

FCC Appendix RF Test Data for BLE

FCC ID : 2AMMG-FK-06X

Company : HANGZHOU FRANKEVER ELECTRONIC CO.,LTD.

EUT : Smart Irrigation Timer

Model Number : FK-06X

Report No. : CTA25111901201

Reviewed By : Eric Wang

Appendix A: DTS Bandwidth

Test Result

TestMode	Antenna	Freq(MHz)	DTS BW [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
BLE_1M	Ant1	2402	0.644	2401.692	2402.336	0.5	PASS
		2440	0.624	2439.696	2440.320	0.5	PASS
		2480	0.664	2479.680	2480.344	0.5	PASS

Test Graphs



BLE_1M_Ant1_2440

Agilent Spectrum Analyzer - Swept SA

Center Freq 2.440000000 GHz

Ref Offset 0.6 dB
Ref 20.00 dBm

10 dB/div
Log

Span 4.000 MHz

Center 2.440000 GHz

#Res BW 100 kHz

#VBW 300 kHz

Sweep (#Swp) 1.000 ms (1001 pts)

Trig: Free Run

#Atten: 30 dB

#Avg Type: RMS

Avg/Hold: 100/100

02:06:18 PM Dec 03, 2025

TYPE M P P P P P P P

DET P P P P P P P P

Auto Tune

Center Freq 2.440000000 GHz

Start Freq 2.438000000 GHz

Stop Freq 2.442000000 GHz

CF Step 400.000 kHz

Man

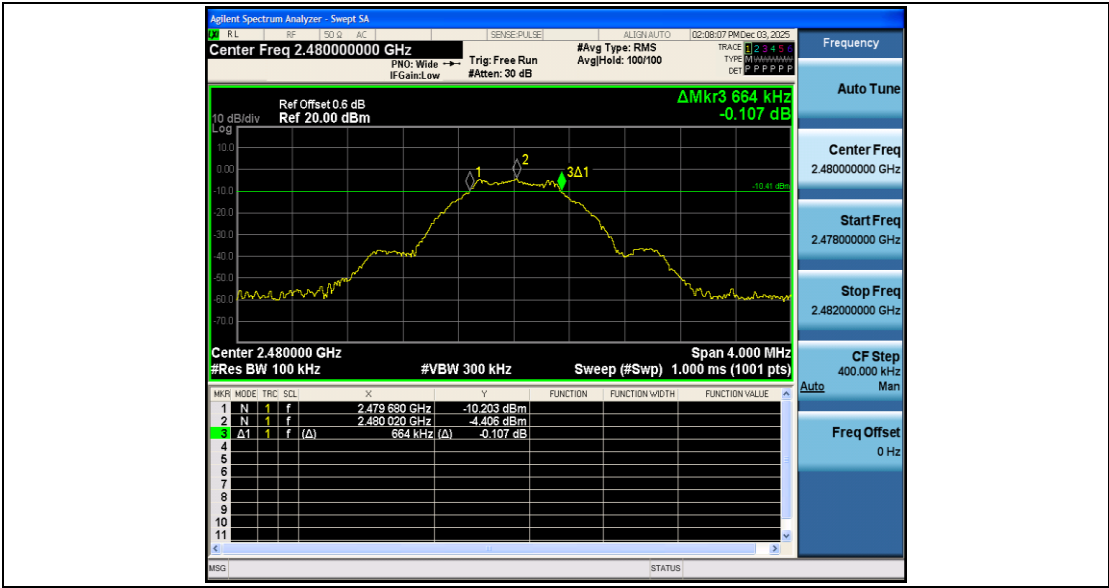
Freq Offset 0 Hz

MSG

STATUS

MARKER	MODE	TRIG	SCL	X	Y	FUNCTION	FUNCTION WIDTH	FUNCTION VALUE
1	N	1	f	2.439696 GHz	-9.461 dBm			
2	N	1	f	2.440024 GHz	-3.658 dBm			
3	Δ	1	f (Δ)	624 kHz (Δ)	0.126 dB			

