

TEST REPORT

Applicant: SCR (Engineers) Ltd.

Address of Applicant: 18 Hamelacha street, Poleg Industrial Zone, Netanya, 4250553, POB 8310, Israel

Manufacturer/ Factory: SCR (Engineers) Ltd.

Address of Manufacturer/ Factory: 18 Hamelacha street, Poleg Industrial Zone, Netanya, 4250553, POB 8310, Israel

Equipment Under Test (EUT)

Product Name: SenseHub Feedlot Tag

Model No.: AMUT06

Trade Mark: SenseHub™ Feedlot

FCC ID: AMUT06

Applicable standards: FCC CFR Title 47 Part 15 Subpart C Section 15.247

Date of sample receipt: October 14, 2024

Date of Test: October 15, 2024-December 19, 2024

Date of report issued: December 20, 2024

Test Result : PASS *

* In the configuration tested, the EUT complied with the standards specified above.

Authorized Signature:



Robinson Luo
Laboratory Manager

This results shown in this test report refer only to the sample(s) tested, this test report cannot be reproduced, except in full, without prior written permission of the company. The report would be invalid without specific stamp of test institute and the signatures of compiler and approver.

2 Version

Version No.	Date	Description
00	December 20, 2024	Original

Prepared By:

J. Santillo

Date:

December 20, 2024

Project Engineer

Check By:

Robinson

Date:

December 20, 2024

Reviewer

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4 Test Summary

Test Item	Section	Result
Antenna Requirement	15.203	Pass
AC Power Line Conducted Emission	15.207	Pass
Conducted Peak Output Power	15.247 (b)(2)(3)	Pass
Channel Bandwidth	15.247 (a)(1)(2)	Pass
Carrier Frequencies Separation	15.247 (a)(1)	Pass
Hopping Channel Number	15.247 (a)(1)(iii)	Pass
Dwell Time	15.247(a)(1)(i)	Pass
Radiated Emission	15.205/15.209	Pass
Band Edge	15.247(d)	Pass

Pass: The EUT complies with the essential requirements in the standard.

Remark : Test according to ANSI C63.10:2013.

4.1 Measurement Uncertainty

No.	Item	Measurement Uncertainty
1	Radio Frequency	$\pm 7.25 \times 10^{-8}$
2	Duty cycle	$\pm 0.37\%$
3	Occupied Bandwidth	$\pm 3\%$
4	RF conducted power	$\pm 0.75\text{dB}$
5	RF power density	$\pm 3\text{dB}$
6	Conducted Spurious emissions	$\pm 2.58\text{dB}$
7	AC Power Line Conducted Emission	$\pm 3.44\text{dB}$ (0.15MHz~30MHz)
8	Radiated Spurious emission test	$\pm 3.1\text{dB}$ (9kHz-30MHz)
		$\pm 3.8039\text{dB}$ (30MHz-200MHz)
		$\pm 3.9679\text{dB}$ (200MHz-1GHz)
		$\pm 4.29\text{dB}$ (1GHz-18GHz)
		$\pm 3.30\text{dB}$ (18GHz-40GHz)
9	Temperature test	$\pm 1^\circ\text{C}$
10	Humidity test	$\pm 3\%$
11	Time	$\pm 3\%$

5 General Information

5.1 General Description of EUT

Product Name:	SenseHub Feedlot Tag
Model No.:	AMUT06
S/ N:	N/A
Software Version:	V1.2.0
Test sample(s) ID:	GTS2024100125-1
Sample(s) Status	Engineer sample
Operation Frequency:	902.3MHz~914.9MHz
Channel numbers:	64
Channel separation:	200kHz
Modulation technology:	FHSS
Modulation type:	LORA
Antenna Type:	PCB Antenna
Antenna gain:	-6.7dBi
Power supply:	DC 3V 420mAh 1.26Wh

Remark:

1. Antenna gain information provided by the customer
2. The relevant information of the sample is provided by the entrusting company, and the laboratory is not responsible for its authenticity.

The test frequencies are below:

Channel	Frequency(MHz)
The lowest channel	902.3
The middle channel	906
The Highest channel	914.9

Operation Frequency each of channel							
Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)
1	902.3	17	905.5	33	908.7	49	911.9
2	902.5	18	905.7	34	908.9	50	912.1
3	902.7	19	905.9	35	909.1	51	912.3
4	902.9	20	906.1	36	909.3	52	912.5
5	903.1	21	906.3	37	909.5	53	912.7
6	903.3	22	906.5	38	909.7	54	912.9
7	903.5	23	906.7	39	909.9	55	913.1
8	903.7	24	906.9	40	910.1	56	913.3
9	903.9	25	907.1	41	910.3	57	913.5
10	904.1	26	907.3	42	910.5	58	913.7
11	904.3	27	907.5	43	910.7	59	913.9
12	904.5	28	907.7	44	910.9	60	914.1
13	904.7	29	907.9	45	911.1	61	914.3
14	904.9	30	908.1	46	911.3	62	914.5
15	905.1	31	908.3	47	911.5	63	914.7
16	905.3	32	908.5	48	911.7	64	914.9

5.2 Test mode

Transmitting mode	Keep the EUT in transmitting mode.
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5.3 Test Facility

The test facility is recognized, certified, or accredited by the following organizations:

- **FCC —Registration No.: 381383**

Designation Number: CN5029

Global United Technology Services Co., Ltd., Shenzhen EMC Laboratory has been registered and fully described in a report filed with the (FCC) Federal Communications Commission. The acceptance letter from the FCC is maintained in files.

- **ISED —Registration No.: 9079A**

CAB identifier: CN0091

The 3m Semi-anechoic chamber of Global United Technology Services Co., Ltd. has been registered by Certification and Engineering Bureau of ISED for radio equipment testing.

- **NVLAP (LAB CODE:600179-0)**

Global United Technology Services Co., Ltd., is accredited by the National Voluntary Laboratory Accreditation Program (NVLAP).

5.4 Test Location

All other tests were performed at:

Global United Technology Services Co., Ltd.

Address: No. 123-128, Tower A, Jinyuan Business Building, No.2, Laodong Industrial Zone, Xixiang Road, Baoan District, Shenzhen, Guangdong, China 518102

Tel: 0755-27798480

Fax: 0755-27798960

5.5 Description of Support Units

None.

5.6 Deviation from Standards

None.

5.7 Abnormalities from Standard Conditions

None.

5.8 Additional Instructions

Test Software	Special test command provided by manufacturer
Power level setup	Default

6 Test Instruments list

Radiated Emission:						
Item	Test Equipment	Manufacturer	Model No.	Inventory No.	Cal.Date (mm-dd-yy)	Cal.Due date (mm-dd-yy)
1	3m Semi- Anechoic Chamber	ZhongYu Electron	9.2(L)*6.2(W)* 6.4(H)	GTS250	Jun. 22, 2024	Jun. 21, 2027
2	Control Room	ZhongYu Electron	6.2(L)*2.5(W)* 2.4(H)	GTS251	N/A	N/A
3	EMI Test Receiver	Rohde & Schwarz	ESU26	GTS203	Apr. 11, 2024	Apr. 10, 2025
4	BiConiLog Antenna	SCHWARZBECK MESS-ELEKTRONIK	VULB9168	GTS640	Mar. 19, 2023	Mar. 18, 2025
5	Double -ridged waveguide horn	SCHWARZBECK MESS-ELEKTRONIK	BBHA 9120 D	GTS208	Apr. 17, 2023	Apr. 16, 2025
6	Wideband Radio Communication Tester	Rohde & Schwarz	CMW500	GTS575	Apr. 11, 2024	Apr. 10, 2025
7	Loop Antenna	ZHINAN	ZN30900A	GTS534	Nov.12, 2024	Nov.11, 2025
8	Broadband Preamplifier	SCHWARZBECK	BBV9718	GTS535	Apr. 11, 2024	Apr. 10, 2025
9	Amplifier(1GHz-26.5GHz)	HP	8449B	GTS601	Apr. 11, 2024	Apr. 10, 2025
10	Horn Antenna (15GH-40GHz)	SCHWARZBECK	01296	GTS691	Mar. 07, 2024	Mar. 06, 2025
11	FSV·Signal Analyzer (10Hz-40GHz)	Keysight	FSV-40-N	GTS666	Mar. 12, 2024	Mar. 11, 2025
12	Amplifier	/	LNA-1000-30S	GTS650	Apr. 11, 2024	Apr. 10, 2025
13	CDNE M2+M3-16A	HCT	30MHz-300MHz	GTS692	Nov. 07, 2024	Nov. 06, 2025
14	Wideband Amplifier	/	WDA-01004000-15P35	GTS602	Apr. 11, 2024	Apr. 10, 2025
15	Thermo meter	JINCHUANG	GSP-8A	GTS643	Apr. 18, 2024	Apr. 17, 2025
16	RE cable 1	GTS	N/A	GTS675	Jul. 02, 2024	Jul. 01, 2025
17	RE cable 2	GTS	N/A	GTS676	Jul. 02, 2024	Jul. 01, 2025
18	RE cable 3	GTS	N/A	GTS677	Jul. 02, 2024	Jul. 01, 2025
19	RE cable 4	GTS	N/A	GTS678	Jul. 02, 2024	Jul. 01, 2025
20	RE cable 5	GTS	N/A	GTS679	Jul. 02, 2024	Jul. 01, 2025
21	RE cable 6	GTS	N/A	GTS680	Jul. 02, 2024	Jul. 01, 2025
22	RE cable 7	GTS	N/A	GTS681	Jul. 05, 2024	Jul. 04, 2025
23	RE cable 8	GTS	N/A	GTS682	Jul. 05, 2024	Jul. 04, 2025
24	EMI Test Software	AUDIX	E3-6.100614a	GTS725	N/A	N/A

