RF TEST REPORT

For

Guangdong Moken Trading Co., Ltd
Product Name: Microphone
Test Model(s).: ADX400

Report Reference No.	:	**DACE240708006RL001**
FCC ID	:	**2BHLS-ADX400**
Applicant's Name	:	Guangdong Moken Trading Co., Ltd
Address	:	One of the second floors, No. 1, Lane 5, Zone 2, Team 11, Fei'etang Village, Encheng Street, Enping City
Testing Laboratory	:	Shenzhen DACE Testing Technology Co., Ltd.
Address	:	102 Building H1 & 1/F., Building H, Hongfa Science & Technology Park, Tangtou, Shiyan, Bao'an District, Shenzhen, Guangdong, China
Test Specification Standard	:	**47 CFR Part 15.236**
Date of Receipt	:	July 8, 2024
Date of Test	:	July 8, 2024 to July 11, 2024
Data of Issue	:	July 11, 2024
Result	:	**Pass**

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Revision History Of Report

Version	Description	REPORT No.	Issue Date
V1.0	Original	DACE240708006RL001	July 11, 2024

NOTE1:

The manufacturer should ensure that all products in series production are in conformity with the product sample detailed in this report. If the product in this report is used in any configuration other than that detailed in the report, the manufacturer must ensure the new system complies with all relevant standards.

Compiled by:	Supervised by:	Approved by:
Ben Tang	Tom Chen	Machael Mo
Ben Tang /Test Engineer	Tom Chen / Project Engineer	Machael Mo / Manager

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1 TEST SUMMARY

1.1 Test Standards

The tests were performed according to following standards:

47 CFR Part 15.236: Operation within the band 13.110–14.010 MHz

1.2 Summary of Test Result

Item	Standard	Method	Requirement	Result
Antenna requirement	47 CFR Part 15.236		47 CFR 15.203	Pass
Occupied Bandwidth	47 CFR Part 15.236	ANSI C63.10-2013, section 6.9.2	47 CFR 15.236(f)(2)	Pass
Frequency Tolerance	47 CFR Part 15.236	ANSI C63.10-2013, Section 6.8	47 CFR 15.236(f)(3)	Pass
The maximum radiated power	47 CFR Part 15.236	ANSI C63.10-2013, Section 6.5	47 CFR 15.236(d)	Pass
Emission Mask	47 CFR Part 15.236	ETSI EN 300 422-1 V1.4.2 (2011-08) section 8.3.1.1 or section 8.3.2.1	47 CFR 15.236(g)	Pass
Emissions in frequency bands (30M-1GHz)	47 CFR Part 15.236	ETSI EN 300 422-1 V1.4.2 (2011-08) section 8.4.2	47 CFR 15.236(g)	Pass
Emissions in frequency bands (Above 1GHz)	47 CFR Part 15.236	ETSI EN 300 422-1 V1.4.2 (2011-08) section 8.4.2	47 CFR 15.236(g)	Pass

2 GENERAL INFORMATION

2.1 Client Information

Applicant's Name : Guangdong Moken Trading Co., Ltd
Address : One of the second floors, No. 1, Lane 5, Zone 2, Team 11, Fei'etang Village, Encheng Street, Enping City

Manufacturer : Guangdong Moken Trading Co., Ltd
Address : One of the second floors, No. 1, Lane 5, Zone 2, Team 11, Fei'etang Village, Encheng Street, Enping City

2.2 Description of Device (EUT)

Product Name:	Microphone
Model/Type reference:	ADX400
Series Model:	ADX400,SU601,SU602,SU604,UR01,UR02,UR04,UX01,UX02,UX04,ASU02,BSU02,CSU02,TU602,UB01,UB02,UB04,V601,V602,V604,V701,V702,V704,V801,V802,V804,V901,V902,V904,SM58S,BS200,AS200,CS200,SH802,UH802,UPLX4,VM500PLUS,VM880,TD980,MR410,XR410,SR4,KLX9K,BK360,VP606,GLXD4,GL,GLXD8,SLXD4,MK5800
Model Difference:	The product has many models, Different in color, appearance and shape, and the other parts such as the circuit principle, pcb and electrical structure are the same.
Trade Mark:	N/A
Power Supply:	Battery:DC3.0V
Operation Frequency:	657.25MHz~662.75MHz
Number of Channels:	23
Modulation Type:	FM
Antenna Type:	0 dBi
Antenna Gain:	Internal antenna
Hardware Version:	V1.0
Software Version:	V1.0

Channel Number	Frequency(MHz)	Channel Number	Frequency(MHz)
01	657.25	13	660.25
02	657.5	14	660.5
03	657.75	15	660.75
04	658	16	661
05	658.25	17	661.25
06	658.5	18	661.5
07	658.75	19	661.75
08	659	20	662
09	659.25	21	662.25
10	659.5	22	662.5
11	659.75	23	662.75
12	660	24	

2.3 Description of Test Modes

No	Title	Description
TM1	Transmitting mode	Keep the EUT in continuously transmitting mode
Remark:Only the data of the worst mode would be recorded in this report.		

2.4 Description of Support Units

Title	Manufacturer	Model No.	Serial No.
Battery*2	/	AAA (1.5V)	/

2.5 Equipments Used During The Test

Occupied Bandwidth
Frequency Tolerance

Equipment	Manufacturer	Model No	Inventory No	Cal Date	Cal Due Date
RF Test Software	TACHOY	RTS-01	V2.0.0.0	/	/
High Pass filter	ZHINAN	OQHPF1-M1.5-18G-224	6210075	/	/
Power divider	MIDEWEST	PWD-2533	SMA-79	2023-05-11	2026-05-10
RF Sensor Unit	Tachoy Information Technology(shenzhen) Co.,Ltd.	TR1029-2	000001	/	/
Wideband radio communication tester	R&S	CMW500	113410	2024-06-12	2025-06-11
Vector signal generator	Keysight	N5181A	MY48180415	2023-11-09	2024-11-08
Signal generator	Keysight	N5182A	MY50143455	2023-11-09	2024-11-08
Spectrum Analyzer	Keysight	N9020A	MY53420323	2023-12-12	2024-12-11

Emission Mask
The maximum radiated power

Equipment	Manufacturer	Model No	Inventory No	Cal Date	Cal Due Date
Cable(HF)2	SCHWARZ BECK	50Ω	/	2024-03-20	2025-03-19
Cable(HF)1	SCHWARZ BECK	50Ω	/	2024-03-20	2025-03-19
Cable(LF)2	SCHWARZ BECK	50Ω	/	2024-03-20	2025-03-19
Cable(LF)1	SCHWARZ BECK	50Ω	/	2024-03-20	2025-03-19

control	Positioning Controller	Model MF-7802	MF780208362	2023-12-27	2024-12-26
Test Receiver	Rohde & Schwarz	ESPI TEST RECEIVER	ID:1164.6607K 03-102109-MH	2024-06-12	2025-06-11
EMI Test software	Farad	EZ -EMC	V1.1.42	/	/
Positioning Controller	/	MF-7802	/	/	/
Amplifier(18-40G)	COM-POWER	AH-1840	10100008-1	2022-04-05	2025-04-04
Horn antenna	COM-POWER	AH-1840 (18-40G)	10100008	2023-04-05	2025-04-04
Loop antenna	ZHINAN	ZN30900C	ZN30900C	2024-06-14	2026-06-13
Power amplifier(LF)	Schwarzbeck	BBV9743	9743-151	2024-06-12	2025-06-11
Power amplifier(HF)	Schwarzbeck	BBV9718	9718-282	2024-06-12	2025-06-11
Horn Antenna	Sunol Sciences	DRH-118	A091114	2023-05-13	2025-05-12
Broadband Antenna	Sunol Sciences	JB6 Antenna	A090414	2023-05-21	2025-05-20

Emissions in frequency bands (below 30MHz)
Emissions in frequency bands (Above 1GHz)
Emissions in frequency bands (30M-1GHz)

Equipment	Manufacturer	Model No	Inventory No	Cal Date	Cal Due Date
EMI Test software	Farad	EZ -EMC	V1.1.42	/	/
Positioning Controller	/	MF-7802	/	/	/
High Pass filter	ZHINAN	OQHPF1-M1.5-18G-224	6210075	/	/
Amplifier(18-40G)	COM-POWER	AH-1840	10100008-1	2022-04-05	2025-04-04
Horn antenna	COM-POWER	AH-1840 (18-40G)	10100008	2023-04-05	2025-04-04
Loop antenna	ZHINAN	ZN30900C	ZN30900C	2024-06-14	2026-06-13
Cable(LF)#2	Schwarzbeck	/	/	2024-02-19	2025-02-18
Cable(LF)#1	Schwarzbeck	/	/	2024-02-19	2025-02-18
Cable(HF)#2	Schwarzbeck	AK9515E	96250	2024-03-20	2025-03-19
Cable(HF)#1	Schwarzbeck	SYV-50-3-1	/	2024-03-20	2025-03-19
Power amplifier(LF)	Schwarzbeck	BBV9743	9743-151	2024-06-12	2025-06-11
Power amplifier(HF)	Schwarzbeck	BBV9718	9718-282	2024-06-12	2025-06-11
Spectrum Analyzer	R&S	FSP30	1321.3008K40 -101729-jR	2024-06-12	2025-06-11
Horn Antenna	Sunol Sciences	DRH-118	A091114	2023-05-13	2025-05-12
Broadband Antenna	Sunol Sciences	JB6 Antenna	A090414	2023-05-21	2025-05-20
Test Receiver	R&S	ESCI	102109	2024-06-12	2025-06-11

2.6 Statement Of The Measurement Uncertainty

Test Item	Measurement Uncertainty
Occupied Bandwidth	±3.63%
Duty cycle	±3.1%
Radiated Emission (Below 1GHz)	±5.79dB
Radiated Emission (Above 1GHz)	±5.46dB
Note: (1) This uncertainty represents an expanded uncertainty expressed at approximately the 95% confidence level using a coverage factor of k=2.	

2.7 Identification of Testing Laboratory

Company Name:	Shenzhen DACE Testing Technology Co., Ltd.
Address:	101-102 Building H5 & 1/F., Building H, Hongfa Science & Technology Park, Tangtou, Shiyan, Bao'an District, Shenzhen, Guangdong, China
Phone Number:	+86-13267178997
Fax Number:	86-755-29113252

Identification of the Responsible Testing Location

Company Name:	Shenzhen DACE Testing Technology Co., Ltd.
Address:	101-102 Building H5 & 1/F., Building H, Hongfa Science & Technology Park, Tangtou, Shiyan, Bao'an District, Shenzhen, Guangdong, China
Phone Number:	+86-13267178997
Fax Number:	86-755-29113252
FCC Registration Number:	0032847402
Designation Number:	CN1342
Test Firm Registration Number:	778666
A2LA Certificate Number:	6270.01

2.8 Announcement

(1) The test report reference to the report template version v0.

(2) The test report is invalid if not marked with the signatures of the persons responsible for preparing, reviewing and approving the test report.

(3) The test report is invalid if there is any evidence and/or falsification.

(4) This document may not be altered or revised in any way unless done so by DACE and all revisions are duly noted in the revisions section.

(5) Content of the test report, in part or in full, cannot be used for publicity and/or promotional purposes without prior written approval from the laboratory.

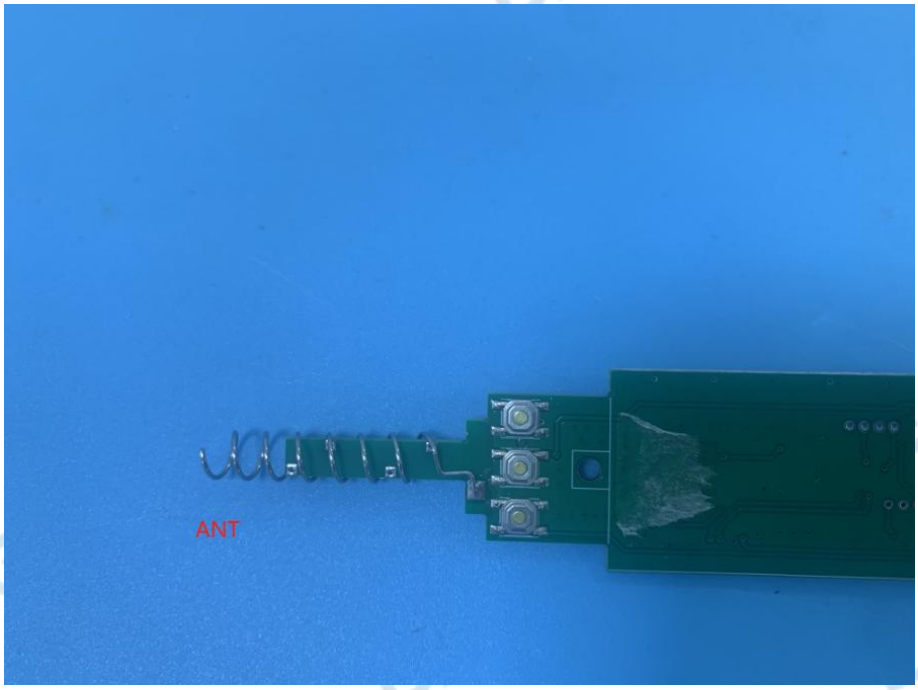
(6) The laboratory is only responsible for the data released by the laboratory, except for the part provided by the applicant.

3 Evaluation Results (Evaluation)

3.1 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.

