




Product Name: Shelf Floor Lamp	Report No: FCC022022-03784RF0
Product Model: WLM1600-FLA-8W-03, WLM1600-FLA-8W-04, YL-C-006 (Only name model, appearance color is different, other things are the same)	Security Classification: Open
Version: A0	Total Page: 40

TIRT Testing Report

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<i>Stone Tang</i>	<i>Randy Lv</i>	<i>Daniel Chen</i>	

RF TEST REPORT

FCC ID: 2AZRW-YLWXCFLAD

According to

47 CFR FCC Part 15, Subpart C

ANSI C63.10:2013

Equipment : Shelf Floor Lamp
Model No. : WLM1600-FLA-8W-03, WLM1600-FLA-8W-04, YL-C-006 (Only name model, appearance color is different, other things are the same)
Trademark : /
Product No. : 20220725012041
Applicant : Dong Guan Ya Li Electric Appliance Co., Ltd.
Address : THE FIVE STREET JINQIANLING JITIGANG HUANGJIANG TOWN,
DONGGUAN CITY, GUANGDONG 523000 CHINA

- The test result referred exclusively to the presented test model /sample.
- Without written approval of TIRT Inc. the test report shall not reproduced except in full.
- Test Date: 2022.07.04-2022.07.29

Lab: Beijing TIRT Technology Service Co.,Ltd Shenzhen
Add: 101, 3 # Factory Building, Gongjin Electronics Shatin Community, Kengzi Street,
Pingshan District, Shenzhen, China
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Table of Contents

History of this test report.....	5
1. General Information.....	6
1.1 Applicant.....	6
1.2 Manufacturer.....	6
1.3 Factory.....	6
1.4 Basic Description of Equipment Under Test.....	6
1.5 Application of Standard.....	6
1.6 Operating Modes of EUT.....	7
2. Summary of Test Results	8
2.1 Summary of Test Items	8
2.2 Test Instruments	9
2.3 Configuration and Connections with EUT	10
2.4 Test Condition	10
2.5 Measurement Uncertainty.....	11
2.6 Test Location.....	11
2.7 Deviation from Standards	11
2.8 Abnormalities from Standard Conditions.....	11
3. Test Procedure And Results	12
3.1 Antenna Requirement.....	12
3.2 AC Power Line Conducted Emission	13
3.2.1 Limit.....	13
3.2.2 Test Procedure	13
3.2.3 Test Setup	14
3.2.4 Test Result of AC Power Line Conducted Emission	15
3.3 Radiated Emissions up to 1 GHz	17
3.3.1 Limit.....	17
3.3.2 Test Procedure	17
3.3.3 Test Setup	18
3.3.4 Test Result of Radiated Emission	20
3.4 20dB bandwidth measurement	36

3.4.1	Limit.....	36
3.4.2	Test Procedure	36
3.4.3	Test Setup	36
3.4.4	EUT operating condition.....	37
3.4.5	Test results	37
4.	Appendix 1 Photographs of Test Set-up	39
5.	Appendix 2 Photographs of EUT	40

History of this test report

Original Report Issue Date: 2022.07.29

- No additional attachment
- Additional attachments were issued following record

Attachment No.	Issue Date	Description

1. General Information

1.1 Applicant

Dong Guan Ya Li Electric Appliance Co., Ltd.

THE FIVE STREET JINQIANLING JITIGANG HUANGJIANG TOWN, DONGGUAN CITY,
GUANGDONG 523000 CHINA

1.2 Manufacturer

Dong Guan Ya Li Electric Appliance Co., Ltd.

THE FIVE STREET JINQIANLING JITIGANG HUANGJIANG TOWN, DONGGUAN CITY,
GUANGDONG 523000 CHINA

1.3 Factory

Dong Guan Ya Li Electric Appliance Co., Ltd.

THE FIVE STREET JINQIANLING JITIGANG HUANGJIANG TOWN, DONGGUAN CITY,
GUANGDONG 523000 CHINA

1.4 Basic Description of Equipment Under Test

Items:	Description:
Equipment Name	Shelf Floor Lamp
Model Number	WLM1600-FLA-8W-03, WLM1600-FLA-8W-04, YL-C-006 (Only name model, appearance color is different, other things are the same)
Trademark	/
Power supply	INPUT: AC120V/60Hz 300W Max. OUTPUT: DC 5V 2.1A
Modulation type	ASK
Operating frequency	110.5kHz~180kHz
Antenna type	Coil Antenna

Note: For a more detailed features description, please refer to the manufacturer's specification or the User's Manual.

1.5 Application of Standard

47 CFR FCC Part 15, Subpart C and ANSI C63.10:2013

1.6 Operating Modes of EUT

The EUT was tested under the following modes the final worst mode was marked in boldface and recorded in this report. We have evaluated 1%, 50% and 99% battery charging mode, and the worst mode (99%) is showed in this report.

Test frequency	Test mode	Test voltage
110.5~130kHz	Wireless Charging	AC 120V/60Hz
160~180kHz	Standby	

2. Summary of Test Results

2.1 Summary of Test Items

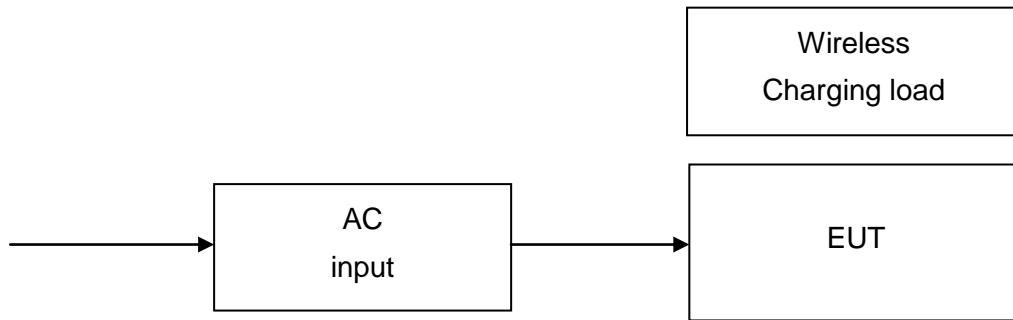
47 CFR FCC Part 15, Subpart C			
Test Item	FCC Clause	Results	Remarks
AC Power Conducted Emission	15.207	Pass	Meet the requirement of the limit
Radiated Emission	15.209	Pass	Meet the requirement of the limit
Antenna Requirement	15.203	Pass	Meet the requirement of the limit
20dB Bandwidth	15.215(c)	Pass	Meet the requirement of the limit

Note: NA denotes Not Applicable in this part

2.2 Test Instruments

No.	Equipment	Manufacturer	Type No.	Serial No.	Cal. date (yyyy/mm/dd)	Cal. Due date (yyyy/mm/dd)
Conducted Emission						
1	EMI Receiver	Rohde&Schwarz	ESCI	100718	2021/11/10	2022/11/09
2	AMN	Rohde&Schwarz	ENV216	100075	2021/11/10	2022/11/09
3	AMN	Schwarzbeck	NSLK8127	#829	2021/11/10	2022/11/09
4	ECSI RF IN RF Cable	Rohde&Schwarz	RP-X1	\	2020/11/18	2022/11/17
5	ECSI RF IN RF Cable	Rohde&Schwarz	Sapre sm	\	2021/11/10	2022/11/09
6	Testing Software	EZ-EMC	TW-03A2			
Radiated Emission						
1	EMI Receiver	Rohde&Schwarz	ESR7	102013	2021/11/10	2022/11/09
2	Spectrum analyzer	Rohde&Schwarz	FSV30	103741	2021/11/10	2022/11/09
3	Spectrum analyzer	KEYSIGHT	N9010A	MY5144015 8	2021/11/10	2022/11/09
4	Integral Antenna	Schwarzbeck	VULB 9163	9163-868	2021/12/26	2022/12/25
5	Integral Antenna	Schwarzbeck	FMZB 1519B	00029	2021/11/05	2022/11/04
6	Integral Antenna	Schwarzbeck	BBHA 9170	9170#685	2021/11/07	2022/11/06
7	Preamplifier	CD Systems Inc	PAP-03036 -30	85060000	2021/11/10	2022/11/09
8	Preamplifier	Schwarzbeck	BBV9721	9721-019	2021/11/10	2022/11/09
9	Preamplifier	emci	EMC01263 0SE	980417	2021/11/10	2022/11/09
10	ECSI RF IN RF Cable	Rohde&Schwarz	AP-X1	\	2021/11/10	2022/11/09
11	ECSI RF IN RF Cable	HAOXUN	Z-108	\	2021/11/10	2022/11/09
12	Testing Software	EZ-EMC	TW-03A2			
20dB Bandwidth						
1	Spectrum analyzer	Rohde&Schwarz	FSV30	103741	2021/11/10	2022/11/09
2	Power Collection Unit	Tonscend	JS0806-2	188060134	2021/09/13	2022/09/12
3	Tonscend Test System	Tonscend	2.6.77.0518	NA	NA	NA
4	Temp&Humi dity Recorder	Anymetre	JR900	NA	2021/11/04	2022/11/03

2.3 Configuration and Connections with EUT



No.	Equipment	Model	Brand	FCC ID	Series No
1	Incandescent lamps	E26/E27	/	/	/
2	Mobile phone	TAS-AN00	HUAWEI	/	/
3	Mobile phone	LYA-AL00	HUAWEI	/	/
4	Mobile phone	LYA-AL00	HUAWEI	/	/
5	Mobile phone	TAS-AN00	HUAWEI	/	/
6	Mobile phone	TAS-AN00	HUAWEI	/	/
7	adapter	HW-050450C00	HUAWEI	/	/
8	adapter	HW-050450C00	HUAWEI	/	/

Note:

The EUT has been tested as an independent unit together with other necessary accessories or support units. The following support units or accessories were used to form a representative test configuration during the tests.

2.4 Test Condition

Applicable to	Environmental conditions	Input Power	Tested by
AC Power Conducted Emission	25°C, 59% RH	120Vac, 60Hz	Stone Tang
Radiated Emission	25°C, 59% RH	120Vac, 60Hz	Stone Tang
Antenna Requirement	25°C, 59% RH	120Vac, 60Hz	Stone Tang
20dB Bandwidth	25.2°C, 59% RH	120Vac, 60Hz	Stone Tang

2.5 Measurement Uncertainty

Where relevant, the following measurement uncertainty levels have been estimated for tests performed on the EUT.

This uncertainty represents an expanded uncertainty expressed at approximately the 95% confidence level using a coverage factor of $k=2$.

