Appendix: Bluetooth Classic

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Appendix A: 20dB Emission Bandwidth

Test Result

TestMode	Antenna	Frequency[MHz]	20db EBW[MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH5	Ant1	2402	0.963	2401.526	2402.489	---	---
DH5	Ant1	2441	0.960	2440.529	2441.489	---	---
DH5	Ant1	2480	0.960	2479.526	2480.486	---	---
2DH5	Ant1	2402	1.326	2401.328	2402.654	---	---
2DH5	Ant1	2441	1.323	2440.331	2441.654	---	---
2DH5	Ant1	2480	1.326	2479.328	2480.654	---	---
3DH5	Ant1	2402	1.314	2401.340	2402.654	---	---
3DH5	Ant1	2441	1.320	2440.337	2441.657	---	---
3DH5	Ant1	2480	1.314	2479.337	2480.651	---	---

Test Graphs

DH5-Ant1-2402

DH5-Ant1-2441

DH5-Ant1-2480

2DH5-Ant1-2402

2DH5-Ant1-2441

2DH5-Ant1-2480

3DH5-Ant1-2402

3DH5-Ant1-2441

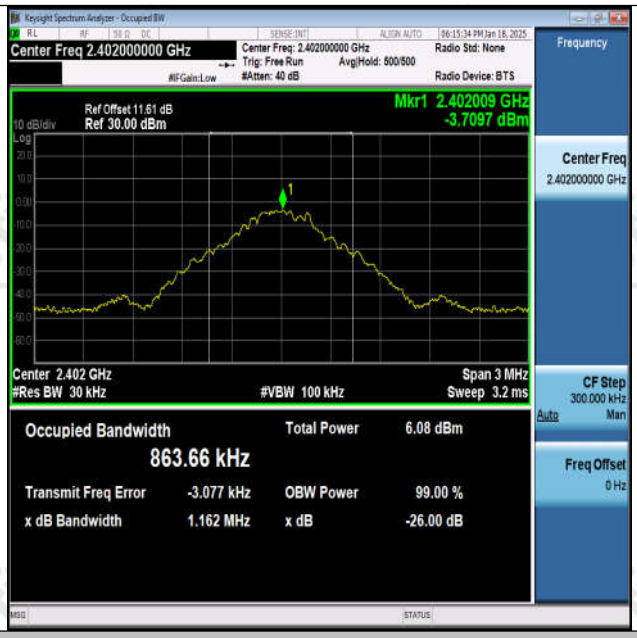
3DH5-Ant1-2480

Appendix B: Occupied Channel Bandwidth

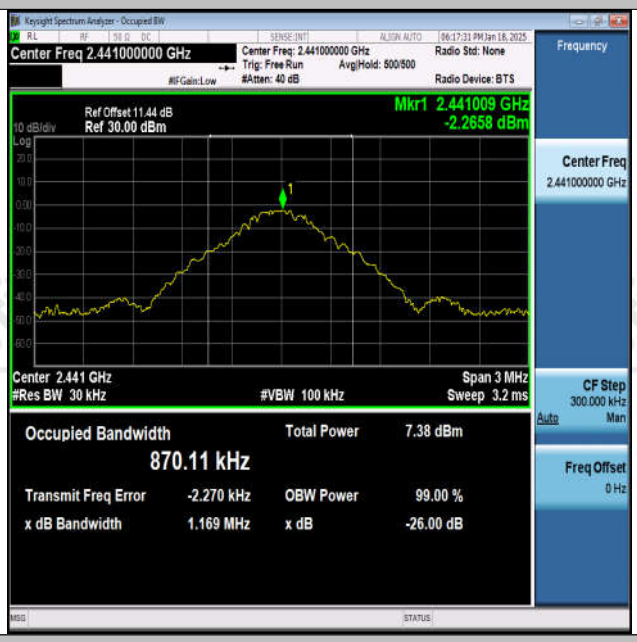
Test Result

TestMode	Antenna	Frequency [MHz]	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH5	Ant1	2402	0.86366	2401.5651	2402.4288	---	---
DH5	Ant1	2441	0.87011	2440.5627	2441.4328	---	---
DH5	Ant1	2480	0.86482	2479.5611	2480.4260	---	---
2DH5	Ant1	2402	1.1799	2401.4033	2402.5832	---	---
2DH5	Ant1	2441	1.1818	2440.4022	2441.5840	---	---
2DH5	Ant1	2480	1.1852	2479.3977	2480.5829	---	---
3DH5	Ant1	2402	1.1919	2401.3996	2402.5915	---	---
3DH5	Ant1	2441	1.1901	2440.4006	2441.5907	---	---
3DH5	Ant1	2480	1.1965	2479.3923	2480.5888	---	---

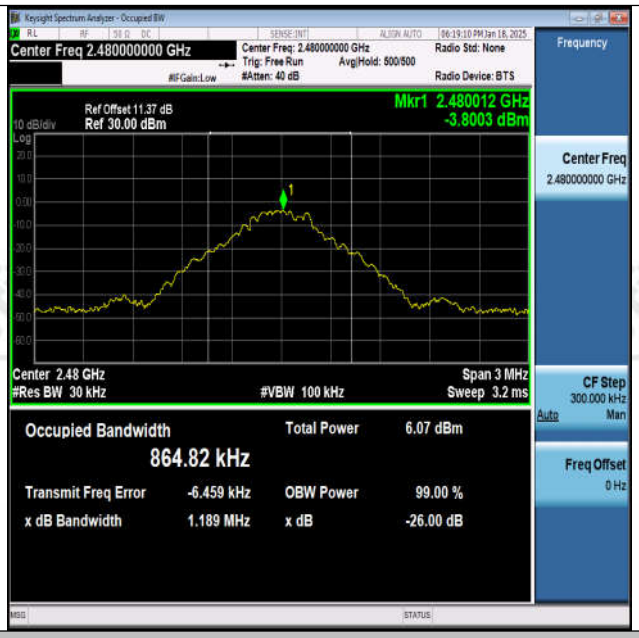
Test Graphs



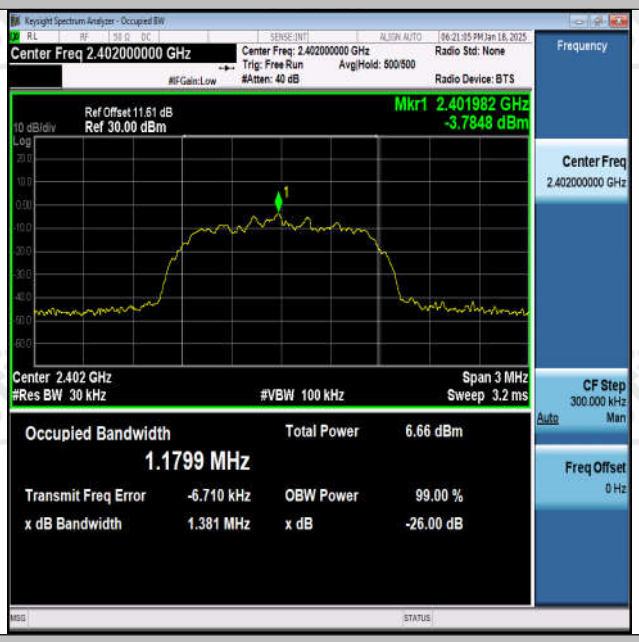
DH5-Ant1-2402



DH5-Ant1-2441

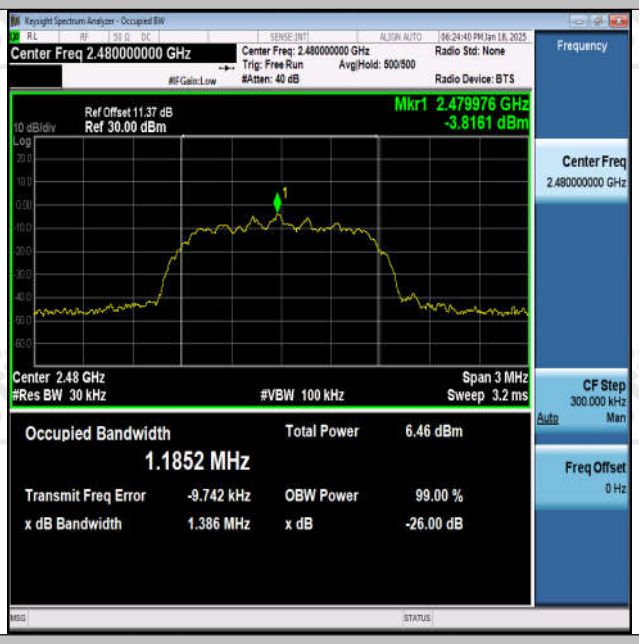


DH5-Ant1-2480

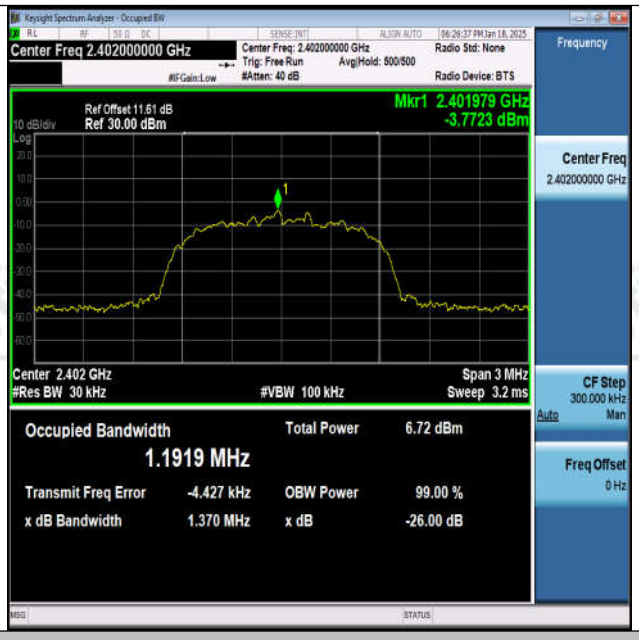


2DH5-Ant1-2402

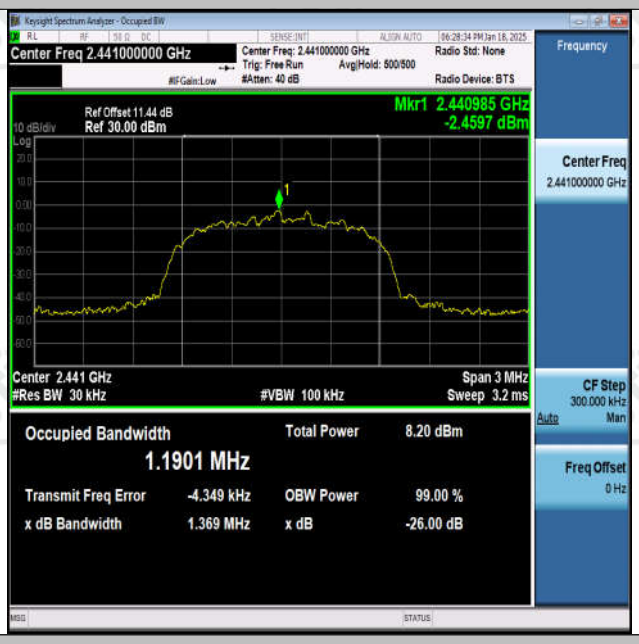
2DH5-Ant1-2441



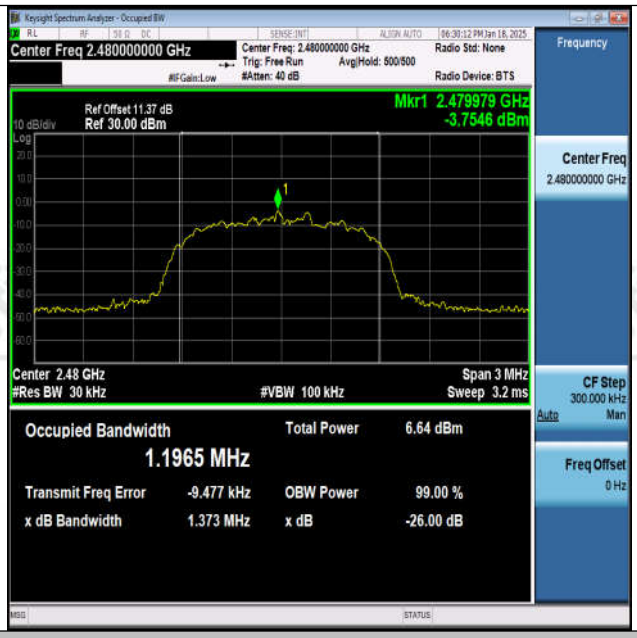
2DH5-Ant1-2480



3DH5-Ant1-2402



3DH5-Ant1-2441



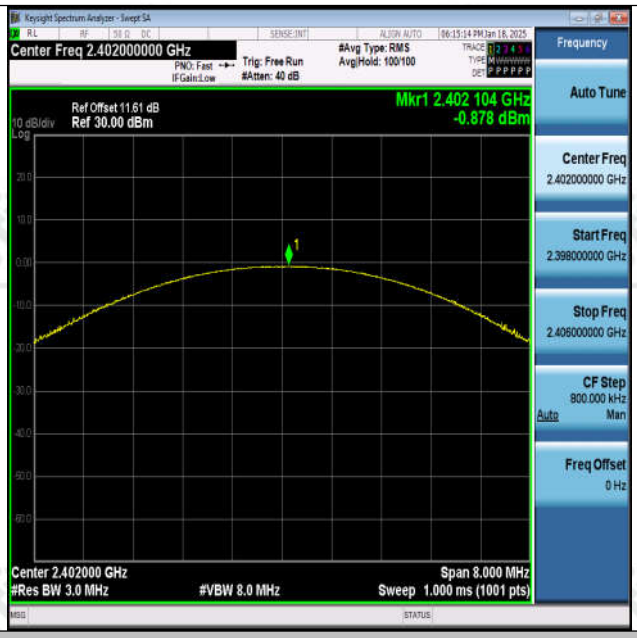
3DH5-Ant1-2480

Appendix C: Maximum conducted output power

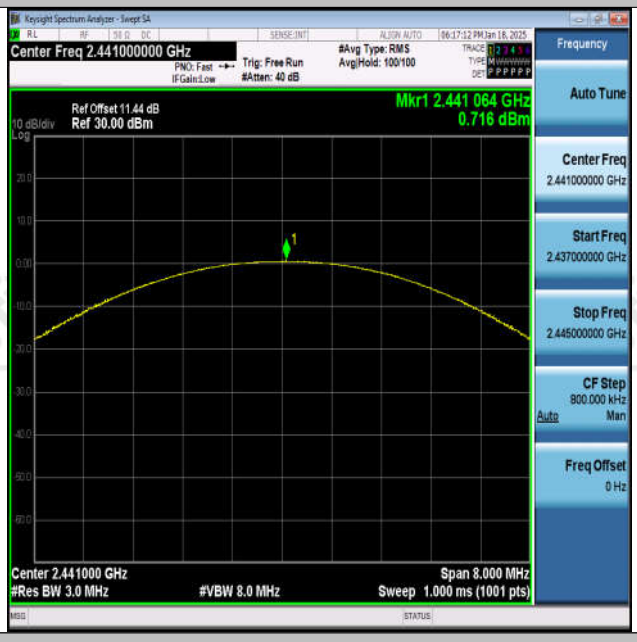
Test Result

Test Mode	Antenna	Frequency[MHz]	Conducted Peak Power[dBm]	Conducted Limit[dBm]	Verdict
DH5	Ant1	2402	-0.88	≤20.97	PASS
DH5	Ant1	2441	0.72	≤20.97	PASS
DH5	Ant1	2480	-0.78	≤20.97	PASS
2DH5	Ant1	2402	1.58	≤20.97	PASS
2DH5	Ant1	2441	3.09	≤20.97	PASS
2DH5	Ant1	2480	1.51	≤20.97	PASS
3DH5	Ant1	2402	1.96	≤30	PASS
3DH5	Ant1	2441	3.44	≤20.97	PASS
3DH5	Ant1	2480	2.00	≤20.97	PASS

