



FCC COMPLIANCE TEST REPORT

Technical Statement of Conformity
in accordance with FCC Part 15 Subpart C

The Product

Equipment Under Test	: Bluetooth Dongle
Model Number	: BT-503
Product Series	: BT-501
Report Number	: HA210029-RA
Issue Date	: 17-Feb-2021

is produced by
Mobility Sound Technology LTD.
5F, No.100, Jian 1st Road, ZhongHe Dist., New Taipei City #23585, Taiwan



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SL2-R2-E-0023, SL2-L1-E-0023

FCC Designation No. : TW1071, TW1163

TAF Accreditation No. : 1163

IC assigned Code : 11226A-2

VCCI Registration No. : R-12156, C-12329, T-10219, G-10696

ISED CAB identifier: TW1163

Caution :

This report sets forth our findings solely with respect to the test sample. The results set forth in this report are not indicative or representative of the quality or characteristics of the lot from which a test sample was taken or any similar or identical product unless specifically and expressly noted.

The test results shown in the test report are traceable to the national/international standard through the calibration report of the equipment.

Please note that the measurement uncertainty are provided for informational purpose only and are not used in determining the Pass/Fail results.

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The relevant information of the content of this test report is provided by the customer. For the correctness, appropriateness or completeness of the information provided by the customer, if there is any doubt or error, which will affect the validity of the results of this test report, the laboratory will not be liable Related responsibilities.

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Release control Record

Report Version	Description	Issued Date
V00	Original release.	17-Feb-2021



Test Result Certification

Applicant	: Mobility Sound Technology LTD.
Address of Applicant	: 5F, No.100, Jian 1 st Road, ZhongHe Dist., New Taipei City #23585, Taiwan
Manufacturer	: Mobility Sound Technology LTD.
Address of Manufacturer	: 5F, No.100, Jian 1 st Road, ZhongHe Dist., New Taipei City #23585, Taiwan
Trade Name	: MobilitySound
Equipment Under Test	: Bluetooth Dongle
Model Number	: BT-503
Product Series	: BT-501
FCC ID	: XTS-BT-503
Filing Type	: Certification
Sample Received Date	: 13-Jan-2020
Test Standard	:

☒ FCC Part 15 Subpart C §15.249

Deviations from standard test methods & any other specifications : NONE

Remark:

1. This report details the results of the test carried out on one sample.
2. The test data, data evaluation, test procedures, and equipment configurations shown in this report were made in accordance with the procedures given in both ANSI C63.10 (2013) and the energy emitted by the sample EUT tested as described in this report is in compliance with the requirements of FCC Rules Part 15.203, 15.207, 15.209, 15.249.
3. This report applies to the above sample only and shall not be reproduced in part without written approval of HongAn Technology Co., Ltd.
4. Test Location: HongAn Technology Co., Ltd., No.15-1 Cweishuh Keng, Cweipin Village, Linkou Dist., New Taipei City, Taiwan, R.O.C. FCC Designation No.: TW1071, TW1163.

Tested by:

Andrew Lin

Andrew Lin / ENG. Dept. Staff

2021-01-25

Approved by:

Eason Hsieh

Eason Hsieh / Section Manager

Date:

2021-02-17



Summary of Test Result

	Test Item	Applicable Standard	Test Result
1	Antenna Requirement	FCC part 15 subpart C §203	Compliance
2	Conducted Emission	FCC part 15 subpart C §207	Compliance
3	Restricted Band of Operation	FCC part 15 subpart C §205	Compliance
4	Radiated Emission	FCC part 15 subpart C §209	Compliance
5	Field Strength	FCC part 15 subpart C §249(a)	Compliance
6	Out of Band Emission	FCC part 15 subpart C §249(d)	Compliance
7	20dB Bandwidth	FCC part 15 subpart C §215(c)	Compliance

1 General Description

1.1 Description of EUT

Equipment Under Test	:	Bluetooth Dongle							
Model Number of EUT	:	BT-503							
Product Series	:	BT-501							
Power Supply	:	lithium battery: DC 3.7 V							
Frequency Range	:	2402~2480 MHz							
Number of Channels	:	BR+EDR:79 Channels BLE:40 Channels							
Carrier Frequency of Each Channel	:	BR+EDR:							
		00	2402	20	2422	40	2442	60	2462
		01	2403	21	2423	41	2443	61	2463
		02	2404	22	2424	42	2444	62	2464
		03	2405	23	2425	43	2445	63	2465
		04	2406	24	2426	44	2446	64	2466
		05	2407	25	2427	45	2447	65	2467
		06	2408	26	2428	46	2448	66	2468
		07	2409	27	2429	47	2449	67	2469
		08	2410	28	2430	48	2450	68	2470
		09	2411	29	2431	49	2451	69	2471
		10	2412	30	2432	50	2452	70	2472
		11	2413	31	2433	51	2453	71	2473
		12	2414	32	2434	52	2454	72	2474
		13	2415	33	2435	53	2455	73	2475
		14	2416	34	2436	54	2456	74	2476
		15	2417	35	2437	55	2457	75	2477
		16	2418	36	2438	56	2458	76	2478
		17	2419	37	2439	57	2459	77	2479
		18	2420	38	2440	58	2460	78	2480
		19	2421	39	2441	59	2461	-	-
		BLE:							
		00	2402	10	2422	20	2442	30	2462
		01	2404	11	2424	21	2444	31	2464
02	2406	12	2426	22	2446	32	2466		
03	2408	13	2428	23	2448	33	2468		
04	2410	14	2430	24	2450	34	2470		



		05	2412	15	2432	25	2452	35	2472
		06	2414	16	2434	26	2454	36	2474
		07	2416	17	2436	27	2456	37	2476
		08	2418	18	2438	28	2458	38	2478
		09	2420	19	2440	29	2460	39	2480
Antenna Specification	:	Chip Antenna/ Gain: 1.5 dBi							
Modulation Technique	:	FHSS BR : GFSK EDR : $\pi/4$ -DQPSK, 8-DPSK DTS BLE : GFSK							
Transmit Data Rate	:	BR : 1Mbps EDR : 2Mbps, 3Mbps BLE : 1Mbps							
Specification	:	Dimensions : 2.2 cm (L) X 3.7 cm (W) X 3.9 cm (H) Weight : 15 g Intended Function : The EUT is a Bluetooth Dongle. Product Variance : N/A.							

1.2 Test Instruments

Instrument Name	Manufacturer Mode	Model Number	Serial Number	Last Cal. Date	Next Cal. Date
Spectrum Analyzer	R&S	FSV 40	101296	08-Apr-2020	07-Apr-2021
ESCI 7 EMI Test Receiver	R&S	ESCI 7	100931	07-Aug-2020	06-Aug-2021
Pre-Amplifier	Schaffner	CPA9231A	0405	17-Dec-2020	16-Dec-2021
Pre-Amplifier	EMCI	EMC051845SE	980692	03-Dec-2020	02-Dec-2021
Pre-Amplifier	EMCI	EMC184045SE	980699	22-Apr-2020	21-Apr-2021
Bilog Antenna	TESEQ	CBL6111D	47016	24-Jul-2020	23-Jul-2021
Horn Antenna	EMCO	3115	9912-5992	20-May-2020	19-May-2021
Horn Antenna	Com-Power	AH-840	101042	22-May-2020	21-May-2021
Cable	HongAn	8D-FB	HA2-10MSite	21-Aug-2020	20-Aug-2021
Cable	EMCI	EMC104-SM-N M-1000	191104	03-Dec-2020	02-Dec-2021
Cable	EMCI	EMC104-SM-N M-8000	191103	03-Dec-2020	02-Dec-2021
Cable	EMCI	EMC102-KM-K M-1000	200301	22-Apr-2020	21-Apr-2021
Cable	EMCI	EMC102-KM-K M-8000	200213	22-Apr-2020	21-Apr-2021
LISN	EMCO	3810/2NM	9702-1819	17-Jul-2020	16-Jul-2021
LISN	SCHWARZ BECK	NSLK 8127	01021	11-Sep-2020	10-Sep-2021
Cable	HongAn	RG 223/U	HA2-CE	21-Aug-2020	20-Aug-2021
Software	Audix	e3 (Ver:6.101006a)	N/A	N/A	N/A

※ The test equipments used are calibrated and can be traced to National ITRI and International Standards.

1.3 Auxiliary Equipments

1.3.1. Provided by HongAn Technology Co., Ltd. for Test.

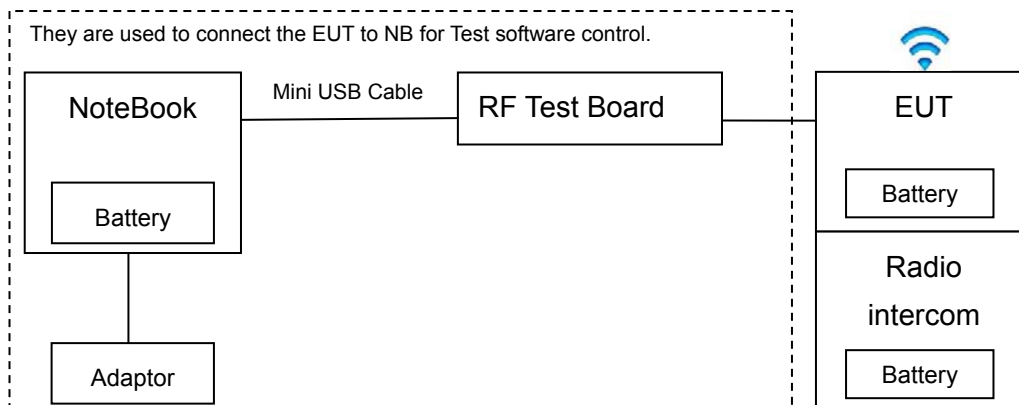
No.	Equipment	Model No.	Serial No.	EMC Approved	Brand	Power Cord
01	NoteBook	X542U	HBN0CV11S7834 65	"CE Mark,	X542U	Adapter to Notebook Input : AC 100-240V~50/60Hz 1.6A Output : 19V 3.42A Non-shielded, Un-detachable, 2.2m, W/O Core
02	Adaptor	PSAA10A-050Q	N/A	R33084	HTC	Input:100-240Vac,0.5A,50-60Hz Output:5Vdc,2A

1.3.2. Provided by the Manufacturer

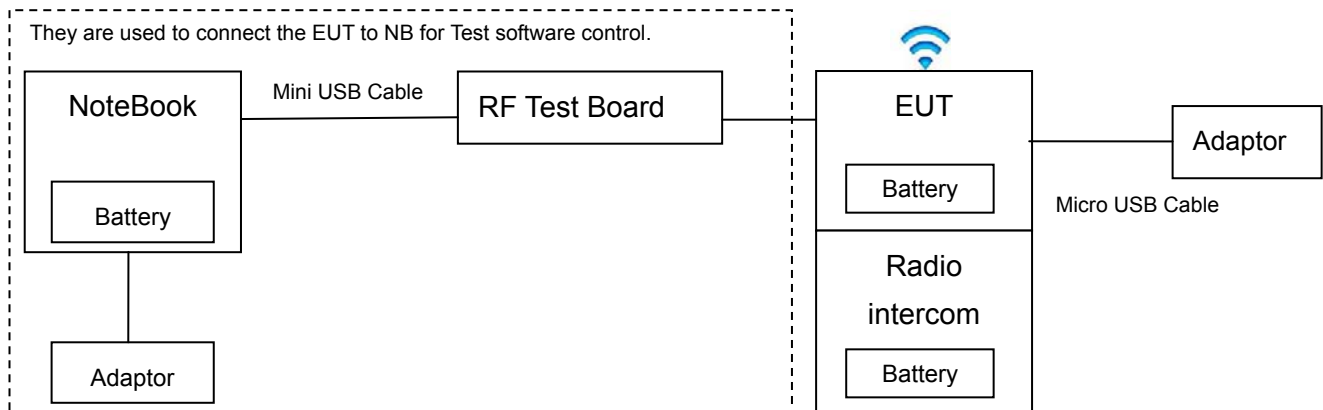
No.	Equipment	Model No.	Serial No.	EMC Approved	Brand	Specification
01	BT Test Board	USB-SPI	N/A	N/A	CSR	Non-shielded, Detachable 0.2m, w/o core
02	Radio Intercom	CP200d	N/A	N/A	MOTOROLA	Battery: DC 7.4V
03	Mini USB Cable	N/A	N/A	N/A	N/A	Non-Shielded; Detachable, 1m w/o core
04	Micro USB Cable	N/A	N/A	N/A	N/A	Shielded; Detachable, 1.8m w/o core

1.4 EUT SETUP

1.4.1 SETUP for Radiated Test



1.4.2 SETUP for Conducted Test



Note: Main Test Sample: BT-503

1.5 Identifying the Final Test Mode

1.5.1 BR+EDR

- Mode 1: BR(1Mbps) 2402 MHz TX
- Mode 2: BR(1Mbps) 2441 MHz TX
- Mode 3: BR(1Mbps) 2480 MHz TX
- Mode 4: EDR(2Mbps) 2402 MHz TX
- Mode 5: EDR(2Mbps) 2441 MHz TX
- Mode 6: EDR(2Mbps) 2480 MHz TX
- Mode 7: EDR(3Mbps) 2402 MHz TX
- Mode 8: EDR(3Mbps) 2441 MHz TX
- Mode 9: EDR(3Mbps) 2480 MHz TX

Note:

1. After pre-test, we identified that the Test Mode 2 was most likely to produce the maximum transmitting power and cause maximum disturbance. Therefore, the Final Assessment was performed for the worst case.
2. The EUT was operated in the engineering mode to fix the TX frequency that was for the purpose of the measurements.
3. Channel Low (2402 MHz), Mid (2441 MHz) and High (2480 MHz) were chosen for full testing.
4. According to its specifications, the EUT must comply with the requirements of the Section 15.203, 15.207, 15.209 and 15.249 under the FCC Rules Part 15 Subpart C.
5. Test Software: Blue Test3 V-2-6-8-1467; RF parameter setting : BR 、 EDR: Channel 00 , 39 , 78 / Data Rate : 1,2,3 Mbps / TX POWER : 50.

1.5.2 BLE

- Mode 10: 2402 MHz TX
- Mode 11: 2442 MHz TX



Mode 12: 2480 MHz TX

Note:

1. After pre-test, we identified that the Test Mode 11 was most likely to produce the maximum transmitting power and cause maximum disturbance. Therefore, the Final Assessment was performed for the worst case.
2. The EUT was operated in the engineering mode to fix the TX frequency that was for the purpose of the measurements.
3. Channel Low (2402 MHz), Mid (2442 MHz) and High (2480 MHz) were chosen for full testing.
4. According to its specifications, the EUT must comply with the requirements of the Section 15.203, 15.207, 15.209 and 15.249 under the FCC Rules Part 15 Subpart C.
5. Test Software: Blue Test3 V-2-6-8-1467; RF parameter setting : Channel 00 , 20 , 39 / Data Rate : 1 Mbps / TX POWER : 50.

1.6 Final Test Mode

1.6.1 BR+EDR

Conducted Emission: Mode2.

Radiated Emission (30~1000 MHz): Mode2.

Radiated Emission (1~26.5GHz): All Modes.

1.6.2 BLE

Conducted Emission: Mode11.

Radiated Emission (30~1000 MHz): Mode11.

Radiated Emission (1~26.5GHz): All Modes.

1.7 Condition of Power Supply

DC 5V through Radio intercom

1.8 EUT Configuration

1. Setup the EUT as shown in Sec.1.4 Block Diagram.
2. Turn on the power of all equipments.
3. Activate the selected Final Test Mode.

1.9 Test Methodology

The tests documented in this report were performed in accordance with ANSI C63.10 (2013) and FCC CFR 47 15.203, 15.207, 15.209 and 15.249.

1.10 General Test Procedures

Conducted Emissions

The EUT is set according to the requirements in Section 6.2 of ANSI C63.10 (2013).



Radiated Emissions

The EUT is set according to the requirements in Section 6.3 of ANSI C63.10 (2013).

1.11 Modification

N/A

1.12 FCC Part 15.205 restricted bands of operations

(a) Except as shown in paragraph (d) of this section, only spurious emissions are permitted in any of the frequency bands listed below:

MHz	MHz	MHz	GHz
0.090-0.110	16.42-16.423	399.9-410	4.5-5.15
¹ 0.495-0.505	16.69475-16.69525	608-614	5.35-5.46
2.1735-2.1905	16.80425-16.80475	960-1240	7.25-7.75
4.125-4.128	25.5-25.67	1300-1427	8.025-8.5
4.17725-4.17775	37.5-38.25	1435-1626.5	9.0-9.2
4.20725-4.20775	73-74.6	1645.5-1646.5	9.3-9.5
6.215-6.218	74.8-75.2	1660-1710	10.6-12.7
6.26775-6.26825	108-121.94	1718.8-1722.2	13.25-13.4
6.31175-6.31225	123-138	2200-2300	14.47-14.5
8.291-8.294	149.9-150.05	2310-2390	15.35-16.2
8.362-8.366	156.52475-156.52525	2483.5-2500	17.7-21.4
8.37635-8.38675	156.7-156.9	2690-2900	22.01-23.12
8.41425-8.41475	162.0125-167.17	3260-3267	23.6-24.0
12.29-12.293	167.72-173.2	3332-3339	31.2-31.8
12.51975-12.52025	240-285	3345.8-3358	36.43-36.5
12.57675-12.57725	322-335.4	3600-4400	(²)
13.36-13.41			

¹ Until February 1, 1999, this restricted band shall be 0.490-0.510 MHz

² Above 38.6

(b) Except as provided in paragraphs (d) and (e), the field strength of emissions appearing within these frequency bands shall not exceed the limits shown in Section 15.209. At frequencies equal to or less than 1000 MHz, compliance with the limits in Section 15.209 shall be demonstrated using measurement instrumentation employing a CISPR quasi-peak detector. Above 1000 MHz, compliance with the emission limits in Section 15.209 shall be demonstrated based on the average value of the measured emissions. The provisions in Section 15.35 apply to these measurements.

2 Power line Conducted Emission Measurement

2.1 Test Instruments

Refer to Sec. 1.2 Test Instruments.

2.2 Test Arrangement and Procedure

1. The EUT was placed on a table, which is 0.8m above ground plane.
2. Maximum procedure was performed on the six highest emissions to ensure EUT compliance.
3. Repeat above procedures until all frequency measured were complete.

2.3 Limit (§ 15.207)

For an intentional radiator which is designed to be connected to the public utility (AC) power line, the radio frequency voltage that is conducted back onto the AC power line on any frequency or frequencies within the band 150 kHz to 30 MHz shall not exceed 250 microvolts (The limit decreases linearly with the logarithm of the frequency in the range 0.15 MHz to 0.50 MHz). The limits at specific frequency range is listed as follows:

Frequency (MHz)	Limits (dBuV)	
	Q.P. (Quasi-Peak)	A.V. (Average)
0.15 to 0.50	66 to 56	56 to 46
0.50 to 5.0	56	46
5.0 to 30	60	50

Compliance with this provision shall be based on the measurement of the radio frequency voltage between each power line (LINE and NEUTRAL) and ground at the power terminals.

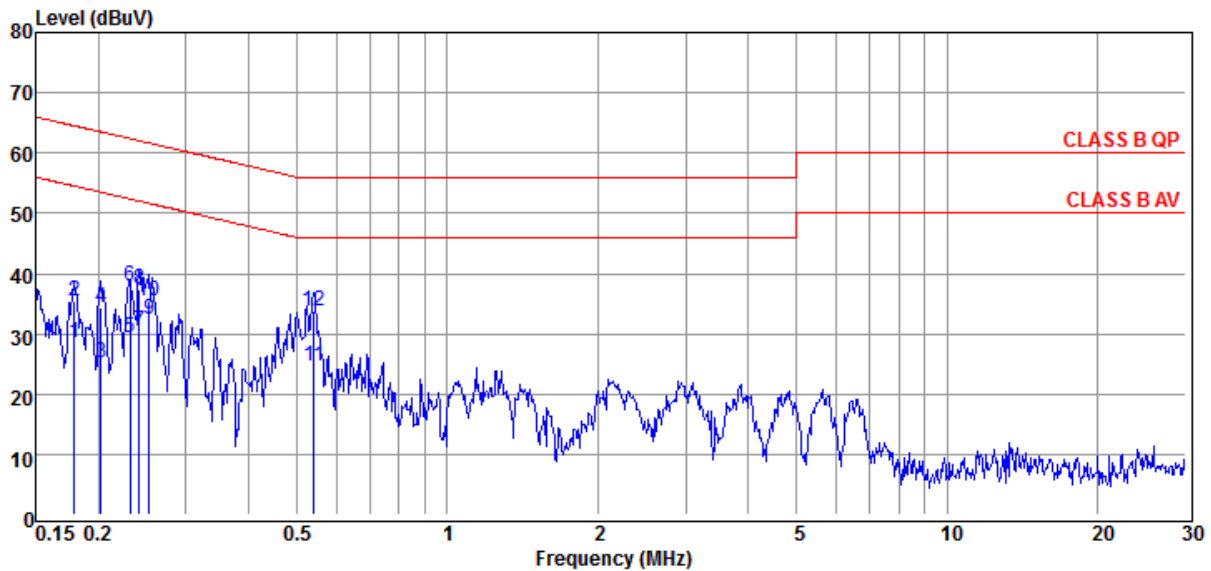
2.4 Test Result

Compliance

The final test data are shown on the following page(s).

Conducted Emission Test Data

Temperature	: 25.1°C	Humidity	: 68%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Power Line	: Line	Channel	: 39
EUT Position	: X axis	Mode	: 2



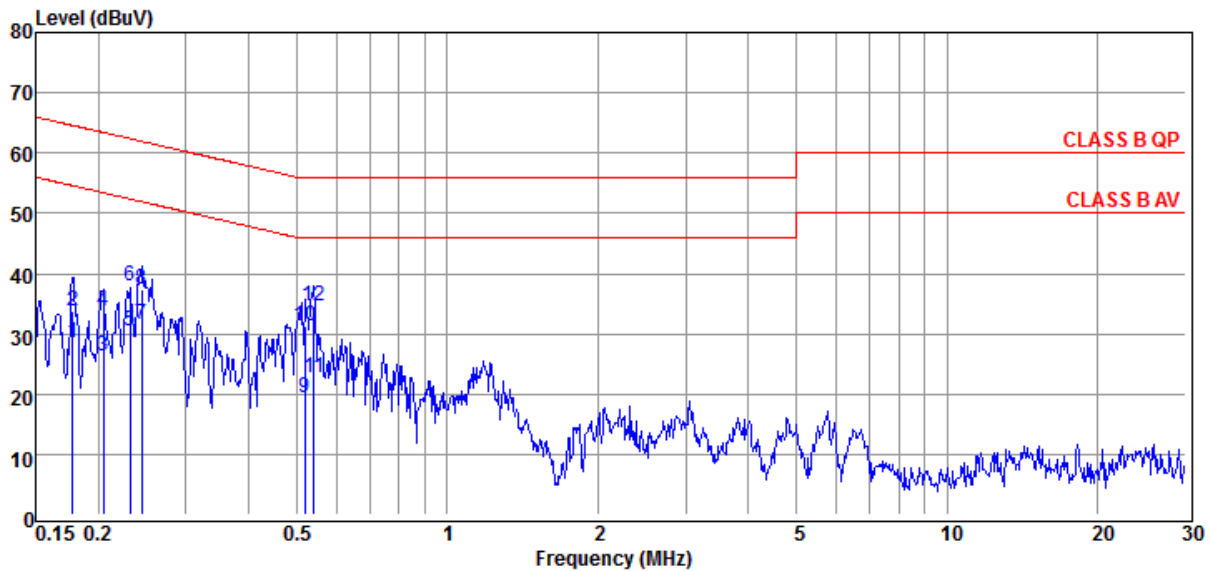
No.	Freq MHz	Reading dBμV	C.F dB	Result dBμV	Limit dBμV	Margin dB	Power Line	Remark
1	0.180	28.47	0.07	28.54	54.50	-25.96	LINE	Average
2	0.180	35.50	0.07	35.57	64.50	-28.93	LINE	QP
3	0.203	25.16	0.07	25.23	53.49	-28.26	LINE	Average
4	0.203	34.14	0.07	34.21	63.49	-29.28	LINE	QP
5	0.232	29.17	0.07	29.24	52.39	-23.15	LINE	Average
6	0.232	37.94	0.07	38.01	62.39	-24.38	LINE	QP
7	0.242	30.40	0.07	30.47	52.04	-21.57	LINE	Average
8	0.242	37.34	0.07	37.41	62.04	-24.63	LINE	QP
9	0.253	32.45	0.07	32.52	51.64	-19.12	LINE	Average
10	0.253	35.49	0.07	35.56	61.64	-26.08	LINE	QP
11	0.541	24.64	0.09	24.73	46.00	-21.27	LINE	Average
12	0.541	33.55	0.09	33.64	56.00	-22.36	LINE	QP

Note 1. C.F (Correction Factor) = LISN Factor + Cable loss °

Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Conducted Emission Test Data

Temperature	: 25.1°C	Humidity	: 68%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Power Line	: Neutral	Channel	: 39
EUT Position	: X axis	Mode	: 2



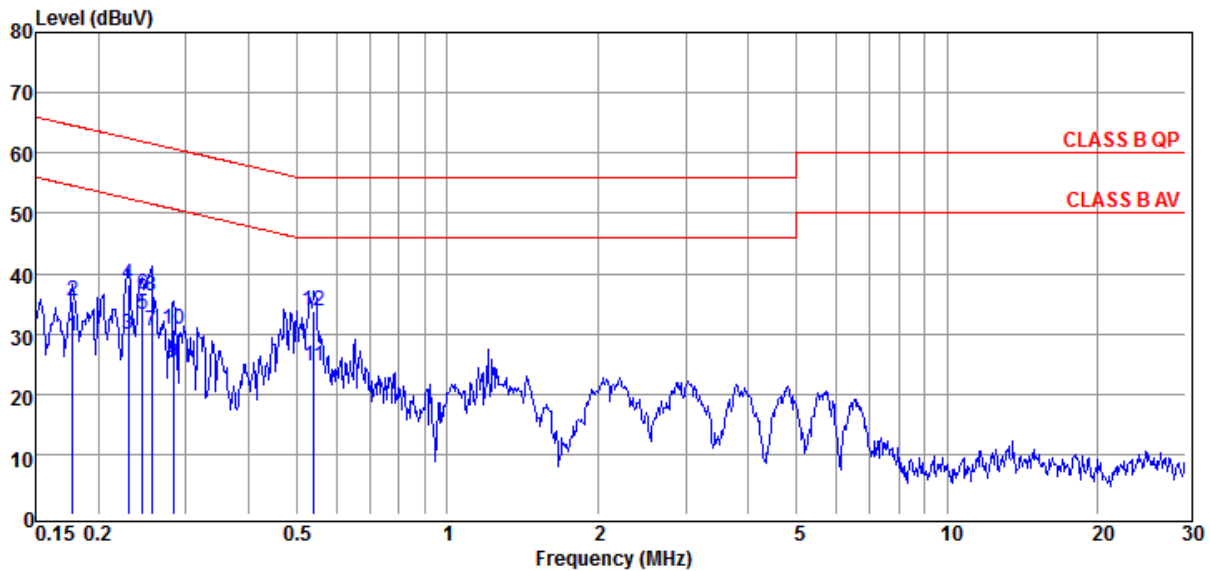
No.	Freq MHz	Reading dBμV	C.F dB	Result dBμV	Limit dBμV	Margin dB	Power Line	Remark
1	0.178	28.34	0.07	28.41	54.59	-26.18	NEUTRAL	Average
2	0.178	33.84	0.07	33.91	64.59	-30.68	NEUTRAL	QP
3	0.205	26.13	0.07	26.20	53.40	-27.20	NEUTRAL	Average
4	0.205	33.81	0.07	33.88	63.40	-29.52	NEUTRAL	QP
5	0.232	30.33	0.07	30.40	52.39	-21.99	NEUTRAL	Average
6	0.232	37.72	0.07	37.79	62.39	-24.60	NEUTRAL	QP
7	0.244	31.38	0.07	31.45	51.95	-20.50	NEUTRAL	Average
8	0.244	37.37	0.07	37.44	61.95	-24.51	NEUTRAL	QP
9	0.518	19.34	0.09	19.43	46.00	-26.57	NEUTRAL	Average
10	0.518	31.25	0.09	31.34	56.00	-24.66	NEUTRAL	QP
11	0.541	22.53	0.09	22.62	46.00	-23.38	NEUTRAL	Average
12	0.541	34.54	0.09	34.63	56.00	-21.37	NEUTRAL	QP

