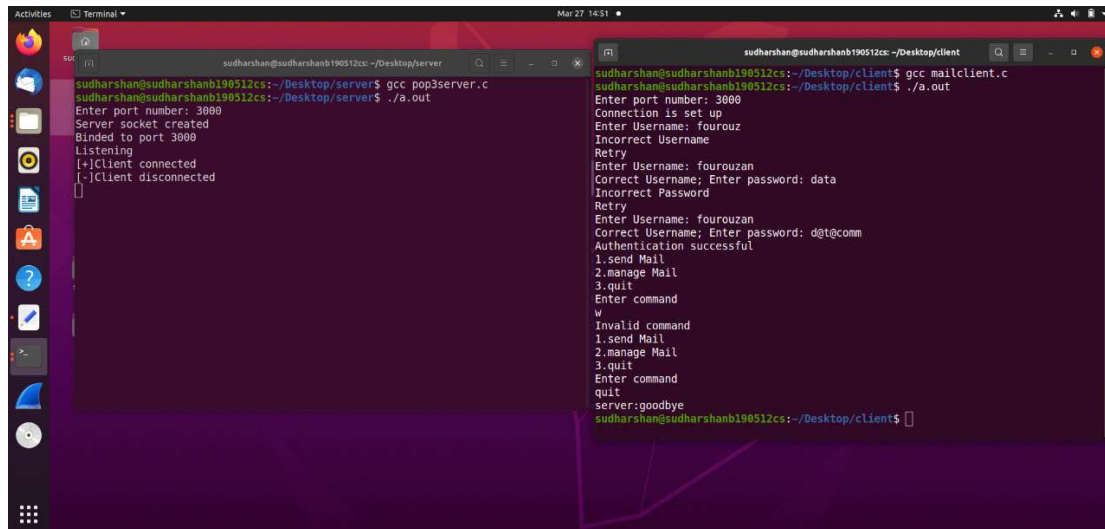


2)POP3 functionalities sample run covering all cases included in the codes

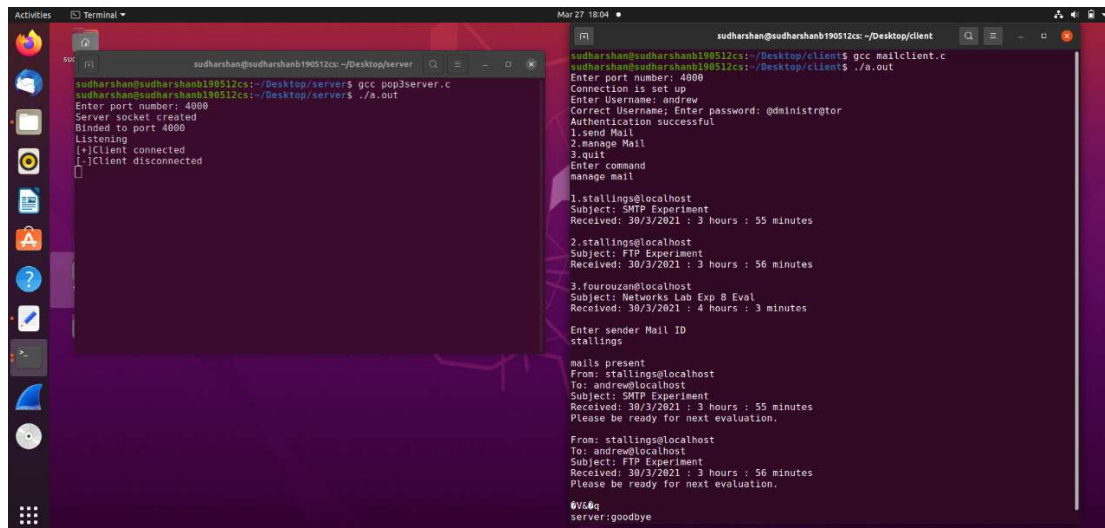
a)authentication process of pop3server(same as smtp server)



```
sudharshan@sudharshanb190512cs: ~/Desktop/server
sudharshan@sudharshanb190512cs:~/Desktop/server$ gcc pop3server.c
sudharshan@sudharshanb190512cs:~/Desktop/server$ ./a.out
Enter port number: 3000
Server socket created
Binded to port 3000
Listening
[+]Client connected
[-]Client disconnected

sudharshan@sudharshanb190512cs:~/Desktop/client$ gcc mailclient.c
sudharshan@sudharshanb190512cs:~/Desktop/client$ ./a.out
Enter port number: 3000
Connection is set up
Enter Username: fourouz
Incorrect Username
Retry
Enter Username: fourouzan
Correct Username; Enter password: data
Incorrect Password
Retry
Enter Username: fourouzan
Correct Username; Enter password: d@t@comm
Authentication successful
1.send Mail
2.manage Mail
3.quit
Enter command
w
Invalid command
1.send Mail
2.manage Mail
3.quit
Enter command
quit
server:goodbye
sudharshan@sudharshanb190512cs:~/Desktop/client$
```

