

Appendix B

RF Test Data for BT V4.0 (BT LE) (Conducted Measurement)

Product Name: GNSS RECEIVER

Trade Mark: KOLIDA, SANDING, RUIDE, TIANYU, SOUTH

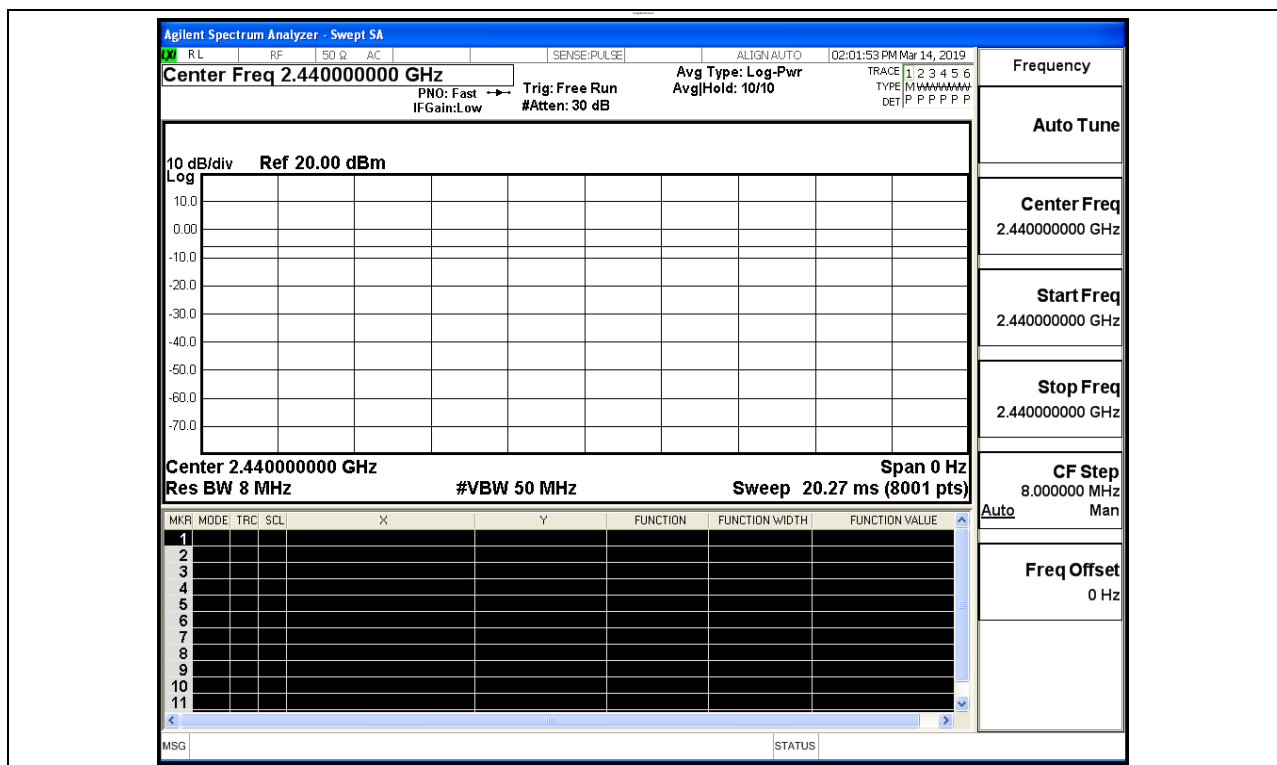
Test Model: G1Star

Environmental Conditions

Temperature:	24.5 ° C
Relative Humidity:	53.8%
ATM Pressure:	100.0 kPa
Test Engineer:	Mina.Xu
Supervised by:	Tom.Liu

