

Case No. : <u>GTS20250213017-1-01</u>	
Ambient Condition: <u>23</u> °C, <u>53</u> %RH	
According Standard: ■Part15C	
Test Date: <u>2025.3.6-2025.3.31</u>	Test Engineer: <u>Evan ouyang</u>

Appendix A.1: 20dB Emission Bandwidth

Test Result

TestMode	Antenna	Freq(MHz)	20dB EBW[MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH1	Ant1	2402	0.780	2401.613	2402.393	---	---
		2441	0.831	2440.568	2441.399	---	---
		2480	0.789	2479.607	2480.396	---	---
2DH1	Ant1	2402	1.245	2401.367	2402.612	---	---
		2441	1.257	2440.364	2441.621	---	---
		2480	1.224	2479.373	2480.597	---	---
3DH1	Ant1	2402	1.230	2401.394	2402.624	---	---
		2441	1.224	2440.397	2441.621	---	---
		2480	1.227	2479.394	2480.621	---	---

Test Graphs

DH1_Ant1_2402



DH1_Ant1_2441



DH1_Ant1_2480



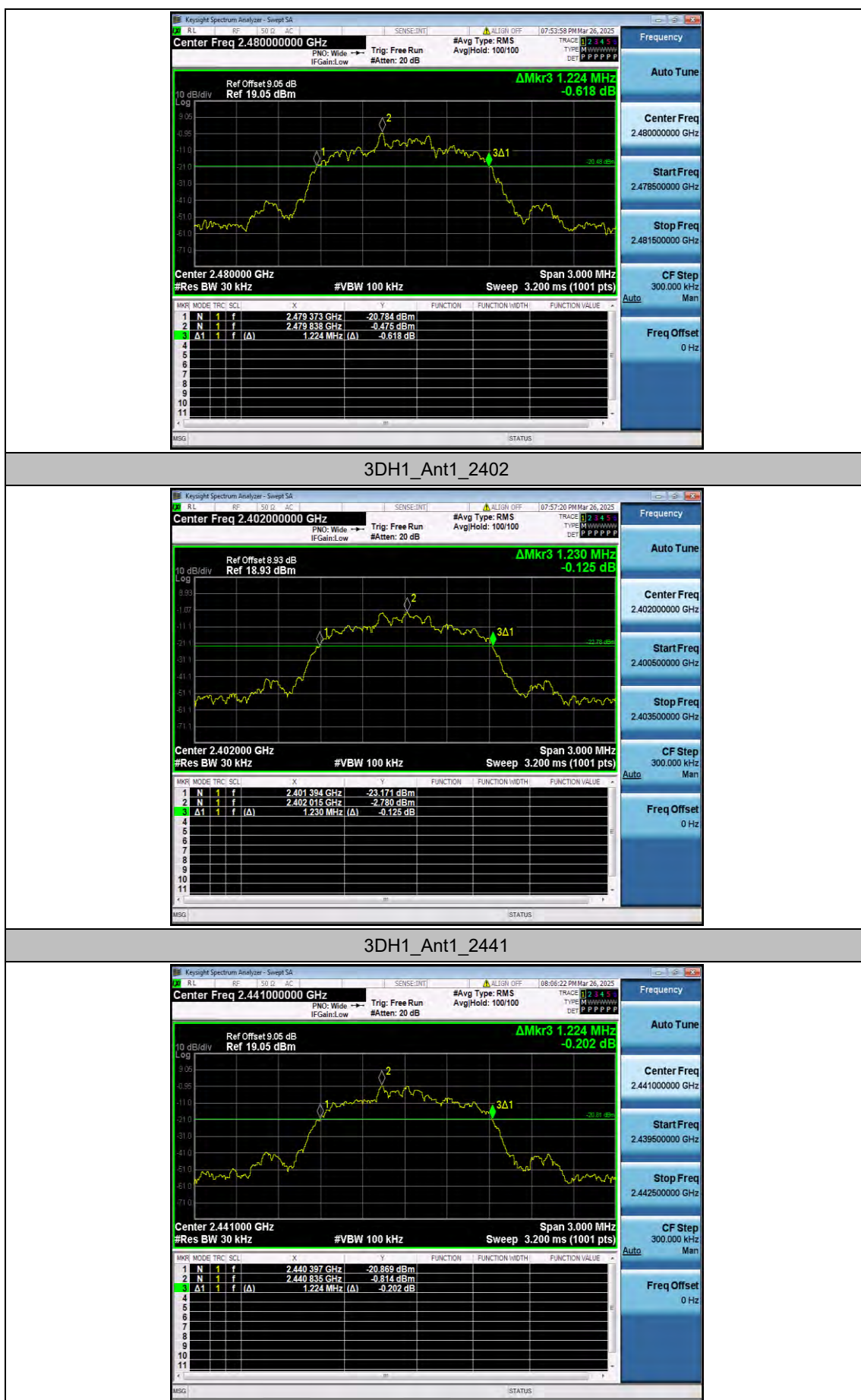
2DH1_Ant1_2402



2DH1_Ant1_2441



2DH1_Ant1_2480





Appendix A.2: Occupied Channel Bandwidth

Test Result

TestMode	Antenna	Freq(MHz)	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH1	Ant1	2402	0.72780	2401.6273	2402.3551	---	---
		2441	0.71810	2440.6324	2441.3505	---	---
		2480	0.71939	2479.6292	2480.3486	---	---
2DH1	Ant1	2402	1.1304	2401.4319	2402.5623	---	---
		2441	1.1350	2440.4294	2441.5644	---	---
		2480	1.1279	2479.4332	2480.5611	---	---
3DH1	Ant1	2402	1.1296	2401.4411	2402.5707	---	---
		2441	1.1328	2440.4402	2441.5730	---	---
		2480	1.1359	2479.4382	2480.5741	---	---

Test Graphs

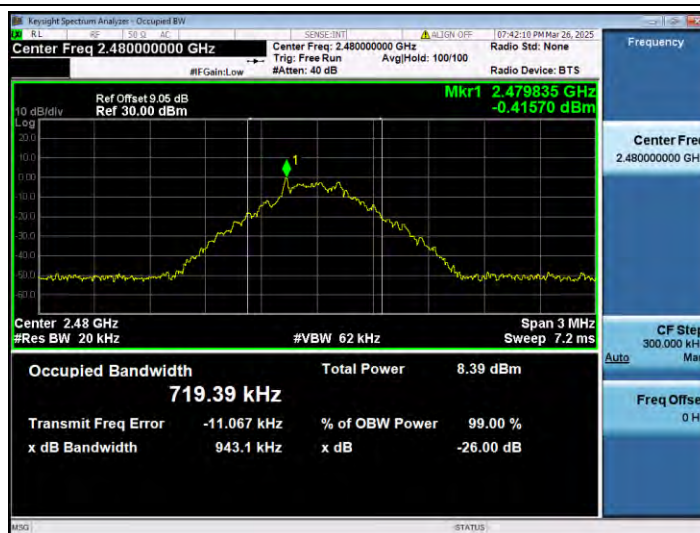
DH1_Ant1_2402



DH1_Ant1_2441



DH1_Ant1_2480



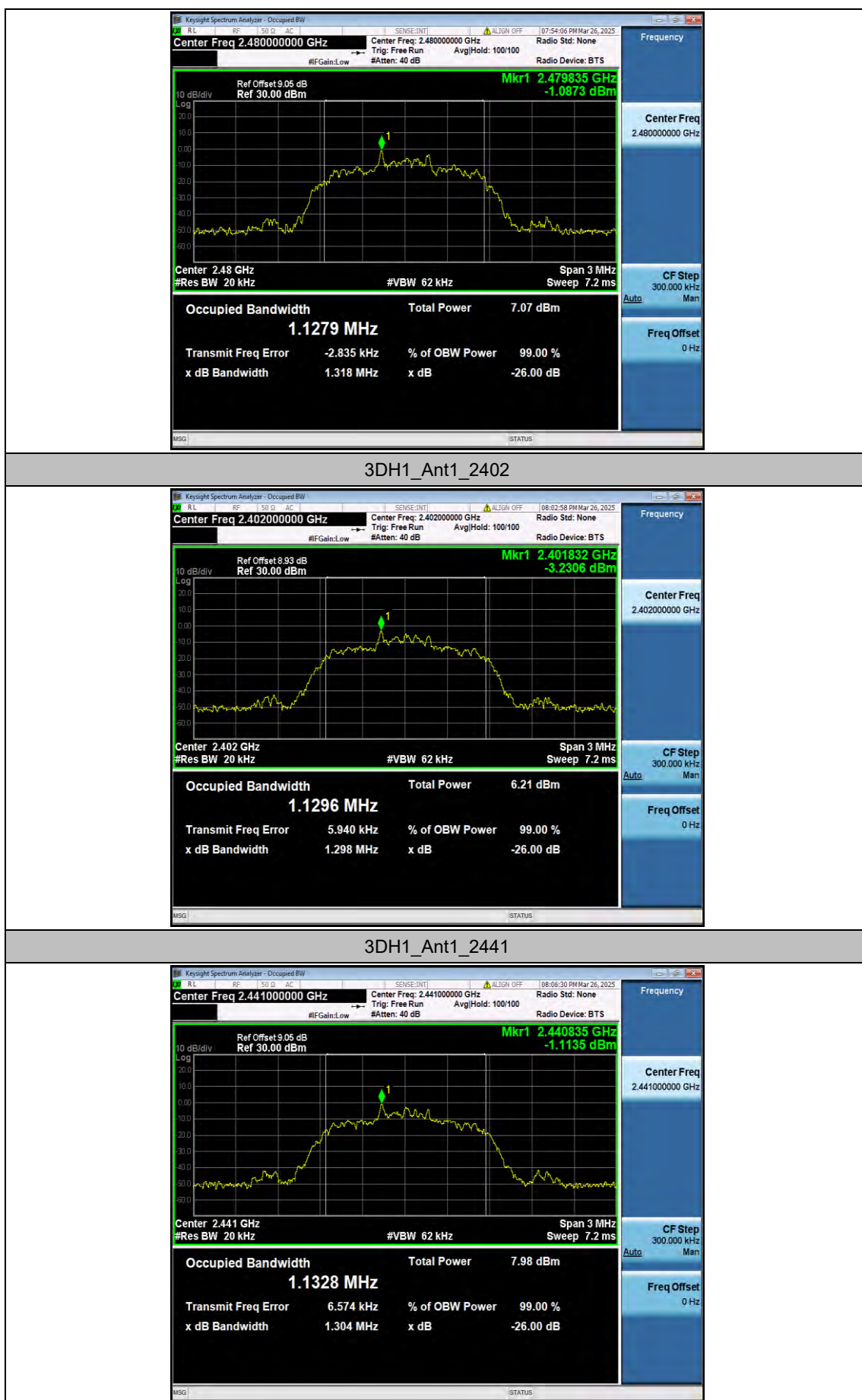
2D11_Ant1_2402



2D11_Ant1_2441



2D11_Ant1_2480





Appendix A.3: Maximum conducted output power

Test Result Peak

Test Mode	Antenna	Freq(MHz)	Conducted Peak Power[dBm]	Conducted Limit[dBm]	Verdict
DH1	Ant1	2402	3.21	≤ 20.97	PASS
		2441	4.98	≤ 20.97	PASS
		2480	3.81	≤ 20.97	PASS
2DH1	Ant1	2402	2.35	≤ 20.97	PASS
		2441	4.04	≤ 20.97	PASS
		2480	2.94	≤ 20.97	PASS
3DH1	Ant1	2402	2.39	≤ 20.97	PASS
		2441	4.13	≤ 20.97	PASS
		2480	2.98	≤ 20.97	PASS

Appendix A.4: Carrier frequency separation

Test Result

TestMode	Antenna	Freq(MHz)	Result[MHz]	Limit[MHz]	Verdict
DH1	Ant1	Hop_2402	0.684	≥ 0.554	PASS
		Hop_2441	1.316	≥ 0.554	PASS
		Hop_2480	1.204	≥ 0.554	PASS
2DH1	Ant1	Hop_2402	0.966	≥ 0.838	PASS
		Hop_2441	0.988	≥ 0.838	PASS
		Hop_2480	1.002	≥ 0.838	PASS
3DH1	Ant1	Hop_2402	0.966	≥ 0.820	PASS
		Hop_2441	1	≥ 0.820	PASS
		Hop_2480	1.002	≥ 0.820	PASS

