

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

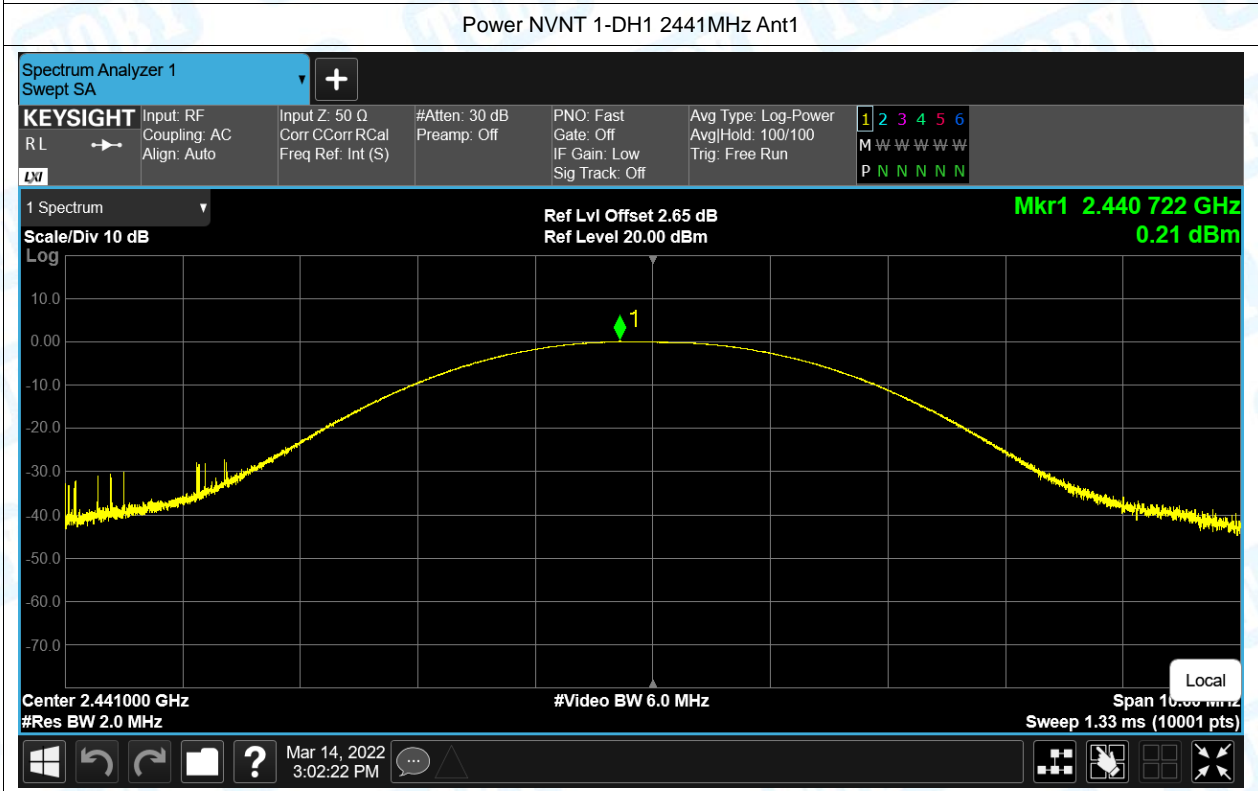
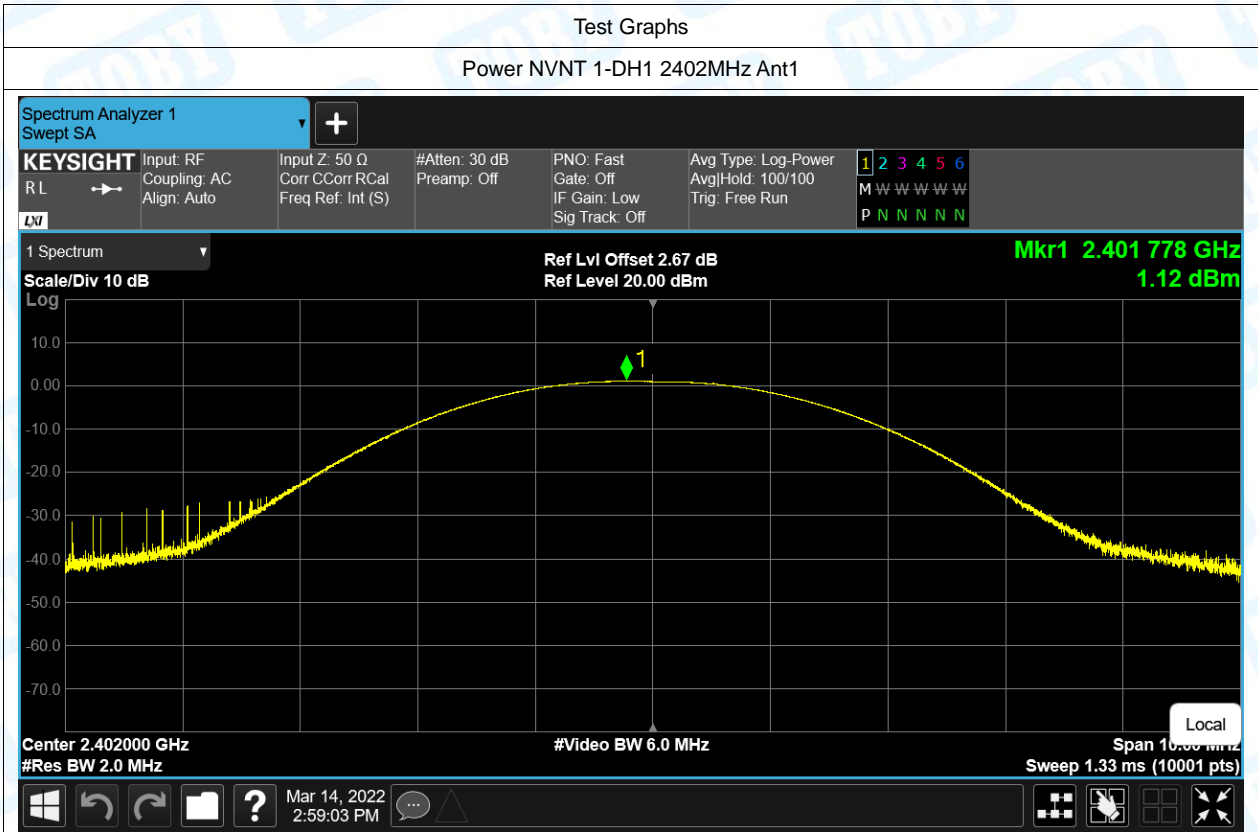
General Description of EUT	
Product Name:	LED PROJECTOR
Test Model:	X9
Sample ID:	202202-0189_01-02
Environmental Conditions	
Temperature:	25°C
Relative Humidity:	55%
Test Voltage:	AC 110V
Test Engineer:	Huangjianping
Note: For a more detailed features description, please refer to the report TBR-C-202202-0189-1	

Contents

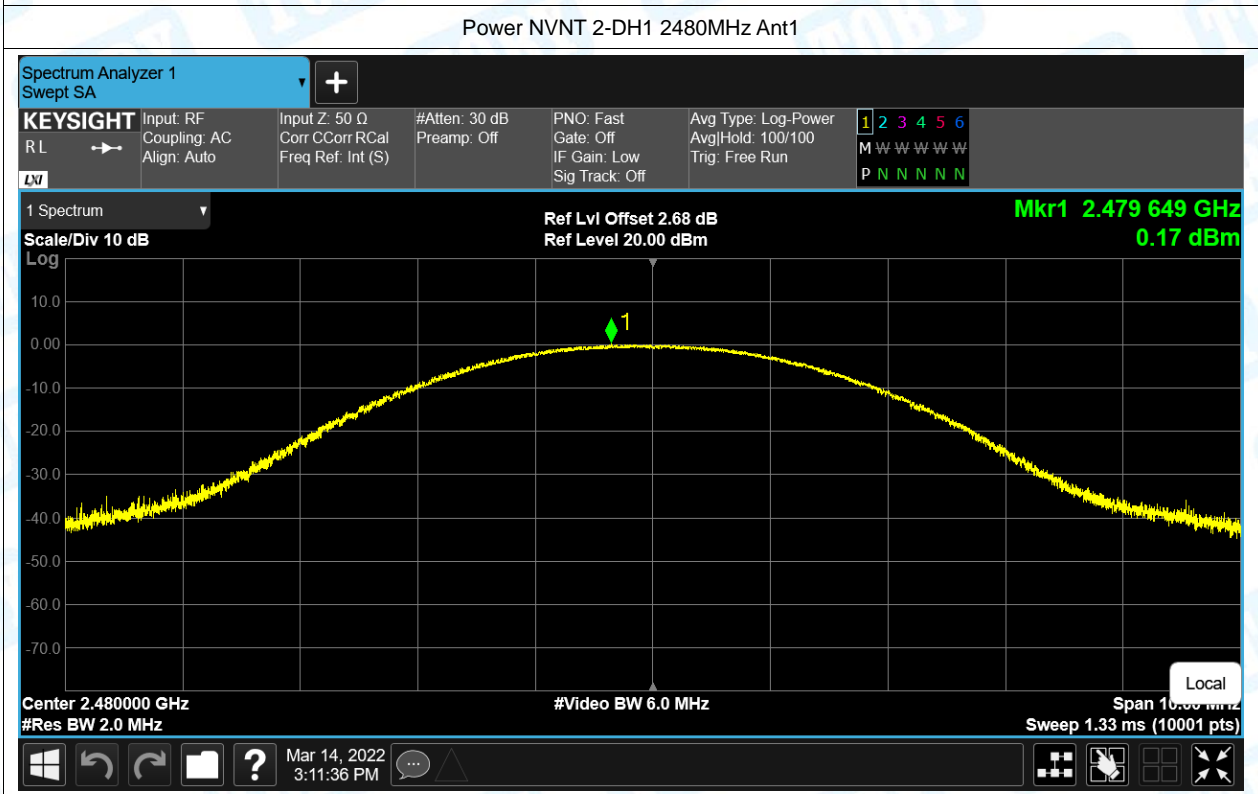
1.Maximum Conducted Output Power	3
2.-20dB Bandwidth	9
3.Occupied Channel Bandwidth	15
4.Band Edge	21
5.Band Edge(Hopping)	28
6.Conducted RF Spurious Emission	35
7.Restrict Band	45
8.Carrier Frequencies Separation	52
9.Number of Hopping Channel	55
10.Dwell Time	58

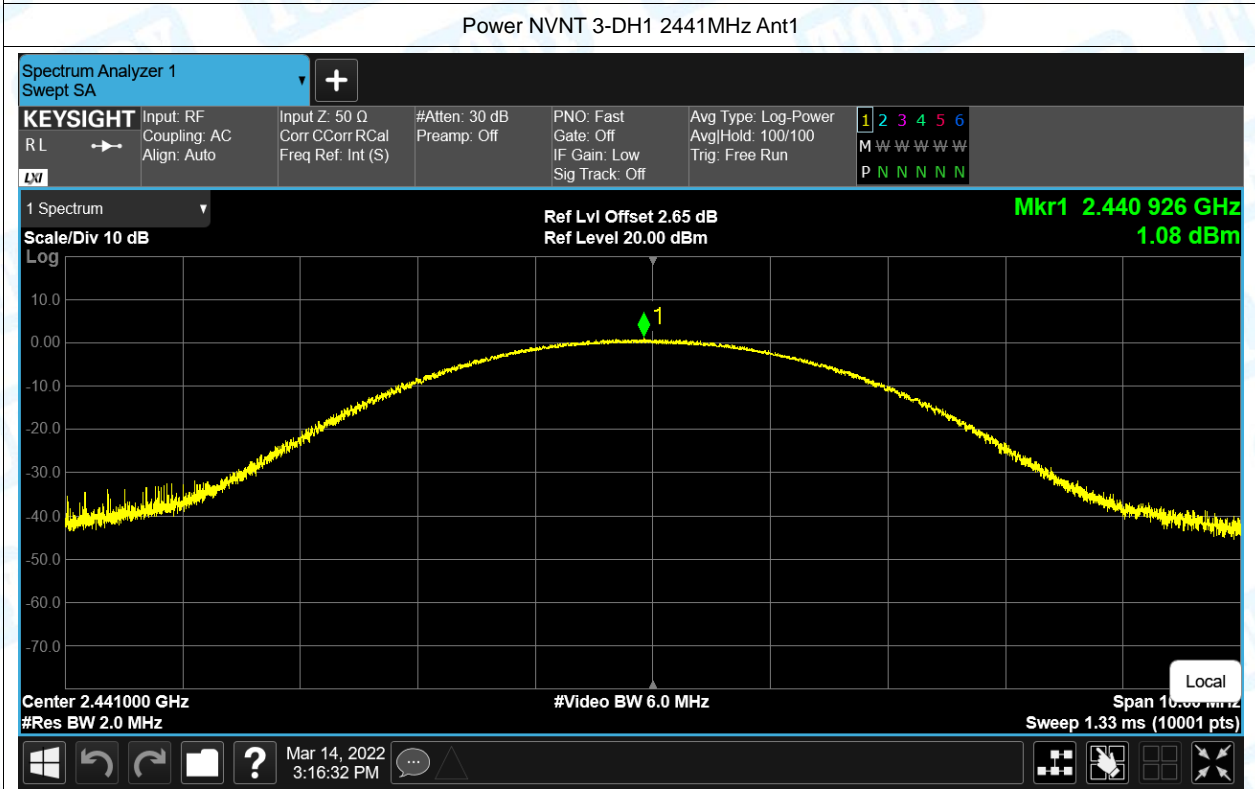
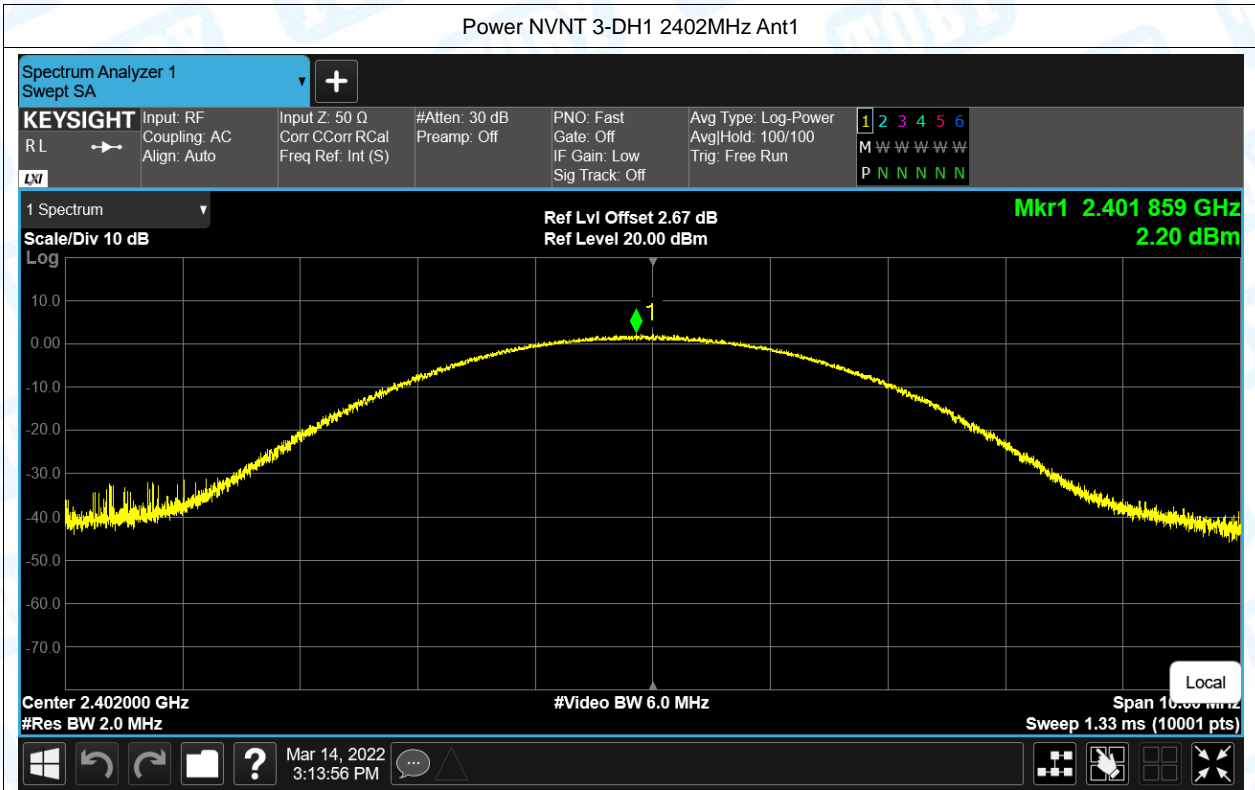
1. Maximum Conducted Output Power

Condition	Mode	Frequency (MHz)	Antenna	Conducted Power (dBm)	Limit (dBm)	Verdict
NVNT	1-DH1	2402	Ant1	1.117	21	Pass
NVNT	1-DH1	2441	Ant1	0.211	21	Pass
NVNT	1-DH1	2480	Ant1	-0.513	21	Pass
NVNT	2-DH1	2402	Ant1	1.734	21	Pass
NVNT	2-DH1	2441	Ant1	0.687	21	Pass
NVNT	2-DH1	2480	Ant1	0.172	21	Pass
NVNT	3-DH1	2402	Ant1	2.203	21	Pass
NVNT	3-DH1	2441	Ant1	1.081	21	Pass
NVNT	3-DH1	2480	Ant1	0.641	21	Pass









