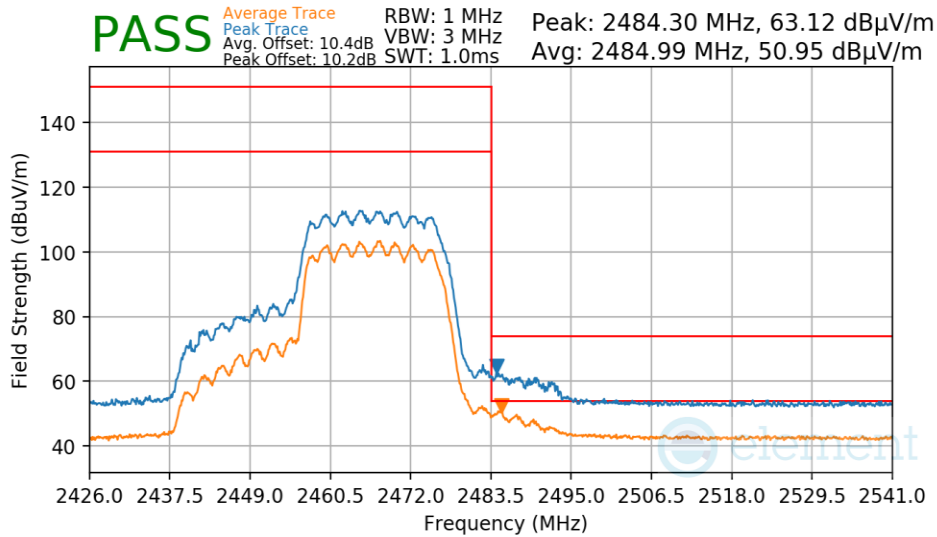
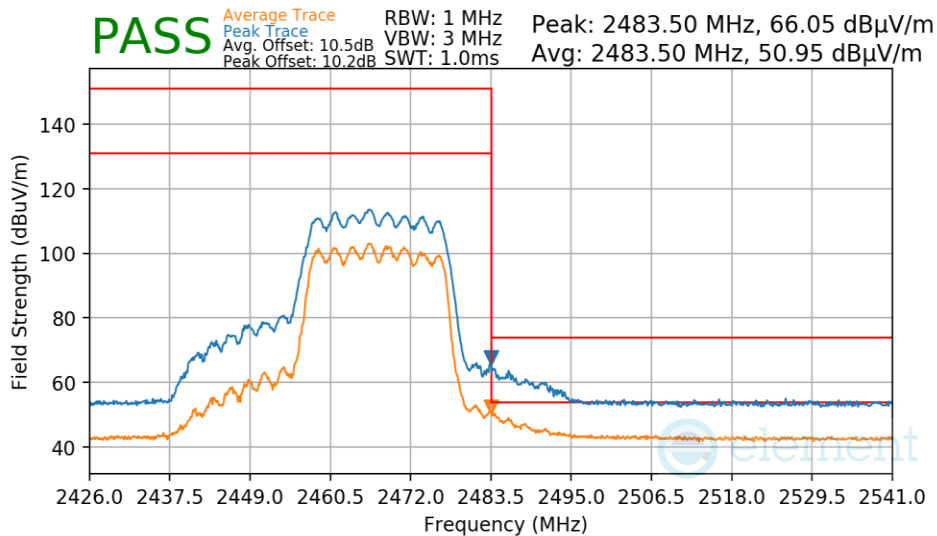


Mode: 802.11ax - SU  
 Data Rate: MCS2  
 Distance of Measurements: 3 Meters  
 Operating Frequency: 2467MHz  
 Channel: 12



**Plot 7-713. Radiated Restricted Upper Band Edge Measurement CDD**

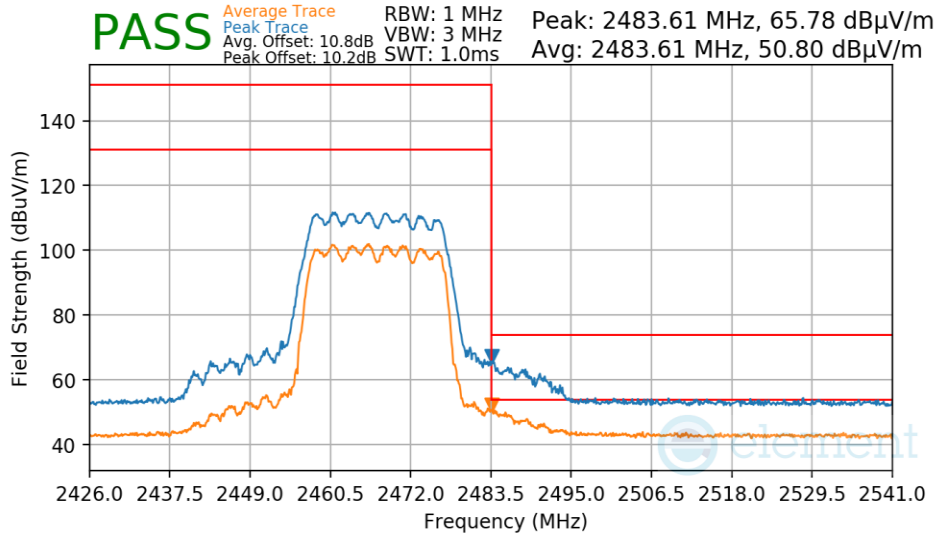
Mode: 802.11ax - SU  
 Data Rate: MCS4  
 Distance of Measurements: 3 Meters  
 Operating Frequency: 2467MHz  
 Channel: 12



