

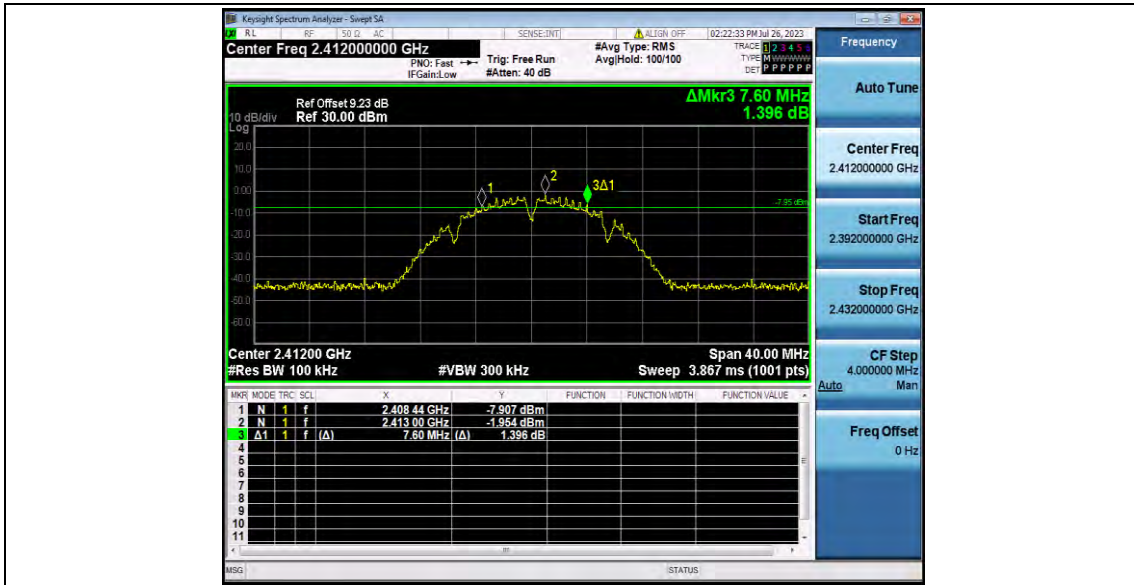
Case No. : <u>GTS20230525012-1-7</u>
Ambient Condition: <u>23</u> °C, <u>49</u> %RH, Atmos100.1Kpa,
Test Date: <u>2023.7.26</u> Test Engineer: <u>Evan Ouyang</u>

Appendix A.1: DTS Bandwidth

Test Result

Test Mode	Antenna	Frequency[MHz]	DTS BW [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
11B	Ant1	2412	7.600	2408.440	2416.040	0.5	PASS
		2437	7.600	2433.440	2441.040	0.5	PASS
		2462	7.600	2458.440	2466.040	0.5	PASS
11G	Ant1	2412	15.360	2404.440	2419.800	0.5	PASS
		2437	15.080	2429.480	2444.560	0.5	PASS
		2462	14.280	2455.280	2469.560	0.5	PASS
11N20SISO	Ant1	2412	16.080	2404.440	2420.520	0.5	PASS
		2437	15.360	2429.520	2444.880	0.5	PASS
		2462	13.840	2455.720	2469.560	0.5	PASS

Test Graphs



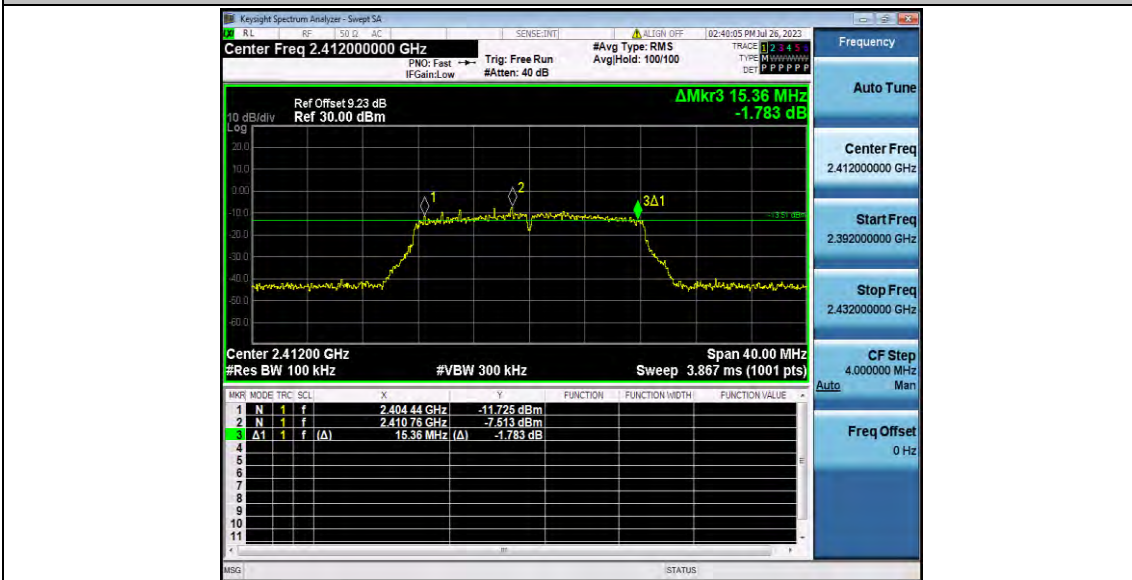
11B_Ant1_2412



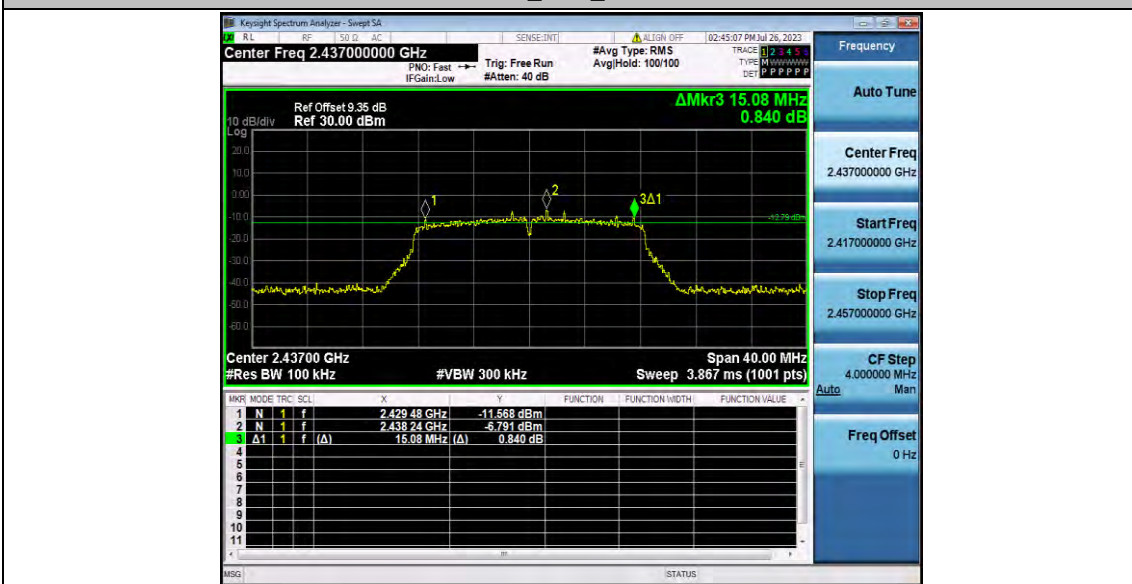
11B_Ant1_2437



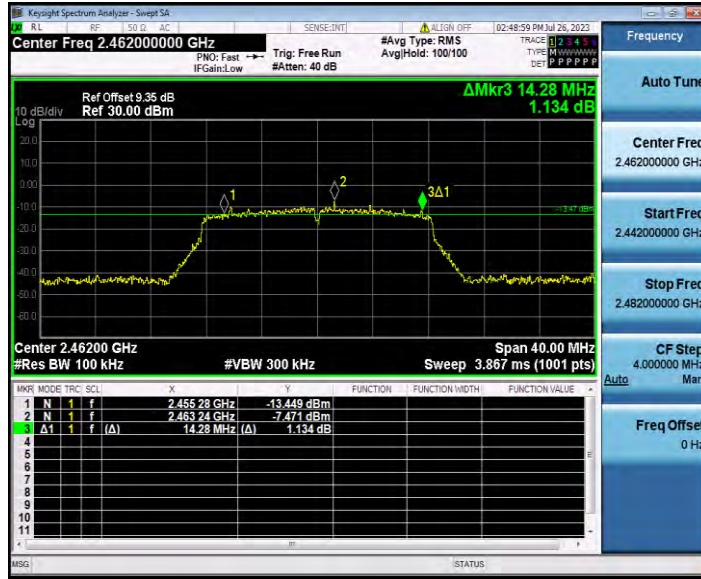
11B_Ant1_2462



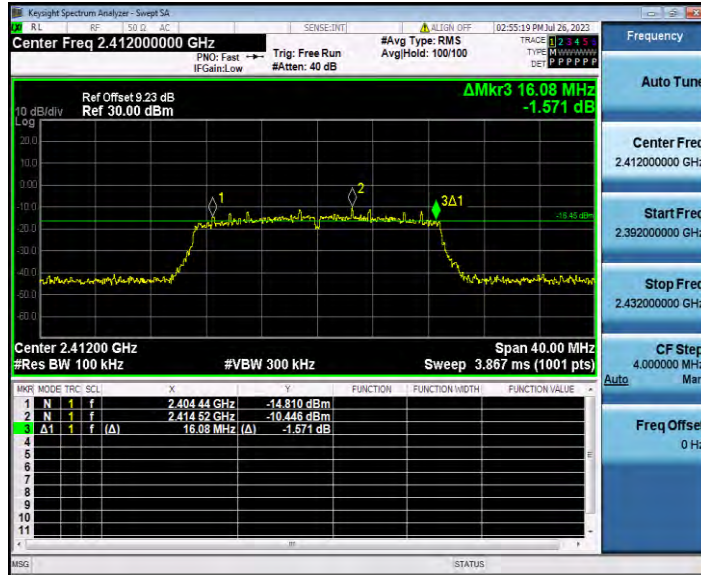
11G_Ant1_2412



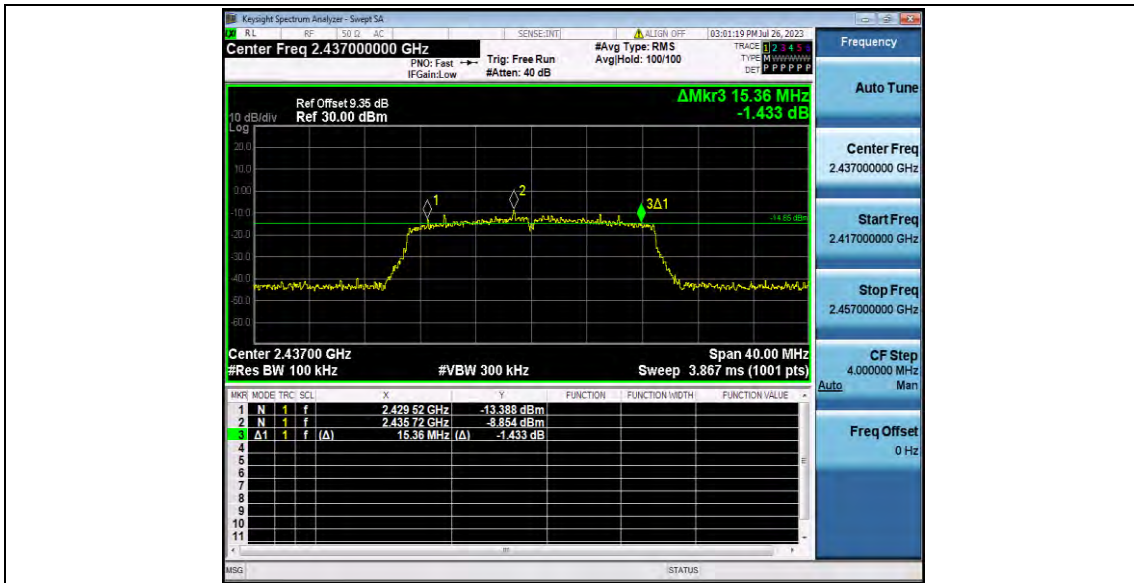
11G_Ant1_2437



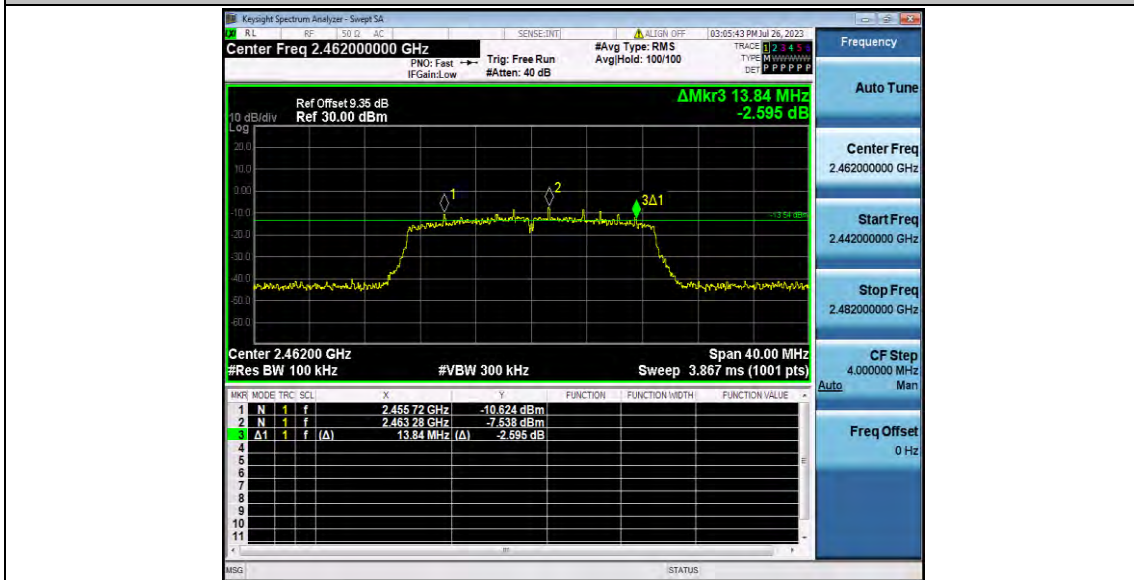
11G_Ant1_2462



11N20SISO_Ant1_2412



11N20SISO_Ant1_2437



11N20SISO_Ant1_2462

Appendix A.2: Occupied Channel Bandwidth

Test Result

Test Mode	Antenna	Channel Frequency[MHz]	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
11B	Ant1	2412	13.039	2405.562	2418.601	---	---
		2437	12.947	2430.597	2443.544	---	---
		2462	12.938	2455.583	2468.521	---	---
11G	Ant1	2412	16.916	2403.585	2420.501	---	---
		2437	16.861	2428.628	2445.489	---	---
		2462	16.877	2453.612	2470.489	---	---
11N20SISO	Ant1	2412	18.001	2403.078	2421.079	---	---
		2437	17.879	2428.142	2446.021	---	---
		2462	17.916	2453.097	2471.013	---	---

