TEST REPORT

FCC ID: 2ADYY-T15RA-1

Product: Laptop Computer

Model No.: T15RA

Trade Mark: TECNO

Report No.: WSCT-ANAB-R&E240800043A-Wi-Fi3

Issued Date: 12 October 2024

Issued for:

TECNO MOBILE LIMITED
FLAT N 16/F BLOCK B UNIVERSAL INDUSTRIAL CENTRE 19-25 SHAN MEI STREET FOTAN NT HONGKONG

Issued By:

World Standardization Certification & Testing Group(Shenzhen) Co., Ltd.

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TABLE OF CONTENTS

1 Test Certification

Product:	Laptop Computer
Model No.:	T15RA
Additional Model:	TECNO
Applicant:	**TECNO MOBILE LIMITED** FLAT N 16/F BLOCK B UNIVERSAL INDUSTRIAL CENTRE 19-25 SHAN MEI STREET FOTAN NT HONGKONG
Manufacturer:	**TECNO MOBILE LIMITED** FLAT N 16/F BLOCK B UNIVERSAL INDUSTRIAL CENTRE 19-25 SHAN MEI STREET FOTAN NT HONGKONG
Date of Test:	20 September 2024 to 12 October 2024
Applicable Standards:	FCC CFR Title 47 FCC Part 15 Subpart E

The above equipment has been tested by World Standardization Certification & Testing Group(Shenzhen)Co., Ltd. and found compliance with the requirements set forth in the technical standards mentioned above. The results of testing in this report apply only to the product, which was tested. Other similar equipment will not necessarily produce the same results due to production tolerance and measurement uncertainties.

Tested By: Wang Xiang **(Wang Xiang)**

Checked By: Chen Xu **(Chen Xu)**

Approved By: Li Huaibi **(Li Huaibi)**

Date: 12 October 2024

2 EUT Description

Product:	Laptop Computer
Model No.:	T15RA
Trade Mark:	TECNO
Operation Frequency:	U-NII-5: 5925-6425MHz U-NII-6: 6425-6525MHz U-NII-7: 6525-6875MHz U-NII-8: 6875-7125MHz
Modulation type:	IEEE 802.11a/n/ac/ax: OFDM/OFDMA (BPSK/QPSK/16QAM/64QAM/256QAM/1024QAM)
Antenna Type:	FIPA Antenna
Antenna Gain	ANT1(MAIN):2.92dBi ANT2(AUX): 2.40dBi
Operating Voltage:	Adapter1: FC498U Input: 100-240V~50/60Hz 1.5A Max Output: PD:5.V⎓3A 15.0W 9V⎓3A 12 V⎓3A 15V⎓3A 20V⎓3.25A PPS: 3.3-11V⎓5A Max Rechargeable Li-ion Polymer Battery: 156 Rated Voltage: 11.55V Rated Capacity: 6060mAh/70Wh Typical Capacity: 6160mAh/71.14Wh Limited Charge Voltage: 13.2V
Remark:	N/A.

Note: 1. N/A stands for no applicable.
2. Antenna gain provided by the customer.

Configuration differences

Model	Processor
T15RA	i5
T15RA	i7
Note: The prototypes of both configurations have been tested, and the T15RA (i7) has the worst test result, which is the main test model reported	

3 TEST DESCRIPTION

3.1 MEASUREMENT UNCERTAINTY

The reported uncertainty of measurement **y ± U**，where expended uncertainty **U** is based on a standard uncertainty multiplied by a coverage factor of **k=2**，providing a level of confidence of approximately **95** %。

No.	Item	Uncertainty
1	Conducted Emission Test	±3.2dB
2	RF power, conducted	±0.16dB
3	Spurious emissions, conducted	±0.21dB
4	All emissions, radiated(<1GHz)	±4.7dB
5	All emissions, radiated(>1GHz)	±4.7dB
6	Temperature	±0.5°C
7	Humidity	±2%
8	Receiver Spurious Emissions	±2.5%
9	Transmitter Unwanted Emissions in the Spurious Domain	±2.5%
10	Transmitter Unwanted Emission in the out-of Band	±1.3%
11	Occupied Channel Bandwidth	±2.4%

3.2 TEST ENVIRONMENT AND MODE

Operating Environment:	
Temperature:	25.0 °C
Humidity:	56 % RH
Atmospheric Pressure:	1010 mbar
Test Mode:	
Engineering mode:	Keep the EUT in continuous transmitting by select channel and modulations(The value of duty cycle is 98.46%)

The sample was placed (0.8m below 1GHz, 1.5m above 1GHz) above the ground plane of 3m chamber. Measurements in both horizontal and vertical polarities were performed. During the test, each emission was maximized by: having the EUT continuously working, investigated all operating modes, rotated about all 3 axis (X, Y & Z) and considered typical configuration to obtain worst position, manipulating interconnecting cables, rotating the turntable, varying antenna height from 1m to 4m in both horizontal and vertical polarizations. The emissions worst-case are shown in Test Results of the following pages. For the full battery state and The output power to the maximum state.

To investigate the maximum EMI emission characteristics generates from EUT, the test system was pre-scanning tested base on the consideration of following EUT operation mode or test configuration mode which possible have effect on EMI emission level. Each of these EUT operation mode(s) or test configuration mode(s) mentioned above was evaluated respectively.

Test Mode	Description
Mode 1	802.11ax20
Mode 2	802.11ax40
Mode 3	802.11ax80
Mode 4	802.11ax160

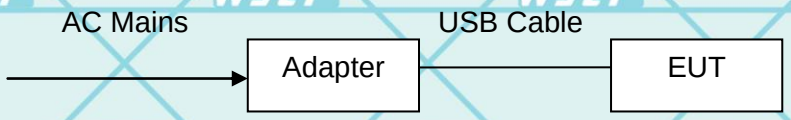
Note:

(1) The measurements are performed at the highest, lowest available channels.

(2) The EUT use new battery.

(3) Record the worst case of each test item in this report.

CONFIGURATION OF SYSTEM UNDER TEST



(EUT: Laptop Computer)

3.3 DESCRIPTION OF SUPPORT UNITS (CONDUCTED MODE)

The EUT has been tested as an independent unit together with other necessary accessories or support units. The following support units or accessories were used to form a representative test configuration during the tests.

Item	Equipment	Mfr/Brand	Model/Type No.	Series No.	Note
1	Adapter	/	FC498U	/	/
2	Router	ASUS	GT-AXE11000	M6LAJF201230	

Note:

(1) The support equipment was authorized by Declaration of Confirmation.
(2) For detachable type I/O cable should be specified the length in cm in『Length』column.
(3) “YES” is means “shielded” “with core”; “NO” is means “unshielded” “without core”.
(4) The adapter supply by the applicant.

4 SUMMARY OF TEST RESULTS

Test procedures according to the technical standards:

FCC Part15 Subpart C&E			
Standard Section	Test Item	Judgment	Remark
15.403(i) 15.407(a)(10)	26dB Emission Bandwidth	PASS	Complies
2.1049	99% Occupied Bandwidth	PASS	Complies
15.407(a)(8)	Maximum Conducted Output Power	PASS	Complies
15.407(a)(8)	Fundamental Maximum EIRP	PASS	Complies
15.407(a)(8)	Power Spectral Density	PASS	Complies
15.407(b)	Fundamental Power Spectral Density	PASS	Complies
15.407(d)(6)	Contention Based Protocol	PASS	Complies
15.407(b)	Unwanted Emissions	PASS	Complies
15.207	AC Conducted Emission	PASS	Complies
15.407(c)	Automatically Discontinue Transmission	PASS	Complies
15.407(b)(6)	In-Band Emissions (Channel Mask)	PASS	Complies

NOTE:

(1)" N/A" denotes test is not applicable in this test report.

(2)EUT has been tested in unfolded states, and the report only reflects data in the unfolded state (worst-case scenario)

(3) All test items in this report, except for power and PSD, are tested based on the minimum antenna gain

4.1 CARRIER FREQUENCY AND CHANNEL

Test program		*#*#3646633#*#*							
BW 20M	Channel	1	5	9	13	17	21	25	29
	Freq. (MHz)	5955	5975	5995	6015	6035	6055	6075	6095
BW 40M	Channel	3		11		19		27	
	Freq. (MHz)	5985		6005		6045		6085	
BW 80M	Channel	7				23			
	Freq. (MHz)	5985				6065			
BW 160M	Channel	15							
	Freq. (MHz)	6025							

BW 20M	Channel	33	37	41	45	49	53	57	61
	Freq. (MHz)	6115	6135	6155	6175	6195	6215	6235	6255
BW 40M	Channel	35		43		51		59	
	Freq. (MHz)	6125		6165		6205		6245	
BW 80M	Channel	39				55			
	Freq. (MHz)	6145				6225			
BW 160M	Channel	47							
	Freq. (MHz)	6185							

BW 20M	Channel	65	69	73	77	81	85	89	93
	Freq. (MHz)	6275	6295	6315	6335	6355	6375	6395	6415
BW 40M	Channel	67		75		83		91	
	Freq. (MHz)	6285		6325		6365		6405	
BW 80M	Channel	71				87			
	Freq. (MHz)	6305				6385			
BW 160M	Channel	79							
	Freq. (MHz)	6345							

BW 20M	Channel	97	101	105	109	113	117	121	125
	Freq. (MHz)	6435	6455	6475	6495	6515	6535	6555	6575
BW 40M	Channel	99		107		115		123	
	Freq. (MHz)	6445		6485		6525		6565	
BW 80M	Channel	103				119			
	Freq. (MHz)	6465				6545			
BW 160M	Channel	111							
	Freq. (MHz)	6505							

BW 20M	Channel	129	133	137	141	145	149	153	157
	Freq. (MHz)	6595	6615	6635	6655	6675	6695	6715	6735
BW 40M	Channel	131		139		147		155	
	Freq. (MHz)	6605		6645		6685		6725	
BW 80M	Channel	135				151			
	Freq. (MHz)	6625				6705			
BW 160M	Channel	143							
	Freq. (MHz)	6665							

BW 20M	Channel	161	165	169	173	177	181	185	189
	Freq. (MHz)	6755	6775	6795	6815	6835	6855	6875	6895
BW 40M	Channel	163		171		179		187	
	Freq. (MHz)	6765		6805		6845		6885	
BW 80M	Channel	167				183			
	Freq. (MHz)	6785				6865			
BW 160M	Channel	175							
	Freq. (MHz)	6825							

BW 20M	**Channel**	193	197	201	205	209	213	217	221
	Freq. (MHz)	6915	6935	6955	6975	6995	7015	7035	7055
BW 40M	**Channel**	195		203		211		219	
	Freq. (MHz)	6925		6965		7005		7045	
BW 80M	**Channel**	199				215			
	Freq. (MHz)	6945				7025			
BW 160M	**Channel**	207							
	Freq. (MHz)	6985							

BW 20M	**Channel**	225	229
	Freq. (MHz)	7075	7095
BW 40M	**Channel**	227	
	Freq. (MHz)	7085	

4.2 TEST MODE

Final test modes are considering the modulation and worse data rates as below table.

Modulation	Data Rate
802.11ax HE20	MCS0
802.11ax HE40	MCS0
802.11ax HE80	MCS0
802.11ax HE160	MCS0

CH.#		5925-7125 MHz U-NII-5	5925-7125 MHz U-NII-6	5925-7125 MHz U-NII-7	5925-7125 MHz U-NII-8
		802.11ax HE20	802.11ax HE20	802.11ax HE20	802.11ax HE20
L	Low	001	097	117	189
M	Middle	045	105	149	209
H	High	093	113	-	229
Straddle		-	-	185	-

CH.#		5925-7125 MHz U-NII-5	5925-7125 MHz U-NII-6	5925-7125 MHz U-NII-7	5925-7125 MHz U-NII-8
		802.11ax HE40	802.11ax HE40	802.11ax HE40	802.11ax HE40
L	Low	003	099	123	203
M	Middle	043	-	147	-
H	High	091	107	179	227
Straddle		-	115	-	187

CH.#		5925-7125 MHz U-NII-5	5925-7125 MHz U-NII-6	5925-7125 MHz U-NII-7	5925-7125 MHz U-NII-8
		802.11ax HE80	802.11ax HE80	802.11ax HE80	802.11ax HE80
L	Low	007	103	135	199
M	Middle	039		-	-
H	High	087		151	215
Straddle		-	119	183	-

CH.#		5925-7125 MHz U-NII-5	5925-7125 MHz U-NII-6	5925-7125 MHz U-NII-7	5925-7125 MHz U-NII-8
		802.11ax HE160	802.11ax HE160	802.11ax HE160	802.11ax HE160
L	Low	015	-	143	207
M	Middle	047			
H	High	079			
Straddle		-	111	175	-

Note: 1. For radiation spurious emission, the final modulation and the worst data rate was reference the max RF conducted power.
2. The RF test items make the EUT get into the engineering modes to provide channel selection, power level, data rate and the application type and for continuous transmitting signals.

5 MEASUREMENT INSTRUMENTS

NAME OF EQUIPMENT	MANUFACTURER	MODEL	SERIAL NUMBER	Calibration Date	Calibration Due.
Test software	--	EZ-EMC	CON-03A	-	-
Test software	--	MTS8310	-	-	-
EMI Test Receiver	R&S	ESCI	100005	11/05/2023	11/04/2024
LISN	AFJ	LS16	16010222119	11/05/2023	11/04/2024
LISN(EUT)	Mestec	AN3016	04/10040	11/05/2023	11/04/2024
Universal Radio Communication Tester	R&S	CMU 200	1100.0008.02	11/05/2023	11/04/2024
Coaxial cable	Megalon	LMR400	N/A	11/05/2023	11/04/2024
GPIB cable	Megalon	GPIB	N/A	11/05/2023	11/04/2024
Spectrum Analyzer	R&S	FSU	100114	11/05/2023	11/04/2024
Pre Amplifier	H.P.	HP8447E	2945A02715	11/05/2023	11/04/2024
Pre-Amplifier	CDSI	PAP-1G18-38	--	11/05/2023	11/04/2024
Bi-log Antenna	SUNOL Sciences	JB3	A021907	11/05/2023	11/04/2024
9*6*6 Anechoic	--	--	--	11/05/2023	11/04/2024
Horn Antenna	COMPLIANCE ENGINEERING	CE18000	--	11/05/2023	11/04/2024
Horn Antenna	SCHWARZBECK	BBHA9120D	9120D-631	11/05/2023	11/04/2024
Cable	TIME MICROWAVE	LMR-400	N-TYPE04	11/05/2023	11/04/2024
System-Controller	CCS	N/A	N/A	N.C.R	N.C.R
Turn Table	CCS	N/A	N/A	N.C.R	N.C.R
Antenna Tower	CCS	N/A	N/A	N.C.R	N.C.R
RF cable	Murata	MXHQ87WA3000	-	11/05/2023	11/04/2024
Loop Antenna	EMCO	6502	00042960	11/05/2023	11/04/2024
Horn Antenna	SCHWARZBECK	BBHA 9170	1123	11/05/2023	11/04/2024
Power meter	Anritsu	ML2487A	6K00003613	11/05/2023	11/04/2024
Power sensor	Anritsu	MX248XD	--	11/05/2023	11/04/2024
Spectrum Analyzer	Keysight	N9010B	MY60241089	11/05/2023	11/04/2024

6 Facilities and Accreditations

6.1 FACILITIES

All measurement facilities used to collect the measurement data are located at
World Standardization Certification & Testing Group (Shenzhen) Co., Ltd.
Building A-B,Baoli'an Industrial Park,No.58 and 60,Tangtou Avenue, Shiyan Street, Bao'an District, Shenzhen City, Guangdong Province, China

The sites are constructed in conformance with the requirements of ANSI C63.4 and CISPR Publication 22. All receiving equipment conforms to CISPR Publication 16-1, "Radio Interference Measuring Apparatus and Measurement Methods."

6.2 ACCREDITATIONS

ANAB - Certificate Number: AT-3951

The EMC Laboratory has been accredited by the American Association for Laboratory Accreditation (ANAB).Certification Number: AT-3951

7 Test Results and Measurement Data

7.1 CONDUCTED EMISSION MEASUREMENT

POWER LINE CONDUCTED EMISSION Limits (Frequency Range 150KHz-30MHz)

FREQUENCY (MHz)	Class A (dBuV)		Class B (dBuV)		Standard
	Quasi-peak	Average	Quasi-peak	Average	
0.15 -0.5	79.00	66.00	66 - 56 *	56 - 46 *	FCC
0.50 -5.0	73.00	60.00	56.00	46.00	FCC
5.0 -30.0	73.00	60.00	60.00	50.00	FCC

Note:

(1) The tighter limit applies at the band edges.

(2) The limit of " * " marked band means the limitation decreases linearly with the logarithm of the frequency in the range.

The following table is the setting of the receiver

Receiver Parameters	Setting
Attenuation	10 dB
Start Frequency	0.15 MHz
Stop Frequency	30 MHz
IF Bandwidth	9 kHz

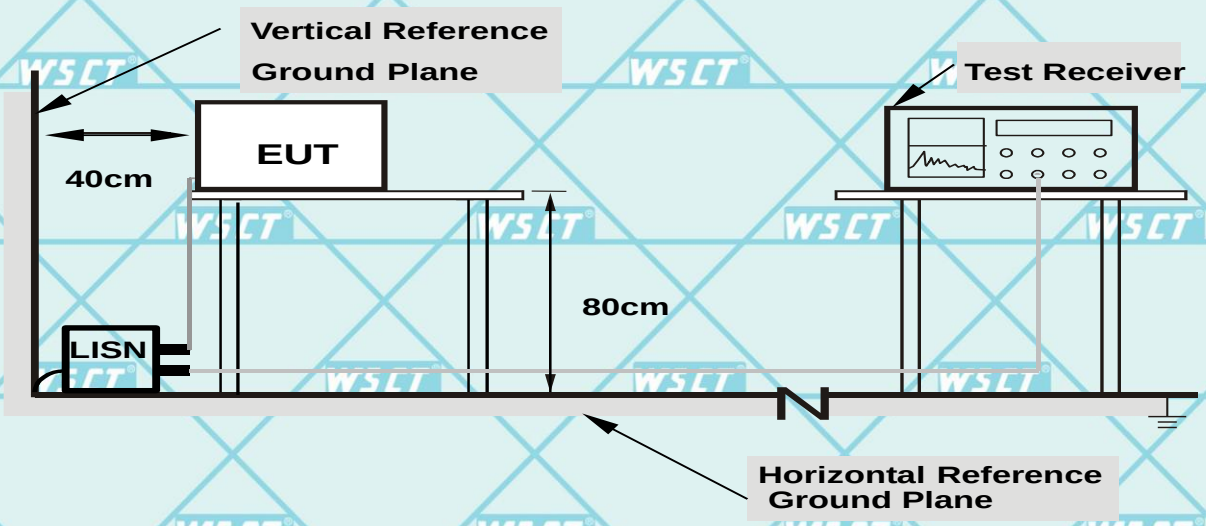
7.1.1 TEST PROCEDURE

a. The EUT was placed 0.4 meters from the horizontal ground plane with EUT being connected to the power mains through a line impedance stabilization network (LISN). All other support equipments powered from additional LISN(s). The LISN provide 50 Ohm/ 50uH of coupling impedance for the measuring instrument.
b. Interconnecting cables that hang closer than 40 cm to the ground plane shall be folded back and forth in the center forming a bundle 30 to 40 cm long.
c. I/O cables that are not connected to a peripheral shall be bundled in the center. The end of the cable may be terminated, if required, using the correct terminating impedance. The overall length shall not exceed 1 m.
d. LISN at least 80 cm from nearest part of EUT chassis.
e. For the actual test configuration, please refer to the related Item –EUT Test Photos.

7.2 DEVIATION FROM TEST STANDARD

No deviation

TEST SETUP



Note: 1.Support units were connected to second LISN.
2.Both of LISNs (AMN) are 80 cm from EUT and at least 80 from other units and other metal planes

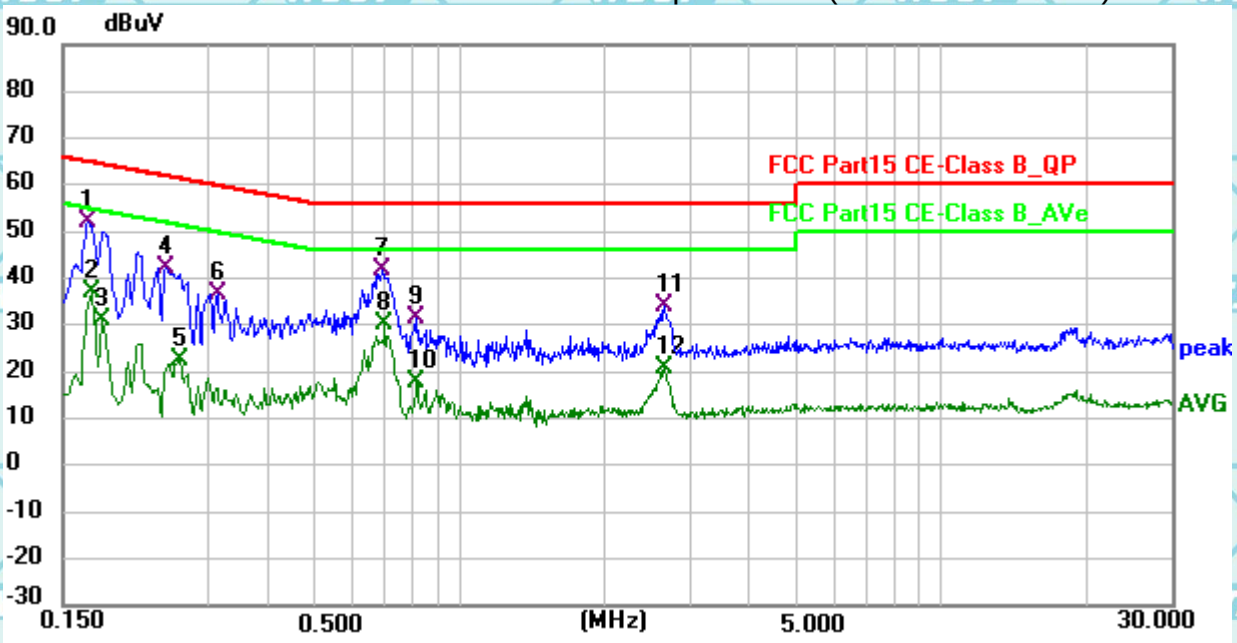
7.2.1 EUT OPERATING CONDITIONS

The EUT is working in the Normal link mode. All modes have been tested and normal link mode is worst.

Devices subject to Part 15 must be tested for all available U.S. voltages and frequencies (such as a nominal 120 VAC, 60 Hz and 240 VAC, 50 Hz) for which the device is capable of operation. So, The configuration 120 VAC, 60 Hz and 240 VAC, 50 Hz were tested respectively, but only the worst configuration (120 VAC, 60 Hz) shown here.

