1. Write a Socket-based Java server program that responds to client messages as follows. When it receives a message from a client, it simply converts the message into all upper-case letters and sends back the same to the client. Write both client and server that demonstrates this.

2. Write a Multithread Java program that executes: $Z = \sin(X) + \cos(Y)$. Create thread that supports $\sin$ function and another supports $\cos$ function and pass them $X$ and $Y$ values respectively. Make both of them concurrently and then collect the result and display.

3. Write a multithreaded version of Server program explained in Question 1 above.