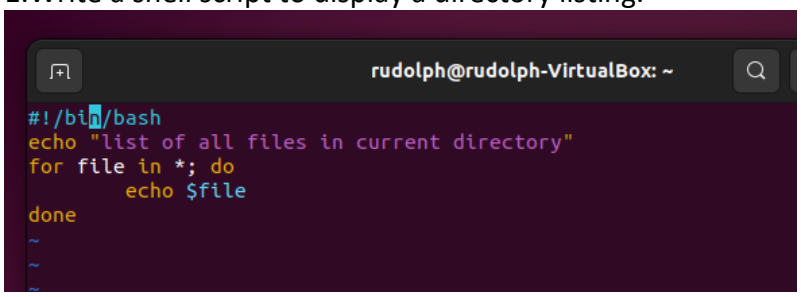
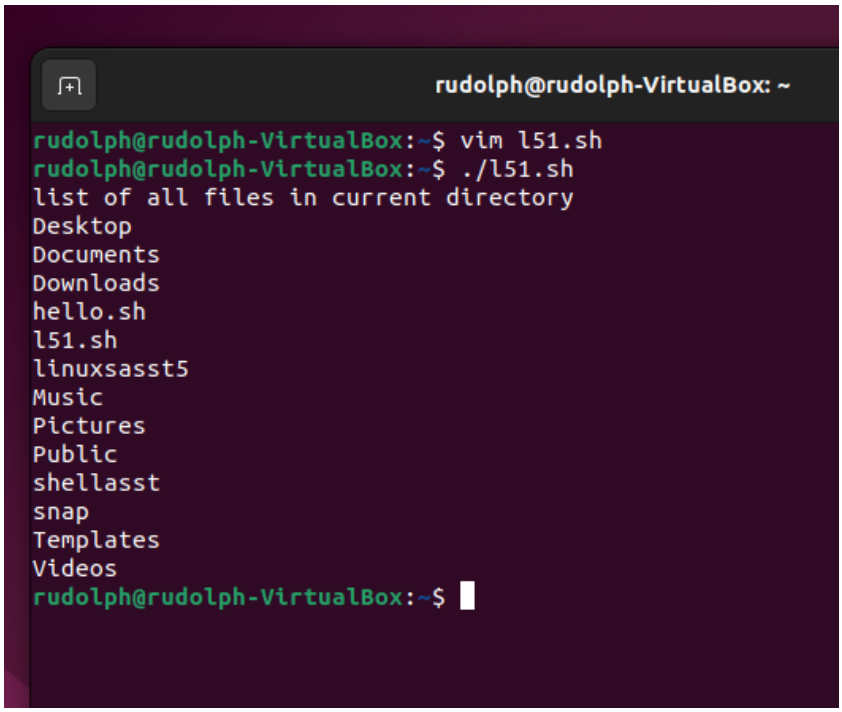
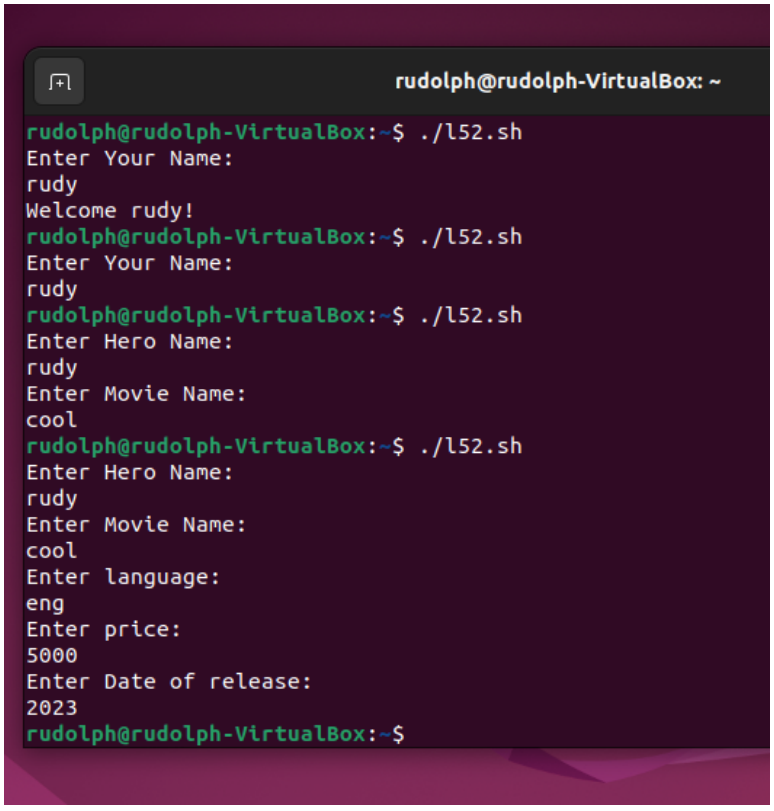
Linux assignment 5

1.Write a shell script to display a directory listing.

