

A.3 Conducted Spurious Emission

Test Data

Main Antenna

GFSK (BLE 1Mbps)				
Channel	Measured Max. Out of Band Emission (dBm)	Limit (dBm)		Verdict
		Carrier Level	Calculated 20 dBc Limit	
Low	-34.81	-4.93	-24.93	Pass
Middle	-35.38	-3.84	-23.84	Pass
High	-35.12	-4.35	-24.35	Pass

GFSK (BLE 2Mbps)				
Channel	Measured Max. Out of Band Emission (dBm)	Limit (dBm)		Verdict
		Carrier Level	Calculated 20 dBc Limit	
Low	-35.50	-5.53	-25.53	Pass
Middle	-35.19	-4.43	-24.43	Pass
High	-36.39	-4.64	-24.64	Pass

Aux. Antenna

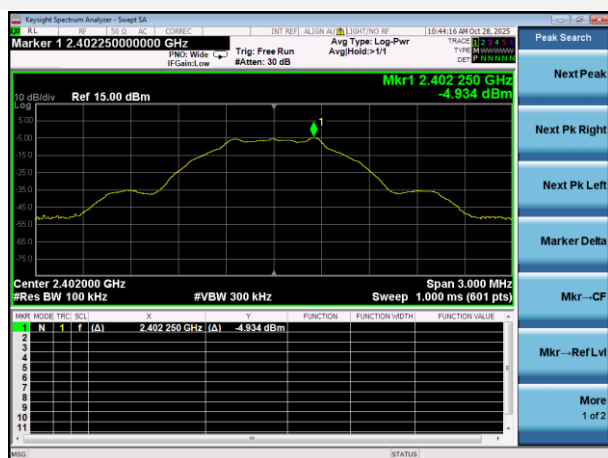
GFSK (BLE 1Mbps)				
Channel	Measured Max. Out of Band Emission (dBm)	Limit (dBm)		Verdict
		Carrier Level	Calculated 20 dBc Limit	
Low	-35.80	-4.74	-24.74	Pass
Middle	-33.57	-2.98	-22.98	Pass
High	-35.47	-3.60	-23.60	Pass

GFSK (BLE 2Mbps)				
Channel	Measured Max. Out of Band Emission (dBm)	Limit (dBm)		Verdict
		Carrier Level	Calculated 20 dBc Limit	
Low	-34.91	-5.51	-25.51	Pass
Middle	-35.74	-3.32	-23.32	Pass
High	-35.06	-4.10	-24.10	Pass

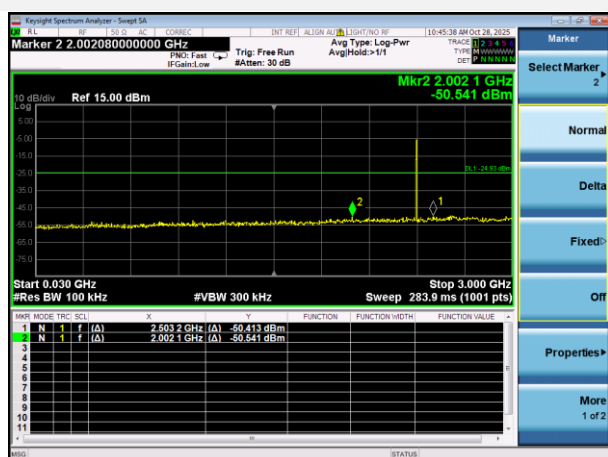
Test Plots

Main Antenna

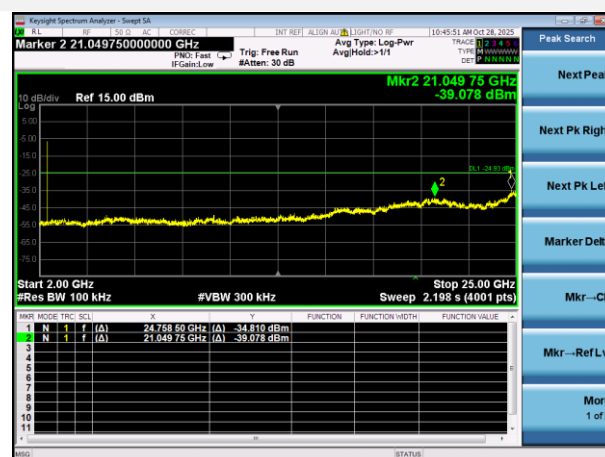
GFSK (BLE 1Mbps) LOW CHANNEL,
CARRIER LEVEL



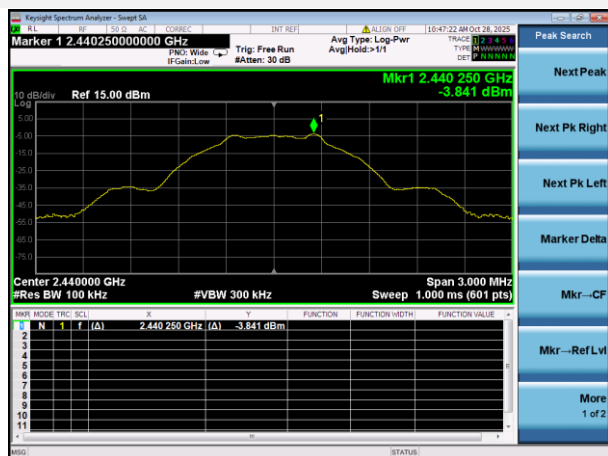
GFSK (BLE 1Mbps) LOW CHANNEL,
SPURIOUS 30 MHz ~ 3 GHz



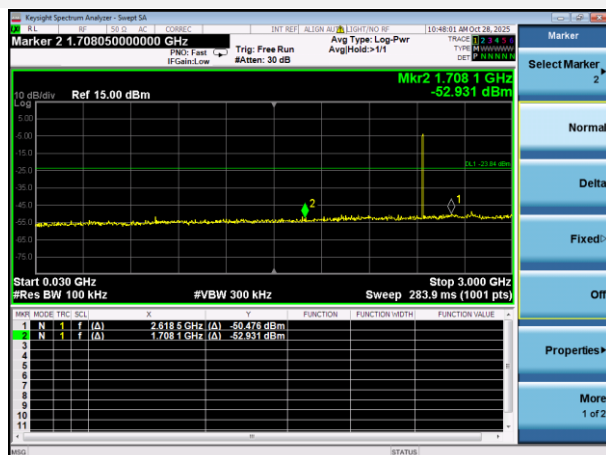
GFSK (BLE 1Mbps) LOW CHANNEL,
SPURIOUS 2 GHz ~ 25 GHz



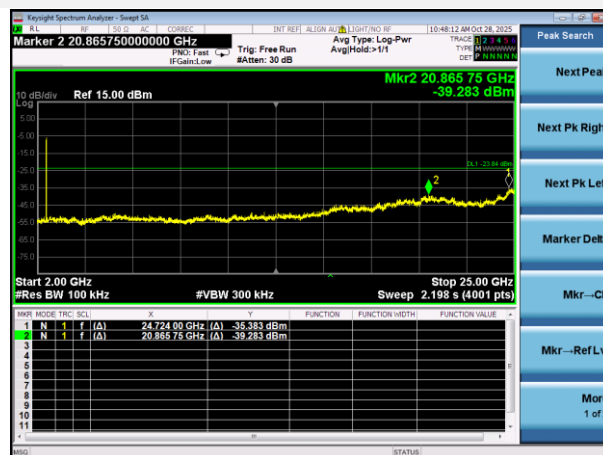
GFSK (BLE 1Mbps) MIDDLE CHANNEL,
CARRIER LEVEL



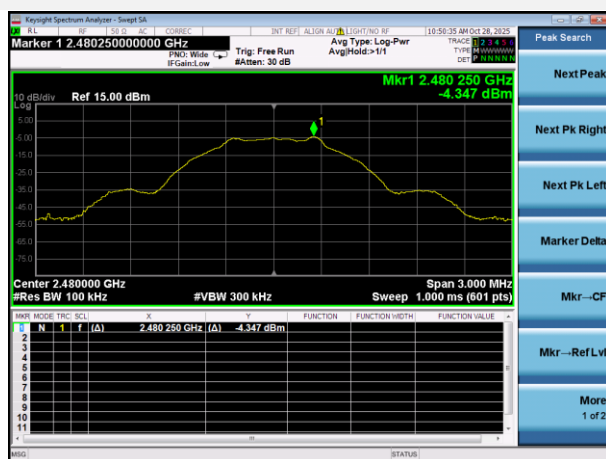
GFSK (BLE 1Mbps) MIDDLE CHANNEL, SPURIOUS 30 MHz ~ 3 GHz



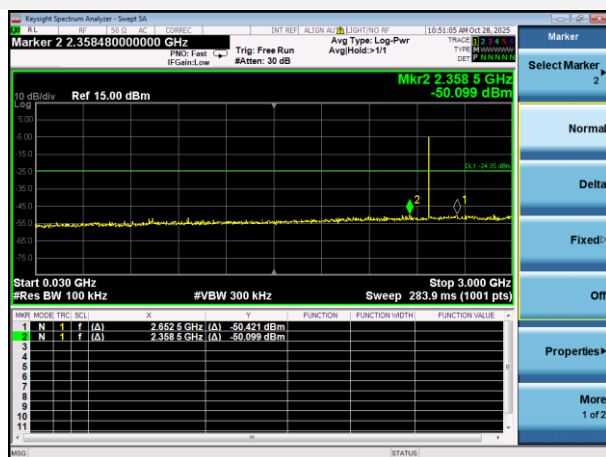
GFSK (BLE 1Mbps) MIDDLE CHANNEL, SPURIOUS 2 GHz ~ 25 GHz



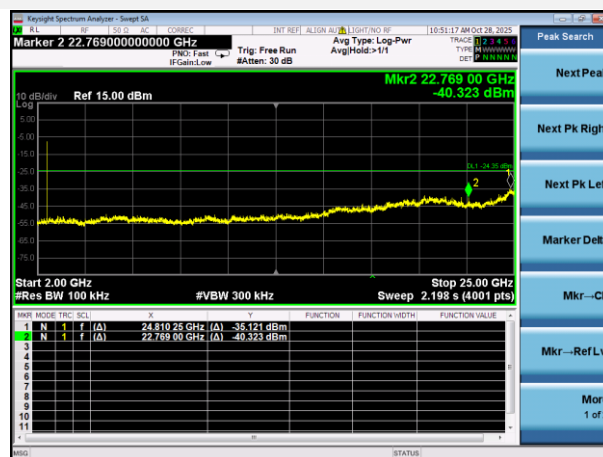
GFSK (BLE 1Mbps) HIGH CHANNEL, CARRIER LEVEL



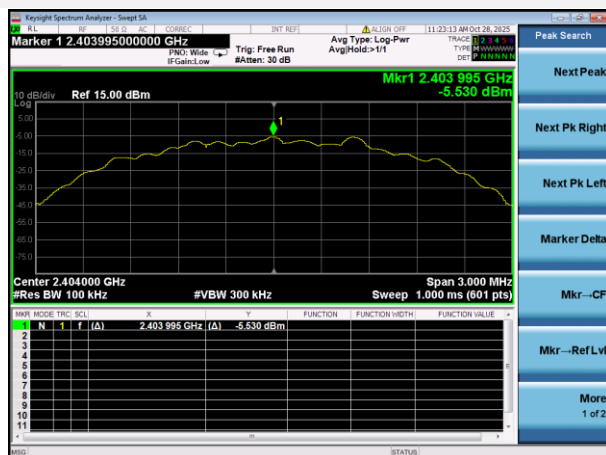
GFSK (BLE 1Mbps) HIGH CHANNEL, SPURIOUS 30 MHz ~ 3 GHz



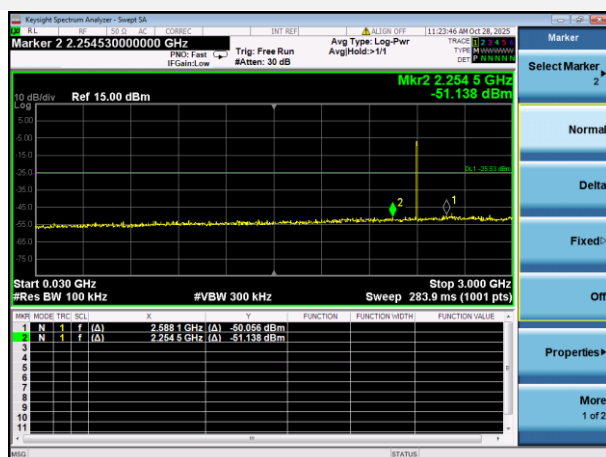
GFSK (BLE 1Mbps) HIGH CHANNEL, SPURIOUS 2 GHz ~ 25 GHz