Test Graphs

DH1_Ant1_Hop_2402



DH1_Ant1_Hop_2441



DH1_Ant1_Hop_2480



2DH1_Ant1_Hop_2402



2DH1_Ant1_Hop_2441



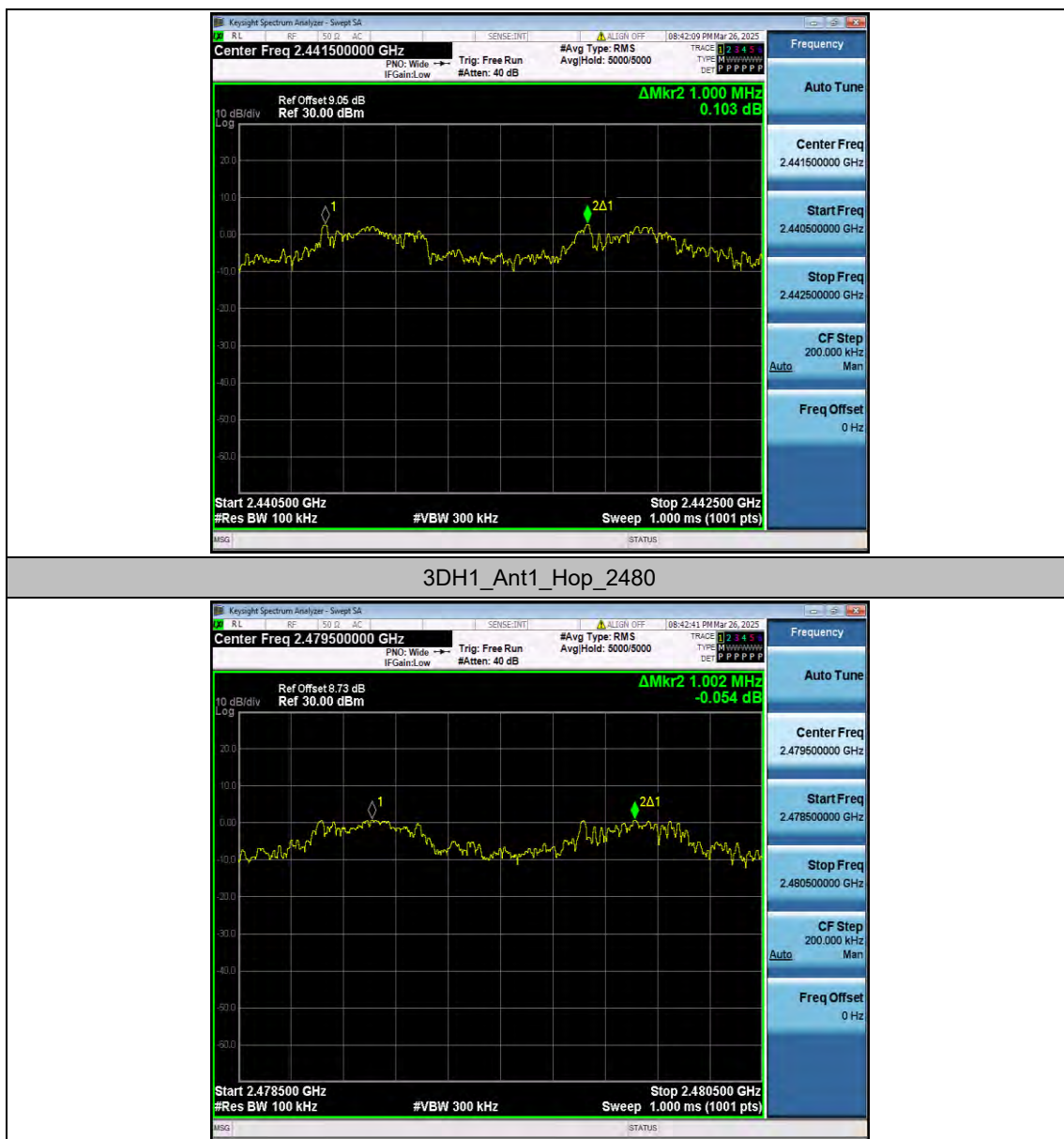
2DH1_Ant1_Hop_2480



3DH1_Ant1_Hop_2402



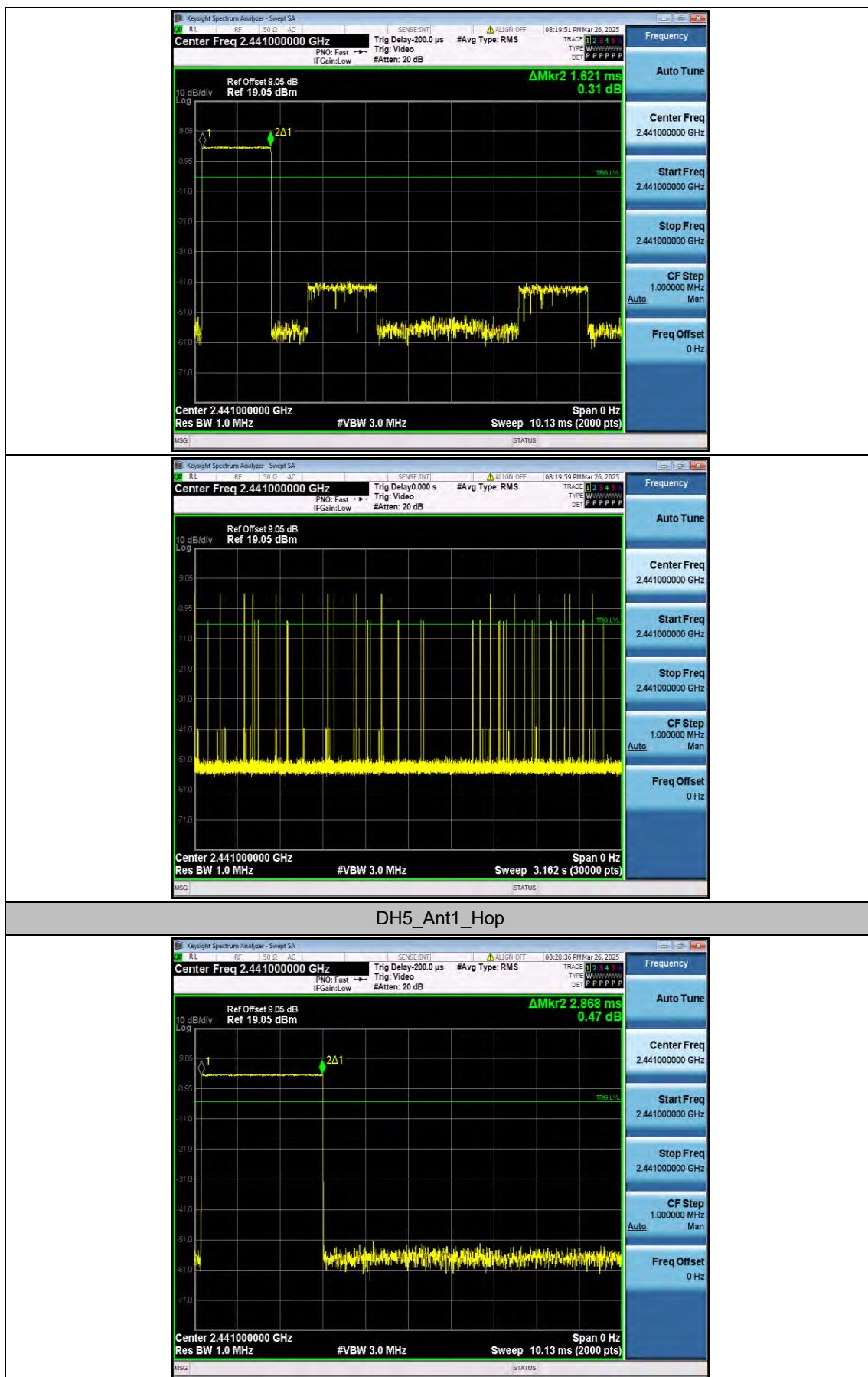
3DH1_Ant1_Hop_2441

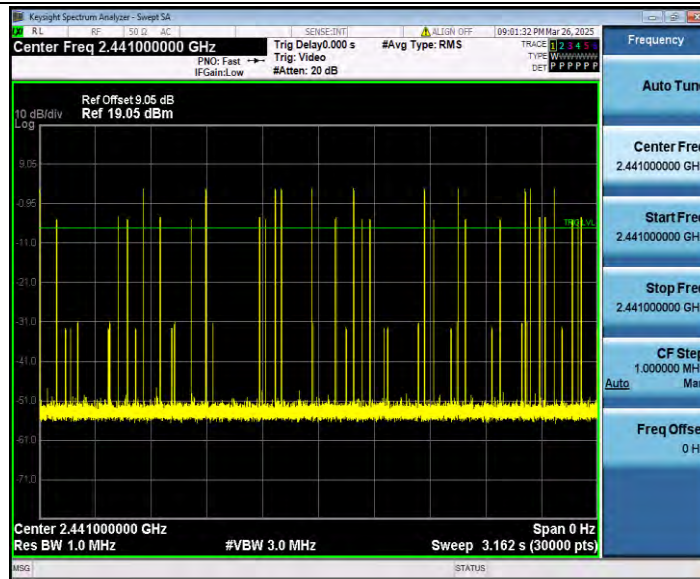


Appendix A.5: Time of occupancy

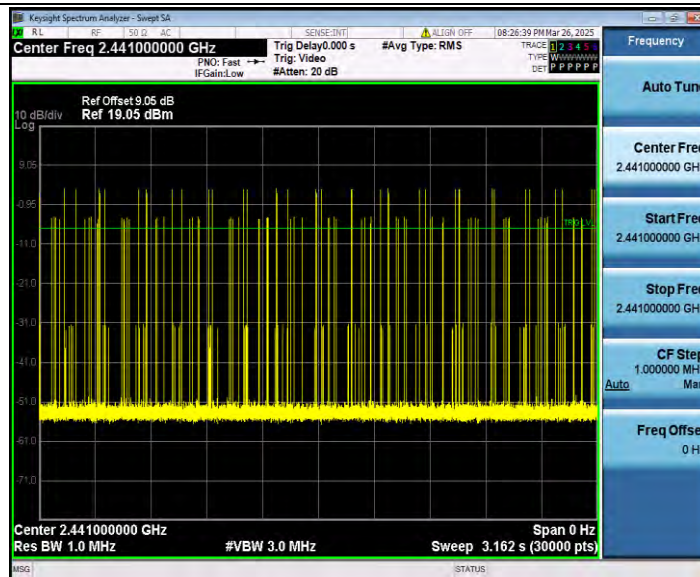
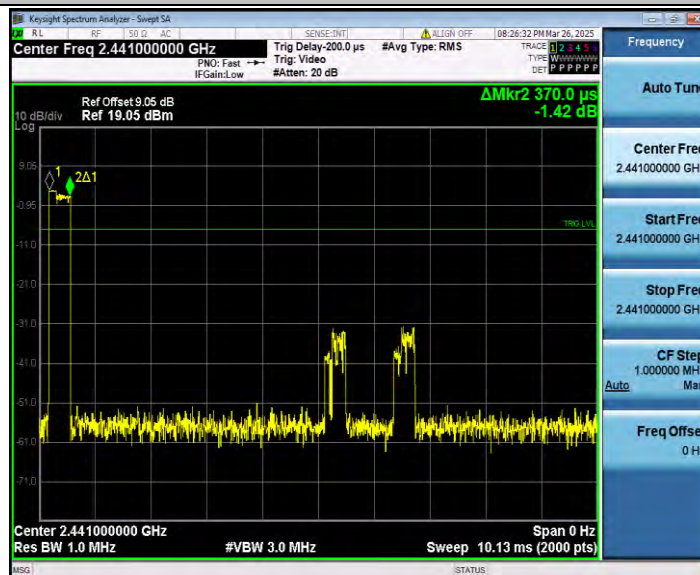
Test Result

TestMode	Antenna	Freq(MHz)	BurstWidth [ms]	TotalHops [Num]	Result[s]	Limit[s]	Verdict
DH1	Ant1	Hop	0.365	320	0.117	≤0.4	PASS
DH3	Ant1	Hop	1.621	170	0.276	≤0.4	PASS
DH5	Ant1	Hop	2.868	110	0.315	≤0.4	PASS
2DH1	Ant1	Hop	0.370	330	0.122	≤0.4	PASS
2DH3	Ant1	Hop	1.626	160	0.26	≤0.4	PASS
2DH5	Ant1	Hop	2.873	120	0.345	≤0.4	PASS
3DH1	Ant1	Hop	0.375	320	0.12	≤0.4	PASS
3DH3	Ant1	Hop	1.626	180	0.293	≤0.4	PASS
3DH5	Ant1	Hop	2.873	120	0.345	≤0.4	PASS

