

RF Test Data for 2.4G Wi-Fi (Conducted Measurements)

General Description of EUT	
Product Name:	Dash Camera
Test Model:	GD850
Sample ID:	20210817-21-02
Environmental Conditions	
Temperature:	24°C
Relative Humidity:	48%
Test Voltage:	DC 3.7V
Test Engineer:	Huang jian ping
Note: For a more detailed features description, please refer to the report TB-FCC183940	

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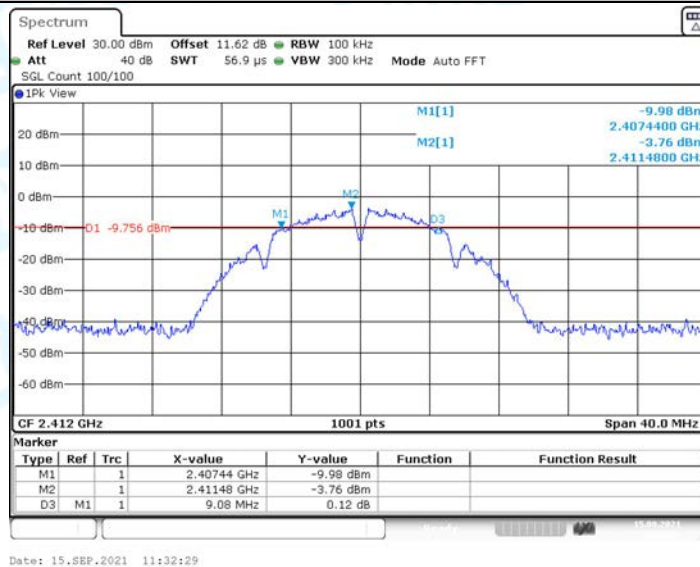
1. DTS Bandwidth

1.1. Test Result

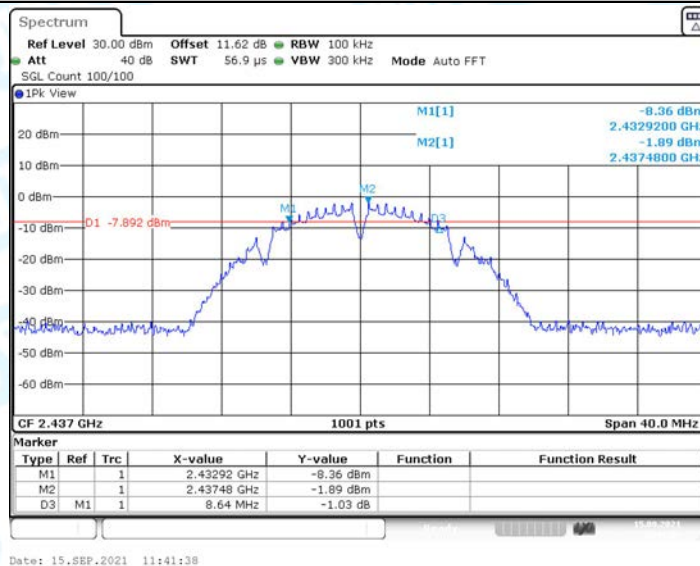
TestMode	Antenna	Channel	DTS BW [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
11B	Ant1	2412	9.080	2407.440	2416.520	0.5	PASS
		2437	8.640	2432.920	2441.560	0.5	PASS
		2462	9.120	2457.440	2466.560	0.5	PASS
11G	Ant1	2412	16.480	2403.760	2420.240	0.5	PASS
		2437	16.480	2428.760	2445.240	0.5	PASS
		2462	16.520	2453.760	2470.280	0.5	PASS
11N20SISO	Ant1	2412	17.640	2403.240	2420.880	0.5	PASS
		2437	17.640	2428.240	2445.880	0.5	PASS
		2462	17.640	2453.240	2470.880	0.5	PASS

1.2. Test Graphs

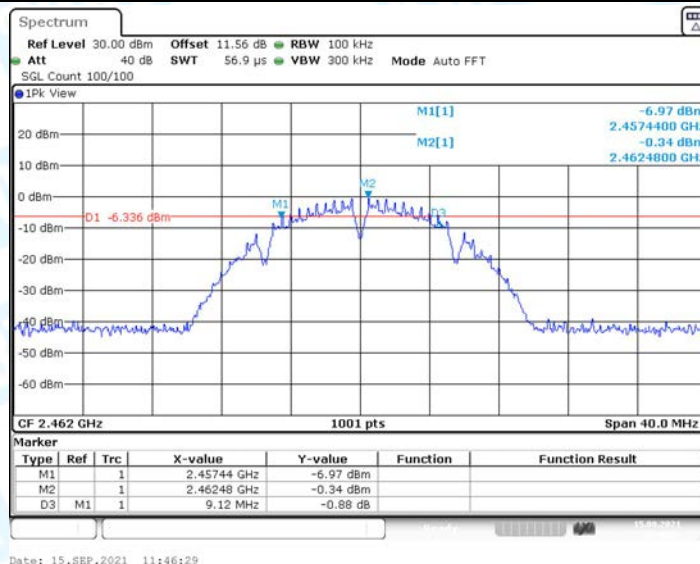
11B_Ant1_2412



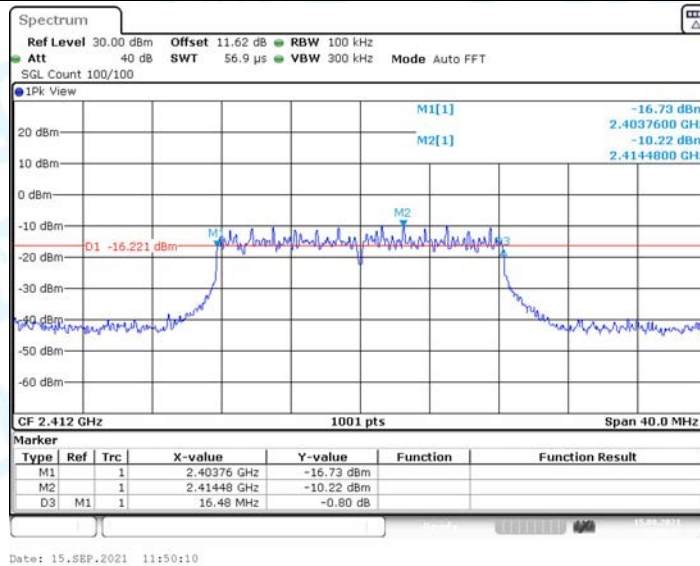
11B_Ant1_2437



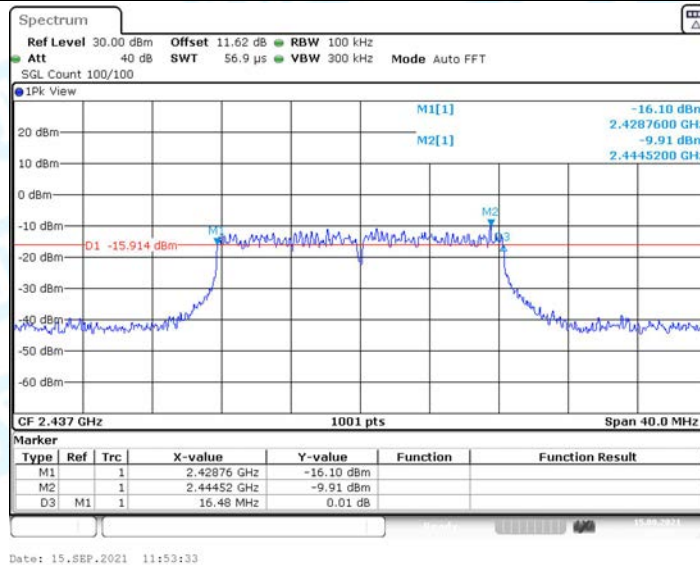
11B_Ant1_2462



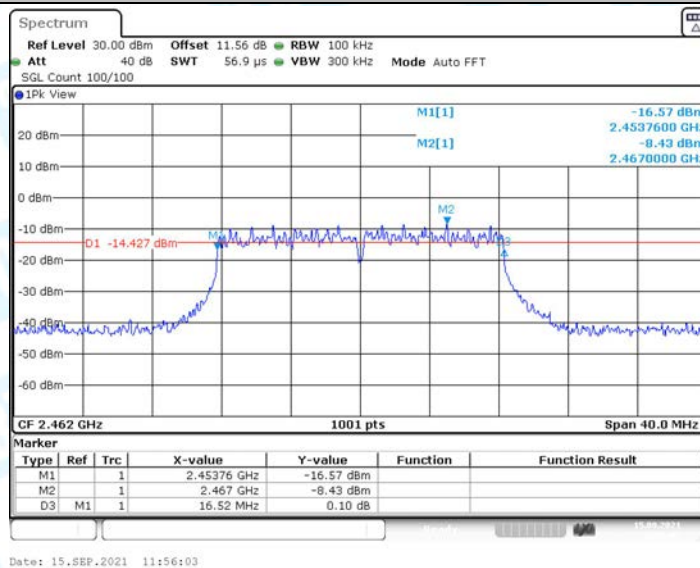
11G_Ant1_2412



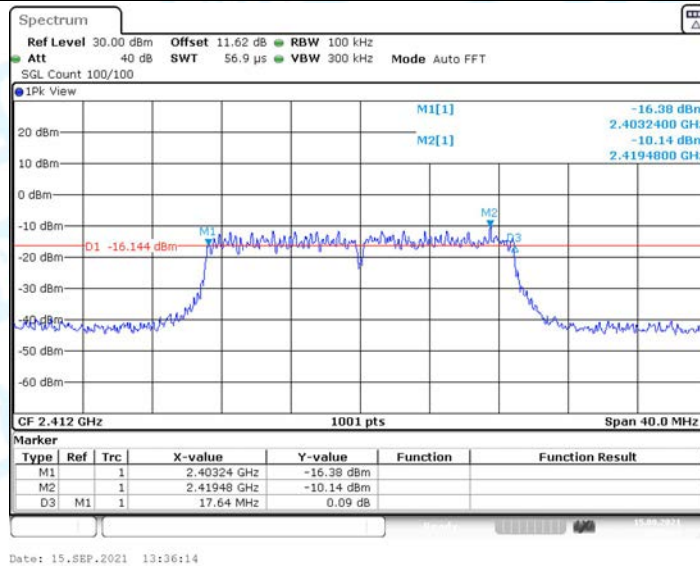
11G_Ant1_2437



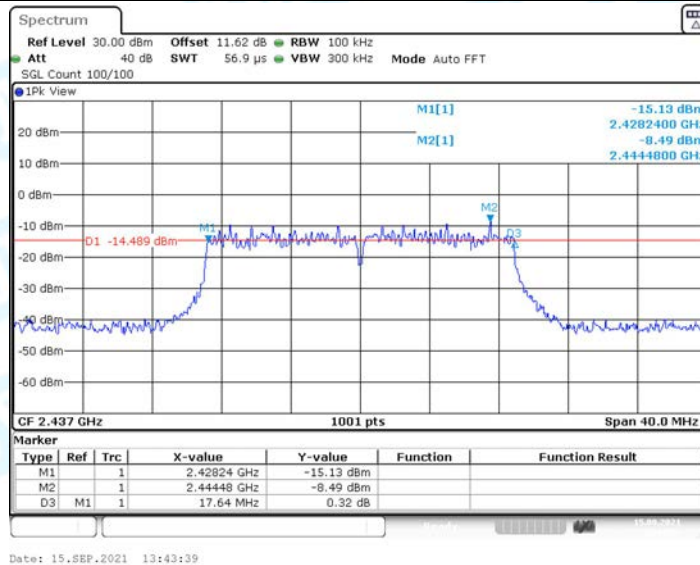
11G_Ant1_2462



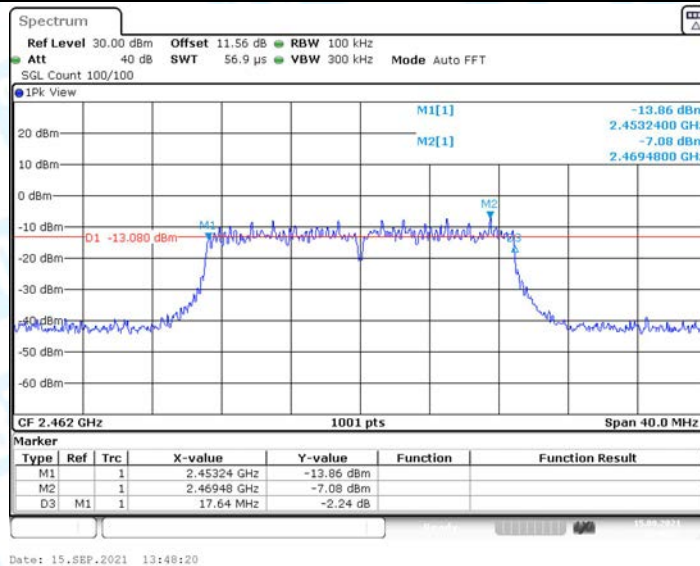
11N20SISO_Ant1_2412



11N20SISO_Ant1_2437



11N20SISO_Ant1_2462



2. Occupied Channel Bandwidth

2.1. Test Result

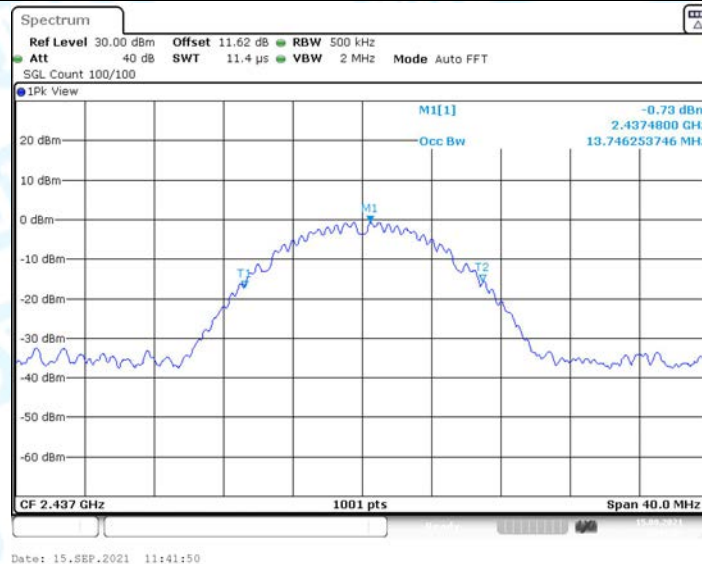
TestMode	Antenna	Channel	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
11B	Ant1	2412	13.706	2405.207	2418.913	---	PASS
		2437	13.746	2430.207	2443.953	---	PASS
		2462	13.546	2455.367	2468.913	---	PASS
11G	Ant1	2412	16.983	2403.608	2420.591	---	PASS
		2437	16.783	2428.648	2445.432	---	PASS
		2462	16.823	2453.568	2470.392	---	PASS
11N20SISO	Ant1	2412	18.142	2402.969	2421.111	---	PASS
		2437	17.982	2428.089	2446.071	---	PASS
		2462	18.262	2453.009	2471.271	---	PASS

