

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

General Description of EUT	
Product Name:	Wi-Fi BT Module
Test Model:	CDW-N37663U-02
Sample ID:	HC-C-202403-0360-02-01
Environmental Conditions	
Temperature:	23.6℃
Relative Humidity:	48%
Test Voltage:	DC 3.3V
Test Engineer:	Mike Yan
Note: For a more detailed features description, please refer to the report TBR-C-202403-0360-71.	

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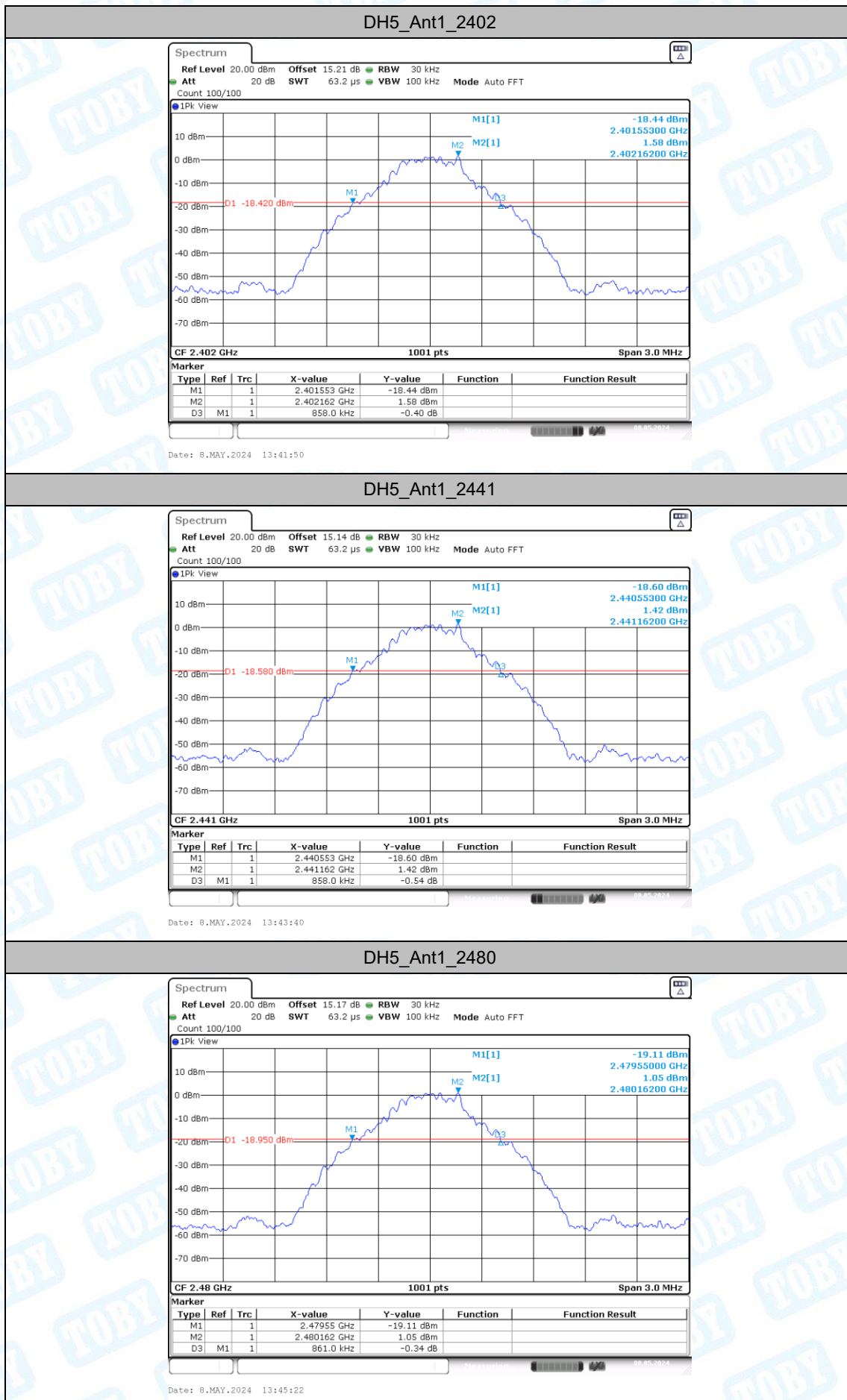
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1. 20dB Emission Bandwidth

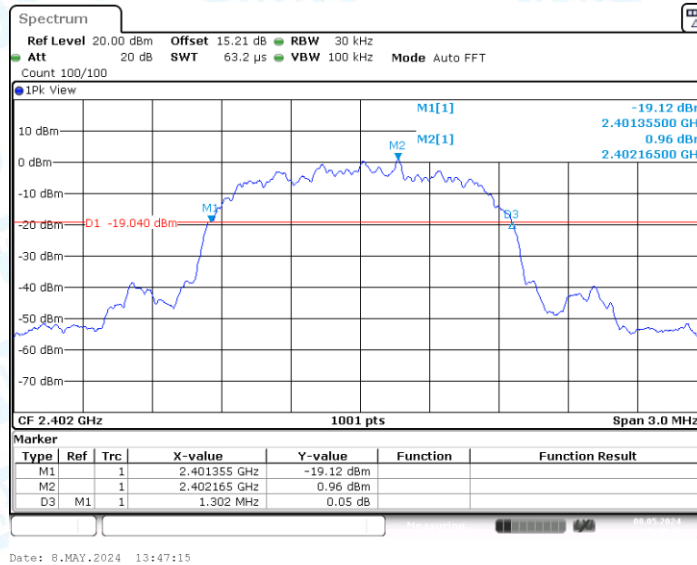
1.1. Test Result

TestMode	Antenna	Channel	20db EBW[MHz]	Limit[MHz]	Verdict
DH5	Ant1	2402	0.86	---	---
		2441	0.86	---	---
		2480	0.86	---	---
2DH5	Ant1	2402	1.30	---	---
		2441	1.32	---	---
		2480	1.32	---	---
3DH5	Ant1	2402	1.30	---	---
		2441	1.30	---	---
		2480	1.30	---	---