7.2.2 TEST RESULTS

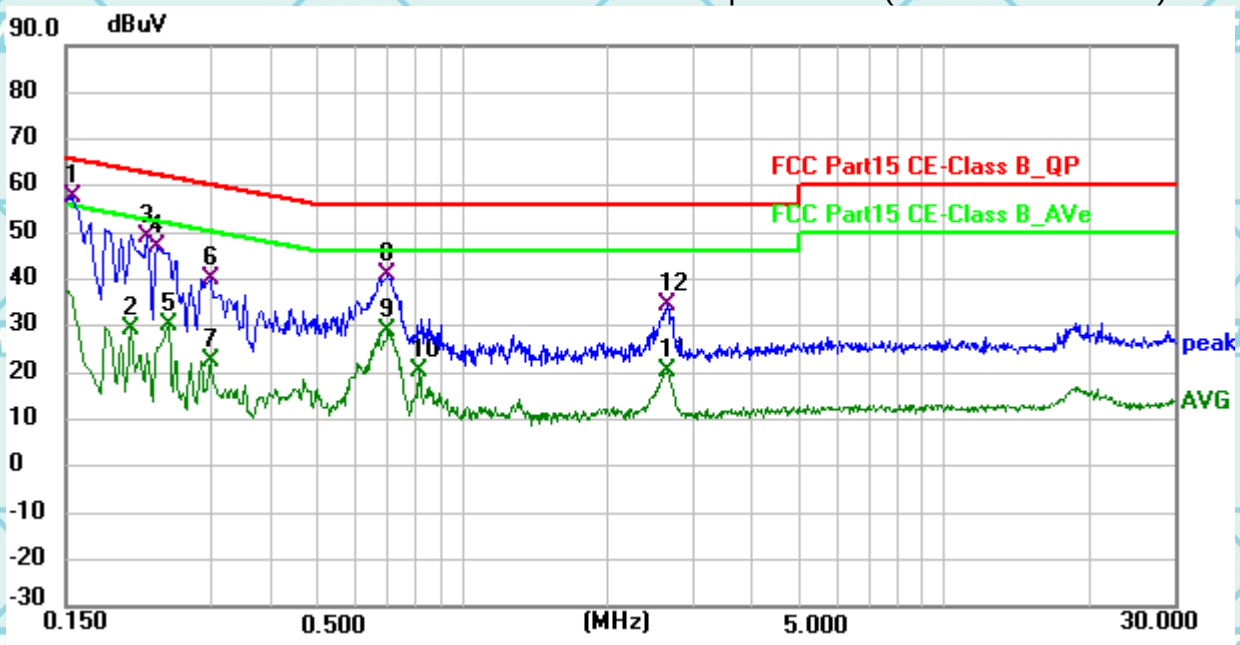
Conducted Emission on Line Terminal of the power line (150 kHz to 30MHz)-worst



No.	Frequency (MHz)	Reading (dBuV)	Factor (dB)	Level (dBuV)	Limit (dBuV)	Margin (dB)	Detector
1 *	0.1680	31.53	20.72	52.25	65.06	-12.81	QP
2	0.1725	16.35	20.71	37.06	54.84	-17.78	AVG
3	0.1815	10.37	20.70	31.07	54.42	-23.35	AVG
4	0.2445	21.73	20.66	42.39	61.94	-19.55	QP
5	0.2625	1.98	20.65	22.63	51.35	-28.72	AVG
6	0.3120	16.03	20.62	36.65	59.92	-23.27	QP
7	0.6900	21.05	20.54	41.59	56.00	-14.41	QP
8	0.6990	9.57	20.54	30.11	46.00	-15.89	AVG
9	0.8115	11.04	20.59	31.63	56.00	-24.37	QP
10	0.8160	-2.65	20.59	17.94	46.00	-28.06	AVG
11	2.6565	13.29	20.60	33.89	56.00	-22.11	QP
12	2.6565	0.26	20.60	20.86	46.00	-25.14	AVG

Remark: All the modes have been investigated, and only worst mode is presented in this report.

Conducted Emission on Neutral Terminal of the power line (150 kHz to 30MHz)



No.	Frequency (MHz)	Reading (dBuV)	Factor (dB)	Level (dBuV)	Limit (dBuV)	Margin (dB)	Detector
1 *	0.1545	36.80	20.73	57.53	65.75	-8.22	QP
2	0.2040	8.59	20.69	29.28	53.45	-24.17	AVG
3	0.2220	28.38	20.68	49.06	62.74	-13.68	QP
4	0.2310	26.06	20.67	46.73	62.41	-15.68	QP
5	0.2445	9.45	20.66	30.11	51.94	-21.83	AVG
6	0.2985	19.27	20.63	39.90	60.28	-20.38	QP
7	0.2985	2.00	20.63	22.63	50.28	-27.65	AVG
8	0.6990	20.20	20.54	40.74	56.00	-15.26	QP
9	0.6990	8.32	20.54	28.86	46.00	-17.14	AVG
10	0.8160	-0.13	20.59	20.46	46.00	-25.54	AVG
11	2.6520	-0.11	20.60	20.49	46.00	-25.51	AVG
12	2.6700	13.82	20.60	34.42	56.00	-21.58	QP

Note1:

Freq. = Emission frequency in MHz

Reading level (dBμV) = Receiver reading

Corr. Factor (dB) = Antenna factor + Cable loss

Measurement (dBμV) = Reading level (dBμV) + Corr. Factor (dB)

Limit (dBμV) = Limit stated in standard

Margin (dB) = Measurement (dBμV) – Limits (dBμV)

Q.P. =Quasi-Peak AVG =average

** is meaning the worst frequency has been tested in the frequency range 150 kHz to 30MHz.*

7.3 RADIATED EMISSION MEASUREMENT

Radiated Emission Limits (Frequency Range 9kHz-1000MHz)

20dBc in any 100 kHz bandwidth outside the operating frequency band. In case the emission fall within the restricted band specified on 15.205(a), then the 15.209(a) limit in the table below has to be followed.

Frequencies (MHz)	Field Strength (micorvolts/meter)	Measurement Distance (meters)
0.009~0.490	2400/F(KHz)	300
0.490~1.705	24000/F(KHz)	30
1.705~30.0	30	30
30~88	100	3
88~216	150	3
216~960	200	3
Above 960	500	3

LIMITS OF RADIATED EMISSION MEASUREMENT (Above 1000MHz)

FREQUENCY (MHz)	Limit (dBuV/m) (at 3M)	
	PEAK	AVERAGE
Above 1000	74	54

Notes:

(1) The limit for radiated test was performed according to FCC PART 15C.

(2) The tighter limit applies at the band edges.

(3) Emission level (dBuV/m)=20log Emission level (uV/m).

Spectrum Parameter	Setting
Attenuation	Auto
Start Frequency	1000 MHz
Stop Frequency	10th carrier harmonic
RB / VB (emission in restricted band)	1 MHz / 1 MHz for Peak, 1 MHz / 1Hz for Average

Receiver Parameter	Setting
Attenuation	Auto
Start ~ Stop Frequency	9kHz~150kHz / RB 200Hz for QP
Start ~ Stop Frequency	150kHz~30MHz / RB 9kHz for QP
Start ~ Stop Frequency	30MHz~1000MHz / RB 120kHz for QP

7.3.1 TEST PROCEDURE

a. The measuring distance of at 3 m shall be used for measurements at frequency up to 1GHz. For frequencies above 1GHz, any suitable measuring distance may be used.
b. The EUT was placed on the top of a rotating table 0.8 meters above the ground at a 3 meter open area test site. The table was rotated 360 degrees to determine the position of the highest radiation.
c. The height of the equipment or of the substitution antenna shall be 0.8 m; the height of the test antenna shall vary between 1 m to 4 m. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
d. The initial step in collecting conducted emission data is a spectrum analyzer peak detector mode pre-scanning the measurement frequency range. Significant peaks are then marked and then Quasi Peak detector mode re-measured.
e. If the Peak Mode measured value compliance with and lower than Quasi Peak Mode Limit, the EUT shall be deemed to meet QP Limits and then no additional QP Mode measurement performed.
f. For the actual test configuration, please refer to the related Item –EUT Test Photos.

Note:

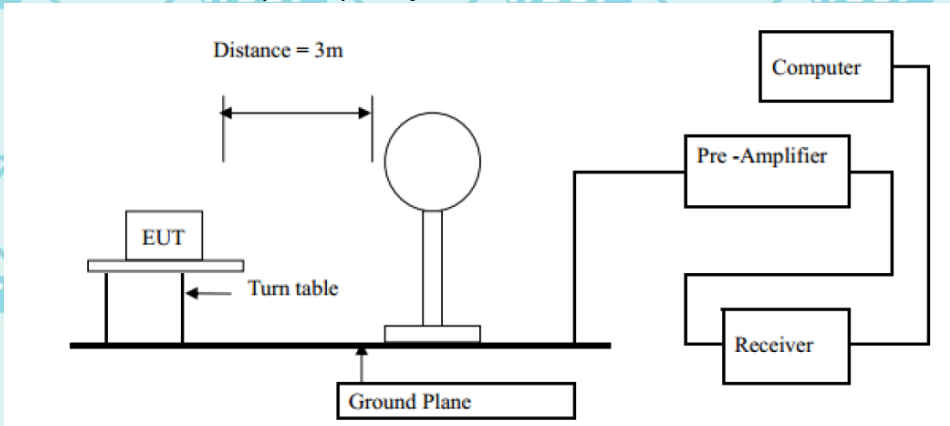
Both horizontal and vertical antenna polarities were tested and performed pretest to three orthogonal axis. The worst case emissions were reported

7.3.2 DEVIATION FROM TEST STANDARD

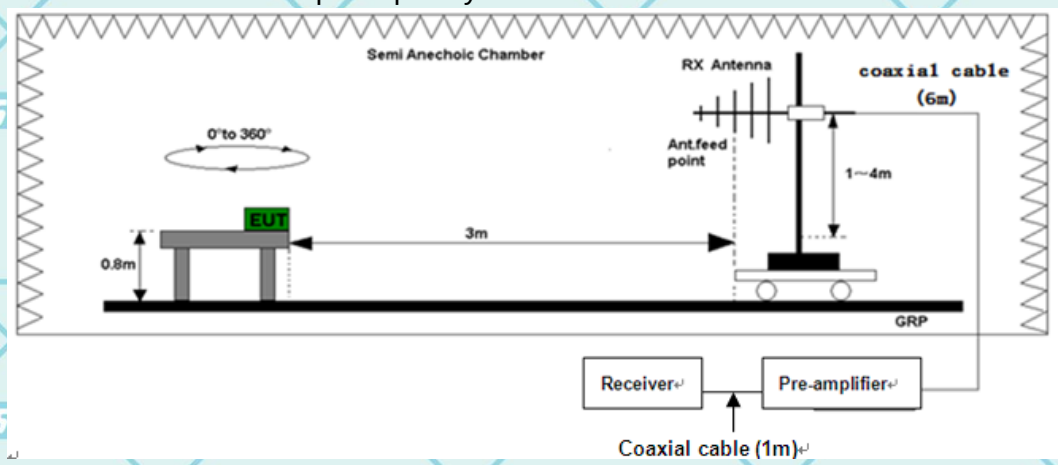
No deviation

7.3.3 TEST SETUP

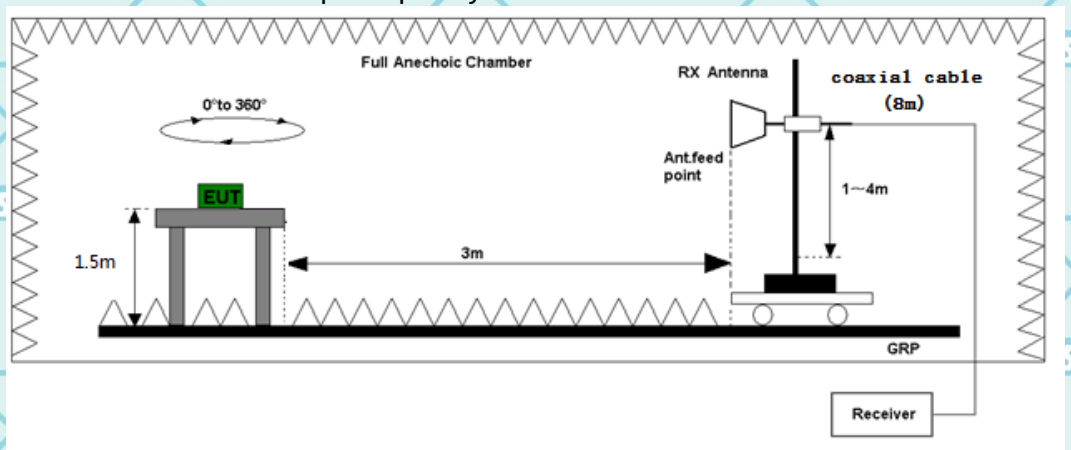
（A）Radiated Emission Test-Up Frequency Below 30MHz



（B）Radiated Emission Test-Up Frequency 30MHz~1GHz



（C）Radiated Emission Test-Up Frequency Above 1GHz



7.3.4 EUT OPERATING CONDITIONS

The EUT tested system was configured as the statements of 2.4 Unless otherwise a special operating condition is specified in the follows during the testing.

7.3.5 RESULTS (BELOW 30 MHZ)

Freq.	Reading	Limit	Margin	State
(MHz)	(dBuV/m)	(dBuV/m)	(dB)	P/F
--	--	--	--	P
--	--	--	--	P

Note 1: The symbol of "--" in the table which means not application.

Note 2: For the test data above 1 GHz，According the ANSI C63.10-2013, where limits are specified for both average and peak (or quasi-peak) detector functions, if the peak (or quasi-peak) measured value complies with the average limit, it is unnecessary to perform an average measurement.

Note 3: The low frequency, which started from 9 kHz to 30 MHz, was pre-scanned and the result which was 20 dB lower than the limit line per 15.31(o) was not reported.

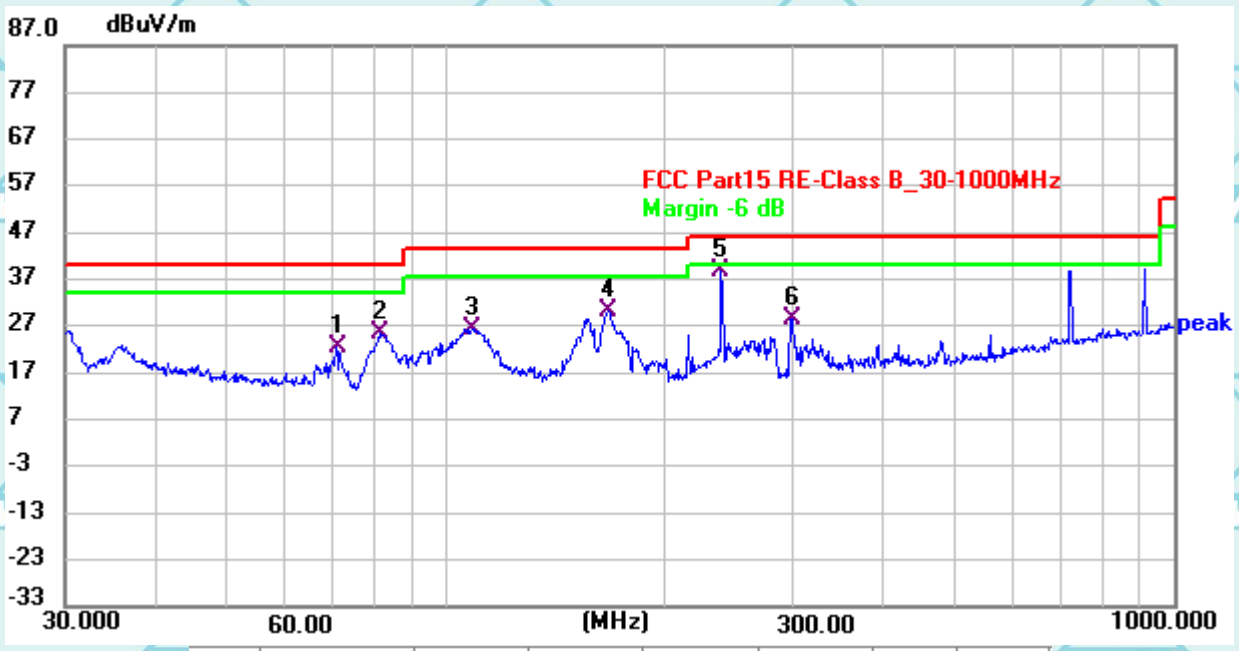
Note 4: The EUT is working in the Normal link mode below 1 GHz. All modes have been tested and normal link mode is worst.

7.3.6 TEST RESULTS (BETWEEN 30M – 1000 MHZ)

Please refer to following diagram for individual

Below 1GHz

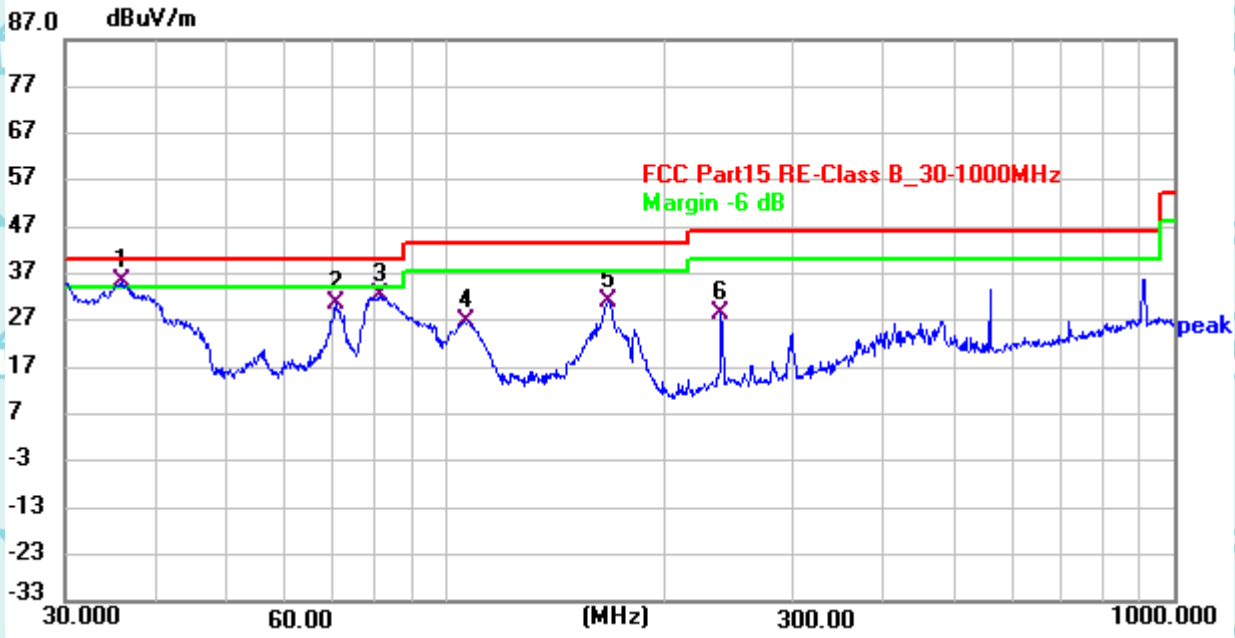
Horizontal:



No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector
1	70.9869	44.83	-22.36	22.47	40.00	-17.53	QP
2	81.3542	49.44	-24.08	25.36	40.00	-14.64	QP
3	108.9331	49.21	-22.71	26.50	43.50	-17.00	QP
4	167.6772	50.49	-20.34	30.15	43.50	-13.35	QP
5 *	239.9873	61.54	-22.59	38.95	46.00	-7.05	QP
6	300.8943	48.74	-20.15	28.59	46.00	-17.41	QP

Remark: All the modes have been investigated, and only worst mode is presented in this report.