**Plot 7-714. Radiated Restricted Upper Band Edge Measurement CDD**

FCC ID: BCGA2902 IC: 579C-A2902		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2311270063-03.BCG	Test Dates: 11/29/2023 - 3/7/2024	EUT Type: Tablet Device	Page 417 of 430

Mode: 802.11ax - SU  
 Data Rate: MCS9  
 Distance of Measurements: 3 Meters  
 Operating Frequency: 2467MHz  
 Channel: 12



**Plot 7-715. Radiated Restricted Upper Band Edge Measurement CDD**

FCC ID: BCGA2902 IC: 579C-A2902	 <b>MEASUREMENT REPORT (CERTIFICATION)</b>	<b>Approved by:</b> Technical Manager
<b>Test Report S/N:</b> 1C2311270063-03.BCG	<b>Test Dates:</b> 11/29/2023 - 3/7/2024	<b>EUT Type:</b> Tablet Device
		Page 418 of 430

## 7.8 Radiated Spurious Emissions – Below 1GHz

§15.209; RSS-Gen [8.9]

### Test Overview and Limit

All out of band radiated spurious emissions are measured with a spectrum analyzer connected to a receive antenna while the EUT is operating at its maximum duty cycle, at maximum power, and at the appropriate frequencies. All data rates and modes were investigated for radiated spurious emissions. Only the radiated emissions of the configuration that produced the worst case emissions are reported in this section.

***All out of band emissions appearing in a restricted band as specified in Section 15.205 of the Title 47 CFR and Table 7 of RSS-Gen (8.10) must not exceed the limits shown in Table 7-66 per Section 15.209 and RSS-Gen (8.9).***

Frequency	Field Strength [ $\mu\text{V/m}$ ]	Measured Distance [Meters]
0.009 – 0.490 MHz	2400/F (kHz)	300
0.490 – 1.705 MHz	24000/F (kHz)	30
1.705 – 30.00 MHz	30	30
30.00 – 88.00 MHz	100	3
88.00 – 216.0 MHz	150	3
216.0 – 960.0 MHz	200	3
Above 960.0 MHz	500	3

**Table 7-66. Radiated Limits**

### Test Procedures Used

ANSI C63.10-2013

### Test Settings

#### Quasi-Peak Field Strength Measurements

1. Analyzer center frequency was set to the frequency of the radiated spurious emission of interest
2. RBW = 120kHz (for emissions from 30MHz – 1GHz)
3. Detector = quasi-peak
4. Sweep time = auto couple
5. Trace mode = max hold
6. Trace was allowed to stabilize

#### Peak Field Strength Measurements

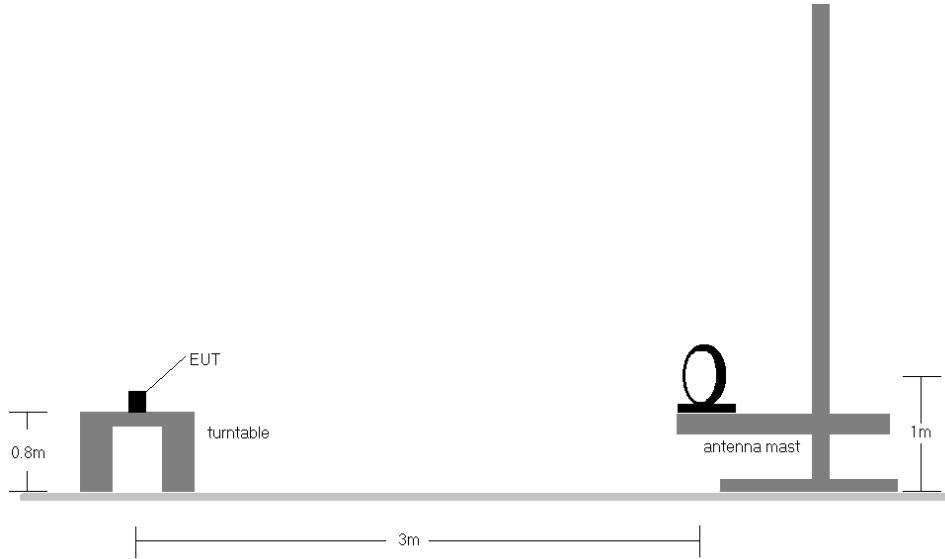
1. Analyzer center frequency was set to the frequency of the radiated spurious emission of interest
2. RBW = 120kHz (for emissions from 30MHz – 1GHz)
3. VBW = 300kHz
4. Detector = peak
5. Sweep time = auto couple
6. Trace mode = max hold