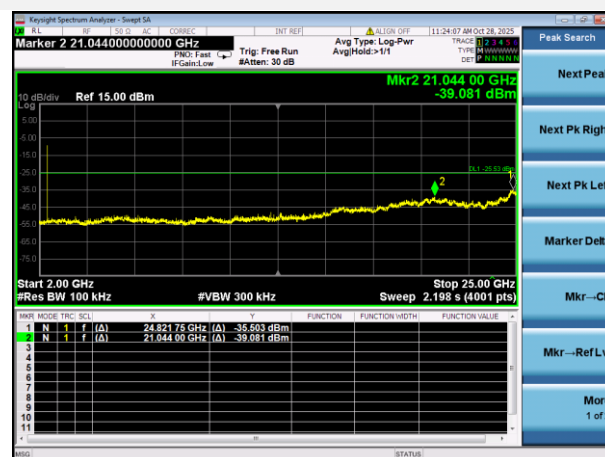
GFSK (BLE 2Mbps) LOW CHANNEL, CARRIER LEVEL



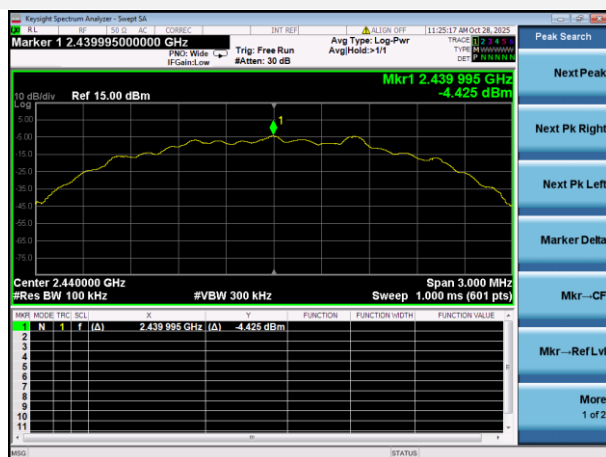
GFSK (BLE 2Mbps) LOW CHANNEL, SPURIOUS 30 MHz ~ 3 GHz



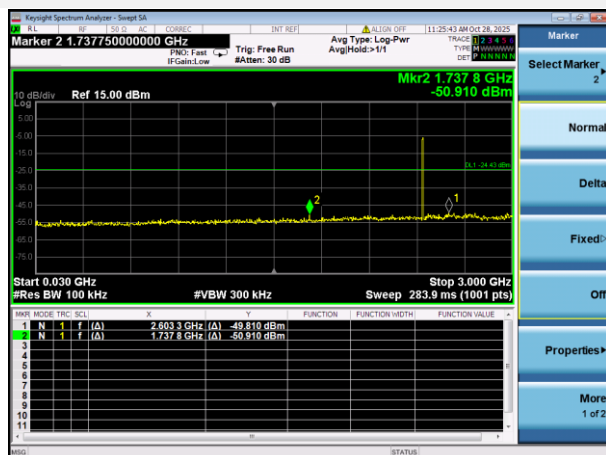
GFSK (BLE 2Mbps) LOW CHANNEL, SPURIOUS 2 GHz ~ 25 GHz



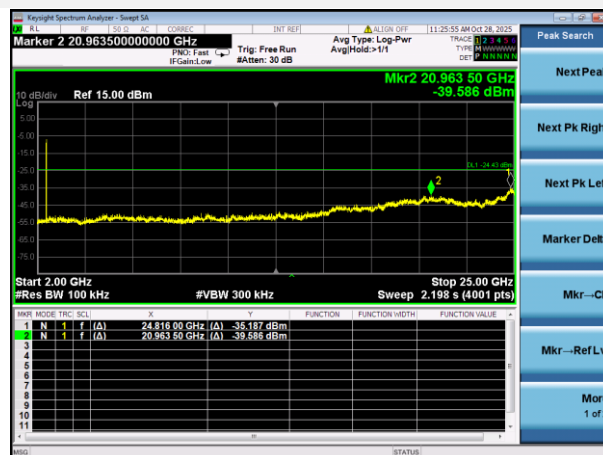
GFSK (BLE 2Mbps) MIDDLE CHANNEL, CARRIER LEVEL



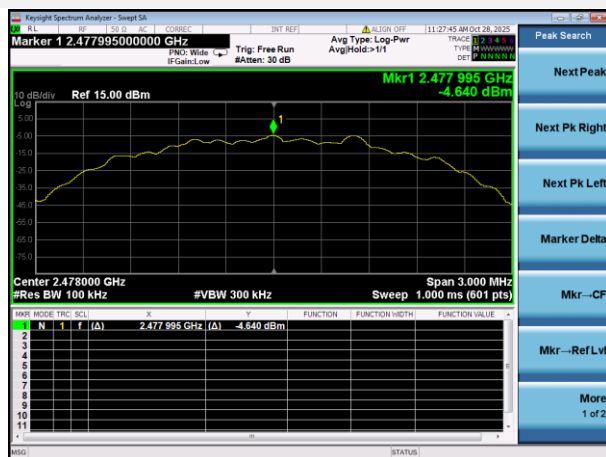
GFSK (BLE 2Mbps) MIDDLE CHANNEL, SPURIOUS 30 MHz ~ 3 GHz



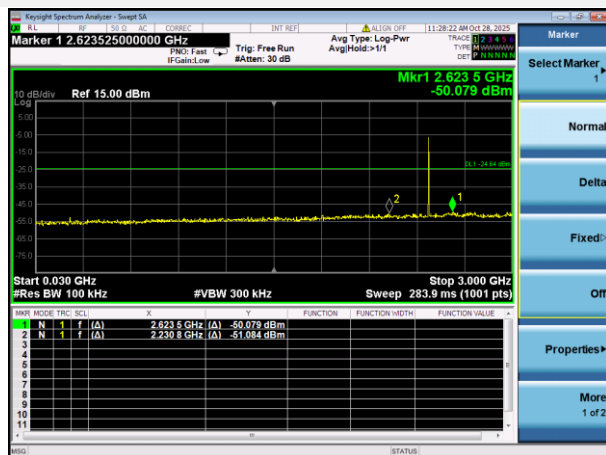
GFSK (BLE 2Mbps) MIDDLE CHANNEL, SPURIOUS 2 GHz ~ 25 GHz



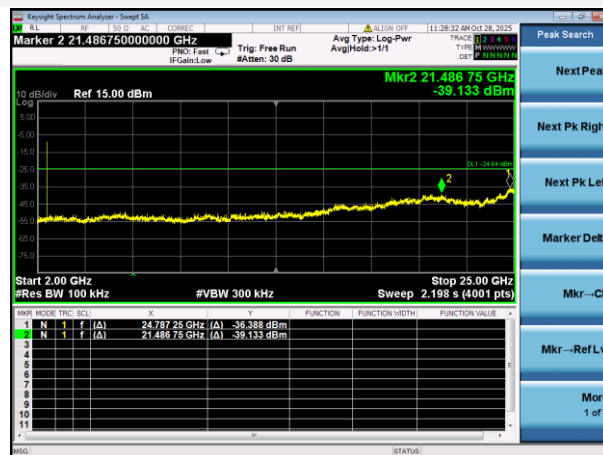
GFSK (BLE 2Mbps) HIGH CHANNEL, CARRIER LEVEL



GFSK (BLE 2Mbps) HIGH CHANNEL, SPURIOUS 30 MHz ~ 3 GHz

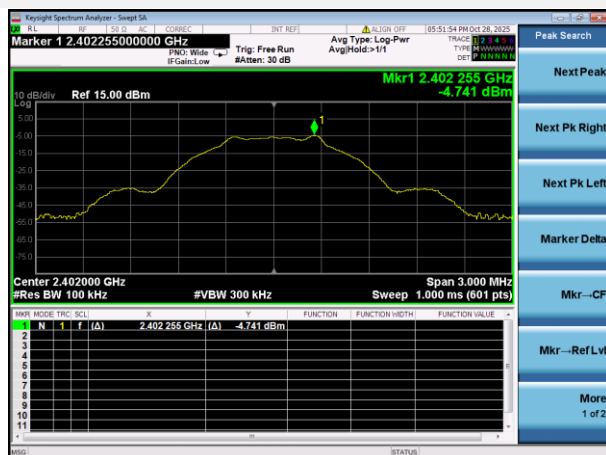


GFSK (BLE 2Mbps) HIGH CHANNEL, SPURIOUS 2 GHz ~ 25 GHz

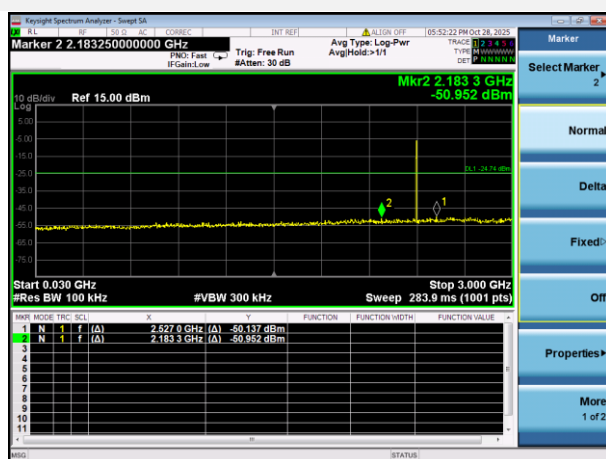


Aux. Antenna

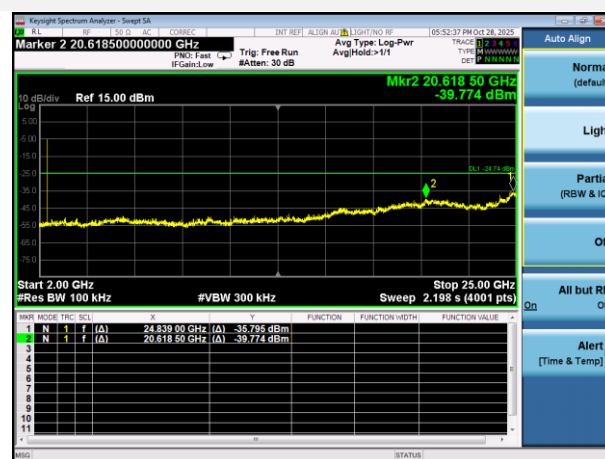
GFSK (BLE 1Mbps) LOW CHANNEL, CARRIER LEVEL



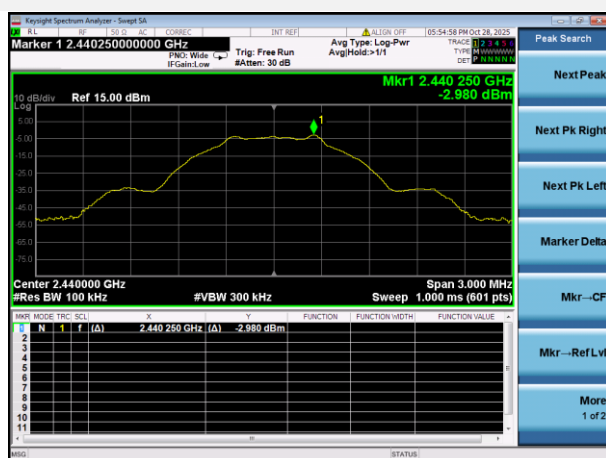
GFSK (BLE 1Mbps) LOW CHANNEL, SPURIOUS 30 MHz ~ 3 GHz



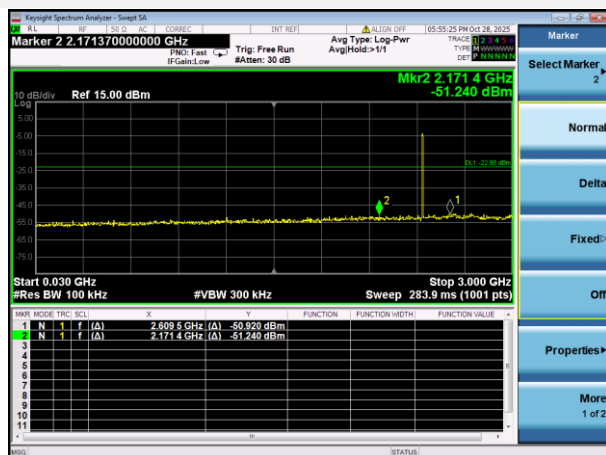
GFSK (BLE 1Mbps) LOW CHANNEL, SPURIOUS 2 GHz ~ 25 GHz



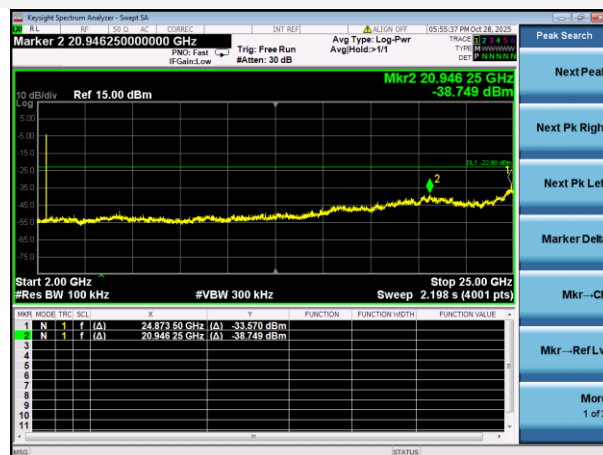
GFSK (BLE 1Mbps) MIDDLE CHANNEL, CARRIER LEVEL



