Certificate #7130.01

FCC Radio Test Report

FCC ID: 2A3BD-OSRDP01

This report concerns: Class II Permissive Change

Project No.	:	2403C222A
Equipment	:	AI Service Robot
Brand Name	:	ORIONSTAR
Test Model	:	OS-R-DP01
Series Model	:	N/A
Applicant	:	Beijing Orion Star Technology Co., Ltd
Address	:	Room A-2570, 2nd Floor, No. 30, Shixing Street, Shijingshan District, Beijing, P.R. China
Manufacturer	:	Beijing Orion Star Technology Co., Ltd
Address	:	Room A-2570, 2nd Floor, No. 30, Shixing Street, Shijingshan District, Beijing, P.R. China
Factory	:	Guangdong Mingji Hi-Tech Electronics Co.,Ltd
Address	:	No.12 Changfu Road,Qinghutou,Tangxia Town,Dongguan,Guangdong, China
Date of Receipt	:	May 16, 2024
Date of Test	:	Jun. 11, 2024 ~ Jul. 25, 2024
Issued Date	:	Aug. 12, 2024
Report Version	:	R00
Test Sample	:	Engineering Sample No.: DG20240516219-3 for output power, DG20240516219 for other items.
Standard(s)	:	FCC CFR Title 47, Part 15, Subpart E

The above equipment has been tested and found compliance with the requirement of the relative standards by BTL Inc.

Prepared by : Sheldon Ou

Sheldon Ou

Approved by : Chay Cai

Chay Cai

Room 108, Building 2, No.1, Yile Road, Songshan Lake Zone, Dongguan City, Guangdong, People's Republic of China

Tel: +86-769-8318-3000 Web: www.newbtl.com Service mail: btl_qa@newbtl.com

Declaration

BTL represents to the client that testing is done in accordance with standard procedures as applicable and that test instruments used has been calibrated with standards traceable to international standard(s) and/or national standard(s).

BTL's reports apply only to the specific samples tested under conditions. It is manufacture's responsibility to ensure that additional production units of this model are manufactured with the identical electrical and mechanical components. BTL assumes no responsibility for the data provided by the customer, any statements, inferences or generalizations drawn by the customer or others from the reports issued by BTL.

The report must not be used by the client to claim product certification, approval, or endorsement by A2LA or any agency of the U.S. Government.

This report is the confidential property of the client. As a mutual protection to the clients, the public and ourselves, the test report shall not be reproduced, except in full, without our written approval.

BTL's laboratory quality assurance procedures are in compliance with the ISO/IEC 17025: 2017 requirements, and accredited by the conformity assessment authorities listed in this test report.

BTL is not responsible for the sampling stage, so the results only apply to the sample as received.

The information, data and test plan are provided by manufacturer which may affect the validity of results, so it is manufacturer's responsibility to ensure that the apparatus meets the essential requirements of applied standards and in all the possible configurations as representative of its intended use.

Limitation

For the use of the authority's logo is limited unless the Test Standard(s)/Scope(s)/Item(s) mentioned in this test report is (are) included in the conformity assessment authorities acceptance respective.
Please note that the measurement uncertainty is provided for informational purpose only and are not use in determining the Pass/Fail results.

Table of Contents Page

Table of Contents Page

REPORT ISSUED HISTORY

Report No.	Version	Description	Issued Date	Note
BTL-FCCP-2-2403C222A	R00	Original Report.	Jul. 31, 2024	Invalid
BTL-FCCP-2-2403C222A	R01	Modified the calculation of Directional gain.	Aug. 12, 2024	Valid

1. APPLICABLE STANDARDS

According to the specifications of the manufacturer, the EUT must comply with the requirements of the following standards:
ANSI C63.10-2013
The following reference test guidance is not within the scope of accreditation of A2LA:
KDB 789033 D02 General UNII Test Procedures New Rules v02r01
KDB 662911 D01 Multiple Transmitter Output v02r01

2. SUMMARY OF TEST RESULTS

Test procedures according to the technical standard(s):

