

FCC Appendix RF Test Data for BT

FCC ID : 2AUCA-808-4X

Company : 8 Limited

EUT : 8 inch Touchscreen Controller

Model Number : 808-4x

Report No. : CTA25090501002

Reviewed By : Eric Wang

Appendix A: 20dB Emission Bandwidth

Test Result

TestMode	Antenna	Freq(MHz)	20dB EBW[MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH5	Ant1	2402	0.939	2401.544	2402.483	---	---
		2441	0.954	2440.529	2441.483	---	---
		2480	0.960	2479.523	2480.483	---	---
2DH5	Ant1	2402	1.449	2401.262	2402.711	---	---
		2441	1.473	2440.274	2441.747	---	---
		2480	1.452	2479.262	2480.714	---	---
3DH5	Ant1	2402	1.479	2401.265	2402.744	---	---
		2441	1.488	2440.268	2441.756	---	---
		2480	1.563	2479.208	2480.771	---	---

Agilent Spectrum Analyzer - Swept SA

Center Freq 2.40200000 GHz

Ref Offset 0.3 dB
Ref 10.30 dBm

Trig: Free Run
#Atten: 20 dB

#Avg Type: RMS
Avg/Hold: 100/100

Span 3.000 MHz
#Res BW 30 kHz
#VBW 100 kHz
Sweep (#Swp) 3.200 ms (1001 pts)

ΔMkr3 939 kHz
-0.238 dB

10 dB/div
Log

Center Freq 2.40200000 GHz
Start Freq 2.400500000 GHz
Stop Freq 2.403500000 GHz
CF Step 300.000 kHz
Freq Offset 0 Hz

MNR	MODE	TRC	SCL	X	Y	FUNCTION	FUNCTION WIDTH	FUNCTION VALUE
1	N	1	f	2.401544 GHz	-26.696 dBm			
2	N	1	f	2.401952 GHz	-7.066 dBm			
3	Δ	1	f (Δ)	939 kHz (Δ)	-0.238 dB			

MSO

DH5_Ant1_2402

Agilent Spectrum Analyzer - Swept SA

Center Freq 2.441000000 GHz

Ref Offset 0.3 dB
Ref 10.30 dBm

Trig: Free Run
#Atten: 20 dB

#Avg Type: RMS
Avg/Hold: 100/100

Span 3.000 MHz
#Res BW 30 kHz
#VBW 100 kHz
Sweep (#Swp) 3.200 ms (1001 pts)

ΔMkr3 954 kHz
0.310 dB

10 dB/div
Log

Center Freq 2.441000000 GHz
Start Freq 2.439500000 GHz
Stop Freq 2.442500000 GHz
CF Step 300.000 kHz
Freq Offset 0 Hz

MNR	MODE	TRC	SCL	X	Y	FUNCTION	FUNCTION WIDTH	FUNCTION VALUE
1	N	1	f	2.440529 GHz	-26.382 dBm			
2	N	1	f	2.440958 GHz	-5.657 dBm			
3	Δ	1	f (Δ)	954 kHz (Δ)	0.310 dB			

