

Appendix A

RF Test Data for 2.4G (Conducted Measurement)

Product Name: SPEEDLITE

Trade Mark: NEEWER

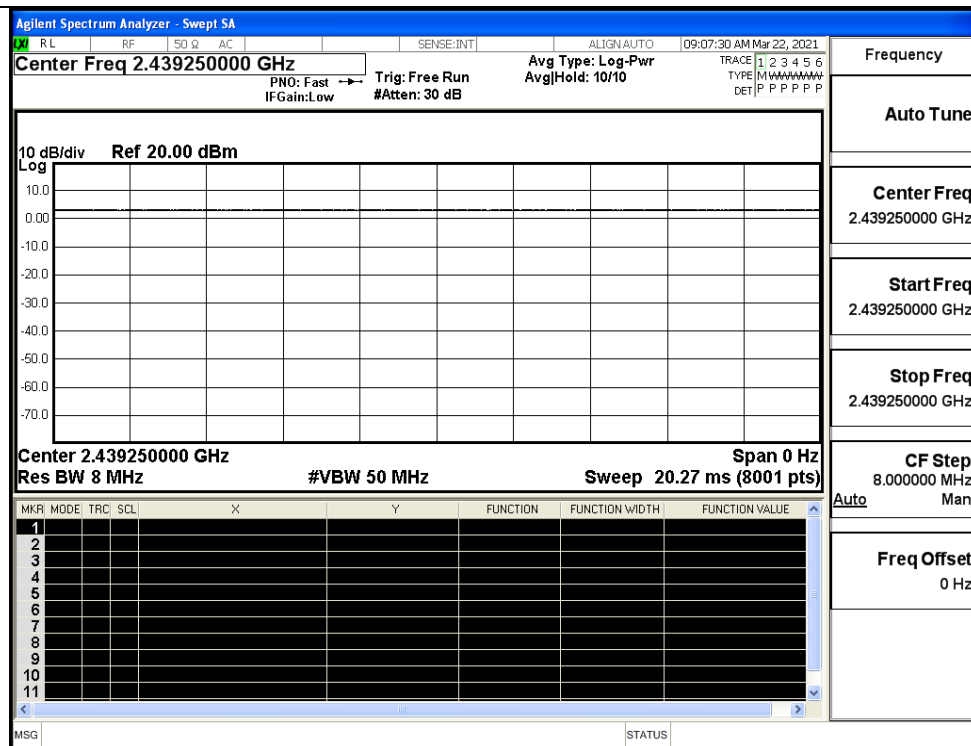
Test Model: NW655

Environmental Conditions

Temperature:	24.6 ° C
Relative Humidity:	54.1%
ATM Pressure:	100.0 kPa
Test Engineer:	Kay Hu
Supervised by:	Li Huan