Test Graphs



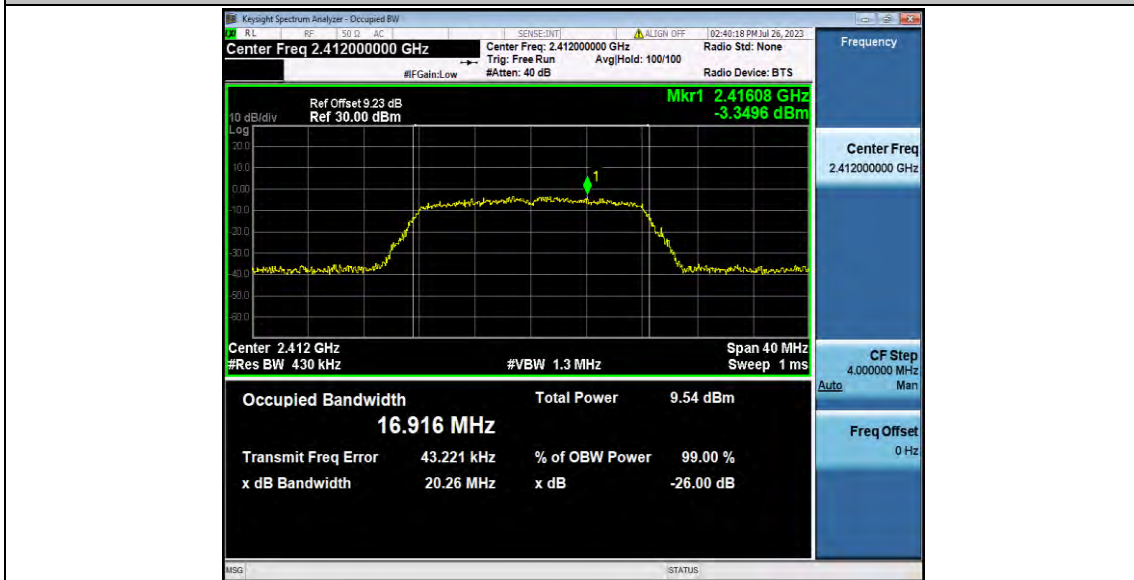
11B_Ant1_2412



11B_Ant1_2437



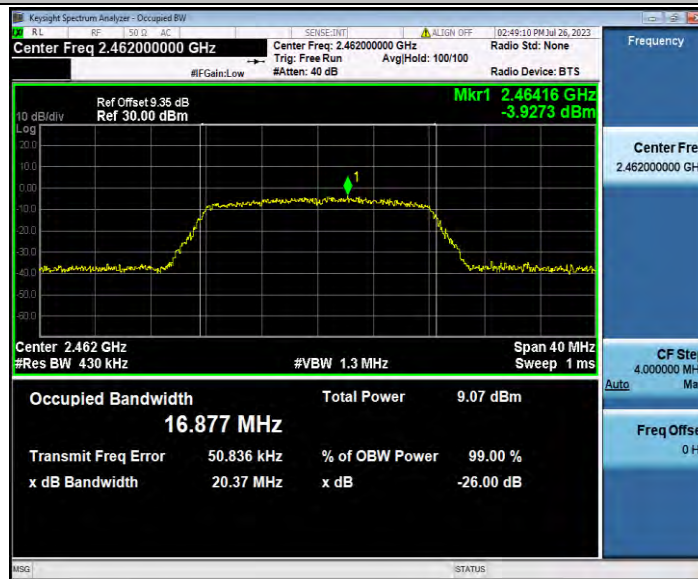
11B_Ant1_2462



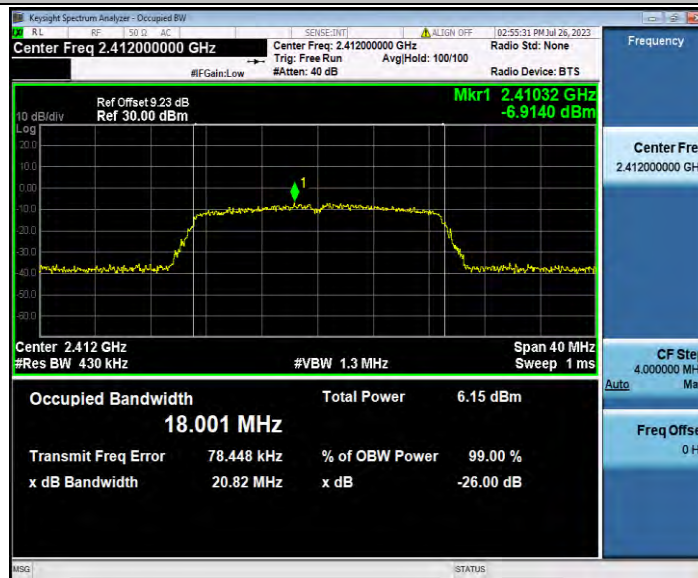
11G_Ant1_2412



11G_Ant1_2437



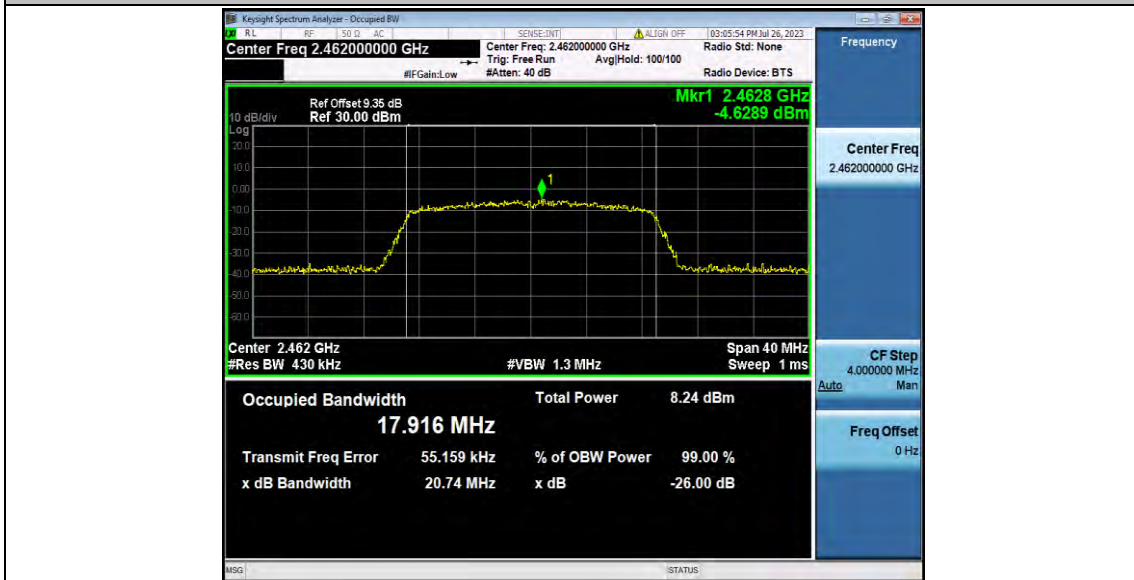
11G_Ant1_2462



11N20SISO_Ant1_2412



11N20SISO_Ant1_2437



11N20SISO_Ant1_2462

Appendix A.3: Maximum conducted output power

Test Result Peak

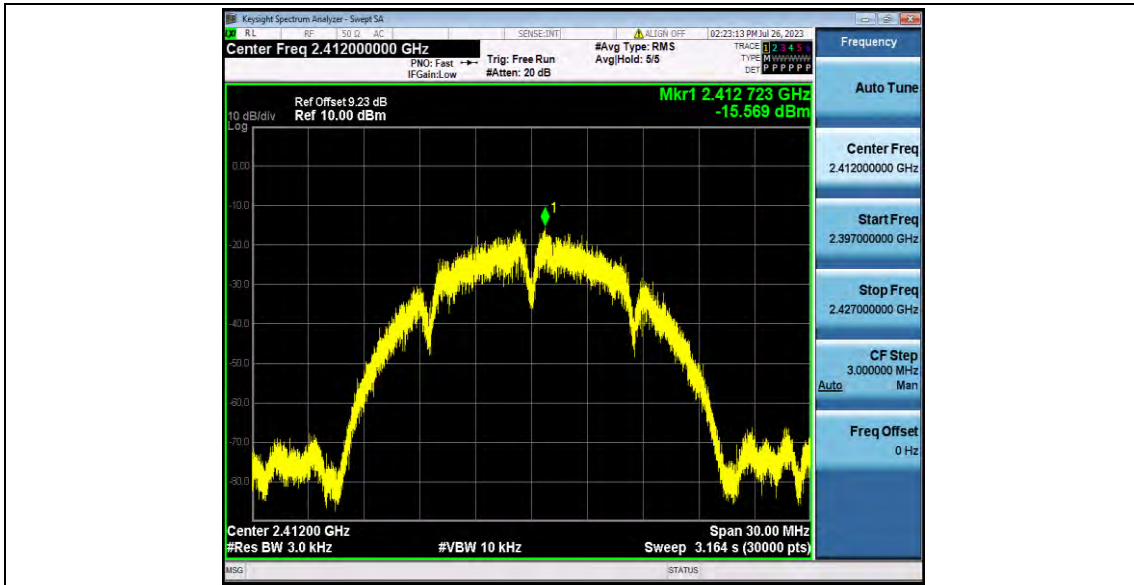
Test Mode	Antenna	Frequency[MHz]	Peak Power[dBm]	Conducted Limit[dBm]	Verdict
11B	Ant1	2412	8.51	≤30.00	PASS
		2437	8.72	≤30.00	PASS
		2462	8.80	≤30.00	PASS
11G	Ant1	2412	8.09	≤30.00	PASS
		2437	8.08	≤30.00	PASS
		2462	8.44	≤30.00	PASS
11N20SISO	Ant1	2412	8.37	≤30.00	PASS
		2437	8.07	≤30.00	PASS
		2462	8.42	≤30.00	PASS

Appendix A.4: Maximum power spectral density

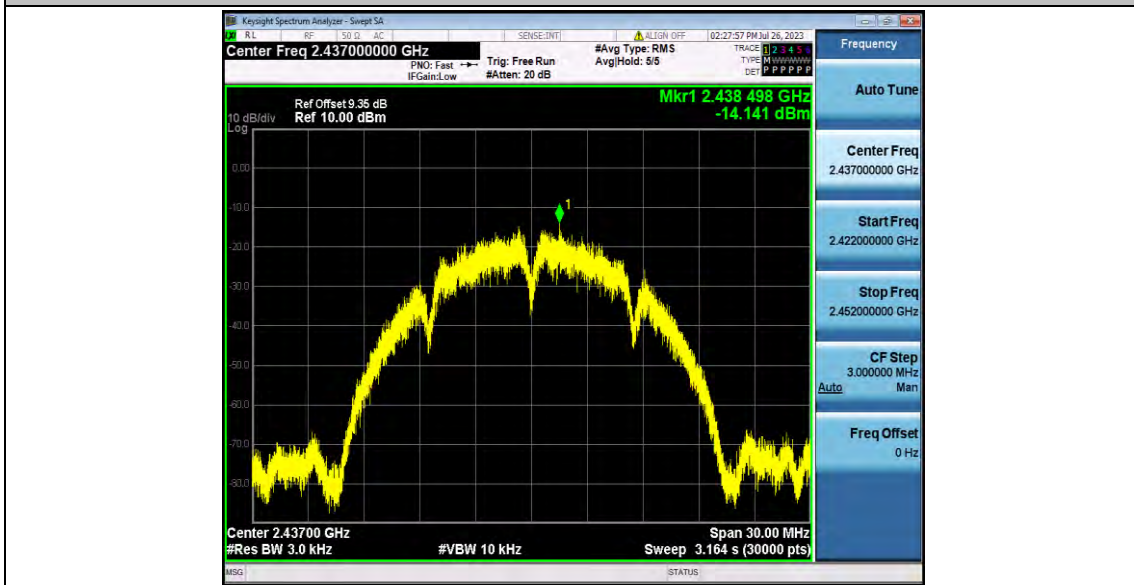
Test Result

Test Mode	Antenna	Frequency[MHz]	Result[dBm/3-100kHz]	Limit[dBm/3kHz]	Verdict
11B	Ant1	2412	-15.57	≤8.00	PASS
		2437	-14.14	≤8.00	PASS
		2462	-15.22	≤8.00	PASS
11G	Ant1	2412	-21.79	≤8.00	PASS
		2437	-20.79	≤8.00	PASS
		2462	-22.01	≤8.00	PASS
11N20SISO	Ant1	2412	-25.24	≤8.00	PASS
		2437	-22.8	≤8.00	PASS
		2462	-21.54	≤8.00	PASS