Note 1. C.F (Correction Factor) = LISN Factor + Cable loss °

Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Conducted Emission Test Data

Temperature	: 25.1°C	Humidity	: 68%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Power Line	: Line	Channel	: 20
EUT Position	: X axis	Mode	: 11



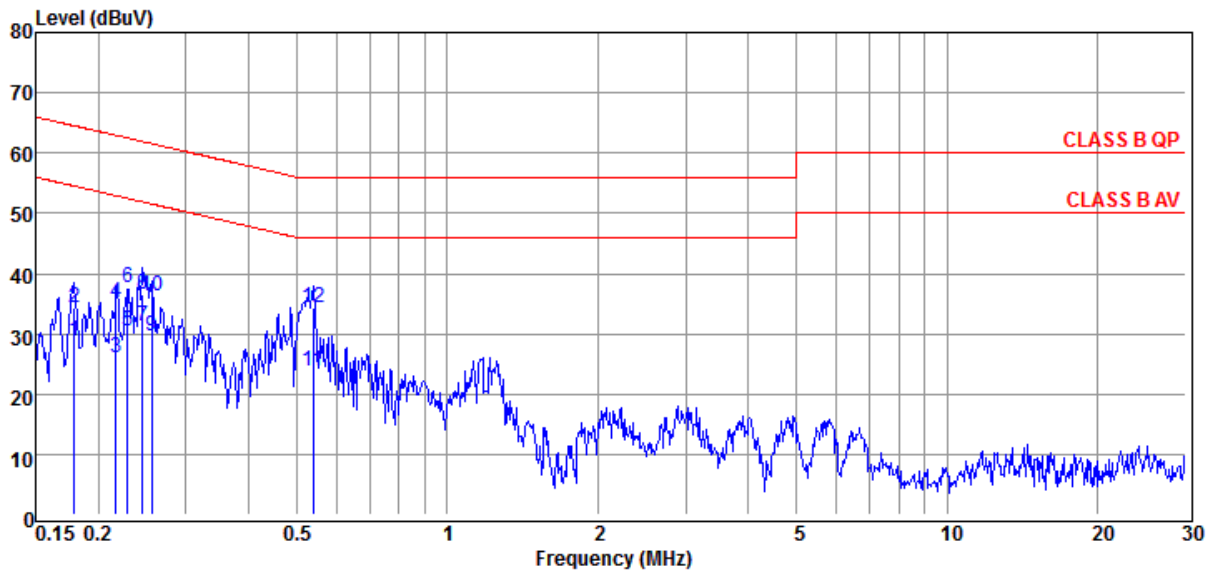
No.	Freq MHz	Reading dBuV	C.F dB	Result dBuV	Limit dBuV	Margin dB	Power Line	Remark
1	0.178	29.50	0.07	29.57	54.59	-25.02	LINE	Average
2	0.178	35.33	0.07	35.40	64.59	-29.19	LINE	QP
3	0.230	29.78	0.07	29.85	52.44	-22.59	LINE	Average
4	0.230	38.26	0.07	38.33	62.44	-24.11	LINE	QP
5	0.246	33.12	0.07	33.19	51.91	-18.72	LINE	Average
6	0.246	36.52	0.07	36.59	61.91	-25.32	LINE	QP
7	0.256	30.34	0.07	30.41	51.56	-21.15	LINE	Average
8	0.256	36.29	0.07	36.36	61.56	-25.20	LINE	QP
9	0.283	25.08	0.07	25.15	50.72	-25.57	LINE	Average
10	0.283	30.73	0.07	30.80	60.72	-29.92	LINE	QP
11	0.541	24.44	0.09	24.53	46.00	-21.47	LINE	Average
12	0.541	33.72	0.09	33.81	56.00	-22.19	LINE	QP

Note 1. C.F (Correction Factor) = LISN Factor + Cable loss °

Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Conducted Emission Test Data

Temperature	: 25.1°C	Humidity	: 68%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Power Line	: Neutral	Channel	: 20
EUT Position	: X axis	Mode	: 11



No.	Freq MHz	Reading dBuV	C.F dB	Result dBuV	Limit dBuV	Margin dB	Power Line	Remark
1	0.180	28.82	0.07	28.89	54.50	-25.61	NEUTRAL	Average
2	0.180	34.14	0.07	34.21	64.50	-30.29	NEUTRAL	QP
3	0.217	25.90	0.07	25.97	52.92	-26.95	NEUTRAL	Average
4	0.217	35.19	0.07	35.26	62.92	-27.66	NEUTRAL	QP
5	0.229	30.46	0.07	30.53	52.48	-21.95	NEUTRAL	Average
6	0.229	37.64	0.07	37.71	62.48	-24.77	NEUTRAL	QP
7	0.246	31.22	0.07	31.29	51.91	-20.62	NEUTRAL	Average
8	0.246	36.44	0.07	36.51	61.91	-25.40	NEUTRAL	QP
9	0.256	29.64	0.07	29.71	51.56	-21.85	NEUTRAL	Average
10	0.256	36.17	0.07	36.24	61.56	-25.32	NEUTRAL	QP
11	0.538	23.83	0.09	23.92	46.00	-22.08	NEUTRAL	Average
12	0.538	34.12	0.09	34.21	56.00	-21.79	NEUTRAL	QP

Note 1. C.F (Correction Factor) = LISN Factor + Cable loss °

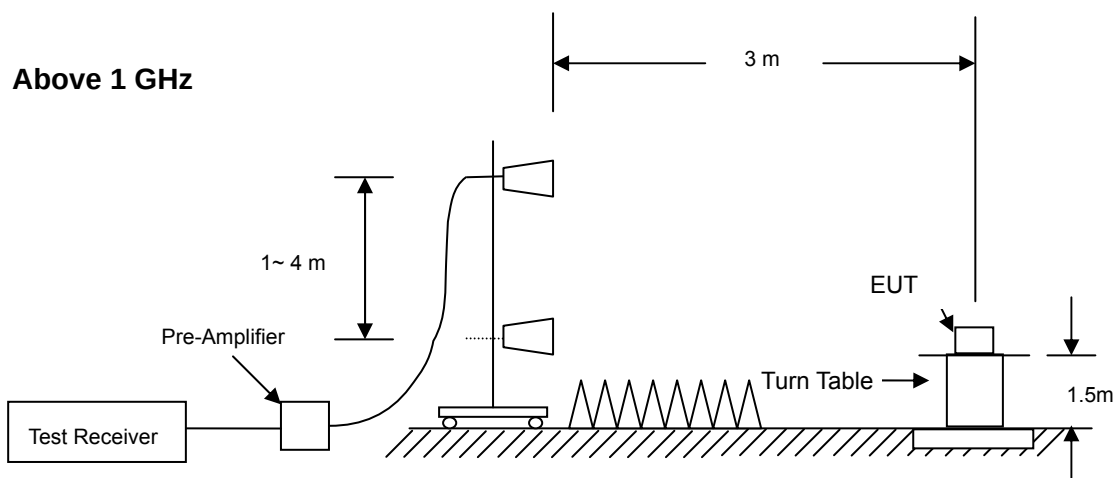
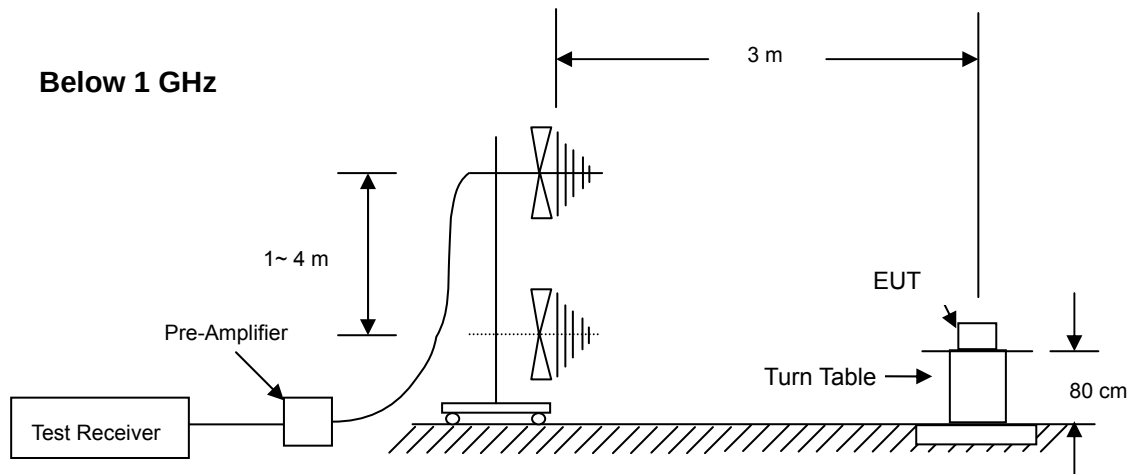
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

3 Radiated Emission Test

3.1 Test Instruments

Refer to Sec. 1.2 Test Instruments.

3.2 Test Arrangement and Procedure



1. The EUT is placed on a turntable, which is 0.8 m (below 1GHz) and 1.5m (above 1GHz) above ground plane.
2. The turntable shall be rotated for 360 degrees to determine the position of maximum emission level.
3. EUT is set 3 m away from the receiving antenna, which is varied from 1 m to 4 m to find out the highest emissions.
4. Maximum procedure was performed on the six highest emissions to ensure EUT compliance.
5. And also, each emission was to be maximized by changing the polarization of receiving antenna both horizontal and vertical.
6. Set the spectrum analyzer. Refer to each test results for detail setting up.

7. Repeat above procedures until the measurements for all frequencies are complete.

3.3 Limit of Field Strength of Fundamental (§ 15.249)

The field strength of emissions from intentional radiators operated within these frequency bands shall comply with the following:

Fundamental Frequency (MHz)	Field strength of fundamental (microvolts/ meter)	Field strength of harmonics (meters)
902-928	50	500
2400-2483.5	50	500
5725-5875	50	500
24000-24250	250	2500

Note:

- Field strength limits are specified at a distance of 3 meters.
- For frequencies above 1000 MHz, the field strength limits in above table are based on average limits. However, the peak field strength of any emission shall not exceed the maximum permitted average limits specified above by more than 20 dB under any condition of modulation.

3.4 Limit of Spurious Emission (§ 15.209)

Emissions radiated outside of the specified frequency bands, except for harmonics, shall be attenuated by at least 50 dB below the level of the fundamental or to the general radiated emission limits in § 15.209, whichever is lesser attenuation.

Frequency (MHz)	Field strength (microvolts/ meter)	Measurement distance (meters)
0.009-0.490	2400/F(kHz)	300
0.490-1.705	24000/F(kHz)	30
1.705-30.0	30	30
30-88	100**	3
88-216	150**	3
216-960	200**	3
Above 960	500	3

** Except as provided in paragraph (g), fundamental emissions from intentional radiators operating under this section shall not be located in the frequency bands 54-72 MHz, 76-88 MHz, 174-216 MHz or 470-806 MHz. However, operation within these frequency bands is permitted under other sections of this part, e.g. §§ 15.231 and 15.241.

3.5 Test Result

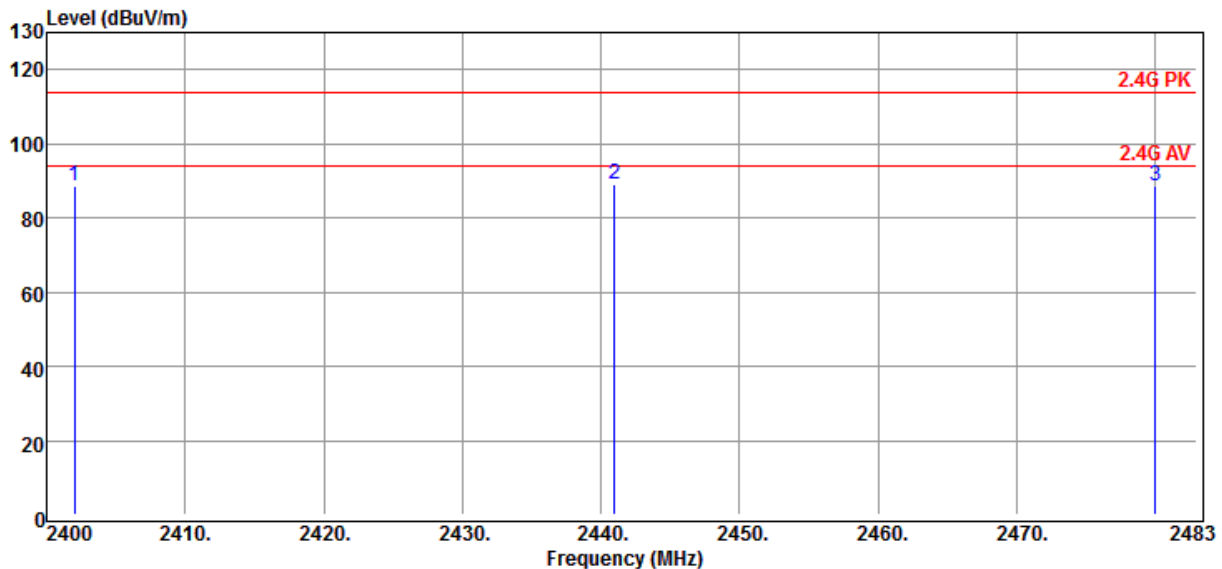
Compliance

The final test data are shown on the following page(s).

The 9kHz-30MHz spurious emission is under limit 20dB more.

Radiated Emission Test Data (Field Strength of Fundamental)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH00, 39, 78 (1Mbps)
EUT Position	: X axis	Mode	: 1, 2, 3



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	2402.00	104.86	-16.27	88.59	94.00	-5.41	HORIZONTAL	Peak
2	2441.00	105.10	-16.24	88.86	94.00	-5.14	HORIZONTAL	Peak
3	2480.00	104.52	-16.01	88.51	94.00	-5.49	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

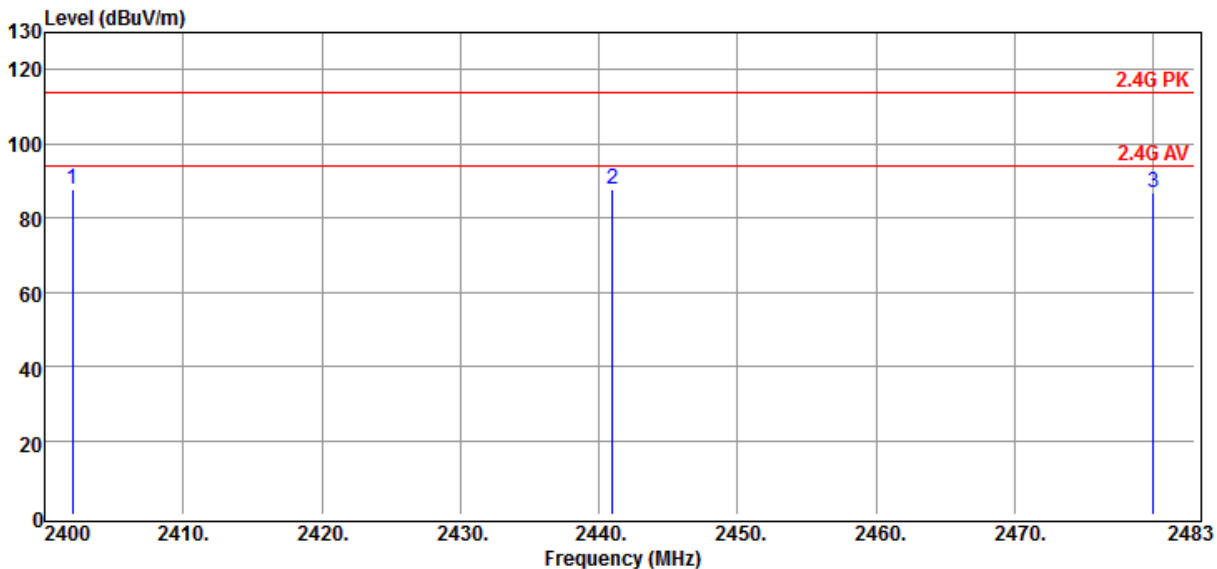
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
Peak Setting 1GHz to 10th harmonics of fundamental, RBW = 3MHz, VBW =10MHz, Sweep = AUTO.
Note: Because the 20 dB Bandwidth is over 1MHz, the RBW setting of measuring Field strength of Fundamental should be 3MHz, and VBW should be at 10 MHz.

Radiated Emission Test Data (Field Strength of Fundamental)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH00, 39, 78 (1Mbps)
EUT Position	: X axis	Mode	: 1, 2, 3



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2402.00	103.83	-16.27	87.56	94.00	-6.44	VERTICAL	Peak
2	2441.00	104.17	-16.24	87.93	94.00	-6.07	VERTICAL	Peak
3	2480.00	103.01	-16.01	87.00	94.00	-7.00	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

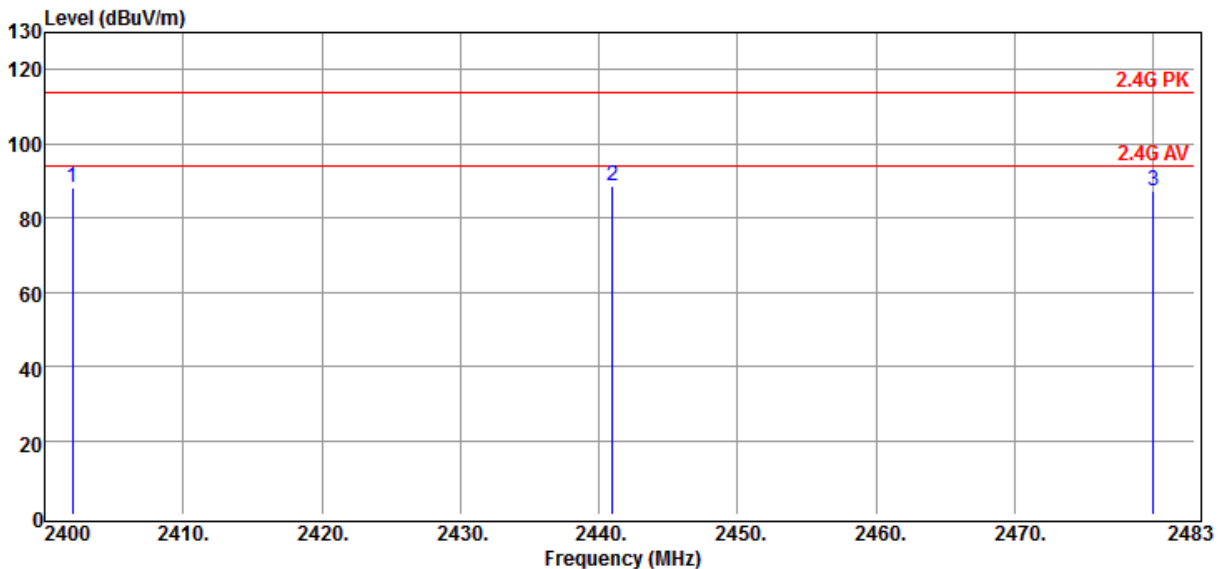
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
Peak Setting 1GHz to 10th harmonics of fundamental, RBW = 3MHz, VBW = 10MHz, Sweep = AUTO.
Note: Because the 20 dB Bandwidth is over 1MHz, the RBW setting of measuring Field strength of Fundamental should be 3MHz, and VBW should be at 10 MHz.

Radiated Emission Test Data (Field Strength of Fundamental)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH00, 39, 78 (2Mbps)
EUT Position	: X axis	Mode	: 4, 5, 6



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	2402.00	104.51	-16.27	88.24	94.00	-5.76	HORIZONTAL	Peak
2	2441.00	104.64	-16.24	88.40	94.00	-5.60	HORIZONTAL	Peak
3	2480.00	103.43	-16.01	87.42	94.00	-6.58	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

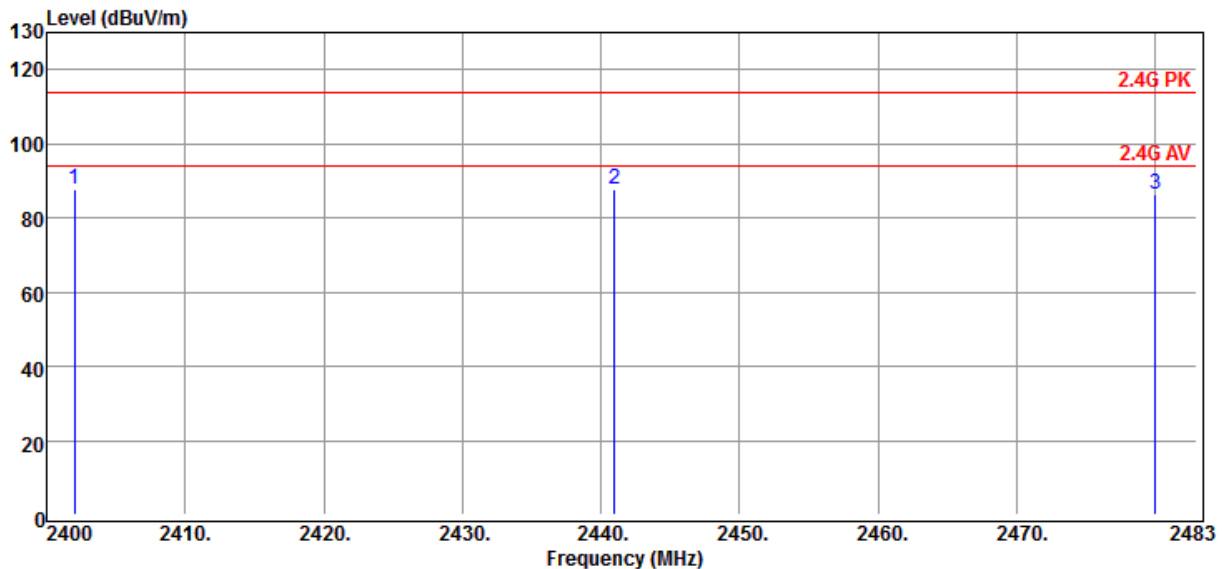
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
Peak Setting 1GHz to 10th harmonics of fundamental, RBW = 3MHz, VBW =10MHz, Sweep = AUTO.
Note: Because the 20 dB Bandwidth is over 1MHz, the RBW setting of measuring Field strength of Fundamental should be 3MHz, and VBW should be at 10 MHz.

Radiated Emission Test Data (Field Strength of Fundamental)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH00, 39, 78 (2Mbps)
EUT Position	: X axis	Mode	: 4, 5, 6



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	2402.00	103.77	-16.27	87.50	94.00	-6.50	VERTICAL	Peak
2	2441.00	103.78	-16.24	87.54	94.00	-6.46	VERTICAL	Peak
3	2480.00	102.60	-16.01	86.59	94.00	-7.41	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

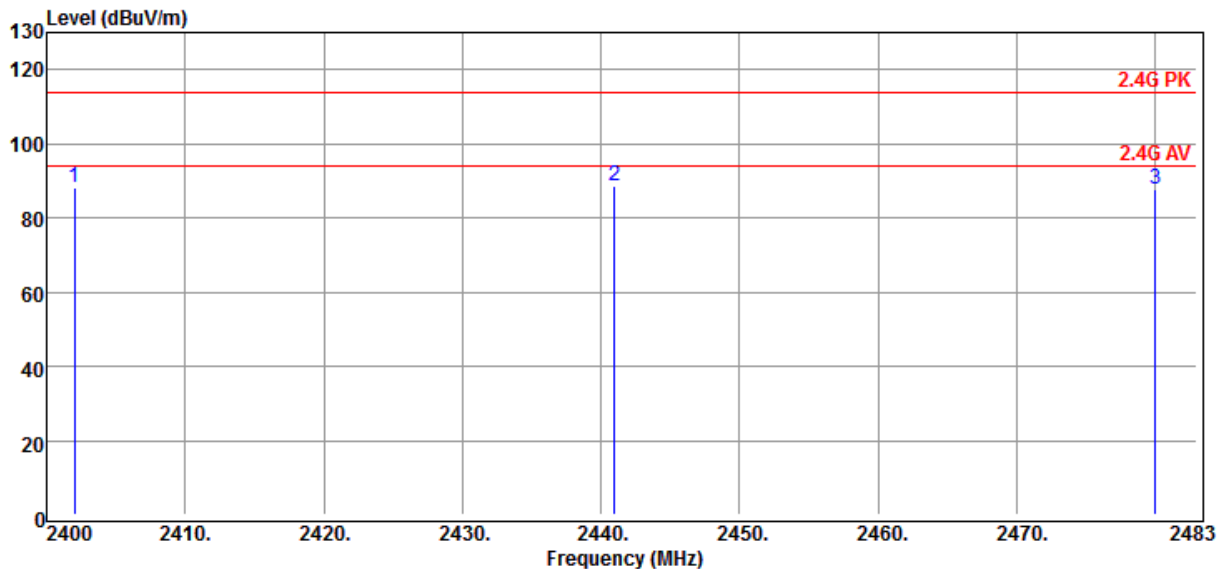
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
Peak Setting 1GHz to 10th harmonics of fundamental, RBW = 3MHz, VBW = 10MHz, Sweep = AUTO.
Note: Because the 20 dB Bandwidth is over 1MHz, the RBW setting of measuring Field strength of Fundamental should be 3MHz, and VBW should be at 10 MHz.

Radiated Emission Test Data (Field Strength of Fundamental)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH00, 39, 78 (3Mbps)
EUT Position	: X axis	Mode	: 7, 8, 9



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	2402.00	104.44	-16.27	88.17	94.00	-5.83	HORIZONTAL	Peak
2	2441.00	104.82	-16.24	88.58	94.00	-5.42	HORIZONTAL	Peak
3	2480.00	103.86	-16.01	87.85	94.00	-6.15	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

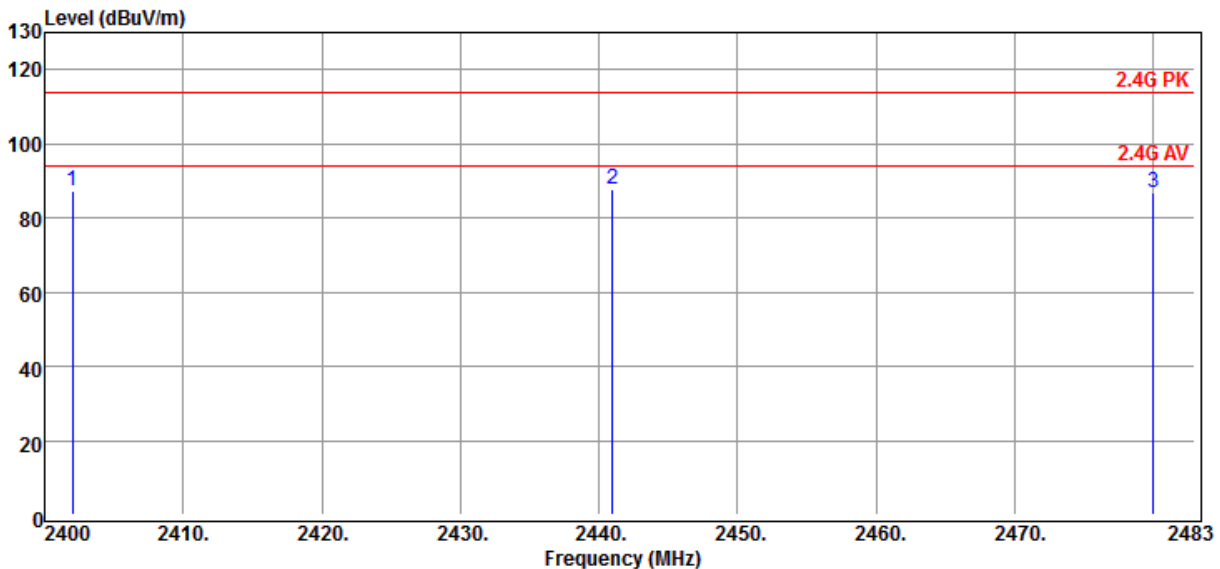
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
Peak Setting 1GHz to 10th harmonics of fundamental, RBW = 3MHz, VBW = 10MHz, Sweep = AUTO.
Note: Because the 20 dB Bandwidth is over 1MHz, the RBW setting of measuring Field strength of Fundamental should be 3MHz, and VBW should be at 10 MHz.