A.1 Duty Cycle

Test Mode	Test Channel	Ant	Duty Cycle[%]	Verdict
GFSK	2439.25	Ant1	100	PASS

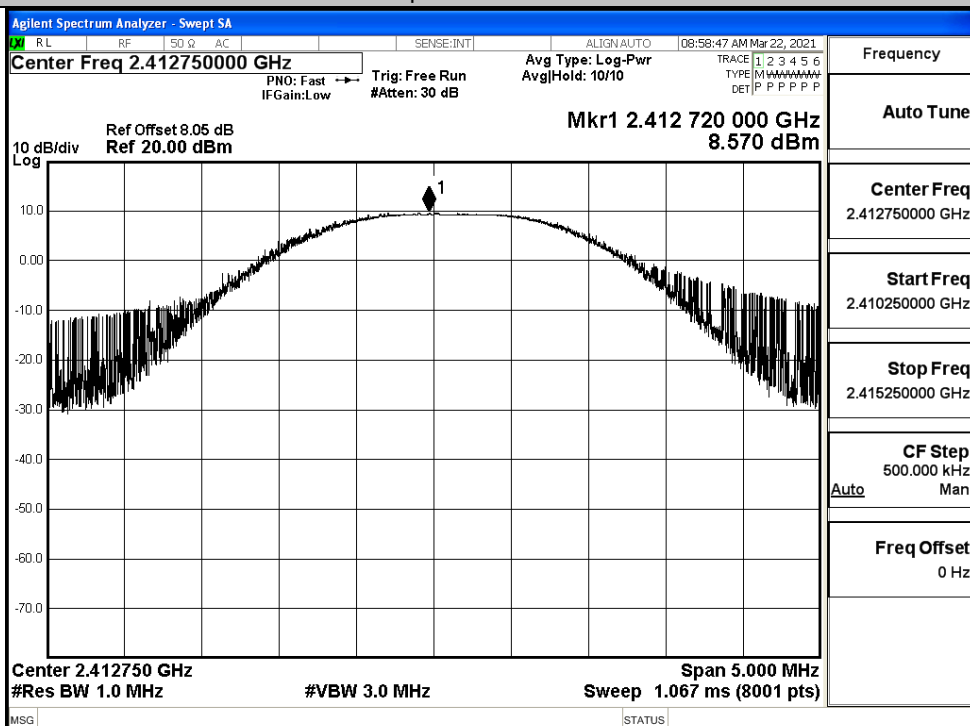


A.2 Maximum Conducted Peak Output Power

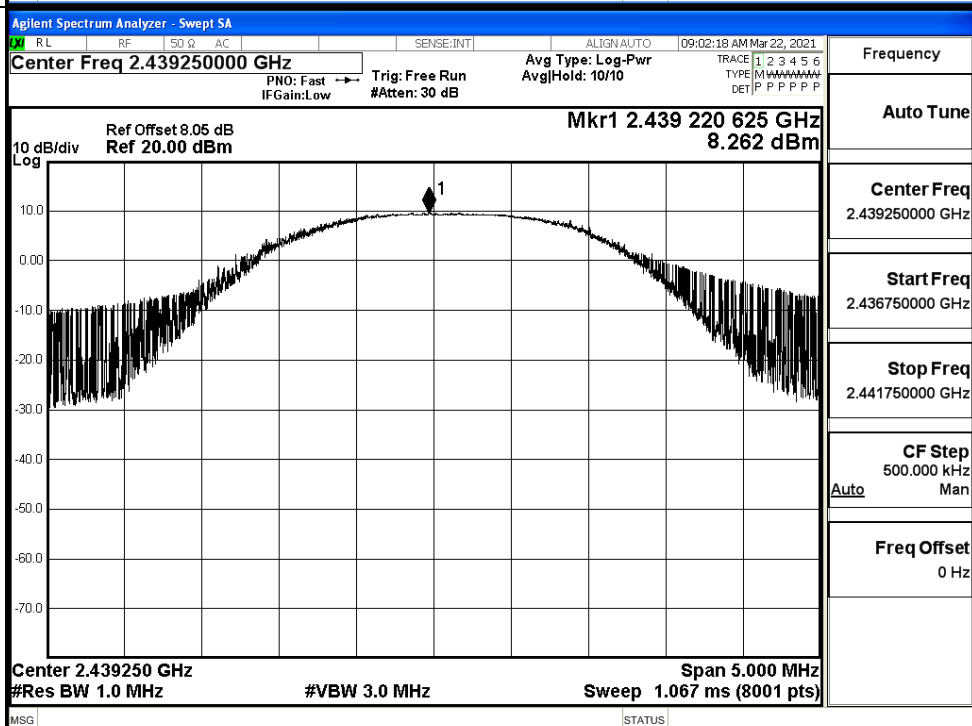
Mode	Channel	Conduct Peak Power[dBm]	Limit [dBm]	Verdict
GFSK	LCH	8.570	30	PASS
