TEST REPORT

FCC Rules Part 15.249

Report Reference No..... :	**MTEB25090300-R**
FCC ID..... :	**2BE9P-ZHZNQEZP4**
Compiled by (position+printed name+signature).. :	File administrators Alisa Luo
Supervised by (position+printed name+signature).. :	Test Engineer Sunny Deng
Approved by (position+printed name+signature).. :	Manager Yvette Zhou
Date of issue.....:	**Sep.28,2025**
Representative Laboratory Name. :	**Shenzhen Most Technology Service Co., Ltd.**
Address..... :	No.5, 2nd Langshan Road, North District, Hi-tech Industrial Park, Nanshan, Shenzhen, Guangdong, China.
Applicant's name.....:	**Shenzhen Yizhita Technology Co., Ltd**
Address..... :	Room 1901, Qianhai HOP Int'l, No. 19 Xinghua 1st Rd (Extension),Bao'an District, Shenzhen, Guangdong, China.
Test specification/ Standard.....**:**	**FCC Part15 Subpart C, Section 15.249**
TRF Originator.....:	Shenzhen Most Technology Service Co., Ltd.

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Test item description.....:	ATK Dragonfly A9 Ultimate Lightweight Wireless Mouse
Trade Mark.....:	N/A
Model/Type reference..... :	ATK Dragonfly A9 Ultimate
Listed Models ..... :	N/A
Modulation Type..... :	GFSK
Operation Frequency..... :	2403-2480MHz
Hardware version :	DM171B-nRF54L05_V3.0
Software version :	V1.13
Rating :	DC 3.85V by Battery/DC 5V by USB Port
Result.....:	**PASS**

TEST REPORT

Equipment under Test	:	ATK Dragonfly A9 Ultimate Lightweight Wireless Mouse
Model /Type	:	ATK Dragonfly A9 Ultimate
Listed Models	:	N/A
Remark		N/A
Applicant	:	**Shenzhen Yizhita Technology Co., Ltd**
Address	:	Room 1901, Qianhai HOP Int'l, No. 19 Xinghua 1st Rd (Extension),Bao'an District, Shenzhen, Guangdong, China.
Manufacturer	:	**Shenzhen Yizhita Technology Co., Ltd**
Address	:	Room 1901, Qianhai HOP Int'l, No. 19 Xinghua 1st Rd (Extension),Bao'an District, Shenzhen, Guangdong, China.

Test Result:	**PASS**

The test report merely corresponds to the test sample.
It is not permitted to copy extracts of these test result without the written permission of the test laboratory.

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1. Revision History

Revision	Issue Date	Revisions	Revised By
00	2025.09.28	Initial Issue	Alisa Luo

2. TEST STANDARDS

The tests were performed according to following standards:

The tests were performed according to following standards:
FCC Rules Part 15.249: Operation within the bands 902-928 MHz, 2400-2483.5 MHz, 5725-5875 MHz, and 24.0-24.25 GHz.

RSS-210: Licence-Exempt Radio Apparatus: Category I Equipment
ANSI C63.10-2013: American National Standard for Testing Unlicensed Wireless Devices.

3. SUMMARY

3.1. General Remarks

Date of receipt of test sample	:	2025.09.15
Testing commenced on	:	2025.09.16
Testing concluded on	:	2025.09.28

3.2. Product Description

Product Name:	ATK Dragonfly A9 Ultimate Lightweight Wireless Mouse
Model/Type reference:	ATK Dragonfly A9 Ultimate
Power Supply：	DC 3.85V by Battery/DC 5V by USB Port
Testing sample ID：	MTYP10723
FCC Test :	
Modulation:	GFSK
Operation frequency:	2403-2480MHz
Channel number:	78
Antenna type:	PCB antenna
Antenna gain:	-2.39dBi

3.3. Equipment Under Test

Power supply system utilised

Power supply voltage	:	○	230V / 50 Hz	○	120V / 60Hz
		○	12 V DC	○	24 V DC
		●	Other (specified in blank below)		

DC 3.85V by Battery/DC 5V by USB Port

3.4. Short description of the Equipment under Test (EUT)

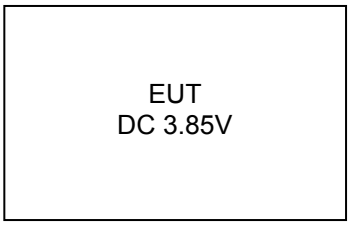
This is a ATK Dragonfly A9 Ultimate Lightweight Wireless Mouse For more details, refer to the user's manual of the EUT.

3.5. EUT operation mode

The Applicant provides communication tools software to control the EUT for staying in continuous transmitting (Duty Cycle more than 98%) and receiving mode for testing .There are 64 channels provided to the EUT. Channel 00/32/63 was selected to test.

CHANNEL	FREQ. (MHz)	CHANNEL	FREQ. (MHz)	CHANNEL	FREQ. (MHz)	CHANNEL	FREQ. (MHz)
0	**2403**	20	2423	40	2443	60	2463
1	2404	21	2424	41	2444	61	2464
2	2405	22	2425	42	2445	62	2465
3	2406	23	2426	43	2446	63	2466
4	2407	24	2427	44	2447	64	2467
5	2408	25	2428	45	2448	65	2468
6	2409	26	2429	46	2449	66	2469
7	2410	27	2430	47	2450	67	2470
8	2411	28	2431	48	2451	68	2471
9	2412	29	2432	49	2452	69	2472
10	2413	30	2433	50	2453	70	2473
11	2414	31	2434	51	2454	71	2474
12	2415	32	2435	52	2455	72	2475
13	2416	33	2436	53	2456	73	2476
14	2417	34	2437	54	2457	74	2477
15	2418	35	2438	55	2458	75	2478
16	2419	36	2439	56	2459	76	2479
17	2420	37	2440	57	2460	77	**2480**
18	2421	38	2441	58	2461		
19	2422	**39**	**2442**	59	2462		

3.6. Block Diagram of Test Setup



3.7. Test Item (Equipment Under Test) Description*

Short designation	EUT Name	EUT Description	Serial number	Hardware status	Software status
EUT A	/	/	/	/	/
EUT B	/	/	/	/	/

3.8. Auxiliary Equipment (AE) Description

AE short designation	EUT Name (if available)	EUT Description	Serial number (if available)	Software (if used)
AE 1	/	/	/	/
AE 2	/	/	/	/

3.9. Antenna Information*

Short designation	Antenna Name	Antenna Type	Frequency Range	Serial number	Antenna Peak Gain
Antenna 1	---	PCB antenna	2403-2480MHz	---	-2.39dBi
Antenna 2	/	/	/	/	/

*: declared by the applicant.