Radiated Emission Test Data (Field Strength of Fundamental)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH00, 39, 78 (3Mbps)
EUT Position	: X axis	Mode	: 7, 8, 9



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2402.00	103.72	-16.27	87.45	94.00	-6.55	VERTICAL	Peak
2	2441.00	103.85	-16.24	87.61	94.00	-6.39	VERTICAL	Peak
3	2480.00	102.66	-16.01	86.65	94.00	-7.35	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

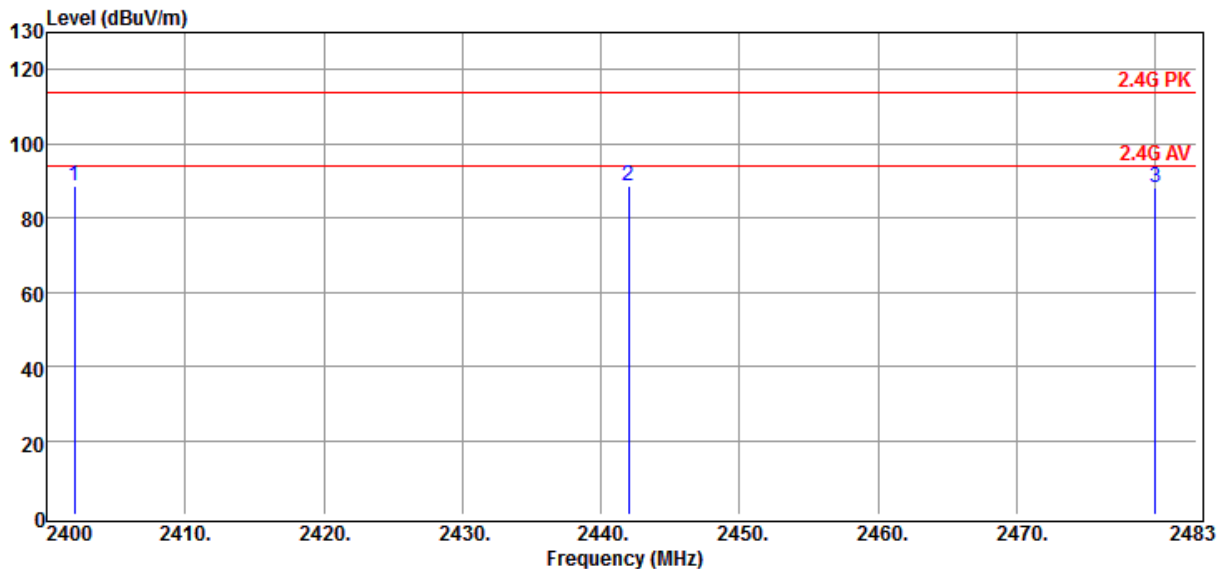
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
Peak Setting 1GHz to 10th harmonics of fundamental, RBW = 3MHz, VBW = 10MHz, Sweep = AUTO.
Note: Because the 20 dB Bandwidth is over 1MHz, the RBW setting of measuring Field strength of Fundamental should be 3MHz, and VBW should be at 10 MHz.

Radiated Emission Test Data (Field Strength of Fundamental)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH00, 20, 39 (1Mbps)
EUT Position	: X axis	Mode	: 10, 11, 12



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	2402.00	104.80	-16.27	88.53	94.00	-5.47	HORIZONTAL	Peak
2	2442.00	104.94	-16.24	88.70	94.00	-5.30	HORIZONTAL	Peak
3	2480.00	104.06	-16.01	88.05	94.00	-5.95	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

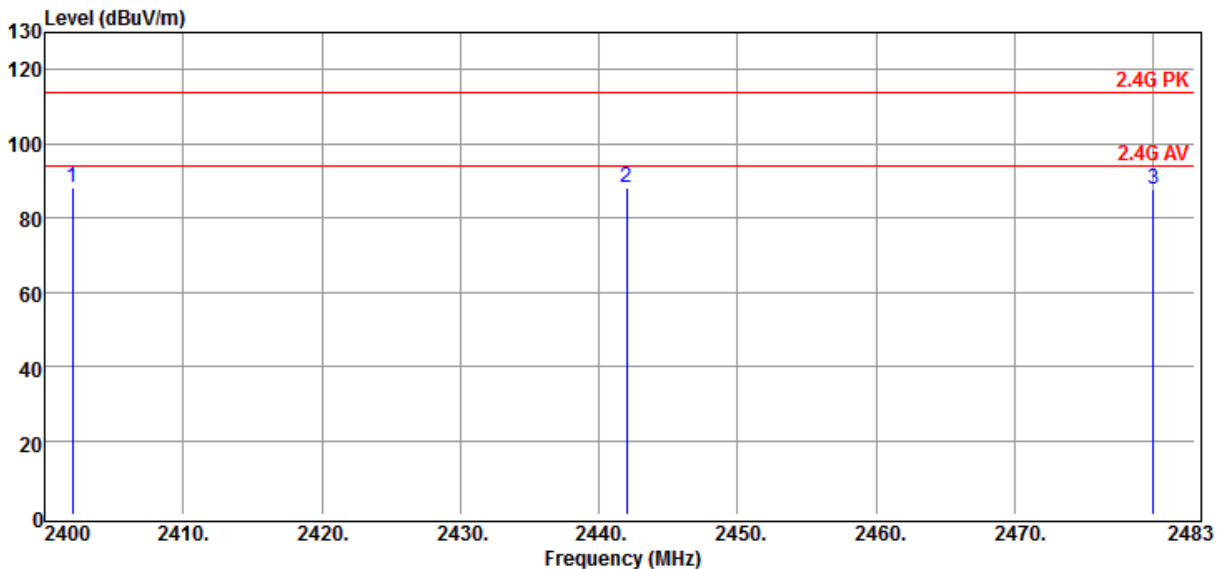
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
Peak Setting 1GHz to 10th harmonics of fundamental, RBW = 3MHz, VBW = 10MHz, Sweep = AUTO.
Note: Because the 20 dB Bandwidth is over 1MHz, the RBW setting of measuring Field strength of Fundamental should be 3MHz, and VBW should be at 10 MHz.

Radiated Emission Test Data (Field Strength of Fundamental)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH00, 20, 39 (1Mbps)
EUT Position	: X axis	Mode	: 10, 11, 12



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	2402.00	104.23	-16.27	87.96	94.00	-6.04	VERTICAL	Peak
2	2442.00	104.22	-16.24	87.98	94.00	-6.02	VERTICAL	Peak
3	2480.00	103.59	-16.01	87.58	94.00	-6.42	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

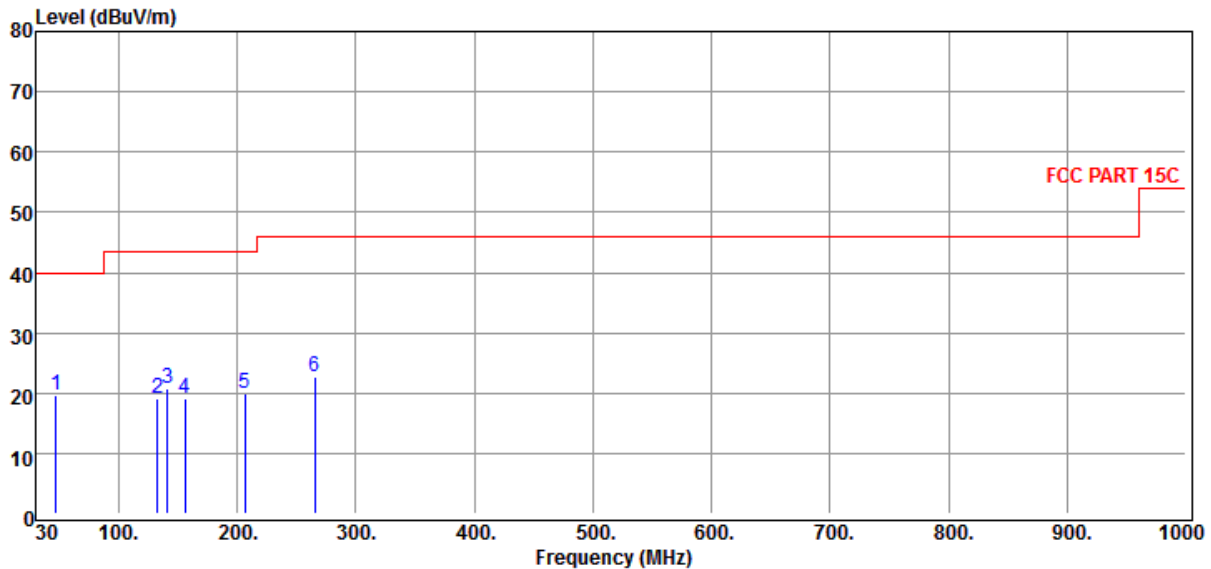
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
Peak Setting 1GHz to 10th harmonics of fundamental, RBW = 3MHz, VBW = 10MHz, Sweep = AUTO.
Note: Because the 20 dB Bandwidth is over 1MHz, the RBW setting of measuring Field strength of Fundamental should be 3MHz, and VBW should be at 10 MHz.

Radiated Emission Test Data (Below 1 GHz)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH 39
EUT Position	: X axis	Mode	: 2



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	47.46	32.74	-13.05	19.69	40.00	-20.31	HORIZONTAL	Peak
2	132.82	30.47	-11.36	19.11	43.50	-24.39	HORIZONTAL	Peak
3	141.55	32.09	-11.45	20.64	43.50	-22.86	HORIZONTAL	Peak
4	156.10	31.23	-12.12	19.11	43.50	-24.39	HORIZONTAL	Peak
5	206.54	32.87	-12.81	20.06	43.50	-23.44	HORIZONTAL	Peak
6	265.71	31.50	-8.81	22.69	46.00	-23.31	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

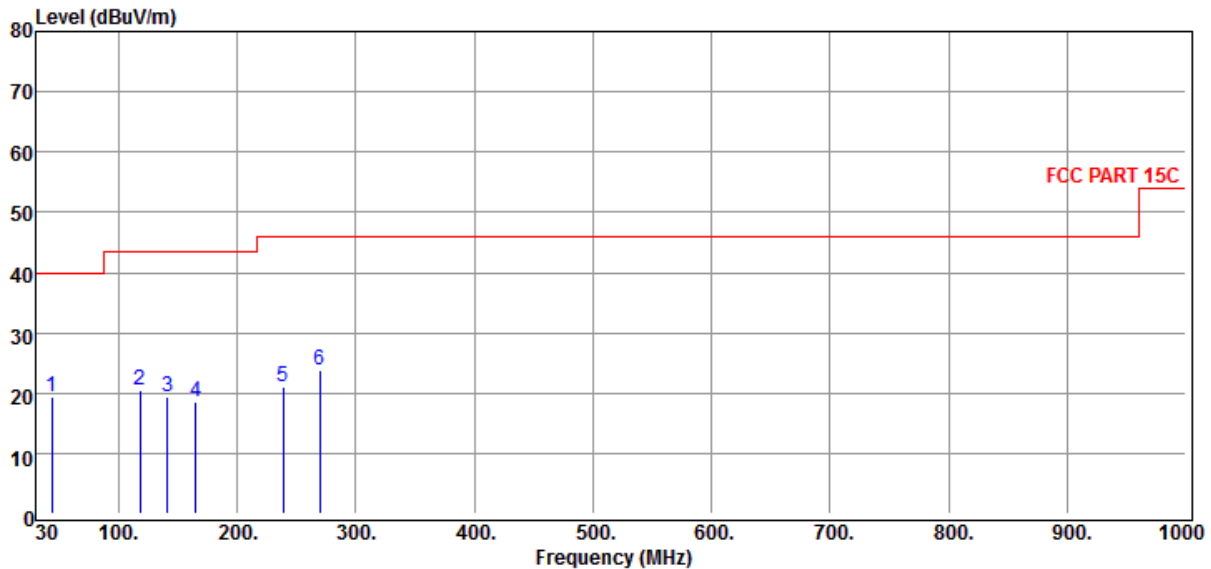
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 30 MHz to 1 GHz.
2. Radiated emissions measured in frequency range from 30 MHz to 1000 MHz were made with an instrument using Peak detector mode.
3. Data of measurement within this frequency range shown "----" in the table above means the reading of emissions are attenuated more than 20 dB below the permissible limits or the field strength is too small to be measured.
4. All readings are Peak values. None of the peak value reading exceeds the Q.P. limit. Hence, Q.P. reading was not measured.
5. The IF bandwidth of SPA between 30 MHz to 1 GHz was 100 kHz.

Radiated Emission Test Data (Below 1 GHz)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH 39
EUT Position	: X axis	Mode	: 2



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	43.58	30.27	-11.00	19.27	40.00	-20.73	VERTICAL	Peak
2	118.27	32.11	-11.65	20.46	43.50	-23.04	VERTICAL	Peak
3	141.55	30.73	-11.45	19.28	43.50	-24.22	VERTICAL	Peak
4	164.83	31.29	-12.67	18.62	43.50	-24.88	VERTICAL	Peak
5	238.55	32.40	-11.37	21.03	46.00	-24.97	VERTICAL	Peak
6	269.59	33.12	-9.35	23.77	46.00	-22.23	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

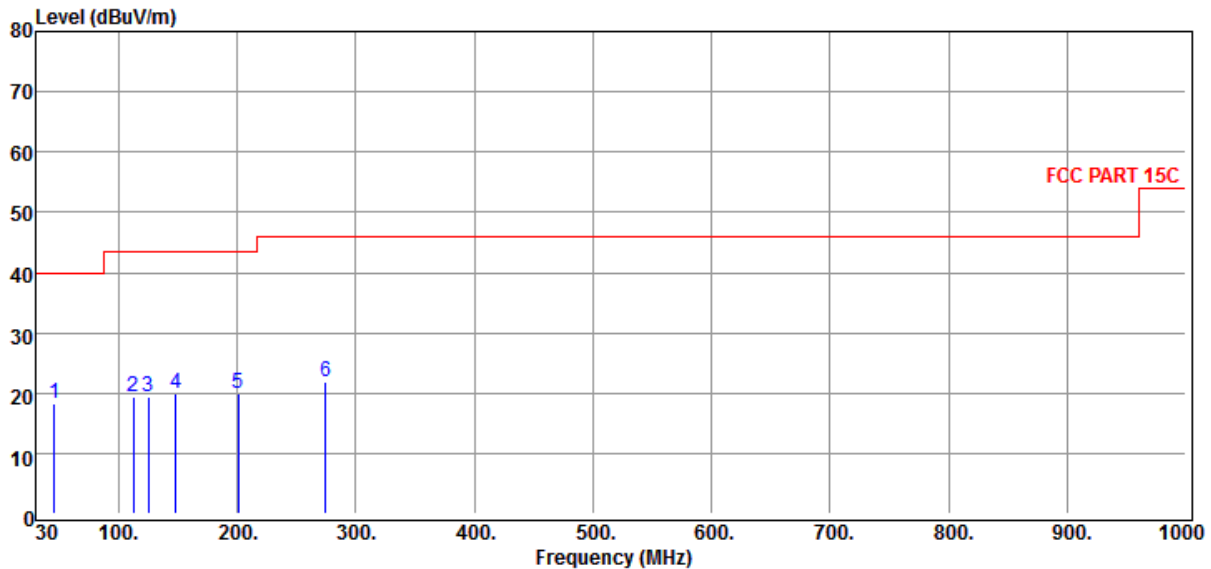
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 30 MHz to 1 GHz.
2. Radiated emissions measured in frequency range from 30 MHz to 1000 MHz were made with an instrument using Peak detector mode.
3. Data of measurement within this frequency range shown "----" in the table above means the reading of emissions are attenuated more than 20 dB below the permissible limits or the field strength is too small to be measured.
4. All readings are Peak values. None of the peak value reading exceeds the Q.P. limit. Hence, Q.P. reading was not measured.
5. The IF bandwidth of SPA between 30 MHz to 1 GHz was 100 kHz.

Radiated Emission Test Data (Below 1 GHz)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH 20
EUT Position	: X axis	Mode	: 11



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	45.52	30.40	-12.04	18.36	40.00	-21.64	HORIZONTAL	Peak
2	112.45	31.27	-11.81	19.46	43.50	-24.04	HORIZONTAL	Peak
3	125.06	30.75	-11.38	19.37	43.50	-24.13	HORIZONTAL	Peak
4	148.34	31.73	-11.73	20.00	43.50	-23.50	HORIZONTAL	Peak
5	200.72	32.88	-12.98	19.90	43.50	-23.60	HORIZONTAL	Peak
6	274.44	31.48	-9.61	21.87	46.00	-24.13	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

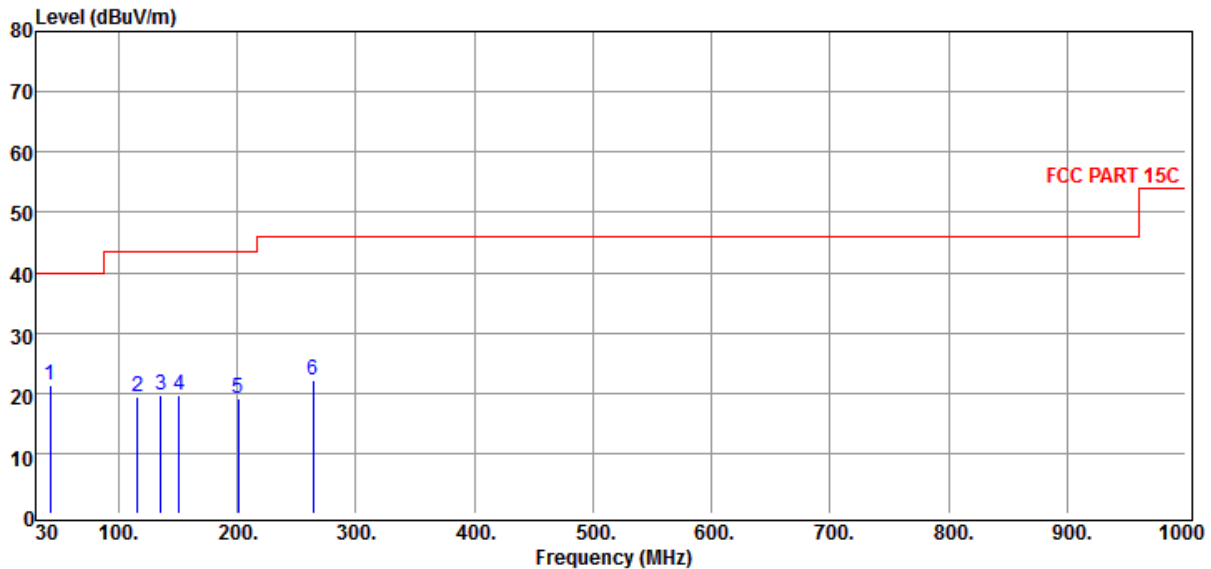
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 30 MHz to 1 GHz.
2. Radiated emissions measured in frequency range from 30 MHz to 1000 MHz were made with an instrument using Peak detector mode.
3. Data of measurement within this frequency range shown "----" in the table above means the reading of emissions are attenuated more than 20 dB below the permissible limits or the field strength is too small to be measured.
4. All readings are Peak values. None of the peak value reading exceeds the Q.P. limit. Hence, Q.P. reading was not measured.
5. The IF bandwidth of SPA between 30 MHz to 1 GHz was 100 kHz.

Radiated Emission Test Data (Below 1 GHz)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH 20
EUT Position	: X axis	Mode	: 11



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	42.61	31.60	-10.41	21.19	40.00	-18.81	VERTICAL	Peak
2	116.33	31.13	-11.65	19.48	43.50	-24.02	VERTICAL	Peak
3	135.73	31.02	-11.35	19.67	43.50	-23.83	VERTICAL	Peak
4	151.25	31.48	-11.91	19.57	43.50	-23.93	VERTICAL	Peak
5	200.72	32.18	-12.98	19.20	43.50	-24.30	VERTICAL	Peak
6	263.77	31.07	-8.79	22.28	46.00	-23.72	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

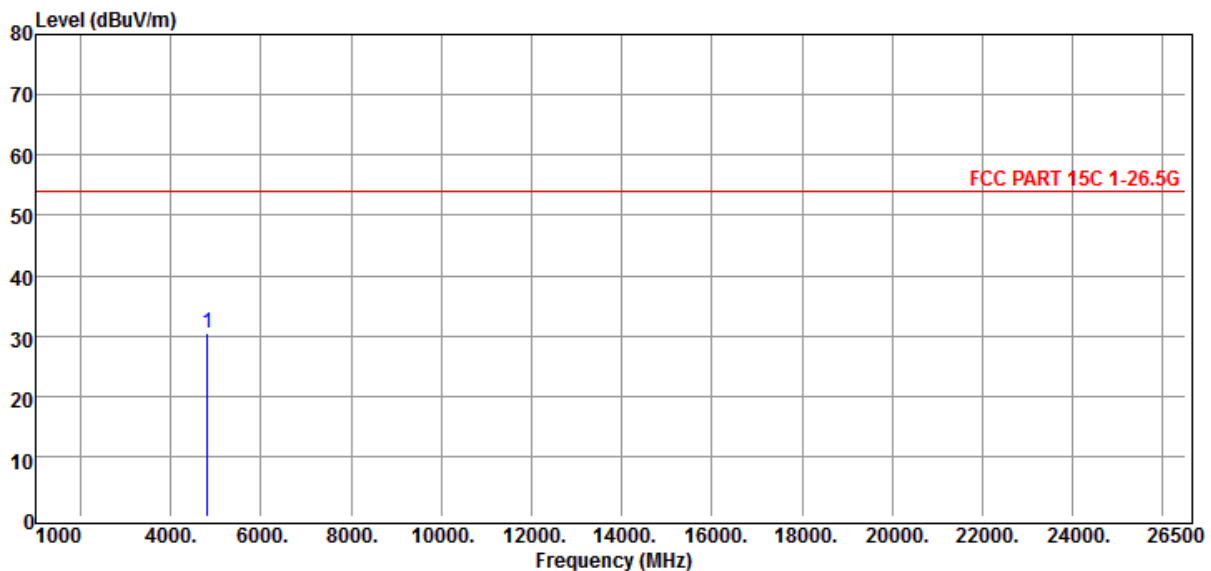
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 30 MHz to 1 GHz.
2. Radiated emissions measured in frequency range from 30 MHz to 1000 MHz were made with an instrument using Peak detector mode.
3. Data of measurement within this frequency range shown “---” in the table above means the reading of emissions are attenuated more than 20 dB below the permissible limits or the field strength is too small to be measured.
4. All readings are Peak values. None of the peak value reading exceeds the Q.P. limit. Hence, Q.P. reading was not measured.
5. The IF bandwidth of SPA between 30 MHz to 1 GHz was 100 kHz.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH00
EUT Position	: X axis	Mode	: 1



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	4804.00	40.94	-10.46	30.48	54.00	-23.52	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

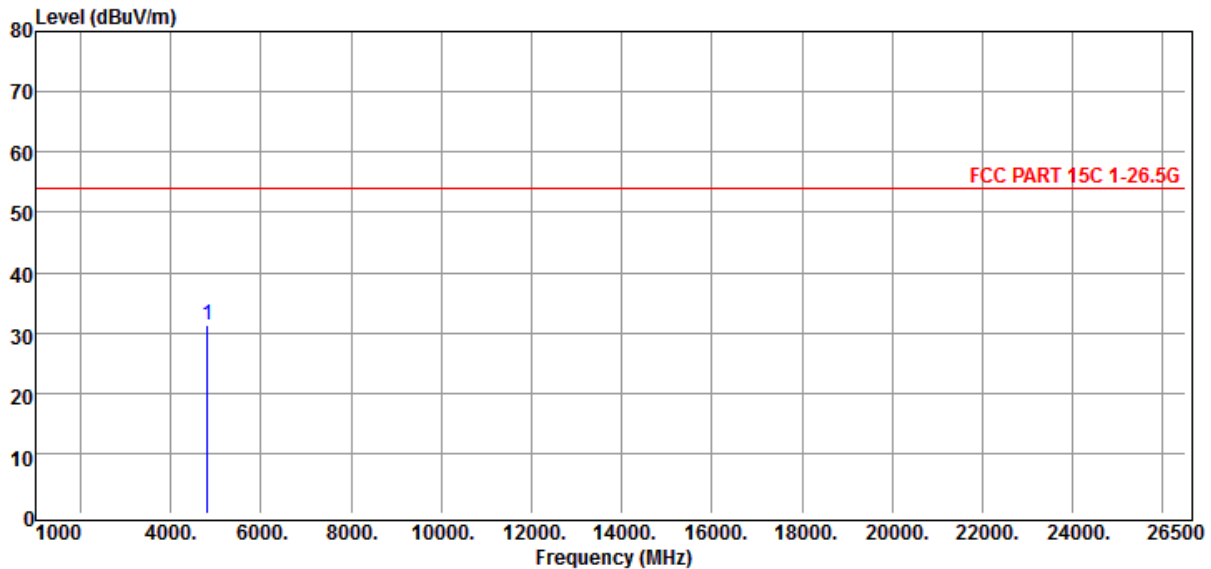
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH00
EUT Position	: X axis	Mode	: 1



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	4804.00	41.81	-10.46	31.35	54.00	-22.65	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

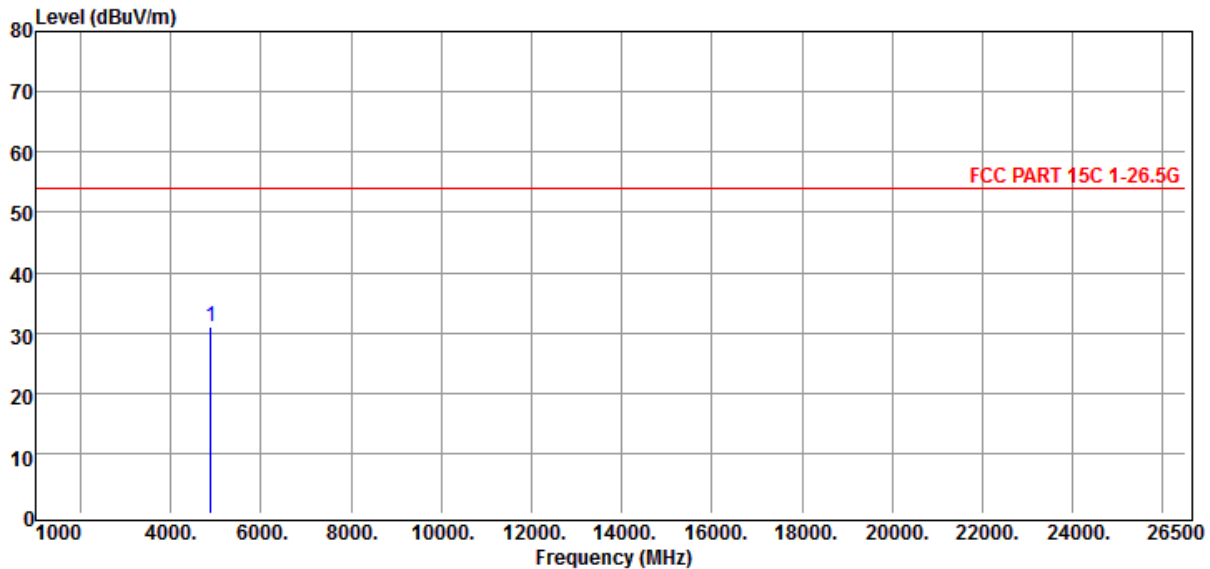
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH39
EUT Position	: X axis	Mode	: 2



