

TEST REPORT

Report No.: **BCTC2411153856-4E**

Applicant: **SHENZHEN NST INDUSTRY AND TRADE CO.,LTD**

Product Name: **tablet**

Test Model: **Ctab 10**

Tested Date: **2024-11-12 to 2024-12-02**

Issued Date: **2024-12-03**

Shenzhen BCTC Testing Co., Ltd.



FCC ID: 2AAMS-CTCP10

Product Name: tablet
Trademark: N/A
Model/Type reference: Ctab 10
Ctab10 PRO, Ctab10 Plus, M107TAP, Cpad10, Cpad10 PRO, Cpad10 Plus
Prepared For: SHENZHEN NST INDUSTRY AND TRADE CO.,LTD
Address: Room 501, Building 2, Baolong Specialized and Sophisticated Industrial Park, No.16 Baolong Third Road, Longgang, Shenzhen, China
Manufacturer: SHENZHEN NST INDUSTRY AND TRADE CO.,LTD
Address: Room 501, Building 2, Baolong Specialized and Sophisticated Industrial Park, No.16 Baolong Third Road, Longgang, Shenzhen, China
Prepared By: Shenzhen BCTC Testing Co., Ltd.
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Sample Received Date: 2024-11-12
Sample tested Date: 2024-11-12 to 2024-12-02
Issue Date: 2024-12-03
Report No.: BCTC2411153856-4E
Test Standards: FCC Part15 15.407
ANSI C63.10-2013
KDB 789033 D02 v02r01
Test Results: PASS

Tested by:



Brave Zeng/ Project Handler

Approved by:



Zero Zhou/Reviewer

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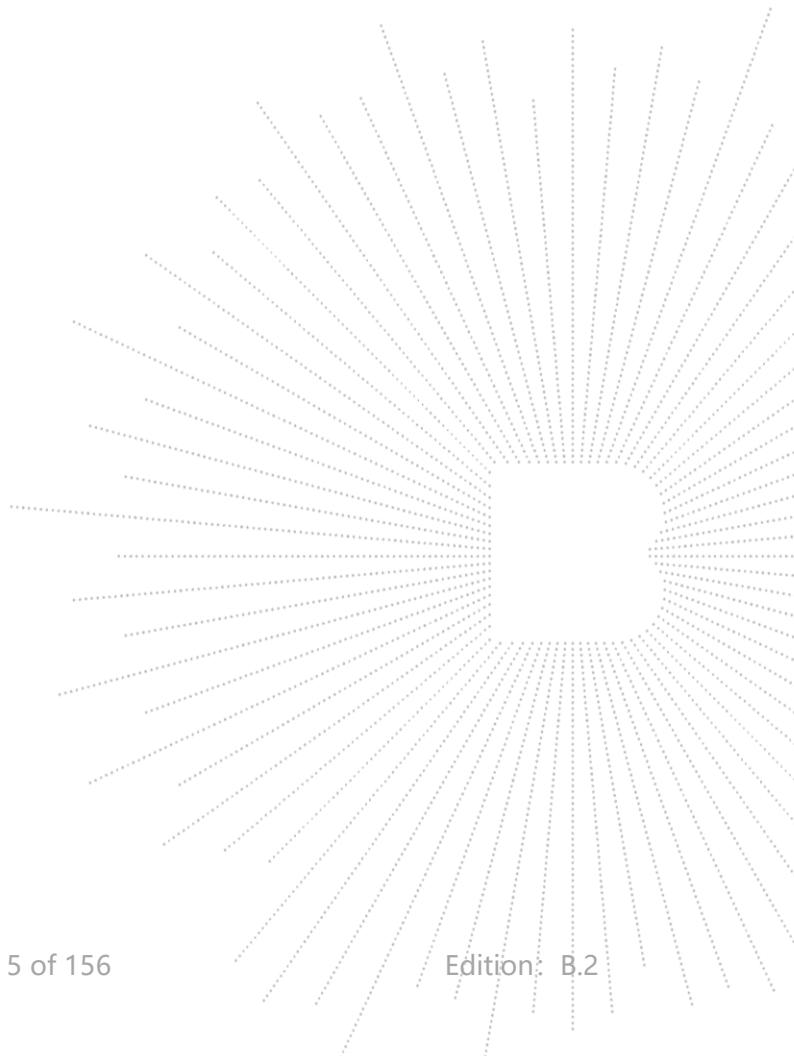
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(Note: N/A Means Not Applicable)

1. Version

Report No.	Issue Date	Description	Approved
BCTC2411153856-4E	2024-12-03	Original	Valid



2. Test Summary

The Product has been tested according to the following specifications:

No.	Test Parameter	Clause No.	Results
1	Spurious Radiated Emissions	15.209(a), 15.407 (b)(1) 15.407 (b)(4) 15.407 (b)(8)	PASS
2	Conducted Emission	15.207	PASS
3	26 dB and 99% Emission Bandwidth	15.407 (a)(12) 15.1049	PASS
4	Minimum 6 dB bandwidth	15.407(e)	PASS
5	Maximum Conducted Output Power	15.407 (a)(1) 15.407 (a)(3)	PASS
6	Band Edge	2.1051, 15.407(b)(1) 15.407(b)(4)	PASS
7	Power Spectral Density	15.407 (a)(1) 15.407 (a)(3)	PASS
8	Spurious Emissions at Antenna Terminals	2.1051, 15.407(b)	PASS
9	Antenna Requirement	15.203	PASS

3. Measurement Uncertainty

Where relevant, the following measurement uncertainty levels have been estimated for tests performed on the Product as specified in CISPR 16-4-2. This uncertainty represents an expanded uncertainty expressed at approximately the 95% confidence level using a coverage factor of k=2.

No.	Item	Uncertainty
1	3m chamber Radiated spurious emission(9kHz-30MHz)	U=3.7dB
2	3m chamber Radiated spurious emission(30MHz-1GHz)	U=4.3dB
3	3m chamber Radiated spurious emission(1GHz-18GHz)	U=4.5dB
4	3m chamber Radiated spurious emission(18GHz-40GHz)	U=3.34dB
5	Conducted Emission(150kHz-30MHz)	U=3.20dB
6	Conducted Adjacent channel power	U=1.38dB
7	Conducted output power uncertainty Above 1G	U=1.576dB
8	Conducted output power uncertainty below 1G	U=1.28dB
9	humidity uncertainty	U=5.3%
10	Temperature uncertainty	U=0.59°C

4. Product Information And Test Setup

4.1 Product Information

Model/Type reference:	Ctab 10 Ctab10 PRO, Ctab10 Plus, M107TAP, Cpad10, Cpad10 PRO, Cpad10 Plus
Model differences:	All models are the same circuit and RF module, only the model name, color and Logo are different.
Hardware Version:	863C_MB_V2.73
Software Version:	Callsky Ctab 10 20241205
IEEE 802.11 WLAN	802.11a/n/ac/ax(20MHz channel bandwidth)
Mode Supported	802.11n/ac/ax(40MHz channel bandwidth) 5180-5240MHz for 802.11a/n/ac(HT20)/ax(HT20); 5190-5230MHz for 802.11n/ac(HT40)/ax(HT40); 5745-5825 MHz for 802.11a/n/ac(HT20)/ax(HT20); 5755-5795 MHz for 802.11n/ac(HT40)/ax(HT40);
Operation Frequency:	802.11a: 6,9,12,18,24,36,48,54Mbps; 802.11n(HT20/HT40):MCS0-MCS15; 802.11ac/ax(VHT20): NSS1, MCS0-MCS8 802.11acax(VHT40):NSS1, MCS0-MCS9
Data Rate	OFDMA/OFDMA
Type of Modulation:	4 channels for 802.11a/n20/ax20 in the 5180-5240MHz band ; 2 channels for 802.11 n40/ax40 in the 5190-5230MHz band ; 5 channels for 802.11a/n20/ax20 in the 5745-5825MHz band ; 2 channels for 802.11 n40/ax40 in the 5755-5795MHz band ;
Antenna installation:	Internal antenna
Antenna Gain:	2.57 dBi
Adapter Information:	<p>Remark:</p> <p><input checked="" type="checkbox"/> The antenna gain of the product comes from the antenna report provided by the customer, and the test data is affected by the customer information. <input type="checkbox"/> The antenna gain of the product is provided by the customer, and the test data is affected by the customer information.</p> <p>Ratings: DC 5V from Adapter/ DC 3.8 from battery MODEL: MKA-0502000VU INPUT: 100-240V~50/60Hz 0.4A OUTPUT: DC 5.0V 2.0A 10.0W</p>

4.2 Test Setup Configuration

See test photographs attached in *EUT TEST SETUP PHOTOGRAPHS* for the actual connections between Product and support equipment.

4.3 Support Equipment

No.	Device Type	Brand	Model	Series No.	Note
E-1	tablet	N/A	Ctab 10	N/A	EUT
E-2	Adapter	N/A	MKA-0502000VU	N/A	Auxiliary

Item	Shielded Type	Ferrite Core	Length	Note
C-1	NO	NO	3M	DC cable unshielded

Notes:

1. All the equipment/cables were placed in the worst-case configuration to maximize the emission during the test.
2. Grounding was established in accordance with the manufacturer's requirements and conditions for the intended use.

4.4 Channel List

5.1G

802.11a/n/ac (20MHz)/ ax (20MHz) Carrier Frequency Channel							
Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)
36	5180	44	5220	-	-	-	-
40	5200	48	5240	-	-	-	-

802.11n /ac(40MHz)/ ax(40MHz) Carrier Frequency Channel							
Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)
38	5190	-	-	-	-	-	-
46	5230	-	-	-	-	-	-

5.8G

802.11a/n/ac(20 MHz)/ ax(20 MHz) Carrier Frequency Channel							
Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)
149	5745	153	5765	157	5785	161	5805
165	5825	-	-	-	-	-	-

802.11n/ac 40MHz/ ax 40MHz Carrier Frequency Channel					
Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)
151	5755	159	5795	-	-

4.5 Test Mode

To investigate the maximum EMI emission characteristics generates from EUT, the test system was pre-scanning tested base on the consideration of following EUT operation mode or test configuration mode which possible have effect on EMI emission level. Each of these EUT operation mode(s) or test configuration mode(s) mentioned above was evaluated respectively.

Pretest Mode	Description
Mode 1	802.11a / n/ ac 20/ax 20 CH36/ CH40/ CH 48 802.11a /n/ ac 20/ax 20 CH149/ CH157/ CH 165
Mode 2	802.11n/ ac40/ax 40 CH38/ CH 46 802.11n/ ac40/ax 40 CH 151 / CH 159
Mode 3	Transmitting (Conducted emission & Radiated emission)

Note:

1. The measurements are performed at all Bit Rate of Transmitter, the worst data was reported.
2. We're testing antenna A data.

4.6 Table Of Parameters Of Text Software Setting

During testing channel & power controlling software provided by the customer was used to control the operating channel as well as the output power level. The RF output power selection is for the setting of RF output power expected by the customer and is going to be fixed on the firmware of the final end product power parameters

Test software Version	CMD		
	Parameters	DEF	DEF

5. Test Facility And Test Instrument Used

5.1 Test Facility

All measurement facilities used to collect the measurement data are located at Shenzhen BCTC Testing Co., Ltd. Address: 1-2/F., Building B, Pengzhou Industrial Park, No.158, Fuyuan 1st Road, Zhancheng, Fuhai Subdistrict, Bao'an District, Shenzhen, Guangdong, China. The site and apparatus are constructed in conformance with the requirements of ANSI C63.4 and CISPR 16-1-1 other equivalent standards.

FCC Test Firm Registration Number: 712850

A2LA certificate registration number is: CN1212

ISED Registered No.: 23583

ISED CAB identifier: CN0017

5.2 Test Instrument Used

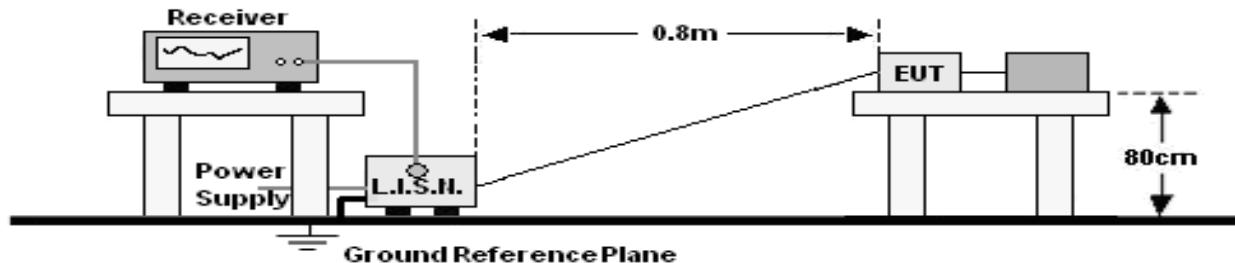
Conducted Emissions Test					
Equipment	Manufacturer	Model#	Serial#	Last Cal.	Next Cal.
Receiver	R&S	ESR3	102075	May 16, 2024	May 15, 2025
LISN	R&S	ENV216	101375	May 16, 2024	May 15, 2025
Software	Frad	EZ-EMC	EMC-CON 3A1	\	\
Pulse limiter	Schwarzbeck	VTSD9561-F	01323	May 16, 2024	May 15, 2025

RF Conducted Test					
Equipment	Manufacturer	Model#	Serial#	Last Cal.	Next Cal.
Power meter	Keysight	E4419	\	May 16, 2024	May 15, 2025
Power Sensor (AV)	Keysight	E9300A	\	May 16, 2024	May 15, 2025
Signal Analyzer 20kHz - 26.5GHz	Keysight	N9020A	MY49100060	May 16, 2024	May 15, 2025
Spectrum Analyzer 9kHz - 40GHz	R&S	FSP40	100363	May 16, 2024	May 15, 2025
Radio frequency control box	MAIWEI	MW100-RFC B	\	\	\
Software	MAIWEI	MTS 8310	\	\	\

Radiated Emissions Test (966 Chamber01)					
Equipment	Manufacturer	Model#	Serial#	Last Cal.	Next Cal.
966 chamber	ChengYu	966 Room	966	May 16, 2024	May 15, 2025
Receiver	R&S	ESR3	102075	May 16, 2024	May 15, 2025
Receiver	R&S	ESRP	101154	May 16, 2024	May 15, 2025
Amplifier	Schwarzbeck	BBV9744	9744-0037	May 16, 2024	May 15, 2025
TRILOG Broadband Antenna	Schwarzbeck	VULB9163	942	May 21, 2024	May 20, 2025
Loop Antenna(9KHz -30MHz)	Schwarzbeck	FMZB1519B	00014	May 21, 2024	May 20, 2025
Amplifier	SKET	LAPA_01G18 G-45dB	SK202104090 1	May 16, 2024	May 15, 2025
Horn Antenna	Schwarzbeck	BBHA9120D	1541	May 21, 2024	May 20, 2025
Amplifier(18G Hz-40GHz)	MITEQ	TTA1840-35- HG	2034381	May 16, 2024	May 15, 2025
Horn Antenna(18G Hz-40GHz)	Schwarzbeck	BBHA9170	00822	May 21, 2024	May 20, 2025
Spectrum Analyzer9kHz- 40GHz	R&S	FSP40	100363	May 16, 2024	May 15, 2025
Software	Frad	EZ-EMC	FA-03A2 RE	\	\

6. Conducted Emissions

6.1 Block Diagram Of Test Setup



6.2 Limit

Frequency (MHz)	Limit (dBuV)	
	Quas-peak	Average
0.15 -0.5	66 - 56 *	56 - 46 *
0.50 -5.0	56.00	46.00
5.0 -30.0	60.00	50.00

Notes:

1. *Decreasing linearly with logarithm of frequency.
2. The lower limit shall apply at the transition frequencies.

6.3 Test Procedure

Receiver Parameters	Setting
Attenuation	10 dB
Start Frequency	0.15 MHz
Stop Frequency	30 MHz
IF Bandwidth	9 kHz

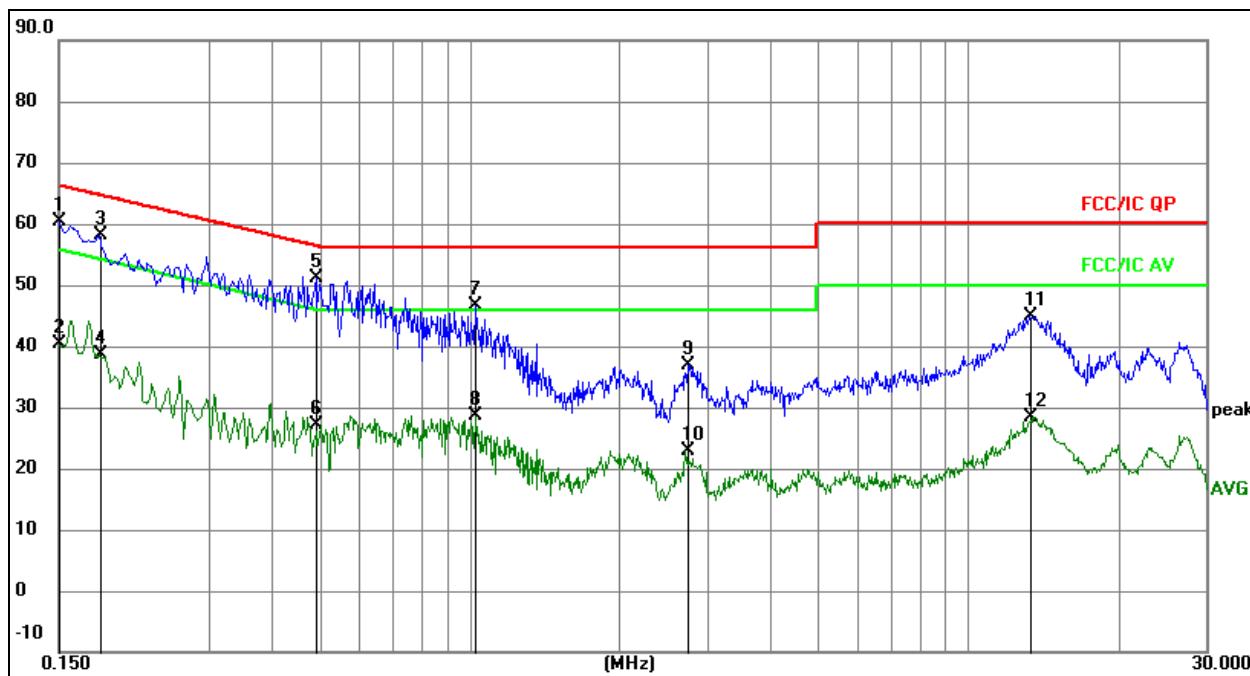
- The Product was placed on a nonconductive table 0.8 m above the horizontal ground reference plane, and 0.4 m from the vertical ground reference plane, and connected to the main through Line Impedance Stability Network (L.I.S.N.).
- The RBW of the receiver was set at 9 kHz in 150 kHz ~ 30MHz with Peak and AVG detector in Max Hold mode. Run the receiver's pre-scan to record the maximum disturbance generated from Product in all power lines in the full band.
- For each frequency whose maximum record was higher or close to limit, measure its QP and AVG values and record.

6.4 EUT Operating Conditions

The EUT was configured for testing in a typical fashion (as a customer would normally use it). The EUT has been programmed to continuously transmit during test. This operating condition was tested and used to collect the included data.