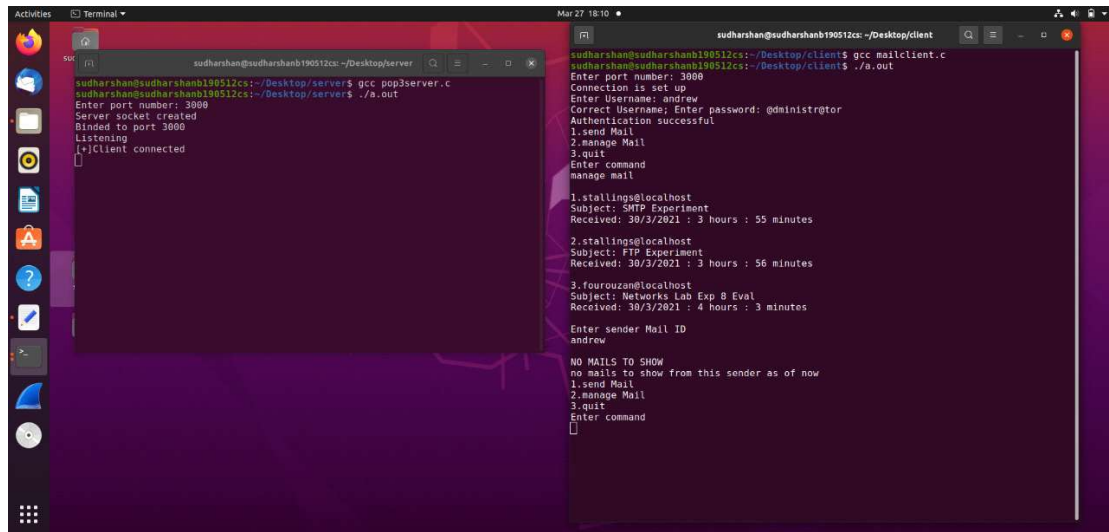
b)preview of whole inbox+filtering specific sender mails



```
sudharshan@sudharshanb190512cs:~/Desktop/server$ gcc pop3server.c
sudharshan@sudharshanb190512cs:~/Desktop/server$ ./a.out
Enter port number: 4000
Server socket created
Binded to port 4000
Listening
[+]Client connected
[-]Client disconnected

sudharshan@sudharshanb190512cs:~/Desktop/client$ gcc mailclient.c
sudharshan@sudharshanb190512cs:~/Desktop/client$ ./a.out
Enter port number: 4000
Connection is set up
Enter Username: andrew
Correct Username; Enter password: @adminis@r@r
Authentication successful
1.send Mail
2.manage Mail
3.quit
Enter command
manage mail
1.stallings@localhost
Subject: SMTP Experiment
Received: 30/3/2021 : 3 hours : 55 minutes
2.stallings@localhost
Subject: FTP Experiment
Received: 30/3/2021 : 3 hours : 56 minutes
3.fourouzan@localhost
Subject: Networks Lab Exp 8 Eval
Received: 30/3/2021 : 4 hours : 3 minutes
Enter sender Mail ID
stallings
mails present
From: stallings@localhost
To: andrew@localhost
Subject: SMTP Experiment
Received: 30/3/2021 : 3 hours : 55 minutes
Please be ready for next evaluation.
From: stallings@localhost
To: andrew@localhost
Subject: FTP Experiment
Received: 30/3/2021 : 3 hours : 56 minutes
Please be ready for next evaluation.
@V6@q
server:goodbye
```