FCC CFR Title 47, Part 15, Subpart E				
Standard(s) Section	**Test Item**	**Test Result**	**Judgment**	**Remark**
15.207 15.407(b)	AC Power Line Conducted Emissions	APPENDIX A	PASS	------
15.407(b) 15.205(a) 15.209(a)	Radiated Emissions	APPENDIX B APPENDIX C APPENDIX D	PASS	------
15.407(a) 15.407(e)	Bandwidth	------	PASS	------
15.407(a)	Maximum Output Power	APPENDIX E	PASS	------
15.407(a)	Power Spectral Density	------	PASS	------
15.407(g)	Frequency Stability	------	PASS	------
15.203	Antenna Requirements	------	PASS	**NOTE (2)**
15.407(c)	Automatically Discontinue Transmission	------	PASS	**NOTE (3)**

Note:
(1) "N/A" denotes test is not applicable in this test report.
(2) The device what use a permanently attached antenna were considered sufficient to comply with the provisions of 15.203.
(3) During no any information transmission, the EUT can automatically discontinue transmission and become standby mode for power saving. the EUT can detect the controlling signal of ACK message transmitting from remote device and verify whether it shall resend or discontinue transmission.
(4) For UNII-1 this device was functioned as a
☐ Outdoor access point device
☐ Indoor access point device
☐ Fixed point-to-point access points device
☒ Client device
(5) The RF module of this AI Service Robot has been tested and certified. Please refer to the module report as listed in the below table for the test results of the RF module.

RF Module Model	Module Function	Report Number	Standard
Thundersoft TurboX D845 SOM	WLAN 2.4G	RSZ181105003-00C	FCC PART 15.247
	RLAN 5G	RSZ181105003-00A	FCC PART 15.407

Thus, only the ac power line conducted emissions, radiated spurious emissions and output power were evaluated and recorded in this report. For the test results of all other test items please refer to above module test report.

2.1 TEST FACILITY

The test facilities used to collect the test data in this report is at the location of No.3, Jinshagang 1st Road, Dalang, Dongguan City, Guangdong People's Republic of China.
BTL's Registration Number for FCC: 747969
BTL's Designation Number for FCC: CN1377

2.2 MEASUREMENT UNCERTAINTY

ISO/IEC 17025 requires that an estimate of the measurement uncertainties associated with the emissions test results be included in the report. The measurement uncertainties given below are based on a 95% confidence level (based on a coverage factor (k=2))
The BTL measurement uncertainty as below table:

A. AC power line conducted emissions test:

Test Site	Method	Measurement Frequency Range	*U*,(dB)
DG-C02	CISPR	150kHz ~ 30MHz	2.88

B. Radiated emissions test:

Test Site	Method	Measurement Frequency Range	*U*,(dB)
DG-CB01	CISPR	9kHz ~ 30MHz	2.36

Test Site	Method	Measurement Frequency Range	Ant. H / V	*U*,(dB)
DG-CB03 (3m)	CISPR	30MHz ~ 200MHz	V	4.40
		30MHz ~ 200MHz	H	3.62
		200MHz ~ 1,000MHz	V	4.58
		200MHz ~ 1,000MHz	H	3.98

Test Site	Method	Measurement Frequency Range	*U*,(dB)
DG-CB03 (3m)	CISPR	1GHz ~ 6GHz	4.08
		6GHz ~ 18GHz	4.62

Test Site	Method	Measurement Frequency Range	*U*,(dB)
DG-CB03 (1m)	CISPR	18 ~ 26.5 GHz	3.36
		26.5 ~ 40 GHz	3.58

C. Other Measurement test:

Test Item	Uncertainty
Maximum Output Power	1.3 dB
Temperature	0.8 °C
Humidity	2.2 %

Note: Unless specifically mentioned, the uncertainty of measurement has not been taken into account to declare the compliance or non-compliance to the specification.

