Using sed utility

1- Display the lines that contain the word "lp" in /etc/passwd file.

```
#! /bin/bash
echo "search about word in text"
head /etc/passwd > op.txt
sed -n '/lp/p' op.txt
```

2- Display /etc/passwd file except the third line.

```
#! /bin/bash
echo "except third line"
head /etc/passwd | sed '3d' /etc/passwd
```

3- Display /etc/passwd file except the last line.

```
#! /bin/bash
echo "except last line"
head /etc/passwd > op.txt
sed \$d op.txt
```

4- Display /etc/passwd file except the lines that contain the word "lp"

```
#! /bin/bash
echo "except the lines that contain the word "
head /etc/passwd > op.txt
sed -n '/lp/!p' op.txt
```

5- Substitute all the words that contain "lp" with "mylp" in /etc/passwd file

```
#! /bin/bash
echo "replace lp word with mylp"
head /etc/passwd > op.txt
sed 's/lp/mylp/g' op.txt
```

Using awk utility

1- Print full name (comment) of all users in the system.

```
#! /bin/bash
echo "output is "
id |awk -F'[)(]' '{print $2}'
```

2-   Print login, full name (comment) and home directory of all users.(Print each line preceded by a line number)

```
#! /bin/bash
echo "output is "
awk -F: '{ print "login: "$1 "Full Name: "$2 "Home Dir: "$6 }'  /etc/passwd  > op1.txt
```

3-   Print login, uid and full name (comment) of those uid is greater than 500

```
#! /bin/bash
echo "output is "
awk -F: '{if ($3 >= 500) { print "login: "$1 " Full Name: "$2 " UID: "$3 " Home Dir: "$6 } }' /etc/passwd >
op1.txt
```

4-   Print login, uid and full name (comment) of those uid is exactly 500

```
#! /bin/bash
echo "output is "
awk -F: '{if ($3 = 500) { print "login: "$1 " Full Name: "$2 " UID: "$3 " Home Dir: "$6 }
}' /etc/passwd > op1.txt
```

5-   Print line from 5 to 15 from /etc/passwd

```
#! /bin/bash
echo "output is "
awk 'FNR>=5 && FNR<=15' /etc/passwd
```

6-   Change lp to mylp

```
#! /bin/bash
echo "output is :"
head /etc/passwd > op1.txt
awk '{gsub(/lp/,"mylp"); print}' op1.txt
```

7-   Print all information about greatest uid.

```
#! /bin/bash
echo "output is :"
awk '{if ($3 >= 500) {print $0} }' /etc/passwd > op.txt
```

8-   Get the sum of all accounts id's.

```
#! /bin/bash
echo "output is :"
awk -F: '{ print $3 }' /etc/passwd > op.txt
```

```
op=$(awk -F':' '{sum+=$1}END{print sum;}' op.txt)
echo "the sum of UID is : $op"
```