2.2. Test Graphs

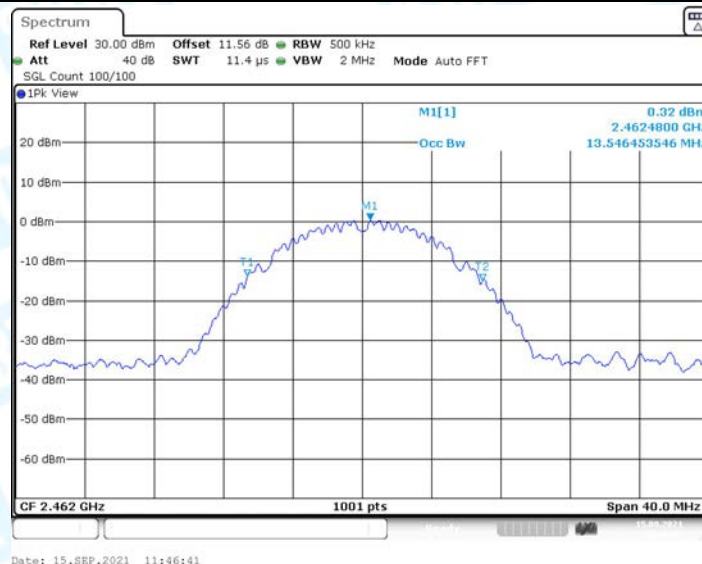
11B_Ant1_2412



11B_Ant1_2437



11B_Ant1_2462



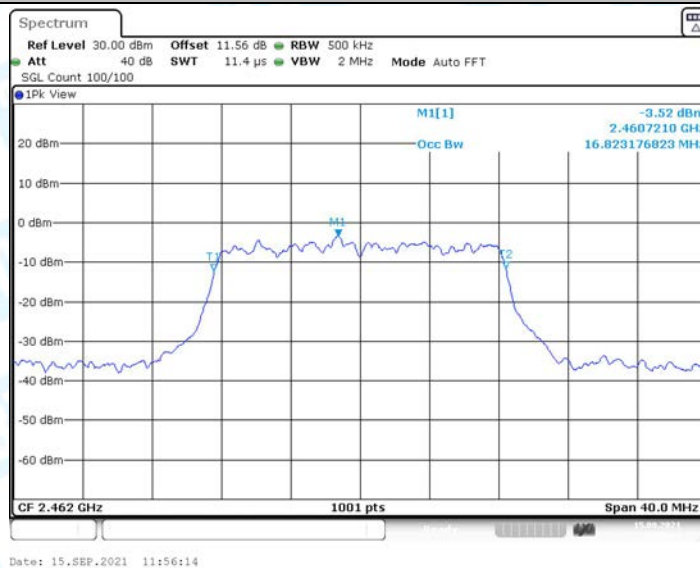
11G_Ant1_2412



11G_Ant1_2437



11G_Ant1_2462



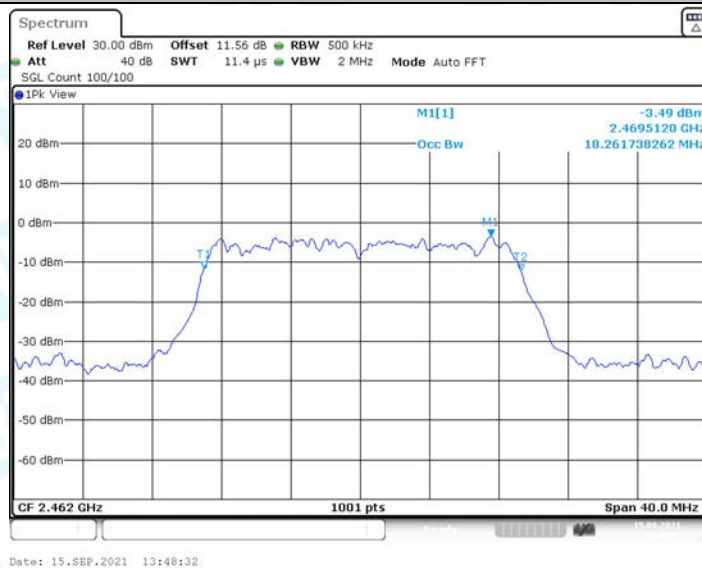
11N20SISO_Ant1_2412



11N20SISO_Ant1_2437



11N20SISO_Ant1_2462



3. Maximum conducted output power

3.1. Test Result

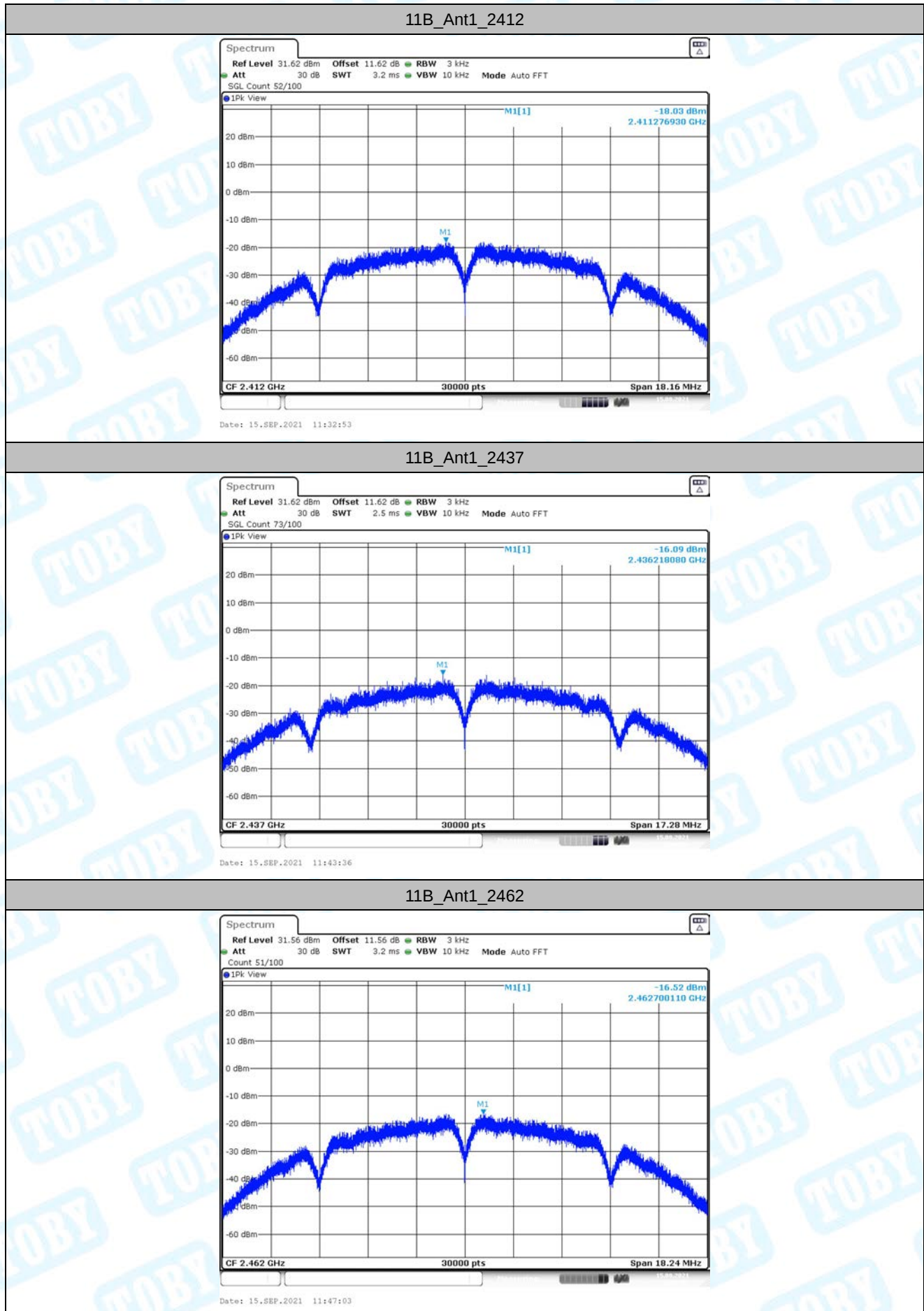
TestMode	Antenna	Channel	Result[dBm]	Limit[dBm]	Verdict
11B	Ant1	2412	10.05	≤30	PASS
		2437	10.38	≤30	PASS
		2462	11.43	≤30	PASS
11G	Ant1	2412	8.34	≤30	PASS
		2437	9.12	≤30	PASS
		2462	10.38	≤30	PASS
11N20SISO	Ant1	2412	8.50	≤30	PASS
		2437	9.66	≤30	PASS
		2462	11.10	≤30	PASS

4. Maximum power spectral density

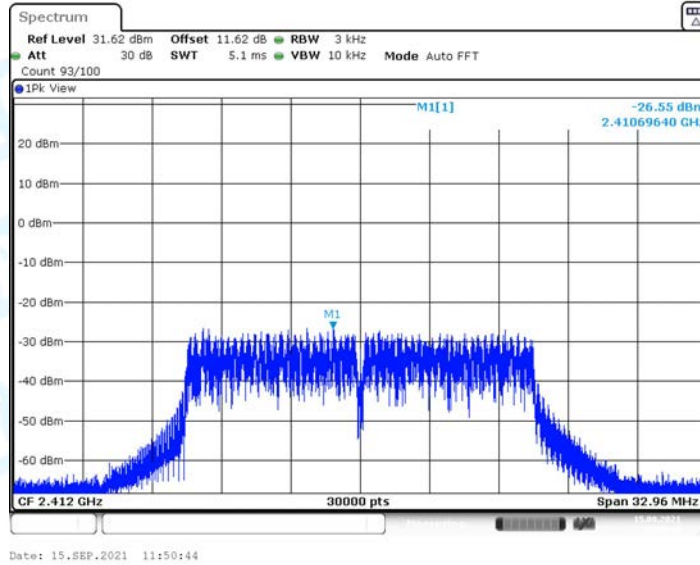
4.1. Test Result

TestMode	Antenna	Channel	Result[dBm/3-100kHz]	Limit[dBm/3kHz]	Verdict
11B	Ant1	2412	-18.03	≤8	PASS
		2437	-16.09	≤8	PASS
		2462	-16.52	≤8	PASS
11G	Ant1	2412	-26.55	≤8	PASS
		2437	-25.9	≤8	PASS
		2462	-24.7	≤8	PASS
11N20SISO	Ant1	2412	-24.85	≤8	PASS
		2437	-23.98	≤8	PASS
		2462	-22.76	≤8	PASS

