Case No. : GTS20231020001-1-84	
Ambient Condition: 23 ℃, 48 %RH	
According Standard: ■Part15E	
Test Date: 2024.1.15	**Test Engineer:** Evan ouyang

Appendix E.1: Emission Bandwidth

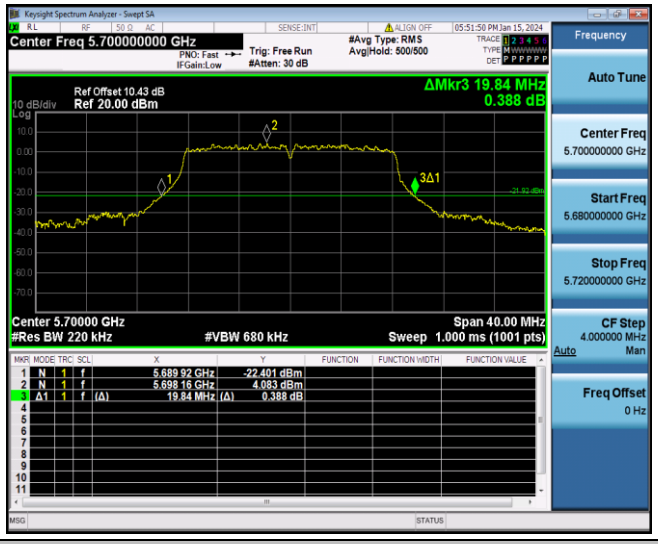
Test Result

TestMode	Antenna	Freq(MHz)	26db EBW [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
11A	Ant1	5500	19.920	5490.120	5510.040	---	---
		5600	20.280	5589.960	5610.240	---	---
		5700	19.840	5689.920	5709.760	---	---
11N20SISO	Ant1	5500	26.080	5489.640	5515.720	---	---
		5600	28.320	5586.560	5614.880	---	---
		5700	20.680	5689.520	5710.200	---	---

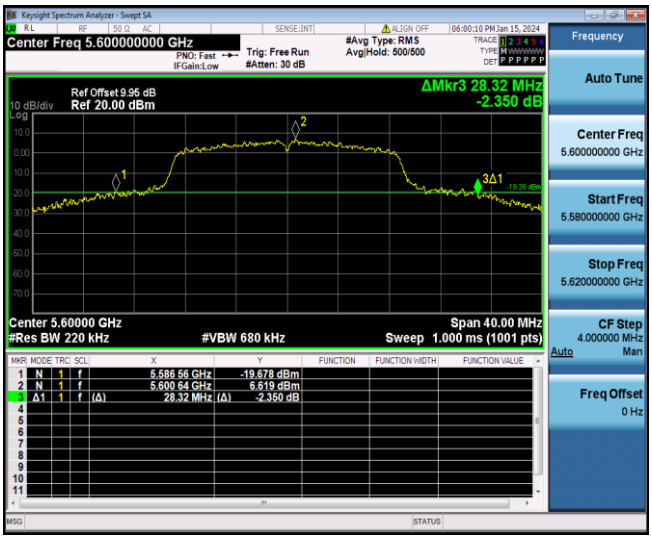
Test Graphs

11A_Ant1_5500

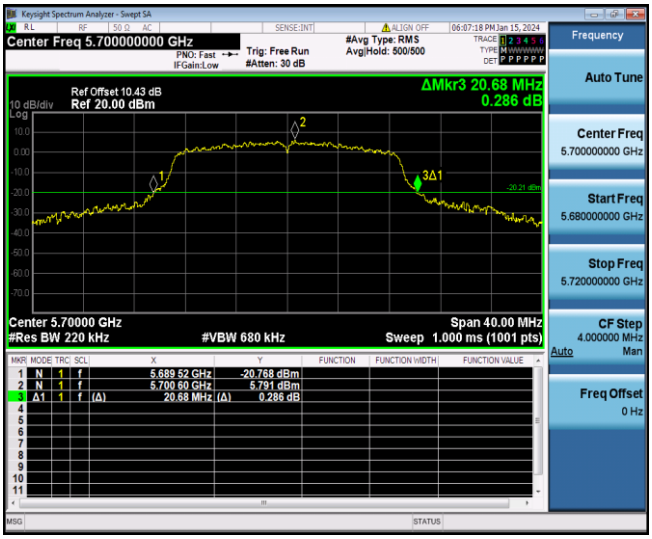
11A_Ant1_5600

11A_Ant1_5700

11N20SISO_Ant1_5500

11N20SISO_Ant1_5600



11N20SISO_Ant1_5700



Appendix E.2: Occupied channel bandwidth

Test Result

TestMode	Antenna	Freq(MHz)	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
11A	Ant1	5500	16.782	5491.6392	5508.4212	---	---
		5600	16.819	5591.5664	5608.3854	---	---
		5700	16.759	5691.5683	5708.3273	---	---
11N20SISO	Ant1	5500	17.831	5491.2212	5509.0522	---	---
		5600	17.990	5591.0461	5609.0361	---	---
		5700	17.592	5691.1608	5708.7528	---	---

