

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

Product Name: Air WiFi Feeder

Trade Mark: PETLIBRO

Test Model: PLAF301

FCC ID: 2A3DE-PLAF301

Environmental Conditions

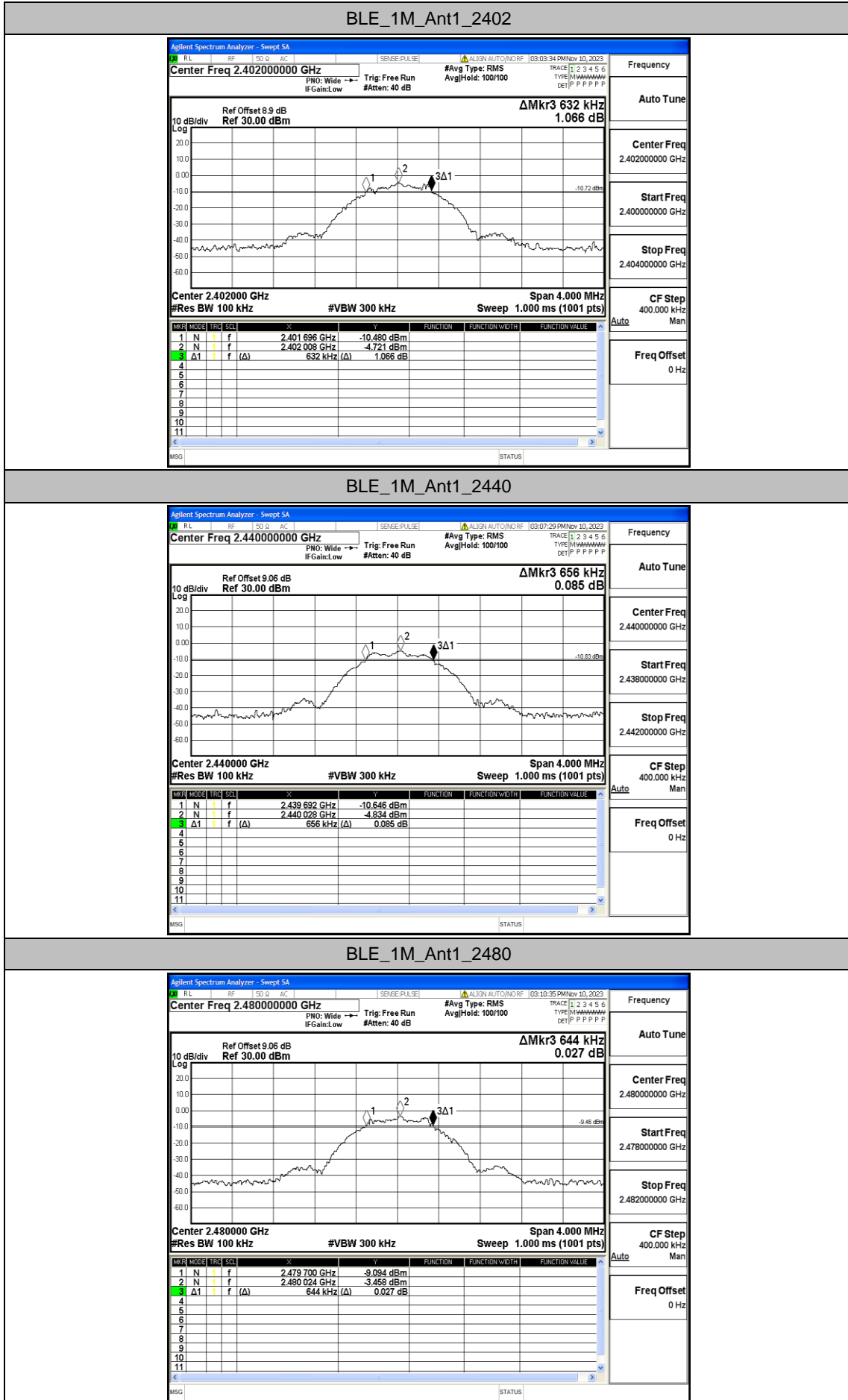
Temperature:	25.5°C
Relative Humidity:	55%
ATM Pressure:	100.0 kPa
Test Engineer:	Anna Hu
Supervised by:	Hugo Chen
NOTE	N/A

Appendix A: DTS Bandwidth

Test Result

TestMode	Antenna	Channel	DTS BW [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
BLE_1M	Ant1	2402	0.632	2401.696	2402.328	0.5	PASS
		2440	0.656	2439.692	2440.348	0.5	PASS
		2480	0.644	2479.700	2480.344	0.5	PASS

