

RF Test Data for Bluetooth LE

(Conducted Measurements)

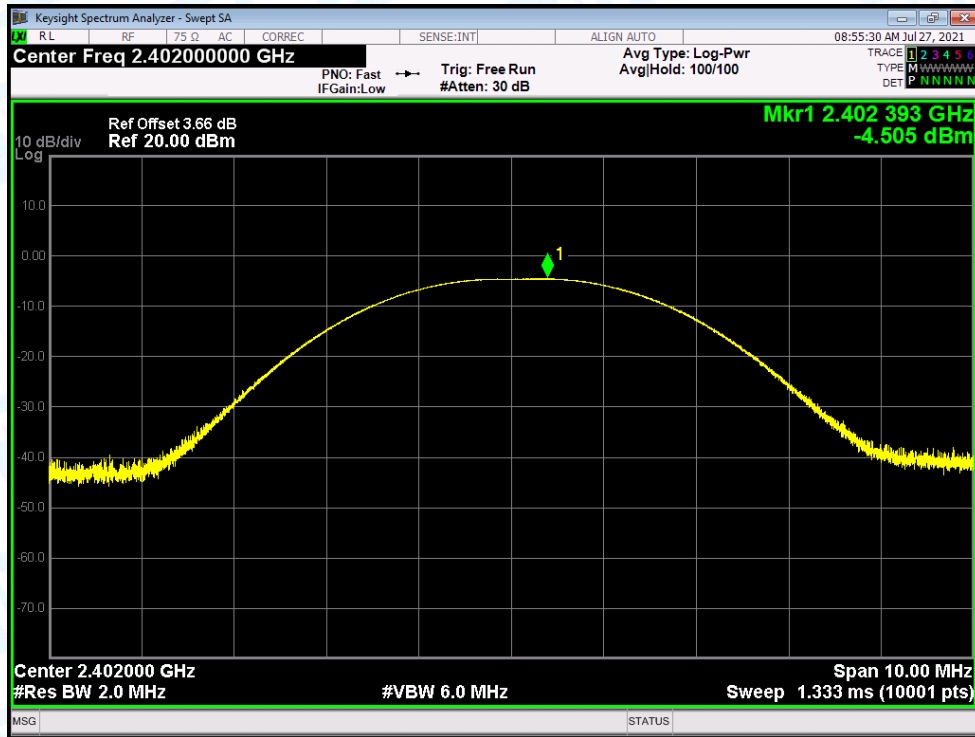
General Description of EUT	
Product Name:	Wecount smart tracker
Test Model:	WCT001
Sample ID:	20210610-13-4#
Environmental Conditions	
Temperature:	23.8℃
Relative Humidity:	48%
Test Voltage:	DC 5V
Test Engineer:	HeJingchang
Note: For a more detailed features description, please refer to the report TB-RF182722.	

1.Maximum Conducted Output Power

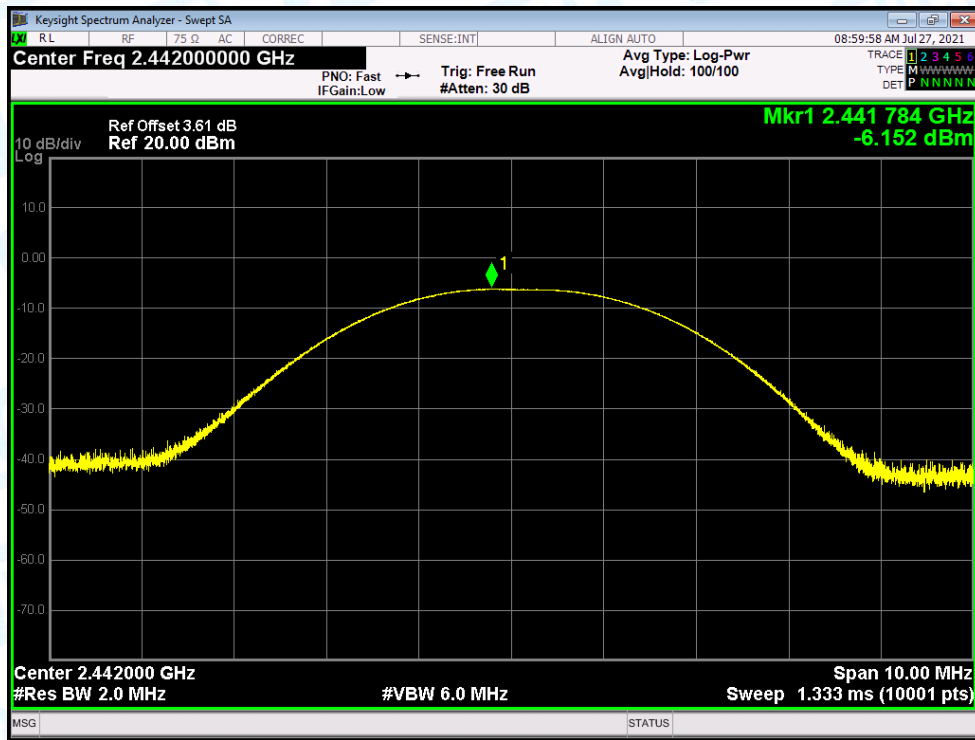
Condition	Mode	Frequency (MHz)	Conducted Power (dBm)	Duty Factor (dB)	Total Power (dBm)	Limit (dBm)	Verdict
NVNT	BLE 1Mbps	2402	-4.505	0	-4.505	30	Pass
NVNT	BLE 1Mbps	2442	-6.152	0	-6.152	30	Pass
NVNT	BLE 1Mbps	2480	-8.446	0	-8.446	30	Pass

