CN End Sem Lab Exam 1/1866

→ Basically speaking that application can be done in both ways using TCP support or UDP support. But in general we call that application need to be quick in delivering their messages to all. So when compared to TCP is quick but less reliable. So I am going to use UDP for the following.

Idea to satisfy requirements:

→ Assuming that all clients know the server socket we will proceed.

→ Whenever a new user joins the we will be authenticated via storing it to keep things simple.

→ Server will get a request from new client to register. We will use a structure array to keep track of client socket numbers.

→ Whenever a new user is added at server table it need change or notify of it with others.

→ So basically every user will have table of currently logged in users.

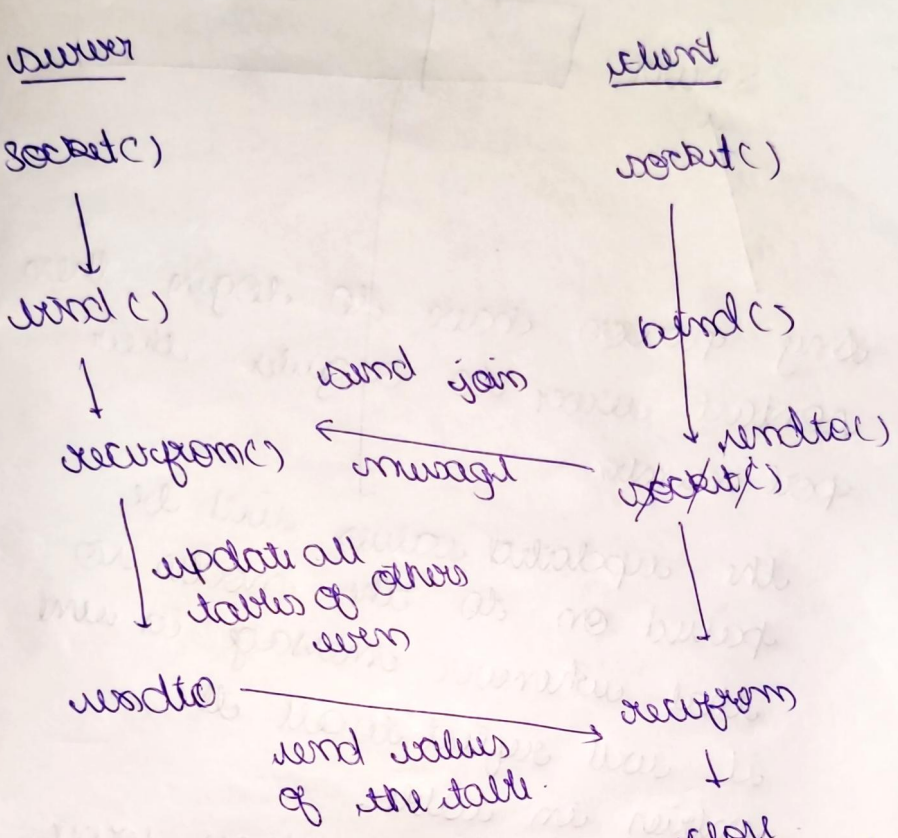
→ ~~Table~~ This table will be updated by server now and then by sending a message of newly added user.

→ Whenever user sends a message it will reach to all people present in this table.

→ This can be done using any of the TCP or UDP architecture.

→ We can use threads to operate the send and receive process so that they can occur simultaneously without any interruptions

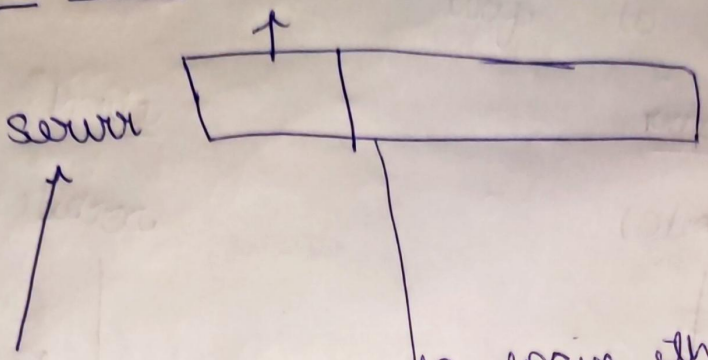
flow chart for more client wherein join at first



→ So we will add bind to client side also so that port will not be changed during the whole time

→ Whenever sender sends message it will be sent to all in the list.

Flow chart to store client id and



any person have to login then contact server to register their port number.

the updated values will be passed on to the nodes so that whenever message is sent it will reflect to all the entries in table.

This mechanism reduces server side busyness. Server can just look after the tables only and send whenever updated.