Uncertainty	
Parameter	Uncertainty
Spurious emissions, conducted	$\pm 1.78\text{dB}$
Spurious emissions, radiated (9KHz~30MHz)	$\pm 2.56\text{dB}$
Spurious emissions, radiated (30MHz~1GHz)	$\pm 4.6\text{dB}$
Spurious emissions, radiated (1GHz ~ 18GHz)	$\pm 4.9\text{dB}$
Conduction Emissions(150kHz~30MHz)	$\pm 3.1\text{ dB}$
Humidity	$\pm 4.6\%$
Temperature	$\pm 0.7^\circ\text{C}$
Time	$\pm 1.25\%$

2.6 Test Location

Company:	Beijing TIRT Technology Service Co.,Ltd Shenzhen
Address:	101, 3 # Factory Building, Gongjin Electronics Shatin Community, Kengzi Street, Pingshan District, Shenzhen, China
CNAS Registration Number:	CNAS L14158
A2LA Registration Number:	6049.01
FCC Accredited Lab. Designation Number:	CN1309
FCC Test Firm Registration Number:	825524
Telephone:	+86-0755-27087573

2.7 Deviation from Standards

None

2.8 Abnormalities from Standard Conditions

None

3. Test Procedure And Results

3.1 Antenna Requirement

Standard Requirement
15.203 requirement: An intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device. The use of a permanently attached antenna or of an antenna that uses a unique coupling to the intentional radiator, the manufacturer may design the unit so that a broken antenna can be replaced by the user, but the use of a standard antenna jack or electrical connector is prohibited.
EUT Antenna:
This product has a permanent antenna, fulfill the requirement of this section.

3.2 AC Power Line Conducted Emission

3.2.1 Limit

FREQUENCY (MHz)	Class A (dBuV)		Class B (dBuV)	
	Quasi-peak	Average	Quasi-peak	Average
0.15 ~ 0.50	79	66	66 - 56	56 - 46
0.50 ~ 5.00	73	60	56	46
5.00 ~ 30.0	73	60	60	50

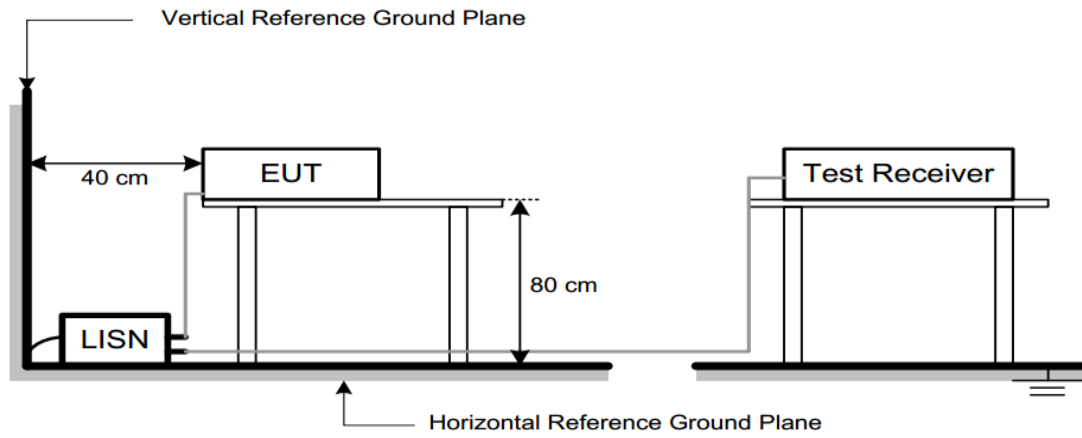
Note:

1. The lower limit shall apply at the transition frequencies.
2. The limit decreases in line with the logarithm of the frequency in the range of 0.15 to 0.50 MHz.
3. All emanations from a class A/B digital device or system, including any network of conductors and apparatus connected thereto, shall not exceed the level of field strengths specified above.

3.2.2 Test Procedure

- a) The EUT was placed 0.1 m from the horizontal ground plane and 0.4 m from the vertical groundplane with EUT being connected to the power mains through a line impedance stabilization network (AMN). All other support equipment powered from additional AMN. The AMN provide 50 Ohm/ 50 uH of coupling impedance for the measuring instrument.
- b) Interconnecting cables that hang closer than 0.4 m to the ground plane shall be folded back and forth in the center forming a bundle 0.3 m to 0.4 m long.
- c) The frequency range from 150 kHz to 30 MHz was searched.
- d) Actual test configuration, please refer to the related Item – EUT Test Photos.
- e) The thickness of the insulation shall not be more than 150 mm.

3.2.3 Test Setup



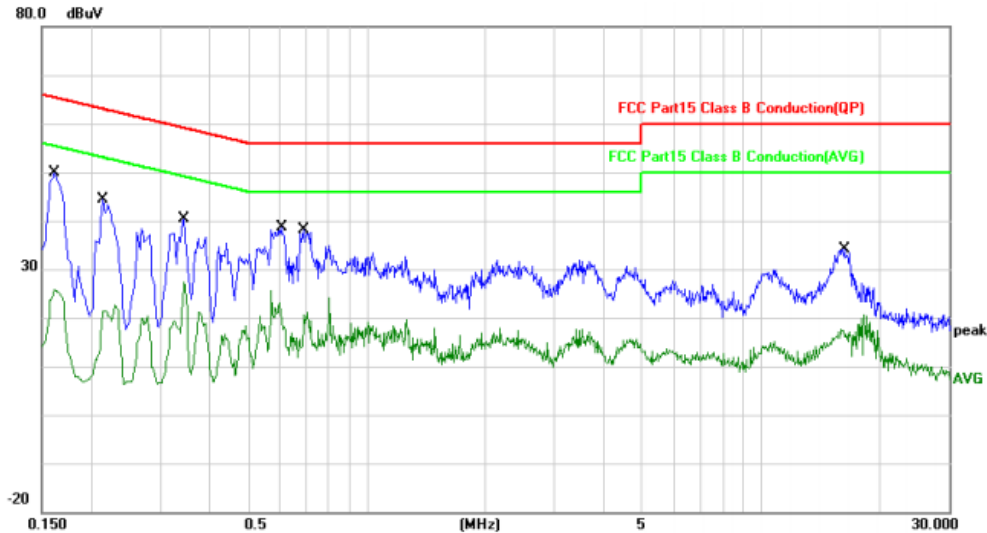
Note: For the actual test configuration, please refer to the related item – Photographs of the test configuration

3.2.4 Test Result of AC Power Line Conducted Emission

The worst measurement data as follows:

150kHz~30MHz	Test mode: Wireless Charging
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Line



No.	Mk.	Freq.	Reading Level	Correct Factor	Measurement	Limit	Over	Detector	Comment
		MHz	dBuV	dB	dBuV	dBuV	dB		
1		0.1620	33.80	9.55	43.35	65.36	-22.01	QP	
2		0.1620	16.09	9.55	25.64	55.36	-29.72	AVG	
3		0.2140	28.12	9.57	37.69	63.05	-25.36	QP	
4		0.2140	8.34	9.57	17.91	53.05	-35.14	AVG	
5		0.3460	28.68	9.57	38.25	59.06	-20.81	QP	
6		0.3460	16.16	9.57	25.73	49.06	-23.33	AVG	
7	*	0.6100	26.16	9.57	35.73	56.00	-20.27	QP	
8		0.6100	10.55	9.57	20.12	46.00	-25.88	AVG	
9		0.6900	25.87	9.59	35.46	56.00	-20.54	QP	
10		0.6900	9.93	9.59	19.52	46.00	-26.48	AVG	
11		16.2420	16.45	10.63	27.08	60.00	-32.92	QP	
12		16.2420	3.02	10.63	13.65	50.00	-36.35	AVG	

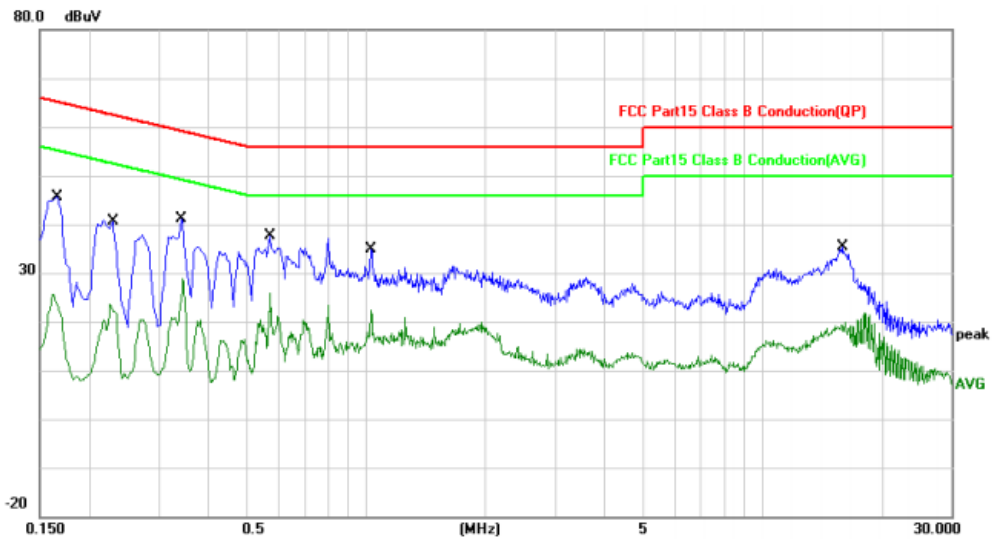
Note:

1. Correct Factor = LISN Factor + Cable Loss + Pulse Limiter Factor, the value was added to Original Receiver Reading by the software automatically.
2. Measurement = Reading Level + Correct Factor.
3. Over = Measurement - Limit

150kHz~30MHz

Test mode: Wireless Charging

Neutral



No.	Mk.	Freq.	Reading Level	Correct Factor	Measurement	Limit	Over	Detector	Comment
		MHz	dBuV	dB	dBuV	dBuV	dB		
1		0.1660	28.70	9.74	38.44	65.16	-26.72	QP	
2		0.1660	12.16	9.74	21.90	55.16	-33.26	AVG	
3		0.2300	25.59	9.74	35.33	62.45	-27.12	QP	
4		0.2300	12.91	9.74	22.65	52.45	-29.80	AVG	
5 *		0.3420	28.97	9.75	38.72	59.15	-20.43	QP	
6		0.3420	16.05	9.75	25.80	49.15	-23.35	AVG	
7		0.5740	24.90	9.79	34.69	56.00	-21.31	QP	
8		0.5740	12.87	9.79	22.66	46.00	-23.34	AVG	
9		1.0300	20.36	9.91	30.27	56.00	-25.73	QP	
10		1.0300	10.49	9.91	20.40	46.00	-25.60	AVG	
11		15.9340	17.80	10.51	28.31	60.00	-31.69	QP	
12		15.9340	5.65	10.51	16.16	50.00	-33.84	AVG	

Note:

1. Correct Factor = LISN Factor + Cable Loss + Pulse Limiter Factor, the value was added to Original Receiver Reading by the software automatically.
2. Measurement = Reading Level + Correct Factor.
3. Over = Measurement - Limit

3.3 Radiated Emissions up to 1 GHz

3.3.1 Limit

Emissions radiated outside of the specified bands, shall be according to the general radiated limits as following:

Frequencies (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

- Note:
- (1) The lower limit shall apply at the transition frequencies.
 - (2) Emission level (dBuV/m) = 20 log Emission level (uV/m).
 - (3) As shown in 15.35(b), for frequencies above 1000MHz, the field strength limits are based on average detector, however, the peak field strength of any emission shall not exceed the maximum permitted average limits, specified above by more than 20dB under any condition of modulation.
 - (4) The measured field strength was extrapolated to distance 30 meters, using the formula that the limit of field strength varies as the inverse distance square (40dB per decade of distance)