6.5 Test Result

Temperature:	26 °C	Relative Humidity:	54%
Pressure:	101KPa	Phase :	L
Test Mode:	Mode 3	Test Voltage :	AC120V/60Hz

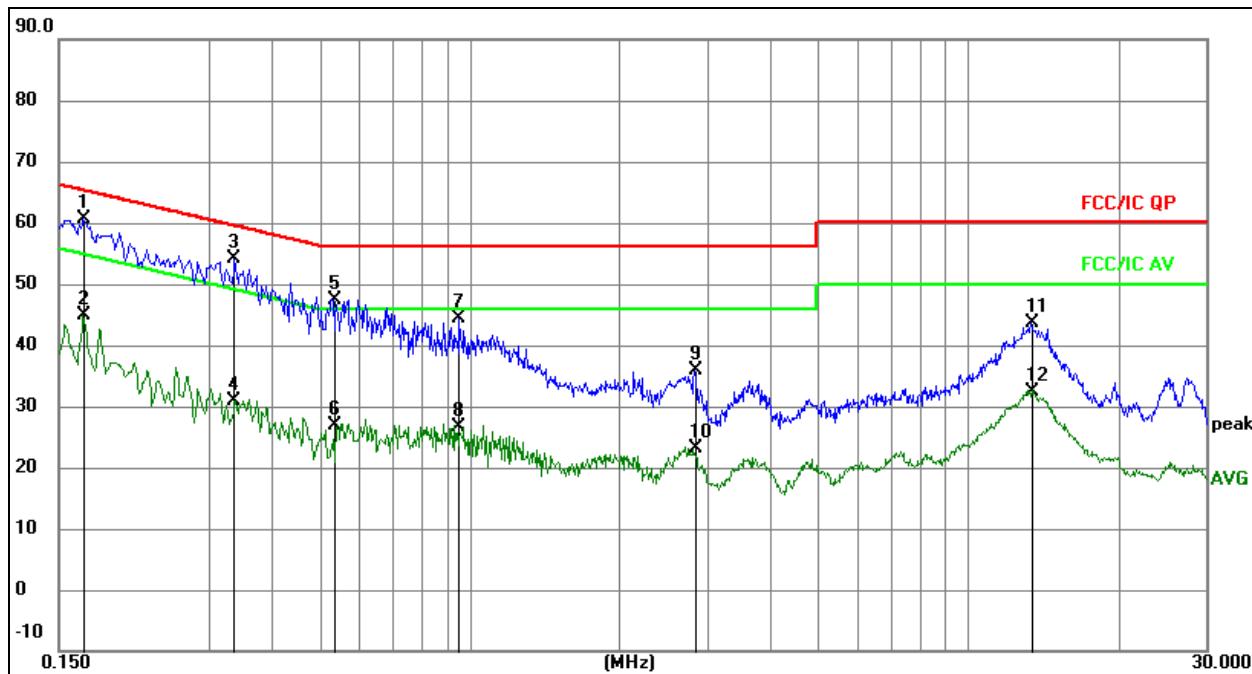


Remark:

1. All readings are Quasi-Peak and Average values.
2. Factor = Insertion Loss + Cable Loss.
3. Measurement=Reading Level+ Correct Factor
4. Over= Measurement-Limit

No.	Mk.	Freq.	Reading	Correct	Measure-	Limit	Over	Detector
			Level	Factor	ment			
		MHz		dB	dBuV	dBuV	dB	
1		0.1500	40.38	20.07	60.45	66.00	-5.55	QP
2		0.1500	20.20	20.07	40.27	56.00	-15.73	AVG
3		0.1806	38.10	20.07	58.17	64.46	-6.29	QP
4		0.1806	18.50	20.07	38.57	54.46	-15.89	AVG
5 *		0.4915	30.93	20.08	51.01	56.14	-5.13	QP
6		0.4915	6.98	20.08	27.06	46.14	-19.08	AVG
7		1.0265	26.53	20.09	46.62	56.00	-9.38	QP
8		1.0265	8.54	20.09	28.63	46.00	-17.37	AVG
9		2.7356	16.76	20.11	36.87	56.00	-19.13	QP
10		2.7356	2.76	20.11	22.87	46.00	-23.13	AVG
11		13.2667	24.61	20.26	44.87	60.00	-15.13	QP
12		13.2667	8.12	20.26	28.38	50.00	-21.62	AVG

Temperature:	26 °C	Relative Humidity:	54%
Pressure:	101KPa	Phase :	N
Test Mode:	Mode 3	Test Voltage :	AC120V/60Hz

**Remark:**

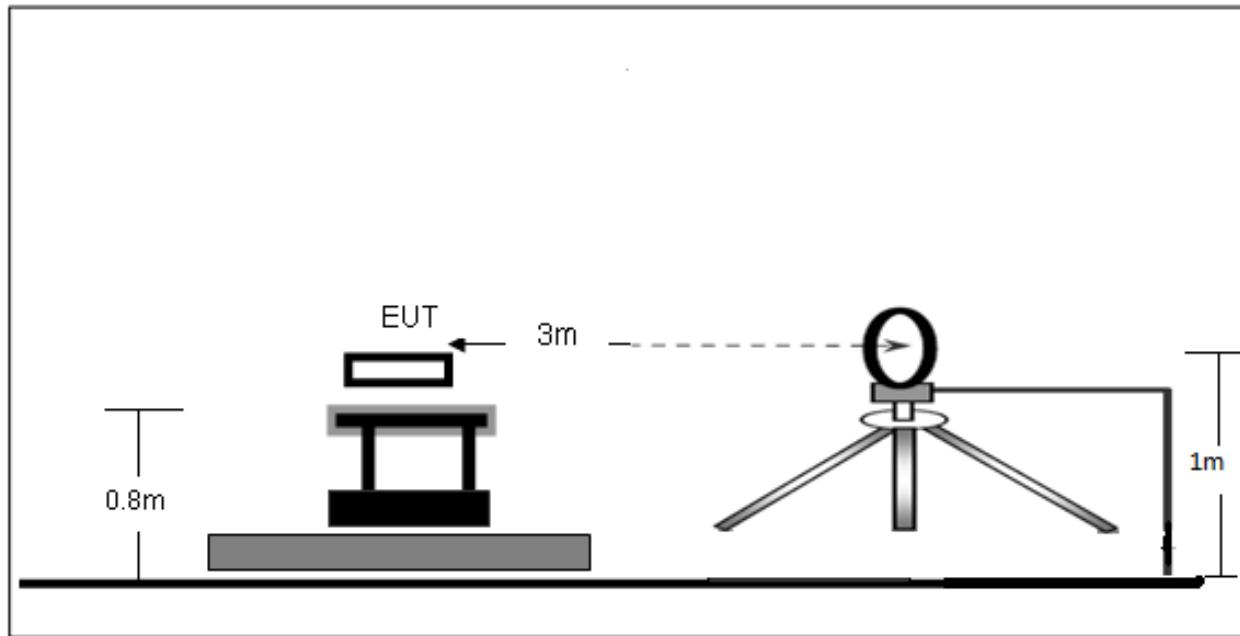
1. All readings are Quasi-Peak and Average values.
2. Factor = Insertion Loss + Cable Loss.
3. Measurement=Reading Level+ Correct Factor
4. Over1 Measurement-Limit

No.	Mk.	Freq.	Reading	Correct	Measure-	Limit	Over		
			Level	Factor	ment			dB	Detector
		MHz		dB					
1	*	0.1677	40.58	20.07	60.65	65.07	-4.42	QP	
2		0.1677	24.85	20.07	44.92	55.07	-10.15	AVG	
3		0.3373	34.07	20.07	54.14	59.27	-5.13	QP	
4		0.3373	10.90	20.07	30.97	49.27	-18.30	AVG	
5		0.5322	27.42	20.08	47.50	56.00	-8.50	QP	
6		0.5322	6.74	20.08	26.82	46.00	-19.18	AVG	
7		0.9531	24.31	20.09	44.40	56.00	-11.60	QP	
8		0.9531	6.47	20.09	26.56	46.00	-19.44	AVG	
9		2.8240	15.66	20.12	35.78	56.00	-20.22	QP	
10		2.8240	2.90	20.12	23.02	46.00	-22.98	AVG	
11		13.3372	23.36	20.26	43.62	60.00	-16.38	QP	
12		13.3372	12.24	20.26	32.50	50.00	-17.50	AVG	

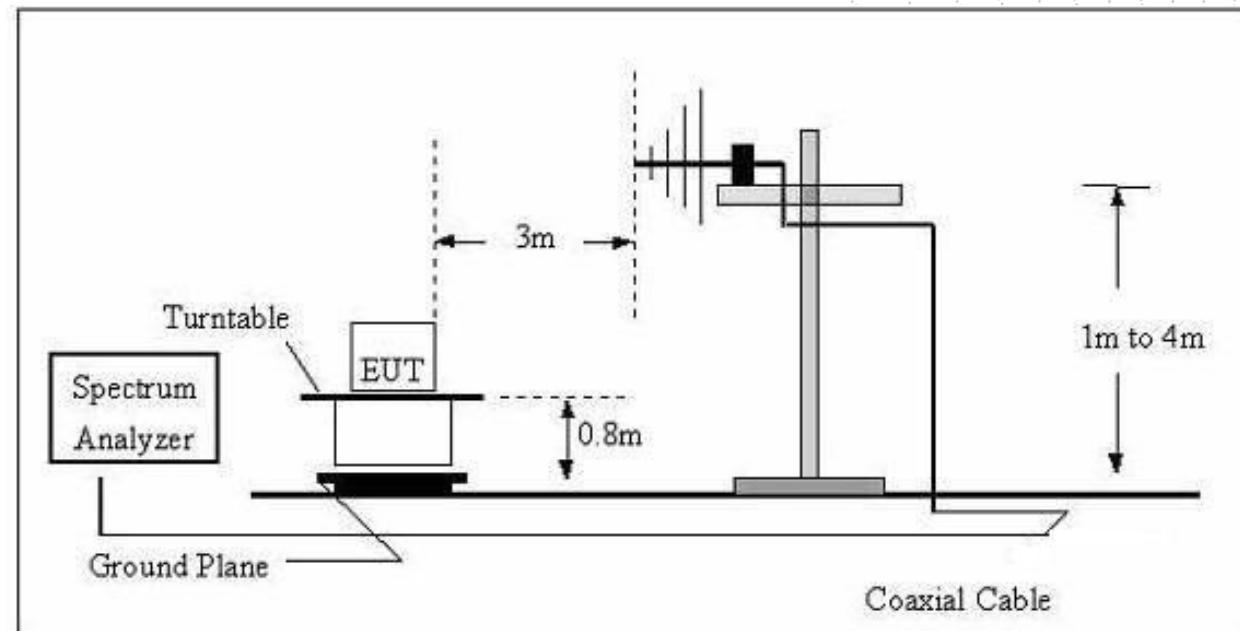
7. Radiated Emissions

7.1 Block Diagram Of Test Setup

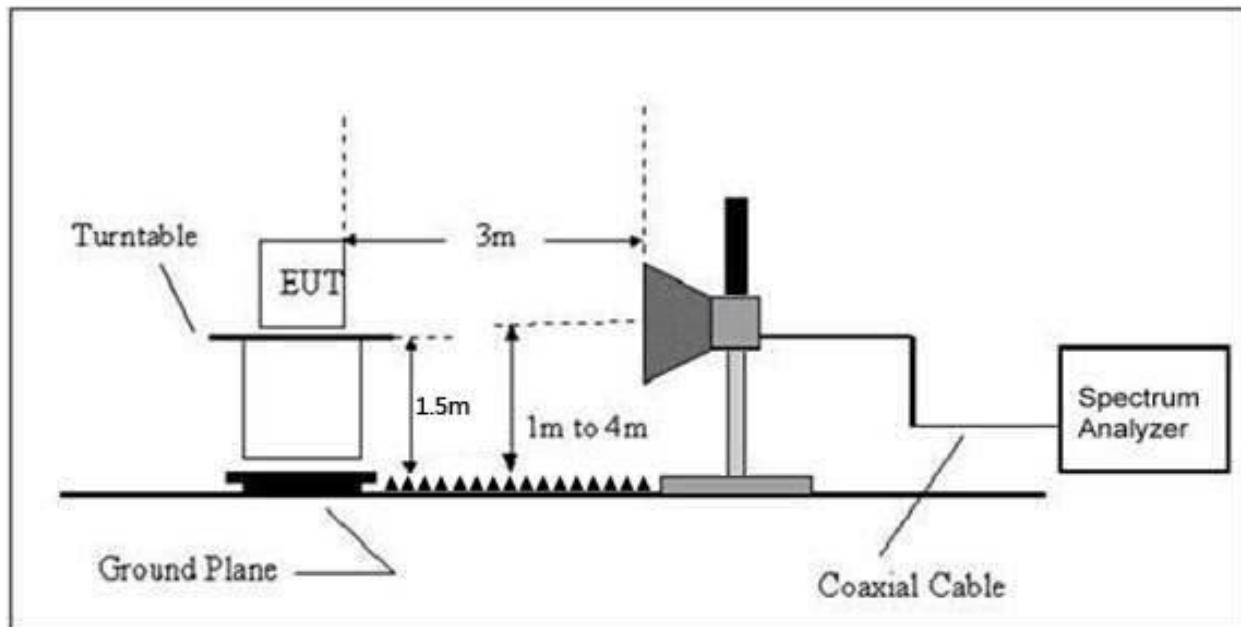
(A) Radiated Emission Test-Up Frequency Below 30MHz



(B) Radiated Emission Test-Up Frequency 30MHz~1GHz



(C) Radiated Emission Test-Up Frequency Above 1GHz



7.2 Limit

20dBc in any 100 kHz bandwidth outside the operating frequency band. In case the emission fall within the restricted band specified on 15.205(a), then the 15.209(a) limit in the table below has to be followed.

Frequency (MHz)	Field Strength uV/m	Distance (m)	Field Strength Limit at 3m Distance	
			uV/m	dBuV/m
0.009 ~ 0.490	2400/F(kHz)	300	10000 * 2400/F(kHz)	20log ^{(2400/F(kHz))} + 80
0.490 ~ 1.705	24000/F(kHz)	30	100 * 24000/F(kHz)	20log ^{(24000/F(kHz))} + 40
1.705 ~ 30	30	30	100 * 30	20log ⁽³⁰⁾ + 40
30 ~ 88	100	3	100	20log ⁽¹⁰⁰⁾
88 ~ 216	150	3	150	20log ⁽¹⁵⁰⁾
216 ~ 960	200	3	200	20log ⁽²⁰⁰⁾
Above 960	500	3	500	20log ⁽⁵⁰⁰⁾

Limits Of Radiated Emission Measurement (Above 1000MHz)

Frequency (MHz)	Limit (dBuV/m) (at 3M)	
	Peak	Average
Above 1000	74	54

Notes:

- (1) The limit for radiated test was performed according to FCC PART 15C.
- (2) The tighter limit applies at the band edges.
- (3) Emission level (dBuV/m)=20log Emission level (uV/m).

7.3 Test Procedure

The test site semi-anechoic chamber has met the requirement of NSA tolerance 4 dB according to the standards: ANSI C63.10-2013. The test distance is 3m. The setup is according to the requirements in Section 13.1.4.1 of ANSI C63.10-2013 and CAN/CSA-CEI/IEC CISPR 22.

This test is required for any spurious emission that falls in a Restricted Band, as defined in Section 15.205. It must be performed with the highest gain of each type of antenna proposed for use with the EUT. Use the following spectrum analyzer settings:

Spectrum Parameter	Setting
Attenuation	Auto
Start Frequency	1000 MHz
Stop Frequency	10th carrier harmonic
RB / VB (emission in restricted band)	1 MHz / 1 MHz for Peak, 1 MHz / 10Hz for Average

Receiver Parameter	Setting
Attenuation	Auto
Start ~ Stop Frequency	9kHz~150kHz / RB 200Hz for QP
Start ~ Stop Frequency	150kHz~30MHz / RB 9kHz for QP
Start ~ Stop Frequency	30MHz~1000MHz / RB 120kHz for QP

- a. The measuring distance of at 3 m shall be used for measurements at frequency up to 1GHz. For frequencies above 1GHz, any suitable measuring distance may be used.
- b. The EUT was placed on the top of a rotating table 0.8 m for below 1GHz and 1.5m for above 1GHz the ground at a 3 meter. The table was rotated 360 degrees to determine the position of the highest radiation.
- c. The height of the equipment or of the substitution antenna shall be 0.8 m for below 1GHz and 1.5m for above 1GHz; the height of the test antenna shall vary between 1 m to 4 m. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
- d. The initial step in collecting conducted emission data is a spectrum analyzer peak detector mode pre-scanning the measurement frequency range. Significant peaks are then marked and then Quasi Peak detector mode re-measured.
- e. If the Peak Mode measured value compliance with and lower than Quasi Peak Mode Limit, the EUT shall be deemed to meet QP Limits and then no additional QP Mode measurement performed.
- f. For the actual test configuration, please refer to the related Item –EUT Test Photos.

Note:

Both horizontal and vertical antenna polarities were tested and performed pretest to three orthogonal axis. The worst case emissions were reported

During the radiated emission test, the Spectrum Analyzer was set with the following configurations:

Frequency Band (MHz)	Function	Resolution bandwidth	Video Bandwidth
30 to 1000	QP	120 kHz	300 kHz
Above 1000	Peak	1 MHz	1 MHz
	Average	1 MHz	10 Hz

Note: for the frequency ranges below 30 MHz, a narrower RBW is used for these ranges but the measured value should add a RBW correction factor (RBWCF) where RBWCF [dB] = $10 \cdot \lg(100 \text{ [kHz]} / \text{narrower RBW [kHz]})$. , the narrower RBW is 1 kHz and RBWCF is 20 dB for the frequency 9 kHz to 150 kHz, and the narrower RBW is 10 kHz and RBWCF is 10 dB for the frequency 150 kHz to 30 MHz.

7.4 EUT Operating Conditions

The EUT was configured for testing in a typical fashion (as a customer would normally use it). The EUT has been programmed to continuously transmit during test. This operating condition was tested and used to collect the included data.

7.5 Test Result

Below 30MHz

Temperature:	26°C	Relative Humidity:	54%
Pressure:	101KPa	Test Voltage:	AC120V/60Hz
Test Mode:	Mode 3	Polarization :	--

Freq. (MHz)	Reading (dBuV/m)	Limit (dBuV/m)	Margin (dB)	State
(MHz)	(dBuV/m)	(dBuV/m)	(dB)	P/F
--	--	--	--	PASS
--	--	--	--	PASS

Note:

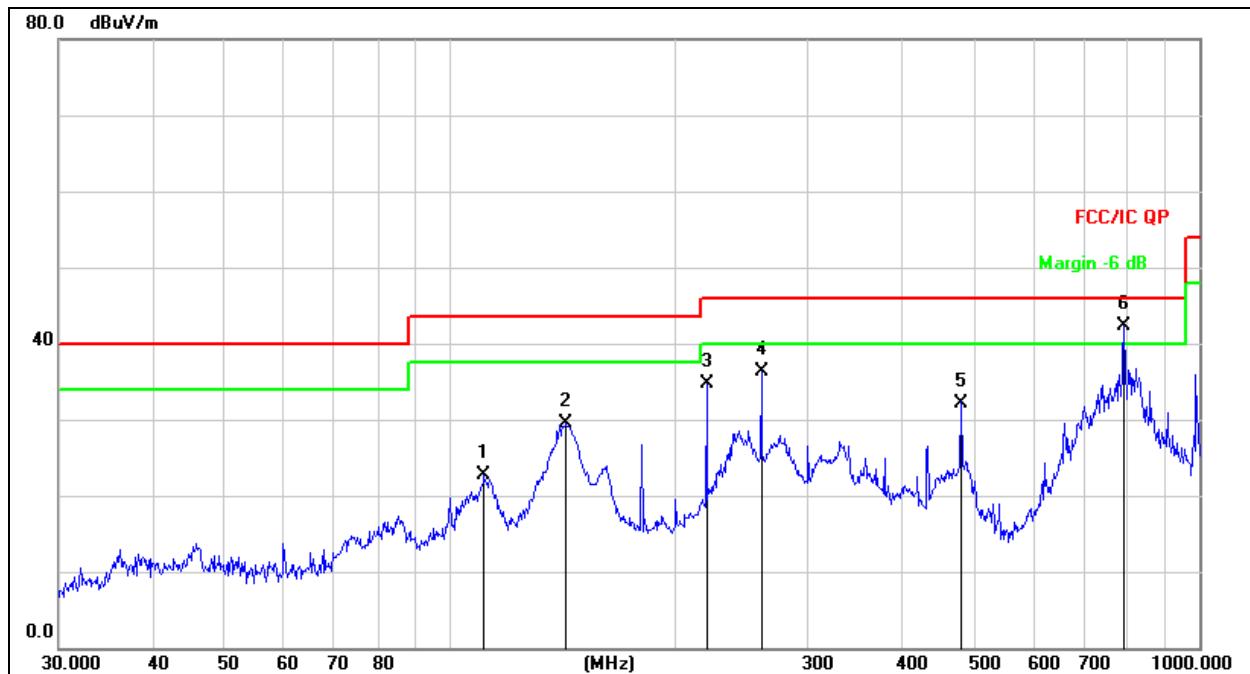
The amplitude of spurious emissions which are attenuated by more than 20dB below the permissible value has no need to be reported.

