1. Is your browser running HTTP version 1.0, 1.1, or 2? What version of HTTP is
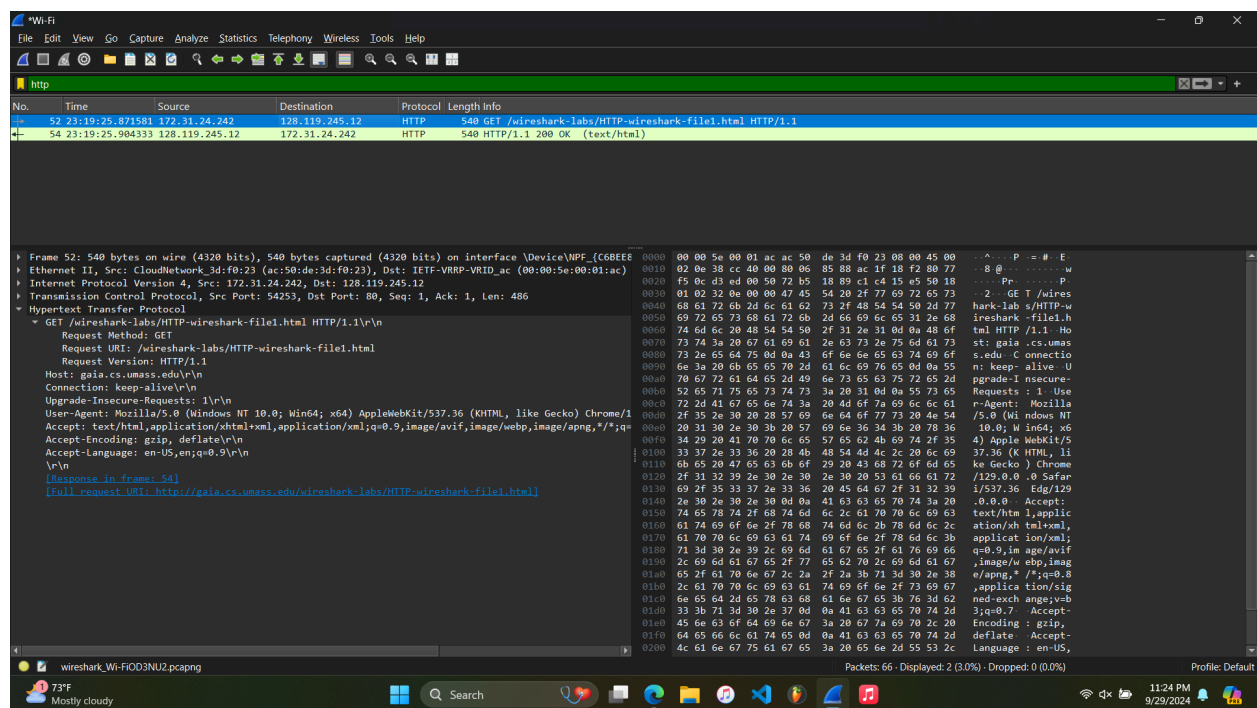
the server running?

HTTP/1.1

2. What languages (if any) does your browser indicate that it can accept to the

server?

Accept-Language: en-US,en;q=0.9\r\n

For 2

3. What is the IP address of your computer? What is the IP address of the

gaia.cs.umass.edu server?

