

FCC Appendix RF Test Data for BT

FCC ID : 2BYJU-UD1

Company : Shenzhen Junyixin Technology Co., Ltd

EUT : Wetness urine reminder

Model Number : UD1

Report No. : CTA26090301302

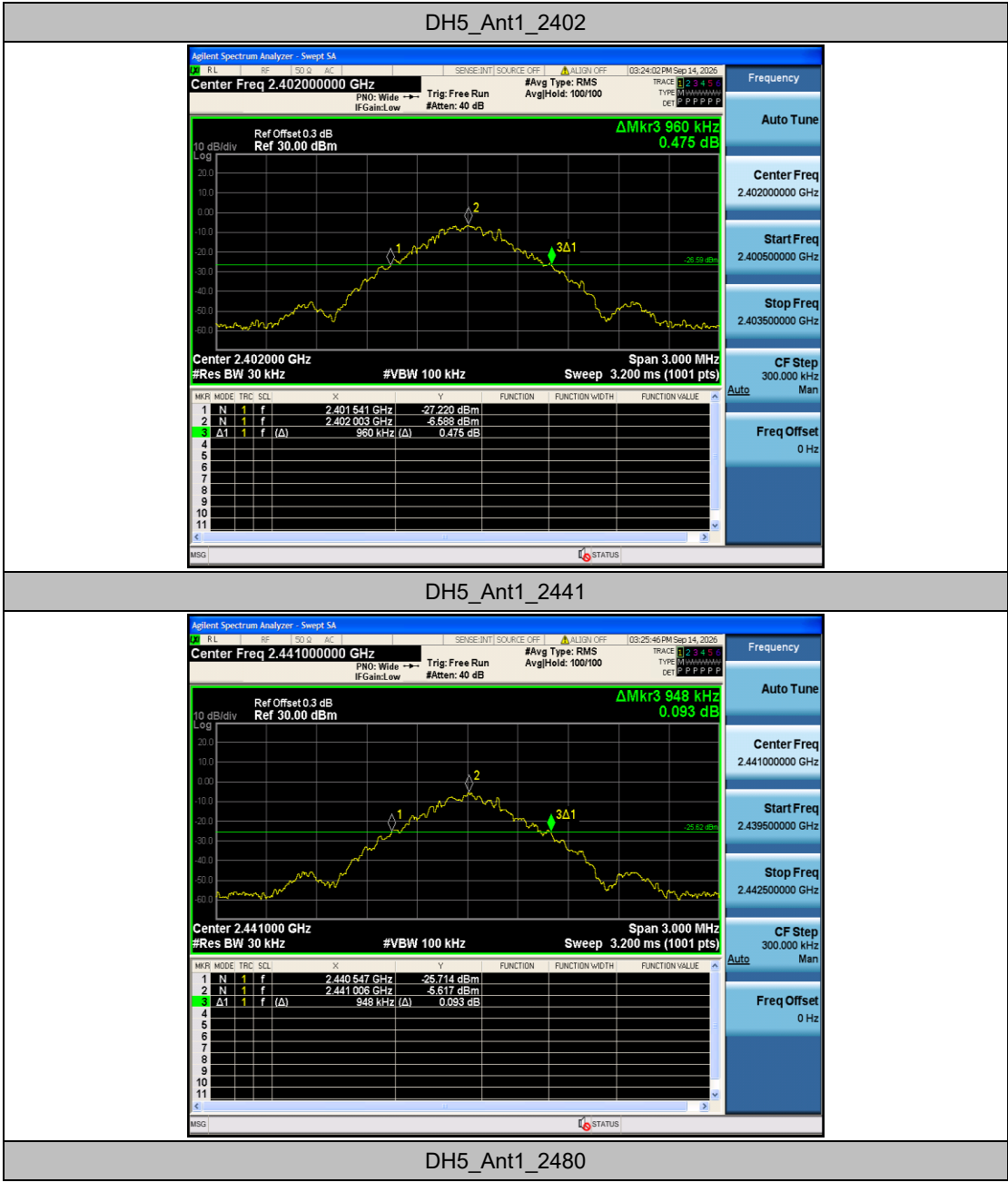
Reviewed By : Eric Wang

Appendix A: 20dB Emission Bandwidth

Test Result

TestMode	Antenna	Freq(MHz)	20dB EBW[MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH5	Ant1	2402	0.960	2401.541	2402.501	---	---
		2441	0.948	2440.547	2441.495	---	---
		2480	0.957	2479.544	2480.501	---	---
2DH5	Ant1	2402	1.353	2401.328	2402.681	---	---
		2441	1.332	2440.340	2441.672	---	---
		2480	1.341	2479.337	2480.678	---	---

Test Graphs





2DH5_Ant1_2402



2DH5_Ant1_2441



2DH5_Ant1_2480

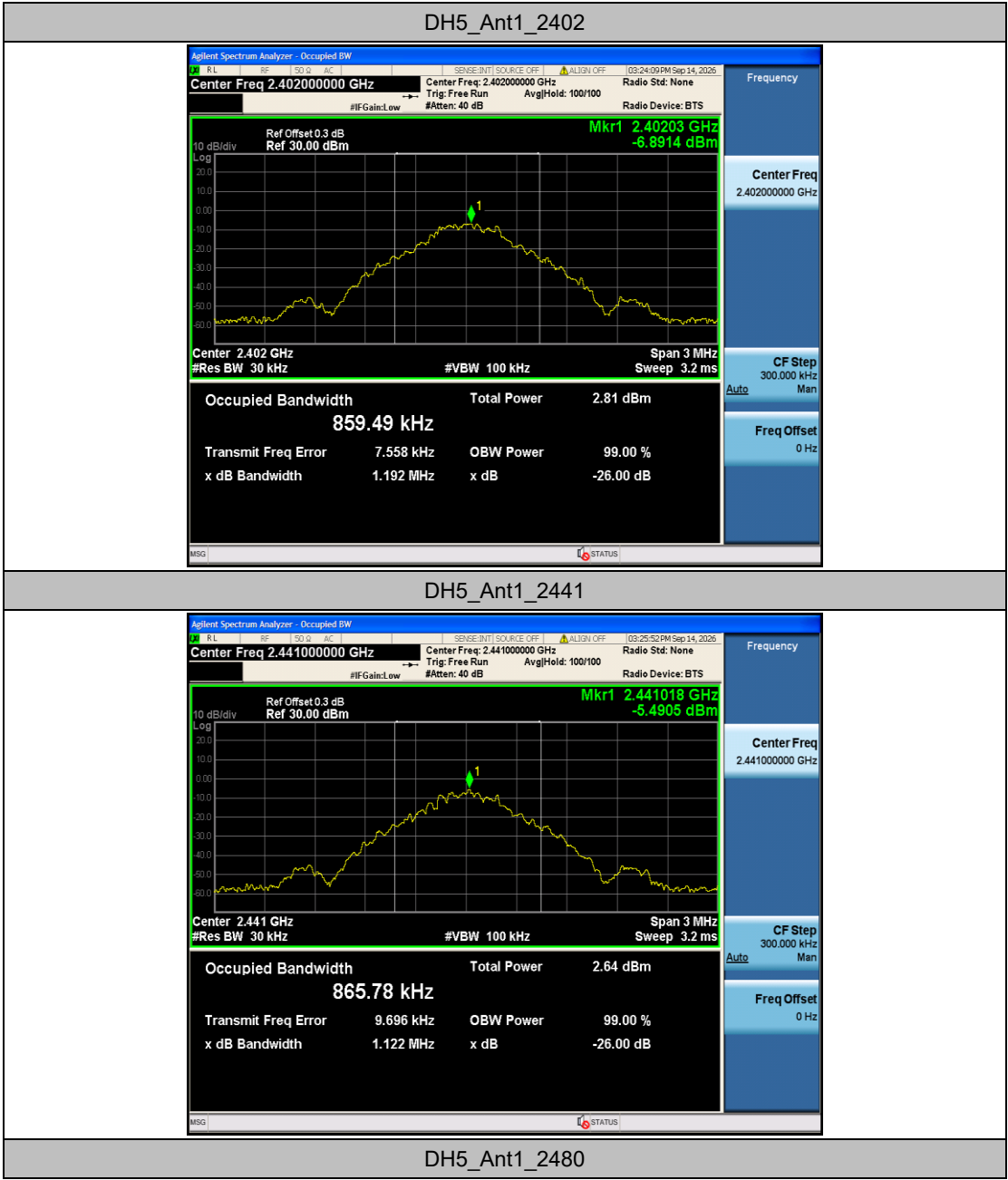


Appendix B: Occupied Channel Bandwidth

Test Result

TestMode	Antenna	Freq(MHz)	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH5	Ant1	2402	0.85949	2401.5778	2402.4373	---	---
		2441	0.86578	2440.5768	2441.4426	---	---
		2480	0.84908	2479.5816	2480.4307	---	---
2DH5	Ant1	2402	1.1899	2401.4131	2402.6030	---	---
		2441	1.1880	2440.4131	2441.6011	---	---
		2480	1.1809	2479.4177	2480.5986	---	---

