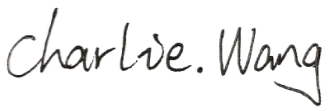
RF Test Report

Applicant:	Quectel Wireless Solutions Co., Ltd.
Address:	Building 5, Shanghai Business Park Phase III (Area B), No.1016 Tianlin Road, Minhang District, Shanghai, China, 200233
Product:	Smart Module
Model No.:	SG560D-WF
Brand Name:	QUECTEL
FCC ID:	XMR2023SG560DWF
Standards:	FCC CFR47 Part 15E
Report No.:	PD20230213RF04
Issue Date:	2024/01/15
Test Result:	PASS *

* **The above equipment has been tested and compliance with the requirement of the relative standards by Hefei Panwin Technology Co., Ltd.**



Reviewed By: Charlie Wang **Approved By:** Alec Yang

Hefei Panwin Technology Co., Ltd.

Floor 1, Zone E, Plant 2#, Mingzhu Industrial Park, No.106 Chuangxin Avenue, High-tech Zone, Hefei City, Anhui Province,China

TEL: 0551-63811775

Revision History

Report No.	Version	Description	Issue Date	Note
PD20230213RF04	1	Initial Report	2024/01/15	Valid

Remark:

The customer claimed that the clocking scheme of the module's WiFi unit had been updated, and the old clock scheme continues to provide the clock signal for the entire system except WiFi. After the update, the module is the same everywhere except for the difference in the clock scheme of WiFi. The new XO solution has no RF impact.Therefore, this report verifies the 6dB and 26dB and 99% Occupied Bandwidth and Unwanted Emissions, and other data can be referred to in the original report(Report No.: SEWA2303000041RG04) released by SGS on 2023/05/24.

CONTENTS

Summary of Test Results

No.	Test Case	FCC Rules	Verdict
1	26dB & 99% Occupied Bandwidth Measurement	2.1049 & 15.407(e)	Report only
2	Unwanted Emissions Measurement	15.407(b) & 15.209(a)	PASS
3	Antenna Requirements	15.203 & 15.407(a)	PASS
Date of Testing:2023/12/07 to 2024/01/11 Date of Sample Received: 2023/12/04			
• We, Hefei Panwin Technology Co., Ltd., would like to declare that the tested sample has been evaluated in accordance with the procedures given in applied standard(s) in **Section 2.3** of this report and shown compliance with the applicable technical standards. • All indications of PASS/FAIL in this report are based on interpretations and/or observations of test results. Measurement Uncertainties were not taken into account and are published for informational purposes only.			

1 General Information

1.1 Notes of the Test Report

This report is invalid without signature of auditor and approver or with any alterations. The report shall not be partially reproduced without written approval of the testing company. Entrusted test results are only responsible for incoming samples. If there is any objection to the testing report, it shall be raised to the testing company within 15 days from the date of receiving the report. In the test results, "NA" means "not applicable", and the test items marked with "Δ" are subcontracted projects.

1.2 Test Facility

FCC (Designation number: CN1361, Test Firm Registration Number: 473156)

Hefei Panwin Technology Co., Ltd. has been listed on the US Federal Communications Commission list of test facilities recognized to perform measurements.

A2LA (Certificate Number: 6849.01)

Hefei Panwin Technology Co., Ltd. has been listed by American Association for Laboratory Accreditation to perform measurement.

1.3 Testing Laboratory

Company Name	Hefei Panwin Technology Co., Ltd.
Address	Floor 1, Zone E, Plant 2#, Mingzhu Industrial Park, No.106 Chuangxin Avenue, High-tech Zone, Hefei City, Anhui Province,China
Telephone	+86-0551-63811775
Post Code	230031

2 General Description of Equipment under Test

2.1 Details of Application

Applicant	Quectel Wireless Solutions Co., Ltd.
Applicant Address	Building 5, Shanghai Business Park Phase III (Area B), No.1016 Tianlin Road, Minhang District, Shanghai, China, 200233
Manufacturer	Quectel Wireless Solutions Co., Ltd.
Manufacturer Address	Building 5, Shanghai Business Park Phase III (Area B), No.1016 Tianlin Road, Minhang District, Shanghai, China, 200233

2.2 General Information

Product	Smart Module
Model	SG560D-WF
SN	1. P1Y23141B000037 2. P1Y23123V000012
Hardware Version	R1.1
Software Version	SG560DWFPARO2A04
Antenna Type	External Antenna
WLAN Mode Supported:	802.11a 802.11n 20M/40M 802.11ac 20M/40M/80M 802.11ax 20M/40M/80M/160M
Antenna Gain	5150MHz to 5250MHz: -0.67dBi (Ant0), -0.67dBi (Ant1) 5250MHz to 5350MHz: -0.19dBi(Ant0),-0.19dBi(Ant1) 5470MHz to 5725MHz: 1.28dBi (Ant0), 1.28dBi(Ant1) 5725MHz to 5850MHz: 1.10dBi(Ant0), 1.10dBi(Ant1)
Directional Gain	NA
Test Band	U-NII-1(5150MHz-5250MHz) U-NII-2A(5250MHz-5350MHz) U-NII-2C(5470MHz-5725MHz) U-NII-3(5725MHz-5850MHz)
Operating voltage range	Typical 4.0Vdc
Modulation Type	802.11a/n/ac/ax: OFDM, OFDMA
Note: The declared of product specification for EUT and/or Antenna presented in the report are provided by the manufacturer, and the manufacturer takes all the responsibilities for the accuracy of product specification.	

2.3 Applicable Standards

According to the specifications of the manufacturer, the EUT must comply with the requirements of the following standards:

- 47 CFR Part 15 Subpart E
- FCC KDB 789033 D02 General UN ll Test Procedures New Rules v02r01
- ANSI C63.10-2013

3 Test Condition

3.1 Test Configuration

Test mode

Pre-Scan has been conducted to determine the worst-case mode from all possible combinations between available modulations, data rates and antenna ports (if EUT with antenna diversity architecture). The worst cases were recorded in this report.

Radiated measurements are performed by rotating the EUT in three different orthogonal test planes (Z, X, Y axis), receiver antenna polarization (horizontal and vertical), the worst emission was found in Z position and the worst case was recorded.

3.2 Wireless Technology and Frequency Range

Wireless Technology	Bandwidth		Channel	Frequency
Wi-Fi	U-NII-1	20MHz	36	5180 MHz
			40	5200 MHz
			44	5220 MHz
			48	5240 MHz
		40MHz	38	5190 MHz
			46	5230 MHz
		80MHz	42	5210 MHz
	U-NII-2A	20MHz	52	5260 MHz
			56	5280 MHz
			60	5300 MHz
			64	5320 MHz
		40MHz	54	5270 MHz
			62	5310 MHz
		80MHz	58	5290 MHz
	U-NII-2C	20MHz	100	5500 MHz
			104	5520 MHz
			108	5540 MHz
			112	5560 MHz
			116	5580 MHz
			120	5600 MHz
			124	5620 MHz
			128	5640 MHz
			132	5660 MHz

			136	5680 MHz
			140	5700 MHz
			144	5720 MHz
		40MHz	102	5510 MHz
			110	5550 MHz
			118	5590 MHz
			126	5630 MHz
			134	5670 MHz
			142	5710 MHz
		80MHz	106	5530 MHz
			122	5610 MHz
			138	5690 MHz
	U-NII-3	20MHz	149	5180 MHz
			153	5200 MHz
			157	5220 MHz
			161	5240 MHz
			165	5825 MHz
		40MHz	151	5755 MHz
			159	5795 MHz
		80MHz	155	5775 MHz
Does this device support TPC function?		☑ Yes		☐ No
Does this device support TDWR band?		☑ Yes		☐ No