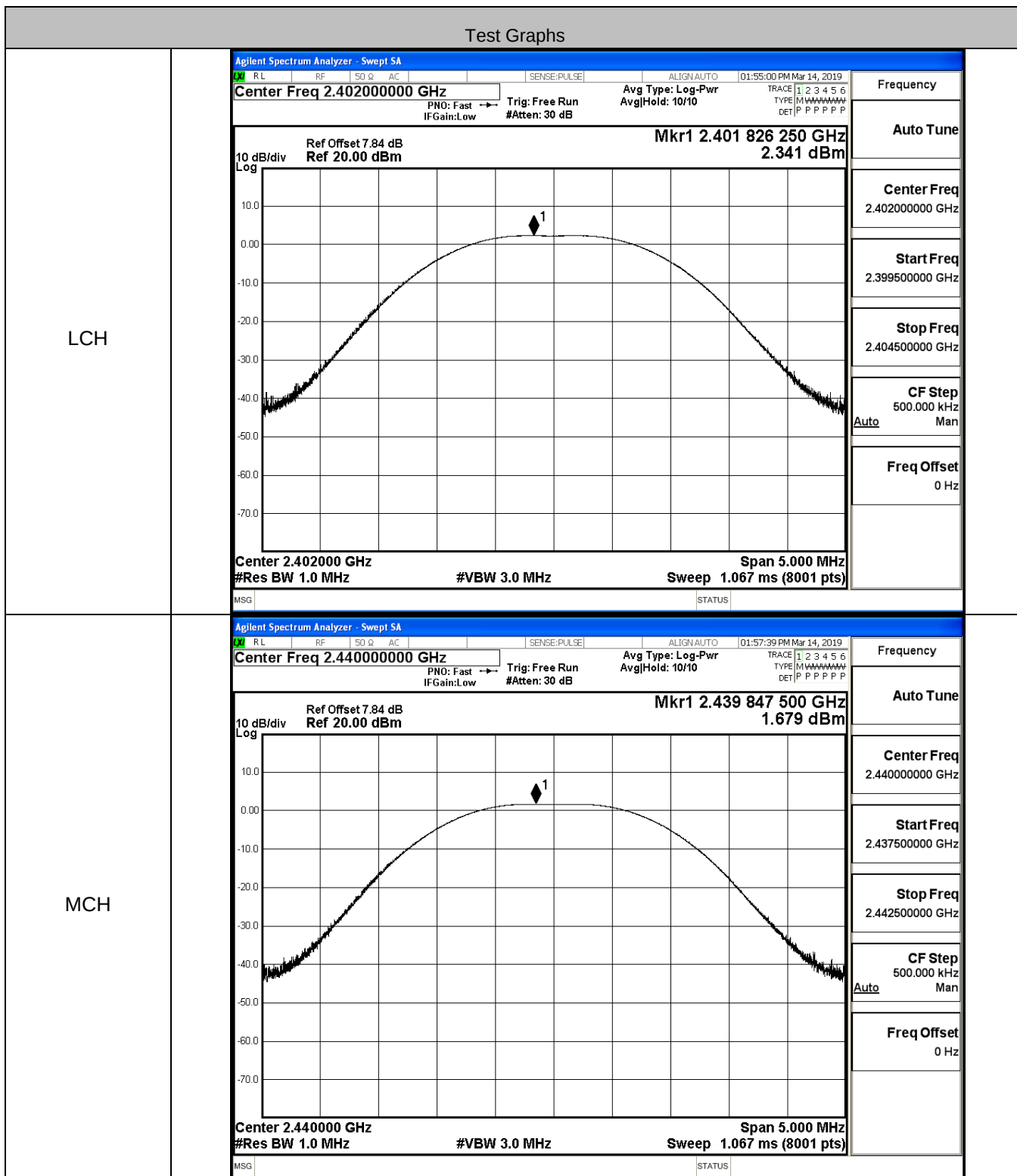
B.1 Duty Cycle

Test Mode	Test Channel	Ant	Duty Cycle[%]	Verdict
BT LE	2440	Ant1	100	PASS

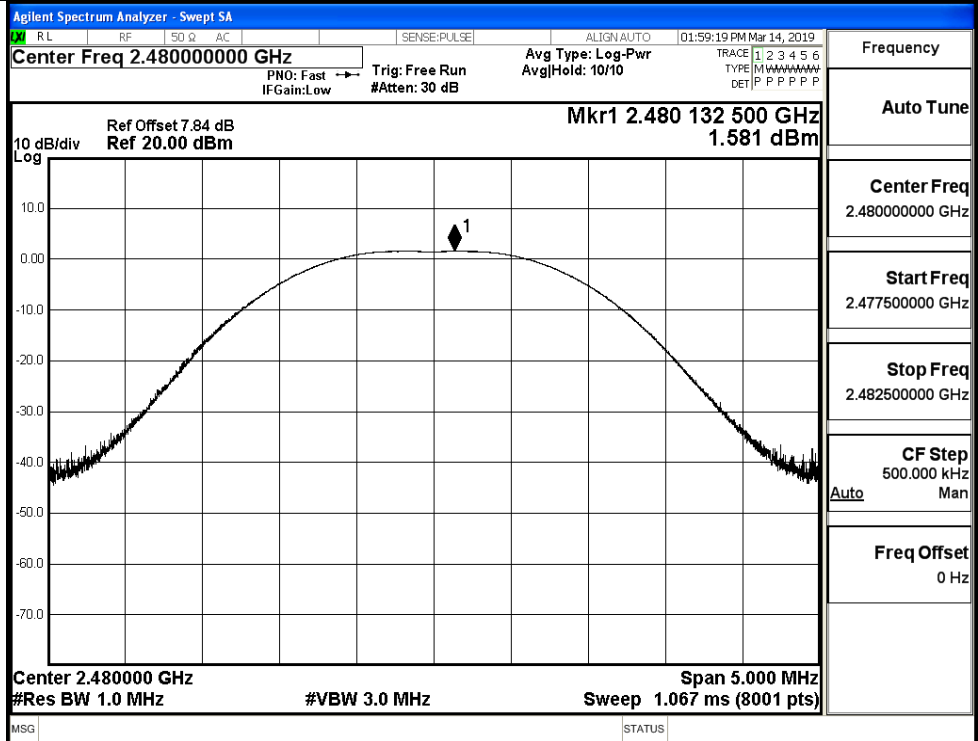


B.2 Maximum Conducted Peak Output Power

Mode	Channel	Conduct Peak Power[dBm]	Limit [dBm]	Verdict
BT LE	LCH	2.341	30	PASS
BT LE	MCH	1.679	30	PASS
BT LE	HCH	1.581	30	PASS