FCC ID: BCGA2902 IC: 579C-A2902		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2311270063-03.BCG	Test Dates: 11/29/2023 - 3/7/2024	EUT Type: Tablet Device	Page 419 of 430

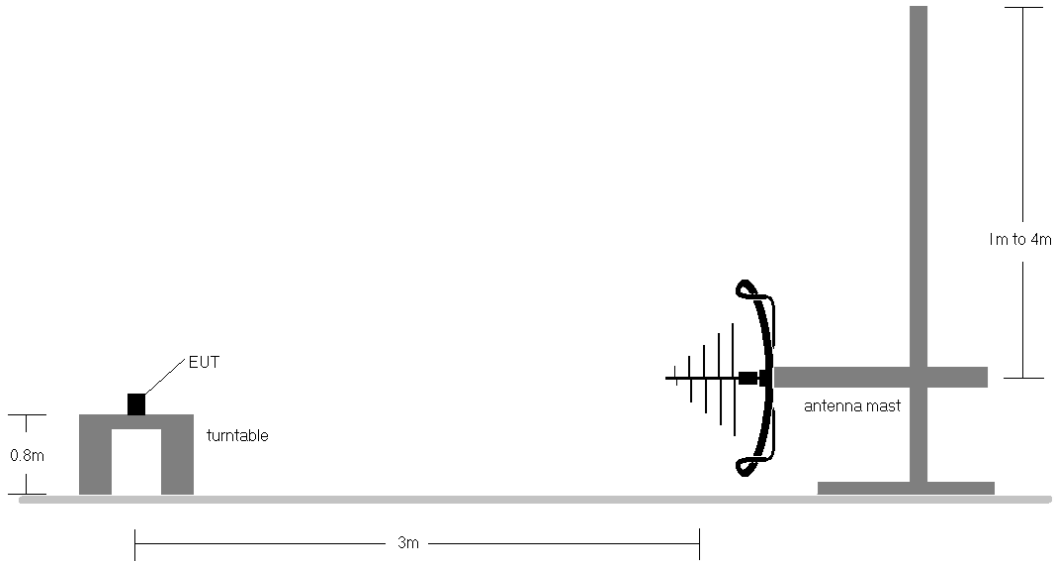
V 10.6 09/14/2023

**Test Setup**

The EUT and measurement equipment were set up as shown in the diagrams below.



**Figure 7-7. Radiated Test Setup < 30Mhz**



**Figure 7-8. Radiated Test Setup < 1GHz**

<b>FCC ID:</b> BCGA2902 <b>IC:</b> 579C-A2902	 <b>MEASUREMENT REPORT (CERTIFICATION)</b>	<b>Approved by:</b> Technical Manager
<b>Test Report S/N:</b> 1C2311270063-03.BCG		<b>Test Dates:</b> 11/29/2023 - 3/7/2024

V 10.6 09/14/2023

**Test Notes**

1. All emissions lying in restricted bands specified in §15.205 and RSS-Gen(8.10) are below the limit shown in Table 7-66.
2. The broadband receive antenna is manipulated through vertical and horizontal polarizations during the tests. The EUT is manipulated through three orthogonal planes. For below 30MHz the loop antenna was positioned in 3 orthogonal planes (X front, Y side, Z top) to determine the orientation resulting in the worst case emissions.
3. This unit was tested with its standard battery.
4. The spectrum is investigated using a peak detector and final measurements are recorded using CISPR quasi peak detector for emissions within 6dB of the limit.
5. Emissions were measured at a 3 meter test distance.
6. Emissions are investigated while operating on the center channel of the mode, band, and modulation that produced the worst case results during the transmitter spurious emissions testing.
7. Both configurations below were investigated, and the worst case has been reported.
  - a. EUT powered by AC/DC adaptor via USB-C cable with wire charger
  - b. EUT powered by host PC via USB-C cable with wire charger
8. The results recorded using the broadband antenna is known to correlate with the results obtained by using a tuned dipole with an acceptable degree of accuracy. The VSWR for the measurement antenna was found to be less than 2:1.
9. The wide spectrum spurious emissions plots shown on the following pages are used only for the purpose of emission identification.
10. The unit was tested with all possible modes and only the highest emission is reported.
11. All antenna configurations were investigated and only the worst case is reported.

