

RF Test Data for Bluetooth (BDR+EDR) (Conducted Measurements)

General Description of EUT	
Product Name:	tablet computer
Test Model:	AYANEO 2
Sample ID:	RW-C-202211-0017-4-2#
Environmental Conditions	
Temperature:	25℃
Relative Humidity:	55%
Test Voltage:	DC 11.55V
Test Engineer:	Zhou Hai Ting
Note: For a more detailed features description, please refer to the report TBR-C-202211-0017-4	

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1. 20dB Emission Bandwidth

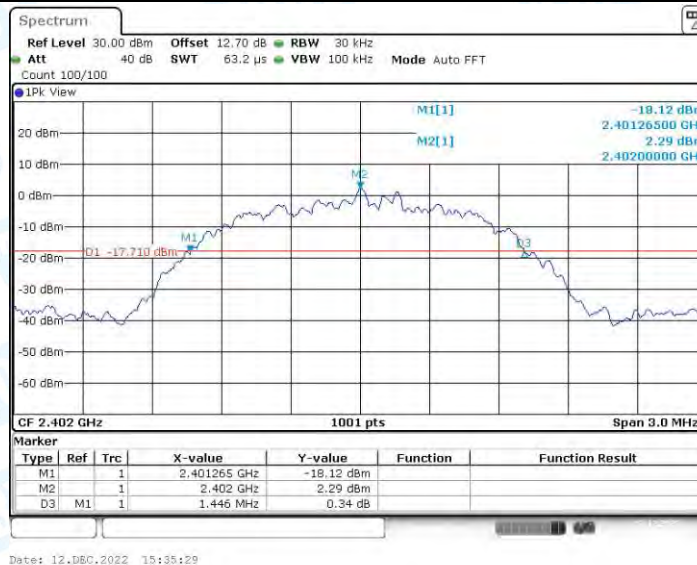
1.1. Test Result

TestMode	Antenna	Channel	20db EBW[MHz]	Limit[MHz]	Verdict
DH5	Ant1	2402	0.96	---	---
		2441	0.95	---	---
		2480	0.95	---	---
2DH5	Ant1	2402	1.45	---	---
		2441	1.45	---	---
		2480	1.45	---	---
3DH5	Ant1	2402	1.48	---	---
		2441	1.48	---	---
		2480	1.49	---	---

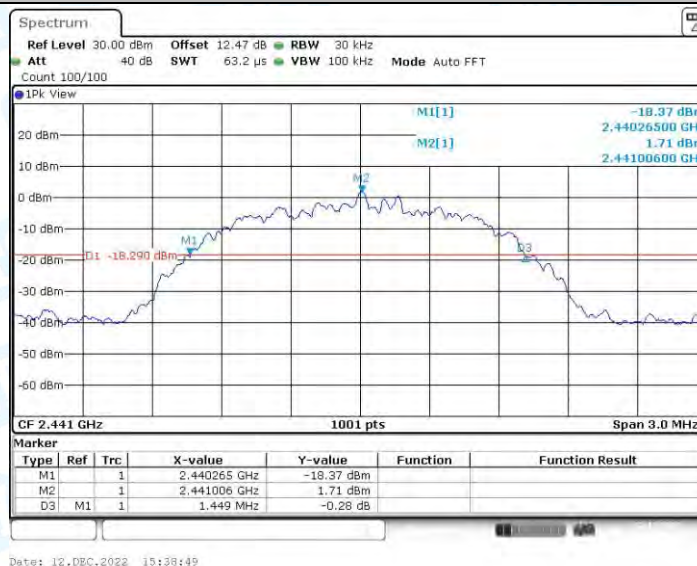
1.2. Test Graphs



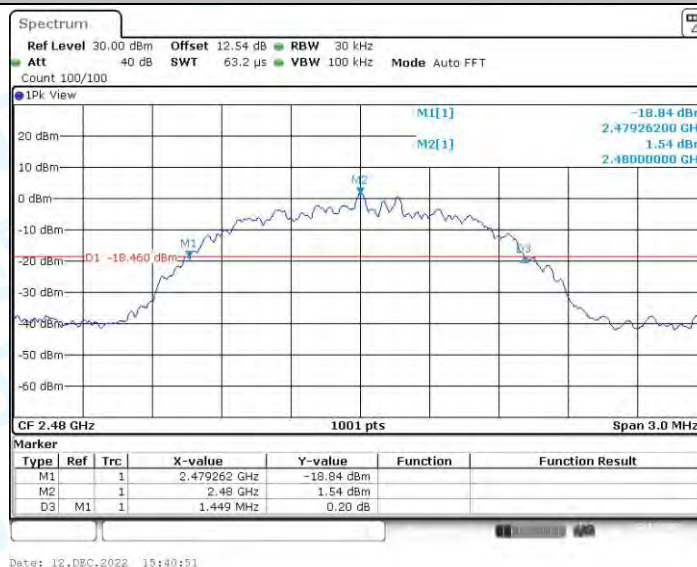
2DH5_Ant1_2402



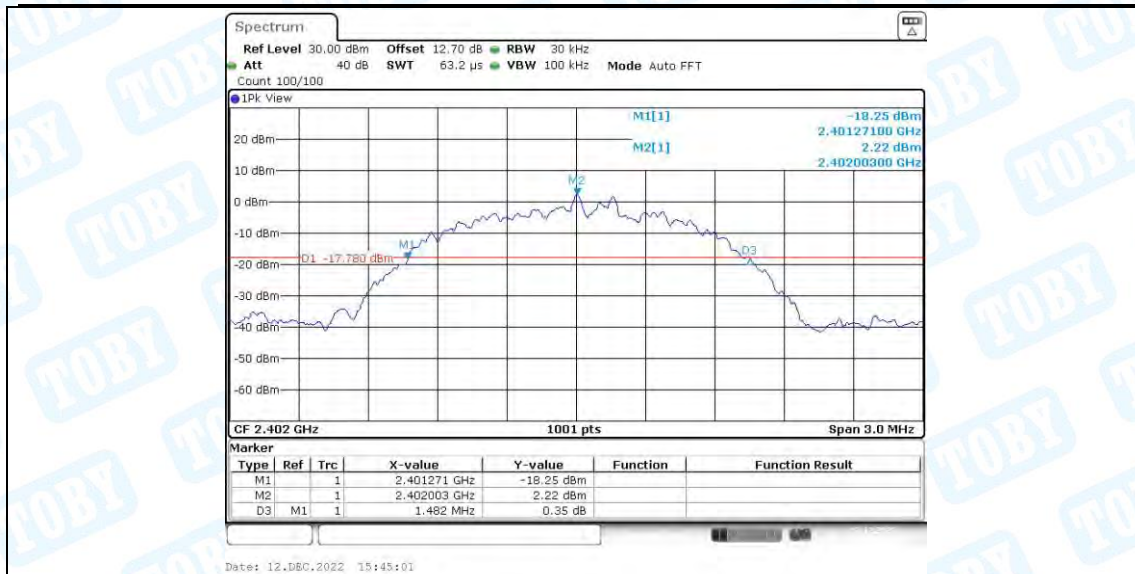
2DH5_Ant1_2441



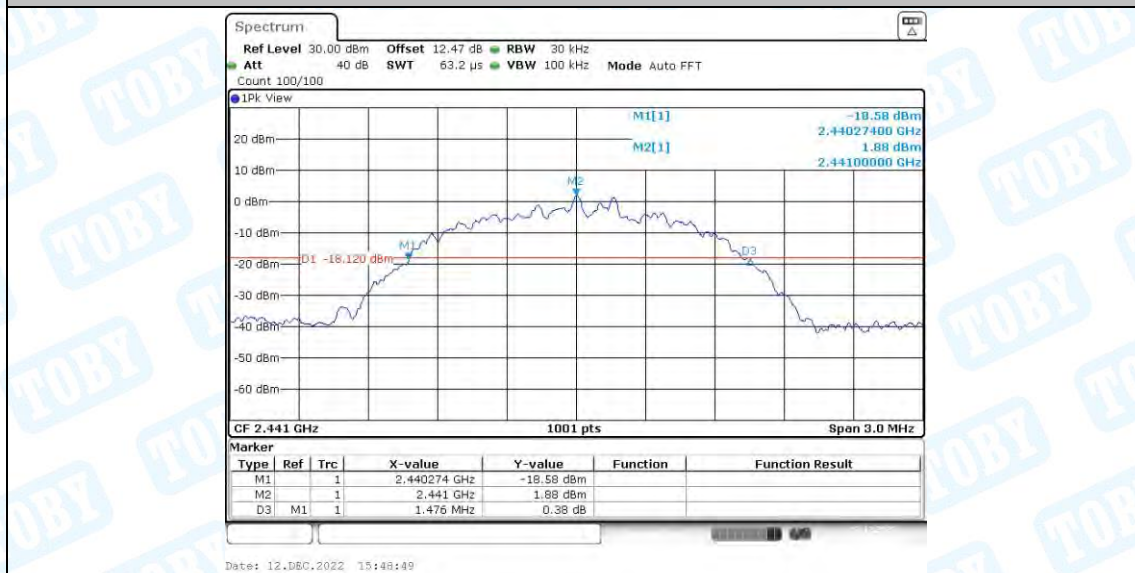
2DH5_Ant1_2480



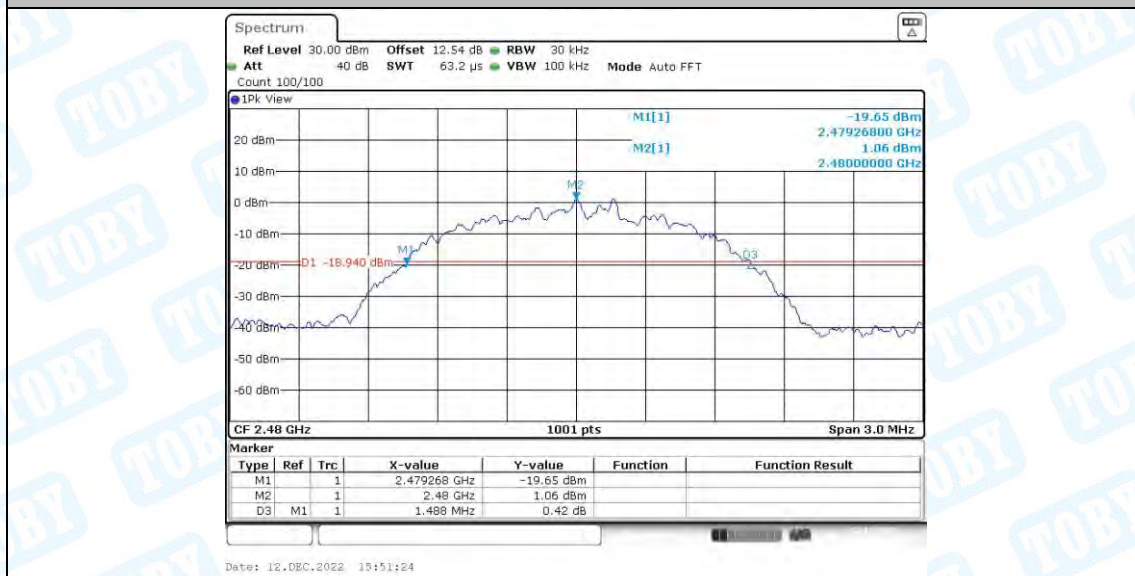
3DH5_Ant1_2402



3DH5_Ant1_2441



3DH5_Ant1_2480



2. Occupied Channel Bandwidth

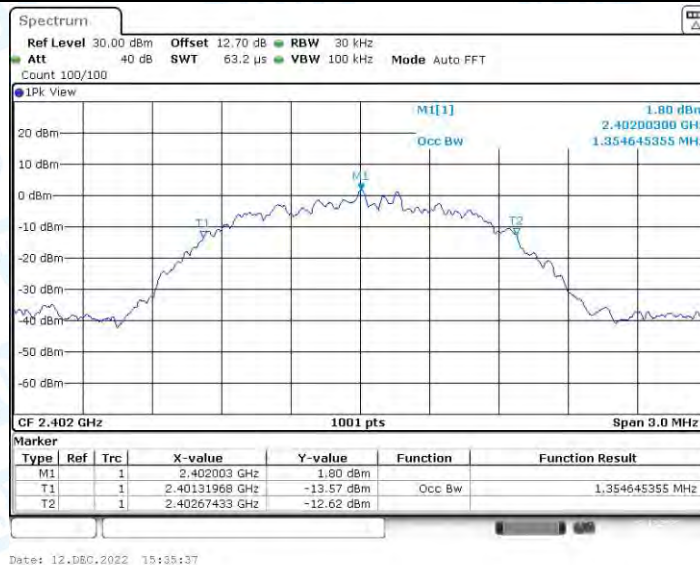
2.1. Test Result

TestMode	Antenna	Channel	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH5	Ant1	2402	0.875	2401.5624	2402.4376	---	---
		2441	0.887	2440.5594	2441.4466	---	---
		2480	0.878	2479.5594	2480.4376	---	---
2DH5	Ant1	2402	1.355	2401.3197	2402.6743	---	---
		2441	1.352	2440.3227	2441.6743	---	---
		2480	1.358	2479.3167	2480.6743	---	---
3DH5	Ant1	2402	1.355	2401.3197	2402.6743	---	---
		2441	1.355	2440.3197	2441.6743	---	---
		2480	1.364	2479.3137	2480.6773	---	---

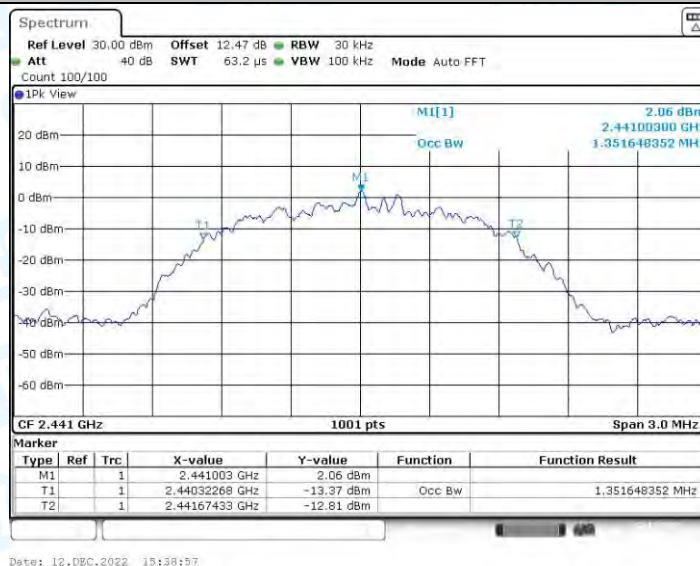
2.2. Test Graphs



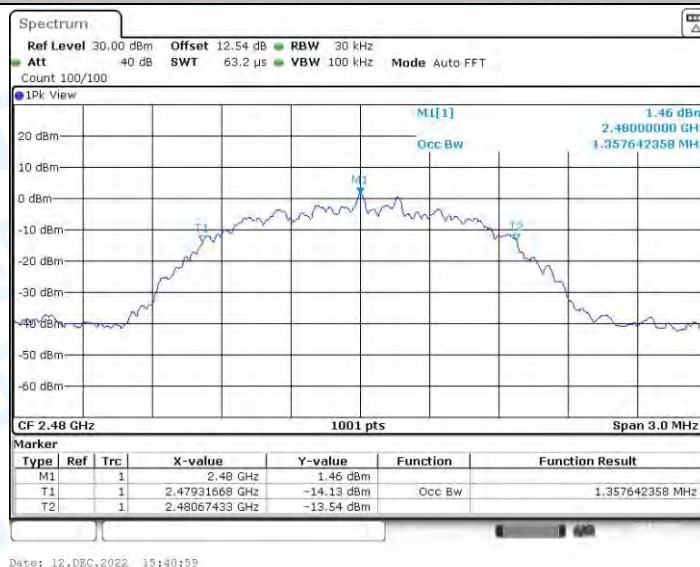
2DH5_Ant1_2402



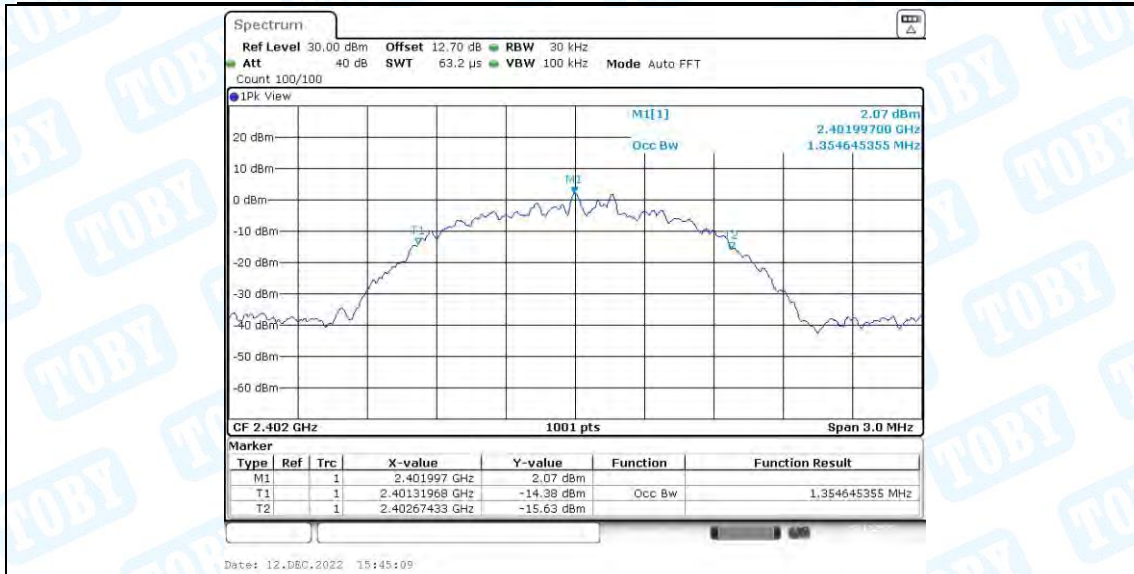
2DH5_Ant1_2441



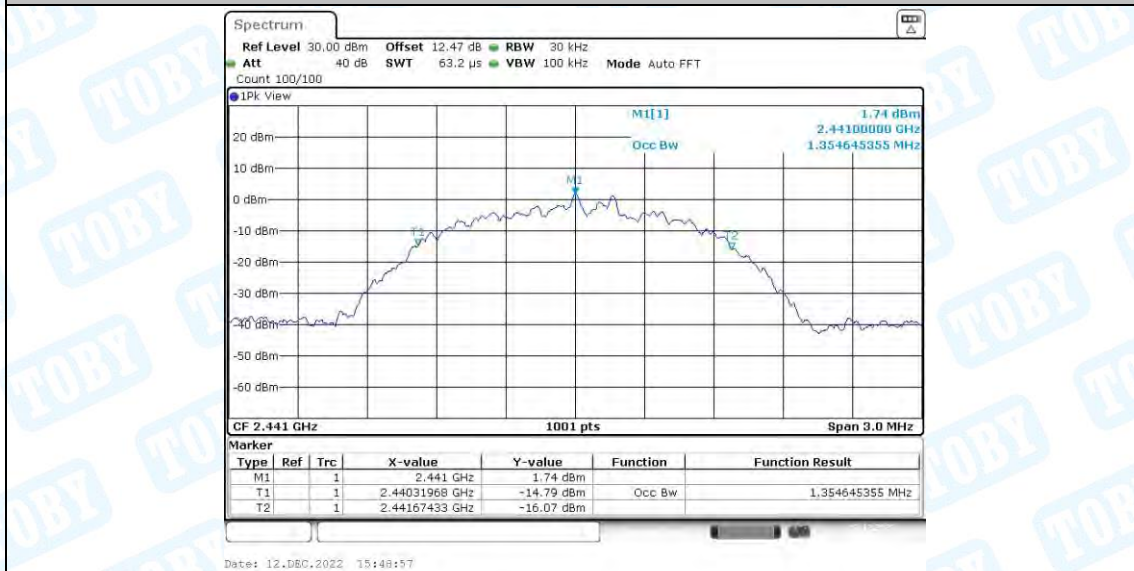
2DH5_Ant1_2480



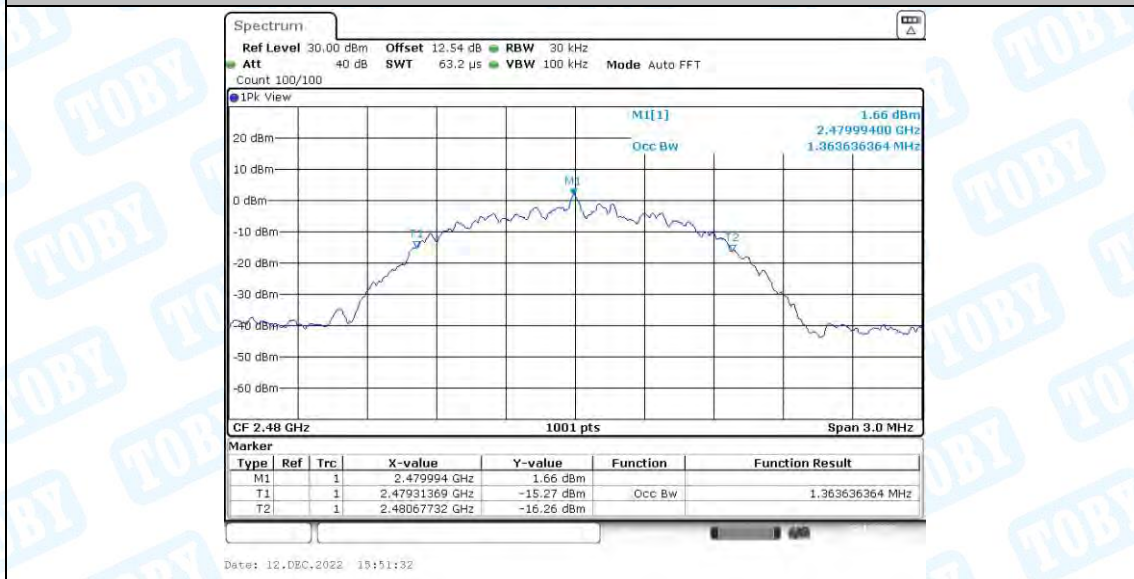
3DH5_Ant1_2402



3DH5_Ant1_2441



3DH5_Ant1_2480



3. Maximum conducted output power

3.1. Test Result

TestMode	Antenna	Channel	Result[dBm]	Limit[dBm]	Verdict
DH5	Ant1	2402	4.51	≤21	PASS
		2441	4.09	≤21	PASS
		2480	3.87	≤21	PASS
2DH5	Ant1	2402	6.45	≤21	PASS
		2441	6.22	≤21	PASS
		2480	6.00	≤21	PASS
3DH5	Ant1	2402	6.79	≤21	PASS
		2441	6.24	≤21	PASS
		2480	6.18	≤21	PASS