3.3 Equipment List

Instrument	Manufacturer	Model	Asset No.	Cal. Interval	Cal. Due Date
EMI Test Receiver	R&S	ESR7	PWB0023	1 Year	2024/10/11
Spectrum Analyzer	R&S	FSV3044	PWB0024	1 Year	2024/10/11
Loop Antenna	R&S	HFH2-Z2E	PWB0026	1 Year	2024/10/21
TRILOG Broadband Antenna	Schwarzbeck	VULB9162	PWB0029	1 Year	2024/10/14
Double-Ridged Guide Antenna	ETS-Lindgren	3117	PWB0031	1 Year	2024/10/12
k Type Horn Antenna	Steatite Antennas	QMS-00880	PWB0035	1 Year	2024/10/17
Spectrum Analyzer	KEYSIGHT	N9020B	PWC0055	1 Year	2024/10/11
DC Power	KEYSIGHT	E3640A	PWC0046	1 Year	2024/10/11
Anechoic Chamber	ETS.LINDGREN	Fact 3-2m	PWB0003	3 Years	2024/08/28
Shielded Chamber	Maorui	MR543	PWC0041	3 Years	2026/08/26
Pre-Amplifier	R&S	SCU18F	PWB0034	1 Year	2024/10/11
Pre-Amplifier	R&S	SCU40F1	PWB0036	1 Year	2024/10/11
Pre-Amplifier	COM-MW	DLNA8	PWB0094	1 Year	2024/11/08
Test Software	Tonseced	JS1120-3 V3.2.22	/	/	/
Test Software	R&S	ELEKTRA V4.20.2	/	/	/

3.4 Support Equipment List

Equipment	Manufacturer	Description	Model	Serial Number
EVB	QUECTEL	/	/	/
USB Cable	/	/	/	/
Adapter	Xiamen Xinsenhai Electronics Co., Ltd	Output:12V 60W	P60EB120500	/

3.5 Test Uncertainty

No.	Parameter	Uncertainty
1	Emission Bandwidth	1.9%
2	Occupied channel bandwidth	1.9%
3	Min emission bandwidth	1.9%
4	Unwanted Emissions Measurement	9kHz-7GHz: 1.21dB 7GHz-40GHz: 3.31dB
5	Temperature	3℃
6	Humidity	1.3 %
7	Supply voltages	0.006 V

4 Test Items Description

Ambient condition

Shielded Chamber

Temperature [°C]	20.4 to 25.6
Humidity [%RH]	29 to 40
Pressure [kPa]	100.8 to 102.7

Anechoic Chamber

Temperature [°C]	20.1 to 27.1
Humidity [%RH]	30 to 49
Pressure [kPa]	100.8 to 104.1

4.1 6dB and 26dB and 99% Occupied Bandwidth Measurement

4.1.1 6dB and 26dB and 99% Occupied Bandwidth Measurement

The minimum 6 dB bandwidth shall be at least 500 kHz

26dB and 99% Occupied bandwidth are reporting only.

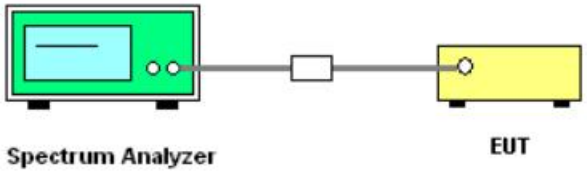
4.1.2 Measuring Instruments

The measuring equipment is listed in the section 3.3 of this test report.

4.1.3 Test Procedures

1. The testing follows FCC KDB 789033 D02 General UNII Test Procedures New Rules v02r01Section C) Emission bandwidth.
2. For 6dB BW, Set RBW = 100kHz.
   For 26dB BW, Set RBW = approximately 1% of the emission bandwidth.
   For 99% OBW, Set RBW = 1% to 5% of the OBW.
3. For 26dB BW. Set the VBW > RBW.
   For 6dB BW & 99% OBW. Set the VBW ≥ 3 × 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 measurements needed until the RBW/EBW ratio is approximately 1%.
7. For 99% Bandwidth Measurement, the spectrum analyzer's resolution bandwidth (RBW) is set1% to 5% of the OBW and set the Video bandwidth (VBW) ≥ 3* RBW.
8. Measure and record the results in the test report.

4.1.4 Test Setup



4.1.5 Test Results

See Appendix A.1.

4.2 Unwanted Emissions Measurement

This section is to measure unwanted emissions through radiated measurement for band edge spurious emissions and out of band emissions measurement.

4.2.1 Limit of Unwanted Emissions

(1) For transmitters operating in the 5150-5250 MHz band: all emissions outside of the 5150-5350 MHz band shall not exceed an EIRP of -27dBm/MHz.

For transmitters operating in the 5250-5350 MHz band: all emissions outside of the 5150-5350 MHz band shall not exceed an EIRP of-27 dBm/MHz. Devices operating in the 5250-5350 MHz band that generate emissions in the 5150-5250 MHz band must meet all applicable technical requirements for operation in the 5150-5250 MHz band (including indoor use) or alternatively meet an out-of-band emission EIRP limit of -27 dBm/MHz in the 5150-5250 MHz band.

For transmitters operating in the 5470-5725 MHz band: all emissions outside of the 5470-5725MHz band shall not exceed an EIRP of -27 dBm/MHz.

For transmitters operating in the 5.725-5.85 GHz band:
15.407(b)(4)(i) All emissions shall be limited to a level of -27 dBm/MHz at 75 MHz or more above or below the band edge increasing linearly to 10 dBm/MHz at 25 MHz above or below the band edge, and from 25 MHz above or below the band edge increasing linearly to a level of 15.6dBm/MHz at 5 MHz above or below the band edge, and from 5 MHz above or below the band edge increasing linearly to a level of 27 dBm/MHz at the band edge.

(2) Unwanted spurious emissions fallen in restricted bands shall comply with the general field strength limits as below table.

Frequency (MHz)	Field Strength (microvolts/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

EIRP (dBm)	Field Strength at 3m (dB μ V/m)
- 27	68.2

Note: The following formula is used to convert the EIRP to field strength.

$$EIRP = E_{Meas} + 20\log(d_{Meas}) - 104.7$$

where

EIRP is the equivalent isotropically radiated power, in dBm

E_{Meas} is the field strength of the emission at the measurement distance, in dBμV/m

d_{Meas} is the measurement distance, in m

4.2.2 Measuring Instruments

The measuring equipment is listed in the section 3.3 of this test report.

4.2.3 Test Procedures

1. The testing follows FCC KDB 789033 D02 General UNll Test Procedures New Rules v02r01 Section G) Unwanted emissions measurement.

   (1)Procedure for Unwanted Emissions Measurements Below 1000MHz
   - RBW = 120 kHz
   - VBW = 300 kHz
   - Detector = Peak
   - Trace mode = max hold

   (2)Procedure for Peak Unwanted Emissions Measurements Above 1000 MHz
   - RBW= 1 MHz
   - VBW ≥ 3 MHz
   - Detector = Peak
   - Sweep time = auto
   - Trace mode = max hold

   (3)Procedures for Average Unwanted Emissions Measurements Above 1000MHz
   - RBW = 1 MHz
   - VBW = 10 Hz, when duty cycle is no less than 98 percent
   - VBW ⩾ 1/T, when duty cycle is less than 98 percent where T is the minimum transmission duration over which the transmitter is on and is transmitting at its maximum power control level for the tested mode of operation.
2. The EUT was placed on a turntable with 0.8 meter for frequency below 1GHz and 1.5 meter for frequency above 1GHz respectively above ground.
3. The EUT was set 3 meters from the interference receiving antenna which was mounted on the top of a variable height antenna tower.

