

Sample run of the programs covering all functionalities included in programs.

a)SERVER

```
sudharshan@sudharshanb190512cs: ~/Desktop
sudharshan@sudharshanb190512cs:~/Desktop$ gcc 2s.c && ./a.out 3010
[+]TCP server socket created.
[+]Bound to the port number: 3010
Listening...
[+]Client1 connected
from client1:4+6
to client1:10
[+]Client2 connected
from client2:2-3
to client2:-1
from client1:3-4
to client1:-1
from client2:5+6
to client2:11
[+]Client3 connected
from client3:2+6
to client3:8
from client1:5+8
to client1:13
from client2:5+7
to client2:12
from client1:exit
[-]Client1 disconnected
from client2:5-9
to client2:-4
from client2:exit
[-]Client2 disconnected
from client3:4-5
to client3:-1
from client3:exit
[-]Client3 disconnected
```

b)CLIENT1

```
sudharshan@sudharshanb190512cs: ~/Desktop
sudharshan@sudharshanb190512cs:~/Desktop$ gcc 2c.c && ./a.out 3010
[+]TCP client socket created.
Connected to the server.
Enter valid query or exit
4+6
to server:4+6
from server:10
Enter valid query or exit
3-4
to server:3-4
from server:-1
Enter valid query or exit
5+8
to server:5+8
from server:13
Enter valid query or exit
exit
to server:exit
Disconnected from the server.
sudharshan@sudharshanb190512cs:~/Desktop$
```

c)CLIENT2

```
sudharshan@sudharshanb190512cs: ~/Desktop
sudharshan@sudharshanb190512cs:~/Desktop$ gcc 2c.c && ./a.out 3010
[+]TCP client socket created.
Connected to the server.
Enter valid query or exit
2-3
to server:2-3
from server:-1
Enter valid query or exit
5+6
to server:5+6
from server:11
Enter valid query or exit
5+7
to server:5+7
from server:12
Enter valid query or exit
5-9
to server:5-9
from server:-4
Enter valid query or exit
exit
to server:exit
Disconnected from the server.
sudharshan@sudharshanb190512cs:~/Desktop$
```

d)CLIENT3

```
sudharshan@sudharshanb190512cs: ~/Desktop
sudharshan@sudharshanb190512cs:~/Desktop$ gcc 2c.c && ./a.out 3010
[+]TCP client socket created.
Connected to the server.
Enter valid query or exit
2+6
to server:2+6
from server:8
Enter valid query or exit
4-5
to server:4-5
from server:-1
Enter valid query or exit
exit
to server:exit
Disconnected from the server.
sudharshan@sudharshanb190512cs:~/Desktop$
```