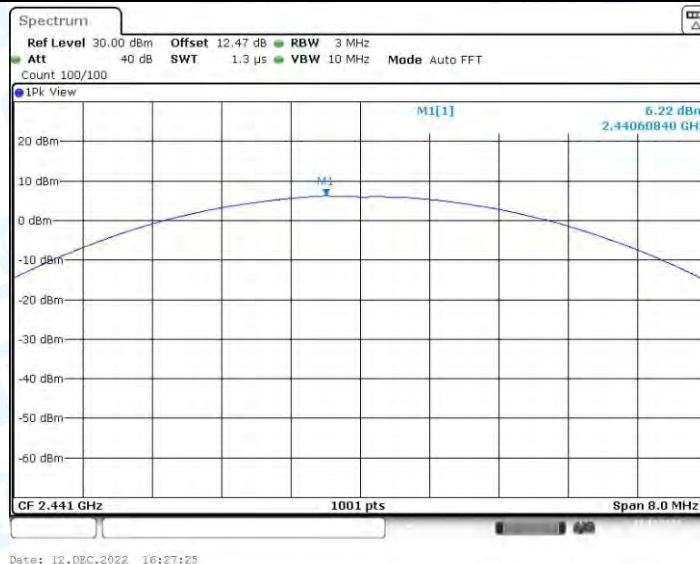
3.2. Test Graphs



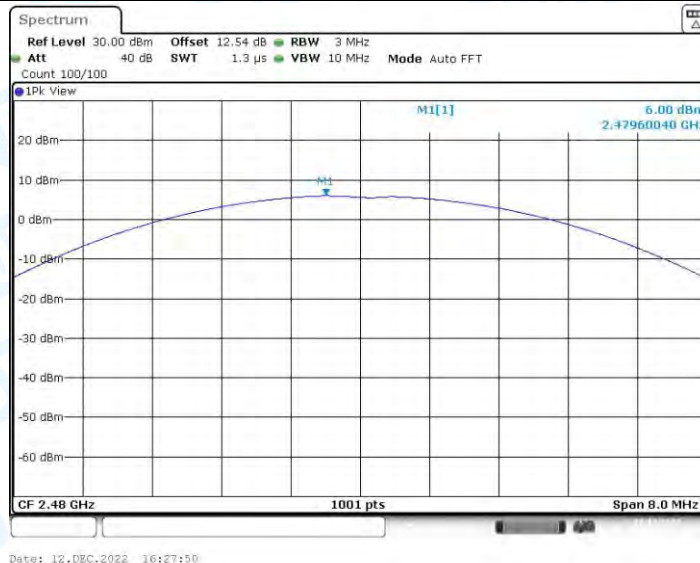
2DH5_Ant1_2402



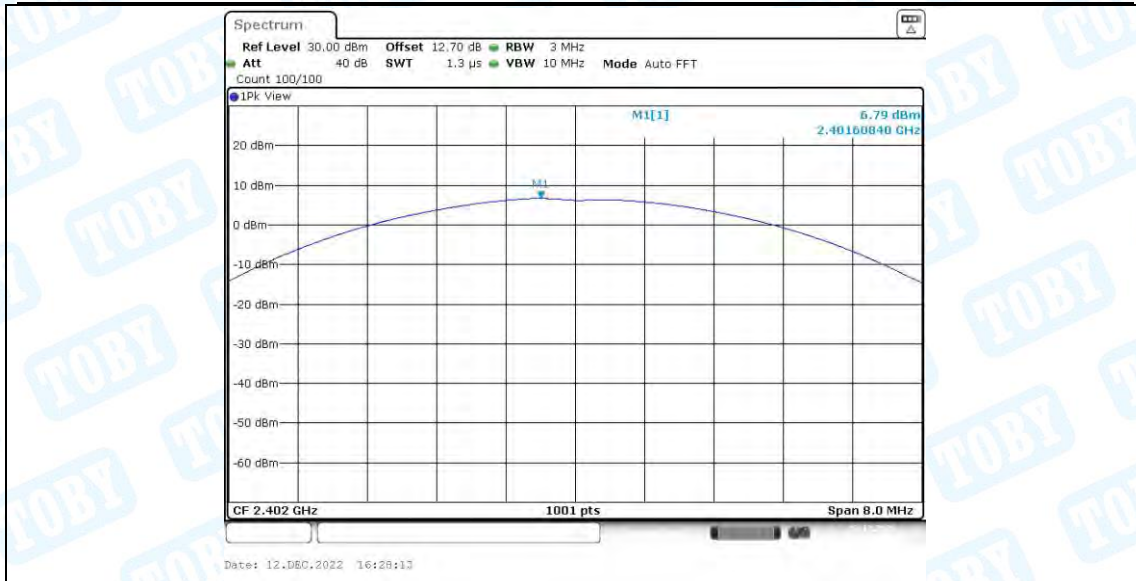
2DH5_Ant1_2441



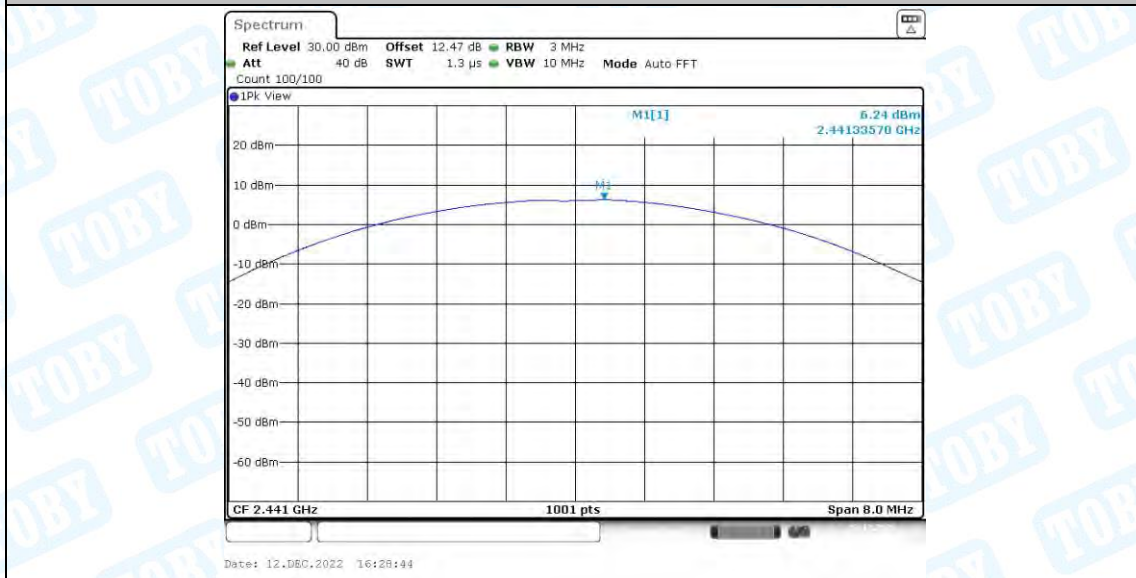
2DH5_Ant1_2480



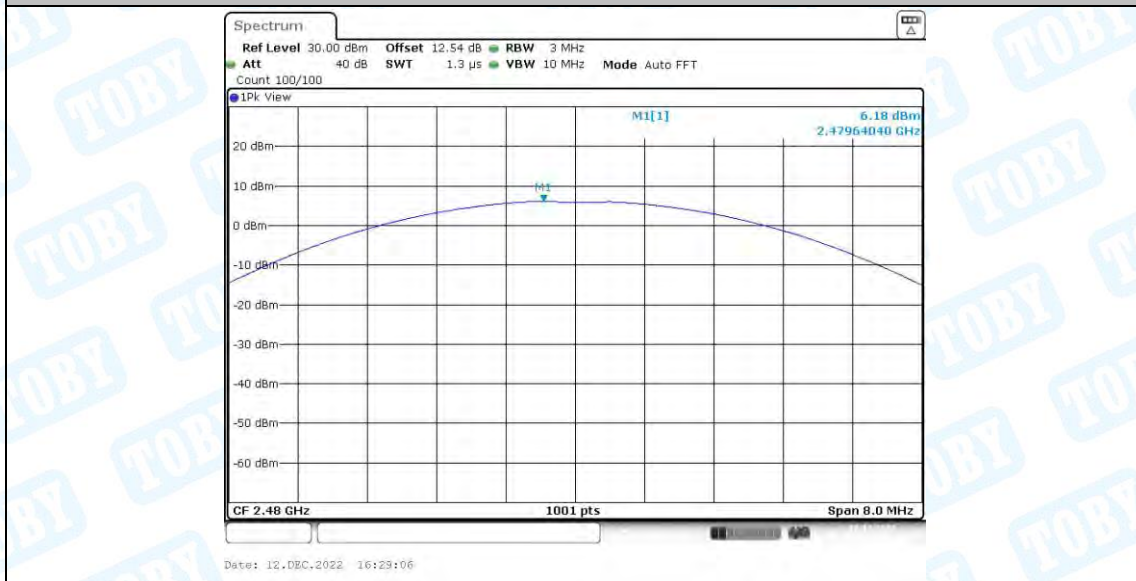
3DH5_Ant1_2402



3DH5_Ant1_2441



3DH5_Ant1_2480



4. Carrier frequency separation

4.1. Test Result

TestMode	Antenna	Channel	Result[MHz]	Limit[MHz]	Verdict
DH5	Ant1	Hop	0.994	≥ 0.960	PASS
2DH5	Ant1	Hop	1.313	≥ 0.967	PASS
3DH5	Ant1	Hop	1.133	≥ 0.993	PASS

4.2. Test Graphs

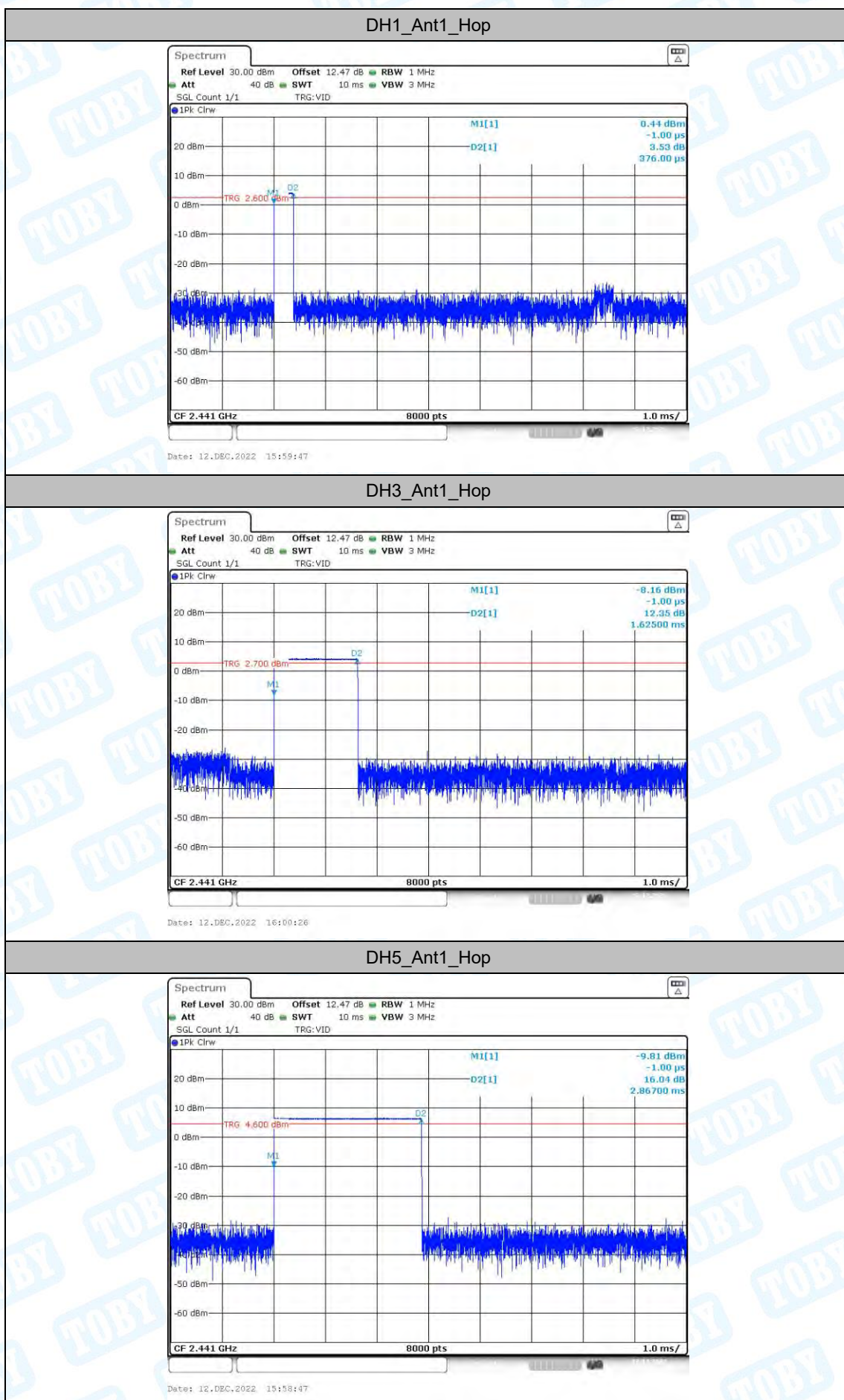


5. Time of occupancy

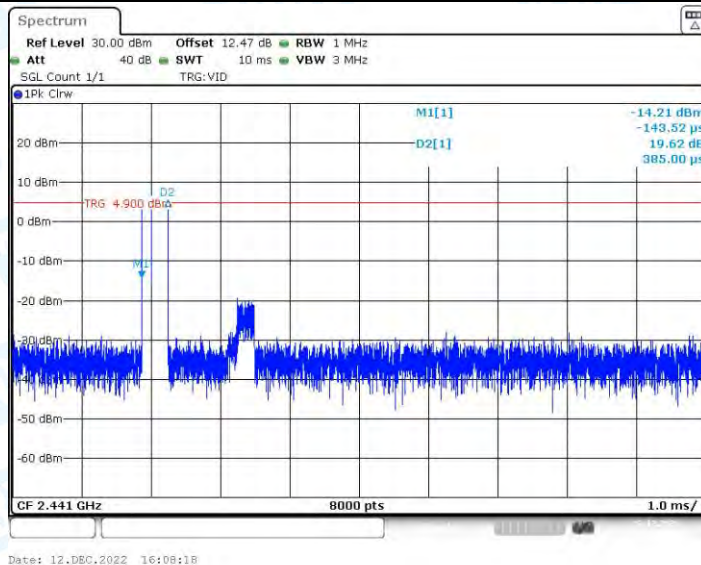
5.1. Test Result

TestMode	Antenna	Channel	BurstWidth [ms]	TotalHops [Num]	Result[s]	Limit[s]	Verdict
DH1	Ant1	Hop	0.376	320	0.12	≤0.4	PASS
DH3	Ant1	Hop	1.625	160	0.26	≤0.4	PASS
DH5	Ant1	Hop	2.867	106.67	0.306	≤0.4	PASS
2DH1	Ant1	Hop	0.385	320	0.123	≤0.4	PASS
2DH3	Ant1	Hop	1.629	160	0.261	≤0.4	PASS
2DH5	Ant1	Hop	2.870	106.67	0.306	≤0.4	PASS
3DH1	Ant1	Hop	0.385	320	0.123	≤0.4	PASS
3DH3	Ant1	Hop	1.629	160	0.261	≤0.4	PASS
3DH5	Ant1	Hop	2.872	106.67	0.306	≤0.4	PASS