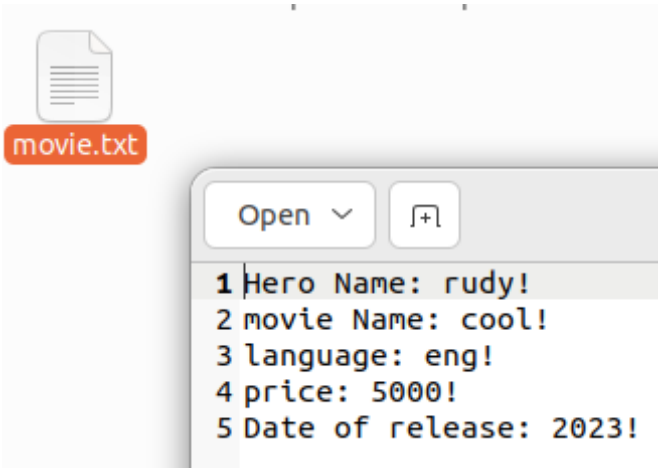




2. Write a shell script for accepting the following information and store it in a file. Hero Name., Movie Name, Language, Price and Date of release.



```
rudolph@rudolph-VirtualBox: ~
#!/bin/bash

echo "Enter Hero Name: "
read var

echo "Enter Movie Name: "
read var1

echo "Enter language: "
read var2

echo "Enter price: "
read var3

echo "Enter Date of release: "
read var4

echo "Hero Name: ${var}!" >> movie.txt
echo "movie Name: ${var1}!" >> movie.txt
echo "language: ${var2}!" >> movie.txt
echo "price: ${var3}!" >> movie.txt
echo "Date of release: ${var4}!" >> movie.txt
~
"l52.sh" 22L, 396B
```

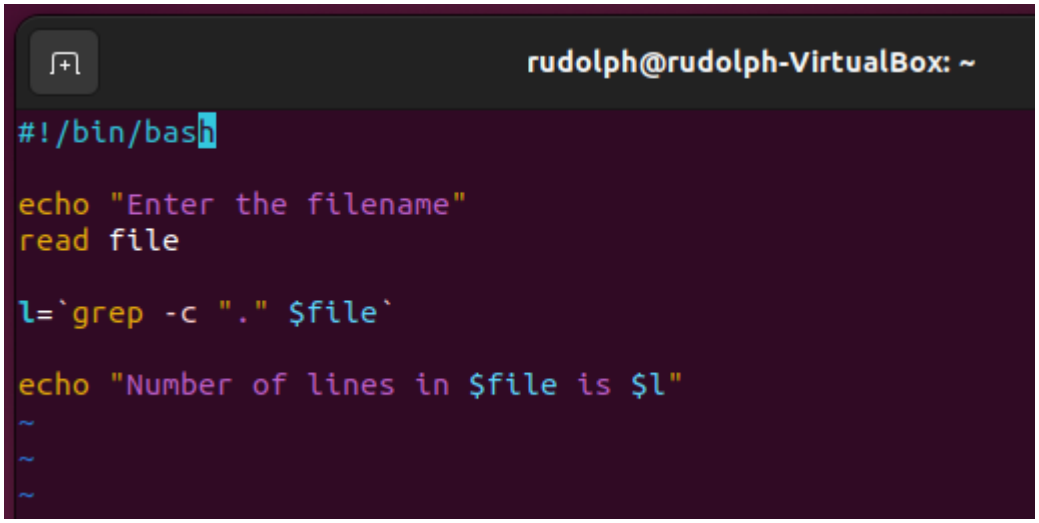


3. Write a shell script to examine all the number from 1 to 999 and display all those number whose sum of cube of the digit is equal to the number. e.g. 371 = 3×3×3+7×7×7+1×1×1 (armstrong)