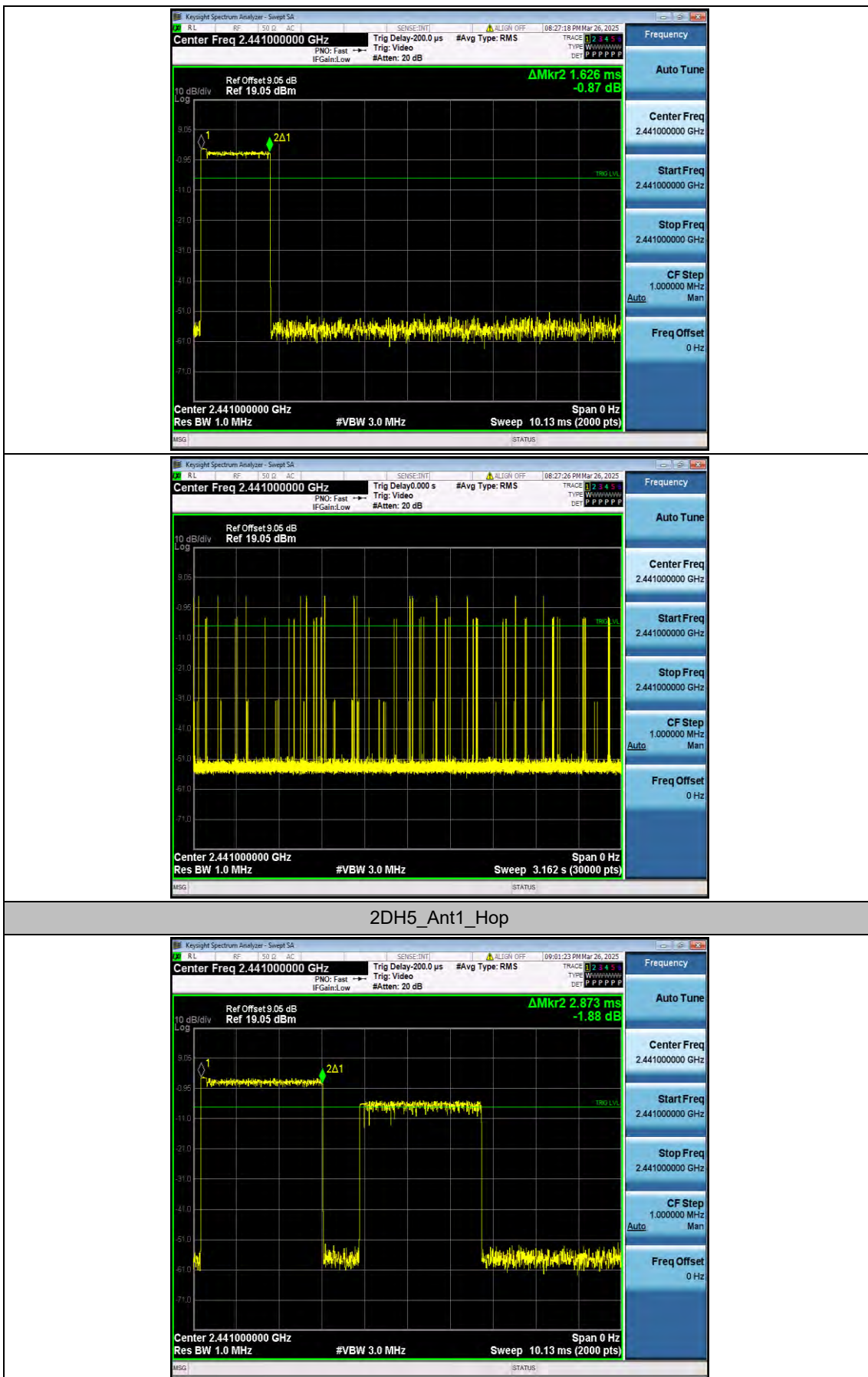


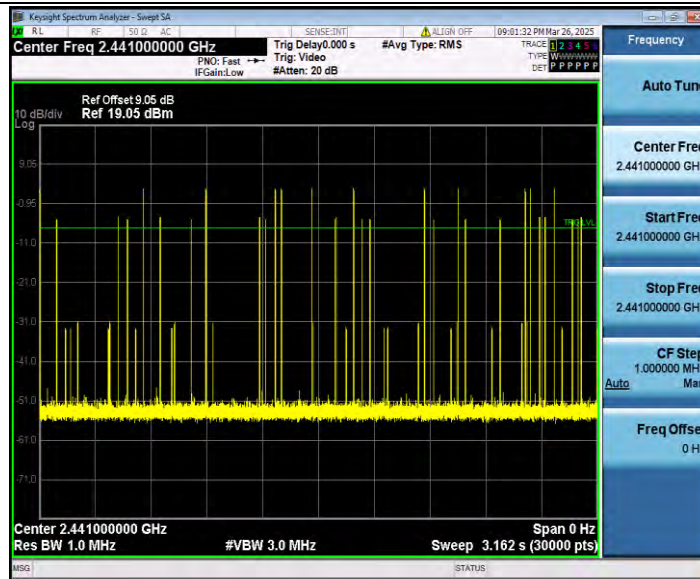


2DH1_Ant1_Hop

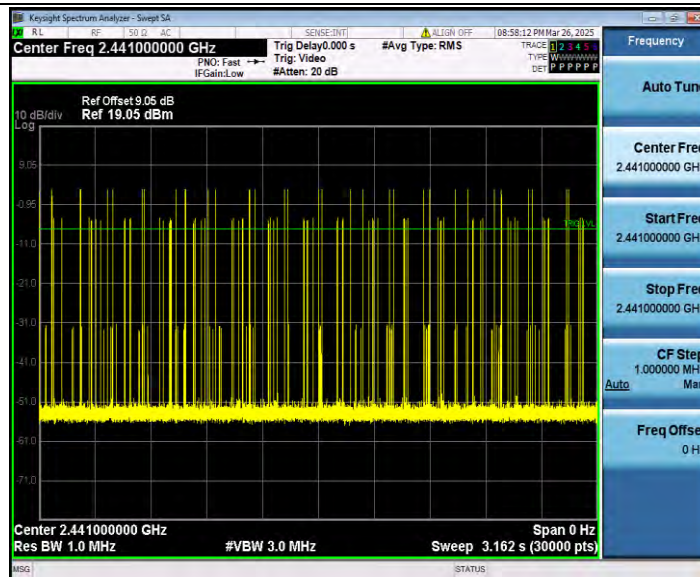
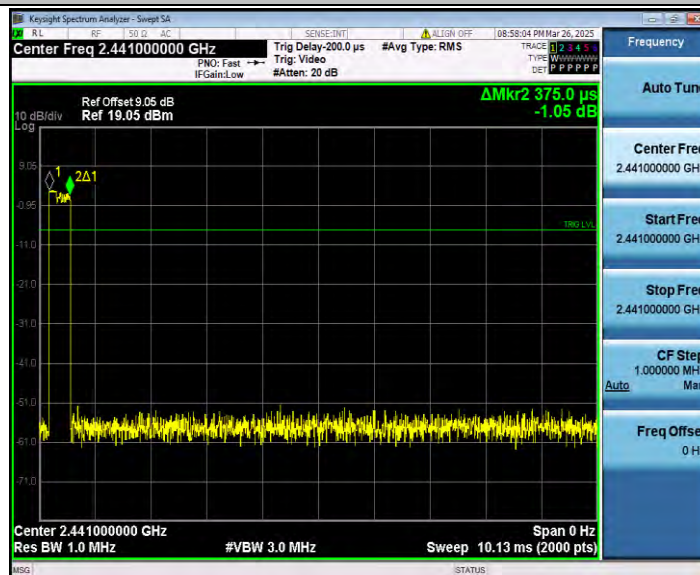


