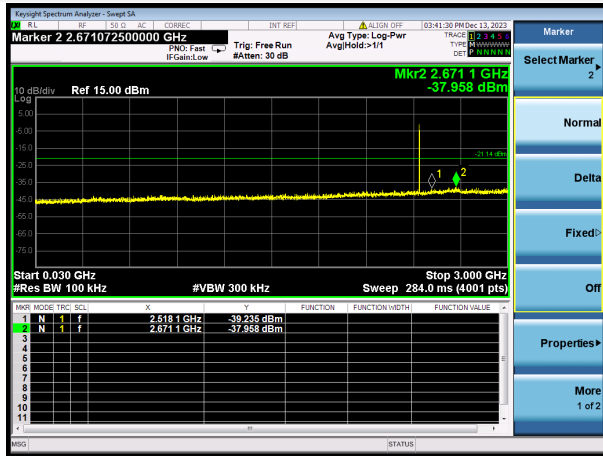
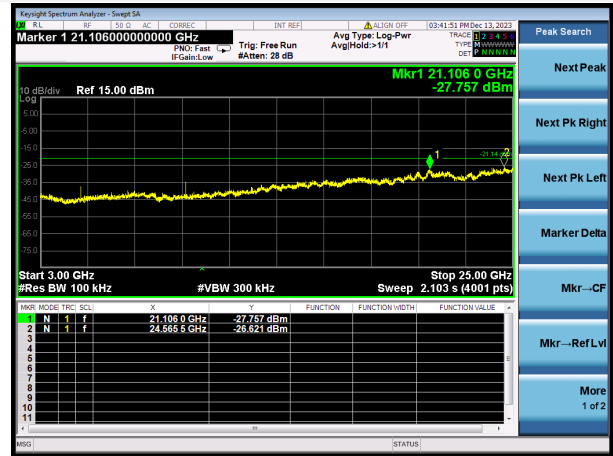


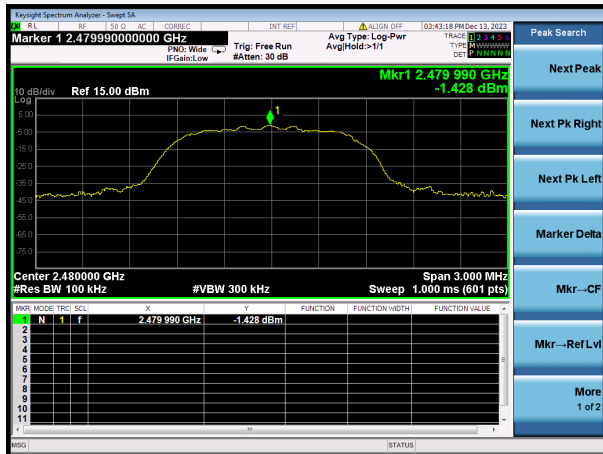
8-DPSK MIDDLE CHANNEL, SPURIOUS
30 MHz ~ 3 GHz



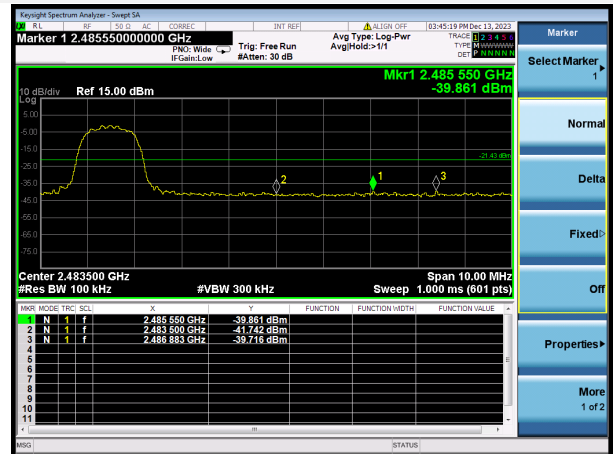
8-DPSK MIDDLE CHANNEL, SPURIOUS
3 GHz ~ 25 GHz



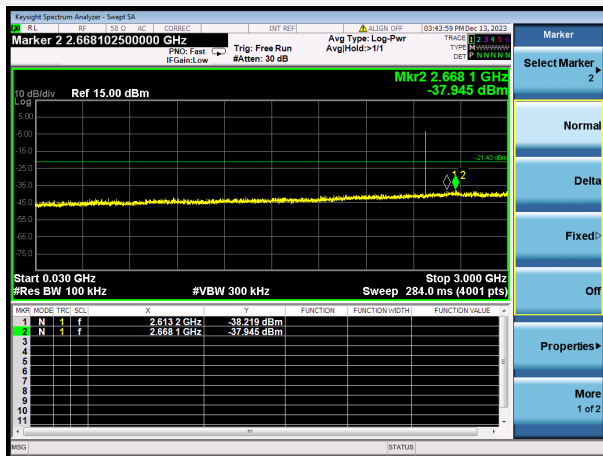
8-DPSK HIGH CHANNEL, CARRIER LEVEL



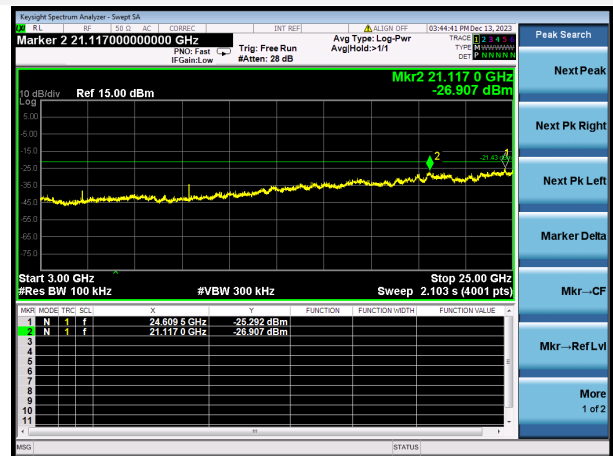
8-DPSK HIGH CHANNEL, BAND EDGE



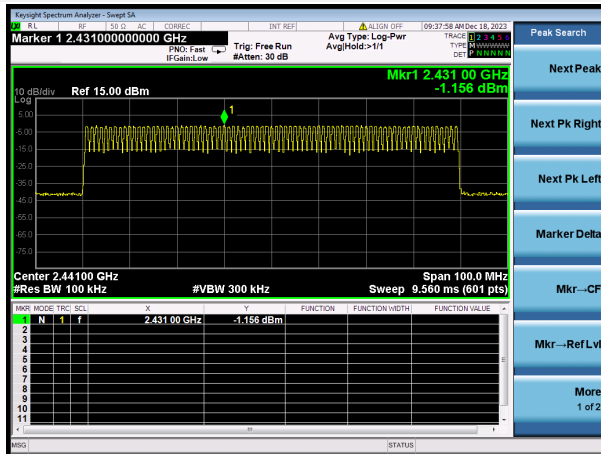
8-DPSK HIGH CHANNEL, SPURIOUS
30 MHz ~ 3 GHz



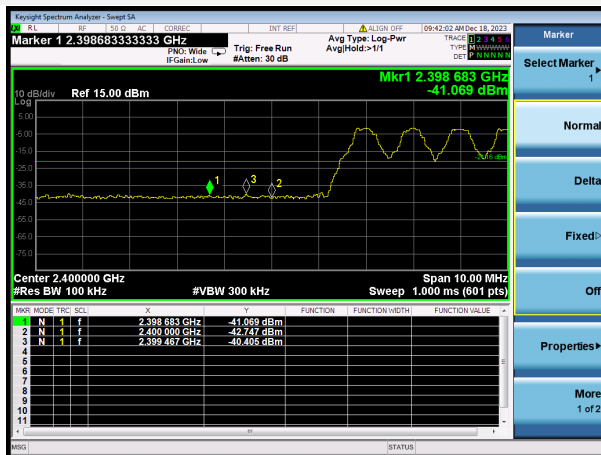
8-DPSK HIGH CHANNEL, SPURIOUS
3 GHz ~ 25 GHz



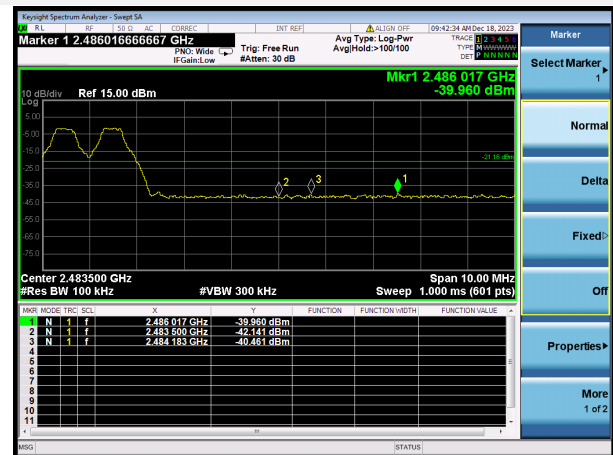
GFSK HOPPING, CARRIER LEVEL



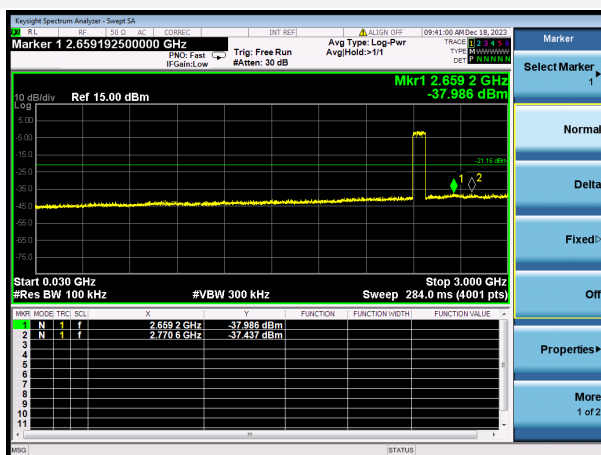
GFSK HOPPING BAND EDGE (LOW)



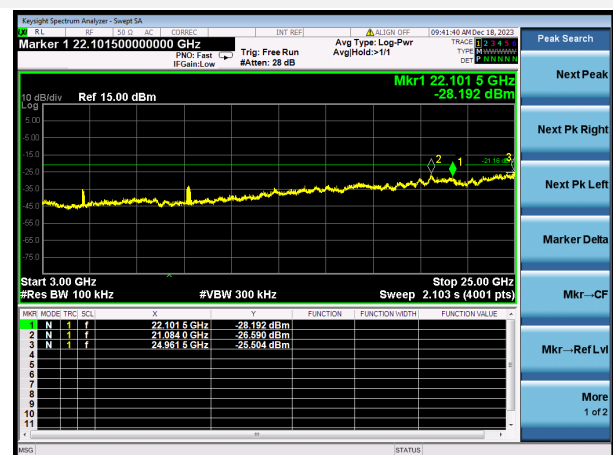
GFSK HOPPING BAND EDGE (HIGH)



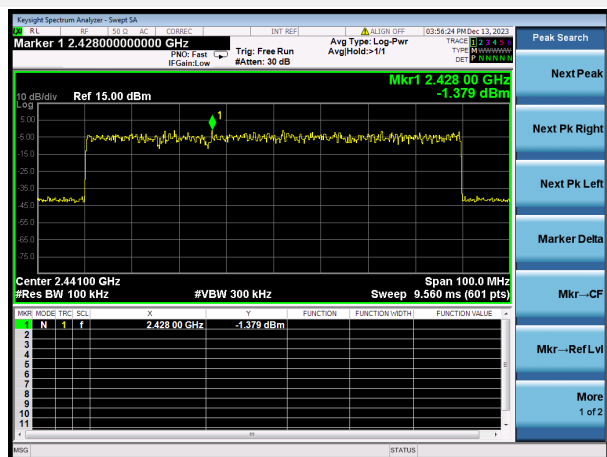
GFSK Hopping Mode, SPURIOUS 30 MHz ~ 3 GHz



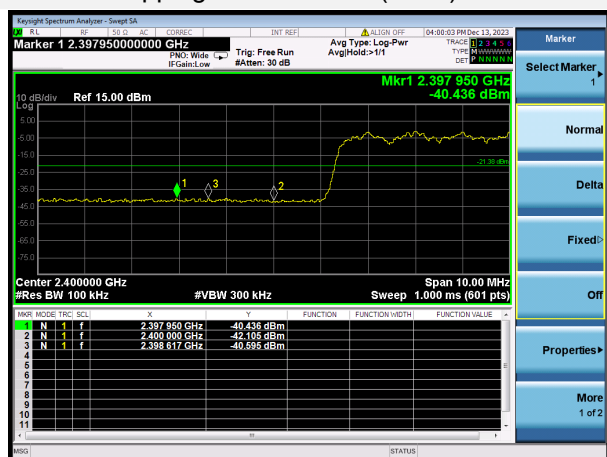
GFSK Hopping Mode, SPURIOUS 3GHz ~ 25 GHz



