



Appendix B

RF Test Data for BT (BLE) (Conducted Measurement)

Product Name: Smart Bike Trainer

Trade Mark: N/A

Test Model: T2H

Environmental Conditions

Temperature:	24.6° C
Relative Humidity:	52.4%
ATM Pressure:	100.0 kPa
Test Engineer:	Emiya lin
Supervised by:	Simba Haung



Contents

	Page
COVER PAGE	
1 Duty Cycle	3
1.1 Test Result	3
1.2 Test Graphs	4
2 Maximum Conducted Output Power	6
2.1 Test Result	6
2.2 Test Graphs	7
3 -6dB Bandwidth	9
3.1 Test Result	9
3.2 Test Graphs	10
4 Maximum Power Spectral Density Level	12
4.1 Test Result	12
4.2 Test Graphs	13
5 Band Edge	15
5.1 Test Result	15
5.2 Test Graphs	16
6 Conducted RF Spurious Emission	18
6.1 Test Result	18
6.2 Test Graphs	19
7 Restrict Band	22
7.1 Test Result	22
7.2 Test Graphs	23

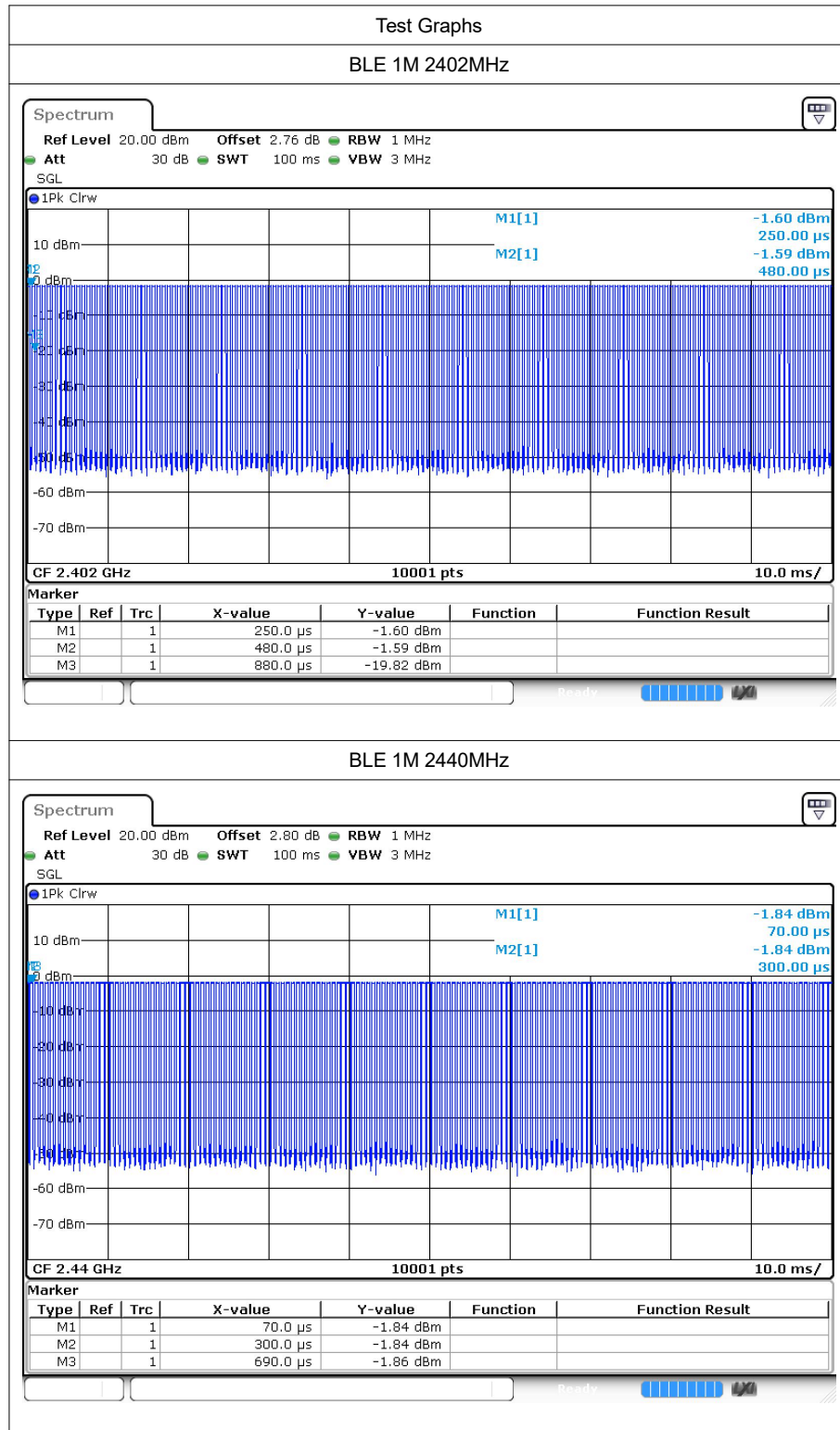


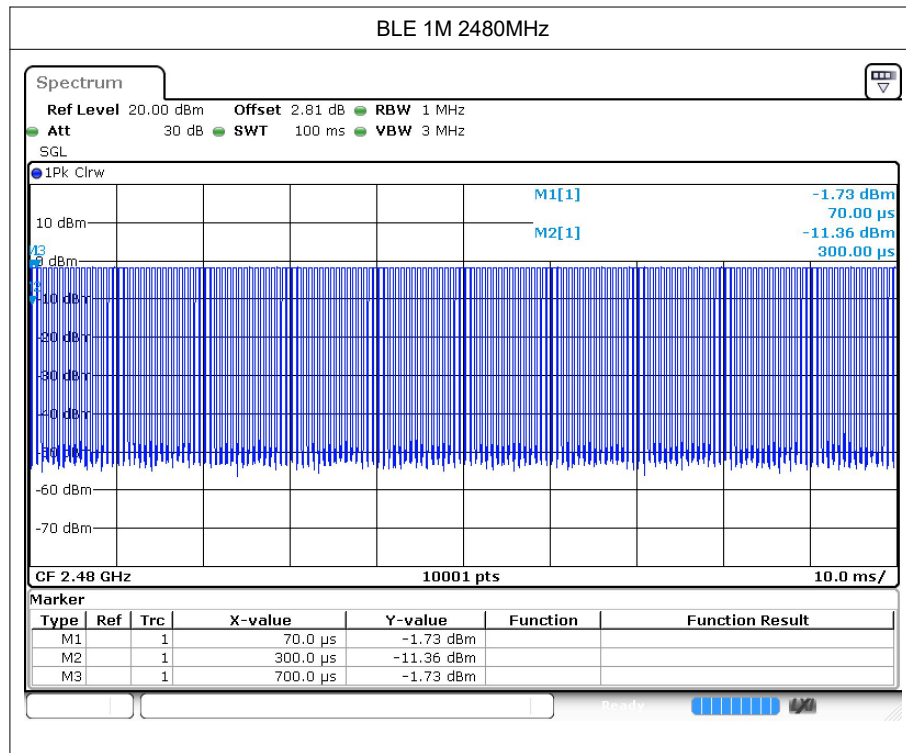
1 Duty Cycle

1.1 Test Result

Mode	Frequency (MHz)	Duty Cycle (%)	Correction Factor	1/T (kHz)
BLE 1M	2402	65.27	1.85	2.5
BLE 1M	2440	64.8	1.88	2.56
BLE 1M	2480	64.8	1.88	2.5