3.1.1 Conclusion:



4 Radio Spectrum Matter Test Results (RF)

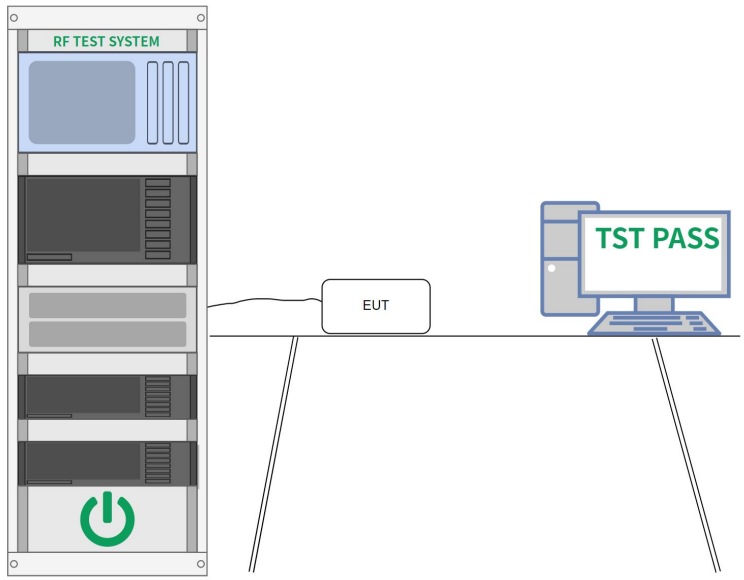
4.1 Conducted Output Power

Test Requirement:	FCC part 15.236(d)(1)
Test Limit:	(1) In the bands allocated and assigned for broadcast television and in the 600 MHz service band: 50 mW EIRP (2) In the 600 MHz guard band and the 600 MHz duplex gap: 20 mW EIRP.
Test Method:	ANSI C63.10:2013
Procedure:	1. The maximum peak output power was measured with a Spectrum Analyzer connected to the antenna terminalwhile EUT was operating in unmodulated situation. 2. Power was supplied to the battery input connector a power supply. The power supply was set for +3.0VDC. TheSpectrum Analyzer was connected at antenna terminal to measure RF power of the carrier. 3. A Multimeter was connected in series with final RF Stage to measure the current; A Multimeter was used tomeasure final RF Stage supply voltage. Then the voltage v.s. current of the final RF Stage can be showed.

4.1.1 E.U.T. Operation:

Operating Environment:					
Temperature:	23.7 °C	Humidity:	52.1 %	Atmospheric Pressure:	102 kPa
Pre test mode:	TM1				
Final test mode:	TM1				

4.1.2 Test Setup Diagram:



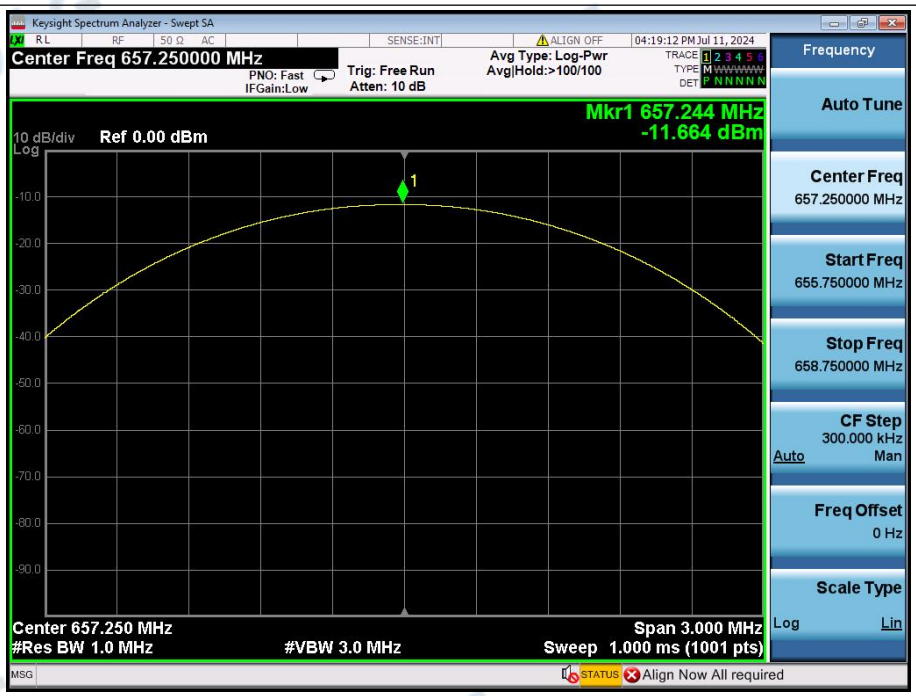
4.1.3 Test Data:

Frequency (MHz)	Conducted Output Power (dBm)	ANT Gain (dBi)	EIRP (dBm)	Limit (dBm)	Result
657.25	-11.664	0	-11.664	14	PASS

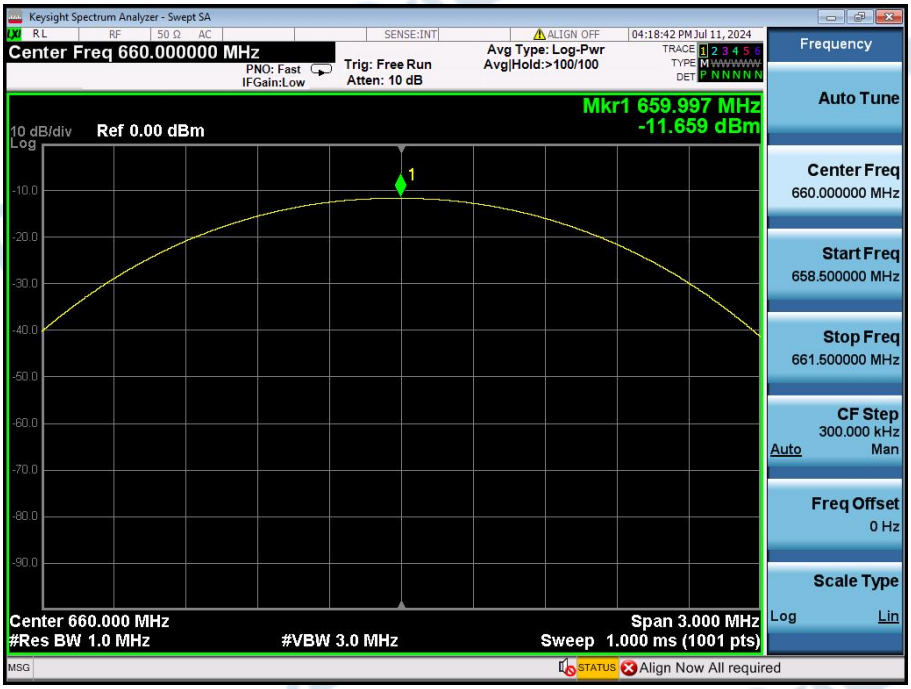
660	-11.659	0	-11.659	14	PASS
662.75	-11.654	0	-11.654	14	PASS

EIRP= Conducted Output Power + ANT Gain

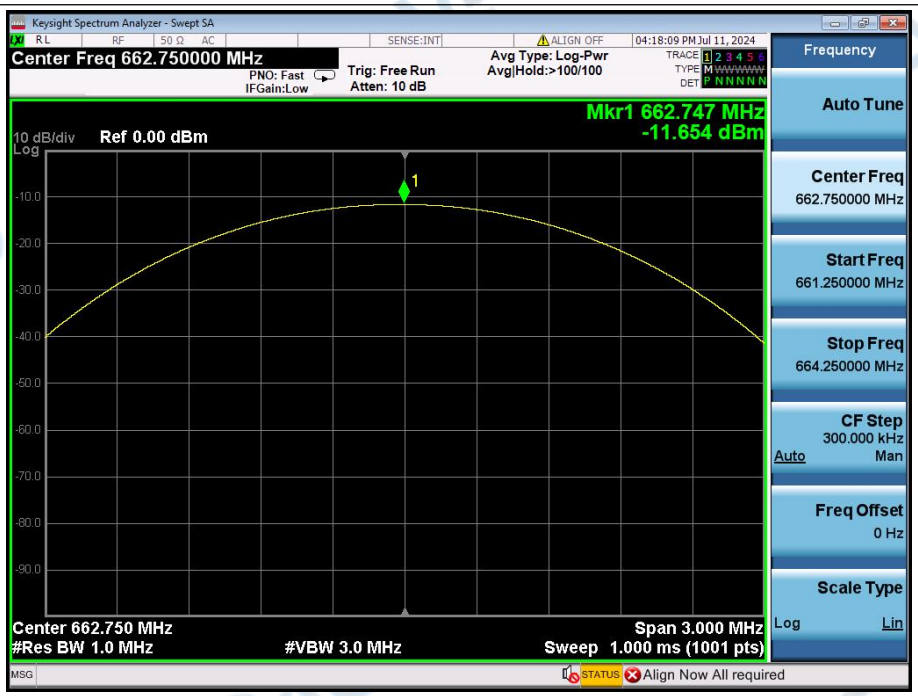
657.25MHz



660MHz



662.75MHz


Keysight Spectrum Analyzer - Swept SA
Center Freq 662.750000 MHz
PNO: Fast
IFGain:Low
Trig: Free Run
Atten: 10 dB
Avg Type: Log-Pwr
Avg|Hold:>100/100
04:18:09 PM Jul 11, 2024
Mkr1 662.747 MHz
-11.654 dBm
10 dB/div
Ref 0.00 dBm
Log
Center 662.750 MHz
#Res BW 1.0 MHz
#VBW 3.0 MHz
Span 3.000 MHz
Sweep 1.000 ms (1001 pts)
Frequency
Auto Tune
Center Freq
662.750000 MHz
Start Freq
661.250000 MHz
Stop Freq
664.250000 MHz
CF Step
300.000 kHz
Auto
Man
Freq Offset
0 Hz
Scale Type
Log
Lin
Align Now All required

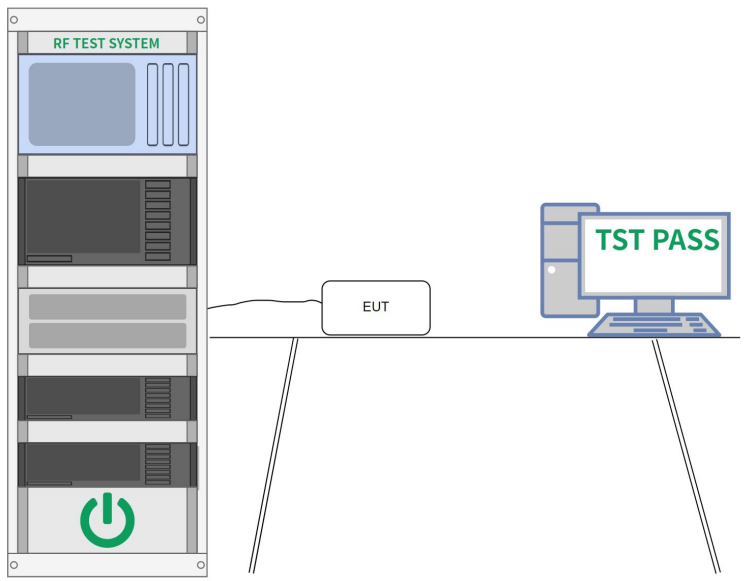
4.2 Channel Bandwidth

Test Requirement:	FCC Part15 C Section 15. 236(f)(2)
Test Limit:	According to FCC 15.236(f)(2), The operating frequency within a permissible band of operation as defined inparagraph (c) must comply with the following requirements. (1) The frequency selection shall be offset from the upper or lower band limits by 25 kHz or an integral multiple thereof. (2) One or more adjacent 25 kHz segments within the assignable frequencies may be combined to form a channel whose maximum bandwidth shall not exceed 200 kHz. The operating bandwidth shall not exceed 200kHz.Emissions within the band from one megahertz below to one megahertz above the carrier frequency shall comply with the emission mask in Section 8.3 of ETSI EN 300 422-1 V1.4.2 (2011-08) (incorporated by reference, see §15.38). Emissions outside this band shall comply with the limit specified at the edges of the ETSI mask
Test Method:	ANSI C63.10:2013
Procedure:	According to TIA-603 for additional Test Set-Up procedures, the occupied bandwidth of emission was measuredwith a Spectrum Analyzer connected to the antenna terminal while EUT was operating in 2.5kHz tone at an inputlevel 16 dB greater than that necessary to produce 50 percent modulation. Then mark the -26dB Bandwidth andrecord it.

