

Appendix Test Data for BT(BDR/EDR) (Conducted Measurement)

Product Name: Wireless Speaker

Trade Mark: N/A

Test Model: SP-004

FCC ID: 2BCRG-SP004

Environmental Conditions

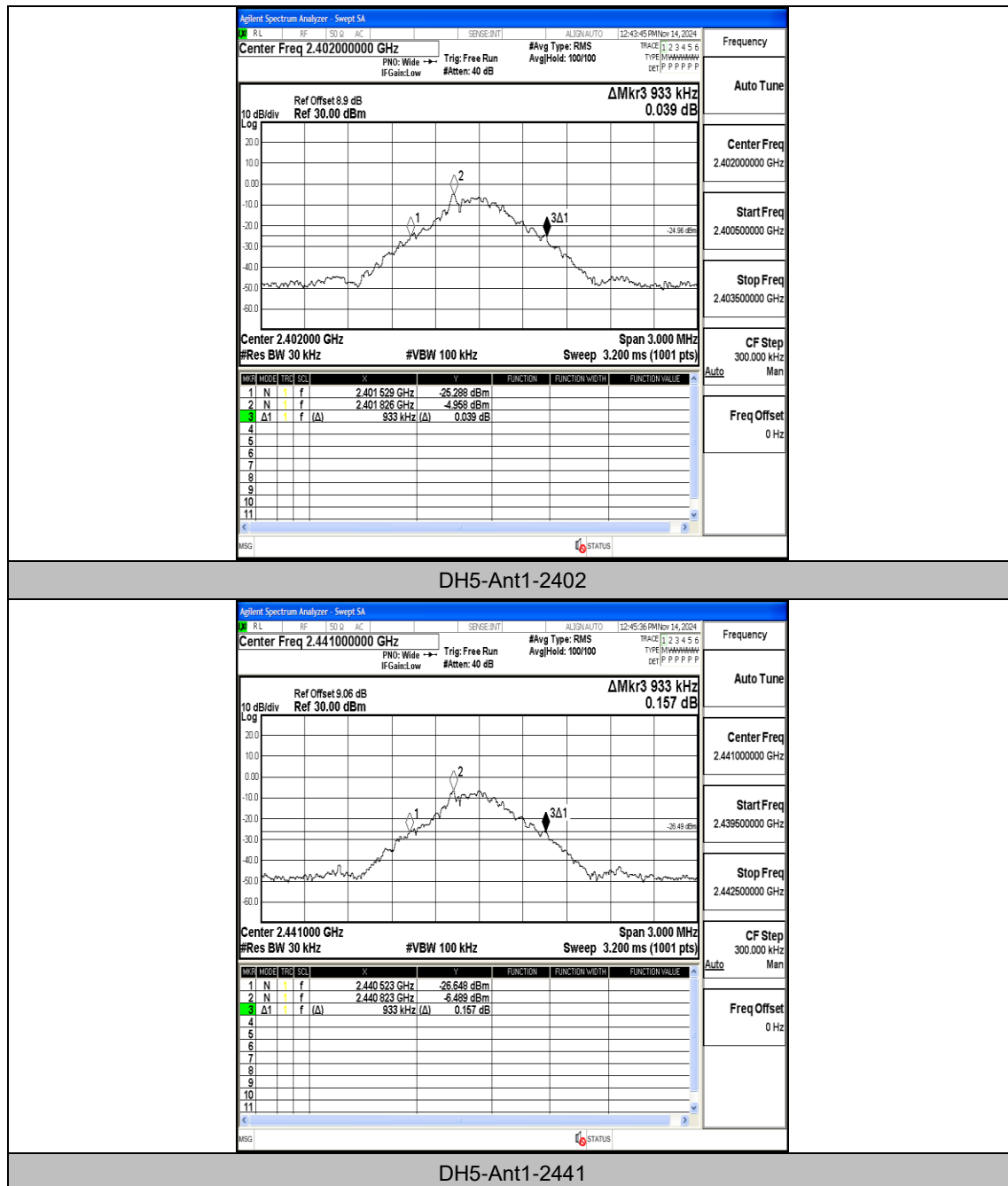
Temperature:	23.5℃
Relative Humidity:	58%
ATM Pressure:	100.0 kPa
Test Engineer:	Allen Lai
Supervised by:	Hugo Chen
NOTE	N/A

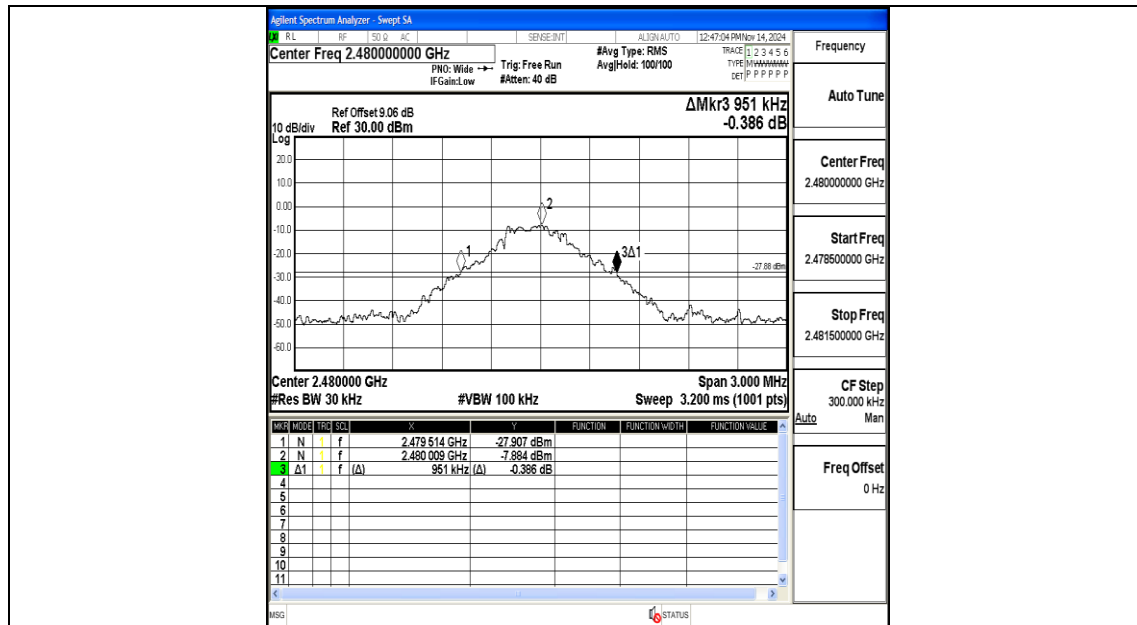
Appendix A: 20dB Emission Bandwidth

Test Result

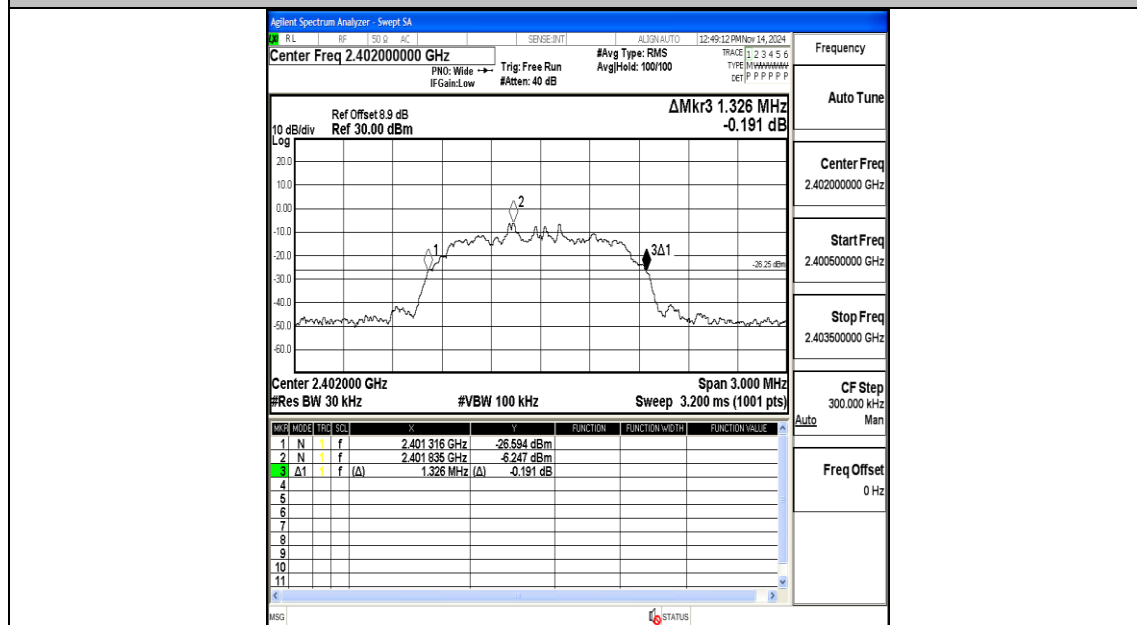
Test Mode	Antenna	Frequency [MHz]	20db EBW [MHz]	FL [MHz]	FH [MHz]	Limit [MHz]	Verdict
DH5	Ant1	2402	0.933	2401.529	2402.462	---	---
DH5	Ant1	2441	0.933	2440.523	2441.456	---	---
DH5	Ant1	2480	0.951	2479.514	2480.465	---	---
2DH5	Ant1	2402	1.326	2401.316	2402.642	---	---
2DH5	Ant1	2441	1.314	2440.319	2441.633	---	---
2DH5	Ant1	2480	1.320	2479.310	2480.630	---	---
3DH5	Ant1	2402	1.302	2401.331	2402.633	---	---
3DH5	Ant1	2441	1.305	2440.325	2441.630	---	---
3DH5	Ant1	2480	1.308	2479.316	2480.624	---	---