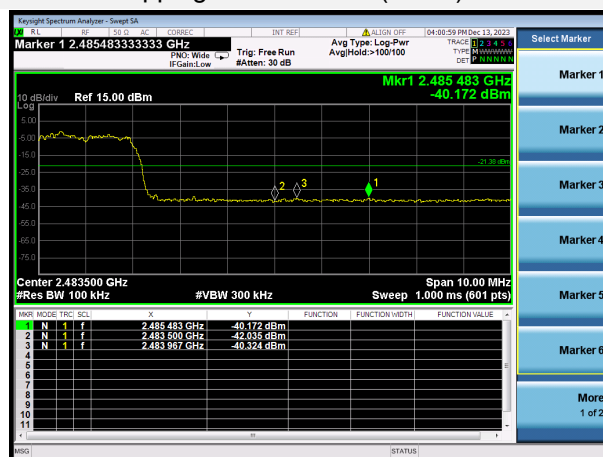
8-DPSK HOPPING, CARRIER LEVEL



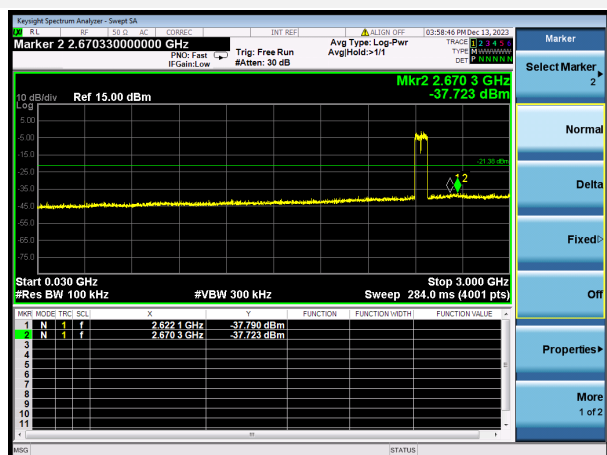
8-DPSK Hopping BAND EDGE (LOW)



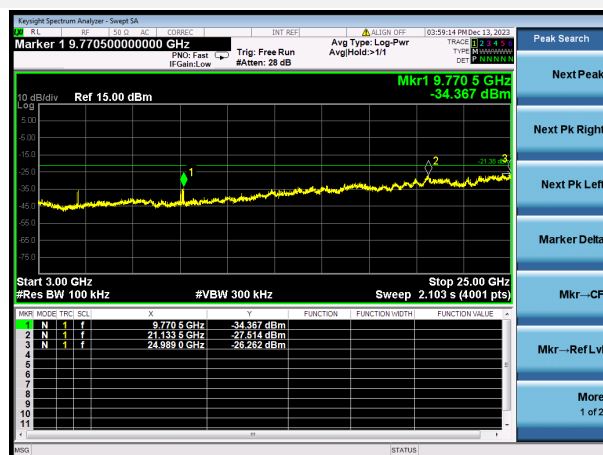
8-DPSK Hopping BAND EDGE (HIGH)



8-DPSK Hopping Mode, SPURIOUS 30 MHz ~ 3 GHz



8-DPSK Hopping Mode, SPURIOUS 3GHz ~ 25 GHz



5.9 Conducted Emission

5.9.1 Limit

FCC §15.207

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 within the band 150 kHz to 30 MHz shall not exceed the limits in the following table, as measured using a 50 μ H/50 Ω line impedance stabilization network (LISN).

Frequency range (MHz)	Conducted Limit (dB μ V)	
	Quai-peak	Average
0.15 - 0.50	66 to 56	56 to 46
0.50 - 5	56	46
0.50 - 30	60	50

5.9.2 Test Setup

See section 4.5.2 for test setup description for the AC power supply port. The photo of test setup please refer to ANNEX A.

5.9.3 Test Procedure

The maximum conducted interference is searched using Peak (PK), if the emission levels more than the AV and QP limits, and that have narrow margins from the AV and QP limits will be re-measured with AV and QP detectors. Tests for both L phase and N phase lines of the power mains connected to the EUT are performed. Refer to recorded points and plots below.

Devices subject to Part 15 must be tested for all available U.S. voltages and frequencies (such as a nominal 120 VAC, 50/60 Hz and 240 VAC, 50/60 Hz) for which the device is capable of operation. A device rated for 50/60 Hz operation need not be tested at both frequencies provided the radiated and line conducted emissions are the same at both frequencies.

5.9.4 Test Result

Note: Not applicable.

5.10 Radiated Spurious Emission

5.10.1 Limit

FCC §15.209&15.247(d)

Radiated emission outside the frequency band attenuation below the general limits specified in FCC section 15.209(a) is not required. In addition, radiated emissions which fall in the restricted bands, as defined in FCC section 15.205(a), must also comply with the radiated emission limits specified in FCC section 15.209(a).

According to FCC section 15.209 (a), except as provided elsewhere in this subpart, the emissions from an intentional radiator shall not exceed the field strength levels specified in the following table:

Frequency (MHz)	Field Strength ($\mu\text{V}/\text{m}$)	Measurement Distance (m)
0.009 - 0.490	2400/F(kHz)	300
0.490 - 1.705	24000/F(kHz)	30
1.705 - 30.0	30	30
30 - 88	100	3
88 - 216	150	3
216 - 960	200	3
Above 960	500	3

Note:

1. Field Strength (dB $\mu\text{V}/\text{m}$) = 20*log[Field Strength ($\mu\text{V}/\text{m}$)].
2. In the emission tables above, the tighter limit applies at the band edges.
3. For Above 1000 MHz, the emission limit in this paragraph is based on measurement instrumentation employing an average detector, measurement using instrumentation with a peak detector function, corresponding to 20dB above the maximum permitted average limit.
4. For above 1000 MHz, limit field strength of harmonics: 54dBuV/m@3m (AV) and 74dBuV/m@3m (PK).

5.10.2 Test Setup

See section 4.5.3 to 4.5.5 for test setup description for the antenna port. The photo of test setup please refer to ANNEX A.

5.10.3 Test Procedure

The measurement frequency range is from 9 kHz to the 10th harmonic of the fundamental frequency. The Turn Table is actuated to turn from 0° to 360°, and both horizontal and vertical polarizations of the Test Antenna are used to find the maximum radiated power. Mid channels on all channel bandwidth verified. Only the worst RB size/offset presented.

The power of the EUT transmitting frequency should be ignored.

All Spurious Emission tests were performed in X, Y, Z axis direction. And only the worst axis test condition was recorded in this test report.

Use the following spectrum analyzer settings:

Span = wide enough to fully capture the emission being measured

RBW = 1 MHz for $f \geq 1$ GHz, 100 kHz for $f < 1$ GHz

VBW \geq RBW

Sweep = auto

Detector function = peak

Trace = max hold

For measurement below 1GHz, If the emission level of the EUT measured by the peak detector is 3 dB lower than the applicable limit, the peak emission level will be reported, Otherwise, the emission measurement will be repeated using the quasi-peak detector and reported.

5.10.4 Test Result

Note ¹: The symbol of "--" in the table which means not application.

Note ²: For the test data above 1 GHz, according the ANSI C63.10-2013, where limits are specified for both average and peak (or quasi-peak) detector functions, if the peak (or quasi-peak) measured value complies with the average limit, it is unnecessary to perform an average measurement.

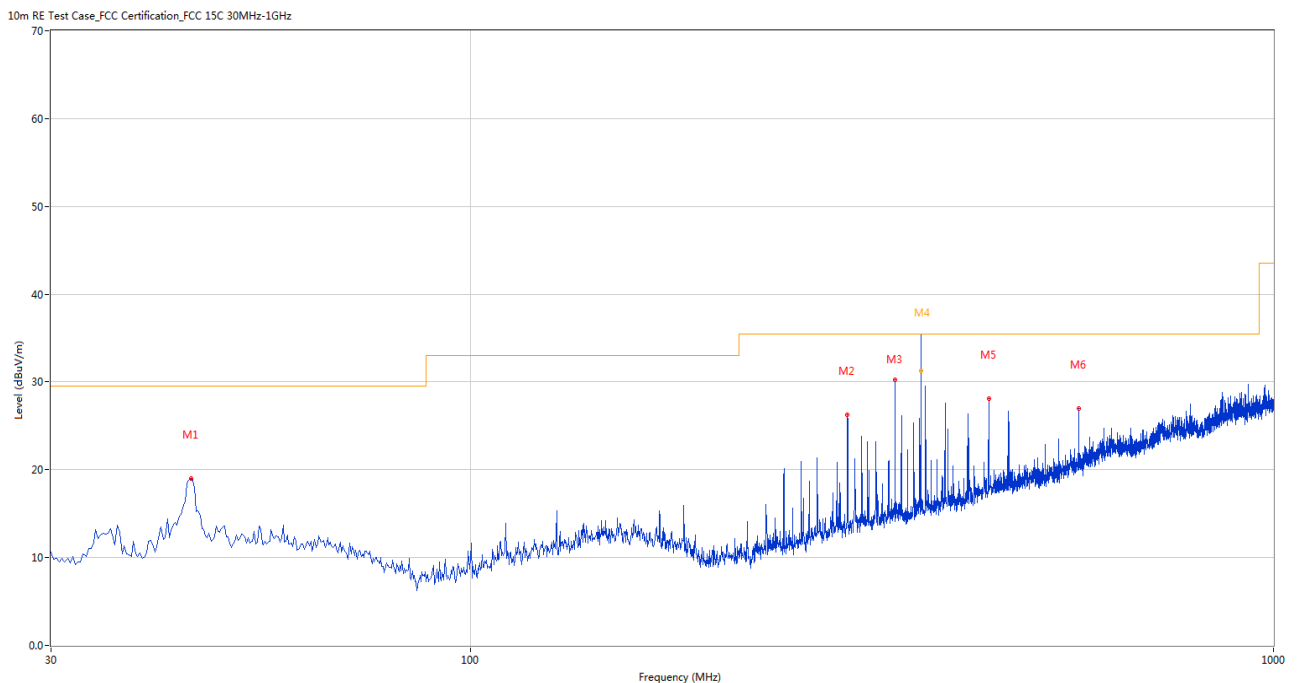
Note ³: The EUT was tested in Link mode and the charging.

Note ⁴: Results (dBuV/m) = Original reading level of Spectrum Analyzer (dBuV/m) + Factor (dB)

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.

Test Data and Plots

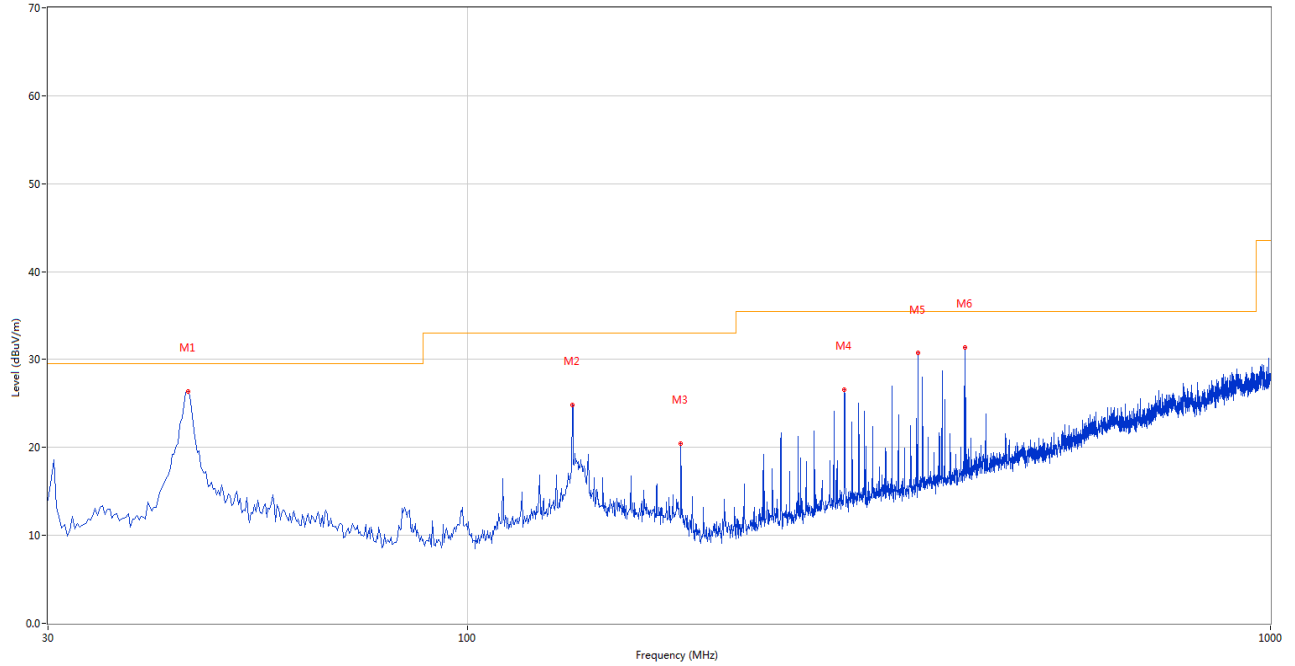
30 MHz to 1 GHz, ANT H



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	44.789	19.03	-26.49	29.5	10.47	Peak	167.00	200	Horizontal	Pass
2	294.744	26.25	-25.07	35.5	9.25	Peak	112.00	200	Horizontal	Pass
3	337.898	30.26	-23.75	35.5	5.24	Peak	140.00	200	Horizontal	Pass
4	363.997	33.71	-23.36	35.5	1.79	Peak	112.00	195	Horizontal	N/A
4*	363.997	31.32	-23.36	35.5	4.18	QP	112.00	195	Horizontal	Pass
5	441.905	28.11	-20.94	35.5	7.39	Peak	286.00	200	Horizontal	Pass
6	571.852	27.00	-17.82	35.5	8.50	Peak	270.00	200	Horizontal	Pass