BLE_1M_Ant1_2480



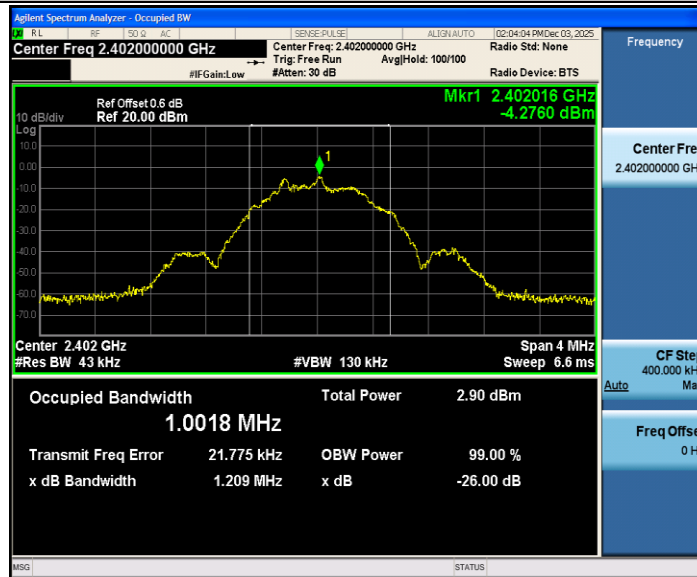
Appendix B: Occupied Channel Bandwidth

Test Result

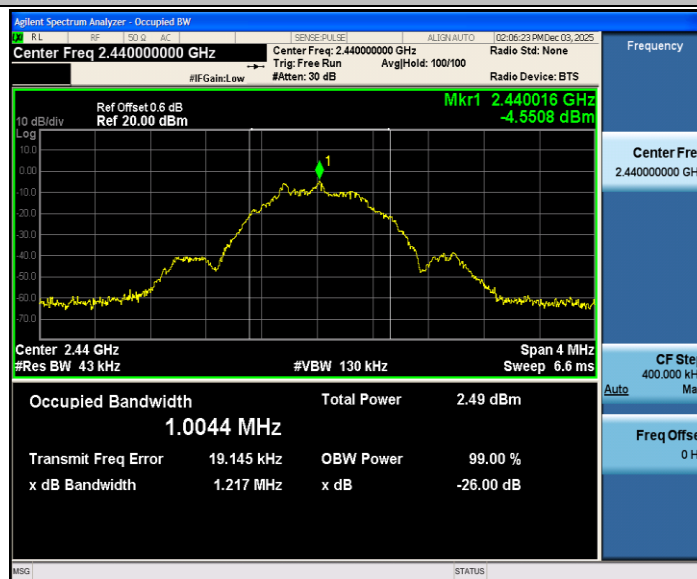
TestMode	Antenna	Freq(MHz)	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
BLE_1M	Ant1	2402	1.0018	2401.5209	2402.5227	---	---
		2440	1.0044	2439.5170	2440.5214	---	---
		2480	1.0033	2479.5186	2480.5219	---	---

Test Graphs

BLE_1M_Ant1_2402



BLE_1M_Ant1_2440



BLE_1M_Ant1_2480

Appendix C: Maximum conducted output power

Test Result Peak

TestMode	Antenna	Freq(MHz)	Conducted Peak Power[dBm]	Conducted Limit[dBm]	Verdict
BLE_1M	Ant1	2402	-3.22	≤30	PASS
		2440	-3.52	≤30	PASS
		2480	-3.55	≤30	PASS