2DH3_Ant1_Hop

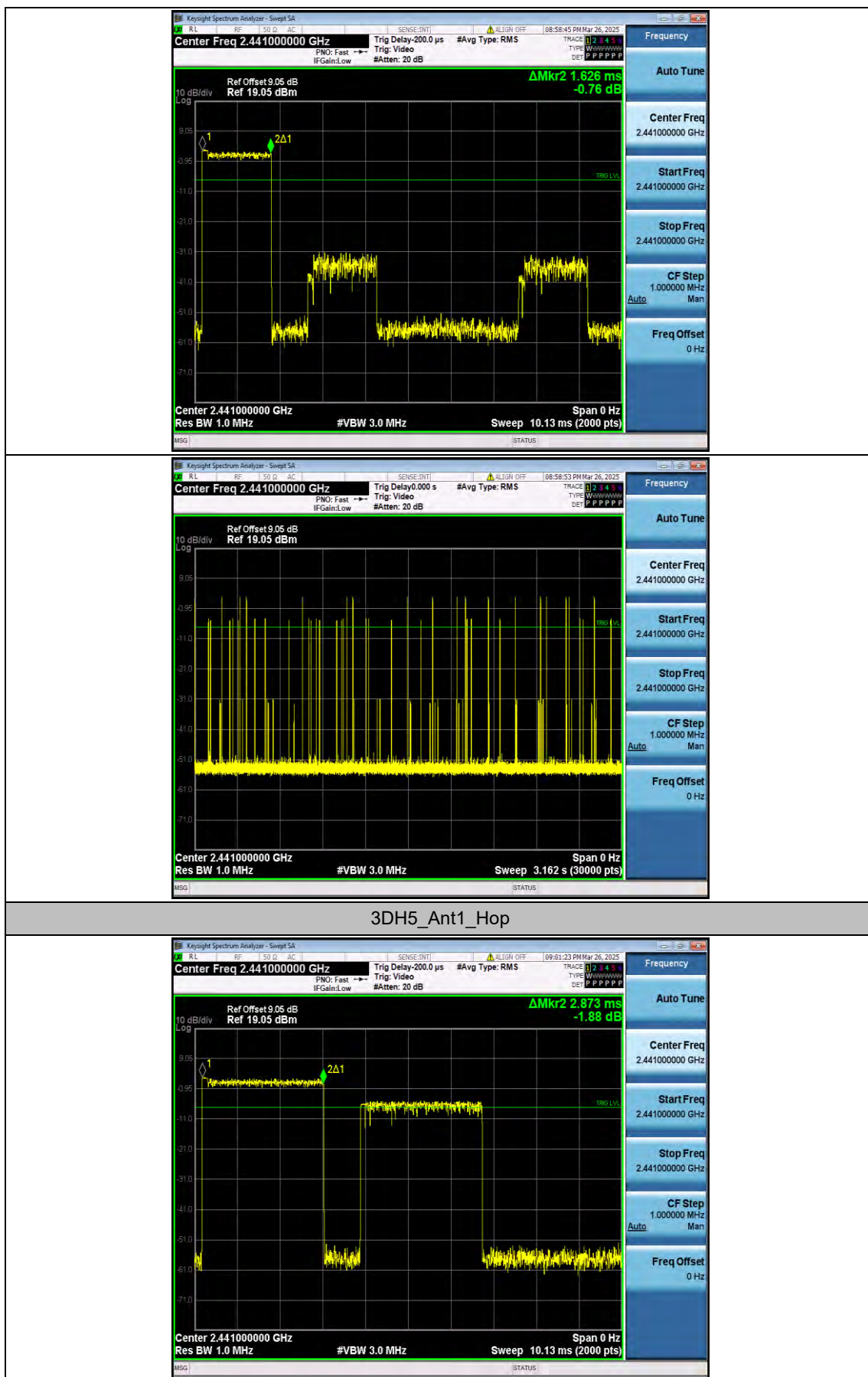




3DH1_Ant1_Hop



3DH3_Ant1_Hop



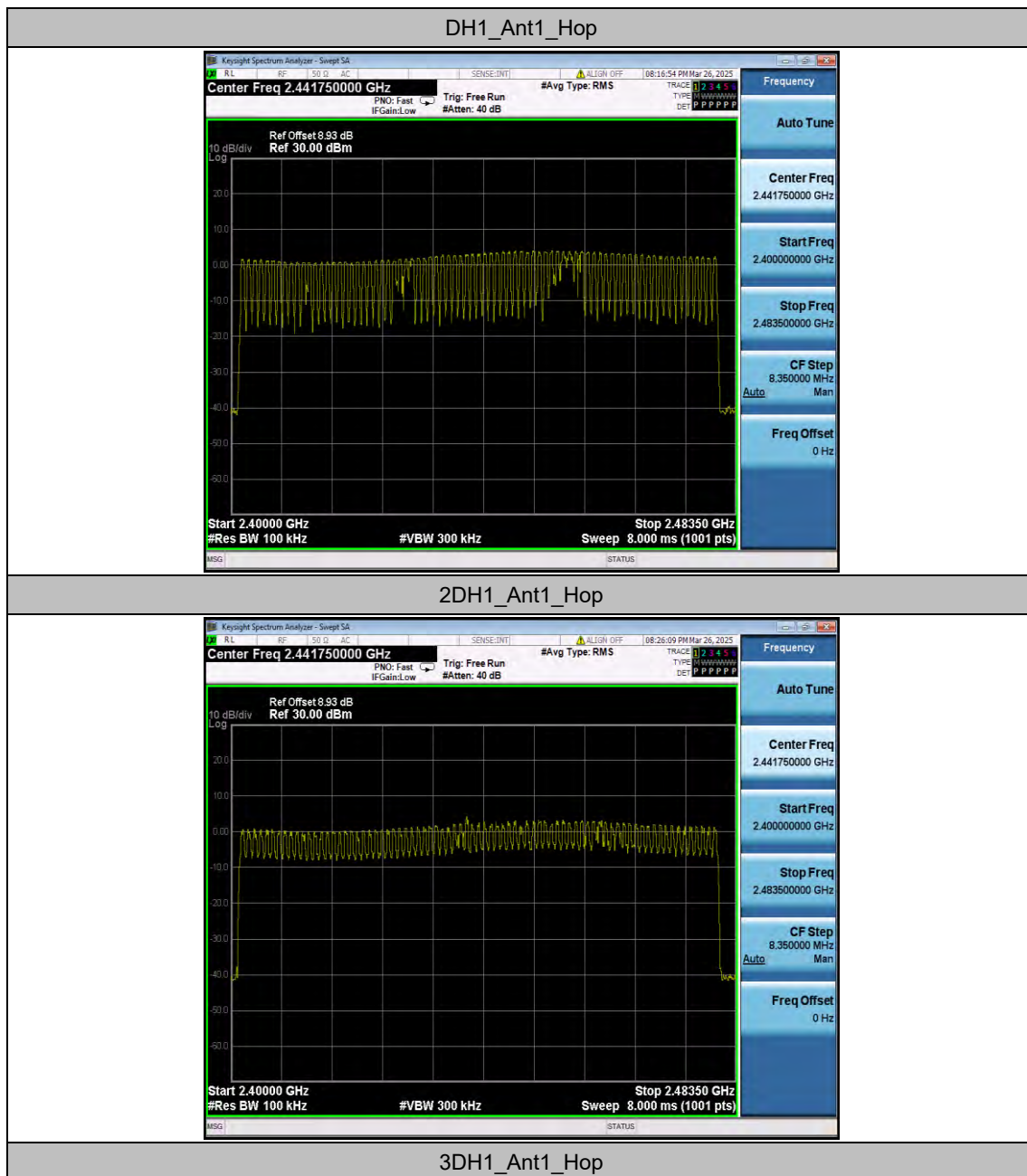


Appendix A.6: Number of hopping channels

Test Result

TestMode	Antenna	Freq(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



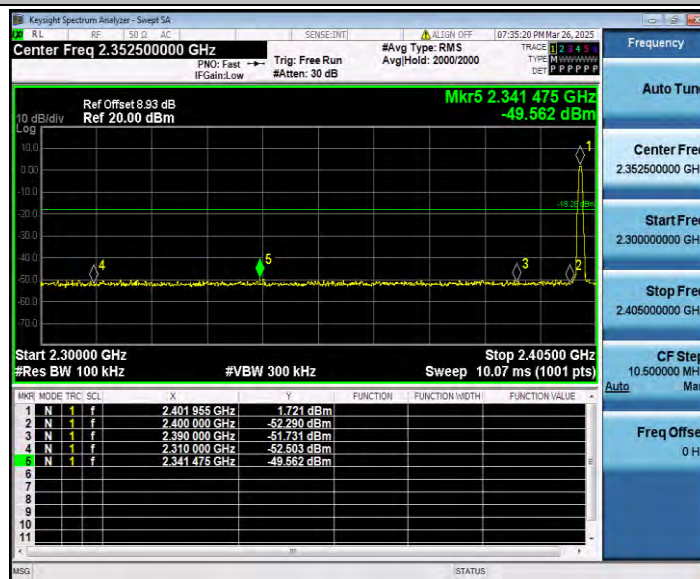
Appendix A.7: Band edge measurements

Test Result

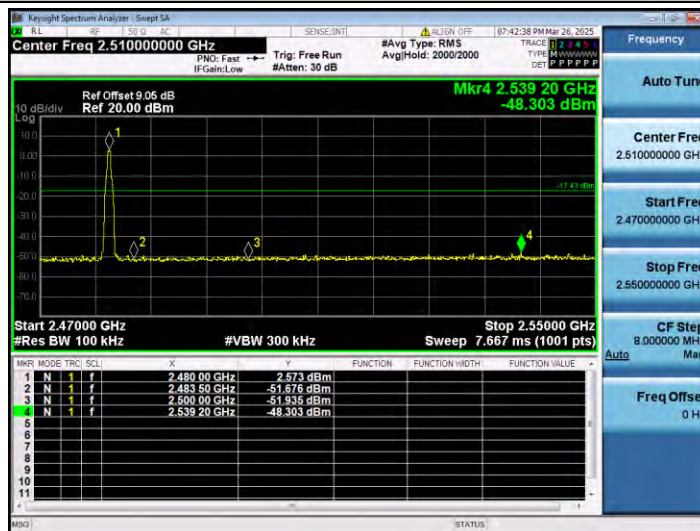
TestMode	Antenna	ChName	Freq(MHz)	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH1	Ant1	Low	2402	1.72	-49.56	≤ -18.28	PASS
		High	2480	2.57	-48.3	≤ -17.43	PASS
		Low	Hop_2402	1.54	-48.98	≤ -18.46	PASS
		High	Hop_2480	2.49	-48.61	≤ -17.51	PASS
2DH1	Ant1	Low	2402	0.95	-49.24	≤ -19.06	PASS
		High	2480	1.47	-47.65	≤ -18.53	PASS
		Low	Hop_2402	0.39	-49.42	≤ -19.62	PASS
		High	Hop_2480	0.86	-48.75	≤ -19.14	PASS
3DH1	Ant1	Low	2402	0.95	-49.01	≤ -19.05	PASS
		High	2480	1.47	-47.65	≤ -18.53	PASS
		Low	Hop_2402	0.61	-49.63	≤ -19.4	PASS
		High	Hop_2480	1.93	-47.84	≤ -18.07	PASS