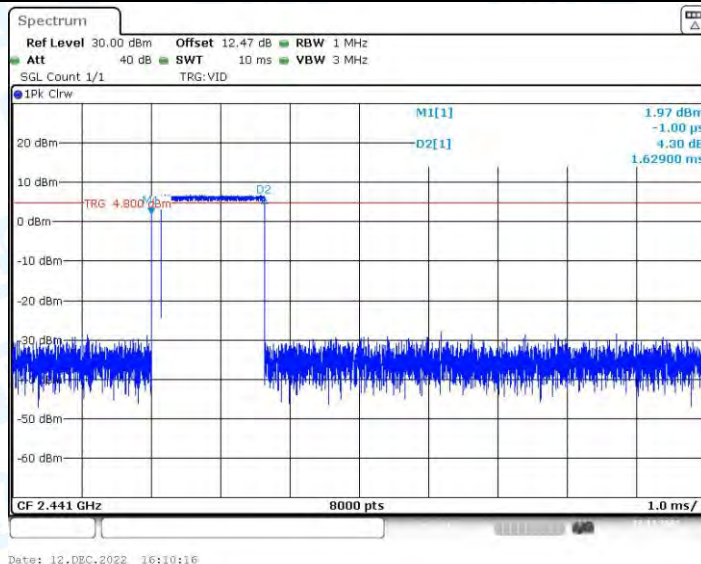
5.2. Test Graphs



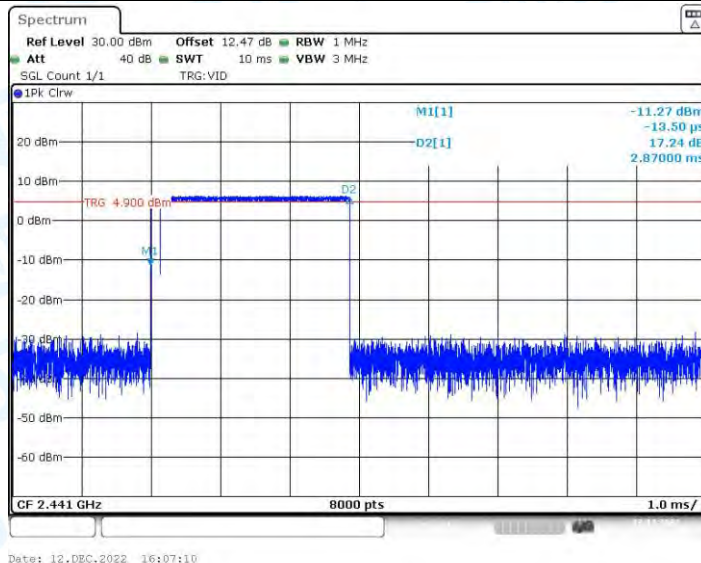
2DH1_Ant1_Hop



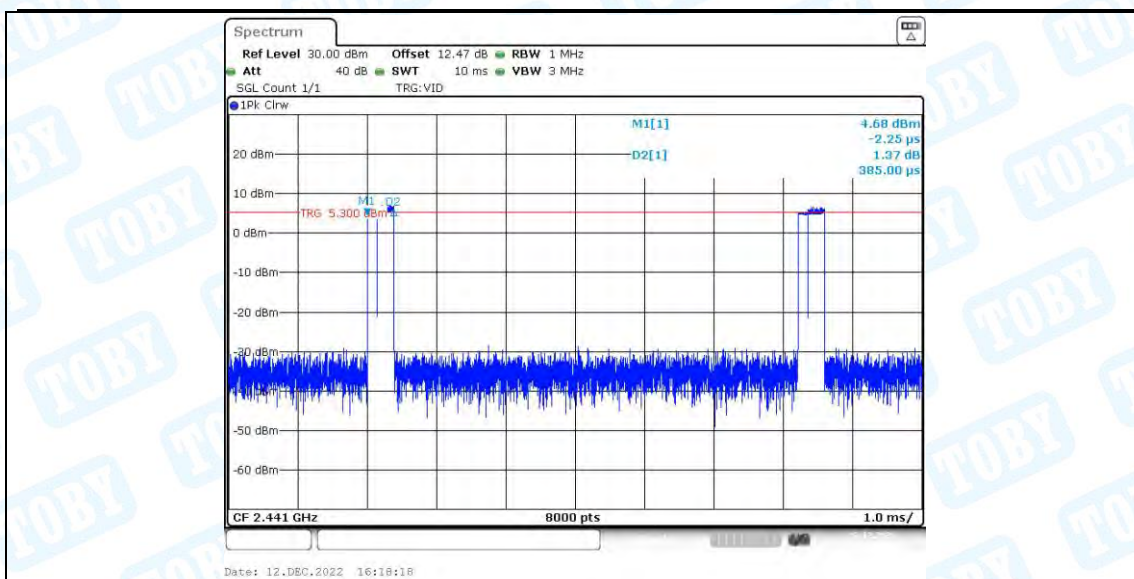
2DH3_Ant1_Hop



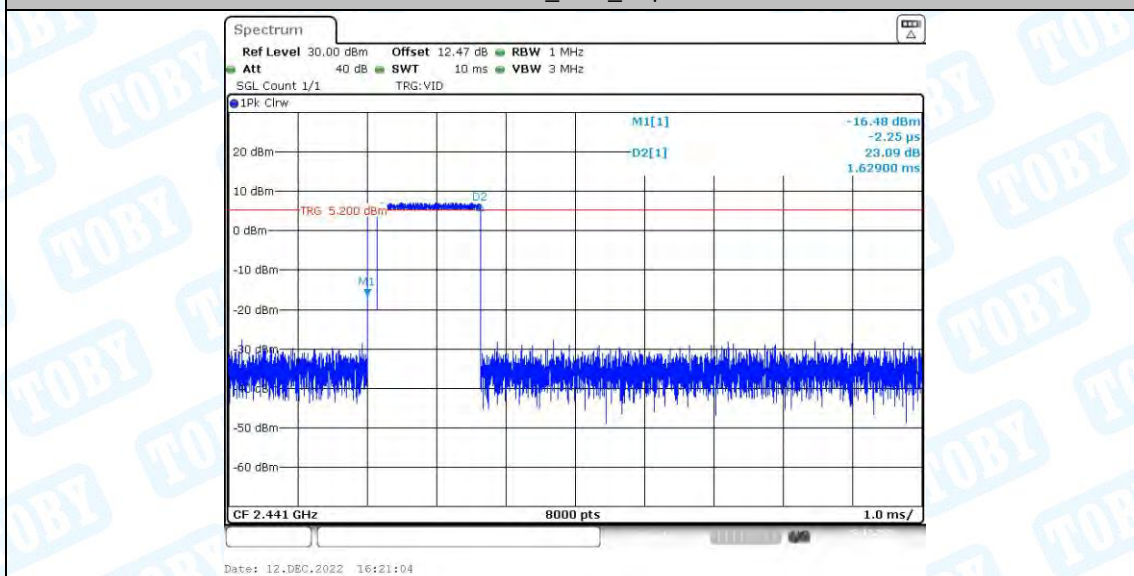
2DH5_Ant1_Hop



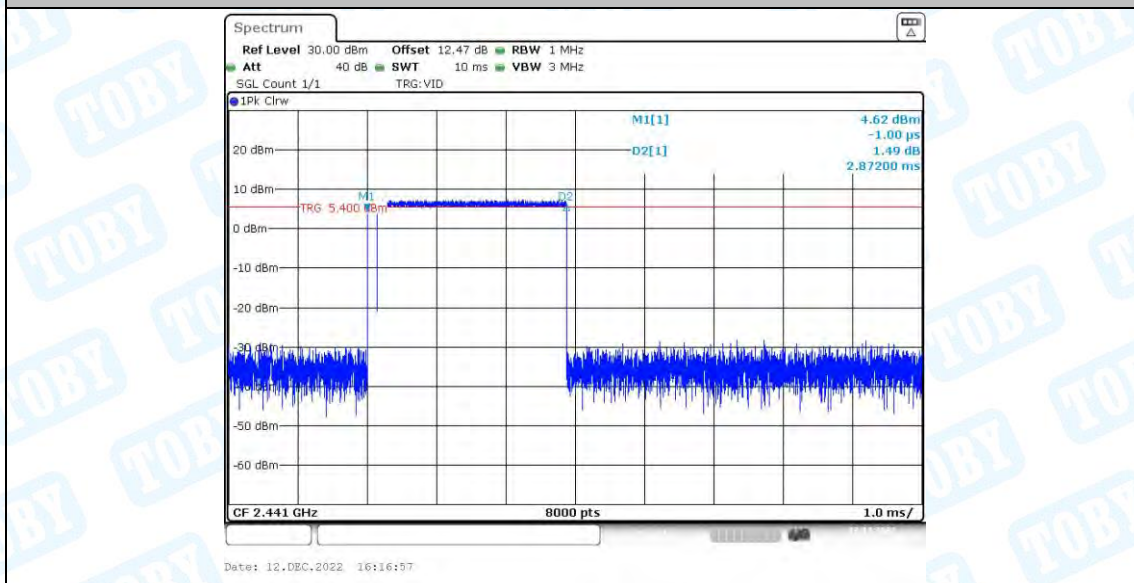
3DH1_Ant1_Hop



3DH3_Ant1_Hop



3DH5_Ant1_Hop



6. Number of hopping channels

6.1. Test Result

TestMode	Antenna	Channel	Result[Num]	Limit[Num]	Verdict
DH5	Ant1	Hop	79	≥15	PASS
2DH5	Ant1	Hop	79	≥15	PASS
3DH5	Ant1	Hop	79	≥15	PASS

6.2.Test Graphs

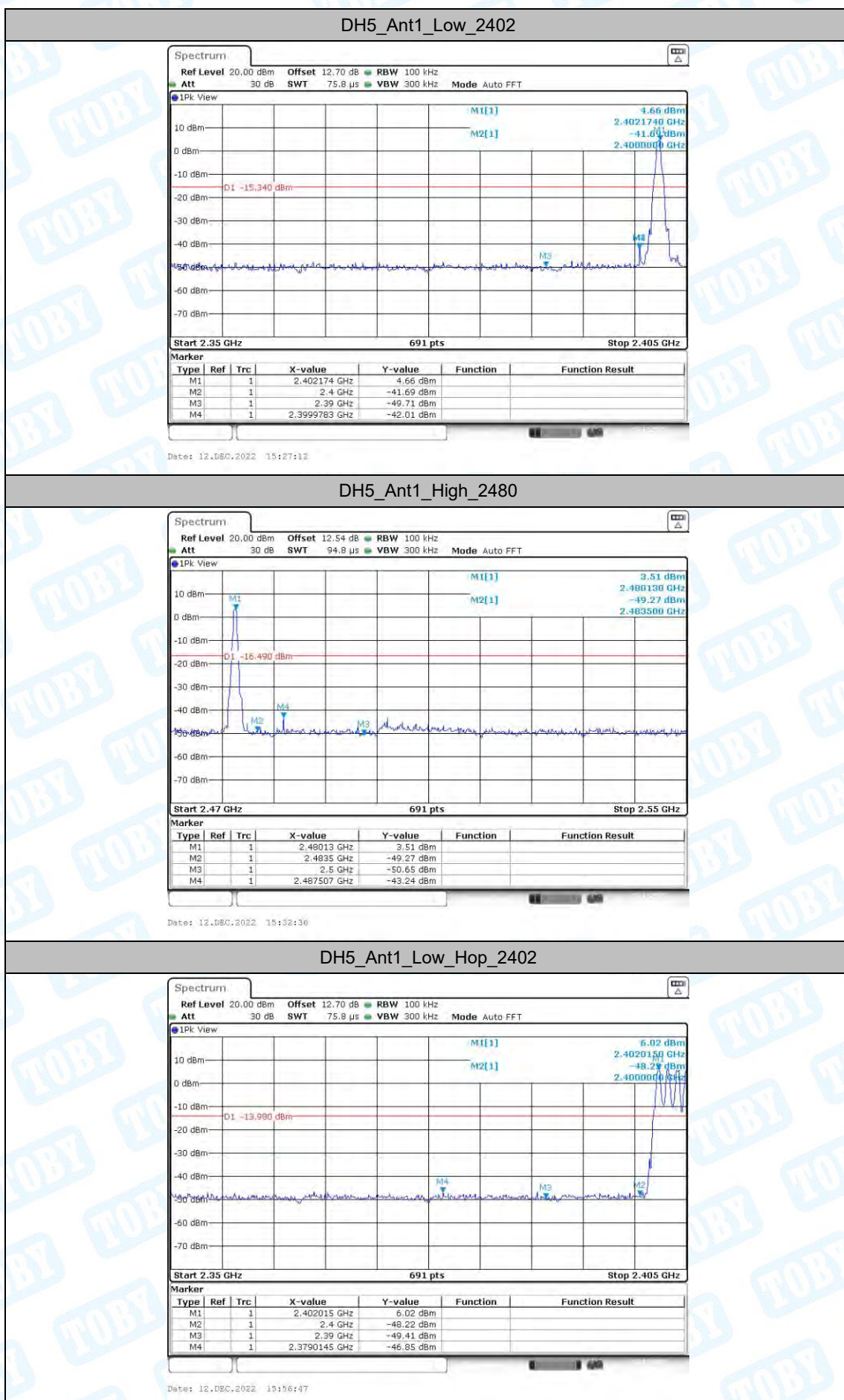


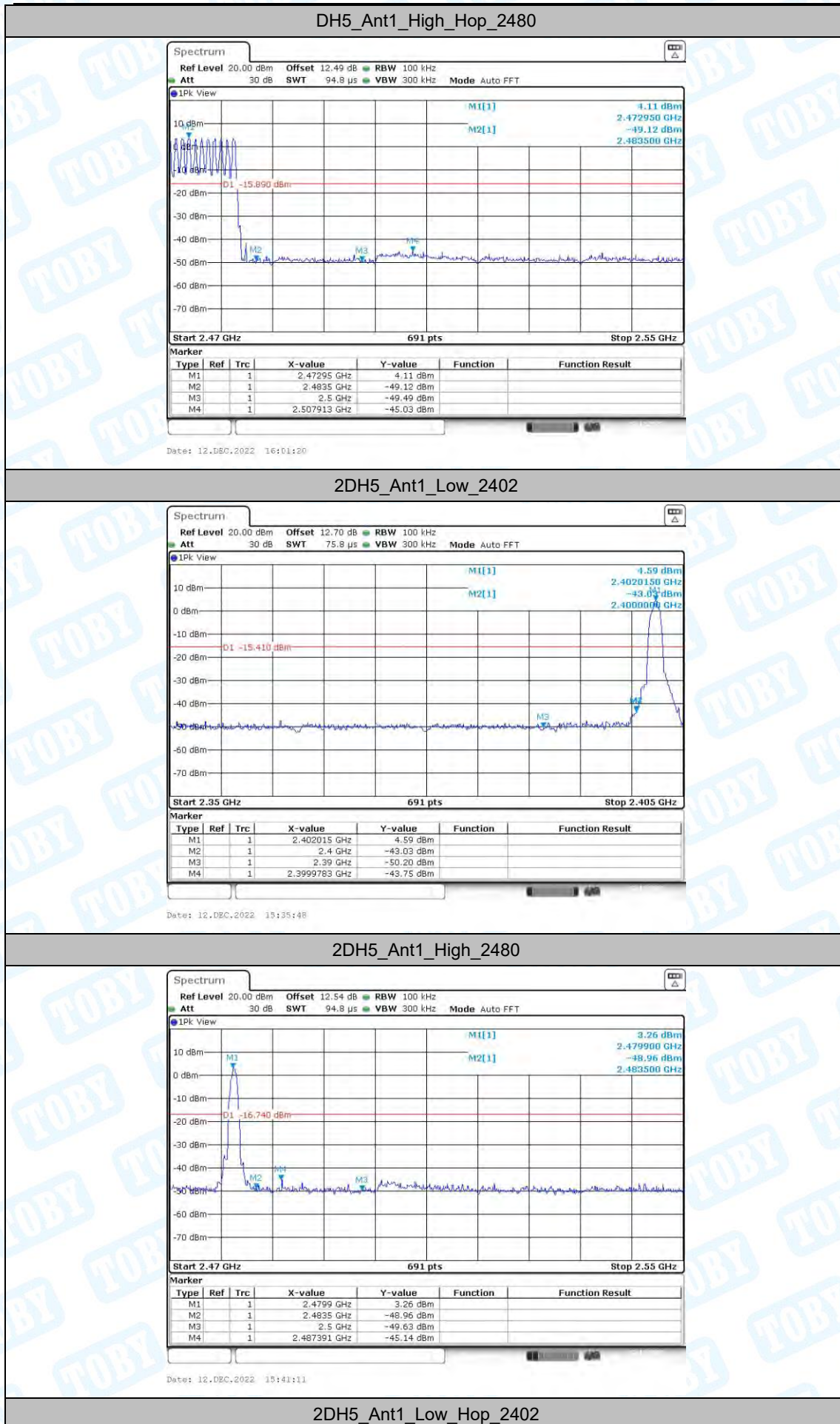
7. Band edge measurements

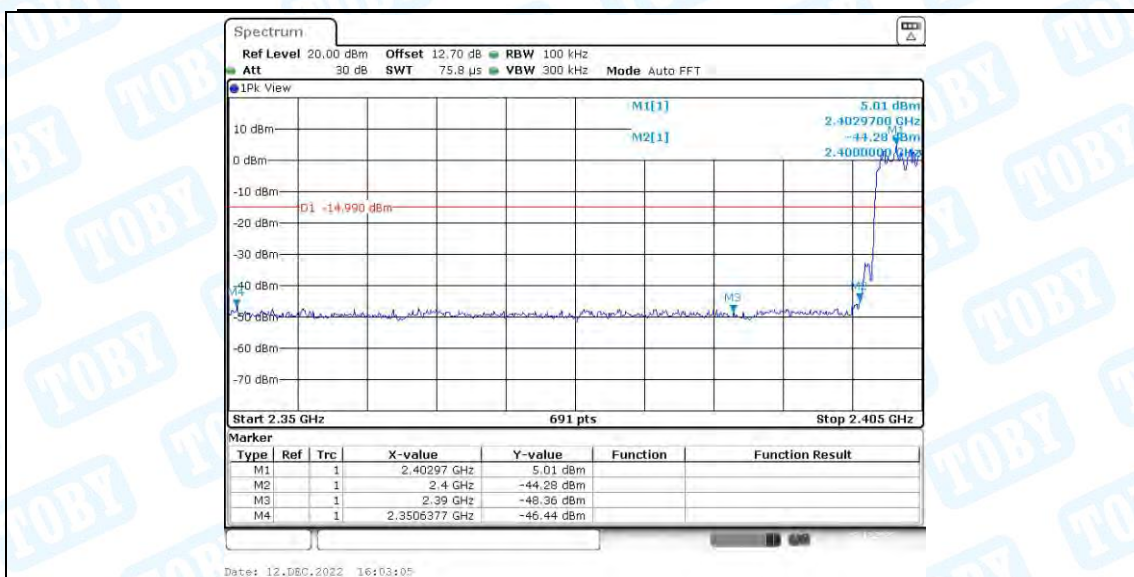
7.1. Test Result

TestMode	Antenna	ChName	Channel	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	Low	2402	4.66	-42.01	≤-15.34	PASS
		High	2480	3.51	-43.24	≤-16.49	PASS
		Low	Hop_2402	6.02	-46.85	≤-13.98	PASS
		High	Hop_2480	4.11	-45.03	≤-15.89	PASS
2DH5	Ant1	Low	2402	4.59	-43.75	≤-15.41	PASS
		High	2480	3.26	-45.14	≤-16.74	PASS
		Low	Hop_2402	5.01	-46.44	≤-14.99	PASS
		High	Hop_2480	5.80	-45.37	≤-14.2	PASS
3DH5	Ant1	Low	2402	4.52	-43.55	≤-15.48	PASS
		High	2480	3.80	-45.39	≤-16.2	PASS
		Low	Hop_2402	4.65	-46.61	≤-15.35	PASS
		High	Hop_2480	3.59	-45.94	≤-16.41	PASS