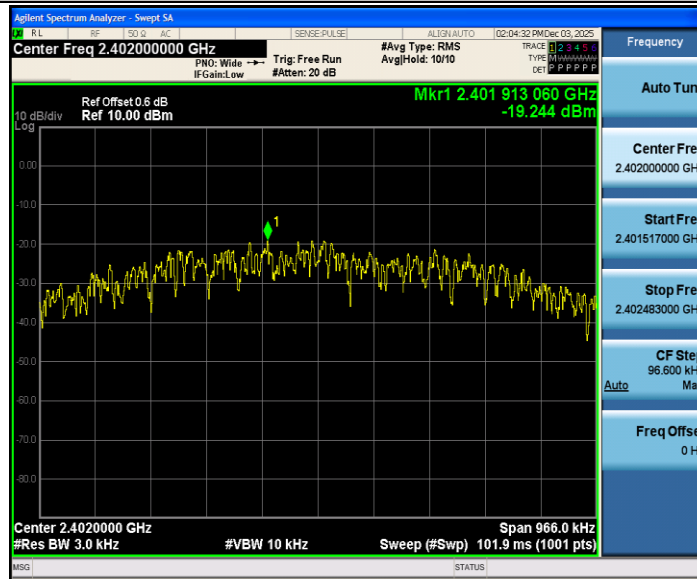
Appendix D: Maximum power spectral density

Test Result

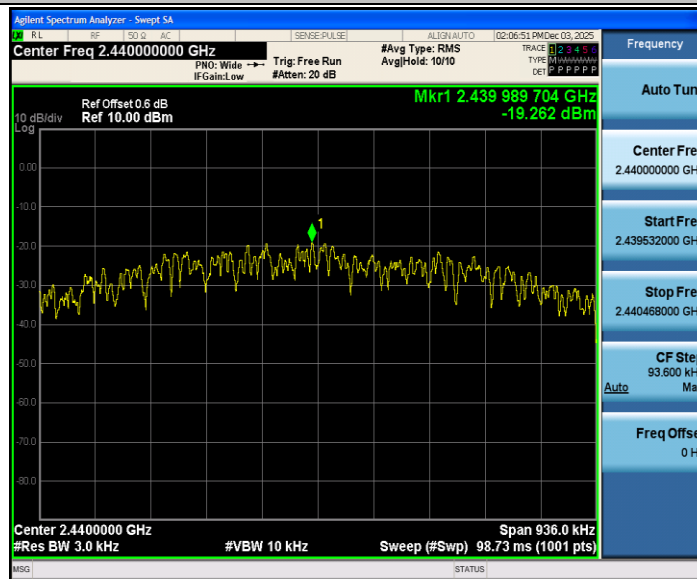
TestMode	Antenna	Freq(MHz)	Result[dBm/3kHz]	Limit[dBm/3kHz]	Verdict
BLE_1M	Ant1	2402	-19.24	≤8.00	PASS
		2440	-19.26	≤8.00	PASS
		2480	-19.47	≤8.00	PASS