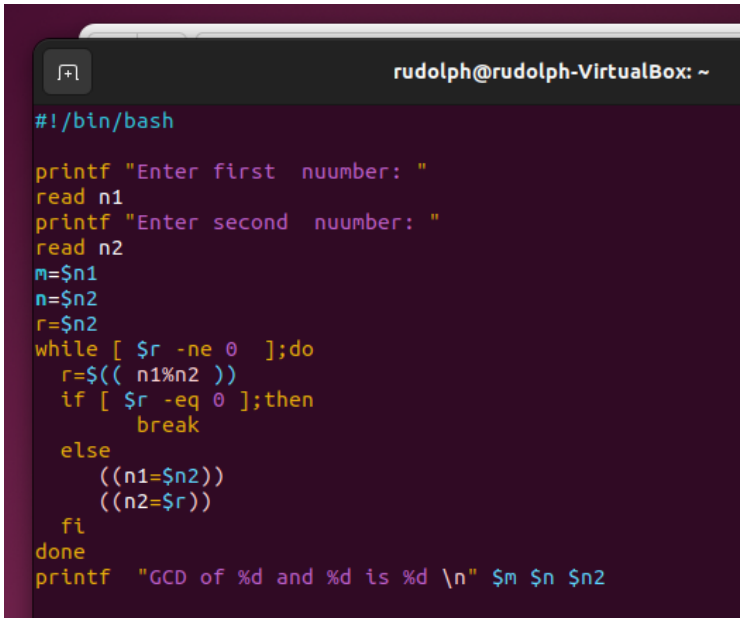
```
rudolph@rudolph-VirtualBox: ~
rudolph@rudolph-VirtualBox:~$ pwd
/home/rudolph
rudolph@rudolph-VirtualBox:~$ vim l53.sh
rudolph@rudolph-VirtualBox:~$ chmod a+x l53.sh
rudolph@rudolph-VirtualBox:~$ ./l53.sh
test
rudolph@rudolph-VirtualBox:~$ ./l53.sh
153
370
371
407
rudolph@rudolph-VirtualBox:~$ ./l53.sh
displaying armstrong numbers bet 1 to 999
153
370
371
407
rudolph@rudolph-VirtualBox:~$
```

```
Open
l53.sh
~/
#!/bin/bash
echo "displaying armstrong numbers bet 1 to 999"
i=100
while [ $i -lt 1000 ]
do
    x=$i
    sum=0
    r=0
    n=0

    while [ $x -gt 0 ]
    do
        r=`expr $x % 10`
        n=`expr $r \* $r \* $r`
        sum=`expr $sum + $n`
        x=`expr $x / 10`
    done
    if [ $sum -eq $i ]
    then
        echo $sum
    fi
    i=`expr $i + 1`
done
```

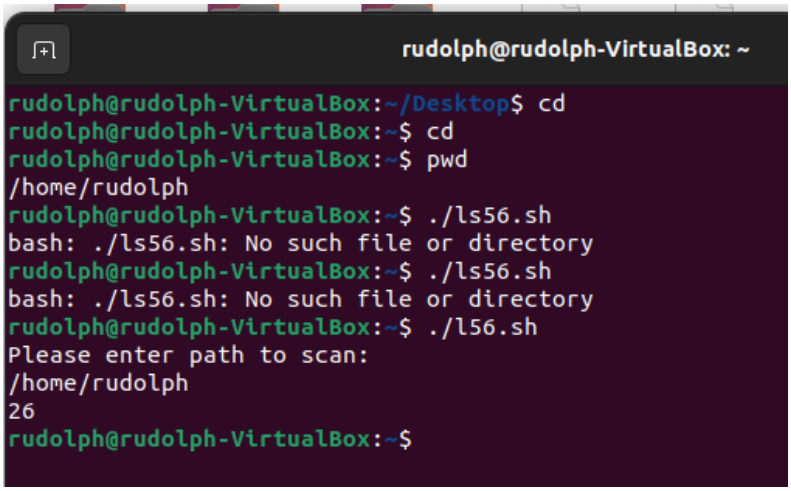
4. Write a shell script to define a function line count that counts the number of lines in the file provided as a command line argument.

