RF TEST REPORT

Report number		RAPA23-O-017
Applicant	Name	Innonet Co., Ltd.
	Logo	N/A
	Address	Building C, Office 417, Munjeong Hyundai Knowledge Industry Center, 7, Beobwon-ro 11-gil, Songpa-gu, Seoul 05836
Manufacturer	Name	Innonet Co., Ltd.
	Address	Building C, Office 417, Munjeong Hyundai Knowledge Industry Center, 7, Beobwon-ro 11-gil, Songpa-gu, Seoul 05836
Type of equipment		TVWS Backpack Wi-Fi
Basic model name		BTCPE10
Multi model name		N/A
Serial number		N/A
FCC ID		2A9R3-BTCPE10
Test duration		March 9, 2023 to March 23, 2023
Date of issue		March 31, 2023
Total page		31 Pages (including this page)

SUMMARY

The equipment complies with the regulation; FCC Part 15 Subpart H

This test report only contains the result of a single test of the sample supplied for the examination.
It is not a general valid assessment of the features of the respective products of the mass-production.

March 31, 2023

Tested by MinGu Ji
Tester

March 31, 2023

Reviewed by Wooyeol- Ryu
Executive Manager

Test Report Version History

Version	Date	Reason for revision
1.0	March 31, 2023	Original Document

CONTENTS

1. Description of EUT

1.1 Applicant

• Company name : Innonet Co., Ltd.
• Address : Building C, Office 417, Munjeong Hyundai Knowledge Industry Center, 7, Beobwon-ro 11-gil, Songpa-gu, Seoul 05836
• Contact person : Tae Hyun Kim / Researcher / thkim@innonet.net
• Phone/Fax : +82-2-406-8849 / +82-2-3012-8101

1.2 Manufacturer

• Company name : Innonet Co., Ltd.
• Address : Building C, Office 417, Munjeong Hyundai Knowledge Industry Center, 7, Beobwon-ro 11-gil, Songpa-gu, Seoul 05836
• Phone/Fax : +82-2-406-8849 / +82-2-3012-8101

1.3 Basic description

• Product name : TVWS Backpack Wi-Fi
• Basic model name : BTCPE10
• Alternative model name : N/A

1.4 General description

• EQUIPMENT CLASS : WGF – White Space Device with Geo-location - Fixed

• Frequency Range : 470 MHz ~ 698 MHz
• Output Power : 22.50 dBm
• Modulation Type : QPSK
• Antenna Type : Patch Antenna
• Antenna Gain : 8.28 dBi
• Power Supply : AC 110.0 ~ 230.0 V

Start of Frequency range, MHz	End of Frequency range, MHz	Frequency range Bandwidth, MHz	Channel size, MHz	Low channel	Mid channel	High channel
470	698	228	6	473	587	695
			12	476	584	692

1.5 Alternative type(s)/model(s)

There is no alternative type(s) and/or model(s).

2. General information of test

2.1 Test standards and results

Applied Standards : FCC Part 15 Subpart H		
Section	**Description of Test**	**Result**
ANSI 63.10 6.9.3	99 % Occupied Bandwidth	Pass
15.709 (b) (ii)	OUTPUT POWER AND POWER SPECTRAL DENSITY	Pass
15.709 (d)	BAND-EDGE and ADJACENT CHANNEL EMISSIONS	Pass
15.709 (d)	Radiated Emission which fall in the Restricted Band	Pass
15.207	Conducted Limits	Pass
15.209	Radiated Emission Limits	Pass
15.203	Antenna Requirement	Pass

2.2 Description of EUT during the test

During the test, keep the EUT in continuously transmitting mode.
There was no mechanical or circuitry modification to improve RF and spurious characteristic, and any RF and spurious suppression device(s) was not added against the device tested.
The EUT was moved throughout the X, Y, and Z axis and worst case data was recorded in this report.

2.3 Test configuration

• Type of peripheral equipment used

Model	Manufacturer	Description	Connected to
650G1	HP	Notebook	EUT
PA-1900-32HT	LITE-ON TECHNOLOGY(CHANGZHOU_Co., Ltd.	Power Adapter	Notebook

2.4 Test Facility

• FCC Registration No: 927453
• IC Company address code: 9355B
• RRA Designation Number: KR0027

• Place of Test
Anyang Test Site(RF Test Room)
#101 & B104 Anyang Megavalley, 268, Hagui-ro, Dongan-gu, Anyang-si, Gyeonggi-do, 14056, Korea

2.5 PRELIMINARY TEST

2.5.1 AC Power line Conducted Emissions Tests

Operation Mode	The Worse operating condition (Please check one only)
Transmitting mode.	X

2.5.2 General Radiated Emissions Tests

During Preliminary Tests, the following operating modes were investigated

Operation Mode	The Worse operating condition (Please check one only)
Transmitting mode.	X

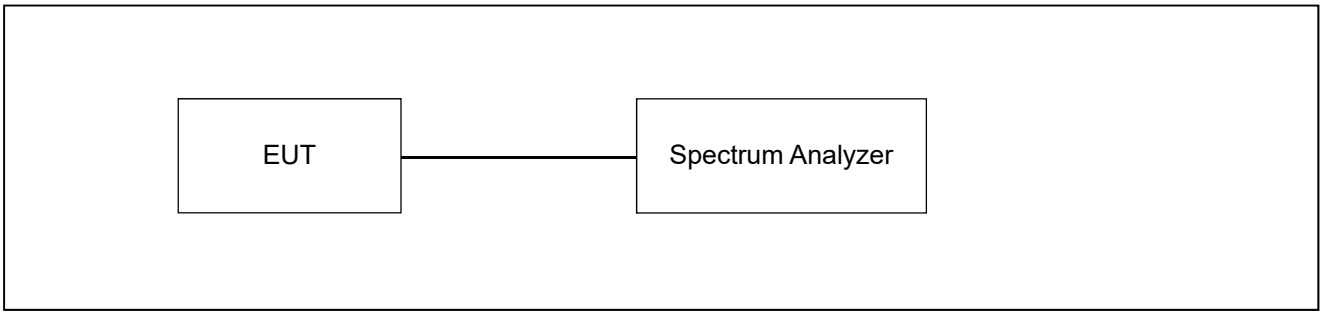
3. Measurement data

3.1 Occupied bandwidth

3.1.1 Requirement

- FCC Part15 subpart H , ANSI 63.10 6.9.3

3.1.2 Test Procedure



The occupied bandwidth or the “99% emission bandwidth” is defined as the frequency range between two points, one above and the other below the carrier frequency, within which 99% of the total transmitted power of the fundamental transmitted emission is contained.

3.1.3 Test environment

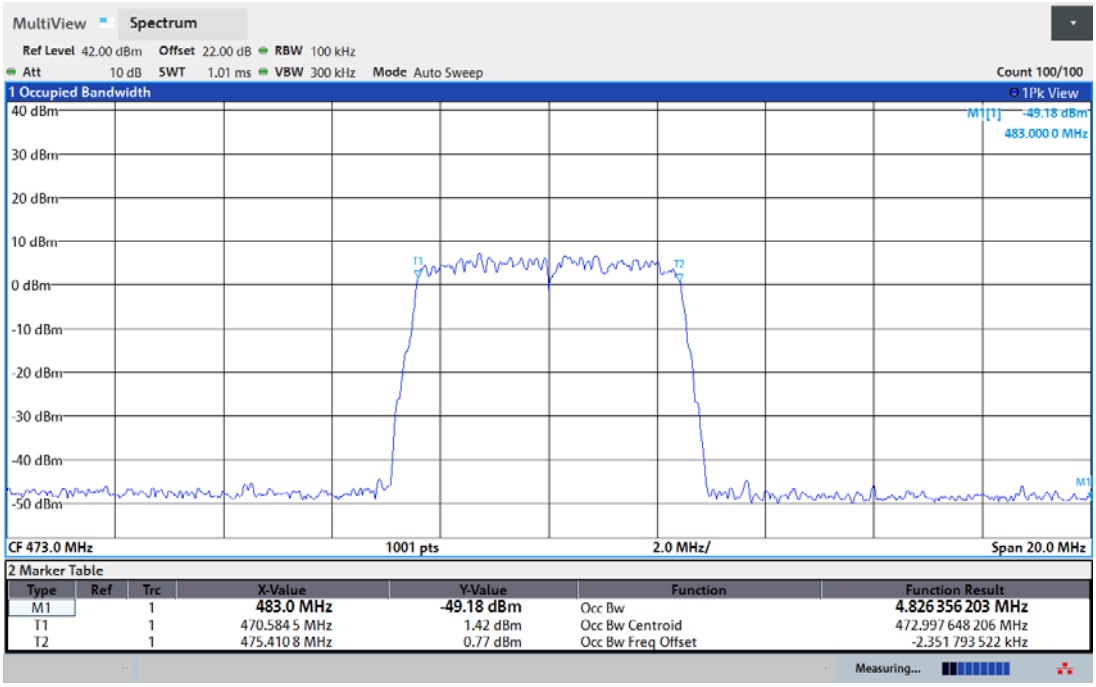
- 22 °C, 43 % R.H.

3.1.4 Test results

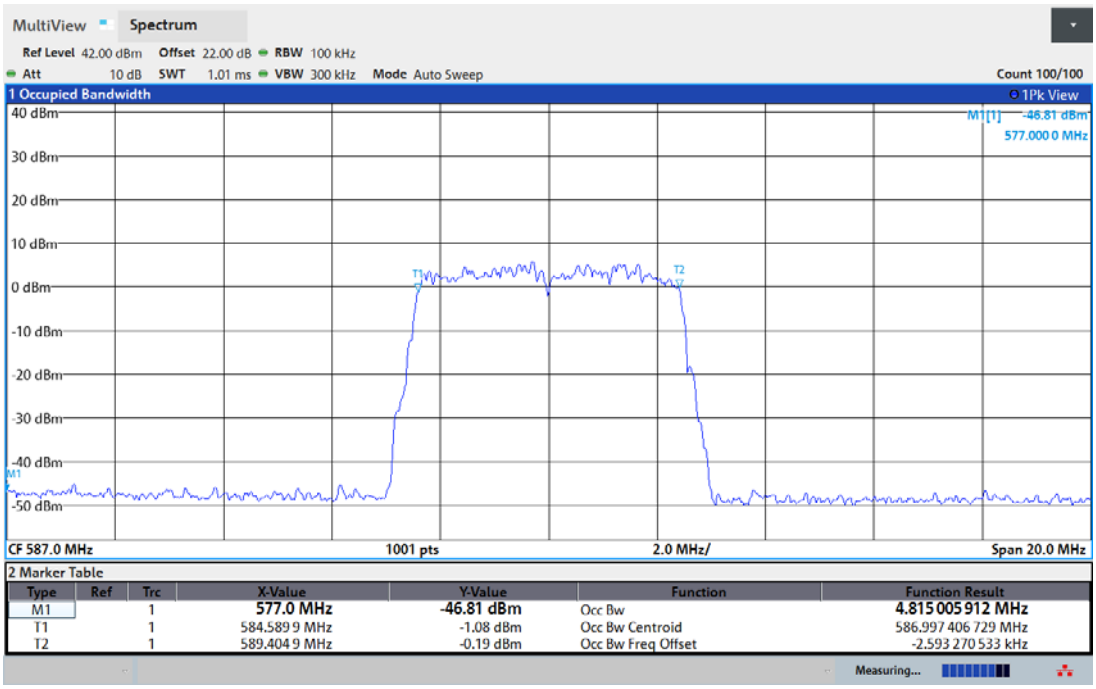
Frequency [MHz]		Measured Value [MHz]	Limit [dBm]	Result
Low	473	4.83	6.00	PASS
Middle	587	4.82	6.00	
High	695	4.84	6.00	

Frequency [MHz]		Measured Value [MHz]	Limit [dBm]	Result
Low	476	6.41	12.00	PASS
Middle	584	6.42	12.00	
High	692	6.44	12.00	