Vertical:



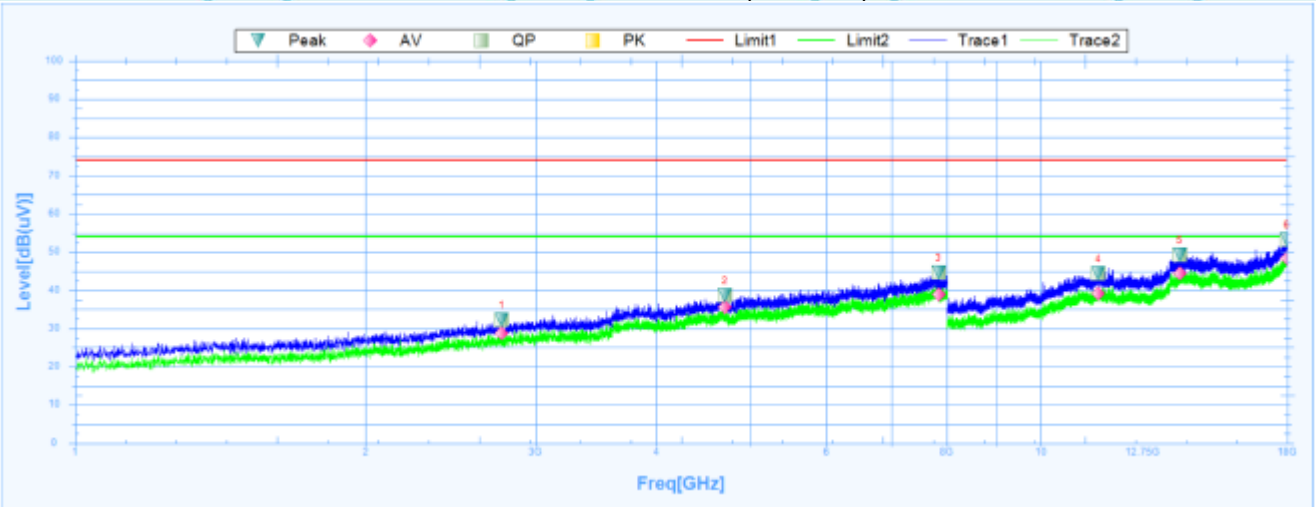
No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector
1 *	35.9534	54.71	-19.44	35.27	40.00	-4.73	QP
2	70.8005	52.84	-22.36	30.48	40.00	-9.52	QP
3	81.2473	56.59	-24.07	32.52	40.00	-7.48	QP
4	106.7119	49.76	-22.92	26.84	43.50	-16.66	QP
5	167.6772	51.22	-20.34	30.88	43.50	-12.62	QP
6	239.9873	51.22	-22.59	28.63	46.00	-17.37	QP

Note1:
Freq. = Emission frequency in MHz
Reading level (dBμV) = Receiver reading
Corr. Factor (dB) = Antenna factor + Cable loss - Amplifier factor.
Measurement (dBμV) = Reading level (dBμV) + Corr. Factor (dB)
Limit (dBμV) = Limit stated in standard
Margin (dB) = Measurement (dBμV) – Limits (dBμV)

7.3.7 TEST RESULTS (ABOVE 1GHZ)

Note: 1.The spurious above 18G is noise only, do not show on the report.
2. Please ignore the main frequency signal

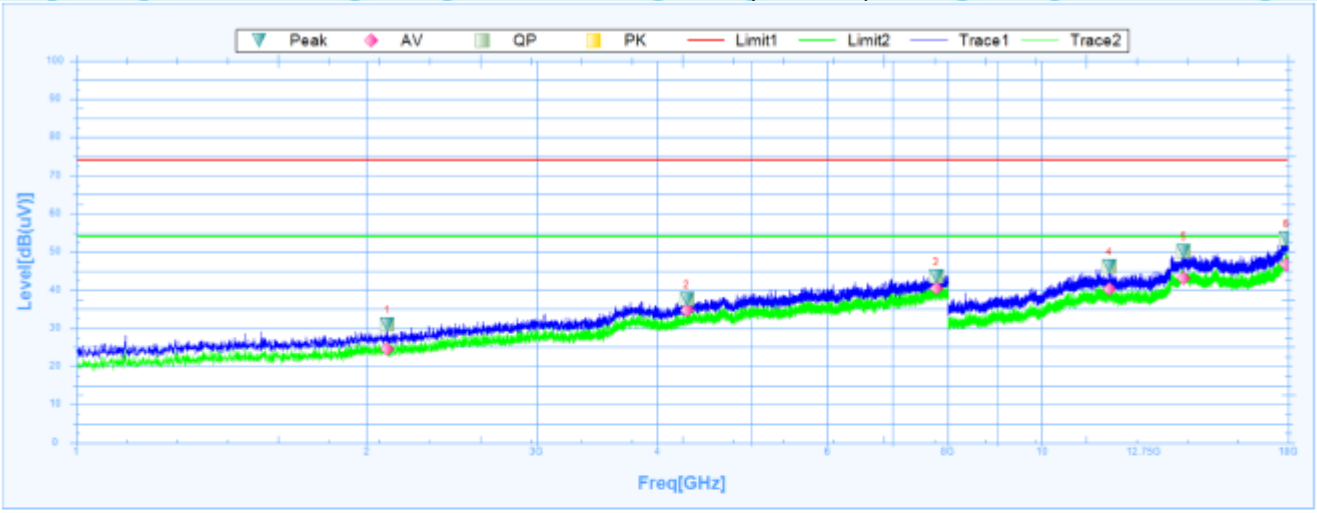
11ax20, 1 GHz to 18 GHz, Channel (5955 MHz), ANT H



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2766.6250	32.18	-7.56	39.74	74	-41.82	359.5	Horizontal	PK	Pass
1	2766.6250	28.7	-7.56	36.26	54	-25.3	359.5	Horizontal	AV	Pass
2	4710.8750	38.62	-0.77	39.39	74	-35.38	187.4	Horizontal	PK	Pass
2	4710.8750	35.62	-0.77	36.39	54	-18.38	187.4	Horizontal	AV	Pass
3	7842.5000	44.56	7.92	36.64	74	-29.44	354.6	Horizontal	PK	Pass
3	7842.5000	38.83	7.92	30.91	54	-15.17	354.6	Horizontal	AV	Pass
4	11476.2500	44.5	15.77	28.73	74	-29.5	183.4	Horizontal	PK	Pass
4	11476.2500	39.2	15.77	23.43	54	-14.8	183.4	Horizontal	AV	Pass
5	13926.2500	49.18	18.91	30.27	74	-24.82	111.7	Horizontal	PK	Pass
5	13926.2500	44.35	18.91	25.44	54	-9.65	111.7	Horizontal	AV	Pass
6	17985.0000	53.25	23.82	29.43	74	-20.75	0.5	Horizontal	PK	Pass
6	17985.0000	48.29	23.82	24.47	54	-5.71	0.5	Horizontal	AV	Pass

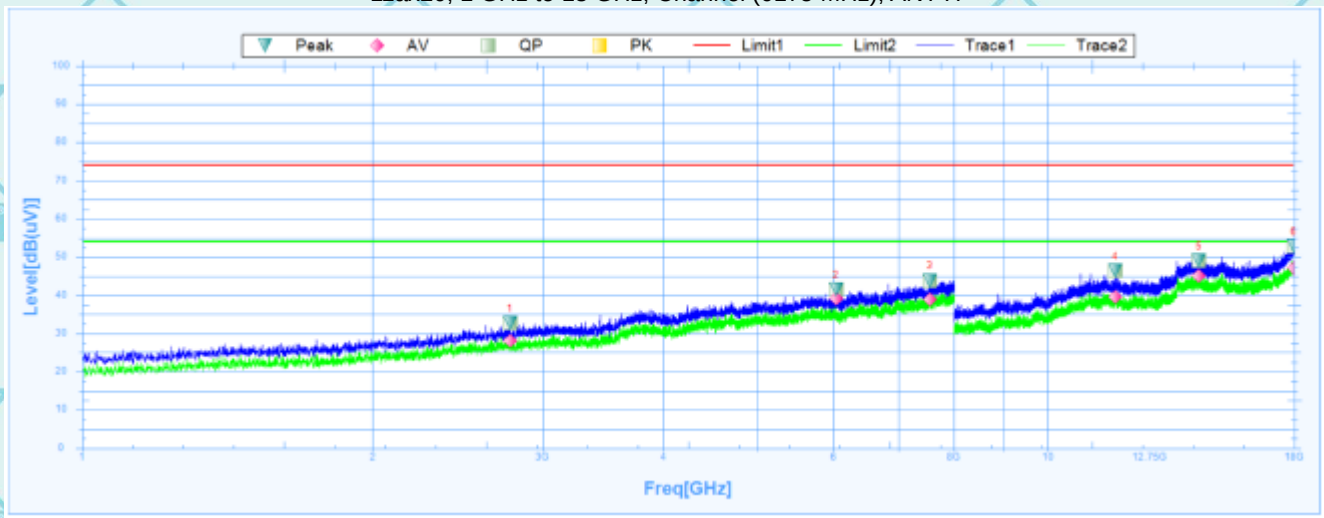
11ax20, 1 GHz to 18 GHz, Channel (5955 MHz), ANT V



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2099.0000	30.84	-10.74	41.58	74	-43.16	358.9	Horizontal	PK	Pass
1	2099.0000	24.64	-10.74	35.38	54	-29.36	358.9	Horizontal	AV	Pass
2	4289.1250	37.57	-2.14	39.71	74	-36.43	350.6	Horizontal	PK	Pass
2	4289.1250	34.67	-2.14	36.81	54	-19.33	350.6	Horizontal	AV	Pass
3	7775.1250	43.61	7.79	35.82	74	-30.39	128.8	Horizontal	PK	Pass
3	7775.1250	40.5	7.79	32.71	54	-13.5	128.8	Horizontal	AV	Pass
4	11745.0000	46.18	15.54	30.64	74	-27.82	328.4	Horizontal	PK	Pass
4	11745.0000	40.25	15.54	24.71	54	-13.75	328.4	Horizontal	AV	Pass
5	14033.7500	50.05	19.09	30.96	74	-23.95	359.4	Horizontal	PK	Pass
5	14033.7500	43.02	19.09	23.93	54	-10.98	359.4	Horizontal	AV	Pass
6	17916.2500	53.39	23.36	30.03	74	-20.61	341.8	Horizontal	PK	Pass
6	17916.2500	46.59	23.36	23.23	54	-7.41	341.8	Horizontal	AV	Pass

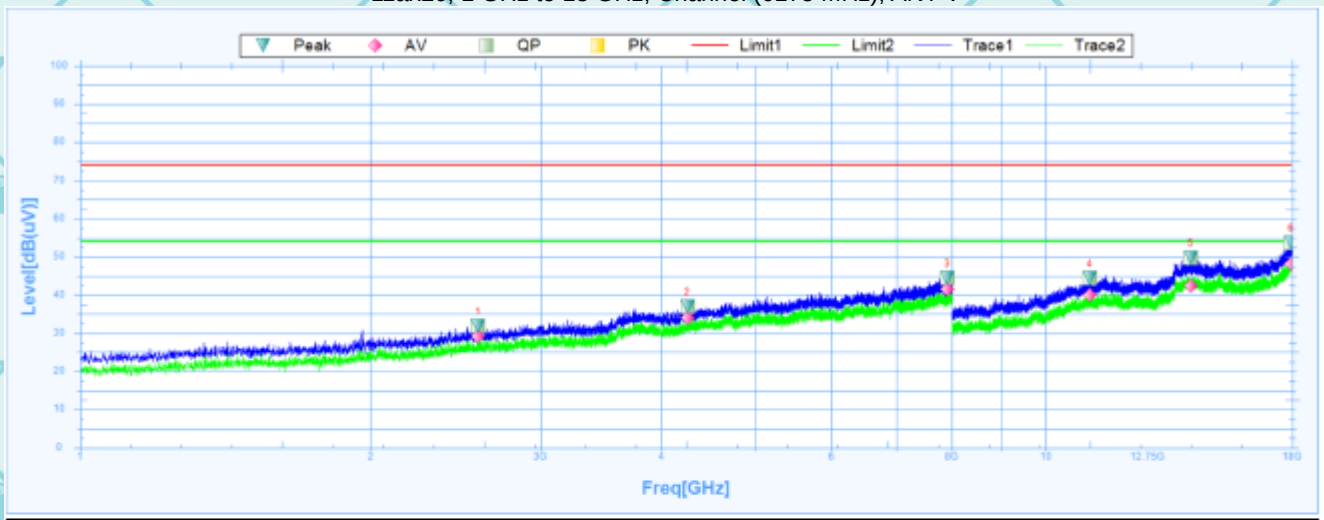
11ax20, 1 GHz to 18 GHz, Channel (6175 MHz), ANT H



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2772.7500	32.71	-7.53	40.24	74	-41.29	267	Horizontal	PK	Pass
1	2772.7500	28.05	-7.53	35.58	54	-25.95	267	Horizontal	AV	Pass
2	6037.3750	41.6	2.28	39.32	74	-32.4	243.1	Horizontal	PK	Pass
2	6037.3750	39.14	2.28	36.86	54	-14.86	243.1	Horizontal	AV	Pass
3	7551.1250	43.86	7.01	36.85	74	-30.14	112.8	Horizontal	PK	Pass
3	7551.1250	38.81	7.01	31.8	54	-15.19	112.8	Horizontal	AV	Pass
4	11745.0000	46.42	15.54	30.88	74	-27.58	228.1	Horizontal	PK	Pass
4	11745.0000	39.66	15.54	24.12	54	-14.34	228.1	Horizontal	AV	Pass
5	14348.7500	49	18.77	30.23	74	-25	59.5	Horizontal	PK	Pass
5	14348.7500	44.97	18.77	26.2	54	-9.03	59.5	Horizontal	AV	Pass
6	17980.0000	52.7	23.79	28.91	74	-21.3	225.7	Horizontal	PK	Pass
6	17980.0000	47.15	23.79	23.36	54	-6.85	225.7	Horizontal	AV	Pass

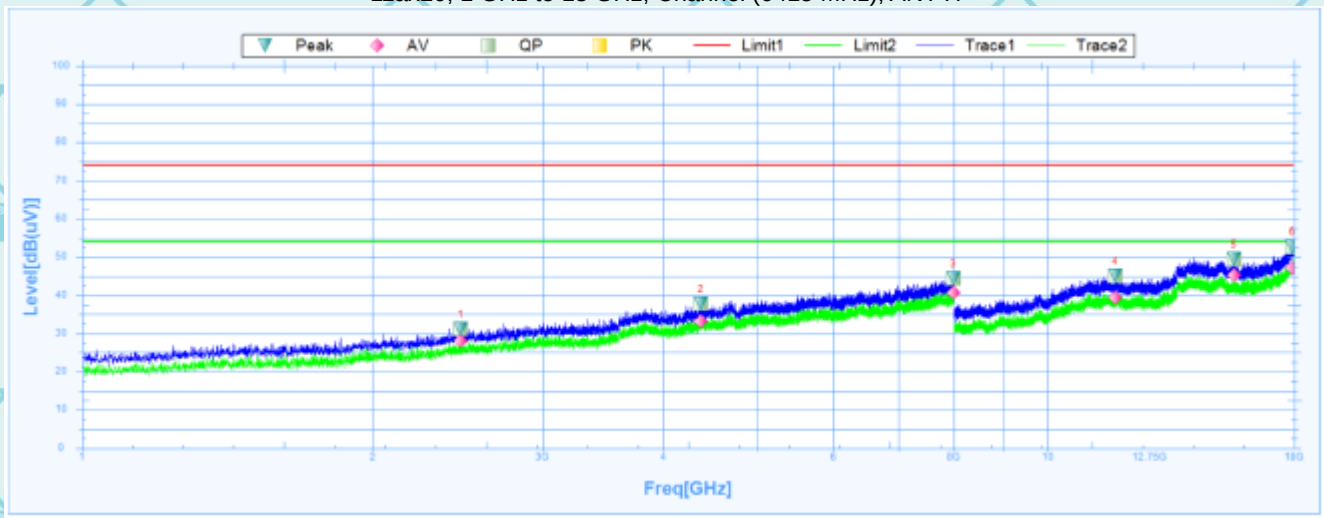
11ax20, 1 GHz to 18 GHz, Channel (6175 MHz), ANT V



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2582.8750	31.82	-8.24	40.06	74	-42.18	360	Horizontal	PK	Pass
1	2582.8750	29.26	-8.24	37.5	54	-24.74	360	Horizontal	AV	Pass
2	4254.1250	36.93	-2.3	39.23	74	-37.07	190.5	Horizontal	PK	Pass
2	4254.1250	34.01	-2.3	36.31	54	-19.99	190.5	Horizontal	AV	Pass
3	7914.2500	44.42	8.06	36.36	74	-29.58	239.5	Horizontal	PK	Pass
3	7914.2500	41.63	8.06	33.57	54	-12.37	239.5	Horizontal	AV	Pass
4	11105.0000	44.43	15.27	29.16	74	-29.57	0.1	Horizontal	PK	Pass
4	11105.0000	39.92	15.27	24.65	54	-14.08	0.1	Horizontal	AV	Pass
5	14131.2500	49.61	19	30.61	74	-24.39	4.3	Horizontal	PK	Pass
5	14131.2500	42.41	19	23.41	54	-11.59	4.3	Horizontal	AV	Pass
6	17955.0000	53.59	23.61	29.98	74	-20.41	209	Horizontal	PK	Pass
6	17955.0000	48.26	23.61	24.65	54	-5.74	209	Horizontal	AV	Pass

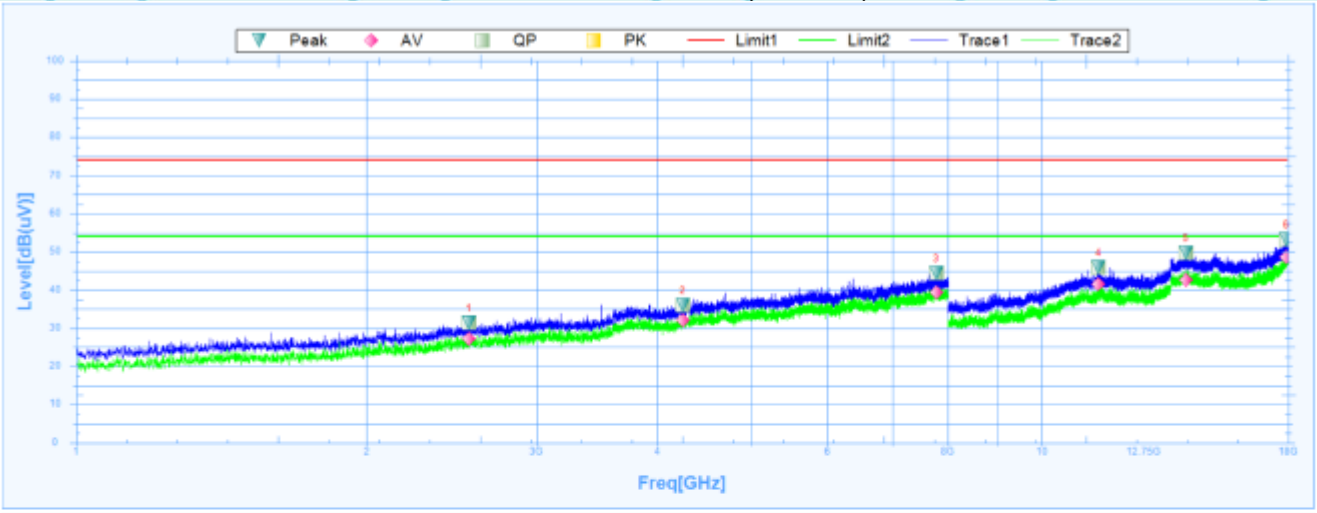
11ax20, 1 GHz to 18 GHz, Channel (6415 MHz), ANT H



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2466.5000	31.08	-8.7	39.78	74	-42.92	259.9	Horizontal	PK	Pass
1	2466.5000	28	-8.7	36.7	54	-26	259.9	Horizontal	AV	Pass
2	4373.1250	37.85	-1.92	39.77	74	-36.15	80.6	Horizontal	PK	Pass
2	4373.1250	33.15	-1.92	35.07	54	-20.85	80.6	Horizontal	AV	Pass
3	7983.3750	44.5	8.2	36.3	74	-29.5	0.4	Horizontal	PK	Pass
3	7983.3750	40.71	8.2	32.51	54	-13.29	0.4	Horizontal	AV	Pass
4	11745.0000	45.14	15.54	29.6	74	-28.86	118.1	Horizontal	PK	Pass
4	11745.0000	39.36	15.54	23.82	54	-14.64	118.1	Horizontal	AV	Pass
5	15586.2500	49.57	18.47	31.1	74	-24.43	77.4	Horizontal	PK	Pass
5	15586.2500	45.19	18.47	26.72	54	-8.81	77.4	Horizontal	AV	Pass
6	17915.0000	52.68	23.35	29.33	74	-21.32	213.7	Horizontal	PK	Pass
6	17915.0000	47.06	23.35	23.71	54	-6.94	213.7	Horizontal	AV	Pass

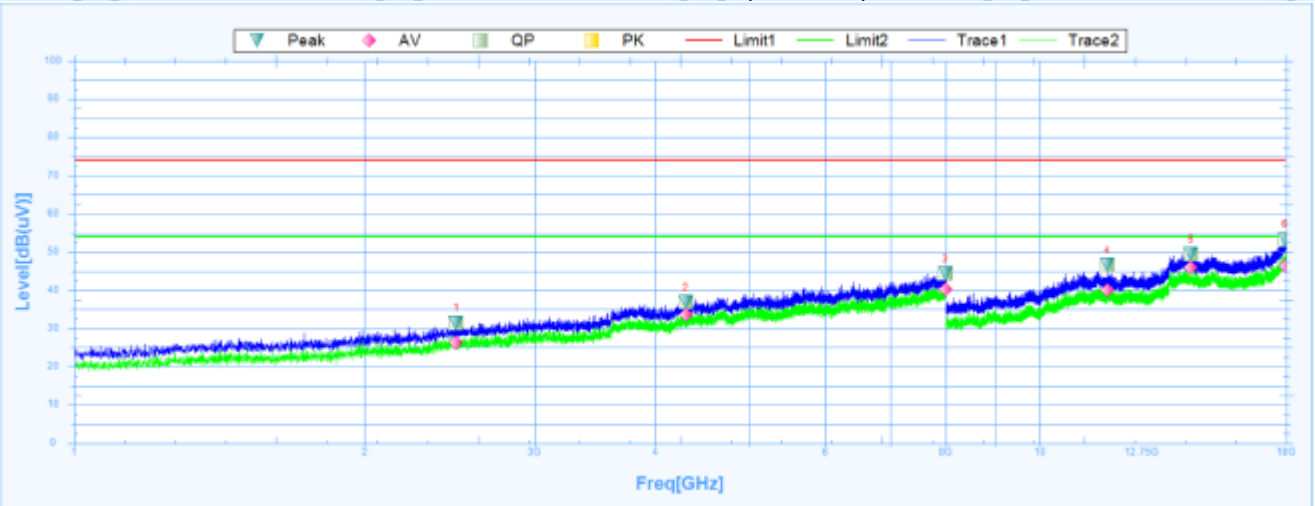
11ax20, 1 GHz to 18 GHz, Channel (6415 MHz), ANT V



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2551.3750	31.36	-8.32	39.68	74	-42.64	137.8	Horizontal	PK	Pass
1	2551.3750	27.21	-8.32	35.53	54	-26.79	137.8	Horizontal	AV	Pass
2	4249.7500	36.07	-2.33	38.4	74	-37.93	359.9	Horizontal	PK	Pass
2	4249.7500	32.1	-2.33	34.43	54	-21.9	359.9	Horizontal	AV	Pass
3	7780.3750	44.45	7.8	36.65	74	-29.55	227.4	Horizontal	PK	Pass
3	7780.3750	39.34	7.8	31.54	54	-14.66	227.4	Horizontal	AV	Pass
4	11456.2500	45.93	15.76	30.17	74	-28.07	305.7	Horizontal	PK	Pass
4	11456.2500	41.62	15.76	25.86	54	-12.38	305.7	Horizontal	AV	Pass
5	14100.0000	49.62	19.03	30.59	74	-24.38	158.6	Horizontal	PK	Pass
5	14100.0000	42.58	19.03	23.55	54	-11.42	158.6	Horizontal	AV	Pass
6	17912.5000	53.22	23.34	29.88	74	-20.78	-0.1	Horizontal	PK	Pass
6	17912.5000	48.7	23.34	25.36	54	-5.3	-0.1	Horizontal	AV	Pass

