



Appendix B

RF Test Data for BT V4.2 (Conducted Measurement)

Product Name: Tablet

Trade Mark: HYUNDAI

Test Model: 7GB1

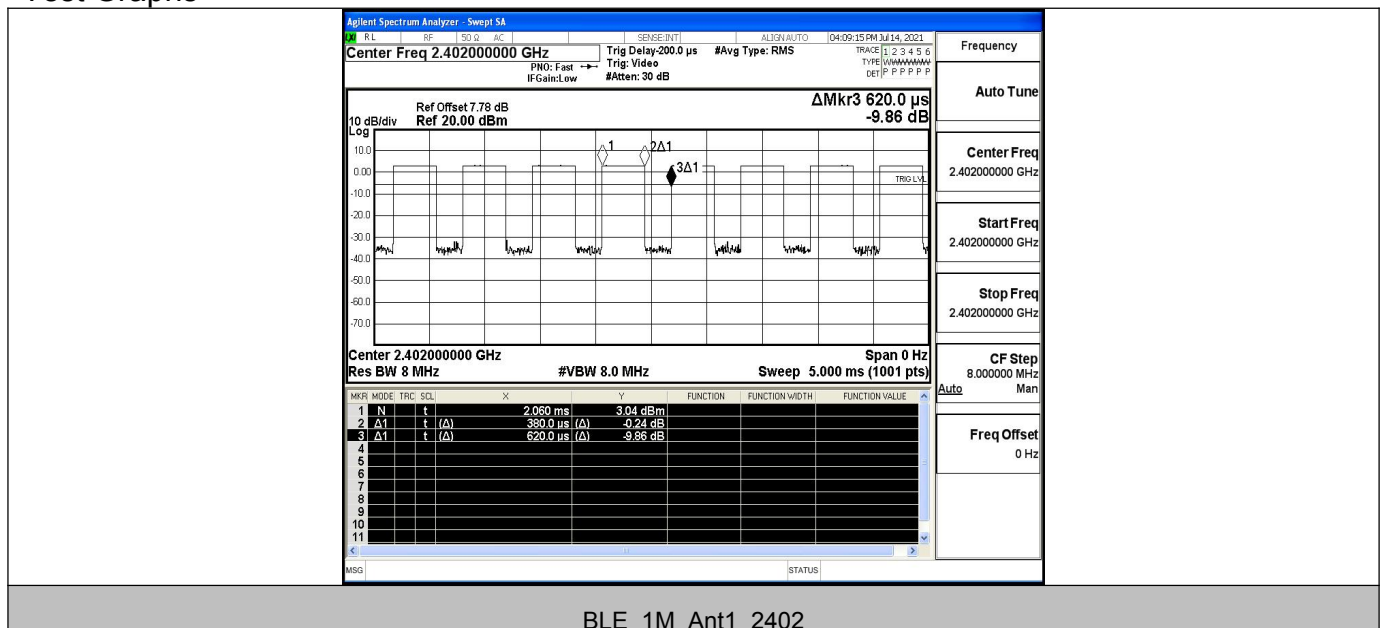
Environmental Conditions

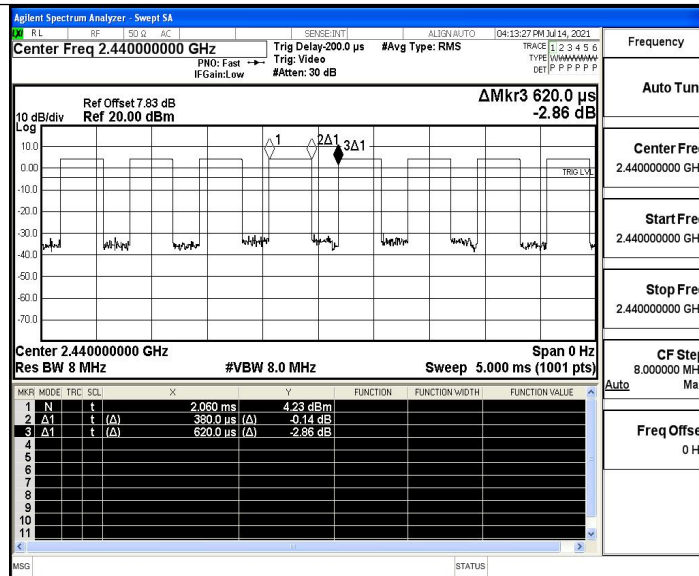
Temperature:	21.5° C
Relative Humidity:	52.8%
ATM Pressure:	100.0 kPa
Test Engineer:	Ken He
Supervised by:	Li Huan

B.1 Duty Cycle

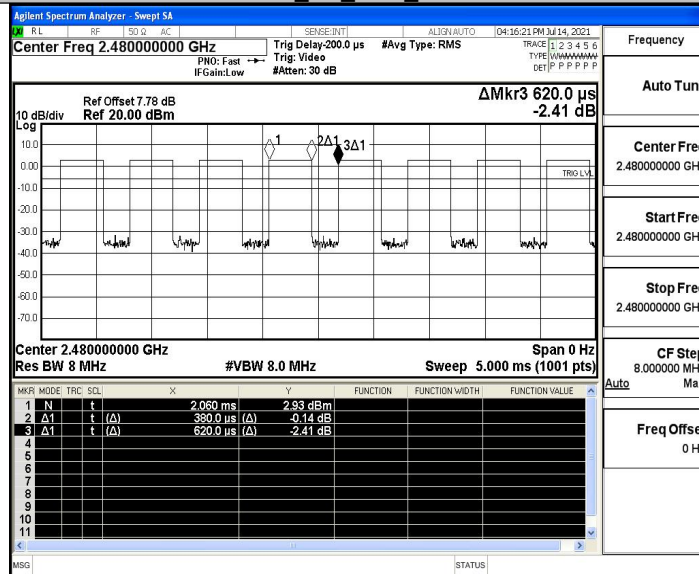
TestMode	Antenna	Channel	ON Time [ms]	Period [ms]	X	DC [%]	xFactor	Limit	Verdict
BLE_1M	Ant1	2402	0.38	0.62	0.6129	61.29	2.13	---	PASS
		2440	0.38	0.62	0.6129	61.29	2.13	---	PASS
		2480	0.38	0.62	0.6129	61.29	2.13	---	PASS