Distance extrapolation factor = $40 \log(\text{specific distance}/\text{test distance})$ (dB);

Limit line = specific limits(dBuV) + distance extrapolation factor.

Between 30MHz – 1GHz

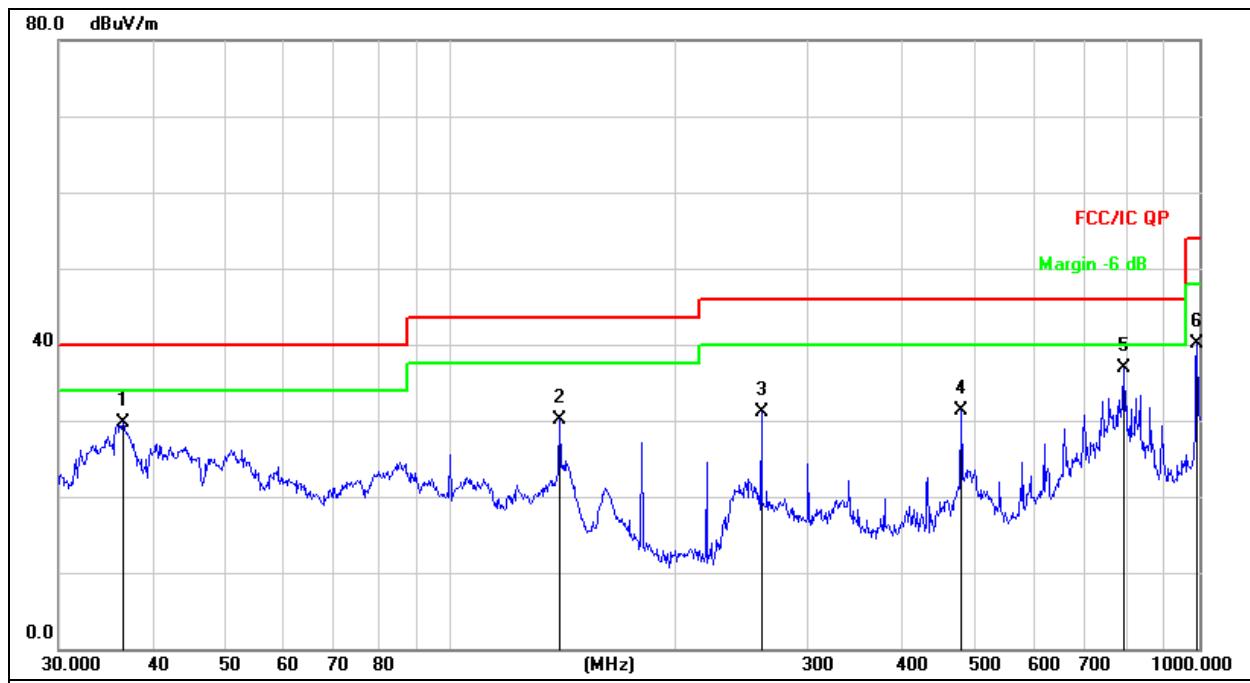
Temperature:	26 °C	Relative Humidity:	54%
Pressure:	101KPa	Phase :	Horizontal
Test Mode:	Mode 3	Test Voltage :	AC120V/60Hz

**Remark:**

1. Factor = Antenna Factor + Cable Loss – Pre-amplifier.
2. Measurement=Reading Level+ Correct Factor
3. Over=Measurement-Limit

No.	Mk.	Freq. MHz	Reading Level dBuV	Correct Factor dB	Measure- ment dBuV/m	Limit dB/m	Over dB	Detector
1	110.9571	39.47	-16.70	22.77	43.50	-20.73	QP	
2	142.8243	48.37	-18.93	29.44	43.50	-14.06	QP	
3	219.8449	49.80	-15.15	34.65	46.00	-11.35	QP	
4	260.1444	50.45	-14.08	36.37	46.00	-9.63	QP	
5	480.5276	41.30	-9.10	32.20	46.00	-13.80	QP	
6	*	793.3960	46.73	-4.48	42.25	46.00	-3.75	QP

Temperature:	26 °C	Relative Humidity:	54%
Pressure:	101KPa	Phase :	Vertical
Test Mode:	Mode 3	Test Voltage :	AC120V/60Hz

**Remark:**

1. Factor = Antenna Factor + Cable Loss – Pre-amplifier.
2. Measurement=Reading Level+ Correct Factor
3. Over= Measurement-Limit

No.	Mk.	Freq. MHz	Reading Level dBuV	Correct Factor dB	Measure- ment dBuV/m	Limit dB/m	Over dB	Detector
1		36.5092	45.13	-15.39	29.74	40.00	-10.26	QP
2		139.8508	48.76	-18.72	30.04	43.50	-13.46	QP
3		260.1444	45.21	-14.08	31.13	46.00	-14.87	QP
4		480.5276	40.36	-9.10	31.26	46.00	-14.74	QP
5	*	793.3960	41.40	-4.48	36.92	46.00	-9.08	QP
6		993.0114	42.63	-2.44	40.19	54.00	-13.81	QP