GFSK	MCH	8.262	30	PASS
GFSK	HCH	8.560	30	PASS

Test Graphs

LCH



MCH



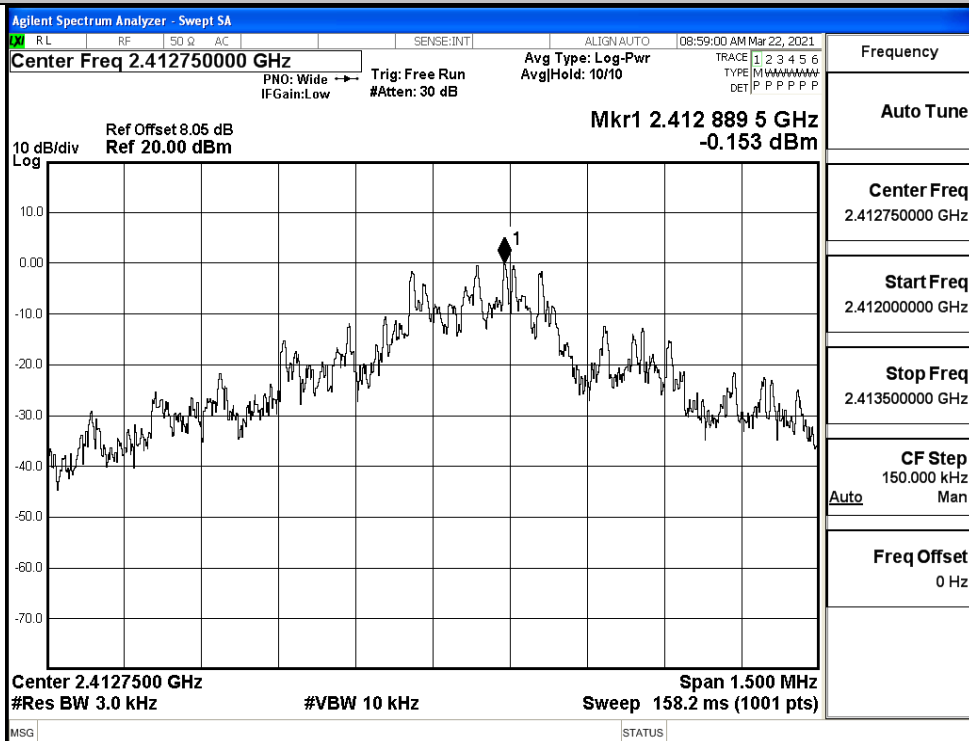


A.3 Maximum Power Spectral Density

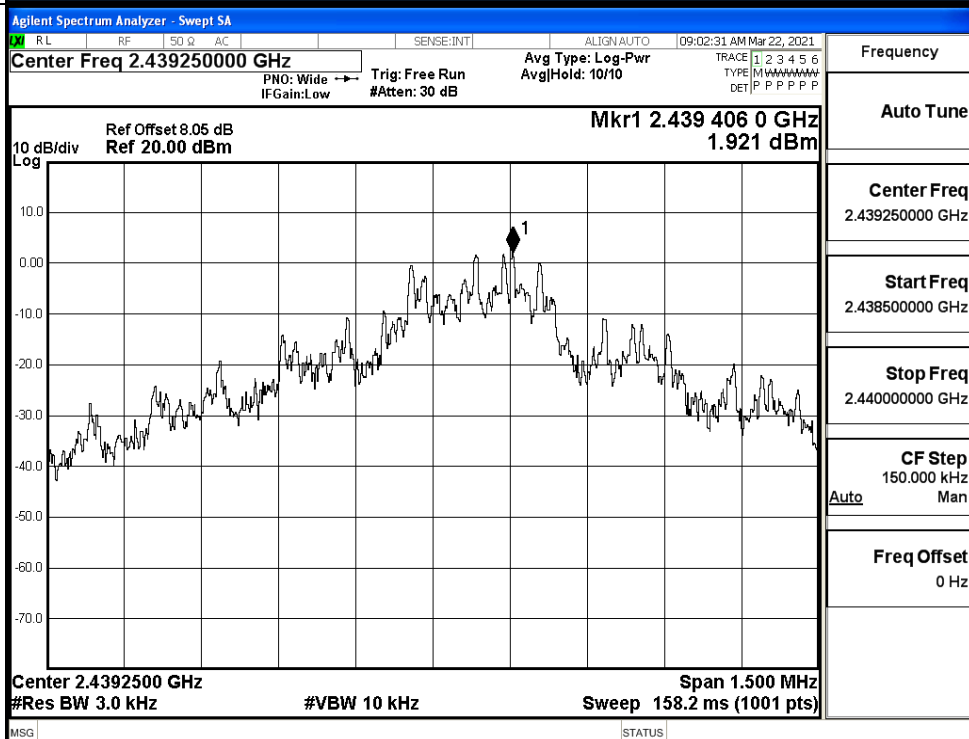
Mode	Channel	PSD [dBm/3KHz]	Limit [dBm/3KHz]	Verdict
GFSK	LCH	-0.153	8	PASS
GFSK	MCH	1.921	8	PASS
GFSK	HCH	2.178	8	PASS