Test Graphs





BLE_1M_Ant1_2440



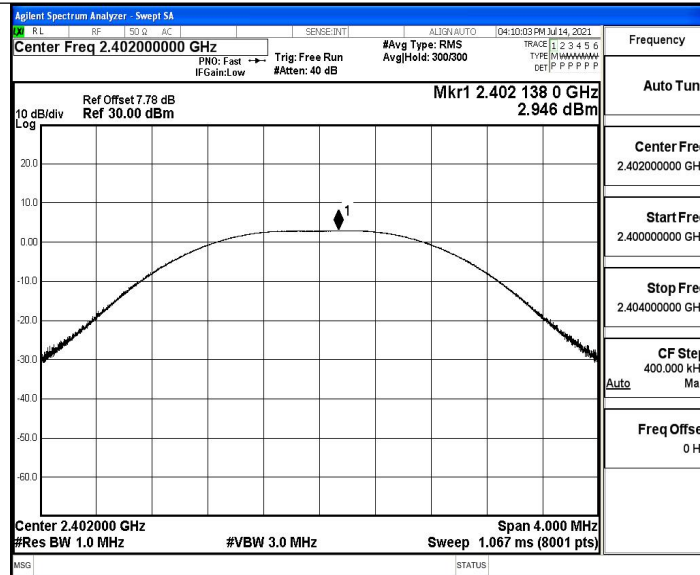
BLE_1M_Ant1_2480



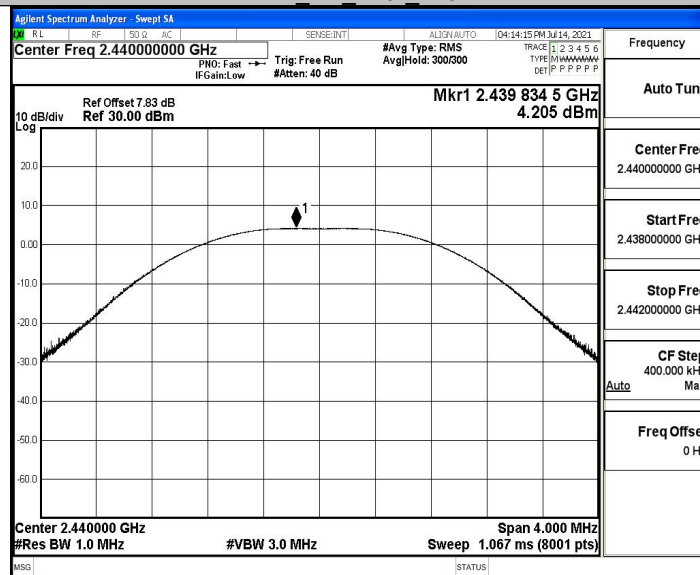
B.2 Maximum Conducted Peak Output Power

TestMode	Antenna	Channel	Result[dBm]	Limit[dBm]	Verdict
BLE_1M	Ant1	2402	2.95	≤30	PASS
		2440	4.21	≤30	PASS
		2480	2.89	≤30	PASS