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	4882.00	41.35	-10.21	31.14	54.00	-22.86	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

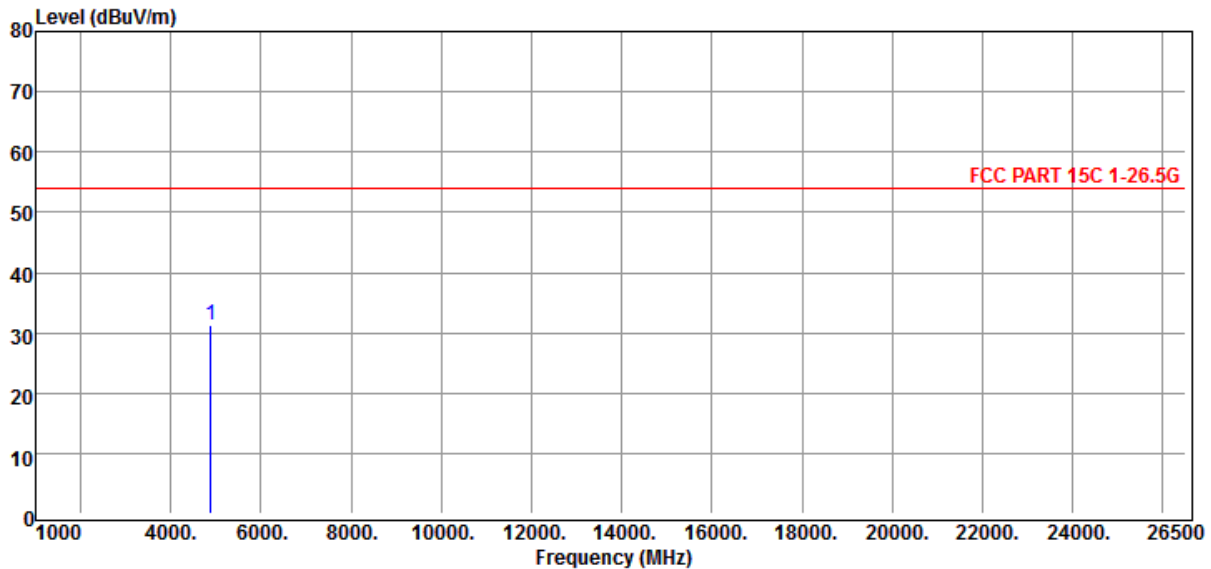
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH39
EUT Position	: X axis	Mode	: 2



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	4882.00	41.48	-10.21	31.27	54.00	-22.73	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

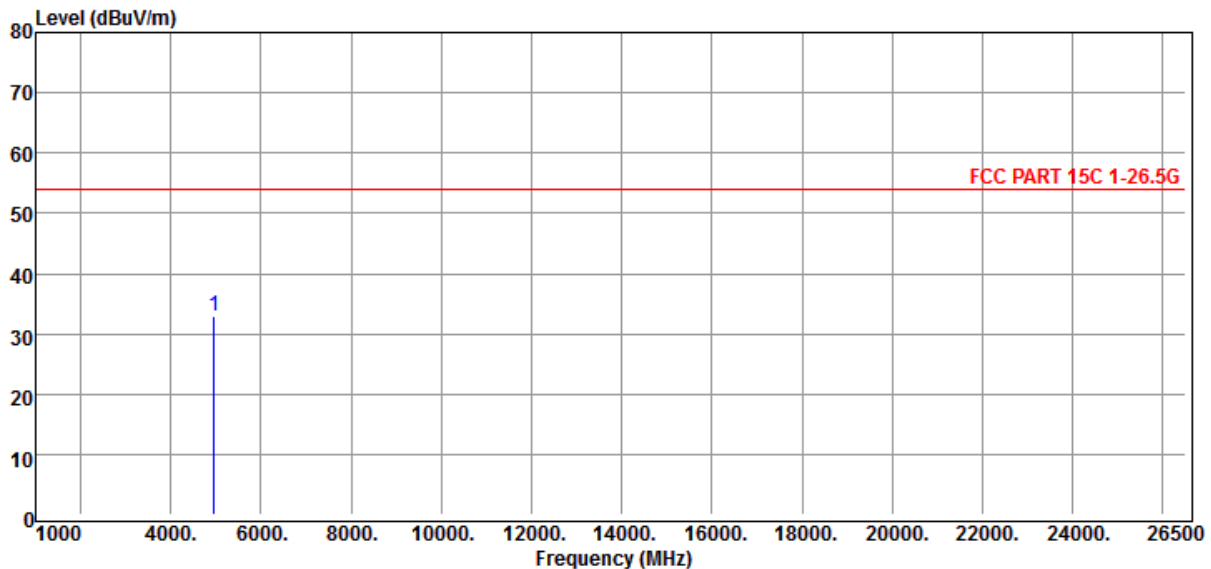
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH78
EUT Position	: X axis	Mode	: 3



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	4960.00	42.79	-9.94	32.85	54.00	-21.15	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

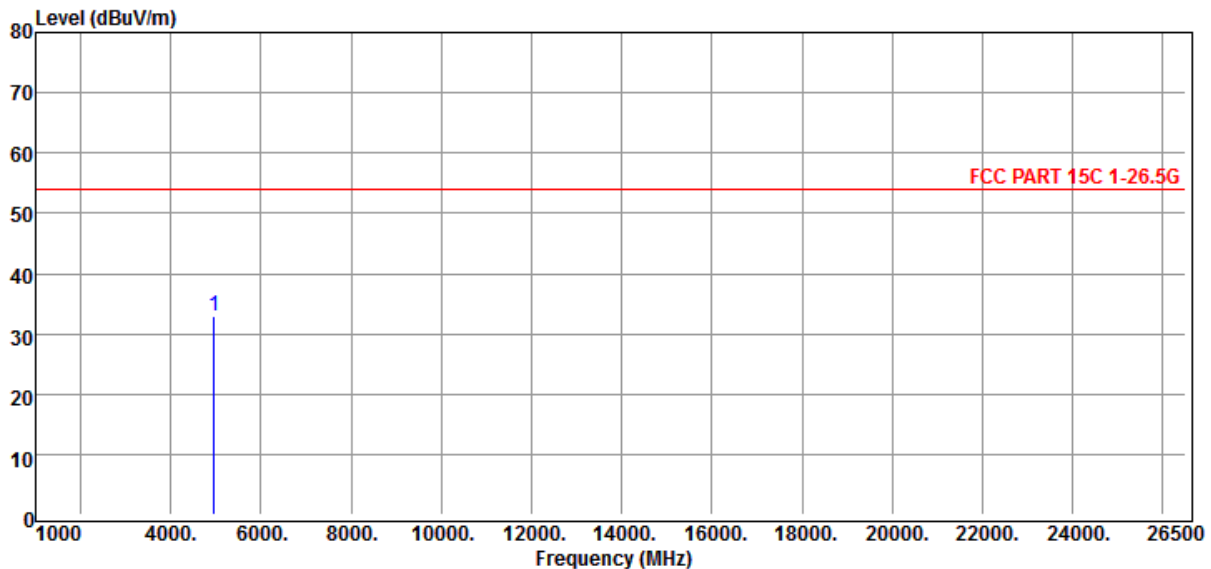
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH78
EUT Position	: X axis	Mode	: 3



No.	Freq MHz	Reading dBUV	C.F dB/m	Result dBUV/m	Limit dBUV/m	Margin dB	Antenna Pol.	Remark
1	4960.00	42.94	-9.94	33.00	54.00	-21.00	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

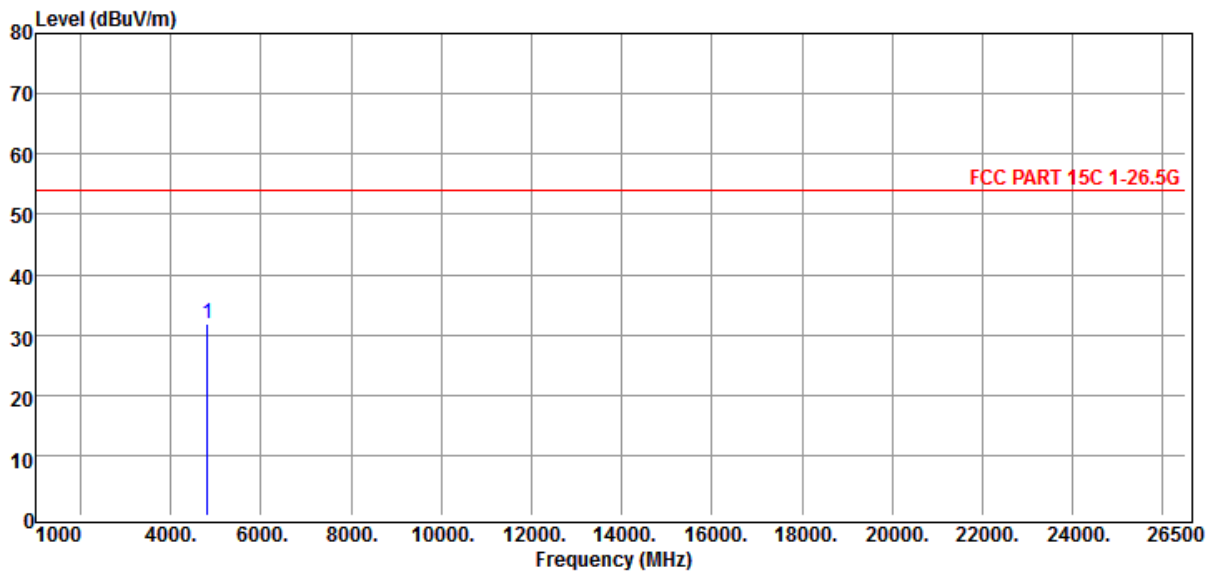
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH00
EUT Position	: X axis	Mode	: 4



No.	Freq MHz	Reading dBUV	C.F dB/m	Result dBUV/m	Limit dBUV/m	Margin dB	Antenna Pol.	Remark
1	4804.00	42.23	-10.46	31.77	54.00	-22.23	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

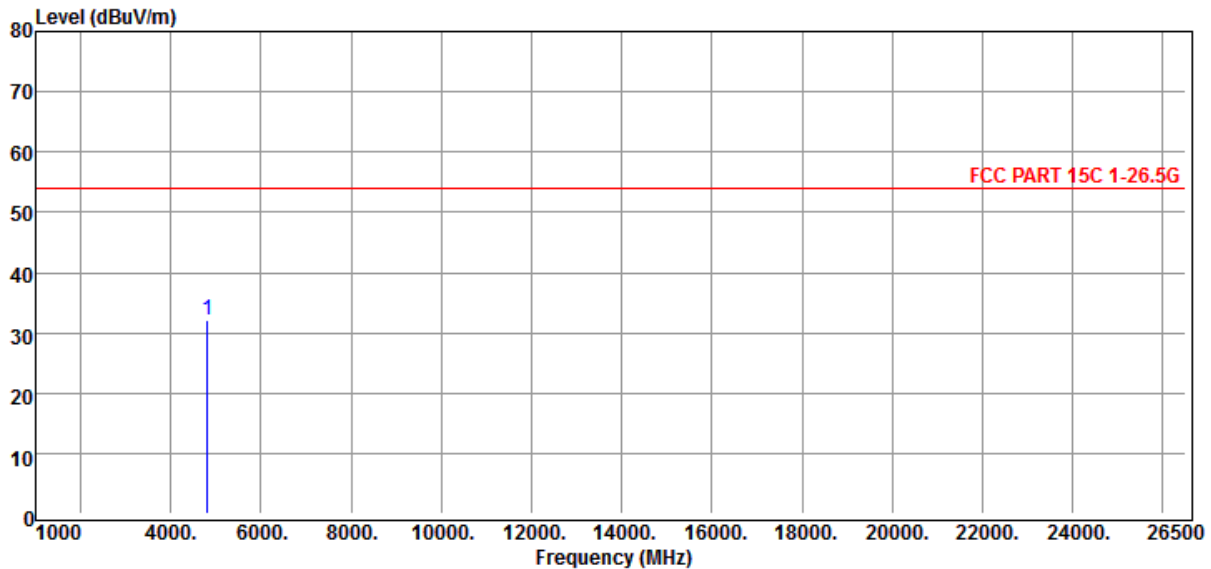
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH00
EUT Position	: X axis	Mode	: 4



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	4804.00	42.47	-10.46	32.01	54.00	-21.99	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

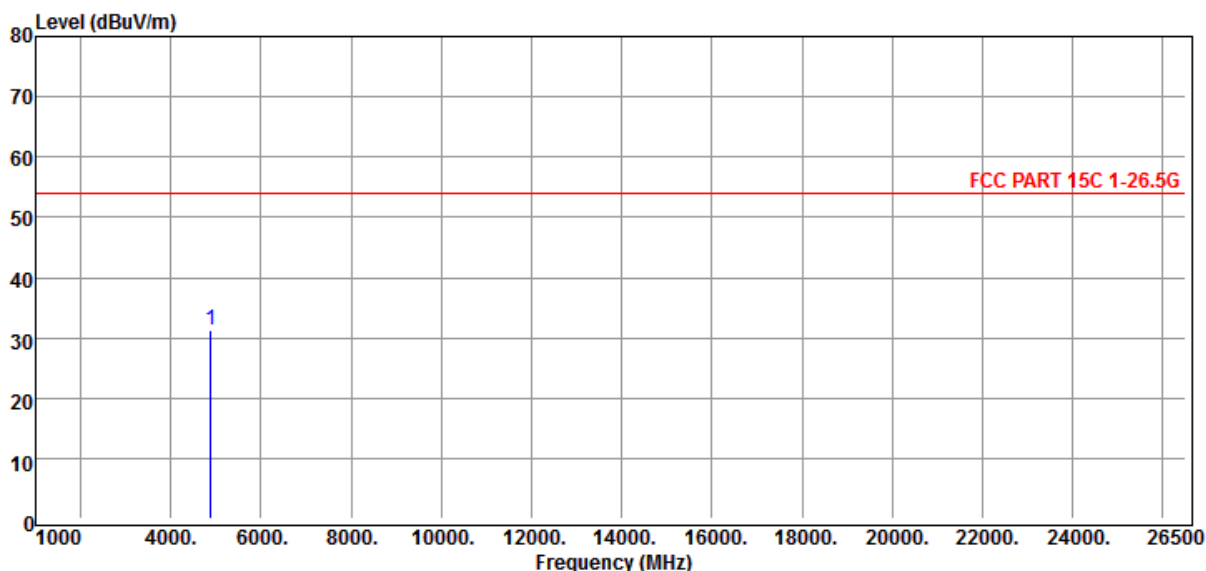
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

**Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)**

vTemperature	: 24.8°C	Humidity	: 70%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH39
EUT Position	: X axis	Mode	: 5



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	4882.00	41.45	-10.21	31.24	54.00	-22.76	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

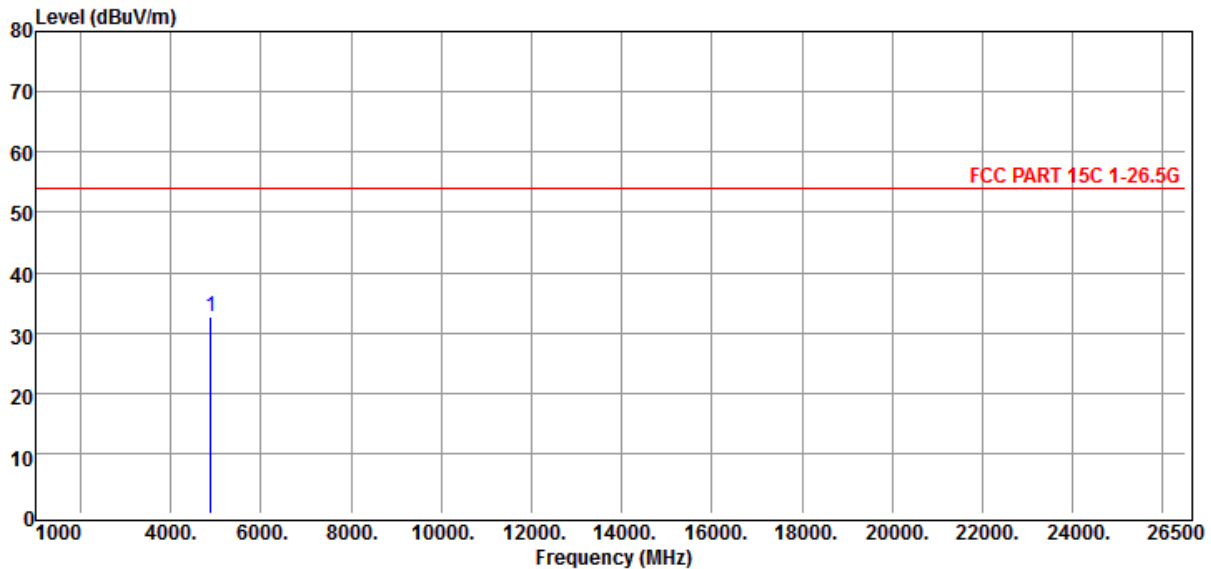
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH39
EUT Position	: X axis	Mode	: 5



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	4882.00	42.85	-10.21	32.64	54.00	-21.36	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

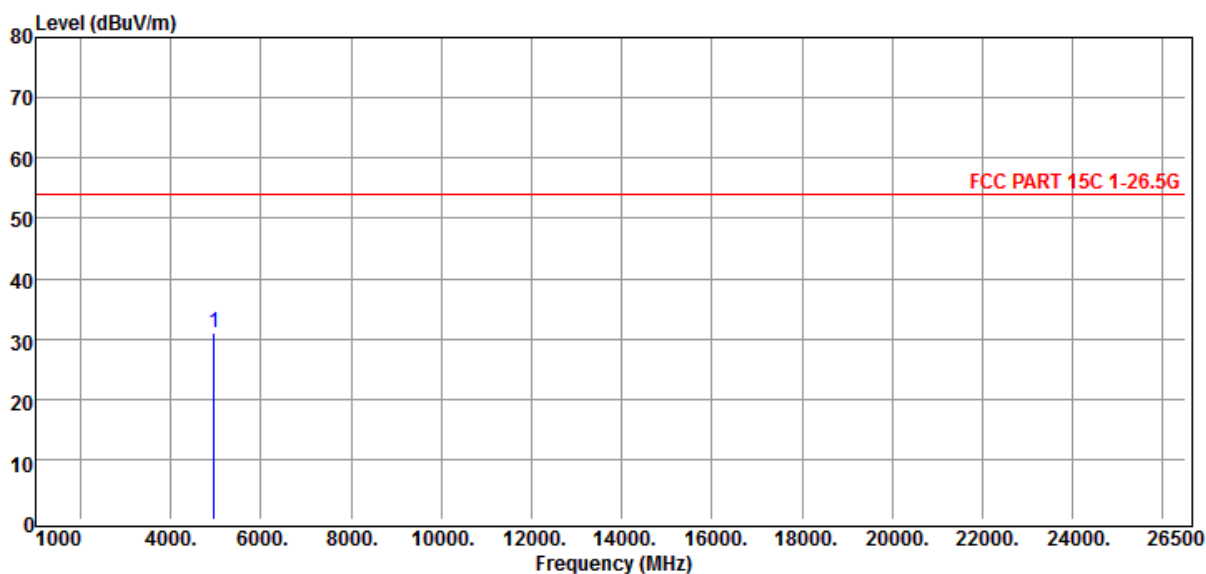
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

**Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)**

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH78
EUT Position	: X axis	Mode	: 6



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	4960.00	40.89	-9.94	30.95	54.00	-23.05	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

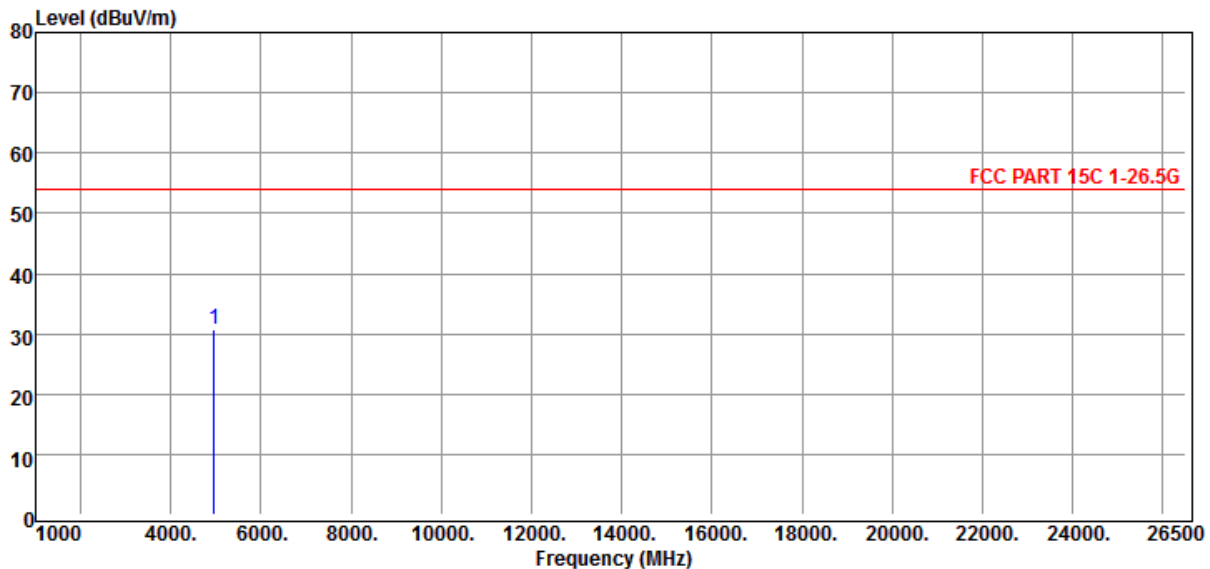
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH78
EUT Position	: X axis	Mode	: 6



No.	Freq MHz	Reading dBUV	C.F dB/m	Result dBUV/m	Limit dBUV/m	Margin dB	Antenna Pol.	Remark
1	4960.00	40.62	-9.94	30.68	54.00	-23.32	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

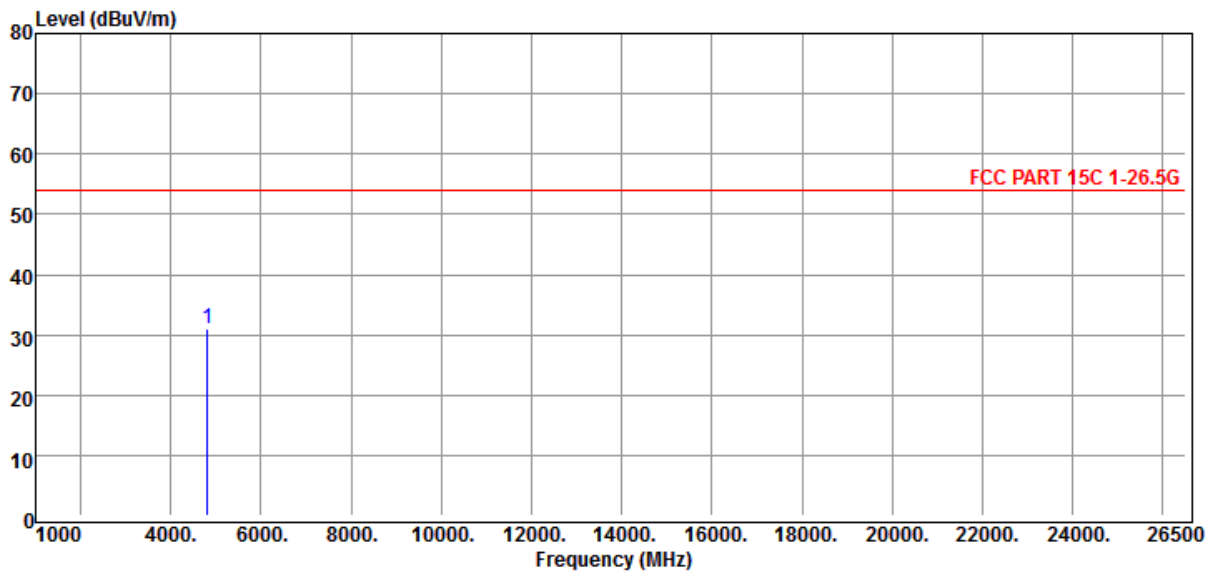
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH00
EUT Position	: X axis	Mode	: 7



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	4804.00	41.33	-10.46	30.87	54.00	-23.13	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

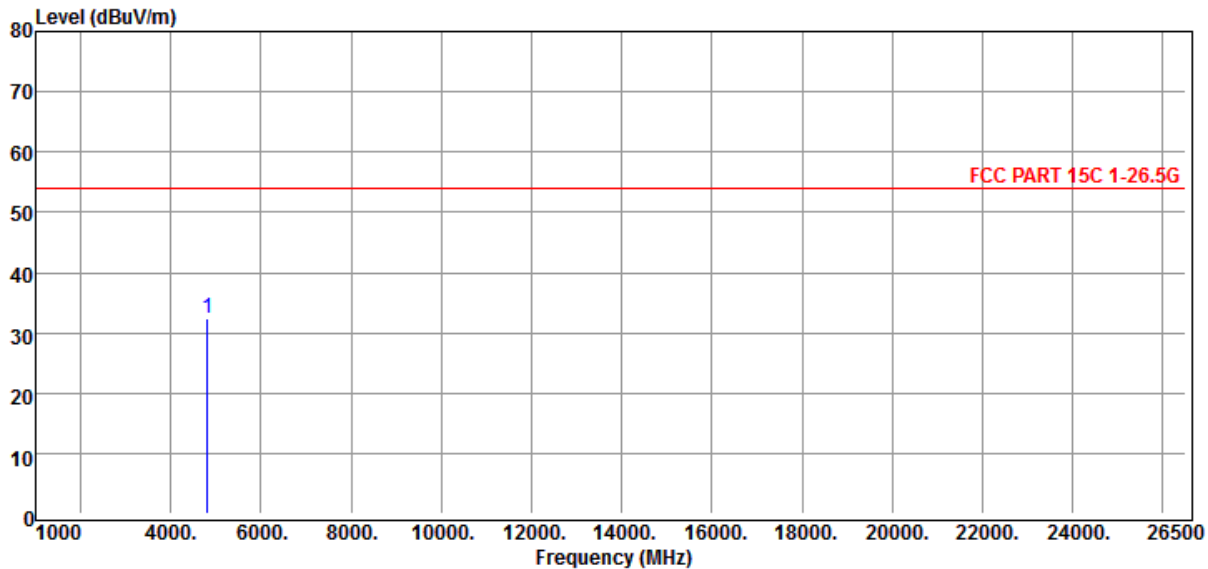
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH00
EUT Position	: X axis	Mode	: 7



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	4804.00	42.88	-10.46	32.42	54.00	-21.58	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