Test Graphs

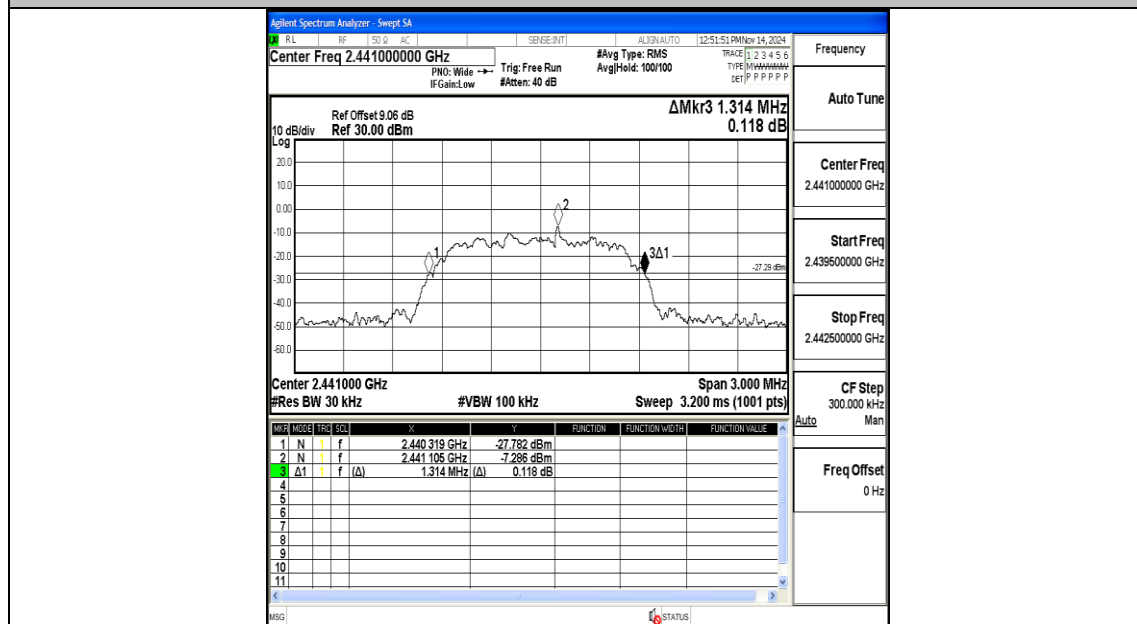




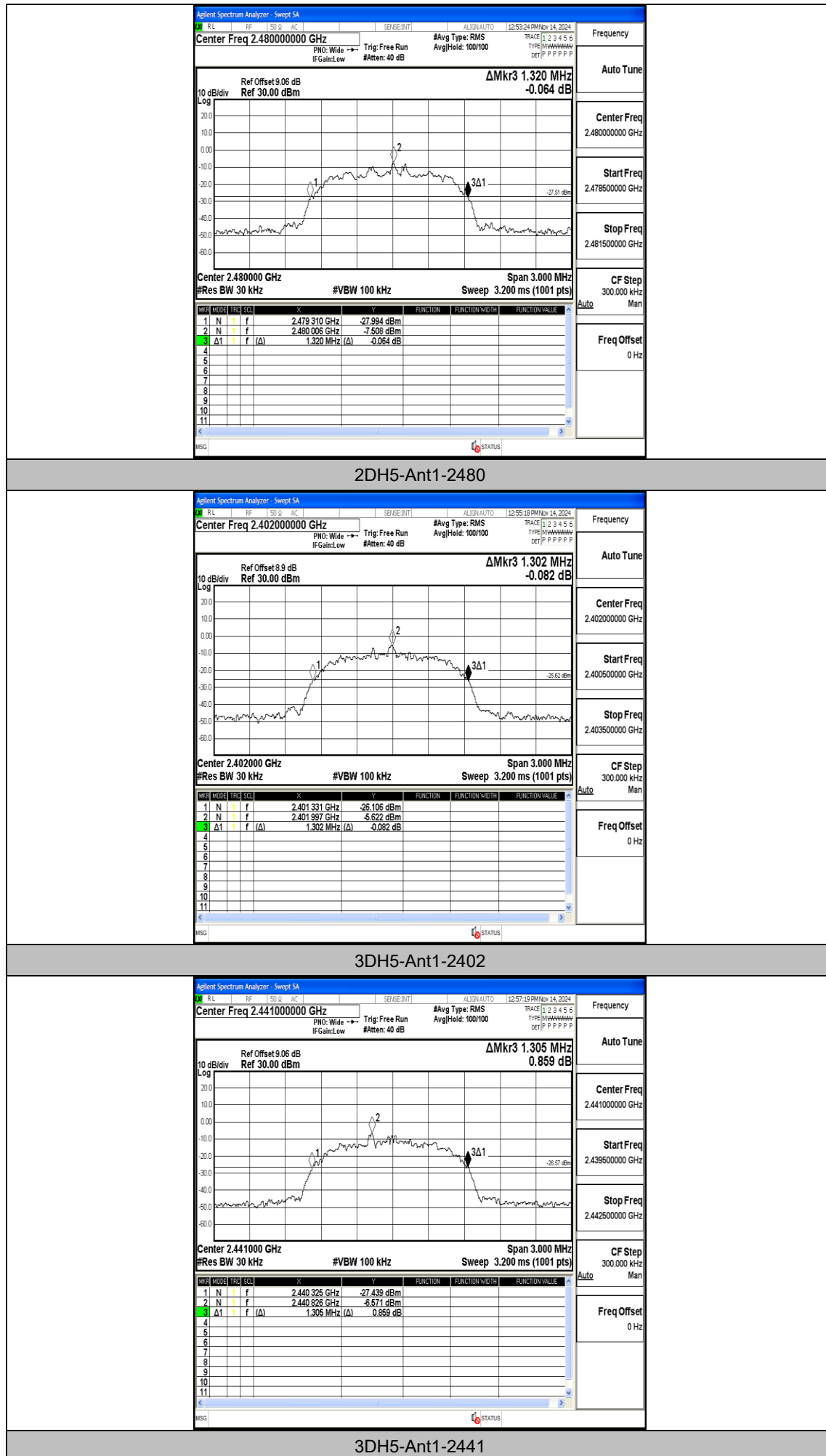
DH5-Ant1-2480

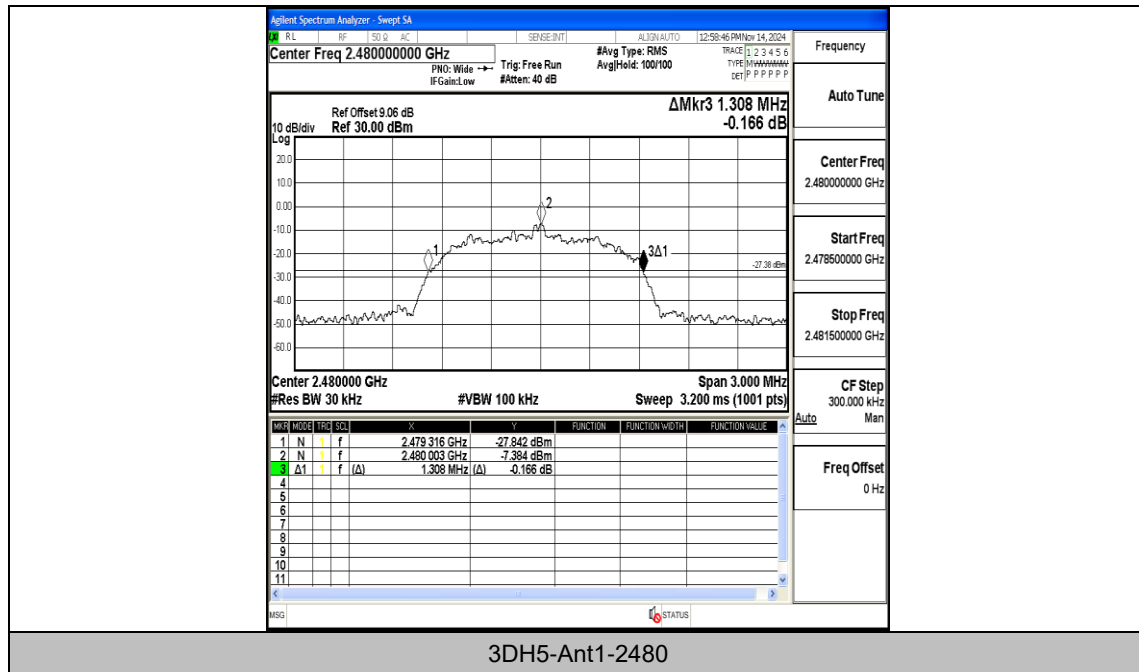


2DH5-Ant1-2402



2DH5-Ant1-2441



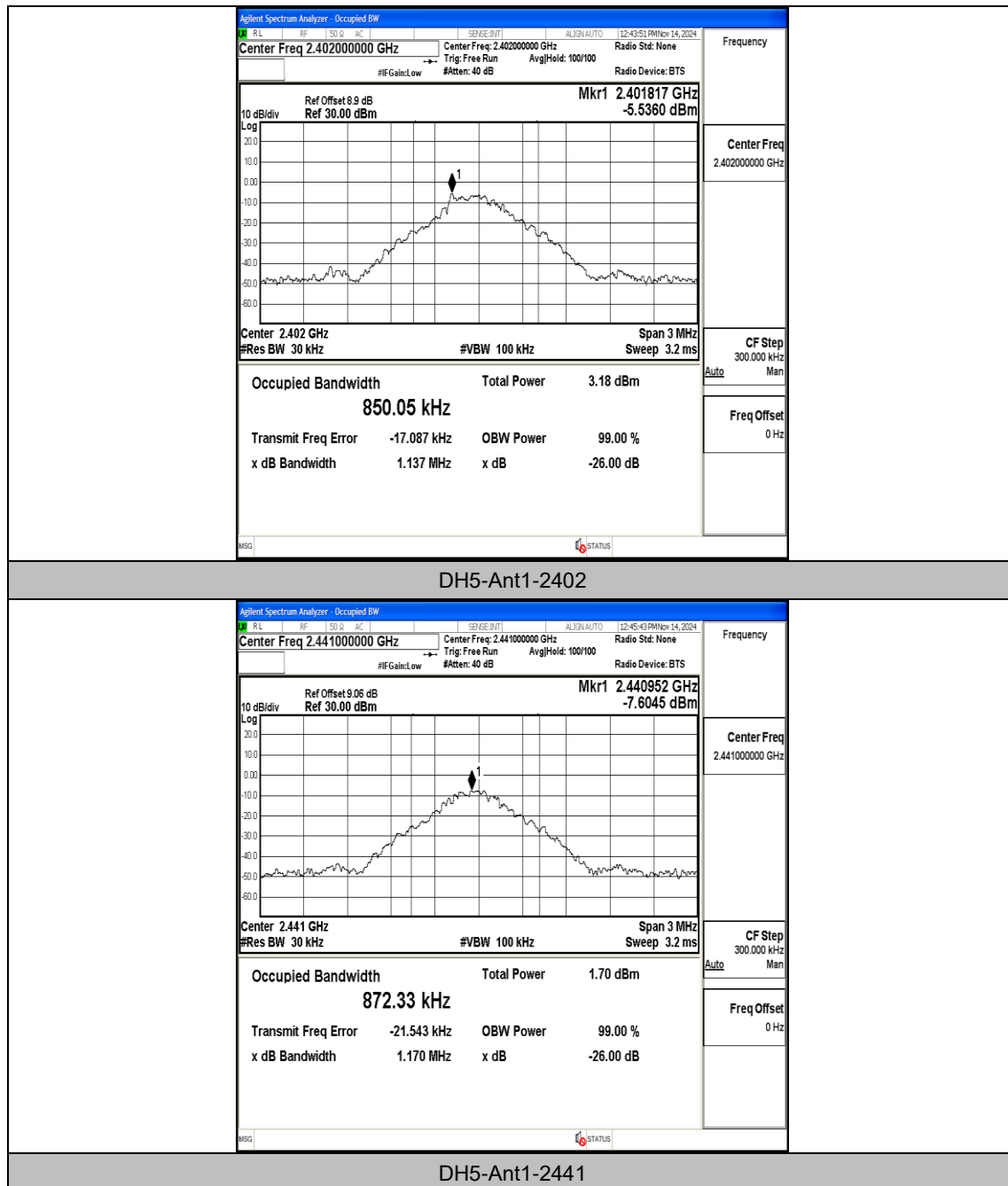


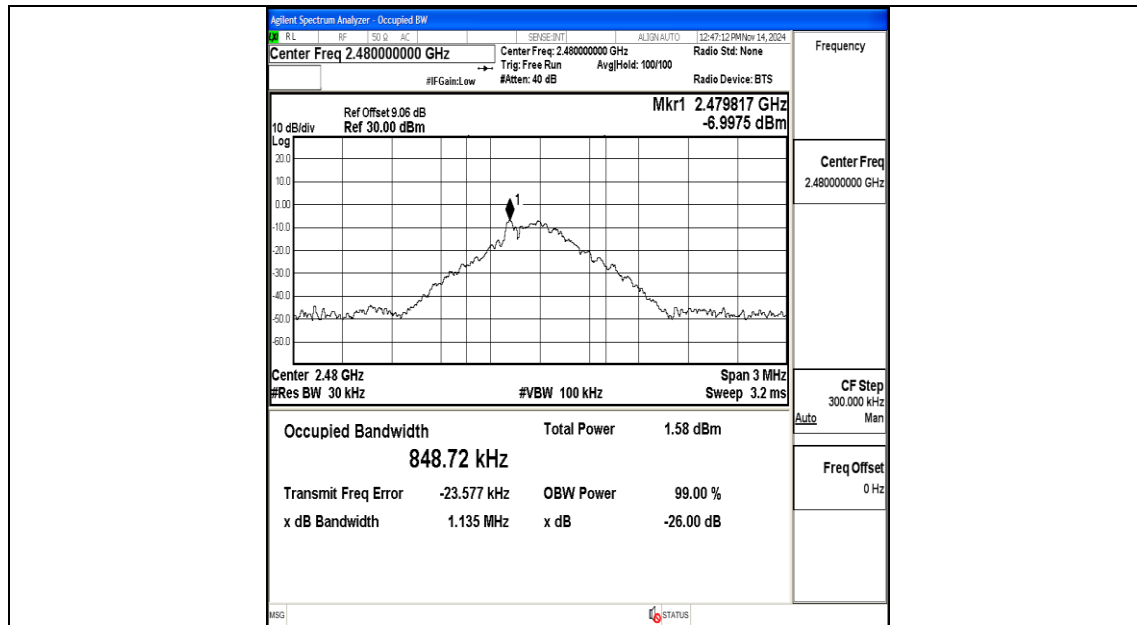
Appendix B: Occupied Channel Bandwidth

Test Result

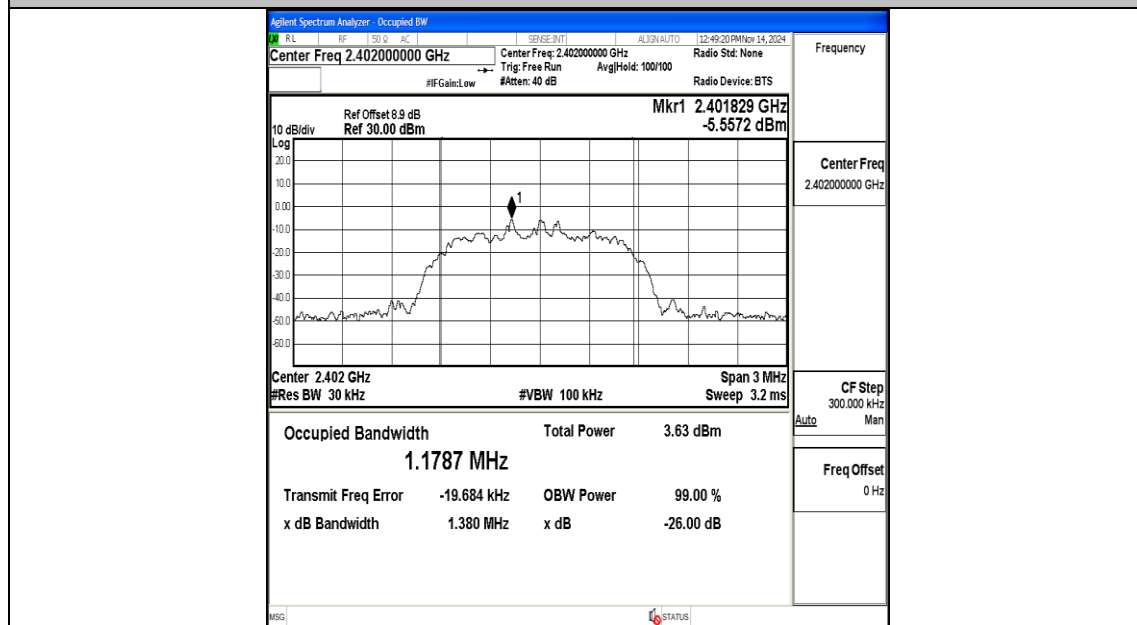
Test Mode	Antenna	Frequency [MHz]	OCB [MHz]	FL [MHz]	FH [MHz]	Limit [MHz]	Verdict
DH5	Ant1	2402	0.85005	2401.5579	2402.4079	---	---
DH5	Ant1	2441	0.87233	2440.5423	2441.4146	---	---
DH5	Ant1	2480	0.84872	2479.5521	2480.4008	---	---
