Appendix C

RF Test Data for 5.2GWIFI (Conducted Measurement)

Product Name: Projector

Test Model: J9C

Environmental Conditions

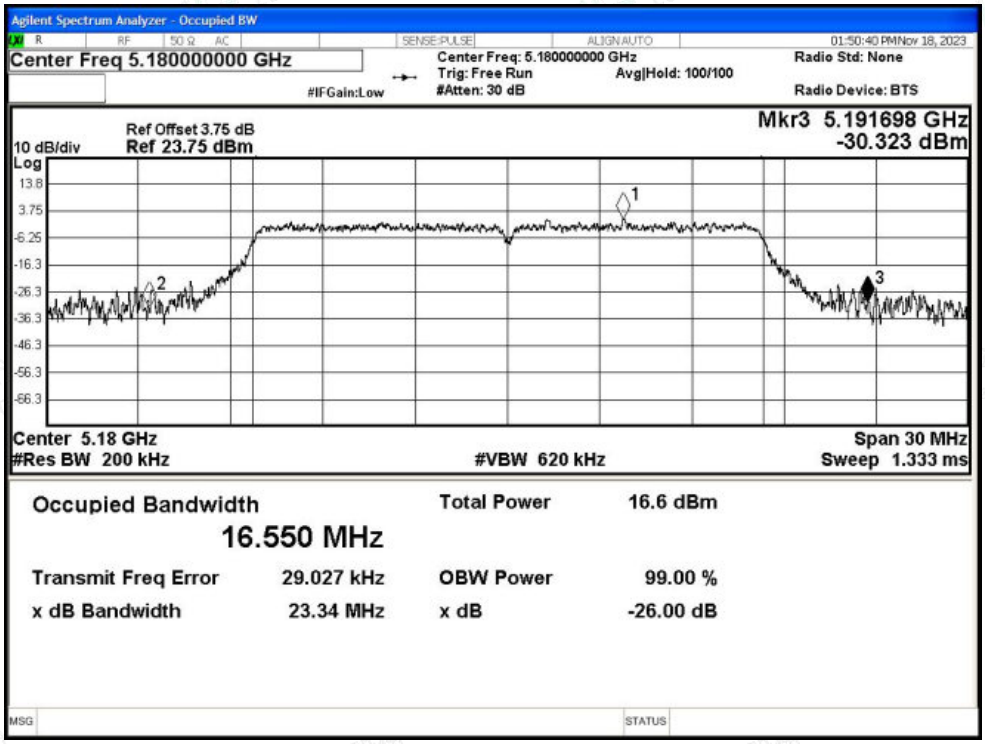
Temperature:	23.8° C
Relative Humidity:	52.1%
ATM Pressure:	100.0 kPa
Test Engineer:	Jeson Zhou
Supervised by:	Nick Peng

C.1 -26dB Bandwidth

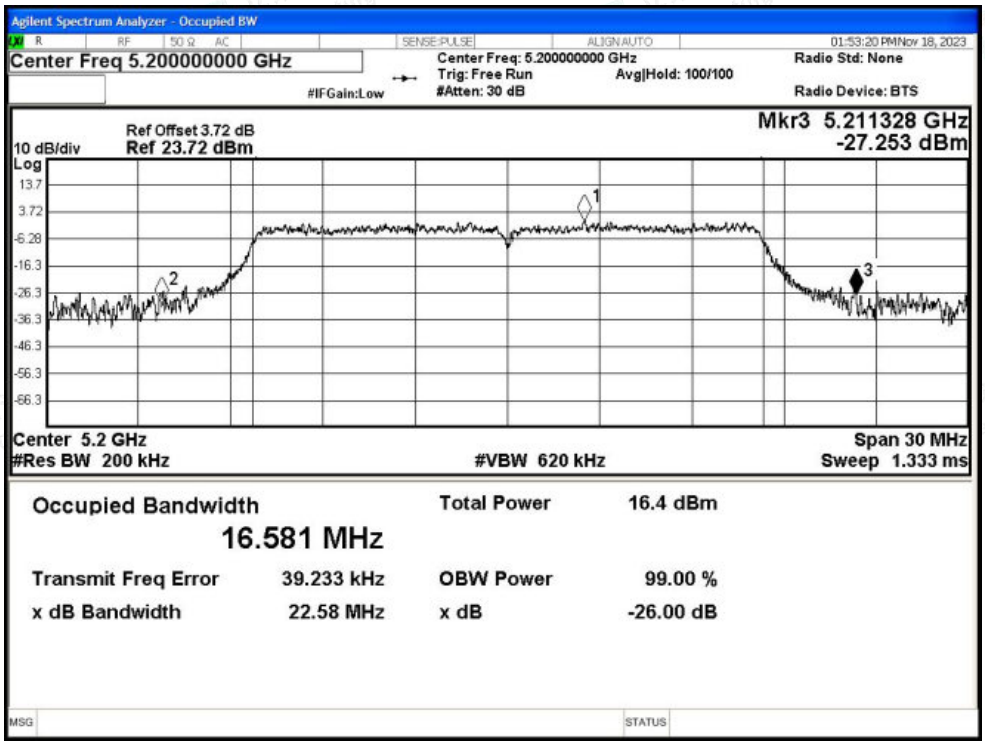
Condition	Mode	Frequency (MHz)	Antenna	-26 dB Bandwidth (MHz)	Limit -26 dB Bandwidth (MHz)	Verdict
NVNT	a	5180	Ant1	23.338	>=0.5	Pass
NVNT	a	5200	Ant1	22.578	>=0.5	Pass
NVNT	a	5240	Ant1	25.691	>=0.5	Pass
NVNT	n20	5180	Ant1	26.541	>=0.5	Pass
NVNT	n20	5200	Ant1	26.701	>=0.5	Pass
NVNT	n20	5240	Ant1	27.868	>=0.5	Pass
NVNT	ac20	5180	Ant1	27.858	>=0.5	Pass
NVNT	ac20	5200	Ant1	28.018	>=0.5	Pass
NVNT	ac20	5240	Ant1	25.329	>=0.5	Pass