Test Graphs

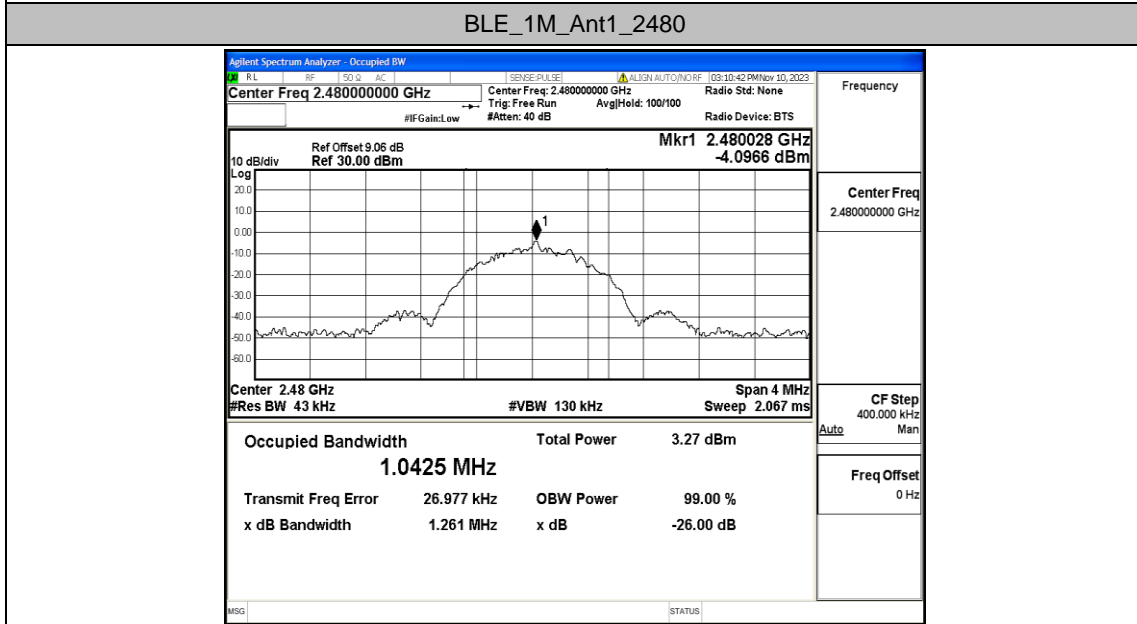
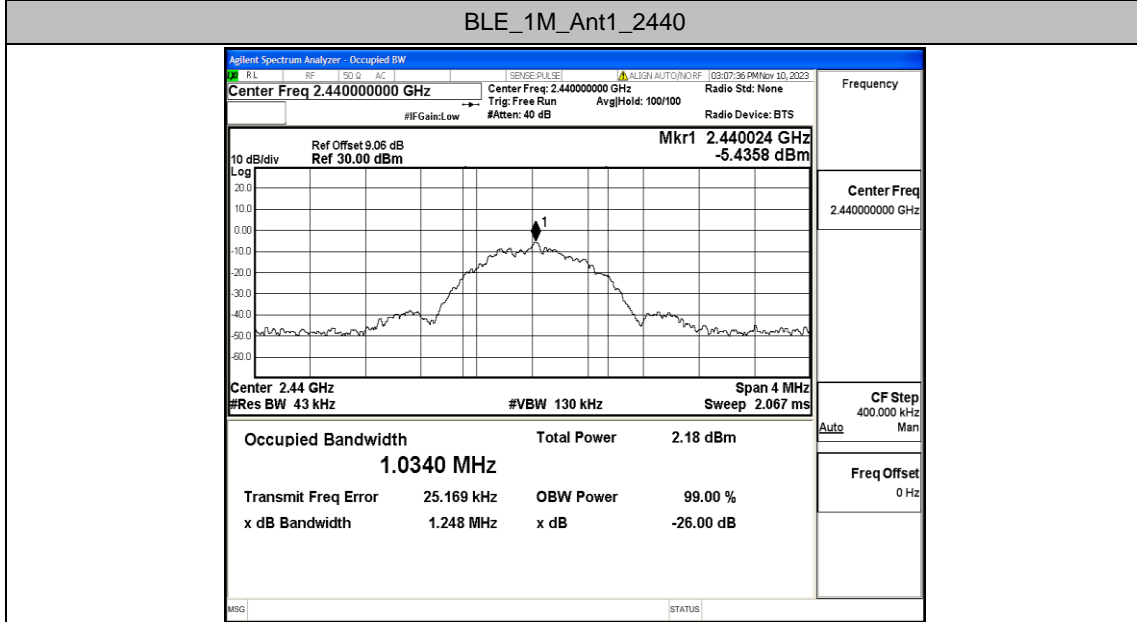
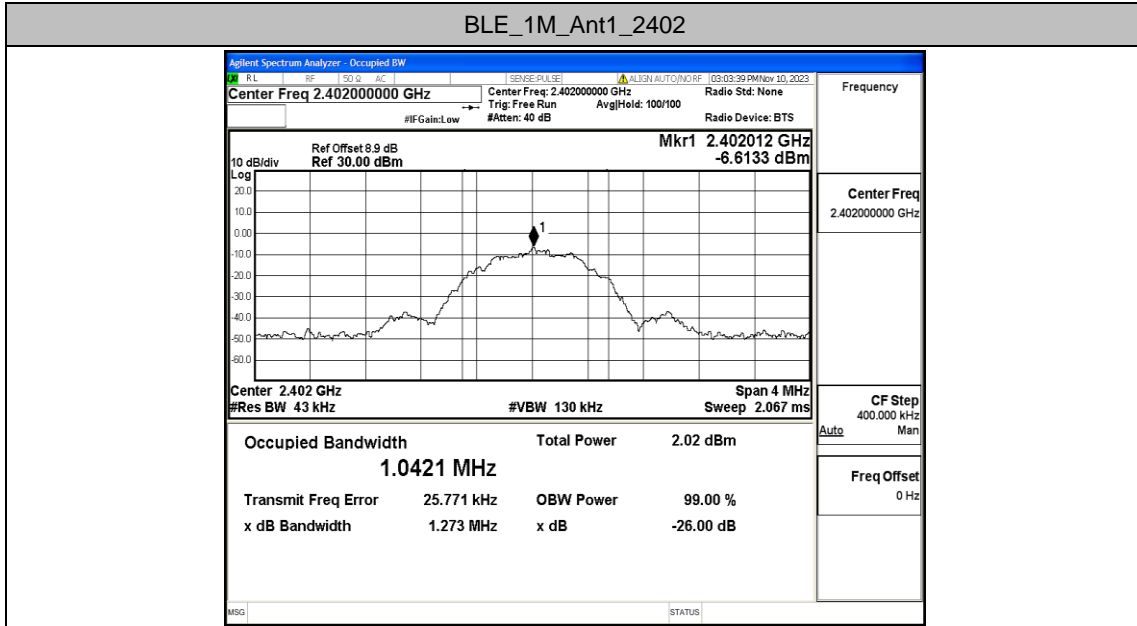


Appendix B: Occupied Channel Bandwidth

Test Result

TestMode	Antenna	Channel	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
BLE_1M	Ant1	2402	1.0421	2401.5047	2402.5468	---	---
		2440	1.0340	2439.5082	2440.5422	---	---
		2480	1.0425	2479.5057	2480.5482	---	---

