05. Navigation

commands

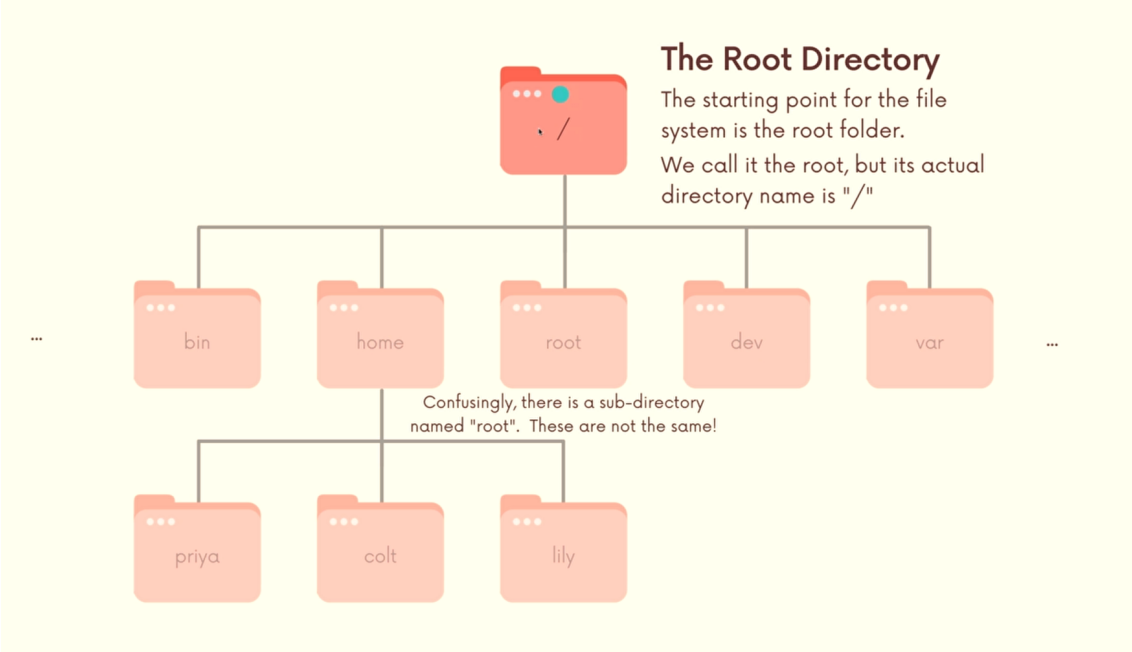
command	application
xdg-open /	open graphical file system from root directory
xdg-open ~	open graphical file system from home directory
pwd	prints the path of current working directory starting from the root
ls	list the contents of current directory
ls <direcotry_path>	list the contents of passed directory
cd <dir_name>	move to passed directory
cd ../	move back one directory above

01. What actually matters in this section

- we will explore file systems and navigations.

02. The Root directory

- The root directory is a top-level folder. It is the starting point of the file system for the root folder. It is not having a name but just a `/` as naming.
- There is a separate directory called `root` as a sub-directory of the root directory `/` .
- the file structure in ubuntu:



03. The Home Directory

- `/home` contains a home folder for each user on the system. For example, my home folder is located at `/home/pank`
- Anything related to a specific user is inside of `home/dirname`
- Both root directory and home directory have their own shorthands.
- `/`: root directory

- `~`: home directory

04. PWD

- The command prints the working directory
- prints the path of the current working directory starting from the root

05. Using ls

- It prints lists of fields of the contents of a directory.

06. Helpful options for ls

- `ls -l`: prints in a long listing format. Shows far more information about each file/folder.
- `ls -a`: prints hidden files as well which begins with `.`
- `ls -la`: prints detailed information including hidden files which begins with `.`

07. Changing directories with cd

- The `cd` command is used to change the current working directory, “moving” into another directory.
- we can use `cd ../` to move to one level up directory

08. Relative vs Absolute paths

Relative paths

- Relative paths are paths that specify a directory/file relative to the current directory.

- The path we use as relative is only usable from the directory level
- example: Suppose I'm in directory `pank>folder1` which has folders `f1, f2, f3` then to move to any of them by `cd f1/f2/f3`. But if I'm outside of `pank>folder1` then it can't be done since the previous path was relative to the directory I was working with.

Absolute paths

- Absolute paths start from the root directory `/`
- Since these paths start from the root directory it can be relevant to use from any directory from the system
- example: to go to `folder1` which is on `pank>desktop>folders`

```
cd /home/pank/desktop/folders/folder1
```

09. Overview of other folders

- Inside of `bin` there are binary commands like man, PWD, ls
- inside of `etc` there are configuration files and initialization scripts
- inside of `media` there are attachable media contents and configs
- inside of `var` there are logs, caches, and other related files
- inside of `root` it is accessible for superusers only. It is the home folder the superuser
- inside of `usr` there are lots of executable files which contains files which is related to the installed programs