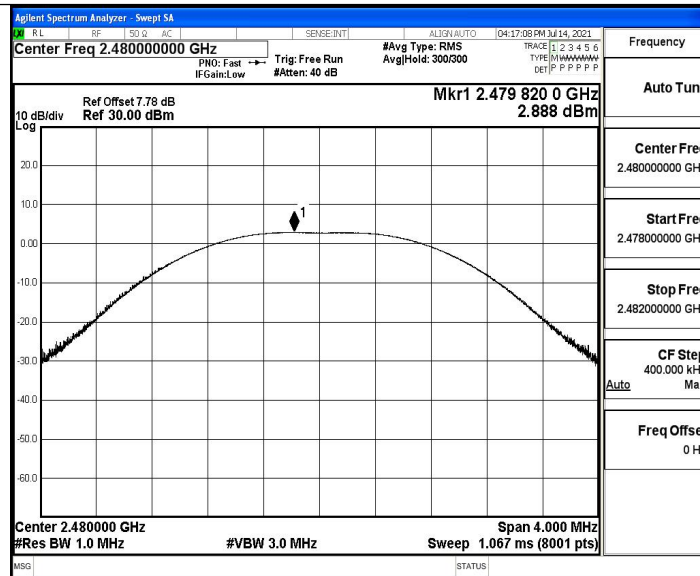
Test Graphs



BLE_1M_Ant1_2402



BLE_1M_Ant1_2440



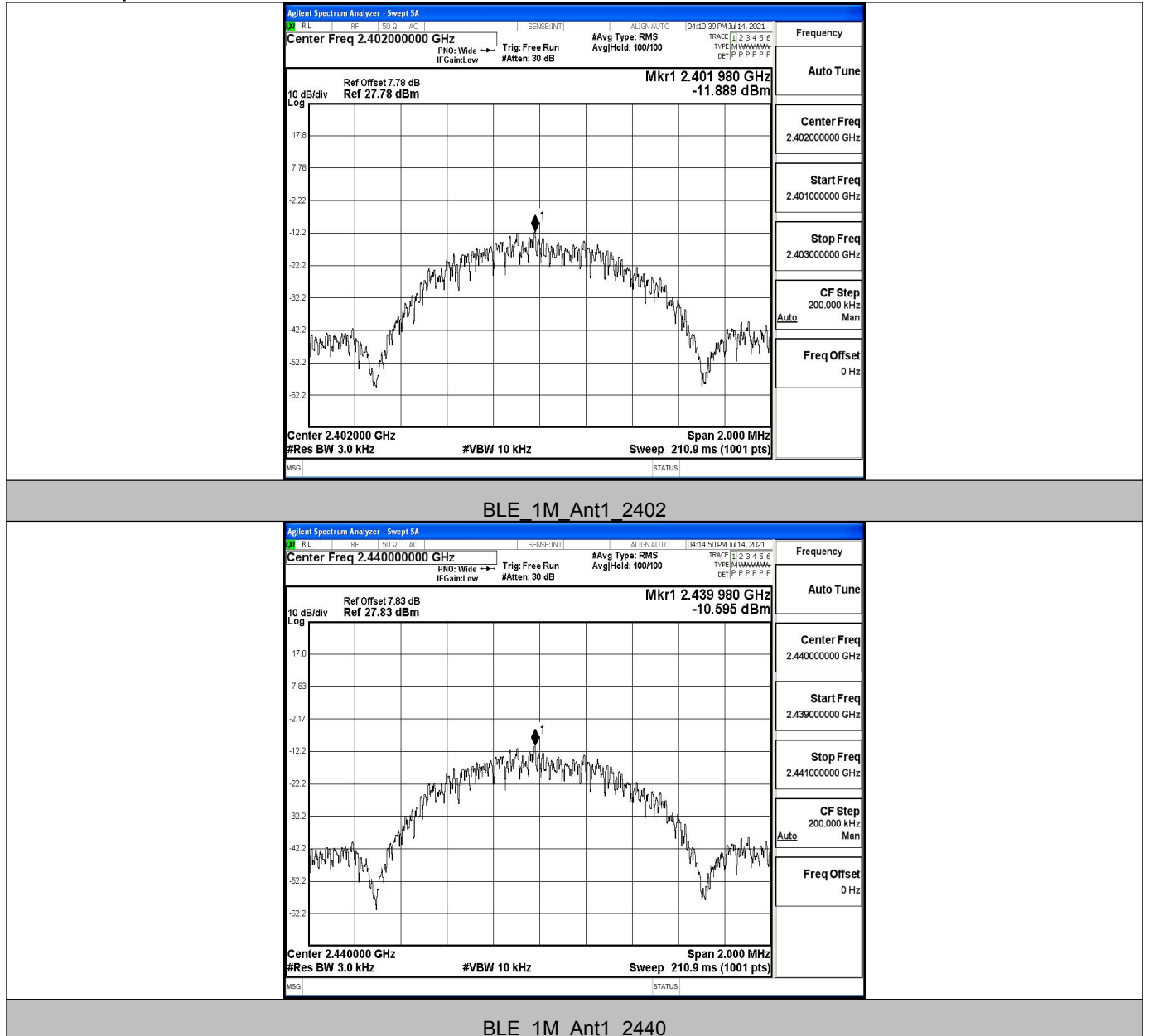
BLE_1M_Ant1_2480

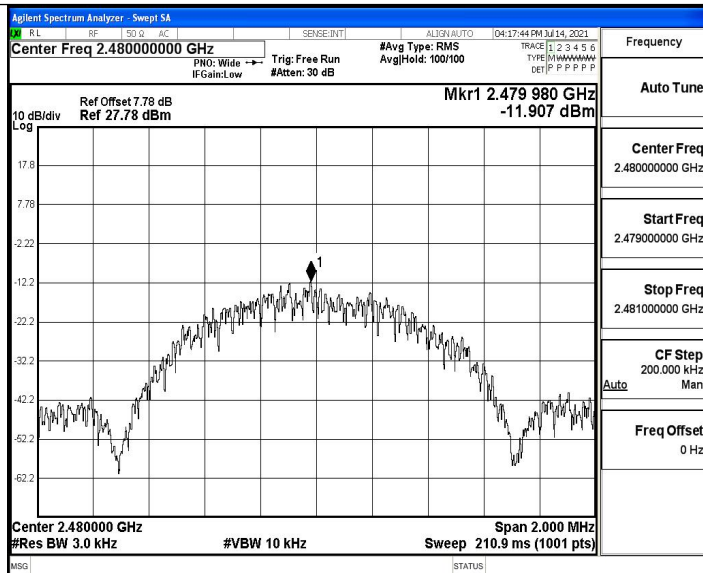


B.3 Maximum Power Spectral Density

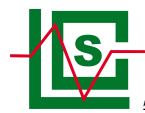
TestMode	Antenna	Channel	Result[dBm/3-100kHz]	Limit[dBm/3kHz]	Verdict
BLE_1M	Ant1	2402	-11.89	≤8	PASS
		2440	-10.6	≤8	PASS
		2480	-11.91	≤8	PASS