3.1.5 Test Plots



Low Channel



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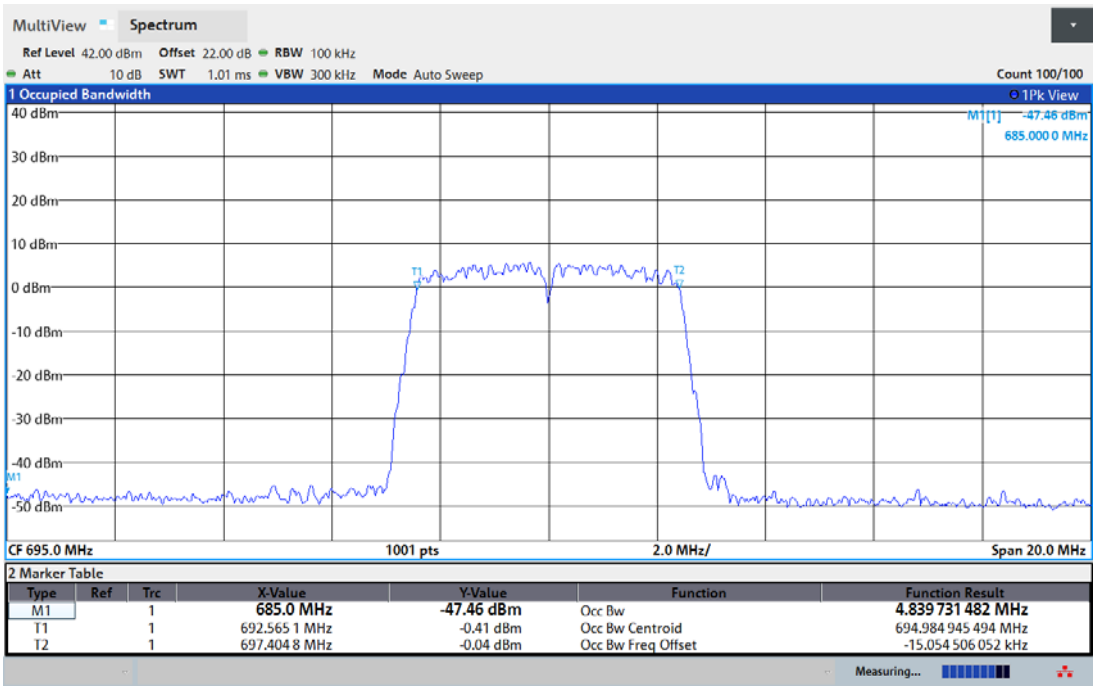
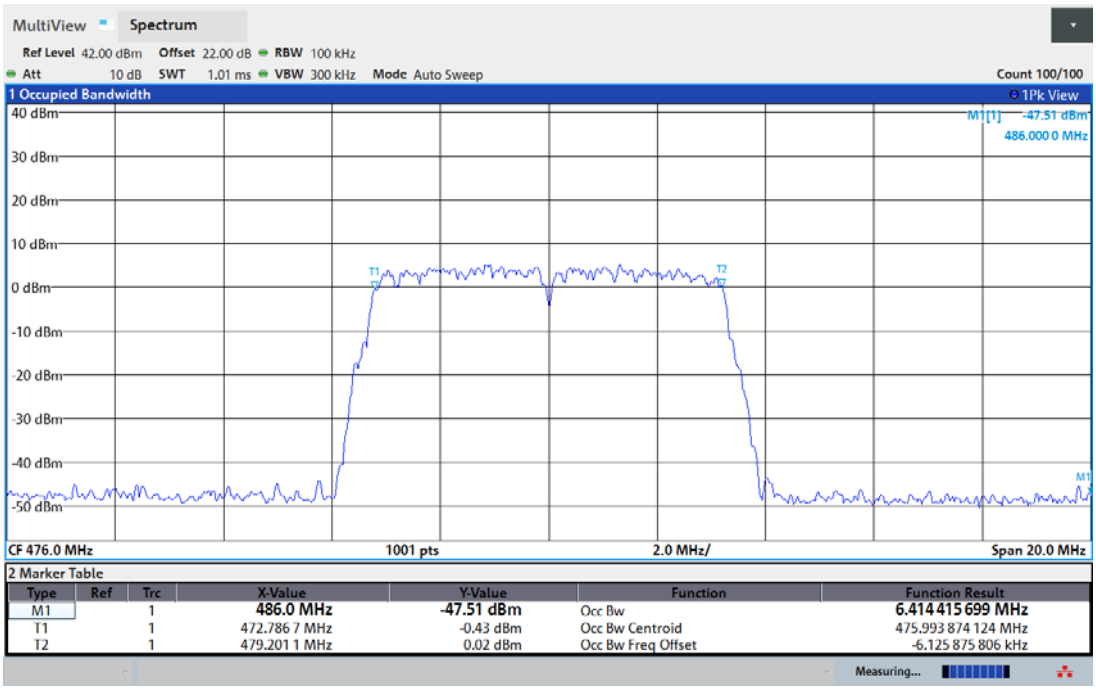


High Channel



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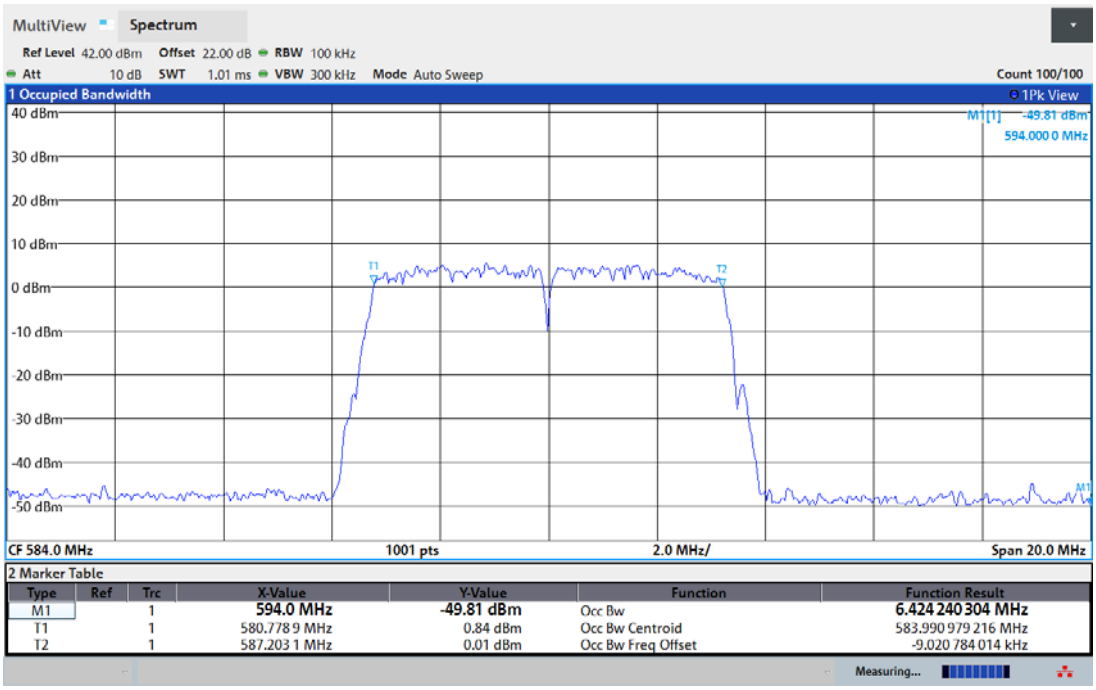

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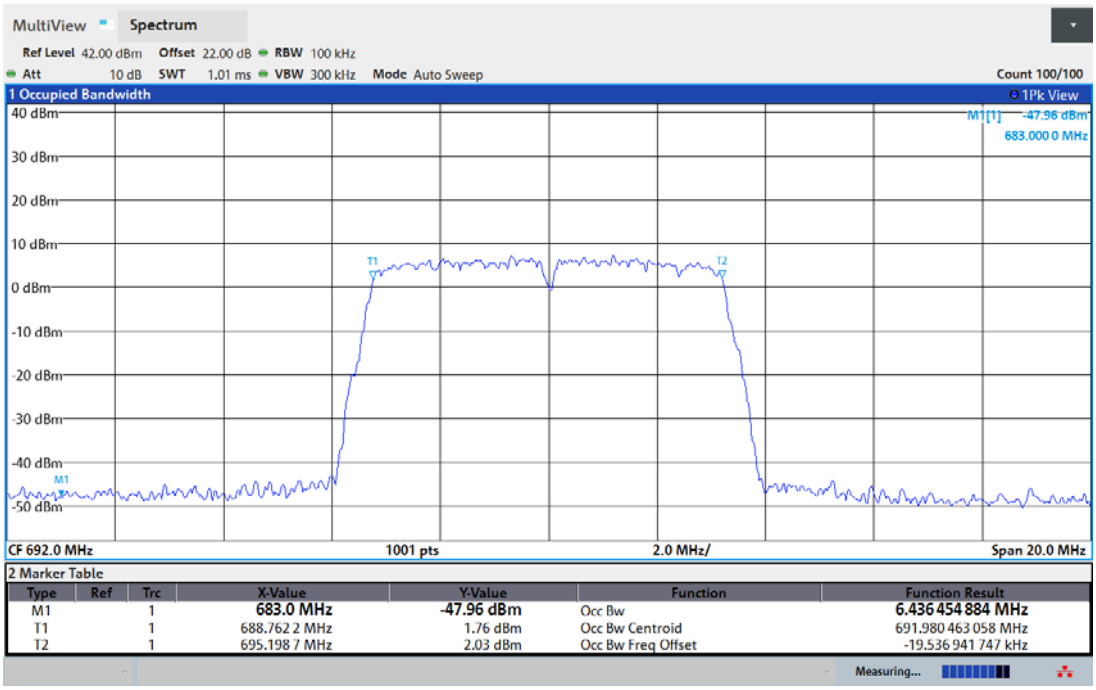


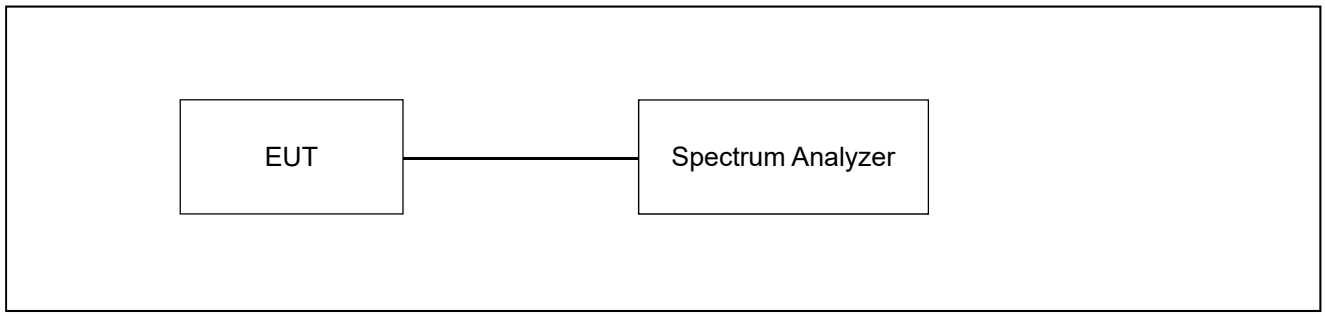
High Channel

3.2 OUTPUT POWER AND POWER SPECTRAL DENSITY

3.2.1 Requirement

- FCC Part15 subpart H Section 15.709

3.2.2 Test Procedure



EIRP (6 MHz)	Conducted power limit[1] (6 MHz)	Conducted PSD limit (100 kHz)	Conducted adjacent channel emission limit (100 kHz)
16 dBm (40 mW)	10 dBm (10 mW)	−7.4 dBm	−62.8 dBm
20 dBm (100 mW)	14 dBm (25 mW)	−3.4 dBm	−58.8 dBm
24 dBm (250 mW)	18 dBm (63 mW)	0.6 dBm	−54.8 dBm
28 dBm (625 mW)	22 dBm (158 mW)	4.6 dBm	−50.8 dBm
32 dBm (1600 mW)	26 dBm (400 mW)	8.6 dBm	−46.8 dBm
36 dBm (4000 mW)	30 dBm (1000 mW)	12.6 dBm	−42.8 dBm
40 dBm (10000 mW)	30 dBm (1000 mW)	12.6 dBm	−42.8 dBm

[1]The conducted power spectral density from a fixed white space device shall not be greater than the values shown in the table when measured in any 100 kHz band during any time interval of continuous transmission, except that a 40 mW fixed white space device operating in a four megahertz channel within a seven megahertz guard band must comply with a conducted power spectral density limit of −5.4 dBm.

3.2.3 Test environment

• 22 °C, 43 % R.H.