4.2.1 E.U.T. Operation:

Operating Environment:					
Temperature:	23.7 °C	Humidity:	52.1 %	Atmospheric Pressure:	102 kPa
Pre test mode:	TM1				
Final test mode:	TM1				

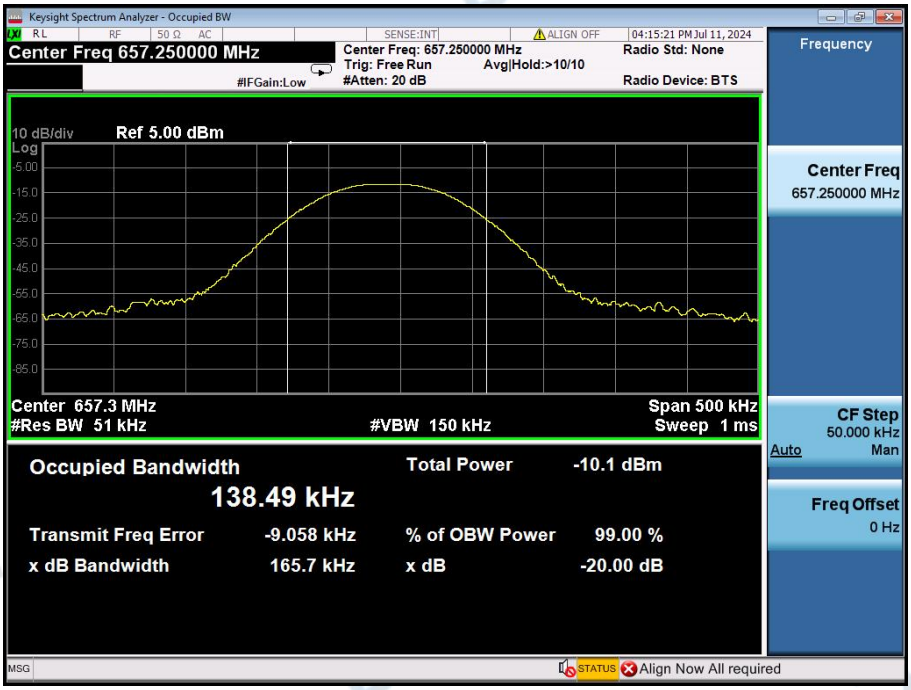
4.2.2 Test Setup Diagram:



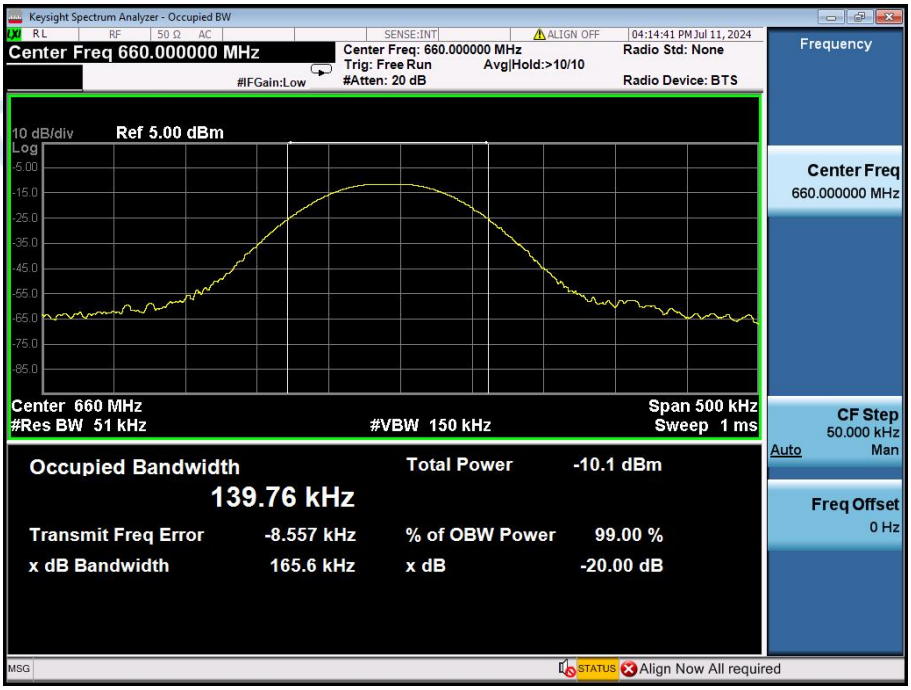
4.2.3 Test Data:

Frequency (MHz)	20dB bandwidth (KHz)	99%Bandwidth (kHz)	Limit (kHz)	Result
657.25	165.7	138.49	200	Pass
660	165.6	139.76	200	Pass
662.75	166.3	139.39	200	Pass

657.25MHz



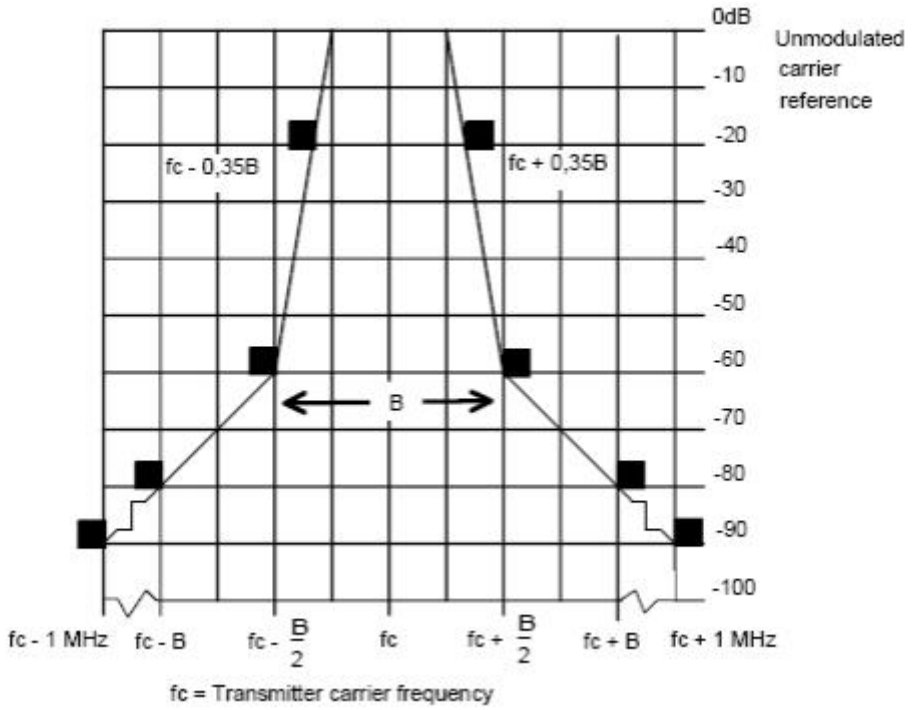
660MHz



662.75MHz

Keysight Spectrum Analyzer - Occupied BW
Center Freq 662.750000 MHz
Center Freq: 662.750000 MHz
Trig: Free Run
Avg|Hold:>10/10
#Atten: 20 dB
Radio Std: None
Radio Device: BTS
#IFGain:Low
10 dB/div
Ref 5.00 dBm
Log
Center 662.8 MHz
#Res BW 51 kHz
#VBW 150 kHz
Span 500 kHz
Sweep 1 ms
Occupied Bandwidth
139.39 kHz
Total Power -10.1 dBm
Transmit Freq Error -9.267 kHz
% of OBW Power 99.00 %
x dB Bandwidth 166.3 kHz
x dB -20.00 dB
Frequency
Center Freq
662.750000 MHz
CF Step
50.000 kHz
Auto Man
Freq Offset
0 Hz
Align Now All required

4.3 Necessary bandwidth

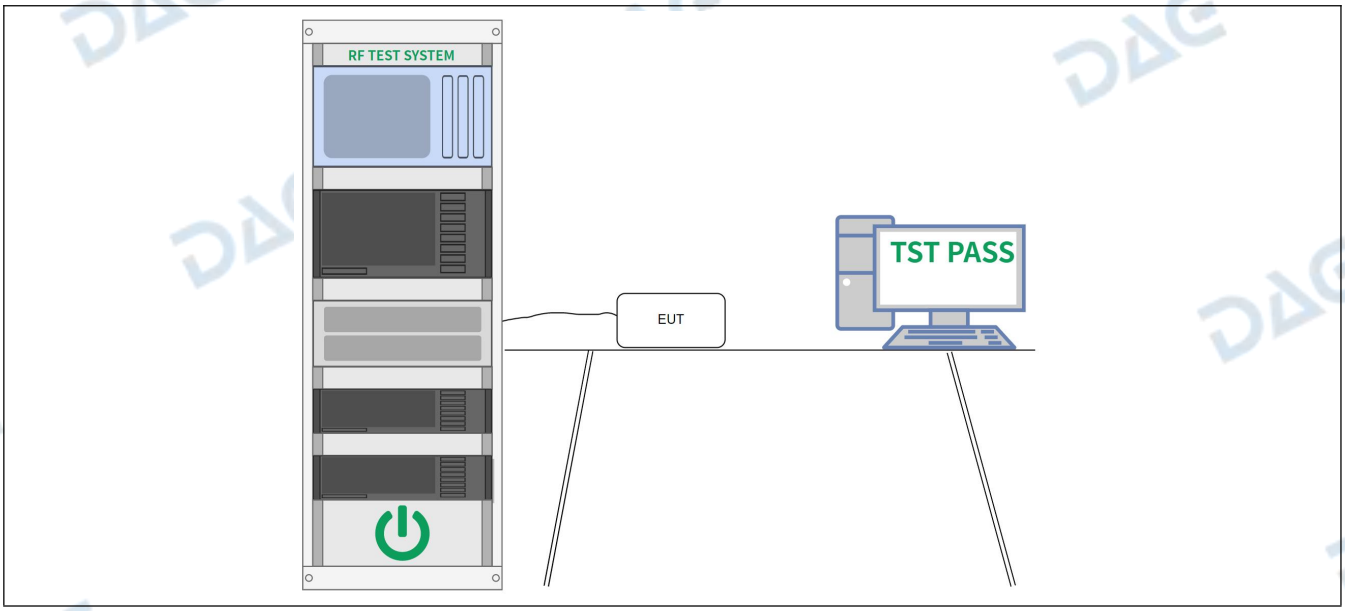
Test Requirement:	FCC part 15.236(f)(2)
Test Limit:	 Standard Applicable According to §15.236 (g) Emissions within the band from one megahertz below to one megahertz above the carrier frequency shall comply with the emission mask in §8.3 of ETSI EN 300 422-1 V1.4.2 (2011-08), Electromagnetic compatibility and Radio spectrum Matters (ERM); Wireless UHF Microphone s in the 25 MHz to 3GHz frequency range; Part 1: Technical characteristics and methods of measurement. Emissions outside of this band shall comply with the limits specified in section 8.4 of ETSI EN 300 422-1 V1.4.2 (2011-08). According to ETSI EN 300 422-2 V2.1.1 section 8.3, the transmitter output spectrum shall be within the mask defined in the following figure.
Test Method:	ANSI C63.10:2013/ ETSI EN 300 422-1/-2
Procedure:	Principal Spectrum Mask measuring method for digital transmitters: - Spectrum mask below 1 GHz, see figure 4; for the spectrum mask above 1 GHz, see figure 5. NOTE: This parameter also includes the limits for spectral components within the out-of-band region. The transmitter shall be modulated with the test signals defined in clause 7.1.2. In any case the mask shall not be exceeded. - Step 1: Measure the "Carrier Power" with the spectrum analyser setup: • Centre Frequency = fc • Span = Zero span • Detector = RMS • Trace Mode = Average • RBW&VBW = 5 × B • Sweep time ≥ 2 s Step 2: Measure the "Maximum Relative Level (dBc) at Specified Carrier Offsets"

	with the following spectrum analyser setup: • Centre Frequency = fc • Span ≥ 5 × B • Detector = RMS • Trace Mode = Peak Hold • RBW&VBW = 1 kHz • Sweep time ≥ 2 s Limits: - Step 3: Measure the "transmitter wide band noise floor": The measurement of transmitter broad band noise floor shall be carried out according to clause 8.3.2.1. - Step 3a: Measure the "lower frequency transmitter wide band noise floor": - Start Frequency = fc - 5 × B Stop Frequency = fc - 1,75 × B - Detector = RMS - Trace Mode = Average - RBW&VBW = 1 kHz - Sweep time = 2 s per 200 kHz - Step 3b: Measure the "upper frequency transmitter wide band noise floor": - Start Frequency = fc + 1,75 × B Stop Frequency = fc + 5 × B - Detector = RMS - Trace Mode = Average - RBW&VBW = 1 kHz - Sweep time = 2 s per 200 kHz Both spectrum ranges shall be measured. Limits: The spectrum mask for digital systems shall not be exceeded. See figure 4 for systems operating below 2 GHz and figure 5 for systems operating above 2 GHz.

4.3.1 E.U.T. Operation:

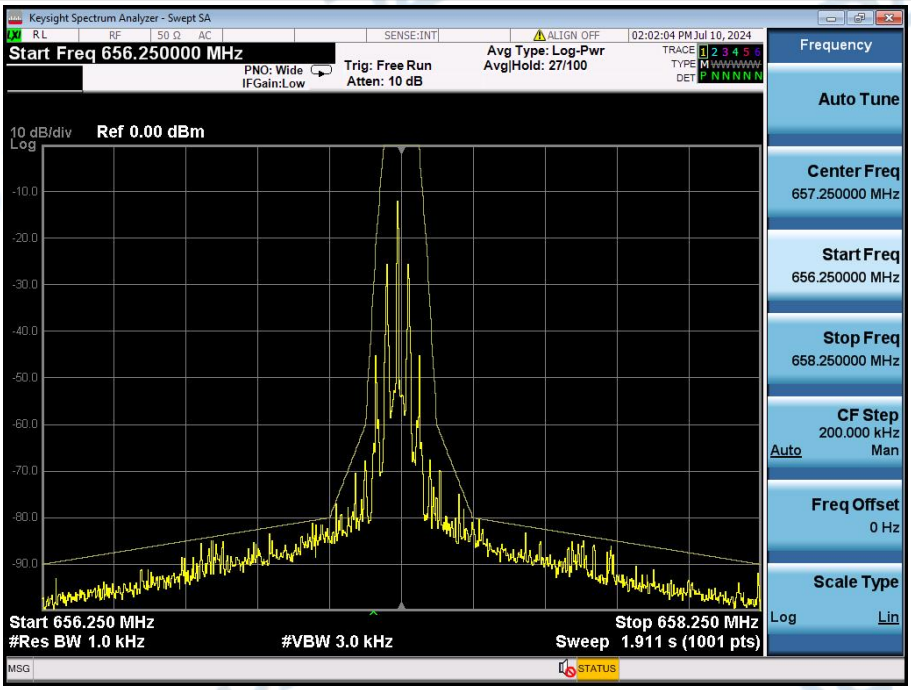
Operating Environment:					
Temperature:	23.7 °C	Humidity:	52.1 %	Atmospheric Pressure:	102 kPa
Pre test mode:	TM1				
Final test mode:	TM1				