RF Conducted Test:						
Item	Test Equipment	Manufacturer	Model No.	Serial No.	Cal.Date (mm-dd-yy)	Cal.Due date (mm-dd-yy)
1	MXA Signal Analyzer	Agilent	N9020A	GTS566	Apr. 13, 2024	Apr. 12, 2025
2	EMI Test Receiver	R&S	ESCI 7	GTS552	Apr. 13, 2024	Apr. 12, 2025
3	PSA Series Spectrum Analyzer	Agilent	E4440A	GTS536	Apr. 13, 2024	Apr. 12, 2025
4	MXG vector Signal Generator	Agilent	N5182A	GTS567	Apr. 13, 2024	Apr. 12, 2025
5	ESG Analog Signal Generator	Agilent	E4428C	GTS568	Apr. 13, 2024	Apr. 12, 2025
6	USB RF Power Sensor	DARE	RPR3006W	GTS569	Apr. 13, 2024	Apr. 12, 2025
7	RF Switch Box	Shongyi	RFSW3003328	GTS571	Apr. 13, 2024	Apr. 12, 2025
8	Programmable Constant Temp & Humi Test Chamber	WEWON	WHTH-150L-40-880	GTS572	Apr. 13, 2024	Apr. 12, 2025
9	Thermo meter	JINCHUANG	GSP-8A	GTS641	Apr. 18, 2024	Apr. 17, 2025
10	EXA Signal Analyzer	Keysight	N9010B	MY60241168	Nov. 02, 2024	Nov. 01, 2025

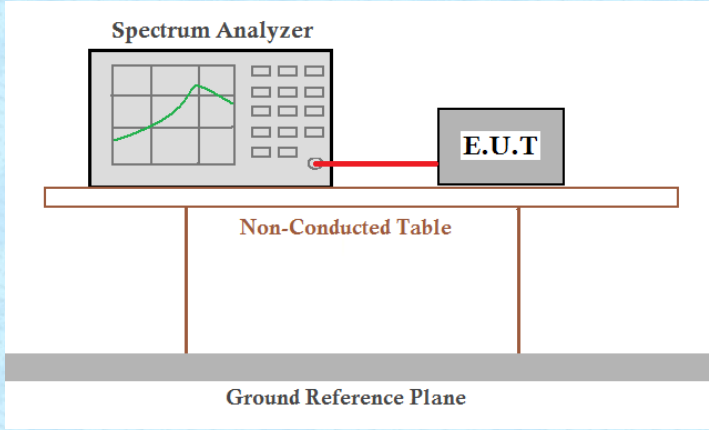
General used equipment:						
Item	Test Equipment	Manufacturer	Model No.	Inventory No.	Cal.Date (mm-dd-yy)	Cal.Due date (mm-dd-yy)
1	Barometer	KUMAO	SF132	GTS647	Apr. 18, 2024	Apr. 17, 2025

7 Test results and Measurement Data

7.1 Antenna requirement

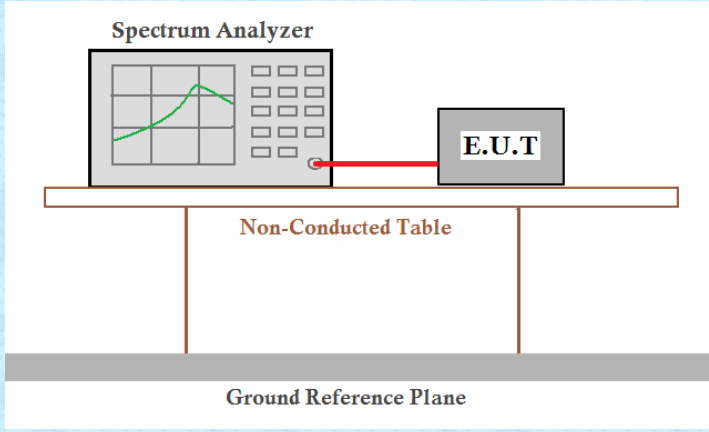
Standard requirement:	FCC Part15 C Section 15.203
15.203 requirement: An intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device. The use of a permanently attached antenna or of an antenna that uses a unique coupling to the intentional radiator, the manufacturer may design the unit so that a broken antenna can be replaced by the user, but the use of a standard antenna jack or electrical connector is prohibited.	
EUT Antenna:	
The antenna is PCB antenna, reference to the appendix II for details.	

7.2 Conducted Peak Output Power

Test Requirement:	FCC Part15 C Section 15.247(b)(2)(3)
Test Method:	ANSI C63.10:2013
Limit:	30dBm
Test setup:	 The diagram illustrates the test setup. A Spectrum Analyzer, shown with a green trace on its screen, is connected to an E.U.T. (Equipment Under Test) by a red cable. Both the Spectrum Analyzer and the E.U.T. are positioned on a table labeled 'Non-Conducted Table'. This table is supported by a 'Ground Reference Plane'.
Test Instruments:	Refer to section 6.0 for details
Test mode:	Refer to section 5.2 for details
Test results:	Pass

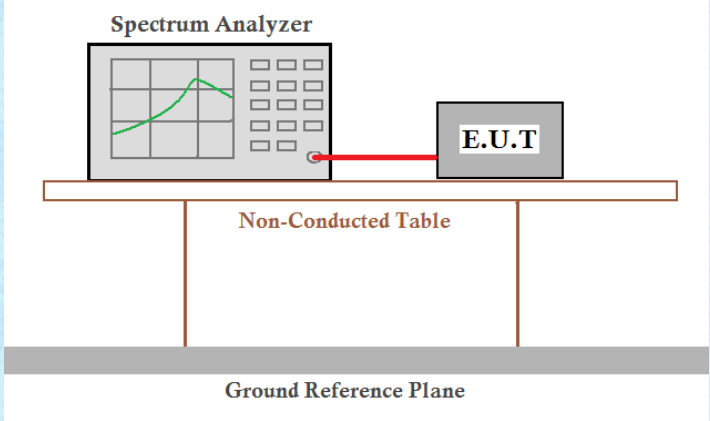
Measurement Data: The detailed test data see Appendix.

7.3 Channel Bandwidth

Test Requirement:	FCC Part15 C Section 15.247 (a)(1)(2)
Test Method:	ANSI C63.10:2013
Limit:	N/A
Test setup:	 The diagram illustrates the test setup. A Spectrum Analyzer, shown with a green trace on its screen, is connected to an E.U.T. (Equipment Under Test) box by a red cable. Both the Spectrum Analyzer and the E.U.T. are positioned on a light-colored rectangular surface labeled 'Non-Conducted Table'. This table is supported by two vertical legs and sits on a thick grey horizontal bar labeled 'Ground Reference Plane'.
Test Instruments:	Refer to section 6.0 for details
Test mode:	Refer to section 5.2 for details
Test results:	Pass

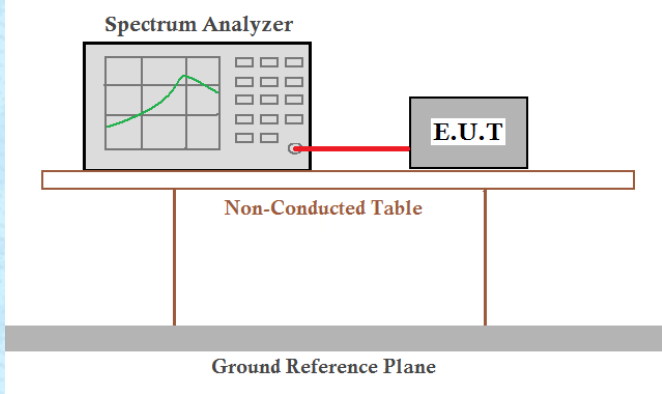
Measurement Data: The detailed test data see Appendix.

7.4 Carrier Frequencies Separation

Test Requirement:	FCC Part15 C Section 15.247 (a)(1)
Test Method:	ANSI C63.10:2013
Receiver setup:	RBW=51KHz, VBW=150KHz, detector=Peak
Limit:	0.025MHz or 20dB bandwidth (whichever is greater)
Test setup:	 The diagram illustrates the test setup. A Spectrum Analyzer is connected to an E.U.T. (Equipment Under Test) via a red cable. Both the Spectrum Analyzer and the E.U.T. are placed on a Non-Conducted Table. Below the table is a Ground Reference Plane.
Test Instruments:	Refer to section 6.0 for details
Test mode:	Refer to section 5.2 for details
Test results:	Pass

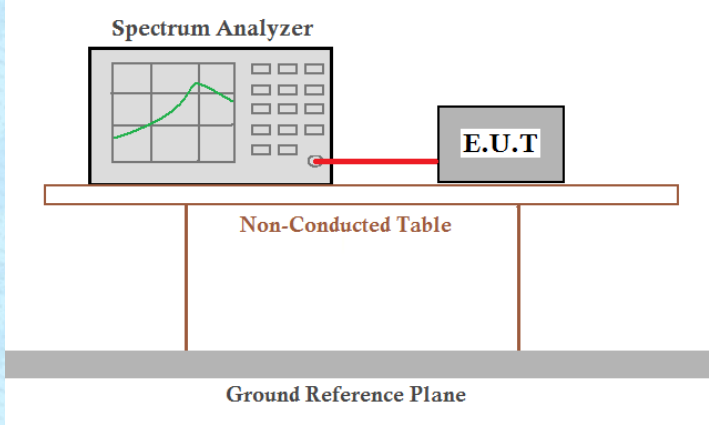
Measurement Data: The detailed test data see Appendix.