My IP/source = 10.0.0.4 gaia server = 128.119.245.12

4. What is the status code returned from the server to your browser?

200 OK

5. When was the HTML file that you are retrieving last modified at the server?

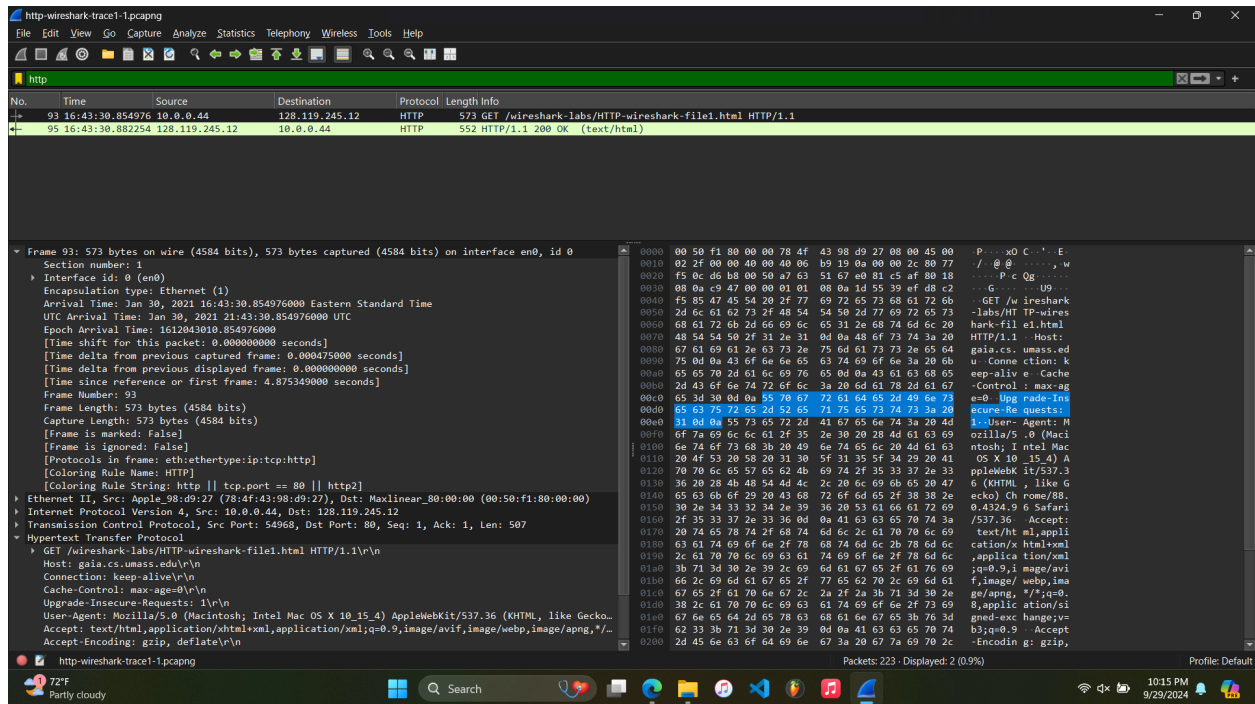Last-Modified: Sun, 29 Sep 2024 05:59:02 GMT\r\n

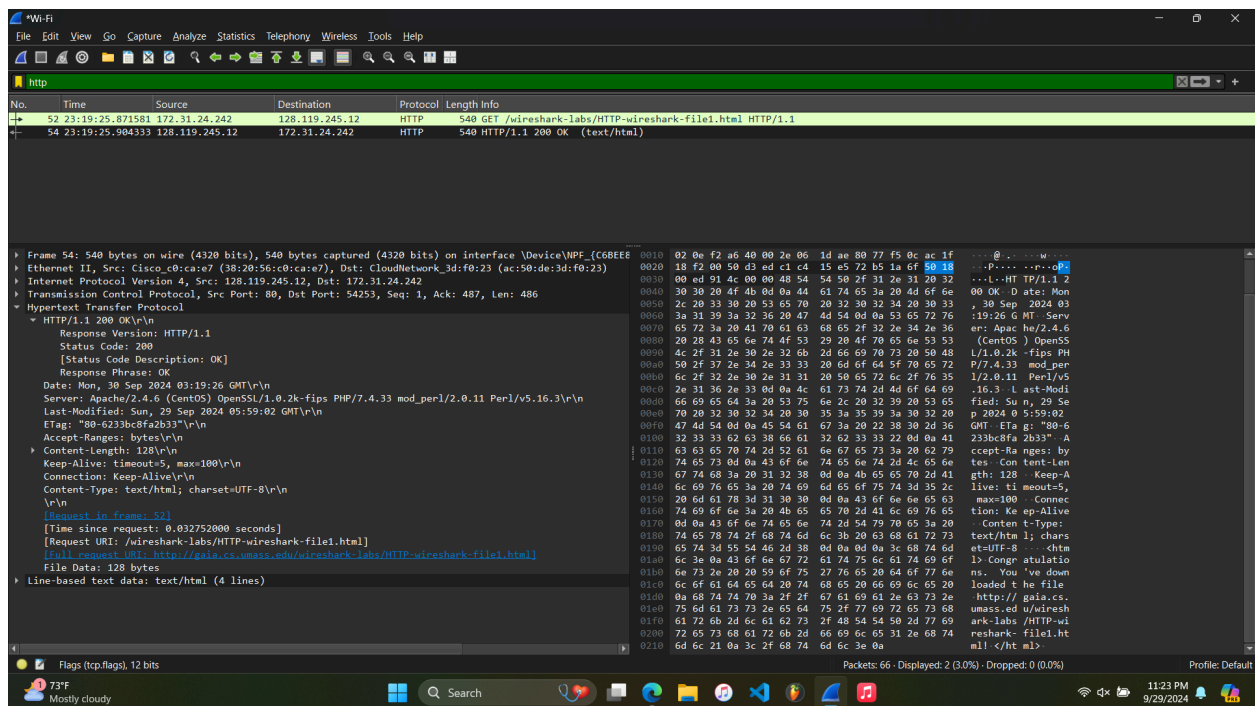6. How many bytes of content are being returned to your browser?