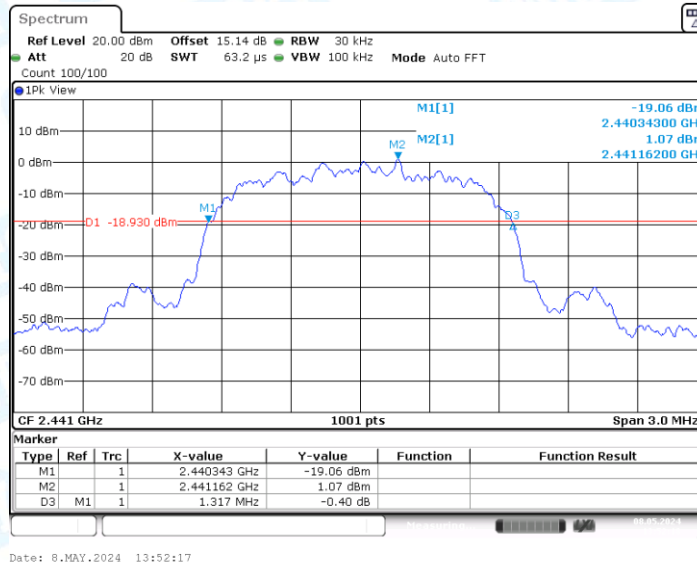
1.2. Test Graphs



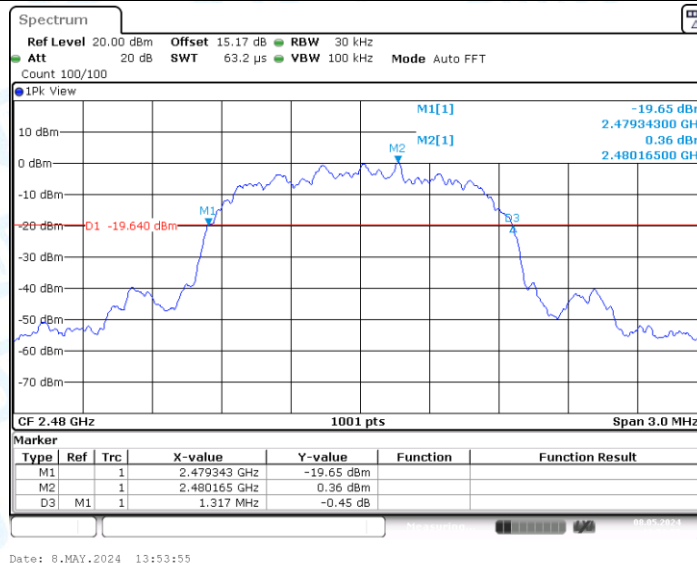
2DH5_Ant1_2402



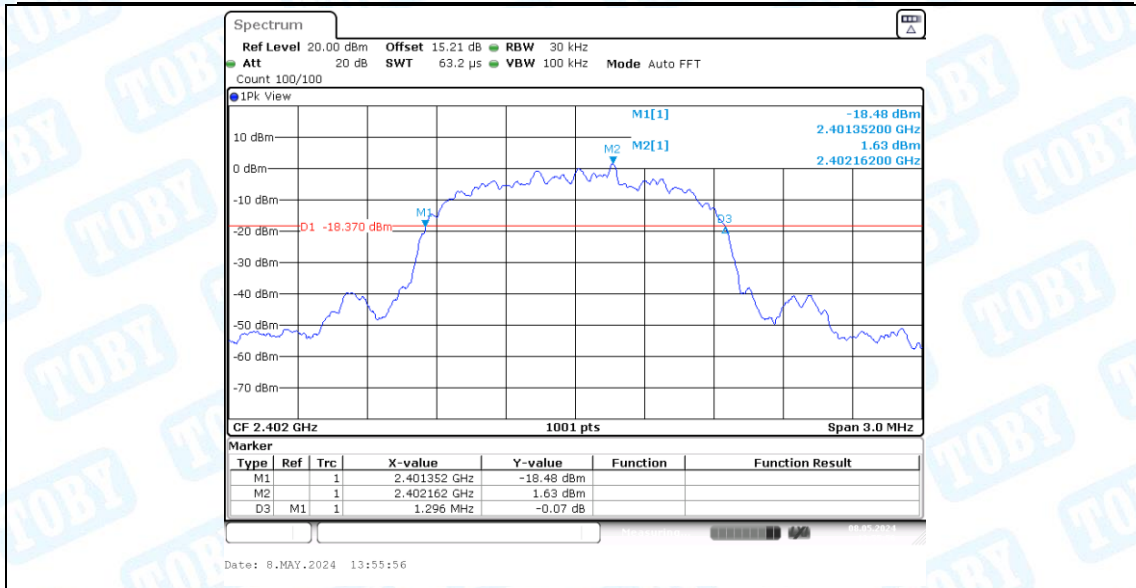
2DH5_Ant1_2441



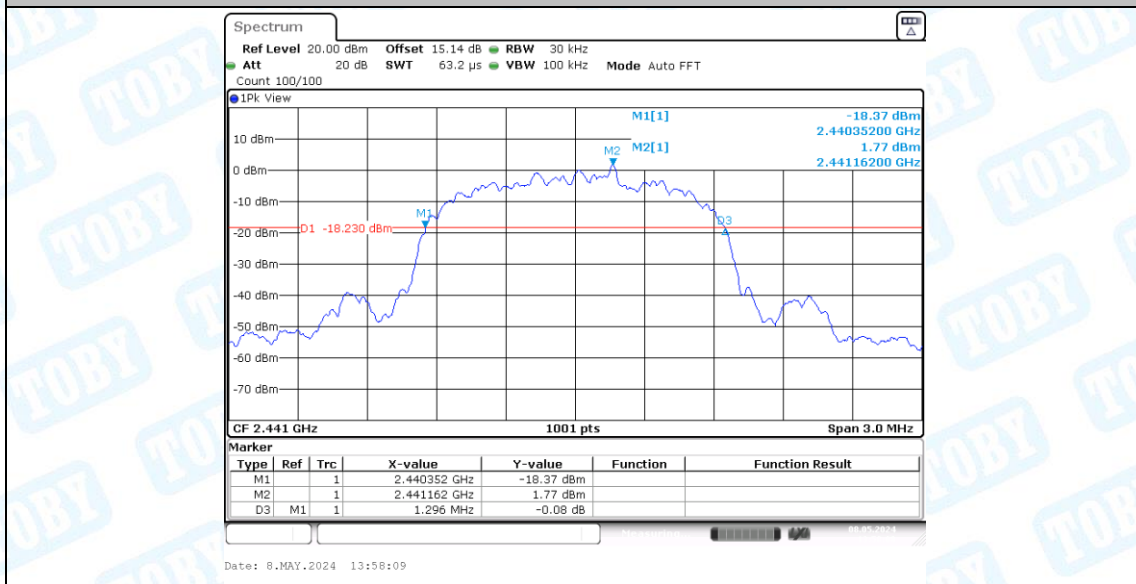
2DH5_Ant1_2480



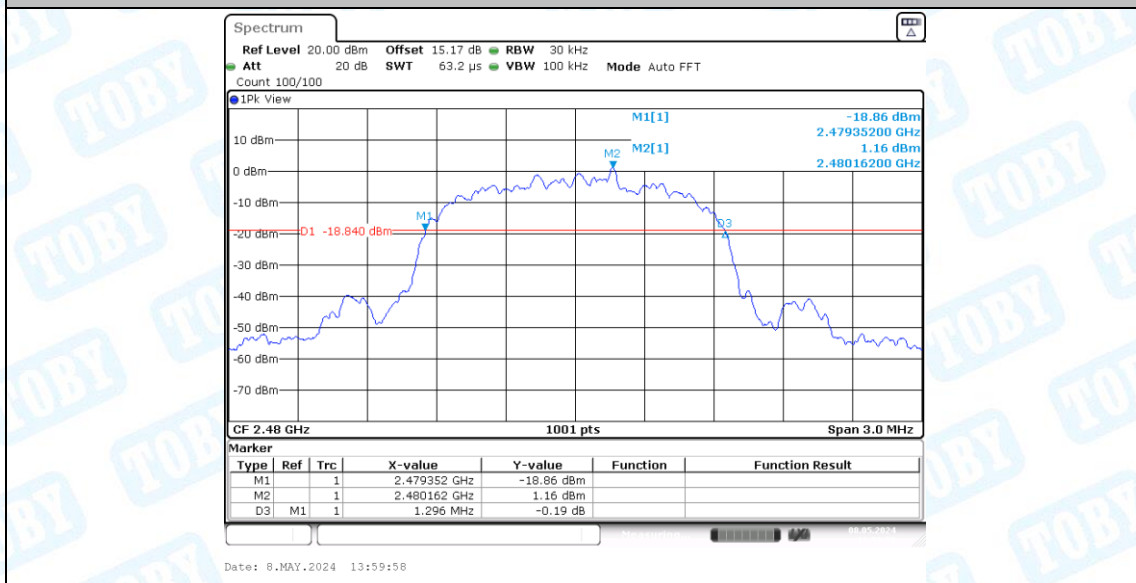
3DH5_Ant1_2402



3DH5_Ant1_2441



3DH5_Ant1_2480



2. Occupied Channel Bandwidth

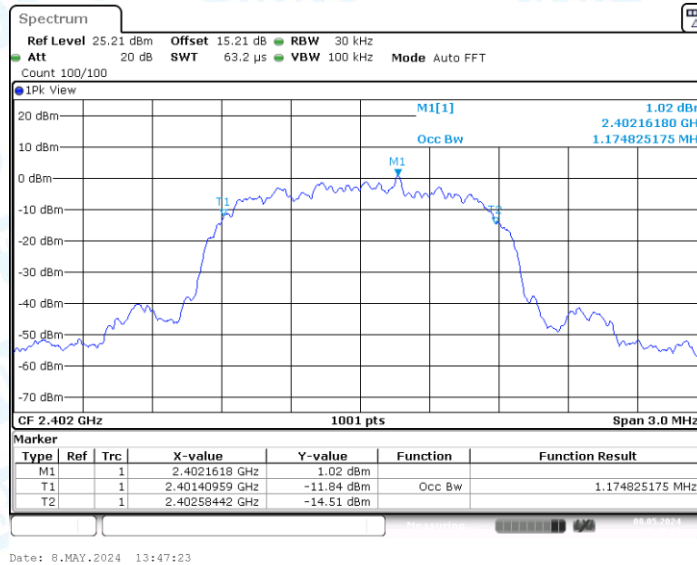
2.1. Test Result

TestMode	Antenna	Channel	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
DH5	Ant1	2402	0.755	2401.6254	2402.3806	---	---
		2441	0.755	2440.6254	2441.3806	---	---
		2480	0.752	2479.6254	2480.3776	---	---
2DH5	Ant1	2402	1.175	2401.4096	2402.5844	---	---
		2441	1.175	2440.4096	2441.5844	---	---
		2480	1.175	2479.4096	2480.5844	---	---
3DH5	Ant1	2402	1.178	2401.4126	2402.5904	---	---
		2441	1.178	2440.4126	2441.5904	---	---
		2480	1.178	2479.4126	2480.5904	---	---

