. Create a structure as follows in home directory: [CO1] linux

jims@ubuntu:~/Desktop/jims$ su

Password:

root@ubuntu:/home/jims/Desktop/jims# mkdir linux

root@ubuntu:/home/jims/Desktop/jims# mkdir linux/shell

root@ubuntu:/home/jims/Desktop/jims# cat > linux/shell/command

helloooo

root@ubuntu:/home/jims/Desktop/jims# mkdir linux/userfiles

root@ubuntu:/home/jims/Desktop/jims# mkdir linux/userfiles/scripts

root@ubuntu:/home/jims/Desktop/jims# mkdir linux/userfiles/personal

root@ubuntu:/home/jims/Desktop/jims# tree linux

linux

├── shell

│ └── command

└── userfiles

    ├── personal

    └── scripts

4 directories, 1 file

2. Create a file “text” in the personal directory and then copy the file into linux directory. [CO1,CO2]

root@ubuntu:/home/jims/Desktop/jims# cat > linux/userfiles/personal/text

this is a text file

tree linux

^C

root@ubuntu:/home/jims/Desktop/jims# tree linux

linux

├── shell

│ └── command

└── userfiles

    ├── personal

    │ └── text

    └── scripts

4 directories, 2 files

root@ubuntu:/home/jims/Desktop/jims# cp -r linux/userfiles/personal/text linux

root@ubuntu:/home/jims/Desktop/jims# tree linux

linux

├── shell

│ └── command

├── text

└── userfiles

    ├── personal

    │ └── text

    └── scripts

4 directories, 3 files

3. Create 5 files prog1, prog2, prog3, prog4, prog5 in the scripts directory. Copy the directory structure userfiles in shell directory. [CO1,CO2]

root@ubuntu:/home/jims/Desktop/jims# cat > linux/userfiles/scripts/prog1

this is prog1

root@ubuntu:/home/jims/Desktop/jims# cat > linux/userfiles/scripts/prog2

this is prog2

root@ubuntu:/home/jims/Desktop/jims# cat > linux/userfiles/scripts/prog3

this is prog3

root@ubuntu:/home/jims/Desktop/jims# cat > linux/userfiles/scripts/prog4

this is prog4

root@ubuntu:/home/jims/Desktop/jims# cat > linux/userfiles/scripts/prog5

this is prog5

root@ubuntu:/home/jims/Desktop/jims# tree linux

linux

├── shell

│ └── command

├── text

└── userfiles

    ├── personal

    │ └── text

    └── scripts

        ├── prog1

        ├── prog2

        ├── prog3

        ├── prog4

        └── prog5

4 directories, 8 files

root@ubuntu:/home/jims/Desktop/jims# cp -r linux/userfiles linux/shell

root@ubuntu:/home/jims/Desktop/jims# tree linux

linux

├── shell

│ ├── command

│ └── userfiles

│ ├── personal

│ │ └── text

│ └── scripts

│ ├── prog1

│ ├── prog2

│ ├── prog3

│ ├── prog4

│ └── prog5

├── text

└── userfiles

    ├── personal

    │ └── text

    └── scripts

        ├── prog1

        ├── prog2

        ├── prog3

        ├── prog4

        └── prog5

7 directories, 14 files

4. Count total number of words, characters and lines in the files in scripts

directory. [CO1,CO2]

root@ubuntu:/home/jims/Desktop/jims# wc -cl linux/userfiles/scripts/prog1

0 0 linux/userfiles/scripts/prog1

root@ubuntu:/home/jims/Desktop/jims# wc -cl linux/userfiles/scripts/prog2

 1 15 linux/userfiles/scripts/prog2

root@ubuntu:/home/jims/Desktop/jims# wc -cl linux/userfiles/scripts/prog3

 1 14 linux/userfiles/scripts/prog3

root@ubuntu:/home/jims/Desktop/jims# wc -cl linux/userfiles/scripts/prog4

 1 14 linux/userfiles/scripts/prog4

root@ubuntu:/home/jims/Desktop/jims# wc -cl linux/userfiles/scripts/prog5

 1 14 linux/userfiles/scripts/prog5

5. Compare files prog1 and prog2. [CO1,CO2]

6. Split prog1 into multiple files (with five lines each). [CO1,CO2]

root@ubuntu:/home/jims/Desktop/jims# cmp linux/userfiles/scripts/prog1 linux/userfiles/scripts/prog2

root@ubuntu:/home/jims/Desktop/jims# cmp linux/userfiles/scripts/prog1 linux/userfiles/scripts/prog2

root@ubuntu:/home/jims/Desktop/jims# split -5 linux/userfiles/scripts/prog1

root@ubuntu:/home/jims/Desktop/jims# ls

linux

7. Delete scripts (from userfiles) directory. [CO1,CO2]

root@ubuntu:/home/jims/Desktop/jims# rm -r linux/userfiles/scripts

root@ubuntu:/home/jims/Desktop/jims# tree linux

linux

├── shell

│ ├── command

│ └── userfiles

│ ├── personal

│ │ └── text

│ └── scripts

│ ├── prog1

│ ├── prog2

│ ├── prog3

│ ├── prog4

│ └── prog5

├── text

└── userfiles

    └── personal

        └── text

6 directories, 9 files

8. Add execute permission to the user and write permission to group and others on commands file. [CO1,CO2]

root@ubuntu:/home/jims/Desktop/jims# chmod u+x,g+w,o+w linux/shell/command

root@ubuntu:/home/jims/Desktop/jims# ls -l linux/shell/command

-rwxrw-rw- 1 root root 9 Sep 30 08:42 linux/shell/command

9. Change permission of file “commands” to r--r--r—(Using Octal Notation). [CO1,CO2]

root@ubuntu:/home/jims/Desktop/jims# chmod 444 linux/shell/command

root@ubuntu:/home/jims/Desktop/jims# ls -l linux/shell/command

-r--r--r-- 1 root root 9 Sep 30 08:42 linux/shell/command