MSO

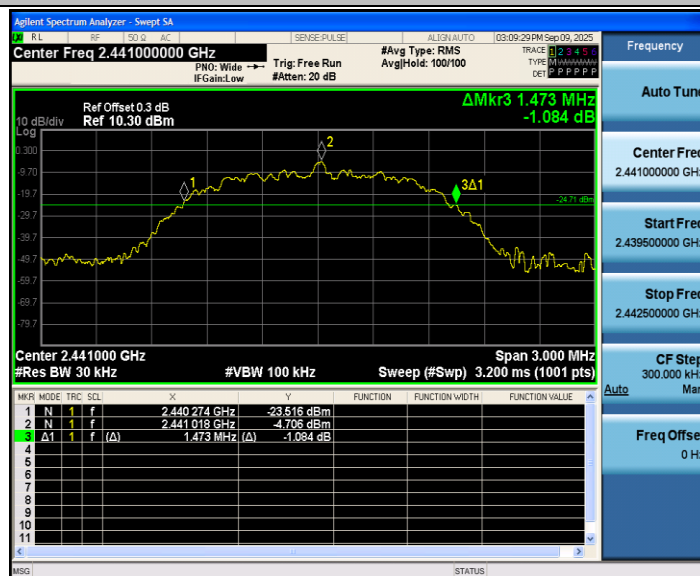
DH5_Ant1_2441



2DH5_Ant1_2402



2DH5_Ant1_2441



2DH5_Ant1_2480



3DH5_Ant1_2402



3DH5_Ant1_2441



3DH5_Ant1_2480

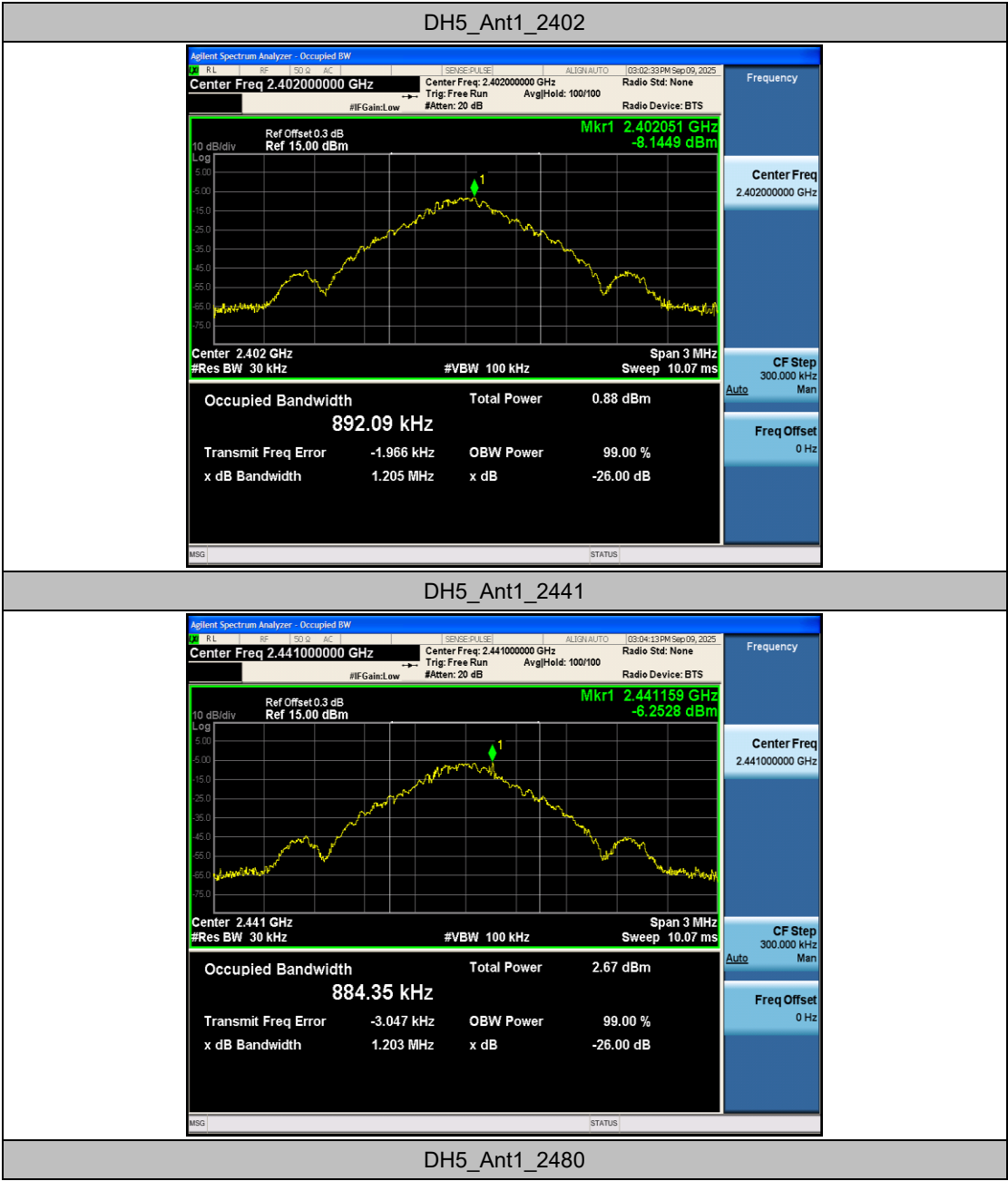


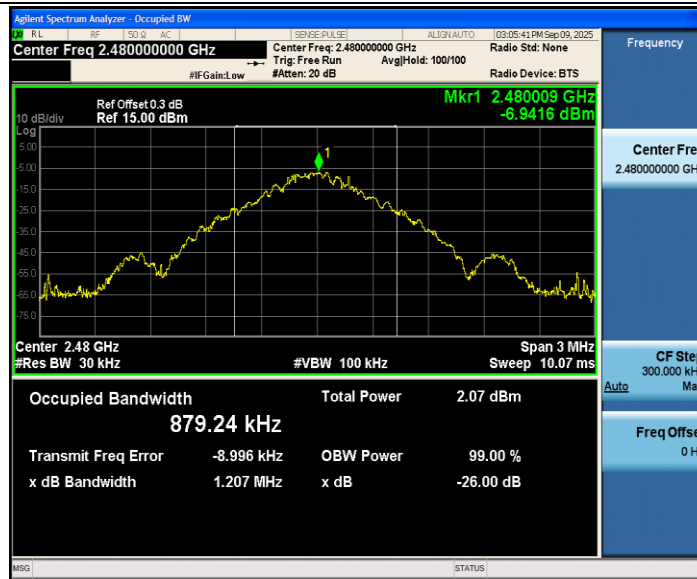
Appendix B: Occupied Channel Bandwidth

Test Result

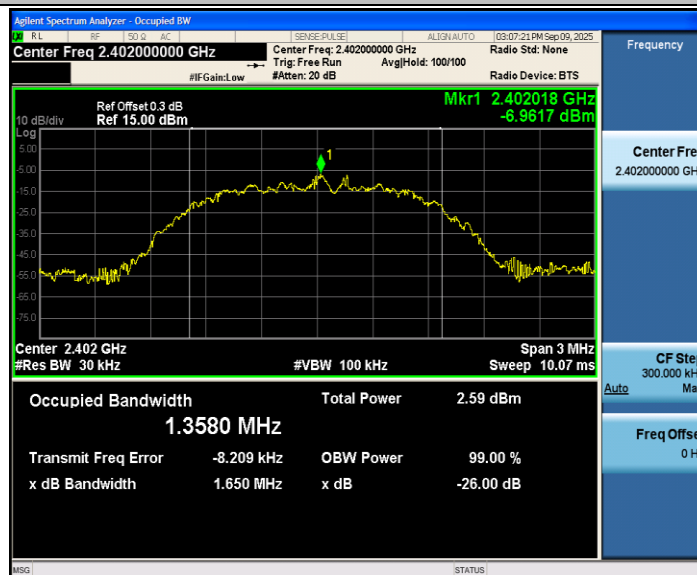
TestMode	Antenna	Freq(MHz)	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH5	Ant1	2402	0.89209	2401.5520	2402.4441	---	---
		2441	0.88435	2440.5548	2441.4391	---	---
		2480	0.87924	2479.5514	2480.4306	---	---
2DH5	Ant1	2402	1.3580	2401.3128	2402.6708	---	---
		2441	1.3629	2440.3118	2441.6747	---	---
		2480	1.3602	2479.3107	2480.6709	---	---
3DH5	Ant1	2402	1.3619	2401.3123	2402.6742	---	---
		2441	1.3624	2440.3138	2441.6762	---	---
		2480	1.3628	2479.3111	2480.6739	---	---

Test Graphs

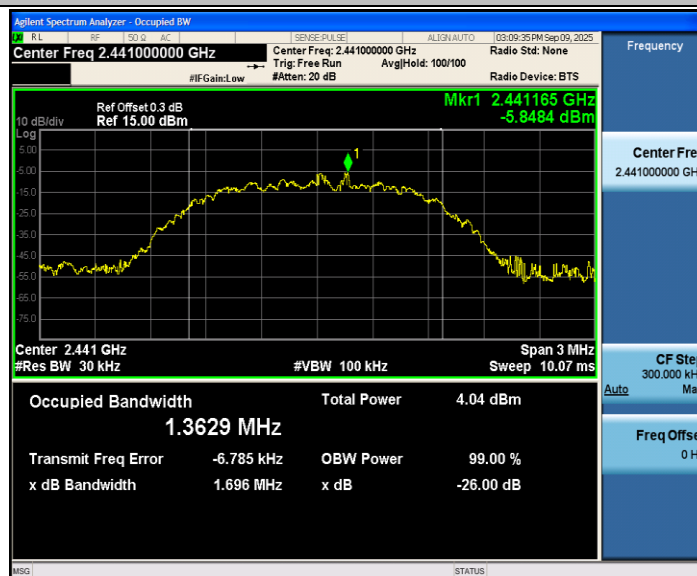




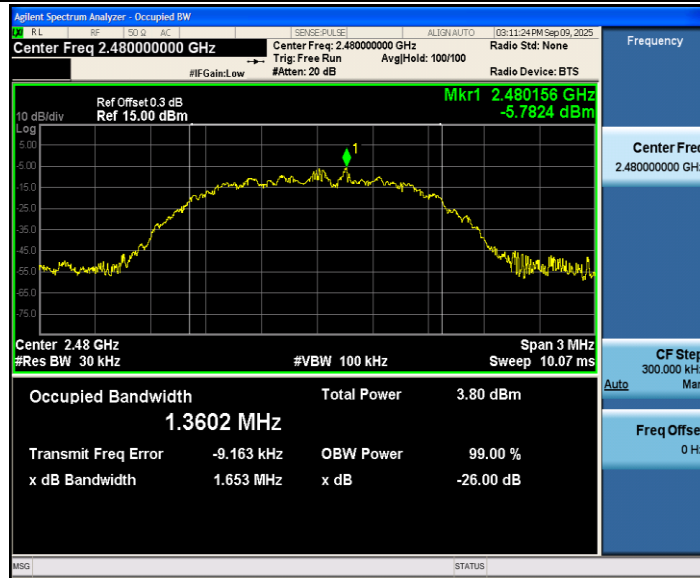
2DH5_Ant1_2402



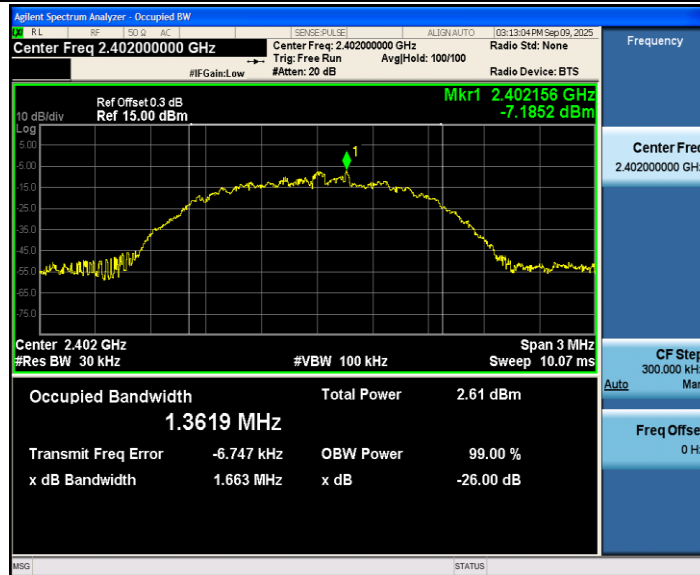
2DH5_Ant1_2441



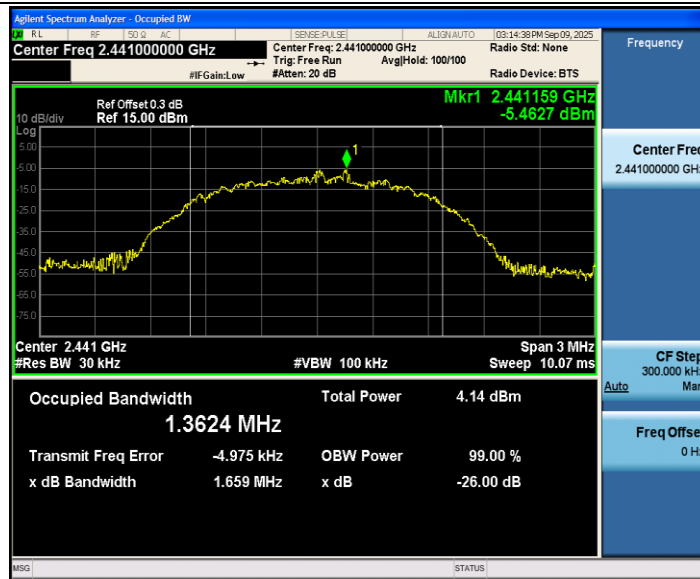
2DH5_Ant1_2480



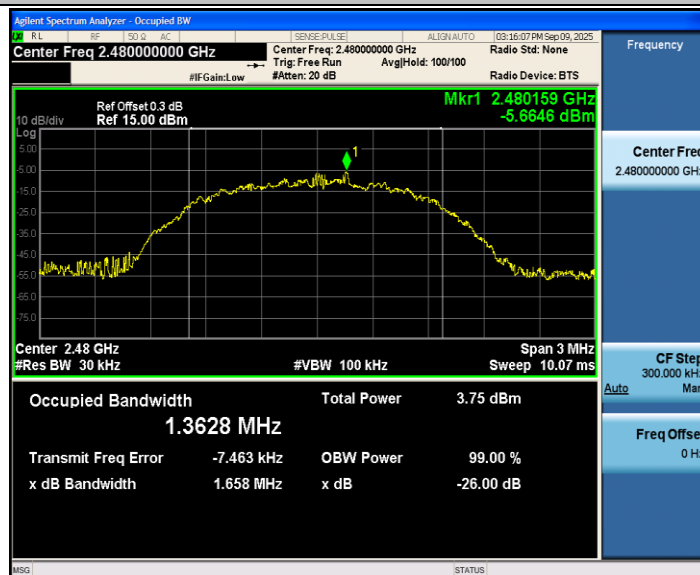
3DH5_Ant1_2402



3DH5_Ant1_2441



3DH5_Ant1_2480



Appendix C: Maximum conducted output power

Test Result Peak

Test Mode	Antenna	Freq(MHz)	Conducted Peak Power[dBm]	Conducted Limit[dBm]	Verdict
DH5	Ant1	2402	-5.06	≤20.97	PASS
		2441	-3.47	≤20.97	PASS
		2480	-3.87	≤20.97	PASS
2DH5	Ant1	2402	-1.57	≤20.97	PASS
		2441	-0.08	≤20.97	PASS
		2480	-0.40	≤20.97	PASS
3DH5	Ant1	2402	-1.43	≤20.97	PASS
		2441	0.08	≤20.97	PASS
		2480	-0.21	≤20.97	PASS