Test Graphs





2DH5_Ant1_2402



2DH5_Ant1_2441



2DH5_Ant1_2480



Appendix C: Maximum conducted output power

Test Result Peak

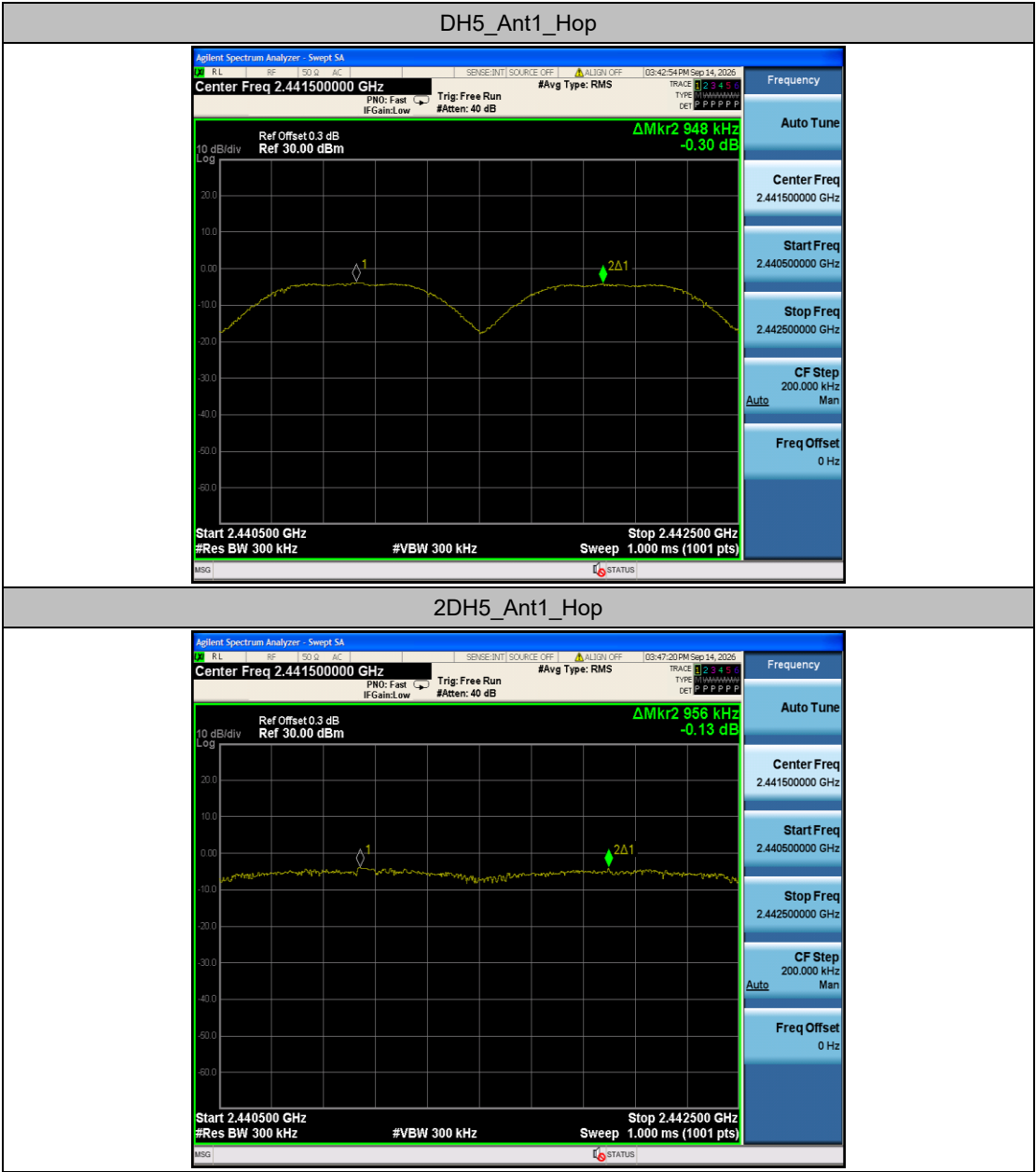
Test Mode	Antenna	Freq(MHz)	Conducted Peak Power[dBm]	Conducted Limit[dBm]	Verdict
DH5	Ant1	2402	-3.76	≤20.97	PASS
		2441	-3.82	≤20.97	PASS
		2480	-4.08	≤20.97	PASS
2DH5	Ant1	2402	-1.06	≤20.97	PASS
		2441	-1.19	≤20.97	PASS
		2480	-1.33	≤20.97	PASS

Appendix D: Carrier frequency separation

Test Result

TestMode	Antenna	Freq(MHz)	Result[MHz]	Limit[MHz]	Verdict
DH5	Ant1	Hop	0.948	≥ 0.640	PASS
2DH5	Ant1	Hop	0.956	≥ 0.902	PASS

Test Graphs

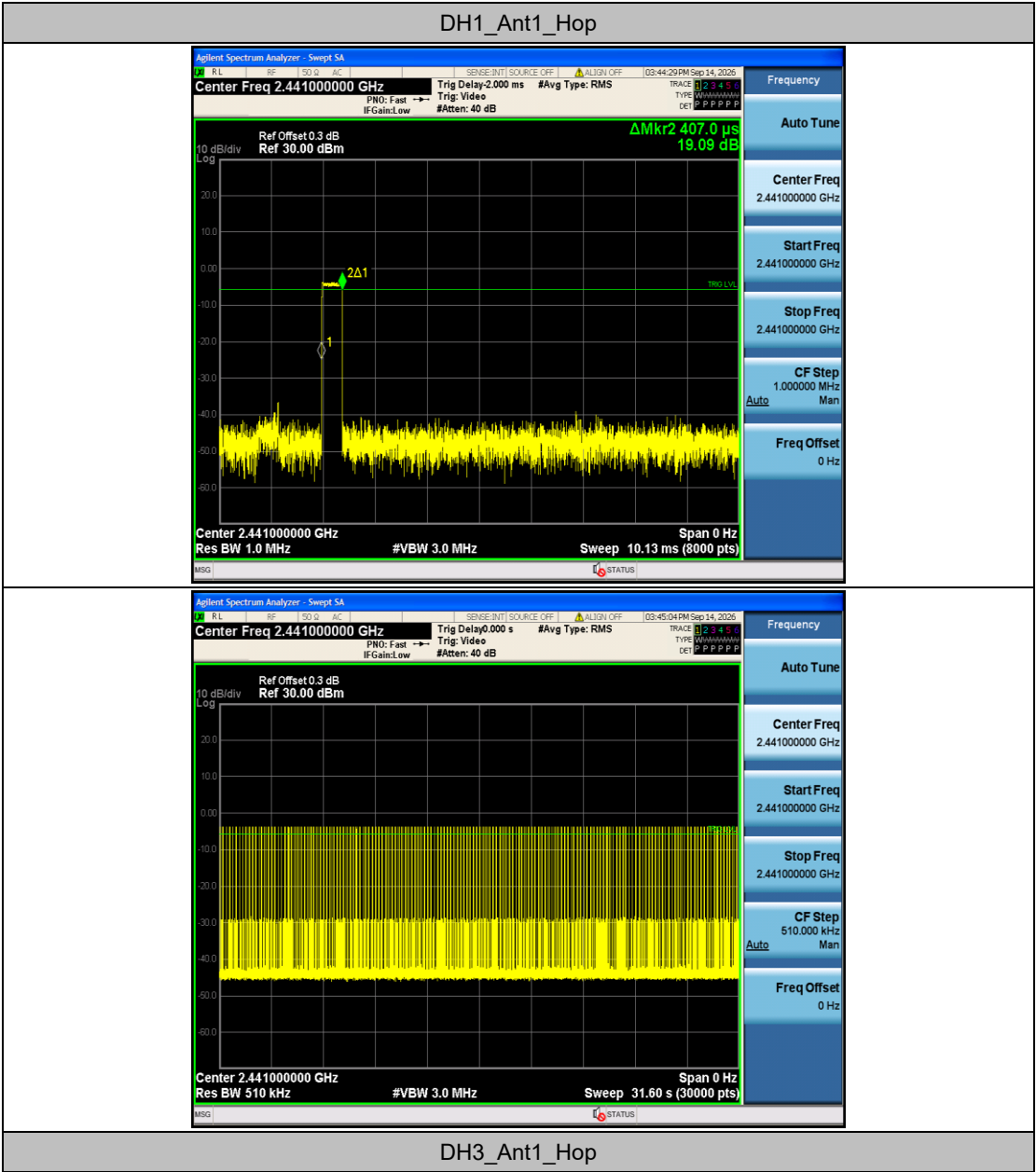


Appendix E: Time of occupancy

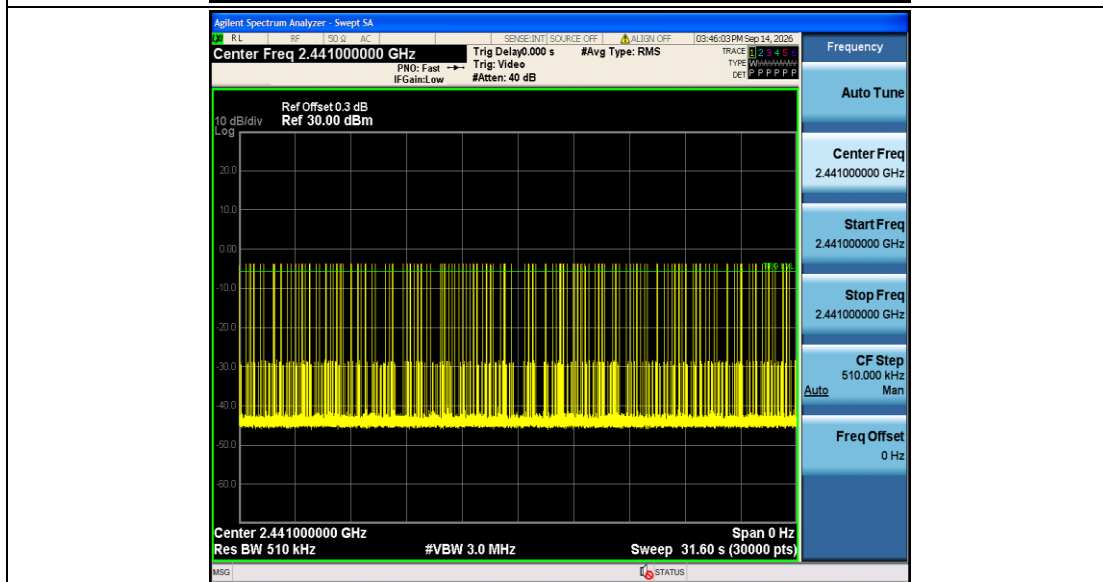
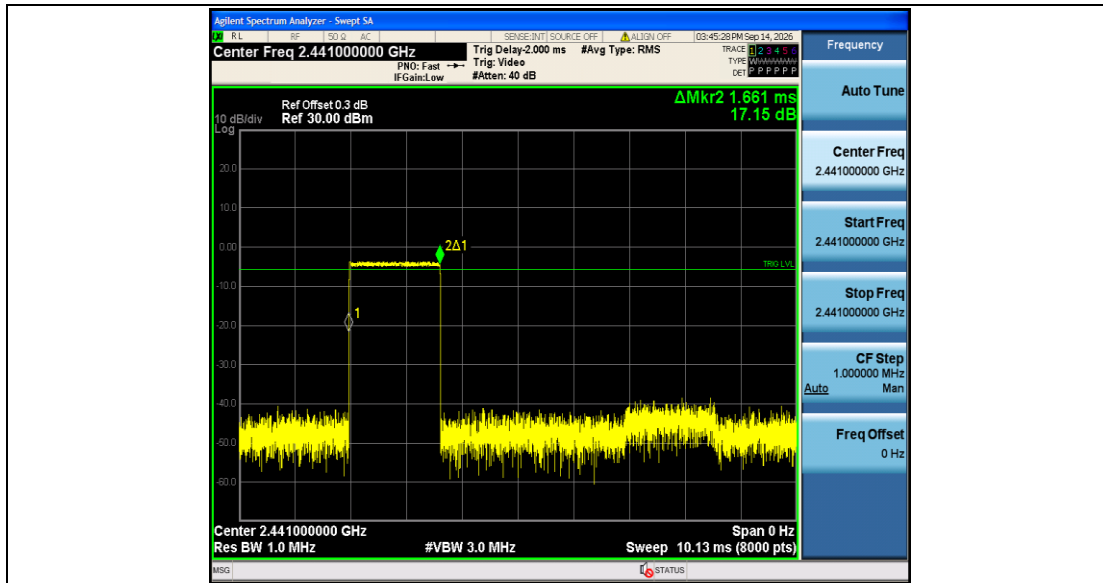
Test Result