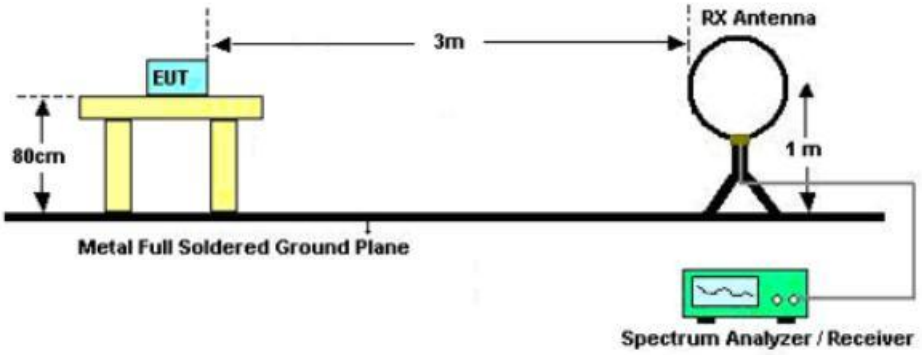
4.. The antenna is a broadband antenna and its height is adjusted between one meter and four.

meters above ground to find the maximum value of the field strength for both horizontal polarization and vertical polarization of the antenna.

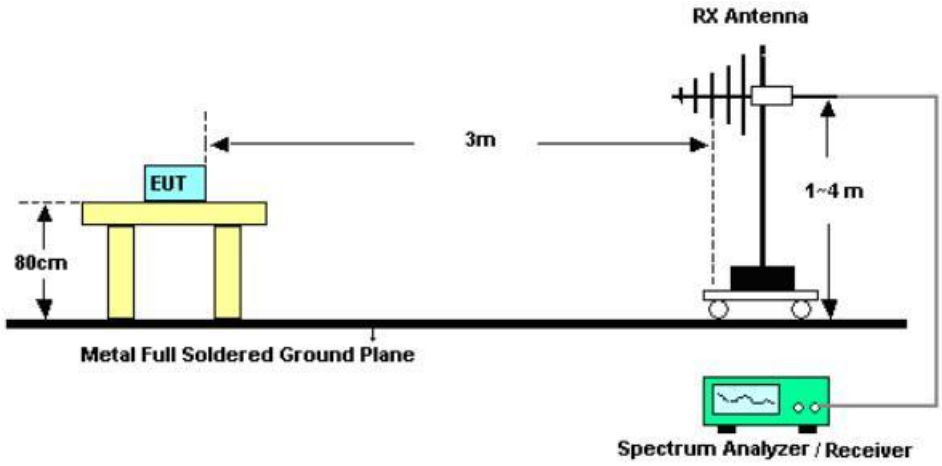
5. For each suspected emission, the EUT was arranged to its worst case and then adjust the antenna tower (from 1 m to 4 m) and turntable (from 0 degree to 360 degrees) to find the maximum reading.
6. For testing below 1GHz, if the emission level of the EUT in peak mode was 3 dB lower than the limit specified, then peak values of EUT will be reported, otherwise, the emissions will be repeated one by one using the CISPR quasi-peak method and reported.
7. For testing above 1GHz, the emission level of the EUT in peak mode was 20dB lower than peak limit (that means the emission level in average mode also complies with the limit in average mode), then peak values of EUT will be reported, otherwise, the emissions will be measured in average mode again and reported.

4.2.4 Test Setup

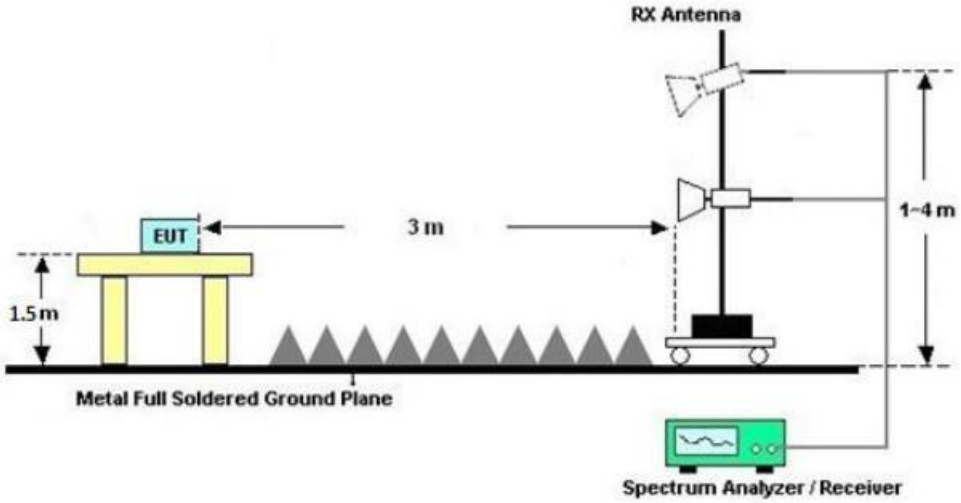
For radiated emissions below 30MHz



For radiated emissions from 30MHz to 1GHz



For radiated emissions above 1GHz



4.2.5Test Results of Radiated Spurious Emissions (9 kHz - 30 MHz)

The low frequency, which started from 9 kHz to 30MHz, was pre-scanned and the result which was 20dB lower than the limit line was not reported.

There is a comparison data of both open-field test site and semi-Anechoic chamber, and the result came out very similar.

4.2.6 Test Result of Radiated Spurious at Band Edges

Please refer to Appendix B.1.

4.2.7 Test Result of Radiated Spurious Emissions (30MHz - 10th Harmonic or 40GHz whichever is lower)

Please refer to Appendix B.1

4.3 Antenna Requirements

4.3.1 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.

4.3.2 Antenna Anti-Replacement Construction

An embedded-in antenna design is used.

4.3.3 Antenna Gain

The antenna peak gain of EUT is less than 6 dBi. Therefore, it is not necessary to reduce maximum peak output power limit.

Appendix A – Test Results of Conducted Test

A.1 6dB and 26dB and 99% Occupied Bandwidth Measurement

Test Result_26dB Bandwidth

Test Mode	Antenna	Frequency[MHz]	26db EBW [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
11A-CDD	Ant1	5180	18.760	5170.520	5189.280	---	---
11A-CDD	Ant2	5180	18.640	5170.840	5189.480	---	---
11A-CDD	Ant1	5220	18.760	5210.520	5229.280	---	---
11A-CDD	Ant2	5220	18.600	5210.680	5229.280	---	---
11A-CDD	Ant1	5240	18.760	5230.520	5249.280	---	---
11A-CDD	Ant2	5240	18.520	5230.720	5249.240	---	---
11A-CDD	Ant1	5260	19.280	5250.160	5269.440	---	---
11A-CDD	Ant2	5260	18.840	5250.600	5269.440	---	---
11A-CDD	Ant1	5300	18.760	5290.640	5309.400	---	---
11A-CDD	Ant2	5300	19.000	5290.560	5309.560	---	---
11A-CDD	Ant1	5320	18.440	5310.880	5329.320	---	---
11A-CDD	Ant2	5320	18.960	5310.640	5329.600	---	---
11A-CDD	Ant1	5500	18.800	5490.520	5509.320	---	---
11A-CDD	Ant2	5500	19.120	5490.360	5509.480	---	---
11A-CDD	Ant1	5580	18.600	5570.800	5589.400	---	---
11A-CDD	Ant2	5580	18.680	5570.800	5589.480	---	---
11A-CDD	Ant1	5700	18.800	5690.600	5709.400	---	---
11A-CDD	Ant2	5700	19.000	5690.680	5709.680	---	---
11A-CDD	Ant1	5745	19.120	5735.200	5754.320	---	---
11A-CDD	Ant2	5745	18.680	5735.640	5754.320	---	---
11A-CDD	Ant1	5785	18.520	5775.720	5794.240	---	---
11A-CDD	Ant2	5785	18.600	5775.640	5794.240	---	---
11A-CDD	Ant1	5825	18.920	5815.320	5834.240	---	---
11A-CDD	Ant2	5825	19.040	5815.440	5834.480	---	---
11N20MIMO	Ant1	5180	19.640	5170.200	5189.840	---	---
11N20MIMO	Ant2	5180	19.800	5170.040	5189.840	---	---
11N20MIMO	Ant1	5220	20.120	5209.960	5230.080	---	---
11N20MIMO	Ant2	5220	19.960	5210.000	5229.960	---	---
11N20MIMO	Ant1	5240	19.800	5230.120	5249.920	---	---
11N20MIMO	Ant2	5240	19.960	5230.080	5250.040	---	---
11N20MIMO	Ant1	5260	19.960	5249.720	5269.680	---	---
11N20MIMO	Ant2	5260	19.840	5249.920	5269.760	---	---
11N20MIMO	Ant1	5300	20.080	5289.880	5309.960	---	---