7.5 Hopping Channel Number

Test Requirement:	FCC Part15 C Section 15.247 (a)(1)(iii)
Test Method:	ANSI C63.10:2013
Receiver setup:	RBW=47kHz, VBW=150kHz, Frequency range=902MHz-928MHz, Detector=Peak
Limit:	Report for Use
Test setup:	 The diagram illustrates the test setup. A Spectrum Analyzer is connected to an E.U.T. (Equipment Under Test) via a red cable. Both the Spectrum Analyzer and the E.U.T. are placed on a Non-Conducted Table. The table is supported by a Ground Reference Plane.
Test Instruments:	Refer to section 6.0 for details
Test mode:	Refer to section 5.2 for details
Test results:	Pass

Measurement Data: The detailed test data see Appendix.

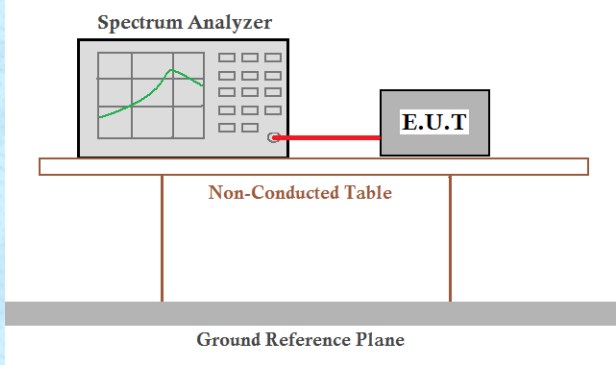
7.6 Dwell Time

Test Requirement:	FCC Part15 C Section 15.247(a)(1)(i)
Test Method:	ANSI C63.10:2013
Receiver setup:	RBW=100KHz, VBW=100KHz, Span=0Hz, Detector=Peak
Limit:	0.4 Second
Test setup:	 The diagram illustrates the test setup. A Spectrum Analyzer is connected to an E.U.T. (Equipment Under Test) via a red cable. Both the Spectrum Analyzer and the E.U.T. are placed on a Non-Conducted Table. The table is supported by a Ground Reference Plane.
Test Instruments:	Refer to section 6.0 for details
Test mode:	Refer to section 5.2 for details
Test results:	Pass

Measurement Data: The detailed test data see Appendix.

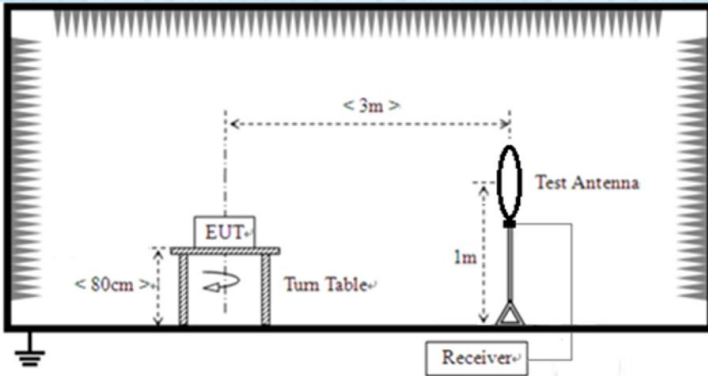
7.7 Spurious Emission

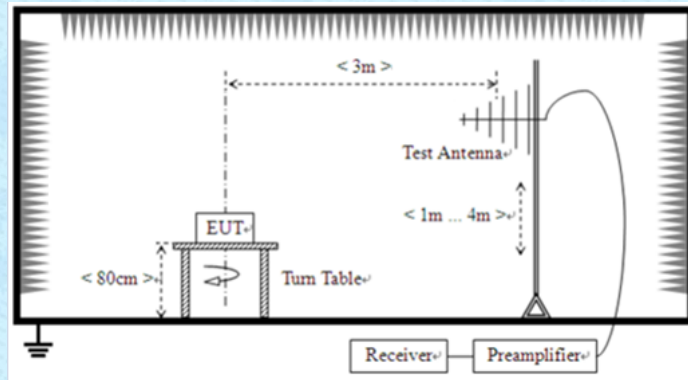
7.7.1 Conducted Emission Method

Test Requirement:	FCC Part15 C Section 15.247 (d)
Test Method:	ANSI C63.10:2013
Receiver setup:	RBW=100kHz, VBW=300kHz, Detector=Peak
Limit:	In any 100 kHz bandwidth outside the frequency band in which the spread spectrum 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.
Test setup:	 The diagram illustrates the test setup. A Spectrum Analyzer is connected to an E.U.T. (Equipment Under Test) via a red cable. Both the Spectrum Analyzer and the E.U.T. are placed on a table labeled 'Non-Conducted Table'. This table is supported by a 'Ground Reference Plane'.
Test Instruments:	Refer to section6.0 for details
Test mode:	Refer to section 5.2 for details
Test results:	Pass

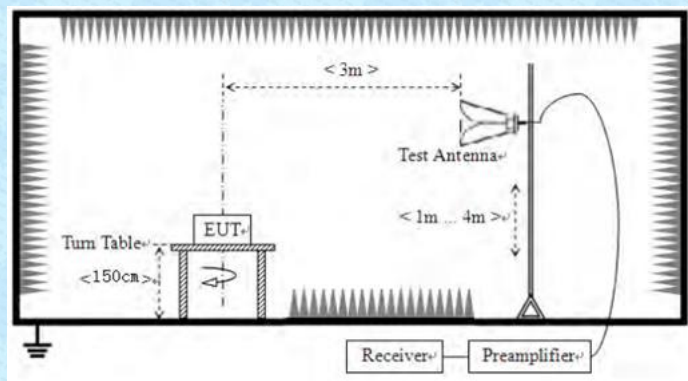
Measurement Data: The detailed test data see Appendix.

7.7.2 Radiated Emission Method

Test Requirement:	FCC Part15 C Section 15.209 and 15.205				
Test Method:	ANSI C63.10:2013				
Test Frequency Range:	9kHz to 18GHz				
Test site:	Measurement Distance: 3m				
Receiver setup:	Frequency	Detector	RBW	VBW	Value
	9KHz-150KHz	Quasi-peak	200Hz	600Hz	Quasi-peak
	150KHz-30MHz	Quasi-peak	9KHz	30KHz	Quasi-peak
	30MHz-1GHz	Quasi-peak	120KHz	300KHz	Quasi-peak
	Above 1GHz	Peak	1MHz	3MHz	Peak
		Peak	1MHz	10Hz	Average
Limit: (Spurious Emissions)	Frequency	Limit (uV/m)	Value	Measurement Distance	
	0.009MHz-0.490MHz	2400/F(KHz)	QP/PK/AV	300m	
	0.490MHz-1.705MHz	24000/F(KHz)	QP	300m	
	1.705MHz-30MHz	30	QP	30m	
	30MHz-88MHz	100	QP	3m	
	88MHz-216MHz	150	QP		
	216MHz-960MHz	200	QP		
	960MHz-1GHz	500	QP		
	Above 1GHz	500	Average		
		5000	Peak		
Test setup:	Below 30MHz				
					
	Below 1GHz				



Above 1GHz



Test Procedure:

1. The EUT was placed on the top of a rotating table (0.8 meters for below 1GHz and 1.5meters for above 1GHz) above the ground at a 3 meter camber. The table was rotated 360 degrees to determine the position of the highest radiation.
2. The EUT was set 3 meters away from the interference-receiving antenna, which was mounted on the top of a variable-height antenna tower.
3. The antenna height is varied from one meter to four meters above the ground to determine the maximum value of the field strength. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
4. For each suspected emission, the EUT was arranged to its worst case and then the antenna was tuned to heights from 1 meter to 4 meters and the rota table was turned from 0 degrees to 360 degrees to find the maximum reading.
5. The test-receiver system was set to Peak Detect Function and Specified Bandwidth with Maximum Hold Mode.
6. If the emission level of the EUT in peak mode was 10dB lower than the limit specified, then testing could be stopped and the peak values of the EUT would be reported. Otherwise the emissions that did not have 10dB margin would be re-tested one by one using peak, quasi-peak or average method as specified and then reported in a data sheet.

Test Instruments:

Refer to section 5.8 for details

Test mode:

Refer to section 5.2 for details

Temp. / Hum.

