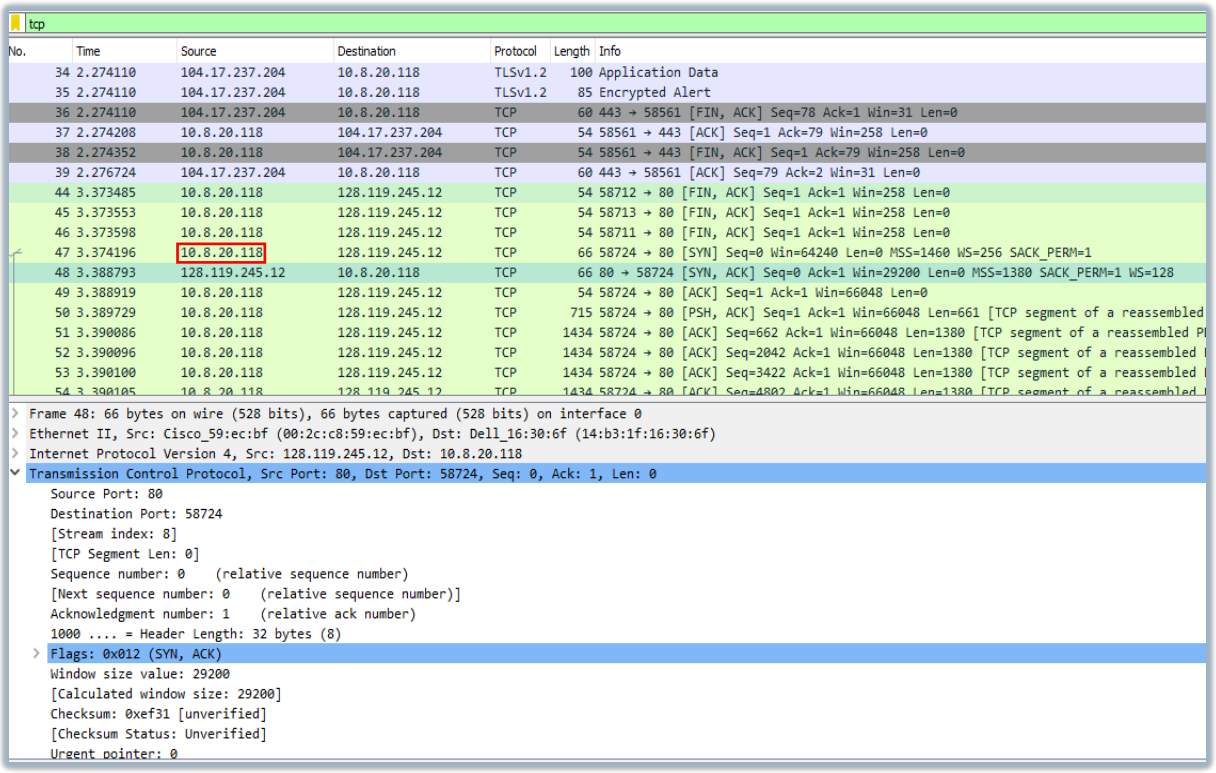
Abdullah Alrfeedi
Lab #3
IT-520

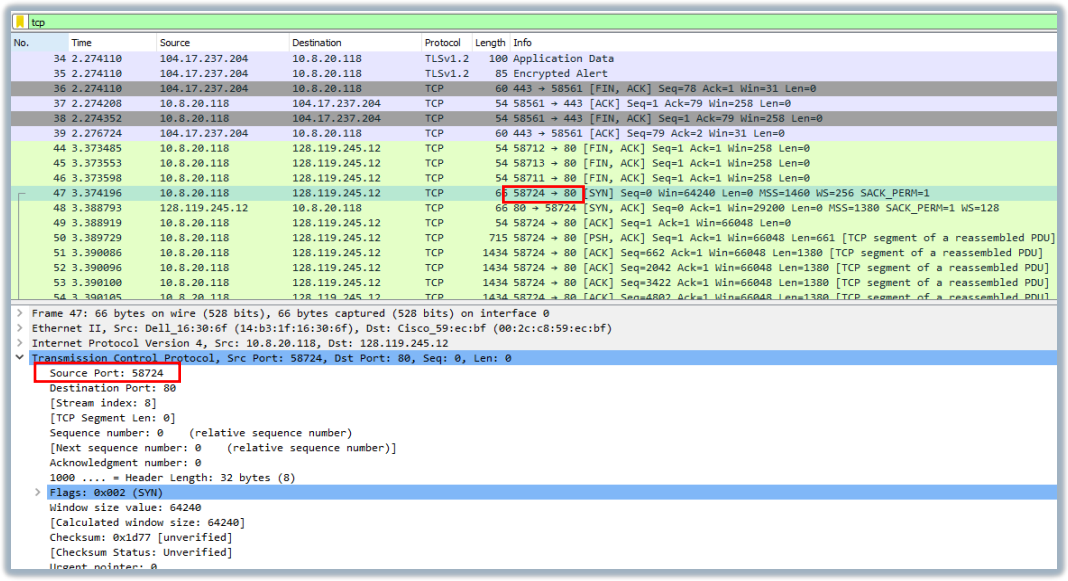
1) What is the IP address?

