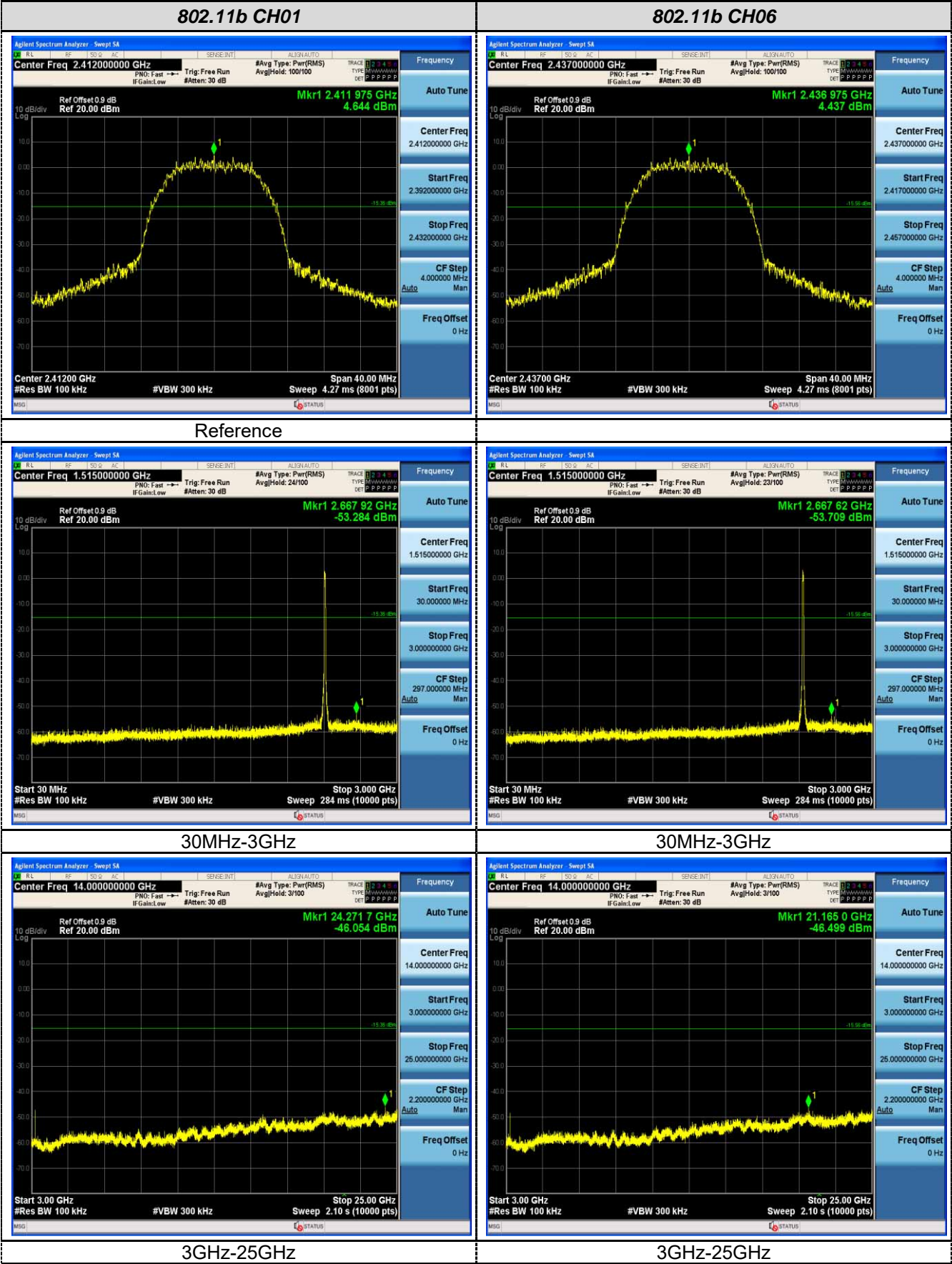
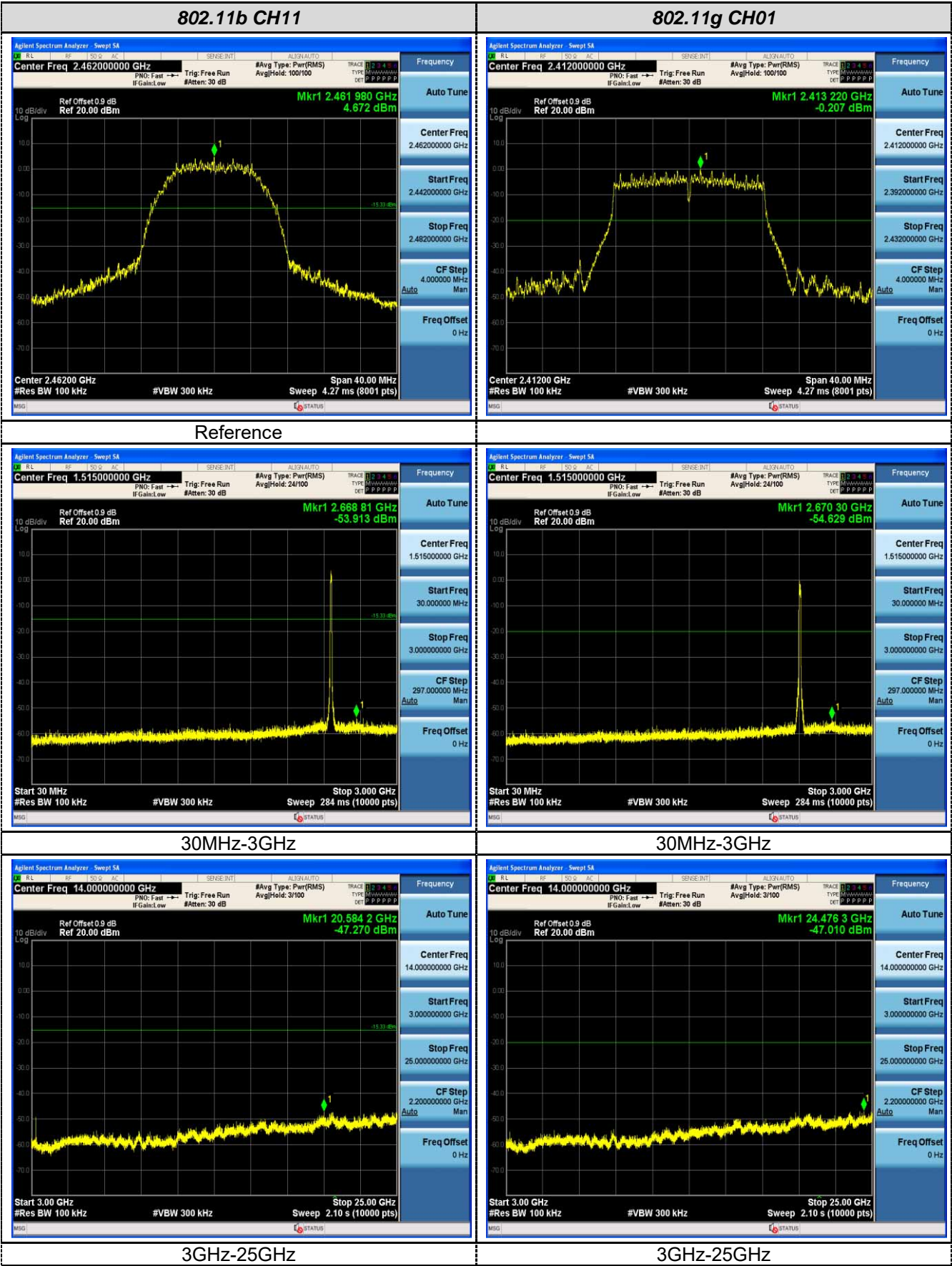


Ant2





Reference

Agilent Spectrum Analyzer - Swept SA

Center Freq 1.515000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 2.668 81 GHz
-53.913 dBm

10 dB/div
Log

Center Freq
1.515000000 GHz

Start Freq
30.000000 MHz

Stop Freq
3.000000000 GHz

CF Step
297.000000 MHz

Freq Offset
0 Hz

Start 30 MHz
#Res BW 100 kHz
#VBW 300 kHz
Sweep 284 ms (10000 pts)