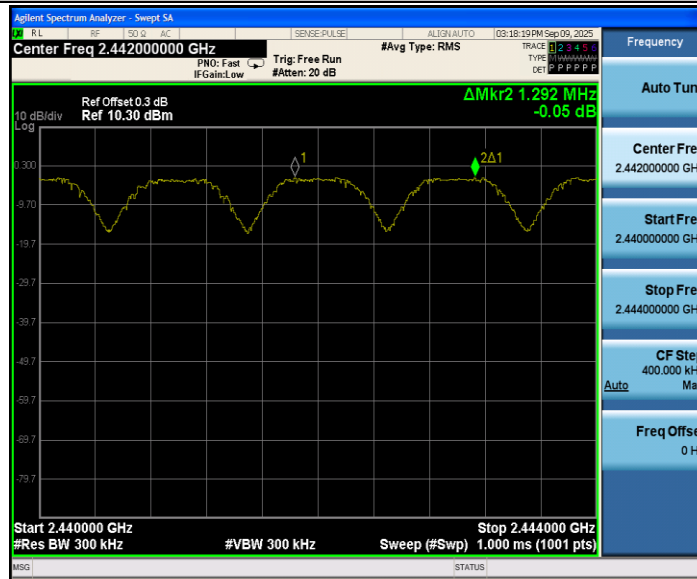
Appendix D: Carrier frequency separation

Test Result

TestMode	Antenna	Freq(MHz)	Result[MHz]	Limit[MHz]	Verdict
DH5	Ant1	Hop	1.292	≥ 0.960	PASS
2DH5	Ant1	Hop	1.048	≥ 0.982	PASS
3DH5	Ant1	Hop	1.128	≥ 1.042	PASS

