

E/15/211

CO 324-Lab 02

Sockets and Message Framing in Transmission Control Protocol(TCP)

(02) In both TCPServer code and the TCPClient codes, the socket object is created inside the try block.

```
try (  
    ServerSocket serverSocket = new ServerSocket(Integer.parseInt(args[0]));  
    Socket clientSocket = serverSocket.accept();  
  
    /*  
    some more code lines include here  
    */  
  
} catch (IOException e) {  
  
    /*  
    some more code lines include here  
    */  
  
}
```

So whenever the program comes out from the try block, the socket object which is created in the try block is closed. So the memory can be saved by this.

(03)Data is not sent as a continuous stream through a network. Instead, data is separated into packets of a particular size defined by protocols and configurations of the system. Which means, a large message would be separated into small chunks before being sent. Due to the unreliability of the network, certain packets might have a delay in delivery.

Therefore, when the client does not append the delimiter , the server reads the characters until it reaches the new line character. At that time, the whole text is taken as a one set.

But when we entered the “-” character as the delimiter, the server reads the characters until it reaches “-” character and the text is identified as different sets by separating on “-” delimiter.

(04)TAB character