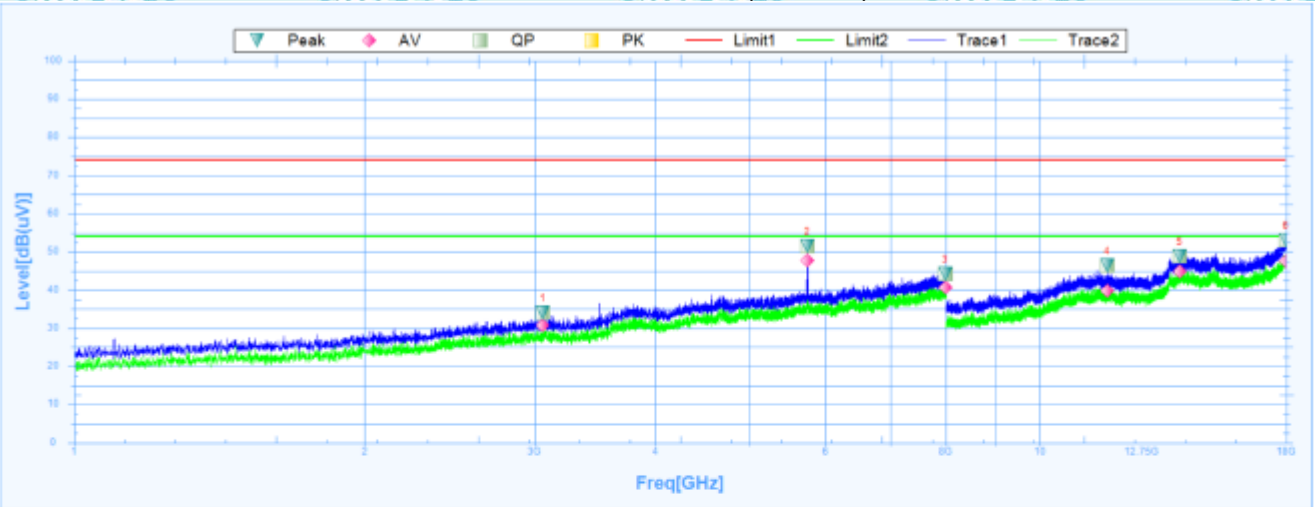
11ax20, 1 GHz to 18 GHz, Channel (6435 MHz), ANT H



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2487.5000	31.49	-8.57	40.06	74	-42.51	4.2	Horizontal	PK	Pass
1	2487.5000	26.37	-8.57	34.94	54	-27.63	4.2	Horizontal	AV	Pass
2	4300.5000	36.87	-2.08	38.95	74	-37.13	351.1	Horizontal	PK	Pass
2	4300.5000	33.65	-2.08	35.73	54	-20.35	351.1	Horizontal	AV	Pass
3	7987.7500	44.32	8.2	36.12	74	-29.68	198.9	Horizontal	PK	Pass
3	7987.7500	40.24	8.2	32.04	54	-13.76	198.9	Horizontal	AV	Pass
4	11745.0000	46.54	15.54	31	74	-27.46	67.8	Horizontal	PK	Pass
4	11745.0000	40.09	15.54	24.55	54	-13.91	67.8	Horizontal	AV	Pass
5	14350.0000	49.43	18.76	30.67	74	-24.57	2.4	Horizontal	PK	Pass
5	14350.0000	46.02	18.76	27.26	54	-7.98	2.4	Horizontal	AV	Pass
6	17941.2500	53.36	23.53	29.83	74	-20.64	202.9	Horizontal	PK	Pass
6	17941.2500	46.47	23.53	22.94	54	-7.53	202.9	Horizontal	AV	Pass

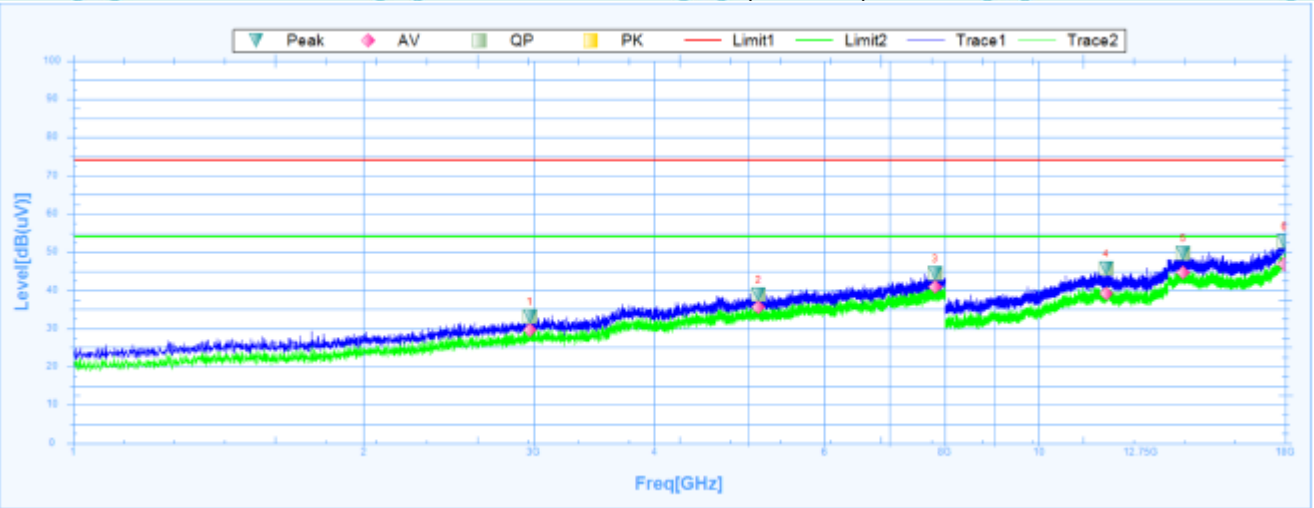
11ax20, 1 GHz to 18 GHz, Channel (6435 MHz), ANT V



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	3057.1250	34.04	-6.3	40.34	74	-39.96	204.9	Horizontal	PK	Pass
1	3057.1250	30.68	-6.3	36.98	54	-23.32	204.9	Horizontal	AV	Pass
2	5746.8750	51.53	1.97	49.56	74	-22.47	316.2	Horizontal	PK	Pass
2	5746.8750	47.78	1.97	45.81	54	-6.22	316.2	Horizontal	AV	Pass
3	7981.6250	44.12	8.19	35.93	74	-29.88	329.3	Horizontal	PK	Pass
3	7981.6250	40.58	8.19	32.39	54	-13.42	329.3	Horizontal	AV	Pass
4	11745.0000	46.39	15.54	30.85	74	-27.61	176.6	Horizontal	PK	Pass
4	11745.0000	39.67	15.54	24.13	54	-14.33	176.6	Horizontal	AV	Pass
5	13961.2500	48.89	19.01	29.88	74	-25.11	359.5	Horizontal	PK	Pass
5	13961.2500	44.82	19.01	25.81	54	-9.18	359.5	Horizontal	AV	Pass
6	17992.5000	53.04	23.88	29.16	74	-20.96	203	Horizontal	PK	Pass
6	17992.5000	47.47	23.88	23.59	54	-6.53	203	Horizontal	AV	Pass

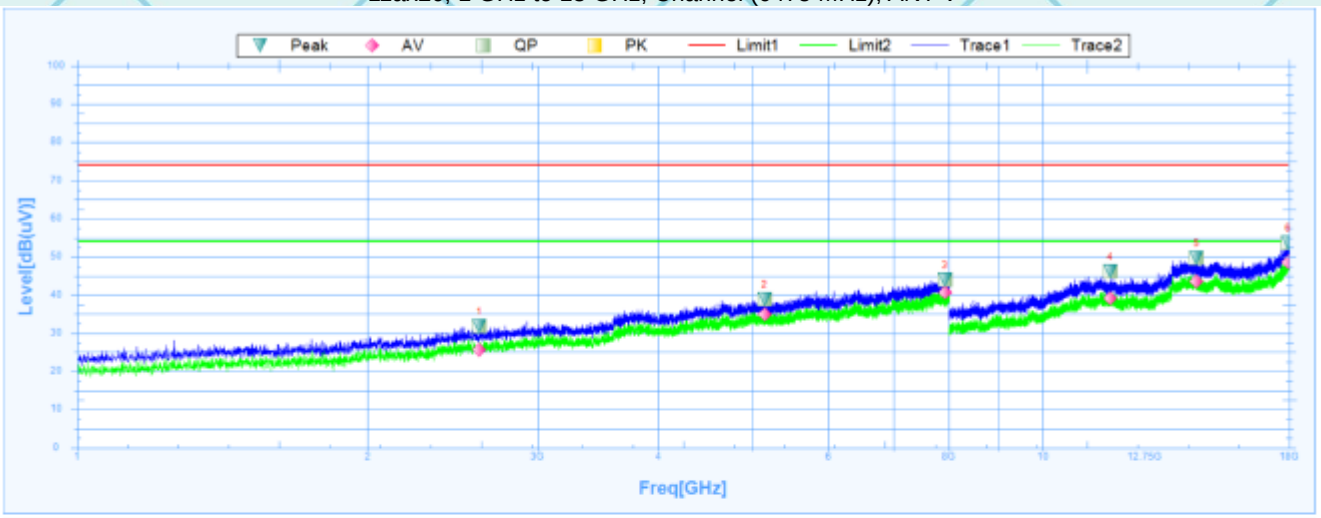
11ax20, 1 GHz to 18 GHz, Channel (6475 MHz), ANT H



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2970.5000	33.13	-6.7	39.83	74	-40.87	1.6	Horizontal	PK	Pass
1	2970.5000	29.65	-6.7	36.35	54	-24.35	1.6	Horizontal	AV	Pass
2	5128.2500	38.91	0.24	38.67	74	-35.09	359.9	Horizontal	PK	Pass
2	5128.2500	35.51	0.24	35.27	54	-18.49	359.9	Horizontal	AV	Pass
3	7817.1250	44.37	7.88	36.49	74	-29.63	93.6	Horizontal	PK	Pass
3	7817.1250	40.97	7.88	33.09	54	-13.03	93.6	Horizontal	AV	Pass
4	11745.0000	45.67	15.54	30.13	74	-28.33	142	Horizontal	PK	Pass
4	11745.0000	39.13	15.54	23.59	54	-14.87	142	Horizontal	AV	Pass
5	14118.7500	49.62	19.01	30.61	74	-24.38	359	Horizontal	PK	Pass
5	14118.7500	44.67	19.01	25.66	54	-9.33	359	Horizontal	AV	Pass
6	17970.0000	52.86	23.72	29.14	74	-21.14	163.5	Horizontal	PK	Pass
6	17970.0000	46.8	23.72	23.08	54	-7.2	163.5	Horizontal	AV	Pass

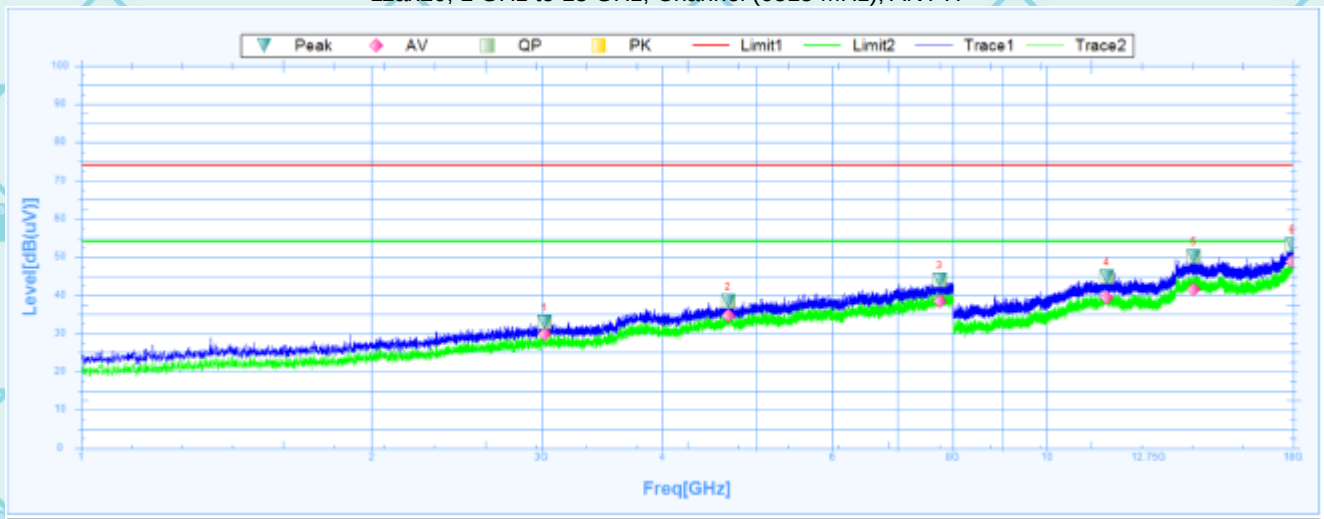
11ax20, 1 GHz to 18 GHz, Channel (6475 MHz), ANT V



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2608.2500	31.8	-8.18	39.98	74	-42.2	142.6	Horizontal	PK	Pass
1	2608.2500	25.71	-8.18	33.89	54	-28.29	142.6	Horizontal	AV	Pass
2	5150.1250	38.94	0.25	38.69	74	-35.06	360	Horizontal	PK	Pass
2	5150.1250	35.02	0.25	34.77	54	-18.98	360	Horizontal	AV	Pass
3	7924.7500	43.88	8.09	35.79	74	-30.12	360	Horizontal	PK	Pass
3	7924.7500	40.69	8.09	32.6	54	-13.31	360	Horizontal	AV	Pass
4	11745.0000	46.27	15.54	30.73	74	-27.73	214.8	Horizontal	PK	Pass
4	11745.0000	39.04	15.54	23.5	54	-14.96	214.8	Horizontal	AV	Pass
5	14430.0000	49.75	18.69	31.06	74	-24.25	71.4	Horizontal	PK	Pass
5	14430.0000	43.57	18.69	24.88	54	-10.43	71.4	Horizontal	AV	Pass
6	17956.2500	53.6	23.62	29.98	74	-20.4	-0.1	Horizontal	PK	Pass
6	17956.2500	48.54	23.62	24.92	54	-5.46	-0.1	Horizontal	AV	Pass

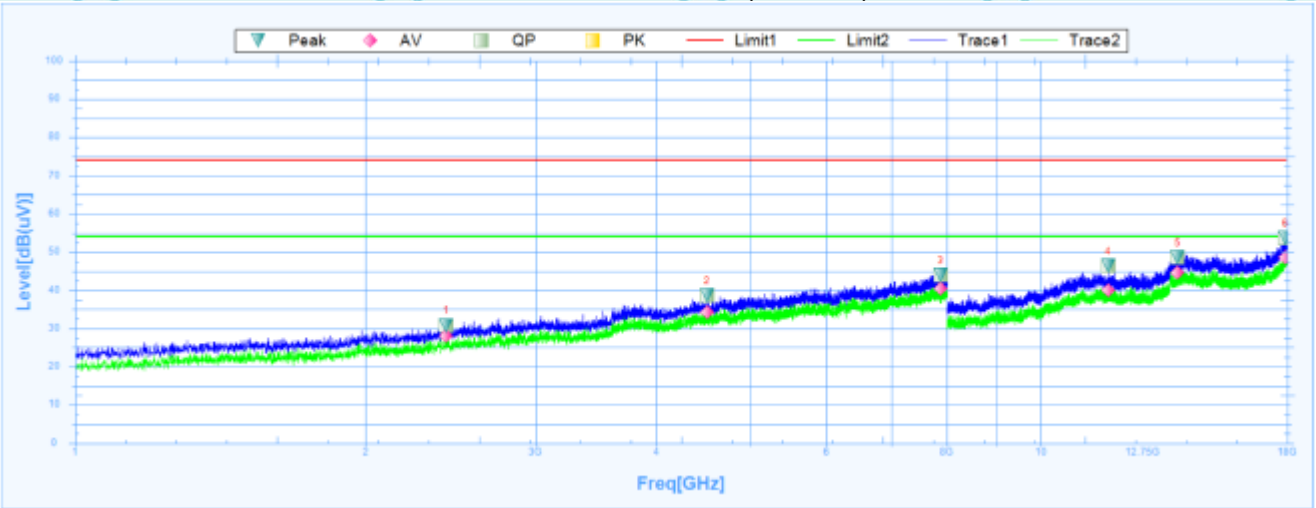
11ax20, 1 GHz to 18 GHz, Channel (6515 MHz), ANT H



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	3017.7500	32.98	-6.47	39.45	74	-41.02	81.6	Horizontal	PK	Pass
1	3017.7500	29.92	-6.47	36.39	54	-24.08	81.6	Horizontal	AV	Pass
2	4677.6250	38.38	-0.94	39.32	74	-35.62	167.8	Horizontal	PK	Pass
2	4677.6250	34.75	-0.94	35.69	54	-19.25	167.8	Horizontal	AV	Pass
3	7746.2500	43.89	7.71	36.18	74	-30.11	0.5	Horizontal	PK	Pass
3	7746.2500	38.55	7.71	30.84	54	-15.45	0.5	Horizontal	AV	Pass
4	11533.7500	44.75	15.72	29.03	74	-29.25	359	Horizontal	PK	Pass
4	11533.7500	39.34	15.72	23.62	54	-14.66	359	Horizontal	AV	Pass
5	14195.0000	50.15	18.93	31.22	74	-23.85	212.5	Horizontal	PK	Pass
5	14195.0000	41.59	18.93	22.66	54	-12.41	212.5	Horizontal	AV	Pass
6	17968.7500	53.21	23.71	29.5	74	-20.79	284.2	Horizontal	PK	Pass
6	17968.7500	48.94	23.71	25.23	54	-5.06	284.2	Horizontal	AV	Pass

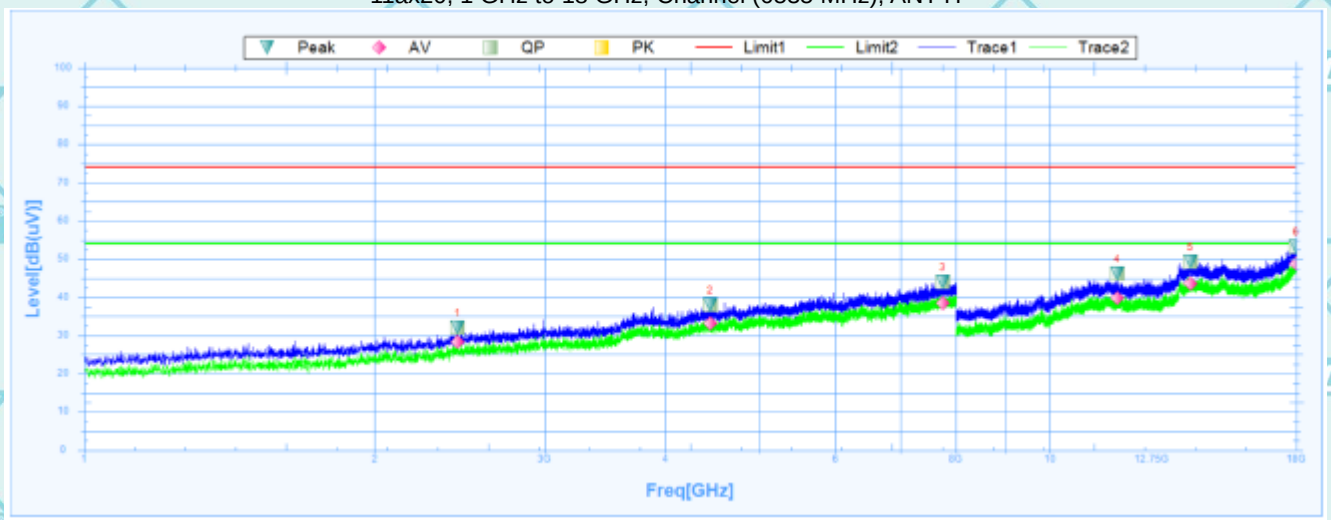
11ax20, 1 GHz to 18 GHz, Channel (6515 MHz), ANT V



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2422.7500	30.82	-8.98	39.8	74	-43.18	360.1	Horizontal	PK	Pass
1	2422.7500	28.09	-8.98	37.07	54	-25.91	360.1	Horizontal	AV	Pass
2	4514.0000	38.72	-1.75	40.47	74	-35.28	343.6	Horizontal	PK	Pass
2	4514.0000	34.15	-1.75	35.9	54	-19.85	343.6	Horizontal	AV	Pass
3	7881.8750	43.92	8	35.92	74	-30.08	2.7	Horizontal	PK	Pass
3	7881.8750	40.33	8	32.33	54	-13.67	2.7	Horizontal	AV	Pass
4	11745.0000	46.39	15.54	30.85	74	-27.61	357.7	Horizontal	PK	Pass
4	11745.0000	40.04	15.54	24.5	54	-13.96	357.7	Horizontal	AV	Pass
5	13867.5000	48.63	18.74	29.89	74	-25.37	81	Horizontal	PK	Pass
5	13867.5000	44.65	18.74	25.91	54	-9.35	81	Horizontal	AV	Pass
6	17911.2500	53.71	23.34	30.37	74	-20.29	359.6	Horizontal	PK	Pass
6	17911.2500	48.62	23.34	25.28	54	-5.38	359.6	Horizontal	AV	Pass

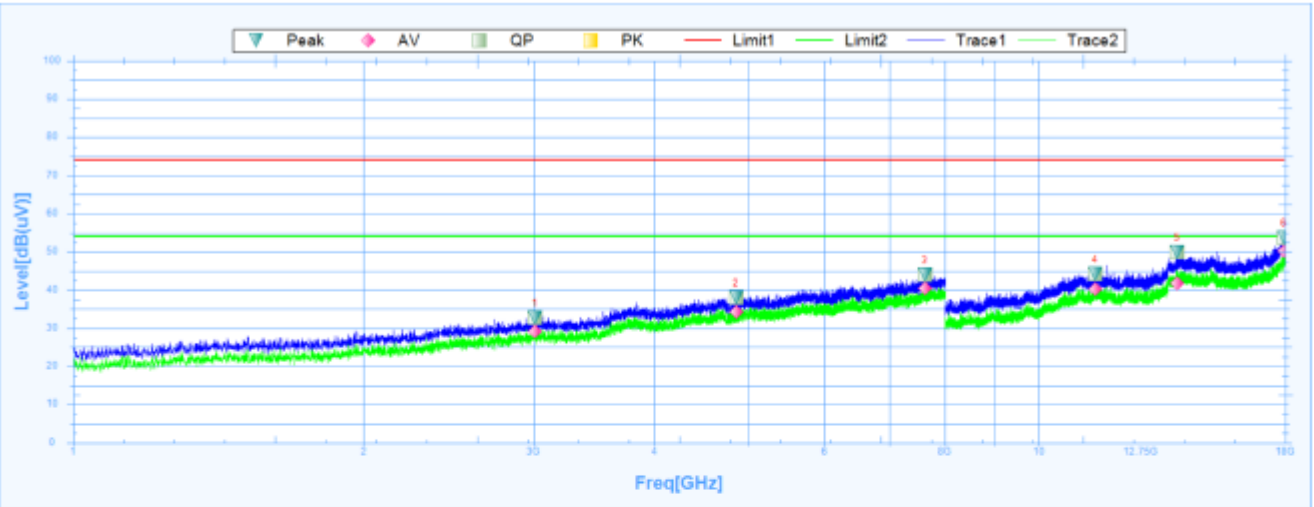
11ax20, 1 GHz to 18 GHz, Channel (6535 MHz), ANT H



