



Appendix A

RF Test Data for 2.4G (Conducted Measurement)

Product Name: Wireless Mouse

Test Model: MC219

Environmental Conditions

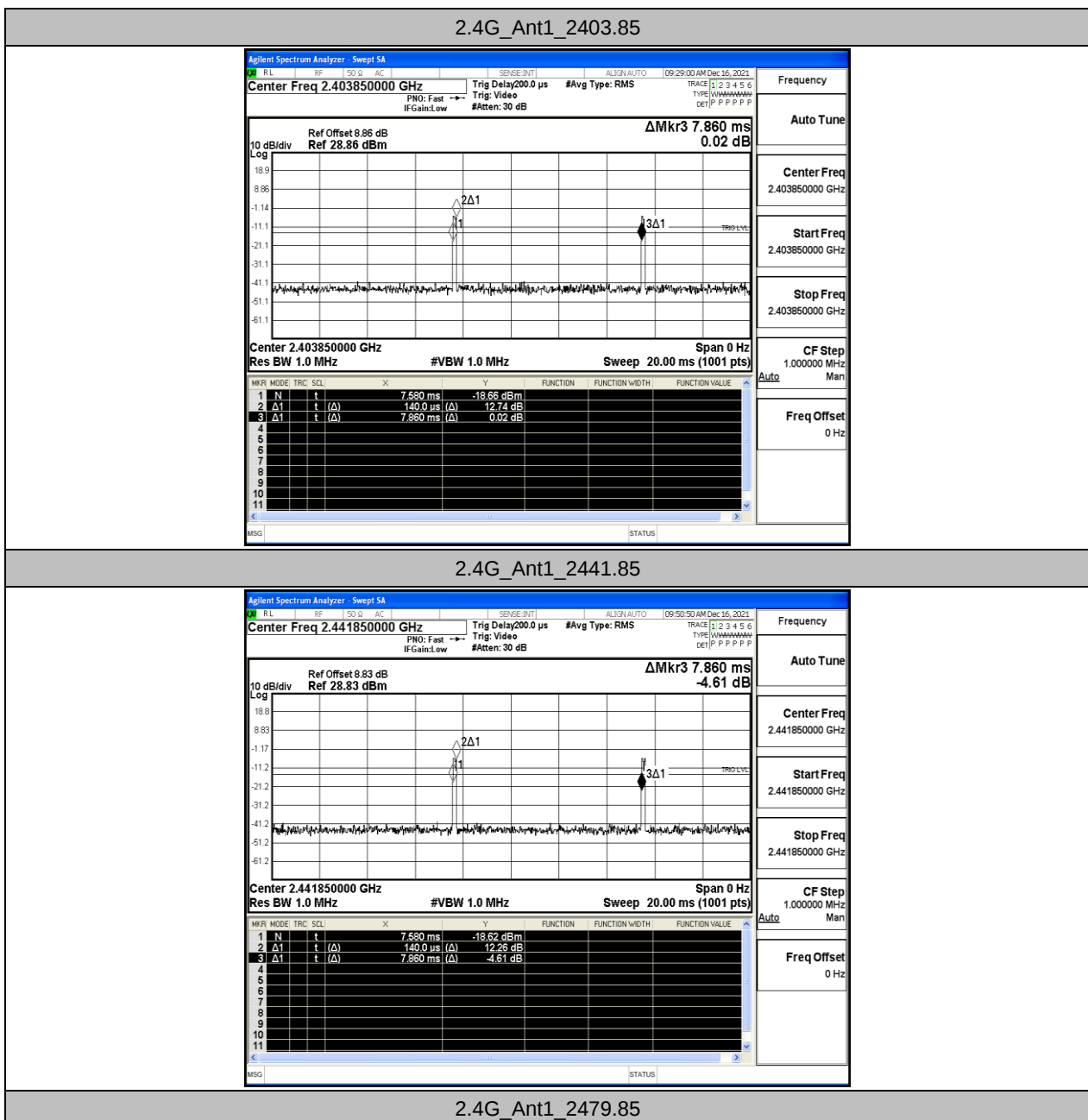
Temperature:	24.2° C
Relative Humidity:	57.7%
ATM Pressure:	100.0 kPa
Test Engineer:	monkey.Li
Supervised by:	Lihw

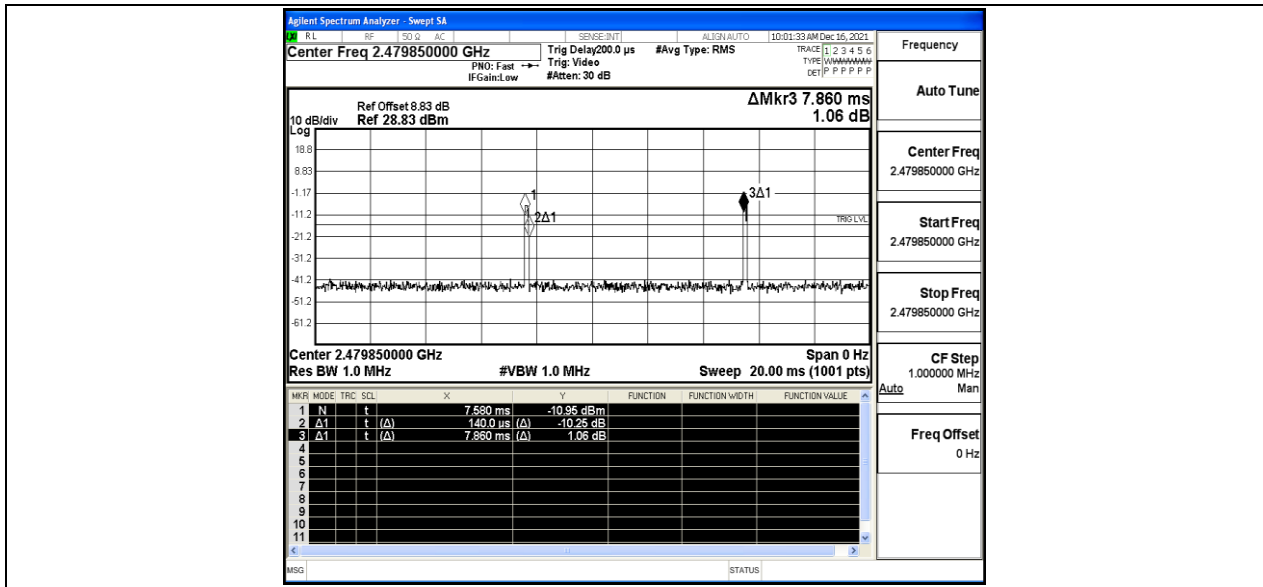
A.1 Duty Cycle

Test Result

TestMode	Antenna	Channel	ON Time [ms]	Period [ms]	X	DC [%]	xFactor	Limit	Verdict
2.4G	Ant1	2403.85	0.14	7.86	0.0178	1.78	17.50	---	PASS
		2441.85	0.14	7.86	0.0178	1.78	17.50	---	PASS
		2479.85	0.14	7.86	0.0178	1.78	17.50	---	PASS