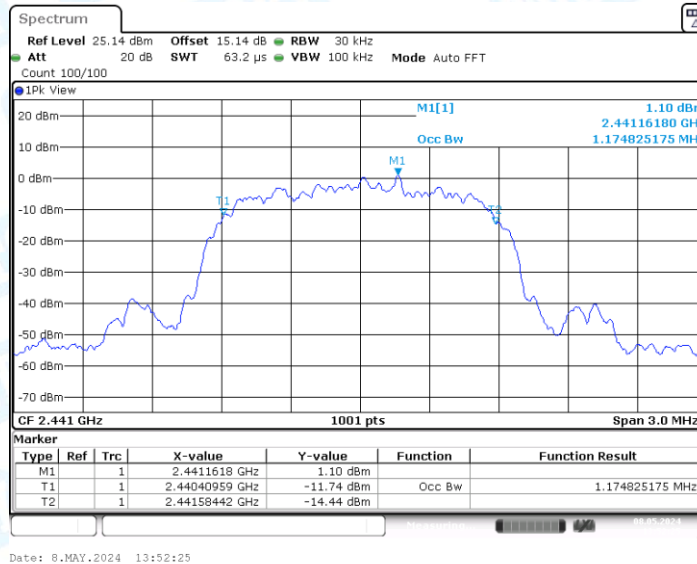
2.2. Test Graphs



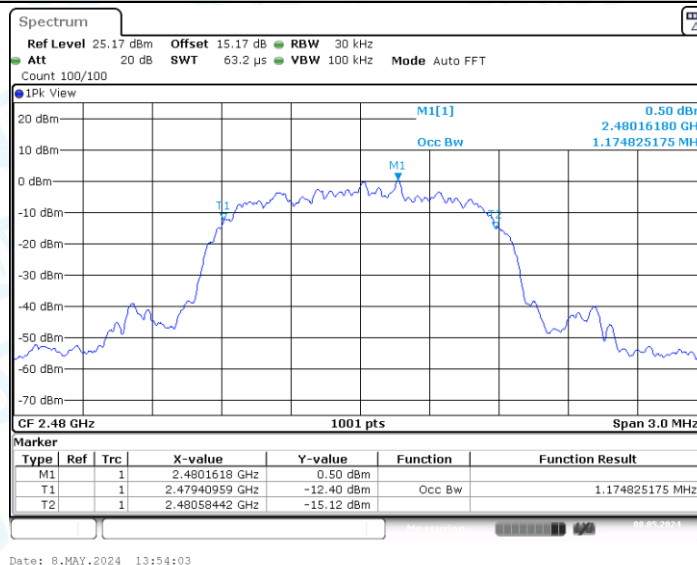
2DH5_Ant1_2402



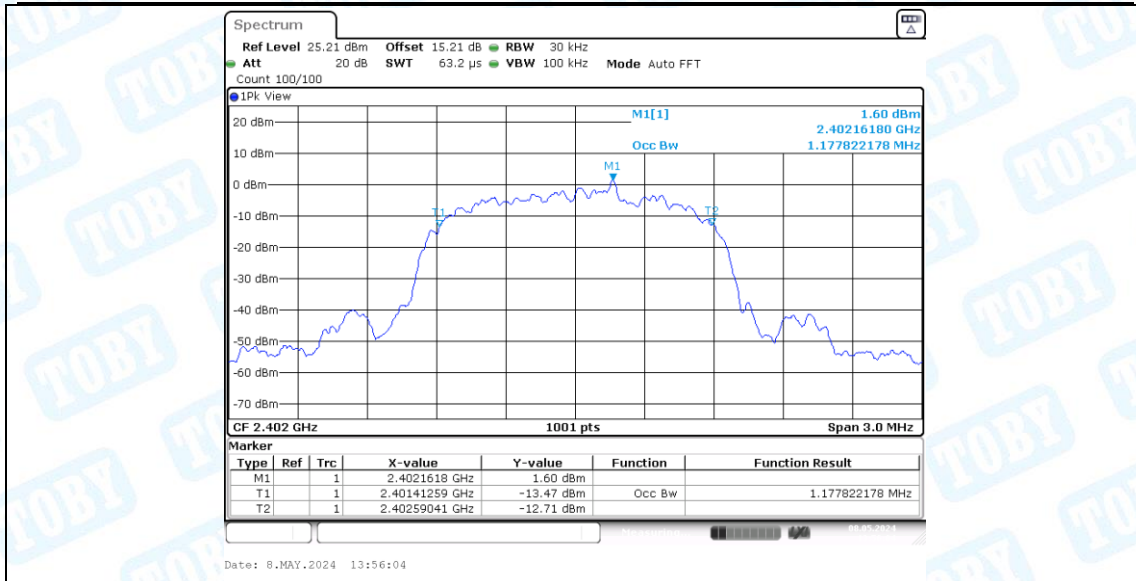
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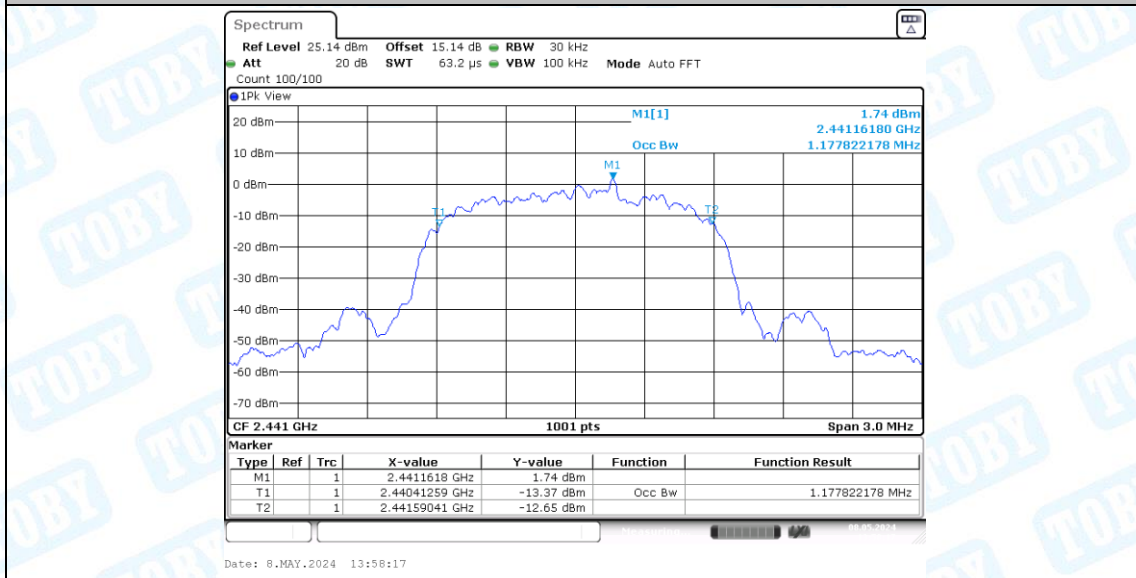
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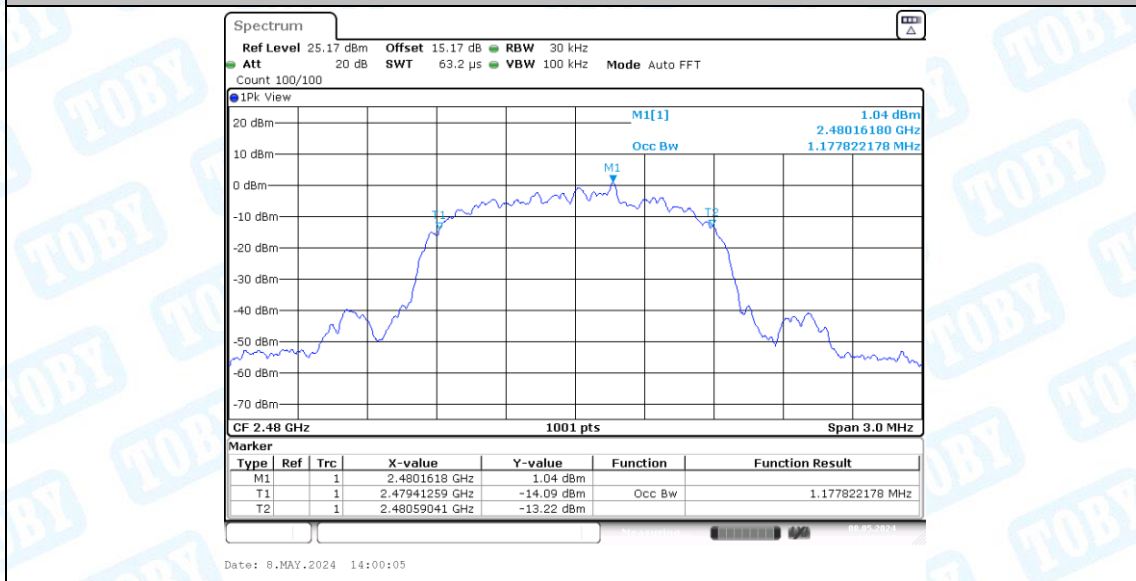
3DH5_Ant1_2402



3DH5_Ant1_2441



3DH5_Ant1_2480



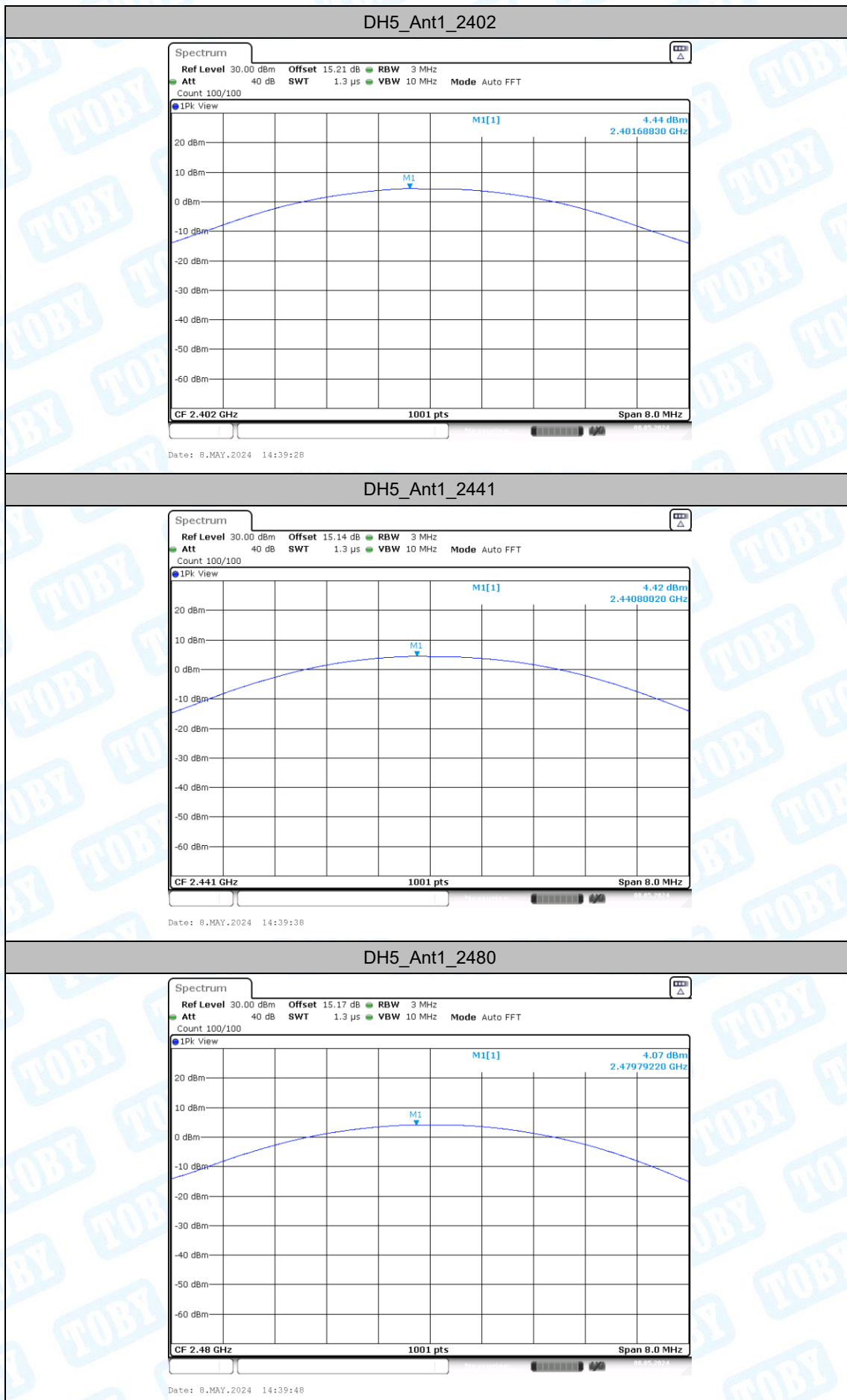
3. Maximum Peak conducted output power

3.1. Test Result

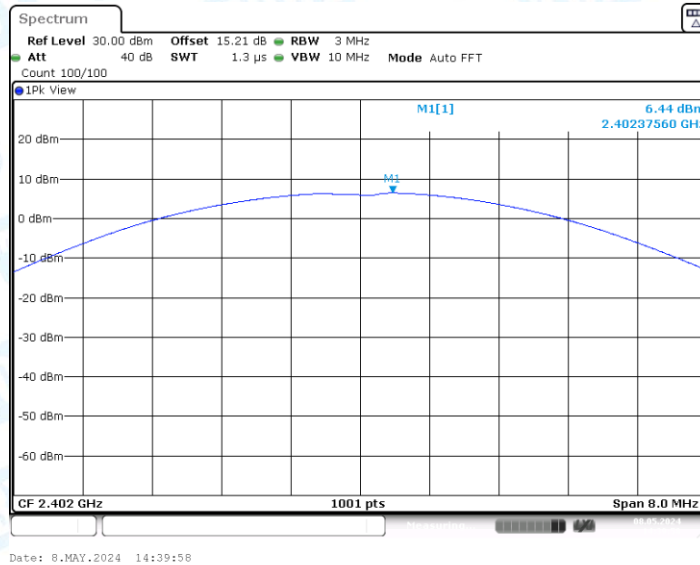
TestMode	Antenna	Channel	Result[dBm]	Limit[dBm]	Gain [dBm]	EIRP [dBm]	EIRP Limit[dBm]	Verdict
DH5	Ant1	2402	4.44	≤21	4.70	9.14	≤36	PASS
		2441	4.42	≤21	4.70	9.12	≤36	PASS
		2480	4.07	≤21	4.70	8.77	≤36	PASS
2DH5	Ant1	2402	6.44	≤21	4.70	11.14	≤36	PASS
		2441	6.57	≤21	4.70	11.27	≤36	PASS
		2480	6.07	≤21	4.70	10.77	≤36	PASS
3DH5	Ant1	2402	7.28	≤21	4.70	11.98	≤36	PASS
		2441	6.95	≤21	4.70	11.65	≤36	PASS
		2480	6.34	≤21	4.70	11.04	≤36	PASS

Note: This module will use two different BT antennas, and only the one with the larger antenna gain(4.70dBi) will be used for conducted test.