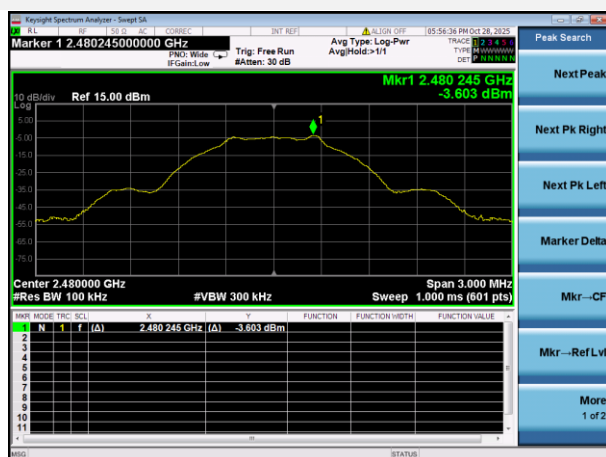
GFSK (BLE 1Mbps) MIDDLE CHANNEL, SPURIOUS 30 MHz ~ 3 GHz



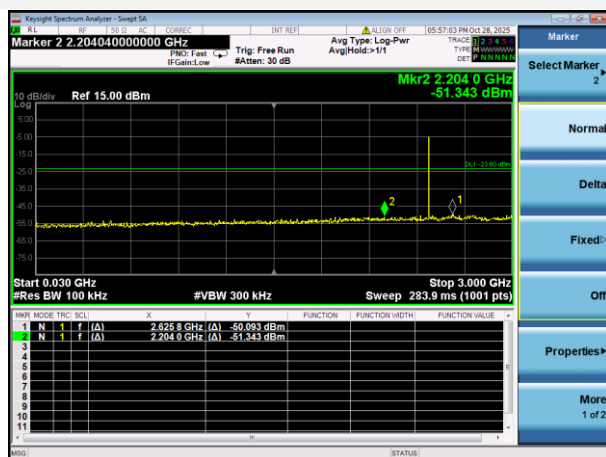
GFSK (BLE 1Mbps) MIDDLE CHANNEL, SPURIOUS 2 GHz ~ 25 GHz



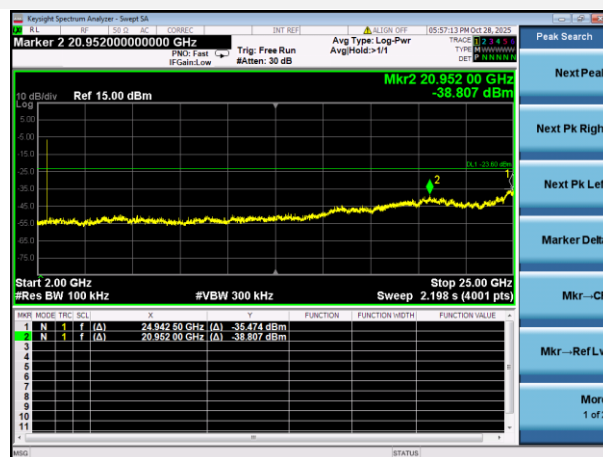
GFSK (BLE 1Mbps) HIGH CHANNEL, CARRIER LEVEL



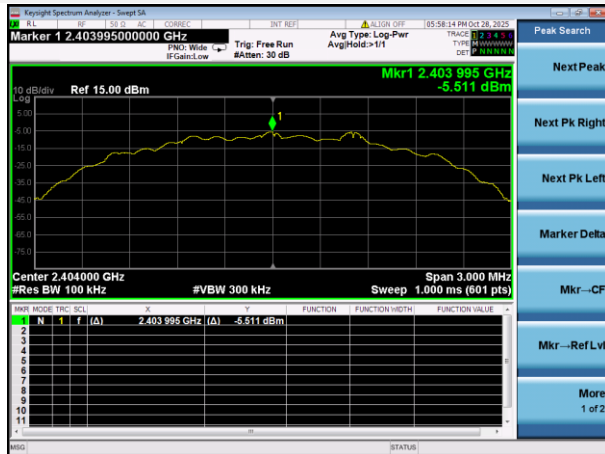
GFSK (BLE 1Mbps) HIGH CHANNEL, SPURIOUS 30 MHz ~ 3 GHz



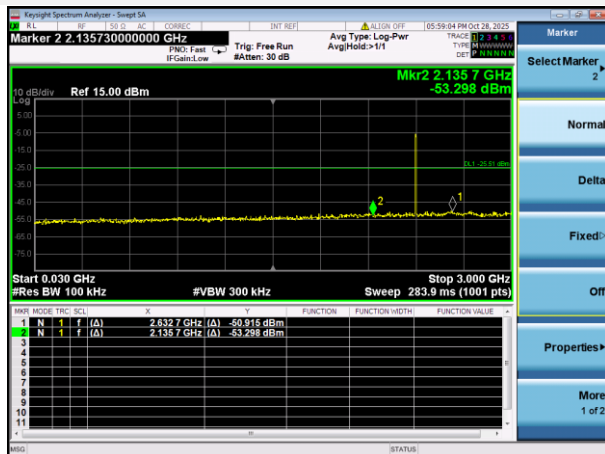
GFSK (BLE 1Mbps) HIGH CHANNEL, SPURIOUS 2 GHz ~ 25 GHz



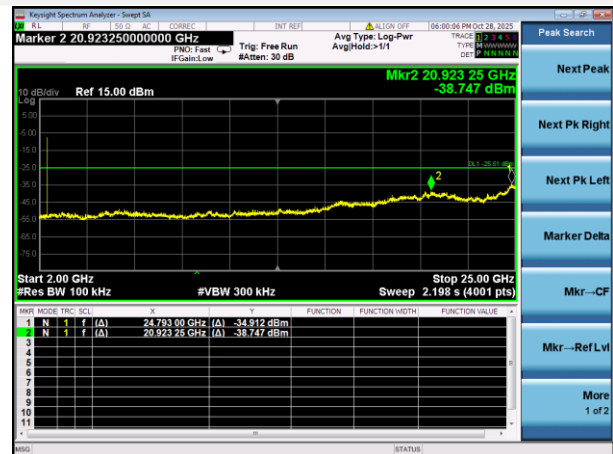
GFSK (BLE 2Mbps) LOW CHANNEL, CARRIER LEVEL



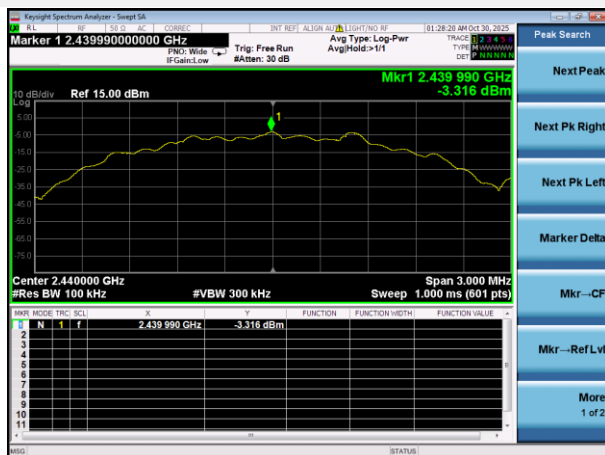
GFSK (BLE 2Mbps) LOW CHANNEL, SPURIOUS 30 MHz ~ 3 GHz



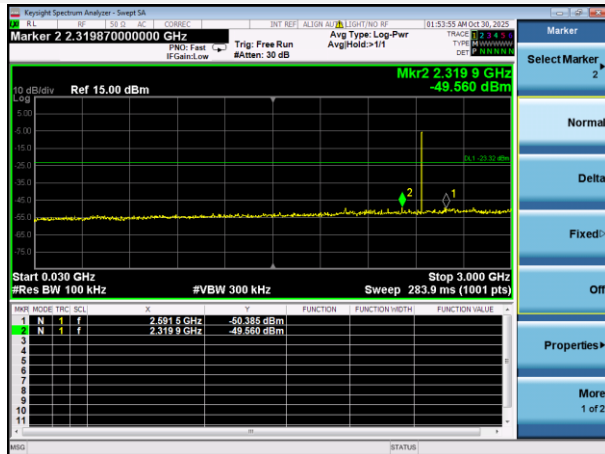
GFSK (BLE 2Mbps) LOW CHANNEL, SPURIOUS 2 GHz ~ 25 GHz



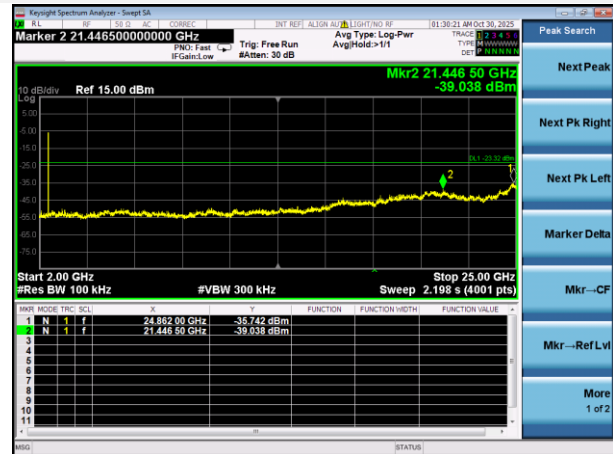
GFSK (BLE 2Mbps) MIDDLE CHANNEL, CARRIER LEVEL



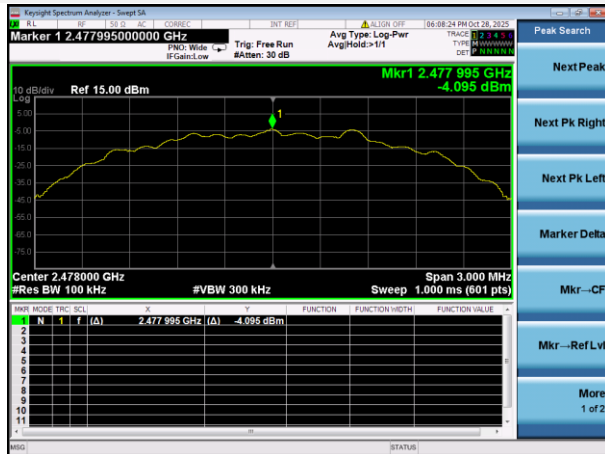
GFSK (BLE 2Mbps) MIDDLE CHANNEL, SPURIOUS 30 MHz ~ 3 GHz



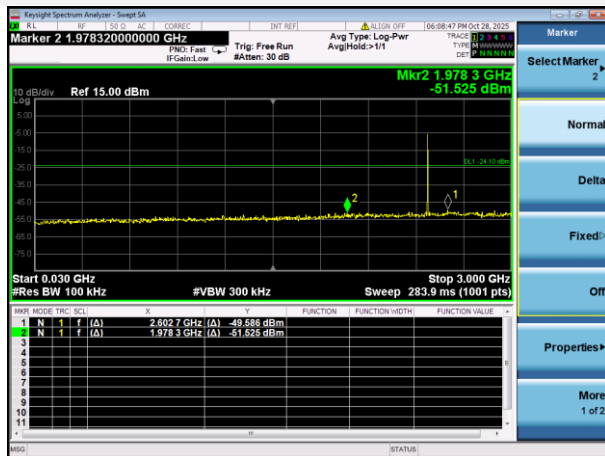
GFSK (BLE 2Mbps) MIDDLE CHANNEL, SPURIOUS 2 GHz ~ 25 GHz



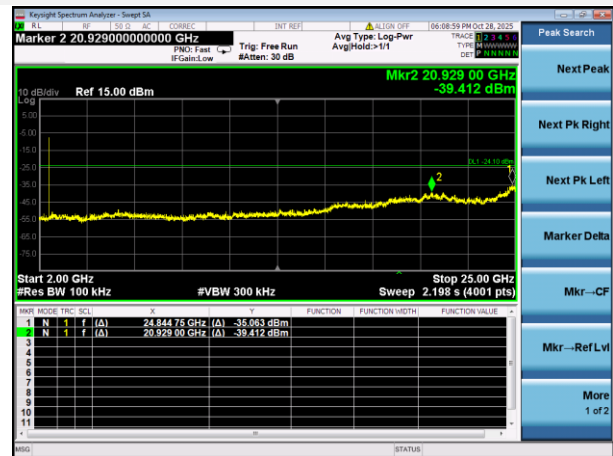
GFSK (BLE 2Mbps) HIGH CHANNEL, CARRIER LEVEL



GFSK (BLE 2Mbps) HIGH CHANNEL, SPURIOUS 30 MHz ~ 3 GHz



GFSK (BLE 2Mbps) HIGH CHANNEL, SPURIOUS 2 GHz ~ 25 GHz



A.4 Band Edge (Authorized-band band-edge)

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

Test Data

Main Antenna

GFSK (BLE 1Mbps)				
Channel	Measured Max. Band Edge Emission (dBm)	Limit (dBm)		Verdict
		Carrier Level	Calculated 20 dBc Limit	
Low	-51.85	-4.93	-24.93	Pass
High	-51.40	-4.35	-24.35	Pass