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2435.8750	32.03	-8.9	40.93	74	-41.97	194.1	Horizontal	PK	Pass
1	2435.8750	28.29	-8.9	37.19	54	-25.71	194.1	Horizontal	AV	Pass
2	4451.8750	38.04	-1.83	39.87	74	-35.96	196.5	Horizontal	PK	Pass
2	4451.8750	33.07	-1.83	34.9	54	-20.93	196.5	Horizontal	AV	Pass
3	7750.6250	43.87	7.73	36.14	74	-30.13	261	Horizontal	PK	Pass
3	7750.6250	38.36	7.73	30.63	54	-15.64	261	Horizontal	AV	Pass
4	11745.0000	46.19	15.54	30.65	74	-27.81	41.6	Horizontal	PK	Pass
4	11745.0000	39.88	15.54	24.34	54	-14.12	41.6	Horizontal	AV	Pass
5	13990.0000	49.29	19.09	30.2	74	-24.71	53.5	Horizontal	PK	Pass
5	13990.0000	43.54	19.09	24.45	54	-10.46	53.5	Horizontal	AV	Pass
6	17997.5000	53.24	23.91	29.33	74	-20.76	0	Horizontal	PK	Pass
6	17997.5000	48.85	23.91	24.94	54	-5.15	0	Horizontal	AV	Pass

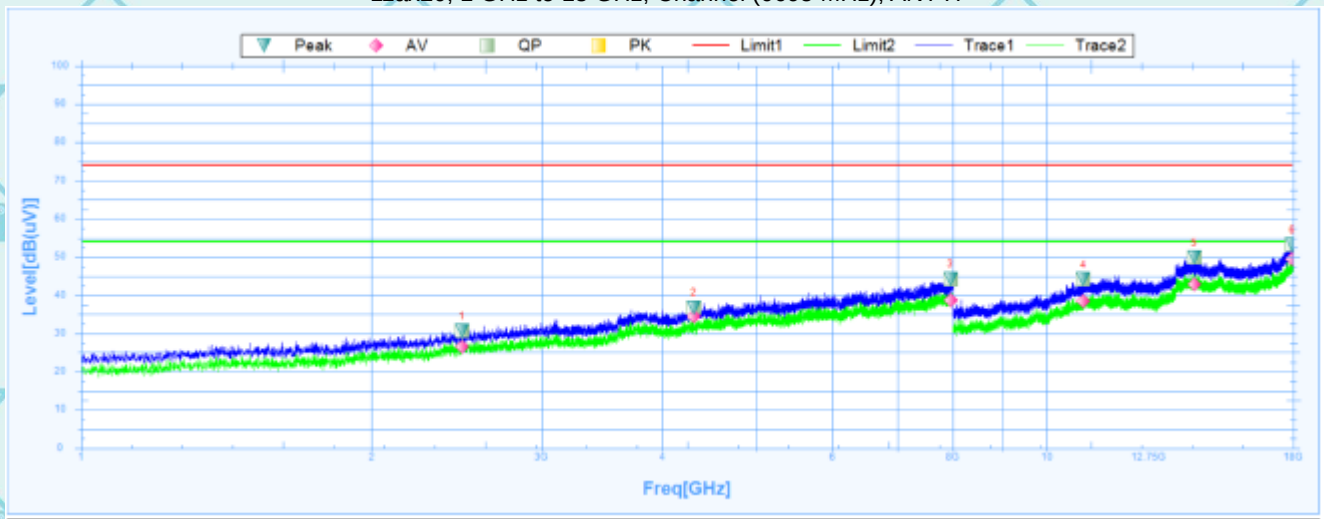
11ax20, 1 GHz to 18 GHz, Channel (6535 MHz), ANT V



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	3008.1250	32.78	-6.51	39.29	74	-41.22	353.7	Horizontal	PK	Pass
1	3008.1250	29.08	-6.51	35.59	54	-24.92	353.7	Horizontal	AV	Pass
2	4859.6250	37.94	-0.21	38.15	74	-36.06	276.6	Horizontal	PK	Pass
2	4859.6250	34.22	-0.21	34.43	54	-19.78	276.6	Horizontal	AV	Pass
3	7622.8750	44.06	7.26	36.8	74	-29.94	360	Horizontal	PK	Pass
3	7622.8750	40.53	7.26	33.27	54	-13.47	360	Horizontal	AV	Pass
4	11442.5000	44.11	15.74	28.37	74	-29.89	230.4	Horizontal	PK	Pass
4	11442.5000	40.18	15.74	24.44	54	-13.82	230.4	Horizontal	AV	Pass
5	13908.7500	49.87	18.85	31.02	74	-24.13	32	Horizontal	PK	Pass
5	13908.7500	41.71	18.85	22.86	54	-12.29	32	Horizontal	AV	Pass
6	17937.5000	53.78	23.5	30.28	74	-20.22	-0.1	Horizontal	PK	Pass
6	17937.5000	50.09	23.5	26.59	54	-3.91	-0.1	Horizontal	AV	Pass

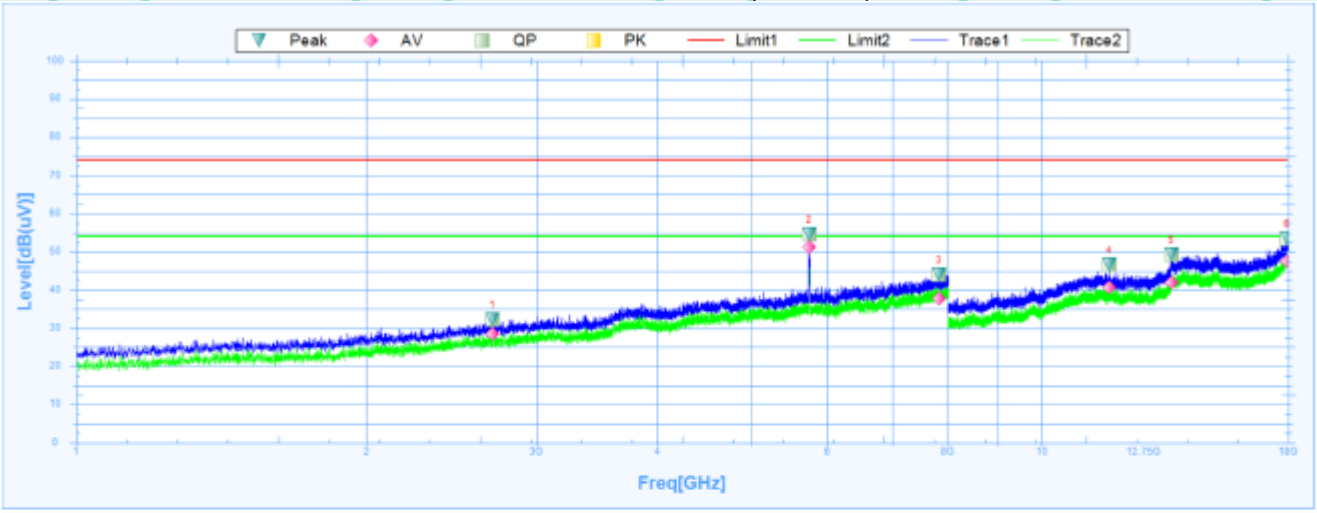
11ax20, 1 GHz to 18 GHz, Channel (6695 MHz), ANT H



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2479.6250	30.79	-8.62	39.41	74	-43.21	77	Horizontal	PK	Pass
1	2479.6250	26.46	-8.62	35.08	54	-27.54	77	Horizontal	AV	Pass
2	4310.1250	36.79	-2.04	38.83	74	-37.21	132	Horizontal	PK	Pass
2	4310.1250	34.48	-2.04	36.52	54	-19.52	132	Horizontal	AV	Pass
3	7951.0000	44.3	8.14	36.16	74	-29.7	237.3	Horizontal	PK	Pass
3	7951.0000	38.78	8.14	30.64	54	-15.22	237.3	Horizontal	AV	Pass
4	10917.5000	44.13	14.8	29.33	74	-29.87	359.5	Horizontal	PK	Pass
4	10917.5000	38.41	14.8	23.61	54	-15.59	359.5	Horizontal	AV	Pass
5	14216.2500	49.89	18.91	30.98	74	-24.11	216.1	Horizontal	PK	Pass
5	14216.2500	42.8	18.91	23.89	54	-11.2	216.1	Horizontal	AV	Pass
6	17965.0000	53.29	23.68	29.61	74	-20.71	208.9	Horizontal	PK	Pass
6	17965.0000	49.48	23.68	25.8	54	-4.52	208.9	Horizontal	AV	Pass

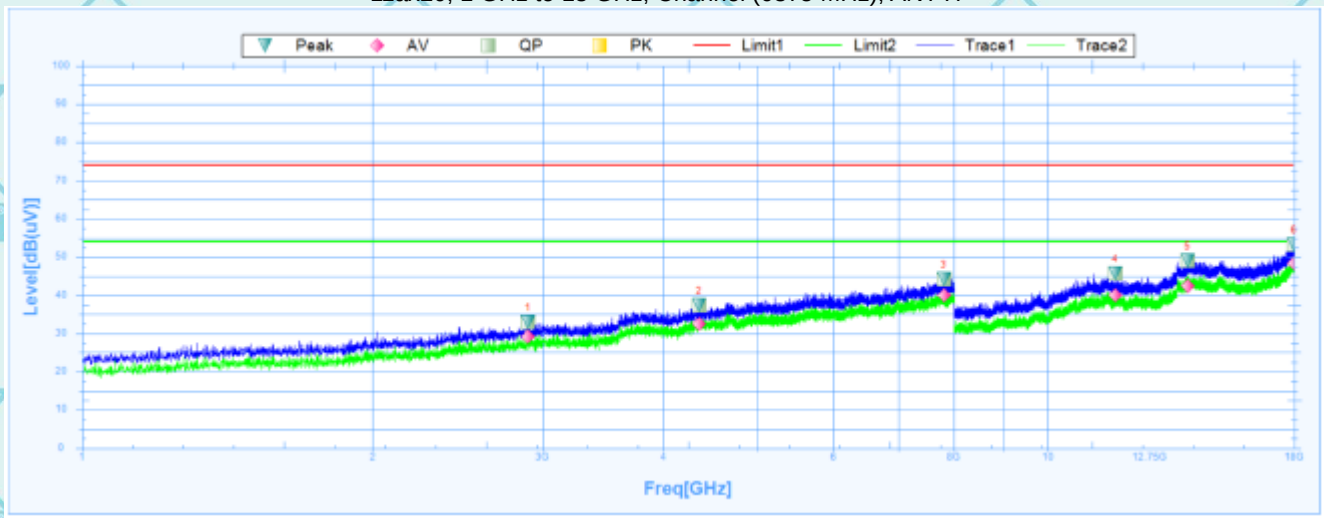
11ax20, 1 GHz to 18 GHz, Channel (6695 MHz), ANT V



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2697.5000	32.22	-7.87	40.09	74	-41.78	14.2	Horizontal	PK	Pass
1	2697.5000	28.41	-7.87	36.28	54	-25.59	14.2	Horizontal	AV	Pass
2	5744.2500	54.55	1.96	52.59	74	-19.45	360.1	Horizontal	PK	Pass
2	5744.2500	51.35	1.96	49.39	54	-2.65	360.1	Horizontal	AV	Pass
3	7828.5000	43.96	7.89	36.07	74	-30.04	311.4	Horizontal	PK	Pass
3	7828.5000	37.82	7.89	29.93	54	-16.18	311.4	Horizontal	AV	Pass
4	11745.0000	46.59	15.54	31.05	74	-27.41	237.7	Horizontal	PK	Pass
4	11745.0000	40.58	15.54	25.04	54	-13.42	237.7	Horizontal	AV	Pass
5	13627.5000	49.31	18.05	31.26	74	-24.69	127.7	Horizontal	PK	Pass
5	13627.5000	41.99	18.05	23.94	54	-12.01	127.7	Horizontal	AV	Pass
6	17951.2500	53.48	23.58	29.9	74	-20.52	247.2	Horizontal	PK	Pass
6	17951.2500	47.47	23.58	23.89	54	-6.53	247.2	Horizontal	AV	Pass

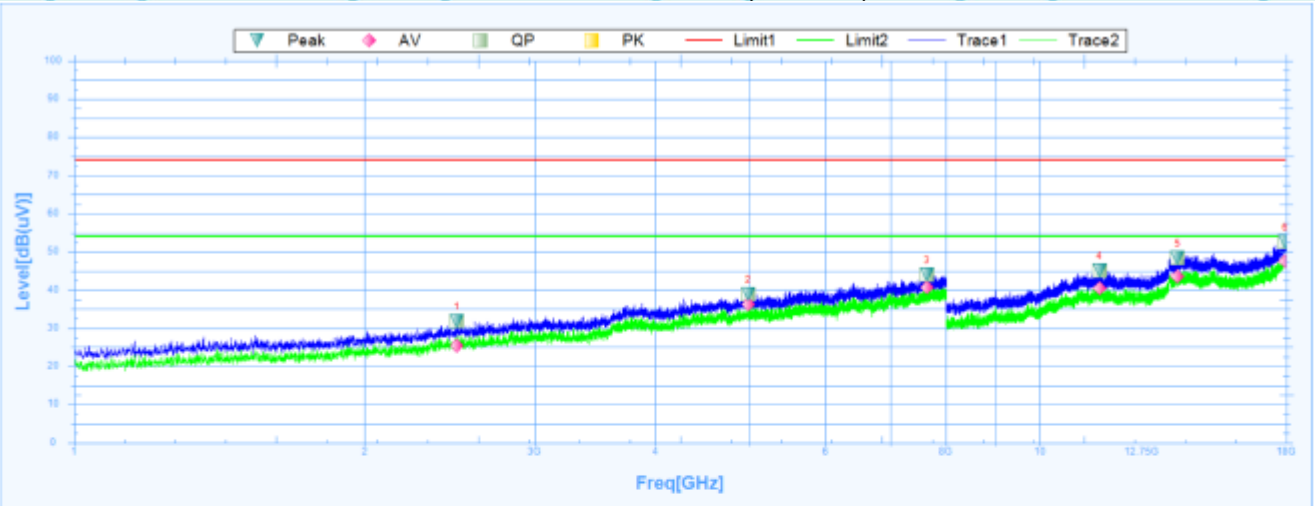
11ax20, 1 GHz to 18 GHz, Channel (6875 MHz), ANT H



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2895.2500	32.83	-7.04	39.87	74	-41.17	210.8	Horizontal	PK	Pass
1	2895.2500	29.2	-7.04	36.24	54	-24.8	210.8	Horizontal	AV	Pass
2	4355.6250	37.4	-1.94	39.34	74	-36.6	360	Horizontal	PK	Pass
2	4355.6250	32.38	-1.94	34.32	54	-21.62	360	Horizontal	AV	Pass
3	7805.7500	44.26	7.85	36.41	74	-29.74	8.7	Horizontal	PK	Pass
3	7805.7500	40.1	7.85	32.25	54	-13.9	8.7	Horizontal	AV	Pass
4	11745.0000	45.83	15.54	30.29	74	-28.17	47.6	Horizontal	PK	Pass
4	11745.0000	40.1	15.54	24.56	54	-13.9	47.6	Horizontal	AV	Pass
5	13955.0000	49.05	18.99	30.06	74	-24.95	24.9	Horizontal	PK	Pass
5	13955.0000	42.44	18.99	23.45	54	-11.56	24.9	Horizontal	AV	Pass
6	17992.5000	53.14	23.88	29.26	74	-20.86	124.1	Horizontal	PK	Pass
6	17992.5000	48.29	23.88	24.41	54	-5.71	124.1	Horizontal	AV	Pass

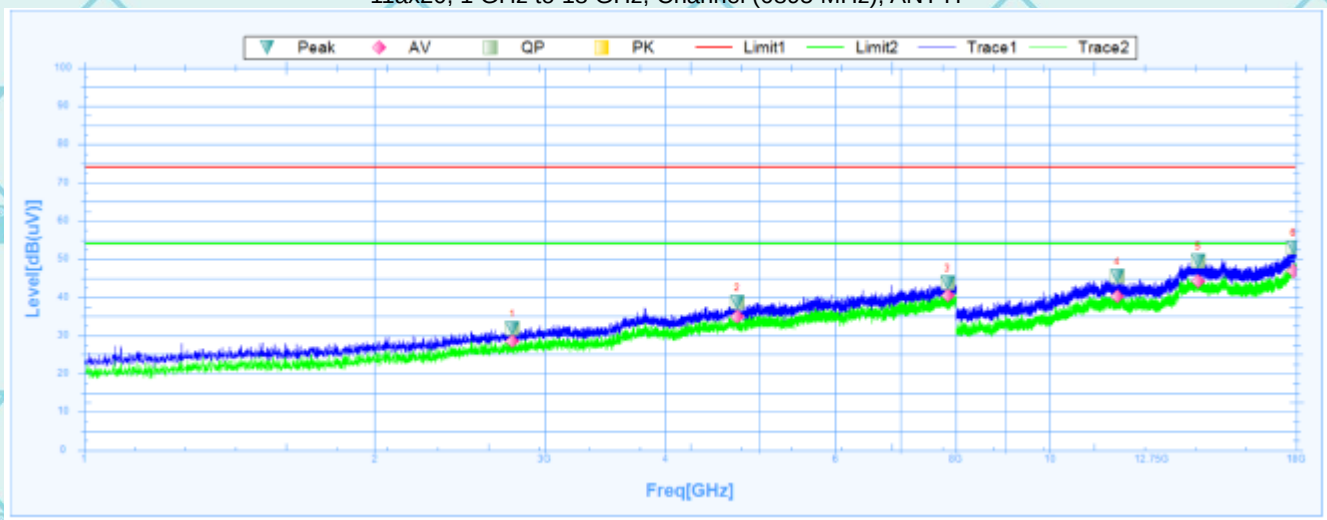
11ax20, 1 GHz to 18 GHz, Channel (6875 MHz), ANT V



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2491.8750	31.73	-8.54	40.27	74	-42.27	360	Horizontal	PK	Pass
1	2491.8750	25.51	-8.54	34.05	54	-28.49	360	Horizontal	AV	Pass
2	4993.5000	38.93	0.16	38.77	74	-35.07	238.4	Horizontal	PK	Pass
2	4993.5000	36.32	0.16	36.16	54	-17.68	238.4	Horizontal	AV	Pass
3	7645.6250	43.88	7.35	36.53	74	-30.12	13.7	Horizontal	PK	Pass
3	7645.6250	40.68	7.35	33.33	54	-13.32	13.7	Horizontal	AV	Pass
4	11531.2500	45.16	15.72	29.44	74	-28.84	37.9	Horizontal	PK	Pass
4	11531.2500	40.38	15.72	24.66	54	-13.62	37.9	Horizontal	AV	Pass
5	13895.0000	48.39	18.82	29.57	74	-25.61	342.7	Horizontal	PK	Pass
5	13895.0000	43.45	18.82	24.63	54	-10.55	342.7	Horizontal	AV	Pass
6	17958.7500	52.53	23.63	28.9	74	-21.47	88.2	Horizontal	PK	Pass
6	17958.7500	47.55	23.63	23.92	54	-6.45	88.2	Horizontal	AV	Pass

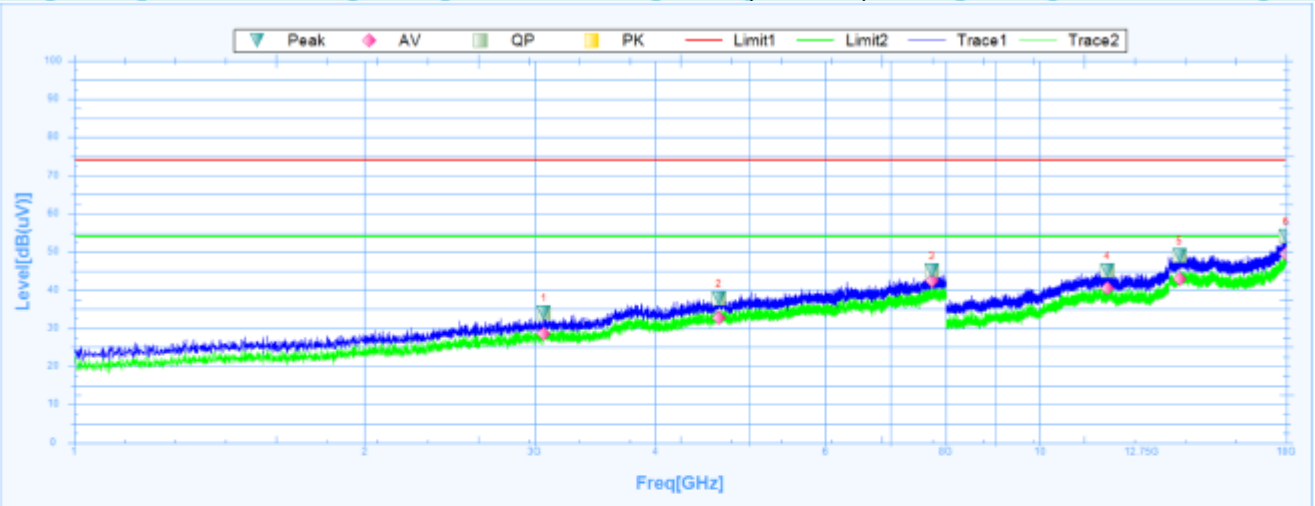
11ax20, 1 GHz to 18 GHz, Channel (6895 MHz), ANT H



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2775.3750	31.79	-7.53	39.32	74	-42.21	345.9	Horizontal	PK	Pass
1	2775.3750	28.52	-7.53	36.05	54	-25.48	345.9	Horizontal	AV	Pass
2	4747.6250	38.64	-0.56	39.2	74	-35.36	198.9	Horizontal	PK	Pass
2	4747.6250	34.88	-0.56	35.44	54	-19.12	198.9	Horizontal	AV	Pass
3	7839.8750	43.83	7.92	35.91	74	-30.17	67.4	Horizontal	PK	Pass
3	7839.8750	40.46	7.92	32.54	54	-13.54	67.4	Horizontal	AV	Pass
4	11745.0000	45.41	15.54	29.87	74	-28.59	28.5	Horizontal	PK	Pass
4	11745.0000	40.26	15.54	24.72	54	-13.74	28.5	Horizontal	AV	Pass
5	14245.0000	49.5	18.87	30.63	74	-24.5	297.4	Horizontal	PK	Pass
5	14245.0000	44.09	18.87	25.22	54	-9.91	297.4	Horizontal	AV	Pass
6	17871.2500	52.93	23.08	29.85	74	-21.07	0	Horizontal	PK	Pass
6	17871.2500	46.94	23.08	23.86	54	-7.06	0	Horizontal	AV	Pass