11N20MIMO	Ant2	5300	19.520	5290.280	5309.800	---	---
11N20MIMO	Ant1	5320	19.720	5310.240	5329.960	---	---
11N20MIMO	Ant2	5320	20.040	5310.080	5330.120	---	---
11N20MIMO	Ant1	5500	19.760	5490.080	5509.840	---	---
11N20MIMO	Ant2	5500	20.080	5489.840	5509.920	---	---
11N20MIMO	Ant1	5580	19.560	5570.280	5589.840	---	---
11N20MIMO	Ant2	5580	19.960	5570.040	5590.000	---	---
11N20MIMO	Ant1	5700	20.440	5689.760	5710.200	---	---
11N20MIMO	Ant2	5700	19.760	5690.040	5709.800	---	---
11N20MIMO	Ant1	5745	19.680	5735.160	5754.840	---	---
11N20MIMO	Ant2	5745	19.960	5734.960	5754.920	---	---
11N20MIMO	Ant1	5785	19.800	5775.120	5794.920	---	---
11N20MIMO	Ant2	5785	19.800	5774.960	5794.760	---	---
11N20MIMO	Ant1	5825	20.080	5815.200	5835.280	---	---
11N20MIMO	Ant2	5825	19.960	5814.960	5834.920	---	---
11N40MIMO	Ant1	5190	39.200	5170.640	5209.840	---	---
11N40MIMO	Ant2	5190	38.800	5170.640	5209.440	---	---
11N40MIMO	Ant1	5230	39.040	5210.480	5249.520	---	---
11N40MIMO	Ant2	5230	38.960	5210.480	5249.440	---	---
11N40MIMO	Ant1	5270	39.680	5250.240	5289.920	---	---
11N40MIMO	Ant2	5270	39.200	5250.320	5289.520	---	---
11N40MIMO	Ant1	5310	38.880	5290.560	5329.440	---	---
11N40MIMO	Ant2	5310	38.880	5290.720	5329.600	---	---
11N40MIMO	Ant1	5510	38.560	5490.880	5529.440	---	---
11N40MIMO	Ant2	5510	38.720	5490.560	5529.280	---	---
11N40MIMO	Ant1	5550	39.120	5530.480	5569.600	---	---
11N40MIMO	Ant2	5550	38.880	5530.640	5569.520	---	---
11N40MIMO	Ant1	5670	38.880	5650.560	5689.440	---	---
11N40MIMO	Ant2	5670	39.360	5650.240	5689.600	---	---
11N40MIMO	Ant1	5755	39.360	5735.320	5774.680	---	---
11N40MIMO	Ant2	5755	38.800	5735.720	5774.520	---	---
11N40MIMO	Ant1	5795	38.960	5775.560	5814.520	---	---
11N40MIMO	Ant2	5795	39.360	5775.160	5814.520	---	---
11AC20MIMO	Ant1	5180	19.880	5170.080	5189.960	---	---
11AC20MIMO	Ant2	5180	19.920	5170.120	5190.040	---	---
11AC20MIMO	Ant1	5220	19.600	5210.240	5229.840	---	---
11AC20MIMO	Ant2	5220	20.080	5210.000	5230.080	---	---
11AC20MIMO	Ant1	5240	19.760	5230.040	5249.800	---	---
11AC20MIMO	Ant2	5240	19.680	5230.200	5249.880	---	---

11AC20MIMO	Ant1	5260	20.040	5250.160	5270.200	---	---
11AC20MIMO	Ant2	5260	20.000	5249.960	5269.960	---	---
11AC20MIMO	Ant1	5300	19.720	5290.080	5309.800	---	---
11AC20MIMO	Ant2	5300	19.960	5290.040	5310.000	---	---
11AC20MIMO	Ant1	5320	19.920	5309.920	5329.840	---	---
11AC20MIMO	Ant2	5320	19.760	5310.080	5329.840	---	---
11AC20MIMO	Ant1	5500	19.640	5490.240	5509.880	---	---
11AC20MIMO	Ant2	5500	19.920	5490.080	5510.000	---	---
11AC20MIMO	Ant2	5580	20.240	5569.920	5590.160	---	---
11AC20MIMO	Ant1	5700	19.600	5690.240	5709.840	---	---
11AC20MIMO	Ant2	5700	20.280	5689.720	5710.000	---	---
11AC20MIMO	Ant1	5745	20.120	5735.000	5755.120	---	---
11AC20MIMO	Ant2	5745	20.240	5734.880	5755.120	---	---
11AC20MIMO	Ant1	5785	20.160	5774.960	5795.120	---	---
11AC20MIMO	Ant2	5785	19.920	5774.920	5794.840	---	---
11AC20MIMO	Ant1	5825	19.680	5815.240	5834.920	---	---
11AC20MIMO	Ant2	5825	19.960	5815.080	5835.040	---	---
11AC40MIMO	Ant1	5190	39.360	5170.400	5209.760	---	---
11AC40MIMO	Ant2	5190	38.880	5170.560	5209.440	---	---
11AC40MIMO	Ant1	5230	38.960	5210.400	5249.360	---	---
11AC40MIMO	Ant2	5230	38.960	5210.160	5249.120	---	---
11AC40MIMO	Ant1	5270	39.360	5250.240	5289.600	---	---
11AC40MIMO	Ant2	5270	39.200	5250.560	5289.760	---	---
11AC40MIMO	Ant1	5310	38.720	5290.640	5329.360	---	---
11AC40MIMO	Ant2	5310	39.040	5290.480	5329.520	---	---
11AC40MIMO	Ant1	5510	39.440	5490.080	5529.520	---	---
11AC40MIMO	Ant2	5510	39.280	5490.480	5529.760	---	---
11AC40MIMO	Ant1	5550	39.200	5530.560	5569.760	---	---
11AC40MIMO	Ant2	5550	38.960	5530.480	5569.440	---	---
11AC40MIMO	Ant1	5670	38.880	5650.480	5689.360	---	---
11AC40MIMO	Ant2	5670	38.800	5650.480	5689.280	---	---
11AC40MIMO	Ant1	5755	39.360	5735.400	5774.760	---	---
11AC40MIMO	Ant2	5755	39.520	5735.160	5774.680	---	---
11AC40MIMO	Ant1	5795	39.200	5775.560	5814.760	---	---
11AC40MIMO	Ant2	5795	39.200	5775.400	5814.600	---	---
11AC80MIMO	Ant1	5210	81.120	5169.360	5250.480	---	---
11AC80MIMO	Ant2	5210	80.480	5170.000	5250.480	---	---
11AC80MIMO	Ant1	5290	80.640	5249.840	5330.480	---	---
11AC80MIMO	Ant2	5290	80.320	5249.520	5329.840	---	---