3.10. EUT configuration

The following peripheral devices and interface cables were connected during the measurement:

○ - supplied by the manufacturer

● - Supplied by the lab

○	ADAPTER	M/N:	
		Manufacturer:	

3.11. Modifications

No modifications were implemented to meet testing criteria.

4. TEST ENVIRONMENT

4.1. Address of the test laboratory

Shenzhen Most Technology Service Co., Ltd.
No.5, 2nd Langshan Road, North District, Hi-tech Industrial Park, Nanshan, Shenzhen, Guangdong, China.
The 3m-Semi anechoic test site fulfils CISPR 16-1-4 according to ANSI C63.4:2014 and CISPR 16-1-4:2010 SVSWR requirement for radiated emission above 1GHz.

Test Facility

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

FCC-Registration No.: 0031192610

Shenzhen Most Technology Service Co., Ltd. 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 our files.

A2LA-Lab Cert. No.: 6343.01

Shenzhen Most Technology Service Co., Ltd. EMC Laboratory has been accredited by A2LA for technical competence in the field of electrical testing, and proved to be in compliance with ISO/IEC 17025: 2005 General Requirements for the Competence of Testing and Calibration Laboratories and any additional program requirements in the identified field of testing.

4.2. Environmental conditions

Radiated Emission:

Temperature:	23 ° C
Humidity:	48 %
Atmospheric pressure:	950-1050mbar

Conducted testing：

Temperature:	24 ° C
Humidity:	45 %
Atmospheric pressure:	950-1050mbar

4.3. Test Description

FCC and IC Requirements		
FCC Part 15.203	Antenna Requirement	PASS
FCC Part 15.207	AC Power Conducted Emission	PASS
FCC Part 15. 15.249(a)	Field strength of the Fundamental signal	PASS
FCC Part 15.209/15.249(a)	Spurious Emissions	PASS
FCC Part 15.205/15.249(d)	Band edge Emissions	PASS
FCC Part 15.215/15.249	20dB Occupied Bandwidth	PASS

Remark:
1. The measurement uncertainty is not included in the test result.
2. NA = Not Applicable; NP = Not Performed

4.4. Statement of the measurement uncertainty

The data and results referenced in this document are true and accurate. The reader is cautioned that there may be errors within the calibration limits of the equipment and facilities. The measurement uncertainty was calculated for all measurements listed in this test report acc. to CISPR 16 - 4 „Specification for radio disturbance and immunity measuring apparatus and methods – Part 4: Uncertainty in EMC Measurements“ and is documented in the Shenzhen Most Technology Service Co., Ltd. quality system acc. to DIN EN ISO/IEC 17025. Furthermore, component and process variability of devices similar to that tested may result in additional deviation. The manufacturer has the sole responsibility of continued compliance of the device.

Hereafter the best measurement capability for Shenzhen Most Technology Service Co., Ltd. is reported:

Test	Range	Measurement Uncertainty	Notes
Radiated Emission	30~1000MHz	4.10 dB	(1)
Radiated Emission	1~18GHz	4.32 dB	(1)
Radiated Emission	18-40GHz	5.54 dB	(1)
Conducted Disturbance	0.15~30MHz	3.12 dB	(1)

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

4.5. Equipments Used during the Test

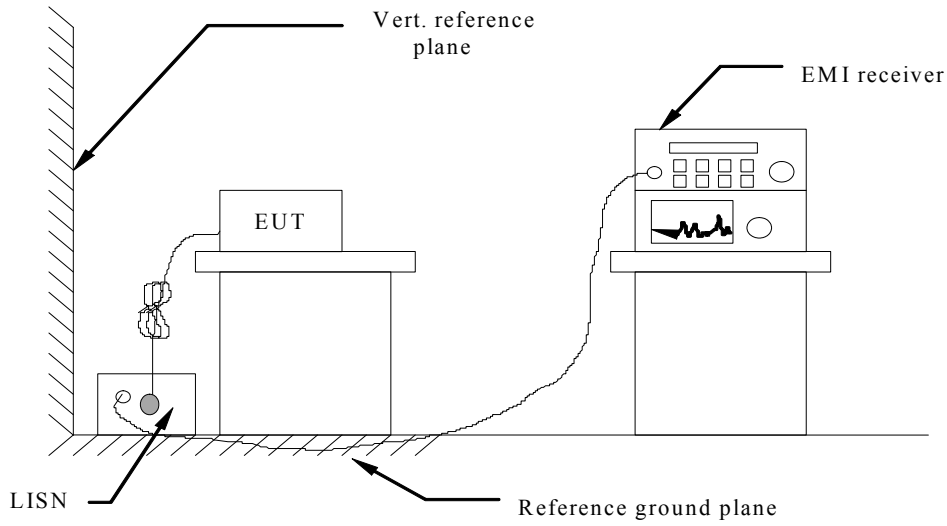
Item	Equipment	Manufacturer	Model No.	Serial No.	Firmware versions	Last Cal.
1.	L.I.S.N.	R&S	ENV216	100093	/	2025/03/04
2	Three-phase artificial power network	Schwarzback Mess	NNLK8129	8129178	/	2025/03/04
3.	Receiver	R&S	ESCI	100492	V3.0-10-2	2025/03/04
4	Receiver	R&S	ESPI	101202	V3.0-10-2	2025/03/04
5	Spectrum analyzer	Agilent	9020A	MT-E306	A14.16	2025/03/04
6	Bilong Antenna	Sunol Sciences	JB3	A121206	/	2025/08/13
7	Horn antenna	HF Antenna	HF Antenna	MT-E158	/	2025/03/16
8	Loop antenna	Beijing Daze	ZN30900B	/	/	2025/03/04
9	Horn antenna	R&S	OBH100400	26999002	/	2025/03/16
10	Wireless Communication Test Set	R&S	CMW500	/	CMW-BASE-3.7.21	2025/03/04
11	Spectrum analyzer	R&S	FSP	100019	V4.40 SP2	2025/03/04
12	High gain antenna	Schwarzbeck	LB-180400KF	MT-E389	/	2025/03/04
13	Preamplifier	Schwarzbeck	BBV 9743	MT-E390	/	2025/03/04
14	Pre-amplifier	EMCI	EMC051845SE	MT-E391	/	2025/03/04
15	Pre-amplifier	Agilent	83051A	MT-E392	/	2025/03/04
16	High pass filter unit	Tonscend	JS0806-F	MT-E393	/	2025/03/04
17	RF Cable(below1GHz)	Times	9kHz-1GHz	MT-E394	/	2025/03/04
18	RF Cable(above 1GHz)	Times	1-40G	MT-E395	/	2025/03/04
19	RF Cable (9KHz-40GHz)	Tonscend	170660	N/A	/	2025/03/04
20	Power meter	R&S	NRVS	100444	/	2025/03/04

Note: 1. The Cal.Interval was one year.