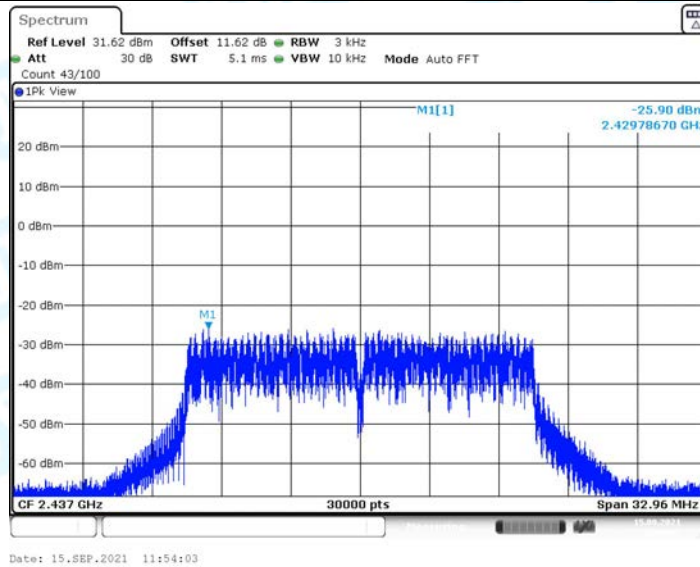
4.2. Test Graphs



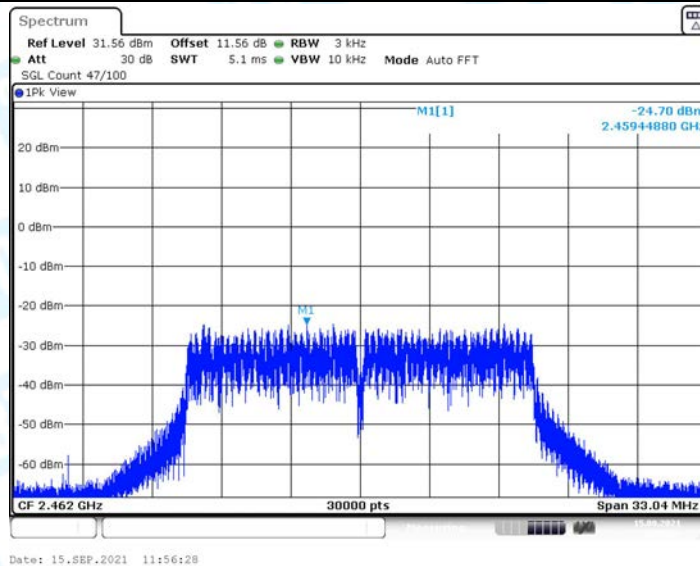
11G_Ant1_2412



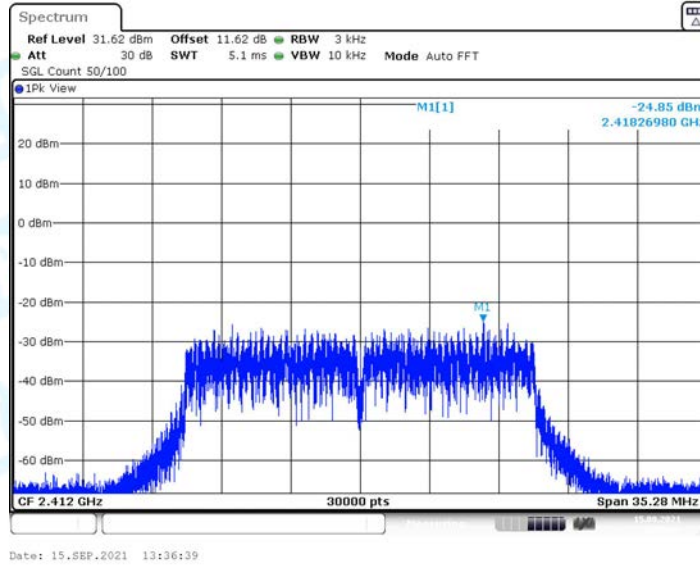
11G_Ant1_2437



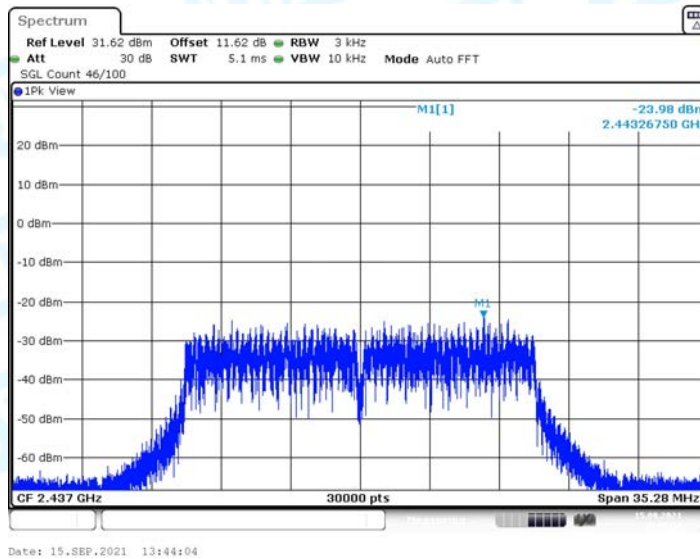
11G_Ant1_2462



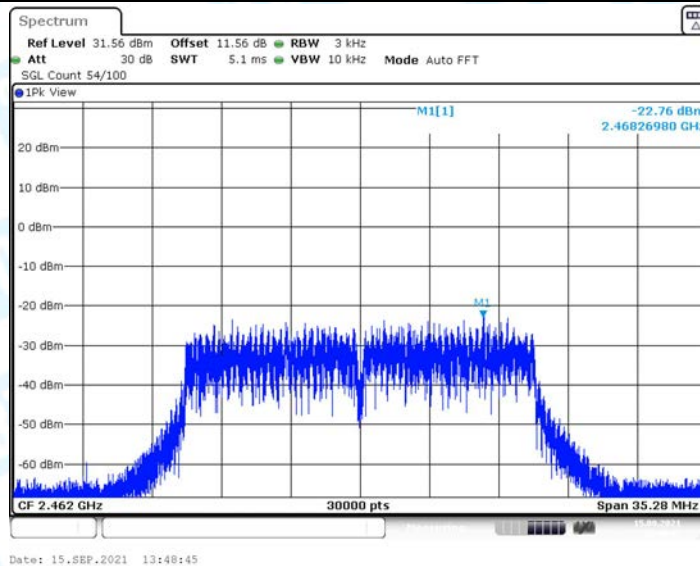
11N20SISO_Ant1_2412



11N20SISO_Ant1_2437



11N20SISO_Ant1_2462



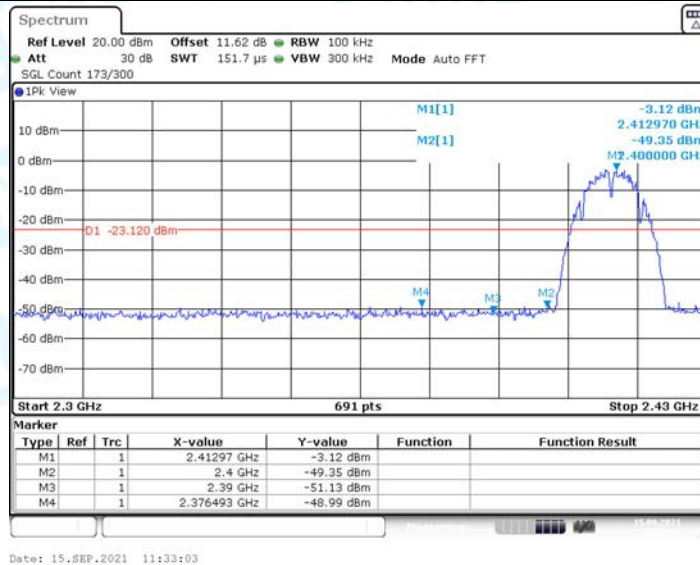
5. Band edge measurements

5.1. Test Result

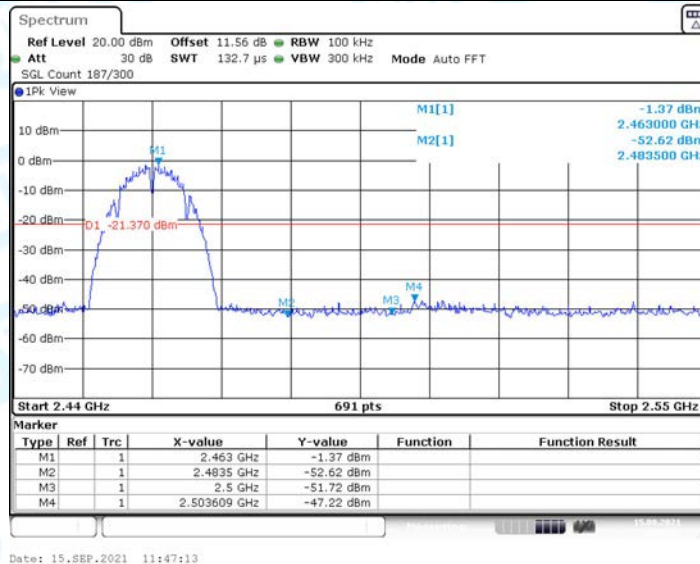
TestMode	Antenna	ChName	Channel	RefLevel[dBm]	Result[dBm]	Limit[dBm]	Verdict
11B	Ant1	Low	2412	-3.12	-48.99	≤ -23.12	PASS
		High	2462	-1.37	-47.22	≤ -21.37	PASS
11G	Ant1	Low	2412	-10.16	-48.84	≤ -30.16	PASS
		High	2462	-8.90	-47.72	≤ -28.9	PASS
11N20SISO	Ant1	Low	2412	-10.01	-48.39	≤ -30.01	PASS
		High	2462	-8.35	-47.78	≤ -28.35	PASS