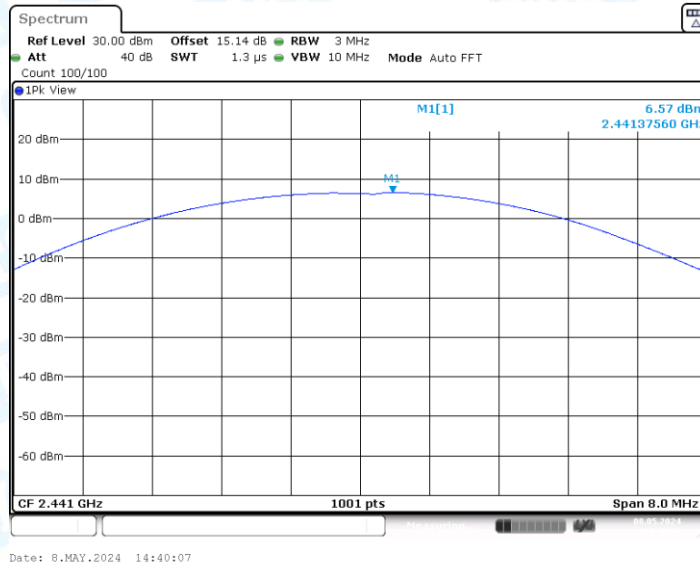
3.2.Test Graphs



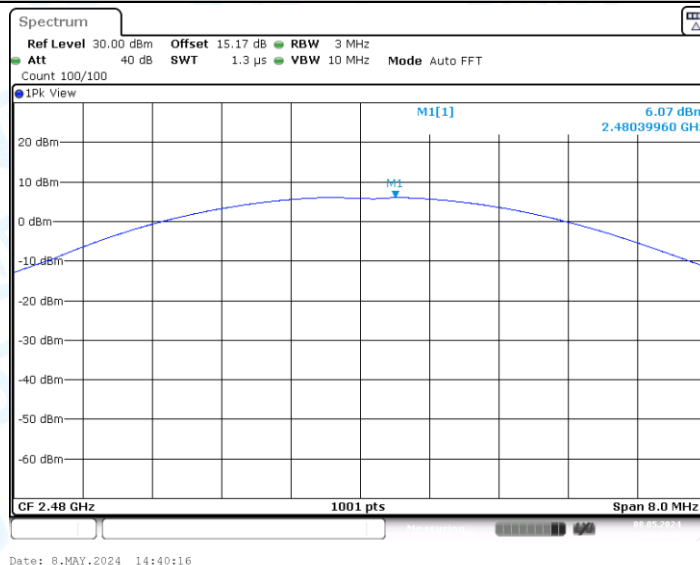
2DH5_Ant1_2402



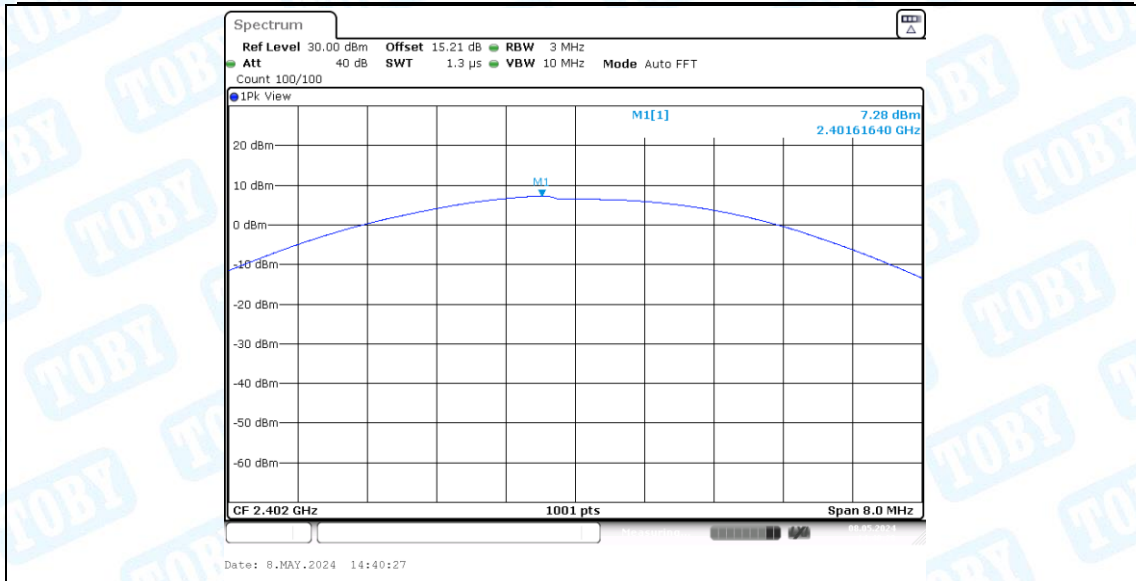
2DH5_Ant1_2441



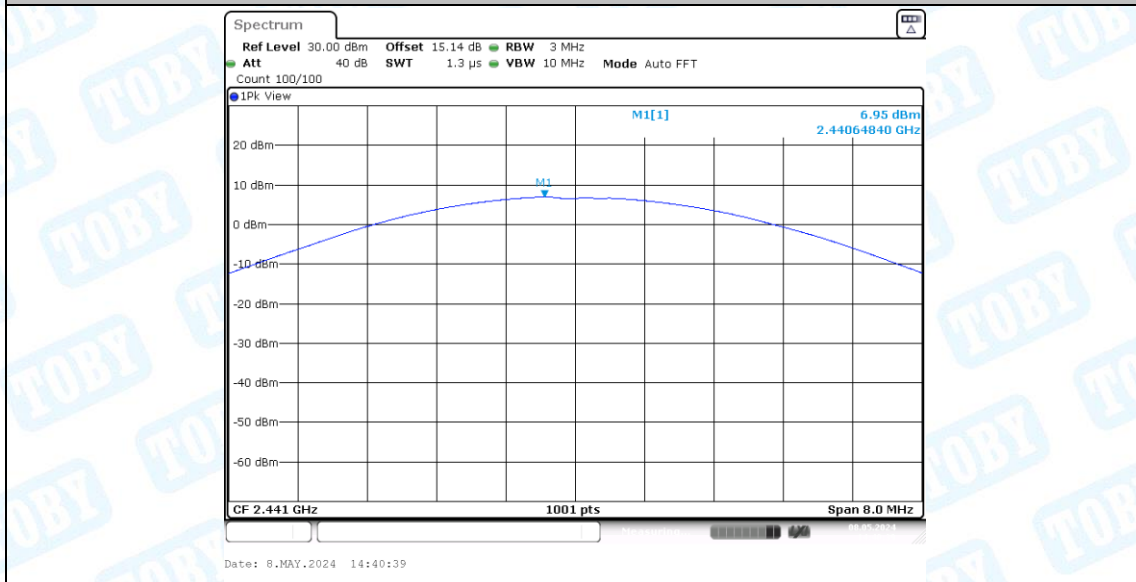
2DH5_Ant1_2480



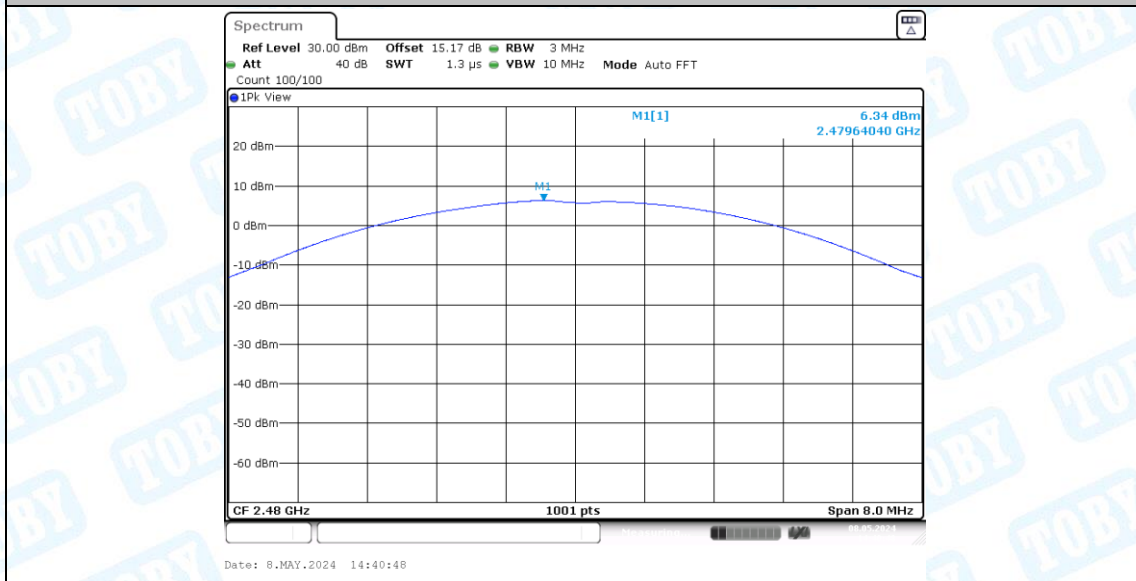
3DH5_Ant1_2402



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	1	≥ 0.860	PASS
2DH5	Ant1	Hop	1.049	≥ 0.880	PASS
3DH5	Ant1	Hop	1.351	≥ 1.300	PASS

