ ls -lhgGS
total 2.9M
-rw-rw-r-- 1 1.5M Feb 27 2022 movie.mp4
-rw-rw-r-- 1 747K Feb 27 2022 song.mp3
-rw-rw-r-- 1 278K Feb 27 2022 people.csv
-rw-rw-r-- 1 160K Feb 27 2022 history-debian.pdf
-rw-rw-r-- 1 109K Feb 22 2022 homework.docx
-rw-rw-r-- 1 44K Jan 31 2020 tux-penguin.gif
-rw-rw-r-- 1 24K Feb 27 2022 countries.xml
-rw-rw-r-- 1 21K Feb 27 2022 tux-nobg.png
-rw-rw-r-- 1 1.1K Feb 27 2022 book.txt
kmtorres46747@cis106:~/Desktop/practicels$ ls -mr
tux-penguin.gif, tux-nobg.png, song.mp3, people.csv, movie.mp4, homework.docx,
history-debian.pdf, countries.xml, book.txt
kmtorres46747@cis106:~/Desktop/practicels$ ls -C1X
people.csv
homework.docx
tux-penguin.gif
```

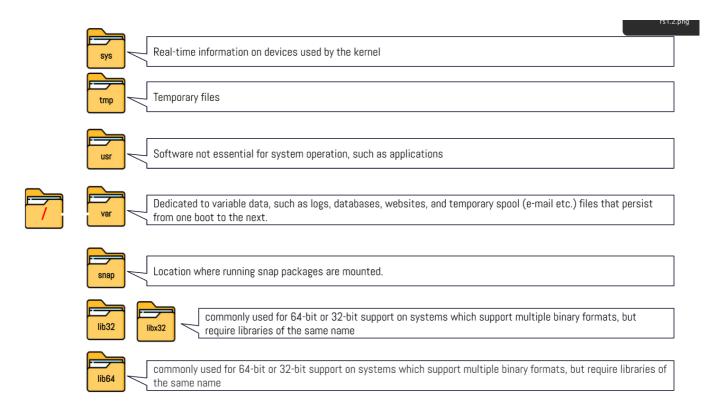
```
movie.mp4
history-debian.pdf
tux-nobg.png
book.txt
countries.xml
kmtorres46747@cis106:~/Desktop/practicels$
```

Practice 3

```
kmtorres46747@cis106:~/Desktop/practice
/home/kmtorres46747/Desktop/practicels
(mtorres46747@cis106:-/Desktop/practicels$ cd
(mtorres46747@cis106:-}cd /
(mtorres46747@cis106:/$ cd usr/share/themes/
.mtorres46747@cis106:/usr/share/themes$ cd ../..
.mtorres46747@cis106:/usr$ ls -A /home/
cmtorres46747@cis106:/usr$ cd
cmtorres46747@cis106:~$ ls -tX cis106/
mtorres46747@cis106:~$ ls -rR cis106/
 eekReports labs cheatSheets
cis106/weekReports:
 r4-p2.2.png wr4-p2.1.png wr4-p1.png wr4.md wr3.pdf wr3.md fs1.3.png fs1.2.png fs1.1.png
cis106/labs:
'cis106/labs/lab 4':
lab4.pdf lab4.md lab4.5.2.png lab4.5.1.png lab4.4.3.png lab4.4.2.png lab4.4.1.png lab4.2.2.png lab4.2.1.png lab4.1.png lab4.1.2.png
q2.1.png q1.pdf q1.odp q1.1.png lab3.pdf <u>lab3.</u>md
cis106/labs/lab2:
          lab2-shot4.JPG lab2-shot3.JPG lab2-shot2.JPG lab2-shot1.JPG lab2.pdf lab2.md
cis106/labs/lab1:
whatisubuntu.txt what_is_ubuntu_submission.md what-is-ubuntu.pdf ubuntu-desktop.png resume.pdf resume.html johndoeinfo.txt
what_is_ubuntu_submission.pdf what_is_ubuntu_submission.html ubuntu-logo.png resume.png resume.md johndoe.jpeg
                                                            gitcommands.txt 'Absolute Path VS Relative Path Cheat sheet.pu
'The LS command Cheat Sheet.png' 'Linux Workshop Ubuntu Software installation cheat sheet.png'
 1: kmtorres46747@cis106: ~ ~
kmtorres46747@cis106:~$ ls -lh
total 48K
drwxr-xr-x 3 kmtorres46747 kmtorres46747 4.0K Mar 17 22:00 Desktop
drwxr-xr-x 2 kmtorres46747 kmtorres46747 4.0K Mar 14 18:10 Documents
drwxr-xr-x 2 kmtorres46747 kmtorres46747 4.0K Mar 17 22:00 Downloads
-rw-rw-r-- 1 kmtorres46747 kmtorres46747
                                                          91 Feb 12 20:38 gitcommands.txt
drwxrwxr-x 2 kmtorres46747 kmtorres46747 4.0K Feb 22
