

Case No. : GTS20221207004-1-2	
Ambient Condition: 25 °C, 45 %RH, Atmos100.1Kpa,	
Test Date: 2023.1.6	Test Engineer: Jenny zeng

Appendix A.1: 20dB Emission Bandwidth

Test Result

TestMode	Antenna	Frequency[MHz]	20db EBW[MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH1	Ant1	2402	0.852	2401.583	2402.435	---	---
		2441	0.852	2440.583	2441.435	---	---
		2480	0.768	2479.631	2480.399	---	---
2DH1	Ant1	2402	1.269	2401.385	2402.654	---	---
		2441	1.245	2440.394	2441.639	---	---
		2480	1.242	2479.394	2480.636	---	---
3DH1	Ant1	2402	1.257	2401.391	2402.648	---	---
		2441	1.254	2440.397	2441.651	---	---
		2480	1.248	2479.400	2480.648	---	---

Test Graphs

DH1_Ant1_2402



DH1_Ant1_2441



DH1_Ant1_2480



2D11_Ant1_2402



2D11_Ant1_2441



2DH1_Ant1_2480



3DH1_Ant1_2402



3DH1_Ant1_2441



3DH1_Ant1_2480



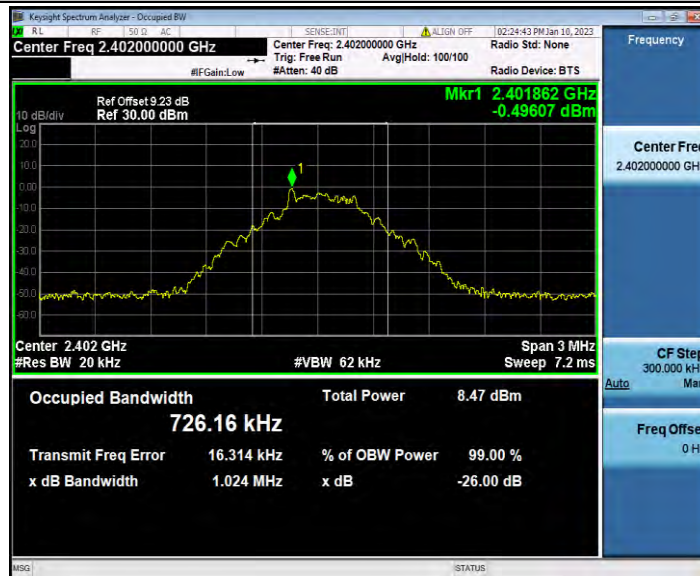
Appendix A.2: Occupied Channel Bandwidth

Test Result

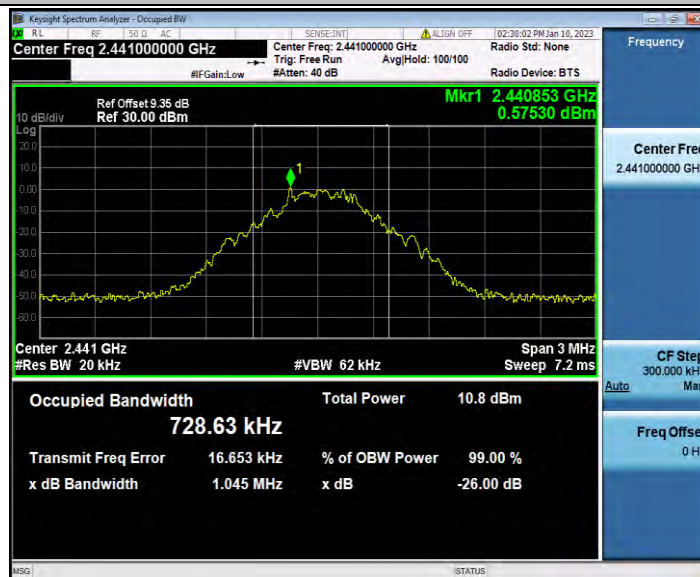
TestMode	Antenna	Frequency[MHz]	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH1	Ant1	2402	0.72616	2401.653	2402.379	---	---
		2441	0.72863	2440.652	2441.381	---	---
		2480	0.71163	2479.657	2480.368	---	---
2DH1	Ant1	2402	1.1520	2401.444	2402.596	---	---
		2441	1.1429	2440.447	2441.590	---	---
		2480	1.1390	2479.448	2480.587	---	---
3DH1	Ant1	2402	1.1491	2401.459	2402.608	---	---
		2441	1.1497	2440.460	2441.610	---	---
		2480	1.1366	2479.461	2480.597	---	---

Test Graphs

DH1_Ant1_2402



DH1_Ant1_2441



DH1_Ant1_2480



2DH1_Ant1_2402



2DH1_Ant1_2441



2DH1_Ant1_2480



3DH1_Ant1_2402



3DH1_Ant1_2441



3DH1_Ant1_2480



Appendix A.3: Maximum conducted output power

Test Result Peak

Test Mode	Antenna	Frequency[MHz]	Conducted Peak Power[dBm]	Conducted Limit[dBm]	Verdict
DH1	Ant1	2402	2.75	≤30.00	PASS
		2441	5.19	≤30.00	PASS
		2480	5.21	≤30.00	PASS
2DH1	Ant1	2402	2.7	≤20.97	PASS
		2441	4.56	≤20.97	PASS
		2480	4.68	≤20.97	PASS
3DH1	Ant1	2402	2.55	≤20.97	PASS
		2441	4.78	≤20.97	PASS
		2480	4.53	≤20.97	PASS

Appendix A.4: Carrier frequency separation

Test Result

TestMode	Antenna	Frequency[MHz]	Result[MHz]	Limit[MHz]	Verdict
DH1	Ant1	Hop_2402	1.024	≥ 0.852	PASS
		Hop_2441	1.004	≥ 0.852	PASS
		Hop_2480	0.992	≥ 0.852	PASS
2DH1	Ant1	Hop_2402	1.152	≥ 0.846	PASS
		Hop_2441	1.002	≥ 0.846	PASS
		Hop_2480	1.006	≥ 0.846	PASS
3DH1	Ant1	Hop_2402	1.142	≥ 0.838	PASS
		Hop_2441	0.974	≥ 0.838	PASS
		Hop_2480	1.002	≥ 0.838	PASS

Test Graphs

DH1_Ant1_Hop_2402



DH1_Ant1_Hop_2441



DH1_Ant1_Hop_2480



2DH1_Ant1_Hop_2402



2DH1_Ant1_Hop_2441



2DH1_Ant1_Hop_2480



3DH1_Ant1_Hop_2402



3DH1_Ant1_Hop_2441



3DH1_Ant1_Hop_2480



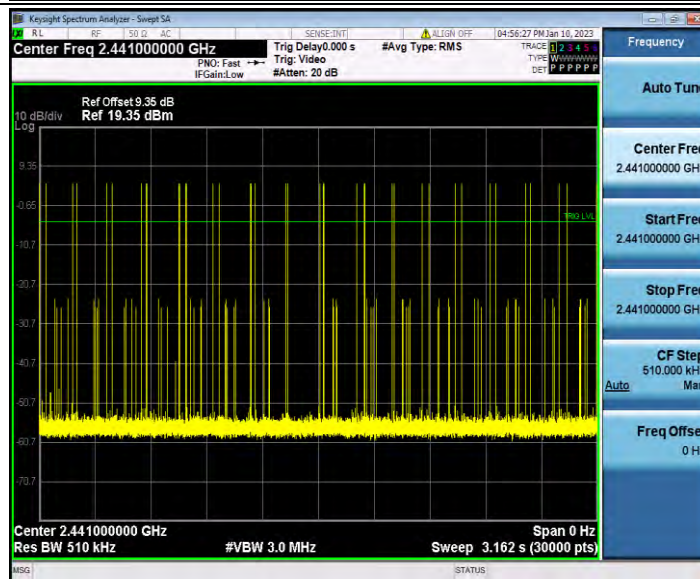
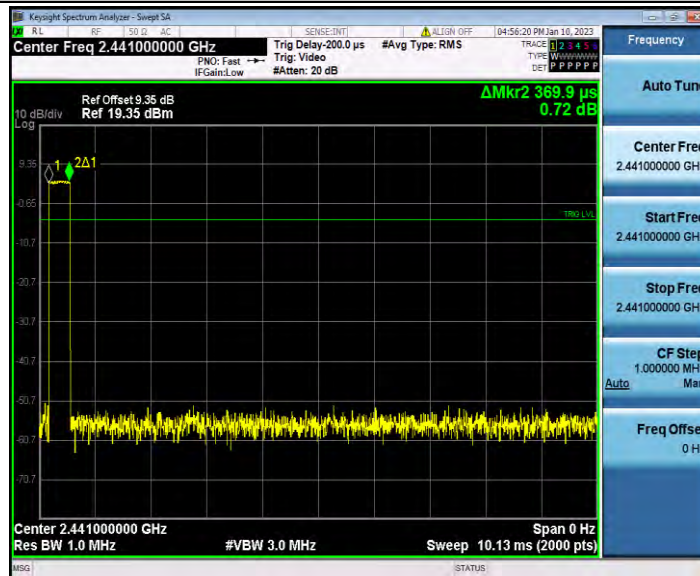
Appendix A.5: Time of occupancy