Test Graphs

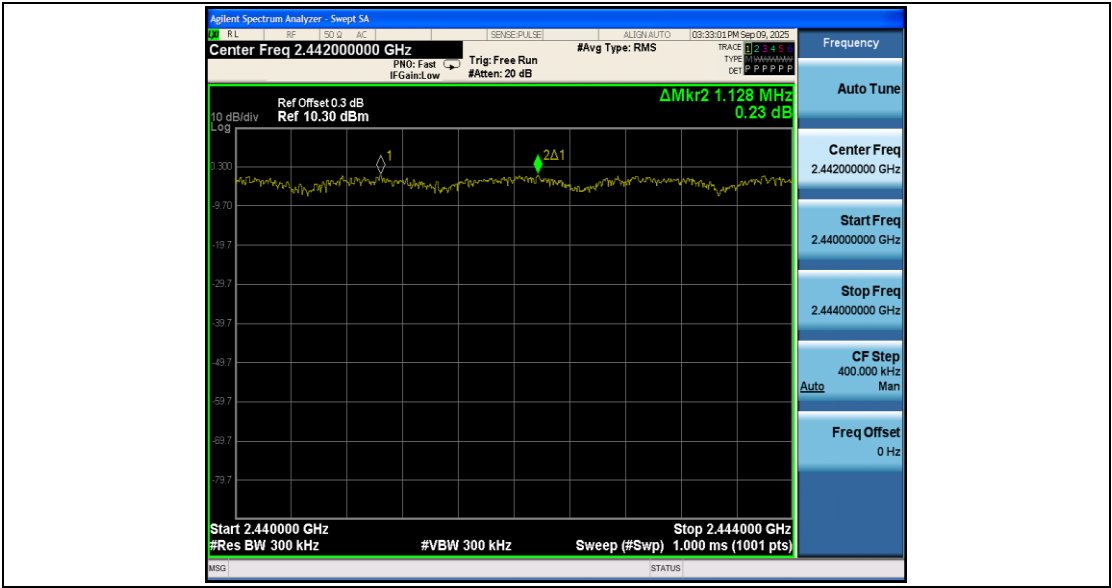
DH5_Ant1_Hop



2DH5_Ant1_Hop



3DH5_Ant1_Hop

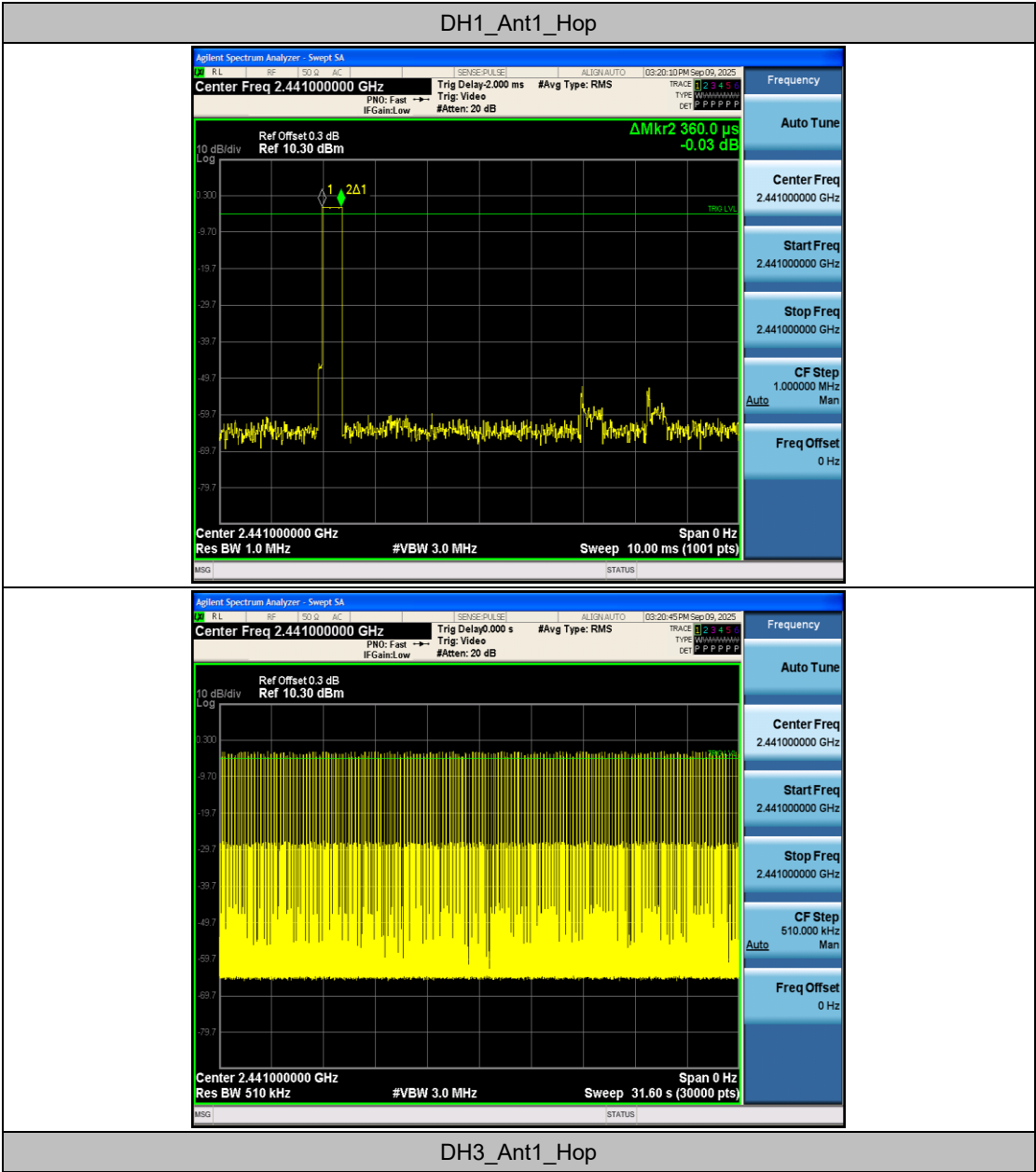


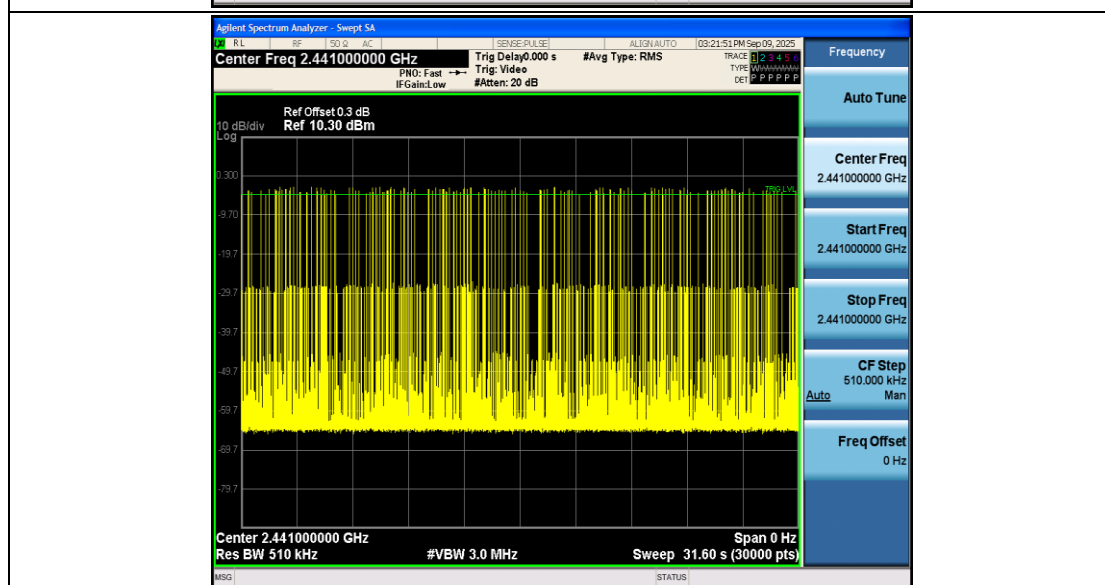
Appendix E: Time of occupancy

Test Result

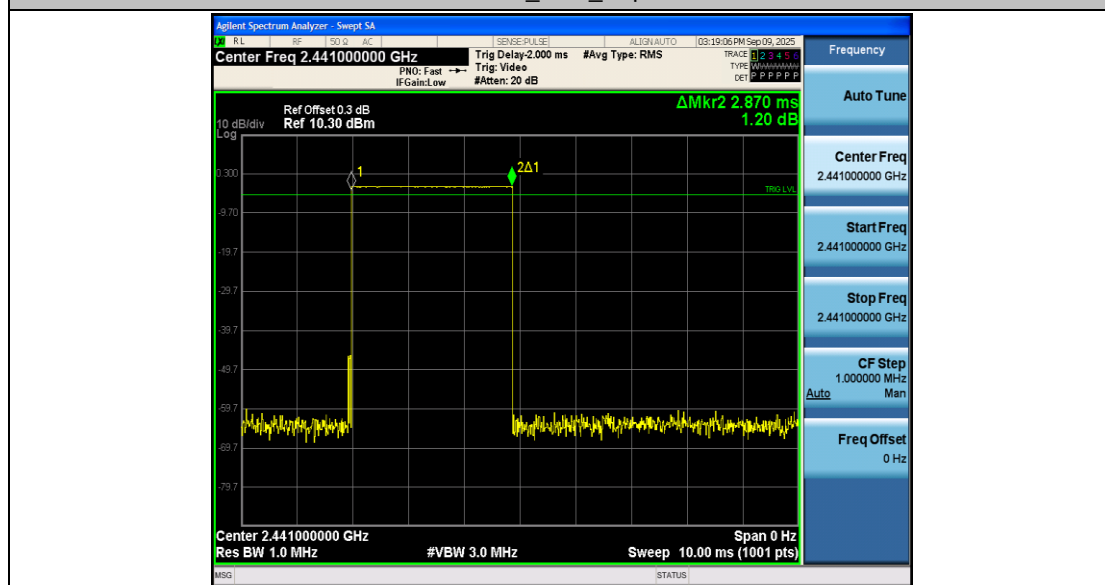
TestMode	Antenna	Freq(MHz)	BurstWidth [ms]	TotalHops [Num]	Result[s]	Limit[s]	Verdict
DH1	Ant1	Hop	0.360	319	0.115	≤0.4	PASS
DH3	Ant1	Hop	1.610	160	0.258	≤0.4	PASS
DH5	Ant1	Hop	2.870	105	0.301	≤0.4	PASS
2DH1	Ant1	Hop	0.370	320	0.118	≤0.4	PASS
2DH3	Ant1	Hop	1.630	161	0.262	≤0.4	PASS
2DH5	Ant1	Hop	2.870	115	0.33	≤0.4	PASS
3DH1	Ant1	Hop	0.370	319	0.118	≤0.4	PASS
3DH3	Ant1	Hop	1.620	159	0.258	≤0.4	PASS
3DH5	Ant1	Hop	2.870	97	0.278	≤0.4	PASS

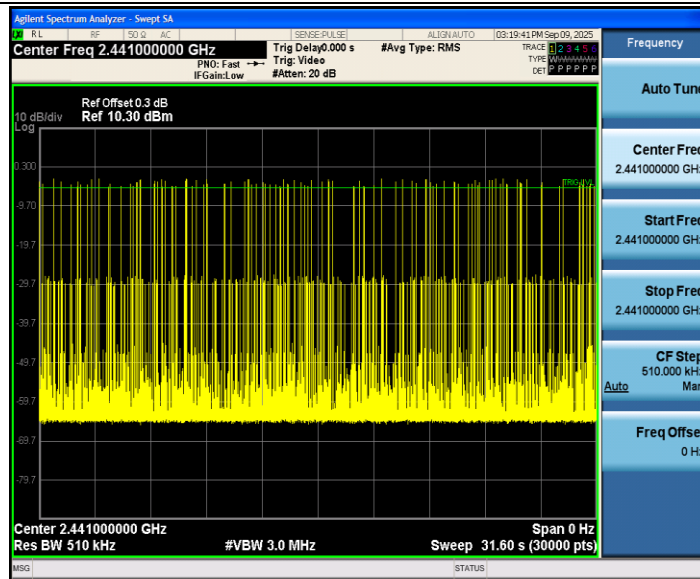
Test Graphs



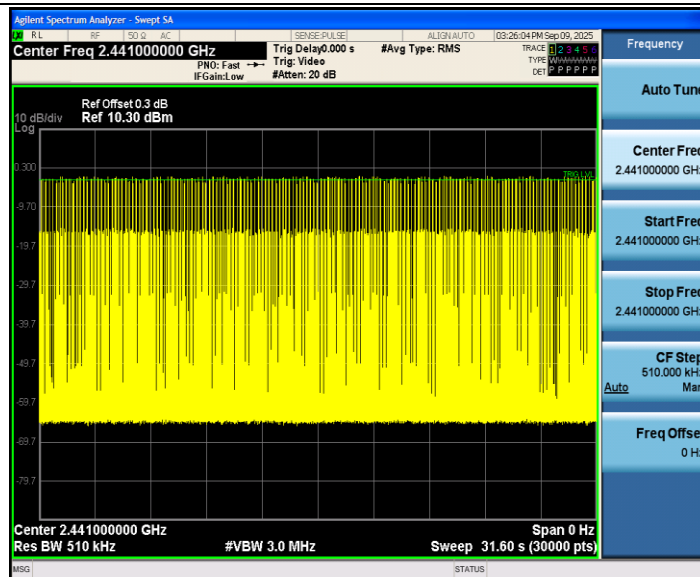
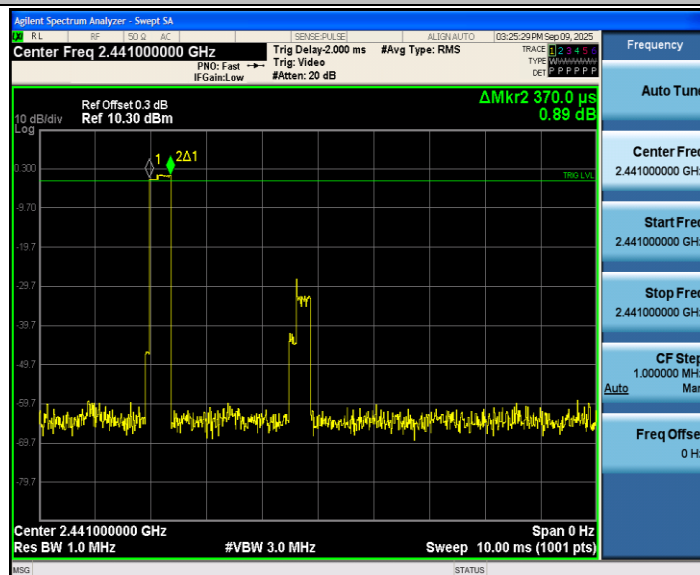


DH5_Ant1_Hop

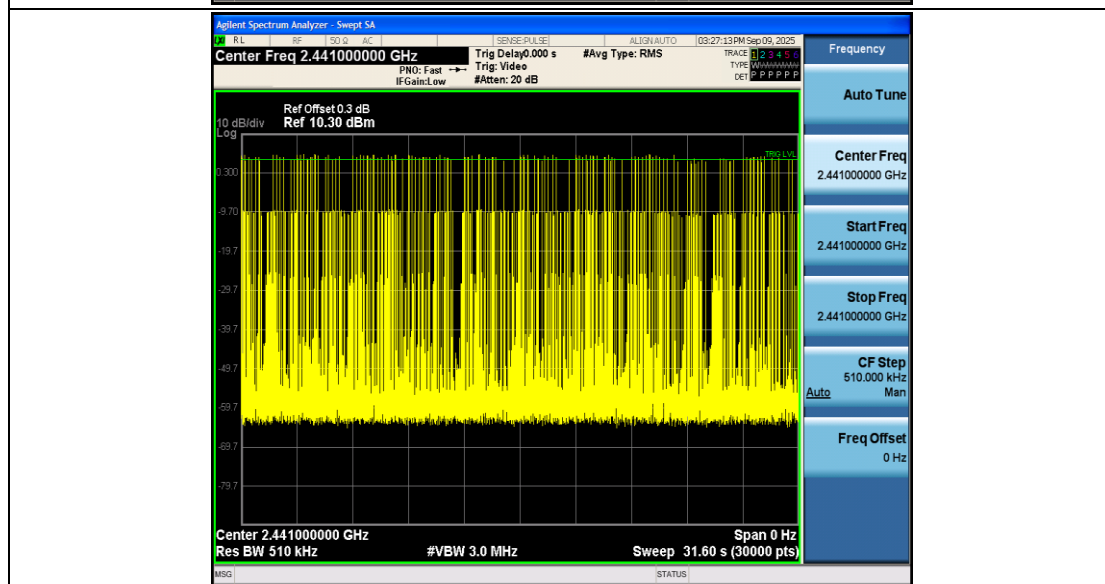
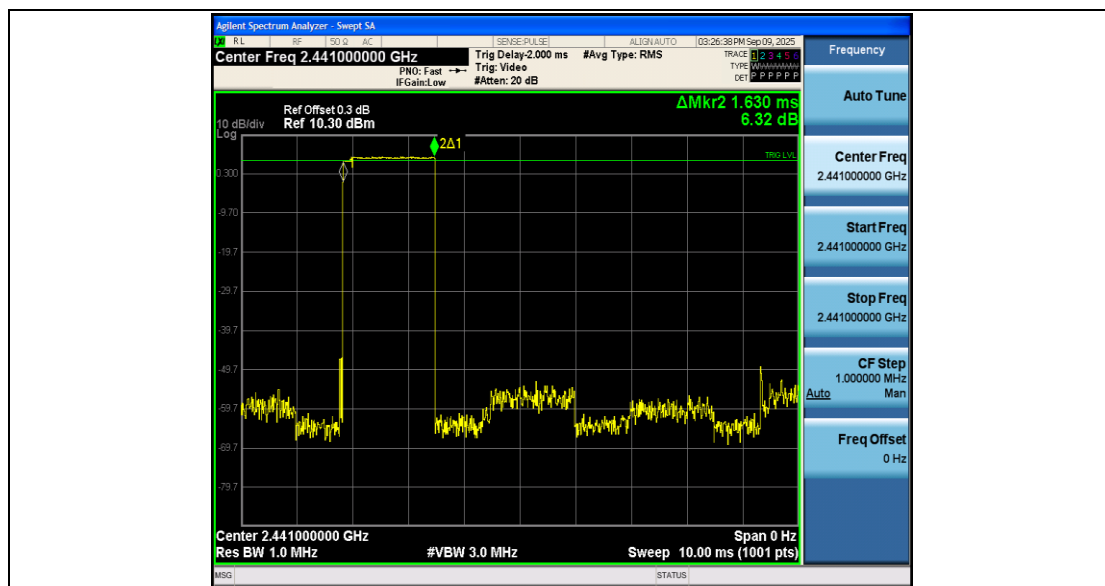