TestMode	Antenna	Freq(MHz)	BurstWidth [ms]	TotalHops [Num]	Result[s]	Limit[s]	Verdict
DH1	Ant1	Hop	0.407	318	0.129	≤0.4	PASS
DH3	Ant1	Hop	1.661	159	0.264	≤0.4	PASS
DH5	Ant1	Hop	2.910	110	0.32	≤0.4	PASS
2DH1	Ant1	Hop	0.415	319	0.132	≤0.4	PASS
2DH3	Ant1	Hop	1.668	168	0.28	≤0.4	PASS
2DH5	Ant1	Hop	2.916	104	0.303	≤0.4	PASS

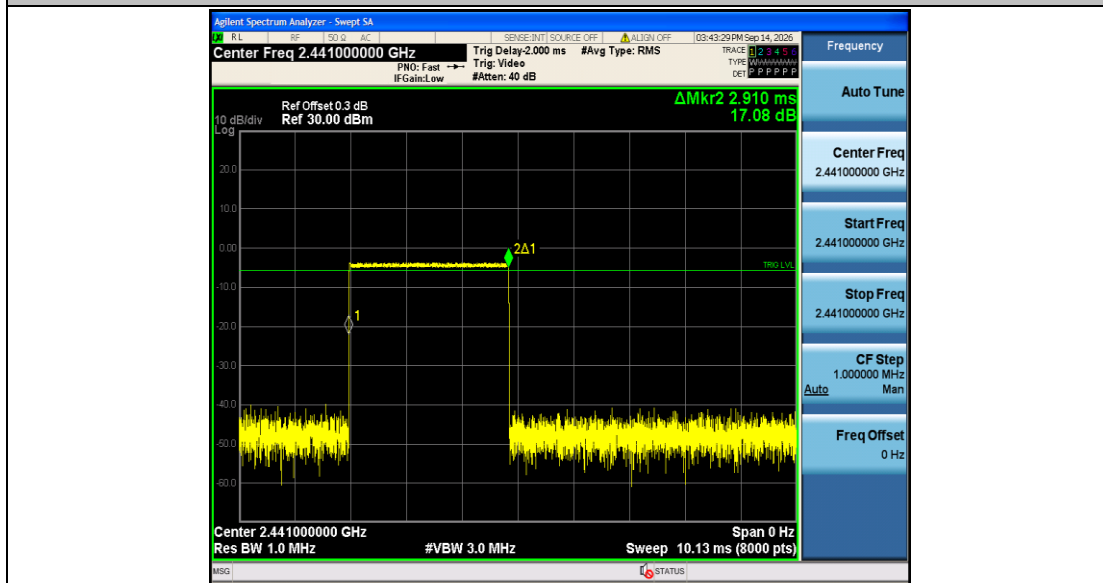
Test Graphs

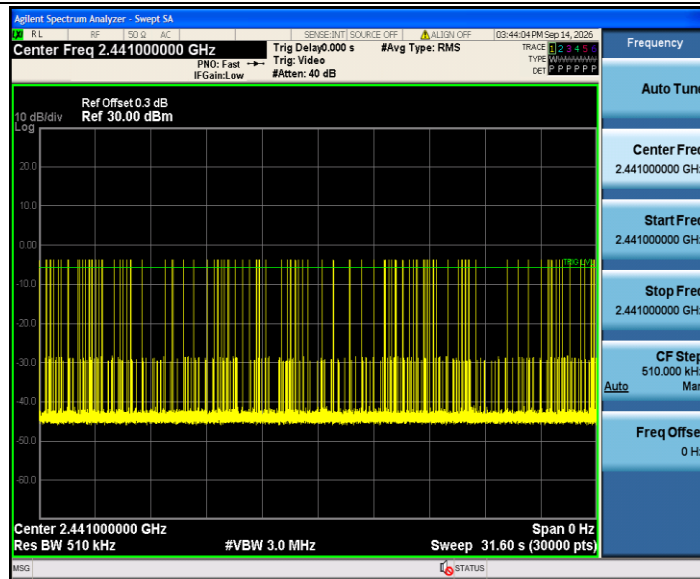


DH3_Ant1_Hop

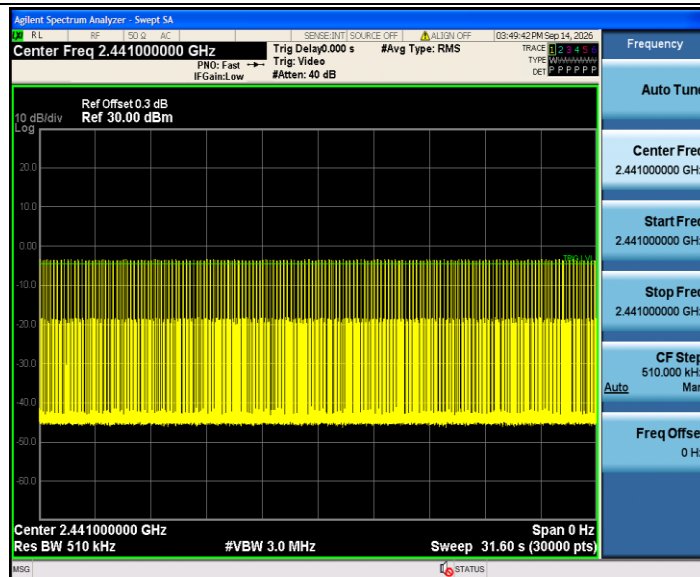
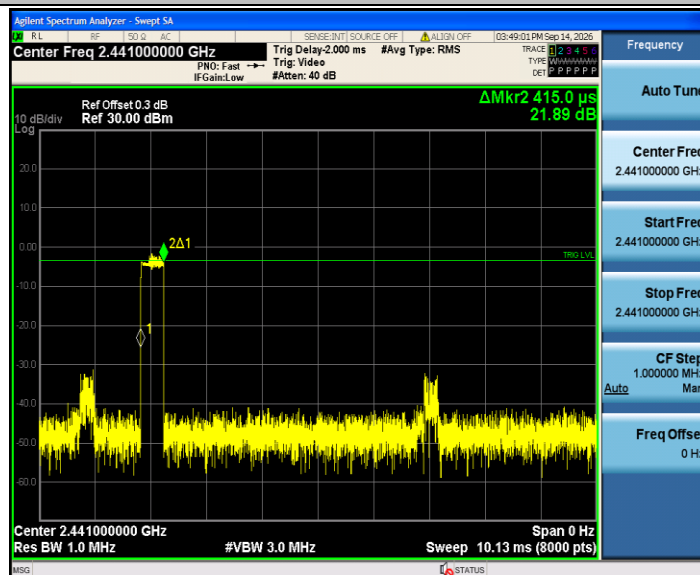


DH5_Ant1_Hop

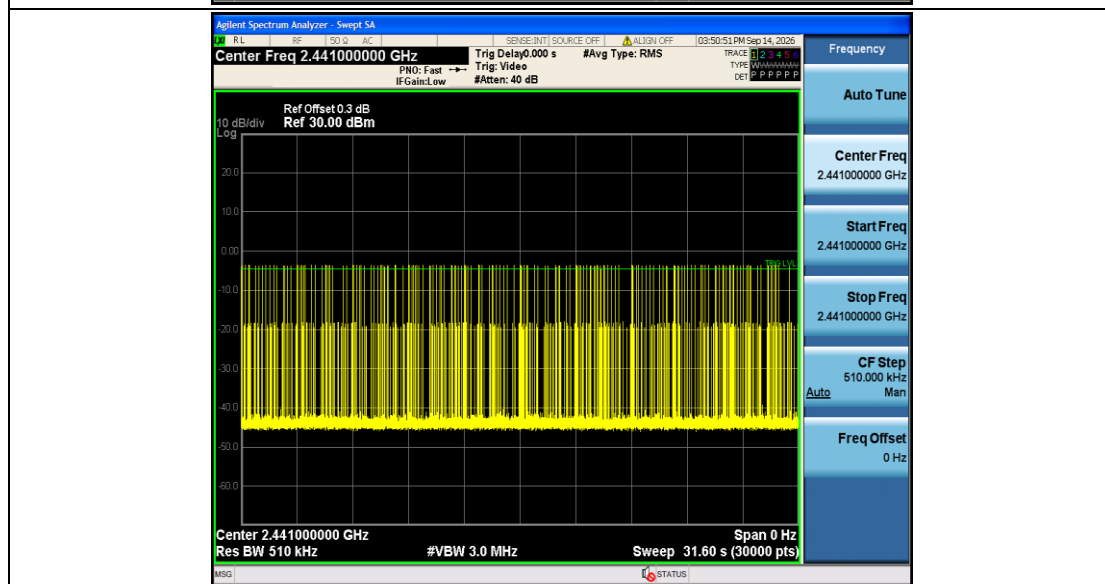
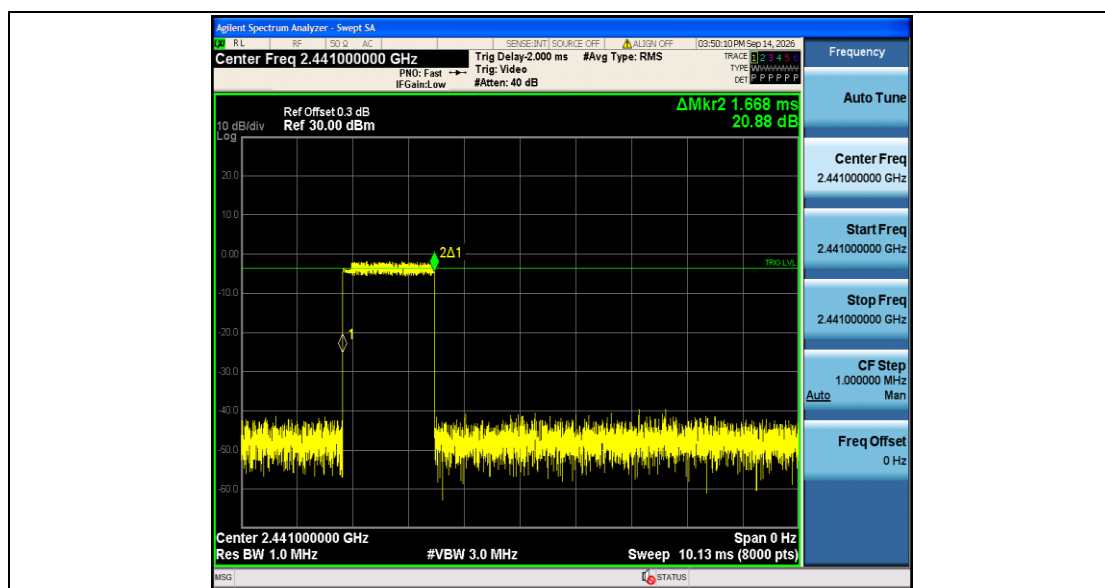