128 bytes

7. By inspecting the raw data in the packet content window, do you see any headers

within the data that are not displayed in the packet-listing window? If so, name

one

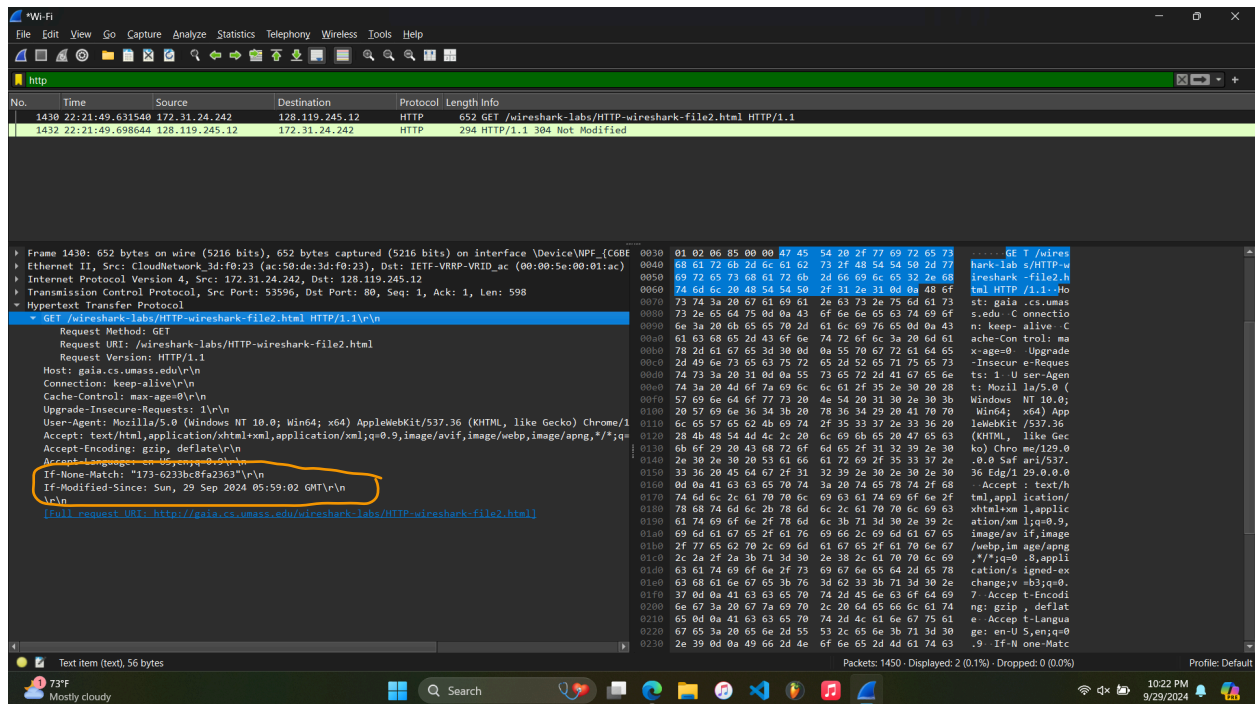No, I do not see any that are not displayed.