30MHz-3GHz

Agilent Spectrum Analyzer - Swept SA

Center Freq 1.515000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 2.670 30 GHz
-54.629 dBm

10 dB/div
Log

Center Freq
1.515000000 GHz

Start Freq
30.000000 MHz

Stop Freq
3.000000000 GHz

CF Step
297.000000 MHz

Freq Offset
0 Hz

Start 30 MHz
#Res BW 100 kHz
#VBW 300 kHz
Sweep 284 ms (10000 pts)

30MHz-3GHz

Agilent Spectrum Analyzer - Swept SA

Center Freq 14.000000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 20.584 2 GHz
-47.270 dBm

10 dB/div
Log

Center Freq
14.000000000 GHz

Start Freq
3.000000000 GHz

Stop Freq
25.000000000 GHz

CF Step
2.200000000 GHz

Freq Offset
0 Hz

Start 3.00 GHz
#Res BW 100 kHz
#VBW 300 kHz
Sweep 2.10 s (10000 pts)

3GHz-25GHz

Agilent Spectrum Analyzer - Swept SA

Center Freq 14.000000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 24.476 3 GHz
-47.010 dBm

10 dB/div
Log

Center Freq
14.000000000 GHz

Start Freq
3.000000000 GHz

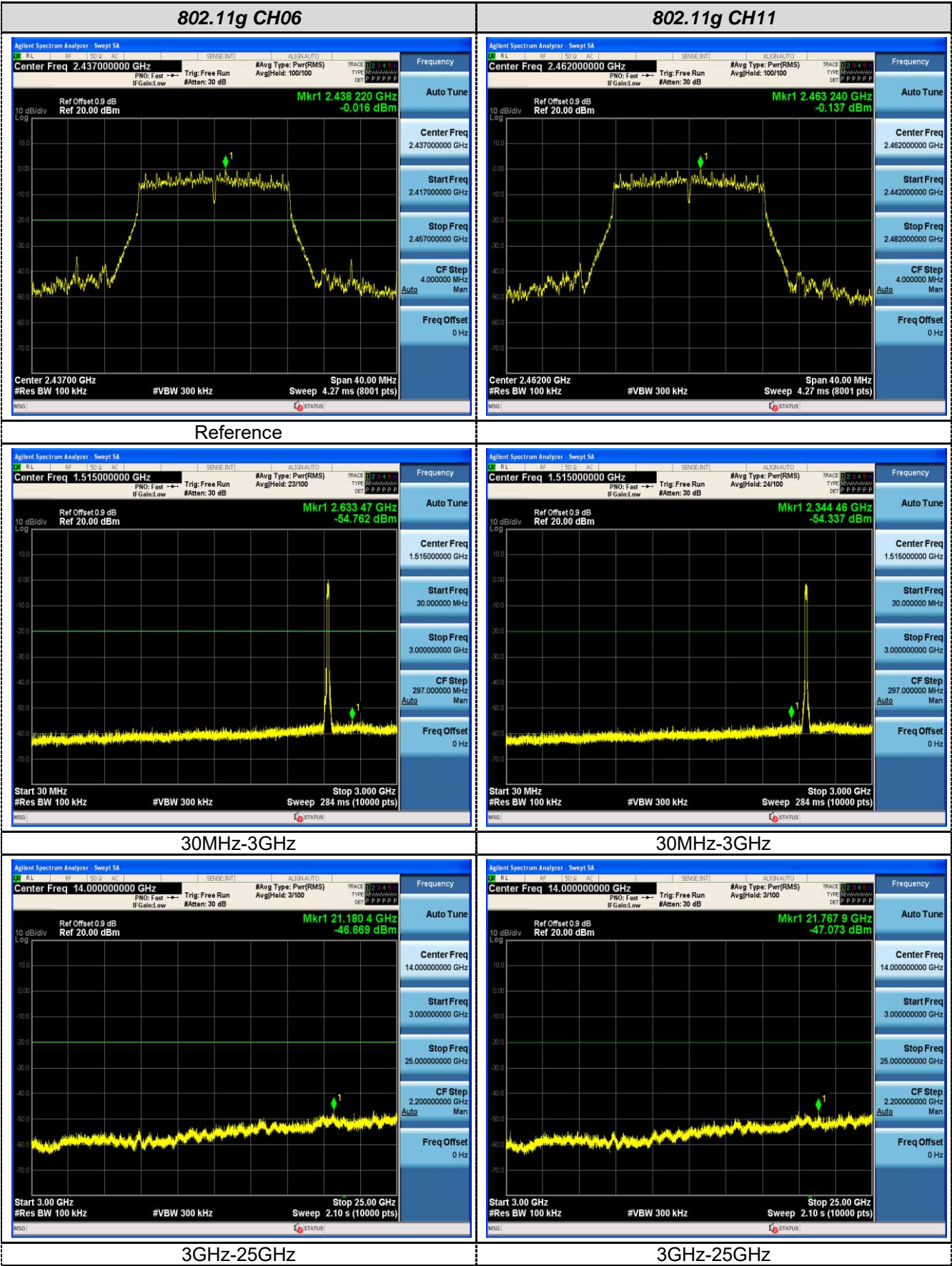
Stop Freq
25.000000000 GHz

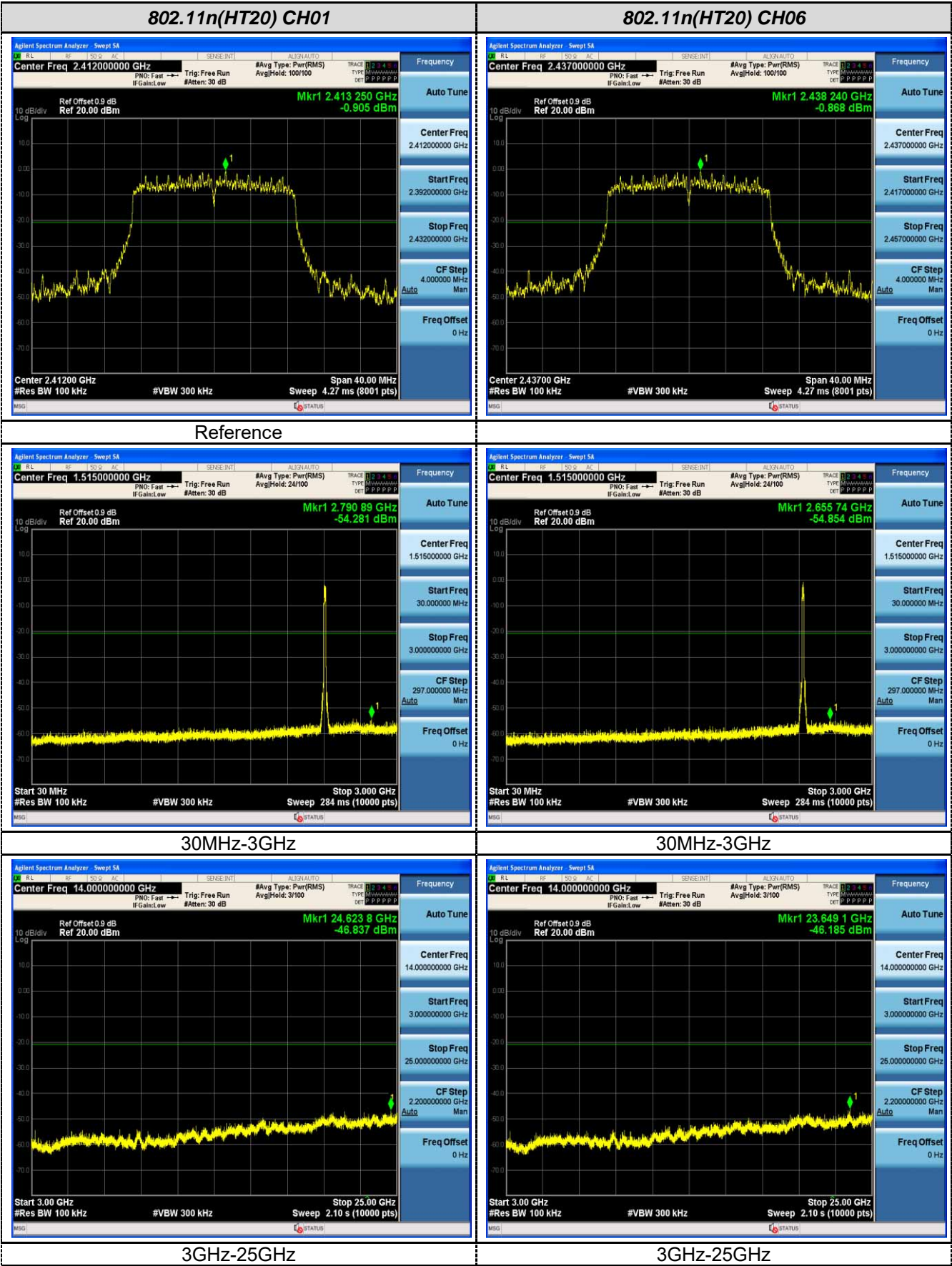
CF Step
2.200000000 GHz

Freq Offset
0 Hz

Start 3.00 GHz
#Res BW 100 kHz
#VBW 300 kHz
Sweep 2.10 s (10000 pts)