GFSK (BLE 2Mbps)				
Channel	Measured Max. Band Edge Emission (dBm)	Limit (dBm)		Verdict
		Carrier Level	Calculated 20 dBc Limit	
Low	-52.52	-5.53	-25.53	Pass
High	-51.10	-4.64	-24.64	Pass

Aux. Antenna

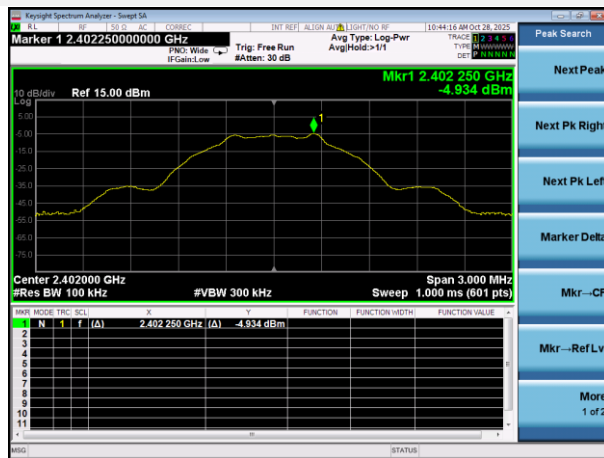
GFSK (BLE 1Mbps)				
Channel	Measured Max. Band Edge Emission (dBm)	Limit (dBm)		Verdict
		Carrier Level	Calculated 20 dBc Limit	
Low	-51.56	-4.74	-24.74	Pass
High	-51.05	-3.60	-23.60	Pass

GFSK (BLE 2Mbps)				
Channel	Measured Max. Band Edge Emission (dBm)	Limit (dBm)		Verdict
		Carrier Level	Calculated 20 dBc Limit	
Low	-51.40	-5.51	-25.51	Pass
High	-52.04	-4.10	-24.10	Pass

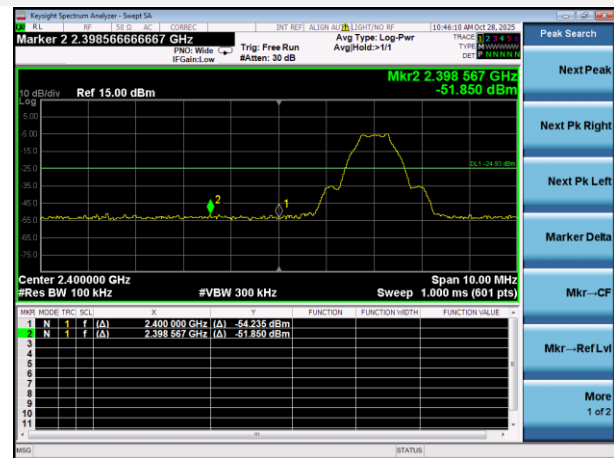
Test Plots

Main Antenna

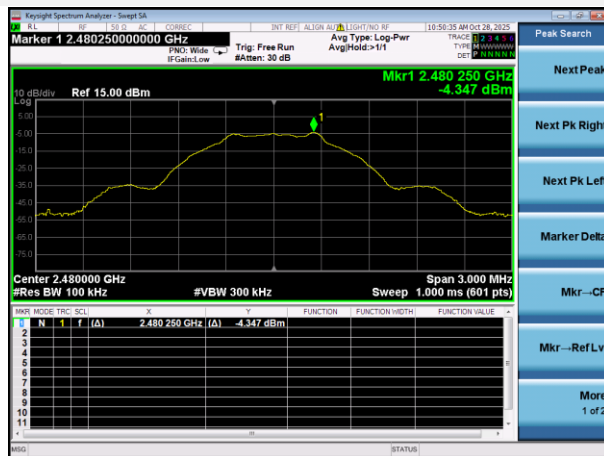
GFSK (BLE 1Mbps) LOW CHANNEL, CARRIER LEVEL



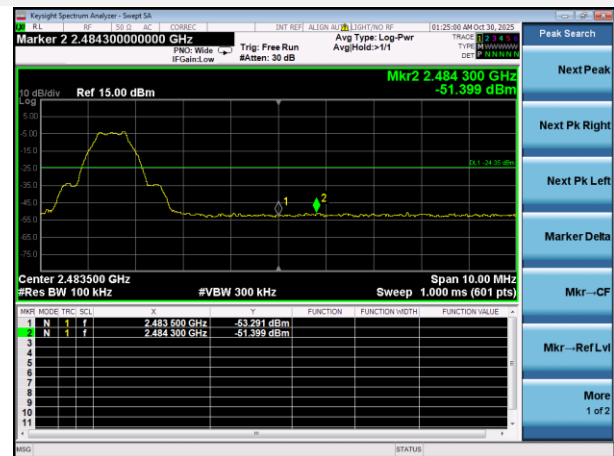
GFSK (BLE 1Mbps) LOW CHANNEL, BAND EDGE



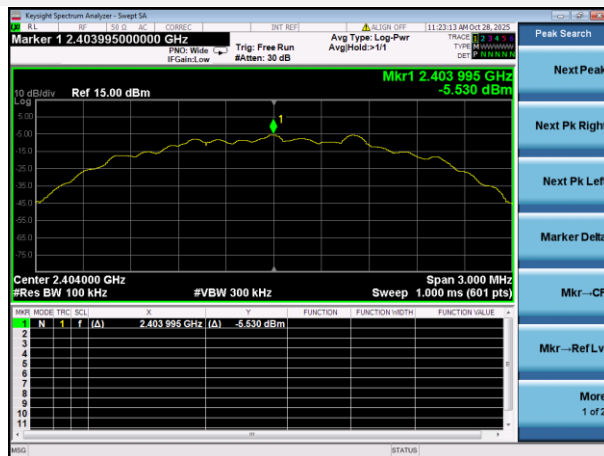
GFSK (BLE 1Mbps) HIGH CHANNEL, CARRIER LEVEL



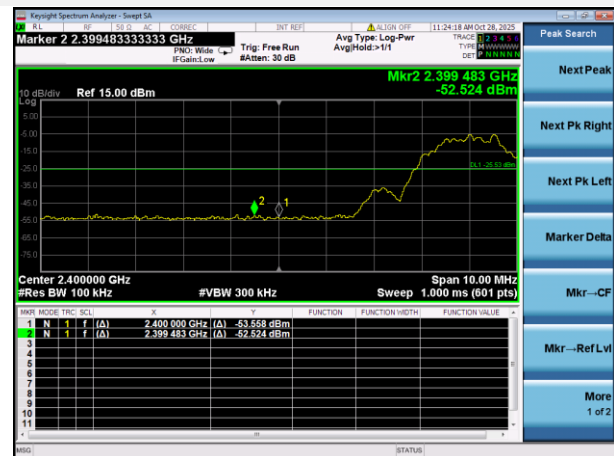
GFSK (BLE 1Mbps) HIGH CHANNEL, BAND EDGE



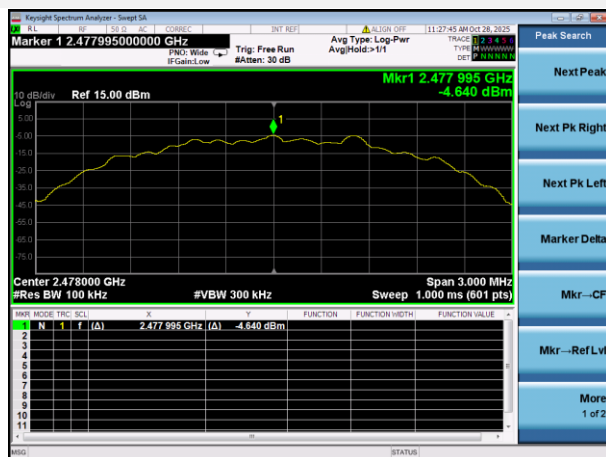
GFSK (BLE 2Mbps) LOW CHANNEL, CARRIER LEVEL



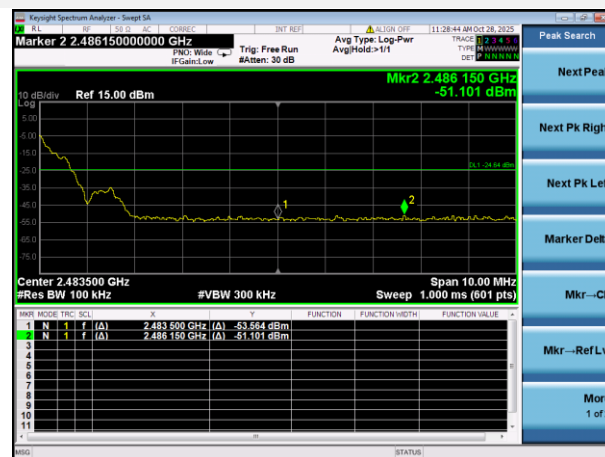
GFSK (BLE 2Mbps) LOW CHANNEL, BAND EDGE



GFSK (BLE 2Mbps) HIGH CHANNEL, CARRIER LEVEL

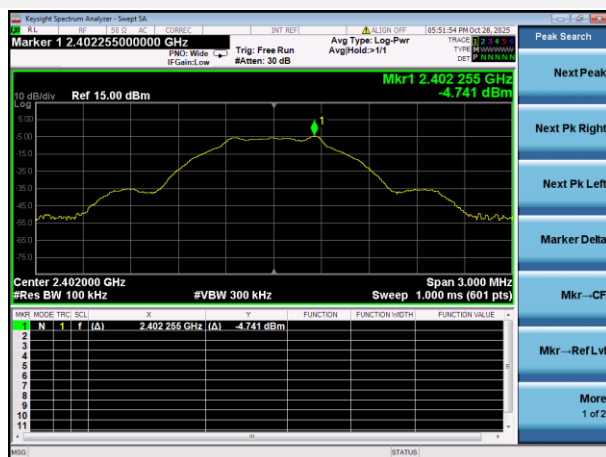


GFSK (BLE 2Mbps) HIGH CHANNEL, BAND EDGE

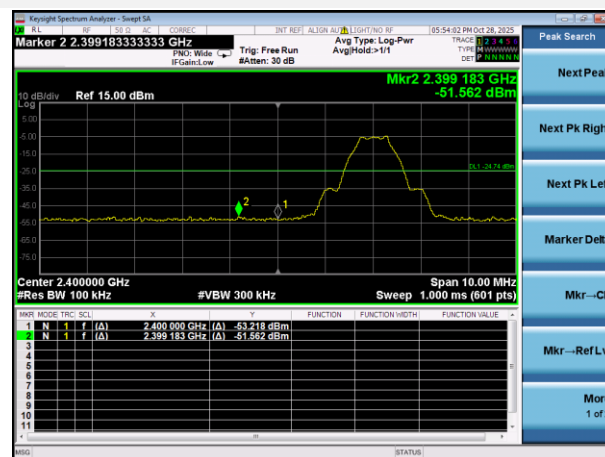


Aux. Antenna

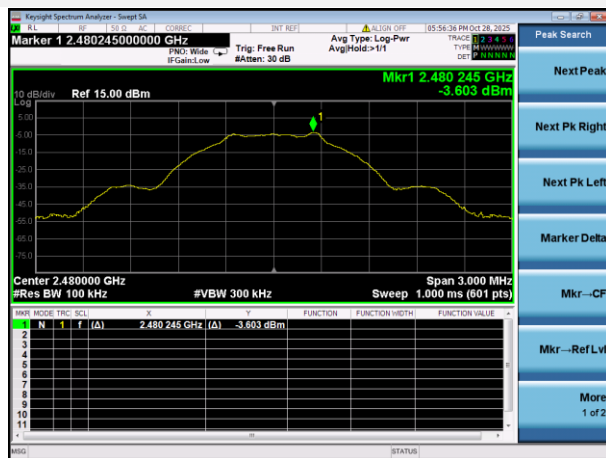
GFSK (BLE 1Mbps) LOW CHANNEL, CARRIER LEVEL