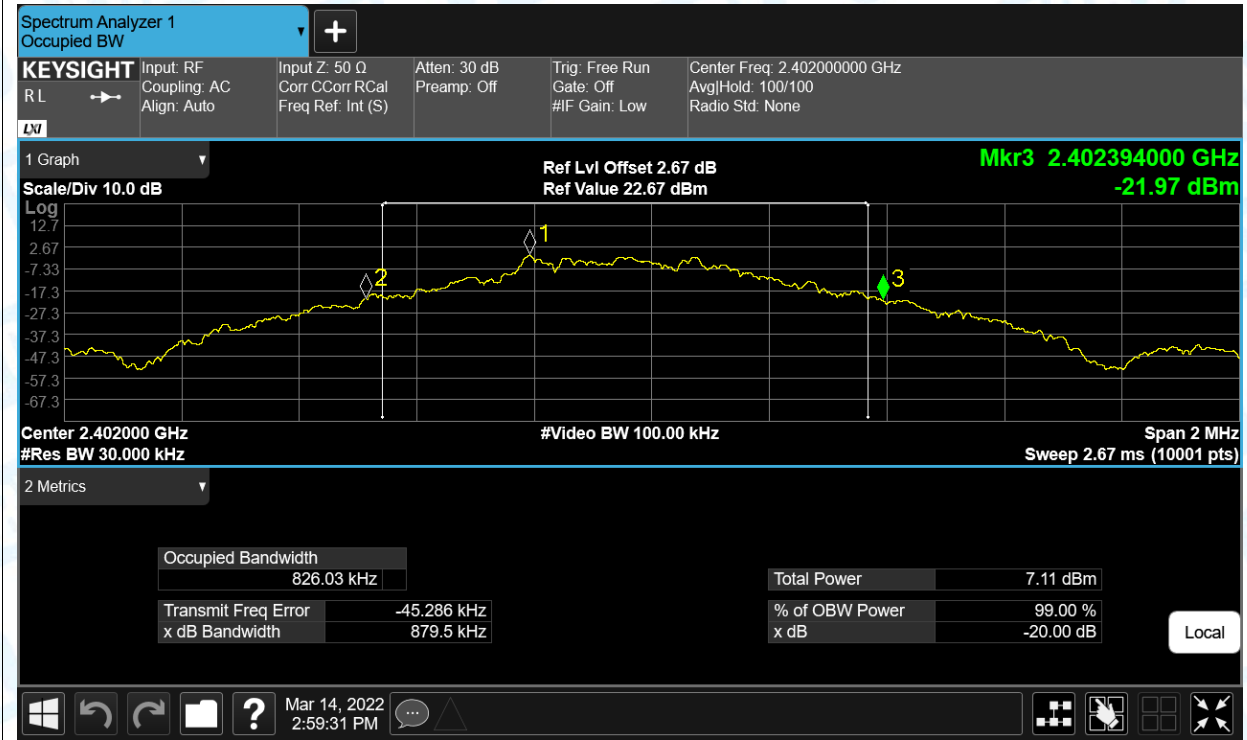


2.-20dB Bandwidth

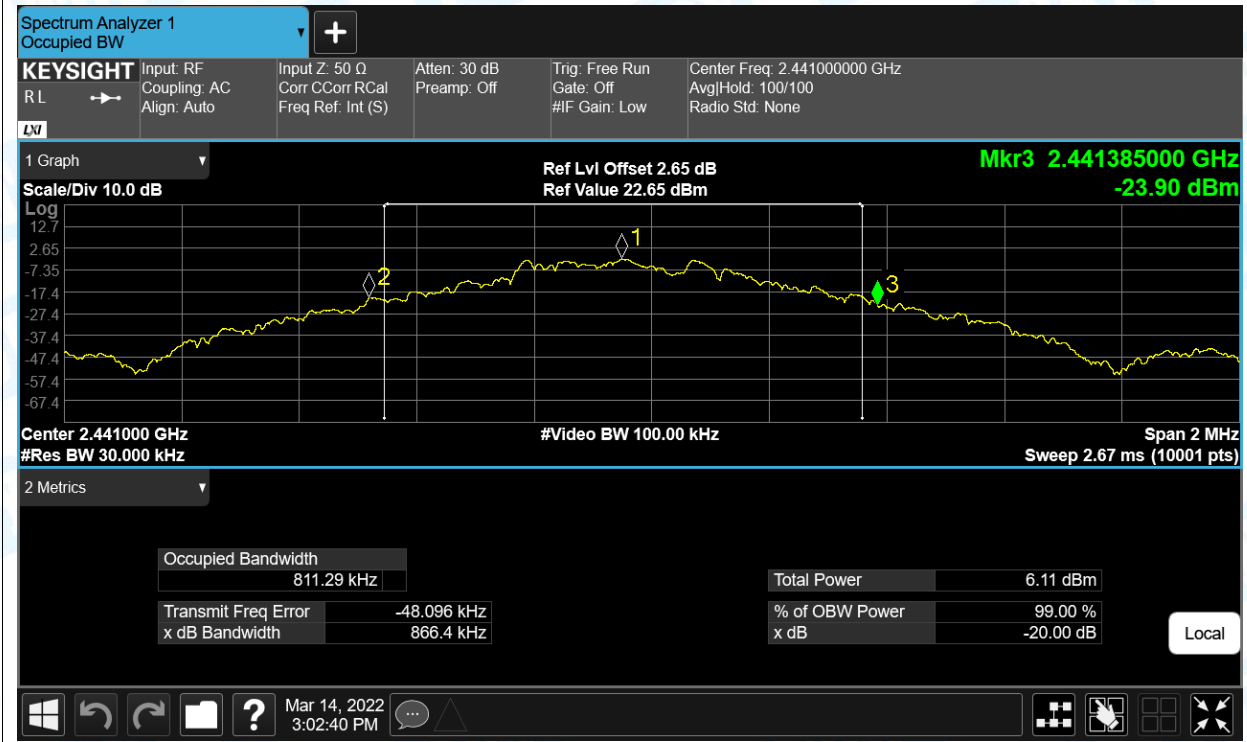
Condition	Mode	Frequency (MHz)	Antenna	-20 dB Bandwidth (MHz)	Limit -20 dB Bandwidth (MHz)	Verdict
NVNT	1-DH1	2402	Ant1	0.88	0	Pass
NVNT	1-DH1	2441	Ant1	0.87	0	Pass
NVNT	1-DH1	2480	Ant1	0.87	0	Pass
NVNT	2-DH1	2402	Ant1	1.25	0	Pass
NVNT	2-DH1	2441	Ant1	1.23	0	Pass
NVNT	2-DH1	2480	Ant1	1.25	0	Pass
NVNT	3-DH1	2402	Ant1	1.2	0	Pass
NVNT	3-DH1	2441	Ant1	1.25	0	Pass
NVNT	3-DH1	2480	Ant1	1.22	0	Pass