Test Graphs





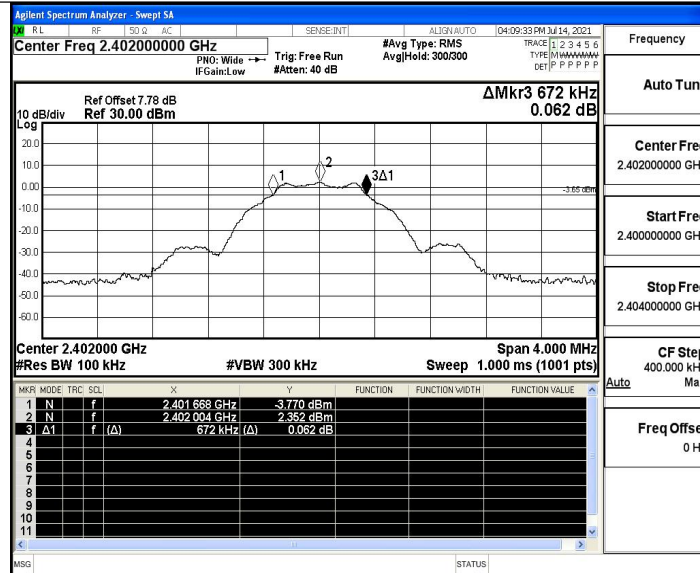
BLE_1M_Ant1_2480



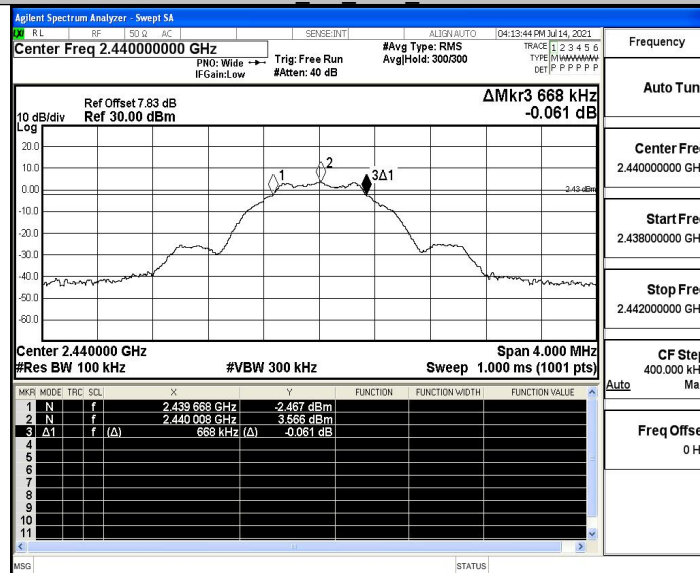
B.4 6dB Bandwidth

TestMode	Antenna	Channel	DTS BW [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
BLE_1M	Ant1	2402	0.672	2401.668	2402.340	≥0.5	PASS
		2440	0.668	2439.668	2440.336	≥0.5	PASS
		2480	0.680	2479.664	2480.344	≥0.5	PASS