4.3.2 Test Setup Diagram:

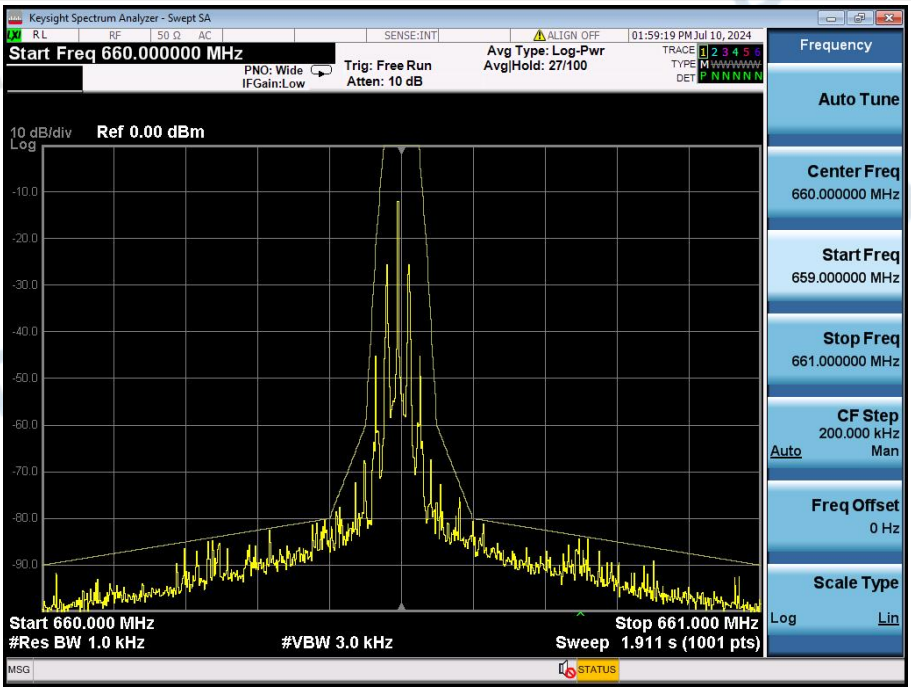


4.3.3 Test Data:

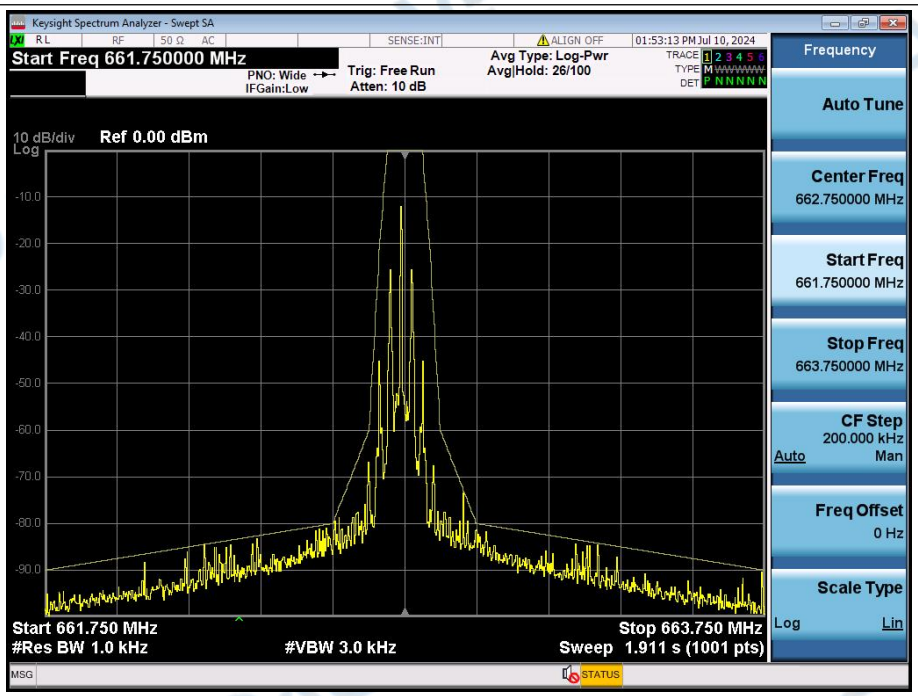
657.25MHz



660MHz



662.75MHz


Keysight Spectrum Analyzer - Swept SA
Start Freq 661.750000 MHz
PNO: Wide
IFGain:Low
Trig: Free Run
Atten: 10 dB
Avg Type: Log-Pwr
Avg|Hold: 26/100
01:53:13 PM Jul 10, 2024
10 dB/div
Ref 0.00 dBm
Log
Start 661.750 MHz
#Res BW 1.0 kHz
#VBW 3.0 kHz
Stop 663.750 MHz
Sweep 1.911 s (1001 pts)
Frequency
Auto Tune
Center Freq
662.750000 MHz
Start Freq
661.750000 MHz
Stop Freq
663.750000 MHz
CF Step
200.000 kHz
Auto
Man
Freq Offset
0 Hz
Scale Type
Log
Lin

4.4 FREQUENCY STABILITY

Test Requirement:	FCC part 15.236(f)(3)
Test Limit:	±50ppm
Test Method:	ANSI C63.10: 2013
Procedure:	1. Setup the configuration of the ambient temperature form -20ºC to 50ºC with sufficient time. And measurethe different power of the EUT with an artificial power from highest to end point voltage. 2. Set frequency counter center frequency to the right frequency needs to be measuredband.

4.4.1 E.U.T. Operation:

Operating Environment:					
Temperature:	23.7 °C	Humidity:	52.1 %	Atmospheric Pressure:	102 kPa
Pre test mode:	TM1				
Final test mode:	TM1				

4.4.2 Test Data:

Test frequency	Test Conditions		Measure Frequency	ppm	Limit	Result
(MHz)	Voltage (V)	Temperature (ºC)	(MHz)		ppm	
657.25	N	N	657.241	-13.693	±50ppm	Pass
		L	657.242	-12.172		
		H	657.245	-7.607		
	L	N	657.242	-12.172		
		L	657.241	-13.693		
		H	657.243	-10.650		
	H	N	657.245	-7.607		
		L	657.254	6.086		
		H	657.248	-3.043		

Test frequency	Test Conditions		Measure Frequency	ppm	Limit	Result
(MHz)	Voltage (V)	Temperature (ºC)	(MHz)		ppm	
660	N	N	659.991	-13.636	±50ppm	Pass
		L	659.993	-10.606		
		H	659.992	-12.121		
	L	N	659.994	-9.091		
		L	659.991	-13.636		
		H	659.99	-15.152		
	H	N	659.994	-9.091		
		L	659.994	-9.091		

		H	659.995	-7.576		

Test frequency	Test Conditions		Measure Frequency	ppm	Limit	Result
(MHz)	Voltage (V)	Temperature (ºC)	(MHz)		ppm	
662.75	N	N	662.741	-13.580	±50ppm	Pass
		L	662.745	-7.544		
		H	662.748	-3.018		
	L	N	662.744	-9.053		
		L	662.746	-6.035		
		H	662.741	-13.580		
	H	N	662.748	-3.018		
		L	662.742	-12.071		
		H	662.742	-12.071		

657.25MHz

660MHz

662.75MHz

4.5 RADIATED EMISSION MEASUREMENT

Test Requirement:	FCC part 15.236(d)(2)&ETSI EN300422-1
Test Limit:	**Table 3: Limits for spurious emissions**

State	Frequency		
	47 MHz to 74 MHz 87,5 MHz to 137 MHz 174 MHz to 230 MHz 470 MHz to 862 MHz	Other Frequencies below 1 000 MHz	Frequencies above 1 000 MHz
Operation	4 nW	250 nW	1 µW
Standby	2 nW	2 nW	20 nW

Test Method:	ANSI C63.10-2013, Section 6.4
Procedure:	1.The setup of EUT is according with per TIA/EIA Standard 603 and ANSI C63.4-2014 measurement procedure. 2.The measurement antenna was placed at a distance of 3 meters from the EUT. During the tests, the antenna heightand polarization as well as EUT azimuth were varied in order to identify the maximum level of emissions from theEUT. The test was performed by placing the EUT on 3-orthogonal axis. 3.The frequency range up to tenth harmonic of the fundamental frequency was investigated. 4.Remove the EUT and replace it with substitution antenna. A signal generator was connected to the substitution antenna by a non-radiating cable. The absolute levels of the spurious emissions were measured by the substitution. Spurious attenuation limit in dB = 43 + 10 Log10 (power in Watts)

4.5.1 E.U.T. Operation:

Operating Environment:					
Temperature:	23.7 °C	Humidity:	52.1 %	Atmospheric Pressure:	102 kPa
Pre test mode:	TM1				
Final test mode:	TM1				

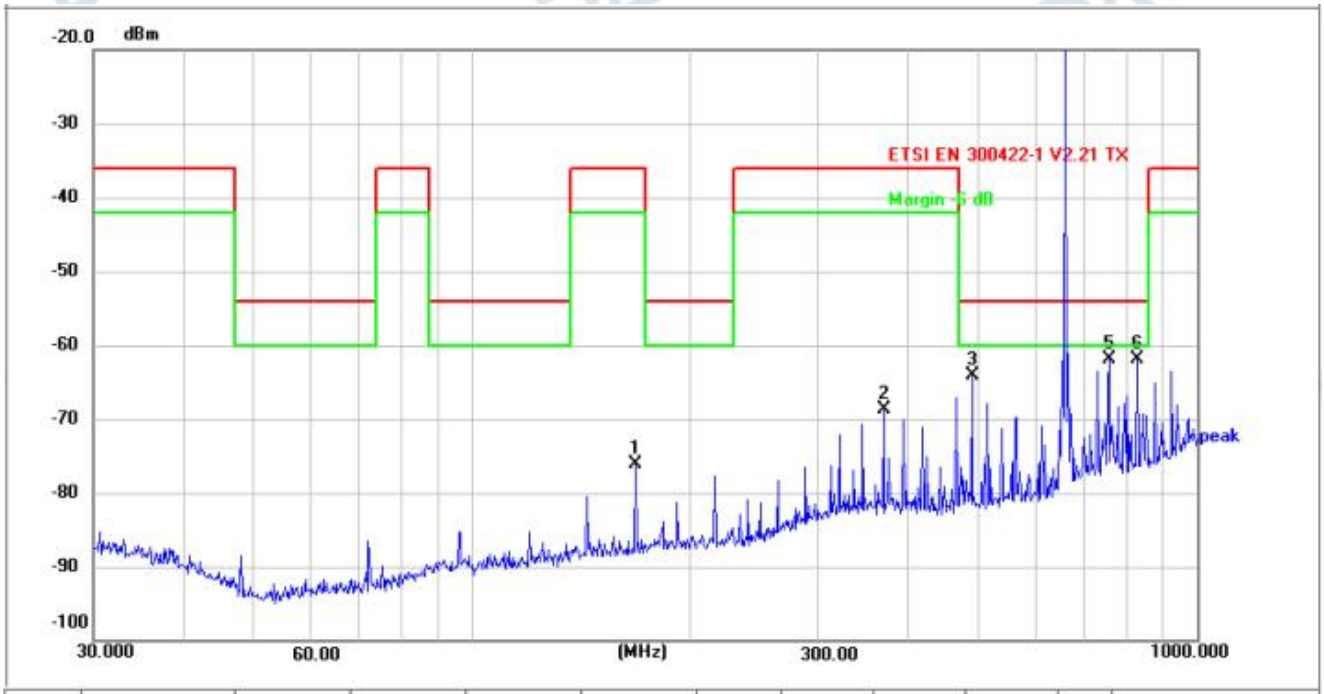
4.5.2 Test Data:

Between 9KHz – 30MHz

The emission from 9 kHz to 30MHz was pre-tested and found the result was 20dB lower than the limit, and according to 15.31(o) & RSS-Gen 6.13, the test result no need to reported.