Test Graphs

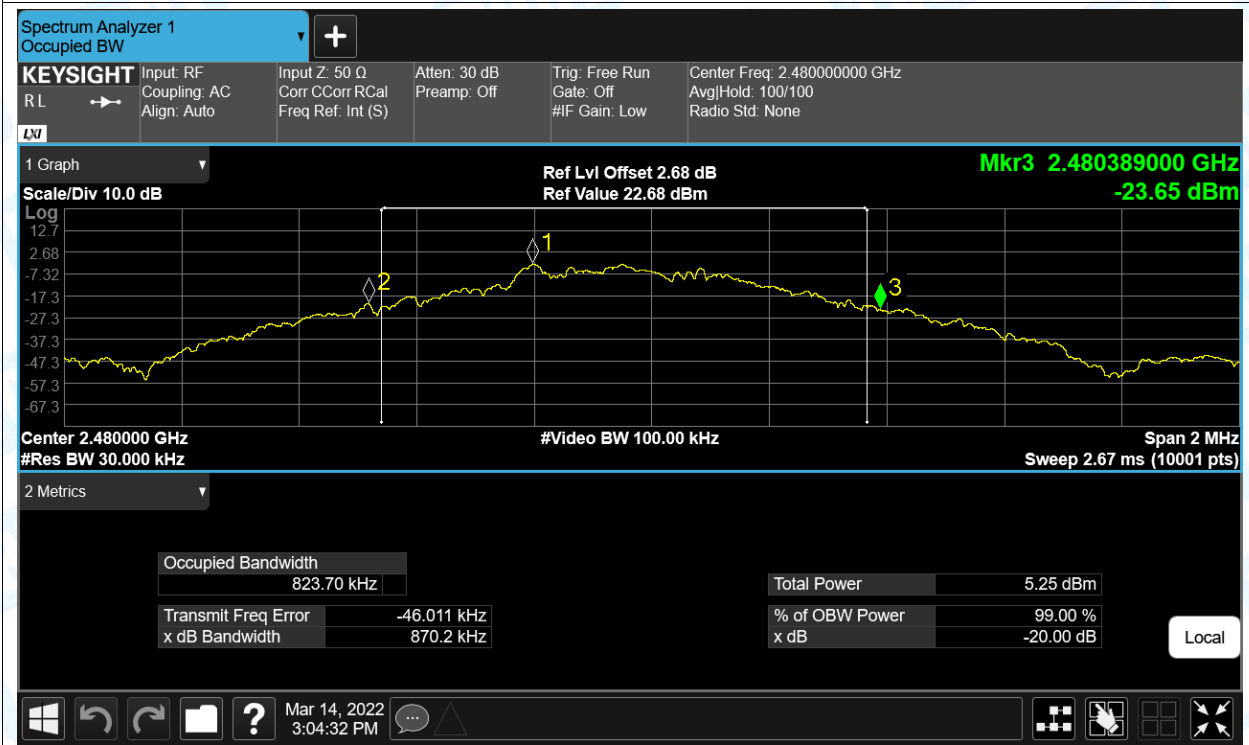
-20dB Bandwidth NVNT 1-DH1 2402MHz Ant1



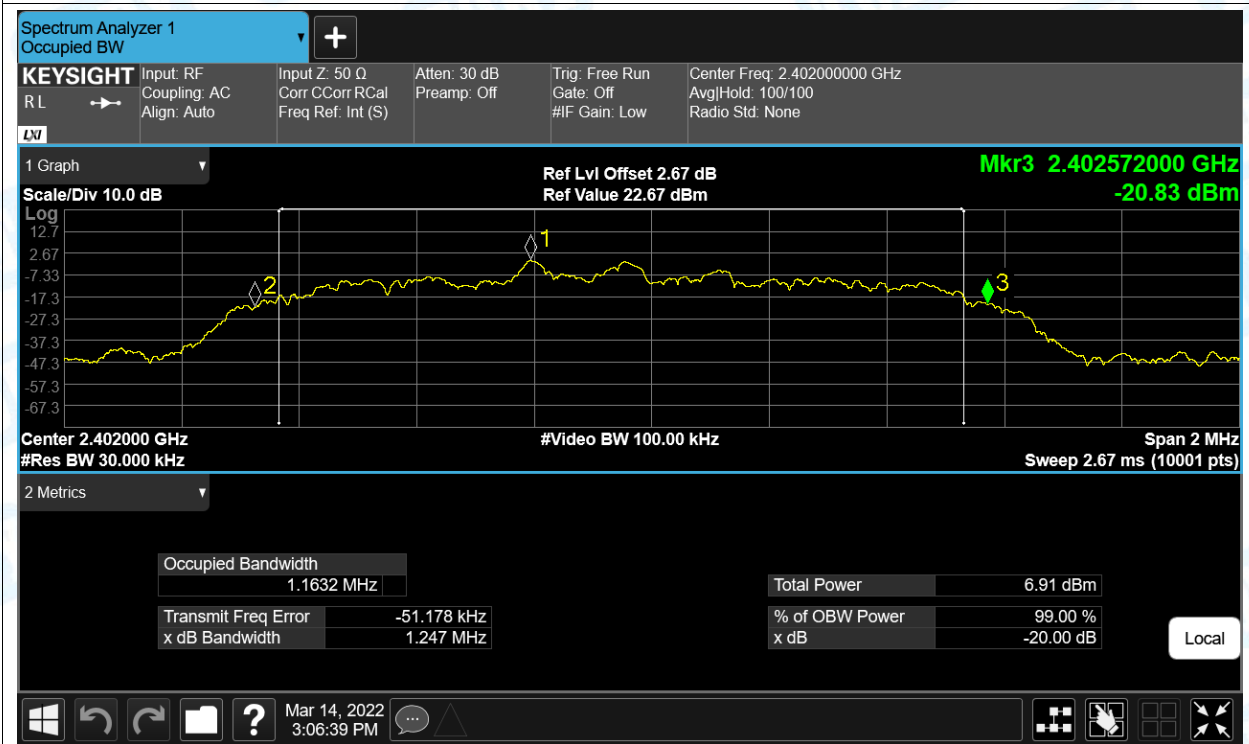
-20dB Bandwidth NVNT 1-DH1 2441MHz Ant1



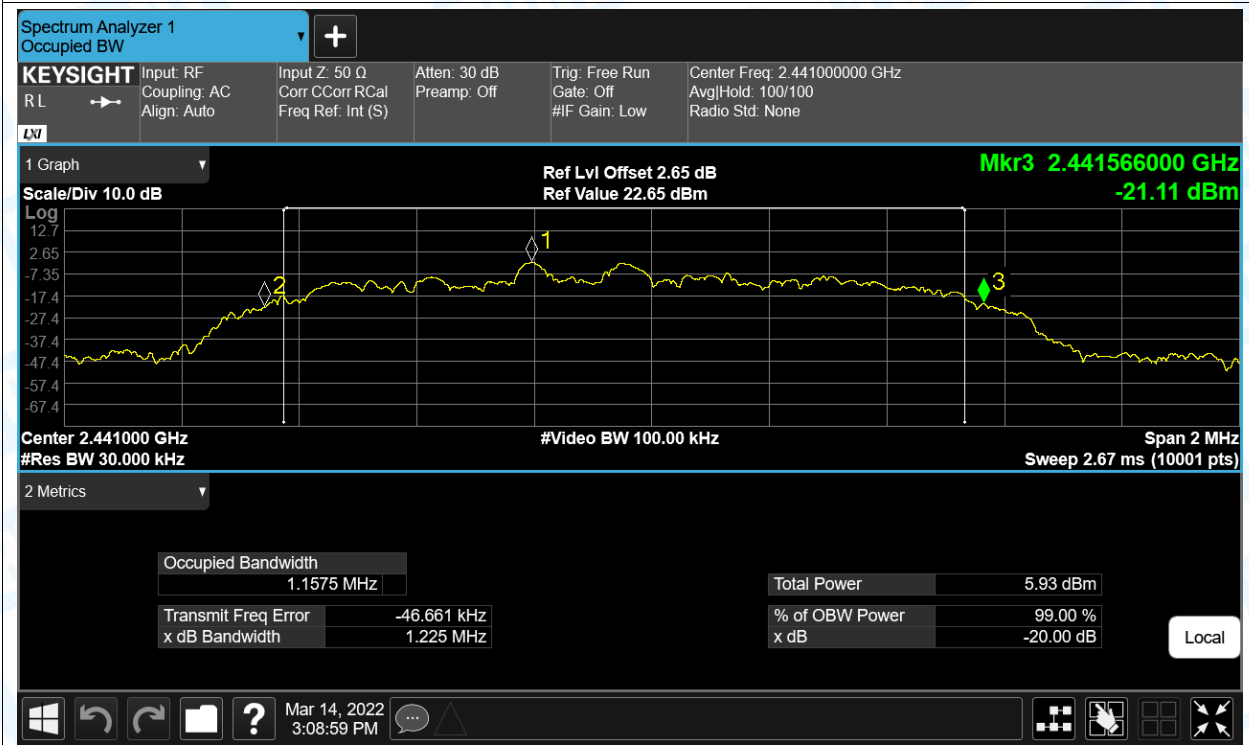
-20dB Bandwidth NVNT 1-DH1 2480MHz Ant1



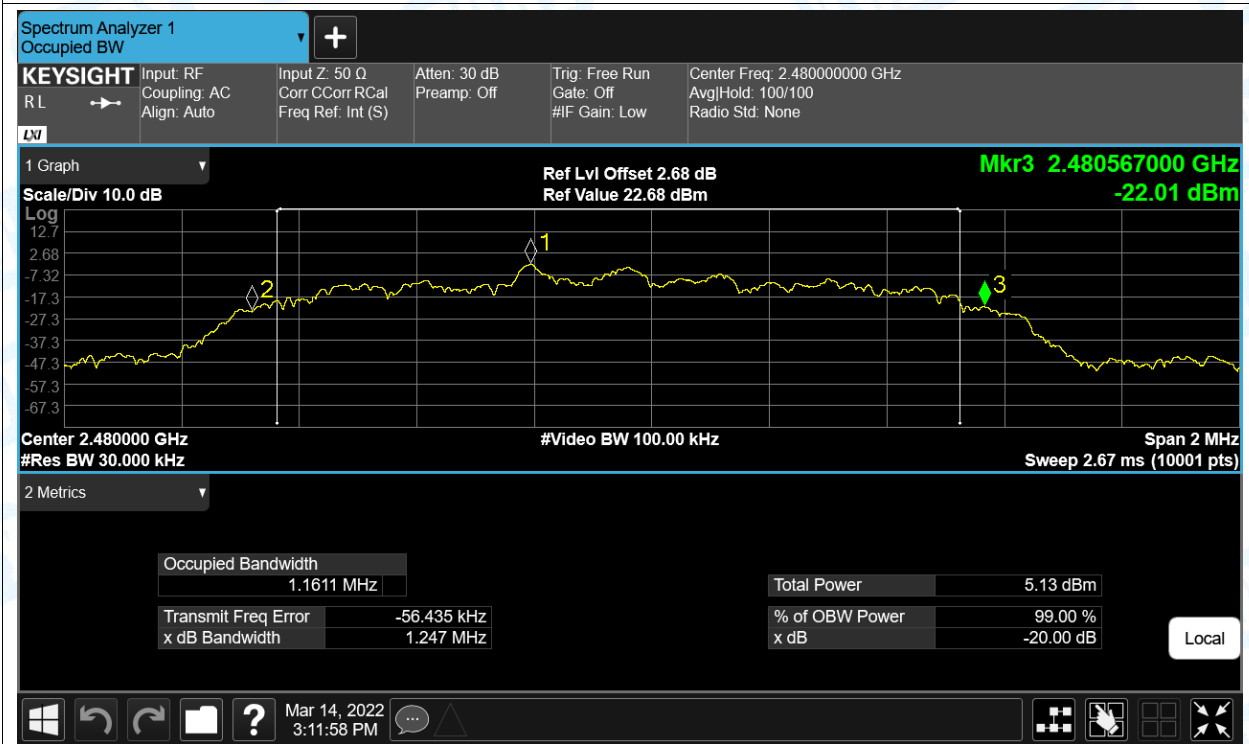
-20dB Bandwidth NVNT 2-DH1 2402MHz Ant1



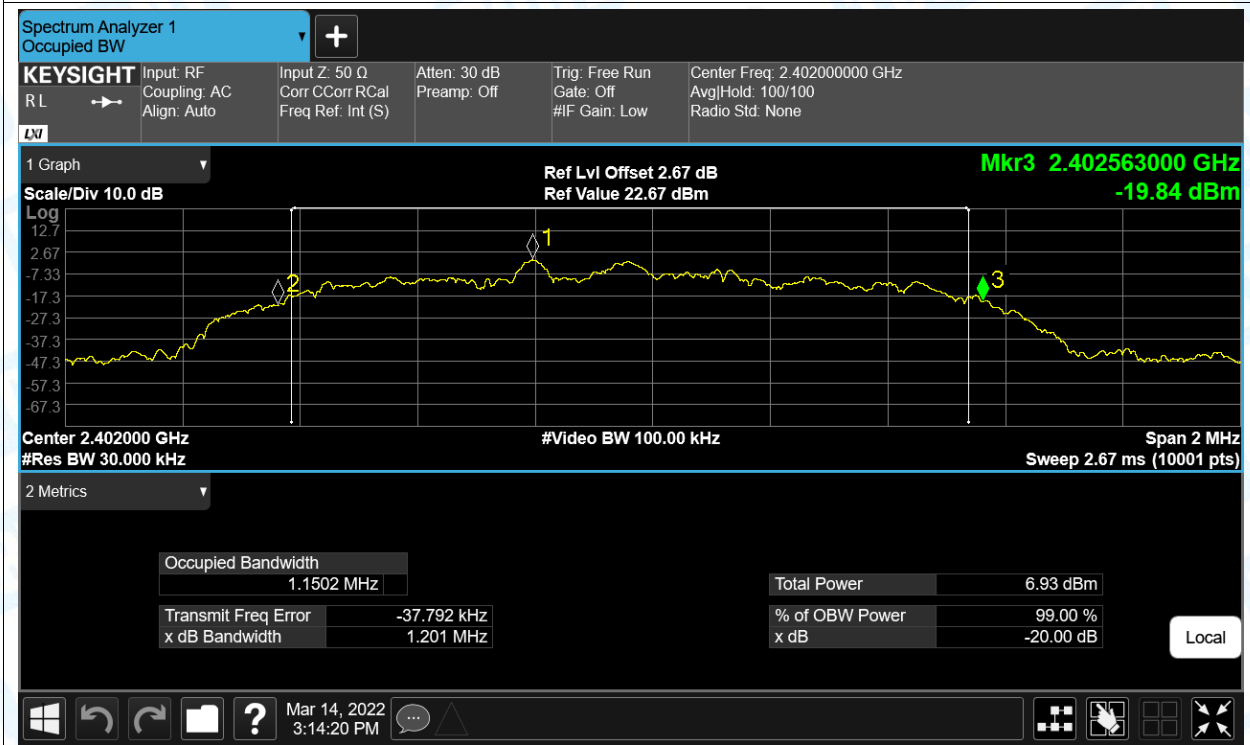
-20dB Bandwidth NVNT 2-DH1 2441MHz Ant1



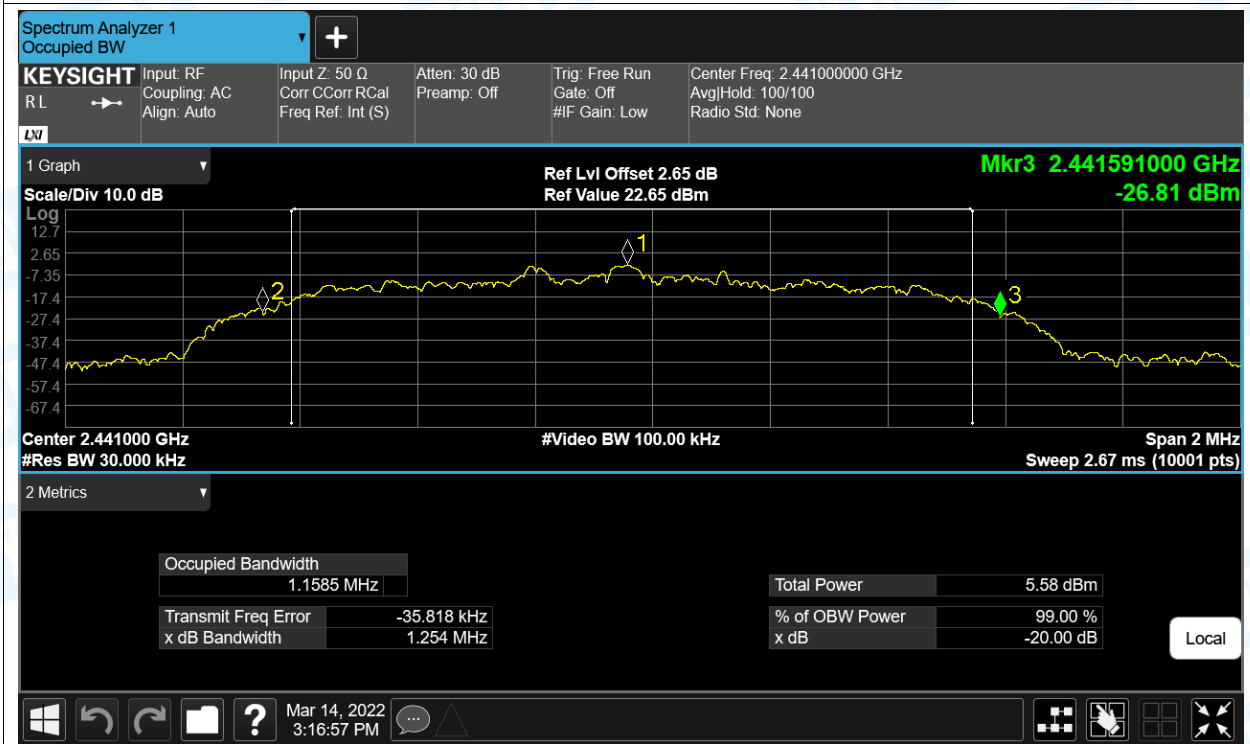
-20dB Bandwidth NVNT 2-DH1 2480MHz Ant1

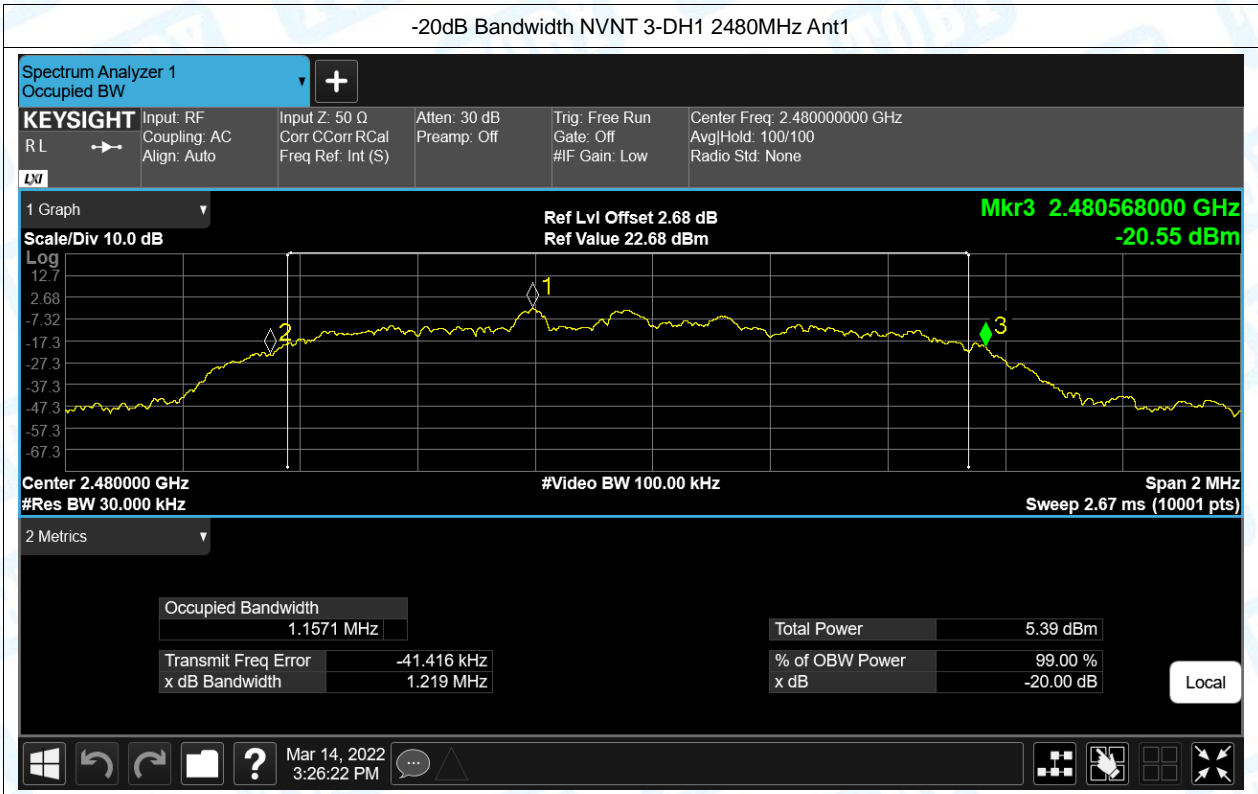


-20dB Bandwidth NVNT 3-DH1 2402MHz Ant1



-20dB Bandwidth NVNT 3-DH1 2441MHz Ant1



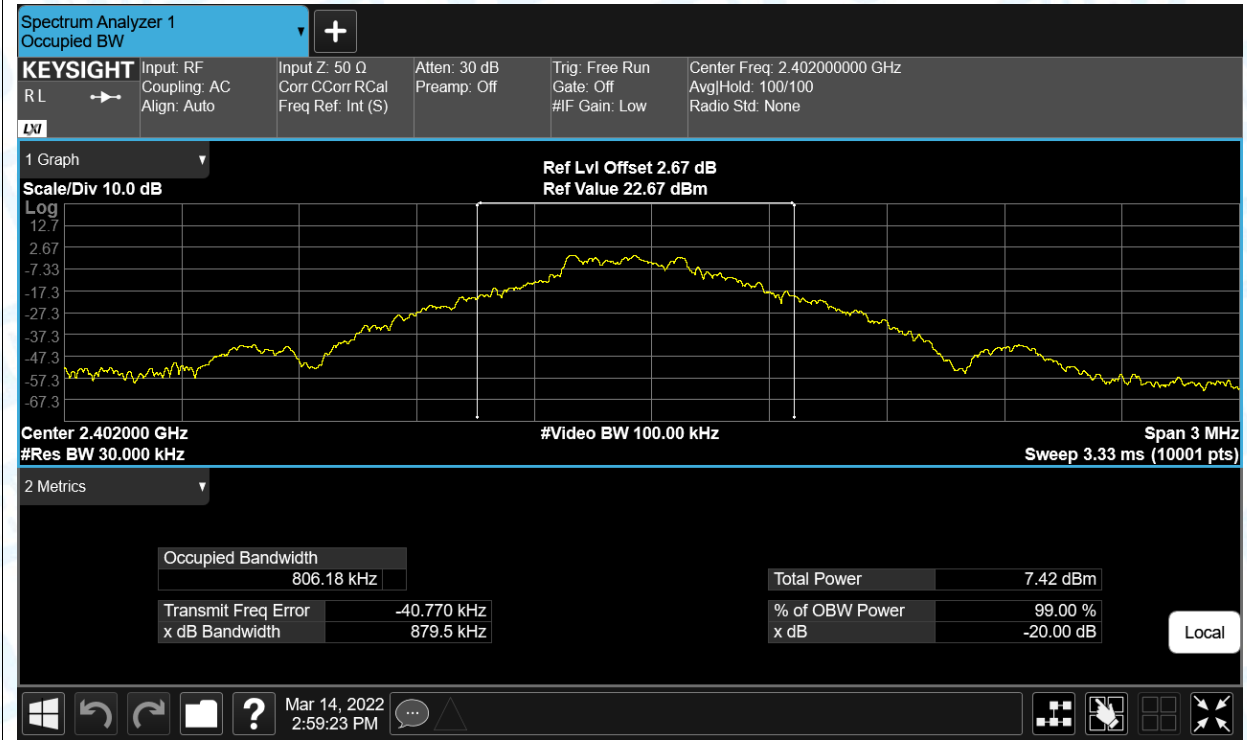


3.Occupied Channel Bandwidth

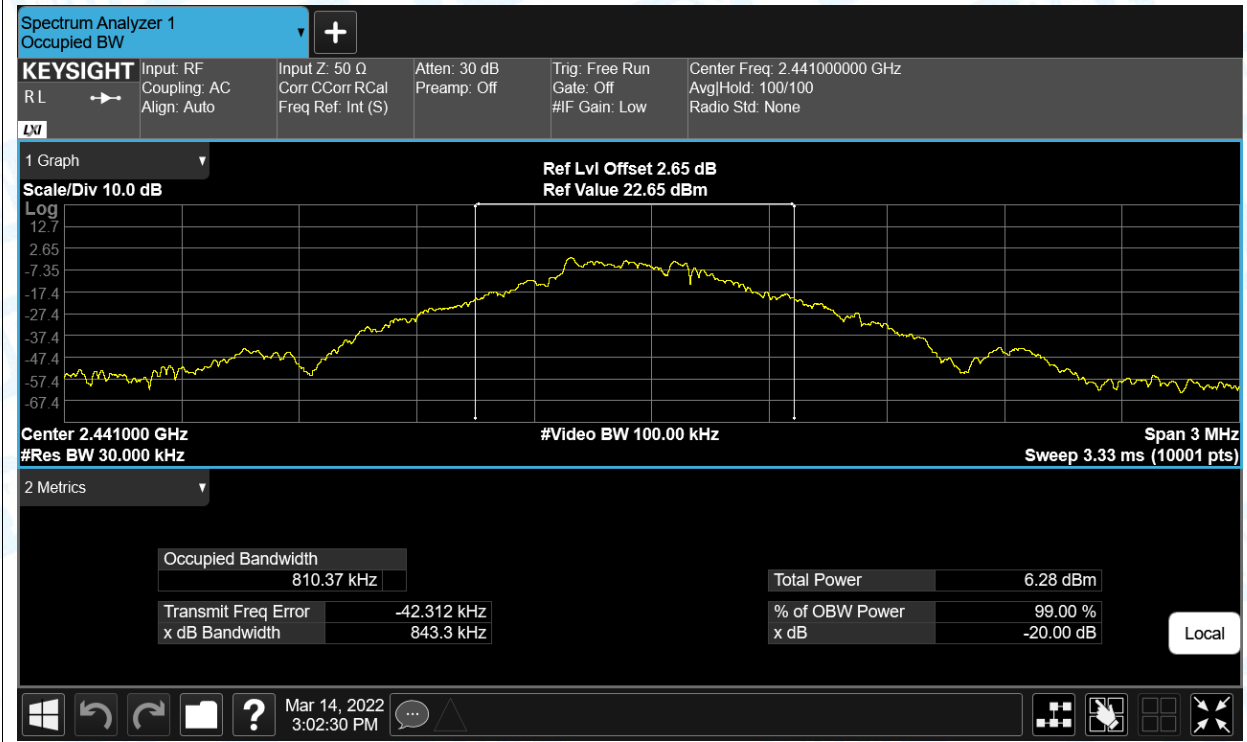
Condition	Mode	Frequency (MHz)	Antenna	99% OBW (MHz)
NVNT	1-DH1	2402	Ant1	0.806
NVNT	1-DH1	2441	Ant1	0.81
NVNT	1-DH1	2480	Ant1	0.813
NVNT	2-DH1	2402	Ant1	1.149
NVNT	2-DH1	2441	Ant1	1.168
NVNT	2-DH1	2480	Ant1	1.173
NVNT	3-DH1	2402	Ant1	1.143
NVNT	3-DH1	2441	Ant1	1.162
NVNT	3-DH1	2480	Ant1	1.152

Test Graphs

OBW NVNT 1-DH1 2402MHz Ant1



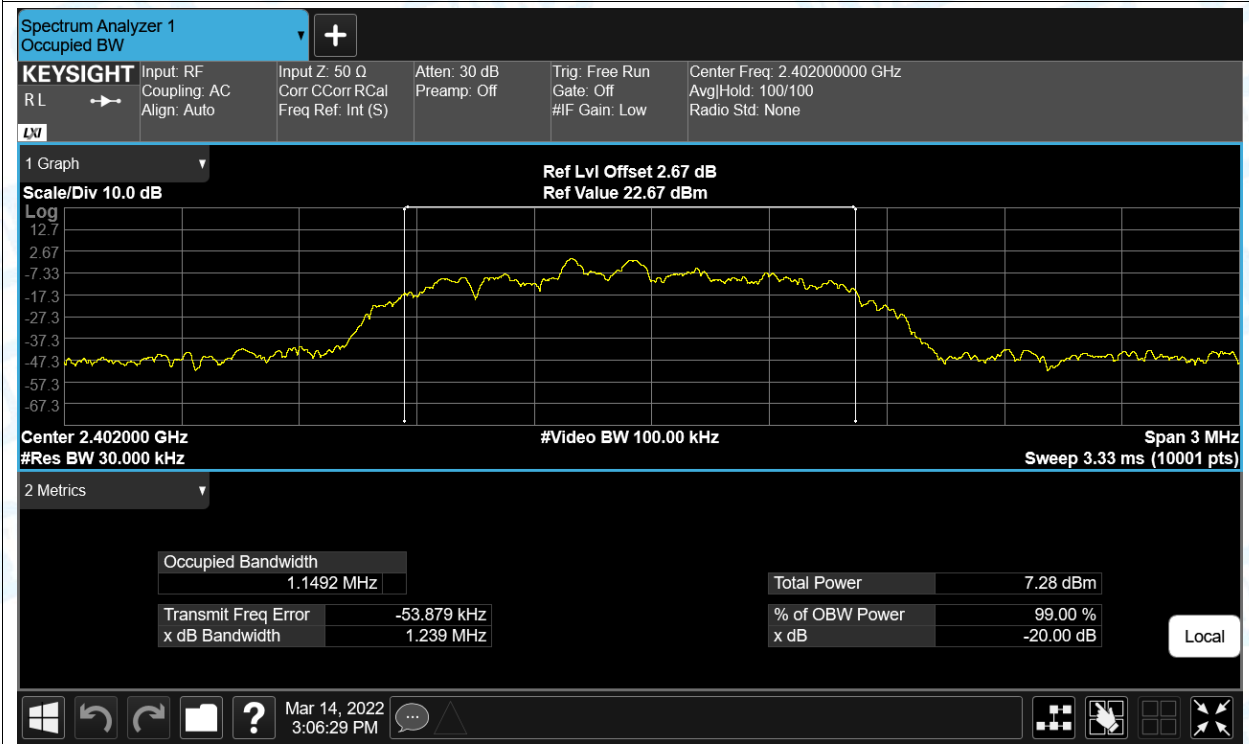
OBW NVNT 1-DH1 2441MHz Ant1

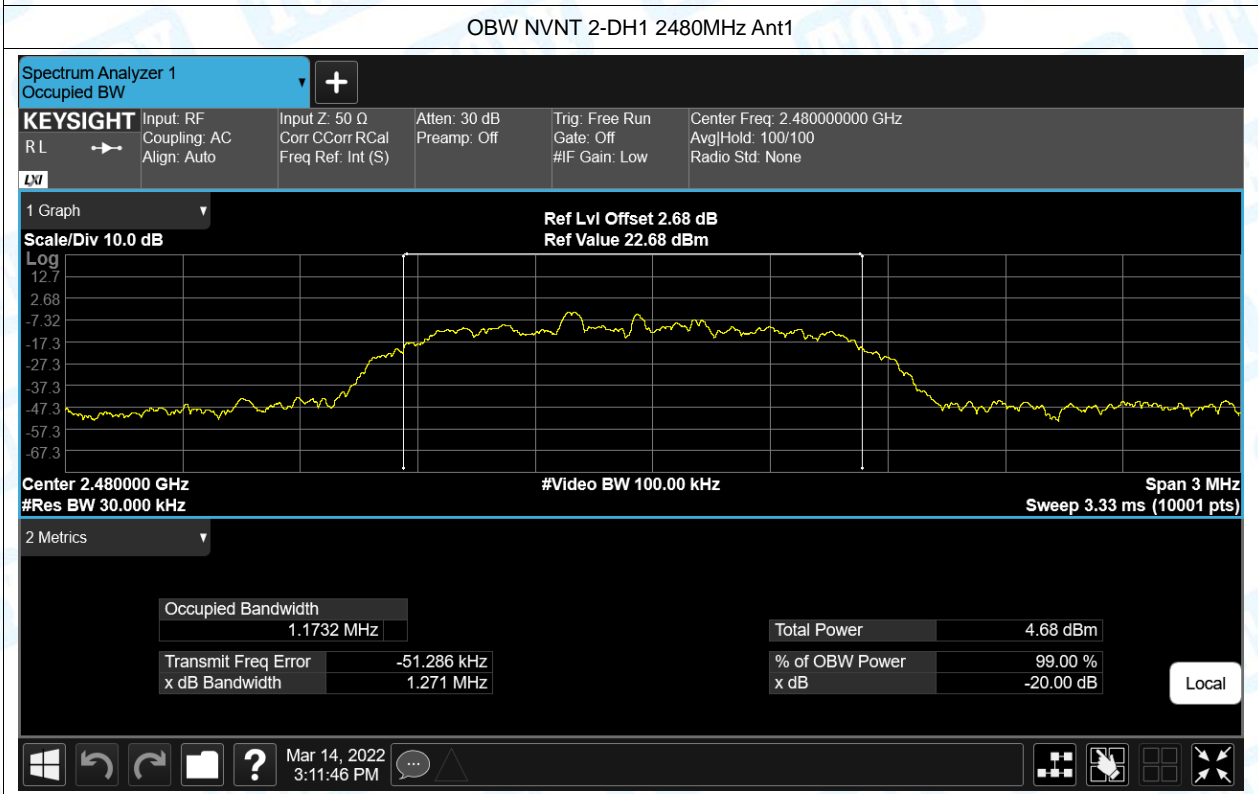
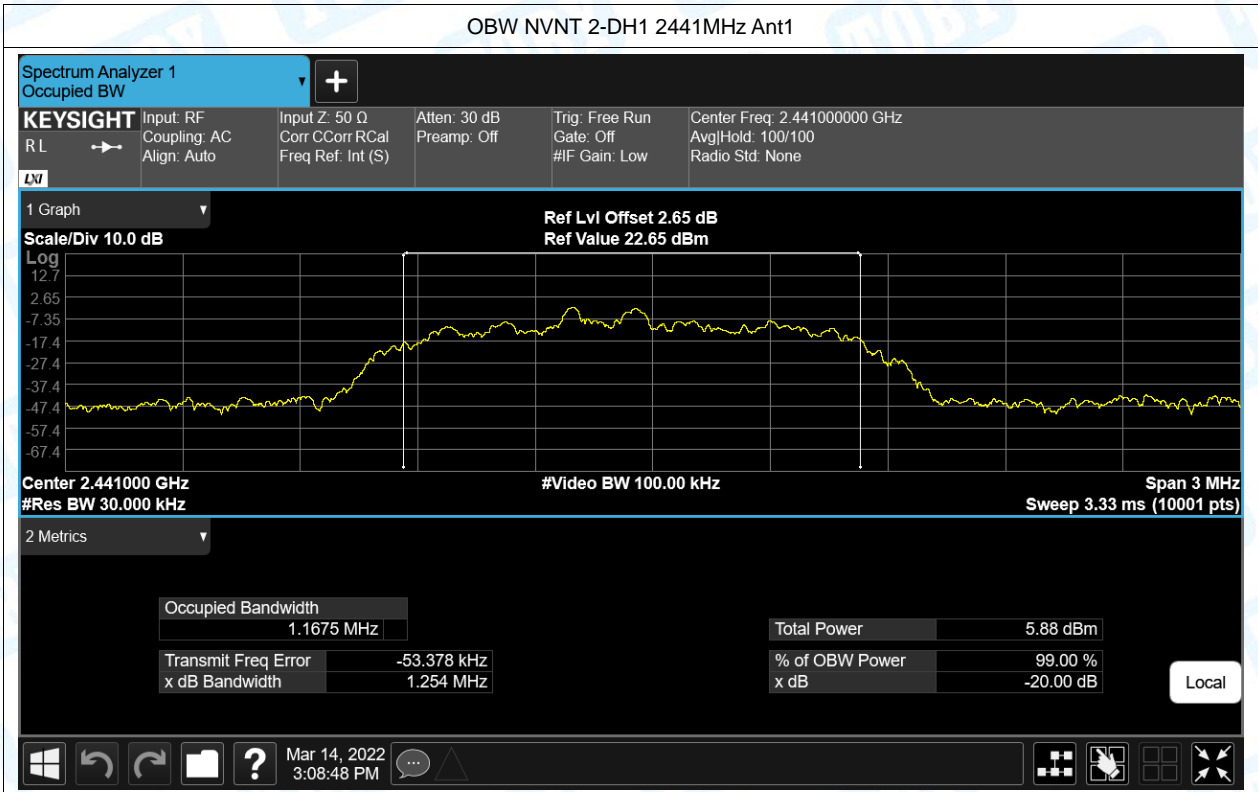