Test Graphs

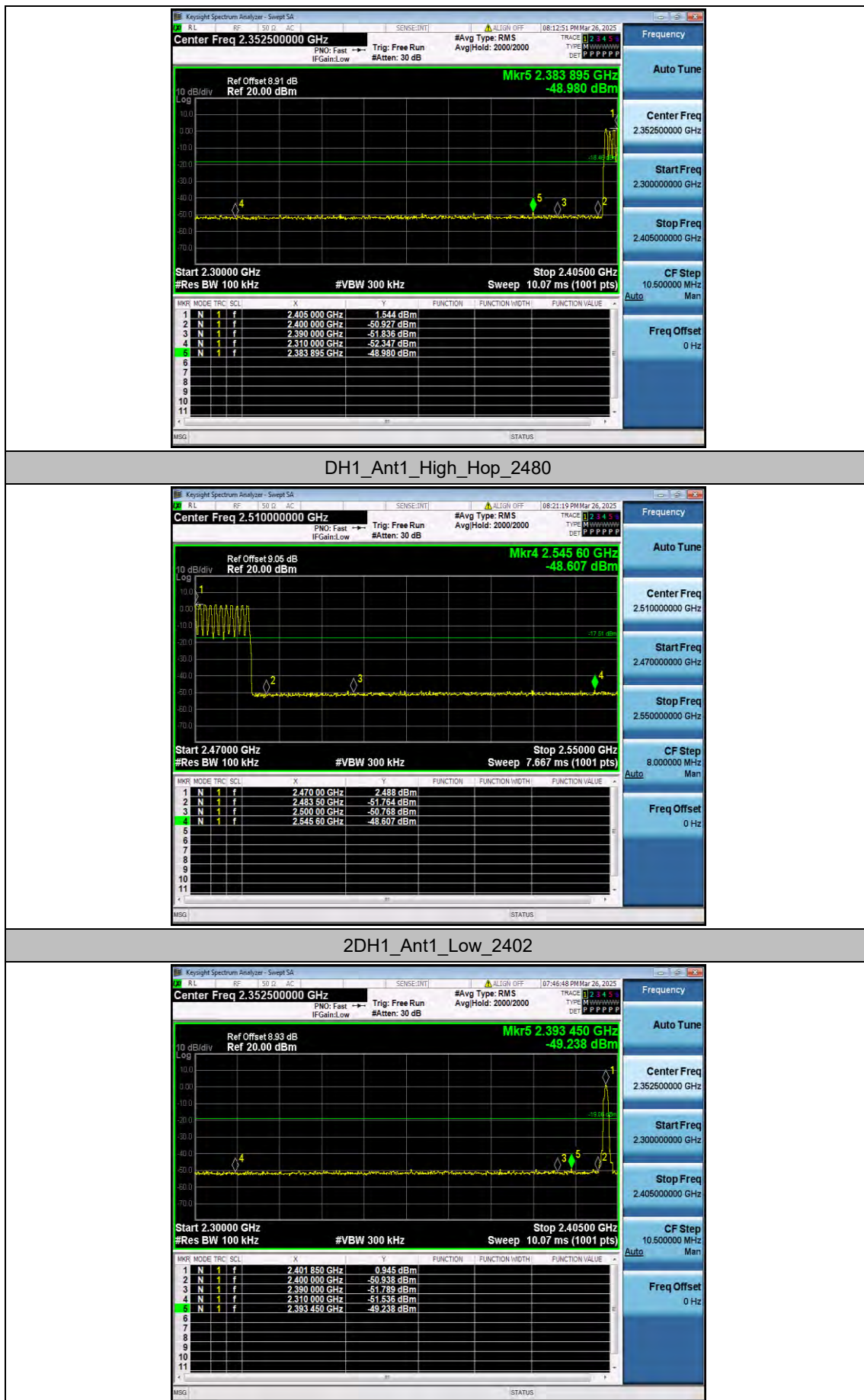
DH1_Ant1_Low_2402



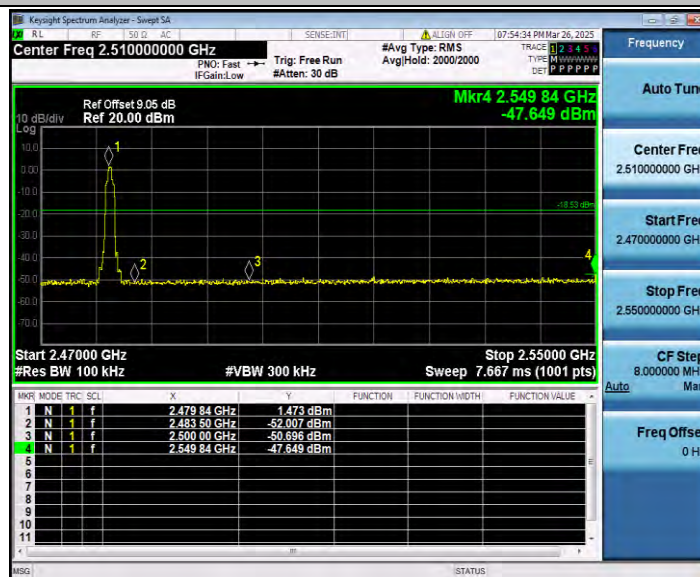
DH1_Ant1_High_2480



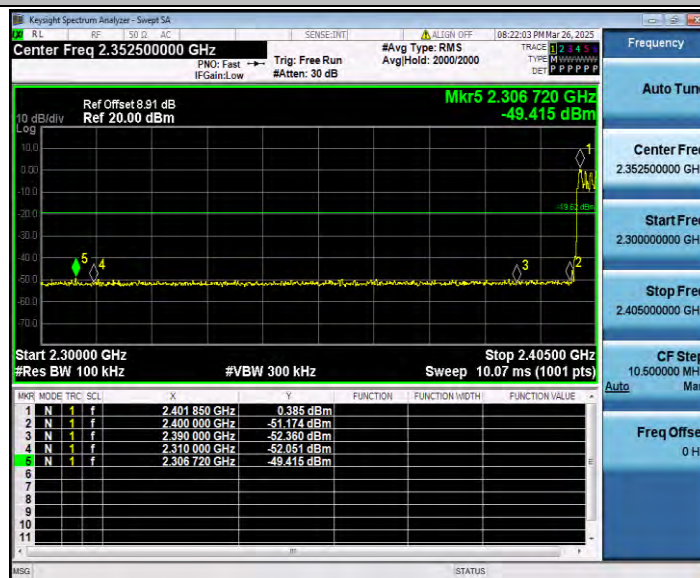
DH1_Ant1_Low_Hop_2402



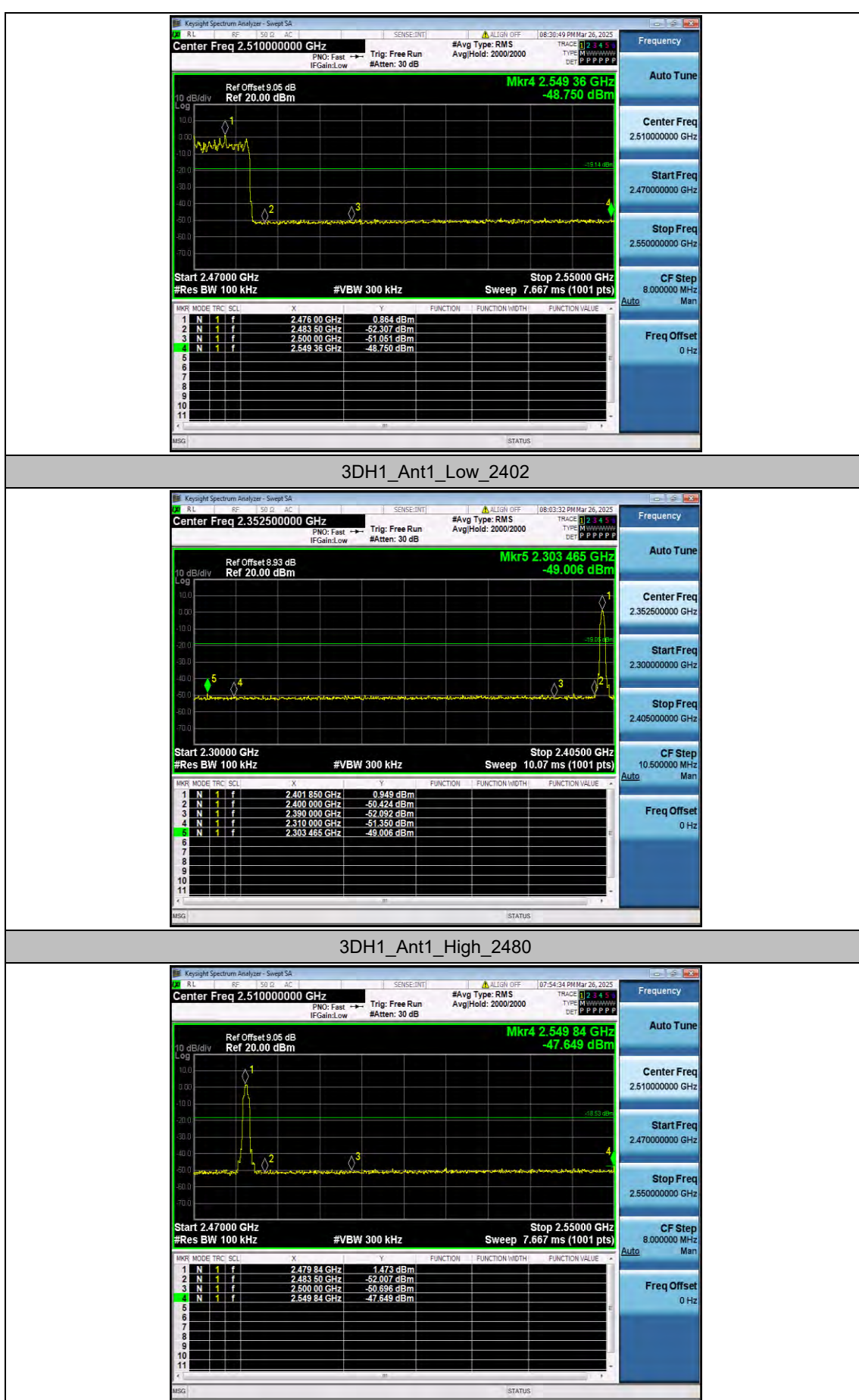
2DH1_Ant1_High_2480



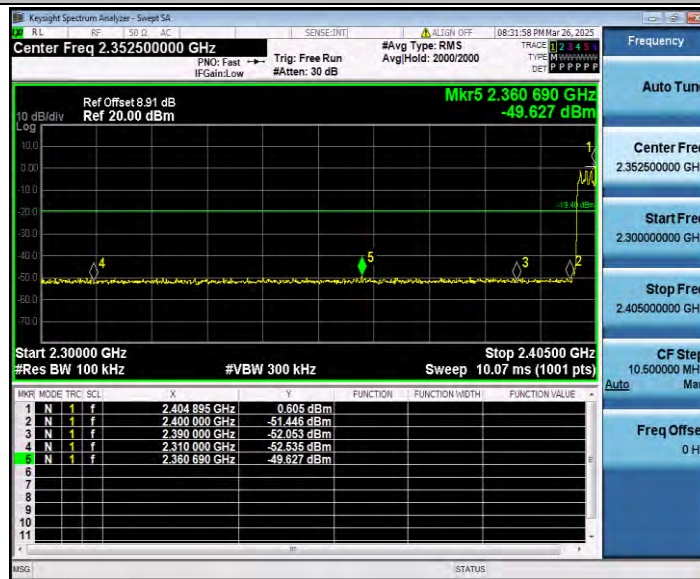
2DH1_Ant1_Low_Hop_2402



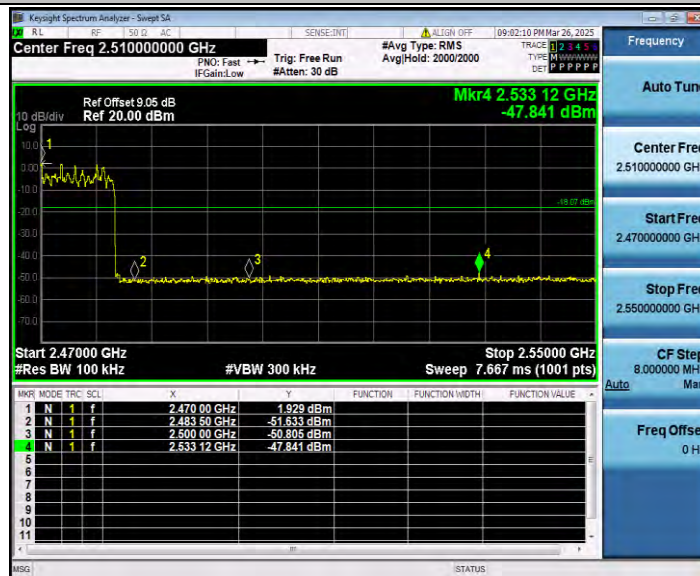
2DH1_Ant1_High_Hop_2480



3DH1_Ant1_Low_Hop_2402



3DH1_Ant1_High_Hop_2480

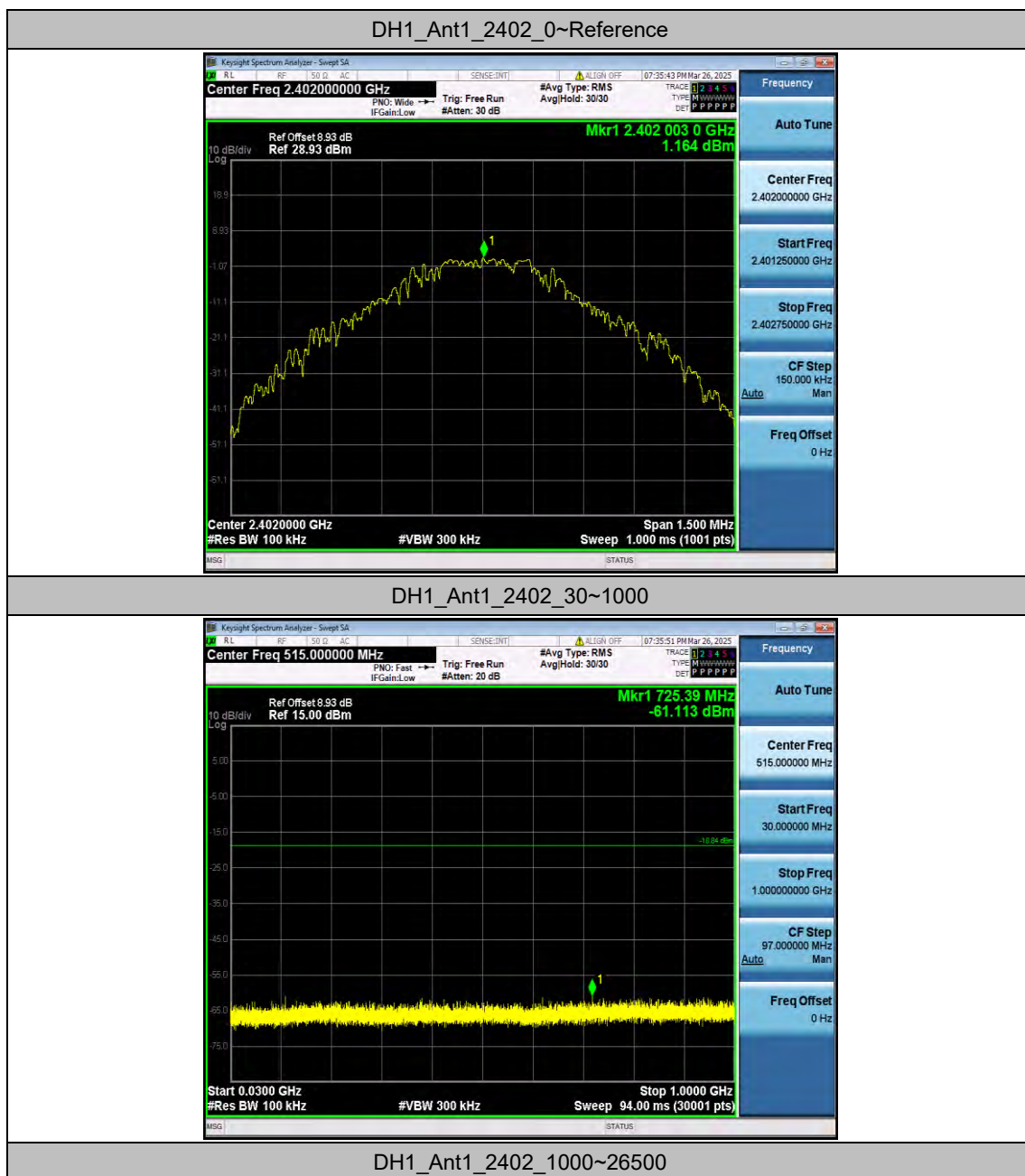


Appendix A.8: Conducted Spurious Emission

Test Result

TestMode	Antenna	Freq(MHz)	FreqRange [MHz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH1	Ant1	2402	Reference	1.16	1.16	---	PASS
			30~1000	1.16	-61.11	≤-18.84	PASS
			1000~26500	1.16	-47.84	≤-18.84	PASS
		2441	Reference	3.23	3.23	---	PASS
			30~1000	3.23	-59.87	≤-16.77	PASS
			1000~26500	3.23	-47.03	≤-16.77	PASS
		2480	Reference	1.88	1.88	---	PASS
			30~1000	1.88	-60.01	≤-18.12	PASS
			1000~26500	1.88	-47.61	≤-18.12	PASS
2DH1	Ant1	2402	Reference	0.53	0.53	---	PASS
			30~1000	0.53	-60.82	≤-19.47	PASS
			1000~26500	0.53	-47.95	≤-19.47	PASS
		2441	Reference	2.15	2.15	---	PASS
			30~1000	2.15	-60.86	≤-17.85	PASS
			1000~26500	2.15	-47.21	≤-17.85	PASS
		2480	Reference	1.21	1.21	---	PASS
			30~1000	1.21	-60.34	≤-18.79	PASS
			1000~26500	1.21	-47.74	≤-18.79	PASS
3DH1	Ant1	2402	Reference	0.84	0.84	---	PASS
			30~1000	0.84	-60.42	≤-19.16	PASS
			1000~26500	0.84	-47.78	≤-19.16	PASS
		2441	Reference	2.59	2.59	---	PASS
			30~1000	2.59	-60.6	≤-17.41	PASS
			1000~26500	2.59	-47.78	≤-17.41	PASS
		2480	Reference	1.19	1.19	---	PASS
			30~1000	1.19	-60.56	≤-18.81	PASS
			1000~26500	1.19	-47.73	≤-18.81	PASS