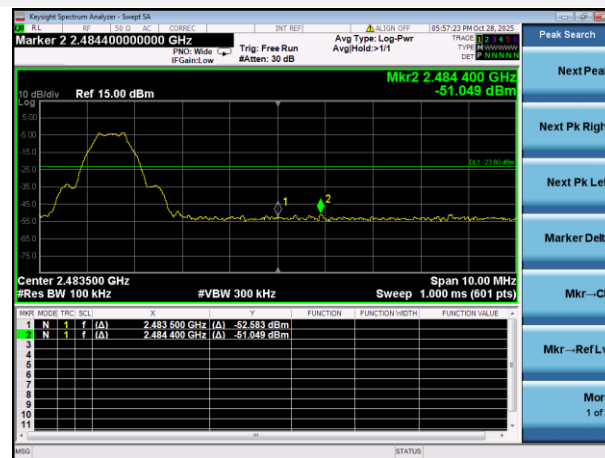
GFSK (BLE 1Mbps) LOW CHANNEL, BAND EDGE



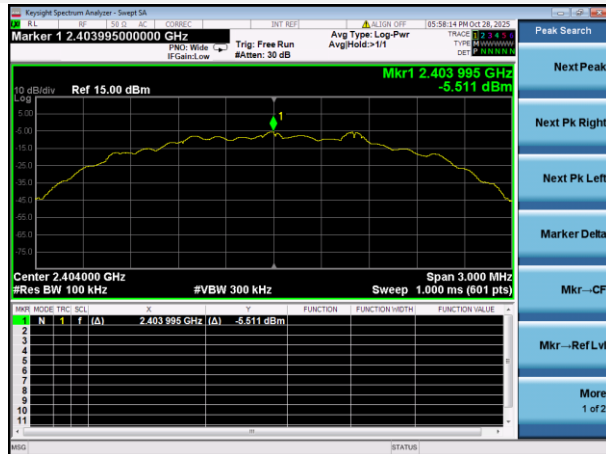
GFSK (BLE 1Mbps) HIGH CHANNEL, CARRIER LEVEL



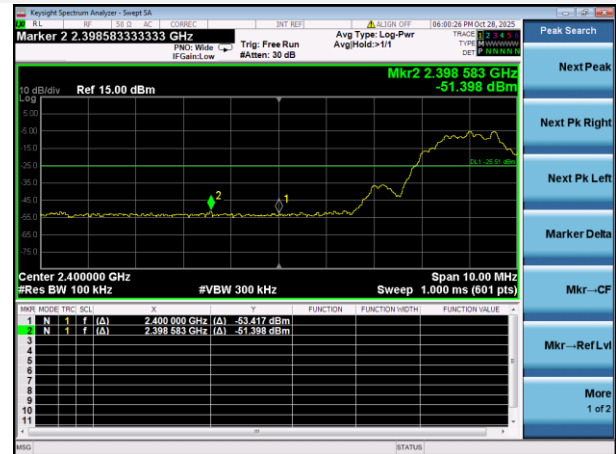
GFSK (BLE 1Mbps) HIGH CHANNEL, BAND EDGE



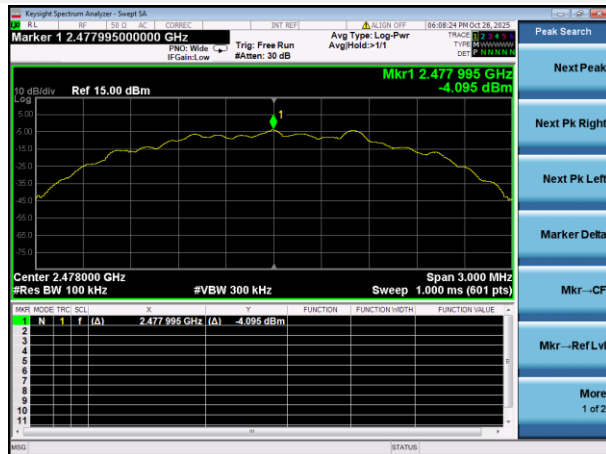
GFSK (BLE 2Mbps) LOW CHANNEL, CARRIER LEVEL



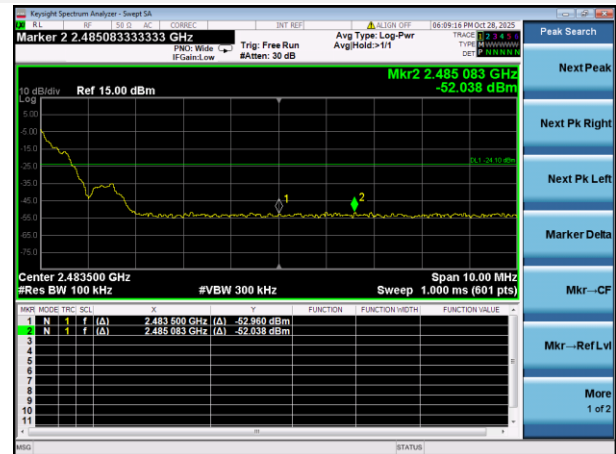
GFSK (BLE 2Mbps) LOW CHANNEL, BAND EDGE



GFSK (BLE 2Mbps) HIGH CHANNEL, CARRIER LEVEL



GFSK (BLE 2Mbps) HIGH CHANNEL, BAND EDGE



A.5 Conducted Emission

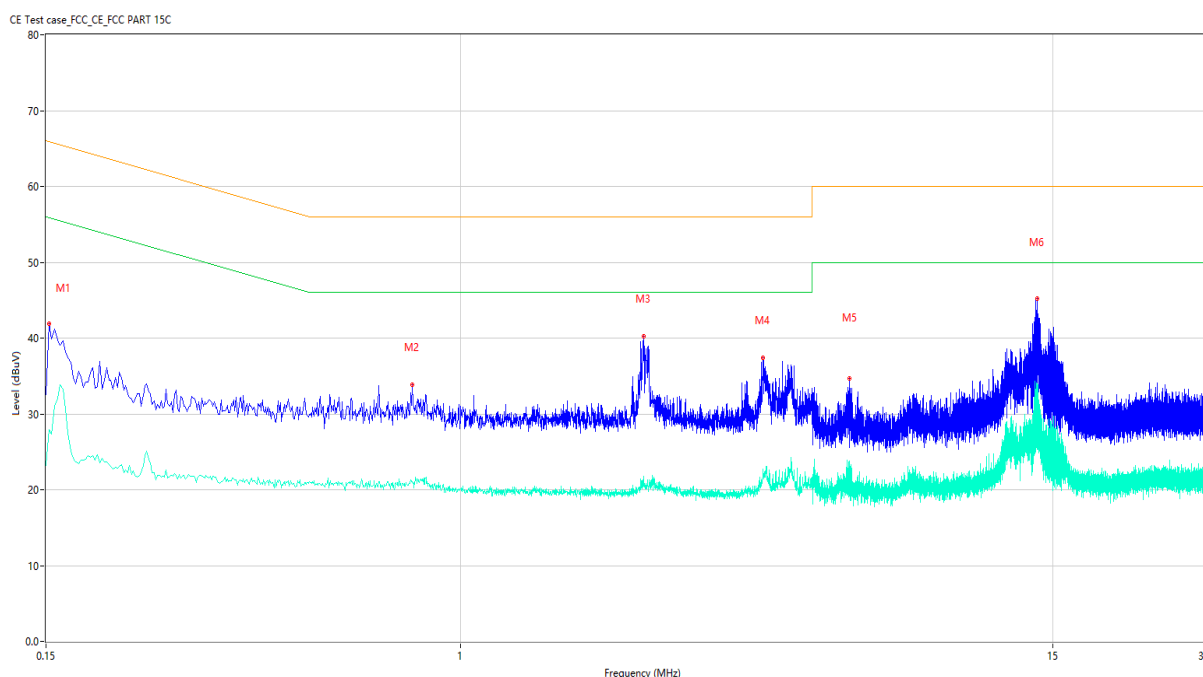
Note 1: The EUT is working in the Normal link mode. All modes have been tested and normal link mode is worst.

Note 2: Devices subject to Part 15 must be tested for all available U.S. voltages and frequencies (such as a nominal 120 VAC, 60 Hz and 240 VAC, 50 Hz) for which the device is capable of operation. So, The configuration 120 VAC, 60 Hz and 240 VAC, 50 Hz were tested respectively, but only the worst configuration (120 VAC, 60 Hz) shown here.

Note 3: Results (dBuV) = Original reading level of Spectrum Analyzer (dBuV) + Factor (dB)

Test Data and Plots

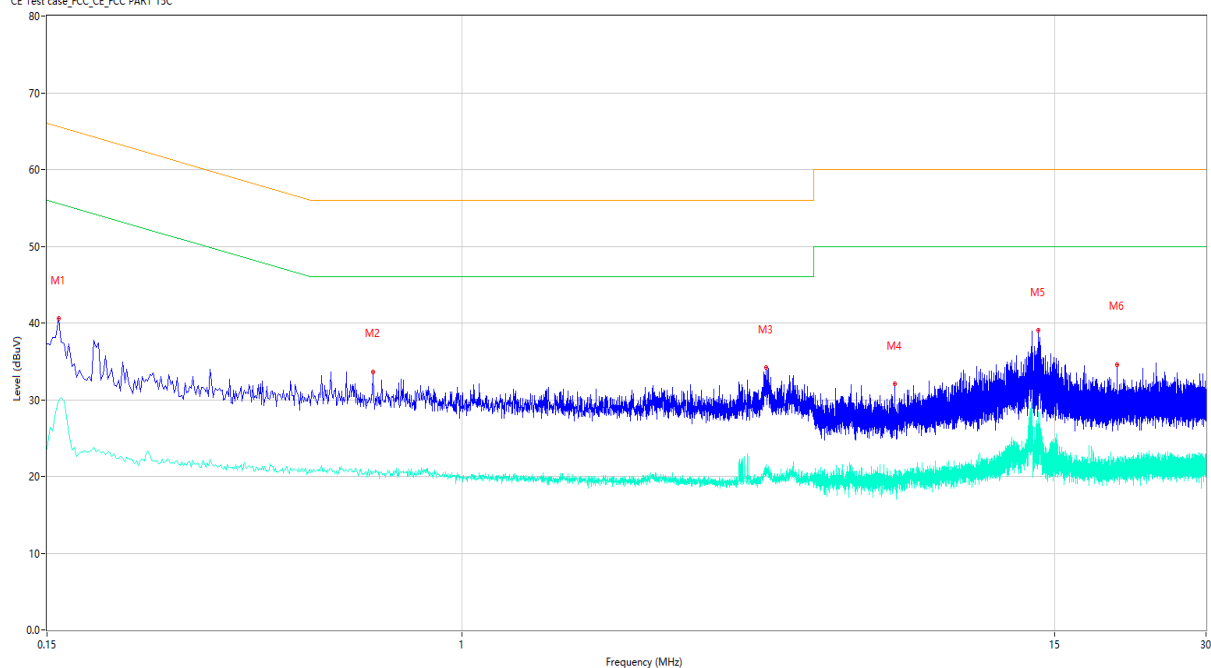
PHASE L



No.	Frequency (MHz)	Results (dBuV)	Factor (dB)	Limit (dBuV)	Margin (dB)	Detector	Line	Verdict
1	0.152	41.90	10.06	65.89	23.99	Peak	L	Pass
1**	0.152	27.93	10.06	55.89	27.96	AV	L	Pass
2	0.802	33.81	10.21	56.00	22.19	Peak	L	Pass
2**	0.802	21.03	10.21	46.00	24.97	AV	L	Pass
3	2.310	40.19	10.36	56.00	15.81	Peak	L	Pass
3**	2.310	20.62	10.36	46.00	25.38	AV	L	Pass
4	3.990	37.40	10.42	56.00	18.60	Peak	L	Pass
4**	3.990	22.32	10.42	46.00	23.68	AV	L	Pass
5	5.918	34.65	10.57	60.00	25.35	Peak	L	Pass
5**	5.918	23.46	10.57	50.00	26.54	AV	L	Pass
6	13.968	45.16	11.13	60.00	14.84	Peak	L	Pass
6**	13.968	34.02	11.13	50.00	15.98	AV	L	Pass

PHASE N

CE Test case_FCC_CE_FCC PART 15C



No.	Frequency (MHz)	Results (dBuV)	Factor (dB)	Limit (dBuV)	Margin (dB)	Detector	Line	Verdict
1	0.158	40.54	10.15	65.57	25.03	Peak	N	Pass
1**	0.158	29.89	10.15	55.57	25.68	AV	N	Pass
2	0.666	33.64	10.21	56.00	22.36	Peak	N	Pass
2**	0.666	20.76	10.21	46.00	25.24	AV	N	Pass
3	4.020	34.17	10.38	56.00	21.83	Peak	N	Pass
3**	4.020	20.77	10.38	46.00	25.23	AV	N	Pass
4	7.226	32.09	10.64	60.00	27.91	Peak	N	Pass
4**	7.226	20.93	10.64	50.00	29.07	AV	N	Pass
5	13.946	39.00	11.09	60.00	21.00	Peak	N	Pass
5**	13.946	28.39	11.09	50.00	21.61	AV	N	Pass
6	19.984	34.52	11.39	60.00	25.48	Peak	N	Pass
6**	19.984	21.49	11.39	50.00	28.51	AV	N	Pass

A.6 Radiated Spurious Emission

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

Note 2: For the test data above 1 GHz, according the ANSI C63.4-2014, 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 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.

Note 4: The Frequency band was pre-scanned, the harmonic and other spurious which worst frequency are recorded in the report.