2.3 TEST ENVIRONMENT CONDITIONS

Test Item	Temperature	Humidity	Test Voltage	Tested By	Test Date
AC Power Line Conducted Emissions	25°C	50%	AC 120V/60Hz	Hayden Chen	Jul. 24, 2024
Radiated Emissions-9kHz to 30 MHz	24°C	48%	AC 120V/60Hz	Hayden Chen	Jul. 24, 2024
Radiated Emissions-30MHz to 1000MHz	25°C	53%	AC 120V/60Hz	Chen Mo	Jul. 22, 2024
Radiated Emissions-Above 1000MHz	25°C	55%	AC 120V/60Hz	Jensen Zhou	Jul. 19, 2024
	25°C	53%	AC 120V/60Hz	Chen Mo	Jul. 22, 2024
Maximum Output Power	23°C	58%	DC 12V	Steve Zhou	Jul. 06, 2024

3. GENERAL INFORMATION

3.1 GENERAL DESCRIPTION OF EUT

Equipment	AI Service Robot
Brand Name	ORIONSTAR
Test Model	OS-R-DP01
Series Model	N/A
Model Difference(s)	N/A
Software Version	V10.1
Hardware Version	V1.3
Power Source	Charging Pile: AC Mains. Robot: 1# Supplied from Rechargeable Li-ion Battery. Model:7S8P 2# DC Voltage supplied from Charging Pile. Model: OS-CS03
Power Rating	Charging Pile: I/P: 100-240VAC ~ 50/60Hz O/P: DC 32V, 7.8A Robot: 1# Rated Voltage: 25.55V, 24.3Ah 2# DC 32V, 7.8A
Operation Frequency Band(s)	UNII-1: 5150 MHz ~ 5250 MHz UNII-3: 5725 MHz ~ 5850 MHz
Modulation Type	IEEE 802.11a/n/ac: OFDM
Bit Rate of Transmitter	IEEE 802.11a: 54/48/36/24/18/12/9/6 Mbps IEEE 802.11n: up to 300 Mbps IEEE 802.11ac: up to 866.7 Mbps
Maximum Output Power _UNII-1	IEEE 802.11a: 14.33 dBm (0.0271 W)
Maximum Output Power _UNII-3	IEEE 802.11a: 14.16 dBm (0.0261 W)

Note:

1. For a more detailed features description, please refer to the manufacturer's specifications or the user's manual.

2. Channel List:

IEEE 802.11a IEEE 802.11n(HT20) IEEE 802.11ac(VHT20)		IEEE 802.11n(HT40) IEEE 802.11ac(VHT40)		IEEE 802.11ac(VHT80)	
UNII-1		UNII-1		UNII-1	
Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)
36	5180	38	5190	42	5210
40	5200	46	5230		
44	5220				
48	5240				

IEEE 802.11a IEEE 802.11n(HT20) IEEE 802.11ac(VHT20)		IEEE 802.11n(HT40) IEEE 802.11ac(VHT40)		IEEE 802.11ac(VHT80)	
UNII-3		UNII-3		UNII-3	
Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)
149	5745	151	5755	155	5775
153	5765	159	5795		
157	5785				
161	5805				
165	5825				

3. Antenna Specification:

Ant.	Brand	Model Name	Antenna Type	Connector	Gain (dBi)
1	SPEED	N/A	FPC	N/A	1.55
2	SPEED	N/A	FPC	N/A	2.88

Note:

This EUT supports CDD, and all antenna gains are not equal, so Directional gain=10log[($10^{G1/20}$+$10^{G2/20}$+...$10^{GN/20}$)^2/N]dBi, that is Directional gain=10log[($10^{1.55/20}$+$10^{2.88/20}$)^2/2]dBi =5.25.

4. Table for Antenna Configuration:

Operating Mode / TX Mode	2TX
IEEE 802.11a	V (Ant. 1 + Ant. 2)
IEEE 802.11n(HT20)	V (Ant. 1 + Ant. 2)
IEEE 802.11n(HT40)	V (Ant. 1 + Ant. 2)
IEEE 802.11ac(VHT20)	V (Ant. 1 + Ant. 2)
IEEE 802.11ac(VHT40)	V (Ant. 1 + Ant. 2)
IEEE 802.11ac(VHT80)	V (Ant. 1 + Ant. 2)

3.2 TEST MODES

The test system was pre-tested based on the consideration of all possible combinations of EUT operation mode.