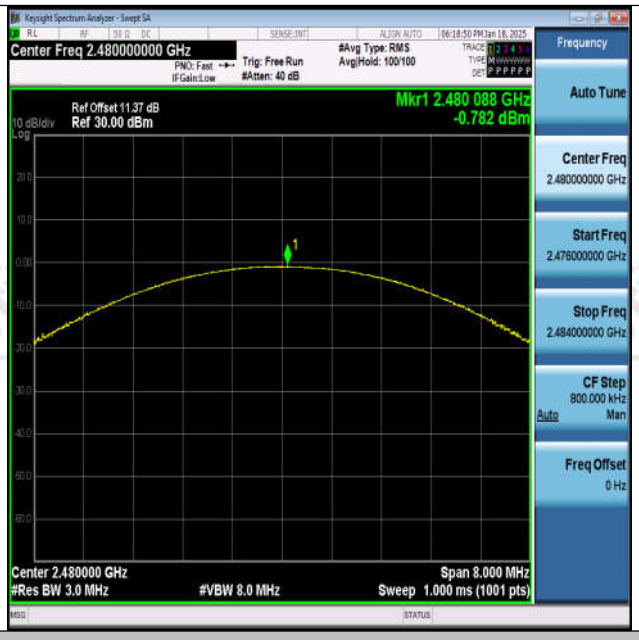
Test Graphs



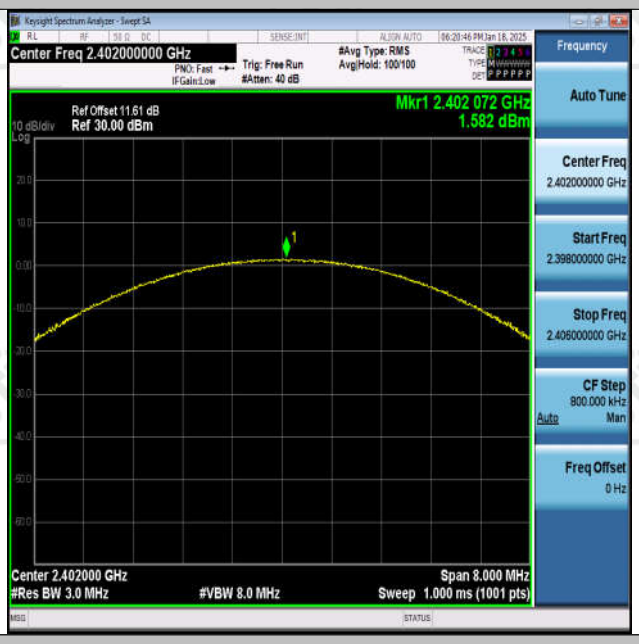
DH5-Ant1-2402-PASS



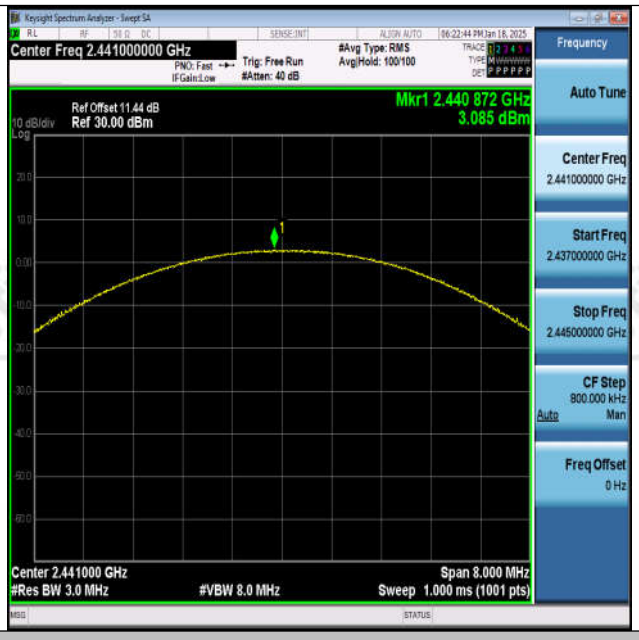
DH5-Ant1-2441-PASS



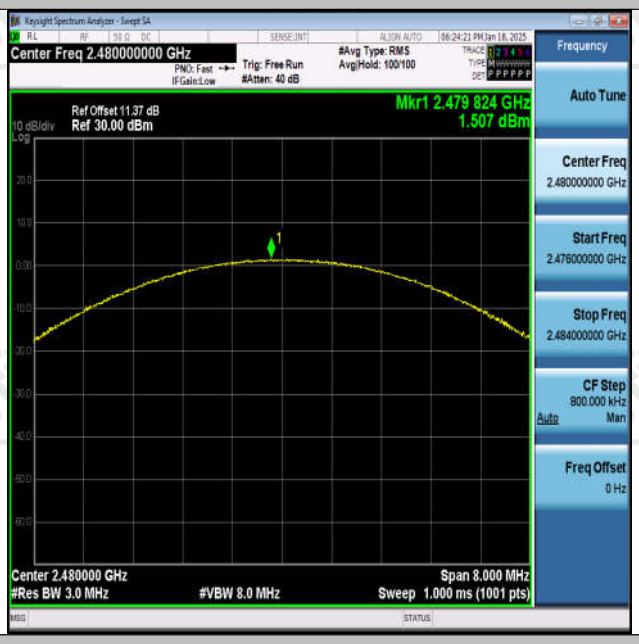
DH5-Ant1-2480-PASS



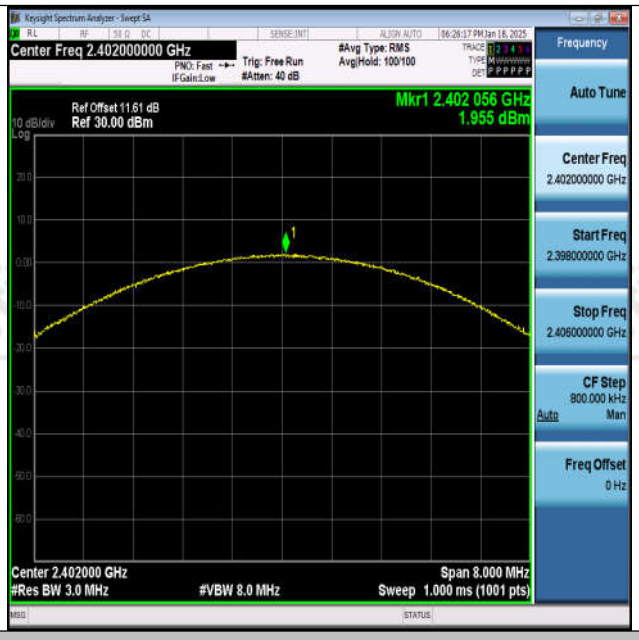
2DH5-Ant1-2402-PASS



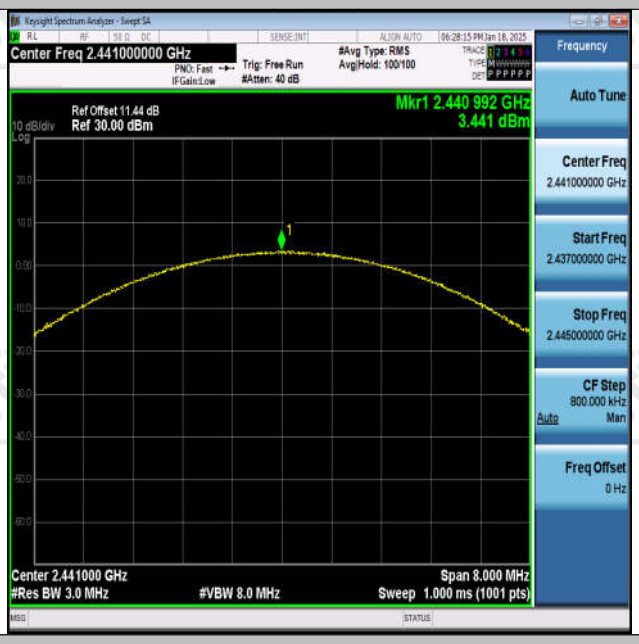
2DH5-Ant1-2441-PASS



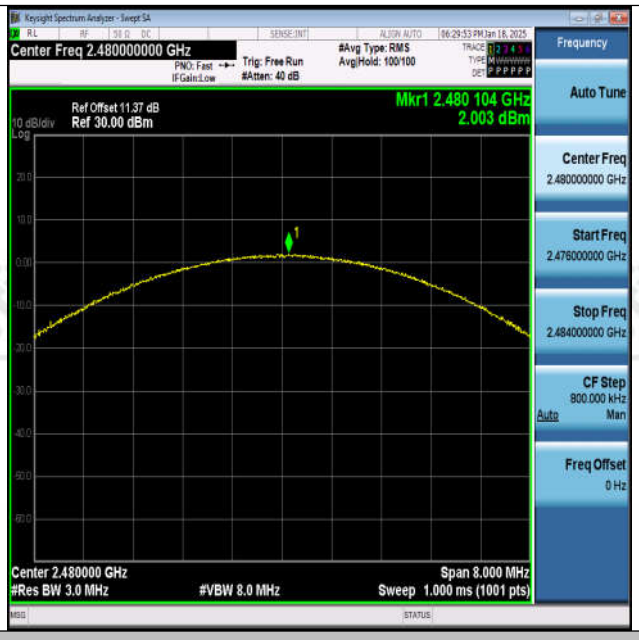
2DH5-Ant1-2480-PASS



3DH5-Ant1-2402-PASS



3DH5-Ant1-2441-PASS



3DH5-Ant1-2480-PASS

Appendix D: Carrier frequency separation

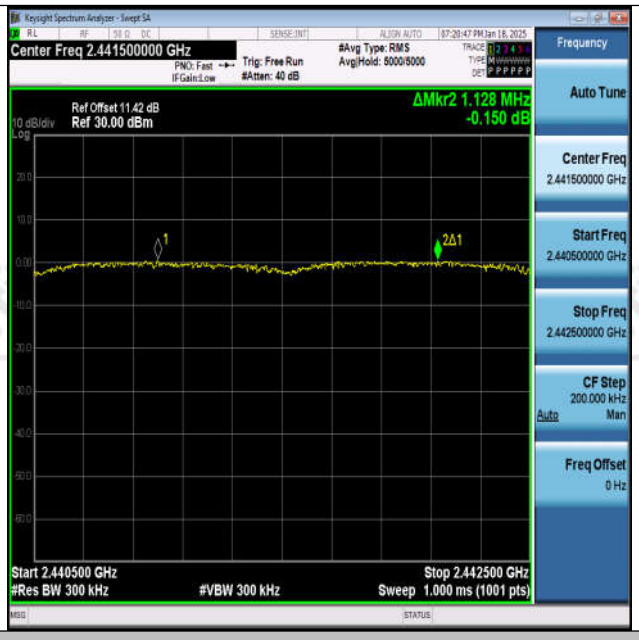
Test Result

TestMode	Antenna	Frequency[MHz]	Result[MHz]	Limit[MHz]	Verdict
DH5	Ant1	Hop	0.982	≥0.963	PASS
2DH5	Ant1	Hop	1.002	≥0.884	PASS
3DH5	Ant1	Hop	1.128	≥0.880	PASS