Test Graphs

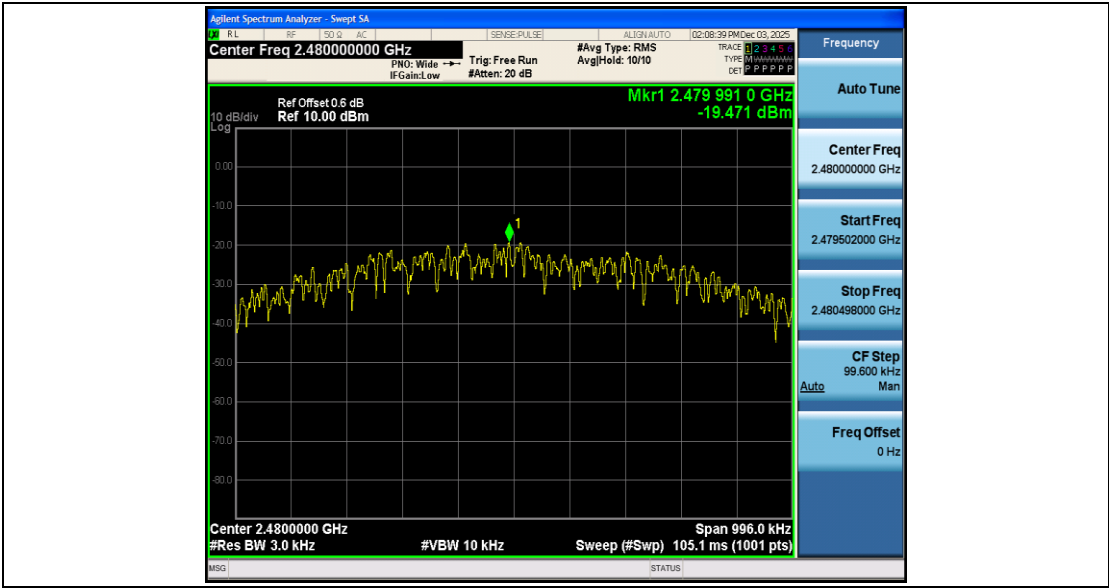
BLE_1M_Ant1_2402



BLE_1M_Ant1_2440



BLE_1M_Ant1_2480



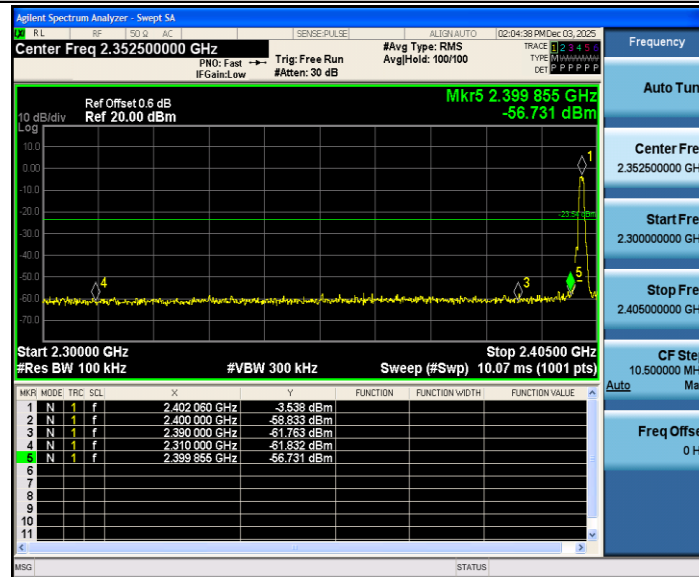
Appendix E: Band edge measurements

Test Result

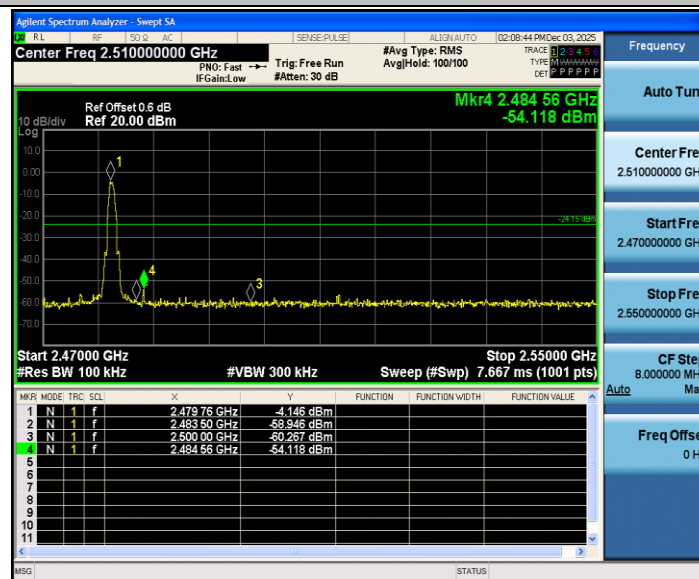
TestMode	Antenna	Channel	Freq(MHz)	RefLevel[dBm]	Result[dBm]	Limit[dBm]	Verdict
BLE_1M	Ant1	Low	2402	-3.54	-56.73	≤-23.54	PASS
		High	2480	-4.15	-54.12	≤-24.15	PASS

