

<b>Case No. :</b> <u>GTS20241217020-2-09</u>
<b>Ambient Condition:</b> <u>22 °C, 51 %RH</u>
<b>According Standard:</b> <u>■Part15C</u>
<b>Test Date:</b> <u>2025.2.13</u> <b>Test Engineer:</b> <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	0.960	2401.538	2402.498	---	---
		2441	0.969	2440.529	2441.498	---	---
		2480	0.966	2479.529	2480.495	---	---
2DH1	Ant1	2402	1.374	2401.316	2402.690	---	---
		2441	1.374	2440.316	2441.690	---	---
		2480	1.377	2479.313	2480.690	---	---
3DH1	Ant1	2402	1.353	2401.322	2402.675	---	---
		2441	1.353	2440.322	2441.675	---	---
		2480	1.356	2479.319	2480.675	---	---

## Test Graphs

DH1\_Ant1\_2402



DH1\_Ant1\_2441



DH1\_Ant1\_2480



2DH1\_Ant1\_2402



2DH1\_Ant1\_2441



2DH1\_Ant1\_2480



3DH1\_Ant1\_2402



3DH1\_Ant1\_2441



3DH1\_Ant1\_2480



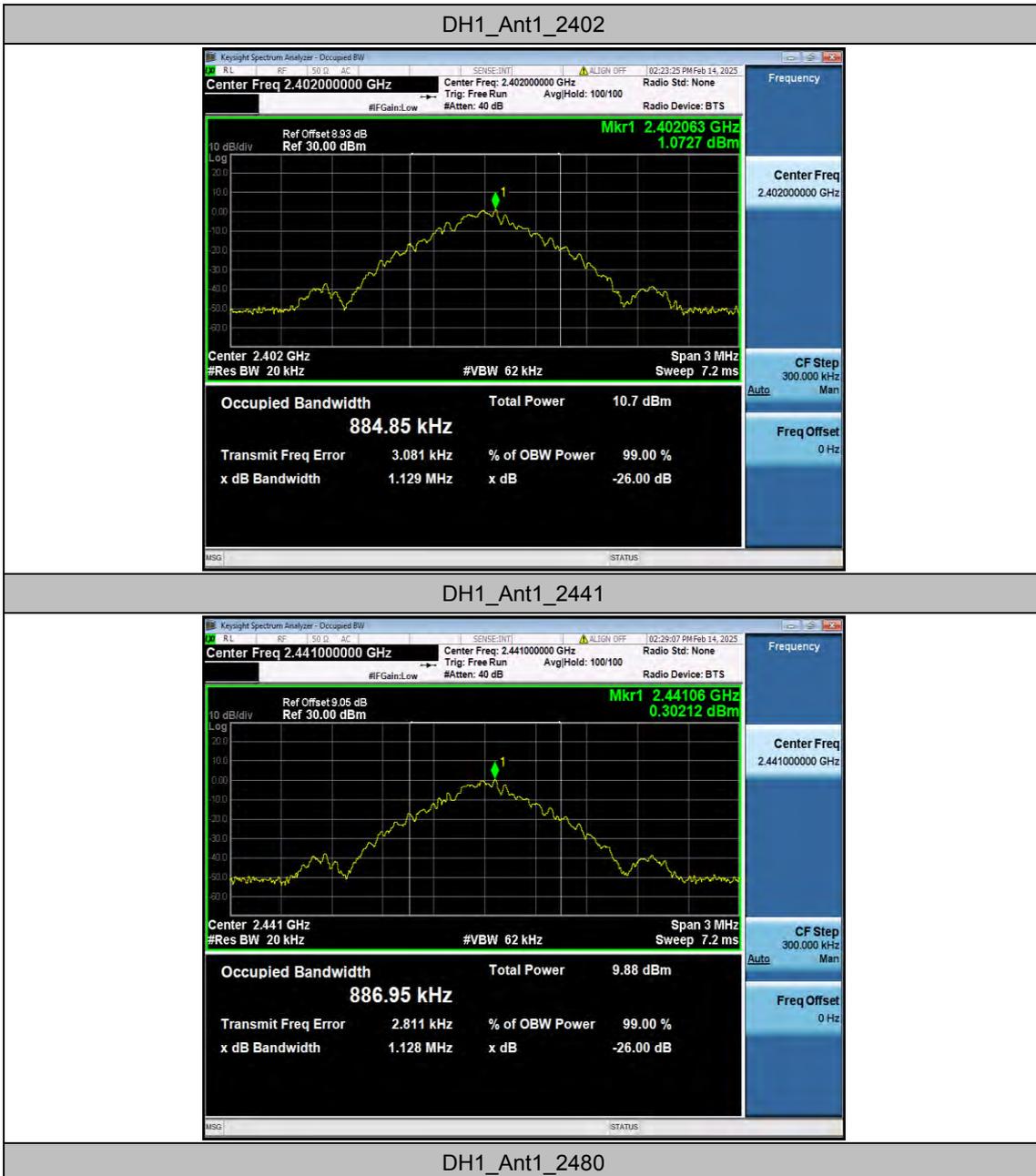
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## Appendix A.2: Occupied Channel Bandwidth

### Test Result

TestMode	Antenna	Freq(MHz)	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH1	Ant1	2402	0.88485	2401.5607	2402.4455	---	---
		2441	0.88695	2440.5593	2441.4463	---	---
		2480	0.88599	2479.5574	2480.4434	---	---
2DH1	Ant1	2402	1.2010	2401.4023	2402.6033	---	---
		2441	1.1982	2440.4029	2441.6011	---	---
		2480	1.1987	2479.4016	2480.6003	---	---
3DH1	Ant1	2402	1.2068	2401.3886	2402.5954	---	---
		2441	1.2042	2440.3901	2441.5943	---	---
		2480	1.2057	2479.3887	2480.5944	---	---

## Test Graphs





2DH1\_Ant1\_2402



2DH1\_Ant1\_2441



2DH1\_Ant1\_2480



3DH1\_Ant1\_2402



3DH1\_Ant1\_2441



3DH1\_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	4.57	≤20.97	PASS
		2441	3.86	≤20.97	PASS
		2480	3.08	≤20.97	PASS
2DH1	Ant1	2402	6.45	≤20.97	PASS
		2441	5.95	≤20.97	PASS
		2480	5.23	≤20.97	PASS
3DH1	Ant1	2402	6.93	≤20.97	PASS
		2441	6.36	≤20.97	PASS
		2480	5.70	≤20.97	PASS

## Appendix A.4: Carrier frequency separation

### Test Result

TestMode	Antenna	Freq(MHz)	Result[MHz]	Limit[MHz]	Verdict
DH1	Ant1	Hop_2402	0.838	$\geq 0.646$	PASS
		Hop_2441	1.174	$\geq 0.646$	PASS
		Hop_2480	1.162	$\geq 0.646$	PASS
2DH1	Ant1	Hop_2402	0.99	$\geq 0.918$	PASS
		Hop_2441	1.154	$\geq 0.918$	PASS
		Hop_2480	1.332	$\geq 0.918$	PASS
3DH1	Ant1	Hop_2402	1.016	$\geq 0.904$	PASS
		Hop_2441	1.004	$\geq 0.904$	PASS
		Hop_2480	0.99	$\geq 0.904$	PASS