3GHz-25GHz





Reference

Agilent Spectrum Analyzer - Sweep SA

Center Freq 1.515000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 2.790 89 GHz
-54.281 dBm

10 dB/div
Log

Center Freq 1.515000000 GHz

Start Freq 30.000000 MHz

Stop Freq 3.000000000 GHz

CF Step 297.000000 MHz

Freq Offset 0 Hz

Start 30 MHz

#Res BW 100 kHz

#VBW 300 kHz

Sweep 284 ms (10000 pts)

Frequency

Auto Tune

Center Freq 1.515000000 GHz

Start Freq 30.000000 MHz

Stop Freq 3.000000000 GHz

CF Step 297.000000 MHz

Freq Offset 0 Hz

30MHz-3GHz

Agilent Spectrum Analyzer - Sweep SA

Center Freq 1.515000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 2.655 74 GHz
-54.854 dBm

10 dB/div
Log

Center Freq 1.515000000 GHz

Start Freq 30.000000 MHz

Stop Freq 3.000000000 GHz

CF Step 297.000000 MHz

Freq Offset 0 Hz

Start 30 MHz

#Res BW 100 kHz

#VBW 300 kHz

Sweep 284 ms (10000 pts)

Frequency

Auto Tune

Center Freq 1.515000000 GHz

Start Freq 30.000000 MHz

Stop Freq 3.000000000 GHz

CF Step 297.000000 MHz

Freq Offset 0 Hz

30MHz-3GHz

Agilent Spectrum Analyzer - Sweep SA

Center Freq 14.000000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 24.623 8 GHz
-46.837 dBm

10 dB/div
Log

Center Freq 14.000000000 GHz

Start Freq 3.000000000 GHz

Stop Freq 25.000000000 GHz

CF Step 2.200000000 GHz

Freq Offset 0 Hz

Start 3.00 GHz

#Res BW 100 kHz

#VBW 300 kHz

Sweep 2.10 s (10000 pts)

Frequency

Auto Tune

Center Freq 14.000000000 GHz

Start Freq 3.000000000 GHz

Stop Freq 25.000000000 GHz

CF Step 2.200000000 GHz

Freq Offset 0 Hz

3GHz-25GHz

Agilent Spectrum Analyzer - Sweep SA

Center Freq 14.000000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 23.649 1 GHz
-46.185 dBm

10 dB/div
Log

Center Freq 14.000000000 GHz

Start Freq 3.000000000 GHz

Stop Freq 25.000000000 GHz

CF Step 2.200000000 GHz

Freq Offset 0 Hz

Start 3.00 GHz

#Res BW 100 kHz

#VBW 300 kHz

Sweep 2.10 s (10000 pts)

