Radio Test Report
47 CFR Part 15.247

Applicant's name	:	Invanti (Beijing) Technology Co., Ltd.
Address	:	Building 1, Yard 2, Ronghua South Road, Beijing Economic and Technological Development Zone, 2004, Beijing, 100176, China
Manufacture's Name	:	Invanti (Beijing) Technology Co., Ltd.
Address	:	Building 1, Yard 2, Ronghua South Road, Beijing Economic and Technological Development Zone, 2004, Beijing, 100176, China
Product description		
Trader mark	:	N/A
Product Name:	:	Electric Scooter
Model and/or type reference	:	F01
Serial Model	:	N/A
Rating(s)	:	DC36V, 350W
Standards	:	47 CFR Part 15.247
FCC ID	:	2BG9J-F01

The EUT described above has been tested by us with the listed standards and found in compliance with the FCC requirements. It is possible to use FCC marking to demonstrate the compliance with this FCC requirements.

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Date of Test

Date (s) of performance of tests	:	2026-04-24 ~ 2026-04-28
Date of Issue	:	2026-04-28
Test Result	:	**Pass**

Prepared by: Jide Huang
Project Engineer

Reviewed by: Eason Zhou
Project Supervisor

Approved by: Jason Xu
Technical Director

REPORT REVISE RECORD

Report Version	Revise Time	Issued Date	Valid Version	Notes
V1.0	/	2026-04-28	Valid	Initial Release

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1. TEST SUMMARY

No.	Test Item	Basic Standard	Requirement	Result
1	Antenna requirement	47 CFR Part 15.247	47 CFR 15.203	PASS
2	Conducted Emission at AC power line	47 CFR Part 15.247	47 CFR 15.207(a)	PASS
3	6dB Bandwidth	47 CFR Part 15.247	47 CFR 15.247(a)(2)	PASS
4	Maximum Conducted Output Power	47 CFR Part 15.247	47 CFR 15.247(b)(3)	PASS
5	Power Spectral Density	47 CFR Part 15.247	47 CFR 15.247(e)	PASS
6	Emissions in non-restricted frequency bands	47 CFR Part 15.247	47 CFR 15.247(d)	PASS
7	Band edge emissions (Radiated)	47 CFR Part 15.247	47 CFR 15.247(d), 15.209, 15.205	PASS
8	Emissions in frequency bands (below 1GHz)	47 CFR Part 15.247	47 CFR 15.247(d), 15.209, 15.205	PASS
9	Emissions in frequency bands (above 1GHz)	47 CFR Part 15.247	47 CFR 15.247(d), 15.209, 15.205	PASS

2. MEASUREMENT UNCERTAINTY

The report uncertainty of measurement y ± U , where expended uncertainty U is based on a standard uncertainty Multiplied by a coverage factor of k=2 , providing a level of confidence of approximately 95% .

No.	Item	Uncertainty
1	Conducted Emission (150KHz - 30MHz)	±2.54dB
2	Occupied Channel Bandwidth	±3.5%
3	RF output power, conducted	±1.19dB
4	Power Spectral Density, Conducted	±0.72dB
5	Unwanted Emissions, conducted	±2.988dB
6	All emissions, radiated (1GHz - 18GHz)	±4.66dB
7	All emissions, radiated (30MHz - 1GHz)	±3.94dB
8	All emissions, radiated (18GHz - 40GHz)	±4.31dB

3. TEST FACILITY

Shenzhen VOP Testing Technology Co., Ltd.
Add:103, Building 5, Wanyan Industrial Park Qiaotou Community, Fuhai Street, Baoan District Shenzhen, Guangdong People's Republic of China
FCC :Designation Number:CN1438,Certificate Number: 7579.01

3.1. Deviation from Standard

None

3.2. Abnormalities from Standard Conditions

None

4. GENERAL INFORMATION

4.1. General Description of EUT

Manufacturer:	Invanti (Beijing) Technology Co., Ltd.
Manufacturer Address:	Building 1, Yard 2, Ronghua South Road, Beijing Economic and Technological Development Zone, 2004, Beijing, 100176, China
EUT Name:	Electric Scooter
Model No:	F01
Serial Model:	N/A
Brand Name:	N/A
Difference Description:	N/A
Operation Frequency:	2402MHz to 2480MHz
Number of channels:	40
data rate：	1Mbps,2Mbps
Modulation Type:	GFSK
Antenna type:	PCB antenna
Bluetooth Version:	N/A
Antenna Gain:	1.7dBi
Hardware Version:	669
Software Version:	BSW02002001V01
Power Supply:	DC36V, 350W
Maximum Output Power:	-13.15dBm

Note:

1.For a more detailed features description, please refer to the manufacturer’s specifications or the User's Manual.

2.The antenna information refer the manufacturer provide report, applicable only to the tested sample identified in the report. Due to the incorrect antenna information, a series of problems such as the accuracy of the test results will be borne by the customer.

3.Channel List:

Channel	Frequency(MHz)	Channel	Frequency(MHz)
00	2402	20	2442
01	2404	21	2444
02	2406	22	2446
03	2408	23	2448
04	2410	24	2450

05	2412	25	2452
06	2414	26	2454
07	2416	27	2456
08	2418	28	2458
09	2420	29	2460
10	2422	30	2462
11	2424	31	2464
12	2426	32	2466
13	2428	33	2468
14	2430	34	2470
15	2432	35	2472
16	2434	36	2474
17	2436	37	2476
18	2438	38	2478
19	2440	39	2480

4.2. EUT Test Mode

TM1	GFSK
Channel	CH00
	CH19
	CH39
Test software Version	Test program:sscom v5.13.1
Frequency	2402MHz,2440MHz,2480MHz
Power Setting of Softwave	0
Note:All above mode have been measurement, only worst data was reported.	

4.3. Auxiliary Equipment Used During Test

No.	Equipment	Manufacturer	Model No.	Serial No.	Remark
1	HP laptop	HP	DESKTOP-G3N DKR3	N/A	N/A

5. EQUIPMENTS LIST FOR ALL TEST ITEMS

Conducted Emission at AC power line						
No	Test Equipment	Manufacturer	Model No	Serial No	Cal. Date	Cal. Due Date
1	EMI test receiver ESCI	R&S	ESCI-3	100503	2026-03-17	2028-03-16
2	LISN	R&S	ENV216	103017	2025-09-10	2026-09-09
3	10dB limiter	Schwarzbeck	VTSD 9561	102834	2026-03-17	2028-03-16

6dB Bandwidth Maximum Conducted Output Power Power Spectral Density Emissions in non-restricted frequency bands						
No	Test Equipment	Manufacturer	Model No	Serial No	Cal. Date	Cal. Due Date
1	spectrum analyzer	Agilent	N9020A	MY51287427	2025-07-07	2026-07-06
2	RF automatic control unit	TST	CBOX-Full	2752539	2025-07-14	2026-07-13

Band edge emissions (Radiated) Emissions in frequency bands (above 1GHz)						
No	Test Equipment	Manufacturer	Model No	Serial No	Cal. Date	Cal. Due Date
1	preamplifier	QUANJUDA	LNA18	2503130032	2025-07-07	2026-07-06
2	High frequency antenna	Schwarzbeck	9120D-1141	03260	2025-10-19	2026-10-18
3	High-frequency horn antenna	Schwarzbeck	HA-018040L	25098408	2025-10-31	2026-10-30
4	preamplifier	HCT	HC180400-50 G25	25098401	2025-09-19	2026-09-18
5	spectrum analyzer	R&S	FSV40	101373	2025-12-24	2026-12-23

Emissions in frequency bands (below 1GHz)						
No	Test Equipment	Manufacturer	Model No	Serial No	Cal. Date	Cal. Due Date
1	EMI test receiver ESCI	R&S	ESPI-7	100754	2026-03-17	2028-03-16
2	Log periodic antenna	SCHWARZBECK	VULB9163	01790	2025-10-24	2026-10-23
3	preamplifier	SCHWARZBECK	8447D	2944A08081	2026-03-17	2028-03-16

6. TEST RESULTS

6.1. Antenna requirement

Test Requirement:	Refer to 47 CFR Part 15.203, an intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device. The use of a permanently attached antenna or of an antenna that uses a unique coupling to the intentional radiator shall be considered sufficient to comply with the provisions of this section.
Test Method:	---

6.1.1. Conclusion:

The EUT Antenna is PCB Antenna. It conforms to the standard requirements.

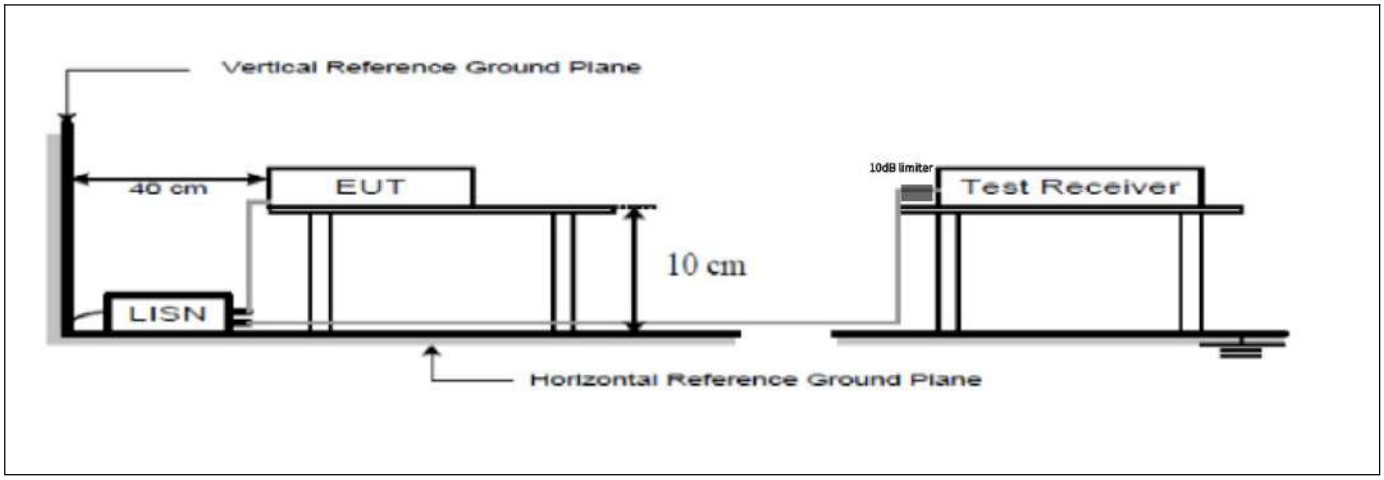
6.2. Conducted Emission at AC power line

Test Requirement:	Refer to 47 CFR 15.207(a), Except as shown in paragraphs (b)and (c)of this section, for an intentional radiator that 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 the limits in the following table, as measured using a 50 μH/50 ohms line impedance stabilization network (LISN).
Test Limit:	Frequency of emission (MHz) / Conducted limit (dBμV): Quasi-peak / Average 0.15-0.5: 66 to 56* / 56 to 46* 0.5-5: 56 / 46 5-30: 60 / 50 *Decreases with the logarithm of the frequency.
Test Method:	ANSI C63.10-2020 section 6.2
Procedure:	Refer to ANSI C63.10-2020 section 6.2, standard test method for ac power-line conducted emissions from unlicensed wireless devices
Spectrum Analyzer Setting:	Spectrum Analyzer Setting / Setting RBW / 9KHz VBW / 9KHz Start frequency / 150KHz Stop frequency / 30MHz Sweep Time / Auto Detector / Peak/AVG Trace Mode / Max Hold

6.2.1. EUT Operation

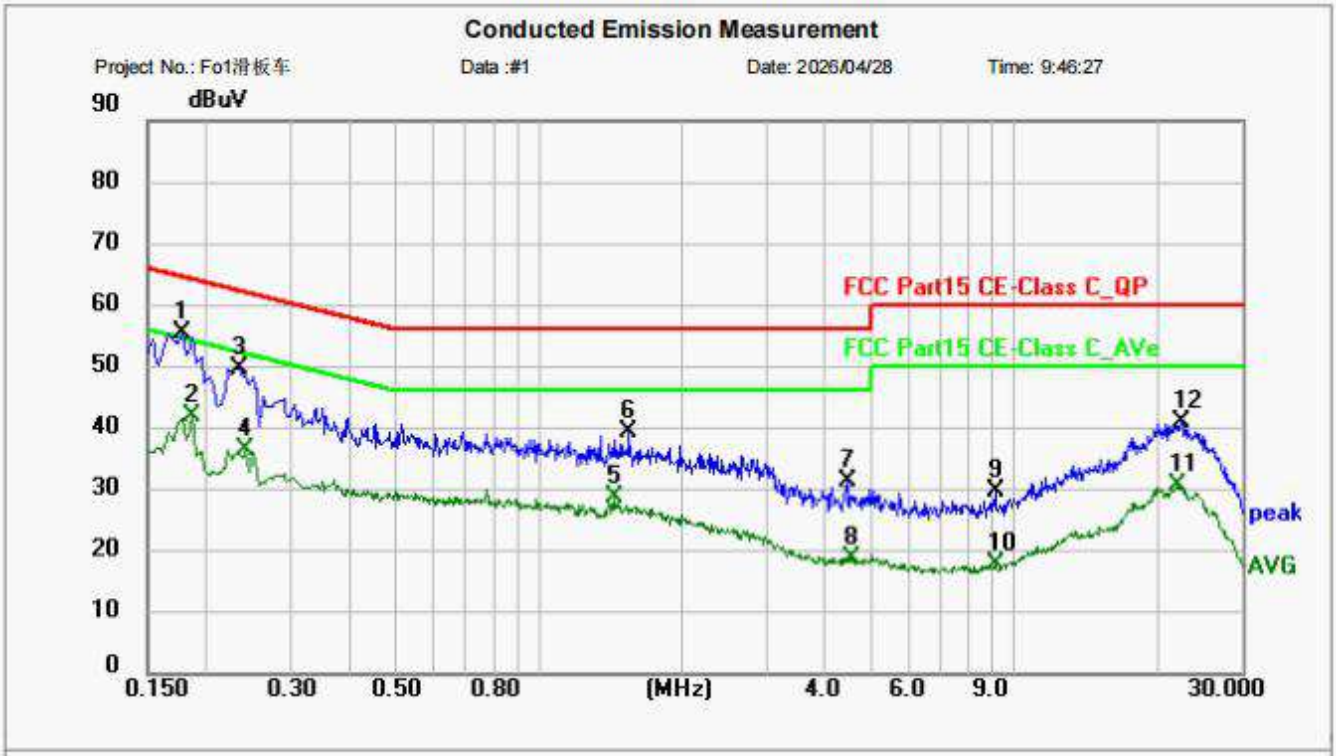
Operating Environment:					
Temperature:	23.9 °C	Humidity:	55.2 %	Atmospheric Pressure:	102.3 kPa
Pre test mode:	TM1				
Final test mode:	TM1				

6.2.2. Test Setup Diagram:



6.2.3. Test Data

TM1 / Line: Line / Band: 2400-2483.5 MHz / BW: 1



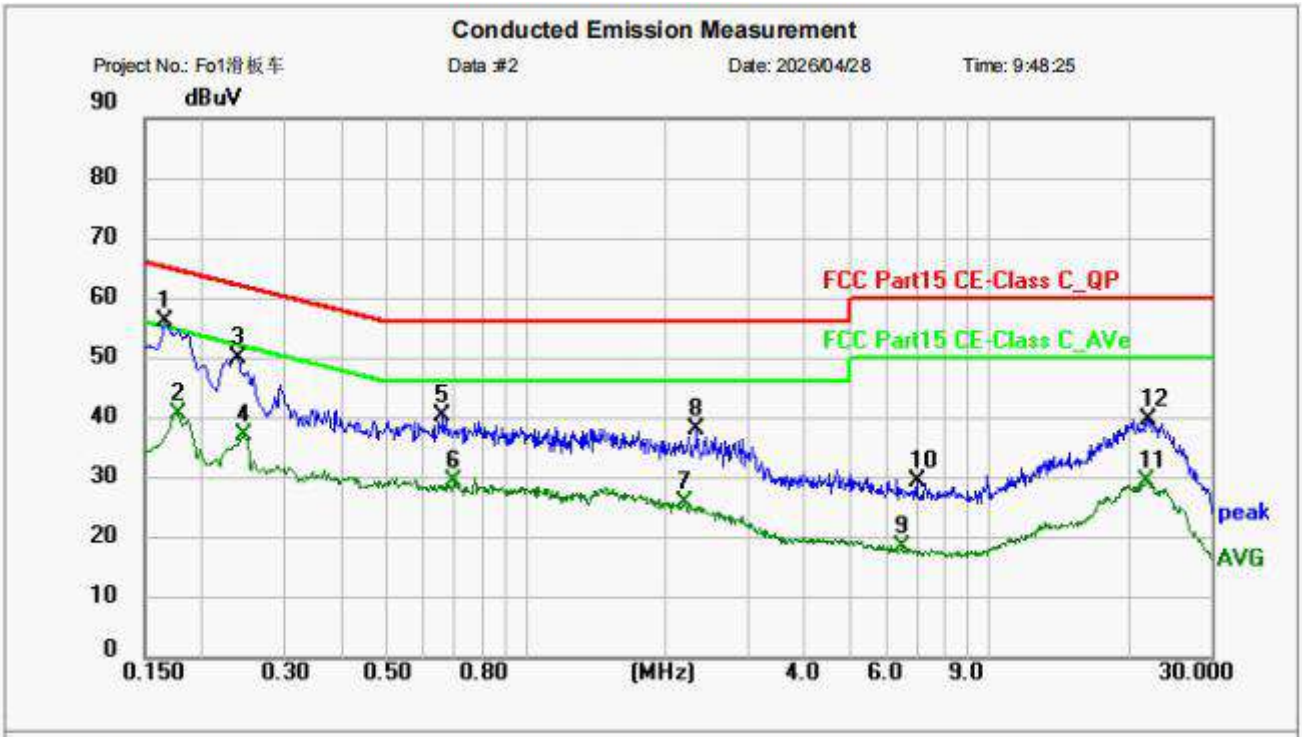
Site: LAB
Limit: FCC Part15 CE-Class C_QP
EUT:
M/N: charging
Mode:
Note:

Phase: L1
Power: AC120/60Hz

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB)	Level (dBuV)	Limit (dBuV)	Margin (dB)	Detector	P/F	Remark
1 *	0.1777	36.15	19.42	55.57	64.59	-9.02	peak	P	
2	0.1860	22.65	19.42	42.07	54.21	-12.14	AVG	P	
3	0.2340	30.28	19.44	49.72	62.31	-12.59	peak	P	
4	0.2420	17.05	19.44	36.49	52.03	-15.54	AVG	P	
5	1.4340	9.11	19.51	28.62	46.00	-17.38	AVG	P	
6	1.5500	19.73	19.52	39.25	56.00	-16.75	peak	P	
7	4.4420	11.55	19.70	31.25	56.00	-24.75	peak	P	
8	4.5300	-0.75	19.70	18.95	46.00	-27.05	AVG	P	
9	9.1300	9.78	20.07	29.85	60.00	-30.15	peak	P	
10	9.1300	-2.10	20.07	17.97	50.00	-32.03	AVG	P	
11	21.9660	9.43	21.23	30.66	50.00	-19.34	AVG	P	
12	22.4700	19.82	21.27	41.09	60.00	-18.91	peak	P	

TM1 / Line: Neutral / Band: 2400-2483.5 MHz / BW: 1



Site LAB
Limit: FCC Part15 CE-Class C_QP
EUT:
M/N: charging
Mode:
Note:

Phase: N
Power: AC120/60Hz

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB)	Level (dBuV)	Limit (dBuV)	Margin (dB)	Detector	P/F	Remark
1 *	0.1660	36.68	19.40	56.08	65.16	-9.08	peak	P	
2	0.1768	21.18	19.41	40.59	54.63	-14.04	AVG	P	
3	0.2380	30.58	19.43	50.01	62.17	-12.16	peak	P	
4	0.2460	17.67	19.43	37.10	51.89	-14.79	AVG	P	
5	0.6580	20.80	19.47	40.27	56.00	-15.73	peak	P	
6	0.6940	10.05	19.47	29.52	46.00	-16.48	AVG	P	
7	2.2020	6.26	19.54	25.80	46.00	-20.20	AVG	P	
8	2.3420	18.50	19.55	38.05	56.00	-17.95	peak	P	
9	6.4899	-1.35	19.88	18.53	50.00	-31.47	AVG	P	
10	6.9740	9.37	19.93	29.30	60.00	-30.70	peak	P	
11	21.8220	8.31	21.23	29.54	50.00	-20.46	AVG	P	
12	21.9820	18.54	21.24	39.78	60.00	-20.22	peak	P	

6.3. 6dB Bandwidth

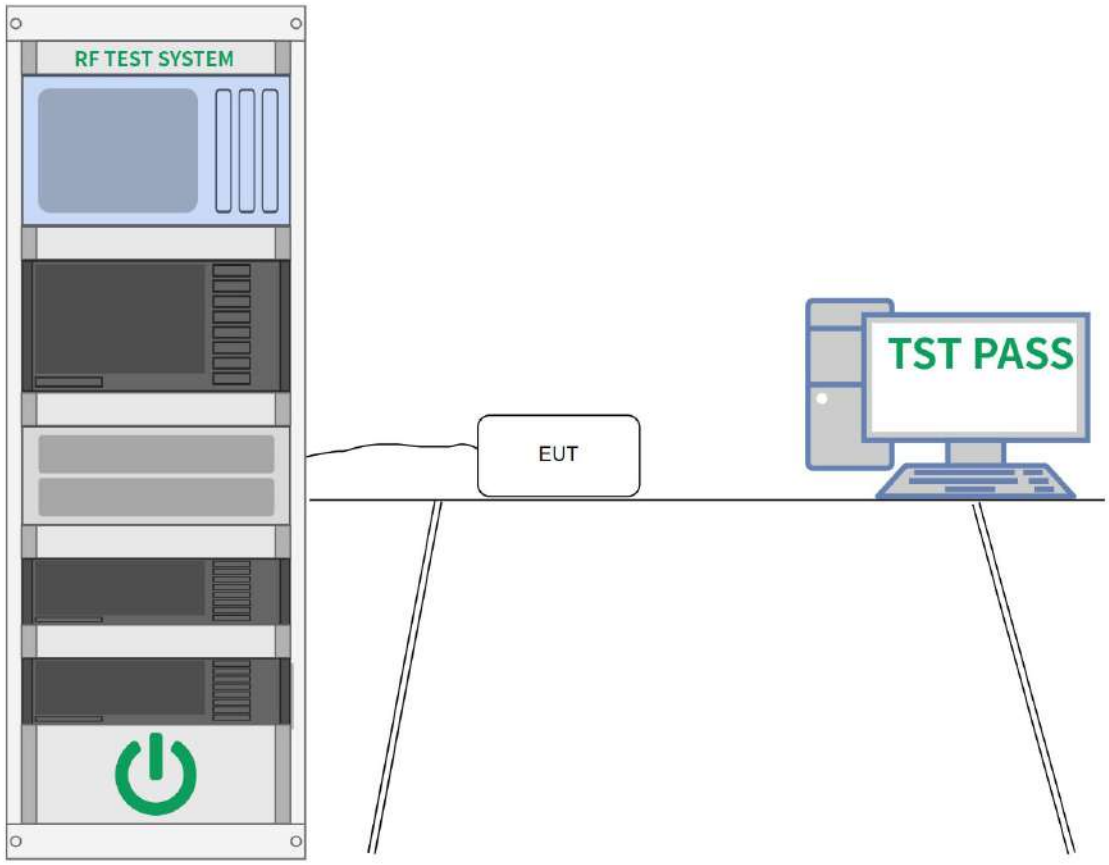
Test Requirement:	47 CFR 15.247(a)(2)
Test Limit:	Refer to 47 CFR 15.247(a)(2), Systems using digital modulation techniques may operate in the 902-928 MHz, and 2400-2483.5 MHz bands. The minimum 6 dB bandwidth shall be at least 500 kHz.
Test Method:	ANSI C63.10-2020, section 11.8
Procedure:	11.8.1 Option 1 The steps for the first option are as follows: a) Set RBW = shall be in the range of 1% to 5% of the OBW but not less than 100 kHz. b) Set the VBW ≥ [3 × RBW]. c) Detector = peak. d) Trace mode = max-hold. e) Sweep = No faster than coupled (auto) time. f) Allow the trace to stabilize. g) Measure the maximum width of the emission by placing two markers, one at the lowest frequency and the other at the highest frequency of the envelope of the spectral display, such that each marker is at or slightly below the "−6 dB down amplitude". If a marker is below this "−6 dB down amplitude" value, then it shall be as close as possible to this value. 11.8.2 Option 2 The automatic bandwidth measurement capability of an instrument may be employed using the X dB bandwidth mode with X set to 6 dB, if the functionality described in 11.8.1 (i.e., RBW = 100 kHz, VBW ≥ 3 × RBW, and peak detector with maximum hold) is implemented by the instrumentation function. When using this capability, care shall be taken so that the bandwidth measurement is not influenced by any intermediate power nulls in the fundamental emission that might be ≥ 6 dB.
Spectrum Analyzer Setting:	

Spectrum Analyzer Setting	Setting
RBW	100KHz
VBW	300KHz
Span	3MHz
Sweep Time	Auto
Detector	Peak
Trace Mode	Max Hold

6.3.1. EUT Operation

Operating Environment:					
Temperature:	22 °C	Humidity:	55.8 %	Atmospheric Pressure:	101.4 kPa
Pre test mode:	TM1				
Final test mode:	TM1				

6.3.2. Test Setup Diagram:



6.3.3. Test Data

Please Refer to Appendix for Details.

6.4. Maximum Conducted Output Power

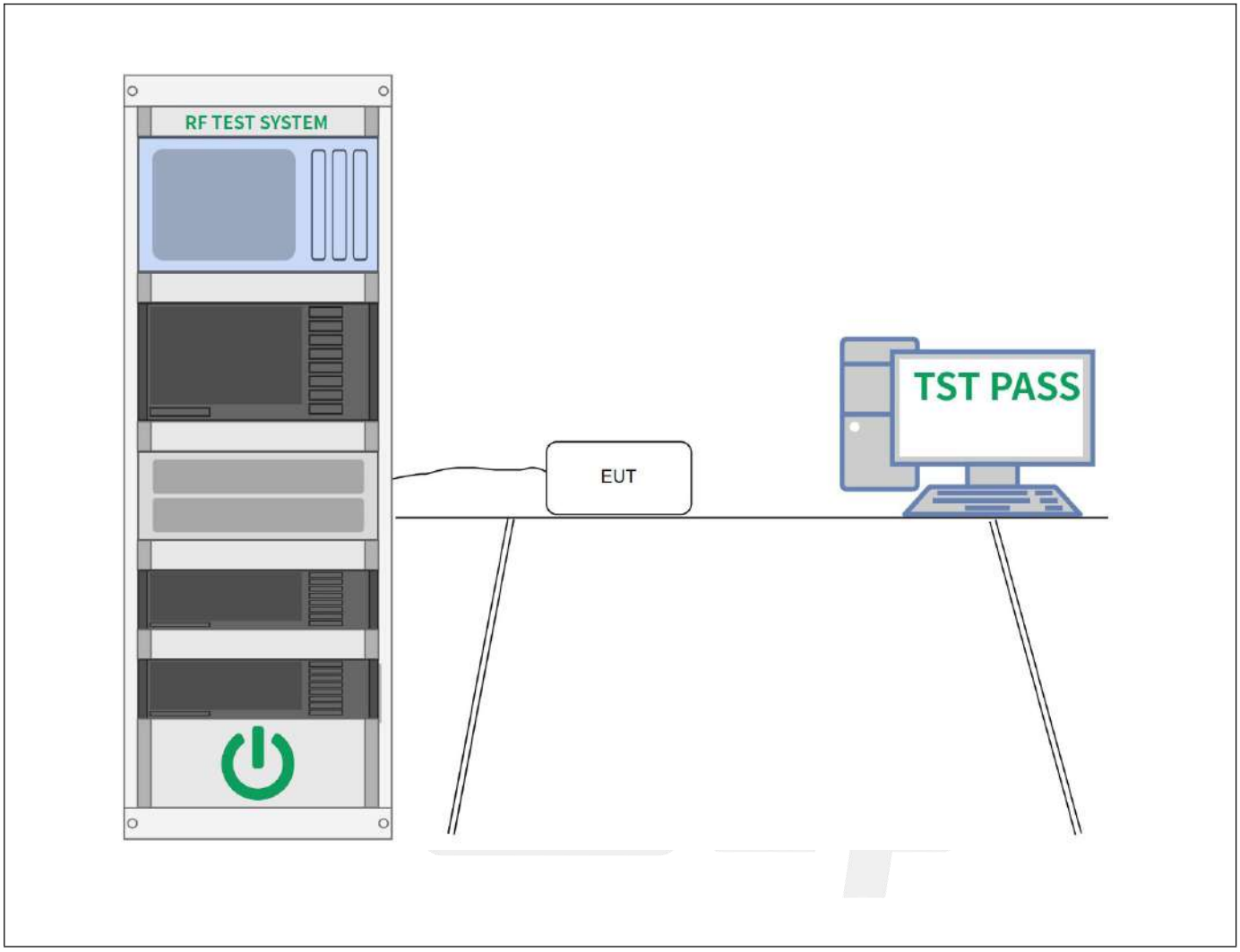
Test Requirement:	47 CFR 15.247(b)(3)
Test Limit:	Refer to 47 CFR 15.247(b)(3), For systems using digital modulation in the 902-928 MHz, 2400-2483.5 MHz, and 5725-5850 MHz bands: 1 Watt. As an alternative to a peak power measurement, compliance with the one Watt limit can be based on a measurement of the maximum conducted output power. Maximum Conducted Output Power is defined as the total transmit power delivered to all antennas and antenna elements averaged across all symbols in the signaling alphabet when the transmitter is operating at its maximum power control level. Power must be summed across all antennas and antenna elements. The average must not include any time intervals during which the transmitter is off or is transmitting at a reduced power level. If multiple modes of operation are possible (e.g., alternative modulation methods), the maximum conducted output power is the highest total transmit power occurring in any mode.
Test Method:	ANSI C63.10-2020 section 11.9.1
Procedure:	ANSI C63.10-2020, section 11.9.1 Maximum peak conducted output power
Spectrum Analyzer Setting:	

Spectrum Analyzer Setting	Setting
RBW	>DTS Bandwidth
VBW	3*RBW
Span	>3*DTS Bandwidth
Sweep Time	Auto
Detector	Peak
Trace Mode	Max Hold

6.4.1. EUT Operation

Operating Environment:					
Temperature:	22.7 °C	Humidity:	49.2 %	Atmospheric Pressure:	101.4 kPa
Pre test mode:	TM1				
Final test mode:	TM1				

6.4.2. Test Setup Diagram:



6.4.3. Test Data

Please Refer to Appendix for Details.