4.2. Test Graphs

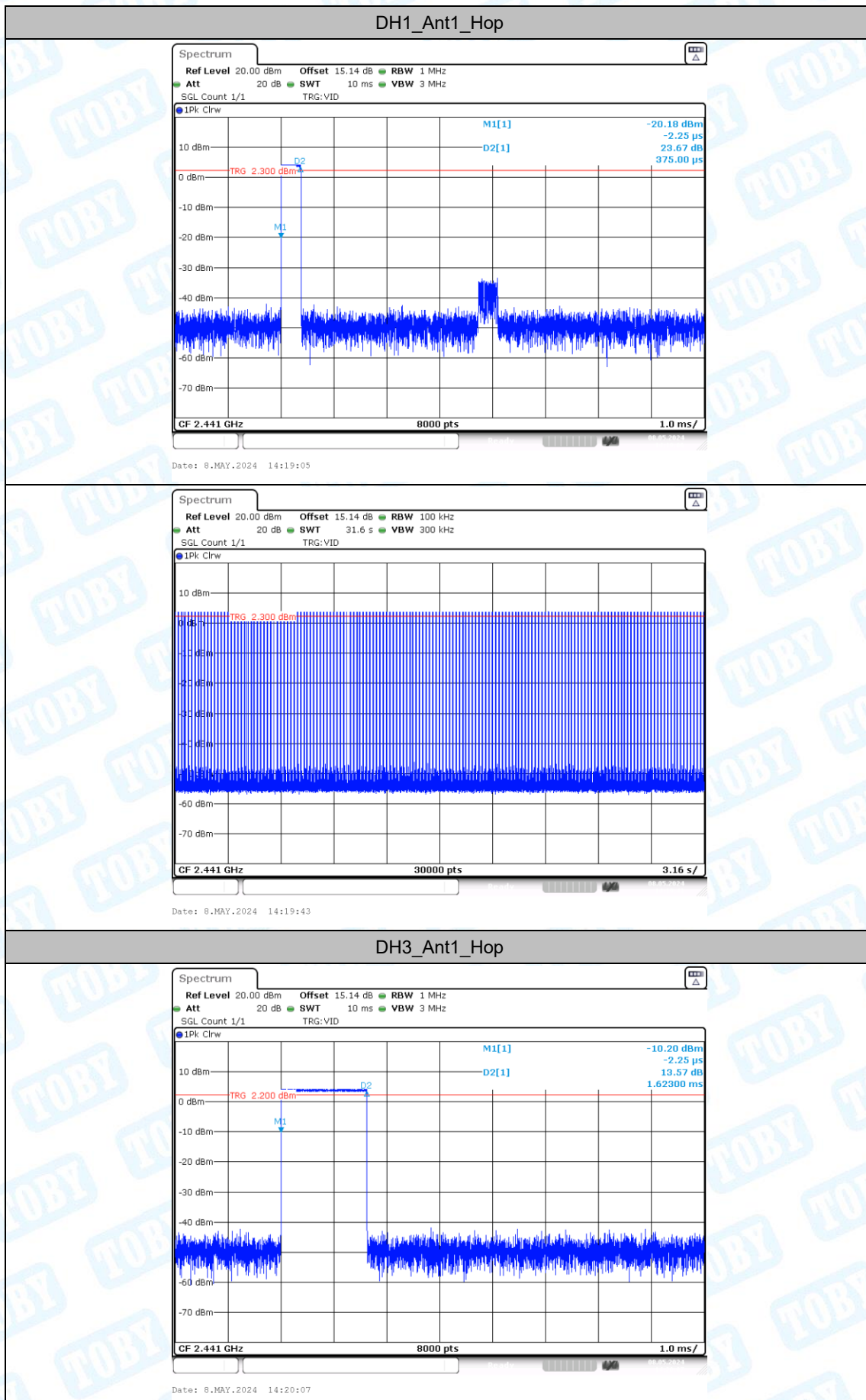


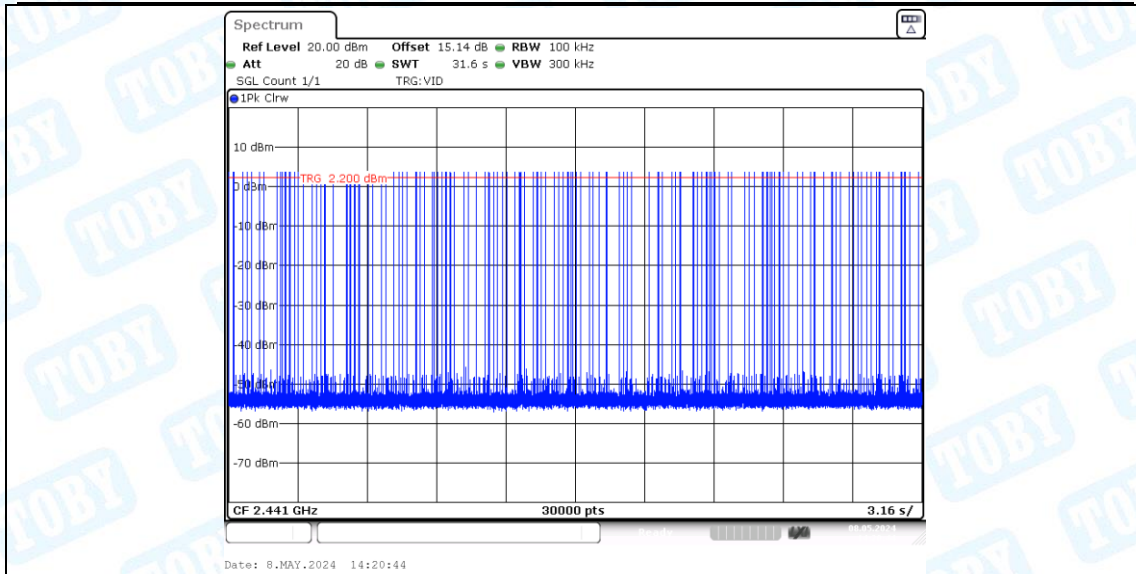
5. Time of occupancy

5.1. Test Result

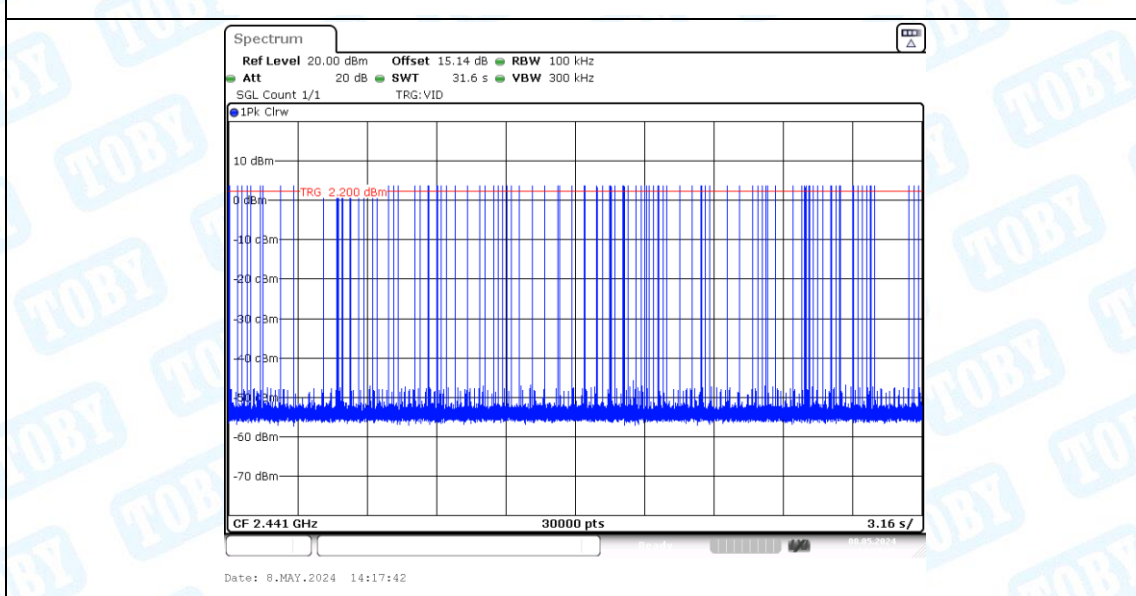
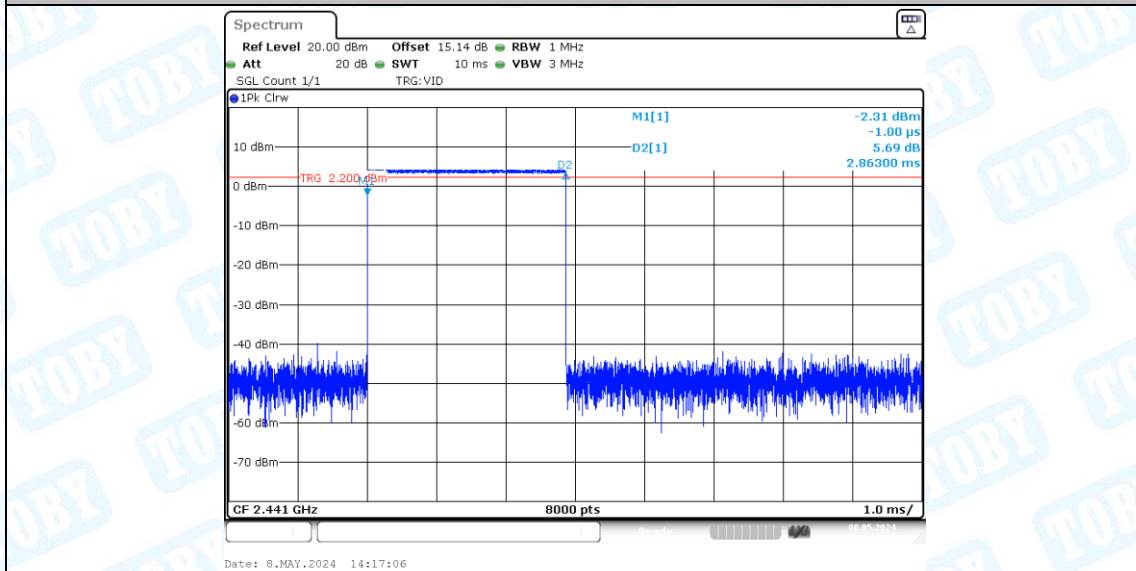
TestMode	Antenna	Channel	BurstWidth [ms]	TotalHops [Num]	Result[s]	Limit[s]	Verdict
DH1	Ant1	Hop	0.375	315	0.118	≤0.4	PASS
DH3	Ant1	Hop	1.623	160	0.26	≤0.4	PASS
DH5	Ant1	Hop	2.863	106	0.303	≤0.4	PASS
2DH1	Ant1	Hop	0.381	315	0.12	≤0.4	PASS
2DH3	Ant1	Hop	1.626	167	0.272	≤0.4	PASS
2DH5	Ant1	Hop	2.867	109	0.313	≤0.4	PASS
3DH1	Ant1	Hop	0.383	315	0.121	≤0.4	PASS
3DH3	Ant1	Hop	1.625	167	0.271	≤0.4	PASS
3DH5	Ant1	Hop	2.869	100	0.287	≤0.4	PASS