Test Graphs

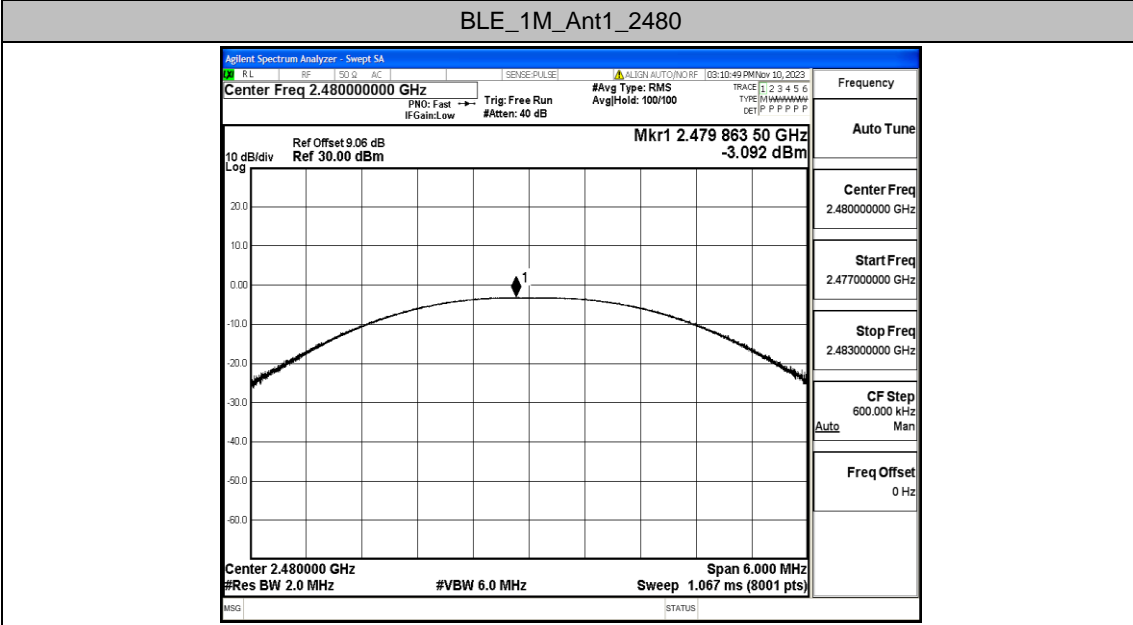
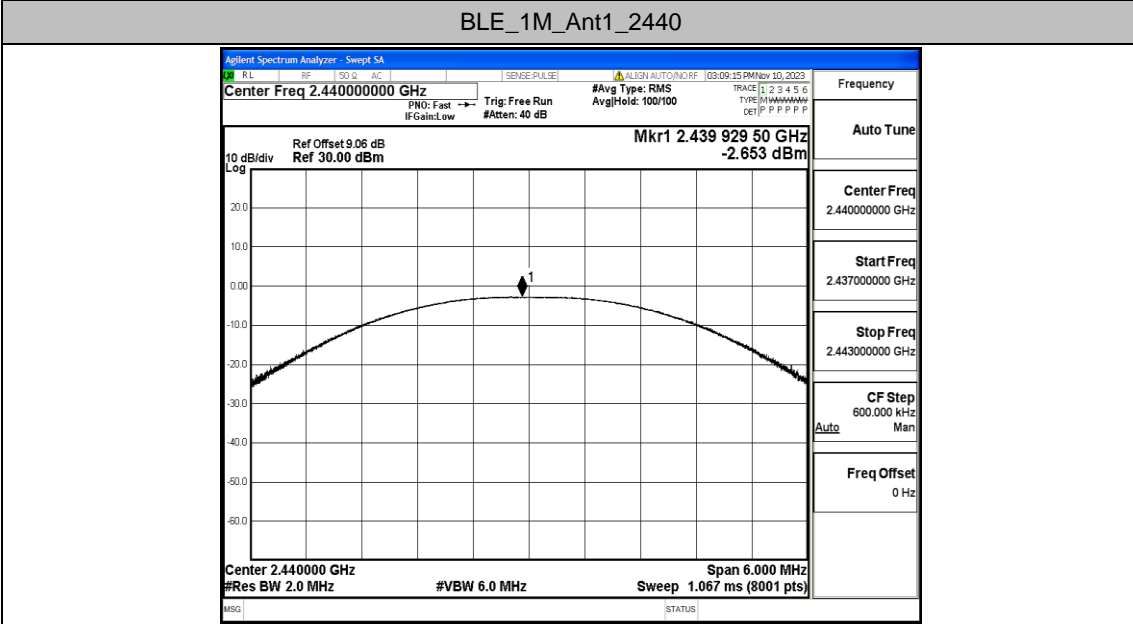
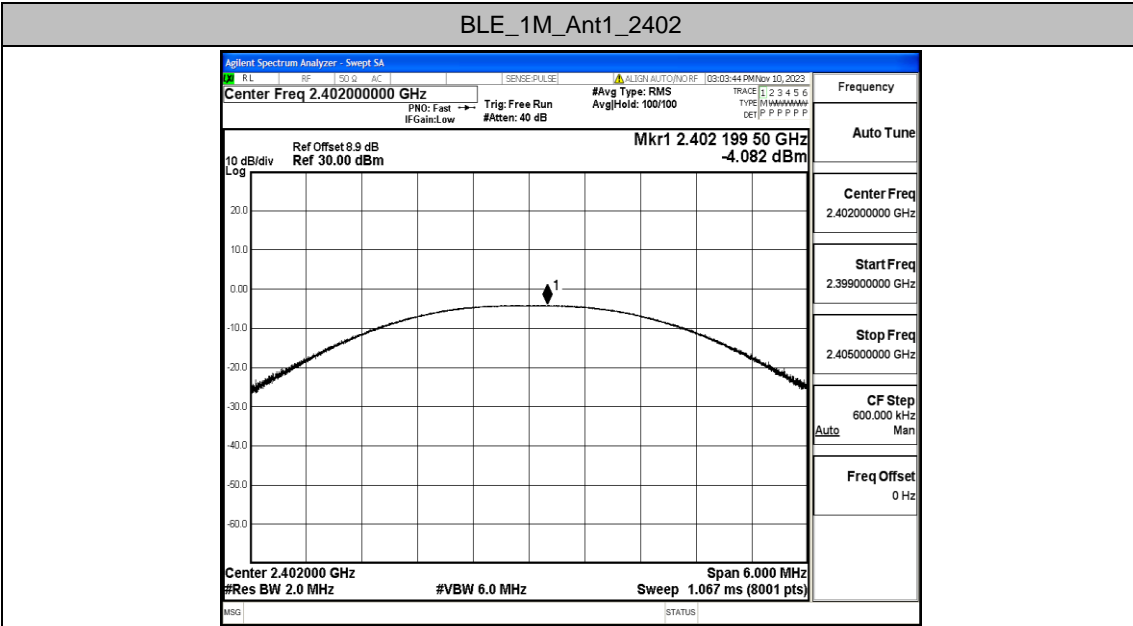


Appendix C: Maximum Peak conducted output power

Test Result

TestMode	Antenna	Channel	Result[dBm]	Limit[dBm]	Verdict
BLE_1M	Ant1	2402	-4.08	≤30	PASS
		2440	-2.65	≤30	PASS
		2480	-3.09	≤30	PASS

