Language used: Python 2.7

System: Ubuntu 20.04

## **Folders:**

 Single Server-Client model: Client Code: "{Your-download-folder}/DS Project 1/Single Server/Clients/Client 1.py "

Server Code: "{Your-download-folder}/DS Project 1/Single Server/Server/Server.py "

 Multi Server-Client model: Client Code: "{Your-download-folder}/DS Project 1/Multi Server/Clients/Client\_1.py and Client\_2.py"
Server Code: "{Your-download-folder}/DS Project 1/Multi Server/Server/Multi Server.py"

- 3. Remote Procedure Call model: "{Your-download-folder}/DS Project 1/Remote Procedure Call/Synchronous/ Client.py and Server.py"
- 4. Asynchronous RPC: : "{Your-download-folder}/DS Project 1/Remote Procedure Call/Asynchronous/ Async\_Client.py and Async\_Server.py"
- 5. Deferred Synchronous RPC: : "{Your-download-folder}/DS Project 1/Remote Procedure Call/Deferred\_Deferred\_Client.py and Deferred\_Server.py"

## Instructions to run code:

## Single SERVER-CLIENT model and Multi-SERVER-CLIENT model

- For Single Server-Client model and Multi Server-Client model, please change the Server\_Directory and Client\_Directory as per their directory in your system and compile them. [better to keep client and server in different folders to see better output]
- 2. Open 2 terminals one in the server directory and the other in Client directory.
- 3. Create a sample file to upload and download and run the Server first and then run the Clients.
- 4. Follow the instructions in client terminal
- 5. Check output in server and client folders.

## RPC model, Asynchronous RPC and Deferred Synchronous RPC

- 1. Import all the modules such as: math, numpy.
- 2. Navigate to the appropriate directory mentioned above.
- 3. Run the server and client in different terminals and observe both the terminals for output.