5. TEST CONDITIONS AND RESULTS

5.1. AC Power Conducted Emission

TEST CONFIGURATION



TEST PROCEDURE

1 The equipment was set up as per the test configuration to simulate typical actual usage per the user's manual. The EUT is a tabletop system, a wooden table with a height of 0.8 meters is used and is placed on the ground plane as per ANSI C63.10-2013.
2 Support equipment, if needed, was placed as per ANSI C63.10-2013
3 All I/O cables were positioned to simulate typical actual usage as per ANSI C63.10-2013
4 The EUT received DC5V power, the adapter received AC120V/60Hz power through a Line Impedance Stabilization Network (LISN) which supplied power source and was grounded to the ground plane.
5 All support equipments received AC power from a second LISN, if any.
6 The EUT test program was started. Emissions were measured on each current carrying line of the EUT using a spectrum Analyzer / Receiver connected to the LISN powering the EUT. The LISN has two monitoring points: Line 1 (Hot Side) and Line 2 (Neutral Side). Two scans were taken: one with Line 1 connected to Analyzer / Receiver and Line 2 connected to a 50 ohm load; the second scan had Line 1 connected to a 50 ohm load and Line 2 connected to the Analyzer / Receiver.
7 Analyzer / Receiver scanned from 150 KHz to 30MHz for emissions in each of the test modes.
8 During the above scans, the emissions were maximized by cable manipulation.

AC Power Conducted Emission Limit

For unintentional device, according to RSS Gen 8.8 and § 15.207(a) Line Conducted Emission Limits is as following:

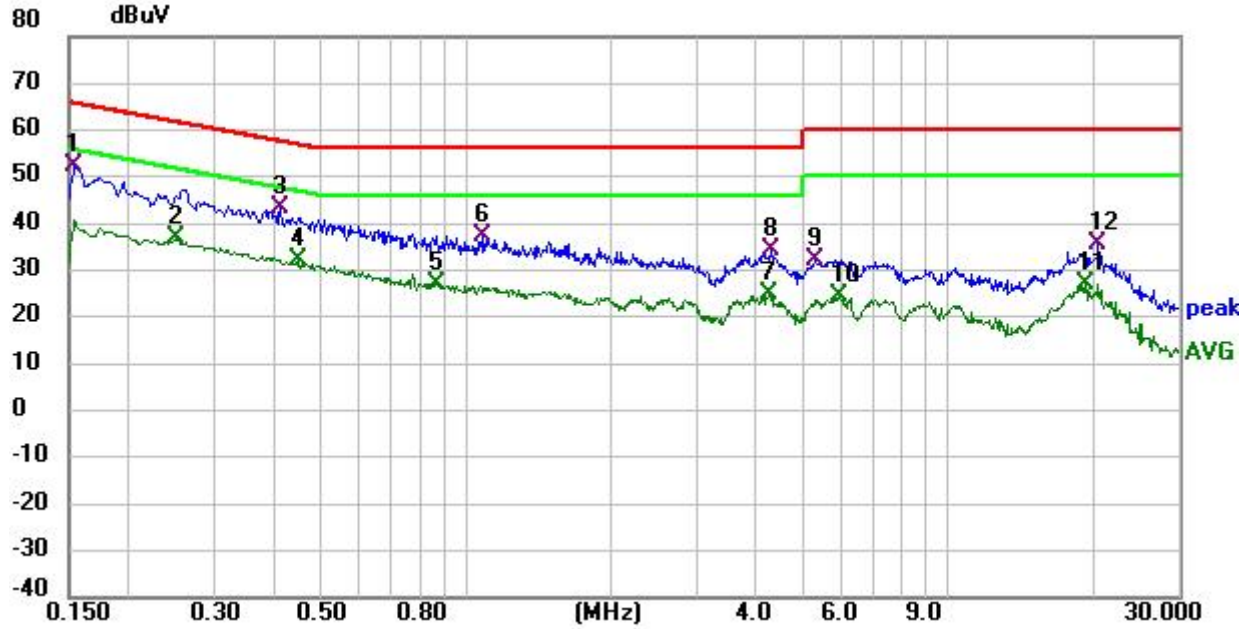
Frequency range (MHz)	Limit (dBuV)	
	Quasi-peak	Average
0.15-0.5	66 to 56*	56 to 46*
0.5-5	56	46
5-30	60	50
* Decreases with the logarithm of the frequency.		

TEST RESULTS

Remark:

1. GFSK modes were test at Low, Middle, and High channel; only the worst result of GFSK Middle Channel was reported as below:

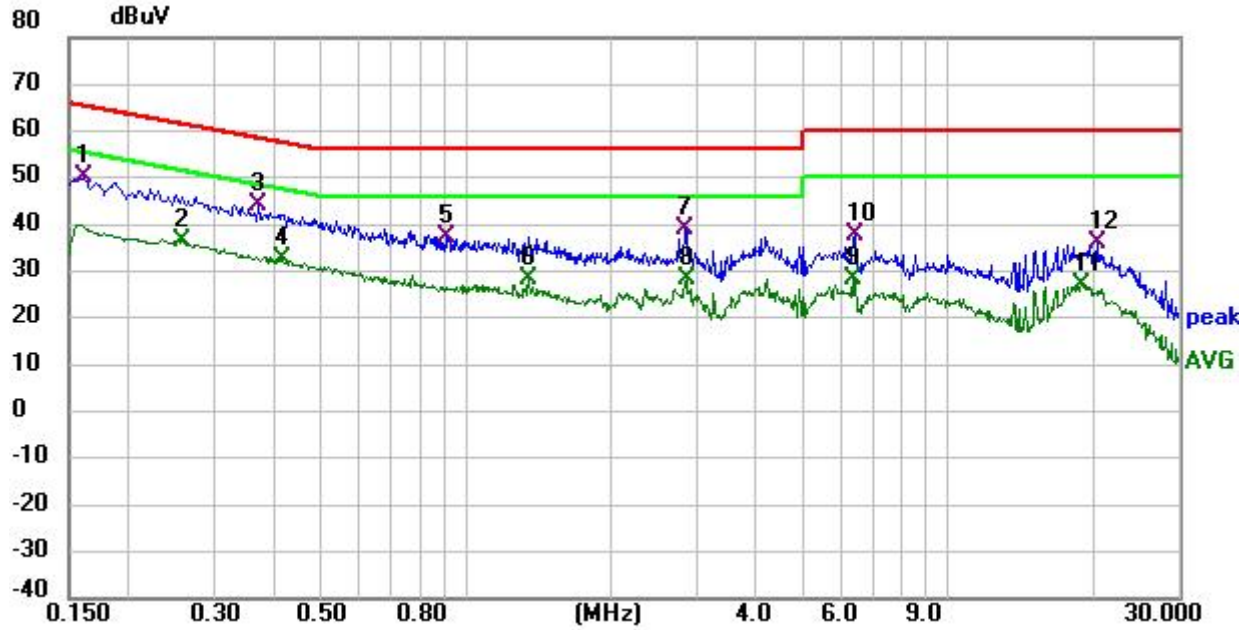
Power supply:	DC 5V by USB Port	Polarization	L