6.5. Power Spectral Density

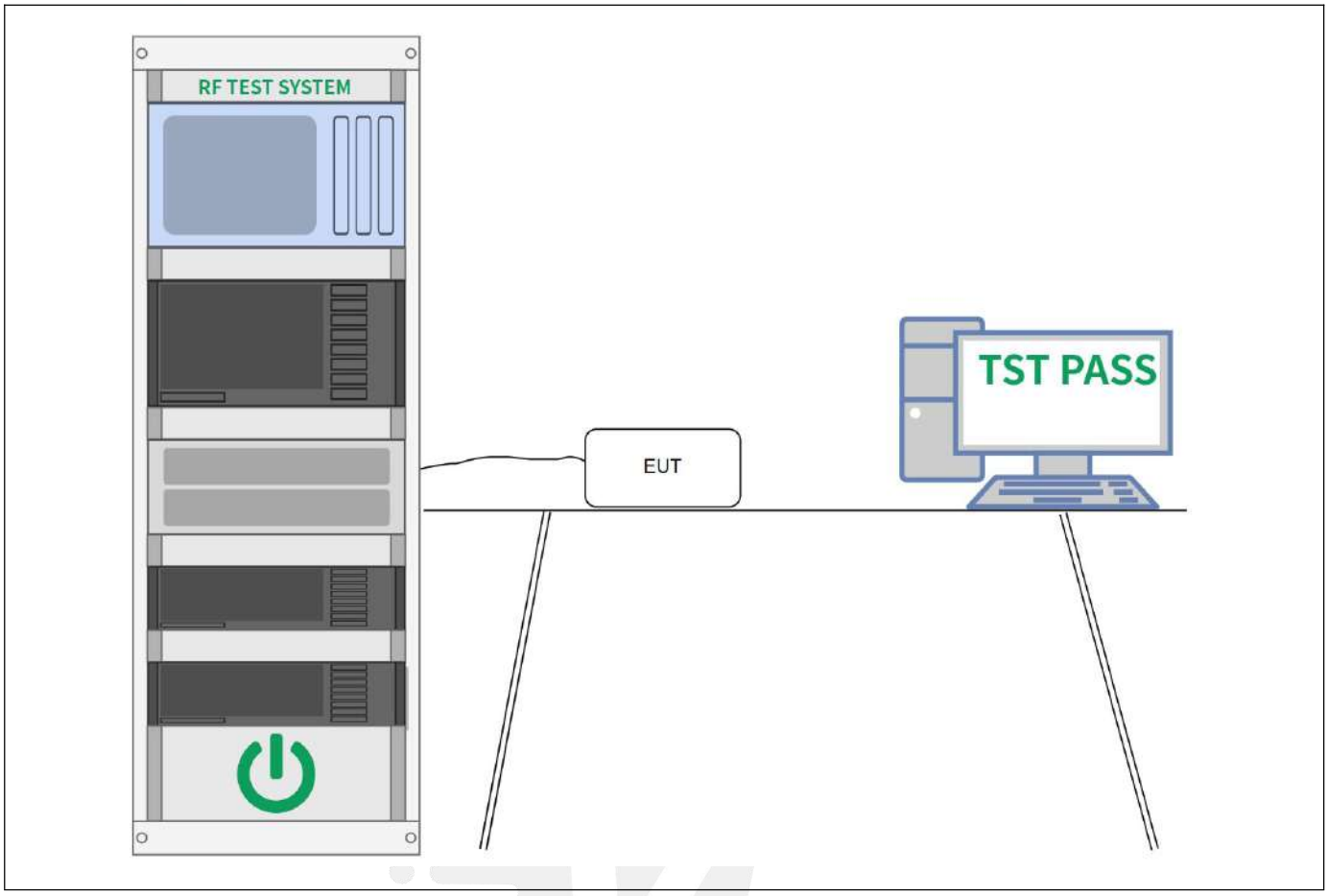
Test Requirement:	47 CFR 15.247(e)
Test Limit:	Refer to 47 CFR 15.247(e), For digitally modulated systems, the power spectral density conducted from the intentional radiator to the antenna shall not be greater than 8 dBm in any 3 kHz band during any time interval of continuous transmission. This power spectral density shall be determined in accordance with the provisions of paragraph (b) of this section. The same method of determining the conducted output power shall be used to determine the power spectral density.
Test Method:	ANSI C63.10-2020, section 11.10
Procedure:	ANSI C63.10-2020+Cor 1-2023, section 11.10, Maximum power spectral density level in the fundamental emission
Spectrum Analyzer Setting:	

Spectrum Analyzer Setting	Setting
RBW	3KHz
VBW	10KHz
Span	1.5 times the DTS bandwidth
Sweep Time	Auto
Detector	Peak
Trace Mode	Max Hold

6.5.1. EUT Operation

Operating Environment:					
Temperature:	22.6 °C	Humidity:	47.1 %	Atmospheric Pressure:	101.4 kPa
Pre test mode:	TM1				
Final test mode:	TM1				

6.5.2. Test Setup Diagram:



6.5.3. Test Data

Please Refer to Appendix for Details.

6.6. Emissions in non-restricted frequency bands

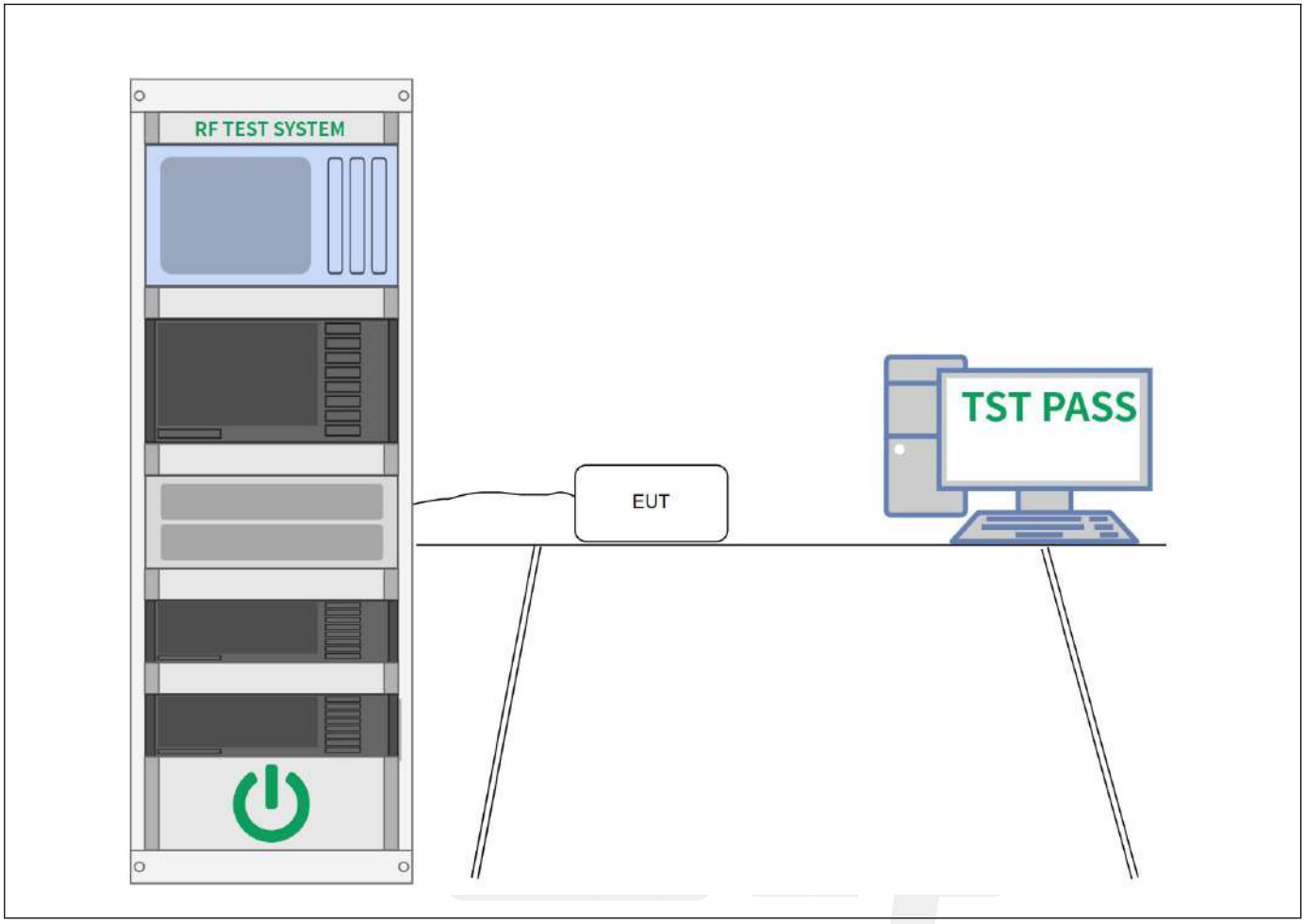
Test Requirement:	47 CFR 15.247(d)
Test Limit:	Refer to 47 CFR 15.247(d), In any 100 kHz bandwidth outside the frequency band in which the spread spectrum or digitally modulated intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 20 dB below that in the 100 kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement, provided the transmitter demonstrates compliance with the peak conducted power limits. If the transmitter complies with the conducted power limits based on the use of RMS averaging over a time interval, as permitted under paragraph (b)(3) of this section, the attenuation required under this paragraph shall be 30 dB instead of 20 dB. Attenuation below the general limits specified in § 15.209(a) is not required.
Test Method:	ANSI C63.10-2020 section 11.11
Procedure:	ANSI C63.10-2020 Section 11.11.1, Section 11.11.2, Section 11.11.3
Spectrum Analyzer Setting:	

Spectrum Analyzer Setting	Setting
RBW	100KHz
VBW	300KHz
Start frequency	30MHz
Stop frequency	26.5GHz
Sweep Time	Auto
Detector	Peak
Trace Mode	Max Hold

6.6.1. EUT Operation

Operating Environment:					
Temperature:	23 °C	Humidity:	54.7 %	Atmospheric Pressure:	101.4 kPa
Pre test mode:	TM1				
Final test mode:	TM1				

6.6.2. Test Setup Diagram:



6.6.3. Test Data

Please Refer to Appendix for Details.

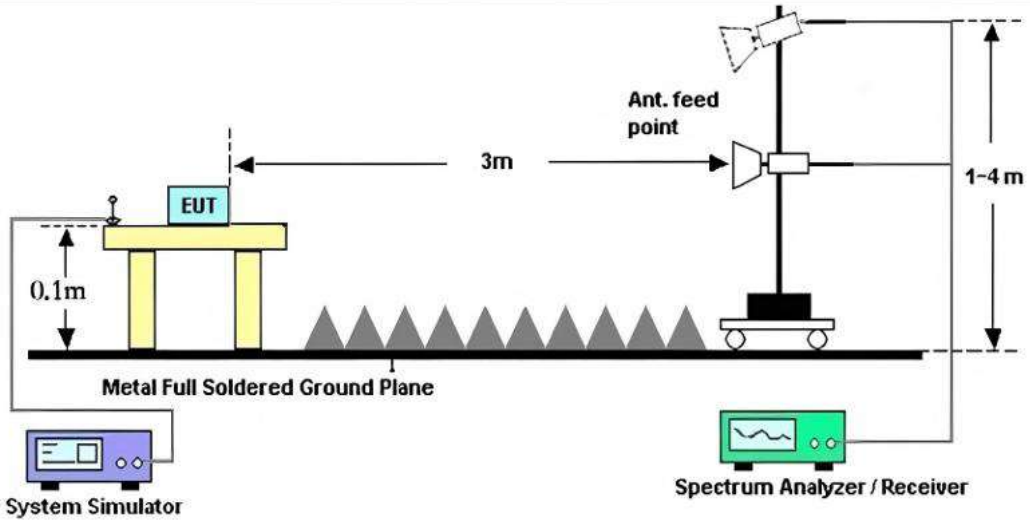
6.7. Band edge emissions (Radiated)

<table>
<tr><td>Test Requirement:</td><td colspan="3">Refer to 47 CFR 15.247(d), In addition, radiated emissions which fall in the restricted bands, as defined in § 15.205(a), must also comply with the radiated emission limits specified in § 15.209(a)(see § 15.205(c)).</td></tr>
<tr><td>Test Limit:</td><td colspan="3">
<table>
<tr><td>Frequency (MHz)</td><td>Field strength (microvolts/meter)</td><td>Measurement distance (meters)</td></tr>
<tr><td>0.009-0.490</td><td>2400/F(kHz)</td><td>300</td></tr>
<tr><td>0.490-1.705</td><td>24000/F(kHz)</td><td>30</td></tr>
<tr><td>1.705-30.0</td><td>30</td><td>30</td></tr>
<tr><td>30-88</td><td>100 **</td><td>3</td></tr>
<tr><td>88-216</td><td>150 **</td><td>3</td></tr>
<tr><td>216-960</td><td>200 **</td><td>3</td></tr>
<tr><td>Above 960</td><td>500</td><td>3</td></tr>
</table>
** 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.
In the emission table above, the tighter limit applies at the band edges.
The emission limits shown in the above table are based on measurements employing a CISPR quasi-peak detector except for the frequency bands 9–90 kHz, 110–490 kHz and above 1000 MHz. Radiated emission limits in these three bands are based on measurements employing an average detector.
</td></tr>
<tr><td>Test Method:</td><td colspan="3">ANSI C63.10-2020 section 6.10</td></tr>
<tr><td>Procedure:</td><td colspan="3">ANSI C63.10-2020 section 6.10.5.2</td></tr>
<tr><td>Spectrum Analyzer Setting:</td><td colspan="3">
<table>
<tr><td>Spectrum Analyzer Setting</td><td colspan="2">Setting</td></tr>
<tr><td>RBW</td><td colspan="2">1MHz</td></tr>
<tr><td rowspan="3">VBW</td><td>PEAK Measurement</td><td>AVG Measurement</td></tr>
<tr><td rowspan="2">3MHz</td><td>Duty cycle⩾ 98%,VBW=10Hz</td></tr>
<tr><td>Duty cycle<98%,VBWz1 /T</td></tr>
<tr><td>Start frequency</td><td colspan="2">2.35GHz</td></tr>
<tr><td>Stop frequency</td><td colspan="2">2.50GHz</td></tr>
<tr><td>Sweep Time</td><td colspan="2">Auto</td></tr>
<tr><td>Detector</td><td colspan="2">Peak</td></tr>
<tr><td>Trace Mode</td><td colspan="2">Max Hold</td></tr>
</table>
</td></tr>
</table>

6.7.1. EUT Operation

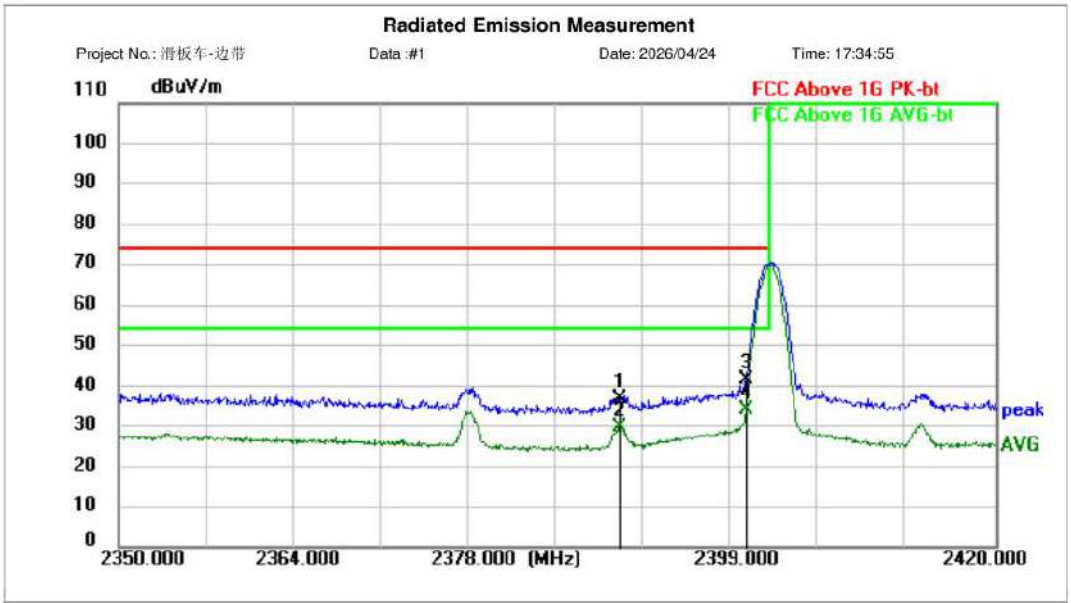
Operating Environment:					
Temperature:	23.6 °C	Humidity:	55 %	Atmospheric Pressure:	101.4 kPa
Pre test mode:	TM1				
Final test mode:	TM1				

6.7.2. Test Setup Diagram:



6.7.3. Test Data

TM1 / Polarization: Horizontal / Band: 2400-2483.5 MHz / BW: 1



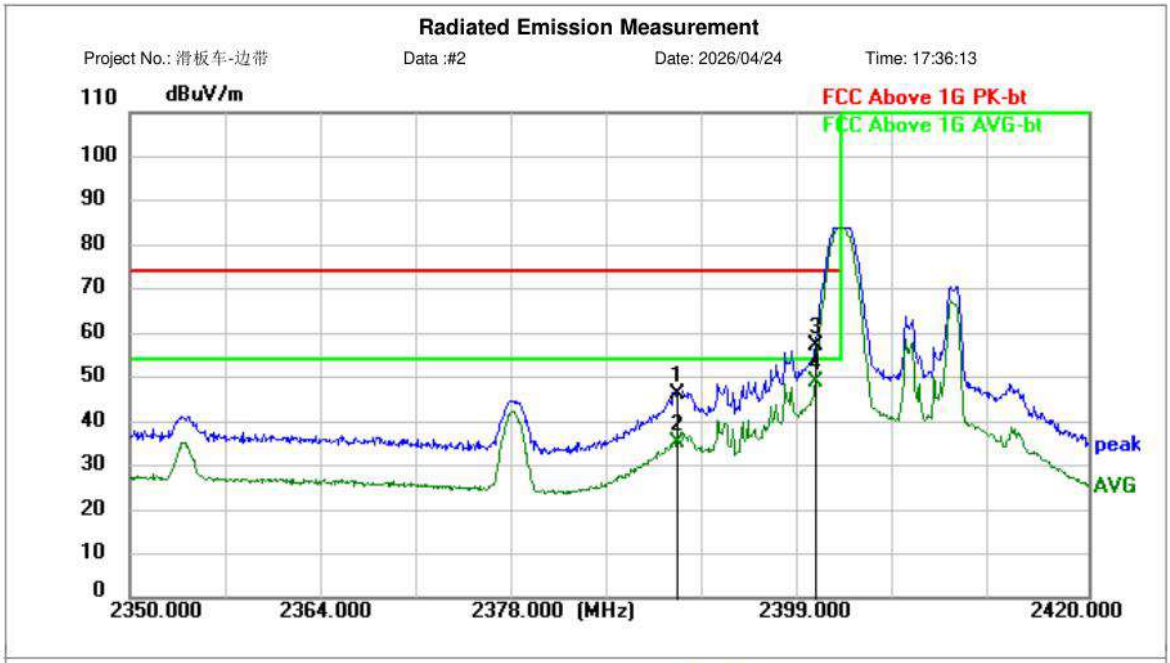
Site LAB
Limit: FCC Above 1G PK-bt
EUT:
M/N: 1M 2402
Mode:
Note:

Polarization: *Horizontal*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	2390.0000	61.81	-25.27	36.54	74.00	-37.46	peak	150	360	P	
2	2390.0000	54.81	-25.27	29.54	54.00	-24.46	AVG	150	360	P	
3	2400.0000	67.42	-25.87	41.55	74.00	-32.45	peak	150	360	P	
4 *	2400.0000	59.75	-25.87	33.88	54.00	-20.12	AVG	150	360	P	

TM1 / Polarization: Vertical / Band: 2400-2483.5 MHz / BW: 1



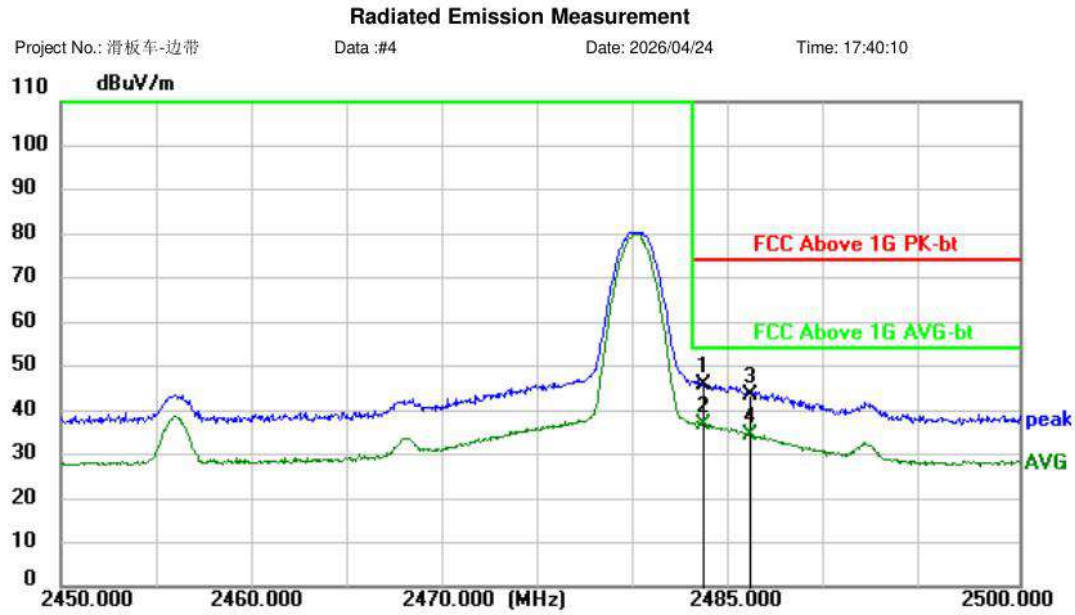
Site LAB
Limit: FCC Above 1G PK-bt
EUT:
M/N: 1M 2402
Mode:
Note:

Polarization: *Vertical*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	2390.0000	68.85	-22.71	46.14	74.00	-27.86	peak	150	360	P	
2	2390.0000	57.80	-22.71	35.09	54.00	-18.91	AVG	150	360	P	
3	2400.0000	79.65	-22.67	56.98	74.00	-17.02	peak	150	360	P	
4 *	2400.0000	71.75	-22.67	49.08	54.00	-4.92	AVG	150	360	P	

TM1 / Polarization: Horizontal / Band: 2400-2483.5 MHz / BW: 2



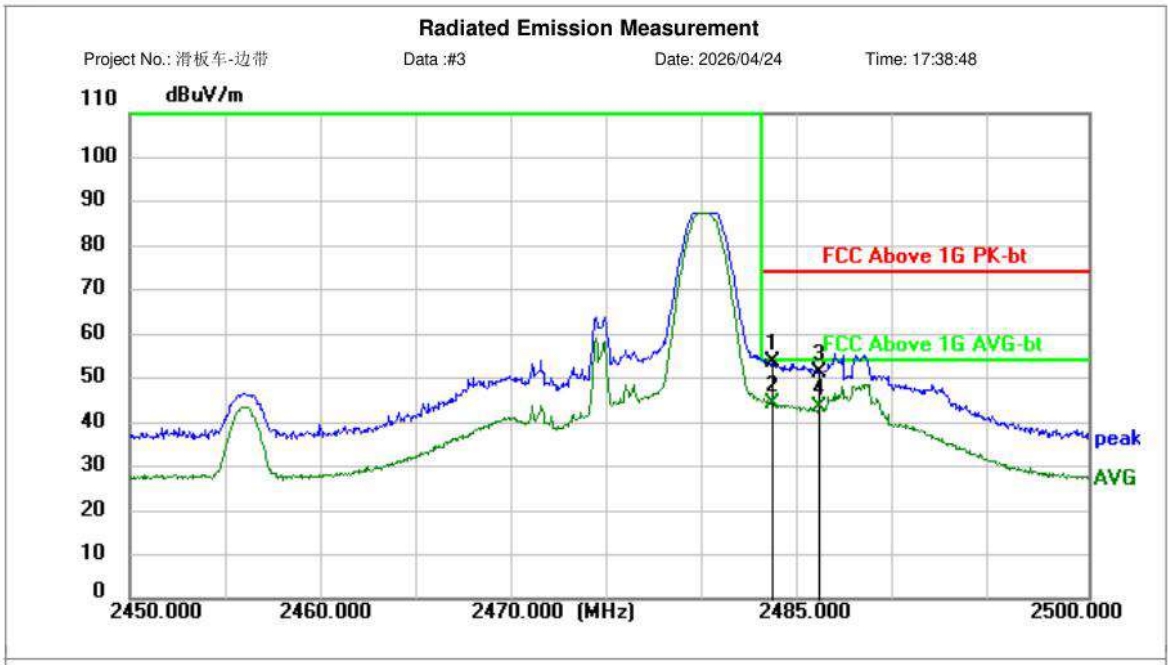
Site LAB
Limit: FCC Above 1G PK-bt
EUT:
M/N: 1M 2480
Mode:
Note:

Polarization: ***Horizontal***
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	2483.5000	68.47	-22.81	45.66	74.00	-28.34	peak	150	360	P	
2 *	2483.5000	59.38	-22.81	36.57	54.00	-17.43	AVG	150	360	P	
3	2486.0000	66.17	-22.79	43.38	74.00	-30.62	peak	150	360	P	
4	2486.0000	56.99	-22.79	34.20	54.00	-19.80	AVG	150	360	P	