1.2 Test Graphs





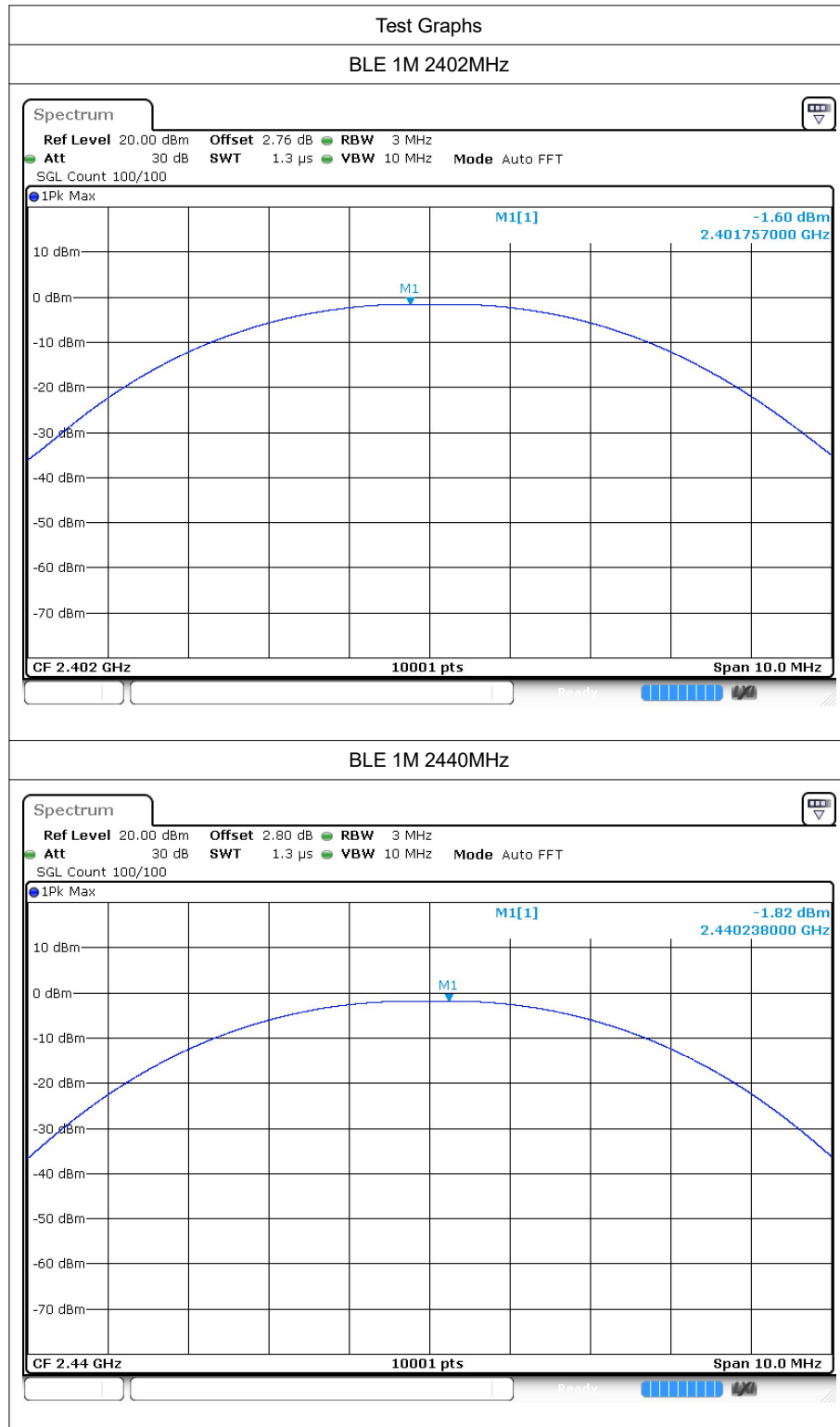


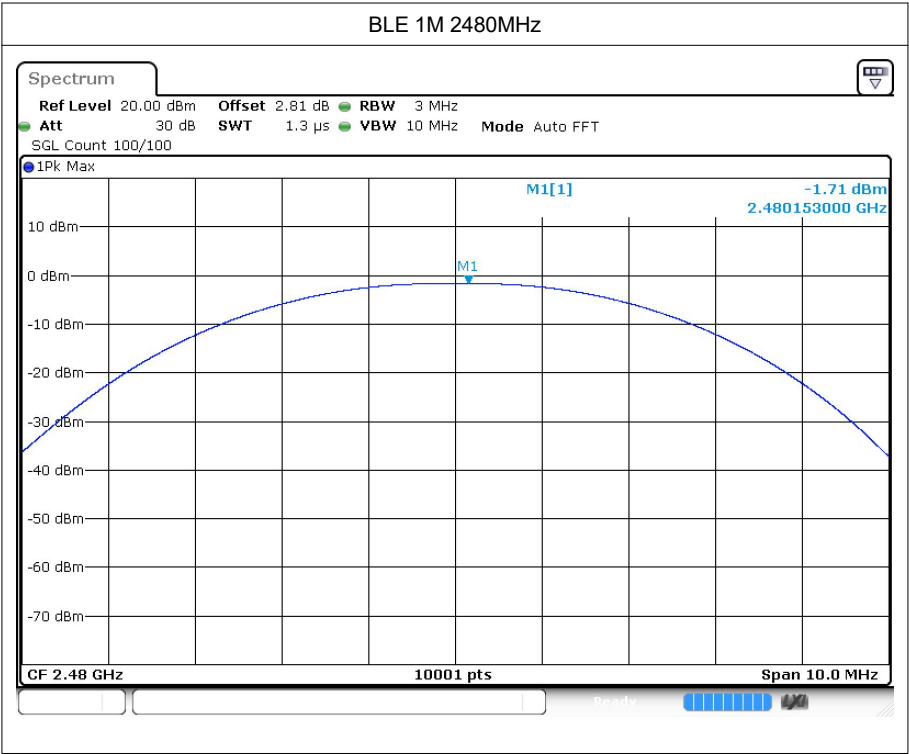
2 Maximum Conducted Output Power

2.1 Test Result

Mode	Frequency (MHz)	Conducted Power (dBm)	Limit (dBm)	Verdict
BLE 1M	2402	-1.6	30	Pass
BLE 1M	2440	-1.82	30	Pass
BLE 1M	2480	-1.71	30	Pass

