



Appendix B

RF Test Data for 2.4G WIFI (Conducted Measurement)

Product Name: IP Access Control Device

Test Model: A1121 Rev. 1.0

Environmental Conditions

Temperature:	23.8 ° C
Relative Humidity:	52.0%
ATM Pressure:	100.0 kPa
Test Engineer:	Ling Zhu Ling Zhu
Supervised by:	Li Huan Li Huan





B.1 DTS Bandwidth

Test Result

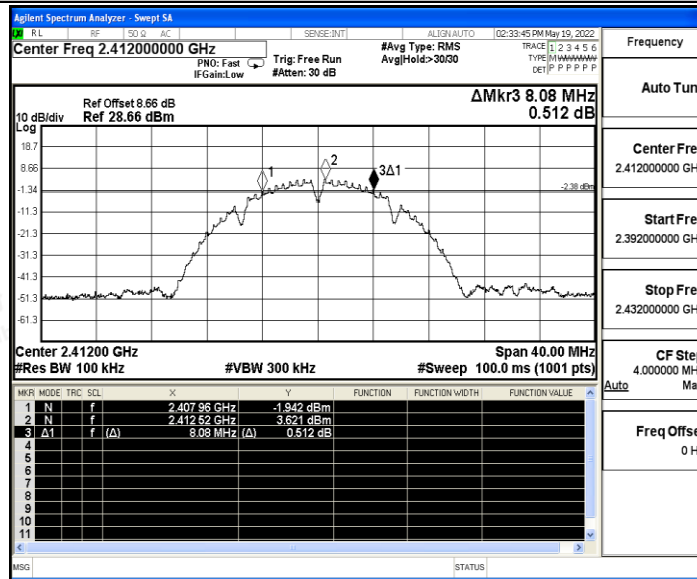
TestMode	Antenna	Channel	DTS BW [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
11B	Ant	2412	8.080	2407.960	2416.040	0.5	PASS
		2437	8.080	2432.960	2441.040	0.5	PASS
		2462	8.560	2457.480	2466.040	0.5	PASS
11G	Ant	2412	15.120	2404.440	2419.560	0.5	PASS
		2437	15.440	2429.440	2444.880	0.5	PASS
		2462	15.480	2454.080	2469.560	0.5	PASS
11N20SISO	Ant	2412	15.080	2404.440	2419.520	0.5	PASS
		2437	15.120	2429.440	2444.560	0.5	PASS
		2462	15.960	2453.600	2469.560	0.5	PASS
11N40SISO	Ant	2422	35.040	2404.480	2439.520	0.5	PASS
		2437	35.040	2419.480	2454.520	0.5	PASS
		2452	32.480	2434.480	2466.960	0.5	PASS