**Sample Calculations**

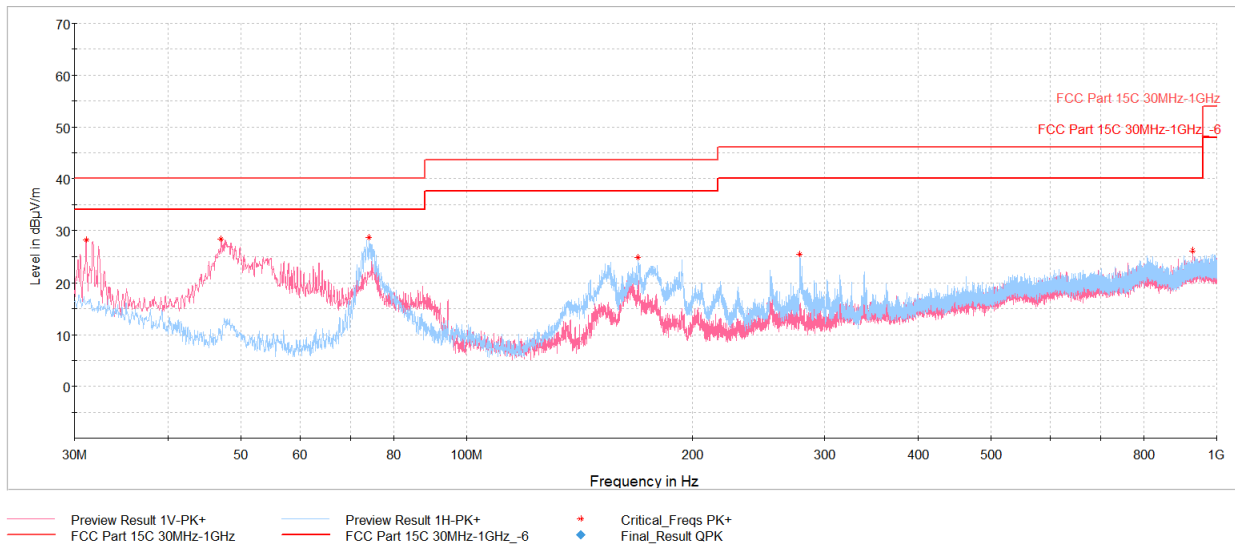
**Determining Spurious Emissions Levels**

- Field Strength Level  $_{[dB_{\mu V/m}]}$  = Analyzer Level  $_{[dBm]}$  + 107 + AFCL  $_{[dB/m]}$
- AFCL  $_{[dB/m]}$  = Antenna Factor  $_{[dB/m]}$  + Cable Loss  $_{[dB]}$  – Preamplifier Gain  $_{[dB]}$
- Margin  $_{[dB]}$  = Field Strength Level  $_{[dB_{\mu V/m}]}$  – Limit  $_{[dB_{\mu V/m}]}$

<b>FCC ID:</b> BCGA2902 <b>IC:</b> 579C-A2902	 <b>MEASUREMENT REPORT (CERTIFICATION)</b>	<b>Approved by:</b> Technical Manager
<b>Test Report S/N:</b> 1C2311270063-03.BCG	<b>Test Dates:</b> 11/29/2023 - 3/7/2024	<b>EUT Type:</b> Tablet Device

## CDD Radiated Spurious Emissions Measurements (Below 1GHz)

§15.209; RSS-Gen [8.9]

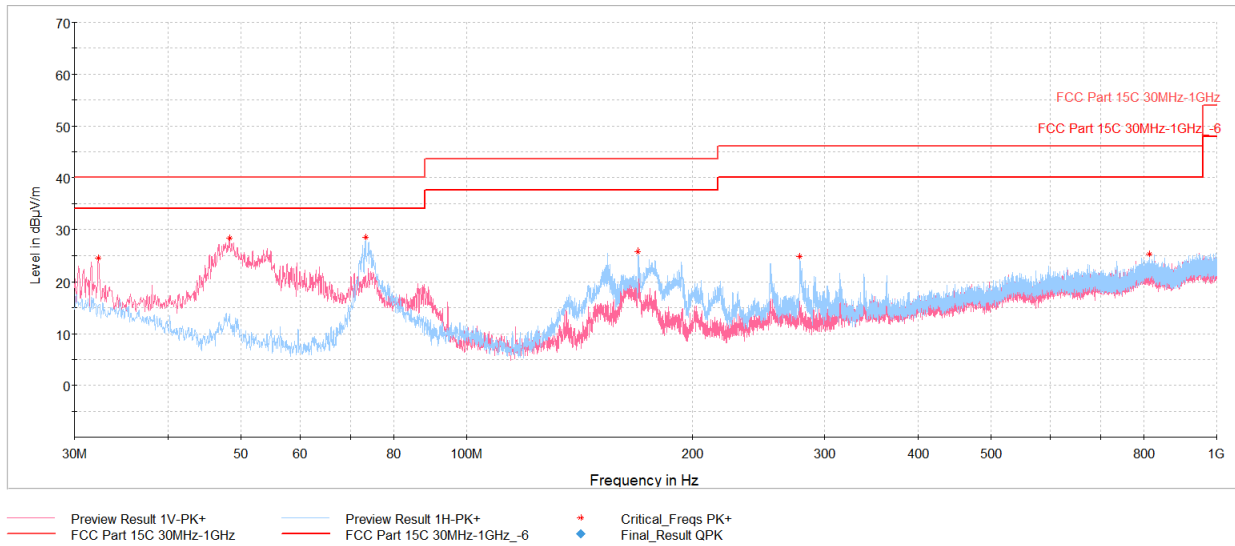


**Plot 7-716. Radiated Spurious Emissions below 1GHz CDD 11n Ch.6, with AC/DC Adapter**

Frequency [MHz]	Detector	Ant. Pol. [H/V]	Antenna Height [cm]	Turntable Azimuth [degree]	Analyzer Level [dBm]	AFCL [dB/m]	Field Strength [dBµV/m]	Limit [dBµV/m]	Margin [dB]
31.12	Max-Peak	V	200	338	-62.99	-15.85	28.16	40.00	-11.84
47.07	Max-Peak	V	100	351	-55.58	-23.16	28.26	40.00	-11.74
74.18	Max-Peak	H	200	84	-55.68	-22.66	28.66	40.00	-11.34
169.10	Max-Peak	H	200	17	-61.88	-20.18	24.94	43.52	-18.58
277.98	Max-Peak	H	100	104	-66.27	-15.14	25.59	46.02	-20.43
929.63	Max-Peak	V	200	301	-76.02	-4.87	26.11	46.02	-19.91