2DH5	Ant1	2402	1.1787	2401.3910	2402.5697	---	---
2DH5	Ant1	2441	1.1807	2440.3886	2441.5693	---	---
2DH5	Ant1	2480	1.1998	2479.3763	2480.5761	---	---
3DH5	Ant1	2402	1.1722	2401.3982	2402.5704	---	---
3DH5	Ant1	2441	1.1860	2440.3915	2441.5775	---	---
3DH5	Ant1	2480	1.1998	2479.3807	2480.5805	---	---

Test Graphs

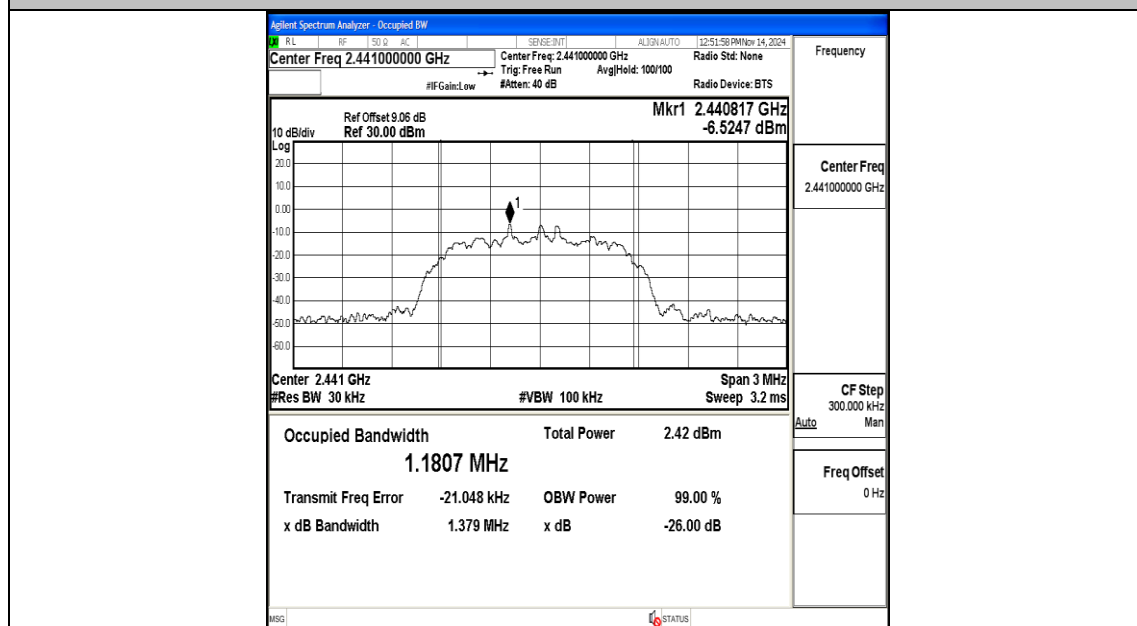




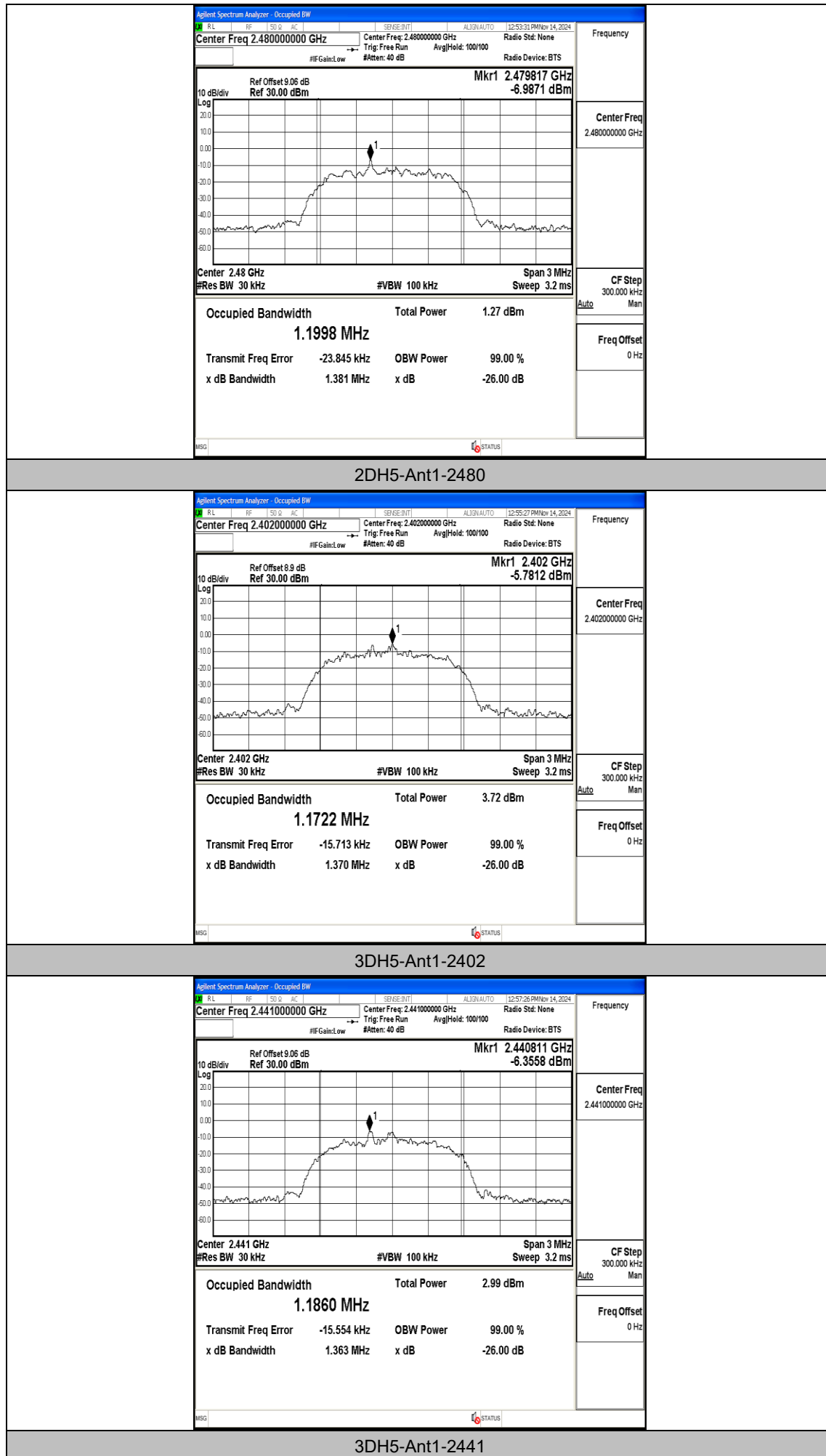
DH5-Ant1-2480

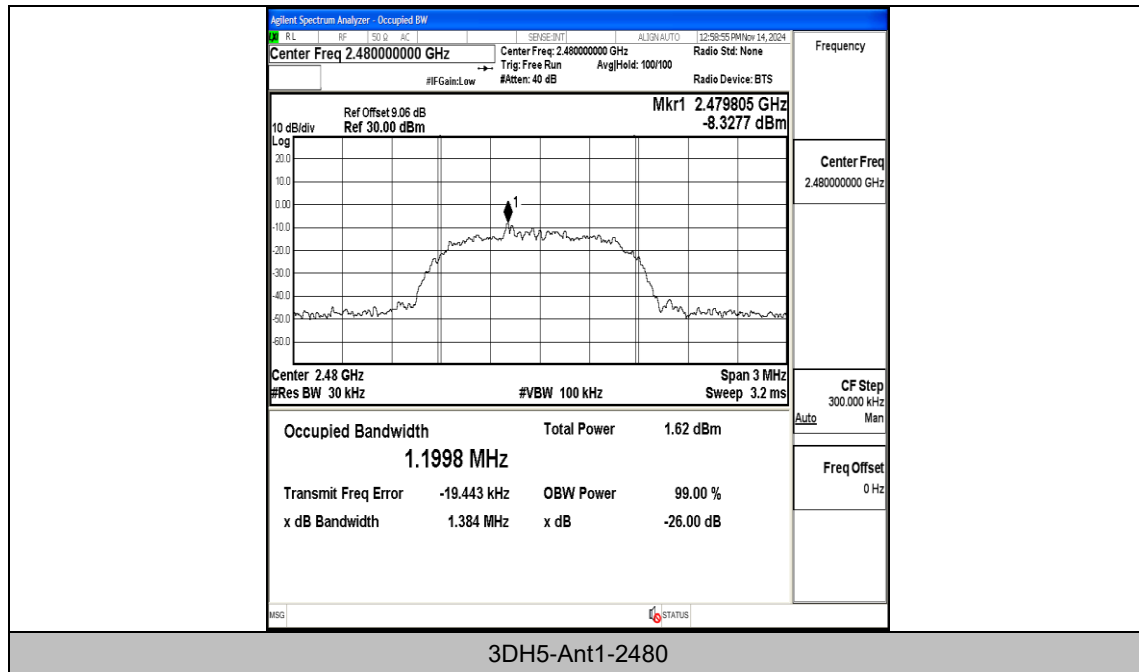


2DH5-Ant1-2402



2DH5-Ant1-2441



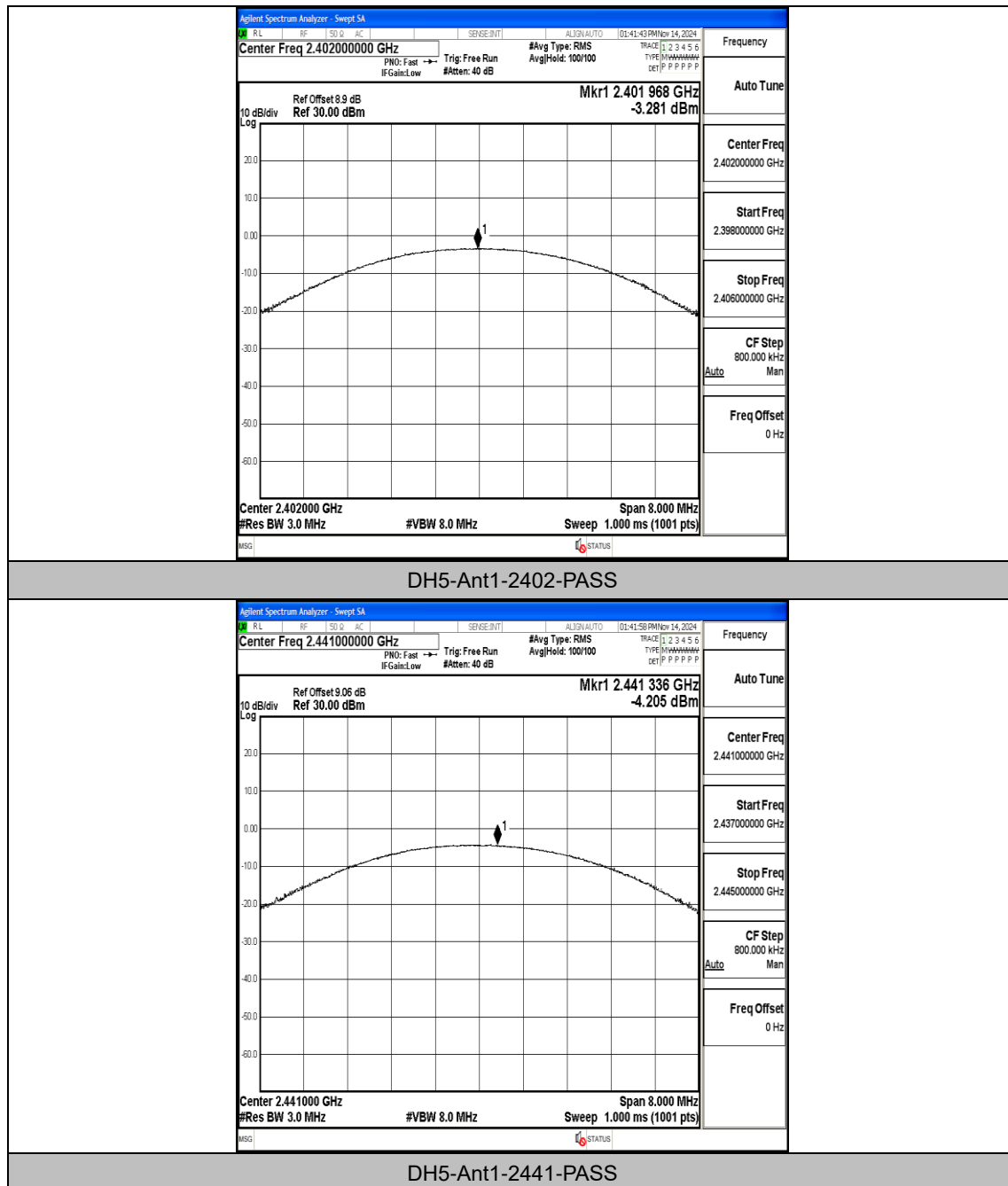


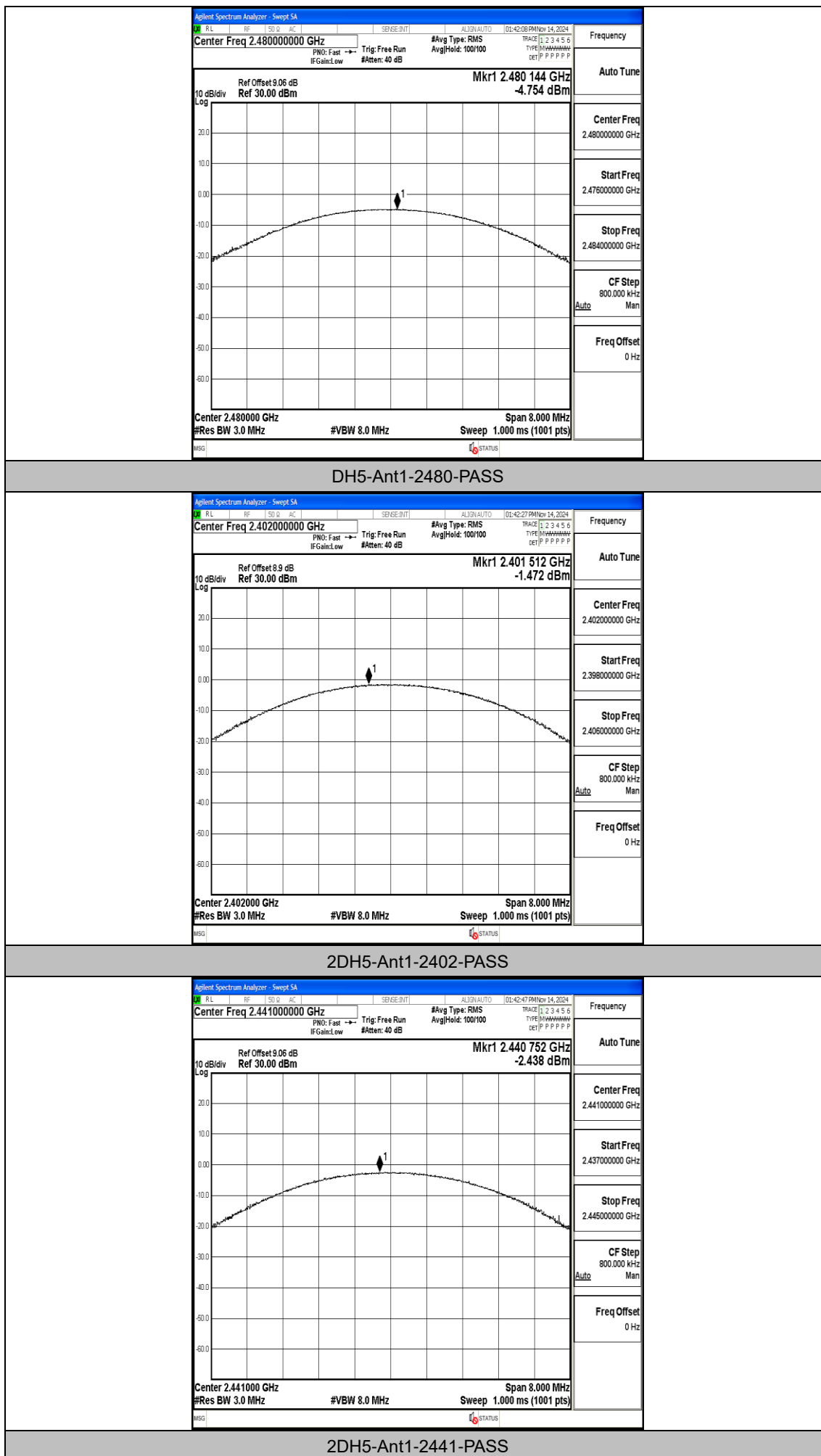
Appendix C: Maximum peak conducted output power