No.	Frequency (MHz)	Reading (dBuV)	Factor (dB)	Level (dBuV)	Limit (dBuV)	Margin (dB)	Detector	P/F	Remark
1 *	0.1539	42.57	9.60	52.17	65.79	-13.62	QP	P	
2	0.2500	27.12	9.60	36.72	51.76	-15.04	AVG	P	
3	0.4100	33.88	9.59	43.47	57.65	-14.18	QP	P	
4	0.4460	22.81	9.59	32.40	46.95	-14.55	AVG	P	
5	0.8740	17.46	9.60	27.06	46.00	-18.94	AVG	P	
6	1.0780	27.78	9.60	37.38	56.00	-18.62	QP	P	
7	4.2619	15.51	9.62	25.13	46.00	-20.87	AVG	P	
8	4.2980	24.61	9.62	34.23	56.00	-21.77	QP	P	
9	5.3300	22.47	9.63	32.10	60.00	-27.90	QP	P	
10	5.9580	15.03	9.64	24.67	50.00	-25.33	AVG	P	
11	19.2380	17.40	9.73	27.13	50.00	-22.87	AVG	P	
12	20.4500	25.74	9.73	35.47	60.00	-24.53	QP	P	

*:Maximum data x:Over limit !:over margin

Power supply:	DC 5V by USB Port	Polarization	N



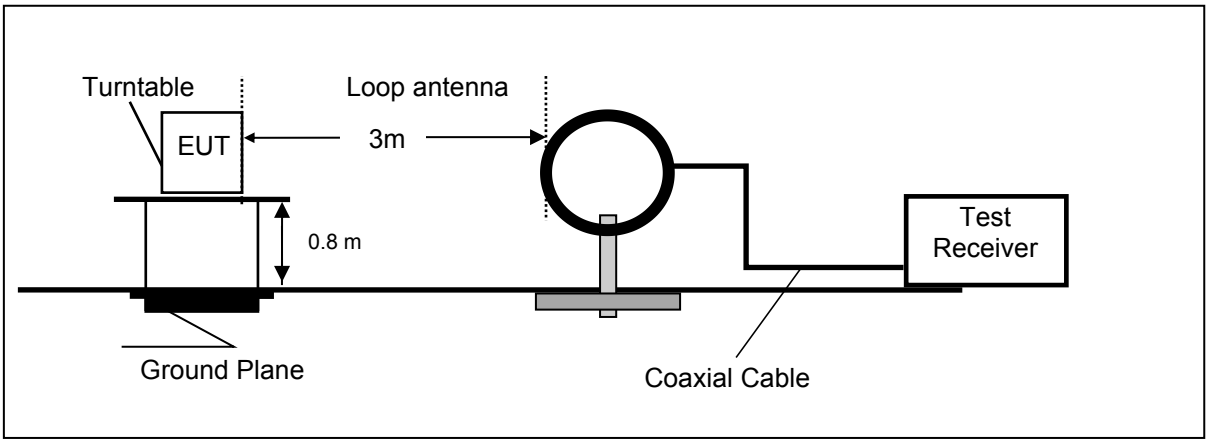
No.	Frequency (MHz)	Reading (dBuV)	Factor (dB)	Level (dBuV)	Limit (dBuV)	Margin (dB)	Detector	P/F	Remark
1	0.1620	40.69	9.61	50.30	65.36	-15.06	QP	P	
2	0.2580	27.01	9.60	36.61	51.50	-14.89	AVG	P	
3 *	0.3700	34.66	9.59	44.25	58.50	-14.25	QP	P	
4	0.4140	23.07	9.59	32.66	47.57	-14.91	AVG	P	
5	0.9180	27.85	9.60	37.45	56.00	-18.55	QP	P	
6	1.3500	18.60	9.60	28.20	46.00	-17.80	AVG	P	
7	2.8540	29.50	9.61	39.11	56.00	-16.89	QP	P	
8	2.8660	18.89	9.61	28.50	46.00	-17.50	AVG	P	
9	6.3500	18.90	9.64	28.54	50.00	-21.46	AVG	P	
10	6.4180	28.23	9.64	37.87	60.00	-22.13	QP	P	
11	19.0140	17.34	9.72	27.06	50.00	-22.94	AVG	P	
12	20.3060	26.20	9.73	35.93	60.00	-24.07	QP	P	

*:Maximum data x:Over limit !:over margin

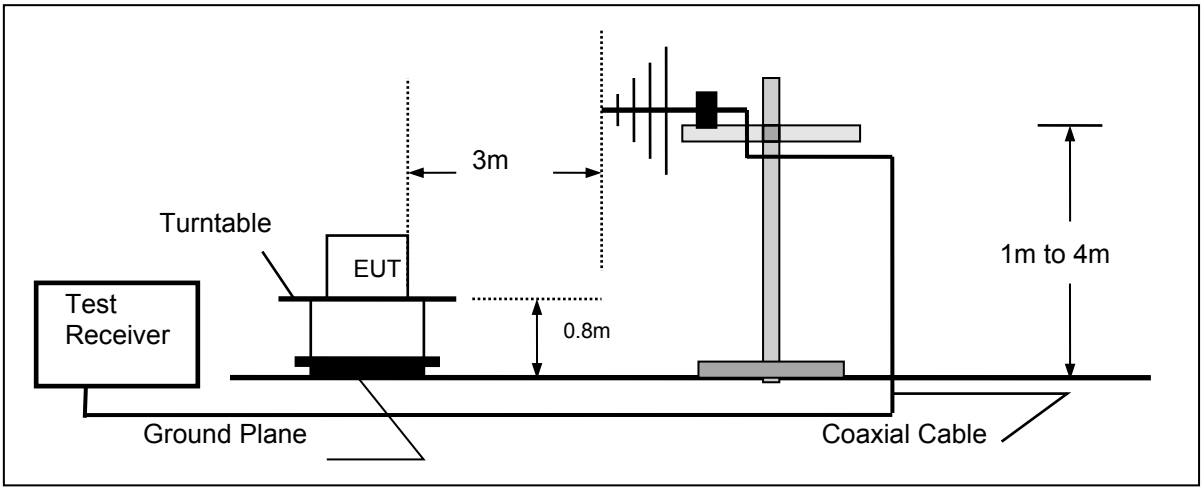
5.2. Radiated Spurious Emissions and Bandedge Emission