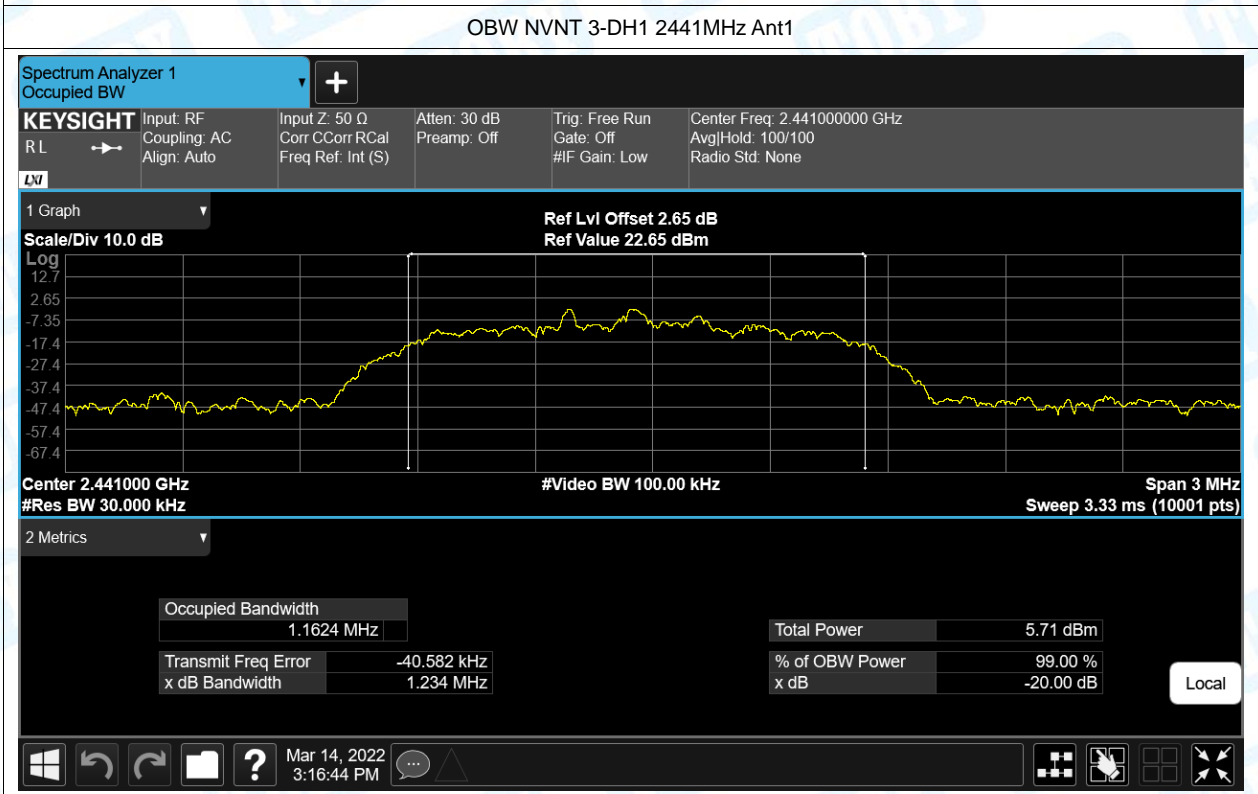
OBW NVNT 1-DH1 2480MHz Ant1

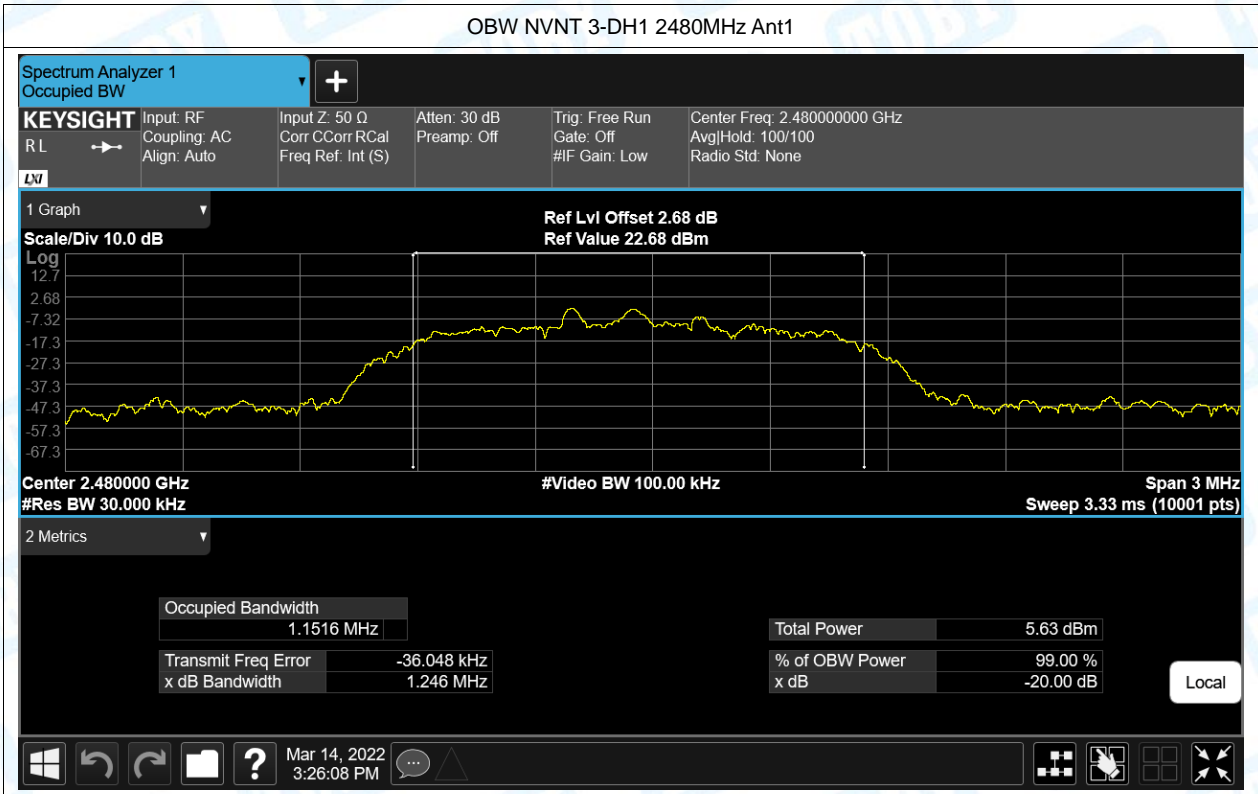


OBW NVNT 2-DH1 2402MHz Ant1







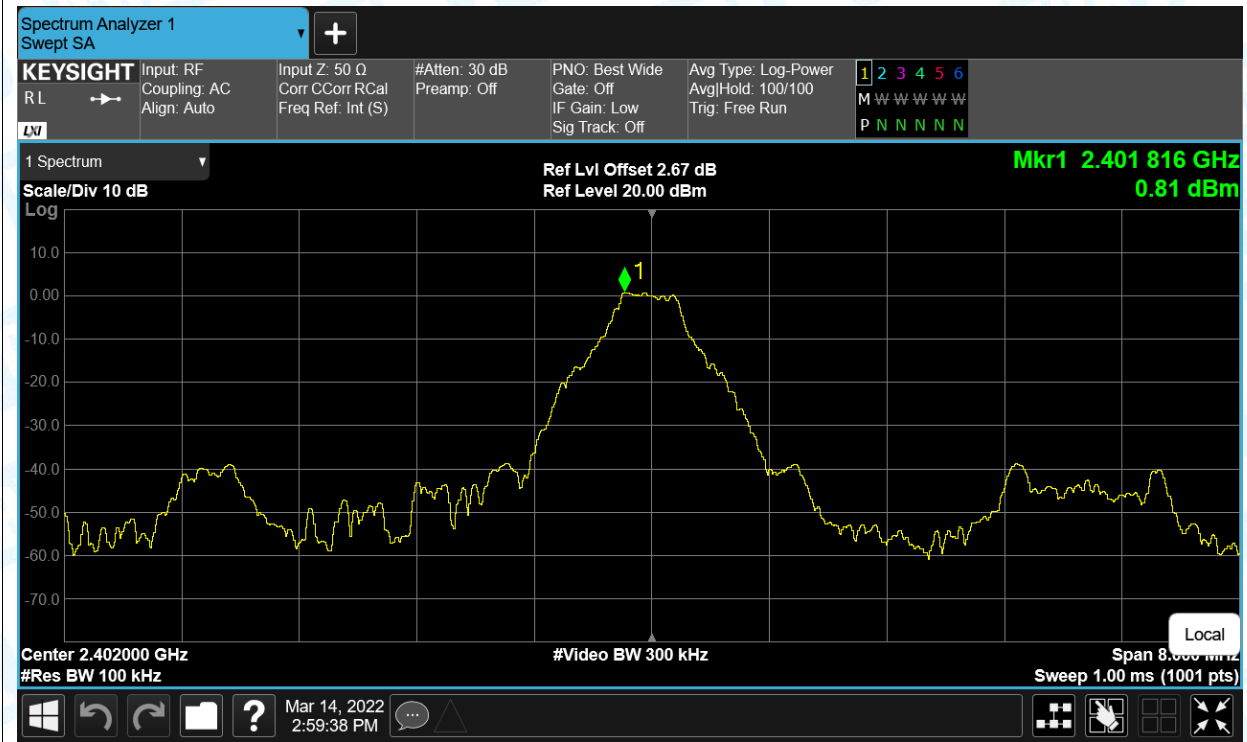


4. Band Edge

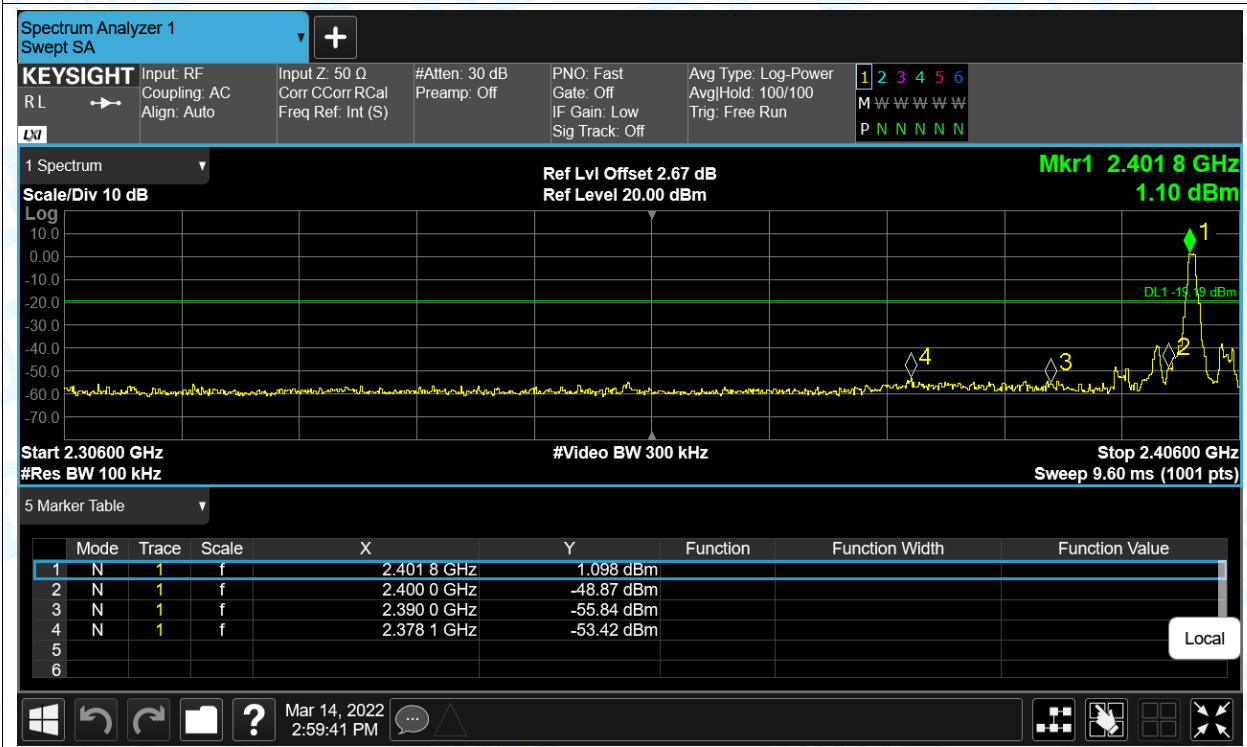
Condition	Mode	Frequency (MHz)	Antenna	Hopping Mode	Max Value (dBc)	Limit (dBc)	Verdict
NVNT	1-DH1	2402	Ant1	No-Hopping	-54.23	-20	Pass
NVNT	1-DH1	2480	Ant1	No-Hopping	-37.9	-20	Pass
NVNT	2-DH1	2402	Ant1	No-Hopping	-53.73	-20	Pass
NVNT	2-DH1	2480	Ant1	No-Hopping	-39.84	-20	Pass
NVNT	3-DH1	2402	Ant1	No-Hopping	-53.41	-20	Pass
NVNT	3-DH1	2480	Ant1	No-Hopping	-39.15	-20	Pass

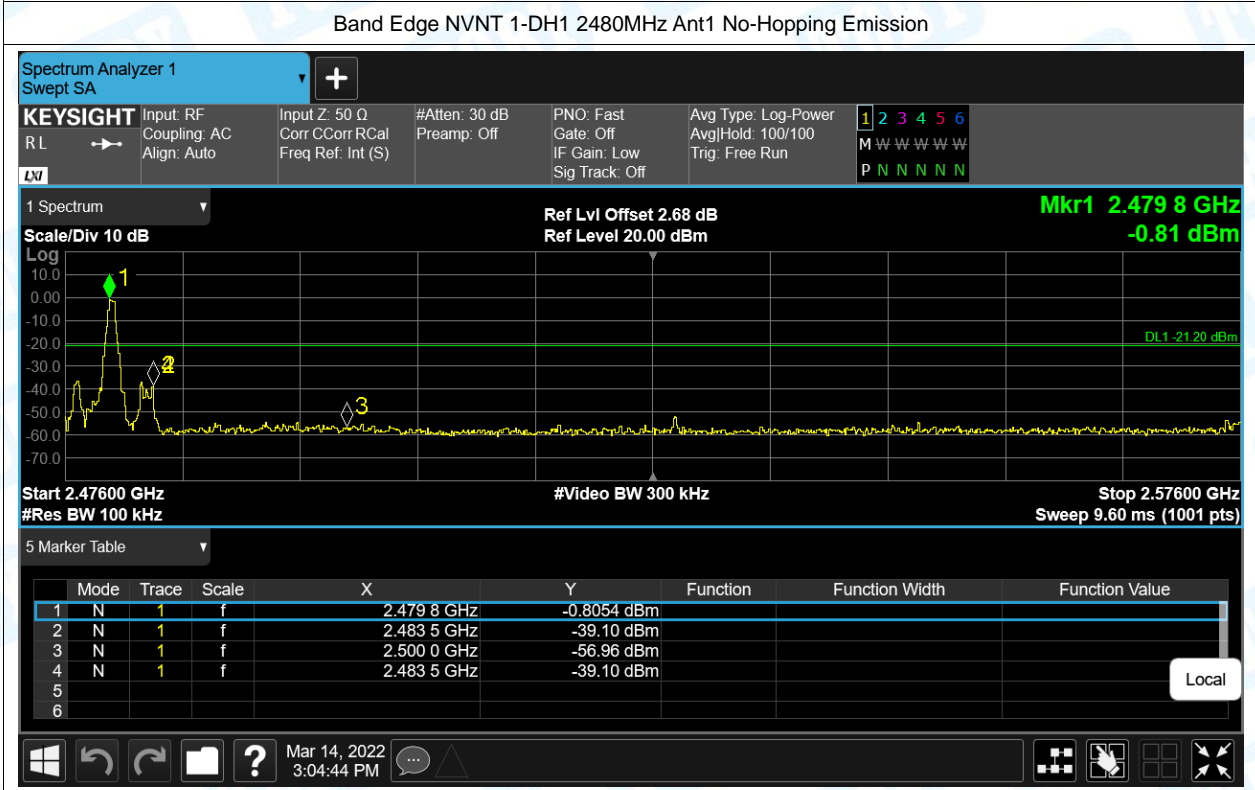
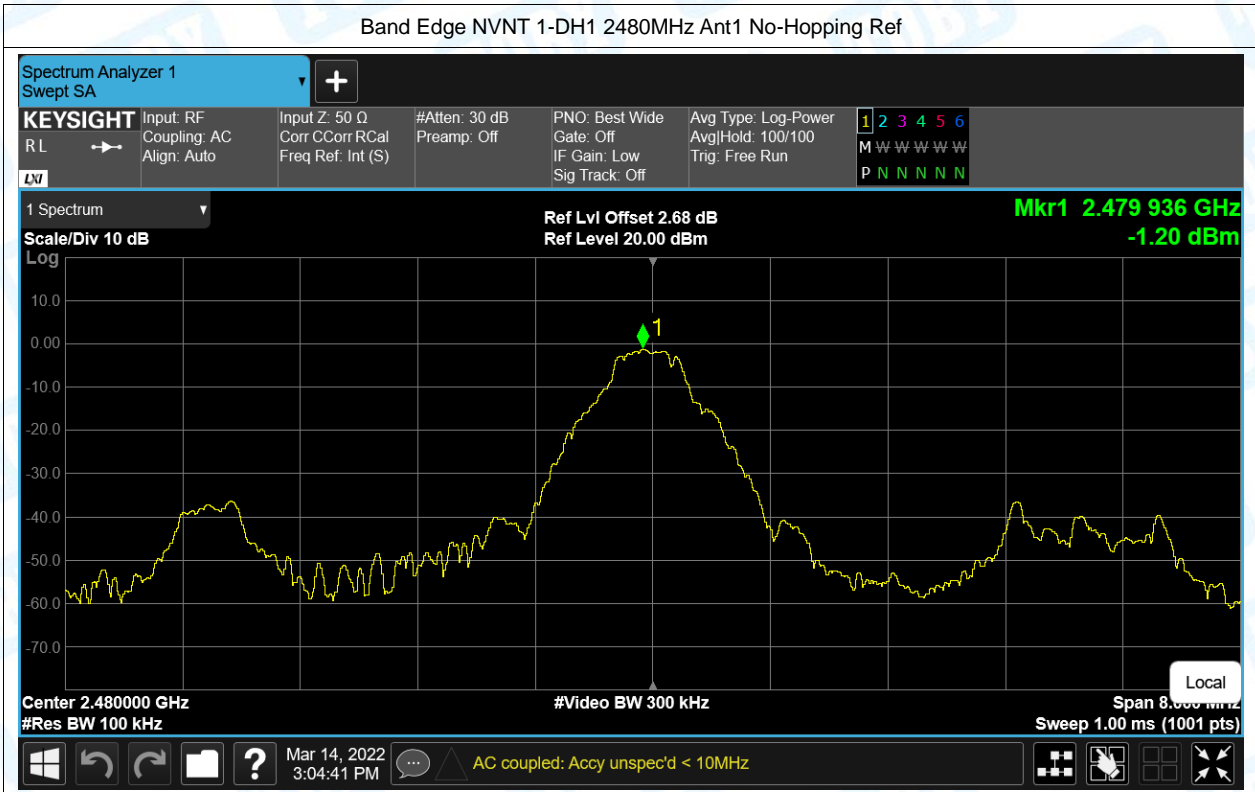
Test Graphs