Temp.:

25 °C

Humid.:

52%

Press.:

1 012mbar

Test results:

Pass

Test voltage:

DC 3V

Remark:

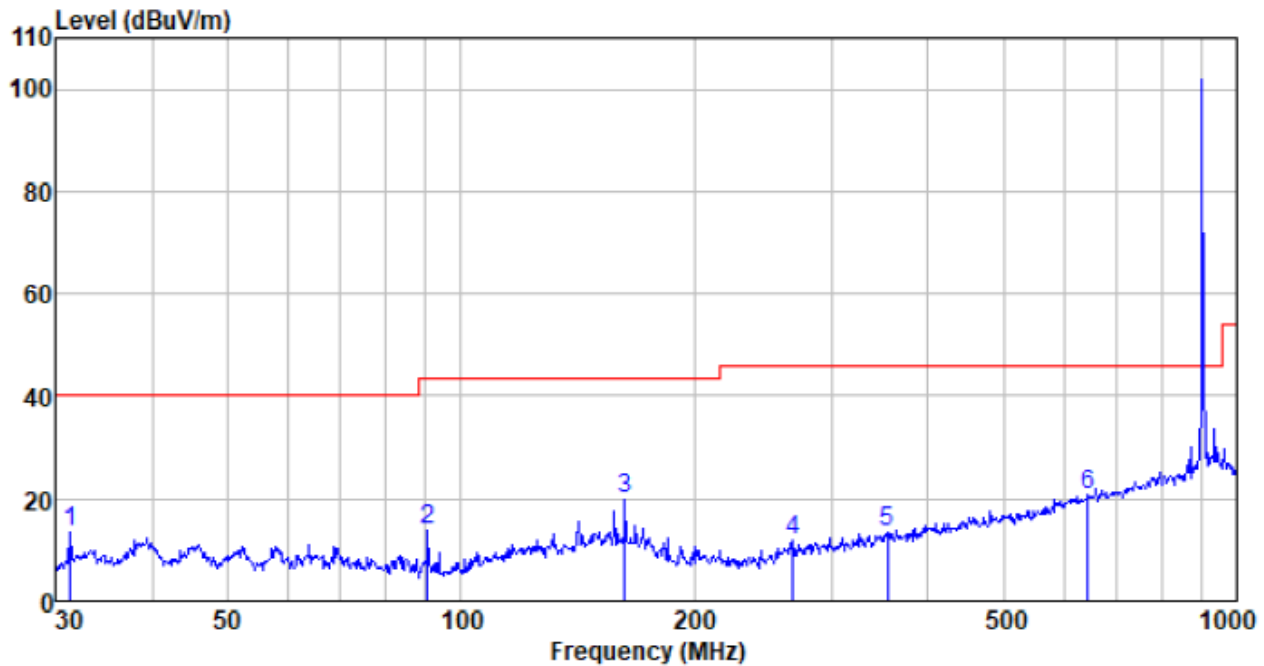
1. Pre-scan all kind of the place mode (X-axis, Y-axis, Z-axis), and found the Y-axis which it is worse case.

Measurement data:**■ Below 30MHz**

The low frequency, which started from 9 kHz to 30 MHz, was pre-scanned and the result which was 20 dB lower than the limit line per 15.31(o) was not reported.

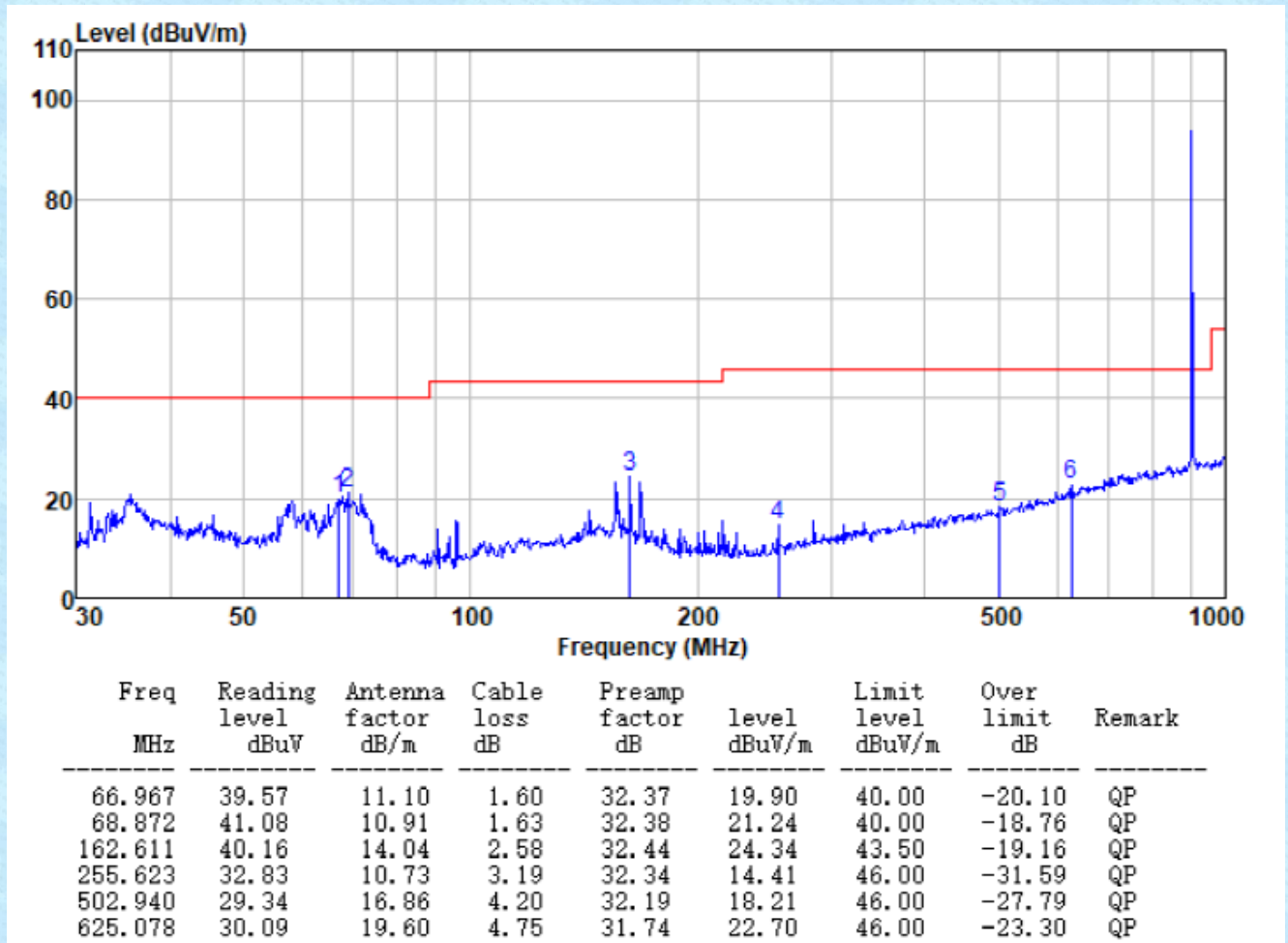
■ 30MHz ~ 1GHz

Test channel:	Lowest	Polarization:	Horizontal
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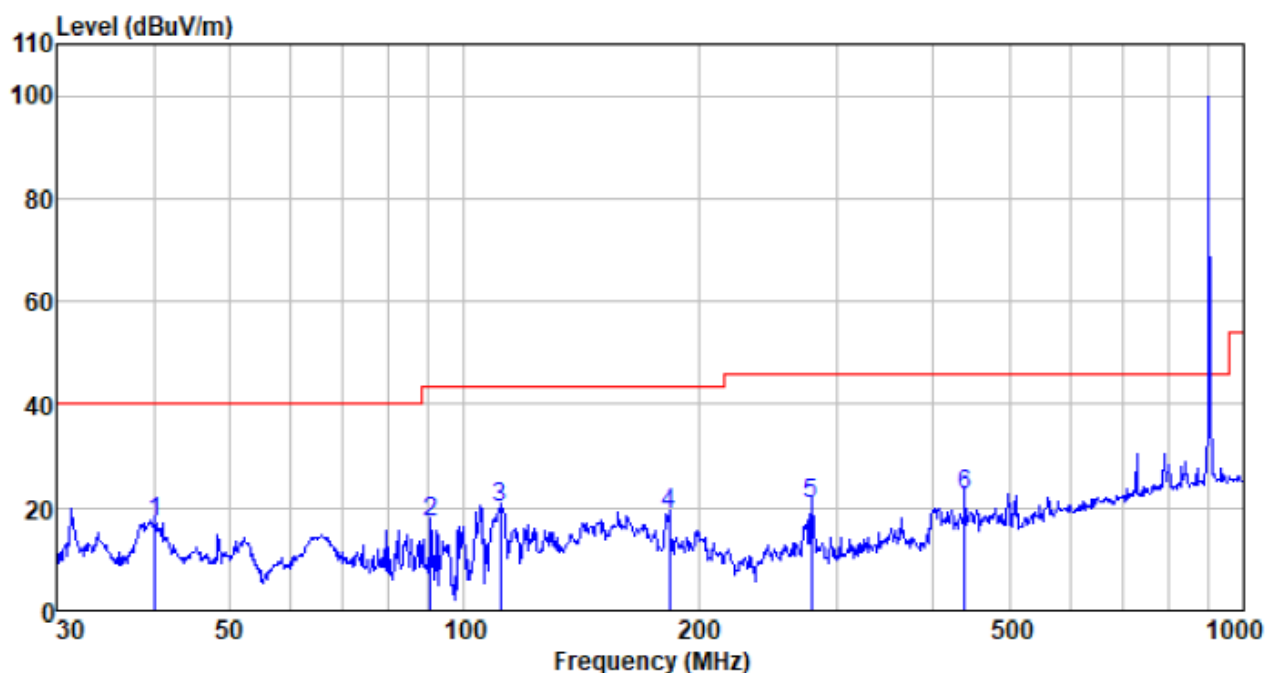