**Table 7-67. Radiated Spurious Emissions below 1GHz CDD 11n Ch.6, with AC/DC Adapter**

FCC ID: BCGA2902 IC: 579C-A2902		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2311270063-03.BCG	Test Dates: 11/29/2023 - 3/7/2024	EUT Type: Tablet Device	Page 422 of 430



**Plot 7-717. Radiated Spurious Emissions below 1GHz CDD 11ax - SU Ch.6, with AC/DC Adapter**

Frequency [MHz]	Detector	Ant. Pol. [H/V]	Antenna Height [cm]	Turntable Azimuth [degree]	Analyzer Level [dBm]	AFCL [dB/m]	Field Strength [dBµV/m]	Limit [dBµV/m]	Margin [dB]
32.28	Max-Peak	V	200	334	-65.72	-16.69	24.59	40.00	-15.41
48.28	Max-Peak	V	100	2	-55.43	-23.19	28.38	40.00	-11.62
73.41	Max-Peak	H	200	94	-55.96	-22.63	28.41	40.00	-11.59
169.15	Max-Peak	H	200	177	-60.98	-20.18	25.84	43.52	-17.68
277.93	Max-Peak	H	100	239	-67.02	-15.14	24.84	46.02	-21.18
812.55	Max-Peak	H	100	47	-77.07	-4.58	25.35	46.02	-20.67

**Table 7-68. Radiated Spurious Emissions below 1GHz CDD 11ax - SU Ch.6, with AC/DC Adapter**

FCC ID: BCGA2902 IC: 579C-A2902		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2311270063-03.BCG	Test Dates: 11/29/2023 - 3/7/2024	EUT Type: Tablet Device	Page 423 of 430

## 7.9 AC Line-Conducted Emissions Measurement

§15.207; RSS-Gen [8.8]

### Test Overview and Limit

All AC line conducted spurious emissions are measured with a receiver connected to a grounded LISN while the EUT is operating at its maximum duty cycle, at maximum power, and at the appropriate frequencies. All data rates and modes were investigated for AC Line conducted spurious emissions. Only the conducted emissions of the configuration that produced the worst case emissions are reported in this section.

**All conducted emissions must not exceed the limits shown in the table below, per Section 15.207 and RSS-Gen (8.8).**

Frequency of emission (MHz)	Conducted Limit (dB $\mu$ V)	
	Quasi-peak	Average
0.15 – 0.5	66 to 56*	56 to 46*
0.5 – 5	56	46
5 – 30	60	50

**Table 7-69. Conducted Limits**

\*Decreases with the logarithm of the frequency.

### Test Procedures Used

ANSI C63.10-2013, Subclause 6.2

### Test Settings

#### Quasi-Peak Measurements

1. Analyzer center frequency was set to the frequency of the spurious emission of interest
2. RBW = 9kHz (for emissions from 150kHz – 30MHz)
3. Detector = quasi-peak
4. Sweep time = auto couple
5. Trace mode = max hold
6. Trace was allowed to stabilize

#### Average Measurements

1. Analyzer center frequency was set to the frequency of the spurious emission of interest
2. RBW = 9kHz (for emissions from 150kHz – 30MHz)
3. Detector = RMS
4. Sweep time = auto couple
5. Trace mode = max hold
6. Trace was allowed to stabilize

FCC ID: BCGA2902 IC: 579C-A2902		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2311270063-03.BCG	Test Dates: 11/29/2023 - 3/7/2024	EUT Type: Tablet Device	Page 424 of 430

V 10.6 09/14/2023



## Test Setup

The EUT and measurement equipment were set up as shown in the diagram below.