5.2.Test Graphs

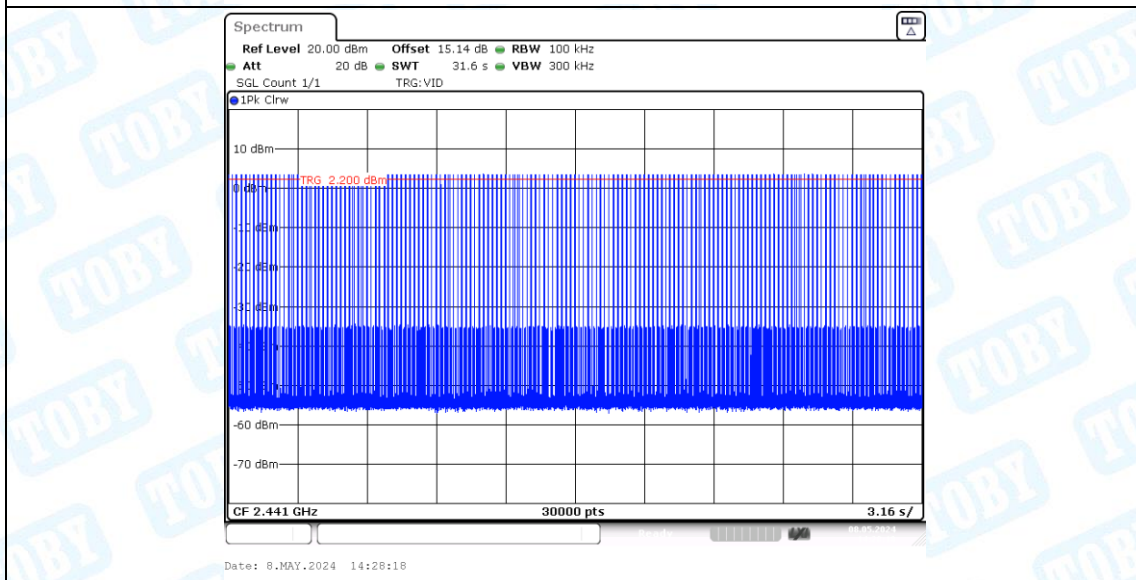
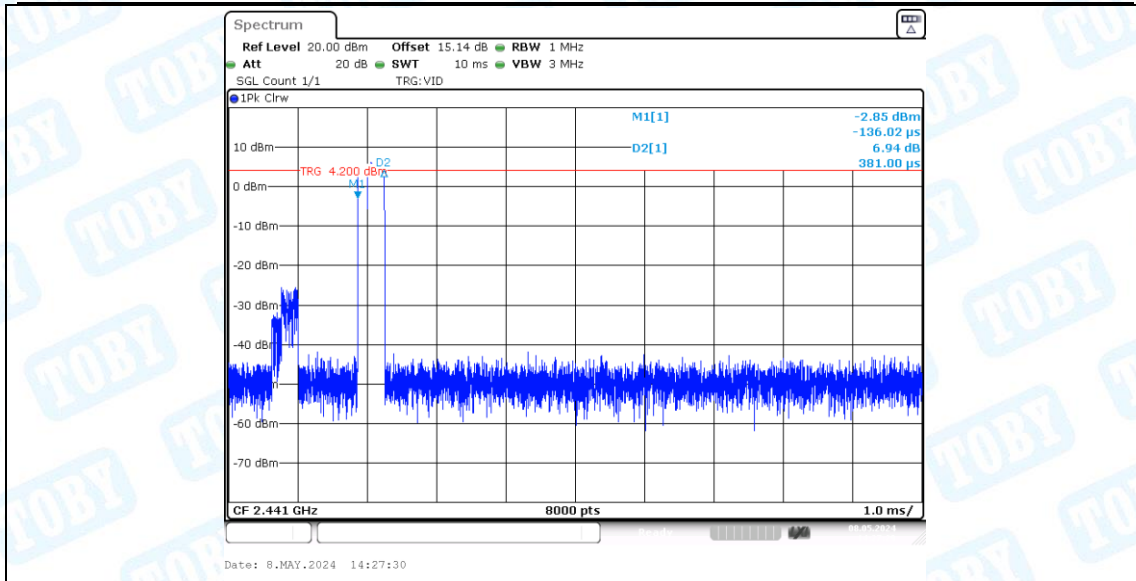