30 MHz to 1 GHz, ANT V

10m RE Test Case_FCC Certification_FCC 15C 30MHz-1GHz



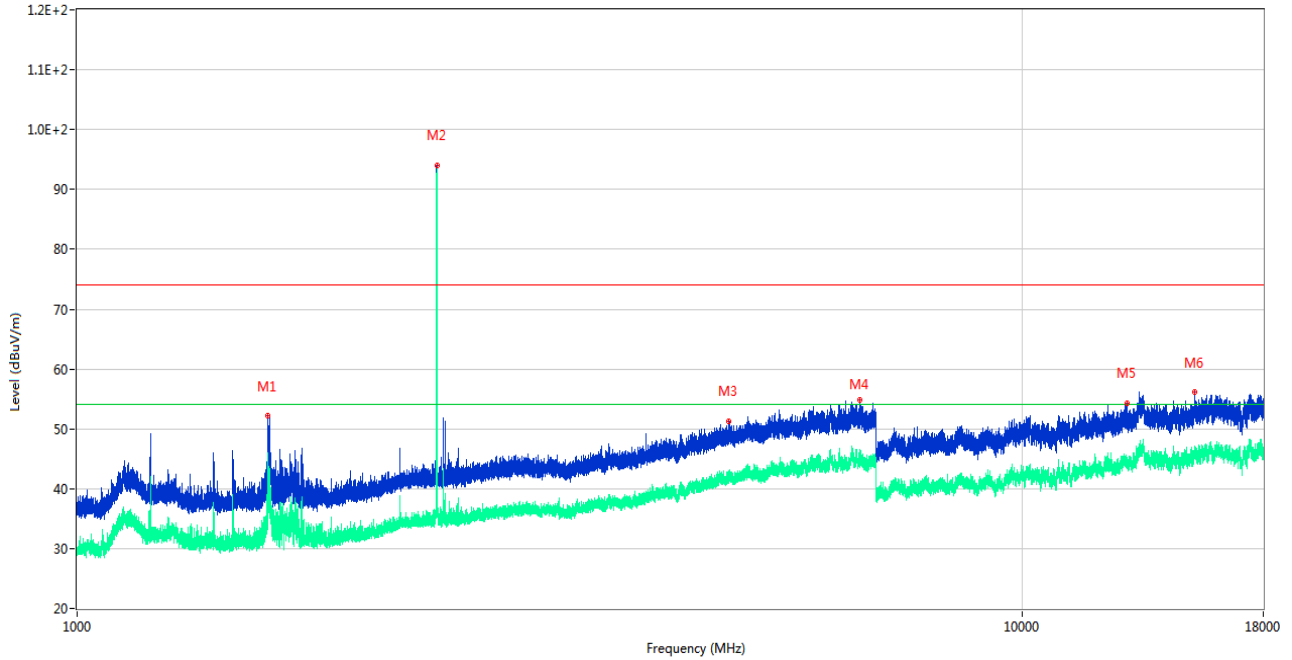
No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	44.789	26.33	-26.49	29.5	3.17	Peak	230.00	200	Vertical	Pass
2	134.976	24.85	-26.77	33.0	8.15	Peak	360.00	200	Vertical	Pass
3	184.191	20.43	-27.71	33.0	12.57	Peak	87.00	100	Vertical	Pass
4	294.744	26.62	-25.07	35.5	8.88	Peak	360.00	200	Vertical	Pass
5	363.839	30.71	-23.36	35.5	4.79	Peak	0.00	100	Vertical	Pass
6	415.964	31.34	-21.84	35.5	4.16	Peak	53.00	100	Vertical	Pass

Note 1: The marked spikes near 2400 MHz with circle should be ignored because they are Fundamental signal.

Note 2: The spurious from 18GHz-25GHz is noise only, do not show on the report.

GFSK LOW CHANNEL 1 GHz to 18 GHz, ANT H

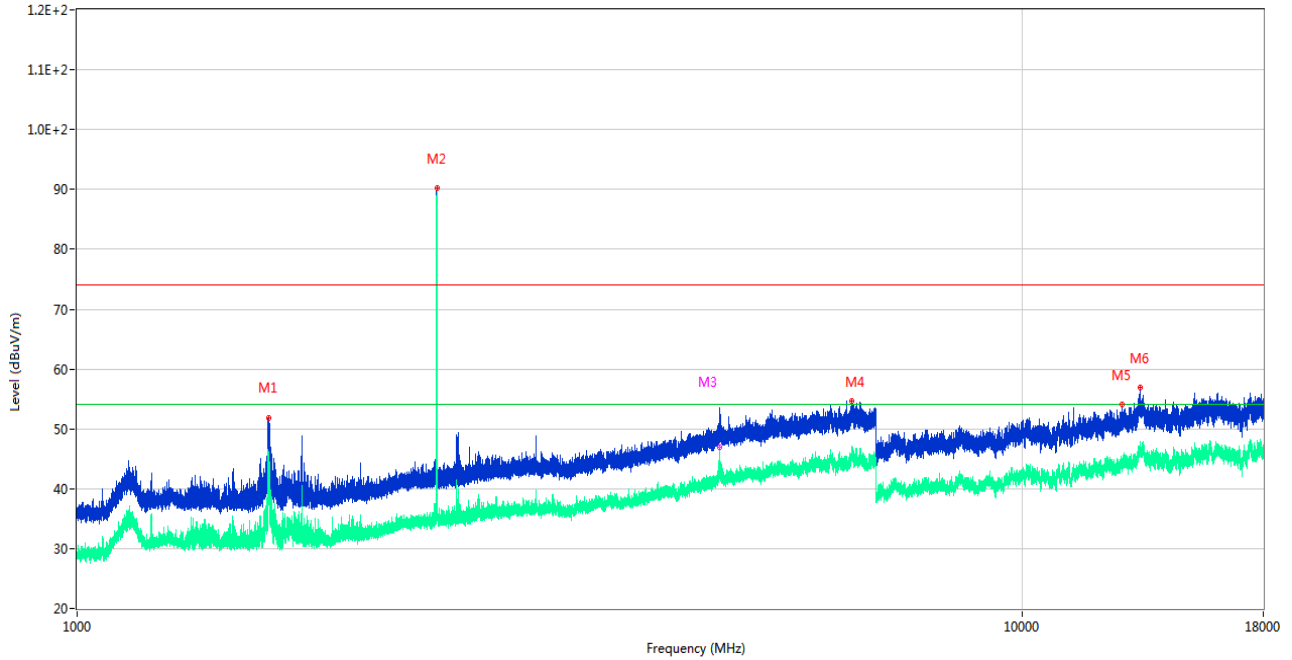
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1593.100	52.19	-17.75	74.0	21.81	Peak	200.00	100	Horizontal	Pass
1**	1593.100	41.93	-17.75	54.0	12.07	AV	200.00	100	Horizontal	Pass
2	2402.200	94.08	-12.43	74.0	-20.08	Peak	261.00	150	Horizontal	N/A
2**	2402.200	93.43	-12.43	54.0	-39.43	AV	261.00	150	Horizontal	N/A
3	4889.000	51.29	-3.37	74.0	22.71	Peak	232.00	150	Horizontal	Pass
3**	4889.000	41.60	-3.37	54.0	12.40	AV	232.00	150	Horizontal	Pass
4	6735.600	54.77	-0.06	74.0	19.23	Peak	232.00	100	Horizontal	Pass
4**	6735.600	44.92	-0.06	54.0	9.08	AV	232.00	100	Horizontal	Pass
5	12923.513	54.32	1.17	74.0	19.68	Peak	346.00	400	Horizontal	Pass
5**	12923.513	42.93	1.17	54.0	11.07	AV	346.00	400	Horizontal	Pass
6	15246.113	56.11	0.85	74.0	17.89	Peak	180.00	100	Horizontal	Pass
6**	15246.113	46.90	0.85	54.0	7.10	AV	180.00	100	Horizontal	Pass

GFSK LOW CHANNEL 1 GHz to 18 GHz, ANT V

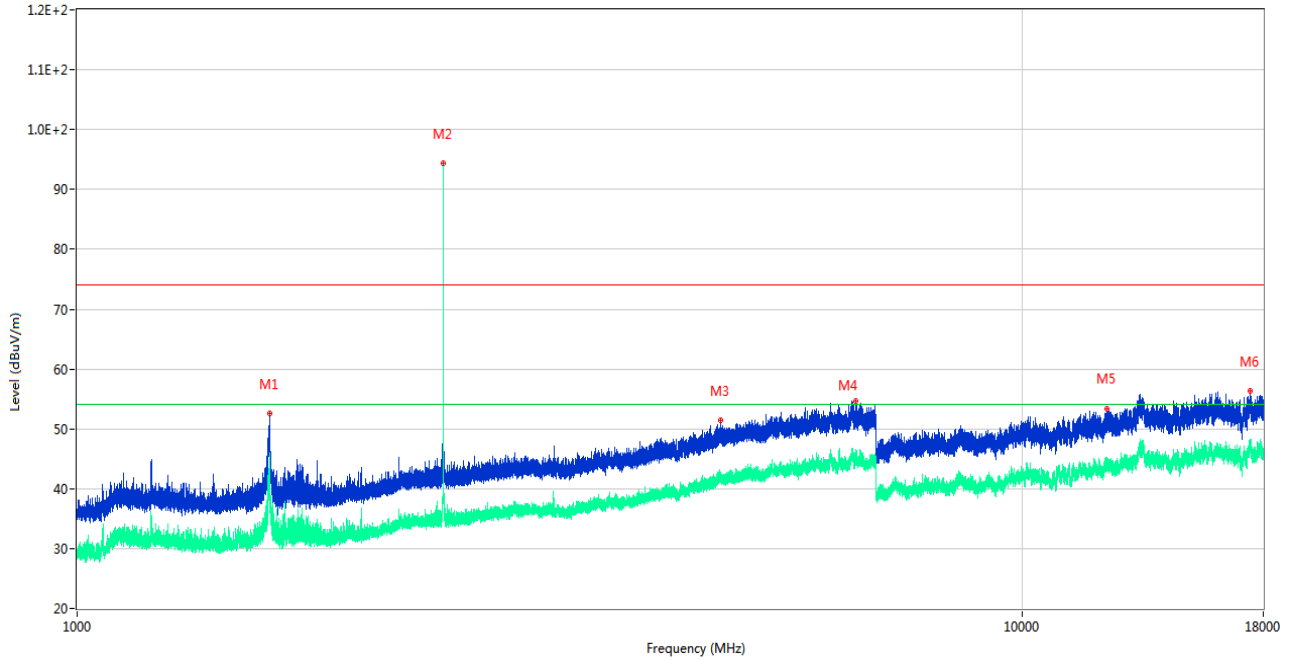
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1593.400	51.90	-17.74	74.0	22.10	Peak	138.00	100	Vertical	Pass
1**	1593.400	37.45	-17.74	54.0	16.55	AV	138.00	100	Vertical	Pass
2	2402.100	90.16	-12.44	74.0	-16.16	Peak	127.00	150	Vertical	N/A
2**	2402.100	89.57	-12.44	54.0	-35.57	AV	127.00	150	Vertical	N/A
3	4784.200	49.92	-2.69	74.0	24.08	Peak	293.00	150	Vertical	Pass
3**	4784.200	46.84	-2.69	54.0	7.16	AV	293.00	150	Vertical	Pass
4	6607.800	54.64	1.53	74.0	19.36	Peak	0.00	300	Vertical	Pass
4**	6607.800	45.80	1.53	54.0	8.20	AV	0.00	300	Vertical	Pass
5	12771.262	54.05	1.08	74.0	19.95	Peak	250.00	100	Vertical	Pass
5**	12771.262	44.10	1.08	54.0	9.90	AV	250.00	100	Vertical	Pass
6	13331.700	56.87	0.96	74.0	17.13	Peak	172.00	400	Vertical	Pass
6**	13331.700	46.52	0.96	54.0	7.48	AV	172.00	400	Vertical	Pass