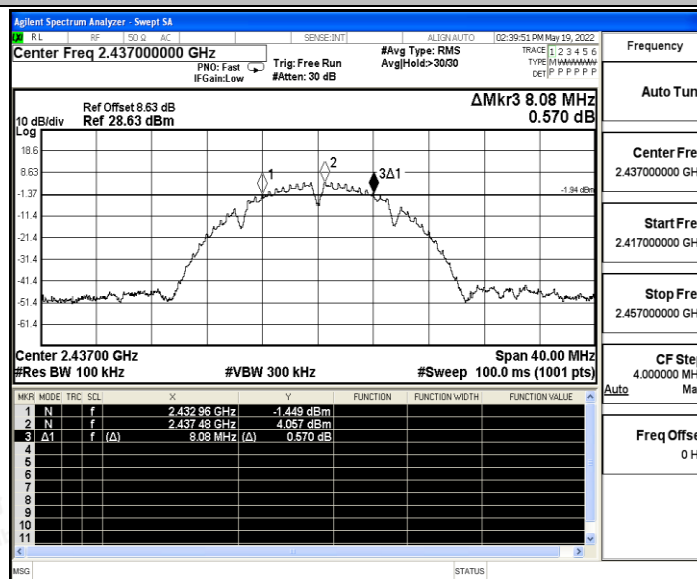


Test Graphs

11B_Ant_2412

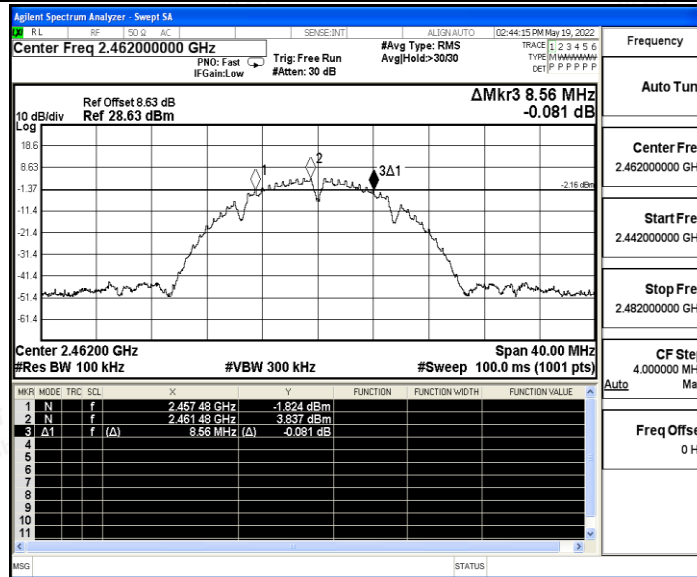


11B_Ant_2437

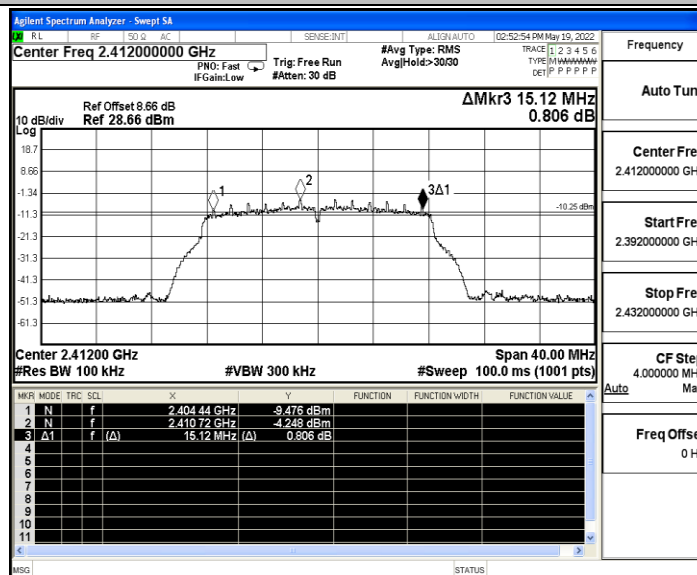


11B_Ant_2462



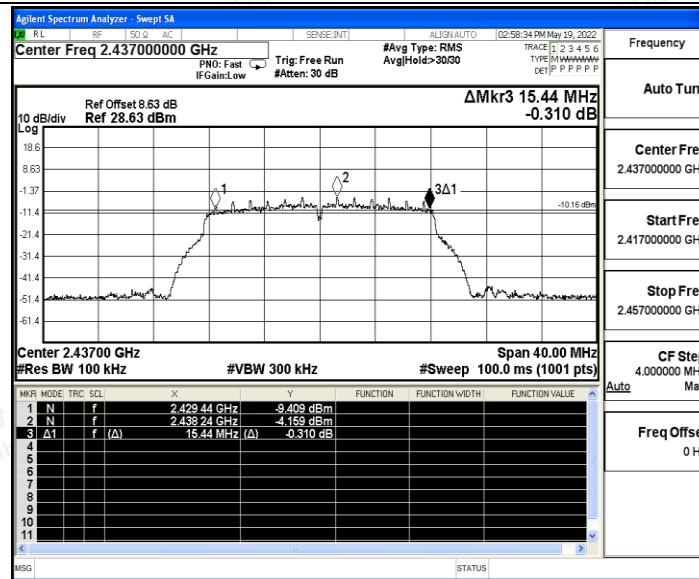


11G_Ant_2412

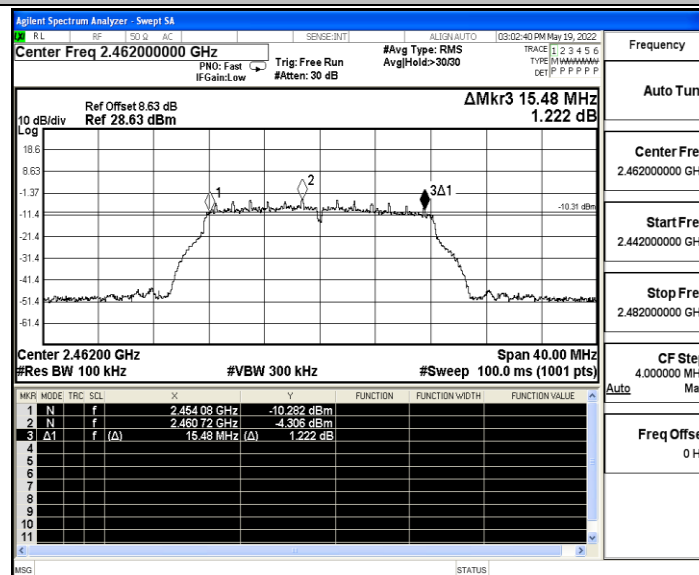


11G_Ant_2437



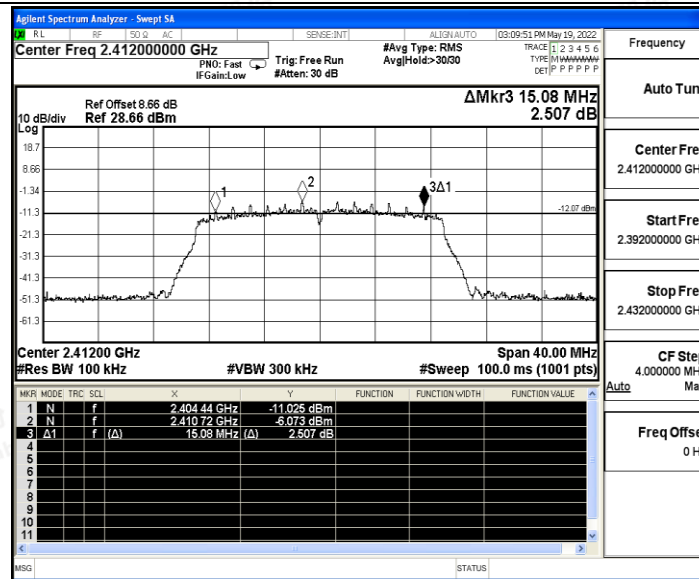


11G_Ant_2462

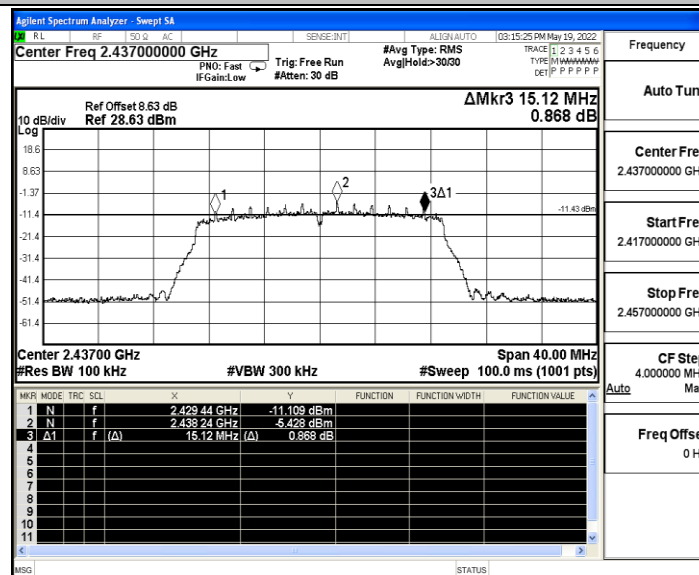


11N20SISO_Ant_2412



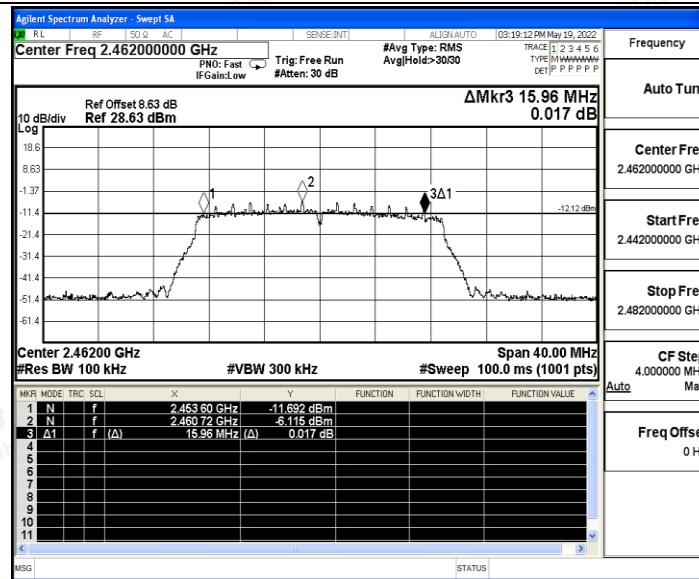


11N20SISO_Ant_2437

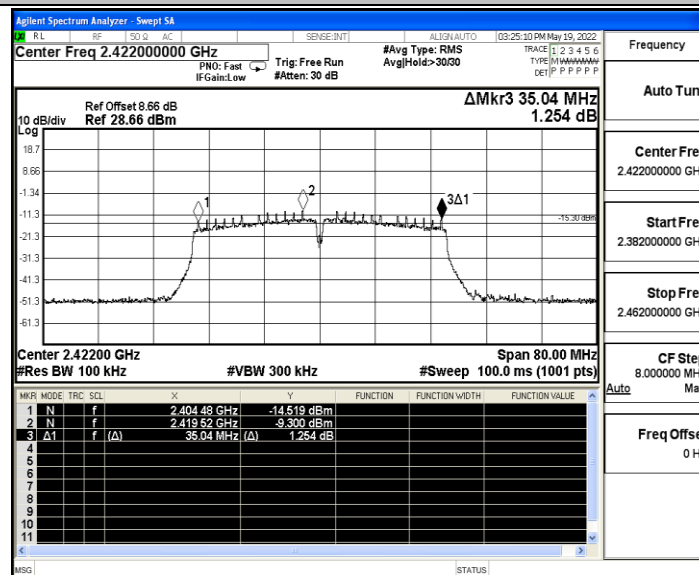


11N20SISO_Ant_2462





11N40SISO_Ant_2422



11N40SISO_Ant_2437







B.2 Maximum conducted output power

Test Result

TestMode	Antenna	Channel	Result[dBm]	Limit[dBm]	Verdict
11B	Ant	2412	16.35	≤30.00	PASS
		2437	16.77	≤30.00	PASS
		2462	16.56	≤30.00	PASS
11G	Ant	2412	14.21	≤30.00	PASS
		2437	14.54	≤30.00	PASS
		2462	14.37	≤30.00	PASS
11N20SISO	Ant	2412	12.35	≤30.00	PASS
		2437	12.44	≤30.00	PASS
		2462	12.31	≤30.00	PASS
11N40SISO	Ant	2422	11.47	≤30.00	PASS
		2437	11.52	≤30.00	PASS
		2452	11.53	≤30.00	PASS





B.3 Maximum power spectral density

Test Result

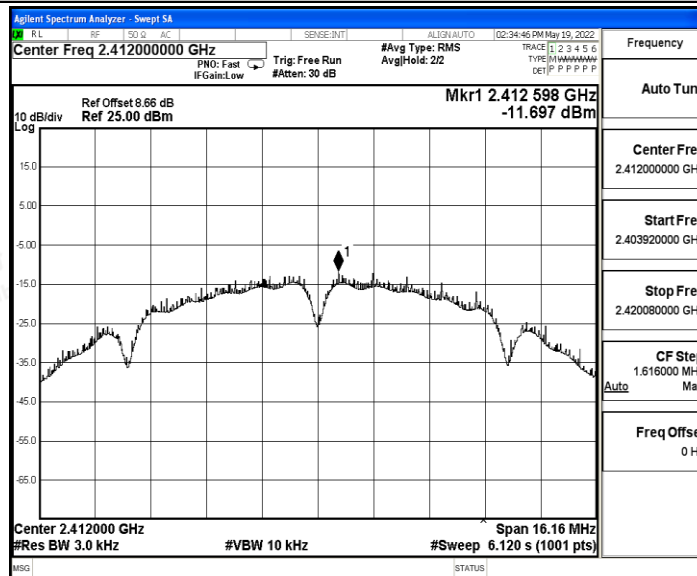
TestMode	Antenna	Channel	Result[dBm/3kHz]	Limit[dBm/3kHz]	Verdict
11B	Ant	2412	-11.7	≤8.00	PASS
		2437	-12.6	≤8.00	PASS
		2462	-12.93	≤8.00	PASS
11G	Ant	2412	-20.24	≤8.00	PASS
		2437	-20.54	≤8.00	PASS
		2462	-20.95	≤8.00	PASS
11N20SISO	Ant	2412	-22.21	≤8.00	PASS
		2437	-21.44	≤8.00	PASS
		2462	-21.99	≤8.00	PASS
11N40SISO	Ant	2422	-25.79	≤8.00	PASS
		2437	-25.57	≤8.00	PASS
		2452	-24.51	≤8.00	PASS