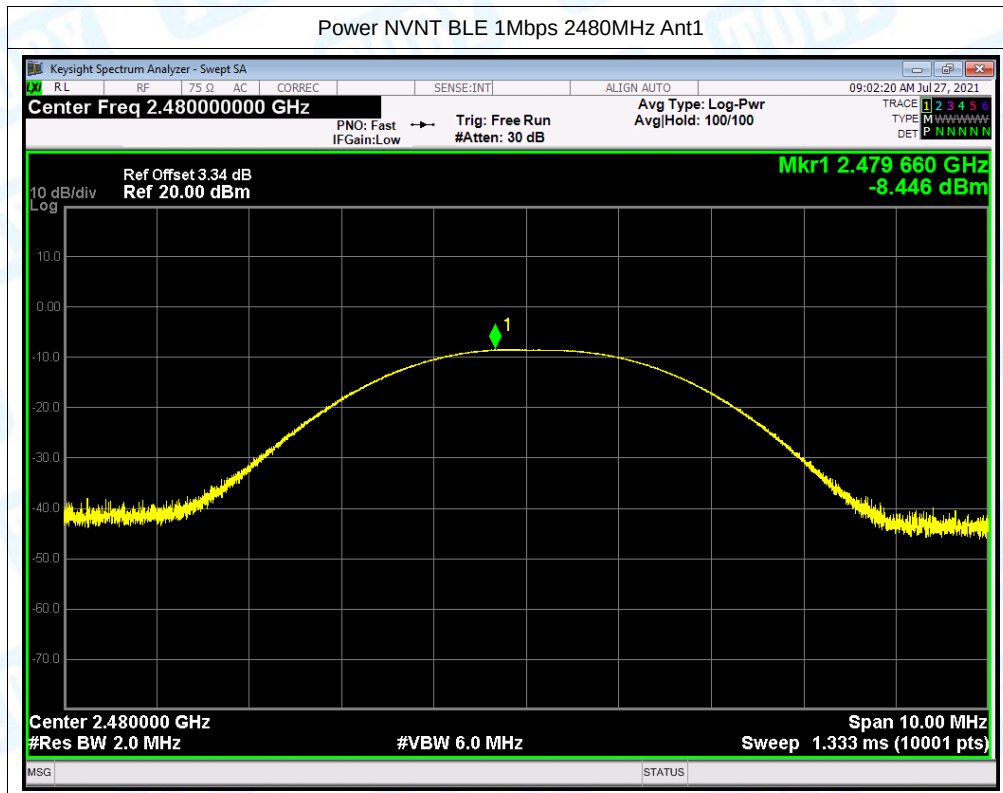
Test Graphs

Power NVNT BLE 1Mbps 2402MHz Ant1



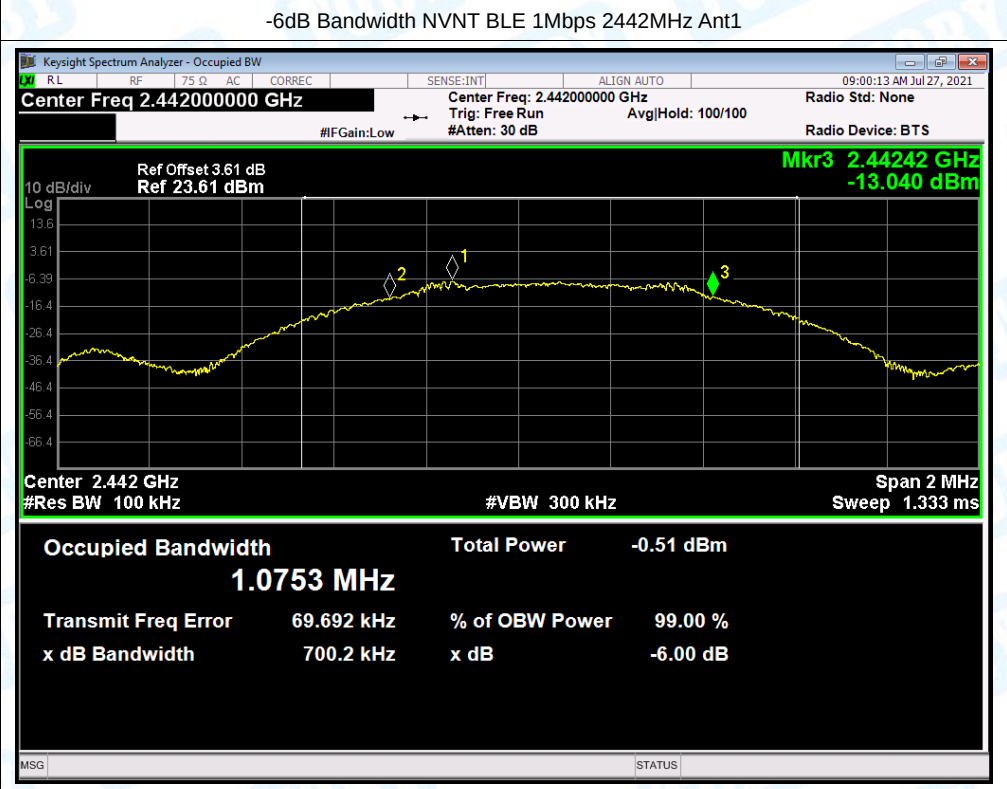
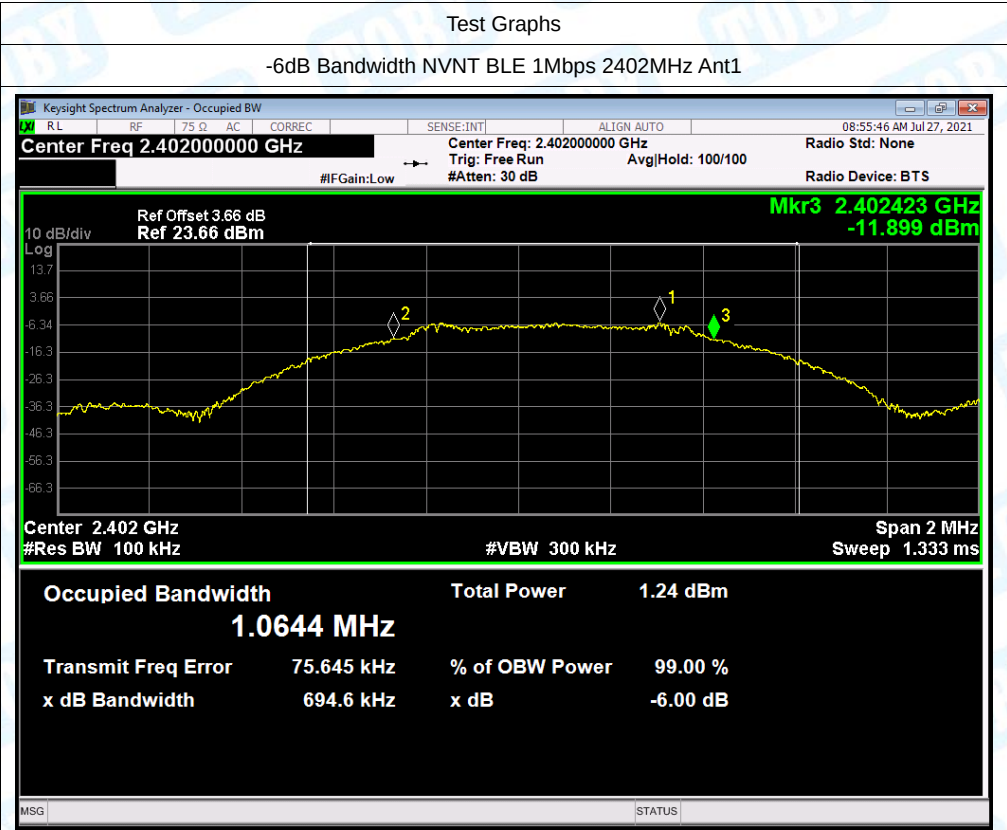
Power NVNT BLE 1Mbps 2442MHz Ant1