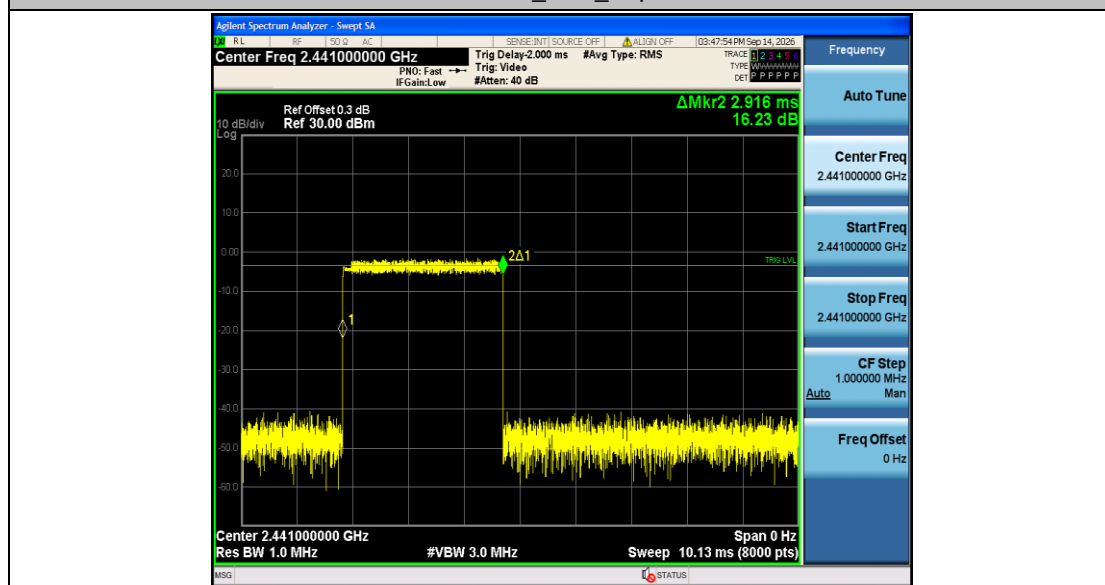
2DH1_Ant1_Hop

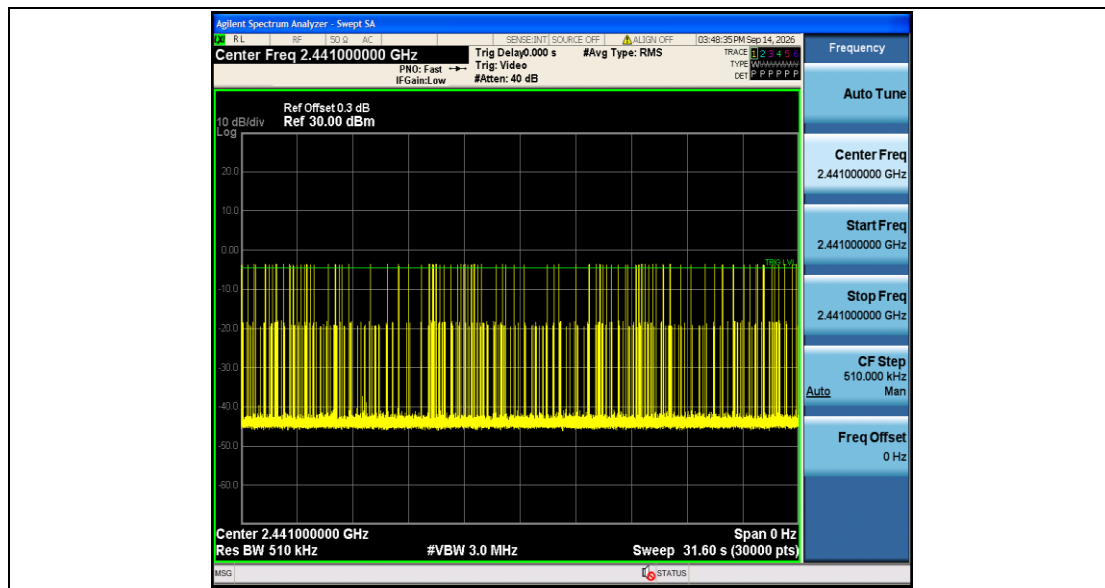


2DH3_Ant1_Hop



2DH5_Ant1_Hop



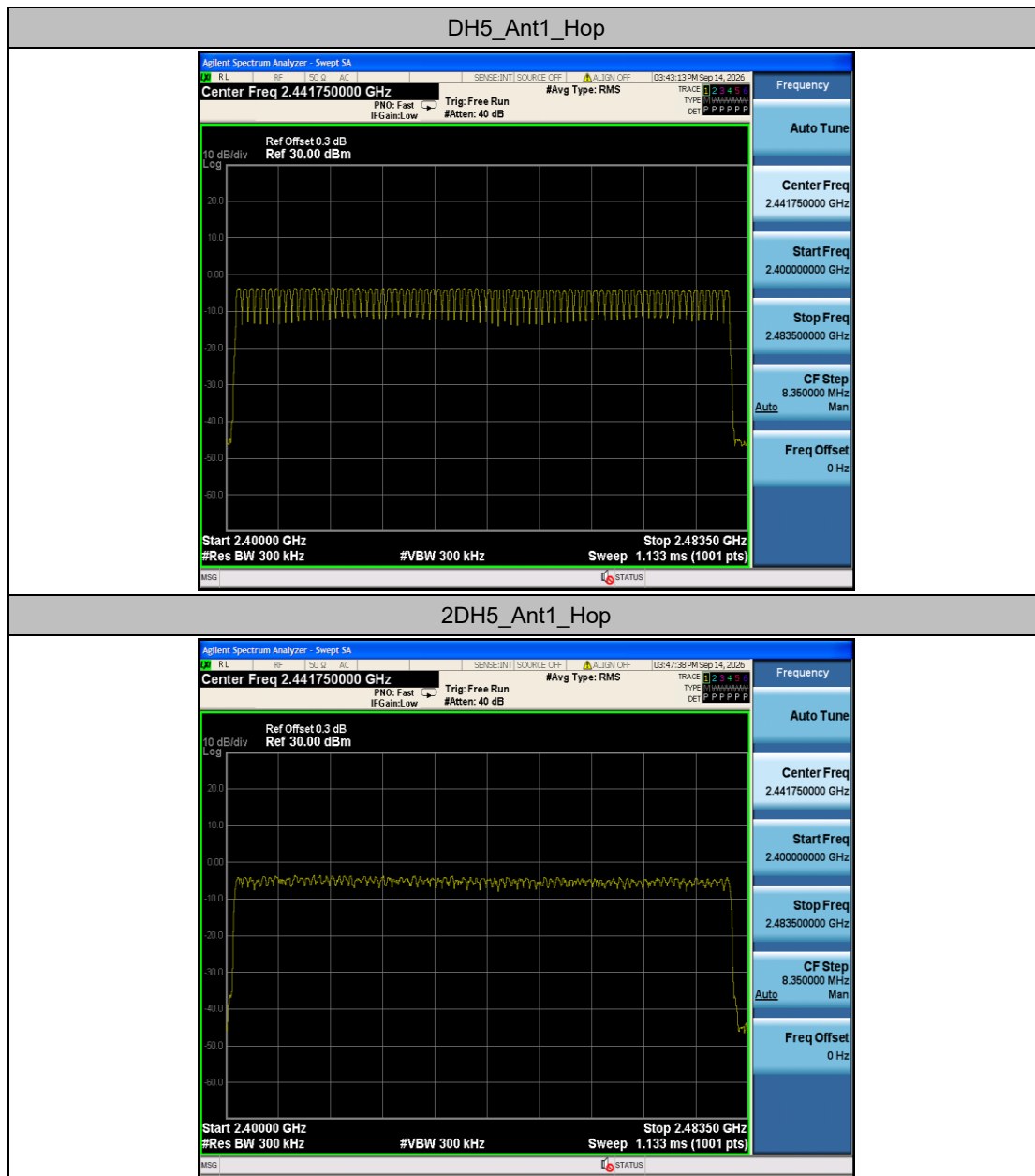


Appendix F: Number of hopping channels

Test Result

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

Test Graphs

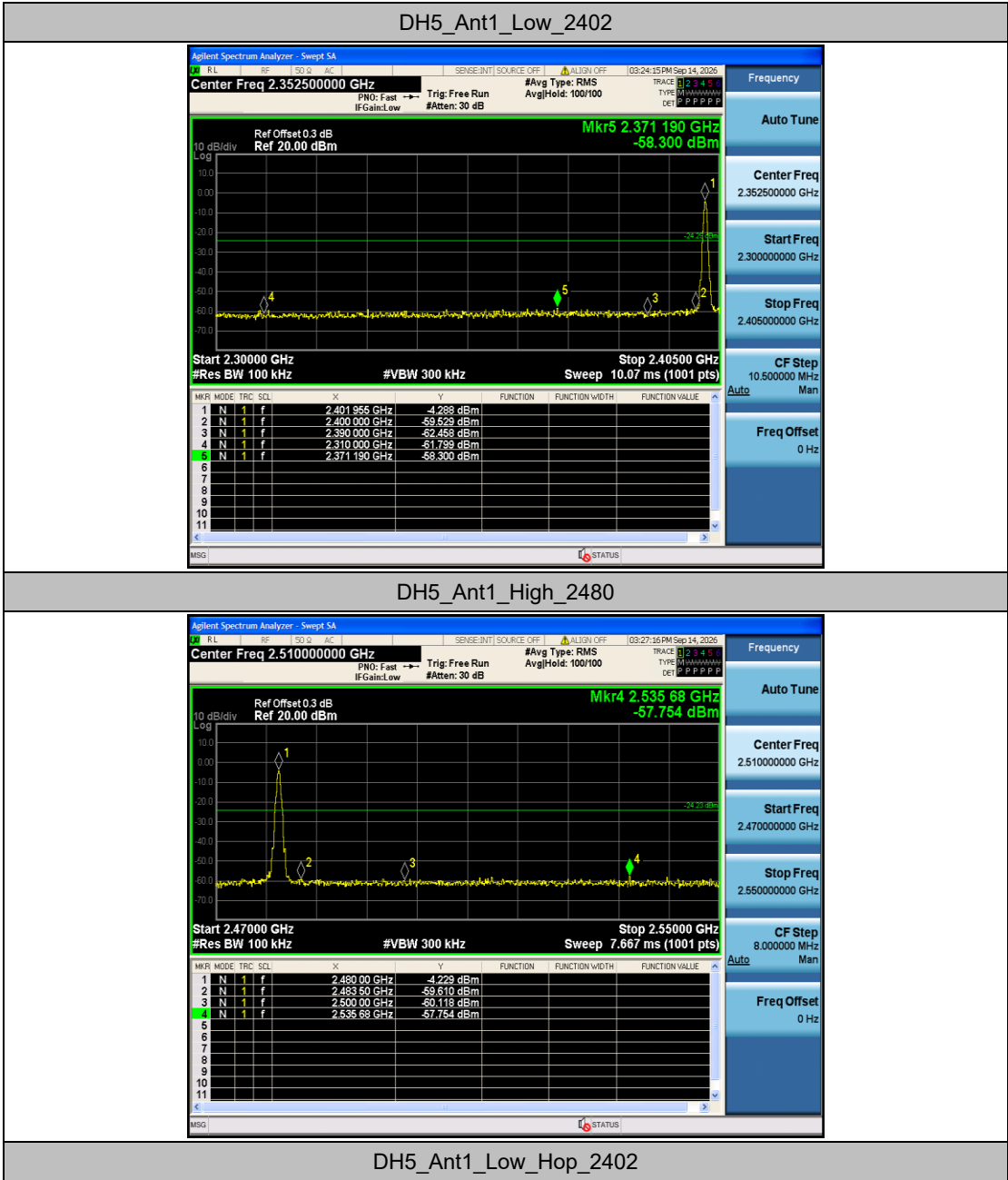


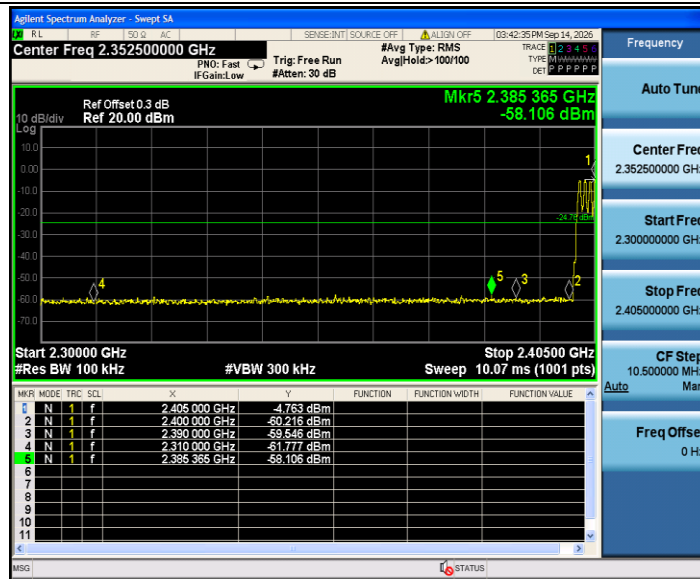
Appendix G: Band edge measurements

Test Result

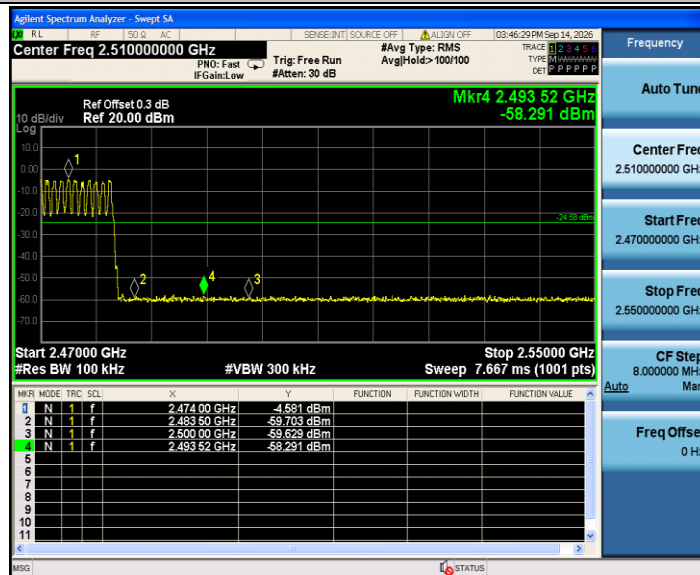
TestMode	Antenna	ChName	Freq(MHz)	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	Low	2402	-4.29	-58.3	≤-24.29	PASS
		High	2480	-4.23	-57.75	≤-24.23	PASS
		Low	Hop_2402	-4.76	-58.11	≤-24.76	PASS
		High	Hop_2480	-4.58	-58.29	≤-24.58	PASS
2DH5	Ant1	Low	2402	-4.85	-58.17	≤-24.85	PASS
		High	2480	-5.95	-55.71	≤-25.95	PASS
		Low	Hop_2402	-4.92	-58.24	≤-24.92	PASS
		High	Hop_2480	-7.00	-57.88	≤-27	PASS