Test Graphs

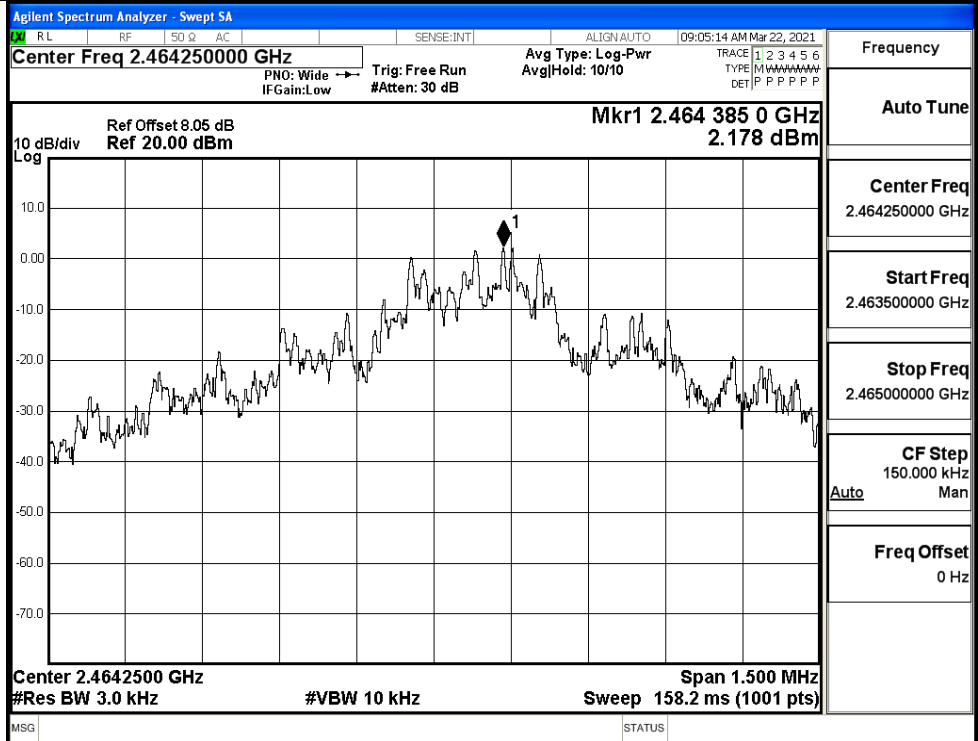
LCH



MCH



HCH

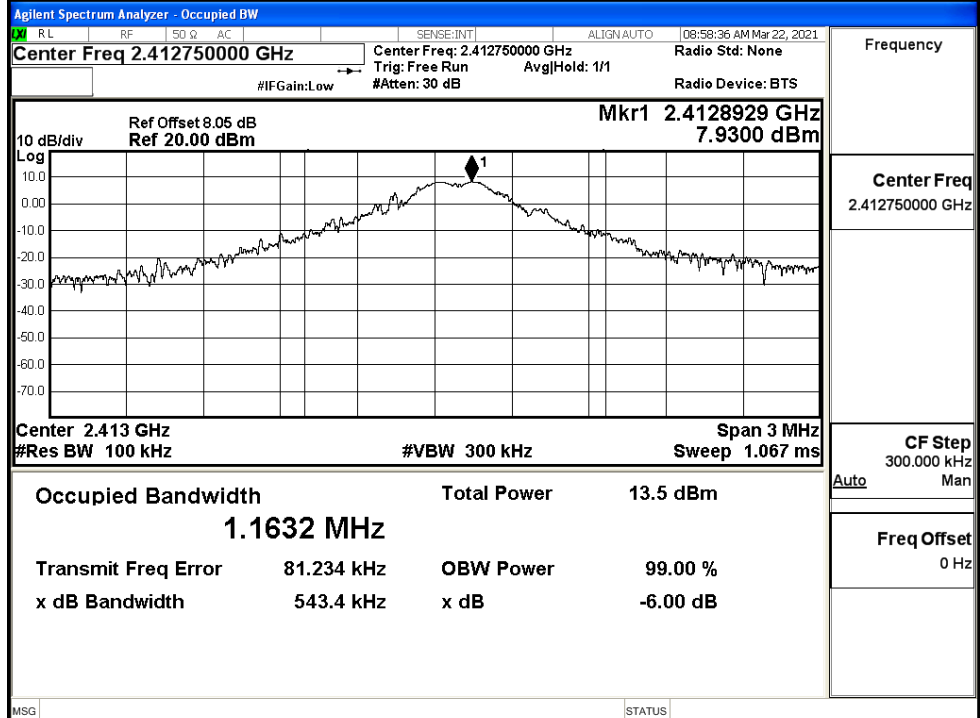


A.4 6dB Bandwidth

Mode	Channel	6dB Bandwidth [MHz]	Limit [MHz]	Verdict
GFSK	LCH	0.5434	≥ 0.5	PASS
GFSK	MCH	0.5768	≥ 0.5	PASS
GFSK	HCH	0.5320	≥ 0.5	PASS