2.-6dB Bandwidth

Condition	Mode	Frequency (MHz)	-6 dB Bandwidth (MHz)	Limit -6 dB Bandwidth (MHz)	Verdict
NVNT	BLE 1Mbps	2402	0.695	0.5	Pass
NVNT	BLE 1Mbps	2442	0.700	0.5	Pass
NVNT	BLE 1Mbps	2480	0.693	0.5	Pass



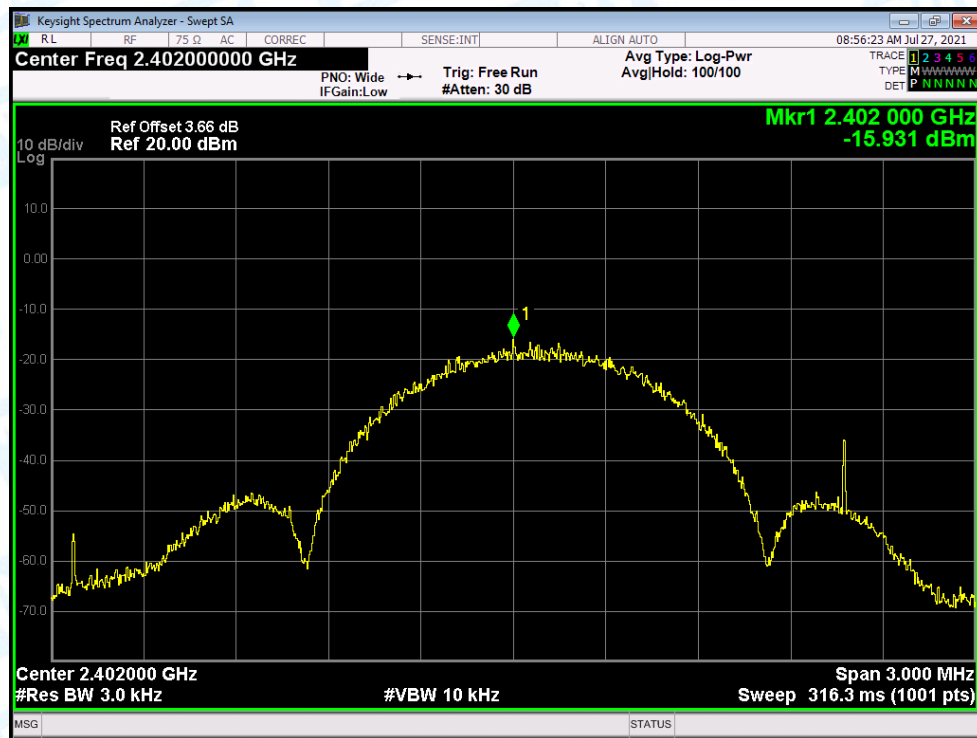


3.Maximum Power Spectral Density Level

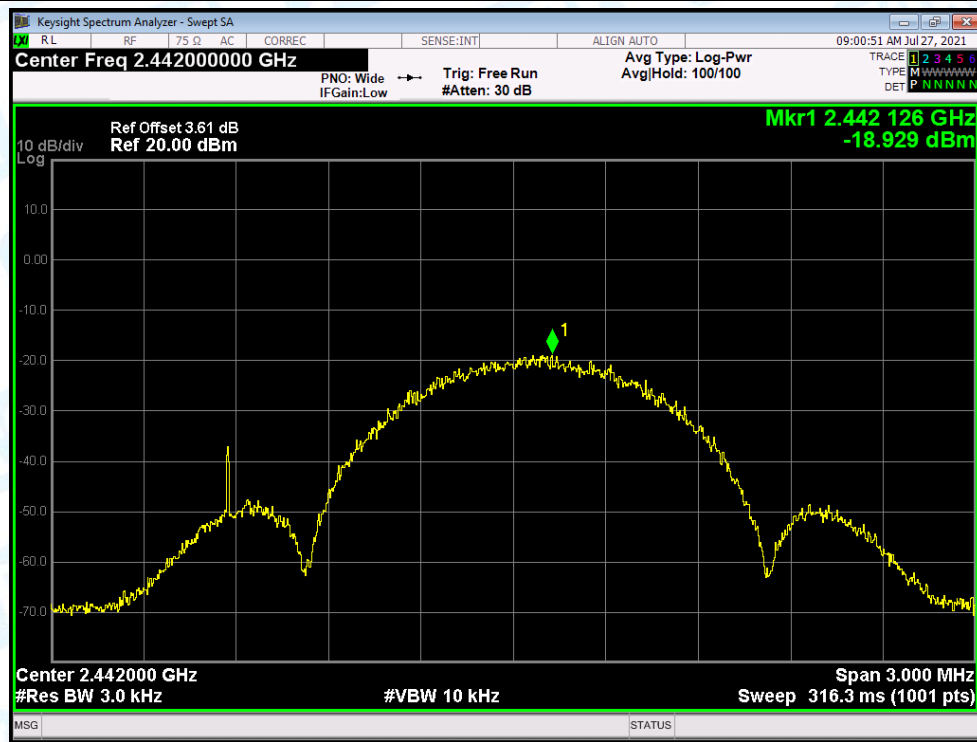
Condition	Mode	Frequency (MHz)	Max PSD (dBm)	Limit (dBm)	Verdict
NVNT	BLE 1Mbps	2402	-15.931	8	Pass
NVNT	BLE 1Mbps	2442	-18.929	8	Pass
NVNT	BLE 1Mbps	2480	-20.781	8	Pass