TM1 / Polarization: Vertical / Band: 2400-2483.5 MHz / BW: 2



Site LAB
Limit: FCC Above 1G PK-bt
EUT:
M/N: 1M 2480
Mode:
Note:

Polarization: *Vertical*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	2483.5000	76.07	-22.27	53.80	74.00	-20.20	peak	150	360	P	
2 *	2483.5000	66.48	-22.27	44.21	54.00	-9.79	AVG	150	360	P	
3	2486.0000	73.61	-22.26	51.35	74.00	-22.65	peak	150	360	P	
4	2486.0000	65.53	-22.26	43.27	54.00	-10.73	AVG	150	360	P	

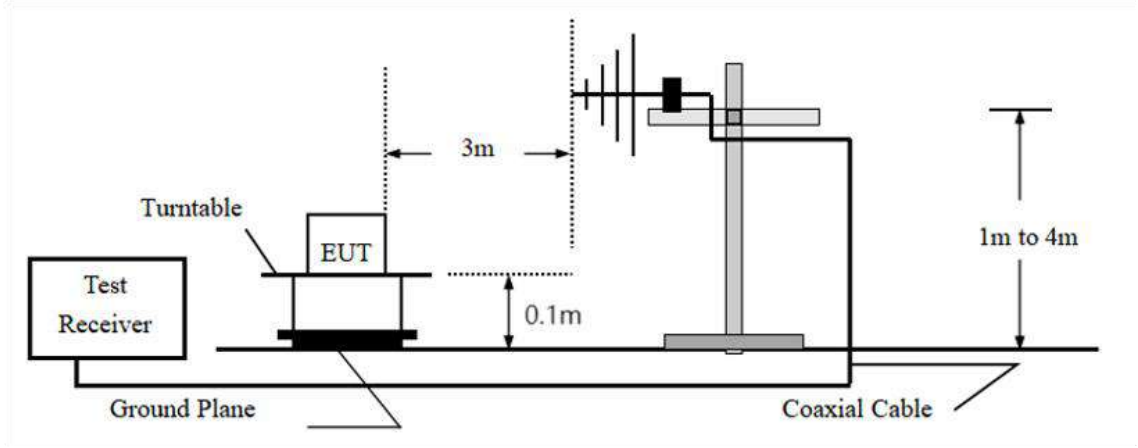
6.8. Emissions in frequency bands (below 1GHz)

<table>
<tr><td>Test Requirement:</td><td>Refer to 47 CFR 15.247(d), In addition, radiated emissions which fall in the restricted bands, as defined in § 15.205(a), must also comply with the radiated emission limits specified in § 15.209(a)(see § 15.205(c)).</td></tr>
<tr><td>Test Limit:</td><td>
<table>
<tr><td>Frequency (MHz)</td><td>Field strength (microvolts/meter)</td><td>Measurement distance (meters)</td></tr>
<tr><td>0.009-0.490</td><td>2400/F(kHz)</td><td>300</td></tr>
<tr><td>0.490-1.705</td><td>24000/F(kHz)</td><td>30</td></tr>
<tr><td>1.705-30.0</td><td>30</td><td>30</td></tr>
<tr><td>30-88</td><td>100 **</td><td>3</td></tr>
<tr><td>88-216</td><td>150 **</td><td>3</td></tr>
<tr><td>216-960</td><td>200 **</td><td>3</td></tr>
<tr><td>Above 960</td><td>500</td><td>3</td></tr>
</table>
** 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.
In the emission table above, the tighter limit applies at the band edges.
The emission limits shown in the above table are based on measurements employing a CISPR quasi-peak detector except for the frequency bands 9–90 kHz, 110–490 kHz and above 1000 MHz. Radiated emission limits in these three bands are based on measurements employing an average detector.
</td></tr>
<tr><td>Test Method:</td><td>ANSI C63.10-2020 section 6.5.4</td></tr>
<tr><td>Procedure:</td><td>ANSI C63.10-2020 section 6.5.4</td></tr>
<tr><td>Spectrum Analyzer Setting:</td><td>
<table>
<tr><td>Spectrum Analyzer Setting</td><td>Setting</td></tr>
<tr><td>RBW</td><td>120KHz</td></tr>
<tr><td>VBW</td><td>300KHz</td></tr>
<tr><td>Start frequency</td><td>30MHz</td></tr>
<tr><td>Stop frequency</td><td>1GHz</td></tr>
<tr><td>Sweep Time</td><td>Auto</td></tr>
<tr><td>Detector</td><td>QP</td></tr>
<tr><td>Trace Mode</td><td>Max Hold</td></tr>
</table>
</td></tr>
</table>

6.8.1. EUT Operation

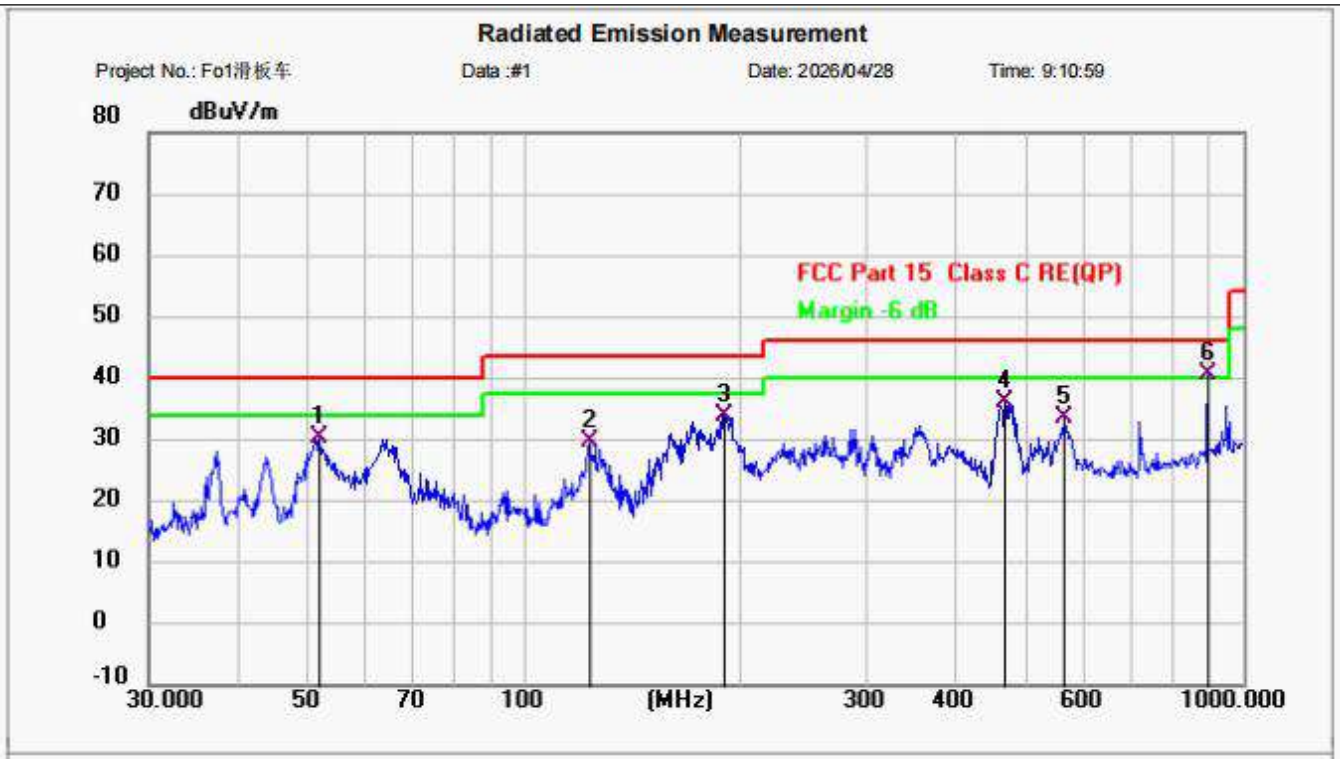
<table>
<tr><td colspan="6">Operating Environment:</td></tr>
<tr><td>Temperature:</td><td>21.8 °C</td><td>Humidity:</td><td>52 %</td><td>Atmospheric Pressure:</td><td>102.3 kPa</td></tr>
<tr><td colspan="2">Pre test mode:</td><td colspan="4">TM1</td></tr>
<tr><td colspan="2">Final test mode:</td><td colspan="4">TM1</td></tr>
</table>

6.8.2. Test Setup Diagram:



6.8.3. Test Data

TM1 / Polarization: Horizontal / Band: 2400-2483.5 MHz / BW: 1



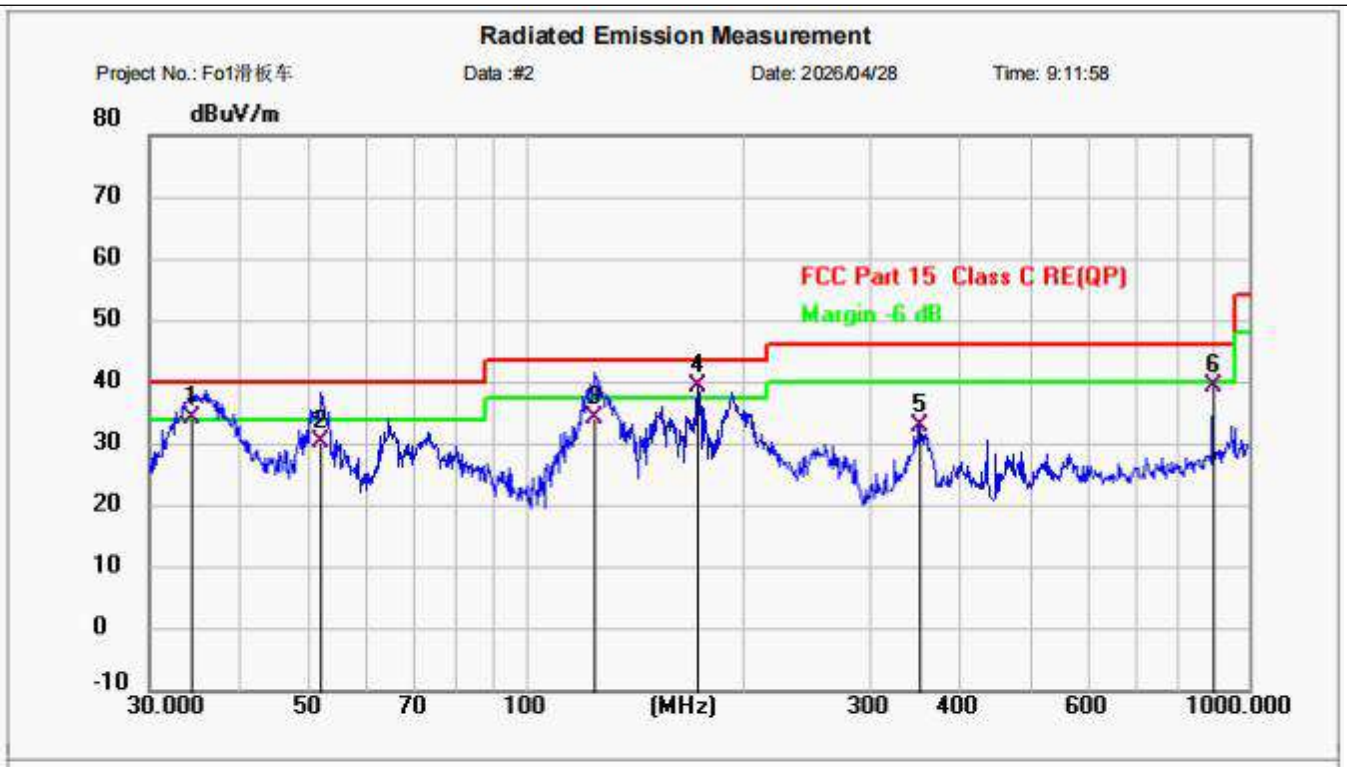
Site LAB
Limit: FCC Part 15 Class C RE(QP)
EUT:
M/N: working
Mode:
Note:

Polarization: *Horizontal*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	51.8430	40.97	-10.48	30.49	40.00	-9.51	QP	100	0	P	
2	123.2655	42.66	-12.94	29.72	43.50	-13.78	QP	100	0	P	
3	189.7385	45.39	-11.53	33.86	43.50	-9.64	QP	100	0	P	
4	467.2349	40.19	-4.21	35.98	46.00	-10.02	QP	100	0	P	
5	564.6389	35.82	-2.15	33.67	46.00	-12.33	QP	100	0	P	
6 *	893.8567	39.61	1.02	40.63	46.00	-5.37	QP	100	0	P	

TM1 / Polarization: Vertical / Band: 2400-2483.5 MHz / BW: 1



Site LAB
Limit: FCC Part 15 Class C RE(QP)
EUT:
M/N: working
Mode:
Note:

Polarization: *Vertical*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1 !	34.2760	46.04	-11.84	34.20	40.00	-5.80	QP	100	360	P	
2	52.0251	40.99	-10.49	30.50	40.00	-9.50	QP	100	360	P	
3	124.1330	47.34	-13.04	34.30	43.50	-9.20	QP	100	360	P	
4 *	172.5988	52.02	-12.84	39.18	43.50	-4.32	QP	100	360	P	
5	351.7079	39.66	-6.74	32.92	46.00	-13.08	QP	100	360	P	
6	893.8567	38.29	1.02	39.31	46.00	-6.69	QP	100	360	P	

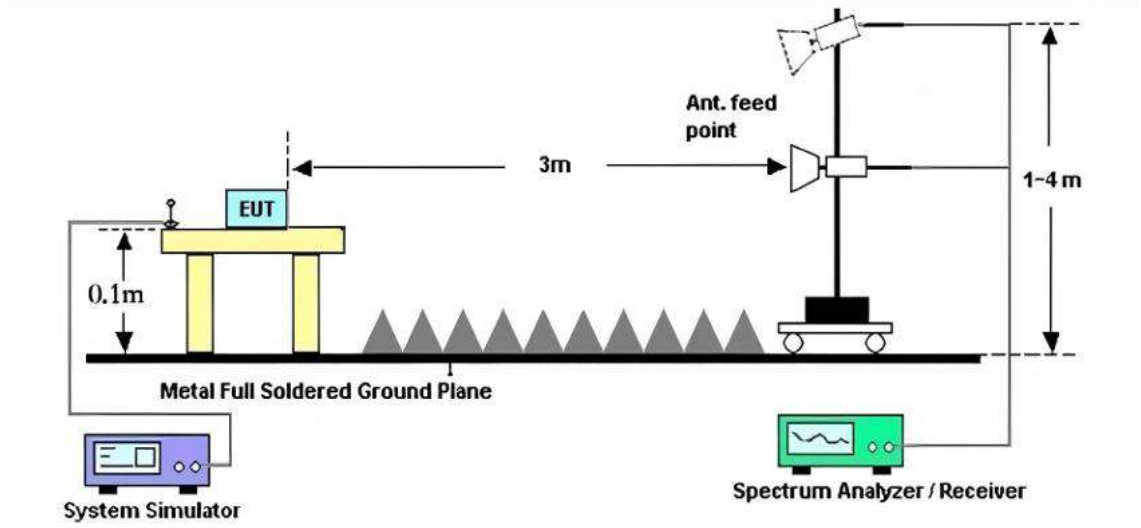
6.9. Emissions in frequency bands (above 1GHz)

<table>
<tr><td>Test Requirement:</td><td>Refer to 47 CFR 15.247(d), in addition, radiated emissions which fall in the restricted bands, as defined in § 15.205(a), must also comply with the radiated emission limits specified in § 15.209(a)(see § 15.205(c)).</td></tr>
<tr><td>Test Limit:</td><td>
<table>
<tr><td>Frequency (MHz)</td><td>Field strength (microvolts/meter)</td><td>Measurement distance (meters)</td></tr>
<tr><td>0.009-0.490</td><td>2400/F(kHz)</td><td>300</td></tr>
<tr><td>0.490-1.705</td><td>24000/F(kHz)</td><td>30</td></tr>
<tr><td>1.705-30.0</td><td>30</td><td>30</td></tr>
<tr><td>30-88</td><td>100 **</td><td>3</td></tr>
<tr><td>88-216</td><td>150 **</td><td>3</td></tr>
<tr><td>216-960</td><td>200 **</td><td>3</td></tr>
<tr><td>Above 960</td><td>500</td><td>3</td></tr>
</table>
** 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.
In the emission table above, the tighter limit applies at the band edges.
The emission limits shown in the above table are based on measurements employing a CISPR quasi-peak detector except for the frequency bands 9–90 kHz, 110–490 kHz and above 1000 MHz. Radiated emission limits in these three bands are based on measurements employing an average detector.
</td></tr>
<tr><td>Test Method:</td><td>ANSI C63.10-2020 section 6.5.4</td></tr>
<tr><td>Procedure:</td><td>ANSI C63.10-2020 section 6.5.4</td></tr>
<tr><td>Spectrum Analyzer Setting:</td><td>
<table>
<tr><td>Spectrum Analyzer Setting</td><td colspan="2">Setting</td></tr>
<tr><td>RBW</td><td colspan="2">1MHz</td></tr>
<tr><td rowspan="3">VBW</td><td>PEAK Measurement</td><td>AVG Measurement</td></tr>
<tr><td rowspan="2">3MHz</td><td>Duty cycle≥ 98%,VBW=10Hz</td></tr>
<tr><td>Duty cycle<98%,VBWz1 /T</td></tr>
<tr><td>Start frequency</td><td colspan="2">1GHz</td></tr>
<tr><td>Stop frequency</td><td colspan="2">40GHz</td></tr>
<tr><td>Sweep Time</td><td colspan="2">Auto</td></tr>
<tr><td>Detector</td><td colspan="2">Peak</td></tr>
<tr><td>Trace Mode</td><td colspan="2">Max Hold</td></tr>
</table>
</td></tr>
</table>

6.9.1. EUT Operation

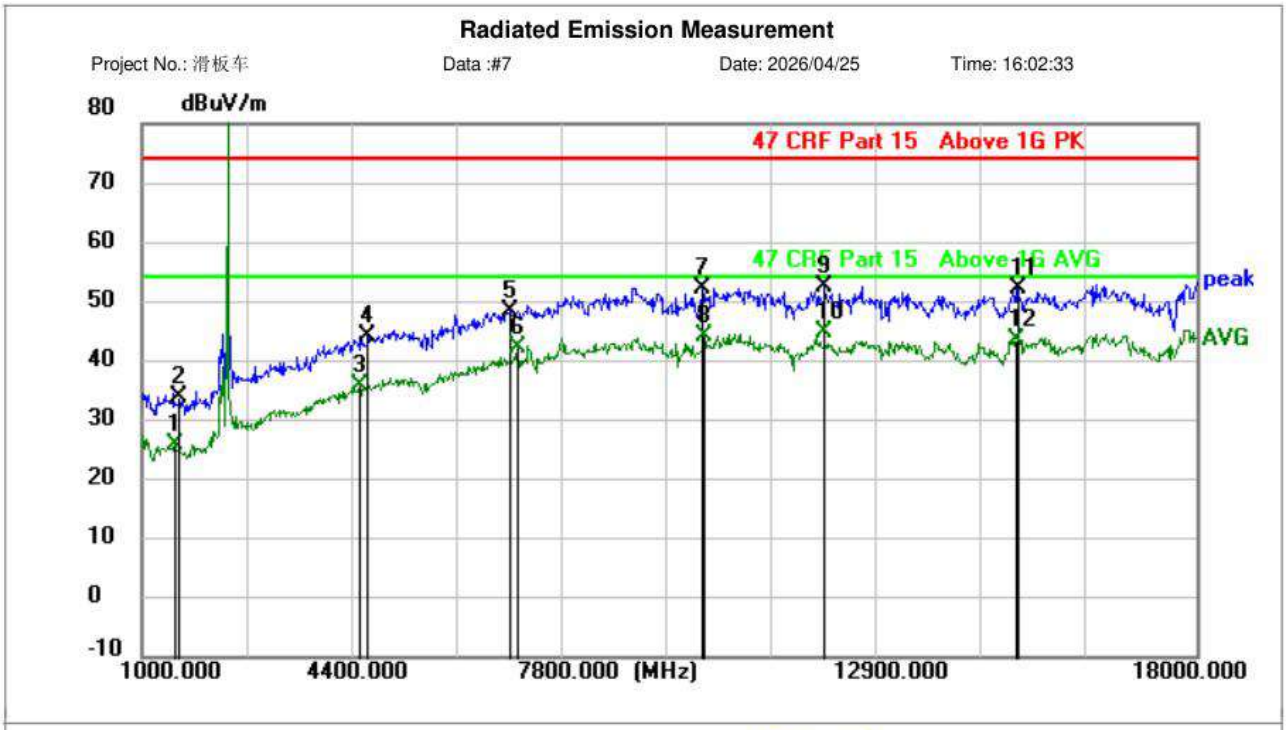
Operating Environment:					
Temperature:	21.2 °C	Humidity:	47.2 %	Atmospheric Pressure:	102.3 kPa
Pre test mode:	TM1				
Final test mode:	TM1				

6.9.2. Test Setup Diagram:



6.9.3. Test Data

TM1 / Polarization: Horizontal / Band: 2400-2483.5 MHz / BW: 1

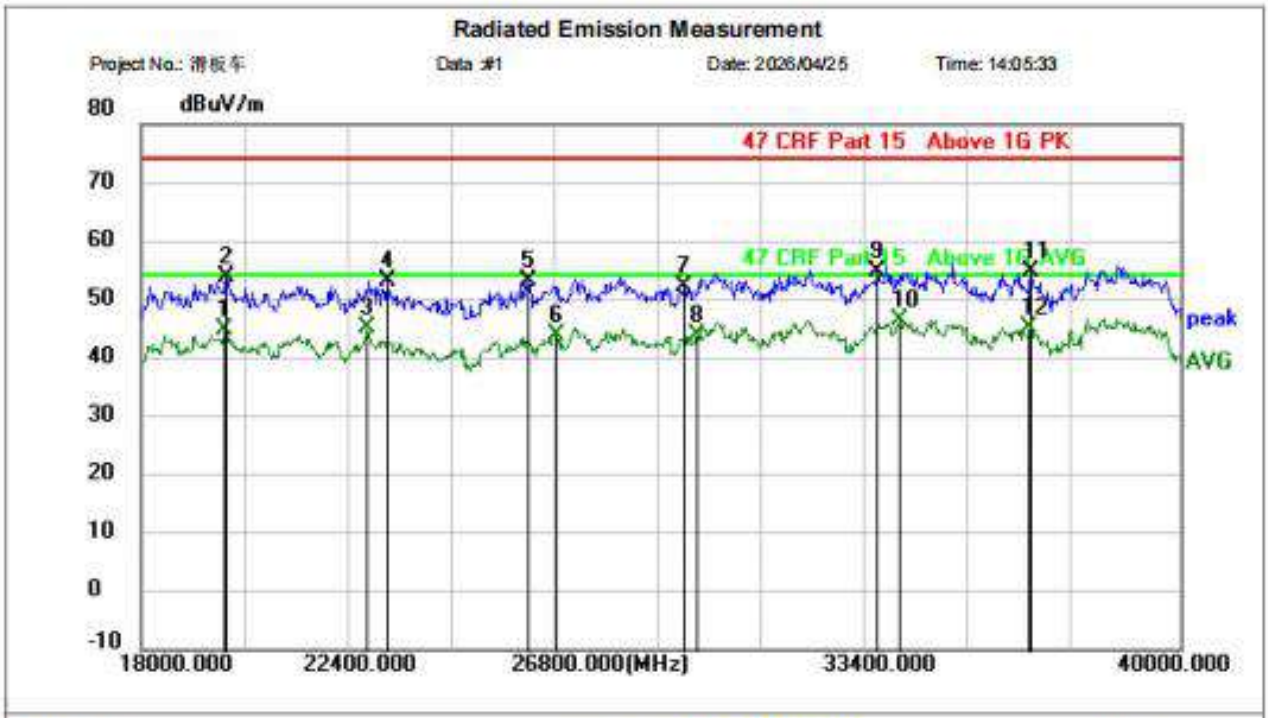


Site LAB
Limit: 47 CRF Part 15 Above 1G PK
EUT:
M/N: 2402
Mode: GFSK
Note:

Polarization: *Horizontal*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	1544.0000	51.03	-25.18	25.85	54.00	-28.15	AVG			P	
2	1608.6000	59.10	-25.28	33.82	74.00	-40.18	peak			P	
3	4513.9000	53.67	-17.74	35.93	54.00	-18.07	AVG			P	
4	4627.8000	61.84	-17.55	44.29	74.00	-29.71	peak			P	
5	6961.9000	59.62	-11.40	48.22	74.00	-25.78	peak			P	
6	7063.9000	53.28	-11.00	42.28	54.00	-11.72	AVG			P	
7	10049.1000	56.37	-4.23	52.14	74.00	-21.86	peak			P	
8	10084.8000	48.13	-4.07	44.06	54.00	-9.94	AVG			P	
9	12010.9000	54.39	-1.77	52.62	74.00	-21.38	peak			P	
10 *	12010.9000	46.70	-1.77	44.93	54.00	-9.07	AVG			P	
11	15118.5000	52.98	-0.70	52.28	74.00	-21.72	peak			P	
12	15125.3000	44.33	-0.70	43.63	54.00	-10.37	AVG			P	



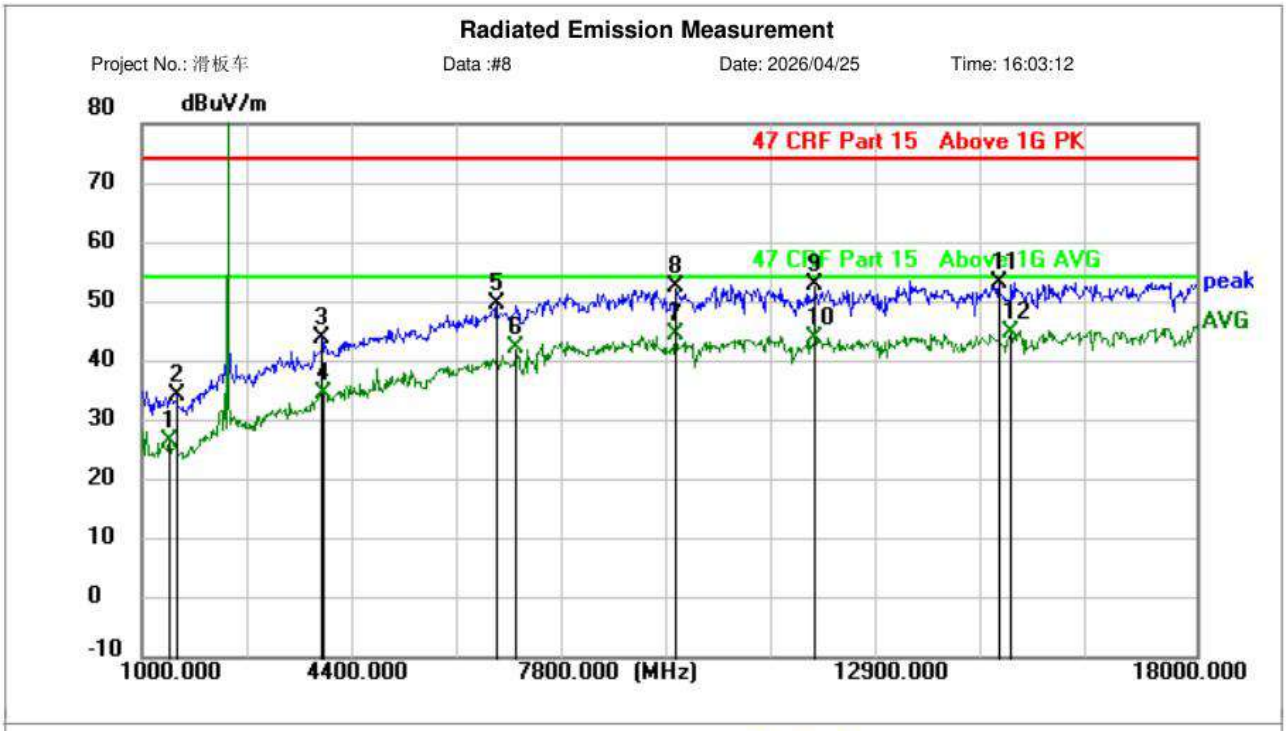
Site LAB
Limit: 47 CRF Part 15 Above 1G PK
EUT:
M/N: 2402
Mode: GFSK
Note:

Polarization: *Horizontal*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	19795.2000	44.13	0.65	44.78	54.00	-9.22	AVG			P	
2	19819.4000	53.25	0.65	53.90	74.00	-20.10	peak			P	
3	22815.8000	44.68	0.32	45.00	54.00	-9.00	AVG			P	
4	23255.8000	52.57	0.50	53.07	74.00	-20.93	peak			P	
5	26225.8000	52.12	1.12	53.24	74.00	-20.76	peak			P	
6	26764.8000	41.80	1.94	43.74	54.00	-10.26	AVG			P	
7	29490.6000	49.58	2.67	52.25	74.00	-21.75	peak			P	
8	29807.4000	41.28	2.66	43.94	54.00	-10.06	AVG			P	
9	33595.8000	53.53	1.31	54.84	74.00	-19.16	peak			P	
10 *	34046.8000	44.22	2.23	46.45	54.00	-7.55	AVG			P	
11	36823.2000	54.20	0.43	54.63	74.00	-19.37	peak			P	
12	36829.8000	44.77	0.42	45.19	54.00	-8.81	AVG			P	

TM1 / Polarization: Vertical / Band: 2400-2483.5 MHz / BW: 1

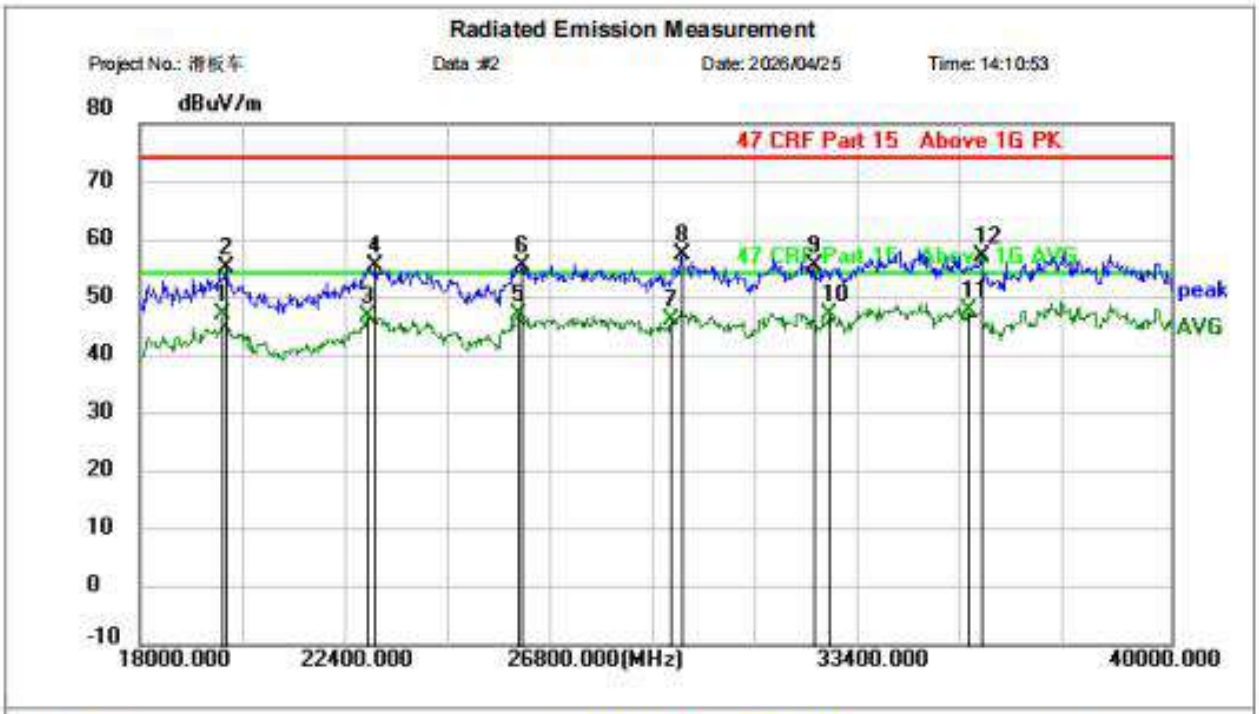


Site LAB
Limit: 47 CRF Part 15 Above 1G PK
EUT:
M/N: 2402
Mode: GFSK
Note:

Polarization: *Vertical*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	1443.7000	51.94	-25.31	26.63	54.00	-27.37	AVG			P	
2	1571.2000	59.41	-25.21	34.20	74.00	-39.80	peak			P	
3	3915.5000	62.81	-18.95	43.86	74.00	-30.14	peak			P	
4	3954.6000	53.68	-19.02	34.66	54.00	-19.34	AVG			P	
5	6723.9000	60.96	-11.47	49.49	74.00	-24.51	peak			P	
6	7031.6000	53.25	-11.12	42.13	54.00	-11.87	AVG			P	
7	9607.1000	49.41	-4.81	44.60	54.00	-9.40	AVG			P	
8	9608.8000	57.40	-4.81	52.59	74.00	-21.41	peak			P	
9	11859.6000	54.76	-1.89	52.87	74.00	-21.13	peak			P	
10	11859.6000	45.84	-1.89	43.95	54.00	-10.05	AVG			P	
11	14834.6000	54.06	-0.89	53.17	74.00	-20.83	peak			P	
12 *	14997.8000	45.25	-0.55	44.70	54.00	-9.30	AVG			P	



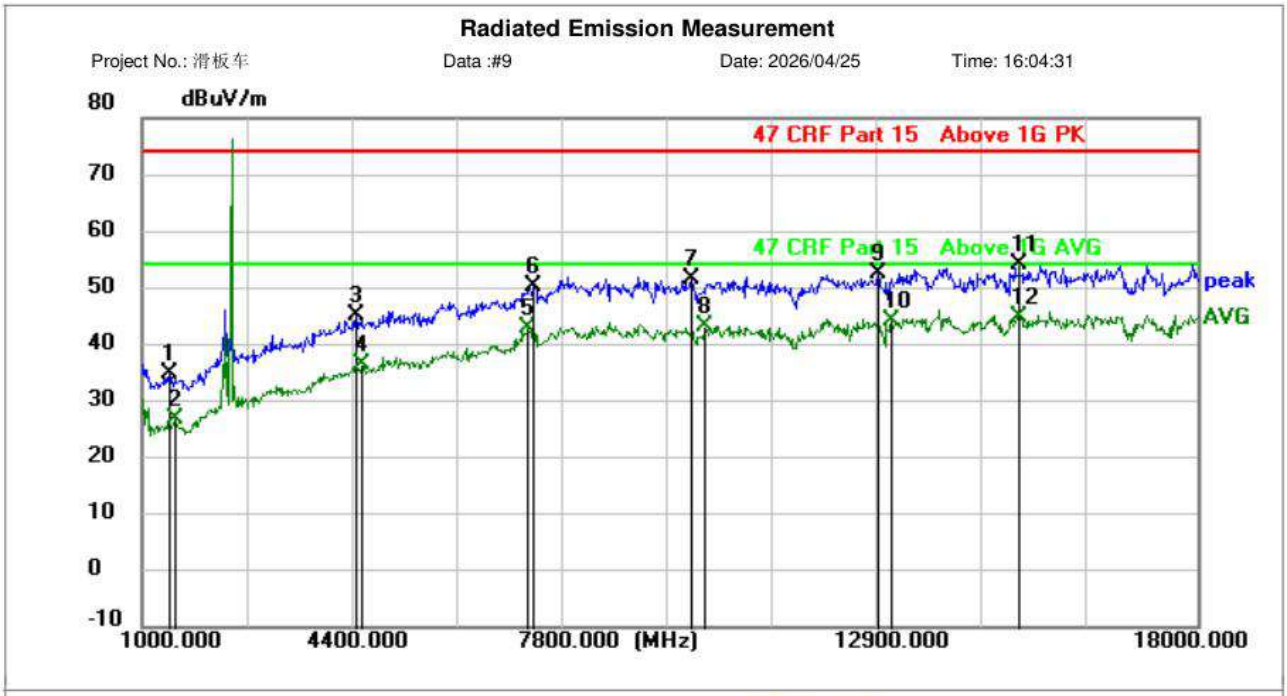
Site LAB
Limit: 47 CRF Part 15 Above 1G PK
EUT:
M/N: 2402
Mode: GFSK
Note:

Polarization: *Vertical*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	19799.6000	46.26	0.65	46.91	54.00	-7.09	AVG			P	
2	19854.6000	54.49	0.65	55.14	74.00	-18.86	peak			P	
3	22866.4000	46.33	0.37	46.70	54.00	-7.30	AVG			P	
4	23038.0000	54.76	0.50	55.26	74.00	-18.74	peak			P	
5	26082.8000	46.14	0.90	47.04	54.00	-6.96	AVG			P	
6	26142.2000	54.48	0.99	55.47	74.00	-18.53	peak			P	
7	29363.0000	43.51	2.67	46.18	54.00	-7.82	AVG			P	
8	29580.8000	54.62	2.66	57.28	74.00	-16.72	peak			P	
9	32401.2000	55.31	0.19	55.50	74.00	-18.50	peak			P	
10	32680.6000	47.04	0.08	47.12	54.00	-6.88	AVG			P	
11 *	35729.8000	46.23	1.41	47.64	54.00	-6.36	AVG			P	
12	35941.0000	56.09	1.08	57.17	74.00	-16.83	peak			P	

TM1 / Polarization: Horizontal / Band: 2400-2483.5 MHz / BW: 2

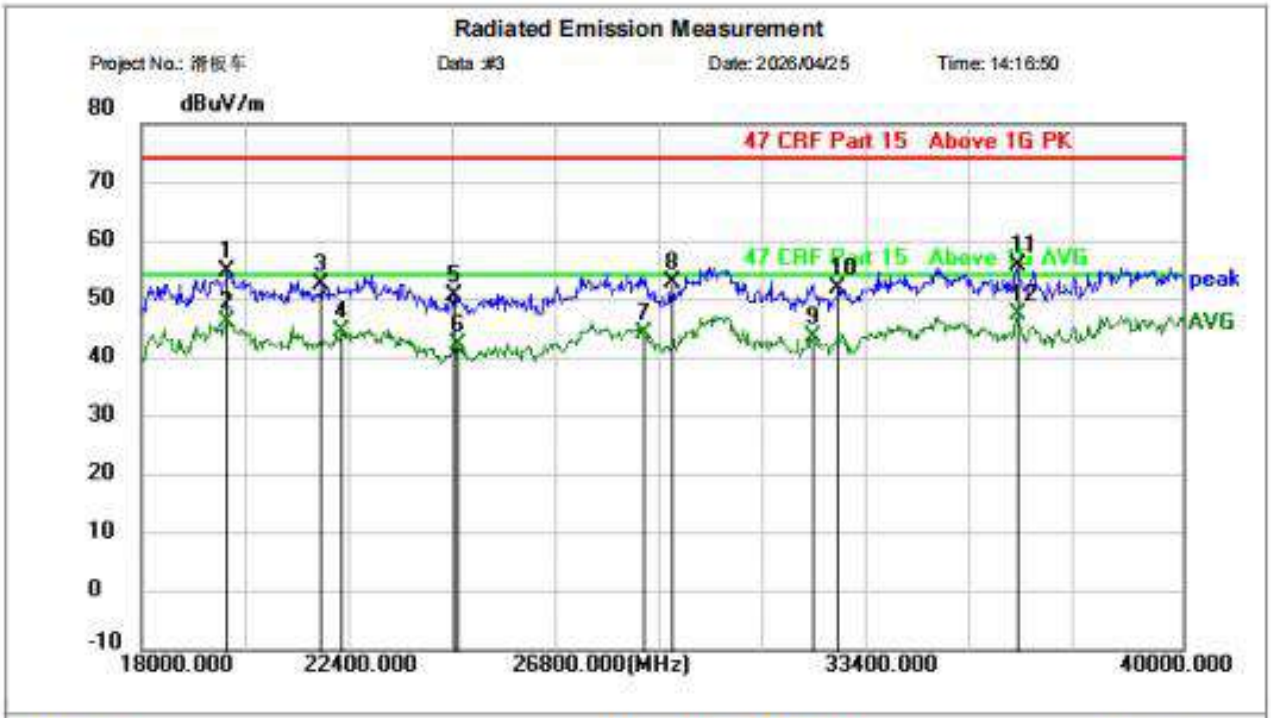


Site LAB
Limit: 47 CRF Part 15 Above 1G PK
EUT:
M/N: 2441
Mode: GFSK
Note:

Polarization: *Horizontal*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	1455.6000	60.02	-25.30	34.72	74.00	-39.28	peak			P	
2	1535.5000	52.02	-25.18	26.84	54.00	-27.16	AVG			P	
3	4452.7000	62.93	-17.78	45.15	74.00	-28.85	peak			P	
4	4546.2000	54.22	-17.72	36.50	54.00	-17.50	AVG			P	
5	7216.9000	53.14	-10.35	42.79	54.00	-11.21	AVG			P	
6	7318.9000	60.74	-10.36	50.38	74.00	-23.62	peak			P	
7	9850.2000	56.14	-4.72	51.42	74.00	-22.58	peak			P	
8	10093.3000	47.09	-4.03	43.06	54.00	-10.94	AVG			P	
9	12850.7000	55.23	-2.72	52.51	74.00	-21.49	peak			P	
10	13087.0000	47.22	-3.00	44.22	54.00	-9.78	AVG			P	
11	15138.9000	54.87	-0.70	54.17	74.00	-19.83	peak			P	
12 *	15138.9000	45.57	-0.70	44.87	54.00	-9.13	AVG			P	



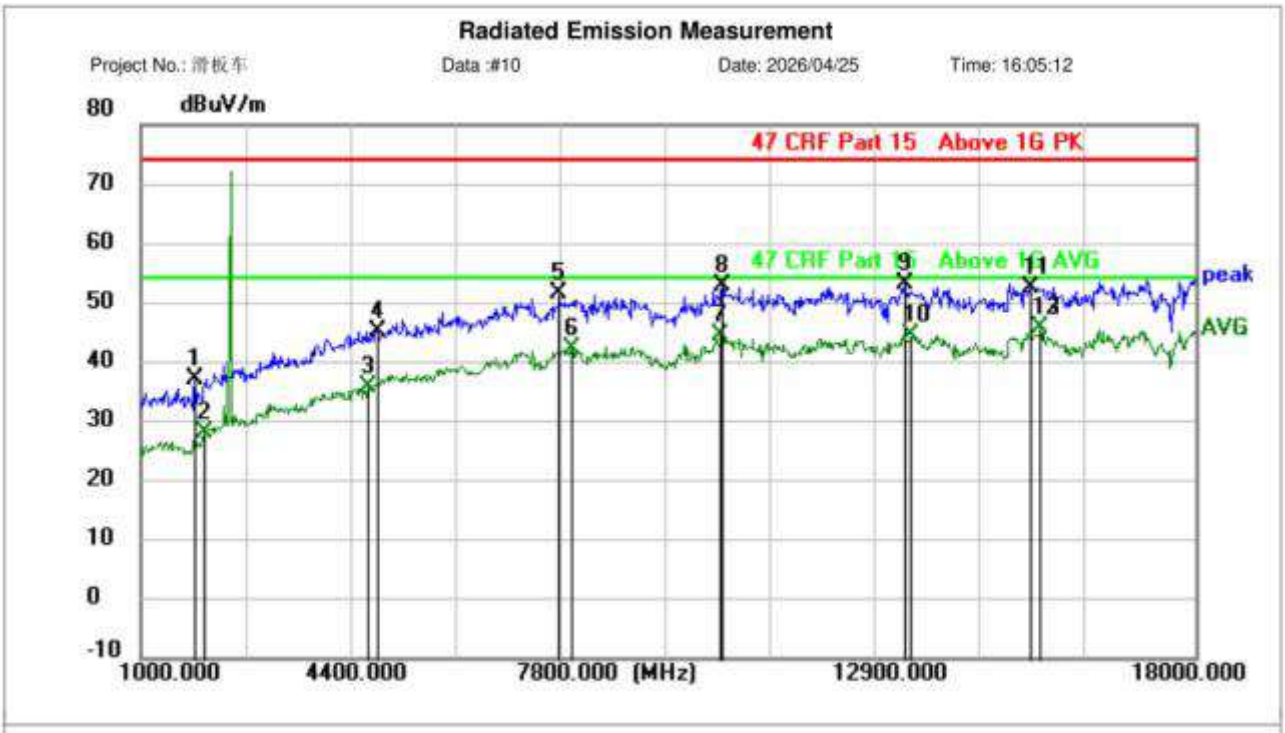
Site LAB
Limit: 47 CRF Part 15 Above 1G PK
EUT:
M/N: 2441
Mode: GFSK
Note:

Polarization: *Horizontal*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	19808.4000	54.03	0.64	54.67	74.00	-19.33	peak			P	
2	19832.6000	45.54	0.64	46.18	54.00	-7.82	AVG			P	
3	21819.2000	52.99	-0.45	52.54	74.00	-21.46	peak			P	
4	22246.0000	44.74	-0.20	44.54	54.00	-9.46	AVG			P	
5	24604.4000	50.16	0.43	50.59	74.00	-23.41	peak			P	
6	24729.8000	41.92	0.41	42.33	54.00	-11.67	AVG			P	
7	28621.6000	41.28	2.96	44.24	54.00	-9.76	AVG			P	
8	29239.8000	50.02	2.67	52.69	74.00	-21.31	peak			P	
9	32196.6000	43.16	0.27	43.43	54.00	-10.57	AVG			P	
10	32737.8000	51.82	0.05	51.87	74.00	-22.13	peak			P	
11	36506.4000	55.12	0.64	55.76	74.00	-18.24	peak			P	
12 *	36506.4000	46.58	0.64	47.22	54.00	-6.78	AVG			P	

TM1 / Polarization: Vertical / Band: 2400-2483.5 MHz / BW: 2



Site LAB
Limit: 47 CRF Part 15 Above 1G PK
EUT:
M/N: 2441
Mode: GFSK
Note:

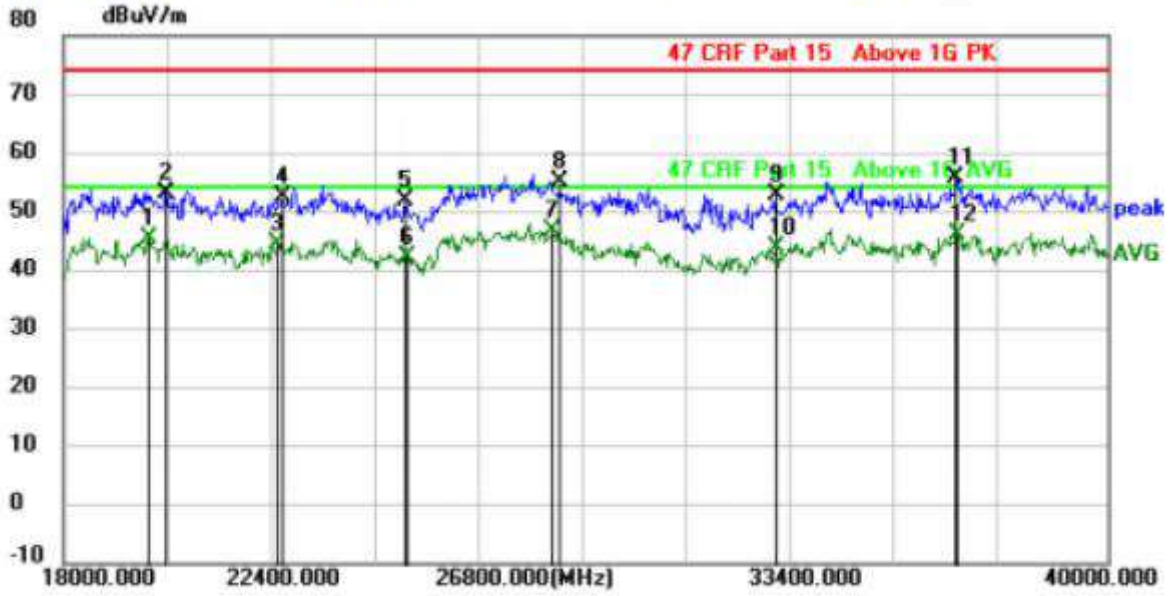
Polarization: *Vertical*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	1875.5000	61.93	-24.98	36.95	74.00	-37.05	peak			P	
2	2028.5000	52.05	-23.86	28.19	54.00	-25.81	AVG			P	
3	4665.2000	53.06	-17.40	35.66	54.00	-18.34	AVG			P	
4	4804.6000	62.12	-16.91	45.21	74.00	-28.79	peak			P	
5	7760.9000	61.74	-10.05	51.69	74.00	-22.31	peak			P	
6	7951.3000	51.54	-9.27	42.27	54.00	-11.73	AVG			P	
7	10363.6000	47.63	-3.27	44.36	54.00	-9.64	AVG			P	
8	10373.8000	55.99	-3.23	52.76	74.00	-21.24	peak			P	
9	13314.8000	55.82	-2.74	53.08	74.00	-20.92	peak			P	
10	13418.5000	47.17	-2.66	44.51	54.00	-9.49	AVG			P	
11	15332.7000	53.61	-0.96	52.65	74.00	-21.35	peak			P	
12 *	15494.2000	46.88	-1.23	45.65	54.00	-8.35	AVG			P	

Radiated Emission Measurement

Project No.: 滑板车 Data :#4 Date: 2026/04/25 Time: 14:20:39



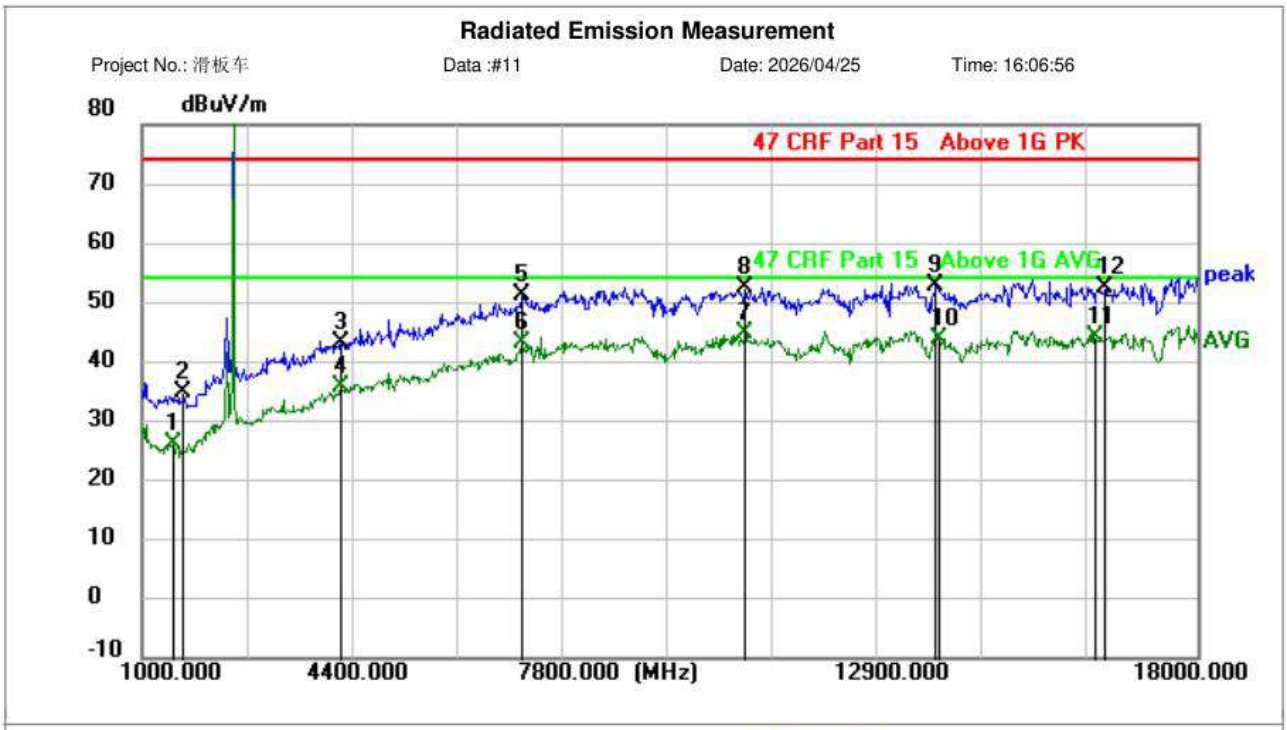
Site LAB
Limit: 47 CRF Part 15 Above 1G PK
EUT:
M/N: 2441
Mode: GFSK
Note:

Polarization: *Vertical*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	19848.0000	44.87	0.65	45.52	54.00	-8.48	AVG			P	
2	20178.0000	52.84	0.43	53.27	74.00	-20.73	peak			P	
3	22521.0000	44.30	0.05	44.35	54.00	-9.65	AVG			P	
4	22639.8000	52.42	0.16	52.58	74.00	-21.42	peak			P	
5	25211.6000	51.29	0.45	51.74	74.00	-22.26	peak			P	
6	25242.4000	41.86	0.47	42.33	54.00	-11.67	AVG			P	
7 *	28335.6000	43.51	3.19	46.70	54.00	-7.30	AVG			P	
8	28485.2000	52.16	3.08	55.24	74.00	-18.76	peak			P	
9	33012.8000	52.73	-0.03	52.70	74.00	-21.30	peak			P	
10	33045.8000	43.80	0.05	43.85	54.00	-10.15	AVG			P	
11	36799.0000	55.31	0.44	55.75	74.00	-18.25	peak			P	
12	36854.0000	45.70	0.39	46.09	54.00	-7.91	AVG			P	

TM1 / Polarization: Horizontal / Band: 2400-2483.5 MHz / BW: 1 / CH: H

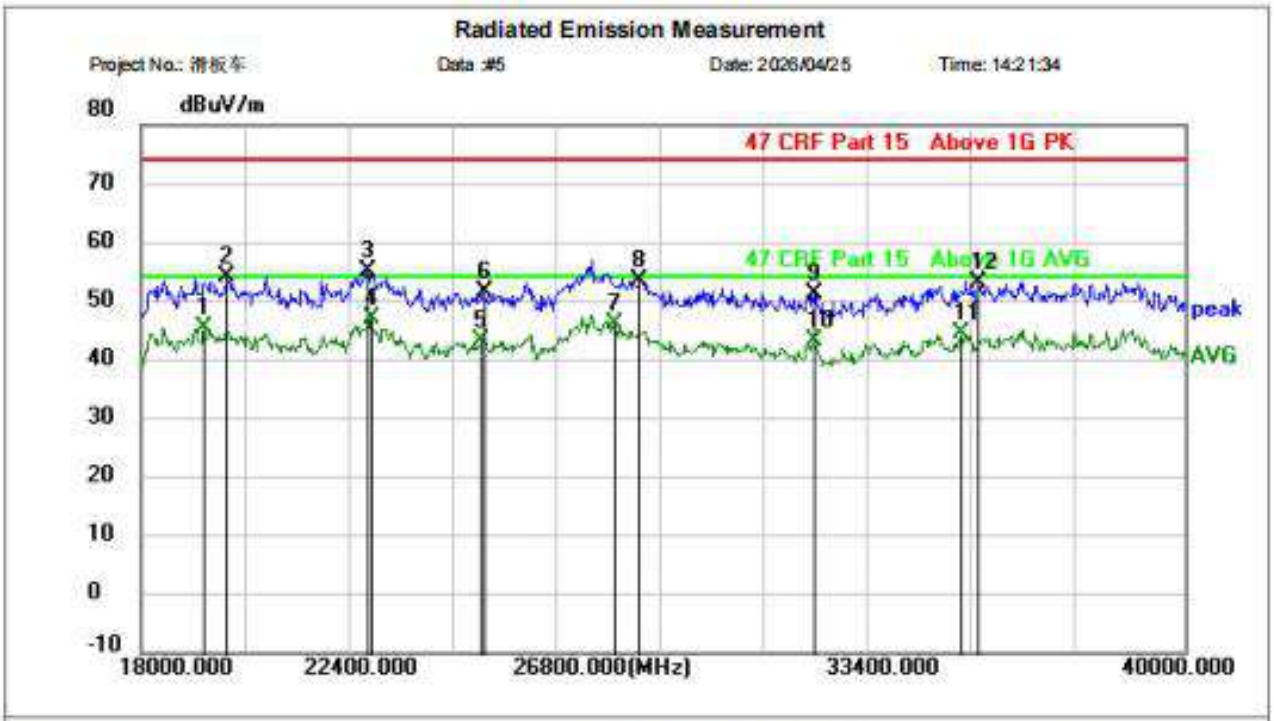


Site LAB
Limit: 47 CRF Part 15 Above 1G PK
EUT:
M/N: 2480
Mode: GFSK
Note:

Polarization: *Horizontal*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	1494.7000	51.50	-25.21	26.29	54.00	-27.71	AVG			P	
2	1659.6000	60.09	-25.36	34.73	74.00	-39.27	peak			P	
3	4197.7000	61.99	-18.77	43.22	74.00	-30.78	peak			P	
4	4209.6000	54.41	-18.74	35.67	54.00	-18.33	AVG			P	
5	7142.1000	61.86	-10.63	51.23	74.00	-22.77	peak			P	
6	7142.1000	53.77	-10.63	43.14	54.00	-10.86	AVG			P	
7 *	10712.1000	46.95	-2.11	44.84	54.00	-9.16	AVG			P	
8	10739.3000	54.45	-2.01	52.44	74.00	-21.56	peak			P	
9	13801.0000	55.71	-2.76	52.95	74.00	-21.05	peak			P	
10	13862.2000	46.64	-2.84	43.80	54.00	-10.20	AVG			P	
11	16362.9000	45.88	-1.57	44.31	54.00	-9.69	AVG			P	
12	16515.9000	54.06	-1.43	52.63	74.00	-21.37	peak			P	



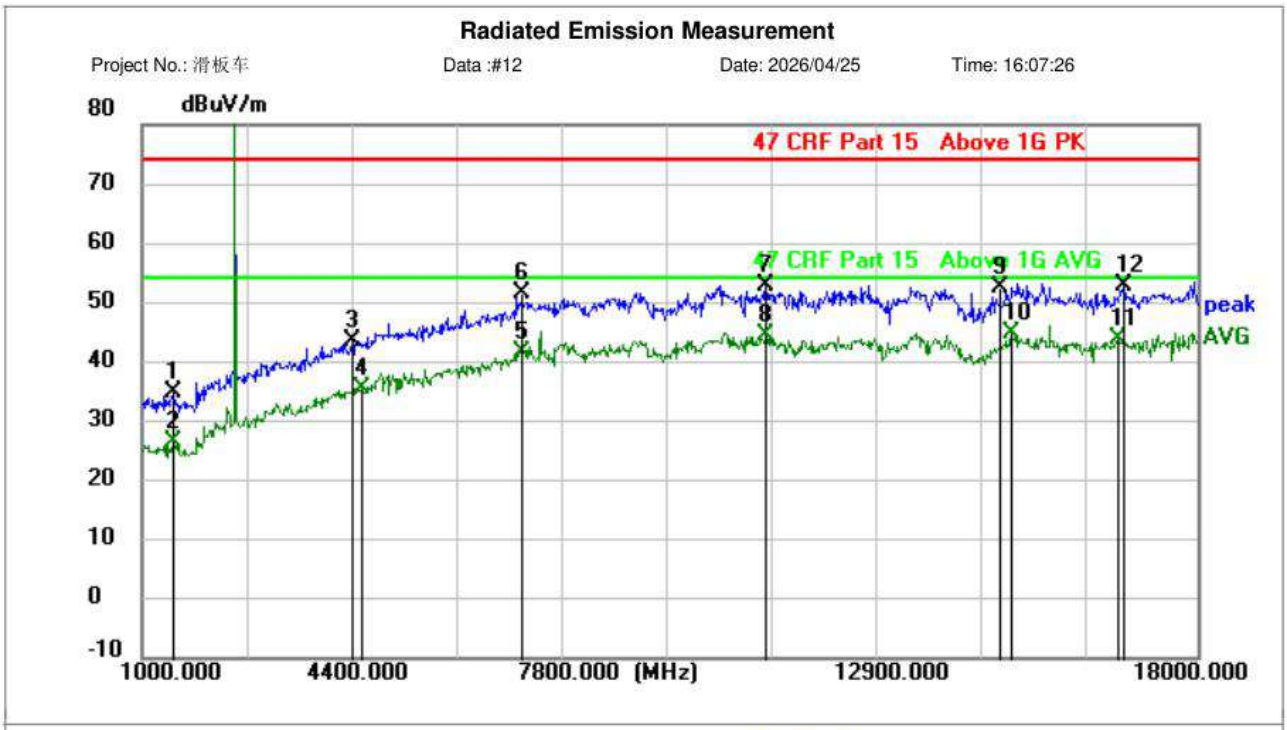
Site LAB
Limit: 47 CRF Part 15 Above 1G PK
EUT:
M/N: 2480
Mode: GFSK
Note:

Polarization: *Horizontal*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	19324.4000	44.65	0.66	45.31	54.00	-8.69	AVG			P	
2	19839.2000	53.48	0.66	54.14	74.00	-19.86	peak			P	
3	22785.0000	54.73	0.29	55.02	74.00	-18.98	peak			P	
4 *	22884.0000	46.59	0.38	46.97	54.00	-7.03	AVG			P	
5	25167.6000	42.77	0.43	43.20	54.00	-10.80	AVG			P	
6	25253.4000	50.98	0.47	51.45	74.00	-22.55	peak			P	
7	27979.2000	42.72	3.43	46.15	54.00	-7.85	AVG			P	
8	28535.8000	50.56	3.03	53.59	74.00	-20.41	peak			P	
9	32174.6000	50.90	0.28	51.18	74.00	-22.82	peak			P	
10	32192.2000	42.84	0.27	43.11	54.00	-10.89	AVG			P	
11	35329.4000	42.48	2.02	44.50	54.00	-9.50	AVG			P	
12	35677.0000	51.64	1.48	53.12	74.00	-20.88	peak			P	

TM1 / Polarization: Vertical / Band: 2400-2483.5 MHz / BW: 1 / CH: H

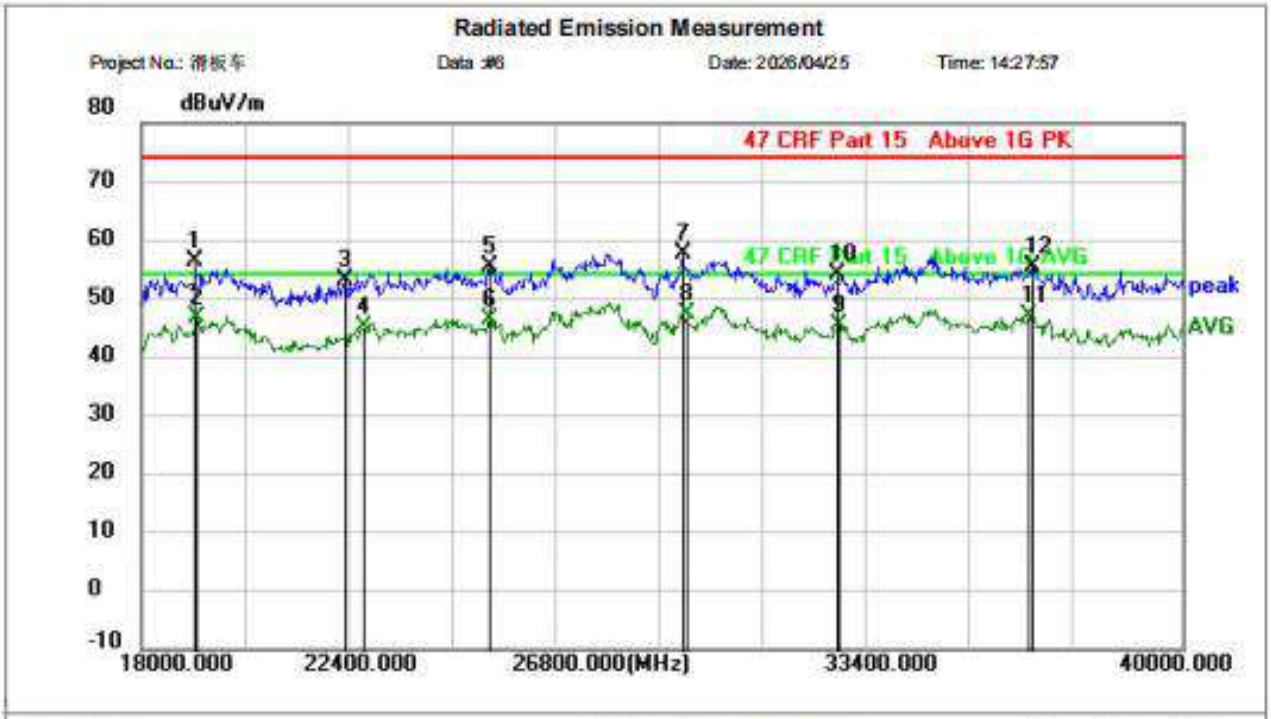


Site LAB
Limit: 47 CRF Part 15 Above 1G PK
EUT:
M/N: 2480
Mode: GFSK
Note:

Polarization: *Vertical*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	1499.8000	59.97	-25.20	34.77	74.00	-39.23	peak			P	
2	1499.8000	51.61	-25.20	26.41	54.00	-27.59	AVG			P	
3	4374.5000	61.53	-18.04	43.49	74.00	-30.51	peak			P	
4	4537.7000	53.36	-17.73	35.63	54.00	-18.37	AVG			P	
5	7113.2000	52.39	-10.77	41.62	54.00	-12.38	AVG			P	
6	7133.6000	62.32	-10.68	51.64	74.00	-22.36	peak			P	
7	11075.9000	54.04	-1.32	52.72	74.00	-21.28	peak			P	
8	11075.9000	45.72	-1.32	44.40	54.00	-9.60	AVG			P	
9	14855.0000	53.37	-0.85	52.52	74.00	-21.48	peak			P	
10 *	15004.6000	45.28	-0.56	44.72	54.00	-9.28	AVG			P	
11	16714.8000	45.19	-1.33	43.86	54.00	-10.14	AVG			P	
12	16804.9000	54.21	-1.28	52.93	74.00	-21.07	peak			P	



Site LAB
Limit: 47 CRF Part 15 Above 1G PK
EUT:
M/N: 2480
Mode: GFSK
Note:

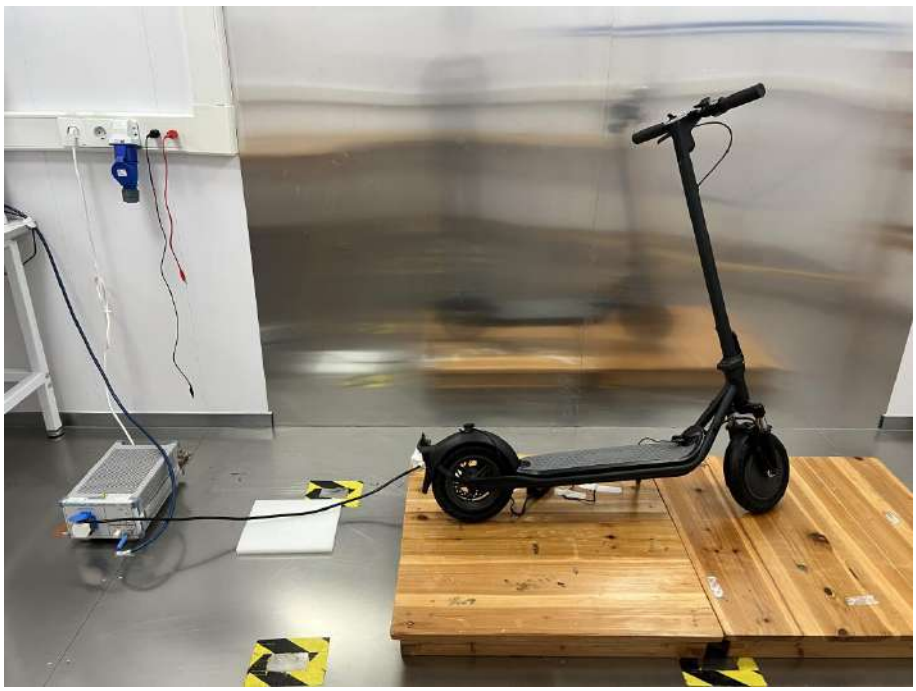
Polarization: *Vertical*
Power:
Distance: 3m

Temperature: 26 ℃
Humidity: 54 %RH

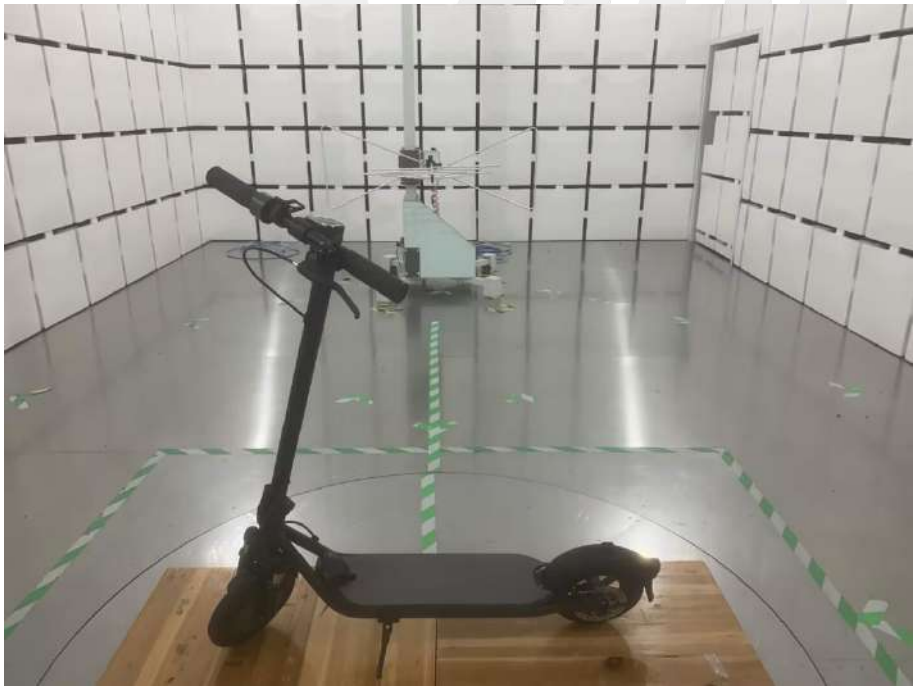
No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	19137.4000	55.58	0.65	56.23	74.00	-17.77	peak			P	
2	19177.0000	46.14	0.66	46.80	54.00	-7.20	AVG			P	
3	22296.6000	53.47	-0.16	53.31	74.00	-20.69	peak			P	
4	22721.2000	44.87	0.23	45.10	54.00	-8.90	AVG			P	
5	25330.4000	54.81	0.51	55.32	74.00	-18.68	peak			P	
6	25330.4000	45.84	0.51	46.35	54.00	-7.65	AVG			P	
7	29457.6000	55.03	2.66	57.69	74.00	-16.31	peak			P	
8 *	29547.8000	44.79	2.66	47.45	54.00	-6.55	AVG			P	
9	32726.8000	45.41	0.06	45.47	54.00	-8.53	AVG			P	
10	32737.8000	54.13	0.05	54.18	74.00	-19.82	peak			P	
11	36726.4000	46.44	0.50	46.94	54.00	-7.06	AVG			P	
12	36854.0000	55.00	0.39	55.39	74.00	-18.61	peak			P	

7. TEST SETUP PHOTOS

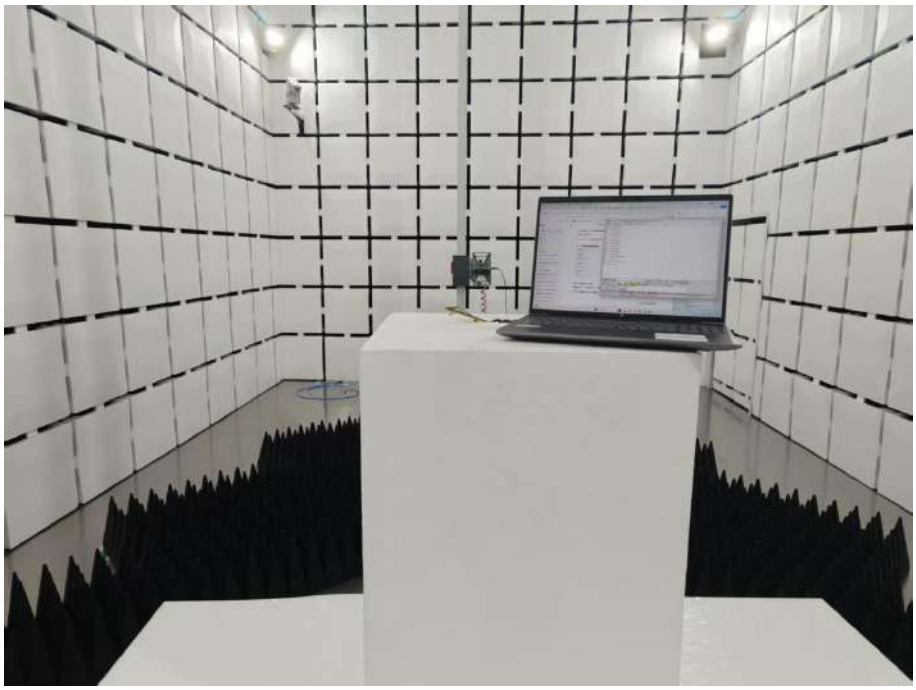
Conducted Emission at AC power line



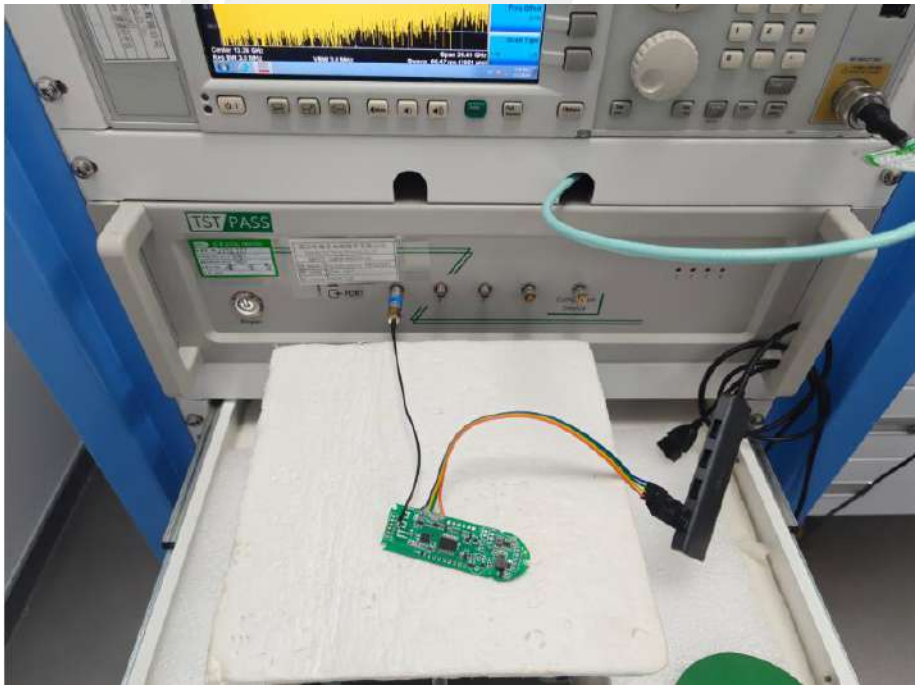
Emissions in frequency bands (below 1GHz)



Emissions in frequency bands (above 1GHz)



RF conducted test



8. Appendix Report

1. Duty Cycle

1.1 Test Result

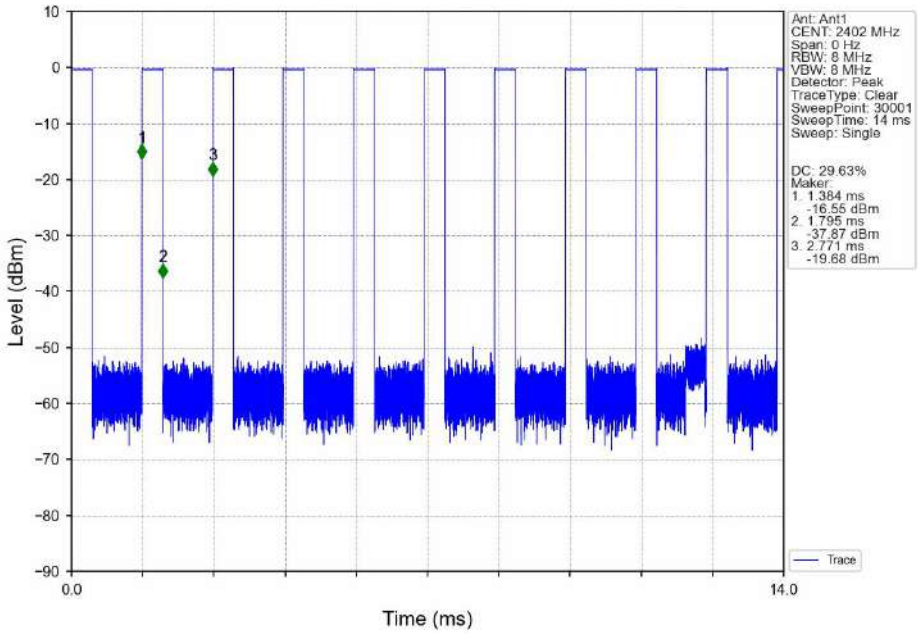
1.1.1 Ant1

Ant1							
Mode	TX Type	Frequency (MHz)	T_on (ms)	Period (ms)	Duty Cycle (%)	Duty Cycle Correction Factor (dB)	Max. DC Variation (%)
1M	SISO	2402	0.411	1.387	29.63	5.28	0.03
		2440	0.412	1.387	29.70	5.27	0.03
		2480	0.412	1.388	29.68	5.27	0.02
2M	SISO	2402	0.219	0.763	28.70	5.42	0.07
		2440	0.220	0.763	28.83	5.40	0.03
		2480	0.220	0.763	28.83	5.40	0.01

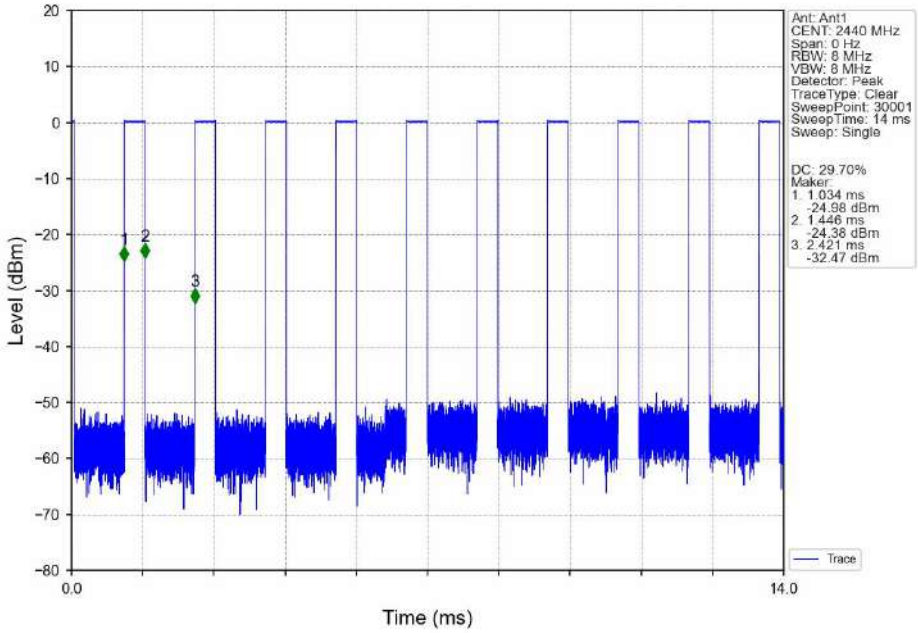
1.2 Test Graph

1.2.1 Ant1

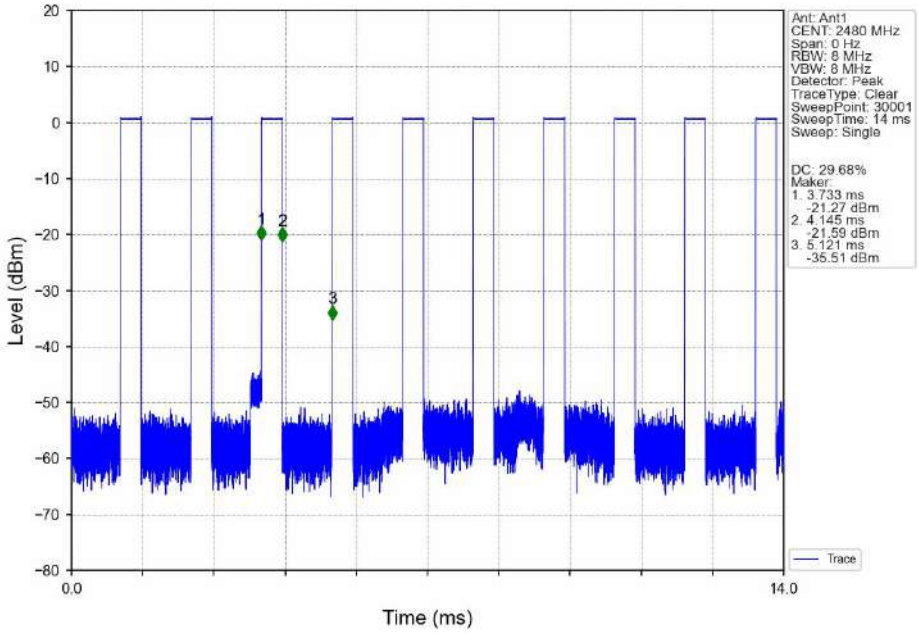
1M_LCH_2402MHz_Ant1_NTNV



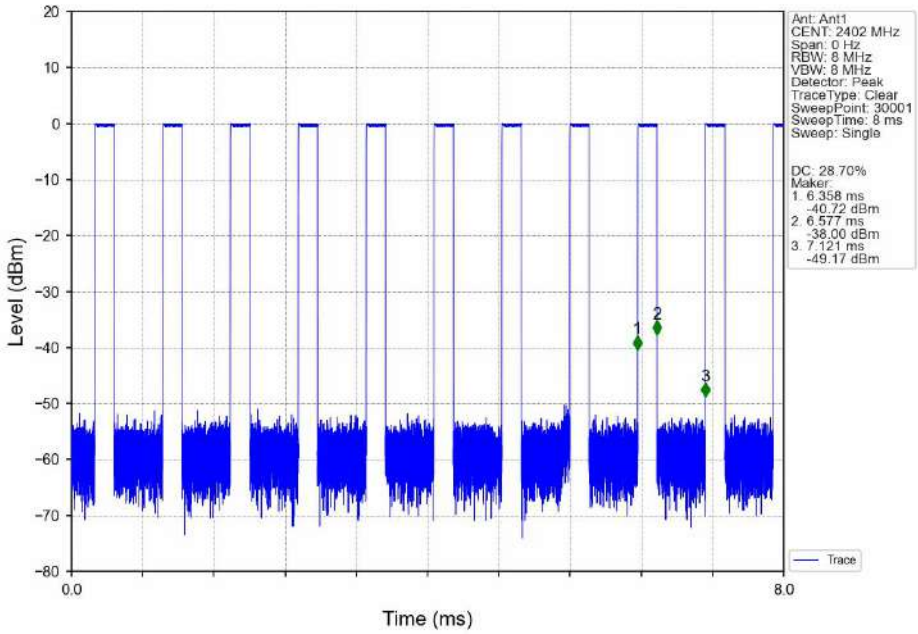
1M_MCH_2440MHz_Ant1_NTNV



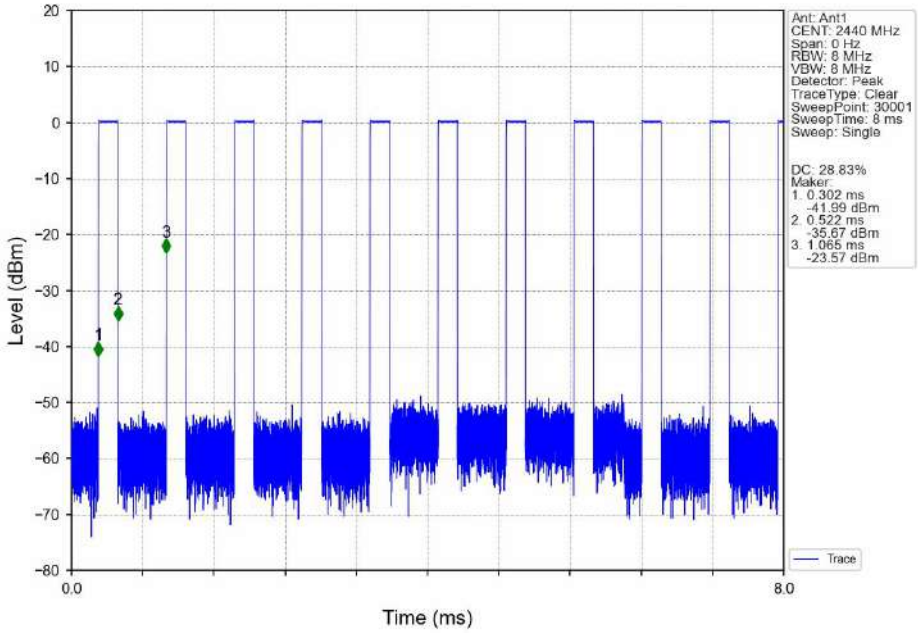
1M_HCH_2480MHz_Ant1_NTNV



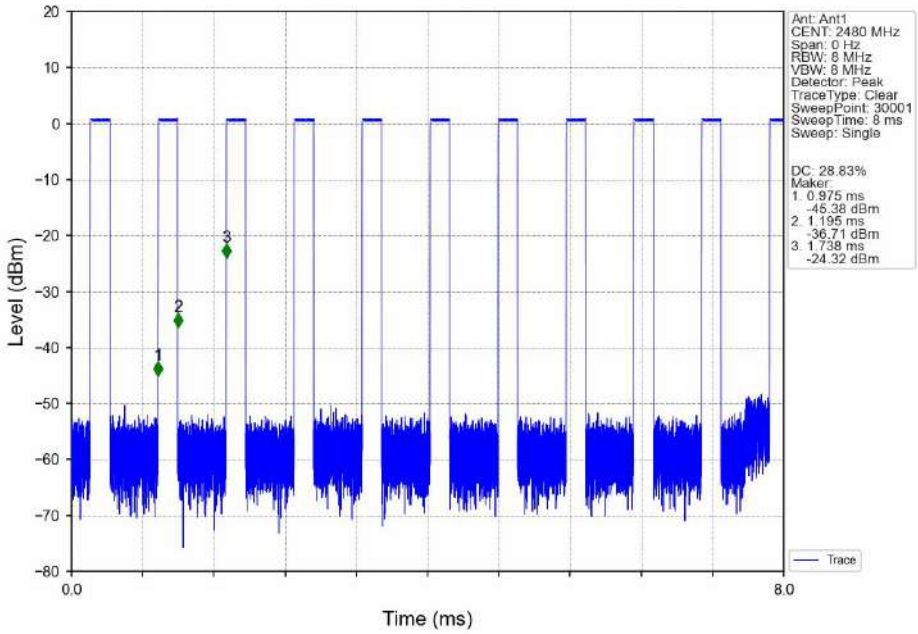
2M_LCH_2402MHz_Ant1_NTNV



2M_MCH_2440MHz_Ant1_NTNV



2M_HCH_2480MHz_Ant1_NTNV



2. Bandwidth

2.1 Test Result

2.1.1 OBW

Mode	TX Type	Frequency (MHz)	ANT	99% Occupied Bandwidth (MHz)		Verdict
				Result	Limit	
1M	SISO	2402	1	1.100	/	Pass
		2440	1	1.110	/	Pass
		2480	1	1.124	/	Pass
2M	SISO	2402	1	2.995	/	Pass
		2440	1	3.113	/	Pass
		2480	1	3.243	/	Pass

