

RF Test Data for 2.4G WiFi

(Conducted Measurements)

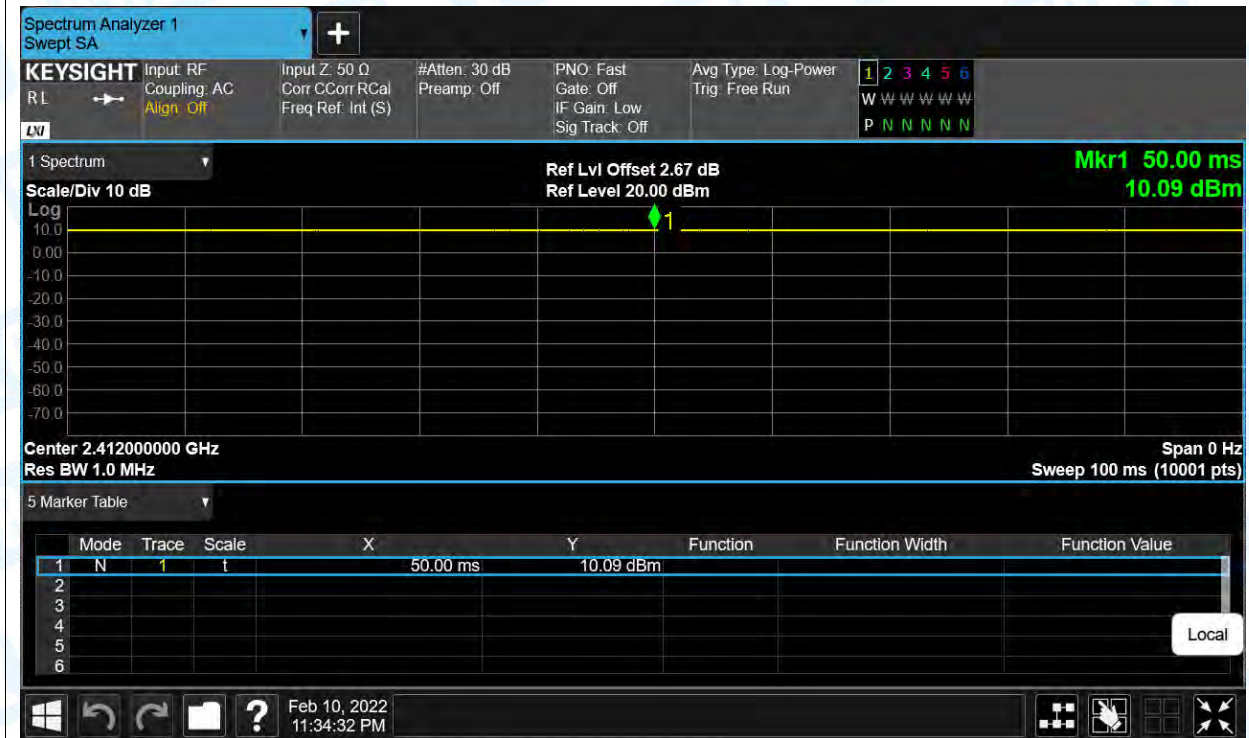
General Description of EUT	
Product Name:	Desktop Air Purifier
Test Model:	NBD-ADH0
Sample ID:	20211029-17-2#
Environmental Conditions	
Temperature:	24℃
Relative Humidity:	50%
Test Voltage:	DC12V
Test Engineer:	hejingchang
Note: For a more detailed features description, please refer to the report TB-FCC186206	

Duty Cycle

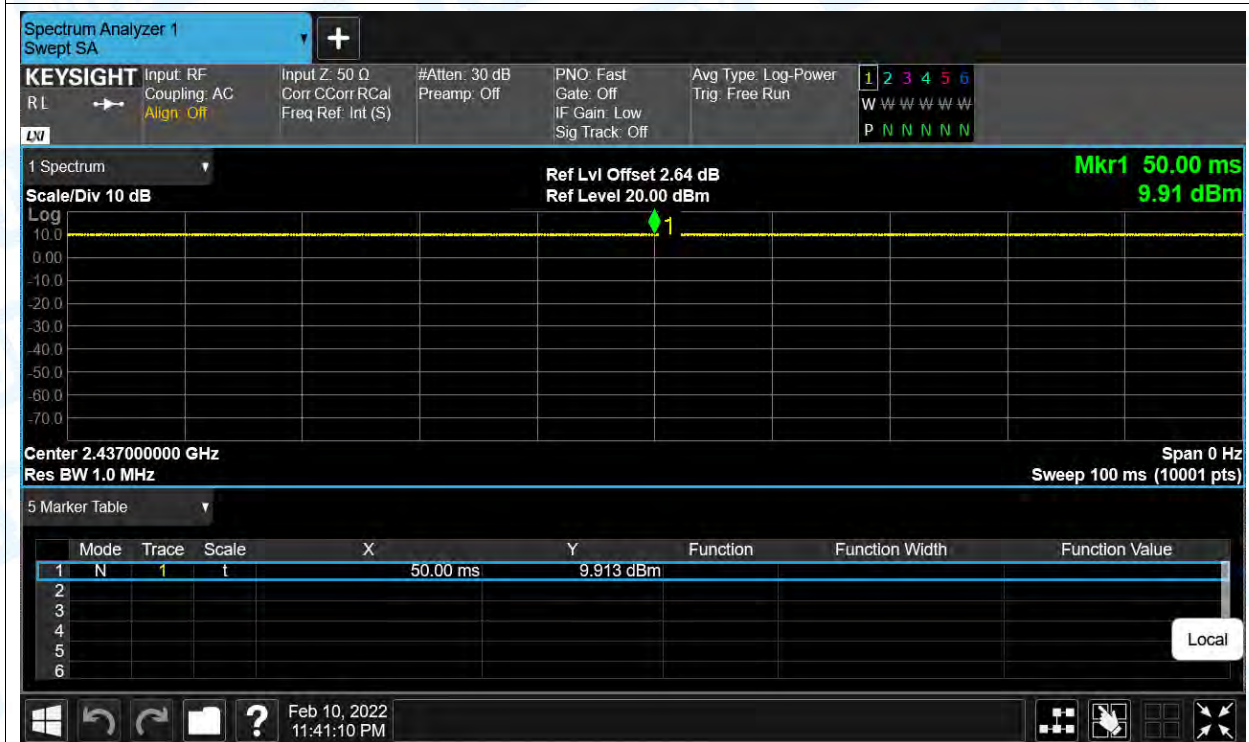
Condition	Mode	Frequency (MHz)	Antenna	Duty Cycle (%)	Correction Factor (dB)	1/T (kHz)
NVNT	b	2412	Ant1	100	0	0
NVNT	b	2437	Ant1	100	0	0
NVNT	b	2462	Ant1	100	0	0
NVNT	g	2412	Ant1	100	0	0
NVNT	g	2437	Ant1	100	0	0
NVNT	g	2462	Ant1	100	0	0
NVNT	n(HT20)	2412	Ant1	100	0	0
NVNT	n(HT20)	2437	Ant1	100	0	0
NVNT	n(HT20)	2462	Ant1	100	0	0