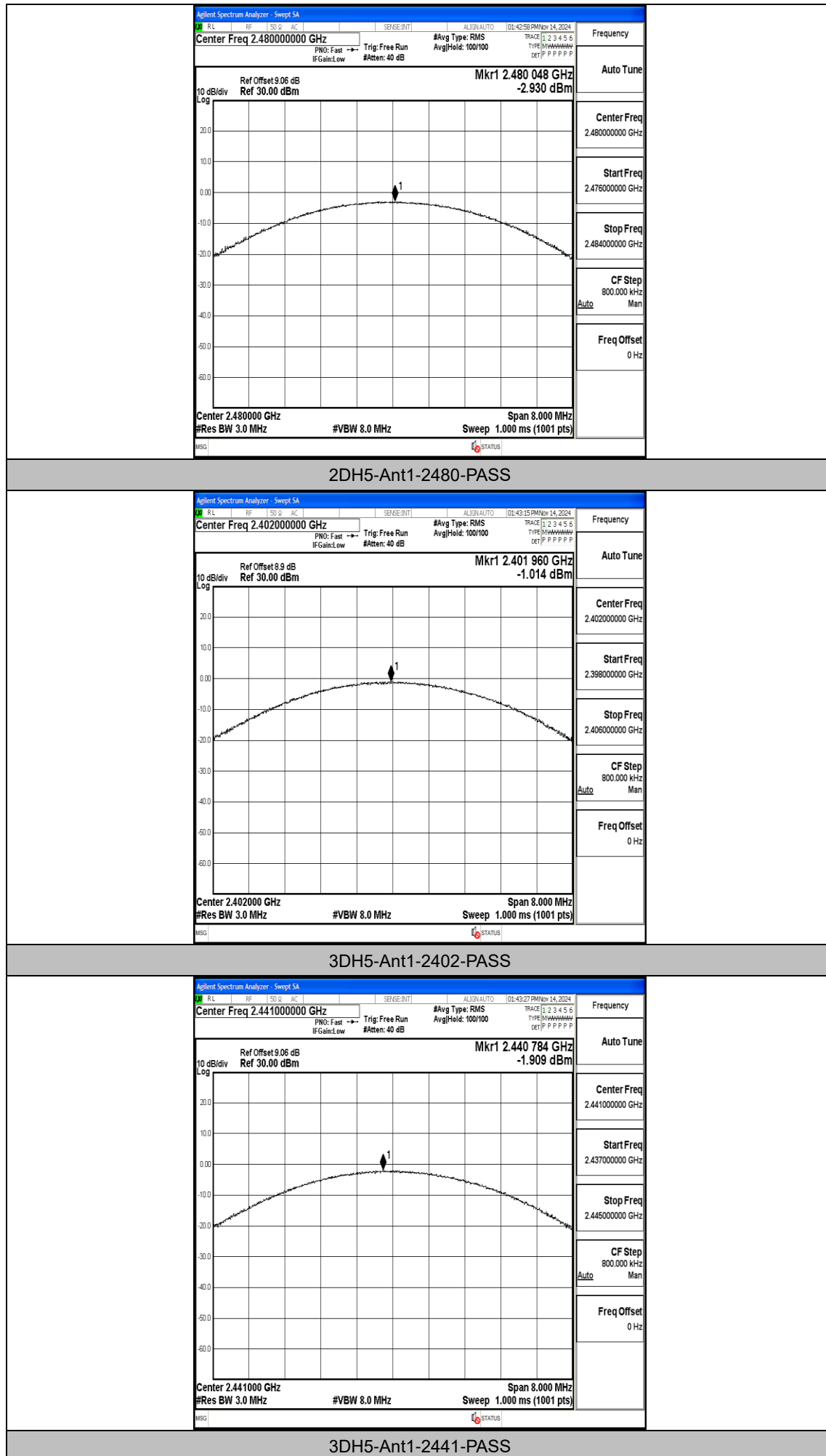
Test Result

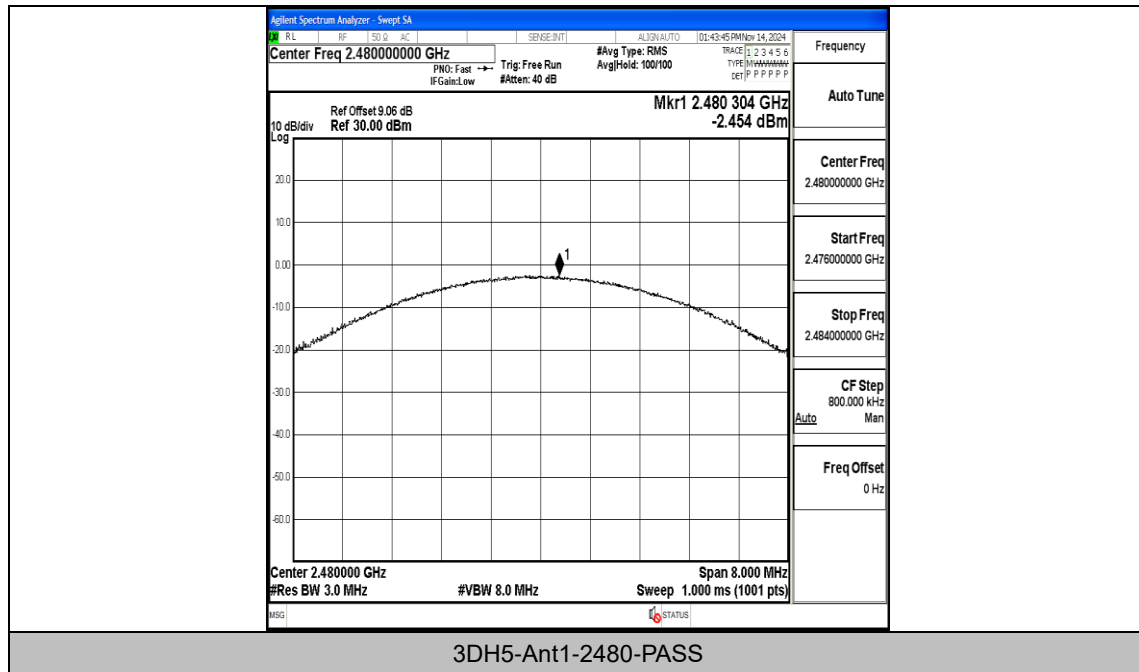
Test Mode	Antenna	Frequency [MHz]	Conducted Peak Power [dBm]	Conducted Limit [dBm]	Verdict
DH5	Ant1	2402	-3.28	≤30.00	PASS
DH5	Ant1	2441	-4.21	≤30.00	PASS
DH5	Ant1	2480	-4.75	≤30.00	PASS
2DH5	Ant1	2402	-1.47	≤20.97	PASS
2DH5	Ant1	2441	-2.44	≤20.97	PASS
2DH5	Ant1	2480	-2.93	≤20.97	PASS
3DH5	Ant1	2402	-1.01	≤20.97	PASS
3DH5	Ant1	2441	-1.91	≤20.97	PASS
3DH5	Ant1	2480	-2.45	≤20.97	PASS

Test Graphs







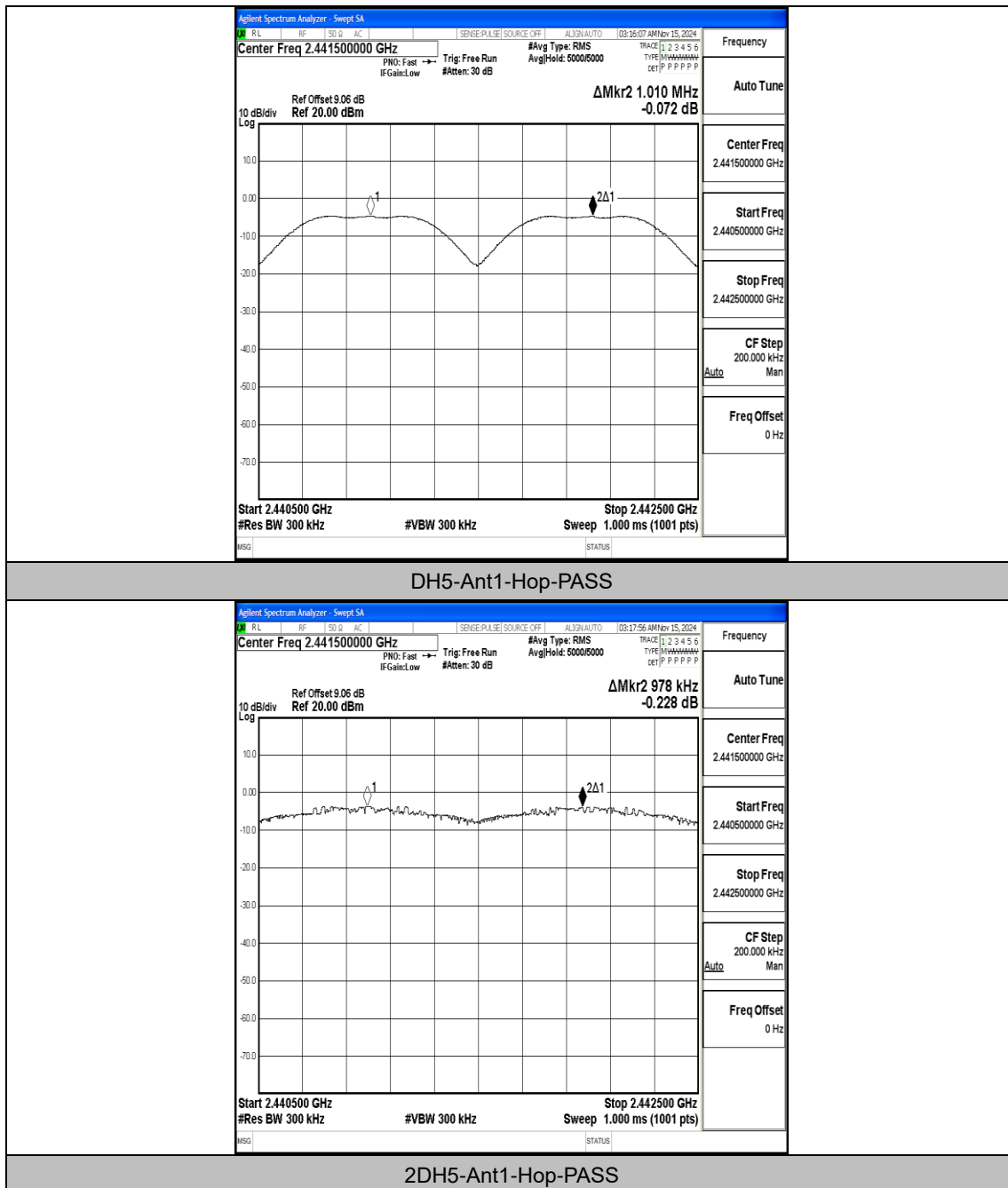


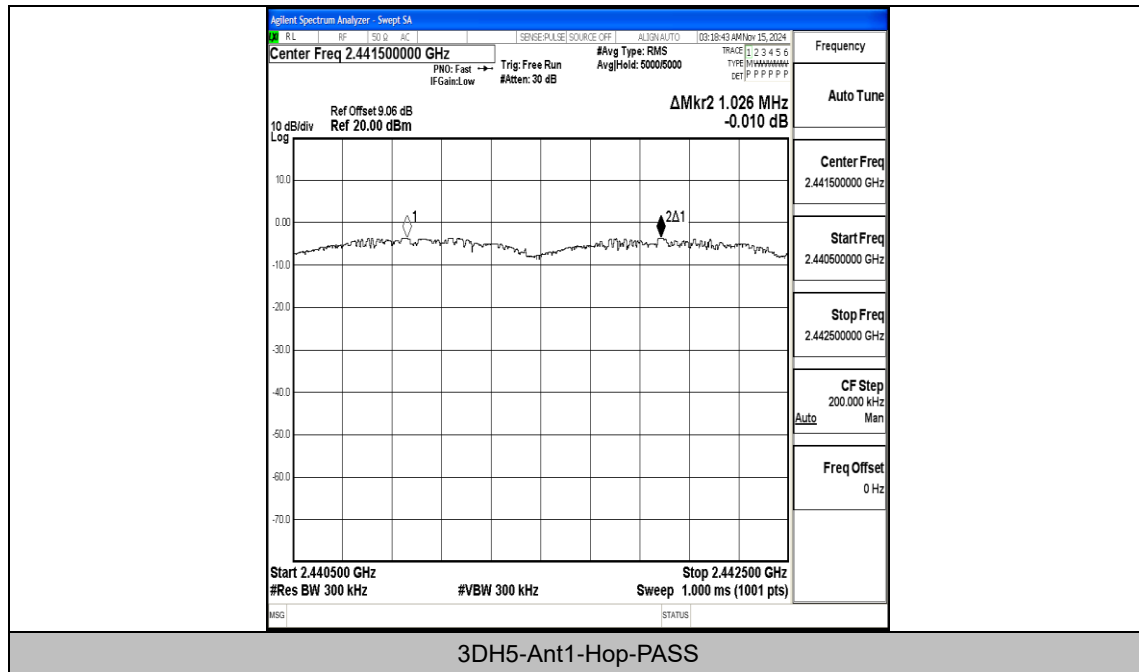
Appendix D: Carrier frequency separation

Test Result

Test Mode	Antenna	Frequency [MHz]	Result [MHz]	Limit [MHz]	Verdict
DH5	Ant1	Hop	1.01	≥ 0.951	PASS
2DH5	Ant1	Hop	0.978	≥ 0.884	PASS
3DH5	Ant1	Hop	1.026	≥ 0.872	PASS

Test Graphs



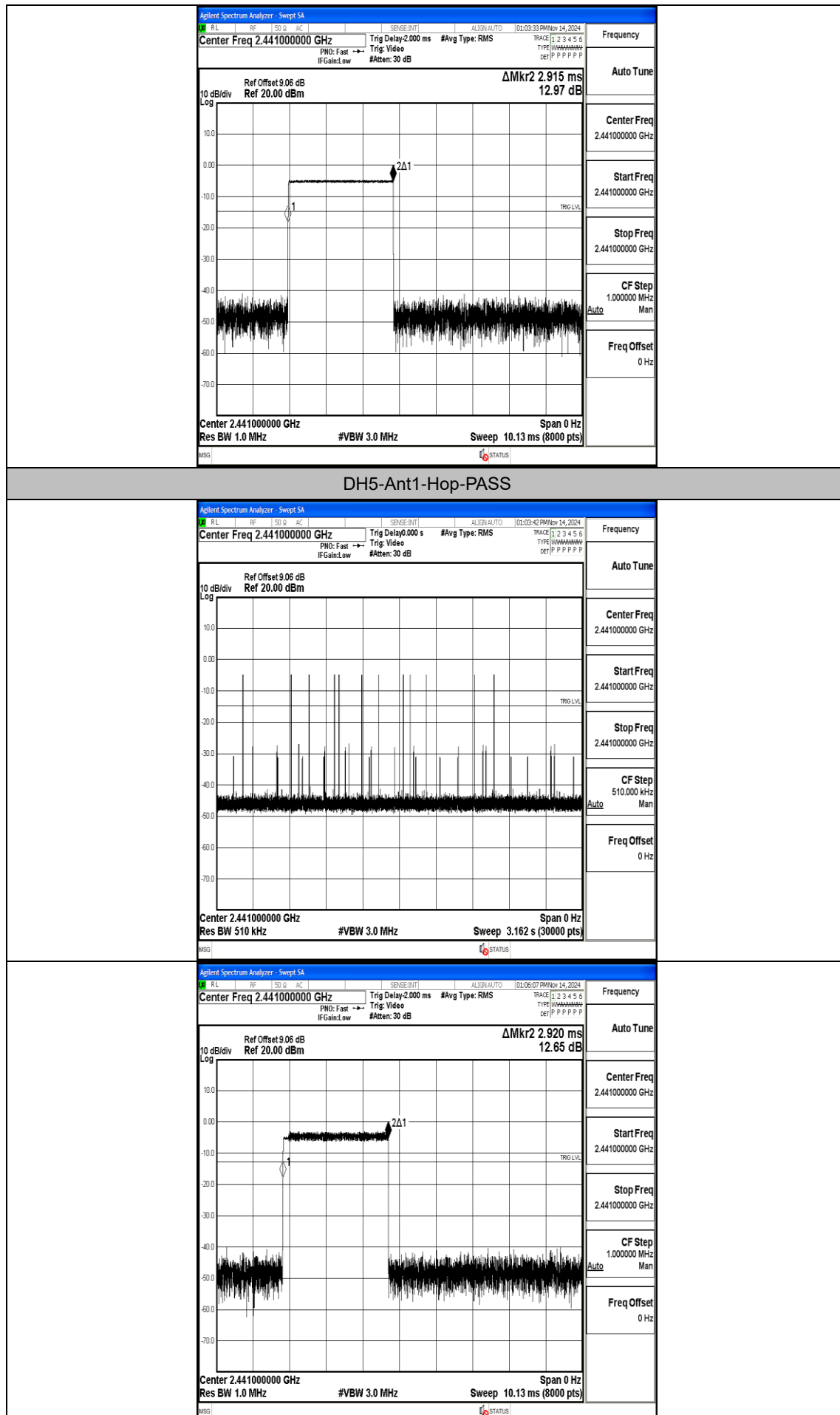


Appendix E: Time of occupancy

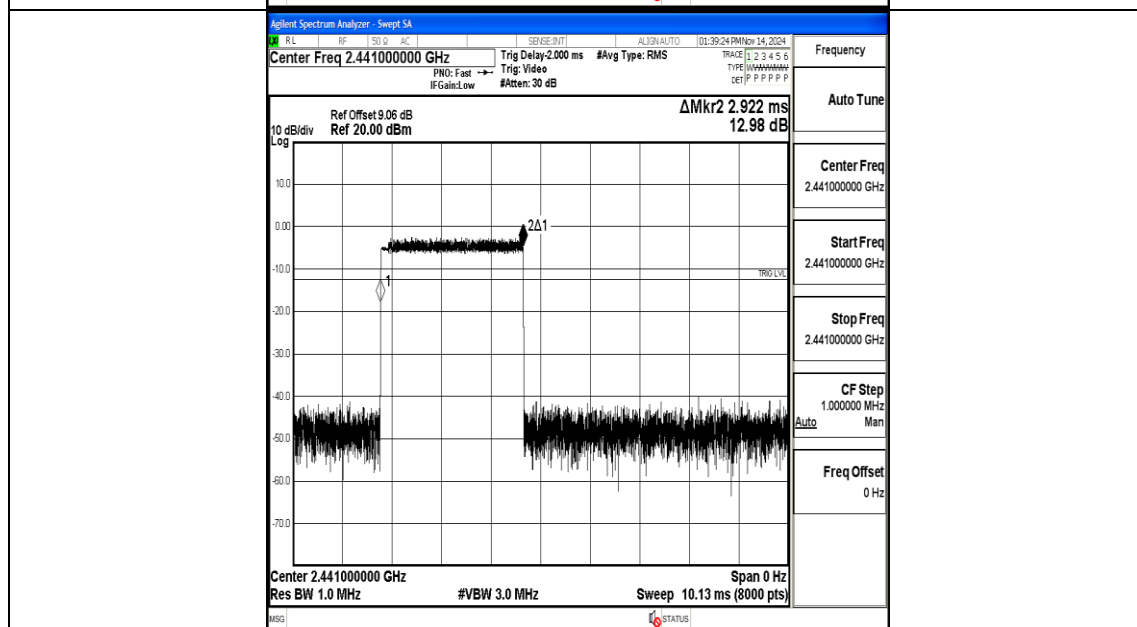
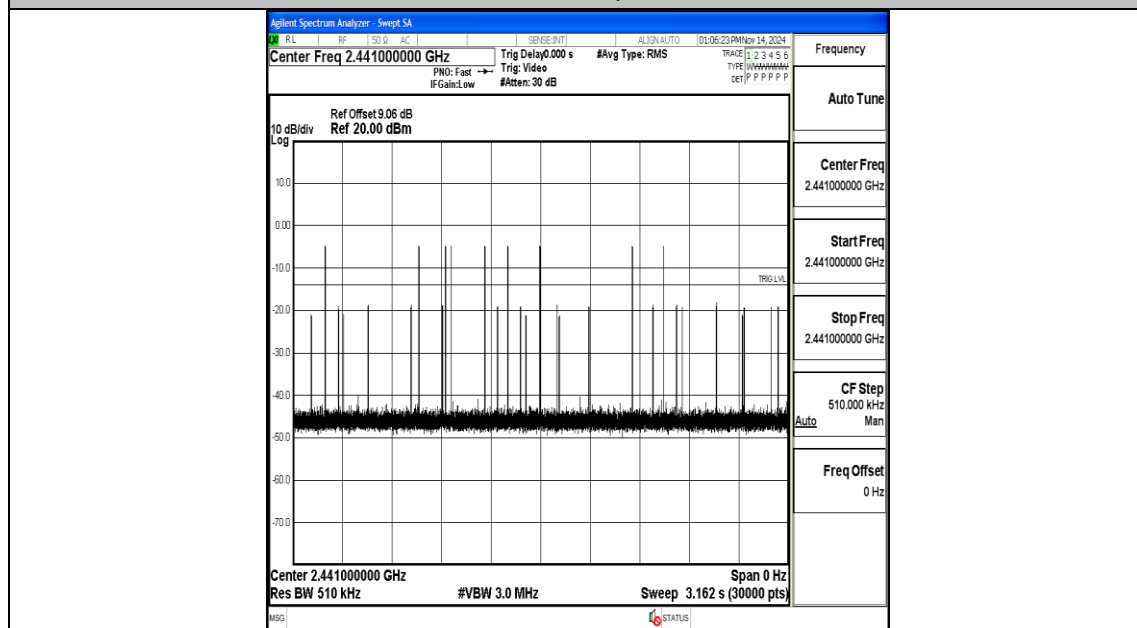
Test Result