Test Graphs

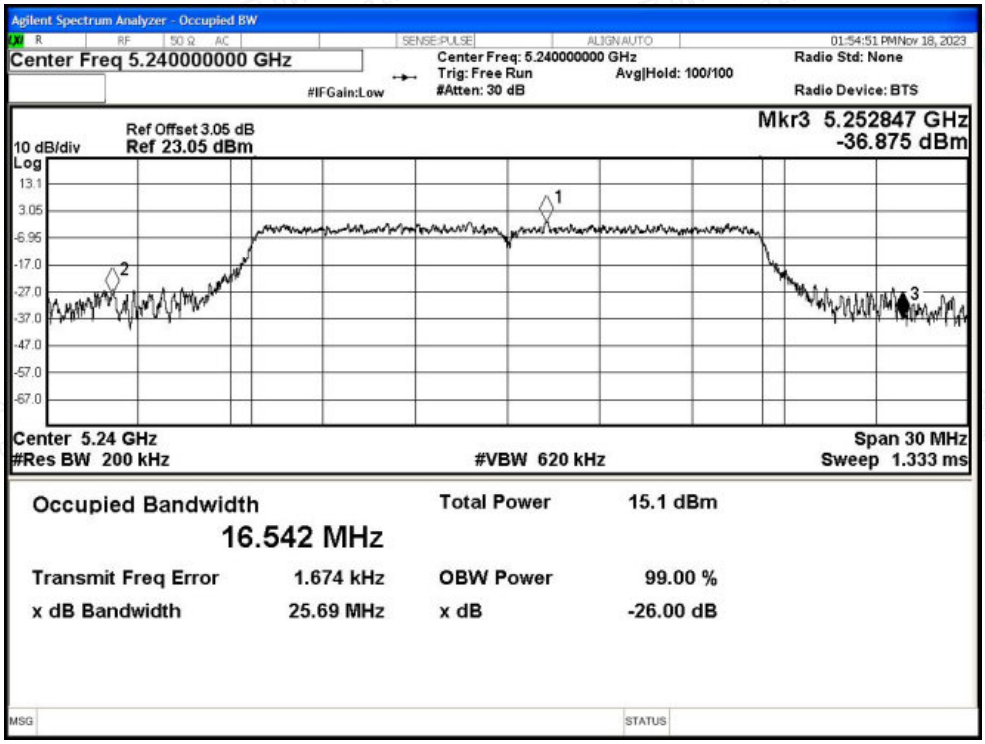
-26dB Bandwidth NVNT a 5180MHz Ant1



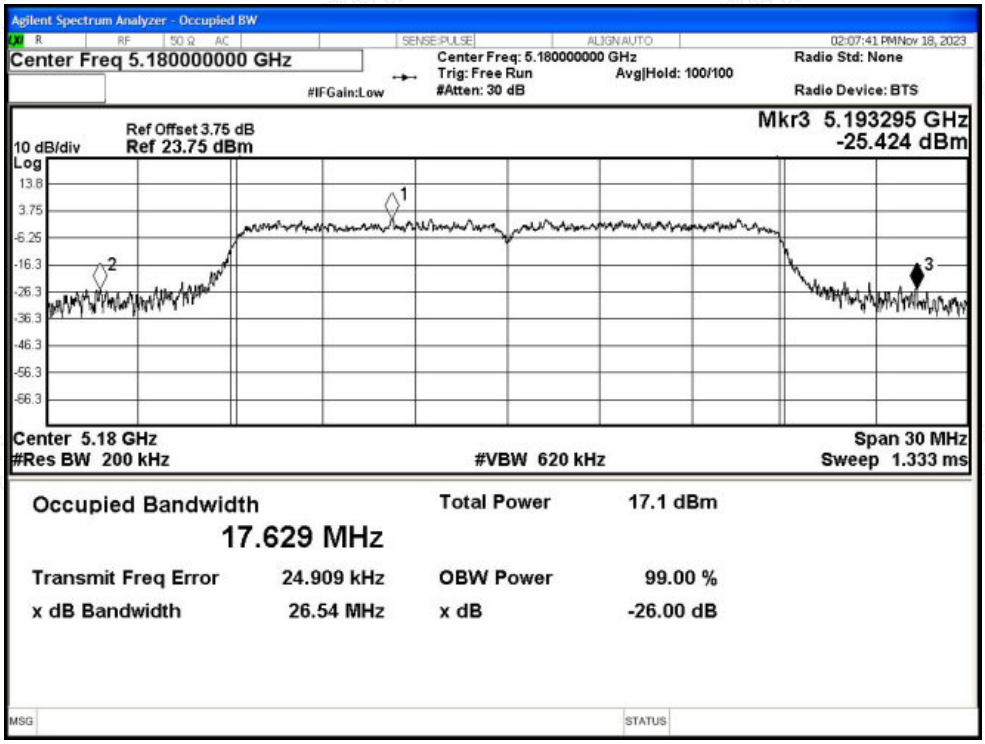
-26dB Bandwidth NVNT a 5200MHz Ant1



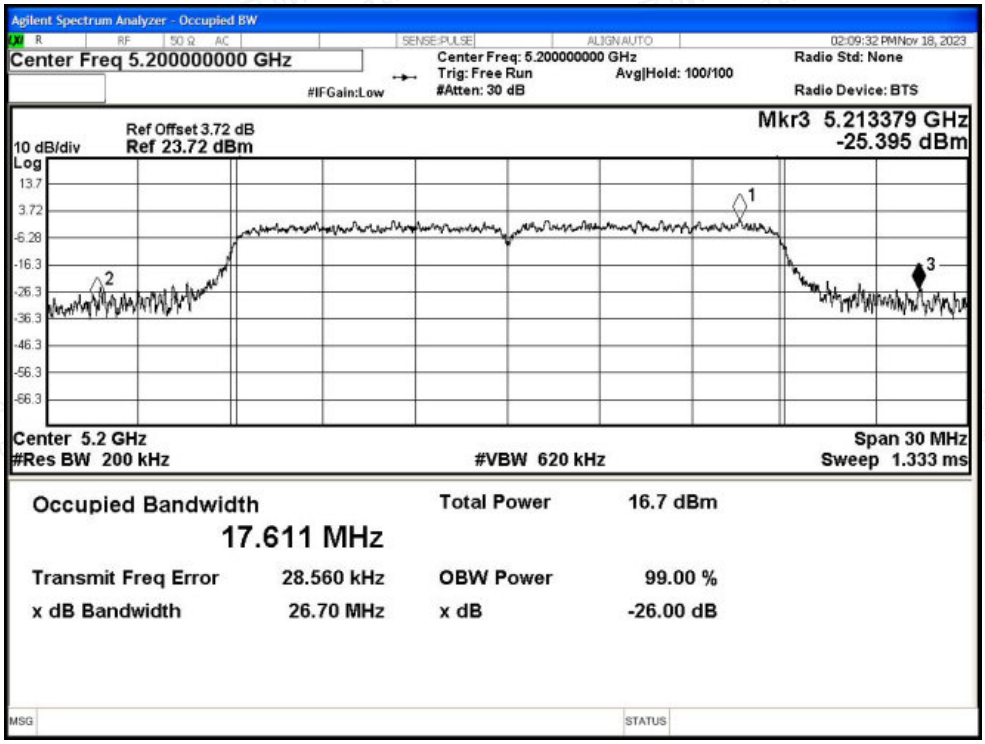
-26dB Bandwidth NVNT a 5240MHz Ant1



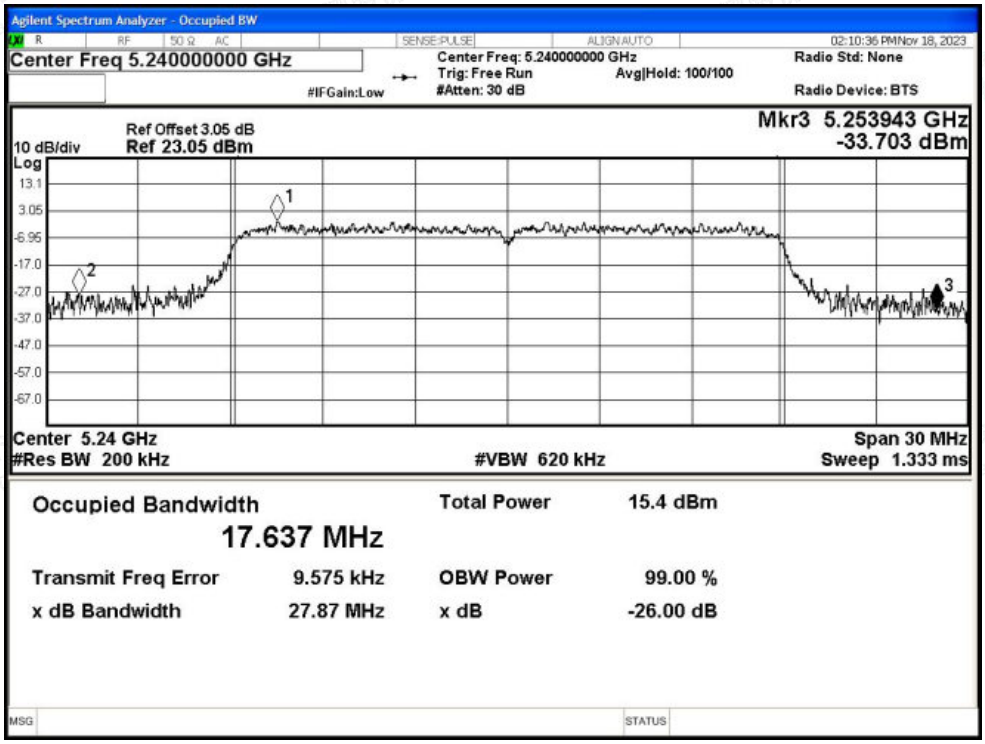
-26dB Bandwidth NVNT n20 5180MHz Ant1



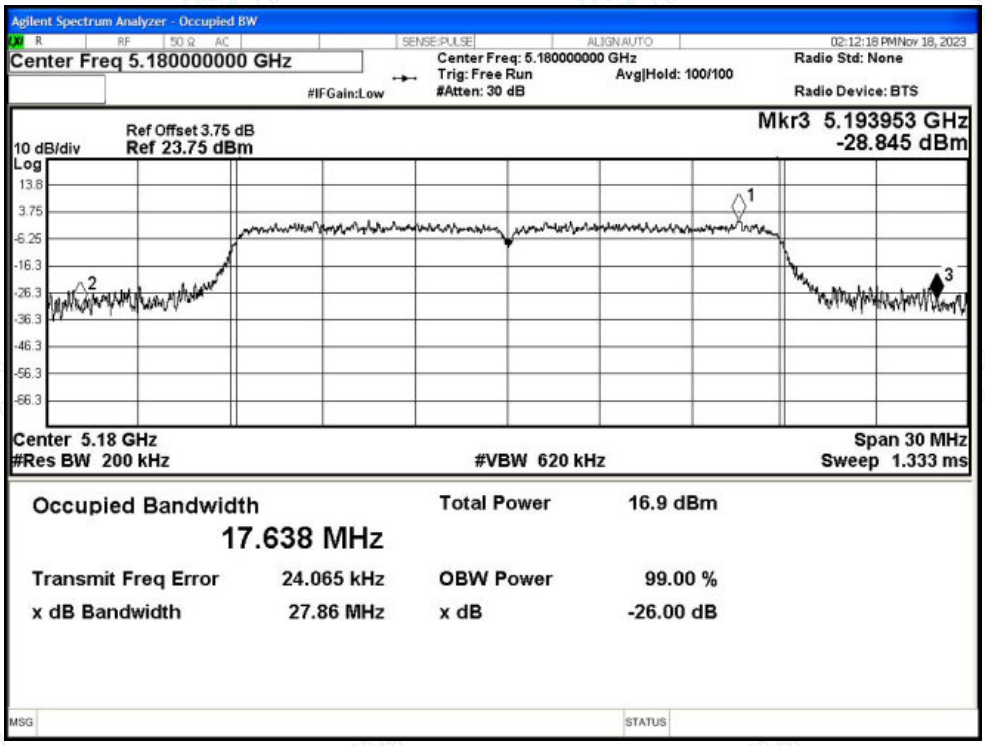
-26dB Bandwidth NVNT n20 5200MHz Ant1



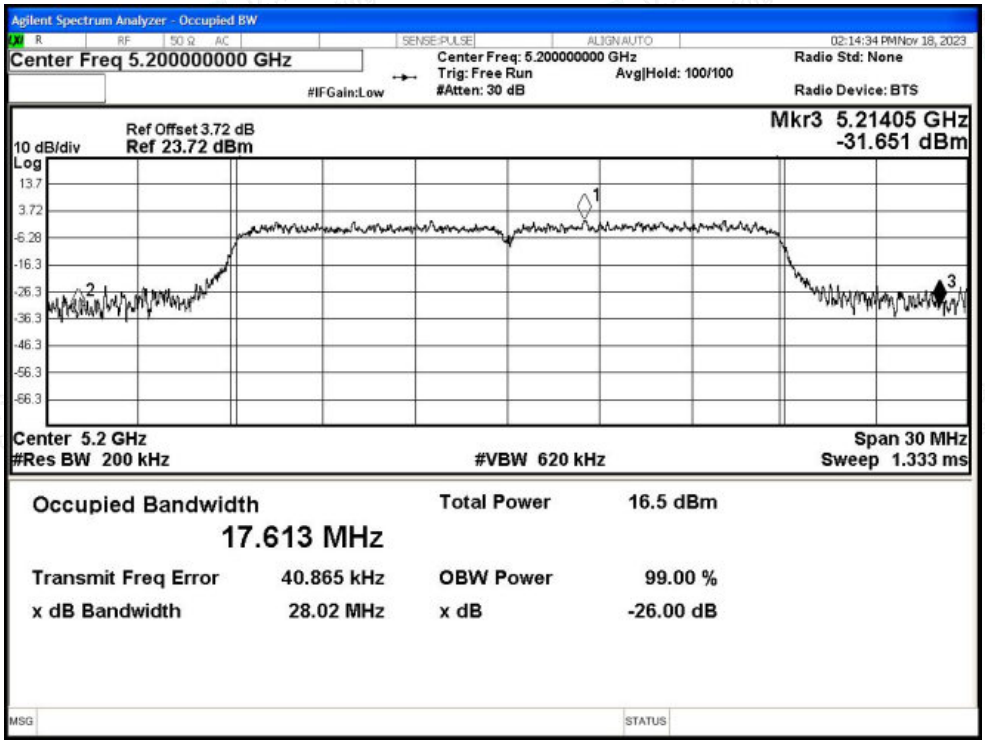
-26dB Bandwidth NVNT n20 5240MHz Ant1



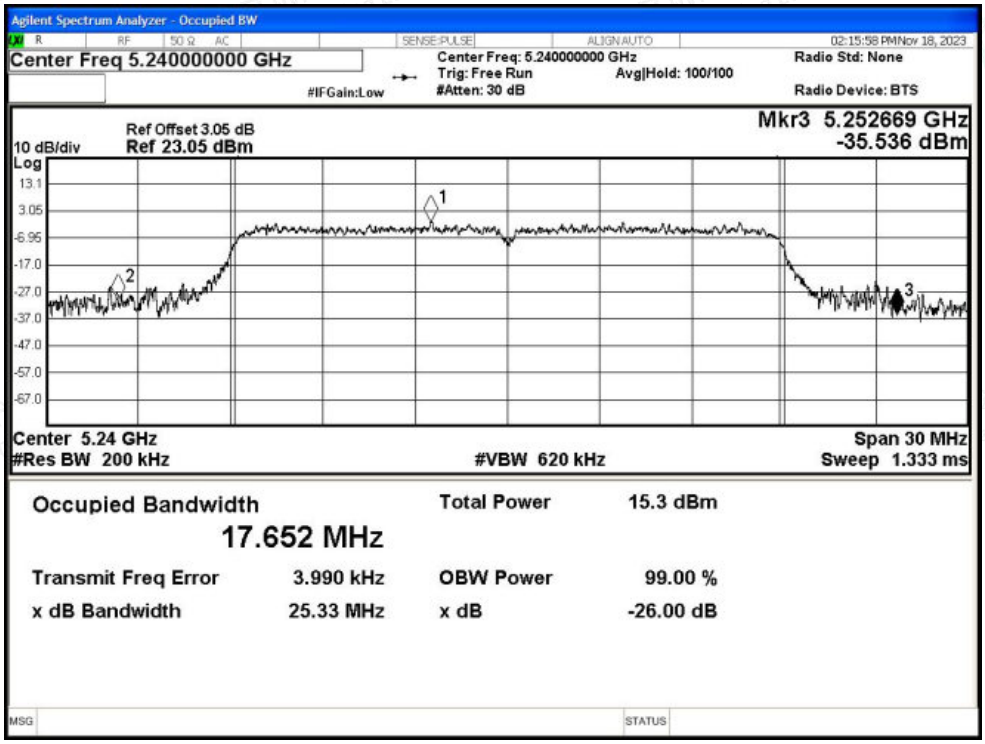
-26dB Bandwidth NVNT ac20 5180MHz Ant1



-26dB Bandwidth NVNT ac20 5200MHz Ant1



-26dB Bandwidth NVNT ac20 5240MHz Ant1



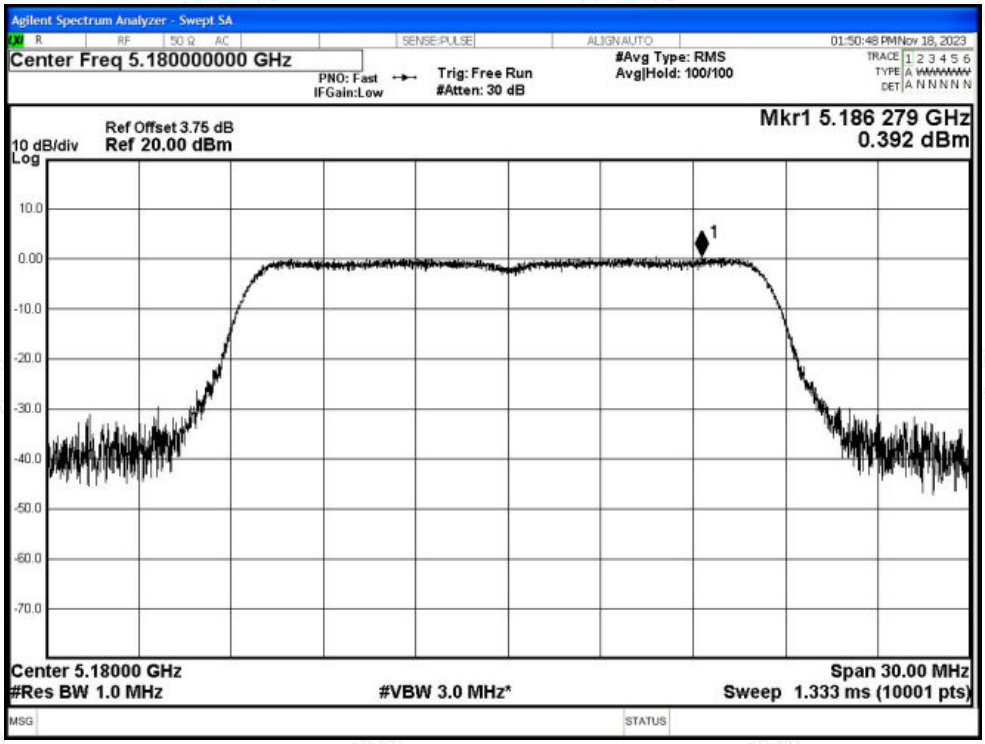
C.2 Maximum Conducted Output Power

Condition	Mode	Frequency (MHz)	Antenna	Conducted Power (dBm)	Duty Factor (dB)	Total Power (dBm)	Limit (dBm)	Verdict
NVNT	a	5180	Ant1	11.1	0.19	11.29	24	Pass
NVNT	a	5200	Ant1	10.74	0.19	10.93	24	Pass
NVNT	a	5240	Ant1	9.5	0.19	9.69	24	Pass
NVNT	n20	5180	Ant1	11.4	0.23	11.63	24	Pass
NVNT	n20	5200	Ant1	10.96	0.22	11.18	24	Pass
NVNT	n20	5240	Ant1	9.7	0.22	9.92	24	Pass
NVNT	ac20	5180	Ant1	11.2	0.22	11.42	24	Pass
NVNT	ac20	5200	Ant1	10.89	0.22	11.11	24	Pass
NVNT	ac20	5240	Ant1	9.63	0.22	9.85	24	Pass