5.2. Test Graphs

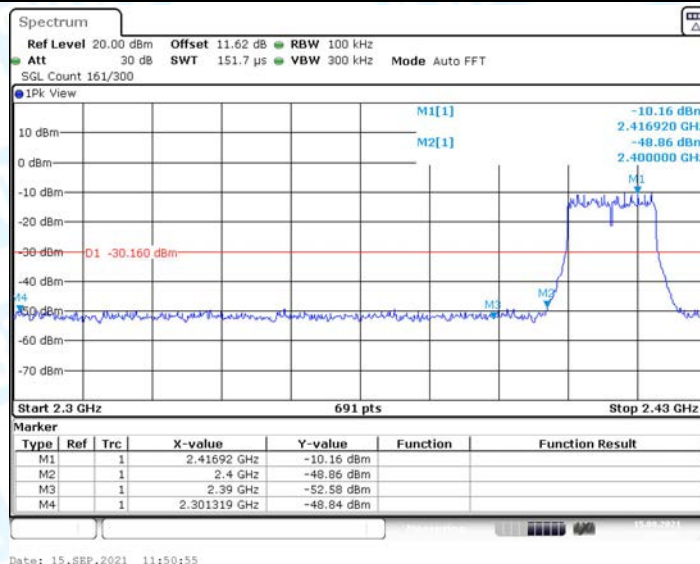
11B_Ant1_Low_2412



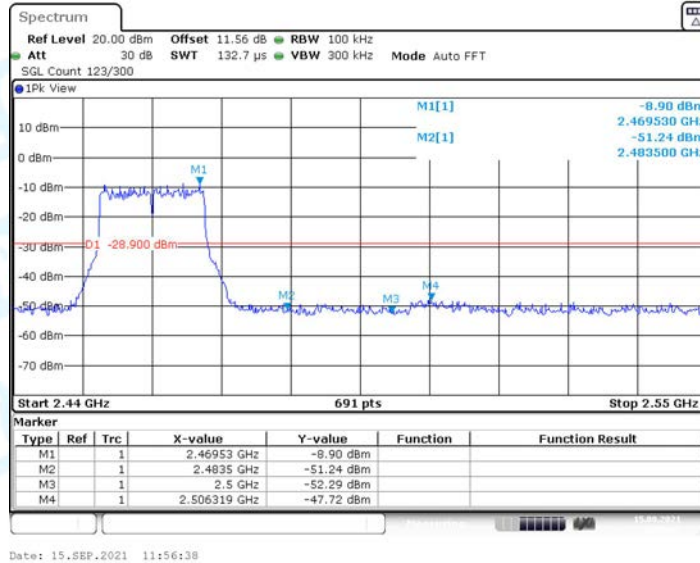
11B_Ant1_High_2462



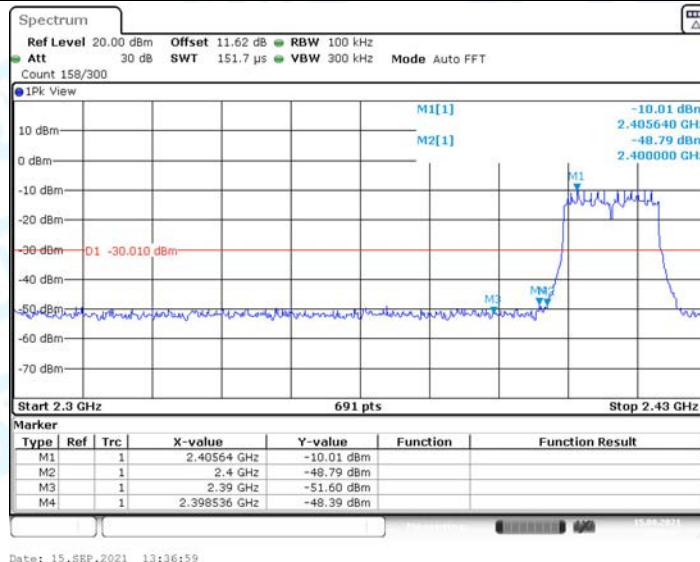
11G_Ant1_Low_2412



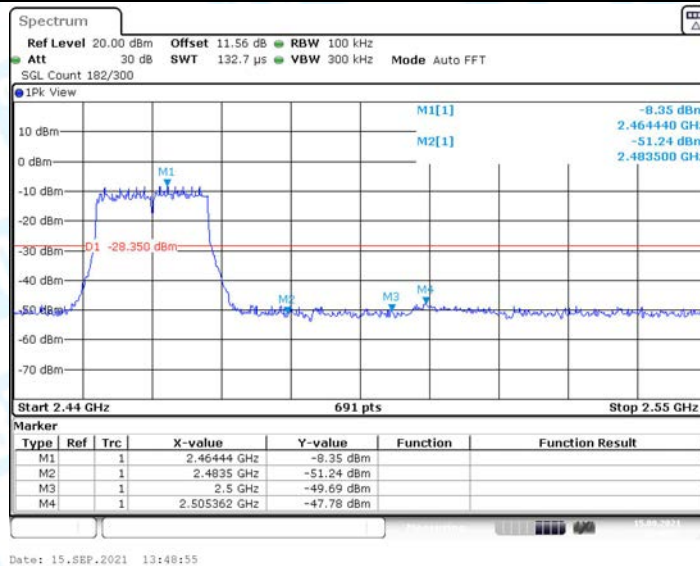
11G_Ant1_High_2462



11N20SISO_Ant1_Low_2412



11N20SISO_Ant1_High_2462

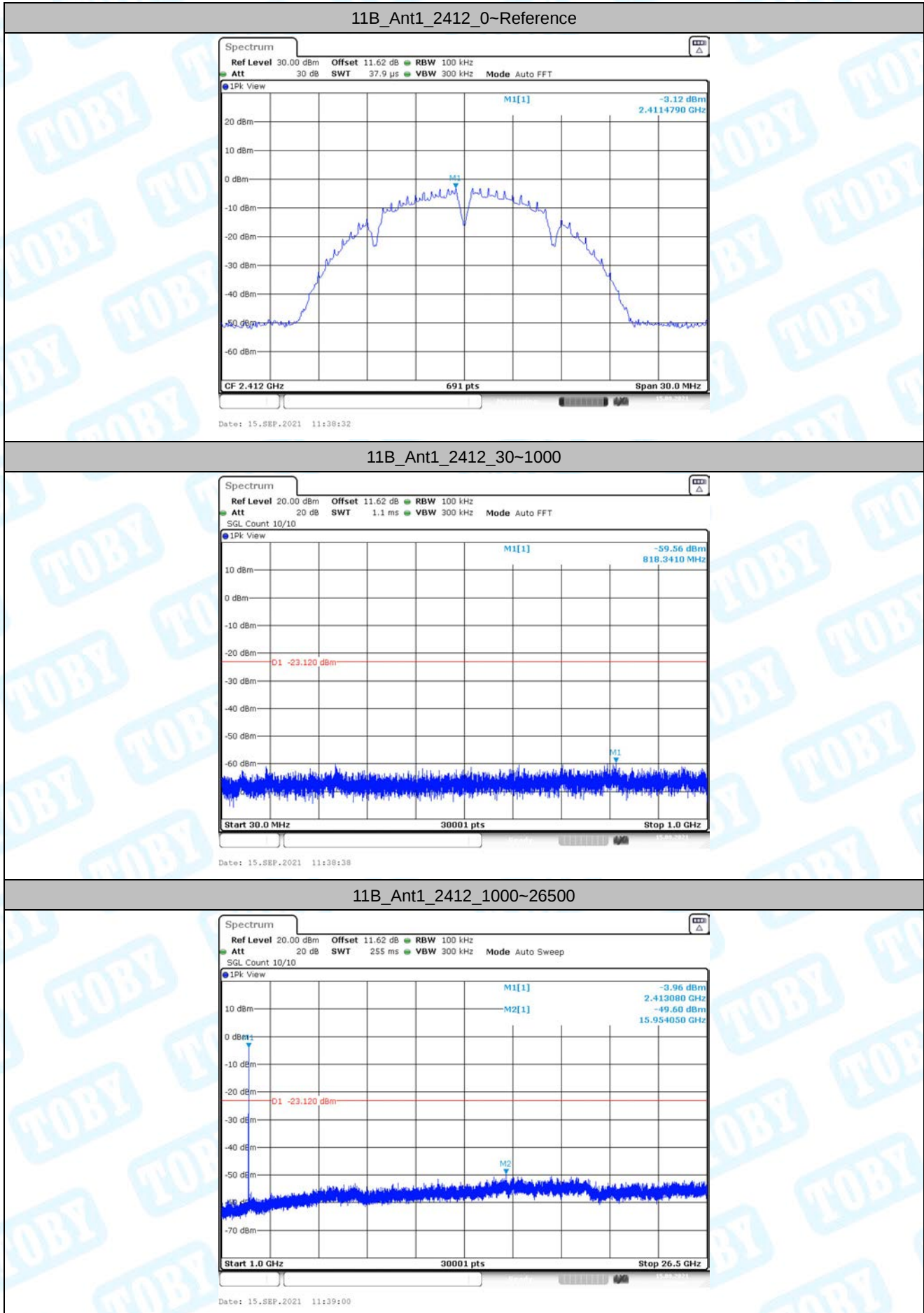


6. Conducted Spurious Emission

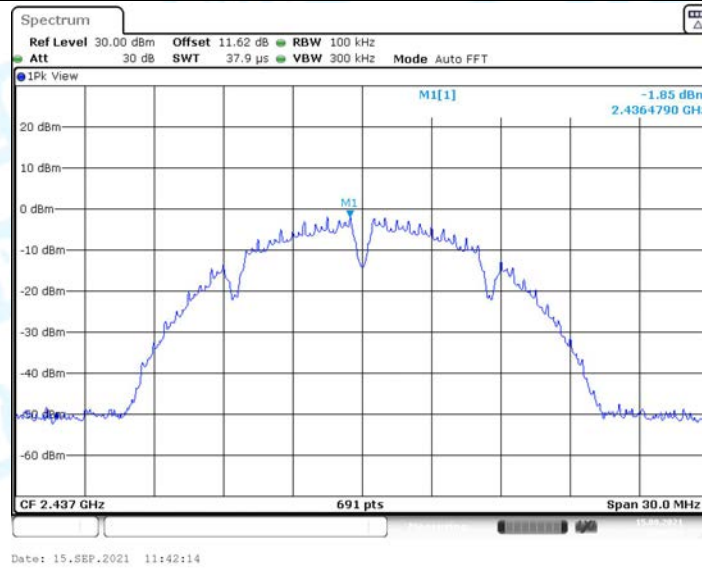
6.1. Test Result

TestMode	Antenna	Channel	FreqRange [Mhz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
11B	Ant1	2412	Reference	-3.12	-3.12	---	PASS
			30~1000	-3.12	-59.56	≤-23.12	PASS
			1000~26500	-3.12	-49.6	≤-23.12	PASS
		2437	Reference	-1.85	-1.85	---	PASS
			30~1000	-1.85	-58.14	≤-21.85	PASS
			1000~26500	-1.85	-50.02	≤-21.85	PASS
		2462	Reference	-0.94	-0.94	---	PASS
			30~1000	-0.94	-59.04	≤-20.94	PASS
			1000~26500	-0.94	-50.23	≤-20.94	PASS
11G	Ant1	2412	Reference	-10.23	-10.23	---	PASS
			30~1000	-10.23	-58.38	≤-30.23	PASS
			1000~26500	-10.23	-50.47	≤-30.23	PASS
		2437	Reference	-9.37	-9.37	---	PASS
			30~1000	-9.37	-59.92	≤-29.37	PASS
			1000~26500	-9.37	-49.68	≤-29.37	PASS
		2462	Reference	-7.90	-7.90	---	PASS
			30~1000	-7.90	-58.88	≤-27.9	PASS
			1000~26500	-7.90	-50.12	≤-27.9	PASS
11N20SISO	Ant1	2412	Reference	-9.78	-9.78	---	PASS
			30~1000	-9.78	-59.47	≤-29.78	PASS
			1000~26500	-9.78	-49.54	≤-29.78	PASS
		2437	Reference	-8.67	-8.67	---	PASS
			30~1000	-8.67	-59.85	≤-28.67	PASS
			1000~26500	-8.67	-50.21	≤-28.67	PASS
		2462	Reference	-7.11	-7.11	---	PASS
			30~1000	-7.11	-60.15	≤-27.11	PASS
			1000~26500	-7.11	-50.12	≤-27.11	PASS