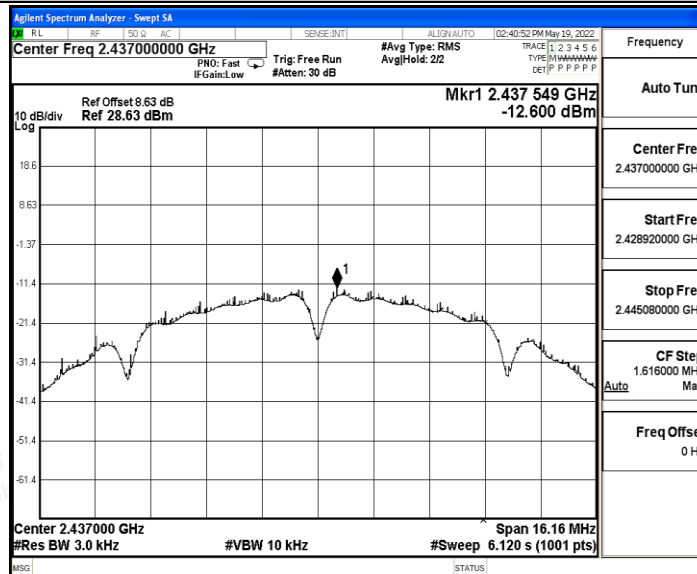


Test Graphs

11B_Ant_2412

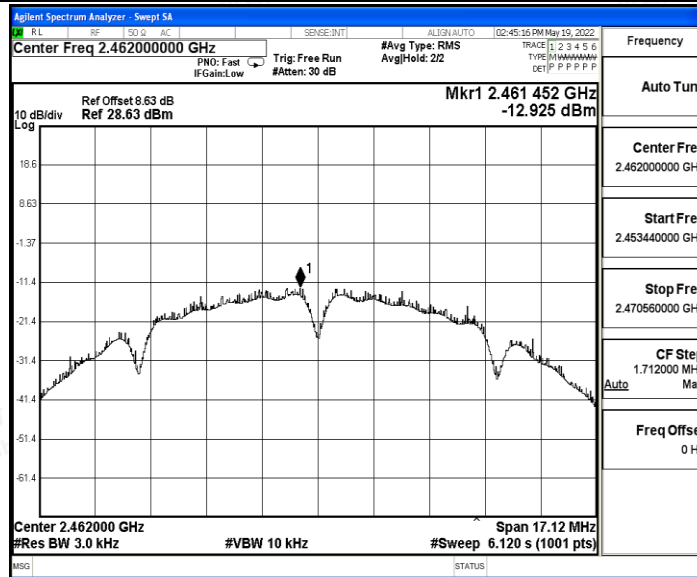


11B_Ant_2437

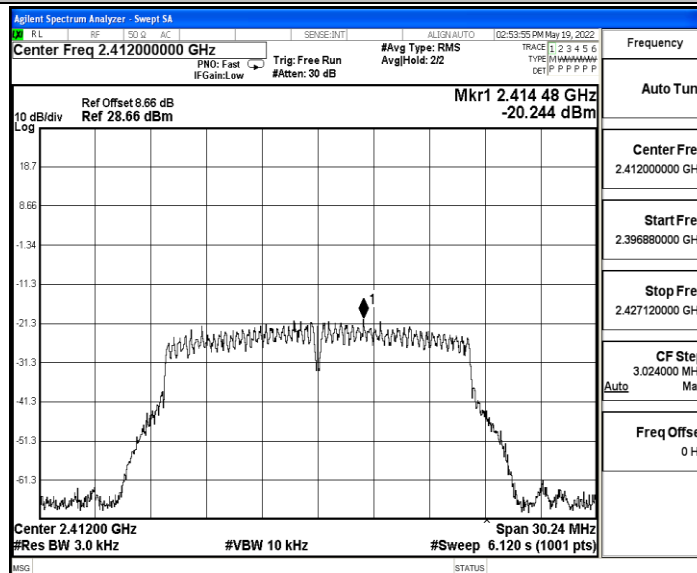


11B_Ant_2462



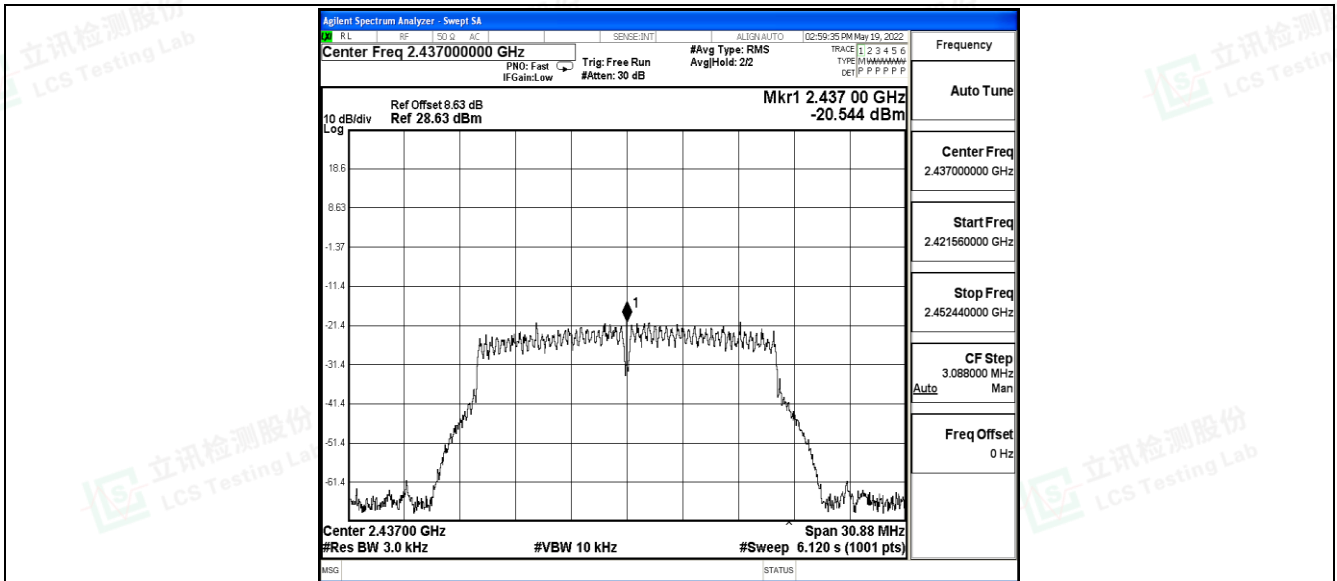


11G_Ant_2412

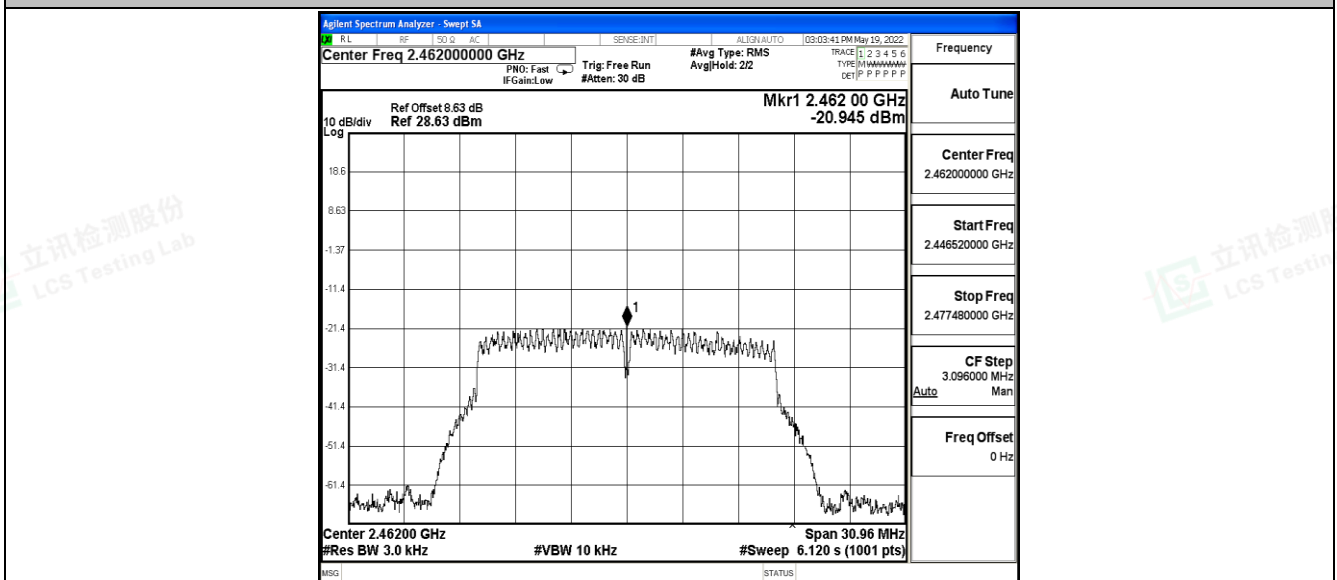


11G_Ant_2437



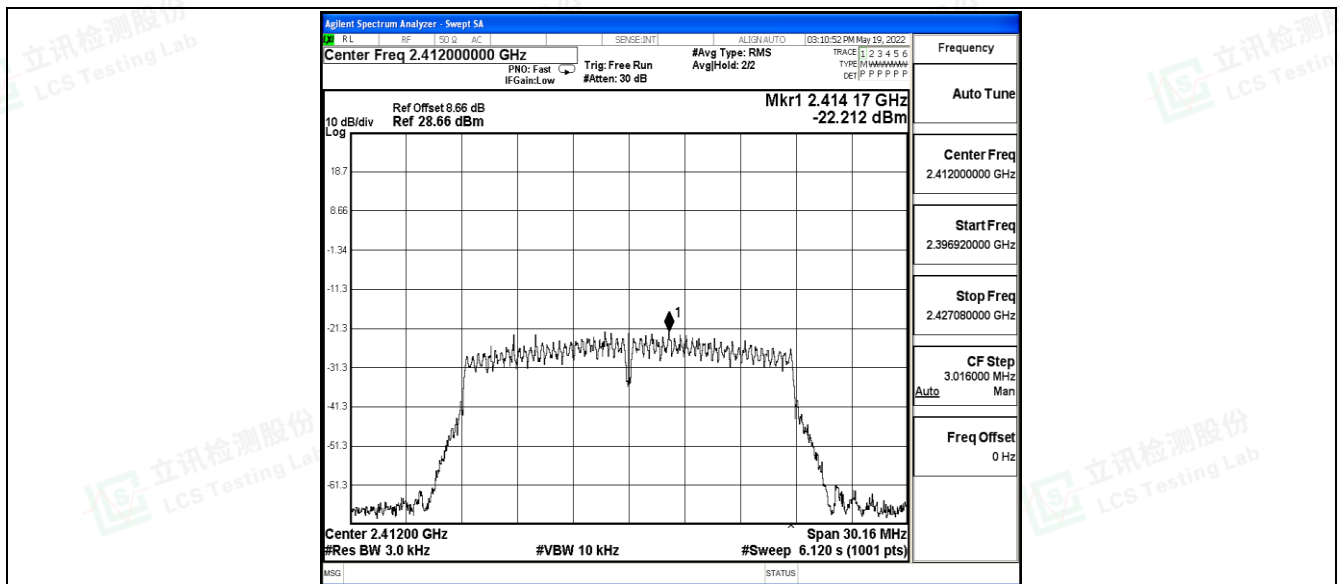


11G_Ant_2462

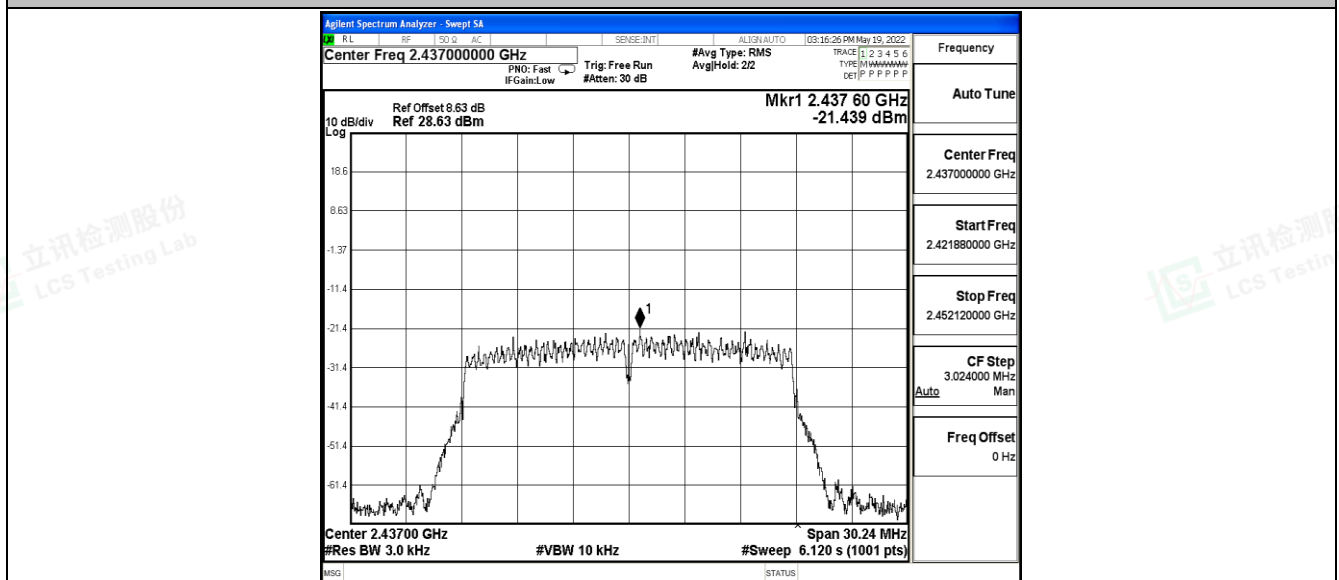