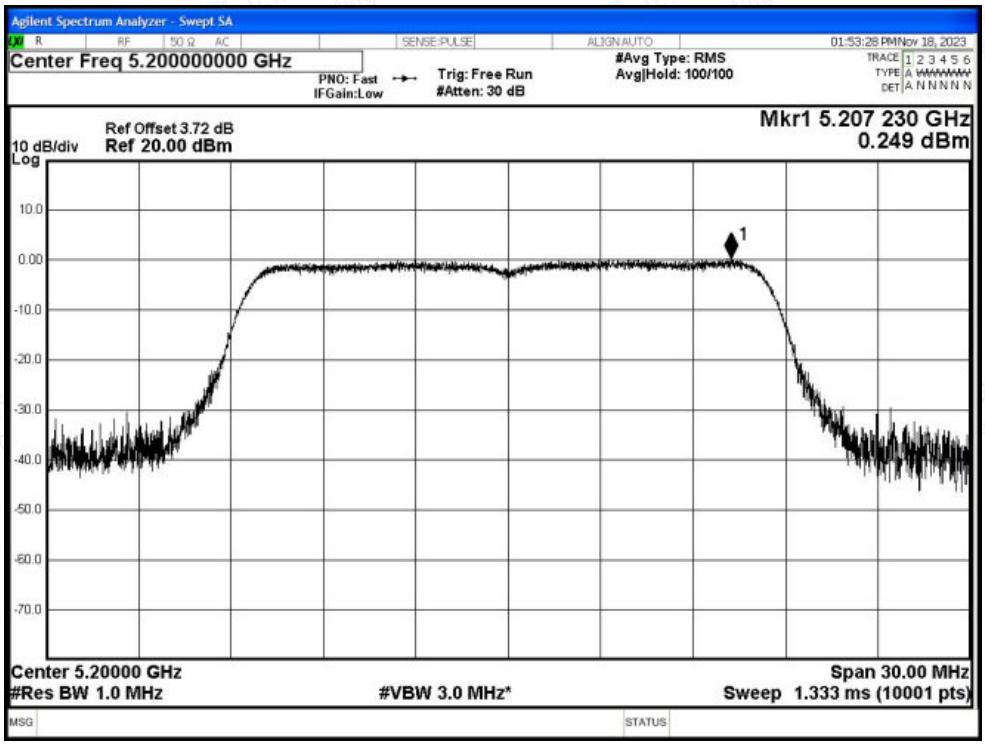
C.3 Maximum Power Spectral Density Level

Condition	Mode	Frequency (MHz)	Antenna	Conducted PSD (dBm/MHz)	Duty Factor (dB)	Total PSD (dBm/MHz)	Limit (dBm/MHz)	Verdict
NVNT	a	5180	Ant1	0.39	0.19	0.58	11	Pass
NVNT	a	5200	Ant1	0.25	0.19	0.44	11	Pass
NVNT	a	5240	Ant1	-1.12	0.19	-0.93	11	Pass
NVNT	n20	5180	Ant1	0.51	0.23	0.74	11	Pass
NVNT	n20	5200	Ant1	0.12	0.22	0.34	11	Pass
NVNT	n20	5240	Ant1	-1.14	0.22	-0.92	11	Pass
NVNT	ac20	5180	Ant1	0.49	0.22	0.71	11	Pass
NVNT	ac20	5200	Ant1	0.45	0.22	0.67	11	Pass
NVNT	ac20	5240	Ant1	-0.89	0.22	-0.67	11	Pass