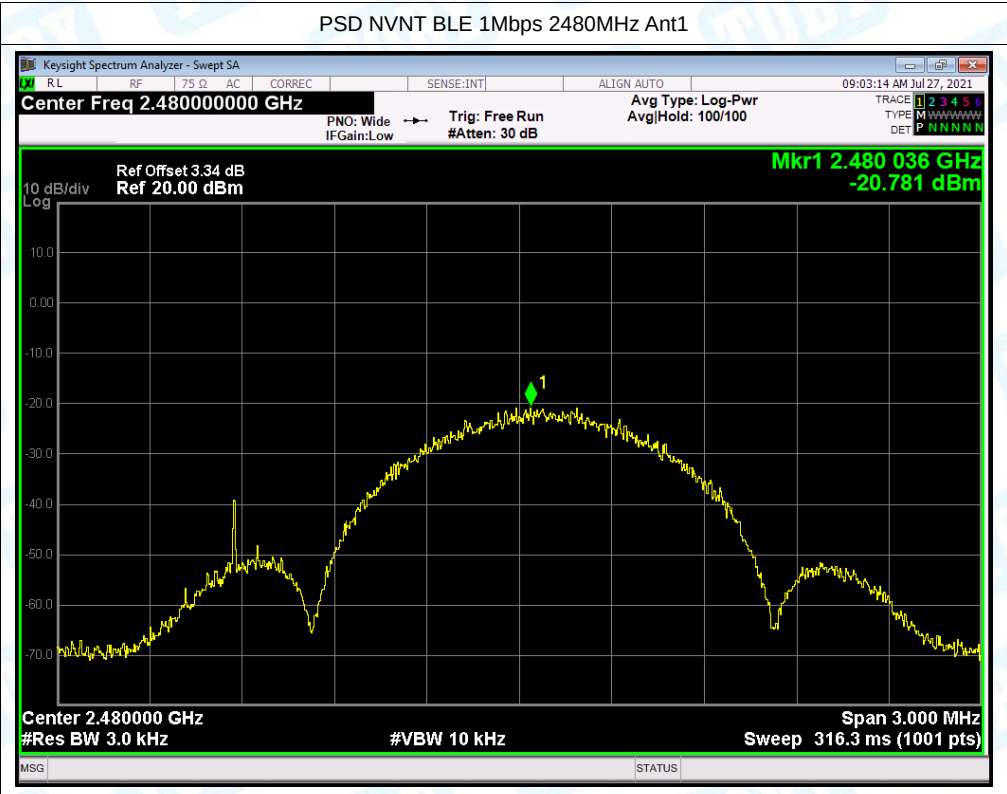
Test Graphs

PSD NVNT BLE 1Mbps 2402MHz Ant1



PSD NVNT BLE 1Mbps 2442MHz Ant1





4.Band Edge

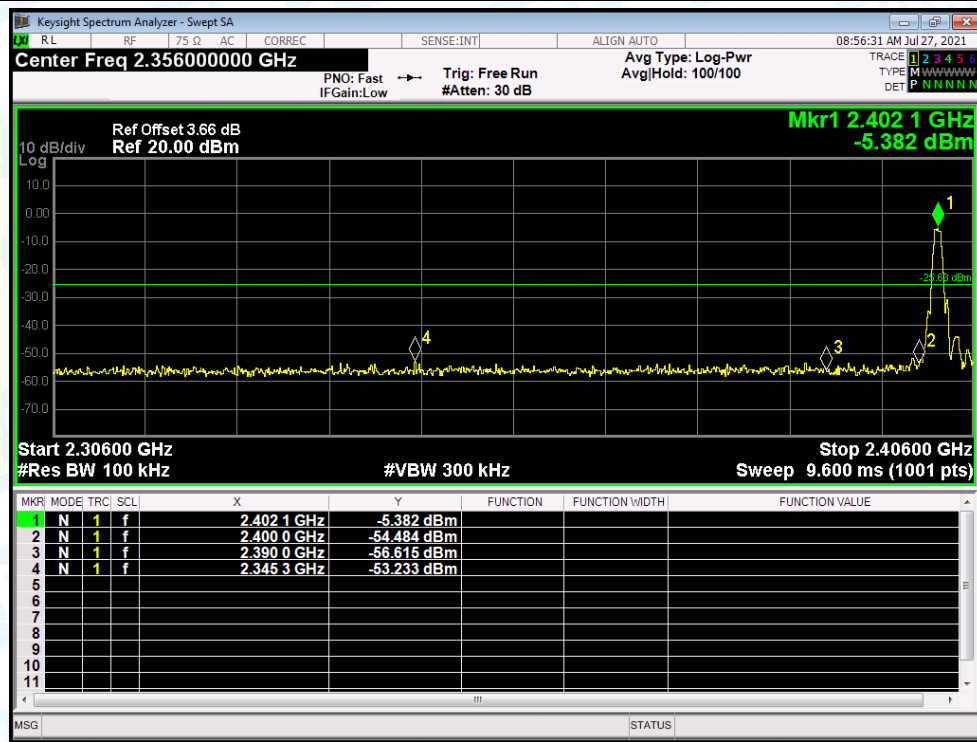
Condition	Mode	Frequency (MHz)	Max Value (dBc)	Limit (dBc)	Verdict
NVNT	BLE 1Mbps	2402	-47.6	-20	Pass
NVNT	BLE 1Mbps	2480	-44.31	-20	Pass

Test Graphs

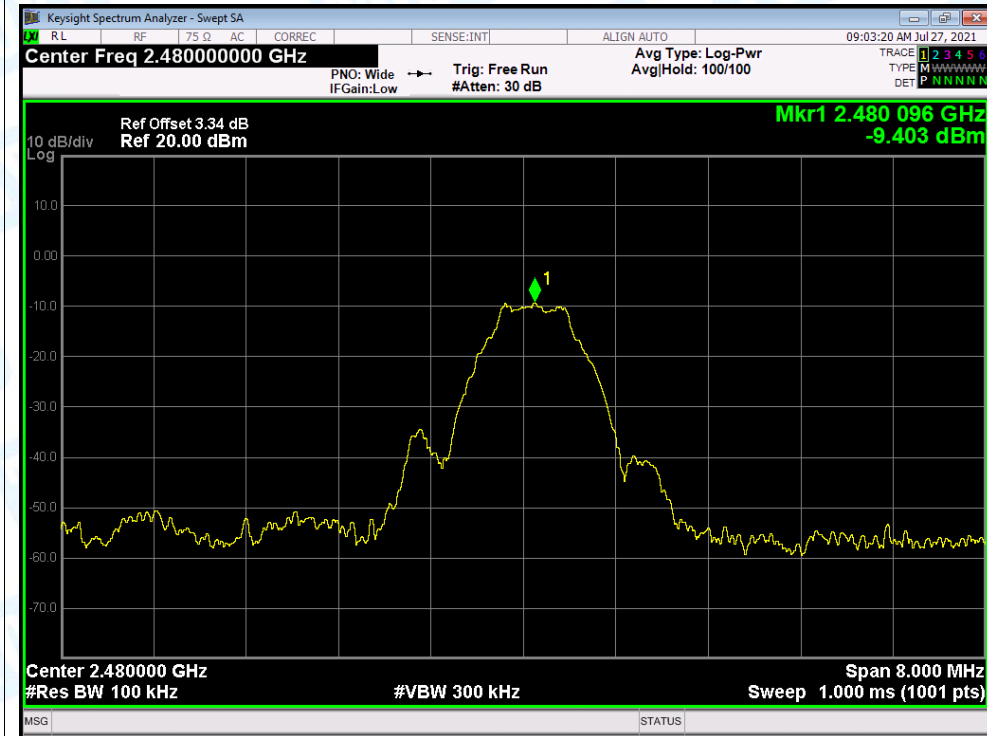
Band Edge NVNT BLE 1Mbps 2402MHz Ant1 Ref