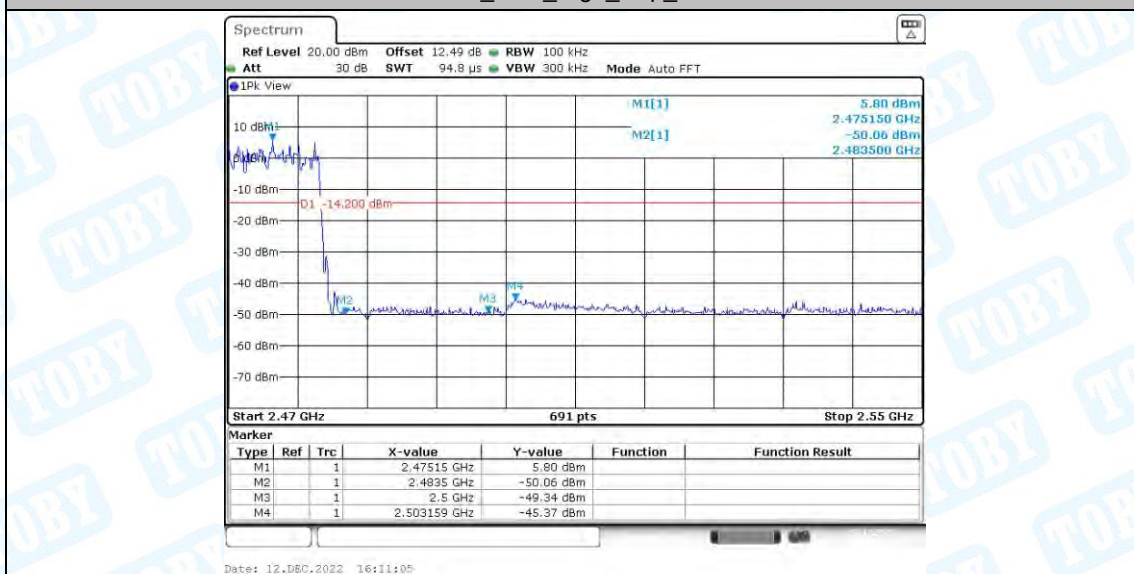
7.2. Test Graphs



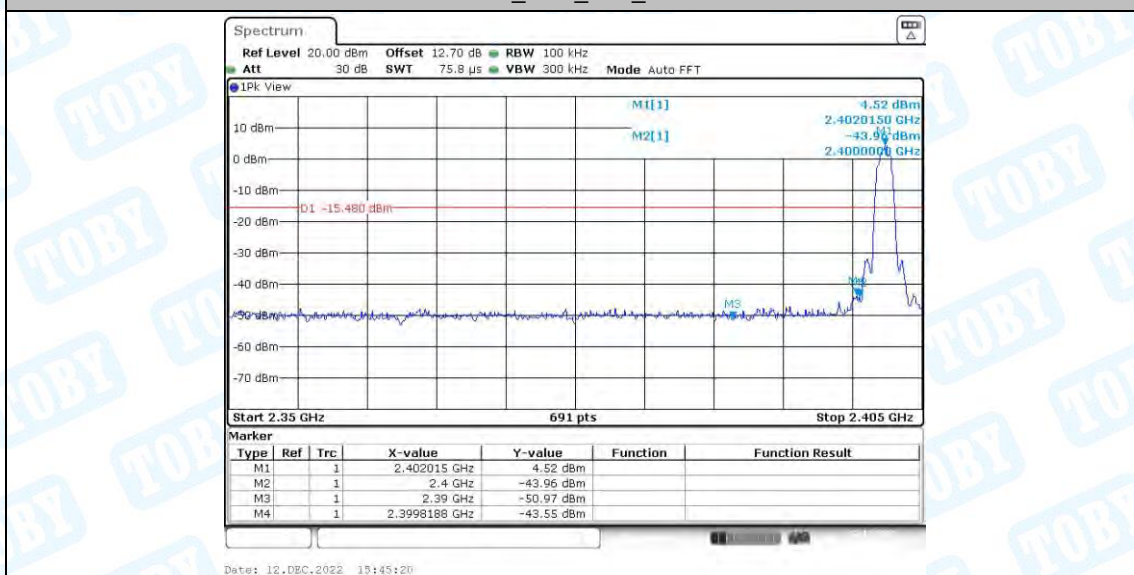




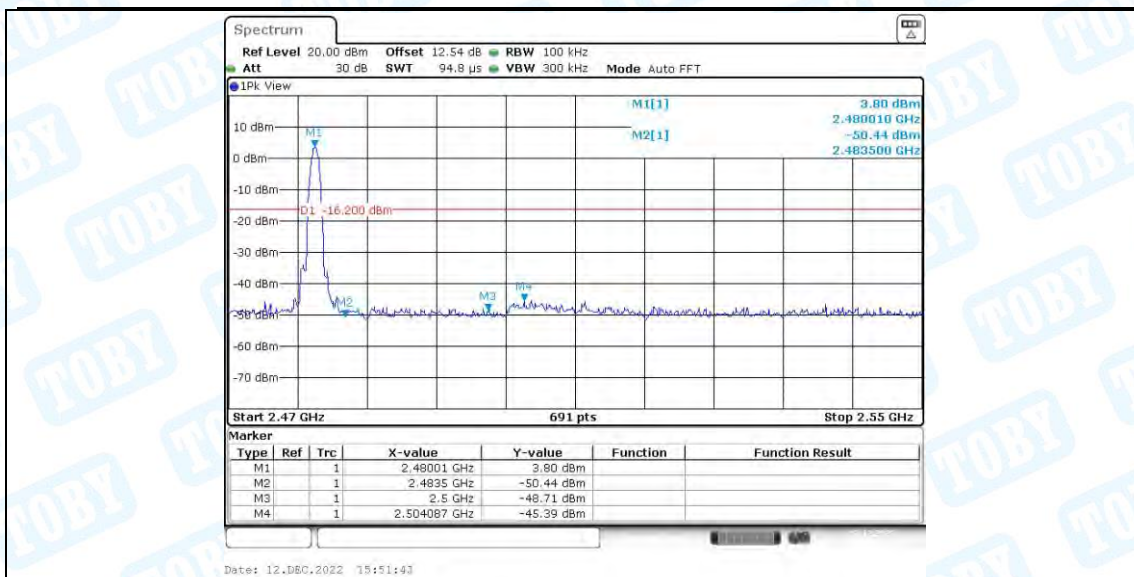
2DH5_Ant1_High_Hop_2480



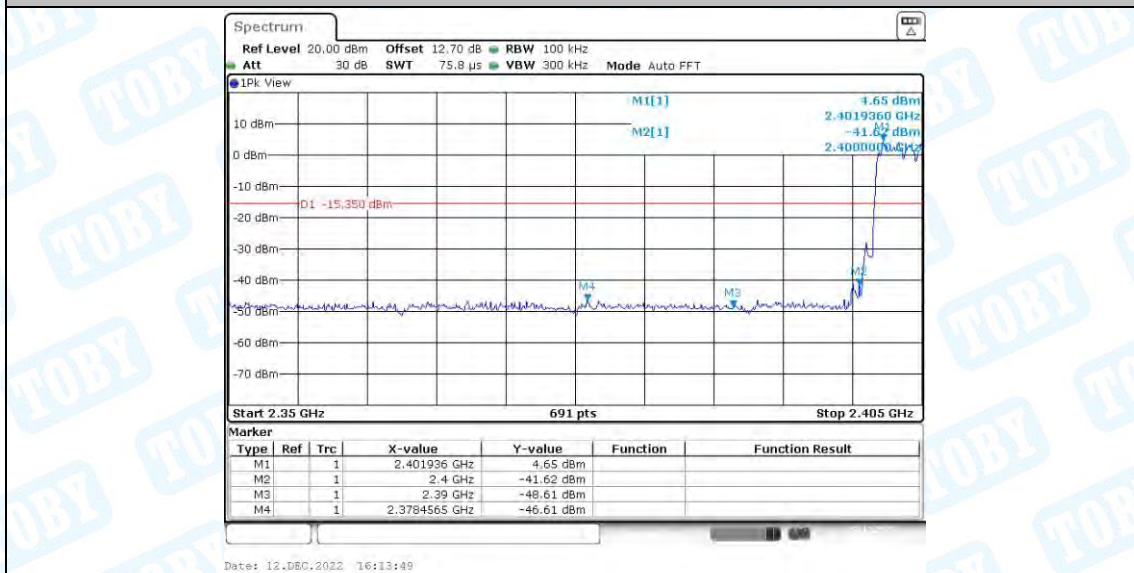
3DH5_Ant1_Low_2402



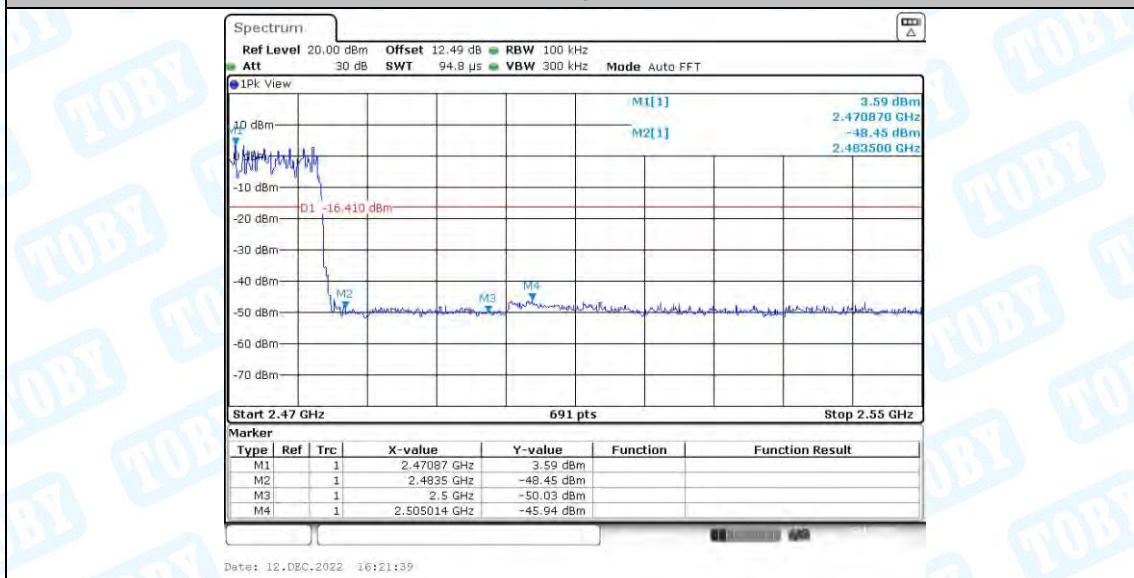
3DH5_Ant1_High_2480



3DH5_Ant1_Low_Hop_2402



3DH5_Ant1_High_Hop_2480

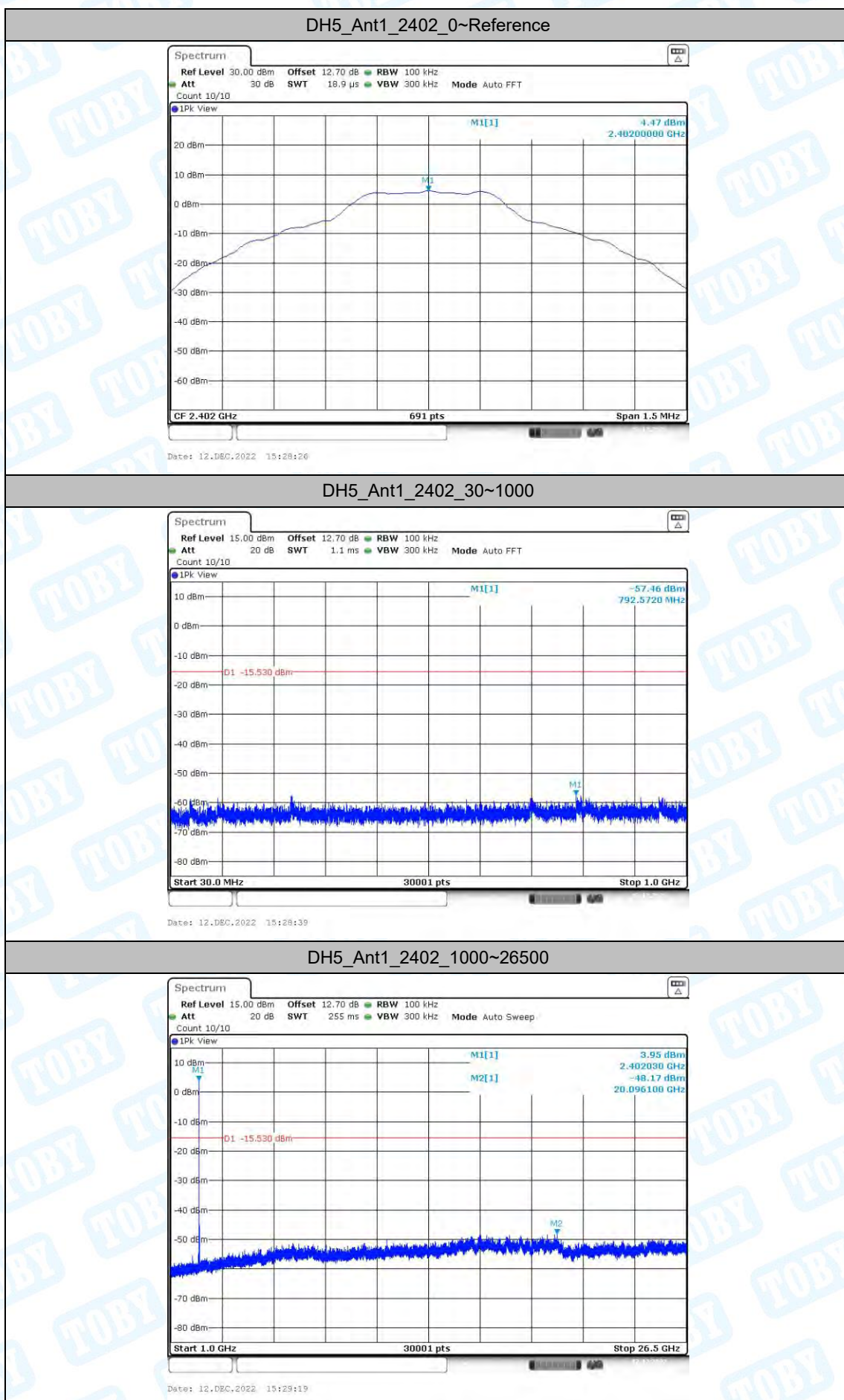


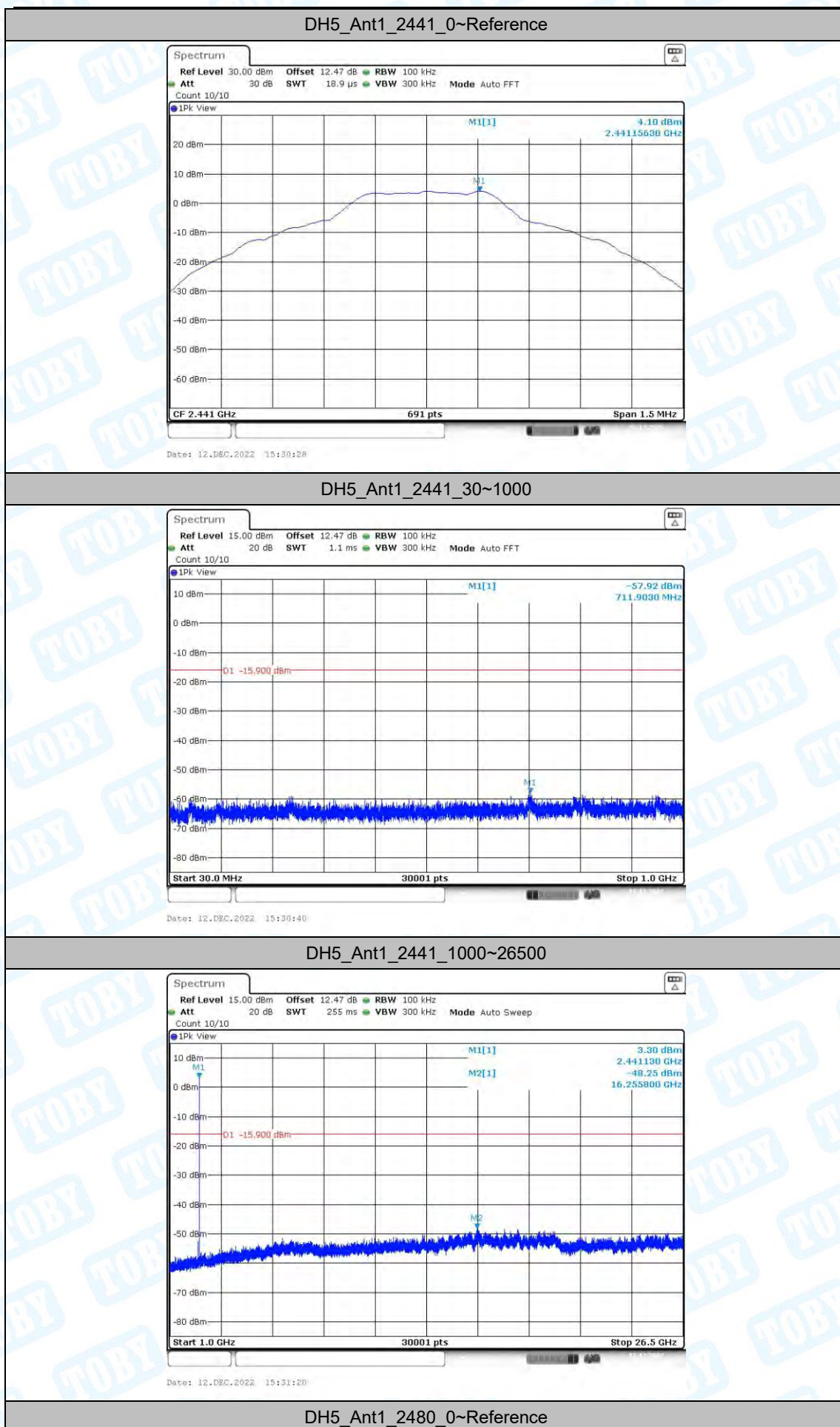
8. Conducted Spurious Emission

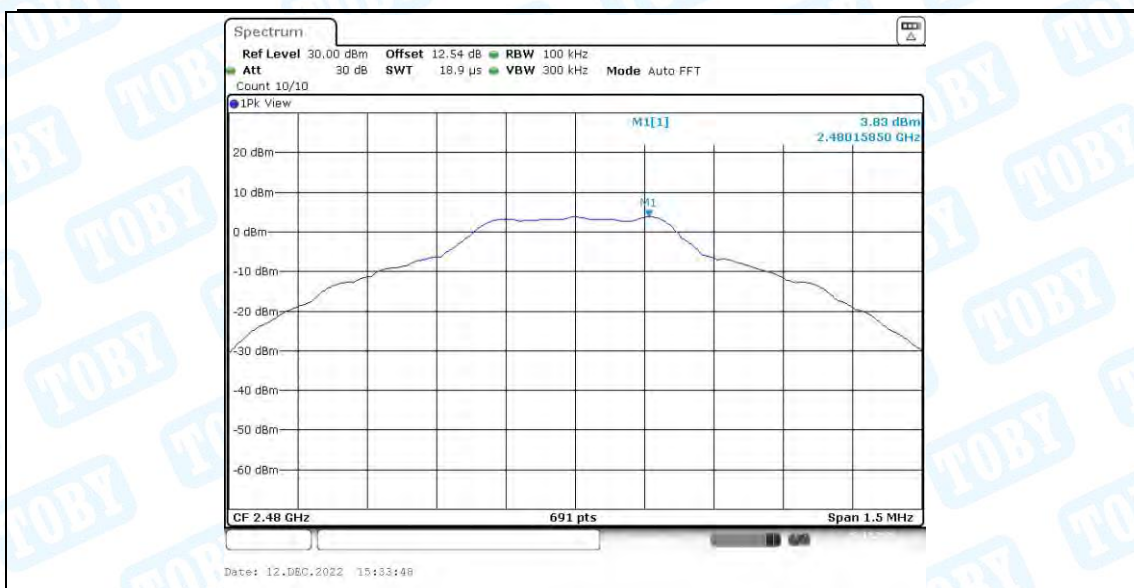
8.1. Test Result

TestMode	Antenna	Channel	FreqRange [MHz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	2402	Reference	4.47	4.47	---	PASS
			30~1000	4.47	-57.46	≤-15.53	PASS
			1000~26500	4.47	-48.17	≤-15.53	PASS
		2441	Reference	4.10	4.10	---	PASS
			30~1000	4.10	-57.92	≤-15.9	PASS
			1000~26500	4.10	-48.25	≤-15.9	PASS
		2480	Reference	3.83	3.83	---	PASS
			30~1000	3.83	-57.64	≤-16.17	PASS
			1000~26500	3.83	-48.23	≤-16.17	PASS
2DH5	Ant1	2402	Reference	4.44	4.44	---	PASS
			30~1000	4.44	-57.57	≤-15.56	PASS
			1000~26500	4.44	-48.39	≤-15.56	PASS
		2441	Reference	4.10	4.10	---	PASS
			30~1000	4.10	-57.2	≤-15.9	PASS
			1000~26500	4.10	-47.69	≤-15.9	PASS
		2480	Reference	3.61	3.61	---	PASS
			30~1000	3.61	-57.52	≤-16.39	PASS
			1000~26500	3.61	-48.42	≤-16.39	PASS
3DH5	Ant1	2402	Reference	4.42	4.42	---	PASS
			30~1000	4.42	-57.22	≤-15.58	PASS
			1000~26500	4.42	-48.37	≤-15.58	PASS
		2441	Reference	4.01	4.01	---	PASS
			30~1000	4.01	-58.8	≤-15.99	PASS
			1000~26500	4.01	-47.81	≤-15.99	PASS
		2480	Reference	3.91	3.91	---	PASS
			30~1000	3.91	-57.78	≤-16.09	PASS
			1000~26500	3.91	-48.53	≤-16.09	PASS