Test Graphs







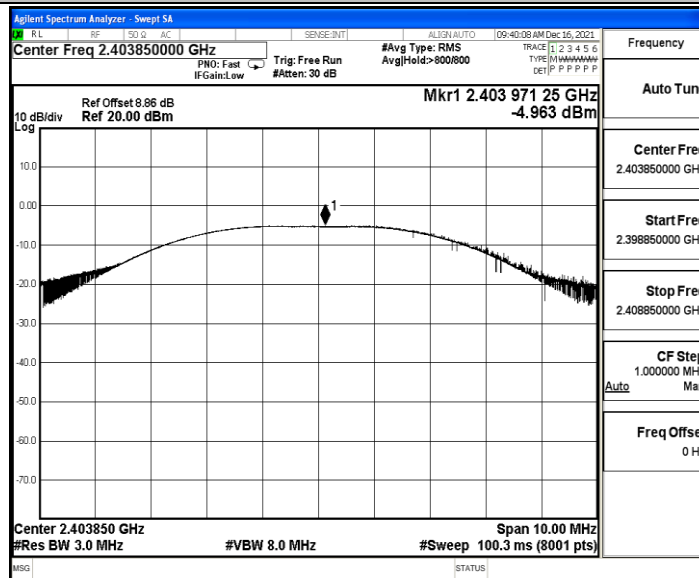
A.2 Maximum conducted output power

Test Result

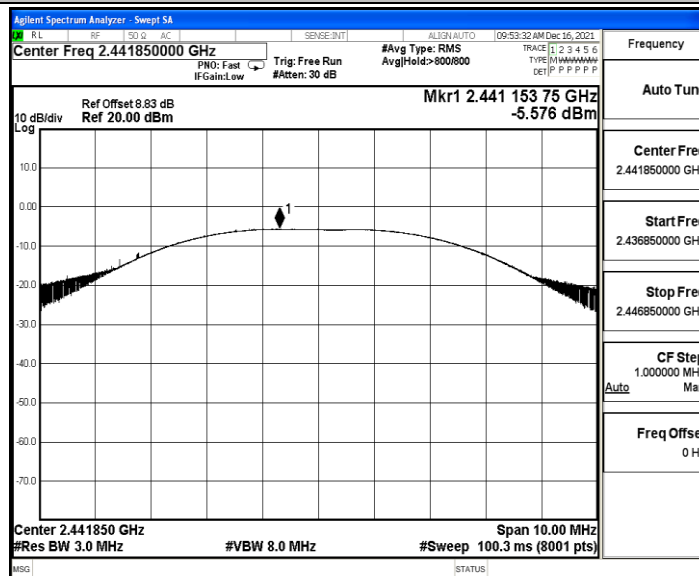
TestMode	Antenna	Channel	Result[dBm]	Limit[dBm]	Verdict
2.4G	Ant1	2403.85	-4.96	≤30	PASS
		2441.85	-5.58	≤30	PASS
		2479.85	-6.43	≤30	PASS