11N20SISO_Ant_2412



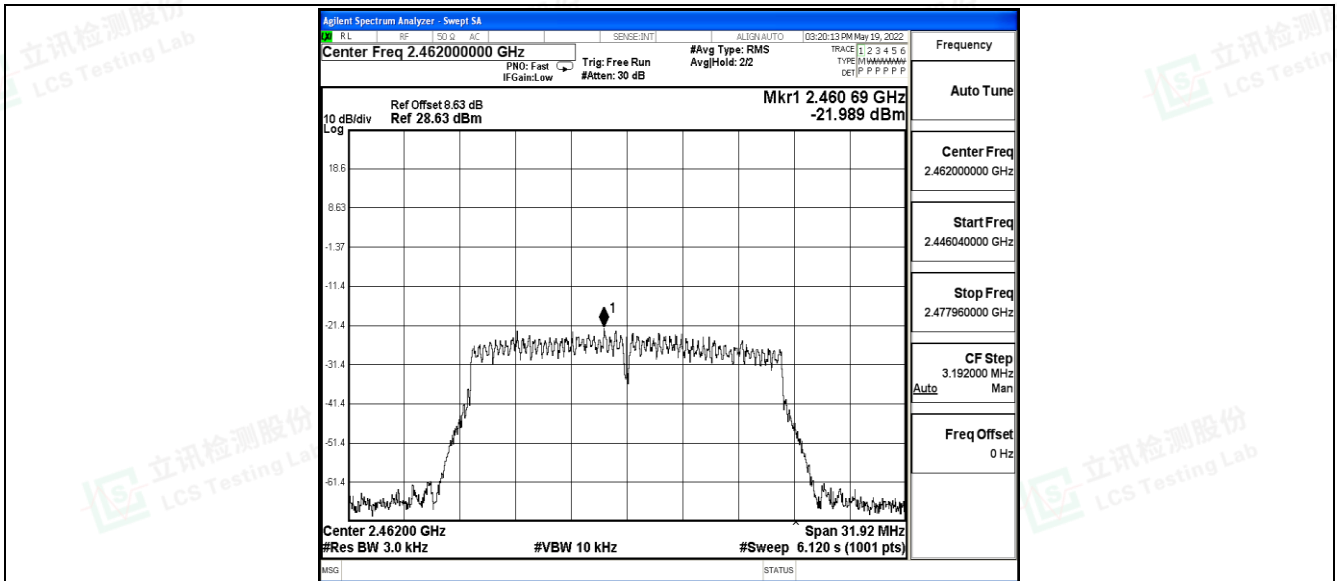


11N20SISO_Ant_2437

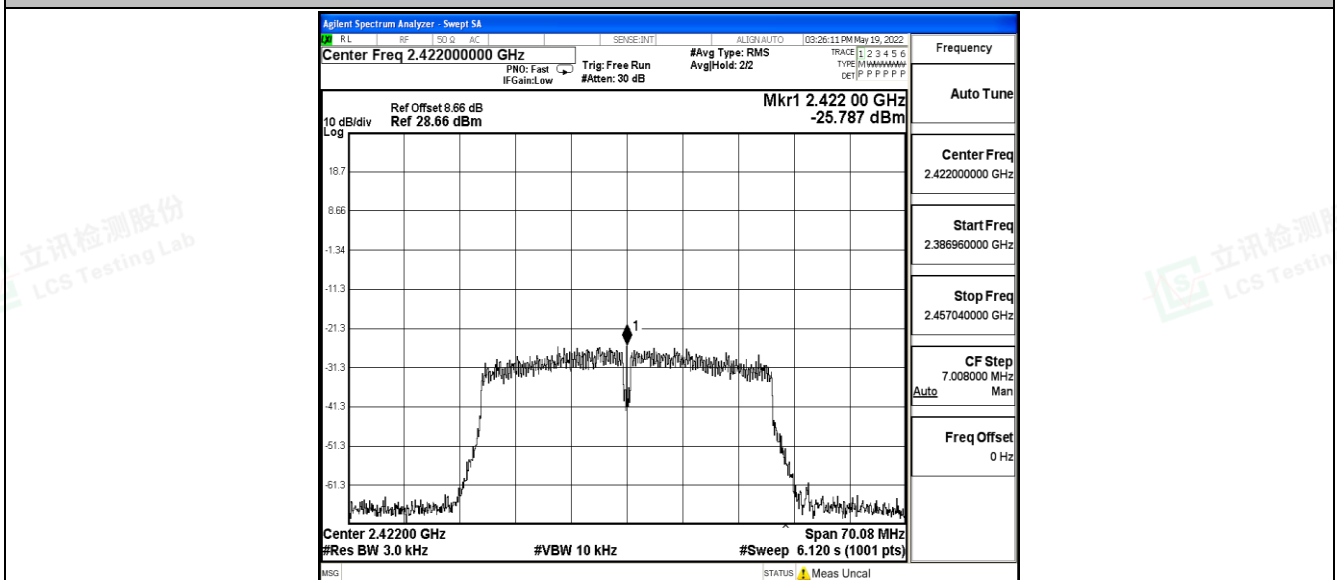


11N20SISO_Ant_2462



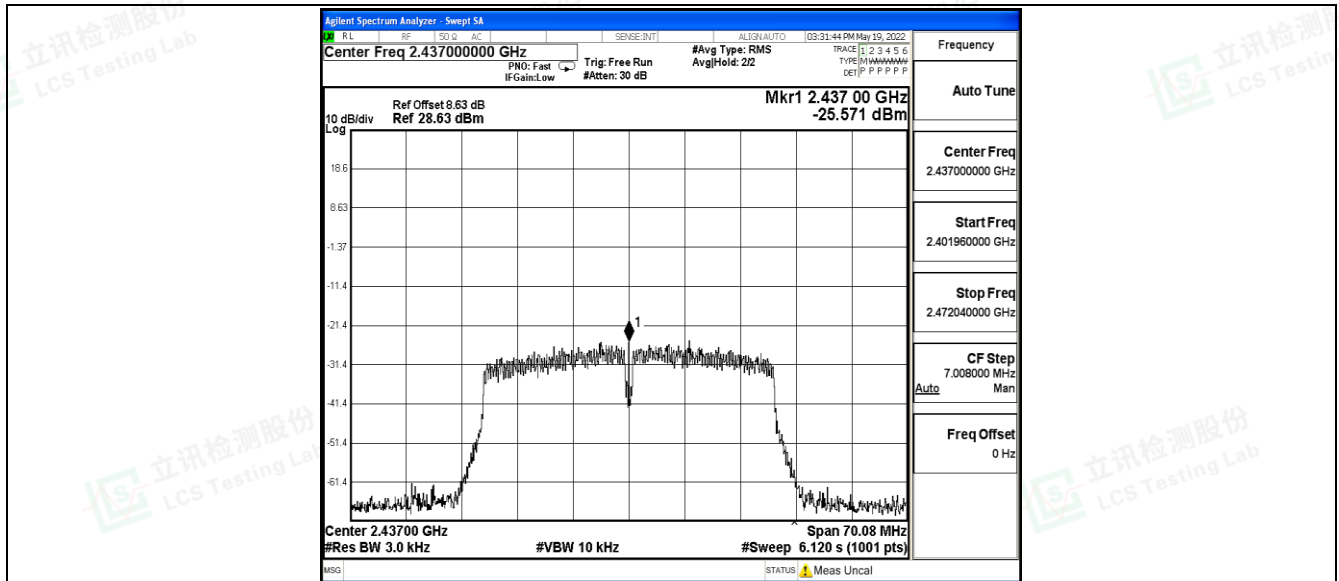


11N40SISO_Ant_2422

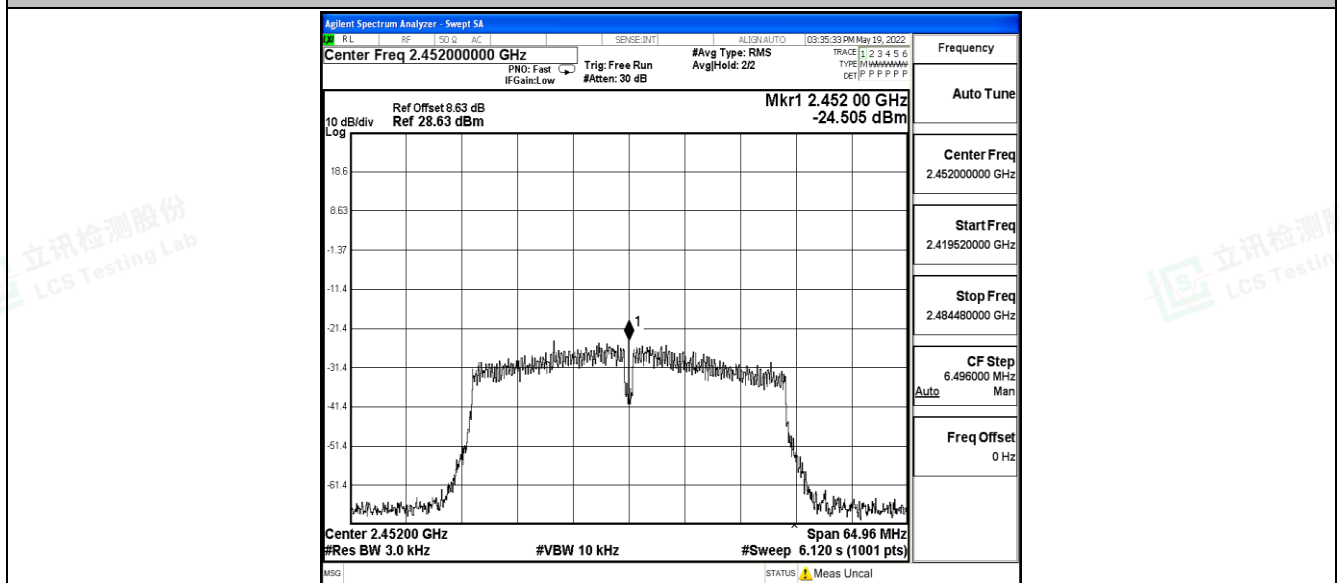


11N40SISO_Ant_2437





11N40SISO_Ant_2452





B.4 Band edge measurements

Test Result

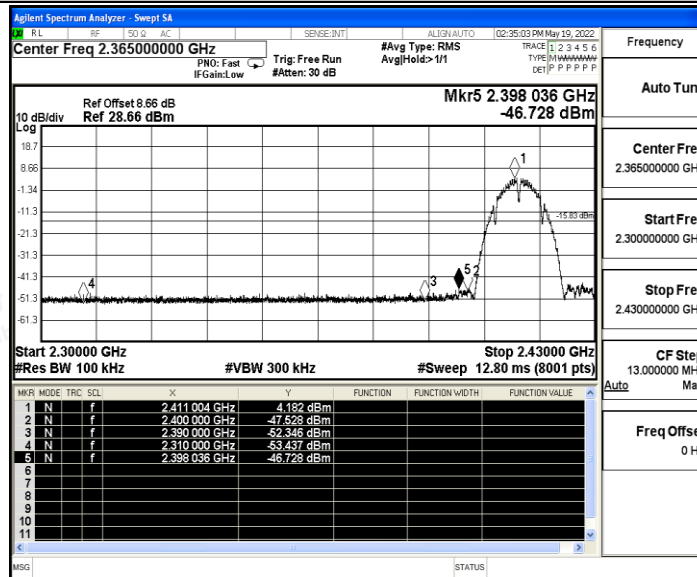
TestMode	Antenna	ChName	Channel	RefLevel[dBm]	Result[dBm]	Limit[dBm]	Verdict
11B	Ant	Low	2412	4.17	-46.73	≤ -15.83	PASS
		High	2462	4.04	-46.41	≤ -15.96	PASS
11G	Ant	Low	2412	-3.70	-47.6	≤ -23.7	PASS
		High	2462	-4.42	-47.81	≤ -24.42	PASS
11N20SISO	Ant	Low	2412	-6.39	-48.46	≤ -26.39	PASS
		High	2462	-6.45	-47.65	≤ -26.45	PASS
11N40SISO	Ant	Low	2422	-9.29	-48.42	≤ -29.29	PASS
		High	2452	-8.15	-47.99	≤ -28.15	PASS