HCH

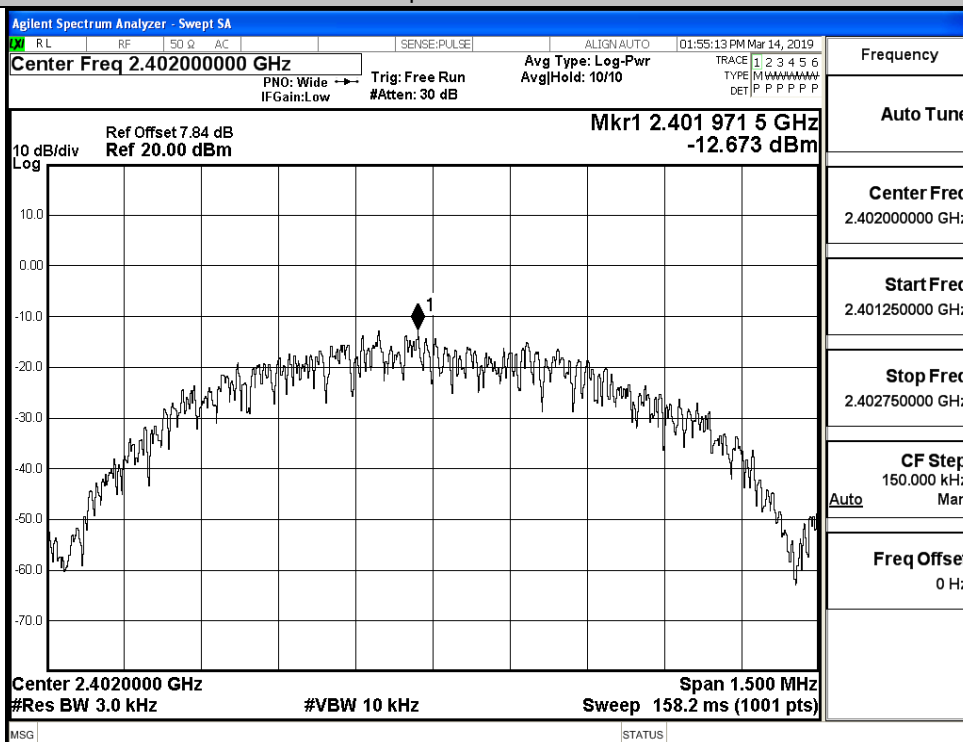


B.3 Maximum Power Spectral Density

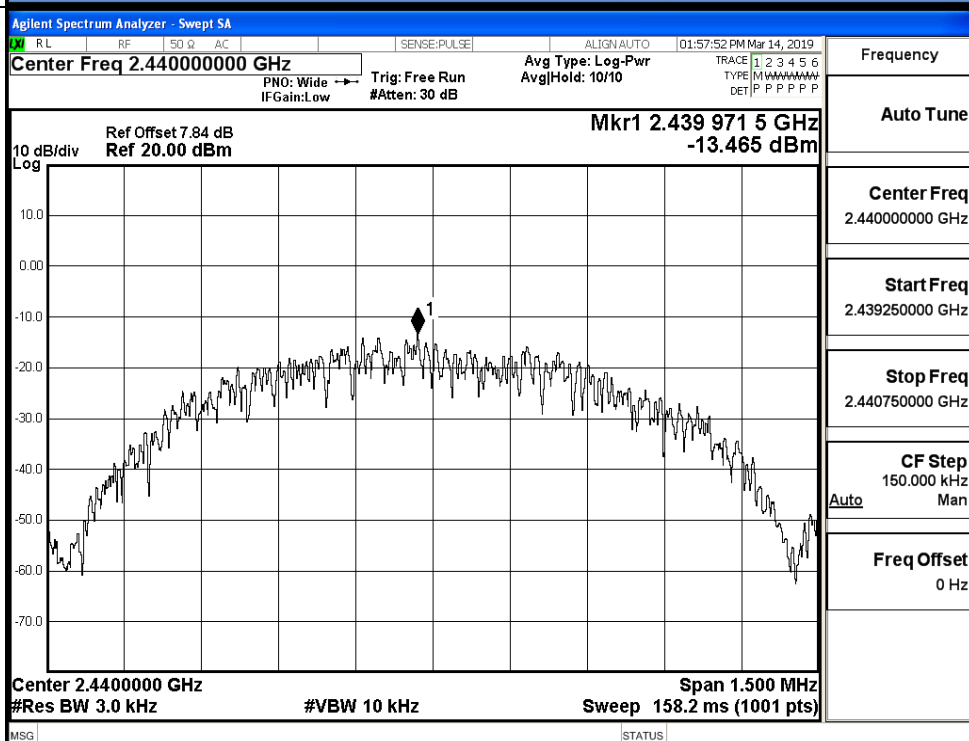
Mode	Channel	PSD [dBm/3KHz]	Limit [dBm/3KHz]	Verdict
BT LE	LCH	-12.673	8	PASS
BT LE	MCH	-13.465	8	PASS
BT LE	HCH	-13.403	8	PASS