Test Graphs

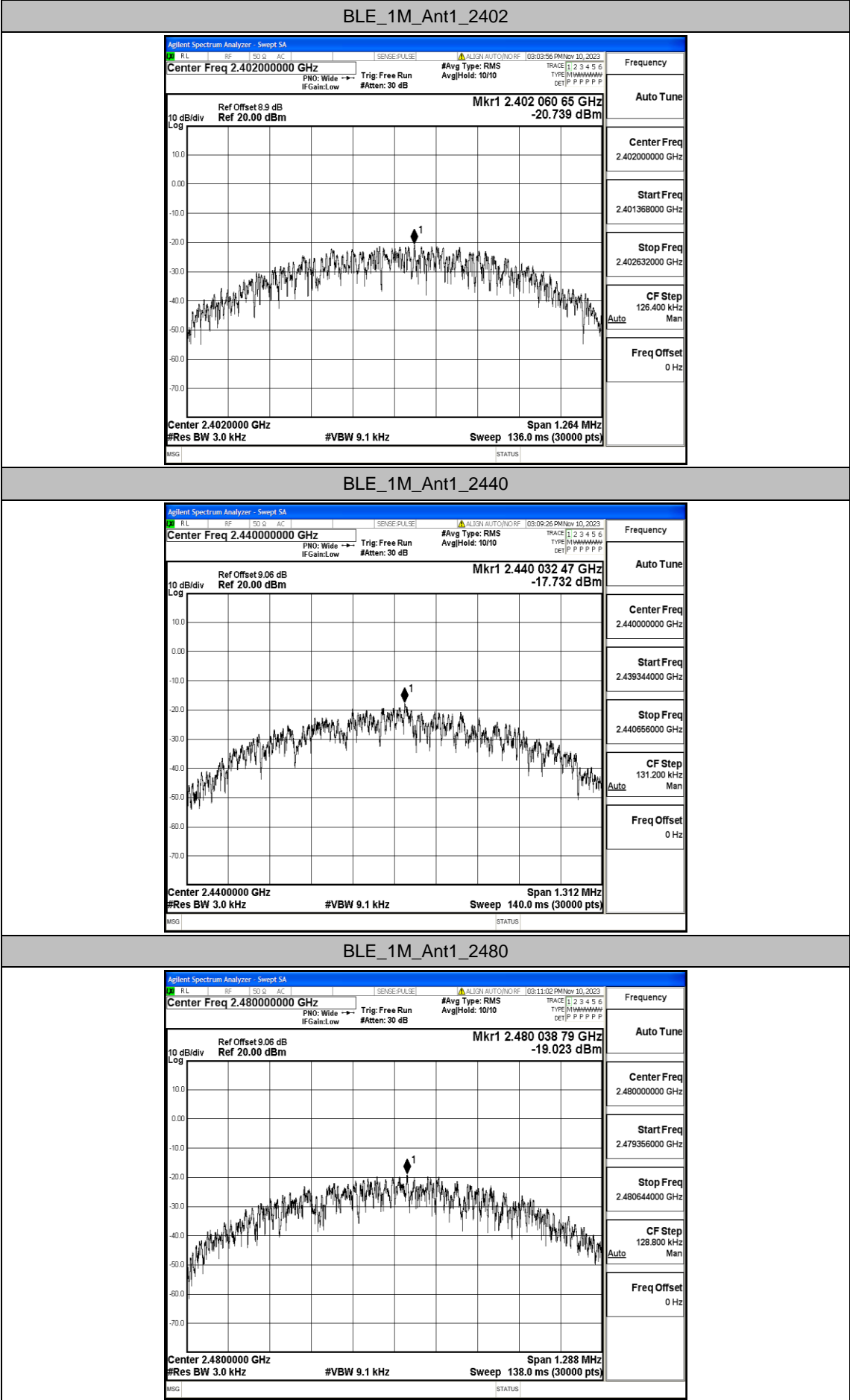


Appendix D: Maximum power spectral density

Test Result

TestMode	Antenna	Channel	Result[dBm/3-100kHz]	Limit[dBm/3kHz]	Verdict
BLE_1M	Ant1	2402	-20.74	≤8.00	PASS
		2440	-17.73	≤8.00	PASS
		2480	-19.02	≤8.00	PASS

Test Graphs

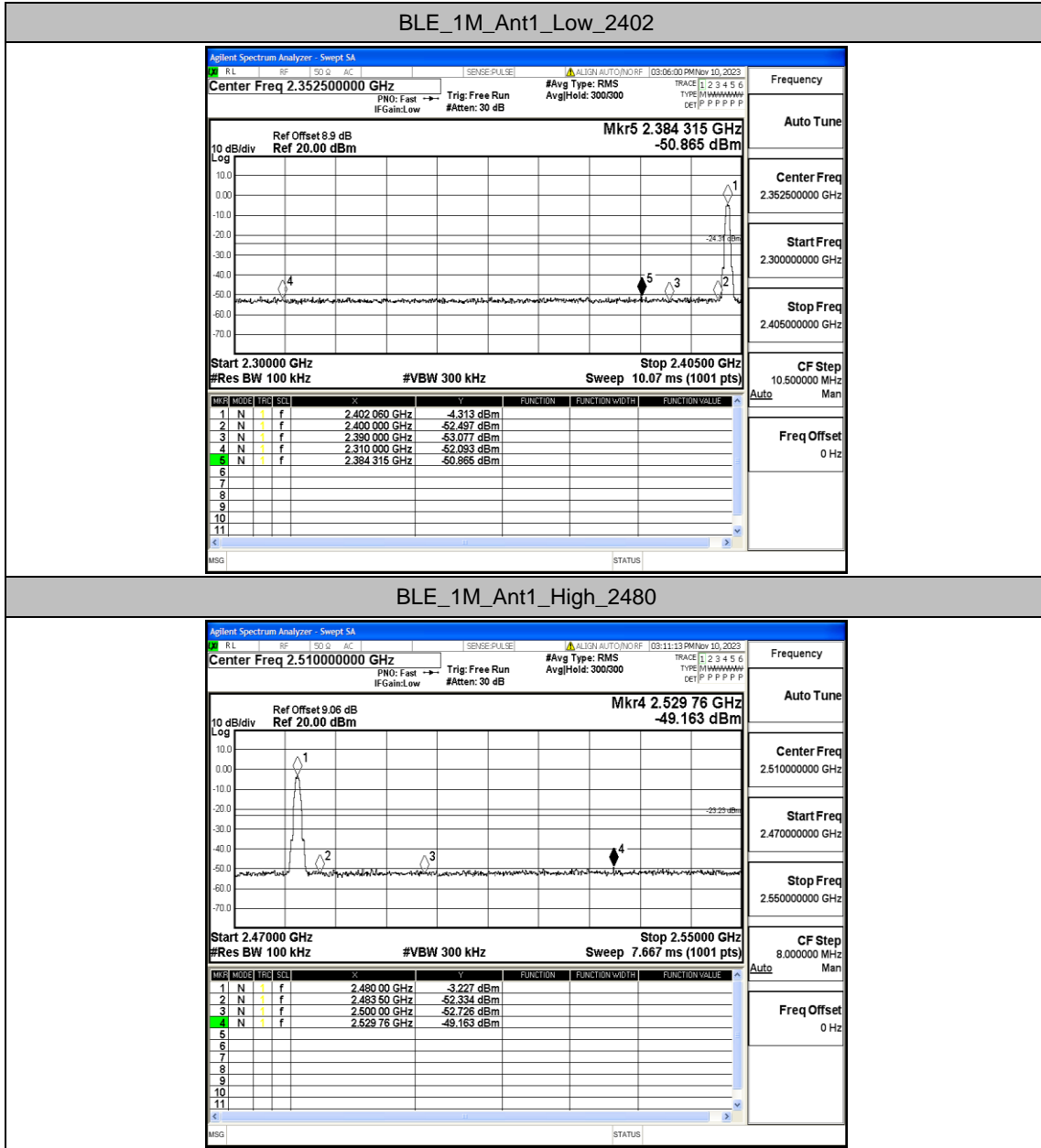


Appendix E: Band edge measurements

Test Result

TestMode	Antenna	ChName	Channel	RefLevel[dBm]	Result[dBm]	Limit[dBm]	Verdict
BLE_1M	Ant1	Low	2402	-4.31	-50.87	≤-24.31	PASS
		High	2480	-3.23	-49.16	≤-23.23	PASS