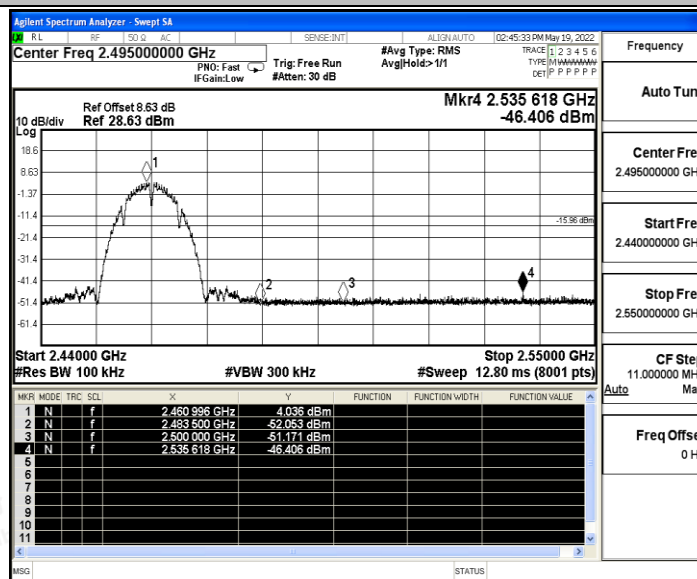


Test Graphs

11B_Ant_Low_2412

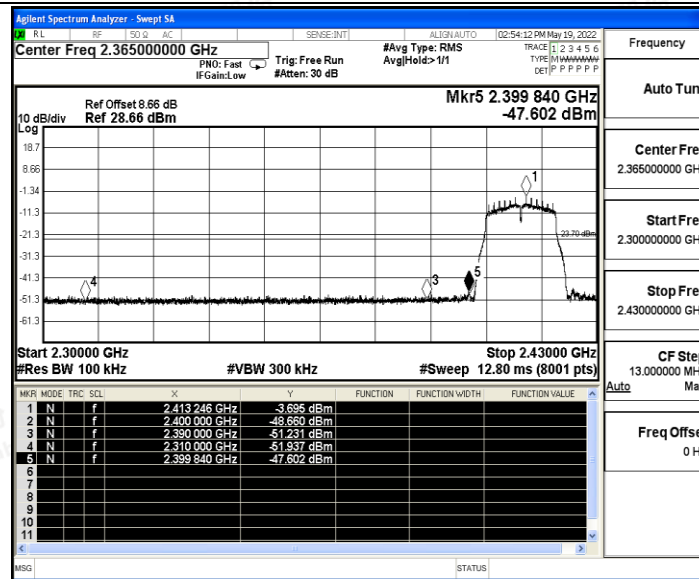


11B_Ant_High_2462

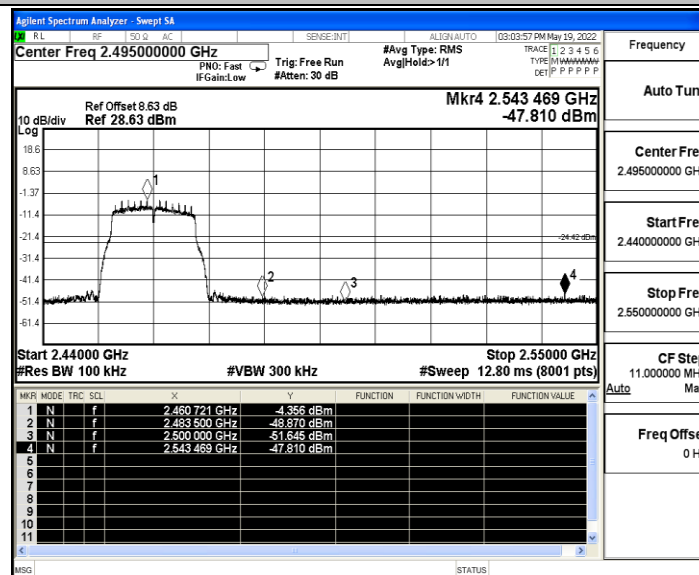


11G_Ant_Low_2412



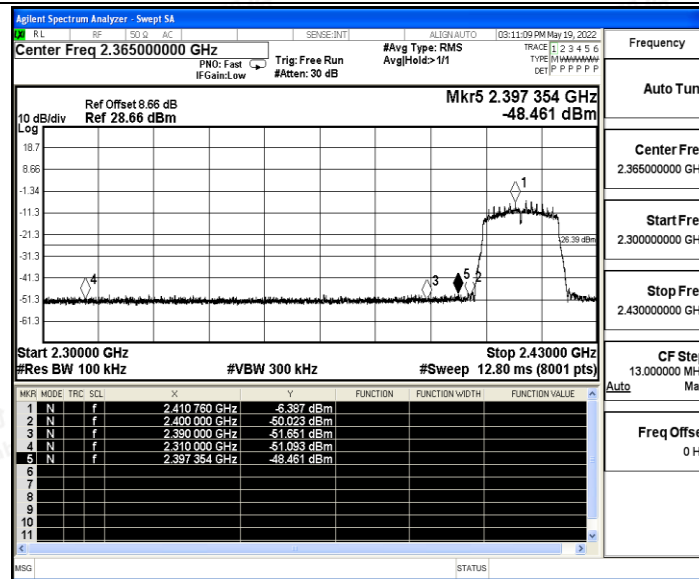


11G_Ant_High_2462

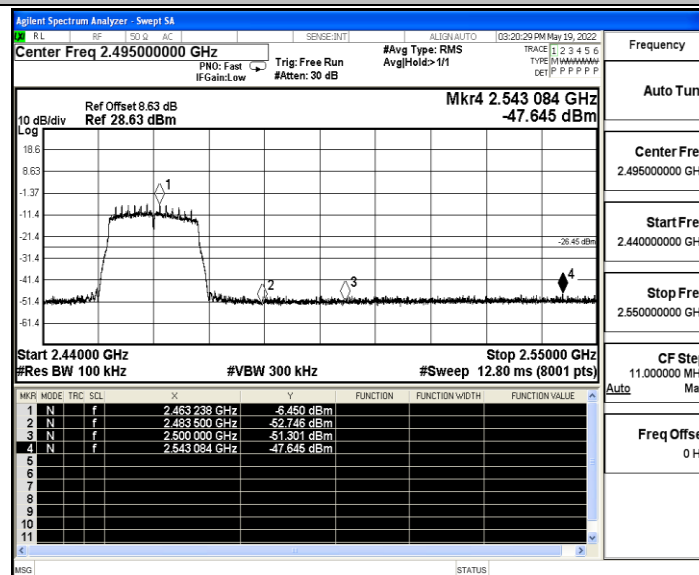


11N20SISO_Ant_Low_2412



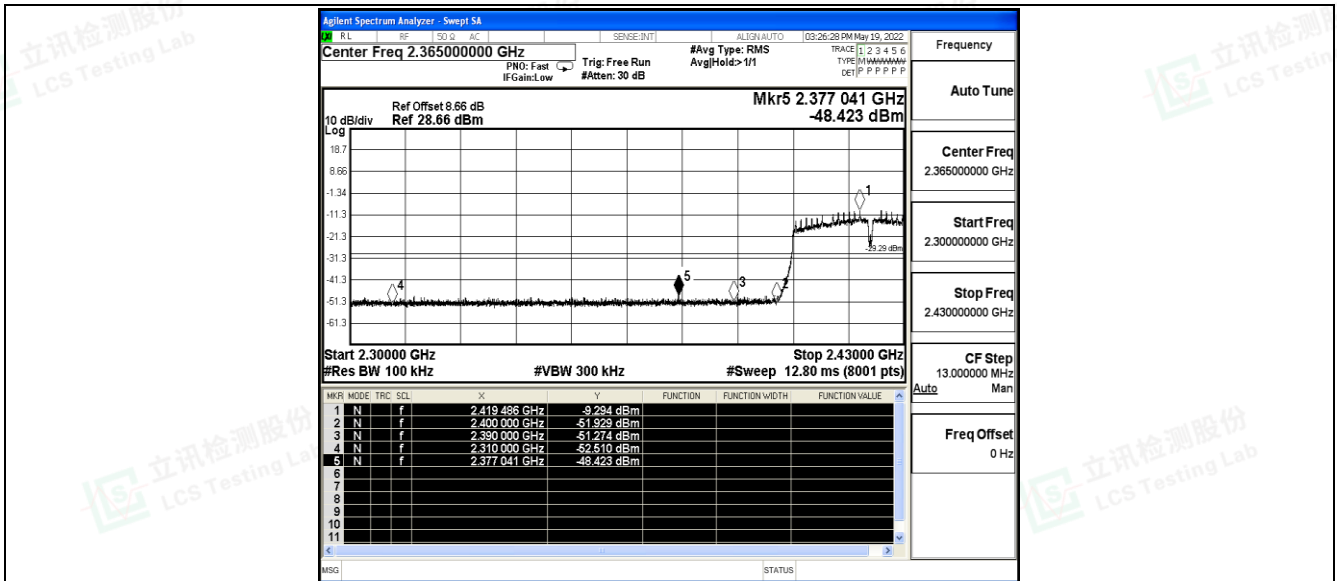


11N20SISO_Ant_High_2462

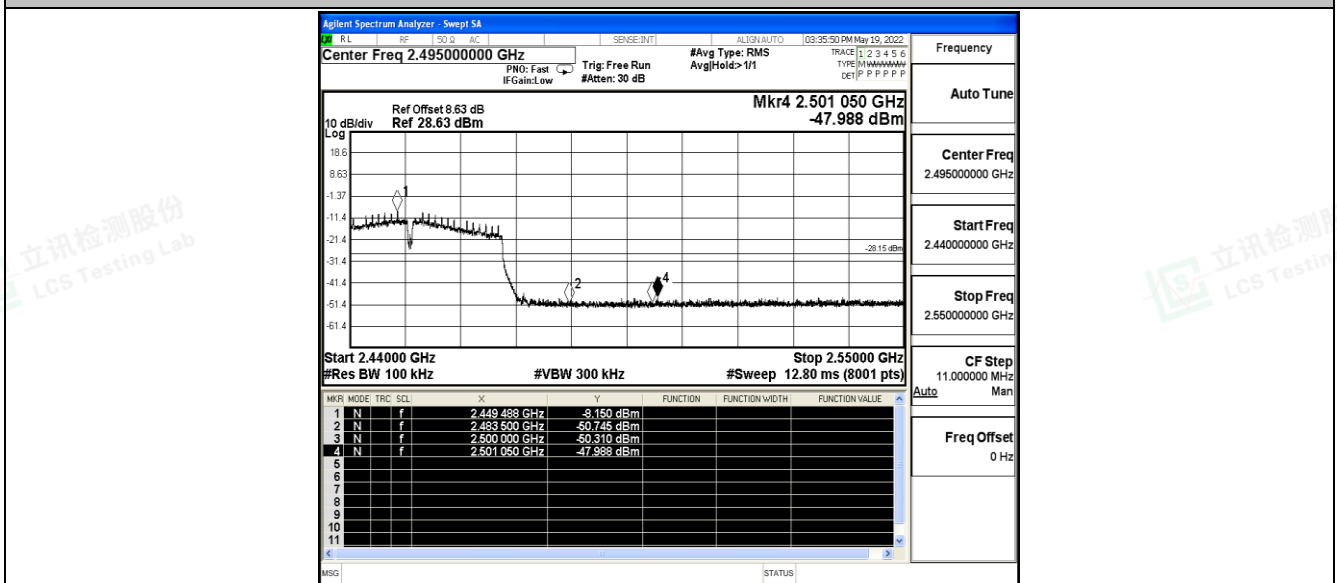


11N40SISO_Ant_Low_2422





11N40SISO_Ant_High_2452





B.5 Conducted Spurious Emission

Test Result

TestMode	Antenna	Channel	FreqRange [Mhz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
11B	Ant	2412	Reference	4.14	4.14	---	PASS
			30~1000	4.14	-58.26	≤-15.86	PASS
			1000~26500	4.14	-46.25	≤-15.86	PASS
		2437	Reference	4.44	4.44	---	PASS
			30~1000	4.44	-46.34	≤-15.56	PASS
			1000~26500	4.44	-45.36	≤-15.56	PASS
		2462	Reference	4.13	4.13	---	PASS
			30~1000	4.13	-59.62	≤-15.87	PASS
			1000~26500	4.13	-45.96	≤-15.87	PASS
11G	Ant	2412	Reference	-3.76	-3.76	---	PASS
			30~1000	-3.76	-59.29	≤-23.76	PASS
			1000~26500	-3.76	-45.7	≤-23.76	PASS
		2437	Reference	-4.15	-4.15	---	PASS
			30~1000	-4.15	-51.1	≤-24.15	PASS
			1000~26500	-4.15	-45.45	≤-24.15	PASS
		2462	Reference	-4.29	-4.29	---	PASS
			30~1000	-4.29	-59.24	≤-24.29	PASS
			1000~26500	-4.29	-46.09	≤-24.29	PASS
11N20SISO	Ant	2412	Reference	-5.65	-5.65	---	PASS
			30~1000	-5.65	-60.3	≤-25.65	PASS
			1000~26500	-5.65	-46.11	≤-25.65	PASS
		2437	Reference	-5.78	-5.78	---	PASS
			30~1000	-5.78	-47.8	≤-25.78	PASS
			1000~26500	-5.78	-46.12	≤-25.78	PASS
		2462	Reference	-6.13	-6.13	---	PASS
			30~1000	-6.13	-58.07	≤-26.13	PASS
			1000~26500	-6.13	-45.27	≤-26.13	PASS
11N40SISO	Ant	2422	Reference	-9.27	-9.27	---	PASS
			30~1000	-9.27	-35.4	≤-29.27	PASS
			1000~26500	-9.27	-46.34	≤-29.27	PASS
		2437	Reference	-9.49	-9.49	---	PASS
			30~1000	-9.49	-59.18	≤-29.49	PASS
			1000~26500	-9.49	-45.82	≤-29.49	PASS
		2452	Reference	-8.39	-8.39	---	PASS
			30~1000	-8.39	-59.37	≤-28.39	PASS





			1000~26500	-8.39	-46.25	≤-28.39	PASS
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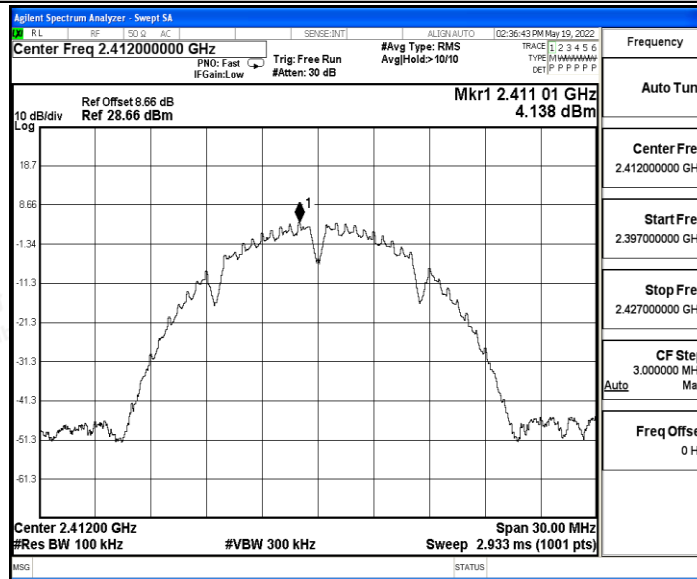


Shenzhen LCS Compliance Testing Laboratory Ltd.
Add: 101, 201 Bldg A & 301 Bldg C, Juji Industrial Park Yabianxueziwei, Shajing Street, Baoan District, Shenzhen, 518000, China
Tel: +(86) 0755-82591330 | E-mail: webmaster@lcs-cert.com | Web: www.lcs-cert.com
Scan code to check authenticity