Test Graphs

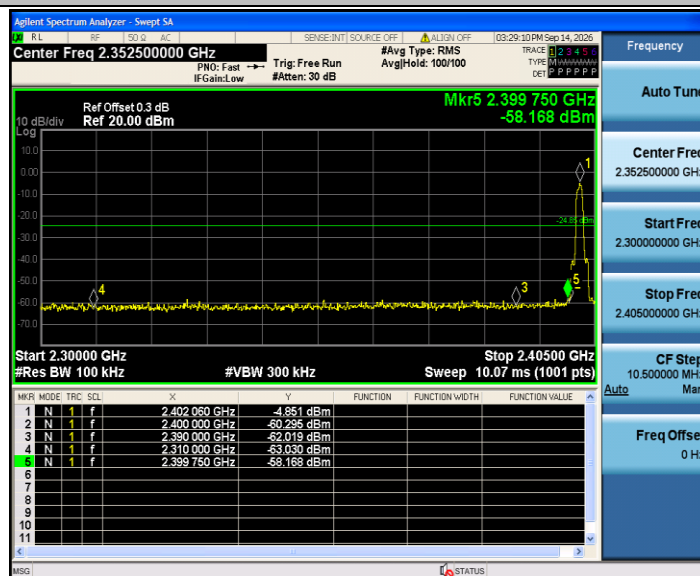




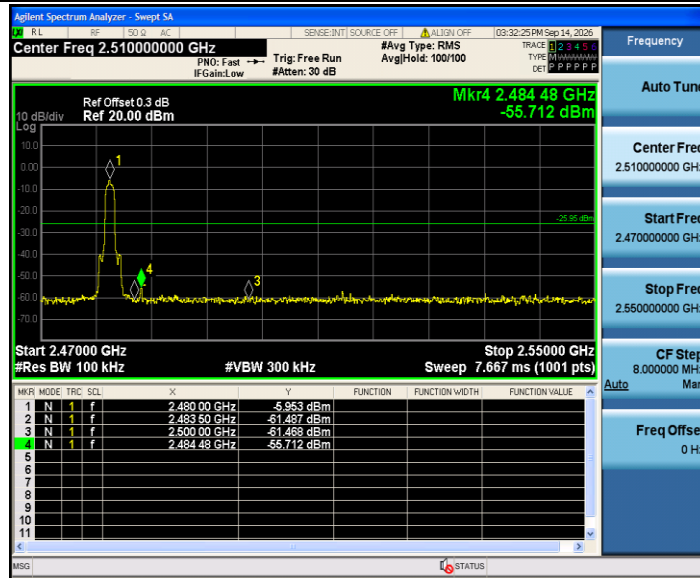
DH5_Ant1_High_Hop_2480



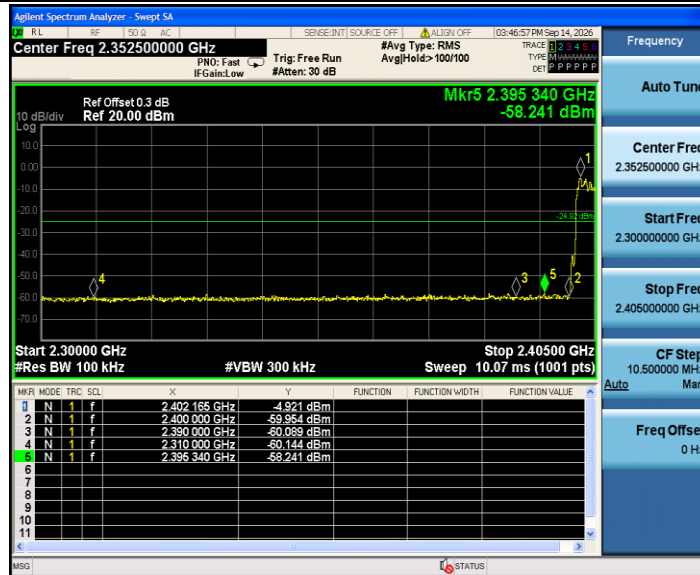
2DH5_Ant1_Low_2402



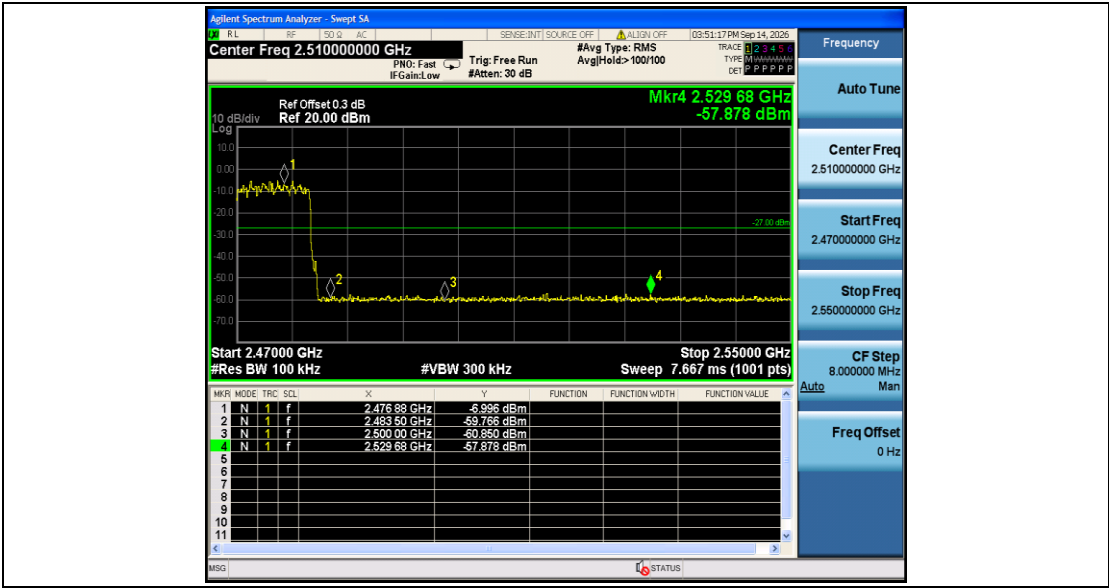
2DH5_Ant1_High_2480



2DH5_Ant1_Low_Hop_2402



2DH5_Ant1_High_Hop_2480

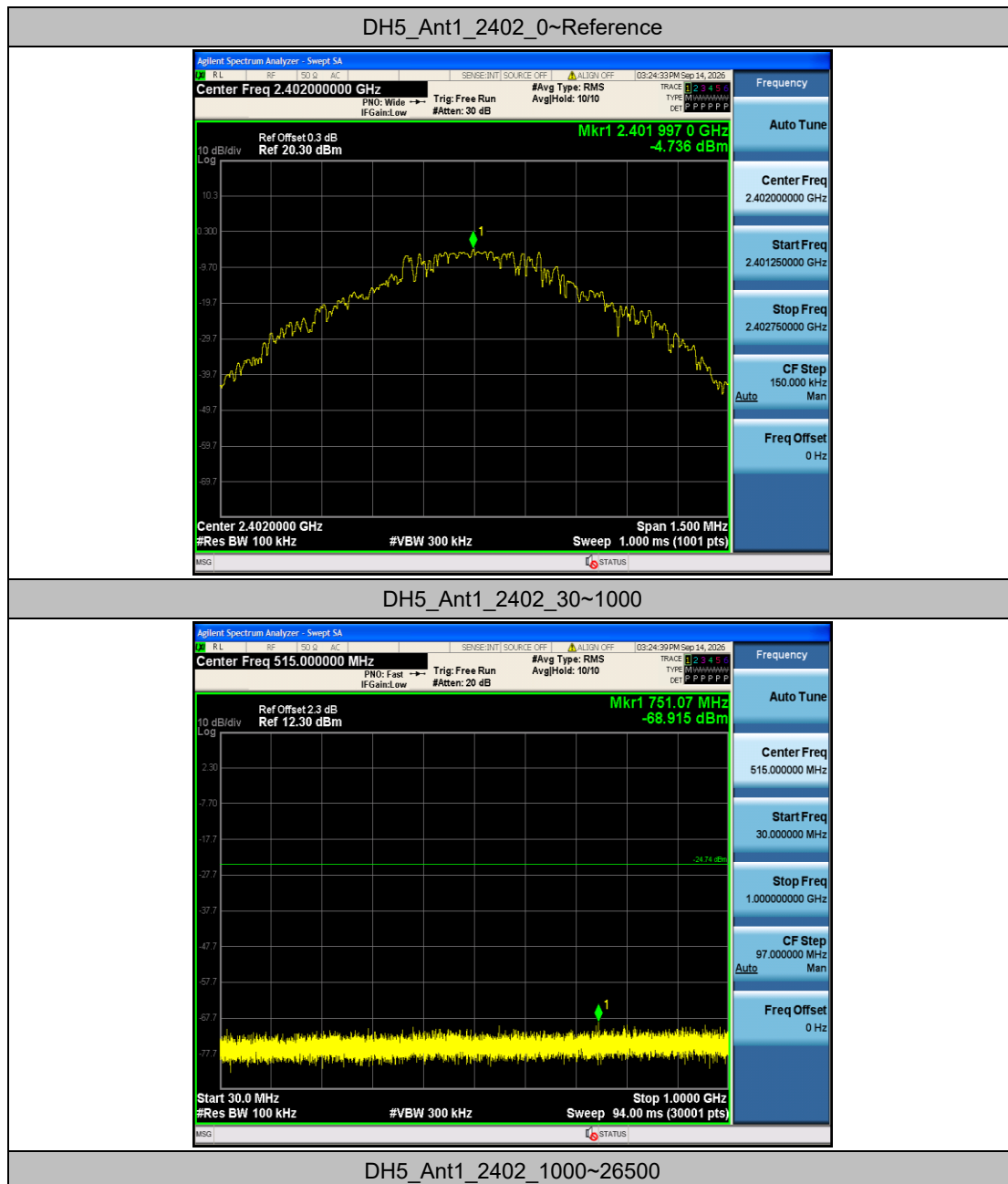


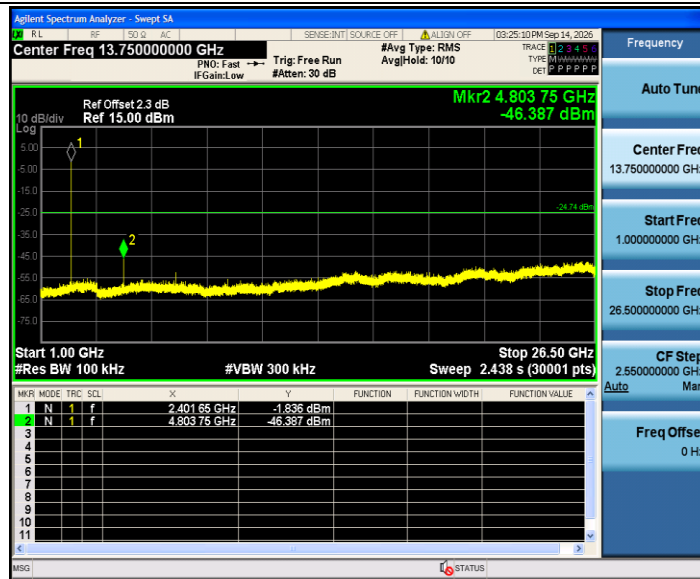
Appendix H: Conducted Spurious Emission

Test Result

TestMode	Antenna	Freq(MHz)	FreqRange [MHz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	2402	Reference	-4.74	-4.74	---	PASS
			30~1000	-4.74	-68.92	≤-24.74	PASS
			1000~26500	-4.74	-46.39	≤-24.74	PASS
		2441	Reference	-5.40	-5.40	---	PASS
			30~1000	-5.40	-69.18	≤-25.4	PASS
			1000~26500	-5.40	-46.76	≤-25.4	PASS
		2480	Reference	-4.76	-4.76	---	PASS
			30~1000	-4.76	-69.07	≤-24.76	PASS
			1000~26500	-4.76	-45.34	≤-24.76	PASS
2DH5	Ant1	2402	Reference	-5.24	-5.24	---	PASS
			30~1000	-5.24	-69.16	≤-25.24	PASS
			1000~26500	-5.24	-46.95	≤-25.24	PASS
		2441	Reference	-7.39	-7.39	---	PASS
			30~1000	-7.39	-69.37	≤-27.39	PASS
			1000~26500	-7.39	-46.12	≤-27.39	PASS
		2480	Reference	-5.20	-5.20	---	PASS
			30~1000	-5.20	-67.22	≤-25.2	PASS
			1000~26500	-5.20	-46.96	≤-25.2	PASS