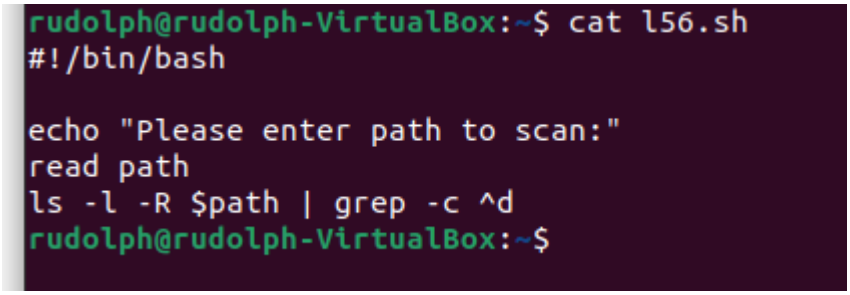


5. Write a shell script to find the Greatest Common Divisor (GCD) of two given numbers A and B.

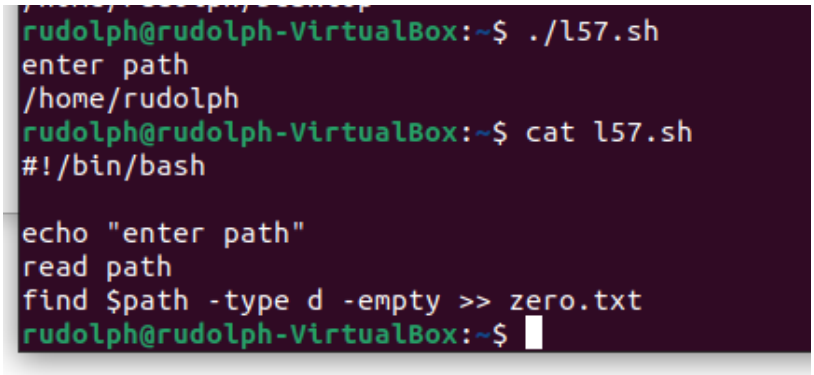


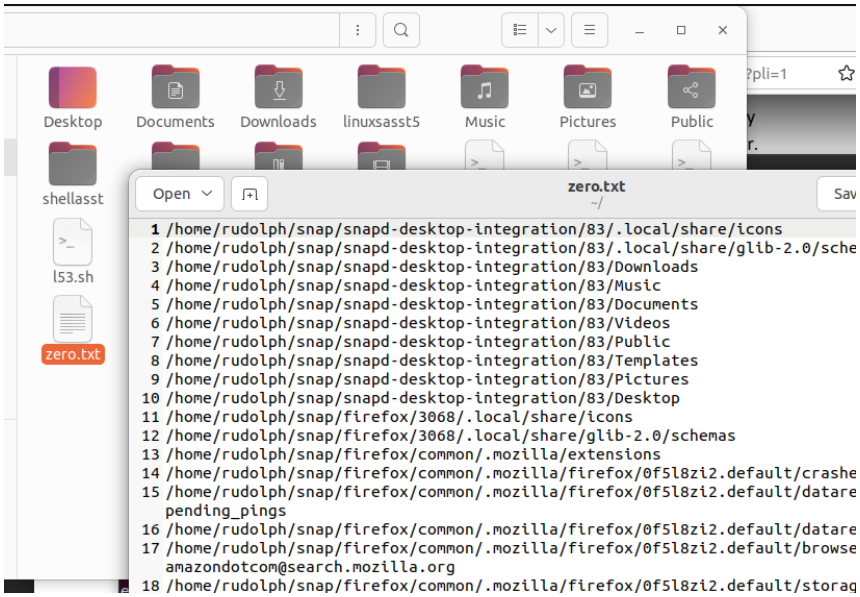
6. Write a shell script takes the name a path, and counts all the sub directories. (done)