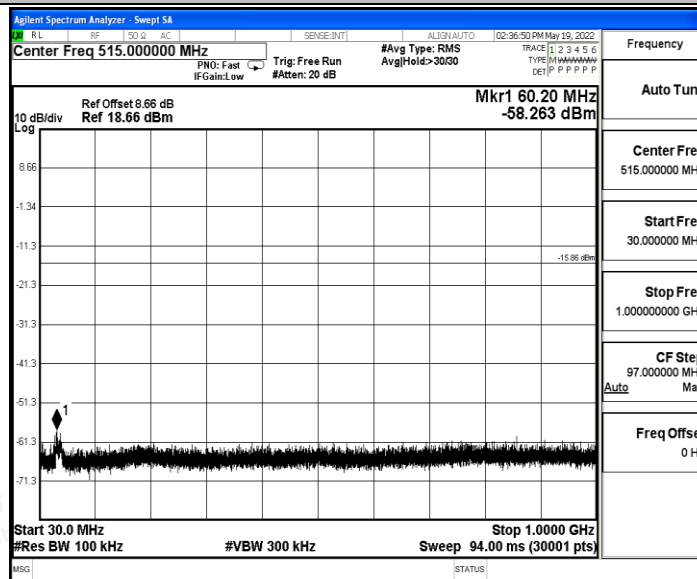


Test Graphs

11B_Ant_2412_0~Reference

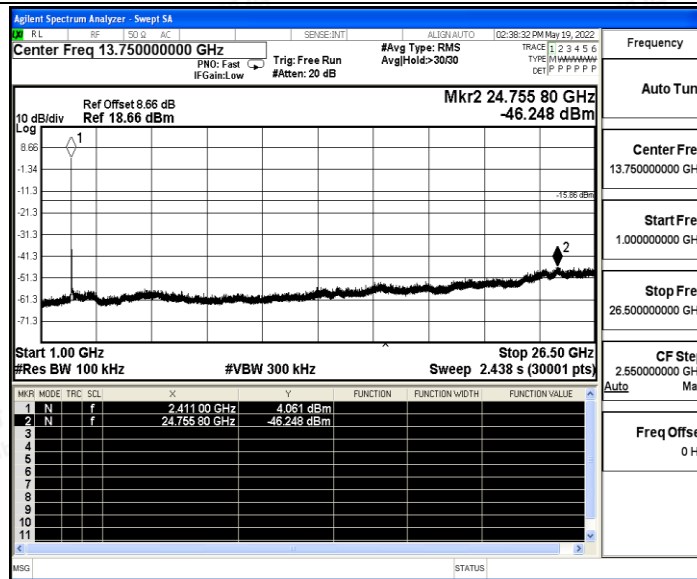


11B_Ant_2412_30~1000

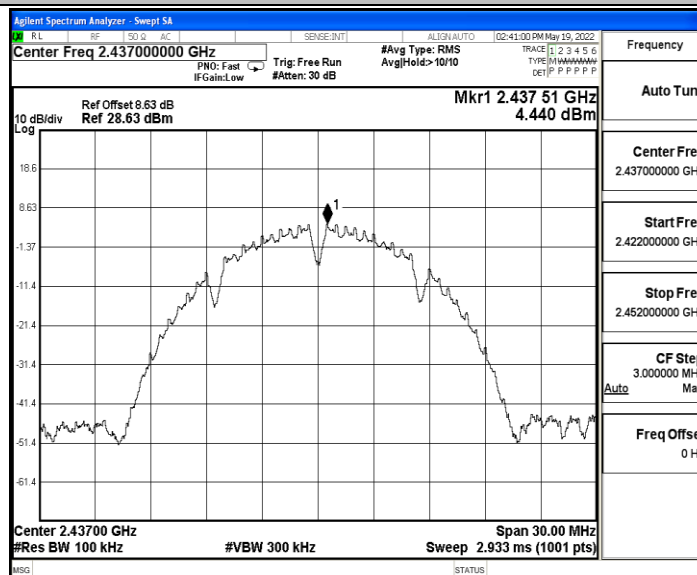


11B_Ant_2412_1000~26500



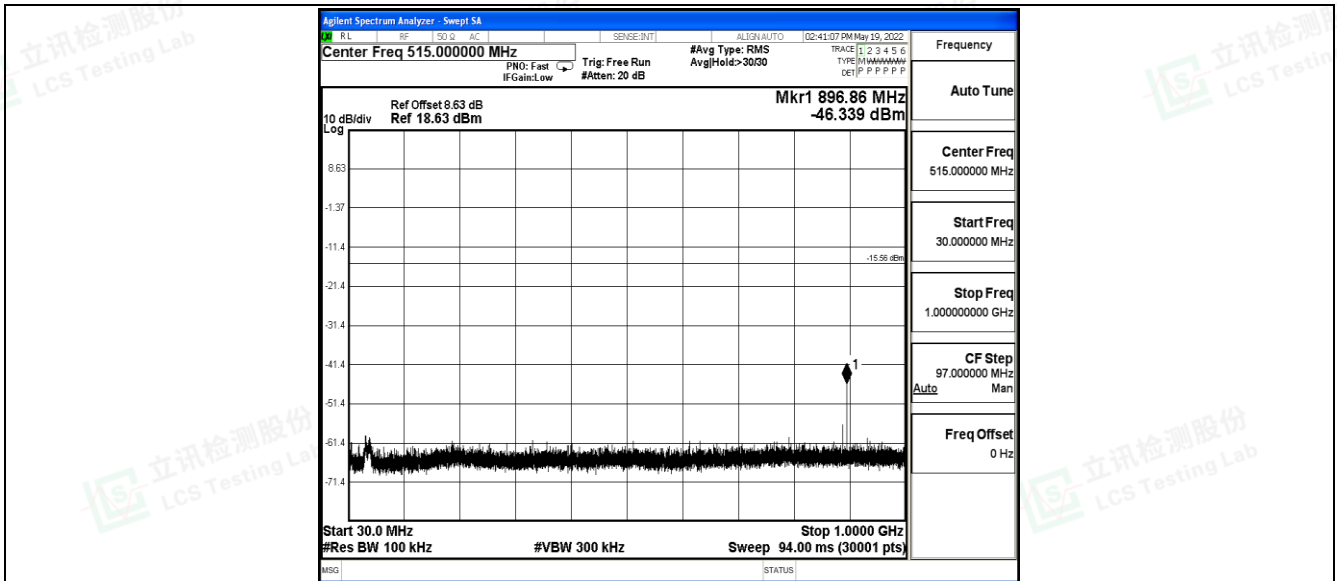


11B_Ant_2437_0~Reference

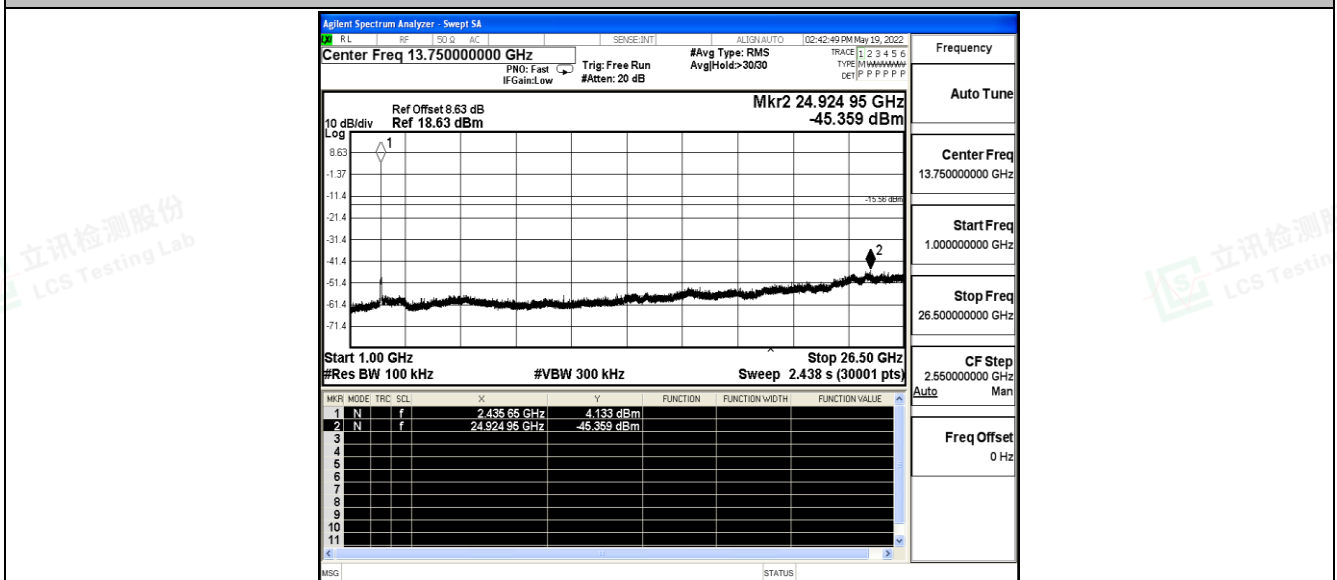


11B_Ant_2437_30~1000



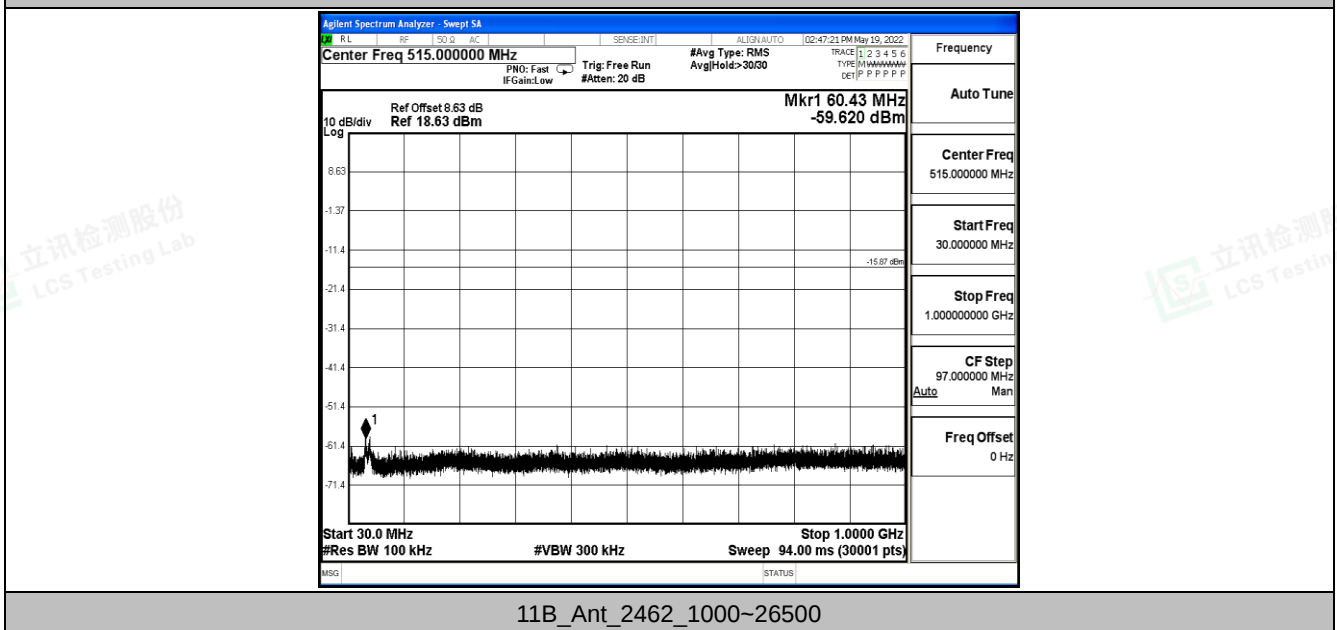