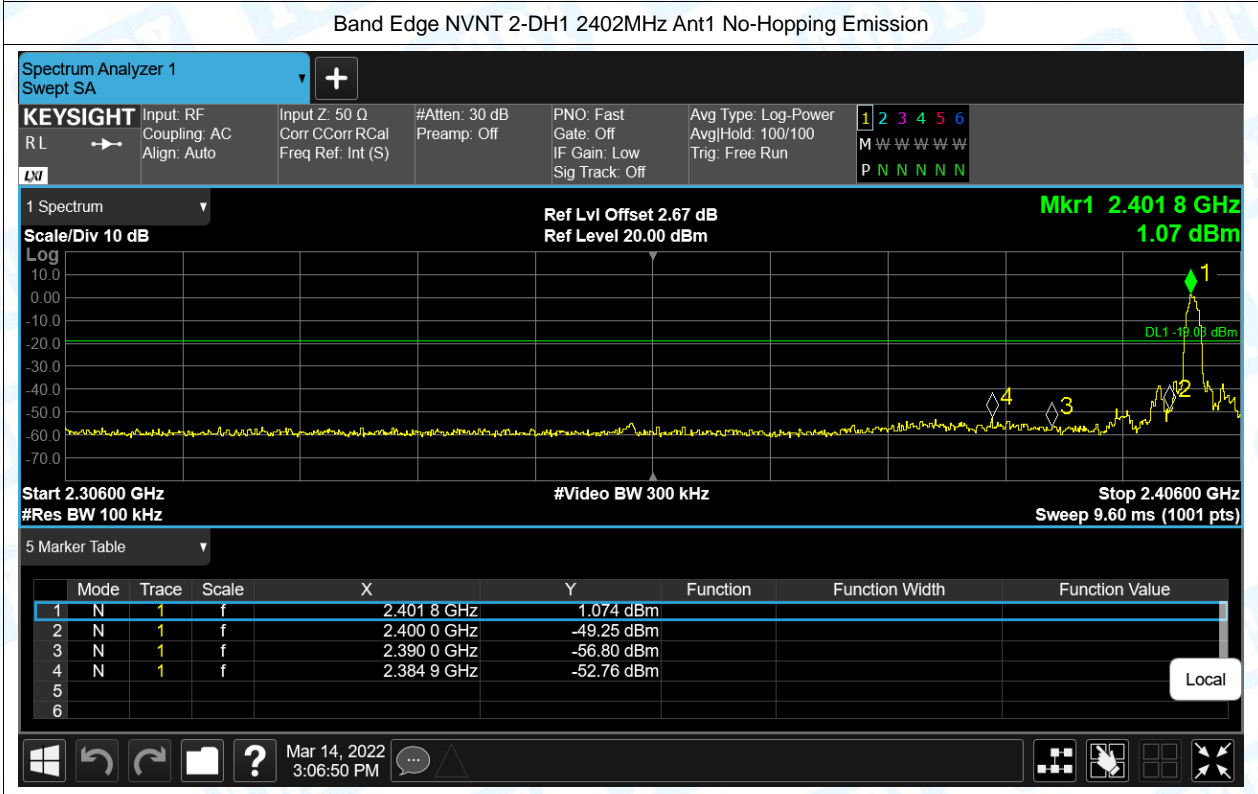
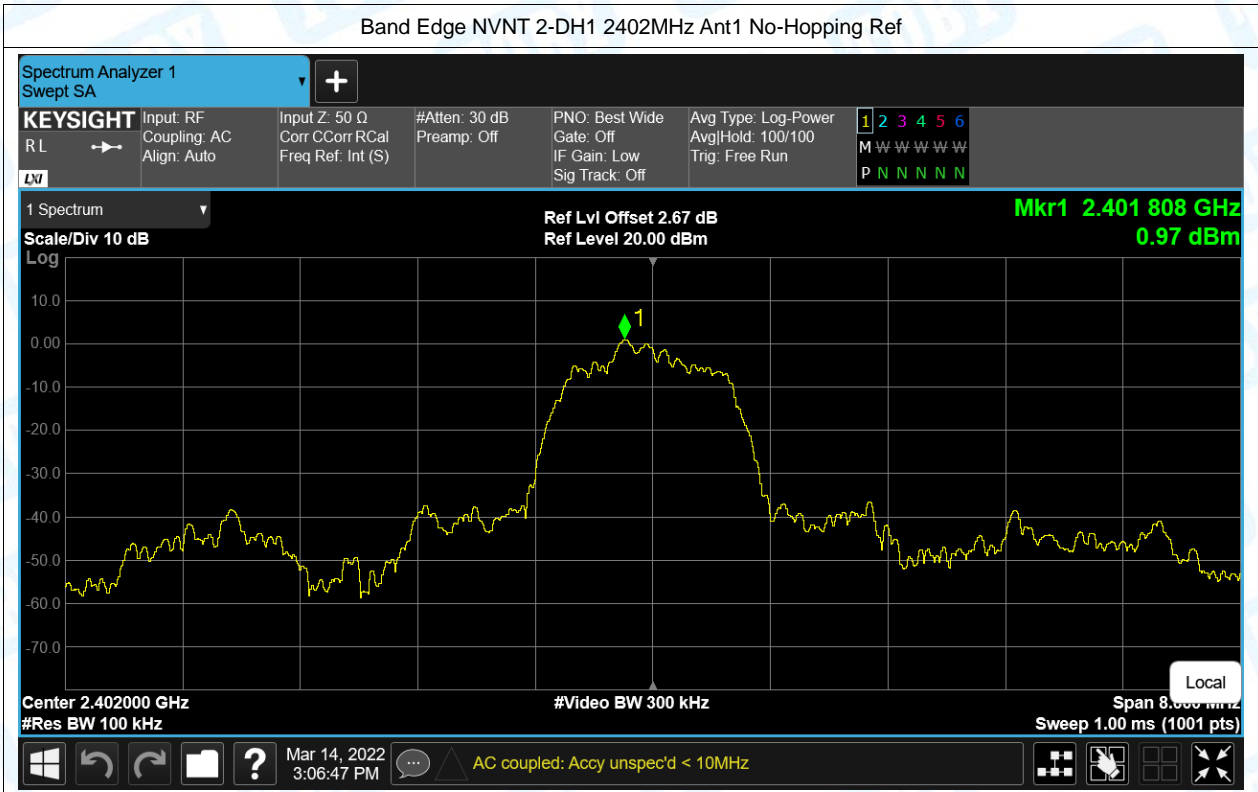
Band Edge NVNT 1-DH1 2402MHz Ant1 No-Hopping Ref

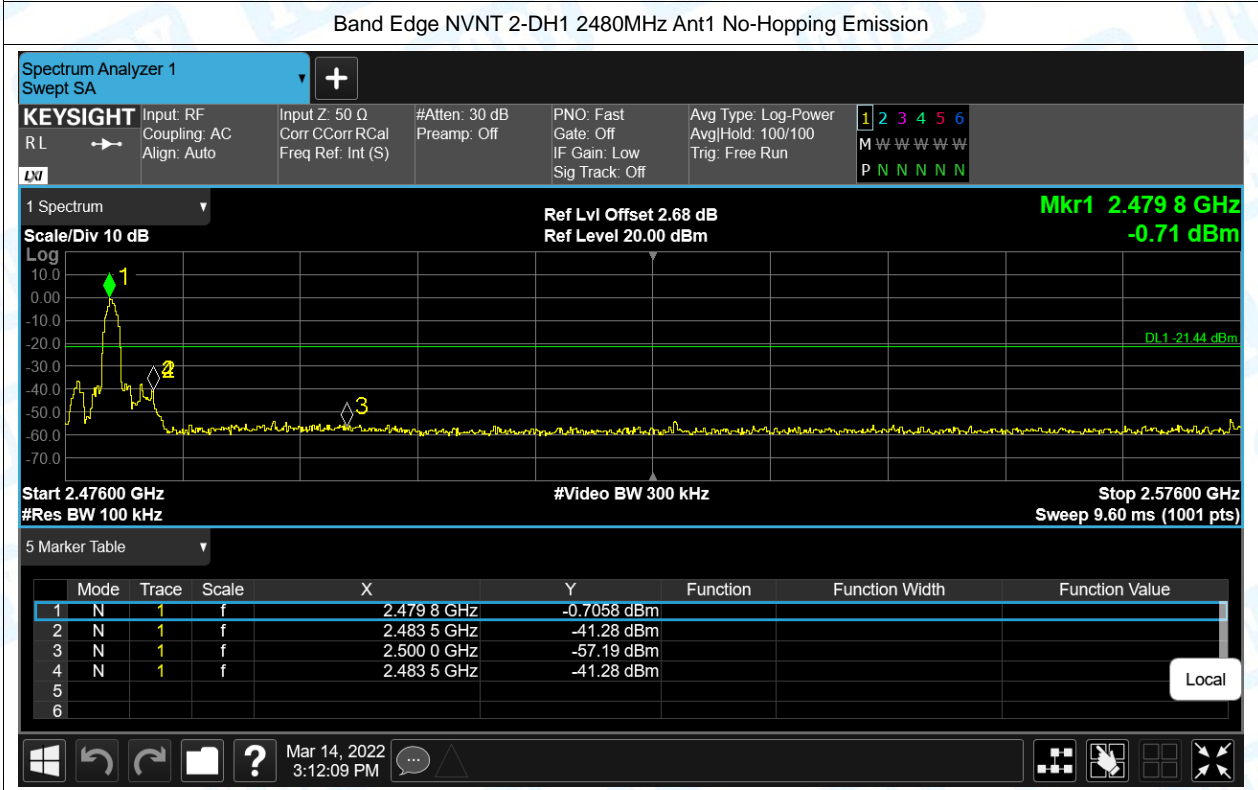
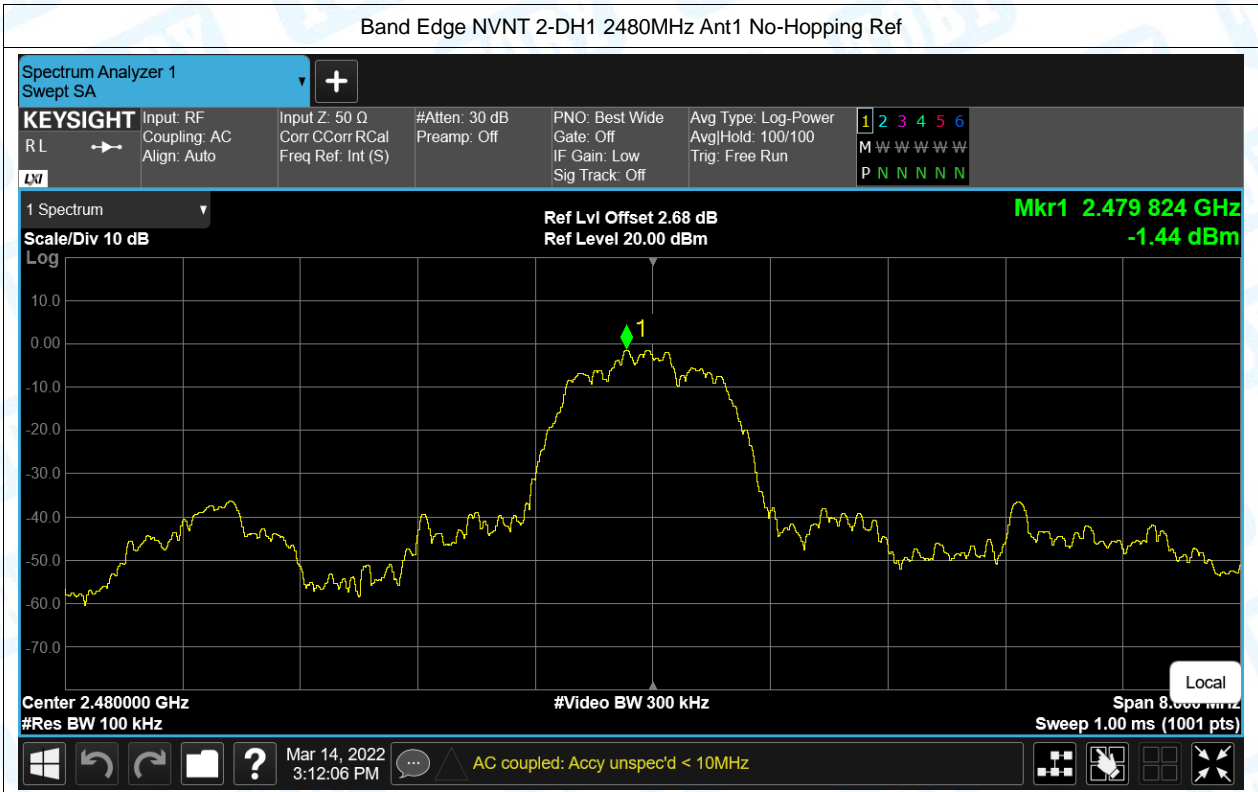


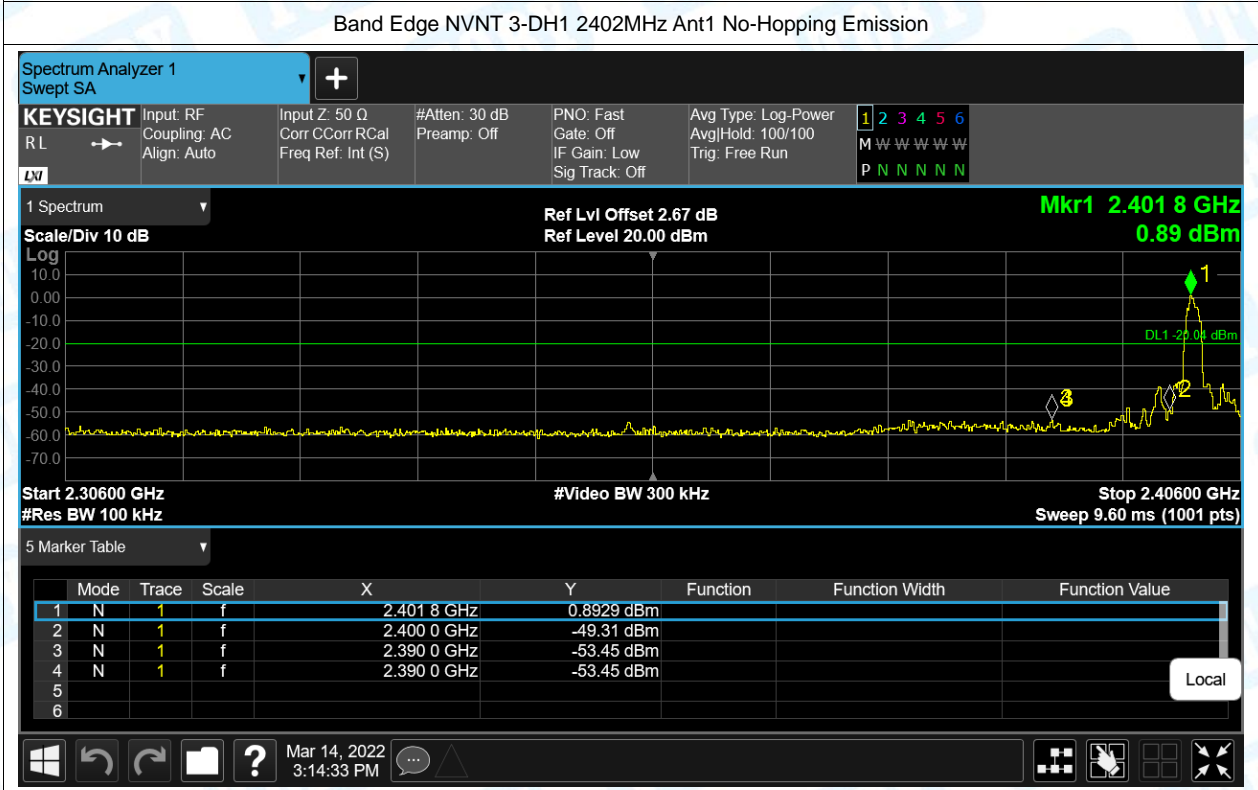
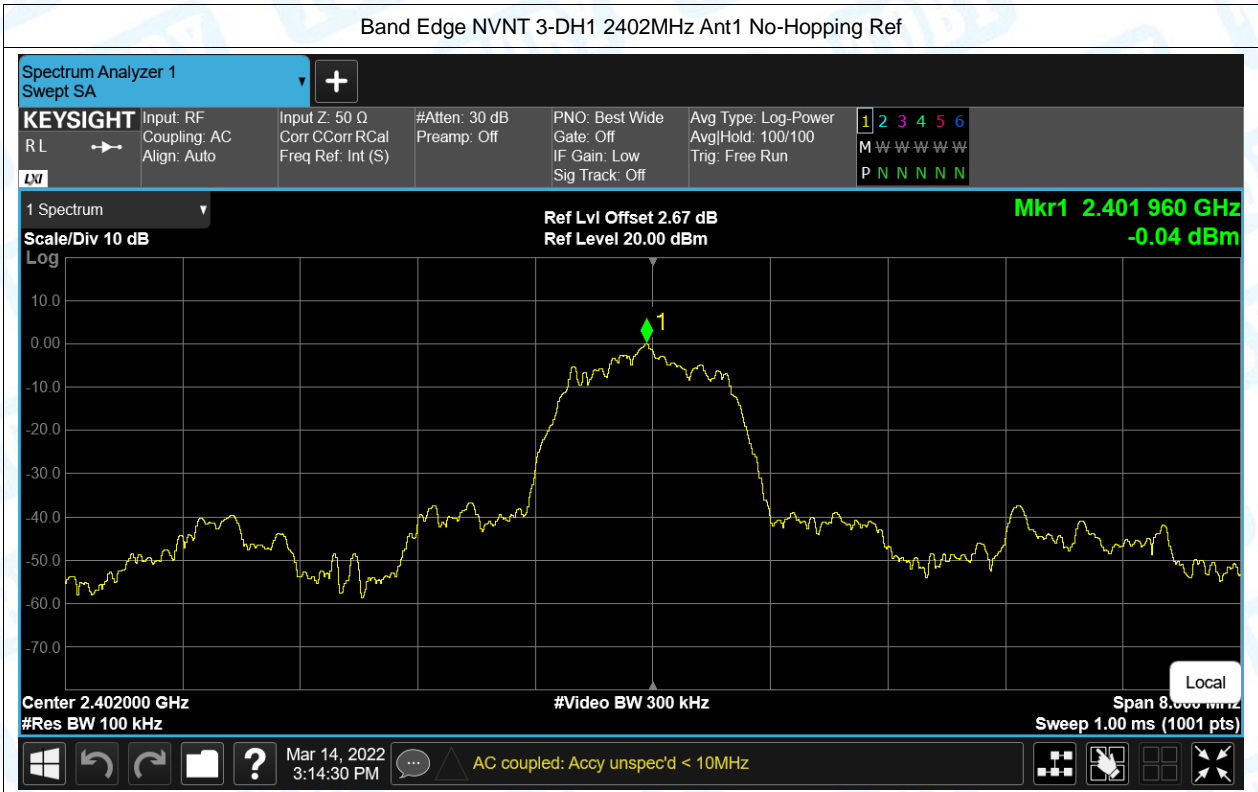
Band Edge NVNT 1-DH1 2402MHz Ant1 No-Hopping Emission