Test Graphs

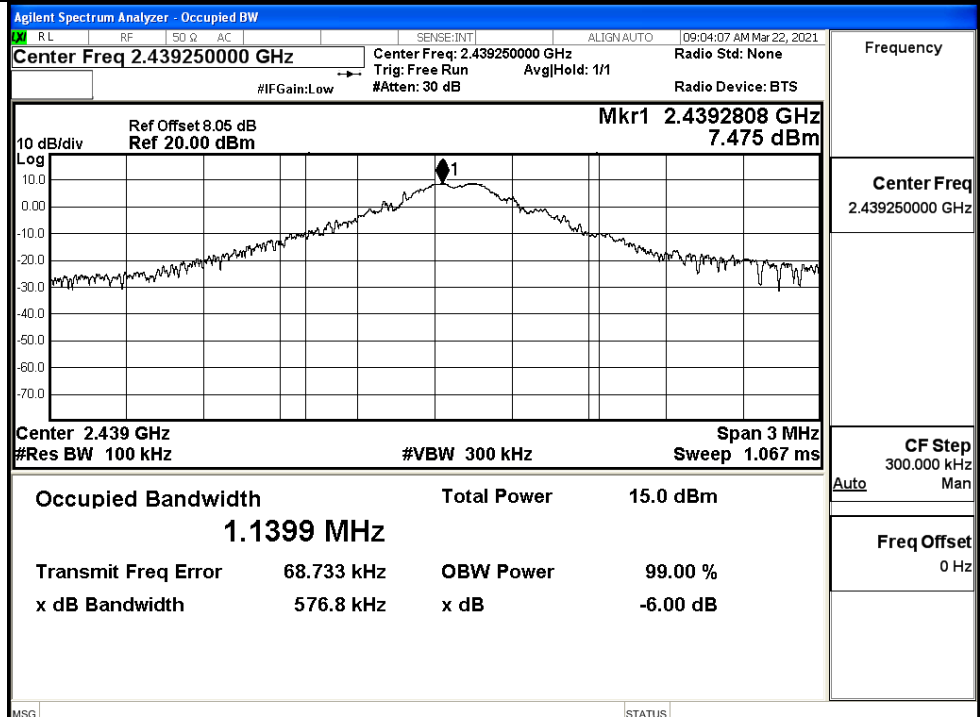
LCH



Frequency

Center Freq
2.412750000 GHzCF Step
300.000 kHz
Auto ManFreq Offset
0 Hz

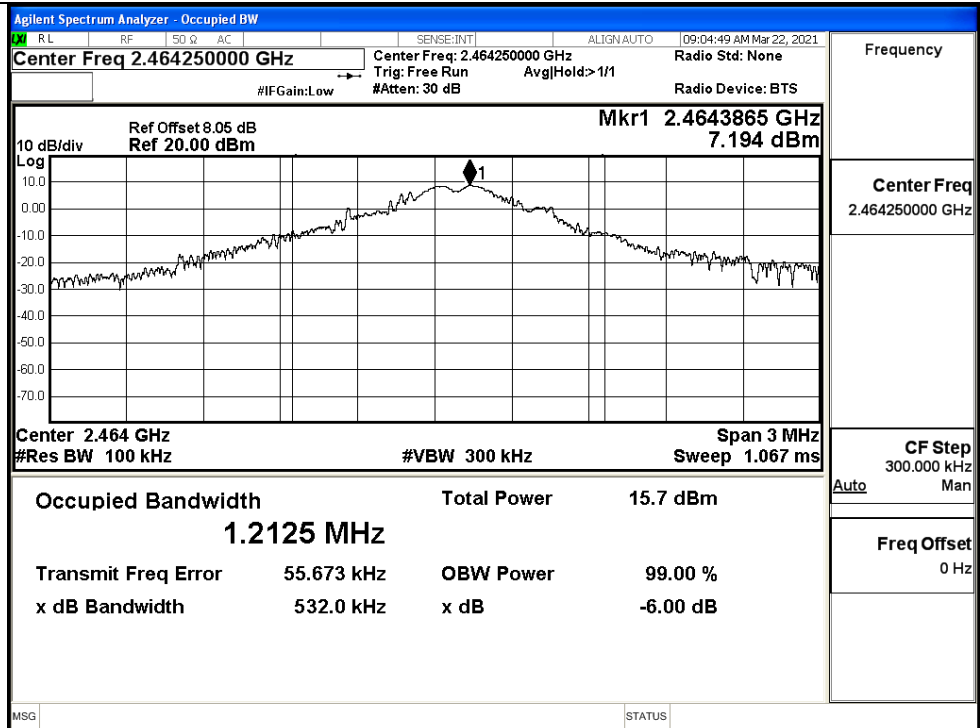
MCH



Frequency

Center Freq
2.439250000 GHzCF Step
300.000 kHz
Auto ManFreq Offset
0 Hz