c)no mails from asked sender case

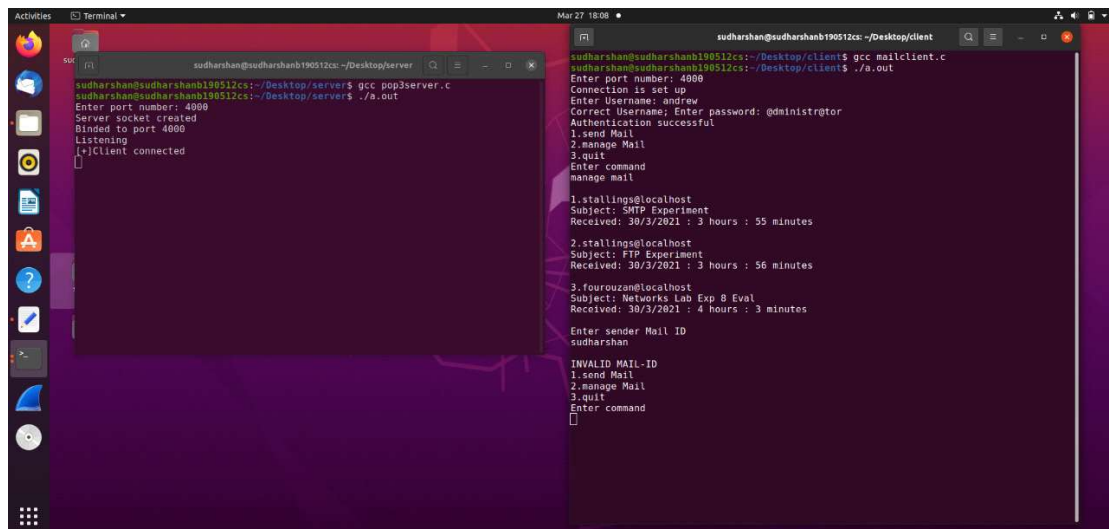


```
sudharshan@sudharshanb190512cs: ~/Desktop/server
sudharshan@sudharshanb190512cs:~/Desktop/server$ gcc pop3server.c
Enter port number: 3000
Server socket created
Binded to port 3000
Listening
[*]Client connected

sudharshan@sudharshanb190512cs: ~/Desktop/client
sudharshan@sudharshanb190512cs:~/Desktop/client$ gcc mailclient.c
Enter port number: 3008
Connection is set up
Enter Username: andrew
Correct Username; Enter password: @dministr@tor
Authentication successful
1.send Mail
2.manage Mail
3.quit
Enter command
manage mail

1.stallings@localhost
Subject: SMTP Experiment
Received: 30/3/2021 : 3 hours : 55 minutes
2.stallings@localhost
Subject: FTP Experiment
Received: 30/3/2021 : 3 hours : 56 minutes
3.fourouzan@localhost
Subject: Networks Lab Exp 8 Eval
Received: 30/3/2021 : 4 hours : 3 minutes
Enter sender Mail ID
andrew
NO MAIL TO SHOW
no mails to show from this sender as of now
1.send Mail
2.manage Mail
3.quit
Enter command
```