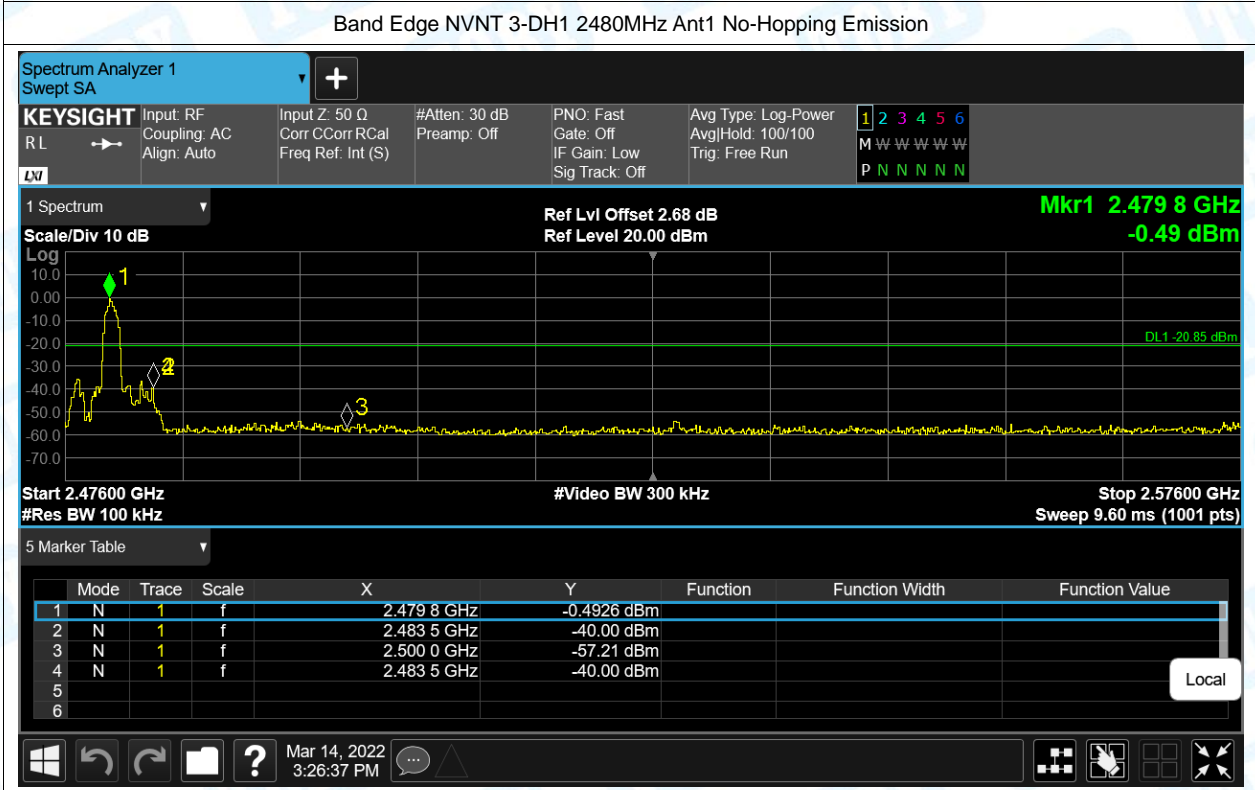
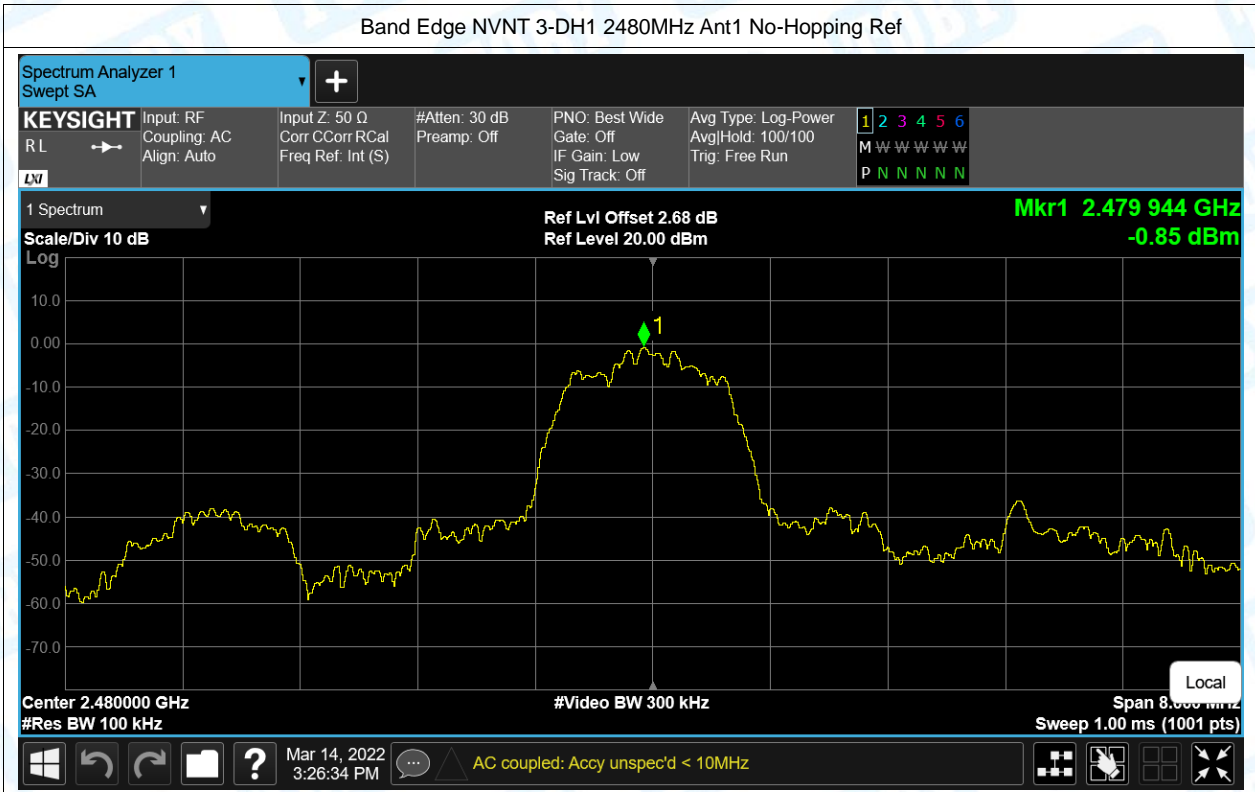










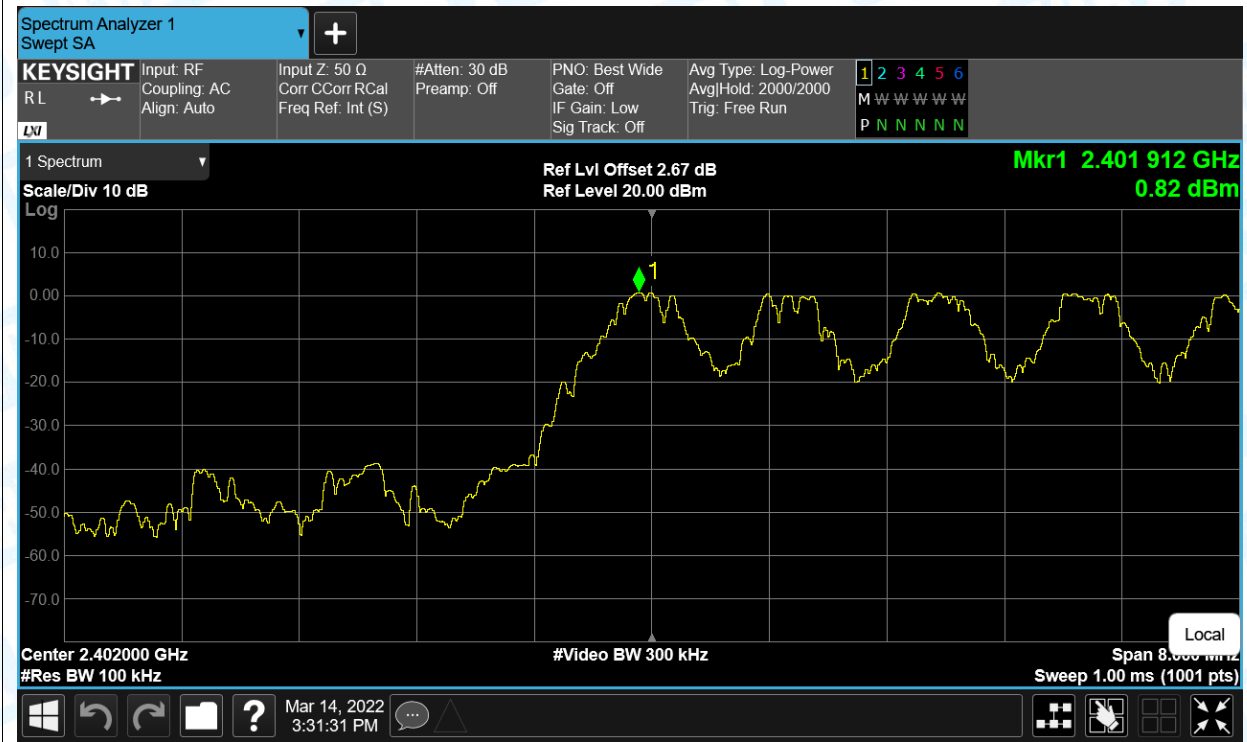


5.Band Edge(Hopping)

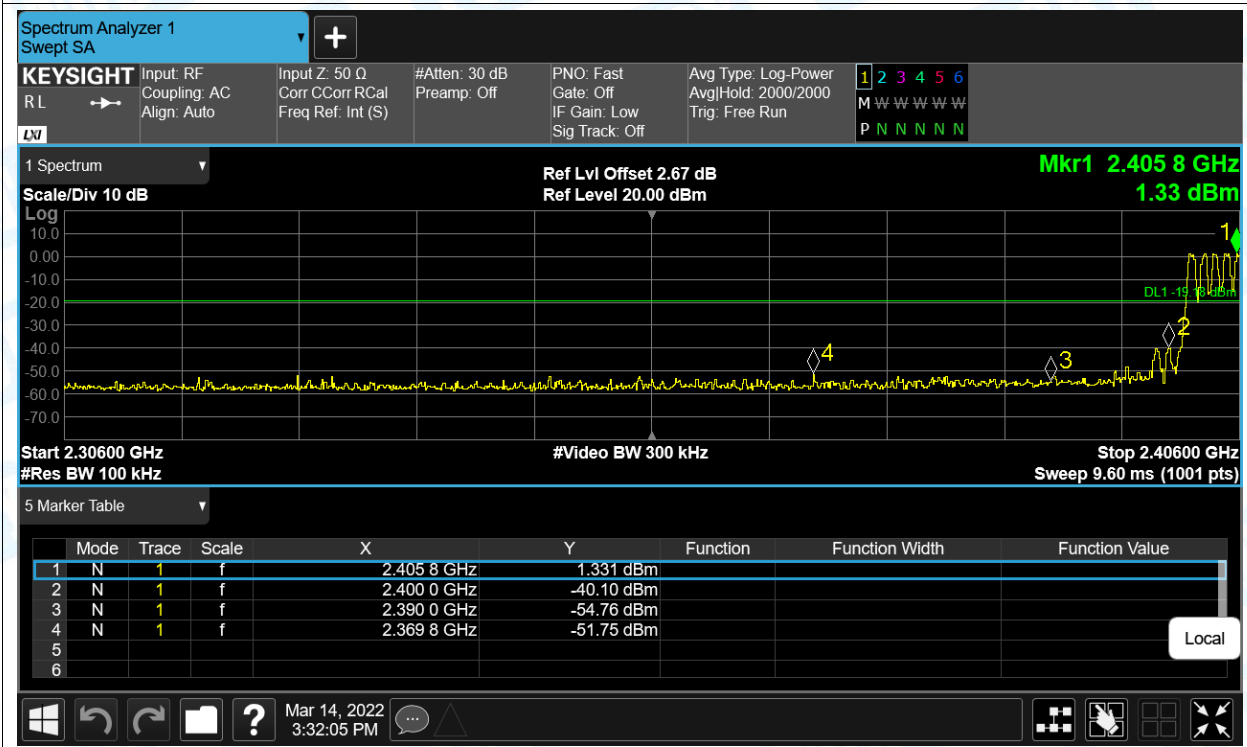
Condition	Mode	Frequency (MHz)	Antenna	Hopping Mode	Max Value (dBc)	Limit (dBc)	Verdict
NVNT	1-DH1	2402	Ant1	Hopping	-52.57	-20	Pass
NVNT	1-DH1	2480	Ant1	Hopping	-43.04	-20	Pass
NVNT	2-DH1	2402	Ant1	Hopping	-52.47	-20	Pass
NVNT	2-DH1	2480	Ant1	Hopping	-42.39	-20	Pass
NVNT	3-DH1	2402	Ant1	Hopping	-53.37	-20	Pass
NVNT	3-DH1	2480	Ant1	Hopping	-44.69	-20	Pass

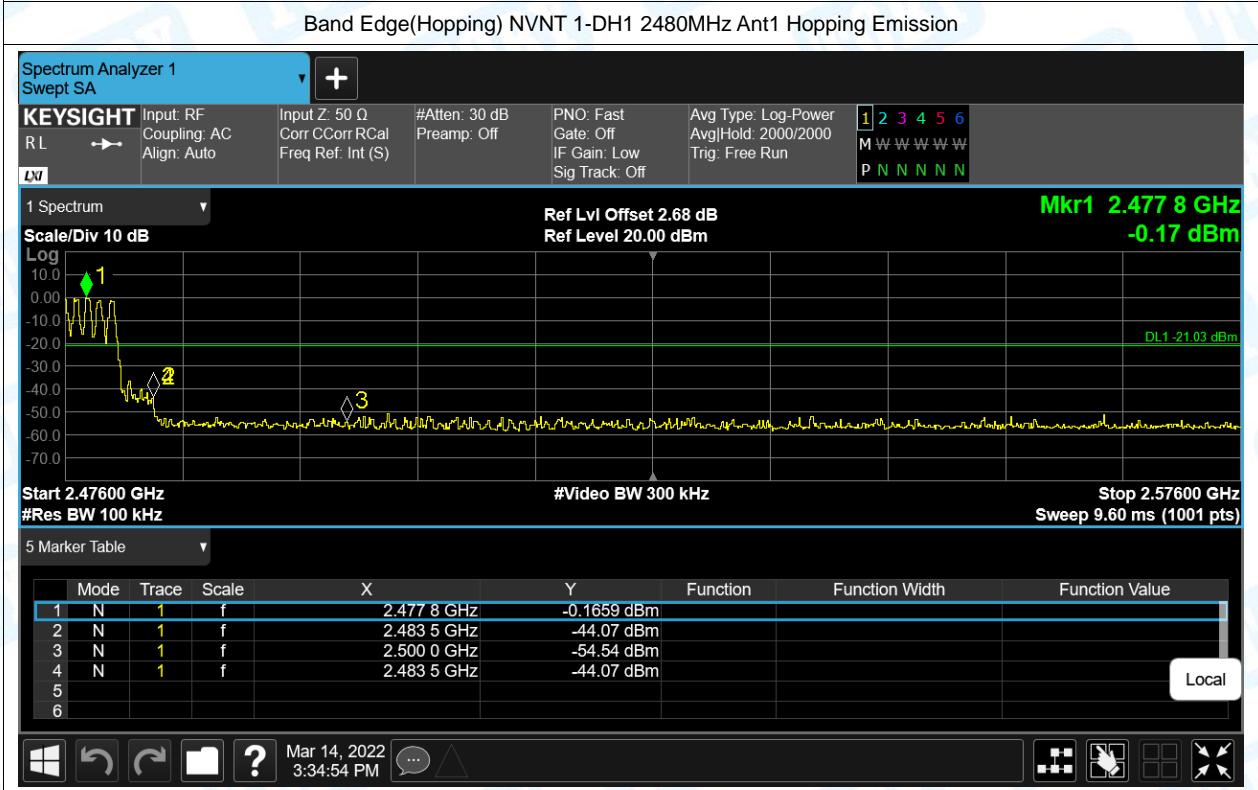
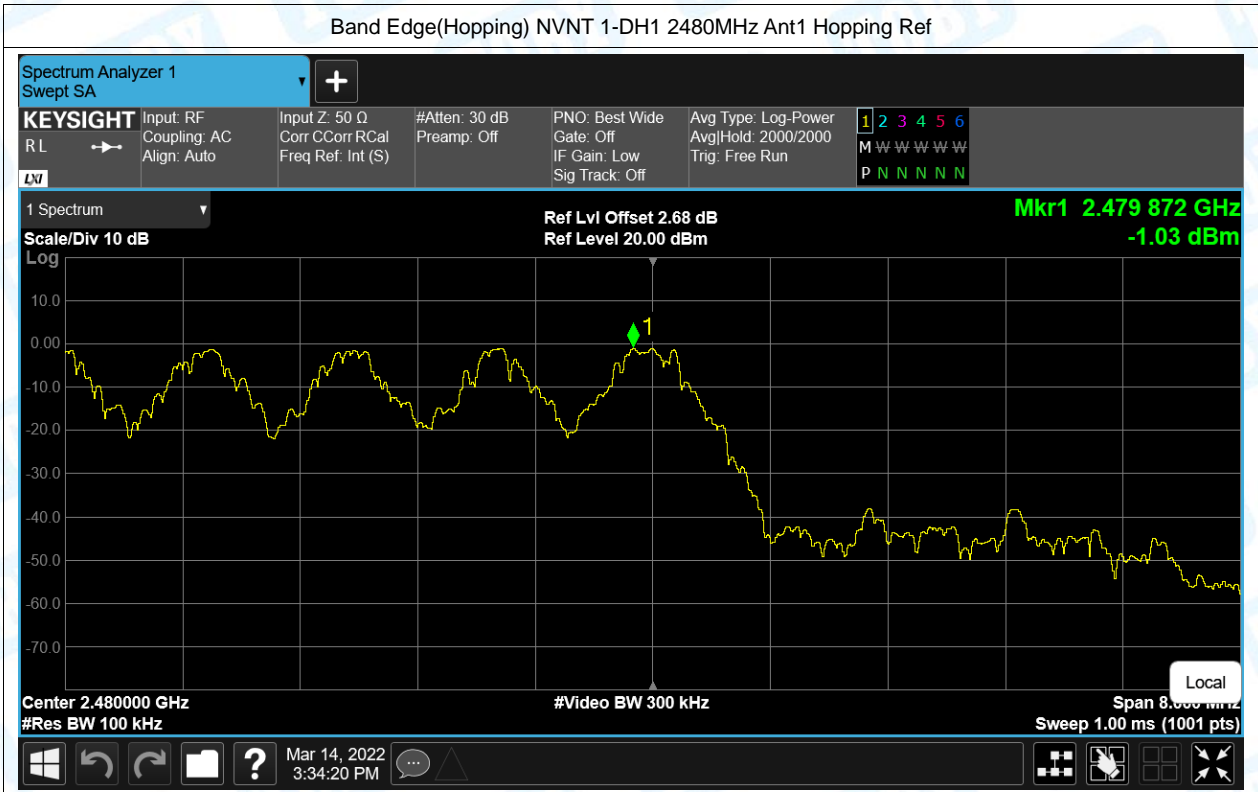
Test Graphs