Test Graphs

DH5-Ant1-Hop-PASS

2DH5-Ant1-Hop-PASS



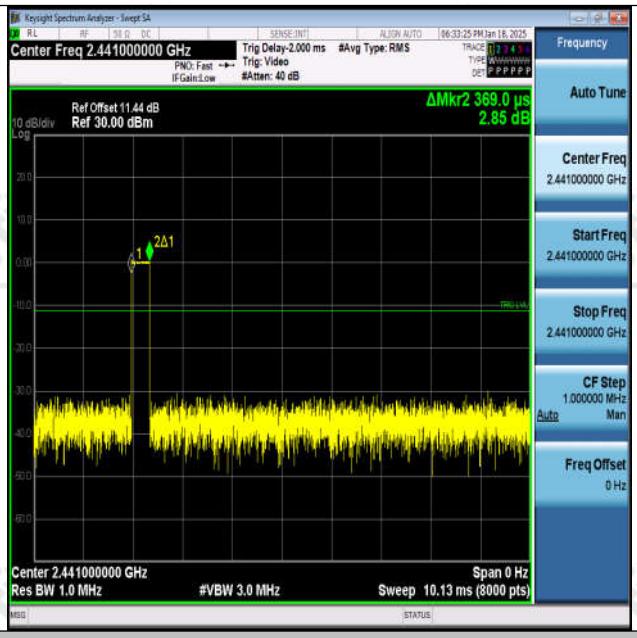
3DH5-Ant1-Hop-PASS

Appendix E: Time of occupancy

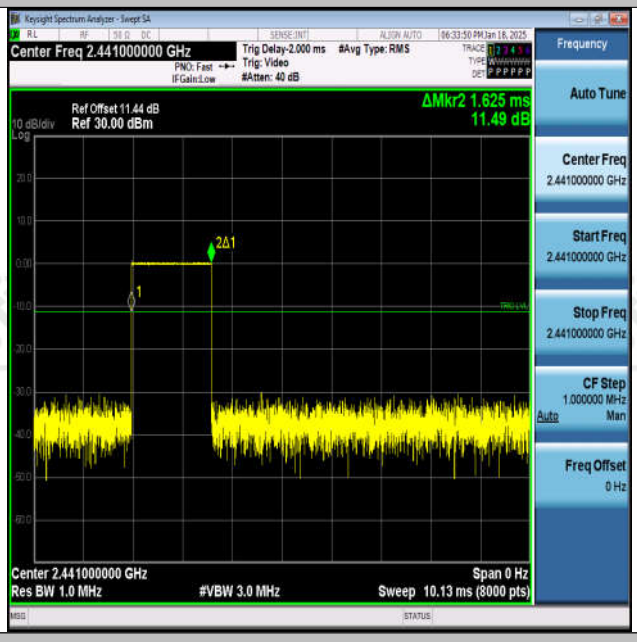
Test Result

TestMode	Antenna	Frequency[MHz]	BurstWidth [ms]	TotalHops [Num]	Result[s]	Limit[s]	Verdict
DH1	Ant1	Hop	0.369	320	0.118	≤0.4	PASS
DH3	Ant1	Hop	1.625	160	0.26	≤0.4	PASS
DH5	Ant1	Hop	2.873	106.67	0.306	≤0.4	PASS
2DH1	Ant1	Hop	0.377	320	0.121	≤0.4	PASS
2DH3	Ant1	Hop	1.629	160	0.261	≤0.4	PASS
2DH5	Ant1	Hop	2.878	106.67	0.307	≤0.4	PASS
3DH1	Ant1	Hop	0.377	320	0.121	≤0.4	PASS
3DH3	Ant1	Hop	1.628	160	0.26	≤0.4	PASS
3DH5	Ant1	Hop	2.878	106.67	0.307	≤0.4	PASS