Pretest Mode	Description
Mode 1	TX A Mode Channel 36/40/48 (UNII-1)
Mode 2	TX N(HT20) Mode Channel 36/40/48 (UNII-1)
Mode 3	TX N(HT40) Mode Channel 38/46 (UNII-1)
Mode 4	TX AC(VHT20) Mode Channel 36/40/48 (UNII-1)
Mode 5	TX AC(VHT40) Mode Channel 38/46 (UNII-1)
Mode 6	TX AC(VHT80) Mode Channel 42 (UNII-1)
Mode 7	TX A Mode Channel 149/157/165 (UNII-3)
Mode 8	TX N(HT20) Mode Channel 149/157/165 (UNII-3)
Mode 9	TX N(HT40) Mode Channel 151/159 (UNII-3)
Mode 10	TX AC(VHT20) Mode Channel 149/157/165 (UNII-3)
Mode 11	TX AC(VHT40) Mode Channel 151/159 (UNII-3)
Mode 12	TX AC(VHT80) Mode Channel 155 (UNII-3)
Mode 13	TX A Mode Channel 48 (UNII-1)

Following mode(s) was (were) found to be the worst case(s) and selected for the final test.

AC power line conducted emissions test	
Final Test Mode	Description
Mode 13	TX A Mode Channel 48 (UNII-1)

Radiated Emissions Test - Below 1GHz	
Final Test Mode	Description
Mode 13	TX A Mode Channel 48 (UNII-1)

Radiated Emissions Test - Above 1GHz	
Final Test Mode	Description
Mode 1	TX A Mode Channel 36/40/48 (UNII-1)
Mode 4	TX AC(VHT20) Mode Channel 36/40/48 (UNII-1)
Mode 5	TX AC(VHT40) Mode Channel 38/46 (UNII-1)
Mode 6	TX AC(VHT80) Mode Channel 42 (UNII-1)
Mode 7	TX A Mode Channel 149/157/165 (UNII-3)
Mode 10	TX AC(VHT20) Mode Channel 149/157/165 (UNII-3)
Mode 11	TX AC(VHT40) Mode Channel 151/159 (UNII-3)
Mode 12	TX AC(VHT80) Mode Channel 155 (UNII-3)

Maximum Output Power test	
Final Test Mode	Description
Mode 1	TX A Mode Channel 36/40/48 (UNII-1)
Mode 2	TX N(HT20) Mode Channel 36/40/48 (UNII-1)
Mode 3	TX N(HT40) Mode Channel 38/46 (UNII-1)
Mode 4	TX AC(VHT20) Mode Channel 36/40/48 (UNII-1)
Mode 5	TX AC(VHT40) Mode Channel 38/46 (UNII-1)
Mode 6	TX AC(VHT80) Mode Channel 42 (UNII-1)
Mode 7	TX A Mode Channel 149/157/165 (UNII-3)
Mode 8	TX N(HT20) Mode Channel 149/157/165 (UNII-3)
Mode 9	TX N(HT40) Mode Channel 151/159 (UNII-3)
Mode 10	TX AC(VHT20) Mode Channel 149/157/165 (UNII-3)
Mode 11	TX AC(VHT40) Mode Channel 151/159 (UNII-3)
Mode 12	TX AC(VHT80) Mode Channel 155 (UNII-3)

Note:
(1) For AC power line conducted emissions and radiated emission below 1 GHz test, the TX A Mode Channel 48 (UNII-1) is found to be the worst case and recorded.
(2) For radiated emission above 1 GHz test, the spurious points of 1GHz~26.5GHz and 26.5GHz~40GHz have been pre-tested and in this report only recorded the worst case. The remaining spurious points are all below the limit value of 20dB.
(3) For radiated emission Harmonic 18-40GHz test, only tested the worst case and recorded.
(4) All the bit rate of transmitter have been tested and found the lowest rate is found to be the worst case and recorded.
(5) The measurements for Output Power are tested, the worst case are IEEE 802.11a mode, IEEE 802.11ac(VHT20) mode, IEEE 802.11ac(VHT40) mode and IEEE 802.11ac(VHT80) mode, only the worst cases are documented for other test items.
(6) For radiated emission above 1 GHz test, the polarization of Vertical and Horizontal are evaluated, the worst case is Horizontal and recorded.