Test Graphs

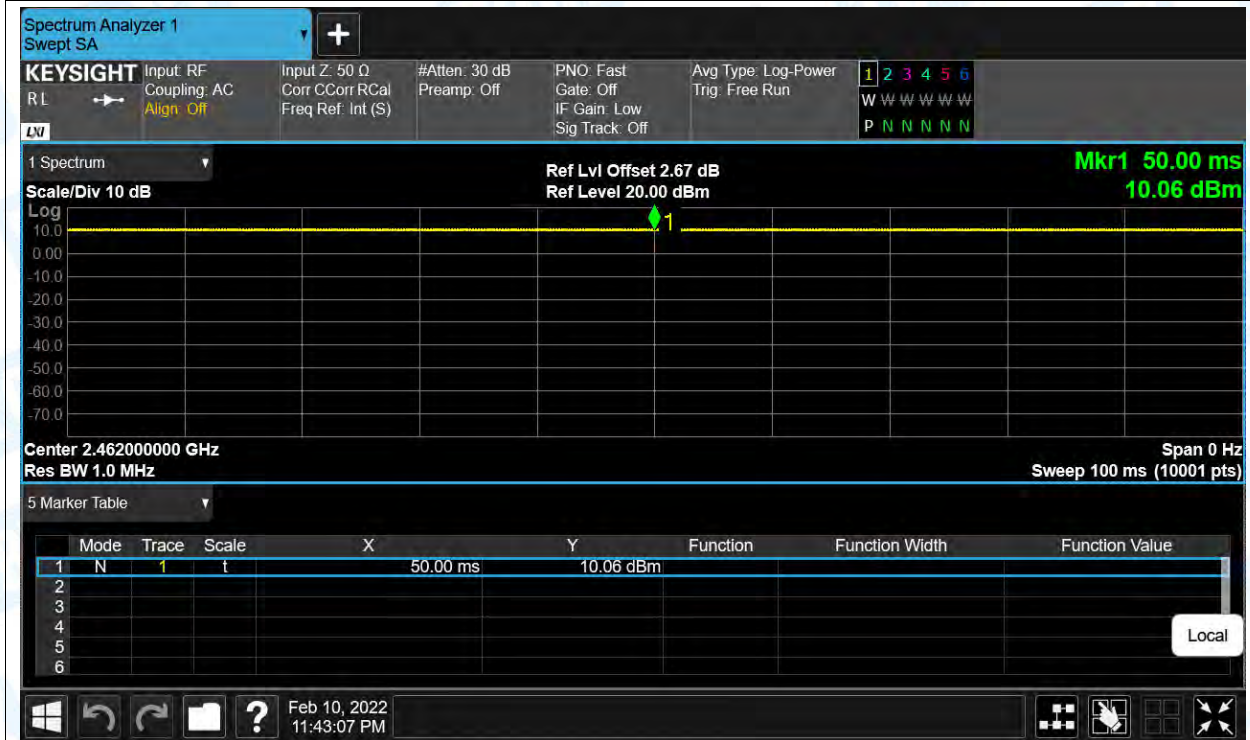
Duty Cycle NVNT b 2412MHz Ant1



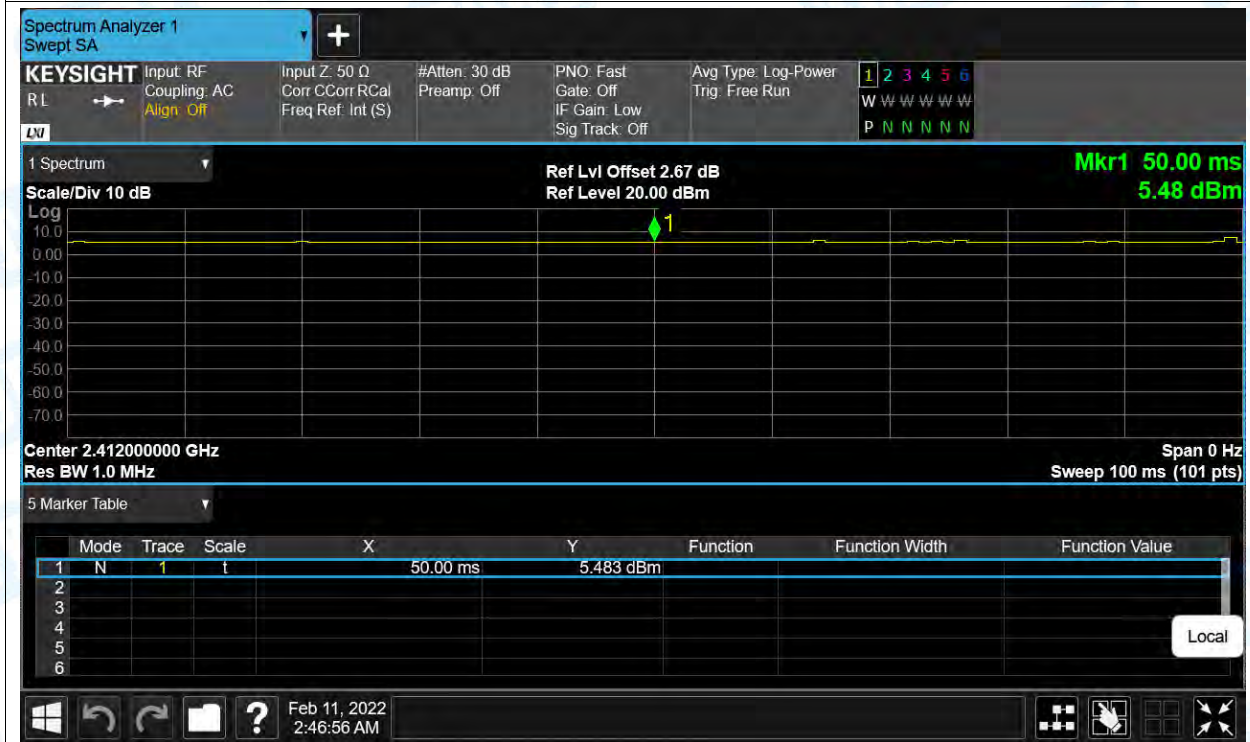
Duty Cycle NVNT b 2437MHz Ant1



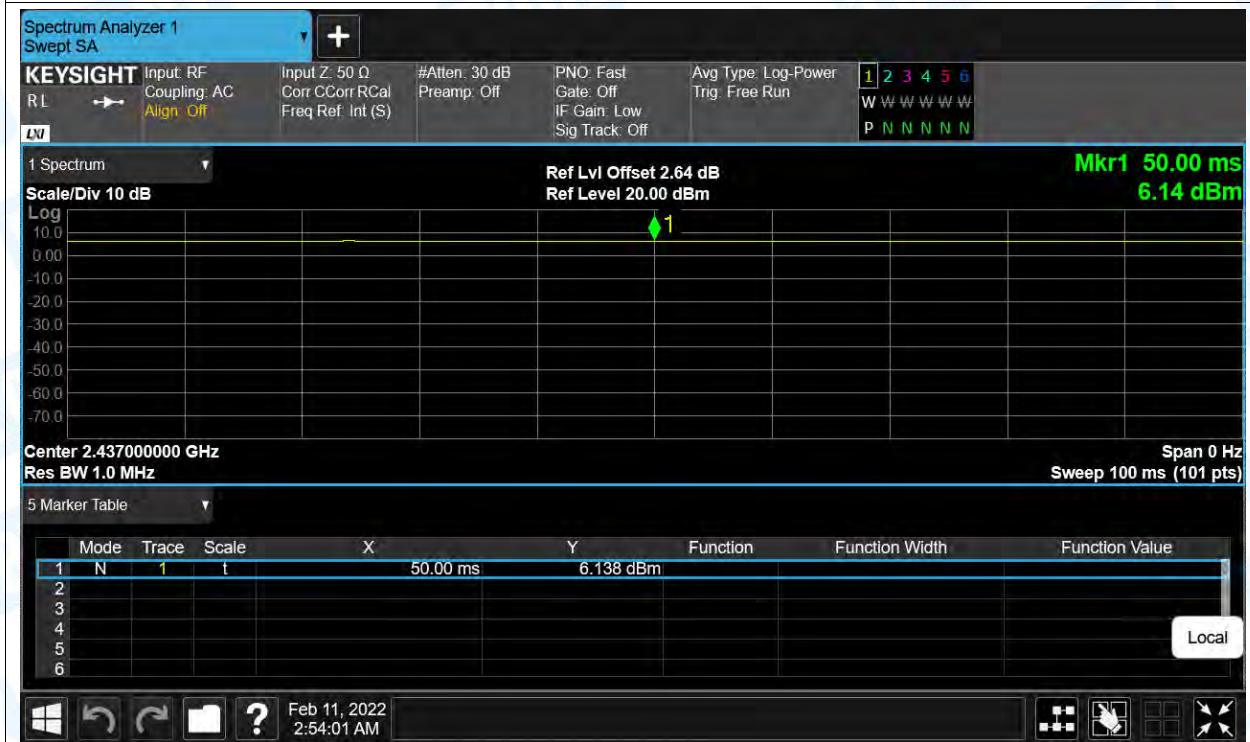
Duty Cycle NVNT b 2462MHz Ant1



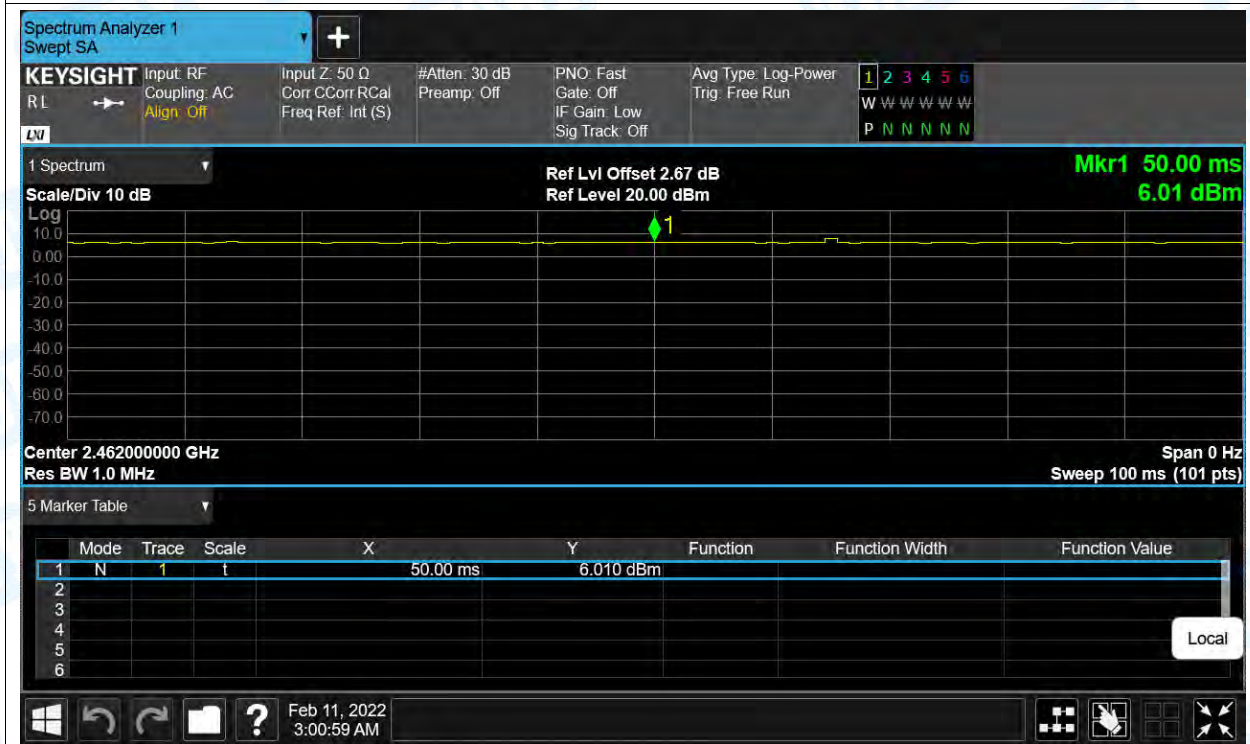
Duty Cycle NVNT g 2412MHz Ant1



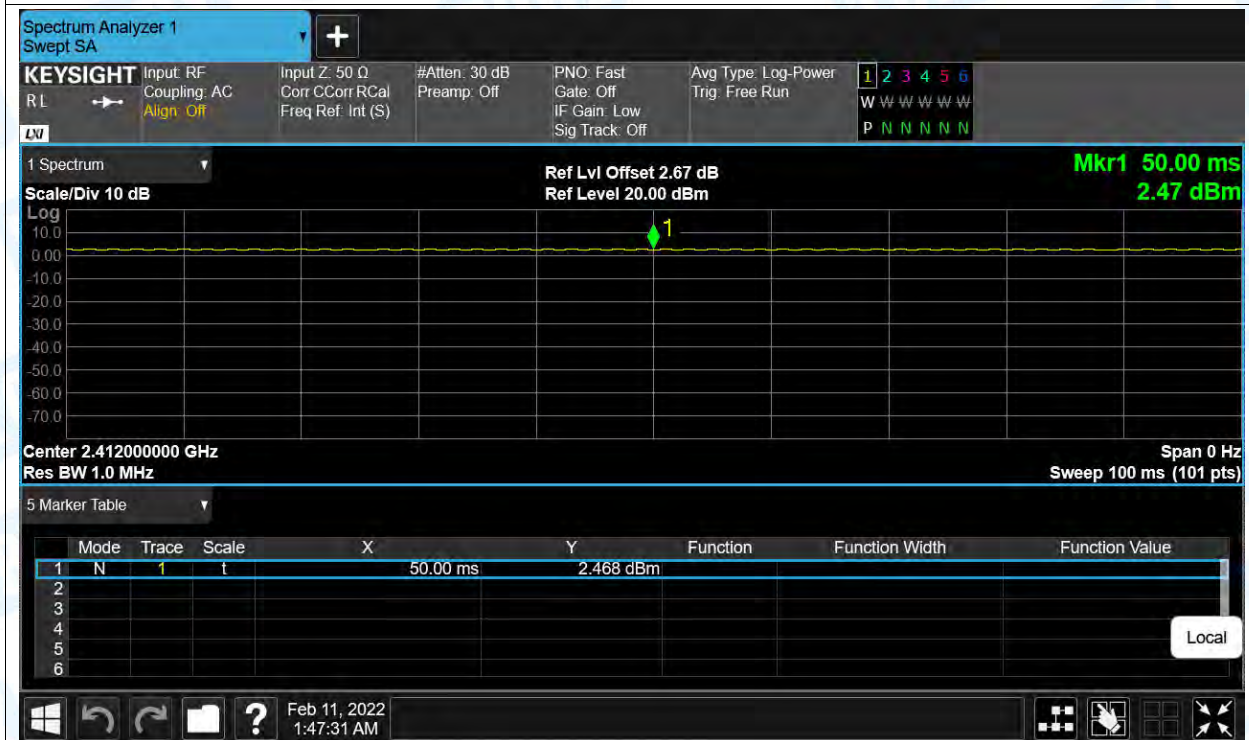
Duty Cycle NVNT g 2437MHz Ant1



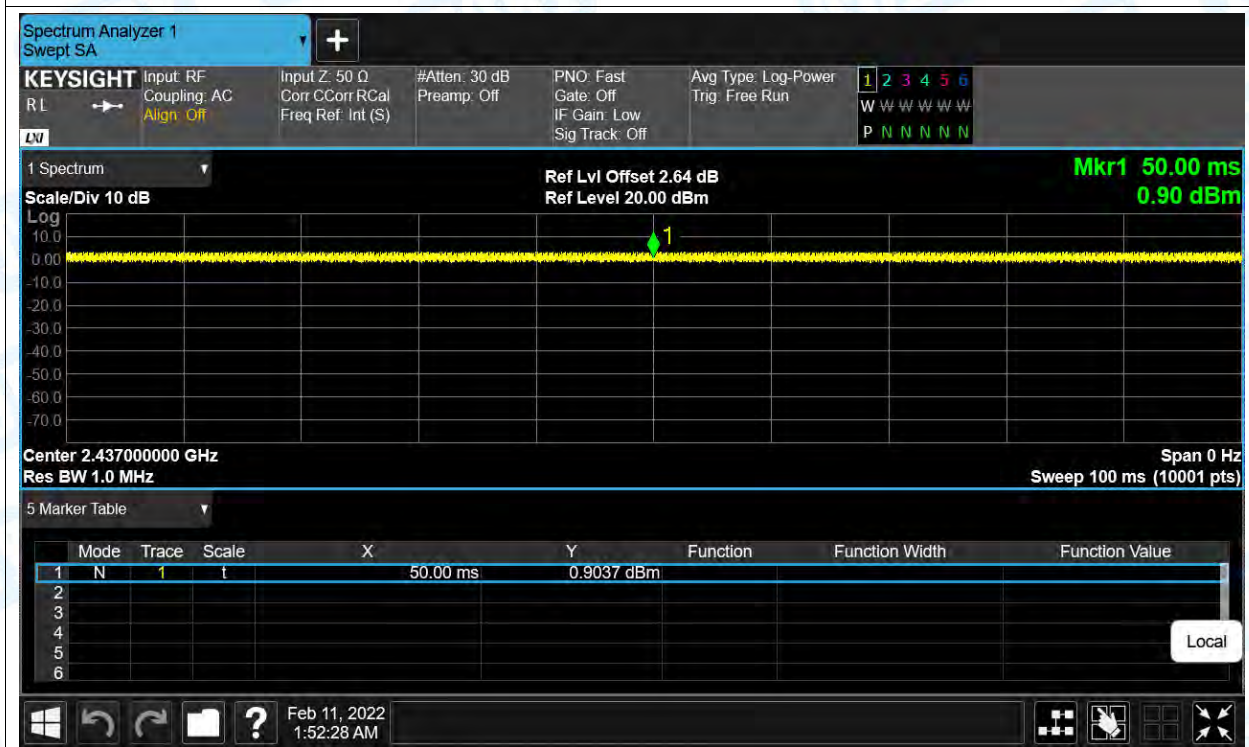
Duty Cycle NVNT g 2462MHz Ant1

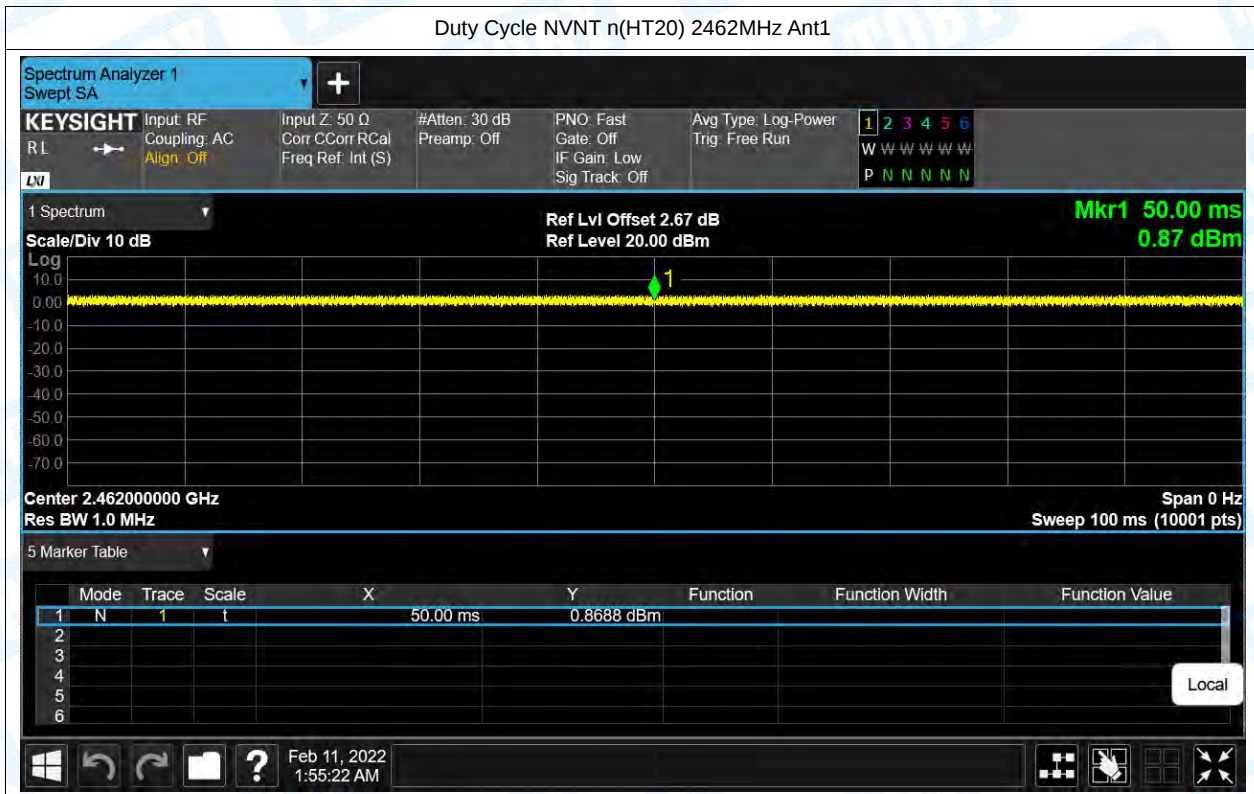


Duty Cycle NVNT n(HT20) 2412MHz Ant1



Duty Cycle NVNT n(HT20) 2437MHz Ant1





Maximum Conducted Output Power

Condition	Mode	Frequency (MHz)	Antenna	Conducted Power (dBm)	Duty Factor (dB)	Total Power (dBm)	Limit (dBm)	Verdict
NVNT	b	2412	Ant1	16.384	0	16.384	30	Pass
NVNT	b	2437	Ant1	16.506	0	16.506	30	Pass
NVNT	b	2462	Ant1	16.86	0	16.86	30	Pass
NVNT	g	2412	Ant1	15.547	0	15.547	30	Pass
NVNT	g	2437	Ant1	16.133	0	16.133	30	Pass
NVNT	g	2462	Ant1	16.026	0	16.026	30	Pass
NVNT	n(HT20)	2412	Ant1	12.684	0	12.684	30	Pass
NVNT	n(HT20)	2437	Ant1	13.154	0	13.154	30	Pass
NVNT	n(HT20)	2462	Ant1	13.119	0	13.119	30	Pass

-6dB Bandwidth

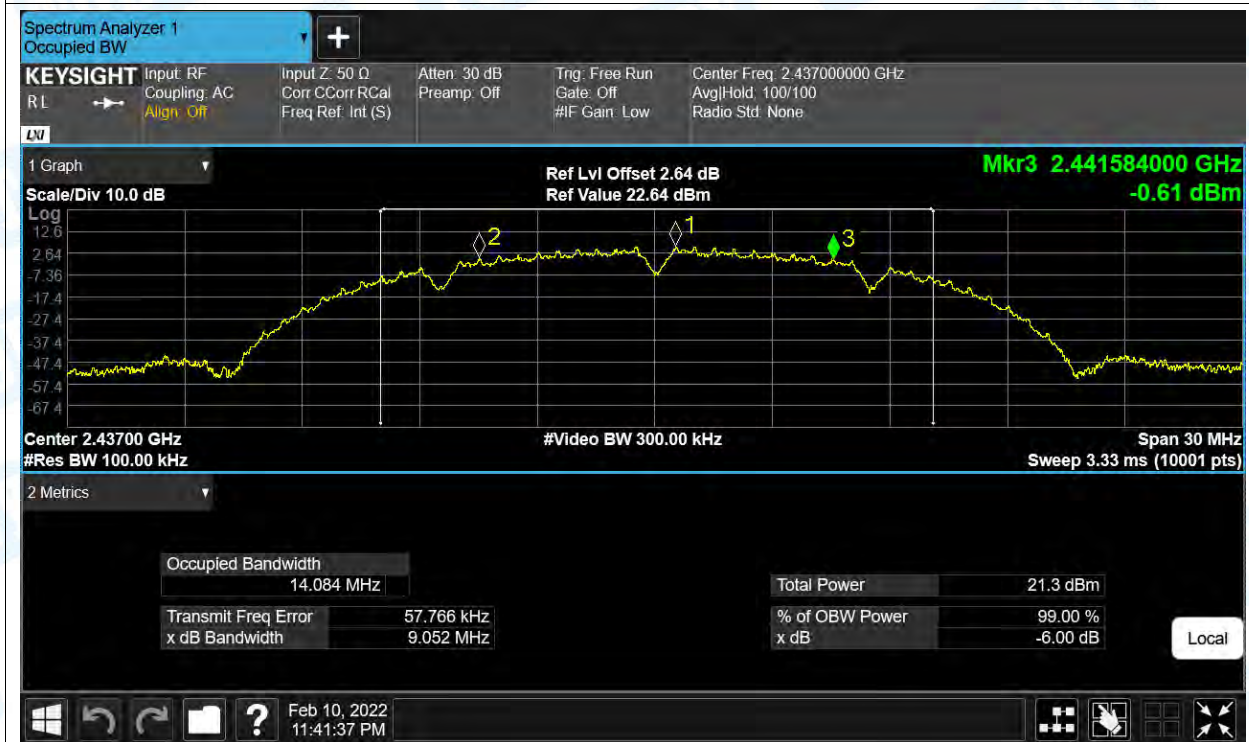
Condition	Mode	Frequency (MHz)	Antenna	-6 dB Bandwidth (MHz)	Limit -6 dB Bandwidth (MHz)	Verdict
NVNT	b	2412	Ant1	9.066	0.5	Pass
NVNT	b	2437	Ant1	9.052	0.5	Pass
NVNT	b	2462	Ant1	9.076	0.5	Pass
NVNT	g	2412	Ant1	16.35	0.5	Pass
NVNT	g	2437	Ant1	16.37	0.5	Pass
NVNT	g	2462	Ant1	16.33	0.5	Pass
NVNT	n(HT20)	2412	Ant1	17.79	0.5	Pass
NVNT	n(HT20)	2437	Ant1	17.70	0.5	Pass
NVNT	n(HT20)	2462	Ant1	17.75	0.5	Pass