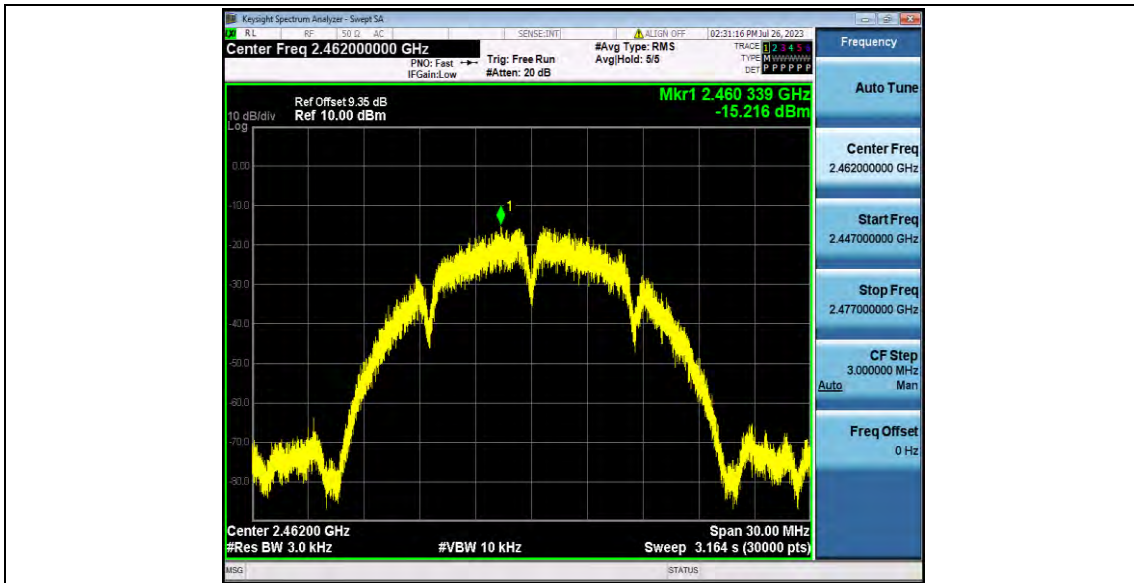
Test Graphs



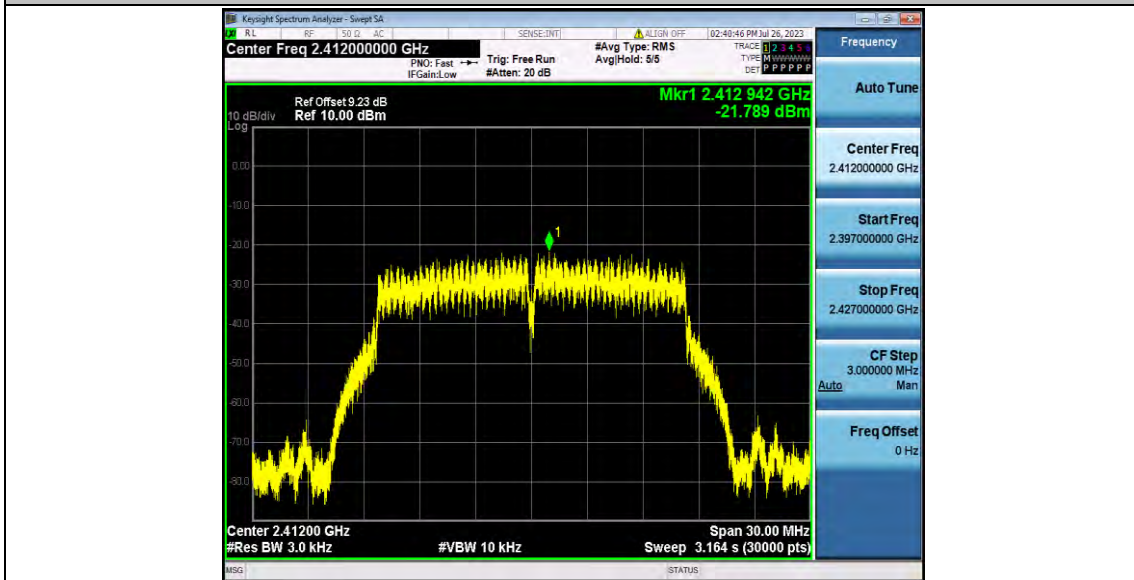
11B_Ant1_2412



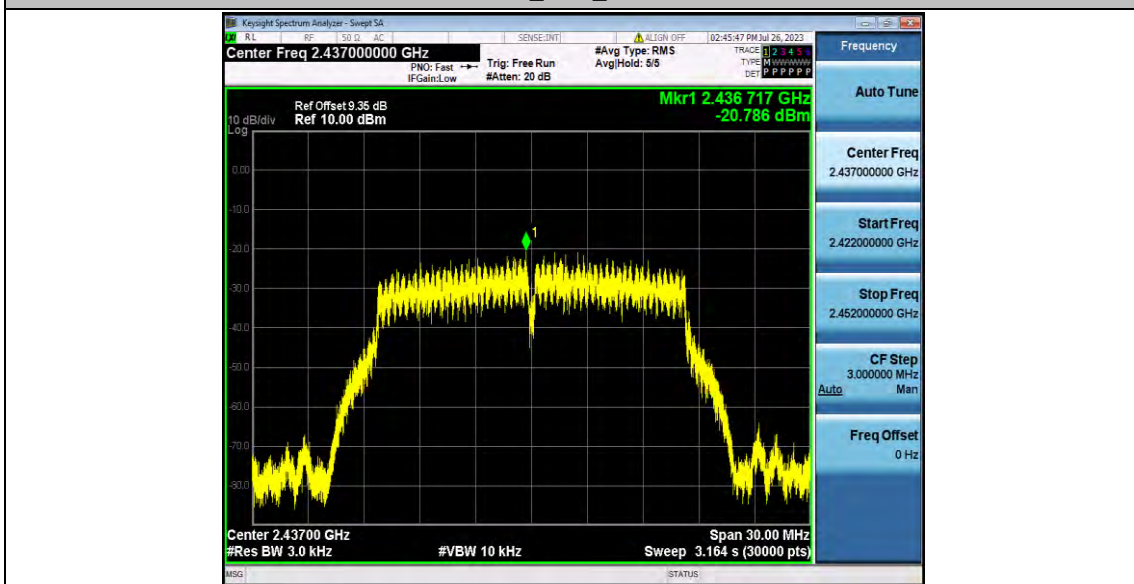
11B_Ant1_2437



11B_Ant1_2462



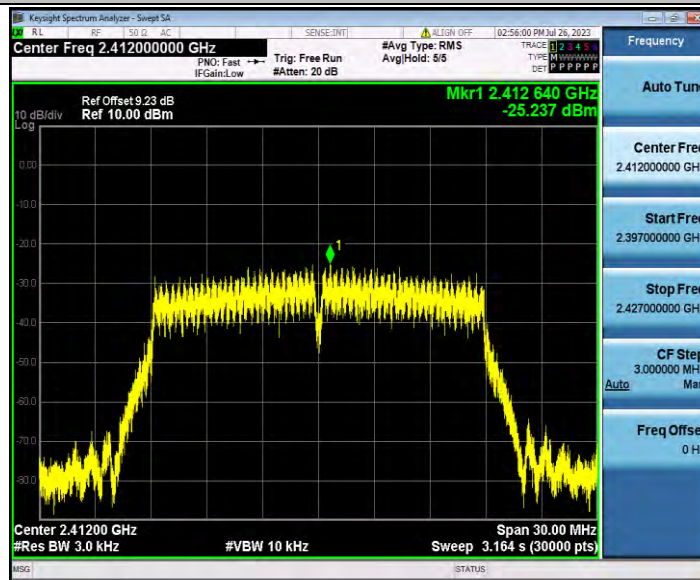
11G_Ant1_2412



11G_Ant1_2437



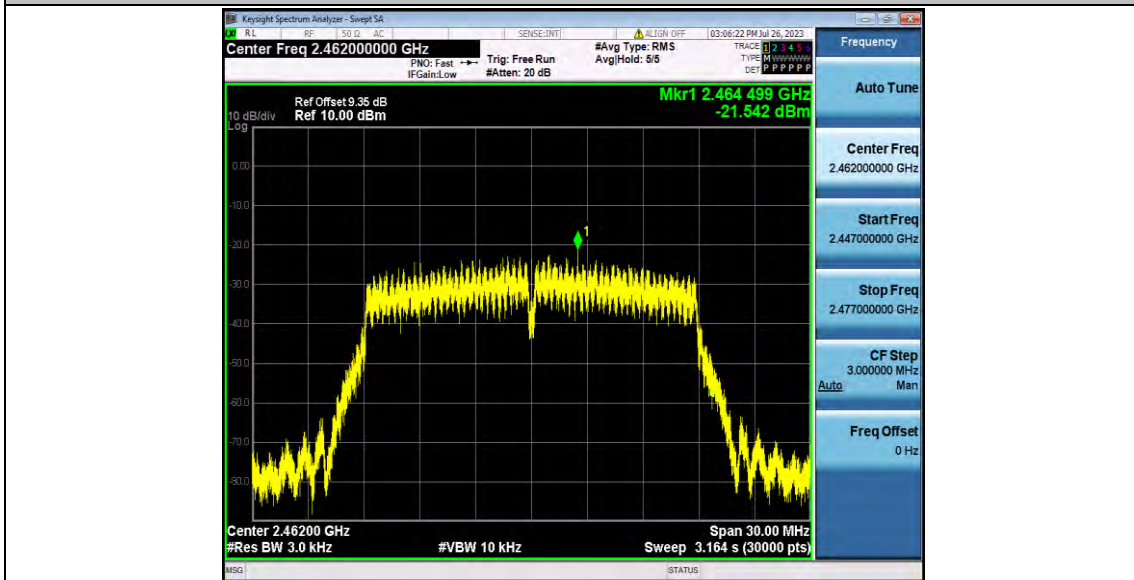
11G_Ant1_2462



11N20SISO_Ant1_2412



11N20SISO_Ant1_2437



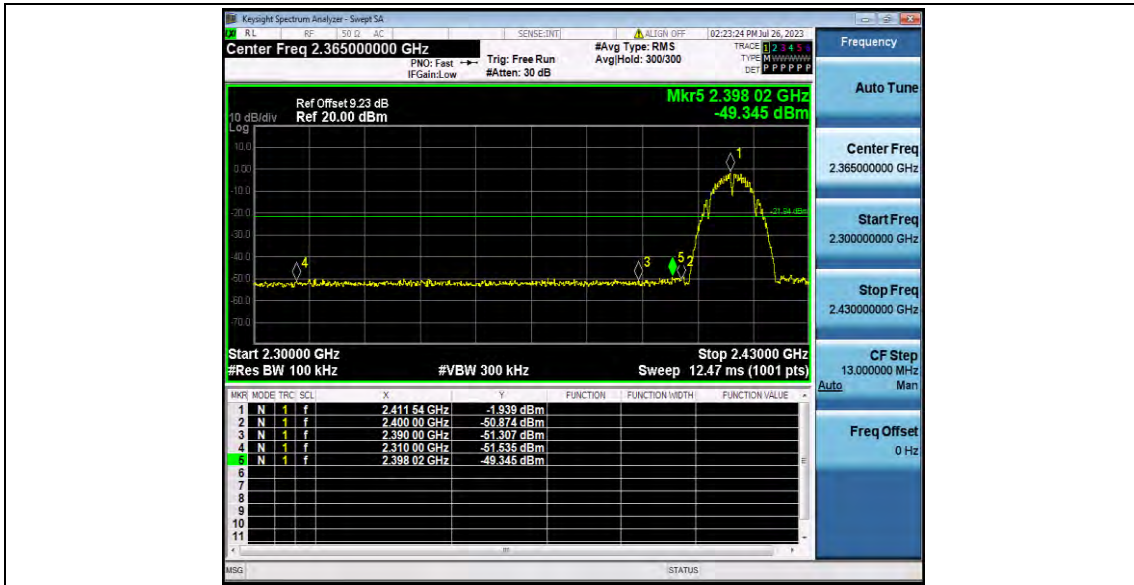
11N20SISO_Ant1_2462

Appendix A.5: Band edge measurements

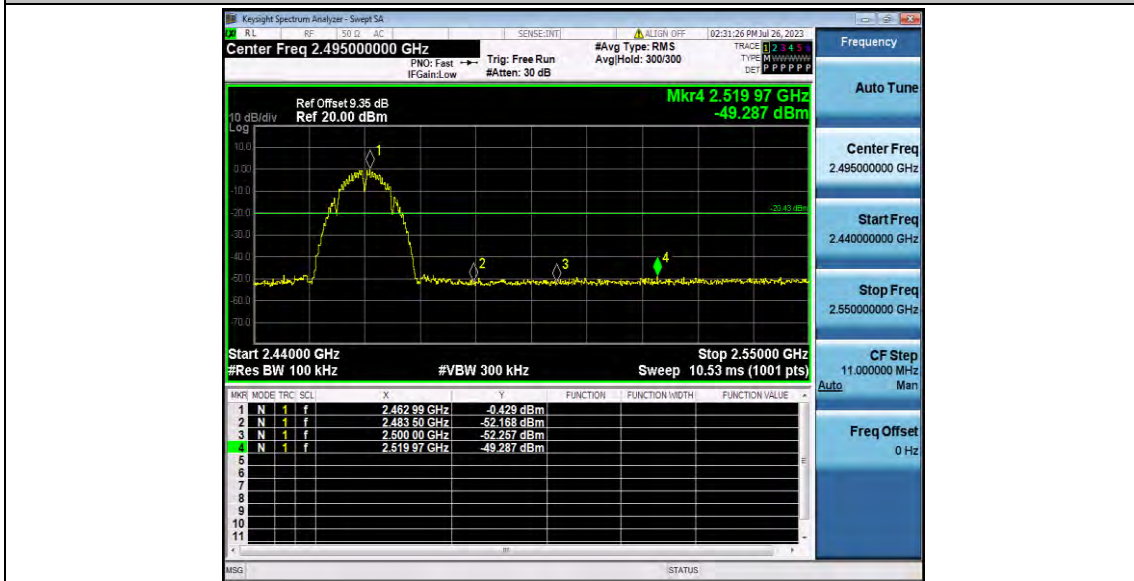
Test Result

Test Mode	Antenna	ChName	Frequency [MHz]	RefLevel[dBm]	Result[dBm]	Limit[dBm]	Verdict
11B	Ant1	Low	2412	-1.94	-49.35	≤ -21.94	PASS
		High	2462	-0.43	-49.29	≤ -20.43	PASS
11G	Ant1	Low	2412	-7.27	-48.95	≤ -27.27	PASS
		High	2462	-7.53	-48.61	≤ -27.53	PASS
11N20SISO	Ant1	Low	2412	-9.87	-49.32	≤ -29.87	PASS
		High	2462	-7.59	-49.06	≤ -27.59	PASS