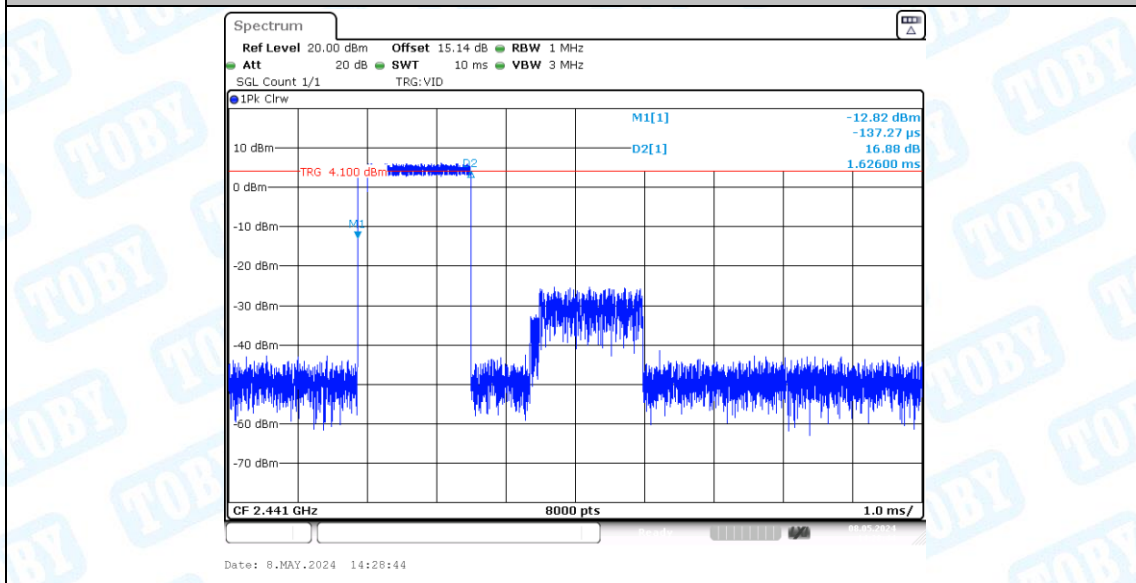
DH5_Ant1_Hop

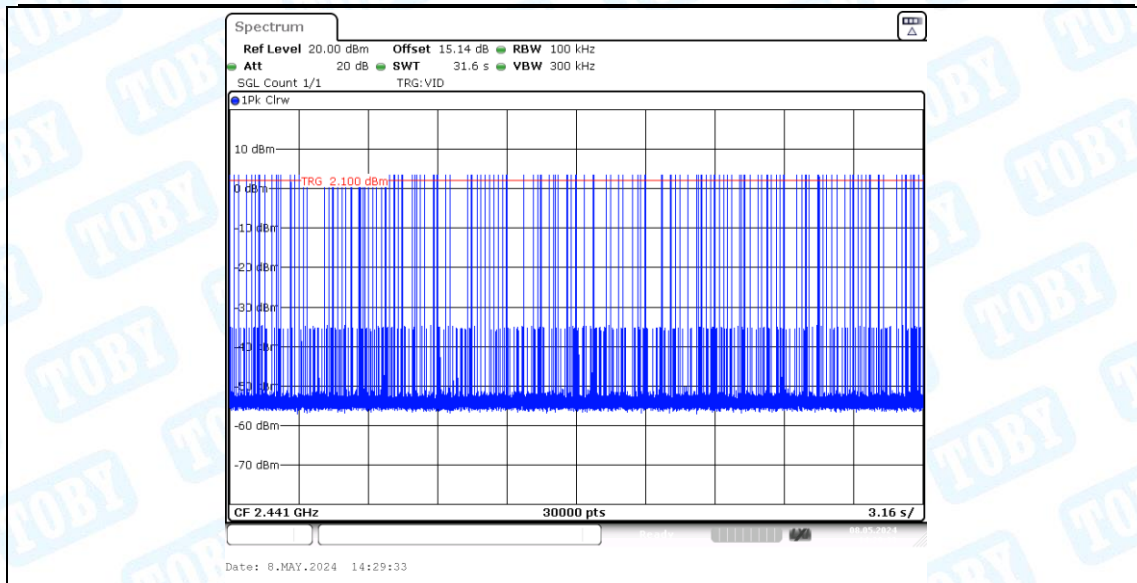


2DH1_Ant1_Hop

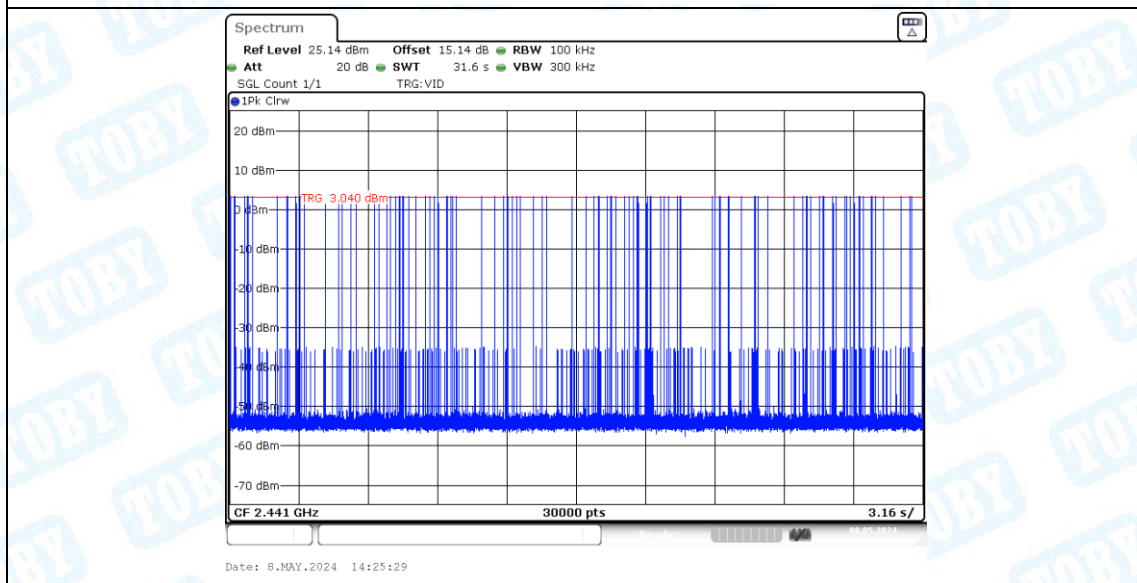
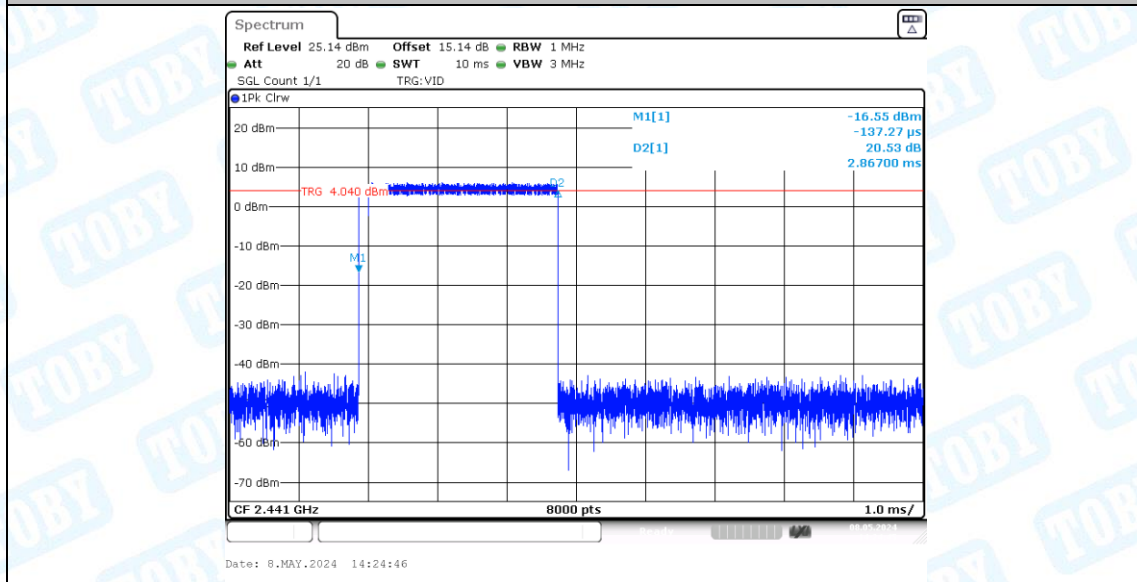


2DH3_Ant1_Hop

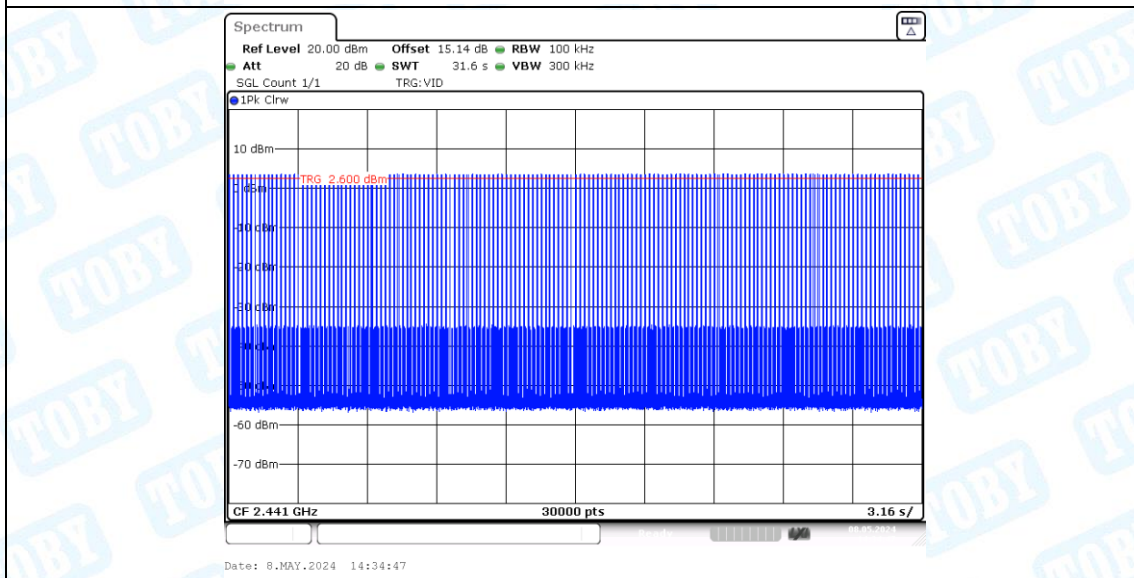
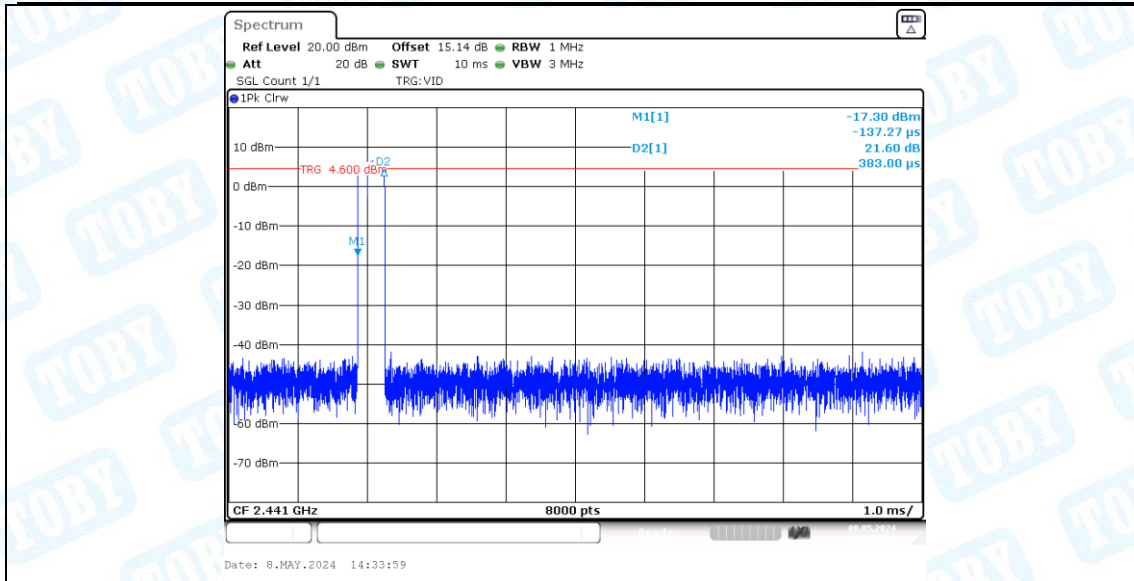