3.3 PARAMETERS OF TEST SOFTWARE

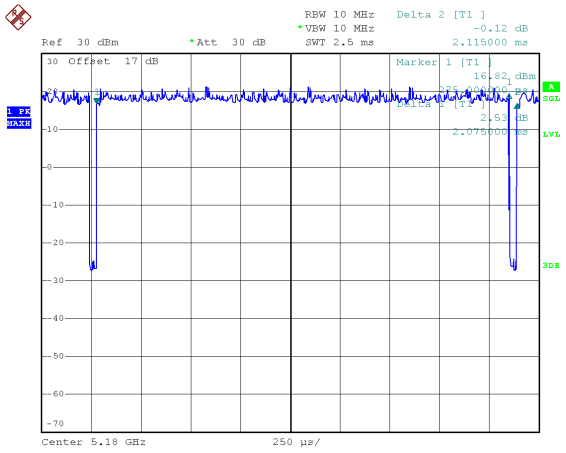
UNII-1			
Test Software Version	QRCT_V4.0		
Frequency (MHz)	5180	5200	5240
IEEE 802.11a	12	12	12
IEEE 802.11n(HT20)	12	12	12
IEEE 802.11ac(VHT20)	12	12	12
Frequency (MHz)	5190	5230	
IEEE 802.11n(HT40)	11	11	
IEEE 802.11ac(VHT40)	11	11	
Frequency (MHz)	5210		
IEEE 802.11ac(VHT80)	11		

UNII-3			
Test Software Version	QRCT_V4.0		
Frequency (MHz)	5745	5785	5825
IEEE 802.11a	12	12	12
IEEE 802.11n(HT20)	12	12	12
IEEE 802.11ac(VHT20)	12	12	12
Frequency (MHz)	5755	5795	
IEEE 802.11n(HT40)	11	11	
IEEE 802.11ac(VHT40)	11	11	
Frequency (MHz)	5775		
IEEE 802.11ac(VHT80)	11		

3.4 DUTY CYCLE

If duty cycle is ≥ 98 %, duty factor is not required.
If duty cycle is < 98 %, duty factor shall be considered.
The output power = measured power + duty factor.
The power spectral density = measured power spectral density + duty factor.

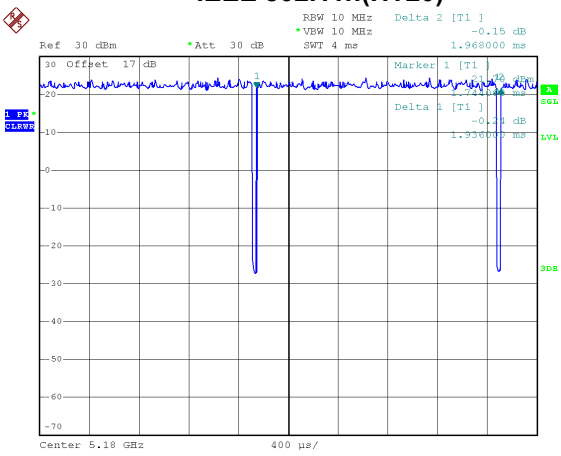
IEEE 802.11a



Date: 9.JUL.2024 14:46:55

Duty cycle = 2.075 ms / 2.115 ms = 98.11%
Duty Factor = 10 log(1 / Duty cycle) = 0.00

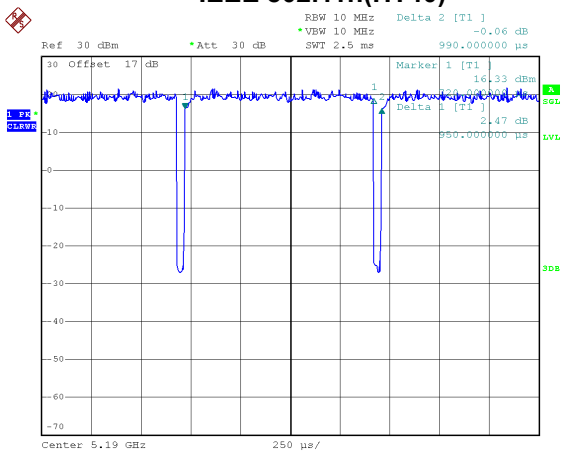
IEEE 802.11n(HT20)



Date: 9.JUL.2024 14:51:09

Duty cycle = 1.936 ms / 1.968 ms = 98.37%
Duty Factor = 10 log(1 / Duty cycle) = 0.00