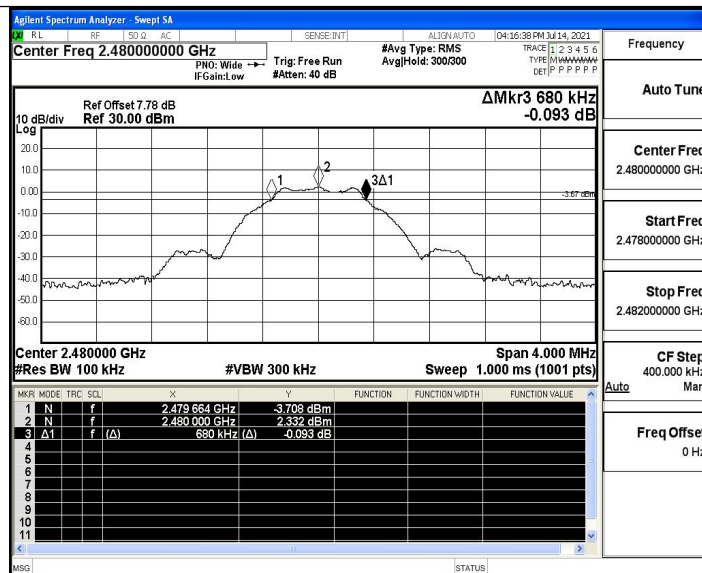
Test Graphs



BLE_1M Ant1 2402



BLE_1M Ant1 2440



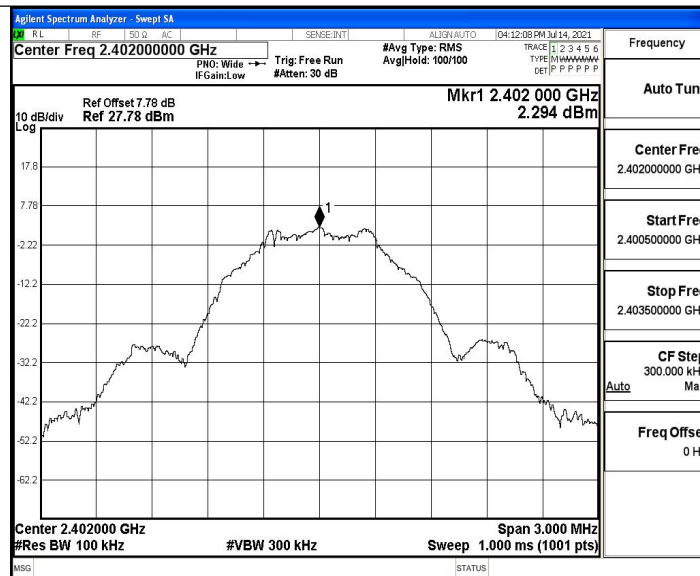
BLE_1M_Ant1_2480



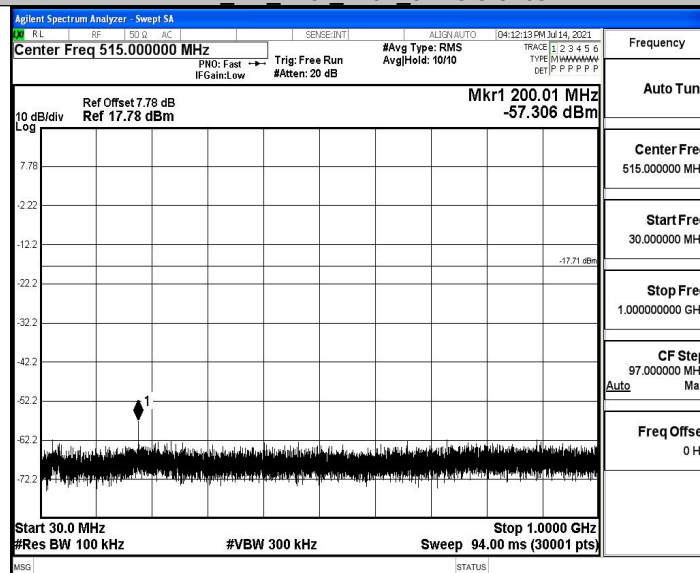
B.5 RF Conducted Spurious Emissions

TestMode	Antenna	Channel	FreqRange [MHz]	RefLevel [dBm]	Result[dBm]	Limit[dBm]	Verdict
BLE_1M	Ant1	2402	Reference	2.29	2.29	---	PASS
			30~1000	2.29	-57.31	≤-17.71	PASS
			1000~26500	2.29	-47.44	≤-17.71	PASS
		2440	Reference	3.61	3.61	---	PASS
			30~1000	3.61	-57.06	≤-16.39	PASS
			1000~26500	3.61	-46.81	≤-16.39	PASS
		2480	Reference	1.81	1.81	---	PASS
			30~1000	1.81	-56.73	≤-18.2	PASS
			1000~26500	1.81	-47.69	≤-18.2	PASS