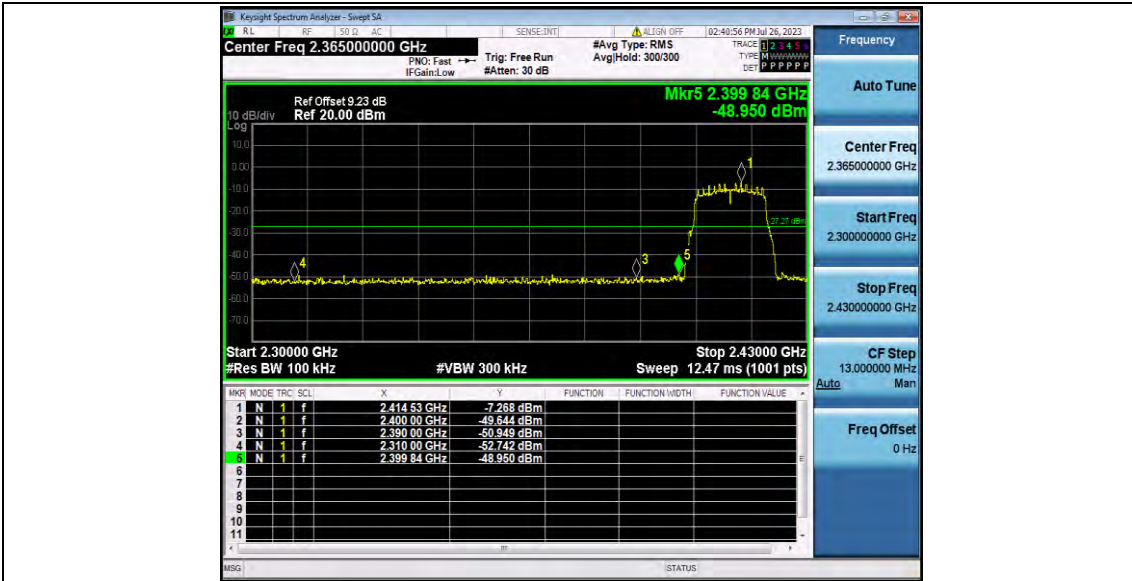
Test Graphs



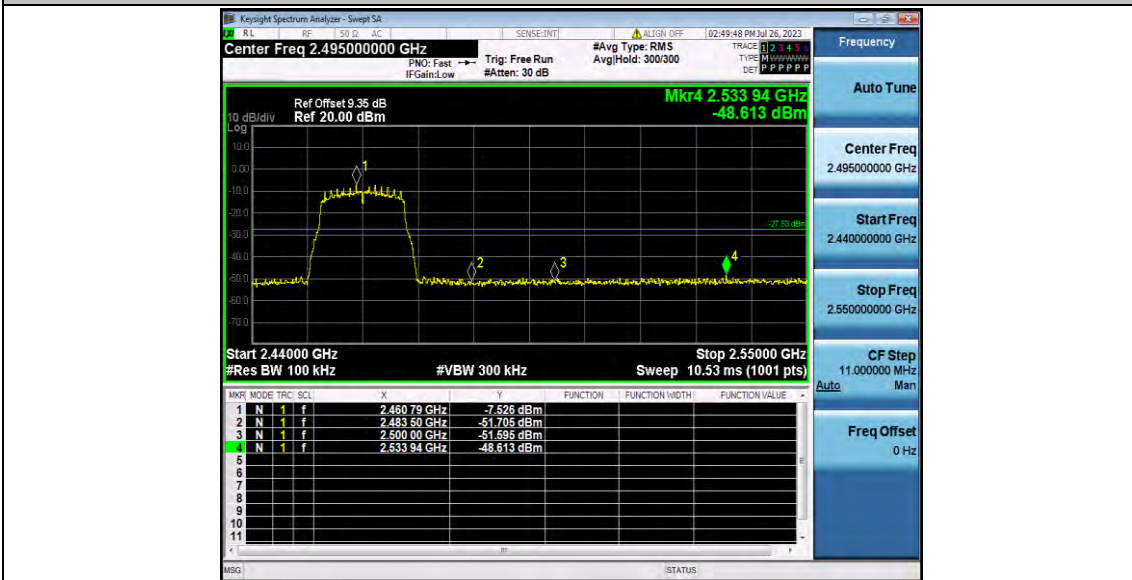
11B_Ant1_Low_2412



11B_Ant1_High_2462



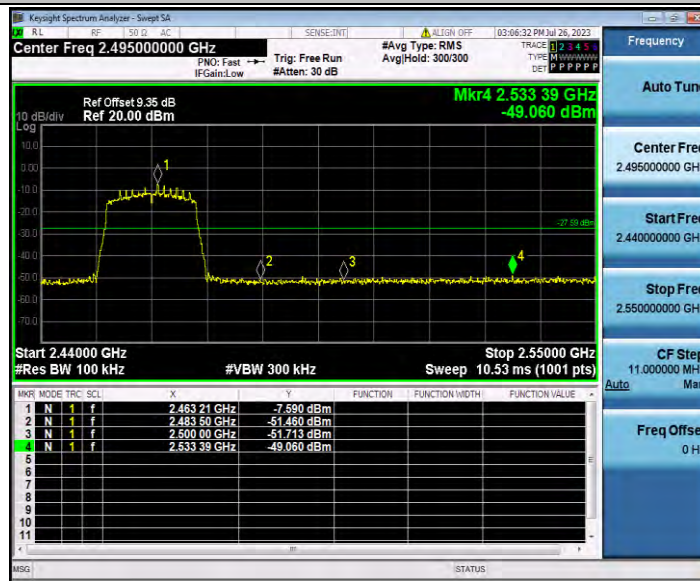
11G_Ant1_Low_2412



11G_Ant1_High_2462



11N20SISO_Ant1_Low_2412



11N20SISO_Ant1_High_2462

Appendix A.6: Conducted Spurious Emission

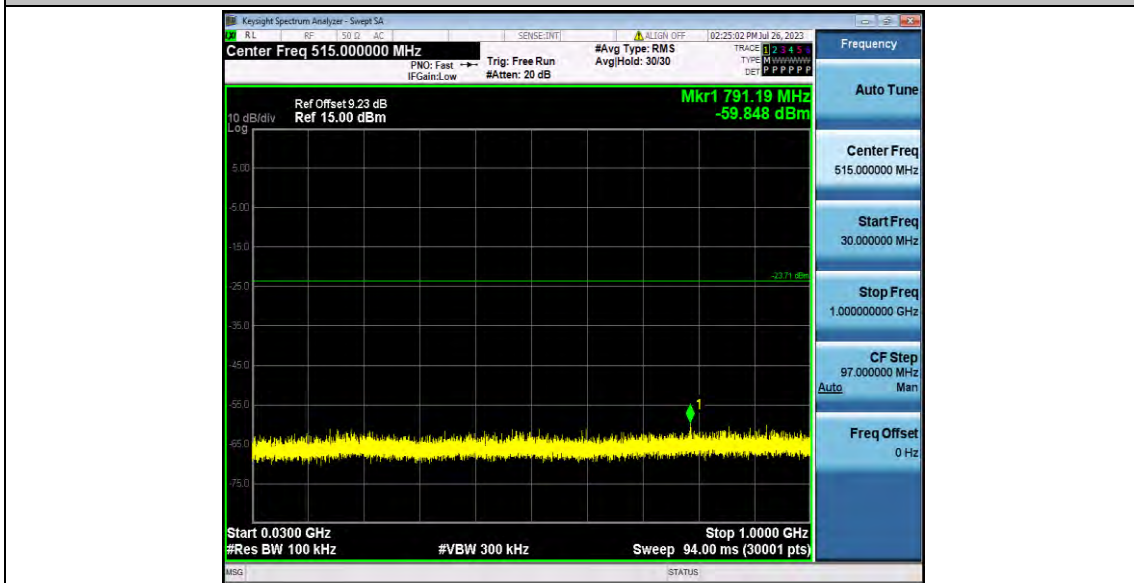
Test Result

Test Mode	Antenna	Frequency[MHz]	FreqRange [Mhz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
11B	Ant1	2412	Reference	-3.71	-3.71	---	PASS
			30~1000	-3.71	-59.85	≤-23.71	PASS
			1000~26500	-3.71	-47.71	≤-23.71	PASS
		2437	Reference	-2.27	-2.27	---	PASS
			30~1000	-2.27	-60.65	≤-22.27	PASS
			1000~26500	-2.27	-47.78	≤-22.27	PASS
		2462	Reference	-1.59	-1.59	---	PASS
			30~1000	-1.59	-60.43	≤-21.59	PASS
			1000~26500	-1.59	-47.85	≤-21.59	PASS
11G	Ant1	2412	Reference	-10.32	-10.32	---	PASS
			30~1000	-10.32	-59.61	≤-30.32	PASS
			1000~26500	-10.32	-47.74	≤-30.32	PASS
		2437	Reference	-10.08	-10.08	---	PASS
			30~1000	-10.08	-59.95	≤-30.08	PASS
			1000~26500	-10.08	-47.57	≤-30.08	PASS
		2462	Reference	-8.52	-8.52	---	PASS
			30~1000	-8.52	-60.7	≤-28.52	PASS
			1000~26500	-8.52	-45.81	≤-28.52	PASS
11N20SISO	Ant1	2412	Reference	-11.90	-11.90	---	PASS
			30~1000	-11.90	-59.91	≤-31.9	PASS
			1000~26500	-11.90	-47.59	≤-31.9	PASS
		2437	Reference	-11.51	-11.51	---	PASS
			30~1000	-11.51	-60	≤-31.51	PASS
			1000~26500	-11.51	-47.47	≤-31.51	PASS
		2462	Reference	-9.76	-9.76	---	PASS
			30~1000	-9.76	-60.46	≤-29.76	PASS
			1000~26500	-9.76	-47.45	≤-29.76	PASS