11AC80MIMO	Ant1	5530	80.960	5489.680	5570.640	---	---
11AC80MIMO	Ant2	5530	79.840	5490.320	5570.160	---	---
11AC80MIMO	Ant1	5610	81.280	5569.040	5650.320	---	---
11AC80MIMO	Ant2	5610	80.160	5569.840	5650.000	---	---
11AC80MIMO	Ant1	5775	81.120	5734.520	5815.640	---	---
11AC80MIMO	Ant2	5775	81.120	5734.360	5815.480	---	---
11AX20MIMO	Ant1	5180	20.560	5169.600	5190.160	---	---
11AX20MIMO	Ant2	5180	20.520	5169.880	5190.400	---	---
11AX20MIMO	Ant1	5220	20.520	5209.600	5230.120	---	---
11AX20MIMO	Ant2	5220	20.360	5209.840	5230.200	---	---
11AX20MIMO	Ant1	5240	20.320	5229.720	5250.040	---	---
11AX20MIMO	Ant2	5240	20.880	5229.480	5250.360	---	---
11AX20MIMO	Ant1	5260	20.840	5249.640	5270.480	---	---
11AX20MIMO	Ant2	5260	20.520	5249.800	5270.320	---	---
11AX20MIMO	Ant1	5300	20.920	5289.800	5310.720	---	---
11AX20MIMO	Ant2	5300	20.440	5289.800	5310.240	---	---
11AX20MIMO	Ant1	5320	20.320	5309.920	5330.240	---	---
11AX20MIMO	Ant2	5320	20.480	5309.720	5330.200	---	---
11AX20MIMO	Ant1	5500	20.480	5489.840	5510.320	---	---
11AX20MIMO	Ant2	5500	20.360	5489.760	5510.120	---	---
11AX20MIMO	Ant1	5580	20.600	5569.720	5590.320	---	---
11AX20MIMO	Ant2	5580	21.000	5569.360	5590.360	---	---
11AX20MIMO	Ant1	5700	20.200	5689.840	5710.040	---	---
11AX20MIMO	Ant2	5700	20.200	5689.840	5710.040	---	---
11AX20MIMO	Ant1	5745	20.640	5734.520	5755.160	---	---
11AX20MIMO	Ant2	5745	20.880	5734.560	5755.440	---	---
11AX20MIMO	Ant1	5785	20.280	5774.880	5795.160	---	---
11AX20MIMO	Ant2	5785	20.520	5774.760	5795.280	---	---
11AX20MIMO	Ant1	5825	20.480	5814.800	5835.280	---	---
11AX20MIMO	Ant2	5825	21.000	5814.560	5835.560	---	---
11AX40MIMO	Ant1	5190	39.440	5170.160	5209.600	---	---
11AX40MIMO	Ant2	5190	39.600	5170.080	5209.680	---	---
11AX40MIMO	Ant1	5230	39.760	5210.080	5249.840	---	---
11AX40MIMO	Ant2	5230	40.160	5210.160	5250.320	---	---
11AX40MIMO	Ant1	5270	39.920	5250.080	5290.000	---	---
11AX40MIMO	Ant2	5270	39.600	5250.160	5289.760	---	---
11AX40MIMO	Ant1	5310	39.920	5290.000	5329.920	---	---
11AX40MIMO	Ant2	5310	39.920	5290.160	5330.080	---	---
11AX40MIMO	Ant1	5510	39.760	5490.000	5529.760	---	---

11AX40MIMO	Ant2	5510	40.080	5490.080	5530.160	---	---
11AX40MIMO	Ant1	5550	39.520	5530.240	5569.760	---	---
11AX40MIMO	Ant2	5550	39.920	5530.160	5570.080	---	---
11AX40MIMO	Ant1	5670	39.680	5650.160	5689.840	---	---
11AX40MIMO	Ant2	5670	40.160	5649.840	5690.000	---	---
11AX40MIMO	Ant1	5755	39.520	5735.240	5774.760	---	---
11AX40MIMO	Ant2	5755	40.080	5734.920	5775.000	---	---
11AX40MIMO	Ant1	5795	39.600	5775.320	5814.920	---	---
11AX40MIMO	Ant2	5795	39.840	5775.000	5814.840	---	---
11AX80MIMO	Ant1	5210	81.120	5169.200	5250.320	---	---
11AX80MIMO	Ant2	5210	81.280	5169.200	5250.480	---	---
11AX80MIMO	Ant1	5290	80.960	5249.680	5330.640	---	---
11AX80MIMO	Ant2	5290	82.080	5248.880	5330.960	---	---
11AX80MIMO	Ant1	5530	80.640	5489.520	5570.160	---	---
11AX80MIMO	Ant2	5530	81.120	5489.680	5570.800	---	---
11AX80MIMO	Ant1	5610	81.280	5569.200	5650.480	---	---
11AX80MIMO	Ant2	5610	81.760	5569.680	5651.440	---	---
11AX80MIMO	Ant1	5775	81.120	5734.840	5815.960	---	---
11AX80MIMO	Ant2	5775	80.640	5734.520	5815.160	---	---
11AX160MIMO	Ant1	5250	163.840	5169.040	5332.880	---	---
11AX160MIMO	Ant2	5250	163.200	5169.680	5332.880	---	---
11AX160MIMO	Ant1	5250_UNII-1	80.96	5169.040	5250	---	---
11AX160MIMO	Ant2	5250_UNII-1	80.32	5169.680	5250	---	---
11AX160MIMO	Ant1	5250_UNII-2A	82.88	5250	5332.880	---	---
11AX160MIMO	Ant2	5250_UNII-2A	82.88	5250	5332.880	---	---
11AX160MIMO	Ant1	5570	163.200	5488.720	5651.920	---	---
11AX160MIMO	Ant2	5570	161.280	5489.360	5650.640	---	---

Test Result_6dB Bandwidth

Test Mode	Antenna	Frequency[MHz]	6db EBW [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
11A-CDD	Ant1	5745	16.280	5736.840	5753.120	0.5	PASS
11A-CDD	Ant2	5745	16.400	5736.760	5753.160	0.5	PASS
11A-CDD	Ant1	5785	16.400	5776.760	5793.160	0.5	PASS
11A-CDD	Ant2	5785	16.320	5776.800	5793.120	0.5	PASS
11A-CDD	Ant1	5825	16.320	5816.800	5833.120	0.5	PASS
11A-CDD	Ant2	5825	16.320	5816.800	5833.120	0.5	PASS
11N20MIMO	Ant1	5745	17.280	5736.440	5753.720	0.5	PASS
11N20MIMO	Ant2	5745	17.600	5736.160	5753.760	0.5	PASS
11N20MIMO	Ant1	5785	16.760	5776.600	5793.360	0.5	PASS