Test Graphs

11A_Ant1_5500

11A_Ant1_5600

11A_Ant1_5700

11N20SISO_Ant1_5500

11N20SISO_Ant1_5600

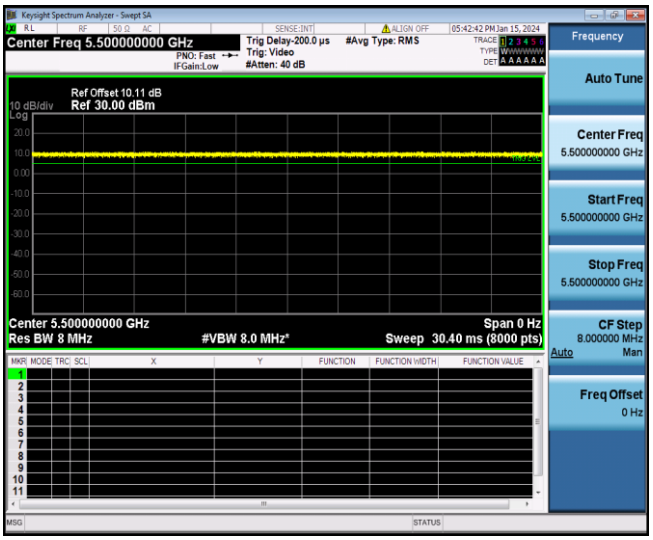
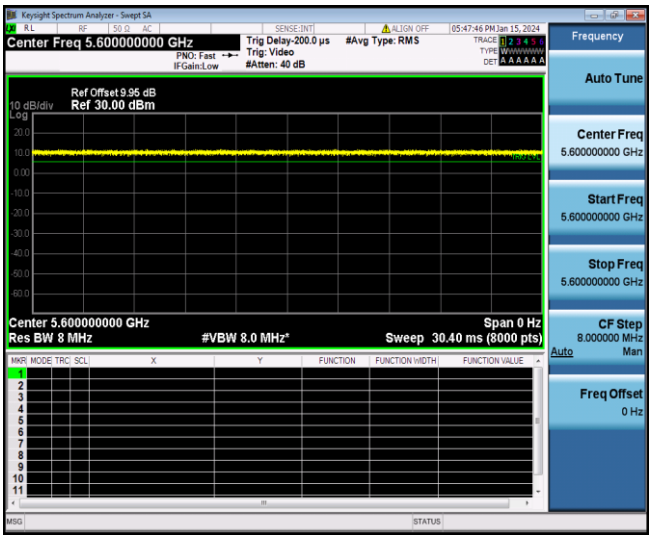
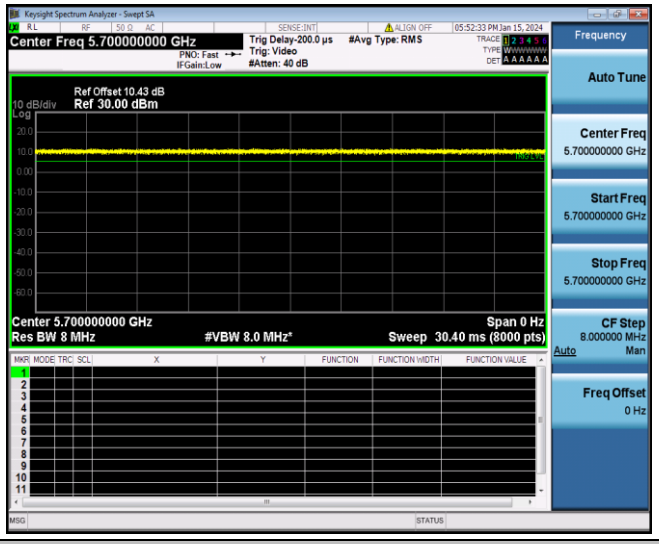
11N20SISO_Ant1_5700

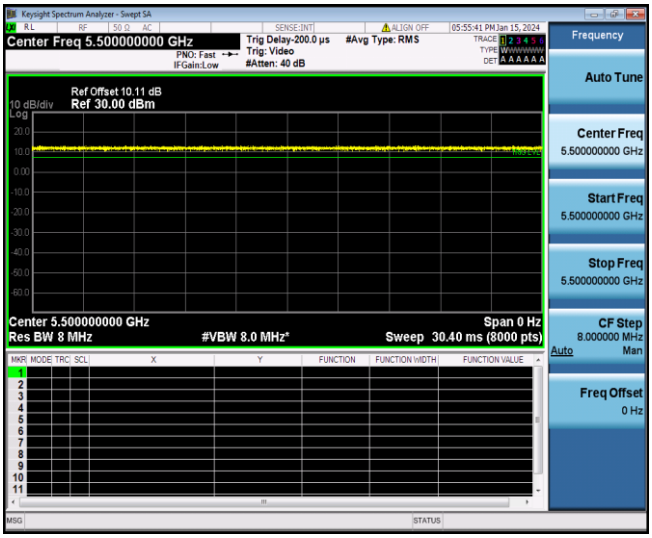
Appendix E.3: Duty Cycle

Test Result

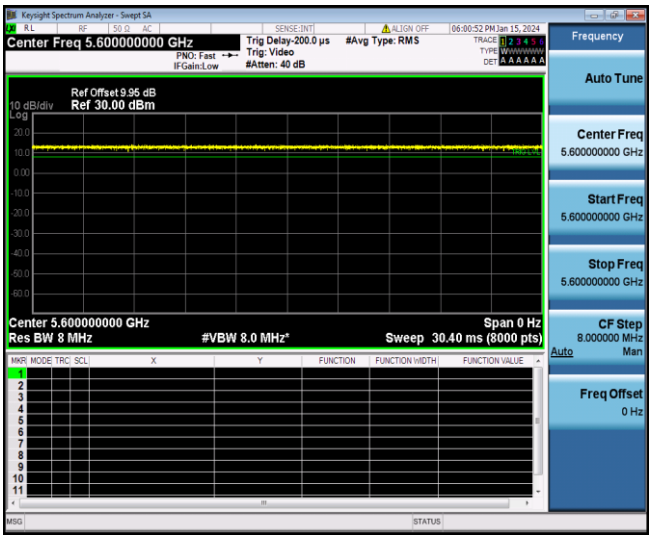
TestMode	Antenna	Freq(MHz)	Transmission Duration [ms]	Transmission Period [ms]	Duty Cycle [%]	Duty Cycle Factor[dB]	1/T Factor[KHz]
11A	Ant1	5500	30.00	30.00	100.00	0.00	0.03
		5600	30.00	30.00	100.00	0.00	0.03
		5700	30.00	30.00	100.00	0.00	0.03
11N20SISO	Ant1	5500	30.00	30.00	100.00	0.00	0.03
		5600	30.00	30.00	100.00	0.00	0.03
		5700	30.00	30.00	100.00	0.00	0.03