Test Graphs

-6dB Bandwidth NVNT b 2412MHz Ant1



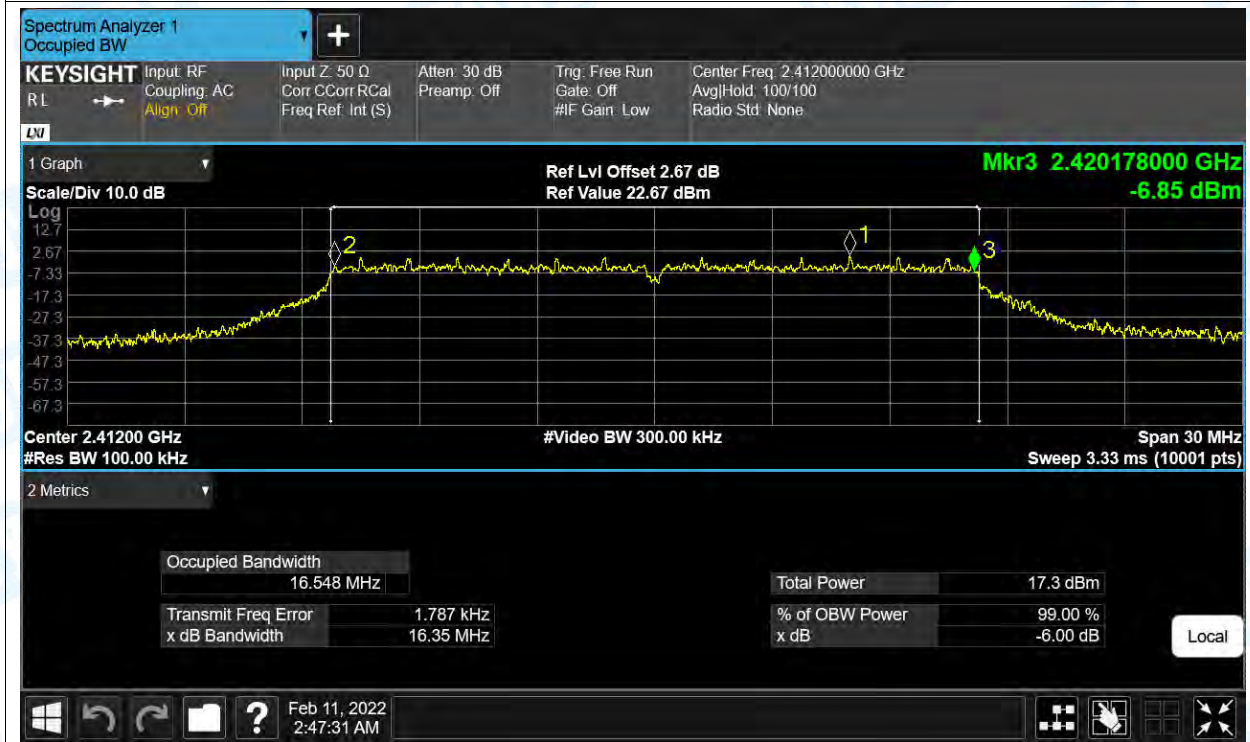
-6dB Bandwidth NVNT b 2437MHz Ant1



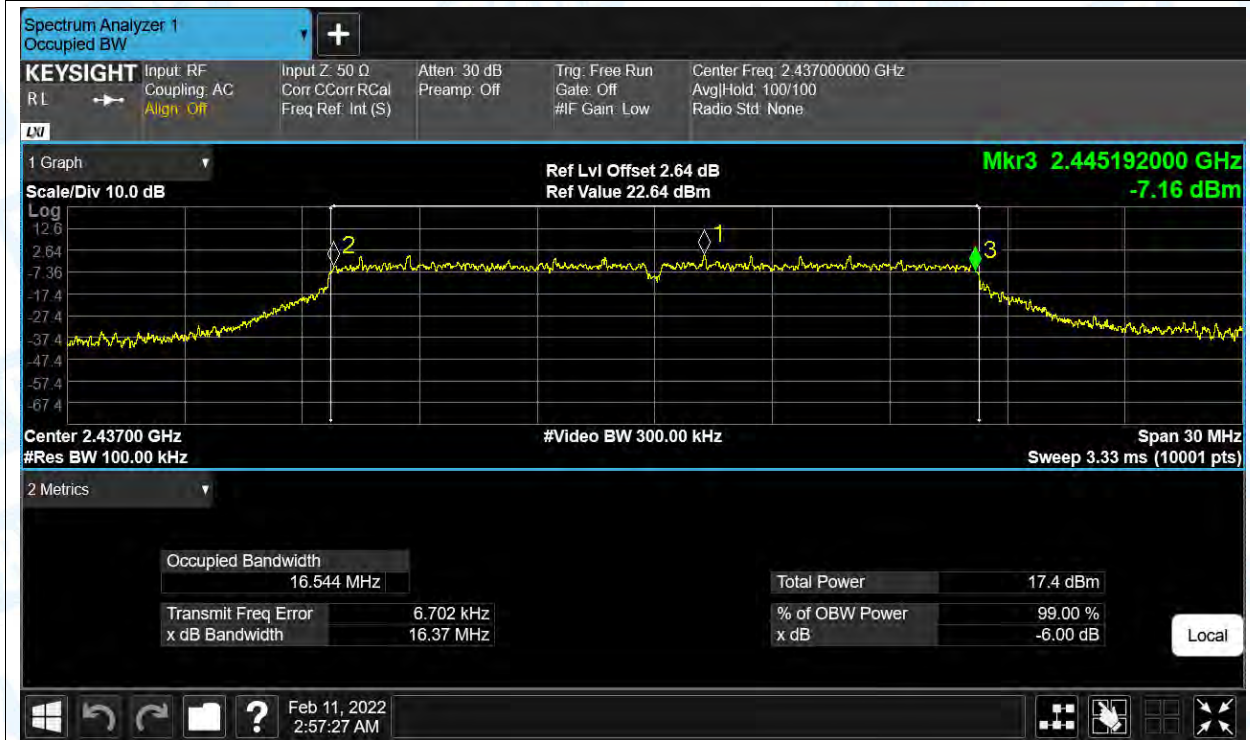
-6dB Bandwidth NVNT b 2462MHz Ant1



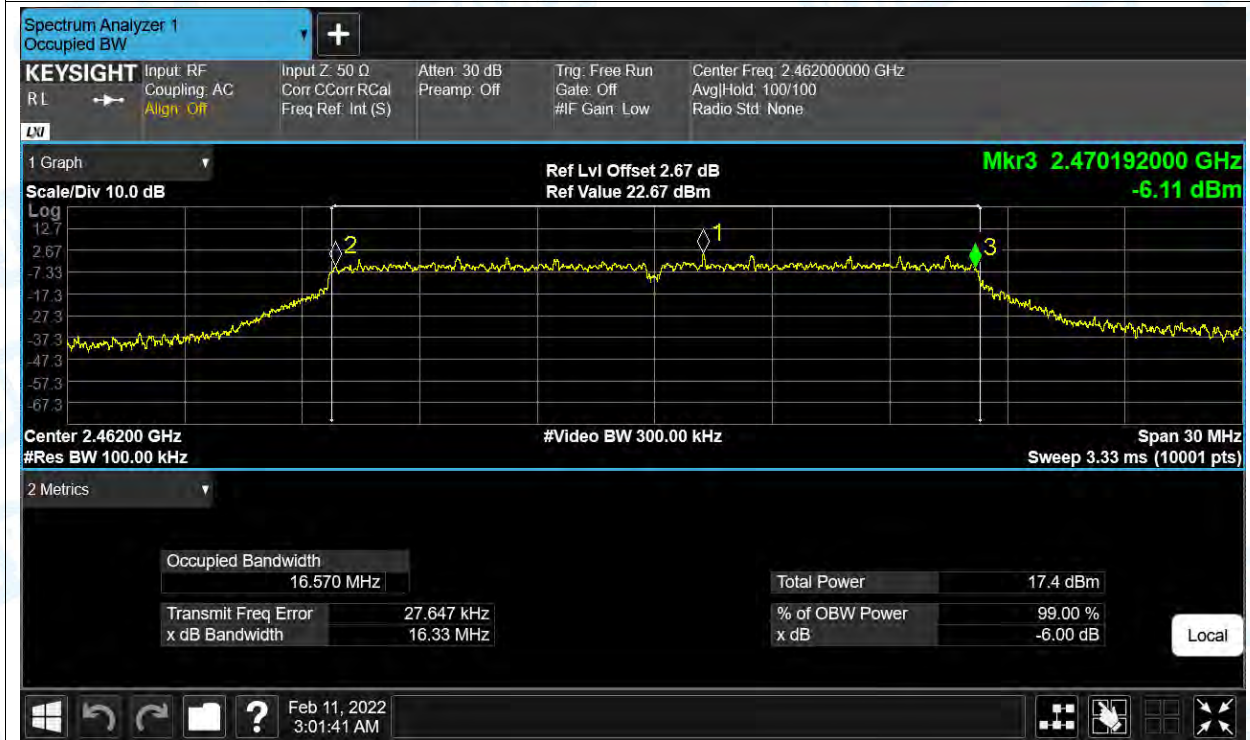
-6dB Bandwidth NVNT g 2412MHz Ant1



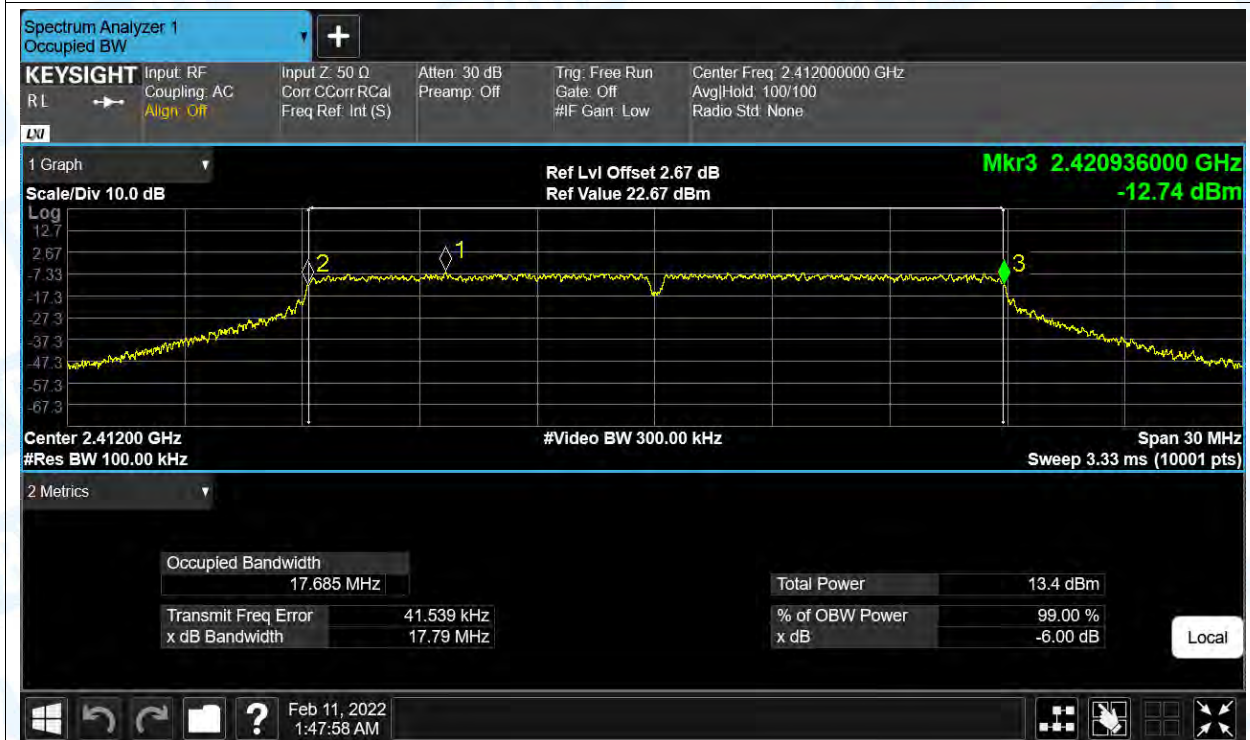
-6dB Bandwidth NVNT g 2437MHz Ant1



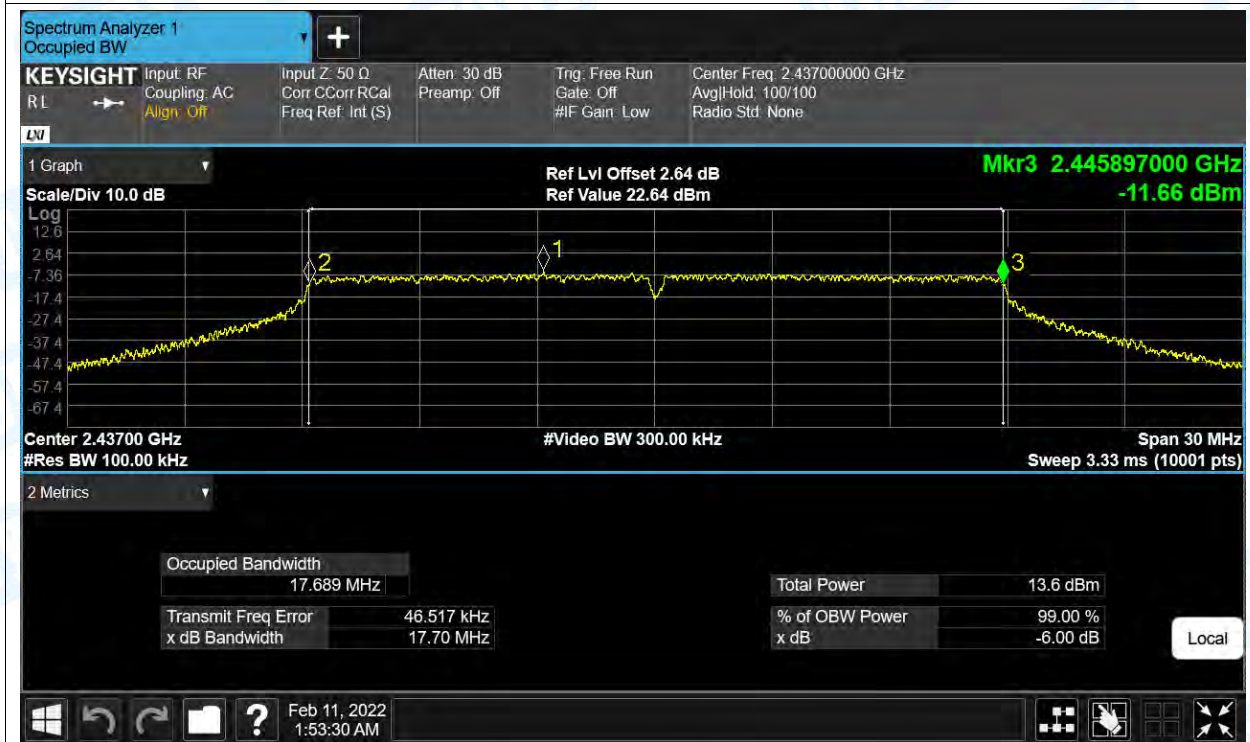
-6dB Bandwidth NVNT g 2462MHz Ant1



-6dB Bandwidth NVNT n(HT20) 2412MHz Ant1



-6dB Bandwidth NVNT n(HT20) 2437MHz Ant1





Maximum Power Spectral Density Level

Condition	Mode	Frequency (MHz)	Antenna	Max PSD (dBm)	Limit (dBm)	Verdict
NVNT	b	2412	Ant1	-14.64	8	Pass
NVNT	b	2437	Ant1	-14.454	8	Pass
NVNT	b	2462	Ant1	-14.124	8	Pass
NVNT	g	2412	Ant1	-14.08	8	Pass
NVNT	g	2437	Ant1	-13.867	8	Pass
NVNT	g	2462	Ant1	-13.66	8	Pass
NVNT	n(HT20)	2412	Ant1	-20.153	8	Pass
NVNT	n(HT20)	2437	Ant1	-20.074	8	Pass
NVNT	n(HT20)	2462	Ant1	-20.031	8	Pass