Test Graphs

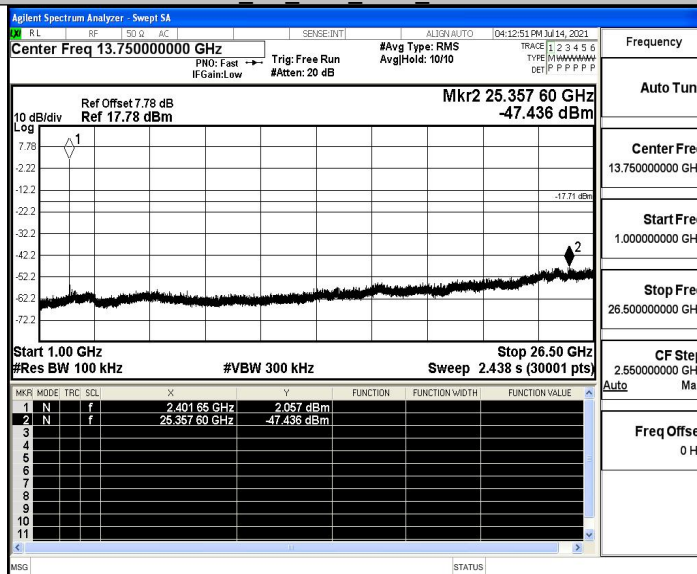


BLE_1M Ant1 2402_0~Reference

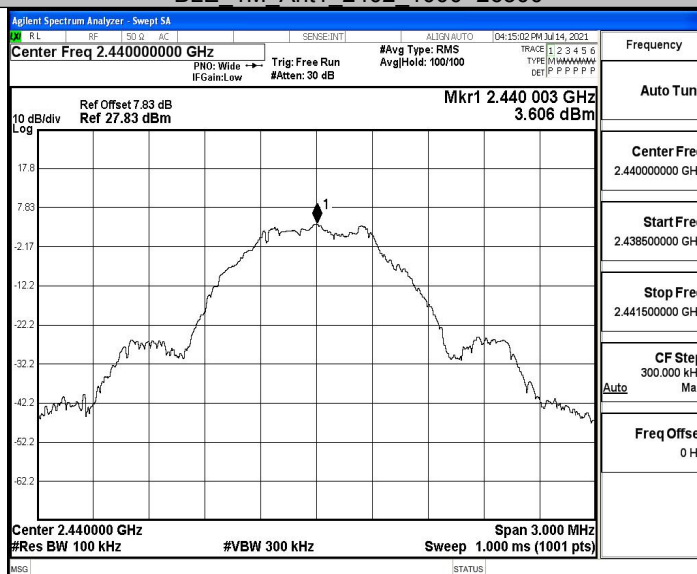




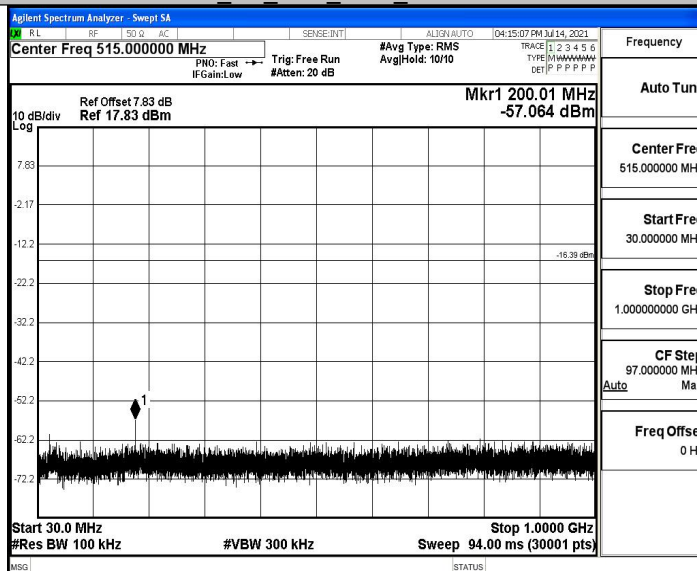
BLE_1M_Ant1_2402_30~1000



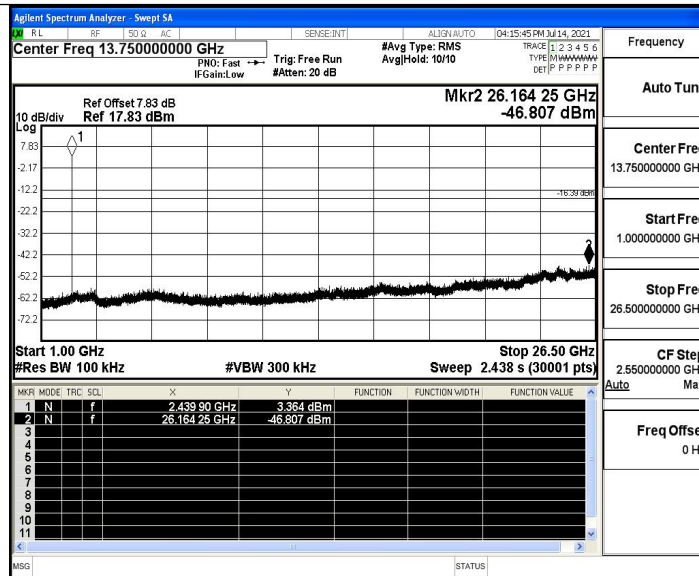
BLE_1M_Ant1_2402_1000~26500



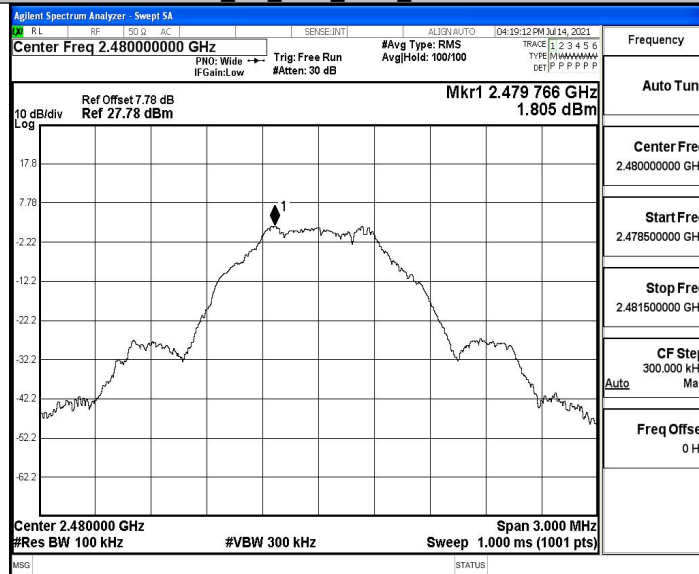
BLE_1M_Ant1_2440_0~Reference



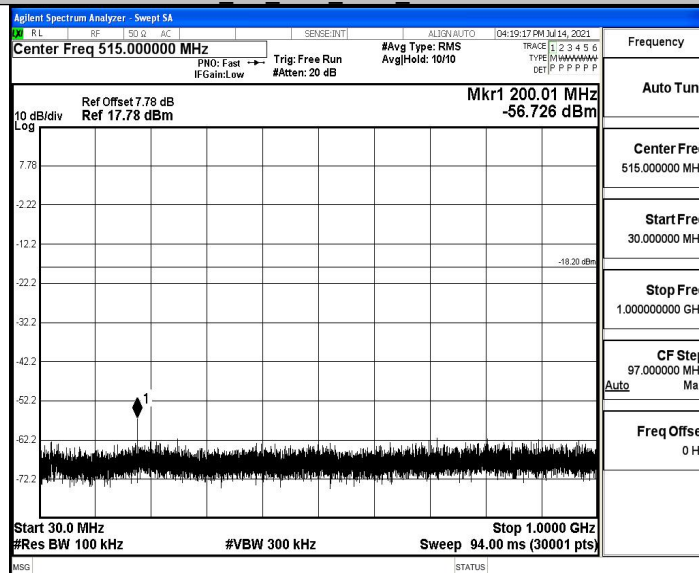
BLE_1M_Ant1_2440_30~1000



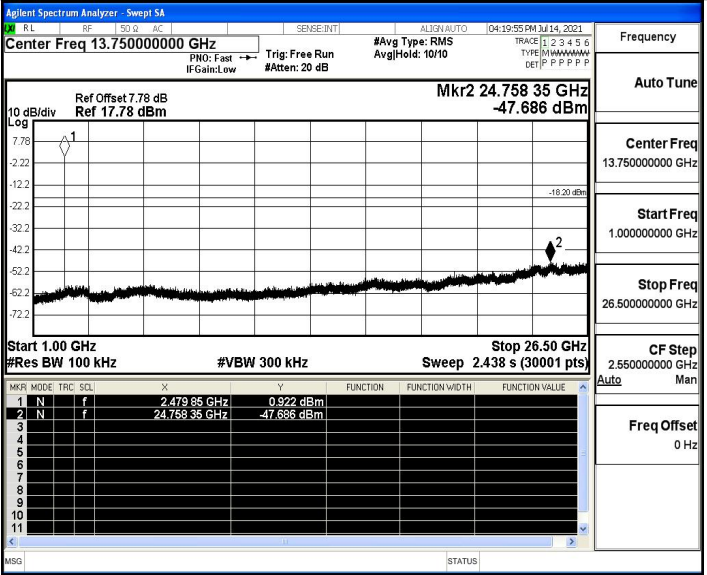
BLE_1M_Ant1_2440_1000~26500



BLE_1M_Ant1_2480_0~Reference



BLE_1M_Ant1_2480_30~1000



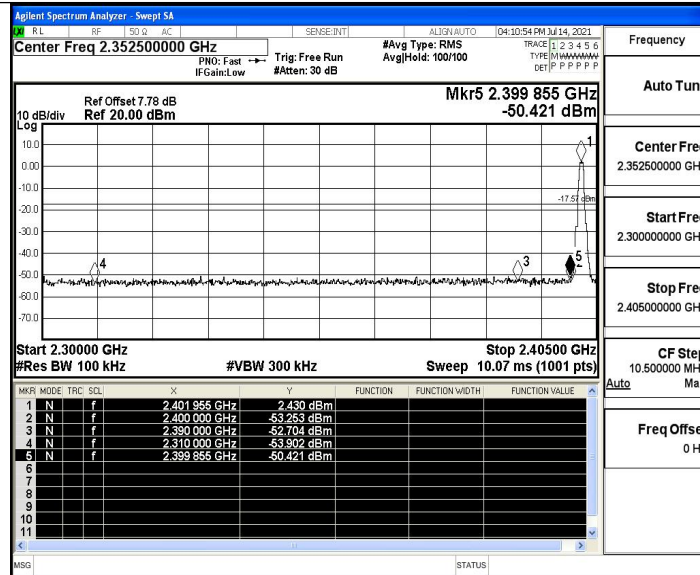
BLE_1M_Ant1_2480_1000~26500



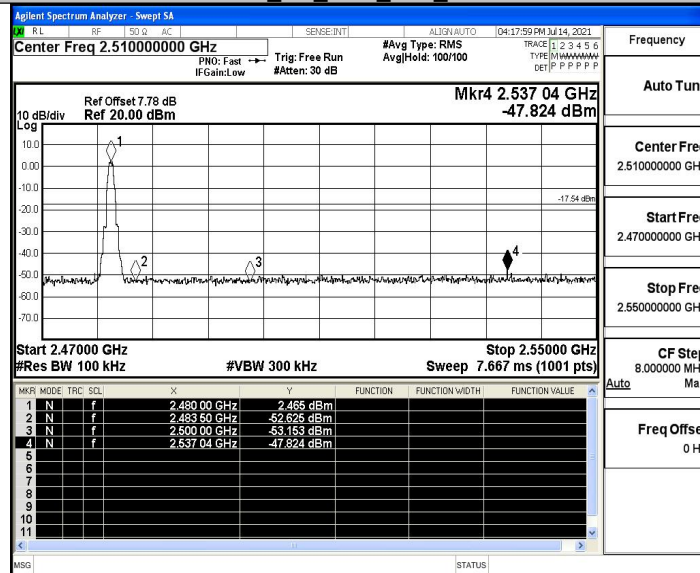
B.6 Band-edge for RF Conducted Emissions

TestMode	Antenna	ChName	Channel	RefLevel[dBm]	Result[dBm]	Limit[dBm]	Verdict
BLE_1M	Ant1	Low	2402	2.43	-50.42	≤ -17.57	PASS
		High	2480	2.47	-47.82	≤ -17.54	PASS