11N20MIMO	Ant2	5785	17.560	5776.160	5793.720	0.5	PASS
11N20MIMO	Ant1	5825	17.560	5816.200	5833.760	0.5	PASS
11N20MIMO	Ant2	5825	16.640	5816.480	5833.120	0.5	PASS
11N40MIMO	Ant1	5755	36.400	5736.760	5773.160	0.5	PASS
11N40MIMO	Ant2	5755	36.000	5737.080	5773.080	0.5	PASS
11N40MIMO	Ant1	5795	36.240	5776.840	5813.080	0.5	PASS
11N40MIMO	Ant2	5795	36.320	5776.760	5813.080	0.5	PASS
11AC20MIMO	Ant1	5745	17.600	5736.160	5753.760	0.5	PASS
11AC20MIMO	Ant2	5745	16.640	5736.720	5753.360	0.5	PASS
11AC20MIMO	Ant1	5785	17.640	5776.160	5793.800	0.5	PASS
11AC20MIMO	Ant2	5785	17.560	5776.200	5793.760	0.5	PASS
11AC20MIMO	Ant1	5825	17.400	5816.360	5833.760	0.5	PASS
11AC20MIMO	Ant2	5825	17.520	5816.200	5833.720	0.5	PASS
11AC40MIMO	Ant1	5755	36.400	5736.760	5773.160	0.5	PASS
11AC40MIMO	Ant2	5755	36.240	5736.840	5773.080	0.5	PASS
11AC40MIMO	Ant1	5795	36.320	5776.840	5813.160	0.5	PASS
11AC40MIMO	Ant2	5795	36.000	5776.840	5812.840	0.5	PASS
11AC80SISO	Ant1	5775	74.880	5737.560	5812.440	0.5	PASS
11AC80SISO	Ant2	5775	75.520	5737.240	5812.760	0.5	PASS
11AC80MIMO	Ant1	5775	70.560	5741.240	5811.800	0.5	PASS
11AC80MIMO	Ant2	5775	73.760	5738.040	5811.800	0.5	PASS
11AX20MIMO	Ant1	5745	18.360	5735.480	5753.840	0.5	PASS
11AX20MIMO	Ant2	5745	18.840	5735.560	5754.400	0.5	PASS
11AX20MIMO	Ant1	5785	18.120	5775.720	5793.840	0.5	PASS
11AX20MIMO	Ant2	5785	18.960	5775.480	5794.440	0.5	PASS
11AX20MIMO	Ant1	5825	18.920	5815.520	5834.440	0.5	PASS
11AX20MIMO	Ant2	5825	18.960	5815.480	5834.440	0.5	PASS
11AX40MIMO	Ant1	5755	35.360	5737.320	5772.680	0.5	PASS
11AX40MIMO	Ant2	5755	37.760	5736.120	5773.880	0.5	PASS
11AX40MIMO	Ant1	5795	36.880	5776.760	5813.640	0.5	PASS
11AX40MIMO	Ant2	5795	37.760	5776.040	5813.800	0.5	PASS
11AX80MIMO	Ant1	5775	77.120	5736.760	5813.880	0.5	PASS
11AX80MIMO	Ant2	5775	77.280	5736.280	5813.560	0.5	PASS

Test Result_99% Bandwidth

Test Mode	Antenna	Frequency[MHz]	OCB [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
11A-CDD	Ant1	5180	16.522	5171.7297	5188.2517	---	---
11A-CDD	Ant2	5180	16.524	5171.7423	5188.2663	---	---
11A-CDD	Ant1	5220	16.470	5211.7304	5228.2004	---	---

11A-CDD	Ant2	5220	16.495	5211.7422	5228.2372	---	---
11A-CDD	Ant1	5240	16.544	5231.6888	5248.2328	---	---
11A-CDD	Ant2	5240	16.473	5231.7328	5248.2058	---	---
11A-CDD	Ant1	5260	16.572	5251.6710	5268.2430	---	---
11A-CDD	Ant2	5260	16.478	5251.7703	5268.2483	---	---
11A-CDD	Ant1	5300	16.564	5291.6789	5308.2429	---	---
11A-CDD	Ant2	5300	16.528	5291.7140	5308.2420	---	---
11A-CDD	Ant1	5320	16.530	5311.7030	5328.2330	---	---
11A-CDD	Ant2	5320	16.528	5311.7131	5328.2411	---	---
11A-CDD	Ant1	5500	16.517	5491.7053	5508.2223	---	---
11A-CDD	Ant2	5500	16.550	5491.7004	5508.2504	---	---
11A-CDD	Ant1	5580	16.599	5571.6750	5588.2740	---	---
11A-CDD	Ant2	5580	16.519	5571.7188	5588.2378	---	---
11A-CDD	Ant1	5700	16.526	5691.7030	5708.2290	---	---
11A-CDD	Ant2	5700	16.464	5691.7225	5708.1865	---	---
11A-CDD	Ant1	5745	16.559	5736.6880	5753.2470	---	---
11A-CDD	Ant2	5745	16.532	5736.6951	5753.2271	---	---
11A-CDD	Ant1	5785	16.553	5776.6946	5793.2476	---	---
11A-CDD	Ant2	5785	16.489	5776.7342	5793.2232	---	---
11A-CDD	Ant1	5825	16.508	5816.7105	5833.2185	---	---
11A-CDD	Ant2	5825	16.503	5816.7353	5833.2383	---	---
11N20MIMO	Ant1	5180	17.689	5171.1640	5188.8530	---	---
11N20MIMO	Ant2	5180	17.669	5171.1391	5188.8081	---	---
11N20MIMO	Ant1	5220	17.730	5211.0815	5228.8115	---	---
11N20MIMO	Ant2	5220	17.696	5211.1172	5228.8132	---	---
11N20MIMO	Ant1	5240	17.658	5231.1176	5248.7756	---	---
11N20MIMO	Ant2	5240	17.724	5231.1231	5248.8471	---	---
11N20MIMO	Ant1	5260	17.649	5251.1134	5268.7624	---	---
11N20MIMO	Ant2	5260	17.683	5251.1288	5268.8118	---	---
11N20MIMO	Ant1	5300	17.670	5291.1282	5308.7982	---	---
11N20MIMO	Ant2	5300	17.673	5291.1469	5308.8199	---	---
11N20MIMO	Ant1	5320	17.660	5311.1300	5328.7900	---	---
11N20MIMO	Ant2	5320	17.704	5311.1319	5328.8359	---	---
11N20MIMO	Ant1	5500	17.666	5491.1444	5508.8104	---	---
11N20MIMO	Ant2	5500	17.714	5491.1152	5508.8292	---	---
11N20MIMO	Ant1	5580	17.619	5571.1566	5588.7756	---	---
11N20MIMO	Ant2	5580	17.671	5571.1457	5588.8167	---	---
11N20MIMO	Ant1	5700	17.669	5691.1404	5708.8094	---	---
11N20MIMO	Ant2	5700	17.730	5691.0787	5708.8087	---	---

11N20MIMO	Ant1	5745	17.677	5736.1264	5753.8034	---	---
11N20MIMO	Ant2	5745	17.723	5736.0994	5753.8224	---	---
11N20MIMO	Ant1	5785	17.620	5776.1848	5793.8048	---	---
11N20MIMO	Ant2	5785	17.705	5776.1093	5793.8143	---	---
11N20MIMO	Ant1	5825	17.663	5816.1662	5833.8292	---	---
11N20MIMO	Ant2	5825	17.703	5816.1170	5833.8200	---	---
11N40MIMO	Ant1	5190	36.110	5171.9179	5208.0279	---	---
11N40MIMO	Ant2	5190	36.197	5171.9175	5208.1145	---	---
11N40MIMO	Ant1	5230	36.151	5211.8821	5248.0331	---	---
11N40MIMO	Ant2	5230	36.203	5211.9061	5248.1091	---	---
11N40MIMO	Ant1	5270	36.179	5251.8600	5288.0390	---	---
11N40MIMO	Ant2	5270	36.153	5251.9025	5288.0555	---	---
11N40MIMO	Ant1	5310	36.183	5291.8610	5328.0440	---	---
11N40MIMO	Ant2	5310	36.186	5291.9383	5328.1243	---	---
11N40MIMO	Ant1	5510	36.190	5491.8757	5528.0657	---	---
11N40MIMO	Ant2	5510	36.174	5491.9151	5528.0891	---	---
11N40MIMO	Ant1	5550	36.090	5531.9383	5568.0283	---	---
11N40MIMO	Ant2	5550	36.183	5531.8892	5568.0722	---	---
11N40MIMO	Ant1	5670	36.082	5651.9630	5688.0450	---	---
11N40MIMO	Ant2	5670	36.233	5651.8697	5688.1027	---	---
11N40MIMO	Ant1	5755	36.127	5736.9408	5773.0678	---	---
11N40MIMO	Ant2	5755	36.231	5736.8520	5773.0830	---	---
11N40MIMO	Ant1	5795	36.145	5776.9205	5813.0655	---	---
11N40MIMO	Ant2	5795	36.178	5776.8804	5813.0584	---	---
11AC20MIMO	Ant1	5180	17.709	5171.1000	5188.8090	---	---
11AC20MIMO	Ant2	5180	17.711	5171.1069	5188.8179	---	---
11AC20MIMO	Ant1	5220	17.694	5211.1228	5228.8168	---	---
11AC20MIMO	Ant2	5220	17.706	5211.1329	5228.8389	---	---
11AC20MIMO	Ant1	5240	17.701	5231.0763	5248.7773	---	---
11AC20MIMO	Ant2	5240	17.683	5231.1588	5248.8418	---	---
11AC20MIMO	Ant1	5260	17.681	5251.0902	5268.7712	---	---
11AC20MIMO	Ant2	5260	17.722	5251.1149	5268.8369	---	---
11AC20MIMO	Ant1	5300	17.623	5291.1660	5308.7890	---	---
11AC20MIMO	Ant2	5300	17.742	5291.0920	5308.8340	---	---
11AC20MIMO	Ant1	5320	17.602	5311.1750	5328.7770	---	---
11AC20MIMO	Ant2	5320	17.675	5311.1376	5328.8126	---	---
11AC20MIMO	Ant1	5500	17.693	5491.1377	5508.8307	---	---
11AC20MIMO	Ant2	5500	17.714	5491.1125	5508.8265	---	---
11AC20MIMO	Ant2	5580	17.693	5571.1226	5588.8156	---	---