3.3.2 Test Procedure

Below 30MHz

- a) The EUT was placed on the top of a rotating table 0.1 meters above the ground at a 10 meters Semi-anechoic chamber room. The table was rotated 360 degrees to determine the position of the highest radiation.
- b) The EUT was set 3 meters away from the interference-receiving antenna, which was mounted on the top of a variable-height antenna tower.
- c) The height of antenna is varied from one meter to four meters above the ground to determine the maximum value of the field strength. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
- d) For each suspected emission, the EUT was arranged to its worst case and then the antenna was tuned to heights from 1 meter and the rotatable table was turned from 0 degrees to 360 degrees to find the maximum reading.
- e) The test-receiver system was set to quasi-peak detect function and specified bandwidth with

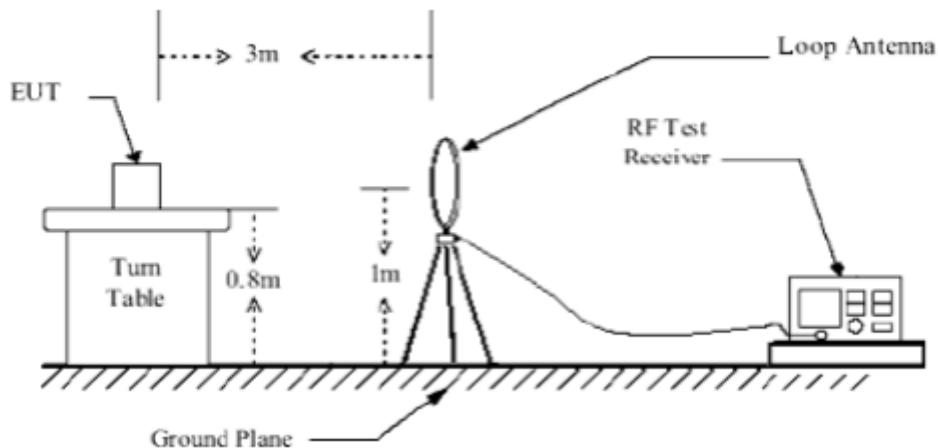
maximum hold mode when the test frequency is below 1 GHz.

30MHz~1GHz

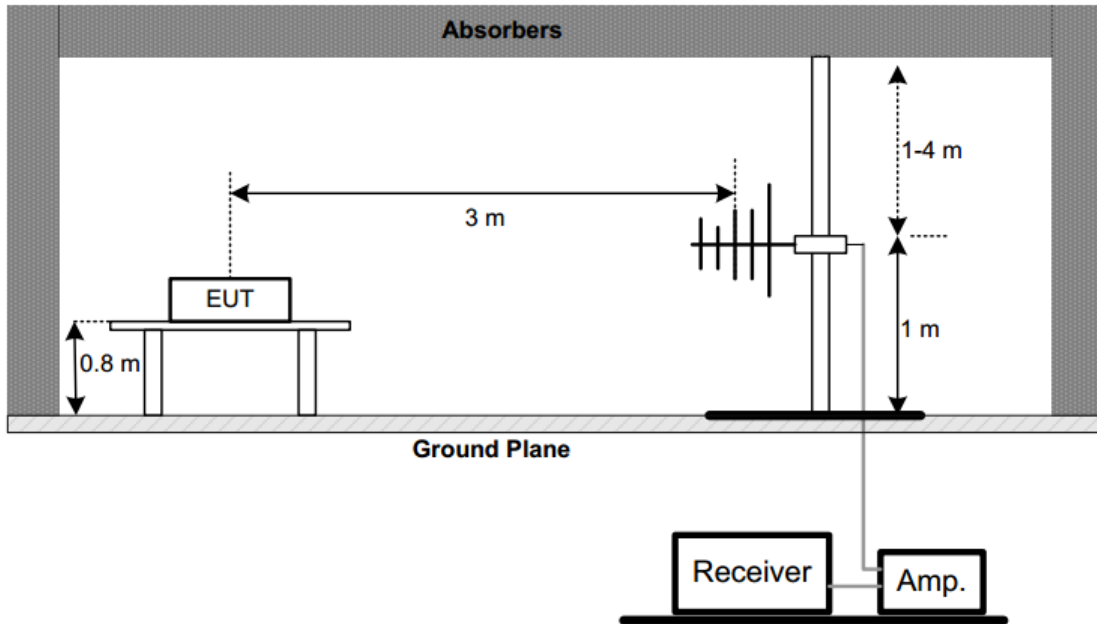
- a) The EUT was placed on the top of a rotating table 0.1 meters above the ground at a 3 meters semi-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation.
- b) The EUT was set 3 meters away from the interference-receiving antenna, which was mounted on the top of a variable-height antenna tower.
- c) The antenna is a broadband antenna, and its height is varied from one meter to four meters above the ground to determine the maximum value of the field strength. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
- d) For each suspected emission, the EUT was arranged to its worst case and then the antenna was tuned to heights from 1 meter to 4 meters and the rotatable table was turned from 0 degrees to 360 degrees to find the maximum reading.
- e) The test-receiver system was set to Peak Detect Function and Specified Bandwidth with Maximum Hold Mode.

3.3.3 Test Setup

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



(B) Radiated Emission Test Set-Up Frequency Below 1 GHz

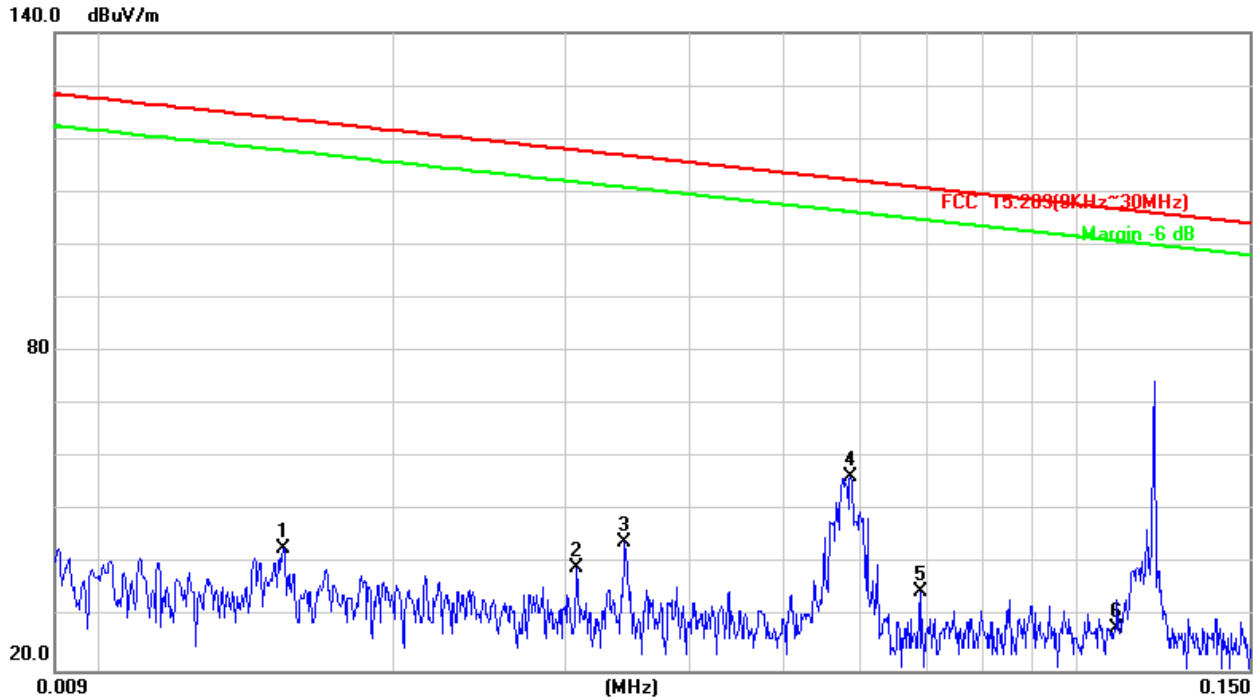


3.3.4 Test Result of Radiated Emission

The worst measurement data as follows:

0.009MHz~0.150MHz	Test mode: Wireless Charging
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Parallel

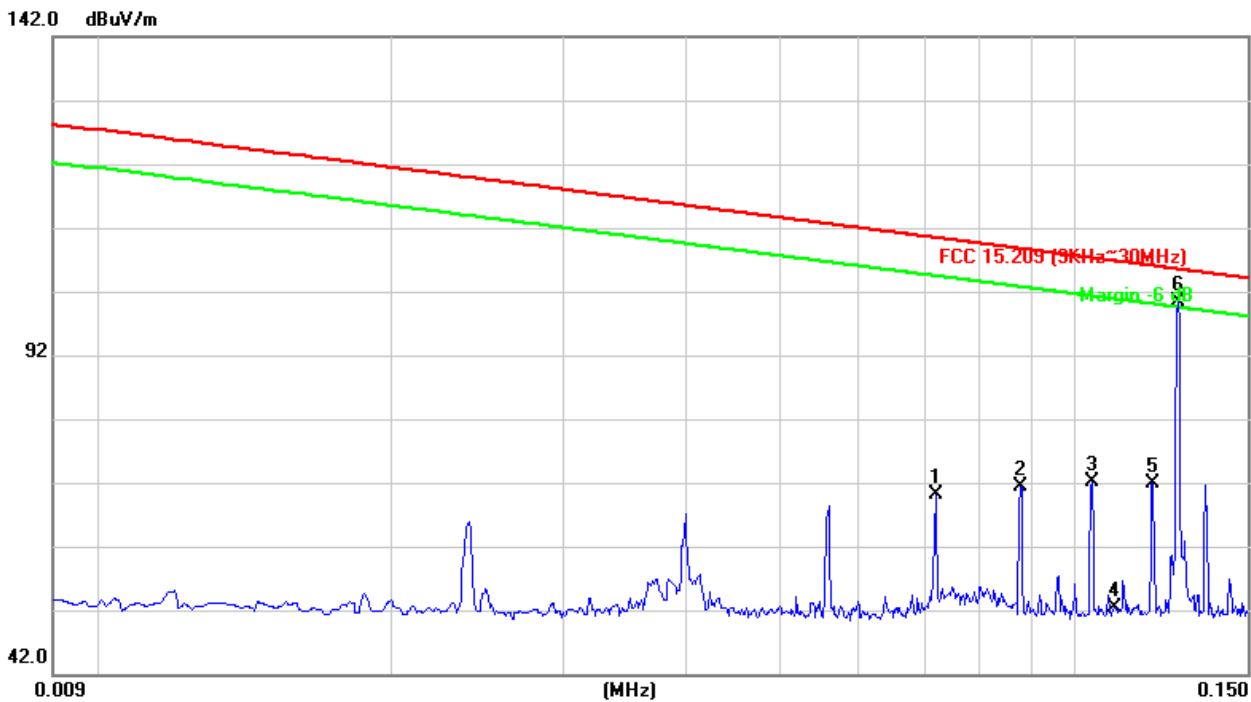


No	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (cm)	Table Angle (Degree)	Detector
1	0.0154	24.31	18.76	43.07	123.85	-80.78	100	123	AV
2	0.0308	20.64	18.78	39.42	117.83	-78.41	100	257	AV
3	0.0343	25.35	18.75	44.10	116.90	-72.80	100	310	AV
4	0.0586	37.66	18.73	56.39	112.25	-55.86	100	270	AV
5	0.0690	16.06	18.73	34.79	110.83	-76.04	100	59	AV
6	0.1100	9.25	18.70	27.95	106.78	-78.83	100	108	AV