This goes with 1,3,4,7

This goes with 5 and 6

8. Inspect the contents of the first HTTP GET request from your browser to the

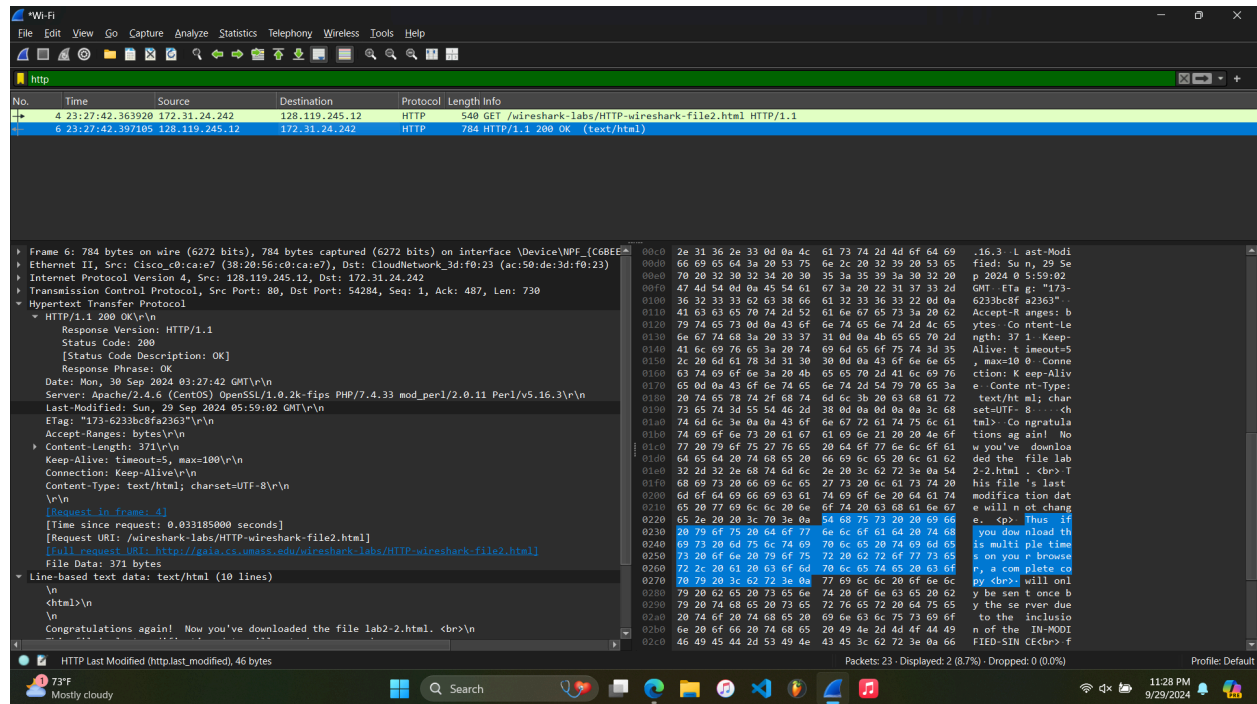server. Do you see an "IF-MODIFIED-SINCE" line in the HTTP GET?

The first packet was not modified and I didn't see a "if-modified-since" line

For 8

9. Inspect the contents of the server response. Did the server explicitly return the

contents of the file? How can you tell?