Test Graphs

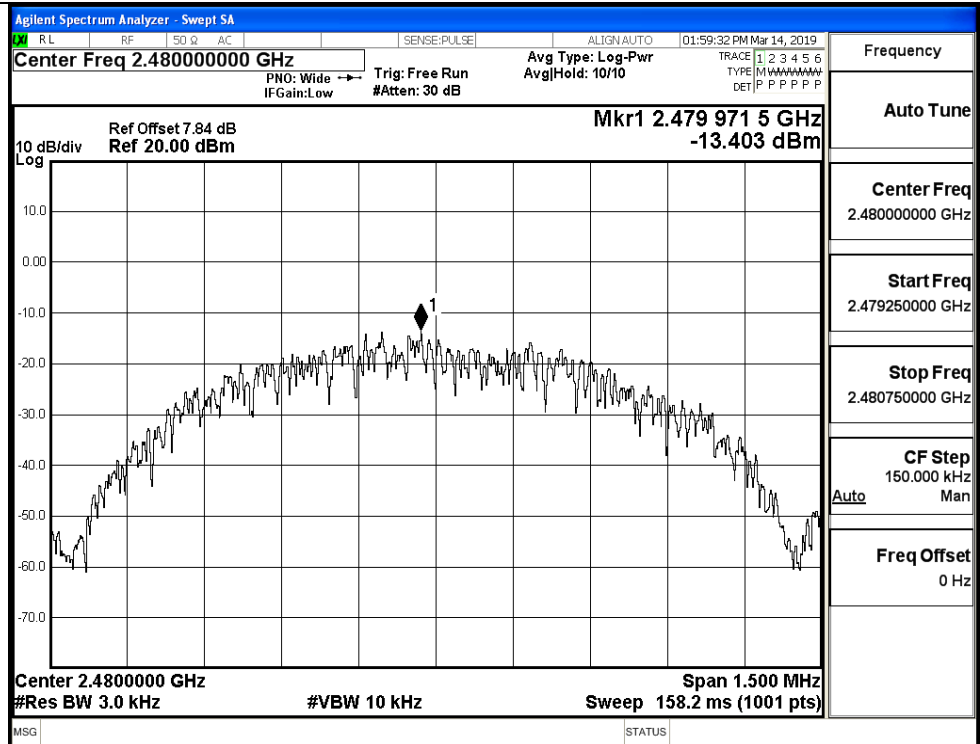
LCH



MCH



HCH

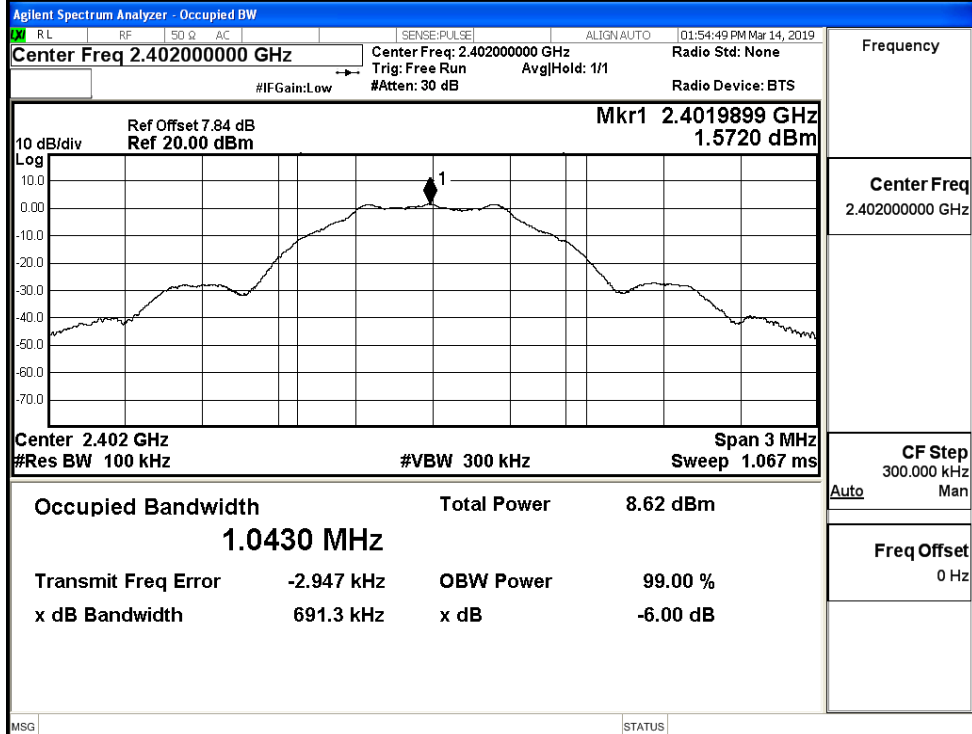


B.4 6dB Bandwidth

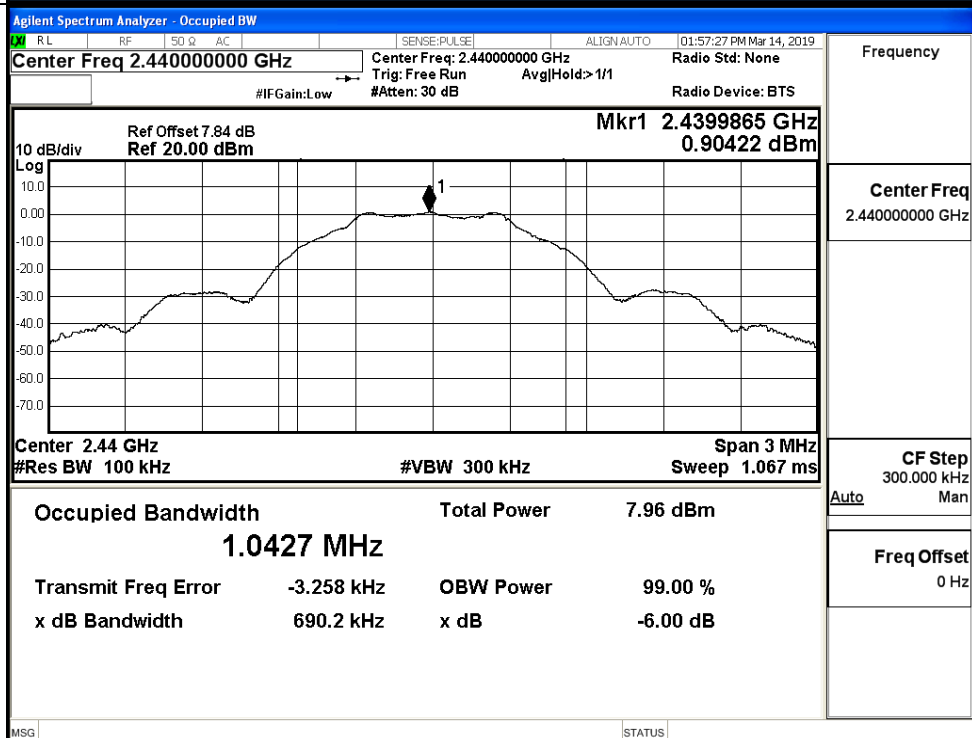
Mode	Channel	6dB Bandwidth [MHz]	Limit [MHz]	Verdict
BT LE	LCH	0.6913	≥ 0.5	PASS
BT LE	MCH	0.6902	≥ 0.5	PASS
BT LE	HCH	0.6734	≥ 0.5	PASS