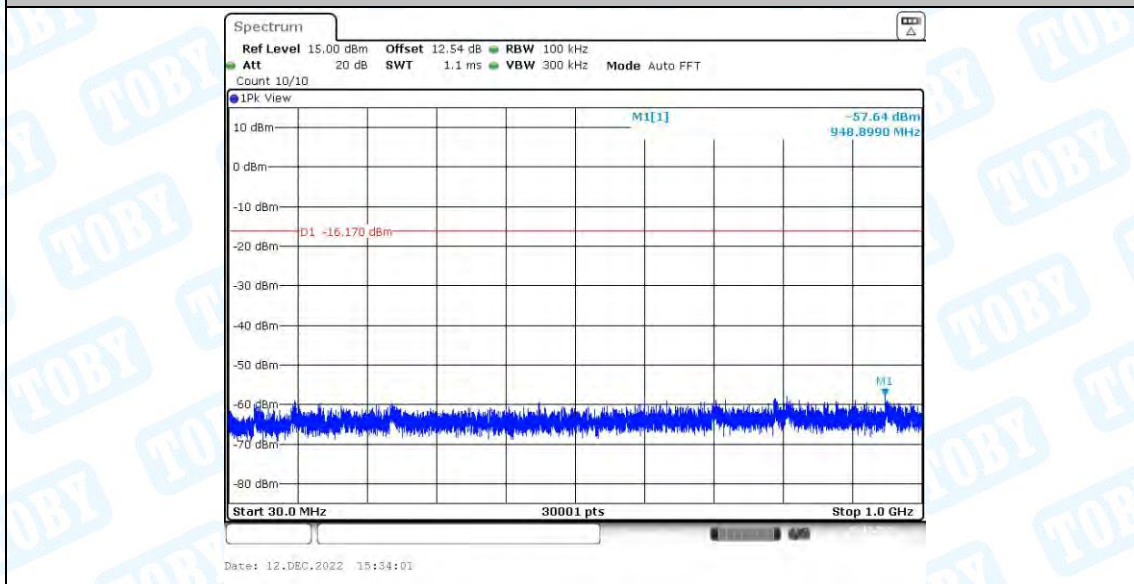
8.2.Test Graphs



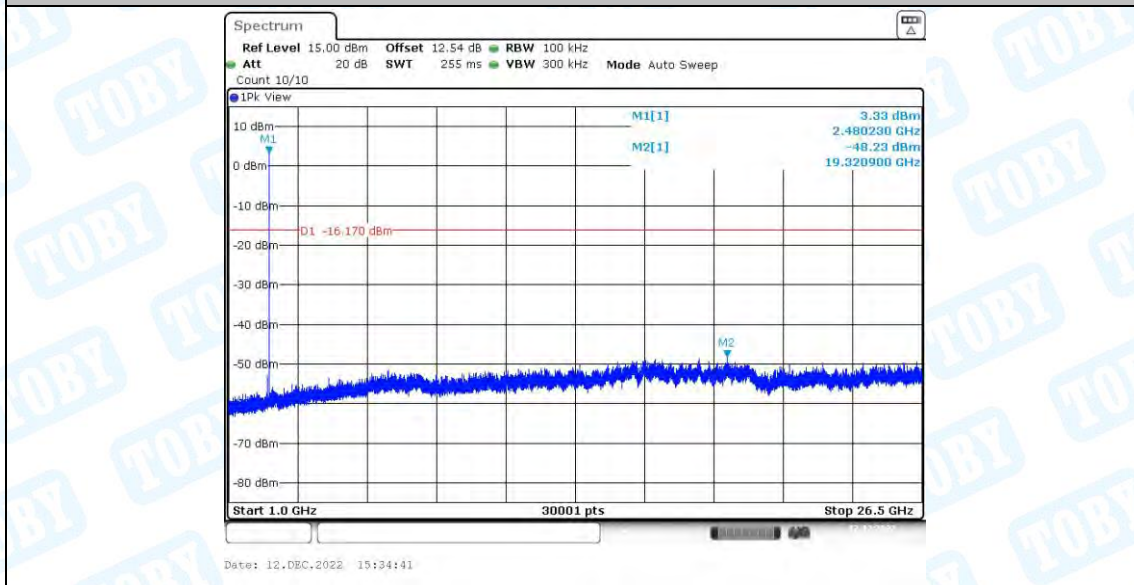




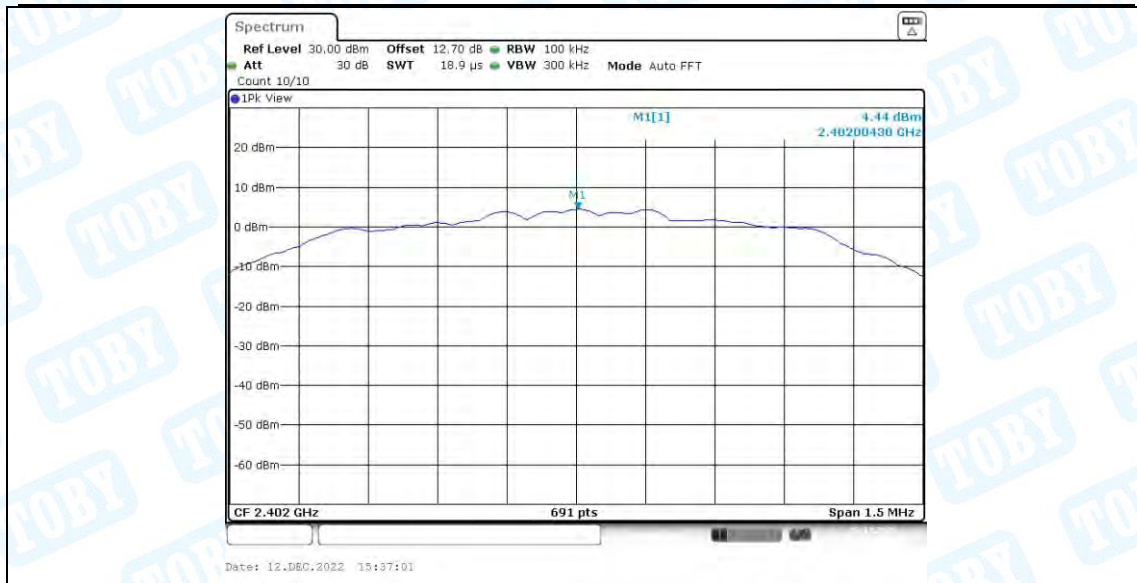
DH5_Ant1_2480_30~1000



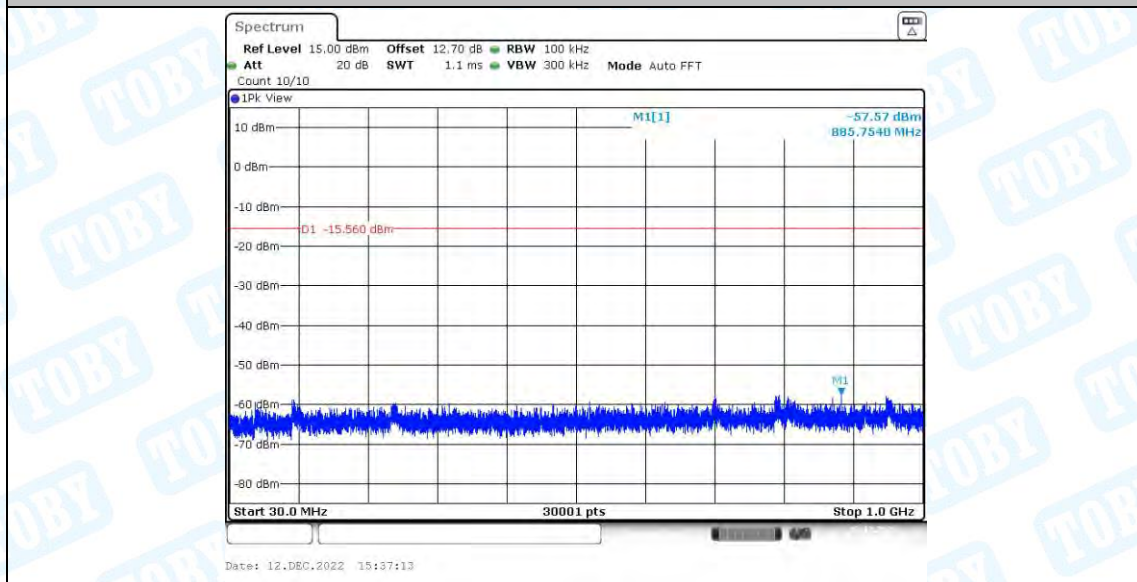
DH5_Ant1_2480_1000~26500



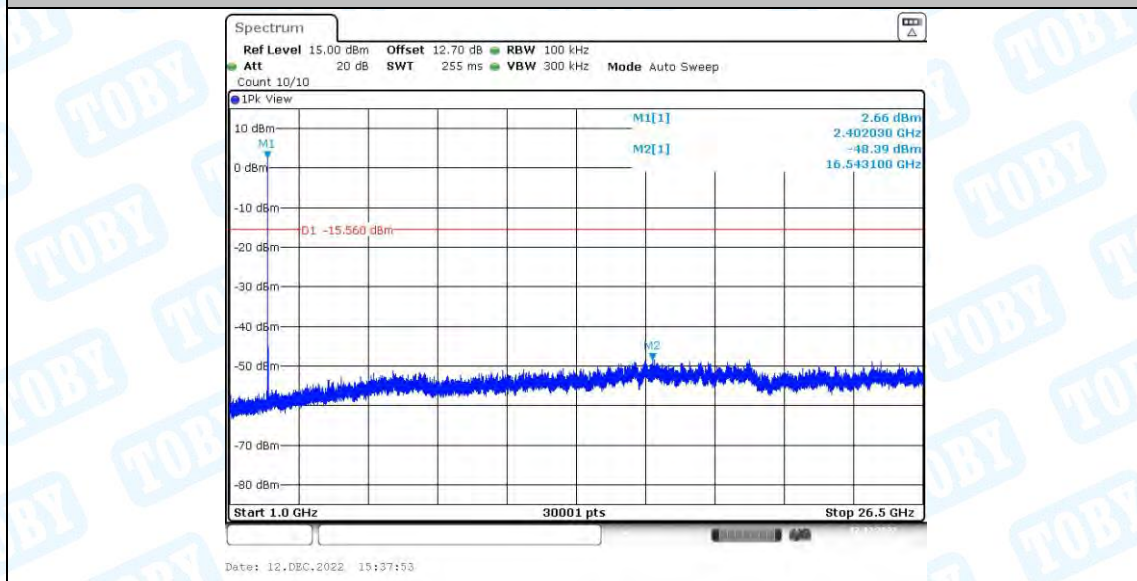
2DH5_Ant1_2402_0~Reference



2DH5_Ant1_2402_30~1000



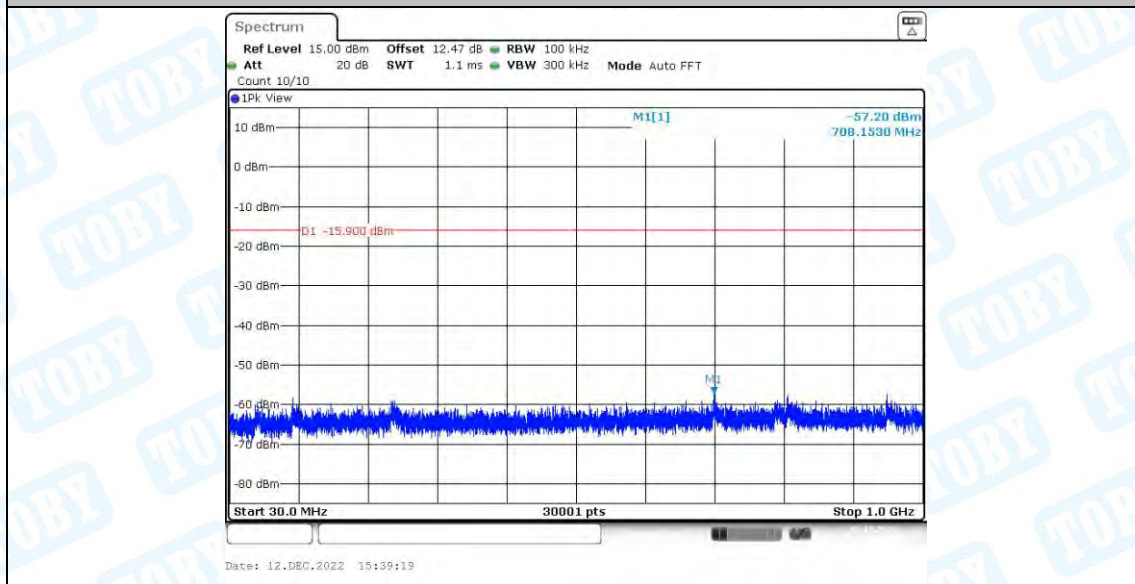
2DH5_Ant1_2402_1000~26500



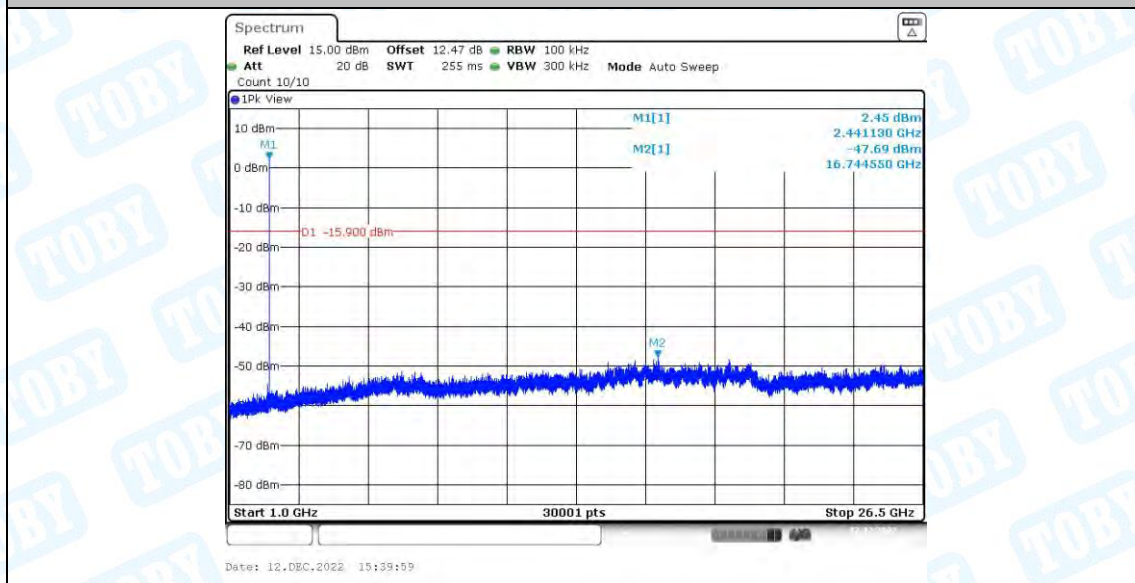
2DH5_Ant1_2441_0~Reference



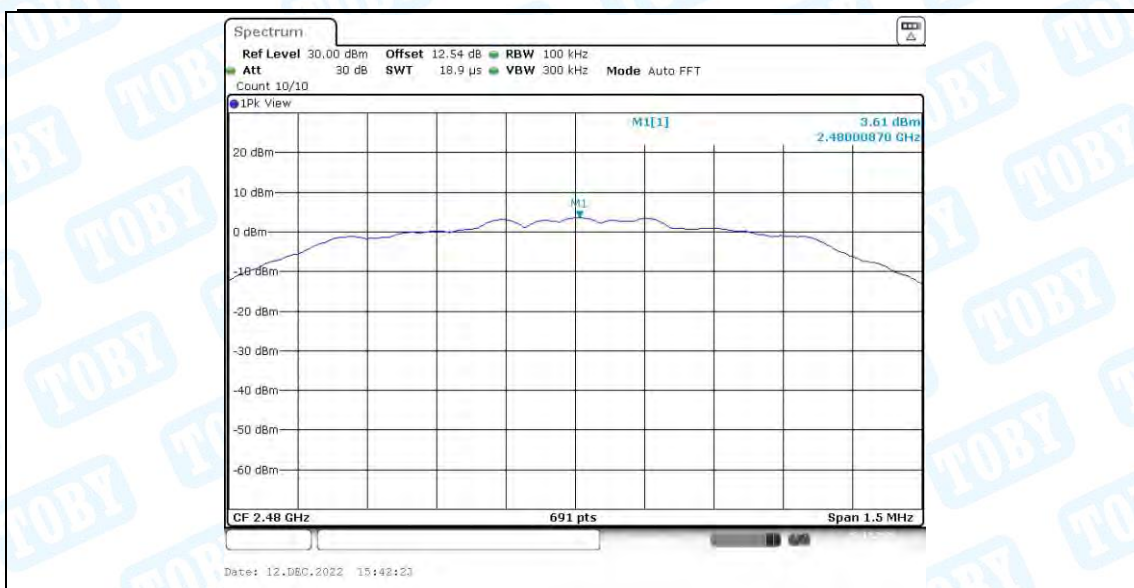
2DH5_Ant1_2441_30~1000



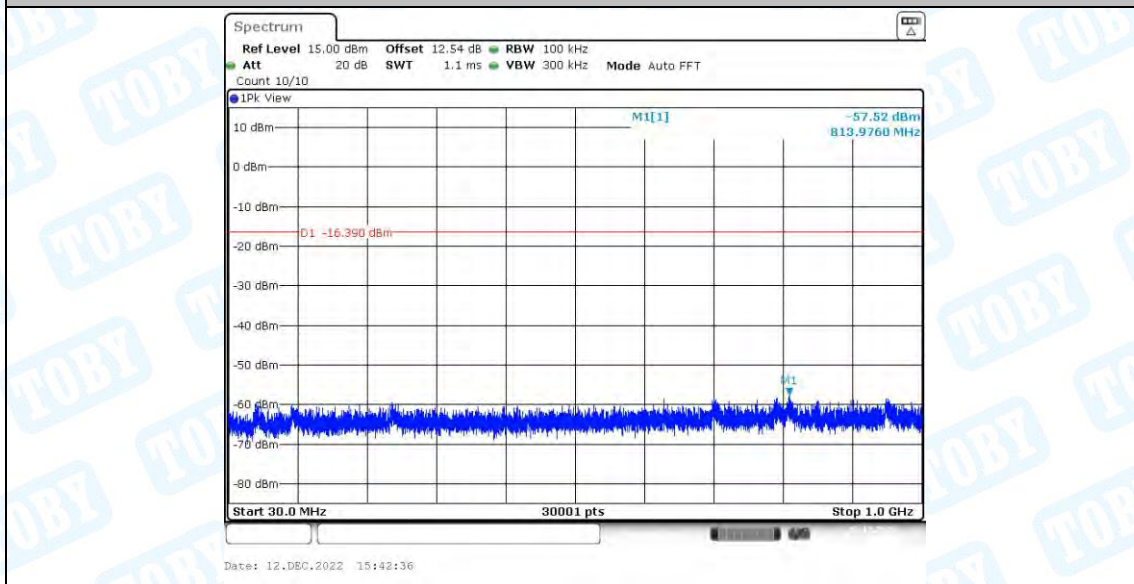
2DH5_Ant1_2441_1000~26500



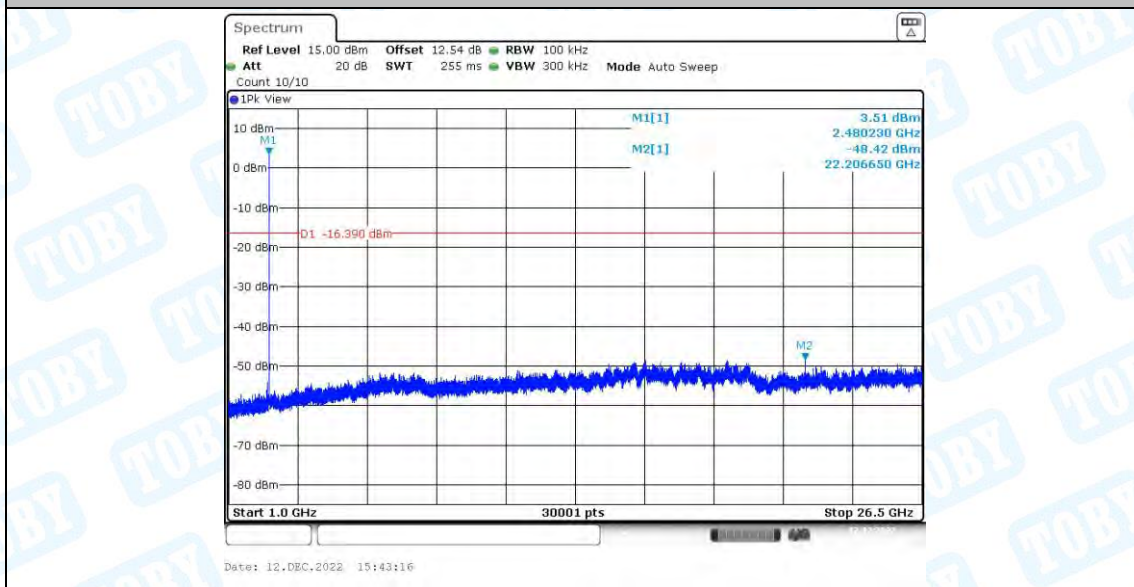
2DH5_Ant1_2480_0~Reference



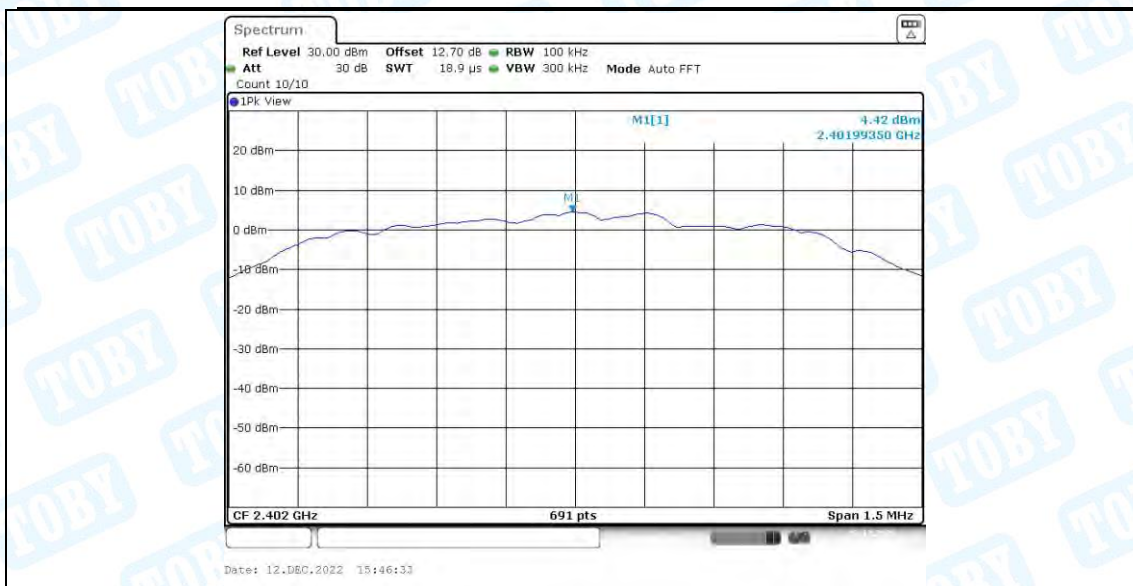
2DH5_Ant1_2480_30~1000



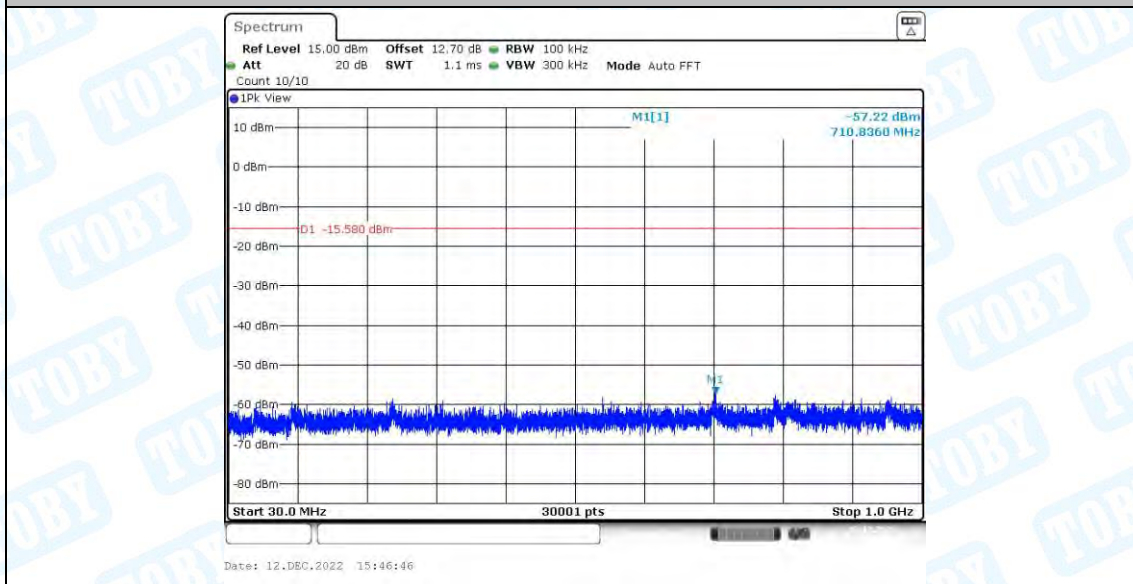
2DH5_Ant1_2480_1000~26500



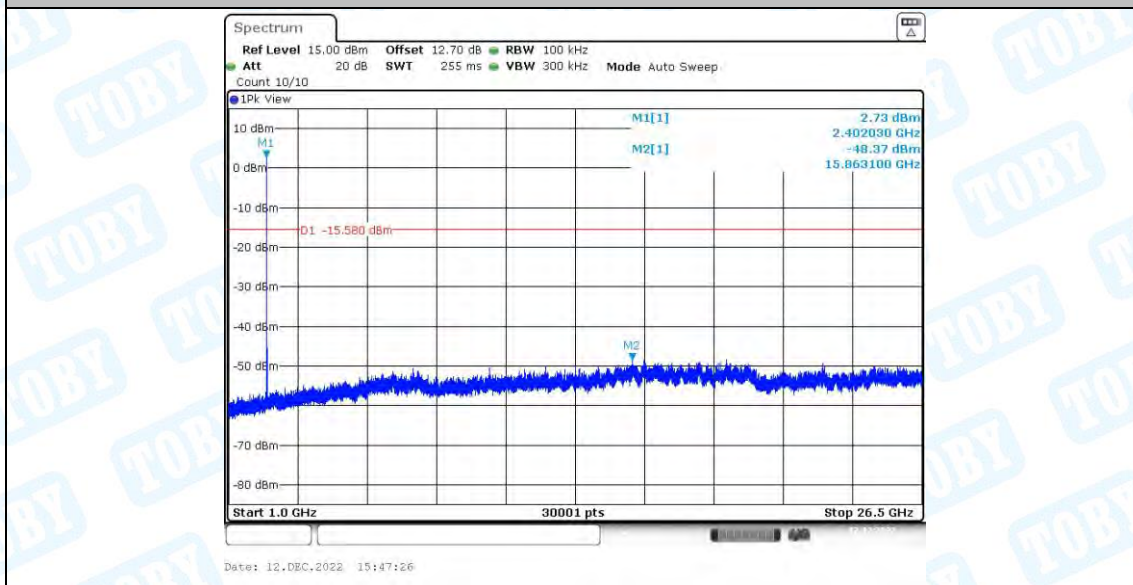
3DH5_Ant1_2402_0~Reference



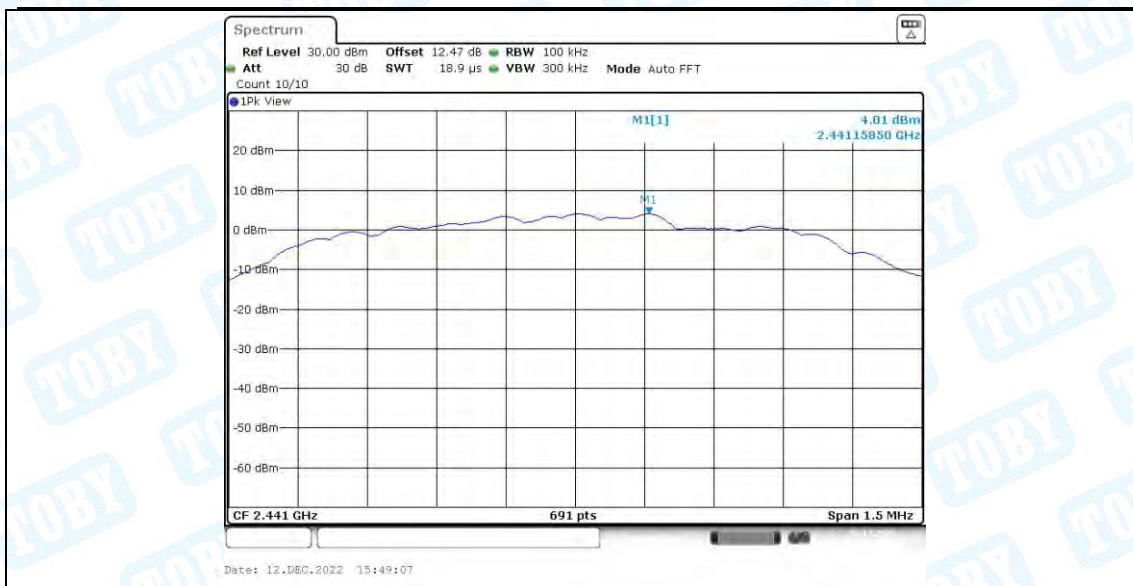
3DH5_Ant1_2402_30~1000



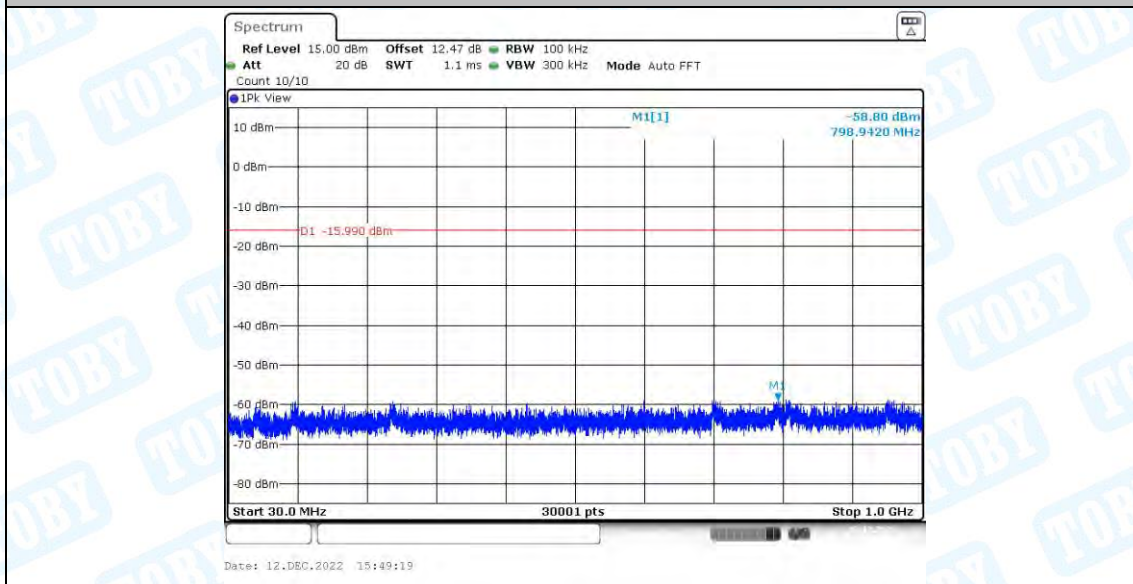
3DH5_Ant1_2402_1000~26500



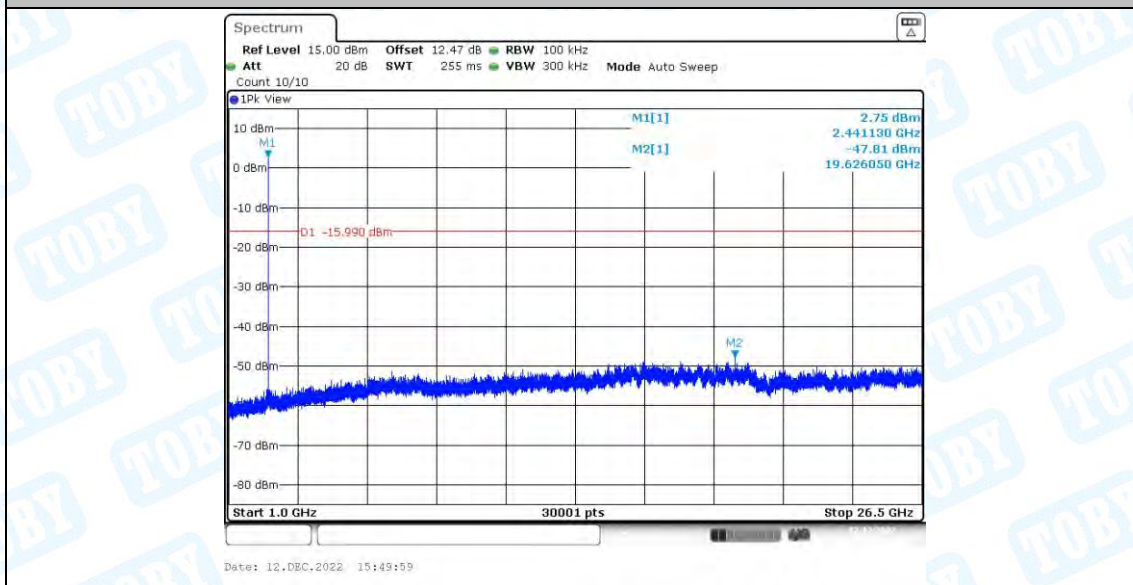
3DH5_Ant1_2441_0~Reference



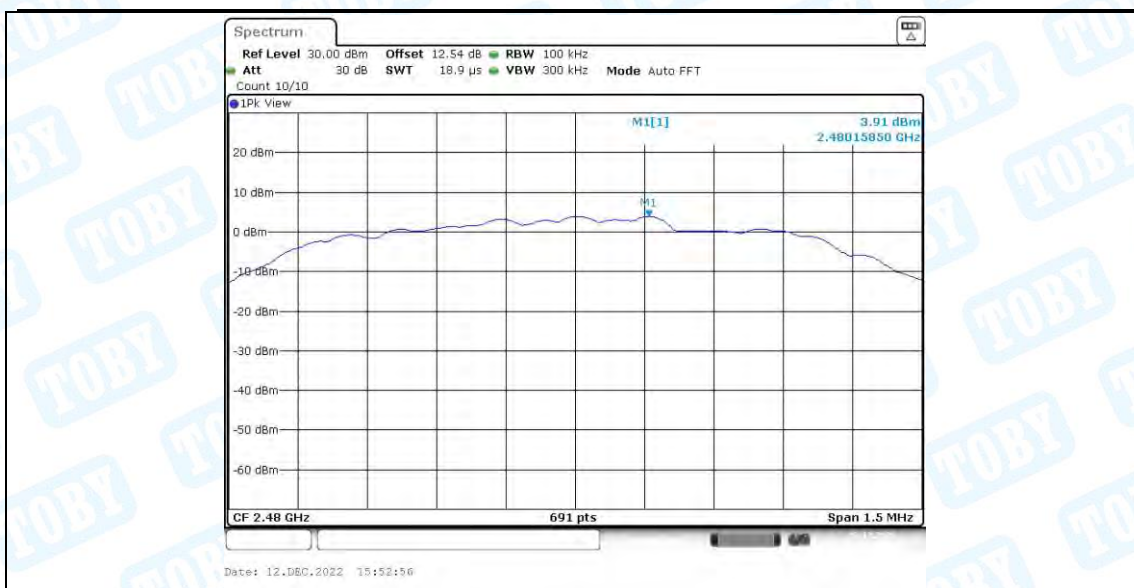
3DH5_Ant1_2441_30~1000



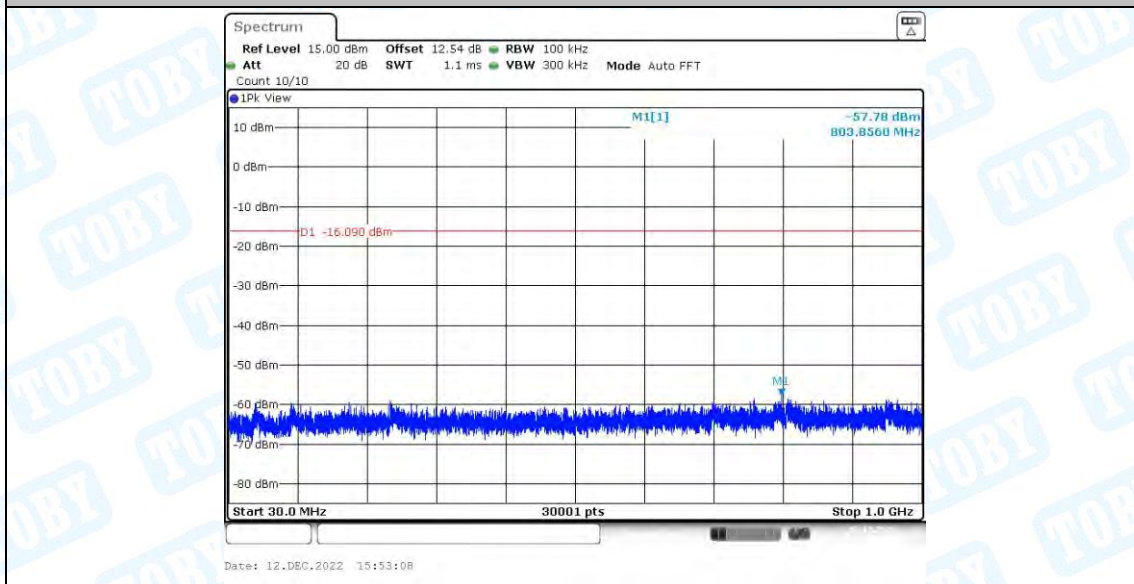
3DH5_Ant1_2441_1000~26500



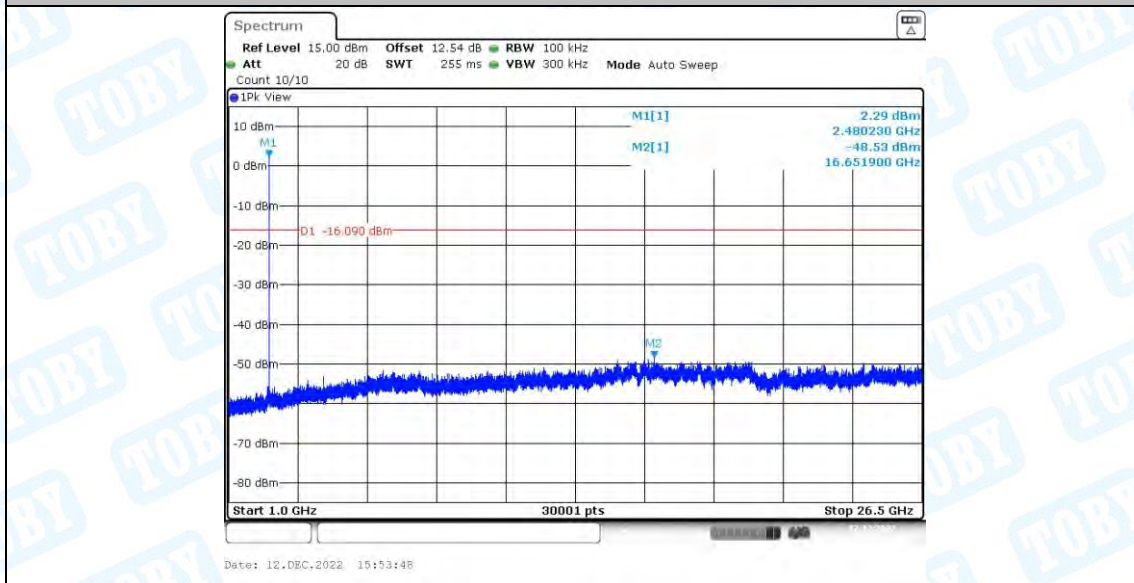
3DH5_Ant1_2480_0~Reference



3DH5_Ant1_2480_30~1000



3DH5_Ant1_2480_1000~26500