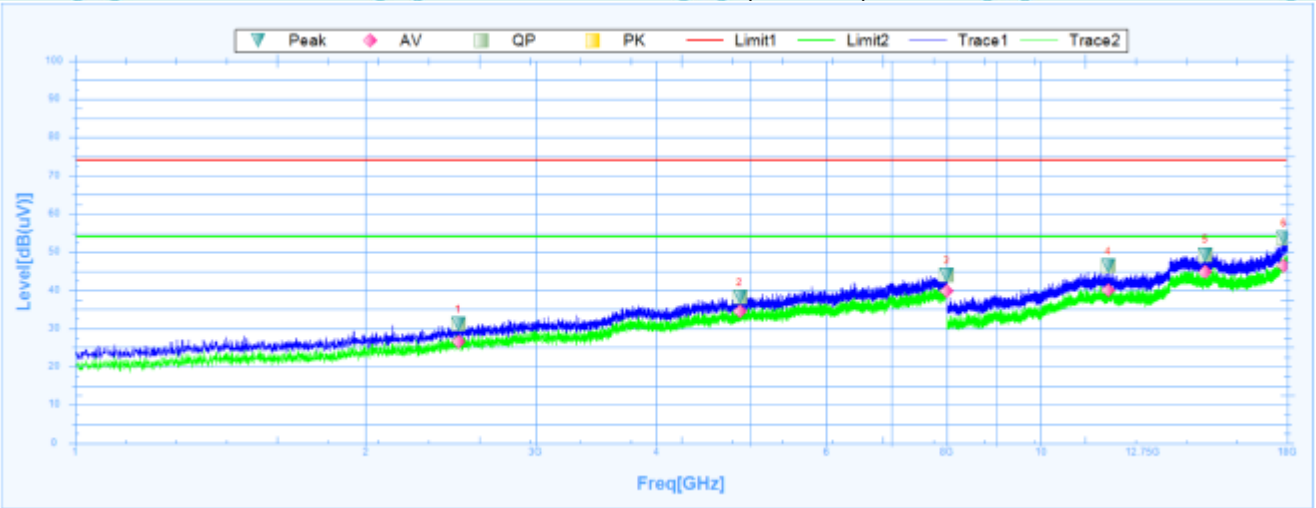
11ax20, 1 GHz to 18 GHz, Channel (6895 MHz), ANT V



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	3065.0000	33.96	-6.25	40.21	74	-40.04	61.4	Horizontal	PK	Pass
1	3065.0000	28.47	-6.25	34.72	54	-25.53	61.4	Horizontal	AV	Pass
2	4651.3750	37.82	-1.1	38.92	74	-36.18	0.7	Horizontal	PK	Pass
2	4651.3750	32.75	-1.1	33.85	54	-21.25	0.7	Horizontal	AV	Pass
3	7737.5000	45	7.68	37.32	74	-29	4.6	Horizontal	PK	Pass
3	7737.5000	42.36	7.68	34.68	54	-11.64	4.6	Horizontal	AV	Pass
4	11745.0000	45.13	15.54	29.59	74	-28.87	152.8	Horizontal	PK	Pass
4	11745.0000	40.45	15.54	24.91	54	-13.55	152.8	Horizontal	AV	Pass
5	13953.7500	49.08	18.99	30.09	74	-24.92	0	Horizontal	PK	Pass
5	13953.7500	42.79	18.99	23.8	54	-11.21	0	Horizontal	AV	Pass
6	18000.0000	54.15	23.93	30.22	74	-19.85	351.8	Horizontal	PK	Pass
6	18000.0000	49.49	23.93	25.56	54	-4.51	351.8	Horizontal	AV	Pass

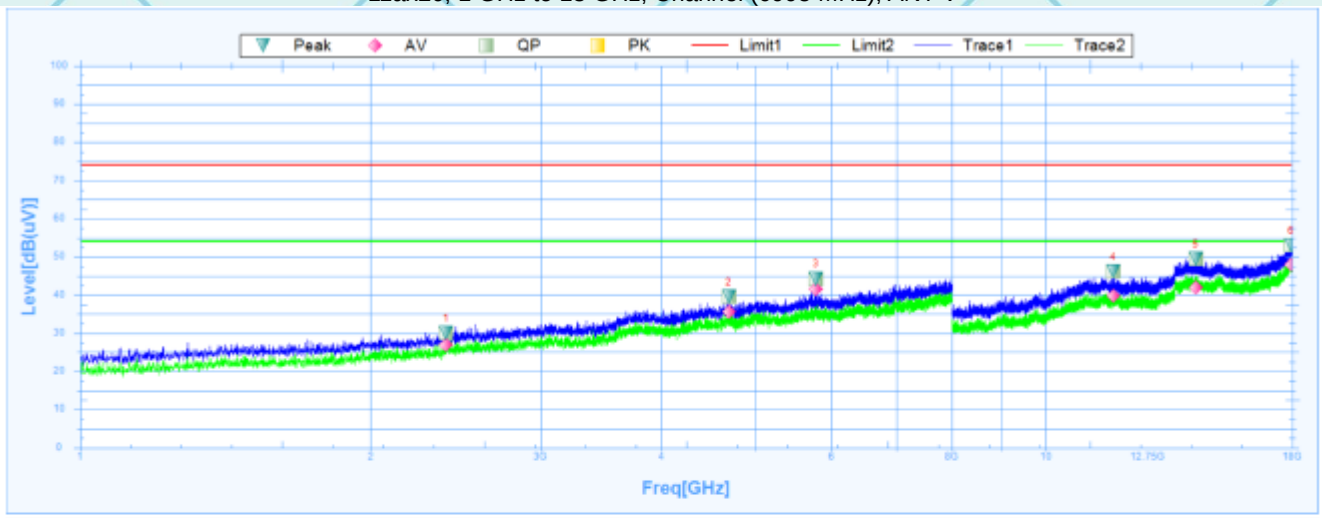
11ax20, 1 GHz to 18 GHz, Channel (6995 MHz), ANT H



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2492.7500	31.24	-8.53	39.77	74	-42.76	25.4	Horizontal	PK	Pass
1	2492.7500	26.45	-8.53	34.98	54	-27.55	25.4	Horizontal	AV	Pass
2	4877.1250	38.15	-0.17	38.32	74	-35.85	271.7	Horizontal	PK	Pass
2	4877.1250	34.55	-0.17	34.72	54	-19.45	271.7	Horizontal	AV	Pass
3	7993.8750	44.03	8.22	35.81	74	-29.97	9.3	Horizontal	PK	Pass
3	7993.8750	39.73	8.22	31.51	54	-14.27	9.3	Horizontal	AV	Pass
4	11745.0000	46.43	15.54	30.89	74	-27.57	59.5	Horizontal	PK	Pass
4	11745.0000	40.05	15.54	24.51	54	-13.95	59.5	Horizontal	AV	Pass
5	14805.0000	49.37	18.33	31.04	74	-24.63	246	Horizontal	PK	Pass
5	14805.0000	44.81	18.33	26.48	54	-9.19	246	Horizontal	AV	Pass
6	17861.2500	53.66	23.01	30.65	74	-20.34	143.2	Horizontal	PK	Pass
6	17861.2500	46.51	23.01	23.5	54	-7.49	143.2	Horizontal	AV	Pass

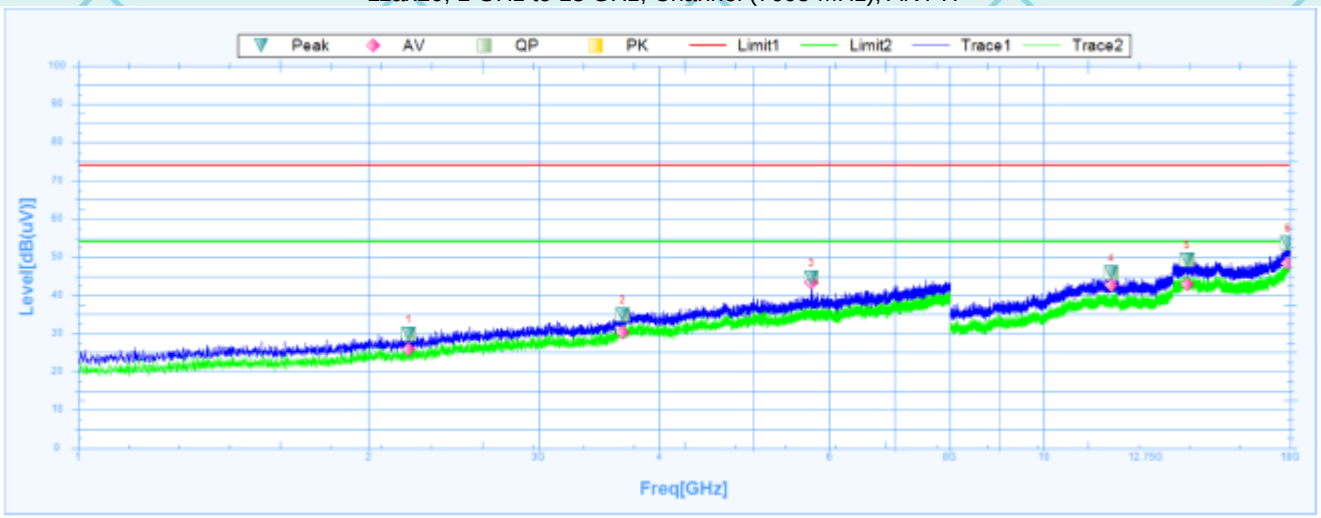
11ax20, 1 GHz to 18 GHz, Channel (6995 MHz), ANT V



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2393.0000	30.08	-9.15	39.23	74	-43.92	82.8	Horizontal	PK	Pass
1	2393.0000	26.86	-9.15	36.01	54	-27.14	82.8	Horizontal	AV	Pass
2	4695.1250	39.63	-0.85	40.48	74	-34.37	330.3	Horizontal	PK	Pass
2	4695.1250	35.67	-0.85	36.52	54	-18.33	330.3	Horizontal	AV	Pass
3	5784.5000	44.29	2.1	42.19	74	-29.71	359.9	Horizontal	PK	Pass
3	5784.5000	41.56	2.1	39.46	54	-12.44	359.9	Horizontal	AV	Pass
4	11745.0000	46.13	15.54	30.59	74	-27.87	339.8	Horizontal	PK	Pass
4	11745.0000	39.68	15.54	24.14	54	-14.32	339.8	Horizontal	AV	Pass
5	14301.2500	49.45	18.82	30.63	74	-24.55	234	Horizontal	PK	Pass
5	14301.2500	41.91	18.82	23.09	54	-12.09	234	Horizontal	AV	Pass
6	17948.7500	53.08	23.57	29.51	74	-20.92	207.7	Horizontal	PK	Pass
6	17948.7500	47.9	23.57	24.33	54	-6.1	207.7	Horizontal	AV	Pass

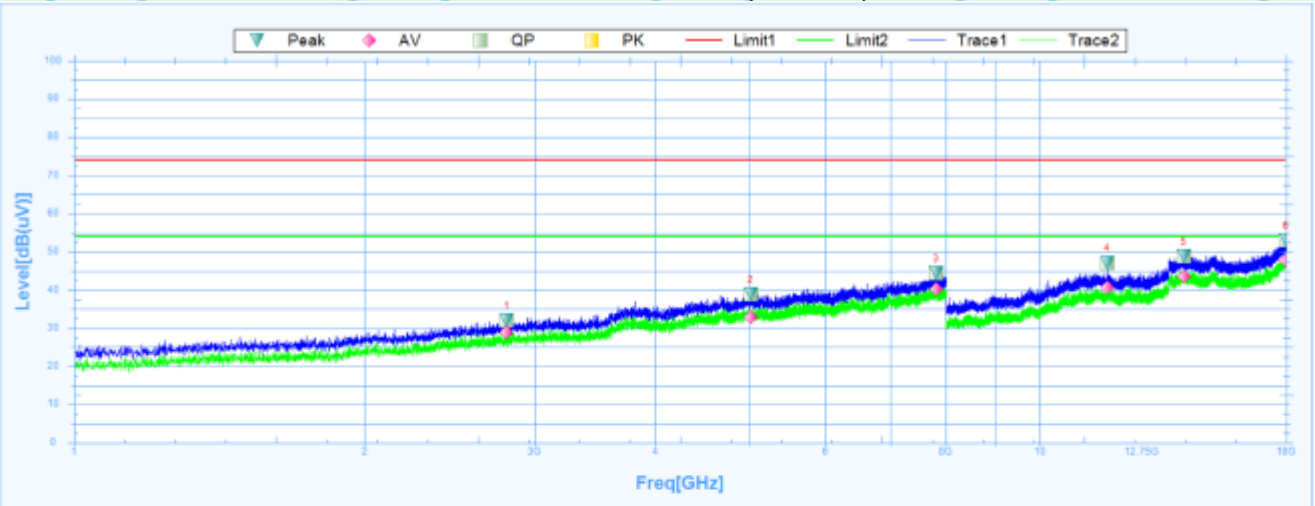
11ax20, 1 GHz to 18 GHz, Channel (7095 MHz), ANT H



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2198.7500	29.76	-10.38	40.14	74	-44.24	360.1	Horizontal	PK	Pass
1	2198.7500	25.94	-10.38	36.32	54	-28.06	360.1	Horizontal	AV	Pass
2	3665.2500	34.88	-4.03	38.91	74	-39.12	261.1	Horizontal	PK	Pass
2	3665.2500	30.3	-4.03	34.33	54	-23.7	261.1	Horizontal	AV	Pass
3	5750.3750	44.69	1.98	42.71	74	-29.31	191.8	Horizontal	PK	Pass
3	5750.3750	43.34	1.98	41.36	54	-10.66	191.8	Horizontal	AV	Pass
4	11746.2500	46	15.54	30.46	74	-28	213.7	Horizontal	PK	Pass
4	11746.2500	42.55	15.54	27.01	54	-11.45	213.7	Horizontal	AV	Pass
5	14073.7500	49.22	19.05	30.17	74	-24.78	149.2	Horizontal	PK	Pass
5	14073.7500	42.93	19.05	23.88	54	-11.07	149.2	Horizontal	AV	Pass
6	17900.0000	53.68	23.26	30.42	74	-20.32	168.3	Horizontal	PK	Pass
6	17900.0000	48.35	23.26	25.09	54	-5.65	168.3	Horizontal	AV	Pass

11ax20, 1 GHz to 18 GHz, Channel (7095 MHz), ANT V



Susputed Data List

NO.	Freq. [MHz]	Reading [dB(uV)]	Factor [dB]	Level [dB(uV)]	Limit [dB]	Margin [dB]	Deg [°]	Polarity	Trace	Verdict
1	2805.1250	32.11	-7.4	39.51	74	-41.89	343.5	Horizontal	PK	Pass
1	2805.1250	29.06	-7.4	36.46	54	-24.94	343.5	Horizontal	AV	Pass
2	5018.0000	38.93	0.19	38.74	74	-35.07	222.8	Horizontal	PK	Pass
2	5018.0000	32.93	0.19	32.74	54	-21.07	222.8	Horizontal	AV	Pass
3	7812.7500	44.38	7.86	36.52	74	-29.62	316.1	Horizontal	PK	Pass
3	7812.7500	40.3	7.86	32.44	54	-13.7	316.1	Horizontal	AV	Pass
4	11745.0000	47.16	15.54	31.62	74	-26.84	344.9	Horizontal	PK	Pass
4	11745.0000	40.63	15.54	25.09	54	-13.37	344.9	Horizontal	AV	Pass
5	14097.5000	48.76	19.03	29.73	74	-25.24	-0.1	Horizontal	PK	Pass
5	14097.5000	43.48	19.03	24.45	54	-10.52	-0.1	Horizontal	AV	Pass
6	17998.7500	52.94	23.92	29.02	74	-21.06	-0.1	Horizontal	PK	Pass
6	17998.7500	47.81	23.92	23.89	54	-6.19	-0.1	Horizontal	AV	Pass

Note:
1. All emissions not reported were more than 20dB below the specified limit or in the noise floor.
2. Emission Level= Reading Level+ Probe Factor +Cable Loss.
3. Data of measurement within this frequency range shown “--” in the table above means the reading of emissions are attenuated more than 20dB below the permissible limits or the field strength is too small to be measured.

7.4 ANTENNA REQUIREMENTS

Standard Applicable
If transmitting antenna directional gain is greater than 6 dBi, both the peak transmit power and the peak power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.
Antenna Anti-Replacement Construction
An embedded-in antenna design is used.
Antenna Gain
<CDD Modes > FCC KDB 662911 D01 Multiple Transmitter Output v02r01 For CDD transmissions, directional gain is calculated as Directional gain = GANT + Array Gain, where Array Gain is as follows. For power spectral density (PSD) measurements on all devices, Array Gain = 10 log(NANT/NSS=1) dB. For power measurements on IEEE 802.11 devices, Array Gain = 0 dB (i.e., no array gain) for NANT ≤ 4. Directional gain may be calculated by using the formulas applicable to equal gain antennas with GANT set equal to the gain of the antenna having the highest gain; The EUT supports CDD mode. For power, the directional gain GANT is set equal to the antenna having the highest gain, i.e., F)2)f)i). For PSD, the directional gain calculation is following F)2)f)ii) of KDB 662911 D01 v02r01. The directional gain “DG” is calculated as following table.

<CDD Modes>	Ant1 (dBi)	Ant2 (dBi)	DG for power (dBi)	DG for PSD (dBi)
5925~7125MHz	2.92	2.40	2.92	5.67

Power limit reduction = Composite gain – 6dBi, (min = 0)
PSD limit reduction = Composite gain + PSD Array gain – 6dBi, (min = 0)

7.5 26DB & 99% OCCUPIED BANDWIDTH MEASUREMENT

7.5.1 LIMIT OF 26DB & 99% OCCUPIED BANDWIDTH

<FCC 14-30 CFR 15.407>
(a)(10) The maximum transmitter channel bandwidth for U-NII devices in the 5.925-7.125 GHz band is 320 megahertz.

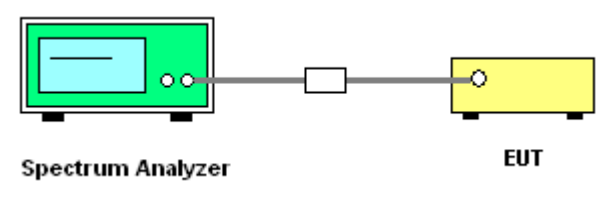
7.5.2 MEASURING INSTRUMENTS

See list of measuring equipment of this test report.

7.5.3 TEST PROCEDURES

1. The testing follows FCC KDB 789033 D02 General UNII Test Procedures New Rules v02r01. Section C) Emission bandwidth
2. Set RBW = approximately 1% of the emission bandwidth.
3. Set the VBW > RBW.
4. Detector = Peak.
5. Trace mode = max hold
6. Measure the maximum width of the emission that is 26 dB down from the peak of the emission. Compare this with the RBW setting of the analyzer. Readjust RBW and repeat measurement as needed until the RBW/EBW ratio is approximately 1%.
7. For 99% Bandwidth Measurement, the spectrum analyzer's resolution bandwidth (RBW) is set 1-5% of the emission bandwidth and set the Video bandwidth (VBW) ≥ 3 * RBW.
8. Measure and record the results in the test report.