Freq MHz	Reading level dBuV	Antenna factor dB/m	Cable loss dB	Preamp factor dB	level dBuV/m	Limit level dBuV/m	Over limit dB	Remark
31.399	32.01	12.50	1.13	32.30	13.34	40.00	-26.66	QP
90.537	35.87	8.65	1.78	32.46	13.84	43.50	-29.66	QP
162.611	35.64	14.04	2.58	32.44	19.82	43.50	-23.68	QP
267.546	29.64	11.30	3.26	32.33	11.87	46.00	-34.13	QP
354.183	28.31	13.68	3.69	32.27	13.41	46.00	-32.59	QP
642.861	27.71	19.80	4.83	31.68	20.66	46.00	-25.34	QP

Test channel:	Lowest	Polarization:	Vertical
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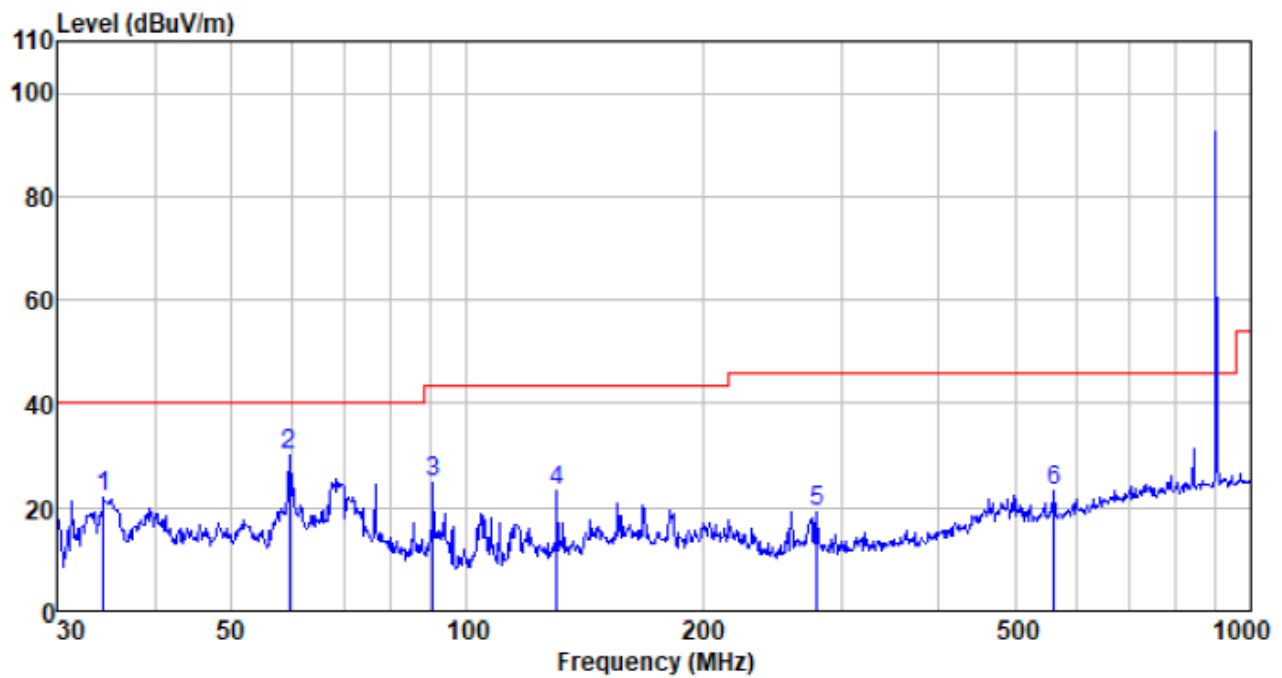


Test channel:	Middle	Polarization:	Horizontal
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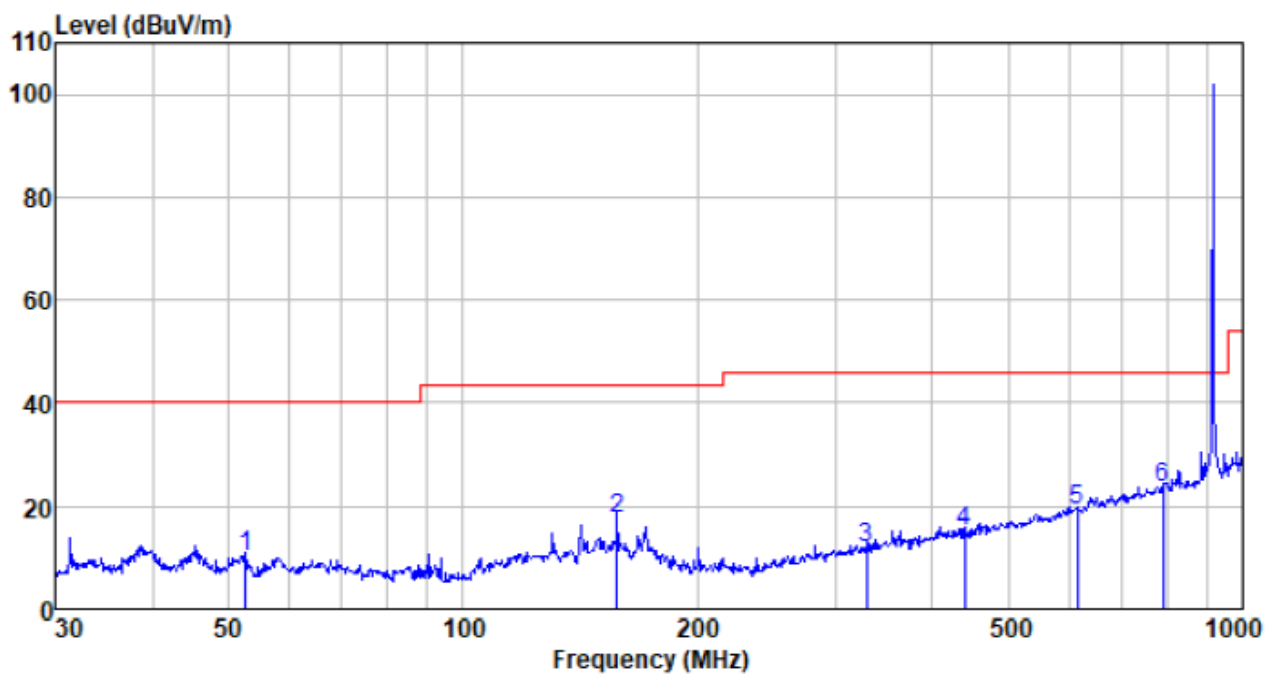
Freq MHz	Reading level dBuV	Antenna factor dB/m	Cable loss dB	Preamp factor dB	level dBuV/m	Limit level dBuV/m	Over limit dB	Remark
40.135	33.87	14.32	1.26	32.30	17.15	40.00	-22.85	QP
90.537	39.08	8.65	1.78	32.46	17.05	43.50	-26.45	QP
111.347	38.85	11.37	2.07	32.49	19.80	43.50	-23.70	QP
183.201	36.85	11.50	2.73	32.42	18.66	43.50	-24.84	QP
279.044	38.01	11.76	3.32	32.32	20.77	46.00	-25.23	QP
438.655	34.99	15.67	4.01	32.23	22.44	46.00	-23.56	QP

Test channel:	Middle	Polarization:	Vertical
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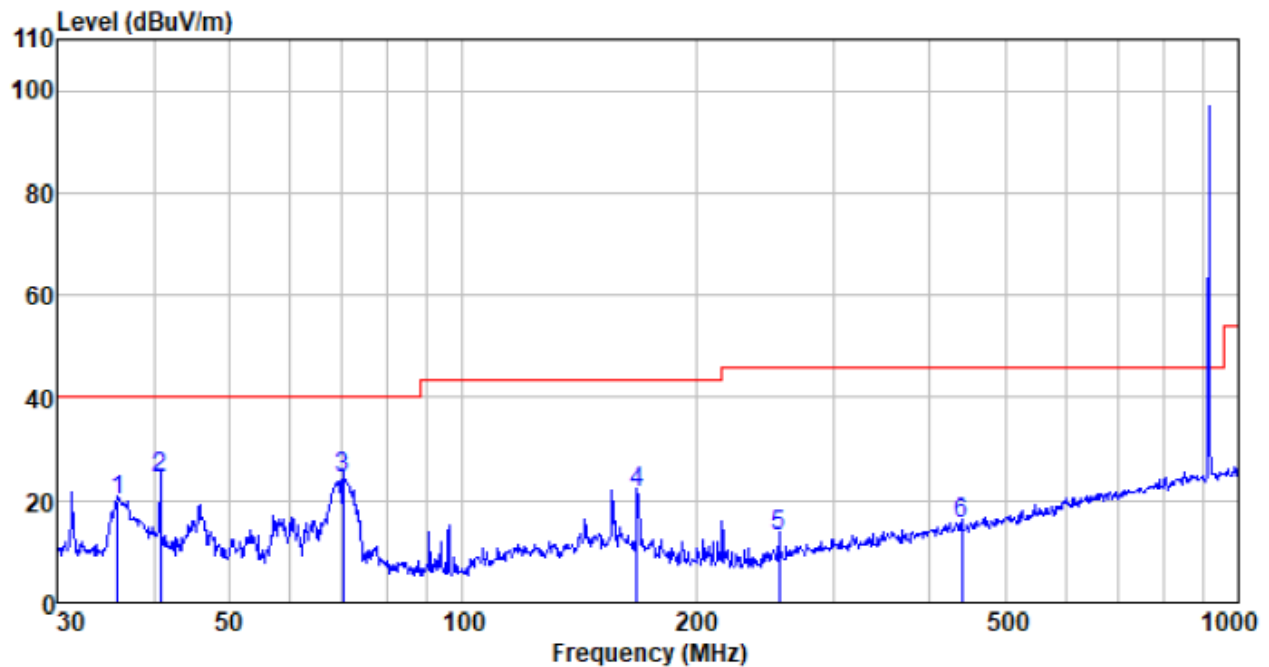
Freq MHz	Reading level dBuV	Antenna factor dB/m	Cable loss dB	Preamp factor dB	level dBuV/m	Limit level dBuV/m	Over limit dB	Remark
34.396	40.06	12.92	1.18	32.30	21.86	40.00	-18.14	QP
59.441	48.74	12.13	1.48	32.34	30.01	40.00	-9.99	QP
90.537	46.91	8.65	1.78	32.46	24.88	43.50	-18.62	QP
130.379	40.26	13.24	2.28	32.47	23.31	43.50	-20.19	QP
280.024	36.43	11.80	3.32	32.32	19.23	46.00	-26.77	QP
560.693	32.70	17.93	4.47	31.98	23.12	46.00	-22.88	QP