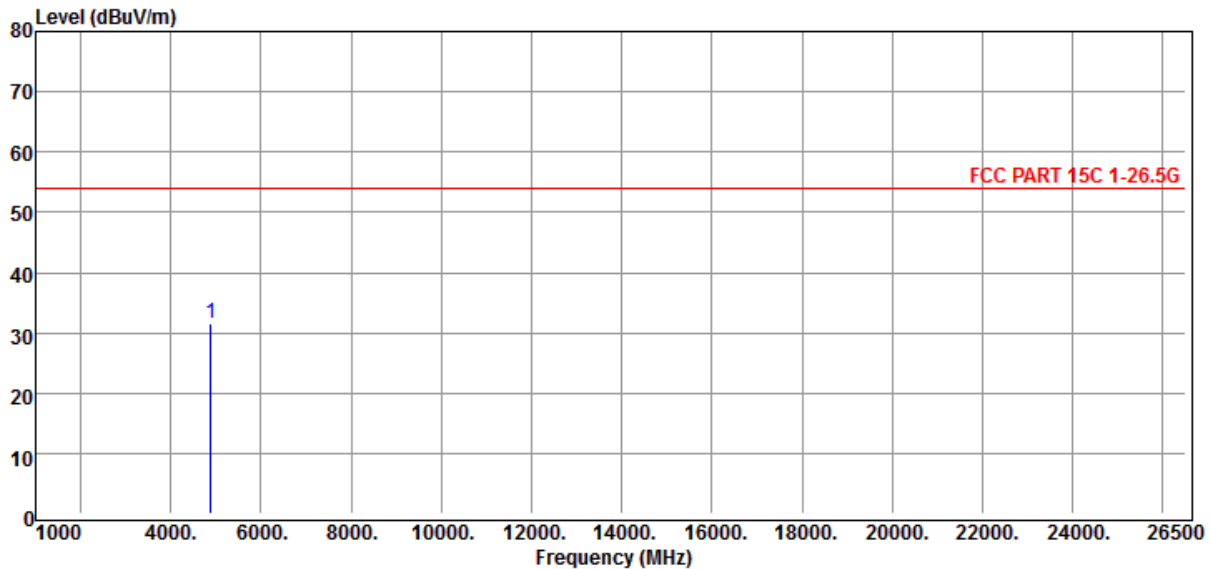
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH39
EUT Position	: X axis	Mode	: 8



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	4882.00	41.85	-10.21	31.64	54.00	-22.36	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

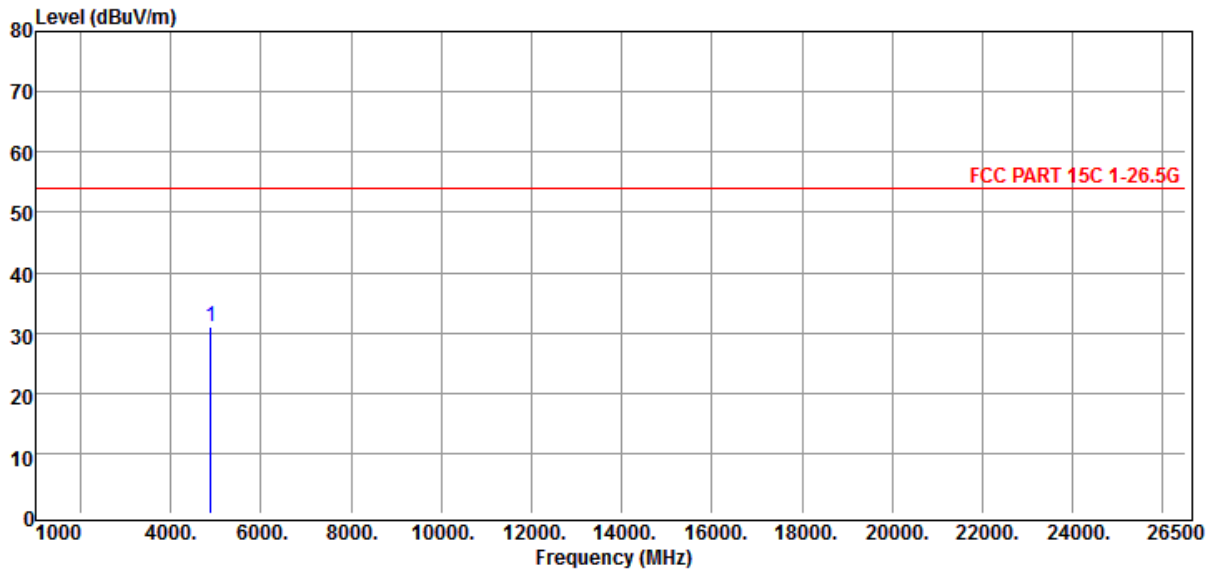
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH39
EUT Position	: X axis	Mode	: 8



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	4882.00	41.20	-10.21	30.99	54.00	-23.01	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

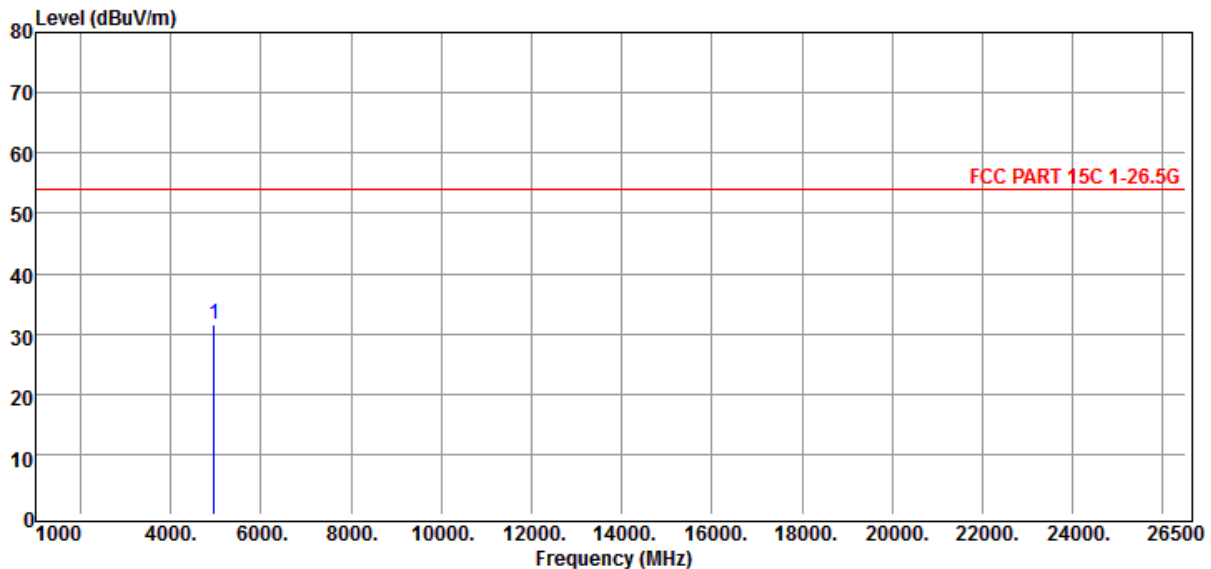
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH78
EUT Position	: X axis	Mode	: 9



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	4960.00	41.41	-9.94	31.47	54.00	-22.53	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

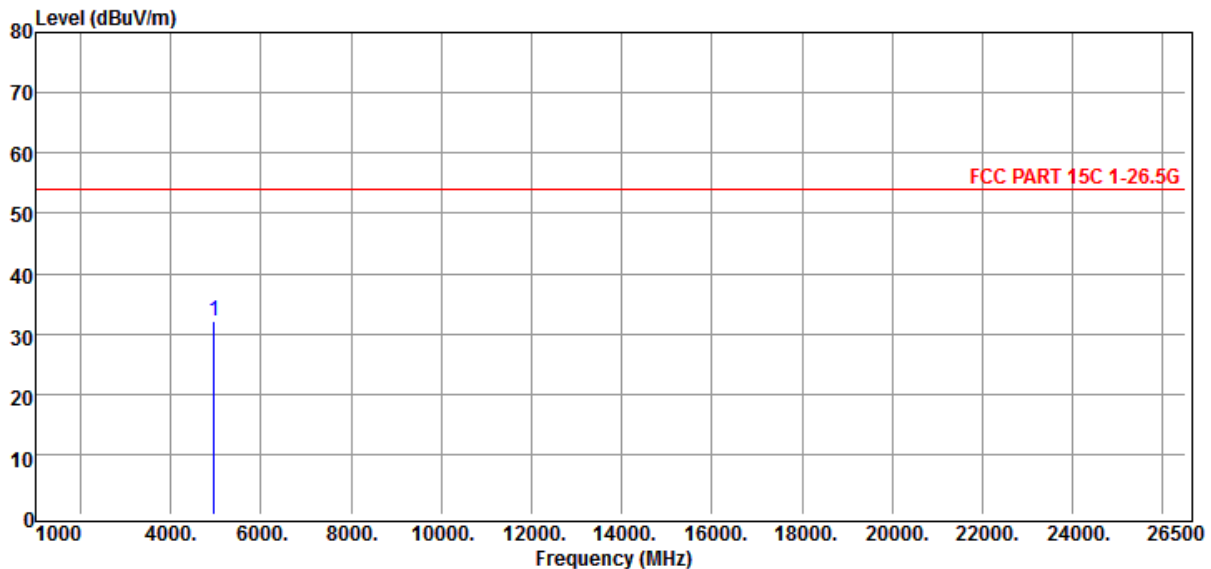
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH78
EUT Position	: X axis	Mode	: 9



No.	Freq MHz	Reading dBUV	C.F dB/m	Result dBUV/m	Limit dBUV/m	Margin dB	Antenna Pol.	Remark
1	4960.00	42.17	-9.94	32.23	54.00	-21.77	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

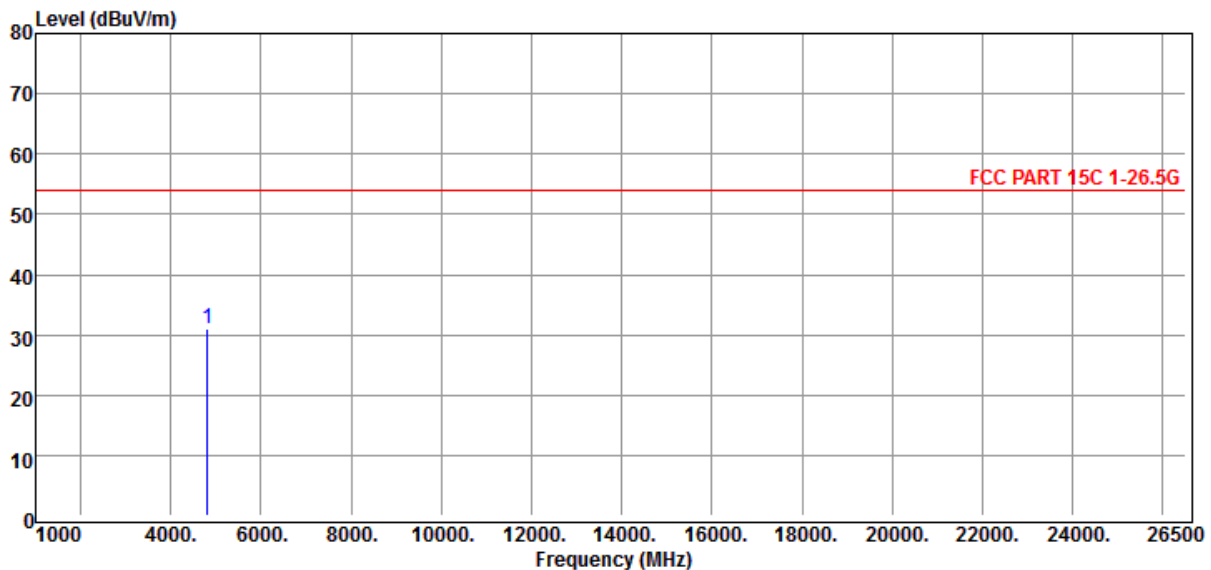
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH00
EUT Position	: X axis	Mode	: 10



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	4804.00	41.52	-10.46	31.06	54.00	-22.94	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

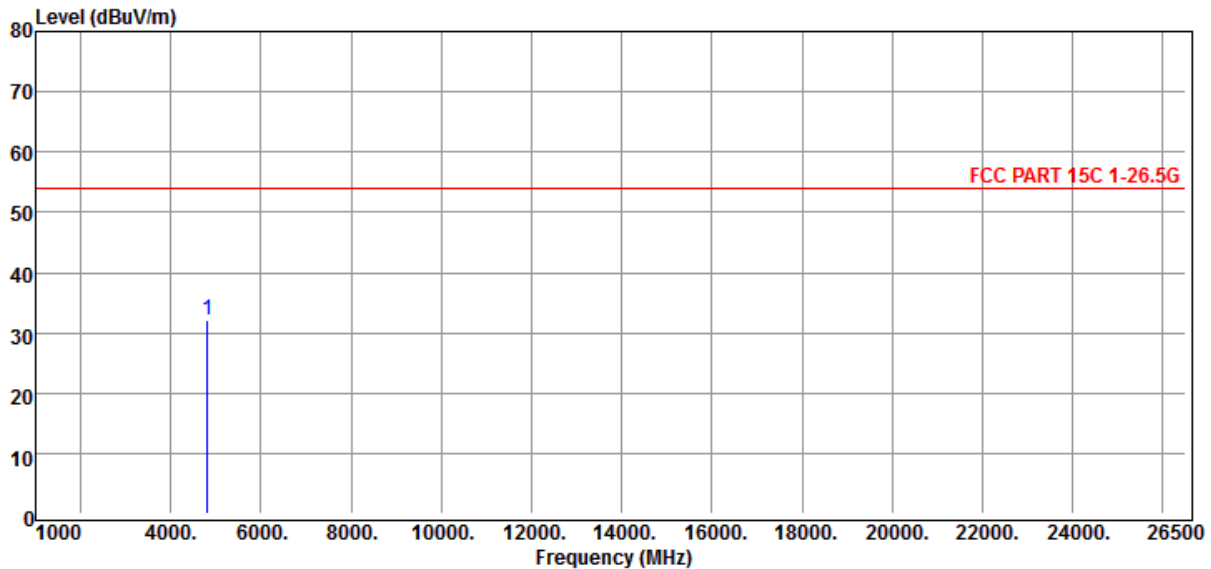
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH00
EUT Position	: X axis	Mode	: 10



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	4804.00	42.47	-10.46	32.01	54.00	-21.99	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

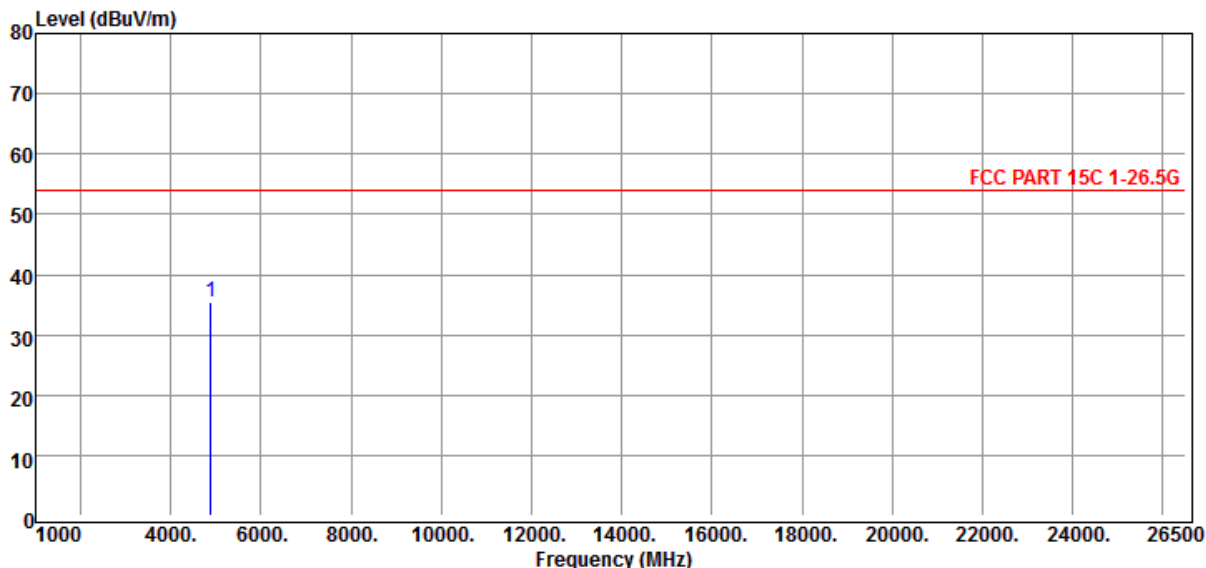
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

**Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)**

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH20
EUT Position	: X axis	Mode	: 11



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	4884.00	45.63	-10.20	35.43	54.00	-18.57	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

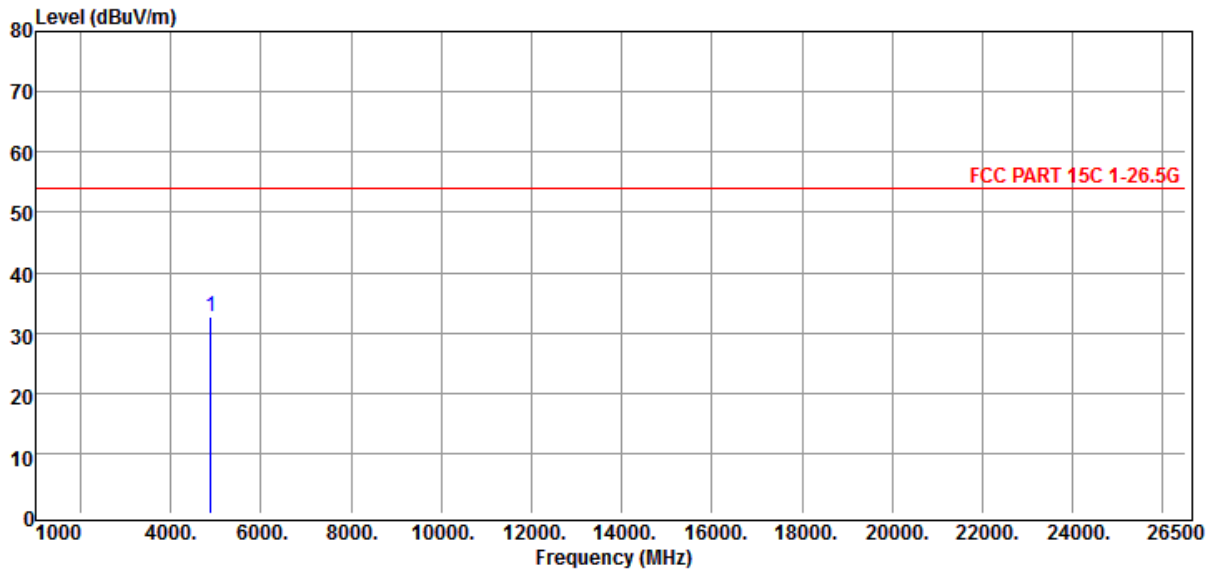
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH20
EUT Position	: X axis	Mode	: 11



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	4884.00	42.98	-10.20	32.78	54.00	-21.22	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

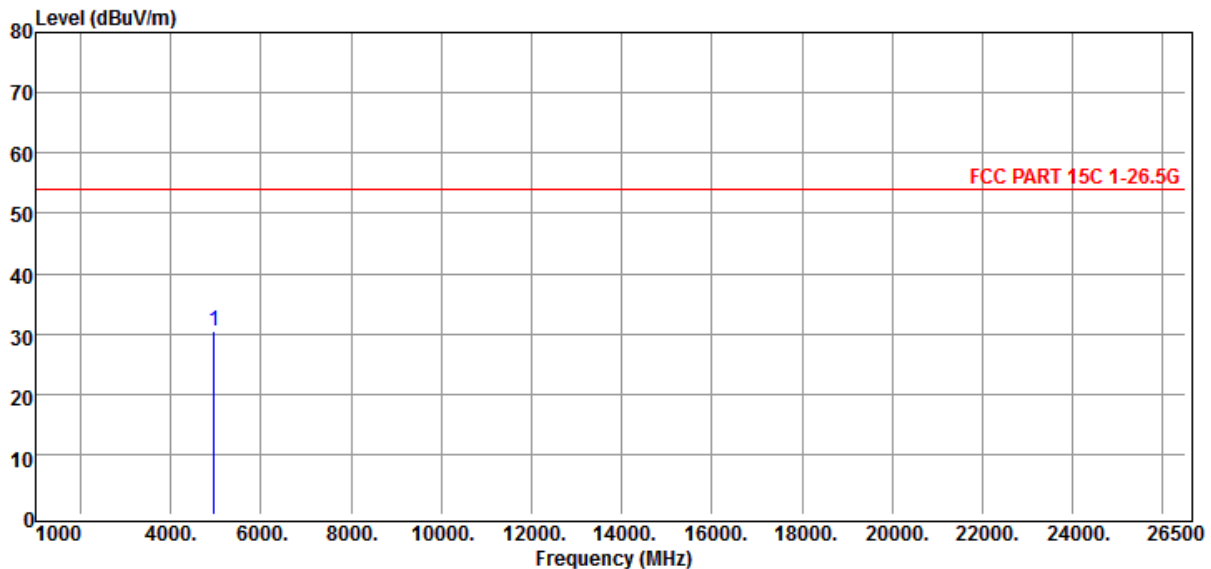
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: CH39
EUT Position	: X axis	Mode	: 12



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	4960.00	40.37	-9.94	30.43	54.00	-23.57	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

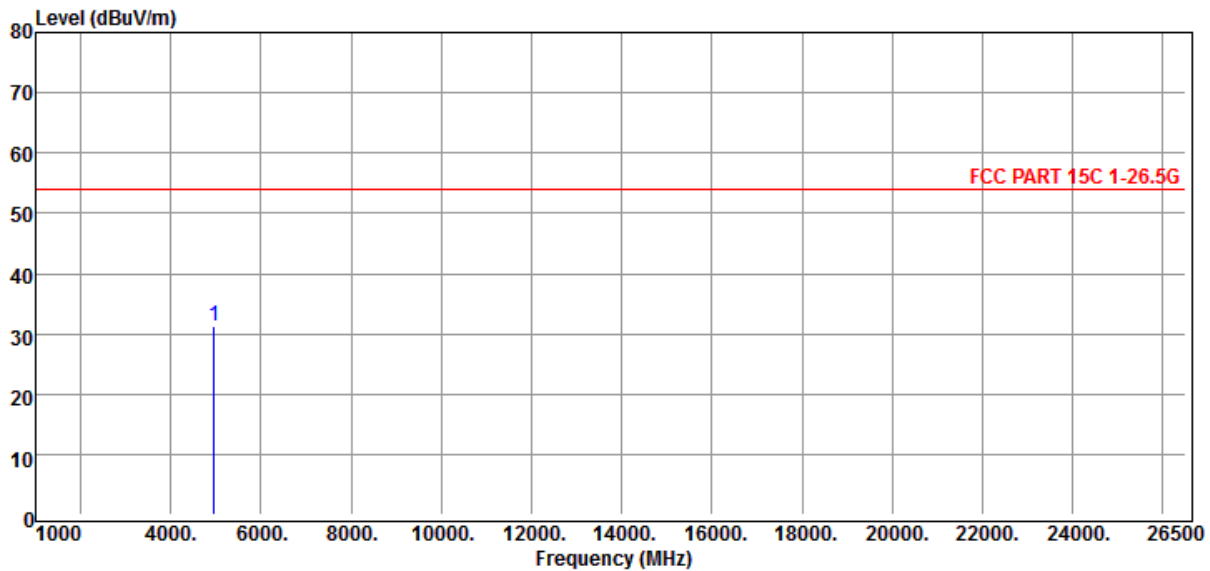
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Radiated Emission Test Data (Above and Field Strength to 10th Harmonic)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: CH39
EUT Position	: X axis	Mode	: 12



No.	Freq MHz	Reading dBUV	C.F dB/m	Result dBUV/m	Limit dBUV/m	Margin dB	Antenna Pol.	Remark
1	4960.00	41.32	-9.94	31.38	54.00	-22.62	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.



4 Out of Band Emission Test

4.1 Test Instruments

Refer to Sec. 1.2 Test Instruments.

4.2 Test Arrangement and Procedure

Refer to Sec. 3.2.

4.3 Limit of Field Strength of Fundamental (§ 15.249(d))

Emissions radiated outside of the specified frequency bands, except for harmonics, shall be attenuated by at least 50 dB below the level of the fundamental or to the general radiated emission limits in § 15.209, whichever is the lesser attenuation.

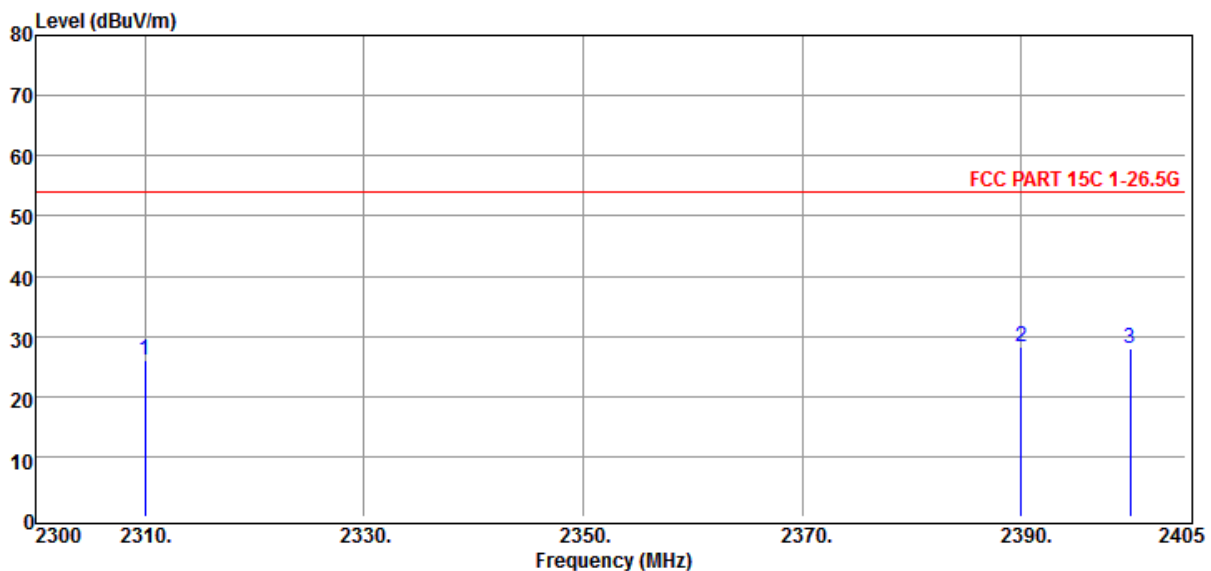
4.4 Test Result

Compliance

The final test data are shown on the following page(s).