GFSK MIDDLE CHANNEL 1 GHz to 18 GHz, ANT H

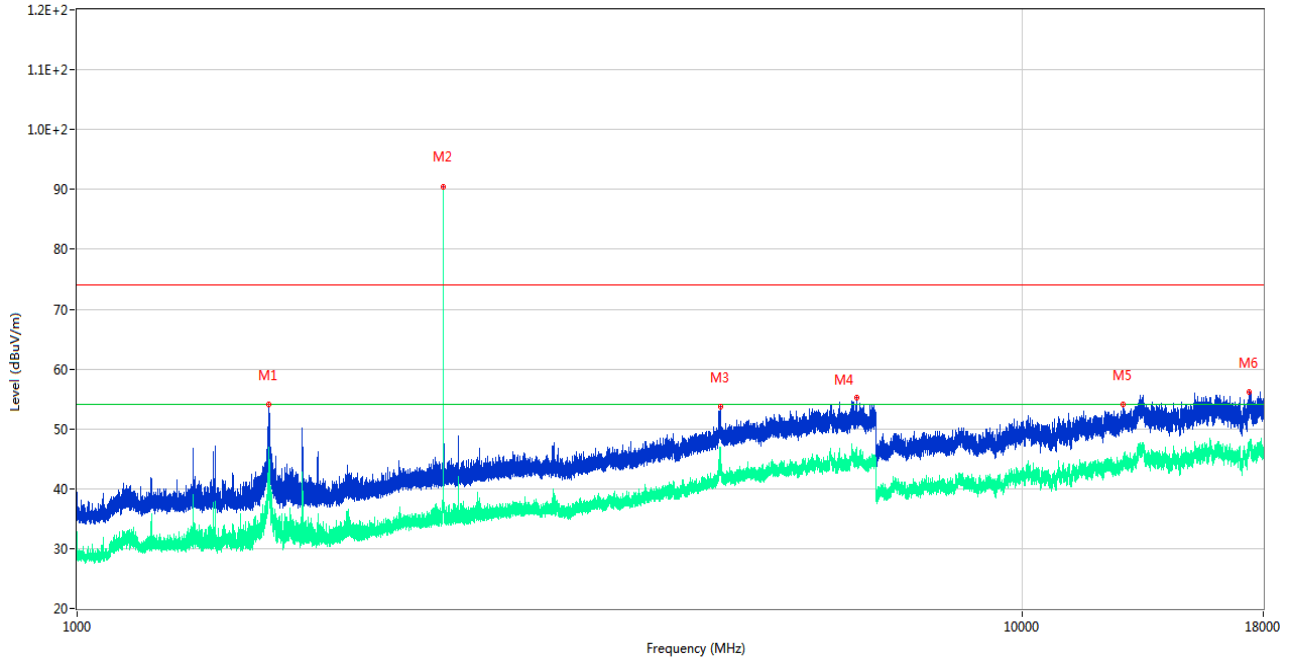
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1597.200	52.54	-17.81	74.0	21.46	Peak	271.00	400	Horizontal	Pass
1**	1597.200	39.54	-17.81	54.0	14.46	AV	271.00	400	Horizontal	Pass
2	2441.000	94.36	-12.44	74.0	-20.36	Peak	252.00	200	Horizontal	N/A
2**	2441.000	93.95	-12.44	54.0	-39.95	AV	252.00	200	Horizontal	N/A
3	4792.600	51.44	-2.44	74.0	22.56	Peak	159.00	100	Horizontal	Pass
3**	4792.600	42.14	-2.44	54.0	11.86	AV	159.00	100	Horizontal	Pass
4	6676.000	54.66	0.29	74.0	19.34	Peak	159.00	100	Horizontal	Pass
4**	6676.000	45.39	0.29	54.0	8.61	AV	159.00	100	Horizontal	Pass
5	12307.826	53.36	1.38	74.0	20.64	Peak	0.00	400	Horizontal	Pass
5**	12307.826	43.88	1.38	54.0	10.12	AV	0.00	400	Horizontal	Pass
6	17430.637	56.29	3.43	74.0	17.71	Peak	20.00	100	Horizontal	Pass
6**	17430.637	46.86	3.43	54.0	7.14	AV	20.00	100	Horizontal	Pass

GFSK MIDDLE CHANNEL 1 GHz to 18 GHz, ANT V

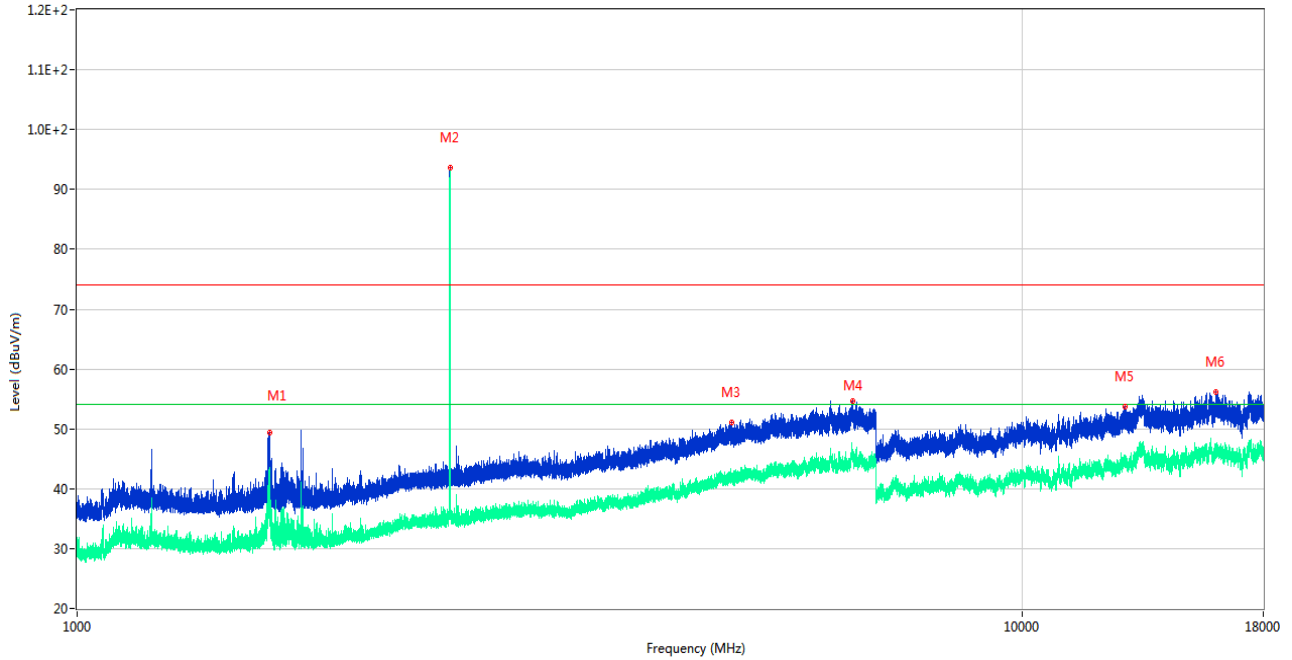
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1593.800	54.03	-17.73	74.0	19.97	Peak	224.00	400	Vertical	Pass
1**	1593.800	46.36	-17.73	54.0	7.64	AV	224.00	400	Vertical	Pass
2	2440.800	90.43	-12.43	74.0	-16.43	Peak	116.00	100	Vertical	N/A
2**	2440.800	89.70	-12.43	54.0	-35.70	AV	116.00	100	Vertical	N/A
3	4791.800	53.65	-2.48	74.0	20.35	Peak	233.00	200	Vertical	Pass
3**	4791.800	44.57	-2.48	54.0	9.43	AV	233.00	200	Vertical	Pass
4	6680.600	55.30	0.16	74.0	18.70	Peak	150.00	300	Vertical	Pass
4**	6680.600	45.78	0.16	54.0	8.22	AV	150.00	300	Vertical	Pass
5	12801.450	54.04	1.05	74.0	19.96	Peak	203.00	200	Vertical	Pass
5**	12801.450	44.67	1.05	54.0	9.33	AV	203.00	200	Vertical	Pass
6	17391.526	56.09	2.91	74.0	17.91	Peak	340.00	400	Vertical	Pass
6**	17391.526	46.42	2.91	54.0	7.58	AV	340.00	400	Vertical	Pass

GFSK HIGH CHANNEL 1 GHz to 18 GHz, ANT H

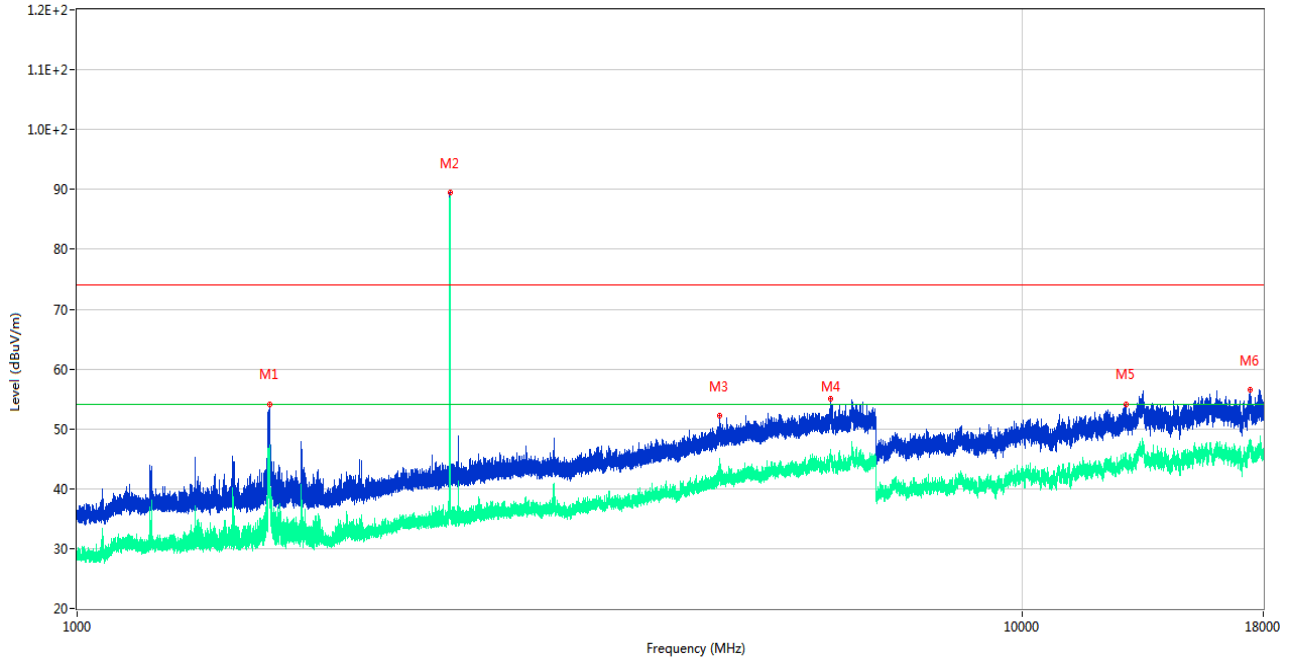
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1598.100	49.46	-17.89	74.0	24.54	Peak	88.00	100	Horizontal	Pass
1**	1598.100	40.47	-17.89	54.0	13.53	AV	88.00	100	Horizontal	Pass
2	2479.800	93.72	-12.03	74.0	-19.72	Peak	236.00	100	Horizontal	N/A
2**	2479.800	92.09	-12.03	54.0	-38.09	AV	236.00	100	Horizontal	N/A
3	4924.600	51.14	-2.35	74.0	22.86	Peak	199.00	200	Horizontal	Pass
3**	4924.600	41.57	-2.35	54.0	12.43	AV	199.00	200	Horizontal	Pass
4	6611.800	54.67	1.42	74.0	19.33	Peak	76.00	400	Horizontal	Pass
4**	6611.800	45.62	1.42	54.0	8.38	AV	76.00	400	Horizontal	Pass
5	12861.038	53.75	1.45	74.0	20.25	Peak	303.00	100	Horizontal	Pass
5**	12861.038	44.20	1.45	54.0	9.80	AV	303.00	100	Horizontal	Pass
6	16038.338	56.17	0.78	74.0	17.83	Peak	360.00	400	Horizontal	Pass
6**	16038.338	46.11	0.78	54.0	7.89	AV	360.00	400	Horizontal	Pass

GFSK HIGH CHANNEL 1 GHz to 18 GHz, ANT V

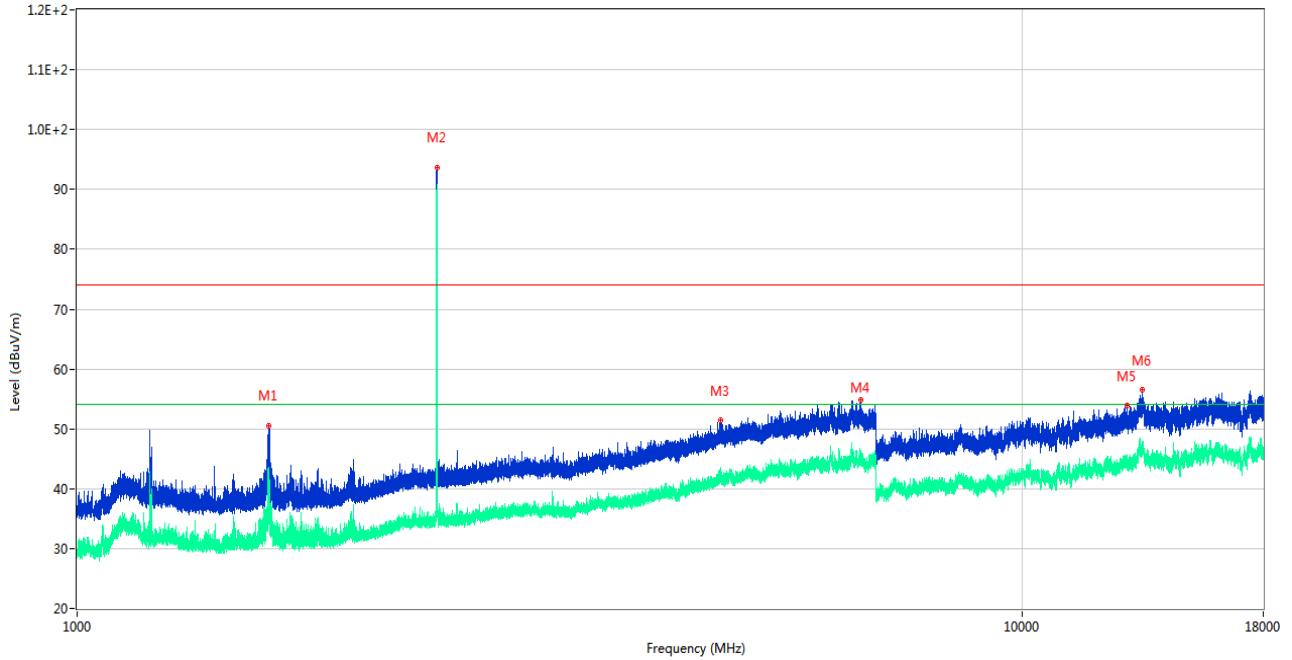
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1599.500	54.16	-17.83	74.0	19.84	Peak	225.00	300	Vertical	Pass
1**	1599.500	38.68	-17.83	54.0	15.32	AV	225.00	300	Vertical	Pass
2	2479.900	89.45	-12.03	74.0	-15.45	Peak	145.00	100	Vertical	N/A
2**	2479.900	88.80	-12.03	54.0	-34.80	AV	145.00	100	Vertical	N/A
3	4785.200	52.17	-2.71	74.0	21.83	Peak	253.00	100	Vertical	Pass
3**	4785.200	41.71	-2.71	54.0	12.29	AV	253.00	100	Vertical	Pass
4	6269.400	55.00	0.39	74.0	19.00	Peak	174.00	300	Vertical	Pass
4**	6269.400	45.92	0.39	54.0	8.08	AV	174.00	300	Vertical	Pass
5	12891.487	54.10	1.58	74.0	19.90	Peak	335.00	200	Vertical	Pass
5**	12891.487	44.53	1.58	54.0	9.47	AV	335.00	200	Vertical	Pass
6	17432.738	56.52	3.35	74.0	17.48	Peak	84.00	400	Vertical	Pass
6**	17432.738	46.89	3.35	54.0	7.11	AV	84.00	400	Vertical	Pass