Test Result

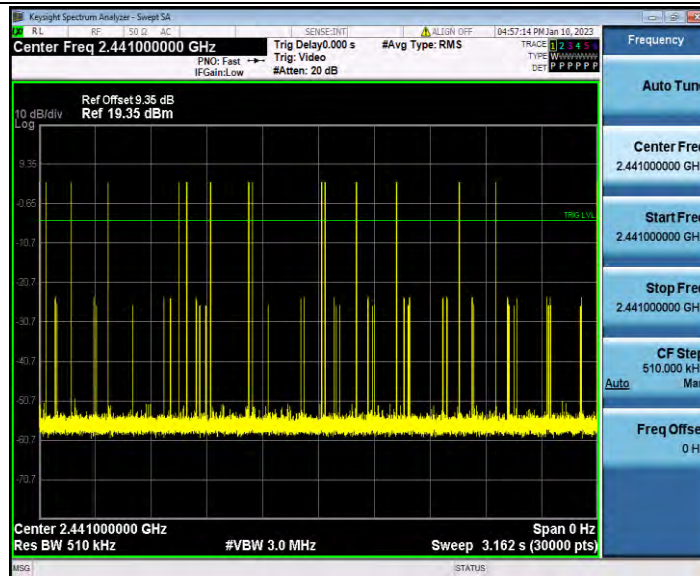
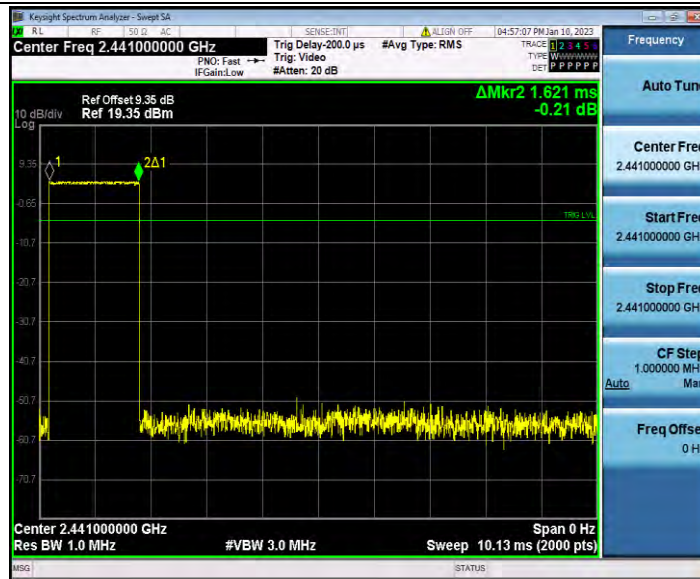
TestMode	Antenna	Frequency[MHz]	BurstWidth [ms]	TotalHops [Num]	Result[s]	Limit[s]	Verdict
DH1	Ant1	Hop	0.37	330	0.122	≤0.4	PASS
DH3	Ant1	Hop	1.62	160	0.259	≤0.4	PASS
DH5	Ant1	Hop	2.87	120	0.345	≤0.4	PASS
2DH1	Ant1	Hop	0.37	320	0.12	≤0.4	PASS
2DH3	Ant1	Hop	1.63	170	0.276	≤0.4	PASS
2DH5	Ant1	Hop	2.88	130	0.374	≤0.4	PASS
3DH1	Ant1	Hop	0.38	330	0.125	≤0.4	PASS
3DH3	Ant1	Hop	1.63	170	0.276	≤0.4	PASS
3DH5	Ant1	Hop	2.88	130	0.374	≤0.4	PASS

Test Graphs

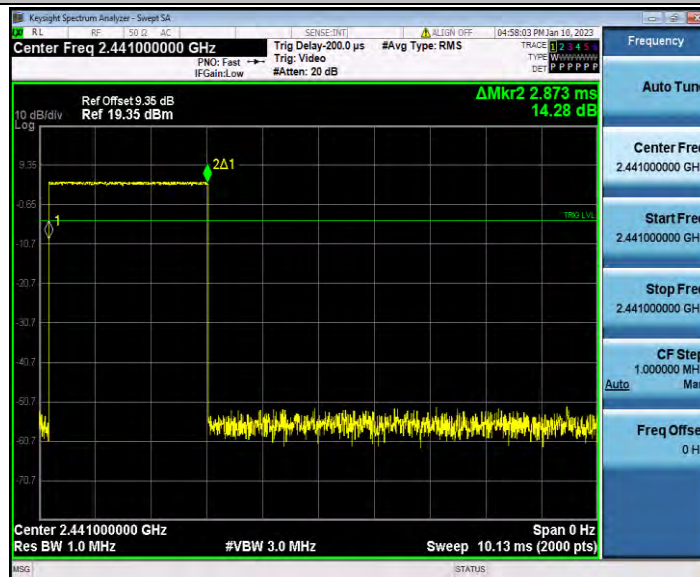
DH1_Ant1_Hop

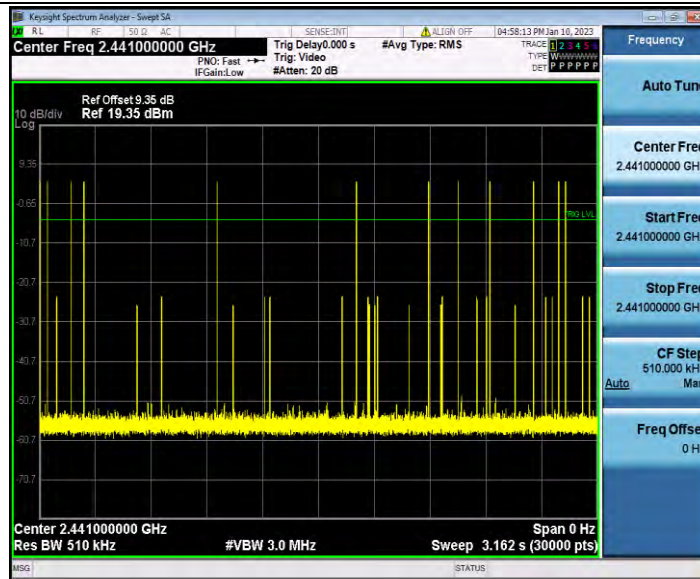


DH3_Ant1_Hop

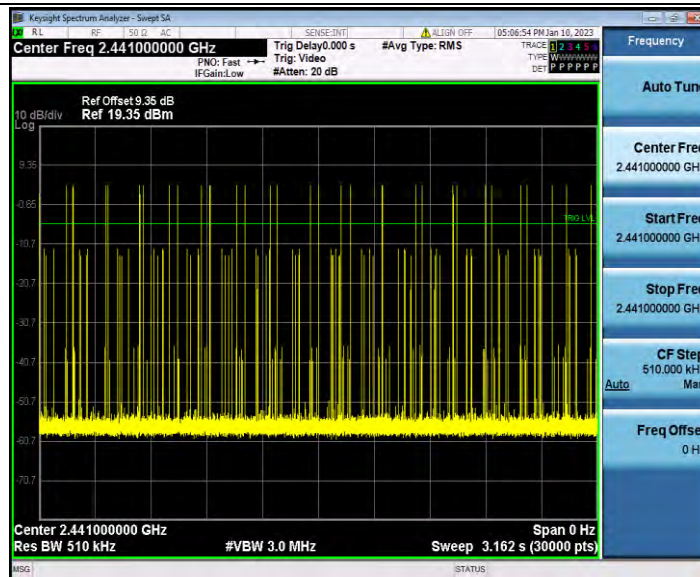
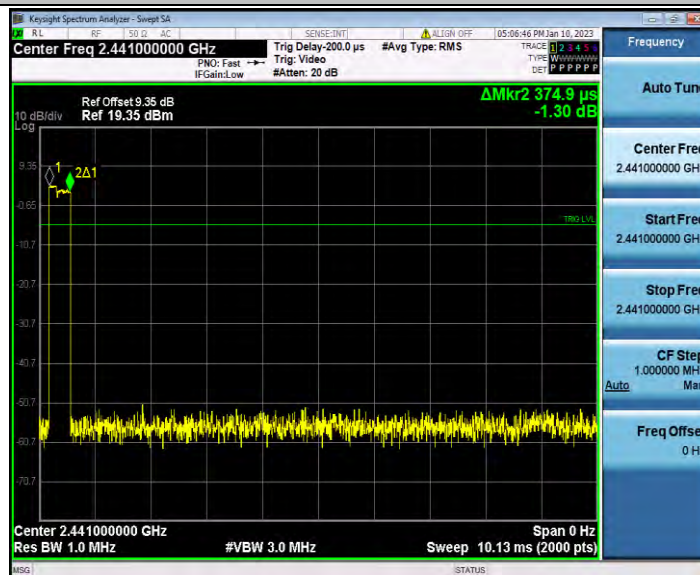