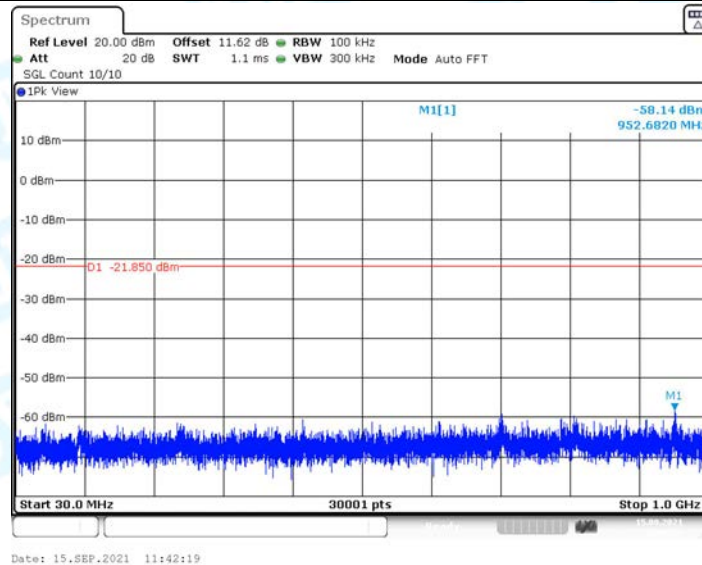
6.2.Test Graphs



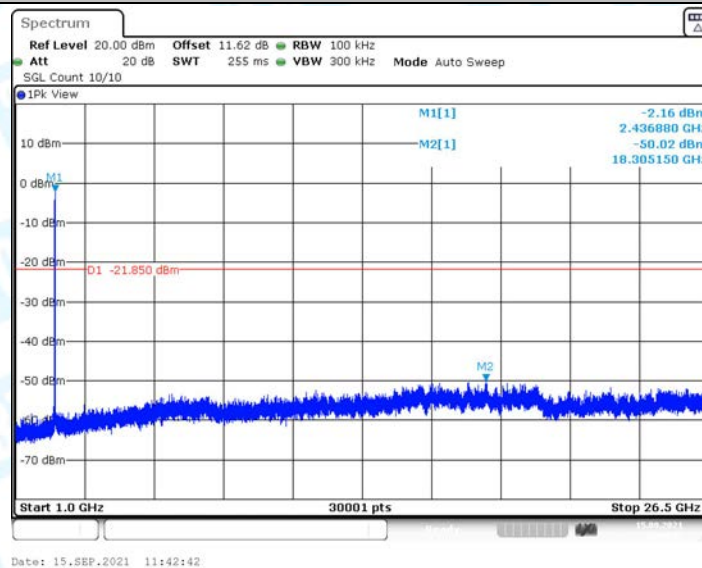
11B_Ant1_2437_0~Reference



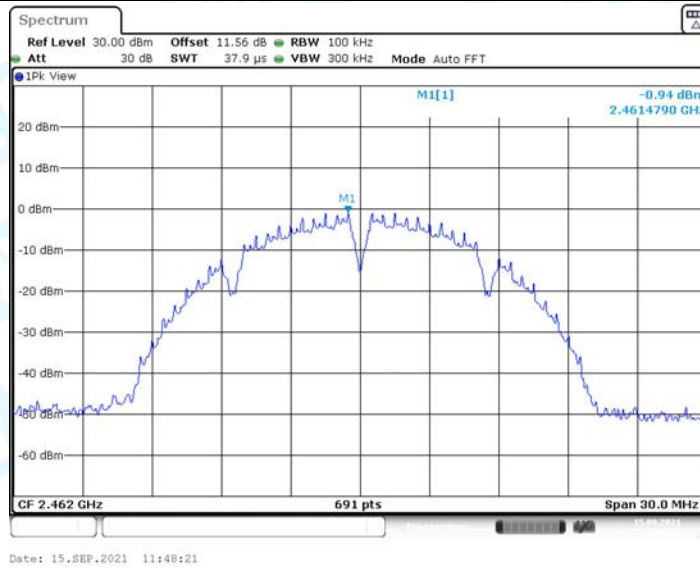
11B_Ant1_2437_30~1000



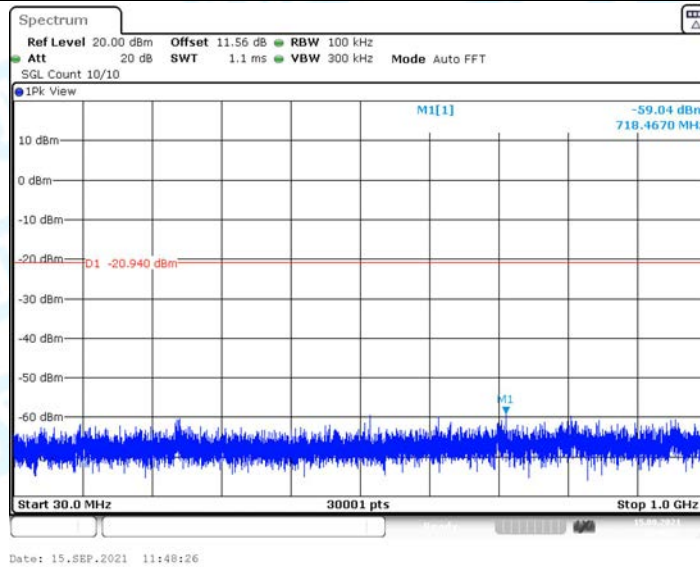
11B_Ant1_2437_1000~26500



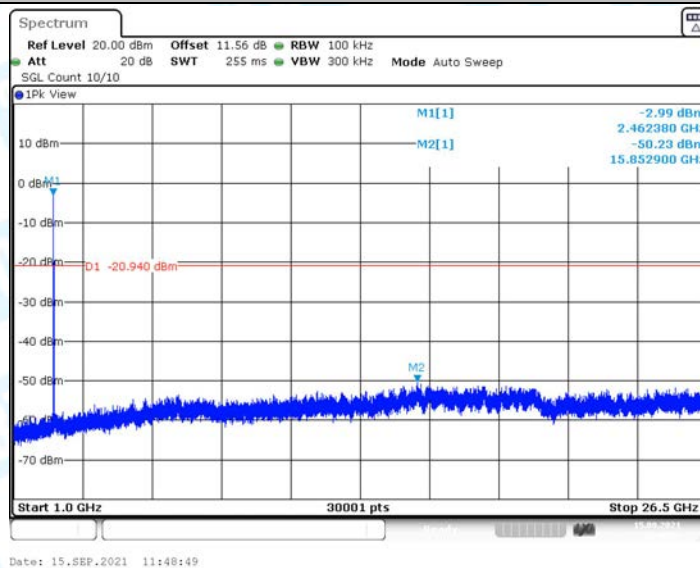
11B_Ant1_2462_0~Reference



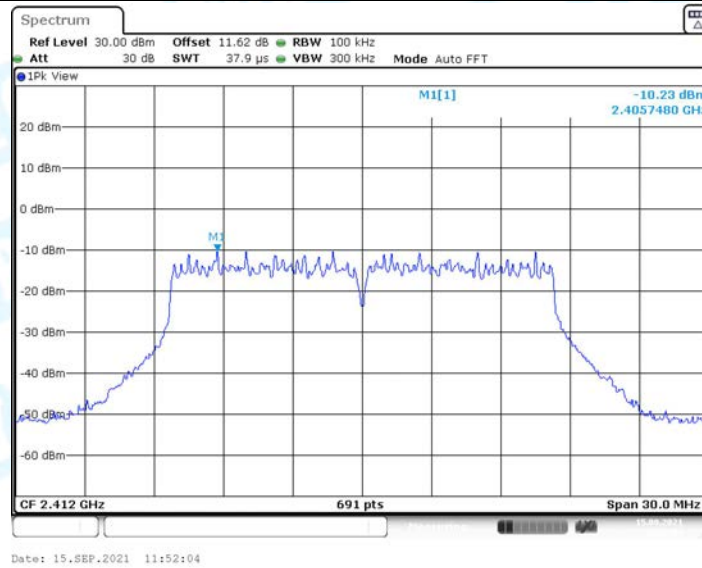
11B_Ant1_2462_30~1000



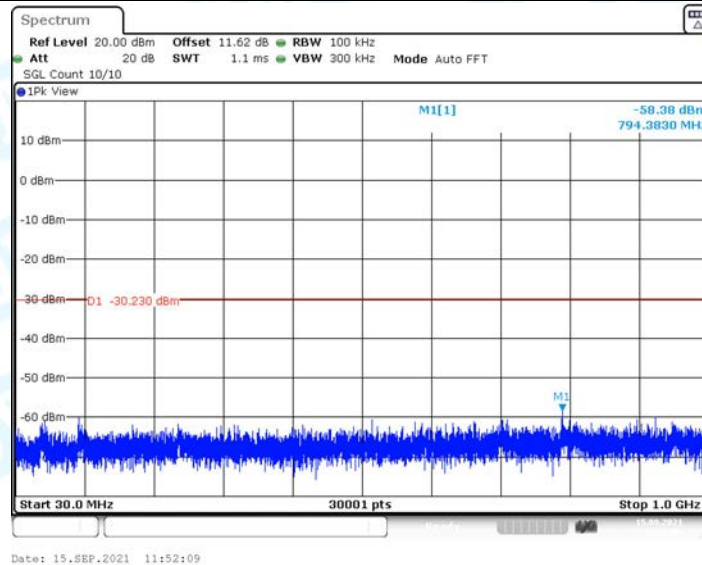
11B_Ant1_2462_1000~26500



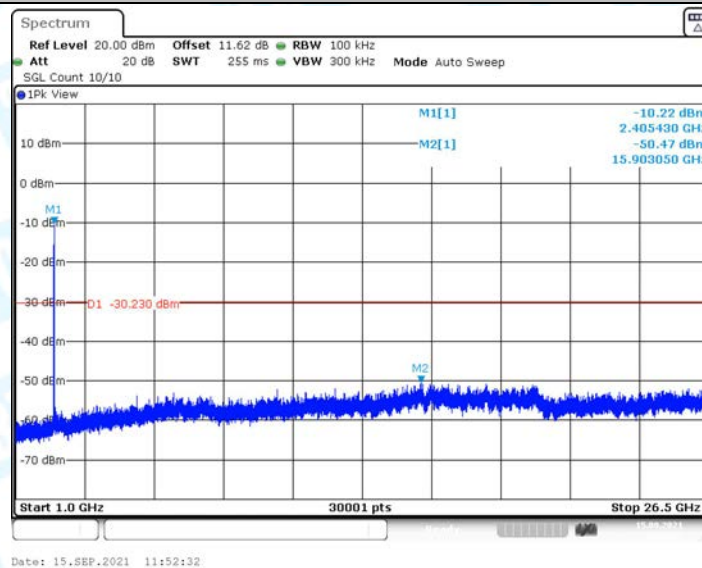
11G_Ant1_2412_0~Reference



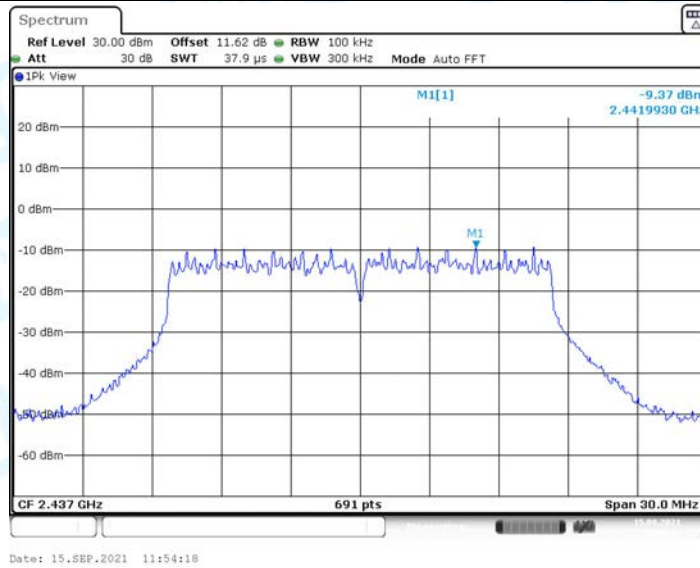
11G_Ant1_2412_30~1000



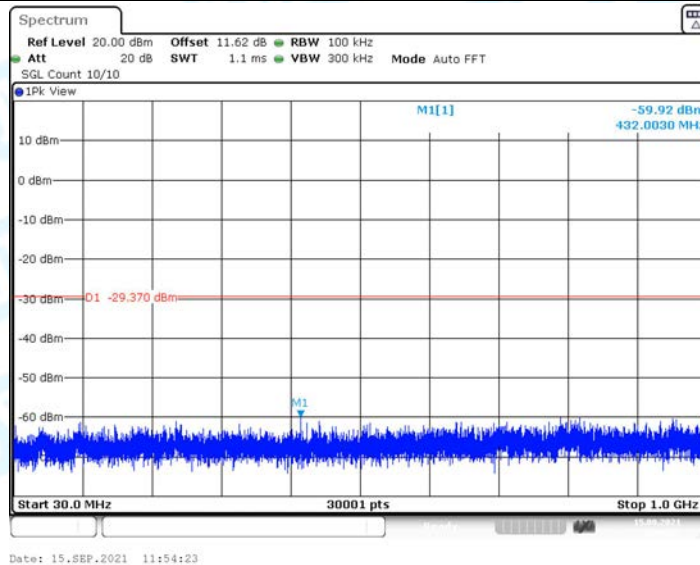
11G_Ant1_2412_1000~26500



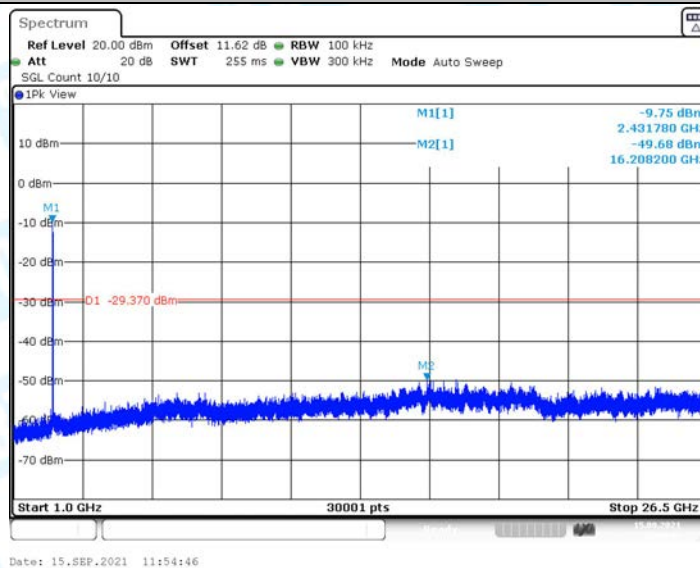
11G_Ant1_2437_0~Reference