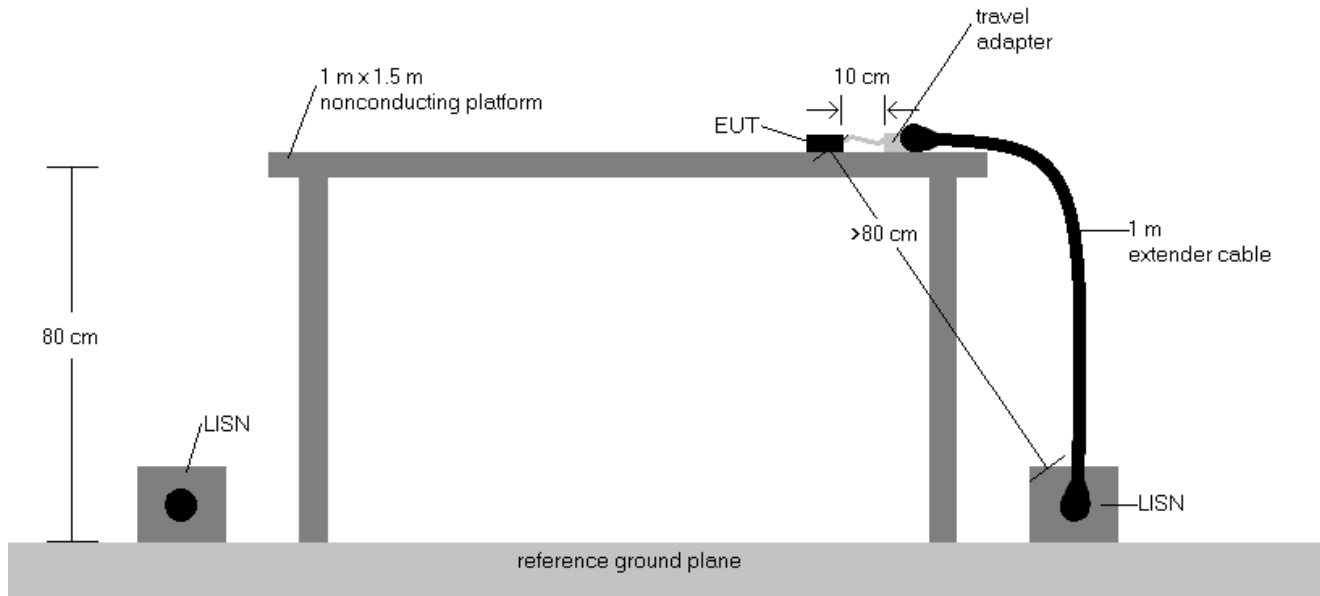


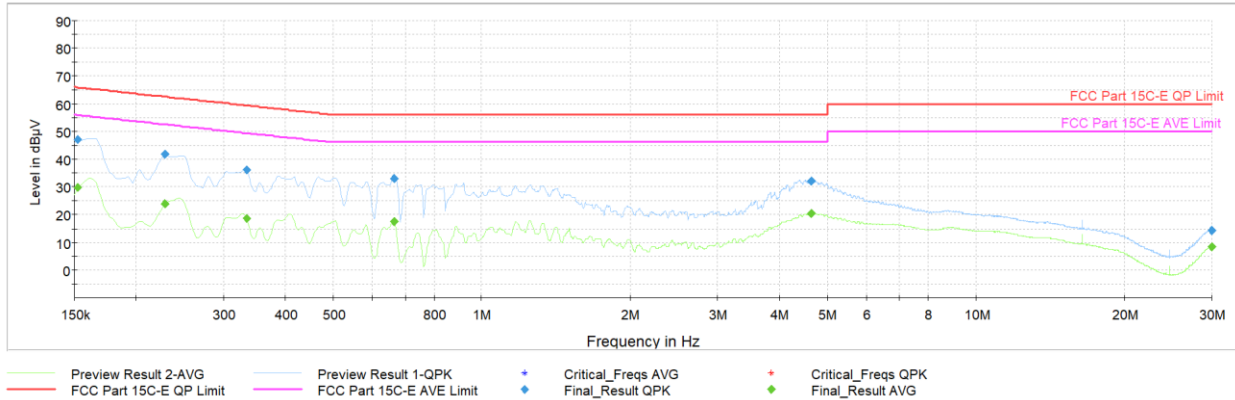
Figure 7-9. Test Instrument & Measurement Setup

## Test Notes

1. All modes of operation were investigated and the worst-case emissions are reported. The emissions found were not affected by the choice of channel used during testing.
2. Both configurations below were investigated, and the worst case has been reported.
  - a. EUT powered by AC/DC adaptor via USB-C cable with wire charger
  - b. EUT powered by host PC via USB-C cable with wire charger
3. The limit for an intentional radiator from 150kHz to 30MHz are specified in Part 15.207 and RSS-Gen(8.8).
4.  $\text{Corr. (dB)} = \text{Cable loss (dB)} + \text{LISN insertion factor (dB)}$
5.  $\text{QP/AV Level (dB}\mu\text{V)} = \text{QP/AV Analyzer/Receiver Level (dB}\mu\text{V)} + \text{Corr. (dB)}$
6.  $\text{Margin (dB)} = \text{QP/AV Level (dB}\mu\text{V)} - \text{QP/AV Limit (dB}\mu\text{V)}$
7. Traces shown in plot are made using quasi peak and average detectors.
8. Deviations to the Specifications: None.
9. The unit was tested with all possible modes and only the highest emission is reported.