Test Graphs

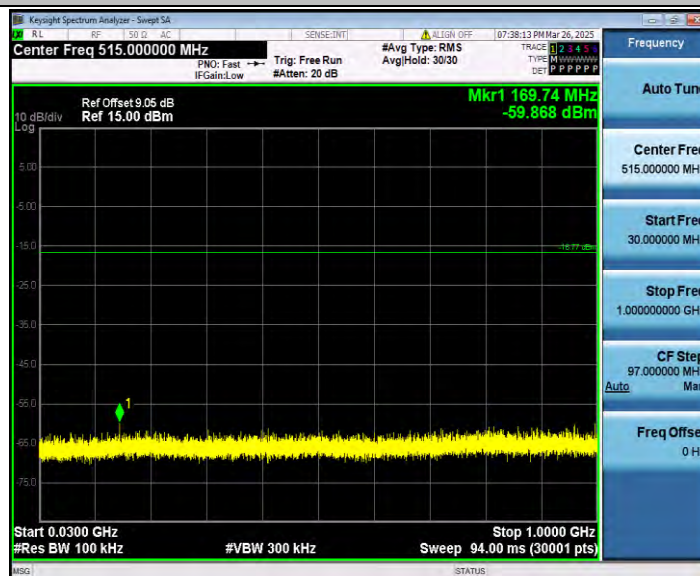




DH1_Ant1_2441_0~Reference



DH1_Ant1_2441_30~1000



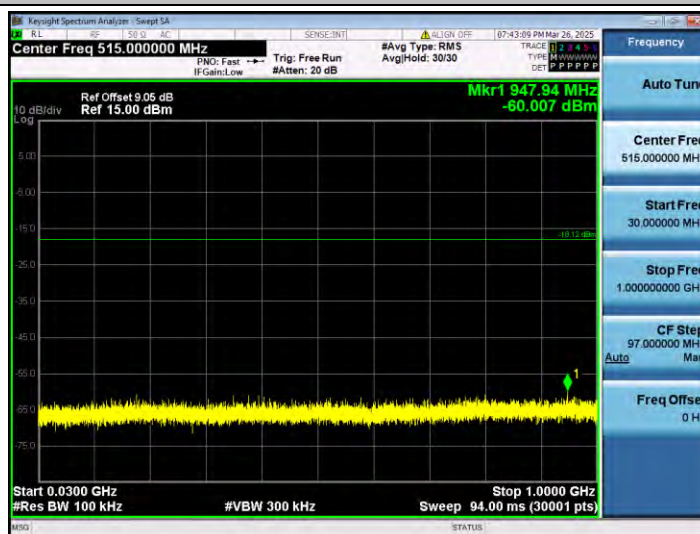
DH1_Ant1_2441_1000~26500



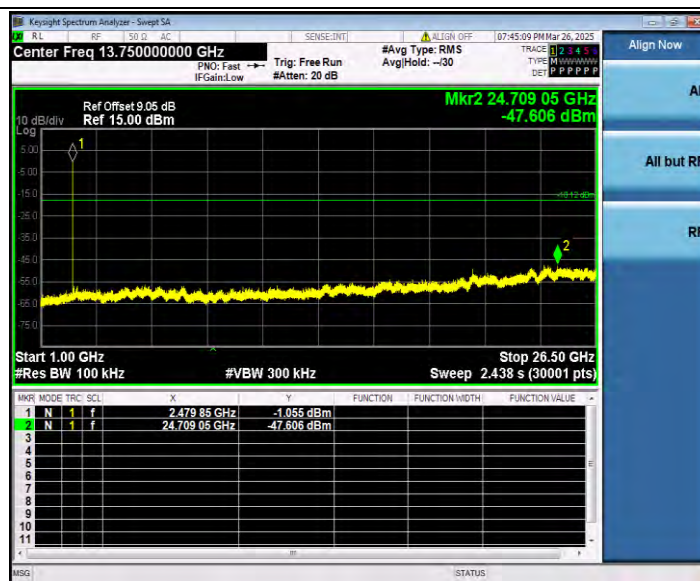
DH1_Ant1_2480_0~Reference



DH1_Ant1_2480_30~1000



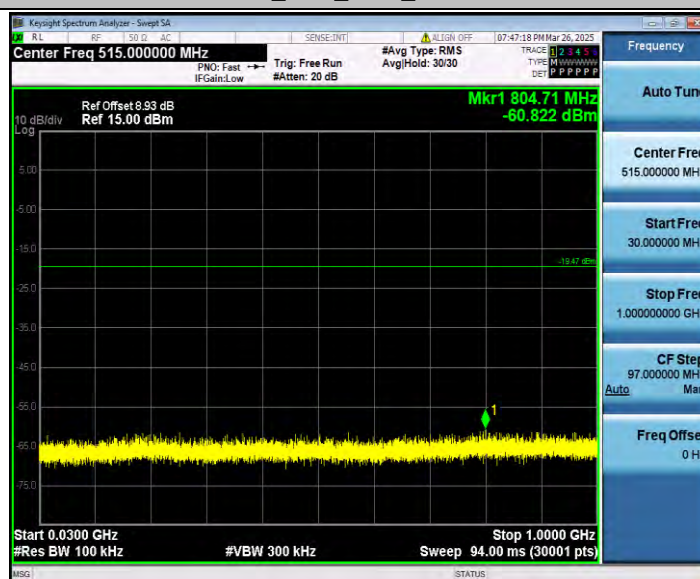
DH1_Ant1_2480_1000~26500



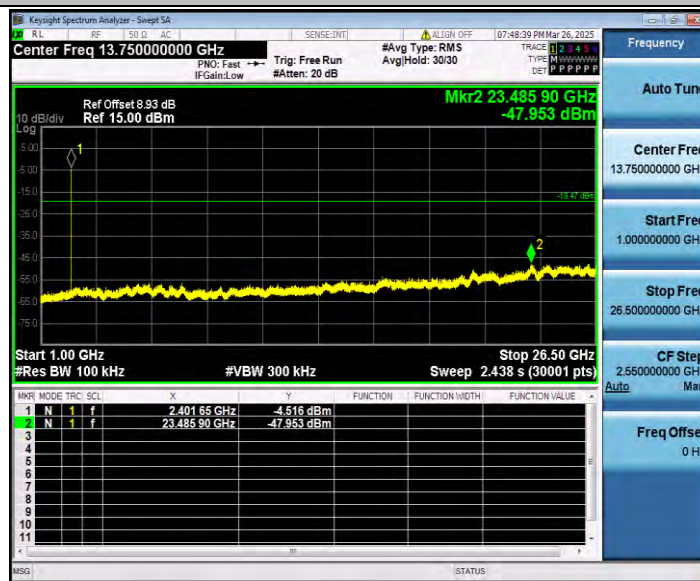
2DH1_Ant1_2402_0~Reference



2DH1_Ant1_2402_30~1000



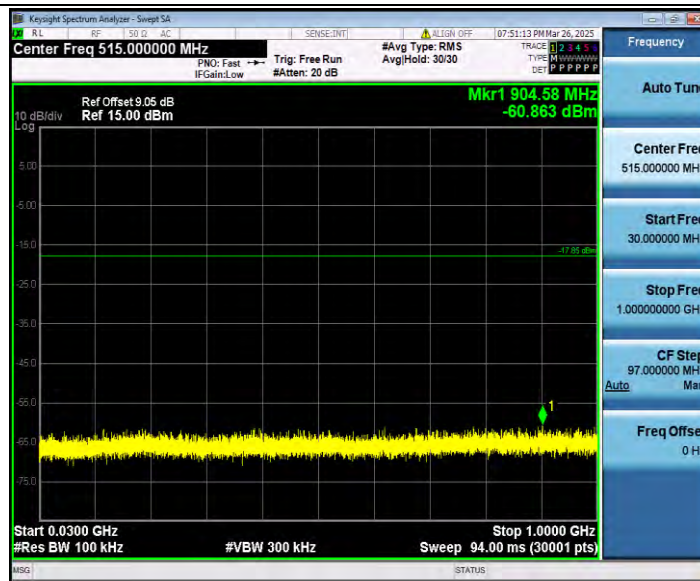
2DH1_Ant1_2402_1000~26500



2DH1_Ant1_2441_0~Reference



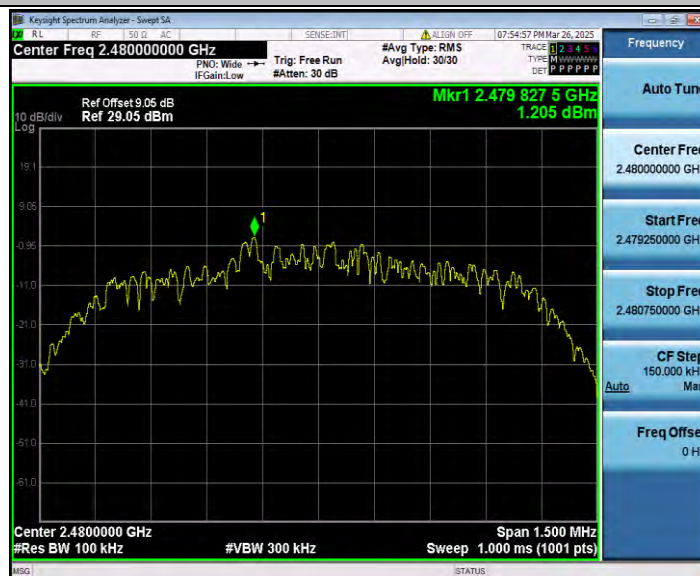
2DH1_Ant1_2441_30~1000

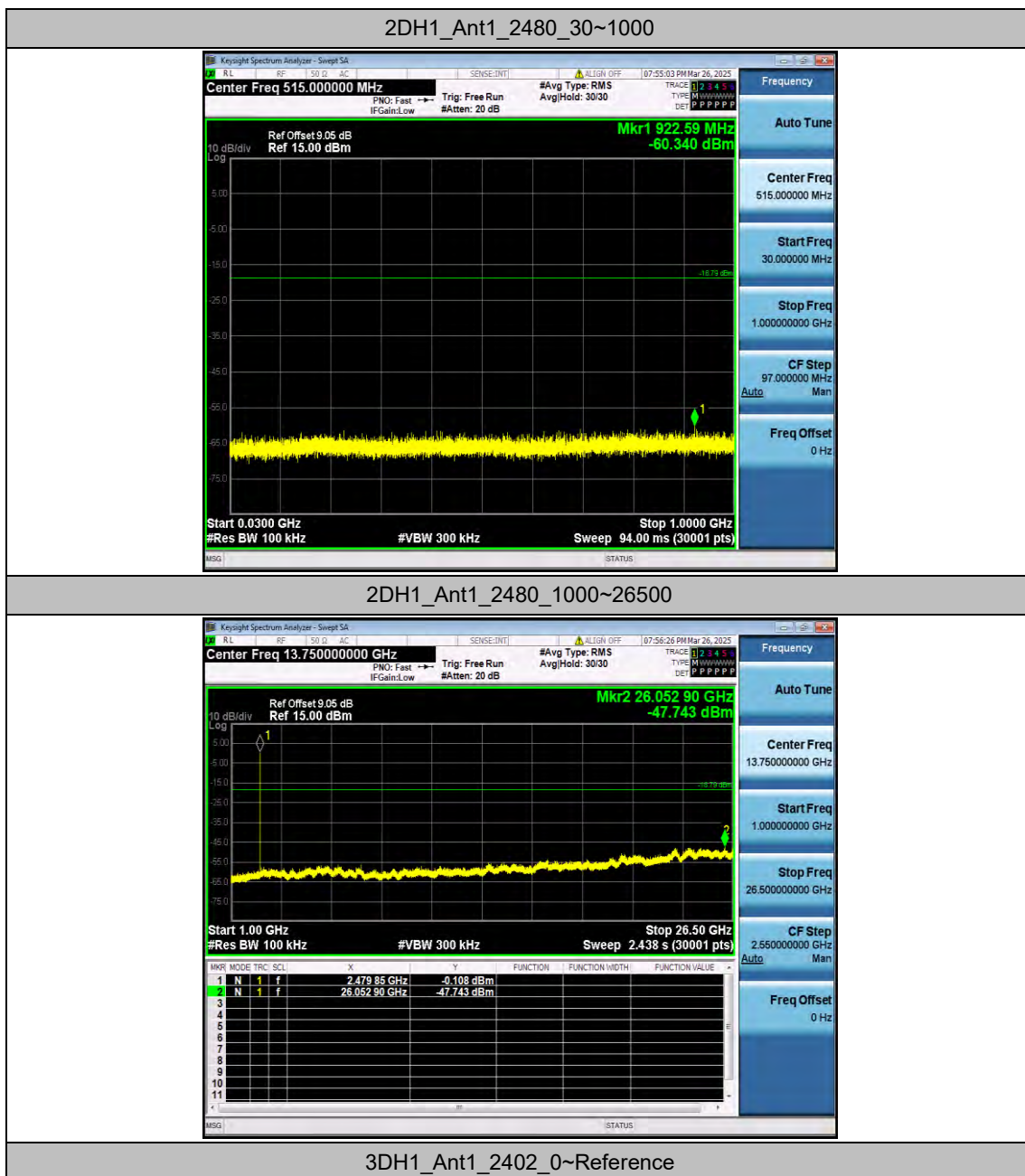


2DH1_Ant1_2441_1000~26500



2DH1_Ant1_2480_0~Reference







3DH1_Ant1_2402_30~1000



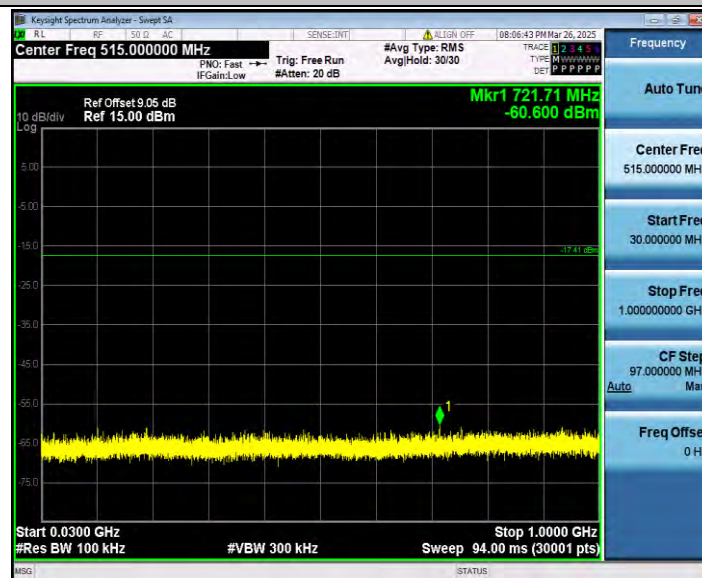
3DH1_Ant1_2402_1000~26500



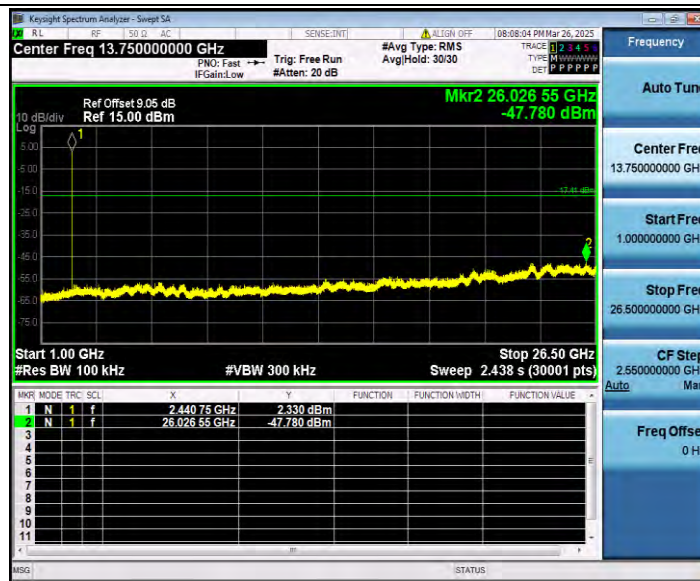
3DH1_Ant1_2441_0~Reference



3DH1_Ant1_2441_30~1000



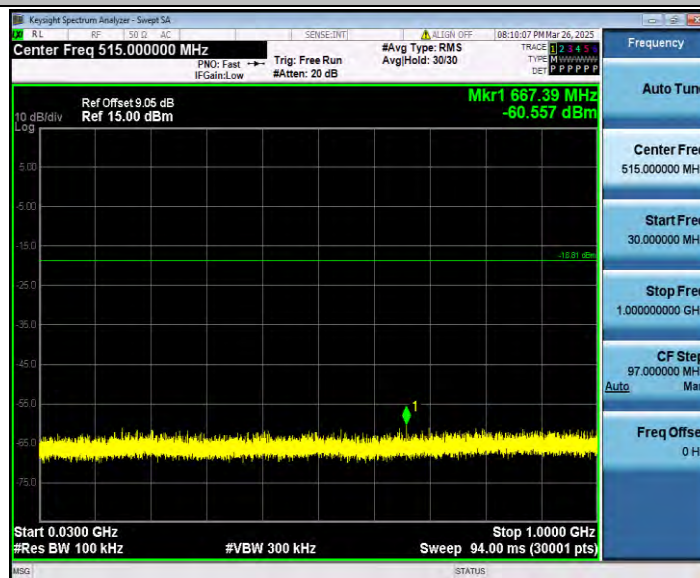
3DH1_Ant1_2441_1000~26500

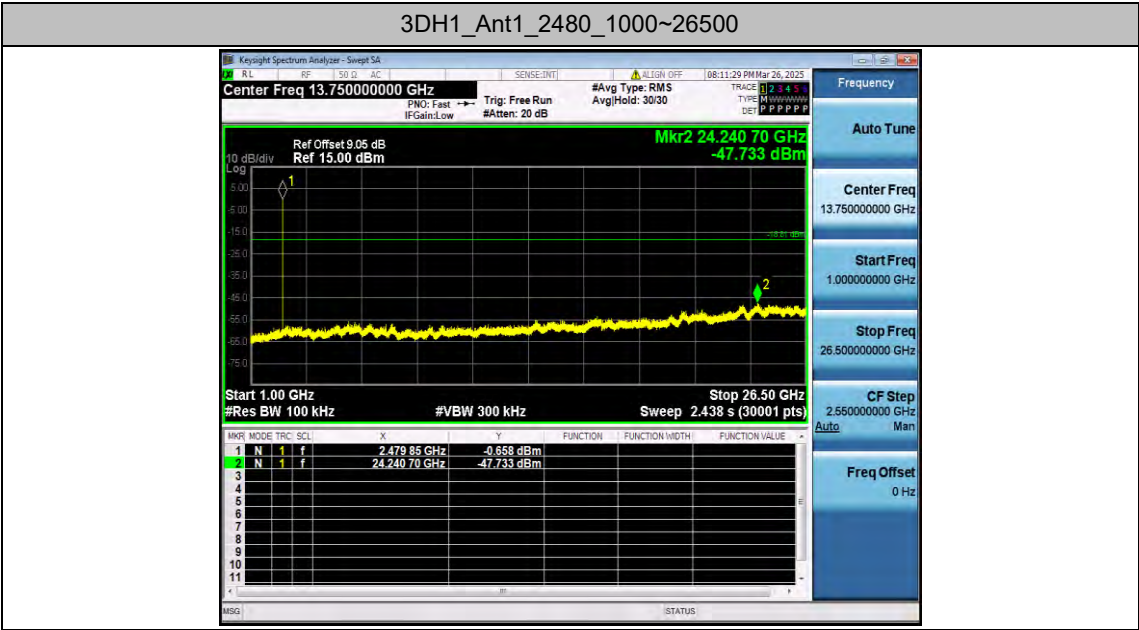


3DH1_Ant1_2480_0~Reference



3DH1_Ant1_2480_30~1000





Appendix A.10: Emissions in Restricted Bands

Test Result

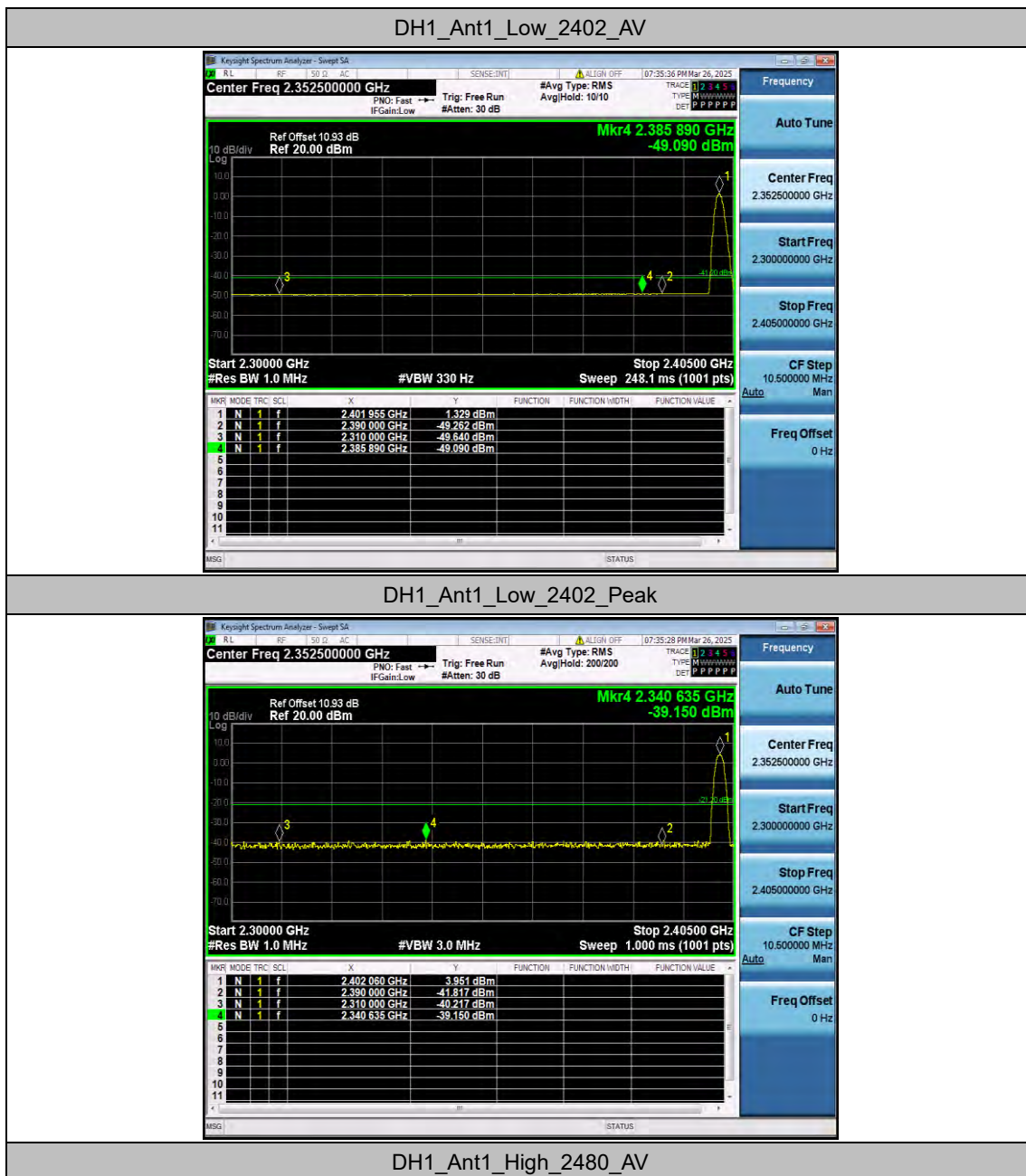
TestMode	Antenna	ChName	Freq(MHz)	Detector	Freq [MHz]	Result [dBm]	Limit [dBm]	Result [dBuV/m]	Limit [dBuV/m]	Verdict
DH1	Ant1	Low	2402	AV	2310.000	-49.64	≤-41.20	45.56	≤54	PASS
				AV	2385.890	-49.09	≤-41.20	46.11	≤54	PASS
				AV	2390.000	-49.26	≤-41.20	45.94	≤54	PASS
				Peak	2310.000	-40.22	≤-21.20	54.98	≤74	PASS