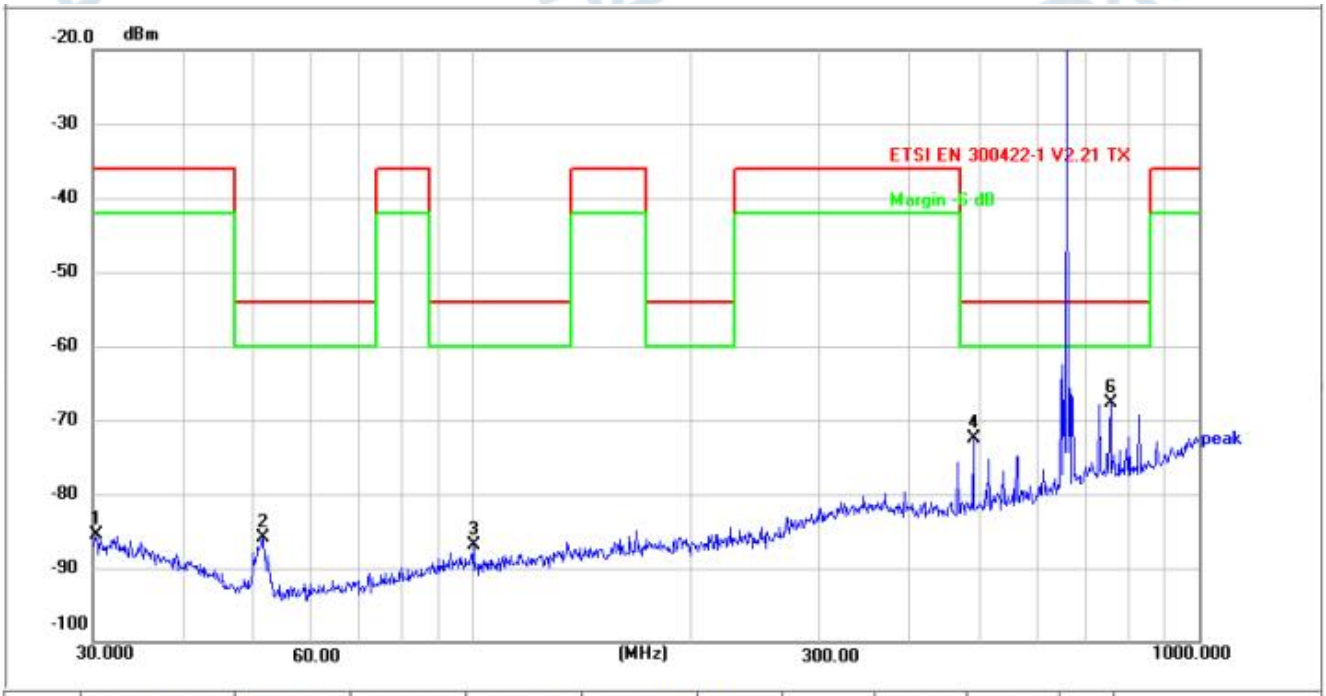
Between 30MHz – 1000MHz

TM1 / Polarization: Horizontal / CH: L



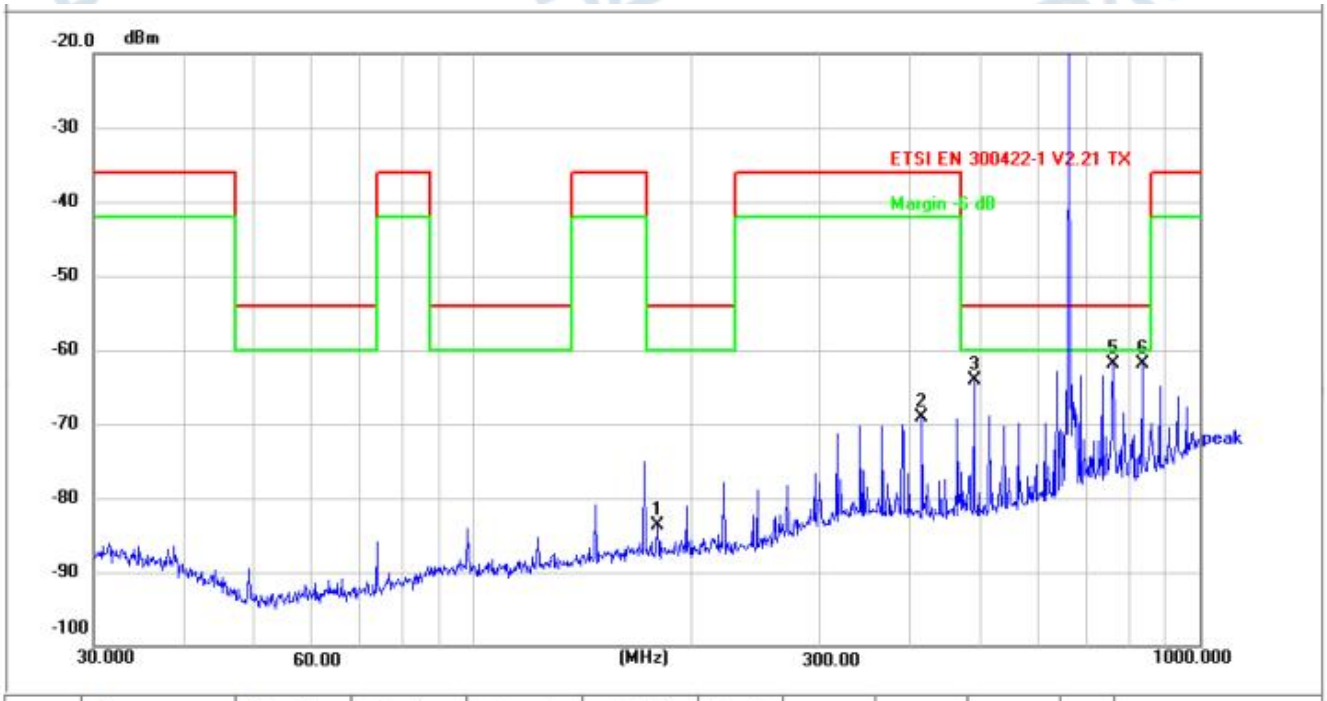
No.	Frequency (MHz)	Reading (dBm)	Factor (dB)	Level (dBm)	Limit (dBm)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	167.8243	-72.64	-3.37	-76.01	-36.00	-40.01	peak	100		P	
2	369.4047	-70.30	1.62	-68.68	-36.00	-32.68	peak	100		P	
3	489.0269	-65.90	1.73	-64.17	-54.00	-10.17	peak	100		P	
4 *	658.8362	-13.52	4.58	-8.94	-54.00	45.06	peak	100		F	
5	755.3873	-67.63	5.82	-61.81	-54.00	-7.81	peak	100		P	
6	827.4934	-68.31	6.44	-61.87	-54.00	-7.87	peak	100		P	

TM1 / Polarization: Vertical / CH: L



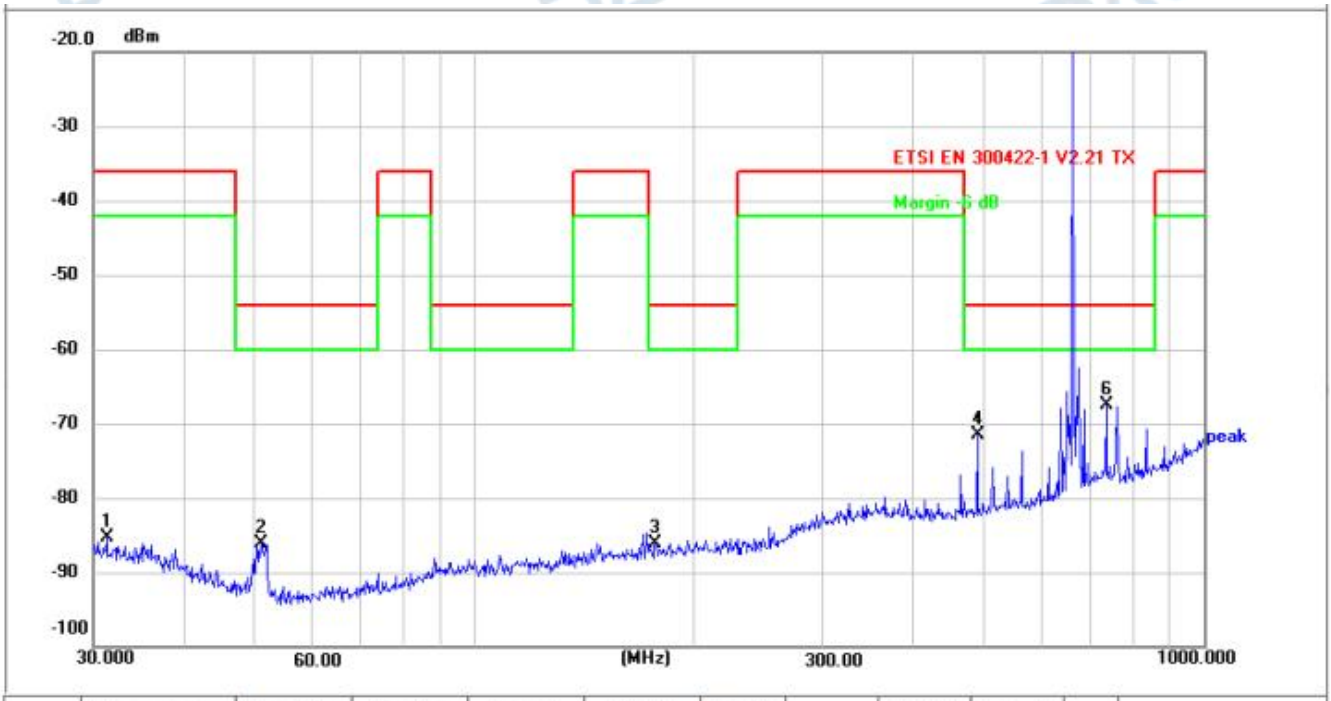
No.	Frequency (MHz)	Reading (dBm)	Factor (dB)	Level (dBm)	Limit (dBm)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	30.3173	-82.53	-2.95	-85.48	-36.00	-49.48	peak	100		P	
2	51.4807	-76.25	-9.73	-85.98	-54.00	-31.98	peak	100		P	
3	100.2286	-81.42	-5.53	-86.95	-54.00	-32.95	peak	100		P	
4	489.0269	-74.21	1.73	-72.48	-54.00	-18.48	peak	100		P	
5 *	658.8362	-12.57	3.91	-8.66	-54.00	45.34	peak	100		F	
6	755.3873	-72.57	4.91	-67.66	-54.00	-13.66	peak	100		P	

TM1 / Polarization: Horizontal / CH: M



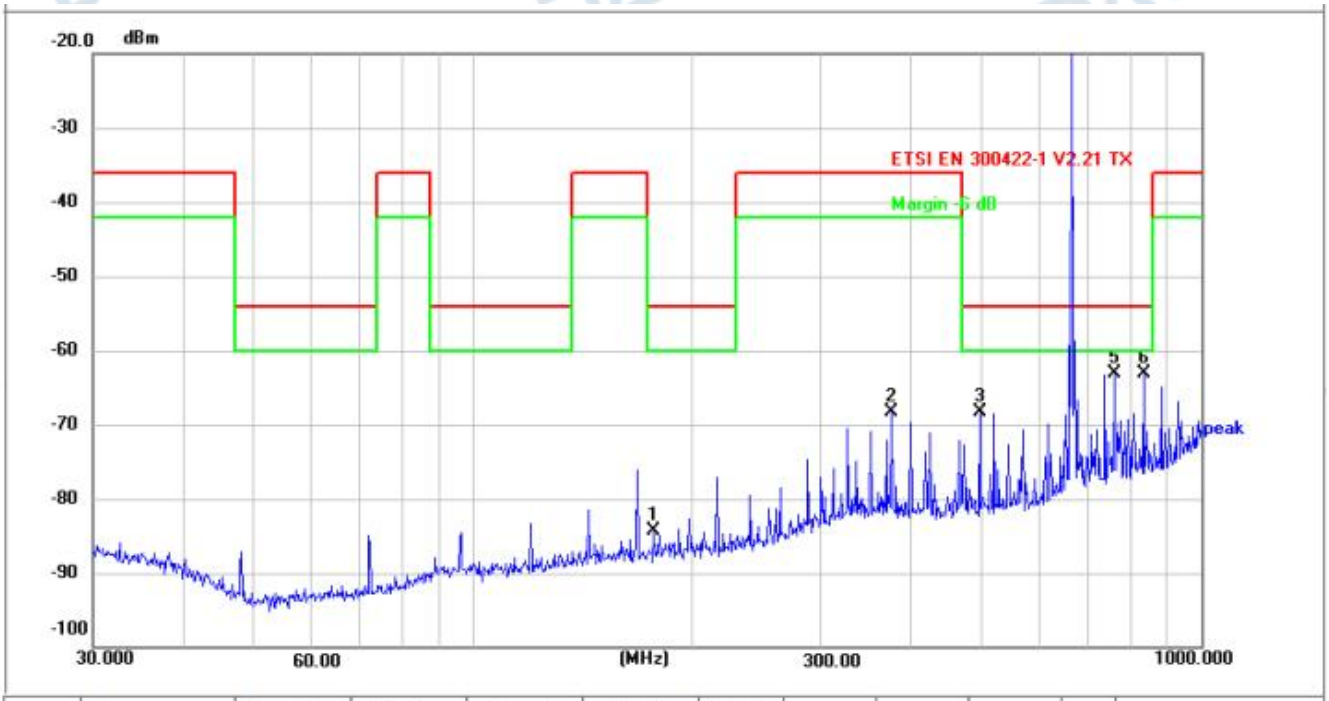
No.	Frequency (MHz)	Reading (dBm)	Factor (dB)	Level (dBm)	Limit (dBm)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	179.3863	-80.56	-3.13	-83.69	-54.00	-29.69	peak	100		P	
2	414.7223	-70.44	1.31	-69.13	-36.00	-33.13	peak	100		P	
3	489.0269	-65.91	1.73	-64.18	-54.00	-10.18	peak	100		P	
4 *	661.1505	-13.29	4.64	-8.65	-54.00	45.35	peak	100		F	
5	760.7036	-67.78	5.83	-61.95	-54.00	-7.95	peak	100		P	
6	833.3171	-68.40	6.56	-61.84	-54.00	-7.84	peak	100		P	

TM1 / Polarization: Vertical / CH: M



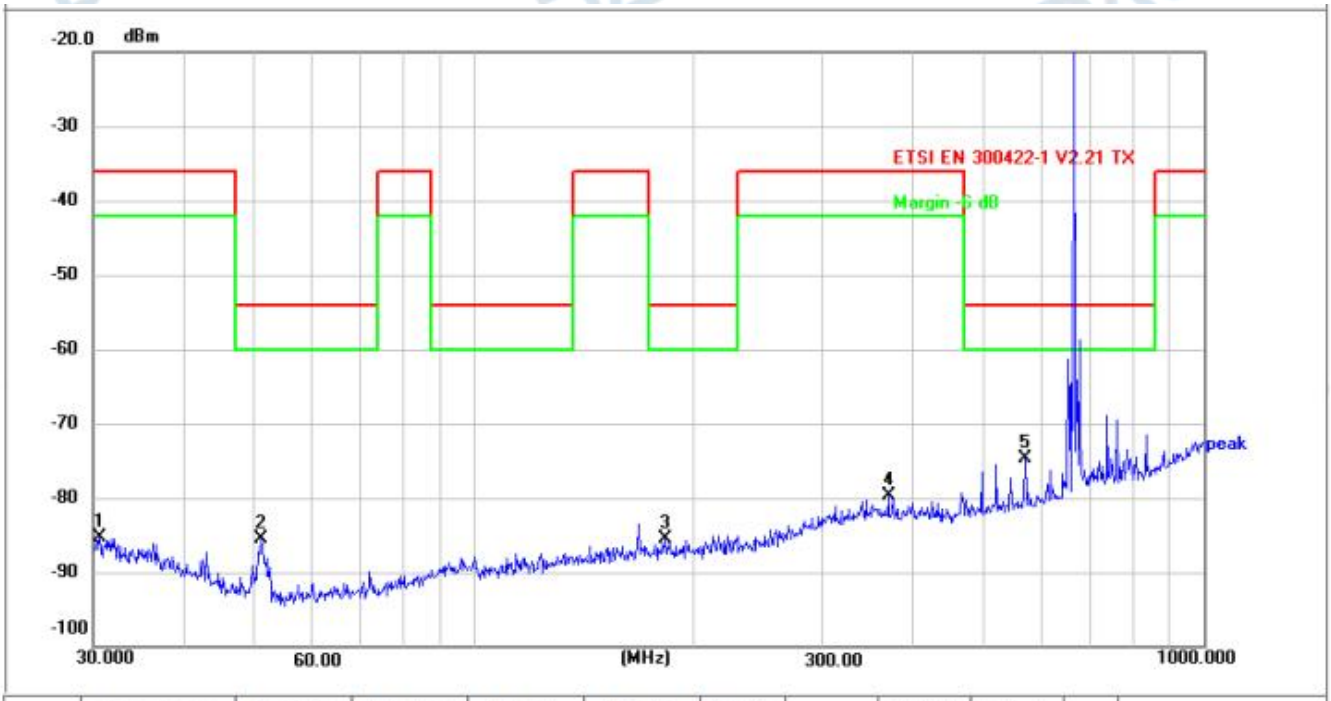
No.	Frequency (MHz)	Reading (dBm)	Factor (dB)	Level (dBm)	Limit (dBm)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	31.2893	-82.10	-3.21	-85.31	-36.00	-49.31	peak	100		P	
2	50.9420	-76.33	-9.77	-86.10	-54.00	-32.10	peak	100		P	
3	176.8878	-82.95	-3.18	-86.13	-54.00	-32.13	peak	100		P	
4	489.0269	-73.20	1.73	-71.47	-54.00	-17.47	peak	100		P	
5 *	661.1505	-12.57	3.99	-8.58	-54.00	45.42	peak	100		F	
6	734.4913	-72.46	4.99	-67.47	-54.00	-13.47	peak	100		P	