Test Graphs

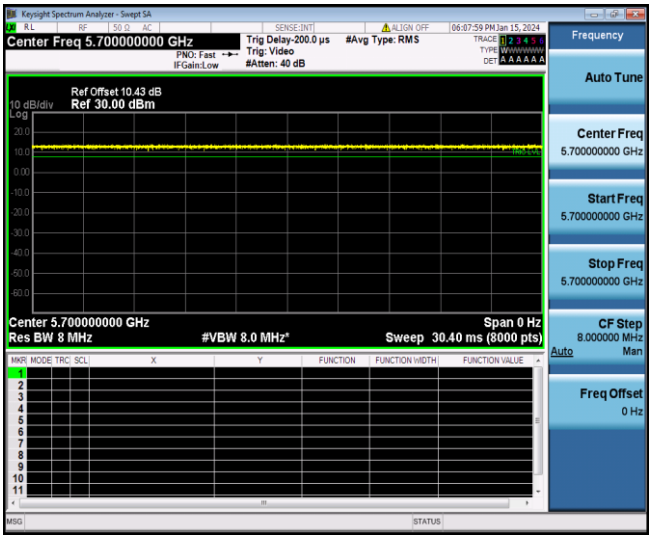
11A_Ant1_5500

11A_Ant1_5600

11A_Ant1_5700

11N20SISO_Ant1_5500



11N20SISO_Ant1_5600



11N20SISO_Ant1_5700



Appendix E.4: Maximum conducted output power

Test Result Channel Power

Omni Antenna:

Test Mode	Antenna	Freq(MHz)	Channel Powert [dBm]	Duty Cycle [%]	DC Factor [dBm]	Result [dBm]	Limit [dBm]	Verdict
11A	Ant1	5500	16.23	100.00	0.00	16.23	≤23.98	PASS
		5600	16.88	100.00	0.00	16.88	≤23.98	PASS
		5700	16.65	100.00	0.00	16.65	≤23.98	PASS
11N20SISO	Ant1	5500	16.06	100.00	0.00	16.06	≤23.98	PASS
		5600	16.91	100.00	0.00	16.91	≤23.98	PASS
		5700	16.33	100.00	0.00	16.33	≤23.98	PASS

FPC Antenna:

Test Mode	Antenna	Freq(MHz)	Channel Powert [dBm]	Duty Cycle [%]	DC Factor [dBm]	Result [dBm]	Limit [dBm]	Verdict
11A	Ant1	5500	16.23	100.00	0.00	16.23	≤23.98	PASS
		5600	16.88	100.00	0.00	16.88	≤23.98	PASS
		5700	16.65	100.00	0.00	16.65	≤23.98	PASS
11N20SISO	Ant1	5500	16.06	100.00	0.00	16.06	≤23.98	PASS
		5600	16.91	100.00	0.00	16.91	≤23.98	PASS
		5700	16.33	100.00	0.00	16.33	≤23.98	PASS

Note：

1. The Duty Cycle Factor and RBW Factor is compensated in the data.

Appendix E.5: Maximum power spectral density

Test Result

TestMode	Antenna	Freq(MHz)	Result [dBm/MHz]	Limit[dBm/MHz]	Verdict
11A	Ant1	5500	1.47	≤10.00	PASS
		5600	2.12	≤10.00	PASS
		5700	1.95	≤10.00	PASS
11N20SISO	Ant1	5500	4.29	≤10.00	PASS
		5600	5.17	≤10.00	PASS
		5700	4.77	≤10.00	PASS

Note：1.The Result and Limit Unit is dBm/500 kHz in the band 5.725–5.85 GHz.
2.The Duty Cycle Factor and RBW Factor is compensated in the graph.