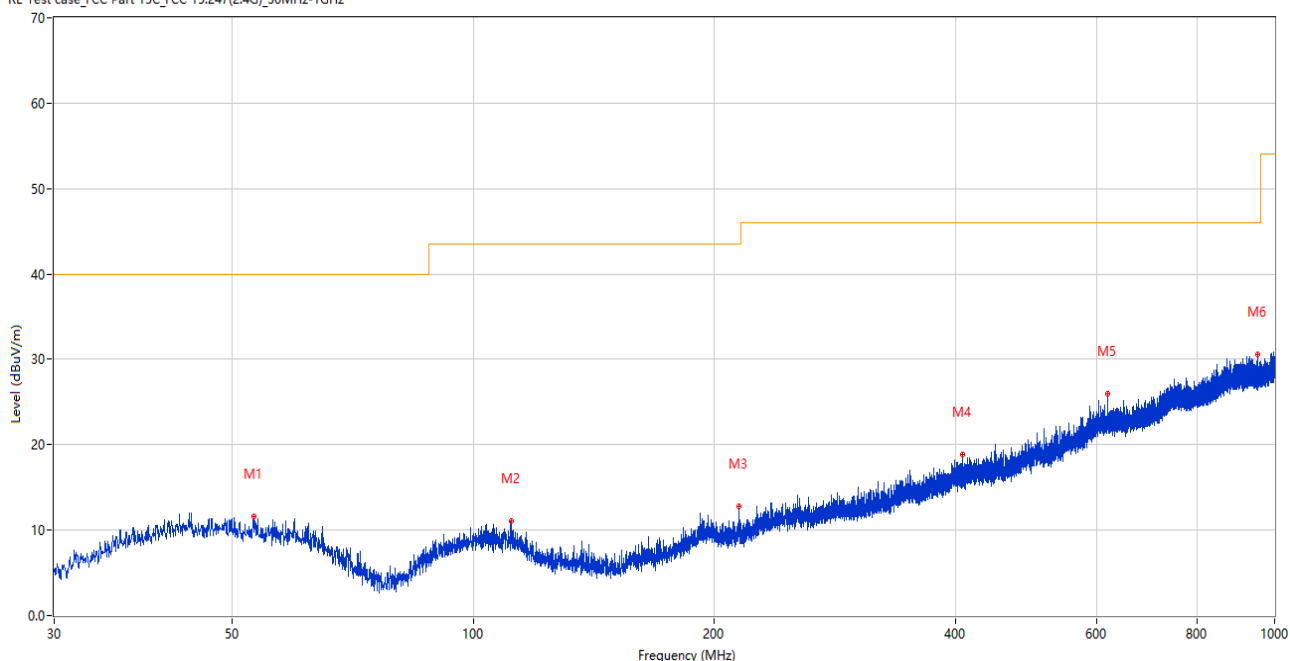
Note 5: All antenna were tested, but only the worst case has been reported in this report.

Note 6: Results (dBuV/m) = Original reading level of Spectrum Analyzer (dBuV) + Factor (dB)

Test Data and Plots

30 MHz to 1 GHz, ANT H

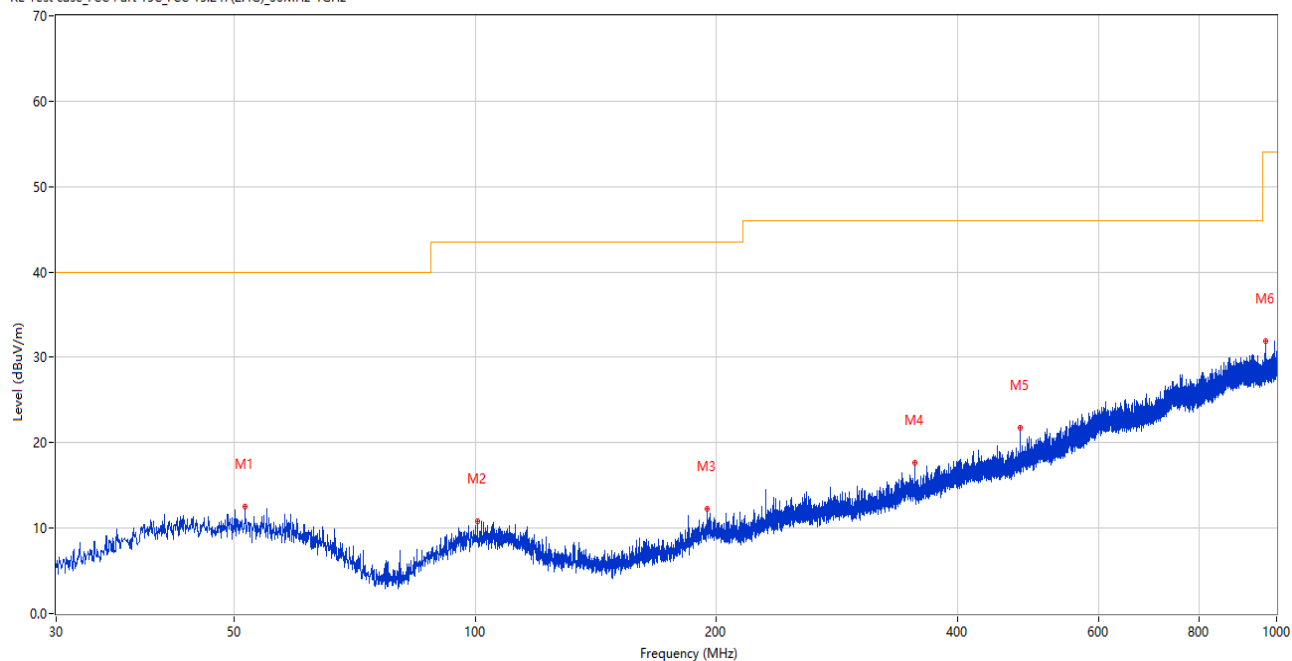
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_30MHz-1GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	53.183	11.65	-24.83	40.0	28.35	Peak	266.00	100	Horizontal	Pass
2	111.432	11.06	-26.72	43.5	32.44	Peak	229.00	100	Horizontal	Pass
3	214.494	12.79	-26.25	43.5	30.71	Peak	235.00	100	Horizontal	Pass
4	407.427	18.83	-20.23	46.0	27.17	Peak	151.00	100	Horizontal	Pass
5	618.354	25.94	-14.55	46.0	20.06	Peak	272.00	100	Horizontal	Pass
6	951.306	30.55	-9.02	46.0	15.45	Peak	124.00	200	Horizontal	Pass

30 MHz to 1 GHz, ANT V

RE Test case_FCC Part 15C_FCC 15.247(2.4G)_30MHz-1GHz



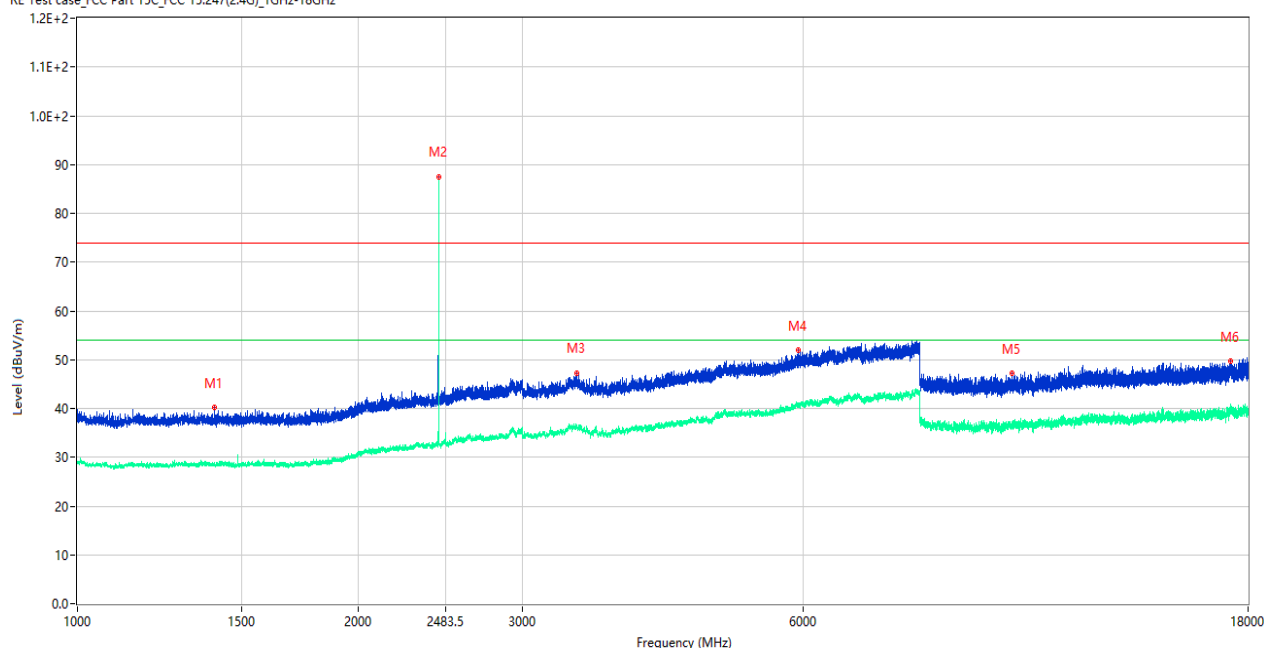
No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	51.679	12.48	-24.68	40.0	27.52	Peak	5.00	200	Vertical	Pass
2	100.664	10.86	-26.08	43.5	32.64	Peak	22.00	200	Vertical	Pass
3	194.900	12.27	-25.60	43.5	31.23	Peak	180.00	100	Vertical	Pass
4	353.301	17.66	-21.61	46.0	28.34	Peak	246.00	100	Vertical	Pass
5	478.237	21.70	-18.74	46.0	24.30	Peak	53.00	200	Vertical	Pass
6	968.911	31.85	-8.62	54.0	22.15	Peak	0.00	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 (BLE 1Mbps) MIDDLE CHANNEL 1 GHz to 18 GHz, ANT H

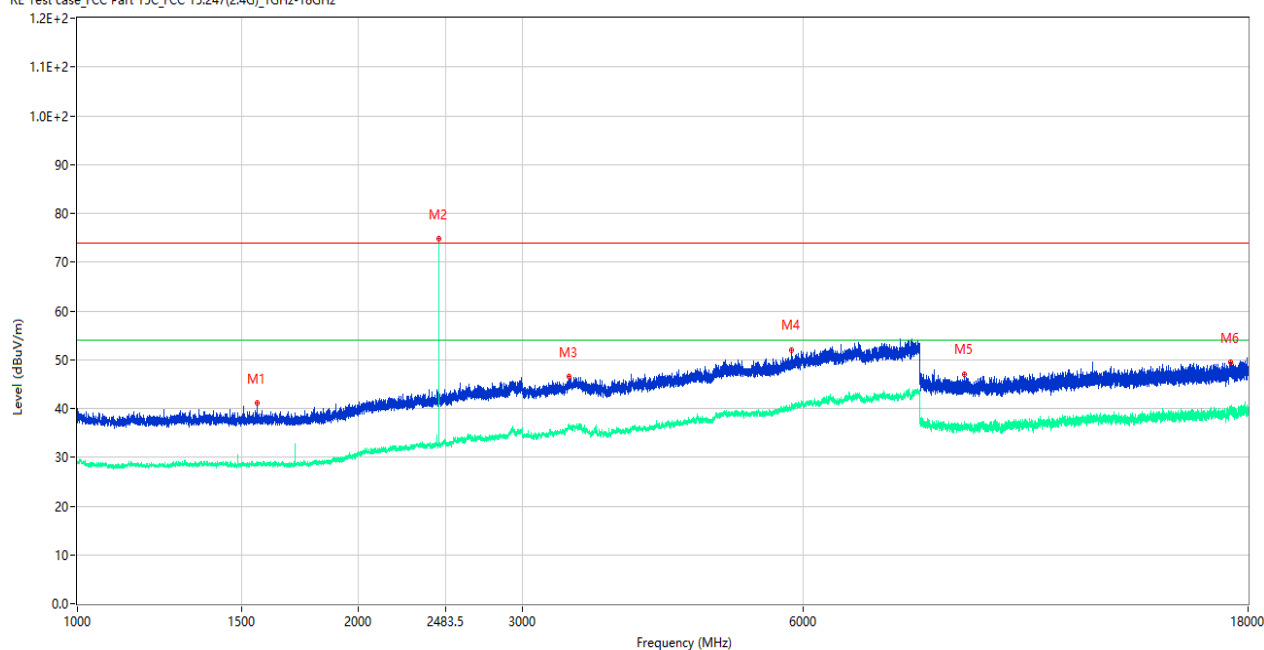
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1401.750	40.27	-15.97	74.0	33.73	Peak	360.00	150	Horizontal	Pass
1**	1401.750	28.35	-15.97	54.0	25.65	AV	360.00	150	Horizontal	Pass
2	2439.750	87.55	-12.37	74.0	-13.55	Peak	227.00	150	Horizontal	N/A
2**	2439.750	84.93	-12.37	54.0	-30.93	AV	227.00	150	Horizontal	N/A
3	3428.500	47.29	-4.96	74.0	26.71	Peak	150.00	150	Horizontal	Pass
3**	3428.500	36.60	-4.96	54.0	17.40	AV	150.00	150	Horizontal	Pass
4	5930.000	51.92	0.01	74.0	22.08	Peak	160.00	150	Horizontal	Pass
4**	5930.000	41.06	0.01	54.0	12.94	AV	160.00	150	Horizontal	Pass
5	10042.500	47.28	-3.98	74.0	26.72	Peak	1.00	150	Horizontal	Pass
5**	10042.500	36.54	-3.98	54.0	17.46	AV	1.00	150	Horizontal	Pass
6	17233.500	49.68	-0.47	74.0	24.32	Peak	0.00	150	Horizontal	Pass
6**	17233.500	39.62	-0.47	54.0	14.38	AV	0.00	150	Horizontal	Pass