TM1 / Polarization: Horizontal / CH: H



No.	Frequency (MHz)	Reading (dBm)	Factor (dB)	Level (dBm)	Limit (dBm)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	176.8878	-81.05	-3.18	-84.23	-54.00	-30.23	peak	100		P	
2	375.9385	-69.91	1.56	-68.35	-36.00	-32.35	peak	100		P	
3	495.9344	-70.17	1.83	-68.34	-54.00	-14.34	peak	100		P	
4 *	663.4729	-13.81	4.69	-9.12	-54.00	44.88	peak	100		F	
5	760.7036	-68.95	5.83	-63.12	-54.00	-9.12	peak	100		P	
6	833.3171	-69.73	6.56	-63.17	-54.00	-9.17	peak	100		P	

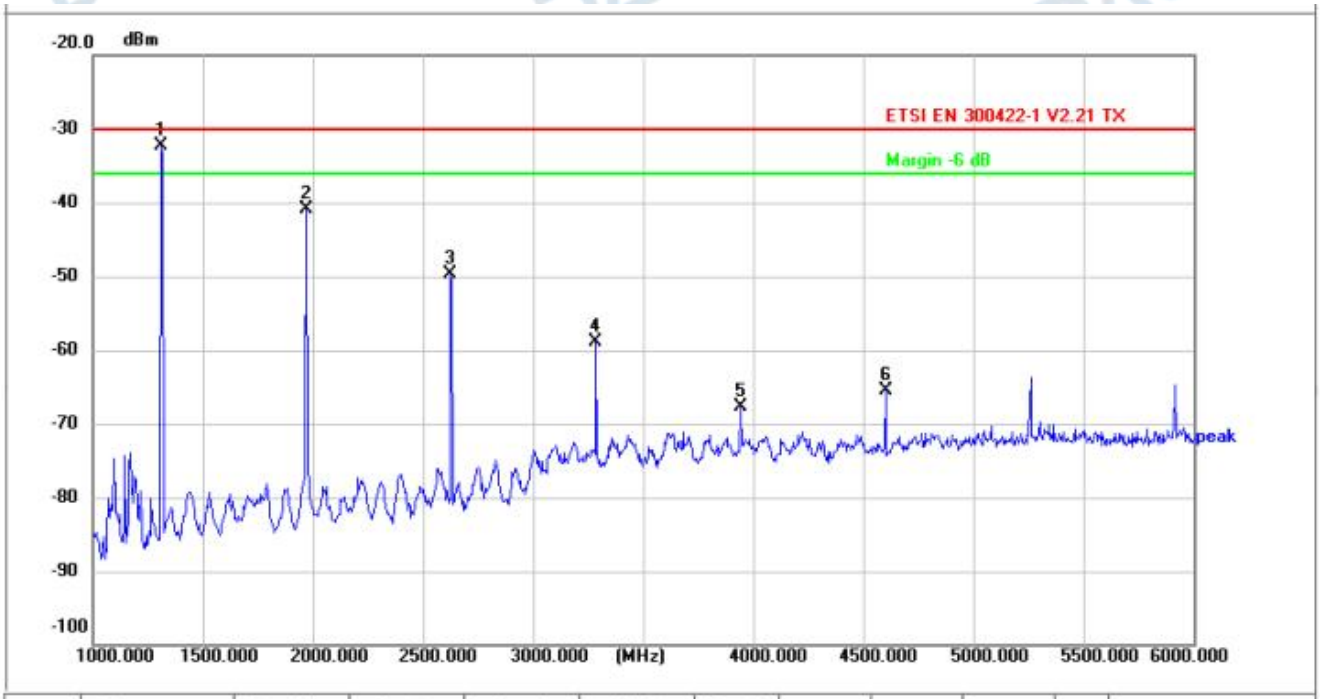
TM1 / Polarization: Vertical / CH: H



No.	Frequency (MHz)	Reading (dBm)	Factor (dB)	Level (dBm)	Limit (dBm)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	30.6379	-82.21	-3.03	-85.24	-36.00	-49.24	peak	100		P	
2	50.9420	-75.80	-9.77	-85.57	-54.00	-31.57	peak	100		P	
3	182.5592	-82.42	-3.10	-85.52	-54.00	-31.52	peak	100		P	
4	369.4047	-80.77	1.00	-79.77	-36.00	-43.77	peak	100		P	
5	568.6127	-78.39	3.59	-74.80	-54.00	-20.80	peak	100		P	
6 *	663.4729	-13.43	4.05	-9.38	-54.00	44.62	peak	100		F	

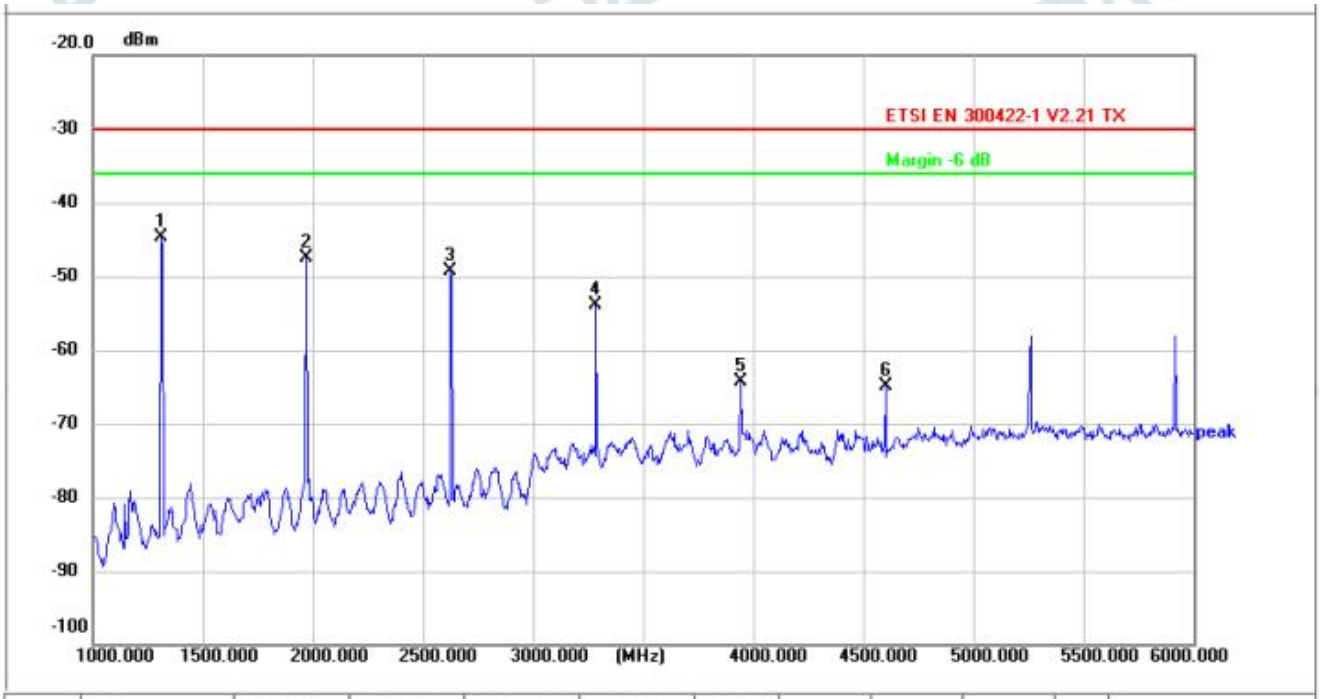
Above 1GHz

TM1 / Polarization: Horizontal / CH: L



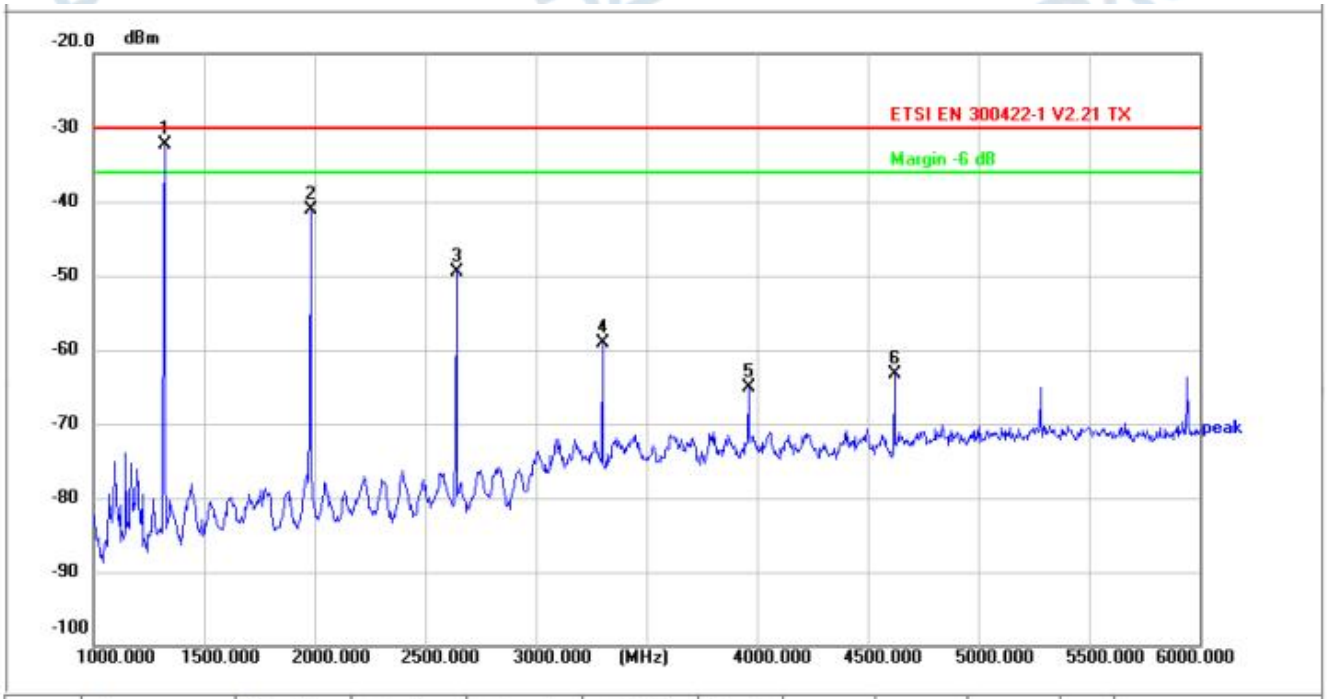
No.	Frequency (MHz)	Reading (dBm)	Factor (dB)	Level (dBm)	Limit (dBm)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1 *	1310.000	-21.68	-10.58	-32.26	-30.00	-2.26	peak	150		P	
2	1970.000	-32.97	-7.85	-40.82	-30.00	-10.82	peak	150		P	
3	2625.000	-43.49	-6.23	-49.72	-30.00	-19.72	peak	150		P	
4	3285.000	-54.20	-4.63	-58.83	-30.00	-28.83	peak	150		P	
5	3940.000	-64.75	-2.99	-67.74	-30.00	-37.74	peak	150		P	
6	4600.000	-63.93	-1.60	-65.53	-30.00	-35.53	peak	150		P	