3.2.4 Test results

• 3.2.4.1 Output Power Results

Frequency [MHz]		Measured Value [dBm]	Limit [dBm/6 MHz]	Antenna Gain [dBi]	EIRP [dBm]	EIRP Limit dBm/6 MHz	Result
Low	473	21.11	27.72	8.28	29.39	36.00	PASS
Middle	587	21.34	27.72	8.28	29.62	36.00	
High	695	20.86	27.72	8.28	29.14	36.00	

• 3.2.4.2 PSD Results

Frequency [MHz]		Measured Value [dBm]	Limit [dBm]	Result
Low	473	6.97	12.60	PASS
Middle	587	6.62	12.60	
High	695	7.19	12.60	

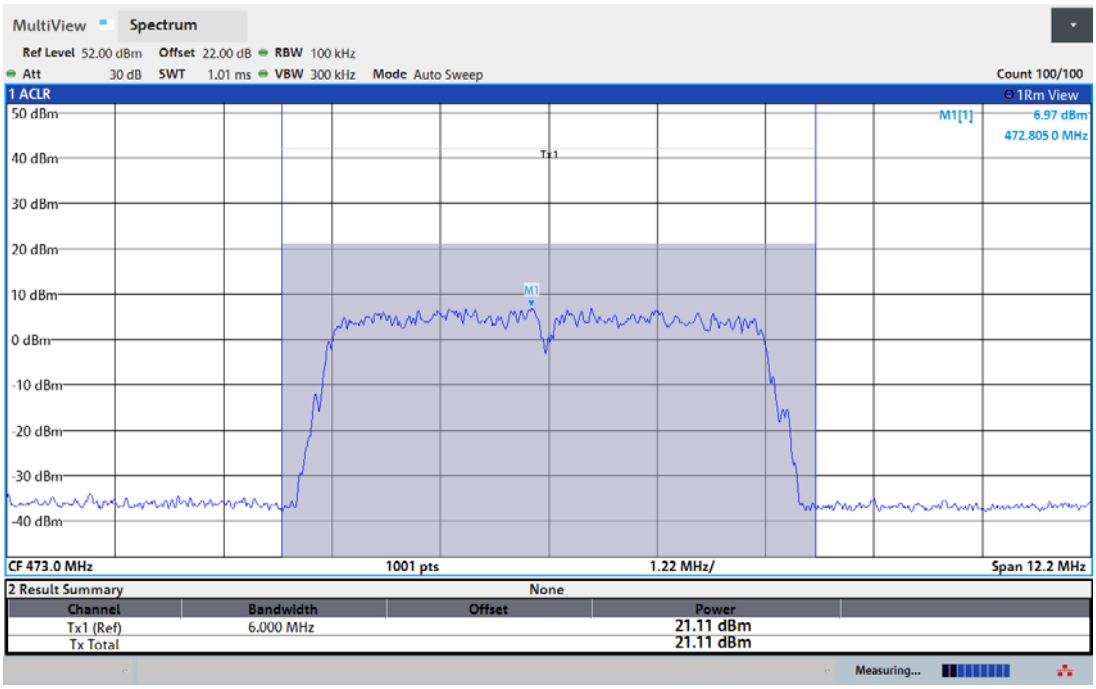
• 3.2.4.3 Output Power Results

Frequency [MHz]		Measured Value [dBm]	Limit [dBm/6 MHz]	Antenna Gain [dBi]	EIRP [dBm]	EIRP Limit dBm/6 MHz	Result
Low	476	19.97	27.72	8.28	28.25	36.00	PASS
Middle	584	20.23	27.72	8.28	28.51	36.00	
High	692	22.50	27.72	8.28	30.78	36.00	

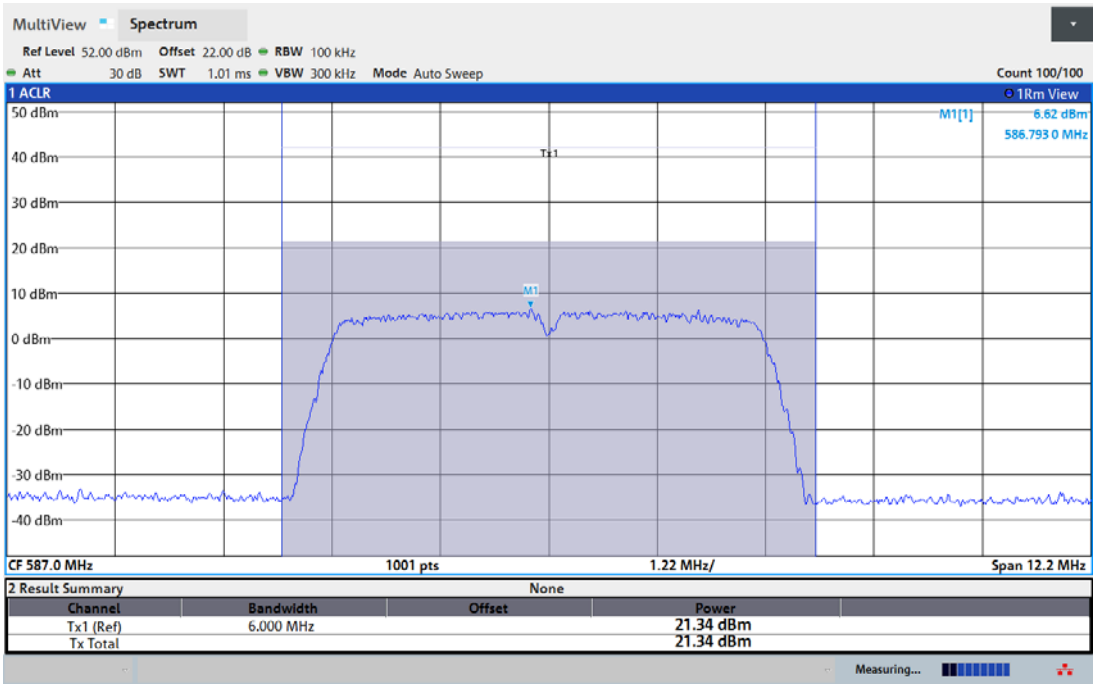
• 3.2.4.4 PSD Results

Frequency [MHz]		Measured Value [dBm]	Limit [dBm]	Result
Low	476	5.08	12.60	PASS
Middle	584	5.27	12.60	
High	692	6.98	12.60	

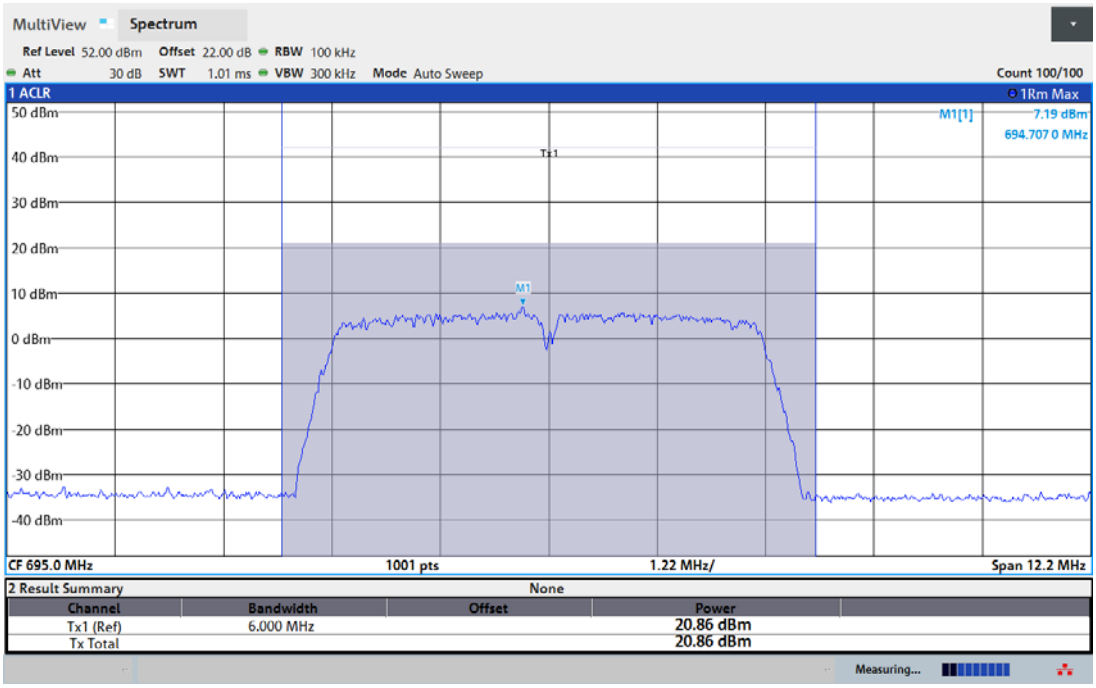
3.1.5 Test Plots



Low Channel



Middle Channel



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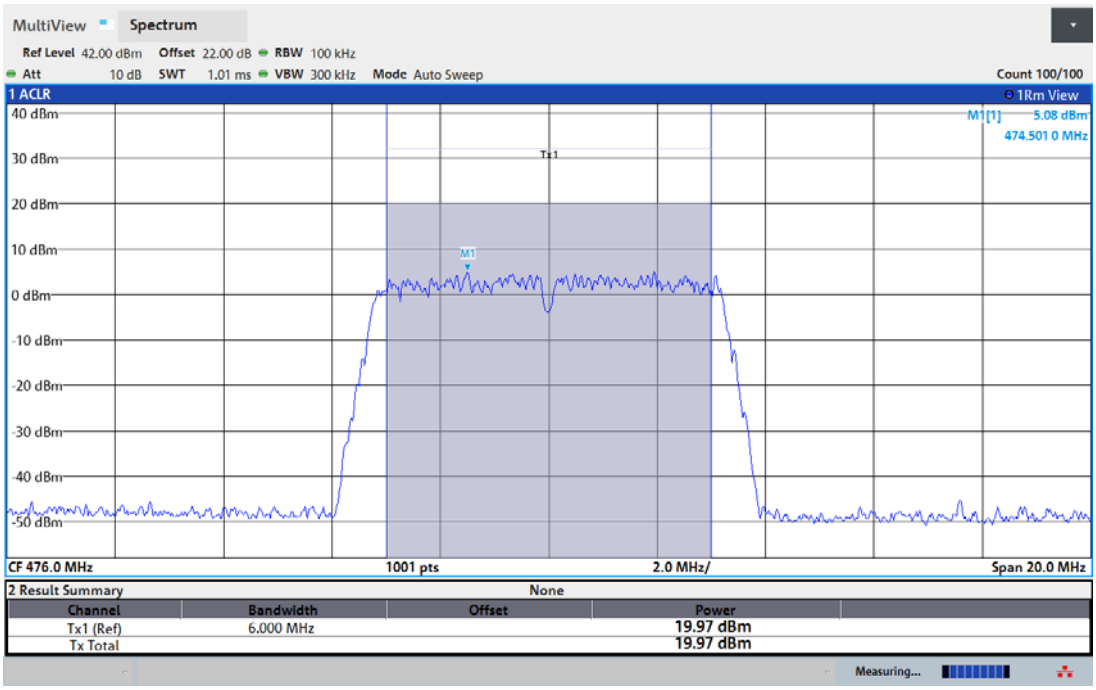
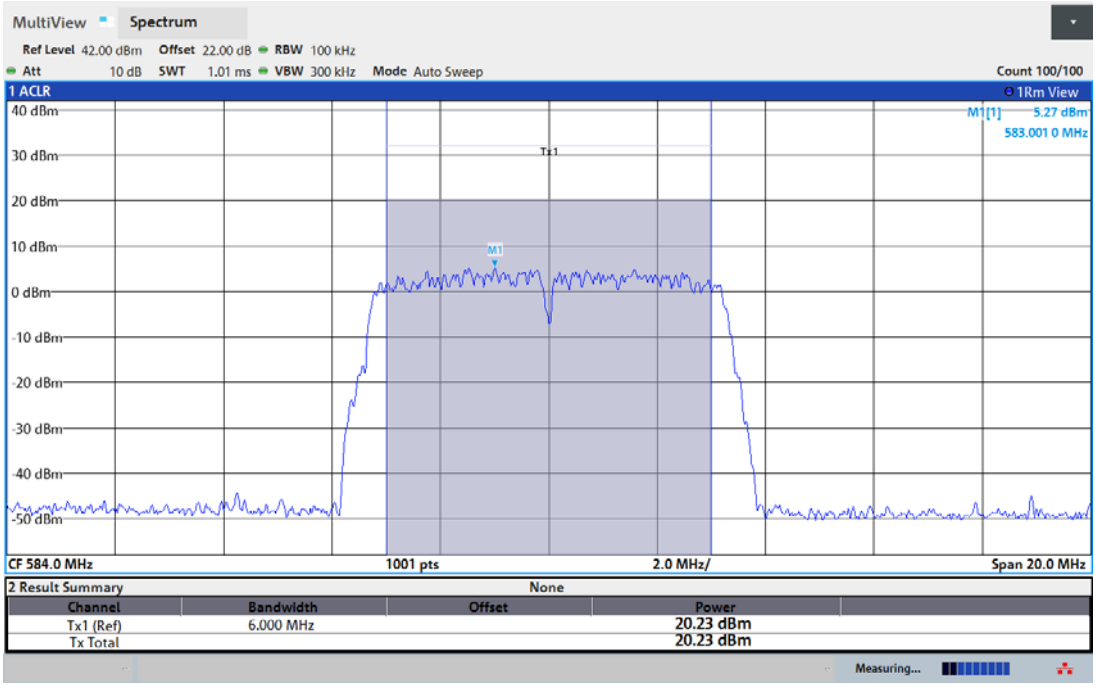
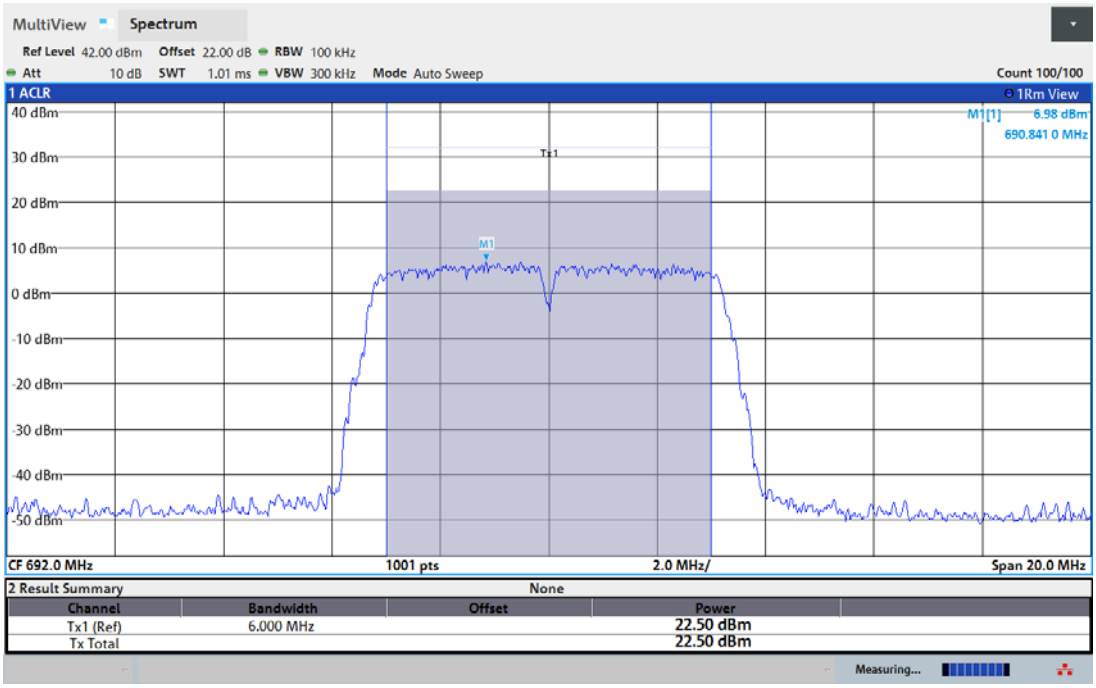


