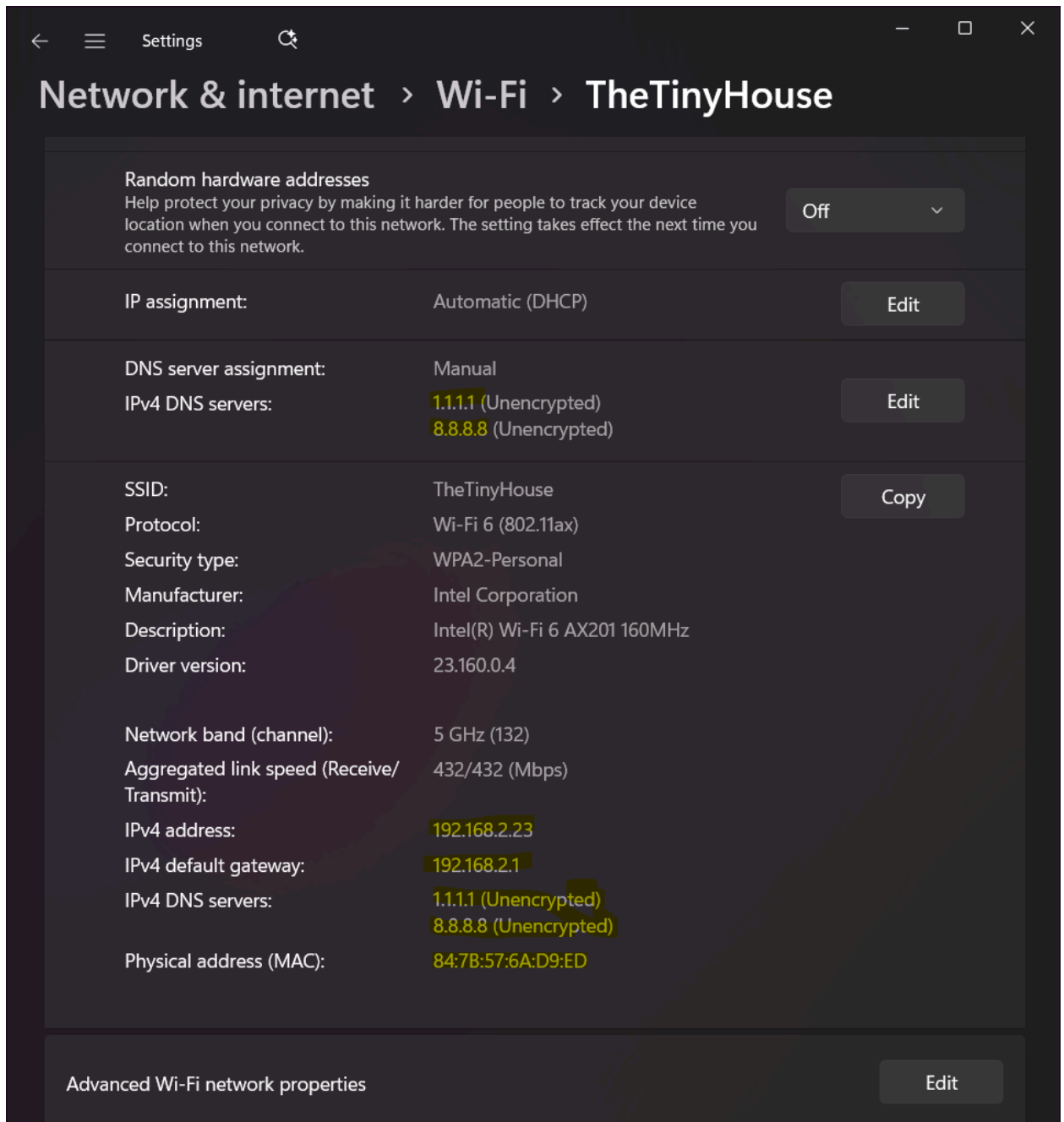


INFO1251 Lab 1 - Your home network

1. See attached [draw.io](#) file for network diagram
2. Image below



3. Image below

```
Command Prompt
NetBIOS over Tcpip. . . . . : Enabled

Wireless LAN adapter Wi-Fi:

Connection-specific DNS Suffix . : home
Description . . . . . : Intel(R) Wi-Fi 6 AX201 160MHz
Physical Address. . . . . : 84-7B-57-6A-D9-ED
DHCP Enabled. . . . . : Yes
Autoconfiguration Enabled . . . . : Yes
IPv4 Address. . . . . : 192.168.2.23(Preferred)
Subnet Mask . . . . . : 255.255.255.0
Lease Obtained. . . . . : September 13, 2025 1:57:40 PM
Lease Expires . . . . . : September 16, 2025 1:57:41 PM
Default Gateway . . . . . : 192.168.2.1
DHCP Server . . . . . : 192.168.2.1
DNS Servers . . . . . : 1.1.1.1
                        8.8.8.8
NetBIOS over Tcpip. . . . . : Enabled

C:\Users\Aidan>
```

4. Image below

```
Command Prompt
C:\Users\Aidan>ping 192.168.2.1

Pinging 192.168.2.1 with 32 bytes of data:
Reply from 192.168.2.1: bytes=32 time=3ms TTL=64
Reply from 192.168.2.1: bytes=32 time=2ms TTL=64
Reply from 192.168.2.1: bytes=32 time=1ms TTL=64
Reply from 192.168.2.1: bytes=32 time=2ms TTL=64

Ping statistics for 192.168.2.1:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
    Approximate round trip times in milli-seconds:
        Minimum = 1ms, Maximum = 3ms, Average = 2ms

C:\Users\Aidan>ping www.canada.ca

Pinging e4073.dscb.akamaiedge.net [184.26.192.192] with 32 bytes of data:
Reply from 184.26.192.192: bytes=32 time=9ms TTL=54
Reply from 184.26.192.192: bytes=32 time=9ms TTL=54
Reply from 184.26.192.192: bytes=32 time=8ms TTL=54
Reply from 184.26.192.192: bytes=32 time=8ms TTL=54

Ping statistics for 184.26.192.192:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
    Approximate round trip times in milli-seconds:
        Minimum = 8ms, Maximum = 9ms, Average = 8ms

C:\Users\Aidan>
```

- a. My home gateway IP address is 192.168.2.1
 - b. The IP address of canada.ca is 184.26.192.192
5.
 - a. WLAN stands for wireless local-area network. It is used when two or more devices using wireless communication to form a LAN within a small area
 - b. SSID stands for service-set identifier. It is your networks name.
 - c. The difference between upload and download is the “direction” data is being sent. For download, another device is sending information to your device, and for upload your device is sending information to another device. Both are equally

important but I consider download to be more important as I'm usually uploading much smaller files than I'm downloading

- d. Running a speedtest at speedtest.net gave me 225 mbps download and around 275 mbps upload. I tried to reduce network load before the test as much as possible, but this is still *slightly* lower than I know my network is capable of. I usually expect around 300 down and 300 up