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Level = Reading + Correct Factor.
3. Margin = Level – Limit

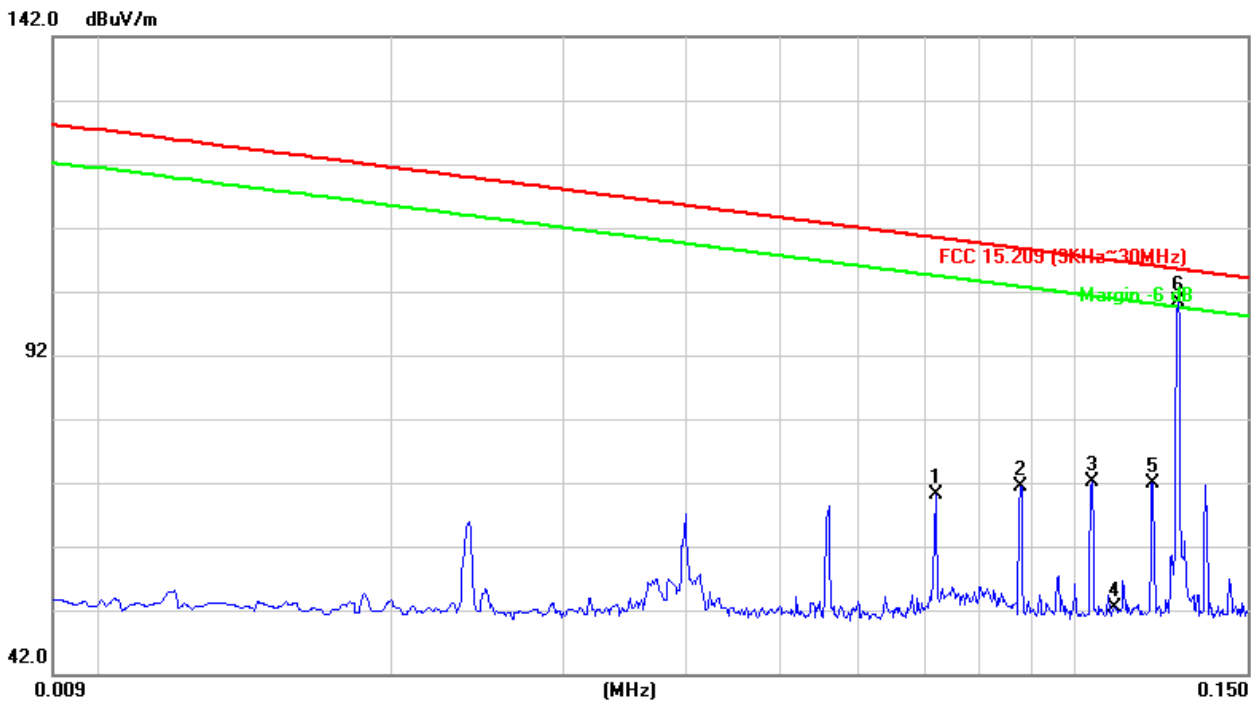
Perpendicular



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (cm)	Table Angle (Degree)	Detector
1	0.0720	48.61	21.61	70.22	110.45	-40.23	100	56	AV
2	0.0880	49.70	21.65	71.35	108.71	-37.36	100	126	AV
3	0.1041	50.08	22.10	72.18	107.26	-35.08	100	289	QP
4	0.1100	30.62	21.68	52.30	106.78	-54.48	100	210	AV
5	0.1202	49.50	22.38	71.88	106.01	-34.13	100	39	AV
6	0.1276	77.93	22.42	100.35	105.49	-5.14	100	218	AV

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Level = Reading + Correct Factor.
3. Margin = Level - Limit

Ground-parall


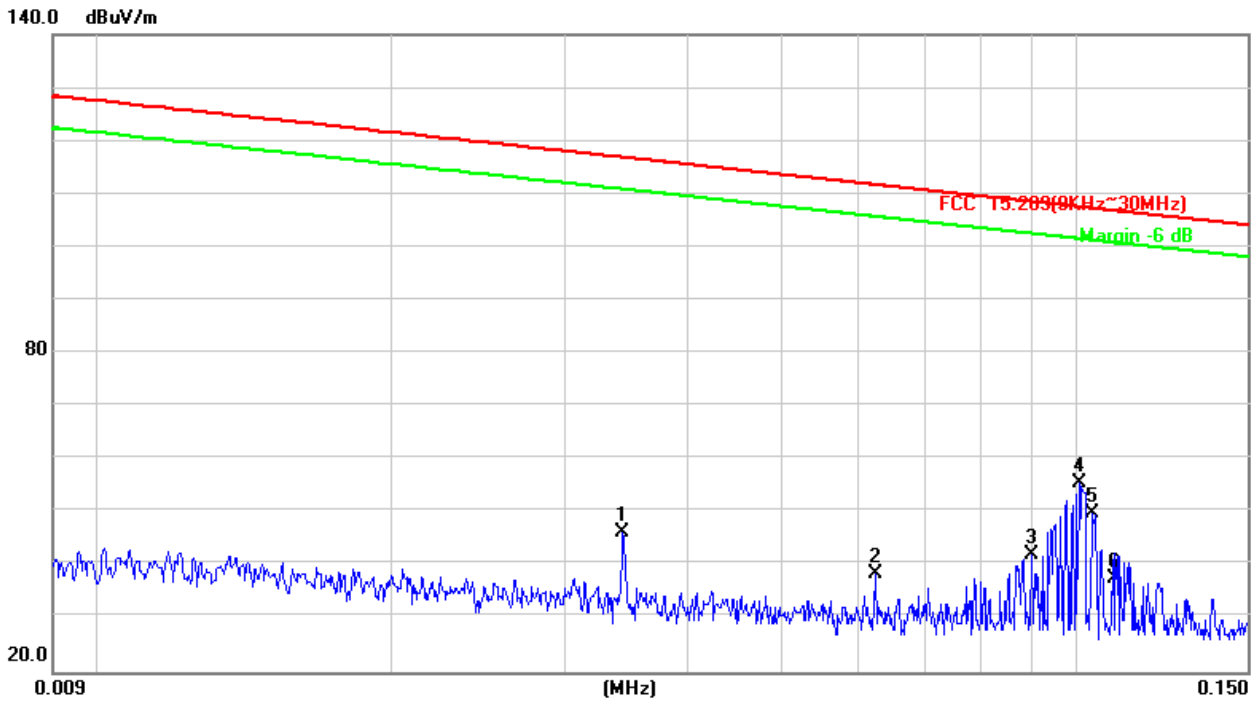
No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (cm)	Table Angle (Degree)	Detector
1	0.0720	48.64	21.58	70.22	110.44	-40.22	100	19	AV
2	0.0880	49.75	21.60	71.35	108.71	-37.36	100	247	AV
3	0.1041	50.52	21.66	72.18	107.26	-35.08	100	189	QP
4	0.1100	30.62	21.68	52.30	106.78	-54.48	100	230	AV
5	0.1202	49.46	22.42	71.88	106.01	-34.13	100	89	AV
6	0.1276	78.04	22.31	100.35	105.49	-5.14	100	149	AV

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Level = Reading + Correct Factor.
3. Margin = Level – Limit

0.009MHz~0.150MHz	Test mode: Standby
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Parallel

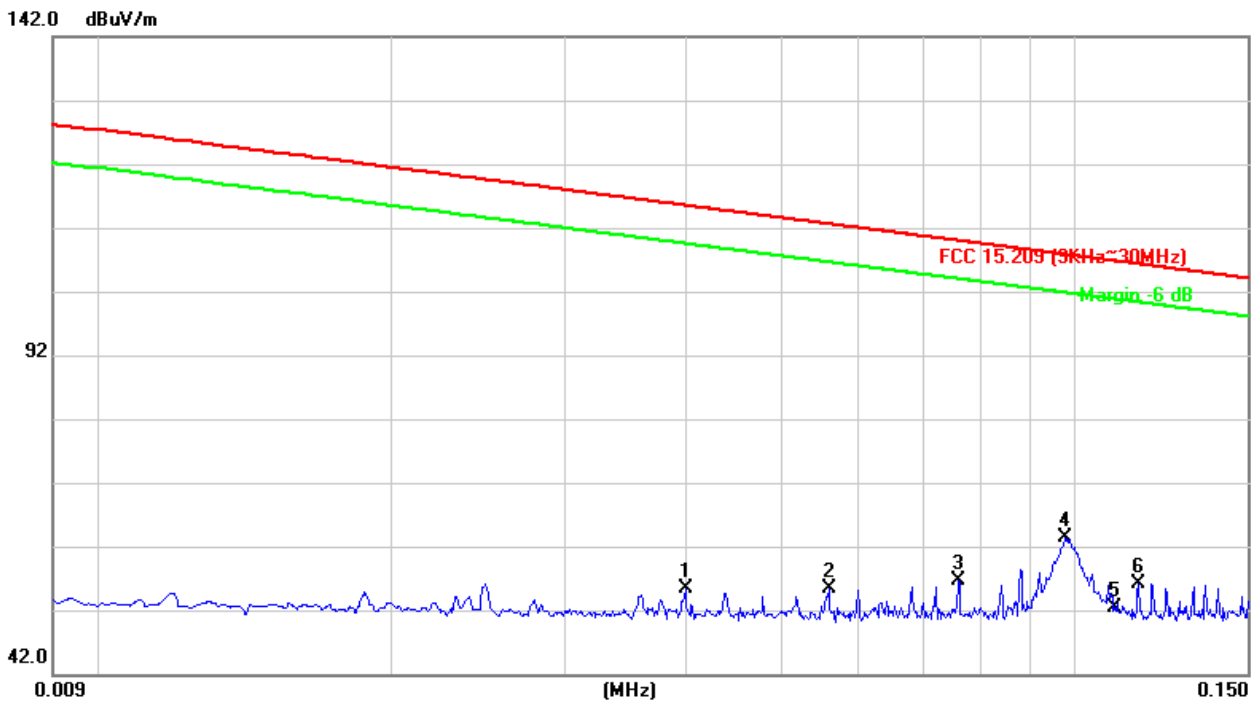


No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (cm)	Table Angle (Degree)	Detector
1	0.0343	27.57	18.75	46.32	116.90	-70.58	100	274	AV
2	0.0623	19.70	18.74	38.44	111.71	-73.27	100	315	AV
3	0.0901	23.39	18.75	42.14	108.51	-66.37	100	49	QP
4	0.1008	36.93	18.73	55.66	107.54	-51.88	100	234	QP
5	0.1040	31.10	18.72	49.82	107.26	-57.44	100	159	QP
6	0.1100	18.79	18.70	37.49	106.78	-69.29	100	167	AV

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Level = Reading + Correct Factor.
3. Margin = Level – Limit