The IP Address is 10.8.20.118



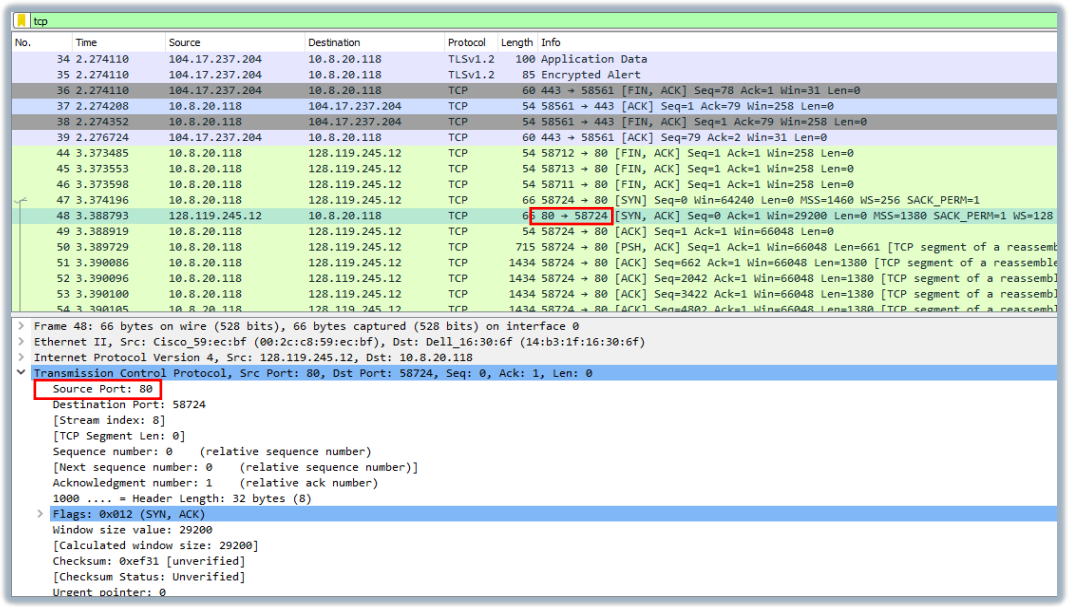
2) What is the TCP port number used by your computer to communicate with gaia.cs.umass.edu?

The TCP post number used by my computer to communicate with GAIA is 58724.