Test channel:	Highest	Polarization:	Horizontal
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Freq MHz	Reading level dBuV	Antenna factor dB/m	Cable loss dB	Preamp factor dB	level dBuV/m	Limit level dBuV/m	Over limit dB	Remark
52.575	28.14	12.72	1.41	32.31	9.96	40.00	-30.04	QP
157.559	32.69	14.74	2.53	32.44	17.52	43.50	-25.98	QP
329.039	27.54	13.08	3.57	32.29	11.90	46.00	-34.10	QP
440.196	27.37	15.70	4.01	32.23	14.85	46.00	-31.15	QP
614.214	26.86	19.28	4.70	31.78	19.06	46.00	-26.94	QP
790.619	27.42	21.81	5.44	31.13	23.54	46.00	-22.46	QP

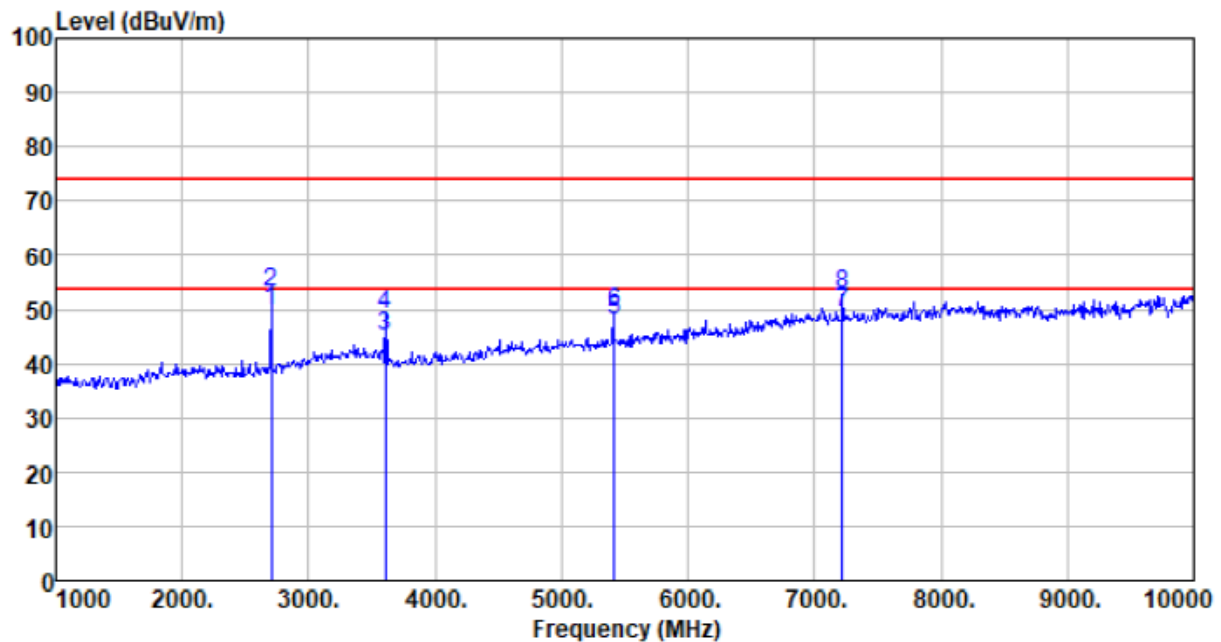
Test channel:	Highest	Polarization:	Vertical
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Freq MHz	Reading level dBuV	Antenna factor dB/m	Cable loss dB	Preamp factor dB	level dBuV/m	Limit level dBuV/m	Over limit dB	Remark
35.875	37.52	13.28	1.20	32.30	19.70	40.00	-20.30	QP
40.702	41.43	13.98	1.27	32.30	24.38	40.00	-15.62	QP
70.090	44.43	10.79	1.65	32.38	24.49	40.00	-15.51	QP
167.824	37.67	13.62	2.62	32.43	21.48	43.50	-22.02	QP
255.623	31.37	10.73	3.19	32.34	12.95	46.00	-33.05	QP
440.196	27.74	15.70	4.01	32.23	15.22	46.00	-30.78	QP

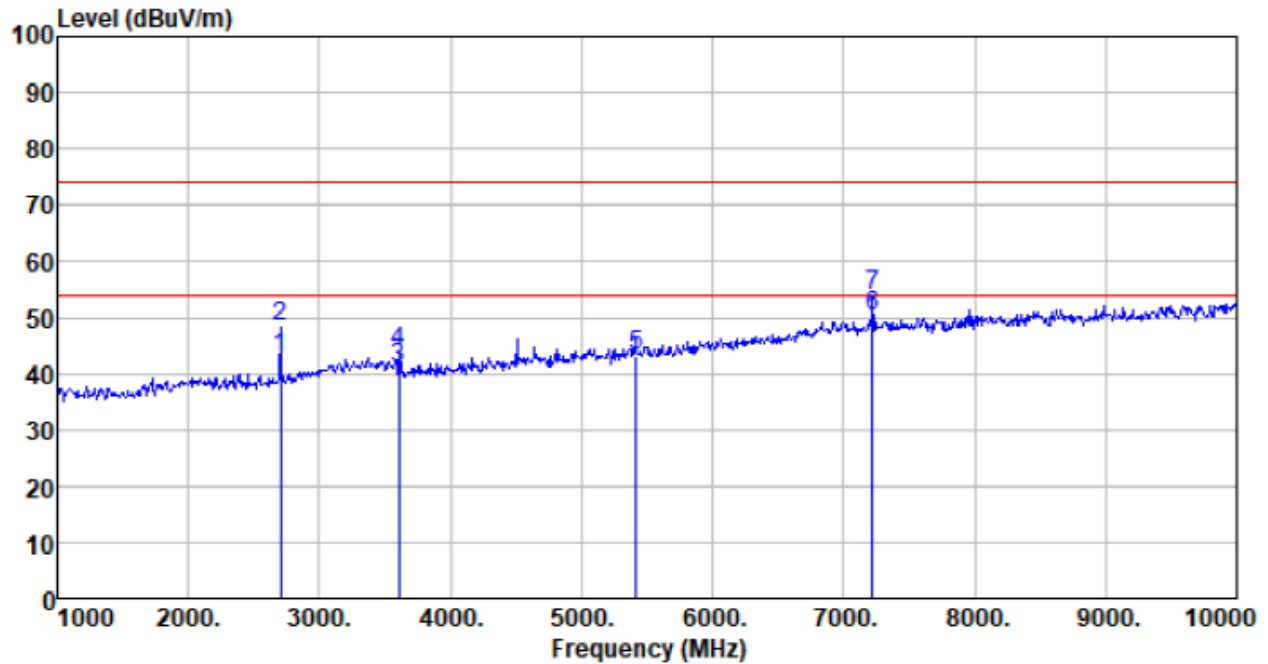
- Above 1GHz
- Unwanted Emissions in Non-restricted Frequency Bands