Test Graphs



BLE_1M_Ant1_Low_2402



BLE_1M_Ant1_High_2480



B.7 Restrict-band band-edge measurements

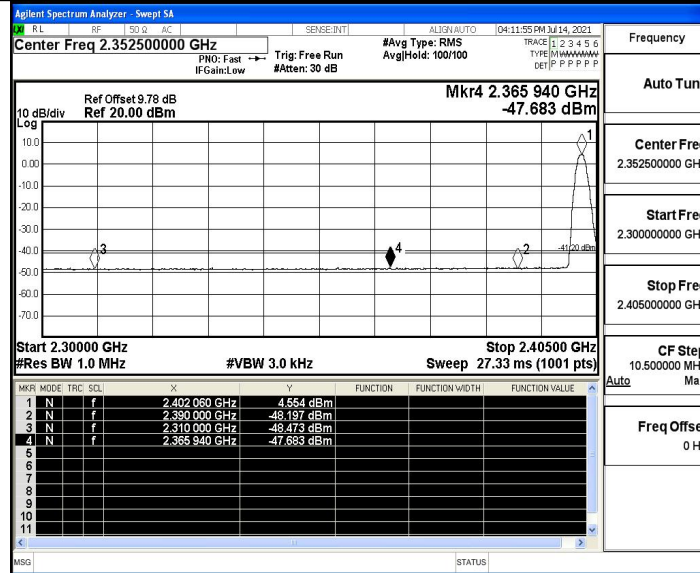
TestMode	Antenna	ChName	Channel	Detector	Freq. [MHz]	Result [dBm]	Limit [dBm]	Result [dBuV/m]	Limit [dBuV/m]	Verdict
BLE_1M	Ant1	Low	2402	AV	2310.000	-48.47	≤-41.20	48.76	≤54	PASS
				AV	2365.940	-47.68	≤-41.20	49.55	≤54	PASS
				AV	2390.000	-48.2	≤-41.20	49.03	≤54	PASS
				Peak	2310.000	-42.02	≤-21.20	55.21	≤74	PASS
				Peak	2318.060	-39.04	≤-21.20	58.19	≤74	PASS
				Peak	2390.000	-41.86	≤-21.20	55.37	≤74	PASS
		High	2480	AV	2483.500	-46.89	≤-41.20	50.34	≤54	PASS
				AV	2483.520	-46.89	≤-41.20	50.34	≤54	PASS
				AV	2500.000	-47.41	≤-41.20	49.82	≤54	PASS
				Peak	2483.500	-39.57	≤-21.20	57.66	≤74	PASS
				Peak	2489.920	-37.53	≤-21.20	59.70	≤74	PASS
				Peak	2500.000	-40.77	≤-21.20	56.46	≤74	PASS