FCC ID: BCGA2902 IC: 579C-A2902		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2311270063-03.BCG	Test Dates: 11/29/2023 - 3/7/2024	EUT Type: Tablet Device	Page 425 of 430

V 10.6 09/14/2023

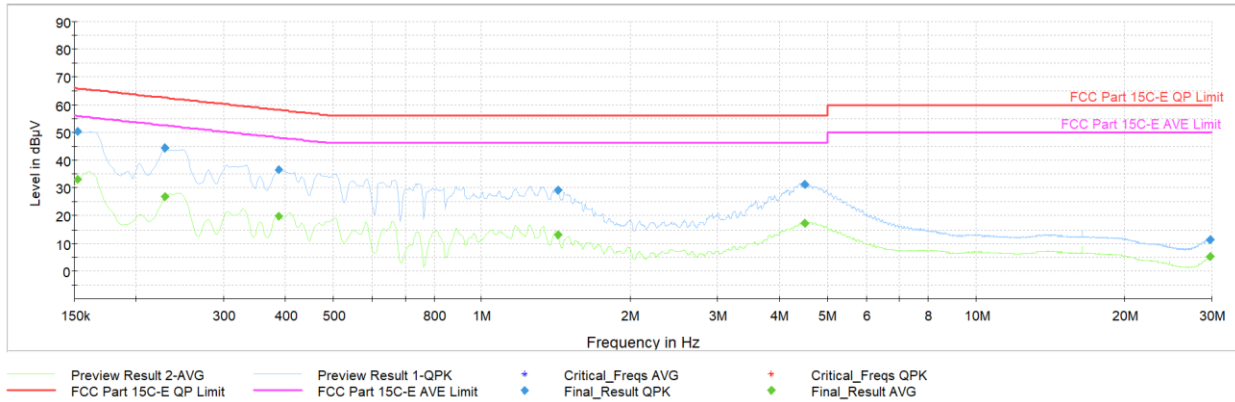


**Plot 7-718. AC Line Conducted Plot with CDD 11n Ch.6 (L1, with AC/DC Adapter)**

Frequency [MHz]	Process State	QuasiPeak [dBµV]	Average [dBµV]	Limit [dBµV]	Margin [dB]	Line	PE
0.152	FINAL	—	29.72	55.88	-26.16	L1	GND
0.152	FINAL	47.2	—	65.88	-18.72	L1	GND
0.229	FINAL	—	23.79	52.50	-28.71	L1	GND
0.229	FINAL	41.6	—	62.50	-20.86	L1	GND
0.335	FINAL	—	18.58	49.34	-30.76	L1	GND
0.335	FINAL	36.2	—	59.34	-23.19	L1	GND
0.665	FINAL	33.0	—	56.00	-22.97	L1	GND
0.665	FINAL	—	17.52	46.00	-28.48	L1	GND
4.639	FINAL	32.2	—	56.00	-23.85	L1	GND
4.639	FINAL	—	20.40	46.00	-25.60	L1	GND
29.983	FINAL	14.4	—	60.00	-45.59	L1	GND
29.996	FINAL	—	8.51	50.00	-41.49	L1	GND

**Table 7-70. AC Line Conducted Data with CDD 11n Ch.6 (L1, with AC/DC Adapter)**

FCC ID: BCGA2902 IC: 579C-A2902		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2311270063-03.BCG	Test Dates: 11/29/2023 - 3/7/2024	EUT Type: Tablet Device	Page 426 of 430



**Plot 7-719. AC Line Conducted Plot with CDD 11n Ch.6 (N, with AC/DC Adapter)**

Frequency [MHz]	Process State	QuasiPeak [dBµV]	Average [dBµV]	Limit [dBµV]	Margin [dB]	Line	PE
0.152	FINAL	—	33.12	55.88	-22.76	N	GND
0.152	FINAL	50.3	—	65.88	-15.59	N	GND
0.229	FINAL	—	26.84	52.50	-25.65	N	GND
0.229	FINAL	44.5	—	62.50	-17.98	N	GND
0.389	FINAL	—	19.71	48.10	-28.39	N	GND
0.389	FINAL	36.5	—	58.10	-21.57	N	GND
1.426	FINAL	29.2	—	56.00	-26.80	N	GND
1.426	FINAL	—	13.04	46.00	-32.96	N	GND
4.504	FINAL	31.3	—	56.00	-24.74	N	GND
4.504	FINAL	—	17.27	46.00	-28.73	N	GND
29.758	FINAL	—	5.09	50.00	-44.91	N	GND
29.758	FINAL	11.4	—	60.00	-48.60	N	GND

**Table 7-71. AC Line Conducted Data with CDD 11n Ch.6 (N, with AC/DC Adapter)**

FCC ID: BCGA2902 IC: 579C-A2902		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2311270063-03.BCG	Test Dates: 11/29/2023 - 3/7/2024	EUT Type: Tablet Device	Page 427 of 430