DH5_Ant1_Hop

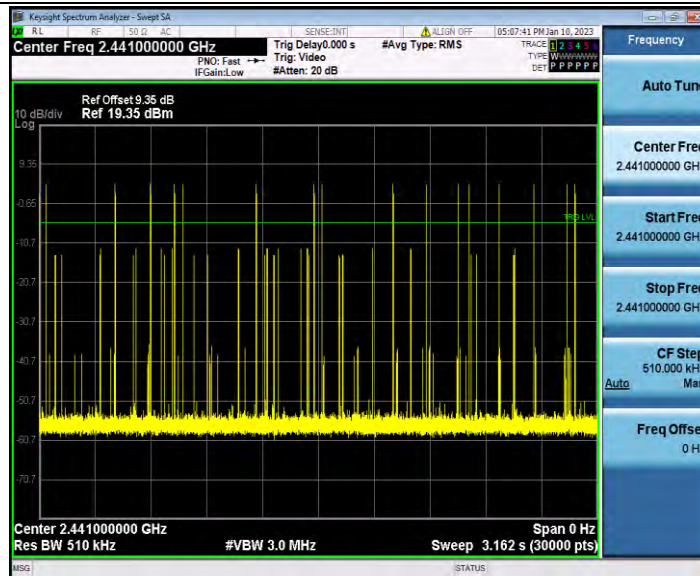
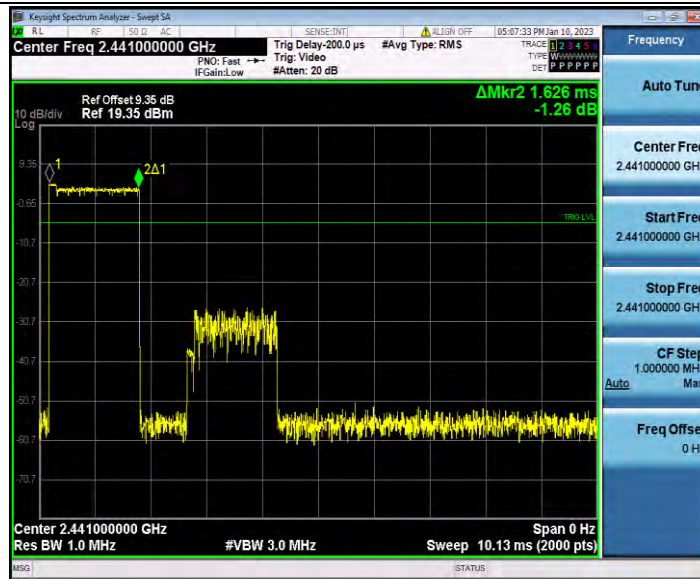




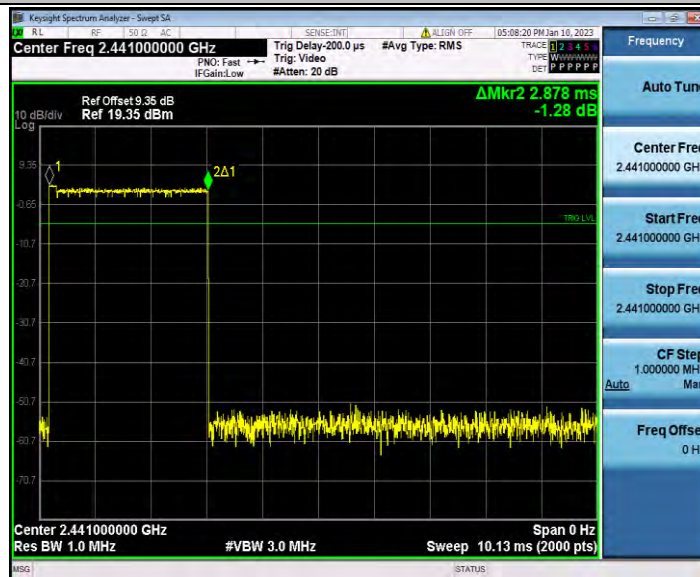
2DH1_Ant1_Hop

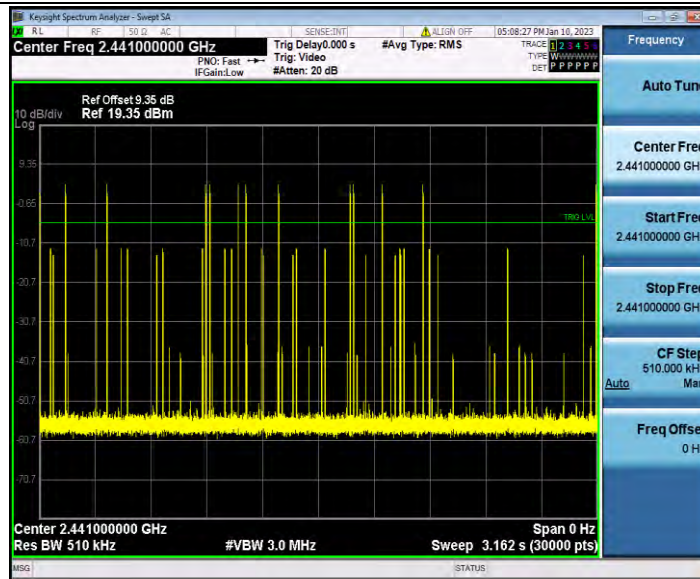


2DH3_Ant1_Hop

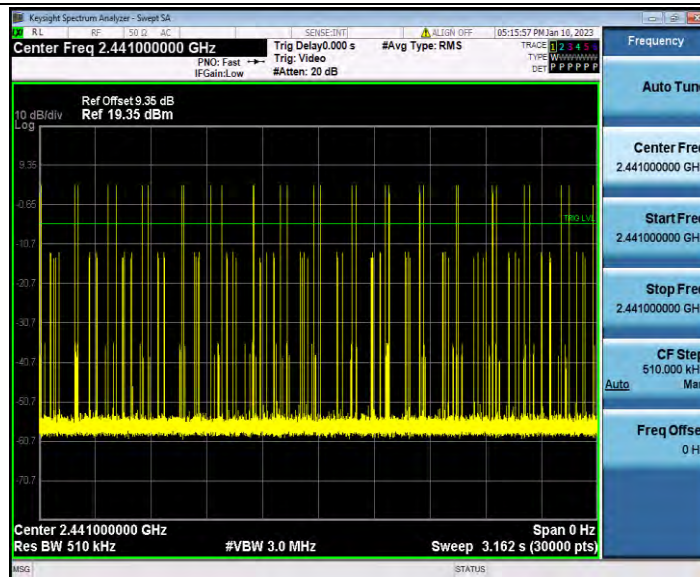
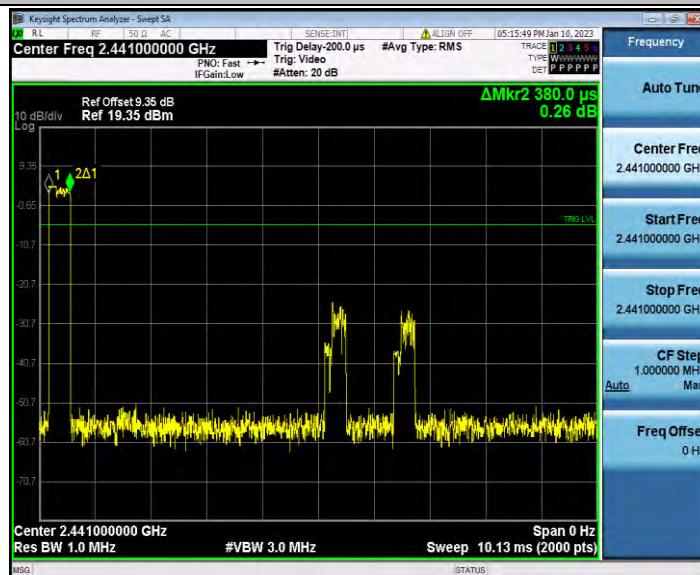