Frequency

Auto Tune

Center Freq 14.000000000 GHz

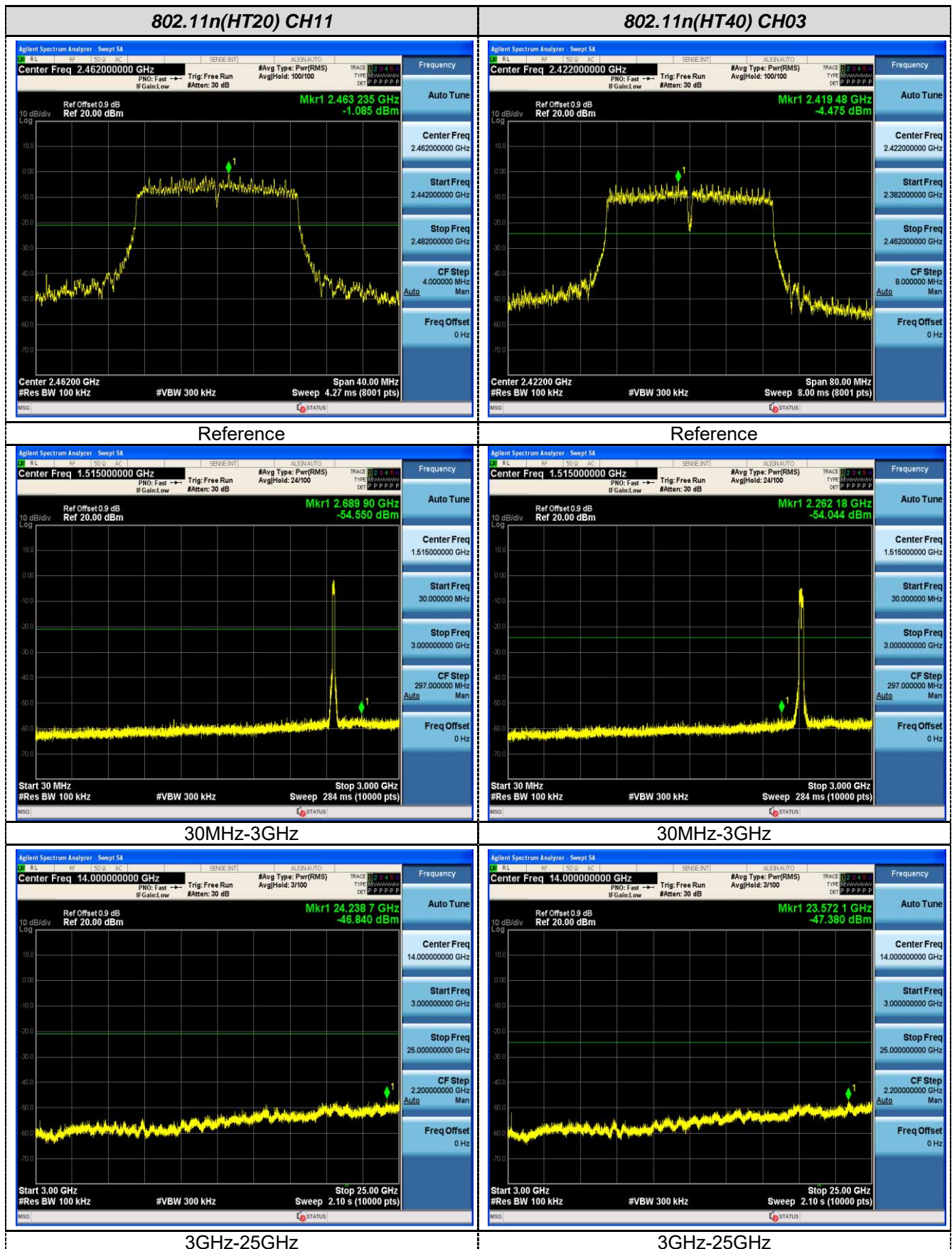
Start Freq 3.000000000 GHz

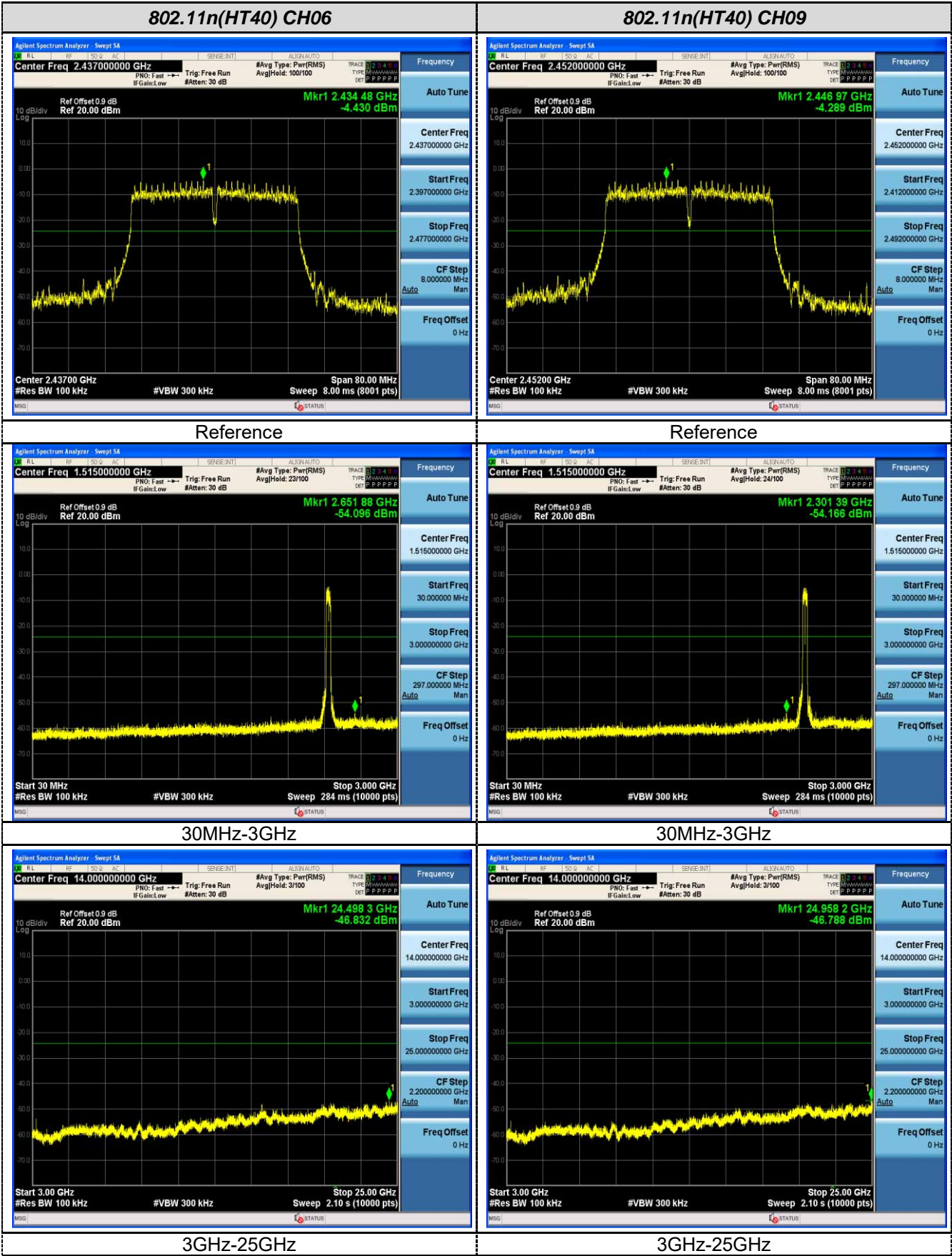
Stop Freq 25.000000000 GHz

CF Step 2.200000000 GHz

Freq Offset 0 Hz

3GHz-25GHz





Reference

Agilent Spectrum Analyzer - Swept SA

Center Freq 1.515000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 2.651 88 GHz
-54.096 dBm

10 dB/div
Log

Center Freq 1.515000000 GHz

Start Freq 30.000000 MHz

Stop Freq 3.000000000 GHz

CF Step 297.000000 MHz

Freq Offset 0 Hz

Start 30 MHz

#Res BW 100 kHz

#VBW 300 kHz

Sweep 284 ms (10000 pts)

Frequency

Auto Tune

Center Freq 1.515000000 GHz

Start Freq 30.000000 MHz

Stop Freq 3.000000000 GHz

CF Step 297.000000 MHz

Freq Offset 0 Hz

Reference

Agilent Spectrum Analyzer - Swept SA

Center Freq 1.515000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 2.301 39 GHz
-54.166 dBm

10 dB/div
Log

Center Freq 1.515000000 GHz

Start Freq 30.000000 MHz

Stop Freq 3.000000000 GHz

CF Step 297.000000 MHz

Freq Offset 0 Hz

Start 30 MHz

#Res BW 100 kHz

#VBW 300 kHz

Sweep 284 ms (10000 pts)

Frequency

Auto Tune

Center Freq 1.515000000 GHz

Start Freq 30.000000 MHz

Stop Freq 3.000000000 GHz

CF Step 297.000000 MHz

Freq Offset 0 Hz

30MHz-3GHz

Agilent Spectrum Analyzer - Swept SA

Center Freq 14.000000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 24.498 3 GHz
-46.832 dBm

10 dB/div
Log

Center Freq 14.000000000 GHz

Start Freq 3.000000000 GHz

Stop Freq 25.000000000 GHz

CF Step 2.200000000 GHz

Freq Offset 0 Hz

Start 3.00 GHz

#Res BW 100 kHz

#VBW 300 kHz

Sweep 2.10 s (10000 pts)

Frequency

Auto Tune

Center Freq 14.000000000 GHz

Start Freq 3.000000000 GHz

Stop Freq 25.000000000 GHz

CF Step 2.200000000 GHz

Freq Offset 0 Hz

30MHz-3GHz

Agilent Spectrum Analyzer - Swept SA

Center Freq 14.000000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 24.958 2 GHz
-46.788 dBm

10 dB/div
Log

Center Freq 14.000000000 GHz

Start Freq 3.000000000 GHz

Stop Freq 25.000000000 GHz

CF Step 2.200000000 GHz

Freq Offset 0 Hz

Start 3.00 GHz

#Res BW 100 kHz

#VBW 300 kHz

Sweep 2.10 s (10000 pts)

Frequency

Auto Tune

Center Freq 14.000000000 GHz

Start Freq 3.000000000 GHz

Stop Freq 25.000000000 GHz

CF Step 2.200000000 GHz

Freq Offset 0 Hz

3GHz-25GHz

Agilent Spectrum Analyzer - Swept SA

Center Freq 14.000000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 24.498 3 GHz
-46.832 dBm

10 dB/div
Log

Center Freq 14.000000000 GHz

Start Freq 3.000000000 GHz

Stop Freq 25.000000000 GHz

CF Step 2.200000000 GHz

Freq Offset 0 Hz

Start 3.00 GHz

#Res BW 100 kHz

#VBW 300 kHz

Sweep 2.10 s (10000 pts)

Frequency

Auto Tune

Center Freq 14.000000000 GHz

Start Freq 3.000000000 GHz

Stop Freq 25.000000000 GHz

CF Step 2.200000000 GHz

Freq Offset 0 Hz

3GHz-25GHz

Agilent Spectrum Analyzer - Swept SA

Center Freq 14.000000000 GHz

Ref Offset 0.9 dB
Ref 20.00 dBm

Mkr1 24.958 2 GHz
-46.788 dBm

10 dB/div
Log

Center Freq 14.000000000 GHz

Start Freq 3.000000000 GHz

Stop Freq 25.000000000 GHz

CF Step 2.200000000 GHz

Freq Offset 0 Hz

Start 3.00 GHz

#Res BW 100 kHz

#VBW 300 kHz

Sweep 2.10 s (10000 pts)