Test Graphs

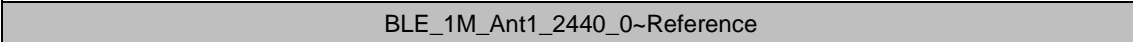
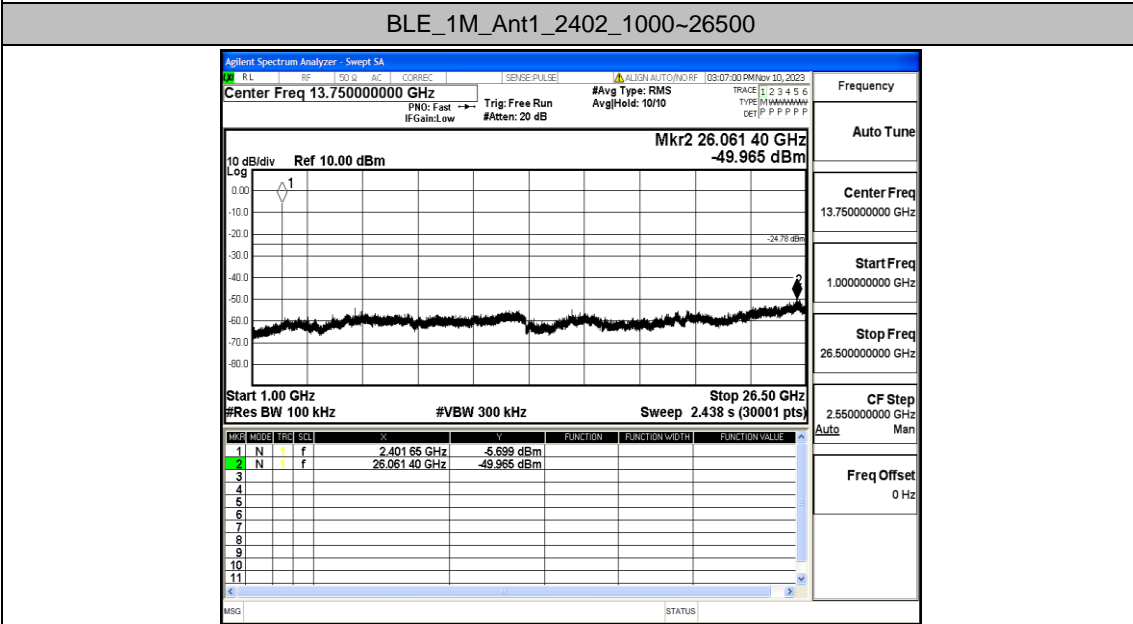
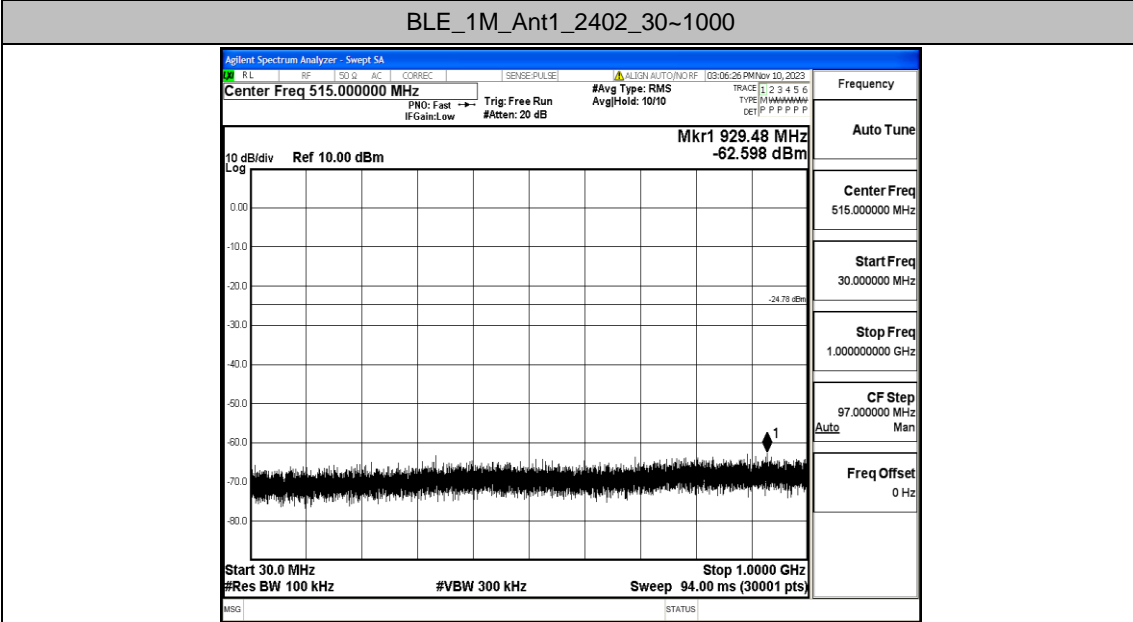
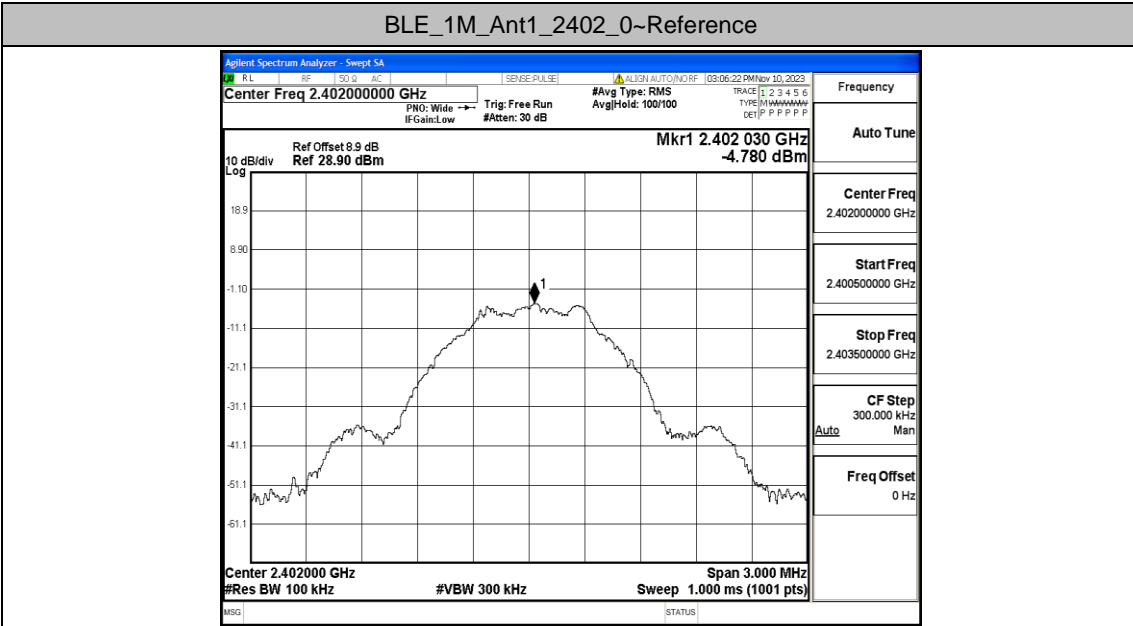