Test Graphs

PSD NVNT b 2412MHz Ant1



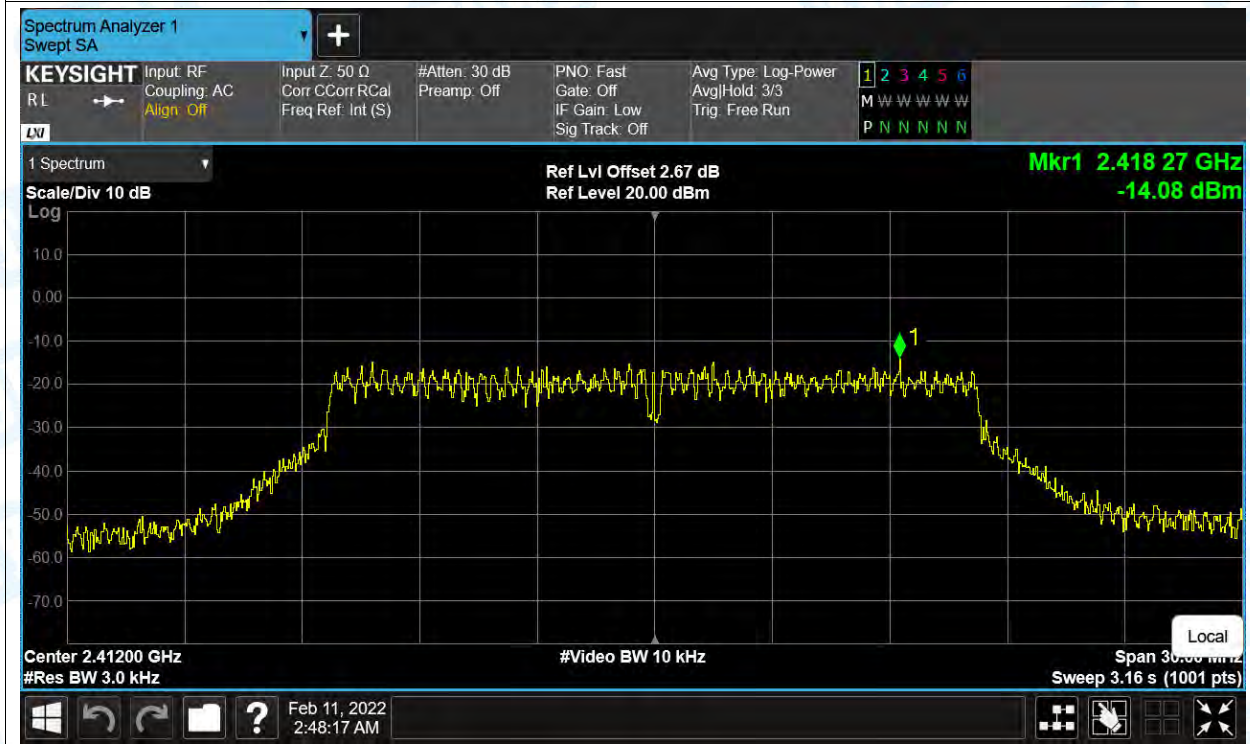
PSD NVNT b 2437MHz Ant1



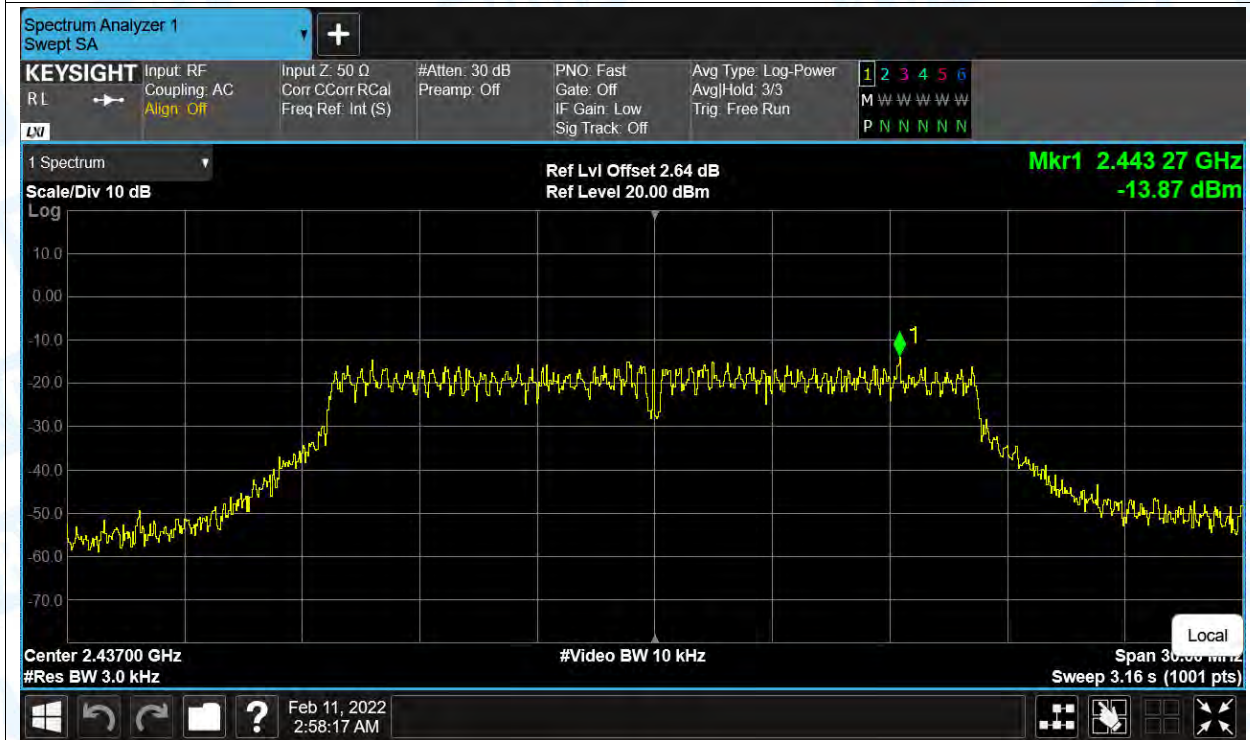
PSD NVNT b 2462MHz Ant1



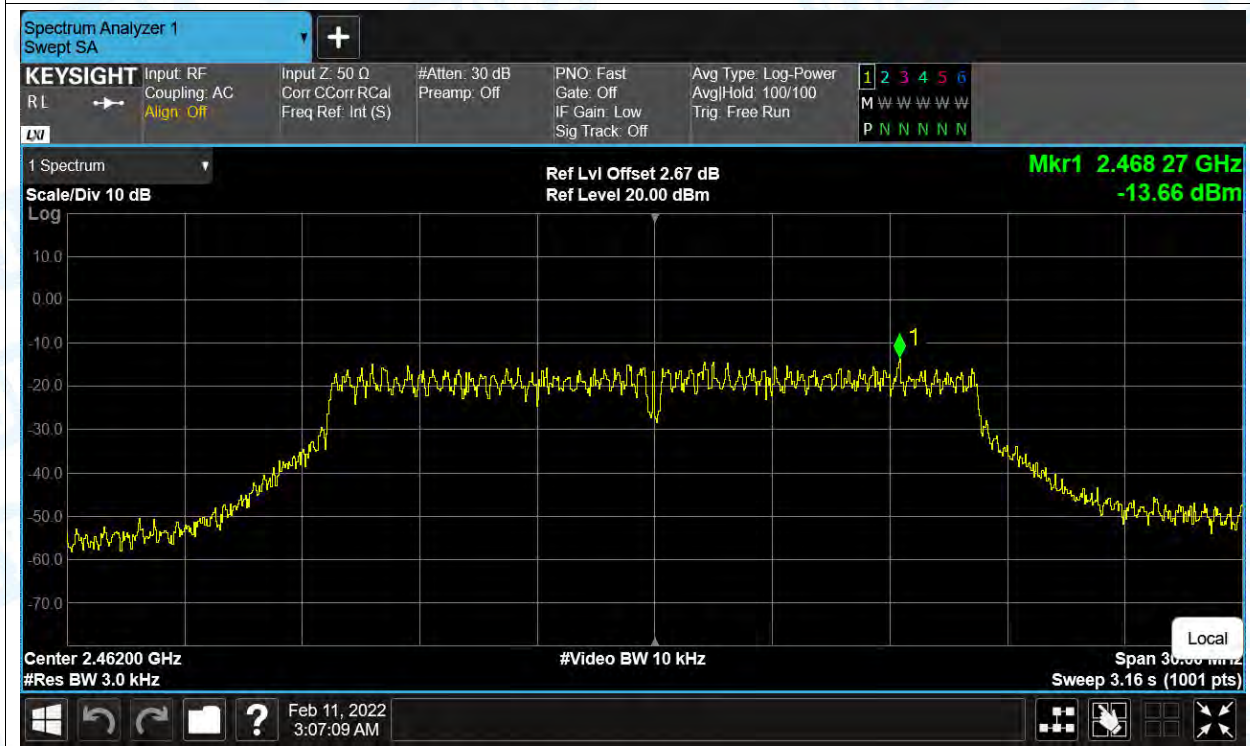
PSD NVNT g 2412MHz Ant1



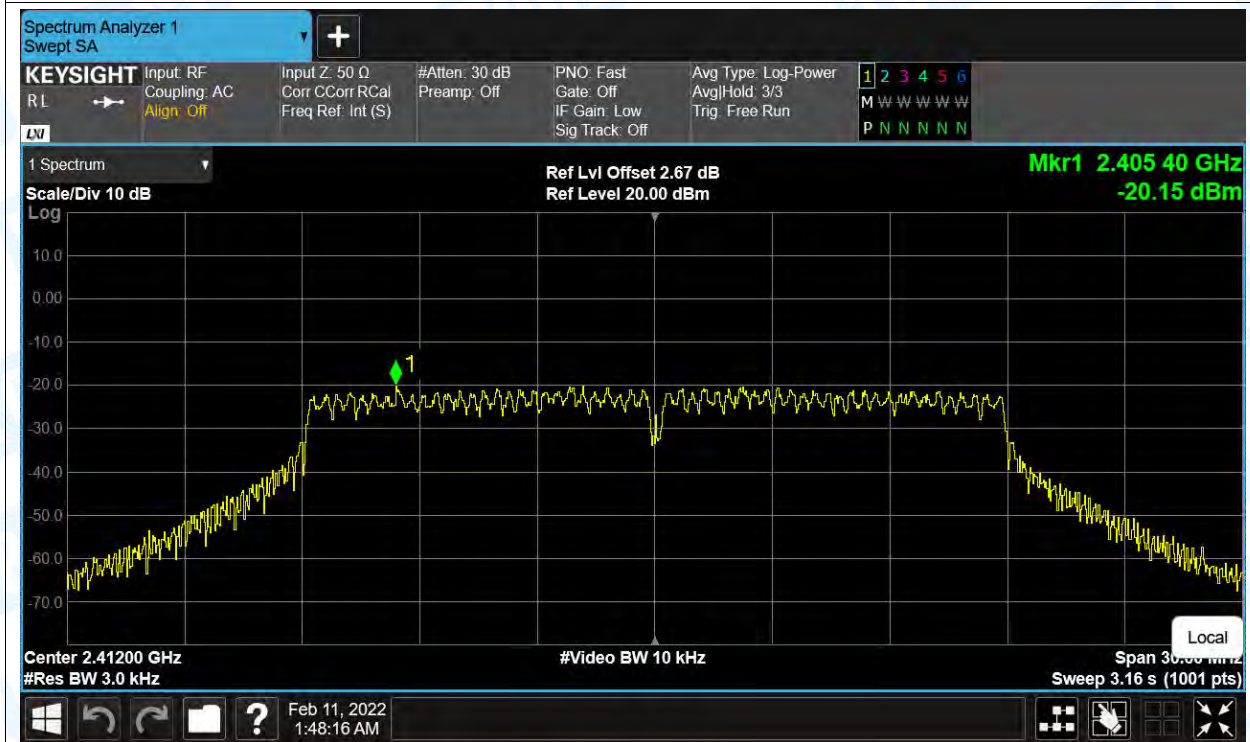
PSD NVNT g 2437MHz Ant1



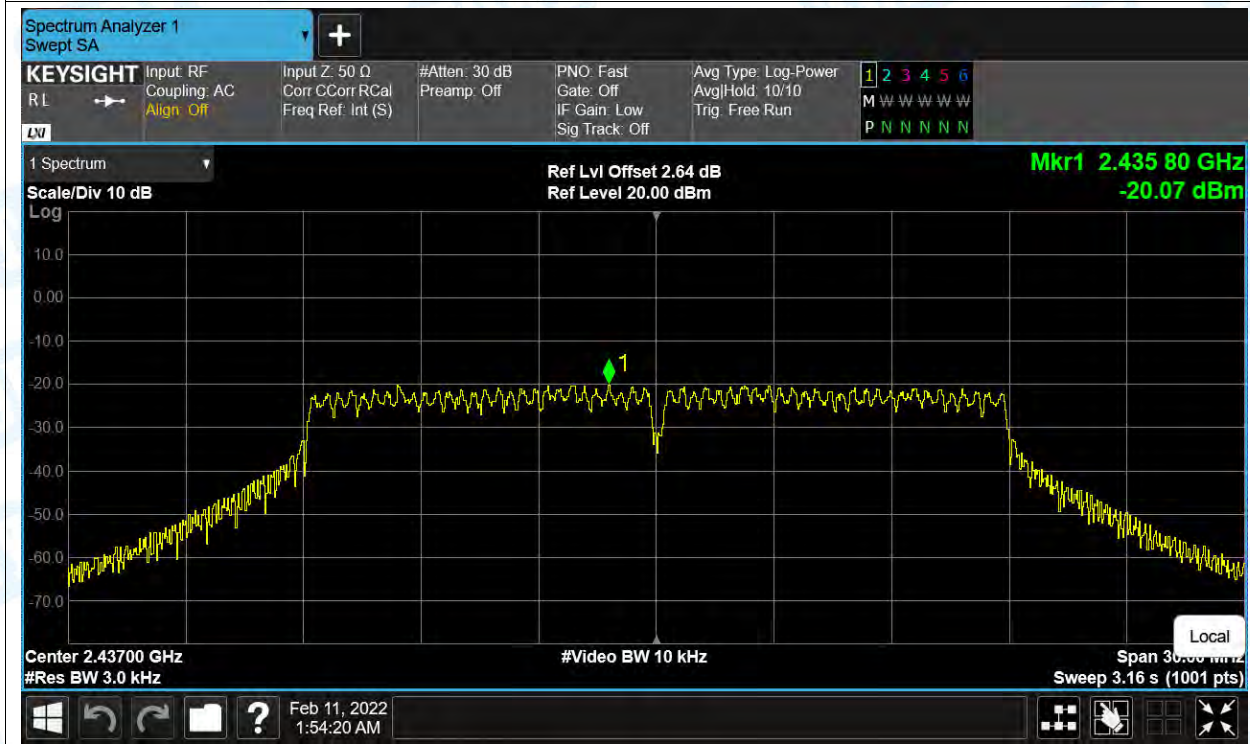
PSD NVNT g 2462MHz Ant1

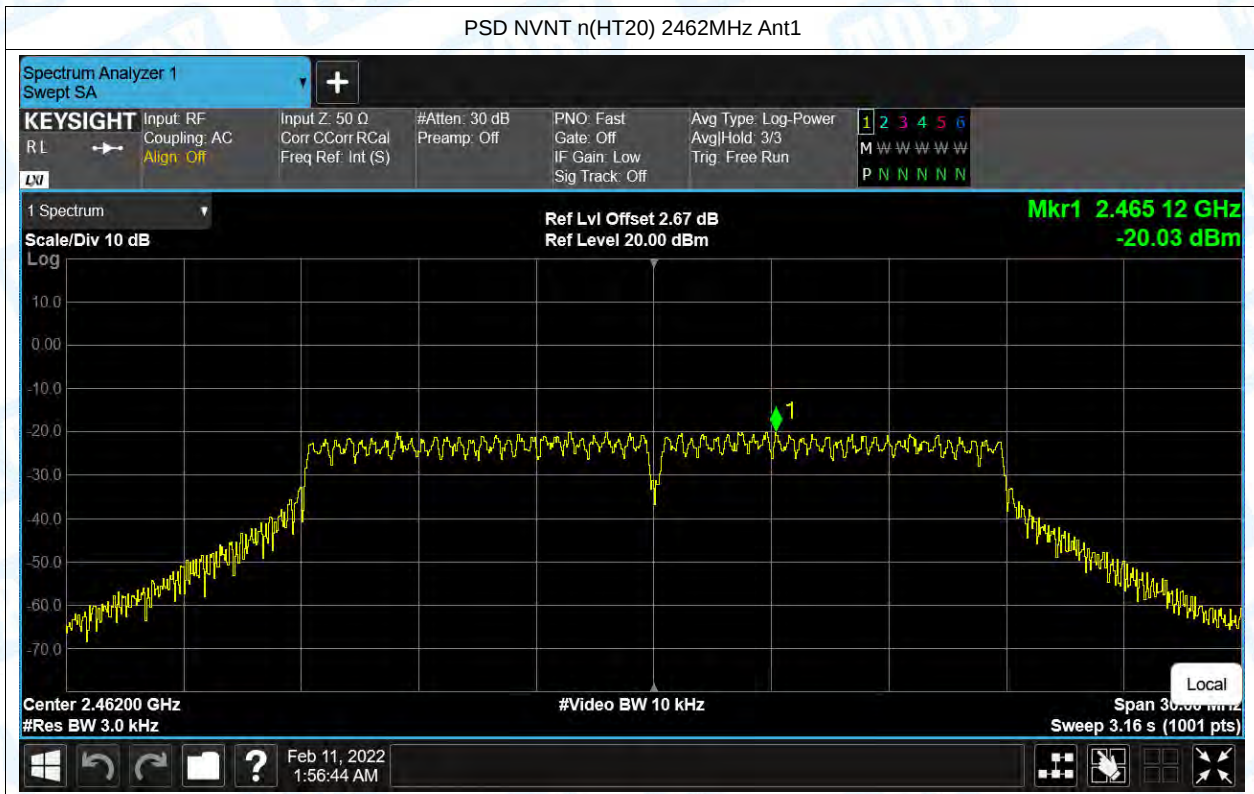


PSD NVNT n(HT20) 2412MHz Ant1



PSD NVNT n(HT20) 2437MHz Ant1



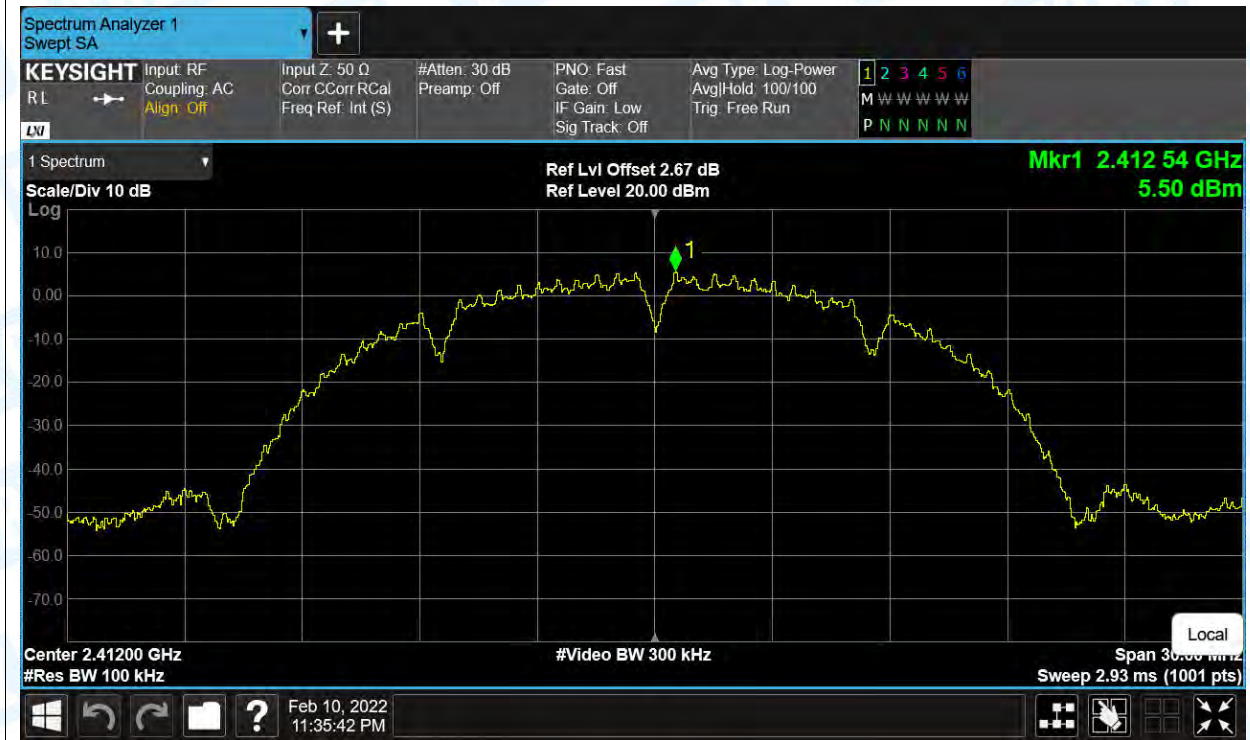


Band Edge

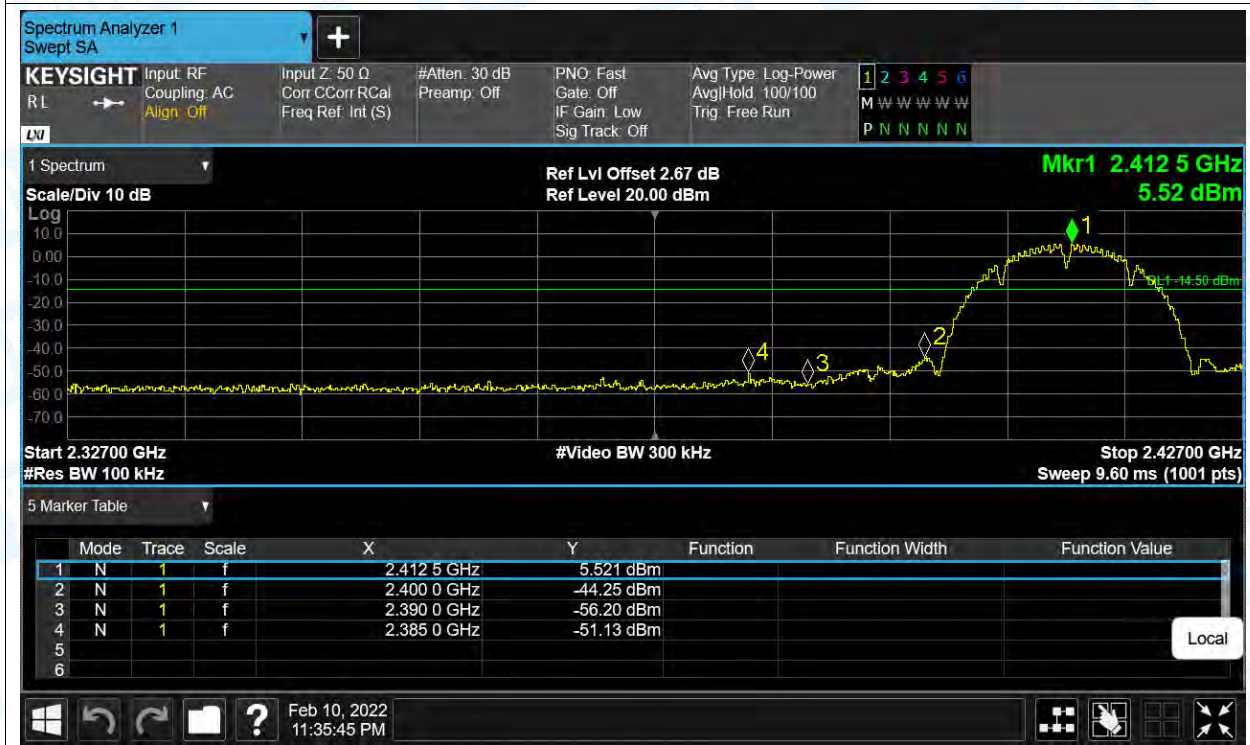
Condition	Mode	Frequency (MHz)	Antenna	Max Value (dBc)	Limit (dBc)	Verdict
NVNT	b	2412	Ant1	-56.63	-20	Pass
NVNT	b	2462	Ant1	-58.29	-20	Pass
NVNT	g	2412	Ant1	-44.88	-20	Pass
NVNT	g	2462	Ant1	-43.3	-20	Pass
NVNT	n(HT20)	2412	Ant1	-47.57	-20	Pass
NVNT	n(HT20)	2462	Ant1	-47.62	-20	Pass