It does return the contents, I can tell because of the lined based text data and bytes were sent.
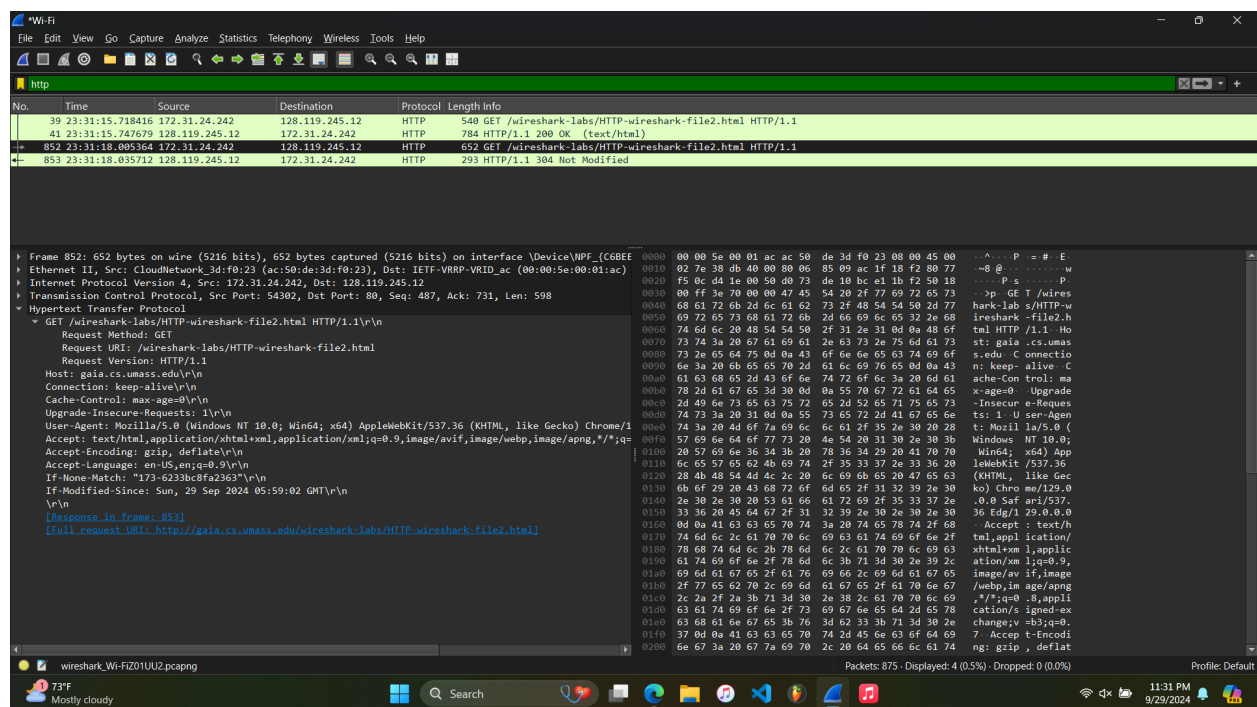
For 9

10. Now inspect the contents of the second HTTP GET request from your browser to the server. Do you see an "IF-MODIFIED-SINCE:" line in the HTTP GET6? If so, what information follows the "IF-MODIFIED-SINCE:" header?

The second does have a "if modified since header" and it says "If-Modified-Since: Sun, 29 Sep 2024 05:59:02 GMT\r\n"

For 10

11. What is the HTTP status code and phrase returned from the server in response to

this second HTTP GET? Did the server explicitly return the contents of the file? Explain.

Static code 304. IT didn't explicitly return the contents because the contents were not modified so the browser retrieved the cached version. This was proven because the line based text data wasn't there and no bytes were sent.
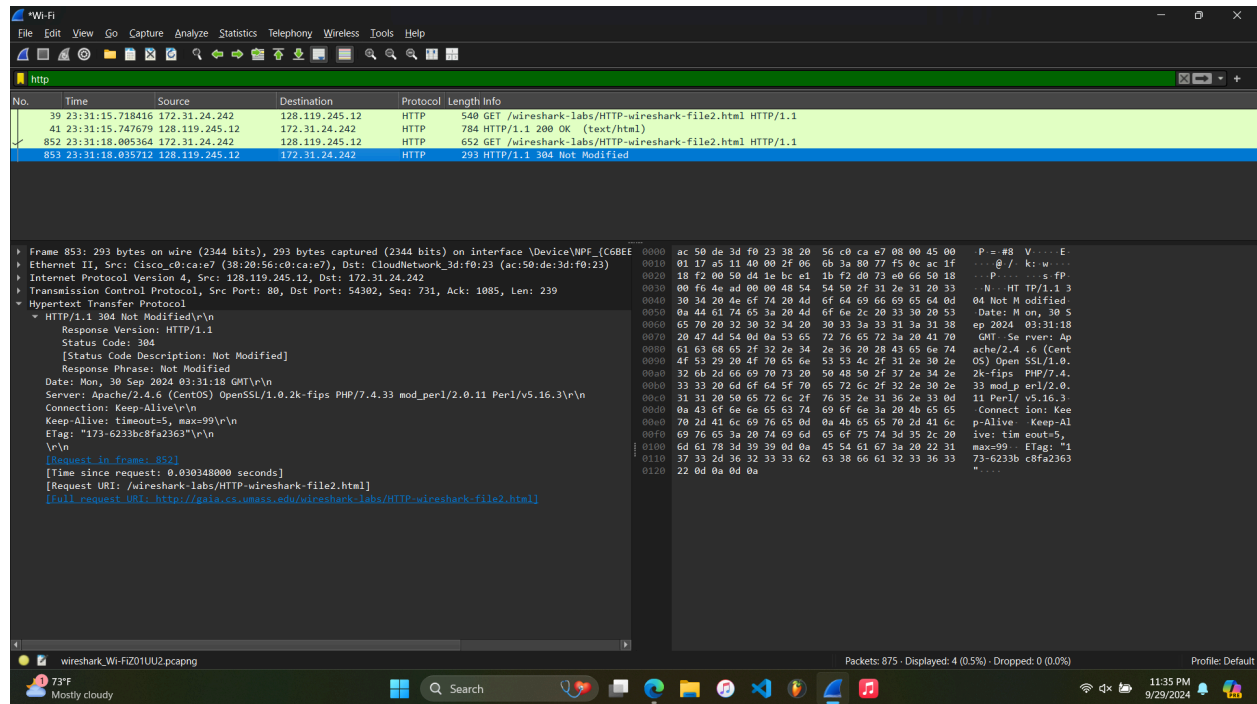
For 11