Low Channel



Middle Channel



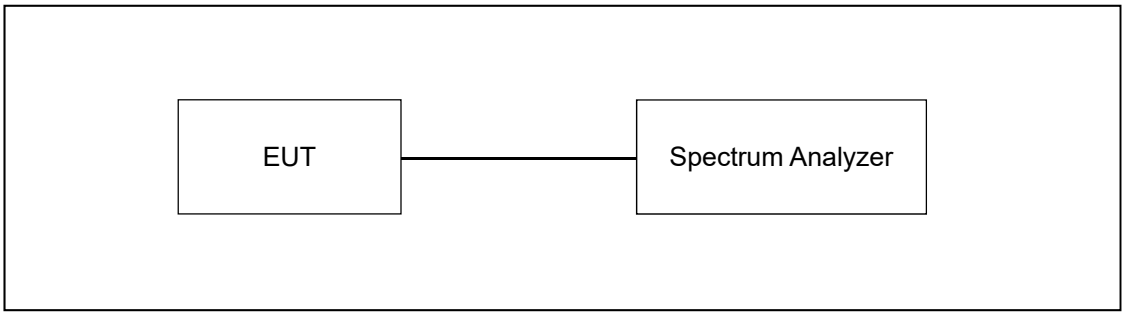
High Channel

3.3 band edge and adjacent channel power

3.3.1 Requirement

- FCC Part15 subpart H Section 15.709 (d)

3.3.2 Test Procedure



(1) The adjacent channel emission limits apply in the six-megahertz channel immediately adjacent to each white space channel or group of contiguous white space channels in which the white space device is operating. Fixed devices with 36 dBm EIRP: −42.8 dBm/100 kHz conducted power.
(2) At frequencies beyond the six-megahertz channel immediately adjacent to each white space channel or group of contiguous white space channels in which the white space device is operating the white space device shall meet the requirements of §15.209.
(3) Emission measurements in the adjacent bands shall be performed using a minimum resolution bandwidth of 100 kHz with an average detector. A narrower resolution bandwidth may be employed near the band edge, when necessary, provided the measured energy is integrated to show the total power over 100 kHz.
(b)(1)(ii) For operation at EIRP levels of 36 dBm (4,000 mW) or less, fixed white space devices may operate at EIRP levels between the values shown in the table in paragraph (b)(1)(iii) of this section provided that the conducted power and the conducted power spectral density (PSD) limits are linearly interpolated between the values shown and the adjacent channel emission limit of the higher value shown in the table is met. Operation at EIRP levels above 36 dBm (4,000 mW) shall follow the requirements for 40 dBm (10,000 mW).

3.3.3 Test environment

• 22 °C, 43 % R.H.

3.3.4 Test results

• 3.3.4.1 Lower Band-Edge

Frequency [MHz]		Measured Value [dBm]	Limit [dBm]	Result
Low	470	-45.82	-42.80	PASS
Middle	584	-48.33	-42.80	
High	692	-46.12	-42.80	

• 3.3.4.2 Upper Band-Edge

Frequency [MHz]		Measured Value [dBm]	Limit [dBm]	Result
Low	476	-49.12	-42.80	PASS
Middle	590	-47.09	-42.80	
High	698	-46.11	-42.80	

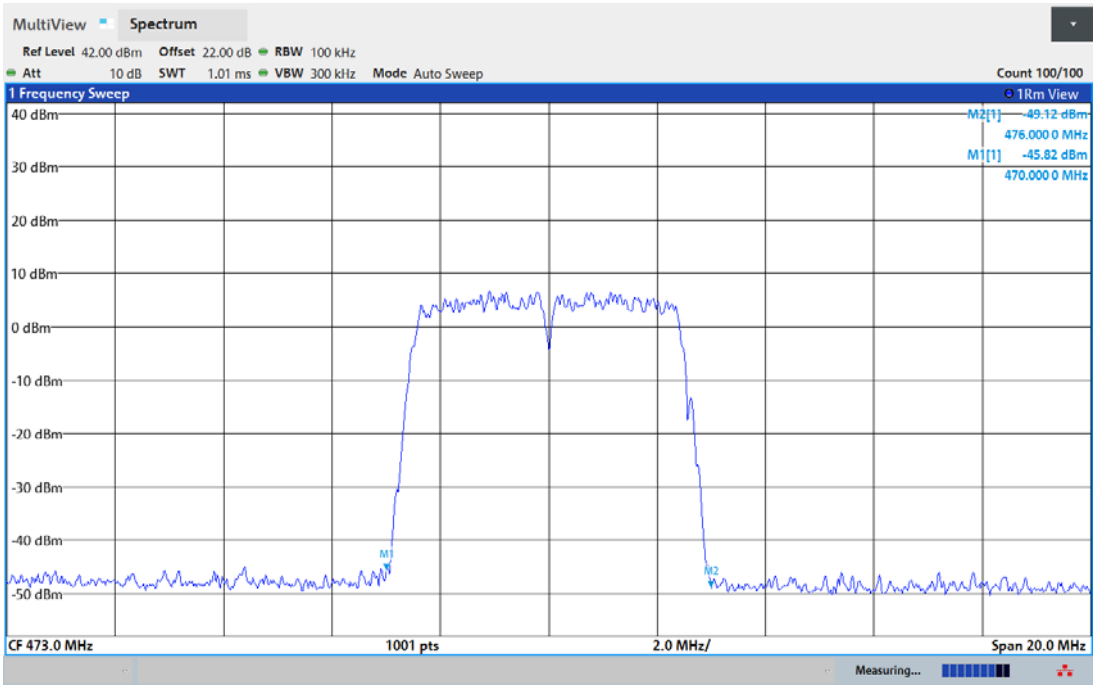
• 3.3.4.3 Lower Band-Edge

Frequency [MHz]		Measured Value [dBm]	Limit [dBm]	Result
Low	470	-46.66	-42.80	PASS
Middle	578	-48.31	-42.80	
High	686	-46.52	-42.80	

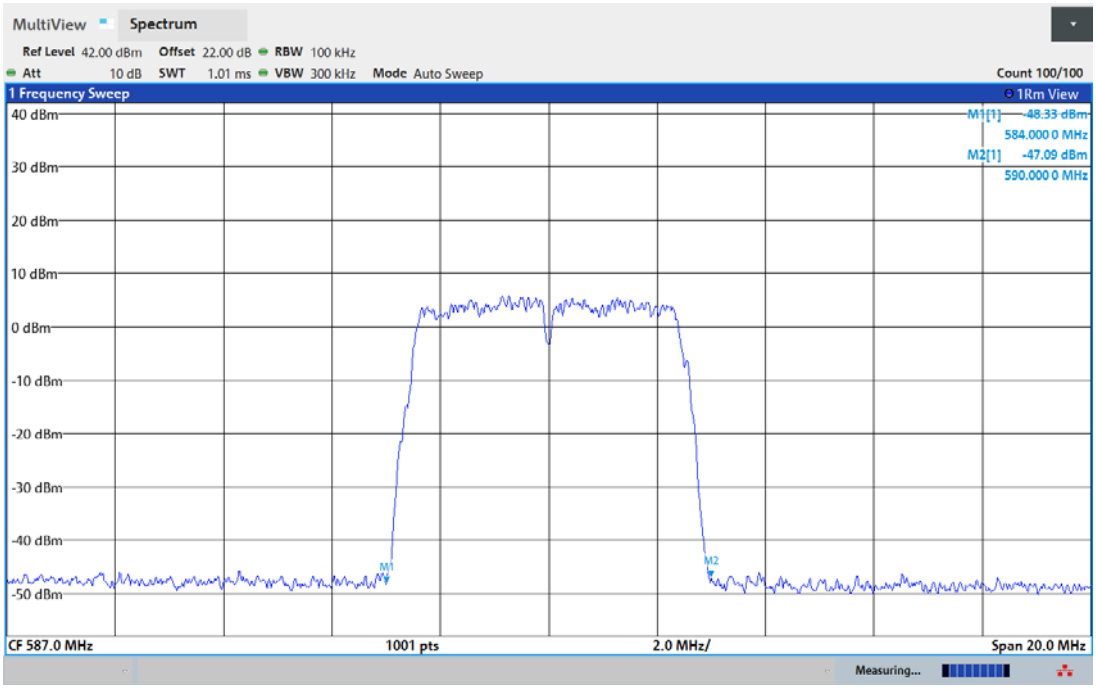
• 3.3.4.4 Upper Band-Edge

Frequency [MHz]		Measured Value [dBm]	Limit [dBm]	Result
Low	482	-47.80	-42.80	PASS
Middle	590	-49.56	-42.80	
High	698	-47.26	-42.80	