8-DPSK LOW CHANNEL 1 GHz to 18 GHz, ANT H

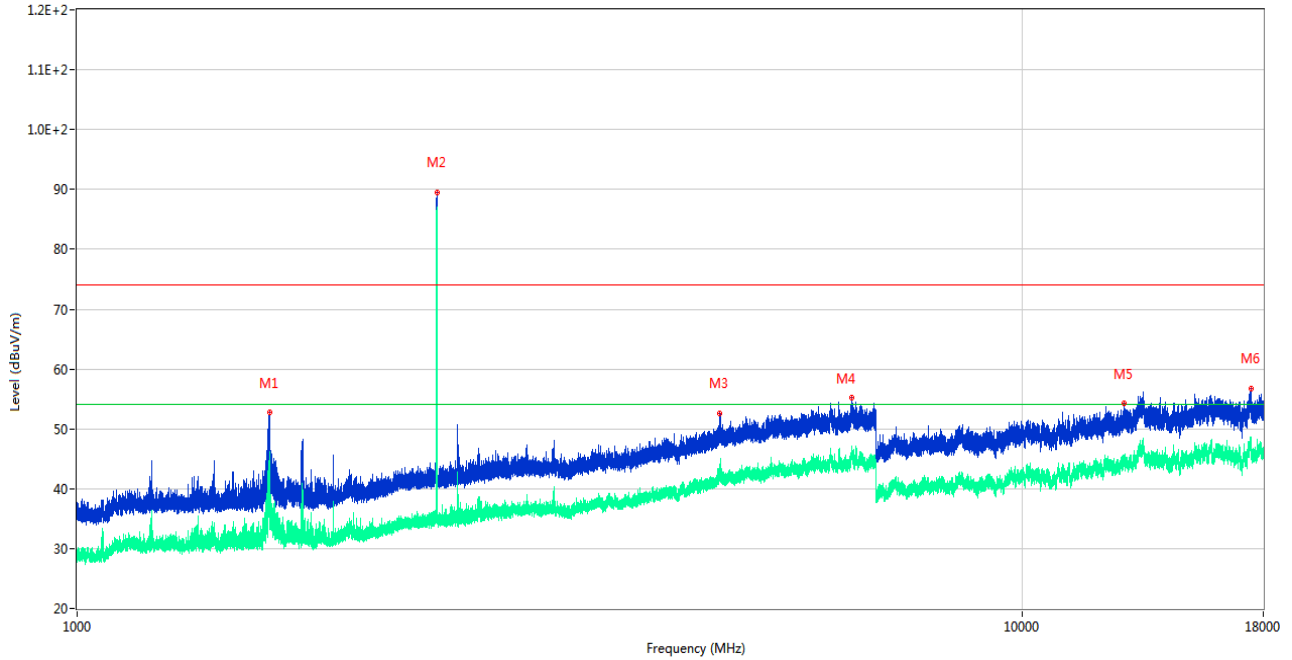
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1593.400	50.51	-17.74	74.0	23.49	Peak	98.00	400	Horizontal	Pass
1**	1593.400	36.91	-17.74	54.0	17.09	AV	98.00	400	Horizontal	Pass
2	2401.900	93.73	-12.47	74.0	-19.73	Peak	249.00	100	Horizontal	N/A
2**	2401.900	90.75	-12.47	54.0	-36.75	AV	249.00	100	Horizontal	N/A
3	4793.400	51.39	-2.36	74.0	22.61	Peak	90.00	100	Horizontal	Pass
3**	4793.400	42.42	-2.36	54.0	11.58	AV	90.00	100	Horizontal	Pass
4	6745.600	54.89	0.86	74.0	19.11	Peak	64.00	400	Horizontal	Pass
4**	6745.600	45.51	0.86	54.0	8.49	AV	64.00	400	Horizontal	Pass
5	12915.637	53.89	1.28	74.0	20.11	Peak	111.00	300	Horizontal	Pass
5**	12915.637	44.67	1.28	54.0	9.33	AV	111.00	300	Horizontal	Pass
6	13398.901	56.44	0.55	74.0	17.56	Peak	358.00	400	Horizontal	Pass
6**	13398.901	46.73	0.55	54.0	7.27	AV	358.00	400	Horizontal	Pass

8-DPSK LOW CHANNEL 1 GHz to 18 GHz, ANT V

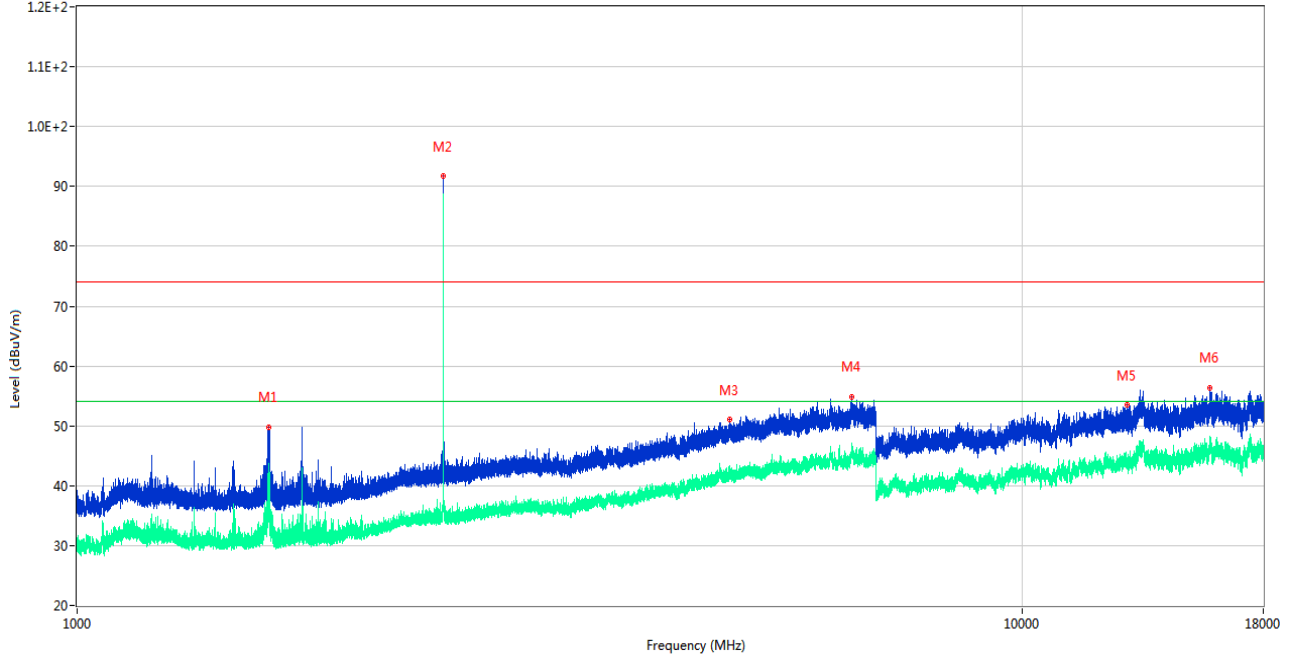
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1598.000	52.68	-17.88	74.0	21.32	Peak	224.00	400	Vertical	Pass
1**	1598.000	41.52	-17.88	54.0	12.48	AV	224.00	400	Vertical	Pass
2	2402.000	89.53	-12.46	74.0	-15.53	Peak	120.00	200	Vertical	N/A
2**	2402.000	86.64	-12.46	54.0	-32.64	AV	120.00	200	Vertical	N/A
3	4779.800	52.58	-2.90	74.0	21.42	Peak	212.00	100	Vertical	Pass
3**	4779.800	44.15	-2.90	54.0	9.85	AV	212.00	100	Vertical	Pass
4	6600.000	55.19	0.29	74.0	18.81	Peak	133.00	200	Vertical	Pass
4**	6600.000	46.46	0.29	54.0	7.54	AV	133.00	200	Vertical	Pass
5	12808.537	54.21	0.88	74.0	19.79	Peak	70.00	100	Vertical	Pass
5**	12808.537	44.05	0.88	54.0	9.95	AV	70.00	100	Vertical	Pass
6	17481.300	56.78	2.69	74.0	17.22	Peak	24.00	300	Vertical	Pass
6**	17481.300	47.14	2.69	54.0	6.86	AV	24.00	300	Vertical	Pass

8-DPSK MIDDLE CHANNEL 1 GHz to 18 GHz, ANT H

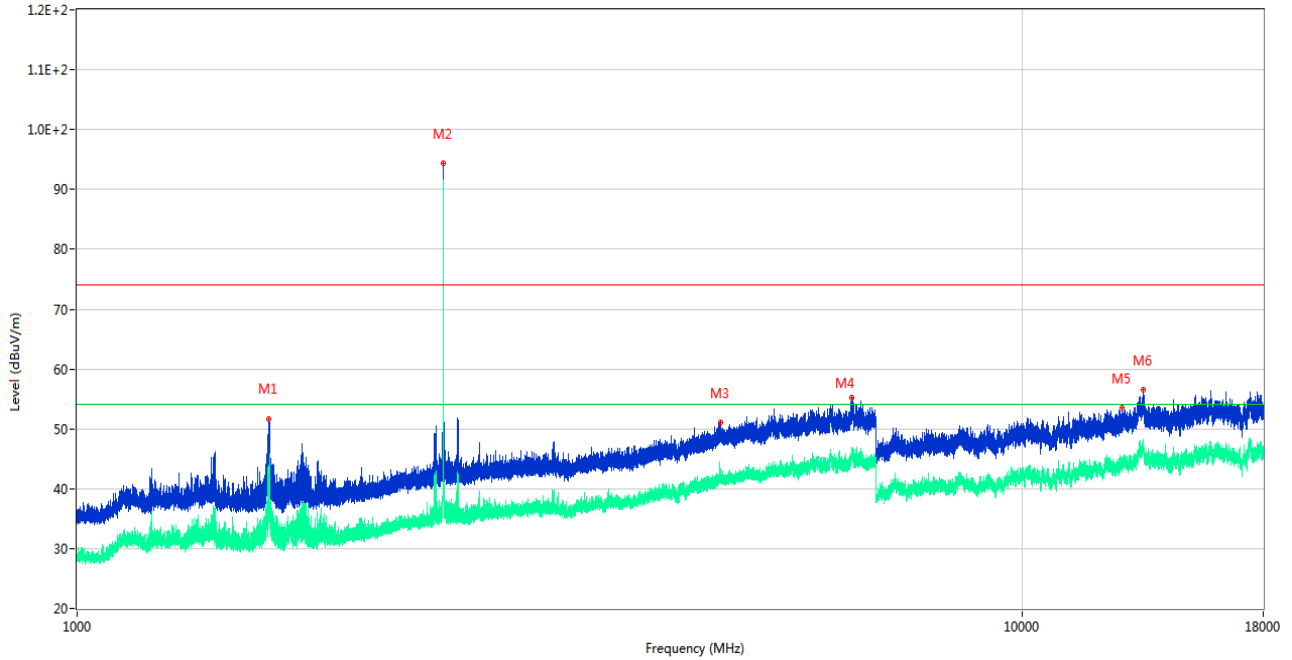
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1594.700	49.83	-17.72	74.0	24.17	Peak	311.00	100	Horizontal	Pass
1**	1594.700	38.80	-17.72	54.0	15.20	AV	311.00	100	Horizontal	Pass
2	2441.000	91.69	-12.44	74.0	-17.69	Peak	252.00	200	Horizontal	N/A
2**	2441.000	88.59	-12.44	54.0	-34.59	AV	252.00	200	Horizontal	N/A
3	4907.400	51.03	-2.34	74.0	22.97	Peak	47.00	100	Horizontal	Pass
3**	4907.400	41.97	-2.34	54.0	12.03	AV	47.00	100	Horizontal	Pass
4	6607.400	54.91	1.51	74.0	19.09	Peak	348.00	400	Horizontal	Pass
4**	6607.400	46.29	1.51	54.0	7.71	AV	348.00	400	Horizontal	Pass
5	12926.401	53.45	1.13	74.0	20.55	Peak	15.00	300	Horizontal	Pass
5**	12926.401	43.31	1.13	54.0	10.69	AV	15.00	300	Horizontal	Pass
6	15811.276	56.40	2.14	74.0	17.60	Peak	127.00	300	Horizontal	Pass
6**	15811.276	46.77	2.14	54.0	7.23	AV	127.00	300	Horizontal	Pass