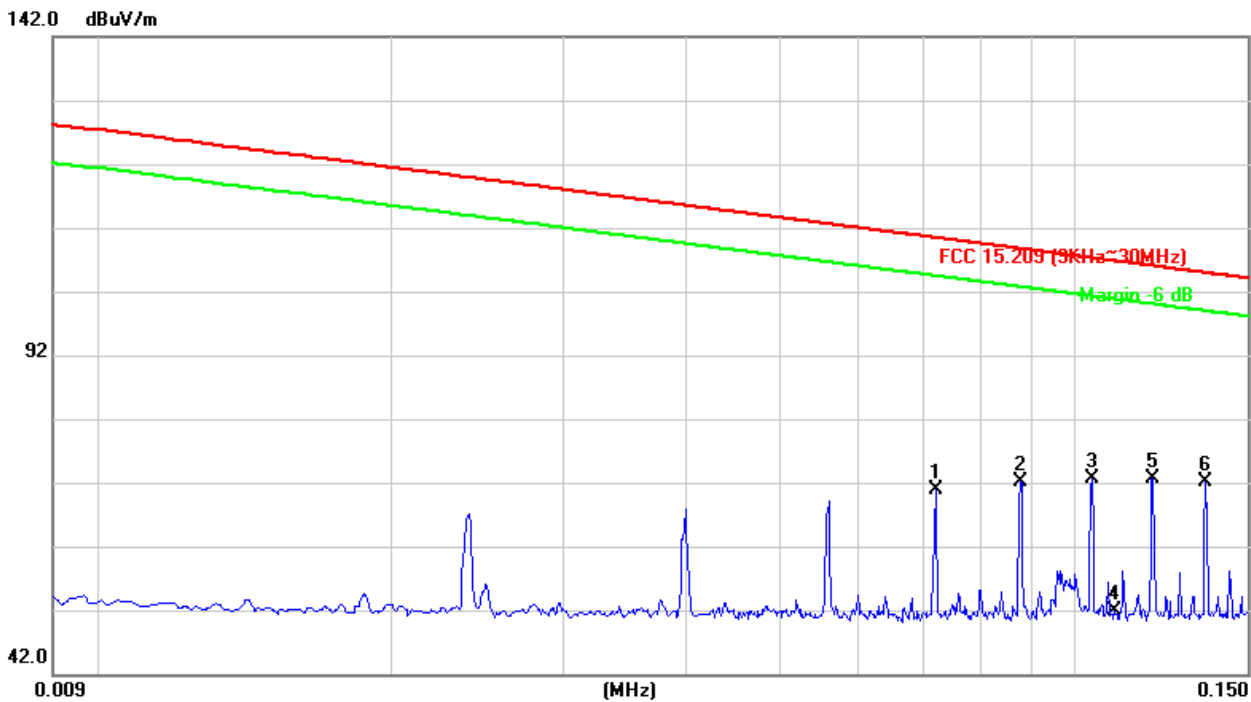
Perpendicular



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (cm)	Table Angle (Degree)	Detector
1	0.0400	33.89	21.51	55.40	115.50	-60.10	100	102	AV
2	0.0560	33.87	21.56	55.43	112.60	-57.17	100	123	AV
3	0.0760	35.03	21.58	56.61	109.97	-53.36	100	45	AV
4	0.0980	41.84	21.66	63.50	107.78	-44.28	100	172	QP
5	0.1100	30.58	21.69	52.27	106.78	-54.51	100	107	AV
6*	0.1161	33.96	22.17	56.13	106.31	-50.18	100	213	AV

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Level = Reading + Correct Factor.
3. Margin = Level - Limit

Ground-parall


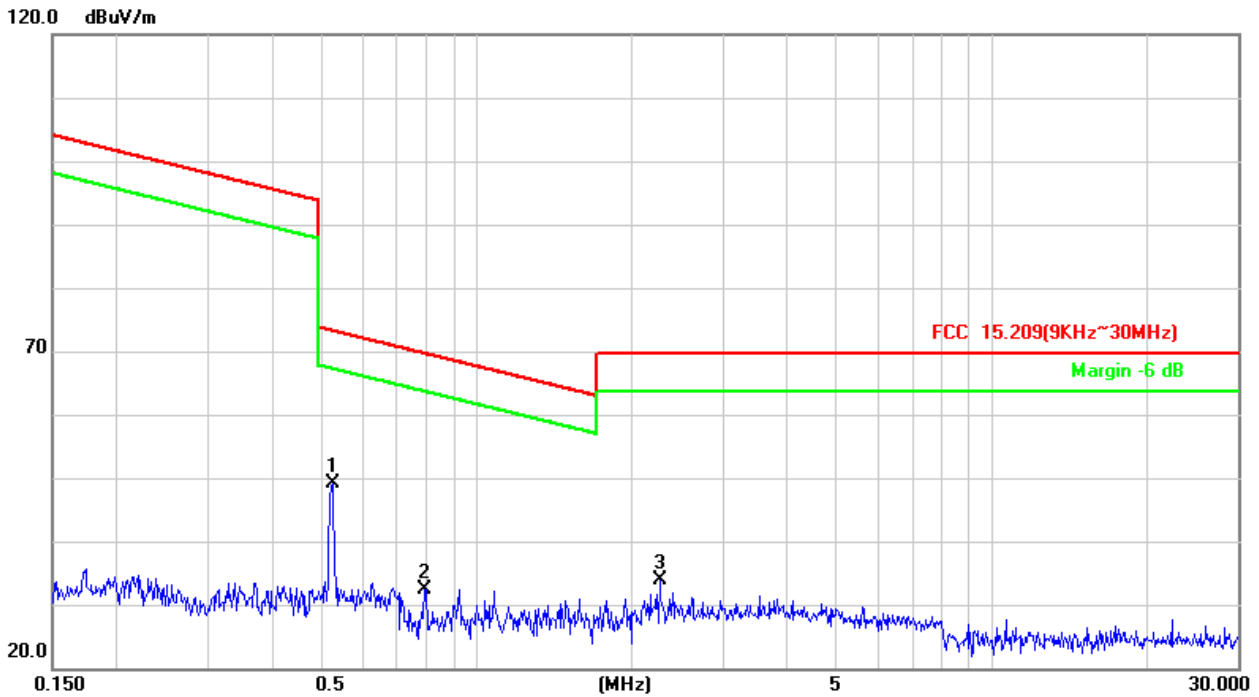
No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height(cm)	Table Angle (Degree)	Detector
1	0.0720	49.20	21.58	70.78	110.44	-39.66	100	33	AV
2	0.0880	50.55	21.61	72.16	108.71	-36.55	100	156	AV
3	0.1041	51.06	21.66	72.72	107.26	-34.54	100	286	QP
4	0.1100	30.27	21.68	51.95	106.78	-54.83	100	41	AV
5	0.1202	50.33	22.38	72.71	106.01	-33.30	100	309	AV
6*	0.1361	49.92	22.31	72.23	104.93	-32.70	100	129	AV

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Level = Reading + Correct Factor.
3. Margin = Level – Limit

0.150MHz~30MHz	Test mode: Wireless Charging
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Parallel

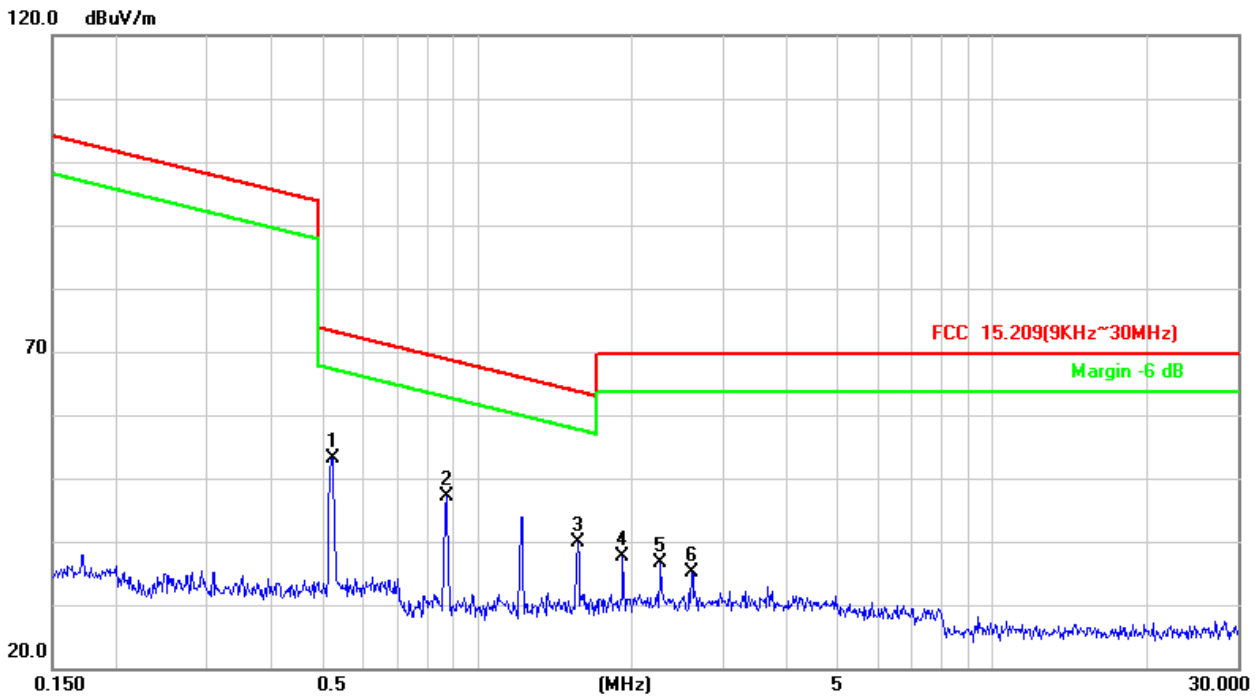


No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (cm)	Table Angle (Degree)	Detector
1	0.5237	29.68	19.37	49.05	73.22	-24.17	100	261	QP
2	0.7916	12.94	19.39	32.33	69.63	-37.30	100	187	QP
3	2.2604	14.45	19.51	33.96	69.54	-35.58	100	67	QP

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Level = Reading + Correct Factor.
3. Margin = Level – Limit