                                                                          2022 lab4files
drwxr-xr-x 2 kmtorres46747 kmtorres46747 4.0K Feb 6 23:56 Music
drwxr-xr-x 6 kmtorres46747 kmtorres46747 4.0K Mar 17 20:57 Pictures
drwxr-xr-x 2 kmtorres46747 kmtorres46747 4.0K Feb
                                                                     6 23:56 Public
drwx----- 5 kmtorres46747 kmtorres46747 4.0K Feb 12 19:59 snap
drwxr-xr-x 2 kmtorres46747 kmtorres46747 4.0K Feb
                                                                     6 23:56 Templates
drwxr-xr-x 2 kmtorres46747 kmtorres46747 4.0K Mar 14 18:29 Videos
kmtorres46747@cis106:~$ ls -lgG --full-time ~
drwxrwxr-x 6 4096 2023-03-04 20:23:24.968793155 -0500 cis106
drwxr-xr-x 3 4096 2023-03-17 22:00:56.406053463 -0400 Desktop
drwxr-xr-x 2 4096 2023-03-14 18:10:26.372557861 -0400 Documents
drwxr-xr-x 2 4096 2023-03-17 22:00:08.890055676 -0400 Downloads
                    91 2023-02-12 20:38:03.315430196 -0500 gitcommands.txt
drwxrwxr-x 2 4096 2022-02-22 14:18:06.000000000 -0500 lab4files
drwxr-xr-x 2 4096 2023-02-06 23:56:00.491998836 -0500 Music
drwxr-xr-x 6 4096 2023-03-17 20:57:24.438230946 -0400 Pictures
drwxr-xr-x 2 4096 2023-02-06 23:56:00.491998836 -0500 Public
drwx----- 5 4096 2023-02-12 19:59:52.694799286 -0500 snap
drwxr-xr-x 2 4096 2023-02-06 23:56:00.491998836 -0500 Templates
drwxr-xr-x 2 4096 2023-03-14 18:29:43.988296861 -0400 Videos
kmtorres46747@cis106:~$
```

The Linux File system directories and their purpose:





All the commands for navigating the filesystem

| Command | What it does | Syntax | Example |
|---------|----------------------------|---------------------------------|--------------|
| pwd | Prints current directory | pwd | pwd |
| cd | Changes directory | cd + destination | cd Downloads |
| ls | Lists files of a directory | ls + option + directory to list | ls -a |

Basic terminology

- **File system:** The way files are stored and organized.
- **Current directory:** The directory where you are at the moment.
- parent directory: Directory containing the current directory.
- the difference between your home directory and the home directory: "Your home directory" refers to the user's home directory. "The home directory" refers to the home directory located in the root.
- pathname: Indicates the location of the file in the filesystem.
- **relative path:** Location of a file starting from the current working directory or a directory that is located inside the current working directory.
- absolute path: Location of a file starting from the root of the file system.