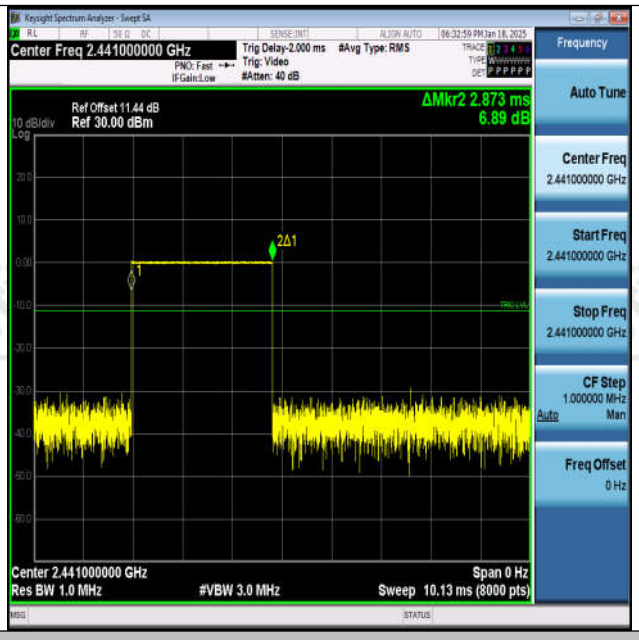
Test Graphs



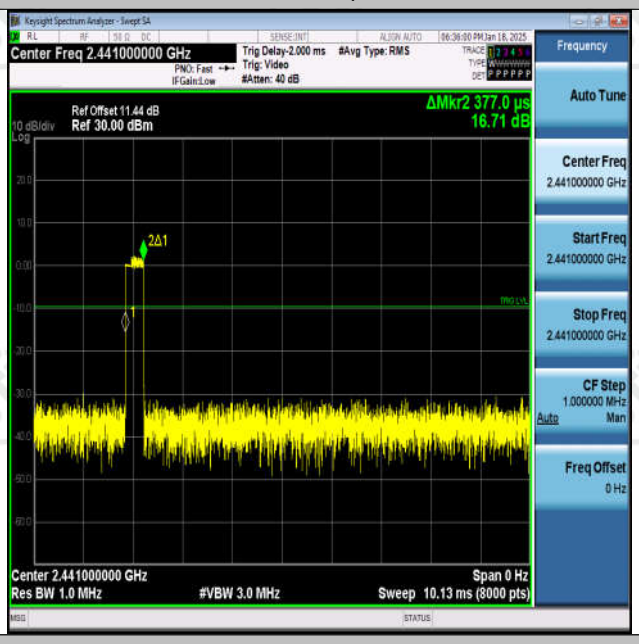
DH1-Ant1-Hop-PASS



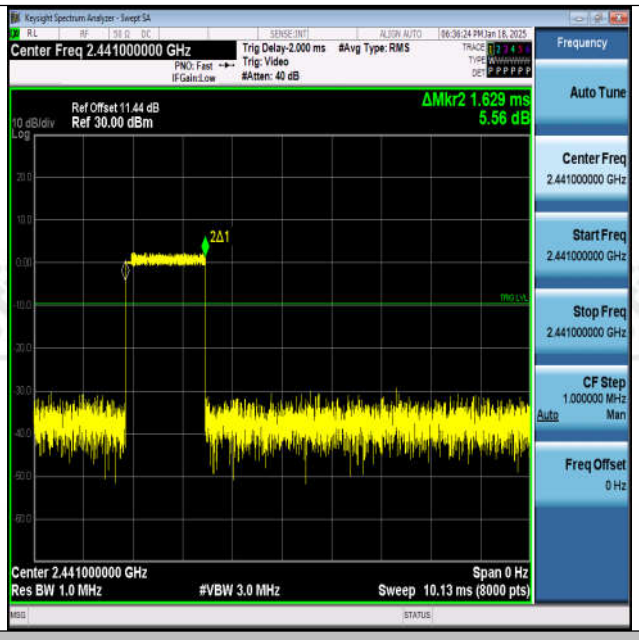
DH3-Ant1-Hop-PASS



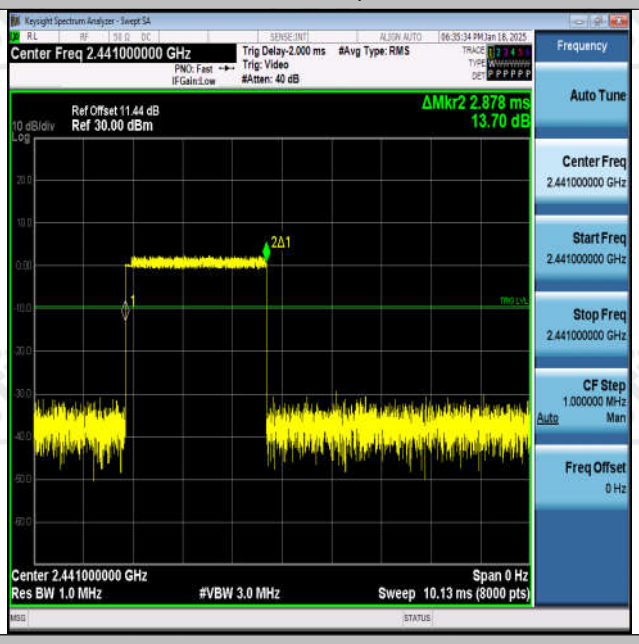
DH5-Ant1-Hop-PASS



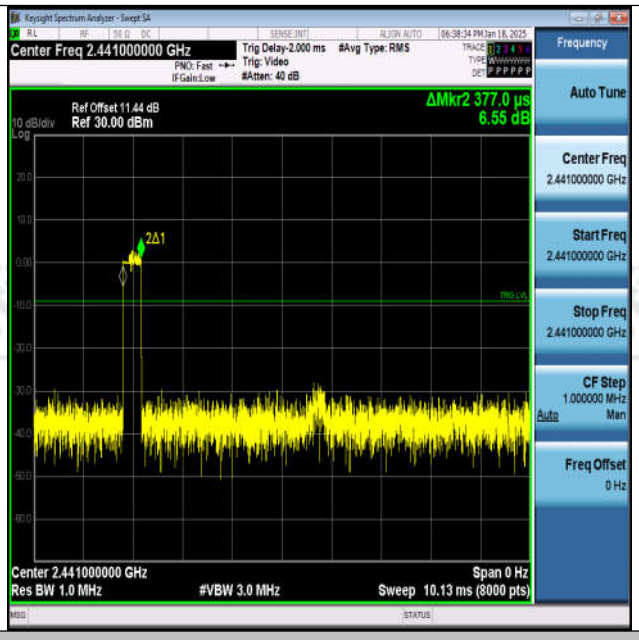
2DH1-Ant1-Hop-PASS



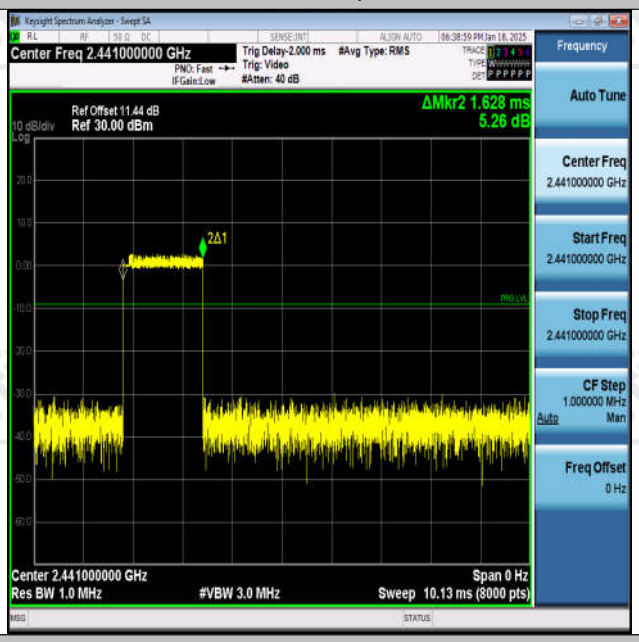
2DH3-Ant1-Hop-PASS



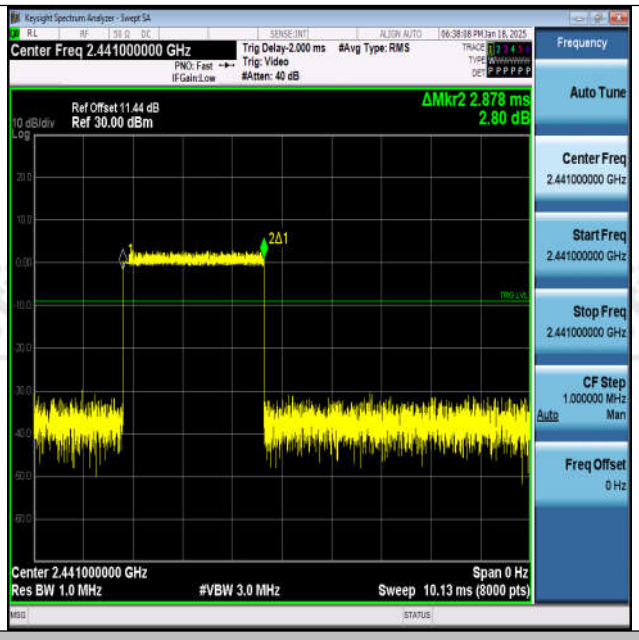
2DH5-Ant1-Hop-PASS



3DH1-Ant1-Hop-PASS



3DH3-Ant1-Hop-PASS



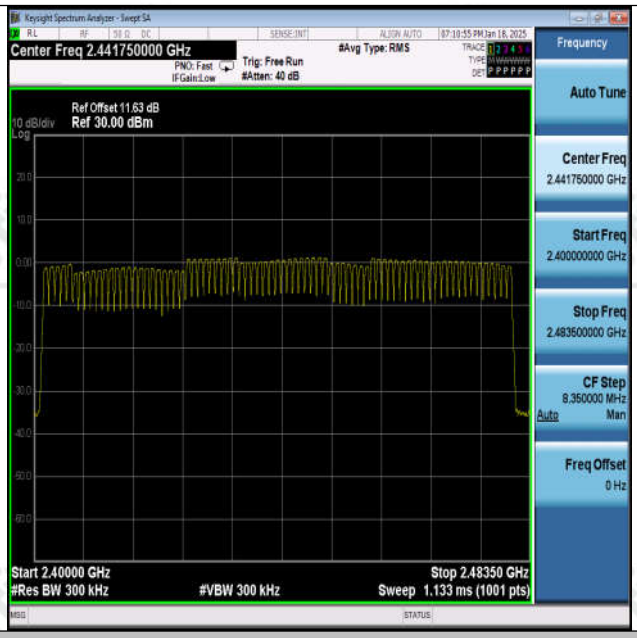
3DH5-Ant1-Hop-PASS

Appendix F: Number of hopping channels

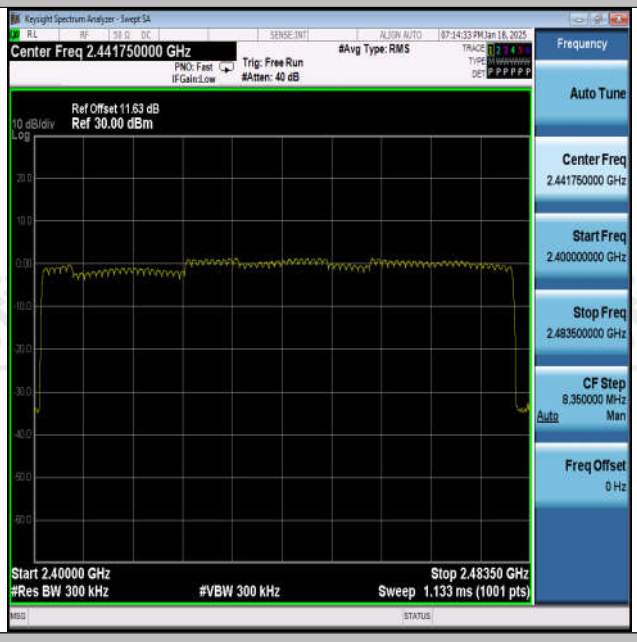
Test Result

TestMode	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

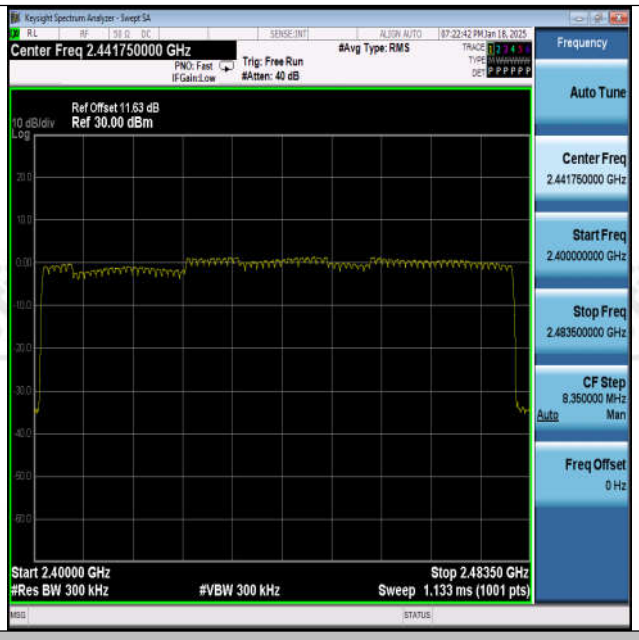
Test Graphs



DH5-Ant1-Hop-PASS



2DH5-Ant1-Hop-PASS



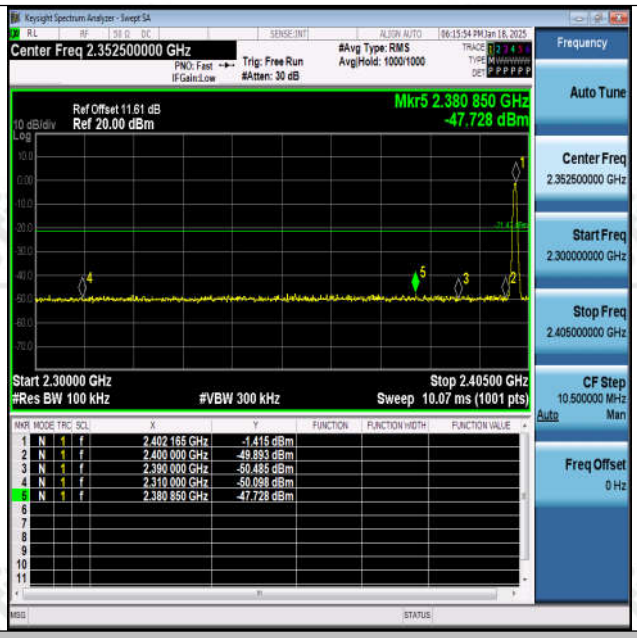
3DH5-Ant1-Hop-PASS

Appendix G: Band edge measurements

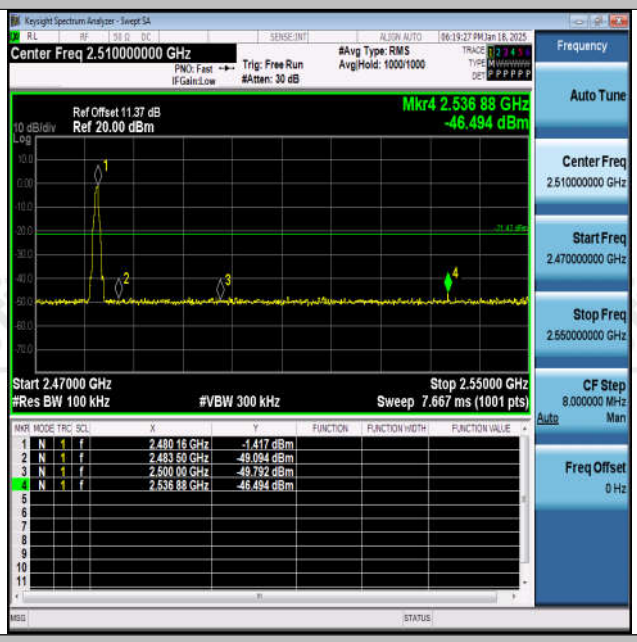
Test Result

TestMode	Antenna	ChName	Frequency[MHz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	Low	2402	-1.42	-47.73	≤-21.42	PASS
DH5	Ant1	High	2480	-1.42	-46.49	≤-21.42	PASS
DH5	Ant1	Low	Hop_2402	-1.36	-47.77	≤-21.36	PASS
DH5	Ant1	High	Hop_2480	-0.45	-47.9	≤-20.45	PASS
2DH5	Ant1	Low	2402	-1.92	-47.49	≤-21.92	PASS
2DH5	Ant1	High	2480	-1.52	-47.79	≤-21.52	PASS
2DH5	Ant1	Low	Hop_2402	-3.32	-47.43	≤-23.32	PASS
2DH5	Ant1	High	Hop_2480	-0.42	-46.98	≤-20.42	PASS
3DH5	Ant1	Low	2402	-1.33	-47.51	≤-21.33	PASS
3DH5	Ant1	High	2480	-1.53	-47.52	≤-21.53	PASS
3DH5	Ant1	Low	Hop_2402	-2.07	-46.89	≤-22.07	PASS
3DH5	Ant1	High	Hop_2480	-0.15	-46.63	≤-20.15	PASS