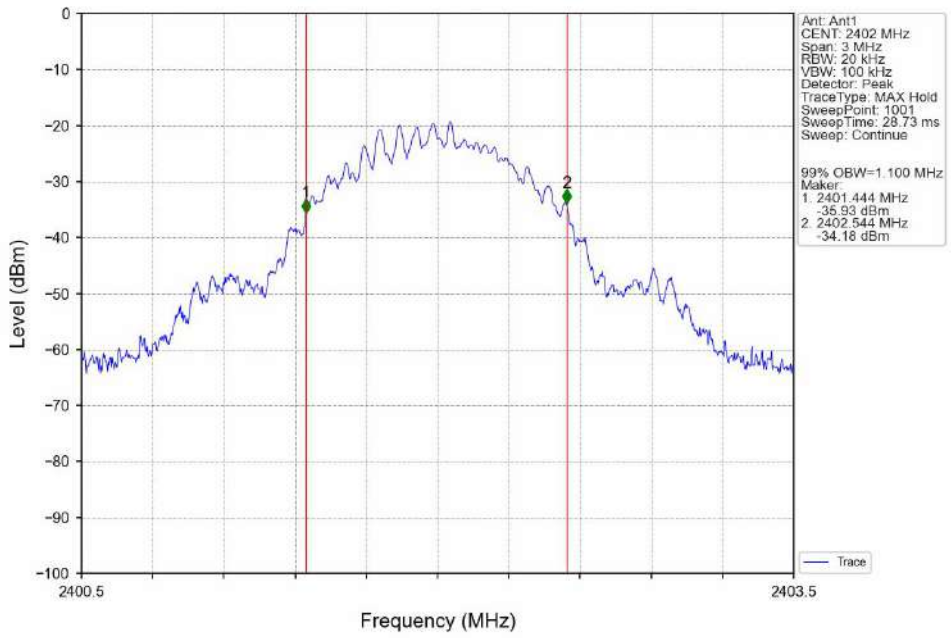
2.1.2 6dB BW

Mode	TX Type	Frequency (MHz)	ANT	6dB Bandwidth (MHz)		Verdict
				Result	Limit	
1M	SISO	2402	1	0.689	>=0.5	Pass
		2440	1	0.666	>=0.5	Pass
		2480	1	0.678	>=0.5	Pass
2M	SISO	2402	1	1.368	>=0.5	Pass
		2440	1	1.498	>=0.5	Pass
		2480	1	1.589	>=0.5	Pass

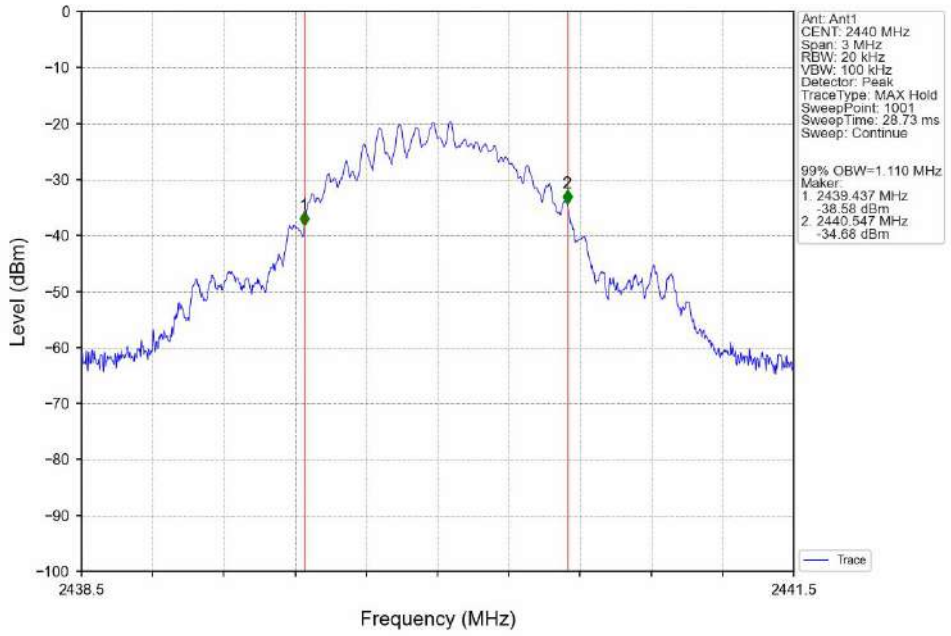
2.2 Test Graph

2.2.1 OBW

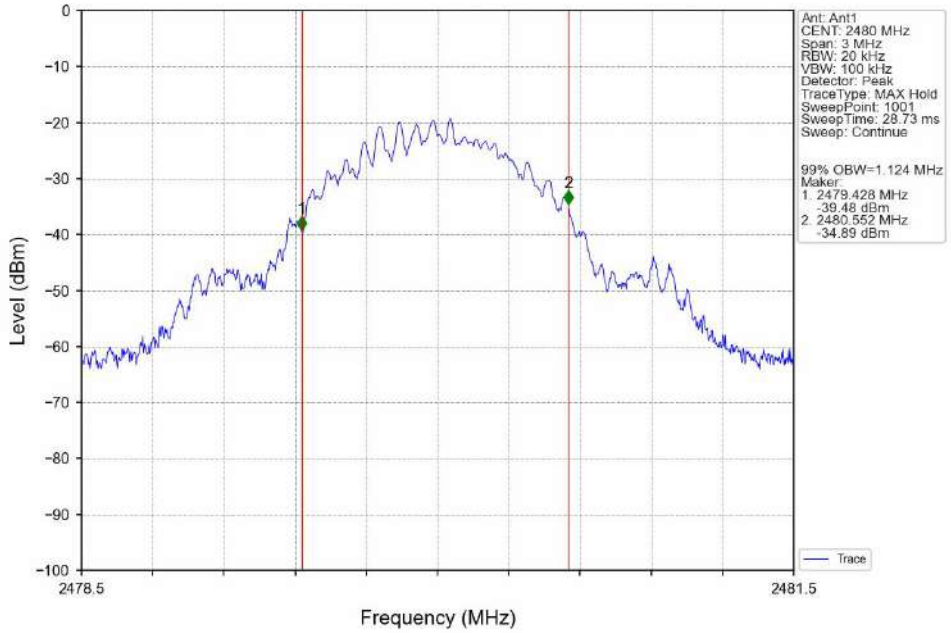
1M_LCH_2402MHz_Ant1_NTNV



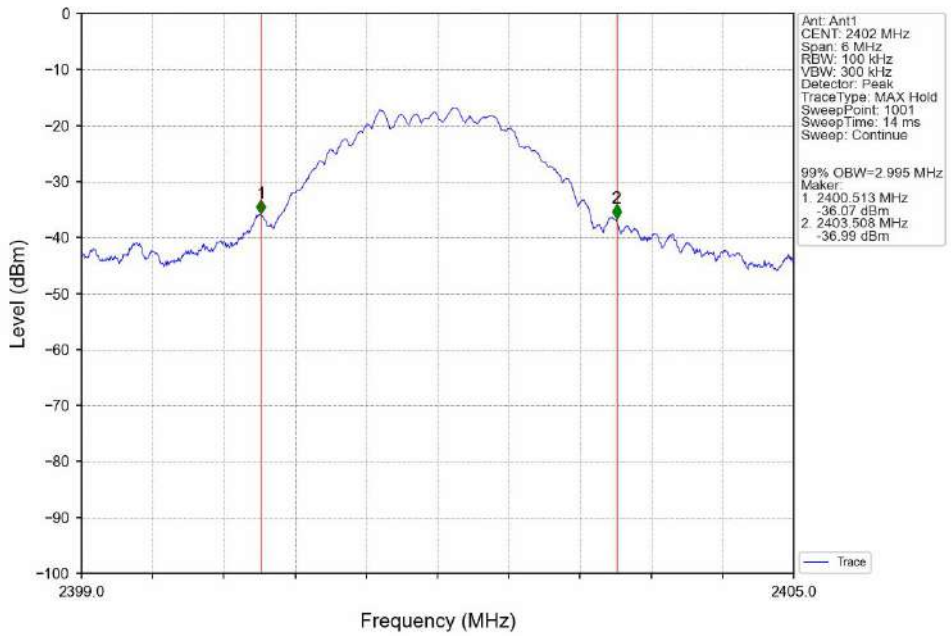
1M_MCH_2440MHz_Ant1_NTNV



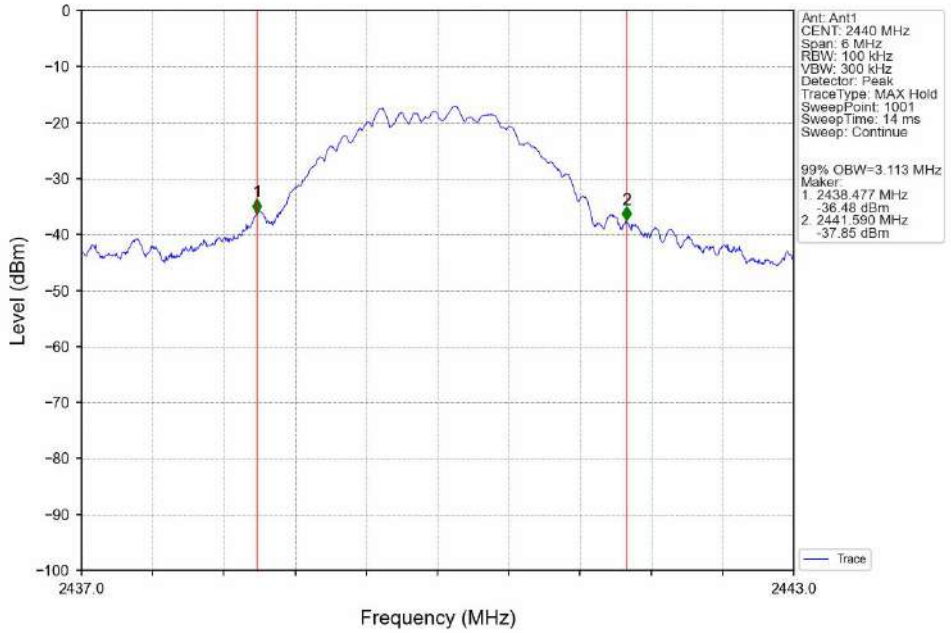
1M_HCH_2480MHz_Ant1_NTNV



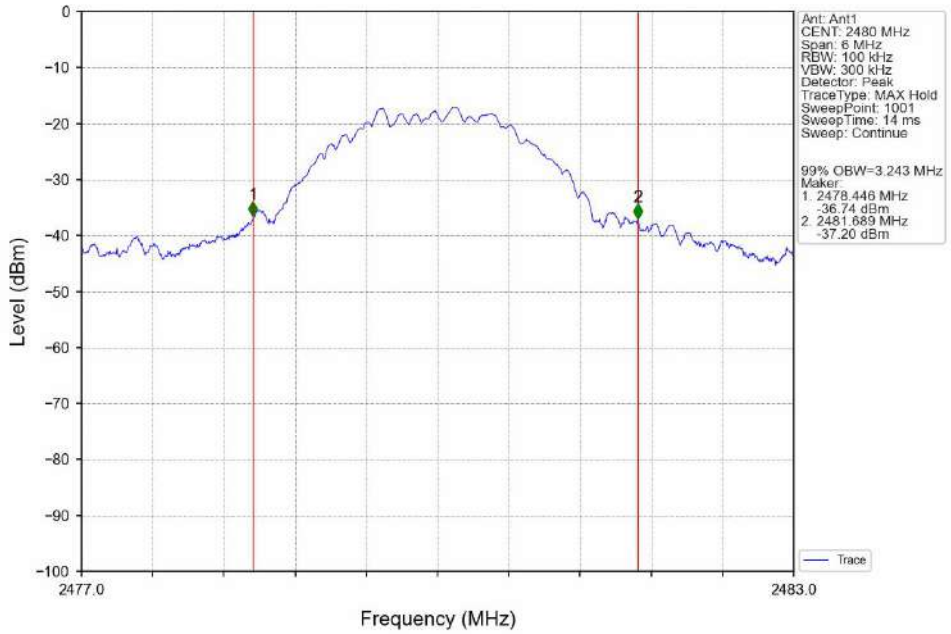
2M_LCH_2402MHz_Ant1_NTNV



2M_MCH_2440MHz_Ant1_NTNV

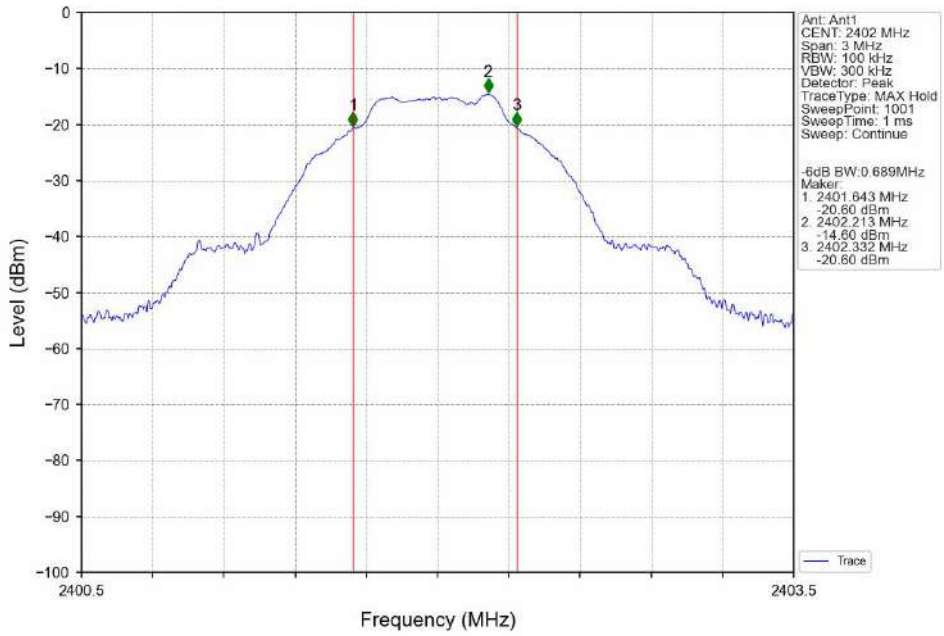


2M_HCH_2480MHz_Ant1_NTNV

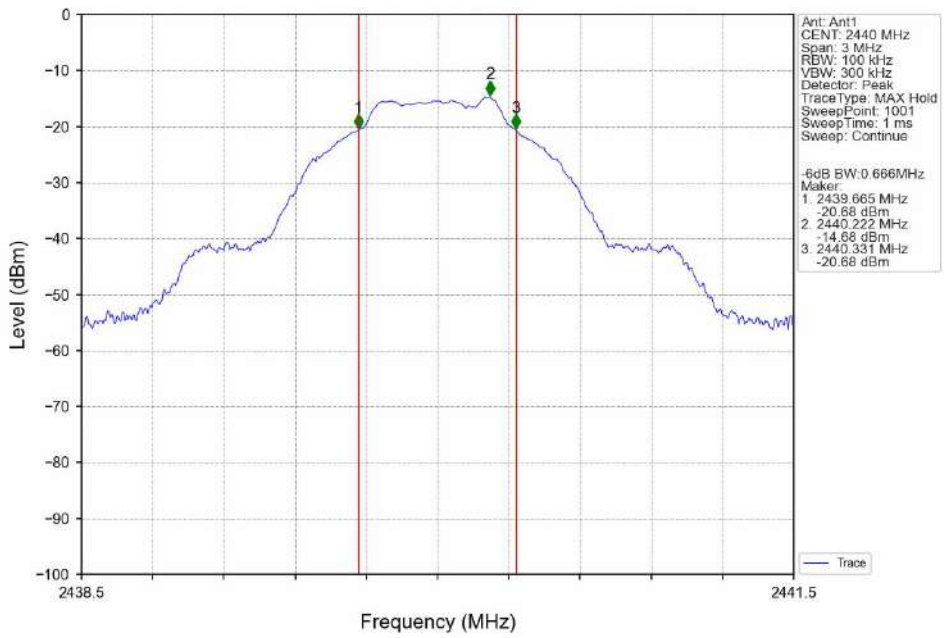


2.2.2 6dB BW

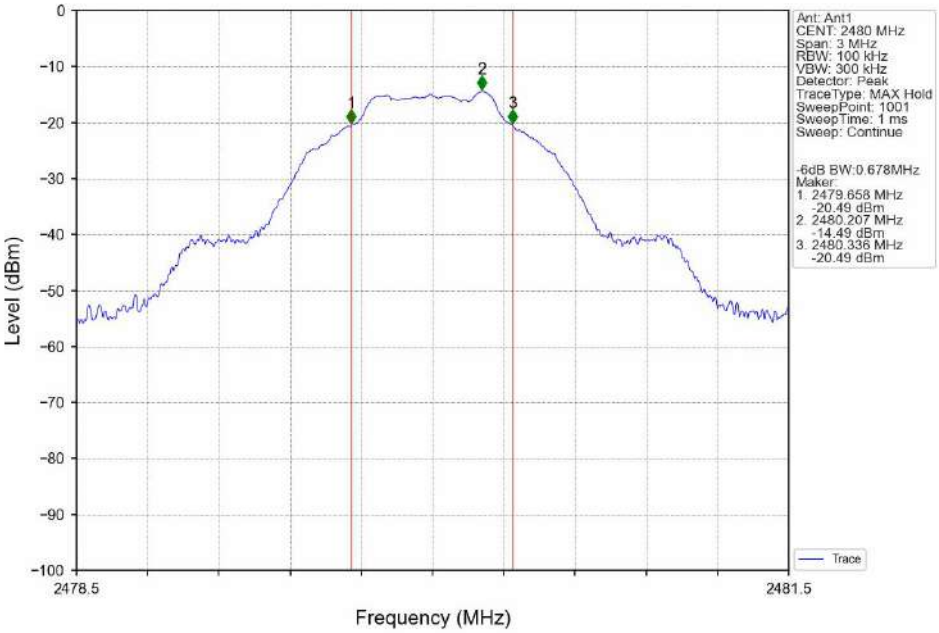
1M_LCH_2402MHz_Ant1_NTNV



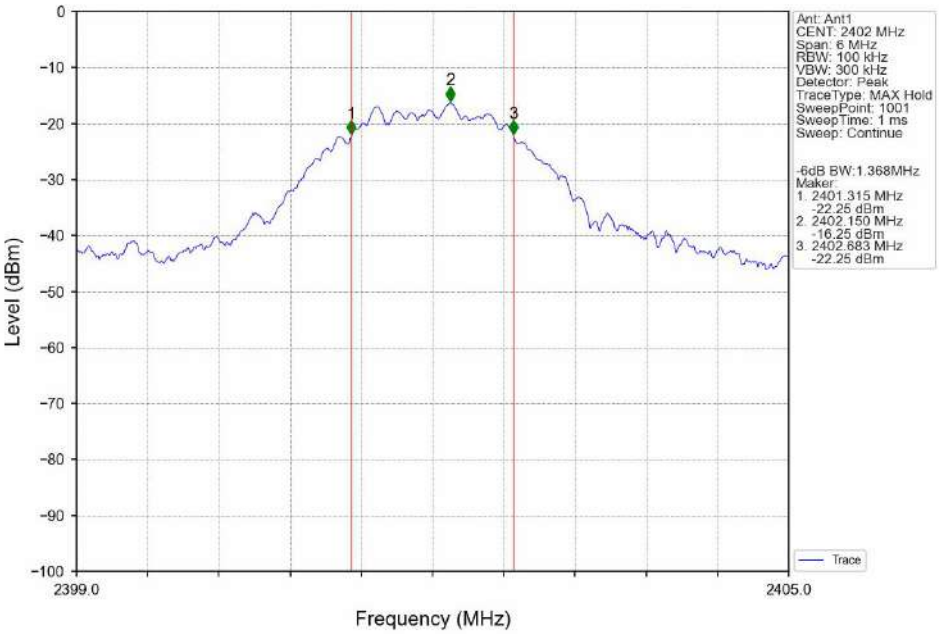
1M_MCH_2440MHz_Ant1_NTNV



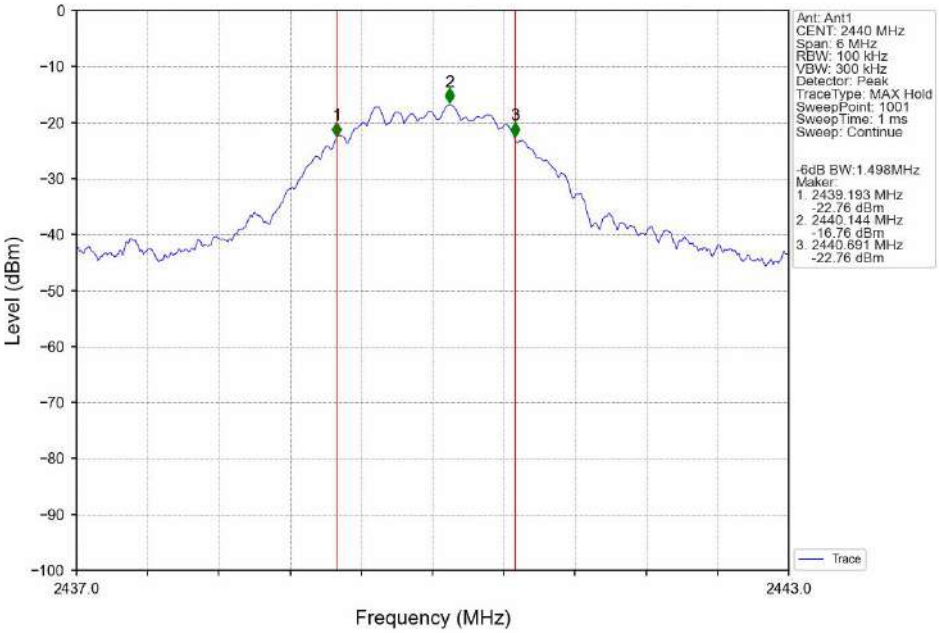
1M_HCH_2480MHz_Ant1_NTNV



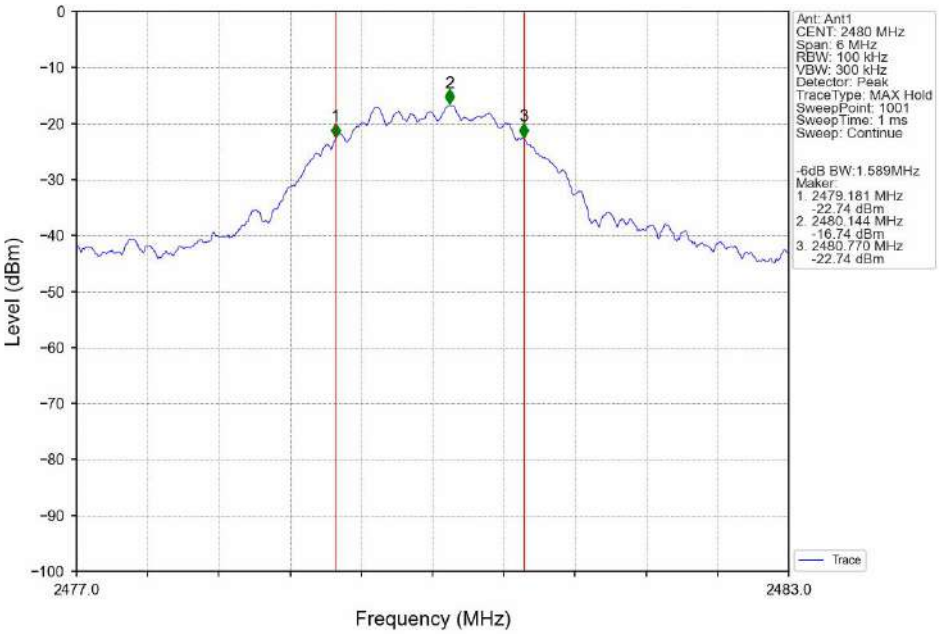
2M_LCH_2402MHz_Ant1_NTNV



2M_MCH_2440MHz_Ant1_NTNV



2M_HCH_2480MHz_Ant1_NTNV



3. Maximum Conducted Output Power

3.1 Test Result

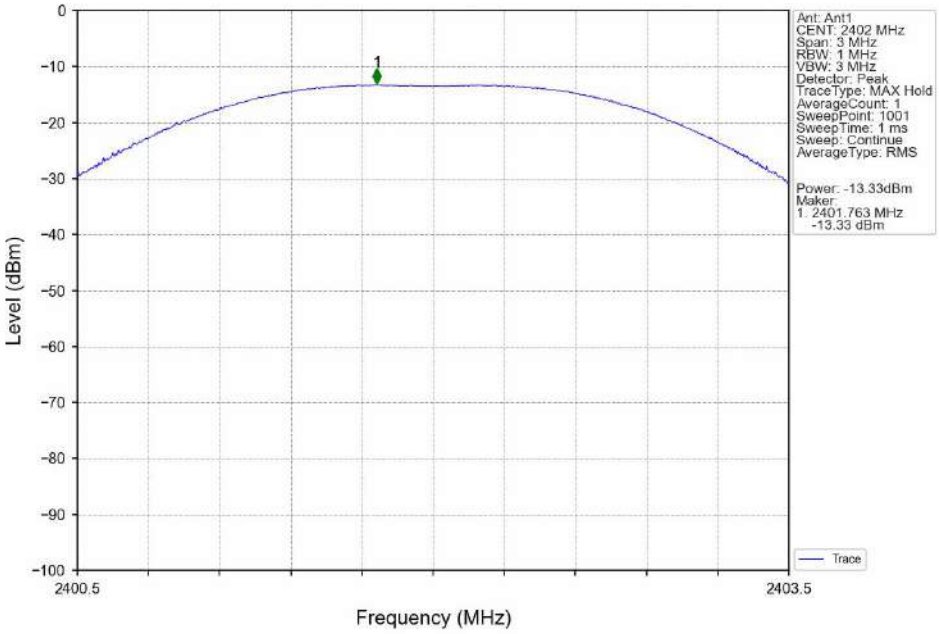
3.1.1 Power

Mode	TX Type	Frequency (MHz)	Maximum Peak Conducted Output Power (dBm)		Verdict
			ANT1	Limit	
1M	SISO	2402	-13.33	<=30	Pass
		2440	-13.52	<=30	Pass
		2480	-13.28	<=30	Pass
2M	SISO	2402	-13.40	<=30	Pass
		2440	-13.52	<=30	Pass
		2480	-13.15	<=30	Pass
Note1: Antenna Gain: Ant1: 1.70dBi;					