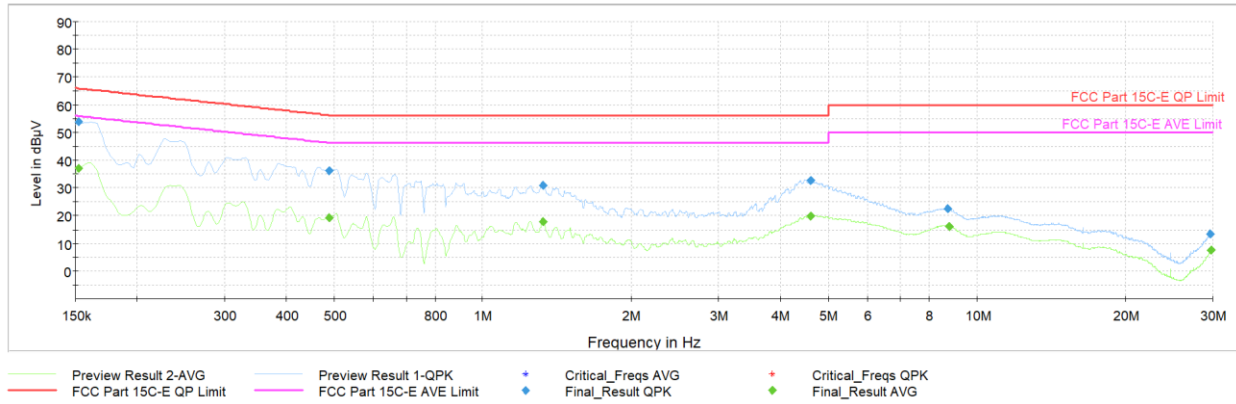


**Plot 7-720. AC Line Conducted Plot with CDD 11ax - SU Ch.6 (L1, with AC/DC Adapter)**

Frequency [MHz]	Process State	QuasiPeak [dBµV]	Average [dBµV]	Limit [dBµV]	Margin [dB]	Line	PE
0.166	FINAL	—	31.50	55.17	-23.67	L1	GND
0.166	FINAL	48.1	—	65.17	-17.10	L1	GND
0.229	FINAL	—	25.66	52.50	-26.84	L1	GND
0.229	FINAL	42.8	—	62.50	-19.69	L1	GND
0.584	FINAL	—	16.46	46.00	-29.54	L1	GND
0.584	FINAL	32.3	—	56.00	-23.73	L1	GND
1.331	FINAL	—	15.61	46.00	-30.39	L1	GND
1.334	FINAL	30.0	—	56.00	-26.01	L1	GND
4.511	FINAL	32.1	—	56.00	-23.95	L1	GND
4.511	FINAL	—	17.30	46.00	-28.70	L1	GND
16.388	FINAL	—	11.68	50.00	-38.32	L1	GND
16.388	FINAL	16.1	—	60.00	-43.95	L1	GND

**Table 7-72. AC Line Conducted Data with CDD 11ax - SU Ch.6 (L1, with AC/DC Adapter)**

FCC ID: BCGA2902 IC: 579C-A2902		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2311270063-03.BCG	Test Dates: 11/29/2023 - 3/7/2024	EUT Type: Tablet Device	Page 428 of 430



**Plot 7-721. AC Line Conducted Plot with CDD 11ax - SU Ch.6 (N, with AC/DC Adapter)**

Frequency [MHz]	Process State	QuasiPeak [dBµV]	Average [dBµV]	Limit [dBµV]	Margin [dB]	Line	PE
0.152	FINAL	—	37.06	55.88	-18.82	N	GND
0.152	FINAL	53.8	—	65.88	-12.09	N	GND
0.490	FINAL	—	19.35	46.17	-26.82	N	GND
0.490	FINAL	36.1	—	56.17	-20.10	N	GND
1.325	FINAL	—	17.89	46.00	-28.11	N	GND
1.325	FINAL	30.9	—	56.00	-25.12	N	GND
4.603	FINAL	32.7	—	56.00	-23.35	N	GND
4.603	FINAL	—	19.97	46.00	-26.03	N	GND
8.723	FINAL	22.4	—	60.00	-37.59	N	GND
8.792	FINAL	—	16.06	50.00	-33.94	N	GND
29.679	FINAL	13.4	—	60.00	-46.58	N	GND
29.780	FINAL	—	7.43	50.00	-42.57	N	GND

**Table 7-73. AC Line Conducted Data with CDD 11ax - SU Ch.6 (N, with AC/DC Adapter)**

FCC ID: BCGA2902 IC: 579C-A2902		MEASUREMENT REPORT (CERTIFICATION)	Approved by: Technical Manager
Test Report S/N: 1C2311270063-03.BCG	Test Dates: 11/29/2023 - 3/7/2024	EUT Type: Tablet Device	Page 429 of 430

## 8.0 CONCLUSION

The data collected relate only the item(s) tested and show that the **Apple Tablet Device FCC ID: BCGA2902, IC: 579C-A2902** is in compliance with Part 15 Subpart C (15.247) of the FCC Rules and RSS-247 of the Innovation, Science and Economic Development Canada Rules.

<b>FCC ID:</b> BCGA2902 <b>IC:</b> 579C-A2902	 <b>MEASUREMENT REPORT (CERTIFICATION)</b>	<b>Approved by:</b> Technical Manager
<b>Test Report S/N:</b> 1C2311270063-03.BCG		<b>Test Dates:</b> 11/29/2023 - 3/7/2024

V 10.6 09/14/2023