## Test Graphs





2DH1\_Ant1\_Hop\_2402



2DH1\_Ant1\_Hop\_2441



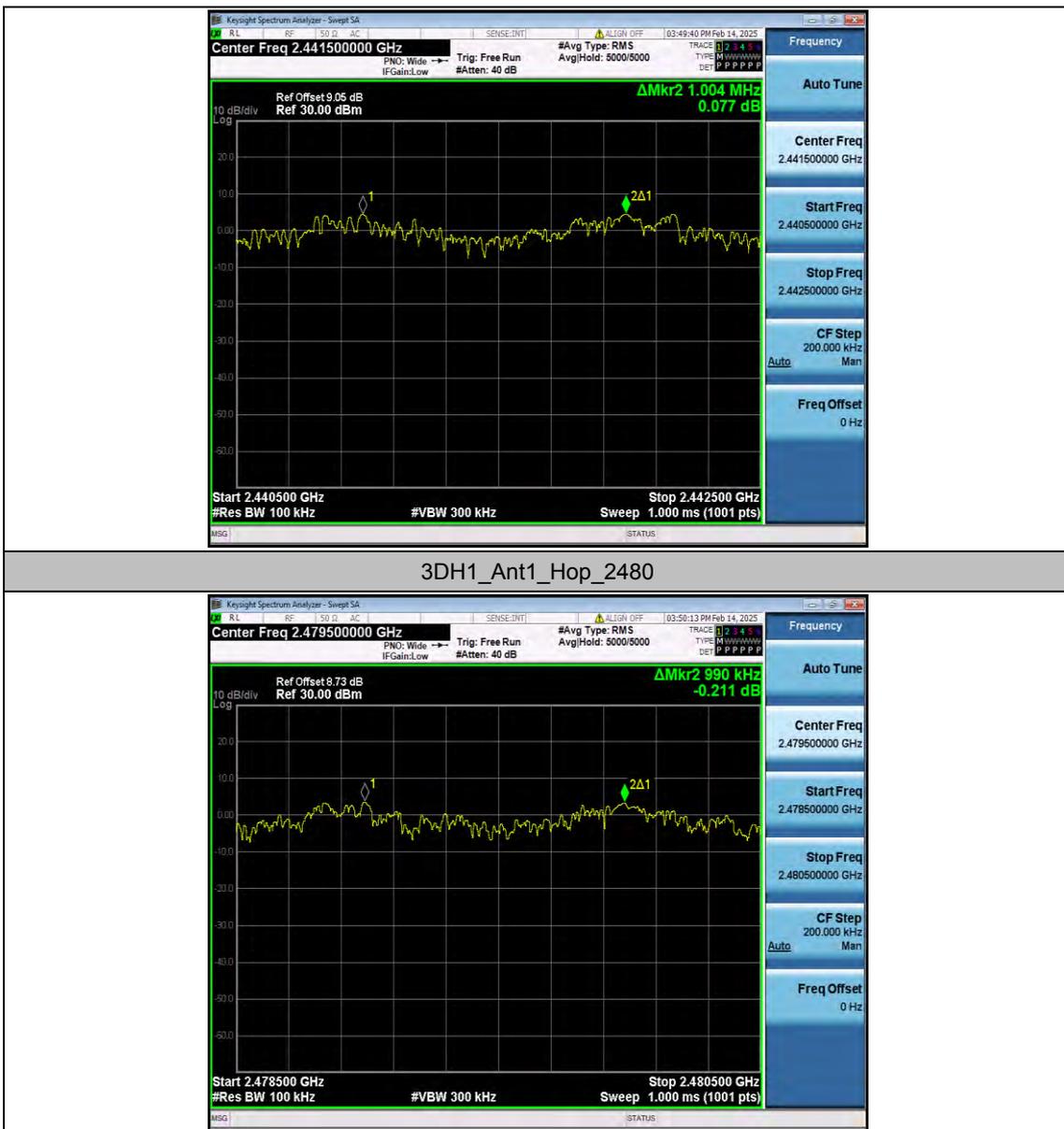
2DH1\_Ant1\_Hop\_2480



3DH1\_Ant1\_Hop\_2402



3DH1\_Ant1\_Hop\_2441

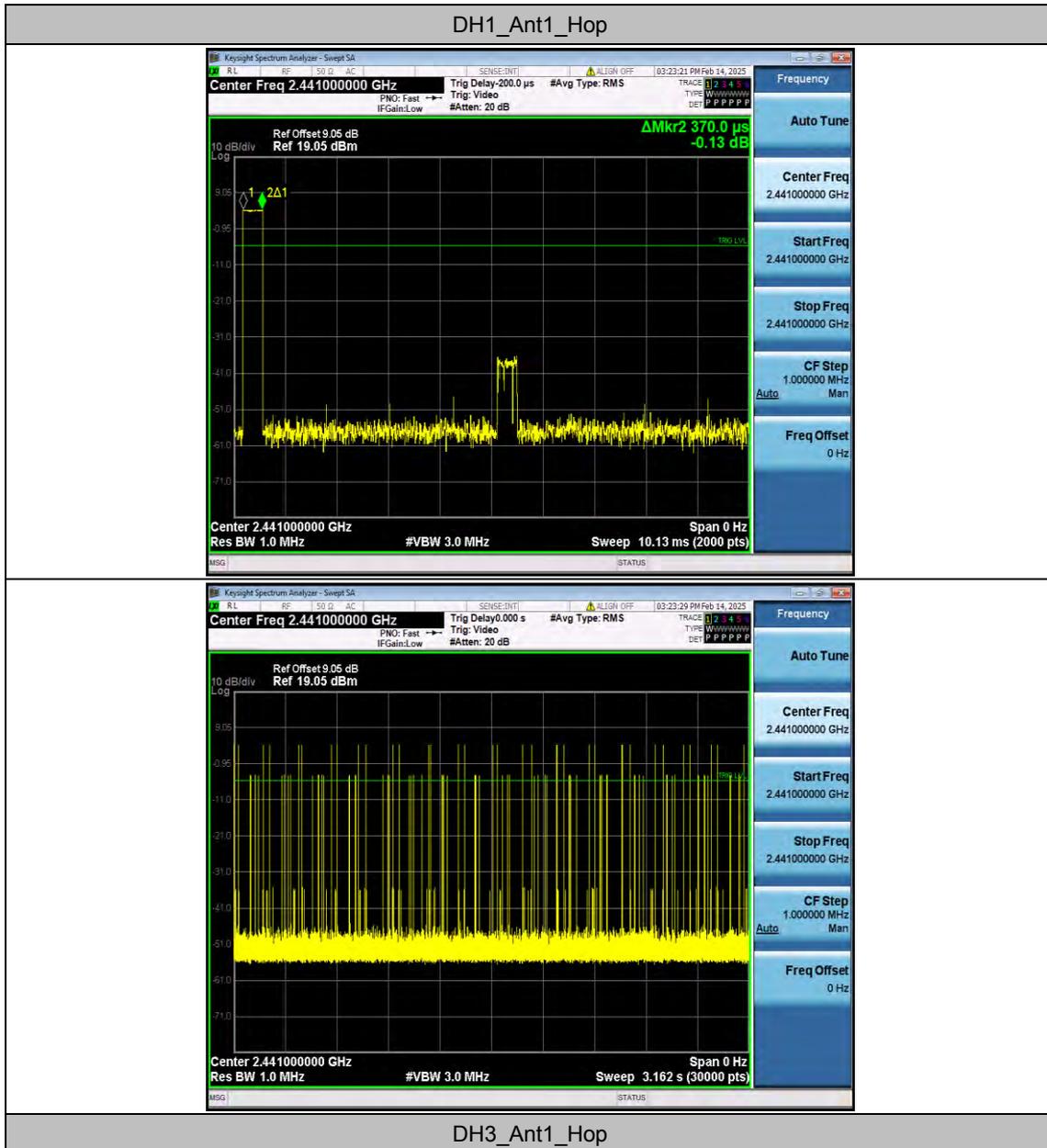


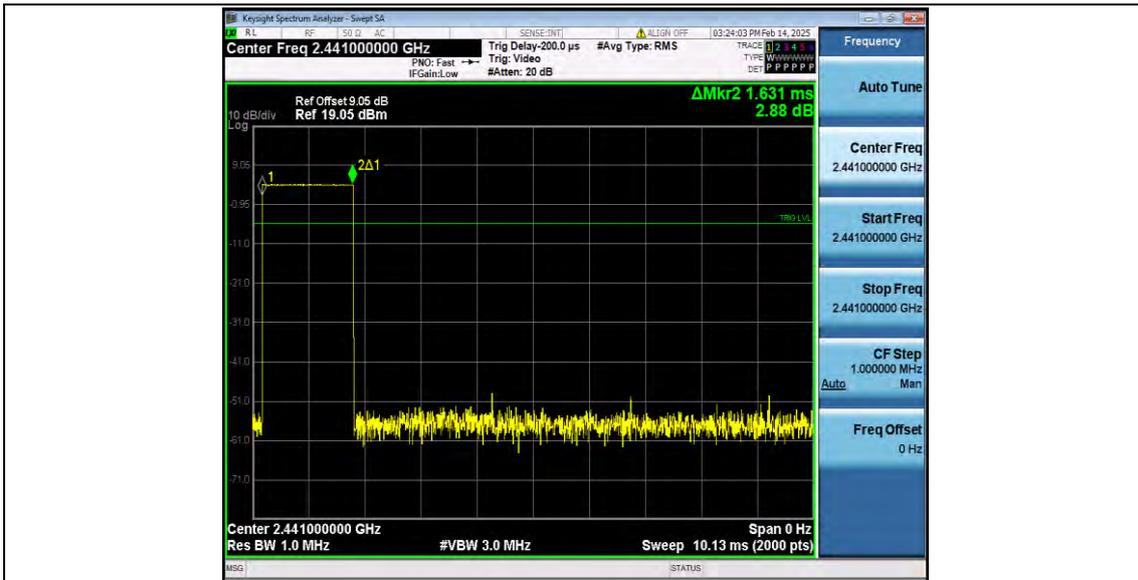
## Appendix A.5: Time of occupancy

### Test Result

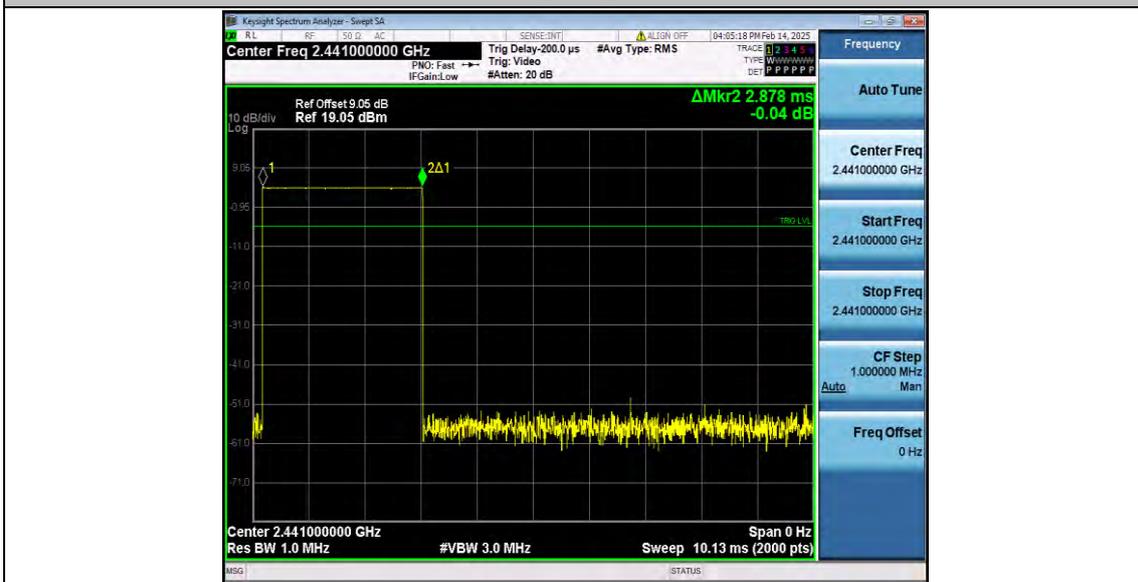
TestMode	Antenna	Freq(MHz)	BurstWidth [ms]	TotalHops [Num]	Result[s]	Limit[s]	Verdict
DH1	Ant1	Hop	0.370	330	0.122	≤0.4	PASS
DH3	Ant1	Hop	1.631	170	0.277	≤0.4	PASS
DH5	Ant1	Hop	2.878	130	0.374	≤0.4	PASS
2DH1	Ant1	Hop	0.380	310	0.118	≤0.4	PASS
2DH3	Ant1	Hop	1.637	170	0.278	≤0.4	PASS
2DH5	Ant1	Hop	2.883	90	0.259	≤0.4	PASS
3DH1	Ant1	Hop	0.380	310	0.118	≤0.4	PASS
3DH3	Ant1	Hop	1.631	160	0.261	≤0.4	PASS
3DH5	Ant1	Hop	2.883	100	0.288	≤0.4	PASS