Test Graphs

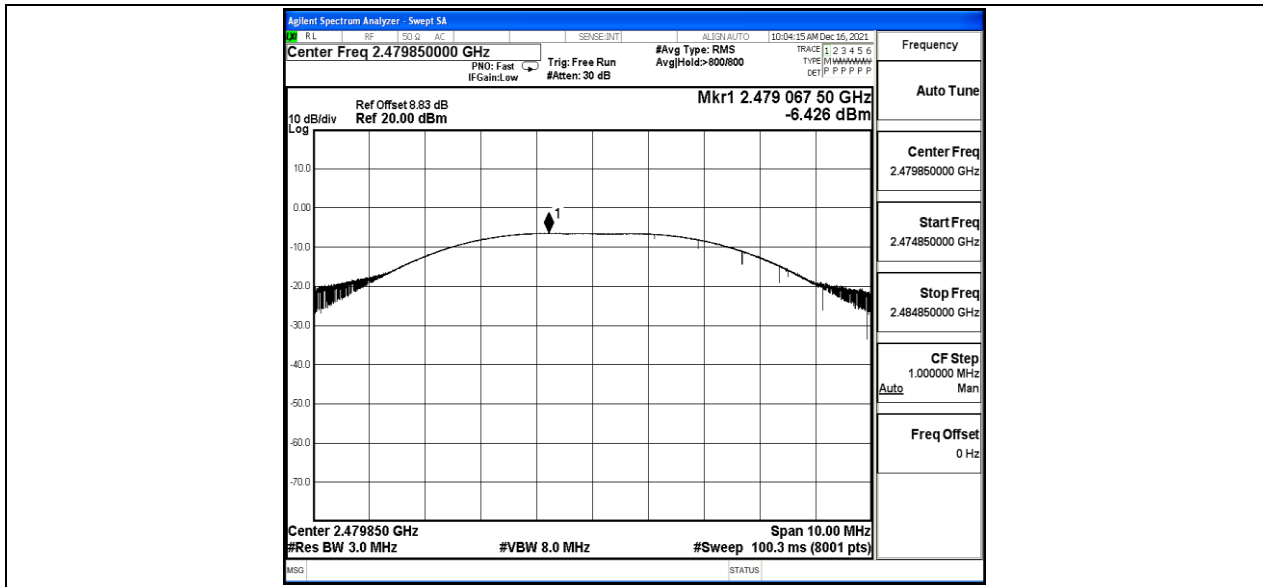
2.4G_Ant1_2403.85



2.4G_Ant1_2441.85



2.4G_Ant1_2479.85





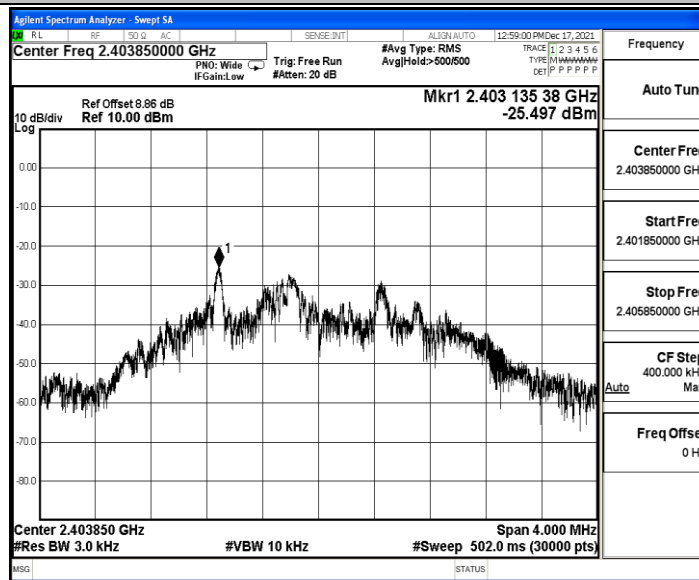
A.3 Maximum power spectral density

Test Result

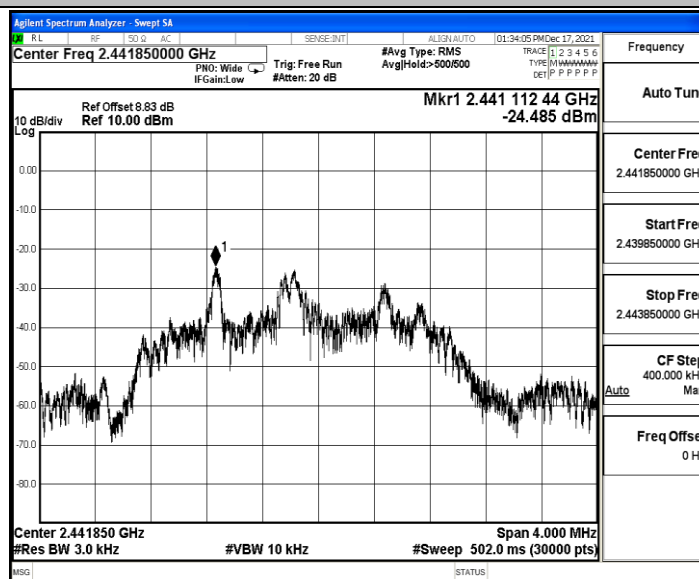
TestMode	Antenna	Channel	Result[dBm/3kHz]	Limit[dBm/3kHz]	Verdict
2.4G	Ant1	2403.85	-25.5	≤8.00	PASS
		2441.85	-24.49	≤8.00	PASS
		2479.85	-22.01	≤8.00	PASS

Test Graphs

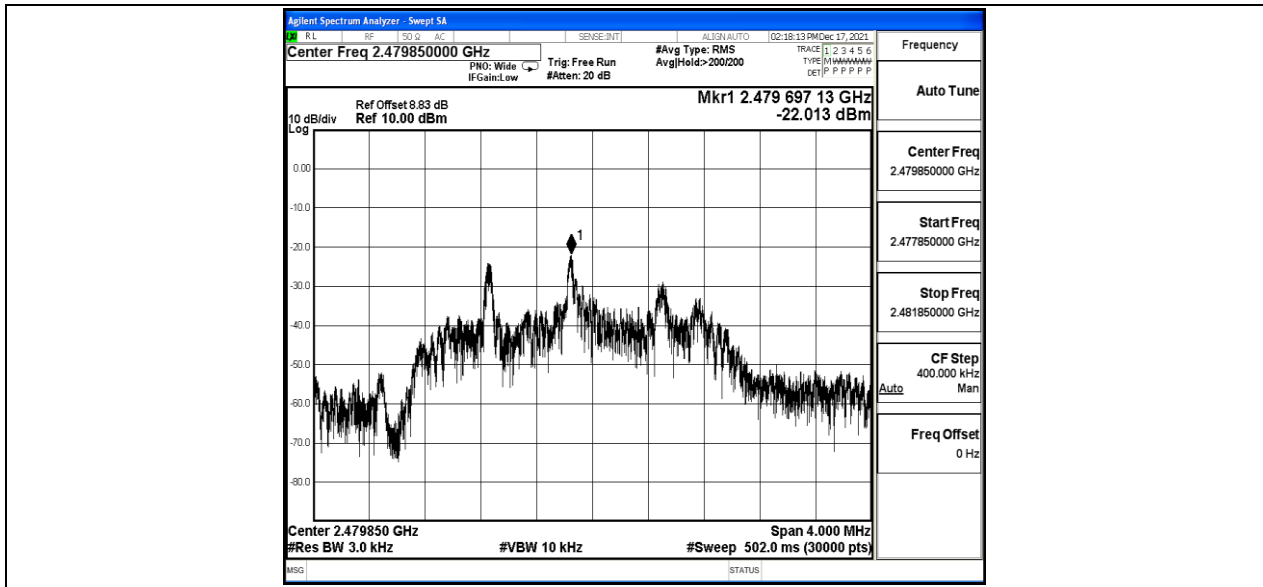
2.4G_Ant1_2403.85



2.4G_Ant1_2441.85



2.4G_Ant1_2479.85





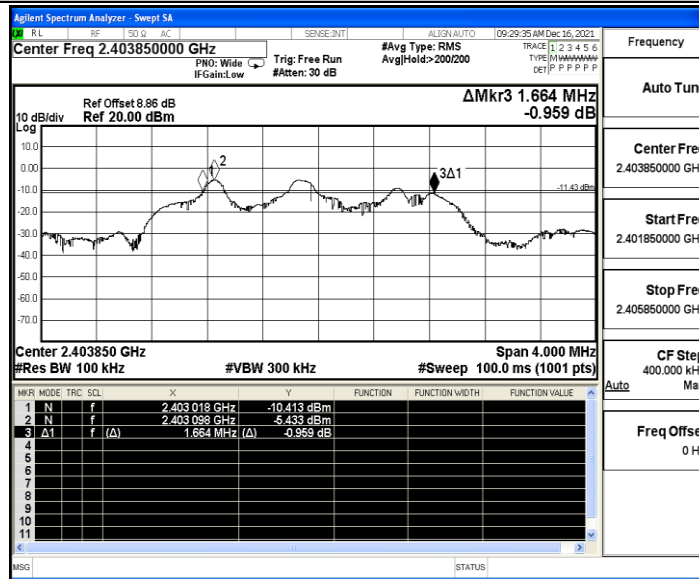
A.4.1 6dB Bandwidth

TestMode	Antenna	Channel	DTS BW [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
2.4G	Ant1	2403.85	1.664	2403.018	2404.682	0.5	PASS
		2441.85	1.736	2440.998	2442.734	0.5	PASS
		2479.85	1.788	2478.982	2480.770	0.5	PASS