Between 1GHz – 40GHz

Test Mode:	TX(5.1G) - 802.11a						
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5180 MHz)-Above 1G							
Vertical	4434.142	74.94	-20.73	54.21	68.2	-13.99	PK
Vertical	4434.142	59.72	-20.73	38.99	54	-15.01	AV
Vertical	10360.181	62.73	-9.36	53.37	68.2	-14.83	PK
Vertical	10360.181	49.94	-9.36	40.58	54	-13.42	AV
Vertical	15540.098	60.73	-7.84	52.89	74	-21.11	PK
Vertical	15540.098	49.91	-7.84	42.07	54	-11.93	AV
Horizontal	4434.054	74.70	-20.73	53.97	68.2	-14.23	PK
Horizontal	4434.054	59.21	-20.73	38.48	54	-15.52	AV
Horizontal	10360.188	64.84	-9.36	55.48	68.2	-12.72	PK
Horizontal	10360.188	49.95	-9.36	40.59	54	-13.41	AV
Horizontal	15540.078	63.41	-7.84	55.57	74	-18.43	PK
Horizontal	15540.078	49.46	-7.84	41.62	54	-12.38	AV
Middle Channel (5200 MHz)-Above 1G							
Vertical	4592.034	74.43	-20.42	54.02	74	-19.98	PK
Vertical	4592.034	59.74	-20.42	39.33	54	-14.67	AV
Vertical	10400.065	60.08	-9.30	50.78	68.2	-17.42	PK
Vertical	10400.065	49.39	-9.30	40.09	54	-13.91	AV
Vertical	15600.111	61.61	-7.82	53.79	74	-20.21	PK
Vertical	15600.111	49.88	-7.82	42.06	54	-11.94	AV
Horizontal	4592.109	73.99	-20.42	53.57	74	-20.43	PK
Horizontal	4592.109	59.25	-20.42	38.83	54	-15.17	AV
Horizontal	10400.043	63.76	-9.30	54.46	68.2	-13.74	PK
Horizontal	10400.043	49.45	-9.30	40.15	54	-13.85	AV
Horizontal	15600.032	61.12	-7.82	53.30	74	-20.70	PK
Horizontal	15600.032	49.76	-7.82	41.94	54	-12.06	AV
High Channel (5240 MHz)-Above 1G							
Vertical	4739.133	72.47	-20.12	52.35	74	-21.65	PK
Vertical	4739.133	59.90	-20.12	39.77	54	-14.23	AV
Vertical	10480.132	63.80	-9.18	54.62	68.2	-13.58	PK
Vertical	10480.132	49.46	-9.18	40.28	54	-13.72	AV
Vertical	15720.122	62.78	-7.78	55.00	74	-19.00	PK
Vertical	15720.122	49.72	-7.78	41.94	54	-12.06	AV
Horizontal	4739.142	73.37	-20.12	53.24	74	-20.76	PK
Horizontal	4739.142	59.49	-20.12	39.37	54	-14.63	AV
Horizontal	10480.193	64.26	-9.18	55.08	68.2	-13.12	PK
Horizontal	10480.193	49.39	-9.18	40.21	54	-13.79	AV
Horizontal	15720.113	64.69	-7.78	56.91	74	-17.09	PK
Horizontal	15720.113	49.91	-7.78	42.13	54	-11.87	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode:	TX(5.1G) - 802.11n-HT20
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5180 MHz)-Above 1G							
Vertical	4434.020	70.88	-20.73	50.15	68.2	-18.05	PK
Vertical	4434.020	59.72	-20.73	38.99	54	-15.01	AV
Vertical	10360.139	60.84	-9.36	51.48	68.2	-16.72	PK
Vertical	10360.139	49.74	-9.36	40.38	54	-13.62	AV
Vertical	15540.028	60.88	-7.84	53.04	74	-20.96	PK
Vertical	15540.028	49.31	-7.84	41.47	54	-12.53	AV
Horizontal	4434.084	71.77	-20.73	51.04	68.2	-17.16	PK
Horizontal	4434.084	59.31	-20.73	38.58	54	-15.42	AV
Horizontal	10360.049	62.64	-9.36	53.28	68.2	-14.92	PK
Horizontal	10360.049	49.66	-9.36	40.30	54	-13.70	AV
Horizontal	15540.135	63.82	-7.84	55.98	74	-18.02	PK
Horizontal	15540.135	49.54	-7.84	41.70	54	-12.30	AV
Middle Channel (5200 MHz)-Above 1G							
Vertical	4592.134	72.04	-20.42	51.62	74	-22.38	PK
Vertical	4592.134	59.21	-20.42	38.79	54	-15.21	AV
Vertical	10400.115	64.17	-9.30	54.87	68.2	-13.33	PK
Vertical	10400.115	49.78	-9.30	40.48	54	-13.52	AV
Vertical	15600.135	62.97	-7.82	55.15	74	-18.85	PK
Vertical	15600.135	49.64	-7.82	41.82	54	-12.18	AV
Horizontal	4592.200	71.02	-20.42	50.61	74	-23.39	PK
Horizontal	4592.200	59.69	-20.42	39.27	54	-14.73	AV
Horizontal	10400.094	63.94	-9.30	54.64	68.2	-13.56	PK
Horizontal	10400.094	49.27	-9.30	39.97	54	-14.03	AV
Horizontal	15600.078	64.74	-7.82	56.92	74	-17.08	PK
Horizontal	15600.078	49.66	-7.82	41.84	54	-12.16	AV
High Channel (5240 MHz)-Above 1G							
Vertical	4739.184	73.97	-20.12	53.85	74	-20.15	PK
Vertical	4739.184	59.18	-20.12	39.06	54	-14.94	AV
Vertical	10480.068	61.77	-9.18	52.59	68.2	-15.61	PK
Vertical	10480.068	49.56	-9.18	40.38	54	-13.62	AV
Vertical	15720.174	60.88	-7.78	53.10	74	-20.90	PK
Vertical	15720.174	49.88	-7.78	42.10	54	-11.90	AV
Horizontal	4739.115	74.22	-20.12	54.10	74	-19.90	PK
Horizontal	4739.115	59.50	-20.12	39.38	54	-14.62	AV
Horizontal	10480.114	64.65	-9.18	55.47	68.2	-12.73	PK
Horizontal	10480.114	49.30	-9.18	40.12	54	-13.88	AV
Horizontal	15720.029	63.39	-7.78	55.61	74	-18.39	PK
Horizontal	15720.029	49.12	-7.78	41.34	54	-12.66	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode:	TX(5.1G) - 802.11n-HT40
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5190 MHz)-Above 1G							
Vertical	4434.173	70.29	-20.73	49.56	68.2	-18.64	PK
Vertical	4434.173	59.09	-20.73	38.35	54	-15.65	AV
Vertical	10380.036	63.65	-9.33	54.32	68.2	-13.88	PK
Vertical	10380.036	49.49	-9.33	40.16	54	-13.84	AV
Vertical	15570.031	61.33	-7.83	53.50	74	-20.50	PK
Vertical	15570.031	49.94	-7.83	42.11	54	-11.89	AV
Horizontal	4434.000	71.33	-20.73	50.60	74	-23.40	PK
Horizontal	4434.000	59.76	-20.73	39.02	54	-14.98	AV
Horizontal	10380.049	62.18	-9.33	52.85	68.2	-15.35	PK
Horizontal	10380.049	49.33	-9.33	40.00	54	-14.00	AV
Horizontal	15570.132	64.99	-7.83	57.16	74	-16.84	PK
Horizontal	15570.132	49.47	-7.83	41.64	54	-12.36	AV
Middle Channel (5230 MHz)-Above 1G							
Vertical	4739.027	72.21	-20.12	52.08	68.2	-16.12	PK
Vertical	4739.027	59.58	-20.12	39.46	54	-14.54	AV
Vertical	10460.117	64.41	-9.21	55.20	68.2	-13.00	PK
Vertical	10460.117	50.00	-9.21	40.79	54	-13.21	AV
Vertical	15690.063	63.99	-7.79	56.20	74	-17.80	PK
Vertical	15690.063	49.29	-7.79	41.50	54	-12.50	AV
Horizontal	4739.144	70.08	-20.12	49.96	68.2	-18.24	PK
Horizontal	4739.144	59.97	-20.12	39.85	54	-14.15	AV
Horizontal	10460.171	61.37	-9.21	52.16	68.2	-16.04	PK
Horizontal	10460.171	49.14	-9.21	39.93	54	-14.07	AV
Horizontal	15690.030	60.80	-7.79	53.01	74	-20.99	PK
Horizontal	15690.030	49.67	-7.79	41.88	54	-12.12	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode:	TX(5.1G) - 802.11ac-HT20
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5180 MHz)-Above 1G							
Vertical	4434.156	73.71	-20.73	52.98	68.2	-15.22	PK
Vertical	4434.156	59.53	-20.73	38.79	54	-15.21	AV
Vertical	10360.171	64.97	-9.36	55.61	68.2	-12.59	PK
Vertical	10360.171	49.55	-9.36	40.19	54	-13.81	AV
Vertical	15540.101	60.29	-7.84	52.45	74	-21.55	PK
Vertical	15540.101	49.58	-7.84	41.74	54	-12.26	AV
Horizontal	4434.126	71.59	-20.73	50.86	68.2	-17.34	PK
Horizontal	4434.126	59.09	-20.73	38.36	54	-15.64	AV
Horizontal	10360.023	60.34	-9.36	50.98	68.2	-17.22	PK
Horizontal	10360.023	49.45	-9.36	40.09	54	-13.91	AV
Horizontal	15540.189	64.24	-7.84	56.40	74	-17.60	PK
Horizontal	15540.189	49.89	-7.84	42.05	54	-11.95	AV
Middle Channel (5200 MHz)-Above 1G							
Vertical	4592.168	71.19	-20.42	50.78	74	-23.22	PK
Vertical	4592.168	59.41	-20.42	38.99	54	-15.01	AV
Vertical	10400.021	63.00	-9.30	53.70	68.2	-14.50	PK
Vertical	10400.021	49.20	-9.30	39.90	54	-14.10	AV
Vertical	15600.185	60.31	-7.82	52.49	74	-21.51	PK
Vertical	15600.185	49.59	-7.82	41.77	54	-12.23	AV
Horizontal	4592.066	73.17	-20.42	52.75	74	-21.25	PK
Horizontal	4592.066	59.74	-20.42	39.33	54	-14.67	AV
Horizontal	10400.199	62.67	-9.30	53.37	68.2	-14.83	PK
Horizontal	10400.199	49.53	-9.30	40.23	54	-13.77	AV
Horizontal	15600.096	62.34	-7.82	54.52	74	-19.48	PK
Horizontal	15600.096	49.22	-7.82	41.40	54	-12.60	AV
High Channel (5240 MHz)-Above 1G							
Vertical	4739.117	70.17	-20.12	50.05	74	-23.95	PK
Vertical	4739.117	59.93	-20.12	39.81	54	-14.19	AV
Vertical	10480.142	63.88	-9.18	54.70	68.2	-13.50	PK
Vertical	10480.142	49.09	-9.18	39.91	54	-14.09	AV
Vertical	15720.045	62.58	-7.78	54.80	74	-19.20	PK
Vertical	15720.045	49.57	-7.78	41.79	54	-12.21	AV
Horizontal	4739.115	72.99	-20.12	52.87	74	-21.13	PK
Horizontal	4739.115	59.92	-20.12	39.80	54	-14.20	AV
Horizontal	10480.058	60.32	-9.18	51.14	68.2	-17.06	PK
Horizontal	10480.058	49.12	-9.18	39.94	54	-14.06	AV
Horizontal	15720.085	60.64	-7.78	52.86	74	-21.14	PK
Horizontal	15720.085	49.23	-7.78	41.45	54	-12.55	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode:	TX(5.1G) - 802.11ac-HT40
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5190 MHz)-Above 1G							
Vertical	4434.001	70.01	-20.73	49.28	68.2	-18.92	PK
Vertical	4434.001	59.15	-20.73	38.42	54	-15.58	AV
Vertical	10380.019	60.40	-9.33	51.07	68.2	-17.13	PK
Vertical	10380.019	49.80	-9.33	40.47	54	-13.53	AV
Vertical	15570.060	60.98	-7.83	53.15	74	-20.85	PK
Vertical	15570.060	49.27	-7.83	41.44	54	-12.56	AV
Horizontal	4434.134	73.18	-20.73	52.45	74	-21.55	PK
Horizontal	4434.134	59.10	-20.73	38.36	54	-15.64	AV
Horizontal	10380.177	61.80	-9.33	52.47	68.2	-15.73	PK
Horizontal	10380.177	49.45	-9.33	40.12	54	-13.88	AV
Horizontal	15570.155	63.17	-7.83	55.34	74	-18.66	PK
Horizontal	15570.155	49.23	-7.83	41.40	54	-12.60	AV
Middle Channel (5230 MHz)-Above 1G							
Vertical	4739.026	74.93	-20.12	54.81	68.2	-13.39	PK
Vertical	4739.026	59.55	-20.12	39.43	54	-14.57	AV
Vertical	10460.146	62.22	-9.21	53.01	68.2	-15.19	PK
Vertical	10460.146	49.22	-9.21	40.01	54	-13.99	AV
Vertical	15690.034	61.02	-7.79	53.23	74	-20.77	PK
Vertical	15690.034	49.46	-7.79	41.67	54	-12.33	AV
Horizontal	4739.071	73.66	-20.12	53.54	68.2	-14.66	PK
Horizontal	4739.071	59.58	-20.12	39.46	54	-14.54	AV
Horizontal	10460.100	63.87	-9.21	54.66	68.2	-13.54	PK
Horizontal	10460.100	49.67	-9.21	40.46	54	-13.54	AV
Horizontal	15690.056	60.48	-7.79	52.69	74	-21.31	PK
Horizontal	15690.056	49.13	-7.79	41.34	54	-12.66	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode:	TX(5.1G) - 802.11ax-HT20
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5180 MHz)-Above 1G							
Vertical	4434.072	74.88	-20.73	54.15	68.2	-14.05	PK
Vertical	4434.072	59.36	-20.73	38.63	54	-15.37	AV
Vertical	10360.198	62.35	-9.36	52.99	68.2	-15.21	PK
Vertical	10360.198	49.32	-9.36	39.96	54	-14.04	AV
Vertical	15540.034	64.19	-7.84	56.35	74	-17.65	PK
Vertical	15540.034	49.96	-7.84	42.12	54	-11.88	AV
Horizontal	4434.160	73.00	-20.73	52.27	68.2	-15.93	PK
Horizontal	4434.160	59.70	-20.73	38.97	54	-15.03	AV
Horizontal	10360.044	61.44	-9.36	52.08	68.2	-16.12	PK
Horizontal	10360.044	49.73	-9.36	40.37	54	-13.63	AV
Horizontal	15540.108	62.37	-7.84	54.53	74	-19.47	PK
Horizontal	15540.108	49.26	-7.84	41.42	54	-12.58	AV
Middle Channel (5200 MHz)-Above 1G							
Vertical	4592.045	71.87	-20.42	51.46	74	-22.54	PK
Vertical	4592.045	59.31	-20.42	38.89	54	-15.11	AV
Vertical	10400.008	63.60	-9.30	54.30	68.2	-13.90	PK
Vertical	10400.008	49.43	-9.30	40.13	54	-13.87	AV
Vertical	15600.194	62.84	-7.82	55.02	74	-18.98	PK
Vertical	15600.194	49.25	-7.82	41.43	54	-12.57	AV
Horizontal	4592.189	73.53	-20.42	53.12	74	-20.88	PK
Horizontal	4592.189	59.89	-20.42	39.47	54	-14.53	AV
Horizontal	10400.149	64.43	-9.30	55.13	68.2	-13.07	PK
Horizontal	10400.149	49.88	-9.30	40.58	54	-13.42	AV
Horizontal	15600.102	60.24	-7.82	52.42	74	-21.58	PK
Horizontal	15600.102	49.79	-7.82	41.97	54	-12.03	AV
High Channel (5240 MHz)-Above 1G							
Vertical	4739.158	70.75	-20.12	50.63	74	-23.37	PK
Vertical	4739.158	59.82	-20.12	39.70	54	-14.30	AV
Vertical	10480.090	60.40	-9.18	51.22	68.2	-16.98	PK
Vertical	10480.090	49.08	-9.18	39.90	54	-14.10	AV
Vertical	15720.091	62.74	-7.78	54.96	74	-19.04	PK
Vertical	15720.091	49.13	-7.78	41.35	54	-12.65	AV
Horizontal	4739.105	70.61	-20.12	50.49	74	-23.51	PK
Horizontal	4739.105	59.17	-20.12	39.05	54	-14.95	AV
Horizontal	10480.101	60.57	-9.18	51.39	68.2	-16.81	PK
Horizontal	10480.101	49.56	-9.18	40.38	54	-13.62	AV
Horizontal	15720.192	60.79	-7.78	53.01	74	-20.99	PK
Horizontal	15720.192	49.61	-7.78	41.83	54	-12.17	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode:	TX(5.1G) - 802.11ax-HT40
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5190 MHz)-Above 1G							
Vertical	4434.039	73.46	-20.73	52.73	68.2	-15.47	PK
Vertical	4434.039	59.92	-20.73	39.18	54	-14.82	AV
Vertical	10380.109	64.98	-9.33	55.65	68.2	-12.55	PK
Vertical	10380.109	49.49	-9.33	40.16	54	-13.84	AV
Vertical	15570.181	63.25	-7.83	55.42	74	-18.58	PK
Vertical	15570.181	49.61	-7.83	41.78	54	-12.22	AV
Horizontal	4434.129	72.44	-20.73	51.71	74	-22.29	PK
Horizontal	4434.129	59.42	-20.73	38.69	54	-15.31	AV
Horizontal	10380.181	62.76	-9.33	53.43	68.2	-14.77	PK
Horizontal	10380.181	49.87	-9.33	40.54	54	-13.46	AV
Horizontal	15570.057	60.78	-7.83	52.95	74	-21.05	PK
Horizontal	15570.057	49.78	-7.83	41.95	54	-12.05	AV
Middle Channel (5230 MHz)-Above 1G							
Vertical	4739.076	74.97	-20.12	54.85	68.2	-13.35	PK
Vertical	4739.076	59.94	-20.12	39.82	54	-14.18	AV
Vertical	10460.101	60.21	-9.21	51.00	68.2	-17.20	PK
Vertical	10460.101	49.16	-9.21	39.95	54	-14.05	AV
Vertical	15690.197	62.82	-7.79	55.03	74	-18.97	PK
Vertical	15690.197	49.89	-7.79	42.10	54	-11.90	AV
Horizontal	4739.087	74.25	-20.12	54.12	68.2	-14.08	PK
Horizontal	4739.087	59.77	-20.12	39.65	54	-14.35	AV
Horizontal	10460.067	64.69	-9.21	55.48	68.2	-12.72	PK
Horizontal	10460.067	50.00	-9.21	40.79	54	-13.21	AV
Horizontal	15690.109	61.61	-7.79	53.82	74	-20.18	PK
Horizontal	15690.109	49.78	-7.79	41.99	54	-12.01	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode:	TX (5.8G) -- 802.11a
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5745 MHz)-Above 1G							
Vertical	4679.090	71.08	-20.24	50.84	74	-23.16	PK
Vertical	4679.090	59.44	-20.24	39.19	54	-14.81	AV
Vertical	11490.090	61.67	-8.79	52.88	68.2	-15.32	PK
Vertical	11490.090	49.21	-8.79	40.42	54	-13.58	AV
Vertical	17235.177	55.31	-3.18	52.13	68.2	-16.07	PK
Vertical	17235.177	44.22	-3.18	41.04	54	-12.96	AV
Horizontal	4679.076	70.43	-20.73	49.70	74	-24.30	PK
Horizontal	4679.076	59.22	-20.73	38.49	54	-15.51	AV
Horizontal	11490.002	63.30	-8.79	54.51	68.2	-13.69	PK
Horizontal	11490.002	49.30	-8.79	40.51	54	-13.49	AV
Horizontal	17235.123	55.89	-3.18	52.71	68.2	-15.49	PK
Horizontal	17235.123	44.22	-3.18	41.04	54	-12.96	AV
Middle Channel (5785 MHz)-Above 1G							
Vertical	4592.058	71.34	-20.42	50.93	74	-23.07	PK
Vertical	4592.058	59.54	-20.42	39.13	54	-14.87	AV
Vertical	11570.058	62.89	-8.86	54.03	68.2	-14.17	PK
Vertical	11570.058	49.37	-8.86	40.51	54	-13.49	AV
Vertical	17355.054	56.97	-2.52	54.45	68.2	-13.75	PK
Vertical	17355.054	44.41	-2.52	41.89	54	-12.11	AV
Horizontal	4592.009	71.90	-20.42	51.48	74	-22.52	PK
Horizontal	4592.009	59.30	-20.42	38.88	54	-15.12	AV
Horizontal	11570.157	64.88	-8.86	56.02	68.2	-12.18	PK
Horizontal	11570.157	49.53	-8.86	40.67	54	-13.33	AV
Horizontal	17355.180	57.00	-2.52	54.48	68.2	-13.72	PK
Horizontal	17355.180	44.31	-2.52	41.79	54	-12.21	AV
High Channel (5825 MHz)-Above 1G							
Vertical	6039.028	74.39	-18.93	55.46	68.2	-12.74	PK
Vertical	6039.028	59.19	-18.93	40.25	54	-13.75	AV
Vertical	11650.082	62.18	-8.92	53.26	74	-20.74	PK
Vertical	11650.082	49.91	-8.92	40.99	54	-13.01	AV
Vertical	17475.197	55.13	-1.86	53.27	68.2	-14.93	PK
Vertical	17475.197	44.99	-1.86	43.13	54	-10.87	AV
Horizontal	6039.048	74.03	-18.93	55.10	68.2	-13.10	PK
Horizontal	6039.048	59.28	-18.93	40.35	54	-13.65	AV
Horizontal	11650.126	63.64	-8.92	54.72	74	-19.28	PK
Horizontal	11650.126	49.27	-8.92	40.35	54	-13.65	AV
Horizontal	17475.070	56.06	-1.86	54.20	68.2	-14.00	PK
Horizontal	17475.070	44.88	-1.86	43.02	54	-10.98	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode:	TX (5.8G) --802.11n-HT20
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5745 MHz)-Above 1G							
Vertical	4679.109	71.37	-20.24	51.13	74	-22.87	PK
Vertical	4679.109	59.25	-20.24	39.01	54	-14.99	AV
Vertical	11490.106	62.38	-8.79	53.59	68.2	-14.61	PK
Vertical	11490.106	49.42	-8.79	40.63	54	-13.37	AV
Vertical	17235.154	58.73	-3.18	55.55	68.2	-12.65	PK
Vertical	17235.154	44.57	-3.18	41.39	54	-12.61	AV
Horizontal	4679.095	74.21	-20.24	53.97	74	-20.03	PK
Horizontal	4679.095	59.15	-20.24	38.91	54	-15.09	AV
Horizontal	11490.196	63.63	-8.79	54.84	68.2	-13.36	PK
Horizontal	11490.196	49.33	-8.79	40.54	54	-13.46	AV
Horizontal	17235.154	58.21	-3.18	55.03	68.2	-13.17	PK
Horizontal	17235.154	44.90	-3.18	41.72	54	-12.28	AV
Middle Channel (5785 MHz)-Above 1G							
Vertical	4592.132	74.41	-20.42	54.00	74	-20.00	PK
Vertical	4592.132	59.48	-20.42	39.06	54	-14.94	AV
Vertical	11570.087	61.60	-8.86	52.74	68.2	-15.46	PK
Vertical	11570.087	49.01	-8.86	40.15	54	-13.85	AV
Vertical	17355.031	55.63	-2.52	53.11	68.2	-15.09	PK
Vertical	17355.031	44.87	-2.52	42.35	54	-11.65	AV
Horizontal	4592.127	72.63	-20.42	52.22	74	-21.78	PK
Horizontal	4592.127	59.57	-20.42	39.16	54	-14.84	AV
Horizontal	11570.182	62.19	-8.86	53.33	68.2	-14.87	PK
Horizontal	11570.182	49.47	-8.86	40.61	54	-13.39	AV
Horizontal	17355.088	59.60	-2.52	57.08	68.2	-11.12	PK
Horizontal	17355.088	44.04	-2.52	41.52	54	-12.48	AV
High Channel (5825 MHz)-Above 1G							
Vertical	6039.028	70.33	-18.93	51.40	68.2	-16.80	PK
Vertical	6039.028	59.41	-18.93	40.47	54	-13.53	AV
Vertical	11650.172	61.11	-8.92	52.19	74	-21.81	PK
Vertical	11650.172	49.11	-8.92	40.19	54	-13.81	AV
Vertical	17475.021	56.12	-1.86	54.26	68.2	-13.94	PK
Vertical	17475.021	44.03	-1.86	42.17	54	-11.83	AV
Horizontal	6039.147	72.10	-18.93	53.16	68.2	-15.04	PK
Horizontal	6039.147	59.62	-18.93	40.69	54	-13.31	AV
Horizontal	11650.081	64.03	-8.92	55.11	74	-18.89	PK
Horizontal	11650.081	49.14	-8.92	40.22	54	-13.78	AV
Horizontal	17475.041	59.25	-1.86	57.39	68.2	-10.81	PK
Horizontal	17475.041	44.66	-1.86	42.80	54	-11.20	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode:	TX (5.8G) -- 802.11n-HT40
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5755 MHz)-Above 1G							
Vertical	4679.126	72.17	-20.24	51.93	74	-22.07	PK
Vertical	4679.126	59.17	-20.24	38.92	54	-15.08	AV
Vertical	11510.093	63.88	-8.81	55.07	74	-18.93	PK
Vertical	11510.093	49.02	-8.81	40.21	54	-13.79	AV
Vertical	17265.001	57.60	-3.01	54.59	68.2	-13.61	PK
Vertical	17265.001	44.65	-3.01	41.64	54	-12.36	AV
Horizontal	4679.072	74.73	-20.24	54.49	74	-19.51	PK
Horizontal	4679.072	59.19	-20.24	38.95	54	-15.05	AV
Horizontal	11510.186	60.79	-8.81	51.98	74	-22.02	PK
Horizontal	11510.186	49.27	-8.81	40.46	54	-13.54	AV
Horizontal	17265.027	58.07	-3.01	55.06	68.2	-13.14	PK
Horizontal	17265.027	44.54	-3.01	41.53	54	-12.47	AV
Middle Channel (5795 MHz)-Above 1G							
Vertical	6039.116	72.97	-18.93	54.04	68.2	-14.16	PK
Vertical	6039.116	59.08	-18.93	40.15	54	-13.85	AV
Vertical	11590.003	64.88	-8.87	56.01	74	-17.99	PK
Vertical	11590.003	49.68	-8.87	40.81	54	-13.19	AV
Vertical	17385.113	58.88	-2.35	56.53	68.2	-11.67	PK
Vertical	17385.113	44.52	-2.35	42.17	54	-11.83	AV
Horizontal	6039.043	73.47	-18.93	54.54	68.2	-13.66	PK
Horizontal	6039.043	59.96	-18.93	41.02	54	-12.98	AV
Horizontal	11590.183	63.45	-8.87	54.58	74	-19.42	PK
Horizontal	11590.183	49.01	-8.87	40.14	54	-13.86	AV
Horizontal	17385.007	57.09	-2.35	54.74	68.2	-13.46	PK
Horizontal	17385.007	44.11	-2.35	41.76	54	-12.24	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode:	TX (5.8G) --802.11ac-HT20
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5745 MHz)-Above 1G							
Vertical	4679.197	74.54	-20.24	54.29	74	-19.71	PK
Vertical	4679.197	59.83	-20.24	39.59	54	-14.41	AV
Vertical	11490.033	64.62	-8.79	55.83	68.2	-12.37	PK
Vertical	11490.033	49.95	-8.79	41.16	54	-12.84	AV
Vertical	17235.045	55.49	-3.18	52.31	68.2	-15.89	PK
Vertical	17235.045	44.77	-3.18	41.59	54	-12.41	AV
Horizontal	4679.182	70.98	-20.24	50.74	74	-23.26	PK
Horizontal	4679.182	59.32	-20.24	39.08	54	-14.92	AV
Horizontal	11490.046	63.16	-8.79	54.37	68.2	-13.83	PK
Horizontal	11490.046	49.87	-8.79	41.08	54	-12.92	AV
Horizontal	17235.162	55.23	-3.18	52.05	68.2	-16.15	PK
Horizontal	17235.162	44.20	-3.18	41.02	54	-12.98	AV
Middle Channel (5785 MHz)-Above 1G							
Vertical	4592.026	74.41	-20.42	53.99	74	-20.01	PK
Vertical	4592.026	59.06	-20.42	38.64	54	-15.36	AV
Vertical	11570.047	64.05	-8.86	55.19	68.2	-13.01	PK
Vertical	11570.047	49.28	-8.86	40.42	54	-13.58	AV
Vertical	17355.099	57.68	-2.52	55.16	68.2	-13.04	PK
Vertical	17355.099	44.27	-2.52	41.75	54	-12.25	AV
Horizontal	4592.028	74.48	-20.42	54.07	74	-19.93	PK
Horizontal	4592.028	59.68	-20.42	39.26	54	-14.74	AV
Horizontal	11570.184	61.28	-8.86	52.42	68.2	-15.78	PK
Horizontal	11570.184	49.97	-8.86	41.11	54	-12.89	AV
Horizontal	17355.094	56.30	-2.52	53.78	68.2	-14.42	PK
Horizontal	17355.094	44.21	-2.52	41.69	54	-12.31	AV
High Channel (5825 MHz)-Above 1G							
Vertical	6039.175	72.87	-18.93	53.94	68.2	-14.26	PK
Vertical	6039.175	59.72	-18.93	40.78	54	-13.22	AV
Vertical	11650.040	60.24	-8.92	51.32	74	-22.68	PK
Vertical	11650.040	49.74	-8.92	40.82	54	-13.18	AV
Vertical	17475.082	55.75	-1.86	53.89	68.2	-14.31	PK
Vertical	17475.082	44.88	-1.86	43.02	54	-10.98	AV
Horizontal	6039.086	73.73	-18.93	54.80	68.2	-13.40	PK
Horizontal	6039.086	59.36	-18.93	40.42	54	-13.58	AV
Horizontal	11650.083	62.08	-8.92	53.16	74	-20.84	PK
Horizontal	11650.083	49.74	-8.92	40.82	54	-13.18	AV
Horizontal	17475.151	59.89	-1.86	58.03	68.2	-10.17	PK
Horizontal	17475.151	44.95	-1.86	43.09	54	-10.91	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode :	TX (5.8G) -- 802.11ac-HT40
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5755 MHz)-Above 1G							
Vertical	4679.124	71.16	-20.24	50.92	74	-23.08	PK
Vertical	4679.124	59.07	-20.24	38.83	54	-15.17	AV
Vertical	11510.037	61.93	-8.81	53.12	74	-20.88	PK
Vertical	11510.037	49.20	-8.81	40.39	54	-13.61	AV
Vertical	17265.003	56.24	-3.01	53.23	68.2	-14.97	PK
Vertical	17265.003	44.40	-3.01	41.39	54	-12.61	AV
Horizontal	4679.121	73.59	-20.24	53.35	74	-20.65	PK
Horizontal	4679.121	59.79	-20.24	39.55	54	-14.45	AV
Horizontal	11510.175	61.88	-8.81	53.07	74	-20.93	PK
Horizontal	11510.175	49.19	-8.81	40.38	54	-13.62	AV
Horizontal	17265.137	59.62	-3.01	56.61	68.2	-11.59	PK
Horizontal	17265.137	44.48	-3.01	41.47	54	-12.53	AV
Middle Channel (5795 MHz)-Above 1G							
Vertical	6039.175	74.61	-18.93	55.68	68.2	-12.52	PK
Vertical	6039.175	59.22	-18.93	40.29	54	-13.71	AV
Vertical	11590.124	64.45	-8.87	55.58	74	-18.42	PK
Vertical	11590.124	49.89	-8.87	41.02	54	-12.98	AV
Vertical	17385.142	57.10	-2.35	54.75	68.2	-13.45	PK
Vertical	17385.142	44.88	-2.35	42.53	54	-11.47	AV
Horizontal	6039.078	73.21	-18.93	54.28	68.2	-13.92	PK
Horizontal	6039.078	59.19	-18.93	40.25	54	-13.75	AV
Horizontal	11590.003	63.97	-8.87	55.10	74	-18.90	PK
Horizontal	11590.003	49.05	-8.87	40.18	54	-13.82	AV
Horizontal	17385.018	55.66	-2.35	53.31	68.2	-14.89	PK
Horizontal	17385.018	44.53	-2.35	42.18	54	-11.82	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode:	TX (5.8G) --802.11ax-HT20
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5745 MHz)-Above 1G							
Vertical	4679.046	70.99	-20.24	50.75	74	-23.25	PK
Vertical	4679.046	59.57	-20.24	39.33	54	-14.67	AV
Vertical	11490.090	64.28	-8.79	55.49	68.2	-12.71	PK
Vertical	11490.090	49.19	-8.79	40.40	54	-13.60	AV
Vertical	17235.134	59.85	-3.18	56.67	68.2	-11.53	PK
Vertical	17235.134	44.45	-3.18	41.27	54	-12.73	AV
Horizontal	4679.068	72.02	-20.24	51.78	74	-22.22	PK
Horizontal	4679.068	59.98	-20.24	39.73	54	-14.27	AV
Horizontal	11490.087	62.71	-8.79	53.92	68.2	-14.28	PK
Horizontal	11490.087	49.68	-8.79	40.89	54	-13.11	AV
Horizontal	17235.177	58.08	-3.18	54.90	68.2	-13.30	PK
Horizontal	17235.177	44.24	-3.18	41.06	54	-12.94	AV
Middle Channel (5785 MHz)-Above 1G							
Vertical	4592.169	72.10	-20.42	51.68	74	-22.32	PK
Vertical	4592.169	59.79	-20.42	39.37	54	-14.63	AV
Vertical	11570.094	63.08	-8.86	54.22	68.2	-13.98	PK
Vertical	11570.094	49.70	-8.86	40.84	54	-13.16	AV
Vertical	17355.021	57.59	-2.52	55.07	68.2	-13.13	PK
Vertical	17355.021	44.56	-2.52	42.04	54	-11.96	AV
Horizontal	4592.148	72.68	-20.42	52.27	74	-21.73	PK
Horizontal	4592.148	59.65	-20.42	39.23	54	-14.77	AV
Horizontal	11570.136	62.99	-8.86	54.13	68.2	-14.07	PK
Horizontal	11570.136	49.66	-8.86	40.80	54	-13.20	AV
Horizontal	17355.052	58.41	-2.52	55.89	68.2	-12.31	PK
Horizontal	17355.052	44.93	-2.52	42.41	54	-11.59	AV
High Channel (5825 MHz)-Above 1G							
Vertical	6039.180	70.01	-18.93	51.08	68.2	-17.12	PK
Vertical	6039.180	59.57	-18.93	40.64	54	-13.36	AV
Vertical	11650.113	64.56	-8.92	55.64	74	-18.36	PK
Vertical	11650.113	49.27	-8.92	40.35	54	-13.65	AV
Vertical	17475.167	57.61	-1.86	55.75	68.2	-12.45	PK
Vertical	17475.167	44.01	-1.86	42.15	54	-11.85	AV
Horizontal	6039.149	74.80	-18.93	55.86	68.2	-12.34	PK
Horizontal	6039.149	59.78	-18.93	40.84	54	-13.16	AV
Horizontal	11650.084	63.71	-8.92	54.79	74	-19.21	PK
Horizontal	11650.084	49.16	-8.92	40.24	54	-13.76	AV
Horizontal	17475.054	56.04	-1.86	54.18	68.2	-14.02	PK
Horizontal	17475.054	44.98	-1.86	43.12	54	-10.88	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

Test Mode :	TX (5.8G) -- 802.11ax-HT40
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Polar	Frequency	Reading Level	Correct Factor	Measure-ment	Limits	Over	Detector Type
(H/V)	(MHz)	(dBuV/m)	(dB)	(dBuV/m)	(dBuV/m)	(dB)	
Low Channel (5755 MHz)-Above 1G							
Vertical	4679.120	71.59	-20.24	51.35	74	-22.65	PK
Vertical	4679.120	59.18	-20.24	38.94	54	-15.06	AV
Vertical	11510.031	62.25	-8.81	53.44	74	-20.56	PK
Vertical	11510.031	49.98	-8.81	41.17	54	-12.83	AV
Vertical	17265.184	57.45	-3.01	54.44	68.2	-13.76	PK
Vertical	17265.184	44.75	-3.01	41.74	54	-12.26	AV
Horizontal	4679.067	70.13	-20.24	49.89	74	-24.11	PK
Horizontal	4679.067	59.33	-20.24	39.09	54	-14.91	AV
Horizontal	11510.168	60.60	-8.81	51.79	74	-22.21	PK
Horizontal	11510.168	49.71	-8.81	40.90	54	-13.10	AV
Horizontal	17265.177	58.46	-3.01	55.45	68.2	-12.75	PK
Horizontal	17265.177	44.20	-3.01	41.19	54	-12.81	AV
Middle Channel (5795 MHz)-Above 1G							
Vertical	6039.020	71.78	-18.93	52.85	68.2	-15.35	PK
Vertical	6039.020	59.65	-18.93	40.72	54	-13.28	AV
Vertical	11590.158	64.41	-8.87	55.54	74	-18.46	PK
Vertical	11590.158	49.27	-8.87	40.40	54	-13.60	AV
Vertical	17385.127	57.84	-2.35	55.49	68.2	-12.71	PK
Vertical	17385.127	44.95	-2.35	42.60	54	-11.40	AV
Horizontal	6039.112	74.38	-18.93	55.45	68.2	-12.75	PK
Horizontal	6039.112	59.45	-18.93	40.52	54	-13.48	AV
Horizontal	11590.028	64.34	-8.87	55.47	74	-18.53	PK
Horizontal	11590.028	49.74	-8.87	40.87	54	-13.13	AV
Horizontal	17385.185	55.65	-2.35	53.30	68.2	-14.90	PK
Horizontal	17385.185	44.77	-2.35	42.42	54	-11.58	AV

Note: PK value is lower than the Average value limit, So average didn't record.