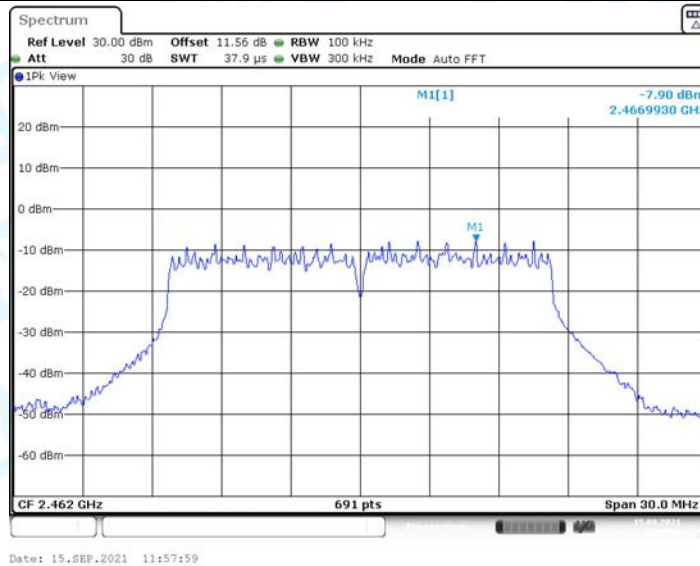
11G_Ant1_2437_30~1000



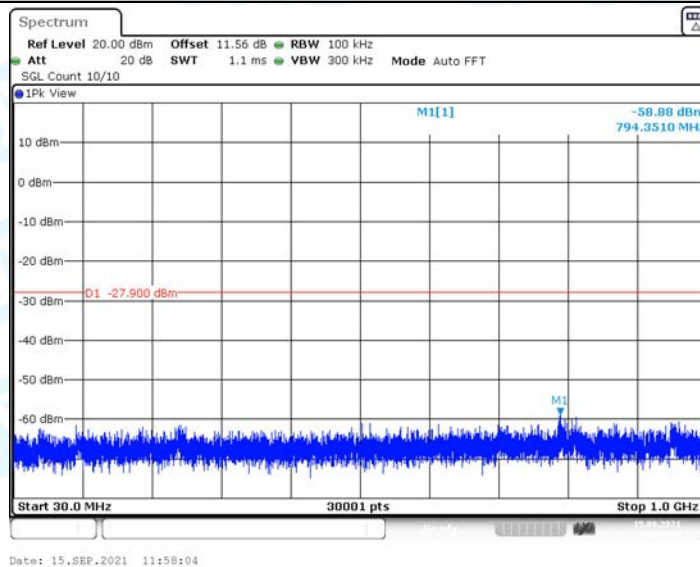
11G_Ant1_2437_1000~26500



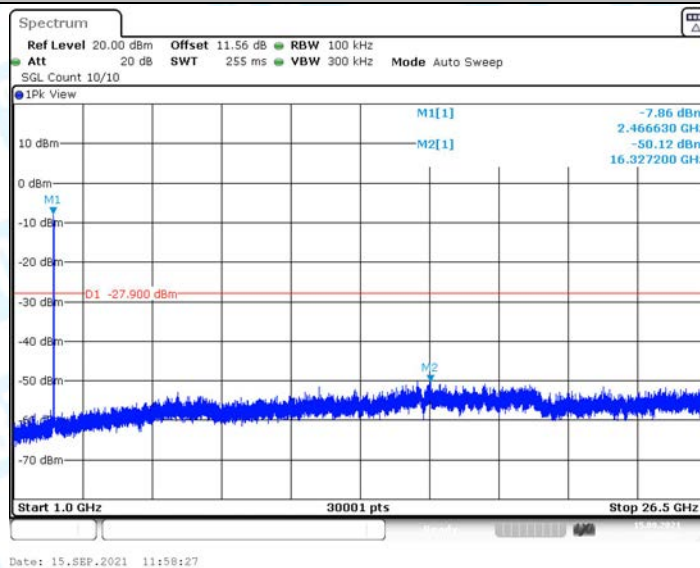
11G_Ant1_2462_0~Reference



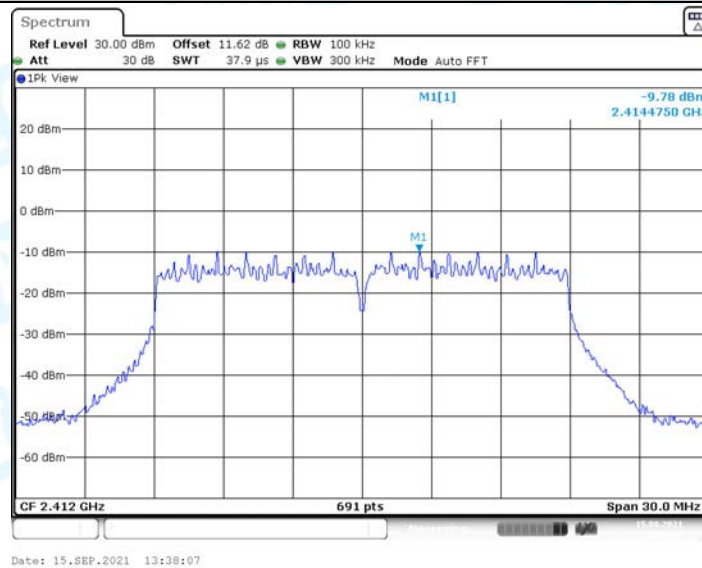
11G_Ant1_2462_30~1000



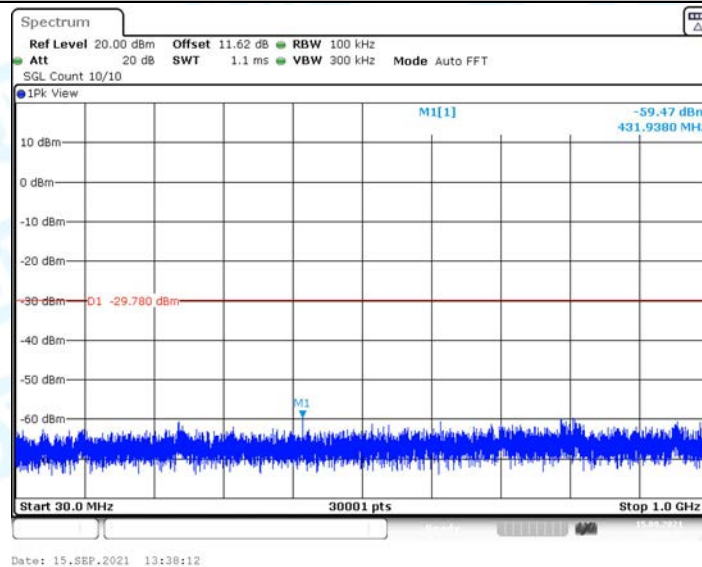
11G_Ant1_2462_1000~26500



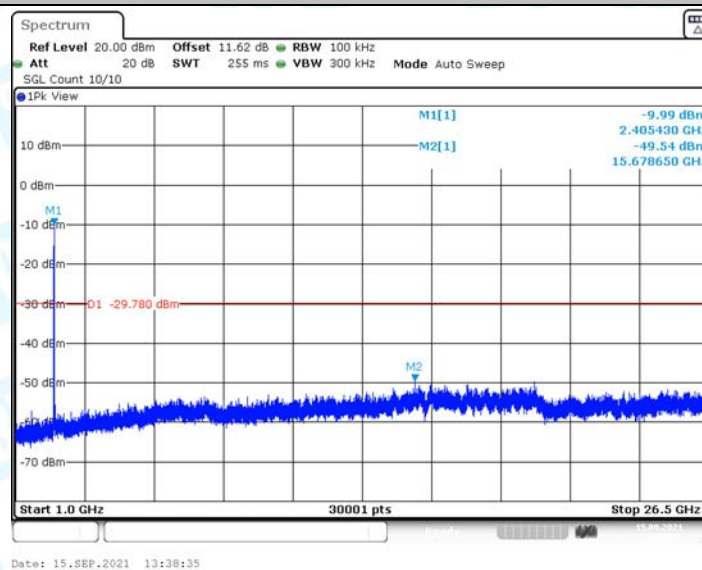
11N20SISO_Ant1_2412_0~Reference



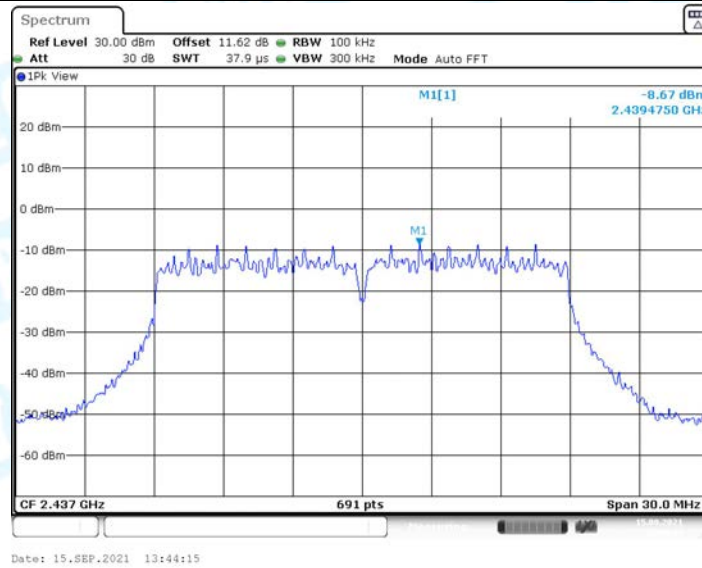
11N20SISO_Ant1_2412_30~1000



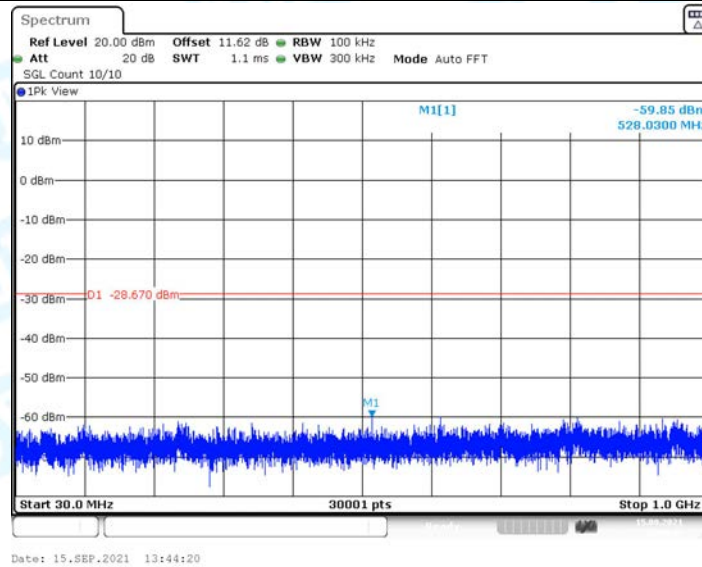
11N20SISO_Ant1_2412_1000~26500



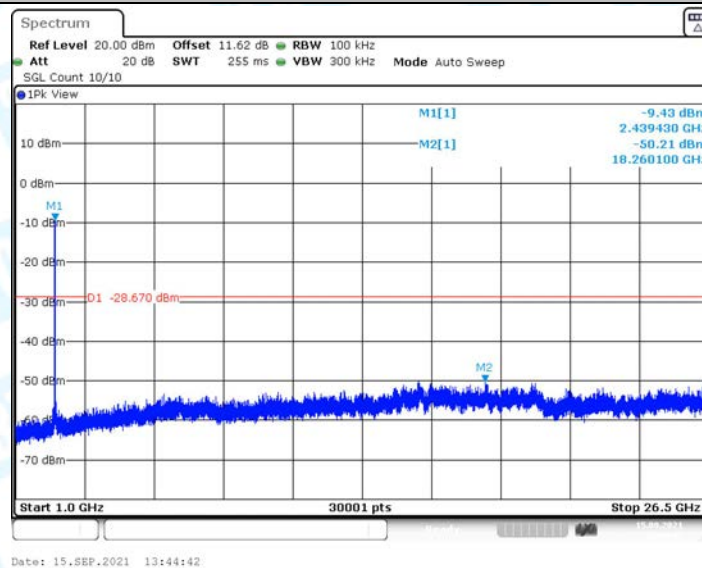
11N20SISO_Ant1_2437_0~Reference

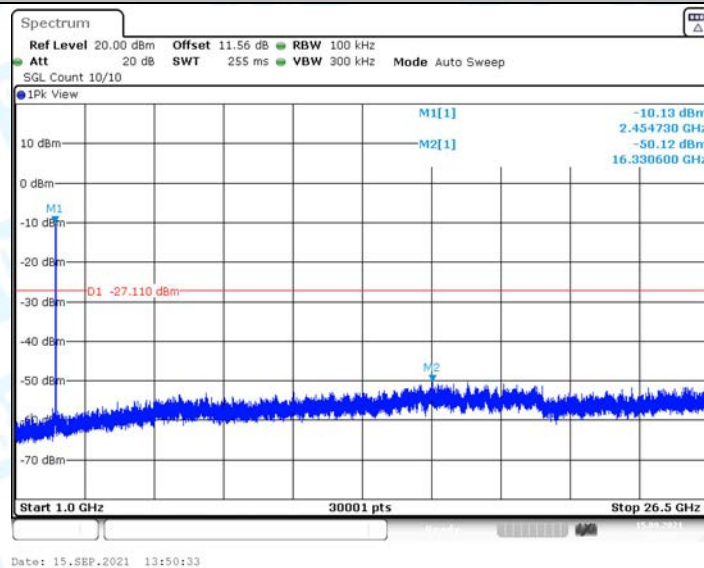
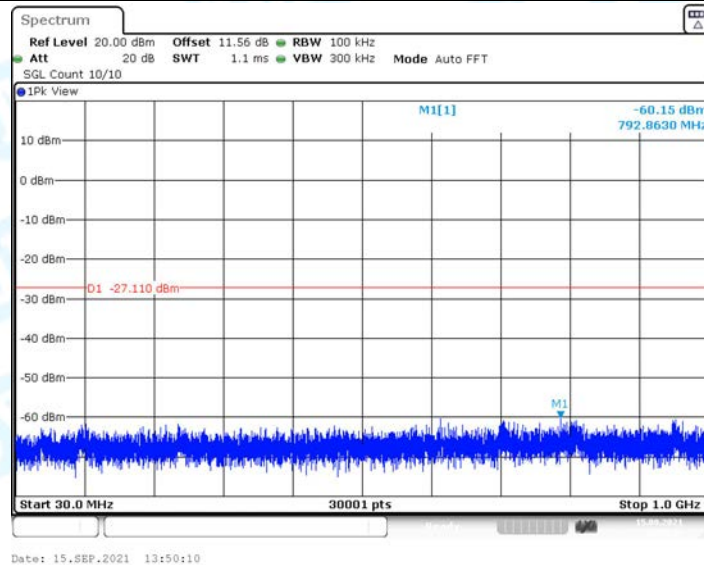
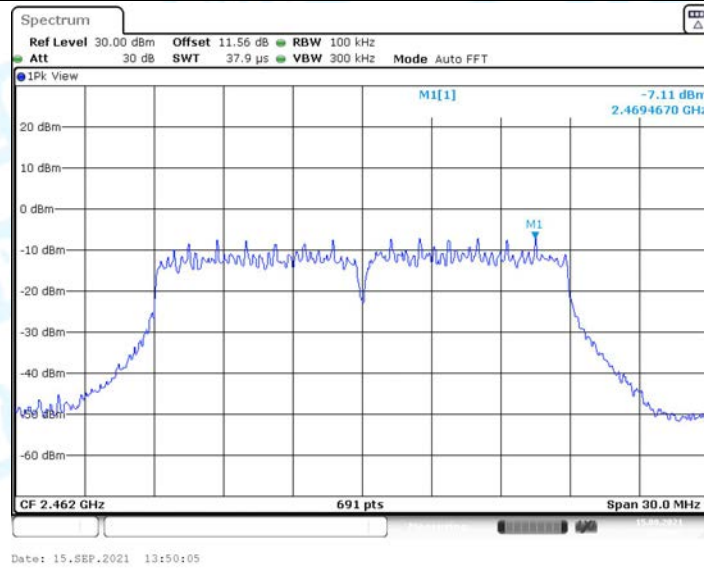