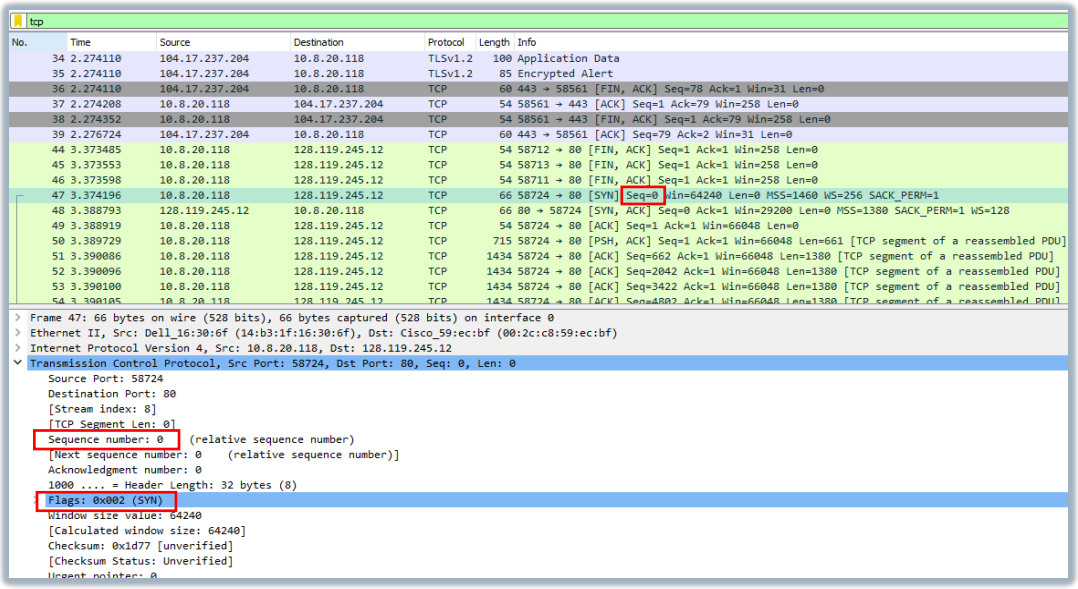
3) What is the TCP port number used by gaia.cs.umass.edu to communicate with your computer?

The TCP port number used by gaia.cs.umass.edu to communicate with my computer is 80.



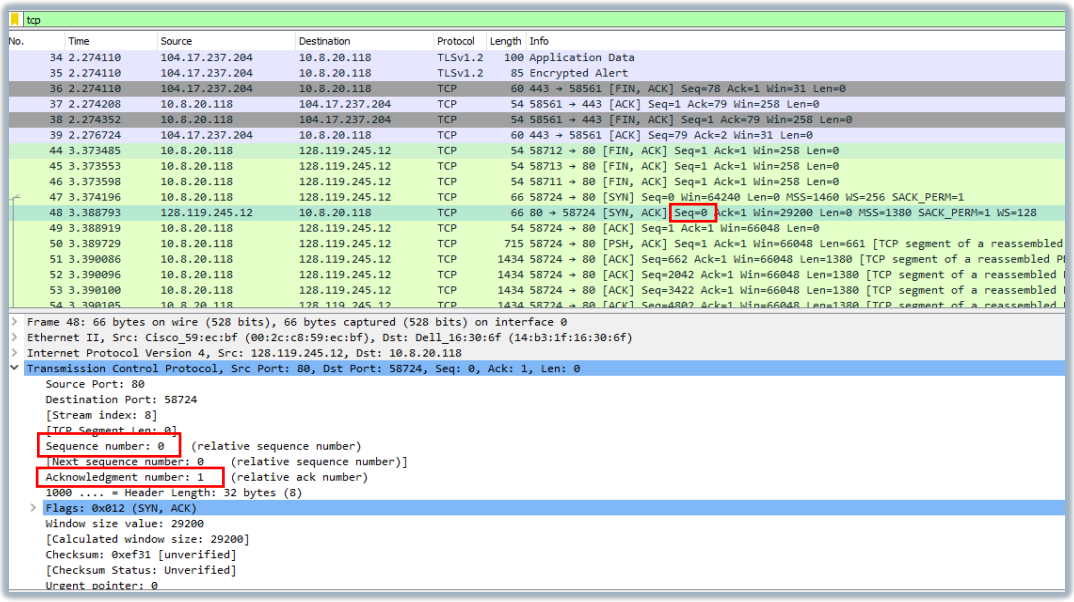
4) What is the sequence number of the TCP SYN segment that is used to initiate the TCP connection between your computer and gaia.cs.umass.edu? What is it in the segment that identifies the segment as a SYN segment?

The sequence number of the segment used to initiate the TCP connection is 0. There is also a message contains a SYN flag indicating that it is a SYN segment.