Test Graphs

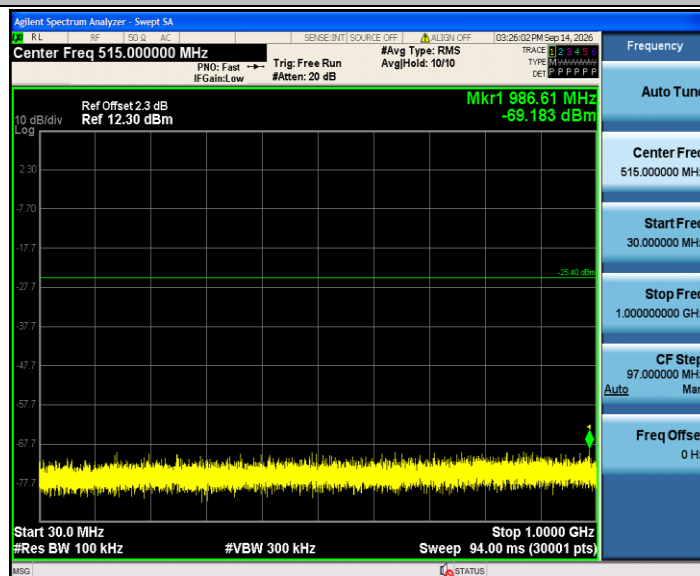




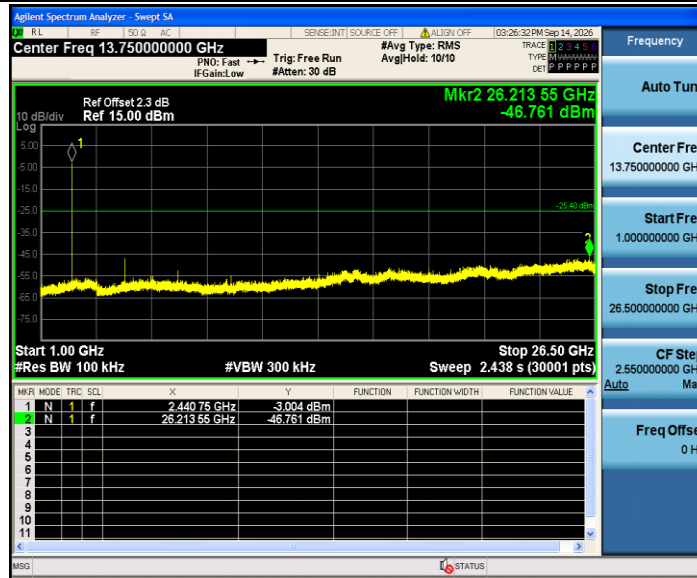
DH5_Ant1_2441_0~Reference



DH5_Ant1_2441_30~1000



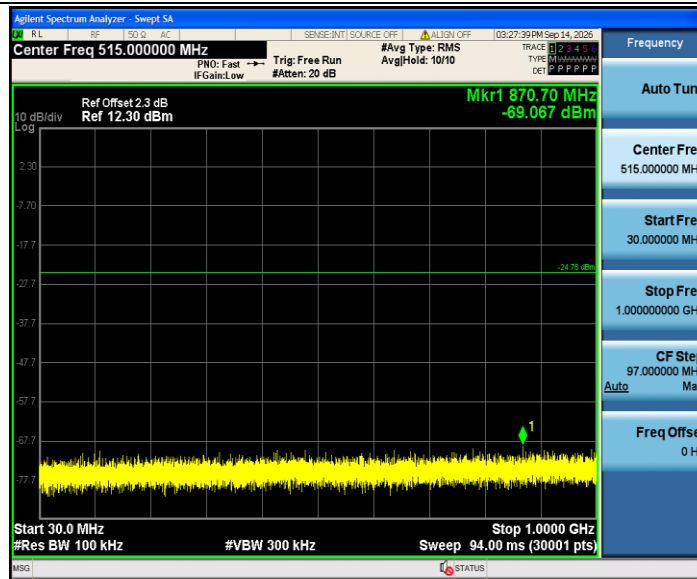
DH5_Ant1_2441_1000~26500



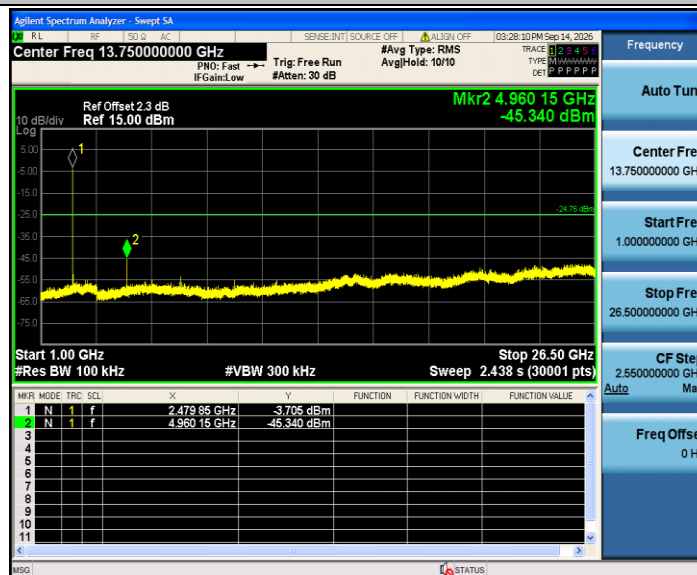
DH5_Ant1_2480_0~Reference



DH5_Ant1_2480_30~1000



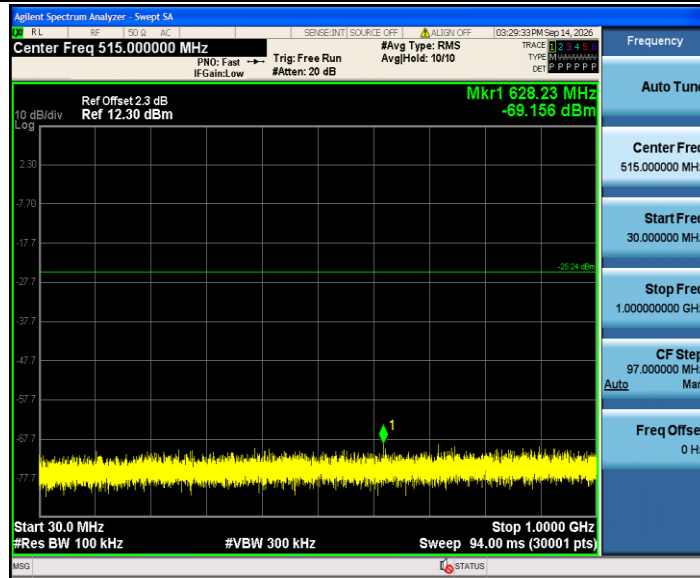
DH5_Ant1_2480_1000~26500



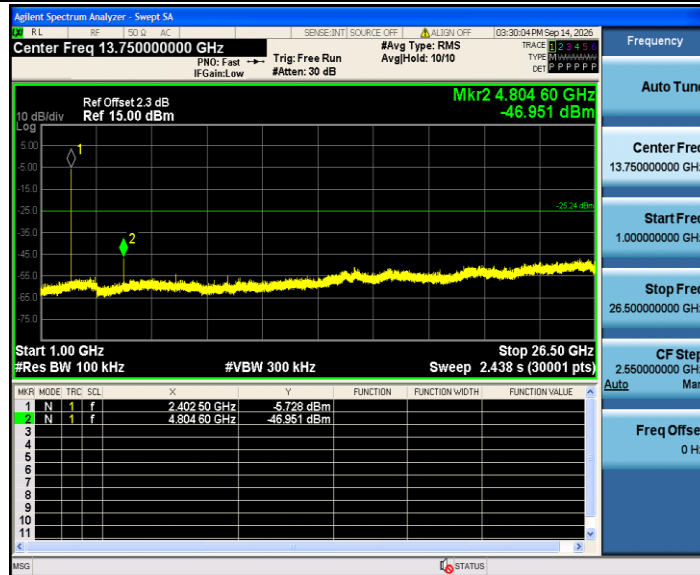
2DH5_Ant1_2402_0~Reference



2DH5_Ant1_2402_30~1000



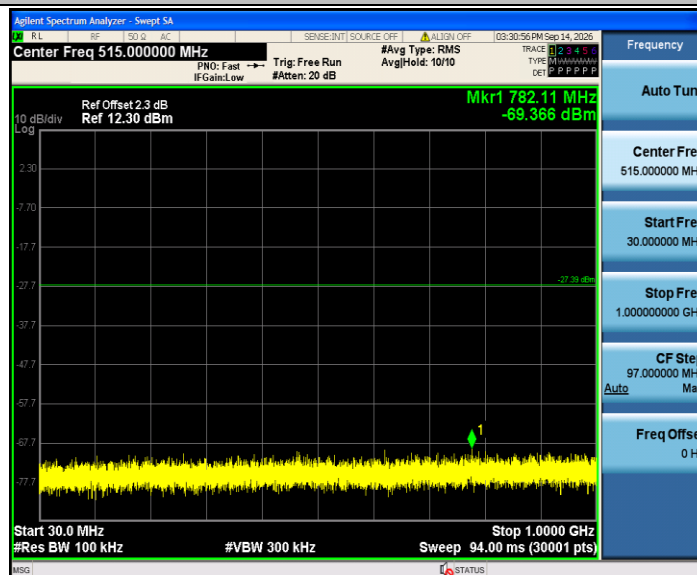
2DH5_Ant1_2402_1000~26500



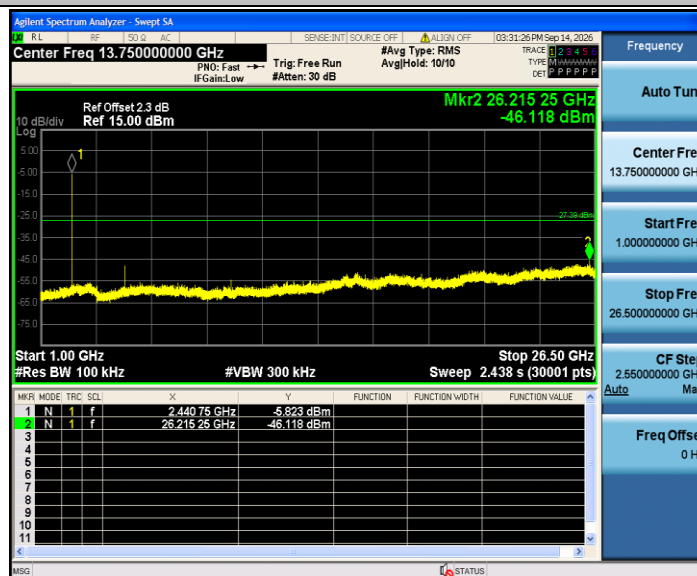
2DH5_Ant1_2441_0~Reference



2DH5_Ant1_2441_30~1000



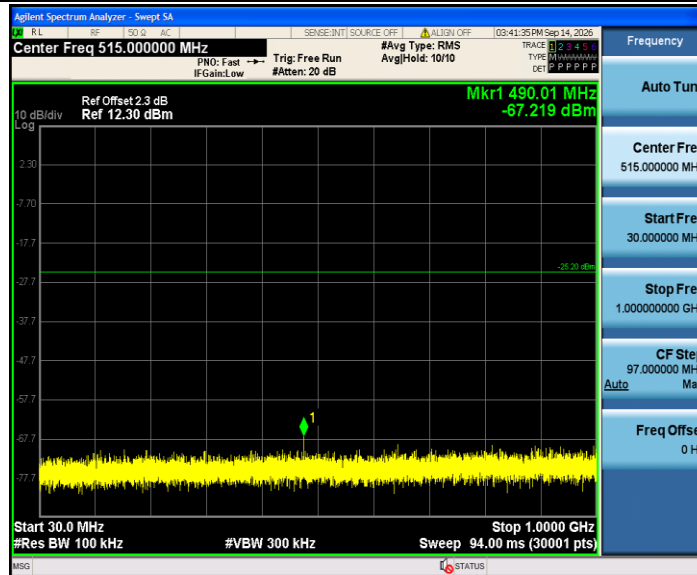
2DH5_Ant1_2441_1000~26500



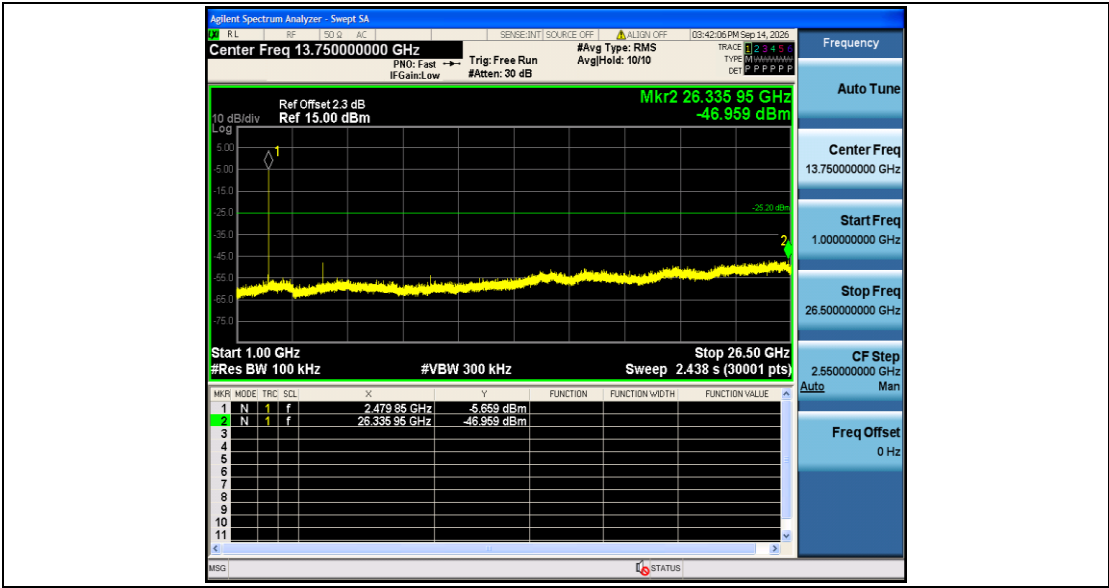
2DH5_Ant1_2480_0~Reference



2DH5_Ant1_2480_30~1000



2DH5_Ant1_2480_1000~26500

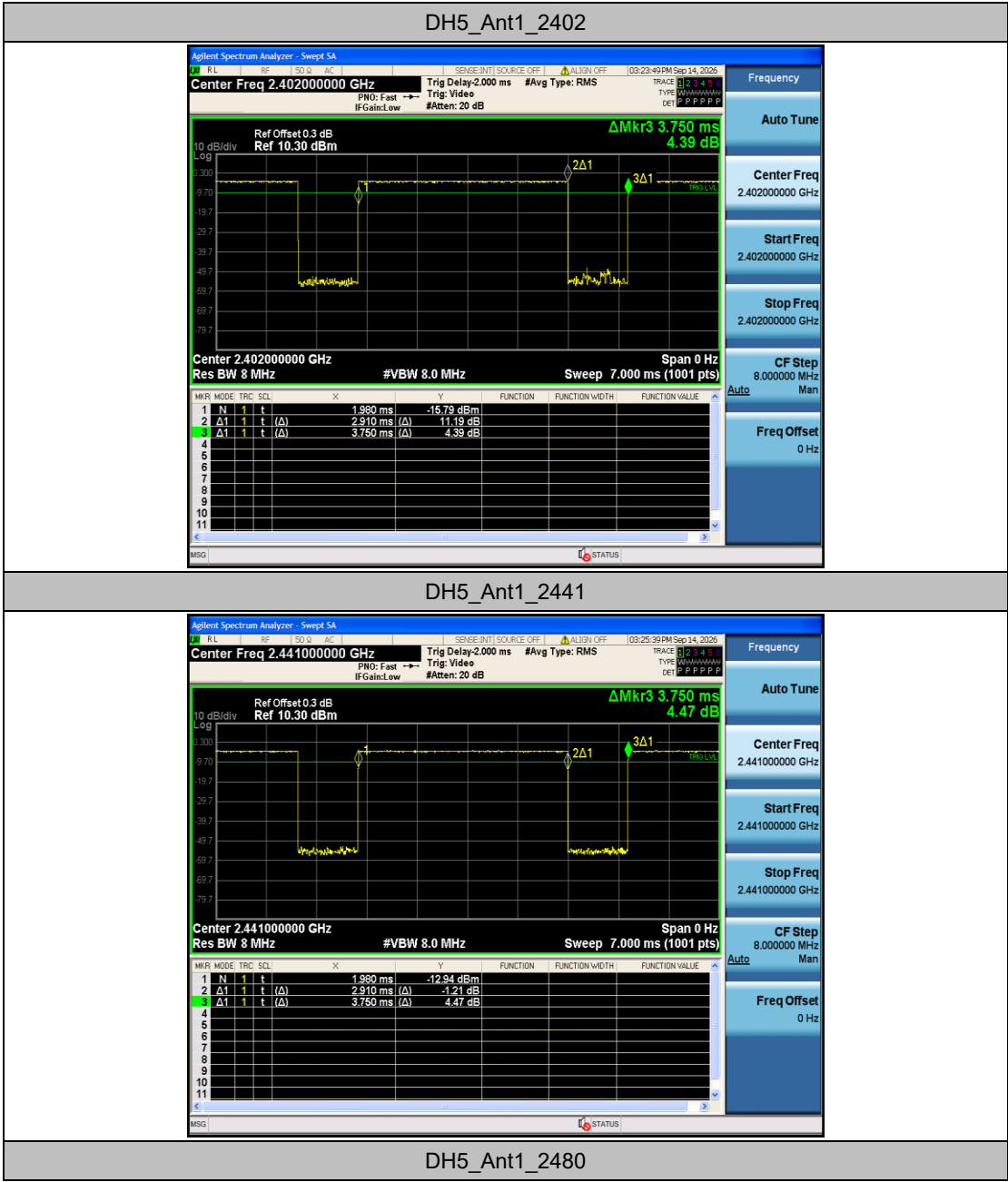


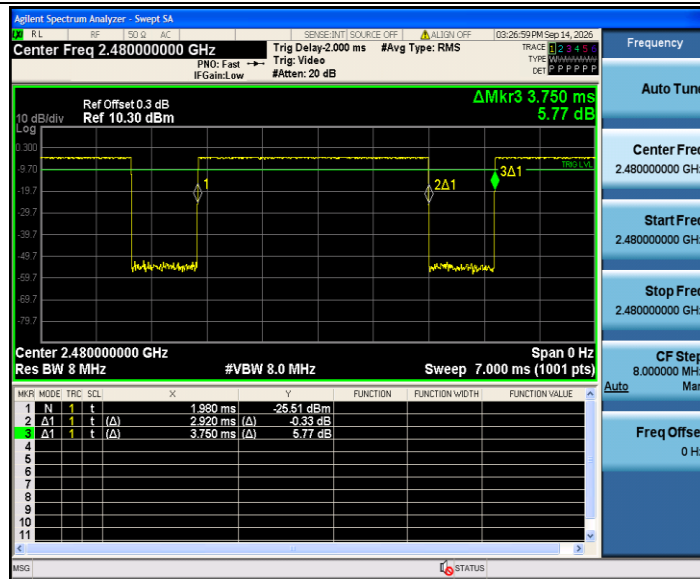
Appendix I: Duty Cycle

Test Result