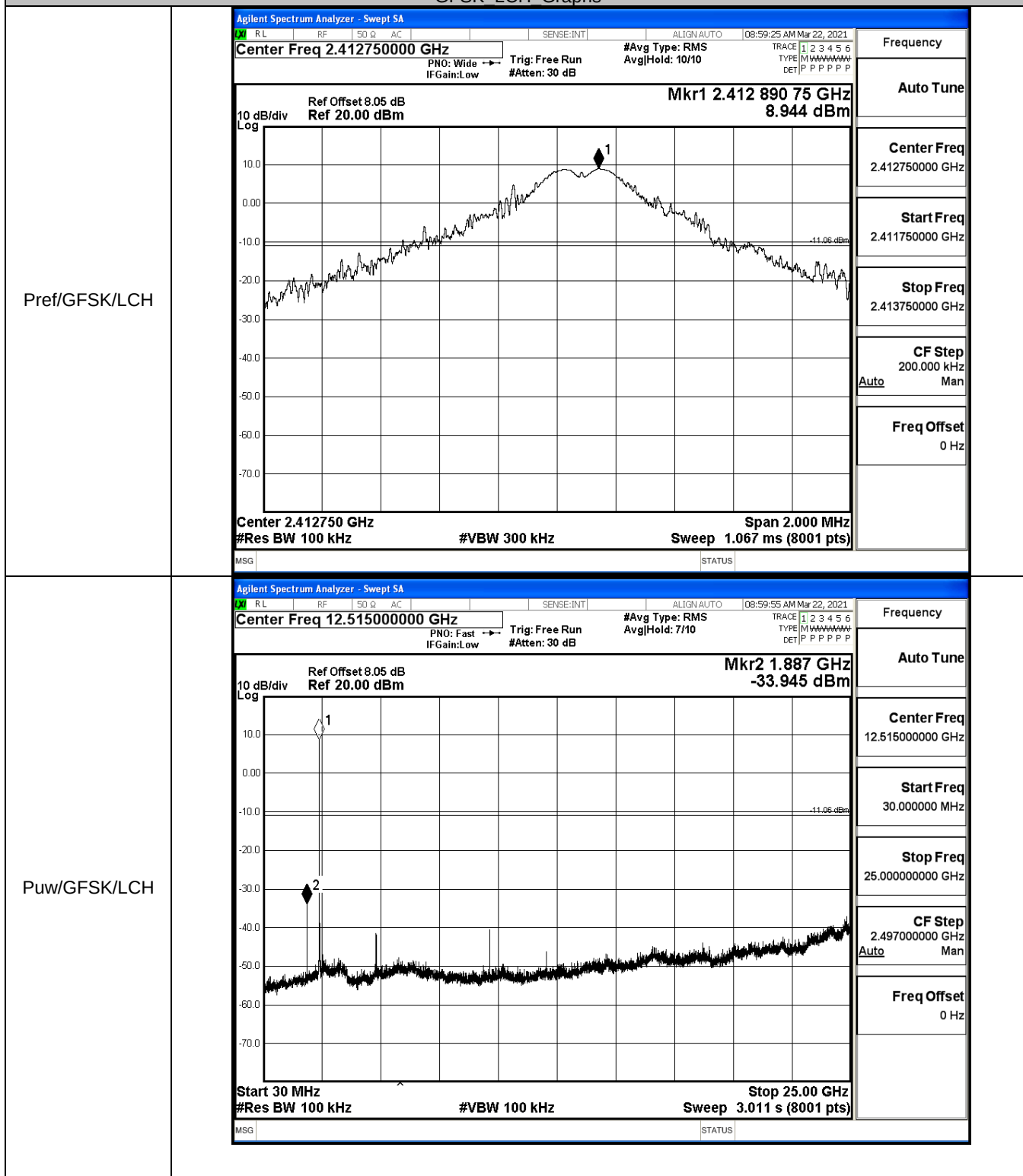
HCH



A.5 RF Conducted Spurious Emissions

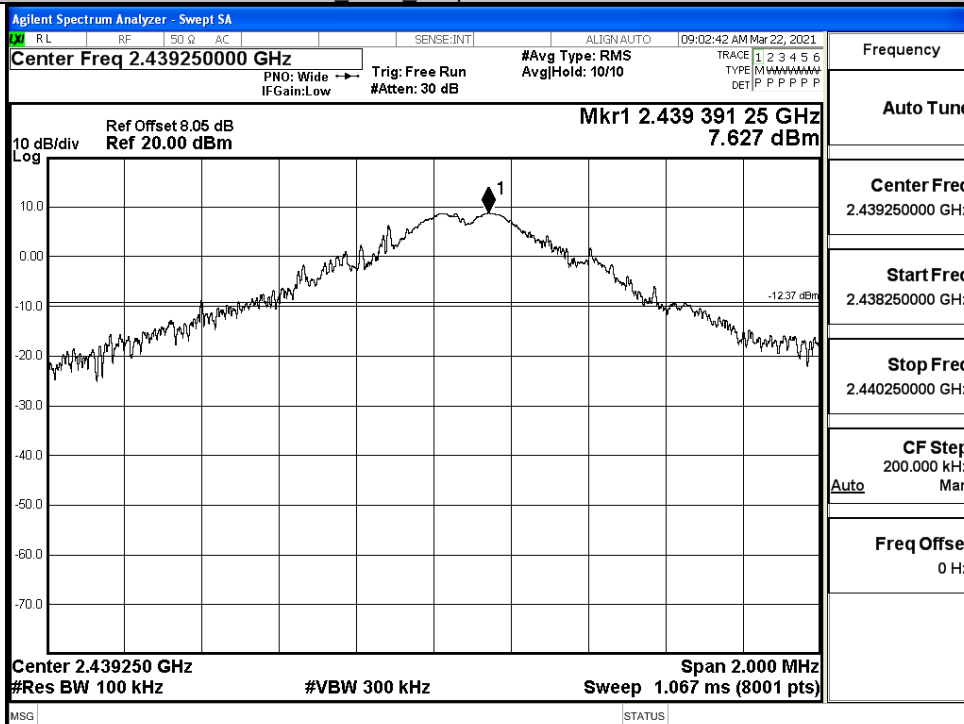
Mode	Channel	Pref [dBm]	Max. Level [dBm]	Limit [dBm]	Verdict
GFSK	LCH	8.944	-33.945	-11.056	PASS
GFSK	MCH	7.627	-37.986	-12.373	PASS
GFSK	HCH	7.062	-36.466	-12.938	PASS