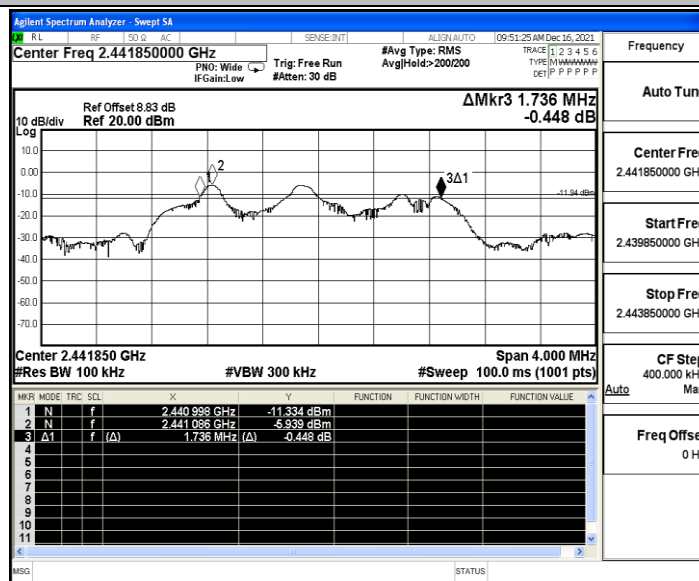


Test Graphs

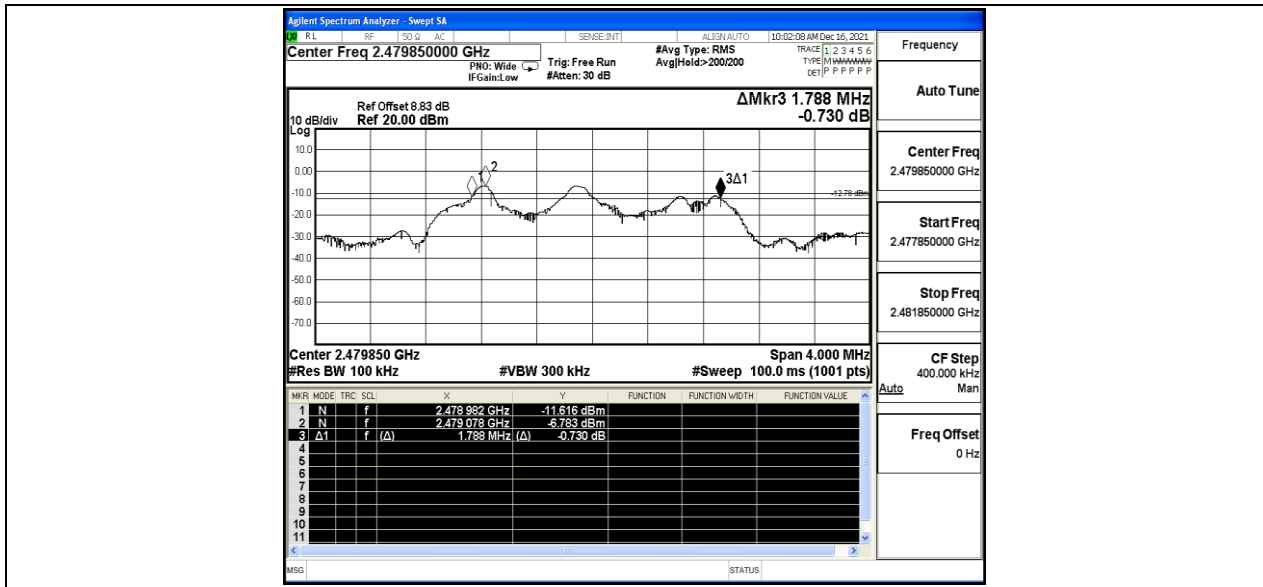
2.4G_Ant1_2403.85



2.4G_Ant1_2441.85



2.4G_Ant1_2479.85



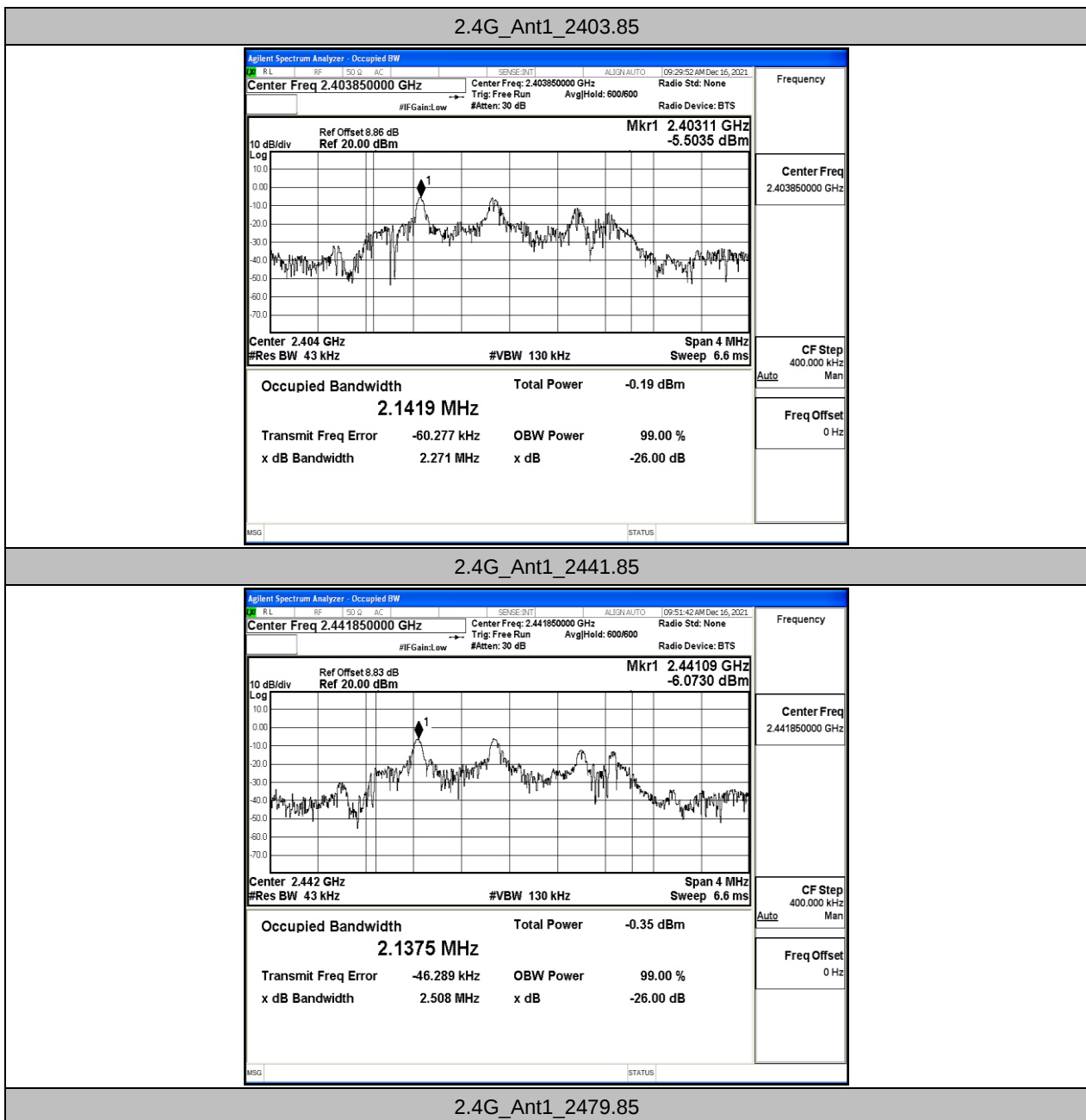


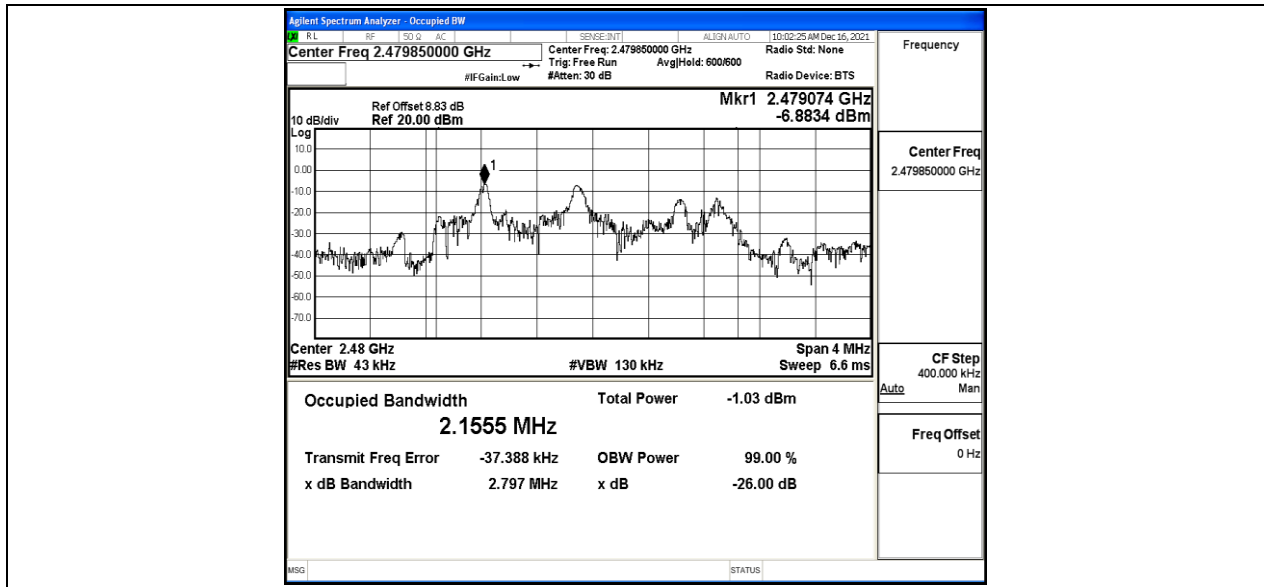
A.4.2 Occupied Channel Bandwidth

Test Result

TestMode	Antenna	Channel	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
2.4G	Ant1	2403.85	2.1419	2402.719	2404.861	---	PASS
		2441.85	2.1375	2440.735	2442.872	---	PASS
		2479.85	2.1555	2478.735	2480.890	---	PASS

Test Graphs