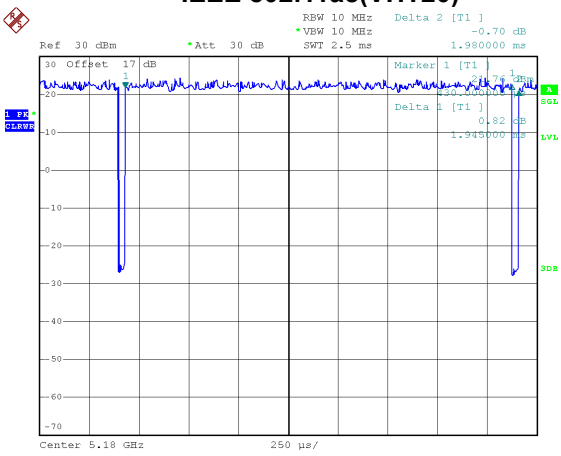
IEEE 802.11n(HT40)



Date: 9.JUL.2024 14:53:08

Duty cycle = 0.950 ms / 0.990 ms = 95.96%
Duty Factor = 10 log(1 / Duty cycle) = 0.18

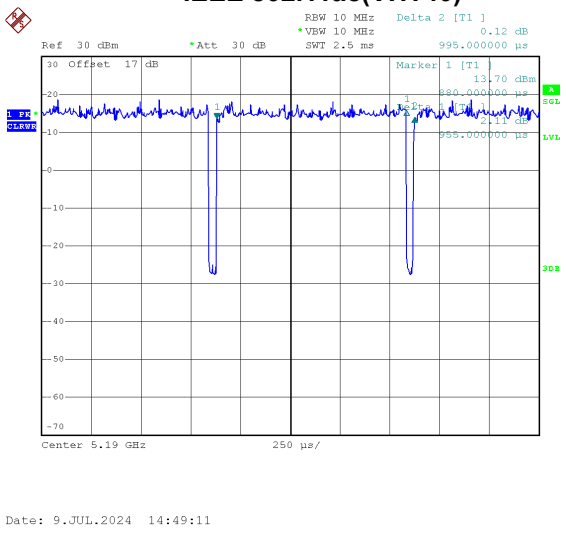
IEEE 802.11ac(VHT20)



Date: 9.JUL.2024 14:47:17

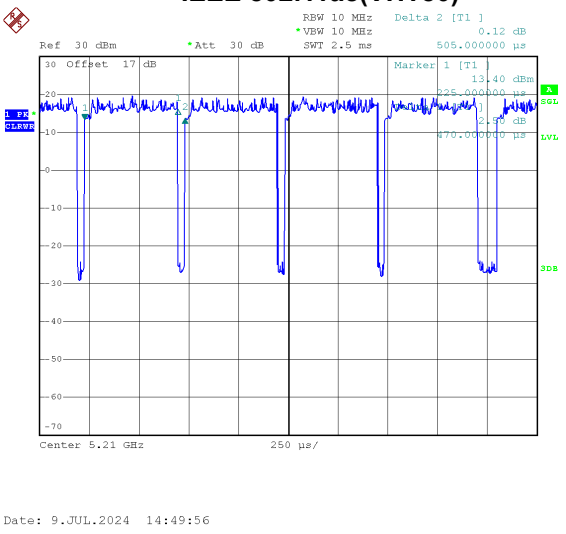
Duty cycle = 1.945 ms / 1.980 ms = 98.23%
Duty Factor = 10 log(1 / Duty cycle) = 0.00

IEEE 802.11ac(VHT40)



Duty cycle = 0.955 ms / 0.995 ms = 95.98%
Duty Factor = 10 log(1 / Duty cycle) = 0.18

IEEE 802.11ac(VHT80)



Duty cycle = 0.470 ms / 0.505 ms = 93.07%
Duty Factor = 10 log(1 / Duty cycle) = 0.31

NOTE:
For IEEE 802.11a:
For radiated emissions frequency above 1 GHz, the resolution bandwidth of test receiver/spectrum analyzer is 1 MHz and the video bandwidth is 1 kHz (Duty cycle ≥ 98%).

For IEEE 802.11n(HT20):
For radiated emissions frequency above 1 GHz, the resolution bandwidth of test receiver/spectrum analyzer is 1 MHz and the video bandwidth is 1 kHz (Duty cycle ≥ 98%).