Band-Edge Test Data (Lower Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: 00
EUT Position	: X axis	Mode	: 1



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2310.00	42.45	-16.50	25.95	54.00	-28.05	HORIZONTAL	Peak
2	2390.00	44.50	-16.26	28.24	54.00	-25.76	HORIZONTAL	Peak
3	2399.96	44.31	-16.28	28.03	54.00	-25.97	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

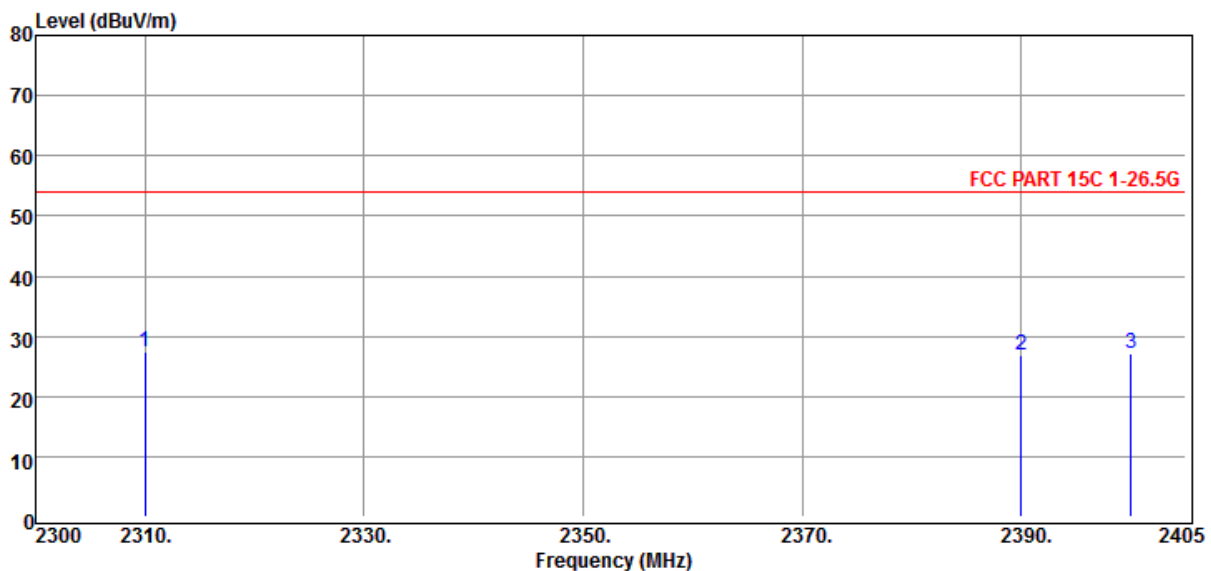
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Lower Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: 00
EUT Position	: X axis	Mode	: 1



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2310.00	43.86	-16.50	27.36	54.00	-26.64	VERTICAL	Peak
2	2390.00	43.12	-16.26	26.86	54.00	-27.14	VERTICAL	Peak
3	2400.00	43.52	-16.28	27.24	54.00	-26.76	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

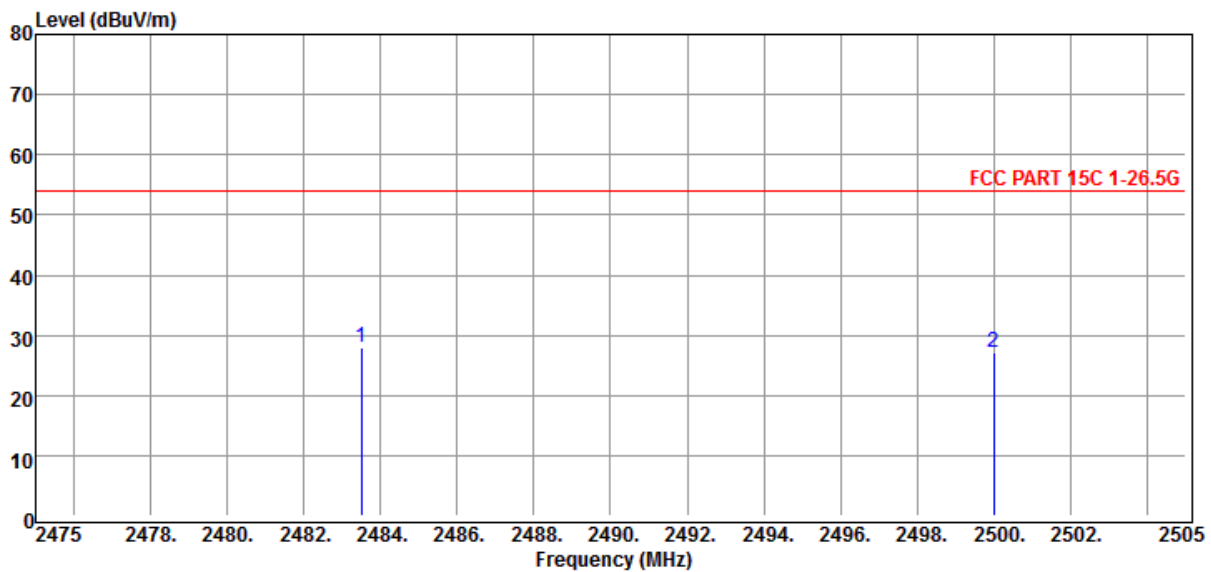
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Upper Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: 78
EUT Position	: X axis	Mode	: 3



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2483.50	44.05	-15.99	28.06	54.00	-25.94	HORIZONTAL	Peak
2	2500.00	43.07	-15.88	27.19	54.00	-26.81	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

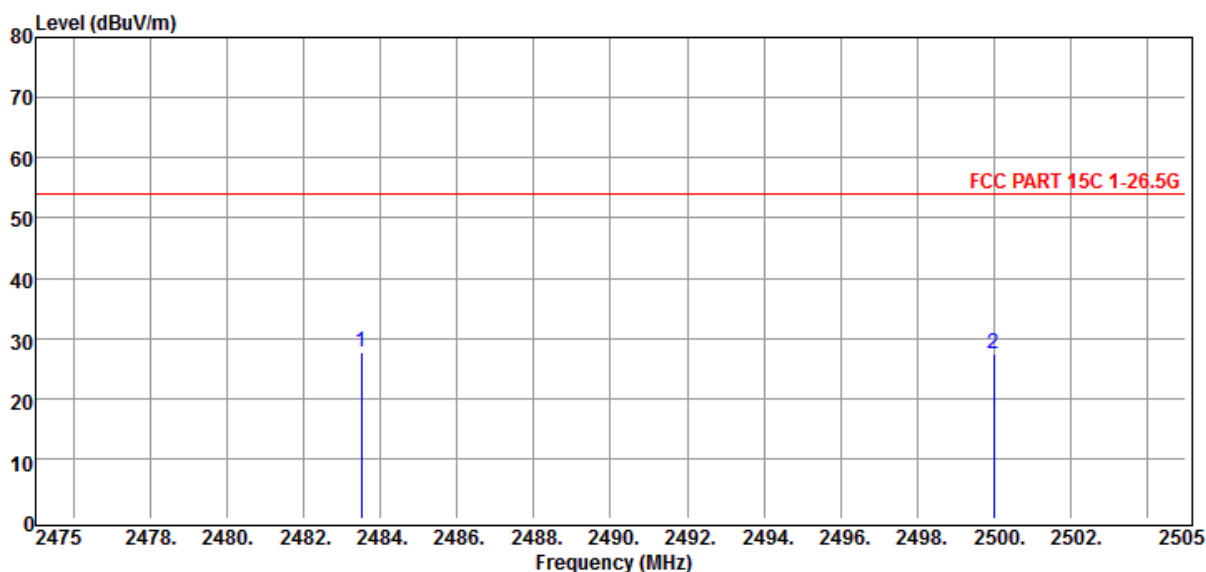
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Upper Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: 78
EUT Position	: X axis	Mode	: 3



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2483.50	43.72	-15.99	27.73	54.00	-26.27	VERTICAL	Peak
2	2499.99	43.41	-15.88	27.53	54.00	-26.47	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

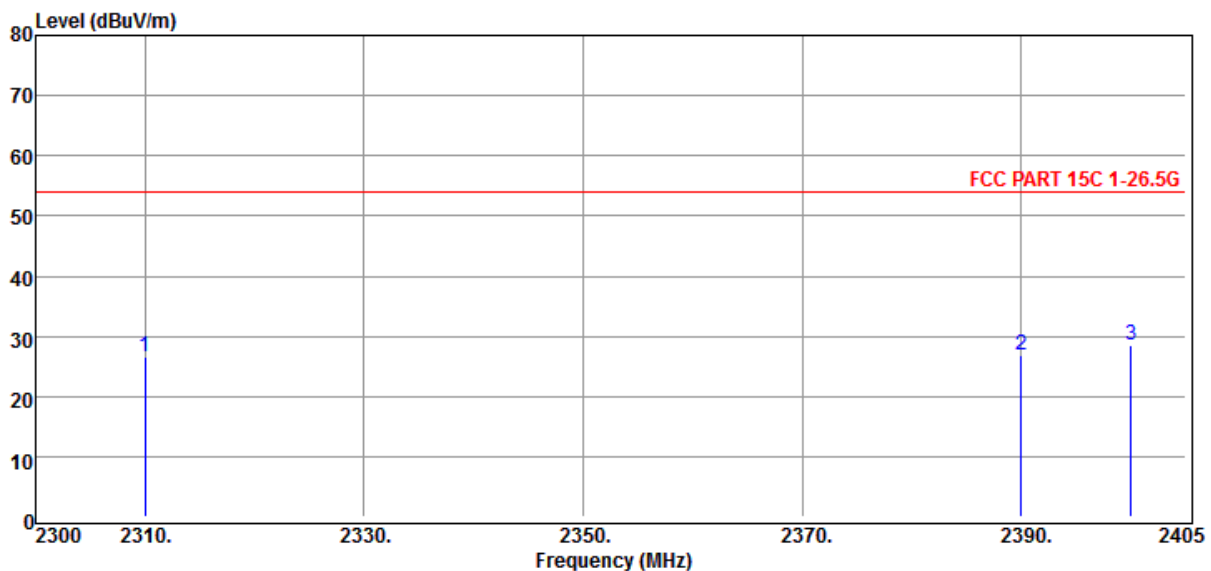
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Lower Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: 00
EUT Position	: X axis	Mode	: 4



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2309.98	43.16	-16.50	26.66	54.00	-27.34	HORIZONTAL	Peak
2	2390.00	43.24	-16.26	26.98	54.00	-27.02	HORIZONTAL	Peak
3	2400.00	44.67	-16.28	28.39	54.00	-25.61	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

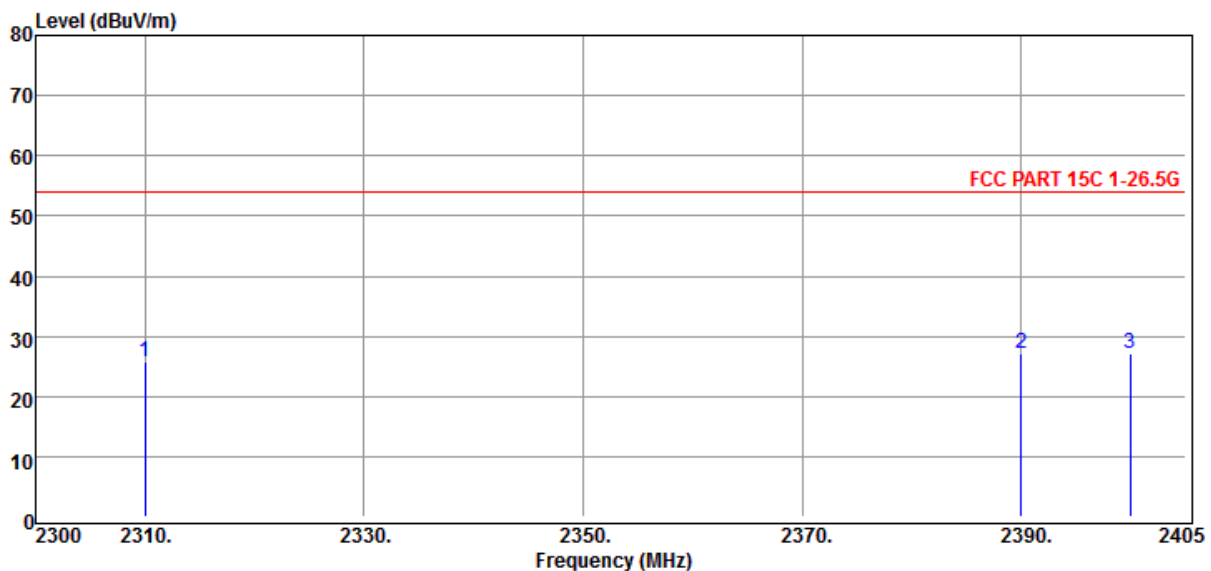
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Lower Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: 00
EUT Position	: X axis	Mode	: 4



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2310.00	42.28	-16.50	25.78	54.00	-28.22	VERTICAL	Peak
2	2390.00	43.32	-16.26	27.06	54.00	-26.94	VERTICAL	Peak
3	2399.96	43.49	-16.28	27.21	54.00	-26.79	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

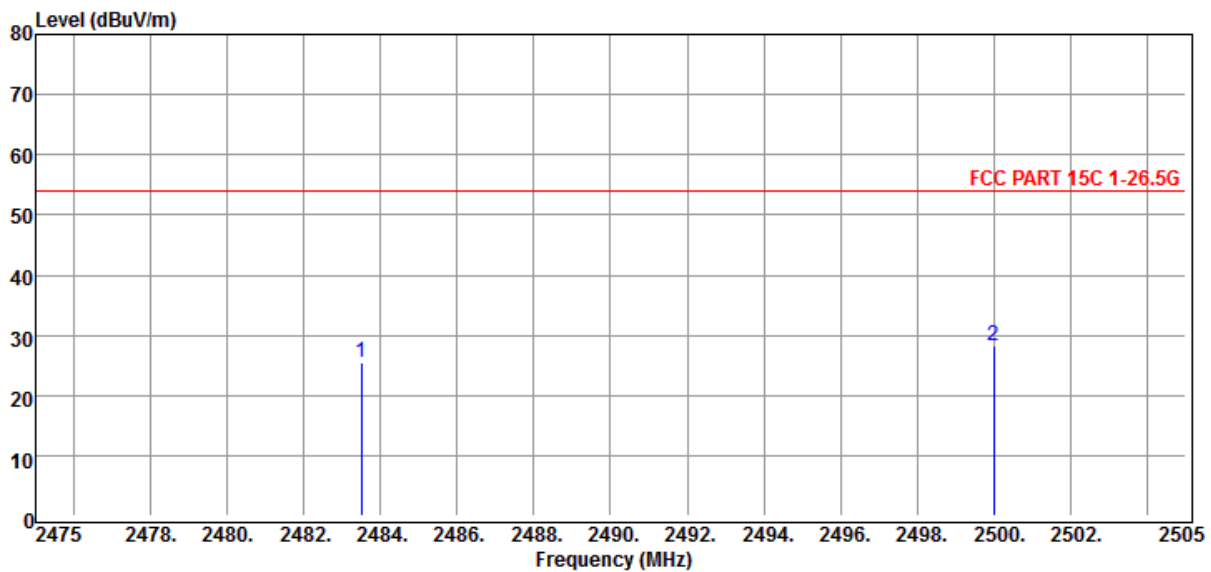
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Upper Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: 78
EUT Position	: X axis	Mode	: 6



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2483.50	41.44	-15.99	25.45	54.00	-28.55	HORIZONTAL	Peak
2	2499.99	44.12	-15.88	28.24	54.00	-25.76	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

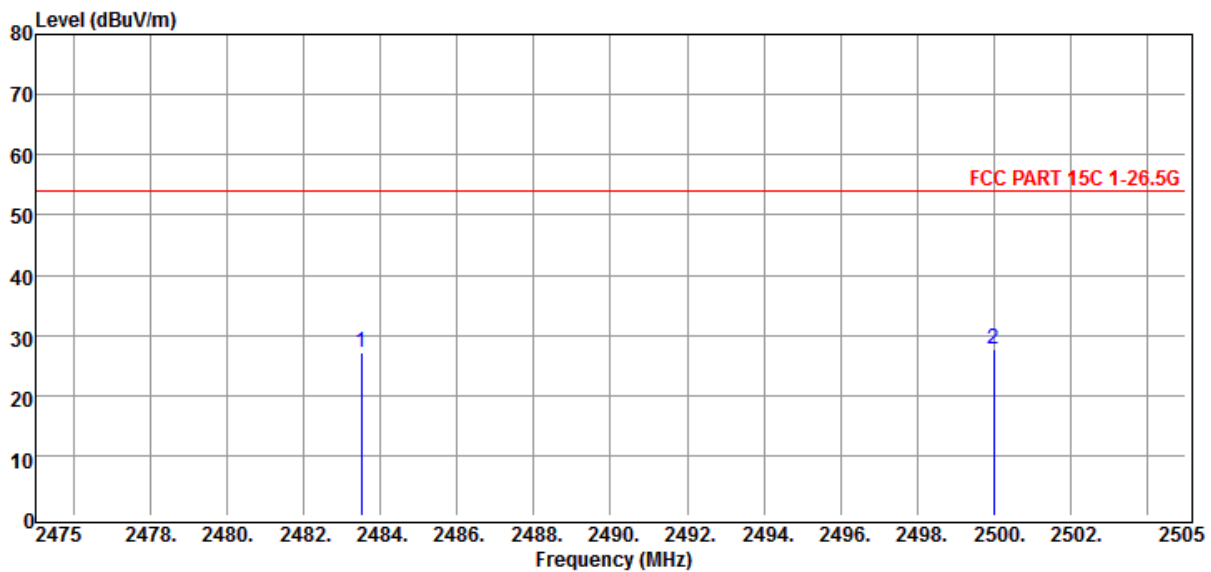
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Upper Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: 78
EUT Position	: X axis	Mode	: 6



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2483.49	43.20	-15.99	27.21	54.00	-26.79	VERTICAL	Peak
2	2500.00	43.58	-15.88	27.70	54.00	-26.30	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

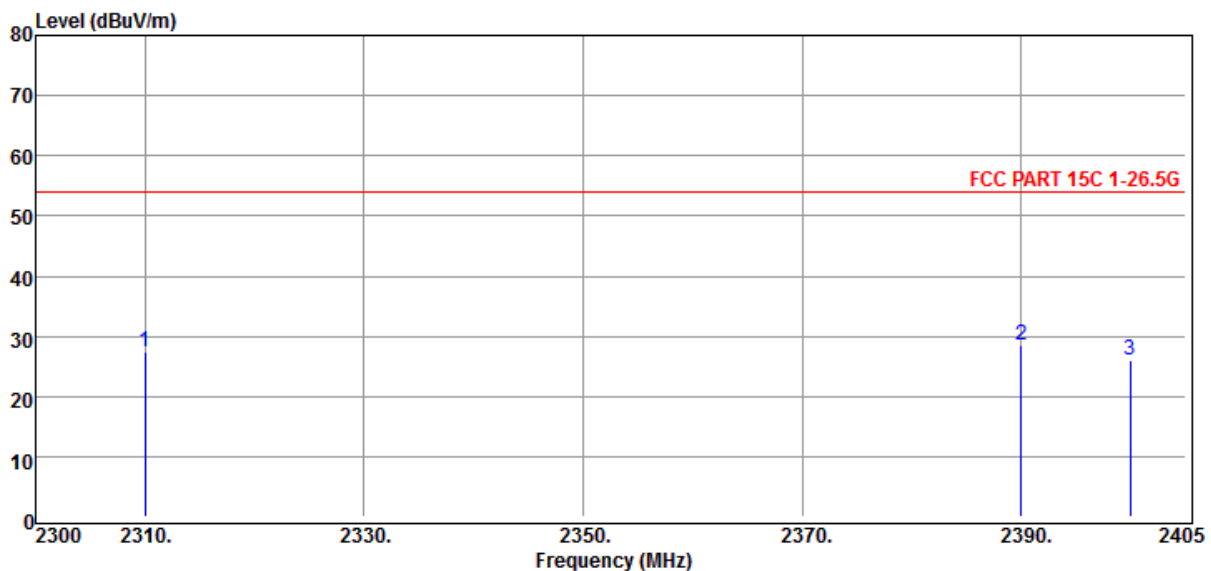
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Lower Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: 00
EUT Position	: X axis	Mode	: 7



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2310.00	43.81	-16.50	27.31	54.00	-26.69	HORIZONTAL	Peak
2	2390.00	44.72	-16.26	28.46	54.00	-25.54	HORIZONTAL	Peak
3	2399.96	42.42	-16.28	26.14	54.00	-27.86	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

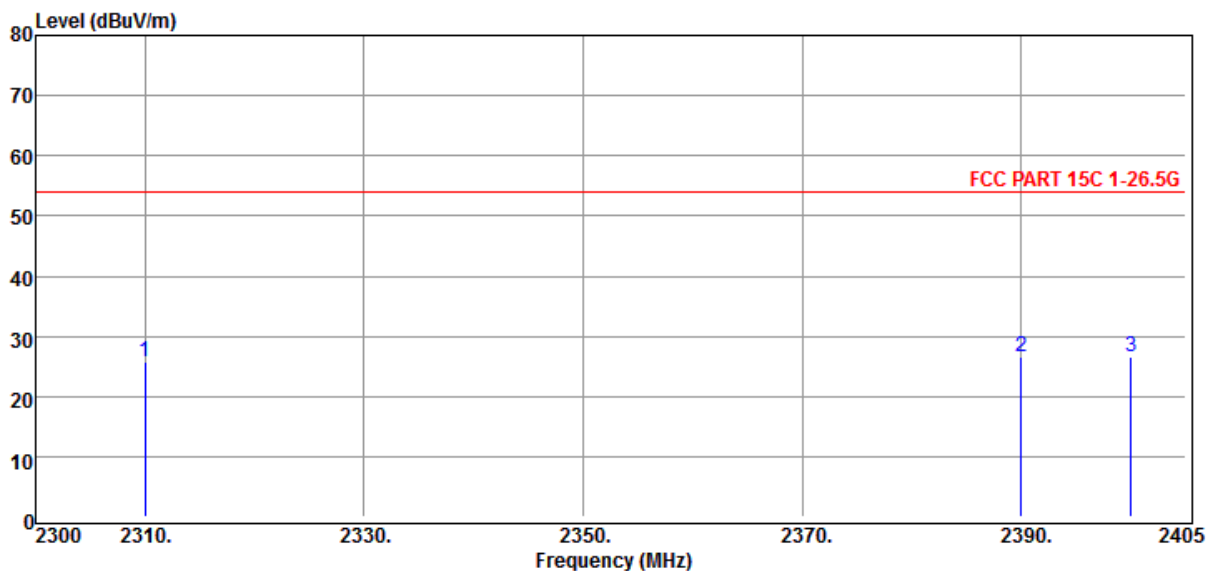
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Lower Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: 00
EUT Position	: X axis	Mode	: 7



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2309.98	42.34	-16.50	25.84	54.00	-28.16	VERTICAL	Peak
2	2390.00	42.82	-16.26	26.56	54.00	-27.44	VERTICAL	Peak
3	2400.00	42.72	-16.28	26.44	54.00	-27.56	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

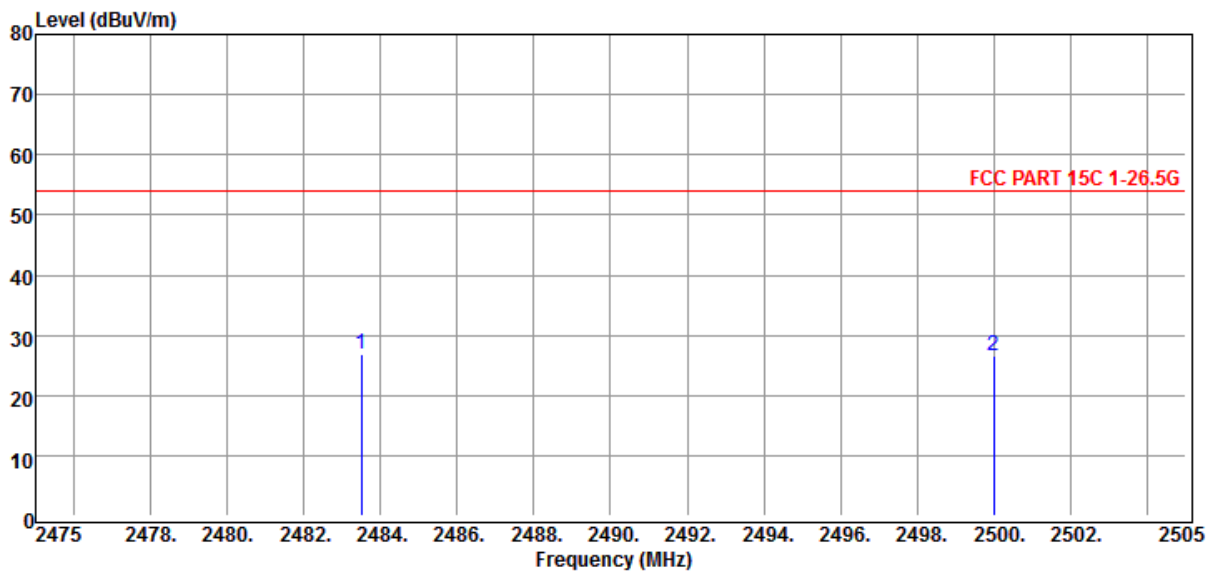
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Upper Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: 78
EUT Position	: X axis	Mode	: 9



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2483.49	42.85	-15.99	26.86	54.00	-27.14	HORIZONTAL	Peak
2	2500.00	42.46	-15.88	26.58	54.00	-27.42	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

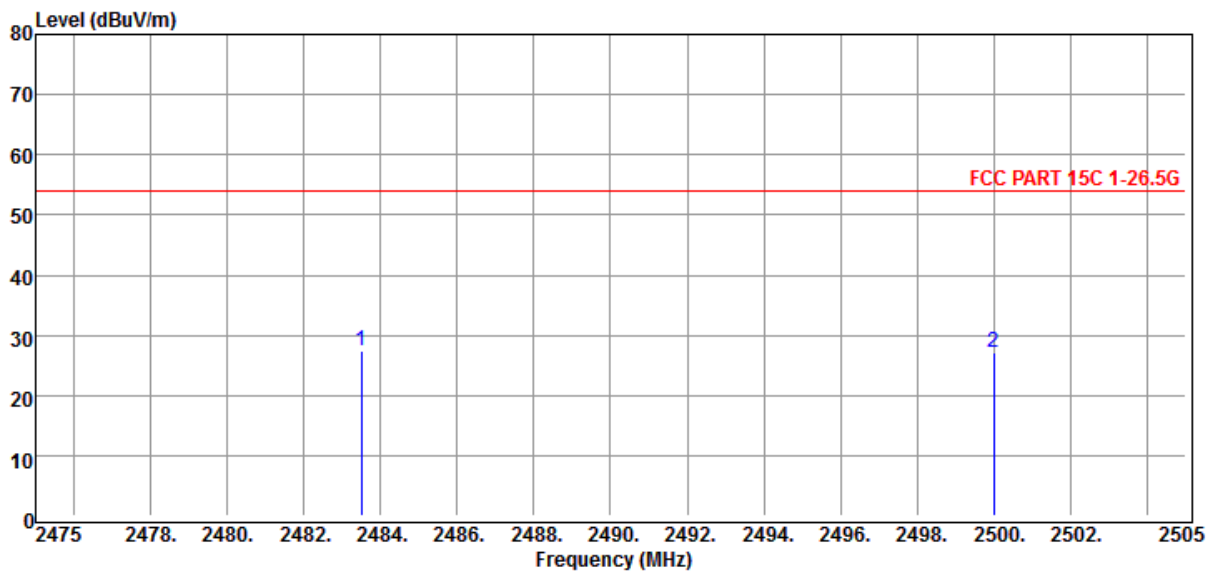
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
 - (a) Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

**Band-Edge Test Data (Upper Edge)**

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: 78
EUT Position	: X axis	Mode	: 9



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2483.50	43.34	-15.99	27.35	54.00	-26.65	VERTICAL	Peak
2	2499.99	43.07	-15.88	27.19	54.00	-26.81	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

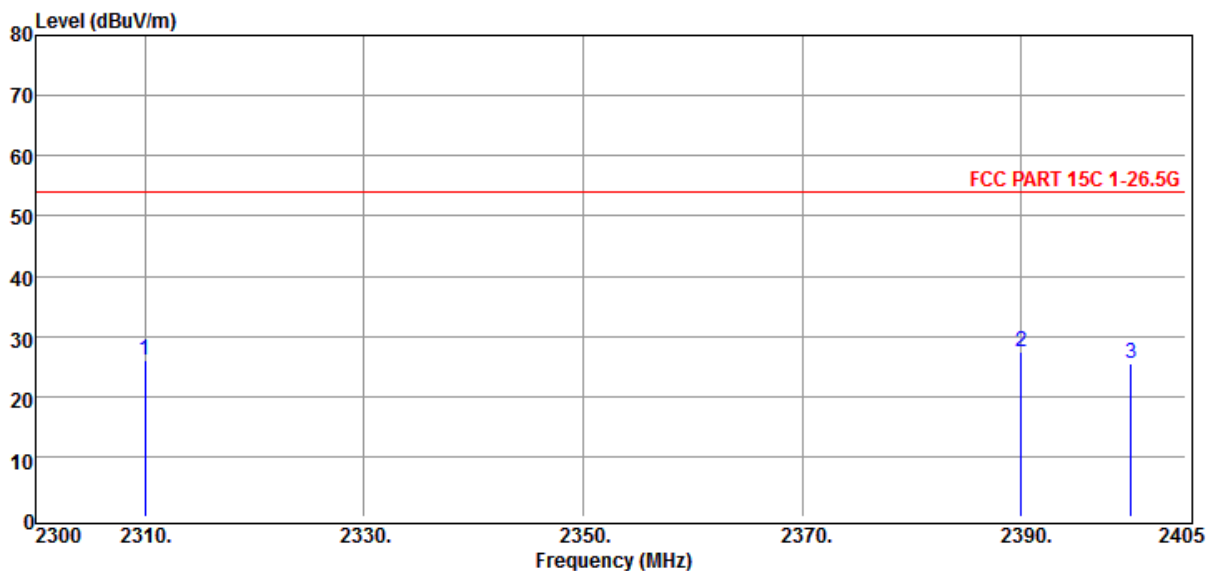
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Lower Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: 00
EUT Position	: X axis	Mode	: 10



