

1. Write a shell script that takes a command-line argument and report its file name, argument1, argument2 etc. No. of arguments, argument values as a single string.

```
#!/bin/sh
```

```
echo "File name: $0"
echo "First argument: $1"
echo "Second argument: $2"
echo "Number of arguments: $#"
```

```
echo "List of arguments: $@"
```

Output: `sh arg.sh Keerthana Hi 1 2`

File name: arg.sh

First argument: Keerthana

Second argument: Hi

Number of arguments: 4

List of arguments: Keerthana Hi 1 2

2. Write a shell script that deletes all lines containing a specified word in one or more files supplied as arguments to it.

```
echo "Enter word"
```

```
read word
```

```
for file in $*
```

```
do
```

```
echo "-----"
```

```
echo "file before removing $word"
```

```
cat $file
```

```
grep -v $word $file > test
```

```
mv test $file
```

```
echo "File after removing $word"
```

```
cat $file
```

```
done
```

Output: `sh prog.sh file1.sh file2.sh`

Enter word

Hi

File before removing Hi

Hi

Hello

Bye

File after removing hi
Hello
Bye

File before removing hi
Hi Hola
Bye Bye

file after removing hi
Bye Bye

3. Write a C program that takes one or more file or directory names as command line input and reports the following information on the file:

- i) File type
- ii) Number of links
- iii) Read, write and execute permissions.
- iv) Time of last access

```
#!/bin/sh
```

```
for file in $*
```

```
do
```

```
echo "File type:\c"
```

```
file $file
```

```
echo "Number of links:\c"
```

```
ls -l $file | cut -b 12-13
```

```
echo "Read write execute permissions:  
(Read:r, Write:w, Execute:x,  
Denied: -)\c"
```

```
ls -l $file | cut -b 2-4
```

```
echo "Time of last access:\c"
```

```
date -r $file
```

```
done
```

file
27/12/22

Output:

File type : file1.sh : ASCII text

Number of links : 1

Read write execute permissions : rw-

Time of last access : Tuesday 27 December 2022
12:07:58 PM IST

File type : file2.sh : ASCII text

Number of links : 1

Read write execute permissions : rw-

Time of last access : Tuesday 27 December 2022 12:07:58 PM IST