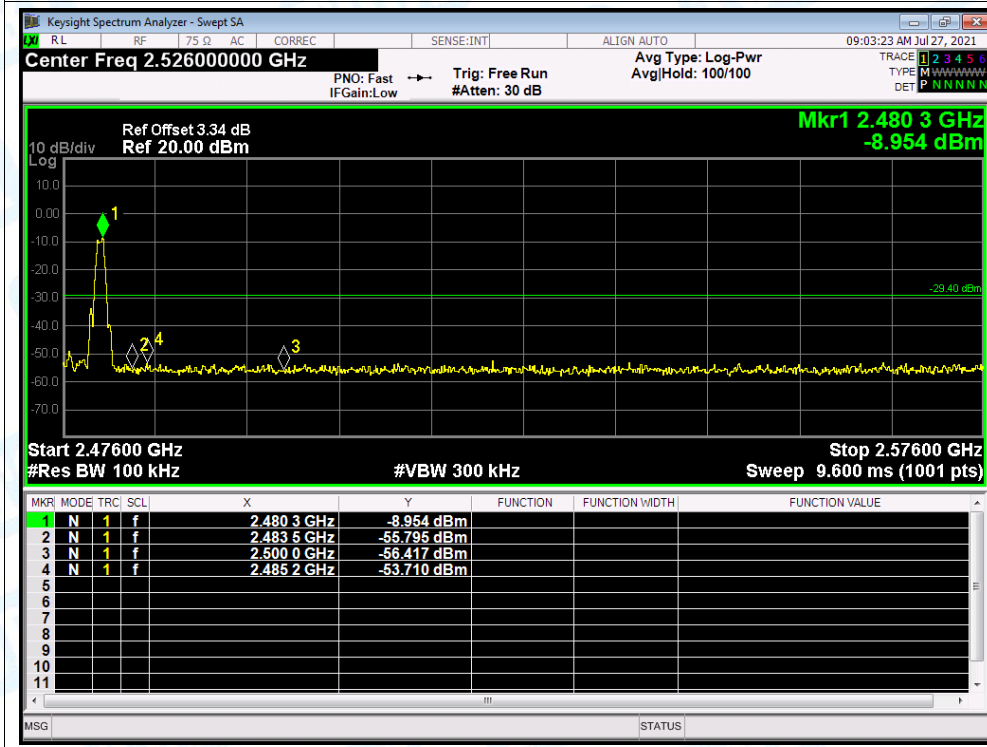
Band Edge NVNT BLE 1Mbps 2402MHz Ant1 Emission



Band Edge NVNT BLE 1Mbps 2480MHz Ant1 Ref



Band Edge NVNT BLE 1Mbps 2480MHz Ant1 Emission

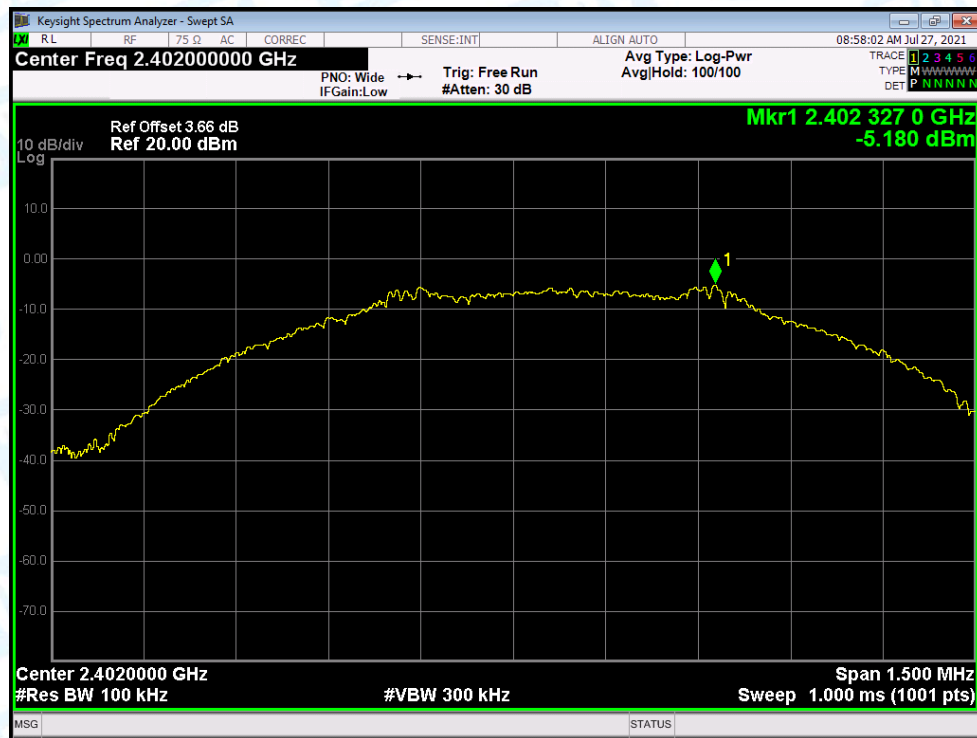


5.Conducted RF Spurious Emission

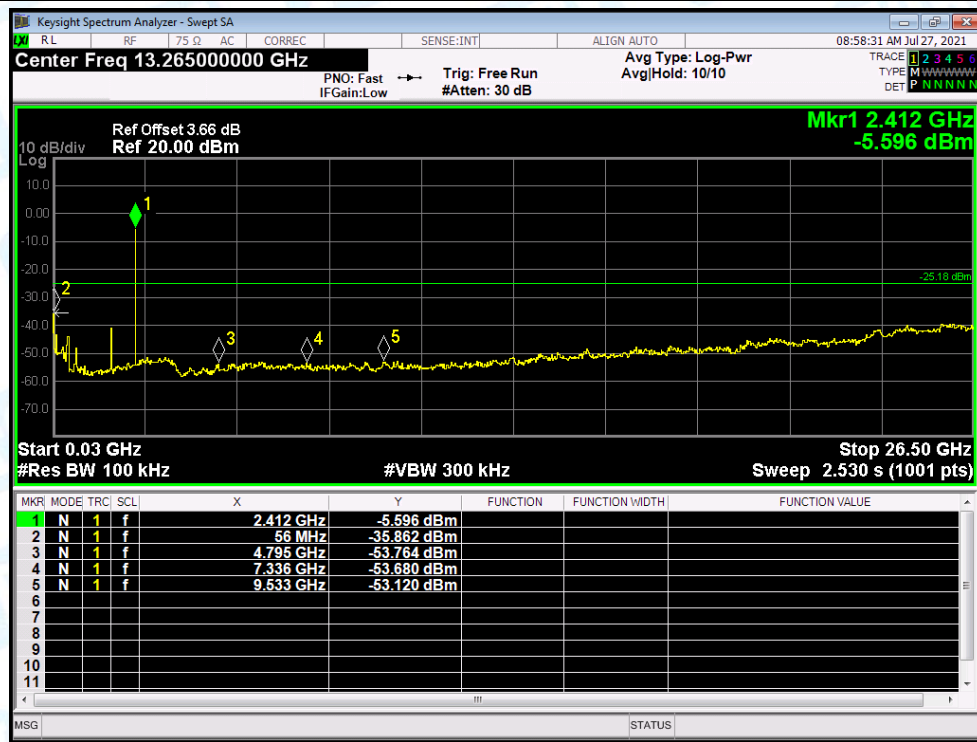
Condition	Mode	Frequency (MHz)	Max Value (dBc)	Limit (dBc)	Verdict
NVNT	BLE 1Mbps	2402	-30.68	-20	Pass
NVNT	BLE 1Mbps	2442	-28.9	-20	Pass
NVNT	BLE 1Mbps	2480	-26.35	-20	Pass