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2309.98	42.66	-16.50	26.16	54.00	-27.84	HORIZONTAL	Peak
2	2390.00	43.69	-16.26	27.43	54.00	-26.57	HORIZONTAL	Peak
3	2400.00	41.80	-16.28	25.52	54.00	-28.48	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

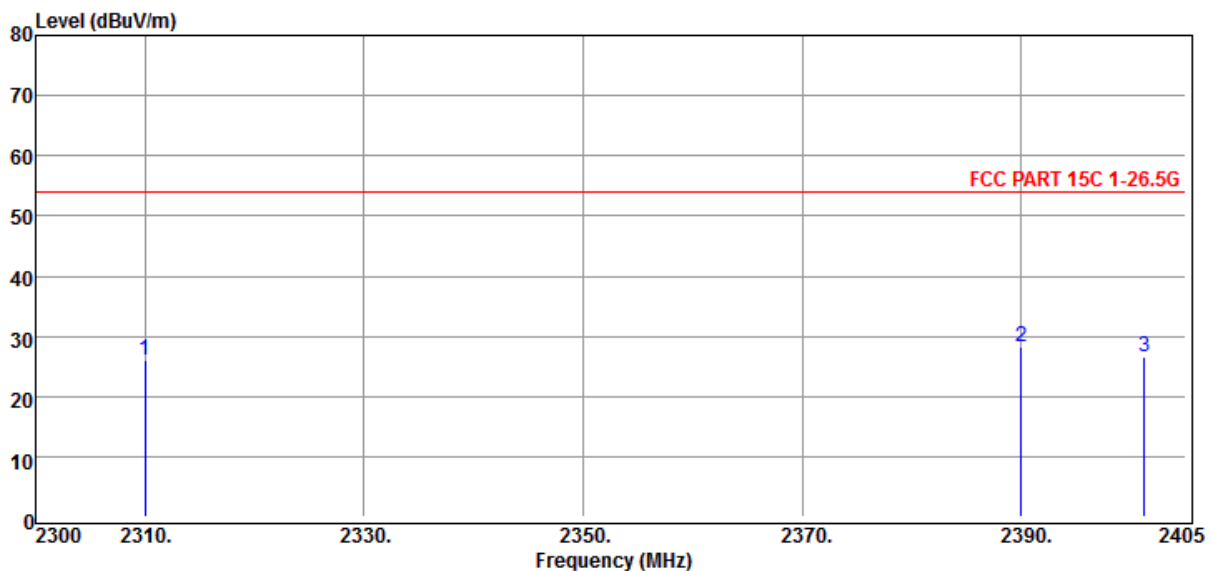
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Lower Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: 00
EUT Position	: X axis	Mode	: 10



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2310.00	42.57	-16.50	26.07	54.00	-27.93	VERTICAL	Peak
2	2390.00	44.52	-16.26	28.26	54.00	-25.74	VERTICAL	Peak
3	2401.22	42.92	-16.28	26.64	54.00	-27.36	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

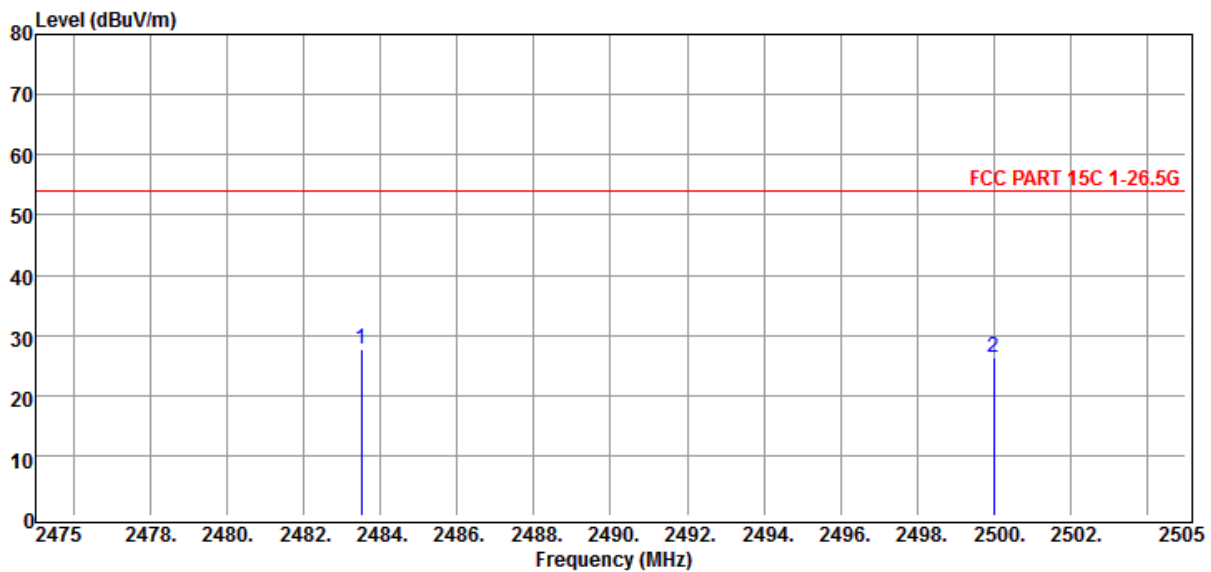
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Upper Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Horizontal	Channel	: 39
EUT Position	: X axis	Mode	: 12



No.	Freq MHz	Reading dBuV	C.F dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Antenna Pol.	Remark
1	2483.50	43.60	-15.99	27.61	54.00	-26.39	HORIZONTAL	Peak
2	2500.00	42.25	-15.88	26.37	54.00	-27.63	HORIZONTAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

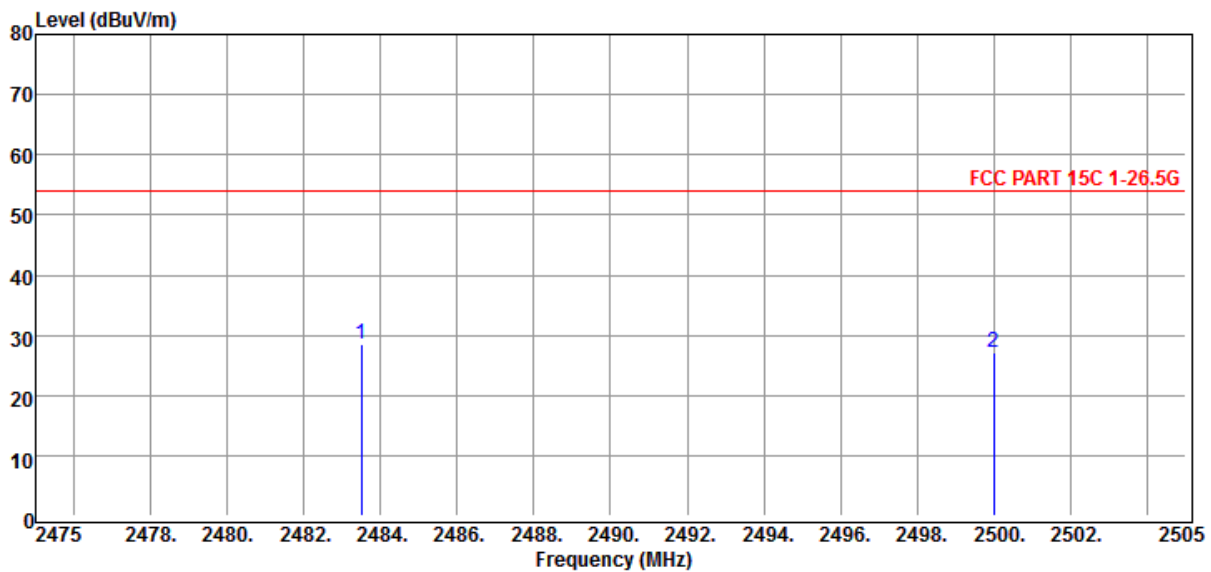
Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

- Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
- Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
- Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
- All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
- Spectrum setting:
 - Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

Band-Edge Test Data (Upper Edge)

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Polarization	: Vertical	Channel	: 39
EUT Position	: X axis	Mode	: 12



No.	Freq MHz	Reading dBμV	C.F dB/m	Result dBμV/m	Limit dBμV/m	Margin dB	Antenna Pol.	Remark
1	2483.50	44.38	-15.99	28.39	54.00	-25.61	VERTICAL	Peak
2	2499.99	42.98	-15.88	27.10	54.00	-26.90	VERTICAL	Peak

Note 1. C.F (Correction Factor) = Antenna factor + Cable loss - Preamp gain °

Note 2. Margin = Result - Limit ; Result = Reading + C.F °

Remark :

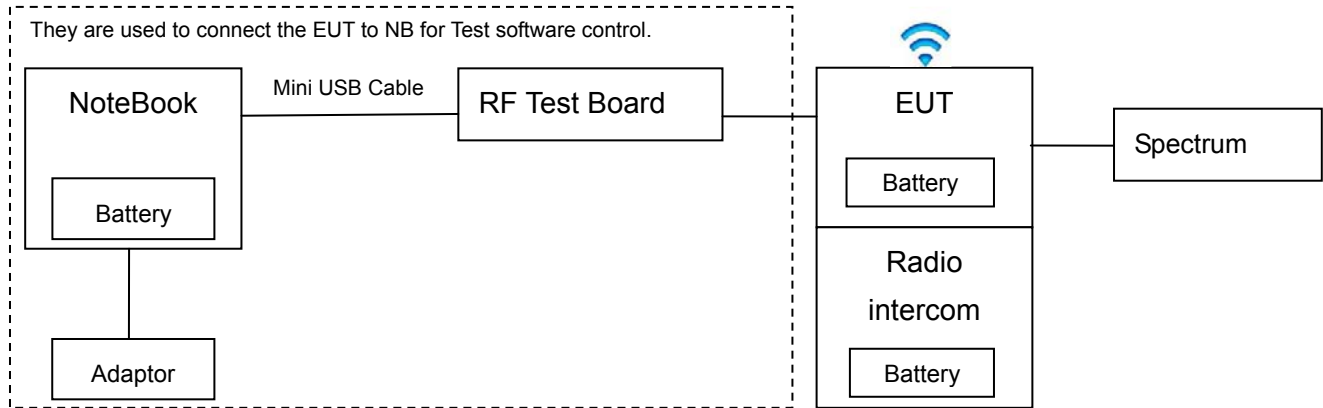
1. Measuring frequencies from 1 GHz to the 10th harmonic of highest fundamental frequency.
2. Measurements above show only up to 6 maximum emissions noted, or would be lesser if no specific emissions from the EUT are recorded (ie: margin > 20dB from the applicable limit) and considered that's already beyond the background noise floor.
3. Radiated emissions measured in frequency above 1000 MHz were made with an instrument using Peak detector mode and average detector mode of the emission shown in Actual FS column.
4. All readings are Peak values. None of the peak value reading exceeds the A.V. limit. Hence, A.V. reading was not measured.
5. Spectrum setting:
Peak Setting 1GHz to 10th harmonics of fundamental, RBW = VBW = 1MHz, Sweep = AUTO.

5 20 dB Bandwidth

5.1 Test Instruments

Refer to Sec. 1.2 Test Instruments.

5.2 Test Arrangement and Procedure



1. The transmitter output was connected to a spectrum analyzer (through an attenuator, if it's necessary).
2. The bandwidth of the fundamental frequency was measured by spectrum analyzer with 100kHz RBW and 300kHz VBW. Measured the -20 dB bandwidth and plotted the graph.

5.3 Limit

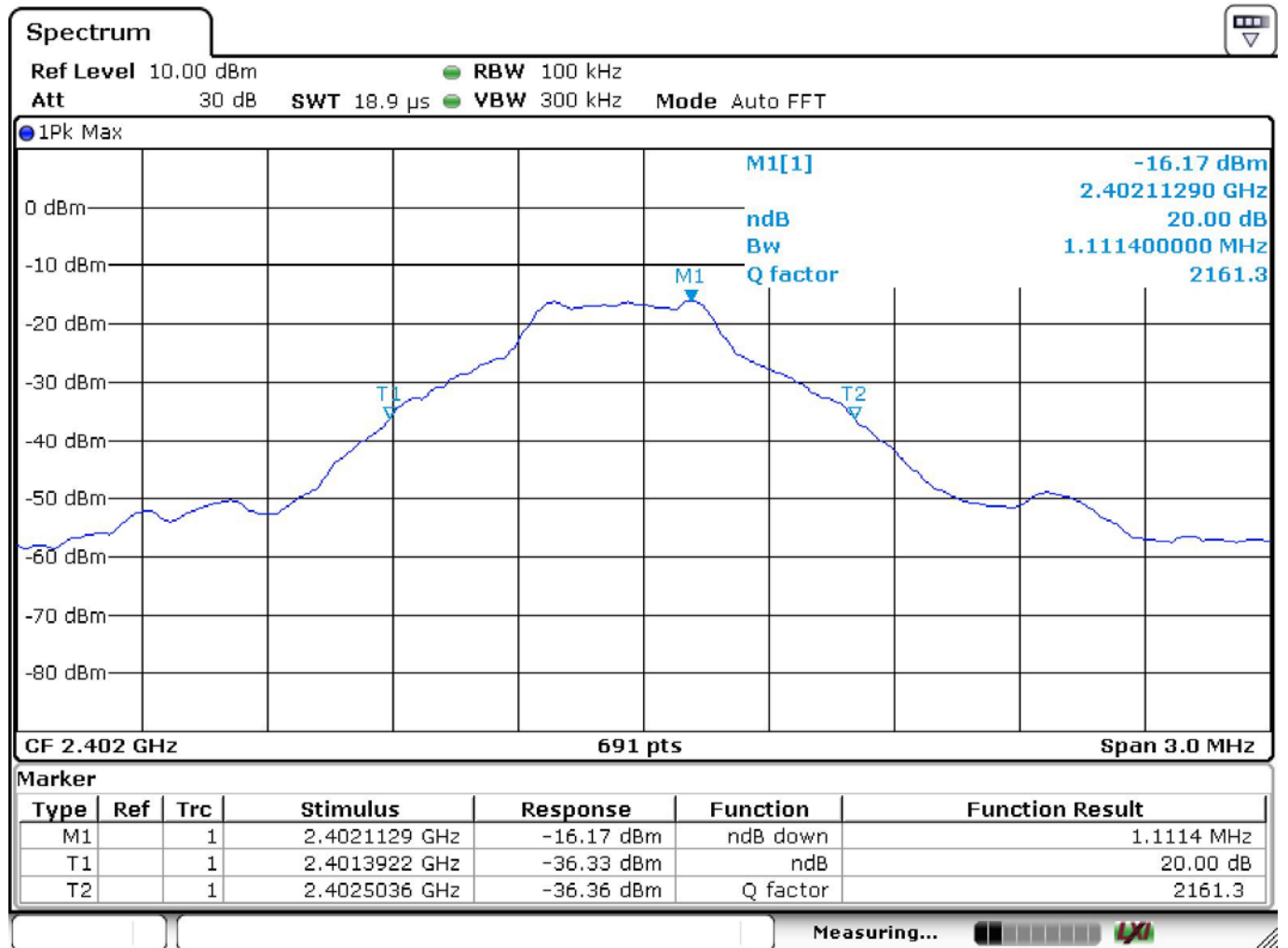
None; For report purpose only.

5.4 Test Result

No non-compliance noted.

The final test data are shown on the following page(s).

Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Test Mode	: 1	Channel	: 00





Test Mode : 2

Channel : 39

Spectrum



Ref Level 10.00 dBm

RBW 100 kHz

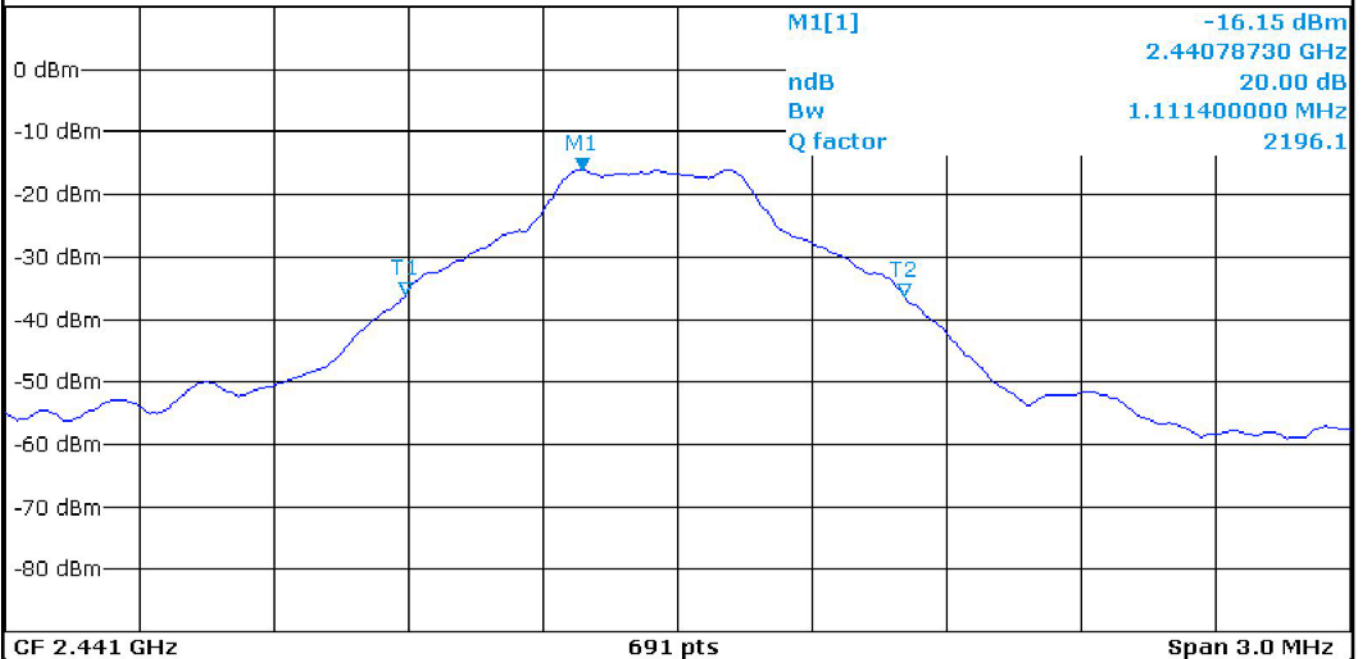
Att 30 dB

SWT 18.9 μ s

VBW 300 kHz

Mode Auto FFT

1Pk Max



Marker

Type	Ref	Trc	Stimulus	Response	Function	Function Result
M1		1	2.4407873 GHz	-16.15 dBm	ndB down	1.1114 MHz
T1		1	2.4403922 GHz	-35.99 dBm	ndB	20.00 dB
T2		1	2.4415036 GHz	-36.19 dBm	Q factor	2196.1

Measuring...





Test Mode : 3

Channel : 78

Spectrum



Ref Level 10.00 dBm

RBW 100 kHz

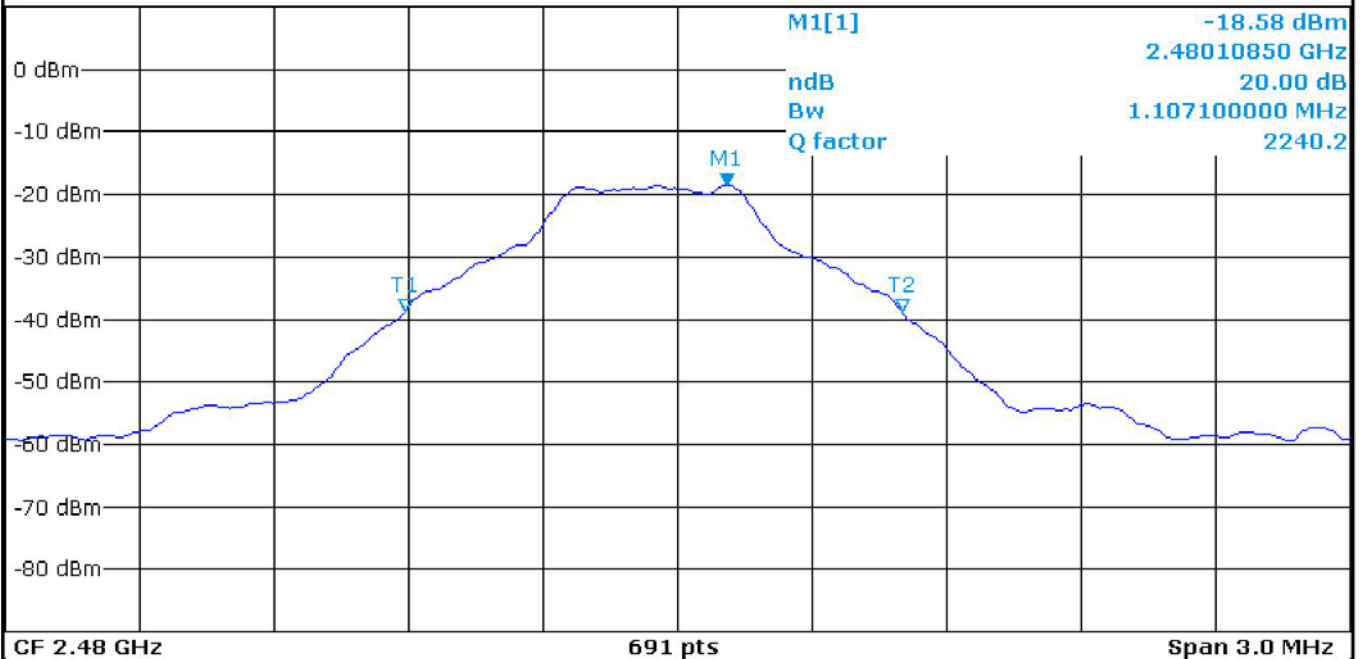
Att 30 dB

SWT 18.9 μ s

VBW 300 kHz

Mode Auto FFT

1Pk Max



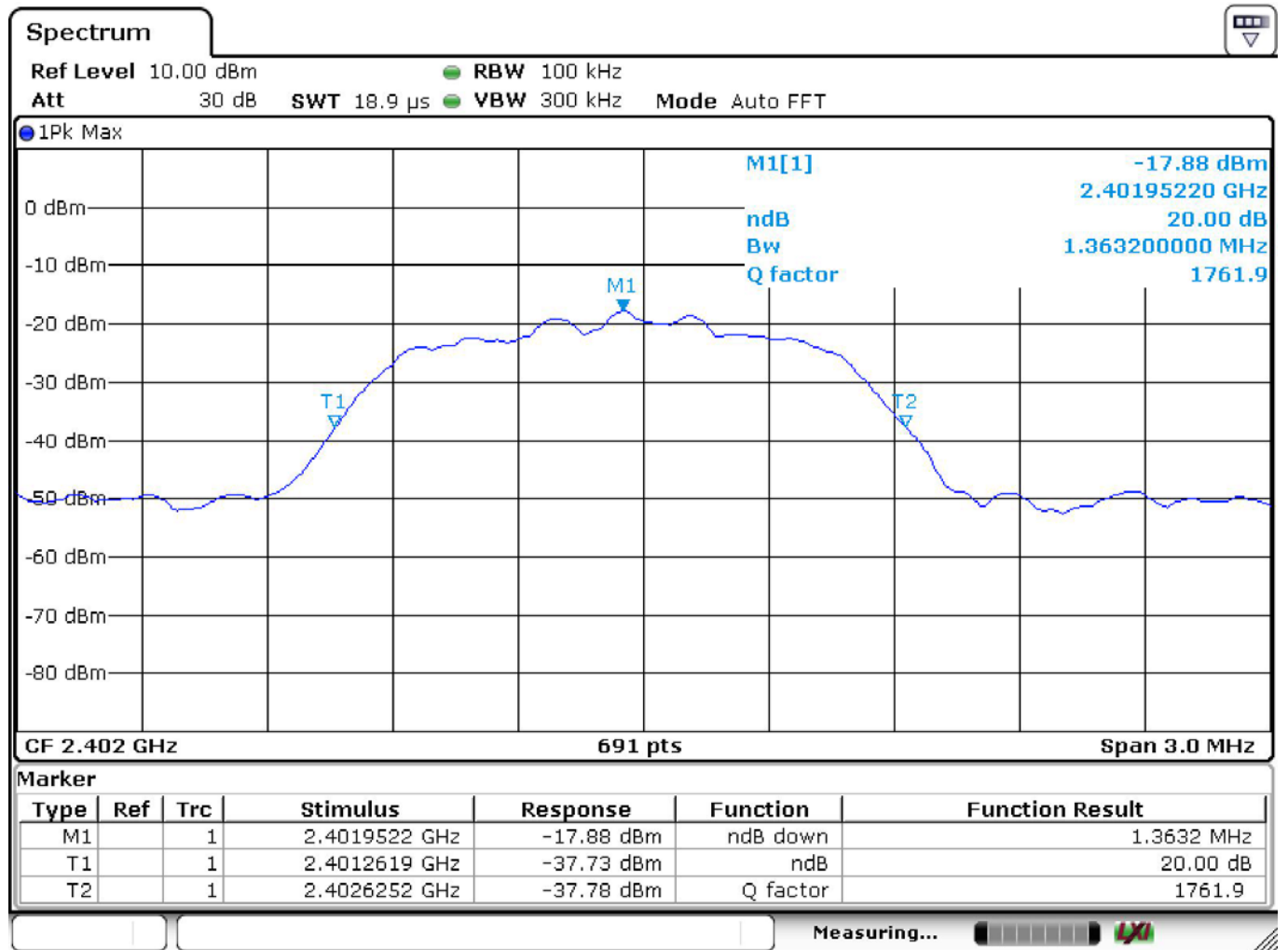
Marker

Type	Ref	Trc	Stimulus	Response	Function	Function Result
M1		1	2.4801085 GHz	-18.58 dBm	ndB down	1.1071 MHz
T1		1	2.4793922 GHz	-38.66 dBm	ndB	20.00 dB
T2		1	2.4804993 GHz	-38.73 dBm	Q factor	2240.2

Measuring...



Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Test Mode	: 4	Channel	: 00





Test Mode : 5

Channel : 39

Spectrum



Ref Level 10.00 dBm

RBW 100 kHz

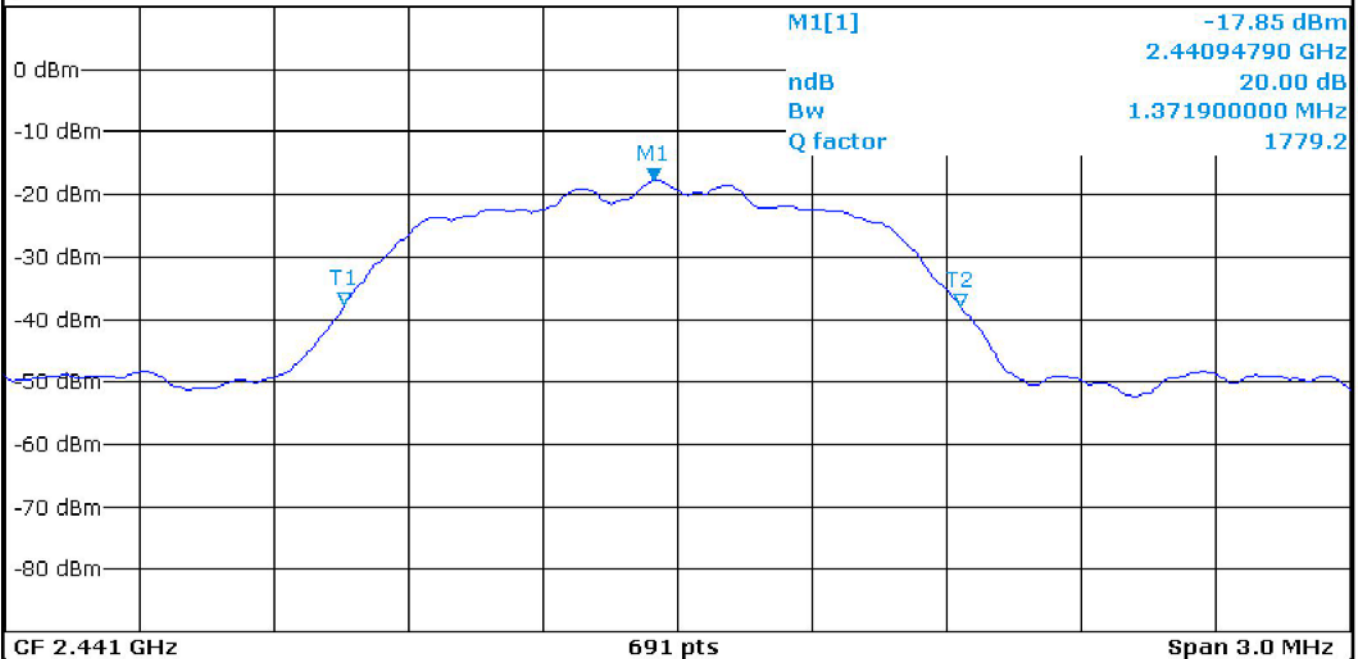
Att 30 dB

SWT 18.9 μ s

VBW 300 kHz

Mode Auto FFT

1Pk Max



Marker

Type	Ref	Trc	Stimulus	Response	Function	Function Result
M1		1	2.4409479 GHz	-17.85 dBm	ndB down	1.3719 MHz
T1		1	2.4402576 GHz	-37.65 dBm	ndB	20.00 dB
T2		1	2.4416295 GHz	-37.94 dBm	Q factor	1779.2

Measuring...





Test Mode : 6

Channel : 78

Spectrum



Ref Level 10.00 dBm

RBW 100 kHz

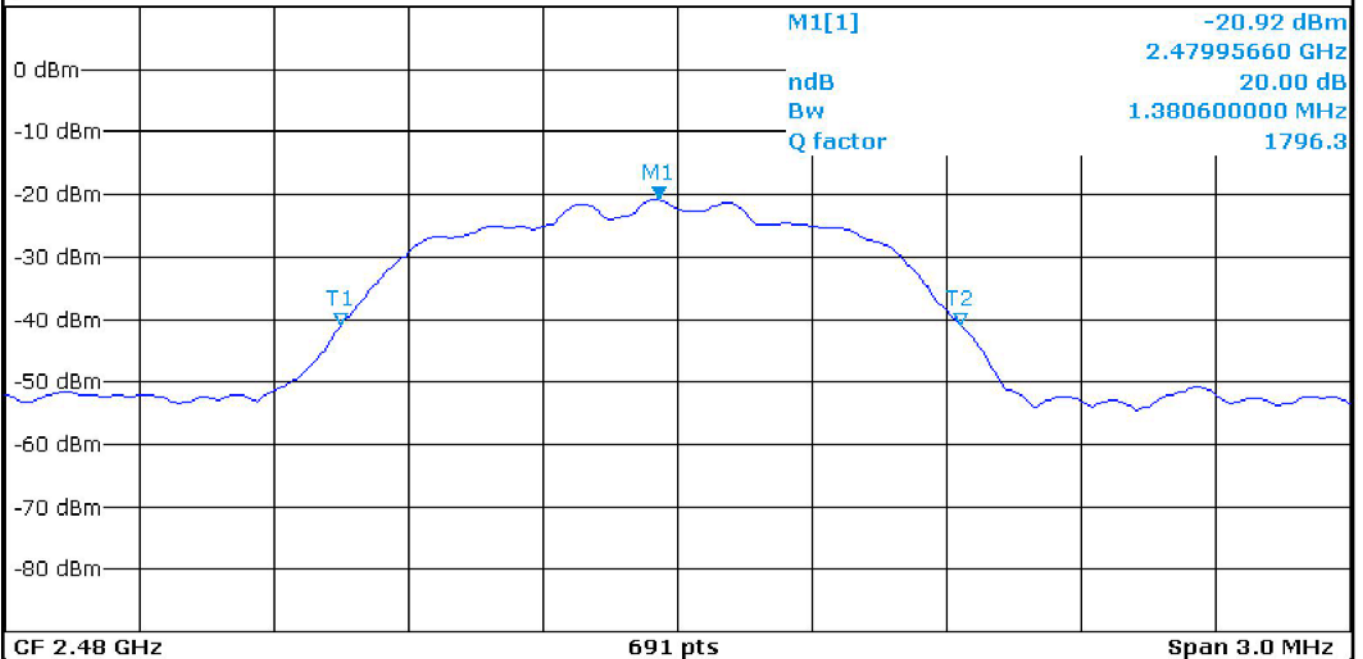
Att 30 dB

SWT 18.9 μ s

VBW 300 kHz

Mode Auto FFT

1Pk Max



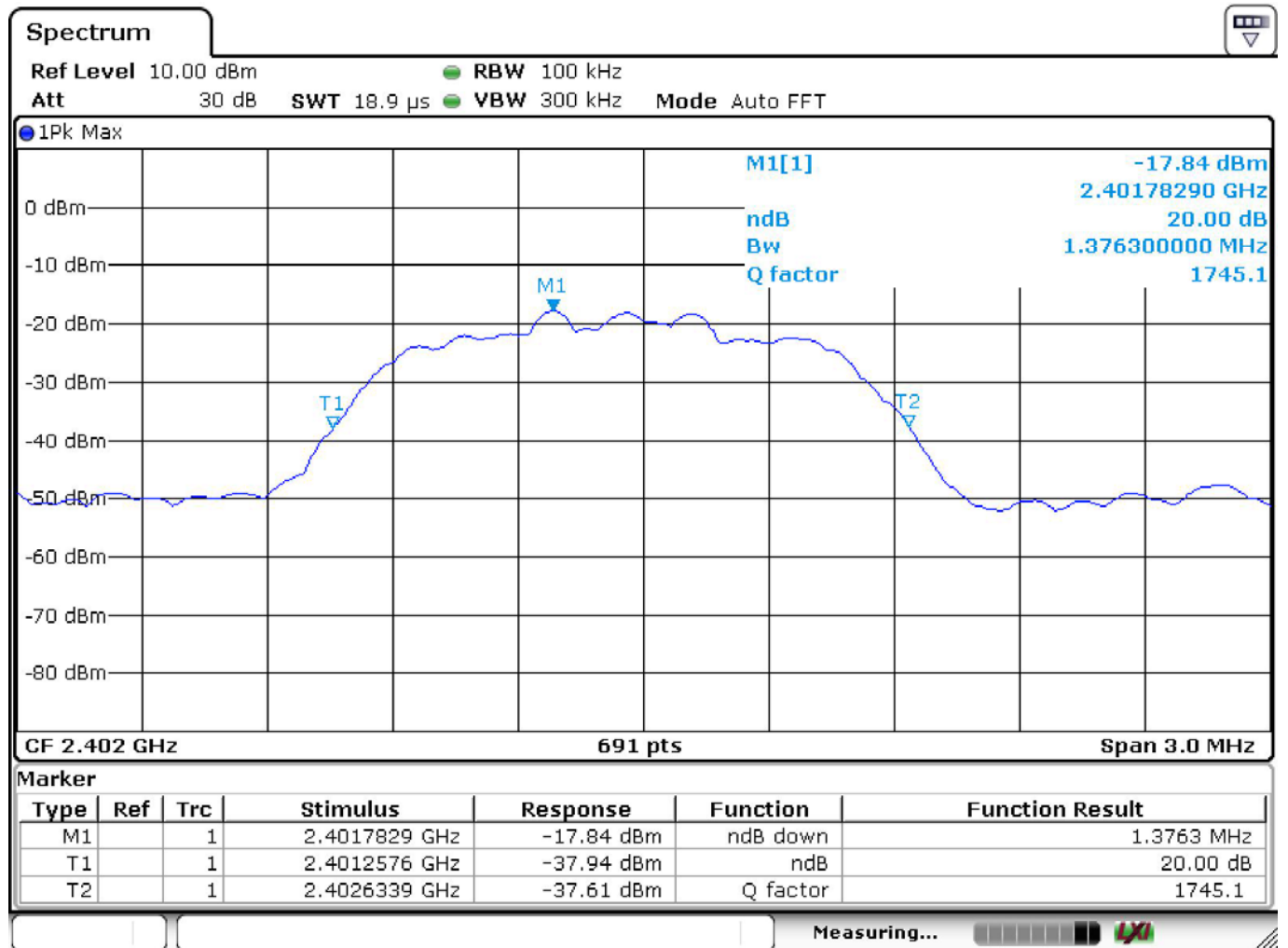
Marker

Type	Ref	Trc	Stimulus	Response	Function	Function Result
M1		1	2.4799566 GHz	-20.92 dBm	ndB down	1.3806 MHz
T1		1	2.4792489 GHz	-40.93 dBm	ndB	20.00 dB
T2		1	2.4806295 GHz	-40.91 dBm	Q factor	1796.3

Measuring...



Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Test Mode	: 7	Channel	: 00





Test Mode : 8

Channel : 39

Spectrum



Ref Level 10.00 dBm

RBW 100 kHz

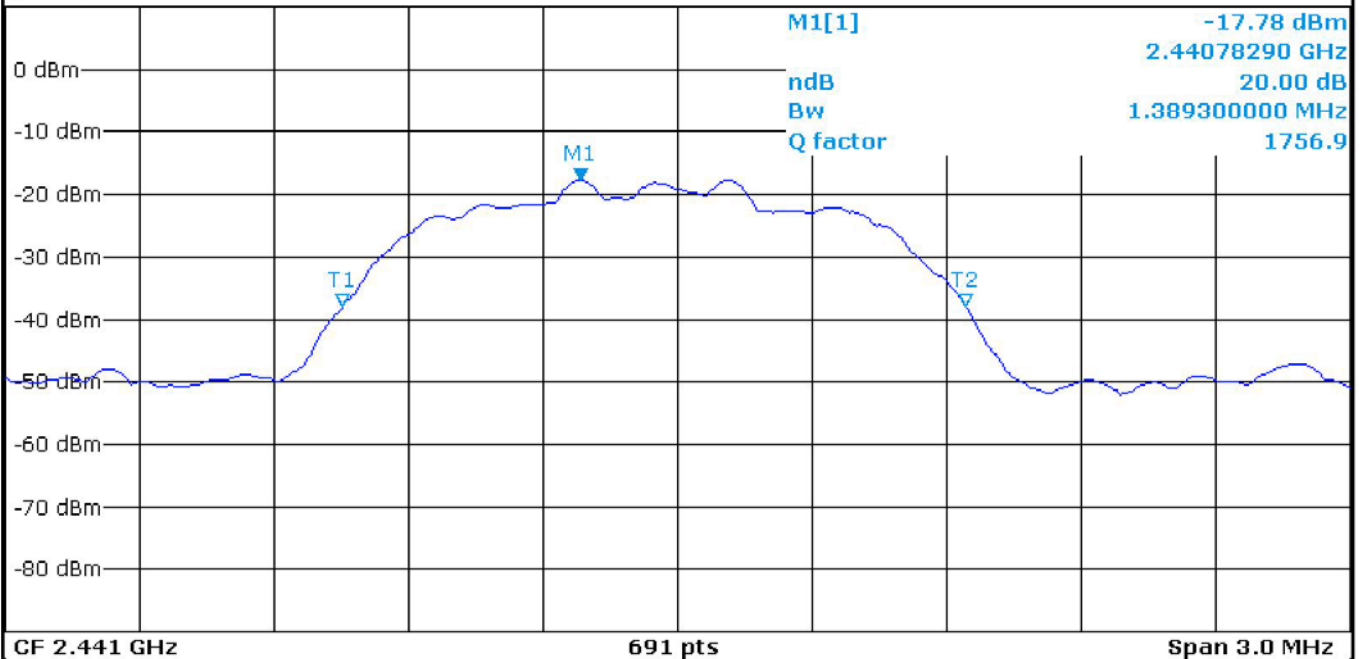
Att 30 dB

SWT 18.9 μ s

VBW 300 kHz

Mode Auto FFT

1Pk Max



Marker

Type	Ref	Trc	Stimulus	Response	Function	Function Result
M1		1	2.4407829 GHz	-17.78 dBm	ndB down	1.3893 MHz
T1		1	2.4402533 GHz	-37.93 dBm	ndB	20.00 dB
T2		1	2.4416425 GHz	-37.92 dBm	Q factor	1756.9

Measuring...





Test Mode : 9

Channel : 78

Spectrum



Ref Level 10.00 dBm

RBW 100 kHz

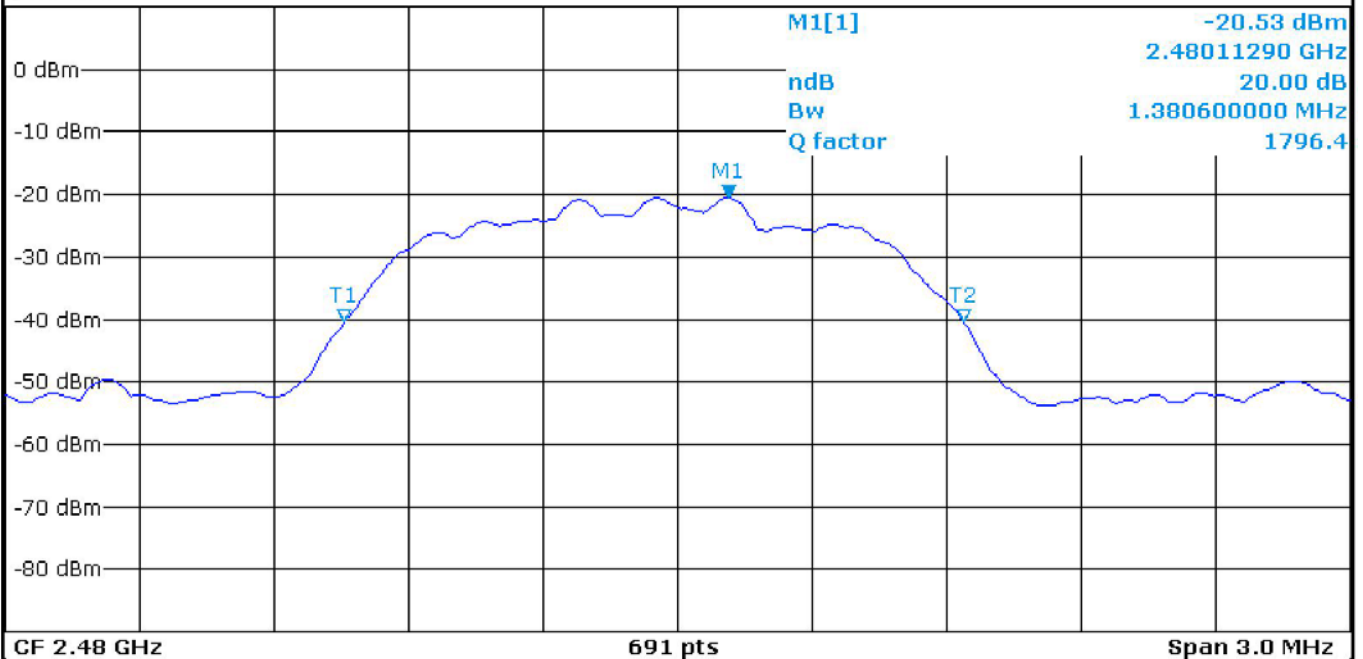
Att 30 dB

SWT 18.9 μ s

VBW 300 kHz

Mode Auto FFT

1Pk Max



Marker

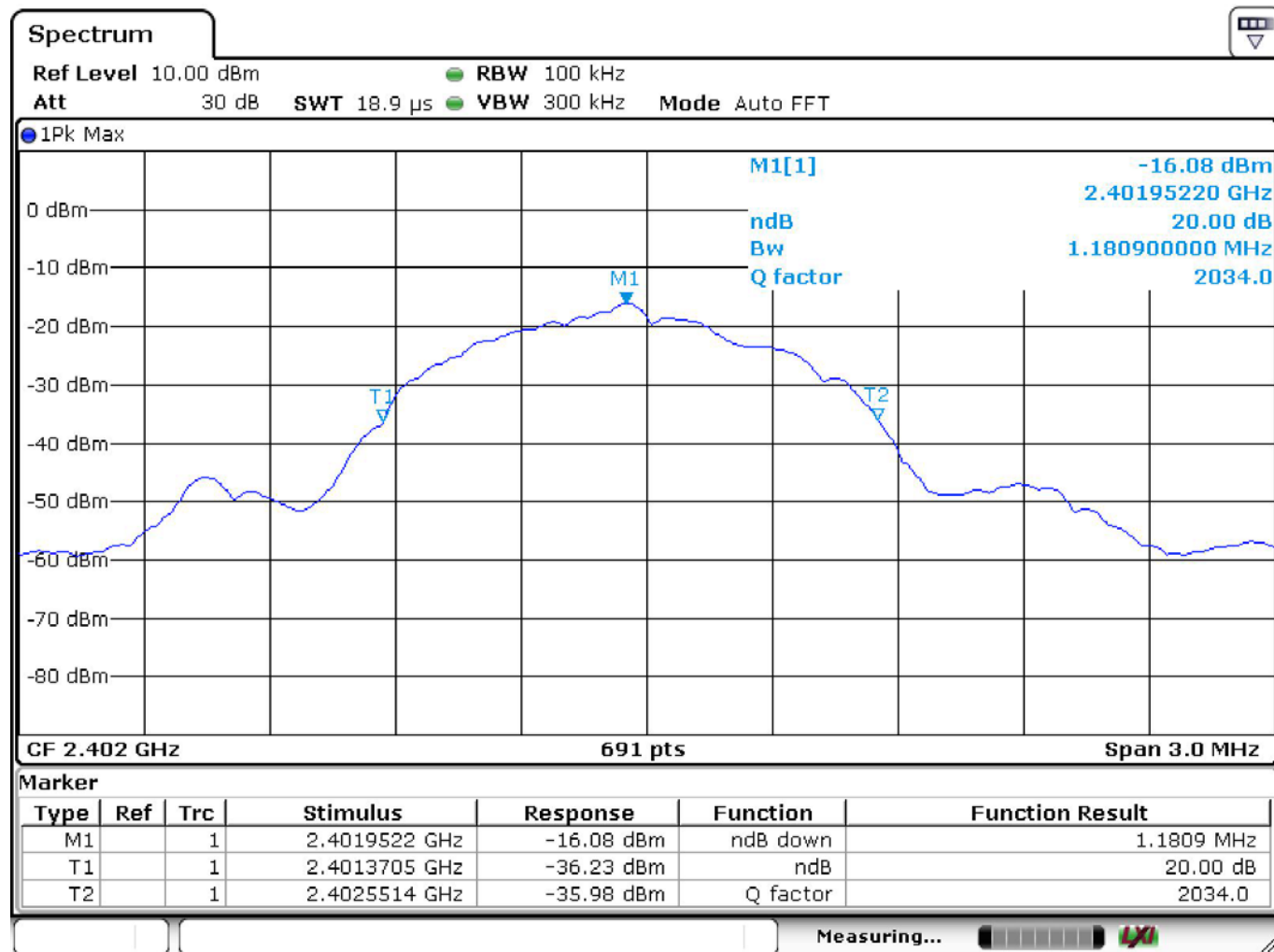
Type	Ref	Trc	Stimulus	Response	Function	Function Result
M1		1	2.4801129 GHz	-20.53 dBm	ndB down	1.3806 MHz
T1		1	2.4792576 GHz	-40.35 dBm	ndB	20.00 dB
T2		1	2.4806382 GHz	-40.47 dBm	Q factor	1796.4

Measuring...





Temperature	: 24.7°C	Humidity	: 76%
Test Date	: 2021-01-25	Tested by	: Andrew Lin
Test Mode	: 10	Channel	: 00





Test Mode : 11

Channel : 20

Spectrum



Ref Level 10.00 dBm

RBW 100 kHz

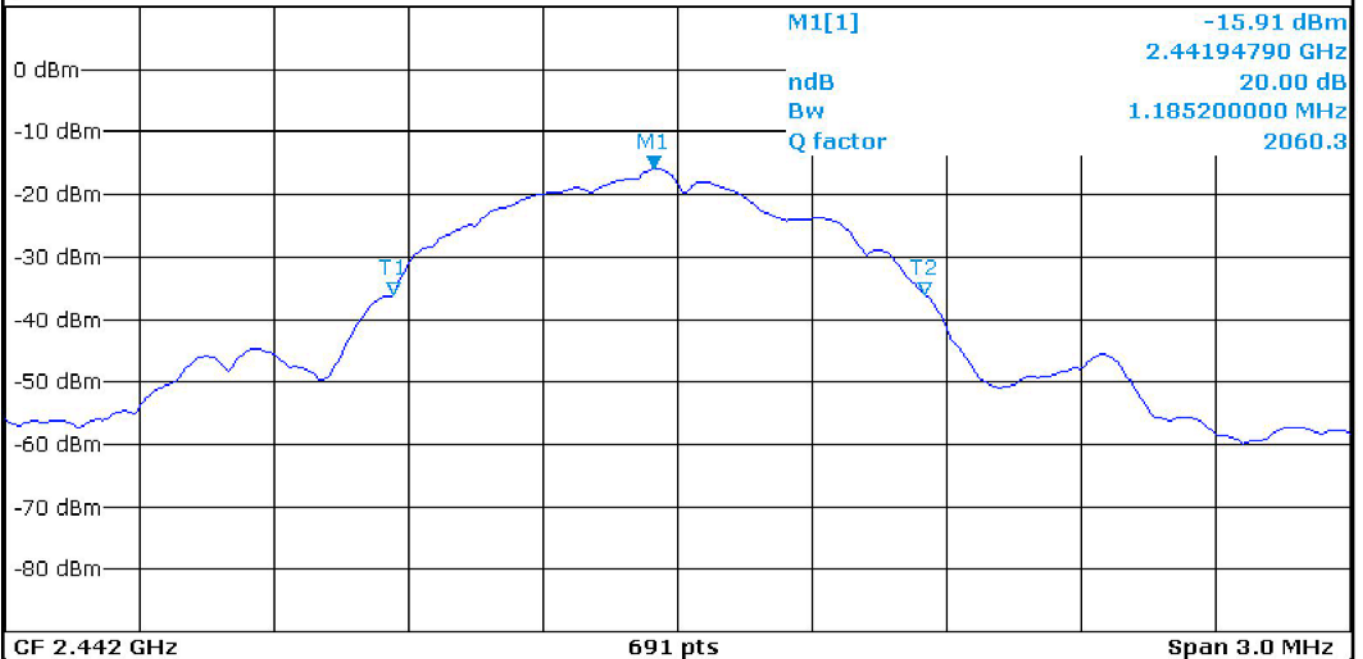
Att 30 dB

SWT 18.9 μ s

VBW 300 kHz

Mode Auto FFT

1Pk Max



Marker

Type	Ref	Trc	Stimulus	Response	Function	Function Result
M1		1	2.4419479 GHz	-15.91 dBm	ndB down	1.1852 MHz
T1		1	2.4413661 GHz	-35.94 dBm	ndB	20.00 dB
T2		1	2.4425514 GHz	-36.02 dBm	Q factor	2060.3

Measuring...





Test Mode : 12

Channel : 39

Spectrum



Ref Level 10.00 dBm

RBW 100 kHz

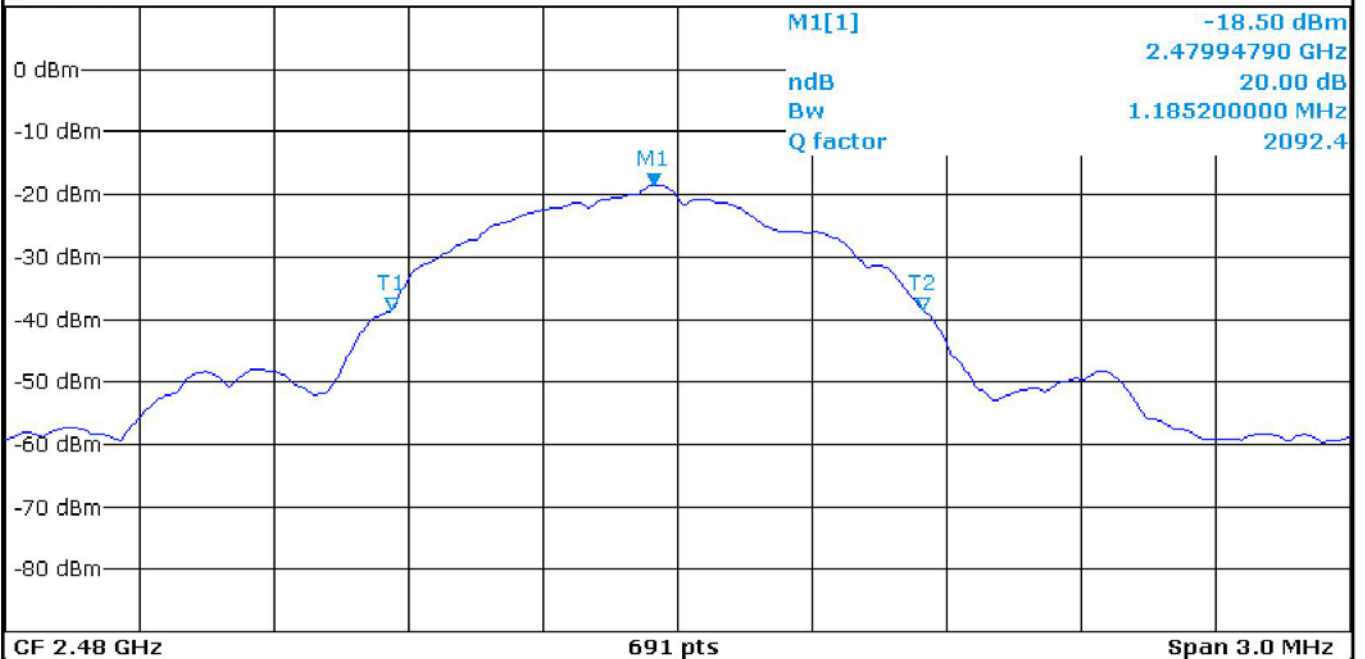
Att 30 dB

SWT 18.9 μ s

VBW 300 kHz

Mode Auto FFT

1Pk Max



Marker

Type	Ref	Trc	Stimulus	Response	Function	Function Result
M1		1	2.4799479 GHz	-18.50 dBm	ndB down	1.1852 MHz
T1		1	2.4793618 GHz	-38.47 dBm	ndB	20.00 dB
T2		1	2.480547 GHz	-38.55 dBm	Q factor	2092.4

Measuring...





6 Antenna requirement

6.1 Limit (§ 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 uniue 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 carrier current devices or to devices operated under the provisions of § 15.211, § 15.213, § 15.217, § 15.219, or § 15.221. Further, 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.

6.2 Test Result

Compliance.

The EUT applies a Chip Ceramic antenna.

-----End Of Test Report-----