```
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash hello.sh
Hello Mam
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ vi greeing.sh
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ cat greeting.sh
cat: greeting.sh: No such file or directory
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ cat greeing.sh
greeting=Hey!
name=Shirshak
echo $greeing $name
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash greeing.sh
Shirshak
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ vi greeing.sh
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ cat greeing.sh
greeting=Hey!
name=Shirshak
echo $greeting $name
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash greeing.sh
Hey! Shirshak
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ vi addition.sh
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ cat addition.sh
echo "Enter a numner"
read a

echo "Enter a numner"
read b

var=$((a+b))
echo Addition =  $var

shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash addition.sh
Enter a numner
4
Enter a numner
5
Addition = 9
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ vi compare.sh
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ cat compare.sh
read x
read y

if [ $x -gt $y ]
then
echo X is greater than Y
elif [ $x -lt $y ]
then
echo X is less than Y
elif [ $x -eq $y ]
then
echo X is equal to Y
fi
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash compare.sh
10
100
X is less than Y
```

```
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ vi triangleEquality.sh
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ cat triangleEquality.sh
read a
read b
read c

if [ $a == $b -a $b == $c -a $a == $c ]
then
echo EQUILATERAL

elif [ $a == $b -o $b == $c -o $a == $c ]
then
echo ISOSCELES
else
echo SCALENE

fi
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash triangleEquality.sh
12
34
56
SCALENE
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash triangleEquality.sh
10
10
10
EQUILATERAL
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ vi whileLoop.sh
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ cat whileLoop.sh
#!/bin/bash
i=1
while [[ $i -le 10 ]] ; do
   echo "$i"
  (( i += 1 ))
done
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash whileLoop.sh
1
2
3
4
5
6
7
8
9
10
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$
```

```
shirshak@shirshak-Nitro-AN515-57:~$ cd shellscripting
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ vi mergeSort.sh
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ cat mergeSort.sh
arr=(98 34 87 88 51)

n=${#arr[@]}

for ((i=0; i<n-1; i++))
do

    min=i

    for ((j=i+1; j<n; j++))
    do
        if [[ ${arr[j]} < ${arr[min]} ]]; then
            min=$j
        fi
    done

    temp=${arr[i]}
    arr[i]=${arr[min]}
    arr[min]=$temp
done

echo ${arr[@]}
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash mergeSort.sh
34 51 87 88 98
```

```
echo ${arr[@]}
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash mergeSort.sh
34 51 87 88 98
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ vi Search.sh
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ cat Search.sh
arr=(4 65 22 2 4)

n=${#arr[@]}

search=8

found=0

for ((i=0; i<n; i++))
do
    if [[ ${arr[i]} == $search ]]; then
        echo "Element found at index $i"
        found=1
        break
    fi
done

if [[ $found == 0 ]]; then
    echo "Element not found in the array"
fi
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash Search.sh
Element not found in the array
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ vi Search.sh
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash Search.sh
Element found at index 1
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ cat Search.sh
arr=(4 65 22 2 4)

n=${#arr[@]}

search=65

found=0

for ((i=0; i<n; i++))
do
    if [[ ${arr[i]} == $search ]]; then
        echo "Element found at index $i"
        found=1
        break
    fi
done

if [[ $found == 0 ]]; then
    echo "Element not found in the array"
fi
shirshak@shirshak-Nitro-AN515-57:~/shellscripting$ bash Search.sh
Element found at index 1
```