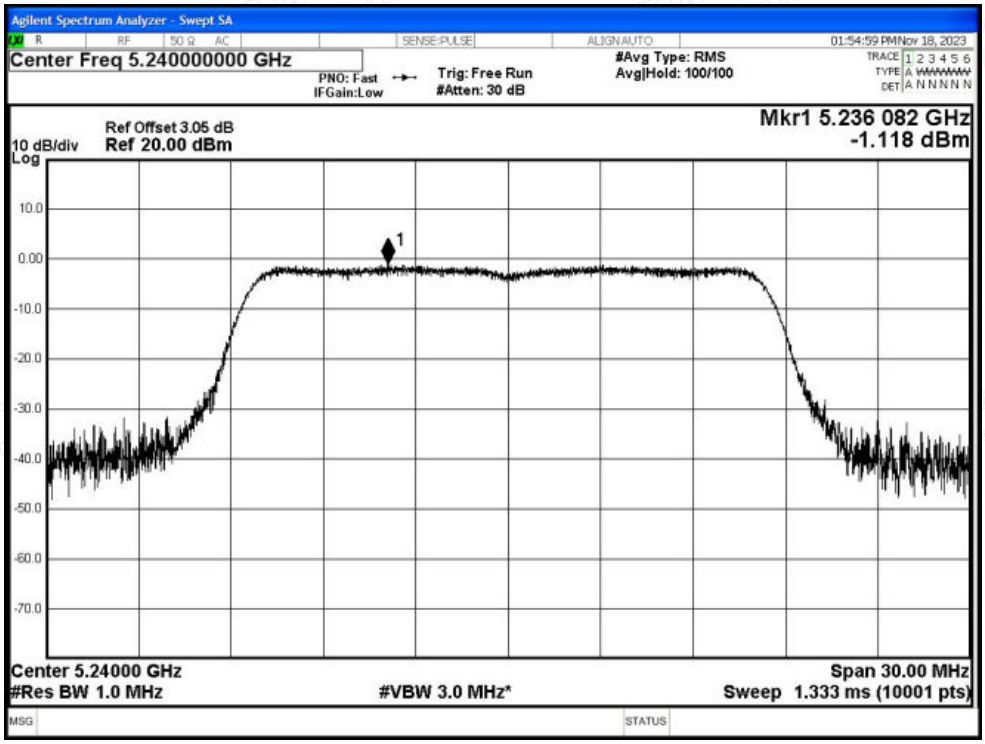
Test Graphs
PSD NVNT a 5180MHz Ant1



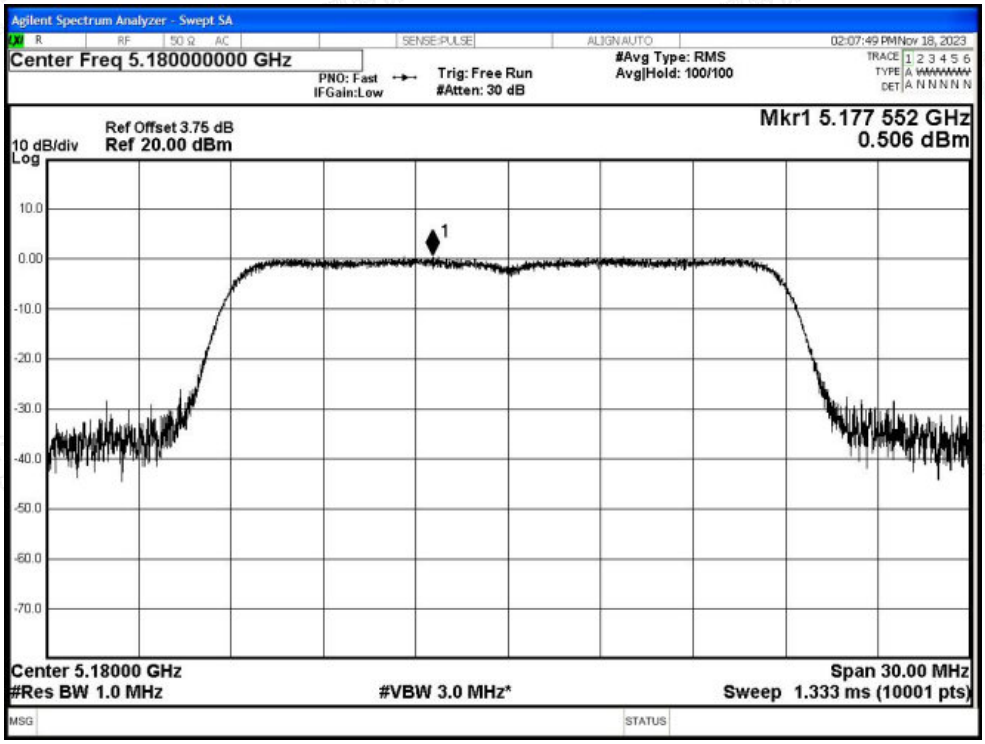
PSD NVNT a 5200MHz Ant1



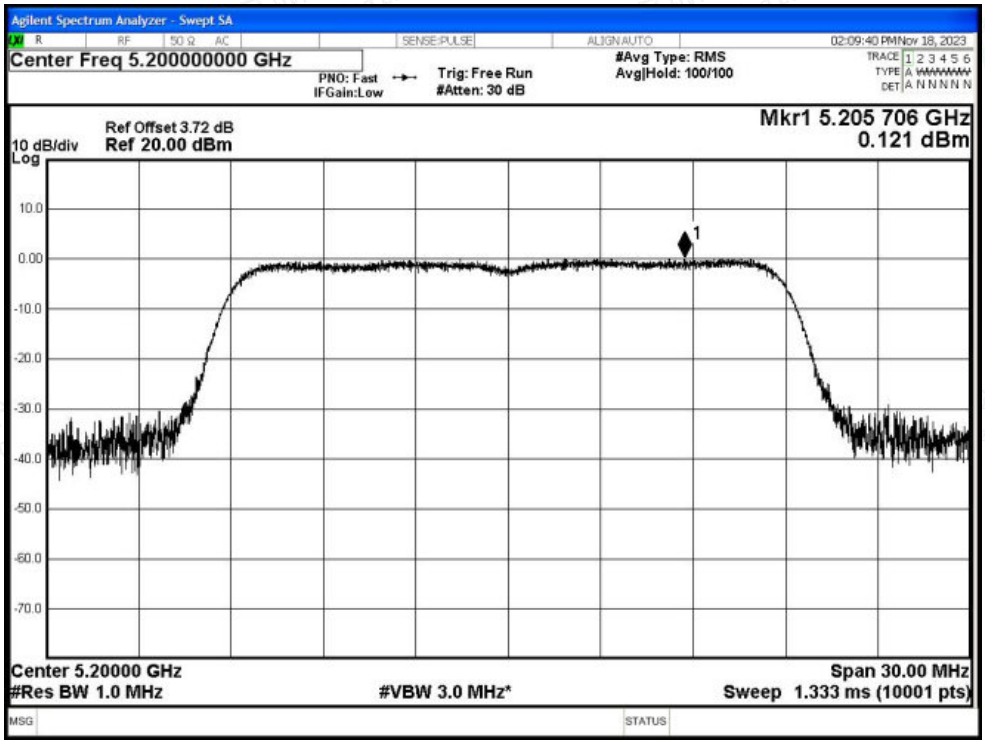
PSD NVNT a 5240MHz Ant1



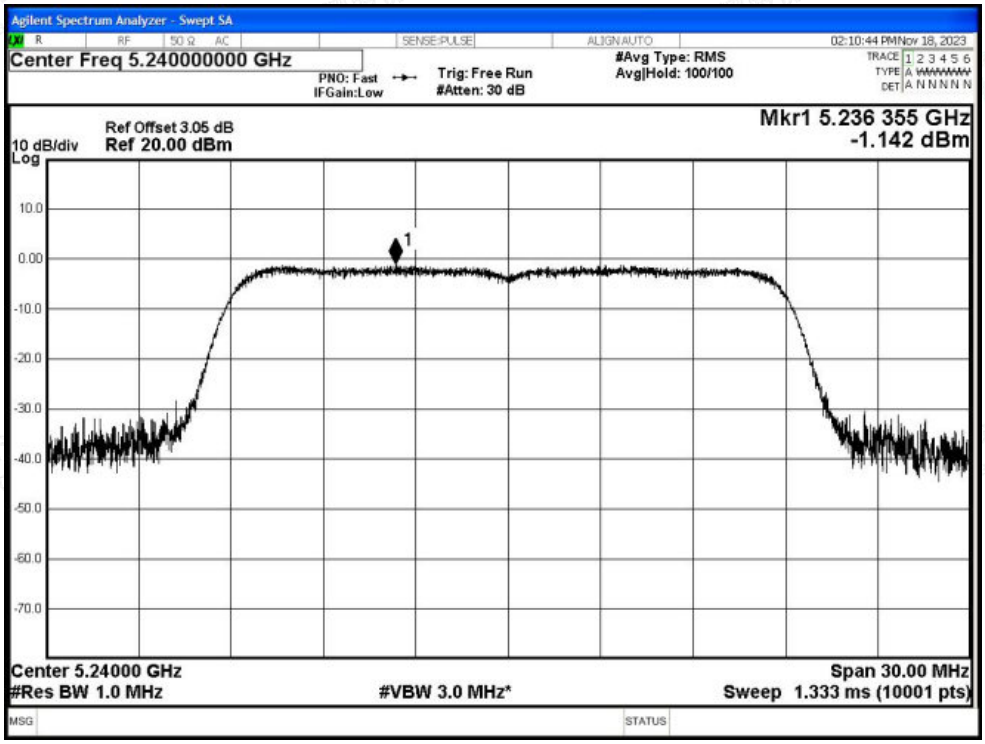
PSD NVNT n20 5180MHz Ant1



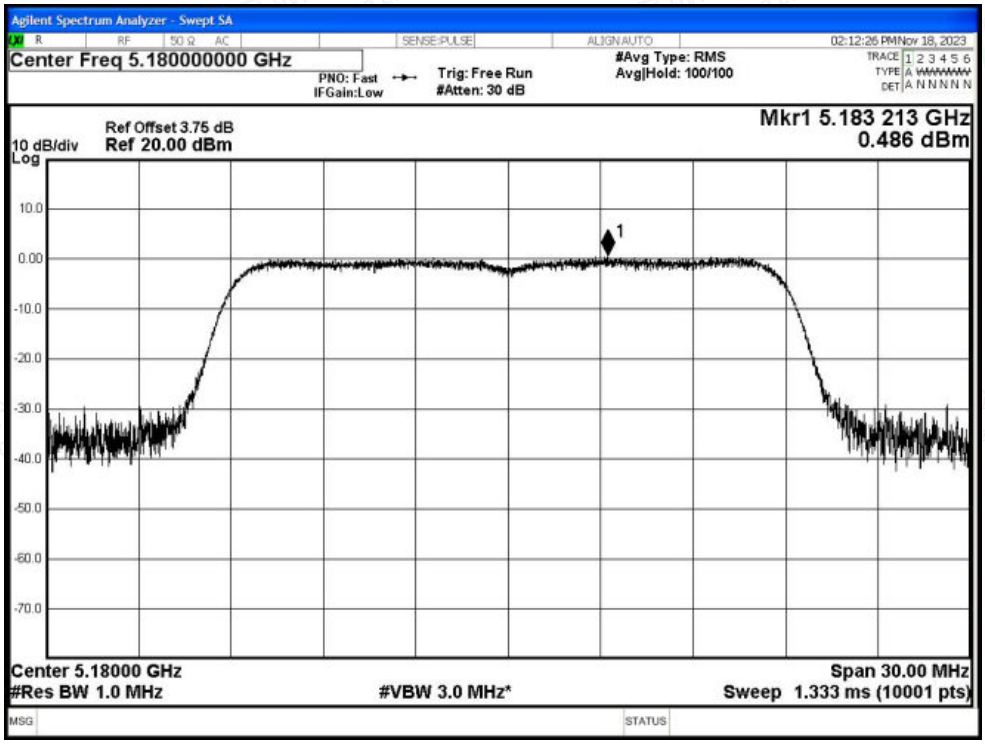
PSD NVNT n20 5200MHz Ant1



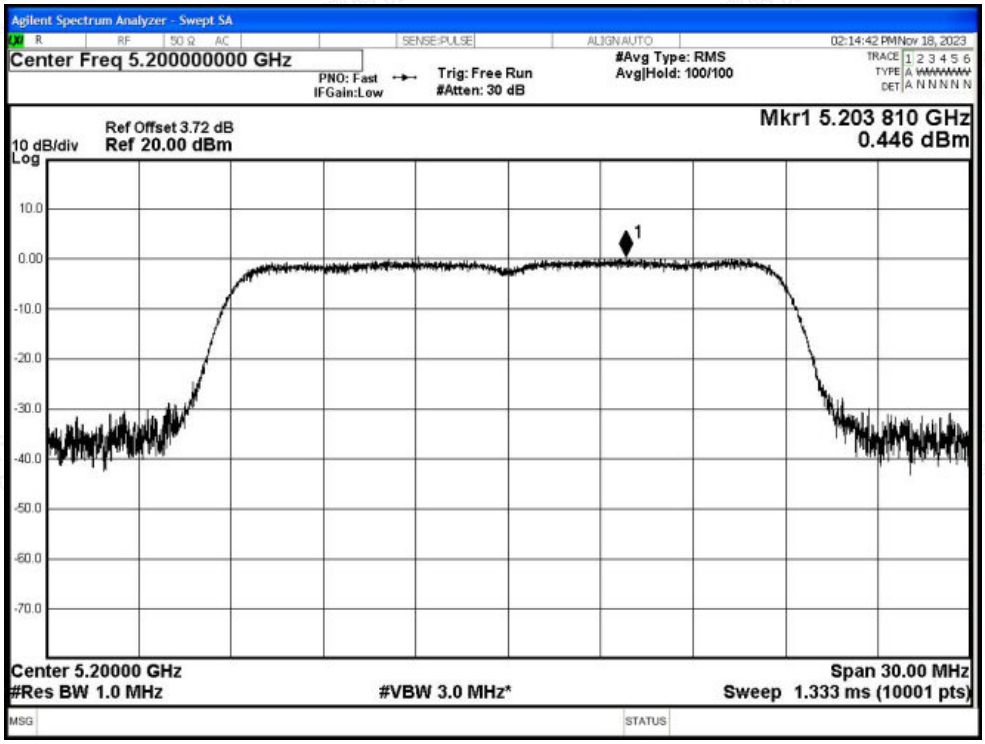
PSD NVNT n20 5240MHz Ant1



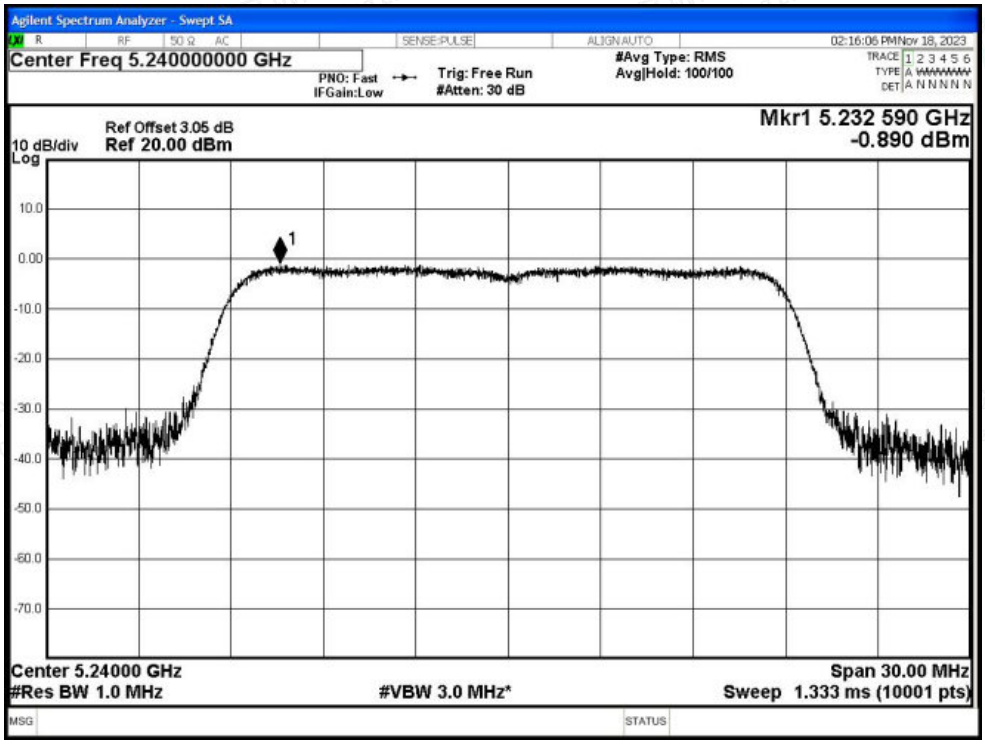
PSD NVNT ac20 5180MHz Ant1



PSD NVNT ac20 5200MHz Ant1



PSD NVNT ac20 5240MHz Ant1

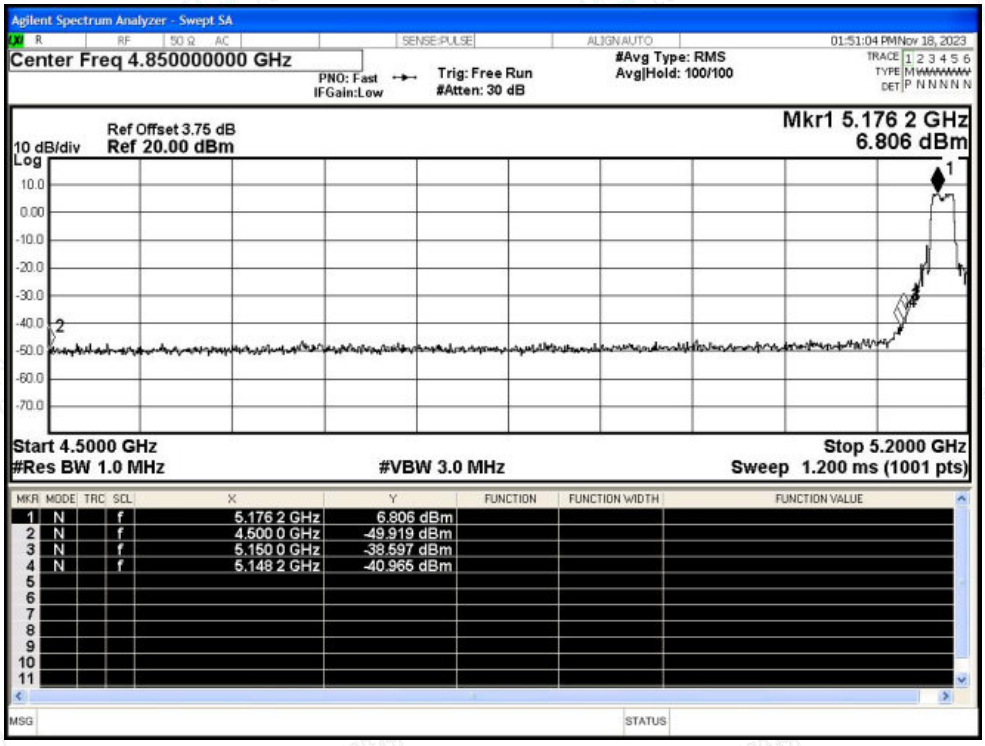


C.4 Restrict Band

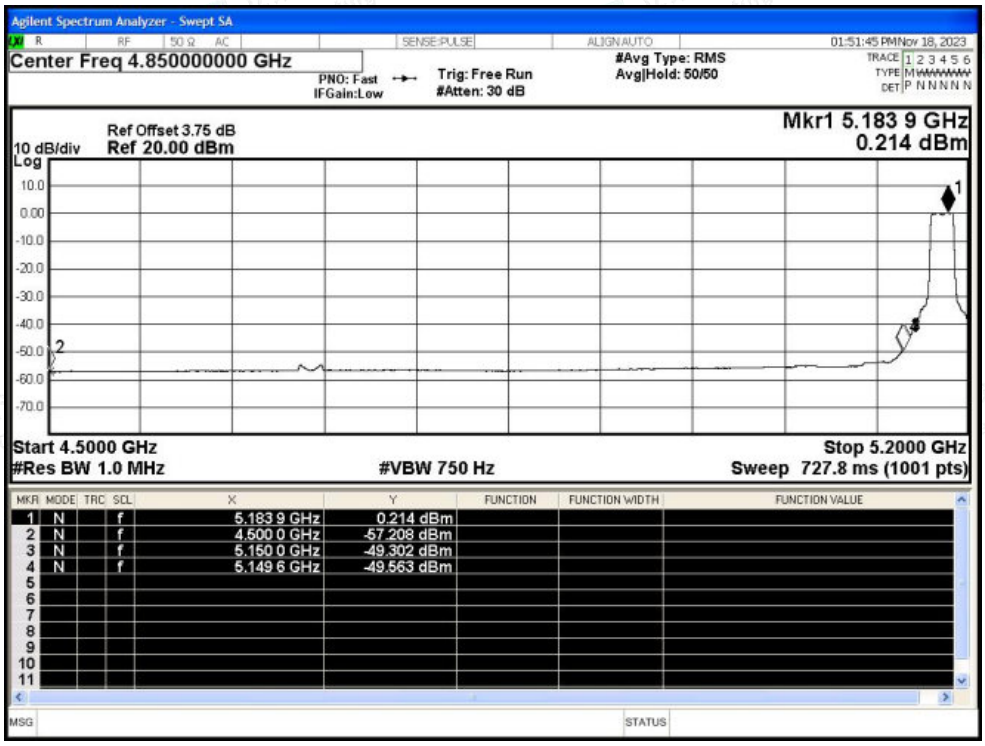
Condition	Mode	Frequency (MHz)	Antenna	Spur Freq (MHz)	Power (dBm)	Gain (dBi)	E (dBuV/m)	Detector	Limit (dBuV/m)	Verdict
NVNT	a	5180	Ant1	4500	-49.92	2.31	47.65	Peak	68.2	Pass
NVNT	a	5180	Ant1	4500	-57.21	2.31	40.36	Average	54	Pass
NVNT	a	5180	Ant1	5148.2	-40.97	2.31	56.60	Peak	68.2	Pass
NVNT	a	5180	Ant1	5149.6	-49.56	2.31	48.01	Average	54	Pass
NVNT	a	5180	Ant1	5150	-38.6	2.31	58.97	Peak	68.2	Pass
NVNT	a	5180	Ant1	5150	-49.3	2.31	48.27	Average	54	Pass
NVNT	a	5240	Ant1	5350	-48.72	2.31	48.85	Peak	68.2	Pass
NVNT	a	5240	Ant1	5350	-56.82	2.31	40.75	Average	54	Pass
NVNT	a	5240	Ant1	5407.92	-47.29	2.31	50.28	Peak	68.2	Pass
NVNT	a	5240	Ant1	5350.8	-56.73	2.31	40.84	Average	54	Pass
NVNT	a	5240	Ant1	5460	-49.96	2.31	47.61	Peak	68.2	Pass
NVNT	a	5240	Ant1	5460	-57.32	2.31	40.25	Average	54	Pass
NVNT	n20	5180	Ant1	4500	-49.31	2.31	48.26	Peak	68.2	Pass
NVNT	n20	5180	Ant1	4500	-57.11	2.31	40.46	Average	54	Pass
NVNT	n20	5180	Ant1	5148.2	-38.36	2.31	59.21	Peak	68.2	Pass
NVNT	n20	5180	Ant1	5149.6	-47.09	2.31	50.48	Average	54	Pass
NVNT	n20	5180	Ant1	5150	-33.17	2.31	64.40	Peak	68.2	Pass
NVNT	n20	5180	Ant1	5150	-47.09	2.31	50.48	Average	54	Pass
NVNT	n20	5240	Ant1	5350	-50.39	2.31	47.18	Peak	68.2	Pass
NVNT	n20	5240	Ant1	5350	-56.82	2.31	40.75	Average	54	Pass
NVNT	n20	5240	Ant1	5420.88	-46.95	2.31	50.62	Peak	68.2	Pass
NVNT	n20	5240	Ant1	5351.76	-56.7	2.31	40.87	Average	54	Pass
NVNT	n20	5240	Ant1	5460	-50.43	2.31	47.14	Peak	68.2	Pass
NVNT	n20	5240	Ant1	5460	-57.13	2.31	40.44	Average	54	Pass
NVNT	ac20	5180	Ant1	4500	-50.92	2.31	46.65	Peak	68.2	Pass
NVNT	ac20	5180	Ant1	4500	-57.24	2.31	40.33	Average	54	Pass
NVNT	ac20	5180	Ant1	5148.9	-36.44	2.31	61.13	Peak	68.2	Pass
NVNT	ac20	5180	Ant1	5149.6	-47.42	2.31	50.15	Average	54	Pass
NVNT	ac20	5180	Ant1	5150	-40.98	2.31	56.59	Peak	68.2	Pass
NVNT	ac20	5180	Ant1	5150	-46.74	2.31	50.83	Average	54	Pass
NVNT	ac20	5240	Ant1	5350	-49.74	2.31	47.83	Peak	68.2	Pass
NVNT	ac20	5240	Ant1	5350	-56.81	2.31	40.76	Average	54	Pass
NVNT	ac20	5240	Ant1	5386.56	-47.4	2.31	50.17	Peak	68.2	Pass
NVNT	ac20	5240	Ant1	5351.04	-56.73	2.31	40.84	Average	54	Pass
NVNT	ac20	5240	Ant1	5460	-50.59	2.31	46.98	Peak	68.2	Pass
NVNT	ac20	5240	Ant1	5460	-57.06	2.31	40.51	Average	54	Pass