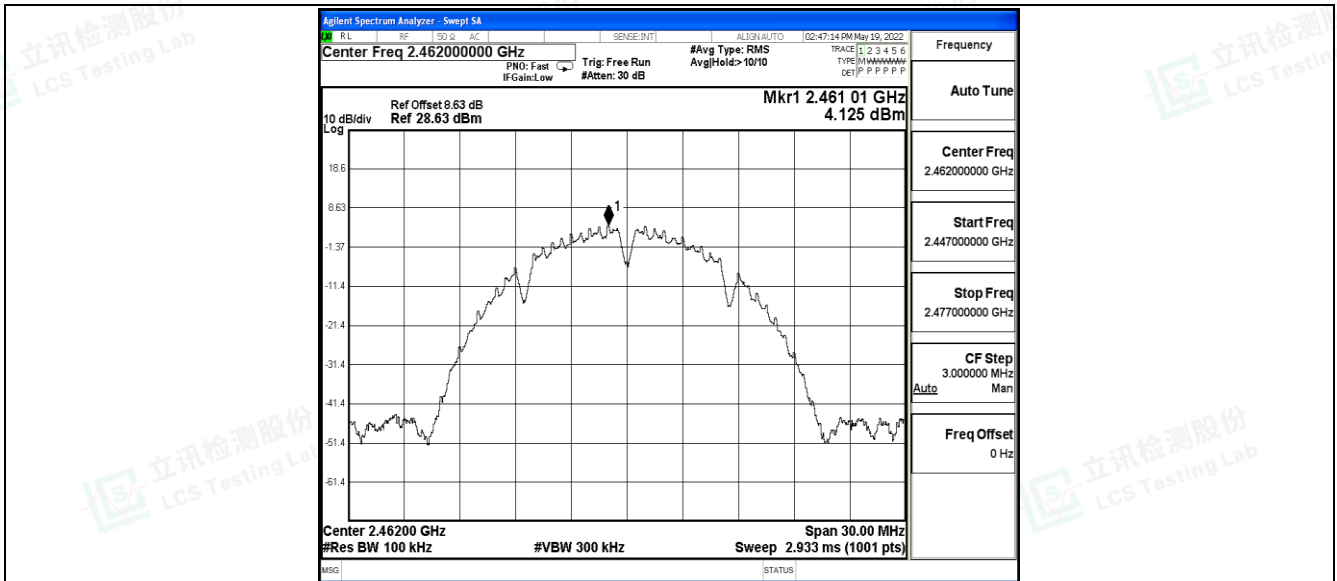


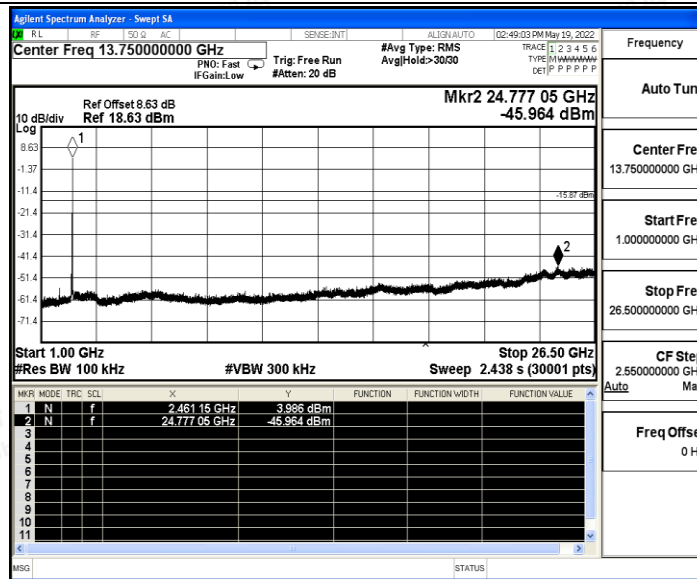
11B_Ant_2437_1000~26500



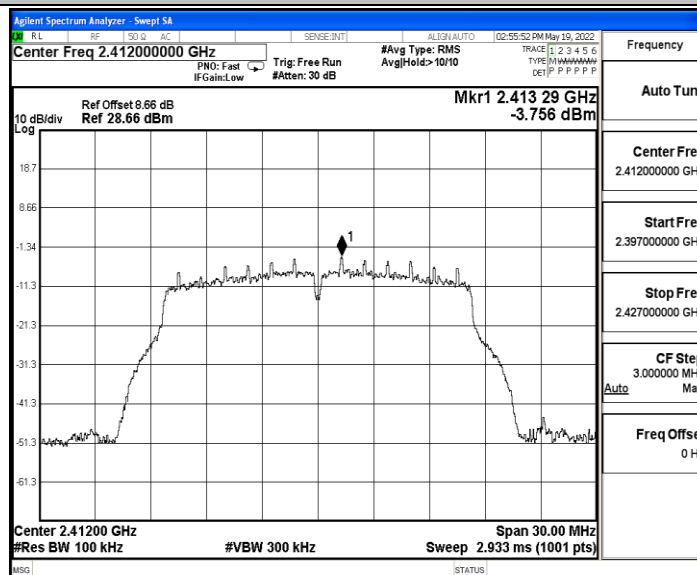
11B_Ant_2462_0~Reference





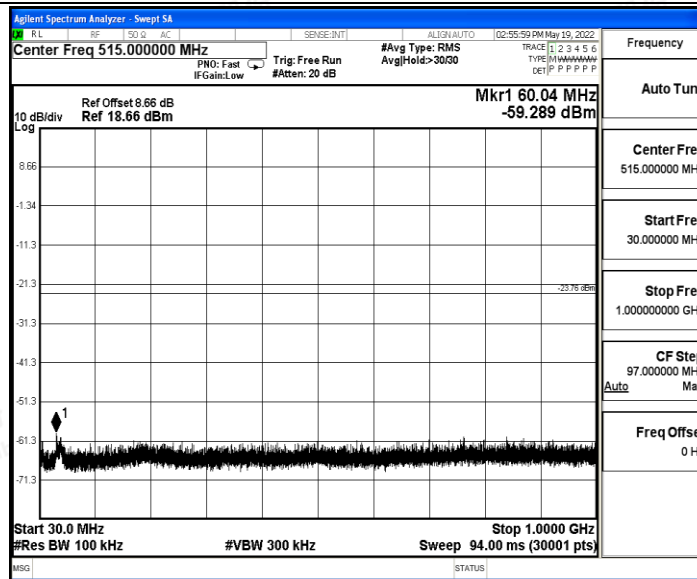


11G_Ant_2412_0~Reference

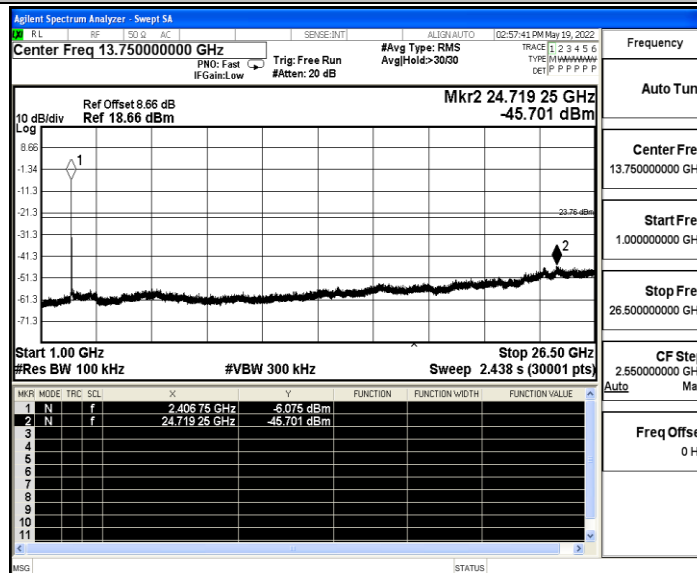


11G_Ant_2412_30~1000





11G_Ant_2412_1000~26500



11G_Ant_2437_0~Reference