The 26.5-40G amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

8. Power Spectral Density Test

8.1 Block Diagram Of Test Setup



8.2 Limit

For the band 5.15-5.25 GHz,

(i) For an outdoor access point operating in the band 5.15-5.25 GHz, the maximum power spectral density shall not exceed 17 dBm in any 1 megahertz band. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi. The maximum e.i.r.p. at any elevation angle above 30 degrees as measured from the horizon must not exceed 125 mW (21 dBm).

(ii) For an indoor access point operating in the band 5.15-5.25 GHz, the maximum power spectral density shall not exceed 17 dBm in any 1 megahertz band. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.

(iii) For fixed point-to-point access points operating in the band 5.15-5.25 GHz, the maximum power spectral density shall not exceed 17 dBm in any 1 megahertz band. Fixed point-to-point U-NII devices may employ antennas with directional gain up to 23 dBi without any corresponding reduction in the maximum conducted output power or maximum power spectral density. For fixed point-to-point transmitters that employ a directional antenna gain greater than 23 dBi, a 1 dB reduction in maximum conducted output power and maximum power spectral density is required for each 1 dB of antenna gain in excess of 23 dBi. Fixed, point-to-point operations exclude the use of point-to-multipoint systems, omnidirectional applications, and multiple collocated transmitters transmitting the same information. The operator of the U-NII device, or if the equipment is professionally installed, the installer, is responsible for ensuring that systems employing high gain directional antennas are used exclusively for fixed, point-to-point operations.

(iv) For client devices in the 5.15-5.25 GHz band, the maximum power spectral density shall not exceed 11 dBm in any 1 megahertz band. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.

For the band 5.725-5.85 GHz

(3) For the band 5.725-5.85 GHz, the maximum power spectral density shall not exceed 30 dBm in any 500-kHz band. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.

8.3 Test Procedure

For devices operating in the bands 5.15-5.25 GHz, 5.25-5.35 GHz, and 5.47-5.725 GHz, the above procedures make use of 1 MHz RBW to satisfy directly the 1 MHz reference bandwidth specified in § 15.407(a)(5). For devices operating in the band 5.725-5.85 GHz, the rules specify a measurement bandwidth of 500 kHz. Many spectrum analyzers do not have 500 kHz RBW, thus a narrower RBW may need to be used. The rules permit the use of a RBWs less than 1 MHz, or 500 kHz, "provided that the measured power is integrated over the full reference bandwidth" to show the total power over the specified measurement bandwidth (i.e., 1 MHz, or 500 kHz). If measurements are performed using a reduced resolution bandwidth (< 1 MHz, or < 500 kHz) and integrated over 1 MHz, or 500 KHz bandwidth, the following adjustments to the procedures apply:

- a) Set RBW $\geq 1/T$, where T is defined in section II.B.I.a).
- b) Set VBW ≥ 3 RBW.
- c) If measurement bandwidth of Maximum PSD is specified in 500 kHz, add $10\log(500\text{kHz}/\text{RBW})$ to the measured result, whereas RBW (< 500 KHz) is the reduced resolution bandwidth of the spectrum analyzer set during measurement.
- d) If measurement bandwidth of Maximum PSD is specified in 1 MHz, add $10\log(1\text{MHz}/\text{RBW})$ to the measured result, whereas RBW (< 1 MHz) is the reduced resolution bandwidth of spectrum analyzer set during measurement.
- e) Care must be taken to ensure that the measurements are performed during a period of continuous transmission or are corrected upward for duty cycle.

Note: As a practical matter, it is recommended to use reduced RBW of 100 kHz for the sections 5.c) and 5.d) above, since RBW=100 KHZ is available on nearly all spectrum analyzers.

8.4 EUT Operating Conditions

The EUT was configured for testing in a typical fashion (as a customer would normally use it). The EUT has been programmed to continuously transmit during test. This operating condition was tested and used to collect the included data.

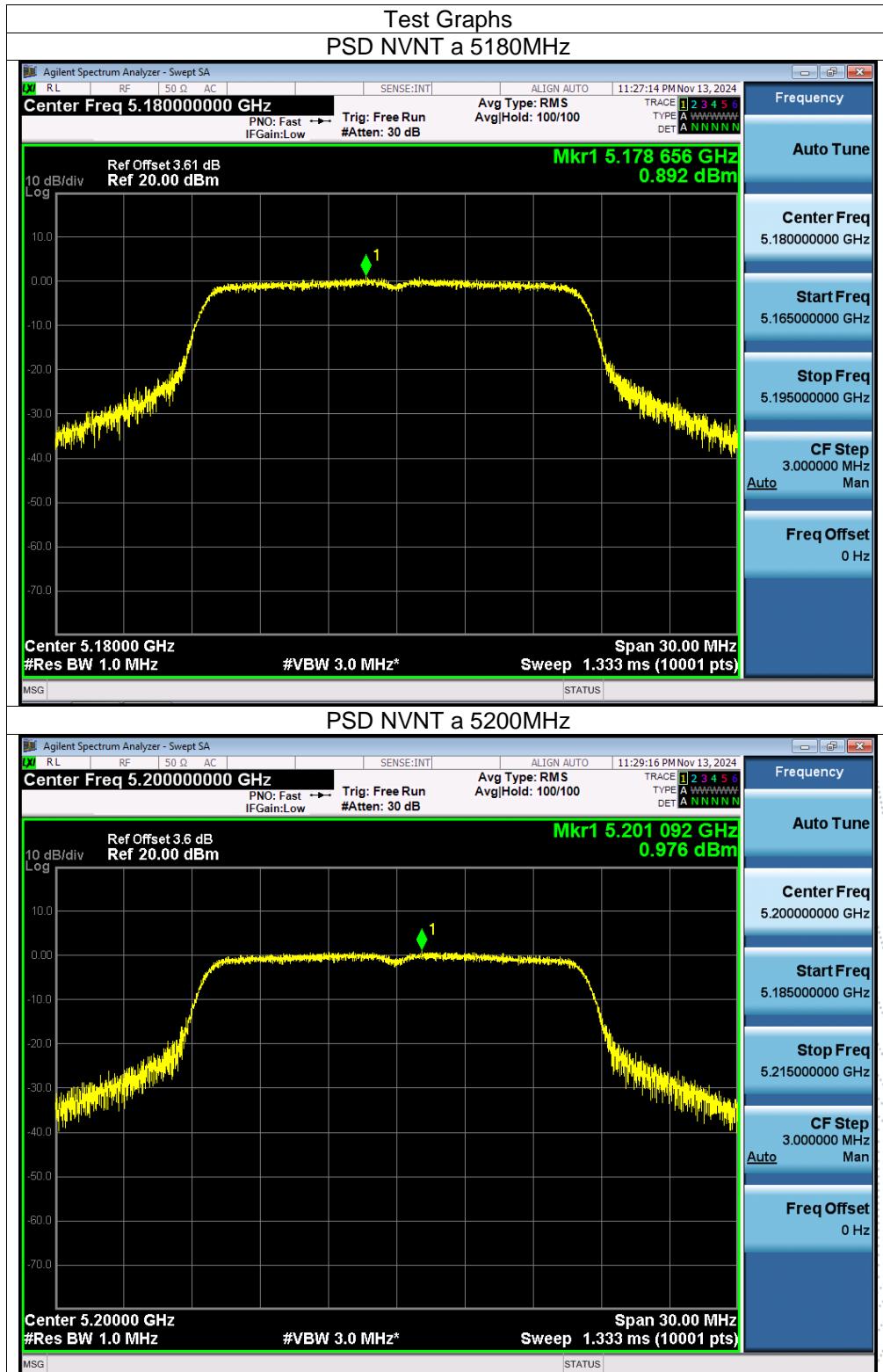
8.5 Test Result

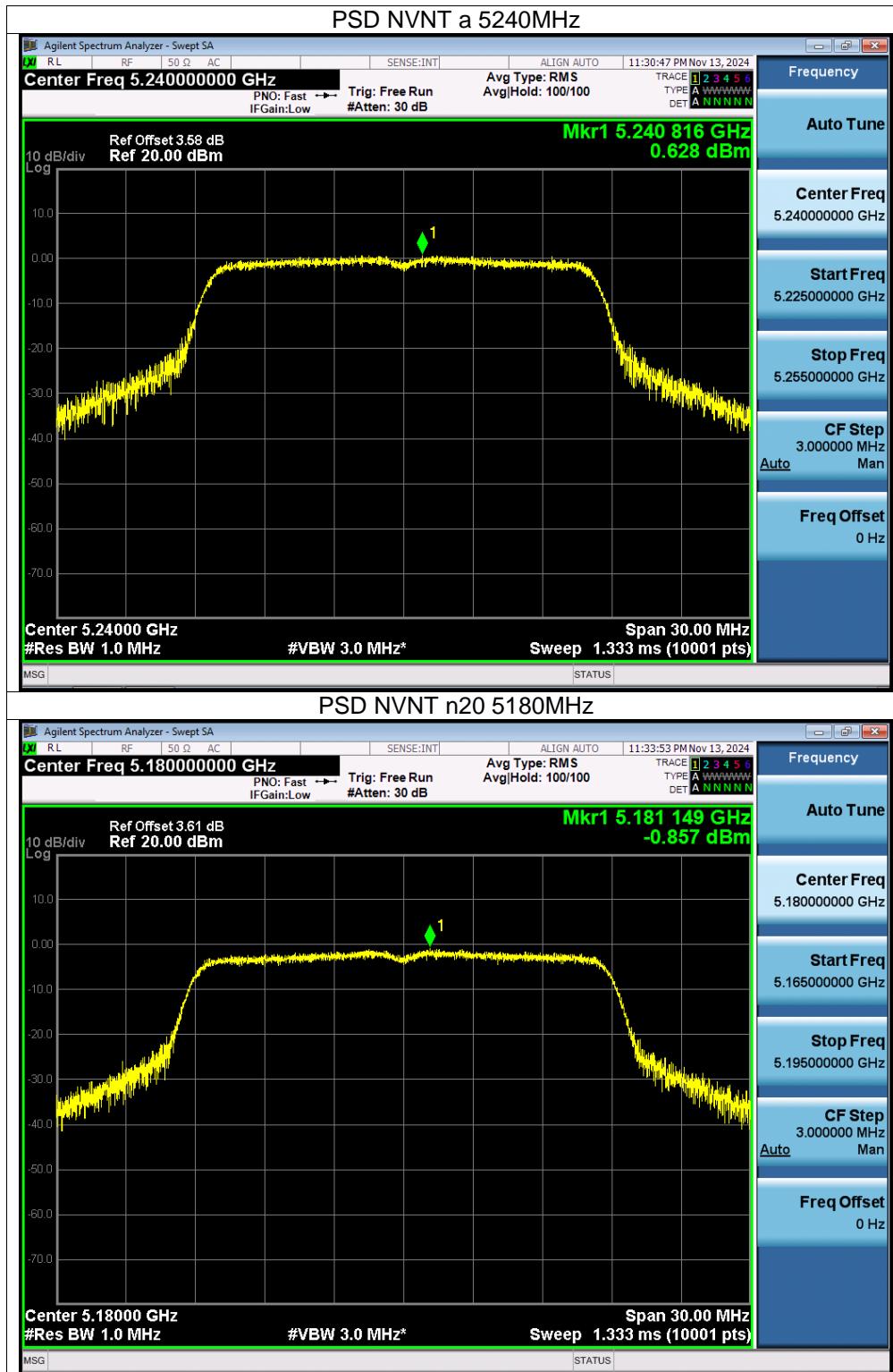
Temperature:	26 °C	Relative Humidity:	54%
Pressure:	101kPa	Test Voltage:	DC 3.8V
Test Mode:	(5180-5240MHz); (5745-5825MHz)		

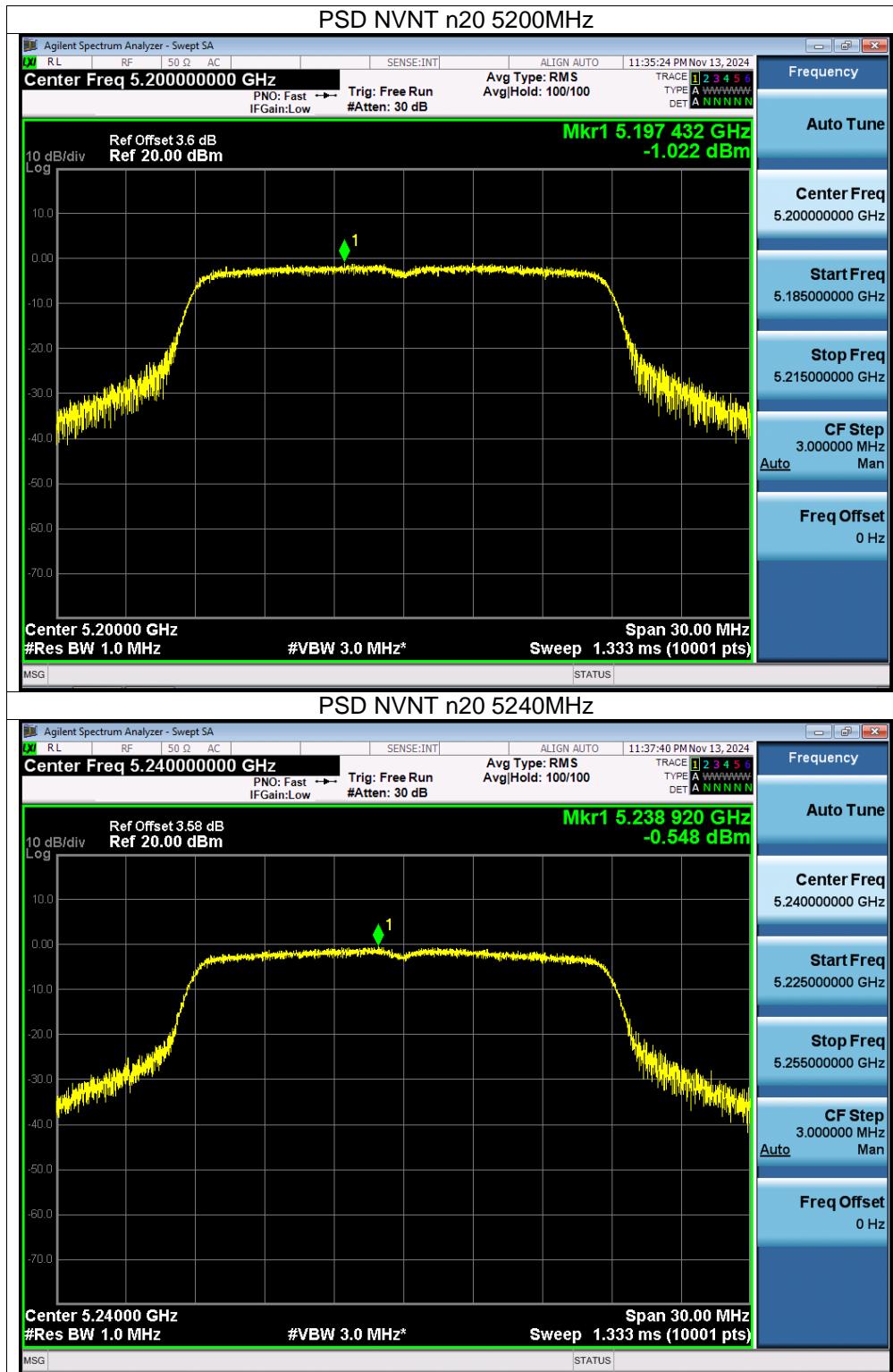
Condition	Mode	Frequency (MHz)	Conducted PSD (dBm/1MHz)	Limit (dBm/1MHz)	Verdict
NVNT	a	5180	0.89	11	Pass
NVNT	a	5200	0.98	11	Pass
NVNT	a	5240	0.63	11	Pass
NVNT	n20	5180	-0.86	11	Pass
NVNT	n20	5200	-1.02	11	Pass
NVNT	n20	5240	-0.55	11	Pass
NVNT	n40	5190	-6.51	11	Pass
NVNT	n40	5230	-6.03	11	Pass
NVNT	ac20	5180	-0.88	11	Pass
NVNT	ac20	5200	-0.7	11	Pass
NVNT	ac20	5240	-0.92	11	Pass
NVNT	ac40	5190	-6.31	11	Pass
NVNT	ac40	5230	-6.13	11	Pass
NVNT	ax20	5180	-1.96	11	Pass
NVNT	ax20	5200	-1.18	11	Pass
NVNT	ax20	5240	-0.71	11	Pass
NVNT	ax40	5190	-6.54	11	Pass
NVNT	ax40	5230	-6.28	11	Pass