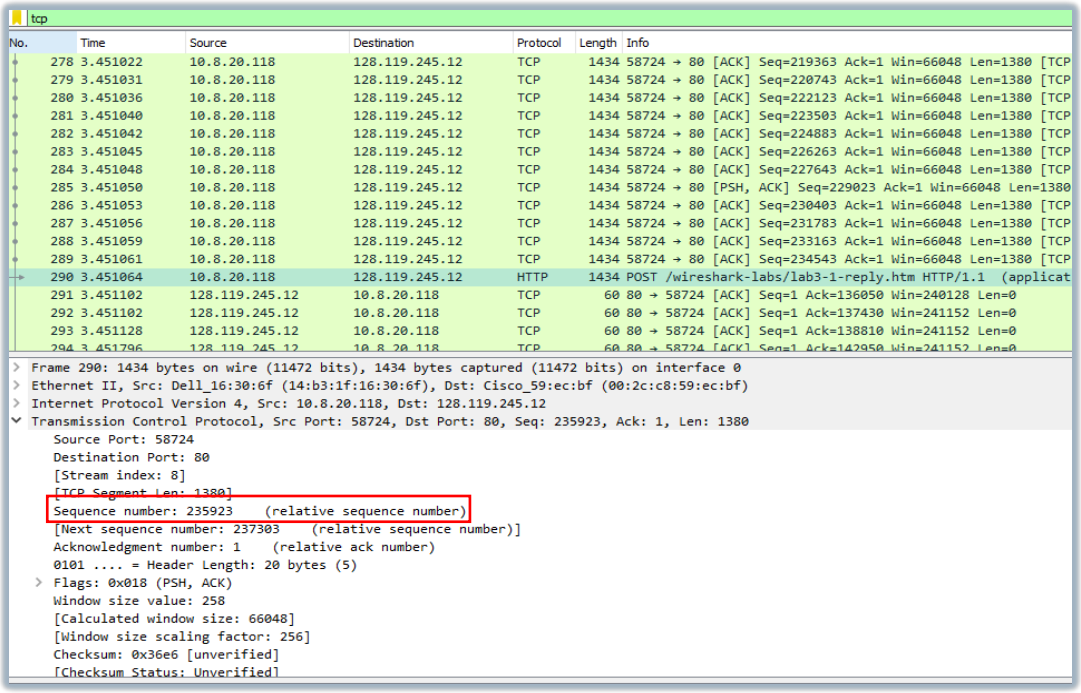
5) What is the sequence number of the SYNACK segment sent by gaia.cs.umass.edu to the client computer in reply to the SYN? -You must dig deep and find the ACK fromgaia.cs.umass.edu.

The sequence number of the SYNACK segment is 0 and the value of the acknowledgement is



6) What is the sequence number of the TCP segment containing the HTTP POST command?

The sequence number of the TCP segment containing the HTTP POST command is 235923.



A full PRINT of the HTTP OK message as the last page.

C:\Users\Saints\AppData\Local\Temp\wireshark_23890EB4-B5B3-4545-A889-DA70B712816F_20190225184740_a06584.pcapng 389 total packets, 329 shown

```
No.     Time           Source                Destination           Protocol Length Info
    331 3.467099       128.119.245.12        10.8.20.118           HTTP     831    HTTP/1.1 200 OK  (text/html)
Frame 331: 831 bytes on wire (6648 bits), 831 bytes captured (6648 bits) on interface 0
Ethernet II, Src: Cisco_59:ec:bf (00:2c:c8:59:ec:bf), Dst: Dell_16:30:6f (14:b3:1f:16:30:6f)
Internet Protocol Version 4, Src: 128.119.245.12, Dst: 10.8.20.118
Transmission Control Protocol, Src Port: 80, Dst Port: 58724, Seq: 1, Ack: 237303, Len: 777
    Source Port: 80
    Destination Port: 58724
    [Stream index: 8]
    [TCP Segment Len: 777]
    Sequence number: 1    (relative sequence number)
    [Next sequence number: 778    (relative sequence number)]
    Acknowledgment number: 237303    (relative ack number)
    0101 .... = Header Length: 20 bytes (5)
    Flags: 0x018 (PSH, ACK)
    Window size value: 3053
    [Calculated window size: 390784]
    [Window size scaling factor: 128]
    Checksum: 0x5b9e [unverified]
    [Checksum Status: Unverified]
    Urgent pointer: 0
    [SEQ/ACK analysis]
    [Timestamps]
    TCP payload (777 bytes)
Hypertext Transfer Protocol
Line-based text data: text/html (11 lines)
```