Test Graphs

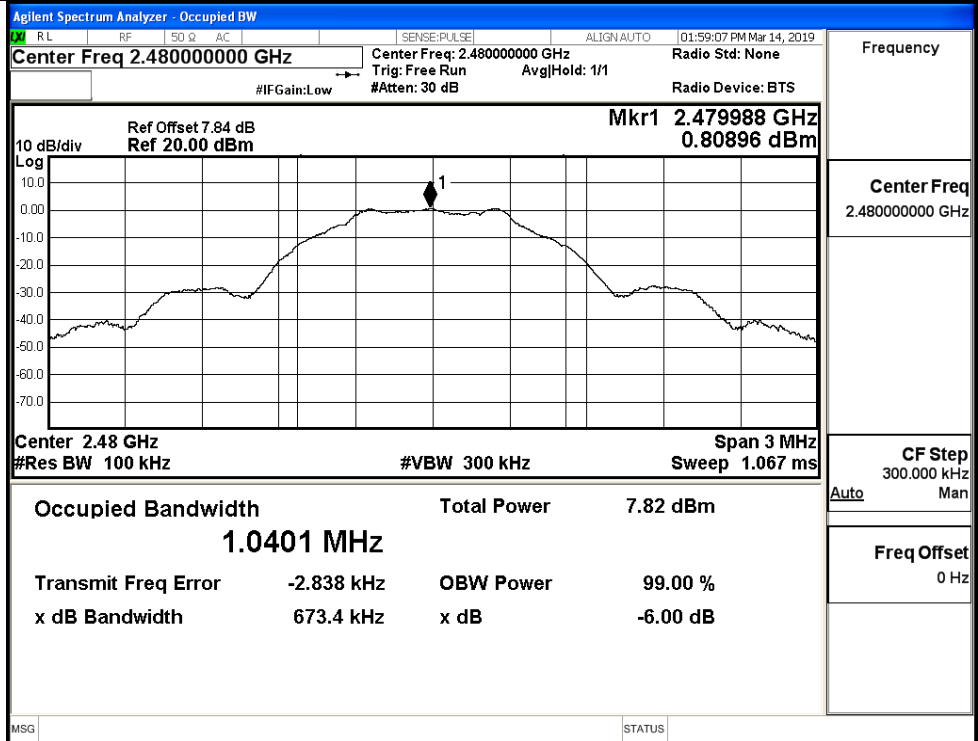
LCH



MCH



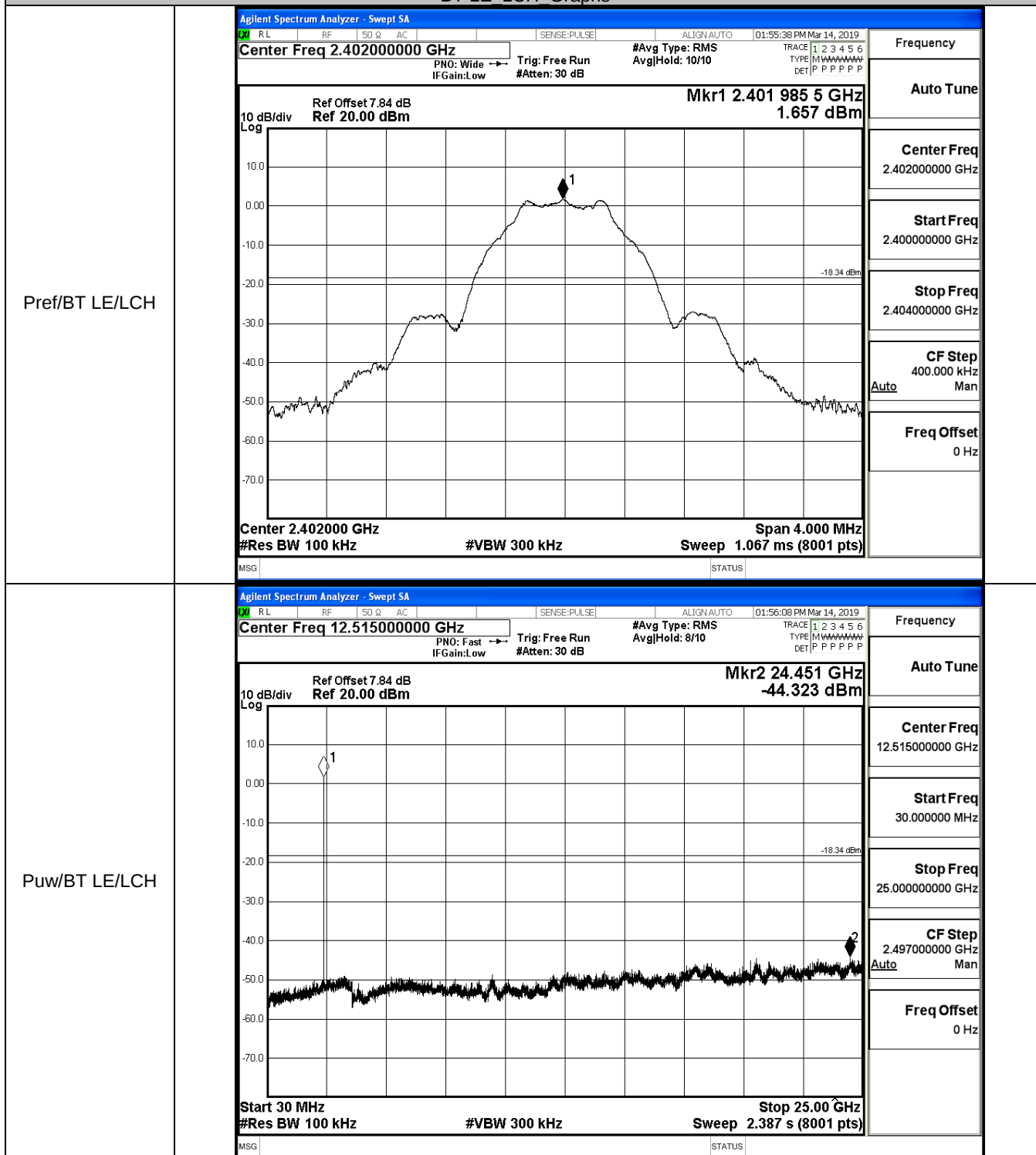
HCH



B.5 RF Conducted Spurious Emissions

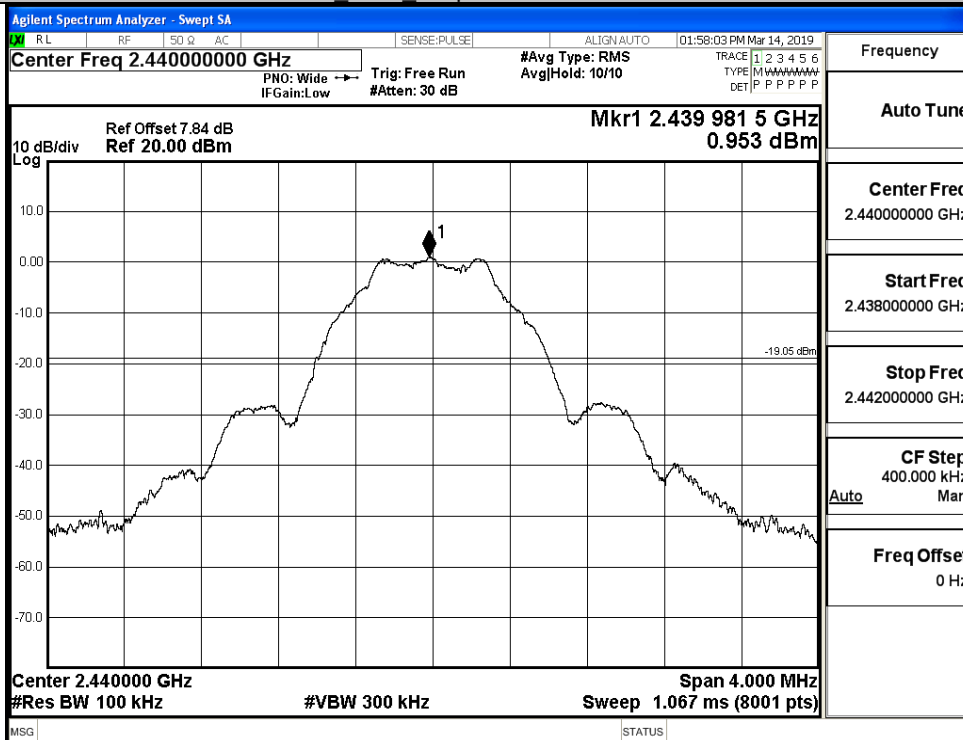
Mode	Channel	Pref [dBm]	Max. Level [dBm]	Limit [dBm]	Verdict
BT LE	LCH	1.657	-44.323	-18.343	PASS
BT LE	MCH	0.953	-43.772	-19.047	PASS
BT LE	HCH	0.839	-44.267	-19.161	PASS