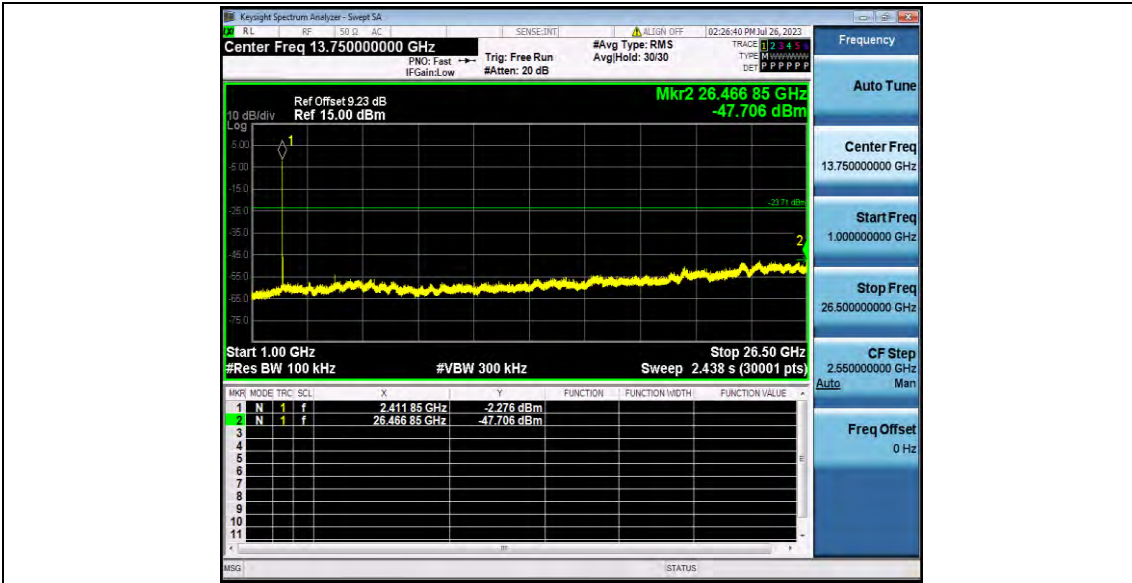
Test Graphs



11B_Ant1_2412_0~Reference



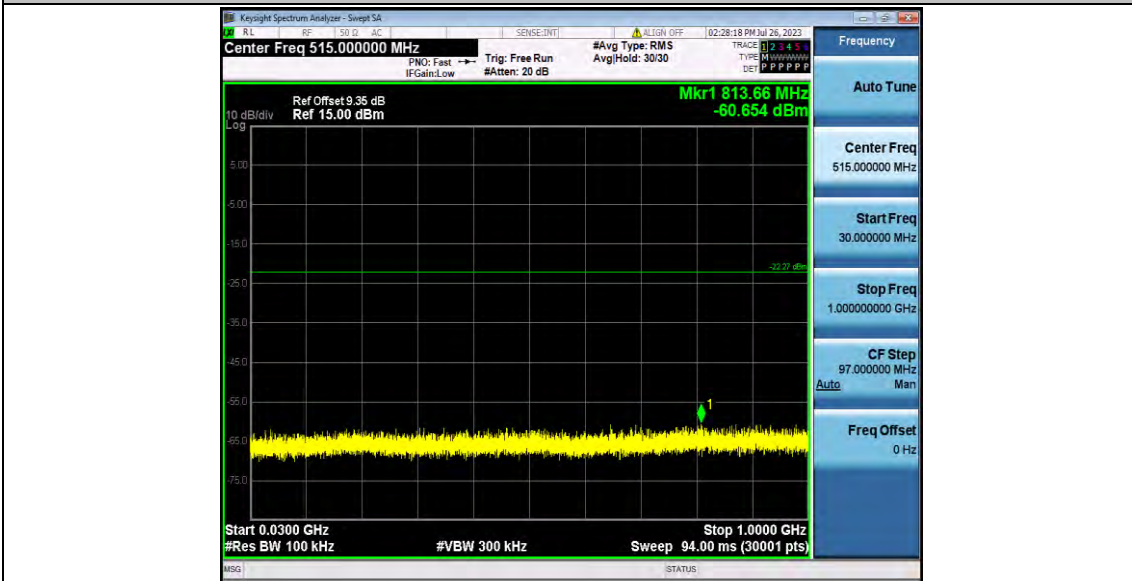
11B_Ant1_2412_30~1000



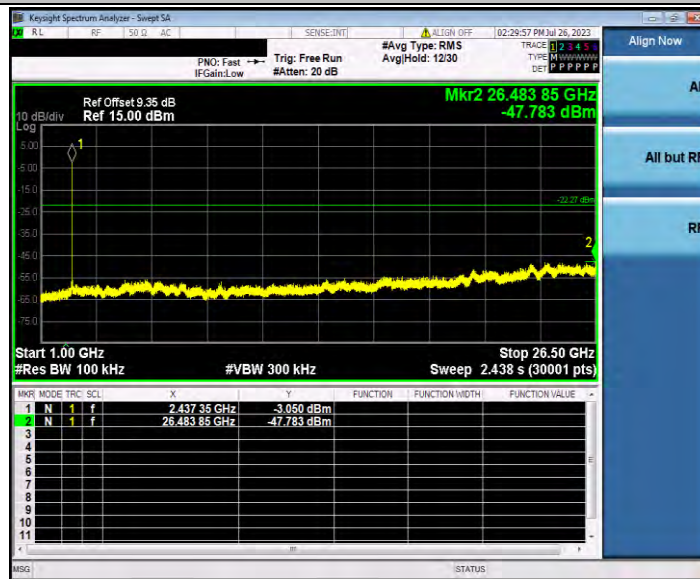
11B_Ant1_2412_1000~26500



11B_Ant1_2437_0~Reference



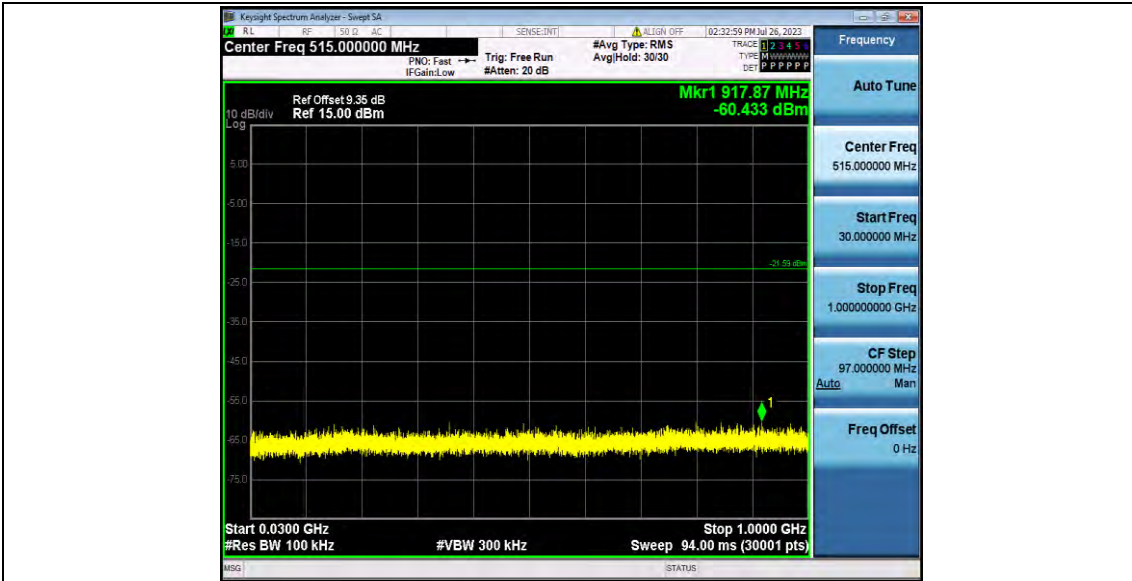
11B_Ant1_2437_30~1000



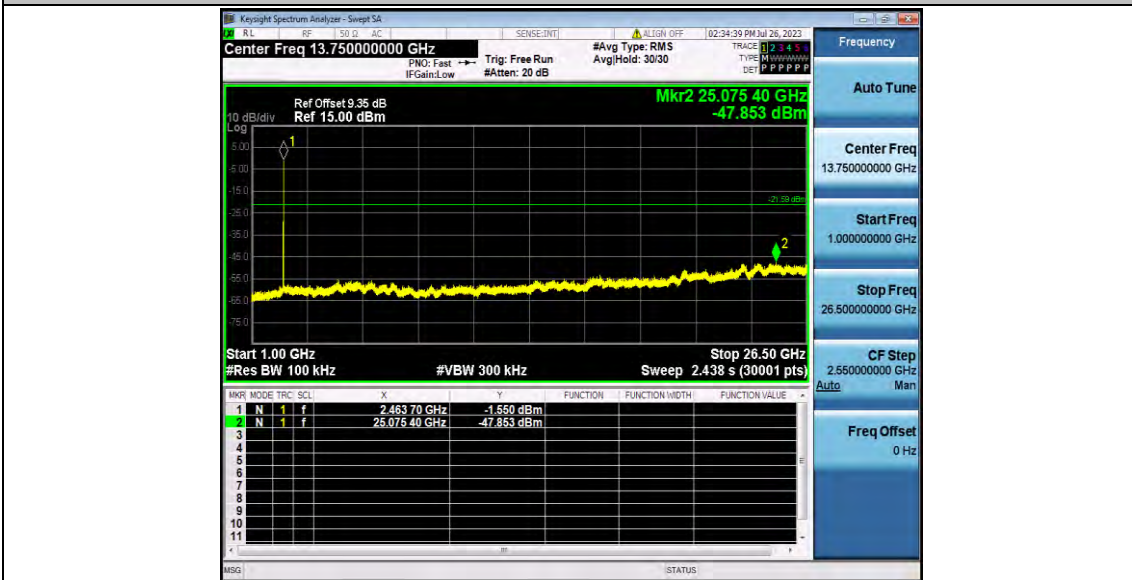
11B_Ant1_2437_1000~26500



11B_Ant1_2462_0~Reference



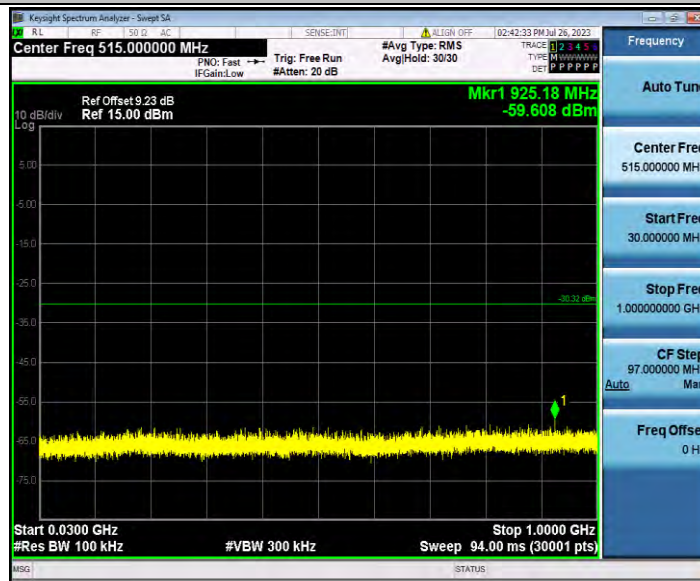
11B_Ant1_2462_30~1000



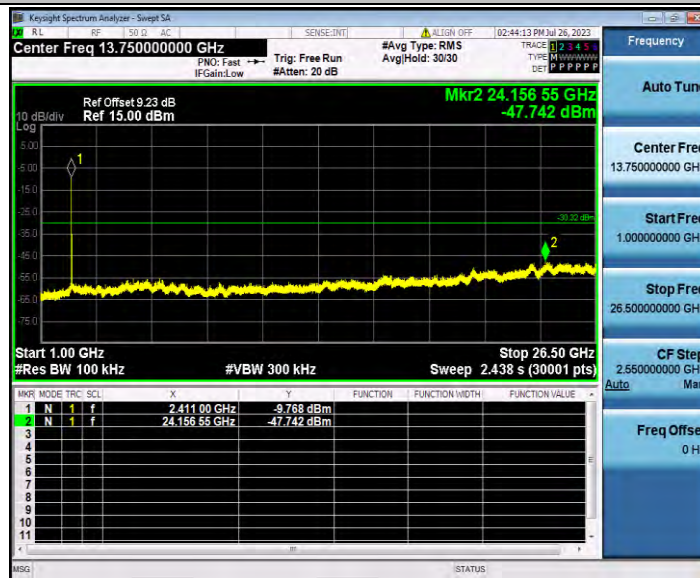
11B_Ant1_2462_1000~26500



11G_Ant1_2412_0~Reference



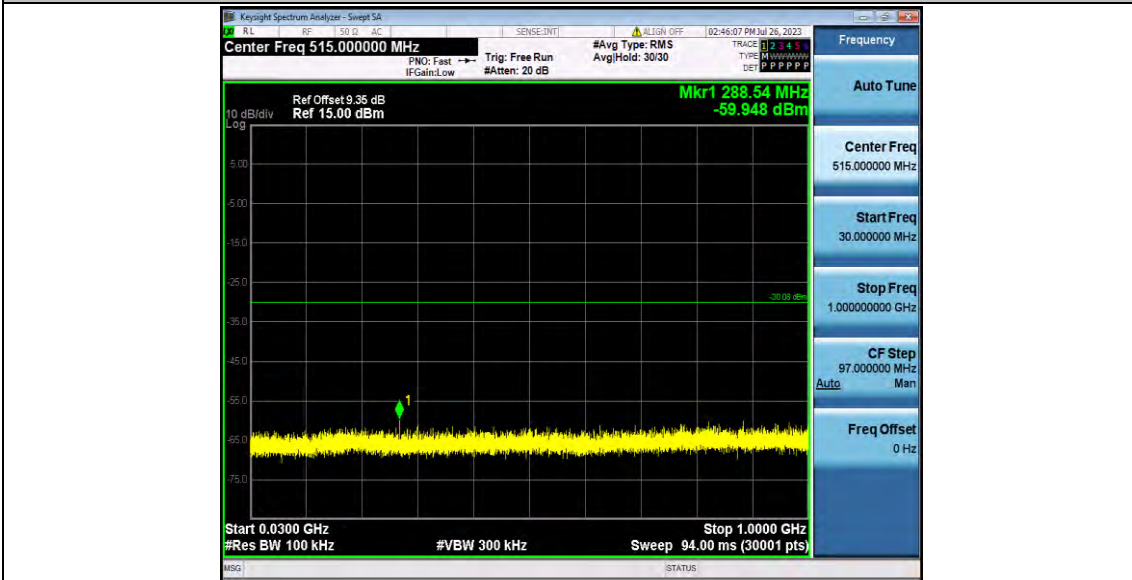
11G_Ant1_2412_30~1000



11G_Ant1_2412_1000~26500



11G_Ant1_2437_0~Reference



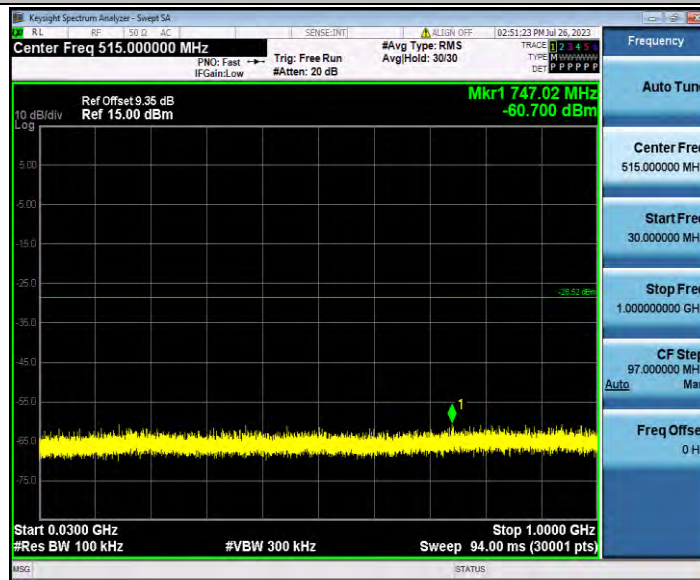
11G_Ant1_2437_30~1000



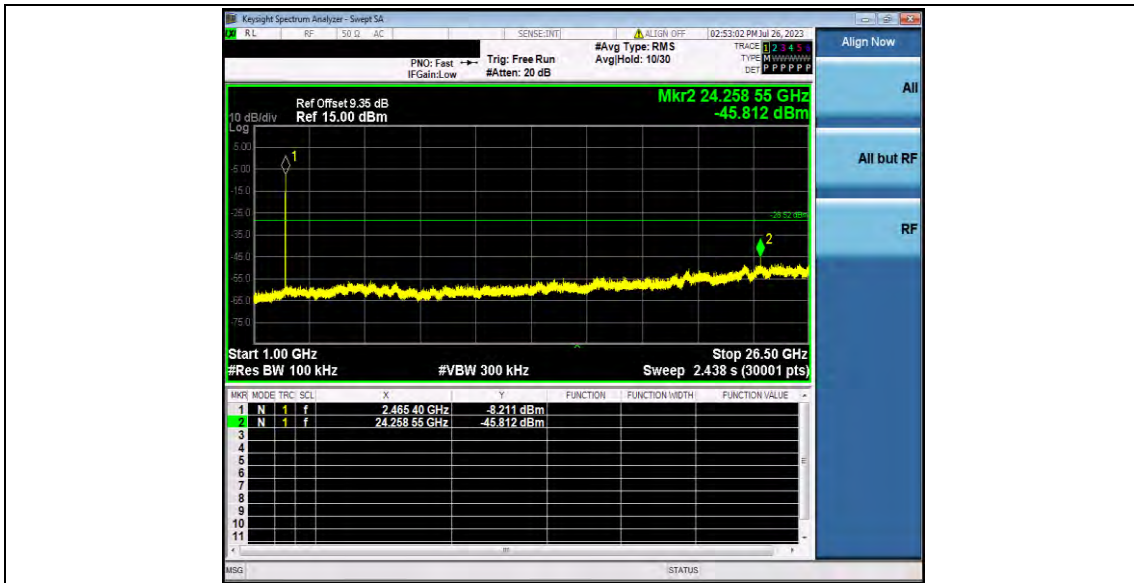
11G_Ant1_2437_1000~26500



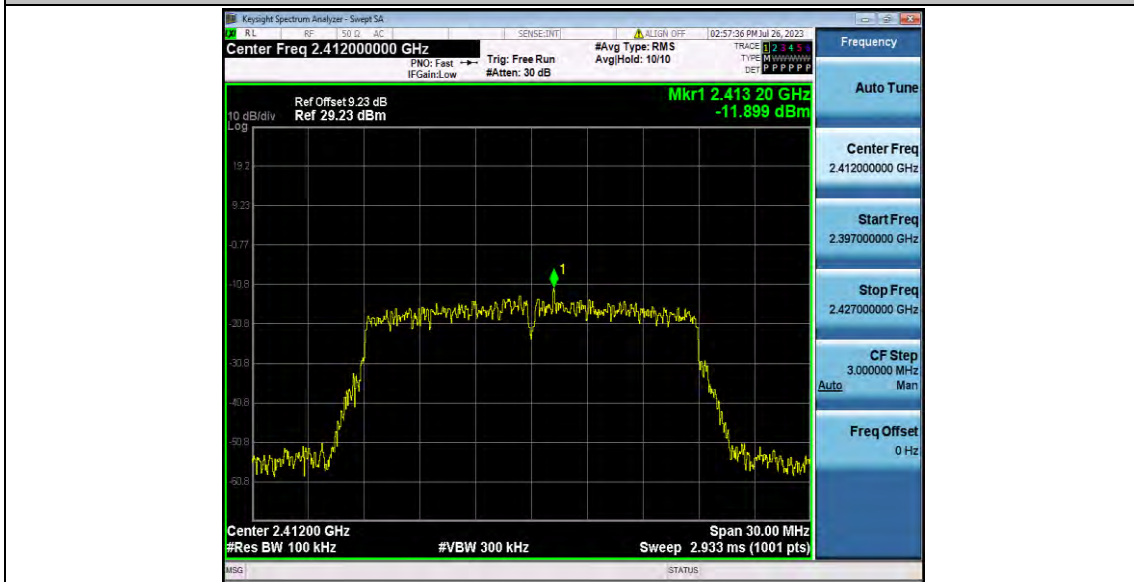
11G_Ant1_2462_0~Reference



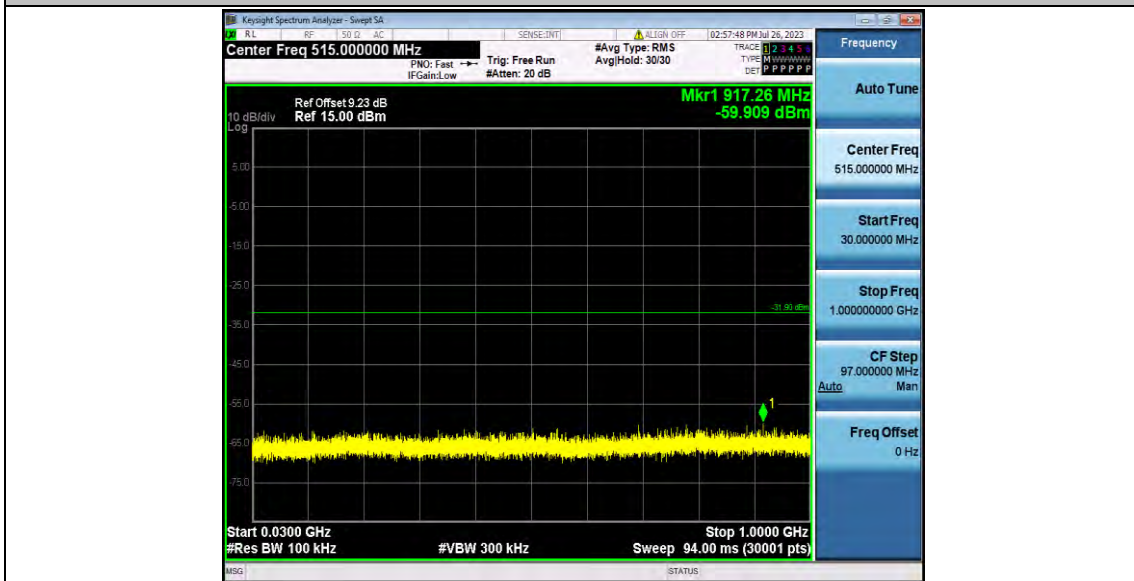
11G_Ant1_2462_30~1000



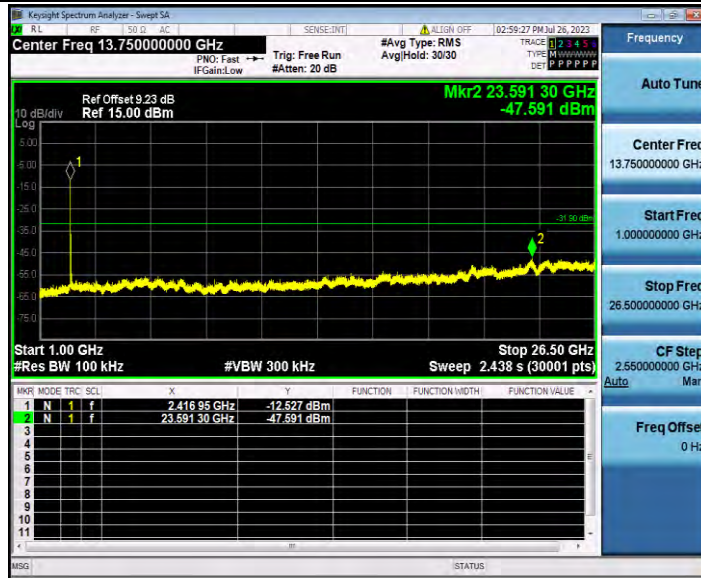
11G_Ant1_2462_1000~26500



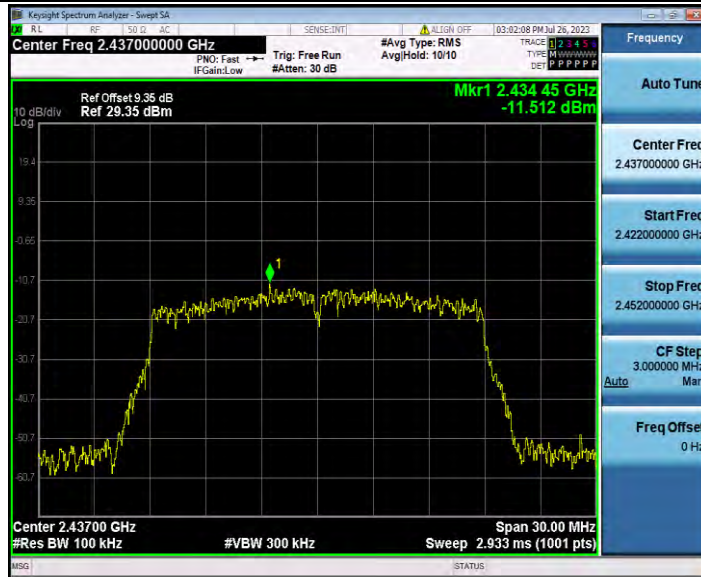
11N20SISO_Ant1_2412_0~Reference



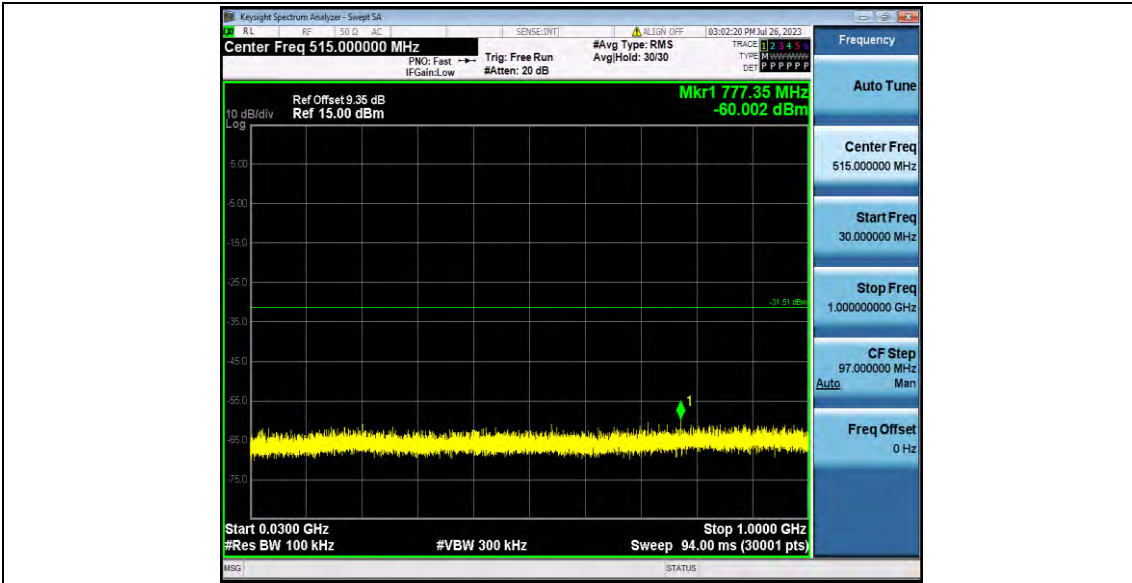
11N20SISO_Ant1_2412_30~1000



11N20SISO_Ant1_2412_1000~26500