				Peak	2340.635	-39.15	≤-21.20	56.05	≤74	PASS
				Peak	2390.000	-41.82	≤-21.20	53.38	≤74	PASS
		High	2480	AV	2483.500	-48.6	≤-41.20	46.60	≤54	PASS
				AV	2498.400	-48.45	≤-41.20	46.75	≤54	PASS
				AV	2500.000	-48.59	≤-41.20	46.61	≤54	PASS
				Peak	2483.500	-41.03	≤-21.20	54.17	≤74	PASS
				Peak	2489.200	-39.11	≤-21.20	56.09	≤74	PASS
				Peak	2500.000	-41.33	≤-21.20	53.87	≤74	PASS
2DH1	Ant1	Low	2402	AV	2310.000	-49.29	≤-41.20	45.91	≤54	PASS
				AV	2387.990	-48.89	≤-41.20	46.31	≤54	PASS
				AV	2390.000	-49.11	≤-41.20	46.09	≤54	PASS
				Peak	2310.000	-40.41	≤-21.20	54.79	≤74	PASS
				Peak	2313.020	-38.58	≤-21.20	56.62	≤74	PASS
				Peak	2390.000	-41.14	≤-21.20	54.06	≤74	PASS
		High	2480	AV	2483.500	-48.69	≤-41.20	46.51	≤54	PASS
				AV	2499.920	-48.55	≤-41.20	46.65	≤54	PASS
				AV	2500.000	-48.51	≤-41.20	46.69	≤54	PASS
				Peak	2483.500	-41.56	≤-21.20	53.64	≤74	PASS
				Peak	2493.200	-38.66	≤-21.20	56.54	≤74	PASS
				Peak	2500.000	-41.05	≤-21.20	54.15	≤74	PASS
3DH1	Ant1	Low	2402	AV	2310.000	-49.35	≤-41.20	45.85	≤54	PASS
				AV	2387.570	-48.88	≤-41.20	46.32	≤54	PASS
				AV	2390.000	-49.03	≤-41.20	46.17	≤54	PASS
				Peak	2310.000	-41.83	≤-21.20	53.37	≤74	PASS
				Peak	2337.905	-38.89	≤-21.20	56.31	≤74	PASS
				Peak	2390.000	-42.4	≤-21.20	52.80	≤74	PASS
		High	2480	AV	2483.500	-48.78	≤-41.20	46.42	≤54	PASS
				AV	2496.960	-48.55	≤-41.20	46.65	≤54	PASS
				AV	2500.000	-48.58	≤-41.20	46.62	≤54	PASS
				Peak	2483.500	-41.16	≤-21.20	54.04	≤74	PASS
				Peak	2498.160	-38.91	≤-21.20	56.29	≤74	PASS