BT LE LCH Graphs

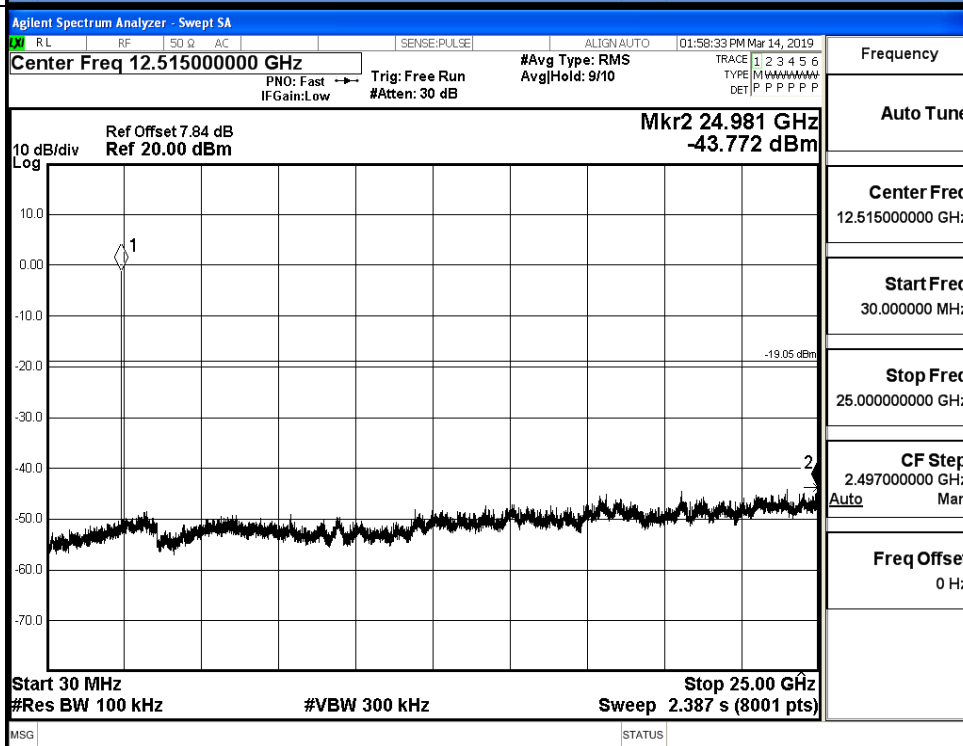


BT LE MCH Graphs

Pref/BT LE/MCH

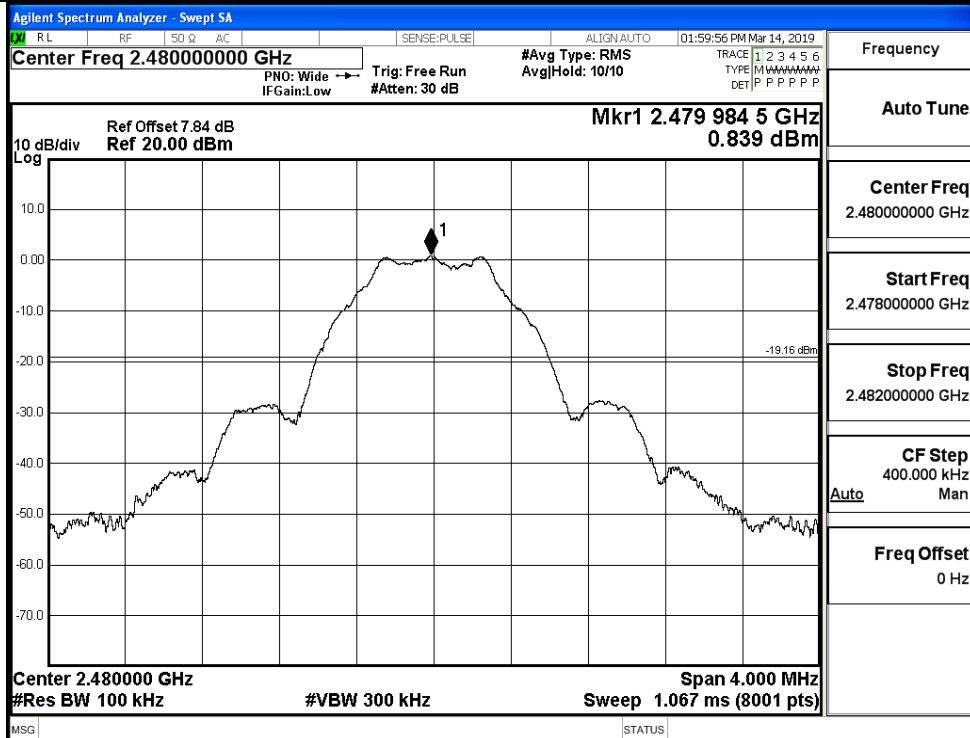


Puw/BT LE/MCH

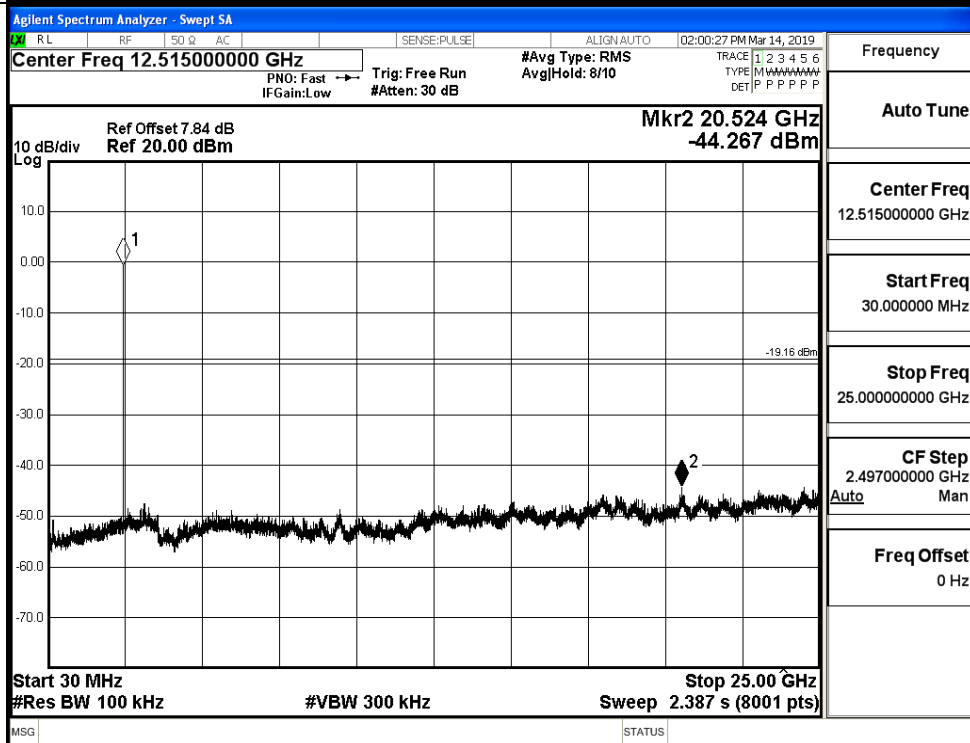


BT LE HCH Graphs

Pref/BT LE/HCH