GFSK (BLE 1Mbps) MIDDLE CHANNEL 1 GHz to 18 GHz, ANT V

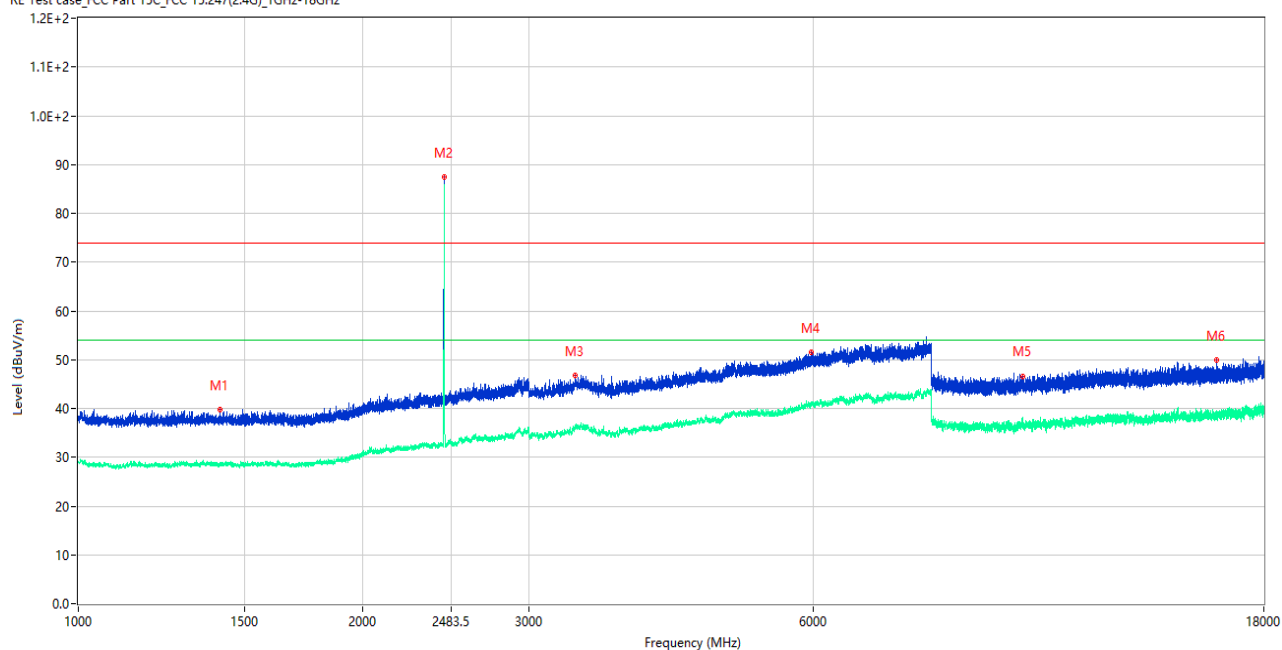
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1559.250	41.02	-16.03	74.0	32.98	Peak	2.00	150	Vertical	Pass
1**	1559.250	29.05	-16.03	54.0	24.95	AV	2.00	150	Vertical	Pass
2	2439.750	74.80	-12.37	74.0	-0.80	Peak	61.00	150	Vertical	N/A
2**	2439.750	72.22	-12.37	54.0	-18.22	AV	61.00	150	Vertical	N/A
3	3366.500	46.51	-5.05	74.0	27.49	Peak	81.00	150	Vertical	Pass
3**	3366.500	36.29	-5.05	54.0	17.71	AV	81.00	150	Vertical	Pass
4	5836.500	51.98	-0.79	74.0	22.02	Peak	280.00	150	Vertical	Pass
4**	5836.500	40.54	-0.79	54.0	13.46	AV	280.00	150	Vertical	Pass
5	8939.000	47.11	-4.34	74.0	26.89	Peak	352.00	150	Vertical	Pass
5**	8939.000	36.24	-4.34	54.0	17.76	AV	352.00	150	Vertical	Pass
6	17251.500	49.43	-0.64	74.0	24.57	Peak	11.00	150	Vertical	Pass
6**	17251.500	39.83	-0.64	54.0	14.17	AV	11.00	150	Vertical	Pass

GFSK (BLE 2Mbps) MIDDLE CHANNEL 1 GHz to 18 GHz, ANT H

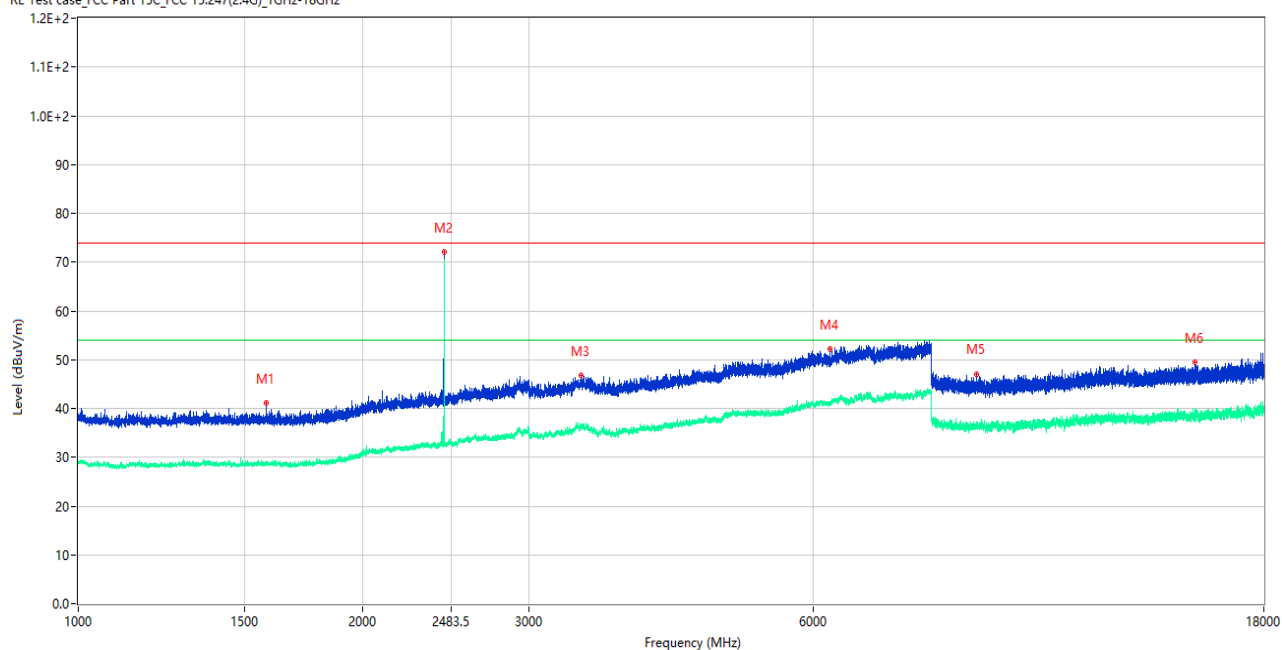
RE Test case_FCC Part 15C_FCC 15.247(2.4G)_1GHz-18GHz



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	1411.500	39.83	-15.98	74.0	34.17	Peak	338.00	150	Horizontal	Pass
1**	1411.500	28.66	-15.98	54.0	25.34	AV	338.00	150	Horizontal	Pass
2	2440.500	87.45	-12.38	74.0	-13.45	Peak	81.00	150	Horizontal	N/A
2**	2440.500	85.62	-12.38	54.0	-31.62	AV	81.00	150	Horizontal	N/A
3	3355.500	46.83	-6.30	74.0	27.17	Peak	360.00	150	Horizontal	Pass
3**	3355.500	35.92	-6.30	54.0	18.08	AV	360.00	150	Horizontal	Pass
4	5968.000	51.61	-0.18	74.0	22.39	Peak	259.00	150	Horizontal	Pass
4**	5968.000	40.77	-0.18	54.0	13.23	AV	259.00	150	Horizontal	Pass
5	9997.000	46.65	-3.99	74.0	27.35	Peak	154.00	150	Horizontal	Pass
5**	9997.000	36.05	-3.99	54.0	17.95	AV	154.00	150	Horizontal	Pass
6	16057.500	49.97	-1.44	74.0	24.03	Peak	68.00	150	Horizontal	Pass
6**	16057.500	39.02	-1.44	54.0	14.98	AV	68.00	150	Horizontal	Pass

GFSK (BLE 2Mbps) 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	1580.000	41.14	-16.11	74.0	32.86	Peak	119.00	150	Vertical	Pass
1**	1580.000	28.91	-16.11	54.0	25.09	AV	119.00	150	Vertical	Pass
2	2440.500	72.14	-12.38	74.0	1.86	Peak	62.00	150	Vertical	Pass
2**	2440.500	70.19	-12.38	54.0	-16.19	AV	62.00	150	Vertical	N/A
3	3409.000	46.82	-5.35	74.0	27.18	Peak	359.00	150	Vertical	Pass
3**	3409.000	36.73	-5.35	54.0	17.27	AV	359.00	150	Vertical	Pass
4	6246.000	52.10	-0.96	74.0	21.90	Peak	308.00	150	Vertical	Pass
4**	6246.000	40.97	-0.96	54.0	13.03	AV	308.00	150	Vertical	Pass
5	8929.500	47.10	-4.38	74.0	26.90	Peak	58.00	150	Vertical	Pass
5**	8929.500	36.86	-4.38	54.0	17.14	AV	58.00	150	Vertical	Pass
6	15219.000	49.41	-1.87	74.0	24.59	Peak	360.00	150	Vertical	Pass
6**	15219.000	38.92	-1.87	54.0	15.08	AV	360.00	150	Vertical	Pass

A.7 Band Edge (Restricted-band band-edge)

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 C63.10-2020, 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.

Note 5: All antenna were tested, but only the worst case has been reported in this report.

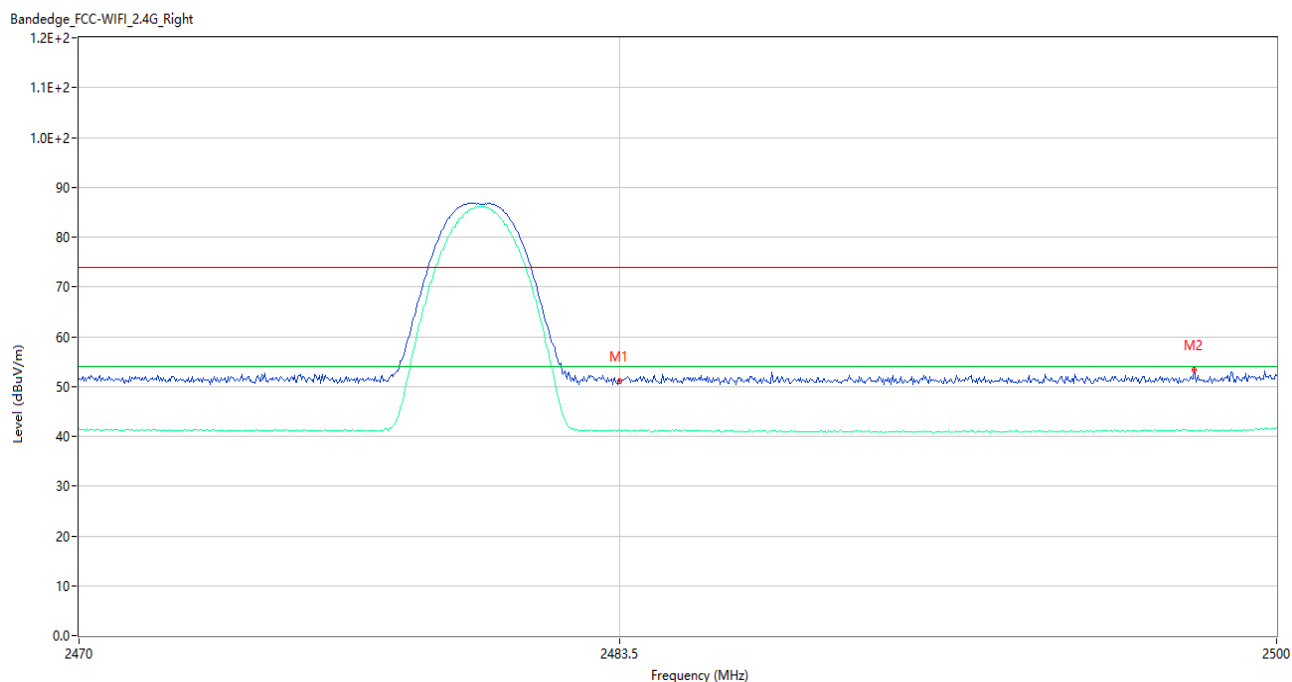
Test Data and Plots

GFSK (BLE 1Mbps) LOW CHANNEL



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	2390.000	51.10	-4.87	74.0	22.90	Peak	290.91	150	Vertical	Pass
1**	2390.000	40.50	-4.87	54.0	13.50	AV	290.91	150	Vertical	Pass
2	2329.500	52.12	-4.15	74.0	21.88	Peak	344.00	150	Vertical	Pass
2**	2329.500	40.54	-4.15	54.0	13.46	AV	344.00	150	Vertical	Pass