TEST CONFIGURATION

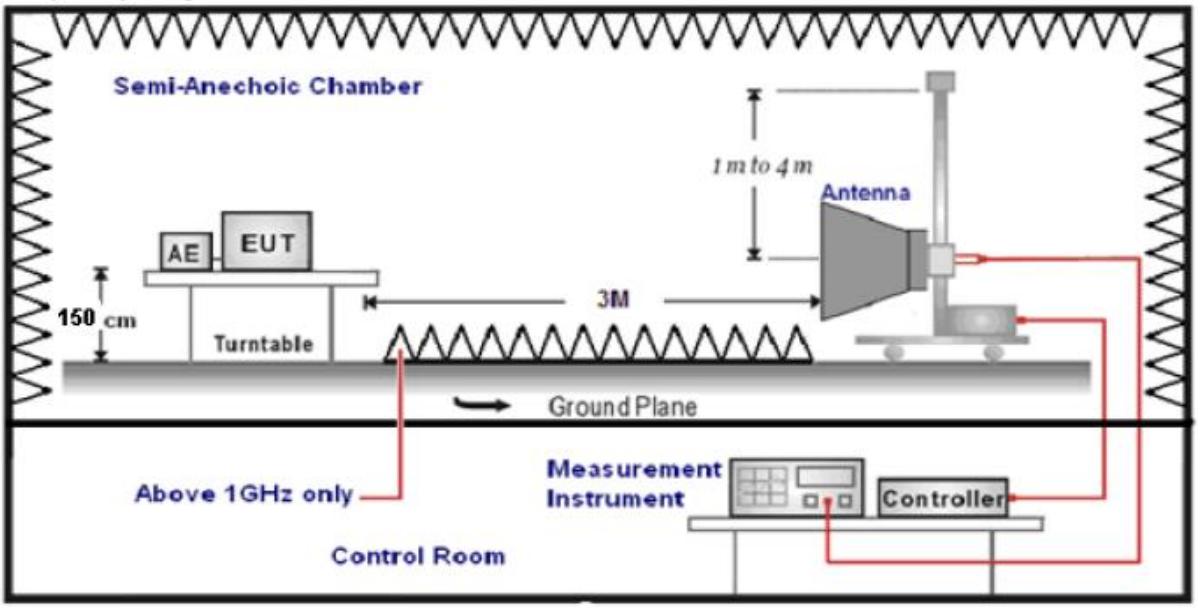
Frequency range 9 KHz – 30MHz



Frequency range 30MHz – 1000MHz



Frequency range above 1GHz-25GHz



TEST PROCEDURE

a. 1) Below 1G: The EUT was placed on the top of a rotating table 0.8 meters above the ground at a 3 meter semi-anechoic camber. The table was rotated 360 degrees to determine the position of the highest radiation.
2) Above 1G: The EUT was placed on the top of a rotating table 1.5 meters above the ground at a 3 meter semi-anechoic camber. The table was rotated 360 degrees to determine the position of the highest radiation.
Note: For the radiated emission test above 1GHz:
Place the measurement antenna away from each area of the EUT determined to be a source of emissions at the specified measurement distance, while keeping the measurement antenna aimed at the source of emissions at each frequency of significant emissions, with polarization oriented for maximum response. The measurement antenna may have to be higher or lower than the EUT, depending on the radiation pattern of the emission and staying aimed at the emission source for receiving the maximum signal. The final measurement antenna elevation shall be that which maximizes the emissions. The measurement antenna elevation for maximum emissions shall be restricted to a range of heights of from 1 m to 4 m above the ground or reference ground plane.
b. The EUT was set 3 meters away from the interference-receiving antenna, which was mounted on the top of a variable-height antenna tower.
c. The antenna height is varied from one meter to four meters above the ground to determine the maximum value of the field strength. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
d. For each suspected emission, the EUT was arranged to its worst case and then the antenna was tuned to heights from 1 meter to 4 meters (for the test frequency of below 30MHz, the antenna was tuned to heights 1 meter) and the rotatable table
e. was turned from 0 degrees to 360 degrees to find the maximum reading.
e. The test-receiver system was set to Peak Detect Function and Specified Bandwidth with Maximum Hold Mode.
f. 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.
g. Test the EUT in the lowest channel,the middle channel,the Highest channel
h. The radiation measurements are performed in X, Y, Z axis positioning for Transmitting mode,And found the X axis positioning which it is worse case.

Repeat above procedures until all frequencies measured was complete.

RADIATION LIMIT

Limit:(Spurious Emissions and band edge)

Frequency	Field strength (microvolt/meter)	Limit (dBuV/m)	Remark	Measurement distance (m)
0.009MHz-0.490MHz	2400/F(kHz)	-	-	300
0.490MHz-1.705MHz	24000/F(kHz)	-	-	30
1.705MHz-30MHz	30	-	-	30
30MHz-88MHz	100	40.0	Quasi-peak	3
88MHz-216MHz	150	43.5	Quasi-peak	3
216MHz-960MHz	200	46.0	Quasi-peak	3
960MHz-1GHz	500	54.0	Quasi-peak	3
Above 1GHz	500	54.0	Average	3

Note: 1) 15.35(b), Unless otherwise specified, the limit on peak radio frequency emissions is 20dB above the maximum permitted average emission limit applicable to the equipment under test. This peak limit applies to the total peak emission level radiated by the device.
2) Emissions radiated outside of the specified frequency bands, except for harmonics, shall be attenuated by at least 50 dB below the level of the fundamental or to the general radiated emission limits in Section 15.209, whichever is the lesser attenuation.

Limit:(Field strength of the fundamental signal)