Test Graphs

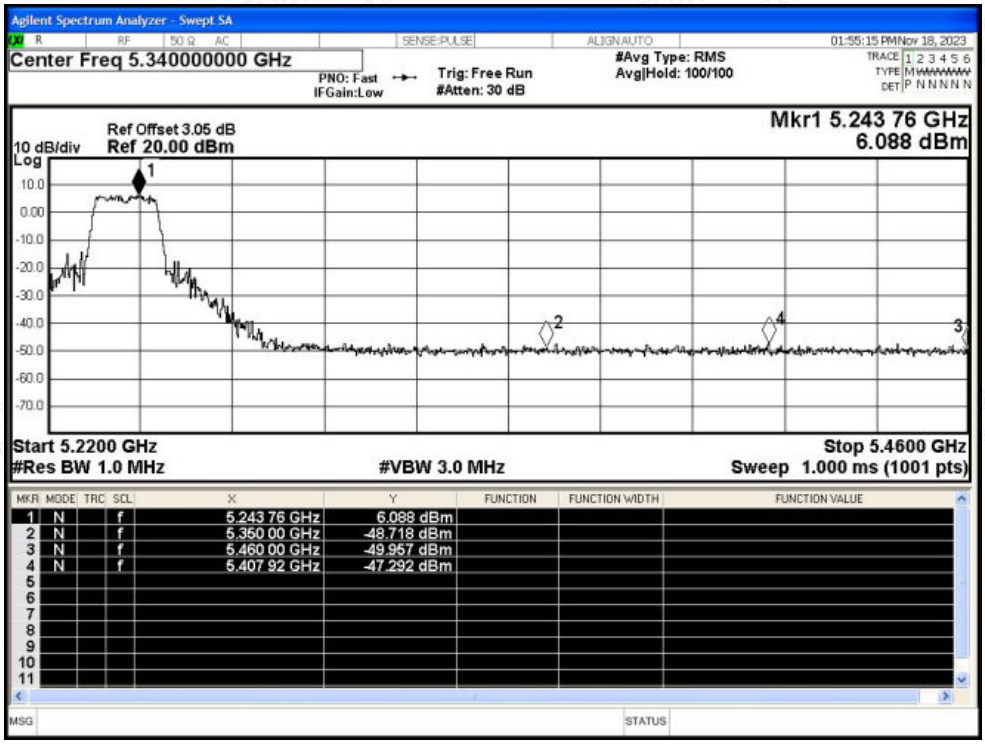
Restrict Band NVNT a 5180MHz Ant1 Peak



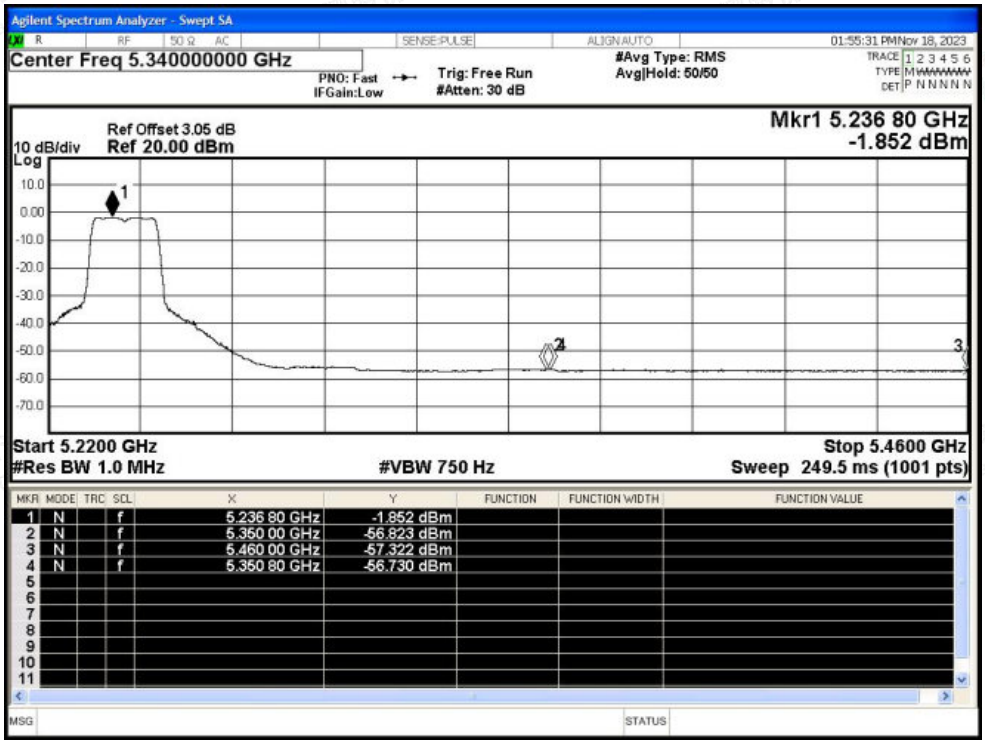
Restrict Band NVNT a 5180MHz Ant1 Average



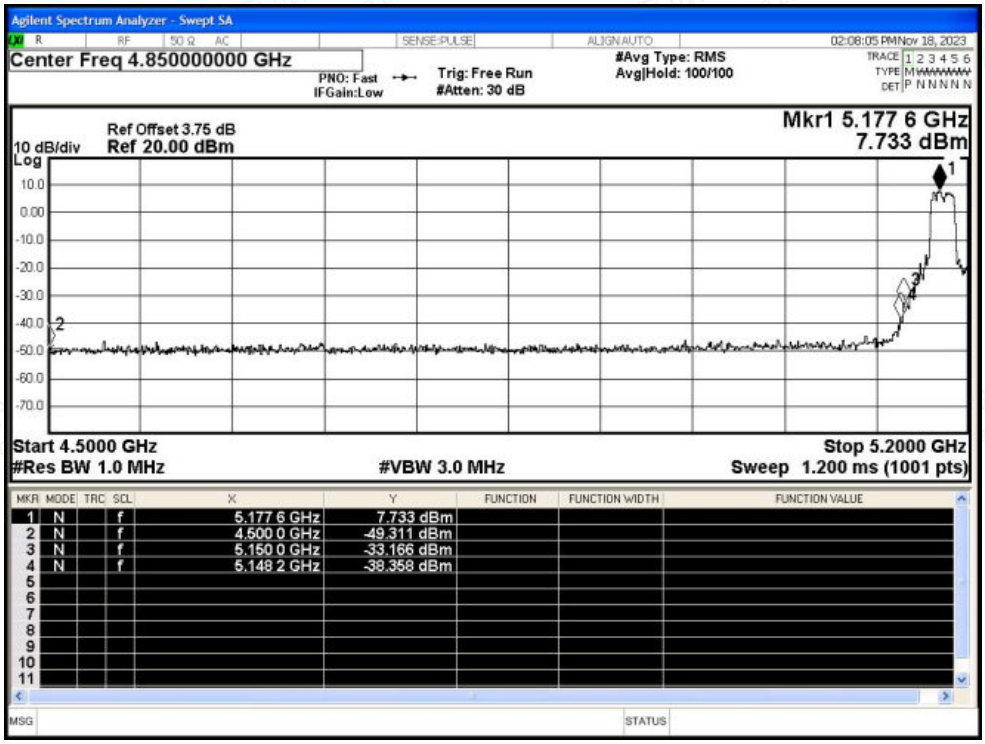
Restrict Band NVNT a 5240MHz Ant1 Peak



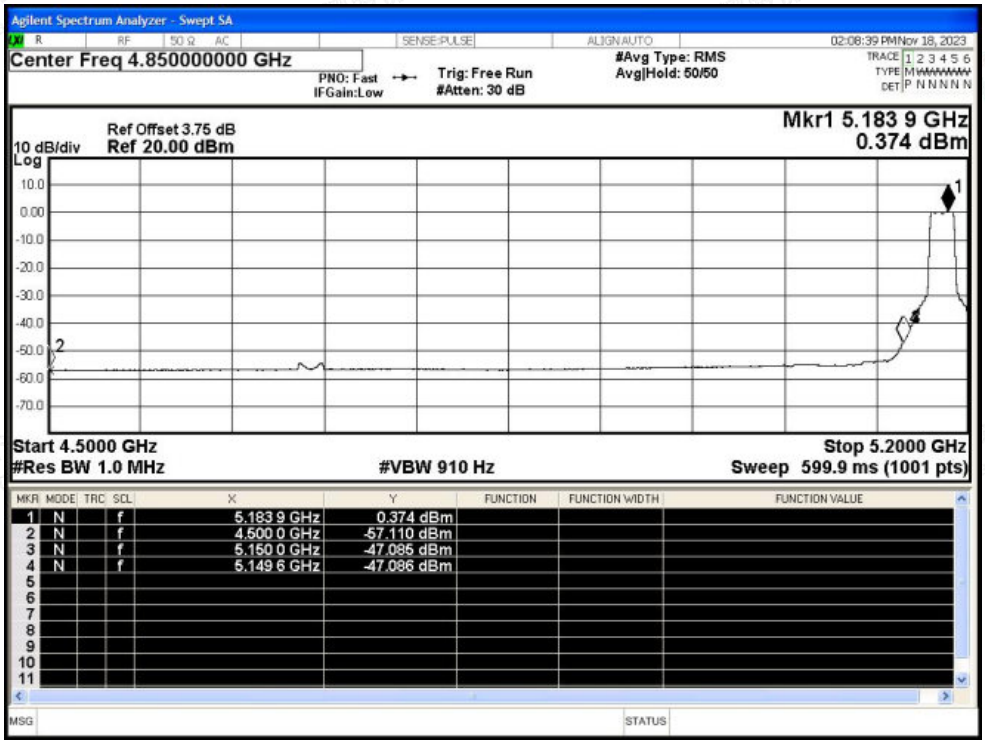
Restrict Band NVNT a 5240MHz Ant1 Average



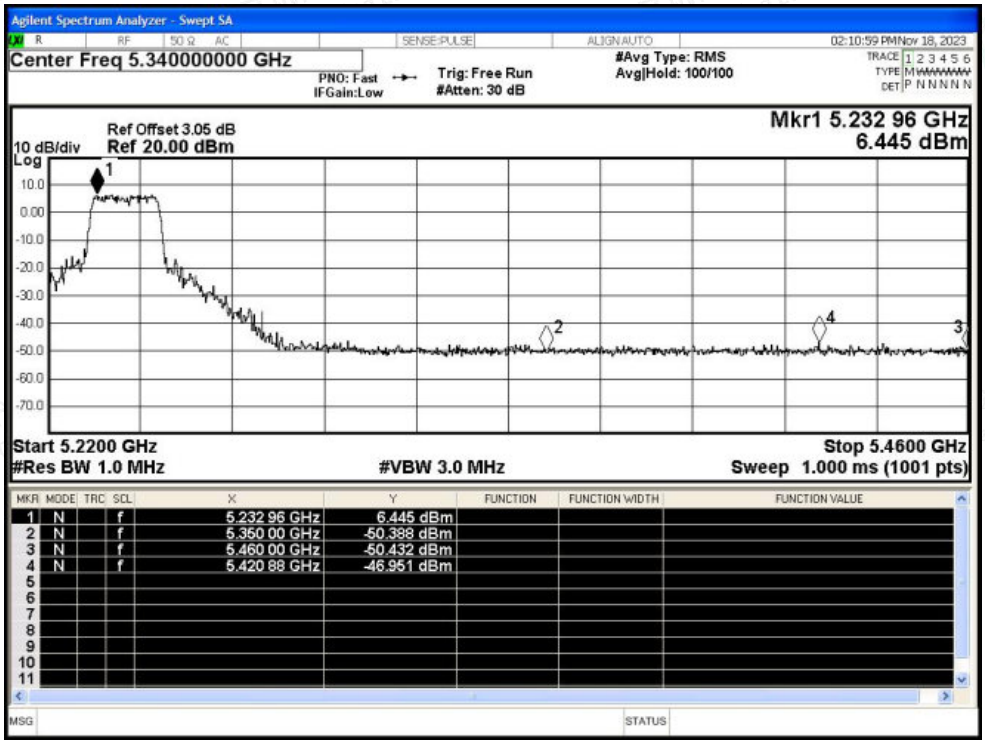
Restrict Band NVNT n20 5180MHz Ant1 Peak