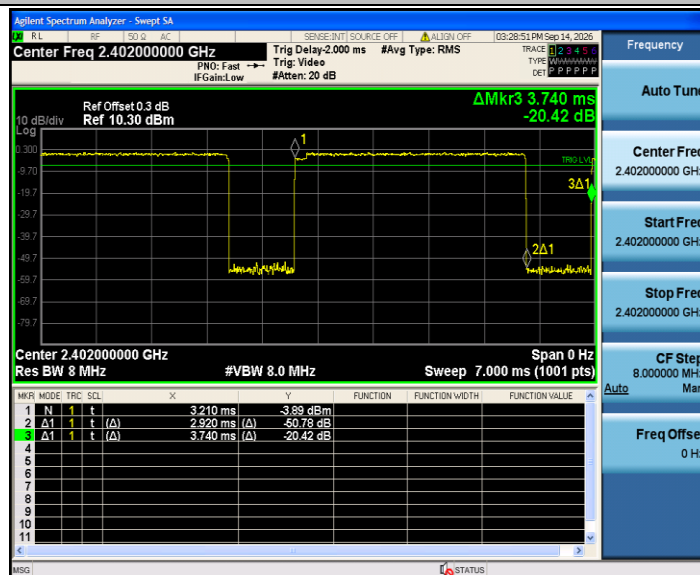
TestMode	Antenna	Freq(MHz)	ON Time [ms]	Period [ms]	DC [%]	xFactor	Limit	Verdict
DH5	Ant1	2402	2.91	3.75	77.60	1.10	---	---
		2441	2.91	3.75	77.60	1.10	---	---
		2480	2.92	3.75	77.87	1.09	---	---
2DH5	Ant1	2402	2.92	3.74	78.07	1.08	---	---
		2441	2.92	3.75	77.87	1.09	---	---
		2480	2.91	3.74	77.81	1.09	---	---

Test Graphs

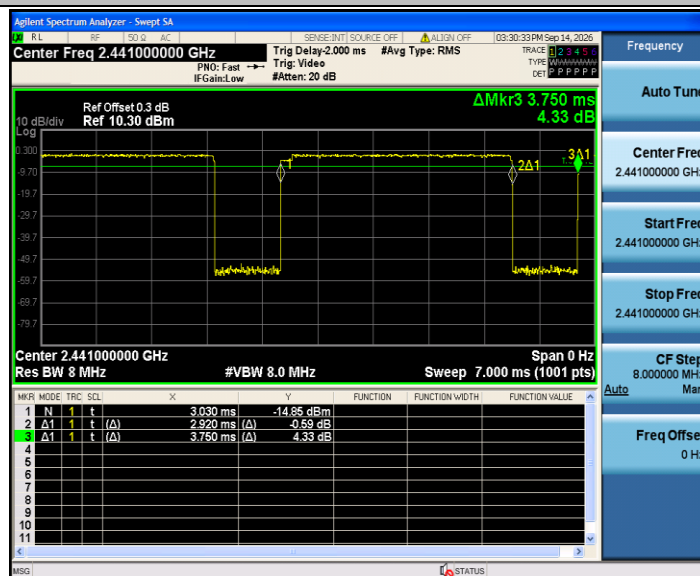




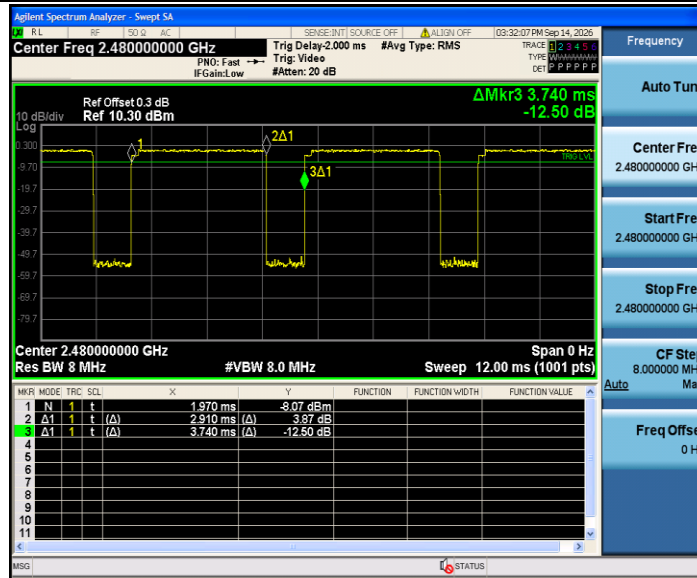
2DH5_Ant1_2402



2DH5_Ant1_2441



2DH5_Ant1_2480



Appendix J: Emissions in Restricted Bands

Test Result

TestMode	Antenna	ChName	Freq(MHz)	Detector	Freq [MHz]	Result [dBm]	Gain [dB]	DC Factor [dB]	Result [dBuV/m]	Limit [dBuV/m]	Verdict
DH5	Ant1	Low	2402	AV	2310.000	-60.99	2.00	1.10	37.31	≤54	PASS
				AV	2382.110	-59.31	2.00	1.10	38.99	≤54	PASS
				AV	2390.000	-60.24	2.00	1.10	38.06	≤54	PASS
				Peak	2310.000	-51.73	2.00	0.00	45.47	≤74	PASS
				Peak	2352.185	-49.54	2.00	0.00	47.66	≤74	PASS
				Peak	2390.000	-50.77	2.00	0.00	46.43	≤74	PASS