Test Mode	Antenna	Frequency [MHz]	Burst Width [ms]	TotalHops [Num]	Result [s]	Limit [s]	Verdict
DH5	Ant1	Hop	2.915	130	0.379	≤0.4	PASS
2DH5	Ant1	Hop	2.920	100	0.292	≤0.4	PASS
3DH5	Ant1	Hop	2.922	40	0.117	≤0.4	PASS

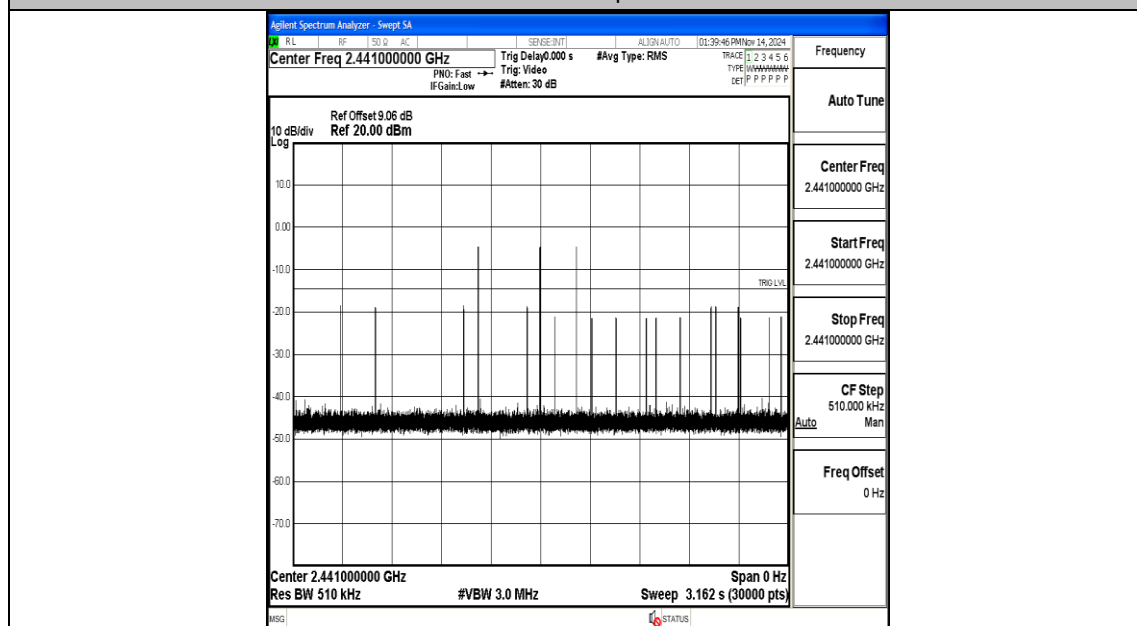
Test Graphs



2DH5-Ant1-Hop-PASS



3DH5-Ant1-Hop-PASS

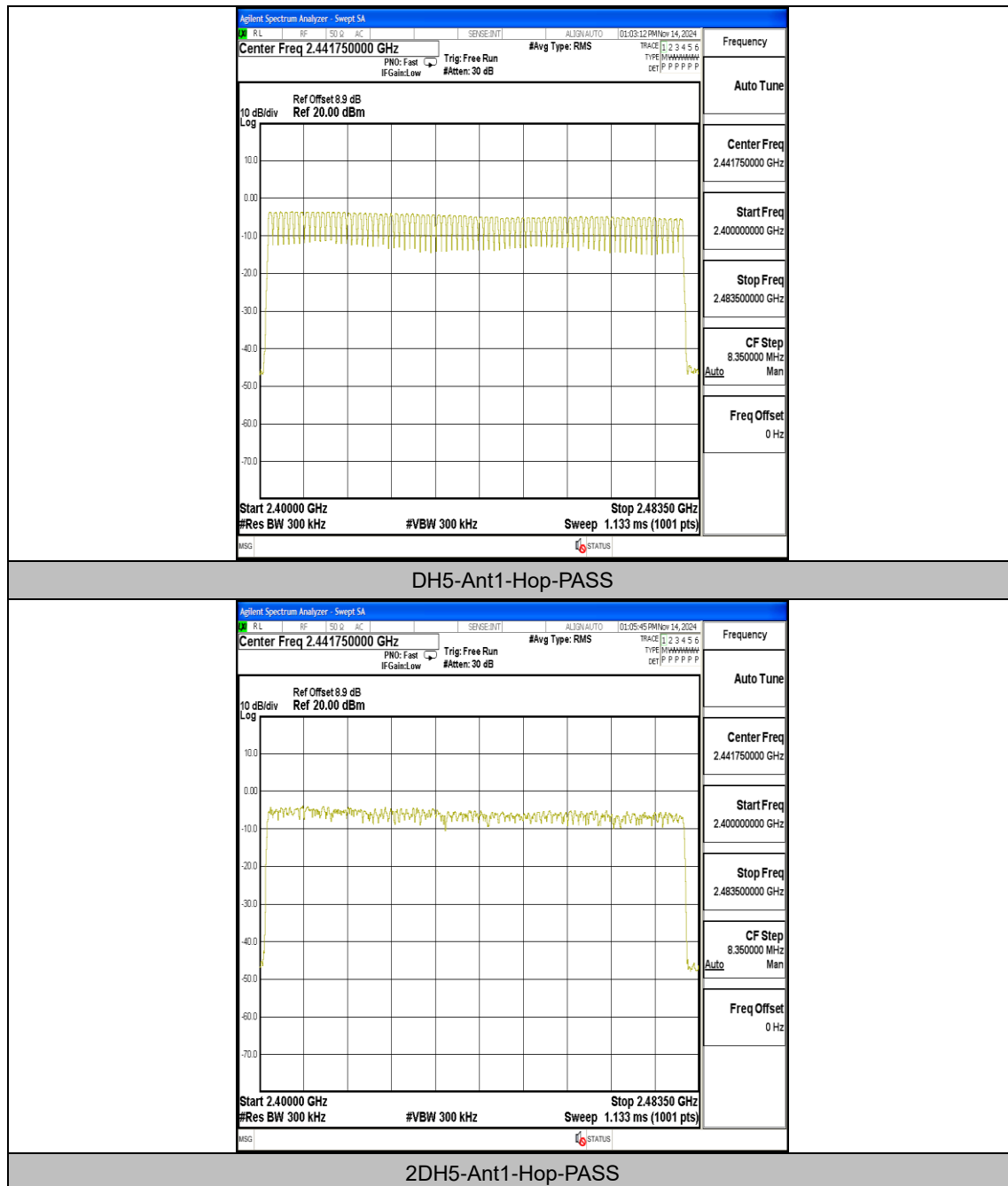


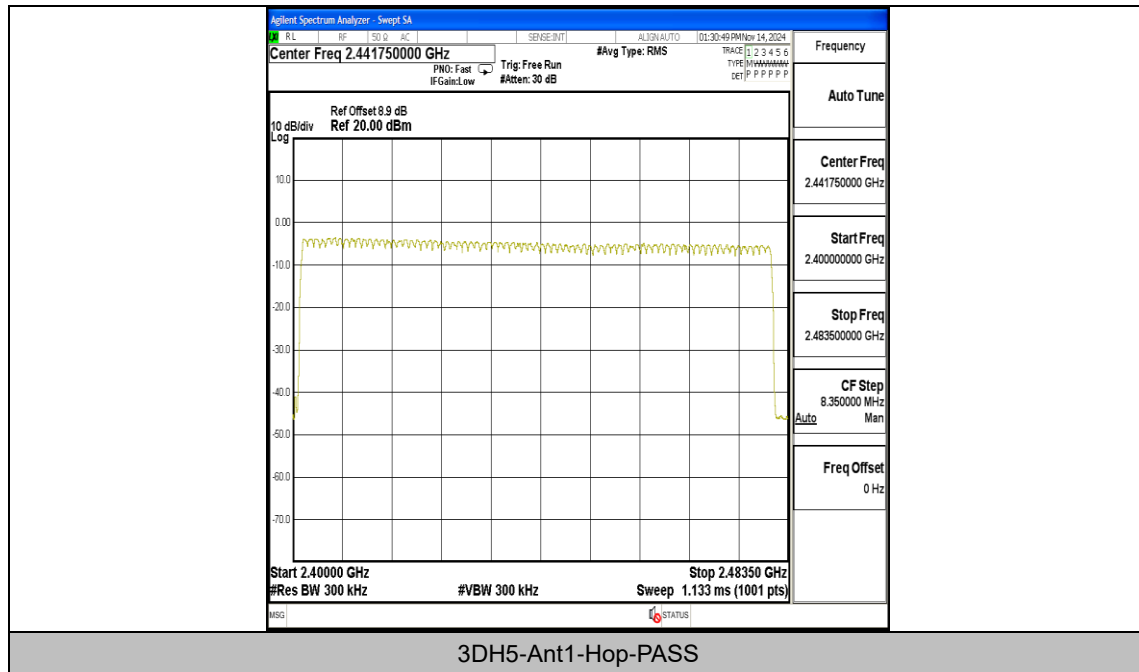
Appendix F: Number of hopping channels

Test Result

Test Mode	Antenna	Frequency [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



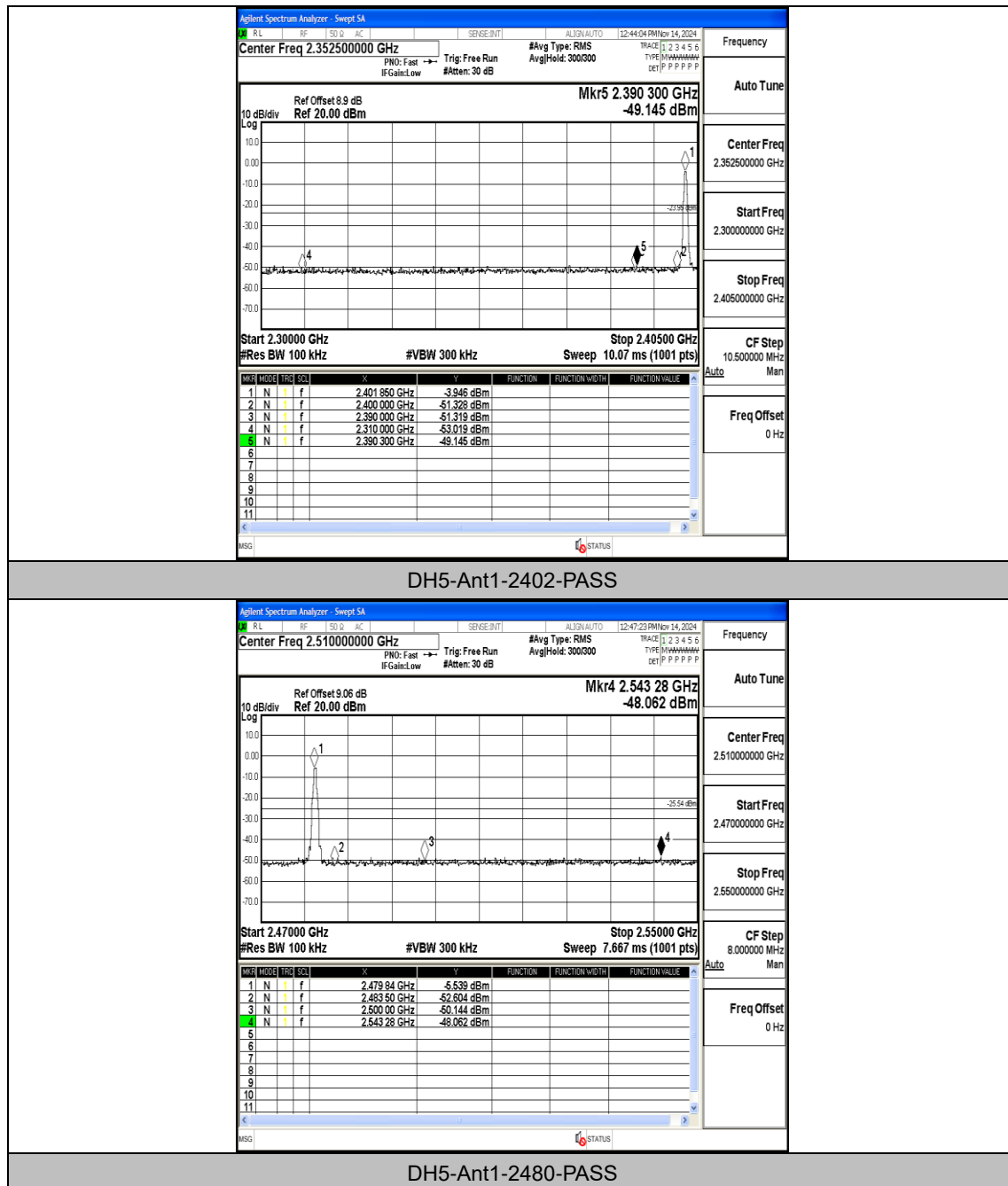


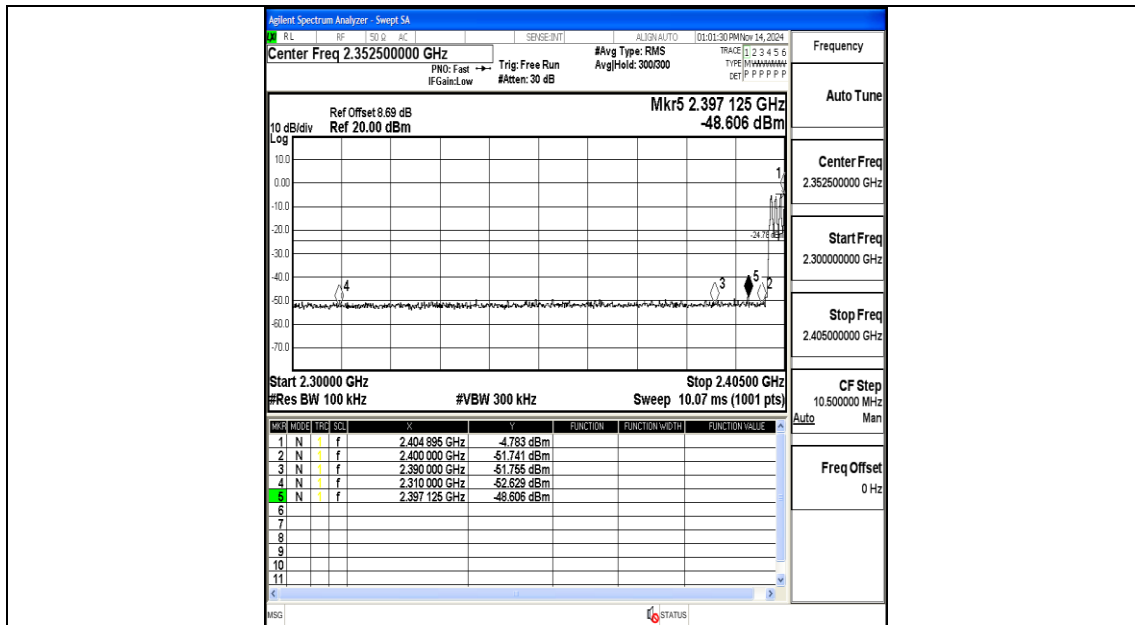
Appendix G: Band edge measurements

Test Result

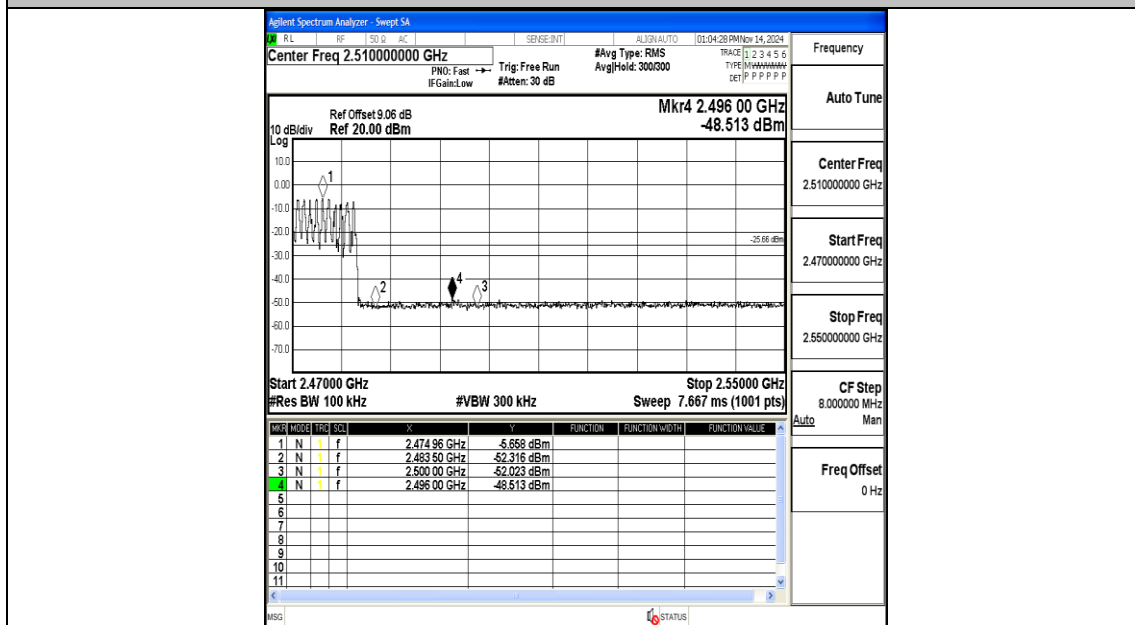
Test Mode	Antenna	Ch.Name	Frequency [MHz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	Low	2402	-3.95	-49.15	≤ -23.95	PASS
DH5	Ant1	High	2480	-5.54	-48.06	≤ -25.54	PASS
DH5	Ant1	Low	Hop_2402	-4.78	-48.61	≤ -24.78	PASS
DH5	Ant1	High	Hop_2480	-5.66	-48.51	≤ -25.66	PASS
2DH5	Ant1	Low	2402	-4.21	-49.3	≤ -24.21	PASS
2DH5	Ant1	High	2480	-5.64	-48.2	≤ -25.64	PASS
2DH5	Ant1	Low	Hop_2402	-6.86	-49.19	≤ -26.86	PASS
2DH5	Ant1	High	Hop_2480	-6.89	-48.25	≤ -26.89	PASS
3DH5	Ant1	Low	2402	-3.84	-48.87	≤ -23.84	PASS
3DH5	Ant1	High	2480	-5.54	-48.62	≤ -25.54	PASS
3DH5	Ant1	Low	Hop_2402	-7.05	-49.7	≤ -27.05	PASS
3DH5	Ant1	High	Hop_2480	-5.91	-48.79	≤ -25.91	PASS