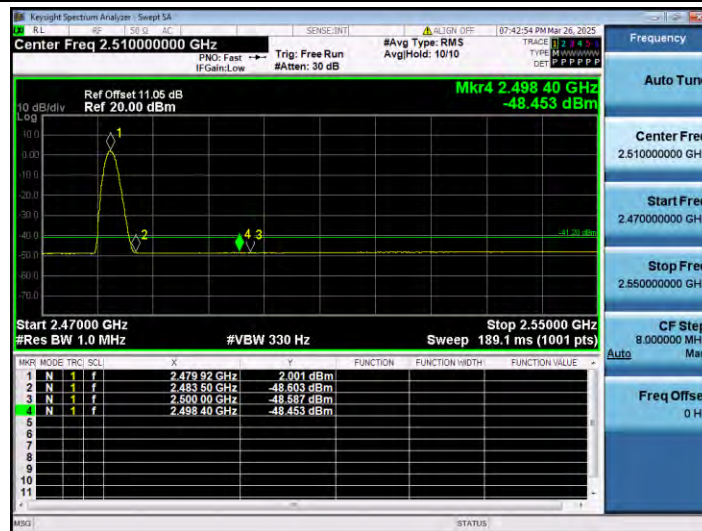
				Peak	2500.000	-40.24	≤-21.20	54.96	≤74	PASS
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Note:

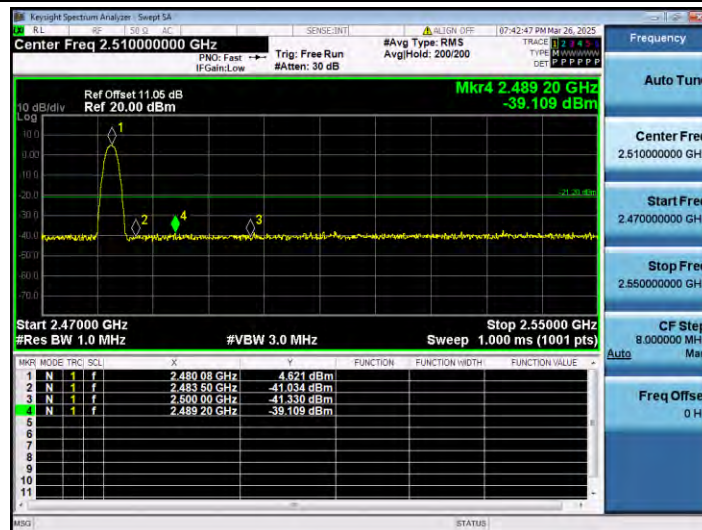
1. The Antenna Gain is compensated in the graph.
2. The Duty Cycle Factor and RBW Factor is compensated in the graph.
3. The limit in dBm for average detector is conversion from 54dBuV/m, according to 15.209(a). The limit in dBm for peak detector is 20dB above the limit of average detector in dBm.

Test Graphs

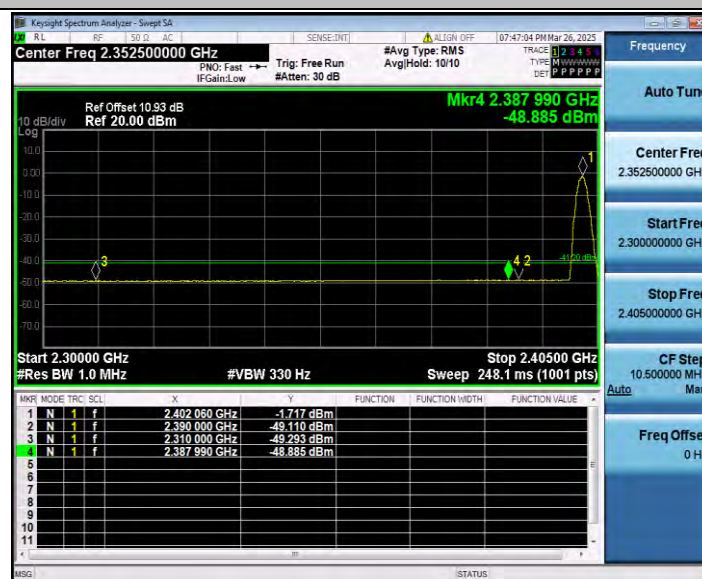




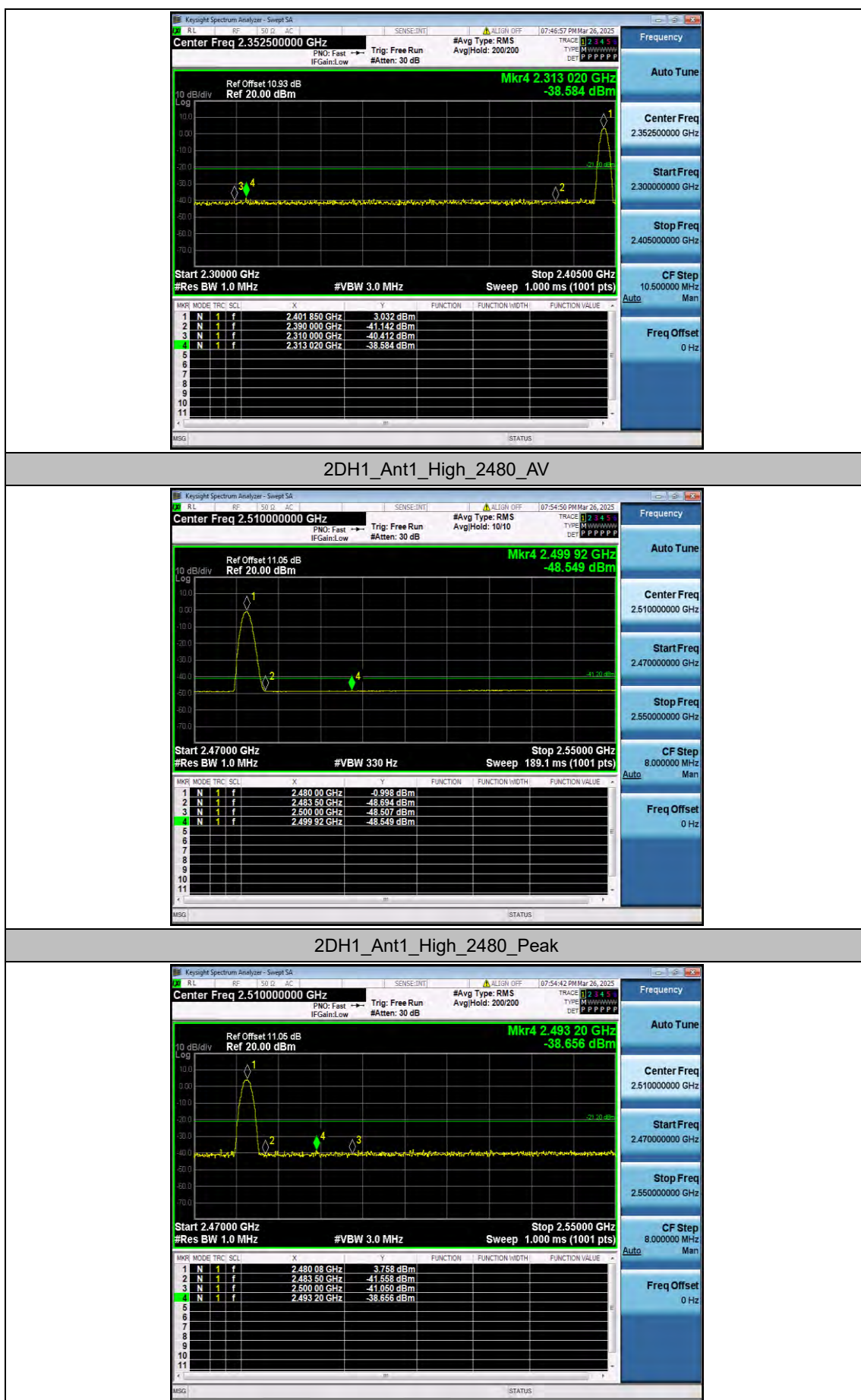
DH1_Ant1_High_2480_Peak



2DH1_Ant1_Low_2402_AV



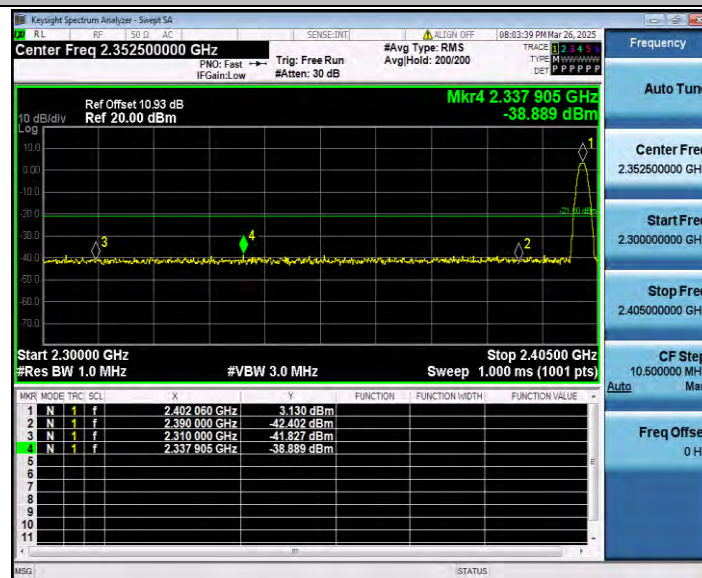
2DH1_Ant1_Low_2402_Peak



3DH1_Ant1_Low_2402_AV



3DH1_Ant1_Low_2402_Peak



3DH1_Ant1_High_2480_AV