11AC20MIMO	Ant1	5700	17.661	5691.1434	5708.8044	---	---
11AC20MIMO	Ant2	5700	17.664	5691.1443	5708.8083	---	---
11AC20MIMO	Ant1	5745	17.654	5736.1526	5753.8066	---	---
11AC20MIMO	Ant2	5745	17.690	5736.1154	5753.8054	---	---
11AC20MIMO	Ant1	5785	17.636	5776.1730	5793.8090	---	---
11AC20MIMO	Ant2	5785	17.710	5776.0996	5793.8096	---	---
11AC20MIMO	Ant1	5825	17.678	5816.1881	5833.8661	---	---
11AC20MIMO	Ant2	5825	17.658	5816.1201	5833.7781	---	---
11AC40MIMO	Ant1	5190	36.143	5171.9205	5208.0635	---	---
11AC40MIMO	Ant2	5190	36.236	5171.9076	5208.1436	---	---
11AC40MIMO	Ant1	5230	36.203	5211.8548	5248.0578	---	---
11AC40MIMO	Ant2	5230	36.160	5211.9169	5248.0769	---	---
11AC40MIMO	Ant1	5270	36.191	5251.8607	5288.0517	---	---
11AC40MIMO	Ant2	5270	36.186	5251.9057	5288.0917	---	---
11AC40MIMO	Ant1	5310	36.148	5291.9087	5328.0567	---	---
11AC40MIMO	Ant2	5310	36.149	5291.9232	5328.0722	---	---
11AC40MIMO	Ant1	5510	36.157	5491.9348	5528.0918	---	---
11AC40MIMO	Ant2	5510	36.218	5491.8758	5528.0938	---	---
11AC40MIMO	Ant1	5550	36.176	5531.8943	5568.0703	---	---
11AC40MIMO	Ant2	5550	36.114	5531.8977	5568.0117	---	---
11AC40MIMO	Ant1	5670	36.163	5651.9144	5688.0774	---	---
11AC40MIMO	Ant2	5670	36.162	5651.8915	5688.0535	---	---
11AC40MIMO	Ant1	5755	36.170	5736.9134	5773.0834	---	---
11AC40MIMO	Ant2	5755	36.240	5736.8195	5773.0595	---	---
11AC40MIMO	Ant1	5795	36.205	5776.9322	5813.1372	---	---
11AC40MIMO	Ant2	5795	36.137	5776.9226	5813.0596	---	---
11AC80MIMO	Ant1	5210	75.563	5172.3398	5247.9028	---	---
11AC80MIMO	Ant2	5210	75.450	5172.3932	5247.8432	---	---
11AC80MIMO	Ant1	5290	75.657	5252.1867	5327.8437	---	---
11AC80MIMO	Ant2	5290	75.638	5252.2987	5327.9367	---	---
11AC80MIMO	Ant1	5530	75.652	5492.2185	5567.8705	---	---
11AC80MIMO	Ant2	5530	75.736	5492.1552	5567.8912	---	---
11AC80MIMO	Ant1	5610	75.566	5572.3260	5647.8920	---	---
11AC80MIMO	Ant2	5610	75.637	5572.2706	5647.9076	---	---
11AC80MIMO	Ant1	5775	75.697	5737.2607	5812.9577	---	---
11AC80MIMO	Ant2	5775	75.705	5737.0337	5812.7387	---	---
11AX20MIMO	Ant1	5180	18.955	5170.5046	5189.4596	---	---
11AX20MIMO	Ant2	5180	19.022	5170.4641	5189.4861	---	---
11AX20MIMO	Ant1	5220	18.962	5210.4819	5229.4439	---	---

11AX20MIMO	Ant2	5220	19.016	5210.4682	5229.4842	---	---
11AX20MIMO	Ant1	5240	18.913	5230.4954	5249.4084	---	---
11AX20MIMO	Ant2	5240	18.974	5230.4862	5249.4602	---	---
11AX20MIMO	Ant1	5260	18.952	5250.4703	5269.4223	---	---
11AX20MIMO	Ant2	5260	19.006	5250.4983	5269.5043	---	---
11AX20MIMO	Ant1	5300	18.963	5290.4830	5309.4460	---	---
11AX20MIMO	Ant2	5300	18.983	5290.4918	5309.4748	---	---
11AX20MIMO	Ant1	5320	18.969	5310.4767	5329.4457	---	---
11AX20MIMO	Ant2	5320	18.969	5310.4916	5329.4606	---	---
11AX20MIMO	Ant1	5500	18.929	5490.4934	5509.4224	---	---
11AX20MIMO	Ant2	5500	18.980	5490.4642	5509.4442	---	---
11AX20MIMO	Ant1	5580	18.908	5570.4974	5589.4054	---	---
11AX20MIMO	Ant2	5580	19.018	5570.4629	5589.4809	---	---
11AX20MIMO	Ant1	5700	18.935	5690.4815	5709.4165	---	---
11AX20MIMO	Ant2	5700	18.972	5690.4978	5709.4698	---	---
11AX20MIMO	Ant1	5745	18.877	5735.5423	5754.4193	---	---
11AX20MIMO	Ant2	5745	18.969	5735.4940	5754.4630	---	---
11AX20MIMO	Ant1	5785	18.867	5775.5609	5794.4279	---	---
11AX20MIMO	Ant2	5785	19.021	5775.4689	5794.4899	---	---
11AX20MIMO	Ant1	5825	18.966	5815.4816	5834.4476	---	---
11AX20MIMO	Ant2	5825	18.971	5815.4919	5834.4629	---	---
11AX40MIMO	Ant1	5190	37.798	5171.0891	5208.8871	---	---
11AX40MIMO	Ant2	5190	37.942	5171.0717	5209.0137	---	---
11AX40MIMO	Ant1	5230	37.859	5210.9247	5248.7837	---	---
11AX40MIMO	Ant2	5230	37.936	5211.0165	5248.9525	---	---
11AX40MIMO	Ant1	5270	37.789	5250.9994	5288.7884	---	---
11AX40MIMO	Ant2	5270	37.908	5251.0138	5288.9218	---	---
11AX40MIMO	Ant1	5310	37.694	5291.1164	5328.8104	---	---
11AX40MIMO	Ant2	5310	37.766	5291.0923	5328.8583	---	---
11AX40MIMO	Ant1	5510	37.751	5491.1117	5528.8627	---	---
11AX40MIMO	Ant2	5510	37.864	5490.9847	5528.8487	---	---
11AX40MIMO	Ant1	5550	37.750	5531.1306	5568.8806	---	---
11AX40MIMO	Ant2	5550	37.904	5531.0106	5568.9146	---	---
11AX40MIMO	Ant1	5670	37.715	5651.1078	5688.8228	---	---
11AX40MIMO	Ant2	5670	37.872	5651.0339	5688.9059	---	---
11AX40MIMO	Ant1	5755	37.716	5736.1336	5773.8496	---	---
11AX40MIMO	Ant2	5755	37.822	5736.0576	5773.8796	---	---
11AX40MIMO	Ant1	5795	37.775	5776.1024	5813.8774	---	---
11AX40MIMO	Ant2	5795	37.797	5776.0167	5813.8137	---	---