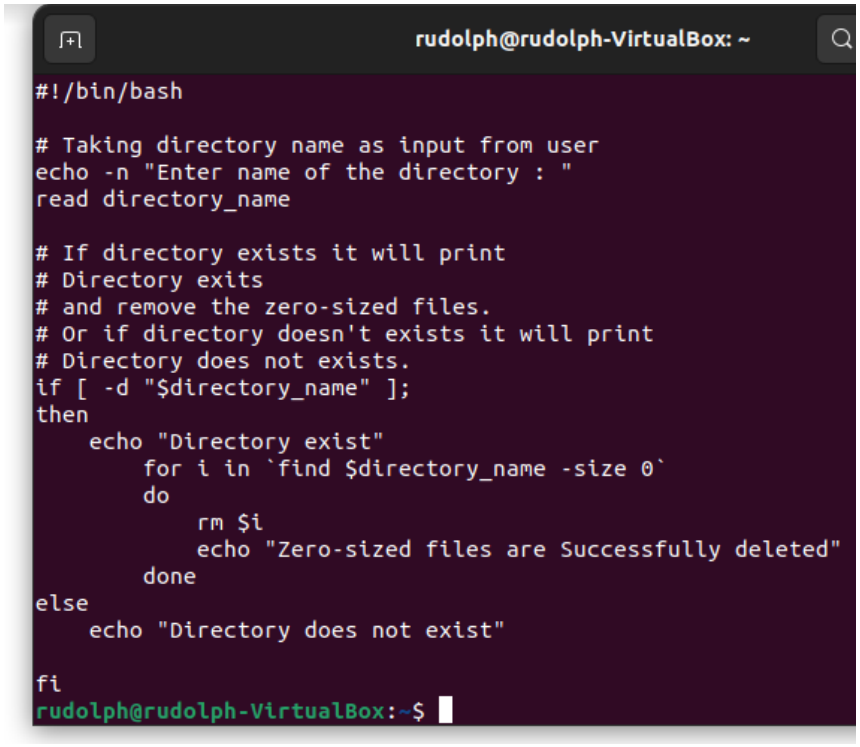


7. Write a shell script that takes a name of a folder as a command line argument, and produce a file that contains the names of all sub folders with size 0.

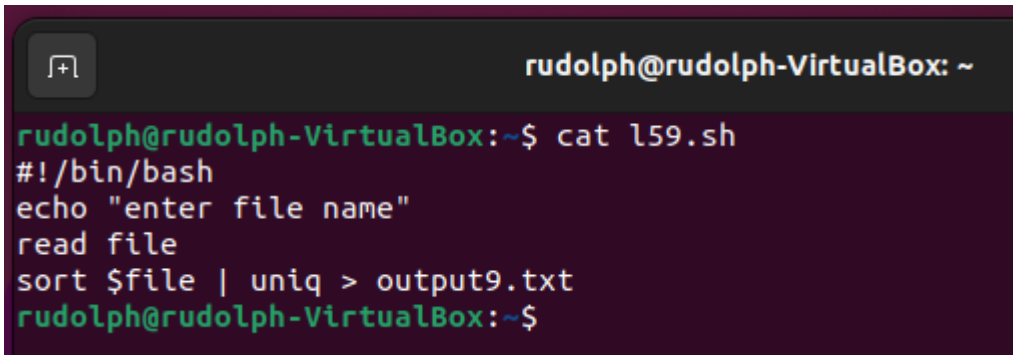




8. Write a shell script that takes a name of a folder, and delete all sub folders of size 0.



9. Write a shell script that will take an input file and remove identical lines.



Open

random.txt
~/

```
1 Prog languages
2 python
3 ruby
4 c
5 c++
6 go
7 java
8 javascript
9 javascript
10 javascript
```

Open

output9.txt
~/

random.txt

```
1 c
2 c++
3 go
4 java
5 javascript
6 Prog languages
7 python
8 ruby
```

10. Write a shell scripts to count number of vowels in “vowels.txt” file ignoring the case.

rudolph@rudolph-VirtualBox: ~

```
rudolph@rudolph-VirtualBox:~/Desktop$ cd
rudolph@rudolph-VirtualBox:~$ cat ls510.sh
cat: ls510.sh: No such file or directory
rudolph@rudolph-VirtualBox:~$ cat l510.sh
#!/bin/bash

cnt=0
while read line;
do

IFS=' ' read -a lines <<< "${line}"
for i in "${lines[@]}"
do
vowels=$(echo $i | grep -io [aeiou]|wc -l)
if [ "$vowels" > "0" ]
then
let cnt=cnt+vowels
fi

done
done <vowels.txt
echo "$cnt vowels"
rudolph@rudolph-VirtualBox:~$
```

```
rudolph@rudolph-VirtualBox:~$ ./l510.sh
10 vowels
rudolph@rudolph-VirtualBox:~$
```