11N20SISO_Ant1_2437_0~Reference



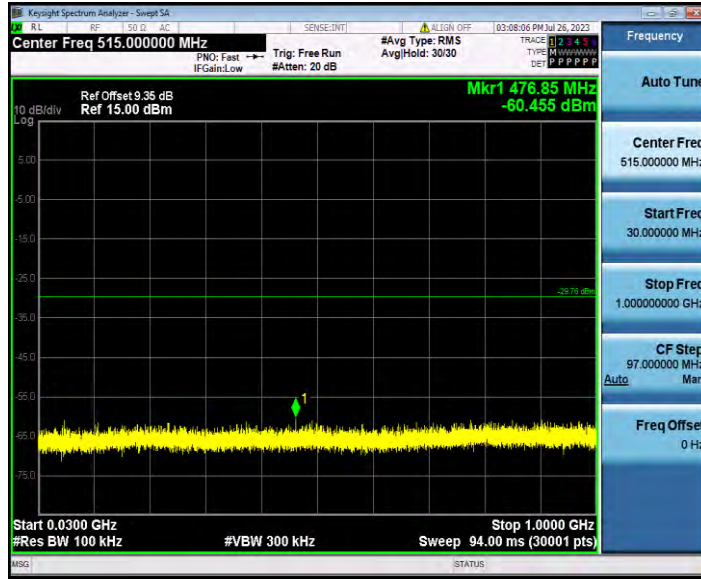
11N20SISO_Ant1_2437_30~1000



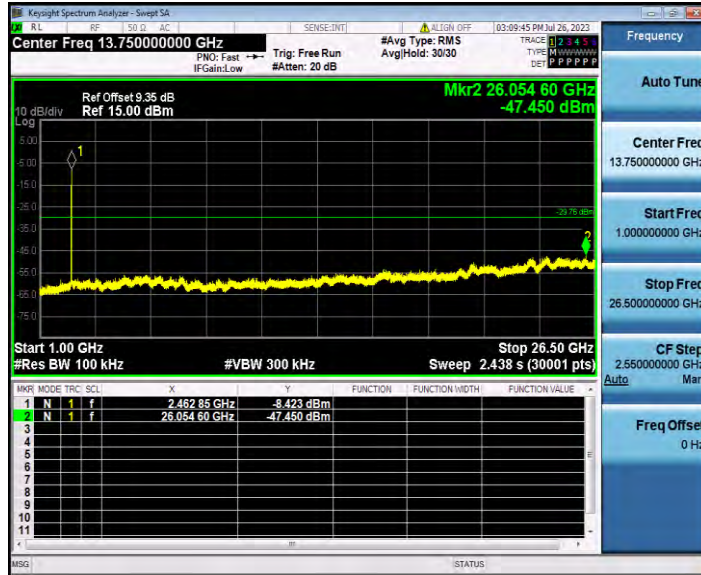
11N20SISO_Ant1_2437_1000~26500



11N20SISO_Ant1_2462_0~Reference



11N20SISO_Ant1_2462_30~1000



11N20SISO_Ant1_2462_1000~26500

Appendix A.7: Emissions in Restricted Bands

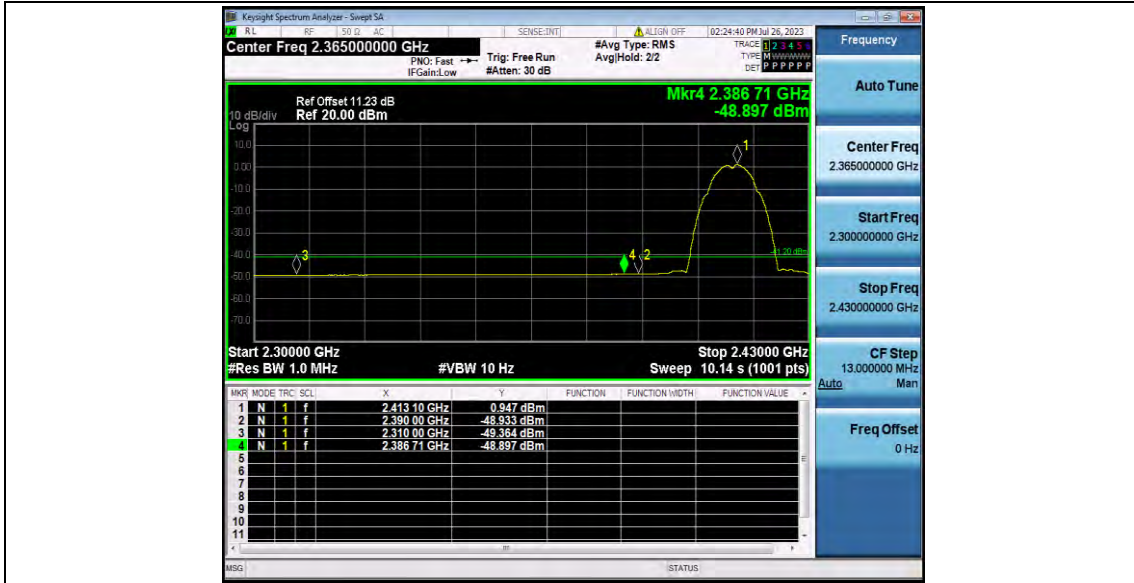
Test Result

Test Mode	Antenna	ChName	Frequency [MHz]	Detector	Freq [MHz]	Result [dBm]	Limit [dBm]	Result [dBuV/m]	Limit [dBuV/m]	Verdict
11B	Ant1	Low	2412	AV	2310.000	-49.36	≤-41.20	45.84	≤54	PASS
				AV	2386.710	-48.9	≤-41.20	46.30	≤54	PASS
				AV	2390.000	-48.93	≤-41.20	46.27	≤54	PASS
				Peak	2310.000	-47	≤-21.20	48.20	≤74	PASS
				Peak	2343.030	-39.96	≤-21.20	55.24	≤74	PASS
				Peak	2390.000	-49.85	≤-21.20	45.35	≤74	PASS
		High	2462	AV	2483.500	-48.77	≤-41.20	46.43	≤54	PASS
				AV	2499.950	-48.53	≤-41.20	46.67	≤54	PASS
				AV	2500.000	-48.53	≤-41.20	46.67	≤54	PASS
				Peak	2483.500	-47.04	≤-21.20	48.16	≤74	PASS
				Peak	2497.970	-40.54	≤-21.20	54.66	≤74	PASS
				Peak	2500.000	-44.34	≤-21.20	50.86	≤74	PASS
11G	Ant1	Low	2412	AV	2310.000	-49.28	≤-41.20	45.92	≤54	PASS
				AV	2386.320	-48.65	≤-41.20	46.55	≤54	PASS
				AV	2390.000	-48.73	≤-41.20	46.47	≤54	PASS