12. How many HTTP GET request messages did your browser send? Which packet

number in the trace contains the GET message for the Bill or Rights?

It only sent one HTTP get request. This is contained by packet 38.
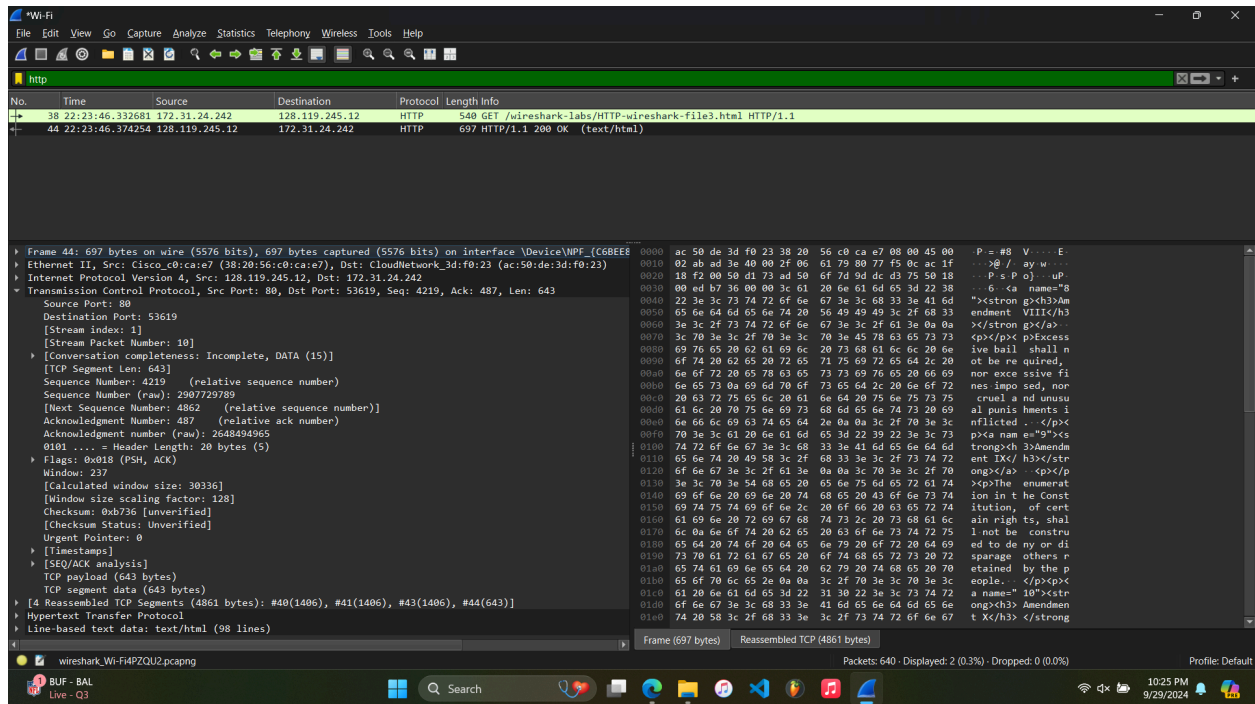
Screenshot for 12,13,14

13. Which packet number in the trace contains the status code and phrase associated

with the response to the HTTP GET request?