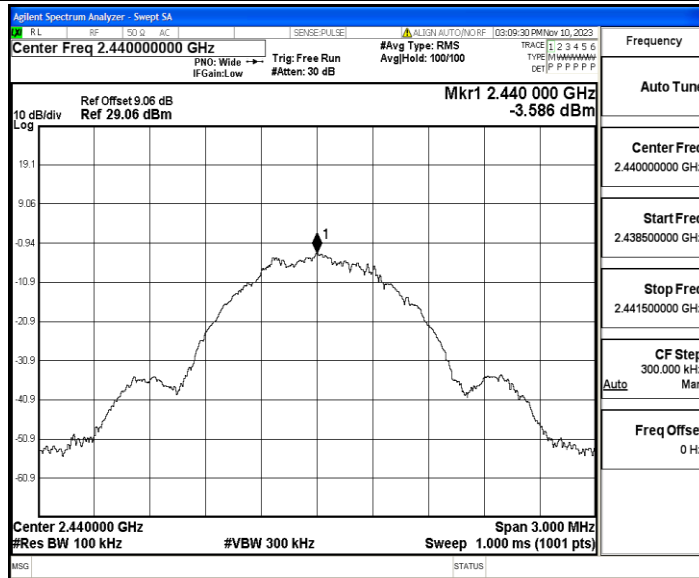
Appendix F: Conducted Spurious Emission

Test Result

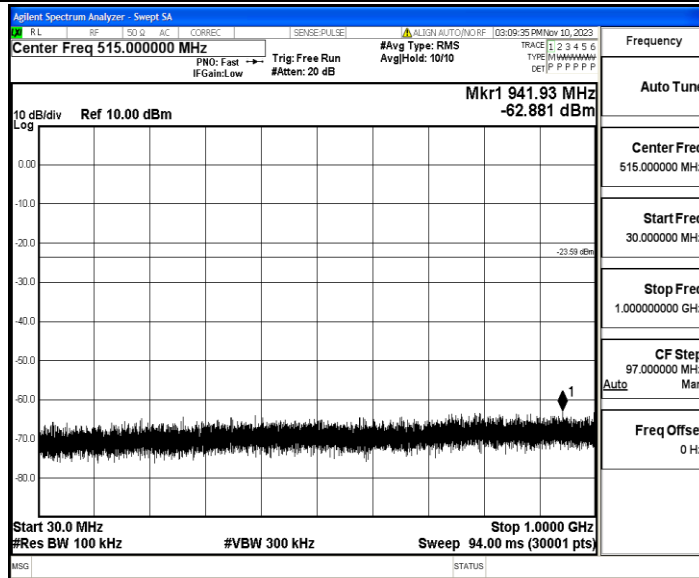
TestMode	Antenna	Channel	FreqRange [MHz]	RefLevel [dBm]	Result[dBm]	Limit[dBm]	Verdict
BLE_1M	Ant1	2402	Reference	-4.78	-4.78	---	PASS
			30~1000	-4.78	-62.6	≤-24.78	PASS
			1000~26500	-4.78	-49.97	≤-24.78	PASS
		2440	Reference	-3.59	-3.59	---	PASS
			30~1000	-3.59	-62.88	≤-23.59	PASS
			1000~26500	-3.59	-49.22	≤-23.59	PASS
		2480	Reference	-3.73	-3.73	---	PASS
			30~1000	-3.73	-62.71	≤-23.73	PASS
			1000~26500	-3.73	-49.33	≤-23.73	PASS