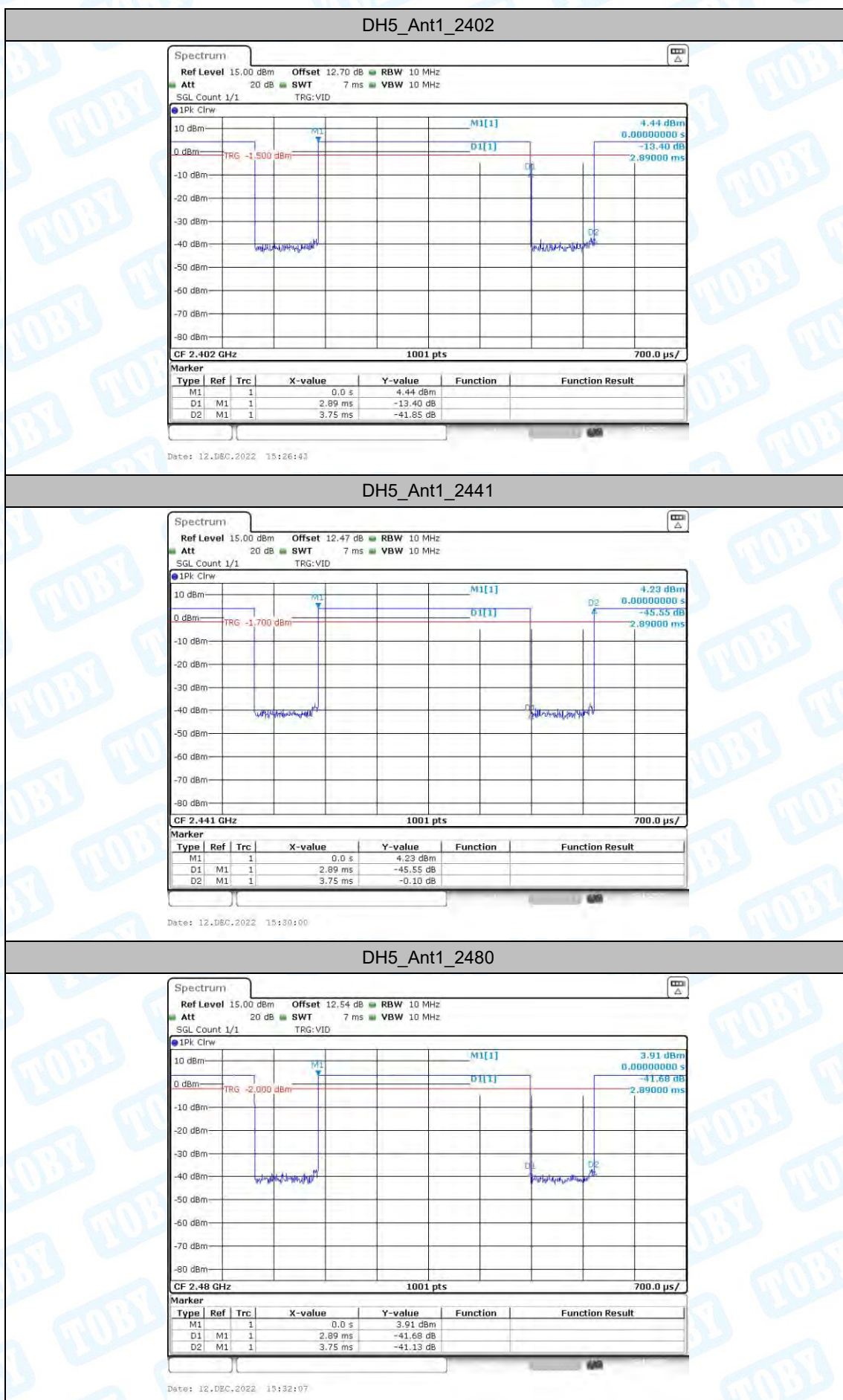


9. Duty Cycle

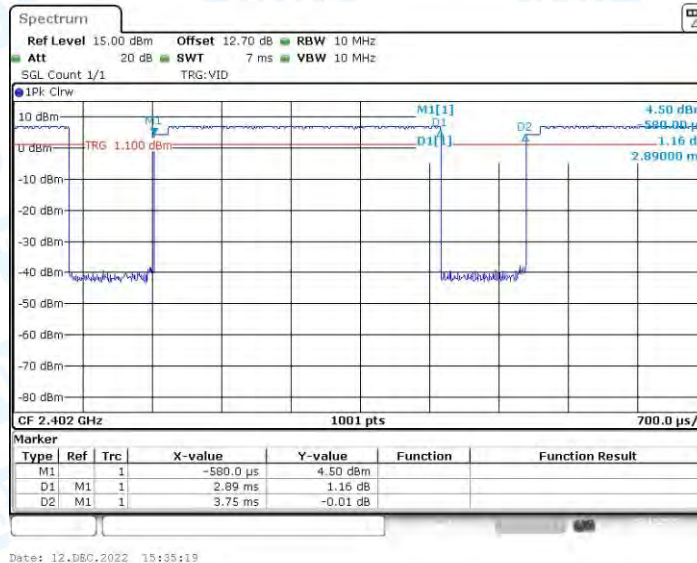
9.1. Test Result

TestMode	Antenna	Channel	Transmission Duration [ms]	Transmission Period [ms]	Duty Cycle [%]	1/T [kHz]	Limit	Verdict
DH5	Ant1	2402	2.89	3.75	77.07	0.346	---	---
		2441	2.89	3.75	77.07	0.346	---	---
		2480	2.89	3.75	77.07	0.346	---	---
2DH5	Ant1	2402	2.89	3.75	77.07	0.346	---	---
		2441	2.89	3.75	77.07	0.346	---	---
		2480	2.89	3.76	76.86	0.346	---	---
3DH5	Ant1	2402	2.89	3.75	77.07	0.346	---	---
		2441	2.89	3.75	77.07	0.346	---	---
		2480	2.89	3.75	77.07	0.346	---	---

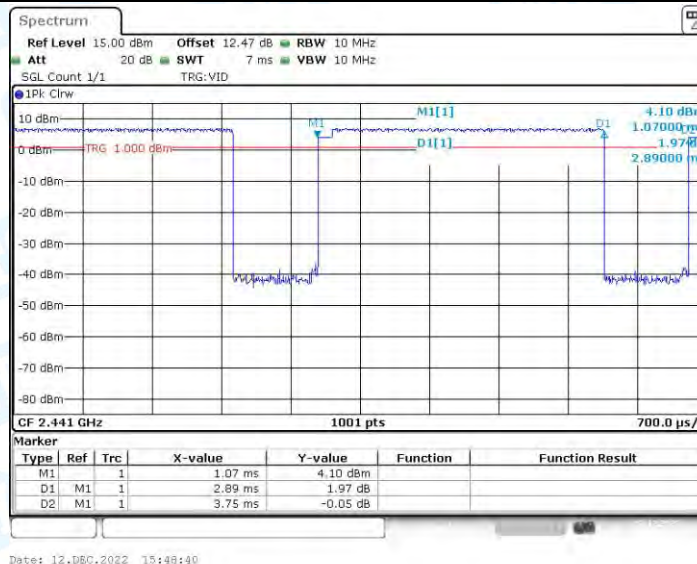
9.2. Test Graphs



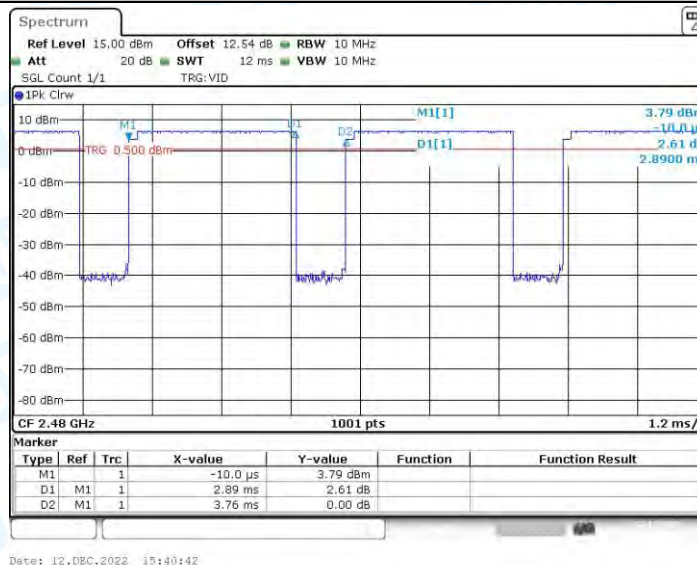
2DH5_Ant1_2402



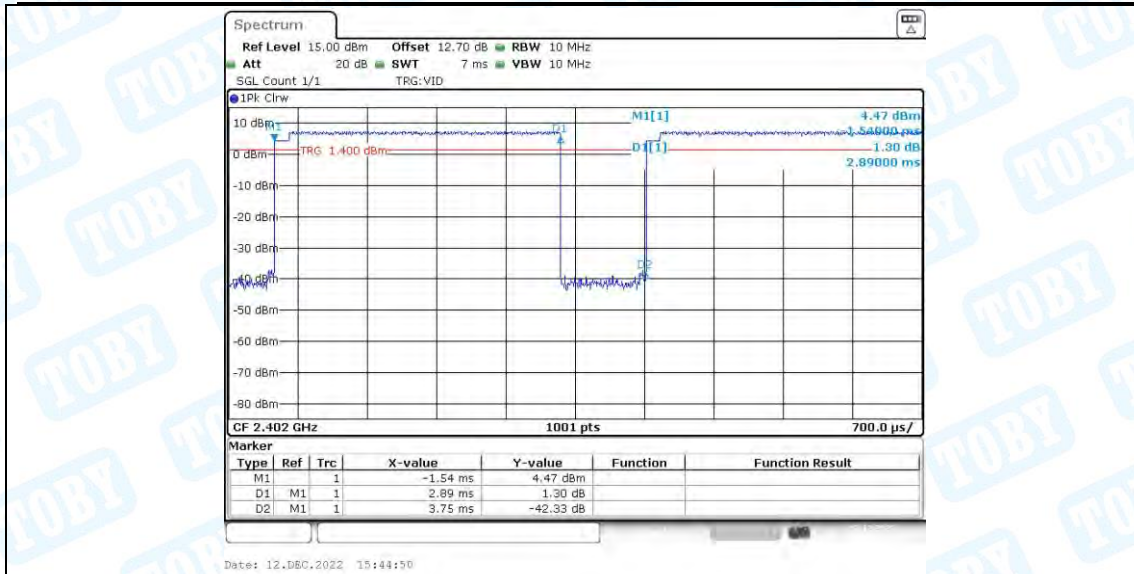
2DH5_Ant1_2441



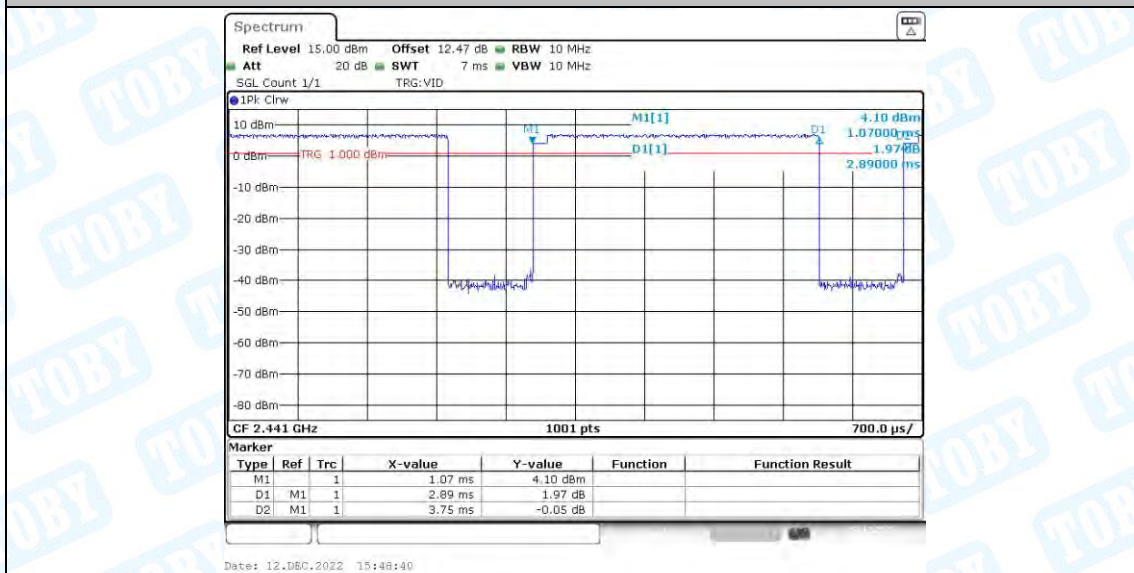
2DH5_Ant1_2480



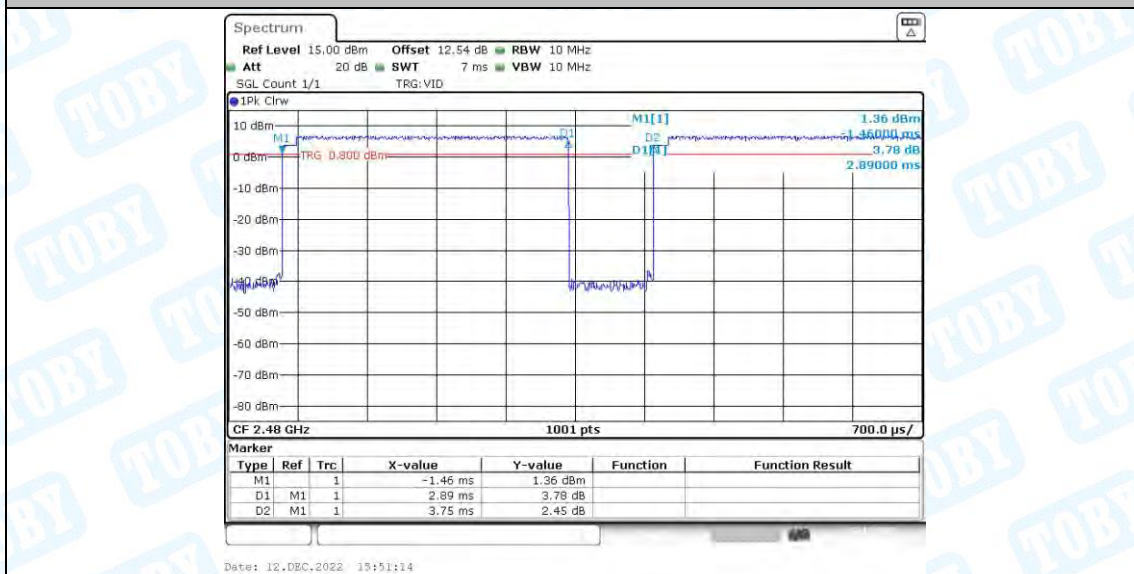
3DH5_Ant1_2402



3DH5_Ant1_2441



3DH5_Ant1_2480



10. Emissions in Restricted Bands

10.1. Test Result

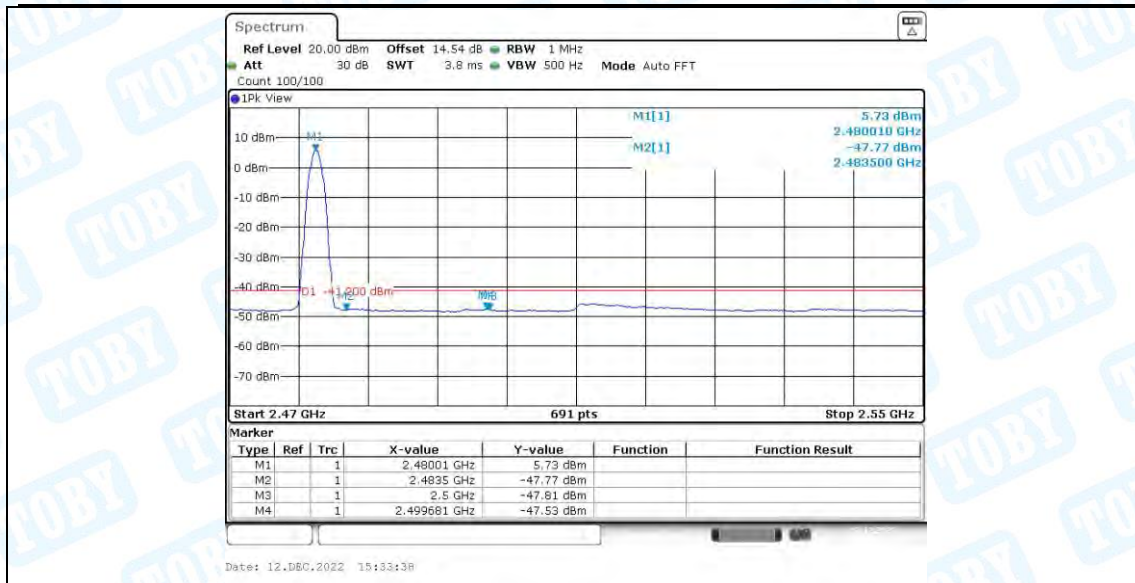
TestMode	Antenna	ChName	Channel	Detector	Freq. [MHz]	Result [dBm]	Limit [dBm]	Verdict
DH5	Ant1	Low	2402	AV	2310.000	-48.99	≤-41.20	PASS
				AV	2341.848	-46.38	≤-41.20	PASS
				AV	2390.000	-48.55	≤-41.20	PASS
				Peak	2310.000	-36.76	≤-21.20	PASS
				Peak	2343.065	-34.68	≤-21.20	PASS
				Peak	2390.000	-37.68	≤-21.20	PASS
		High	2480	AV	2483.500	-47.77	≤-41.20	PASS