2.2 Test Graphs





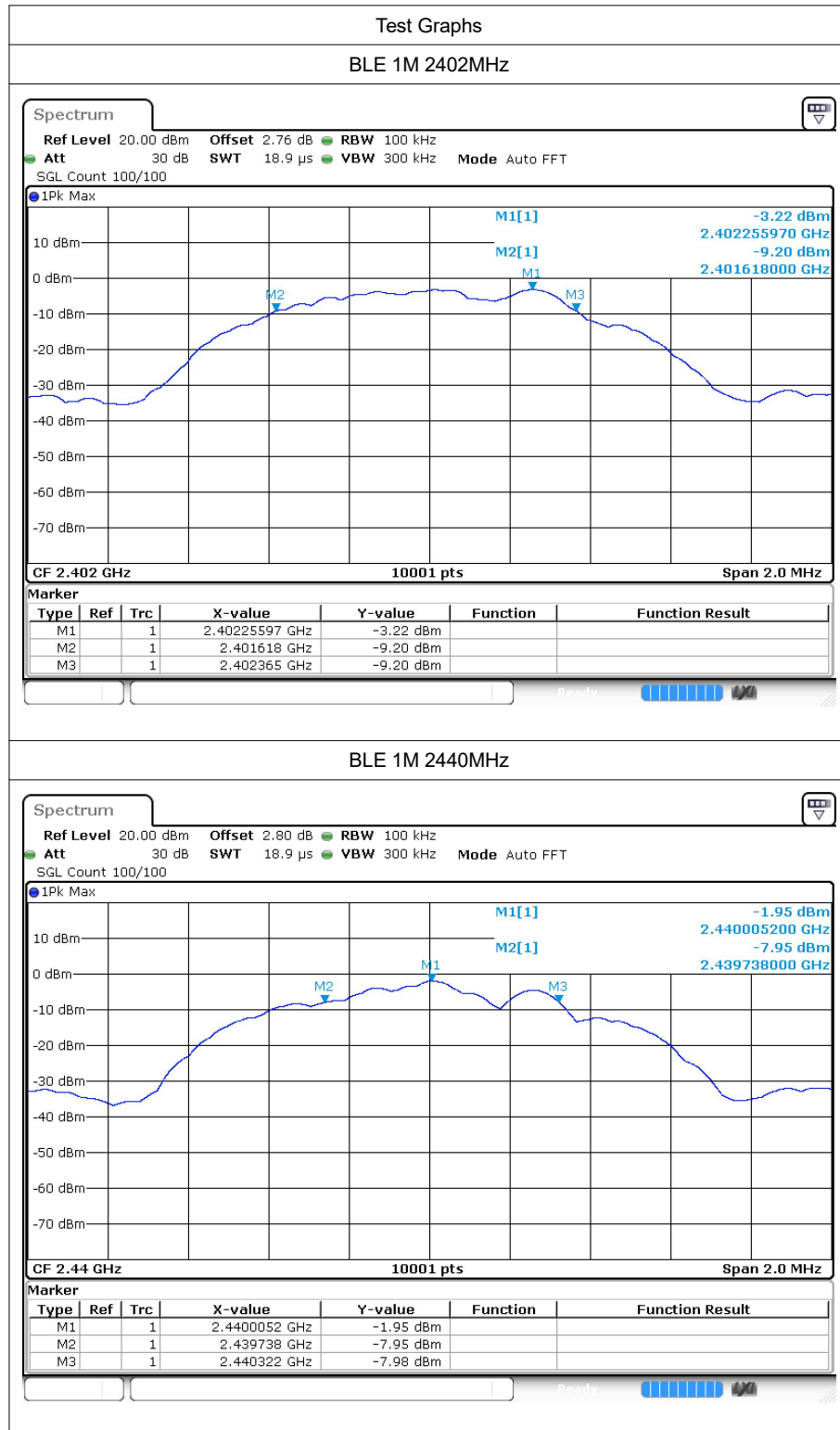


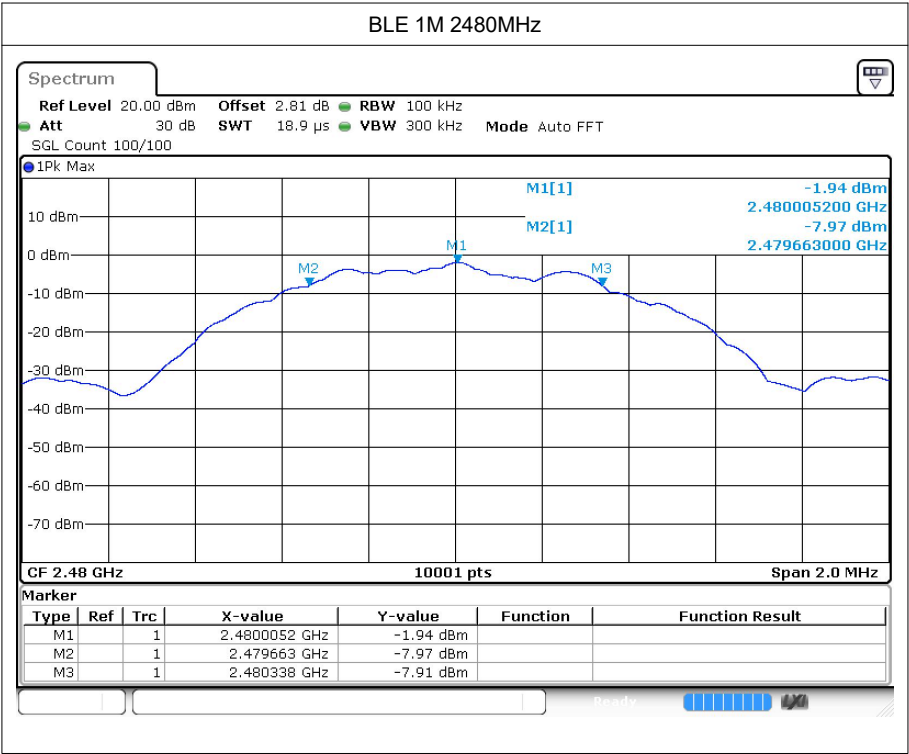
3 -6dB Bandwidth

3.1 Test Result

Mode	Frequency (MHz)	-6 dB Bandwidth (MHz)	Limit -6 dB Bandwidth (MHz)	Verdict
BLE 1M	2402	0.748	0.5	Pass
BLE 1M	2440	0.584	0.5	Pass
BLE 1M	2480	0.675	0.5	Pass