2DH5_Ant1_Hop

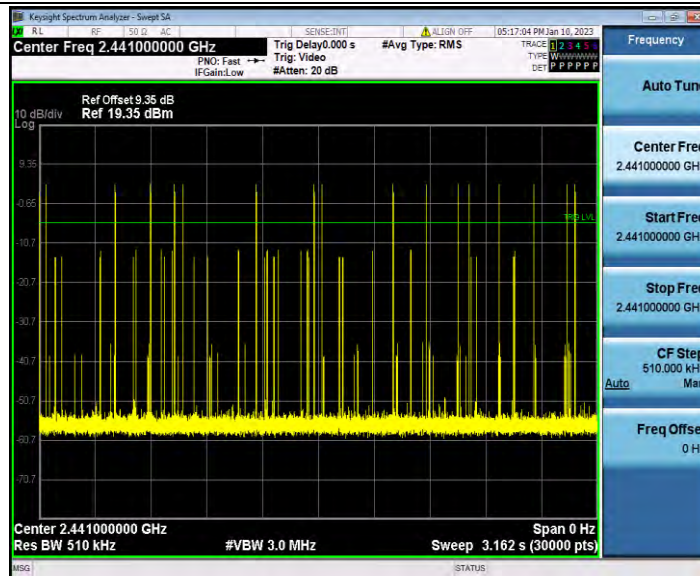
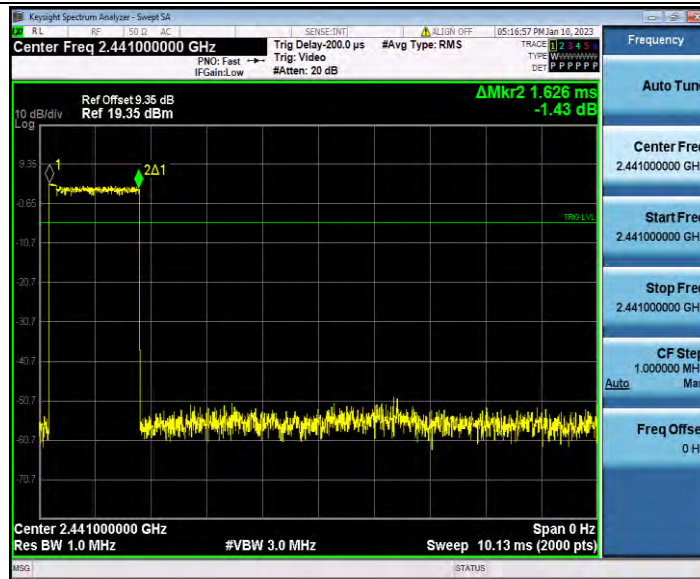




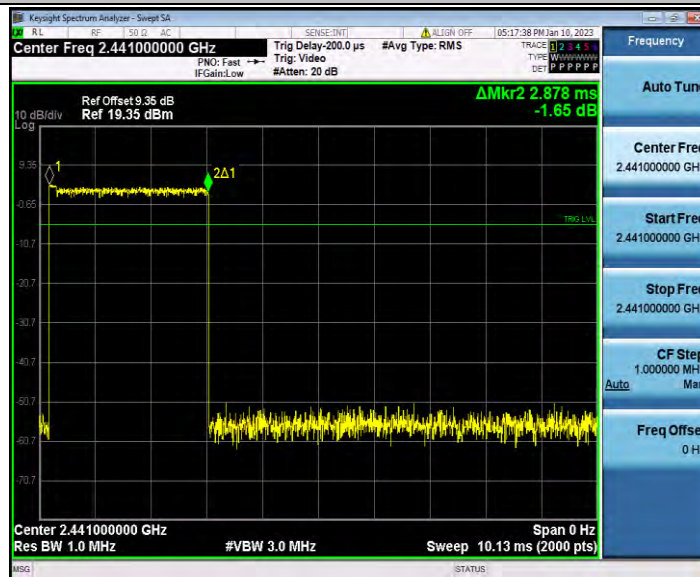
3DH1_Ant1_Hop

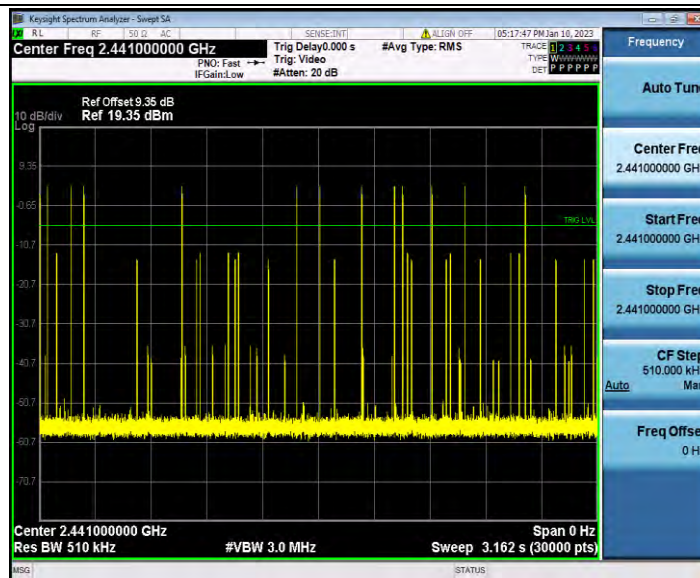


3DH3_Ant1_Hop



3DH5_Ant1_Hop





Appendix A.6: Number of hopping channels

Test Result

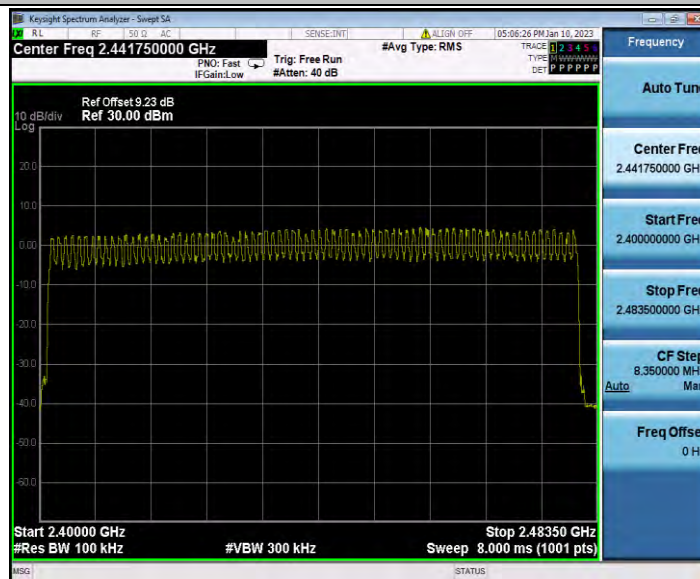
TestMode	Antenna	Frequency[MHz]	Result[Num]	Limit[Num]	Verdict
DH1	Ant1	Hop	79	≥15	PASS
2DH1	Ant1	Hop	79	≥15	PASS
3DH1	Ant1	Hop	79	≥15	PASS