Test Graphs

BLE_1M_Ant1_Low_2402



BLE_1M_Ant1_High_2480

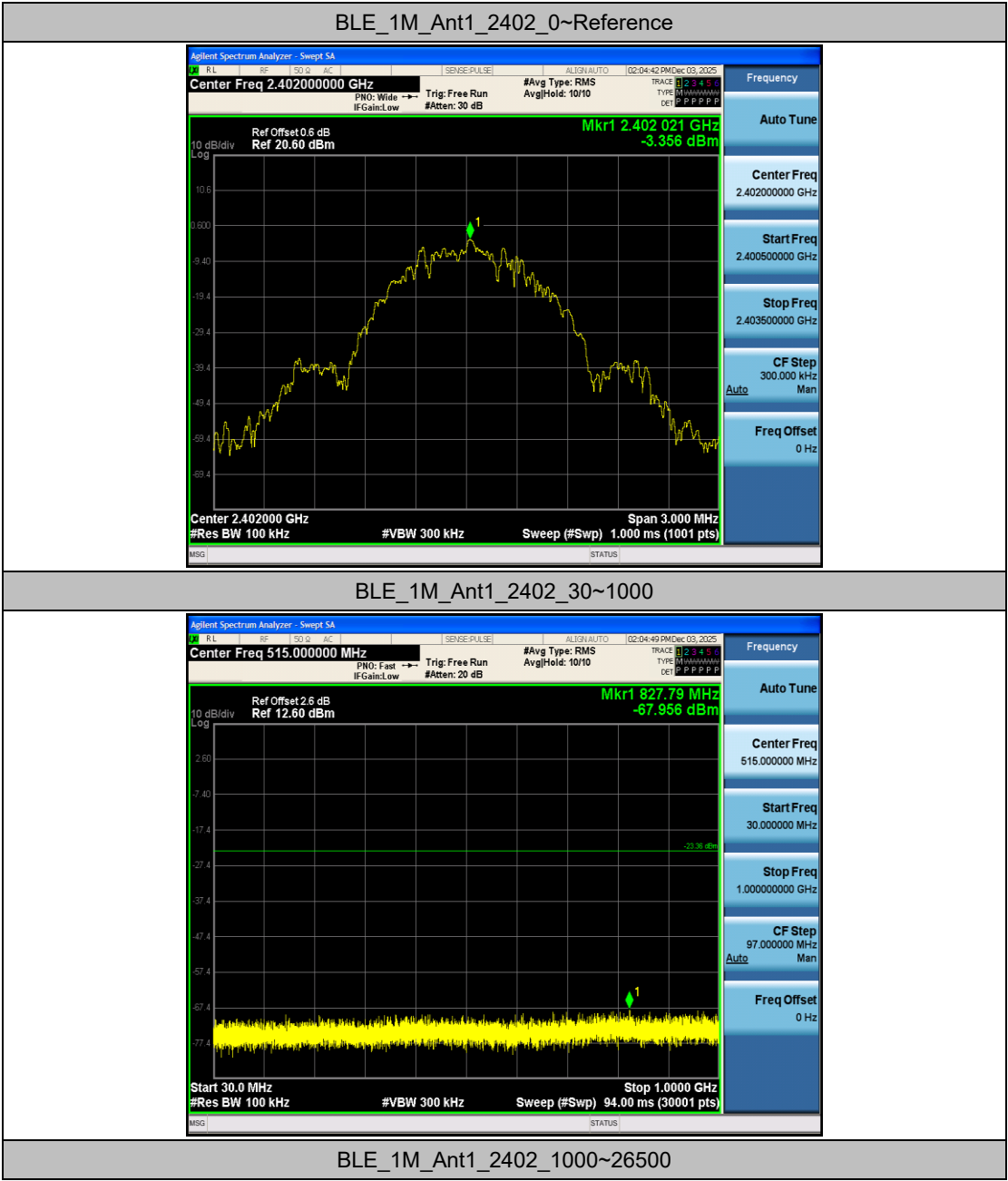


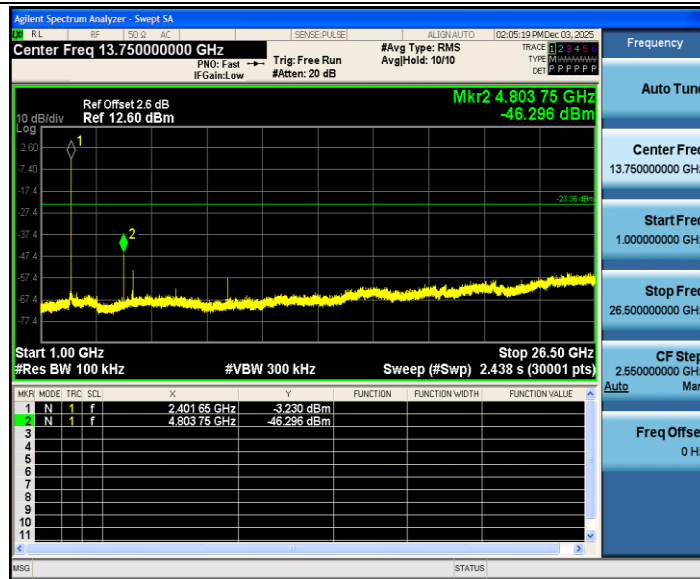
Appendix F: Conducted Spurious Emission

Test Result

TestMode	Antenna	Freq(MHz)	FreqRange [MHz]	RefLevel [dBm]	Result[dBm]	Limit[dBm]	Verdict
BLE_1M	Ant1	2402	Reference	-3.36	-3.36	---	PASS
			30~1000	-3.36	-67.96	≤-23.36	PASS
			1000~26500	-3.36	-46.3	≤-23.36	PASS
		2440	Reference	-3.63	-3.63	---	PASS
			30~1000	-3.63	-68.26	≤-23.63	PASS
			1000~26500	-3.63	-47.09	≤-23.63	PASS
		2480	Reference	-5.19	-5.19	---	PASS
			30~1000	-5.19	-67.76	≤-25.19	PASS
			1000~26500	-5.19	-48.03	≤-25.19	PASS