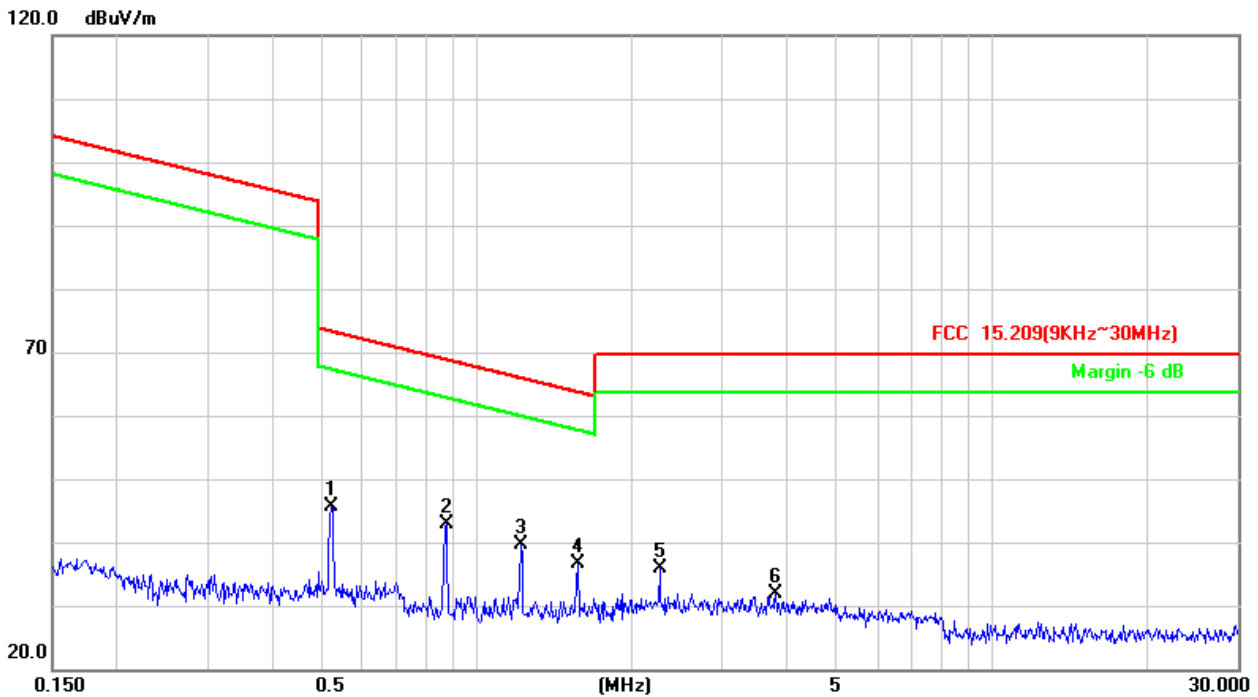
Perpendicular



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (cm)	Table Angle (Degree)	Detector
1	0.5210	33.65	19.37	53.02	73.27	-20.25	100	186	QP
2	0.8710	27.77	19.38	47.15	68.80	-21.65	100	23	QP
3	1.5683	20.40	19.47	39.87	63.70	-23.83	100	342	QP
4	1.9181	18.09	19.52	37.61	69.54	-31.93	100	210	QP
5	2.2725	17.16	19.51	36.67	69.54	-32.87	100	155	QP
6	2.6082	15.74	19.49	35.23	69.54	-34.31	100	308	QP

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Level = Reading + Correct Factor.
3. Margin = Level – Limit

Ground-parall


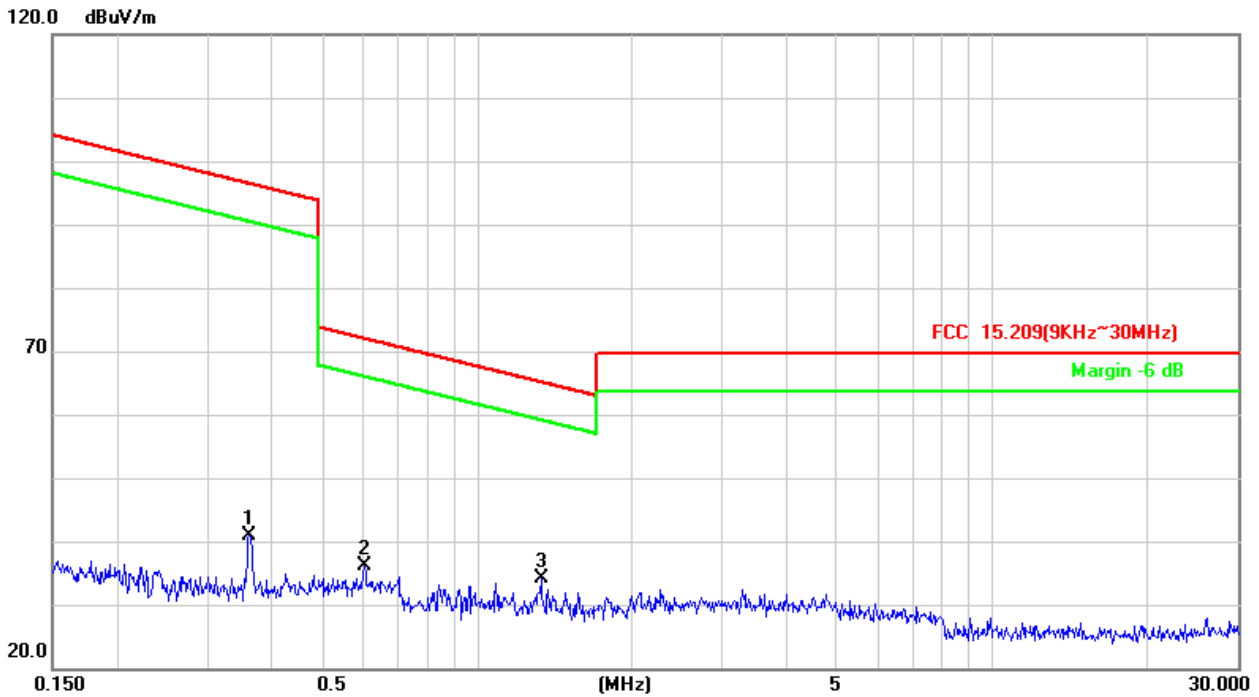
No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (cm)	Table Angle (Degree)	Detector
1	0.5210	26.26	19.37	45.63	73.27	-27.64	100	187	QP
2	0.8710	23.54	19.38	42.92	68.80	-25.88	100	224	QP
3	1.2162	20.10	19.41	39.51	65.90	-26.39	100	153	QP
4	1.5684	17.08	19.47	36.55	63.70	-27.15	100	210	QP
5	2.2606	16.32	19.51	35.83	69.54	-33.71	100	196	QP
6	3.7994	12.45	19.51	31.96	69.54	-37.58	100	49	QP

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Level = Reading + Correct Factor.
3. Margin = Level – Limit

0.150MHz~30MHz	Test mode: Standby
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Parallel

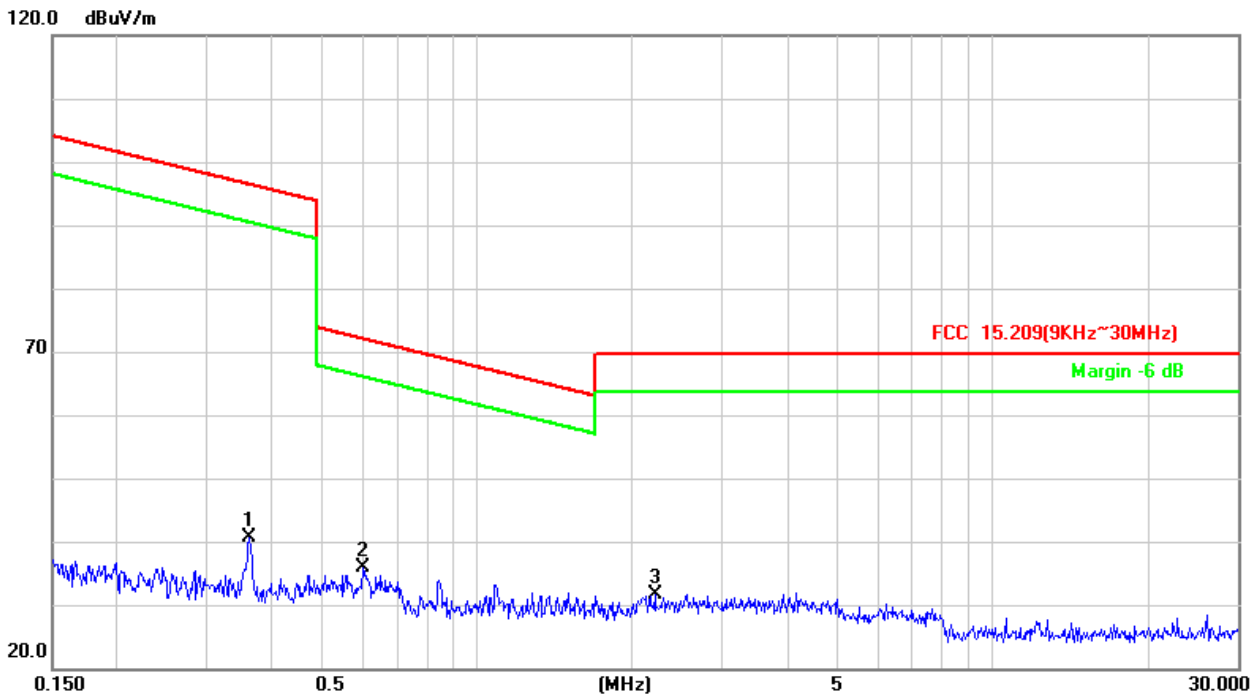


No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (cm)	Table Angle (Degree)	Detector
1	0.3613	21.46	19.34	40.80	96.45	-55.65	100	234	AV
2	0.6040	16.69	19.38	36.07	71.98	-35.91	100	127	QP
3	1.3306	14.69	19.43	34.12	65.12	-31.00	100	88	QP

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Level = Reading + Correct Factor.
3. Margin = Level – Limit

Perpendicular

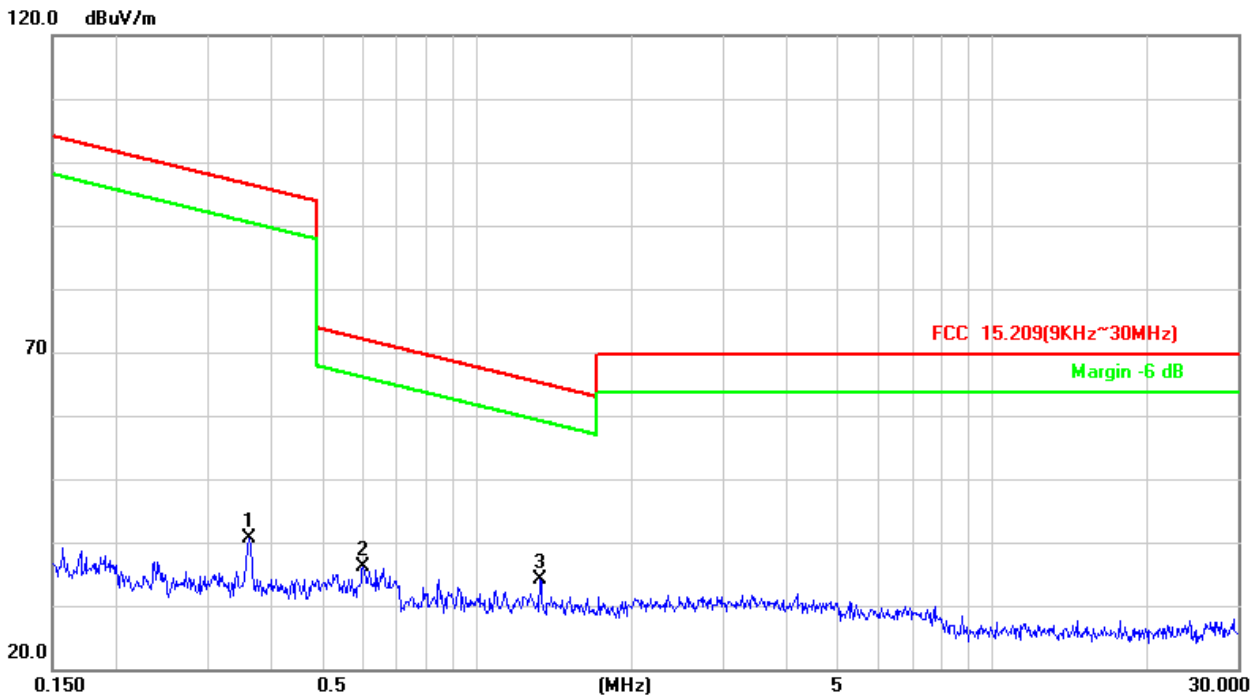


No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (cm)	Table Angle (Degree)	Detector
1	0.3615	21.23	19.34	40.57	96.44	-55.87	100	342	AV
2	0.6011	16.46	19.38	35.84	72.03	-36.19	100	225	QP
3	2.2132	12.16	19.52	31.68	69.54	-37.86	100	260	QP