Test Graphs

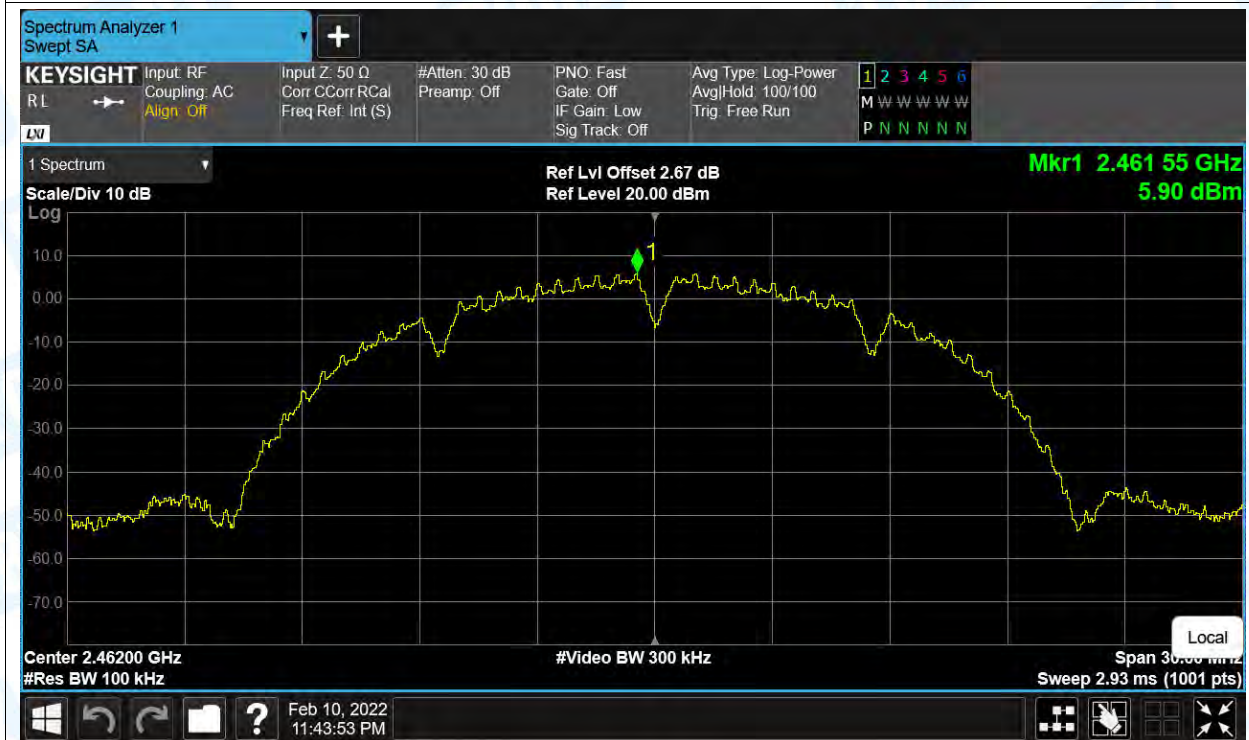
Band Edge NVNT b 2412MHz Ant1 Ref



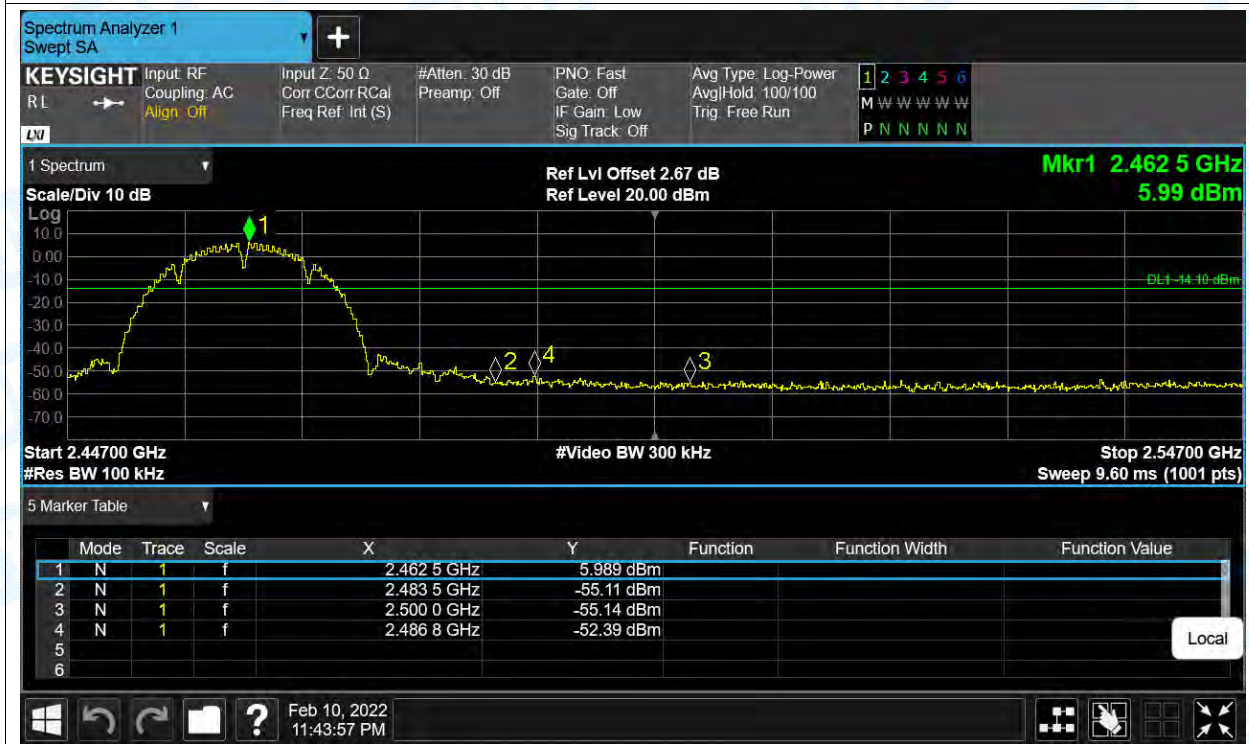
Band Edge NVNT b 2412MHz Ant1 Emission



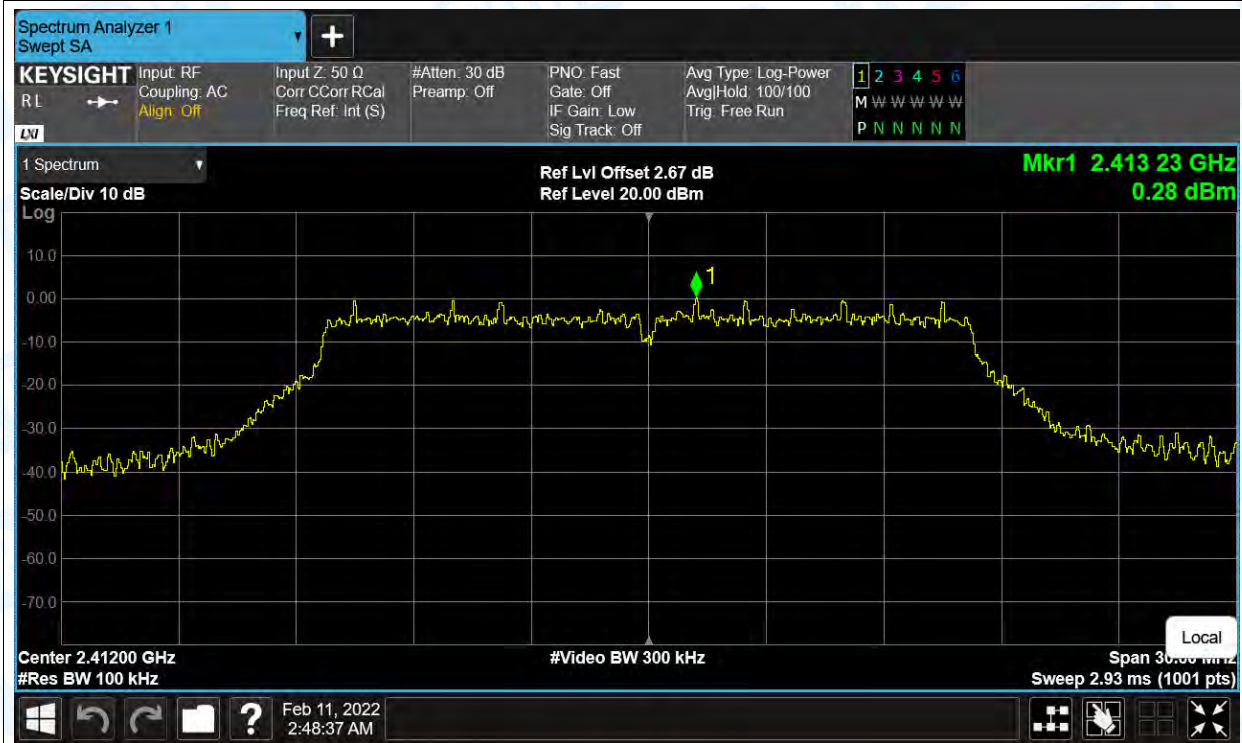
Band Edge NVNT b 2462MHz Ant1 Ref



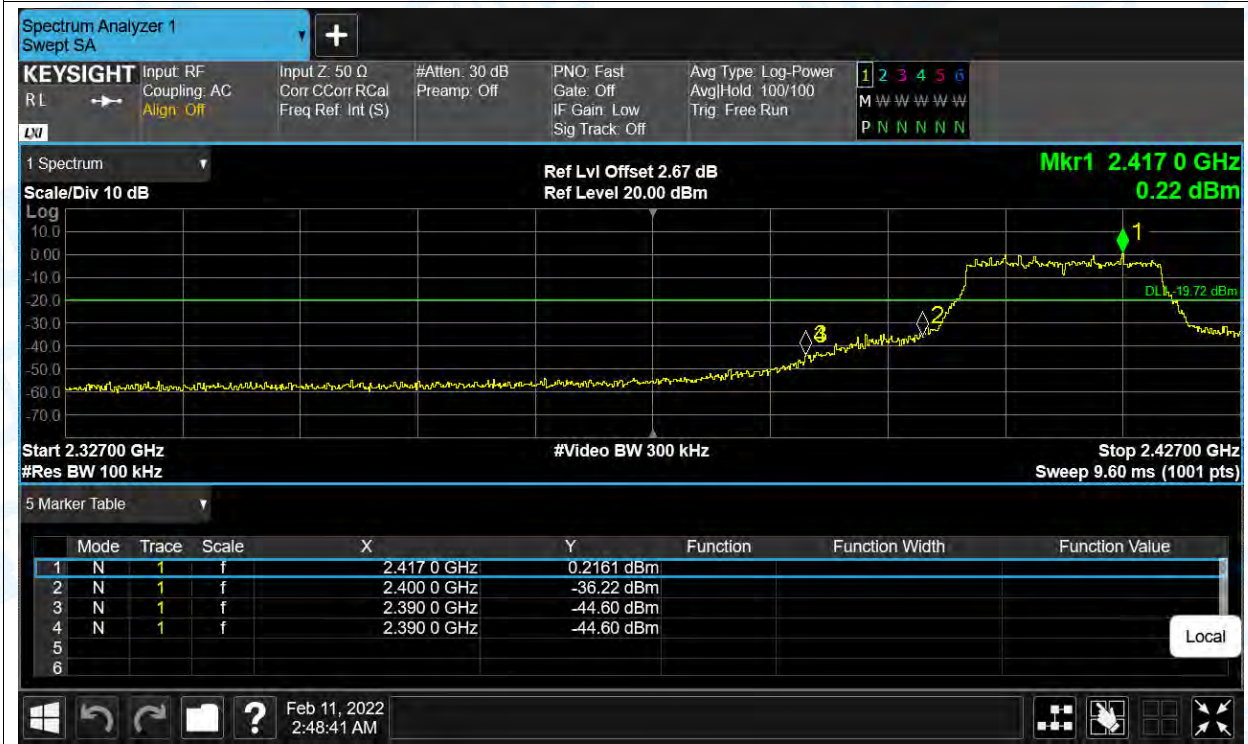
Band Edge NVNT b 2462MHz Ant1 Emission



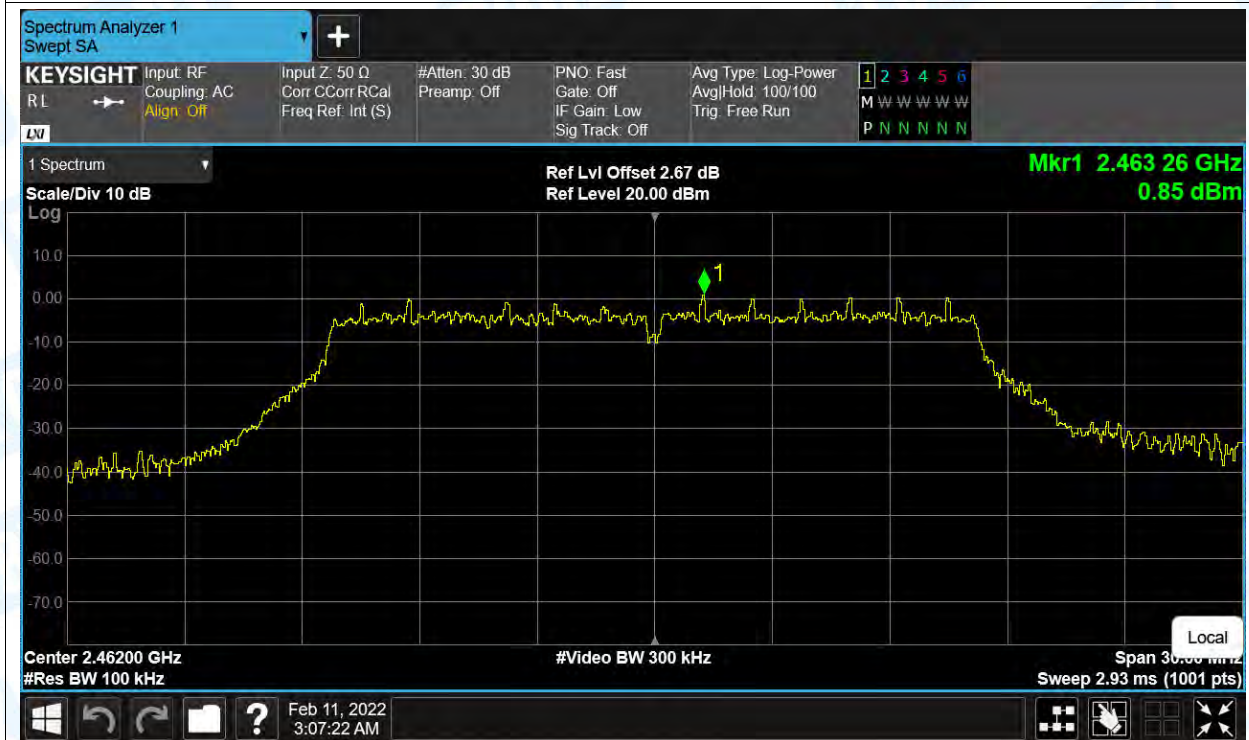
Band Edge NVNT g 2412MHz Ant1 Ref



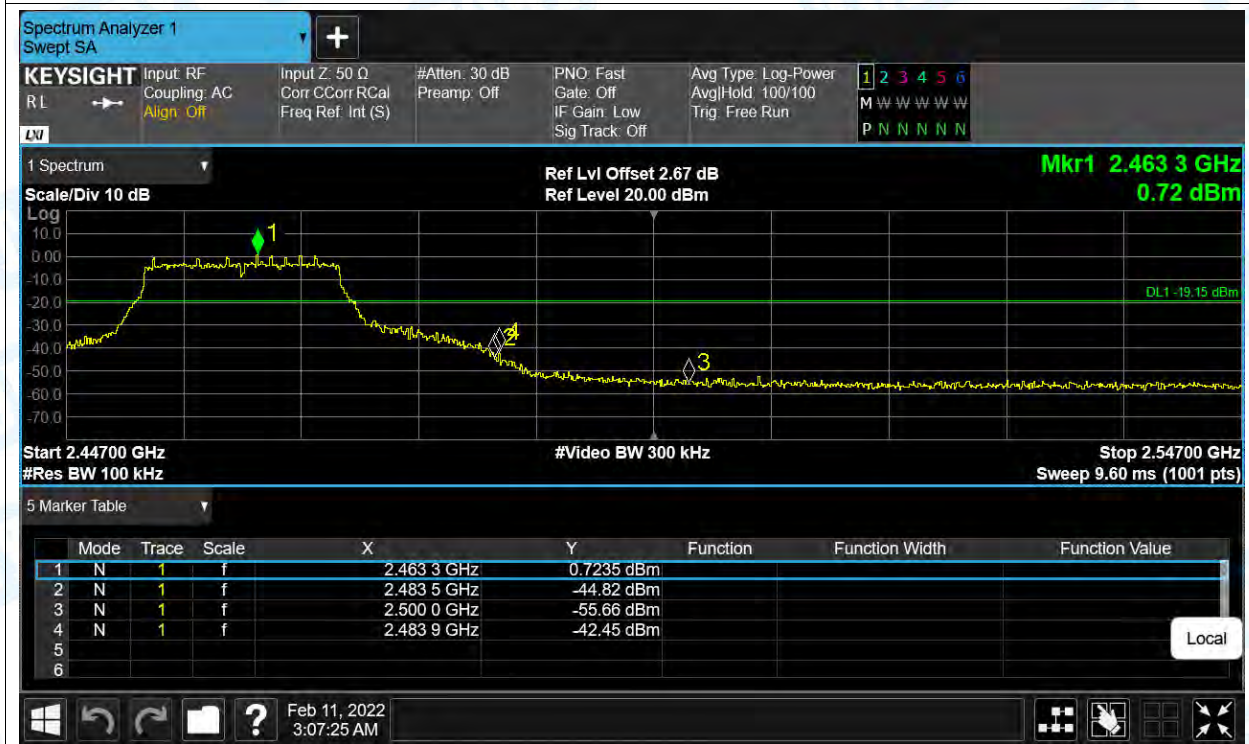
Band Edge NVNT g 2412MHz Ant1 Emission



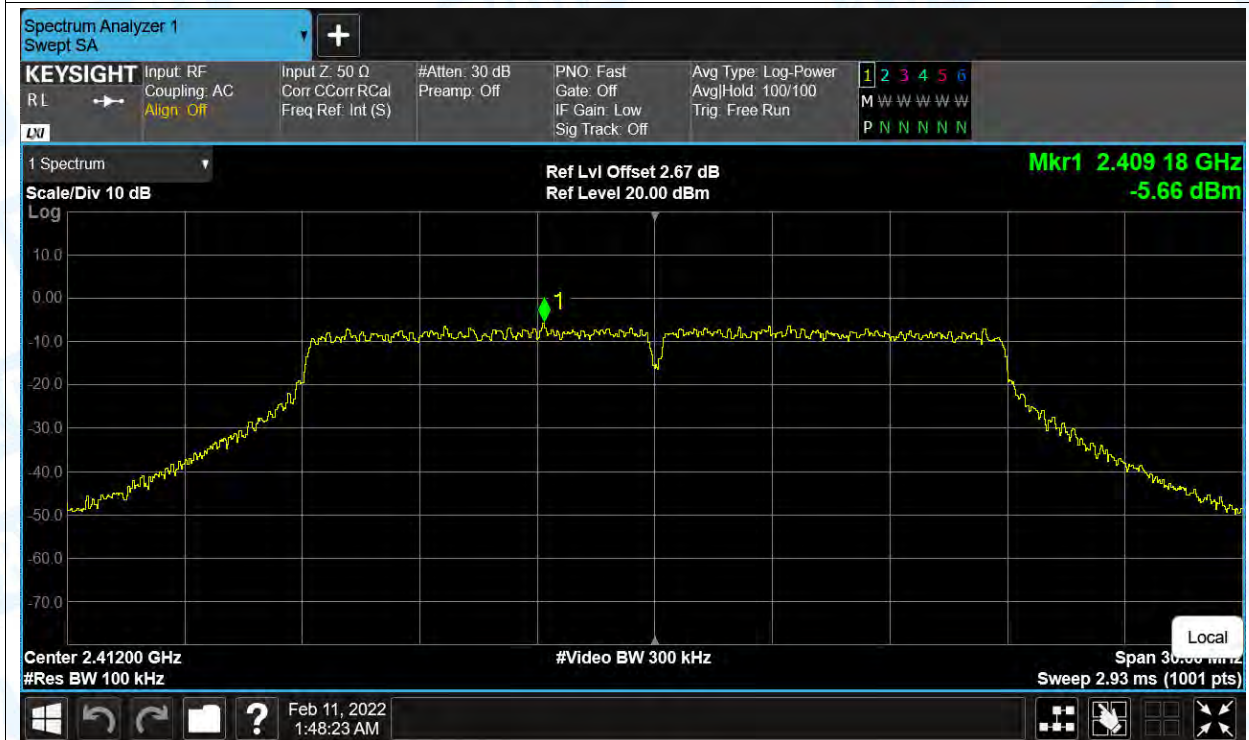
Band Edge NVNT g 2462MHz Ant1 Ref



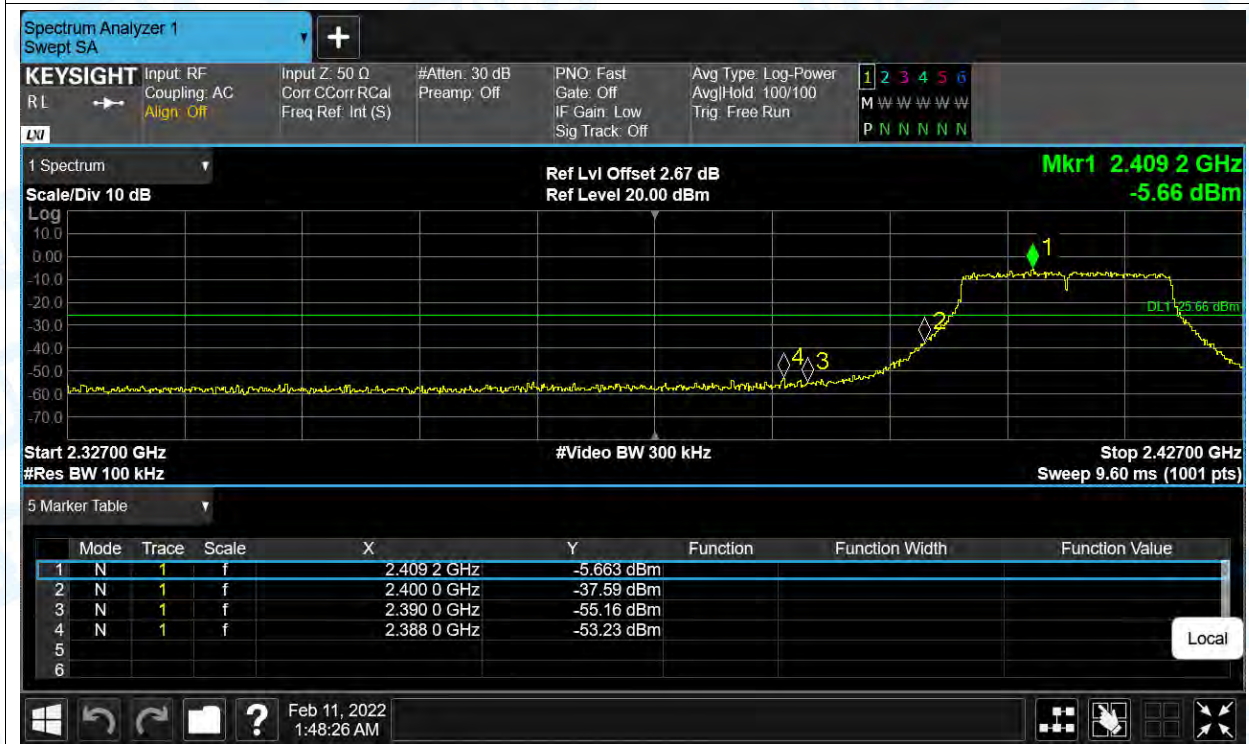
Band Edge NVNT g 2462MHz Ant1 Emission



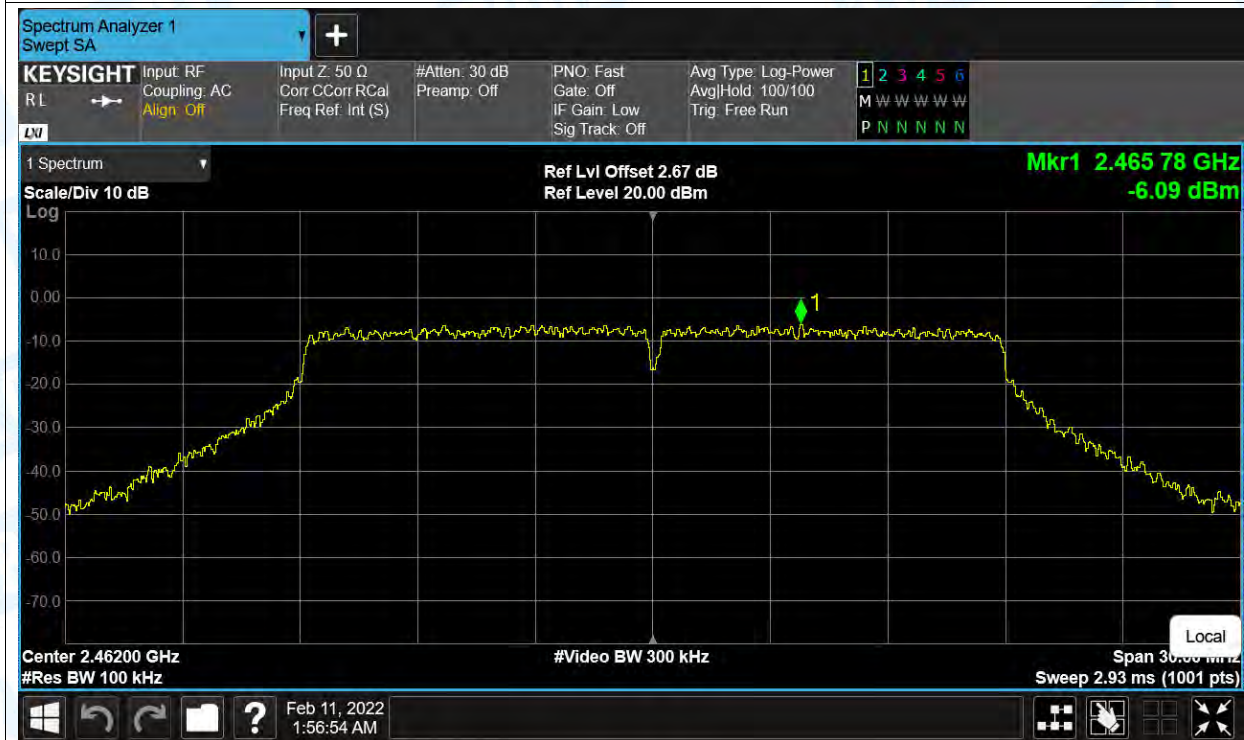
Band Edge NVNT n(HT20) 2412MHz Ant1 Ref



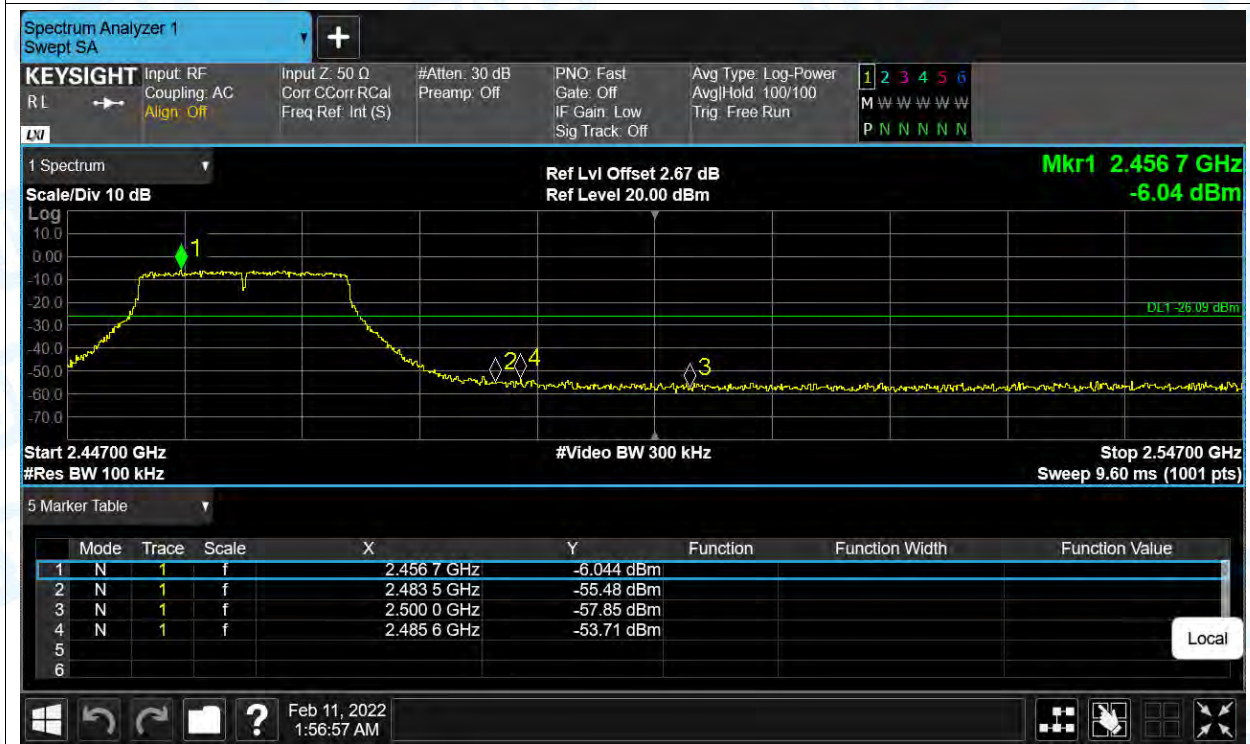
Band Edge NVNT n(HT20) 2412MHz Ant1 Emission



Band Edge NVNT n(HT20) 2462MHz Ant1 Ref



Band Edge NVNT n(HT20) 2462MHz Ant1 Emission



Conducted RF Spurious Emission

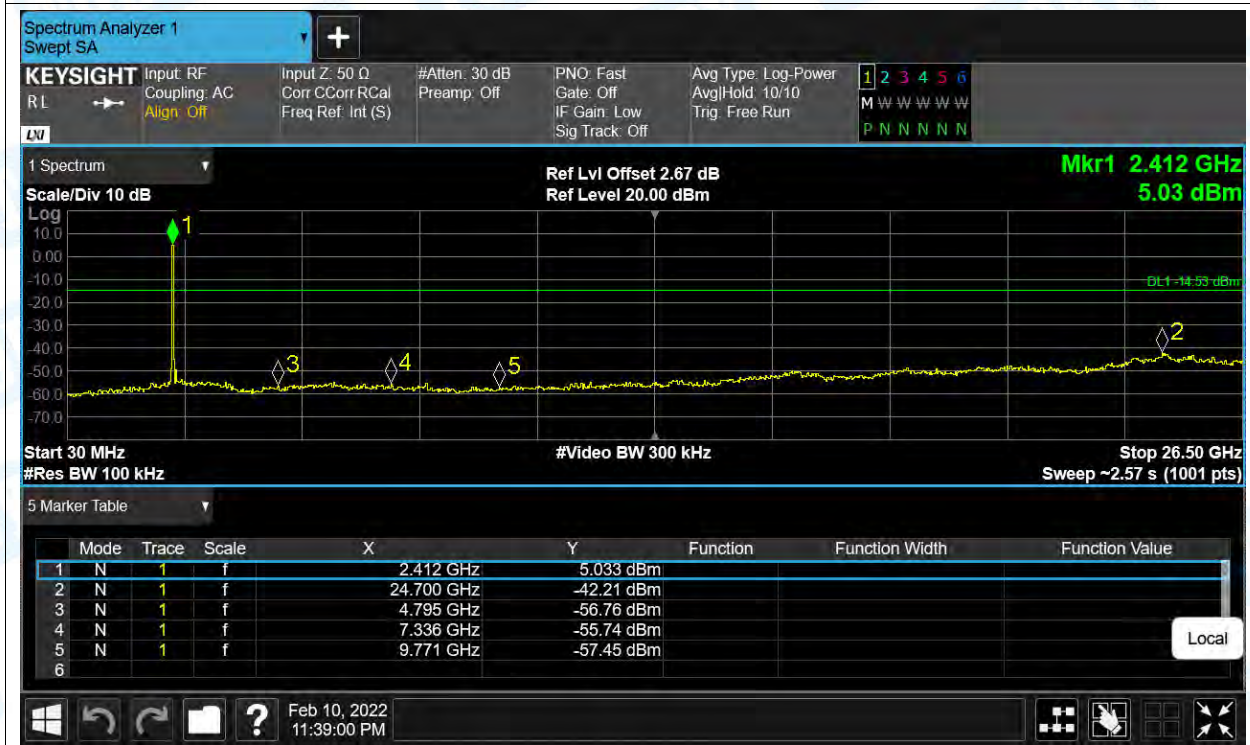
Condition	Mode	Frequency (MHz)	Antenna	Max Value (dBc)	Limit (dBc)	Verdict
NVNT	b	2412	Ant1	-47.69	-20	Pass
NVNT	b	2437	Ant1	-47.38	-20	Pass
NVNT	b	2462	Ant1	-48.44	-20	Pass
NVNT	g	2412	Ant1	-42.5	-20	Pass
NVNT	g	2437	Ant1	-43.78	-20	Pass
NVNT	g	2462	Ant1	-42.35	-20	Pass
NVNT	n(HT20)	2412	Ant1	-36.87	-20	Pass
NVNT	n(HT20)	2437	Ant1	-35.12	-20	Pass
NVNT	n(HT20)	2462	Ant1	-37	-20	Pass

Test Graphs

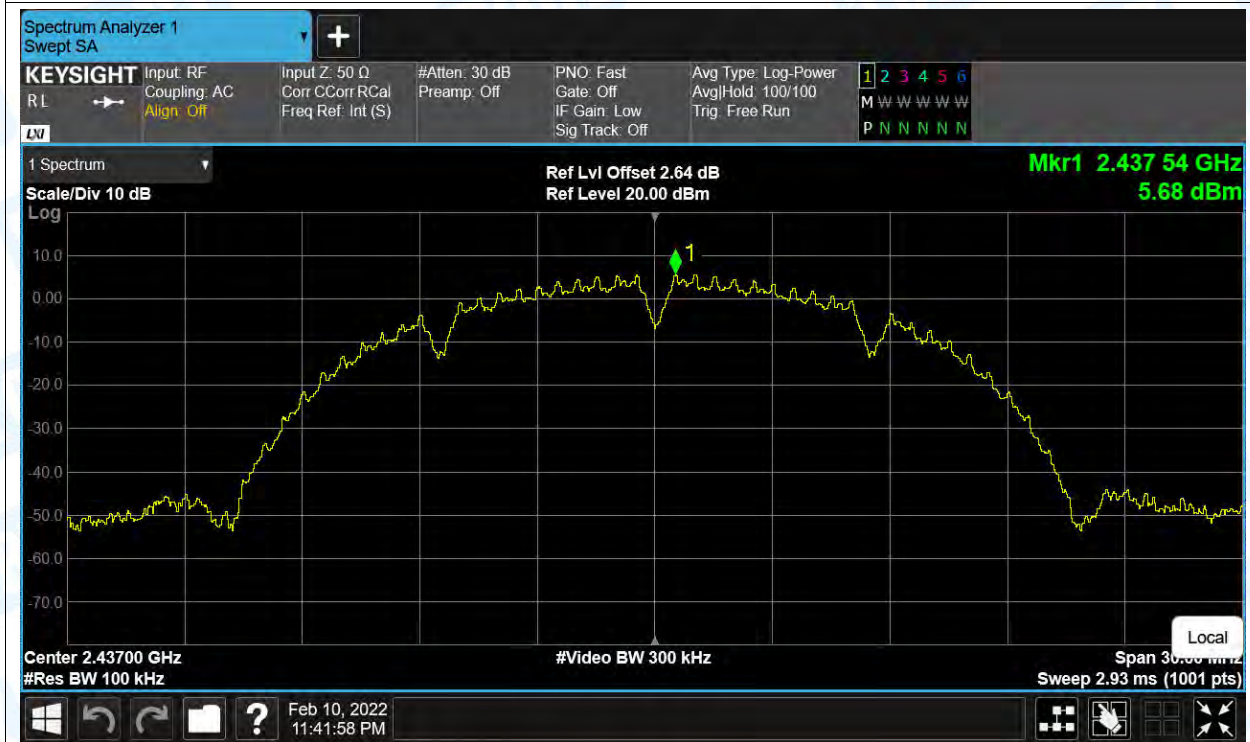
Tx. Spurious NVNT b 2412MHz Ant1 Ref



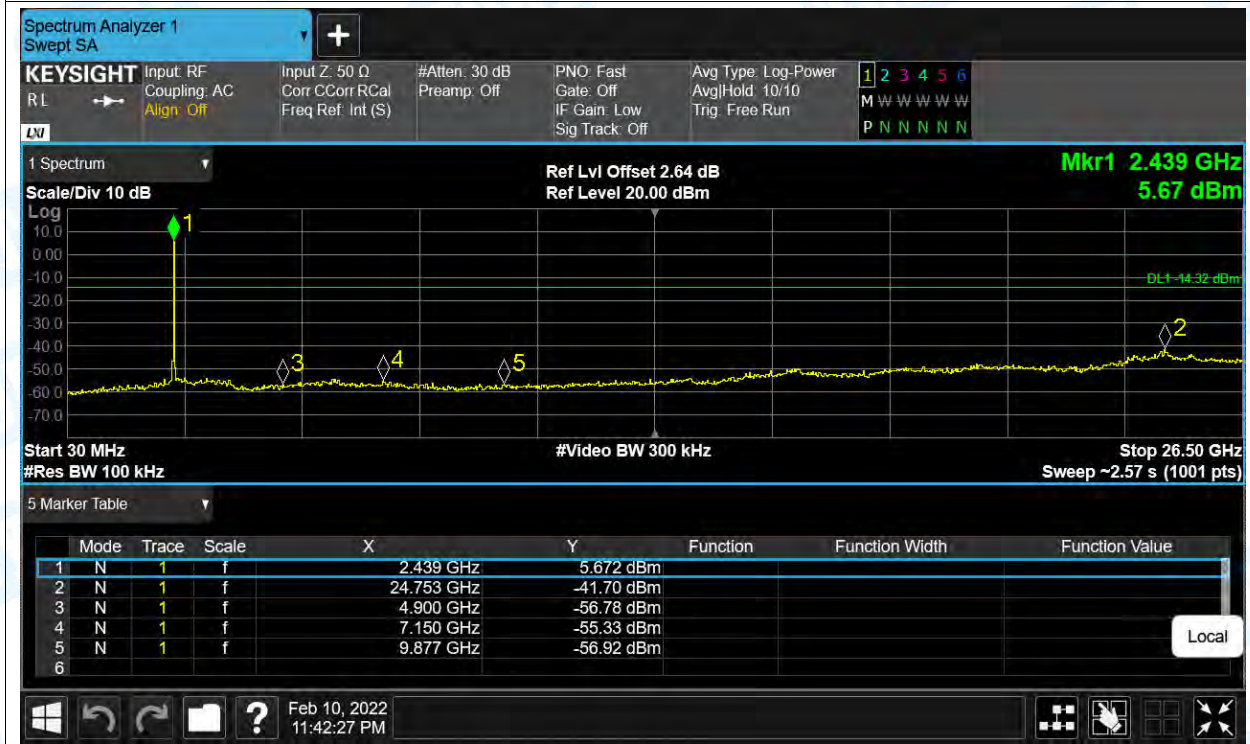
Tx. Spurious NVNT b 2412MHz Ant1 Emission