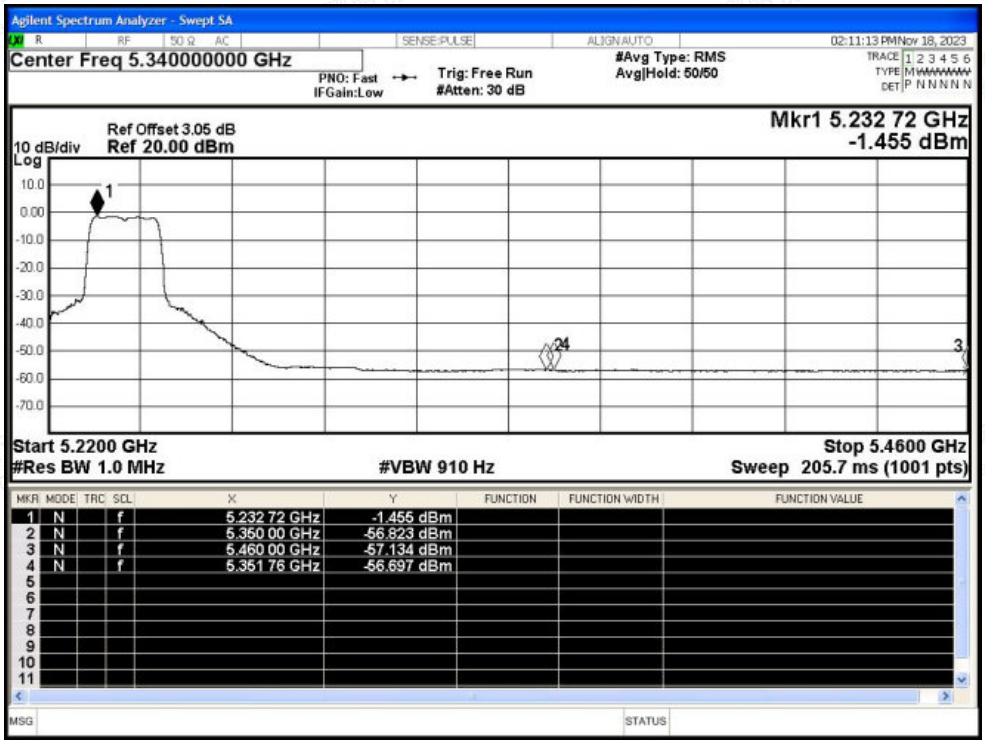
Restrict Band NVNT n20 5180MHz Ant1 Average



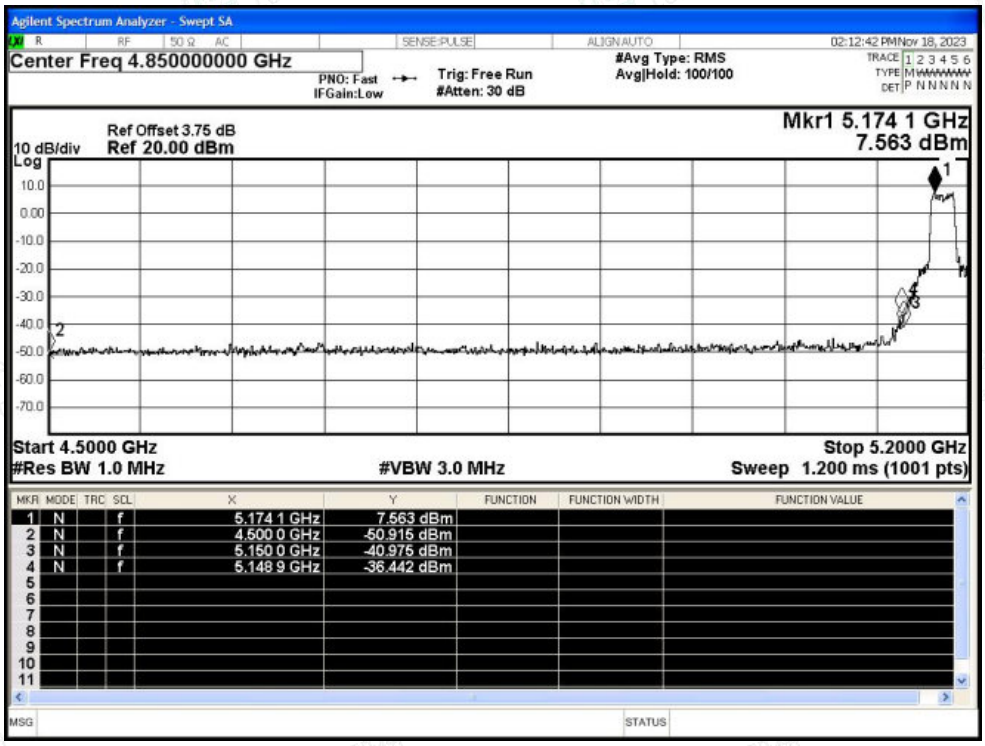
Restrict Band NVNT n20 5240MHz Ant1 Peak



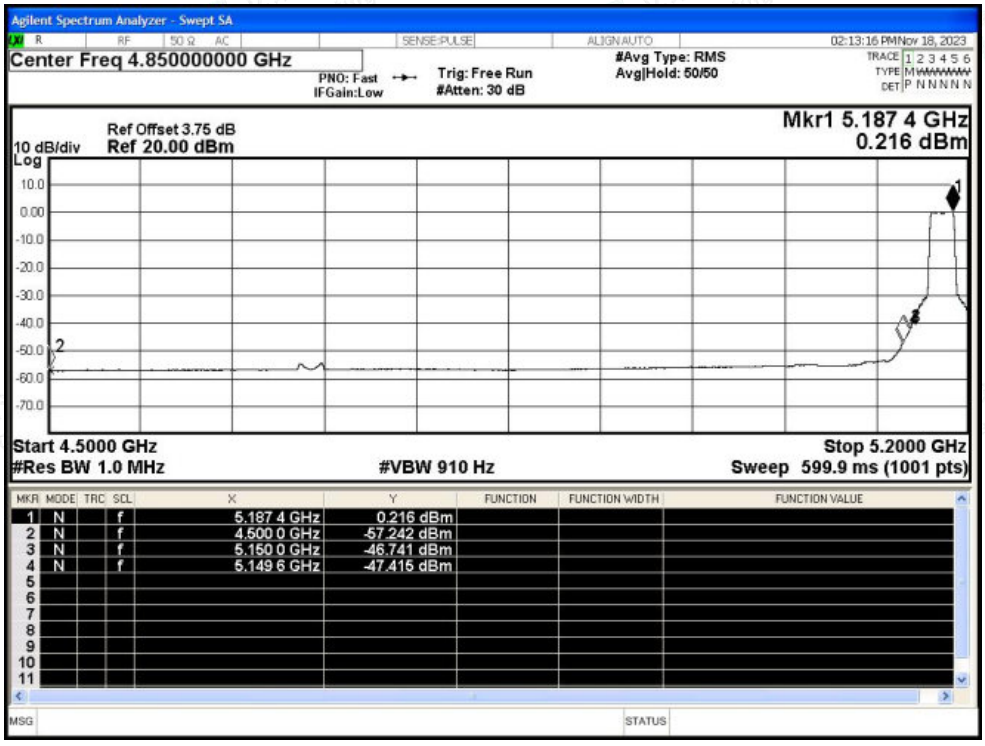
Restrict Band NVNT n20 5240MHz Ant1 Average



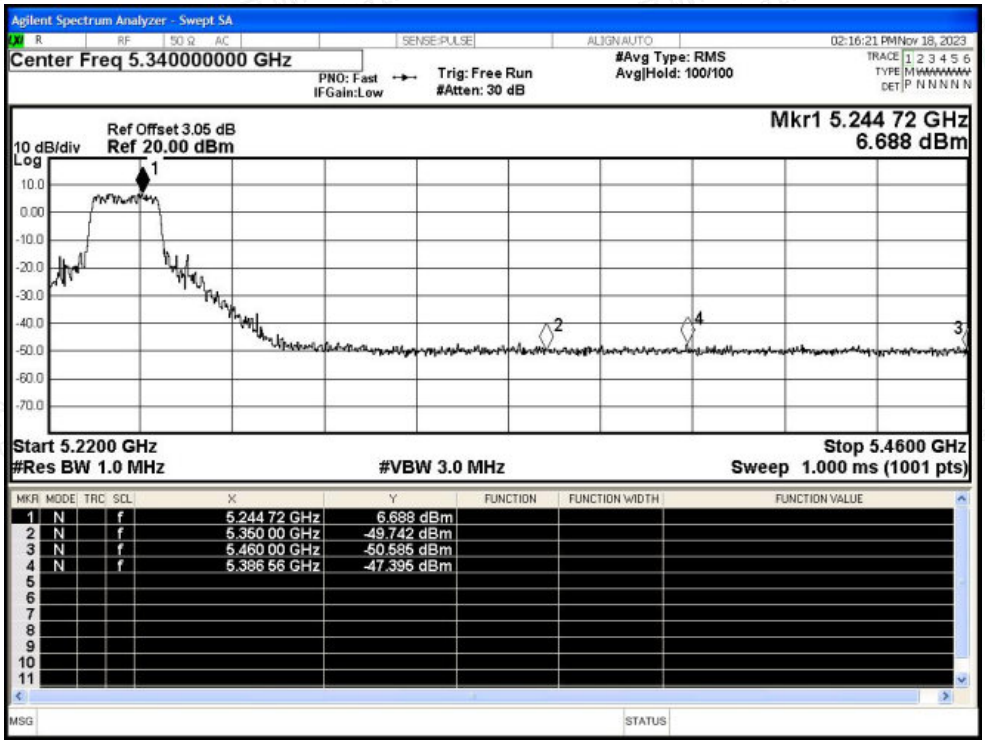
Restrict Band NVNT ac20 5180MHz Ant1 Peak



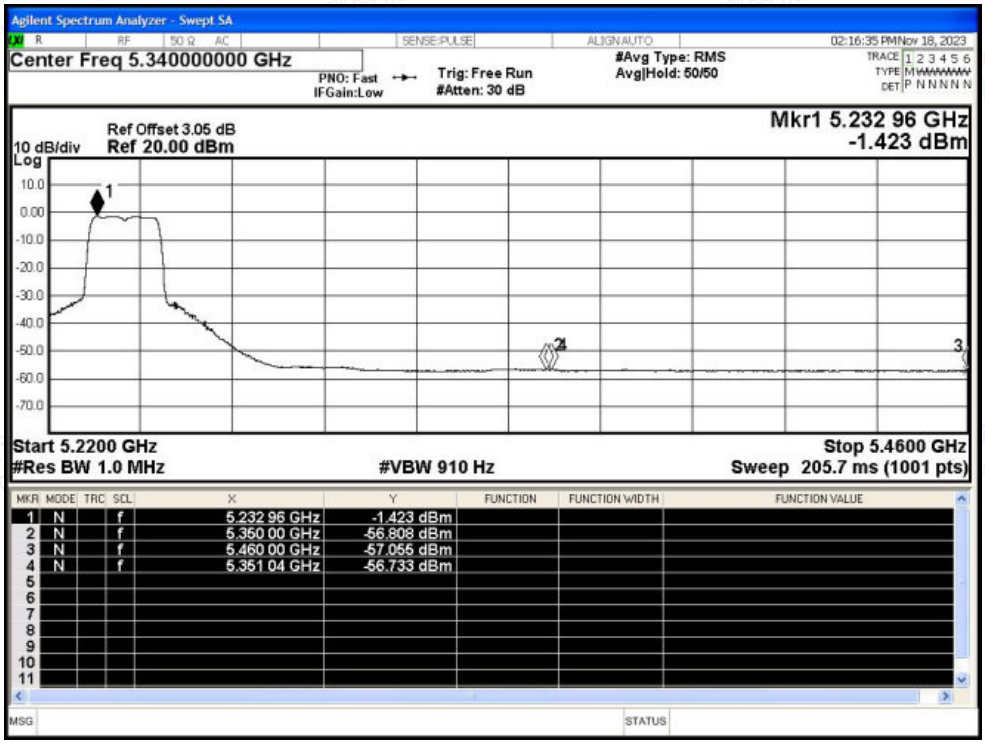
Restrict Band NVNT ac20 5180MHz Ant1 Average