				Peak	2310.000	-47.08	≤-21.20	48.12	≤74	PASS
				Peak	2323.140	-39.37	≤-21.20	55.83	≤74	PASS
				Peak	2390.000	-48.34	≤-21.20	46.86	≤74	PASS
		High	2462	AV	2483.500	-48.69	≤-41.20	46.51	≤54	PASS
				AV	2499.620	-48.51	≤-41.20	46.69	≤54	PASS
				AV	2500.000	-48.53	≤-41.20	46.67	≤54	PASS
				Peak	2483.500	-43.96	≤-21.20	51.24	≤74	PASS
				Peak	2493.680	-39.15	≤-21.20	56.05	≤74	PASS
				Peak	2500.000	-45.45	≤-21.20	49.75	≤74	PASS
11N20SIS O	Ant1	Low	2412	AV	2310.000	-49.33	≤-41.20	45.87	≤54	PASS
				AV	2386.320	-48.84	≤-41.20	46.36	≤54	PASS
				AV	2390.000	-48.84	≤-41.20	46.36	≤54	PASS
				Peak	2310.000	-45.4	≤-21.20	49.80	≤74	PASS
				Peak	2360.580	-40.38	≤-21.20	54.82	≤74	PASS
				Peak	2390.000	-43.68	≤-21.20	51.52	≤74	PASS
		High	2462	AV	2483.500	-48.73	≤-41.20	46.47	≤54	PASS
				AV	2499.290	-48.5	≤-41.20	46.70	≤54	PASS
				AV	2500.000	-48.53	≤-41.20	46.67	≤54	PASS
				Peak	2483.500	-42.87	≤-21.20	52.33	≤74	PASS
				Peak	2494.450	-39.91	≤-21.20	55.29	≤74	PASS
				Peak	2500.000	-45.76	≤-21.20	49.44	≤74	PASS

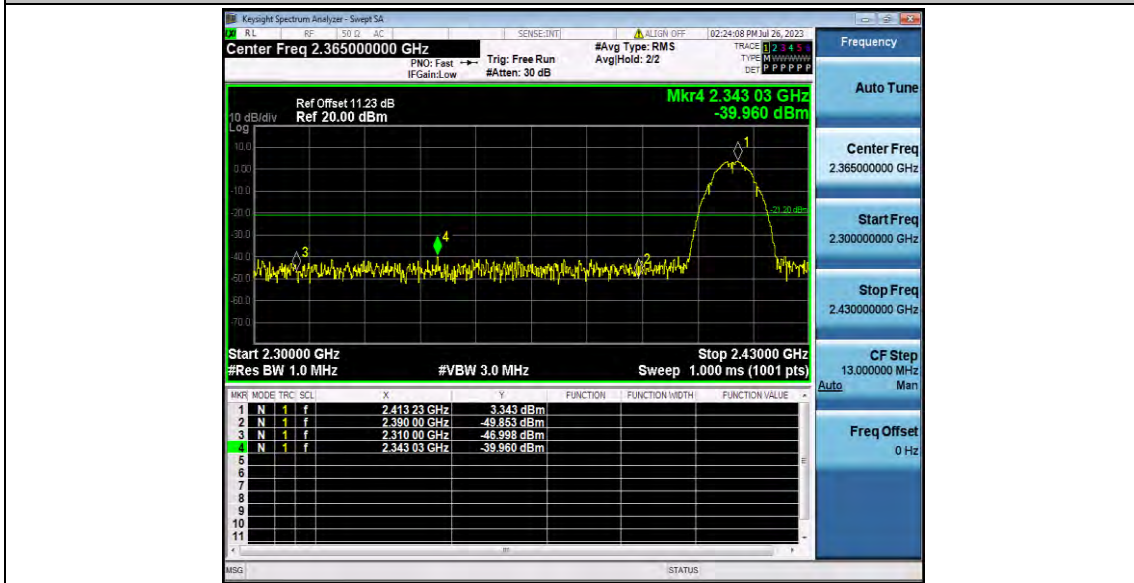
Note:

1. The Antenna Gain is compensated in the graph.
2. The Duty Cycle Factor and RBW Factor is compensated in the graph.
3. 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.