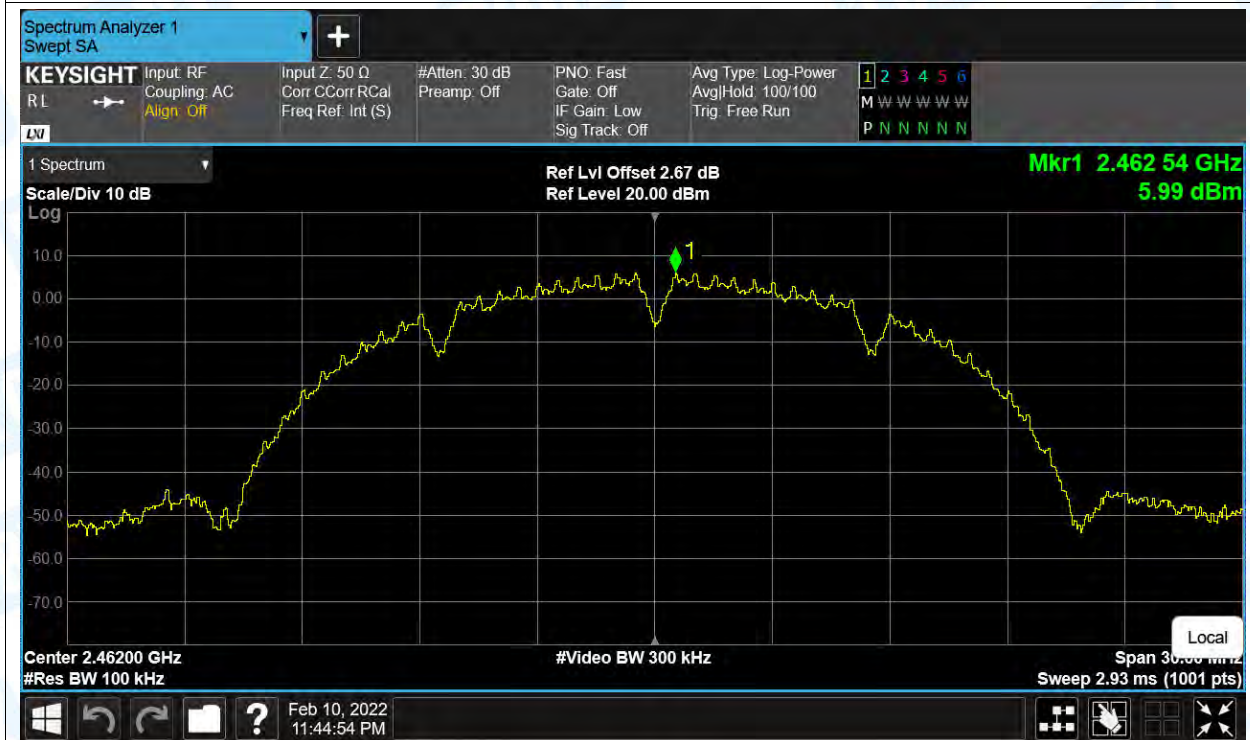
Tx. Spurious NVNT b 2437MHz Ant1 Ref



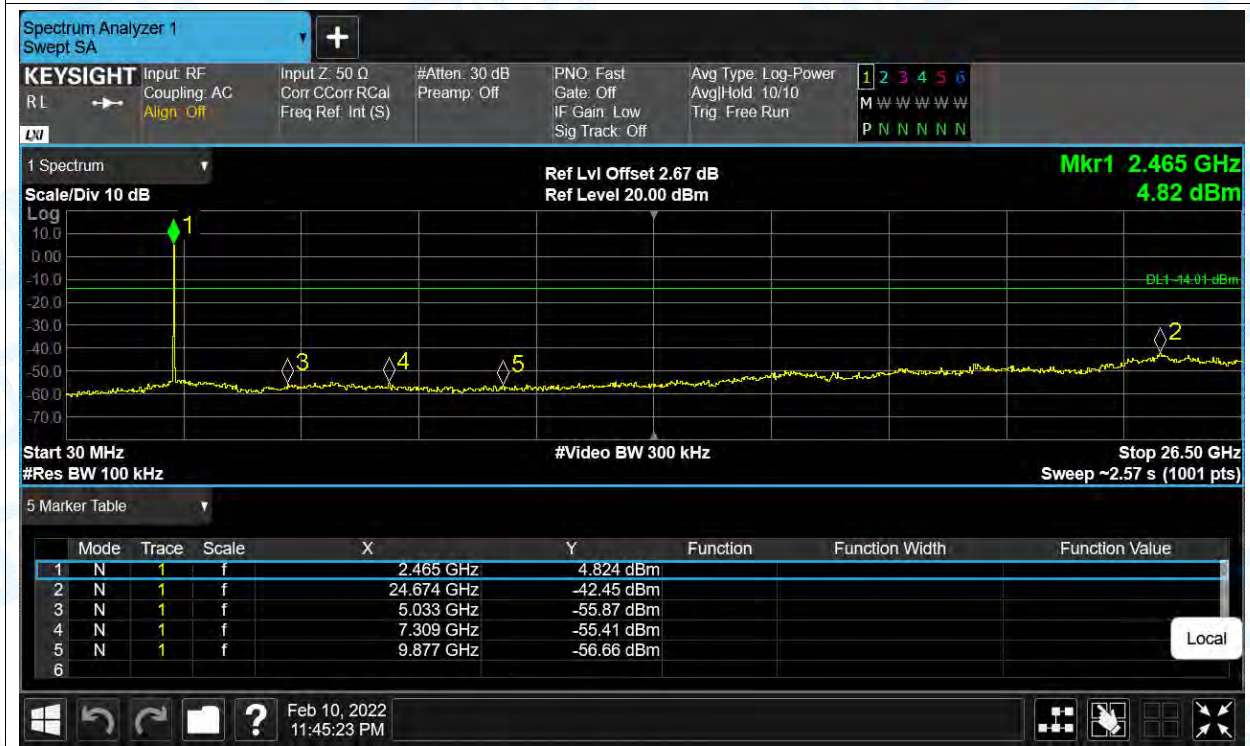
Tx. Spurious NVNT b 2437MHz Ant1 Emission



Tx. Spurious NVNT b 2462MHz Ant1 Ref



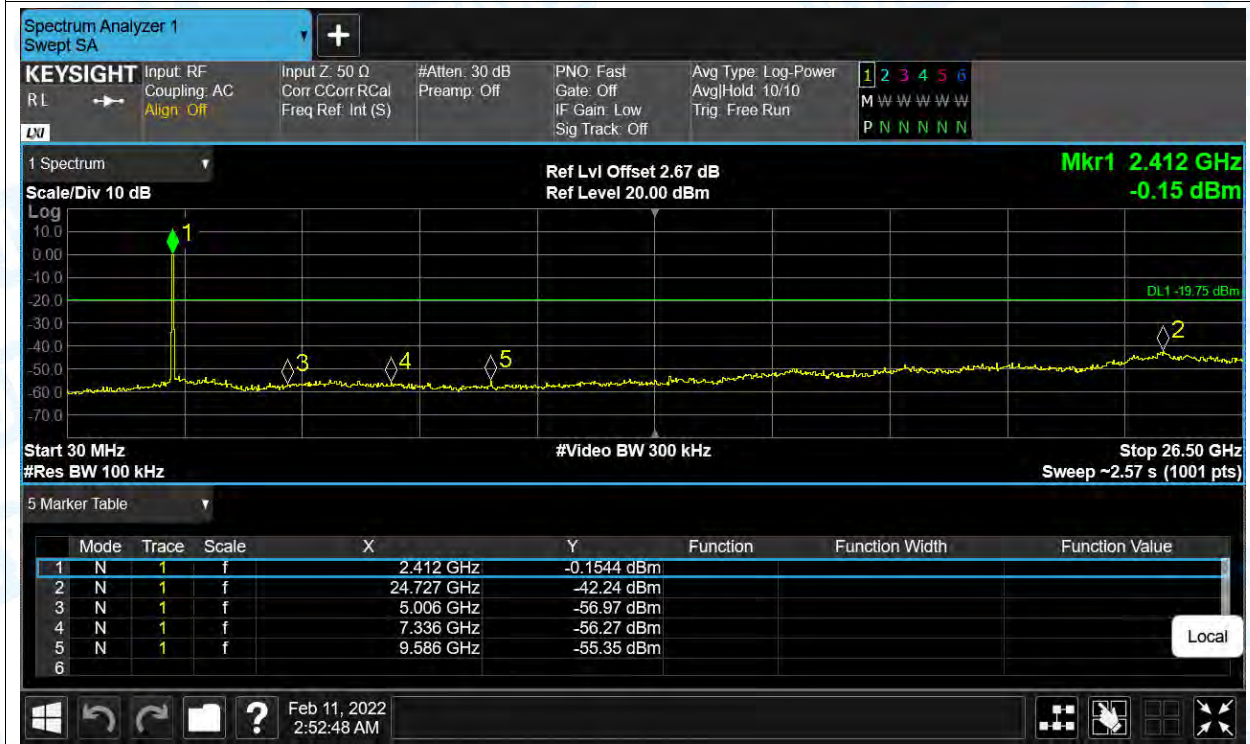
Tx. Spurious NVNT b 2462MHz Ant1 Emission



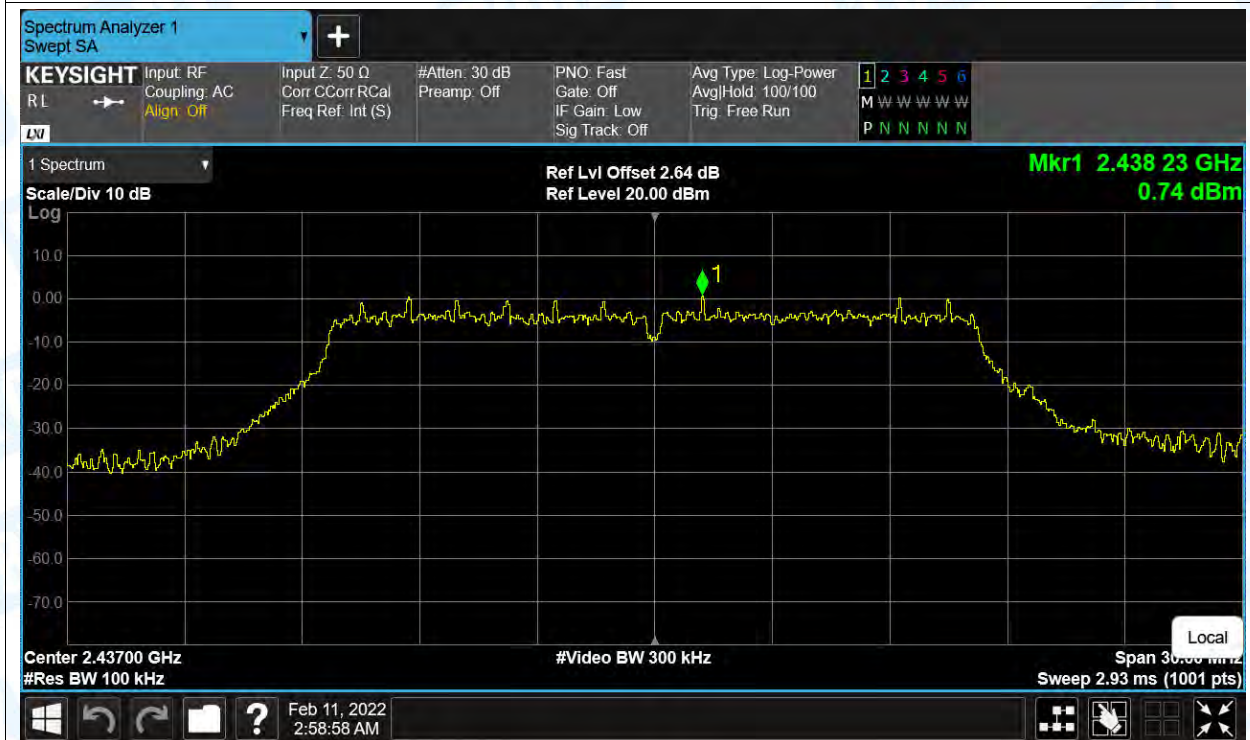
Tx. Spurious NVNT g 2412MHz Ant1 Ref



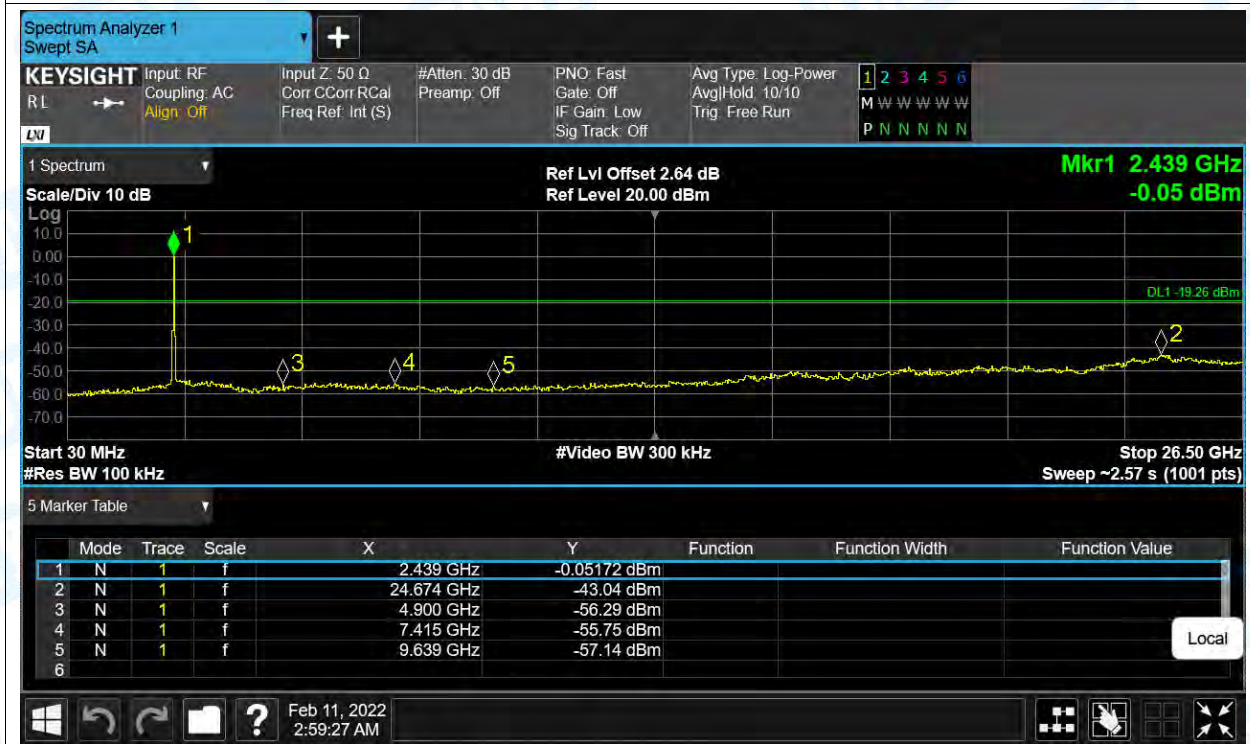
Tx. Spurious NVNT g 2412MHz Ant1 Emission



Tx. Spurious NVNT g 2437MHz Ant1 Ref



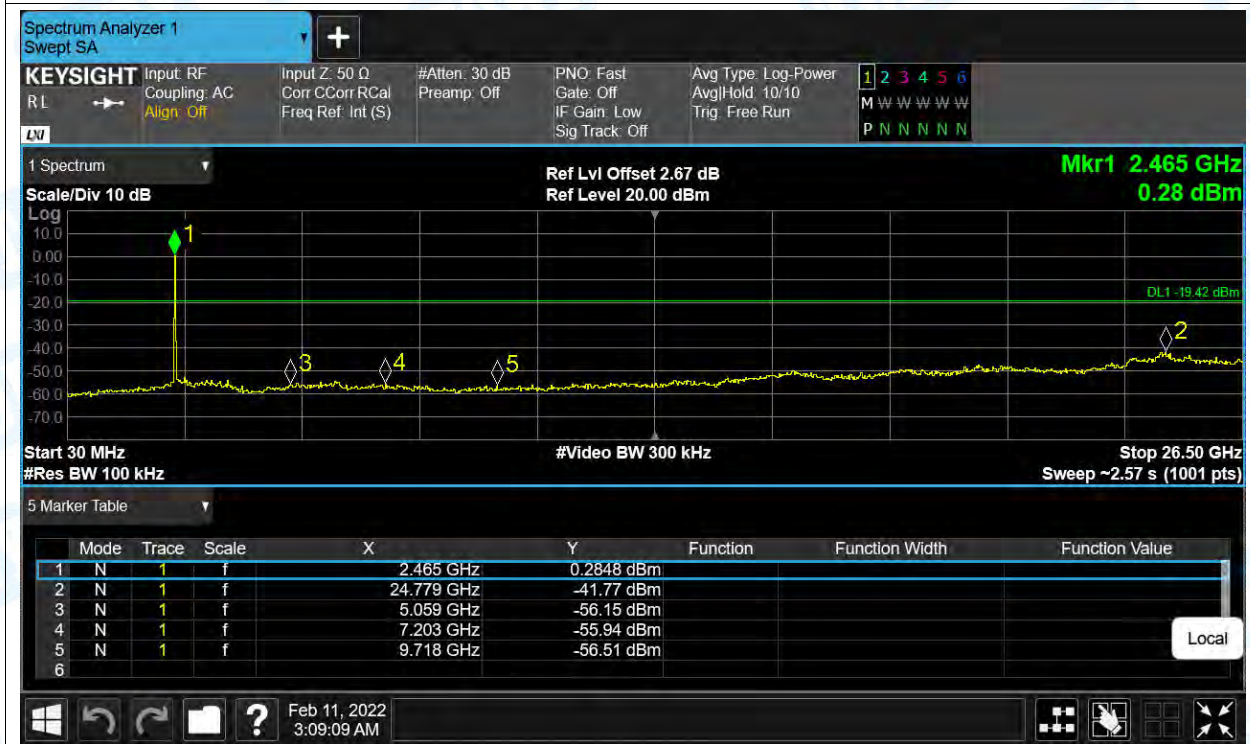
Tx. Spurious NVNT g 2437MHz Ant1 Emission