				AV	2499.681	-47.53	≤-41.20	PASS
				AV	2500.000	-47.81	≤-41.20	PASS
				Peak	2483.500	-38.18	≤-21.20	PASS
				Peak	2498.638	-34.94	≤-21.20	PASS
				Peak	2500.000	-35.55	≤-21.20	PASS
2DH5	Ant1	Low	2402	AV	2310.000	-48.76	≤-41.20	PASS
				AV	2340.935	-46.25	≤-41.20	PASS
				AV	2390.000	-48.71	≤-41.20	PASS
				Peak	2310.000	-36.87	≤-21.20	PASS
				Peak	2325.565	-35.41	≤-21.20	PASS
				Peak	2390.000	-37.78	≤-21.20	PASS
		High	2480	AV	2483.500	-47.3	≤-41.20	PASS
				AV	2484.145	-46.99	≤-41.20	PASS
				AV	2500.000	-47.97	≤-41.20	PASS
				Peak	2483.500	-38.23	≤-21.20	PASS
				Peak	2489.826	-35.52	≤-21.20	PASS
				Peak	2500.000	-38.15	≤-21.20	PASS
3DH5	Ant1	Low	2402	AV	2310.000	-48.79	≤-41.20	PASS
				AV	2341.543	-46.36	≤-41.20	PASS
				AV	2390.000	-48.66	≤-41.20	PASS
				Peak	2310.000	-38.61	≤-21.20	PASS
				Peak	2340.022	-34.73	≤-21.20	PASS
				Peak	2390.000	-37.2	≤-21.20	PASS
		High	2480	AV	2483.500	-47.29	≤-41.20	PASS
				AV	2484.029	-46.94	≤-41.20	PASS
				AV	2500.000	-47.72	≤-41.20	PASS
				Peak	2483.500	-38.79	≤-21.20	PASS
				Peak	2484.493	-35.66	≤-21.20	PASS
				Peak	2500.000	-37.02	≤-21.20	PASS

Note:

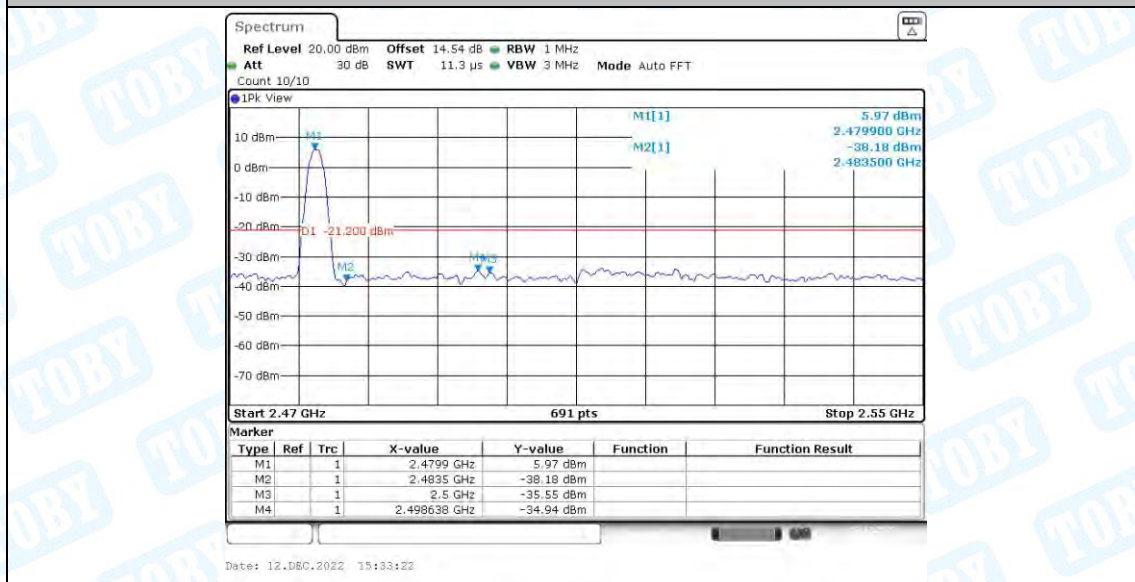
- The Antenna Gain is compensated in the graph.
- The limit in dBm for average detector is conversion from 54dBuV/m, according to 15.209(a). The limit in dBm for peak detector is 20dB above the limit of average detector in dBm.