Test Graphs

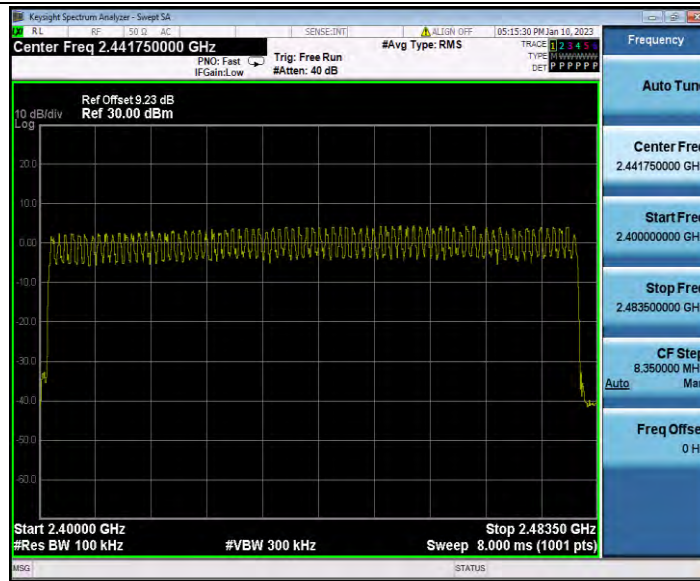
DH1_Ant1_Hop



2DH1_Ant1_Hop



3DH1_Ant1_Hop



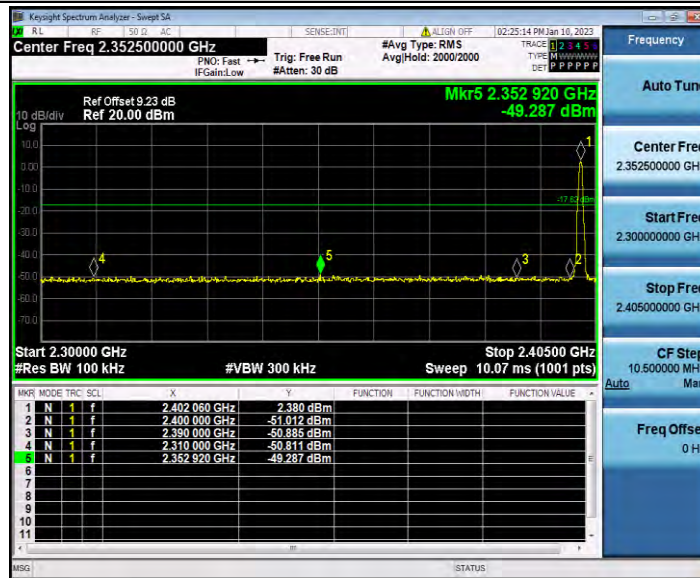
Appendix A.7: Band edge measurements

Test Result

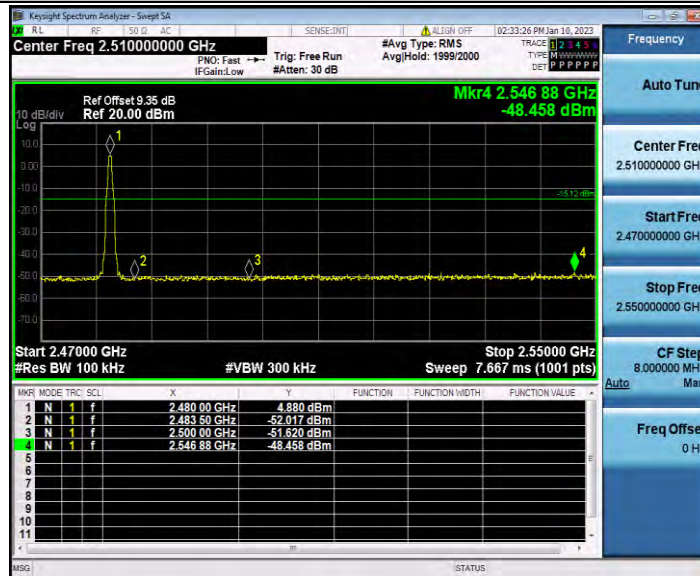
TestMode	Antenna	ChName	Frequency[MHz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH1	Ant1	Low	2402	2.38	-49.29	≤-17.62	PASS
		High	2480	4.88	-48.46	≤-15.12	PASS
		Low	Hop_2402	2.43	-49.33	≤-17.57	PASS
		High	Hop_2480	4.31	-48.49	≤-15.7	PASS
2DH1	Ant1	Low	2402	2.28	-47.82	≤-17.72	PASS
		High	2480	4.17	-48.54	≤-15.83	PASS
		Low	Hop_2402	1.21	-49.11	≤-18.79	PASS
		High	Hop_2480	3.90	-48.66	≤-16.1	PASS
3DH1	Ant1	Low	2402	2.09	-48.35	≤-17.91	PASS
		High	2480	4.28	-47.96	≤-15.72	PASS
		Low	Hop_2402	-0.08	-49.42	≤-20.08	PASS
		High	Hop_2480	3.70	-48.55	≤-16.3	PASS

