

## Programming Project: Client-Server Chat

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How to run:

1. cd into the program directory
  2. on terminal: `$python3 server.py`
  3. on terminal: `$python3 client.py`
  4. client talks first on chat, then server
- No threads used on server (does not support multiple concurrent connections)
  - Single socket for client. Single socket for server.
  - If a message on either side matches `'/q'`, the chat ends, the sockets close, and the program terminates.
  - Default port set to 12000

Screenshots:

```
Windows PowerShell
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PS C:\Users\matda> cd Desktop/chat
PS C:\Users\matda\Desktop\chat> python3 server.py
Socket listening, port: 12000
A client has connected to the server

Client : Hello server, how are you?
Server : I'm good client, how are things on your side?
Client : Things are great. I just got a new puppy
Server : Sounds cute. I hope you bring the pup over on the weekend
Client : Will do.
Server :
```

```
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PS C:\Users\matda> cd Desktop/chat
PS C:\Users\matda\Desktop\chat> python3 client.py
Socket connected to host port: 12000

Client : Hello server, how are you?
Server : I'm good client, how are things on your side?
Client : Things are great. I just got a new puppy
Server : Sounds cute. I hope you bring the pup over on the weekend
Client : Will do.
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PS C:\Users\matda> cd Desktop\chat
PS C:\Users\matda\Desktop\chat> python3 server.py
Socket listening, port: 12000
A client has connected to the server

Client : Hello server, how are you?
Server : I'm good client, how are things on your side?
Client : Things are great. I just got a new puppy
Server : Sounds cute. I hope you bring the pup over on the weekend
Client : Will do.
Server : Was good talking to you. Please terminate the connection on your next message

connection termination request received
Socket successfully closed
PS C:\Users\matda\Desktop\chat> |

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PS C:\Users\matda> cd Desktop\chat
PS C:\Users\matda\Desktop\chat> python3 client.py
Socket connected to host port: 12000

Client : Hello server, how are you?
Server : I'm good client, how are things on your side?
Client : Things are great. I just got a new puppy
Server : Sounds cute. I hope you bring the pup over on the weekend
Client : Will do.
Server : Was good talking to you. Please terminate the connection on your next message
Client : /q

connection termination request sent
Socket successfully closed
PS C:\Users\matda\Desktop\chat>
```