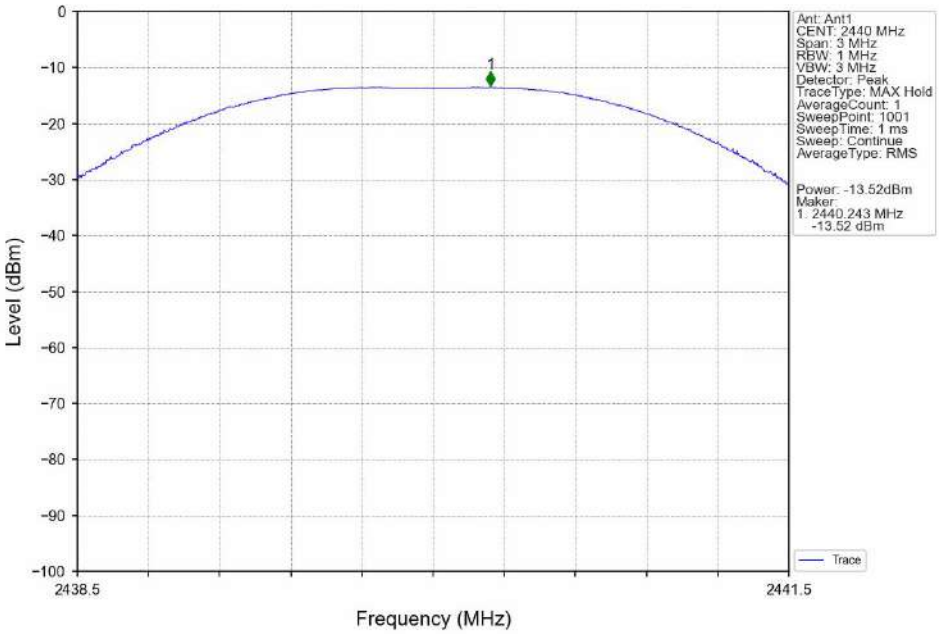
3.2 Test Graph

3.2.1 Power

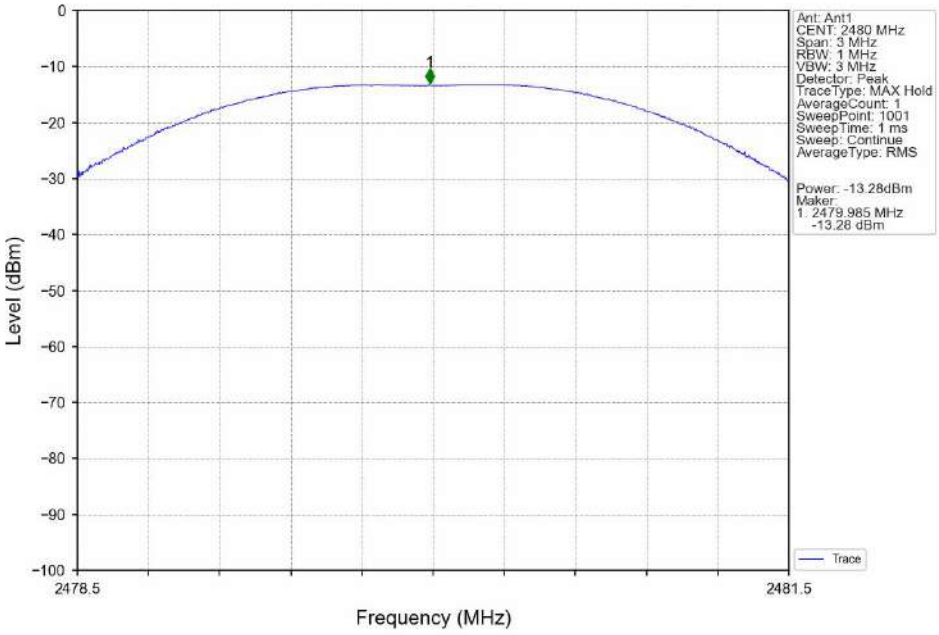
1M_LCH_2402MHz_Ant1_NTNV



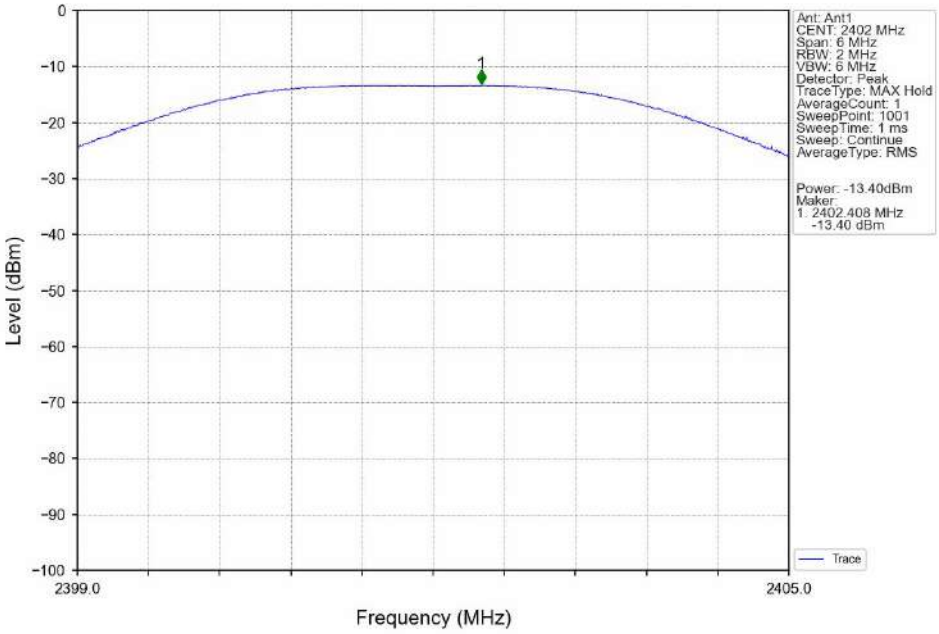
1M_MCH_2440MHz_Ant1_NTNV



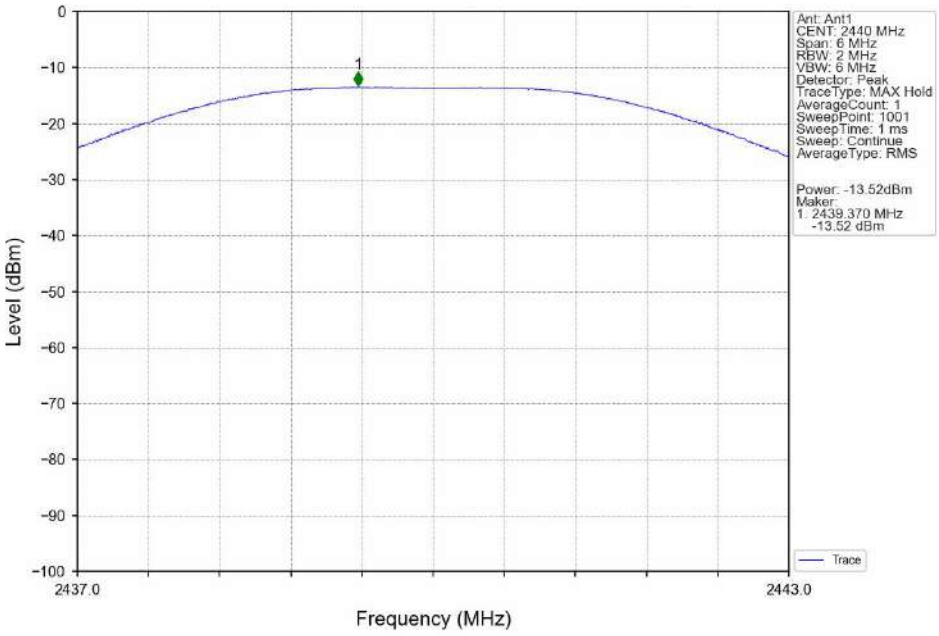
1M_HCH_2480MHz_Ant1_NTNV



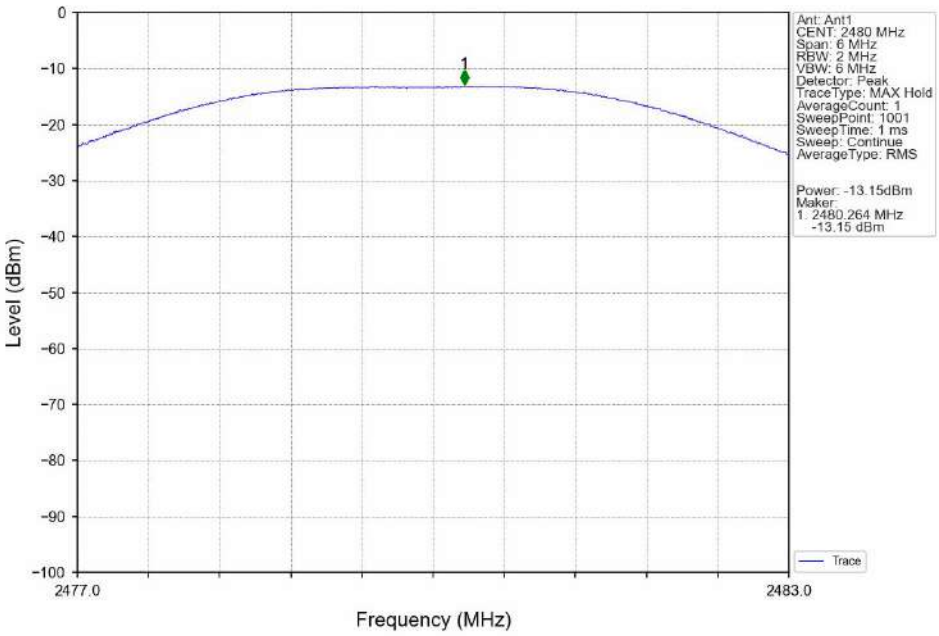
2M_LCH_2402MHz_Ant1_NTNV



2M_MCH_2440MHz_Ant1_NTNV



2M_HCH_2480MHz_Ant1_NTNV



4. Maximum Power Spectral Density

4.1 Test Result

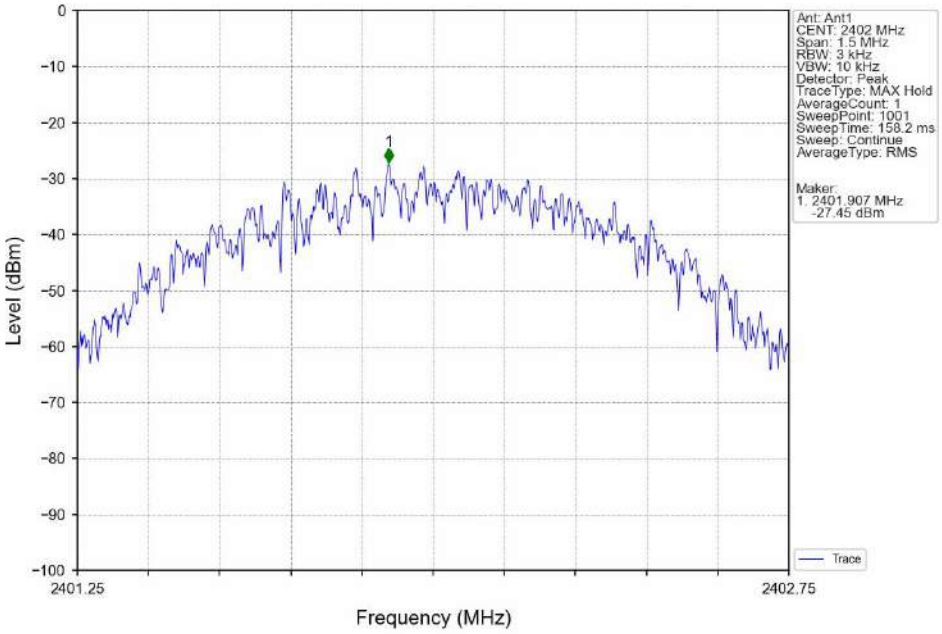
4.1.1 PSD

Mode	TX Type	Frequency (MHz)	Maximum PSD (dBm)		Verdict
			ANT1	Limit	
1M	SISO	2402	-27.45	<=8	Pass
		2440	-27.72	<=8	Pass
		2480	-27.40	<=8	Pass
2M	SISO	2402	-31.23	<=8	Pass
		2440	-31.44	<=8	Pass
		2480	-31.30	<=8	Pass
Note1: Antenna Gain: Ant1: 1.70dBi;					

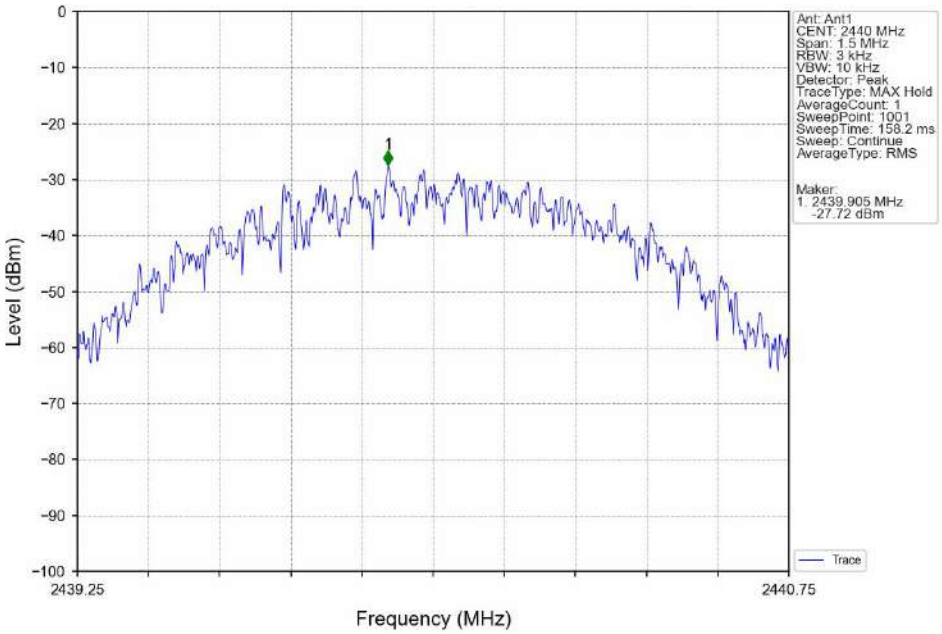
4.2 Test Graph

4.2.1 PSD

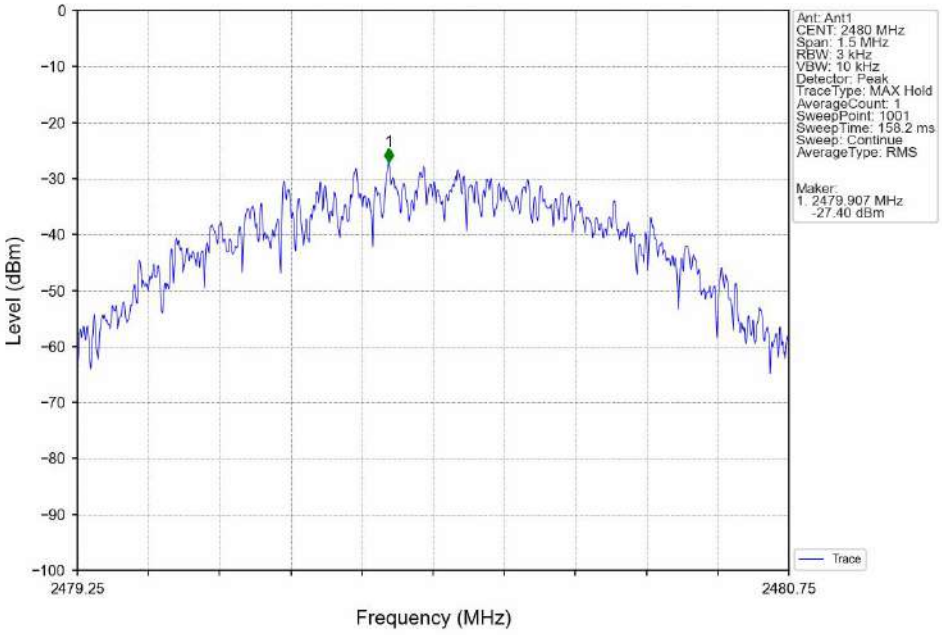
1M_LCH_2402MHz_Ant1_NTNV



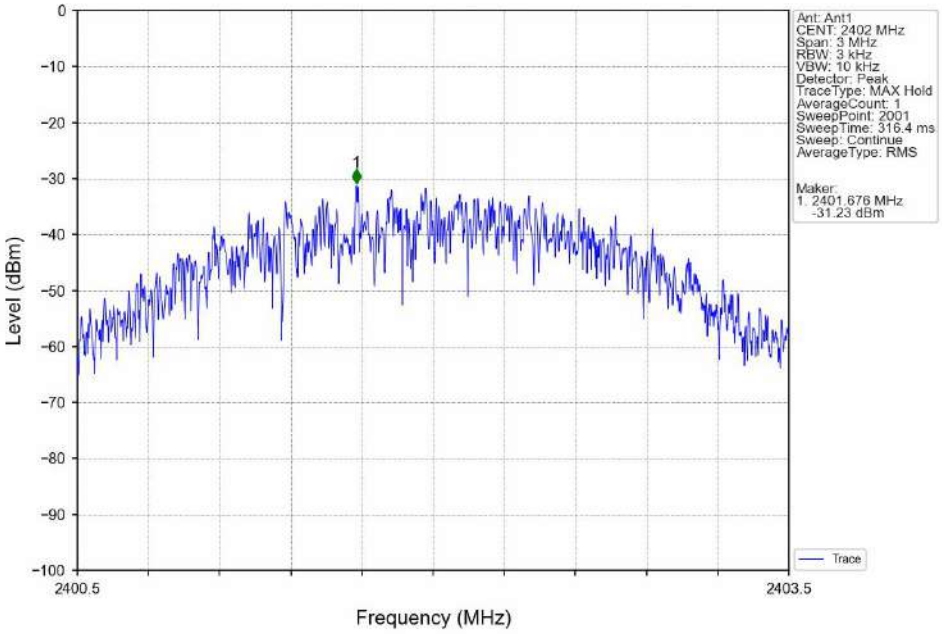
1M_MCH_2440MHz_Ant1_NTNV



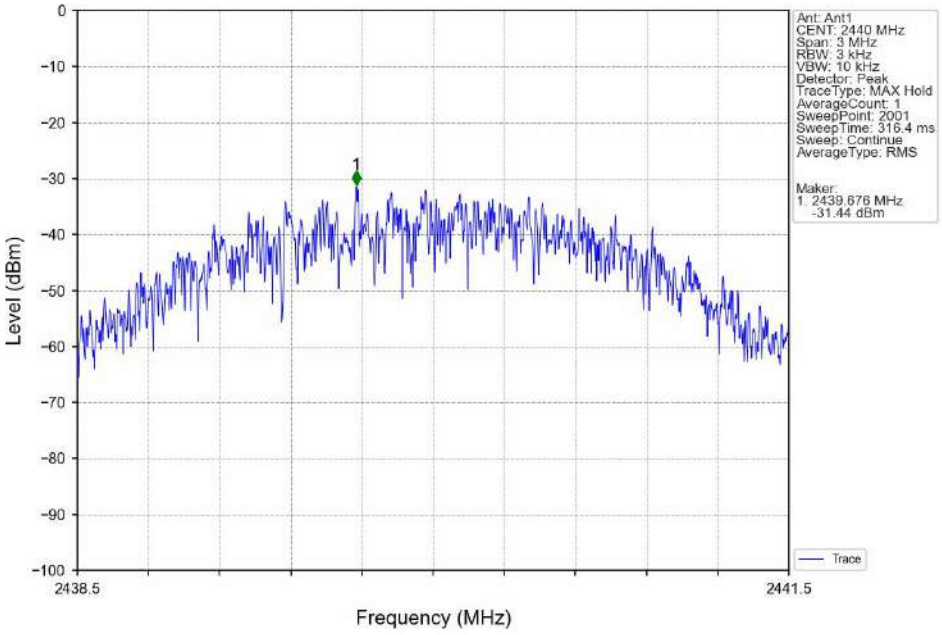
1M_HCH_2480MHz_Ant1_NTNV



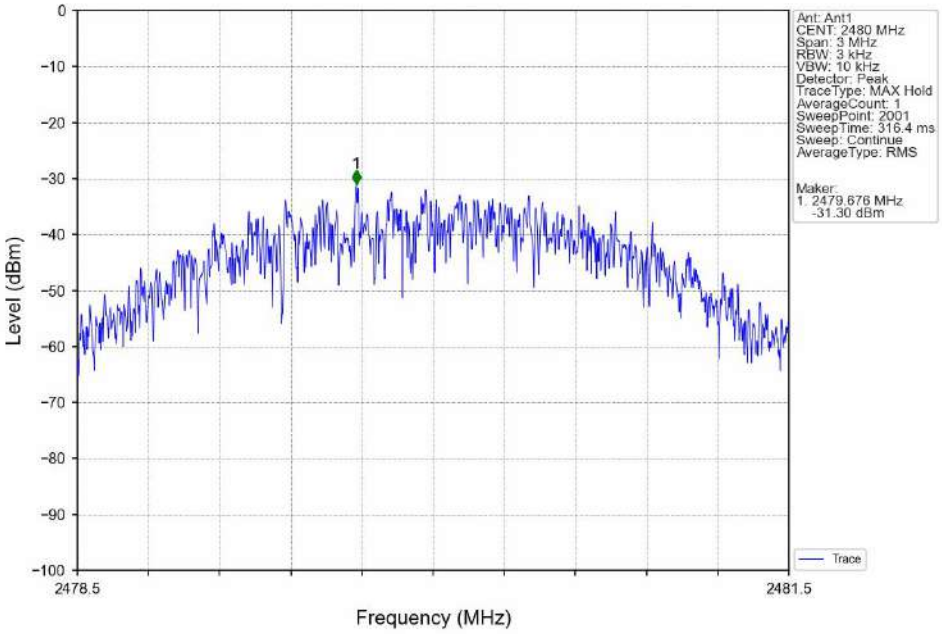
2M_LCH_2402MHz_Ant1_NTNV



2M_MCH_2440MHz_Ant1_NTNV



2M_HCH_2480MHz_Ant1_NTNV



5. Unwanted Emissions In Non-restricted Frequency Bands

5.1 Test Result

5.1.1 Ref

Mode	TX Type	Frequency (MHz)	ANT	Level of Reference (dBm)
1M	SISO	2402	1	-6.74
		2440	1	-7.43
		2480	1	-7.37
2M	SISO	2402	1	-6.20
		2440	1	-7.56
		2480	1	-8.76

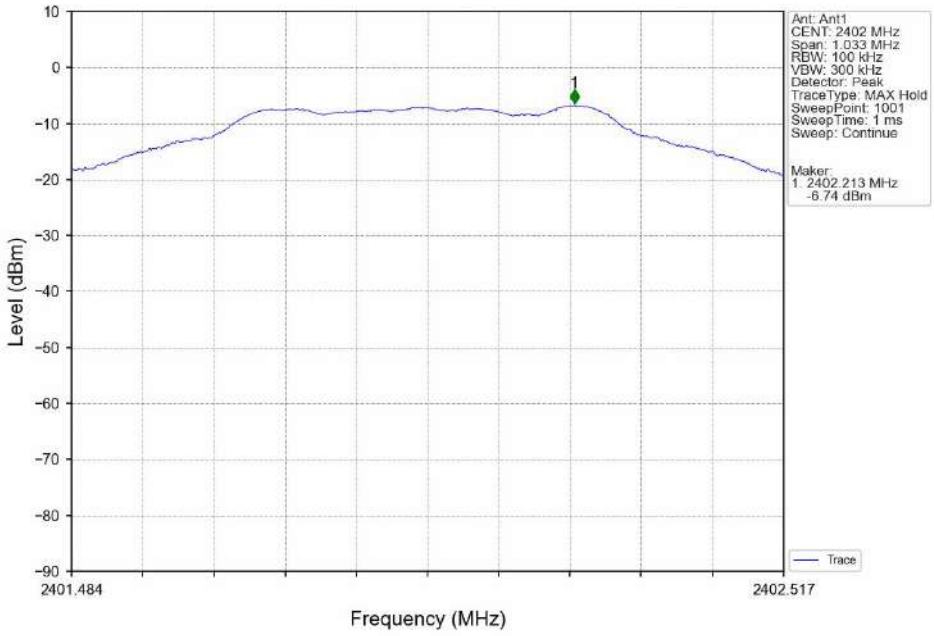
5.1.2 CSE

Mode	TX Type	Frequency (MHz)	ANT	Level of Reference (dBm)	Limit (dBm)	Verdict
1M	SISO	2402	1	-6.74	-26.74	Pass
		2440	1	-6.74	-26.74	Pass
		2480	1	-6.74	-26.74	Pass
2M	SISO	2402	1	-6.20	-26.20	Pass
		2440	1	-6.20	-26.20	Pass
		2480	1	-6.20	-26.20	Pass