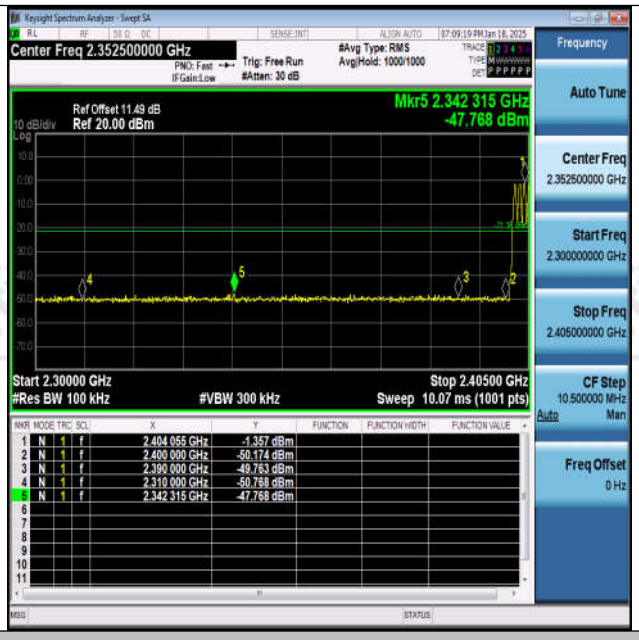
Test Graphs



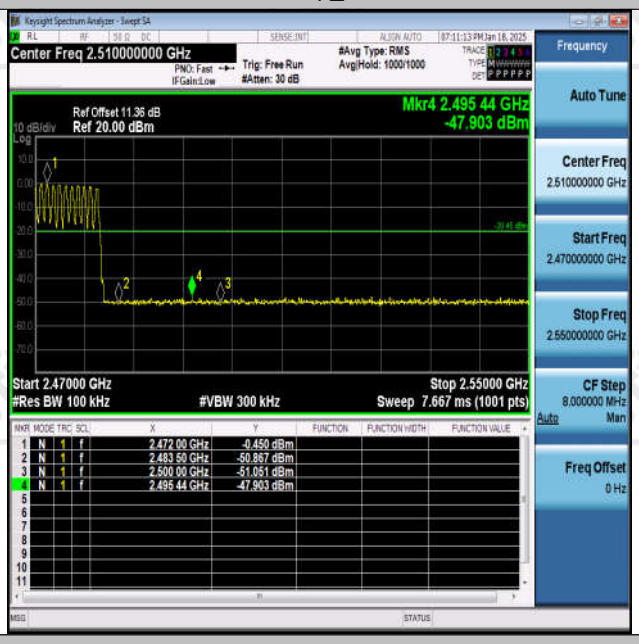
DH5-Ant1-2402-PASS



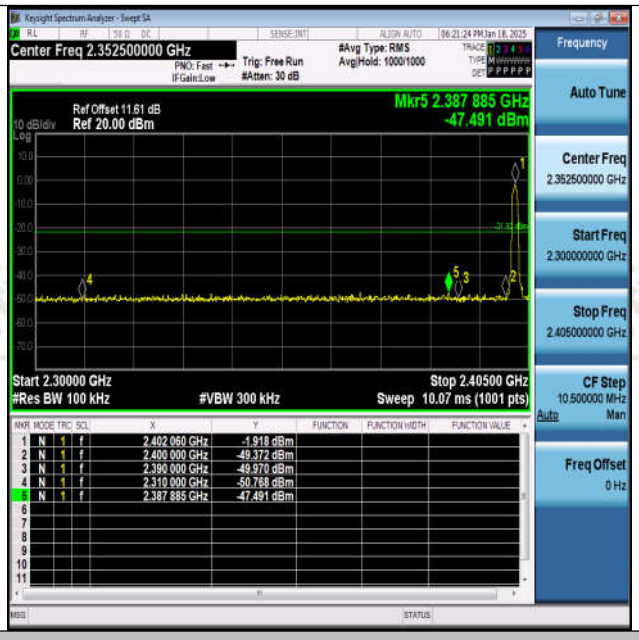
DH5-Ant1-2480-PASS



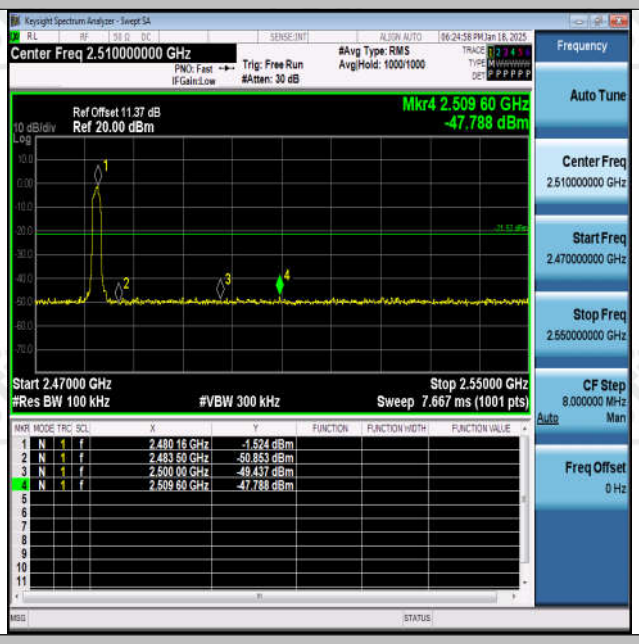
DH5-Ant1-Hop_2402-PASS



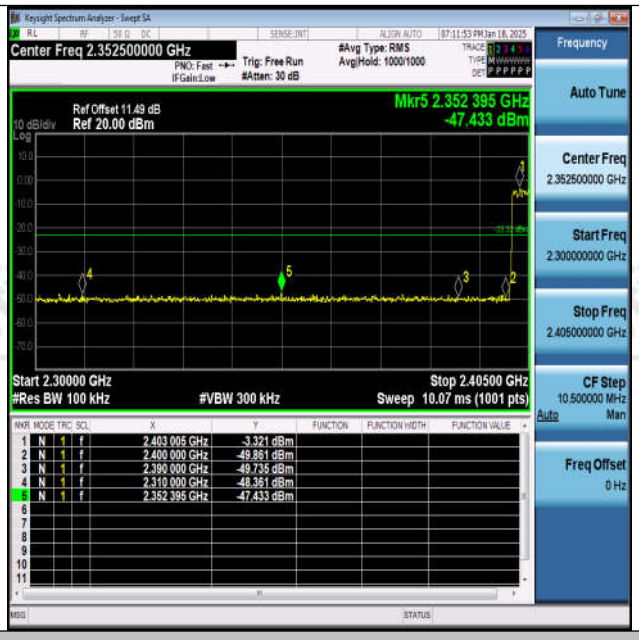
DH5-Ant1-Hop_2480-PASS



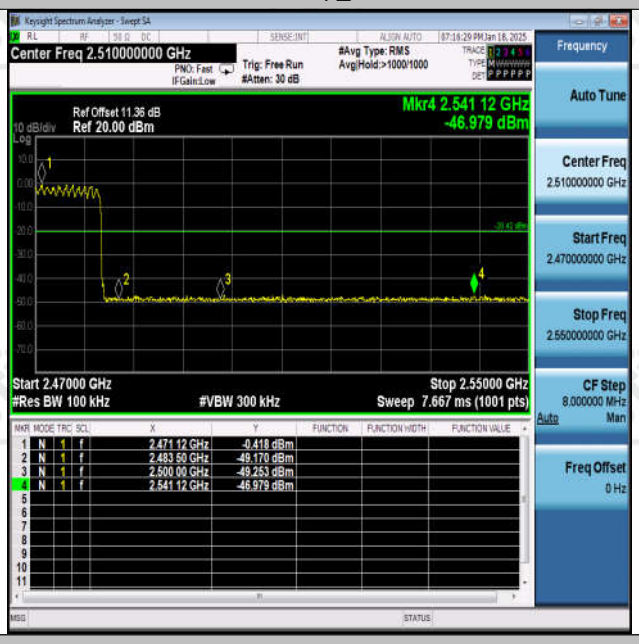
2DH5-Ant1-2402-PASS



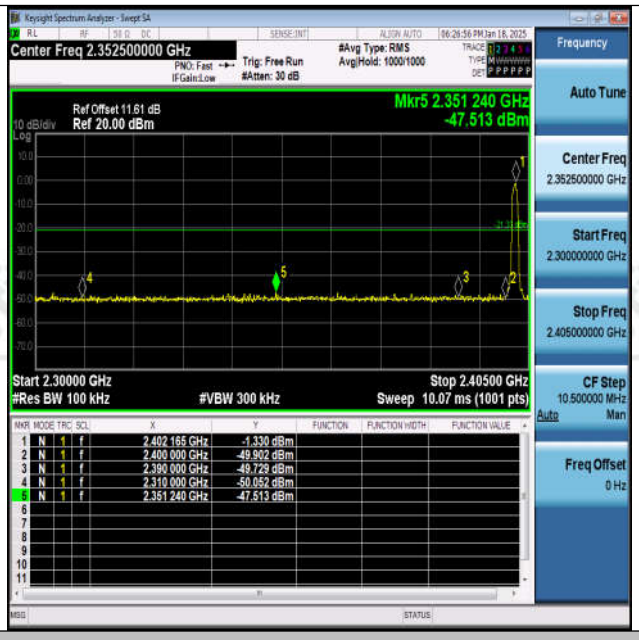
2DH5-Ant1-2480-PASS



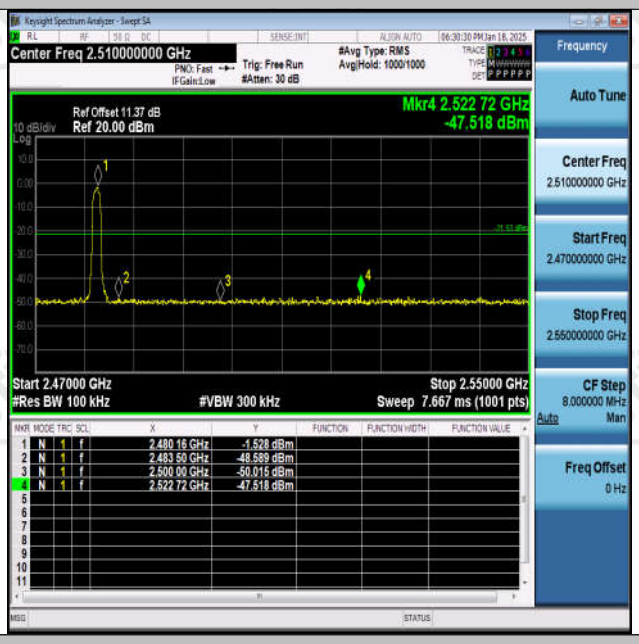
2DH5-Ant1-Hop_2402-PASS



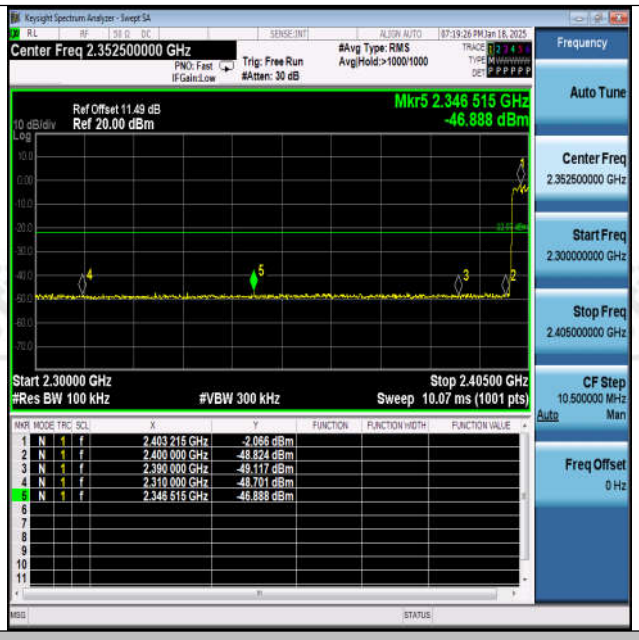
2DH5-Ant1-Hop_2480-PASS



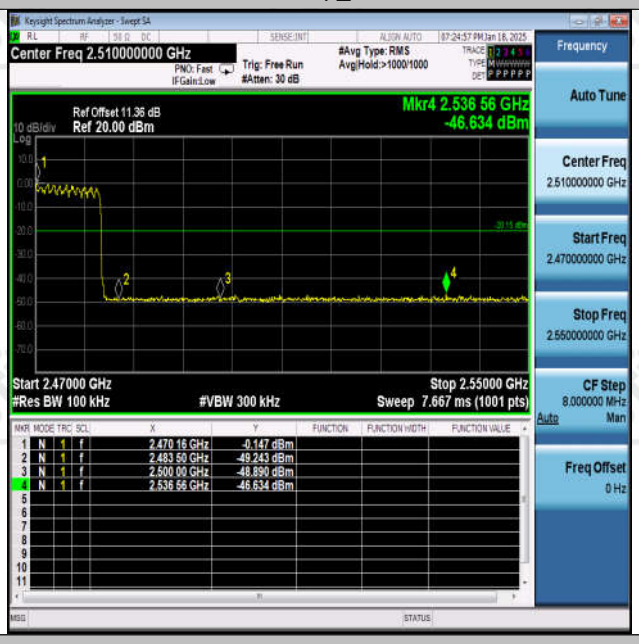
3DH5-Ant1-2402-PASS



3DH5-Ant1-2480-PASS



3DH5-Ant1-Hop_2402-PASS



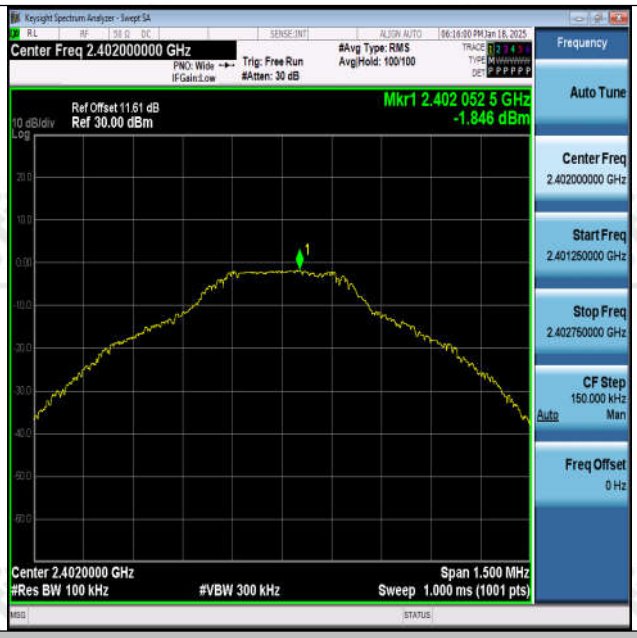
3DH5-Ant1-Hop_2480-PASS

Appendix H: Conducted Spurious Emission

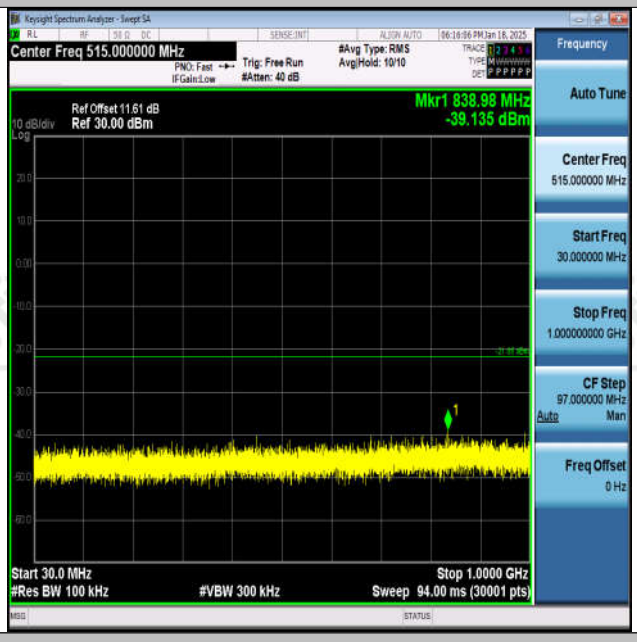
Test Result

TestMode	Antenna	Frequency[MHz]	FreqRange [MHz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	2402	0~Reference	-1.85	-1.85	---	PASS
DH5	Ant1	2402	30~1000	-1.85	-39.14	≤-21.85	PASS
DH5	Ant1	2402	1000~26500	-1.85	-40.94	≤-21.85	PASS
DH5	Ant1	2441	0~Reference	-0.40	-0.40	---	PASS
DH5	Ant1	2441	30~1000	-0.40	-40.45	≤-20.4	PASS
DH5	Ant1	2441	1000~26500	-0.40	-41.91	≤-20.4	PASS
DH5	Ant1	2480	0~Reference	-1.54	-1.54	---	PASS
DH5	Ant1	2480	30~1000	-1.54	-40.19	≤-21.54	PASS
DH5	Ant1	2480	1000~26500	-1.54	-42.09	≤-21.54	PASS
2DH5	Ant1	2402	0~Reference	-1.65	-1.65	---	PASS
2DH5	Ant1	2402	30~1000	-1.65	-39.09	≤-21.65	PASS
2DH5	Ant1	2402	1000~26500	-1.65	-41.69	≤-21.65	PASS
2DH5	Ant1	2441	0~Reference	-0.57	-0.57	---	PASS
2DH5	Ant1	2441	30~1000	-0.57	-39.34	≤-20.57	PASS
2DH5	Ant1	2441	1000~26500	-0.57	-42.22	≤-20.57	PASS
2DH5	Ant1	2480	0~Reference	-2.25	-2.25	---	PASS
2DH5	Ant1	2480	30~1000	-2.25	-39.62	≤-22.25	PASS
2DH5	Ant1	2480	1000~26500	-2.25	-41.45	≤-22.25	PASS
3DH5	Ant1	2402	0~Reference	-1.39	-1.39	---	PASS
3DH5	Ant1	2402	30~1000	-1.39	-39.84	≤-21.39	PASS
3DH5	Ant1	2402	1000~26500	-1.39	-41.66	≤-21.39	PASS
3DH5	Ant1	2441	0~Reference	0.08	0.08	---	PASS
3DH5	Ant1	2441	30~1000	0.08	-39.35	≤-19.92	PASS
3DH5	Ant1	2441	1000~26500	0.08	-41.63	≤-19.92	PASS
3DH5	Ant1	2480	0~Reference	-1.55	-1.55	---	PASS
3DH5	Ant1	2480	30~1000	-1.55	-40.33	≤-21.55	PASS
3DH5	Ant1	2480	1000~26500	-1.55	-41.48	≤-21.55	PASS