Test Graphs

11A_Ant1_5500

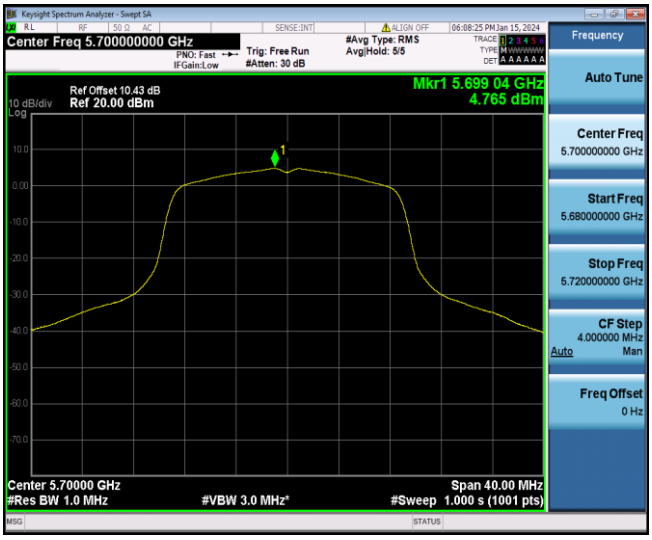
11A_Ant1_5600

11A_Ant1_5700

11N20SISO_Ant1_5500

11N20SISO_Ant1_5600

11N20SISO_Ant1_5700

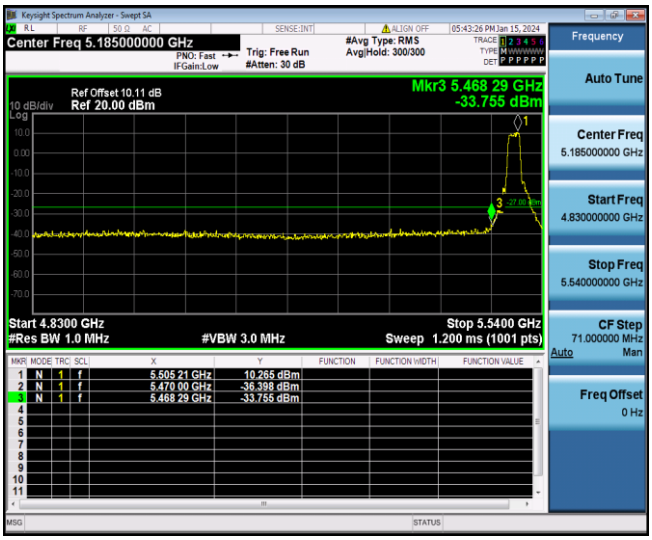
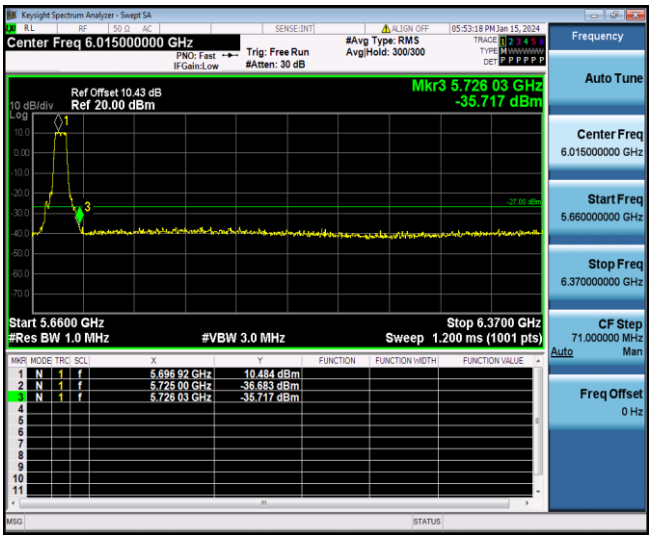
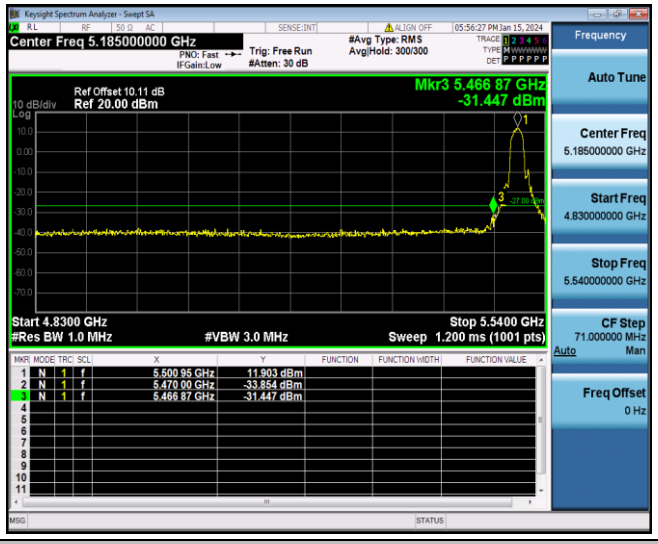


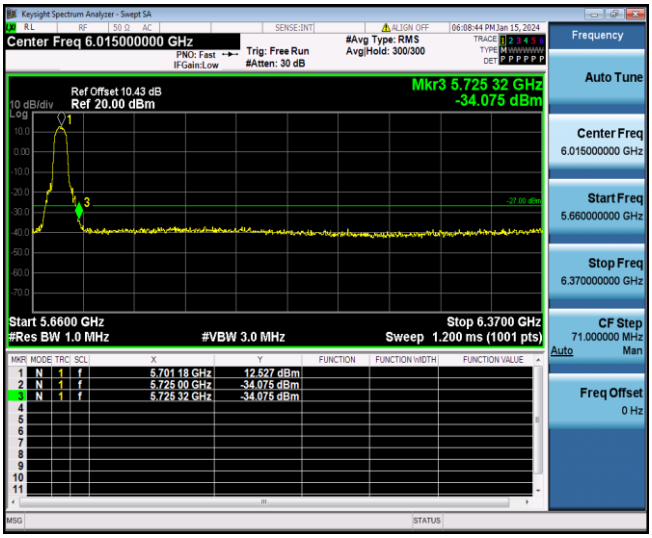
Appendix E.6: Band edge measurements

Test Result B3

TestMode	Antenna	ChName	Freq(MHz)	Result[dBm]	Limit[dBm]	Verdict
11A	Ant1	Low	5500	-33.76	≤-27	PASS
		High	5700	-35.72	≤-27	PASS
11N20SISO	Ant1	Low	5500	-31.45	≤-27	PASS
		High	5700	-34.08	≤-27	PASS