2DH1_Ant1_Hop

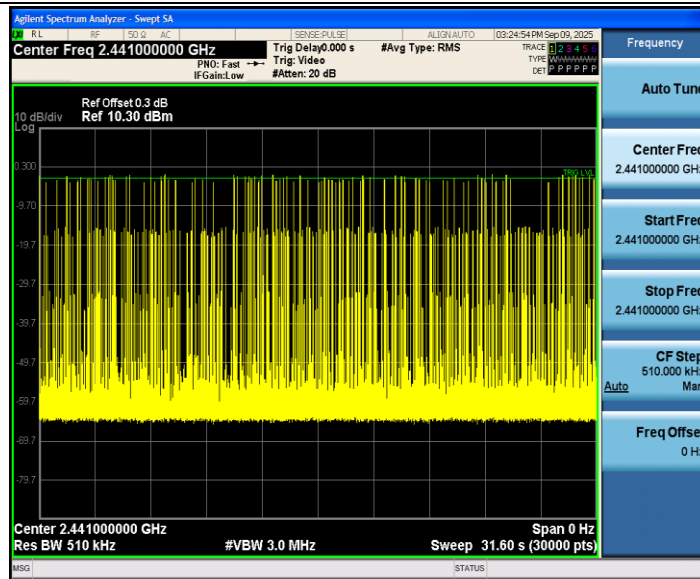


2DH3_Ant1_Hop

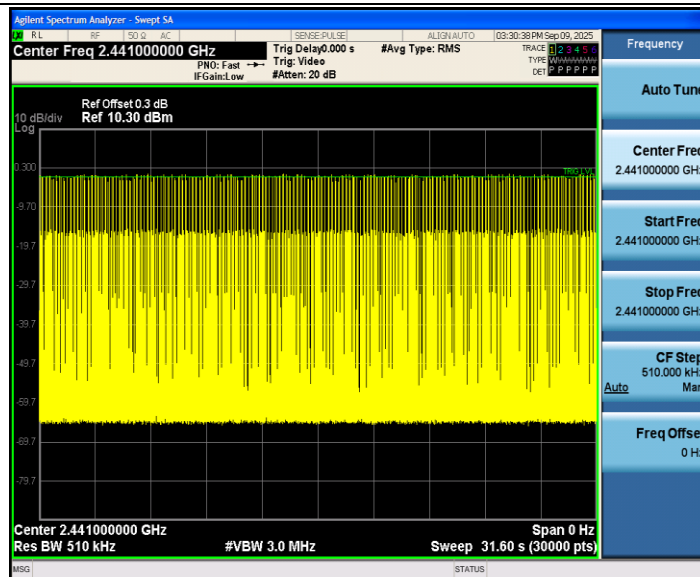
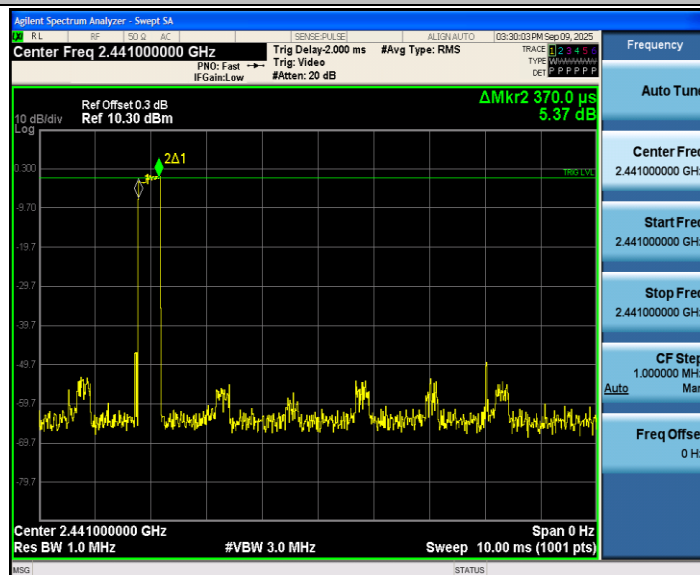