Frequency

Auto Tune

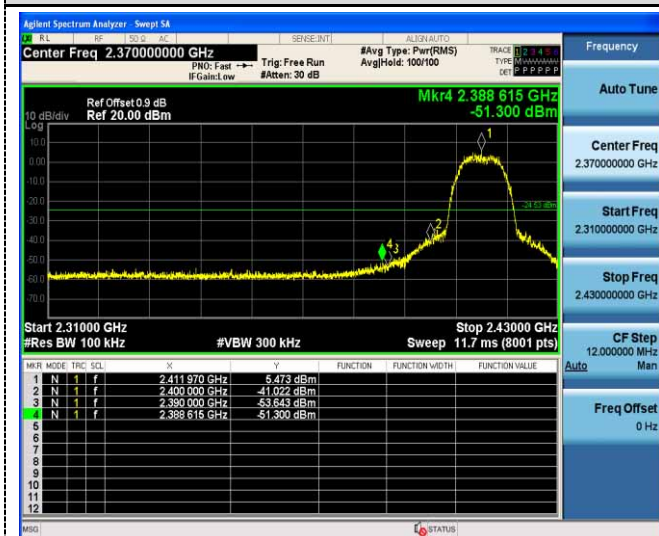
Center Freq 14.000000000 GHz

Start Freq 3.000000000 GHz

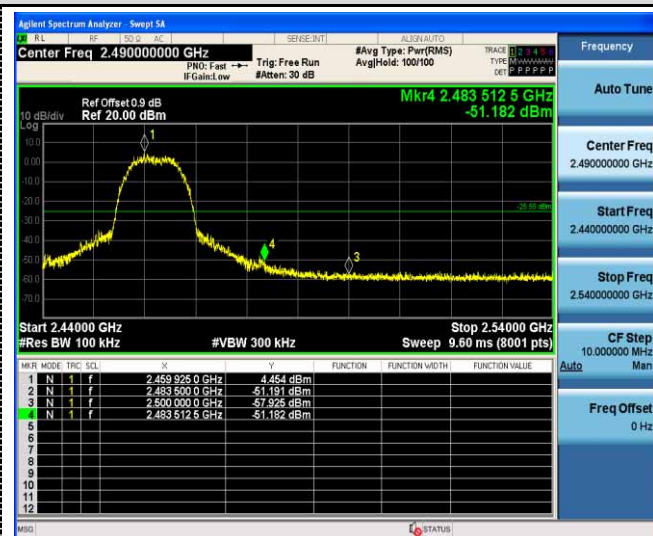
Stop Freq 25.000000000 GHz

CF Step 2.200000000 GHz

Freq Offset 0 Hz

Band-edge Measurements for RF Conducted Emissions at antenna 1:**802.11b**

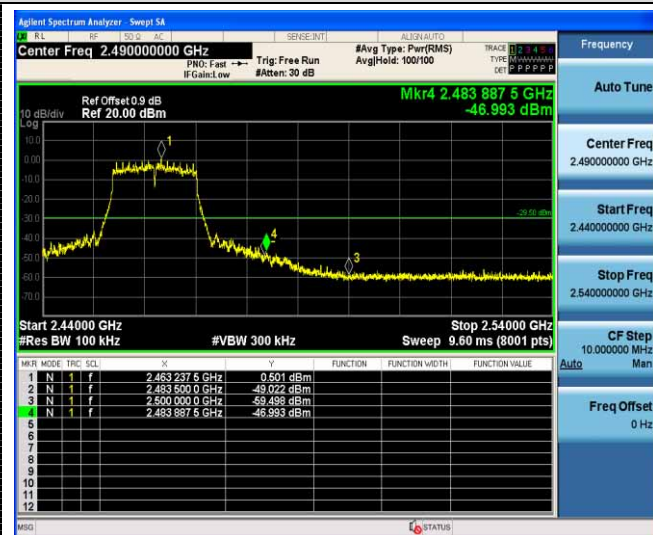
Left bandedge



Right bandedge

802.11g

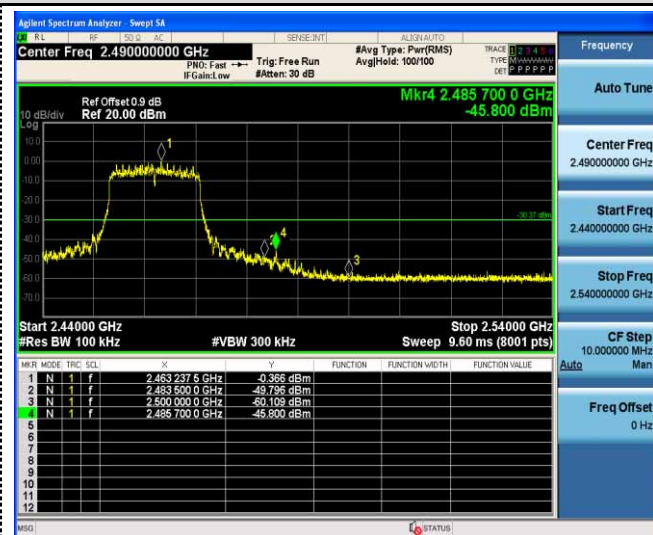
Left bandedge



Right bandedge

802.11n(HT20)

Left bandedge



Right bandedge

802.11n(HT40)



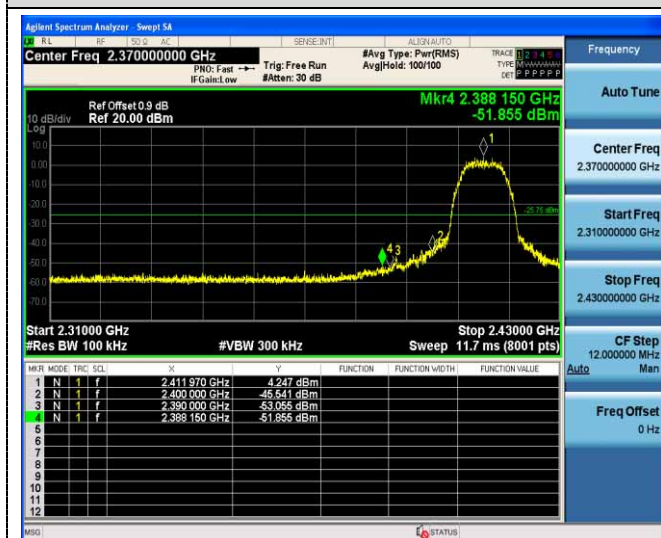
Left bandedge



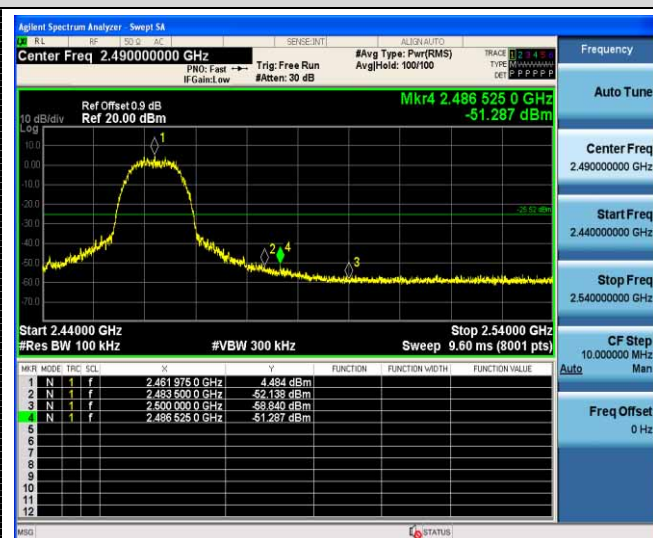
Right bandedge

Band-edge Measurements for RF Conducted Emissions at antenna 2:

802.11b

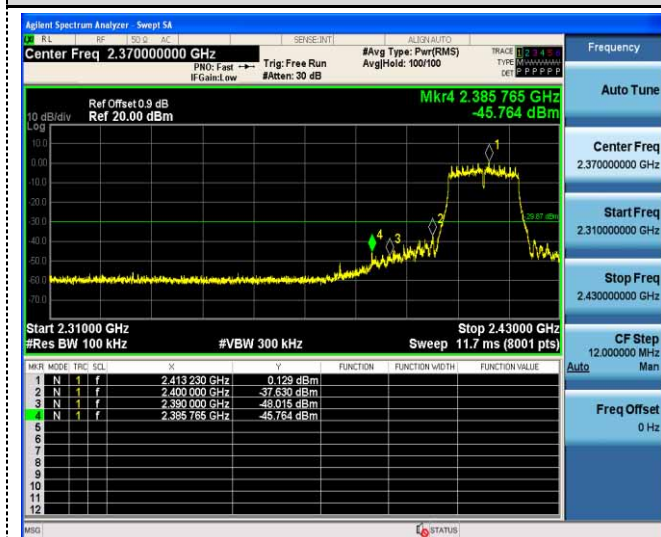


Left bandedge

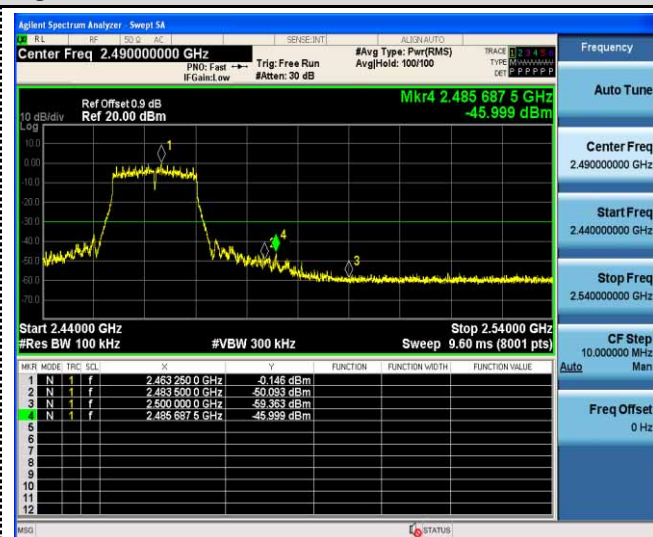


Right bandedge

802.11g

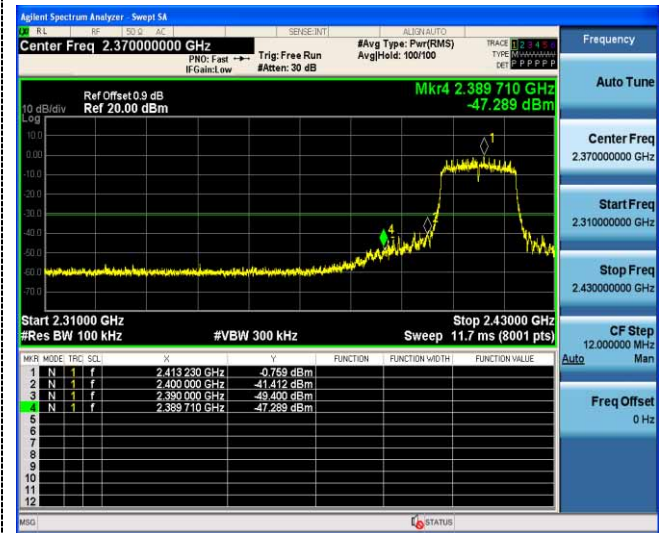


Left bandedge



Right bandedge

802.11n(HT20)



Left bandedge

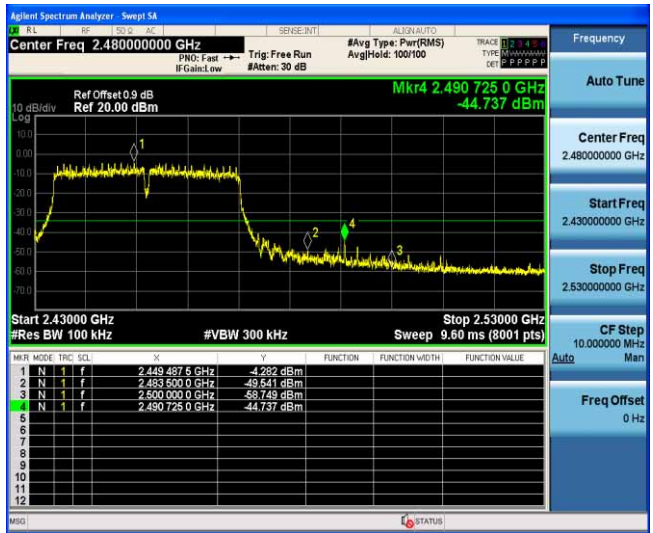


Right bandedge

802.11n(HT40)



Left bandedge



Right bandedge

4.7 Antenna Requirement

Standard Applicable

For intentional device, according to FCC 47 CFR Section 15.203:

An intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device. The use of a permanently attached antenna or of an antenna that uses a unique coupling to the intentional radiator, the manufacturer may design the unit so that a broken antenna can be replaced by the user, but the use of a standard antenna jack or electrical connector is prohibited

FCC CFR Title 47 Part 15 Subpart C Section 15.247(c) (1) (I):

(i) Systems operating in the 2400-2483.5 MHz band that is used exclusively for fixed. Point-to-point operations may employ transmitting antennas with directional gain greater than 6dBi provided the maximum conducted output power of the intentional radiator is reduced by 1 dB for every 3 dB that the directional gain of the antenna exceeds 6dBi.

Test Result:

The maximum gain of antenna was 2dBi for 2.4GHz WIFI.

5 Test Setup Photos of the EUT



6 Photos of the EUT

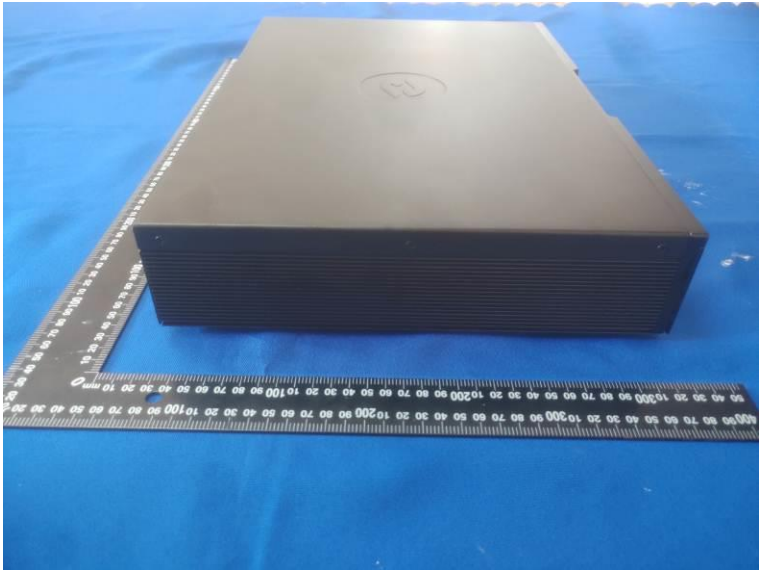
External photos



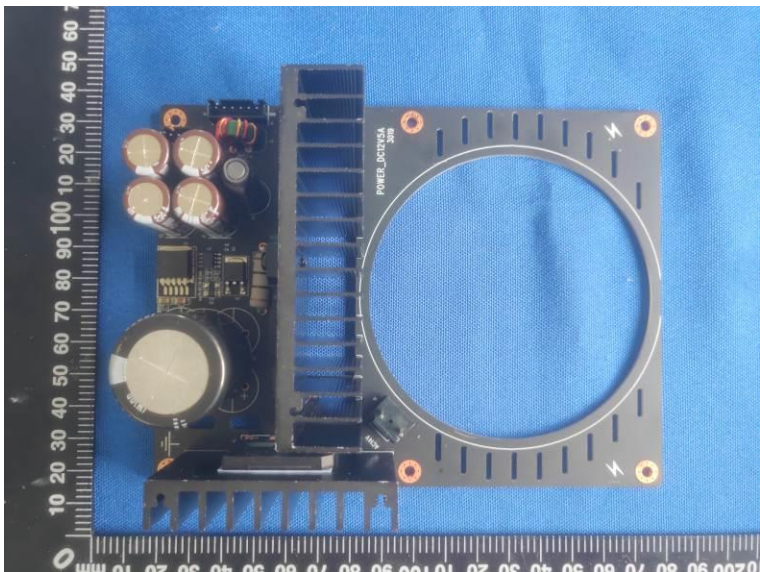
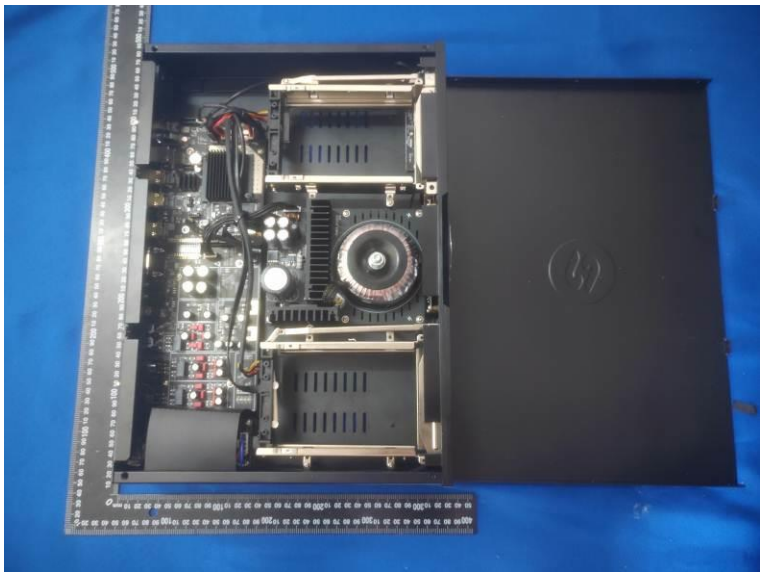