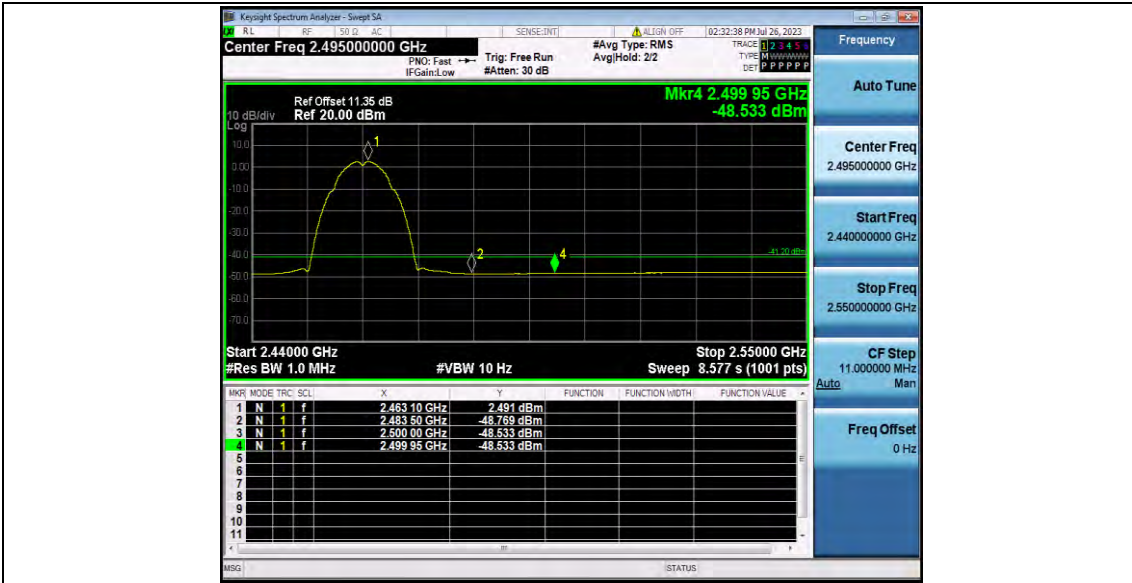
Test Graphs



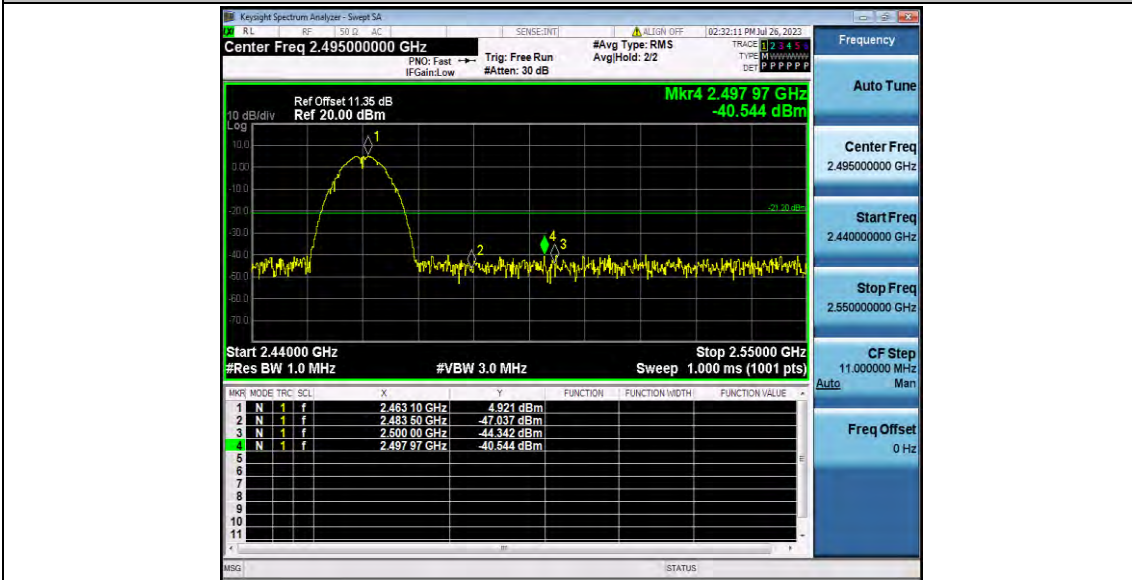
11B_Ant1_Low_2412_AV



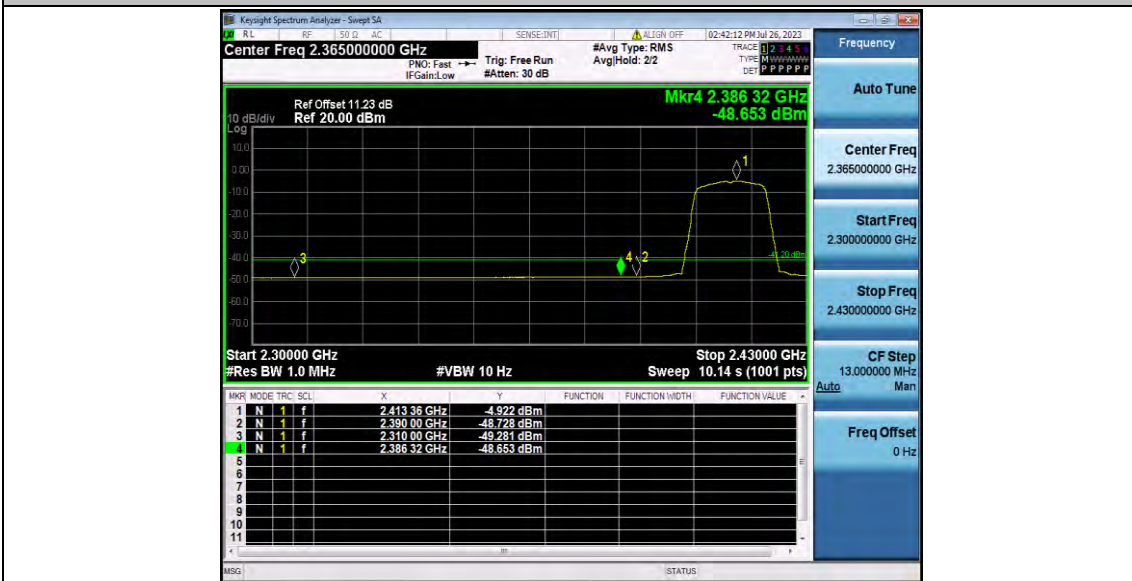
11B_Ant1_Low_2412_Peak



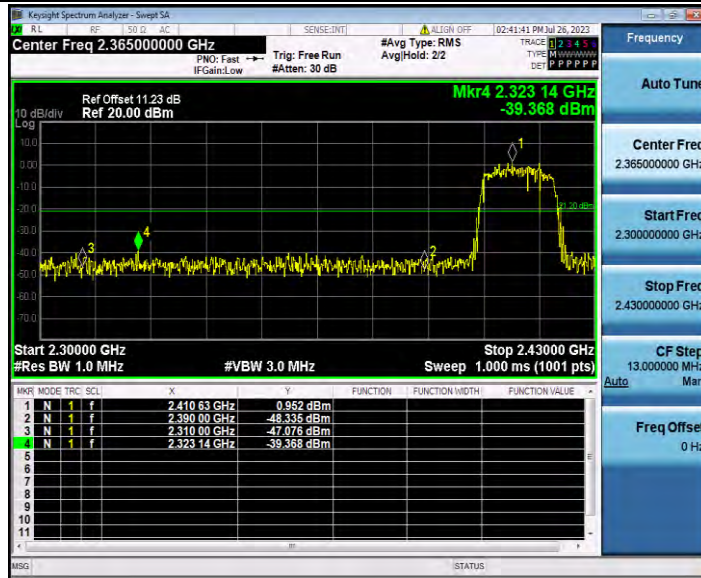
11B_Ant1_High_2462_AV



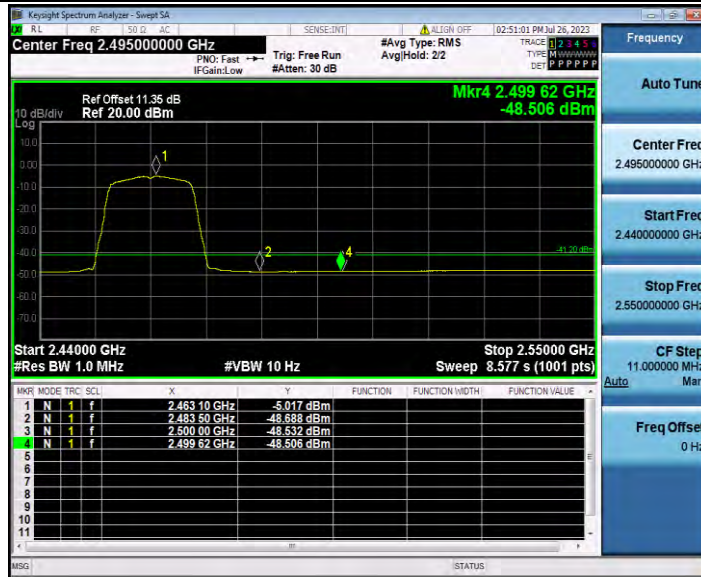
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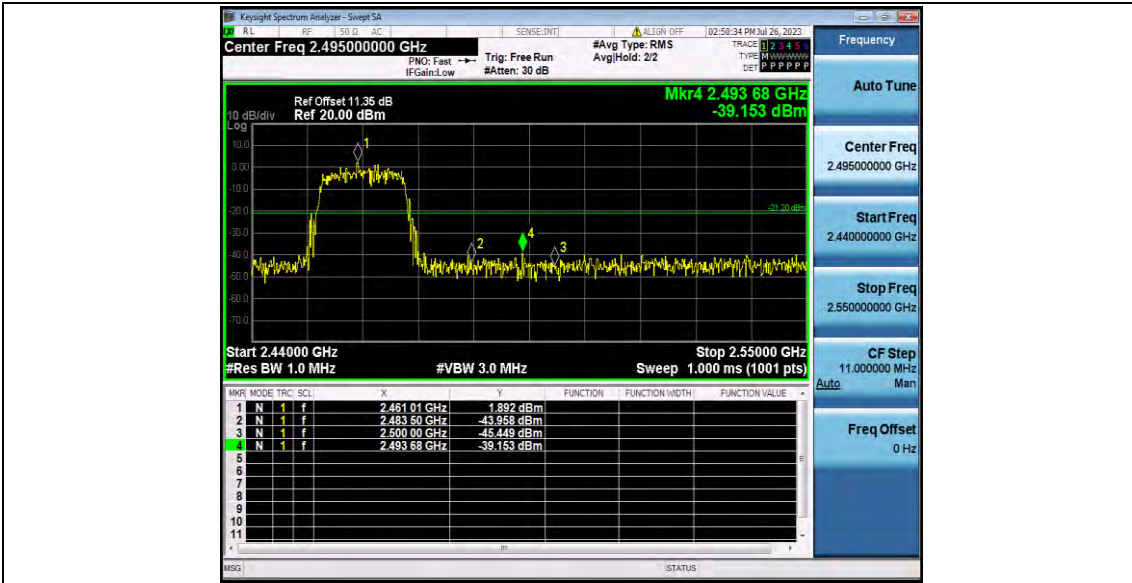
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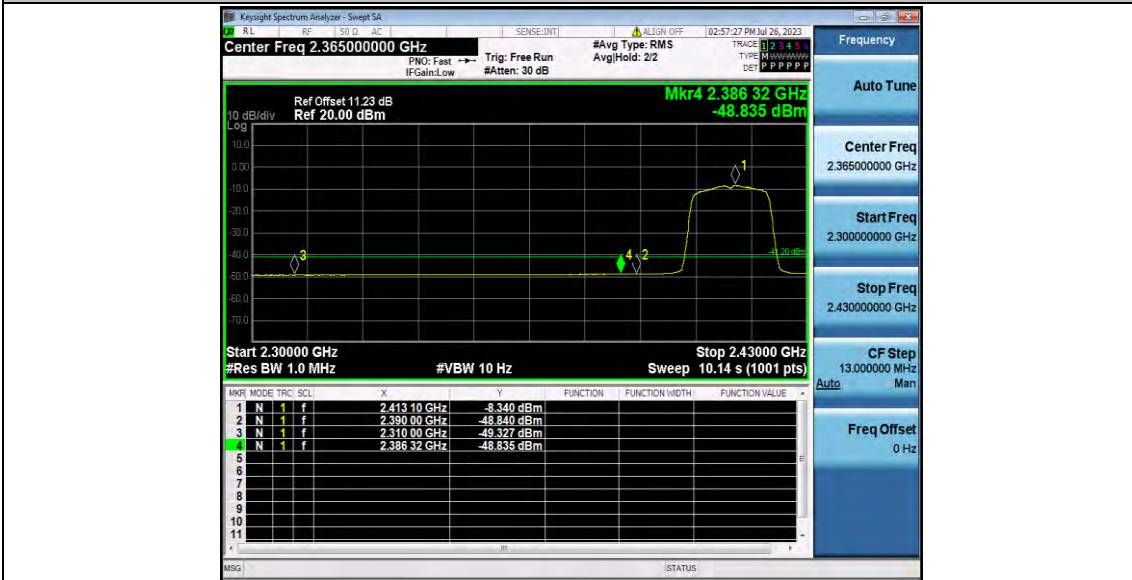
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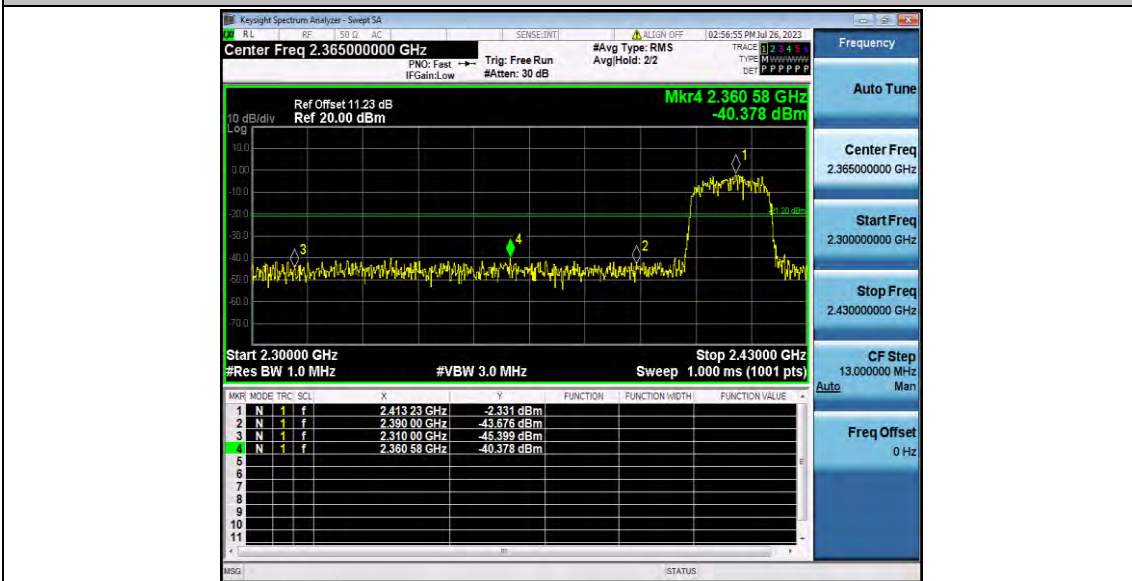
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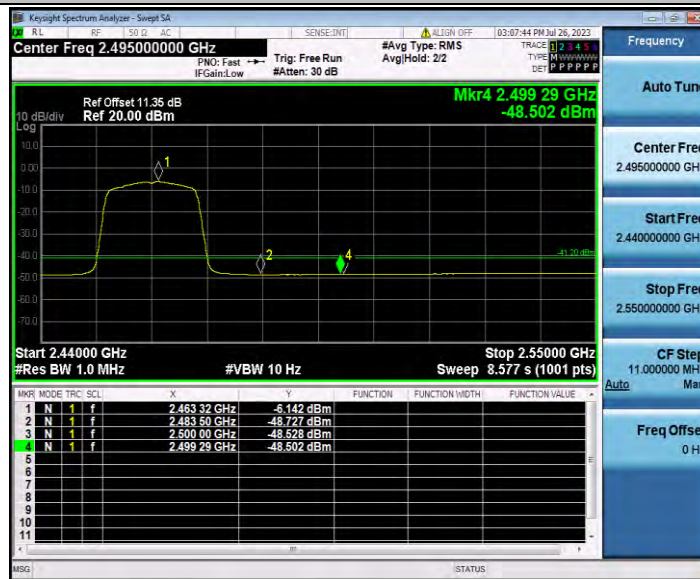
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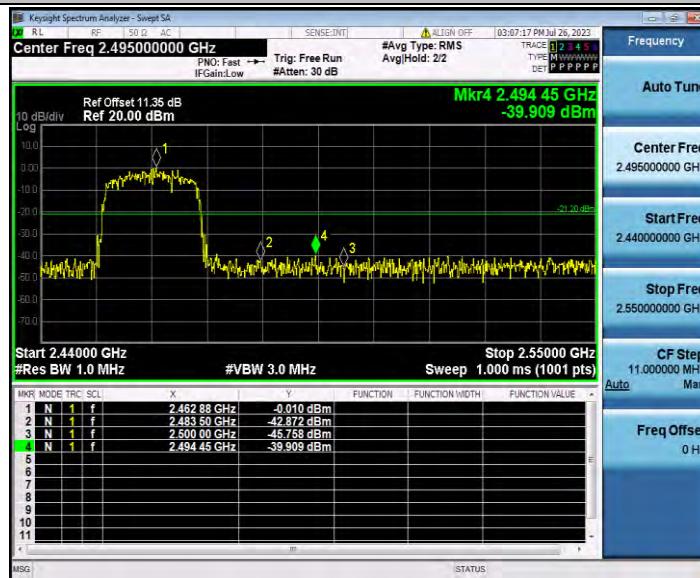
11N20SISO_Ant1_Low_2412_AV



11N20SISO_Ant1_Low_2412_Peak



11N20SISO_Ant1_High_2462_AV



11N20SISO_Ant1_High_2462_Peak