3.2 Test Graphs



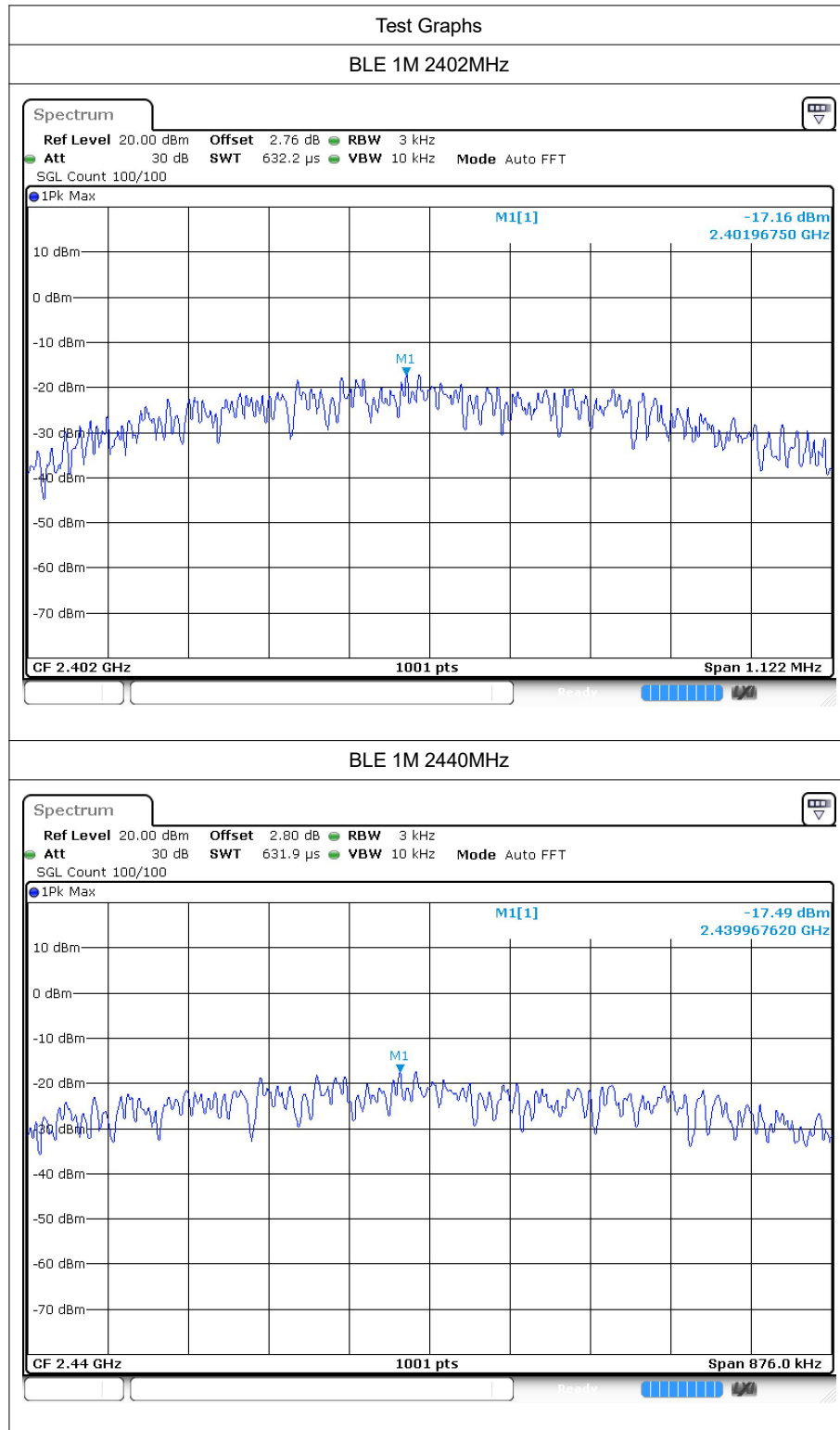


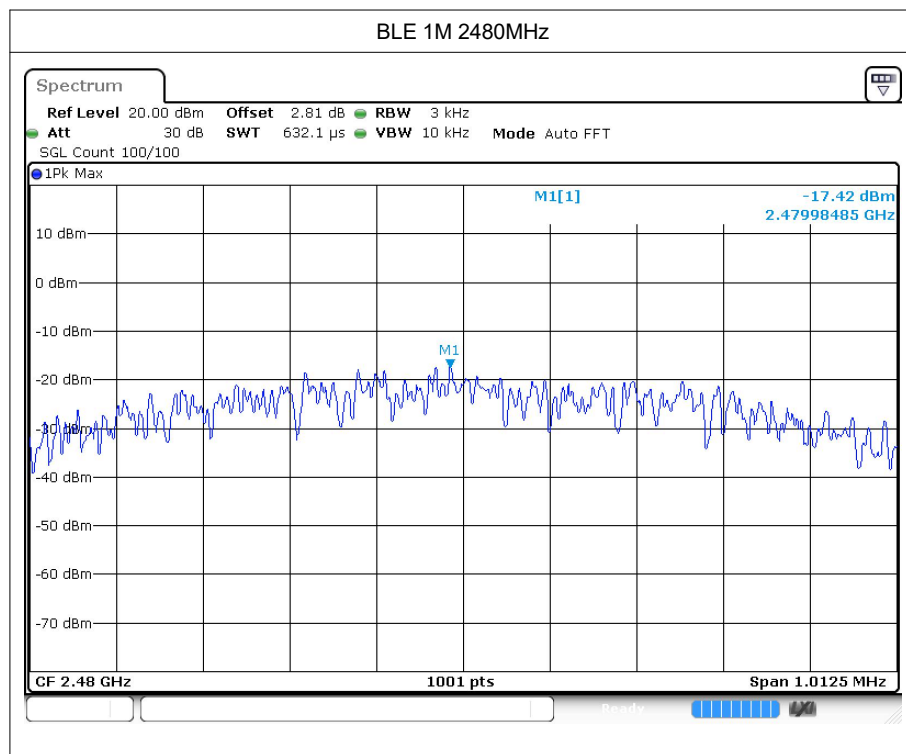
4 Maximum Power Spectral Density Level

4.1 Test Result

Mode	Frequency (MHz)	Conducted PSD (dBm/3-100kHz)	Limit (dBm/3kHz)	Verdict
BLE 1M	2402	-17.16	≤ 8	Pass
BLE 1M	2440	-17.49	≤ 8	Pass
BLE 1M	2480	-17.42	≤ 8	Pass