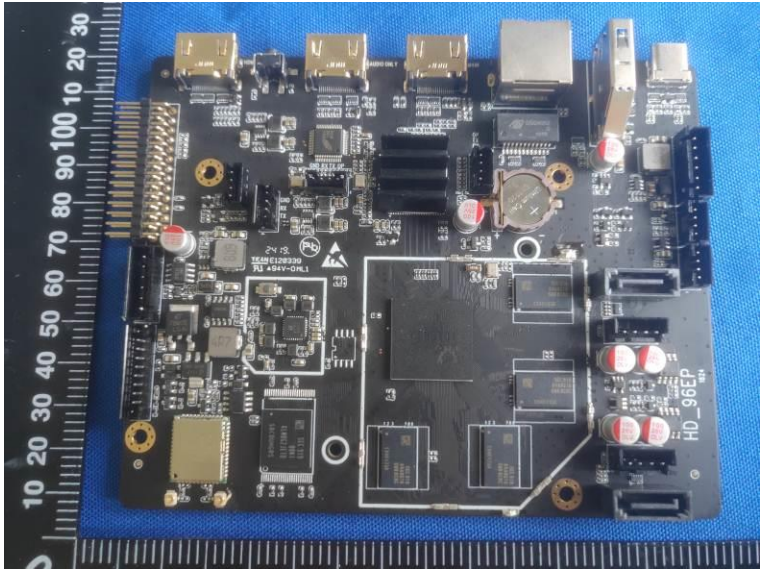
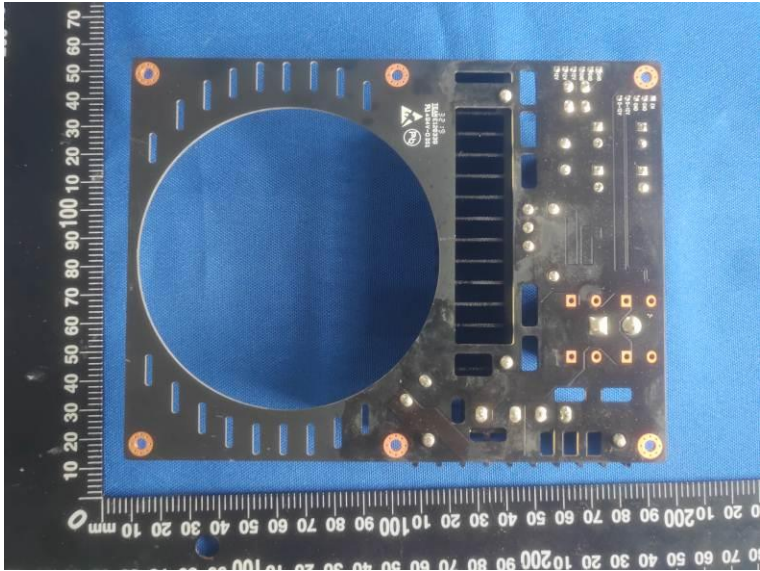
WIFI/BT Antenna

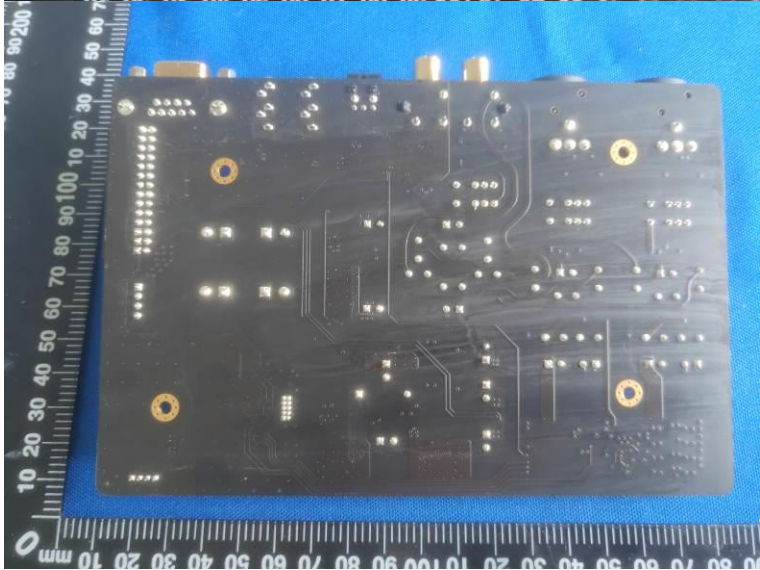
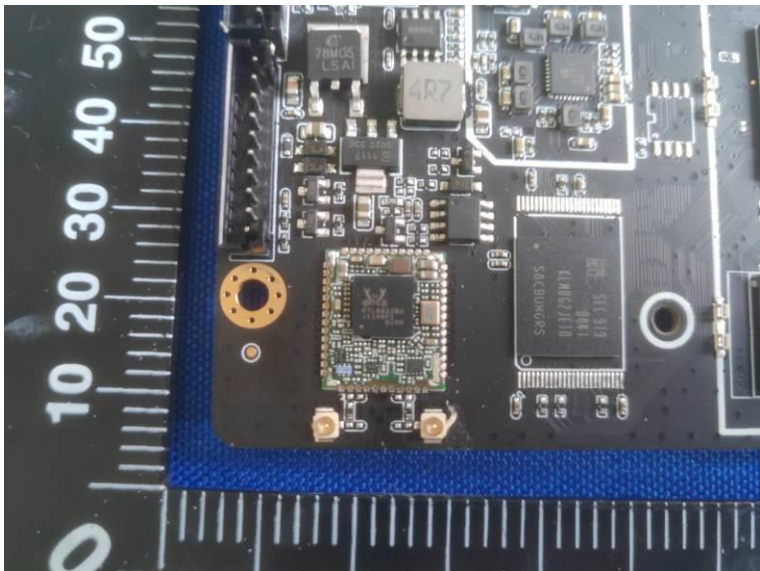
WIFI Antenna