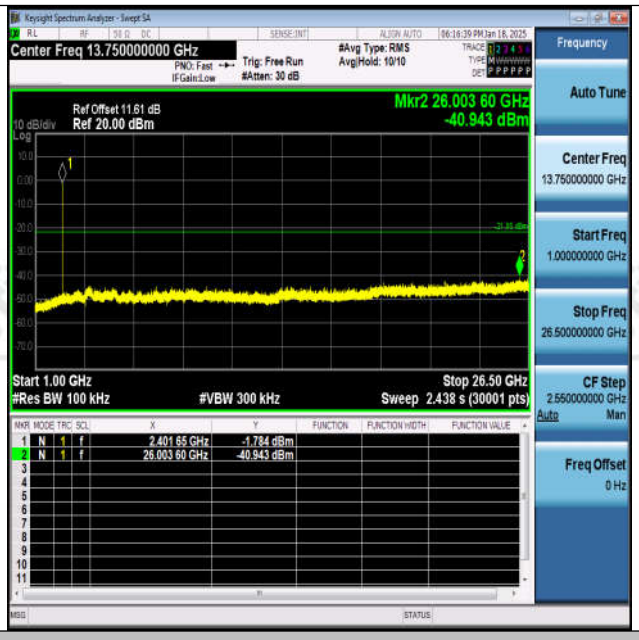
Test Graphs



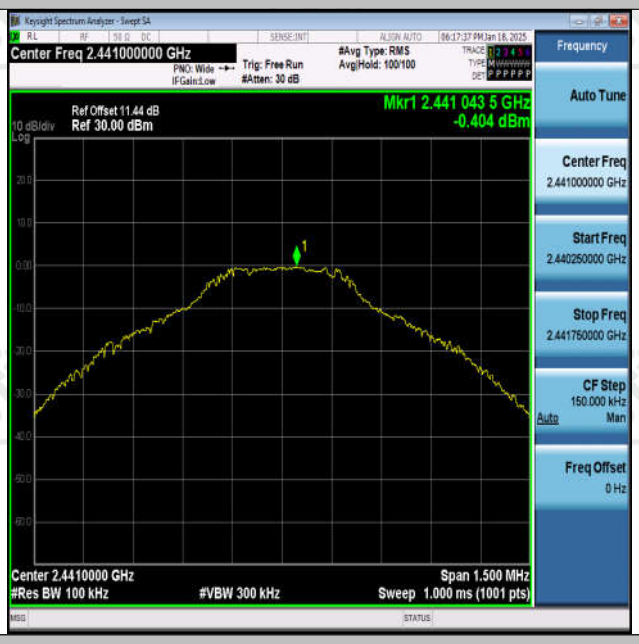
DH5-Ant1-2402-0~Reference-PASS



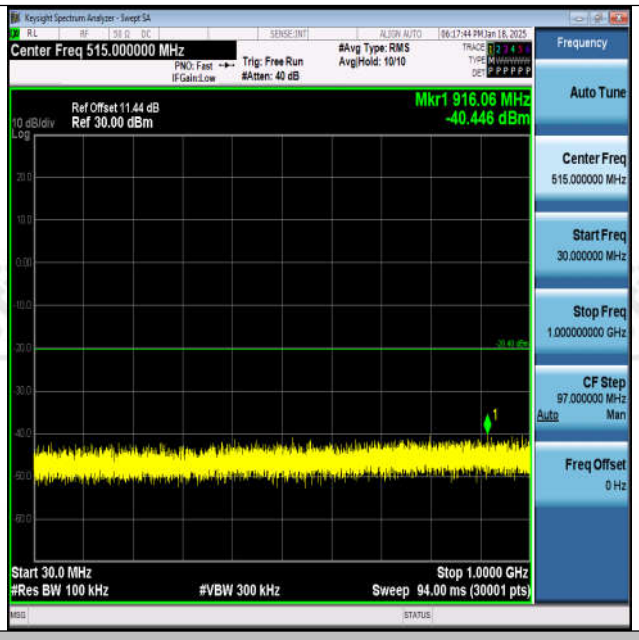
DH5-Ant1-2402-30~1000-PASS



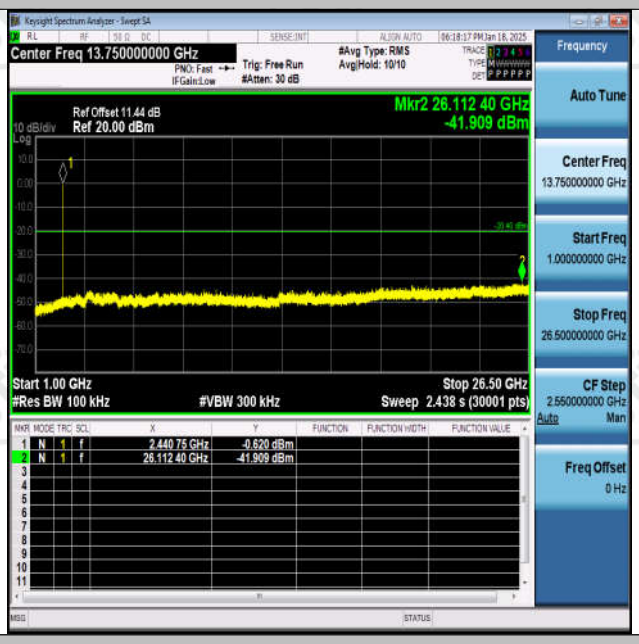
DH5-Ant1-2402-1000~26500-PASS



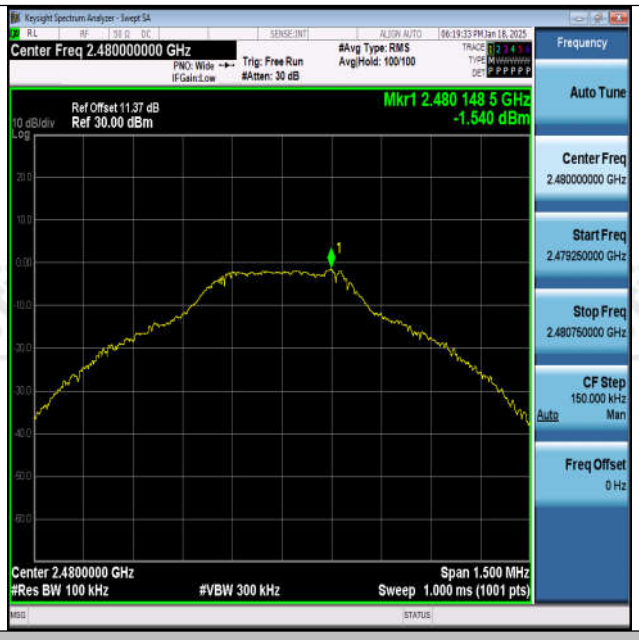
DH5-Ant1-2441-0~Reference-PASS



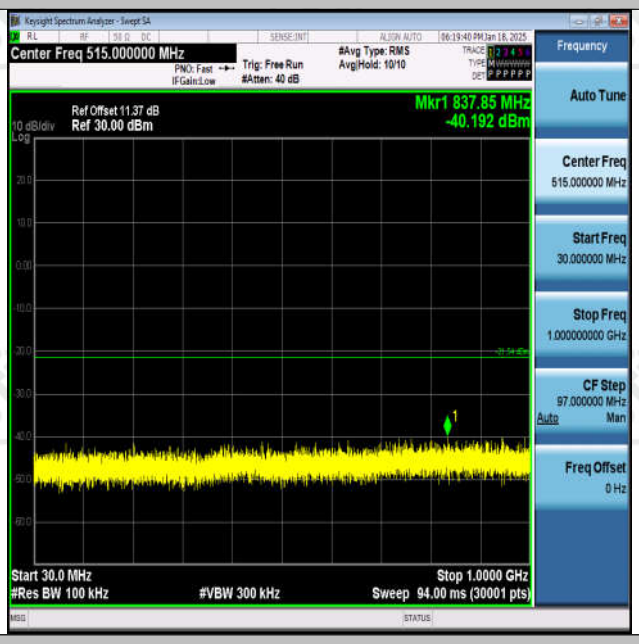
DH5-Ant1-2441-30~1000-PASS



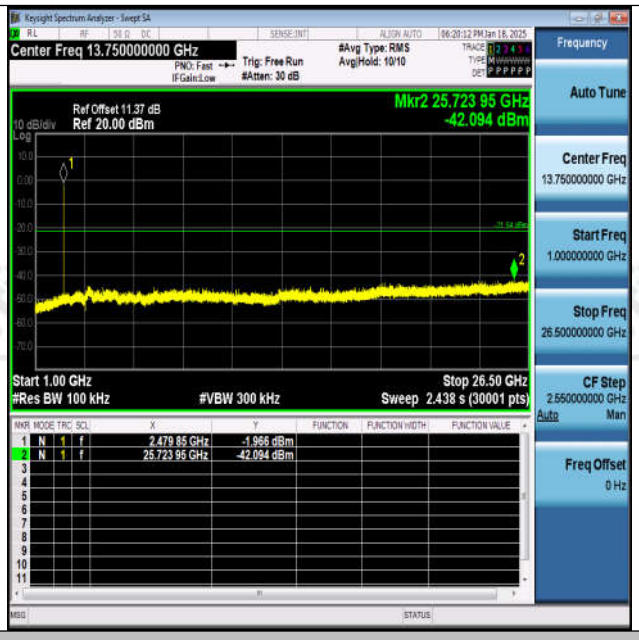
DH5-Ant1-2441-1000~26500-PASS



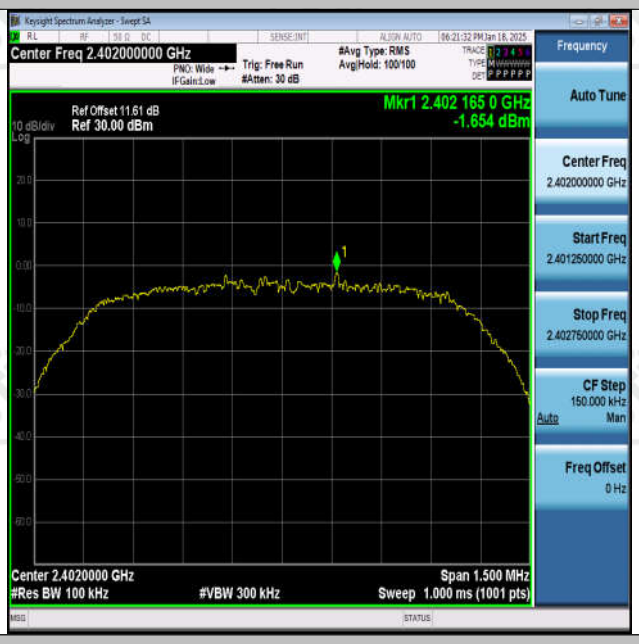
DH5-Ant1-2480-0~Reference-PASS



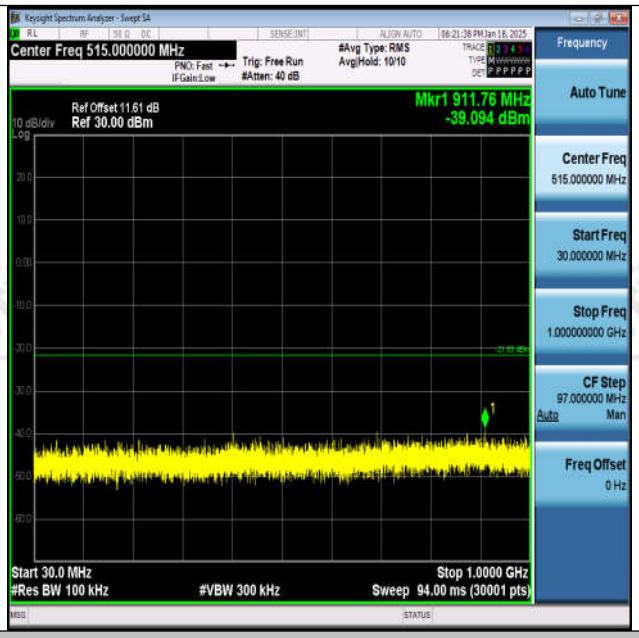
DH5-Ant1-2480-30~1000-PASS



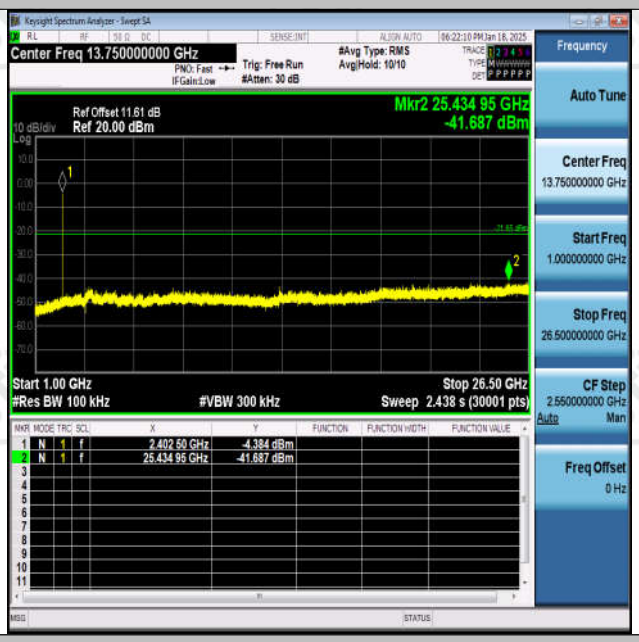
DH5-Ant1-2480-1000~26500-PASS



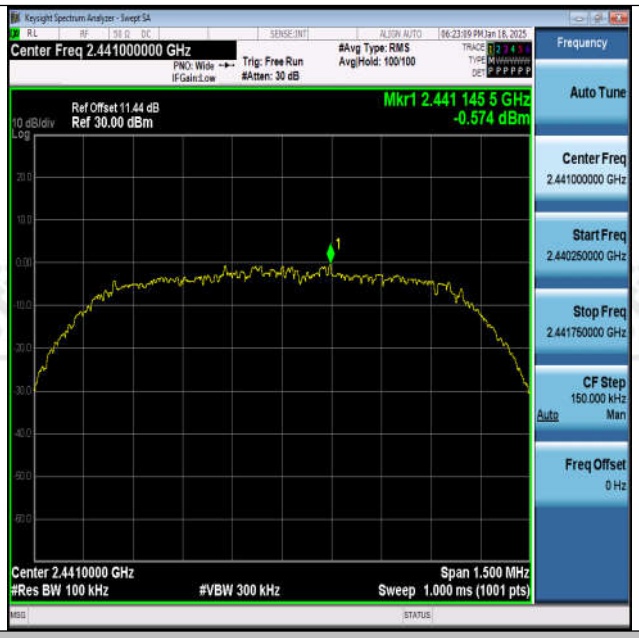
2DH5-Ant1-2402-0~Reference-PASS



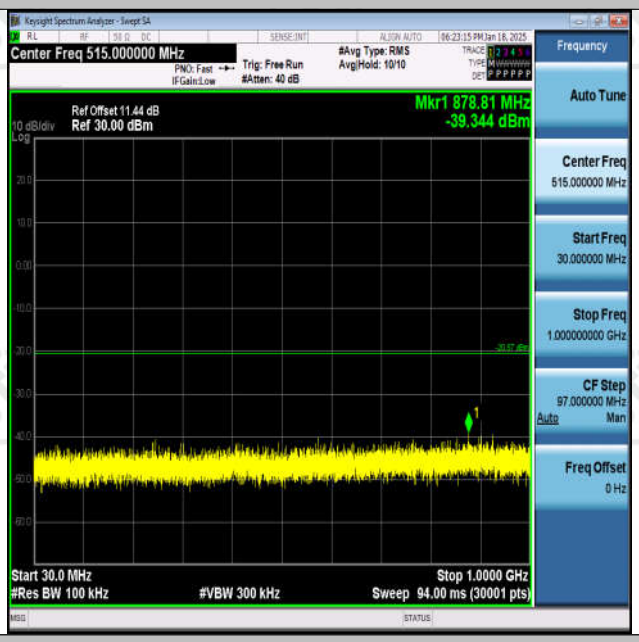
2DH5-Ant1-2402-30~1000-PASS



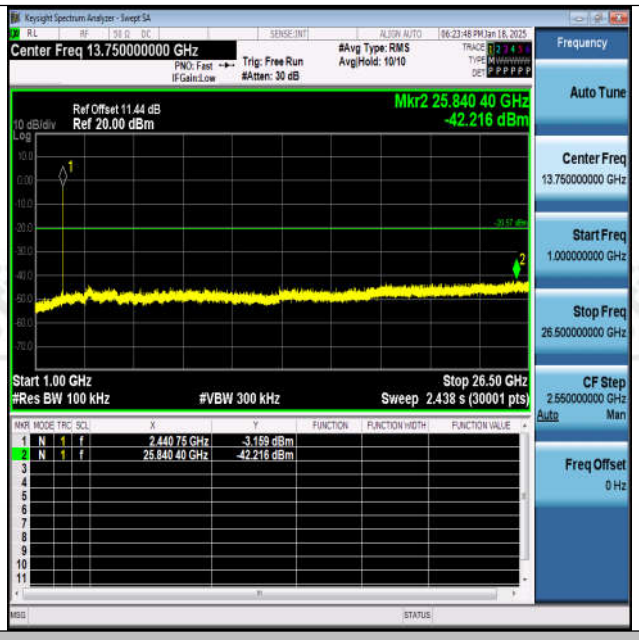
2DH5-Ant1-2402-1000~26500-PASS



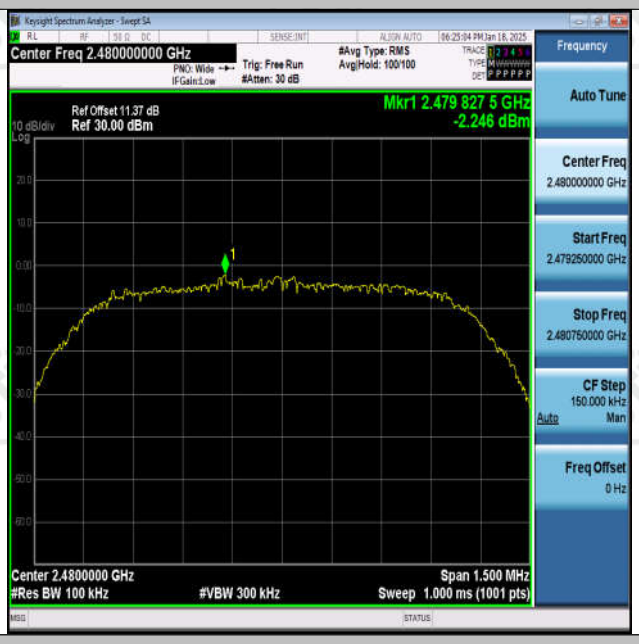
2DH5-Ant1-2441-0~Reference-PASS