11N20SISO_Ant1_2437_30~1000



11N20SISO_Ant1_2437_1000~26500



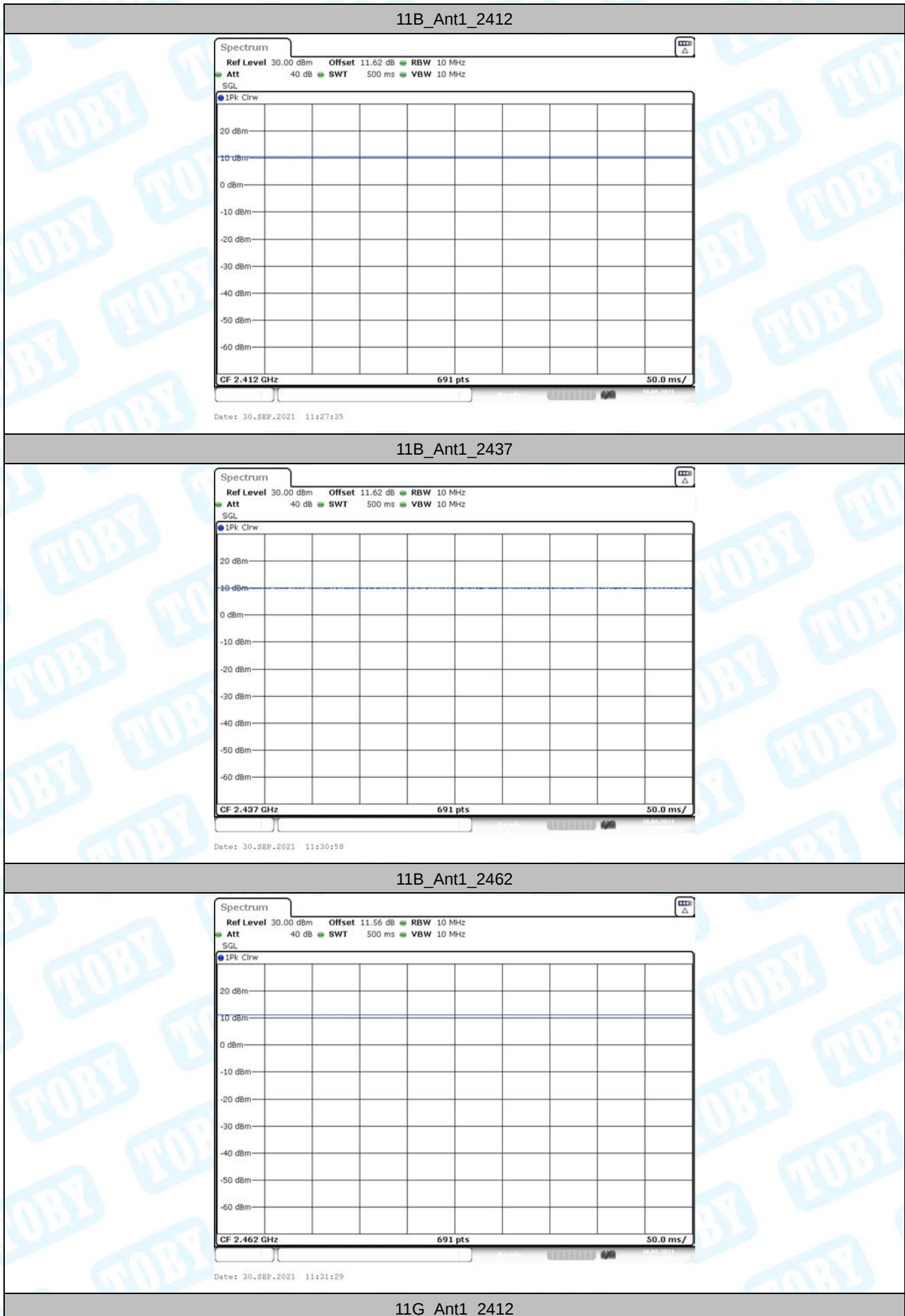


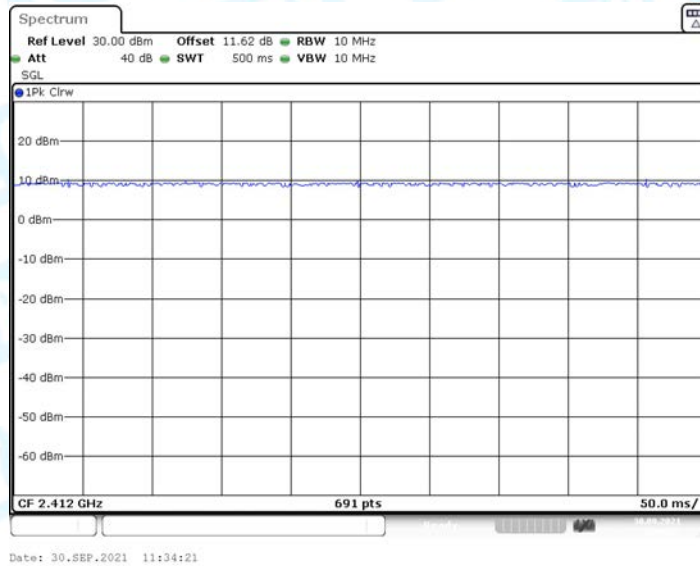
7. Duty Cycle

7.1. Test Result

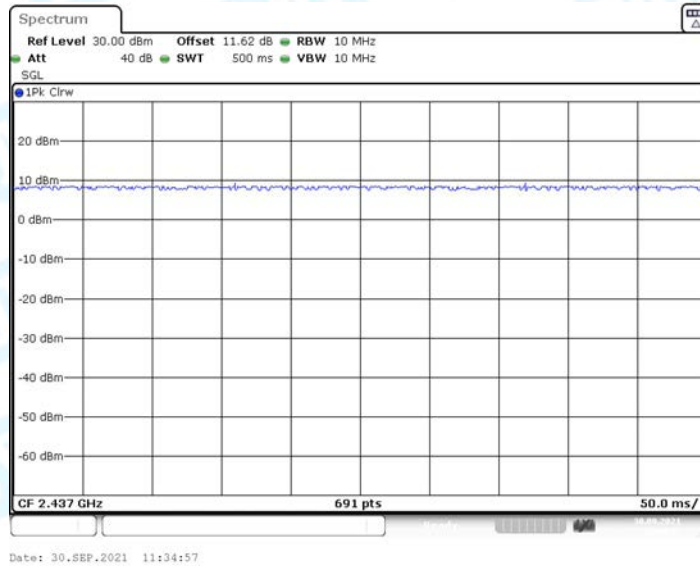
TestMode	Antenna	Channel	Transmission Duration [ms]	Transmission Period [ms]	Duty Cycle [%]	Limit	Verdict
11B	Ant1	2412	0.00	0.00	100	---	PASS
		2437	0.00	0.00	100	---	PASS
		2462	0.00	0.00	100	---	PASS
11G	Ant1	2412	0.00	0.00	100	---	PASS
		2437	0.00	0.00	100	---	PASS
		2462	0.00	0.00	100	---	PASS
11N20SISO	Ant1	2412	0.00	0.00	100	---	PASS
		2437	0.00	0.00	100	---	PASS
		2462	0.00	0.00	100	---	PASS

7.2. Test Graphs

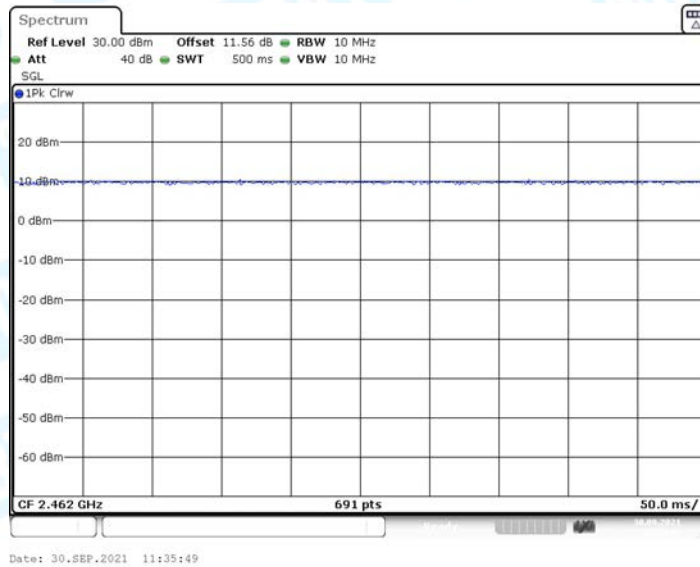




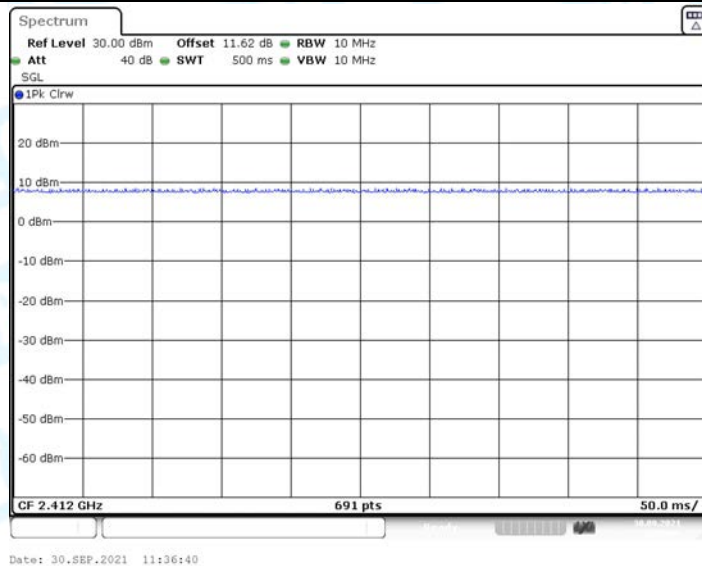
11G_Ant1_2437



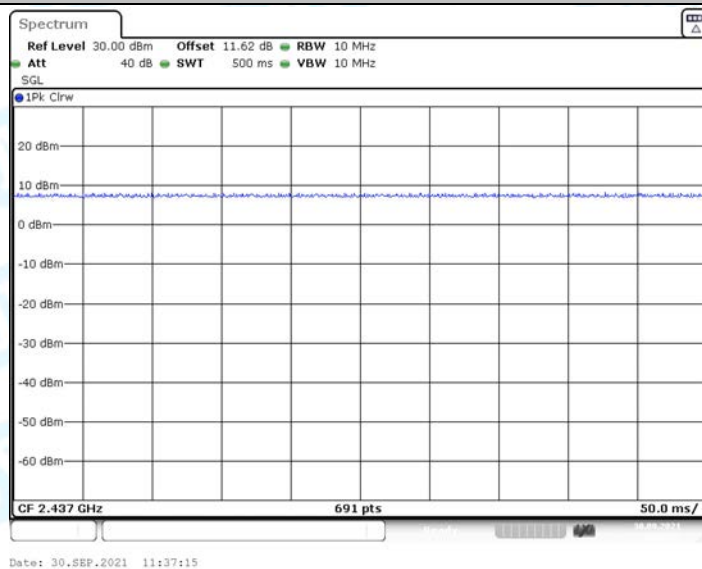
11G_Ant1_2462



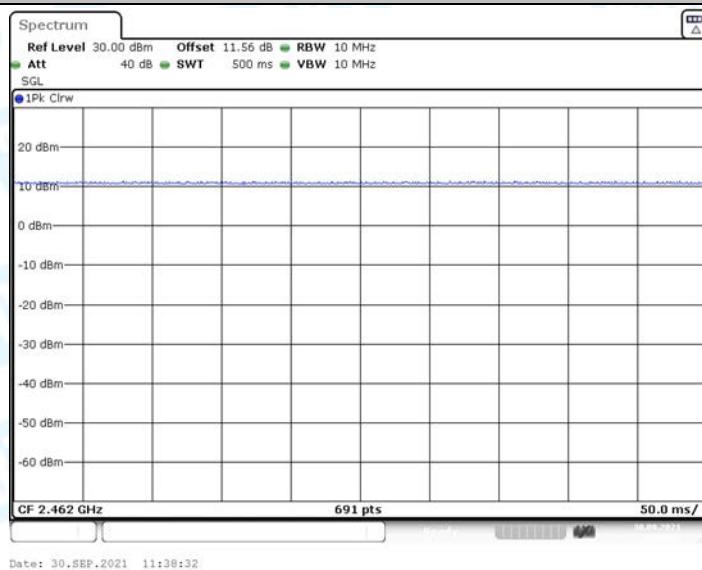
11N20SISO_Ant1_2412



11N20SISO_Ant1_2437



11N20SISO_Ant1_2462



8. Emissions in Restricted Bands

8.1. Test Result

TestMode	Antenna	ChName	Channel	Detector	Freq [MHz]	Result [dBm]	Limit [dBm]	Verdict
11B	Ant1	Low	2412	AV	2310.000	-50.51	≤-41.20	PASS
				AV	2340.319	-48.18	≤-41.20	PASS
				AV	2390.000	-50.28	≤-41.20	PASS
				Peak	2310.000	-38.37	≤-21.20	PASS
				Peak	2340.884	-37.54	≤-21.20	PASS
				Peak	2390.000	-43.61	≤-21.20	PASS
		High	2462	AV	2483.500	-49.14	≤-41.20	PASS
				AV	2495.797	-48.88	≤-41.20	PASS
				AV	2500.000	-49.55	≤-41.20	PASS
				Peak	2483.500	-46.84	≤-21.20	PASS
				Peak	2499.783	-39.64	≤-21.20	PASS
				Peak	2500.000	-39.85	≤-21.20	PASS
11G	Ant1	Low	2412	AV	2310.000	-50.51	≤-41.20	PASS
				AV	2340.319	-48.21	≤-41.20	PASS
				AV	2390.000	-50.31	≤-41.20	PASS
				Peak	2310.000	-38.23	≤-21.20	PASS
				Peak	2339.565	-36.58	≤-21.20	PASS
				Peak	2390.000	-39.56	≤-21.20	PASS
		High	2462	AV	2483.500	-49.29	≤-41.20	PASS
				AV	2495.957	-48.98	≤-41.20	PASS
				AV	2500.000	-49.59	≤-41.20	PASS
				Peak	2483.500	-39.3	≤-21.20	PASS
				Peak	2483.522	-39.3	≤-21.20	PASS
				Peak	2500.000	-41.61	≤-21.20	PASS
11N20SISO	Ant1	Low	2412	AV	2310.000	-50.52	≤-41.20	PASS
				AV	2340.130	-48.09	≤-41.20	PASS
				AV	2390.000	-50.25	≤-41.20	PASS
				Peak	2310.000	-38.92	≤-21.20	PASS
				Peak	2366.130	-36.05	≤-21.20	PASS
				Peak	2390.000	-39.01	≤-21.20	PASS
		High	2462	AV	2483.500	-49.13	≤-41.20	PASS
				AV	2495.797	-48.94	≤-41.20	PASS
				AV	2500.000	-49.57	≤-41.20	PASS
				Peak	2483.500	-42.47	≤-21.20	PASS
				Peak	2494.681	-39.44	≤-21.20	PASS
				Peak	2500.000	-41.85	≤-21.20	PASS