A.5 Conducted Spurious Emission

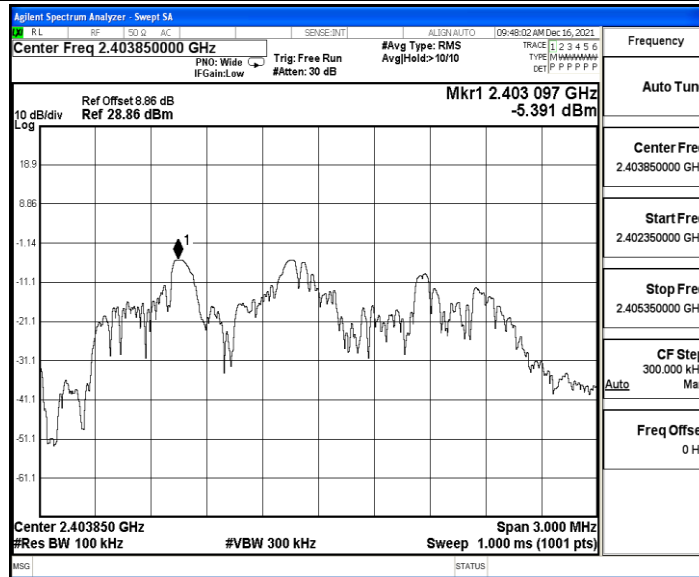
Test Result

TestMode	Antenna	Channel	FreqRange [MHz]	RefLevel [dBm]	Result[dBm]	Limit[dBm]	Verdict
2.4G	Ant1	2403.85	Reference	-5.39	-5.39	---	PASS
			30~1000	-5.39	-56.77	≤ -25.39	PASS
			1000~26500	-5.39	-45.66	≤ -25.39	PASS
		2441.85	Reference	-5.98	-5.98	---	PASS
			30~1000	-5.98	-60.2	≤ -25.98	PASS
			1000~26500	-5.98	-45.95	≤ -25.98	PASS
		2479.85	Reference	-6.80	-6.80	---	PASS
			30~1000	-6.80	-39.33	≤ -26.8	PASS
			1000~26500	-6.80	-45.97	≤ -26.8	PASS