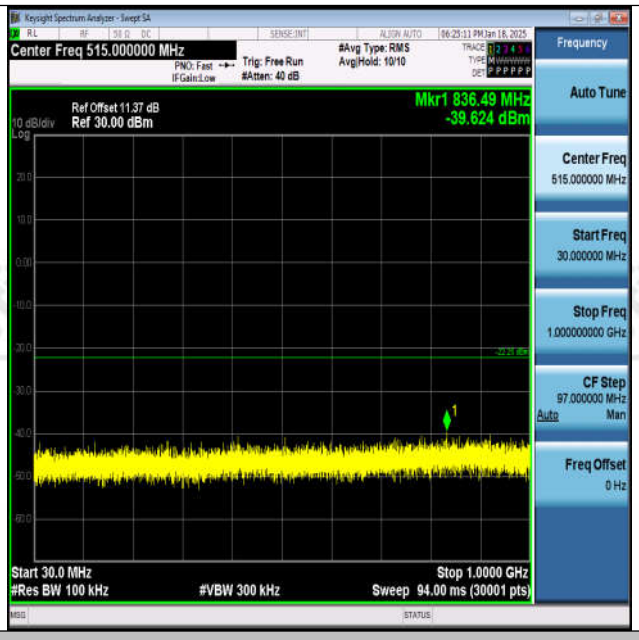
2DH5-Ant1-2441-30~1000-PASS



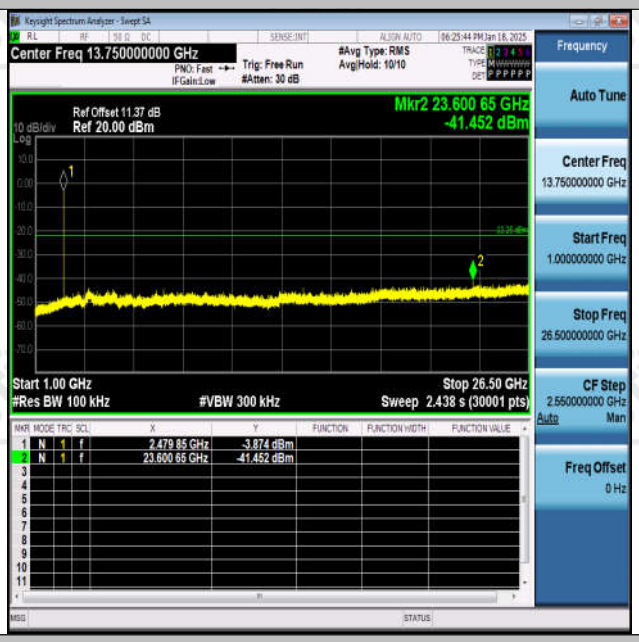
2DH5-Ant1-2441-1000~26500-PASS



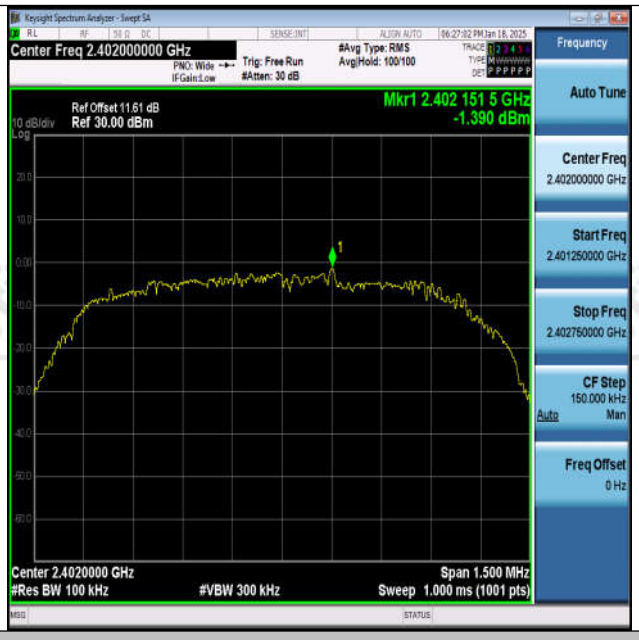
2DH5-Ant1-2480-0~Reference-PASS



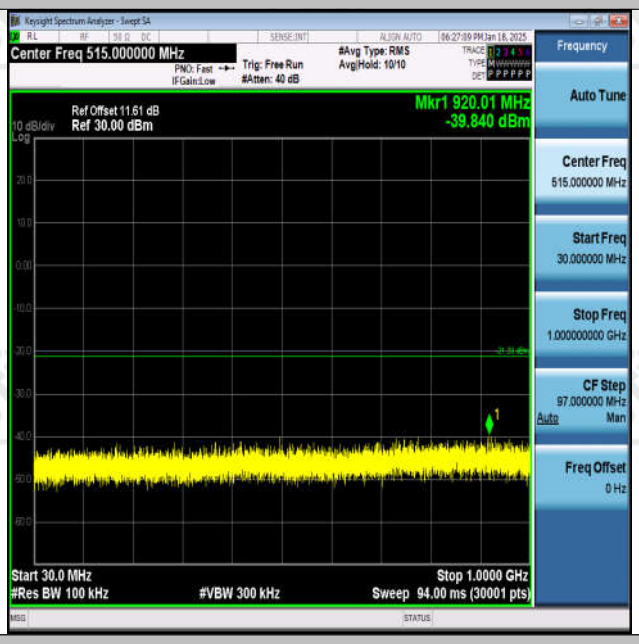
2DH5-Ant1-2480-30~1000-PASS



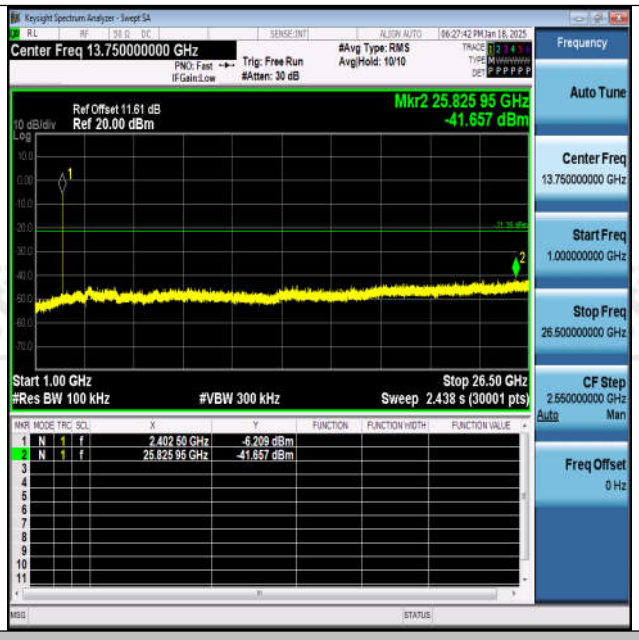
2DH5-Ant1-2480-1000~26500-PASS



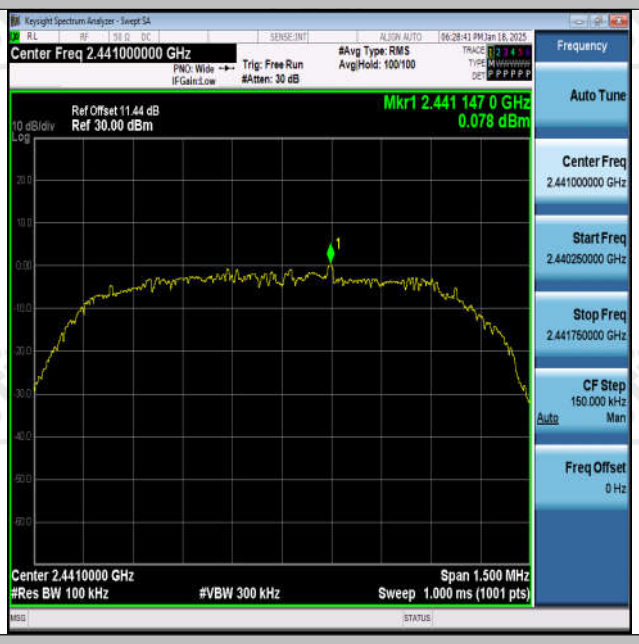
3DH5-Ant1-2402-0~Reference-PASS



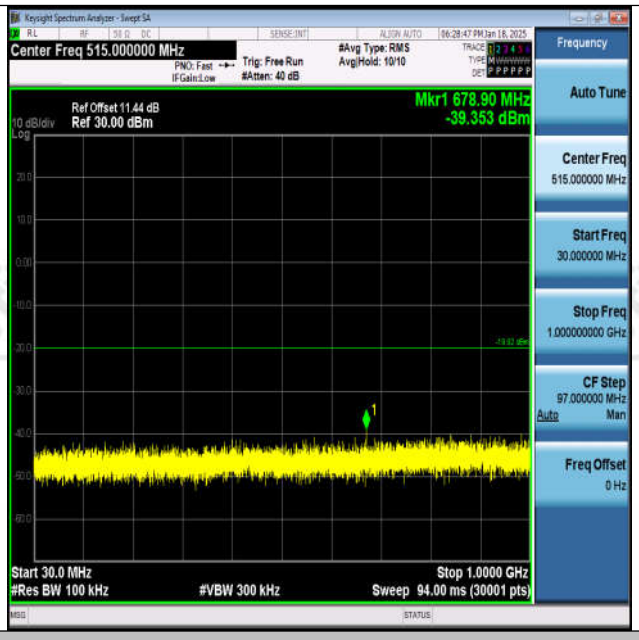
3DH5-Ant1-2402-30~1000-PASS



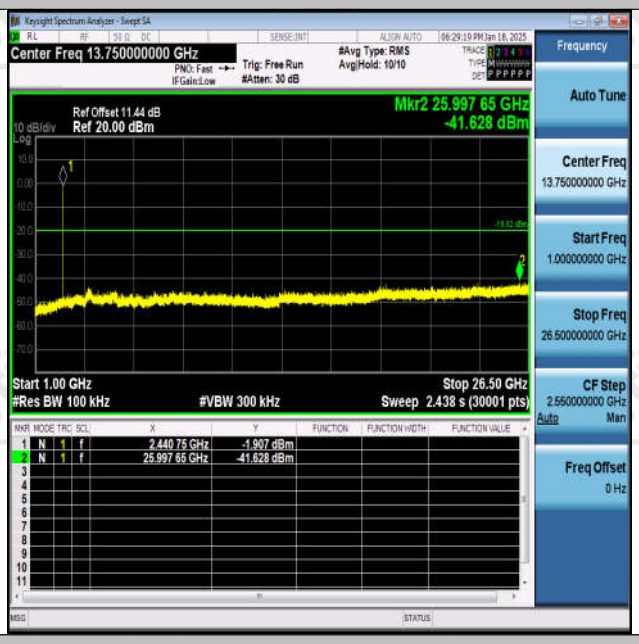
3DH5-Ant1-2402-1000~26500-PASS



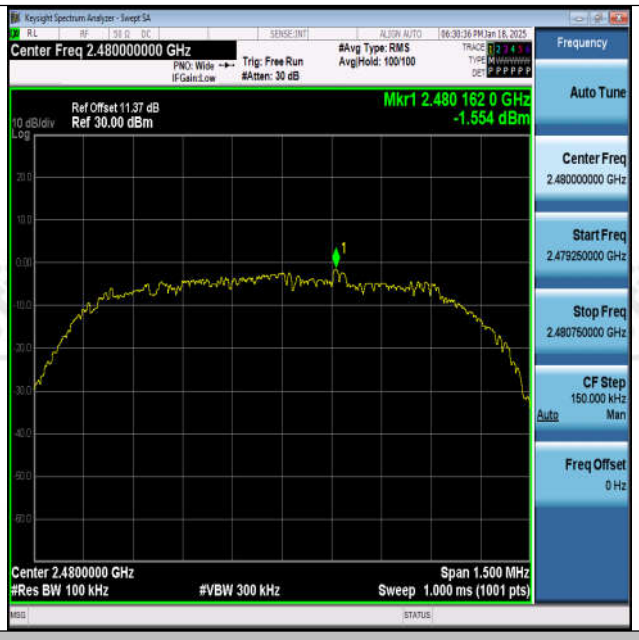
3DH5-Ant1-2441-0~Reference-PASS



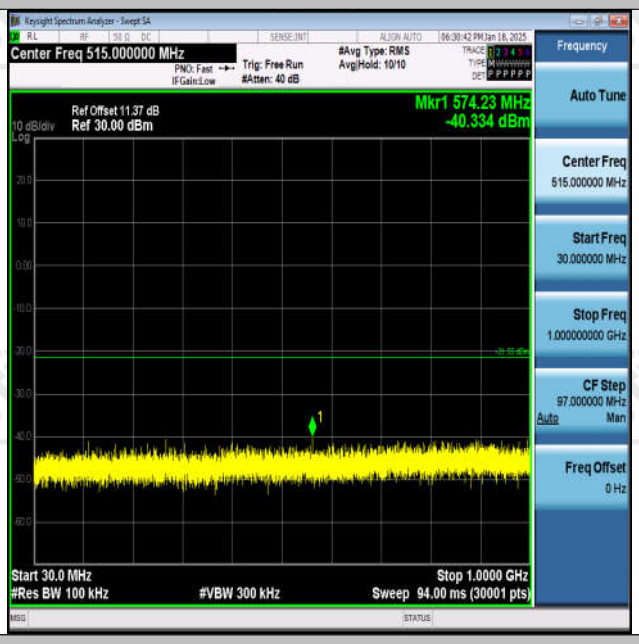
3DH5-Ant1-2441-30~1000-PASS



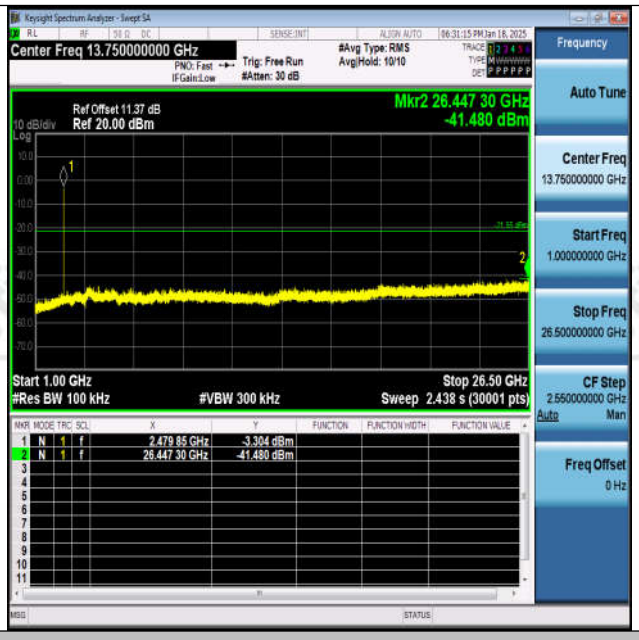
3DH5-Ant1-2441-1000~26500-PASS



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



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



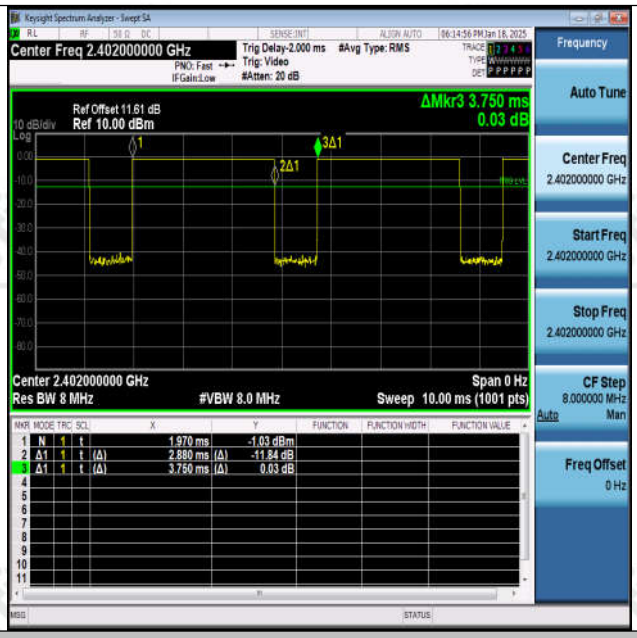
3DH5-Ant1-2480-1000~26500-PASS