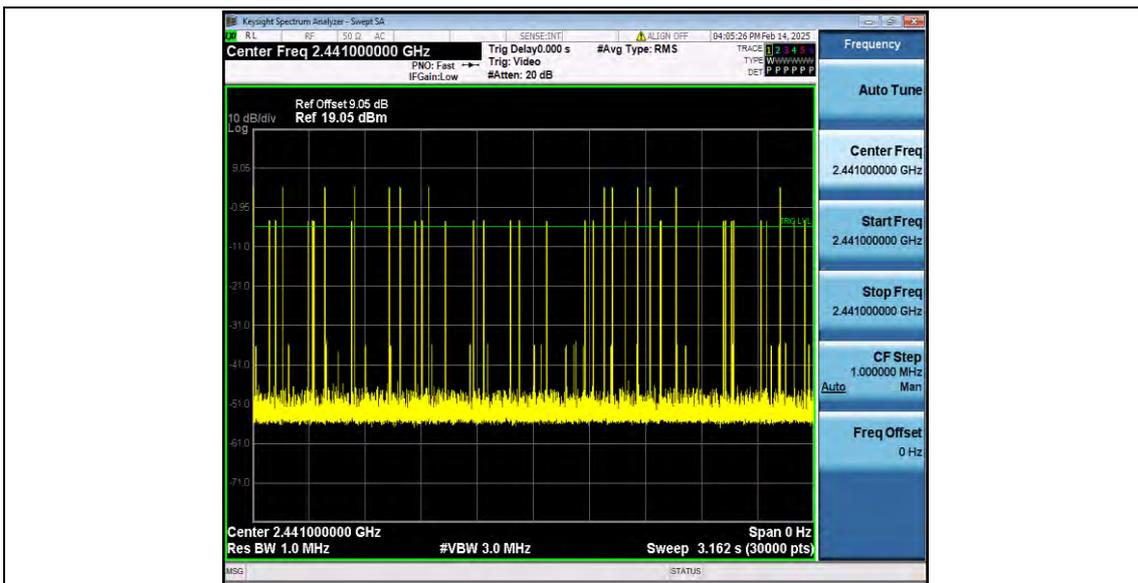
## Test Graphs



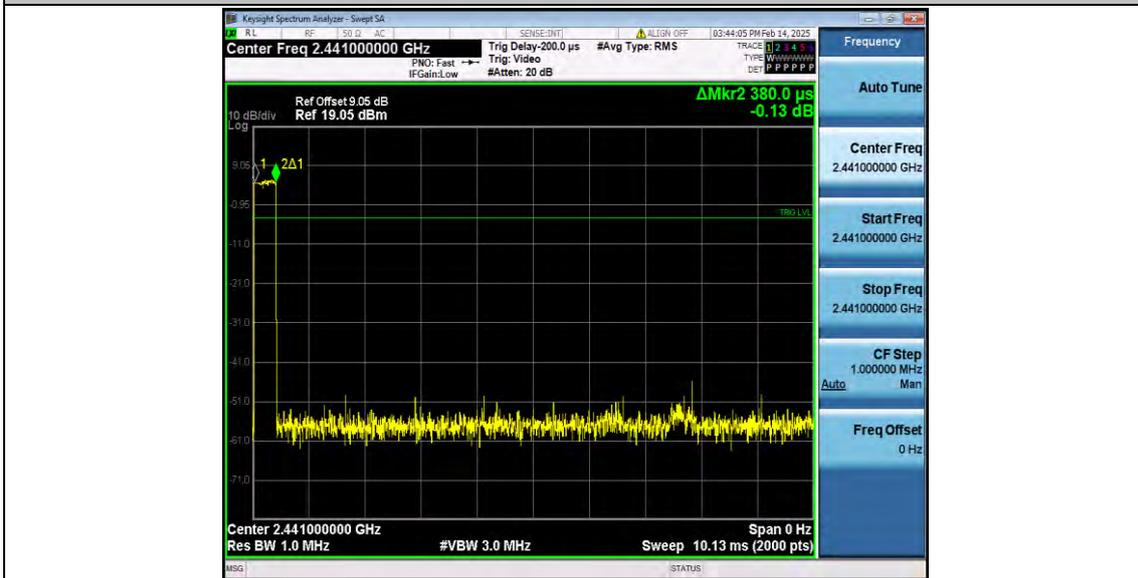


DH5\_Ant1\_Hop

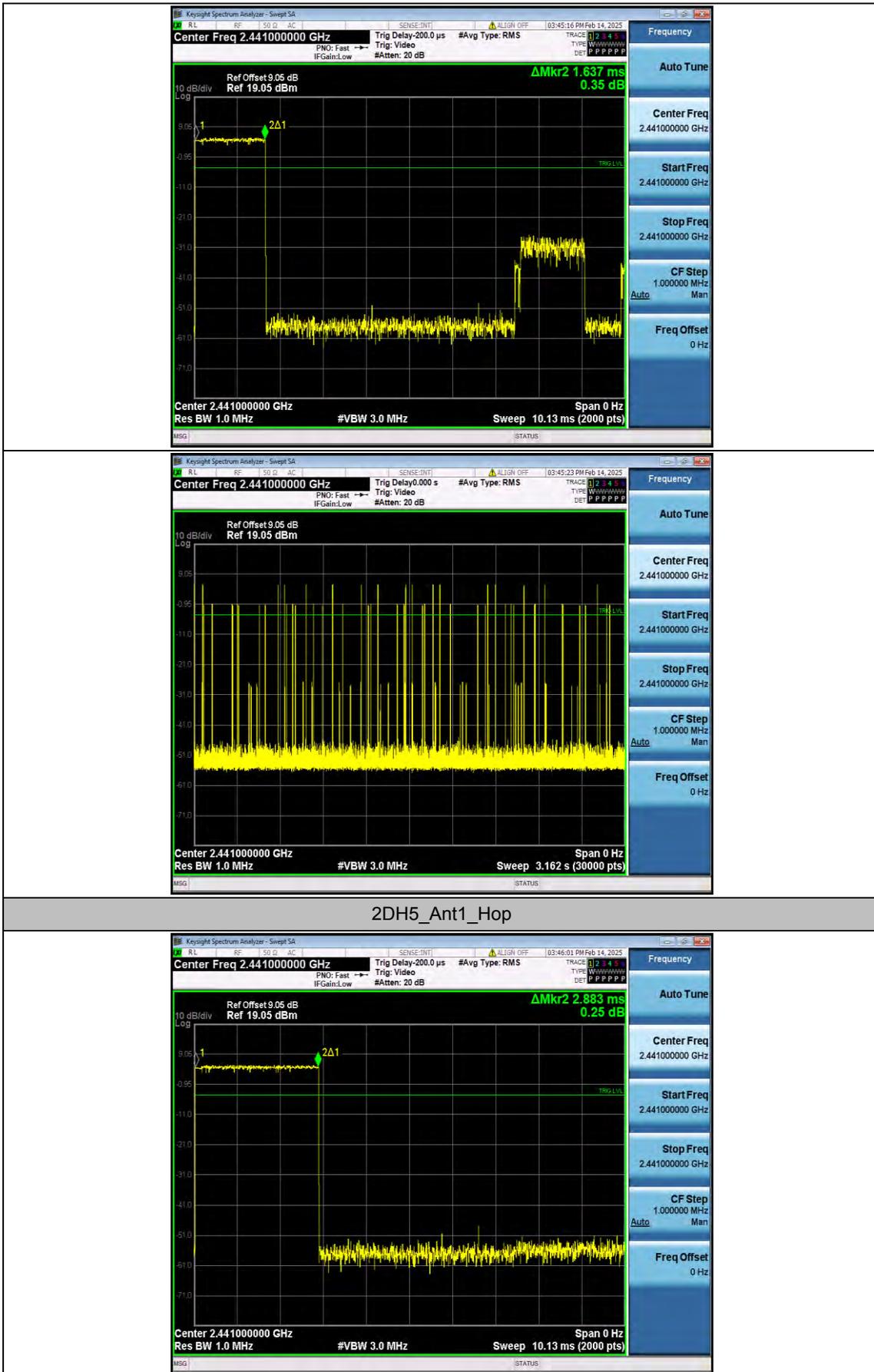




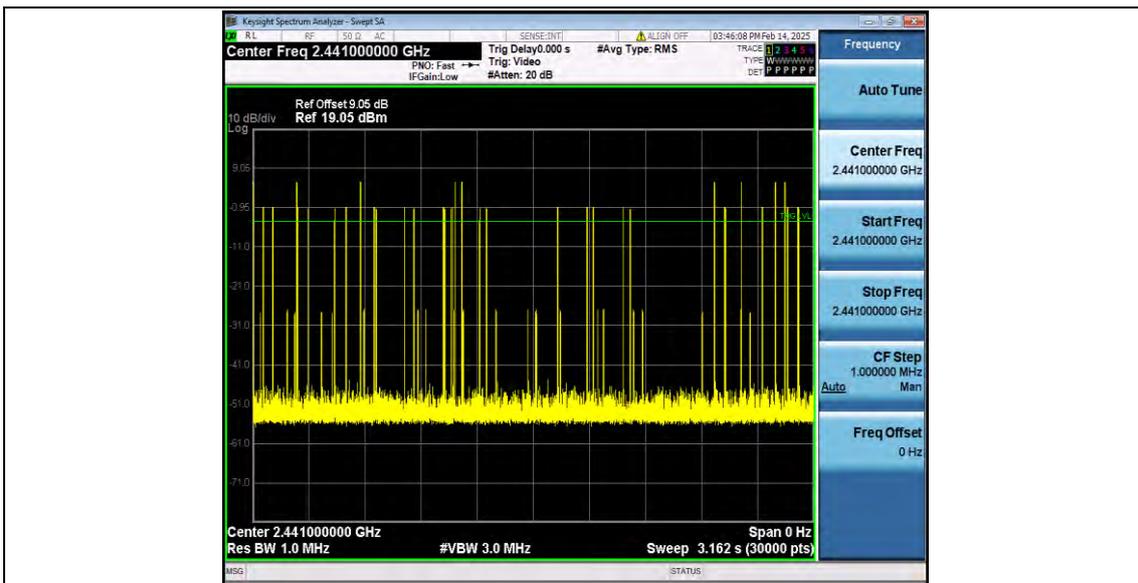
2DH1\_Ant1\_Hop



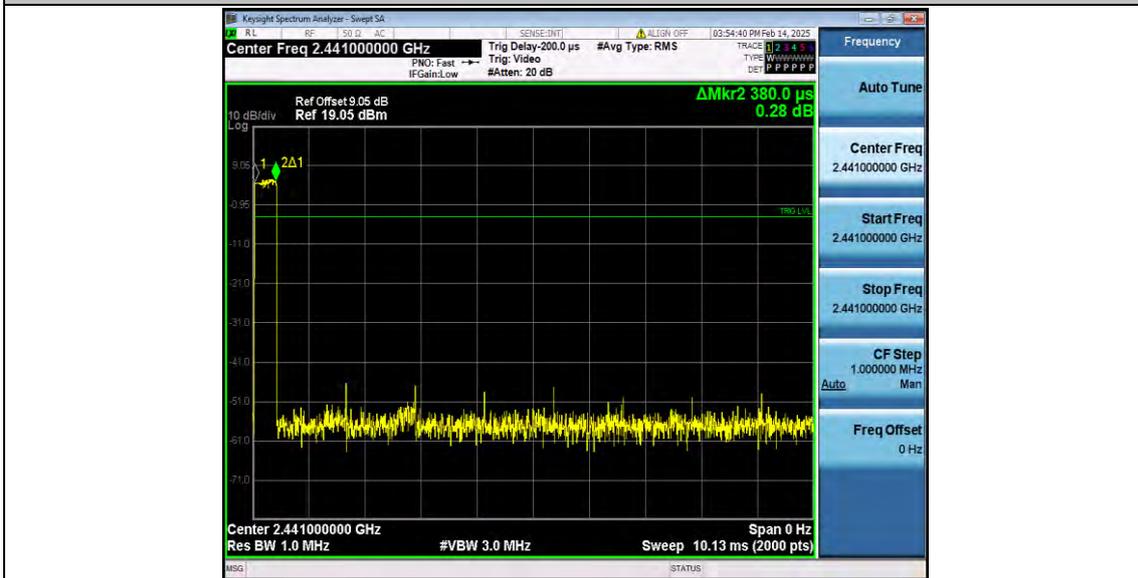
2DH3\_Ant1\_Hop



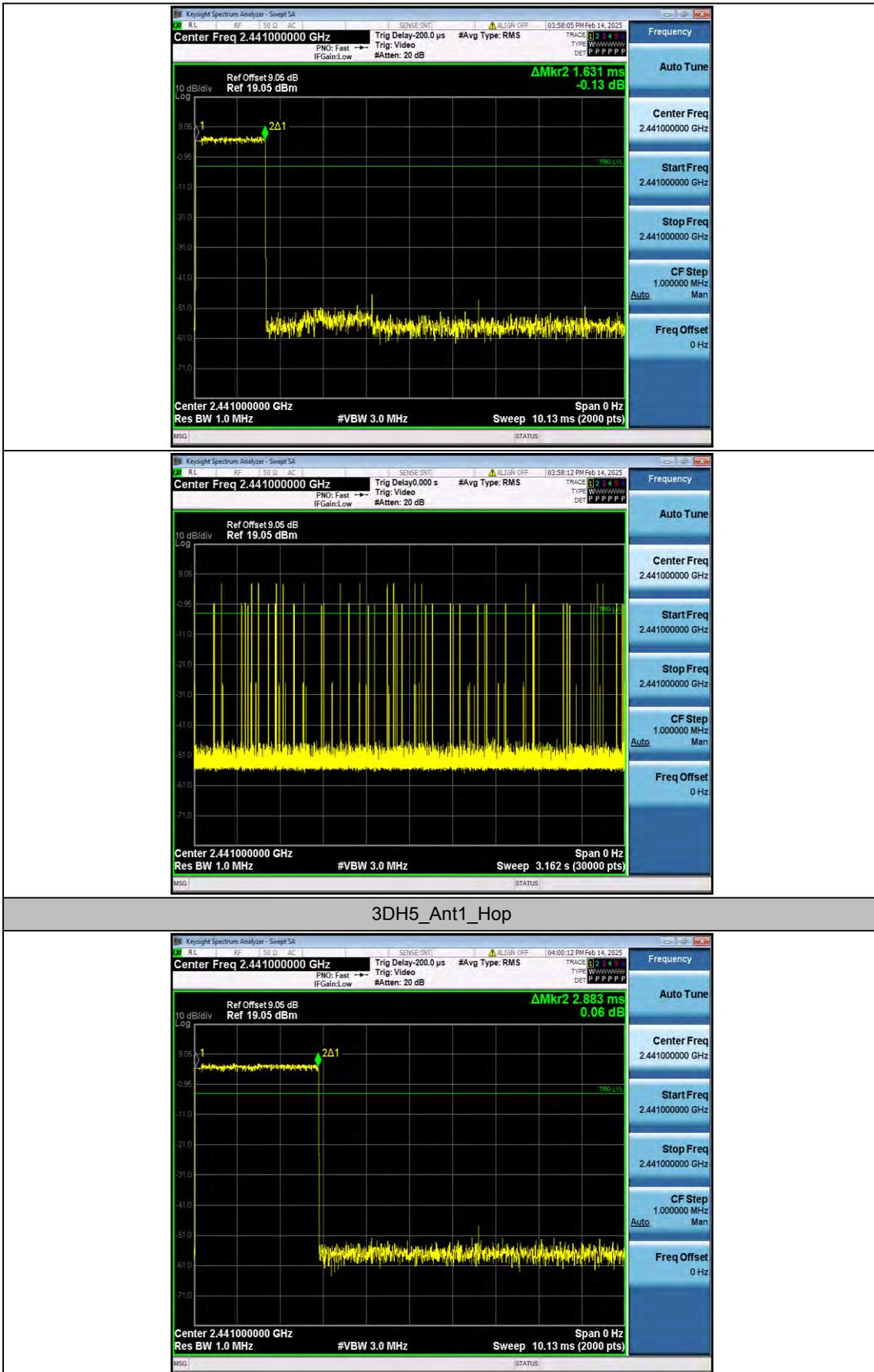
2DH5\_Ant1\_Hop



3DH1\_Ant1\_Hop



3DH3\_Ant1\_Hop



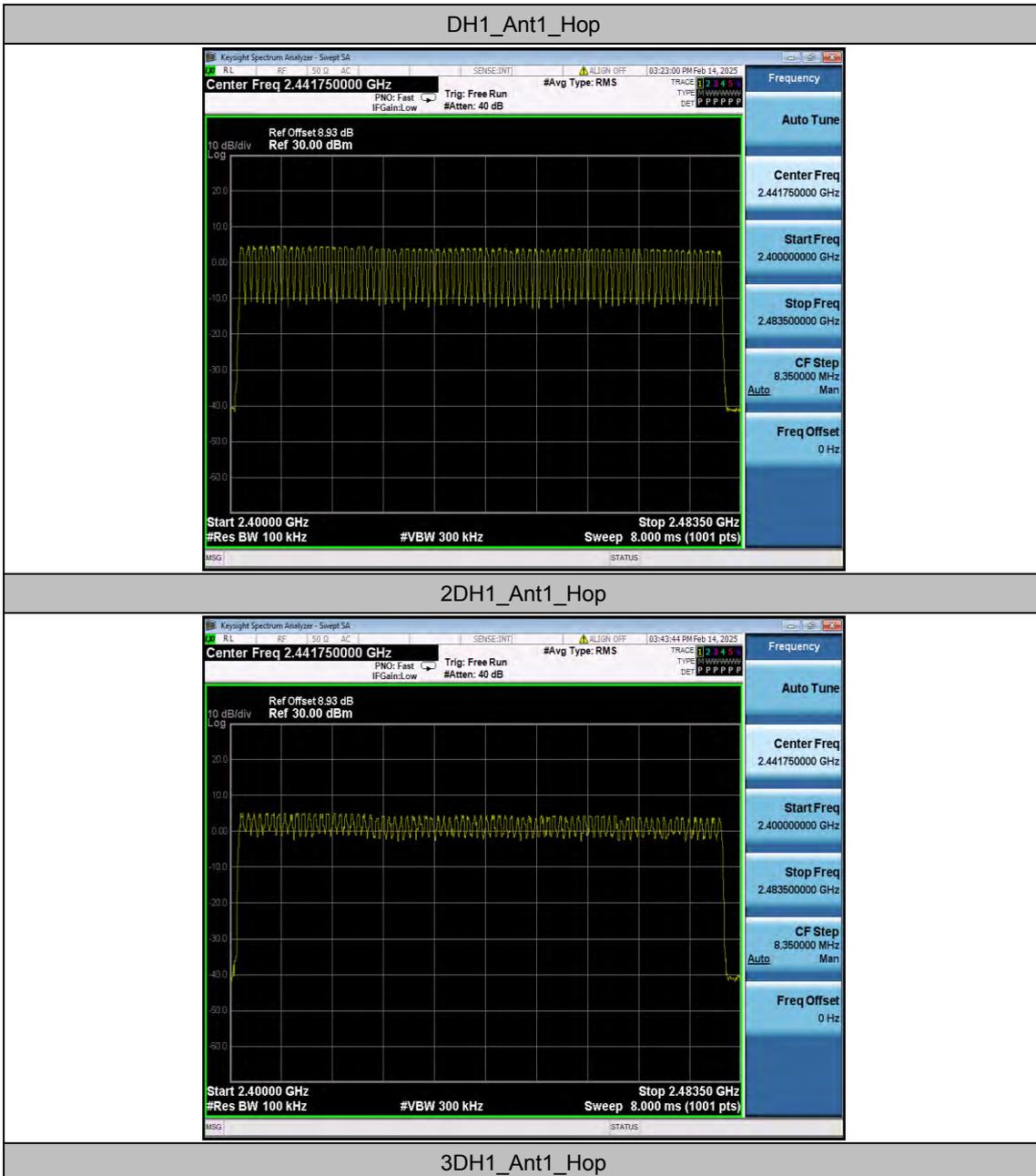


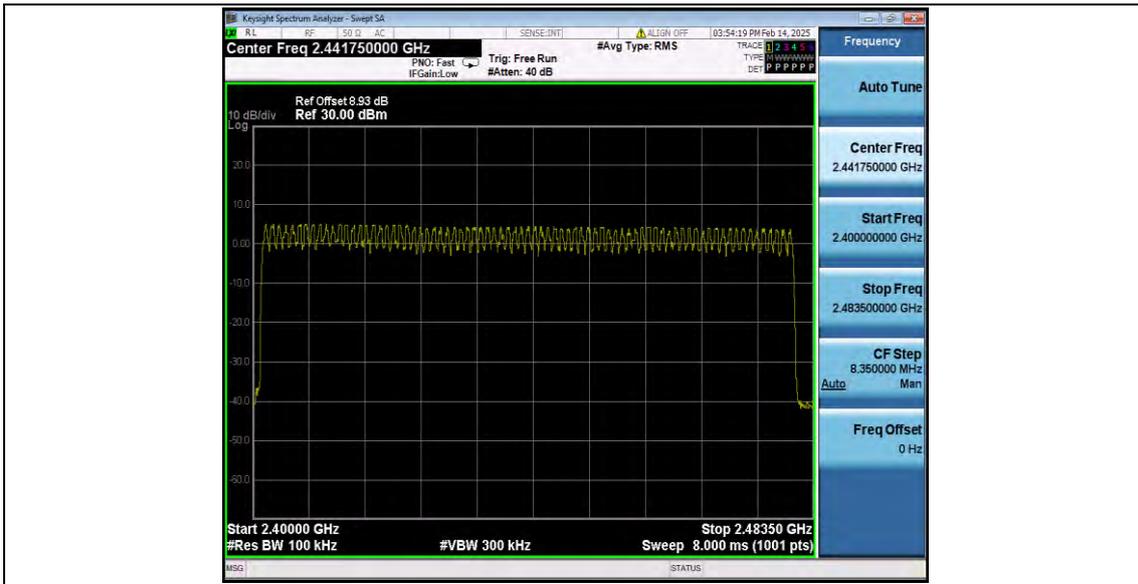
## Appendix A.6: Number of hopping channels

### 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



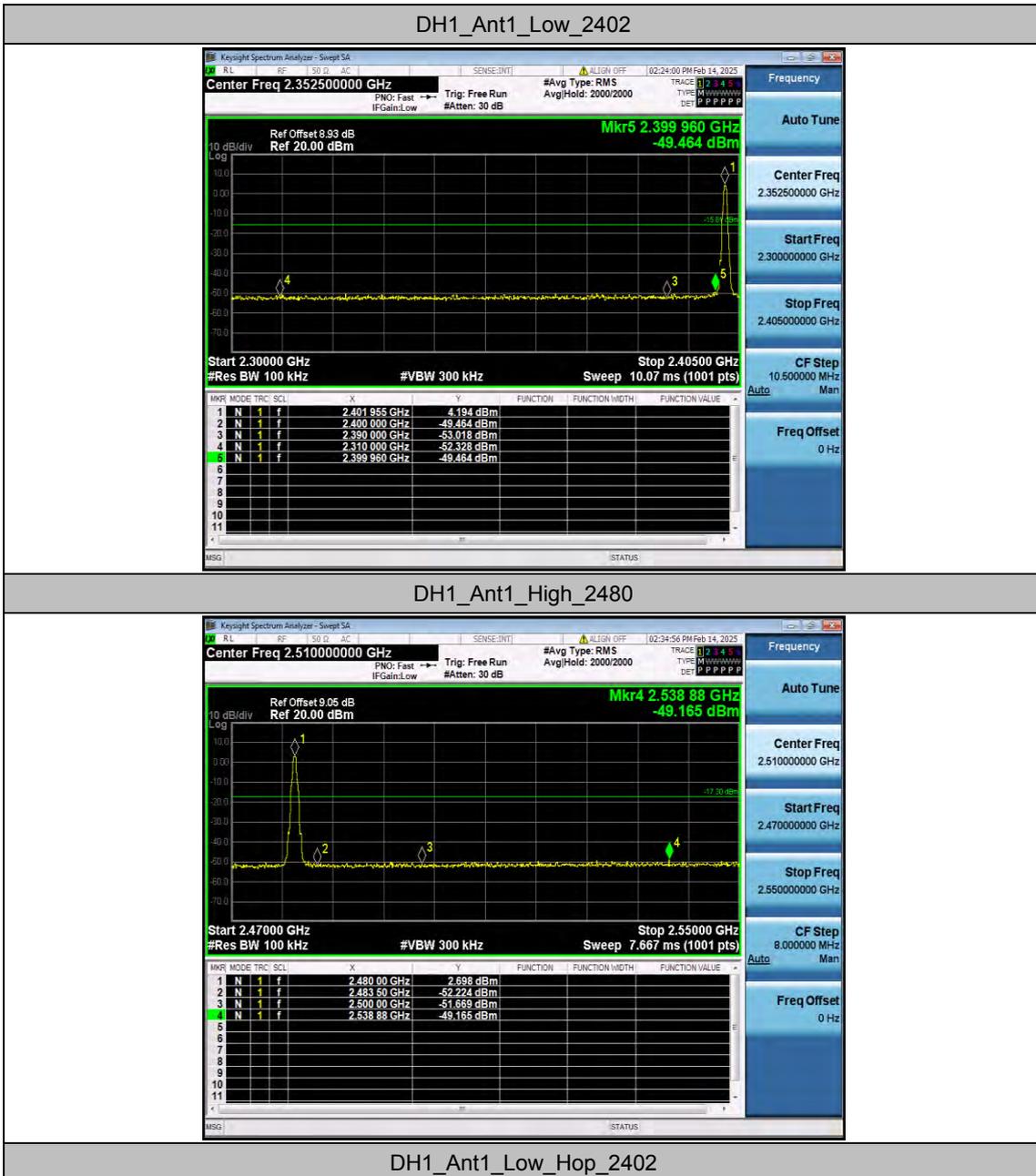


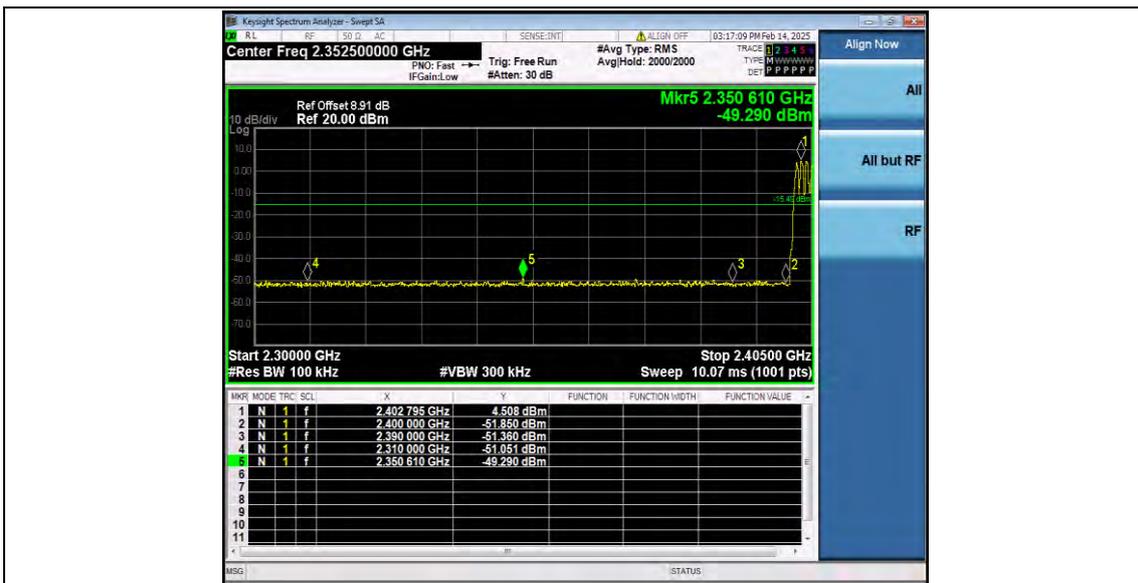