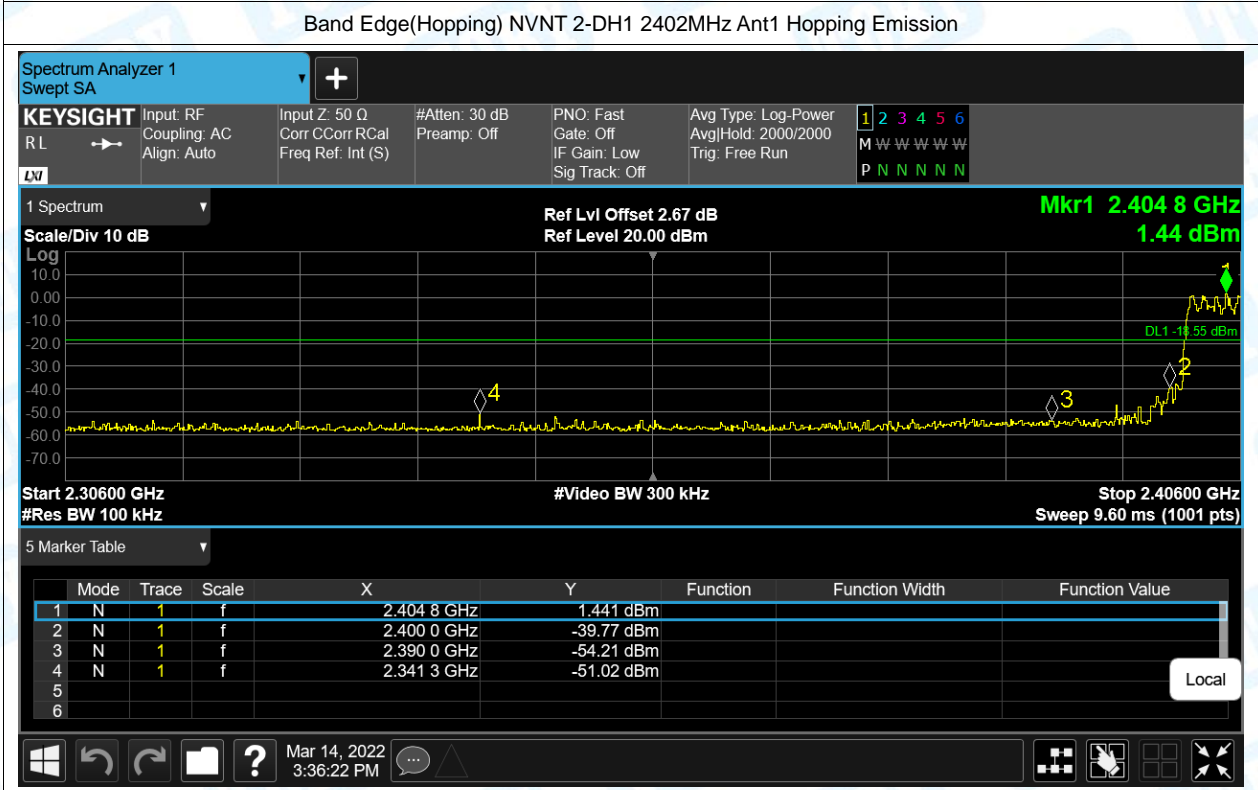
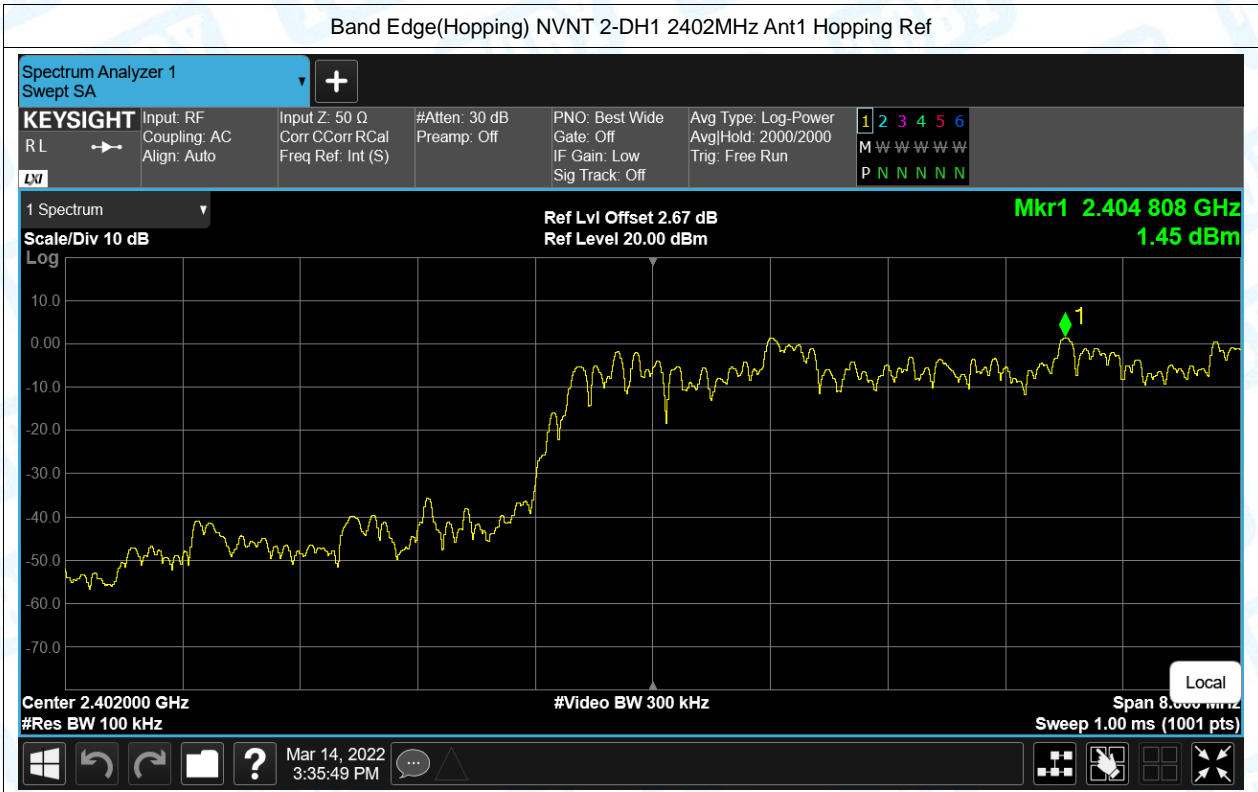
Band Edge(Hopping) NVNT 1-DH1 2402MHz Ant1 Hopping Ref

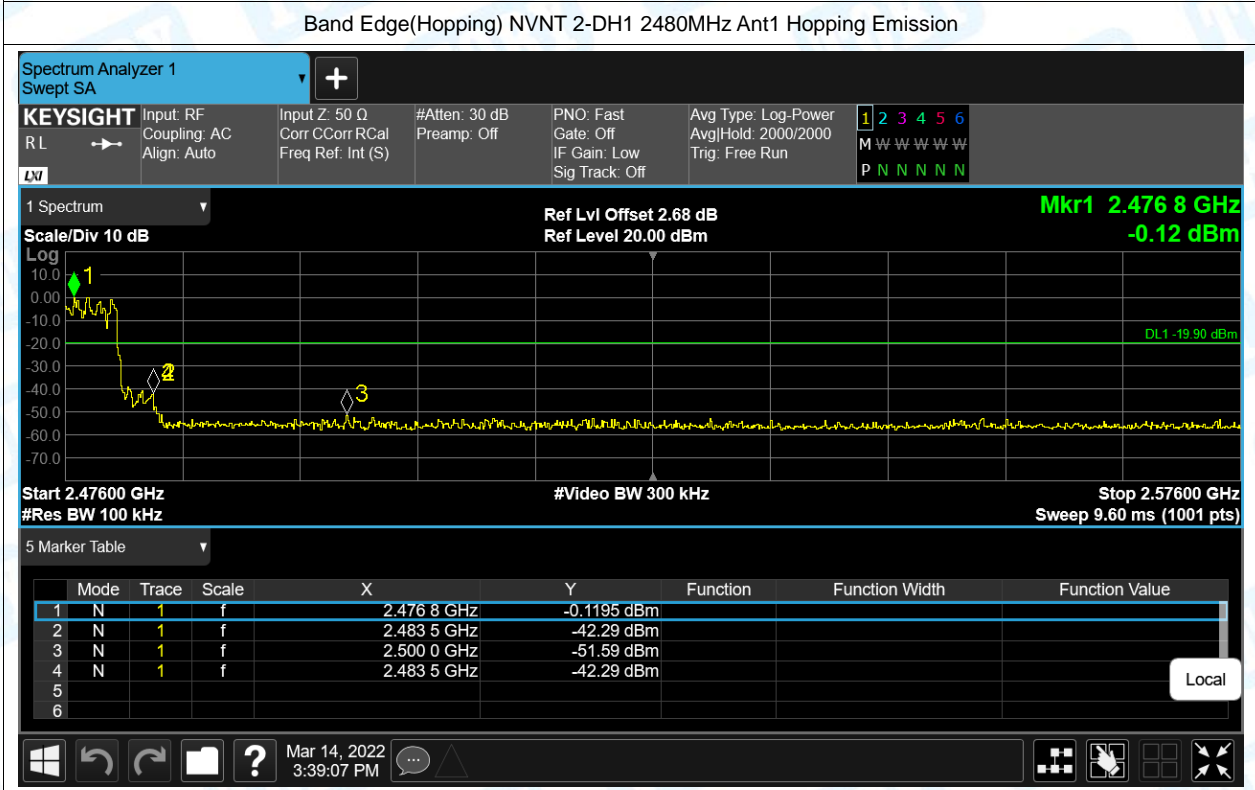
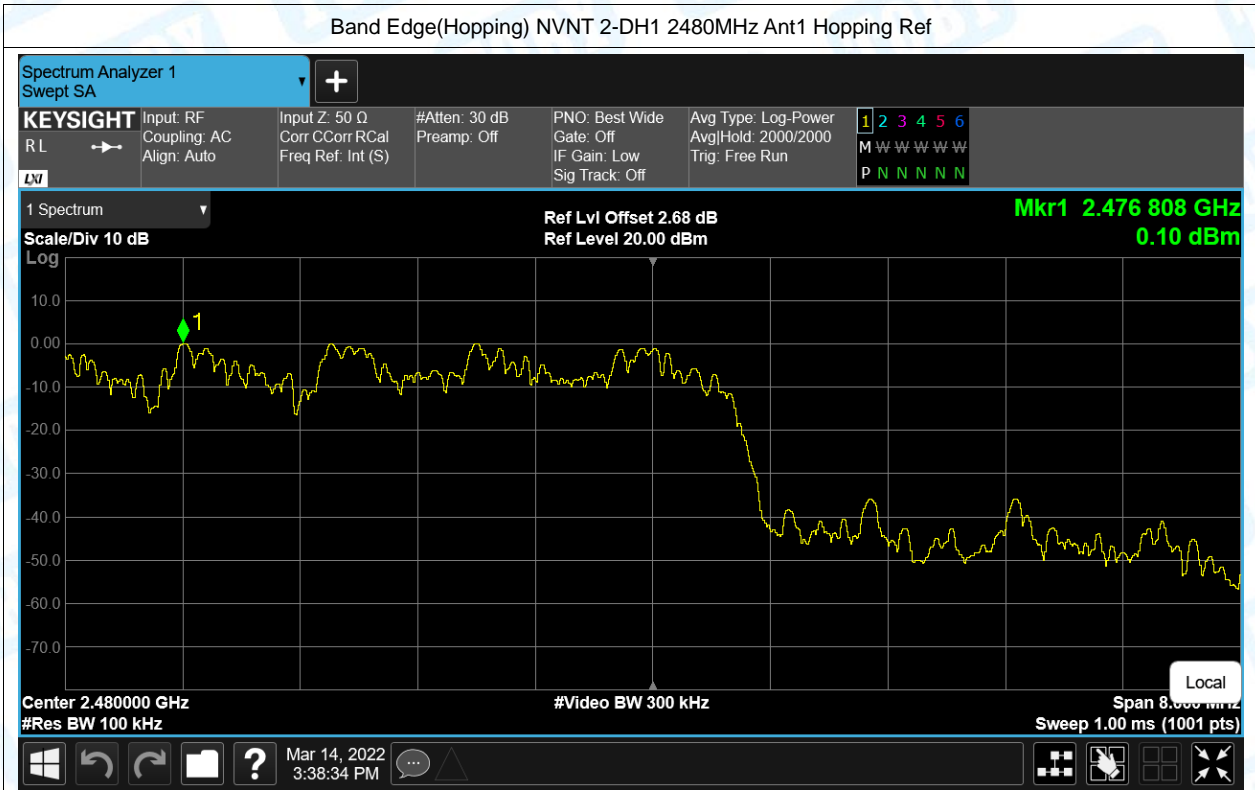


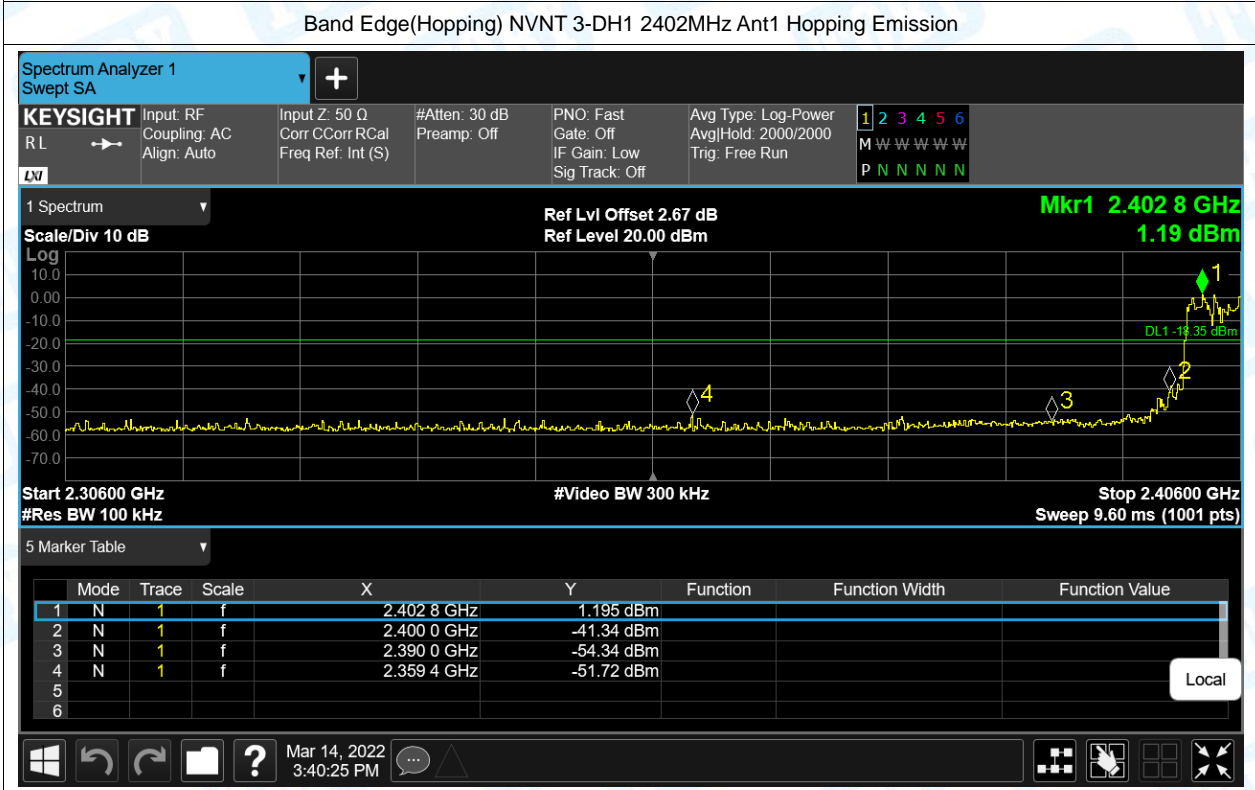
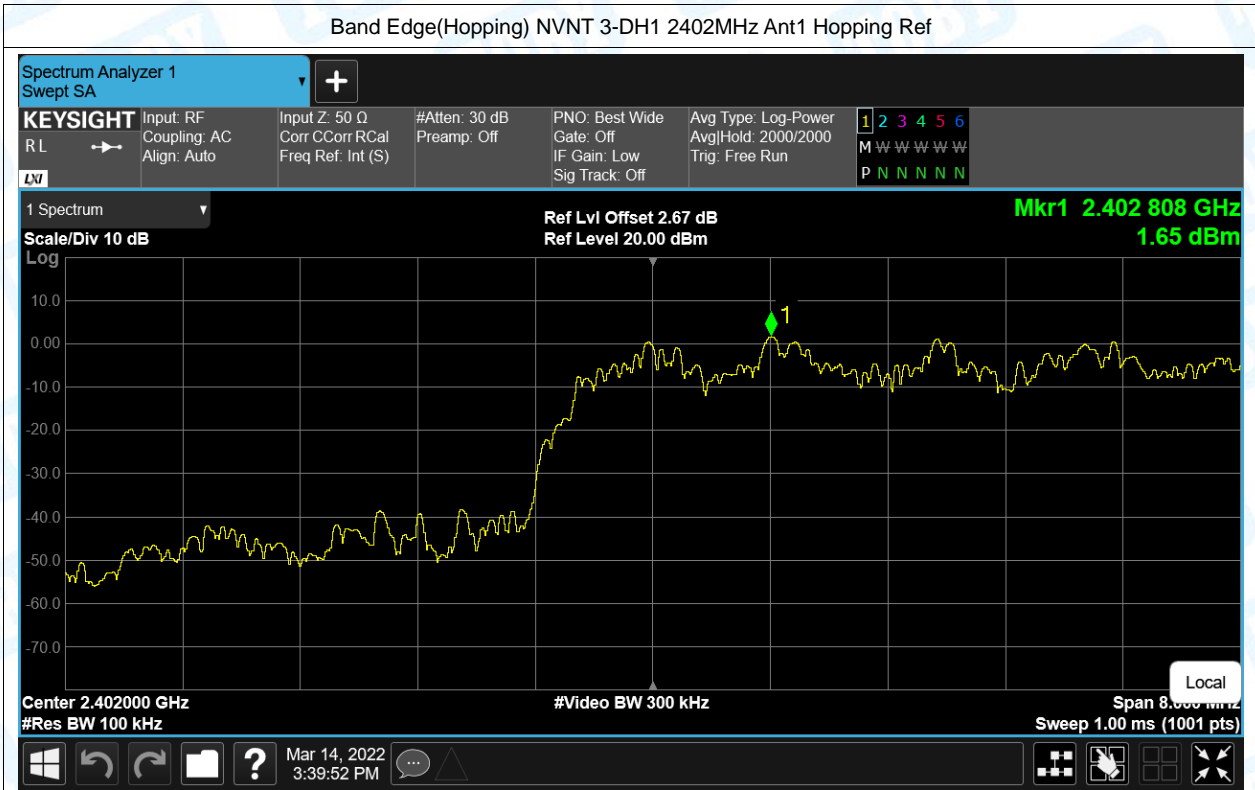
Band Edge(Hopping) NVNT 1-DH1 2402MHz Ant1 Hopping Emission