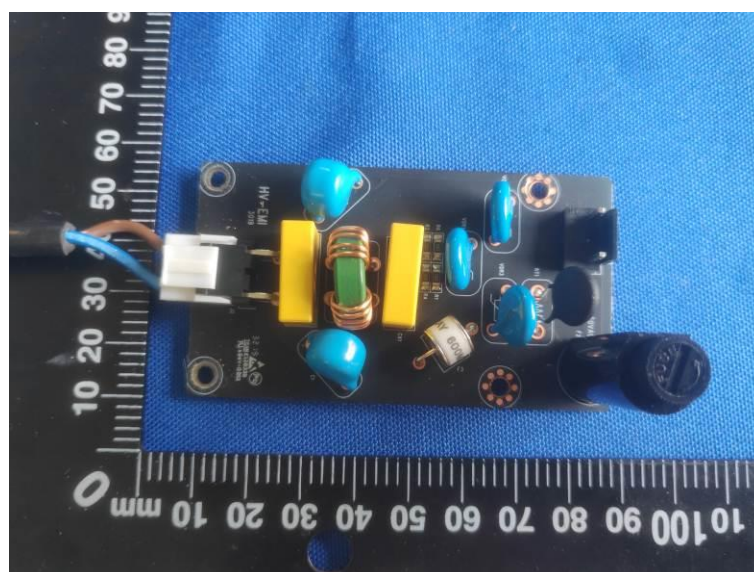
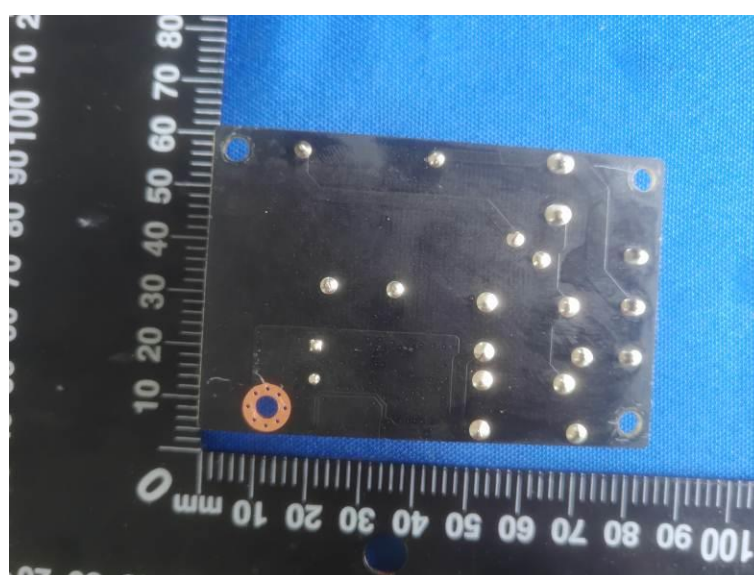
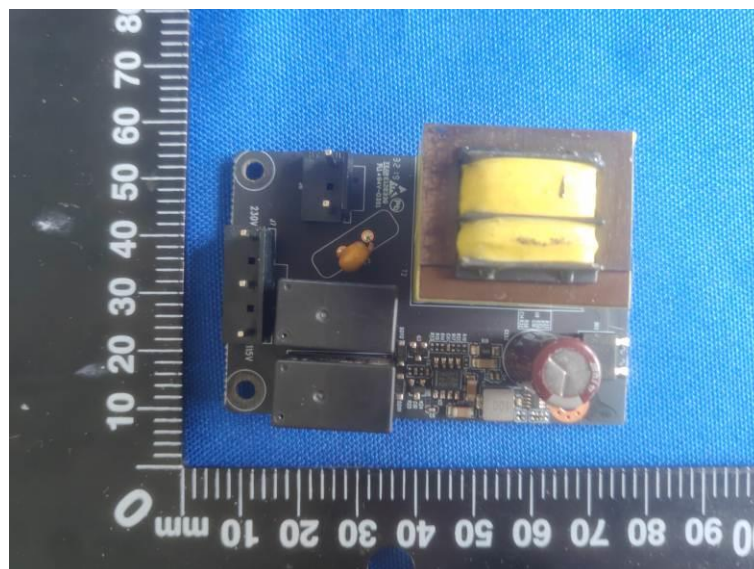


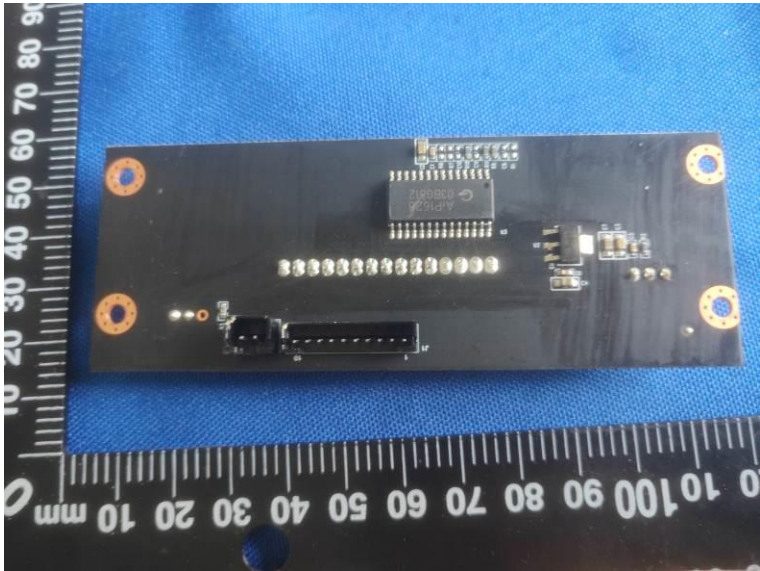
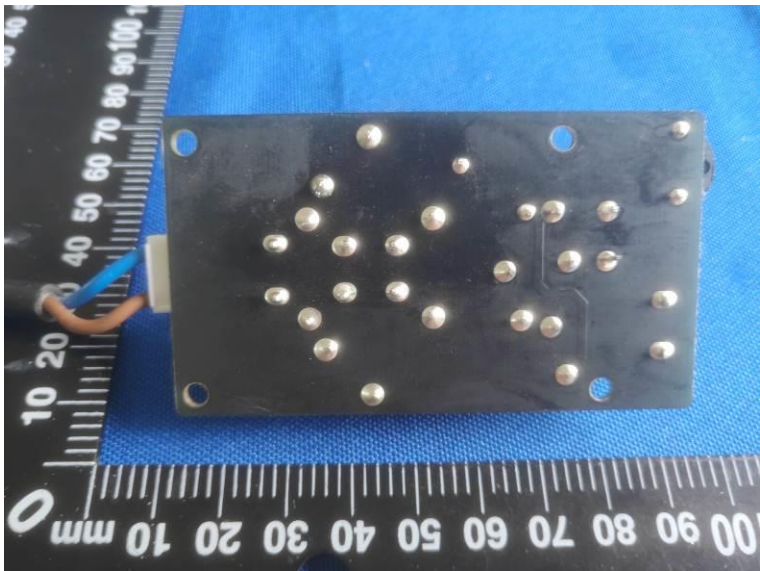
Internal Photos

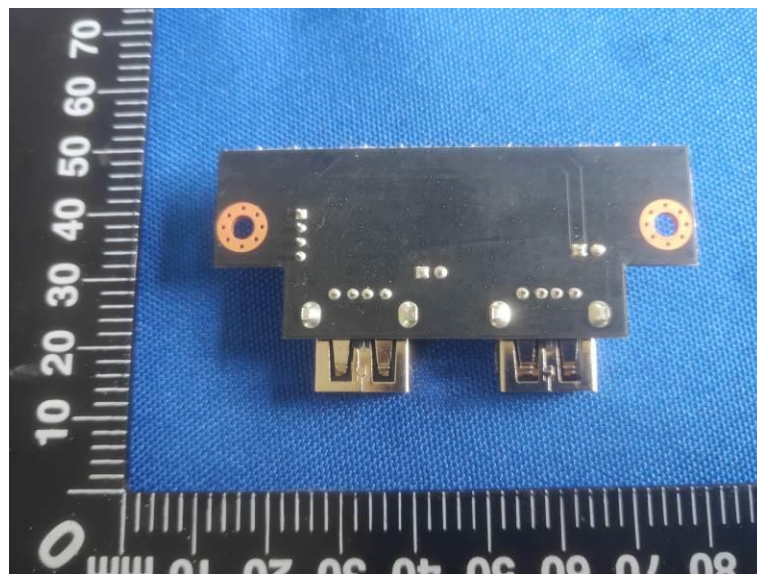
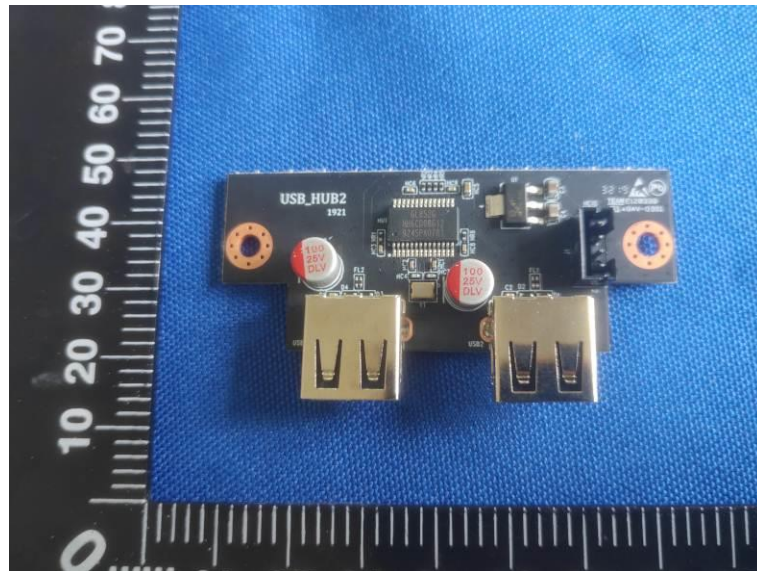












***** End of Report *****