8-DPSK MIDDLE CHANNEL 1 GHz to 18 GHz, ANT V

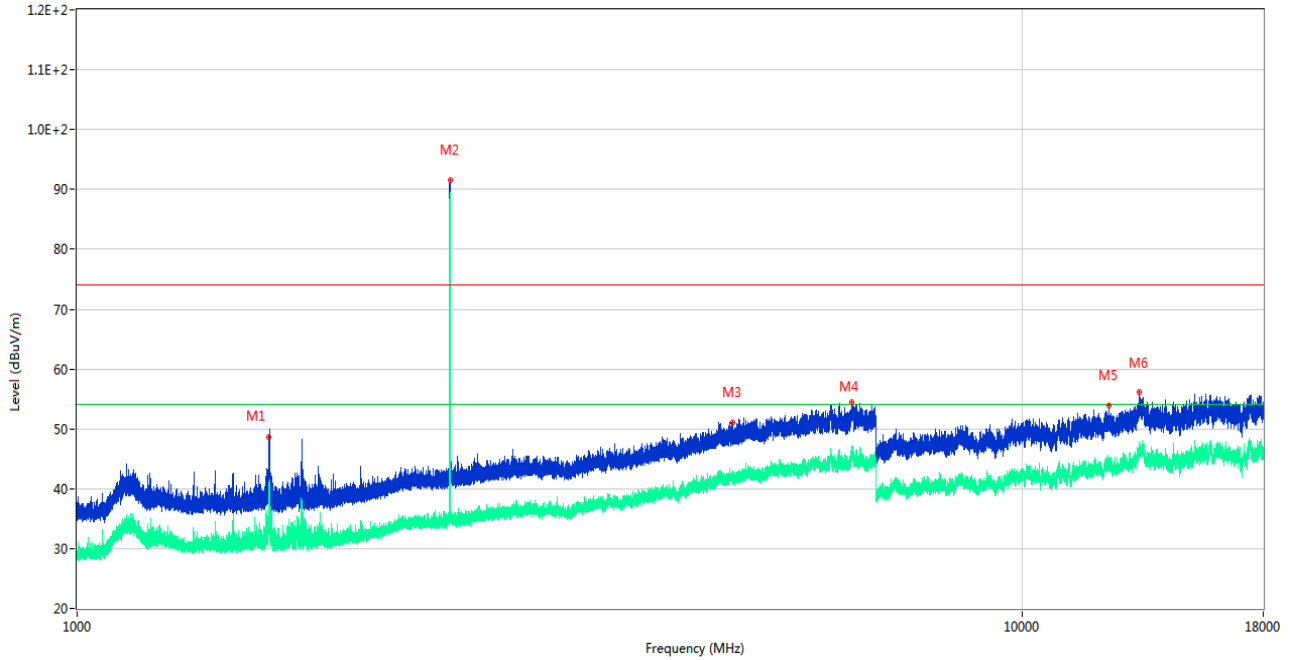
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1594.700	51.65	-17.72	74.0	22.35	Peak	214.00	100	Vertical	Pass
1**	1594.700	35.98	-17.72	54.0	18.02	AV	214.00	100	Vertical	Pass
2	2441.000	94.37	-12.44	74.0	-20.37	Peak	108.00	100	Vertical	N/A
2**	2441.000	91.65	-12.44	54.0	-37.65	AV	108.00	100	Vertical	N/A
3	4798.800	51.08	-2.59	74.0	22.92	Peak	283.00	100	Vertical	Pass
3**	4798.800	42.52	-2.59	54.0	11.48	AV	283.00	100	Vertical	Pass
4	6596.600	55.15	-0.39	74.0	18.85	Peak	50.00	200	Vertical	Pass
4**	6596.600	44.66	-0.39	54.0	9.34	AV	50.00	200	Vertical	Pass
5	12764.438	53.49	1.00	74.0	20.51	Peak	348.00	300	Vertical	Pass
5**	12764.438	44.22	1.00	54.0	9.78	AV	348.00	300	Vertical	Pass
6	13427.512	56.52	0.40	74.0	17.48	Peak	26.00	300	Vertical	Pass
6**	13427.512	46.87	0.40	54.0	7.13	AV	26.00	300	Vertical	Pass

8-DPSK HIGH CHANNEL 1 GHz to 18 GHz, ANT H

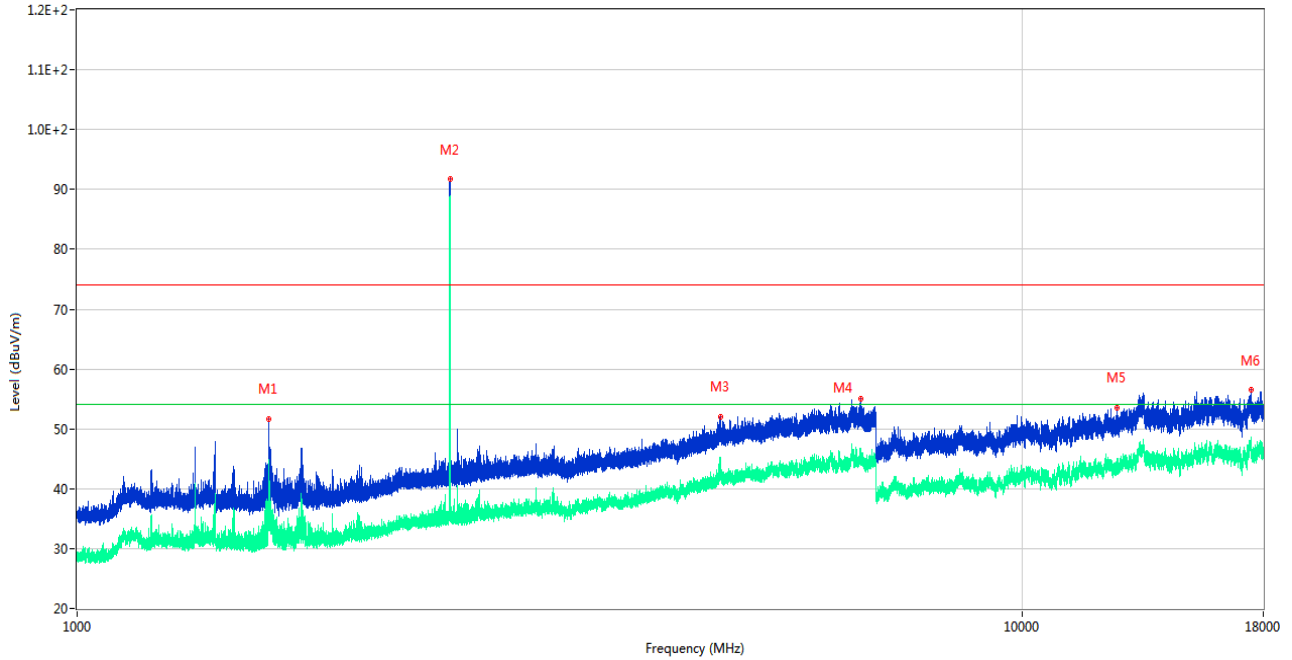
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1594.100	48.65	-17.72	74.0	25.35	Peak	182.00	400	Horizontal	Pass
1**	1594.100	38.20	-17.72	54.0	15.80	AV	182.00	400	Horizontal	Pass
2	2480.000	91.60	-12.02	74.0	-17.60	Peak	219.00	100	Horizontal	N/A
2**	2480.000	89.15	-12.02	54.0	-35.15	AV	219.00	100	Horizontal	N/A
3	4936.400	51.13	-2.93	74.0	22.87	Peak	139.00	150	Horizontal	Pass
3**	4936.400	41.82	-2.93	54.0	12.18	AV	139.00	150	Horizontal	Pass
4	6610.600	54.53	1.49	74.0	19.47	Peak	23.00	300	Horizontal	Pass
4**	6610.600	47.09	1.49	54.0	6.91	AV	23.00	300	Horizontal	Pass
5	12369.925	53.98	1.26	74.0	20.02	Peak	22.00	100	Horizontal	Pass
5**	12369.925	43.31	1.26	54.0	10.69	AV	22.00	100	Horizontal	Pass
6	13311.487	56.14	0.86	74.0	17.86	Peak	324.00	200	Horizontal	Pass
6**	13311.487	45.77	0.86	54.0	8.23	AV	324.00	200	Horizontal	Pass

8-DPSK HIGH CHANNEL 1 GHz to 18 GHz, ANT V

RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1596.800	51.69	-17.78	74.0	22.31	Peak	307.00	400	Vertical	Pass
1**	1596.800	38.06	-17.78	54.0	15.94	AV	307.00	400	Vertical	Pass
2	2480.200	91.74	-12.01	74.0	-17.74	Peak	76.00	200	Vertical	N/A
2**	2480.200	88.95	-12.01	54.0	-34.95	AV	76.00	200	Vertical	N/A
3	4802.600	52.08	-3.01	74.0	21.92	Peak	115.00	200	Vertical	Pass
3**	4802.600	41.41	-3.01	54.0	12.59	AV	115.00	200	Vertical	Pass
4	6744.000	55.03	0.88	74.0	18.97	Peak	268.00	100	Vertical	Pass
4**	6744.000	45.22	0.88	54.0	8.78	AV	268.00	100	Vertical	Pass
5	12607.400	53.54	1.90	74.0	20.46	Peak	308.00	100	Vertical	Pass
5**	12607.400	43.95	1.90	54.0	10.05	AV	308.00	100	Vertical	Pass
6	17460.562	56.47	2.84	74.0	17.53	Peak	319.00	200	Vertical	Pass
6**	17460.562	46.81	2.84	54.0	7.19	AV	319.00	200	Vertical	Pass

5.11 Band Edge (Restricted-band band-edge)

5.11.1 Limit

FCC §15.209&15.247(d)

Radiated emission outside the frequency band attenuation below the general limits specified in FCC section 15.209(a) is not required. In addition, radiated emissions which fall in the restricted bands, as defined in FCC section 15.205(a), must also comply with the radiated emission limits specified in FCC section 15.209(a).

5.11.2 Test Setup

See section 4.5.3 to 4.5.5 for test setup description for the antenna port. The photo of test setup please refer to ANNEX A.

5.11.3 Test Procedure

The measurement frequency range is from 9 kHz to the 10th harmonic of the fundamental frequency. The Turn Table is actuated to turn from 0° to 360°, and both horizontal and vertical polarizations of the Test Antenna are used to find the maximum radiated power. Mid channels on all channel bandwidth verified. Only the worst RB size/offset presented.

The power of the EUT transmitting frequency should be ignored.

All Spurious Emission tests were performed in X, Y, Z axis direction. And only the worst axis test condition was recorded in this test report.

Use the following spectrum analyzer settings:

Span = wide enough to fully capture the emission being measured

RBW = 1 MHz for $f \geq 1$ GHz, 100 kHz for $f < 1$ GHz

VBW \geq RBW

Sweep = auto

Detector function = peak

Trace = max hold

For measurement below 1GHz, If the emission level of the EUT measured by the peak detector is 3 dB lower than the applicable limit, the peak emission level will be reported, Otherwise, the emission measurement will be repeated using the quasi-peak detector and reported.

5.11.4 Test Result

Note ¹: The lowest and highest channels are tested to verify the band edge emissions. Please refer to the following the plots for emissions values.

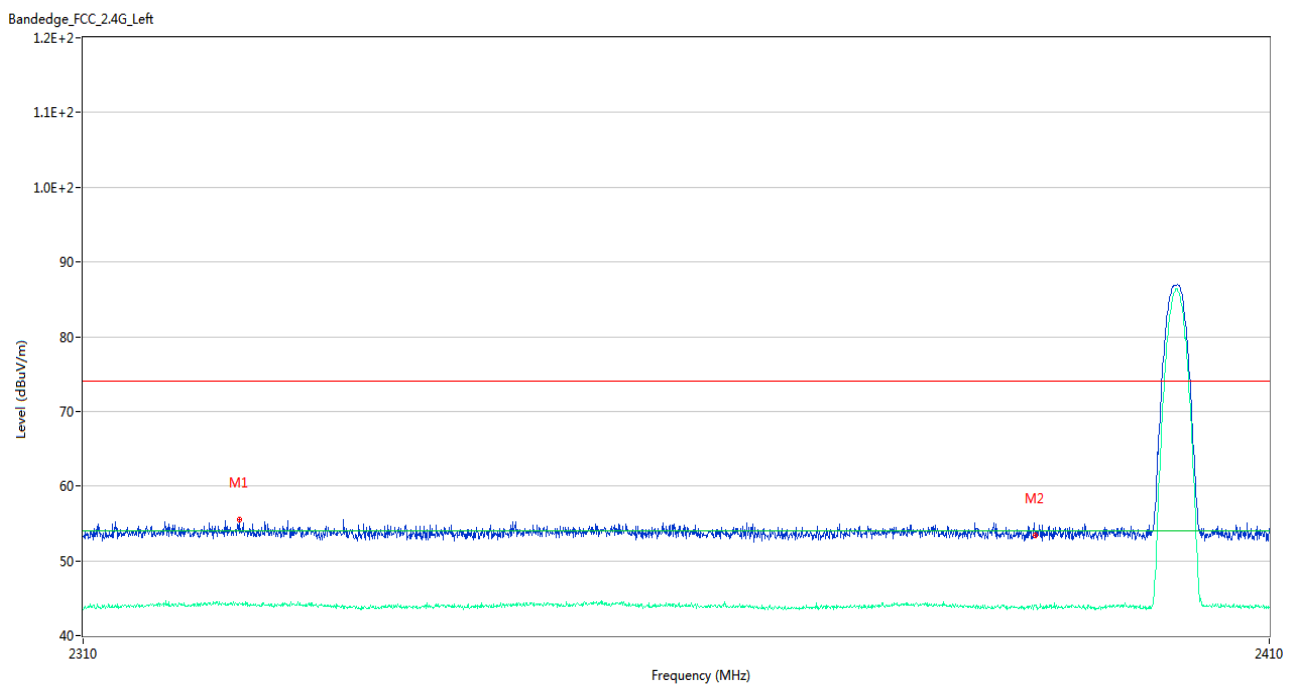
Note ²: The test data all are tested in the vertical and horizontal antenna which the trace is max hold. So these plots have shown the worst case.