Frequency	Limit (dBuV/m @3m)	Remark
2403-2480MHz	114	PEAK
	94	AVG

Test Results

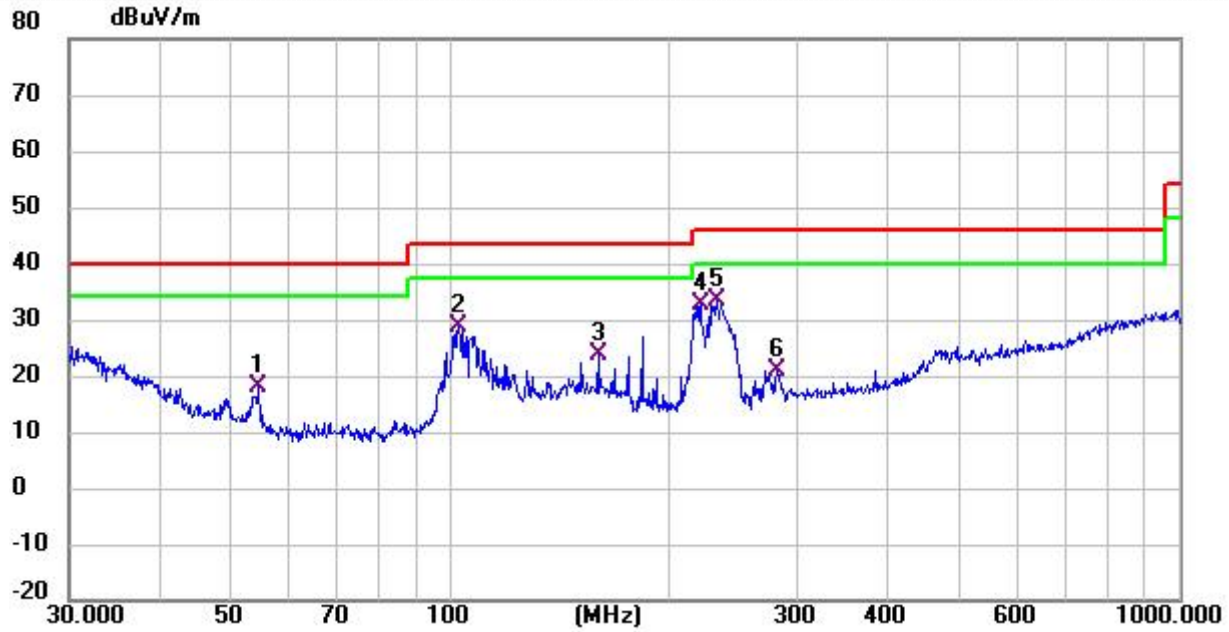
Radiated Spurious Emissions

Notes:
1). Measuring frequencies from 9 KHz - 10th harmonic (ex. 26.5GHz), No emission found between lowest internal used/generated frequency to 30 MHz.
2). Radiated emissions measured in frequency range from 9 KHz - 10th harmonic (ex. 26.5GHz) were made with an instrument using Peak detector mode.
3). 18~25 GHz at least have 20dB margin. No recording in the test report.

Remark:
1.GFSK modes were test at Low, Middle, and High channel; only the worst result of GFSK Middle Channel was reported as below:

For 30MHz-1GHz

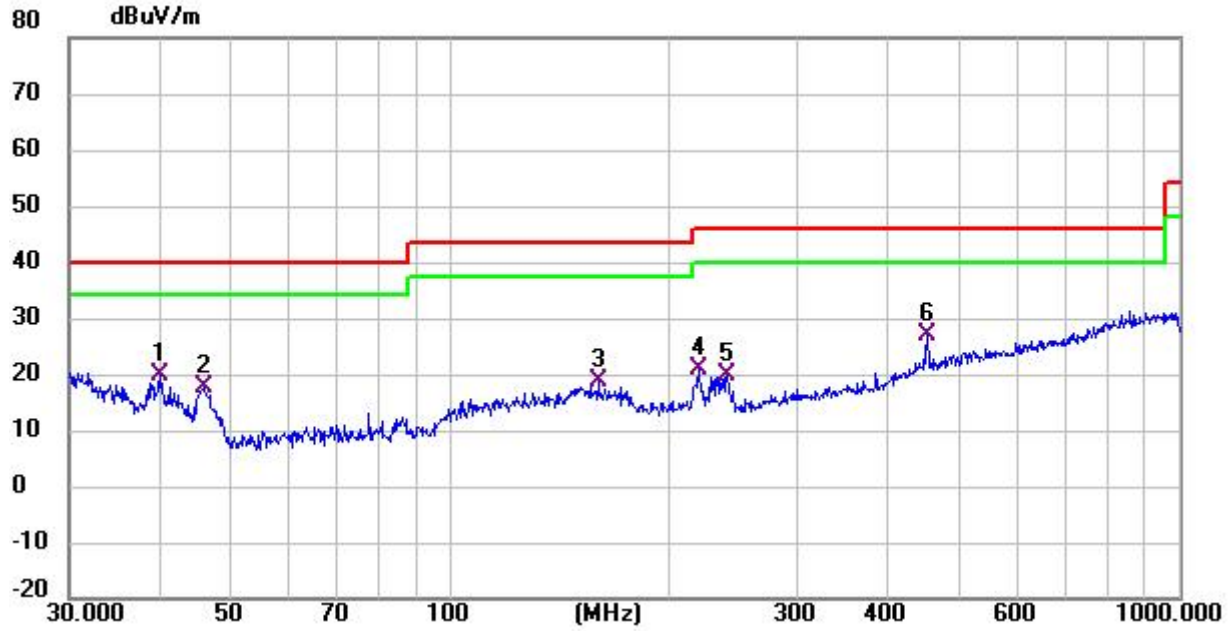
Horizontal



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	54.6800	6.62	11.45	18.07	40.00	-21.93	QP	200	50	P	
2	102.8399	14.78	13.91	28.69	43.50	-14.81	QP	200	100	P	
3	160.0000	6.47	17.30	23.77	43.50	-19.73	QP	200	150	P	
4	221.2000	17.50	15.03	32.53	46.00	-13.47	QP	200	200	P	
5 *	232.8000	18.29	14.94	33.23	46.00	-12.77	QP	200	250	P	
6	281.6800	5.01	15.88	20.89	46.00	-25.11	QP	200	300	P	

*:Maximum data x:Over limit !:over margin

Vertical



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	40.0000	6.01	13.80	19.81	40.00	-20.19	QP	100	10	P	
2	45.9199	7.58	10.06	17.64	40.00	-22.36	QP	100	100	P	
3	160.0000	1.39	17.30	18.69	43.50	-24.81	QP	100	140	P	
4	219.2000	5.86	15.05	20.91	46.00	-25.09	QP	100	200	P	
5	240.0000	4.85	14.88	19.73	46.00	-26.27	QP	100	270	P	
6 *	452.5200	6.35	20.66	27.01	46.00	-18.99	QP	100	330	P	

*:Maximum data x:Over limit !:over margin

Frequency	Antenna	Reading	Cable Loss	Ant Factor	Amplifier	Results	Limits	Det.
(MHz)	Pol.	(dBuV/m)	(dB)	(dB)	(dB)	(dBuV/m)	(dBuV/m)	Mode
2403	H	87.8	3.32	27.49	36.22	82.39	114	Peak
2403	H	67.6	3.32	27.49	36.22	62.19	94	AVG
2403	V	87.3	3.32	27.49	36.22	81.89	114	Peak
2403	V	66.4	3.32	27.49	36.22	60.99	94	AVG
2442	H	87.5	3.35	27.47	36.28	82.04	114	Peak
2442	H	66.3	3.35	27.47	36.28	60.84	94	AVG
2442	V	87.1	3.35	27.47	36.28	81.64	114	Peak
2442	V	66.8	3.35	27.47	36.28	61.34	94	AVG
2480	H	87.9	3.38	27.45	36.34	82.39	114	Peak
2480	H	66	3.38	27.45	36.34	60.49	94	AVG
2480	V	86.4	3.38	27.45	36.34	80.89	114	Peak
2480	V	66	3.38	27.45	36.34	60.49	94	AVG