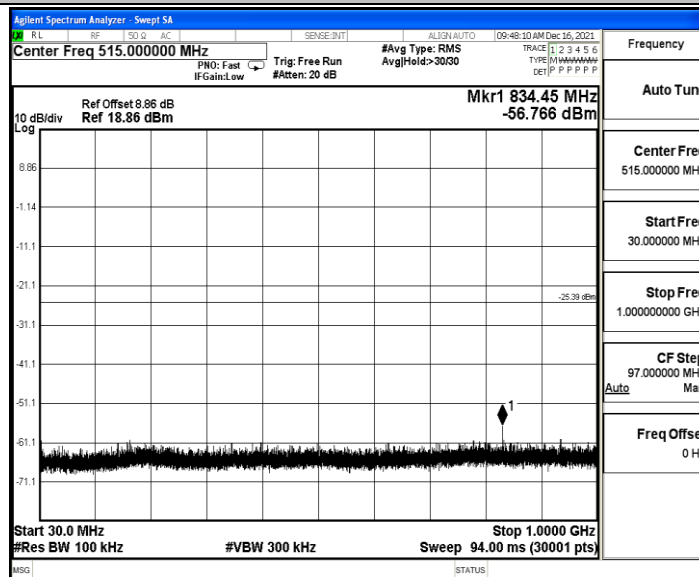


Test Graphs

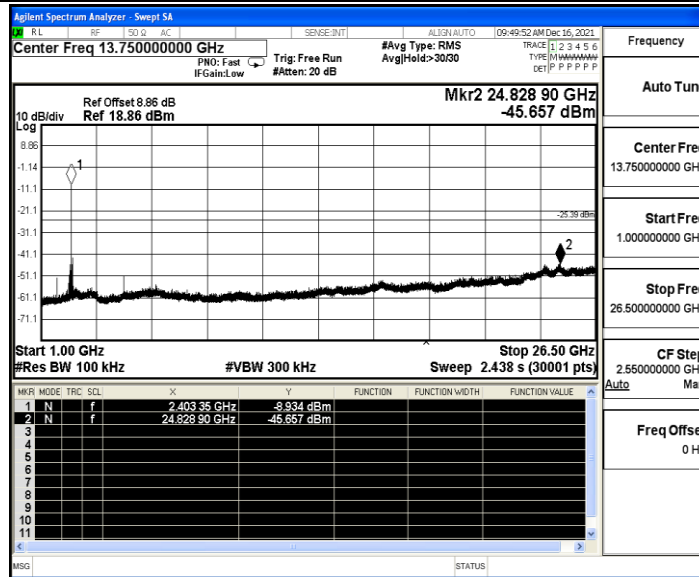
2.4G_Ant1_2403.85_0~Reference



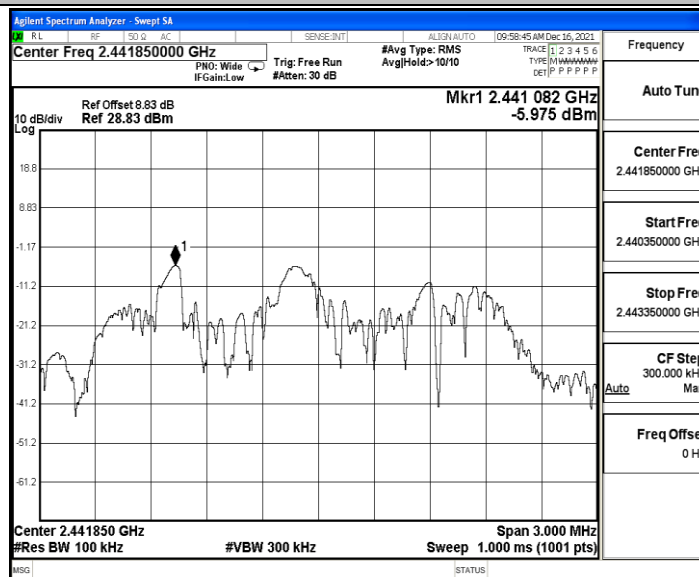
2.4G_Ant1_2403.85_30~1000



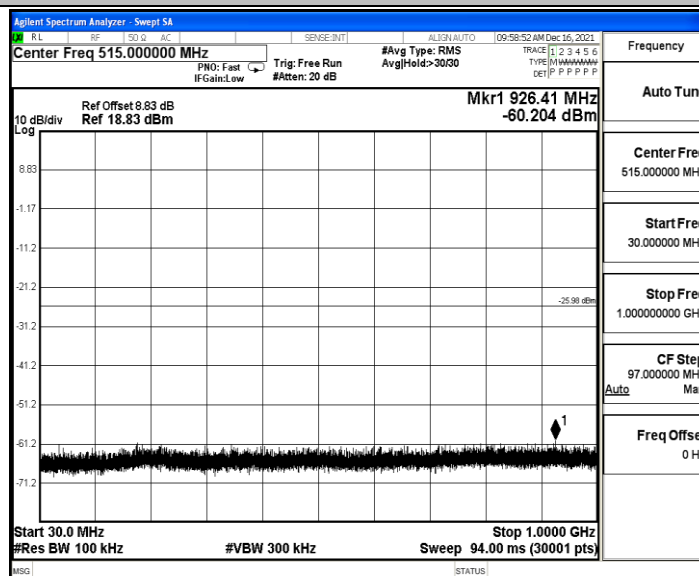
2.4G_Ant1_2403.85_1000~26500



2.4G_Ant1_2441.85_0~Reference

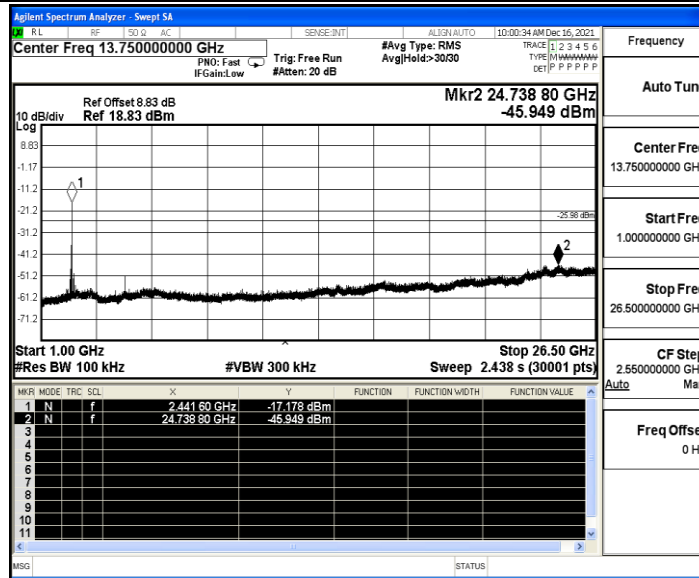


2.4G_Ant1_2441.85_30~1000

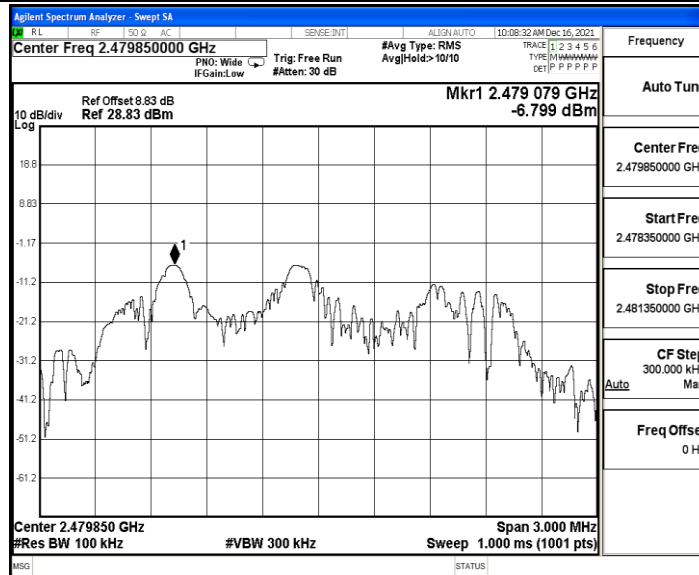




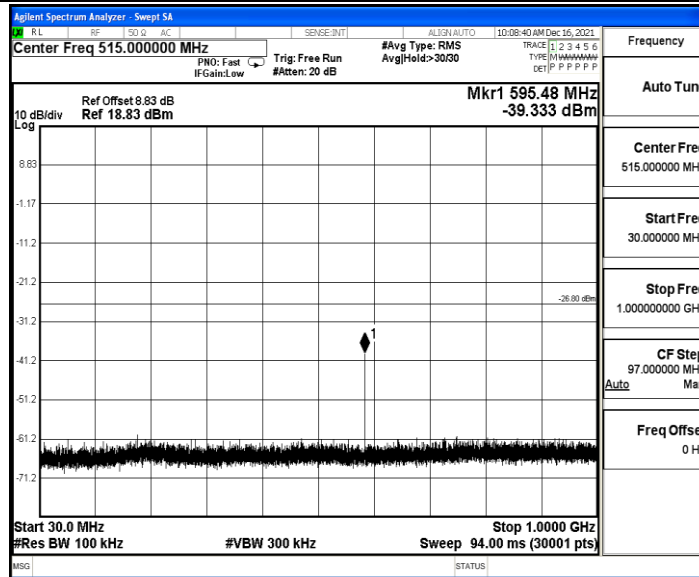
2.4G_Ant1_2441.85_1000~26500



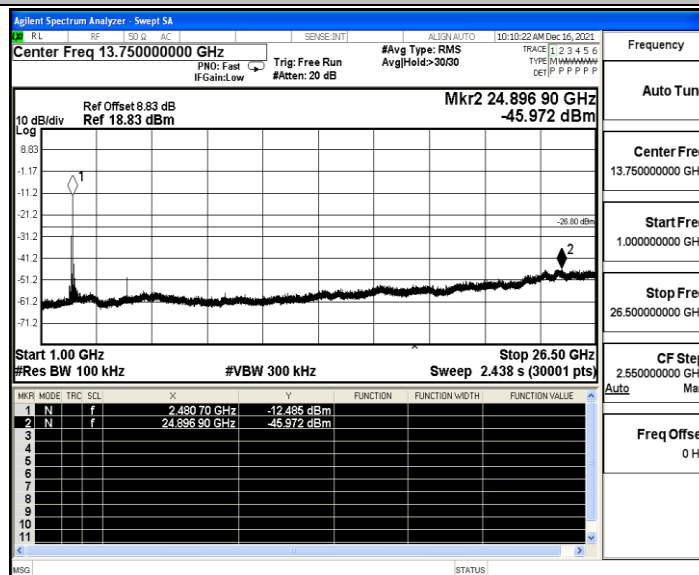
2.4G_Ant1_2479.85_0~Reference



2.4G_Ant1_2479.85_30~1000



2.4G_Ant1_2479.85_1000~26500



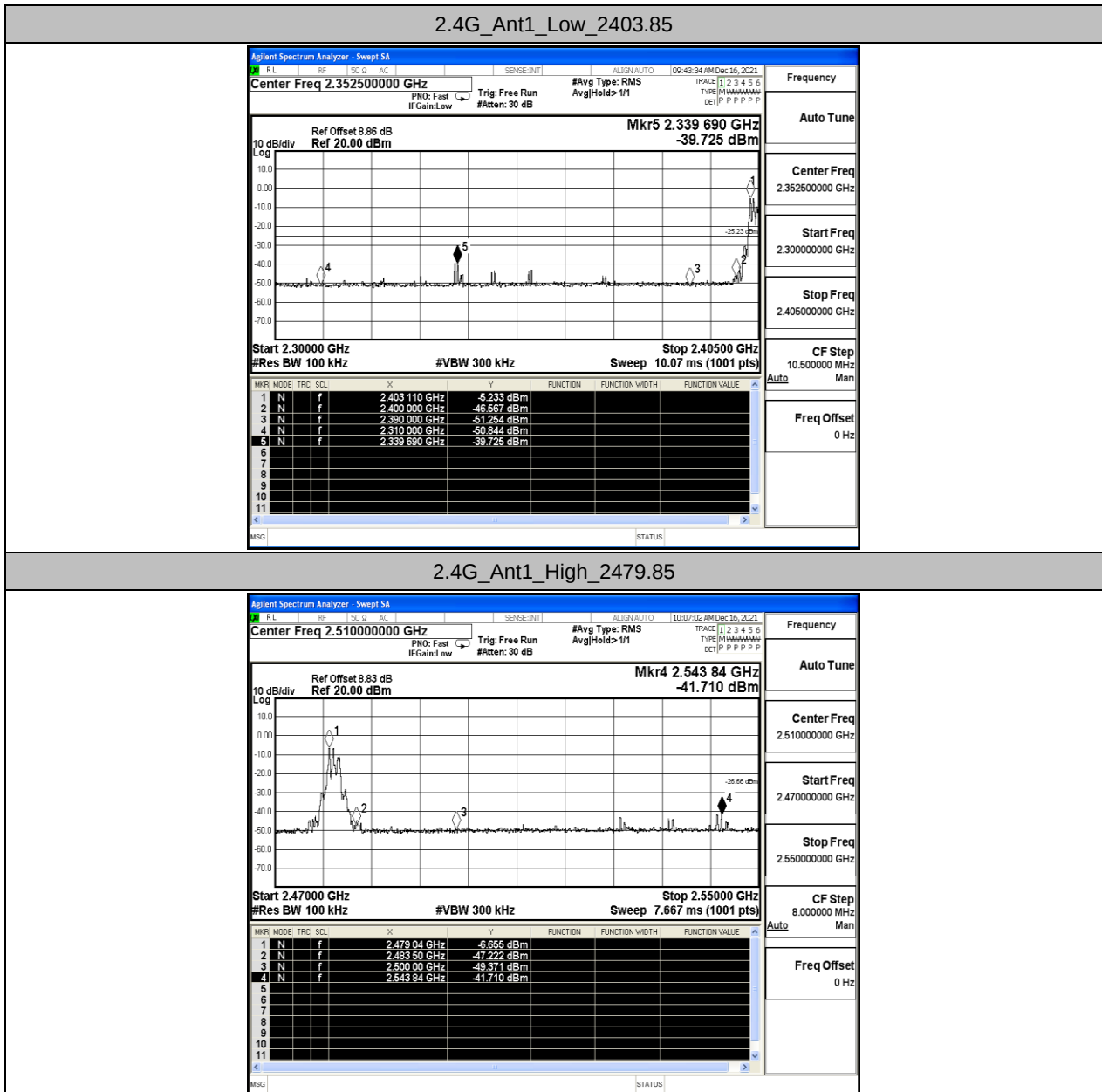