Test Graphs

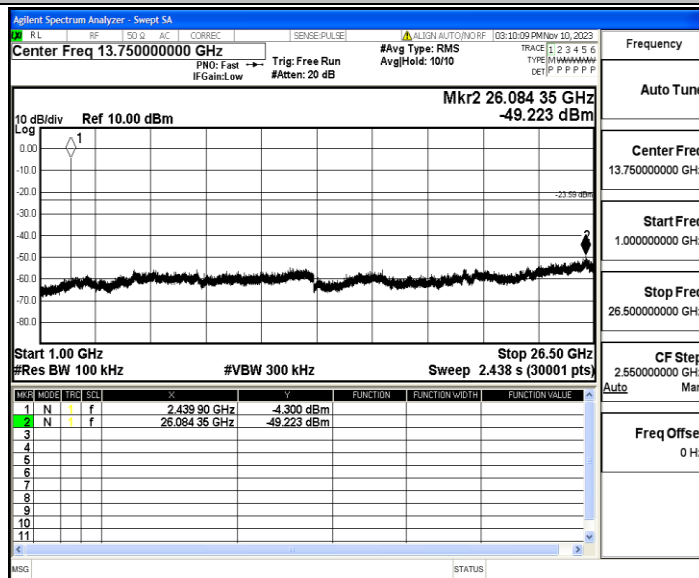




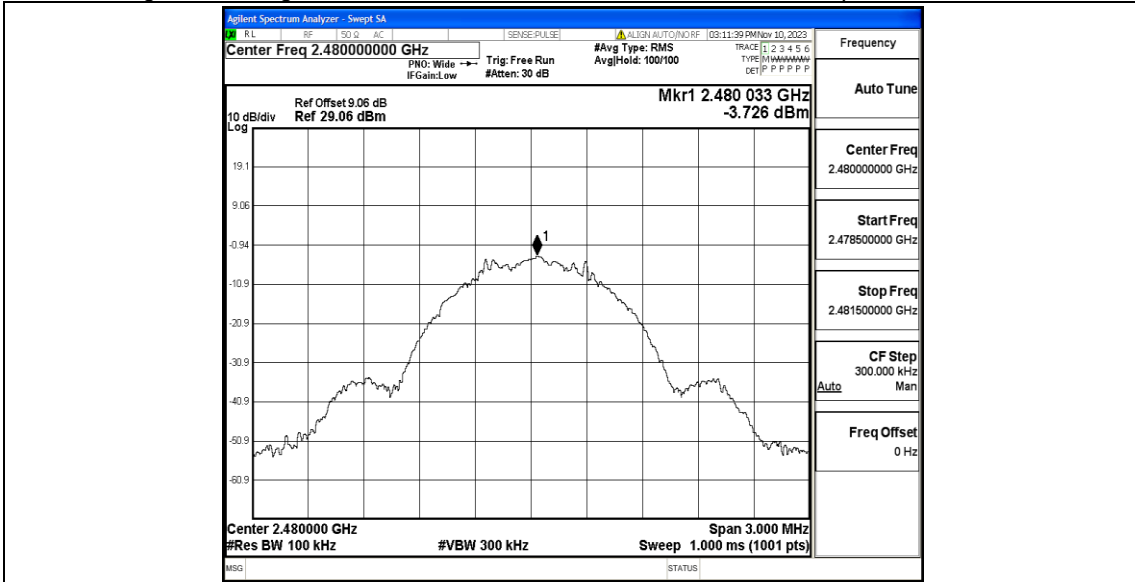
BLE_1M_Ant1_2440_30~1000



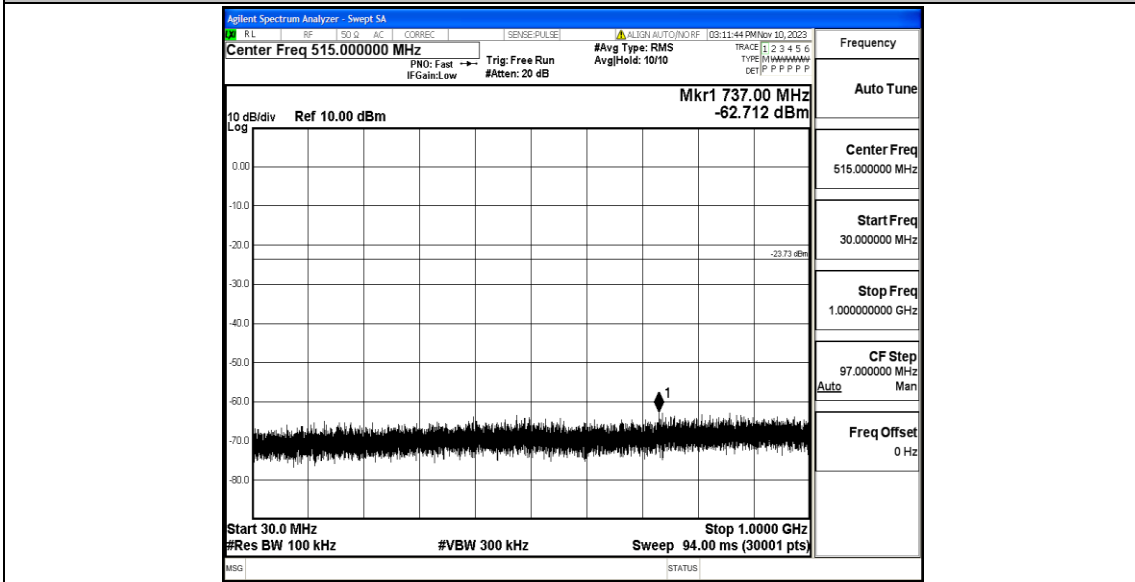
BLE_1M_Ant1_2440_1000~26500



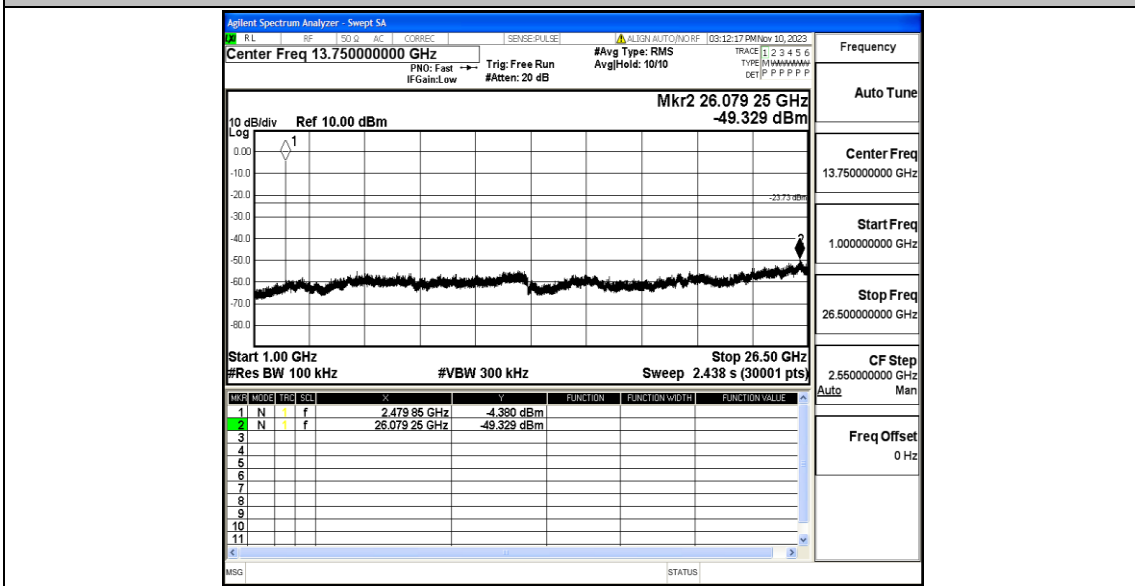
BLE_1M_Ant1_2480_0~Reference



BLE_1M_Ant1_2480_30~1000



BLE_1M_Ant1_2480_1000~26500

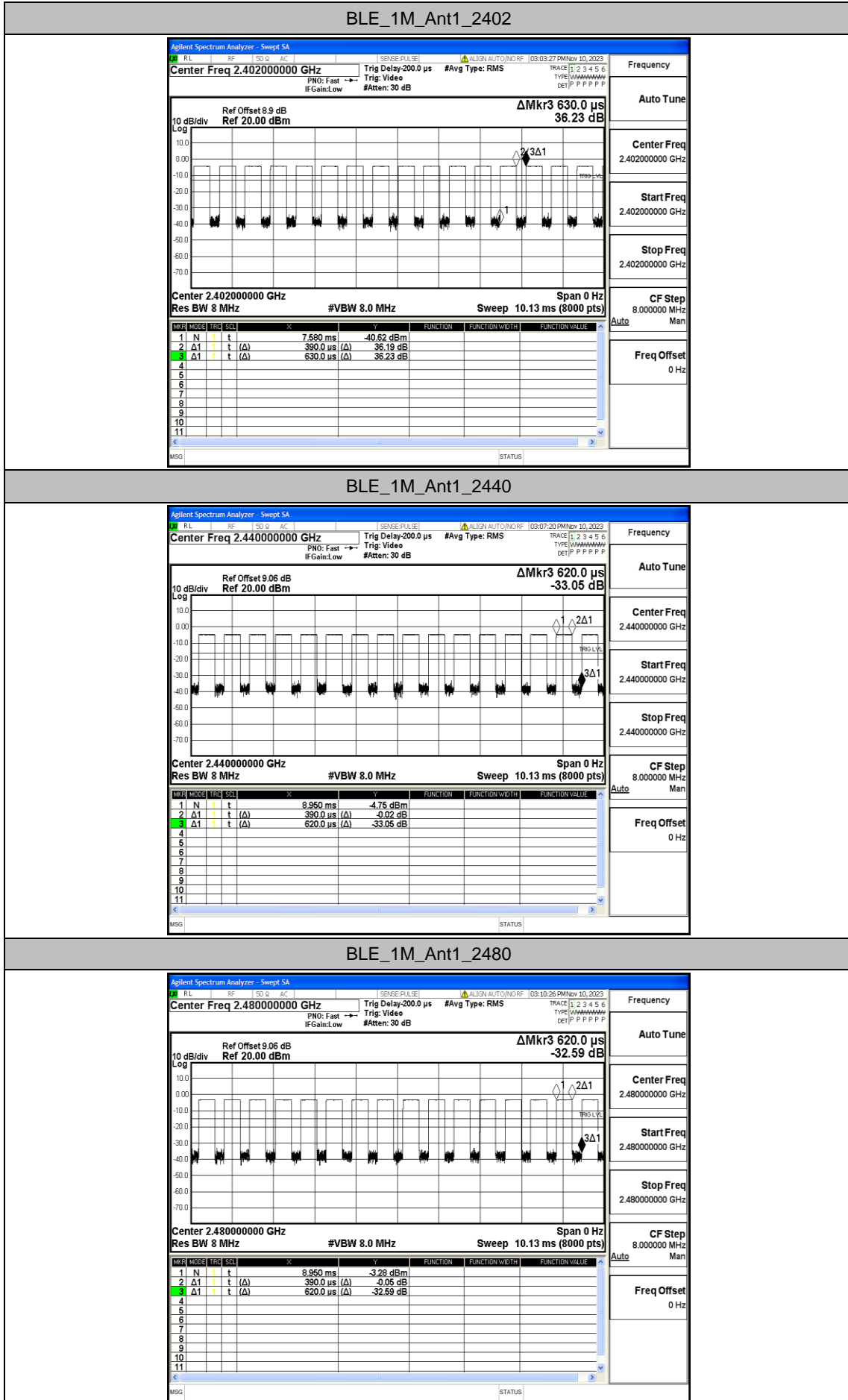


Appendix G: Duty Cycle

Test Result

TestMode	Antenna	Channel	Transmission Duration [ms]	Transmission Period [ms]	Duty Cycle [%]	1/T[kHz]
BLE_1M	Ant1	2402	0.39	0.63	61.90	2.56
		2440	0.39	0.62	62.90	2.56
		2480	0.39	0.62	62.90	2.56

Test Graphs



Appendix H: Emissions in Restricted Bands

Test Result

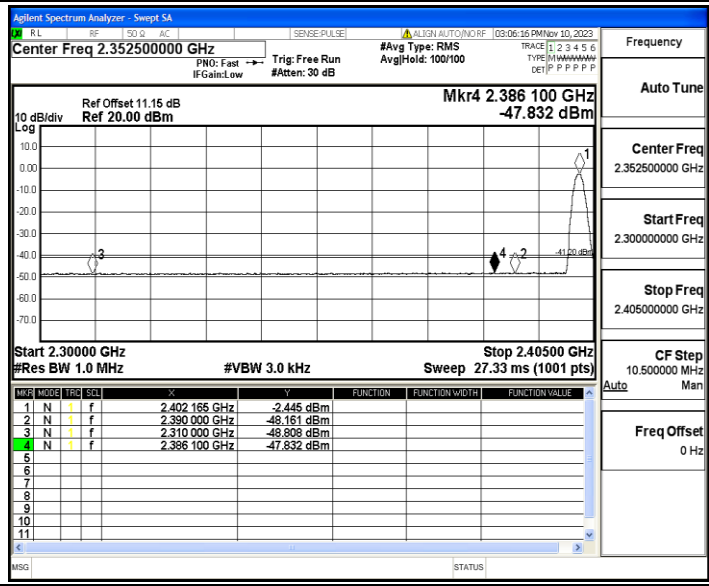
TestMode	Antenna	ChName	Channel	Detector	Freq. [MHz]	Result [dBm]	Limit [dBm]	Verdict
BLE_1M	Ant1	Low	2402	AV	2310.000	-48.81	≤-41.20	PASS
				AV	2386.100	-47.83	≤-41.20	PASS