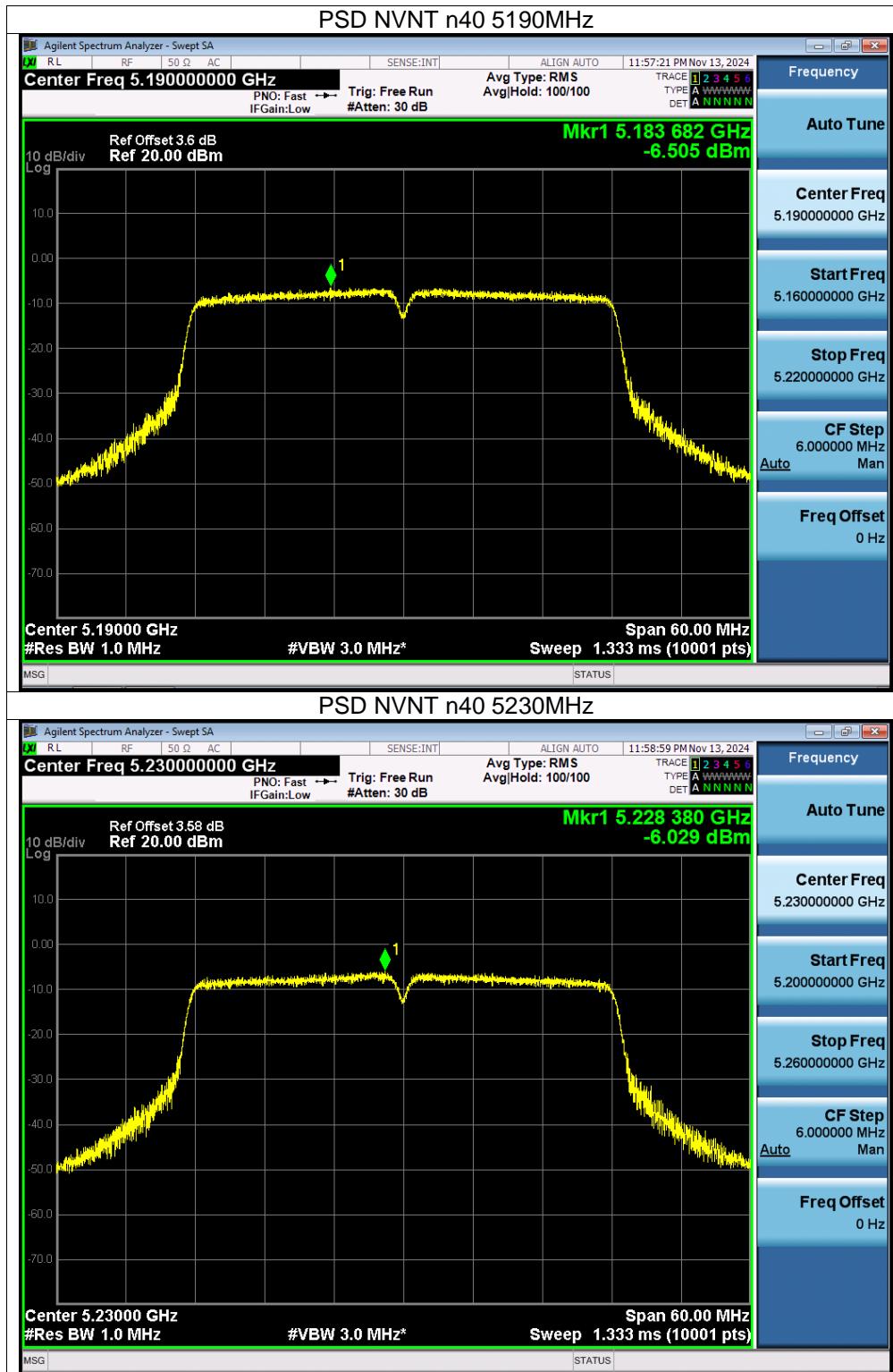
Condition	Mode	Frequency (MHz)	Conducted PSD (dBm/510KHz)	Conducted PSD (dBm/500KHz)	Limit (dBm)	Verdict
NVNT	a	5745	-6.19	-6.276	30	Pass
NVNT	a	5785	-6.44	-6.526	30	Pass
NVNT	a	5825	-7.2	-7.286	30	Pass
NVNT	n20	5745	-7.52	-7.606	30	Pass
NVNT	n20	5785	-7.84	-7.926	30	Pass
NVNT	n20	5825	-8.37	-8.456	30	Pass
NVNT	n40	5755	-11.62	-11.706	30	Pass
NVNT	n40	5795	-12.1	-12.186	30	Pass
NVNT	ac20	5745	-7.44	-7.526	30	Pass
NVNT	ac20	5785	-7.82	-7.906	30	Pass
NVNT	ac20	5825	-8.34	-8.426	30	Pass
NVNT	ac40	5755	-11.56	-11.646	30	Pass
NVNT	ac40	5795	-12.12	-12.206	30	Pass
NVNT	ax20	5745	-7.4	-7.486	30	Pass
NVNT	ax20	5785	-8	-8.086	30	Pass
NVNT	ax20	5825	-8.77	-8.856	30	Pass
NVNT	ax40	5755	-11.68	-11.766	30	Pass
NVNT	ax40	5795	-12.46	-12.546	30	Pass

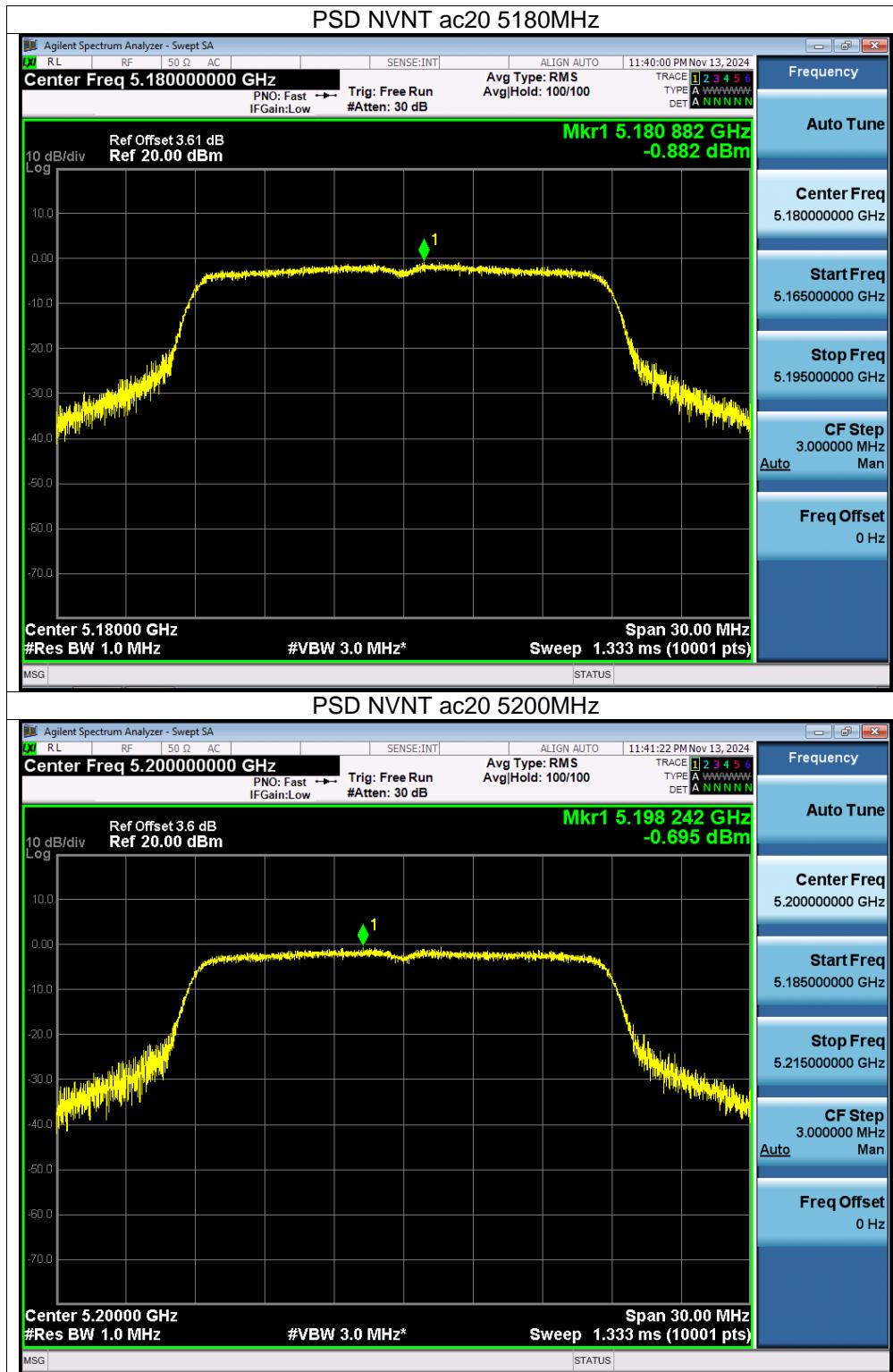
Note: Correction Factor = $10\log(500\text{KHz}/\text{RBW in measurement}) = -0.086$