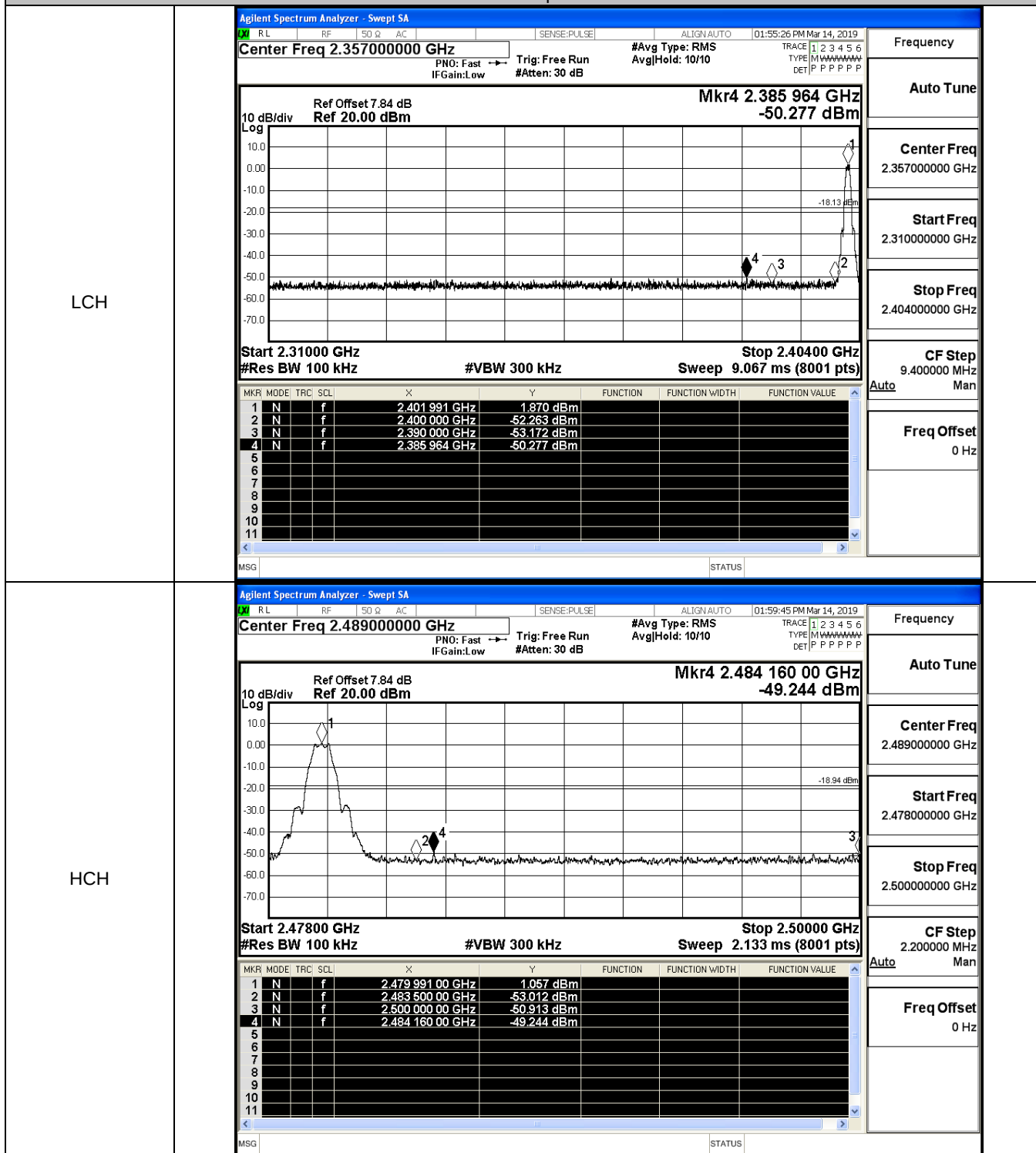
Puw/BT LE/HCH



B.6 Band-edge for RF Conducted Emissions

Mode	Channel	Carrier Power[dBm]	Max.Spurious Level [dBm]	Limit [dBm]	Verdict
BT LE	LCH	1.870	-50.277	-18.13	PASS
BT LE	HCH	1.057	-49.244	-18.94	PASS