## Appendix A.7: Band edge measurements

### Test Result

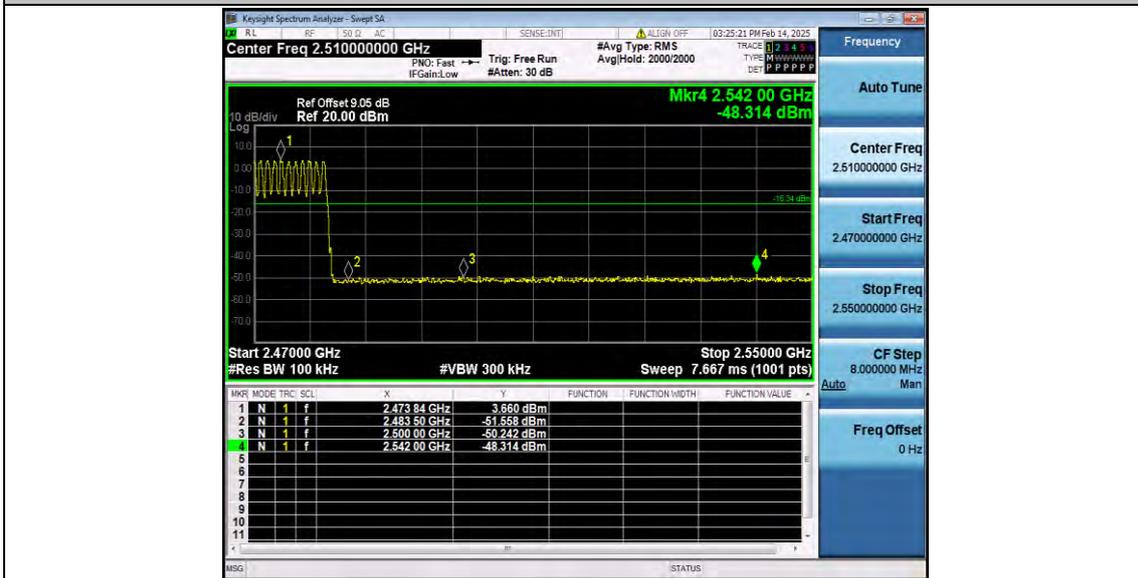
TestMode	Antenna	ChName	Freq(MHz)	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH1	Ant1	Low	2402	4.19	-49.46	≤-15.81	PASS
		High	2480	2.70	-49.17	≤-17.3	PASS
		Low	Hop_2402	4.51	-49.29	≤-15.49	PASS
		High	Hop_2480	3.66	-48.31	≤-16.34	PASS
2DH1	Ant1	Low	2402	2.50	-49.48	≤-17.5	PASS
		High	2480	1.31	-48.95	≤-18.69	PASS
		Low	Hop_2402	5.04	-49.36	≤-14.96	PASS
		High	Hop_2480	3.82	-48.48	≤-16.18	PASS
3DH1	Ant1	Low	2402	2.67	-49.14	≤-17.33	PASS
		High	2480	1.46	-48.57	≤-18.54	PASS
		Low	Hop_2402	4.73	-49.15	≤-15.27	PASS
		High	Hop_2480	4.08	-48.91	≤-15.92	PASS