For Above 1 GHz

Frequency	Antenna	Reading	Cable Loss	Ant Factor	Amplifier	Results	Limits	Det.
(MHz)	Pol.	(dBuV/m)	(dB)	(dB)	(dB)	(dBuV/m)	(dBuV/m)	Mode
4806	H	61.3	6.98	31.42	36.5	63.2	74	PK
4806	H	43.23	6.98	31.42	36.5	45.13	54	AV
4806	V	60.23	6.98	31.42	36.5	62.13	74	PK
4806	V	43.8	6.98	31.42	36.5	45.7	54	AV
4884	H	60.77	7.58	30.98	36.5	62.83	74	PK
4884	H	44.41	7.58	30.98	36.5	46.47	54	AV
4884	V	61.25	7.58	30.98	36.5	63.31	74	PK
4884	V	43.68	7.58	30.98	36.5	45.74	54	AV
4960	H	61.58	7.8	31.47	36.2	64.65	74	PK
4960	H	46.38	7.8	31.47	36.2	49.45	54	AV
4960	V	61.8	7.8	31.47	36.2	64.87	74	PK
4960	V	46.20	7.8	31.47	36.2	49.27	54	AV

REMARKS:

1. 1:Result = Reading + Cable Loss +Ant Factor –Amplifier
2. -- Mean the PK detector measured value is below average limit.
3. The other emission levels were very low against the limit.

Bandedge Emission

GFSK

Frequency(MHz):			2400		Polarity:		HORIZONTAL		
Frequency (MHz)	Emission Level (dBuV/m)		Limit (dBuV/m)	Margin (dB)	Raw Value (dBuV)	Antenna Factor (dB/m)	Cable Factor (dB)	Pre-amplifier (dB)	Correction Factor (dB/m)
2400.00	56.97	PK	74	17.03	62.38	27.49	3.32	36.22	-5.41
2400.00	40.87	AV	54	13.13	46.28	27.49	3.32	36.22	-5.41
Frequency(MHz):			**2400**		**Polarity:**		**VERTICAL**		
Frequency (MHz)	Emission Level (dBuV/m)		Limit (dBuV/m)	Margin (dB)	Raw Value (dBuV)	Antenna Factor (dB/m)	Cable Factor (dB)	Pre-amplifier (dB)	Correction Factor (dB/m)
2400.00	54.78	PK	74	19.22	60.19	27.49	3.32	36.22	-5.41
2400.00	39.97	AV	54	14.03	45.38	27.49	3.32	36.22	-5.41
Frequency(MHz):			**2483.50**		**Polarity:**		**HORIZONTAL**		
Frequency (MHz)	Emission Level (dBuV/m)		Limit (dBuV/m)	Margin (dB)	Raw Value (dBuV)	Antenna Factor (dB/m)	Cable Factor (dB)	Pre-amplifier (dB)	Correction Factor (dB/m)
2483.50	57.25	PK	74	16.75	62.76	27.45	3.38	36.34	-5.51
2483.50	39.34	AV	54	14.66	44.85	27.45	3.38	36.34	-5.51
Frequency(MHz):			**2483.50**		**Polarity:**		**VERTICAL**		
Frequency (MHz)	Emission Level (dBuV/m)		Limit (dBuV/m)	Margin (dB)	Raw Value (dBuV)	Antenna Factor (dB/m)	Cable Factor (dB)	Pre-amplifier (dB)	Correction Factor (dB/m)
2483.50	55.36	PK	74	18.64	60.87	27.45	3.38	36.34	-5.51
2483.50	41.72	AV	54	12.28	47.23	27.45	3.38	36.34	-5.51

REMARKS:

1. Emission level (dBuV/m) =Raw Value (dBuV)+Correction Factor (dB/m)
2. Correction Factor (dB/m) = Antenna Factor (dB/m)+Cable Factor (dB)- Pre-amplifier
3. Margin value = Limit value- Emission level.
4. -- Mean the PK detector measured value is below average limit.

5.3. 20dB Bandwidth

TEST CONFIGURATION

TEST PROCEDURE

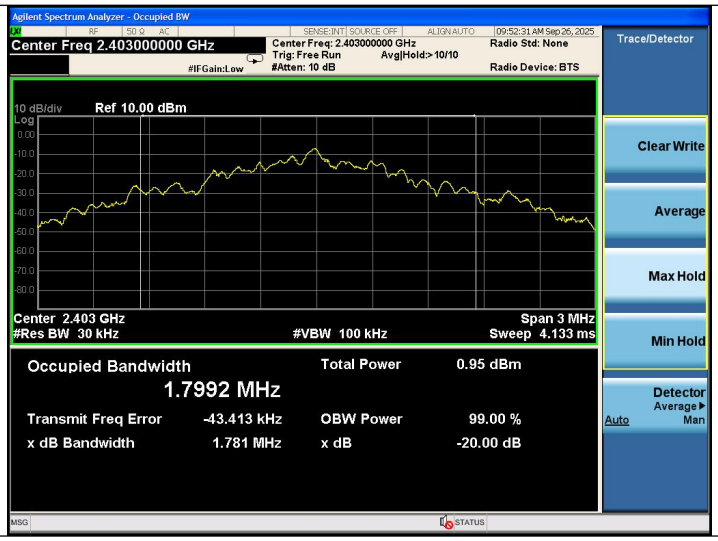
1:The transmitter output was connected to the spectrum analyzer through an attenuator, the path loss was compensated to the results for each measurement.
2:Set to the maximum power setting and enable the EUT transmit continuously.
3:Use the following spectrum analyzer settings:
Span = approximately 2 to 3 times the 20 dB bandwidth, centered on a test channel RBW ⩾ 1% of the 20 dB bandwidth, VBW ⩾ RBW
Sweep = auto, Detector function = peak, Trace = max hold
4:Measure and record the results in the test report.

