Fadi Sarwat Farouk – 7432

#2 Packet Transmission

Assembly Code

```
DATA SEGMENT
    PACKETS         DW    0
    NUMBER          DW    1         ; NUMBER OF TRANSMITTED PACKETS
    TRANSMISSIONS   DW    0


#start=PacketTransmission.exe#


name "packets"

CODE SEGMENT

START:      MOV AX,0
            OUT 112,AX
            IN AX, 110
            MOV PACKETS,AX

REPEAT:     INC TRANSMISSIONS
            MOV CX,NUMBER
            SUB PACKETS,CX
            CMP PACKETS,0
            JLE BREAK

            CMP NUMBER,64
            JB  MULTIPLY
INCREMENT: INC NUMBER
            JMP OUT

MULTIPLY:  SHL NUMBER,1        ; Multiply number by 2

OUT:        CMP  NUMBER,128
            JNE  REPEAT
            MOV  NUMBER,1
            JMP  REPEAT

BREAK:      MOV AX,TRANSMISSIONS
            OUT 112,AX

CODE ENDS

hlt
```
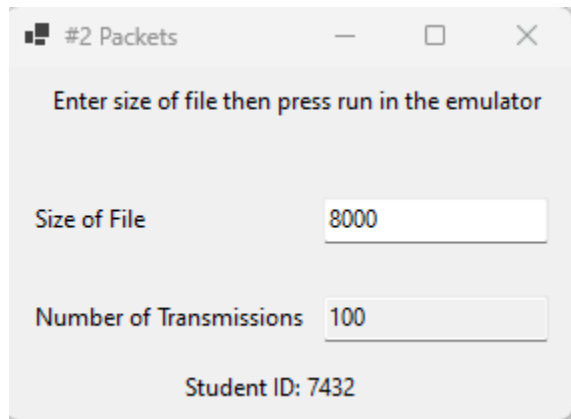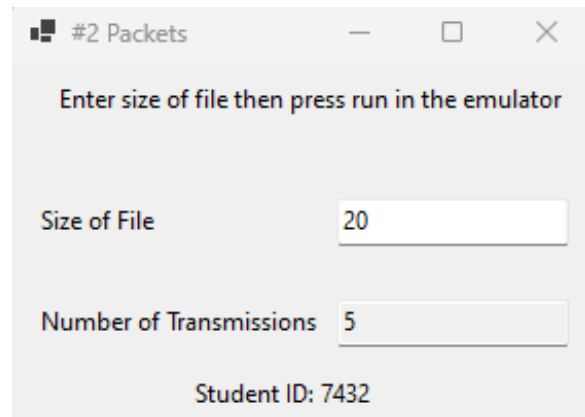
Result Sample
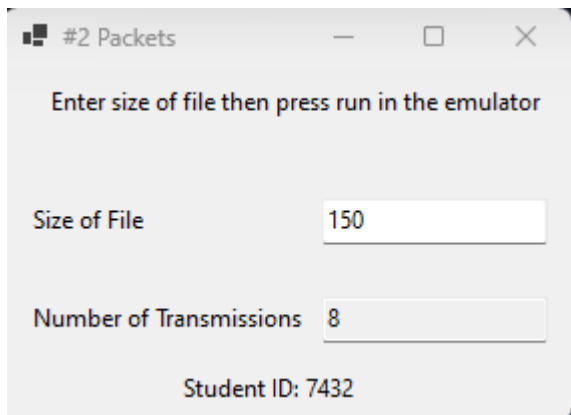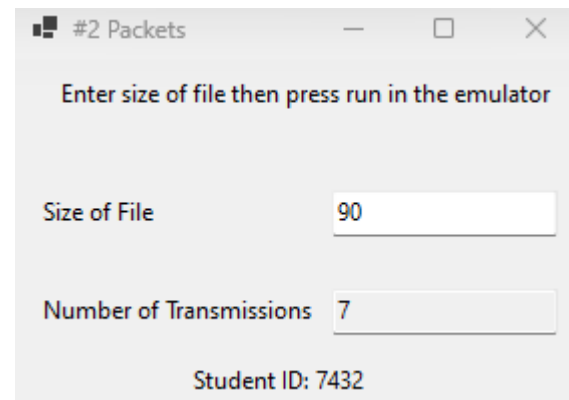
Comments

1) Add PacketTransmission.exe to C:\emu8086\DEVICES folder

2) Run the emu8086 emulator as Administrator (to have access to c:\emu8086.io file)

3) (Optional) If an error occurred about .NET Desktop runtime you must download and install and try step 2 again: https://dotnet.microsoft.com/en-us/download/dotnet/thank-you/runtime-desktop-7.0.5-windows-x64-installer

GitHub: https://github.com/Fadi-S/packets_emu8086