## Test Graphs

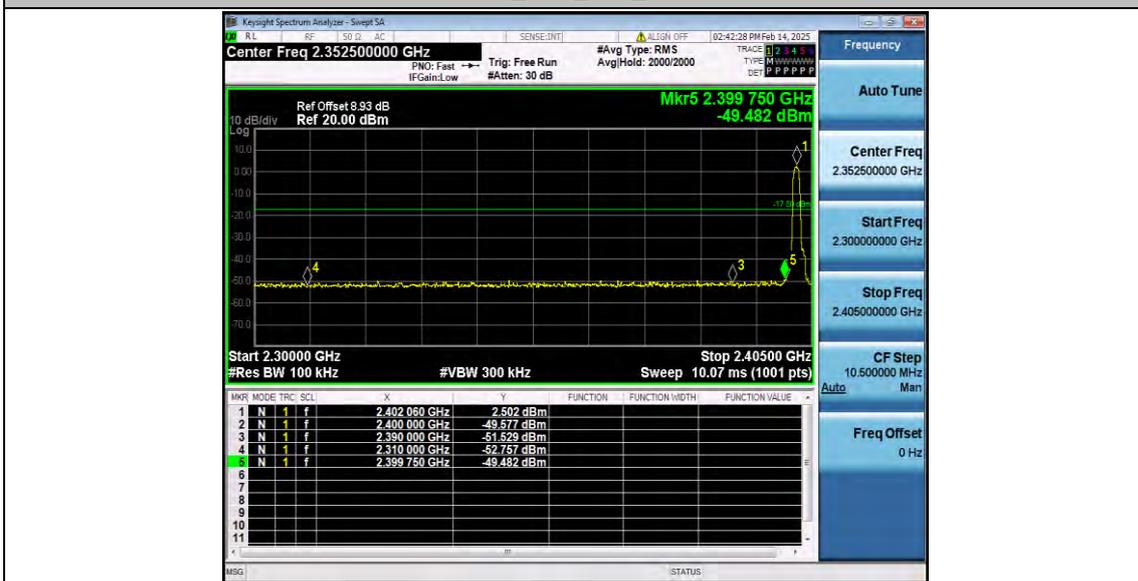




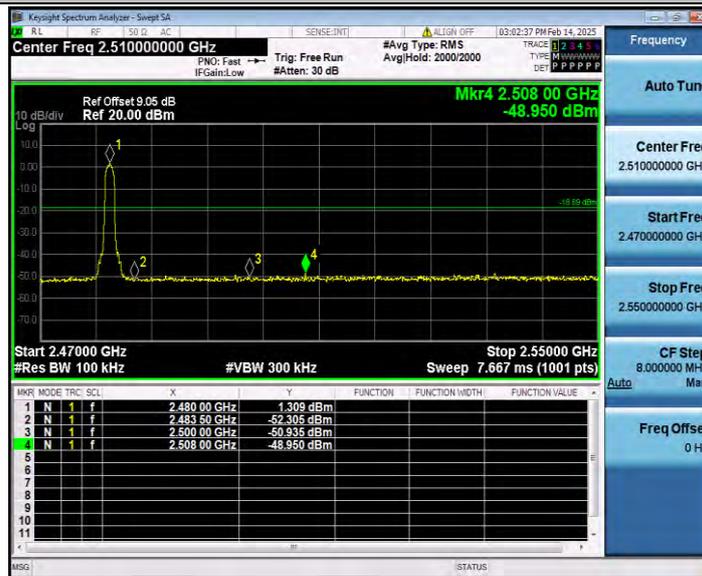
DH1\_Ant1\_High\_Hop\_2480



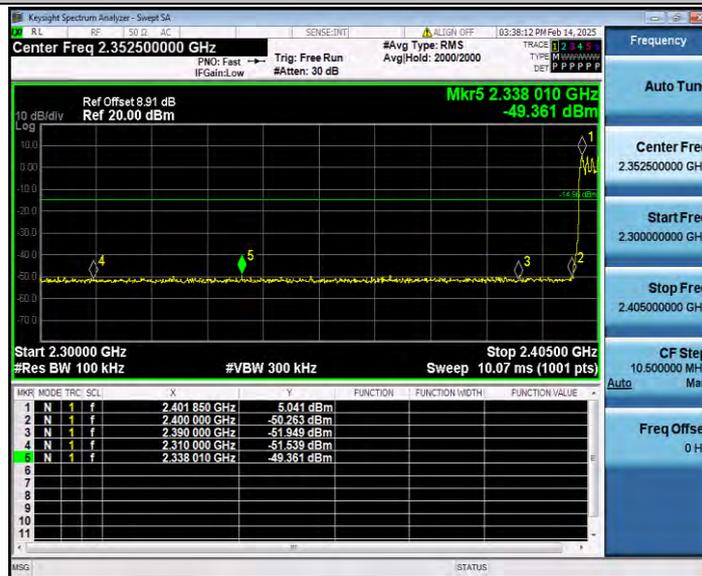
2DH1\_Ant1\_Low\_2402



2DH1\_Ant1\_High\_2480



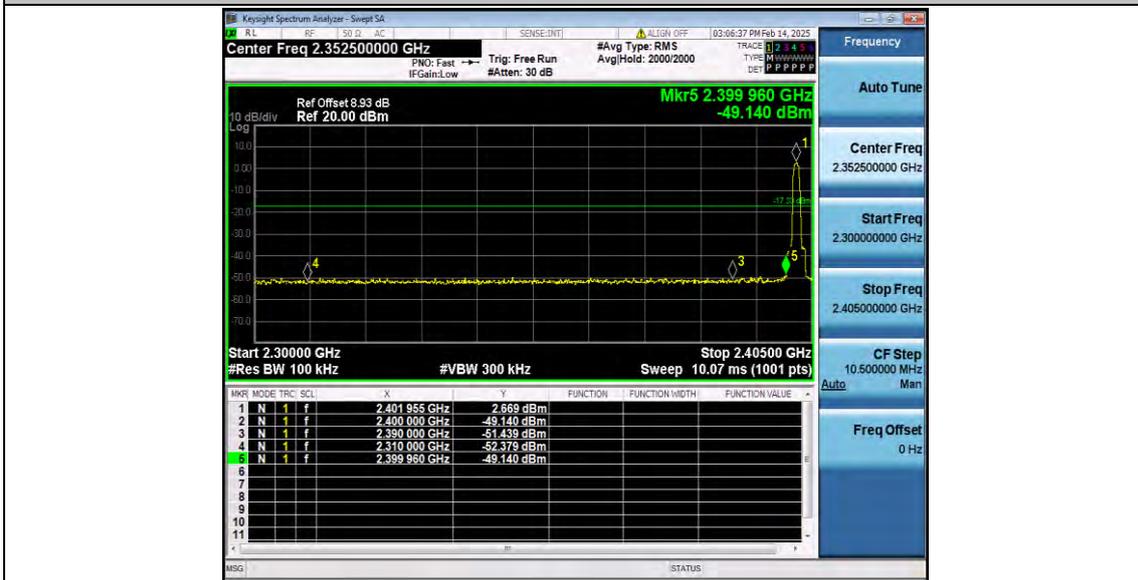
2DH1\_Ant1\_Low\_Hop\_2402



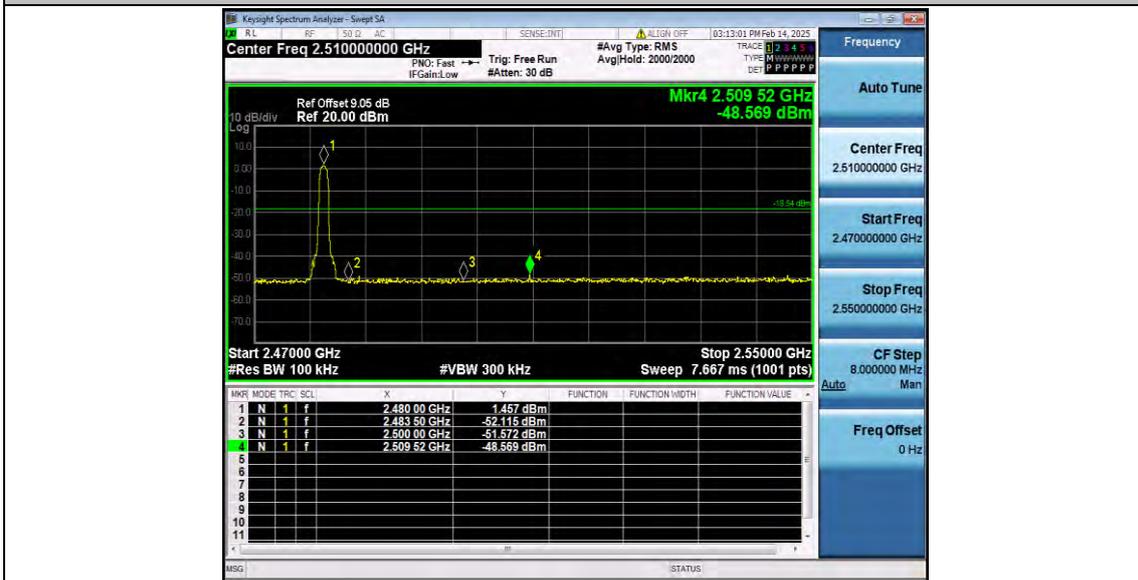
2DH1\_Ant1\_High\_Hop\_2480



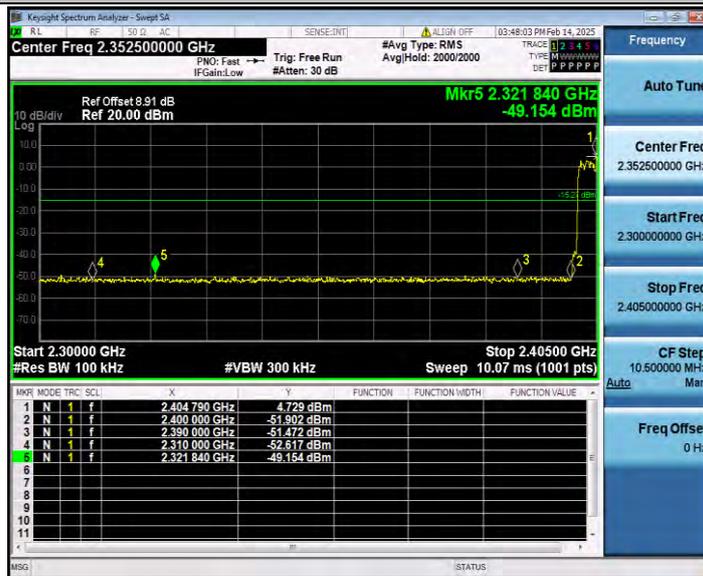
3DH1\_Ant1\_Low\_2402



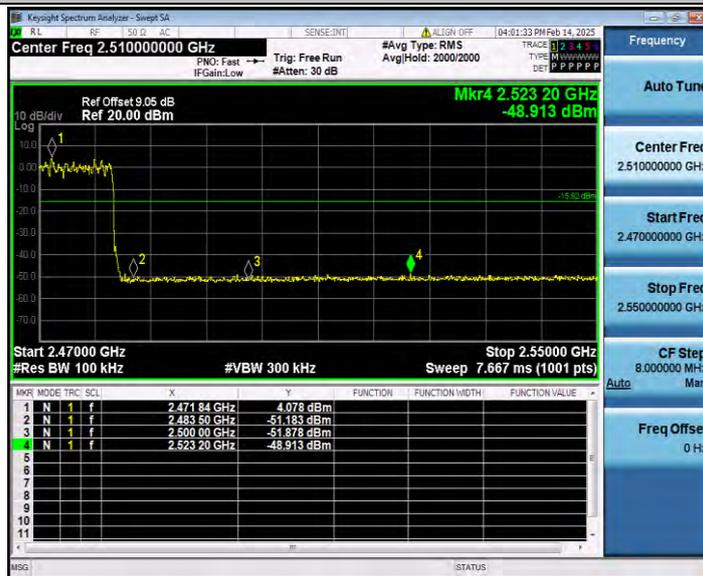
3DH1\_Ant1\_High\_2480



3DH1\_Ant1\_Low\_Hop\_2402



3DH1\_Ant1\_High\_Hop\_2480

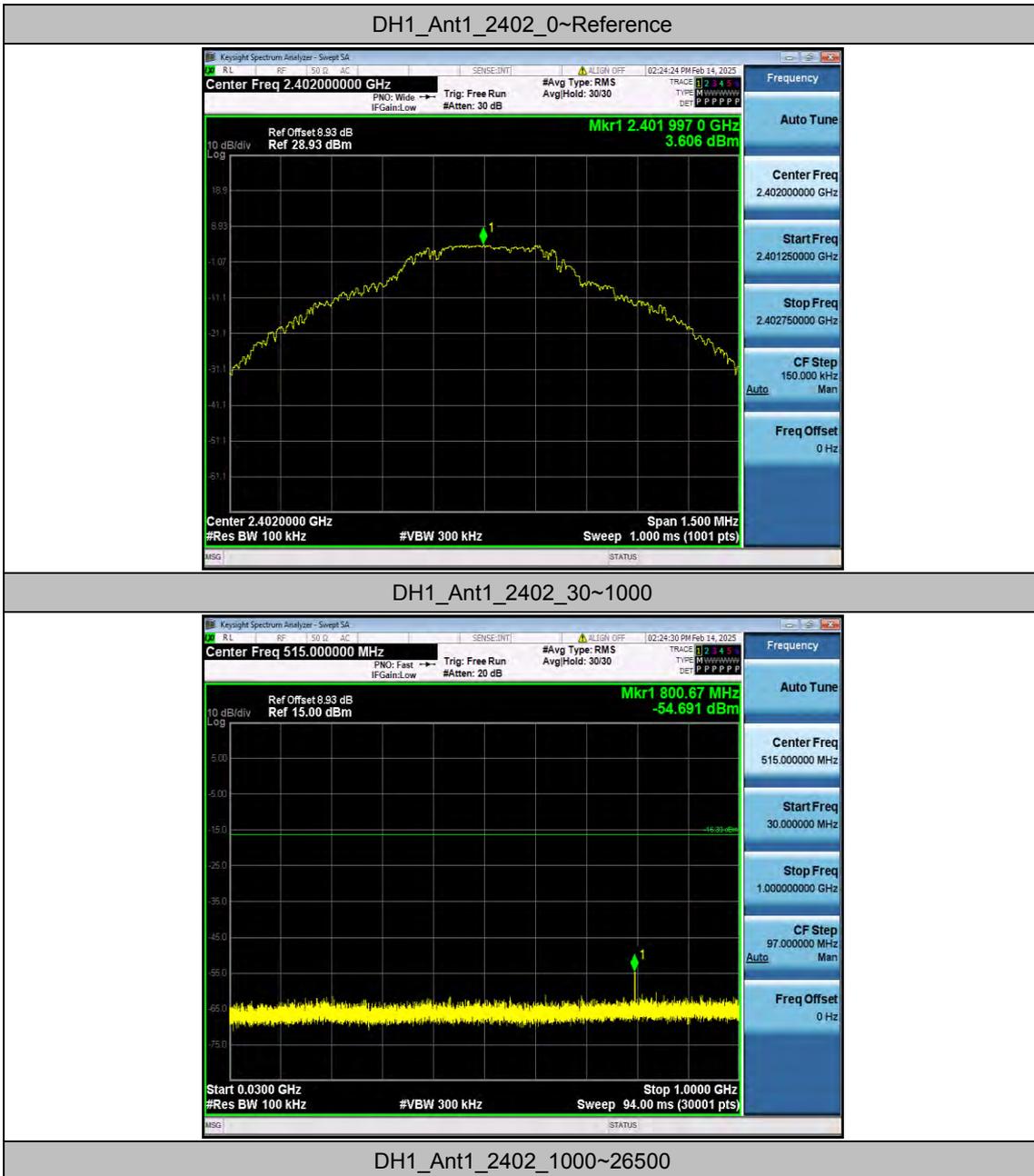


## Appendix A.8: Conducted Spurious Emission

### Test Result

TestMode	Antenna	Freq(MHz)	FreqRange [MHz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH1	Ant1	2402	Reference	3.61	3.61	---	PASS
			30~1000	3.61	-54.69	≤-16.39	PASS
			1000~26500	3.61	-48.74	≤-16.39	PASS
		2441	Reference	2.96	2.96	---	PASS
			30~1000	2.96	-55.57	≤-17.04	PASS
			1000~26500	2.96	-48.56	≤-17.04	PASS
		2480	Reference	2.21	2.21	---	PASS
			30~1000	2.21	-56.07	≤-17.79	PASS
			1000~26500	2.21	-48.7	≤-17.79	PASS
2DH1	Ant1	2402	Reference	2.24	2.24	---	PASS
			30~1000	2.24	-57.71	≤-17.76	PASS
			1000~26500	2.24	-47.93	≤-17.76	PASS
		2441	Reference	1.65	1.65	---	PASS
			30~1000	1.65	-57.65	≤-18.35	PASS
			1000~26500	1.65	-47.76	≤-18.35	PASS
		2480	Reference	1.02	1.02	---	PASS
			30~1000	1.02	-58.71	≤-18.98	PASS
			1000~26500	1.02	-48.07	≤-18.98	PASS
3DH1	Ant1	2402	Reference	2.18	2.18	---	PASS
			30~1000	2.18	-58.36	≤-17.82	PASS
			1000~26500	2.18	-48.36	≤-17.82	PASS
		2441	Reference	1.38	1.38	---	PASS
			30~1000	1.38	-57.27	≤-18.62	PASS
			1000~26500	1.38	-47.33	≤-18.62	PASS
		2480	Reference	0.85	0.85	---	PASS
			30~1000	0.85	-57.37	≤-19.15	PASS
			1000~26500	0.85	-47.98	≤-19.15	PASS