4.2 Test Graphs





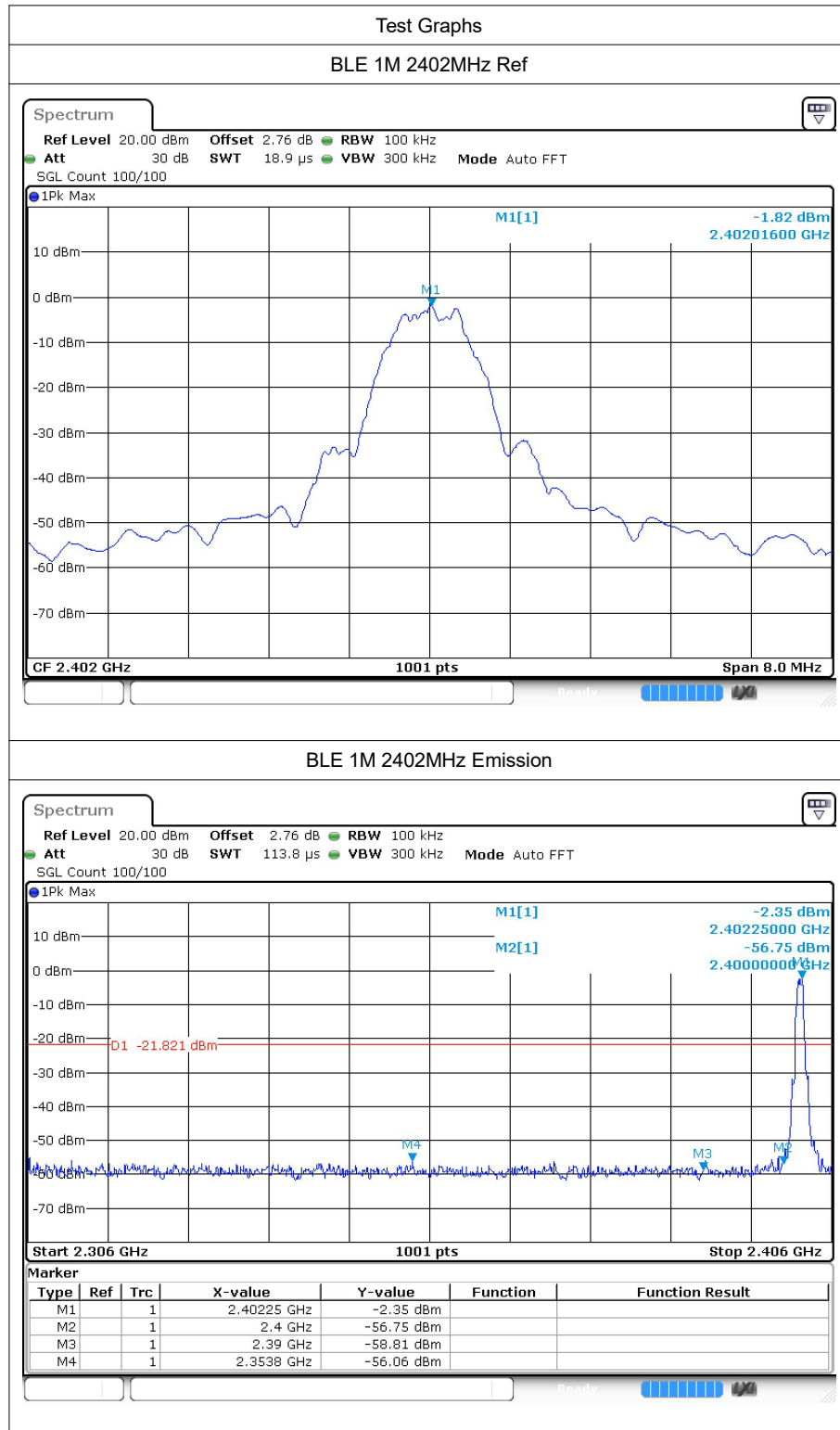


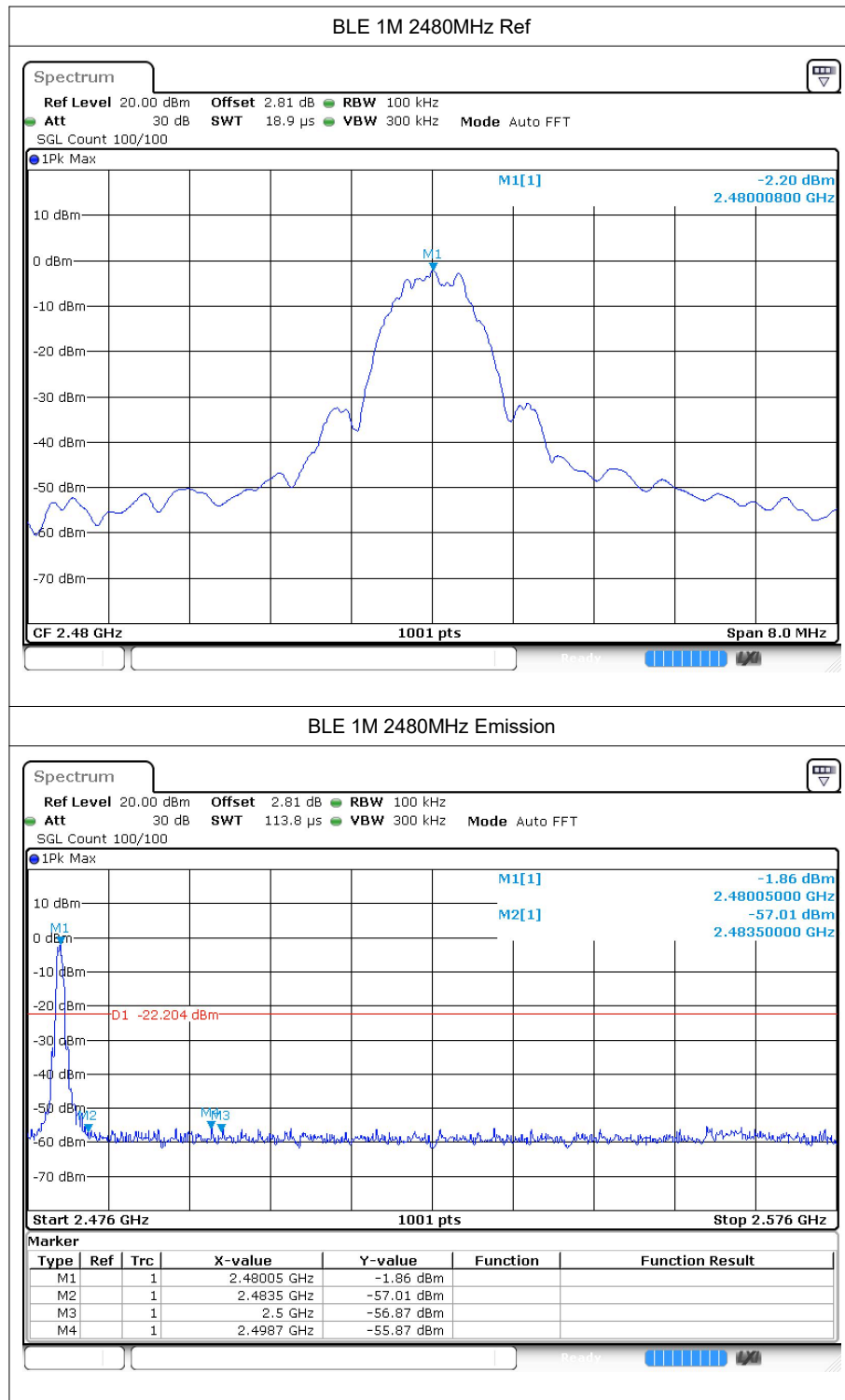
5 Band Edge

5.1 Test Result

Mode	Frequency (MHz)	Max Value (dBc)	Limit (dBc)	Verdict
BLE 1M	2402	-54.24	-20	Pass
BLE 1M	2480	-53.67	-20	Pass