		High	2480	AV	2483.500	-58.81	2.00	1.09	39.48	≤54	PASS
				AV	2483.600	-58.54	2.00	1.09	39.75	≤54	PASS
				AV	2500.000	-59.32	2.00	1.09	38.97	≤54	PASS
				Peak	2483.500	-51.33	2.00	0.00	45.87	≤74	PASS
				Peak	2484.880	-48.93	2.00	0.00	48.27	≤74	PASS
				Peak	2500.000	-48.02	2.00	0.00	49.18	≤74	PASS
2DH5	Ant1	Low	2402	AV	2310.000	-61.07	2.00	1.08	37.21	≤54	PASS
				AV	2371.505	-59.11	2.00	1.08	39.17	≤54	PASS
				AV	2390.000	-59.4	2.00	1.08	38.88	≤54	PASS
				Peak	2310.000	-53.51	2.00	0.00	43.69	≤74	PASS
				Peak	2370.455	-48.9	2.00	0.00	48.30	≤74	PASS
				Peak	2390.000	-51.03	2.00	0.00	46.17	≤74	PASS
		High	2480	AV	2483.500	-58.94	2.00	1.09	39.35	≤54	PASS
				AV	2484.640	-58.61	2.00	1.09	39.68	≤54	PASS
				AV	2500.000	-59.46	2.00	1.09	38.83	≤54	PASS
				Peak	2483.500	-51.53	2.00	0.00	45.67	≤74	PASS
				Peak	2491.200	-48.27	2.00	0.00	48.93	≤74	PASS
				Peak	2500.000	-51.68	2.00	0.00	45.52	≤74	PASS

Note:

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