Test channel:	Lowest	Polarization:	Horizontal
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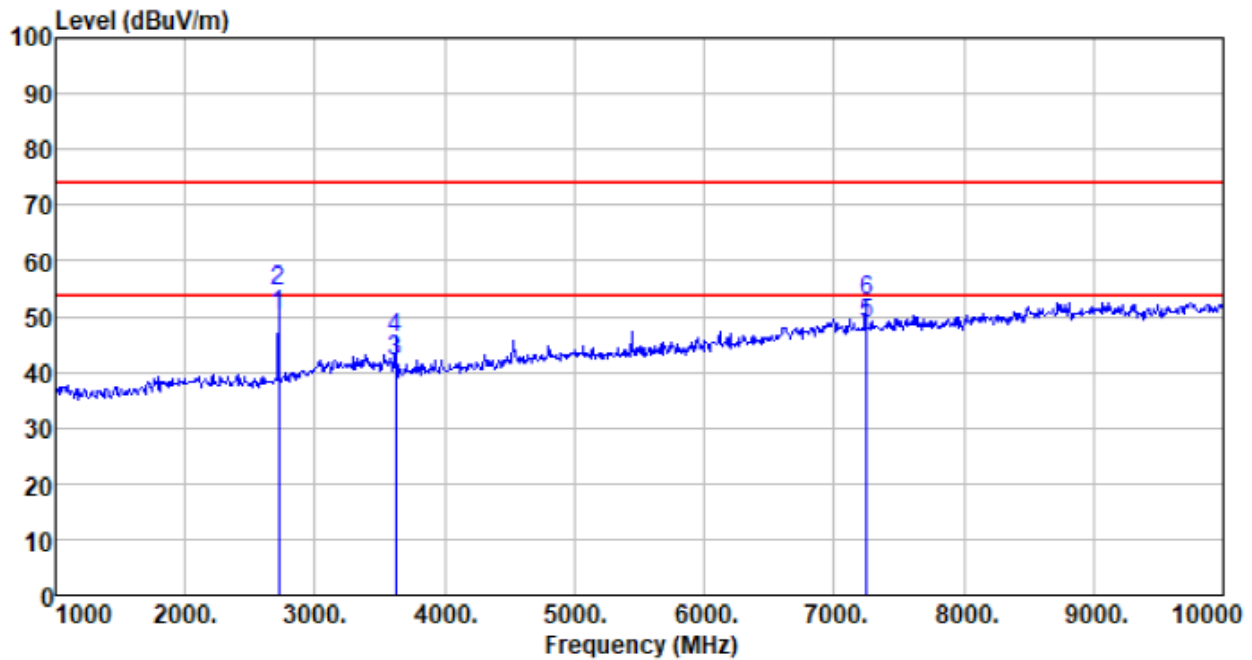
Freq MHz	Reading level dBuV	Antenna factor dB/m	Cable loss dB	Preamp factor dB	level dBuV/m	Limit level dBuV/m	Over limit dB	Remark
2706.900	56.96	27.93	4.14	39.35	49.68	54.00	-4.32	Average
2706.900	60.59	27.93	4.14	39.35	53.31	74.00	-20.69	Peak
3609.200	49.10	29.52	4.98	38.61	44.99	54.00	-9.01	Average
3609.200	53.28	29.52	4.98	38.61	49.17	74.00	-24.83	Peak
5413.800	47.43	32.63	6.35	38.58	47.83	54.00	-6.17	Average
5413.800	49.15	32.63	6.35	38.58	49.55	74.00	-24.45	Peak
7218.400	44.45	36.24	7.93	39.15	49.47	54.00	-4.53	Average
7218.400	47.67	36.24	7.93	39.15	52.69	74.00	-21.31	Peak

Test channel:	Lowest	Polarization:	Vertical
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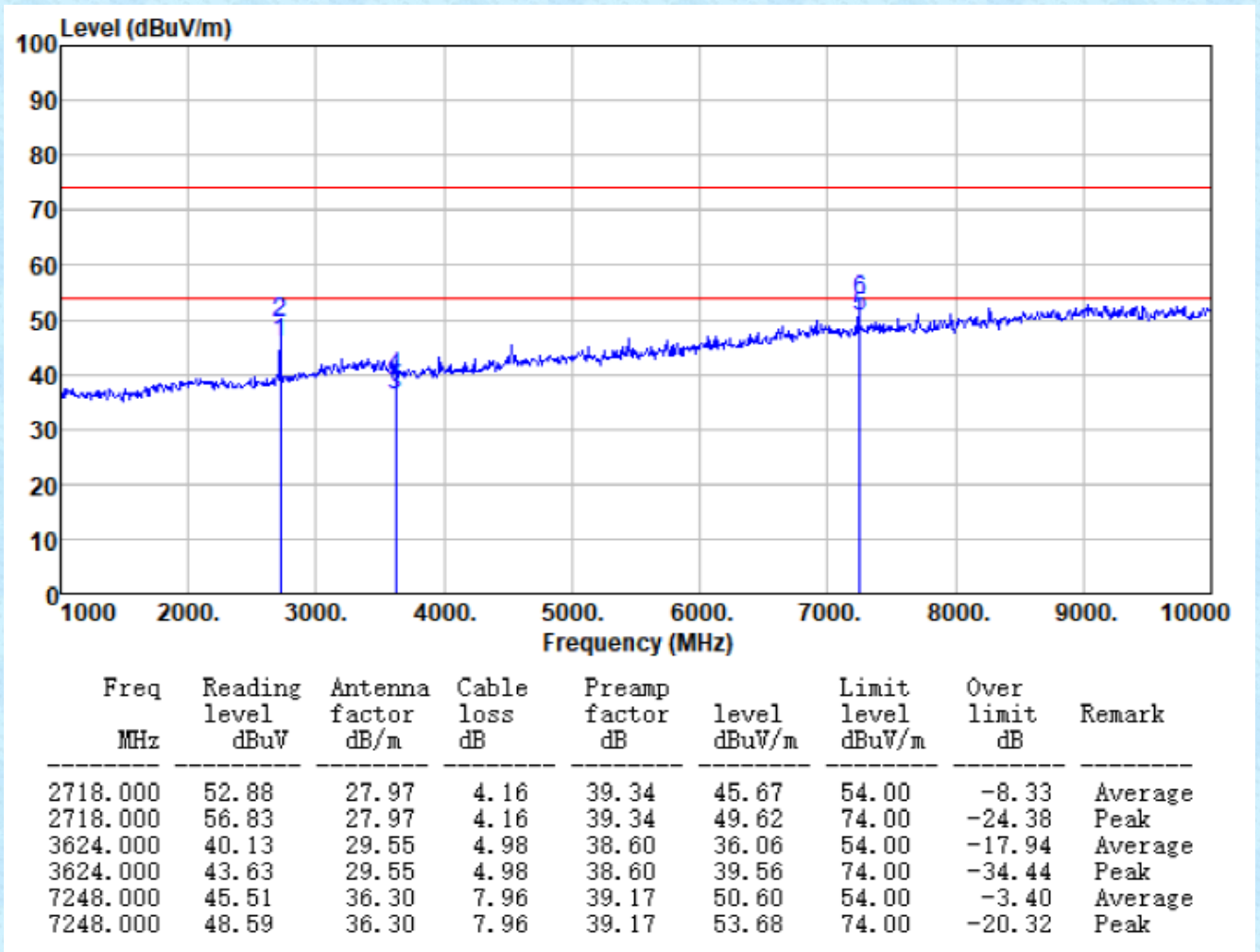
Freq MHz	Reading level dBuV	Antenna factor dB/m	Cable loss dB	Preamp factor dB	level dBuV/m	Limit level dBuV/m	Over limit dB	Remark
2706.900	50.13	27.93	4.14	39.35	42.85	54.00	-11.15	Average
2706.900	55.80	27.93	4.14	39.35	48.52	74.00	-25.48	Peak
3609.200	45.11	29.52	4.98	38.61	41.00	54.00	-13.00	Average
3609.200	47.88	29.52	4.98	38.61	43.77	74.00	-30.23	Peak
5413.800	42.81	32.63	6.35	38.58	43.21	54.00	-10.79	Average
7218.400	45.22	36.24	7.93	39.15	50.24	54.00	-3.76	Average
7218.400	48.81	36.24	7.93	39.15	53.83	74.00	-20.17	Peak

Test channel:	Middle	Polarization:	Horizontal
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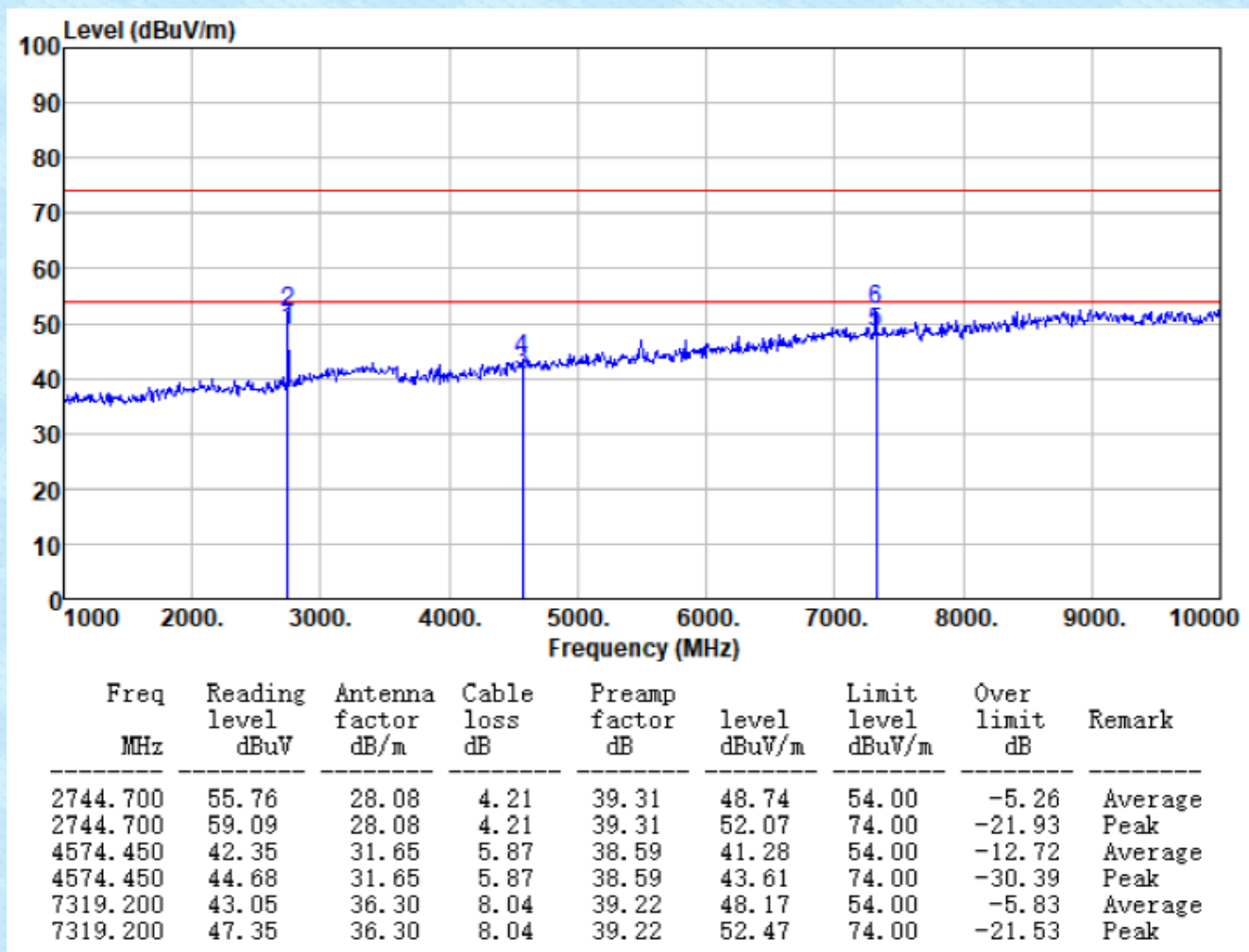