Test Graphs

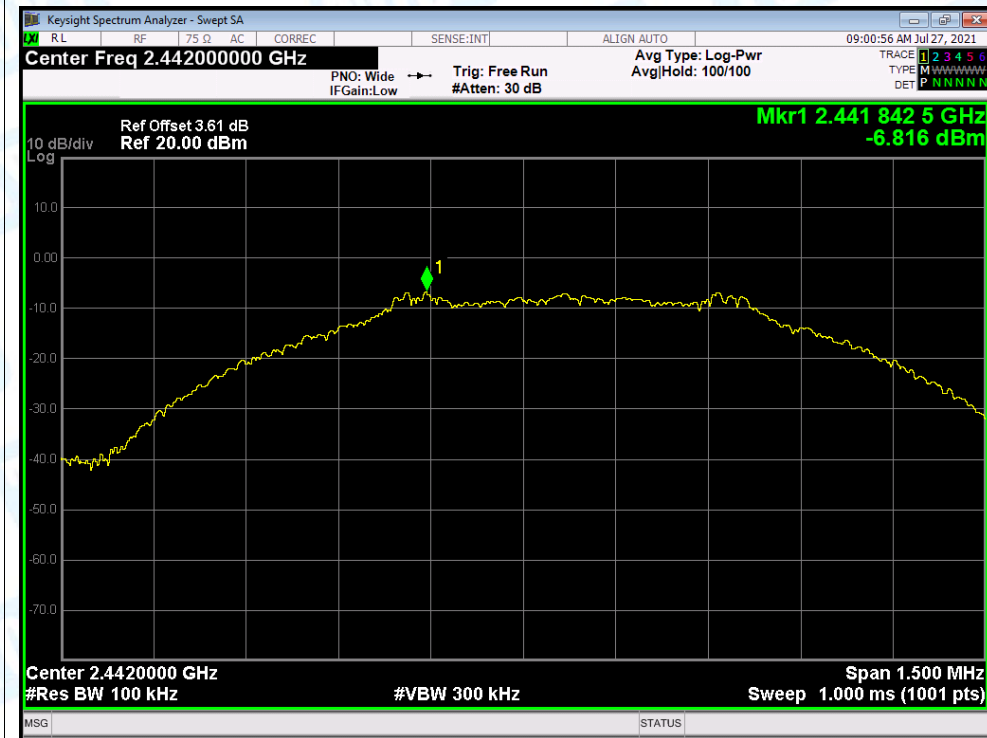
Tx. Spurious NVNT BLE 1Mbps 2402MHz Ant1 Ref



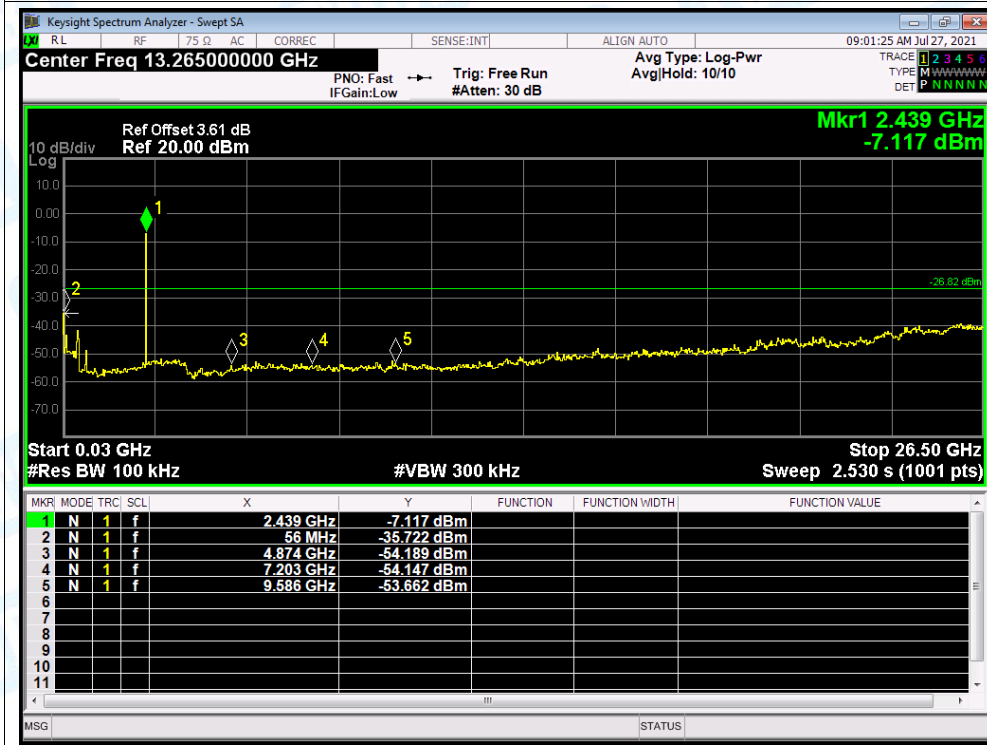
Tx. Spurious NVNT BLE 1Mbps 2402MHz Ant1 Emission