2DH5_Ant1_Hop

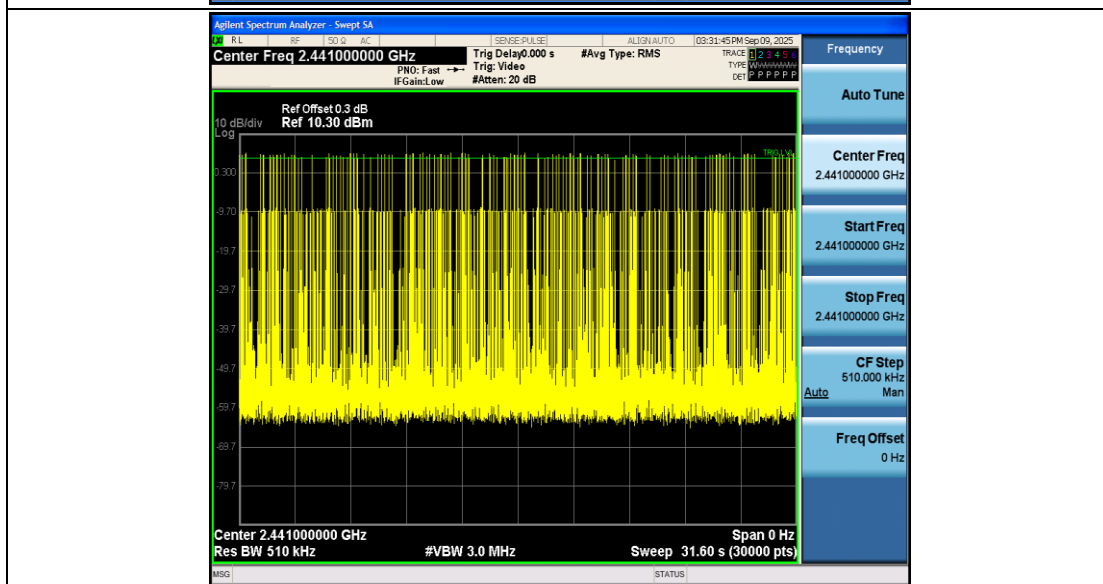




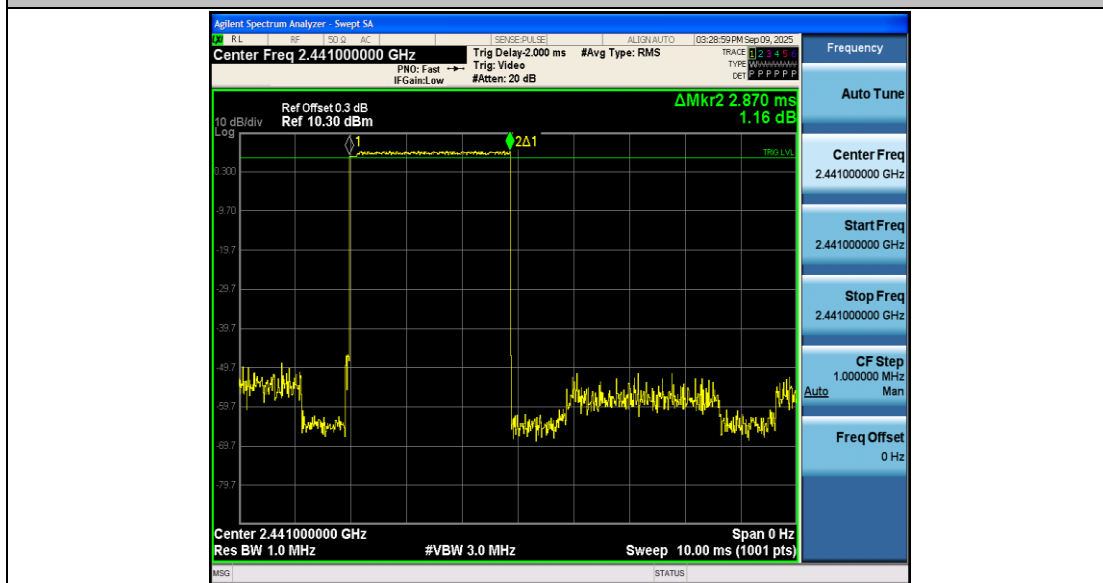
3DH1_Ant1_Hop

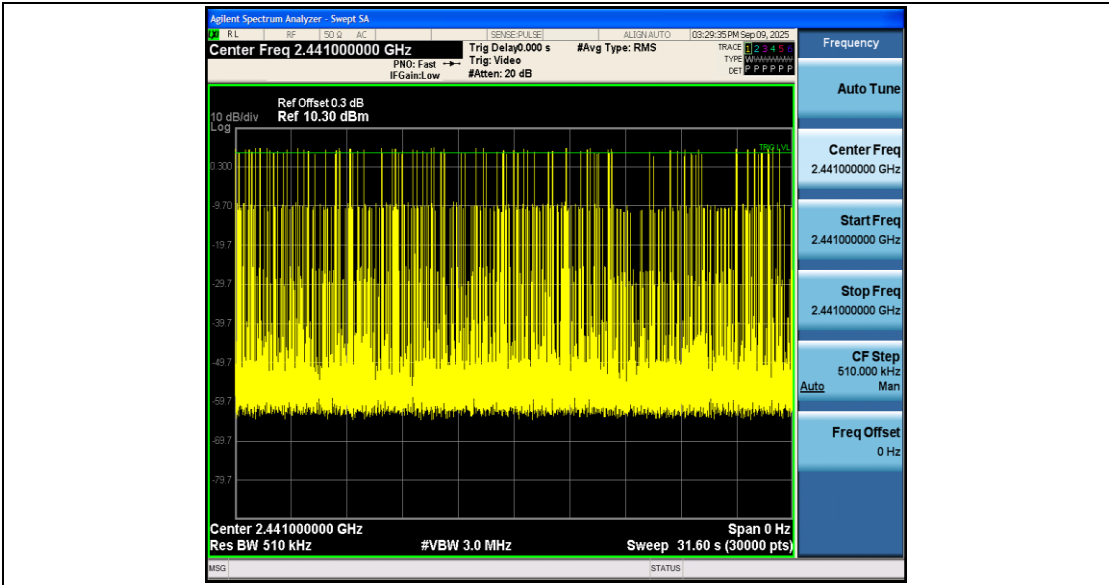


3DH3_Ant1_Hop



3DH5_Ant1_Hop





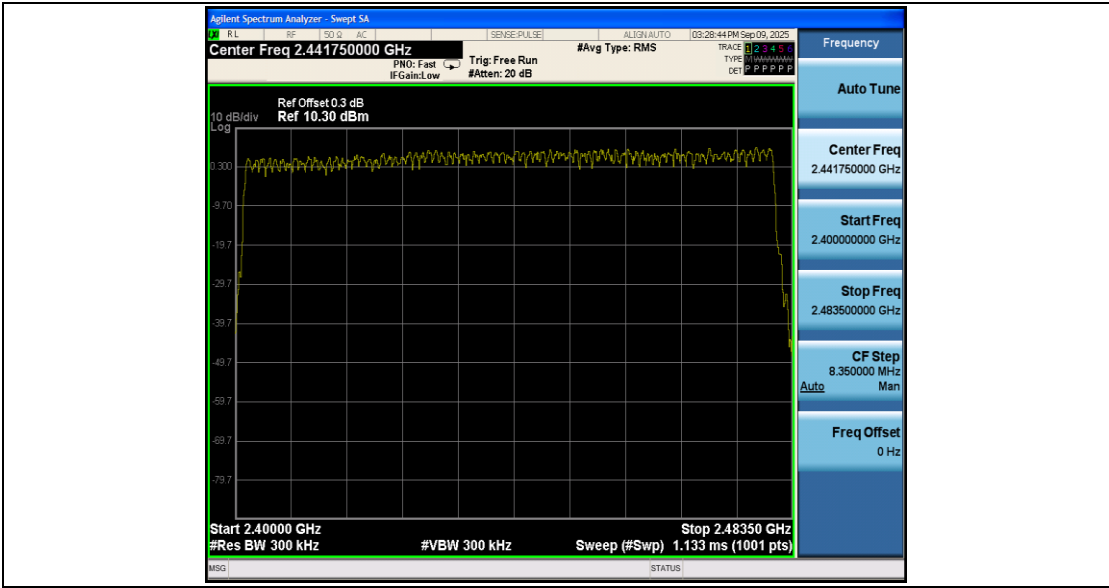
Appendix F: Number of hopping channels

Test Result

TestMode	Antenna	Freq(MHz)	Result[Num]	Limit[Num]	Verdict
DH5	Ant1	Hop	79	≥15	PASS
2DH5	Ant1	Hop	79	≥15	PASS
3DH5	Ant1	Hop	79	≥15	PASS

Test Graphs





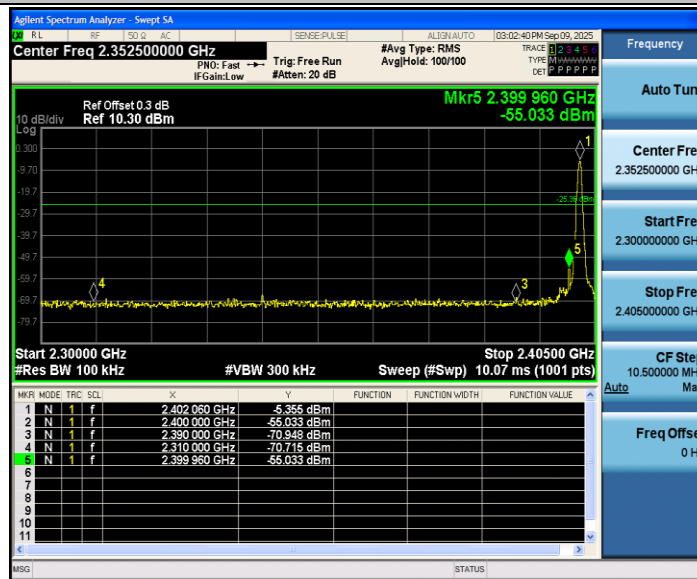
Appendix G: Band edge measurements

Test Result

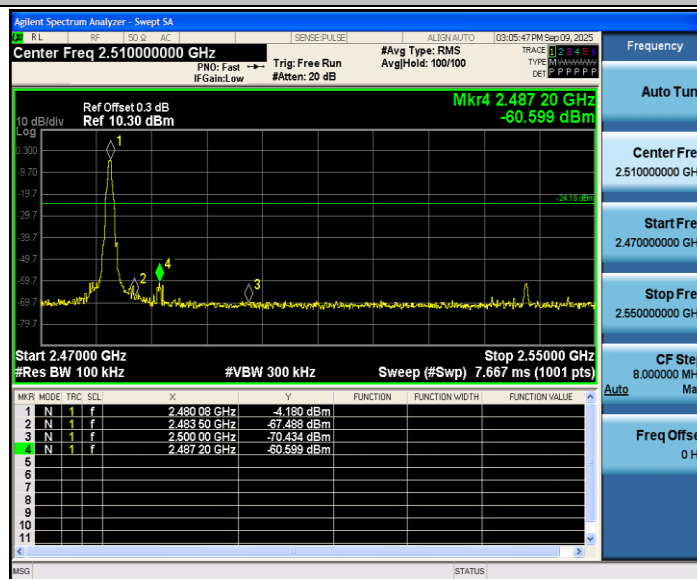
TestMode	Antenna	ChName	Freq(MHz)	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	Low	2402	-5.36	-55.03	≤-25.36	PASS
		High	2480	-4.18	-60.6	≤-24.18	PASS
		Low	Hop_2402	-5.71	-52.52	≤-25.71	PASS
		High	Hop_2480	-2.56	-59.48	≤-22.56	PASS
2DH5	Ant1	Low	2402	-5.50	-52.38	≤-25.5	PASS
		High	2480	-4.34	-51.86	≤-24.34	PASS
		Low	Hop_2402	-4.79	-58.05	≤-24.79	PASS
		High	Hop_2480	4.42	-50.73	≤-15.58	PASS
3DH5	Ant1	Low	2402	-4.44	-50.13	≤-24.44	PASS
		High	2480	-3.16	-58.11	≤-23.16	PASS
		Low	Hop_2402	-0.26	-40.58	≤-20.26	PASS
		High	Hop_2480	4.84	-50.17	≤-15.16	PASS