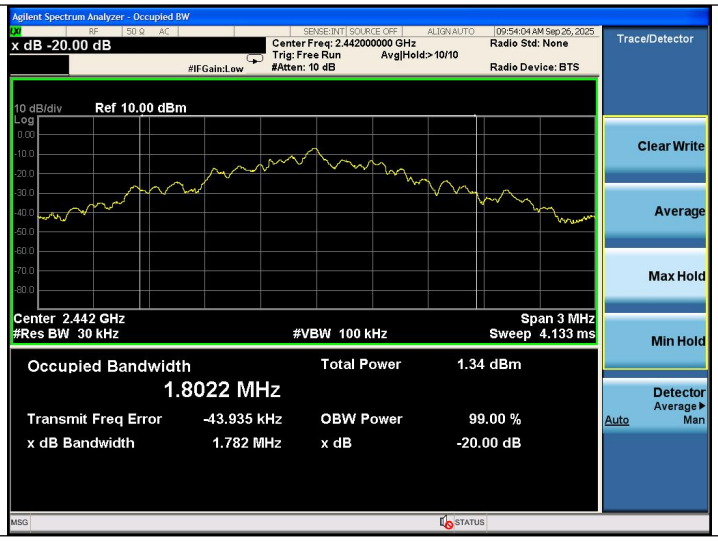
TEST RESULTS

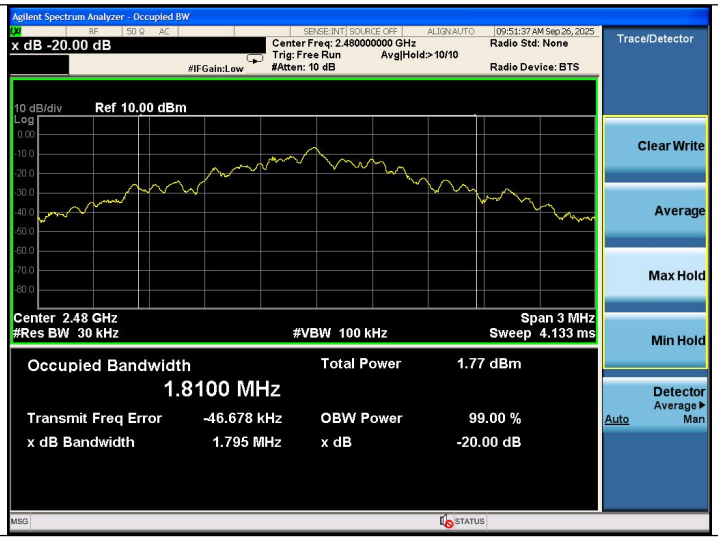
Modulation	Channel Frequency (MHz)	99% OBW (MHz)	20dB bandwidth (MHz)	Result
GFSK	2403	1.7992	1.781	Pass
GFSK	2442	1.8022	1.782	Pass
GFSK	2480	1.8100	1.795	Pass

Test plot as follows:

GFSK Modulation







5.4. Antenna Requirement

Standard Applicable

For intentional device, according to FCC 47 CFR Section 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.

Refer to statement below for compliance

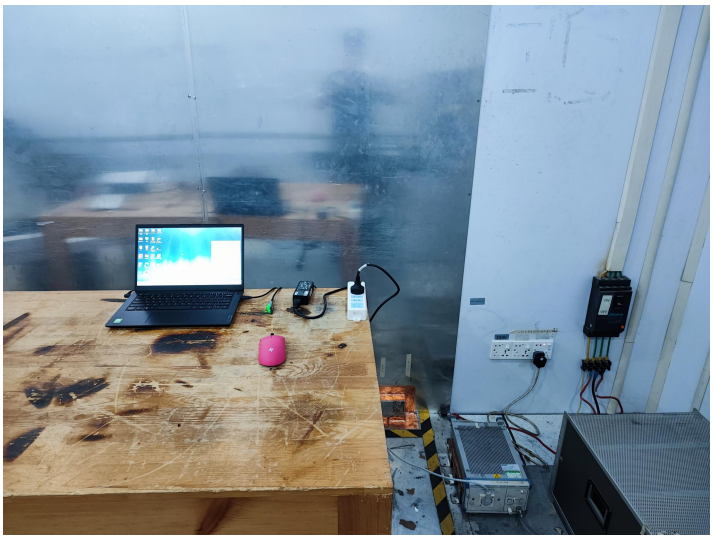
The manufacturer may design the unit so that the user can replace a broken antenna, but the use of a standard antenna jack or electrical connector is prohibited. Further, this requirement does not apply to intentional radiators that must be professionally installed.

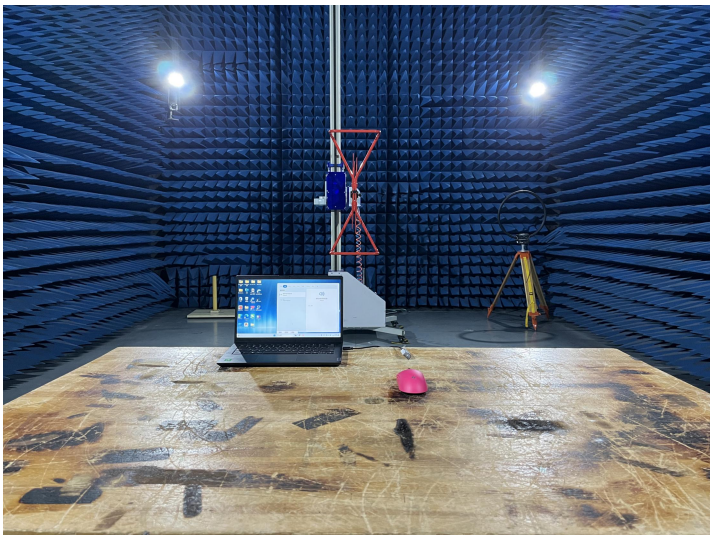
Antenna Connected Construction

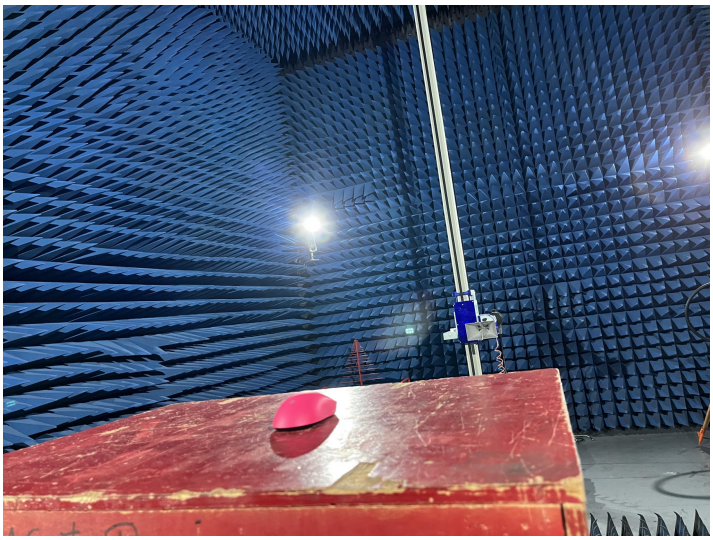
The directional gains of antenna used for transmitting is -2.39dBi, and the antenna is a PCB antenna connect to PCB board and no consideration of replacement. Please see EUT photo for details.

Results: Compliance.

6. Test Setup Photos of the EUT







7. External and Internal Photos of the EUT

See related photo report.

.....End of Report.....