Test Graphs

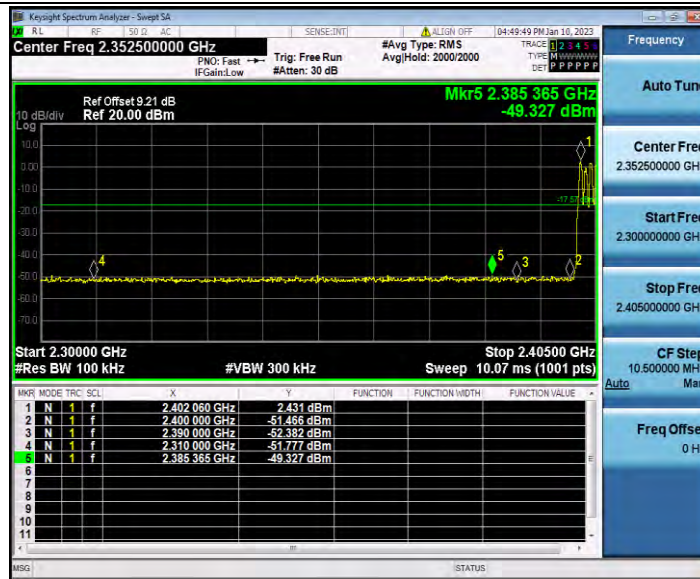
DH1_Ant1_Low_2402



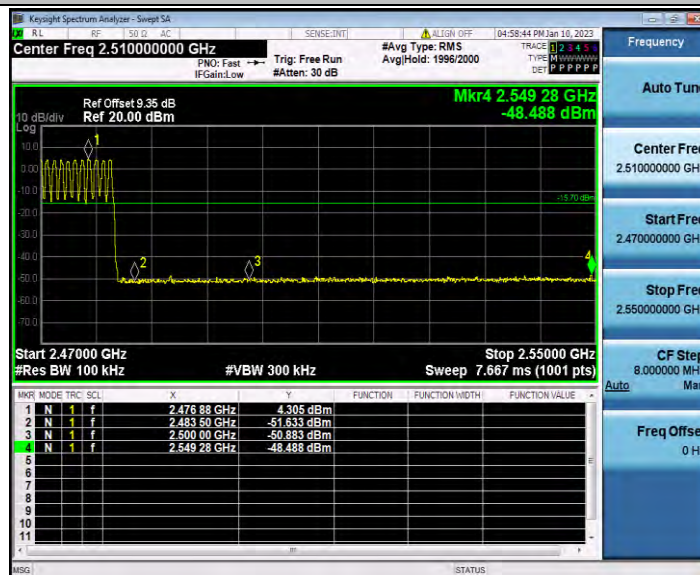
DH1_Ant1_High_2480



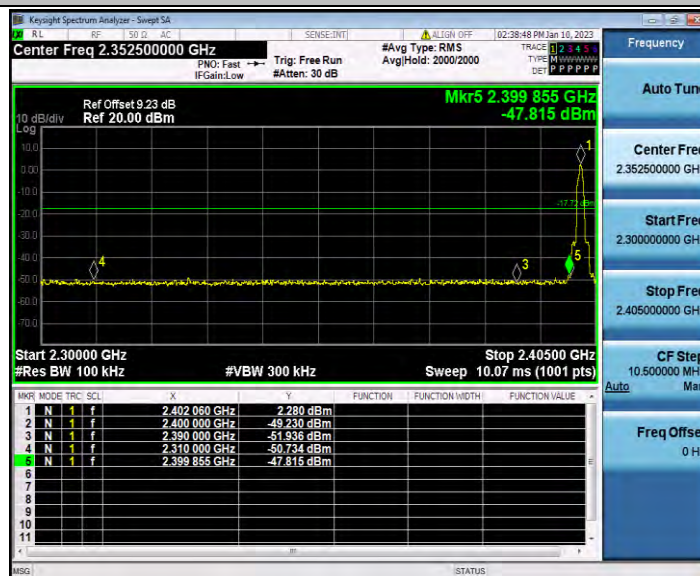
DH1_Ant1_Low_Hop_2402



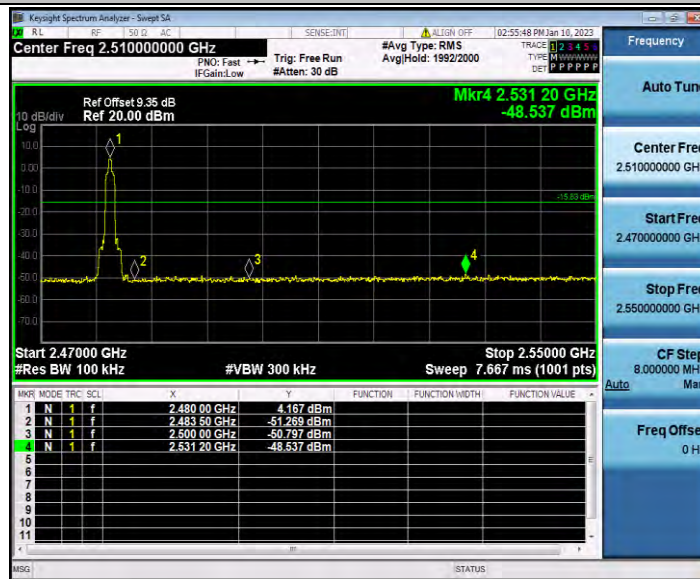
DH1_Ant1_High_Hop_2480



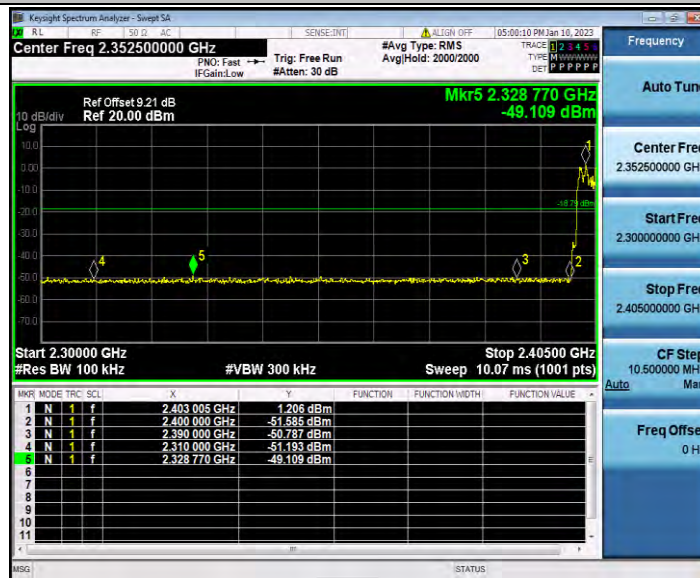
2DH1_Ant1_Low_2402



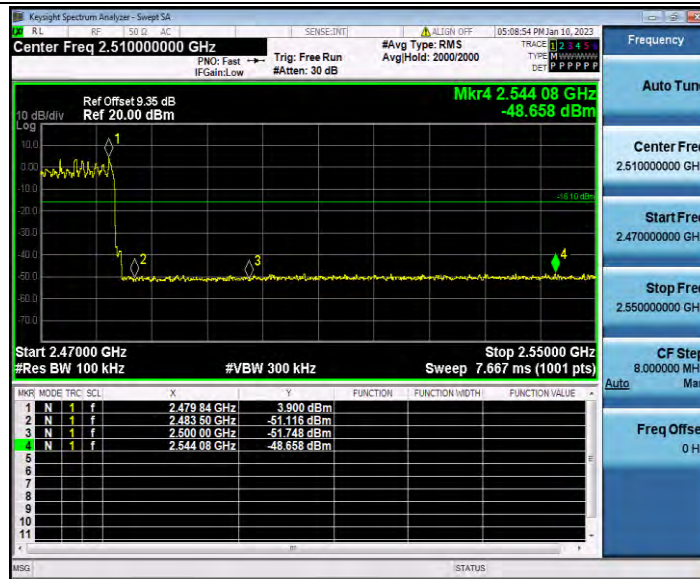
2DH1_Ant1_High_2480



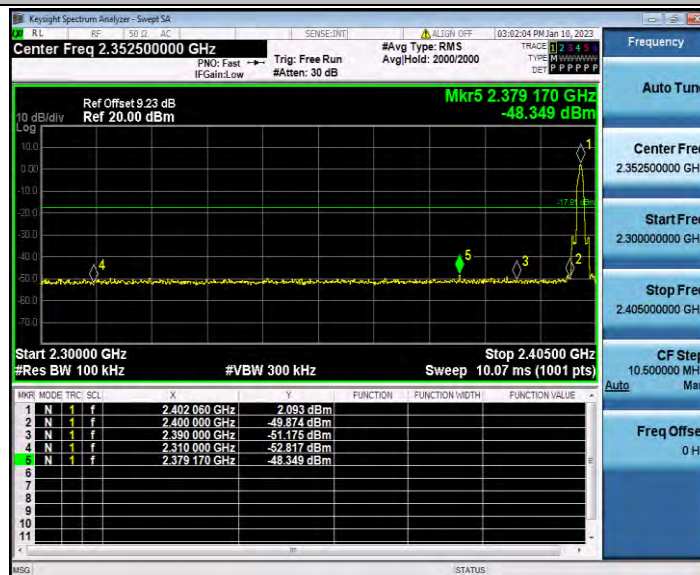
2DH1_Ant1_Low_Hop_2402



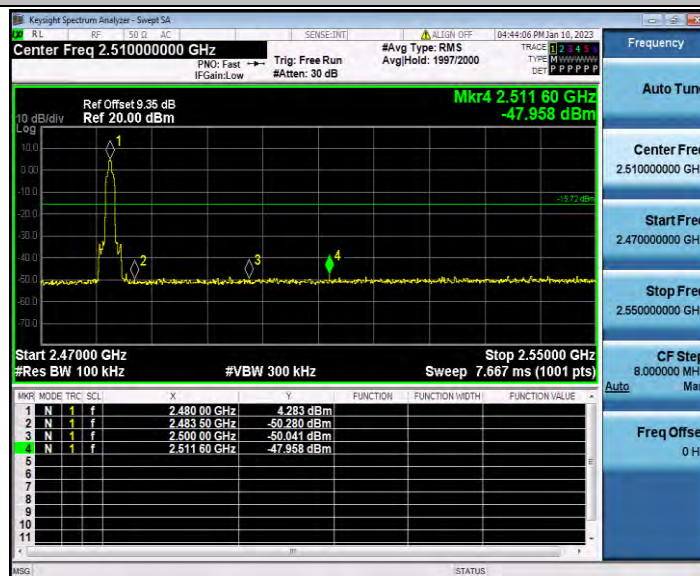
2DH1_Ant1_High_Hop_2480



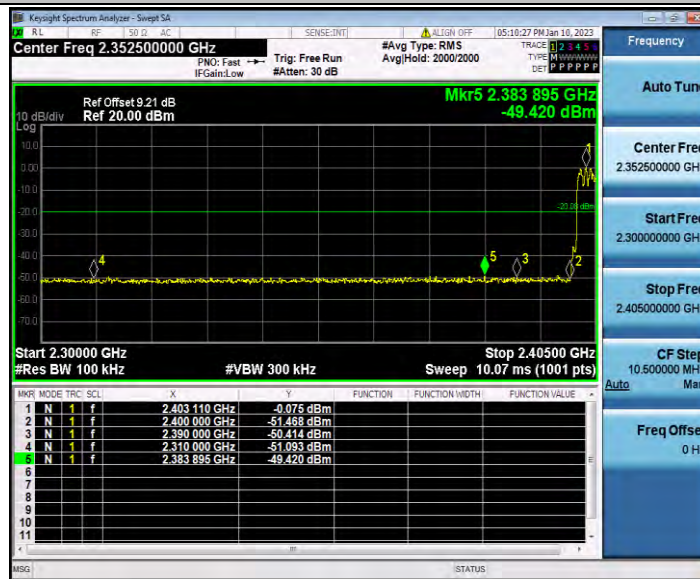
3DH1_Ant1_Low_2402



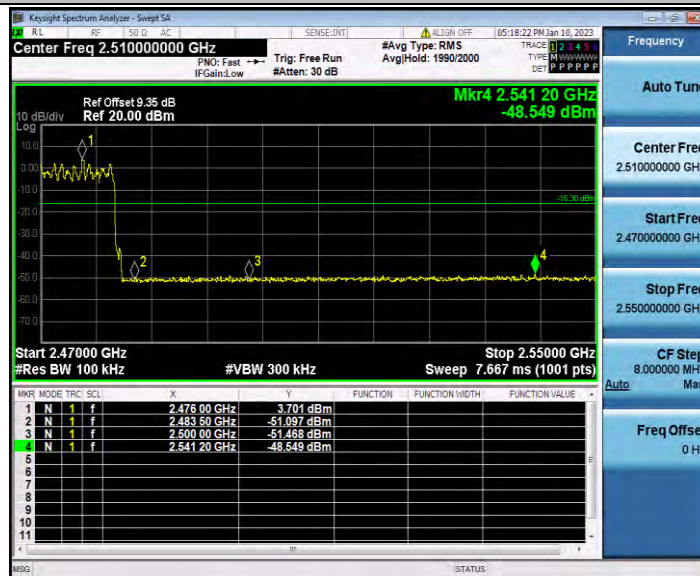
3DH1_Ant1_High_2480



3DH1_Ant1_Low_Hop_2402



3DH1_Ant1_High_Hop_2480



Appendix A.8: Conducted Spurious Emission

Test Result

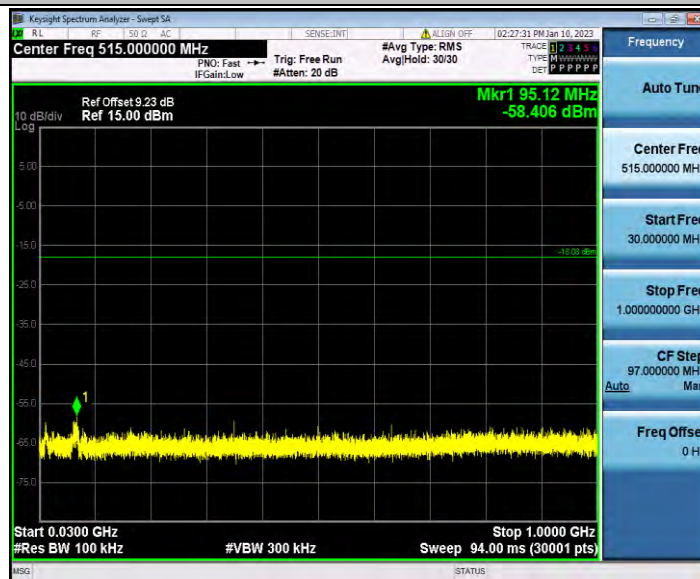
TestMode	Antenna	Frequency[MHz]	FreqRange [MHz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH1	Ant1	2402	Reference	1.92	1.92	---	PASS
			30~1000	1.92	-58.41	≤-18.08	PASS
			1000~26500	1.92	-47.47	≤-18.08	PASS
		2441	Reference	4.24	4.24	---	PASS
			30~1000	4.24	-58.75	≤-15.76	PASS
			1000~26500	4.24	-47.32	≤-15.76	PASS
		2480	Reference	4.29	4.29	---	PASS
			30~1000	4.29	-57.87	≤-15.71	PASS
			1000~26500	4.29	-47.43	≤-15.71	PASS
2DH1	Ant1	2402	Reference	1.77	1.77	---	PASS
			30~1000	1.77	-58.08	≤-18.23	PASS
			1000~26500	1.77	-47.65	≤-18.23	PASS
		2441	Reference	3.87	3.87	---	PASS
			30~1000	3.87	-57.74	≤-16.13	PASS
			1000~26500	3.87	-47.57	≤-16.13	PASS
		2480	Reference	4.04	4.04	---	PASS
			30~1000	4.04	-58.54	≤-15.96	PASS
			1000~26500	4.04	-47.48	≤-15.96	PASS
3DH1	Ant1	2402	Reference	0.91	0.91	---	PASS
			30~1000	0.91	-59.03	≤-19.09	PASS
			1000~26500	0.91	-46.68	≤-19.09	PASS
		2441	Reference	3.39	3.39	---	PASS
			30~1000	3.39	-60.53	≤-16.61	PASS
			1000~26500	3.39	-47.29	≤-16.61	PASS
		2480	Reference	3.62	3.62	---	PASS
			30~1000	3.62	-57.84	≤-16.38	PASS
			1000~26500	3.62	-47.05	≤-16.38	PASS