Restrict Band NVNT ac20 5240MHz Ant1 Peak



Restrict Band NVNT ac20 5240MHz Ant1 Average

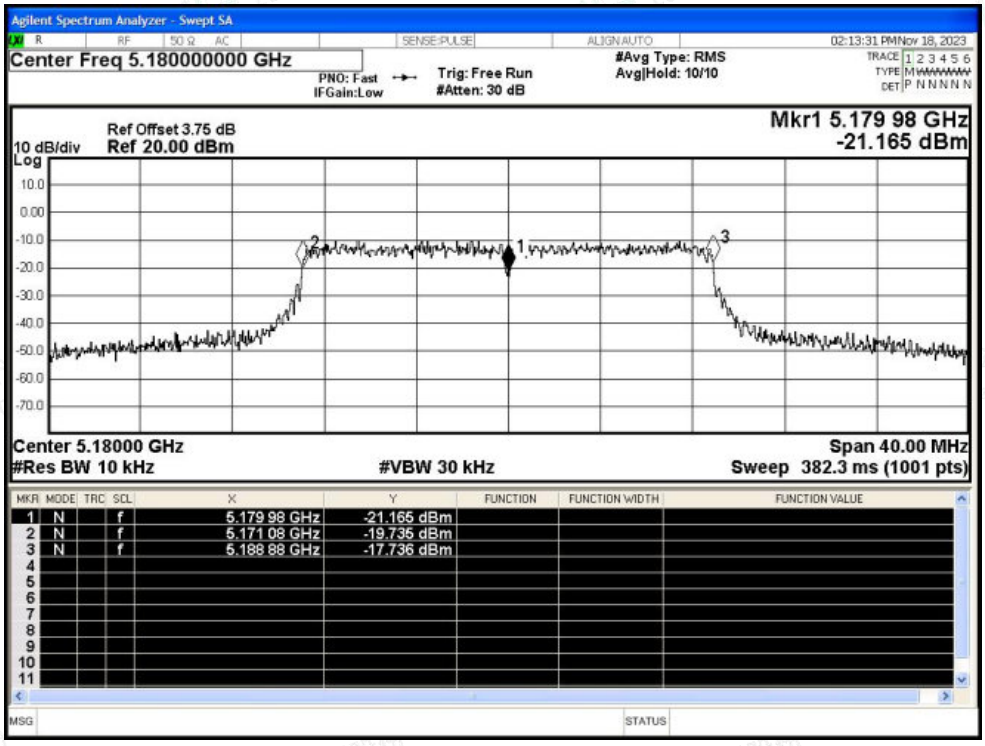


C.5 Frequency Stability

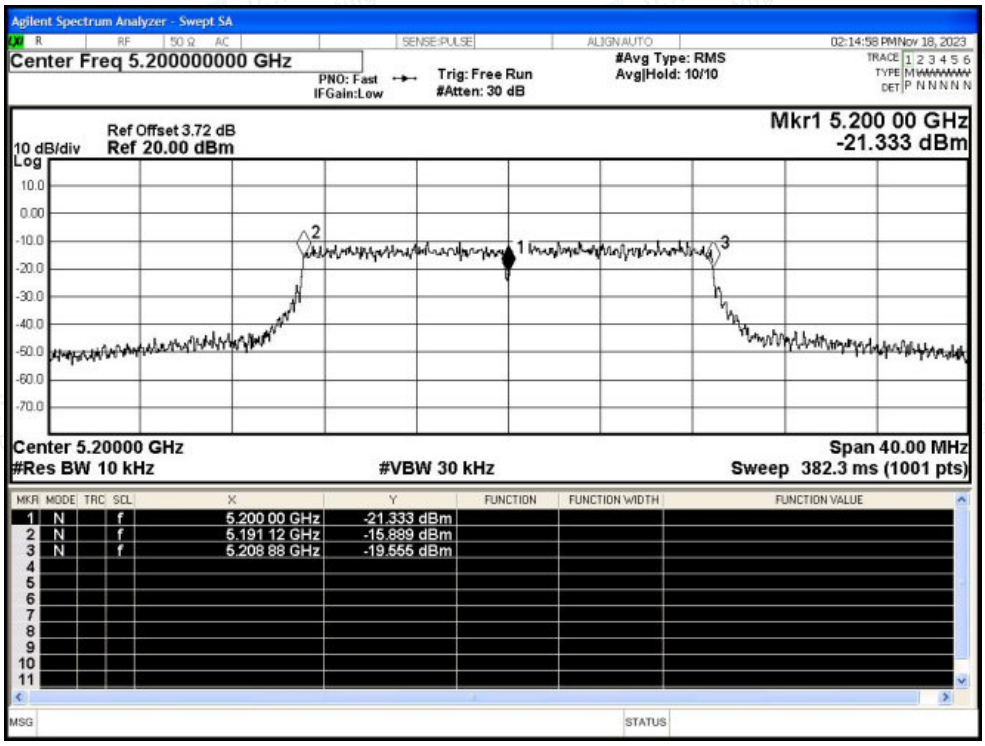
Condition	Mode	Frequency (MHz)	Antenna	Measured Frequency (MHz)	Frequency Error (Hz)	Deviation (ppm)	Limit (ppm)	Verdict
NVNT	ac20	5180	Ant1	5179.98	-20000	-3.86	25	Pass
NVNT	ac20	5200	Ant1	5200	0	0	25	Pass
NVNT	ac20	5240	Ant1	5239.98	-20000	-3.82	25	Pass

Test Graphs

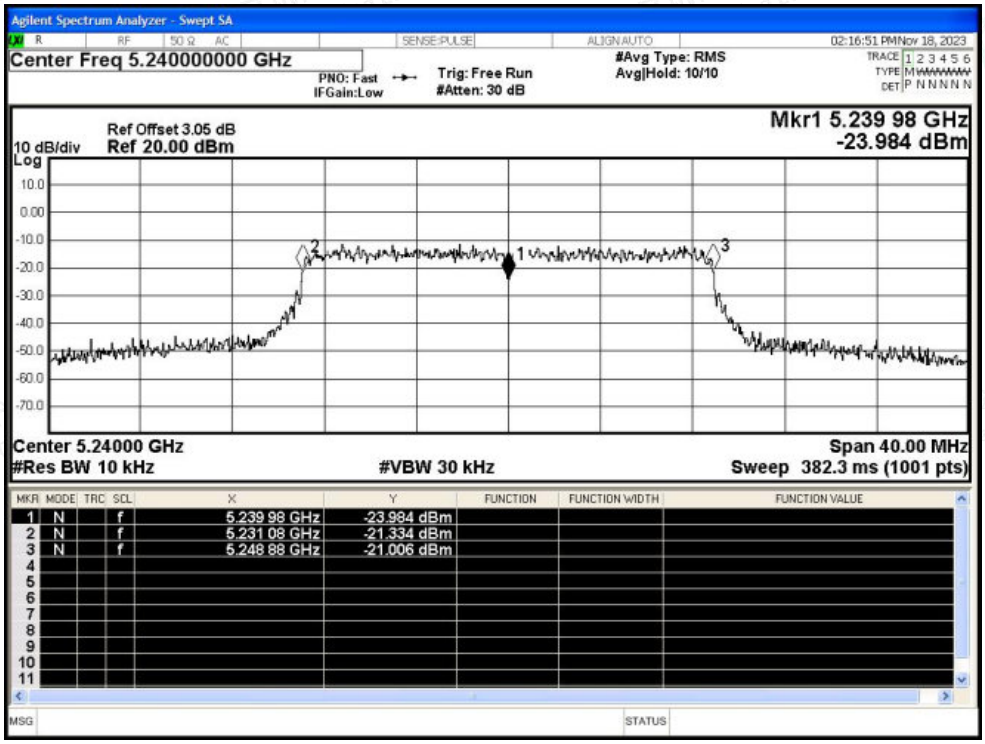
Freq. Stability NVNT ac20 5180MHz Ant1



Freq. Stability NVNT ac20 5200MHz Ant1



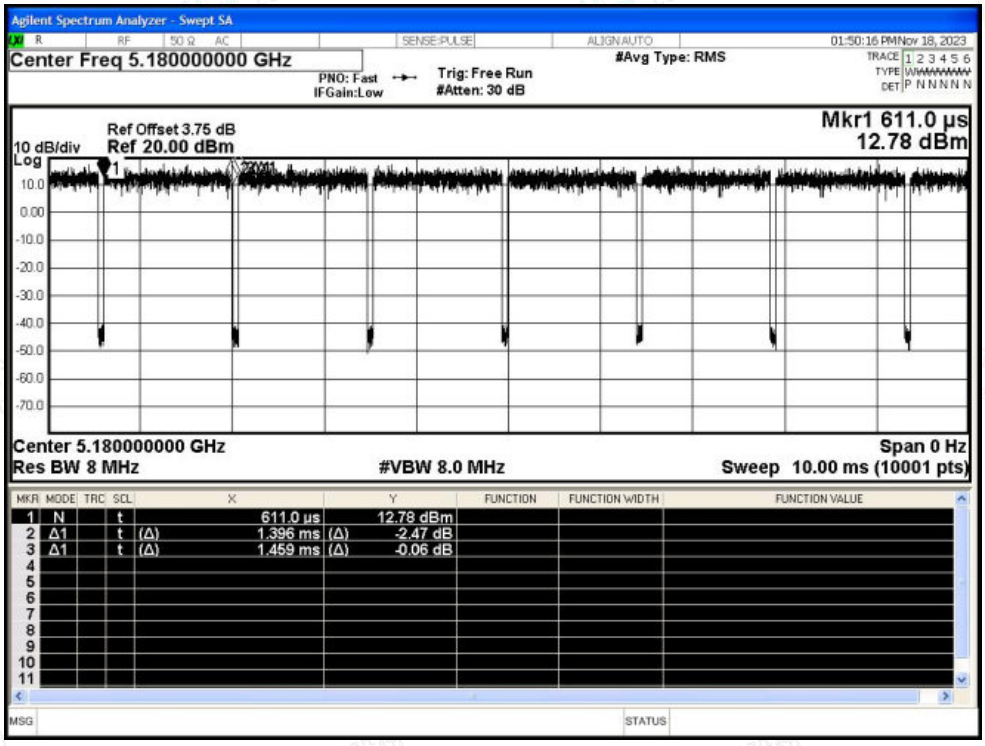
Freq. Stability NVNT ac20 5240MHz Ant1



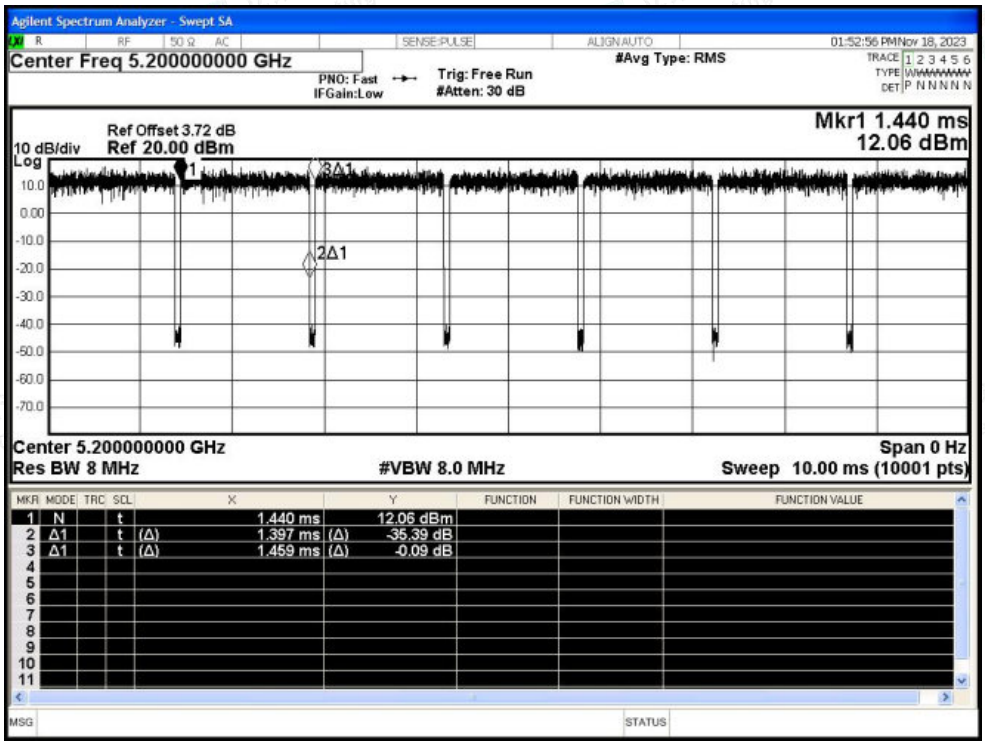
C.6 Duty Cycle

Condition	Mode	Frequency (MHz)	Antenna	Duty Cycle (%)	Correction Factor (dB)	1/T (kHz)
NVNT	a	5180	Ant1	95.68	0.19	0.72
NVNT	a	5200	Ant1	95.75	0.19	0.72
NVNT	a	5240	Ant1	95.68	0.19	0.72
NVNT	n20	5180	Ant1	94.94	0.23	0.85
NVNT	n20	5200	Ant1	95.02	0.22	0.85
NVNT	n20	5240	Ant1	95.02	0.22	0.85
NVNT	ac20	5180	Ant1	94.97	0.22	0.84
NVNT	ac20	5200	Ant1	95.04	0.22	0.84
NVNT	ac20	5240	Ant1	95.04	0.22	0.84

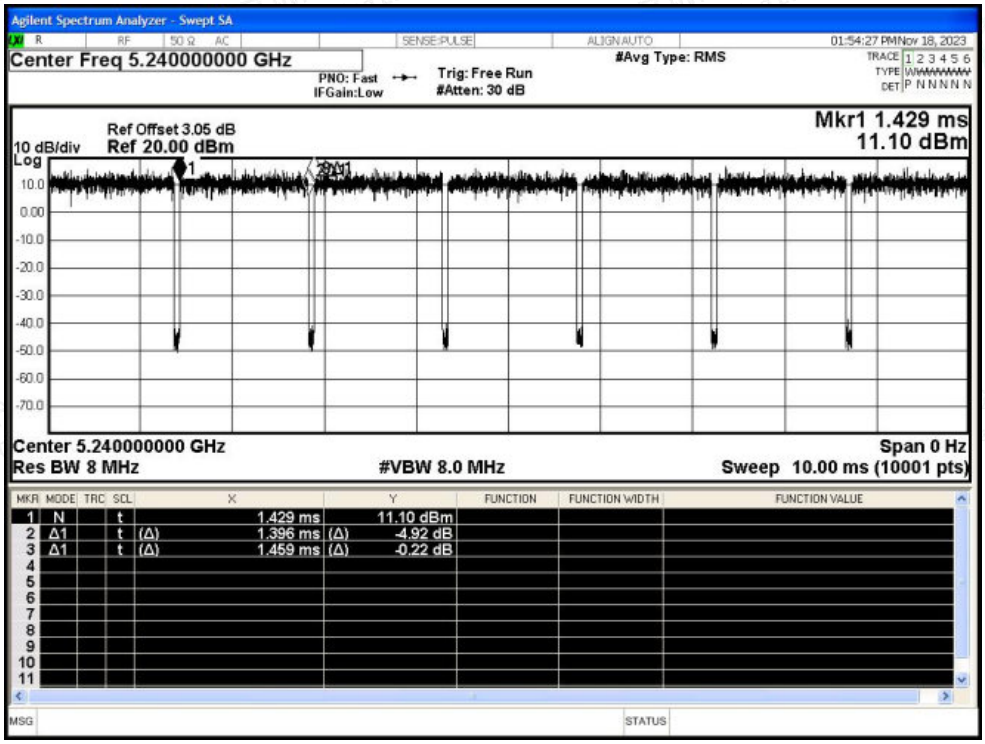
Test Graphs
Duty Cycle NVNT a 5180MHz Ant1