Appendix I: Duty Cycle

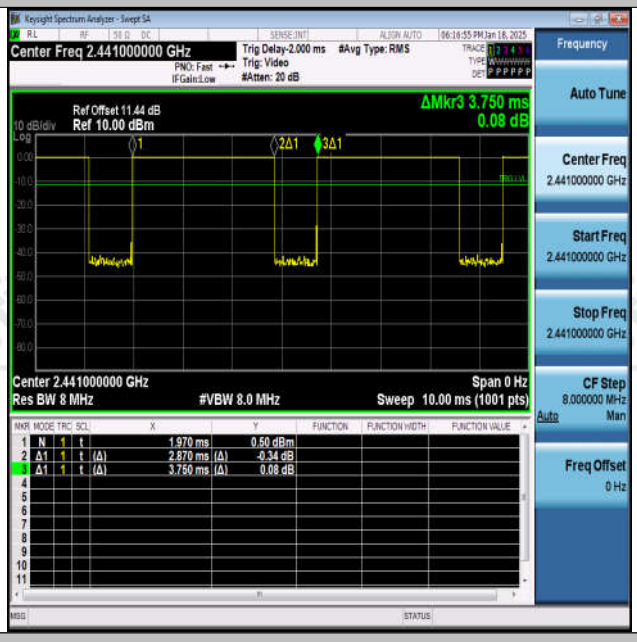
Test Result

TestMode	Antenna	Frequency[MHz]	ON Time [ms]	Period [ms]	Duty Cycle [%]	Duty Cycle Factor[dB]
DH5	Ant1	2402	2.88	3.75	76.80	1.15
DH5	Ant1	2441	2.87	3.75	76.53	1.16
DH5	Ant1	2480	2.88	3.75	76.80	1.15
2DH5	Ant1	2402	2.88	3.75	76.80	1.15
2DH5	Ant1	2441	2.88	3.75	76.80	1.15
2DH5	Ant1	2480	2.88	3.75	76.80	1.15
3DH5	Ant1	2402	2.88	3.75	76.80	1.15
3DH5	Ant1	2441	2.88	3.75	76.80	1.15
3DH5	Ant1	2480	2.88	3.75	76.80	1.15

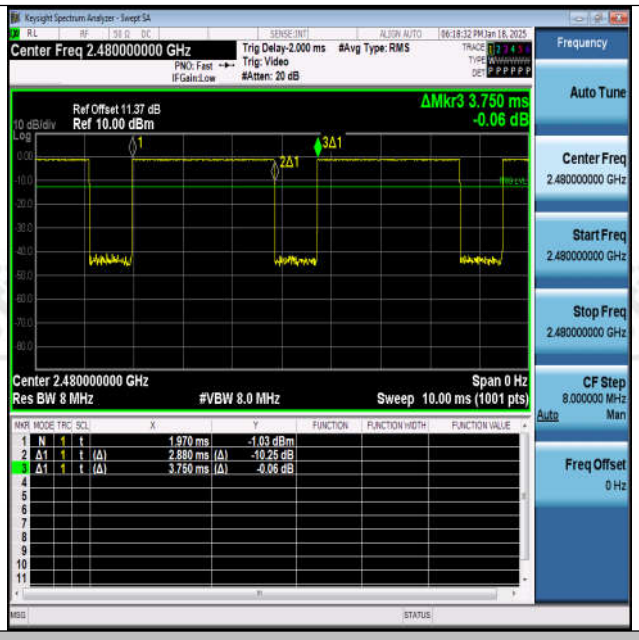
Test Graphs



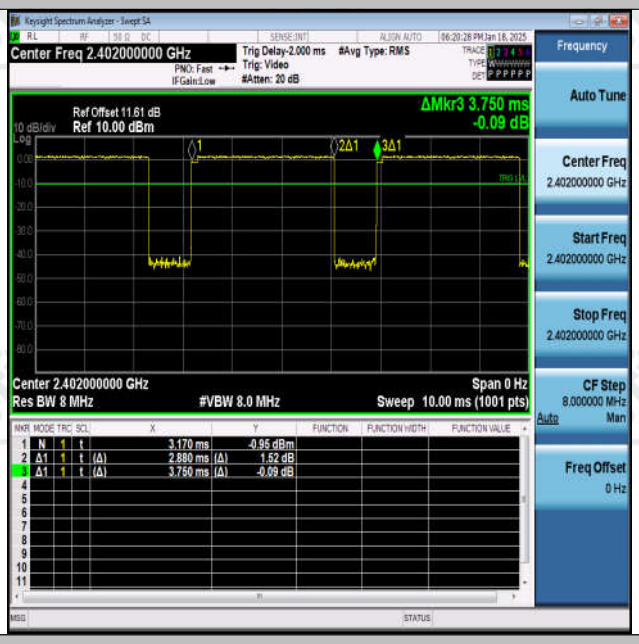
NTNV-DH5-Ant1-2402



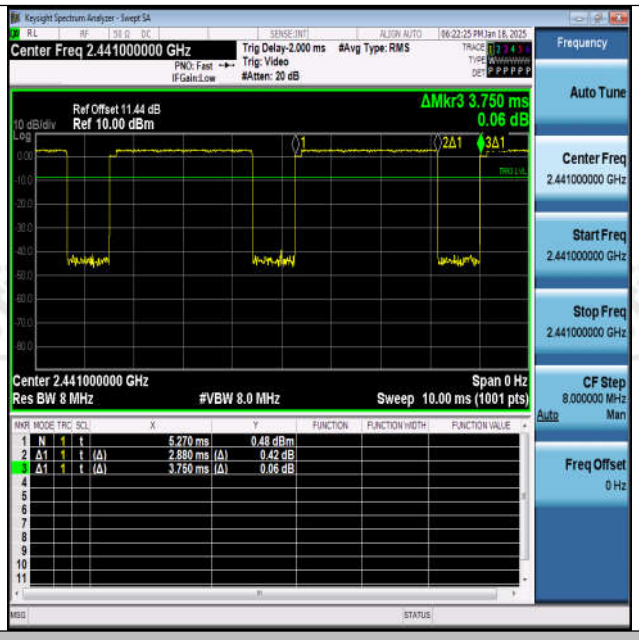
NTNV-DH5-Ant1-2441



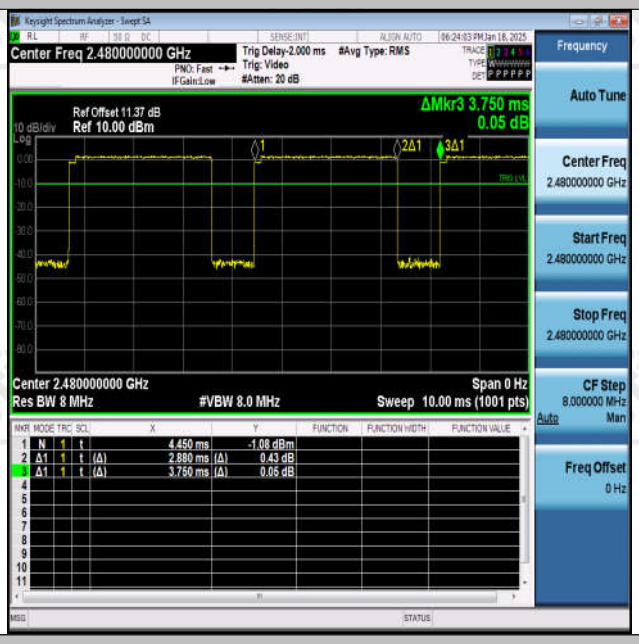
NTNV-DH5-Ant1-2480



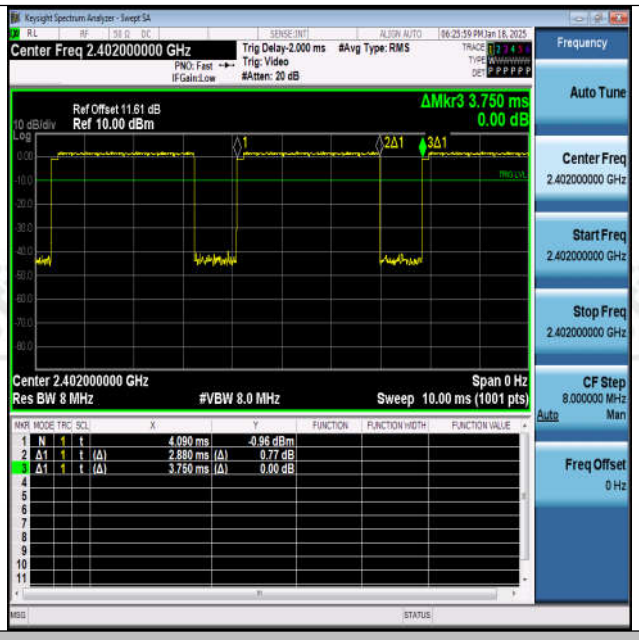
NTNV-2DH5-Ant1-2402



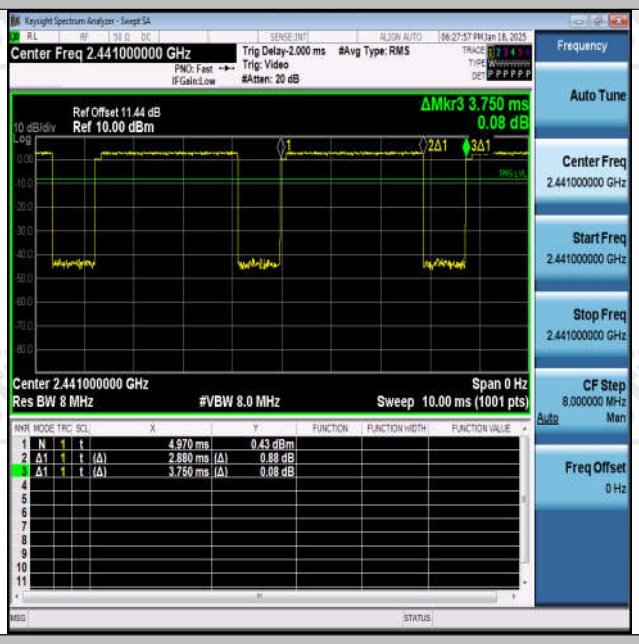
NTNV-2DH5-Ant1-2441



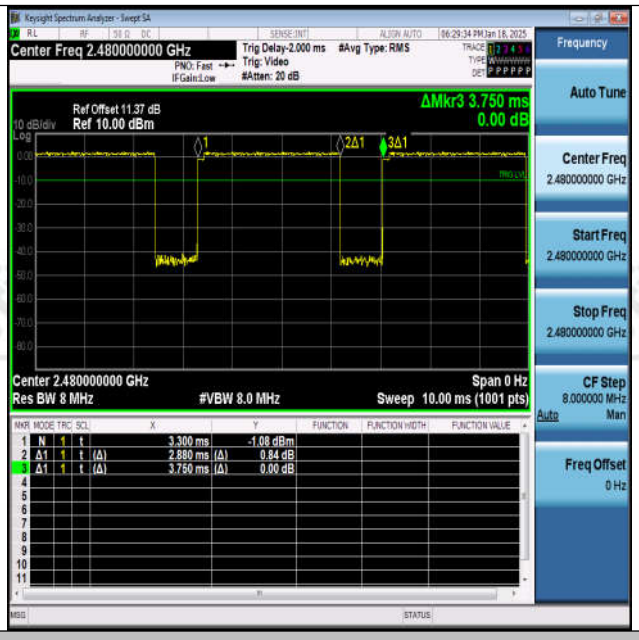
NTNV-2DH5-Ant1-2480



NTNV-3DH5-Ant1-2402



NTNV-3DH5-Ant1-2441



NTNV-3DH5-Ant1-2480

*** End of Report ***