5.2 Test Graphs



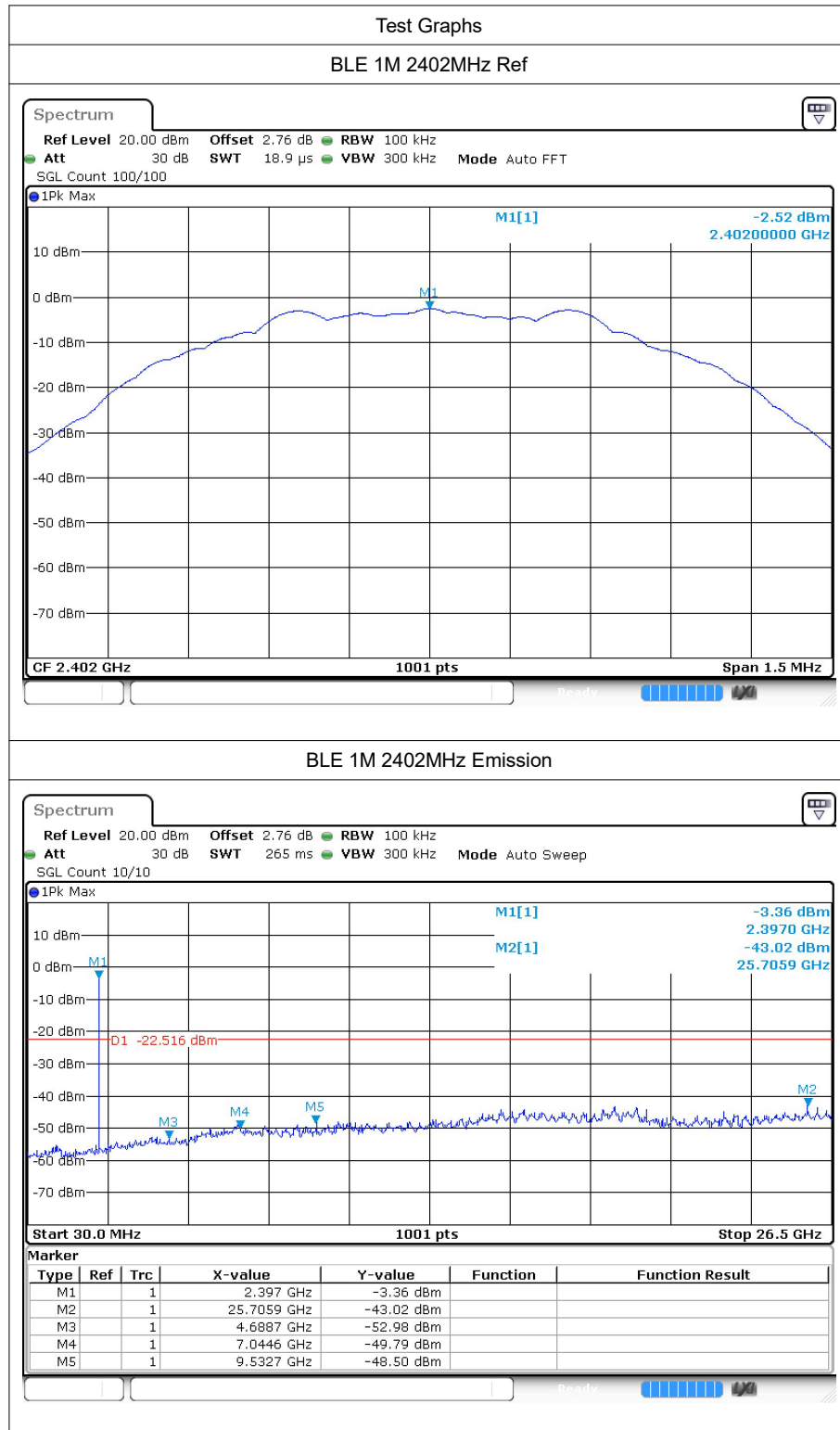


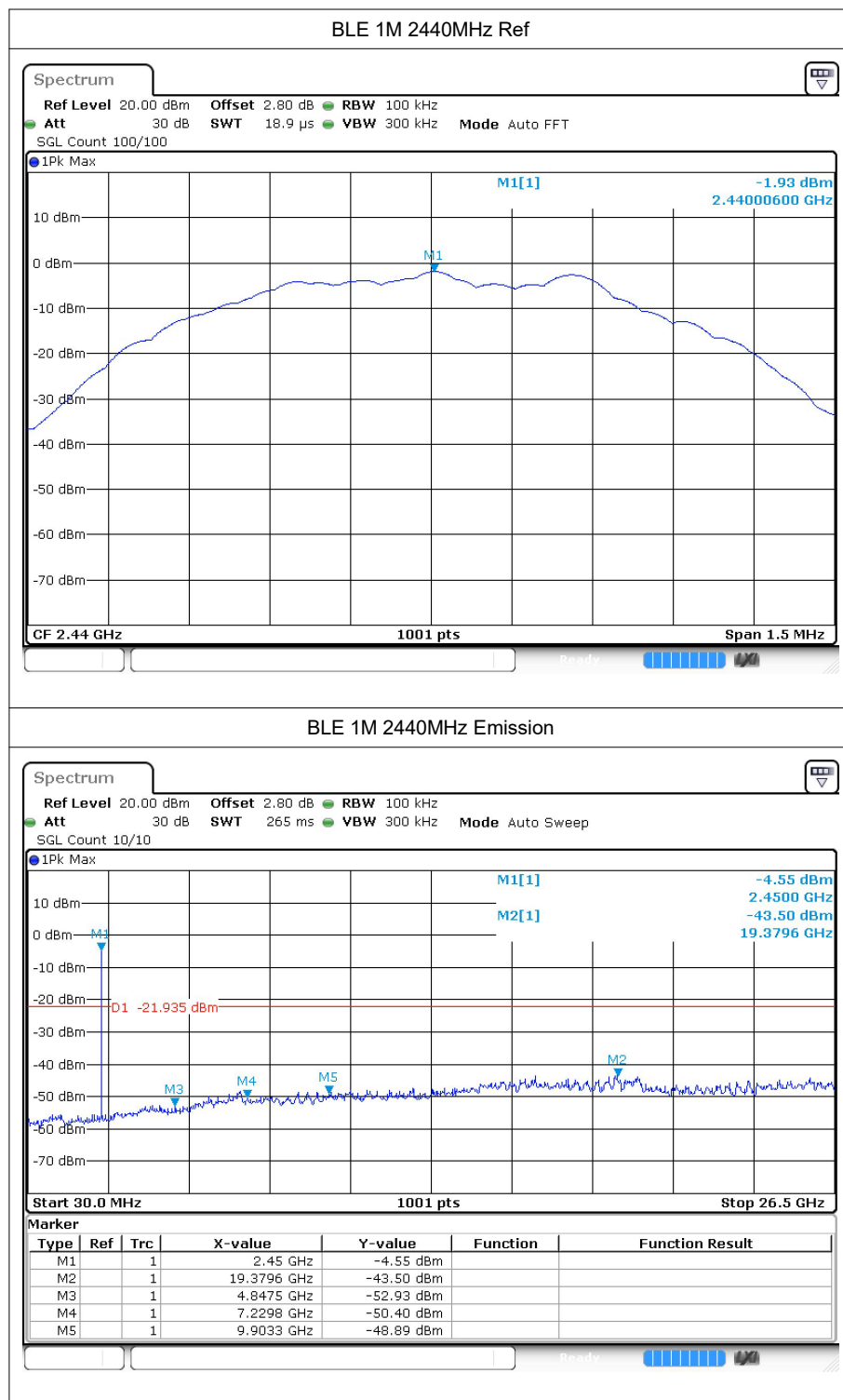
6 Conducted RF Spurious Emission

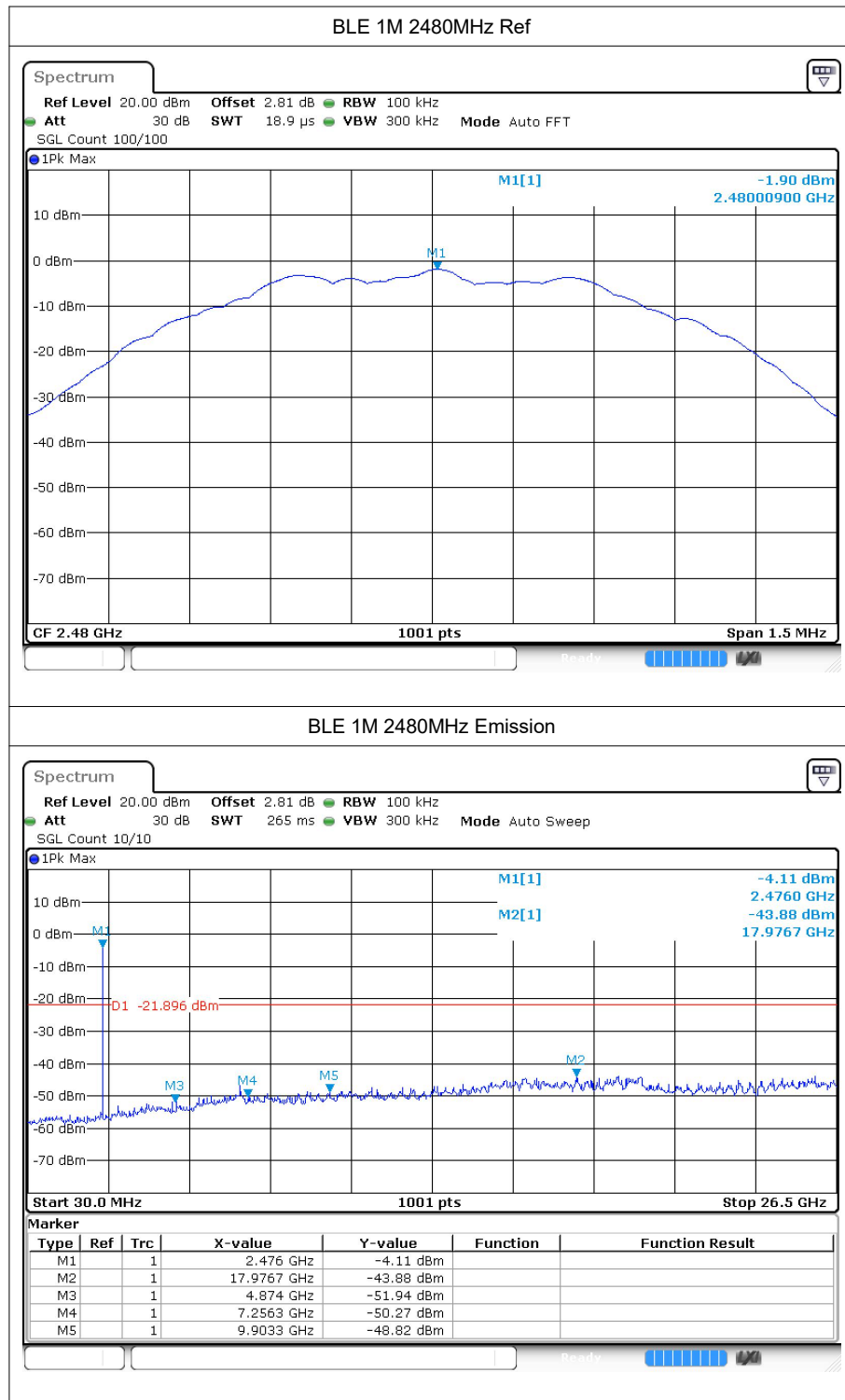
6.1 Test Result

Mode	Frequency (MHz)	Max Value (dBc)	Limit (dBc)	Verdict
BLE 1M	2402	-40.5	-20	Pass
BLE 1M	2440	-41.56	-20	Pass
BLE 1M	2480	-41.98	-20	Pass