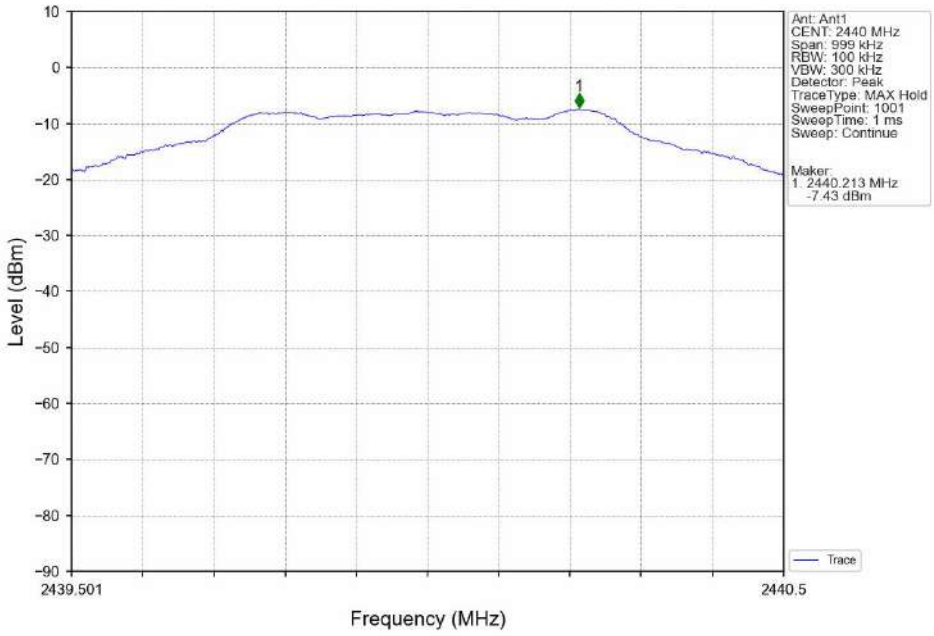
5.2 Test Graph

5.2.1 Ref

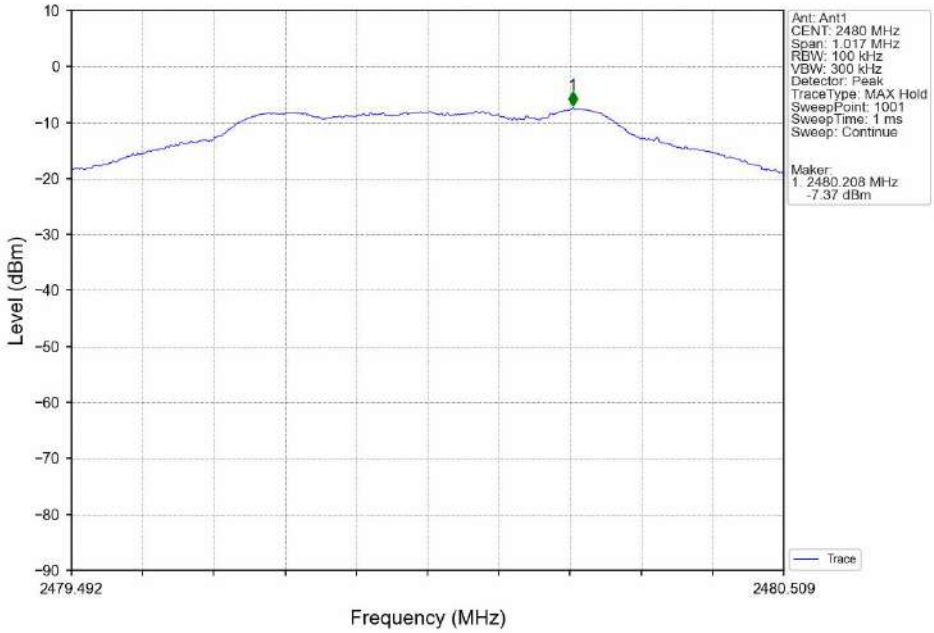
1M_LCH_2402MHz_Ant1_NTNV



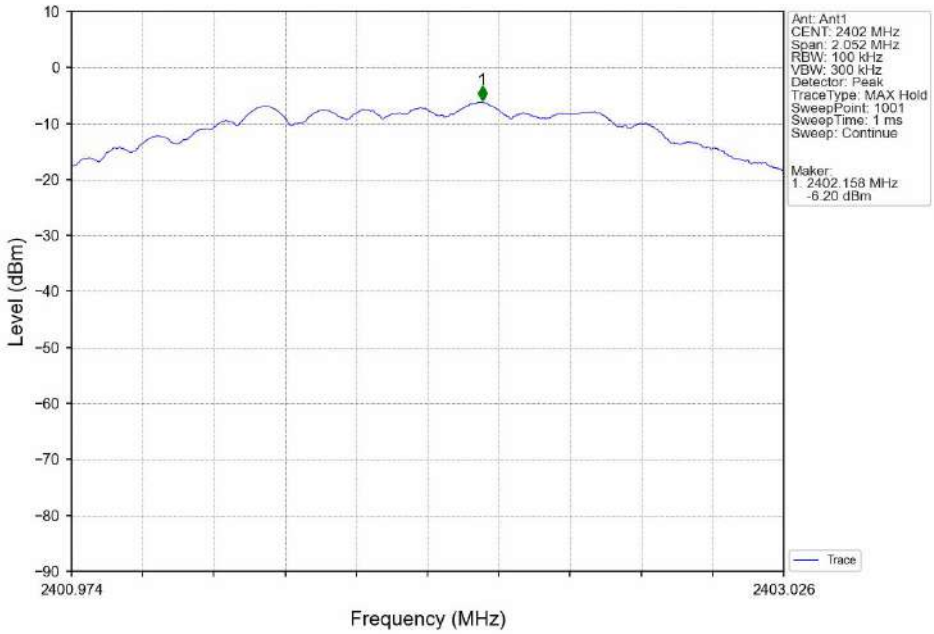
1M_MCH_2440MHz_Ant1_NTNV



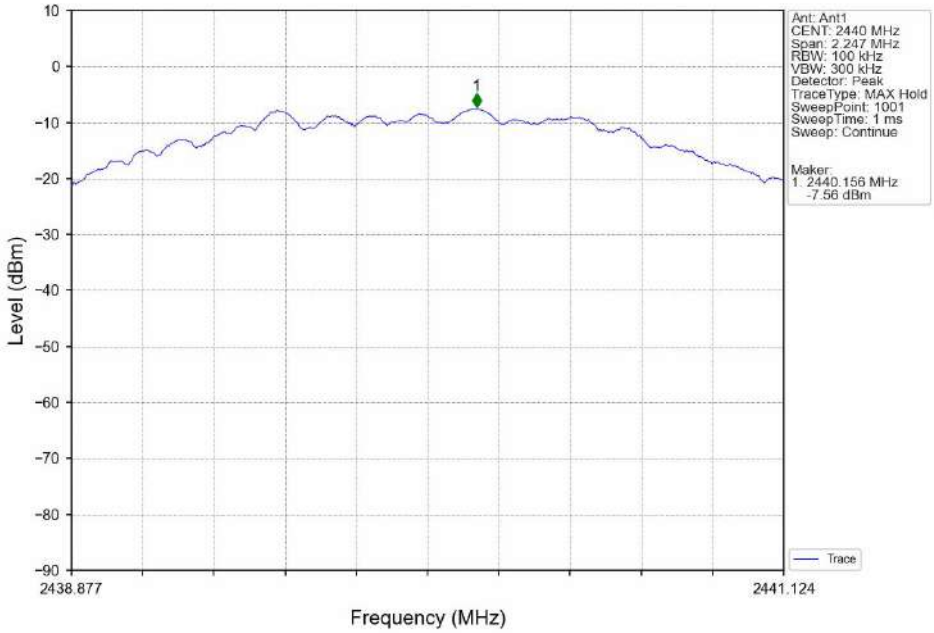
1M_HCH_2480MHz_Ant1_NTNV



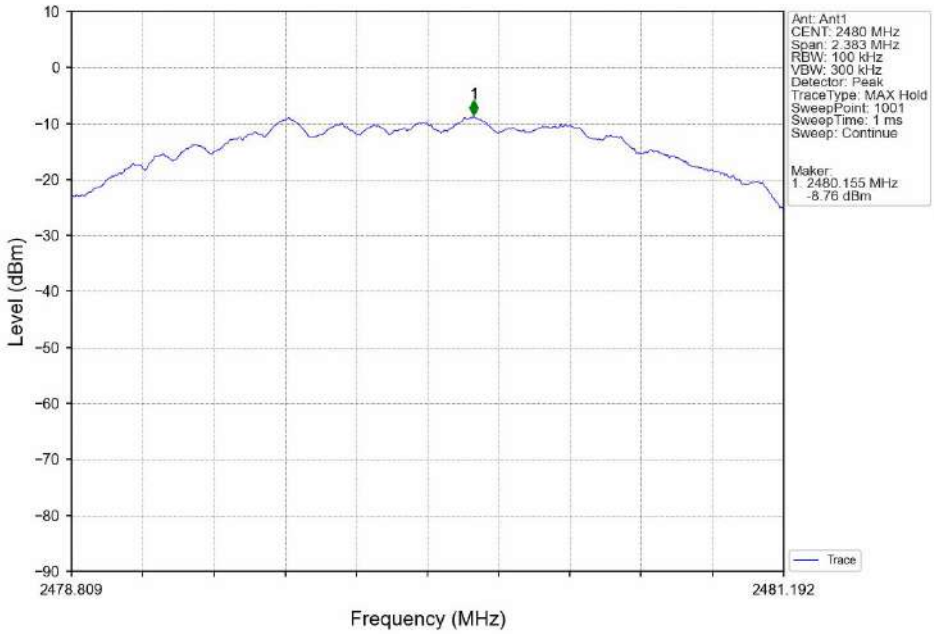
2M_LCH_2402MHz_Ant1_NTNV



2M_MCH_2440MHz_Ant1_NTNV

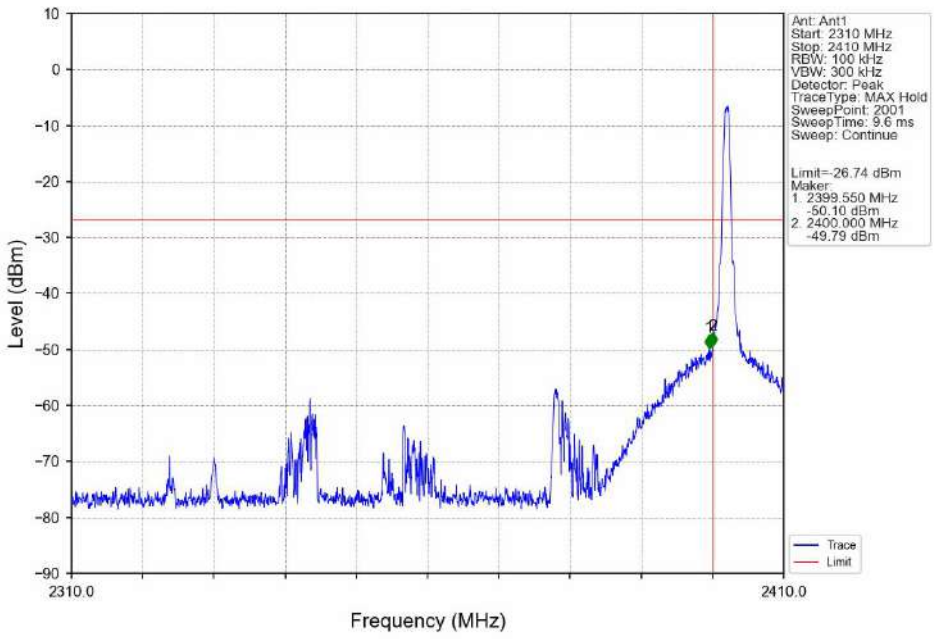


2M_HCH_2480MHz_Ant1_NTNV

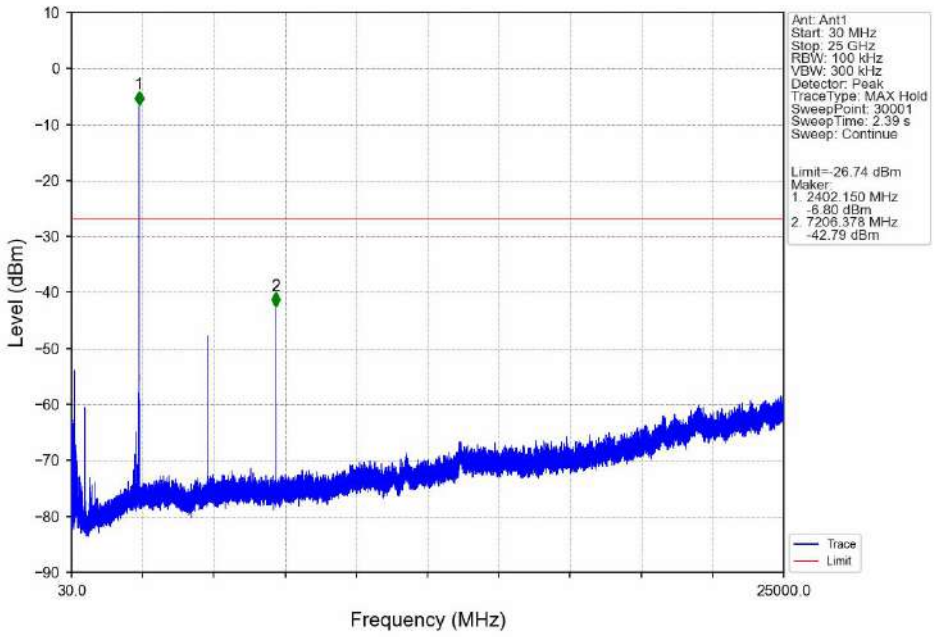


5.2.2 CSE

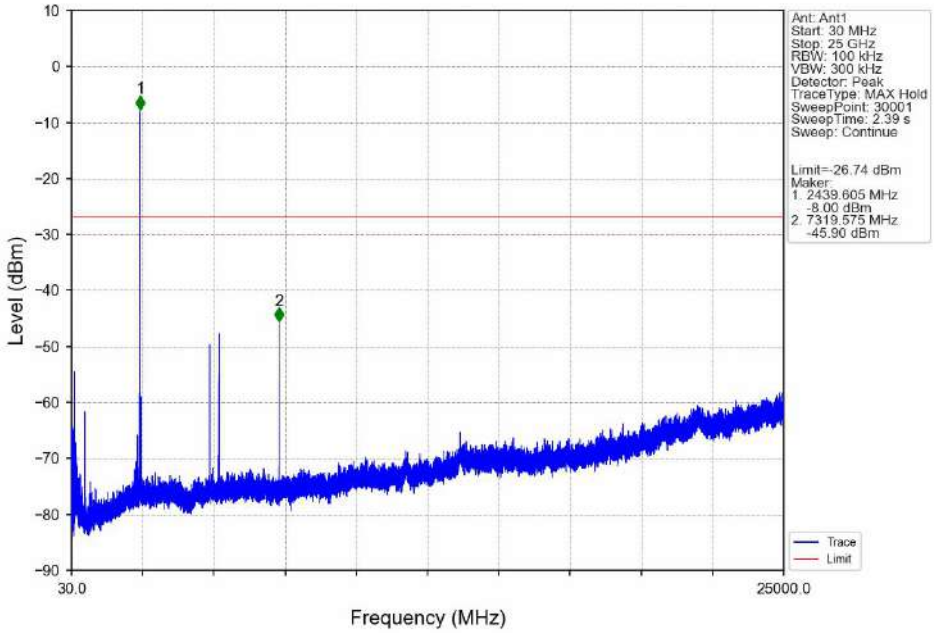
1M_LCH_2402MHz_Ant1_NTNV



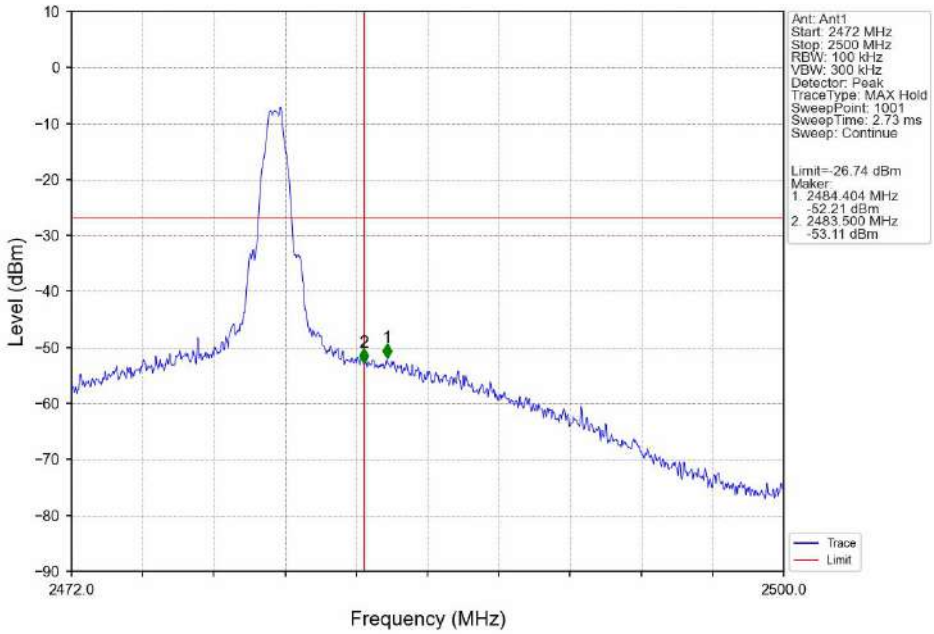
1M_LCH_2402MHz_Ant1_NTNV



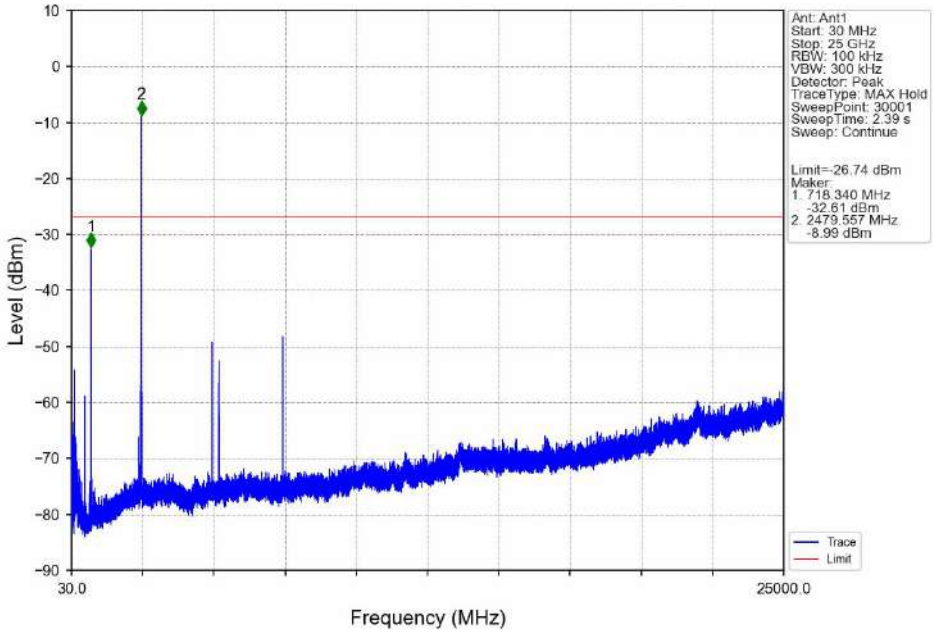
1M_MCH_2440MHz_Ant1_NTNV



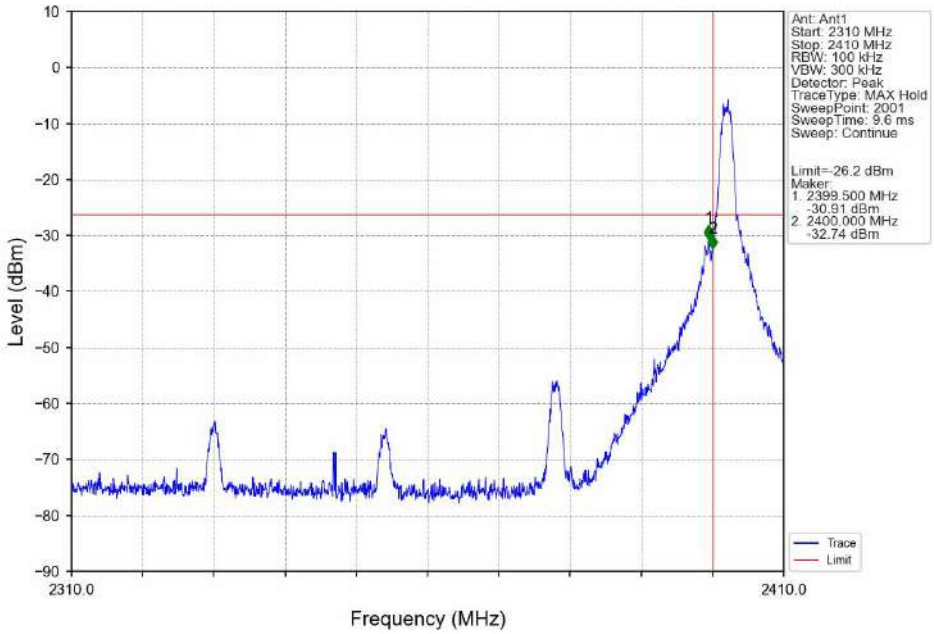
1M_HCH_2480MHz_Ant1_NTNV



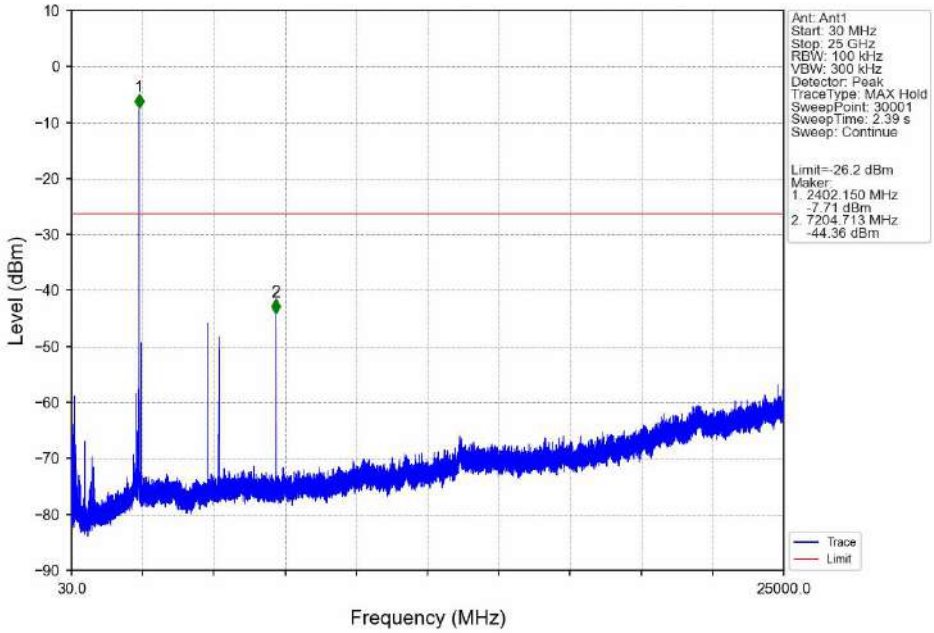
1M_HCH_2480MHz_Ant1_NTNV



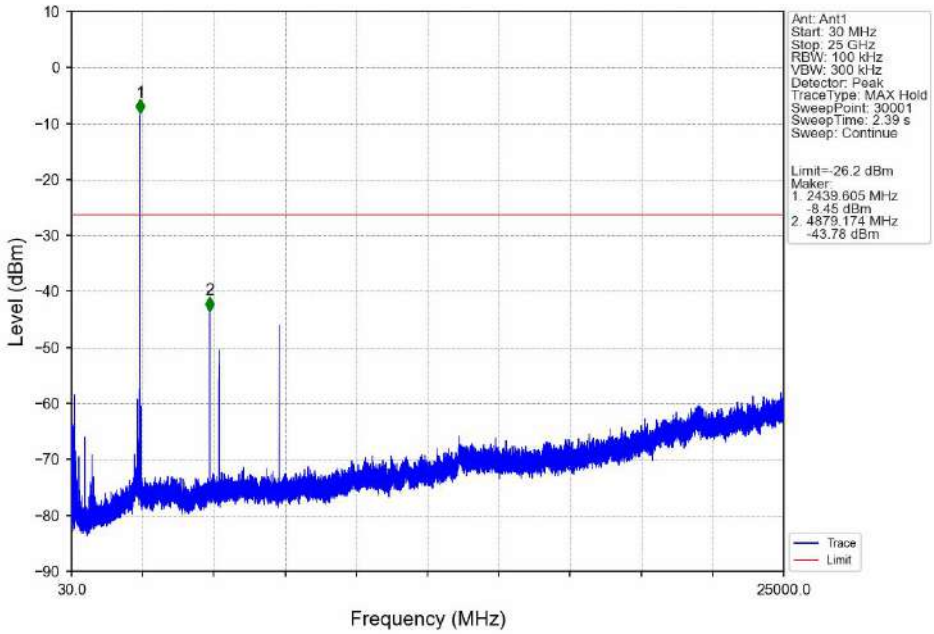
2M_LCH_2402MHz_Ant1_NTNV



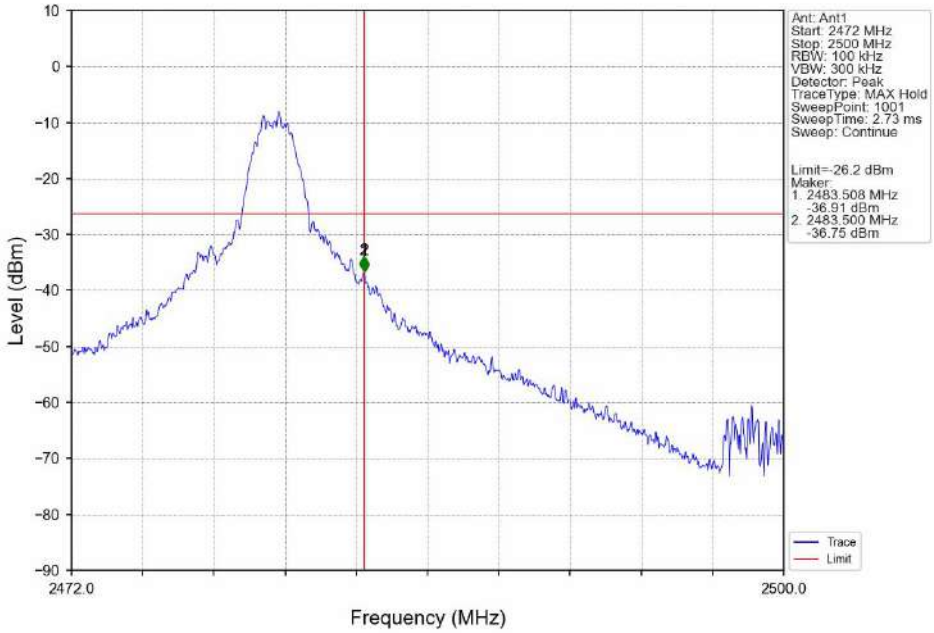
2M_LCH_2402MHz_Ant1_NTNV



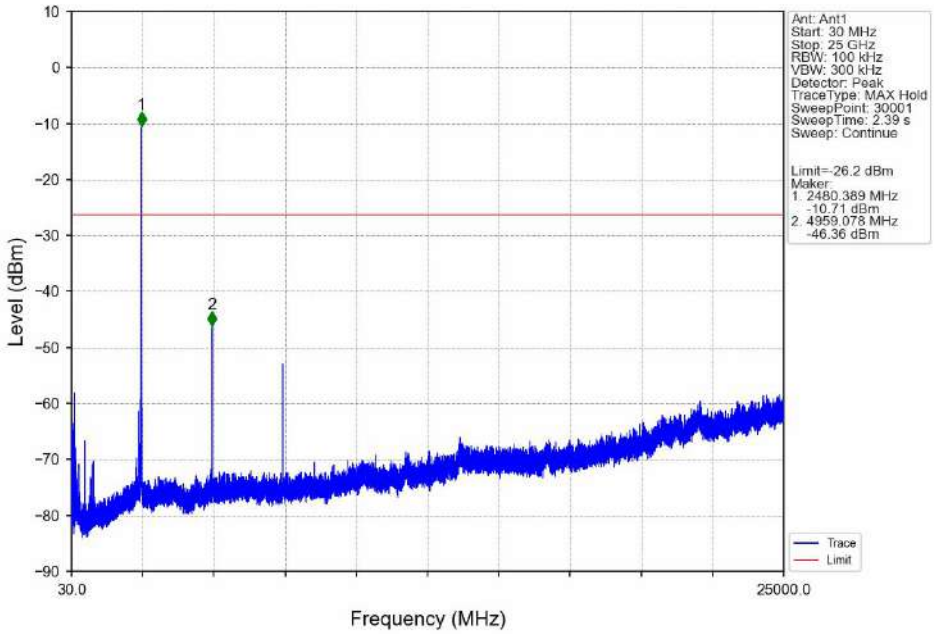
2M_MCH_2440MHz_Ant1_NTNV



2M_HCH_2480MHz_Ant1_NTNV



2M_HCH_2480MHz_Ant1_NTNV



6. Form731

6.1 Test Result

6.1.1 Form731

Lower Freq (MHz)	High Freq (MHz)	MAX Power (W)	MAX Power (dBm)
2402	2480	0.000048	-13.15

End of the report