GFSK LCH Graphs



GFSK MCH Graphs

Pref/GFSK/MCH

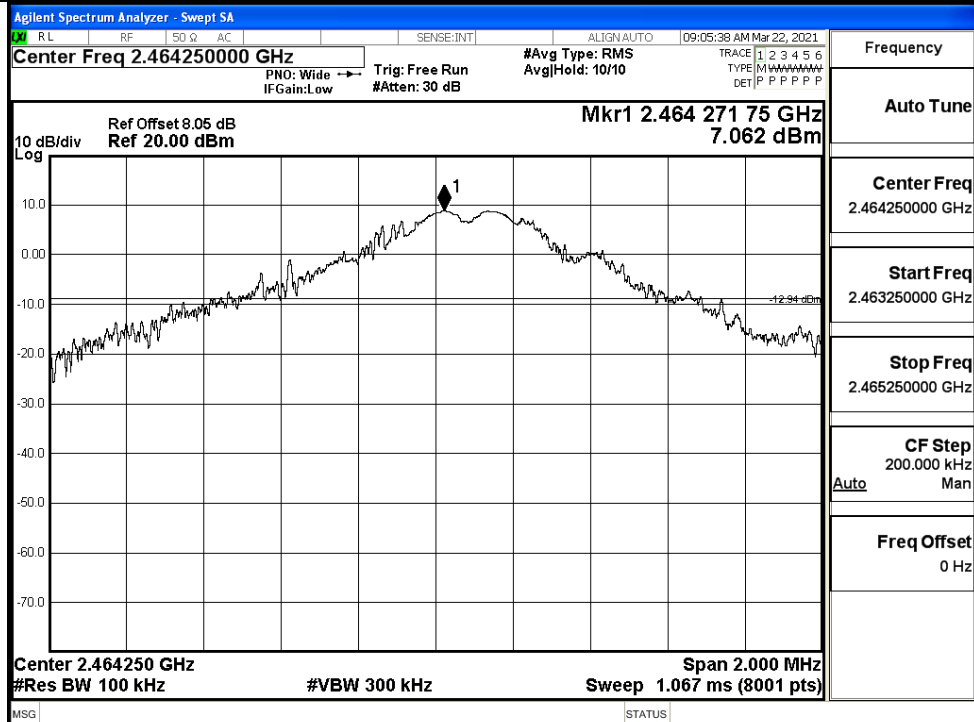


Puw/GFSK/MCH

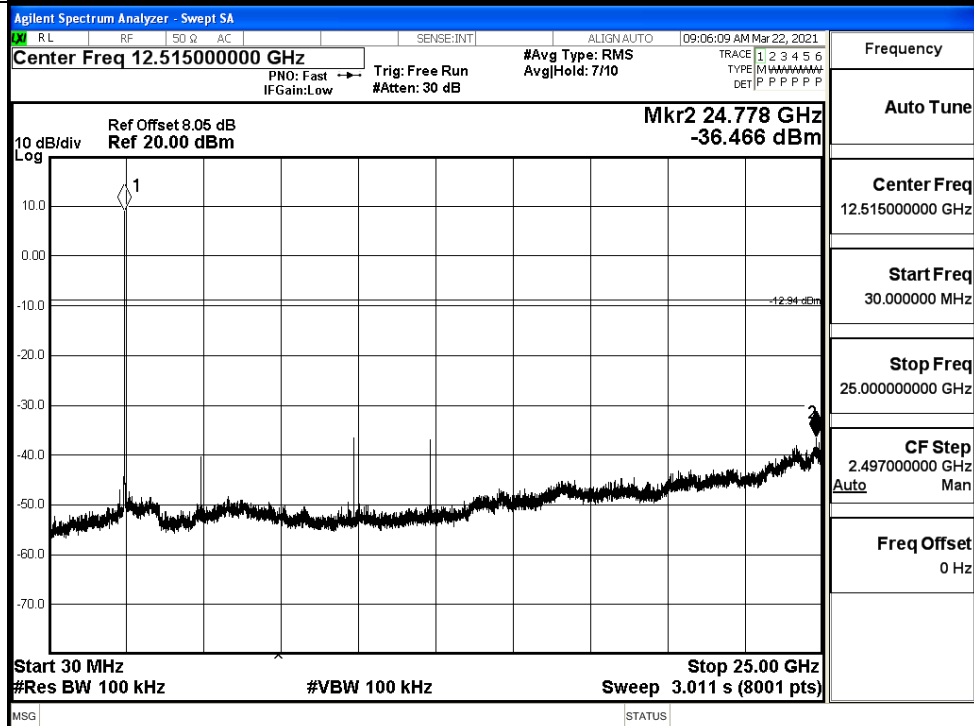


GFSK HCH Graphs

Pref/GFSK/HCH



Puw/GFSK/HCH

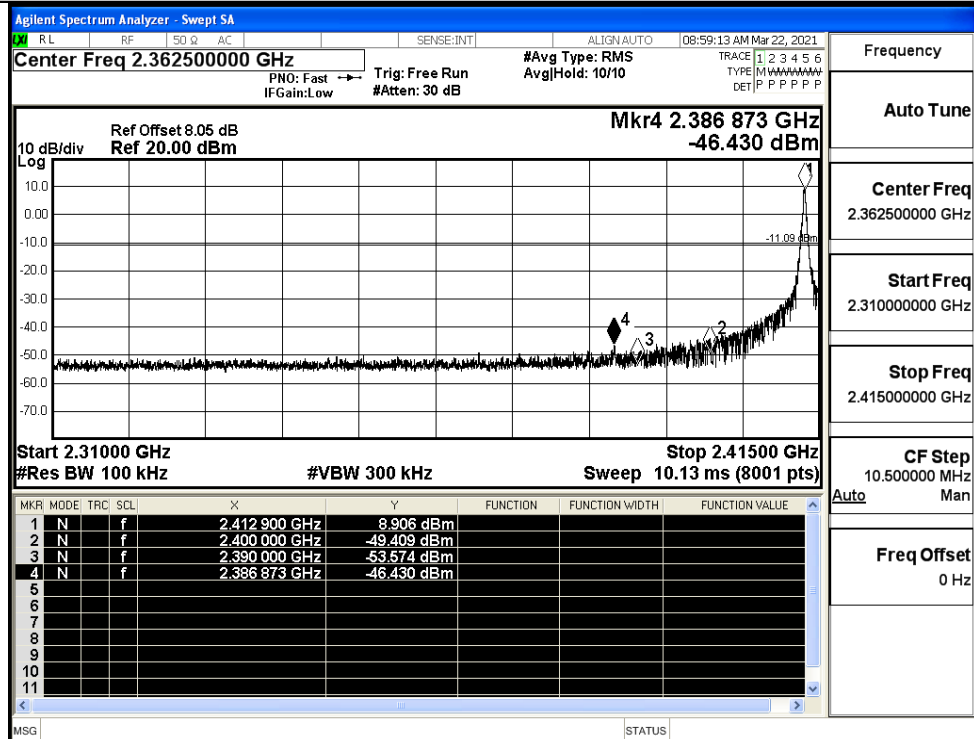


A.6 Band-edge for RF Conducted Emissions

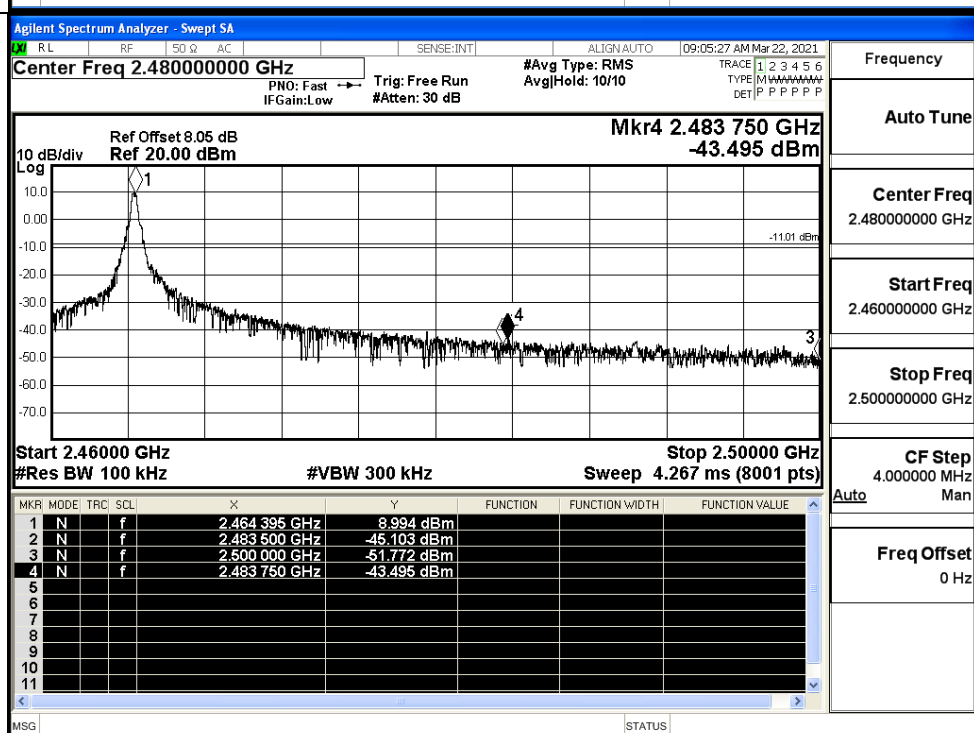
Mode	Channel	Carrier Power[dBm]	Max.Spurious Level [dBm]	Limit [dBm]	Verdict
GFSK	LCH	8.906	-46.430	-11.09	PASS
GFSK	HCH	8.994	-43.495	-11.01	PASS