This is contained by packet number 44.

14. What is the status code and phrase in the response?

Static code: 200 and Response Phrase: OK

15. How many data-containing TCP segments were needed to carry the single HTTP

response and the text of the Bill of Rights?

Four Reassembled TCP Segments

16.How many HTTP GET request messages did your browser send? To which

Internet addresses were these GET requests sent?

3 different get request were sent. Two were sent to 128.119.245.12 and one was sent to 178.79.137.164

17.Can you tell whether your browser downloaded the two images serially, or

whether they were downloaded from the two web sites in parallel? Explain.

These were downloading serially because the came at differnet times and were two different gets
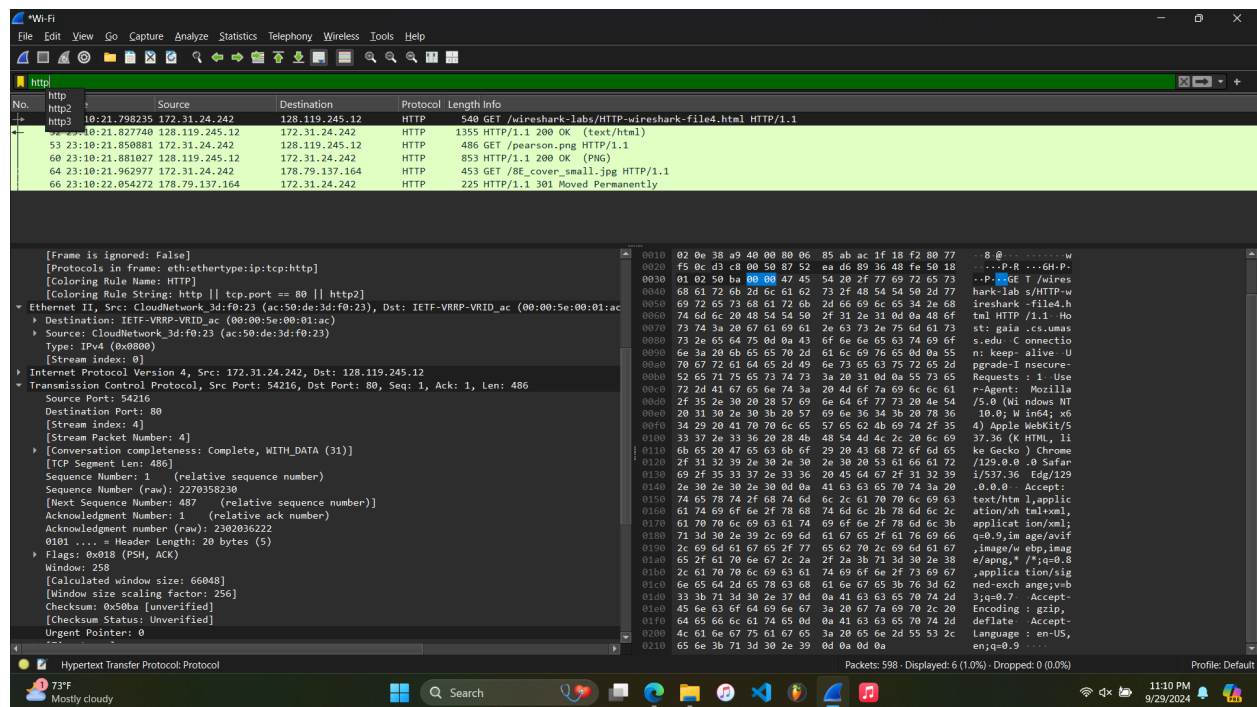
For 16 and 17

18. What is the server's response (status code and phrase) in response to the initial

HTTP GET message from your browser?

Status code 401 and Unauthorized

19. When your browser's sends the HTTP GET message for the second time, what

new field is included in the HTTP GET message?

Authorization header

Authorization: Basic d2lyZXNoYXJrLXN0dWRlbnRzOm5ldHdvcms=\r\n

This applies for 18 and 19