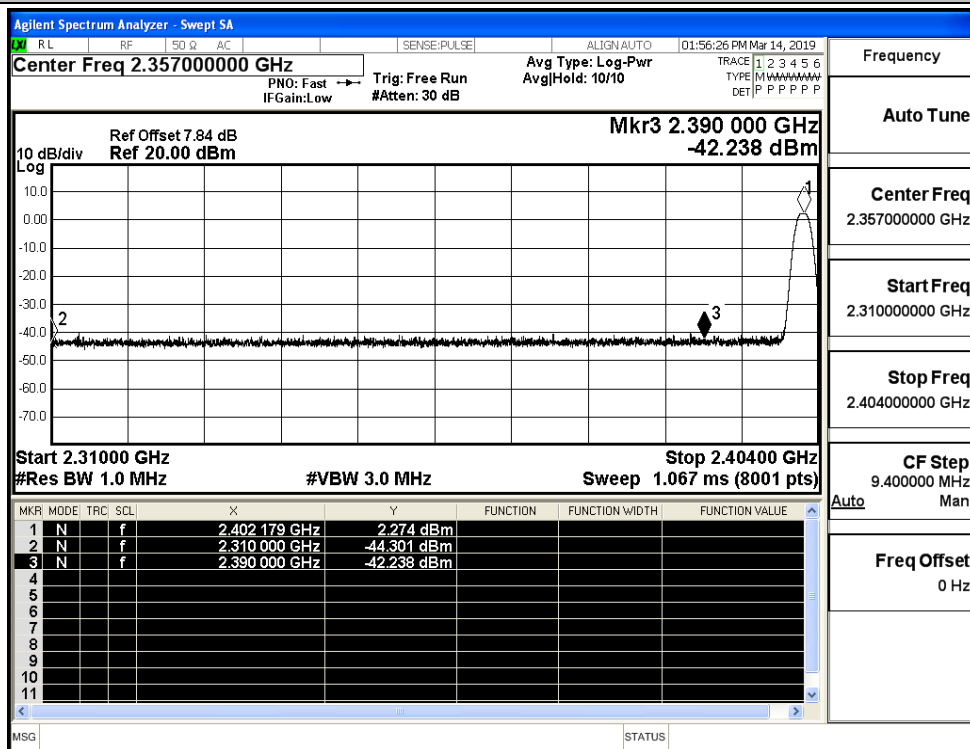
Test Graphs



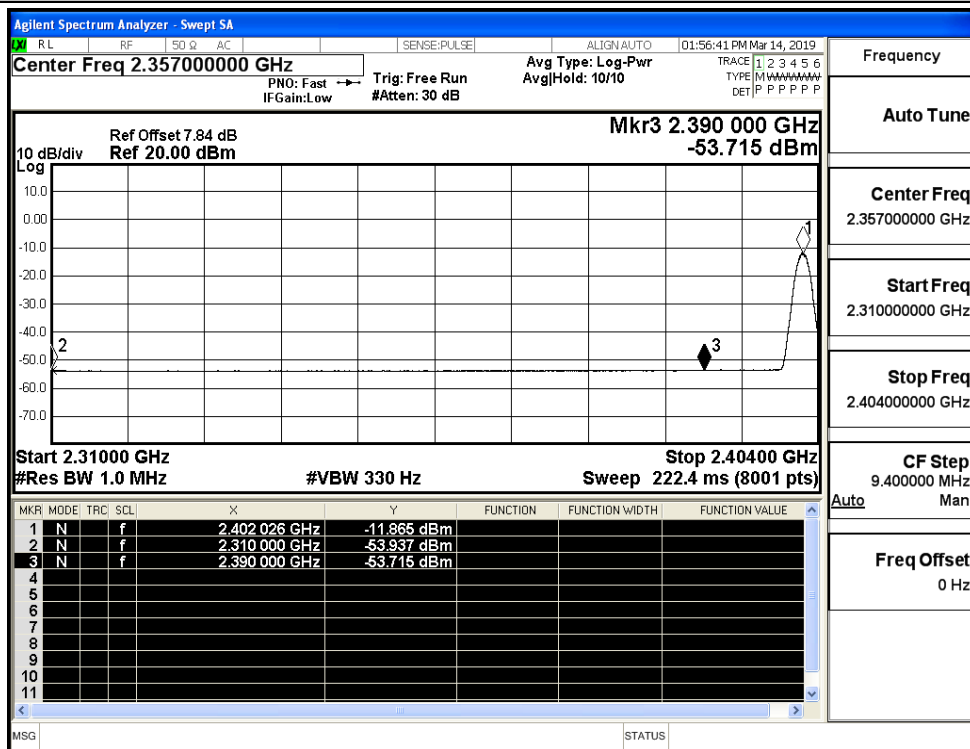
B.7 Restrict-band band-edge measurements

Test Mode	Test Channel	Ant	Freq.	Power [dBm]	Gain	Ground Factor	E [dBuV/m]	Detector	Limit [dBuV/m]	Verdi
BT LE	2402	Ant1	2310.0	-44.30	2.0	0	52.96	PEAK	74	PASS
		Ant1	2310.0	-53.94	2.0	0	43.32	AV	54	PASS
		Ant1	2390.0	-42.24	2.0	0	55.02	PEAK	74	PASS
		Ant1	2390.0	-53.72	2.0	0	43.54	AV	54	PASS
	2480	Ant1	2483.5	-42.15	2.0	0	55.10	PEAK	74	PASS
		Ant1	2483.5	-53.21	2.0	0	44.04	AV	54	PASS
		Ant1	2500.0	-43.94	2.0	0	53.31	PEAK	74	PASS
		Ant1	2500.0	-53.31	2.0	0	43.95	AV	54	PASS

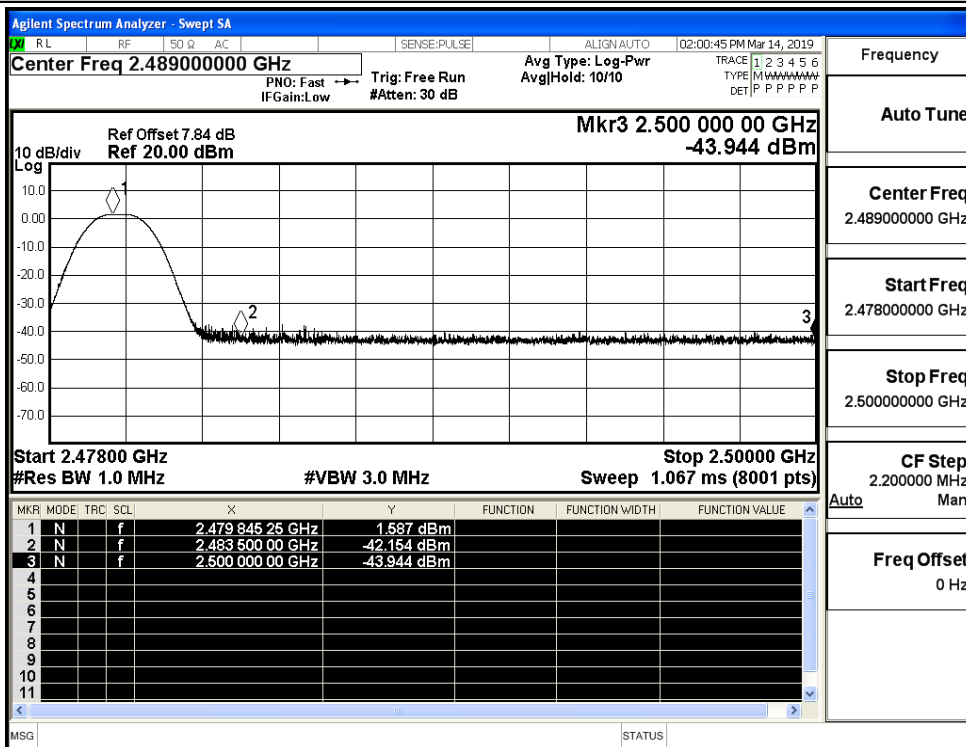
Restrict-band band-edge measurements_BT LE_2402_Ant1_PEAK



Restrict-band band-edge measurements_BT LE_2402_Ant1_AV



Restrict-band band-edge measurements_BT LE_2480_Ant1_PEAK



Restrict-band band-edge measurements_BT LE_2480_Ant1_AV