Test Graphs

LCH



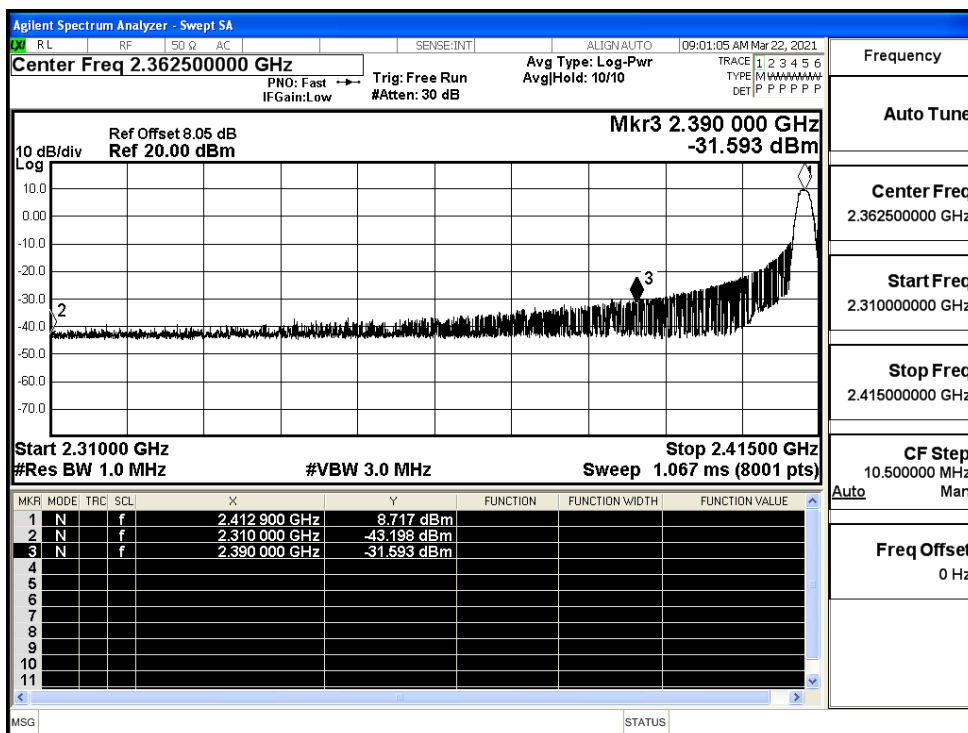
HCH



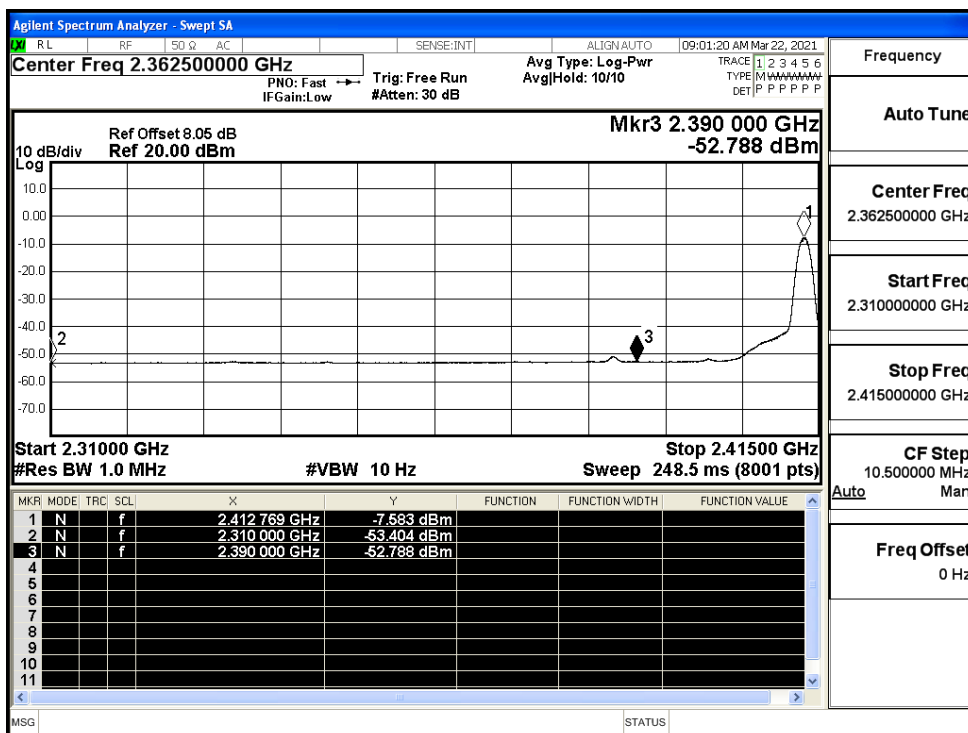
A.7 Restrict-band band-edge measurements

Test Mode	Test Channel	Ant	Freq.	Power [dBm]	Gain	Ground Factor	E [dBuV/m]	Detector	Limit [dBuV/m]	Verdi
GFSK	2412.7 5	Ant1	2310.0	-43.20	2.0	0	54.06	PEAK	74	PASS
		Ant1	2310.0	-53.40	2.0	0	43.86	AV	54	PASS
		Ant1	2390.0	-31.59	2.0	0	65.67	PEAK	74	PASS
		Ant1	2390.0	-52.79	2.0	0	44.47	AV	54	PASS
	2464.2 5	Ant1	2483.5	-42.58	2.0	0	54.68	PEAK	74	PASS
		Ant1	2483.5	-52.35	2.0	0	44.91	AV	54	PASS
		Ant1	2500.0	-32.15	2.0	0	65.11	PEAK	74	PASS
		Ant1	2500.0	-52.29	2.0	0	44.97	AV	54	PASS

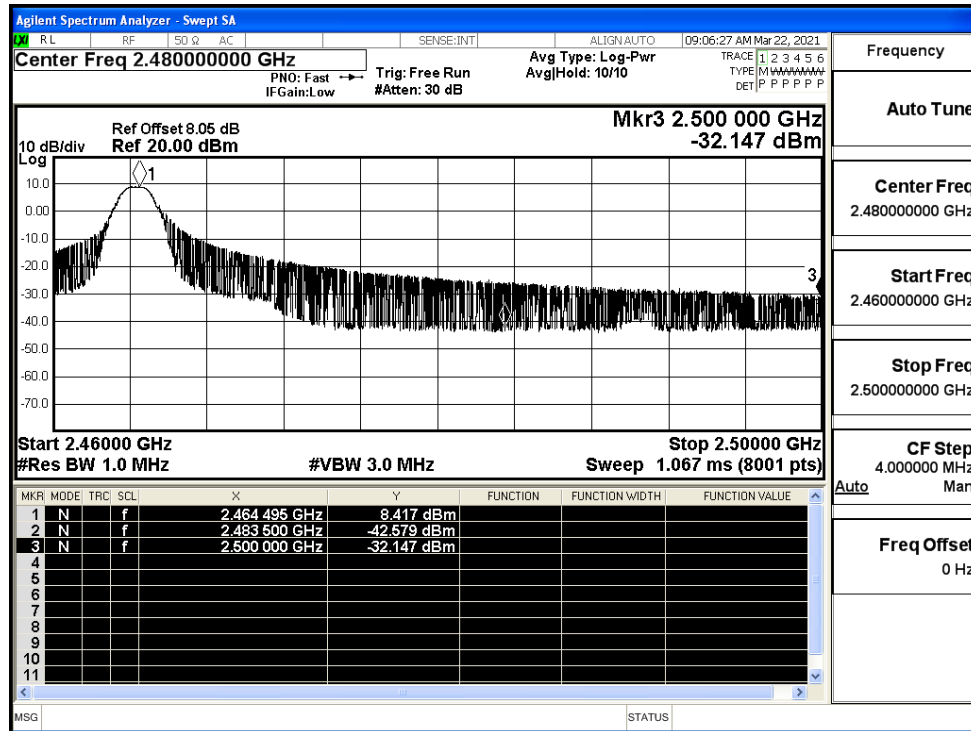
Restrict-band band-edge measurements_GFSK_2412.75_Ant1_PEAK



Restrict-band band-edge measurements_GFSK_2412.75_Ant1_AV



Restrict-band band-edge measurements_GFSK_2464.25_Ant1_PEAK



Restrict-band band-edge measurements_GFSK_2464.25_Ant1_AV