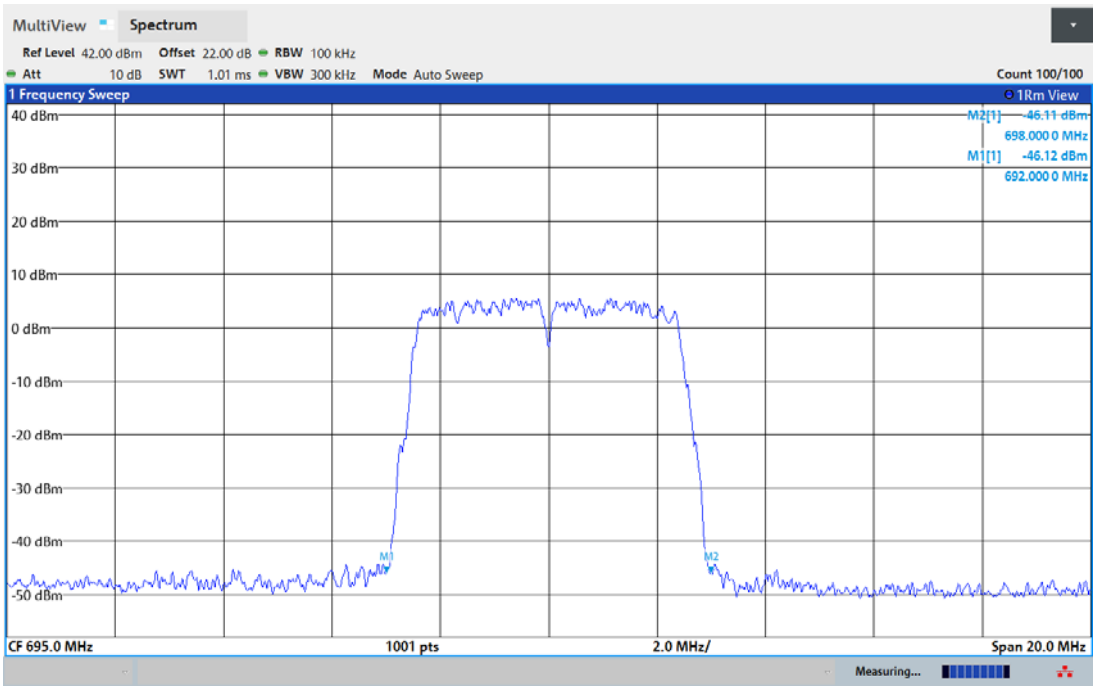
3.3.4 Test Plots



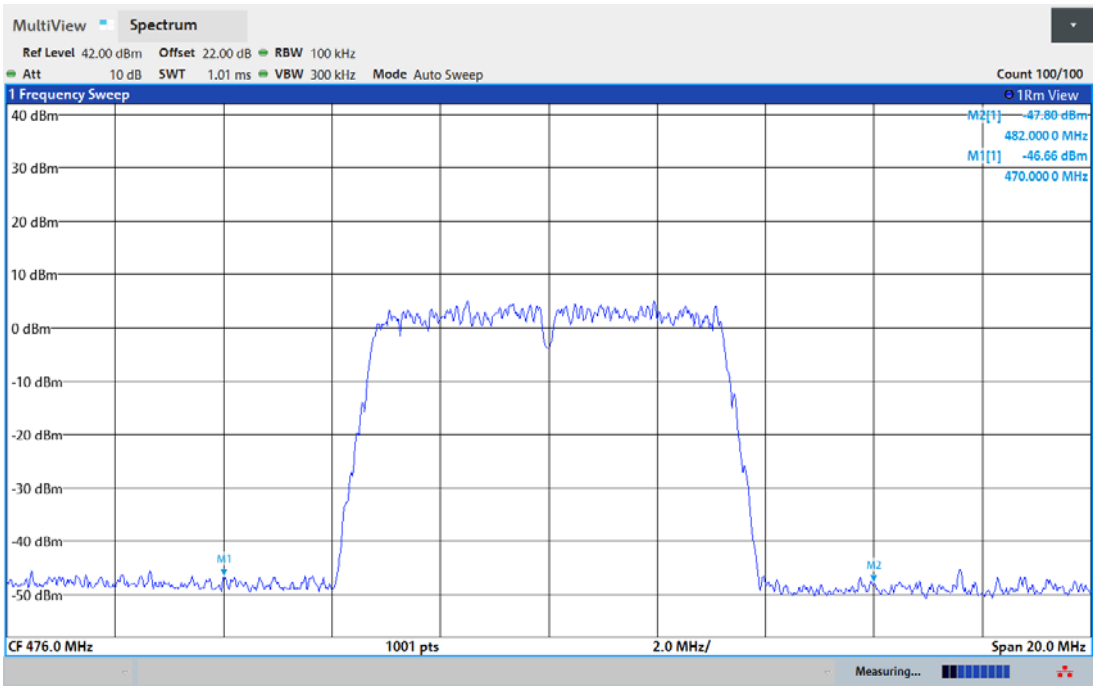
Low Channel



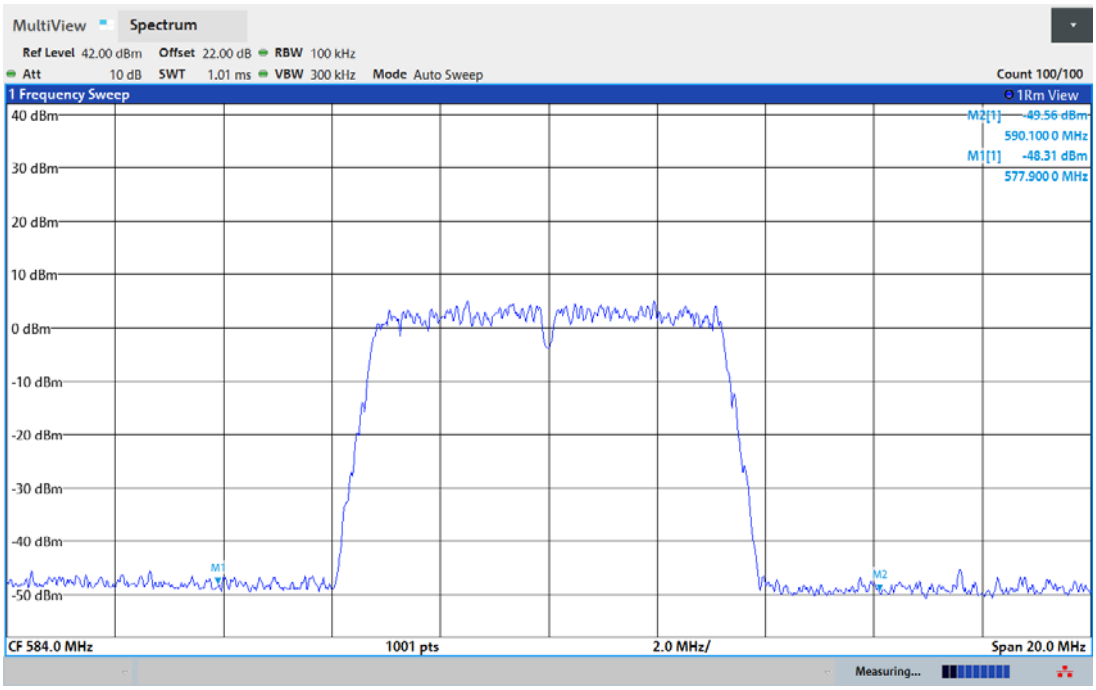
Middle Channel



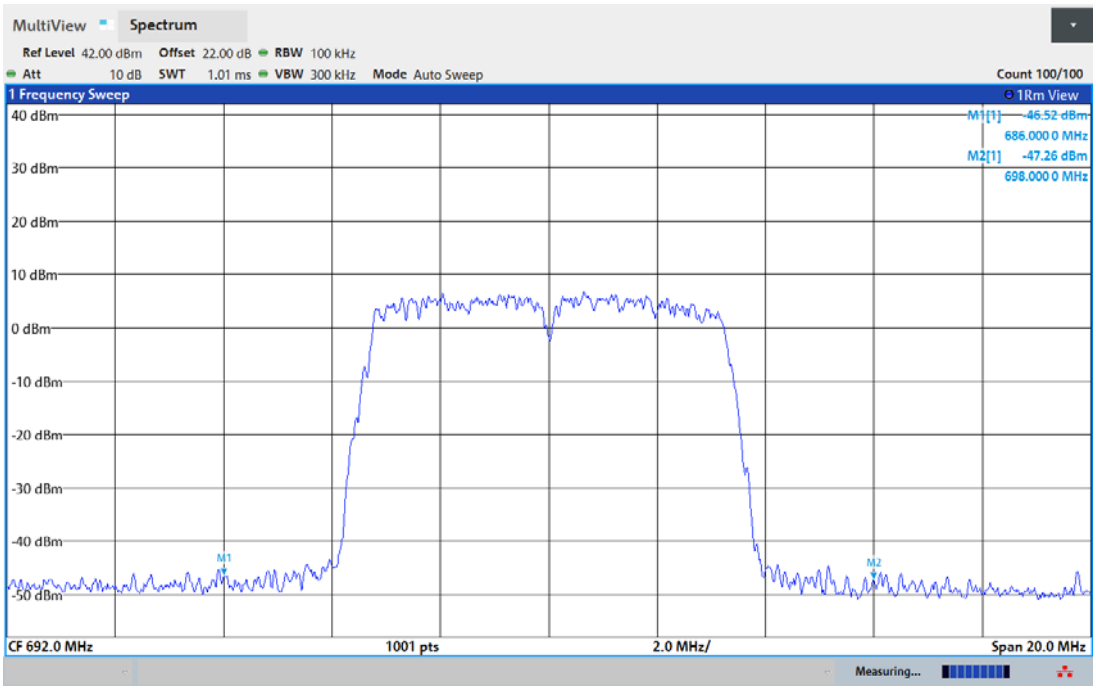
High Channel



Low Channel



Middle Channel



High Channel

3.4 Radiated Emission

3.4.1 Requirement

• FCC Part15 subpart H Section 15.709 (d)

3.4.2 Test Procedure

The radiated emissions measurements were performed on the 3 m anechoic chamber. The EUT was placed on a non-conductive turntable above the ground plane. The frequency spectrum from 30 kHz to 7.0 GHz was scanned and maximum emission levels at each frequency recorded. The system was rotated 360°, and the antenna was varied in the height between 1.0 m and 4.0 m in order to determine the maximum emission levels. This procedure was performed for horizontal and vertical polarization of the receiving antenna.

3.4.3 Test environment

• 22 °C, 43 % R.H.

3.4.4 Test results

3.4.4.1 Spurious Radiated Emission

3.4.4.1.1 Test Data for Below 30 MHz

•. Detector : Quasi-Peak (6 dB Bandwidth: 200 Hz, 9 kHz)

•.Measurement distance : 3 m

•.Frequency range : 9 kHz ~ 30 MHz

•.Operating Condition : Highest Output Power Transmitting Mode

•.Result : PASS

Frequency (MHz)	Reading (dBμV)	Ant. Pol. (H/V)	Ant. Factor (dB/m)	Cable Loss	Amp Gain	Emission Level(dBμV/m)	Limits (dBμV/m)	Margin (dB)
Emissions observed were below the limit and thus not reported								

3.4.4.1.2 Test Data for 30 MHz ~ 1000 MHz

•. Detector : Quasi-Peak (6 dB Bandwidth: 120 kHz)