Test Graphs

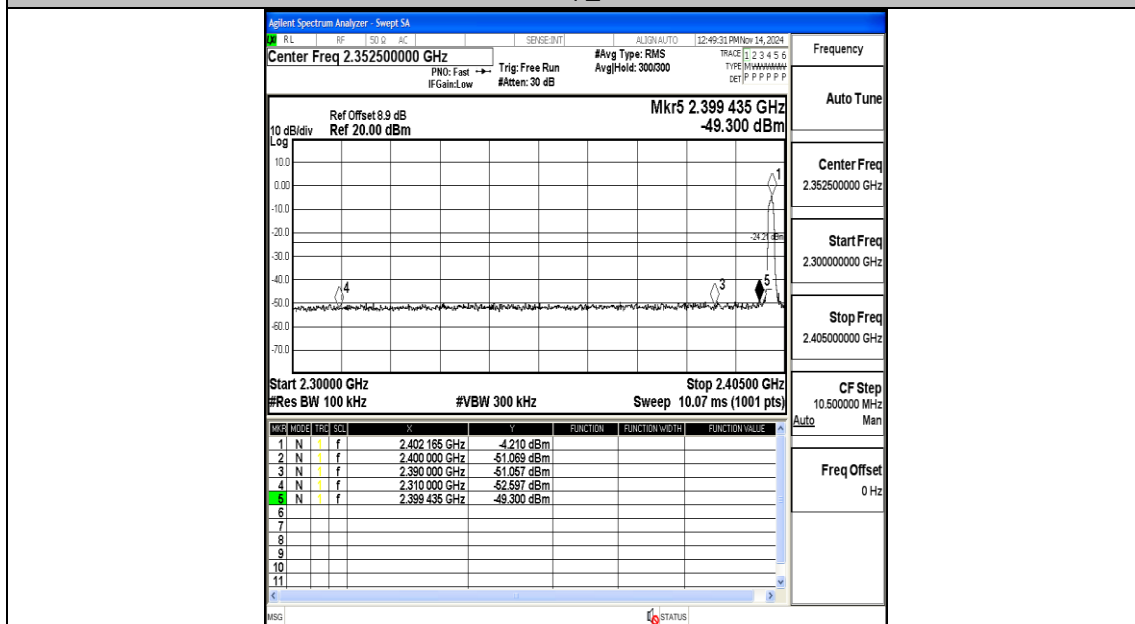




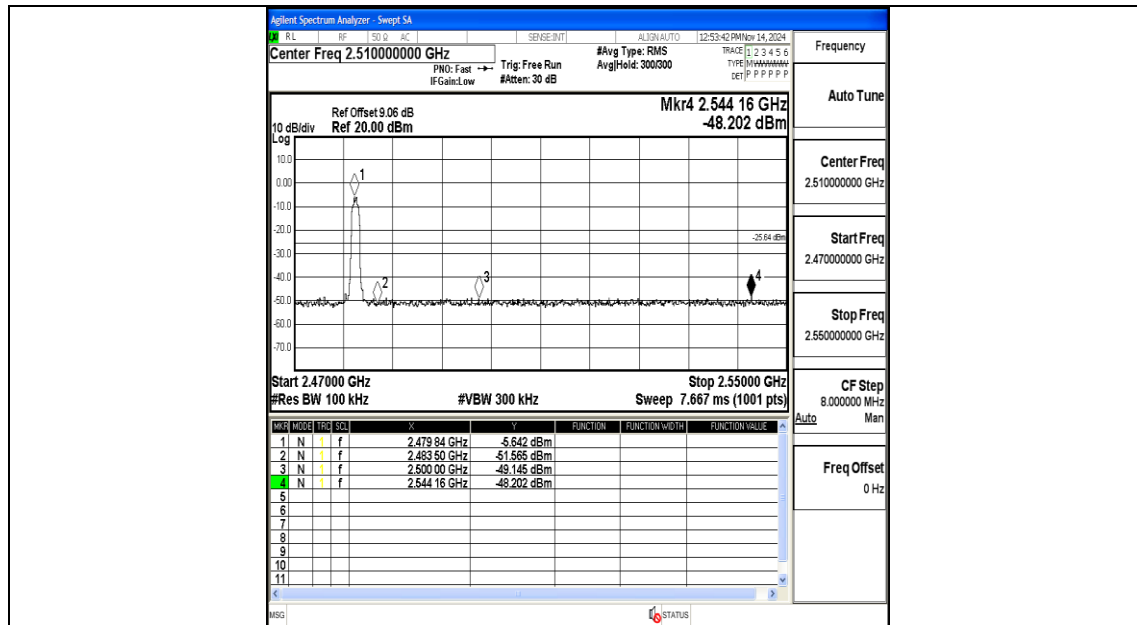
DH5-Ant1-Hop_2402-PASS



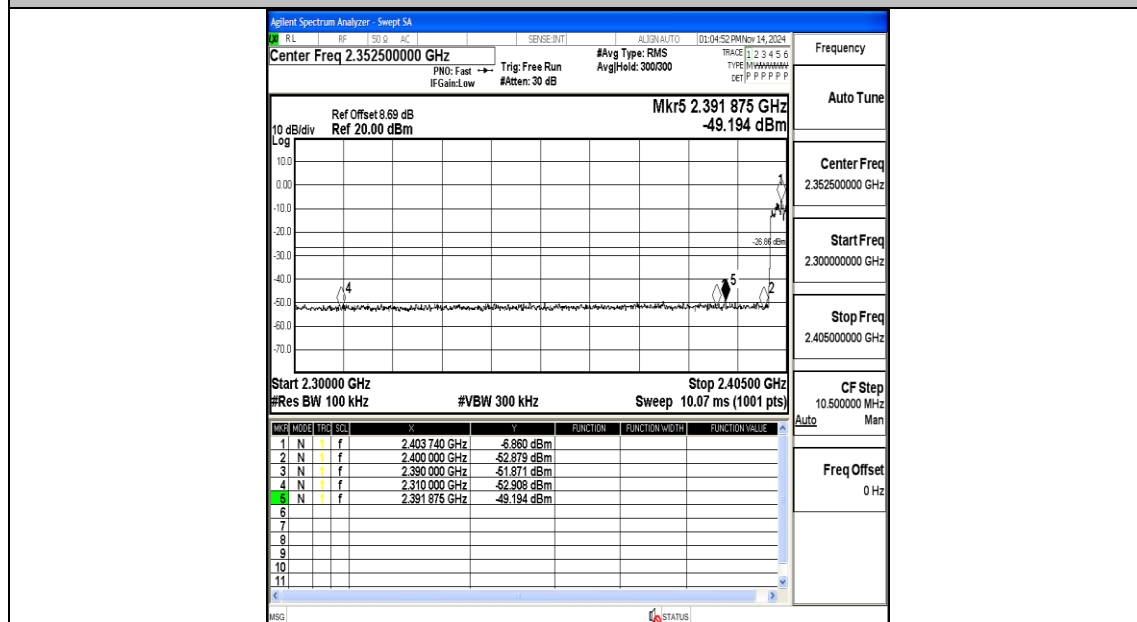
DH5-Ant1-Hop_2480-PASS



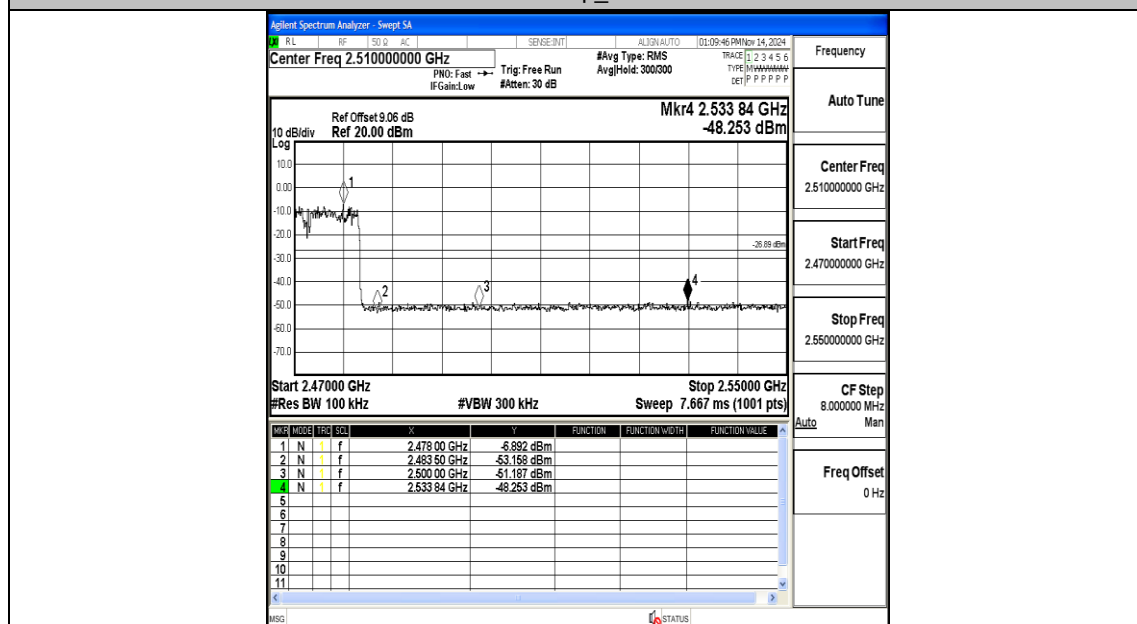
2DH5-Ant1-2402-PASS



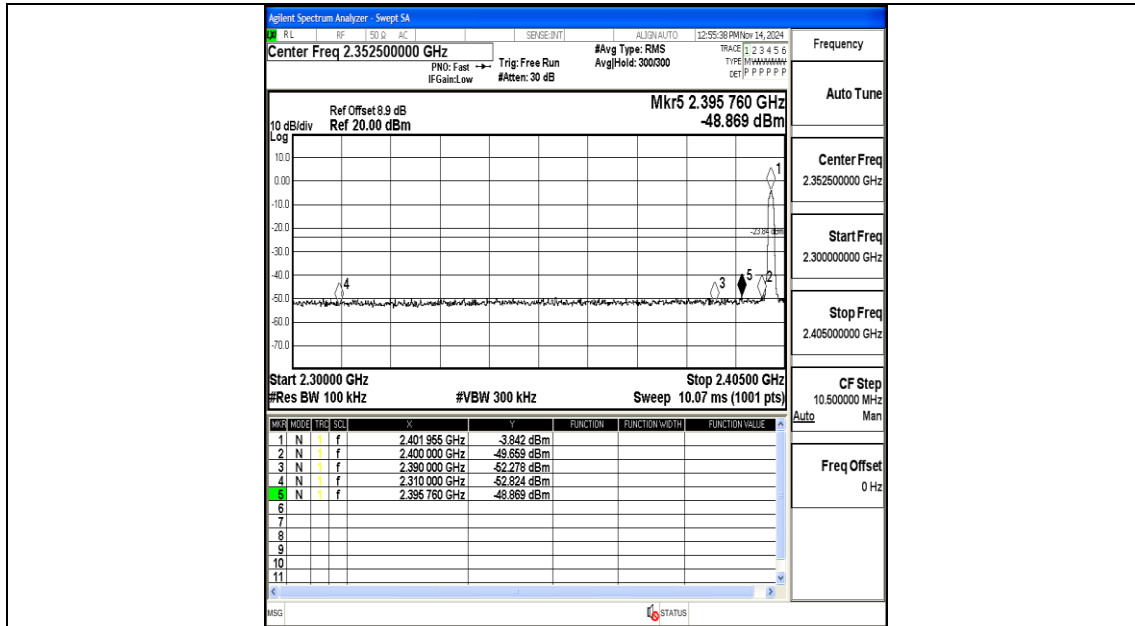
2DH5-Ant1-2480-PASS



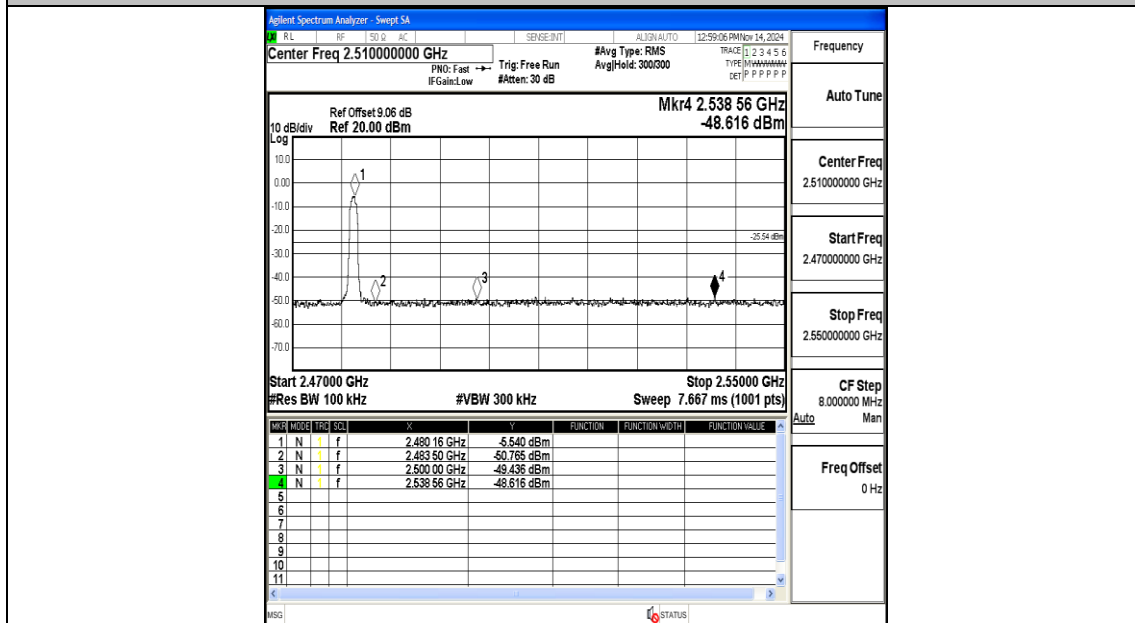
2DH5-Ant1-Hop_2402-PASS



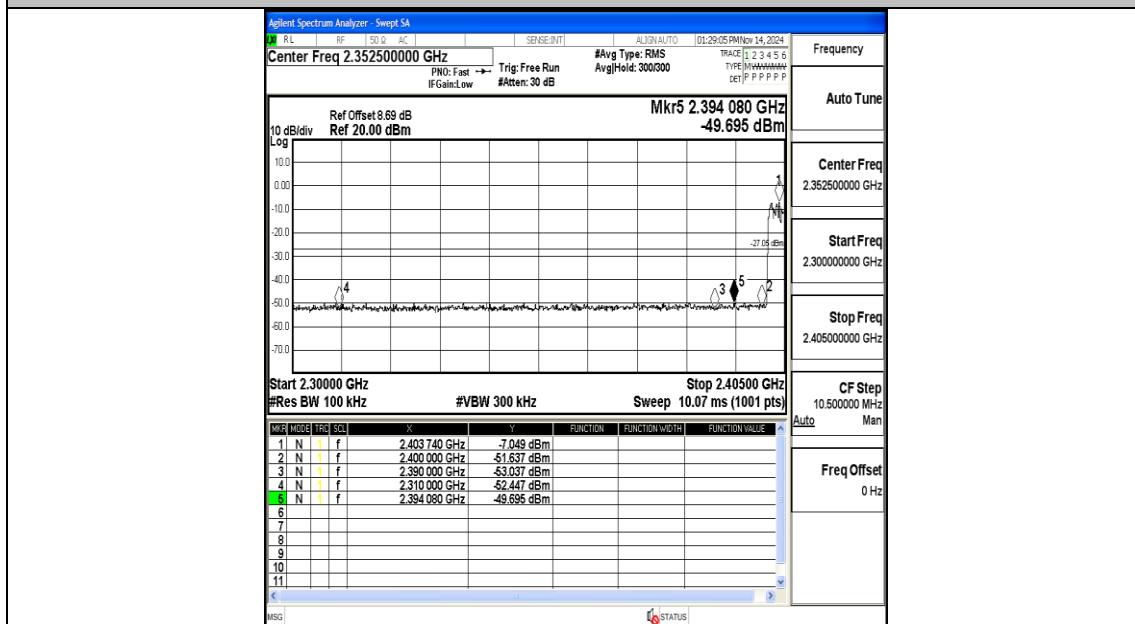
2DH5-Ant1-Hop_2480-PASS



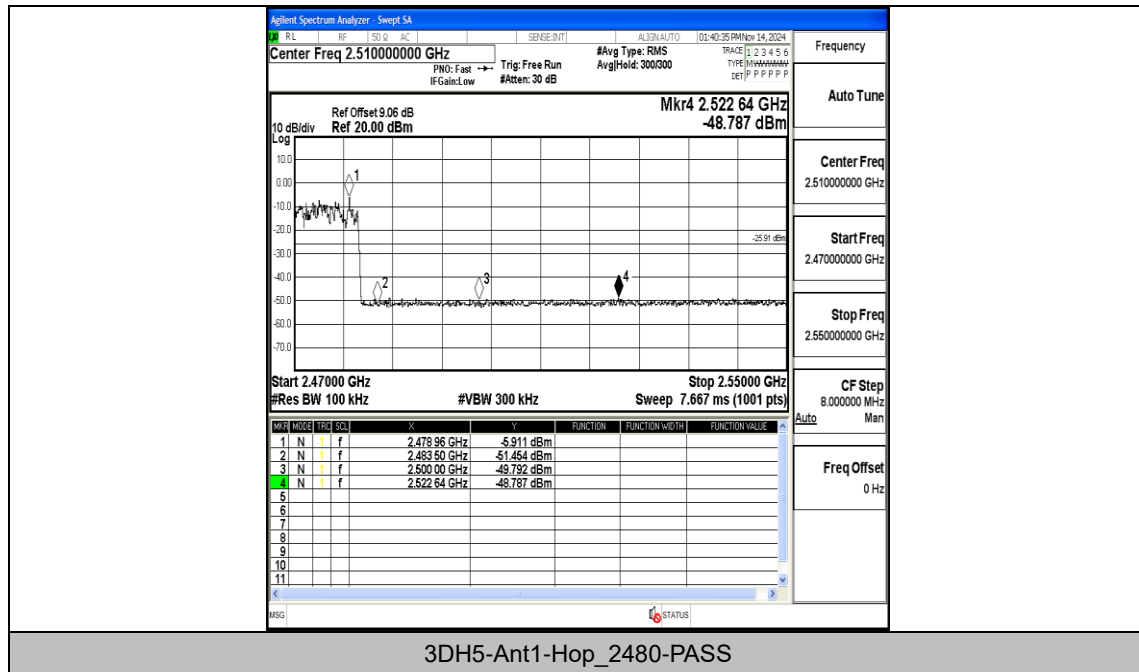
3DH5-Ant1-2402-PASS



3DH5-Ant1-2480-PASS



3DH5-Ant1-Hop_2402-PASS

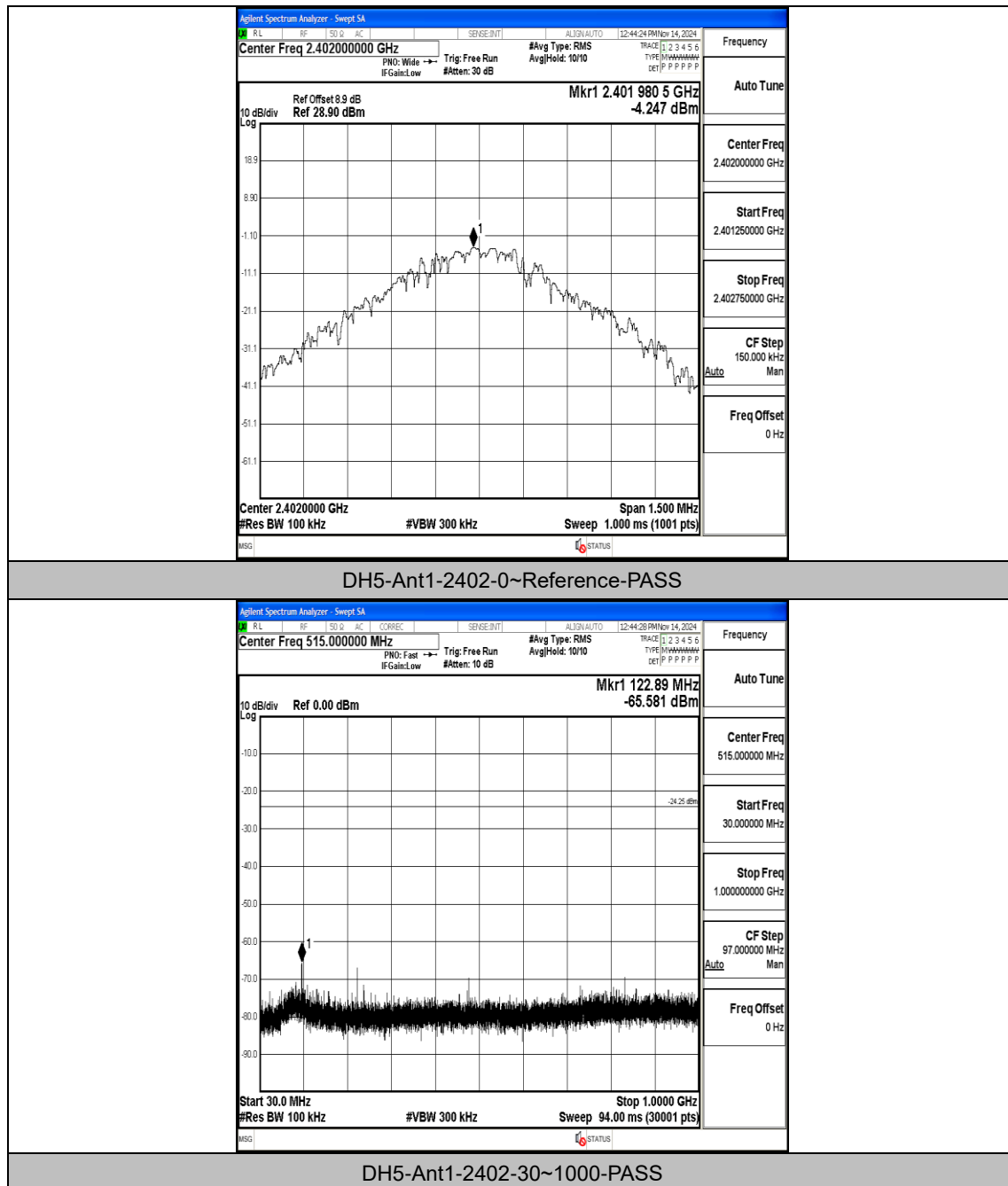


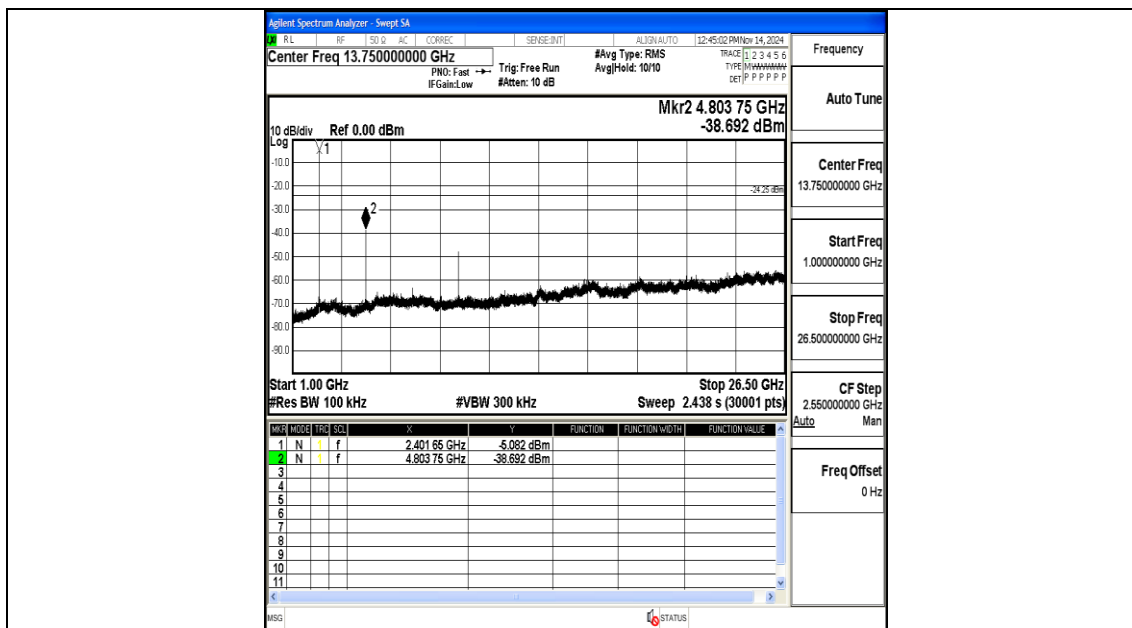
Appendix H: Conducted Spurious Emission

Test Result

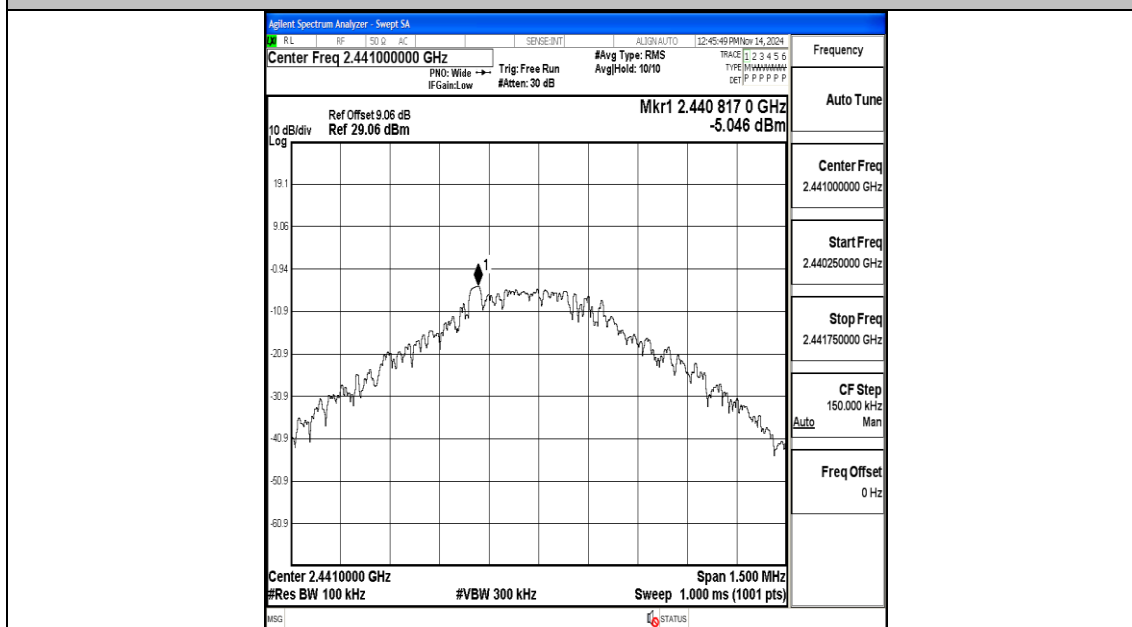
Test Mode	Antenna	Frequency [MHz]	Freq. Range [MHz]	Ref. Level [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	2402	0~Reference	-4.25	-4.25	---	PASS
DH5	Ant1	2402	30~1000	-4.25	-65.58	≤-24.25	PASS
DH5	Ant1	2402	1000~26500	-4.25	-38.69	≤-24.25	PASS
DH5	Ant1	2441	0~Reference	-5.05	-5.05	---	PASS
DH5	Ant1	2441	30~1000	-5.05	-65.44	≤-25.05	PASS
DH5	Ant1	2441	1000~26500	-5.05	-43.12	≤-25.05	PASS
DH5	Ant1	2480	0~Reference	-5.89	-5.89	---	PASS
DH5	Ant1	2480	30~1000	-5.89	-64.45	≤-25.89	PASS
DH5	Ant1	2480	1000~26500	-5.89	-46.14	≤-25.89	PASS
2DH5	Ant1	2402	0~Reference	-4.08	-4.08	---	PASS
2DH5	Ant1	2402	30~1000	-4.08	-65.2	≤-24.08	PASS
2DH5	Ant1	2402	1000~26500	-4.08	-40.52	≤-24.08	PASS
2DH5	Ant1	2441	0~Reference	-7.67	-7.67	---	PASS
2DH5	Ant1	2441	30~1000	-7.67	-65.58	≤-27.67	PASS
2DH5	Ant1	2441	1000~26500	-7.67	-44.52	≤-27.67	PASS
2DH5	Ant1	2480	0~Reference	-6.61	-6.61	---	PASS
2DH5	Ant1	2480	30~1000	-6.61	-65.29	≤-26.61	PASS
2DH5	Ant1	2480	1000~26500	-6.61	-45.92	≤-26.61	PASS
3DH5	Ant1	2402	0~Reference	-5.53	-5.53	---	PASS
3DH5	Ant1	2402	30~1000	-5.53	-64.7	≤-25.53	PASS
3DH5	Ant1	2402	1000~26500	-5.53	-41.73	≤-25.53	PASS
3DH5	Ant1	2441	0~Reference	-7.91	-7.91	---	PASS
3DH5	Ant1	2441	30~1000	-7.91	-66.02	≤-27.91	PASS
3DH5	Ant1	2441	1000~26500	-7.91	-44.23	≤-27.91	PASS
3DH5	Ant1	2480	0~Reference	-6.10	-6.10	---	PASS
3DH5	Ant1	2480	30~1000	-6.10	-65.97	≤-26.1	PASS
3DH5	Ant1	2480	1000~26500	-6.10	-46.09	≤-26.1	PASS