Note:

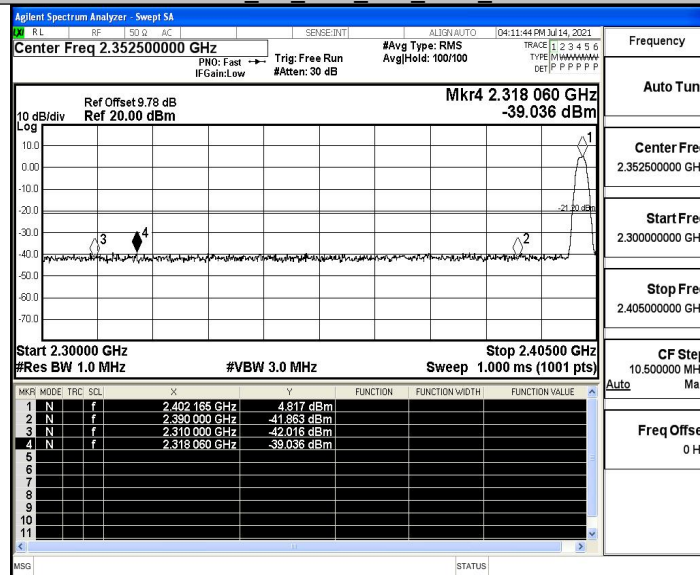
1. The Antenna Gain is compensated in the graph.
2. The limit in dBm for average detector is conversion from 54dBuV/m, according to 15.209(a). The limit in dBm for peak detector is 20dB above the limit of average detector in dBm.



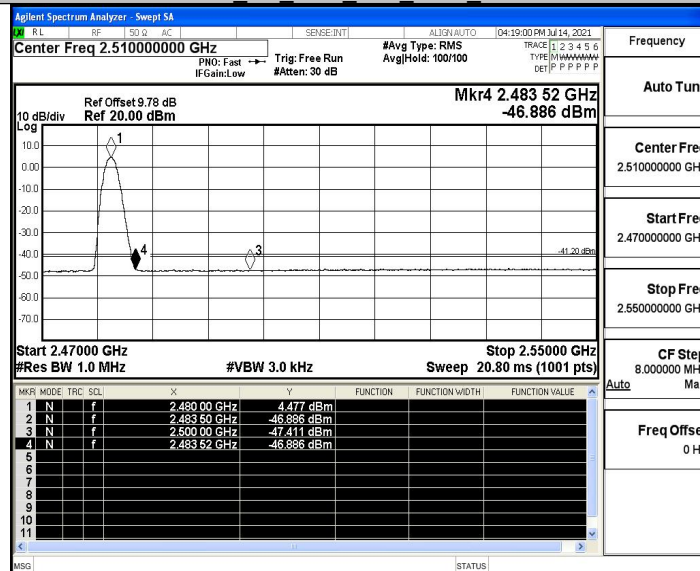
Test Graphs



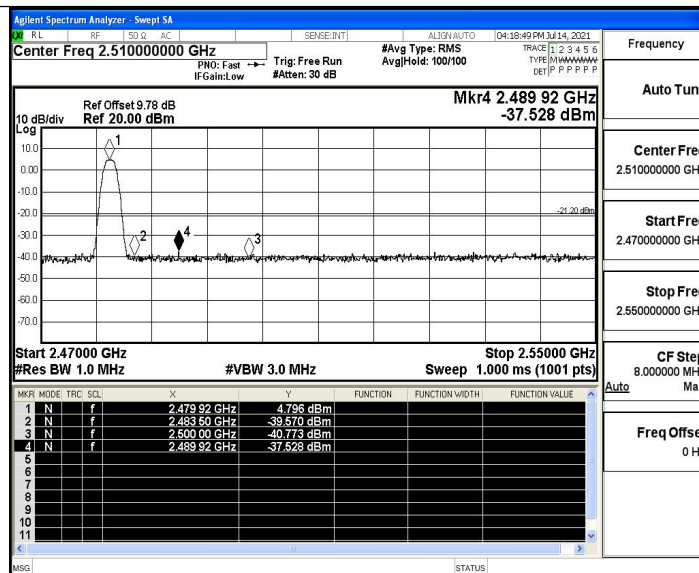
BLE_1M_Ant1_Low_2402_AV



BLE_1M_Ant1_Low_2402_Peak



BLE_1M_Ant1_High_2480_AV



BLE_1M_Ant1_High_2480_Peak