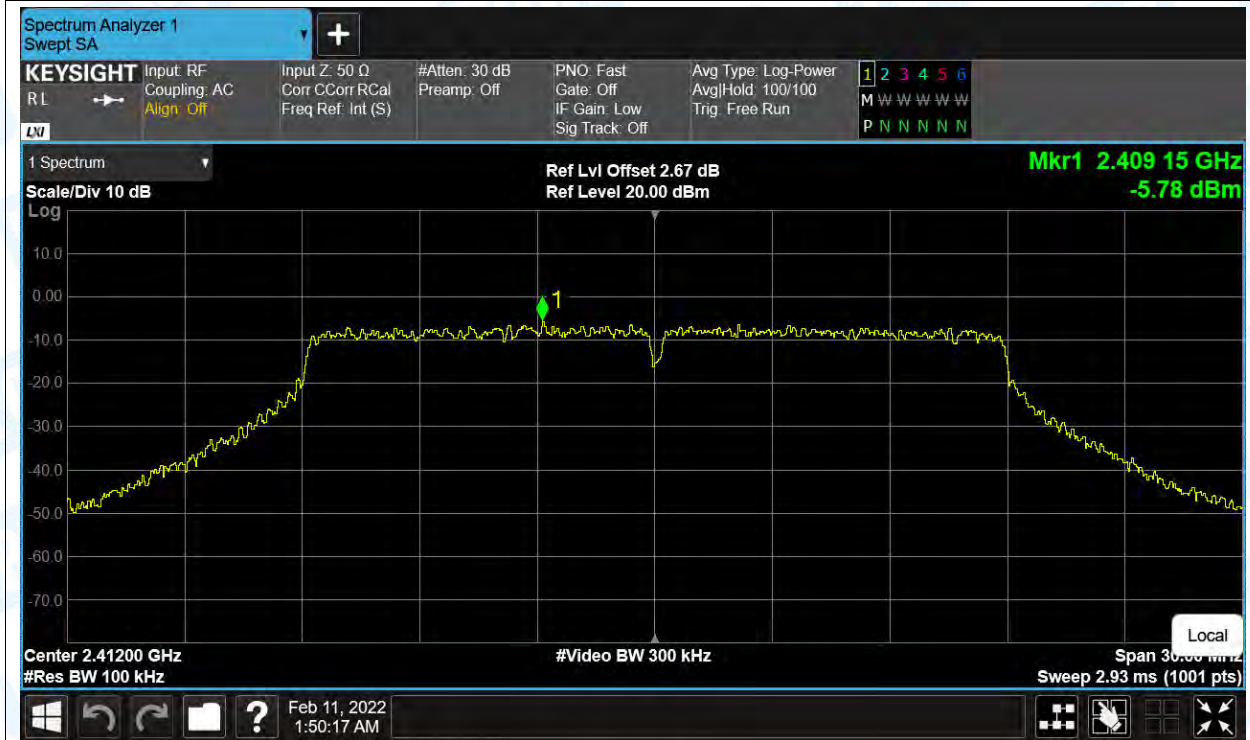
Tx. Spurious NVNT g 2462MHz Ant1 Ref



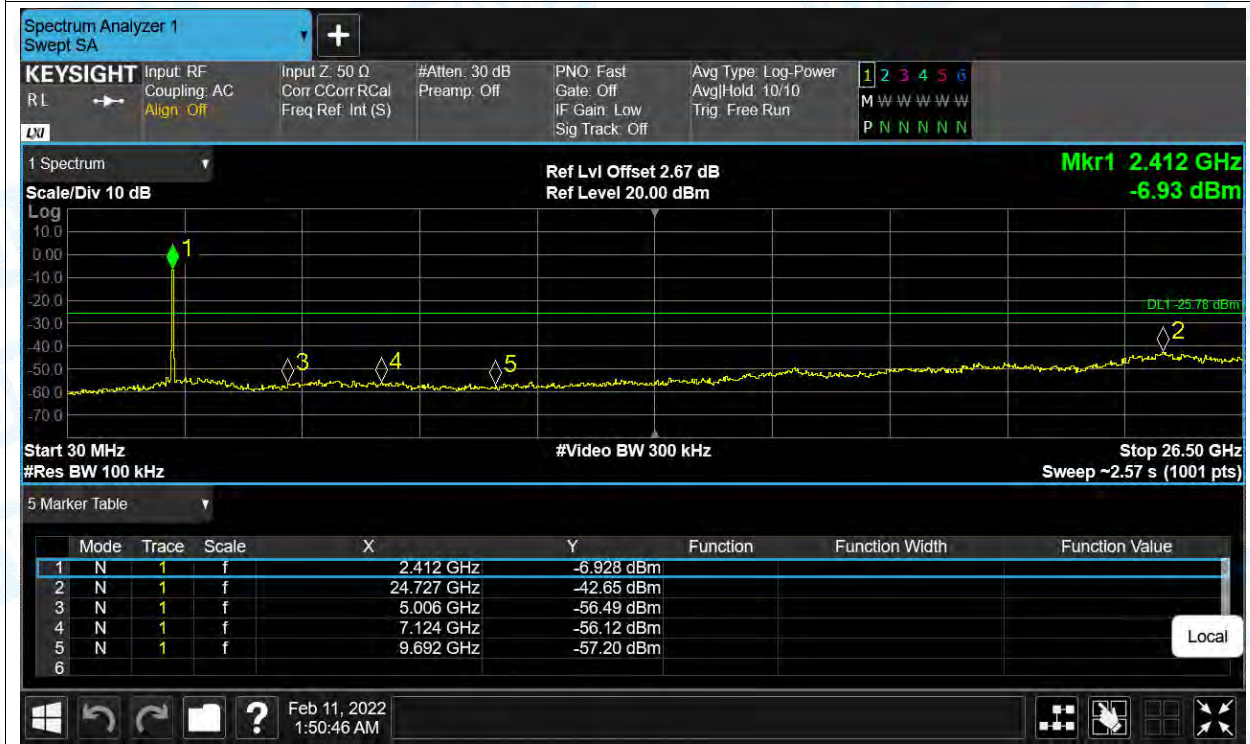
Tx. Spurious NVNT g 2462MHz Ant1 Emission



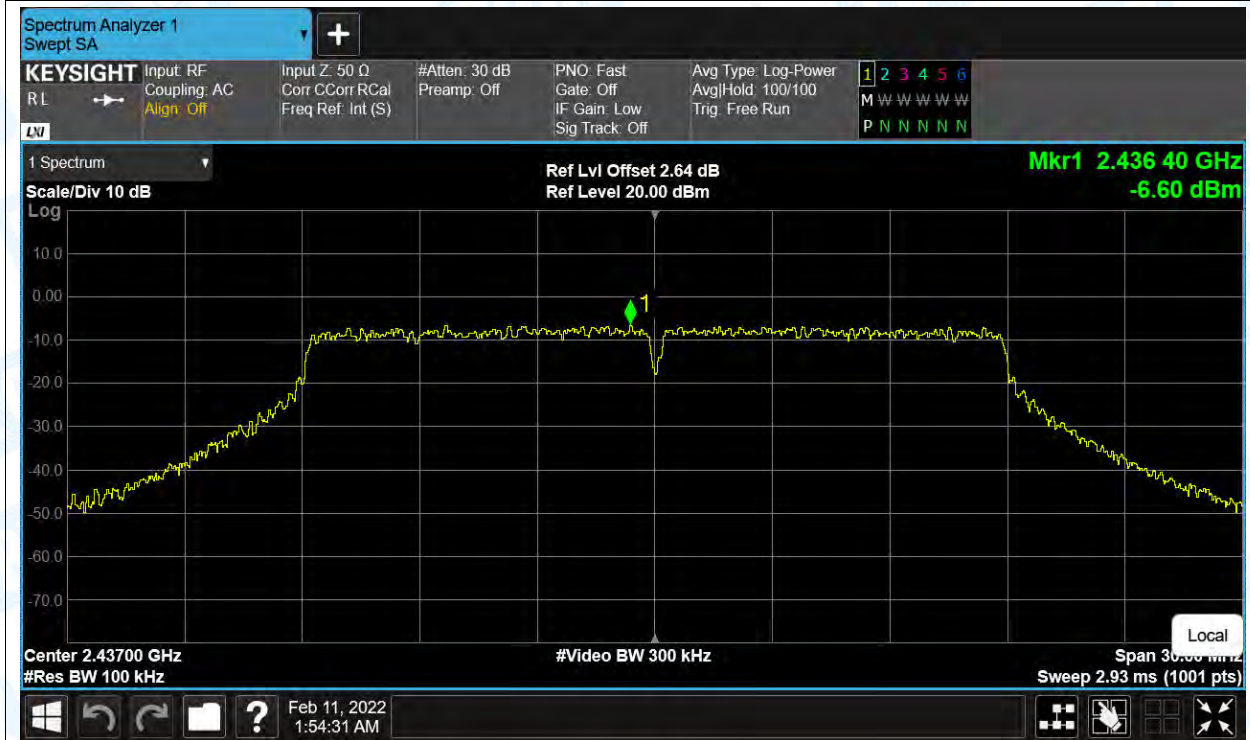
Tx. Spurious NVNT n(HT20) 2412MHz Ant1 Ref



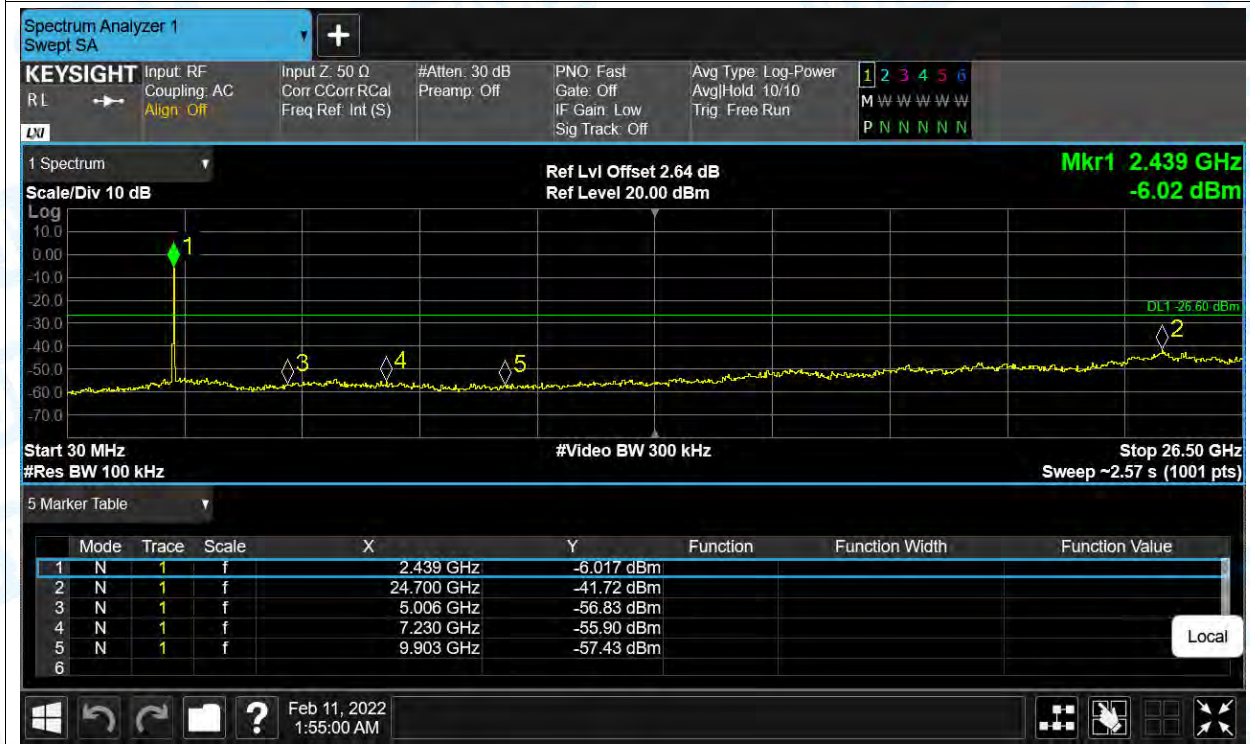
Tx. Spurious NVNT n(HT20) 2412MHz Ant1 Emission



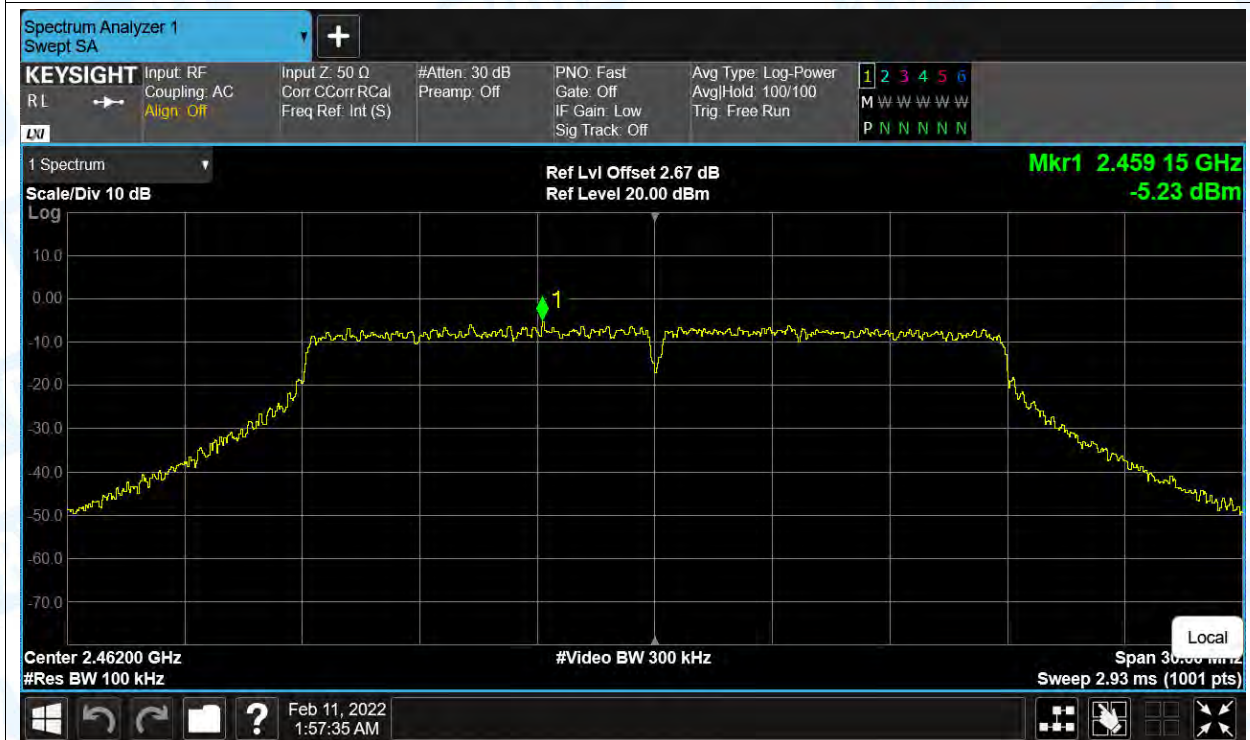
Tx. Spurious NVNT n(HT20) 2437MHz Ant1 Ref



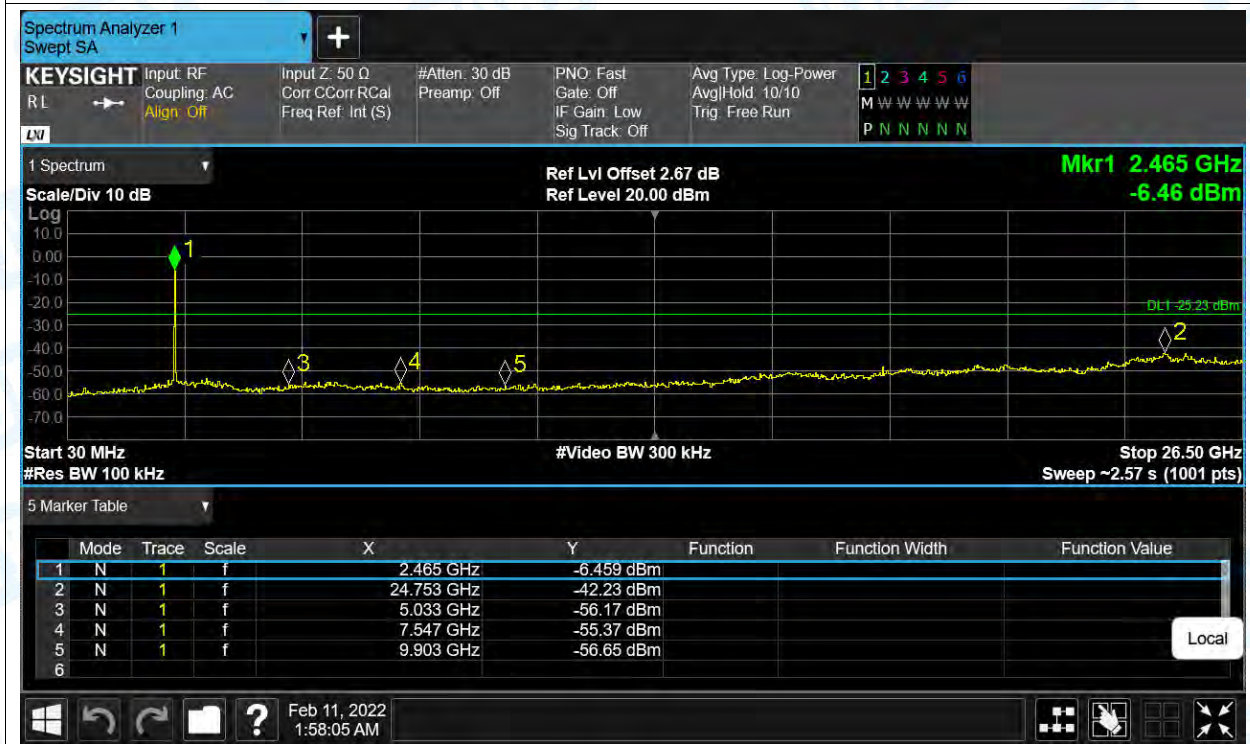
Tx. Spurious NVNT n(HT20) 2437MHz Ant1 Emission