Test Graphs

DH1_Ant1_2402_0~Reference



DH1_Ant1_2402_30~1000



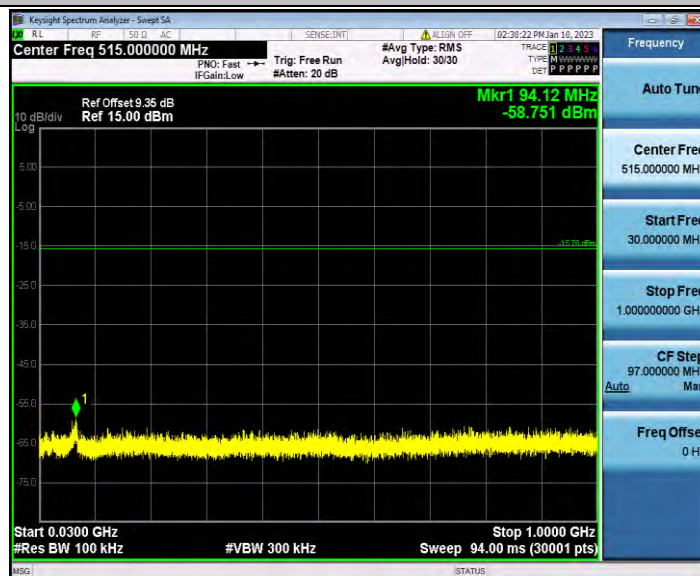
DH1_Ant1_2402_1000~26500



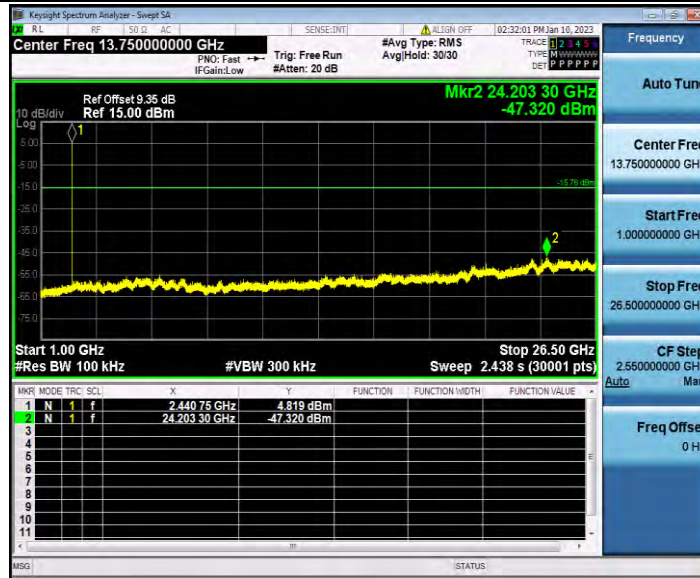
DH1_Ant1_2441_0~Reference



DH1_Ant1_2441_30~1000



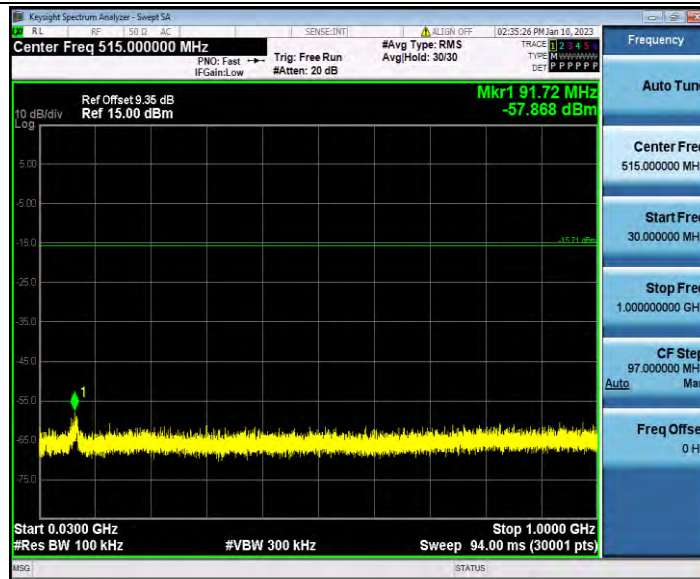
DH1_Ant1_2441_1000~26500



DH1_Ant1_2480_0~Reference



DH1_Ant1_2480_30~1000



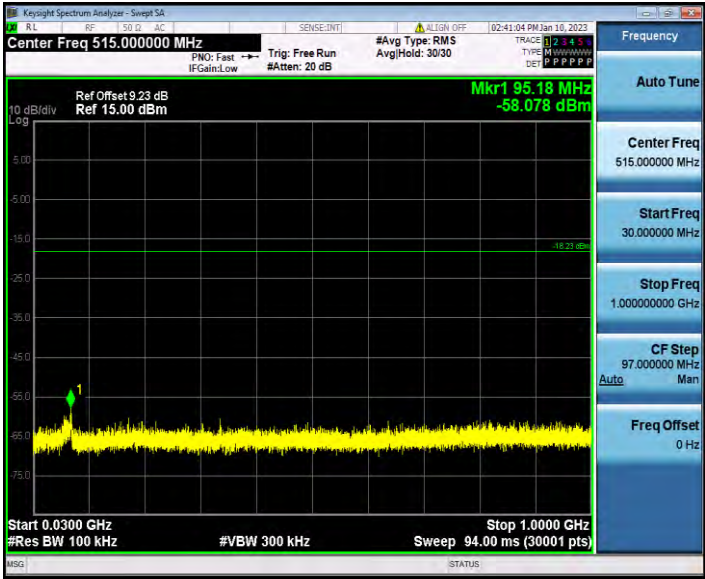
DH1_Ant1_2480_1000~26500



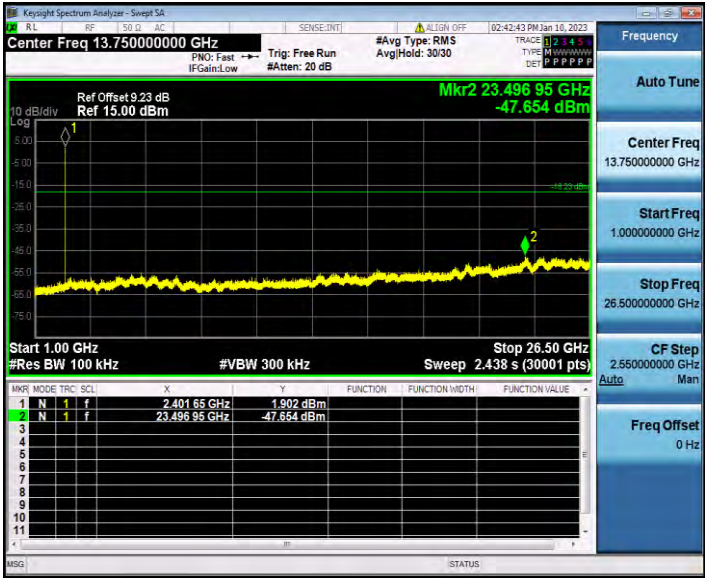
2DH1_Ant1_2402_0~Reference



2DH1_Ant1_2402_30~1000



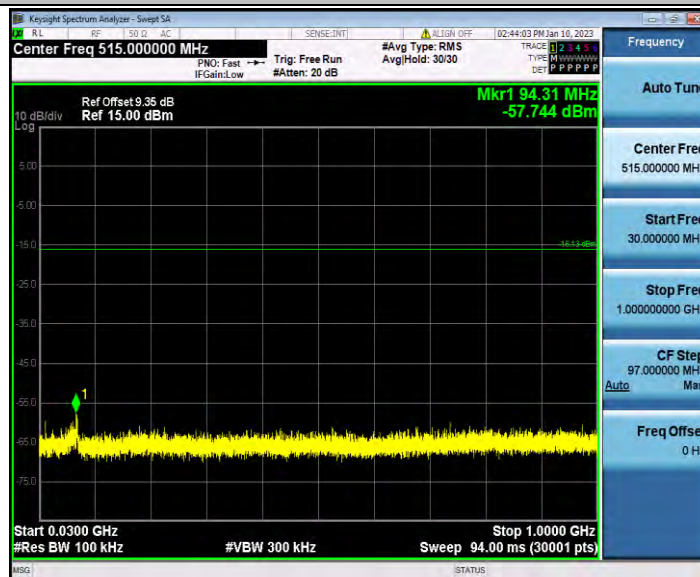
2DH1_Ant1_2402_1000~26500



2DH1_Ant1_2441_0~Reference