6.2 Test Graphs







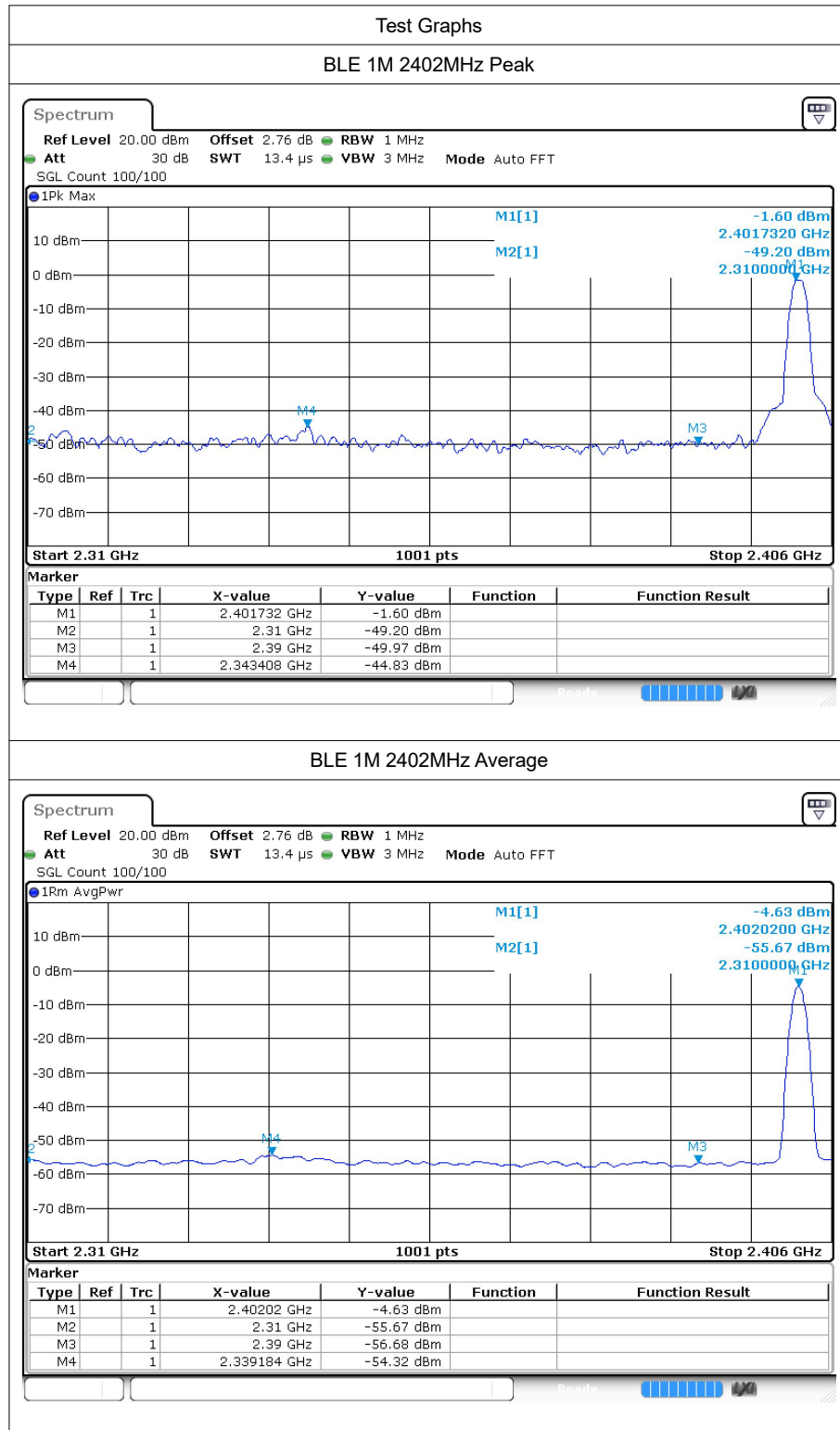


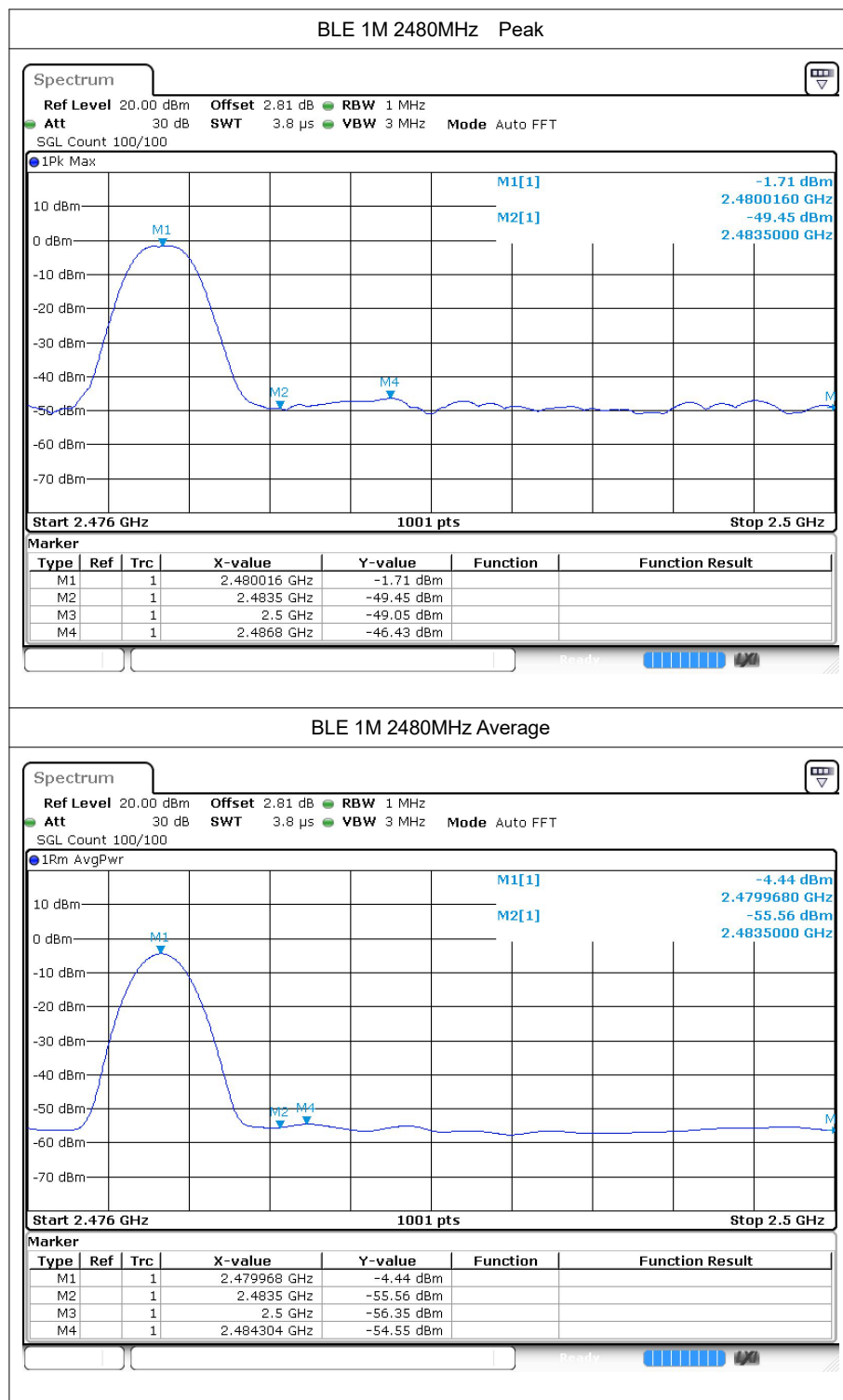
7 Restrict Band

7.1 Test Result

Mode	Frequency (MHz)	Spur Freq (MHz)	Power (dBm)	Gain (dBi)	Duty Factor	E (dBuV/m)	Detector	Limit (dBuV/m)	Verdict
BLE 1M	2402	2310	-49.2	5.23	-	51.18	Peak	74	Pass
BLE 1M	2402	2310	-55.67	5.23	1.85	46.56	Average	54	Pass
BLE 1M	2402	2343.408	-44.83	5.23	-	55.55	Peak	74	Pass
BLE 1M	2402	2339.184	-54.32	5.23	1.85	47.91	Average	54	Pass
BLE 1M	2402	2390	-49.97	5.23	-	50.41	Peak	74	Pass
BLE 1M	2402	2390	-56.68	5.23	1.85	45.55	Average	54	Pass
BLE 1M	2480	2483.5	-49.45	5.23	-	50.93	Peak	74	Pass
BLE 1M	2480	2483.5	-55.56	5.23	1.88	46.7	Average	54	Pass
BLE 1M	2480	2486.8	-46.42	5.23	-	53.96	Peak	74	Pass
BLE 1M	2480	2484.304	-54.54	5.23	1.88	47.72	Average	54	Pass
BLE 1M	2480	2500	-49.05	5.23	-	51.33	Peak	74	Pass
BLE 1M	2480	2500	-56.35	5.23	1.88	45.91	Average	54	Pass

7.2 Test Graphs





---The End---