Test Graphs

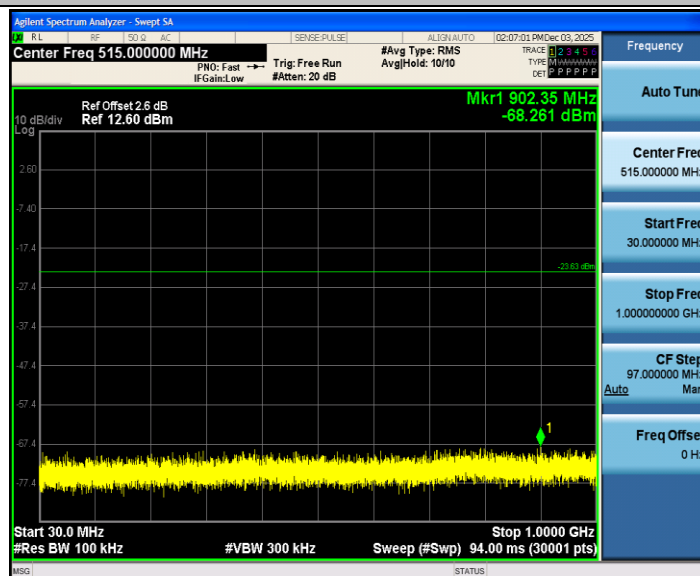




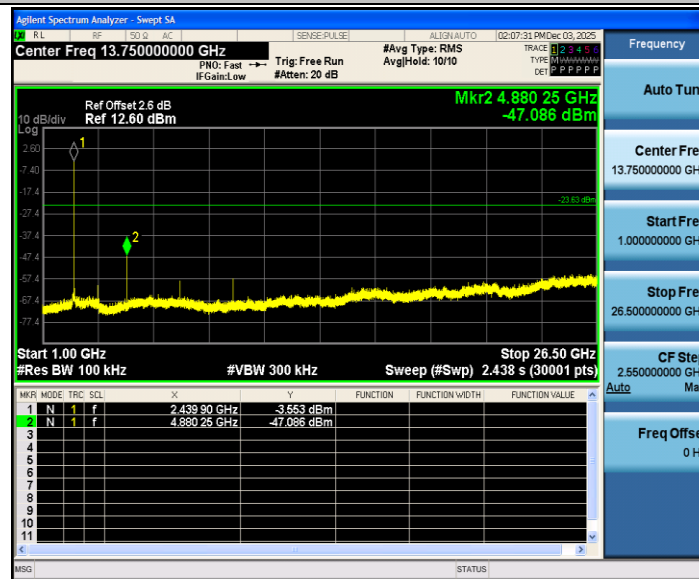
BLE_1M_Ant1_2440_0~Reference



BLE_1M_Ant1_2440_30~1000



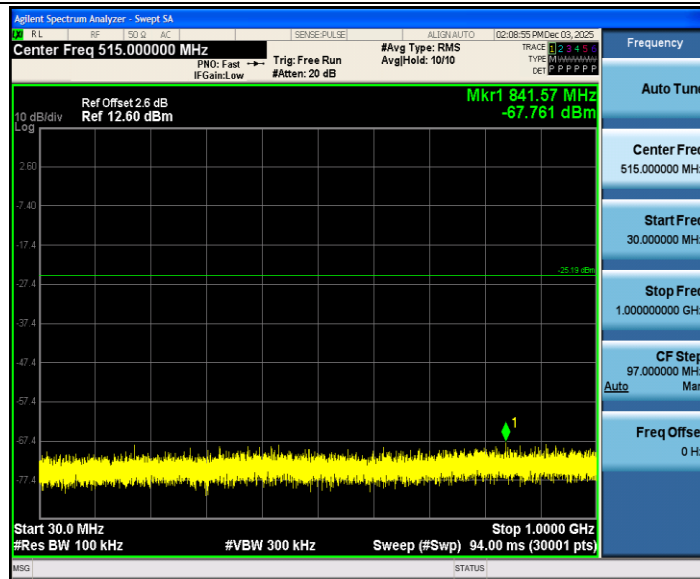
BLE_1M_Ant1_2440_1000~26500



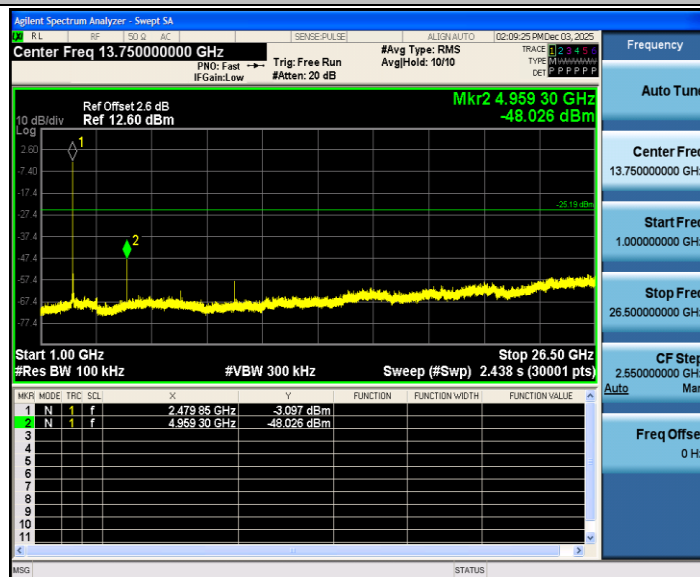
BLE_1M_Ant1_2480_0~Reference



BLE_1M_Ant1_2480_30~1000



BLE_1M_Ant1_2480_1000~26500



Appendix G: Duty Cycle

Test Result

TestMode	Antenna	Freq(MHz)	ON Time [ms]	Period [ms]	X	DC [%]	xFactor	Limit	Verdict
BLE_1M	Ant1	2402	0.41	0.63	0.6508	65.08	1.87	---	---
		2440	0.41	0.63	0.6508	65.08	1.87	---	---
		2480	0.41	0.63	0.6508	65.08	1.87	---	---

Test Graphs