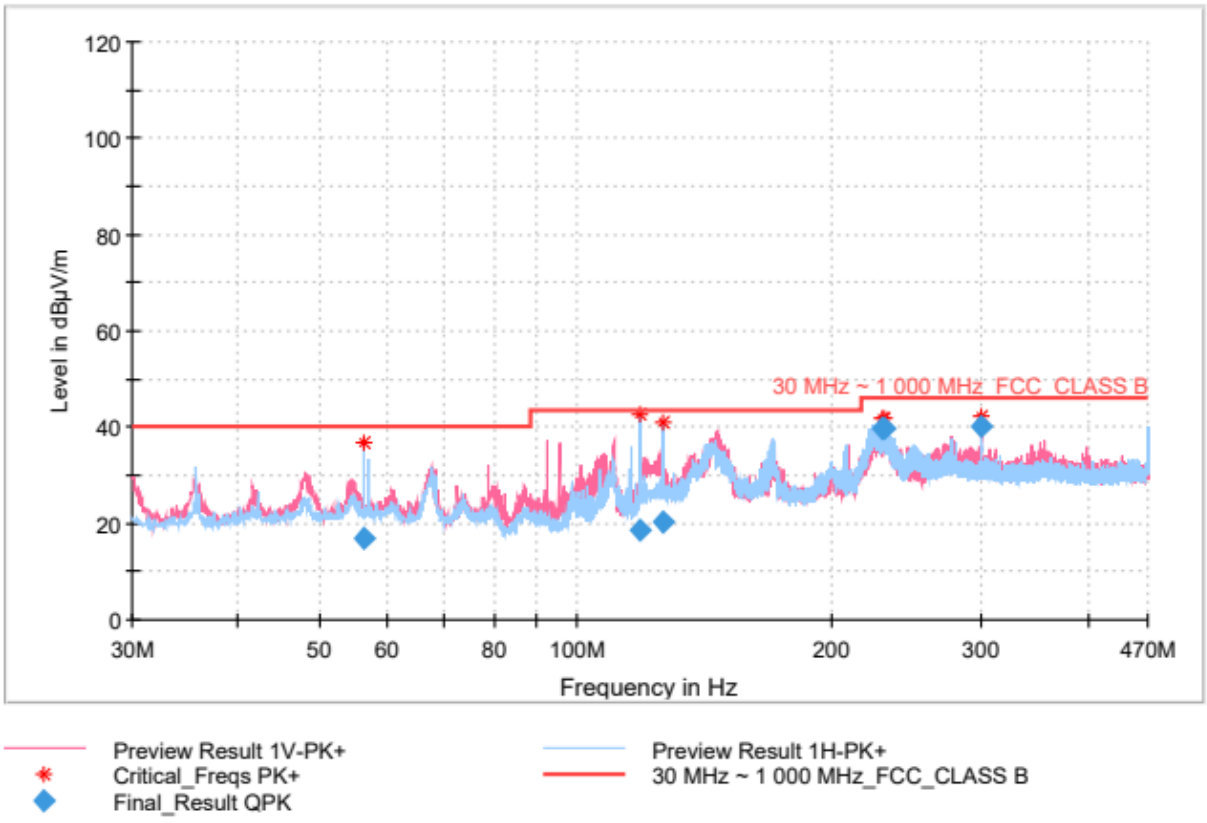
•.Measurement distance : 3 m

•.Frequency range : 30 MHz ~ 470 MHz

•.Operating Condition : Highest Output Power Transmitting Mode

•.Result : PASS

RE Test Report

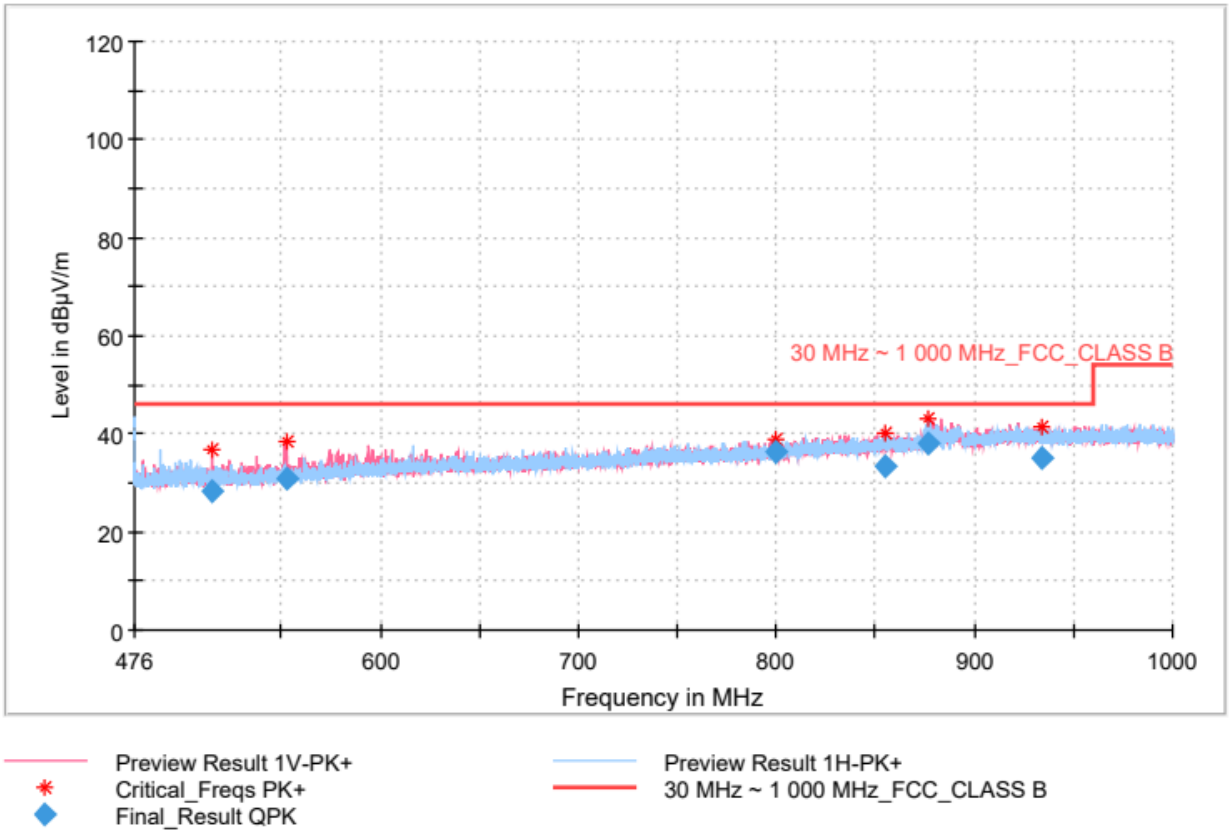


Final_Result

Frequency (MHz)	QuasiPeak (dBµV/m)	Limit (dBµV/m)	Margin (dB)	Meas. Time (ms)	Height (cm)	Pol	Azimuth (deg)	Corr. (dB)
56.29	16.93	40.00	23.07	15000.0	400.3	H	103.0	-11.8
118.66	18.75	43.50	24.75	15000.0	400.3	H	302.0	-13.0
126.47	20.12	43.50	23.38	15000.0	300.3	H	286.0	-12.3
228.66	39.69	46.00	6.31	15000.0	99.9	H	301.0	-11.1
229.87	39.75	46.00	6.25	15000.0	99.9	H	315.0	-11.0
298.79	40.34	46.00	5.66	15000.0	99.8	V	202.0	-7.4

•. Detector : Quasi-Peak (6 dB Bandwidth: 120 kHz)
•.Measurement distance : 3 m
•.Frequency range : 476 MHz ~ 1000 MHz
•.Operating Condition : Highest Output Power Transmitting Mode
•.Result : PASS

RE Test Report

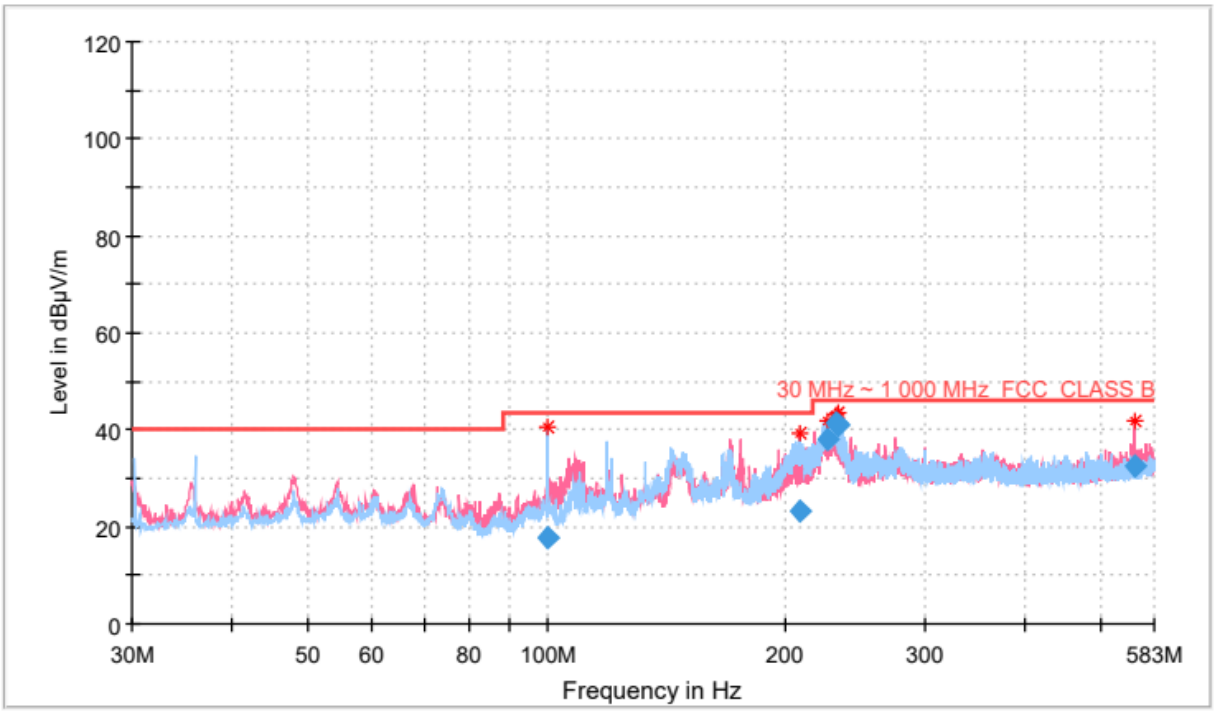


Final_Result

Frequency (MHz)	QuasiPeak (dBµV/m)	Limit (dBµV/m)	Margin (dB)	Meas. Time (ms)	Height (cm)	Pol	Azimuth (deg)	Corr. (dB)
514.78	28.26	46.00	17.75	15000.0	99.9	V	124.0	-3.6
552.57	30.80	46.00	15.20	15000.0	99.9	V	143.0	-2.7
799.83	36.26	46.00	9.74	15000.0	99.9	V	128.0	2.7
854.46	33.57	46.00	12.43	15000.0	99.9	V	120.0	4.4
876.60	38.21	46.00	7.79	15000.0	99.9	V	302.0	4.7
934.30	35.13	46.00	10.87	15000.0	200.3	H	112.0	5.9

•. Detector : Quasi-Peak (6 dB Bandwidth: 120 kHz)
•.Measurement distance : 3 m
•.Frequency range : 30 MHz ~ 583 MHz
•.Operating Condition : Highest Output Power Transmitting Mode
•.Result : PASS

RE Test Report



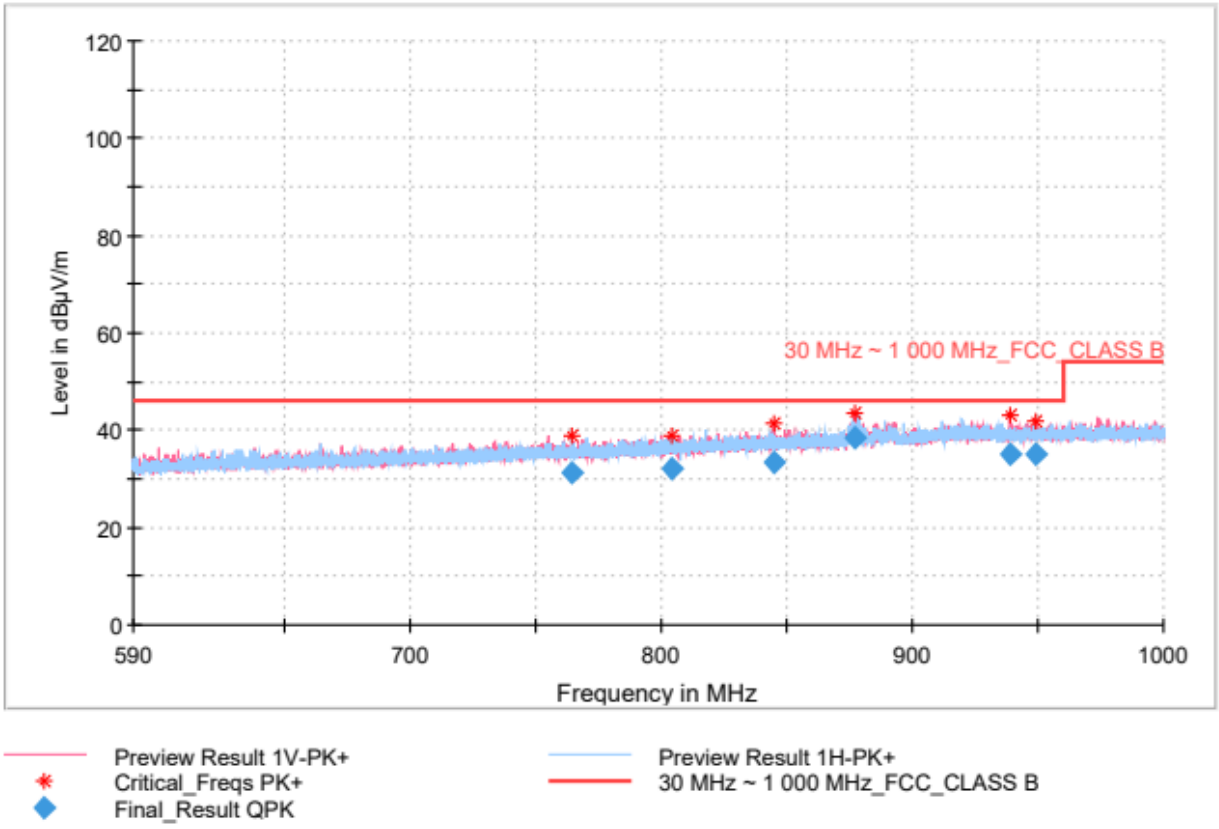
Preview Result 1V-PK+
Critical_Freqs PK+
Final_Result QPK
Preview Result 1H-PK+
30 MHz ~ 1 000 MHz_FCC_CLASS B

Final_Result

Frequency (MHz)	QuasiPeak (dBµV/m)	Limit (dBµV/m)	Margin (dB)	Meas. Time (ms)	Height (cm)	Pol	Azimuth (deg)	Corr. (dB)
100.02	17.68	43.50	25.82	15000.0	400.3	H	292.0	-15.3
209.10	23.12	43.50	20.38	15000.0	400.3	V	180.0	-11.3
225.76	38.09	46.00	7.91	15000.0	99.8	H	296.0	-11.3
231.02	41.21	46.00	4.79	15000.0	99.8	H	306.0	-10.9
233.23	41.04	46.00	4.96	15000.0	99.9	V	189.0	-10.5
552.65	32.71	46.00	13.29	15000.0	99.9	V	94.0	-2.7

•. Detector : Quasi-Peak (6 dB Bandwidth: 120 kHz)
•.Measurement distance : 3 m
•.Frequency range : 590 MHz ~ 1000 MHz
•.Operating Condition : Highest Output Power Transmitting Mode
•.Result : PASS