				AV	2390.000	-48.16	≤-41.20	PASS
				Peak	2310.000	-41.43	≤-21.20	PASS
				Peak	2357.645	-39.18	≤-21.20	PASS
				Peak	2390.000	-40.54	≤-21.20	PASS
		High	2480	AV	2483.500	-47.6	≤-41.20	PASS
				AV	2497.920	-47.29	≤-41.20	PASS
				AV	2500.000	-47.43	≤-41.20	PASS
				Peak	2483.500	-40.74	≤-21.20	PASS
				Peak	2493.600	-38.61	≤-21.20	PASS
				Peak	2500.000	-39.1	≤-21.20	PASS

Note:

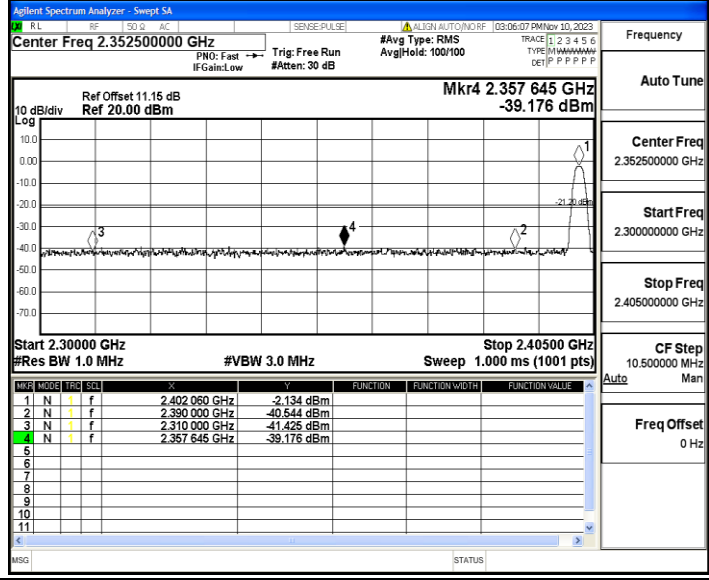
1. The Antenna Gain is compensated in the graph with 2dBi and Antenna Gain which is Higher.
2. The limit in dBm for average detector is conversion from 54dBuV/m, according to 15.209(a). The limit in dBm for peak detector is 20dB above the limit of average detector in dBm.

Test Graphs

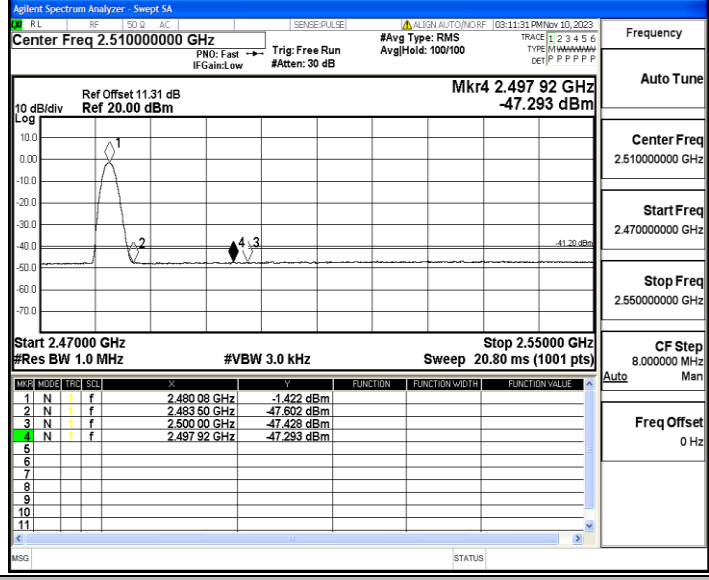
BLE_1M_Ant1_Low_2402_AV



BLE_1M_Ant1_Low_2402_Peak



BLE_1M_Ant1_High_2480_AV



BLE_1M_Ant1_High_2480_Peak