Test Graphs B3

11A_Ant1_Low_5500

11A_Ant1_High_5700

11N20SISO_Ant1_Low_5500

11N20SISO_Ant1_High_5700

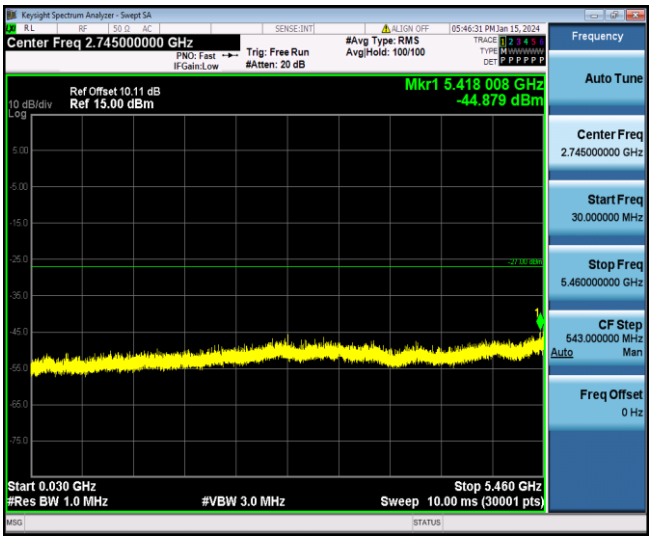
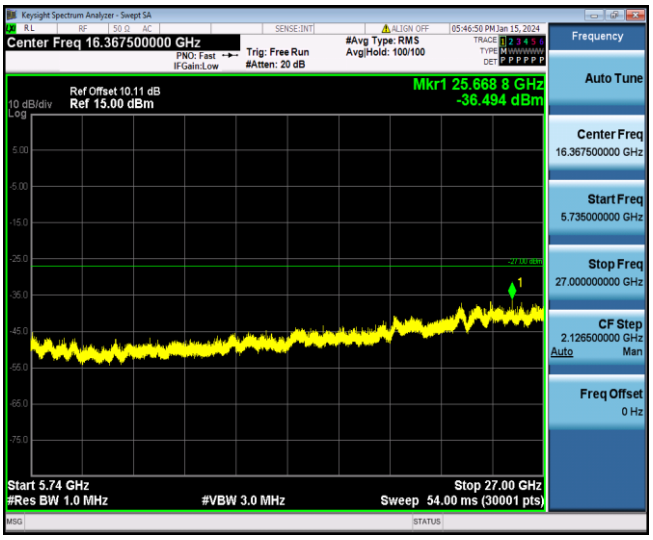
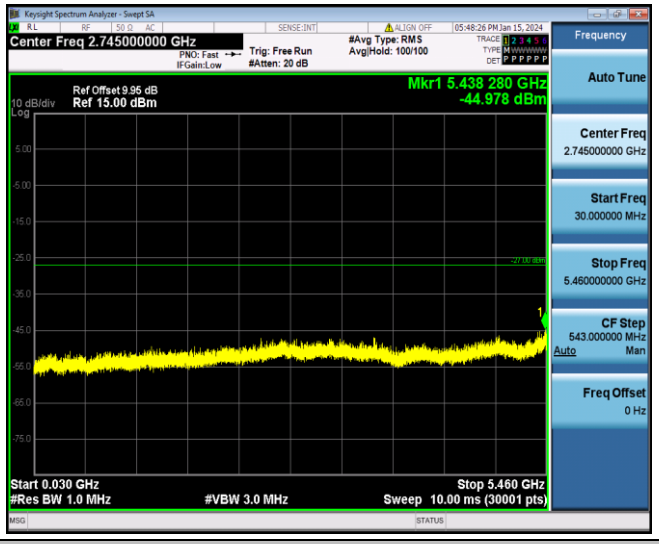

Keysight Spectrum Analyzer - Swept SA
Center Freq 6.015000000 GHz
PNO: Fast
IFGain:Low
Trig: Free Run
#Atten: 30 dB
#Avg Type: RMS
Avg|Hold: 300/300
06:08:44 PM Jan 15, 2024
Ref Offset 10.43 dB
10 dB/div
Ref 20.00 dBm
Mkr3 5.725 32 GHz
-34.075 dBm
Start 5.6600 GHz
#Res BW 1.0 MHz
#VBW 3.0 MHz
Stop 6.3700 GHz
Sweep 1.200 ms (1001 pts)
1 N 1 f 5.701 18 GHz 12.527 dBm
2 N 1 f 5.725 00 GHz -34.075 dBm
3 N 1 f 5.725 32 GHz -34.075 dBm
Frequency
Auto Tune
Center Freq
6.015000000 GHz
Start Freq
5.660000000 GHz
Stop Freq
6.370000000 GHz
CF Step
71.000000 MHz
Auto
Man
Freq Offset
0 Hz

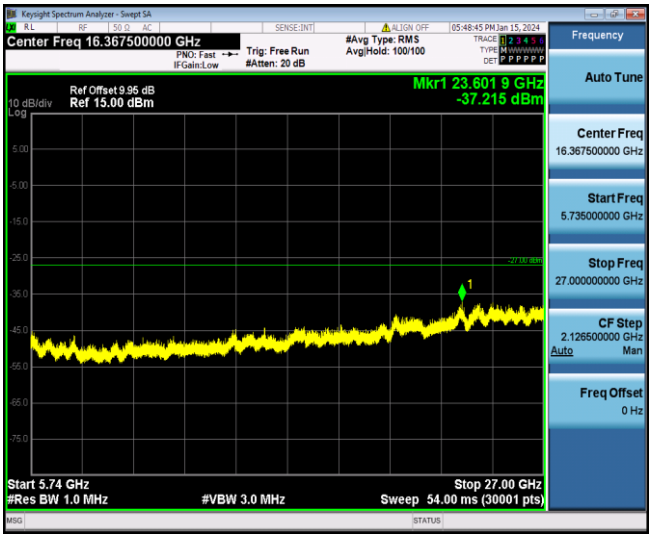
Appendix E.7: Conducted Spurious Emission