7.5.4 TEST SETUP

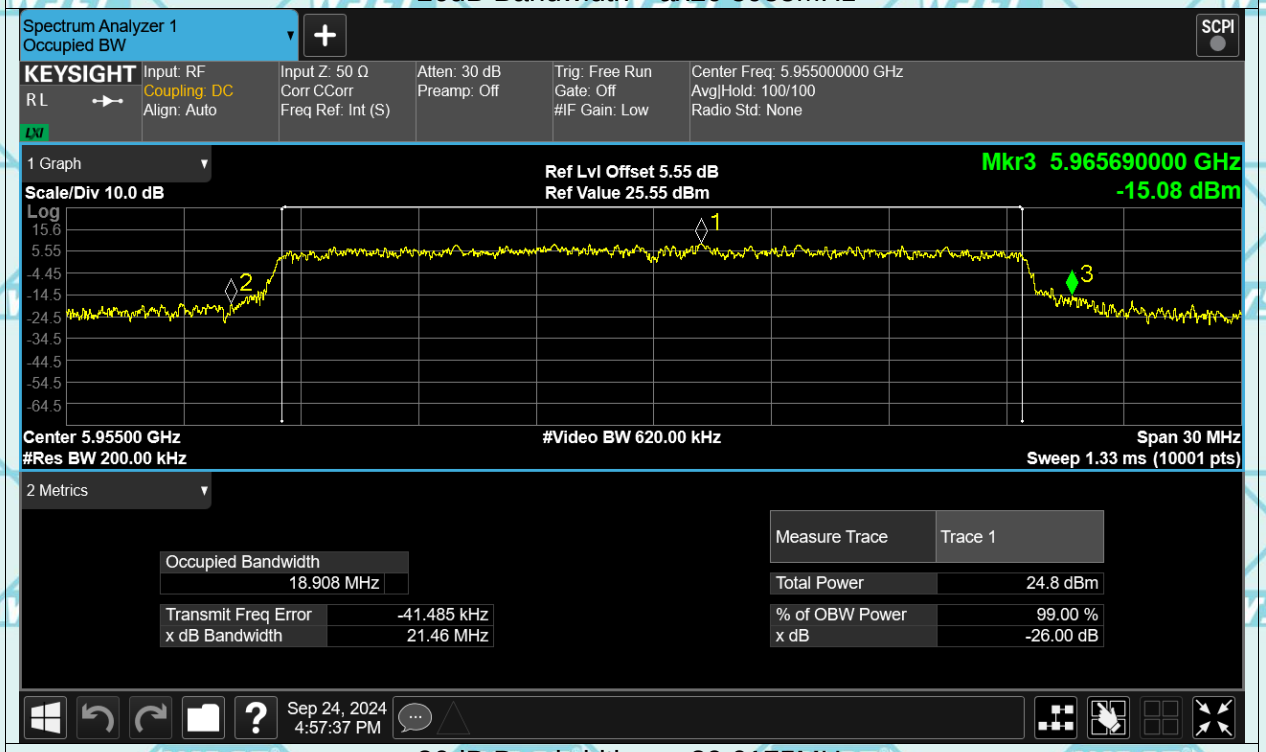


Test Result of 26dB & 99% Occupied Bandwidth

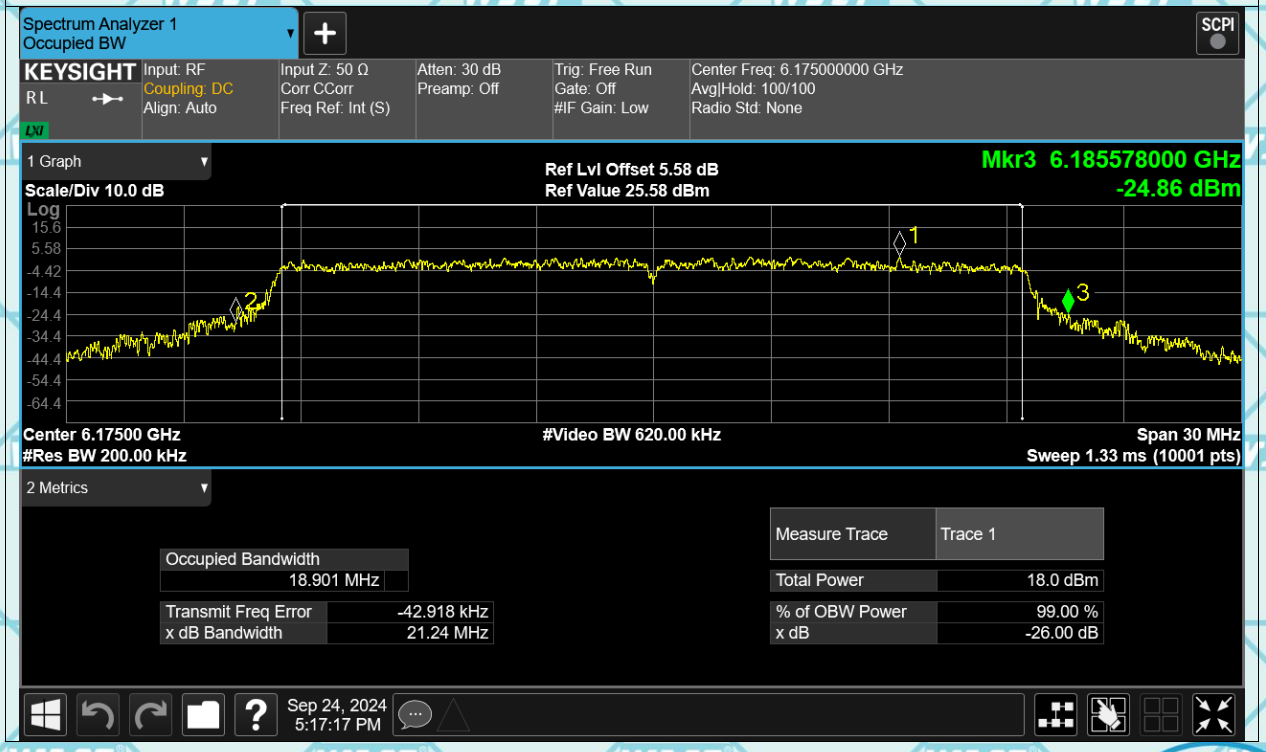
Mode	Frequency (MHz)	-26 dB Bandwidth (MHz)	Limit -26 dB Bandwidth (MHz)	99% Bandwidth (MHz)	Verdict
ax20	5955	21.46	0.5	18.908	Pass
ax20	6175	21.24	0.5	18.901	Pass
ax20	6415	21.38	0.5	18.901	Pass
ax20	6435	21.24	0.5	18.932	Pass
ax20	6475	22.11	0.5	18.952	Pass
ax20	6515	21.37	0.5	18.876	Pass
ax20	6535	22.13	0.5	18.903	Pass
ax20	6695	21.31	0.5	18.883	Pass
ax20	6875	20.83	0.5	18.881	Pass
ax20	6895	21.40	0.5	18.970	Pass
ax20	6995	21.63	0.5	18.914	Pass
ax20	7095	22.45	0.5	18.891	Pass
ax40	5965	52.31	0.5	37.630	Pass
ax40	6165	39.21	0.5	37.471	Pass
ax40	6405	39.14	0.5	37.487	Pass
ax40	6445	39.33	0.5	37.634	Pass
ax40	6485	39.25	0.5	37.484	Pass
ax40	6525	39.07	0.5	37.522	Pass
ax40	6565	39.26	0.5	37.425	Pass
ax40	6685	39.22	0.5	37.533	Pass
ax40	6845	39.40	0.5	37.430	Pass
ax40	6885	39.18	0.5	37.468	Pass
ax40	6965	39.26	0.5	37.473	Pass
ax40	7085	50.06	0.5	37.643	Pass
ax80	5985	79.78	0.5	77.086	Pass
ax80	6145	79.68	0.5	76.641	Pass
ax80	6385	79.79	0.5	76.808	Pass
ax80	6465	79.95	0.5	76.741	Pass
ax80	6545	79.79	0.5	76.888	Pass
ax80	6625	79.63	0.5	76.827	Pass
ax80	6705	79.63	0.5	76.766	Pass
ax80	6865	79.78	0.5	76.553	Pass
ax80	6945	79.82	0.5	76.660	Pass
ax80	7025	86.79	0.5	76.716	Pass
ax160	6025	160.8	0.5	155.04	Pass
ax160	6185	160.6	0.5	154.81	Pass
ax160	6345	160.7	0.5	155.06	Pass
ax160	6505	160.5	0.5	154.92	Pass
ax160	6665	161.1	0.5	155.46	Pass
ax160	6825	161.0	0.5	155.23	Pass
ax160	6985	161.0	0.5	154.96	Pass