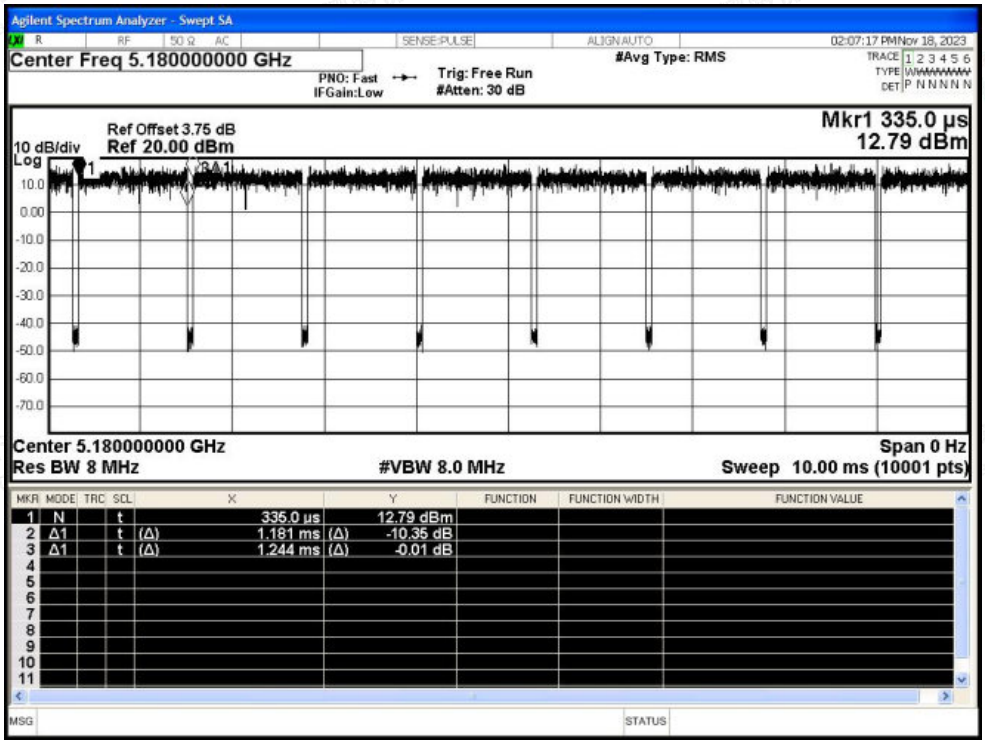
Duty Cycle NVNT a 5200MHz Ant1



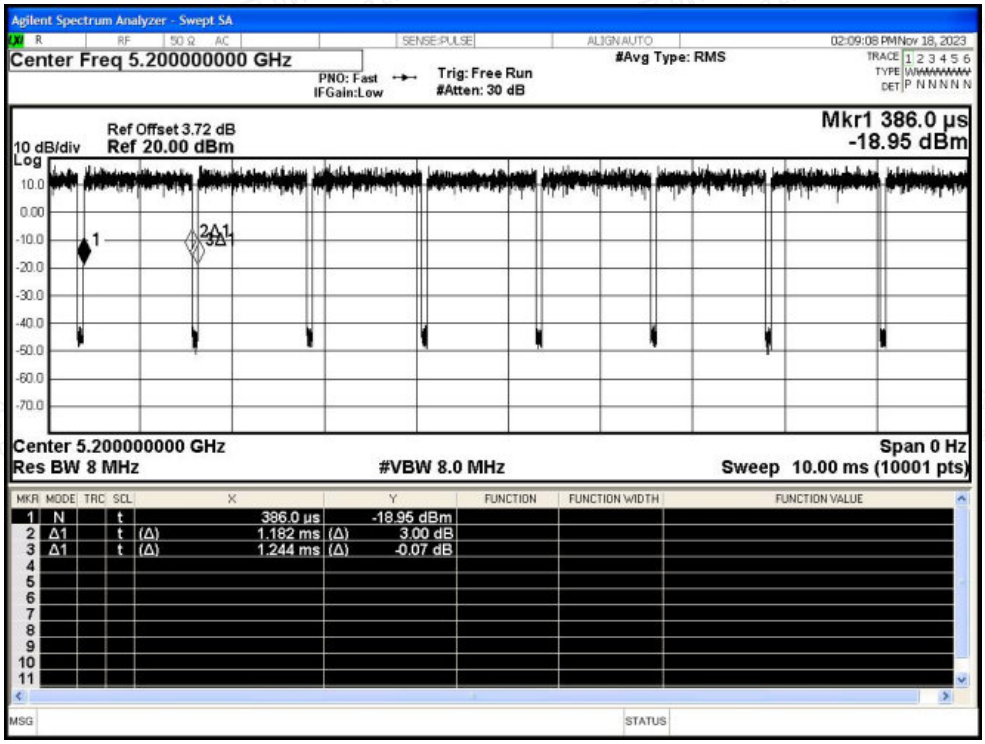
Duty Cycle NVNT a 5240MHz Ant1



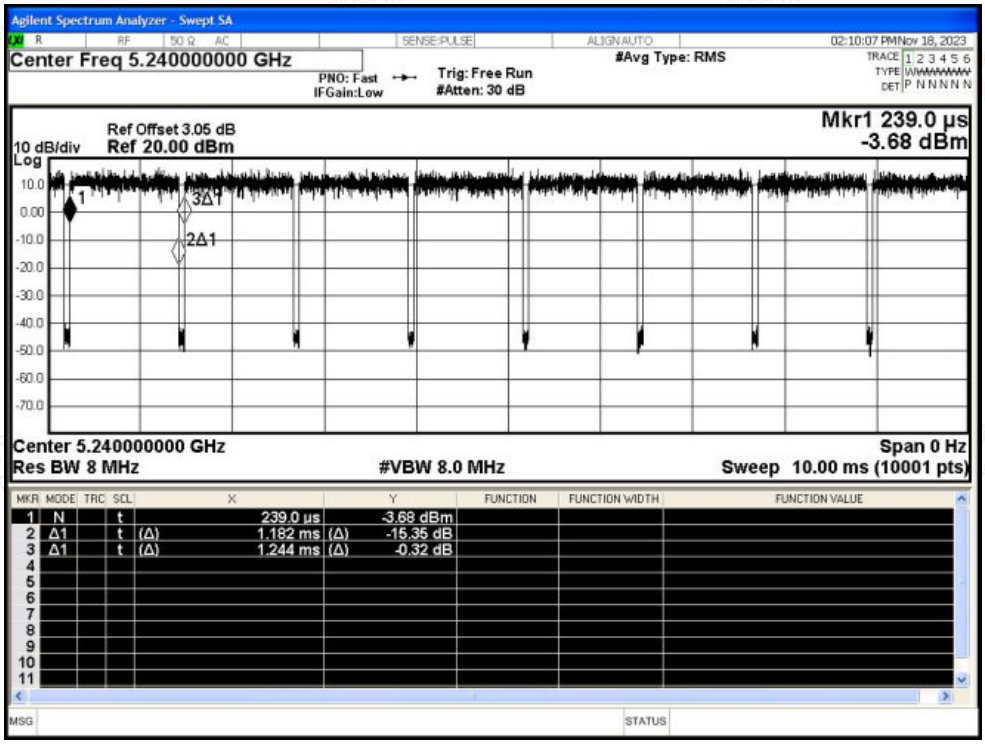
Duty Cycle NVNT n20 5180MHz Ant1



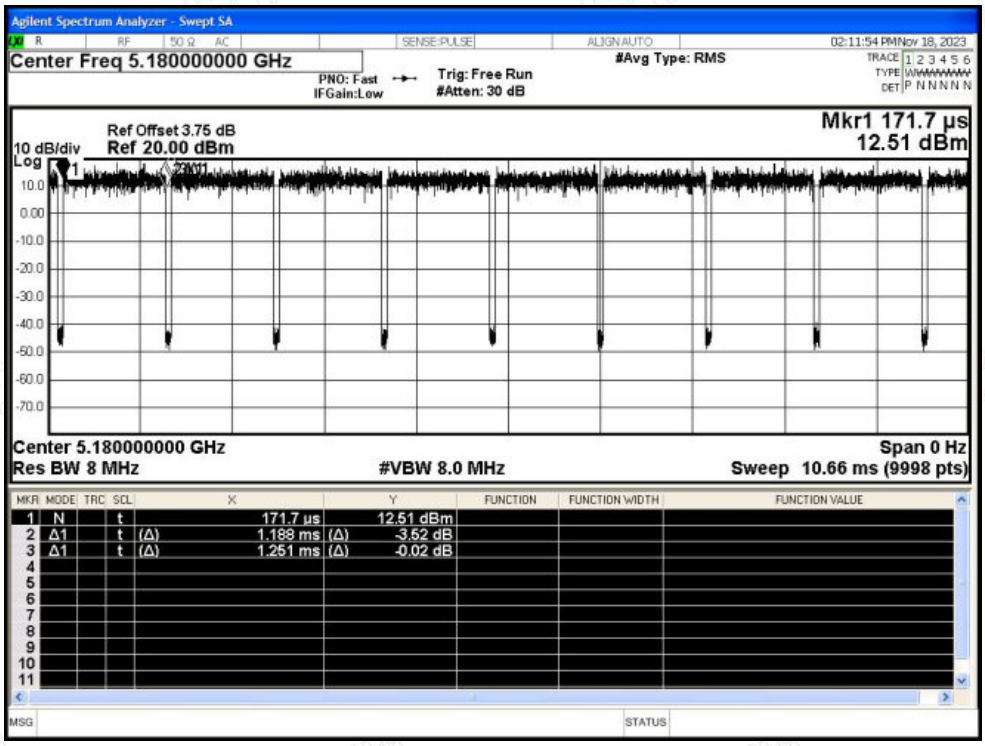
Duty Cycle NVNT n20 5200MHz Ant1



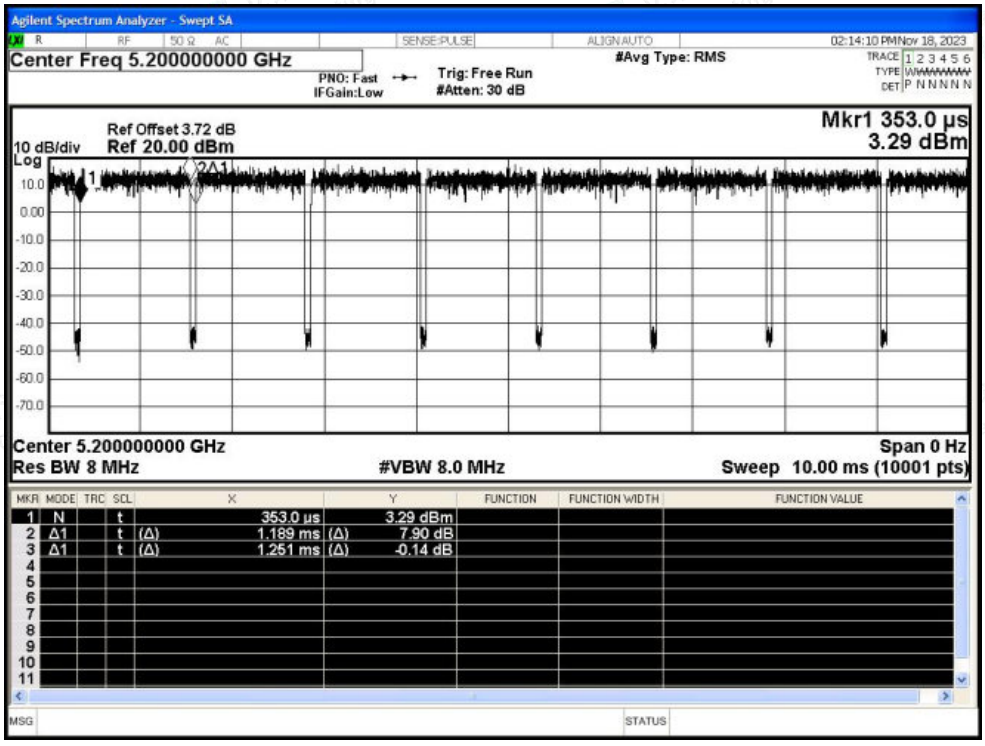
Duty Cycle NVNT n20 5240MHz Ant1



Duty Cycle NVNT ac20 5180MHz Ant1



Duty Cycle NVNT ac20 5200MHz Ant1



Duty Cycle NVNT ac20 5240MHz Ant1