11AX80MIMO	Ant1	5210	77.054	5171.4326	5248.4866	---	---
11AX80MIMO	Ant2	5210	77.343	5171.4599	5248.8029	---	---
11AX80MIMO	Ant1	5290	77.449	5251.2444	5328.6934	---	---
11AX80MIMO	Ant2	5290	77.425	5251.3457	5328.7707	---	---
11AX80MIMO	Ant1	5530	77.382	5491.3475	5568.7295	---	---
11AX80MIMO	Ant2	5530	77.365	5491.4215	5568.7865	---	---
11AX80MIMO	Ant1	5610	77.319	5571.4386	5648.7576	---	---
11AX80MIMO	Ant2	5610	77.428	5571.3671	5648.7951	---	---
11AX80MIMO	Ant1	5775	77.292	5736.5022	5813.7942	---	---
11AX80MIMO	Ant2	5775	77.292	5736.2996	5813.5916	---	---
11AX160MIMO	Ant1	5250	156.51	5172.1388	5328.6488	---	---
11AX160MIMO	Ant2	5250	156.36	5172.2949	5328.6549	---	---
11AX160MIMO	Ant1	5250_UNII-1	77.861	5172.1388	5250	---	---
11AX160MIMO	Ant2	5250_UNII-1	77.705	5172.2949	5250	---	---
11AX160MIMO	Ant1	5250_UNII-2A	78.649	5250	5328.6488	---	---
11AX160MIMO	Ant2	5250_UNII-2A	78.655	5250	5328.6549	---	---
11AX160MIMO	Ant1	5570	156.62	5492.1819	5648.8019	---	---
11AX160MIMO	Ant2	5570	156.65	5491.9280	5648.5780	---	---

Test Graphs

26dB Occupied Bandwidth

11A-CDD-Ant1-5180	11A-CDD-Ant2-5180
	
11A-CDD-Ant1-5220	11A-CDD-Ant2-5220
	
11A-CDD-Ant1-5240	11A-CDD-Ant2-5240
	

11A-CDD-Ant1-5260	11A-CDD-Ant2-5260
	
11A-CDD-Ant1-5300	11A-CDD-Ant2-5300
	
11A-CDD-Ant1-5320	11A-CDD-Ant2-5320
	
11A-CDD-Ant1-5500	11A-CDD-Ant2-5500
	

11A-CDD-Ant1-5580	11A-CDD-Ant2-5580
	
11A-CDD-Ant1-5700	11A-CDD-Ant2-5700
	
11A-CDD-Ant1-5745	11A-CDD-Ant2-5745
	
11A-CDD-Ant1-5785	11A-CDD-Ant2-5785
	

11A-CDD-Ant1-5825	11A-CDD-Ant2-5825
	
11N20MIMO-Ant1-5180	11N20MIMO-Ant2-5180
	
11N20MIMO-Ant1-5220	11N20MIMO-Ant2-5220
	
11N20MIMO-Ant1-5240	11N20MIMO-Ant2-5240
	

11N20MIMO-Ant1-5260	11N20MIMO-Ant2-5260
	
11N20MIMO-Ant1-5300	11N20MIMO-Ant2-5300
	
11N20MIMO-Ant1-5320	11N20MIMO-Ant2-5320
	
11N20MIMO-Ant1-5500	11N20MIMO-Ant2-5500
	

11N20MIMO-Ant1-5580	11N20MIMO-Ant2-5580
	
11N20MIMO-Ant1-5700	11N20MIMO-Ant2-5700
	
11N20MIMO-Ant1-5745	11N20MIMO-Ant2-5745
	
11N20MIMO-Ant1-5785	11N20MIMO-Ant2-5785
	

11N20MIMO-Ant1-5825	11N20MIMO-Ant2-5825
	
11N40MIMO-Ant1-5190	11N40MIMO-Ant2-5190
	
11N40MIMO-Ant1-5230	11N40MIMO-Ant2-5230
	
11N40MIMO-Ant1-5270	11N40MIMO-Ant2-5270
	

11N40MIMO-Ant1-5310	11N40MIMO-Ant2-5310
	
11N40MIMO-Ant1-5510	11N40MIMO-Ant2-5510
	
11N40MIMO-Ant1-5550	11N40MIMO-Ant2-5550
	
11N40MIMO-Ant1-5670	11N40MIMO-Ant2-5670
	

11N40MIMO-Ant1-5755	11N40MIMO-Ant2-5755
	
11N40MIMO-Ant1-5795	11N40MIMO-Ant2-5795
	
11AC20MIMO-Ant1-5180	11AC20MIMO-Ant2-5180
	
11AC20MIMO-Ant1-5220	11AC20MIMO-Ant2-5220
	

11AC20MIMO-Ant1-5240	11AC20MIMO-Ant2-5240
	
11AC20MIMO-Ant1-5260	11AC20MIMO-Ant2-5260
	
11AC20MIMO-Ant1-5300	11AC20MIMO-Ant2-5300
	
11AC20MIMO-Ant1-5320	11AC20MIMO-Ant2-5320
	

11AC20MIMO-Ant1-5500	11AC20MIMO-Ant2-5500
	
11AC20MIMO-Ant2-5580	11AC20MIMO-Ant1-5700
	
11AC20MIMO-Ant2-5700	11AC20MIMO-Ant1-5745
	
11AC20MIMO-Ant2-5745	11AC20MIMO-Ant1-5785
	

11AC20MIMO-Ant2-5785	11AC20MIMO-Ant1-5825
	
11AC20MIMO-Ant2-5825	11AC40MIMO-Ant1-5190
	
11AC40MIMO-Ant2-5190	11AC40MIMO-Ant1-5230
	
11AC40MIMO-Ant2-5230	11AC40MIMO-Ant1-5270
	

11AC40MIMO-Ant2-5270	11AC40MIMO-Ant1-5310
	
11AC40MIMO-Ant2-5310	11AC40MIMO-Ant1-5510
	
11AC40MIMO-Ant2-5510	11AC40MIMO-Ant1-5550
	
11AC40MIMO-Ant2-5550	11AC40MIMO-Ant1-5670
	

11AC40MIMO-Ant2-5670	11AC40MIMO-Ant1-5755
	
11AC40MIMO-Ant2-5755	11AC40MIMO-Ant1-5795
	
11AC40MIMO-Ant2-5795	11AC80MIMO-Ant1-5210
	
11AC80MIMO-Ant2-5210	11AC80MIMO-Ant1-5290
	

11AC80MIMO-Ant2-5290	11AC80MIMO-Ant1-5530
	
11AC80MIMO-Ant2-5530	11AC80MIMO-Ant1-5610
	
11AC80MIMO-Ant2-5610	11AC80MIMO-Ant1-5775
	
11AC80MIMO-Ant2-5775	11AX20MIMO-Ant1-5180