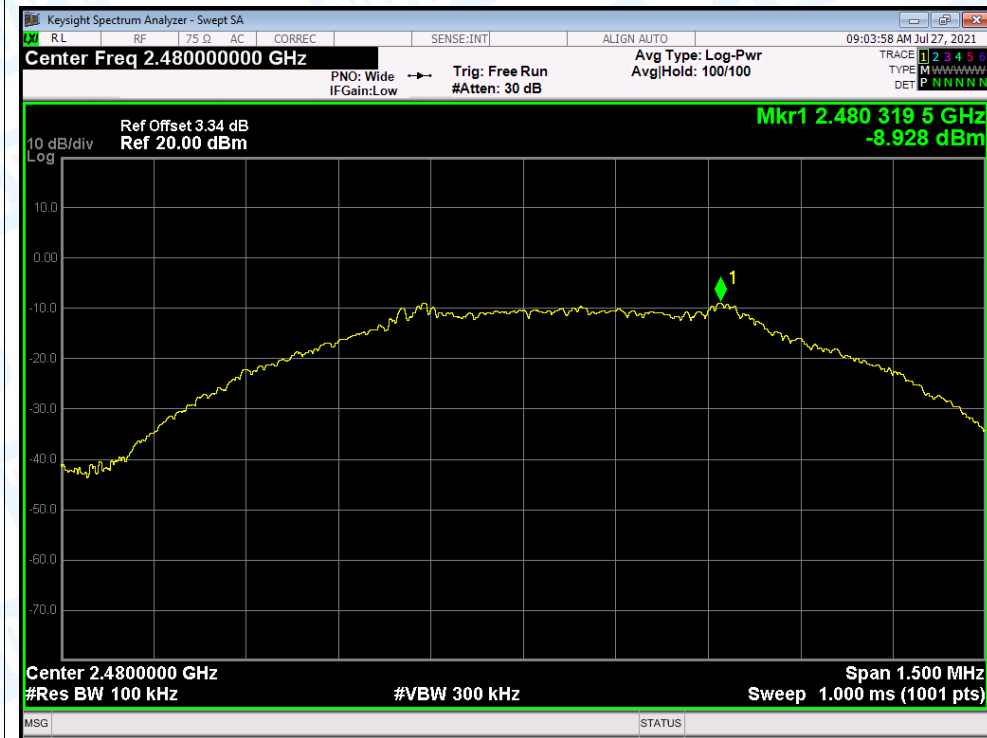
Tx. Spurious NVNT BLE 1Mbps 2442MHz Ant1 Ref



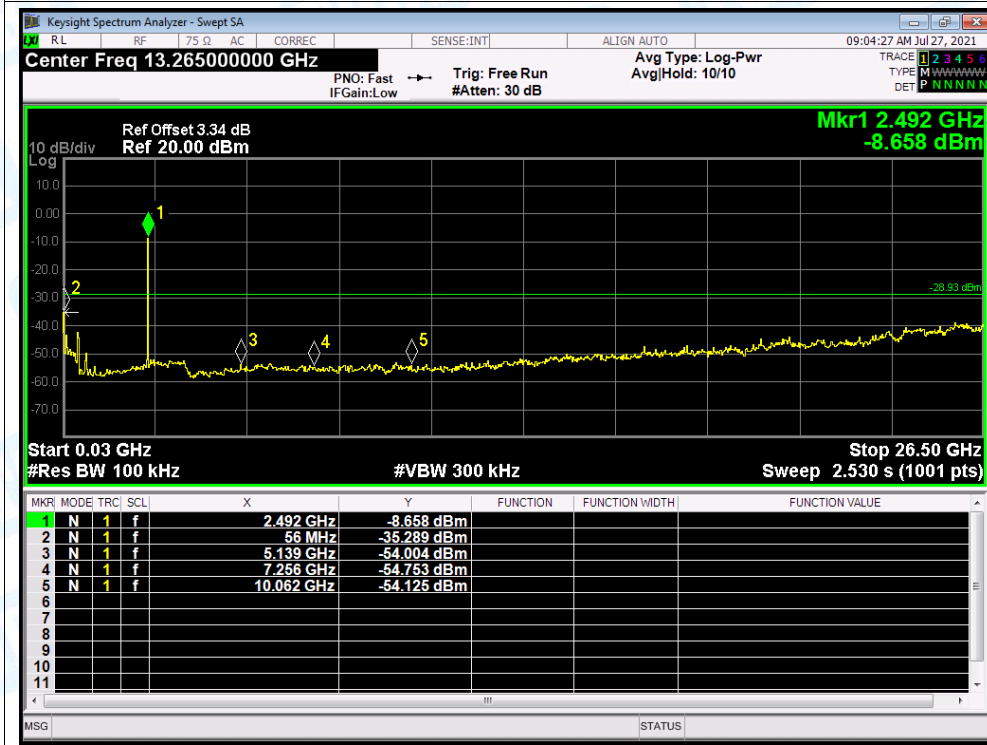
Tx. Spurious NVNT BLE 1Mbps 2442MHz Ant1 Emission