Freq MHz	Reading level dBuV	Antenna factor dB/m	Cable loss dB	Preamp factor dB	level dBuV/m	Limit level dBuV/m	Over limit dB	Remark
2718.000	57.43	27.97	4.16	39.34	50.22	54.00	-3.78	Average
2718.000	61.84	27.97	4.16	39.34	54.63	74.00	-19.37	Peak
3624.000	46.24	29.55	4.98	38.60	42.17	54.00	-11.83	Average
3624.000	50.19	29.55	4.98	38.60	46.12	74.00	-27.88	Peak
7248.000	43.47	36.30	7.96	39.17	48.56	54.00	-5.44	Average
7248.000	47.67	36.30	7.96	39.17	52.76	74.00	-21.24	Peak

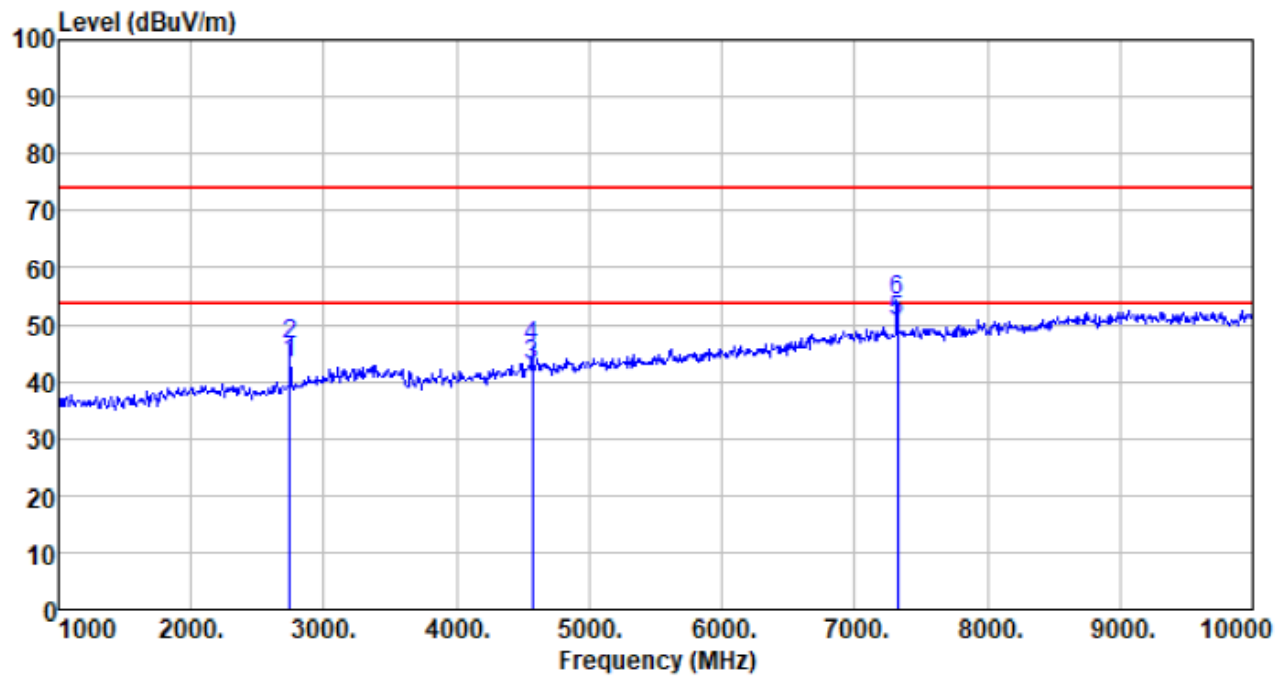
Test channel:	Middle	Polarization:	Vertical
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Test channel:	Highest	Polarization:	Horizontal
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Test channel:	Highest	Polarization:	Vertical
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Freq MHz	Reading level dBuV	Antenna factor dB/m	Cable loss dB	Preamp factor dB	level dBuV/m	Limit level dBuV/m	Over limit dB	Remark
2744.700	50.24	28.08	4.21	39.31	43.22	54.00	-10.78	Average
2744.700	53.54	28.08	4.21	39.31	46.52	74.00	-27.48	Peak
4574.500	43.82	31.65	5.87	38.59	42.75	54.00	-11.25	Average
4574.500	47.34	31.65	5.87	38.59	46.27	74.00	-27.73	Peak
7319.200	45.52	36.30	8.04	39.22	50.64	54.00	-3.36	Average
7319.200	49.20	36.30	8.04	39.22	54.32	74.00	-19.68	Peak

Remark:

1. Final Level = Receiver Read level + Antenna Factor + Cable Loss – Preamplifier Factor
2. The emission levels of other frequencies are very lower than the limit and not show in test report.

■ Unwanted Emissions in Restricted Frequency Bands

Test channel:	Lowest	Polarization:	Horizontal
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NO.	Frequency (MHz)	Read Level (dBuV)	Antenna Factor	Cable Loss (dB)	Preamp Factor (dB)	Factor (dB/m)	Level (dBuV/m)	Limit Line (dBuV/m)	Over Limit (dB)
1	901.50	33.00	23.10	5.73	31.10	-2.27	30.73	46.00	-15.27
2	902.00	55.80	23.10	5.74	31.10	-2.26	53.54	81.76	-28.22
3	902.30	104.02	23.10	5.74	31.10	-2.26	101.76	-	-
4	928.00	30.20	23.36	5.81	31.10	-1.93	28.27	81.76	-53.49

Test channel:	Lowest	Polarization:	Vertical
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NO.	Frequency (MHz)	Read Level (dBuV)	Antenna Factor	Cable Loss (dB)	Preamp Factor (dB)	Factor (dB/m)	Level (dBuV/m)	Limit Line (dBuV/m)	Over Limit (dB)
1	901.50	32.60	23.10	5.73	31.10	-2.27	30.33	46.00	-15.67
2	902.00	55.40	23.10	5.74	31.10	-2.26	53.14	73.82	-20.68
3	902.30	96.08	23.10	5.74	31.10	-2.26	93.82	-	-
4	928.00	26.66	23.36	5.81	31.10	-1.93	24.73	73.82	-49.09

Test channel:	Highest	Polarization:	Horizontal
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NO.	Frequency (MHz)	Read Level (dBuV)	Antenna Factor	Cable Loss (dB)	Preamp Factor (dB)	Factor (dB/m)	Level (dBuV/m)	Limit Line (dBuV/m)	Over Limit (dB)
1	902.00	29.42	23.10	5.74	31.10	-2.26	27.16	81.91	-18.84
2	914.90	104.03	23.20	5.78	31.10	-2.12	101.91	-	-
3	928.00	25.80	23.36	5.81	31.10	-1.93	23.87	81.91	-22.13

Test channel:	Highest	Polarization:	Vertical
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NO.	Frequency (MHz)	Read Level (dBuV)	Antenna Factor	Cable Loss (dB)	Preamp Factor (dB)	Factor (dB/m)	Level (dBuV/m)	Limit Line (dBuV/m)	Over Limit (dB)
1	902.00	24.35	23.10	5.74	31.10	-2.26	22.09	76.92	-54.83
2	914.90	99.04	23.20	5.78	31.10	-2.12	96.92	-	-
3	928.00	22.40	23.36	5.81	31.10	-1.93	20.47	76.92	-56.45

Remark:

- 1.Level(dBuV/m) = Read Level (dBuV) + Factor (dB/m).
- 2.Factor(dB/m) = Antenna Factor(dB/m) + Cable Factor(dB) – Pre-Amplifier Factor(dB).
- 3.The other emission levels were very low against the limit.
- 4.Over Limit = Emission Level – Limit value.

8 Test Setup Photo

Reference to the **appendix I** for details.

9 EUT Constructional Details

Reference to the **appendix II** for details.

---End---