RE Test Report

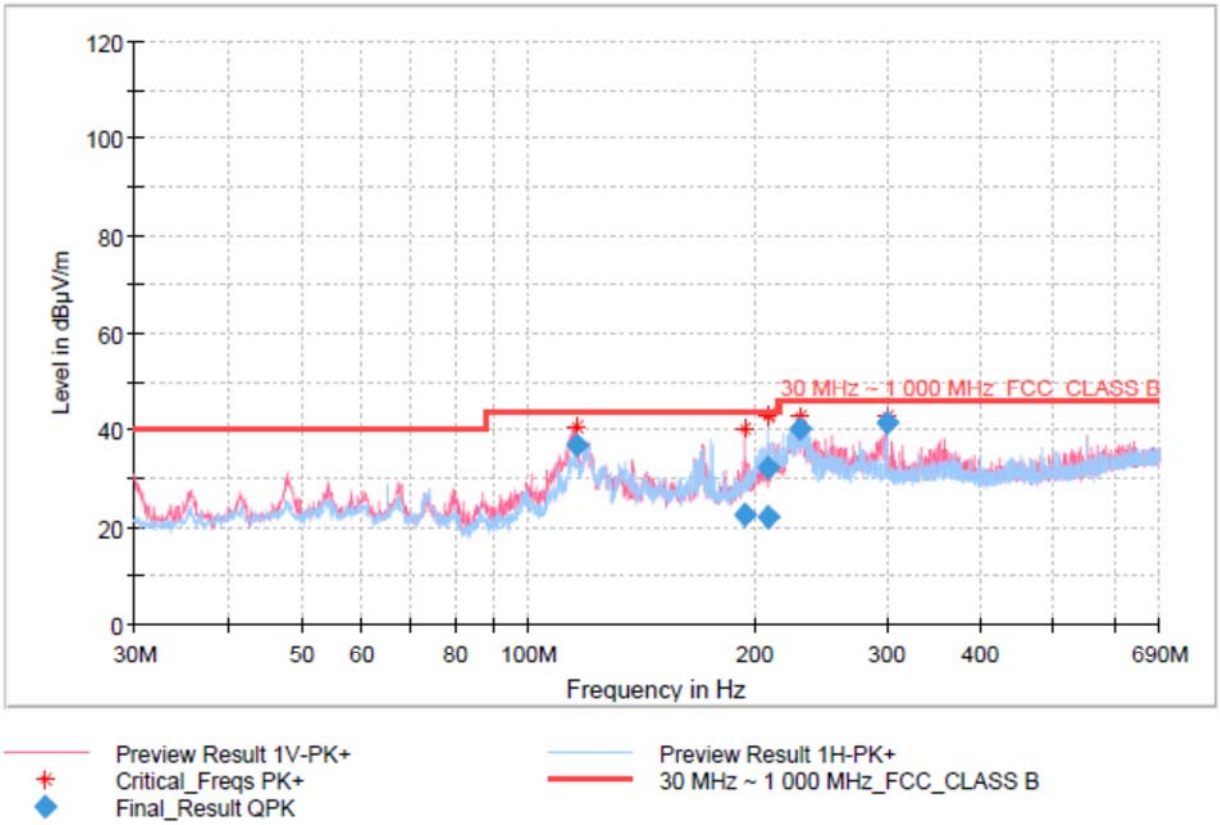


Final_Result

Frequency (MHz)	QuasiPeak (dBµV/m)	Limit (dBµV/m)	Margin (dB)	Meas. Time (ms)	Height (cm)	Pol	Azimuth (deg)	Corr. (dB)
764.76	31.35	46.00	14.65	15000.0	400.2	H	58.0	2.2
804.28	32.19	46.00	13.81	15000.0	99.9	H	132.0	2.9
845.12	33.27	46.00	12.73	15000.0	400.2	V	3.0	4.0
877.10	38.32	46.00	7.68	15000.0	99.9	V	80.0	4.7
938.86	35.13	46.00	10.87	15000.0	400.2	V	127.0	5.9
949.11	35.16	46.00	10.84	15000.0	400.2	V	185.0	5.9

•. Detector : Quasi-Peak (6 dB Bandwidth: 120 kHz)
•.Measurement distance : 3 m
•.Frequency range : 30 MHz ~ 690 MHz
•.Operating Condition : Highest Output Power Transmitting Mode
•.Result : PASS

RE Test Report

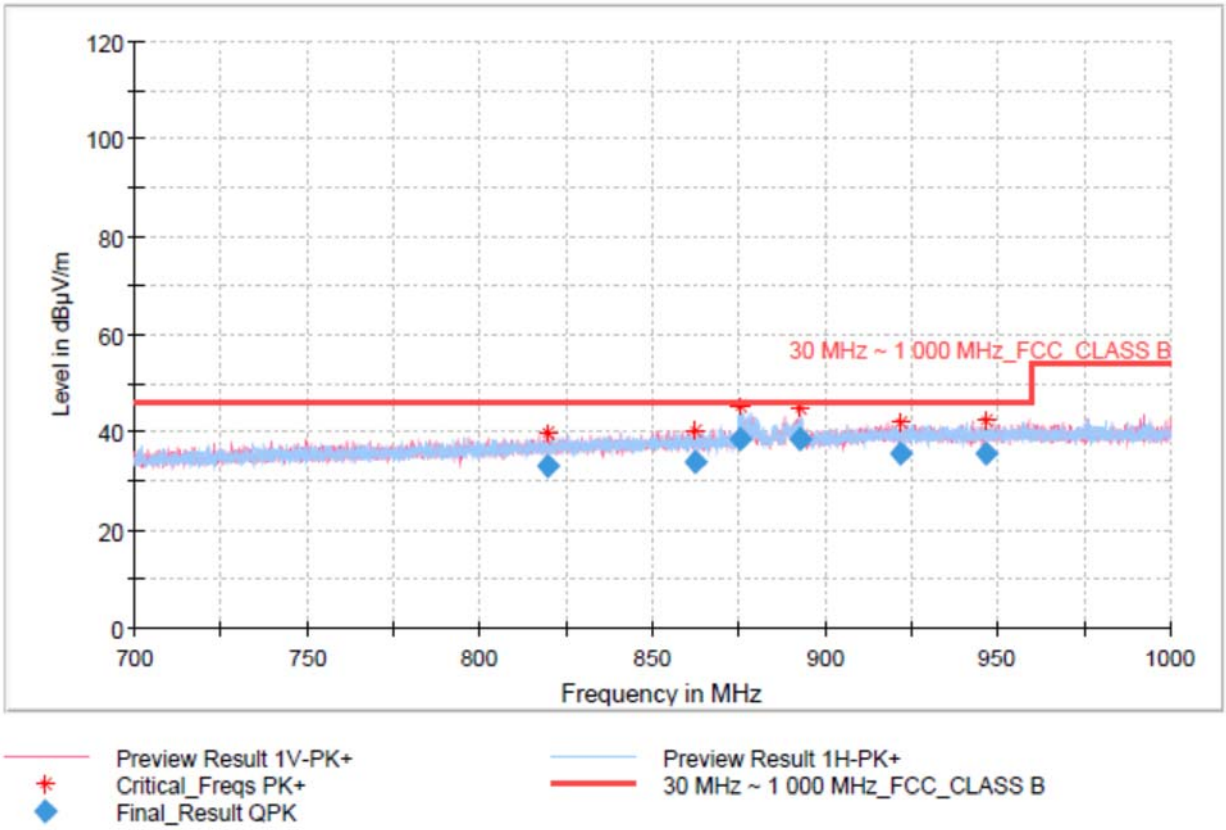


Final_Result

Frequency (MHz)	QuasiPeak (dBµV/m)	Limit (dBµV/m)	Margin (dB)	Meas. Time (ms)	Height (cm)	Pol	Azimuth (deg)	Corr. (dB)
115.72	36.83	43.50	6.67	15000.0	99.7	V	122.0	-13.4
194.59	22.50	43.50	21.00	15000.0	300.3	V	118.0	-11.2
208.20	32.25	43.50	11.25	15000.0	200.1	H	108.0	-11.3
208.61	21.80	43.50	21.70	15000.0	400.2	H	7.0	-11.3
229.40	40.11	46.00	5.89	15000.0	99.7	H	295.0	-11.1
299.86	41.20	46.00	4.80	15000.0	99.7	V	51.0	-7.3

•. Detector : Quasi-Peak (6 dB Bandwidth: 120 kHz)
•.Measurement distance : 3 m
•.Frequency range : 700 MHz ~ 1000 MHz
•.Operating Condition : Highest Output Power Transmitting Mode
•.Result : PASS

RE Test Report



Final_Result

Frequency (MHz)	QuasiPeak (dBµV/m)	Limit (dBµV/m)	Margin (dB)	Meas. Time (ms)	Height (cm)	Pol	Azimuth (deg)	Corr. (dB)
819.93	32.81	46.00	13.19	15000.0	299.8	V	194.0	3.5
862.45	33.80	46.00	12.20	15000.0	299.8	V	289.0	4.4
875.50	38.34	46.00	7.66	15000.0	200.0	H	48.0	4.7
893.01	38.31	46.00	7.69	15000.0	400.2	H	0.0	5.0
921.81	35.53	46.00	10.47	15000.0	400.2	H	340.0	6.0
946.94	35.37	46.00	10.63	15000.0	299.8	V	41.0	5.9

3.4.4.1.3 Test Data for Avove 1 GHz

•. Detector : Peak, Average (6 dB Bandwidth: 1 MHz)

•.Measurement distance : 3 m

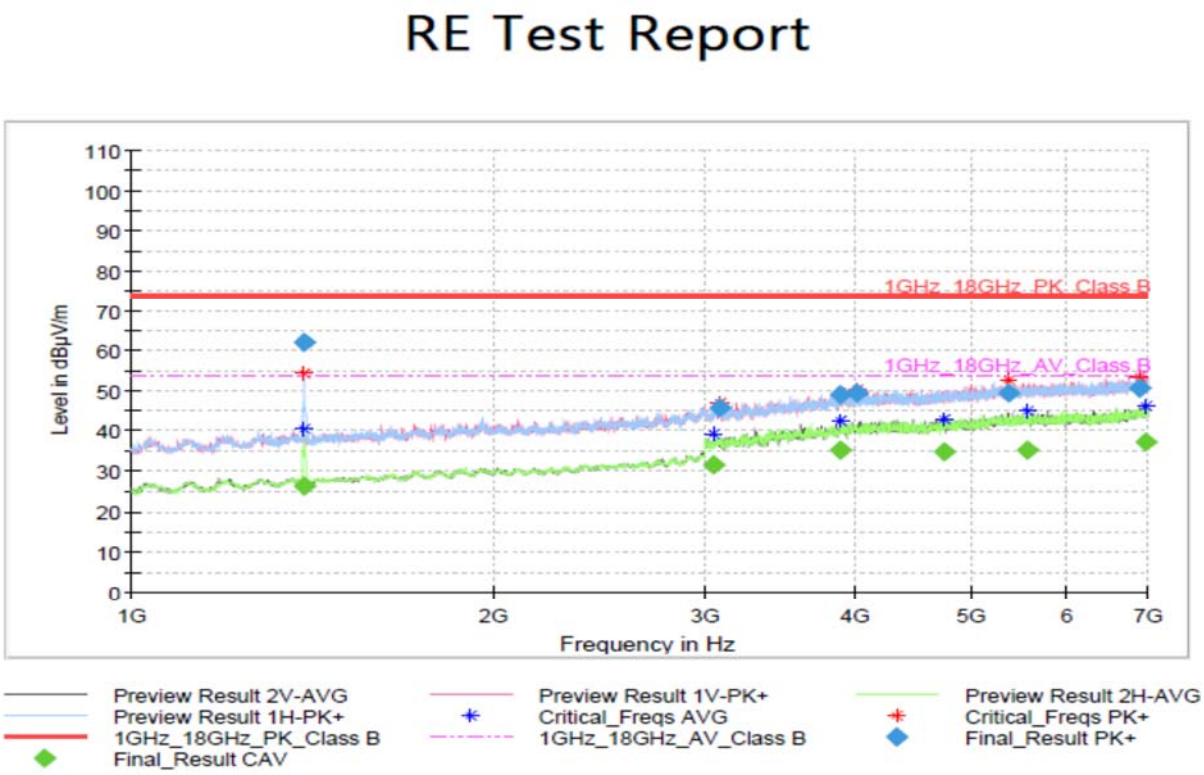
•.Frequency range : 1 GHz ~ 7.0 GHz

•.Operating Condition : Highest Output Power Transmitting Mode

•.Result : PASS

•.Result : PASS

•. 1 GHz ~ 7 GHz



Final_Result

Frequency (MHz)	MaxPeak (dBµV/m)	CAverage (dBµV/m)	Limit (dBµV/m)	Margin (dB)	Meas. Time (ms)	Height (cm)	Pol	Azimuth (deg)	Corr. (dB)
1393.00	---	26.38	54.00	27.62	15000.0	99.7	H	21.0	-2.9
1393.00	62.06	---	74.00	11.94	15000.0	99.8	H	21.0	-2.9
3052.00	---	31.52	54.00	22.48	15000.0	99.7	H	116.0	5.4
3084.25	45.73	---	74.00	28.27	15000.0	400.2	H	107.0	5.6
3882.25	---	35.23	54.00	18.77	15000.0	399.9	V	265.0	9.7
3886.00	49.28	---	74.00	24.72	15000.0	199.8	V	263.0	9.7
4002.25	49.42	---	74.00	24.58	15000.0	400.2	V	96.0	10.3
4733.50	---	34.76	54.00	19.24	15000.0	399.9	H	171.0	11.2
5361.25	49.68	---	74.00	24.32	15000.0	99.7	V	75.0	12.8
5550.25	---	35.14	54.00	18.86	15000.0	99.7	H	134.0	13.2
6886.75	50.80	---	74.00	23.20	15000.0	400.2	V	137.0	15.2
6970.00	---	37.40	54.00	16.60	15000.0	99.7	H	12.0	15.4