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Level = Reading + Correct Factor.
3. Margin = Level - Limit

Ground-parall



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (cm)	Table Angle (Degree)	Detector
1	0.3614	21.27	19.34	40.61	96.44	-55.83	100	38	AV
2	0.6011	16.69	19.38	36.07	72.03	-35.96	100	175	QP
3	1.3237	14.80	19.43	34.23	65.17	-30.94	100	224	QP

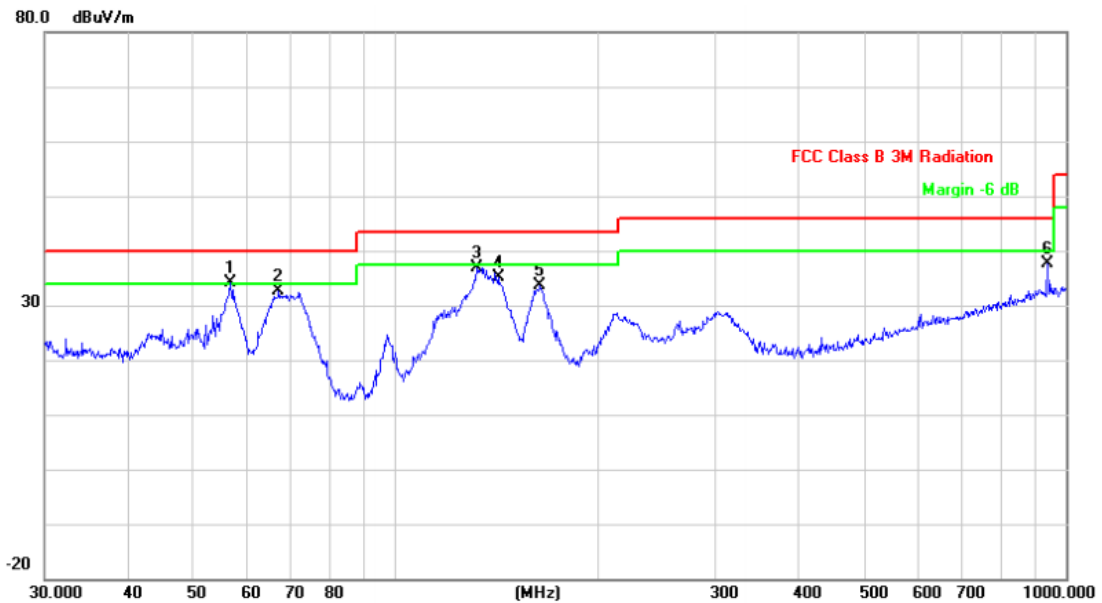
Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Level = Reading + Correct Factor.
3. Margin = Level – Limit

30MHz~1GHz

Test mode: Wireless Charging

Vertical

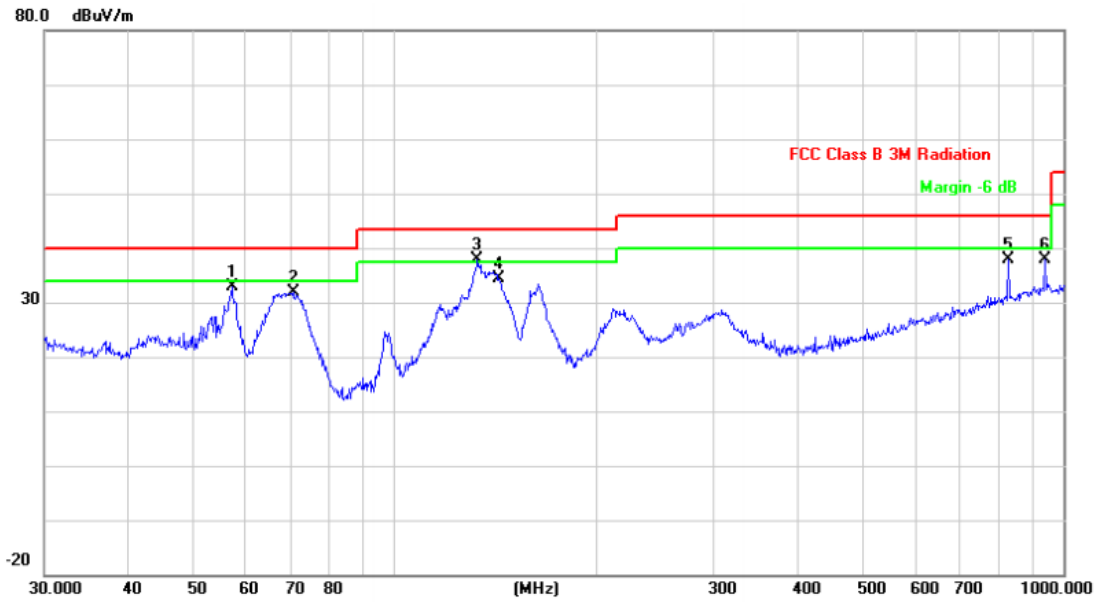


No.	Mk.	Freq.	Reading Level	Correct Factor	Measurement	Limit	Over	Antenna Height	Table Degree	
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	cm	degree	Comment
1	*	56.7917	44.97	-10.84	34.13	40.00	-5.87	QP	100	87
2		66.9670	44.58	-11.87	32.71	40.00	-7.29	QP	100	254
3		132.2206	47.60	-10.68	36.92	43.50	-6.58	QP	100	273
4		142.3243	45.22	-9.98	35.24	43.50	-8.26	QP	100	275
5		164.3301	43.57	-10.06	33.51	43.50	-9.99	QP	100	101
6		938.8326	33.39	4.27	37.66	46.00	-8.34	QP	200	359

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Measurement = Reading Level + Correct Factor.
3. Over = Measurement - Limit

Horizontal



No.	Mk.	Freq.	Reading Level	Correct Factor	Measurement	Limit	Over	Antenna Height	Table Degree	
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	cm	degree	Comment
1		57.1914	43.79	-10.87	32.92	40.00	-7.08	100	99	
2		70.5836	44.11	-12.33	31.78	40.00	-8.22	100	273	
3	*	133.1511	48.46	-10.60	37.86	43.50	-5.64	100	268	
4		143.3261	44.23	-9.96	34.27	43.50	-9.23	100	285	
5		827.4934	35.27	2.69	37.96	46.00	-8.04	200	234	
6		938.8326	33.54	4.27	37.81	46.00	-8.19	100	3	

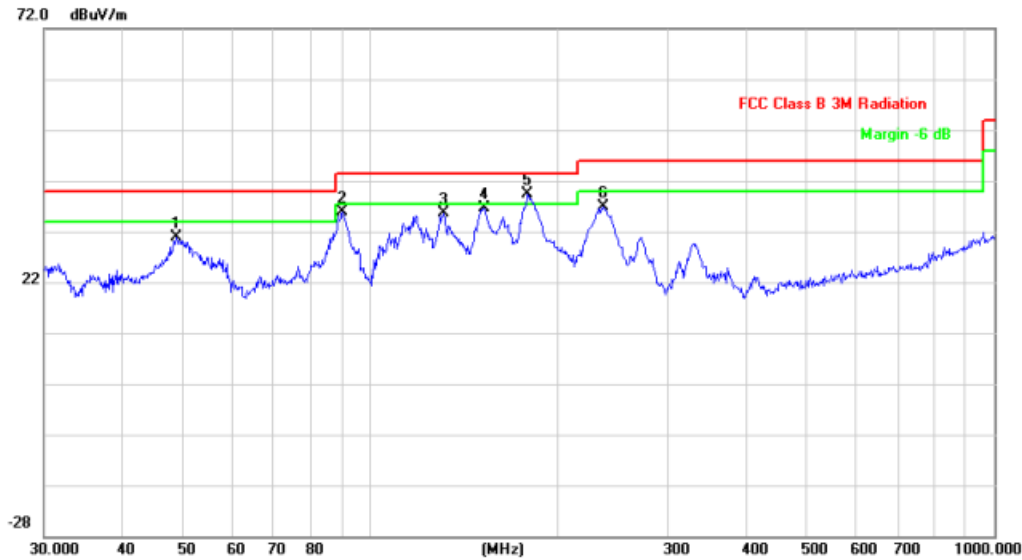
Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Measurement = Reading Level + Correct Factor.
3. Over = Measurement - Limit

30MHz~1GHz

Test mode: Standby

Vertical

Radiated Emission


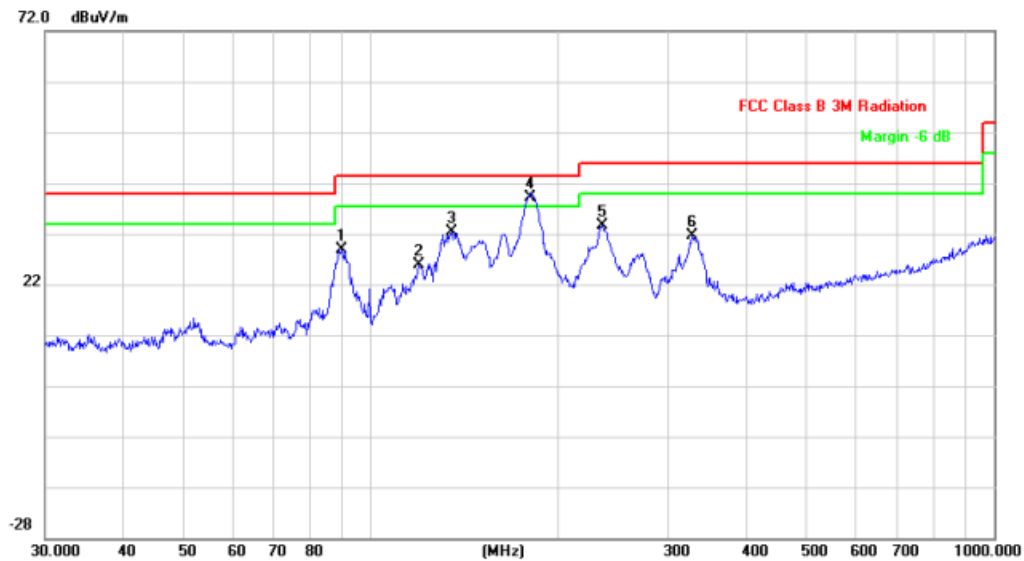
No.	Mk.	Freq.	Reading Level	Correct Factor	Measurement	Limit	Over	Antenna Height	Table Degree	
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	cm	degree	Comment
1		48.8427	16.21	14.60	30.81	40.00	-9.19	QP	100	32
2		90.2202	20.99	14.77	35.76	43.50	-7.74	QP	100	271
3		131.2965	20.77	14.92	35.69	43.50	-7.81	QP	200	238
4		152.1297	21.47	15.13	36.60	43.50	-6.90	QP	100	161
5	*	178.7581	23.86	15.41	39.27	43.50	-4.23	QP	200	199
6		236.6447	20.58	16.29	36.87	46.00	-9.13	QP	200	187