10.2. Test Graphs

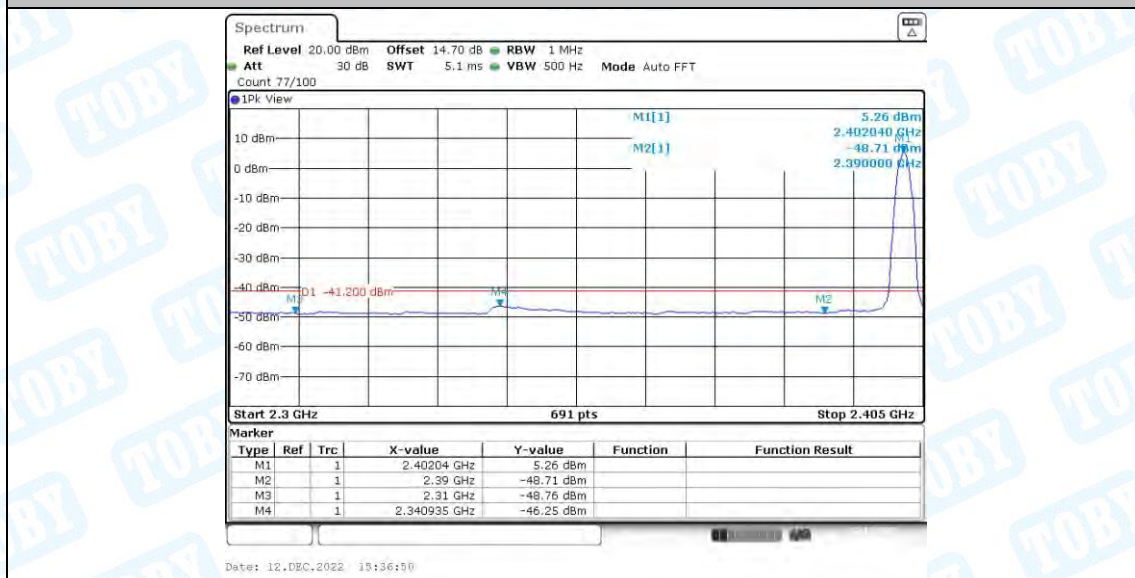




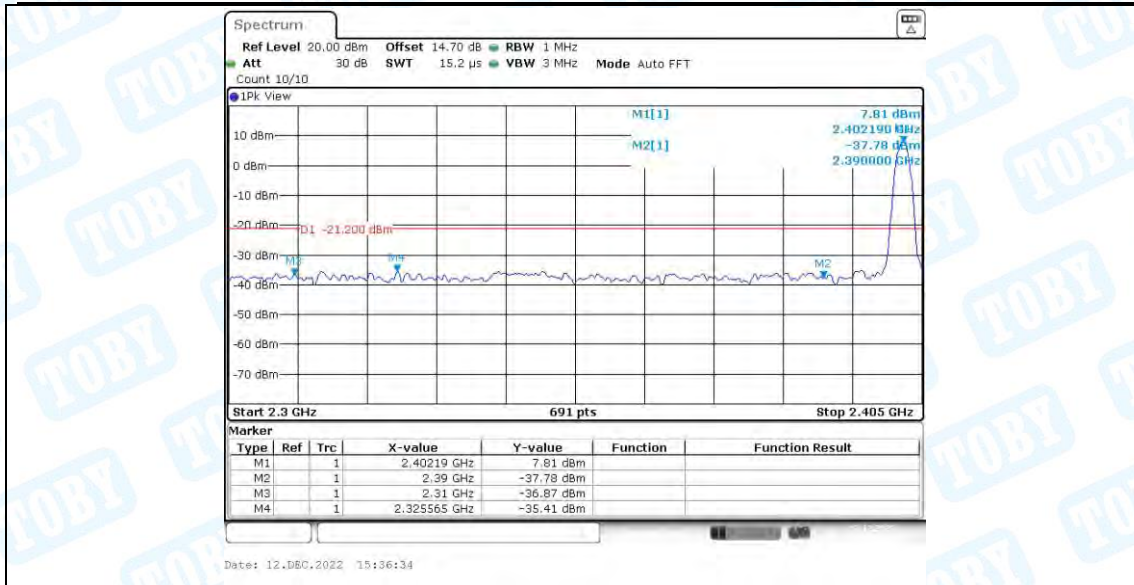
DH5_Ant1_High_2480_Peak



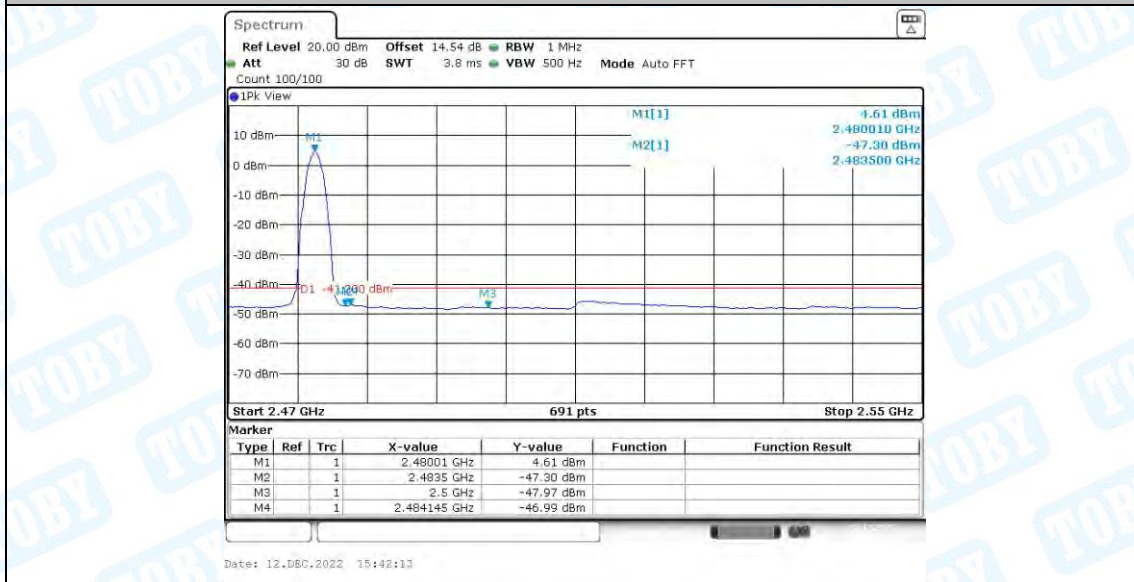
2DH5_Ant1_Low_2402_AV



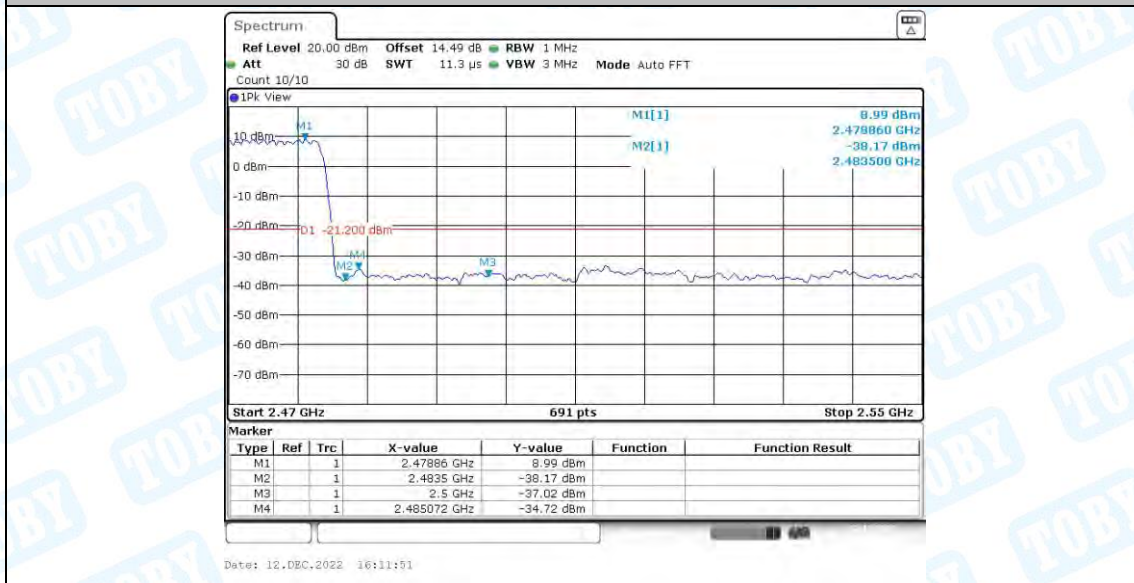
2DH5_Ant1_Low_2402_Peak



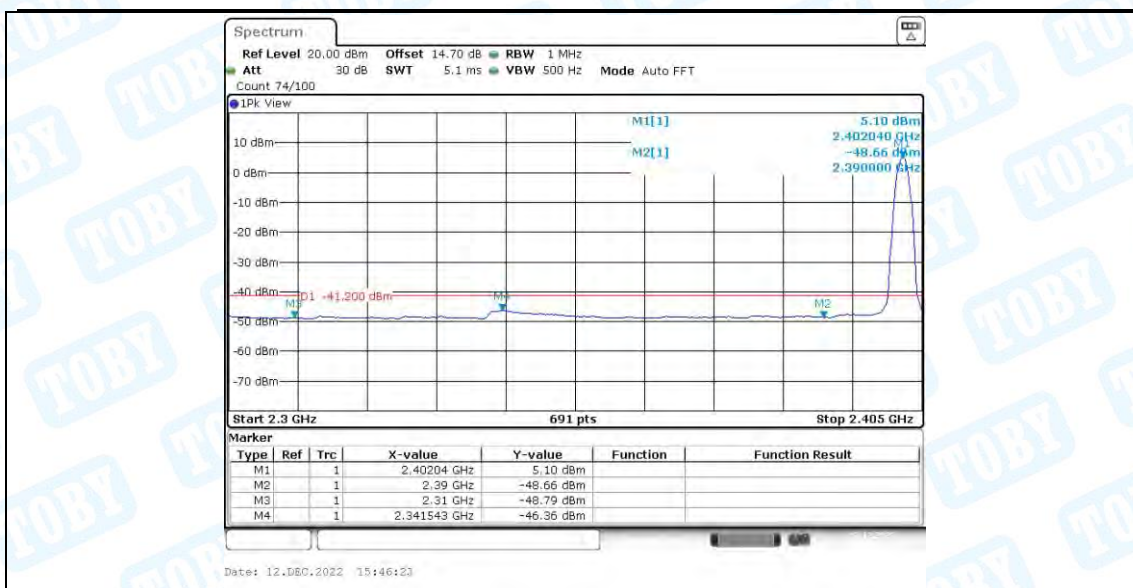
2DH5_Ant1_High_2480_AV



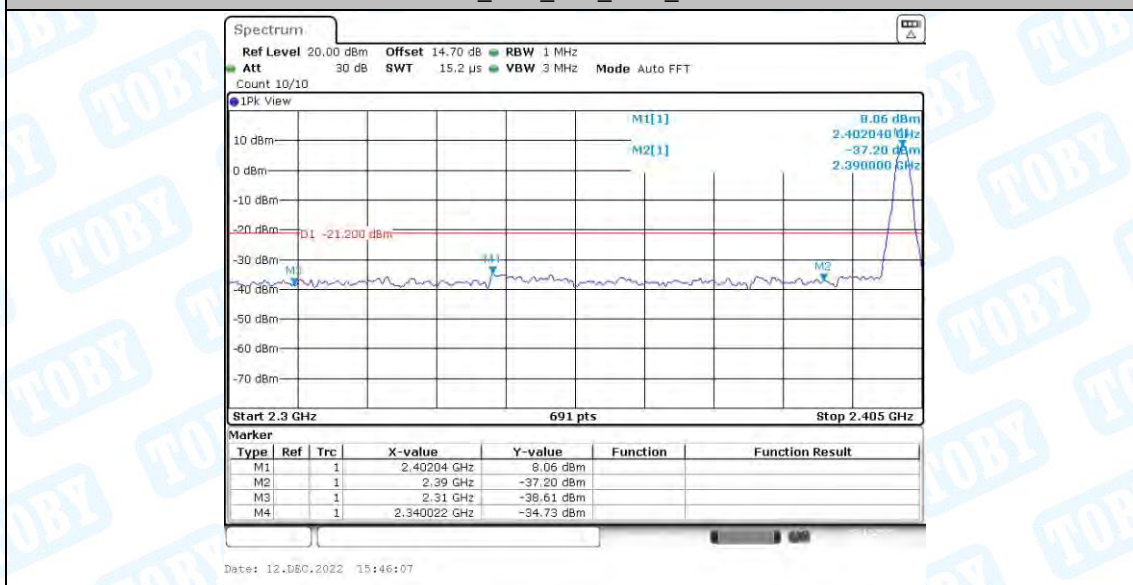
2DH5_Ant1_High_Hop_2480_Peak



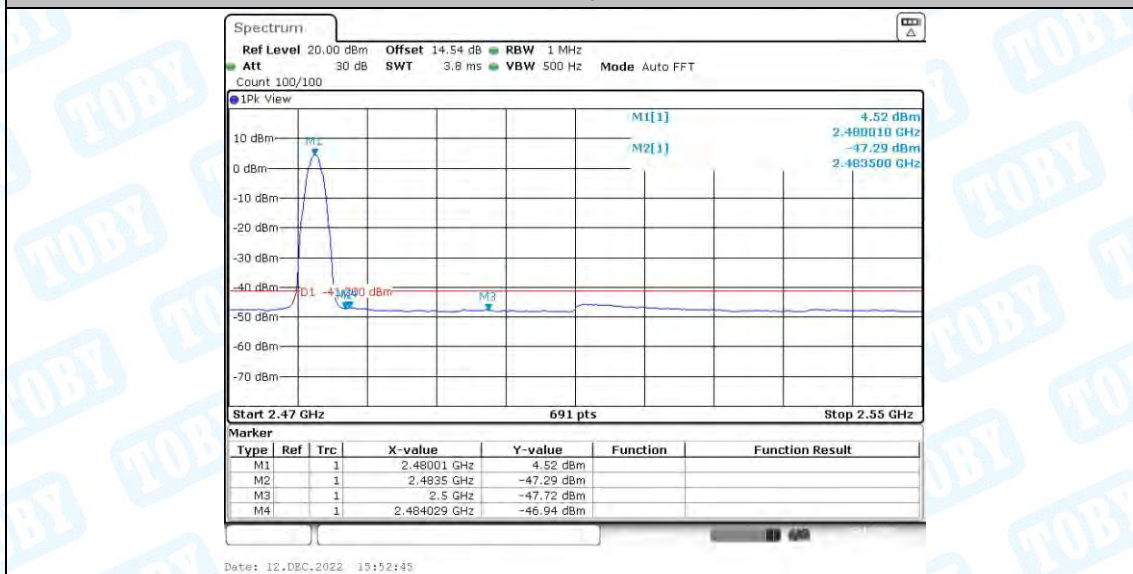
3DH5_Ant1_Low_2402_AV



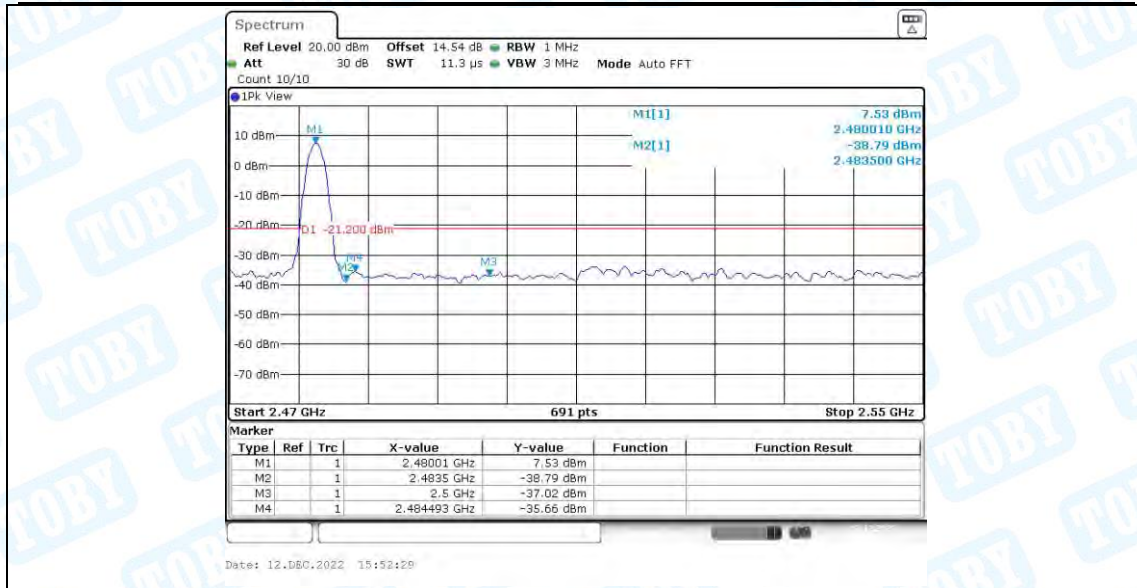
3DH5_Ant1_Low_2402_Peak



3DH5_Ant1_High_2480_AV



3DH5_Ant1_High_2480_Peak



-----End of the report-----