2DH1_Ant1_2441_30~1000



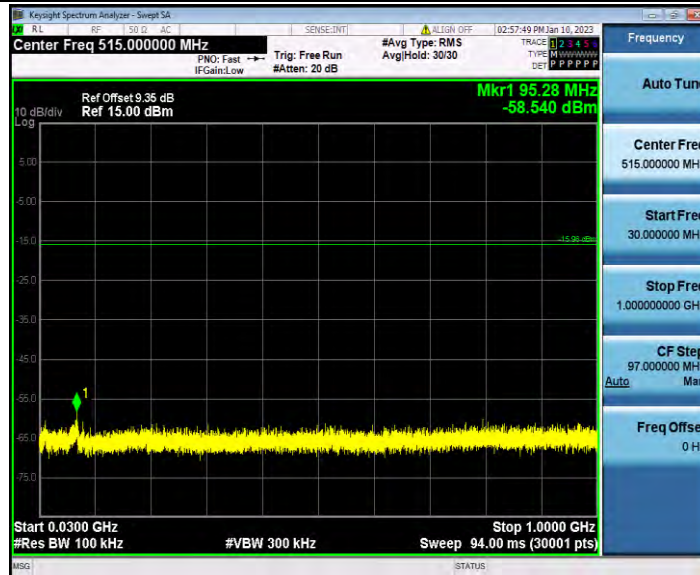
2DH1_Ant1_2441_1000~26500



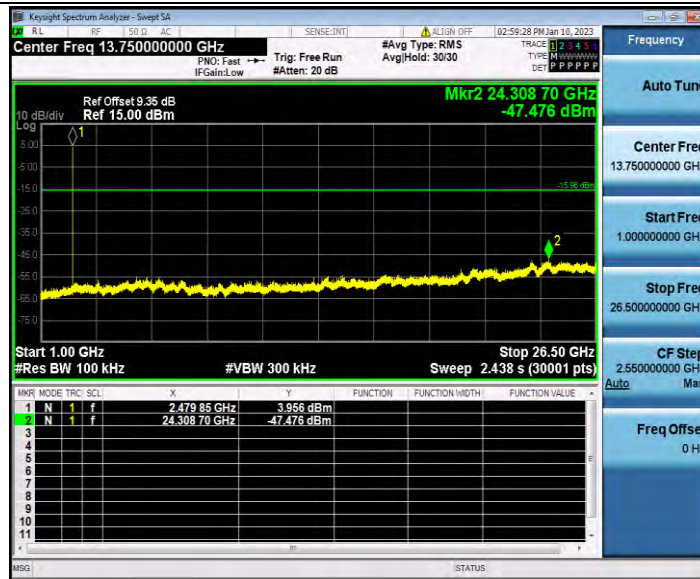
2DH1_Ant1_2480_0~Reference



2DH1_Ant1_2480_30~1000



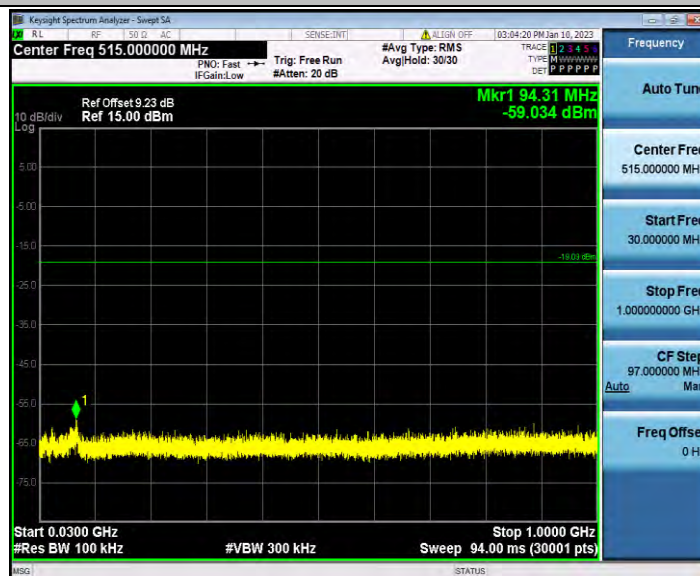
2DH1_Ant1_2480_1000~26500



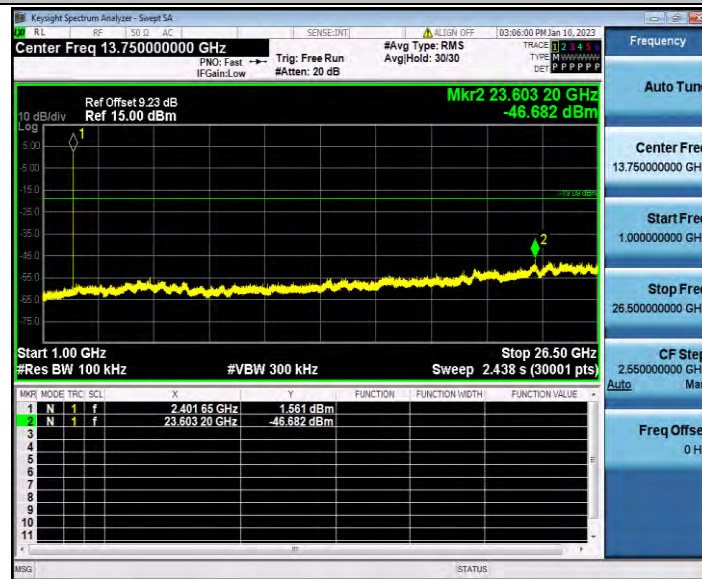
3DH1_Ant1_2402_0~Reference



3DH1_Ant1_2402_30~1000



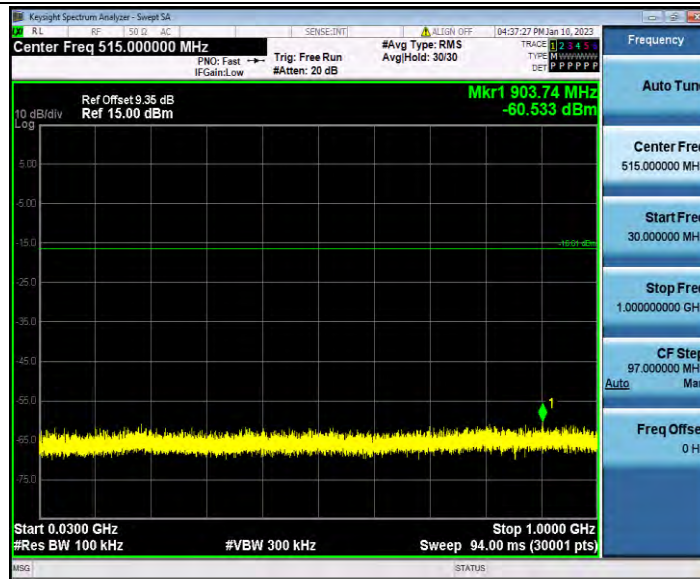
3DH1_Ant1_2402_1000~26500



3DH1_Ant1_2441_0~Reference



3DH1_Ant1_2441_30~1000



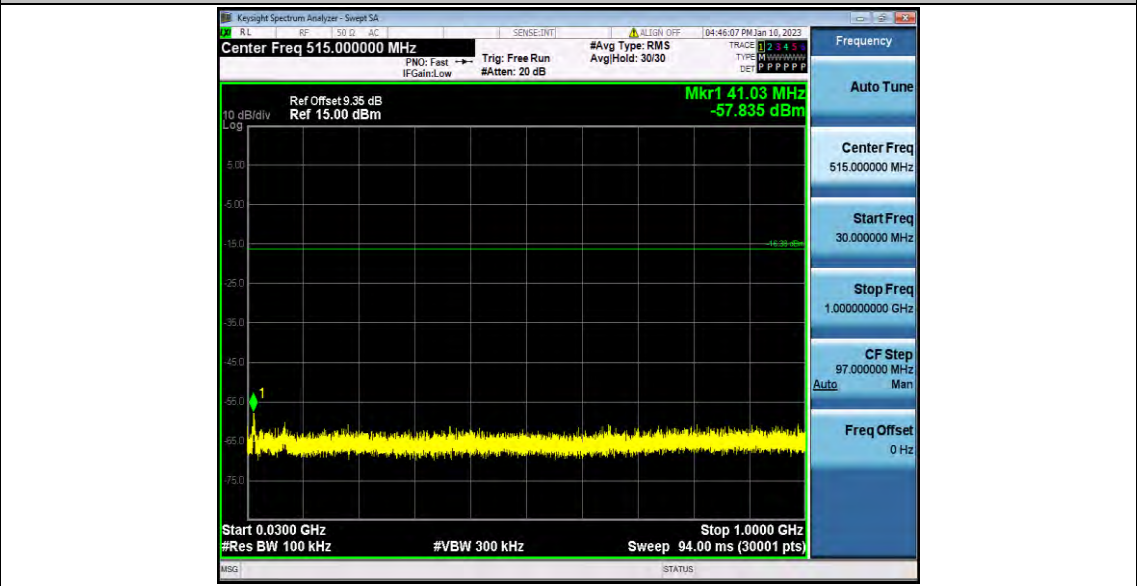
3DH1_Ant1_2441_1000~26500



3DH1_Ant1_2480_0~Reference



3DH1_Ant1_2480_30~1000



3DH1_Ant1_2480_1000~26500