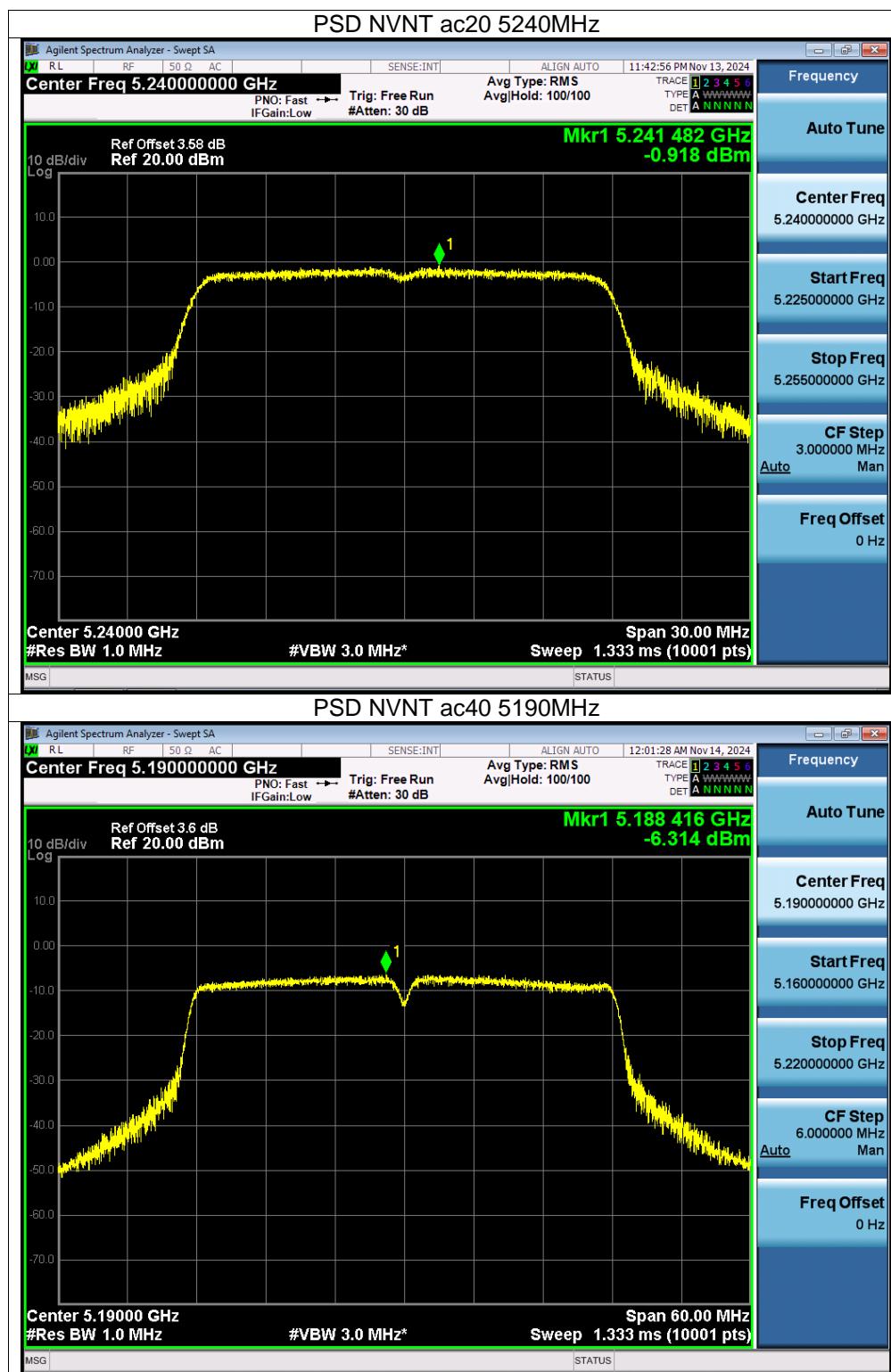


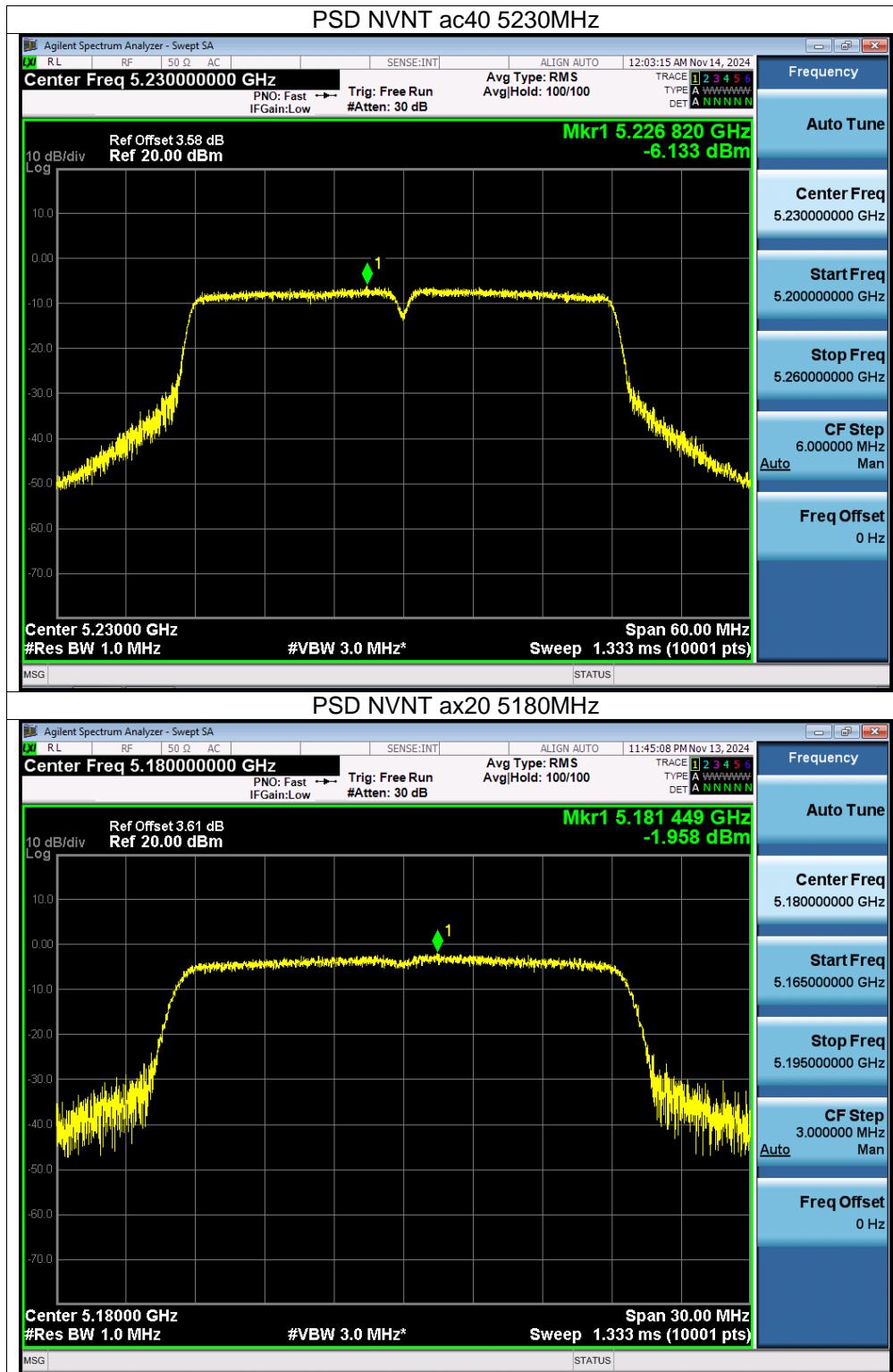


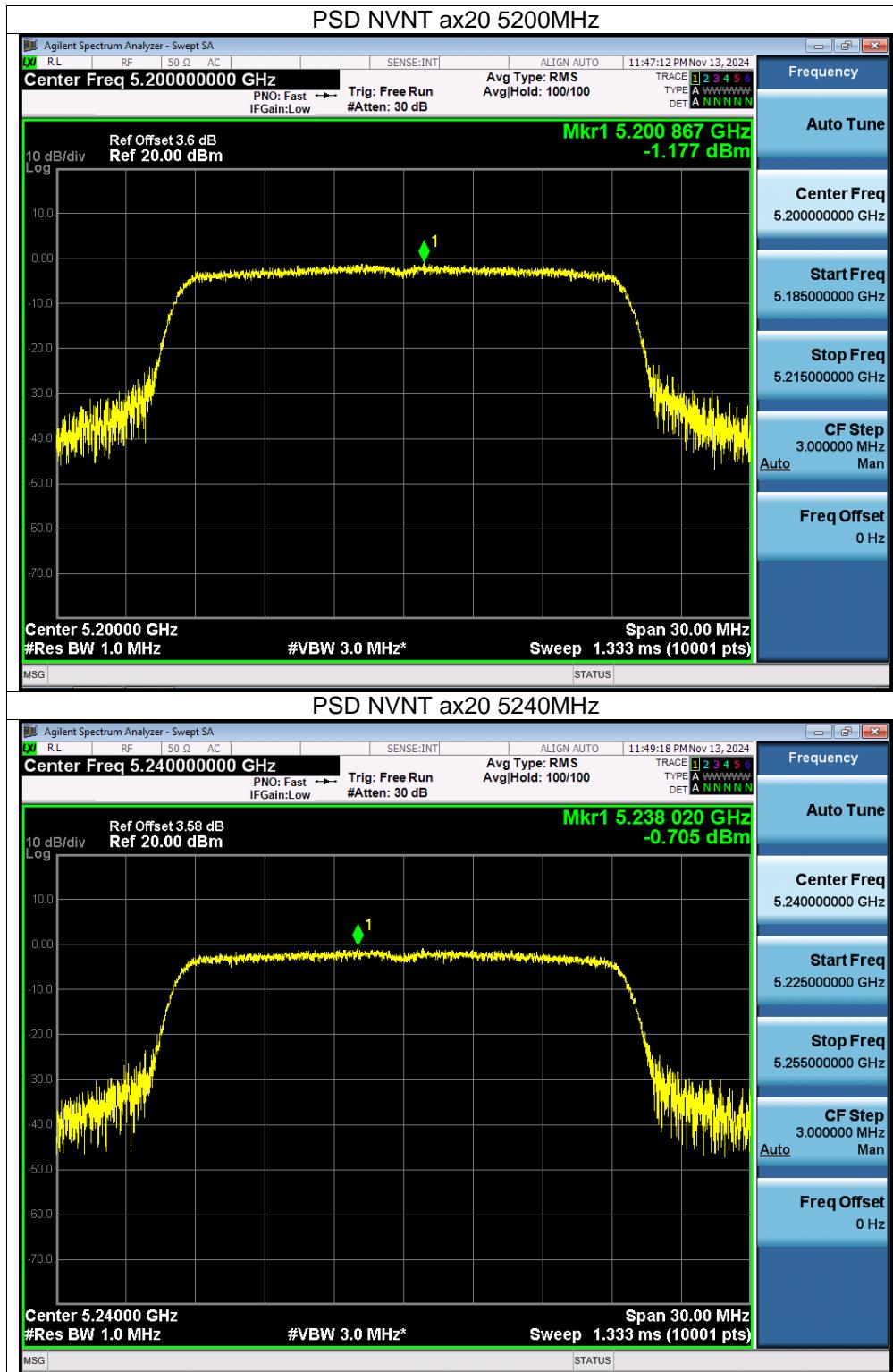


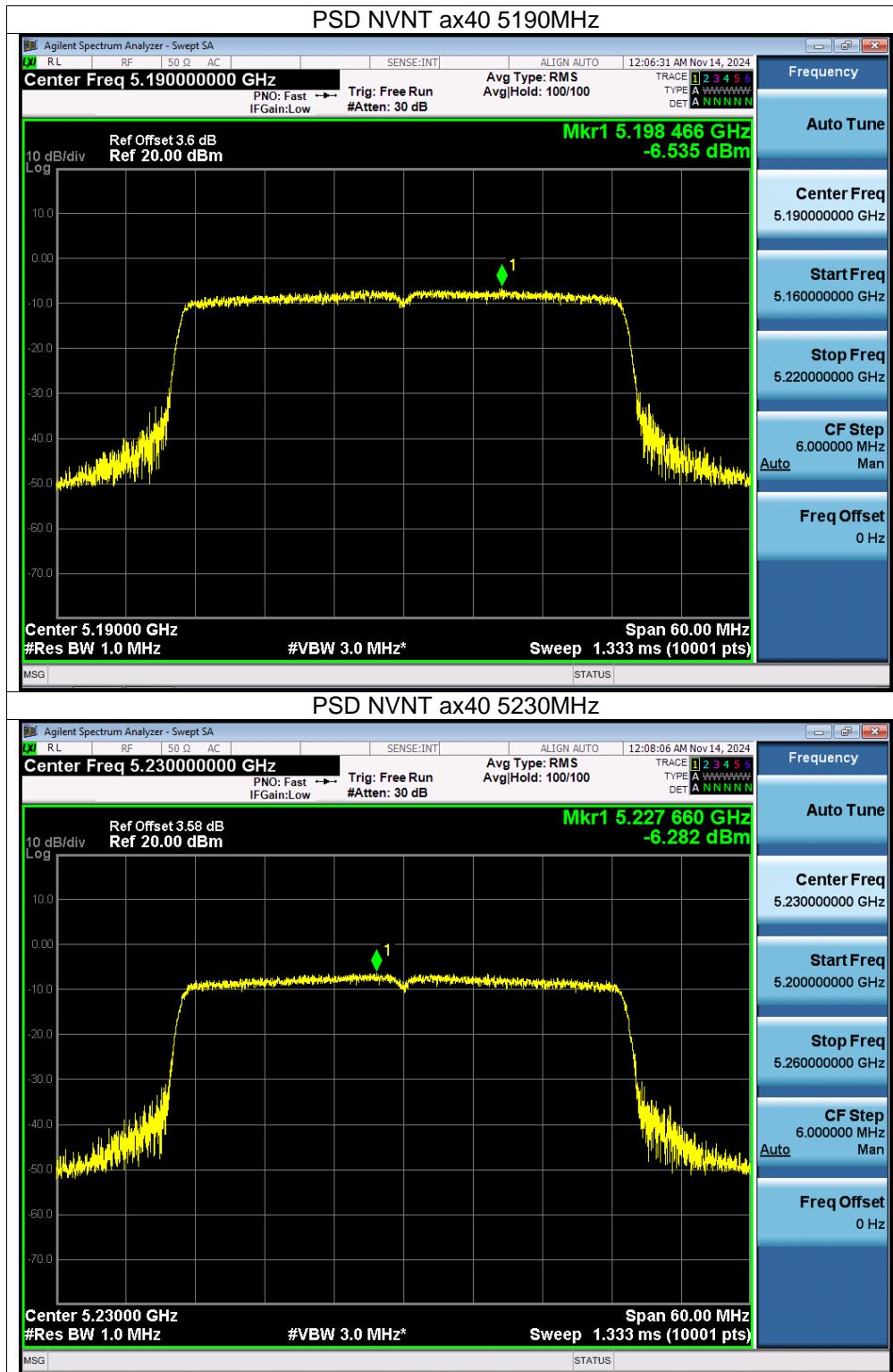


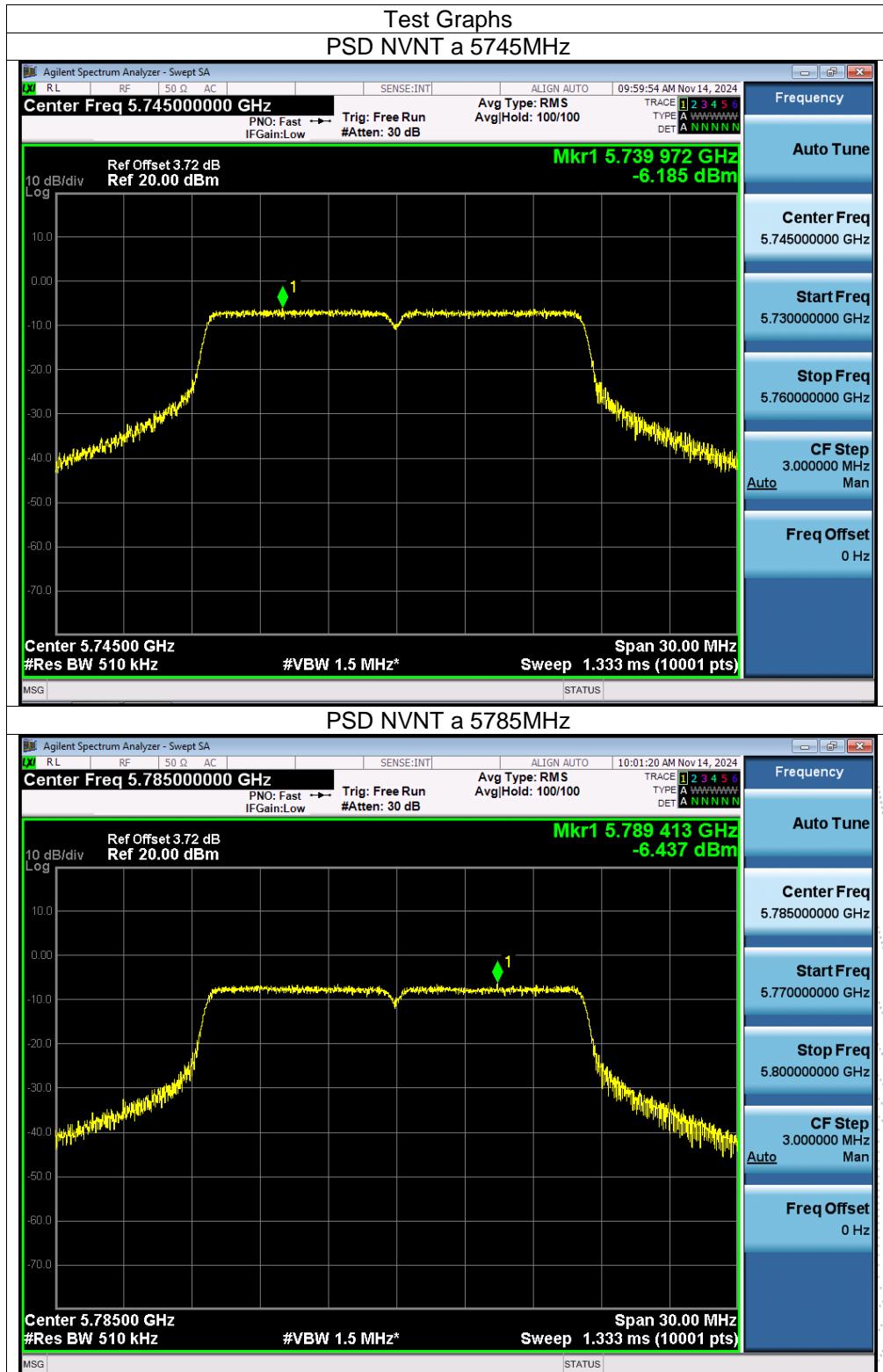


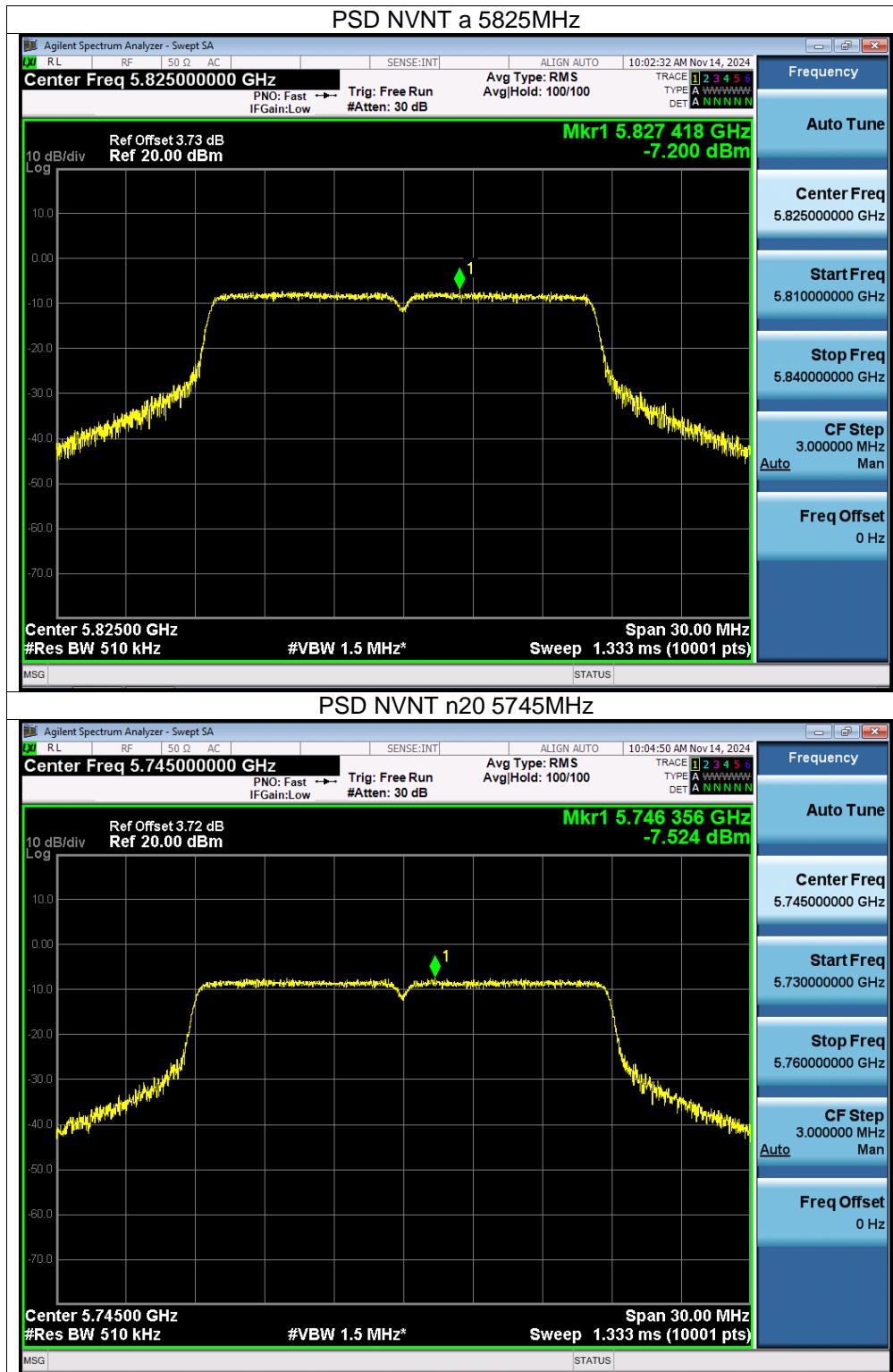


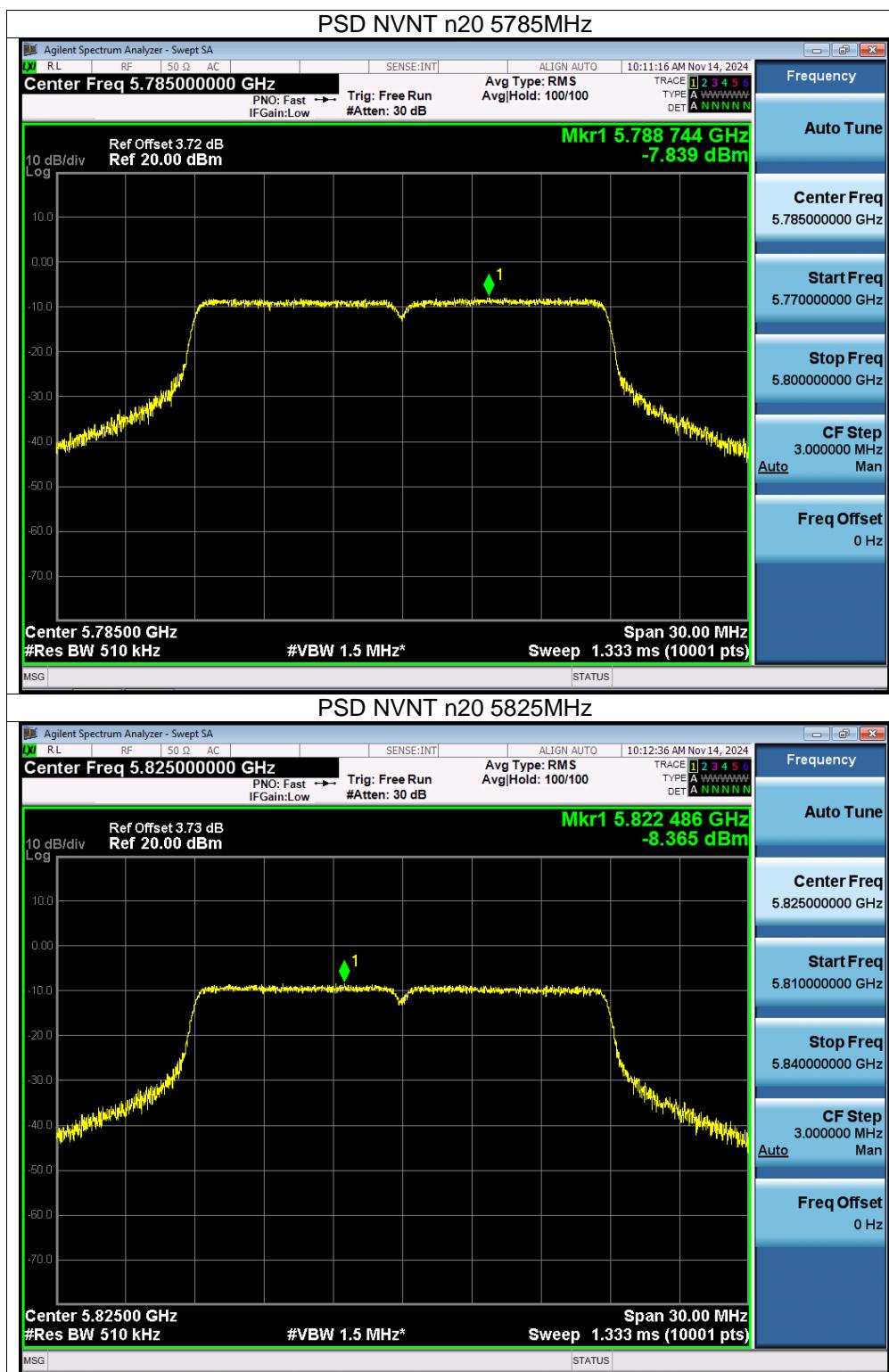


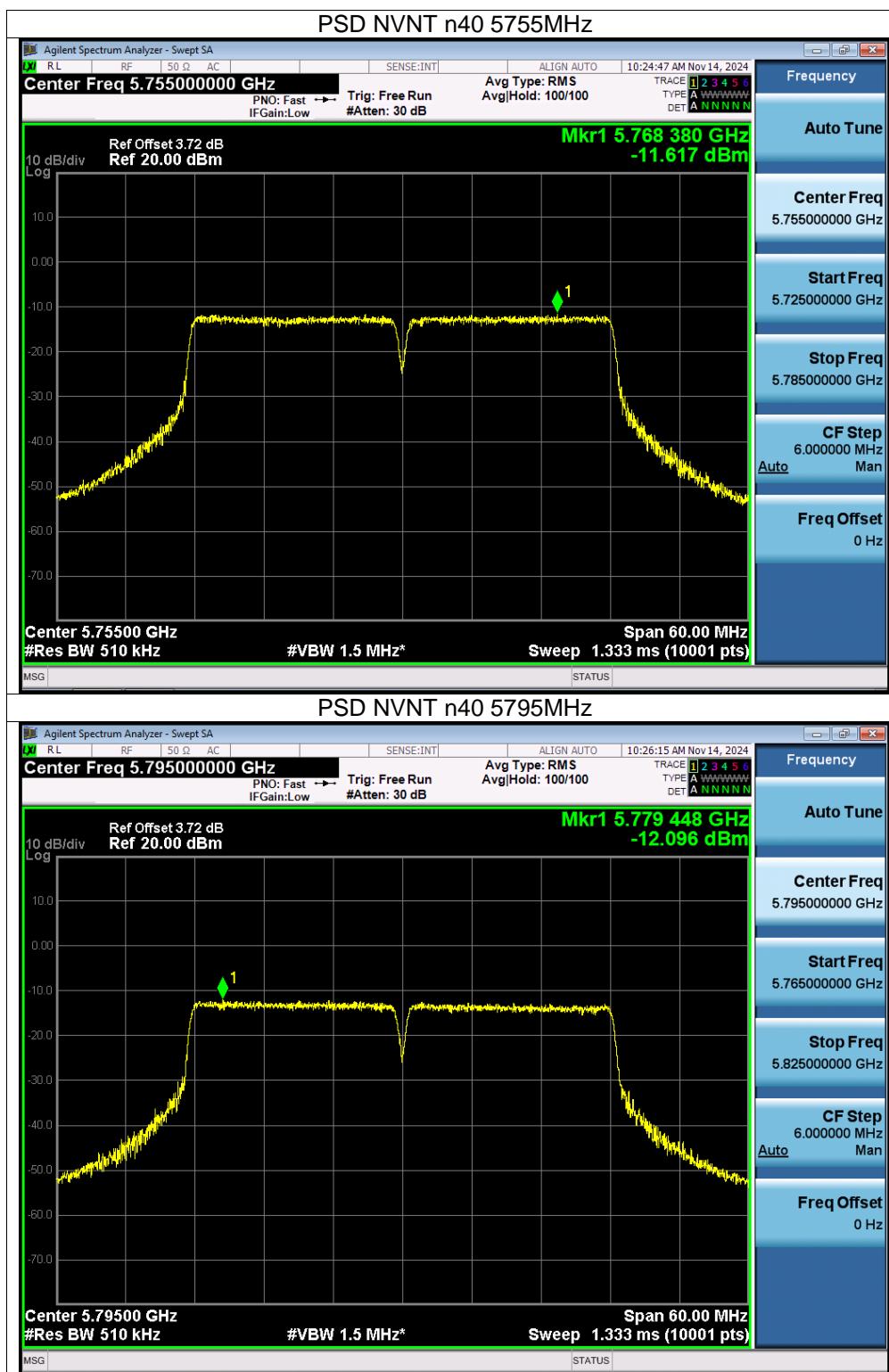


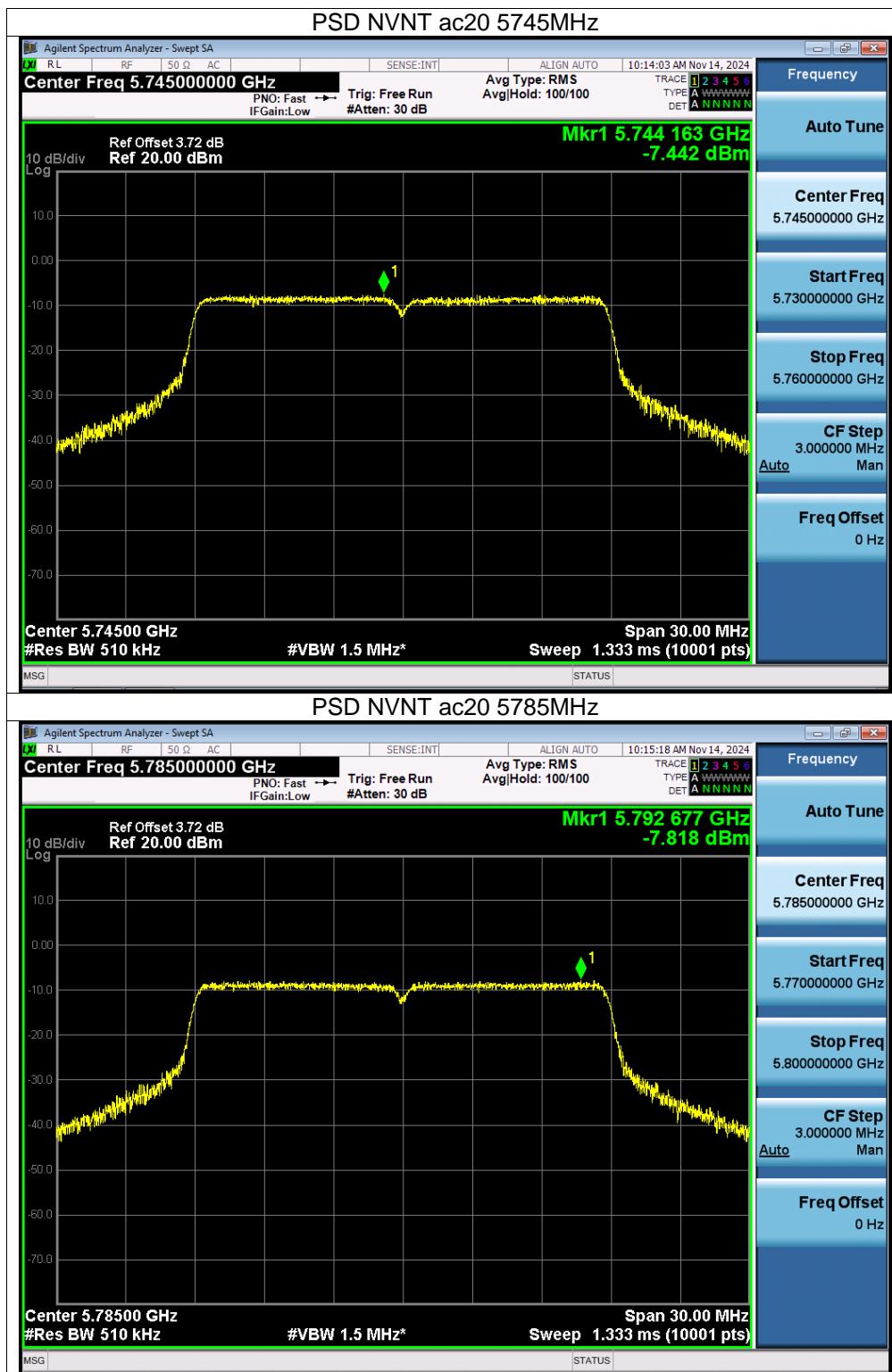


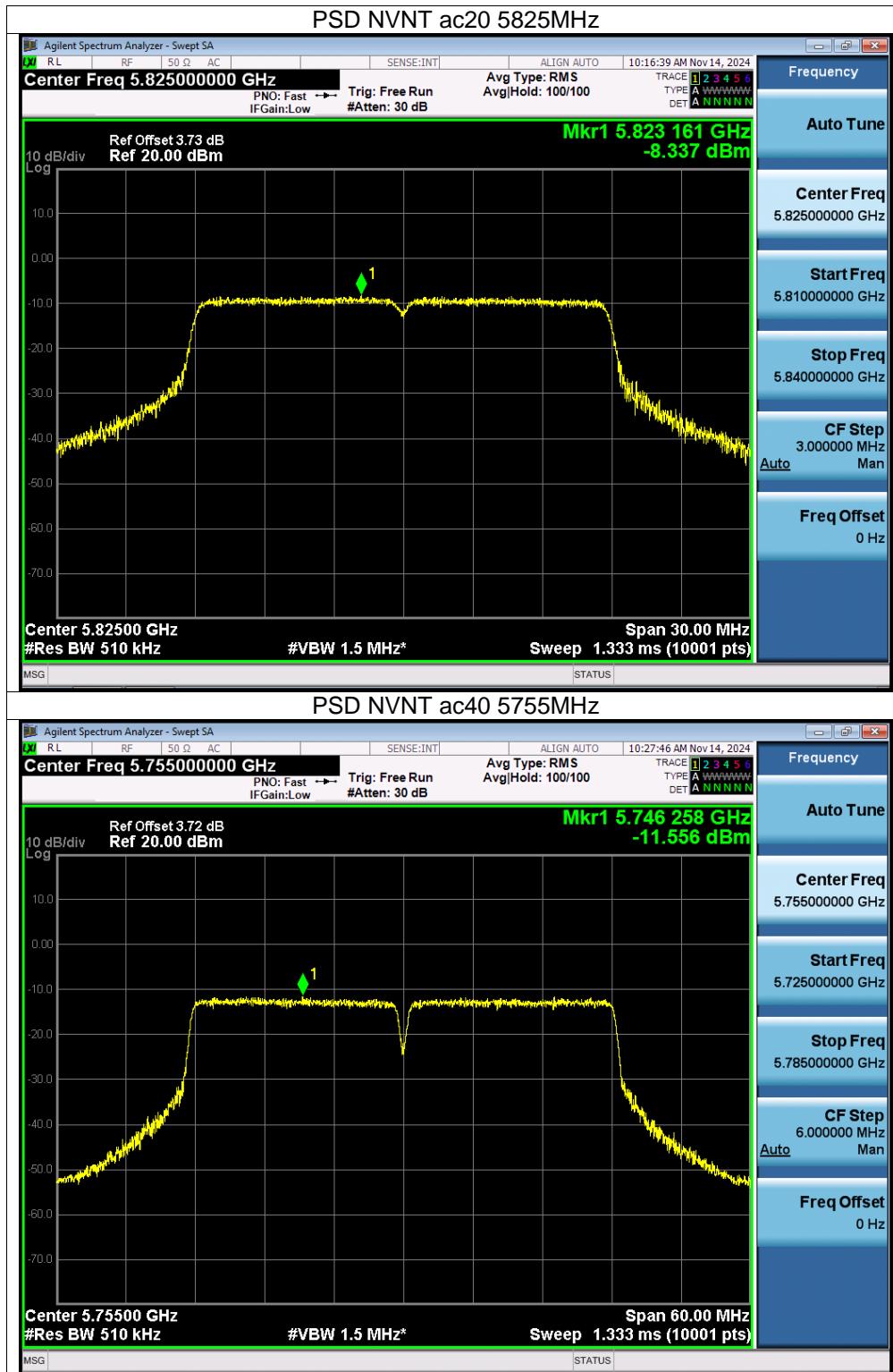


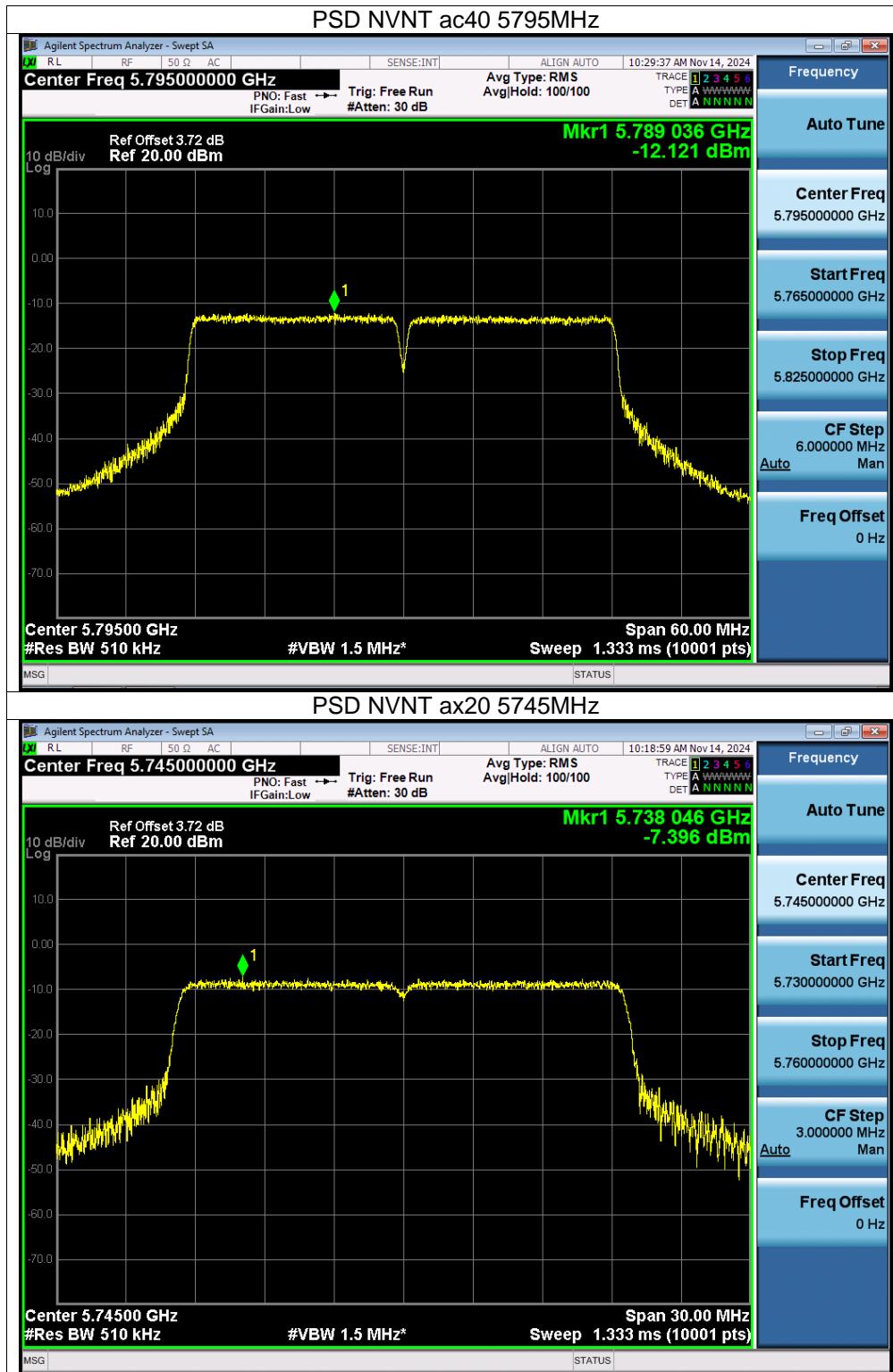


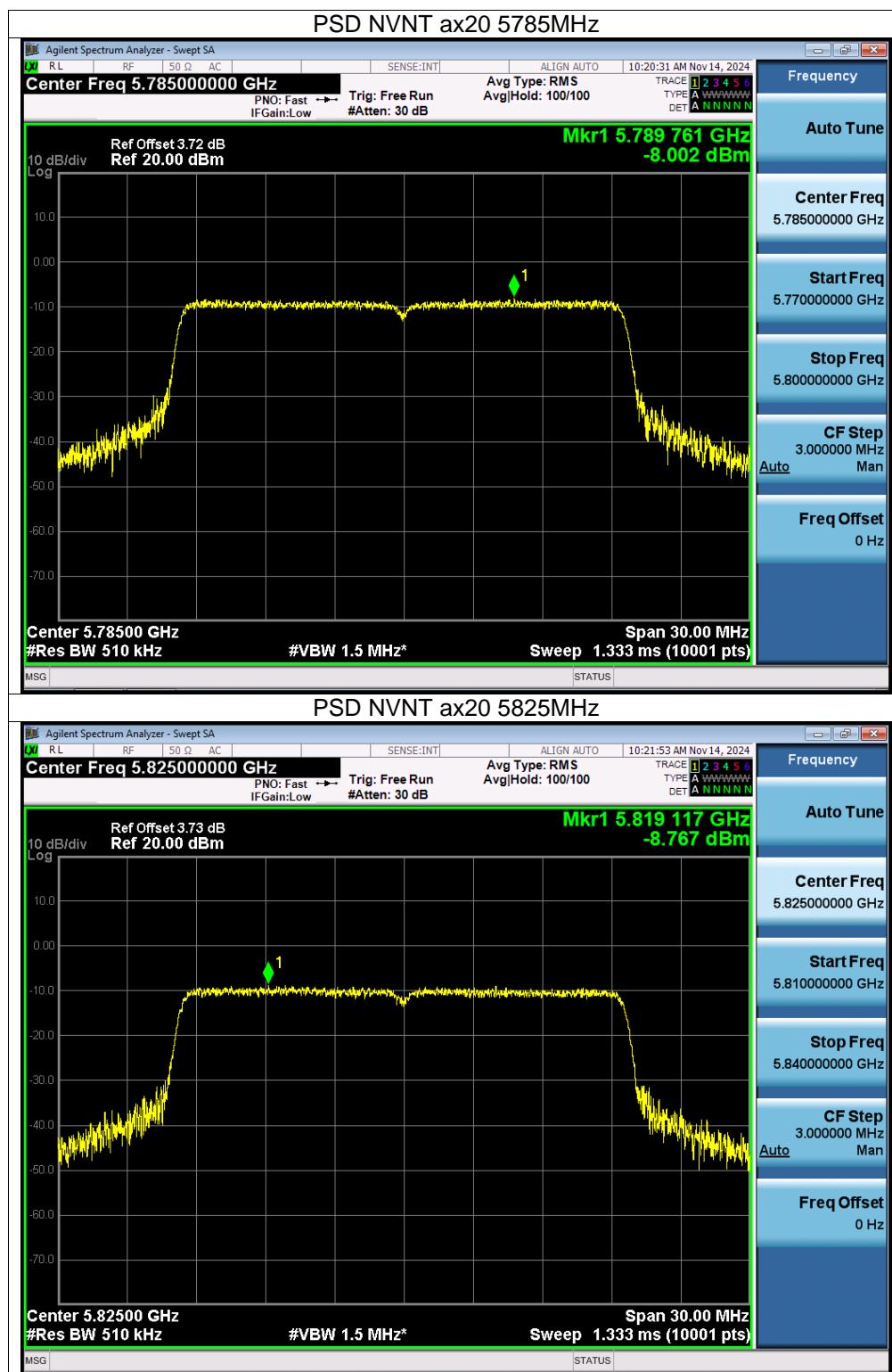


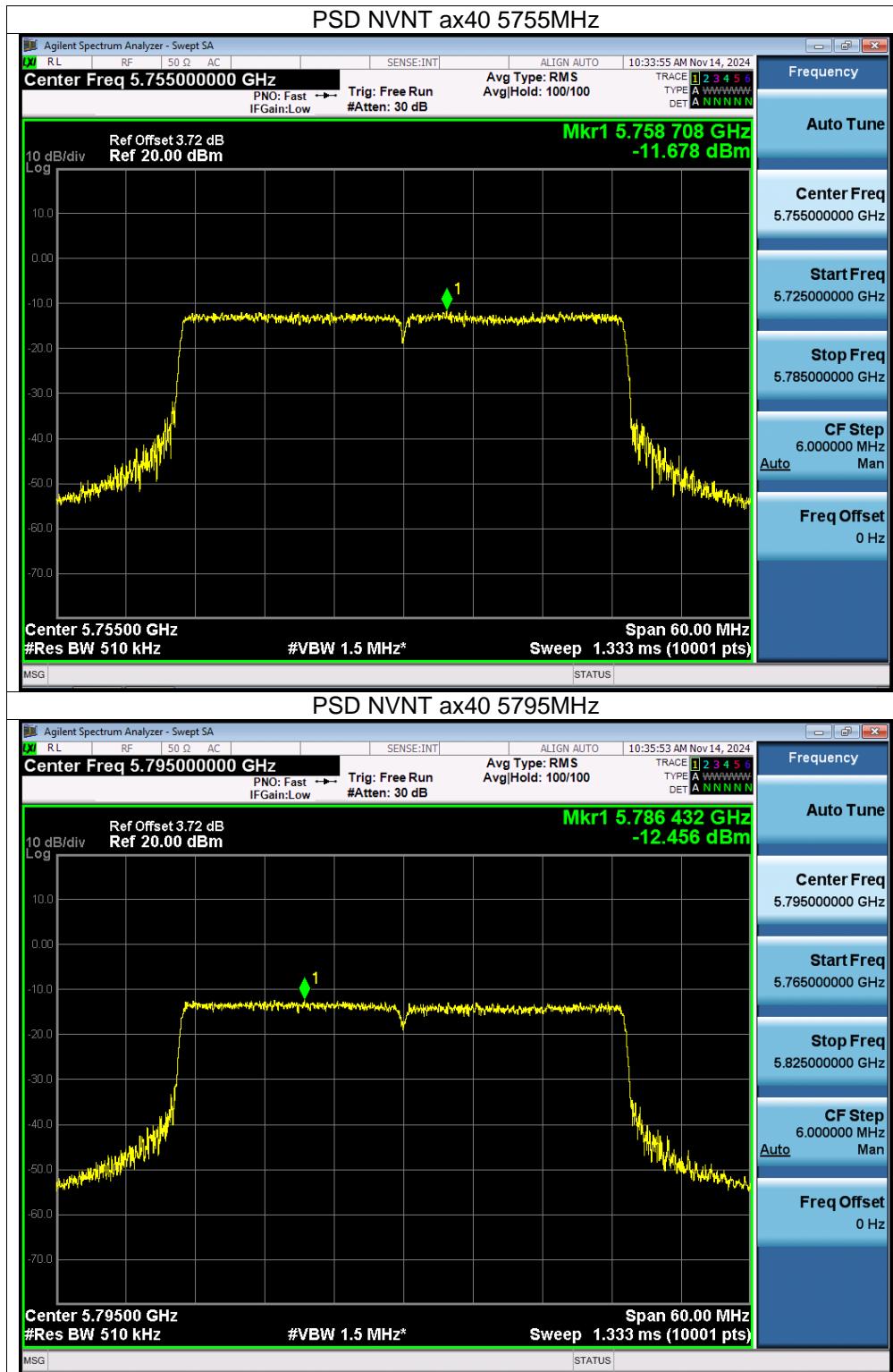






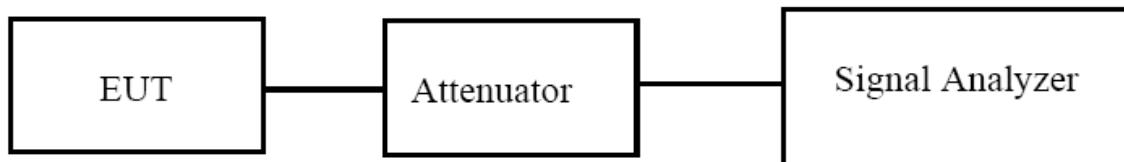






9. 26dB & 6dB & 99% Emission Bandwidth

9.1 Block Diagram Of Test Setup



9.2 Limit

The maximum power spectral density is measured as a conducted emission by direct connection of a calibrated test instrument to the equipment under test. If the device cannot be connected directly, alternative techniques acceptable to the Commission may be used. Measurements in the 5.725-5.85 GHz band are made over a reference bandwidth of 500 kHz or the 26 dB emission bandwidth of the device, whichever is less. Measurements in the 5.15-5.25 GHz, 5.25-5.35 GHz, and the 5.47-5.725 GHz bands are made over a bandwidth of 1 MHz or the 26 dB emission bandwidth of the device, whichever is less. A narrower resolution bandwidth can be used, provided that the measured power is integrated over the full reference bandwidth.
 (6dB bandwidth)>500kHz

9.3 Test Procedure

- a) Set RBW = approximately 1% of the emission bandwidth.