Test Result

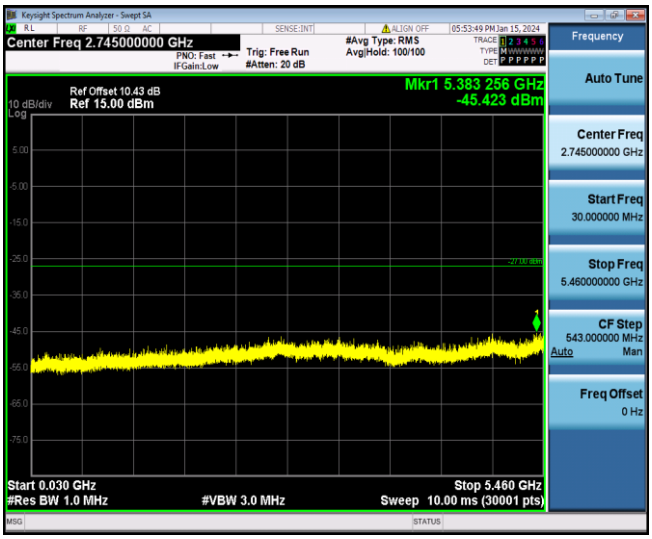
TestMode	Antenna	Freq(MHz)	FreqRange [MHz]	Max. Fre [MHz]	Max. Level [dBm]	Limit [dBm]	Verdict
11A	Ant1	5500	30~5460	5418.01	-44.88	≤-27	PASS
			5735~40000	25668.81	-36.49	≤-27	PASS
		5600	30~5460	5438.28	-44.98	≤-27	PASS
			5735~40000	23601.85	-37.22	≤-27	PASS
		5700	30~5460	5383.26	-45.42	≤-27	PASS
			5735~40000	24233.42	-36.44	≤-27	PASS
11N20SISO	Ant1	5500	30~5460	5455.66	-40.45	≤-27	PASS
			5735~40000	24300.76	-36.8	≤-27	PASS
		5600	30~5460	825.13	-44.54	≤-27	PASS
			5735~40000	23560.03	-36.81	≤-27	PASS
		5700	30~5460	5432.85	-45.37	≤-27	PASS
			5735~40000	24309.27	-36.49	≤-27	PASS