Test Graphs

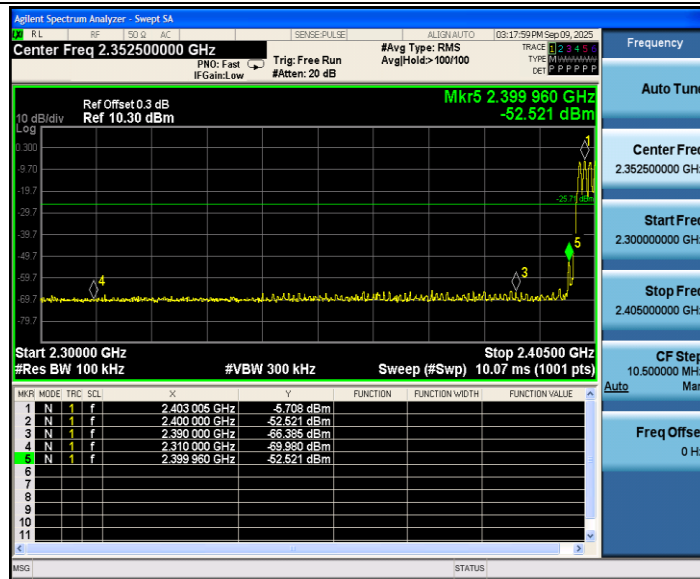
DH5_Ant1_Low_2402



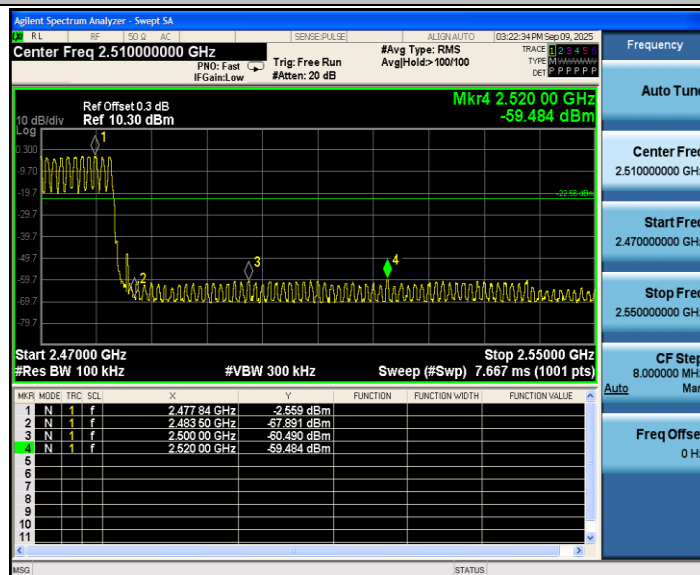
DH5_Ant1_High_2480



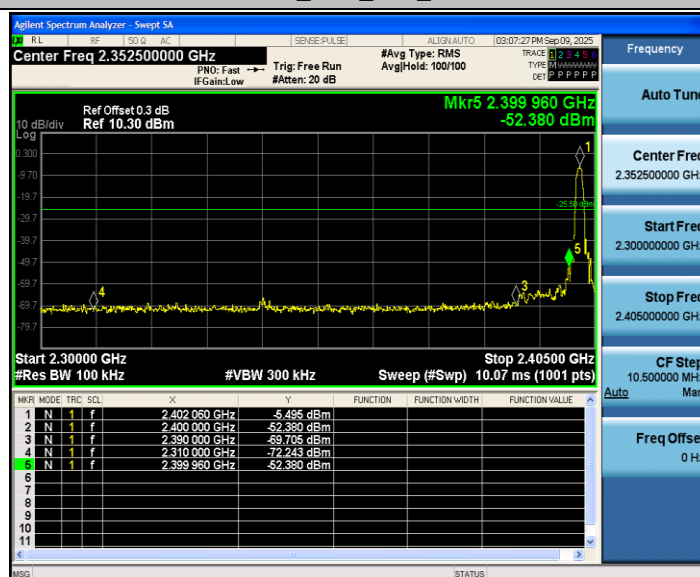
DH5_Ant1_Low_Hop_2402



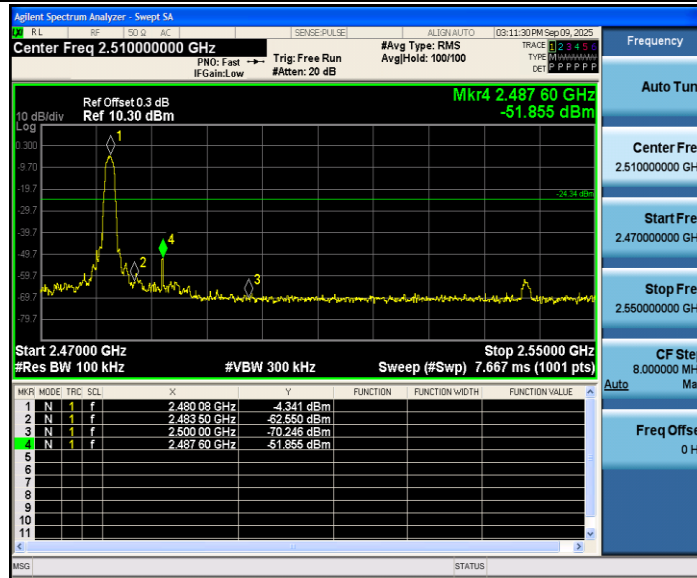
DH5_Ant1_High_Hop_2480



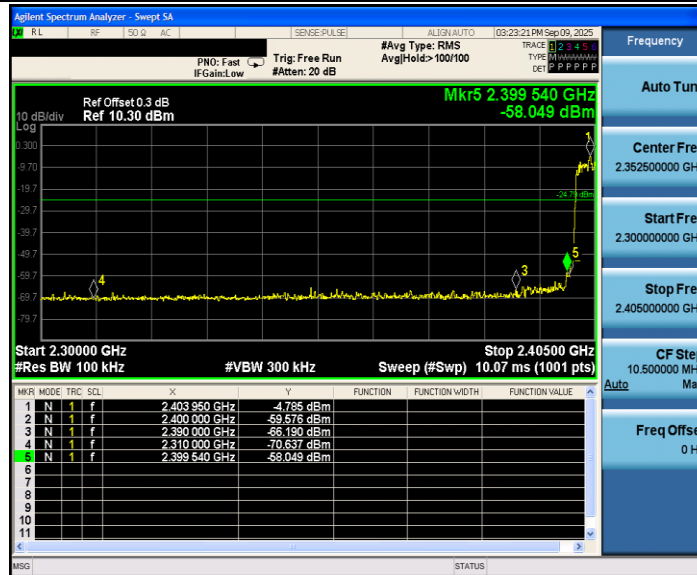
2DH5_Ant1_Low_2402



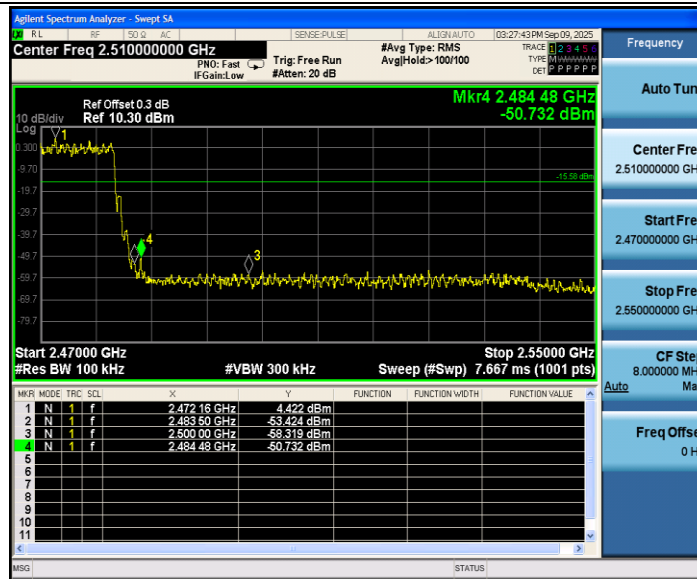
2DH5_Ant1_High_2480



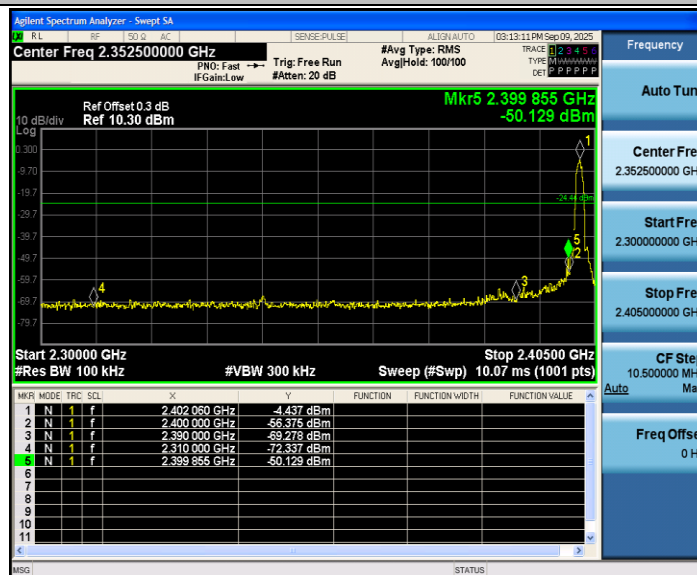
2DH5_Ant1_Low_Hop_2402



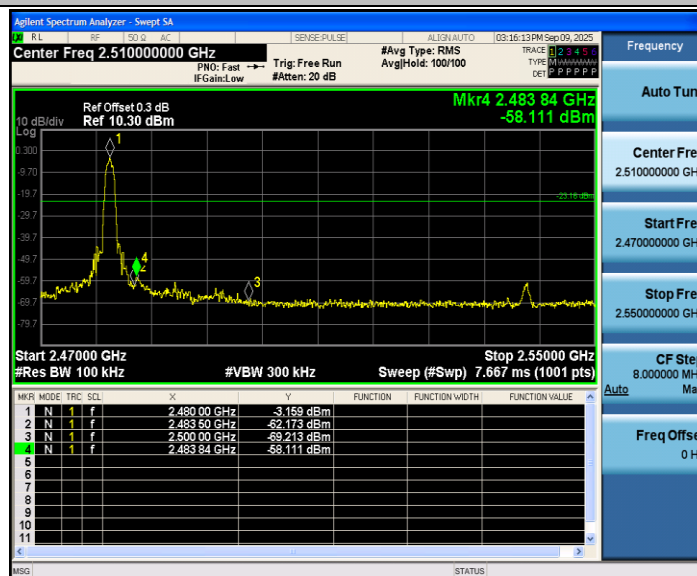
2DH5_Ant1_High_Hop_2480



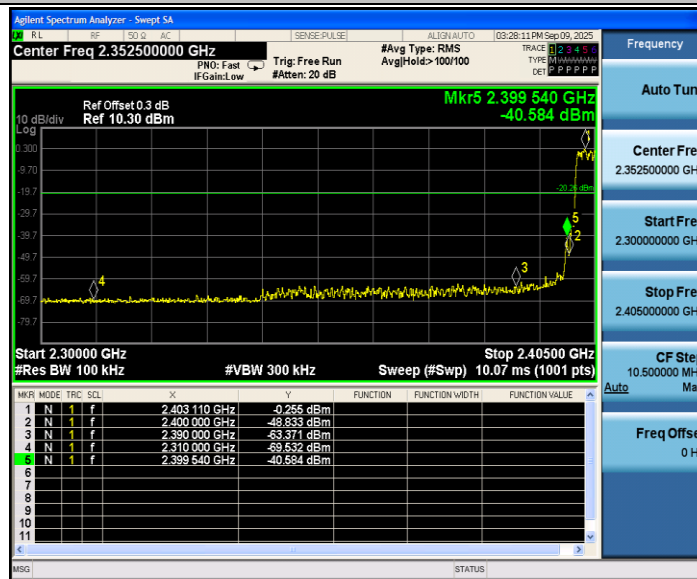
3DH5_Ant1_Low_2402



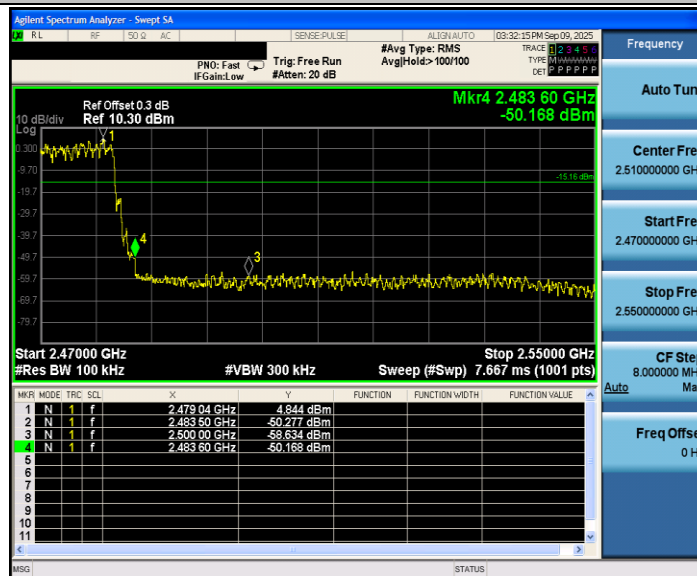
3DH5_Ant1_High_2480



3DH5_Ant1_Low_Hop_2402



3DH5_Ant1_High_Hop_2480

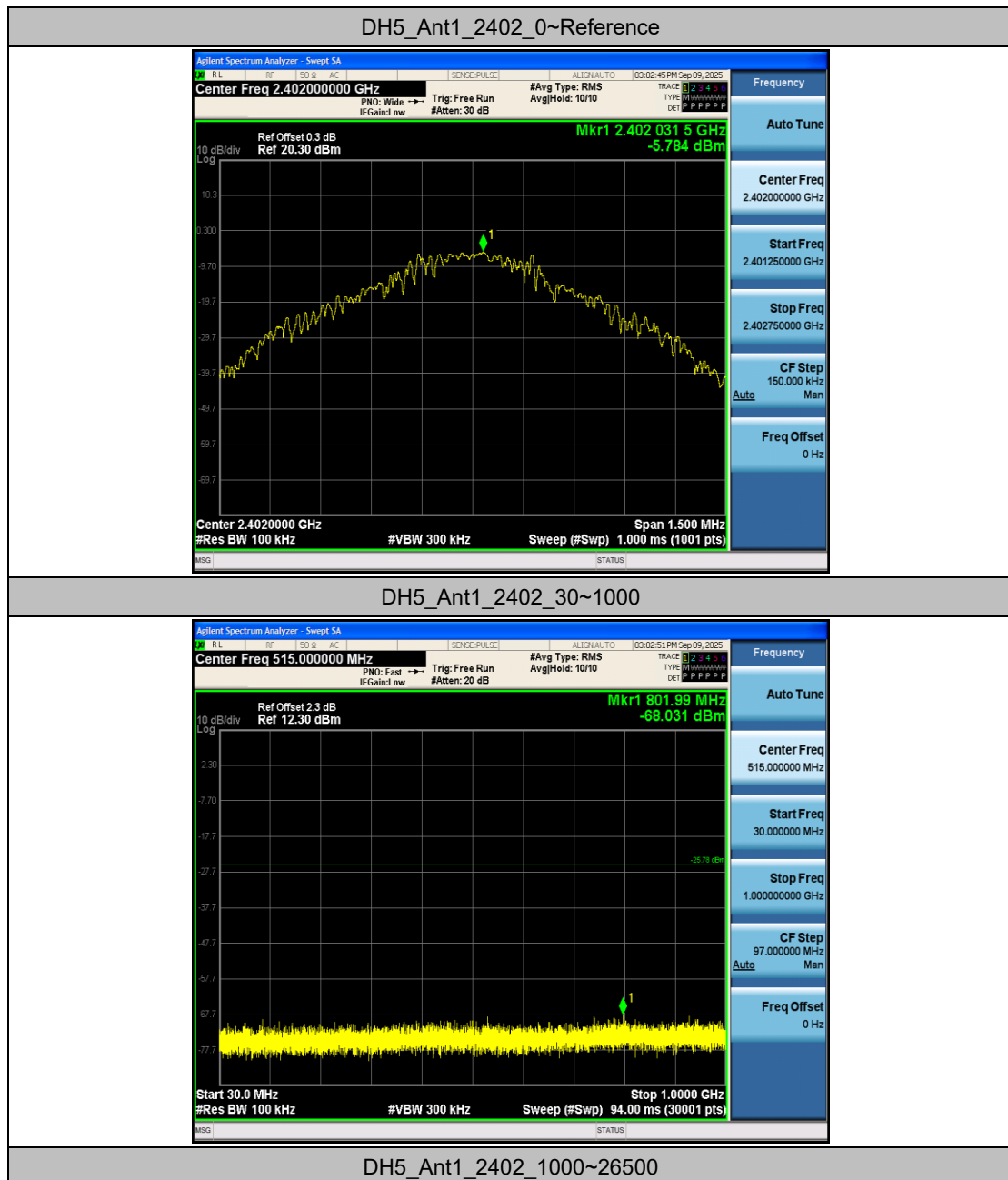


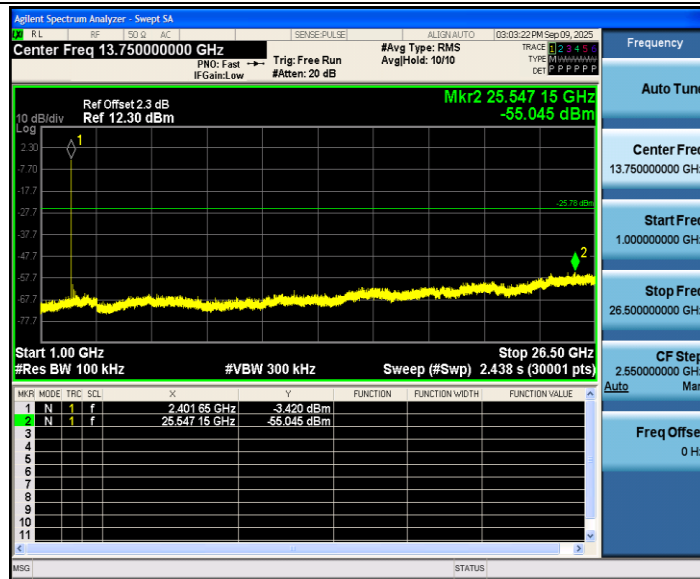
Appendix H: Conducted Spurious Emission

Test Result

TestMode	Antenna	Freq(MHz)	FreqRange [MHz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	2402	Reference	-5.78	-5.78	---	PASS
			30~1000	-5.78	-68.03	≤-25.78	PASS