d)invalid sender mail id case

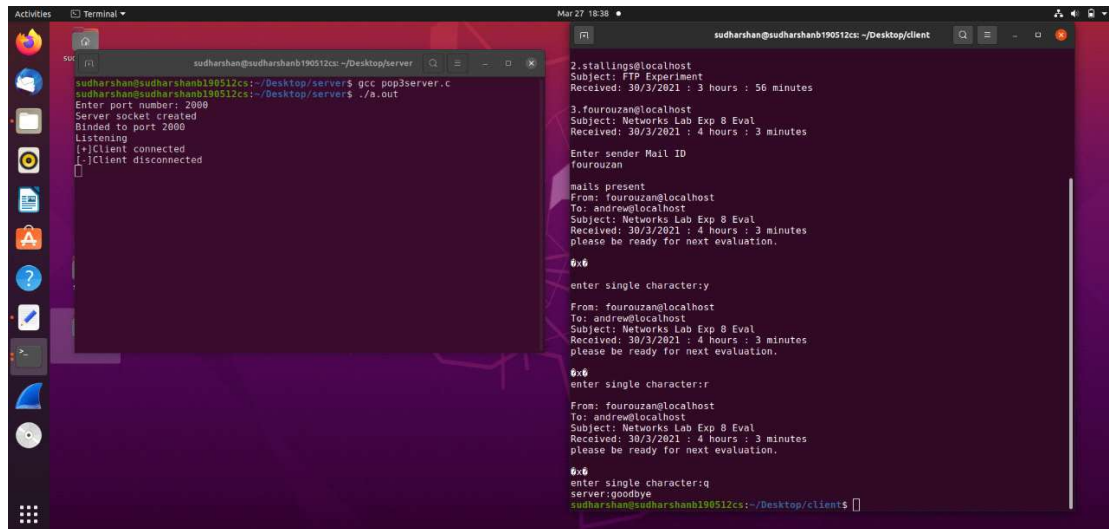


```
sudharshan@sudharshanb190512cs: ~/Desktop/server
sudharshan@sudharshanb190512cs:~/Desktop/server$ gcc pop3server.c
Enter port number: 4000
Server socket created
Binded to port 4000
Listening
[*]Client connected

sudharshan@sudharshanb190512cs: ~/Desktop/client
sudharshan@sudharshanb190512cs:~/Desktop/client$ gcc mailclient.c
Enter port number: 4008
Connection is set up
Enter Username: andrew
Correct Username; Enter password: @dministr@tor
Authentication successful
1.send Mail
2.manage Mail
3.quit
Enter command
manage mail

1.stallings@localhost
Subject: SMTP Experiment
Received: 30/3/2021 : 3 hours : 55 minutes
2.stallings@localhost
Subject: FTP Experiment
Received: 30/3/2021 : 3 hours : 56 minutes
3.fourouzan@localhost
Subject: Networks Lab Exp 8 Eval
Received: 30/3/2021 : 4 hours : 3 minutes
Enter sender Mail ID
sudharshan
INVALID MAIL-ID
1.send Mail
2.manage Mail
3.quit
Enter command
```

e)char options after filtering mails of specific sender(if 'q' closes connection,if any other character prints specific sender mails again)



```
sudharshan@sudharshanb190512cs: ~/Desktop/server
sudharshan@sudharshanb190512cs:~/Desktop/server$ gcc pop3server.c
sudharshan@sudharshanb190512cs:~/Desktop/server$ ./a.out
Enter port number: 2000
Server socket created
Binded to port 2000
Listening
[+]Client connected
[-]Client disconnected

sudharshan@sudharshanb190512cs: ~/Desktop/client
2.stallings@localhost
Subject: FTP Experiment
Received: 30/3/2021 : 3 hours : 56 minutes

3.fourouzan@localhost
Subject: Networks Lab Exp 8 Eval
Received: 30/3/2021 : 4 hours : 3 minutes

Enter sender Mail ID
fourouzan

mails present
From: fourouzan@localhost
To: andrew@localhost
Subject: Networks Lab Exp 8 Eval
Received: 30/3/2021 : 4 hours : 3 minutes
please be ready for next evaluation.

0x6
enter single character:y

From: fourouzan@localhost
To: andrew@localhost
Subject: Networks Lab Exp 8 Eval
Received: 30/3/2021 : 4 hours : 3 minutes
please be ready for next evaluation.

0x6
enter single character:r

From: fourouzan@localhost
To: andrew@localhost
Subject: Networks Lab Exp 8 Eval
Received: 30/3/2021 : 4 hours : 3 minutes
please be ready for next evaluation.

0x6
enter single character:q
server:goodbye
sudharshan@sudharshanb190512cs:~/Desktop/client$
```