Test Graphs

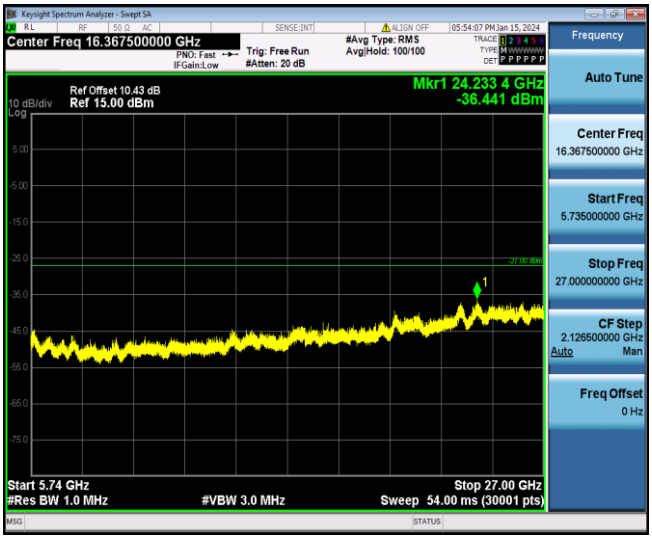
11A_Ant1_5500_30~5460

11A_Ant1_5500_5735~40000

11A_Ant1_5600_30~5460

11A_Ant1_5600_5735~40000



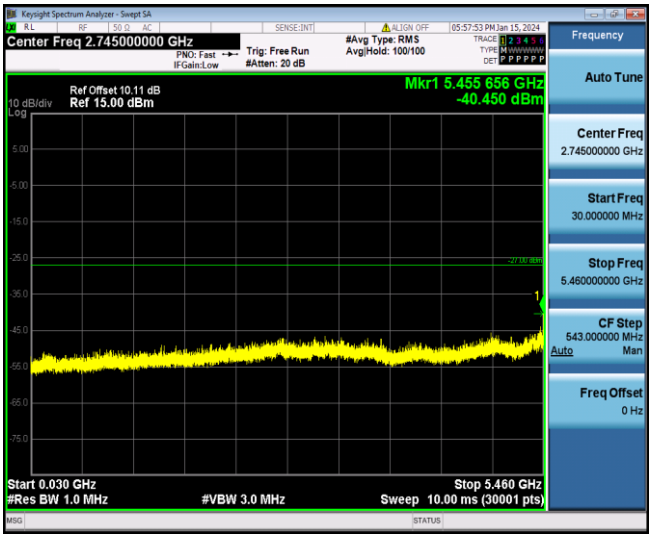
11A_Ant1_5700_30~5460



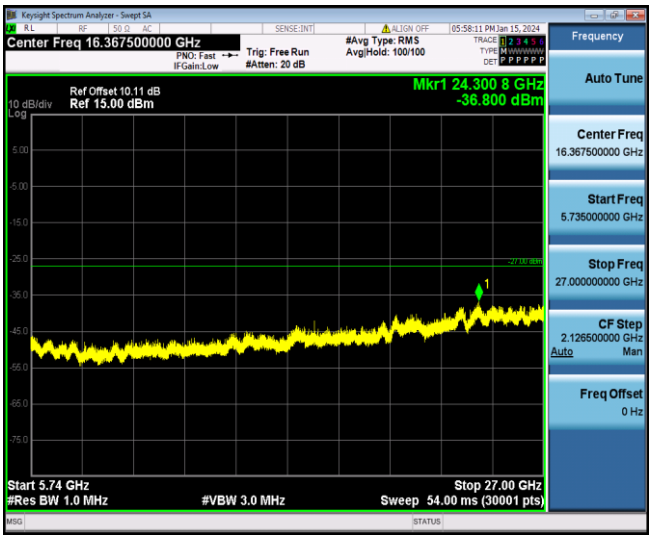
11A_Ant1_5700_5735~40000



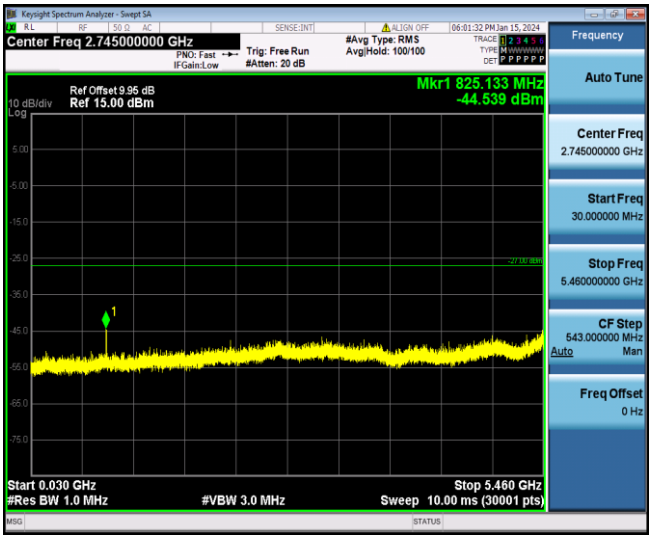
11N20SISO_Ant1_5500_30~5460



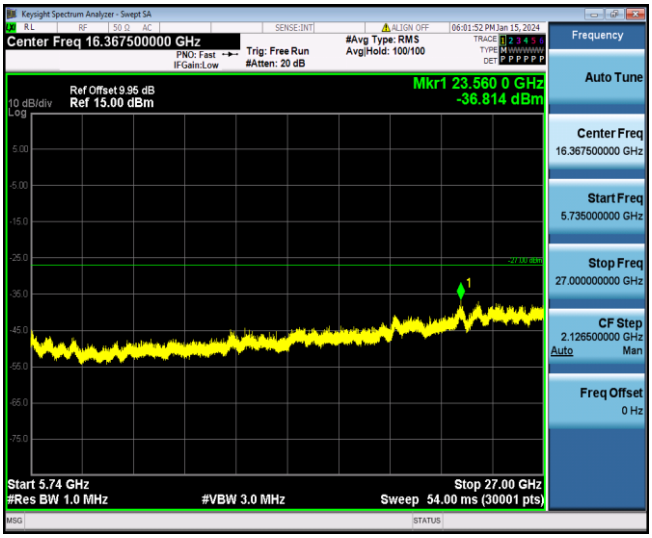
11N20SISO_Ant1_5500_5735~40000



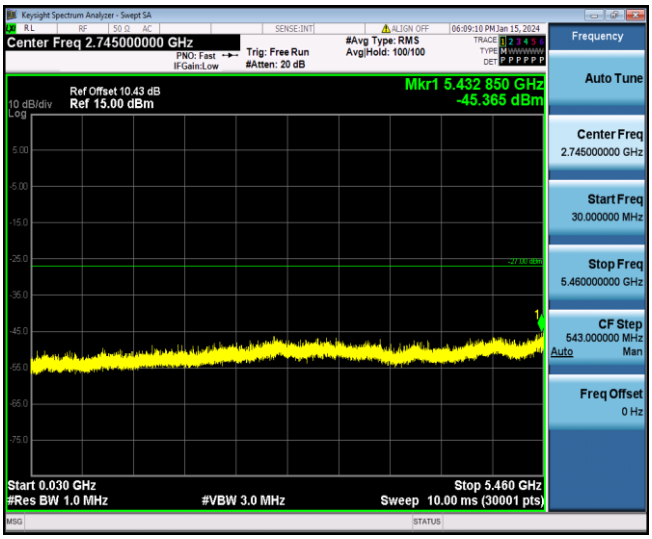
11N20SISO_Ant1_5600_30~5460



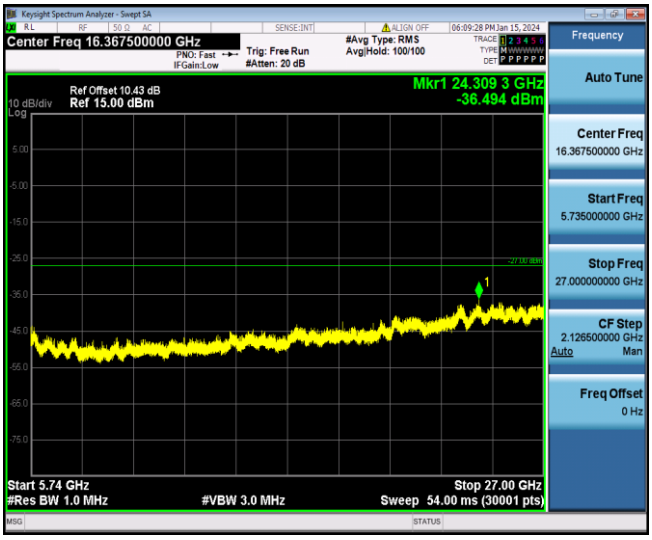
11N20SISO_Ant1_5600_5735~40000



11N20SISO_Ant1_5700_30~5460



11N20SISO_Ant1_5700_5735~40000



Appendix E.8: Emissions in Restricted Bands

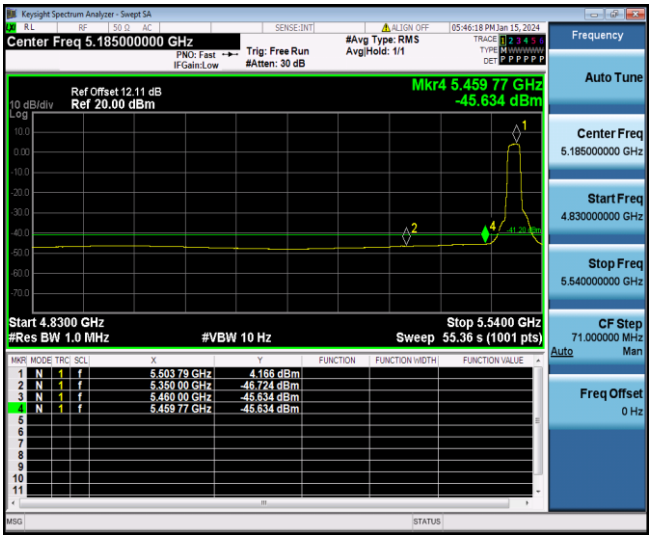
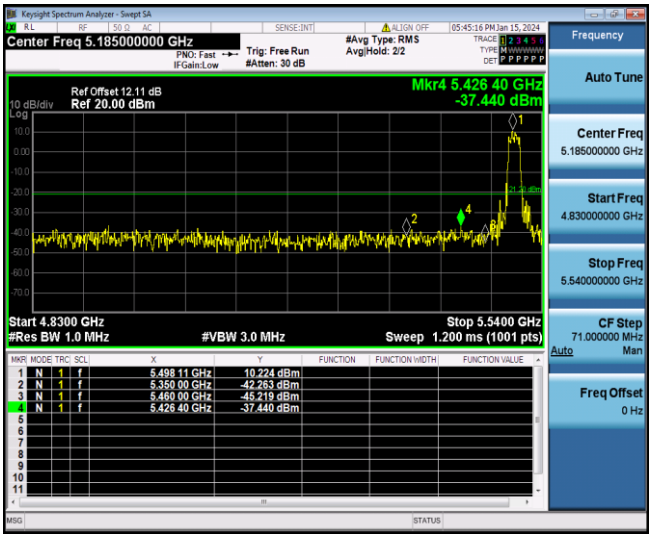
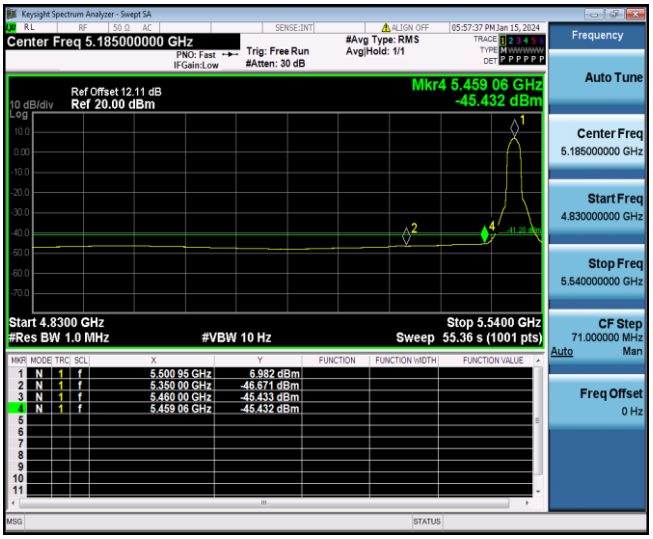
Test Result

TestMode	Antenna	ChName	Freq(MHz)	Detector	Freq [MHz]	Result [dBm]	Limit [dBm]	Result [dBuV/m]	Limit [dBuV/m]	Verdict