## Test Graphs





DH1\_Ant1\_2441\_0~Reference



DH1\_Ant1\_2441\_30~1000



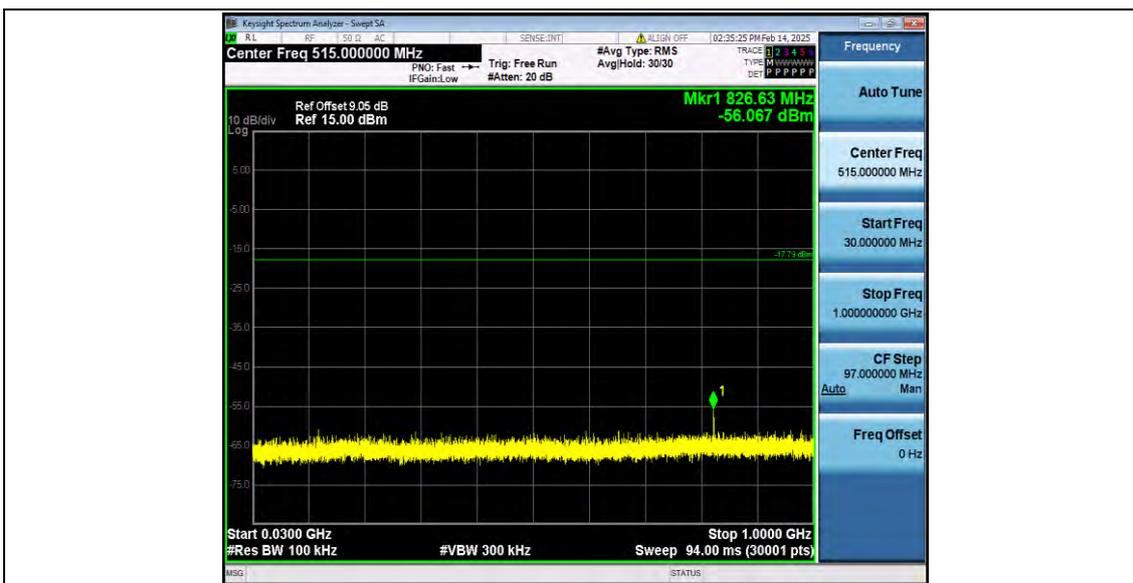
DH1\_Ant1\_2441\_1000~26500



DH1\_Ant1\_2480\_0~Reference



DH1\_Ant1\_2480\_30~1000



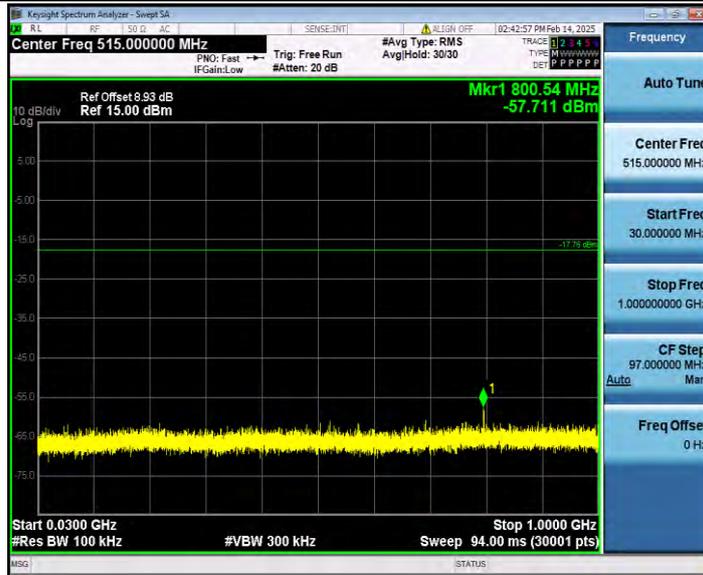
DH1\_Ant1\_2480\_1000~26500



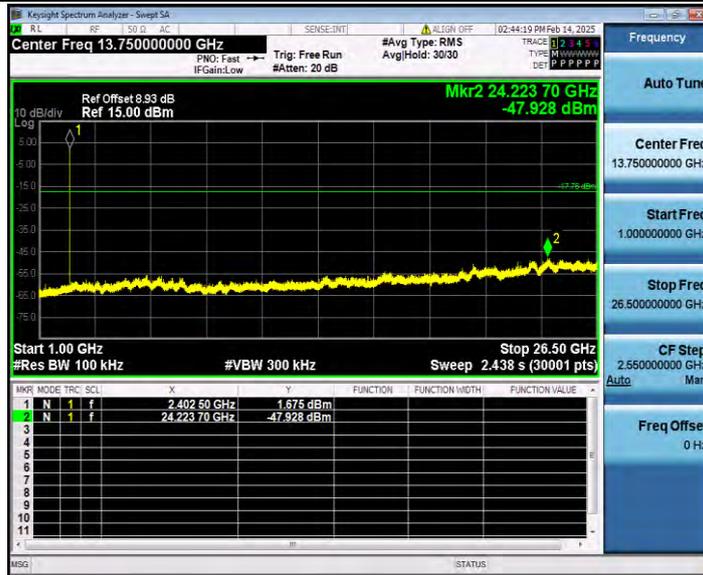
2DH1\_Ant1\_2402\_0~Reference



2DH1\_Ant1\_2402\_30~1000



2DH1\_Ant1\_2402\_1000~26500



2DH1\_Ant1\_2441\_0~Reference



2DH1\_Ant1\_2441\_30~100



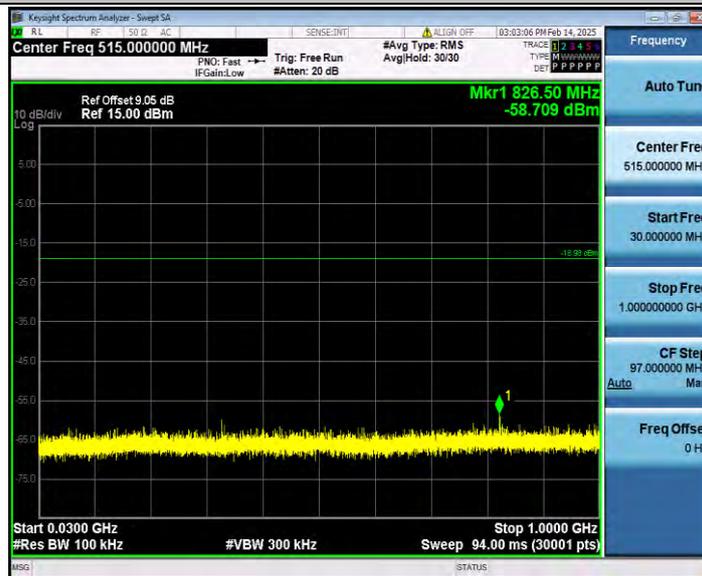
2DH1\_Ant1\_2441\_1000~26500



2DH1\_Ant1\_2480\_0~Reference



2DH1\_Ant1\_2480\_30~1000



2DH1\_Ant1\_2480\_1000~26500



3DH1\_Ant1\_2402\_0~Reference



3DH1\_Ant1\_2402\_30~1000



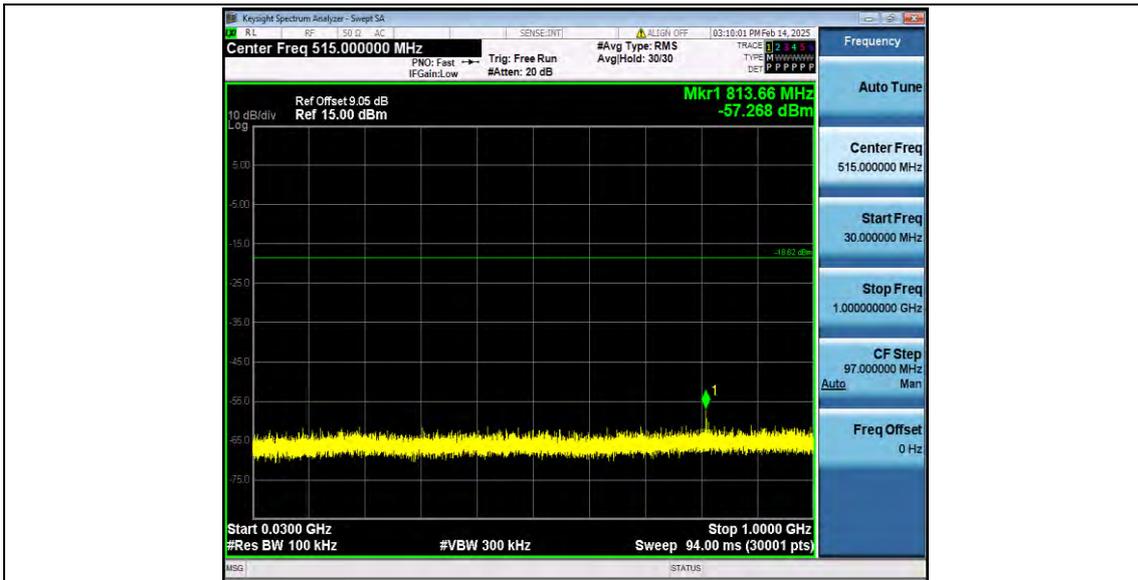
3DH1\_Ant1\_2402\_1000~26500



3DH1\_Ant1\_2441\_0~Reference



3DH1\_Ant1\_2441\_30~1000



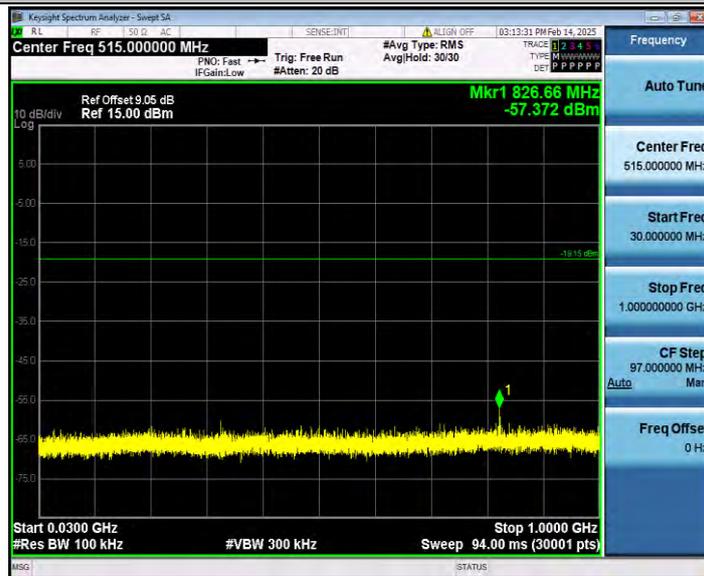
3DH1\_Ant1\_2441\_1000~26500



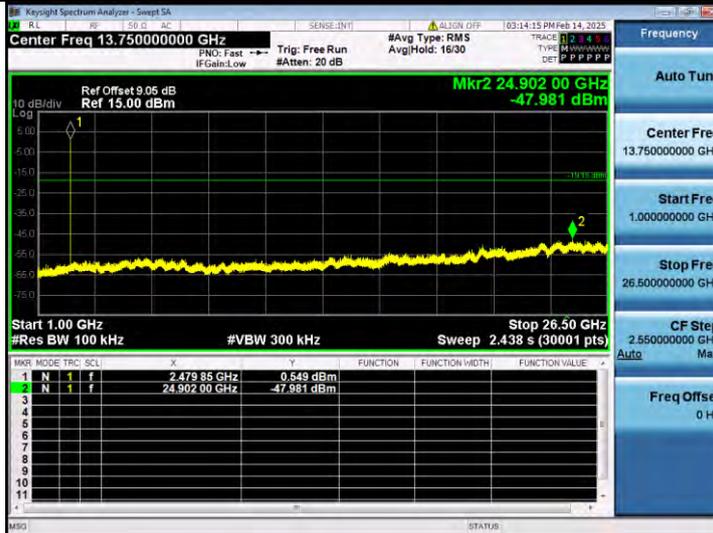
3DH1\_Ant1\_2480\_0~Reference



3DH1\_Ant1\_2480\_30~1000



3DH1\_Ant1\_2480\_1000~26500



## Appendix A.9: 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	-50.11	≤-41.20	45.09	≤54	PASS
				AV	2387.045	-49.53	≤-41.20	45.67	≤54	PASS
				AV	2390.000	-49.61	≤-41.20	45.59	≤54	PASS
				Peak	2310.000	-46.46	≤-21.20	48.74	≤74	PASS
				Peak	2325.305	-39.91	≤-21.20	55.29	≤74	PASS
				Peak	2390.000	-43.17	≤-21.20	52.03	≤74	PASS
		High	2480	AV	2483.500	-48.16	≤-41.20	47.04	≤54	PASS
				AV	2483.520	-48.16	≤-41.20	47.04	≤54	PASS