			1000~26500	-5.78	-55.05	≤-25.78	PASS
		2441	Reference	-4.14	-4.14	---	PASS
			30~1000	-4.14	-68.2	≤-24.14	PASS
			1000~26500	-4.14	-55.63	≤-24.14	PASS
		2480	Reference	-4.28	-4.28	---	PASS
			30~1000	-4.28	-68.14	≤-24.28	PASS
			1000~26500	-4.28	-54.55	≤-24.28	PASS
2DH5	Ant1	2402	Reference	-5.07	-5.07	---	PASS
			30~1000	-5.07	-67.61	≤-25.07	PASS
			1000~26500	-5.07	-55.19	≤-25.07	PASS
		2441	Reference	-4.90	-4.90	---	PASS
			30~1000	-4.90	-68.41	≤-24.9	PASS
			1000~26500	-4.90	-54.82	≤-24.9	PASS
		2480	Reference	-4.71	-4.71	---	PASS
			30~1000	-4.71	-68.39	≤-24.71	PASS
			1000~26500	-4.71	-55.47	≤-24.71	PASS
3DH5	Ant1	2402	Reference	-6.37	-6.37	---	PASS
			30~1000	-6.37	-68.47	≤-26.37	PASS
			1000~26500	-6.37	-55.49	≤-26.37	PASS
		2441	Reference	-3.92	-3.92	---	PASS
			30~1000	-3.92	-67.63	≤-23.92	PASS
			1000~26500	-3.92	-54.74	≤-23.92	PASS
		2480	Reference	-4.97	-4.97	---	PASS
			30~1000	-4.97	-67.61	≤-24.97	PASS
			1000~26500	-4.97	-53.83	≤-24.97	PASS

Test Graphs





DH5_Ant1_2441_0~Reference



DH5_Ant1_2441_30~1000