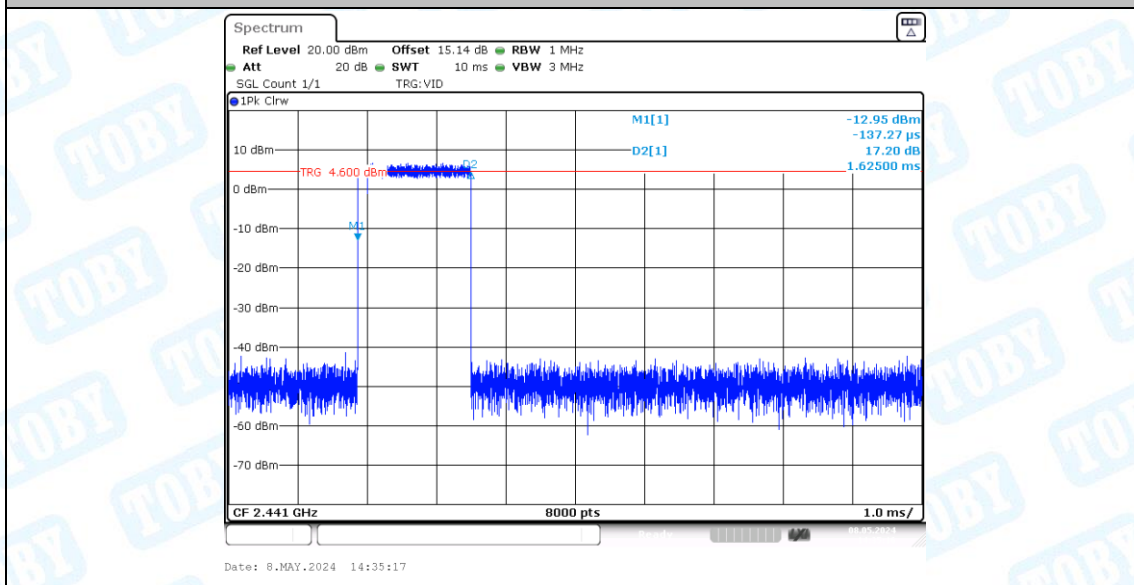
2DH5_Ant1_Hop

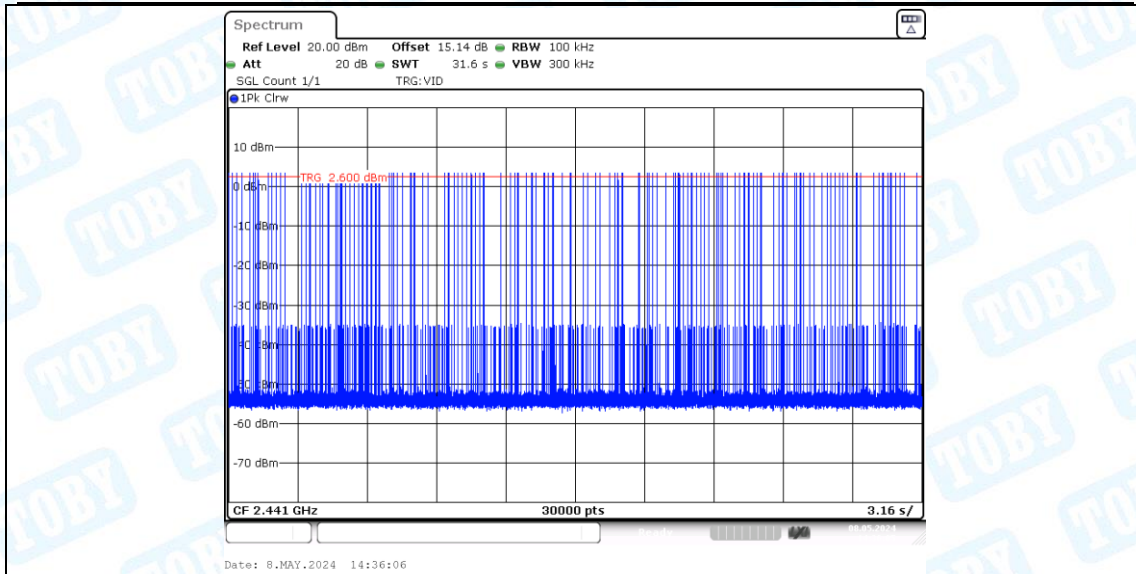


3DH1_Ant1_Hop

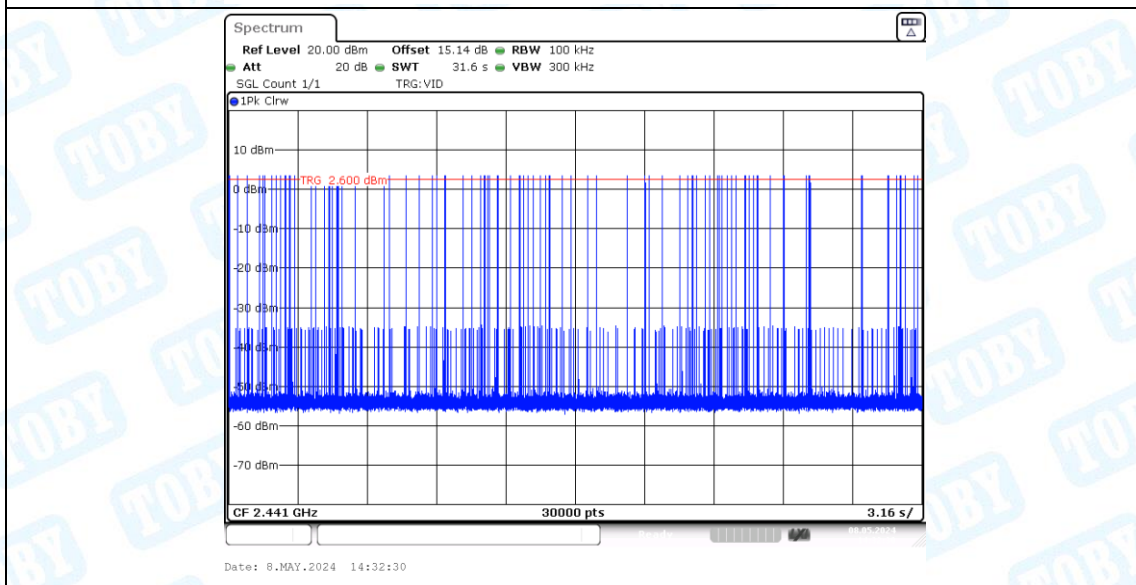
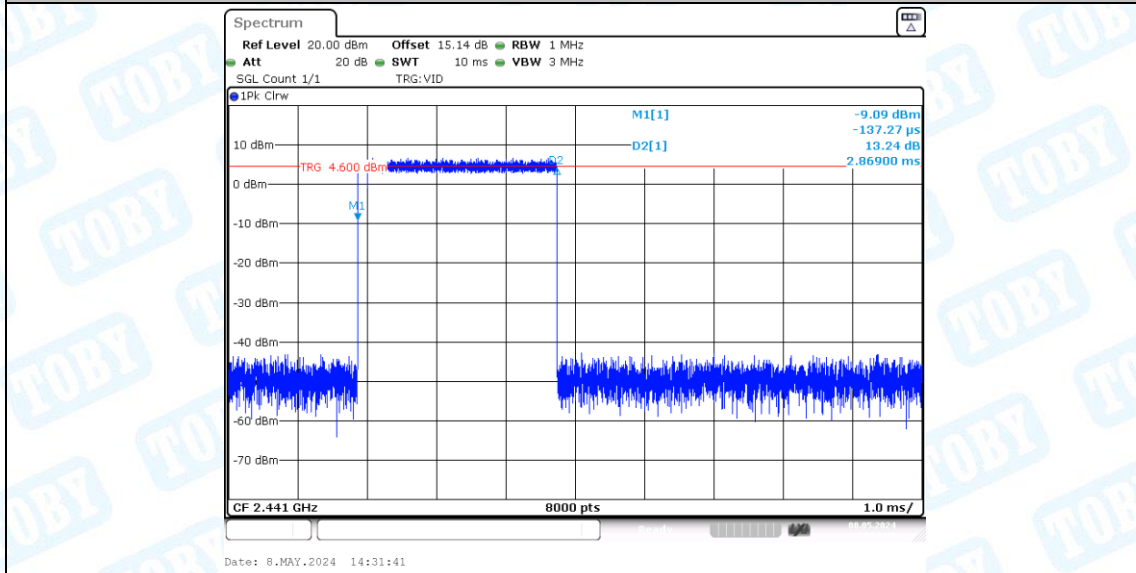


3DH3_Ant1_Hop





3DH5_Ant1_Hop

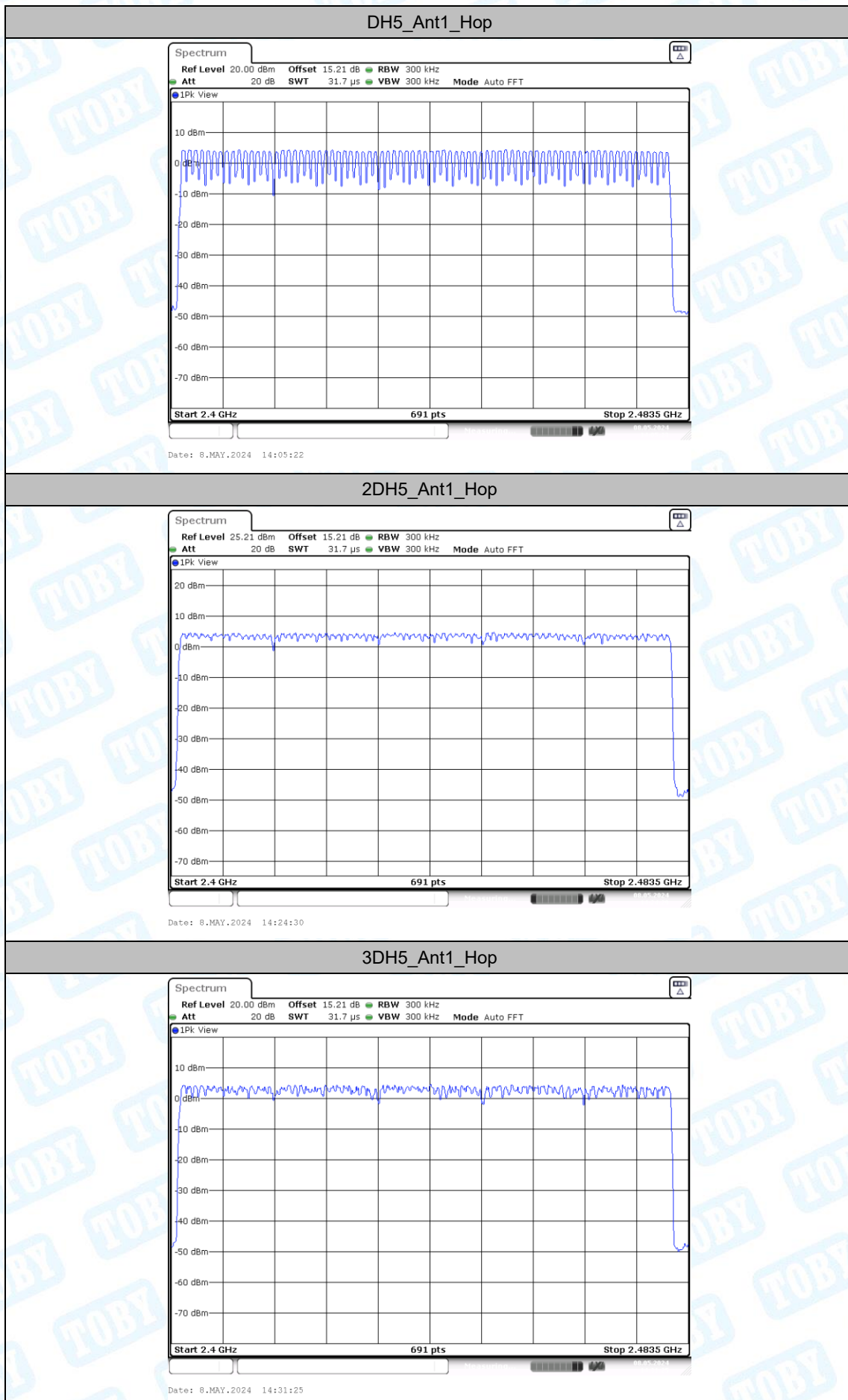


6. Number of hopping channels

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	3.85	-41.16	≤-16.15	PASS
		High	2480	3.39	-38.87	≤-16.61	PASS
		Low	Hop_2402	3.71	-40.27	≤-16.29	PASS
		High	Hop_2480	3.56	-38.69	≤-16.44	PASS
2DH5	Ant1	Low	2402	3.76	-41.08	≤-16.24	PASS
		High	2480	2.76	-39.15	≤-17.24	PASS
		Low	Hop_2402	3.95	-40.35	≤-16.05	PASS
		High	Hop_2480	3.47	-38.76	≤-16.53	PASS
3DH5	Ant1	Low	2402	4.01	-40.64	≤-15.99	PASS
		High	2480	3.51	-39.7	≤-16.49	PASS
		Low	Hop_2402	2.11	-40.35	≤-17.89	PASS
		High	Hop_2480	3.75	-39.34	≤-16.25	PASS

7.2. Test Graphs