Tx. Spurious NVNT n(HT20) 2462MHz Ant1 Ref



Tx. Spurious NVNT n(HT20) 2462MHz Ant1 Emission

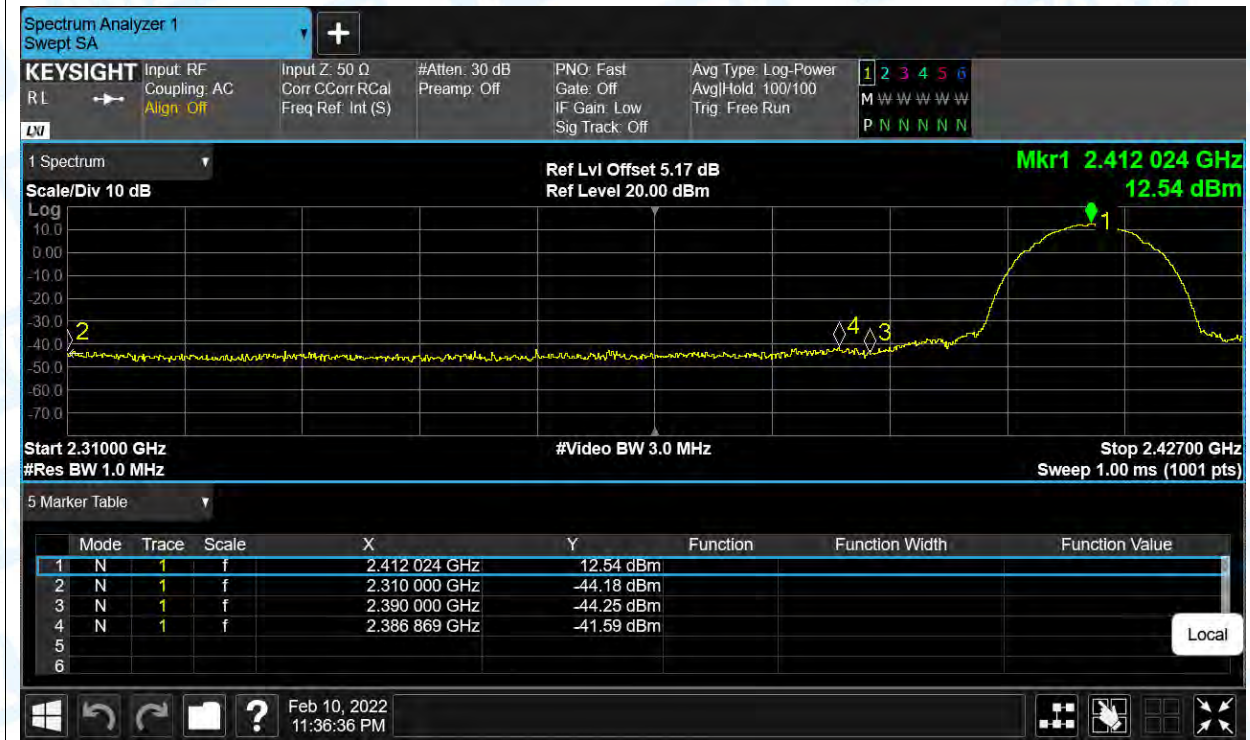


Restrict Band

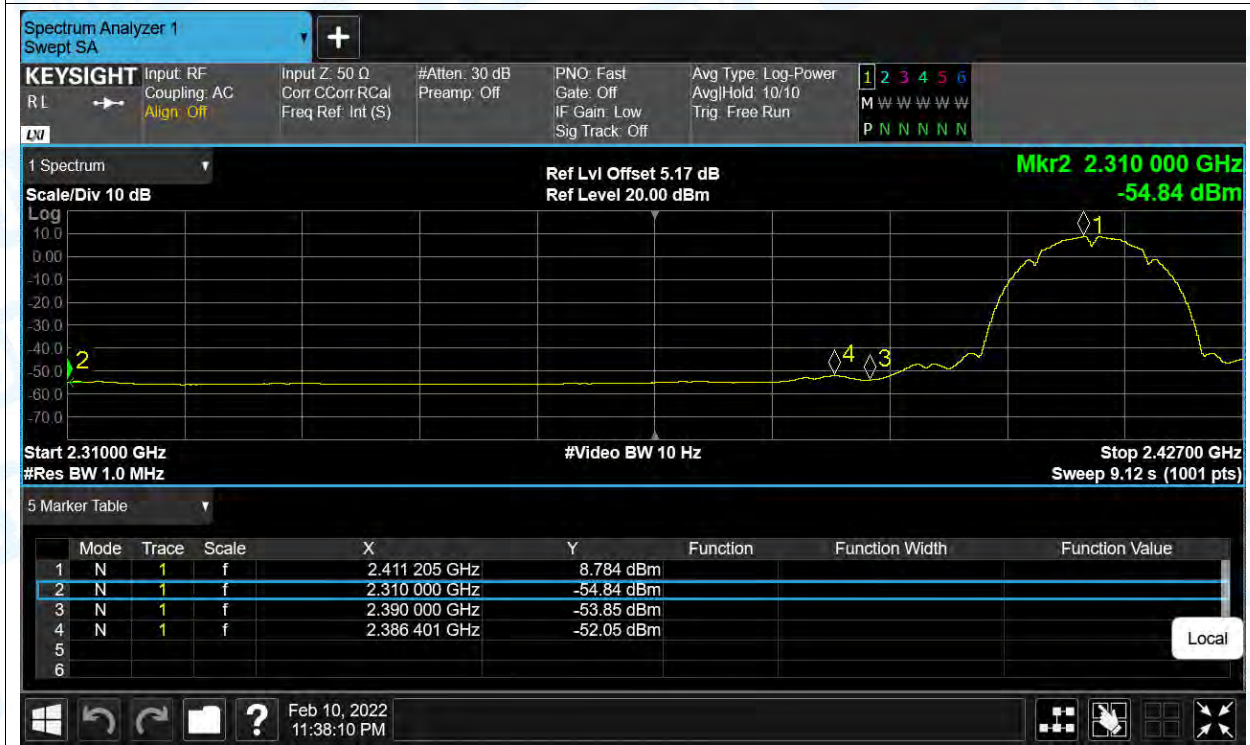
Condition	Mode	Frequency (MHz)	Antenna	Spur Freq (MHz)	Power (dBm)	Gain (dBi)	E (dBuV/m)	Detector	Limit (dBuV/m)	Verdict
NVNT	b	2412	Ant1	2310	-44.18	2.5	53.58	Peak	74	Pass
NVNT	b	2412	Ant1	2310	-54.84	2.5	42.92	Average	54	Pass
NVNT	b	2412	Ant1	2386.869	-41.59	2.5	56.17	Peak	74	Pass
NVNT	b	2412	Ant1	2386.401	-52.05	2.5	45.71	Average	54	Pass
NVNT	b	2412	Ant1	2390	-44.25	2.5	53.51	Peak	74	Pass
NVNT	b	2412	Ant1	2390	-53.85	2.5	43.91	Average	54	Pass
NVNT	b	2462	Ant1	2483.5	-42.7	2.5	55.06	Peak	74	Pass
NVNT	b	2462	Ant1	2483.5	-53.32	2.5	44.44	Average	54	Pass
NVNT	b	2462	Ant1	2487.545	-40.48	2.5	57.28	Peak	74	Pass
NVNT	b	2462	Ant1	2486.962	-52.64	2.5	45.12	Average	54	Pass
NVNT	b	2462	Ant1	2500	-45.83	2.5	51.93	Peak	74	Pass
NVNT	b	2462	Ant1	2500	-54.35	2.5	43.41	Average	54	Pass
NVNT	g	2412	Ant1	2310	-46.48	2.5	51.28	Peak	74	Pass
NVNT	g	2412	Ant1	2310	-56.53	2.5	41.23	Average	54	Pass
NVNT	g	2412	Ant1	2389.911	-27.99	2.5	69.77	Peak	74	Pass
NVNT	g	2412	Ant1	2389.911	-46.66	2.5	51.1	Average	54	Pass
NVNT	g	2412	Ant1	2390	-31.8	2.5	65.96	Peak	74	Pass
NVNT	g	2412	Ant1	2390	-46.53	2.5	51.23	Average	54	Pass
NVNT	g	2462	Ant1	2483.5	-25.21	2.5	72.55	Peak	74	Pass
NVNT	g	2462	Ant1	2483.5	-46.27	2.5	51.49	Average	54	Pass
NVNT	g	2462	Ant1	2483.517	-25.21	2.5	72.55	Peak	74	Pass
NVNT	g	2462	Ant1	2483.517	-46.27	2.5	51.49	Average	54	Pass
NVNT	g	2462	Ant1	2500	-44.77	2.5	52.99	Peak	74	Pass
NVNT	g	2462	Ant1	2500	-54.35	2.5	43.41	Average	54	Pass
NVNT	n(HT20)	2412	Ant1	2310	-45.99	2.5	51.77	Peak	74	Pass
NVNT	n(HT20)	2412	Ant1	2310	-56.3	2.5	41.46	Average	54	Pass
NVNT	n(HT20)	2412	Ant1	2369.787	-42.21	2.5	55.55	Peak	74	Pass
NVNT	n(HT20)	2412	Ant1	2389.911	-53.6	2.5	44.16	Average	54	Pass
NVNT	n(HT20)	2412	Ant1	2390	-44.27	2.5	53.49	Peak	74	Pass
NVNT	n(HT20)	2412	Ant1	2390	-53.56	2.5	44.2	Average	54	Pass
NVNT	n(HT20)	2462	Ant1	2483.5	-43.69	2.5	54.07	Peak	74	Pass
NVNT	n(HT20)	2462	Ant1	2483.5	-53.08	2.5	44.68	Average	54	Pass
NVNT	n(HT20)	2462	Ant1	2484.1	-41.34	2.5	56.42	Peak	74	Pass
NVNT	n(HT20)	2462	Ant1	2483.517	-53.08	2.5	44.68	Average	54	Pass
NVNT	n(HT20)	2462	Ant1	2500	-45.43	2.5	52.33	Peak	74	Pass
NVNT	n(HT20)	2462	Ant1	2500	-55.06	2.5	42.7	Average	54	Pass

Test Graphs

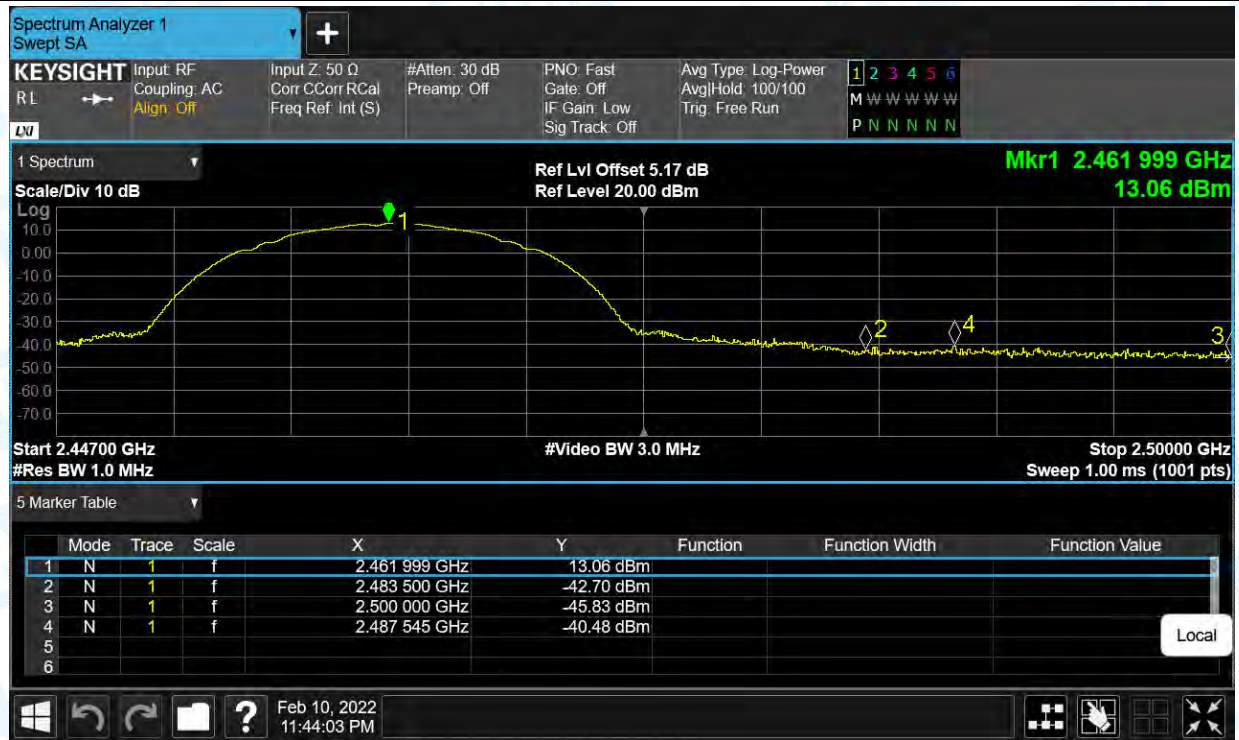
Restrict Band NVNT b 2412MHz Ant1 Peak



Restrict Band NVNT b 2412MHz Ant1 Average



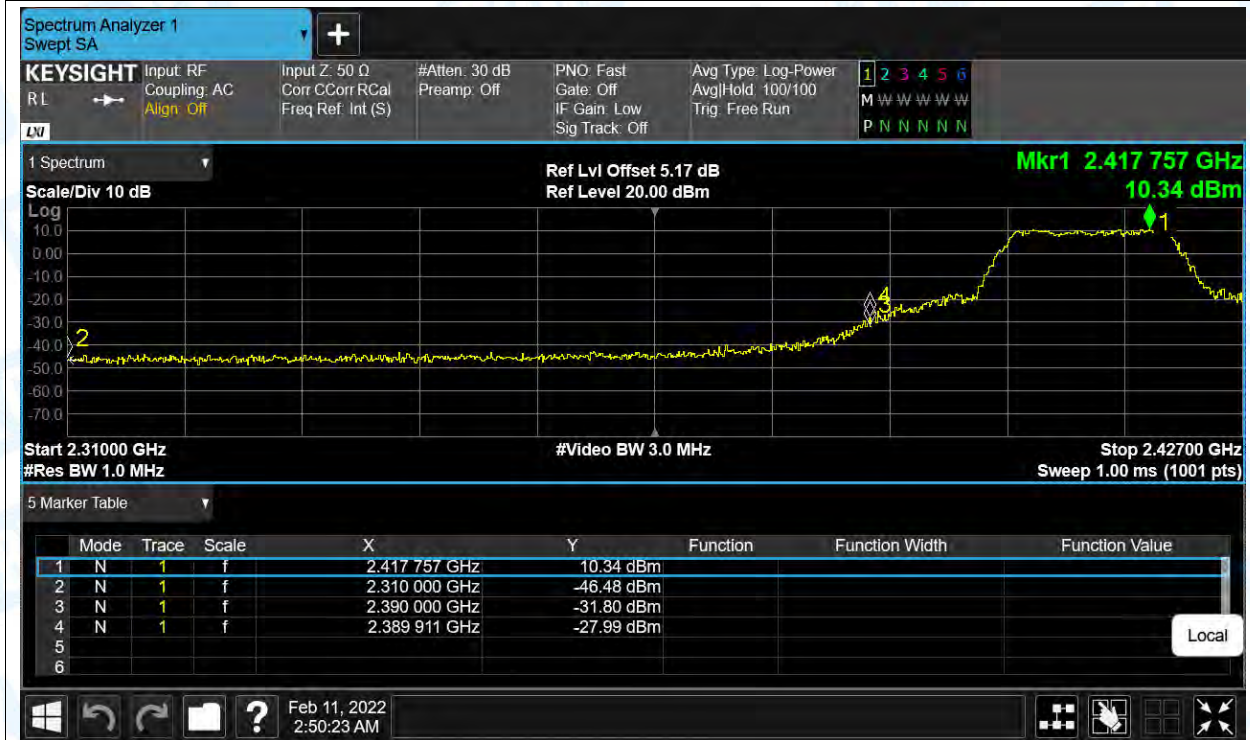
Restrict Band NVNT b 2462MHz Ant1 Peak



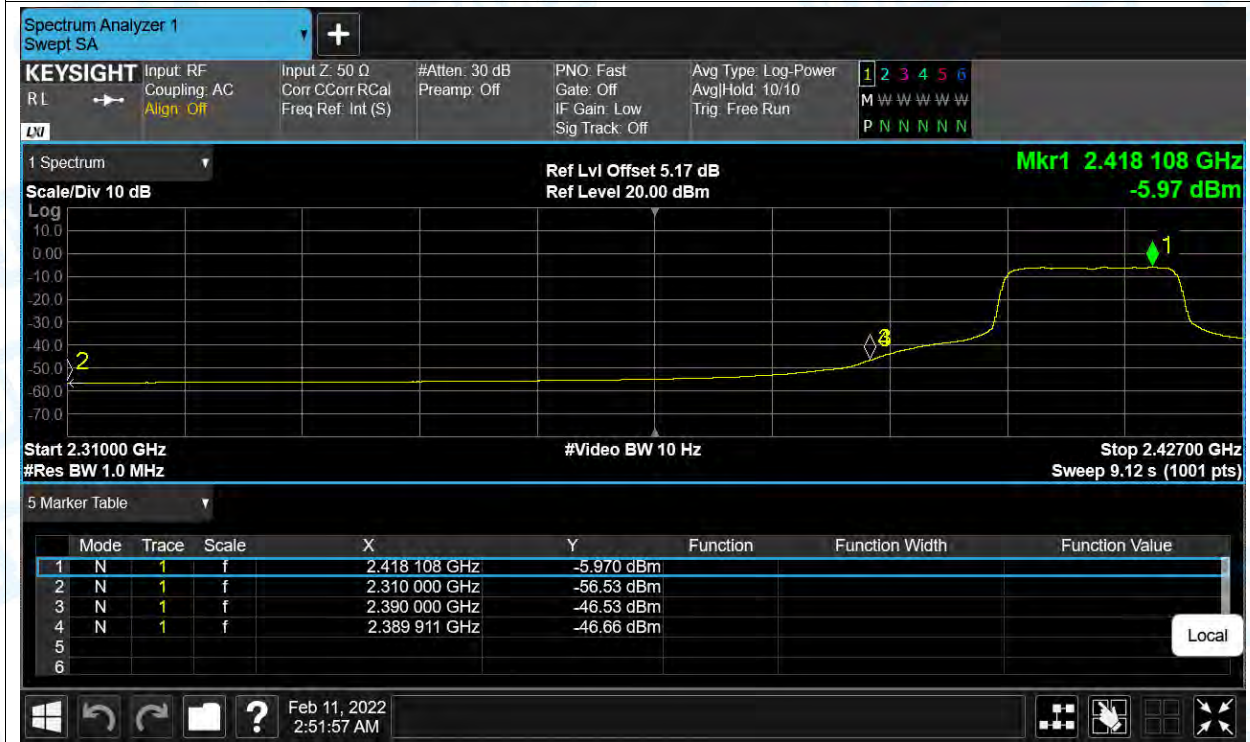
Restrict Band NVNT b 2462MHz Ant1 Average



Restrict Band NVNT g 2412MHz Ant1 Peak



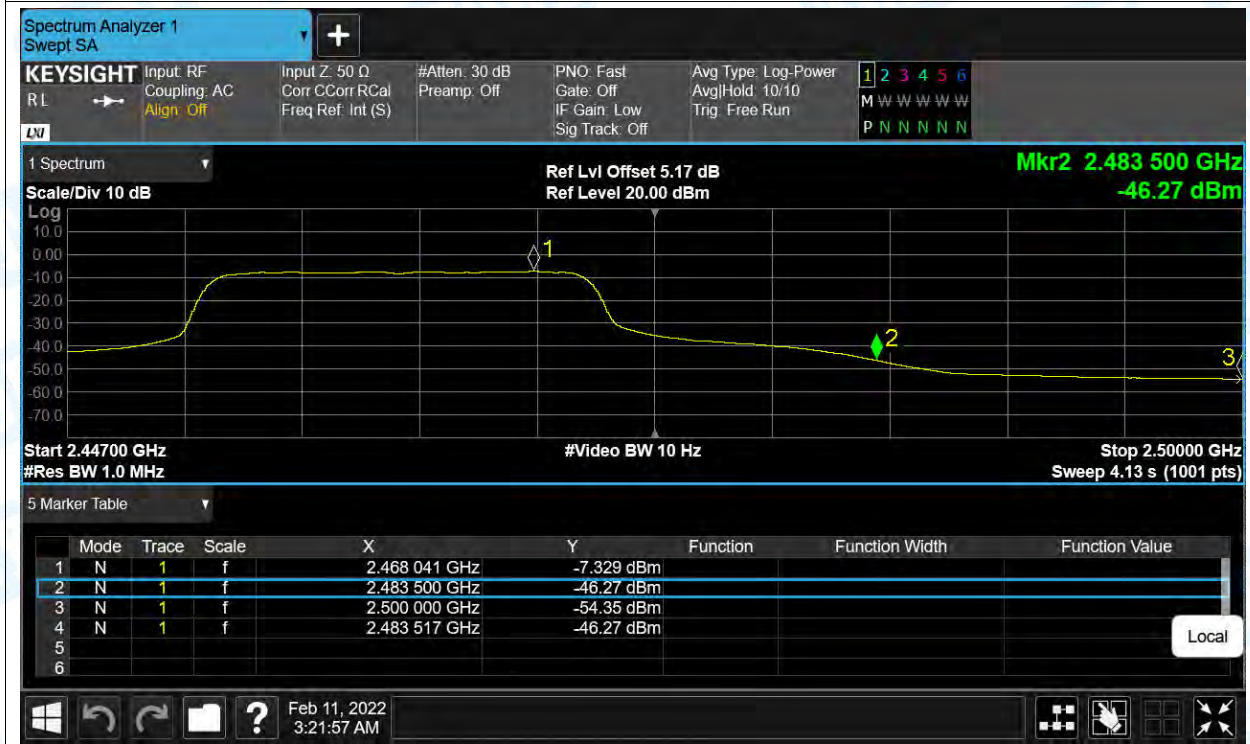
Restrict Band NVNT g 2412MHz Ant1 Average



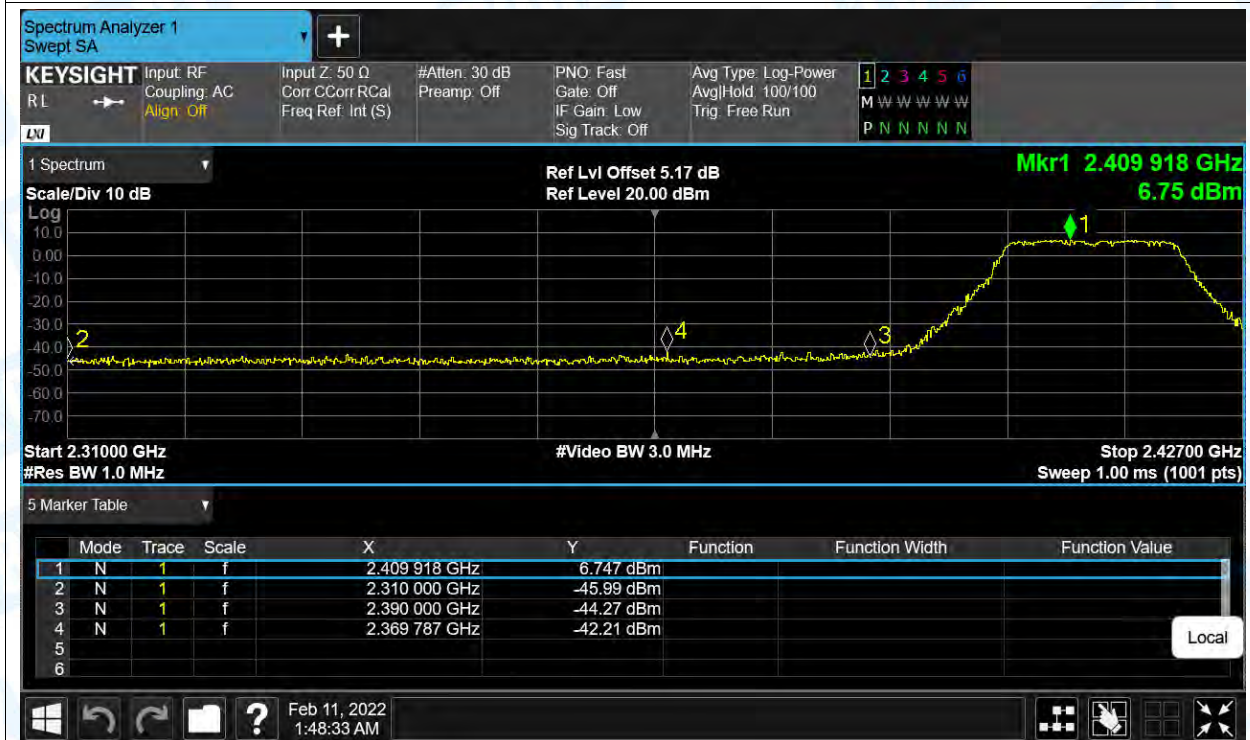
Restrict Band NVNT g 2462MHz Ant1 Peak



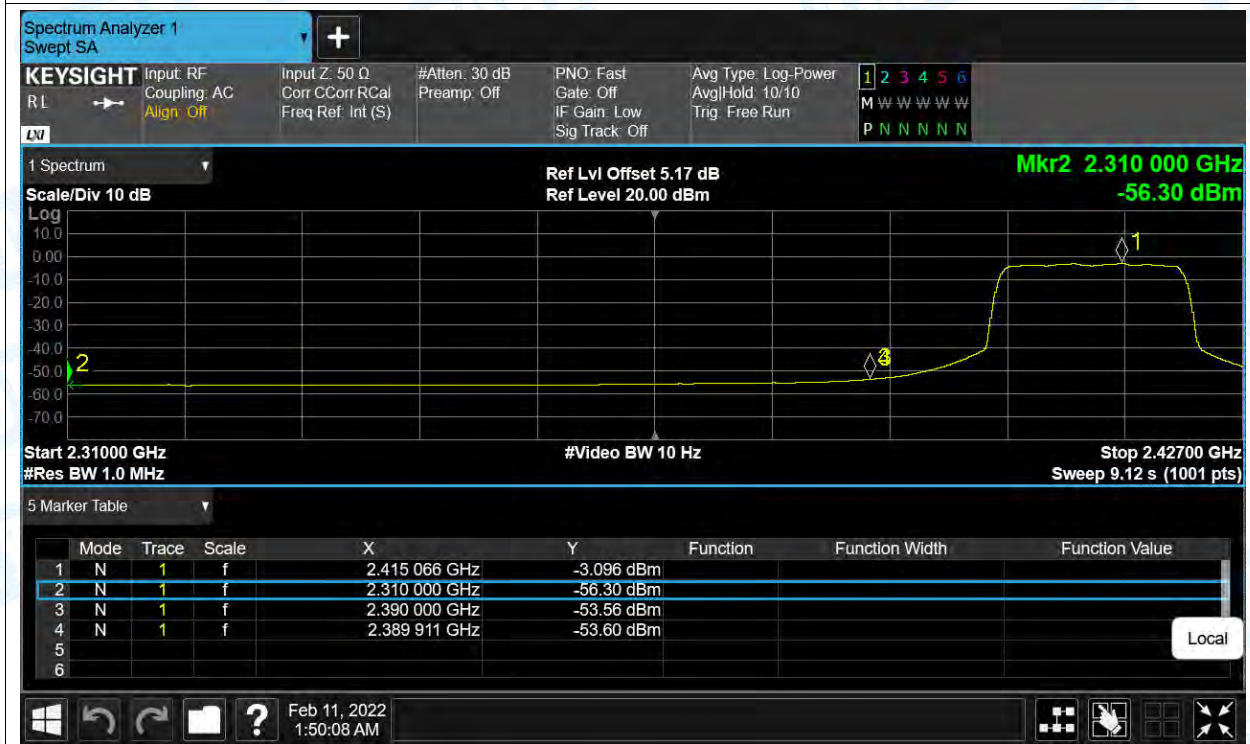
Restrict Band NVNT g 2462MHz Ant1 Average



Restrict Band NVNT n(HT20) 2412MHz Ant1 Peak



Restrict Band NVNT n(HT20) 2412MHz Ant1 Average



Restrict Band NVNT n(HT20) 2462MHz Ant1 Peak



Restrict Band NVNT n(HT20) 2462MHz Ant1 Average