GFSK (BLE 1Mbps) HIGH CHANNEL



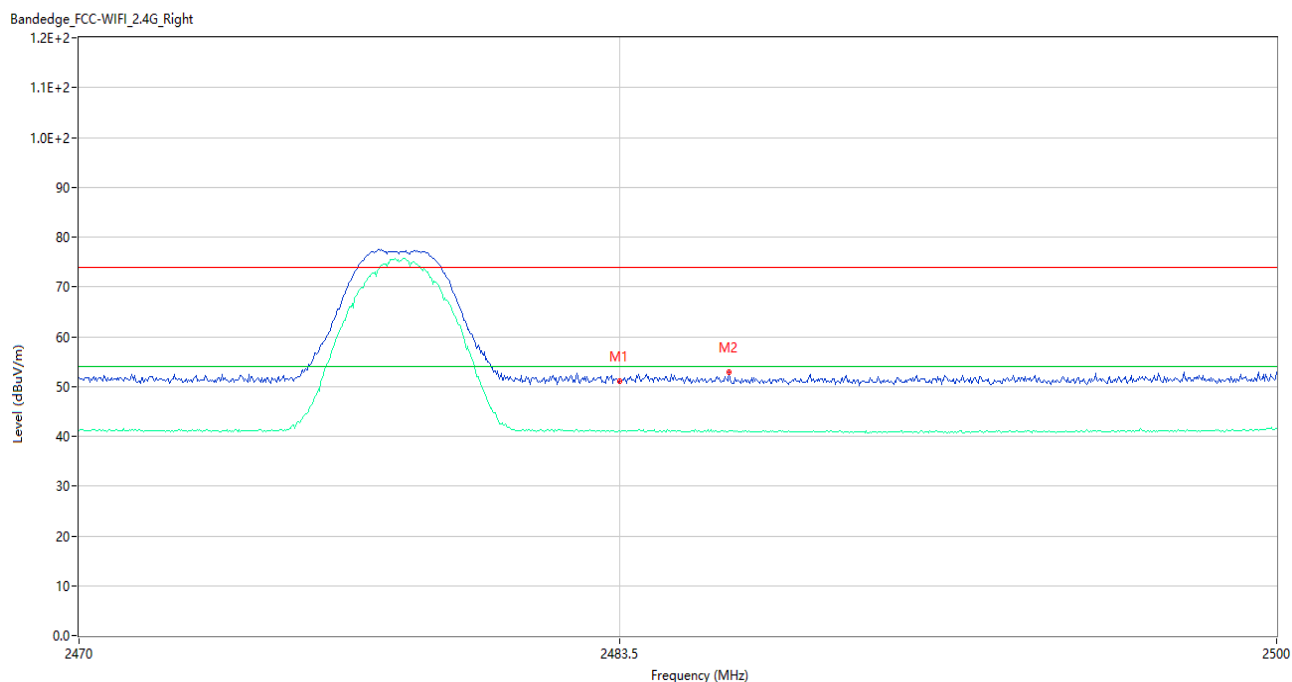
No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	2483.500	50.97	-3.78	74.0	23.03	Peak	74.00	150	Horizontal	Pass
1**	2483.500	41.02	-3.78	54.0	12.98	AV	74.00	150	Horizontal	Pass
2	2497.930	53.43	-3.97	74.0	20.57	Peak	48.00	150	Horizontal	Pass
2**	2497.930	41.16	-3.97	54.0	12.84	AV	48.00	150	Horizontal	Pass

GFSK (BLE 2Mbps) LOW CHANNEL



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	2390.000	51.04	-4.87	74.0	22.96	Peak	355.74	150	Vertical	Pass
1**	2390.000	40.27	-4.87	54.0	13.73	AV	355.74	150	Vertical	Pass
2	2330.200	52.51	-4.10	74.0	21.49	Peak	0.00	150	Vertical	Pass
2**	2330.200	40.66	-4.10	54.0	13.34	AV	0.00	150	Vertical	Pass

GFSK (BLE 2Mbps) HIGH CHANNEL



No.	Frequency (MHz)	Results (dBuV/m)	Factor (dB)	Limit (dBuV/m)	Margin (dB)	Detector	Table (Degree)	Height (cm)	Antenna	Verdict
1	2483.500	51.14	-3.78	74.0	22.86	Peak	12.00	150	Vertical	Pass
1**	2483.500	41.07	-3.78	54.0	12.93	AV	12.00	150	Vertical	Pass
2	2486.230	52.98	-3.79	74.0	21.02	Peak	160.00	150	Vertical	Pass
2**	2486.230	41.06	-3.79	54.0	12.94	AV	160.00	150	Vertical	Pass

A.8 Power Spectral Density (PSD)

Test Data

Main Antenna

GFSK (BLE 1Mbps)			
Channel	Spectral power density (dBm/3kHz)	Limit (dBm/3kHz)	Verdict
Low	-21.13	8	Pass
Middle	-19.95	8	Pass
High	-20.26	8	Pass

GFSK (BLE 2Mbps)			
Channel	Spectral power density (dBm/3kHz)	Limit (dBm/3kHz)	Verdict
Low	-23.23	8	Pass
Middle	-22.36	8	Pass
High	-24.29	8	Pass

Aux. Antenna

GFSK (BLE 1Mbps)			
Channel	Spectral power density (dBm/3kHz)	Limit (dBm/3kHz)	Verdict
Low	-20.94	8	Pass
Middle	-18.92	8	Pass
High	-19.50	8	Pass

GFSK (BLE 2Mbps)			
Channel	Spectral power density (dBm/3kHz)	Limit (dBm/3kHz)	Verdict
Low	-24.93	8	Pass
Middle	-23.43	8	Pass
High	-21.72	8	Pass

Test Plots

Main Antenna

GFSK (BLE 1Mbps) LOW CHANNEL



GFSK (BLE 1Mbps) MIDDLE CHANNEL



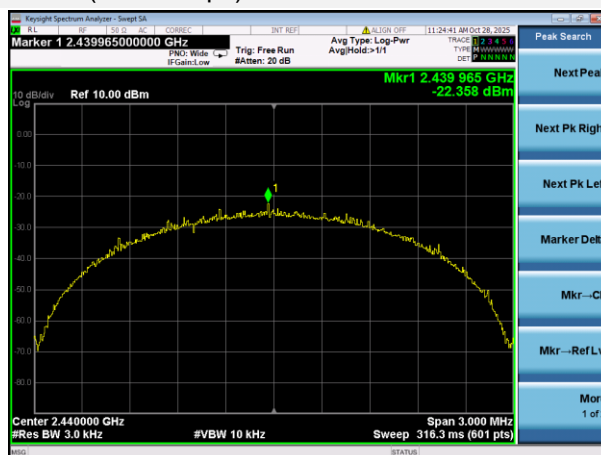
GFSK (BLE 1Mbps) HIGH CHANNEL



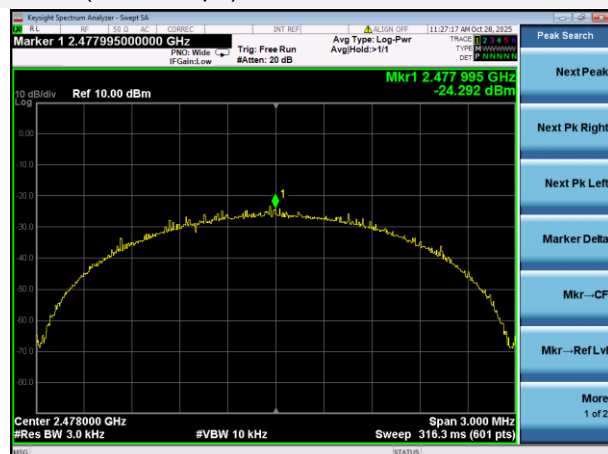
GFSK (BLE 2Mbps) LOW CHANNEL



GFSK (BLE 2Mbps) MIDDLE CHANNEL



GFSK (BLE 2Mbps) HIGH CHANNEL

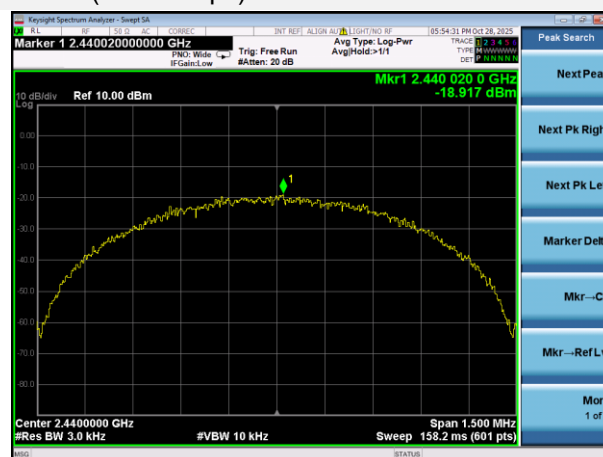


Aux. Antenna

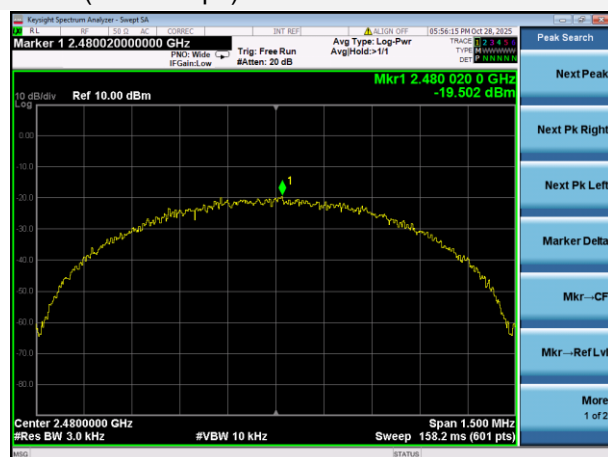
GFSK (BLE 1Mbps) LOW CHANNEL



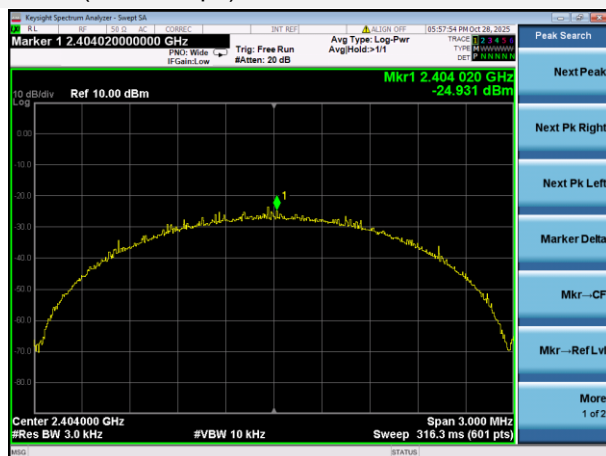
GFSK (BLE 1Mbps) MIDDLE CHANNEL



GFSK (BLE 1Mbps) HIGH CHANNEL



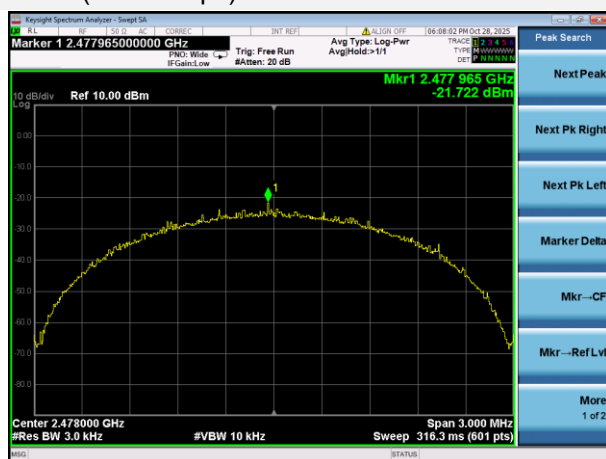
GFSK (BLE 2Mbps) LOW CHANNEL



GFSK (BLE 2Mbps) MIDDLE CHANNEL



GFSK (BLE 2Mbps) HIGH CHANNEL



ANNEX B TEST SETUP PHOTOS

Please refer the document “BL-SH25A1131-AR-1.PDF”.

ANNEX C EUT EXTERNAL PHOTOS

Please refer the document “BL-SH25A1131-AW.PDF”.

ANNEX D EUT INTERNAL PHOTOS

Please refer the document “BL-SH25A1131-AI.PDF”.

Statement

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--END OF REPORT--