11A	Ant1	Low	5500	AV	5350.000	-46.72	≤-41.20	48.48	≤54	PASS
				AV	5459.770	-45.63	≤-41.20	49.57	≤54	PASS
				AV	5460.000	-45.63	≤-41.20	49.57	≤54	PASS
				Peak	5350.000	-42.26	≤-21.20	52.94	≤74	PASS
				Peak	5426.400	-37.44	≤-21.20	57.76	≤74	PASS
				Peak	5460.000	-45.22	≤-21.20	49.98	≤74	PASS
11N20SISO	Ant1	Low	5500	AV	5350.000	-46.67	≤-41.20	48.53	≤54	PASS
				AV	5459.060	-45.43	≤-41.20	49.77	≤54	PASS
				AV	5460.000	-45.43	≤-41.20	49.77	≤54	PASS
				Peak	5350.000	-39.7	≤-21.20	55.50	≤74	PASS
				Peak	5394.450	-37.06	≤-21.20	58.14	≤74	PASS
				Peak	5460.000	-42.01	≤-21.20	53.19	≤74	PASS

Note：

2. The Antenna Gain is compensated in the graph.
3. The Duty Cycle Factor and RBW Factor is compensated in the graph.
4. For transmitters operating in 5150-5350 GHz band and 5470-5725 GHz band: 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

11A_Ant1_Low_5500_AV

11A_Ant1_Low_5500_Peak

11N20SISO_Ant1_Low_5500_AV


11N20SISO_Ant1_Low_5500_Peak