Test Graphs

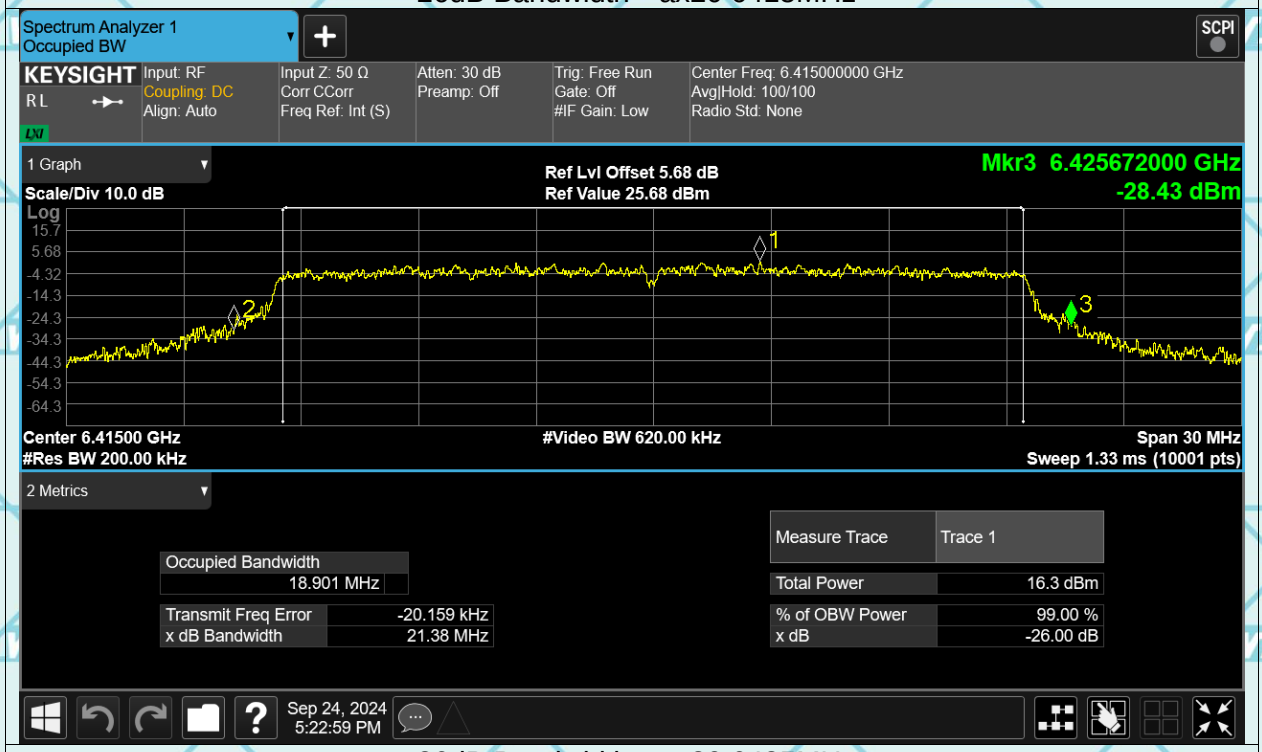
-26dB Bandwidth ax20 5955MHz



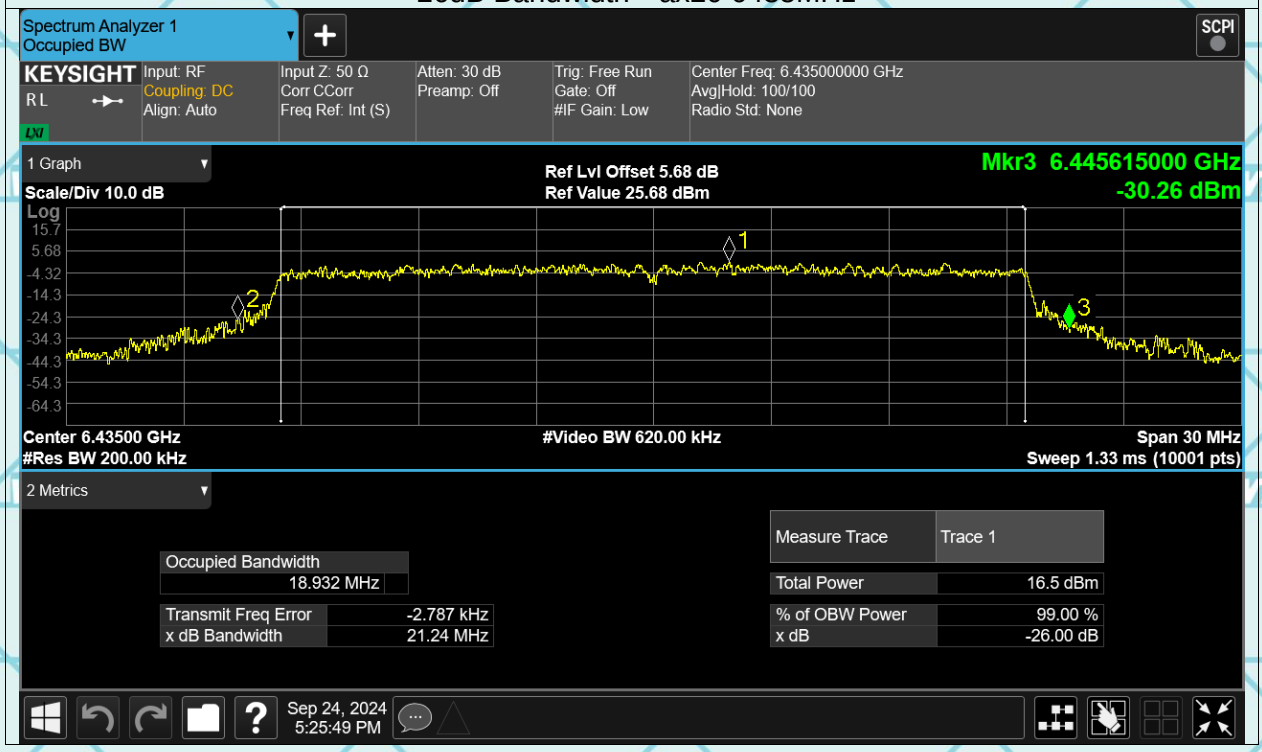
-26dB Bandwidth ax20 6175MHz



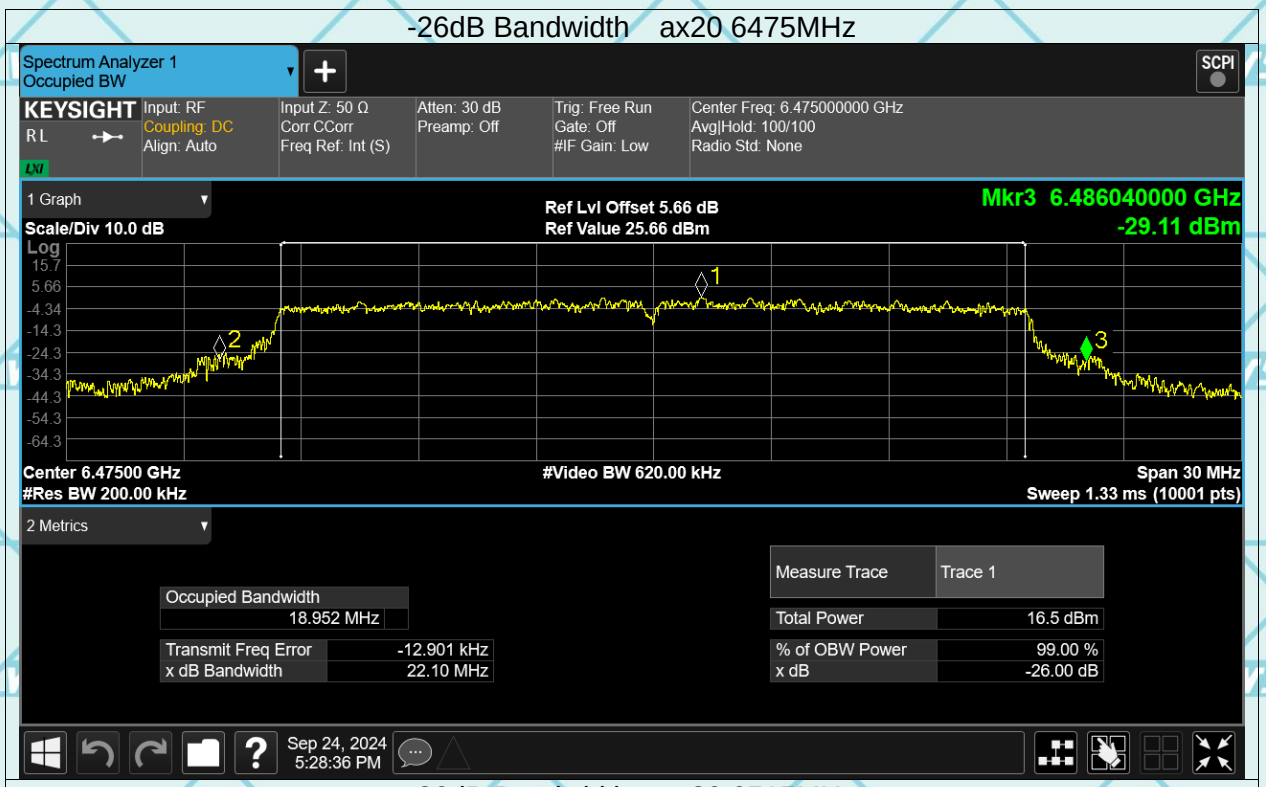
-26dB Bandwidth ax20 6415MHz



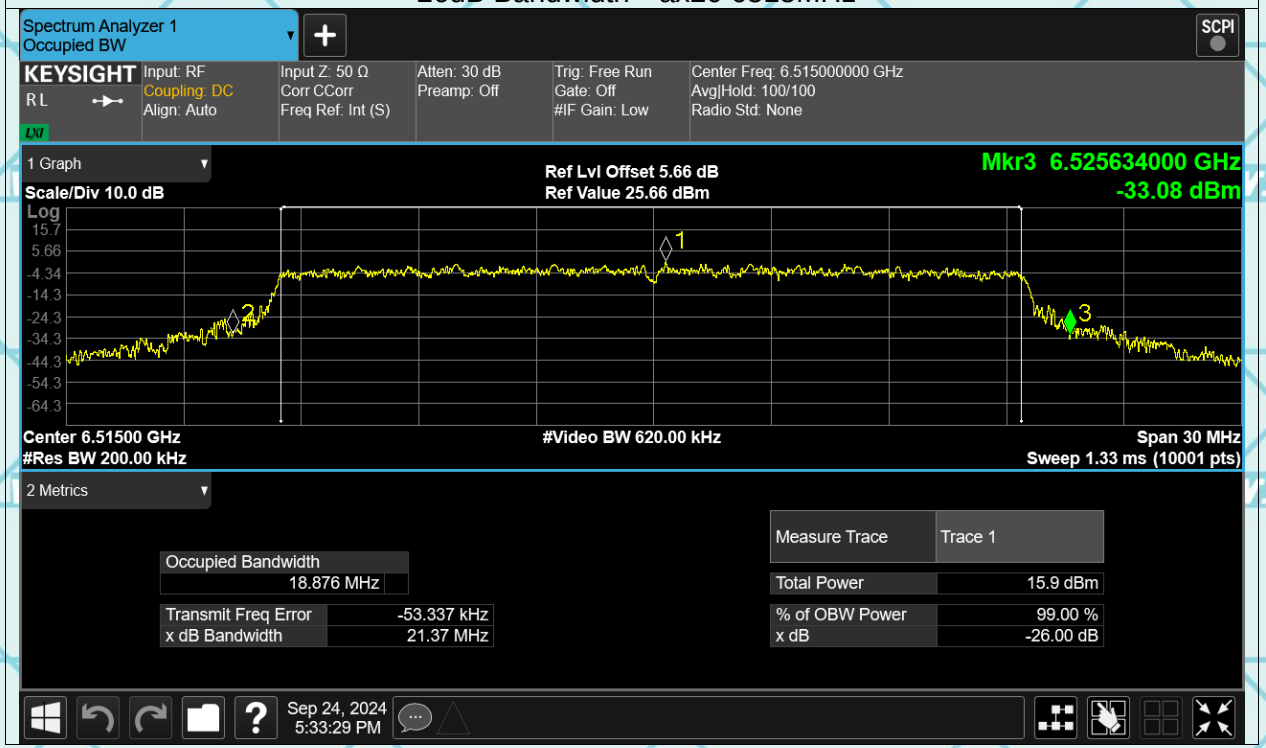
-26dB Bandwidth ax20 6435MHz



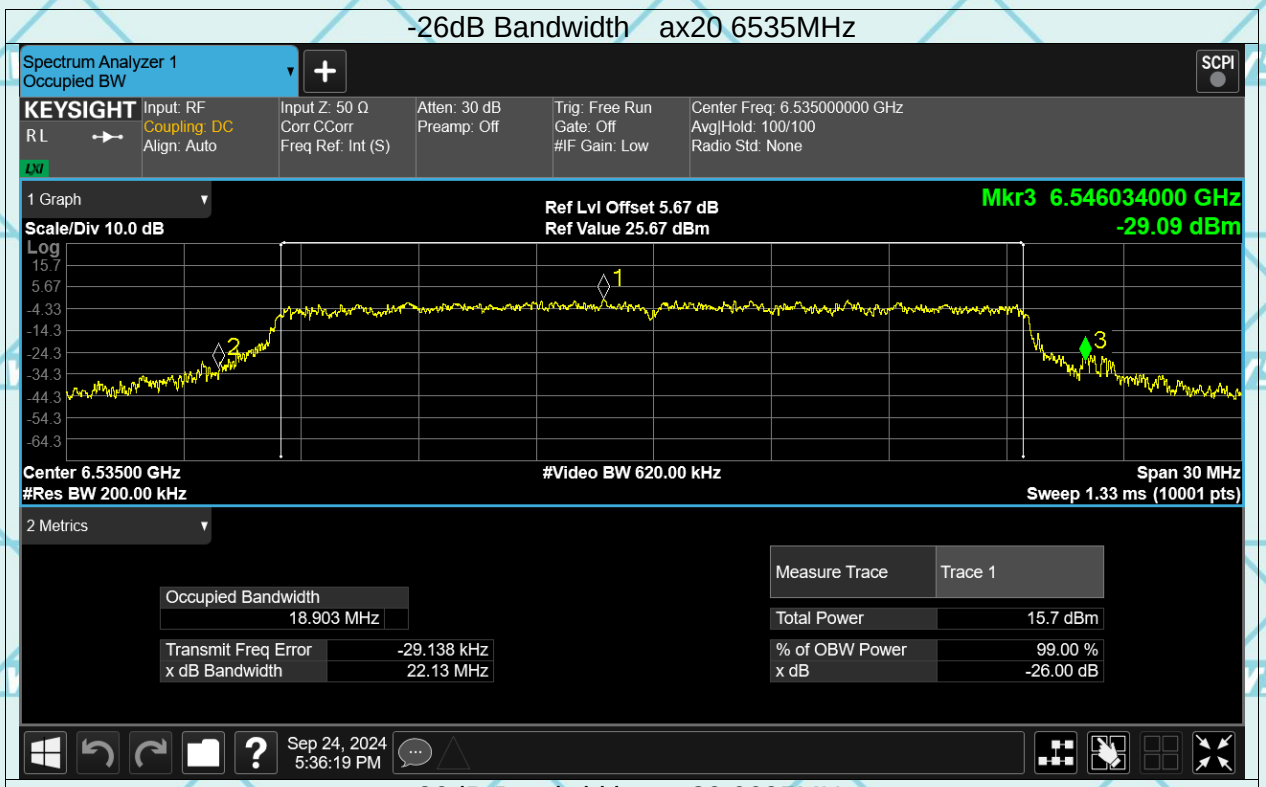
-26dB Bandwidth ax20 6475MHz



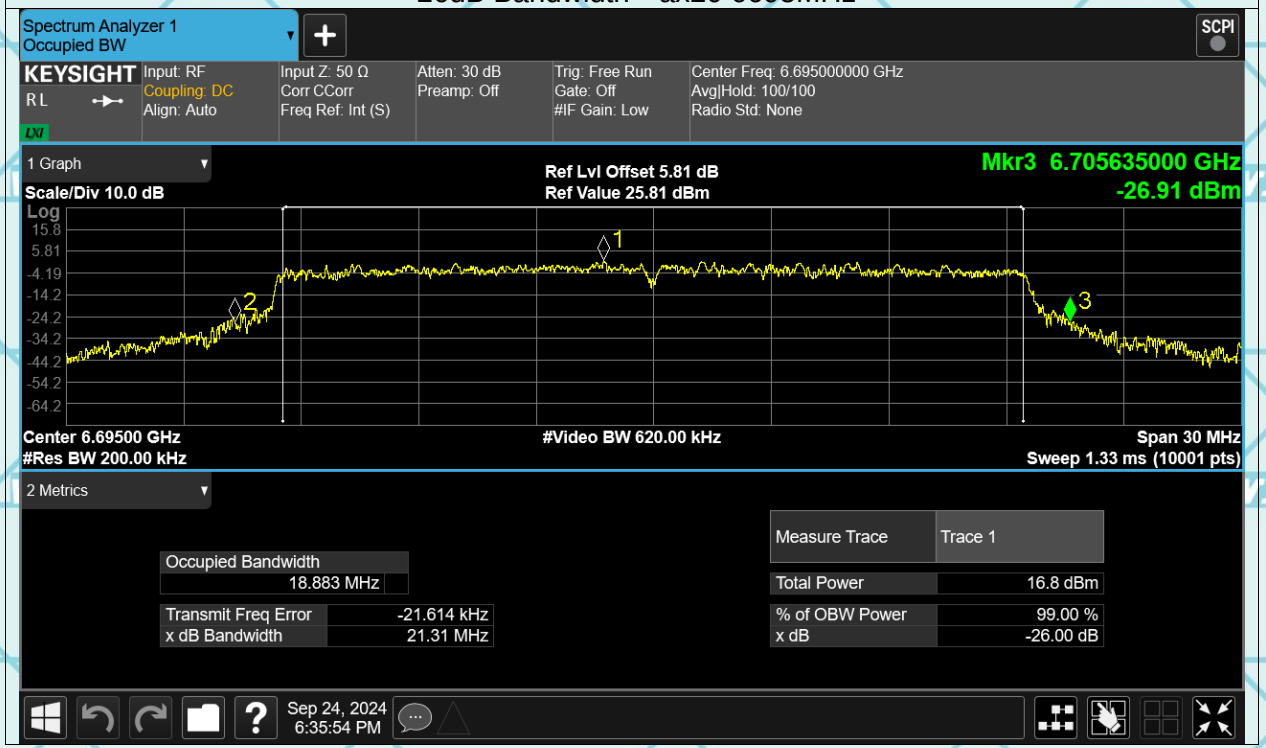
-26dB Bandwidth ax20 6515MHz



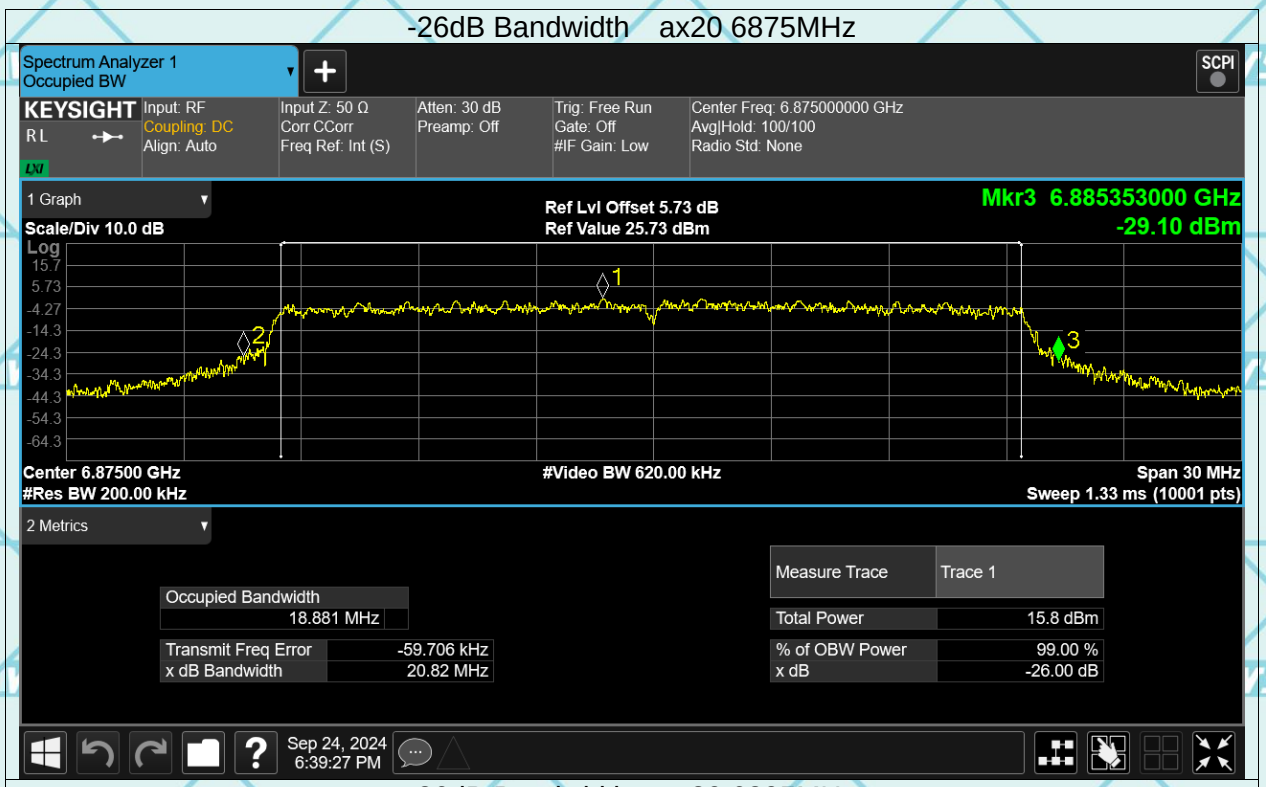
-26dB Bandwidth ax20 6535MHz



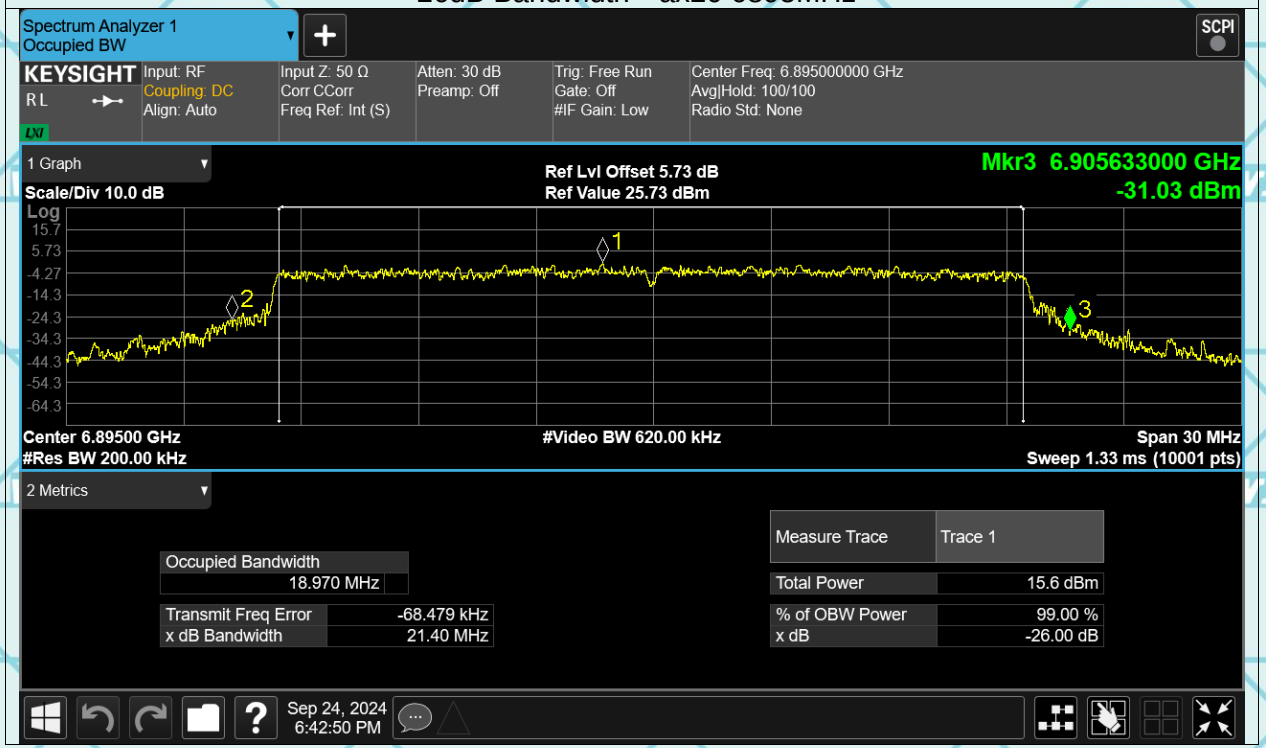
-26dB Bandwidth ax20 6695MHz



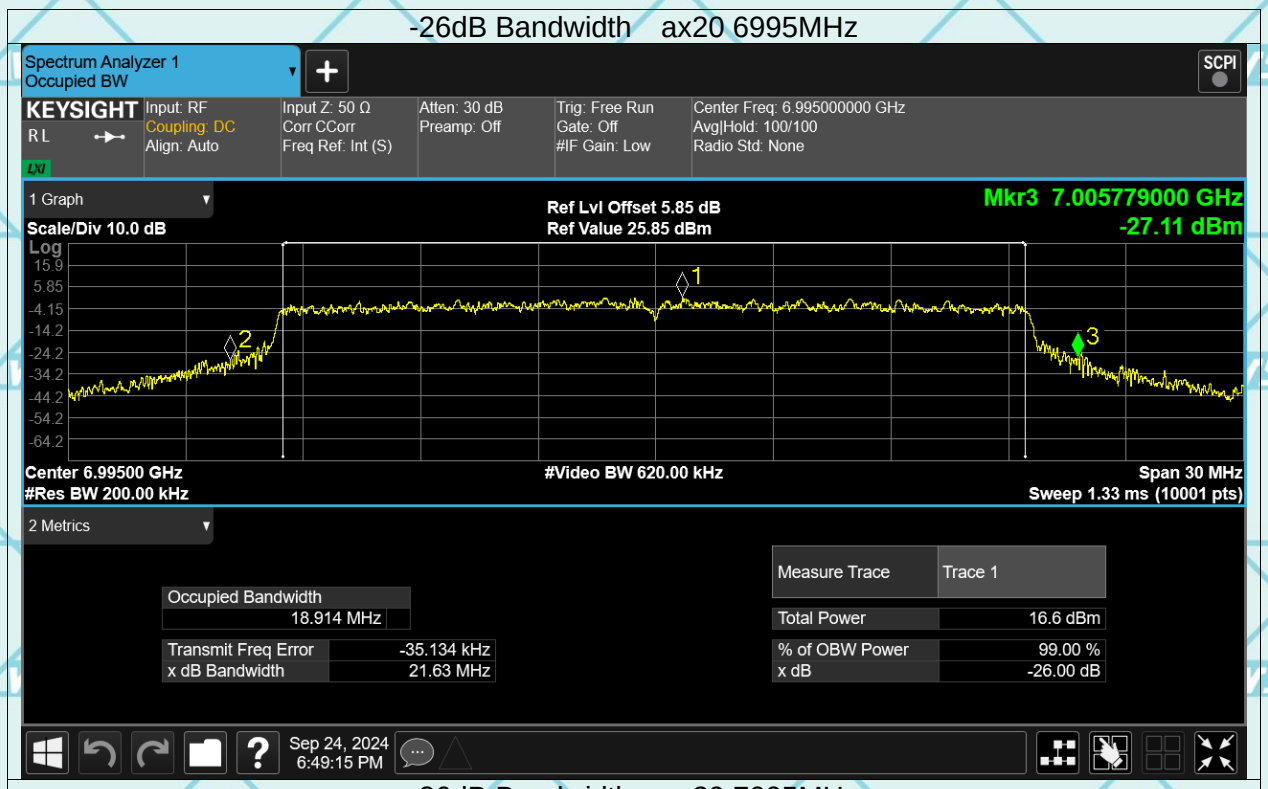
-26dB Bandwidth ax20 6875MHz



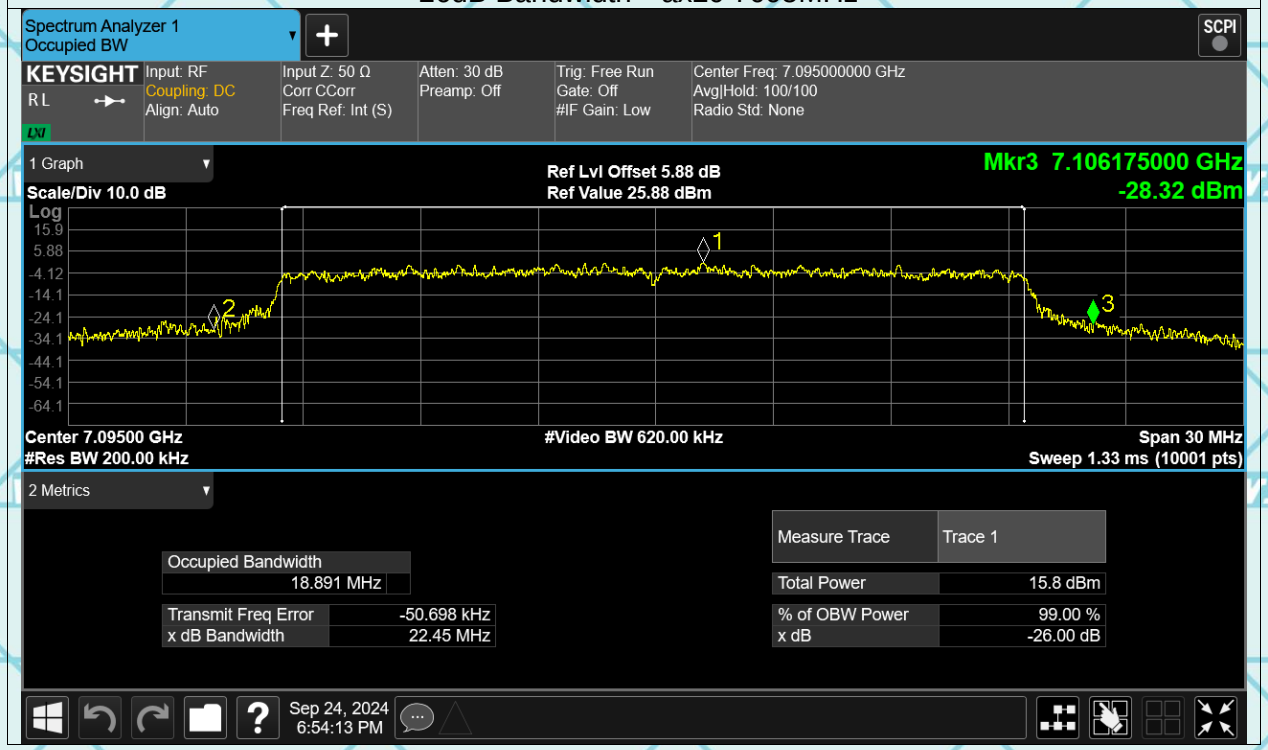
-26dB Bandwidth ax20 6895MHz



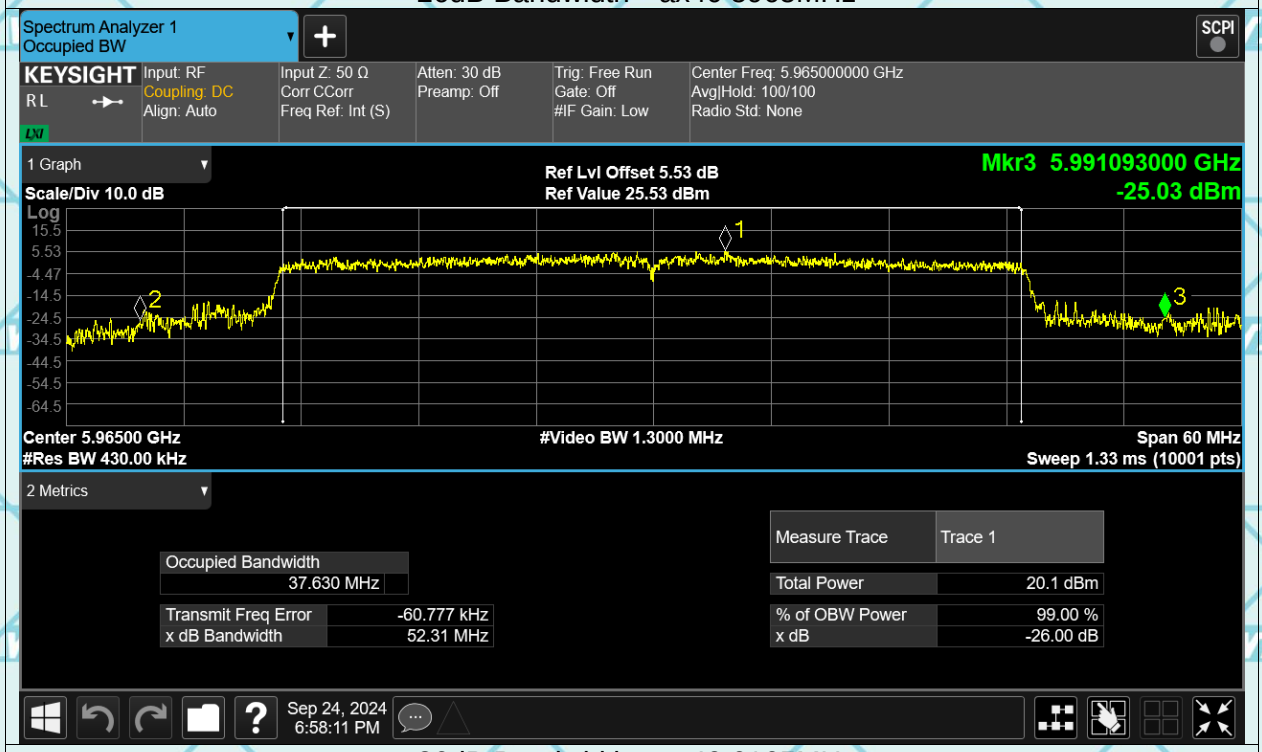
-26dB Bandwidth ax20 6995MHz



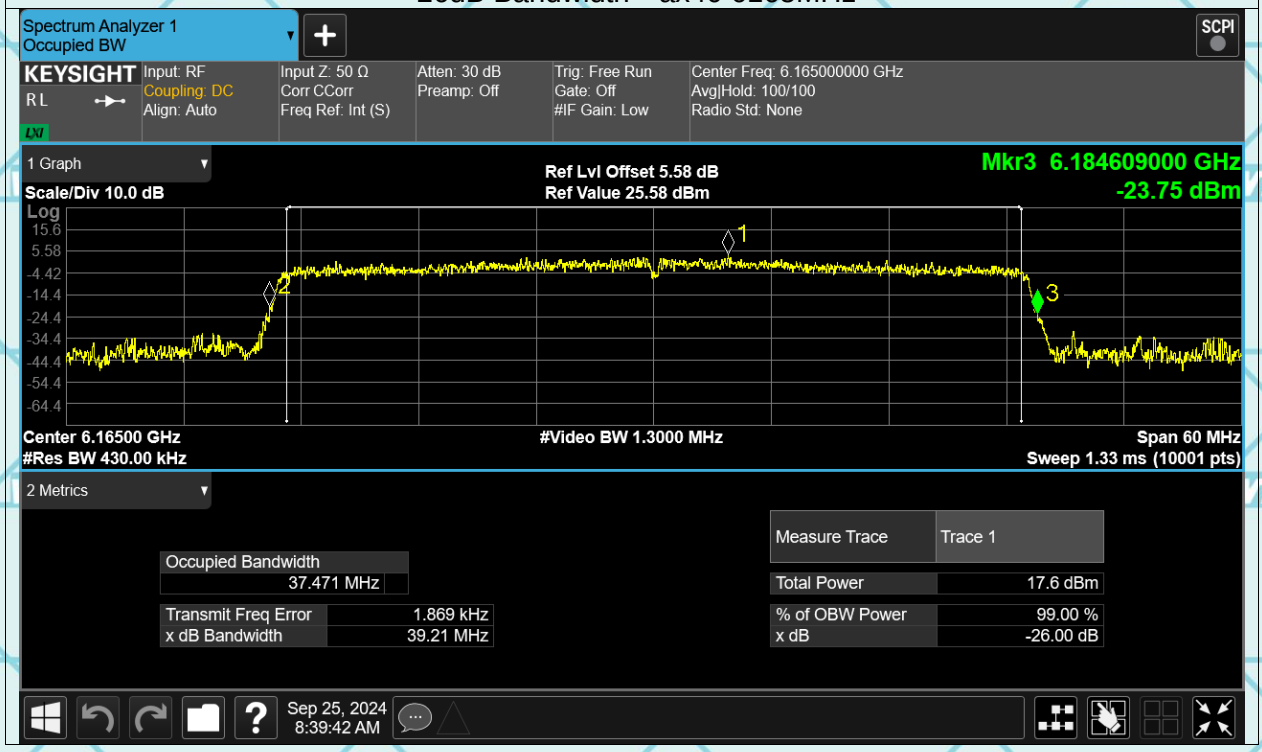
-26dB Bandwidth ax20 7095MHz



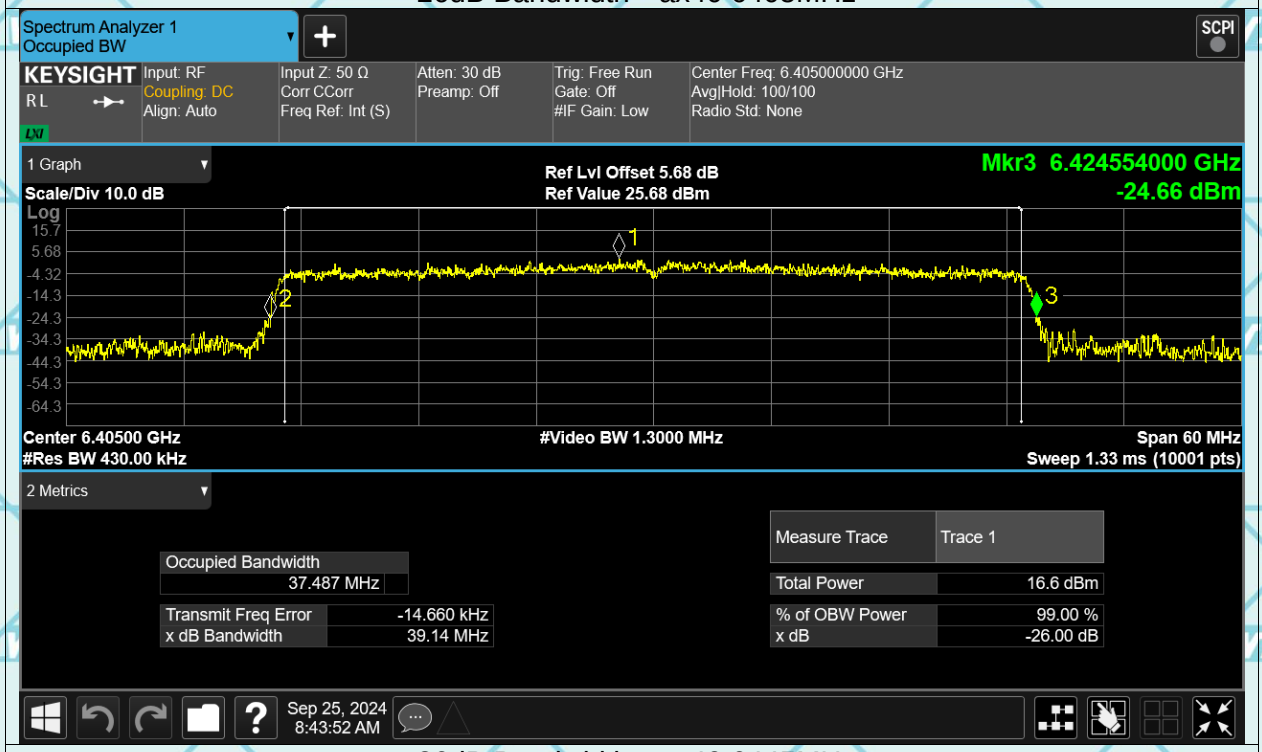
-26dB Bandwidth ax40 5965MHz



-26dB Bandwidth ax40 6165MHz



-26dB Bandwidth ax40 6405MHz



-26dB Bandwidth ax40 6445MHz