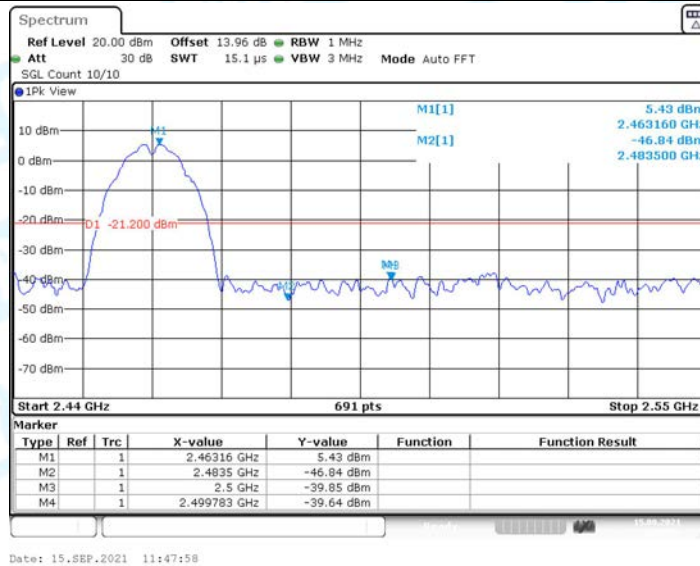
Note:

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.

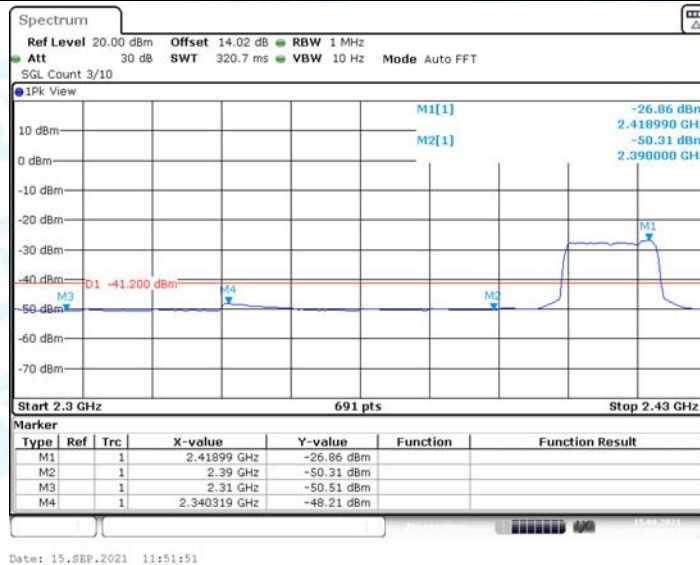
8.2. Test Graphs



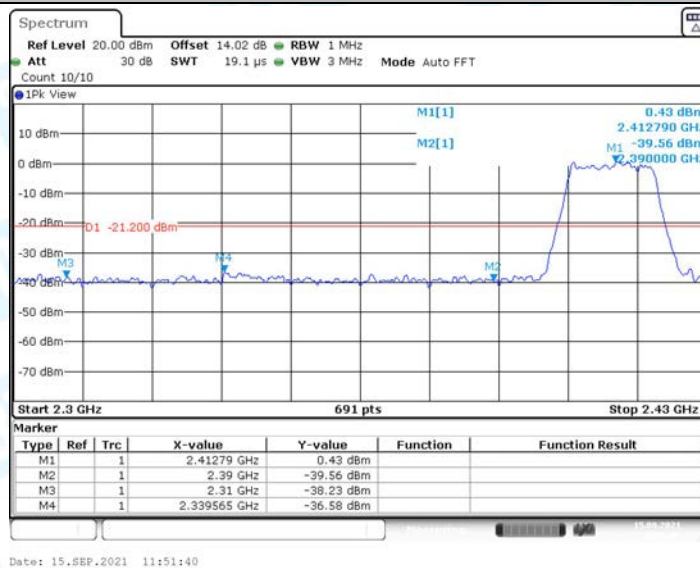
11B_Ant1_High_2462_Peak



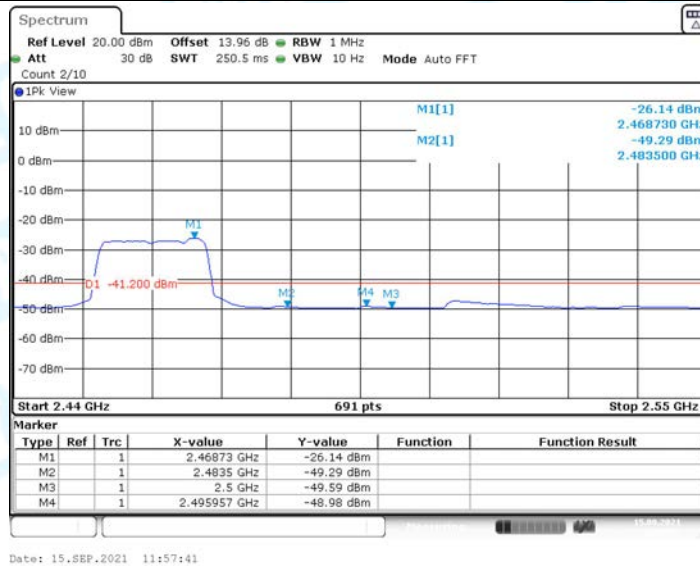
11G_Ant1_Low_2412_AV



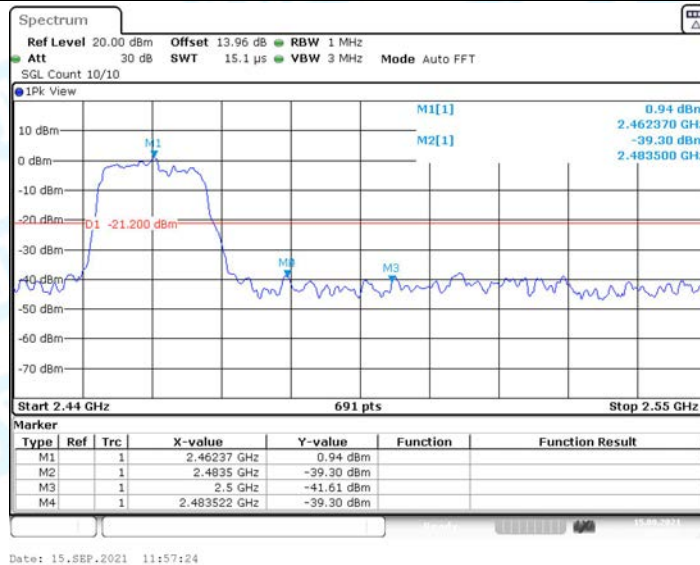
11G_Ant1_Low_2412_Peak



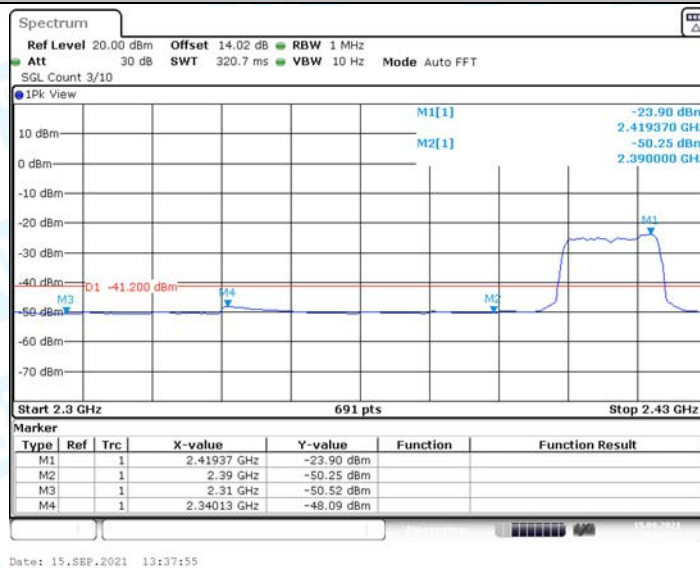
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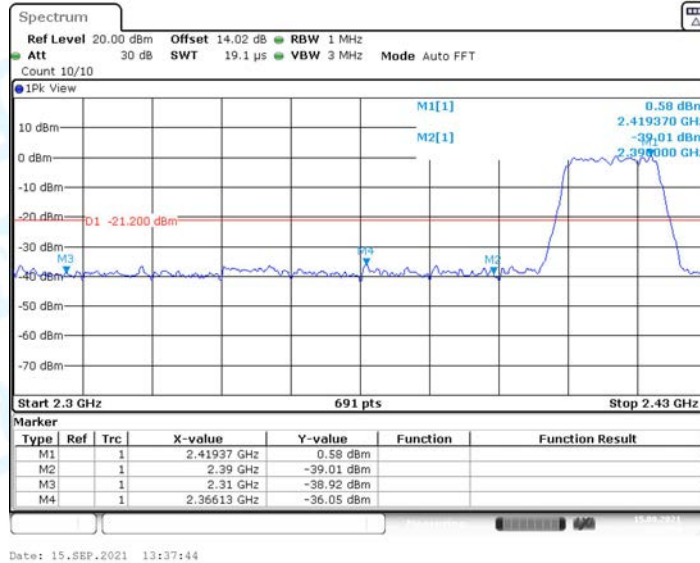
11G_Ant1_High_2462_Peak



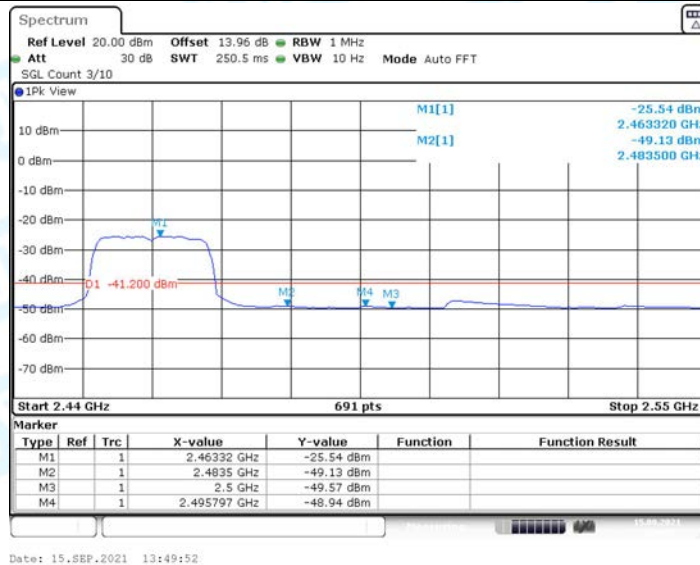
11N20SISO_Ant1_Low_2412_AV



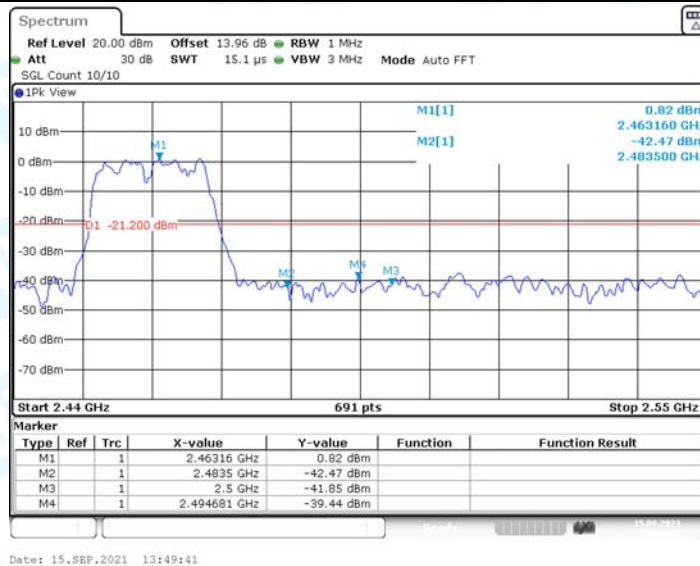
11N20SISO_Ant1_Low_2412_Peak



11N20SISO_Ant1_High_2462_AV



11N20SISO_Ant1_High_2462_Peak



-----End of the report-----