Test Graphs

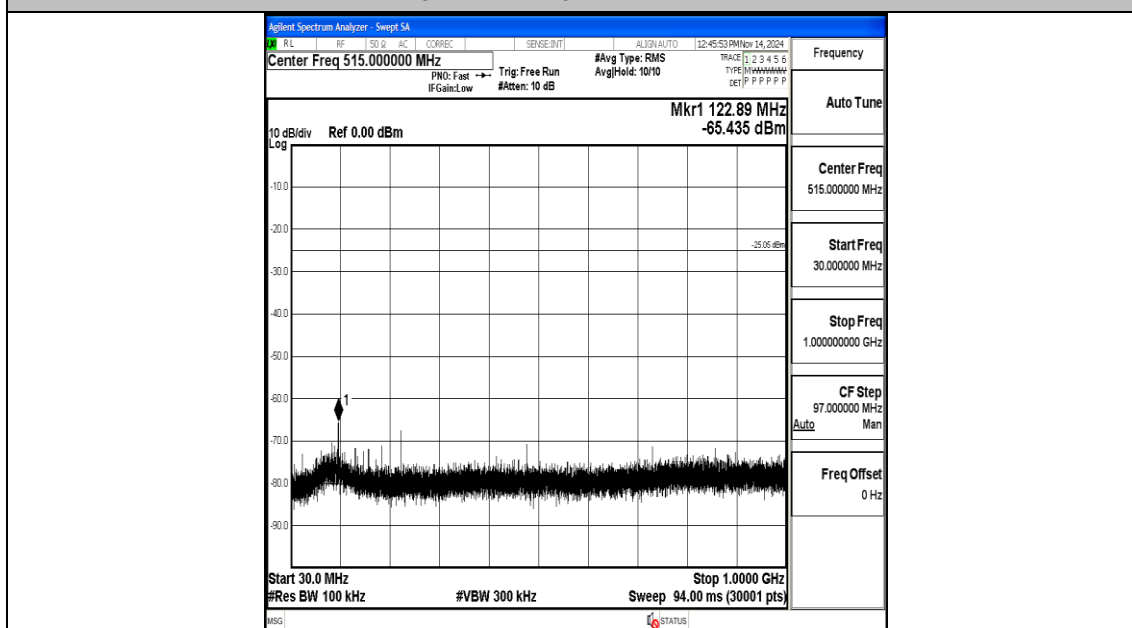




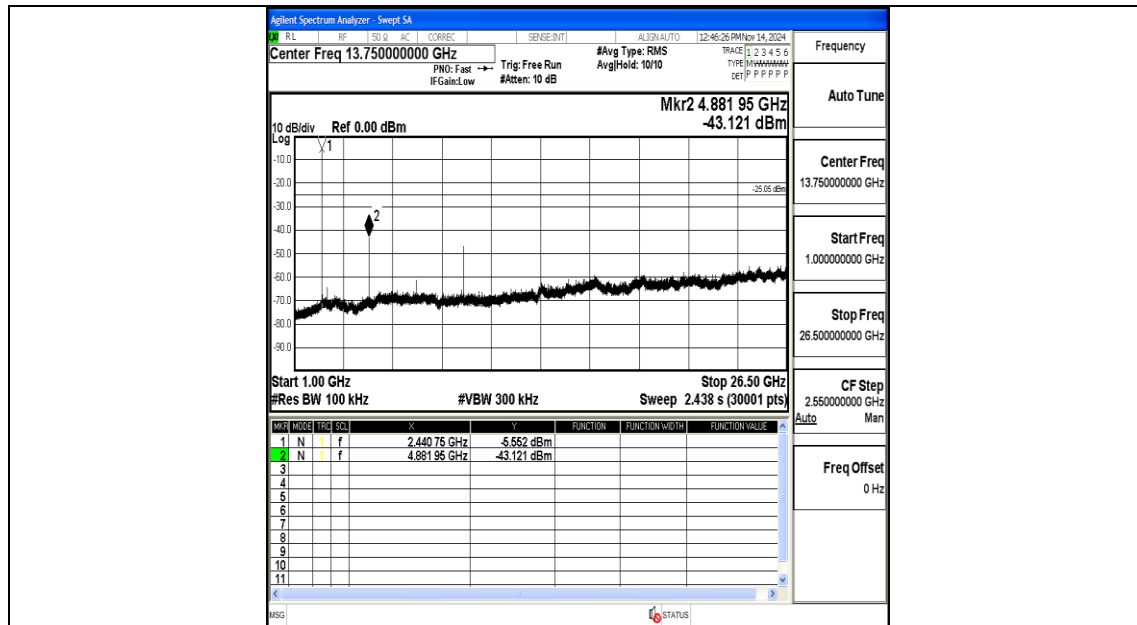
DH5-Ant1-2402-1000~26500-PASS



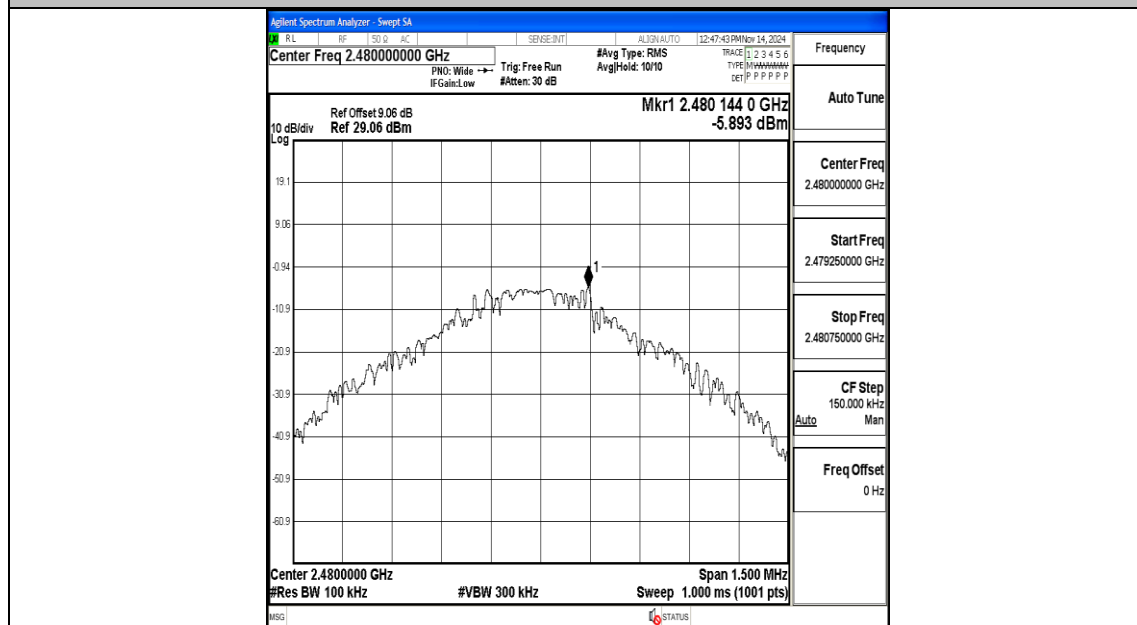
DH5-Ant1-2441-0~Reference-PASS



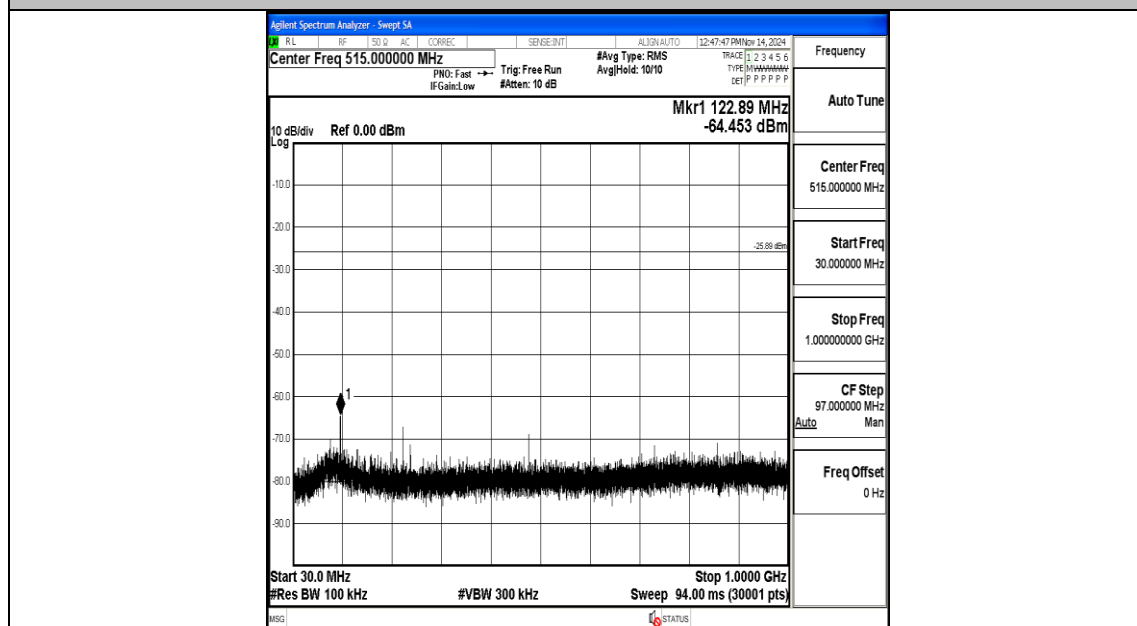
DH5-Ant1-2441-30~1000-PASS



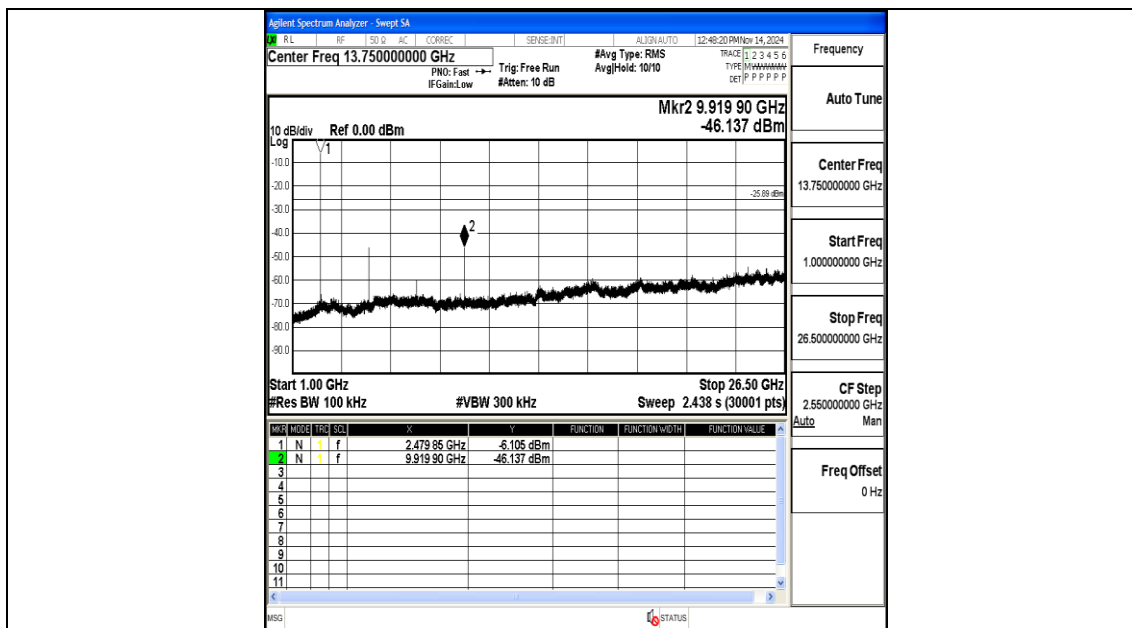
DH5-Ant1-2441-1000~26500-PASS



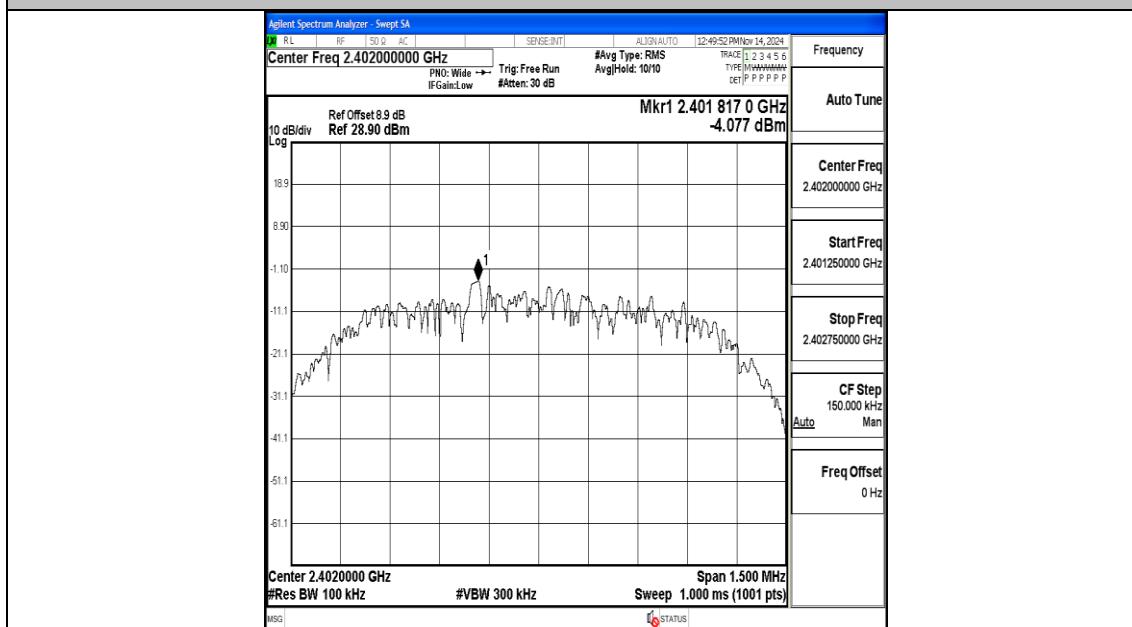
DH5-Ant1-2480-0~Reference-PASS



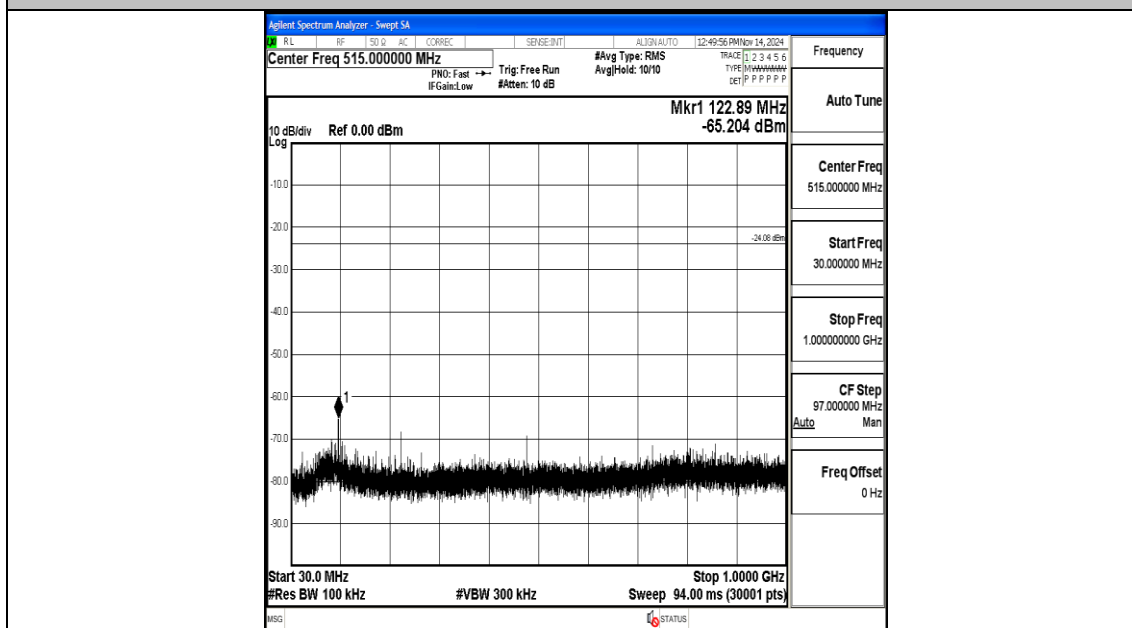
DH5-Ant1-2480-30~1000-PASS



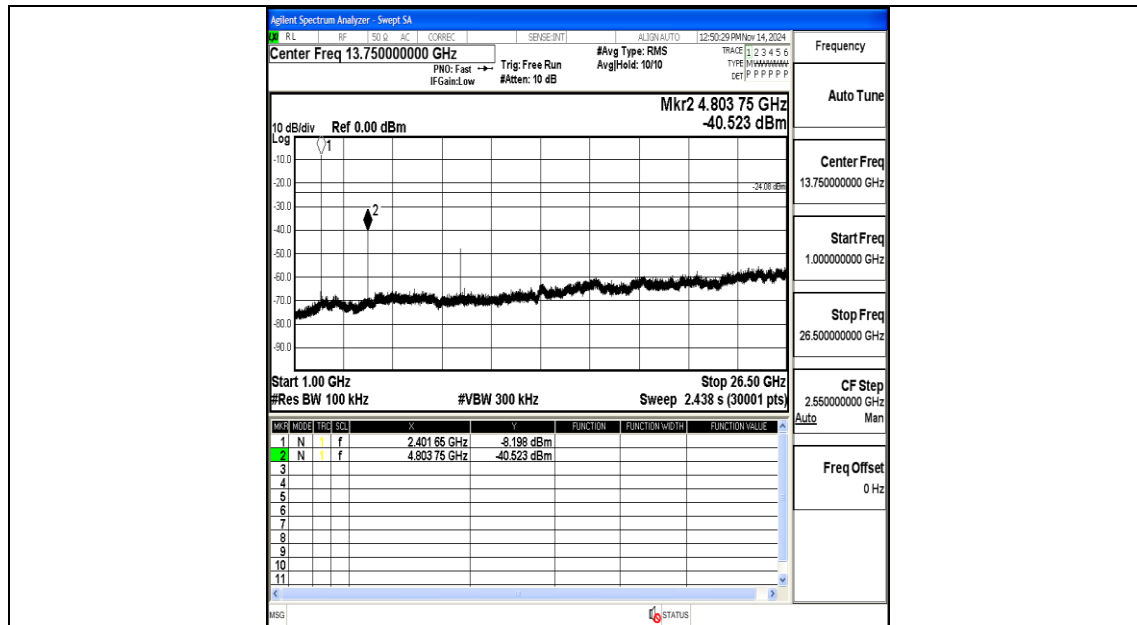
DH5-Ant1-2480-1000~26500-PASS



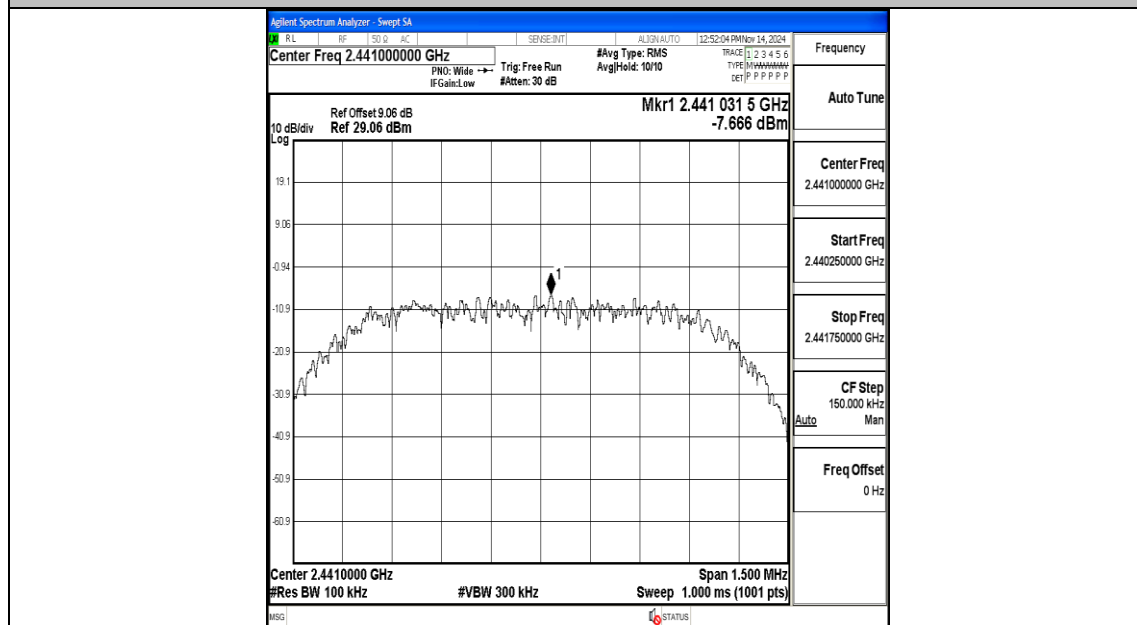
2DH5-Ant1-2402-0~Reference-PASS



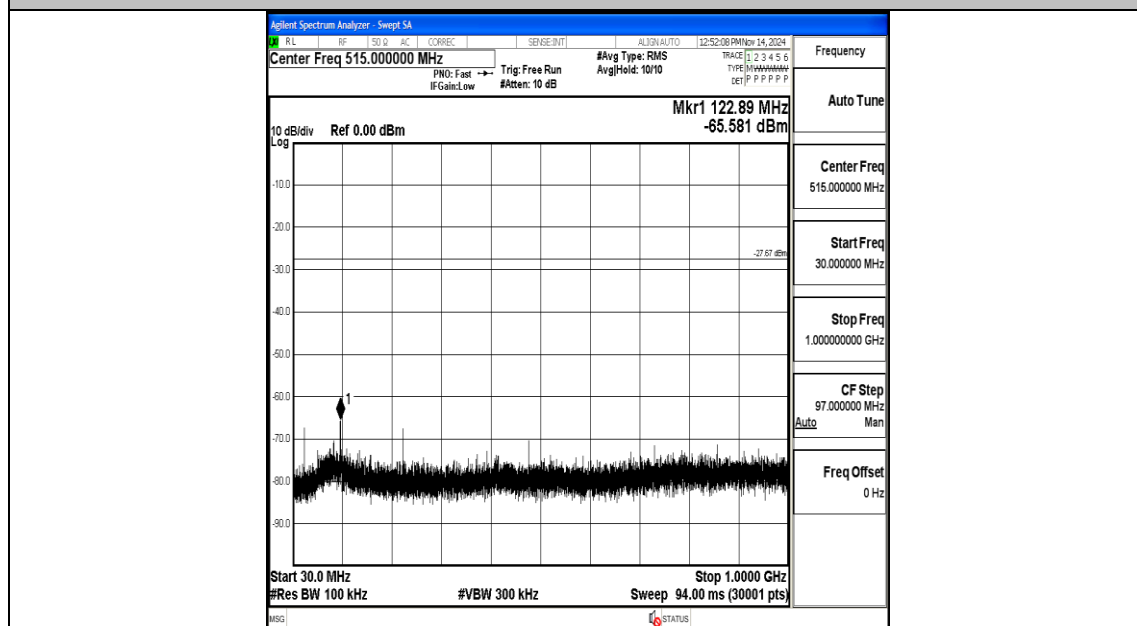
2DH5-Ant1-2402-30~1000-PASS



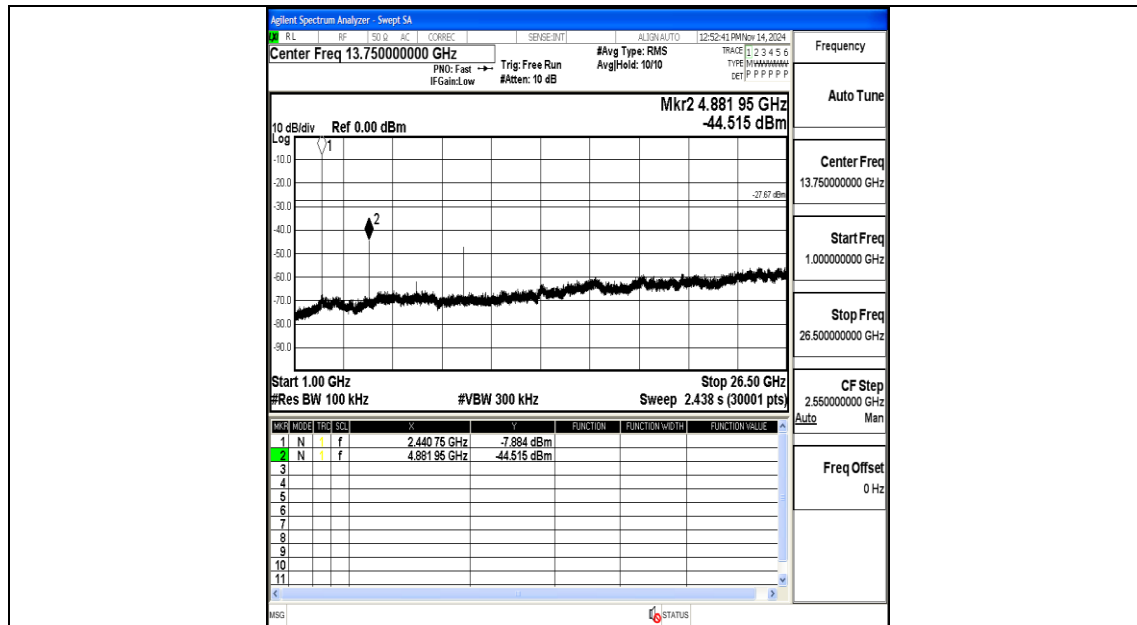
2DH5-Ant1-2402-1000~26500-PASS



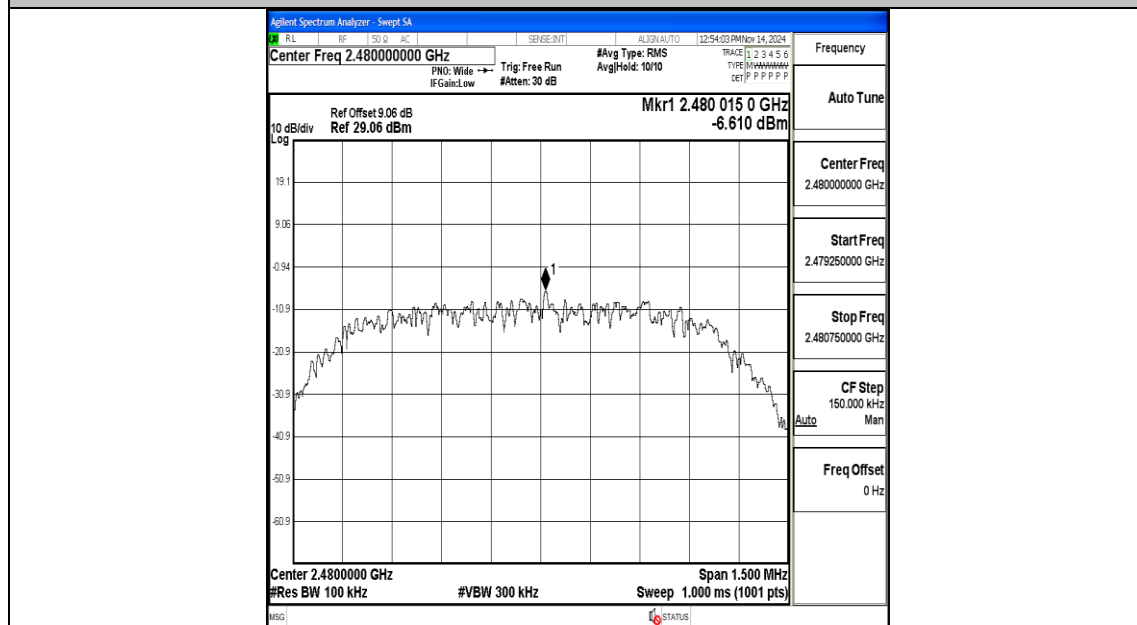
2DH5-Ant1-2441-0~Reference-PASS



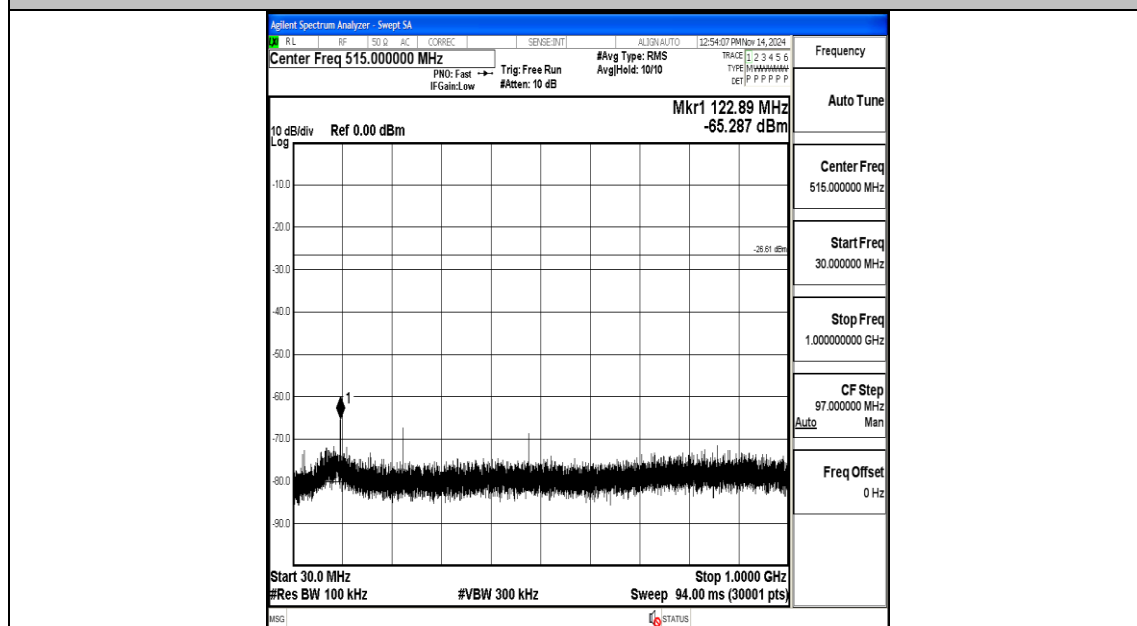
2DH5-Ant1-2441-30~1000-PASS



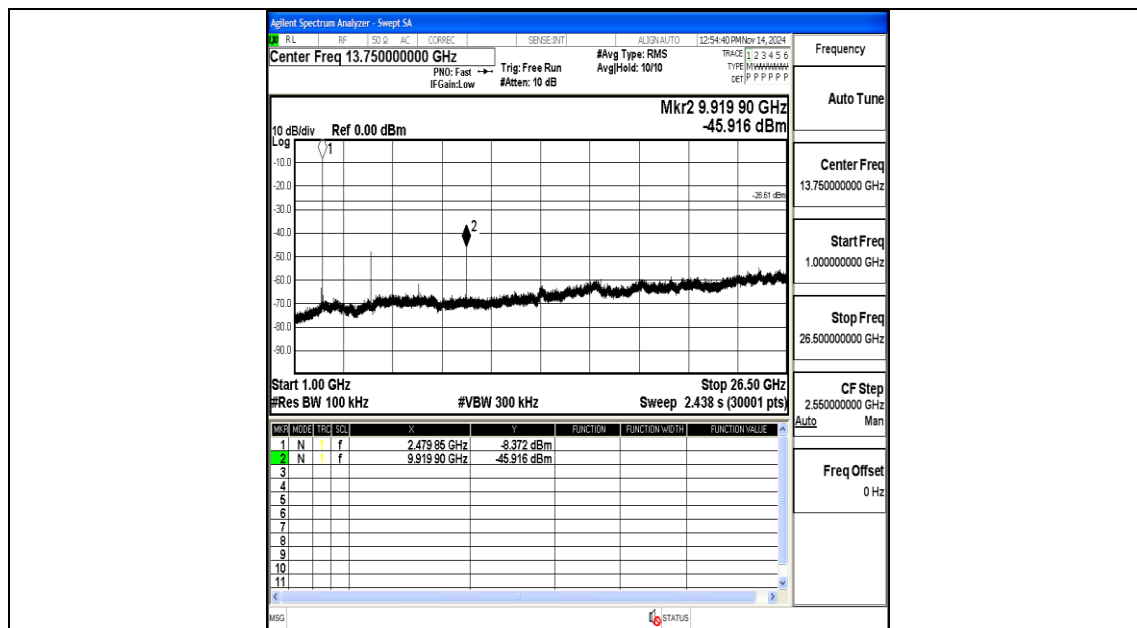
2DH5-Ant1-2441-1000~26500-PASS



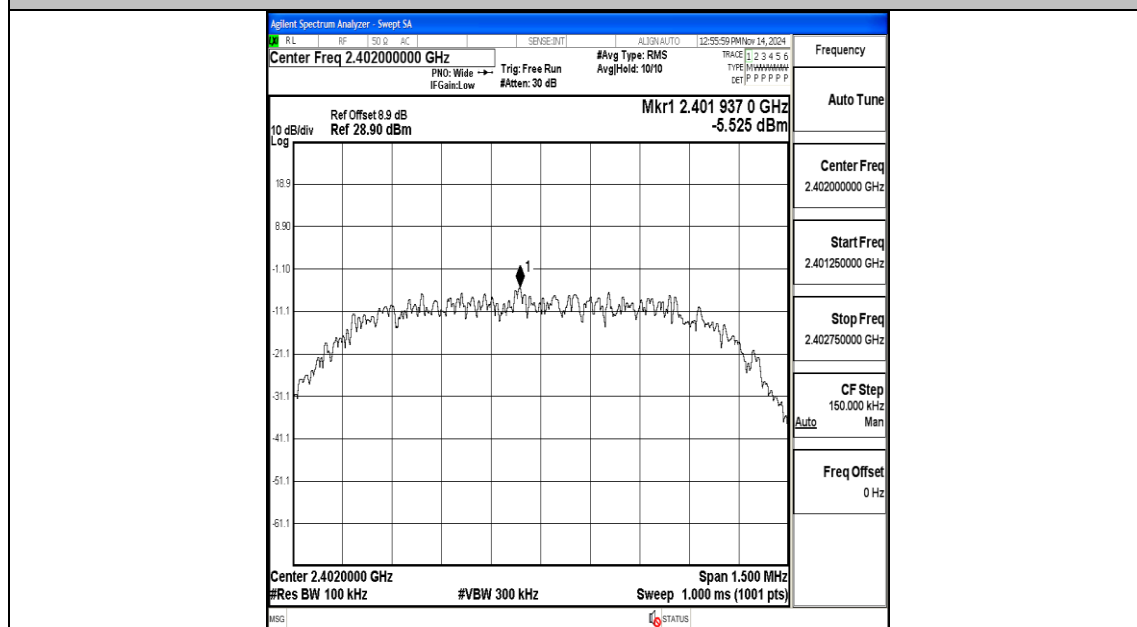
2DH5-Ant1-2480-0~Reference-PASS