TM1 / Polarization: Vertical / CH: L



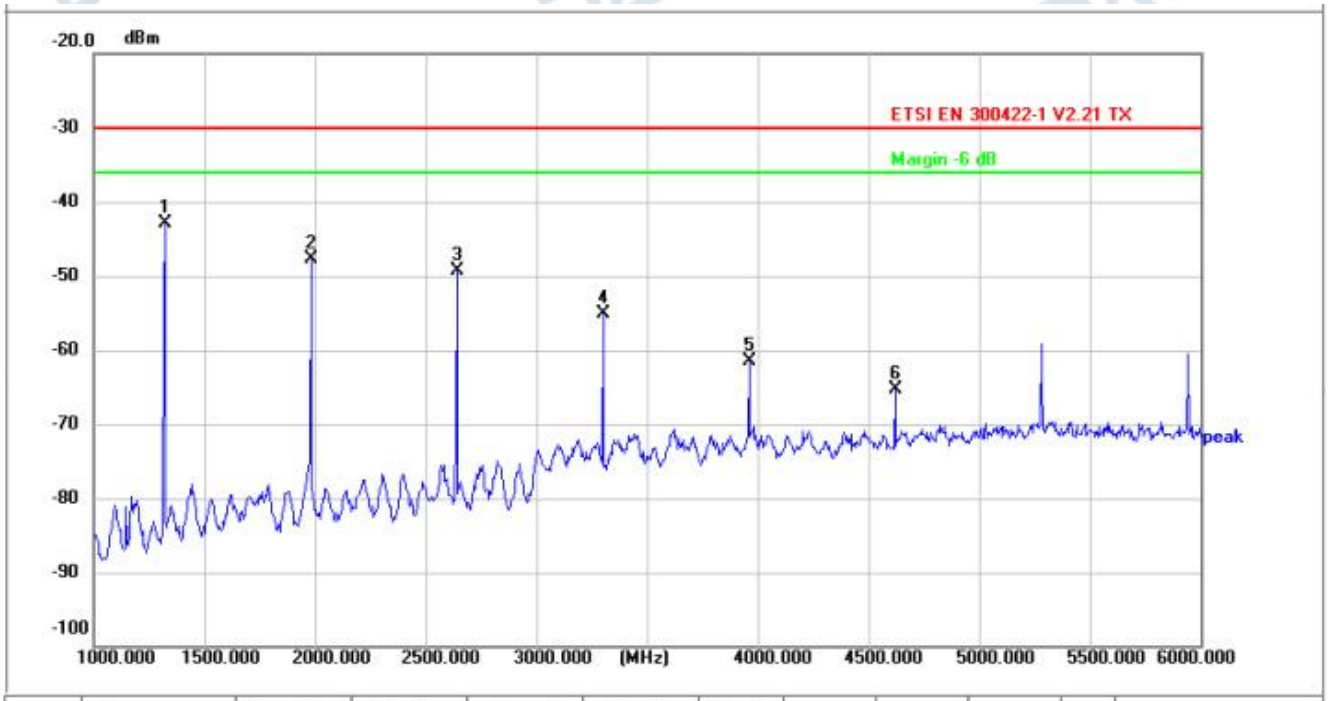
No.	Frequency (MHz)	Reading (dBm)	Factor (dB)	Level (dBm)	Limit (dBm)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1 *	1310.000	-32.80	-11.97	-44.77	-30.00	-14.77	peak	150		P	
2	1970.000	-38.00	-9.56	-47.56	-30.00	-17.56	peak	150		P	
3	2625.000	-42.24	-6.99	-49.23	-30.00	-19.23	peak	150		P	
4	3285.000	-49.08	-4.78	-53.86	-30.00	-23.86	peak	150		P	
5	3940.000	-61.10	-3.12	-64.22	-30.00	-34.22	peak	150		P	
6	4600.000	-64.00	-0.96	-64.96	-30.00	-34.96	peak	150		P	

TM1 / Polarization: Horizontal / CH: M



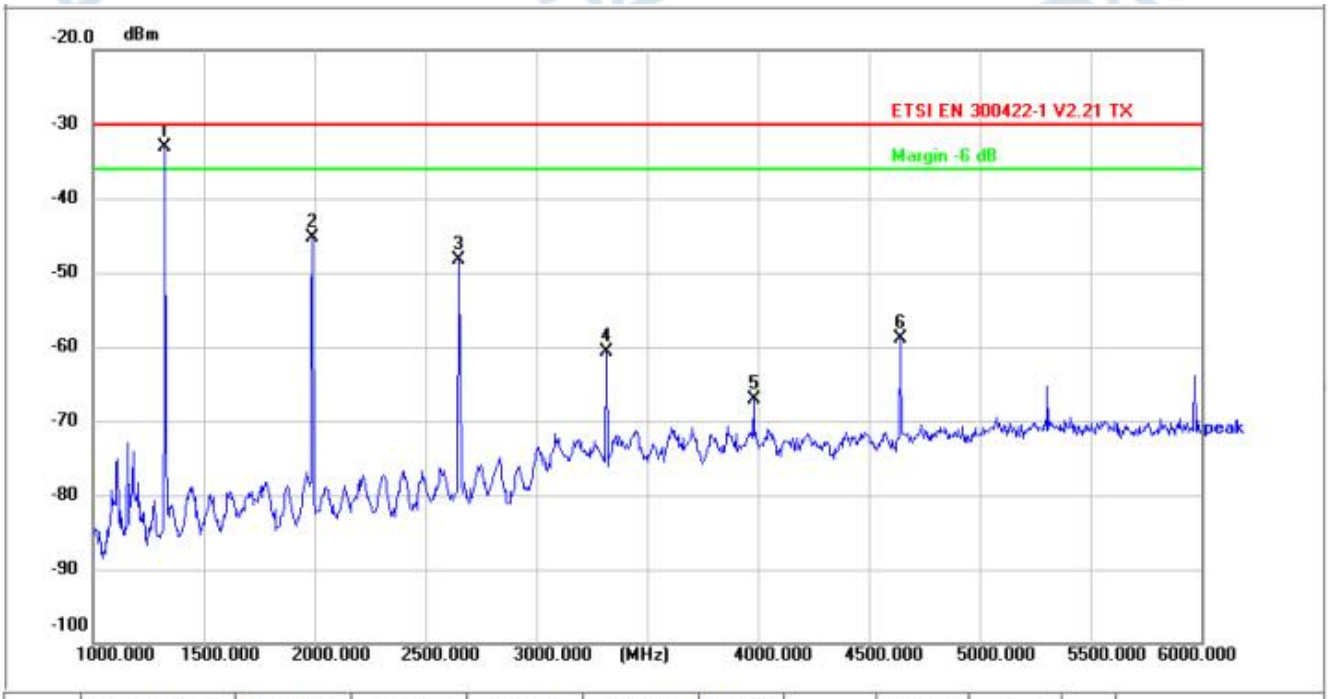
No.	Frequency (MHz)	Reading (dBm)	Factor (dB)	Level (dBm)	Limit (dBm)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1 *	1320.000	-21.70	-10.51	-32.21	-30.00	-2.21	peak	150		P	
2	1980.000	-33.37	-7.80	-41.17	-30.00	-11.17	peak	150		P	
3	2640.000	-43.21	-6.20	-49.41	-30.00	-19.41	peak	150		P	
4	3300.000	-54.48	-4.57	-59.05	-30.00	-29.05	peak	150		P	
5	3960.000	-62.14	-2.94	-65.08	-30.00	-35.08	peak	150		P	
6	4620.000	-61.82	-1.53	-63.35	-30.00	-33.35	peak	150		P	

TM1 / Polarization: Vertical / CH: M



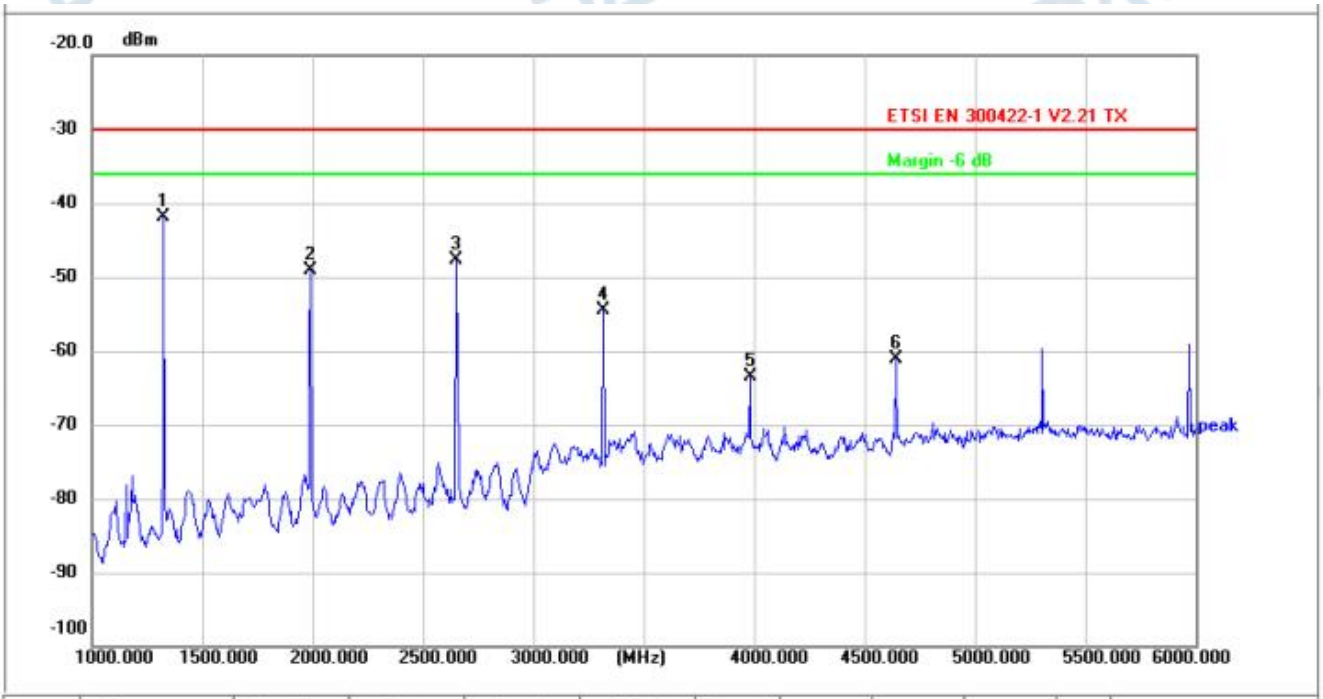
No.	Frequency (MHz)	Reading (dBm)	Factor (dB)	Level (dBm)	Limit (dBm)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1 *	1320.000	-31.03	-11.93	-42.96	-30.00	-12.96	peak	150		P	
2	1980.000	-38.08	-9.52	-47.60	-30.00	-17.60	peak	150		P	
3	2640.000	-42.37	-6.93	-49.30	-30.00	-19.30	peak	150		P	
4	3300.000	-50.32	-4.74	-55.06	-30.00	-25.06	peak	150		P	
5	3960.000	-58.46	-3.06	-61.52	-30.00	-31.52	peak	150		P	
6	4620.000	-64.32	-0.90	-65.22	-30.00	-35.22	peak	150		P	

TM1 / Polarization: Horizontal / CH: H



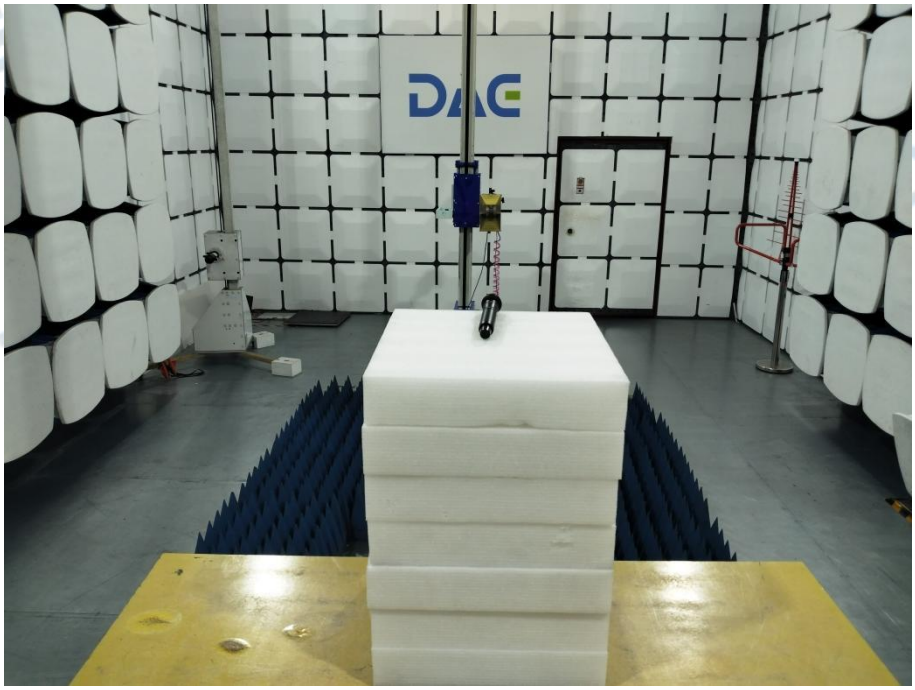
No.	Frequency (MHz)	Reading (dBm)	Factor (dB)	Level (dBm)	Limit (dBm)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1 *	1325.000	-22.55	-10.47	-33.02	-30.00	-3.02	peak	150		P	
2	1990.000	-37.49	-7.78	-45.27	-30.00	-15.27	peak	150		P	
3	2650.000	-42.21	-6.18	-48.39	-30.00	-18.39	peak	150		P	
4	3315.000	-56.25	-4.52	-60.77	-30.00	-30.77	peak	150		P	
5	3980.000	-64.12	-2.90	-67.02	-30.00	-37.02	peak	150		P	
6	4640.000	-57.45	-1.46	-58.91	-30.00	-28.91	peak	150		P	

TM1 / Polarization: Vertical / CH: H



No.	Frequency (MHz)	Reading (dBm)	Factor (dB)	Level (dBm)	Limit (dBm)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1 *	1325.000	-29.89	-11.91	-41.80	-30.00	-11.80	peak	150		P	
2	1990.000	-39.67	-9.49	-49.16	-30.00	-19.16	peak	150		P	
3	2650.000	-40.83	-6.89	-47.72	-30.00	-17.72	peak	150		P	
4	3315.000	-49.78	-4.71	-54.49	-30.00	-24.49	peak	150		P	
5	3980.000	-60.46	-3.01	-63.47	-30.00	-33.47	peak	150		P	
6	4640.000	-60.37	-0.82	-61.19	-30.00	-31.19	peak	150		P	

5 TEST SETUP PHOTOS

Emissions in frequency bands (30M-1GHz)
Emissions in frequency bands (Above 1GHz)