- b) Set the VBW > RBW.
- c) Detector = Peak.
- d) Trace mode = max hold.
- e) Measure the maximum width of the emission that is 26 dB down from the maximum of the emission. Compare this with the RBW setting of the analyzer. Readjust RBW and repeat measurement as needed until the RBW/EBW ratio is approximately 1%.

The following procedure shall be used for measuring (99 %) power bandwidth:

1. Set center frequency to the nominal EUT channel center frequency.
2. Set span = 1.5 times to 5.0 times the OBW.
3. Set RBW = 1 % to 5 % of the OBW
4. Set VBW $\geq 3 \cdot$ RBW
5. Video averaging is not permitted. Where practical, a sample detection and single sweep mode shall be used. Otherwise, peak detection and max hold mode (until the trace stabilizes) shall be used.
6. Use the 99 % power bandwidth function of the instrument (if available).
7. If the instrument does not have a 99 % power bandwidth function, the trace data points are recovered and directly summed in power units. The recovered amplitude data points, beginning at the lowest frequency, are placed in a running sum until 0.5 % of the total is reached; that frequency is recorded as the lower frequency. The process is repeated until 99.5 % of the total is reached; that frequency is recorded as the upper frequency. The 99% occupied bandwidth is the difference between these two frequencies.

6dB

1. Set RBW = 100 kHz.
2. Set the video bandwidth (VBW) $\geq 3 \times$ RBW.
3. Detector = Peak.
4. Trace mode = max hold.
5. Sweep = auto couple.