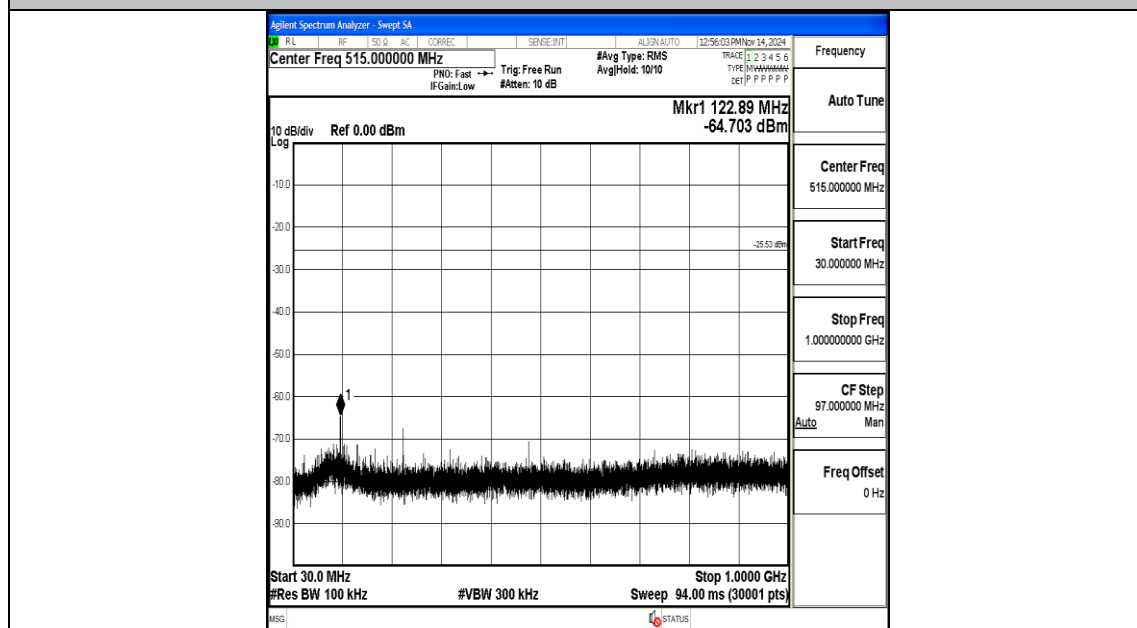
2DH5-Ant1-2480-30~1000-PASS



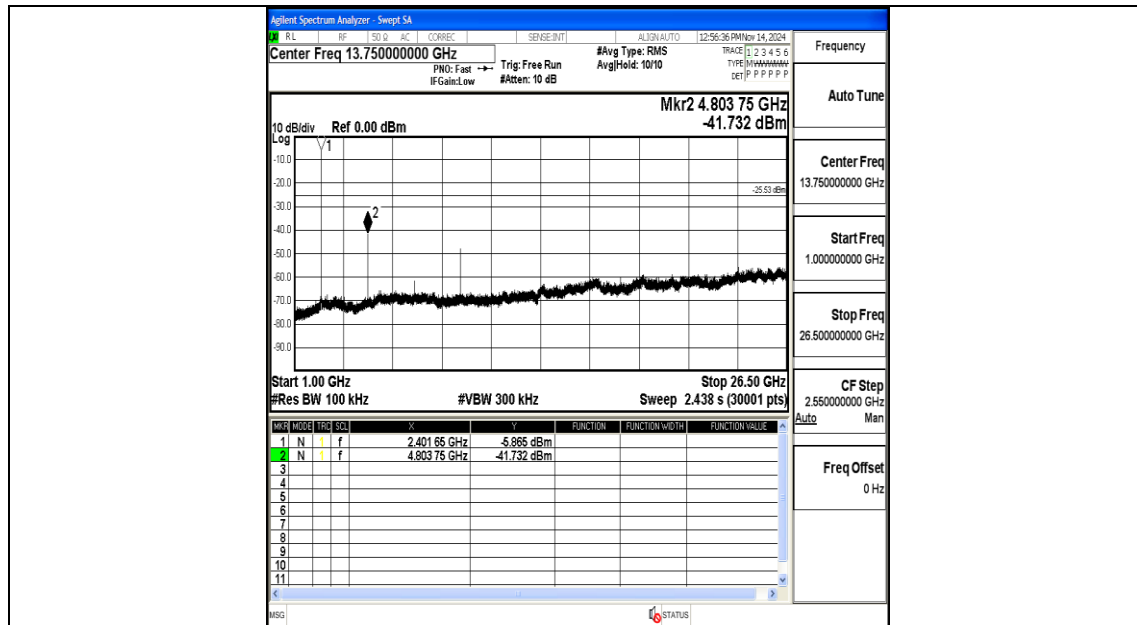
2DH5-Ant1-2480-1000~26500-PASS



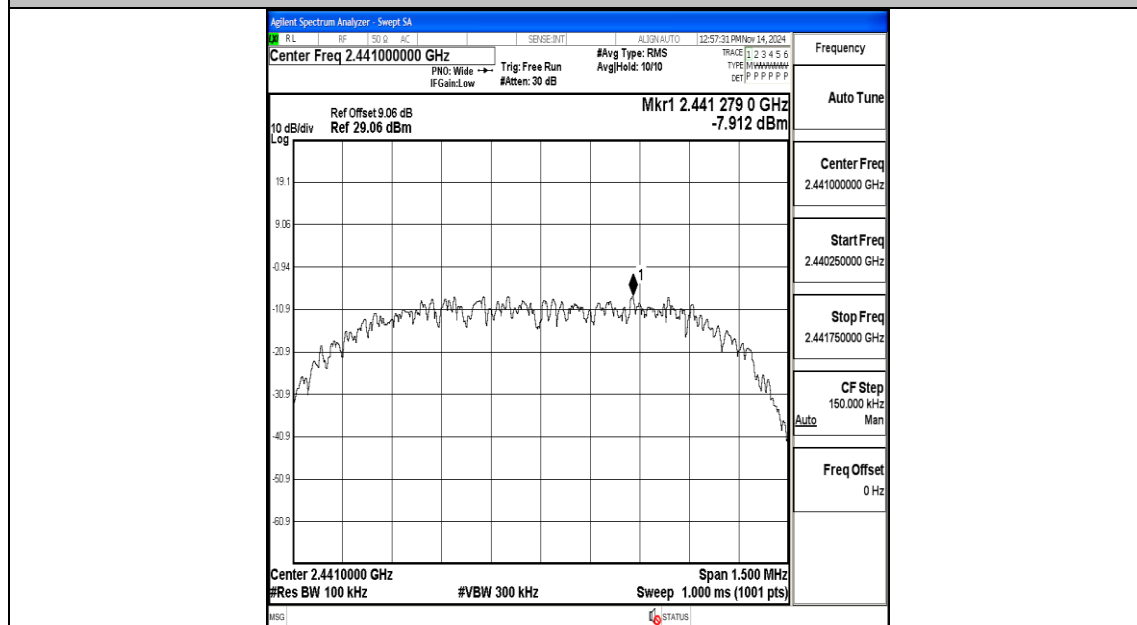
3DH5-Ant1-2402-0~Reference-PASS



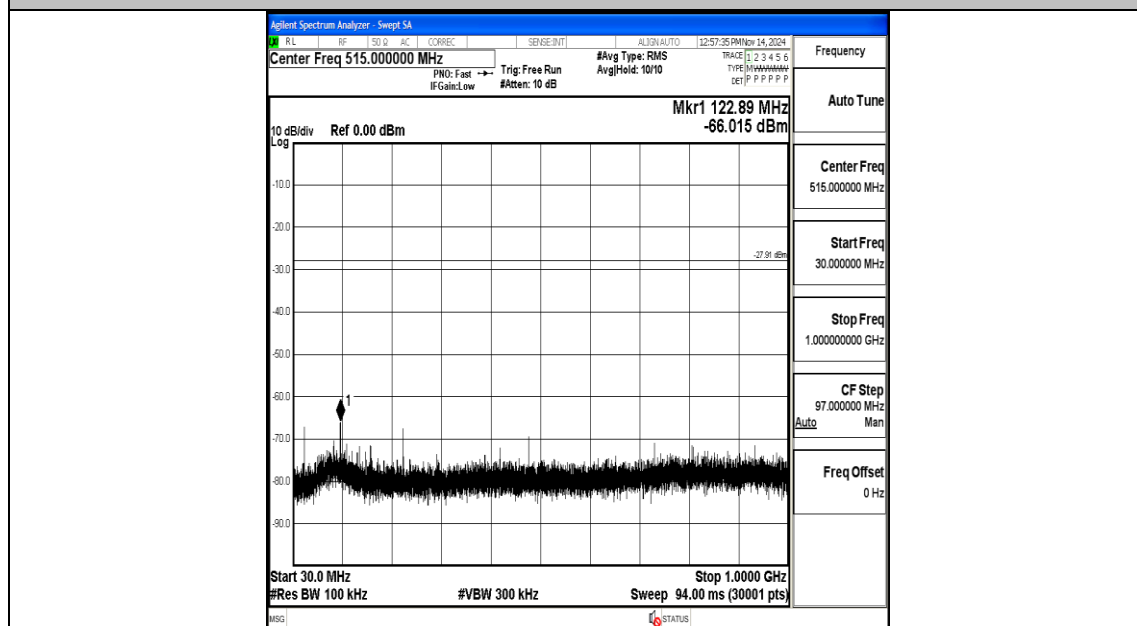
3DH5-Ant1-2402-30~1000-PASS



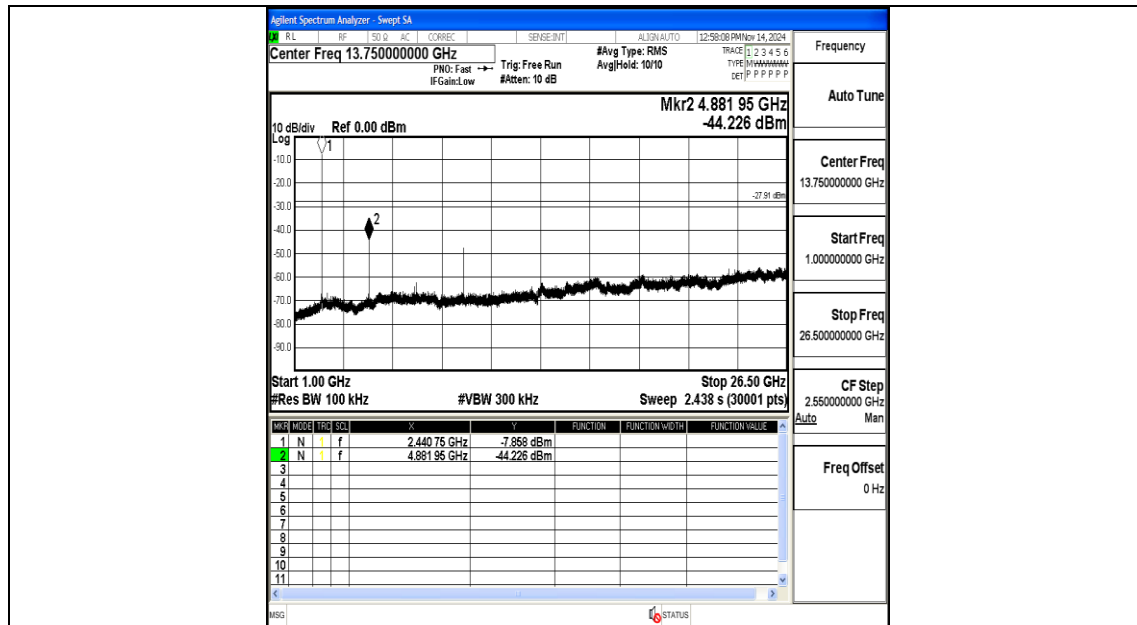
3DH5-Ant1-2402-1000~26500-PASS



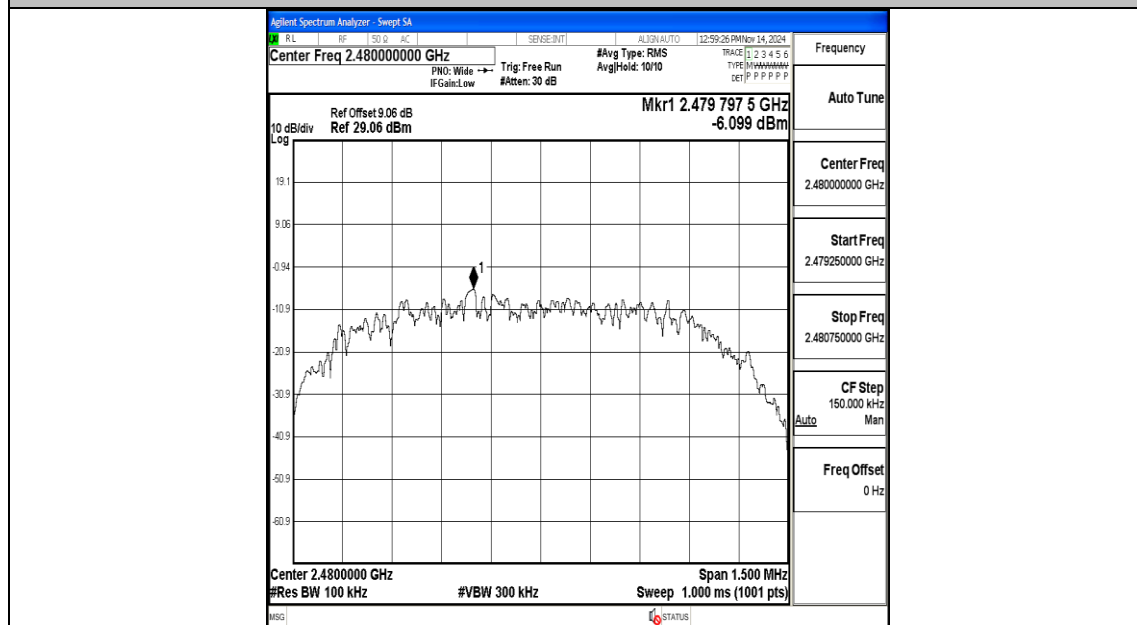
3DH5-Ant1-2441-0~Reference-PASS



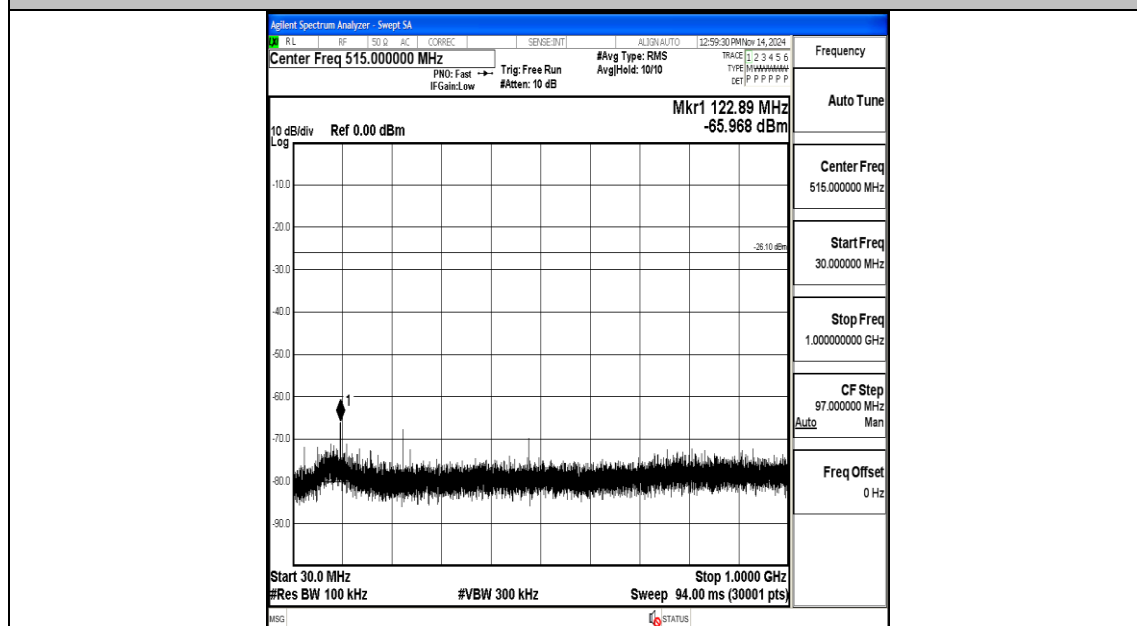
3DH5-Ant1-2441-30~1000-PASS



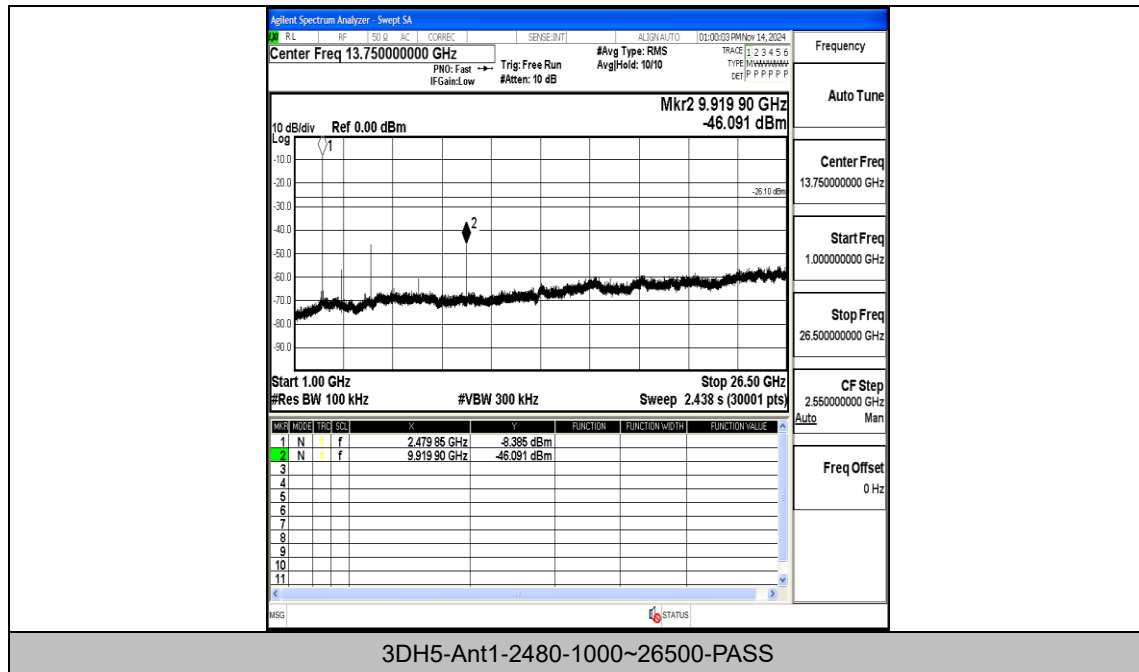
3DH5-Ant1-2441-1000~26500-PASS



3DH5-Ant1-2480-0~Reference-PASS



3DH5-Ant1-2480-30~1000-PASS



Appendix I: Duty Cycle

Test Result

Test Mode	Antenna	Frequency [MHz]	ON Time [ms]	Period [ms]	Duty Cycle [%]	Duty Cycle Factor [dB]
DH5	Ant1	2402	2.91	3.76	77.39	1.11
DH5	Ant1	2441	2.90	3.75	77.33	1.12
DH5	Ant1	2480	2.91	3.75	77.60	1.10
2DH5	Ant1	2402	2.91	3.76	77.39	1.11
2DH5	Ant1	2441	2.90	3.74	77.54	1.10
2DH5	Ant1	2480	2.90	3.75	77.33	1.12
3DH5	Ant1	2402	2.91	3.75	77.60	1.10
3DH5	Ant1	2441	2.91	3.75	77.60	1.10
3DH5	Ant1	2480	2.91	3.75	77.60	1.10

Test Graphs