				AV	2500.000	-49.25	≤-41.20	45.95	≤54	PASS
				Peak	2483.500	-44.44	≤-21.20	50.76	≤74	PASS
				Peak	2496.400	-39.29	≤-21.20	55.91	≤74	PASS
				Peak	2500.000	-43.83	≤-21.20	51.37	≤74	PASS
2DH1	Ant1	Low	2402	AV	2310.000	-49.55	≤-41.20	45.65	≤54	PASS
				AV	2385.680	-49	≤-41.20	46.20	≤54	PASS
				AV	2390.000	-49.16	≤-41.20	46.04	≤54	PASS
				Peak	2310.000	-44.44	≤-21.20	50.76	≤74	PASS
				Peak	2353.865	-39.66	≤-21.20	55.54	≤74	PASS
				Peak	2390.000	-43.89	≤-21.20	51.31	≤74	PASS
		High	2480	AV	2483.500	-47.26	≤-41.20	47.94	≤54	PASS
				AV	2483.520	-47.26	≤-41.20	47.94	≤54	PASS
				AV	2500.000	-48.92	≤-41.20	46.28	≤54	PASS
				Peak	2483.500	-42.79	≤-21.20	52.41	≤74	PASS
				Peak	2487.600	-39.9	≤-21.20	55.30	≤74	PASS
				Peak	2500.000	-42.65	≤-21.20	52.55	≤74	PASS
3DH1	Ant1	Low	2402	AV	2310.000	-49.6	≤-41.20	45.60	≤54	PASS
				AV	2389.880	-49.03	≤-41.20	46.17	≤54	PASS
				AV	2390.000	-49.05	≤-41.20	46.15	≤54	PASS
				Peak	2310.000	-43.49	≤-21.20	51.71	≤74	PASS
				Peak	2387.255	-39.97	≤-21.20	55.23	≤74	PASS
				Peak	2390.000	-43.46	≤-21.20	51.74	≤74	PASS
		High	2480	AV	2483.500	-47.23	≤-41.20	47.97	≤54	PASS
				AV	2483.520	-47.23	≤-41.20	47.97	≤54	PASS
				AV	2500.000	-48.85	≤-41.20	46.35	≤54	PASS
				Peak	2483.500	-45.06	≤-21.20	50.14	≤74	PASS
Peak	2495.360	-40.06	≤-21.20	55.14	≤74	PASS				

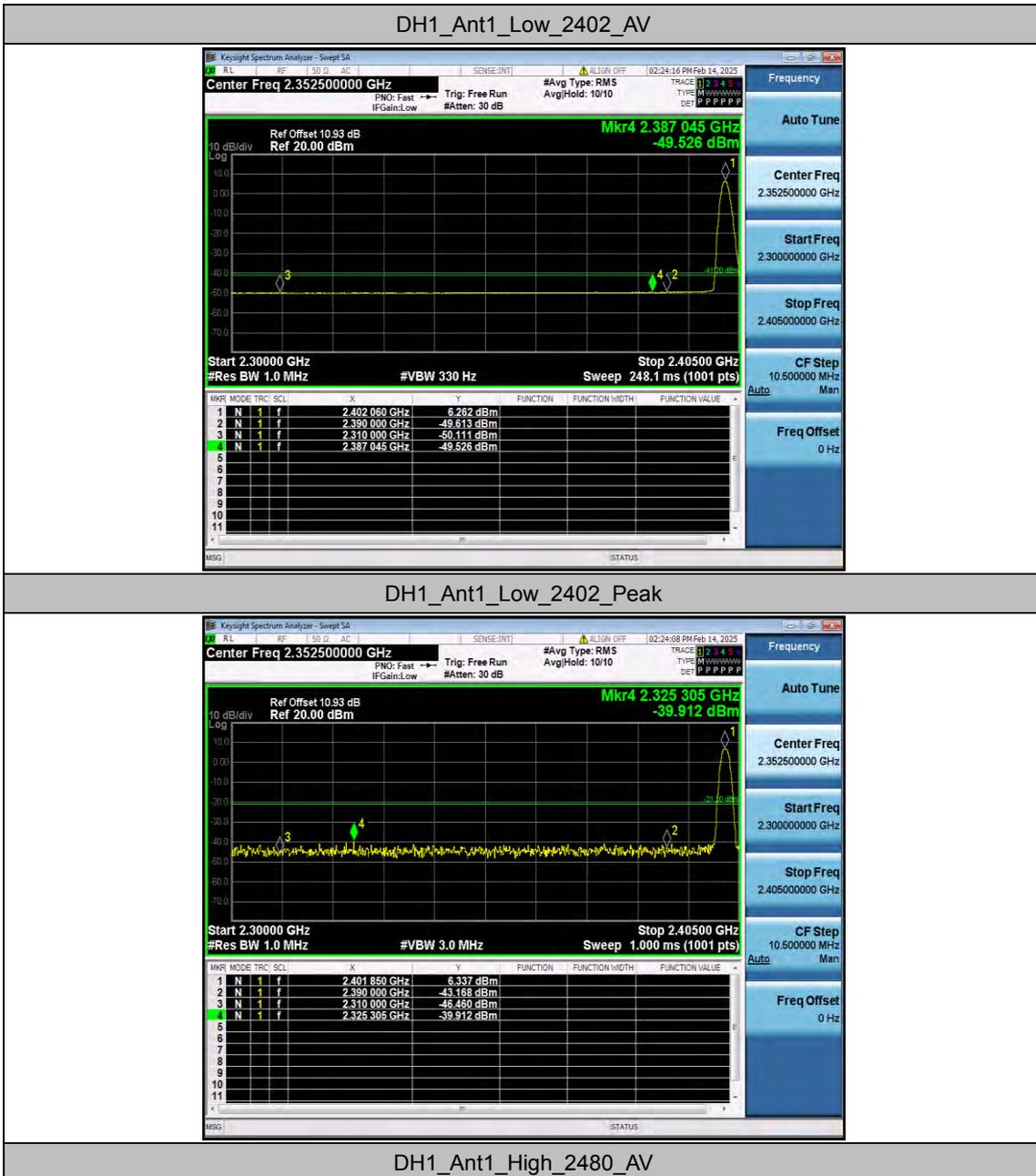
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				Peak	2500.000	-41.5	≤-21.20	53.70	≤74	PASS
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Note:

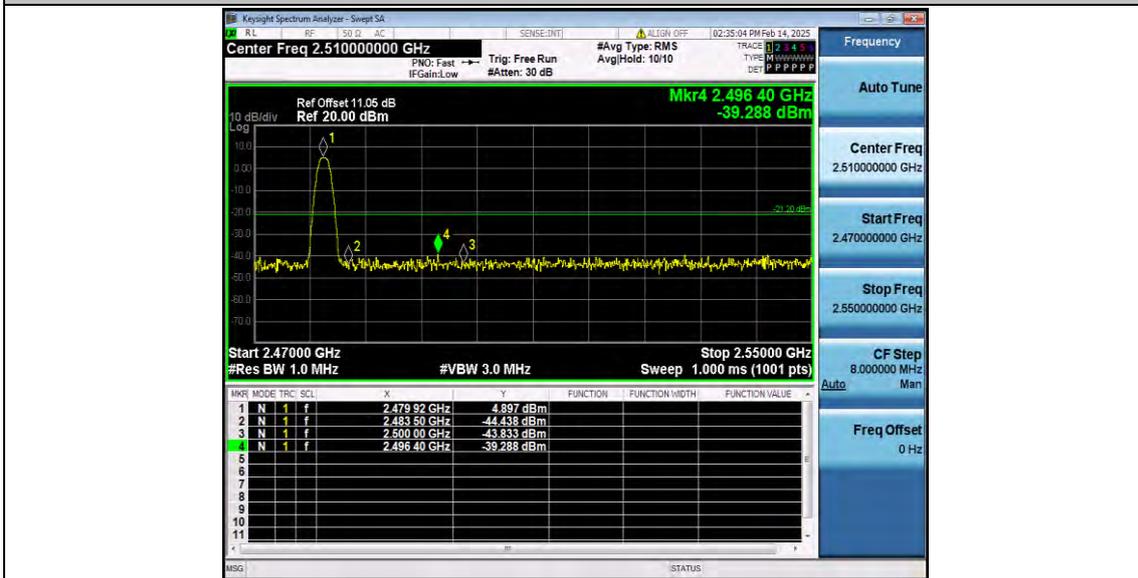
1. The Antenna Gain is compensated in the graph.
2. The Duty Cycle Factor and RBW Factor is compensated in the graph.
3. The limit in dBm for average detector is conversion from 54dBuV/m, according to 15.209(a). The limit in dBm for peak detector is 20dB above the limit of average detector in dBm.

## Test Graphs





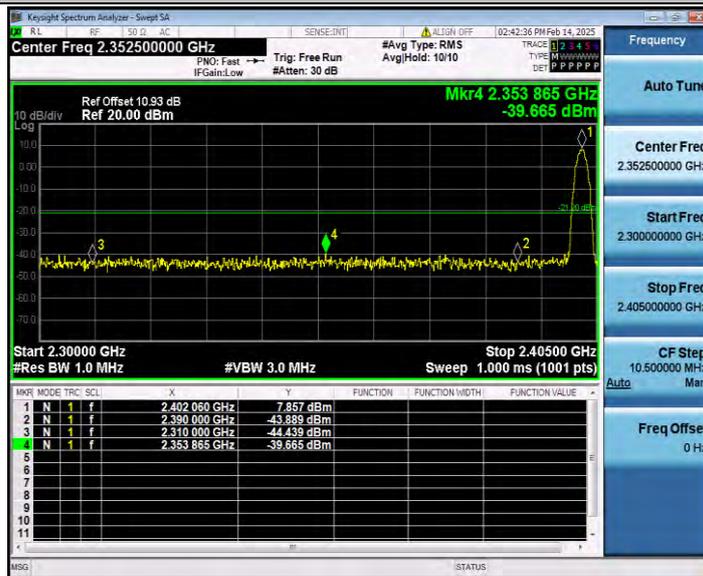
DH1\_Ant1\_High\_2480\_Peak



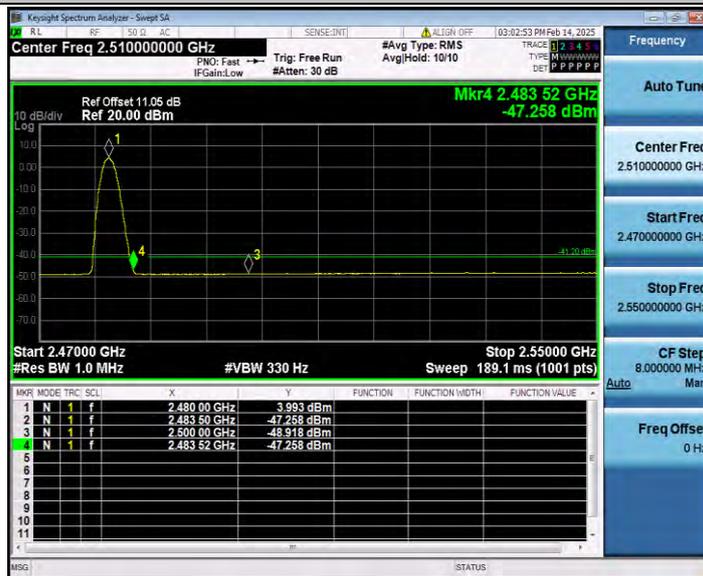
2DH1\_Ant1\_Low\_2402\_AV



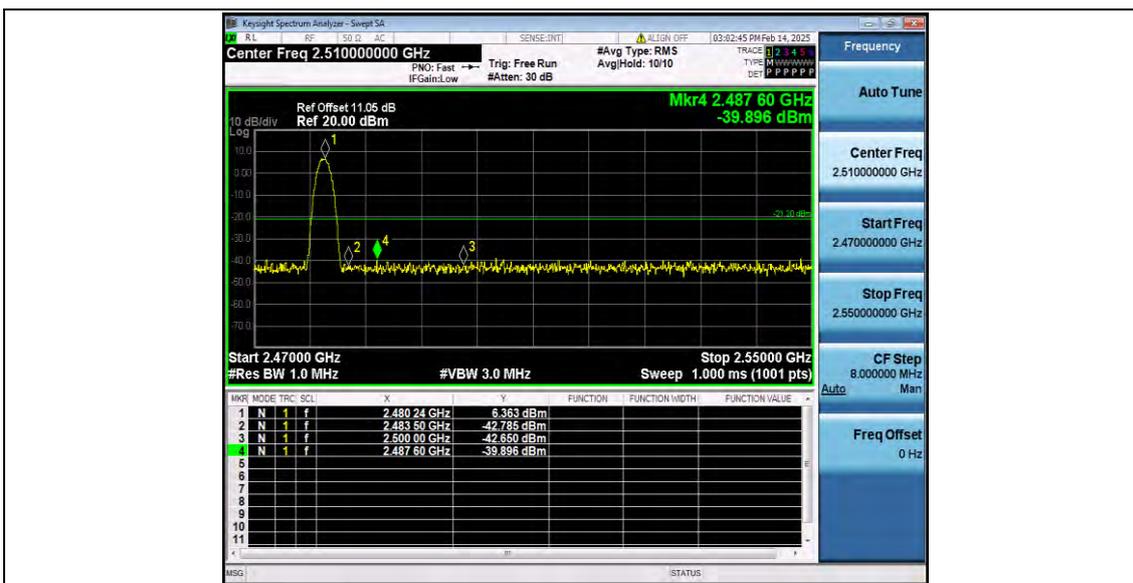
2DH1\_Ant1\_Low\_2402\_Peak



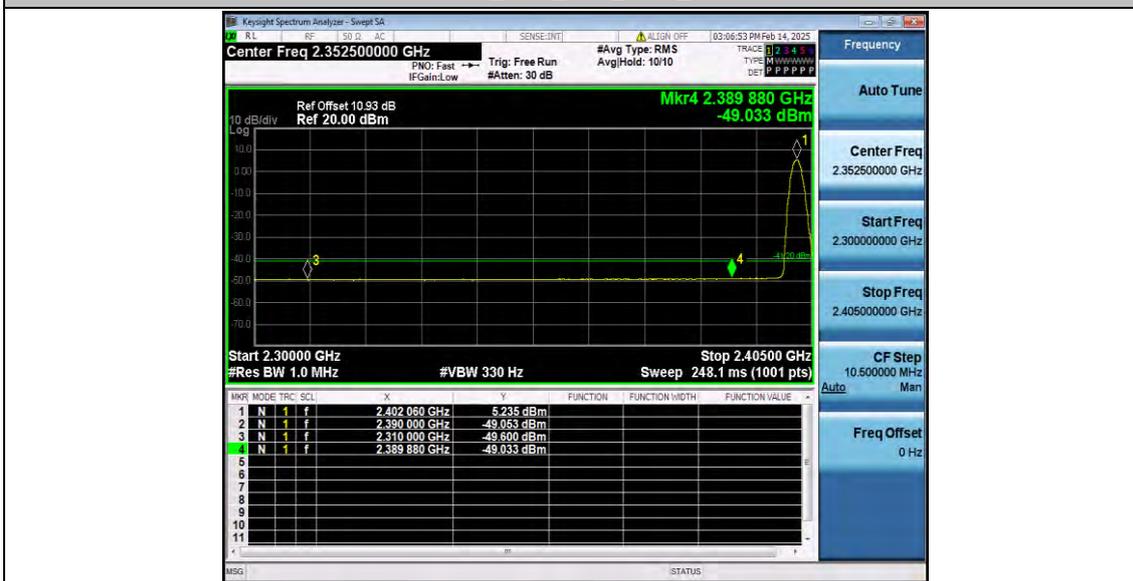
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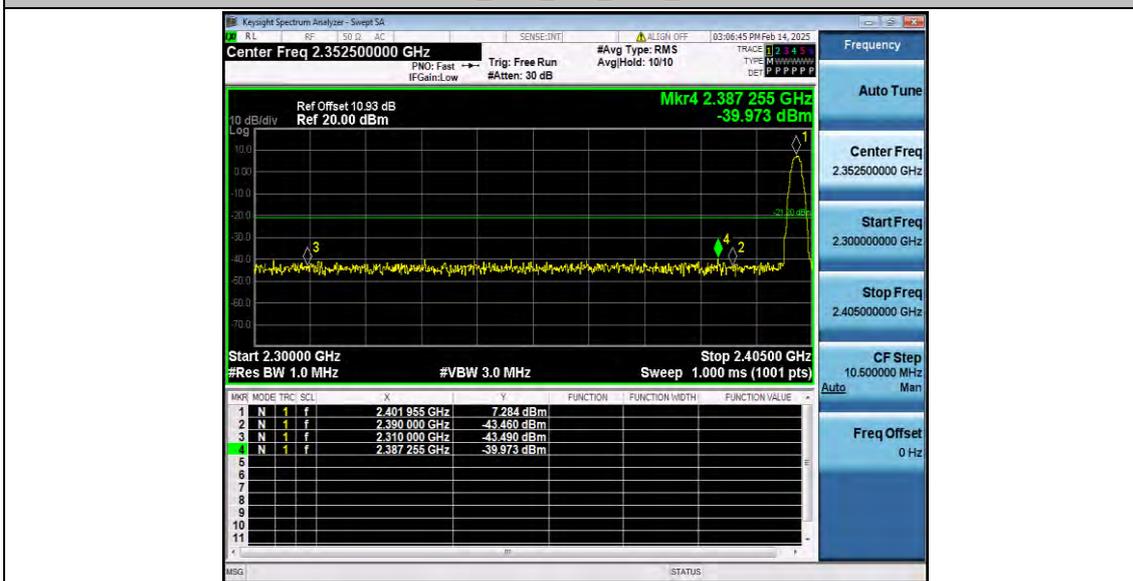
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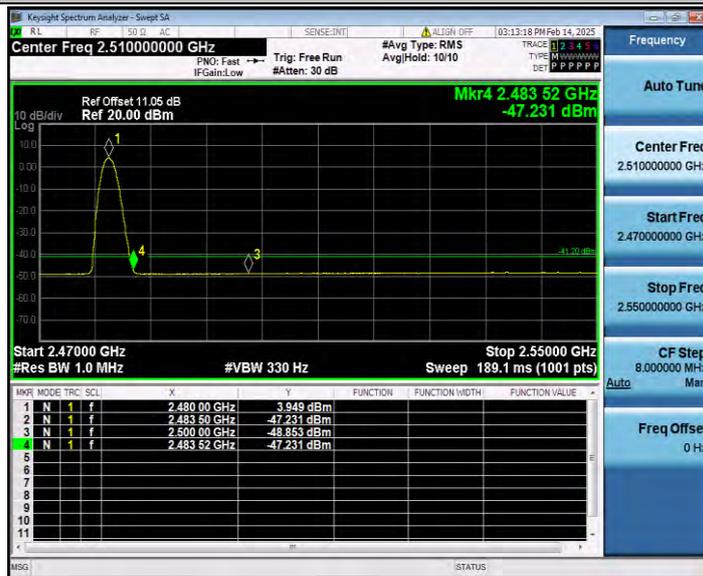
3DH1\_Ant1\_Low\_2402\_AV



3DH1\_Ant1\_Low\_2402\_Peak



3DH1\_Ant1\_High\_2480\_AV



3DH1\_Ant1\_High\_2480\_Peak