Note ³: According the ANSI C63.10-2013, where limits are specified for both average and peak (or quasi-peak) detector functions, if the peak (or quasi-peak) measured value complies with the average limit, it is unnecessary to perform an average measurement.

Note ⁴: The Level (dBuV/m) has been corrected by factor.

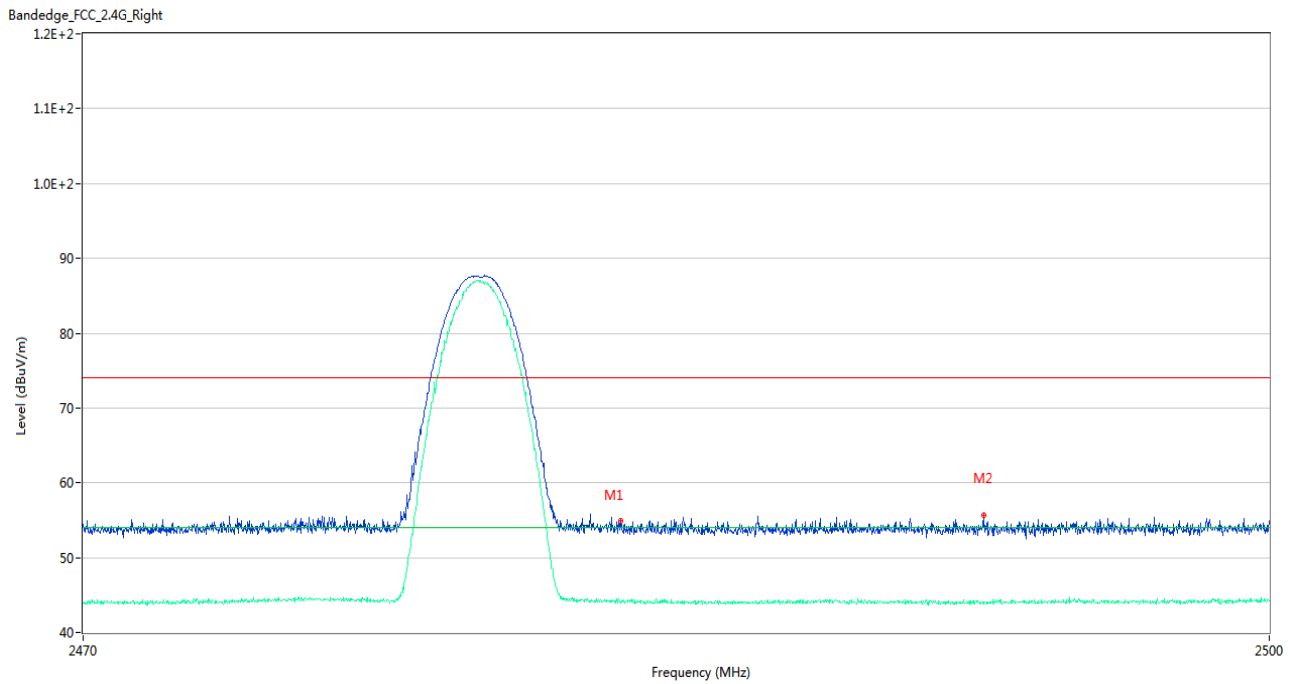
Test Data and Plots

GFSK LOW CHANNEL



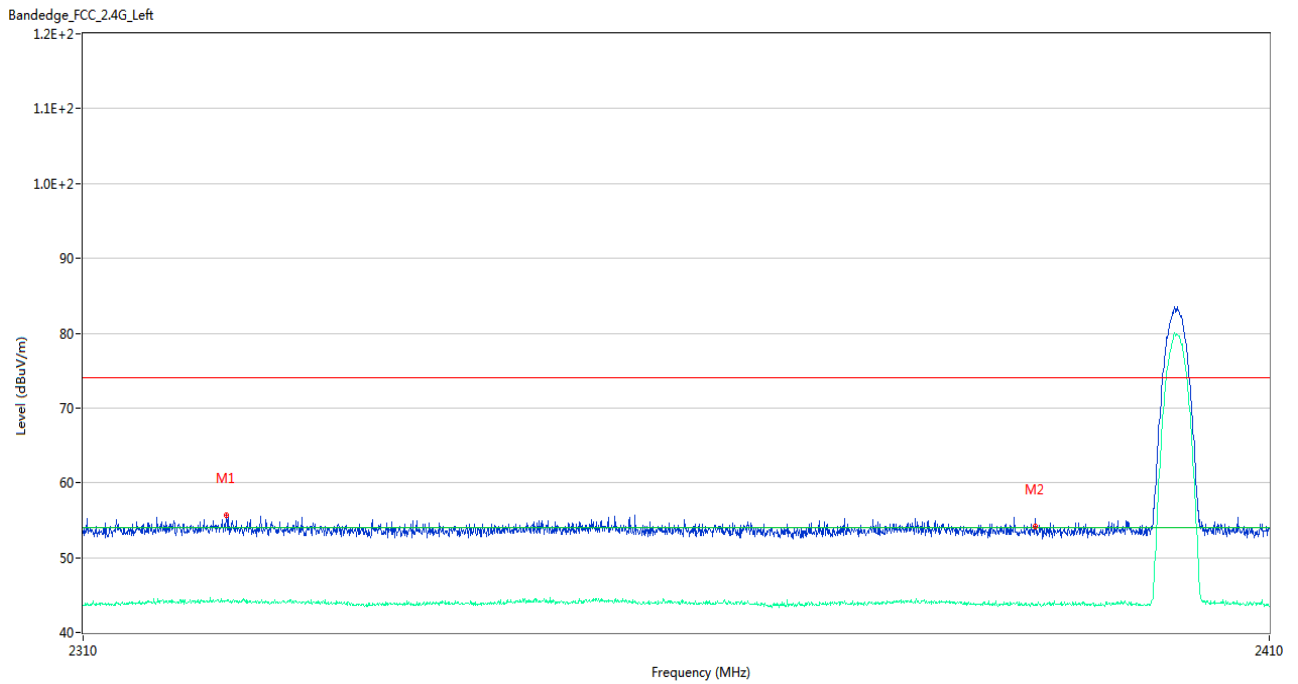
No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	2322.900	55.48	-0.64	74.0	18.52	Peak	109.00	150	Horizontal	Pass
1**	2322.900	44.32	-0.64	54.0	9.68	AV	109.00	150	Horizontal	Pass
2	2389.950	53.38	-0.59	74.0	20.62	Peak	8.00	200	Horizontal	Pass
2**	2389.950	44.04	-0.59	54.0	9.96	AV	8.00	200	Horizontal	Pass

GFSK HIGH CHANNEL



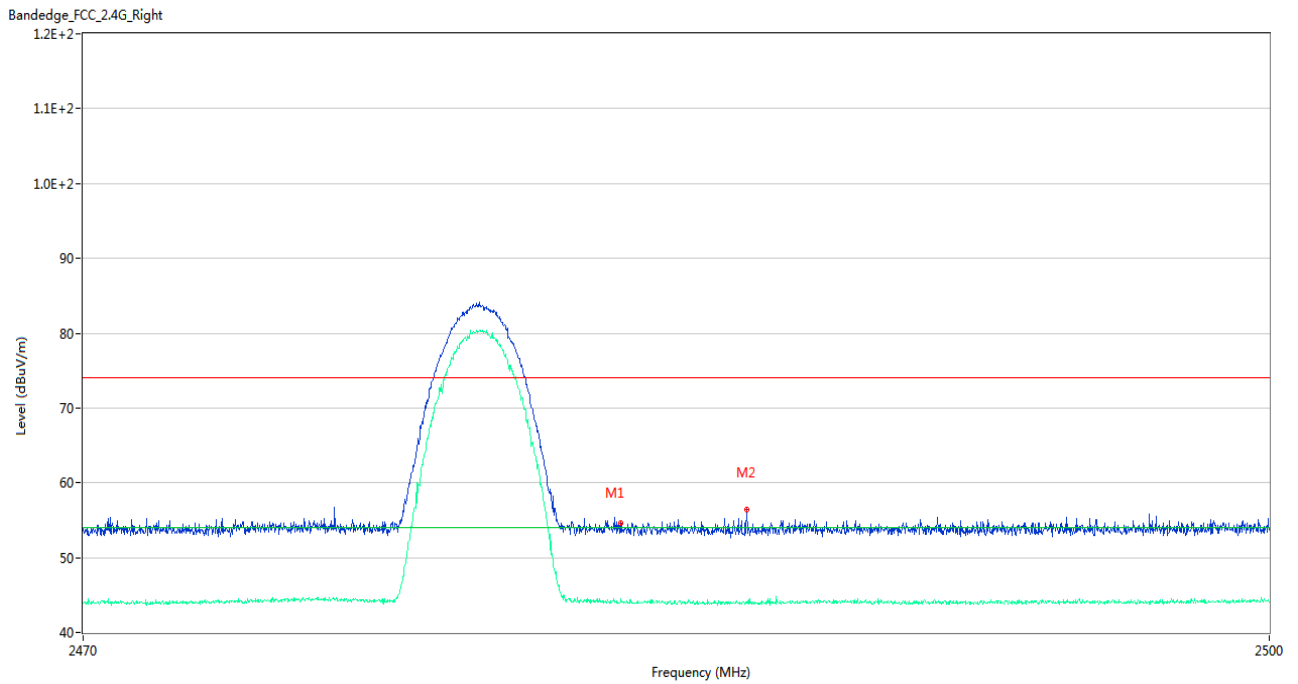
No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	2483.560	54.94	-0.06	74.0	19.06	Peak	60.00	150	Horizontal	Pass
1**	2483.560	44.03	-0.06	54.0	9.97	AV	60.00	150	Horizontal	Pass
2	2492.740	55.62	-0.24	74.0	18.38	Peak	360.00	100	Horizontal	Pass
2**	2492.740	43.84	-0.24	54.0	10.16	AV	360.00	100	Horizontal	Pass

8-DPSK LOW CHANNEL



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	2321.850	55.71	-0.64	74.0	18.29	Peak	228.00	150	Vertical	Pass
1**	2321.850	44.18	-0.64	54.0	9.82	AV	228.00	150	Vertical	Pass
2	2389.950	54.19	-0.59	74.0	19.81	Peak	14.00	150	Vertical	Pass
2**	2389.950	43.80	-0.59	54.0	10.20	AV	14.00	150	Vertical	Pass

8-DPSK HIGH CHANNEL

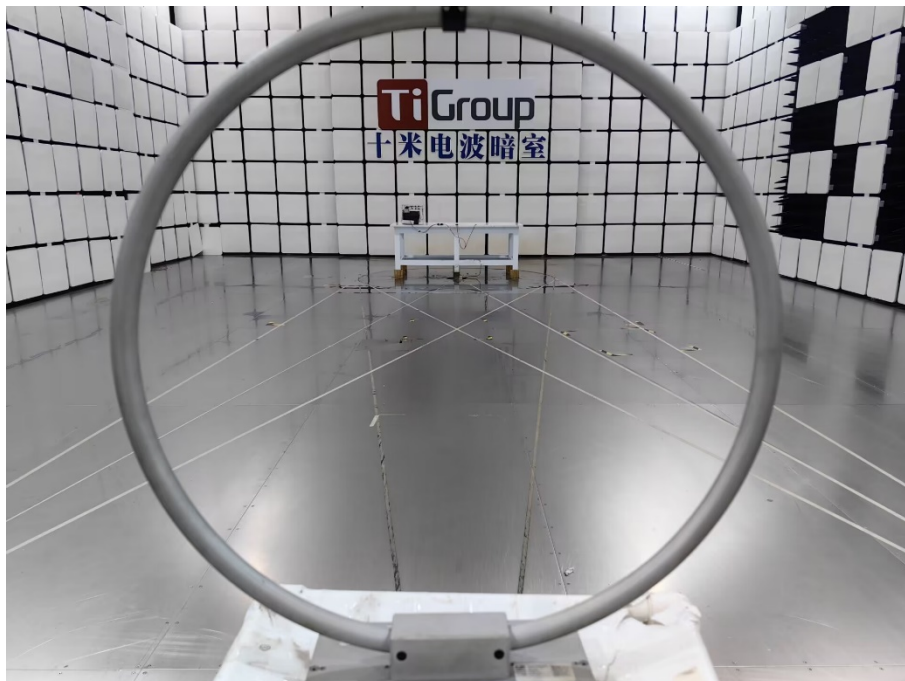


No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	2483.560	54.55	-0.06	74.0	19.45	Peak	314.00	100	Vertical	Pass
1**	2483.560	44.48	-0.06	54.0	9.52	AV	314.00	100	Vertical	Pass
2	2486.740	56.36	-0.20	74.0	17.64	Peak	345.00	100	Vertical	Pass
2**	2486.740	43.99	-0.20	54.0	10.01	AV	345.00	100	Vertical	Pass