3.5 Conducted Emission Test

3.5.1 Requirement

• FCC Part15 subpart C Section 15.207

3.5.2 Test Procedure

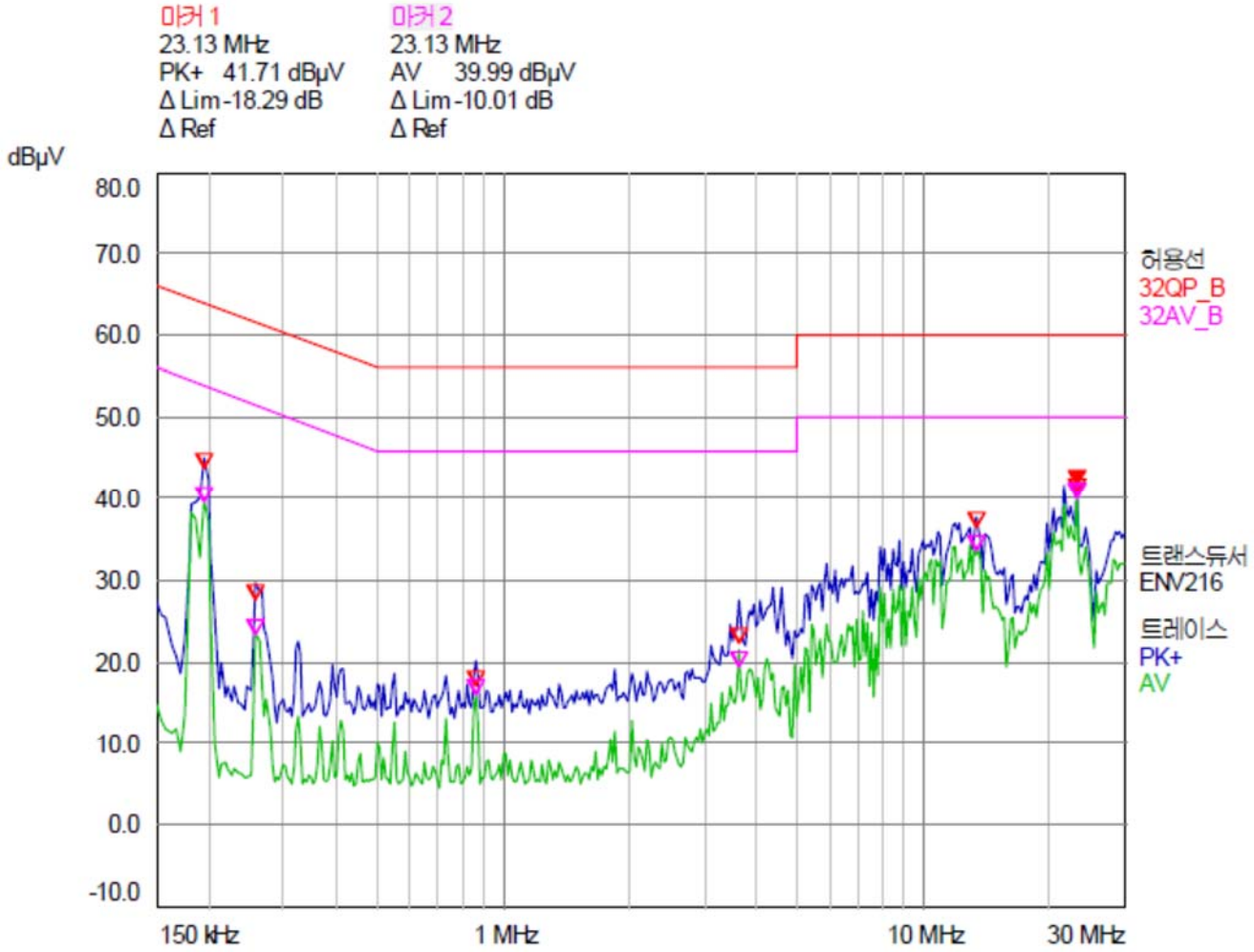
The EUT was placed on a wooden table, 0.8 m height above the floor. Power was fed to the EUT through a 50 Ω / 50 μH + 5 Ω Artificial Mains Network (AMN). The ground plane was electrically bonded to the reference ground system and all power lines were filtered from ambient.

3.6.3 Test data

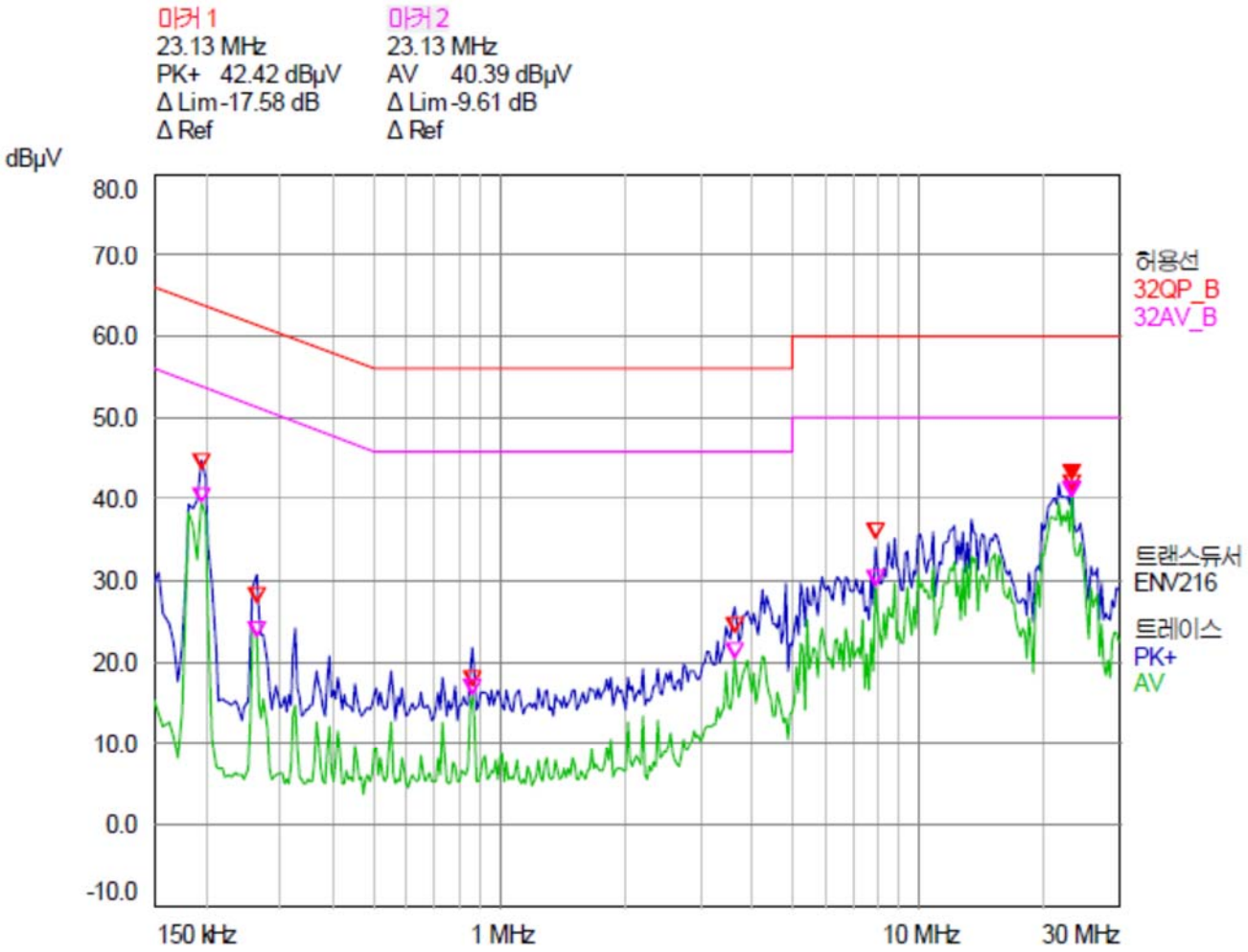
-. Resolution bandwidth : 9 kHz

-. Frequency range : 0.15 MHz ~ 30 MHz

-. Tested Line : HOT LINE



-. Tested Line : NEUTRAL LINE



FREQ	Corr.Fator [dB]		[H/N]	Quasi-peak [dBuV]			C-Average [dBuV]		
[MHz]	LISN	cables		Measured	limit	Margin	Measured	limit	Margin
0.19	9.60	9.92	H	43.80	63.86	20.06	39.60	53.86	14.26
0.26	9.60	9.92	H	27.57	61.50	33.93	23.36	51.50	28.14
0.86	9.60	9.95	H	17.04	56.00	38.96	16.05	46.00	29.95
3.62	9.63	10.03	H	22.31	56.00	33.69	19.30	46.00	26.70
13.39	9.69	10.25	H	36.44	60.00	23.56	33.65	50.00	16.35
23.13	9.69	10.40	N	41.21	60.00	18.79	40.38	50.00	9.62

3.6 Antenna Requirement

3.6.1 Requirement

- FCC Part15 subpart H 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 shall be considered sufficient to comply with the provisions of this section. 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. This requirement does not apply to intentional radiators that must be professionally installed, such as perimeter protection systems and some field disturbance sensors, or to other intentional radiators which, in accordance with §15.31(d), must be measured at the installation site. However, the installer shall be responsible for ensuring that the proper antenna is employed so that the limits in this part are not exceeded.

3.6.2 Result

- Must the EUT be professionally installed? ☒ YES ☐ NO
- Does the EUT have detachable antenna(s)? ☒ YES ☐ NO
- If detachable, is the antenna connector(s) non-standard? ☐ YES ☒ NO ☐ N/A

4. Test equipment list

Use	Model Number	Manufacturer	Description	Serial Number	Cal. Date.(Interval)
☒	AMP 20-1000	INFINITECH	BROADBAND PRE-AMP	2013 05 00003	Dec 22, 2022(1Y)
☒	DS 2000S	Innco GmbH	Turn Table	N/A	N/A
☒	MA4000-EP-HS	Innco GmbH	Antenna Mast	N/A	N/A
☒	MA4640-XP-ET	Innco GmbH	Tilt Antenna Mast	N/A	N/A
☒	CO3000	Innco GmbH	Controller	N/A	N/A
☒	CO3000	Innco GmbH	Controller	N/A	N/A
☒	N9020A	Agilent	Spectrum Analyzer	MY50200260	Dec 21, 2022(1Y)
☒	FSV3007	R&S	Spectrum Analyzer	101334	Aug 22, 2022(1Y)
☒	6502	EMCO	Loop Antenna	9609-3087	Nov 11, 2021(2Y)
☒	VULB 9168	SCHWARZBECK	Bi-Log Antenna	180	Nov 16, 2022(2Y)
☒	8449B	Agilent	Preamplifier	3008A02013	Dec 26, 2022(1Y)
☒	3115	EMCO	Horn Antenna	9402-4229	Aug 03, 2022(2Y)
☒	ESCI7	Rohde & Schwarz	EMI Test Receiver	100938	Dec 26, 2022(1Y)
☒	ESH-Z2	Rohde & Schwarz	Pulse Limter	101631	Dec 26, 2022(1Y)
☒	ENV216	Rohde & Schwarz	LISN	101264	Jul 05, 2022(1Y)
☒	66-30-33	Weinschel	Attenuator	CB0744	Dec 22, 2022(1Y)
☒	ES-SCAN	Rohde & Schwarz	EMI Software	N/A	N/A
☒	EMC32	Rohde & Schwarz	EMI Software	N/A	N/A
☐	SAS-574	A.H.Systems	Horn Antenna	595	Sep 07, 2021(2Y)
☐	PAM-840A	Com-power	Preamplifier	461334	Dec 23, 2022(1Y)