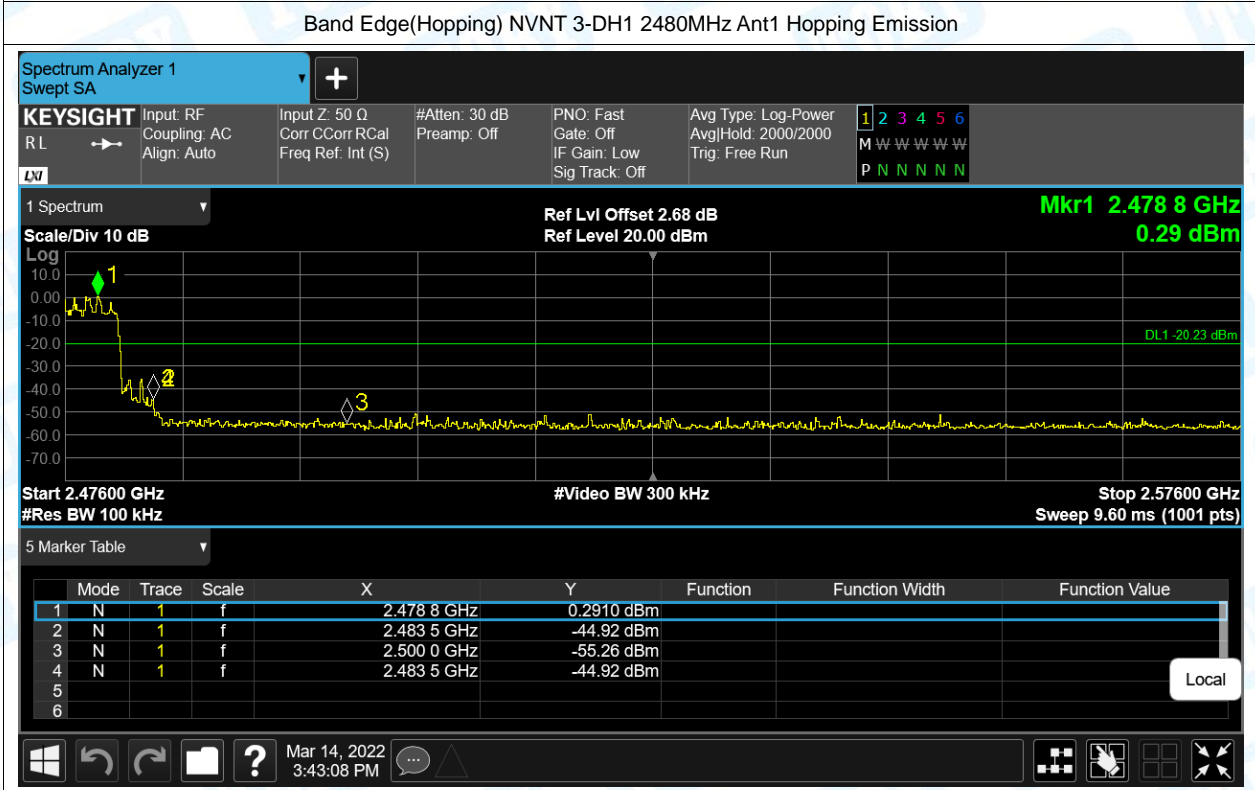
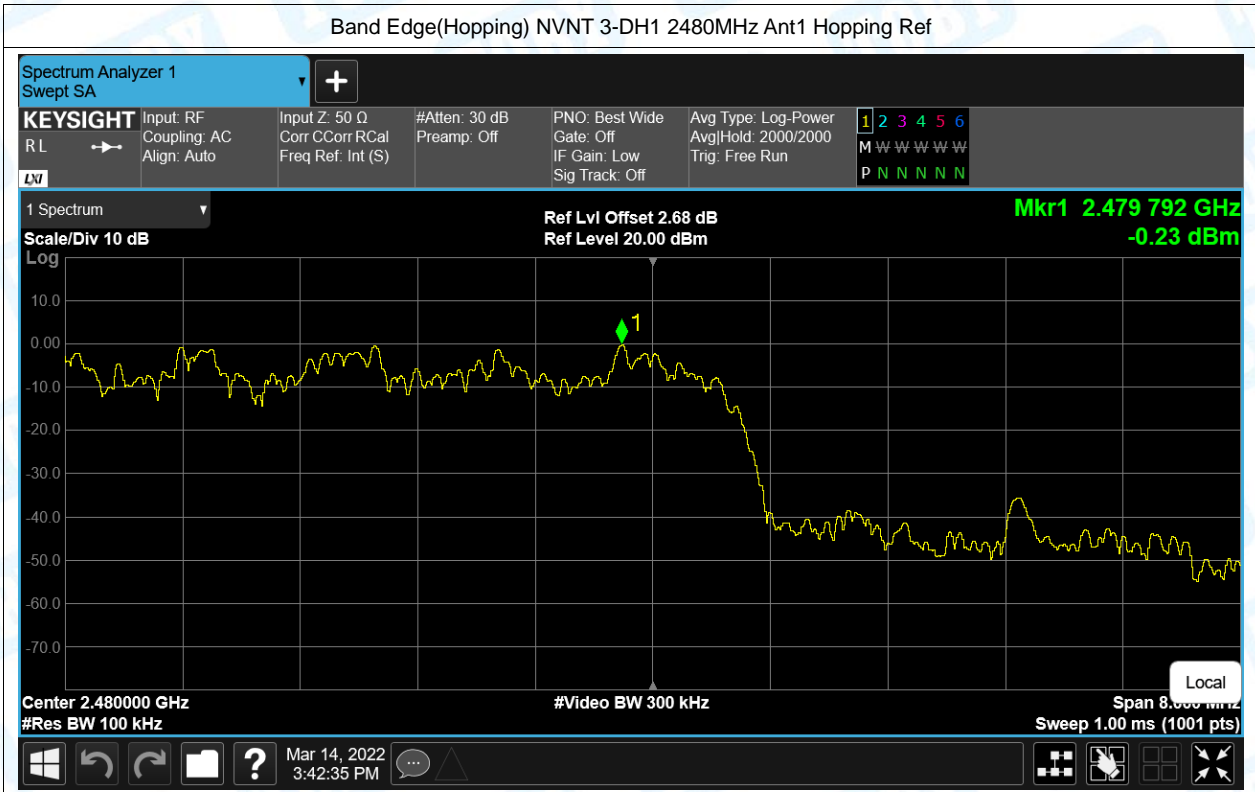










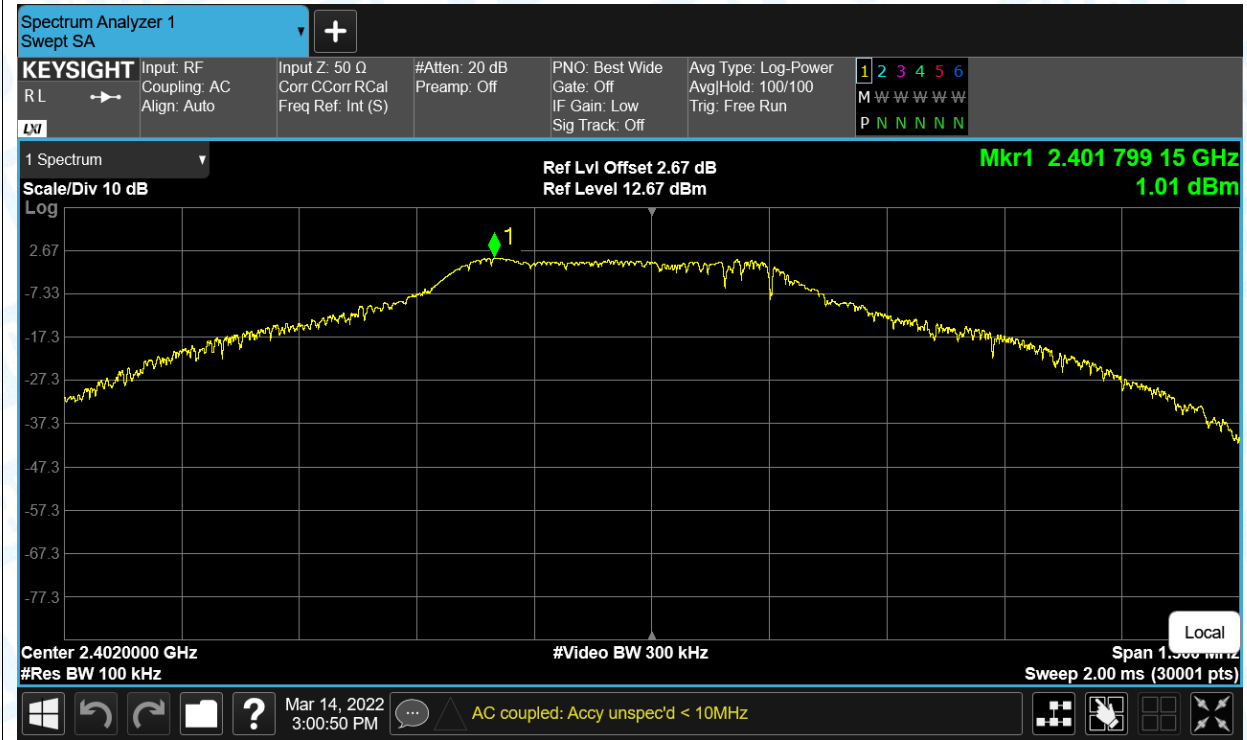


6. Conducted RF Spurious Emission

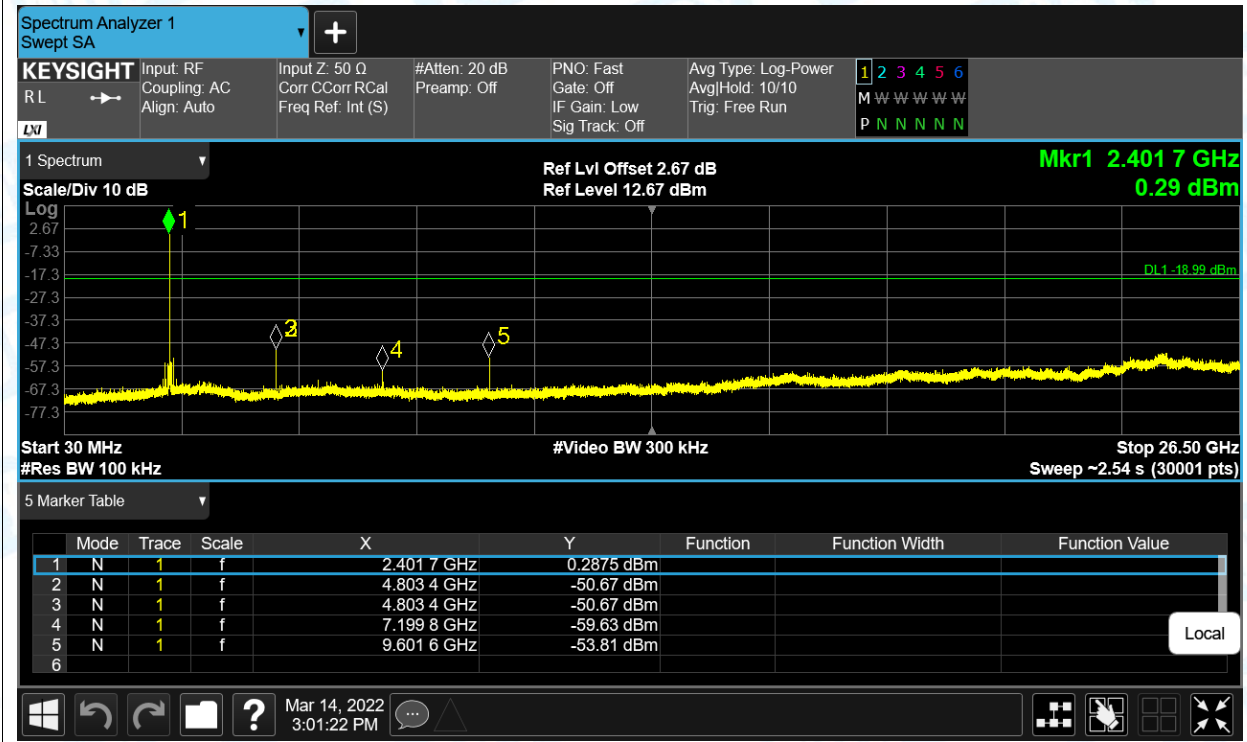
Condition	Mode	Frequency (MHz)	Antenna	Max Value (dBc)	Limit (dBc)	Verdict
NVNT	1-DH1	2402	Ant1	-51.68	-20	Pass
NVNT	1-DH1	2441	Ant1	-49.32	-20	Pass
NVNT	1-DH1	2480	Ant1	-46.81	-20	Pass
NVNT	2-DH1	2402	Ant1	-52.84	-20	Pass
NVNT	2-DH1	2441	Ant1	-51.76	-20	Pass
NVNT	2-DH1	2480	Ant1	-50.81	-20	Pass
NVNT	3-DH1	2402	Ant1	-50.04	-20	Pass
NVNT	3-DH1	2441	Ant1	-47.36	-20	Pass
NVNT	3-DH1	2480	Ant1	-47.87	-20	Pass

Test Graphs

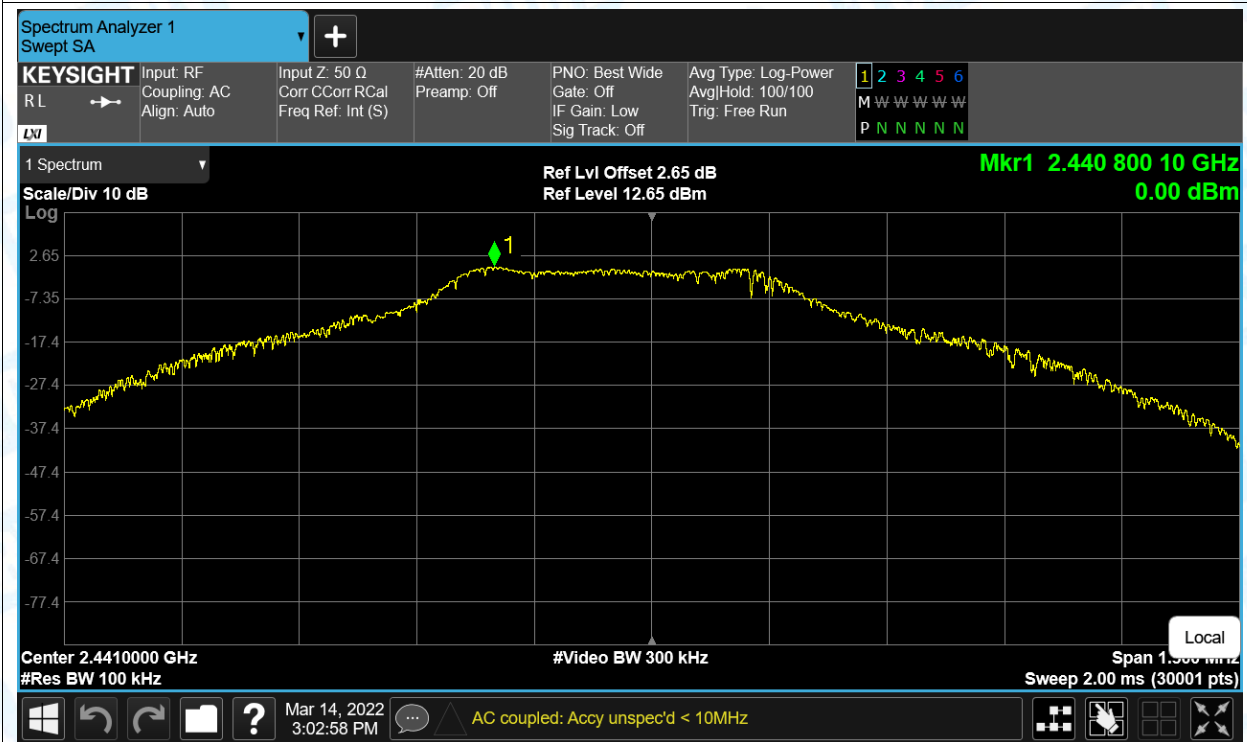
Tx. Spurious NVNT 1-DH1 2402MHz Ant1 Ref



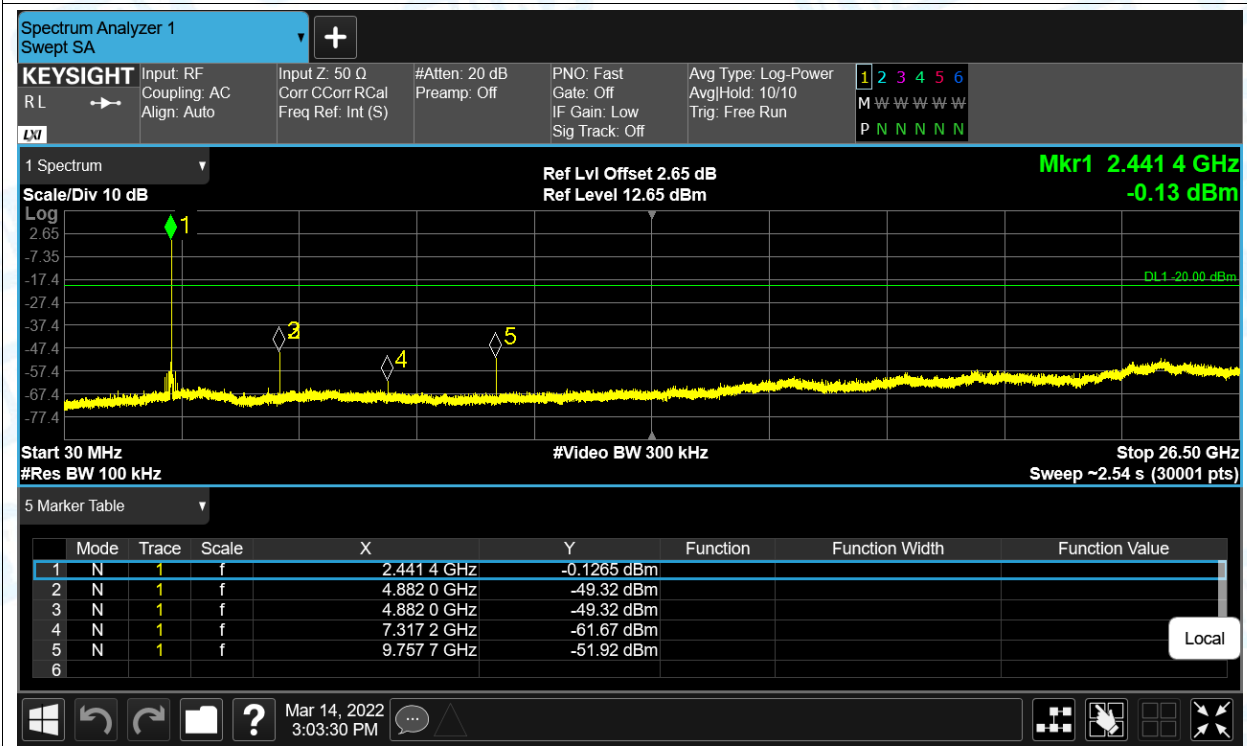
Tx. Spurious NVNT 1-DH1 2402MHz Ant1 Emission



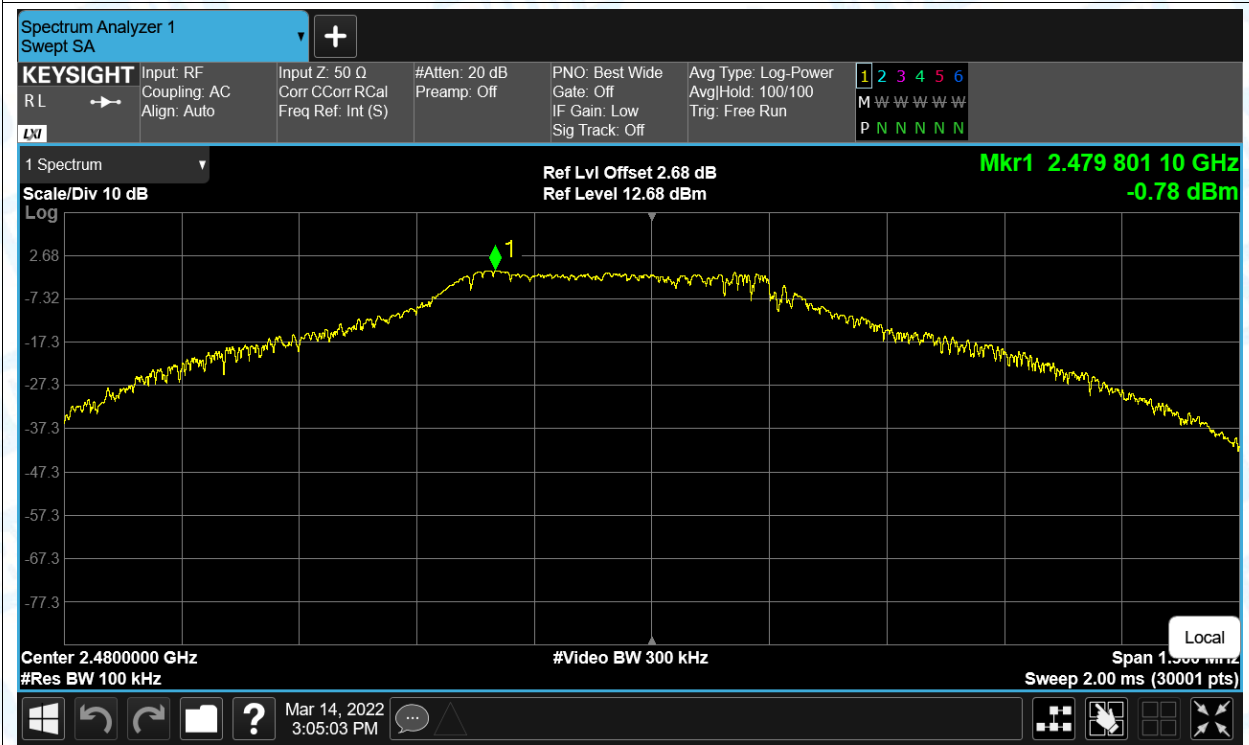
Tx. Spurious NVNT 1-DH1 2441MHz Ant1 Ref



Tx. Spurious NVNT 1-DH1 2441MHz Ant1 Emission



Tx. Spurious NVNT 1-DH1 2480MHz Ant1 Ref



Tx. Spurious NVNT 1-DH1 2480MHz Ant1 Emission