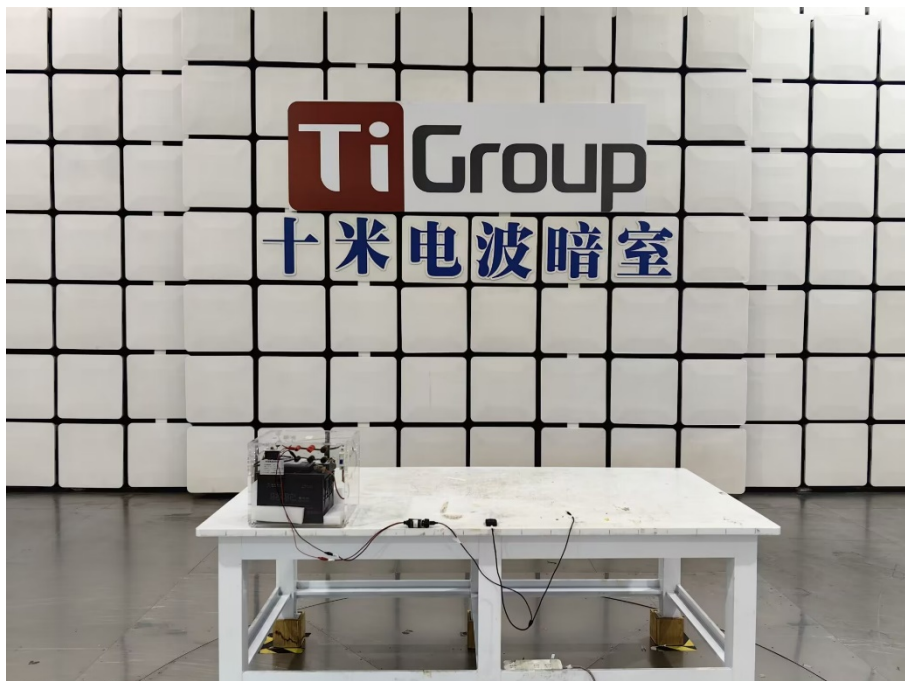
ANNEX A TEST SETUP PHOTOS

1 Radiated Test Photo

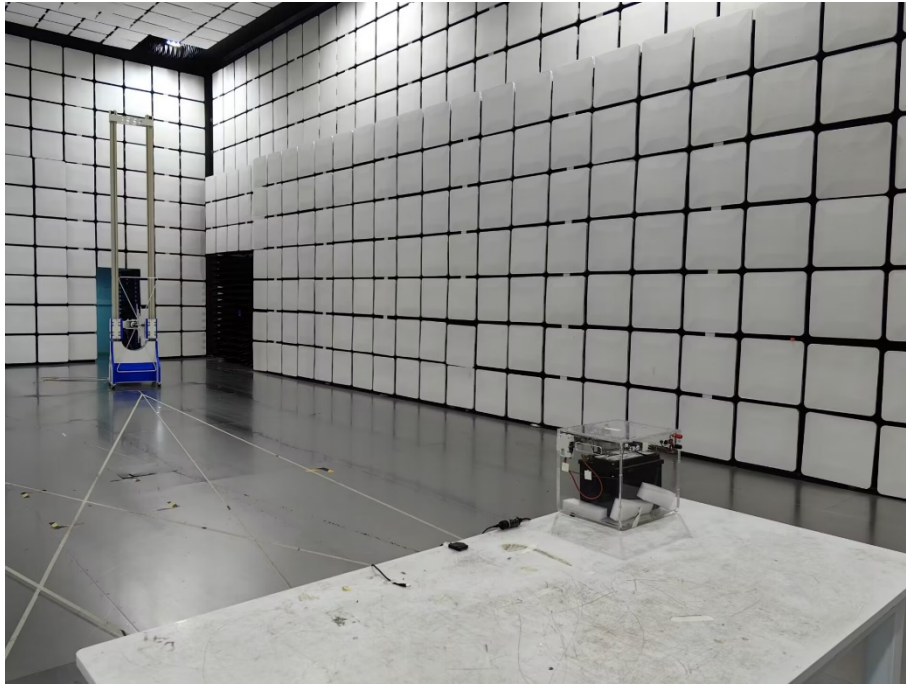
Below 30MHz



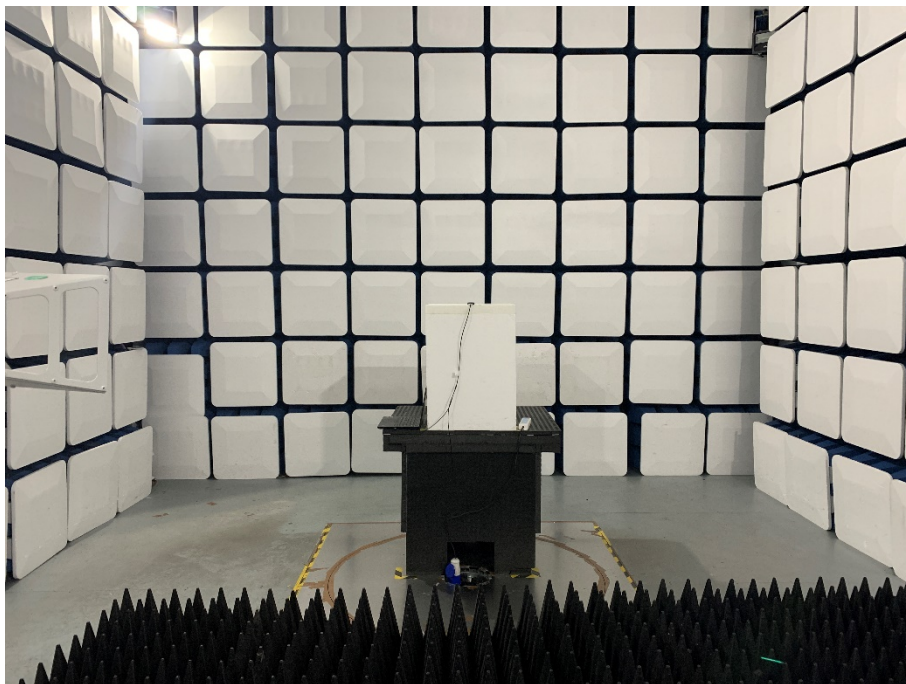
Close-up



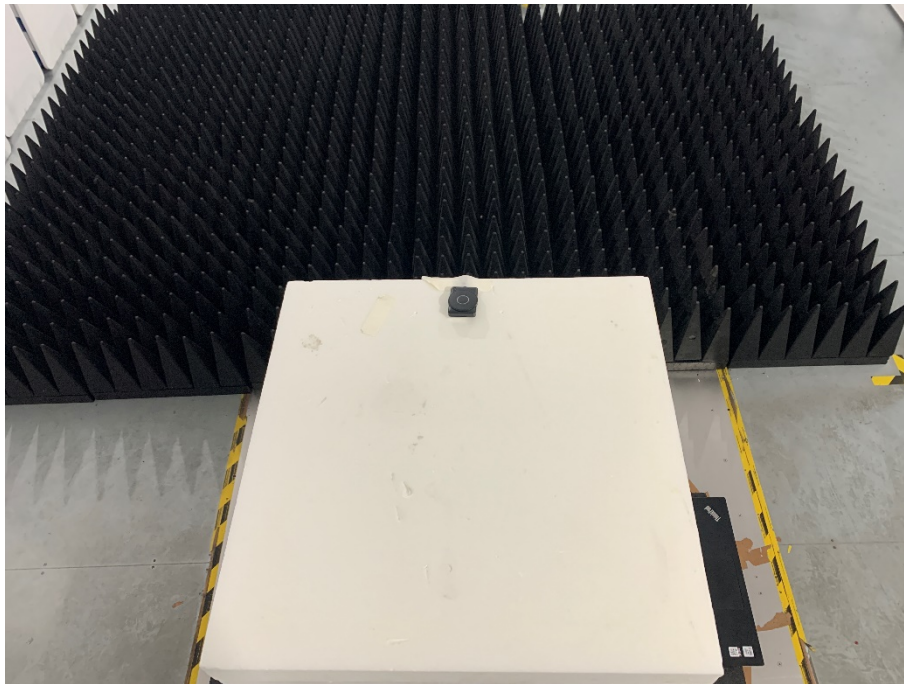
30MHz-1GHz



Above 1GHz

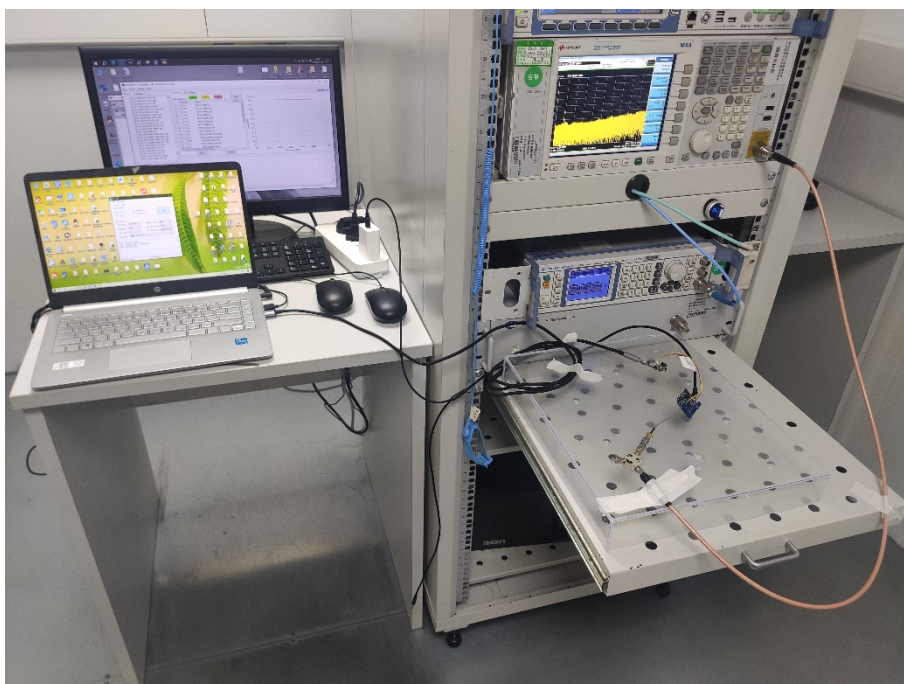


Close-up



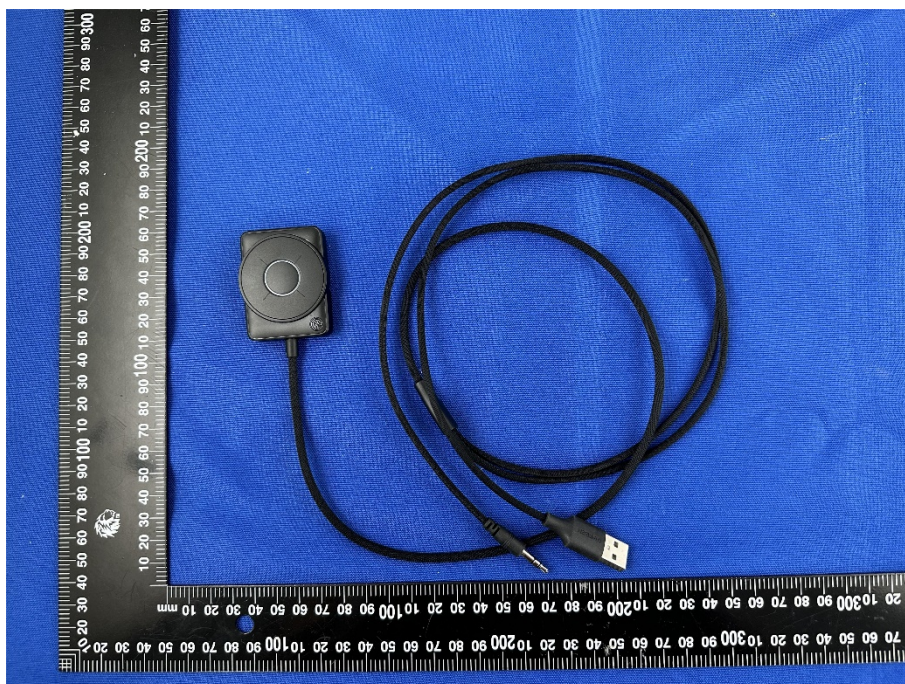
2 Conducted Test Photo

Conducted Test



ANNEX B EUT EXTERNAL PHOTOS

FRONT VIEW OF EUT



REAR VIEW OF EUT