6 PHOTOS OF THE EUT

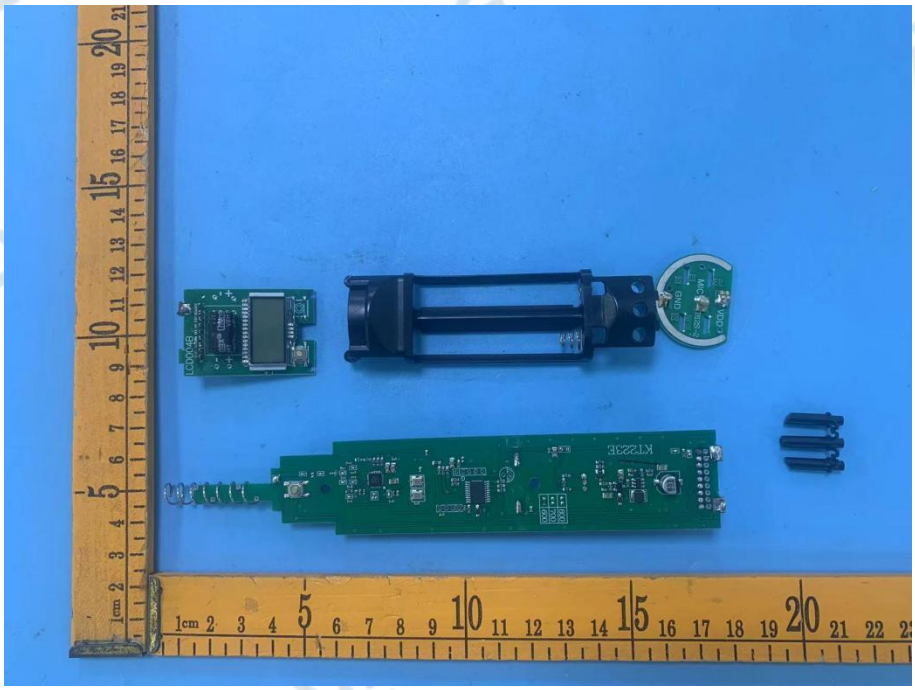
External

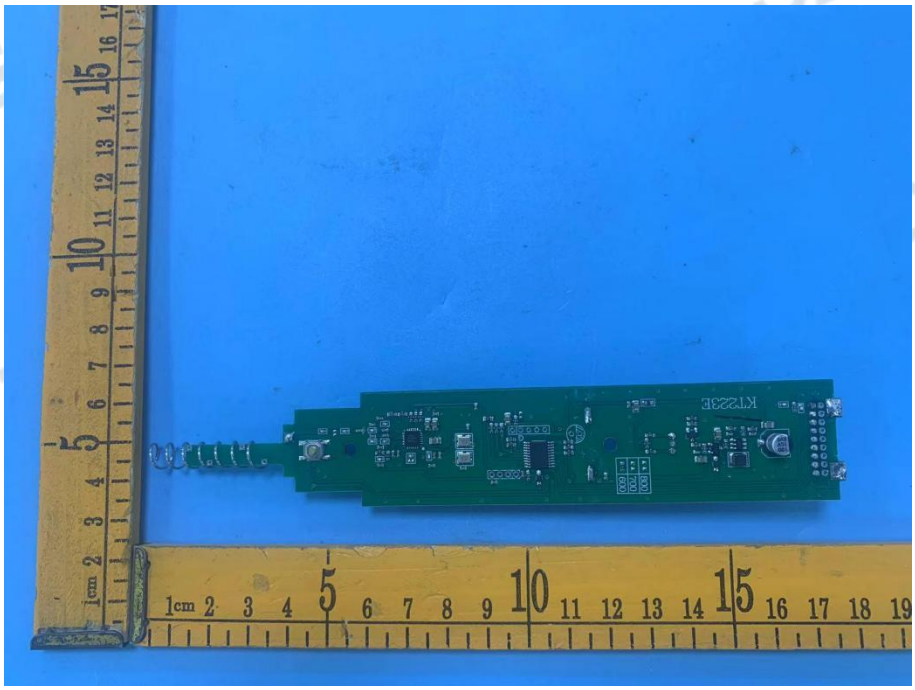
NEWBAXS

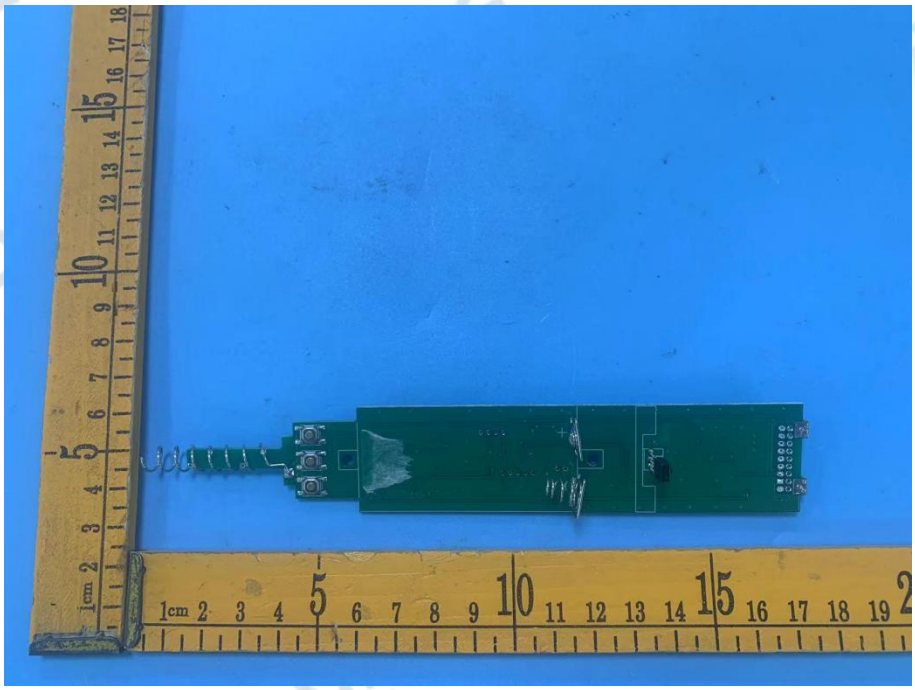
NEWBAXS

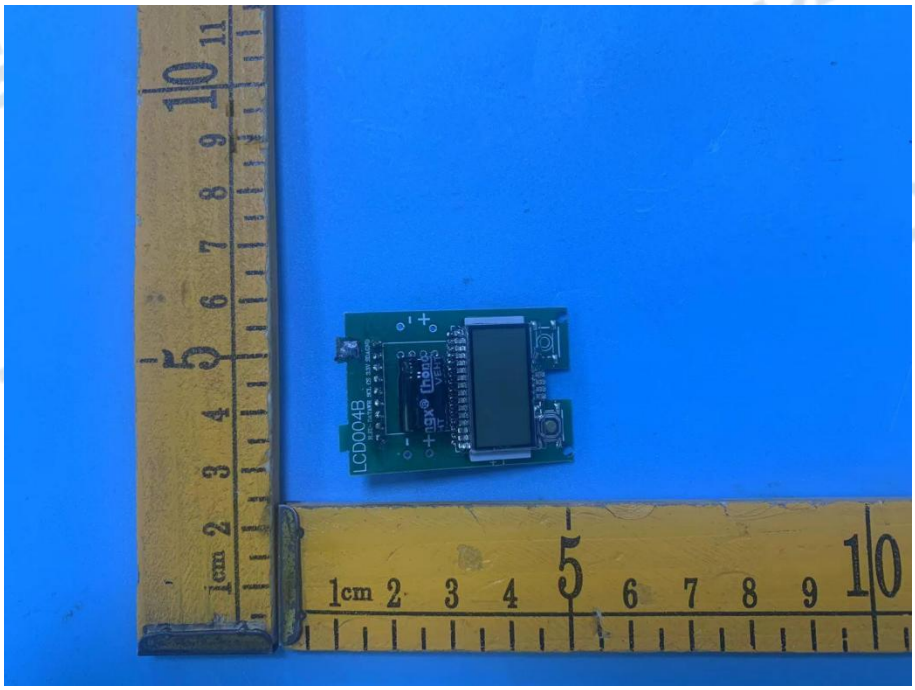
Internal

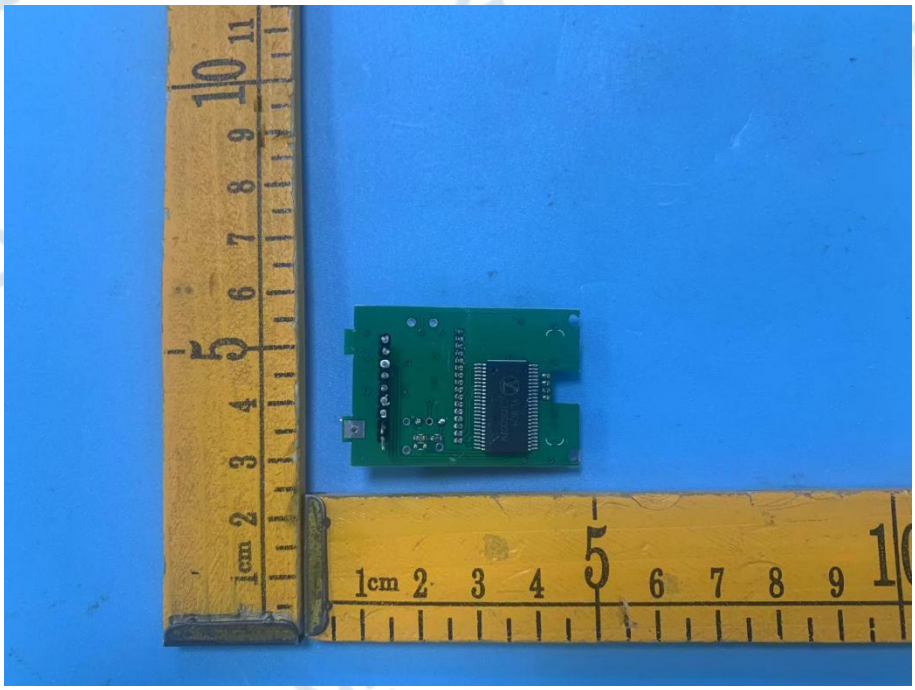
VDD
MIC
GND

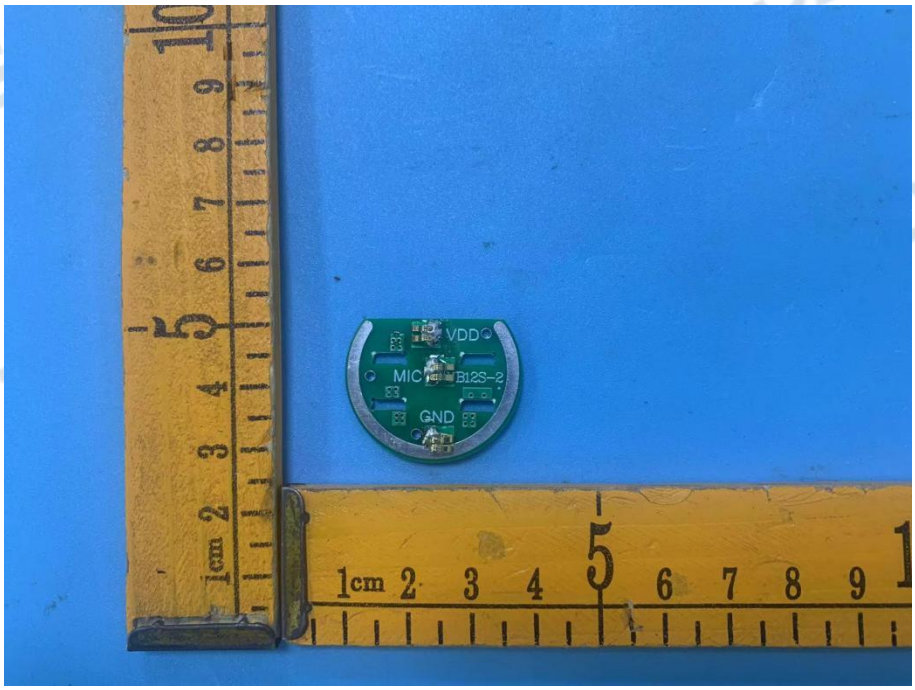







LCD004B

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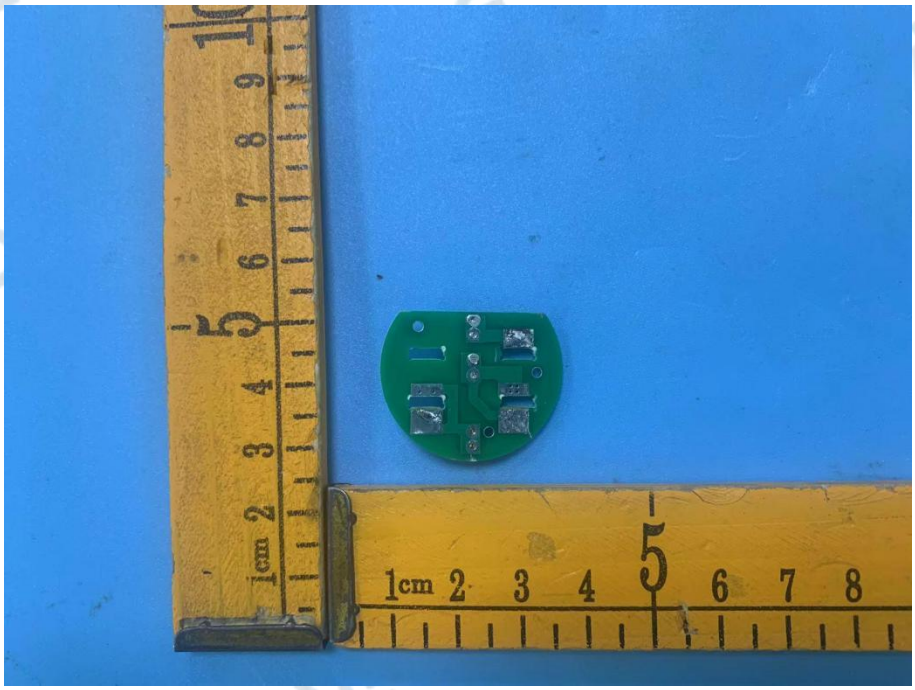
MIC
B12S-2
GND



********** End of Report **********