Tx. Spurious NVNT BLE 1Mbps 2480MHz Ant1 Ref



Tx. Spurious NVNT BLE 1Mbps 2480MHz Ant1 Emission

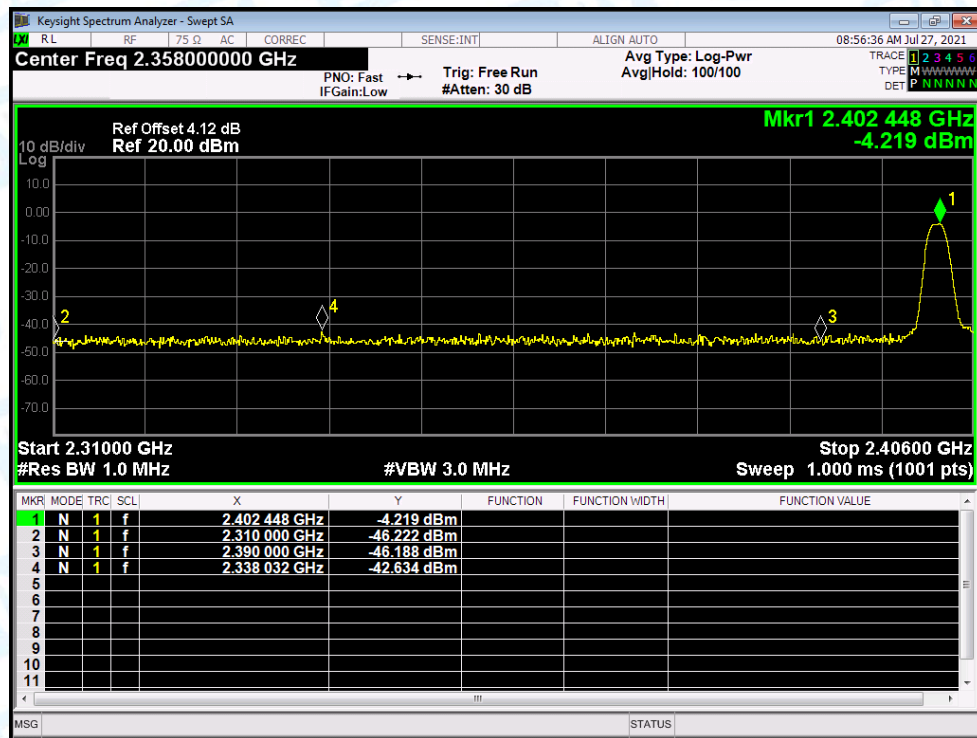


6.Restrict Band

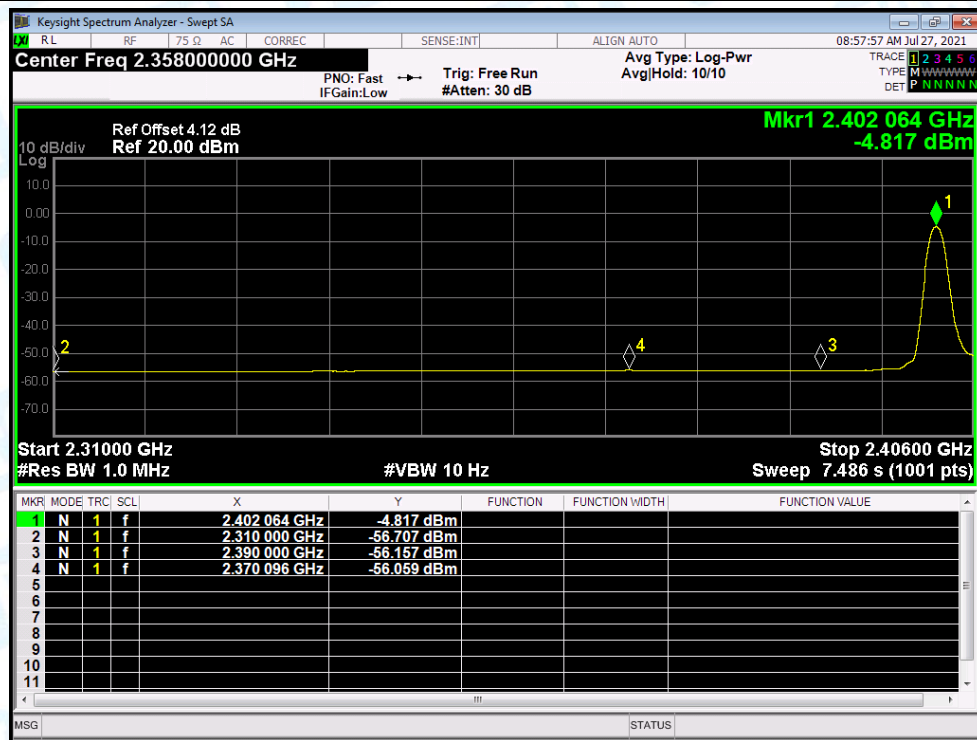
Condition	Mode	Frequency (MHz)	Spur Freq (MHz)	Power (dBm)	Gain (dBi)	E (dBuV/m)	Detector	Limit (dBuV/m)	Verdict
NVNT	BLE 1Mbps	2402	2310	-46.83	2	50.43	Peak	74	Pass
NVNT	BLE 1Mbps	2402	2310	-56.68	2	40.58	Average	54	Pass
NVNT	BLE 1Mbps	2402	2338.032	-42.63	2	54.63	Peak	74	Pass
NVNT	BLE 1Mbps	2402	2370.096	-56.05	2	41.21	Average	54	Pass
NVNT	BLE 1Mbps	2402	2390	-45.63	2	51.63	Peak	74	Pass
NVNT	BLE 1Mbps	2402	2390	-56.14	2	41.12	Average	54	Pass
NVNT	BLE 1Mbps	2480	2483.5	-45.6	2	51.66	Peak	74	Pass
NVNT	BLE 1Mbps	2480	2483.5	-55.63	2	41.63	Average	54	Pass
NVNT	BLE 1Mbps	2480	2487.376	-42.75	2	54.51	Peak	74	Pass
NVNT	BLE 1Mbps	2480	2483.512	-55.63	2	41.63	Average	54	Pass
NVNT	BLE 1Mbps	2480	2500	-46.08	2	51.18	Peak	74	Pass
NVNT	BLE 1Mbps	2480	2500	-55.86	2	41.4	Average	54	Pass

Test Graphs

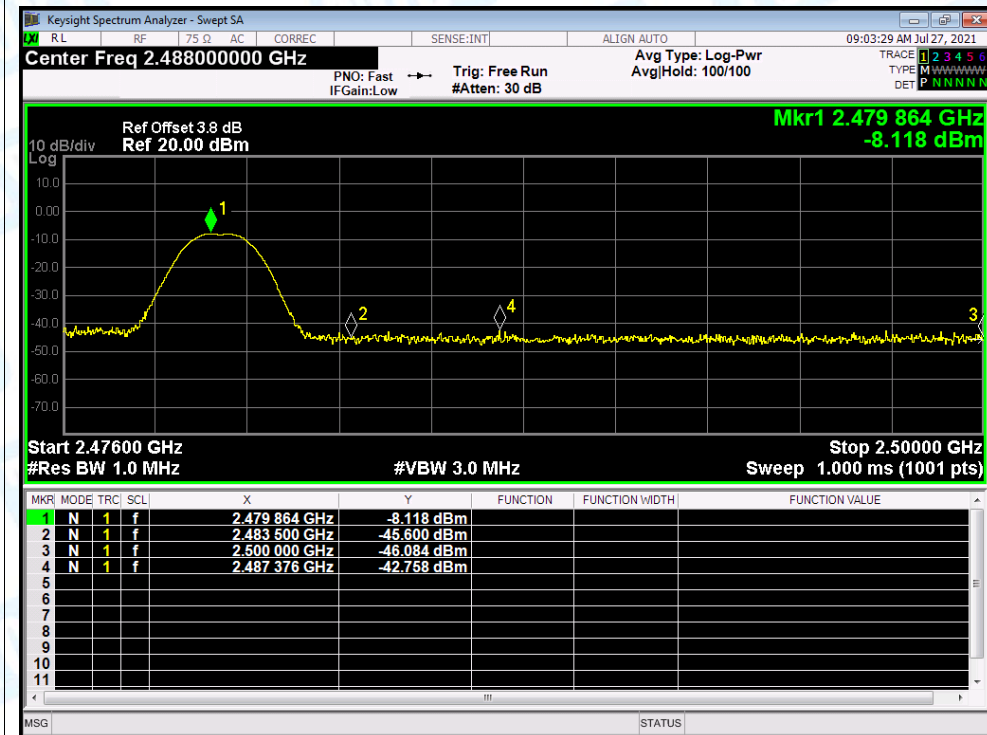
Restrict Band NVNT BLE 1Mbps 2402MHz Ant1 Peak



Restrict Band NVNT BLE 1Mbps 2402MHz Ant1 Average



Restrict Band NVNT BLE 1Mbps 2480MHz Ant1 Peak



Restrict Band NVNT BLE 1Mbps 2480MHz Ant1 Average