A.6 Band edge measurements

Test Result

TestMode	Antenna	ChName	Channel	RefLevel[dBm]	Result[dBm]	Limit[dBm]	Verdict
2.4G	Ant1	Low	2403.85	-5.23	-39.73	≤-25.23	PASS
		High	2479.85	-6.66	-41.71	≤-26.66	PASS

Test Graphs





A.7 Emissions in Restricted Bands

Test Result

TestMode	Antenna	ChName	Channel	Detector	Freq. [MHz]	Result [dBm]	Limit [dBm]	Result [dBuV/m]	Limit [dBuV/m]	Verdict
2.4G	Ant1	Low	2403.85	AV	2310.000	-45.81	≤-41.20	49.39	≤54	PASS
				AV	2366.465	-45.14	≤-41.20	50.06	≤54	PASS
				AV	2390.000	-45.38	≤-41.20	49.82	≤54	PASS
				Peak	2310.000	-38.8	≤-21.20	56.40	≤74	PASS
				Peak	2369.930	-36.15	≤-21.20	59.05	≤74	PASS
				Peak	2390.000	-38.09	≤-21.20	57.11	≤74	PASS
		High	2479.85	AV	2483.500	-45.64	≤-41.20	49.56	≤54	PASS
				AV	2498.160	-44.59	≤-41.20	50.61	≤54	PASS
				AV	2500.000	-45.42	≤-41.20	49.78	≤54	PASS
				Peak	2483.500	-37.35	≤-21.20	57.85	≤74	PASS
				Peak	2486.880	-36.23	≤-21.20	58.97	≤74	PASS
				Peak	2500.000	-37.53	≤-21.20	57.67	≤74	PASS

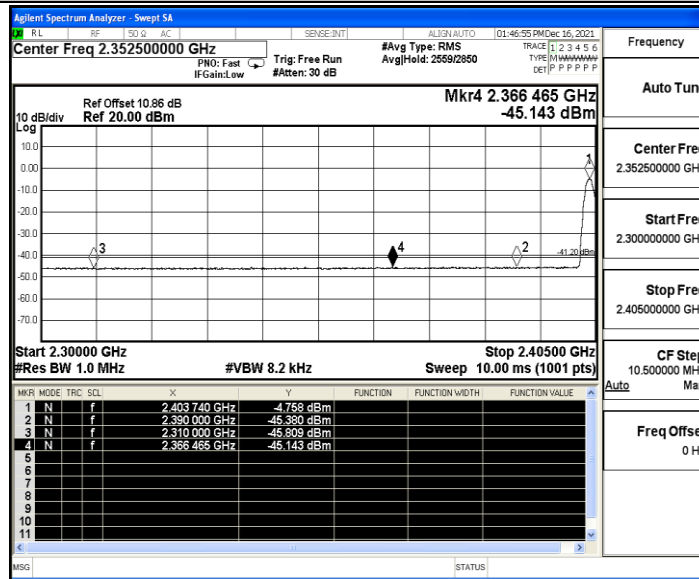
Note:

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.

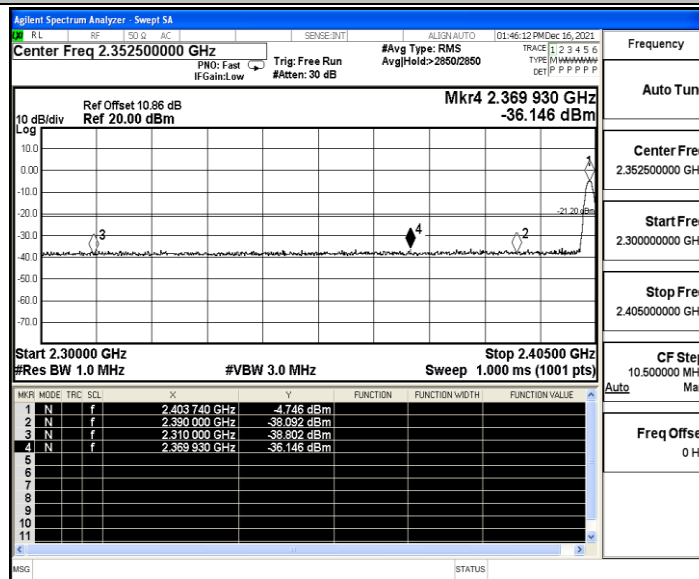


Test Graphs

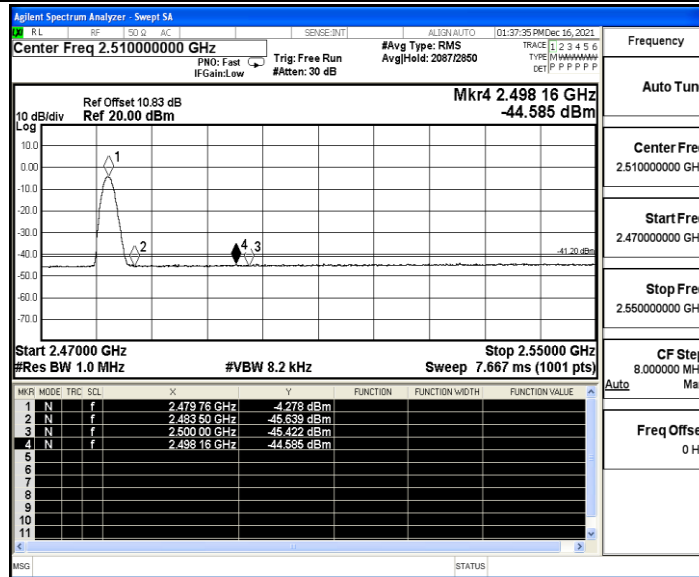
2.4G_Ant1_Low_2403.85_AV



2.4G_Ant1_Low_2403.85_Peak



2.4G_Ant1_High_2479.85_AV



2.4G_Ant1_High_2479.85_Peak