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Measurement = Reading Level + Correct Factor.
3. Over = Measurement - Limit

Horizontal

Radiated Emission



No.	Mk.	Freq.	Reading Level	Correct Factor	Measurement	Limit	Over	Antenna Height	Table Degree	
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	cm	degree	Comment
1		89.5900	16.37	12.56	28.93	43.50	-14.57	100	154	
2		119.4360	13.37	12.41	25.78	43.50	-17.72	200	238	
3		135.0318	19.30	12.99	32.29	43.50	-11.21	200	192	
4	*	180.0164	24.66	14.39	39.05	43.50	-4.45	200	183	
5		234.9910	17.42	16.25	33.67	46.00	-12.33	100	299	
6		327.8872	13.09	18.50	31.59	46.00	-14.41	100	175	

Note:

1. Correct Factor = Antenna Factor + Cable Loss - Amplifier Gain, the value was added to Original Receiver Reading by the software automatically.
2. Measurement = Reading Level + Correct Factor.
3. Over = Measurement - Limit

3.4 20dB bandwidth measurement

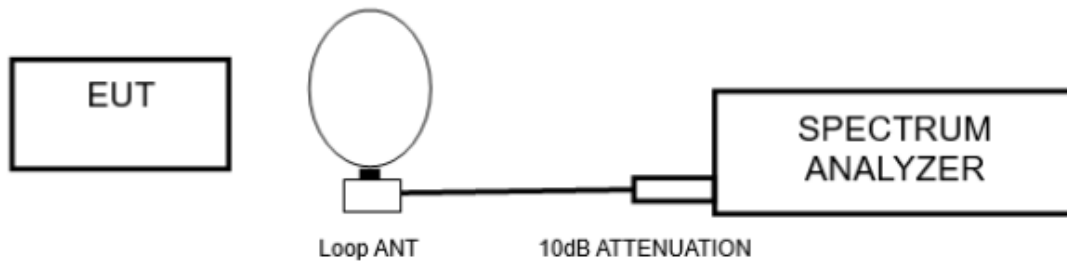
3.4.1 Limit

The field strength of any emissions appearing between the band edges and out of band shall be attenuated at least 20 dB below the level of the unmodulated carrier or to the general limits in Section 15.209

3.4.2 Test Procedure

Test Method	
<input checked="" type="radio"/> Conducted Measurement	<input type="radio"/> Radiated Measurement
Test Mode	
<input checked="" type="radio"/> Wireless charging	<input checked="" type="radio"/> Standby
Environmental Conditions	
<input checked="" type="radio"/> Normal	<input type="radio"/> Normal and Extreme
Note: ● : Test ○ : No Test	

3.4.3 Test Setup



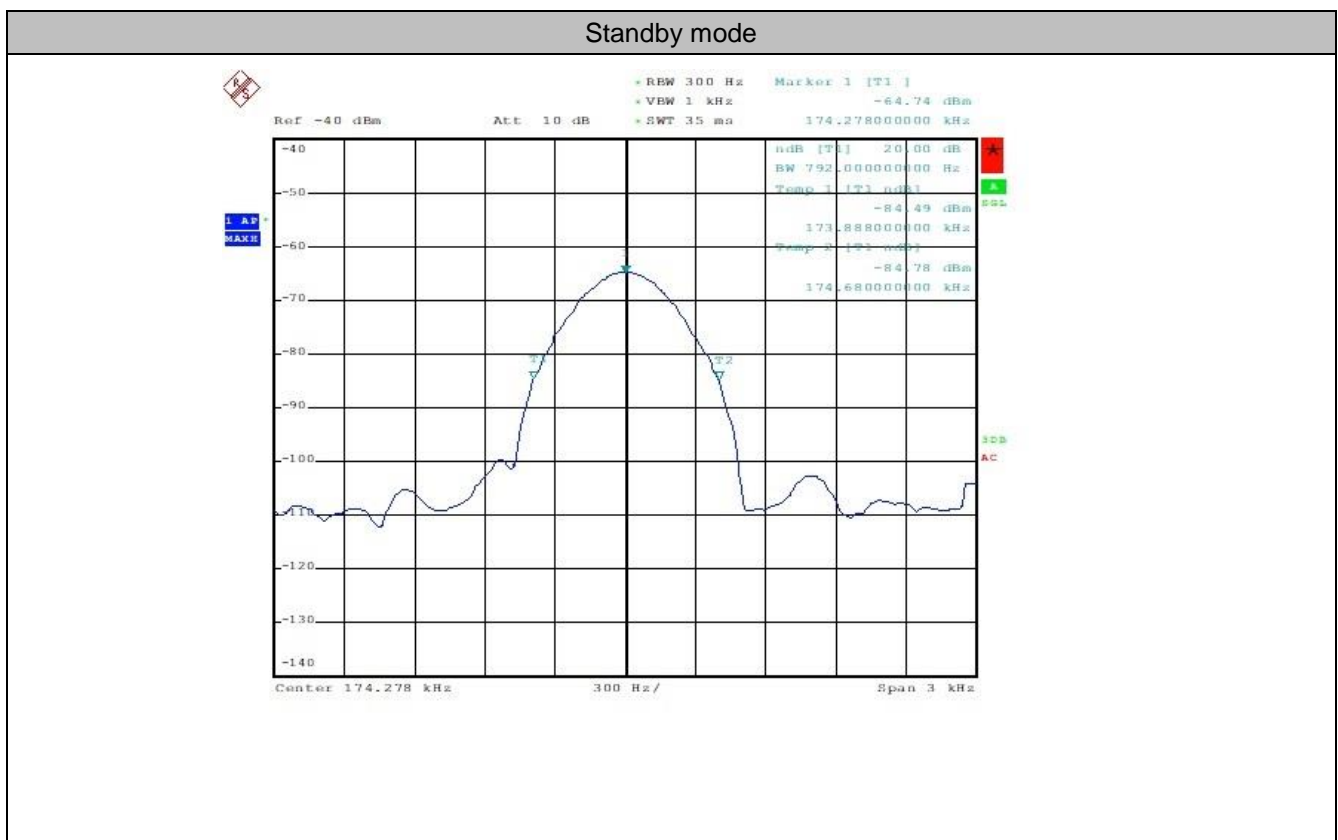
3.4.4 EUT operating condition

- a. Turn on the EUT.
- b. The EUT tested in charging mode and standby mode respectively

3.4.5 Test results

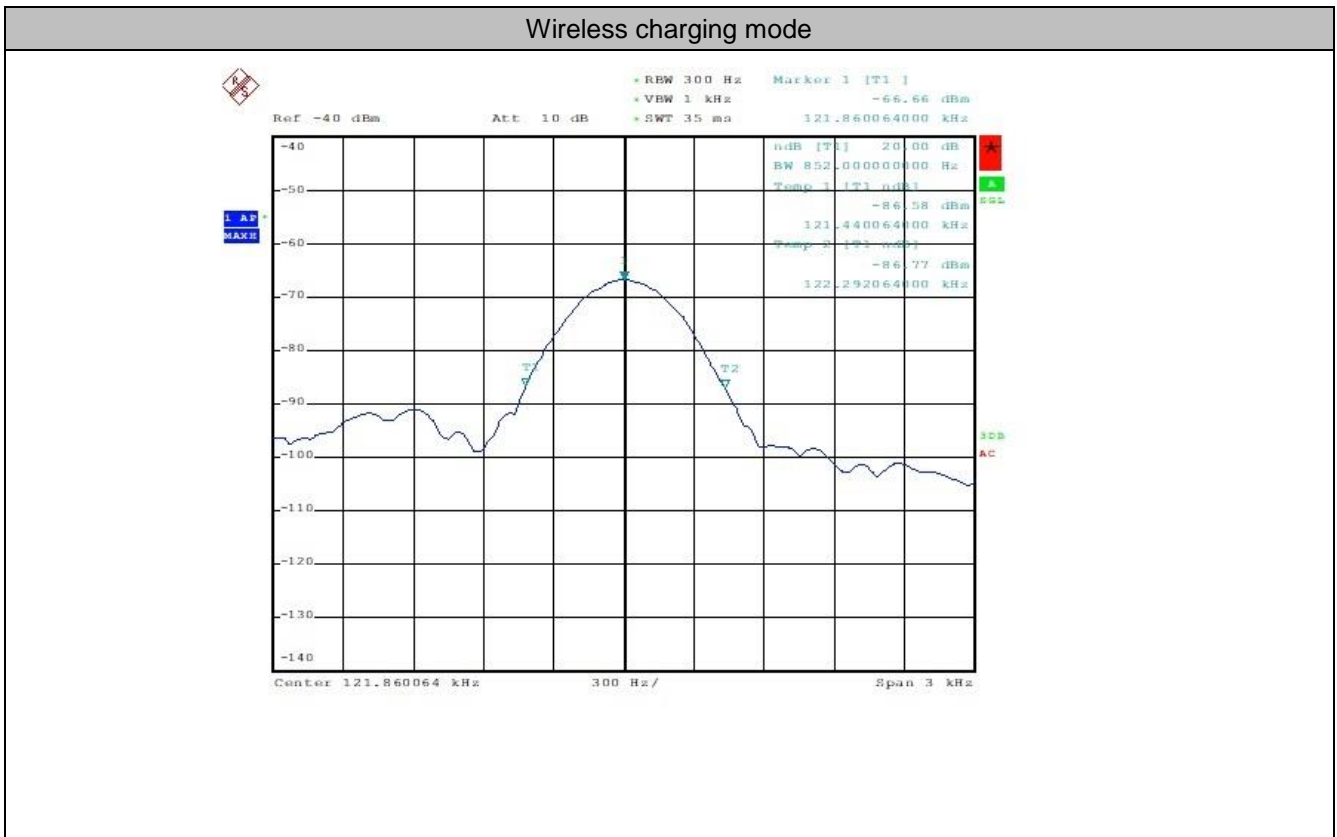
Test mode	Channel frequency (kHz)	20dB bandwidth (kHz)
Standby mode	160~180	0.792

Lower & Upper Test Frequency Point (MHz)	Test Frequency (KHz)	P/F
Lower	173.888	Pass
Upper	174.680	Pass



Test mode	Channel frequency (kHz)	20dB bandwidth (kHz)
Wireless charging	110.5~130	0.852

Lower & Upper Test Frequency Point (MHz)	Test Frequency (KHz)	P/F
Lower	121.440	Pass
Upper	122.292	Pass



4. Appendix 1 Photographs of Test Set-up

See test photos attached in Appendix 1 for the actual connections between Product and support equipment.

5. Appendix 2 Photographs of EUT

Refer to Appendix 2 for EUT external and internal photos.

(END OF REPORT)