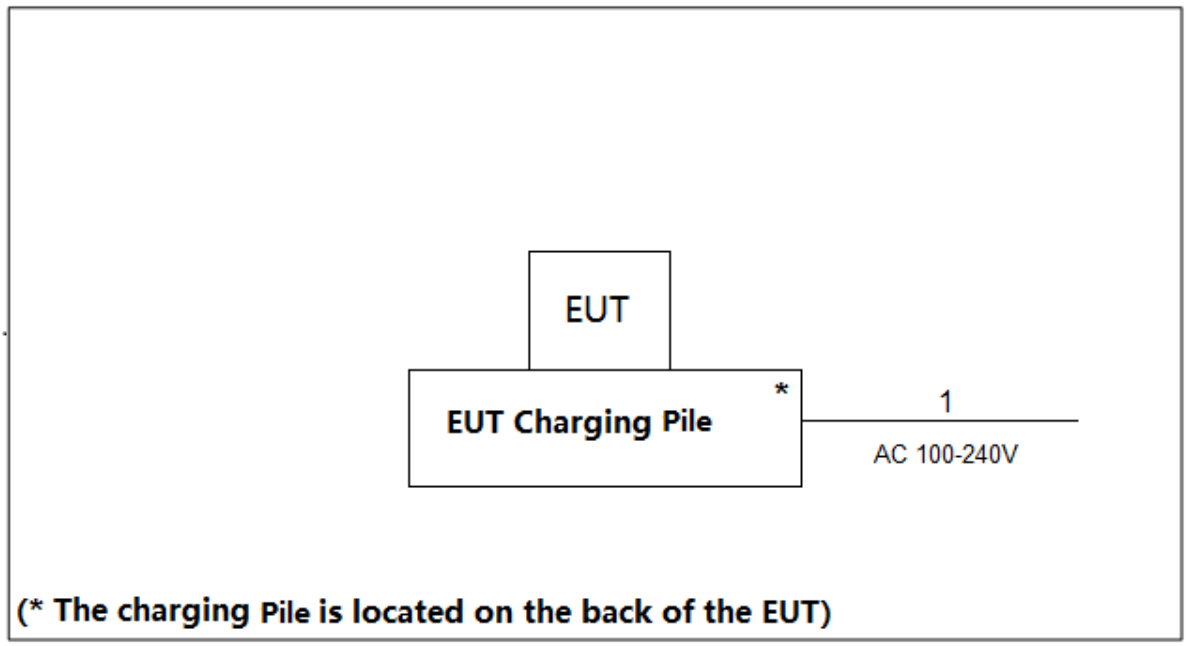
For IEEE 802.11n(HT40):
For radiated emissions frequency above 1 GHz, the resolution bandwidth of test receiver/spectrum analyzer is 1 MHz and the video bandwidth is 1053 Hz (Duty cycle < 98%).

For IEEE 802.11ac(VHT20):
For radiated emissions frequency above 1 GHz, the resolution bandwidth of test receiver/spectrum analyzer is 1 MHz and the video bandwidth is 1 kHz (Duty cycle ≥ 98%).

For IEEE 802.11ac(VHT40):
For radiated emissions frequency above 1 GHz, the resolution bandwidth of test receiver/spectrum analyzer is 1 MHz and the video bandwidth is 1047 Hz (Duty cycle < 98%).

For IEEE 802.11ac(VHT80):
For radiated emissions frequency above 1 GHz, the resolution bandwidth of test receiver/spectrum analyzer is 1 MHz and the video bandwidth is 2128 Hz (Duty cycle < 98%).

3.5 BLOCK DIAGRAM SHOWING THE CONFIGURATION OF SYSTEM TESTED



3.6 SUPPORT UNITS

Item	Equipment	Brand	Model No.	Series No.
-	-	-	-	-

Item	Cable Type	Shielded Type	Ferrite Core	Length
1	AC Cable	NO	NO	0.5m

3.7 CUSTOMER INFORMATION DESCRIPTION

1) The antenna gain is provided by the manufacturer.
2) Except for AC power line conducted emissions and radiated emissions, the results of all test items include cable losses. All cable losses are provided by the testing laboratory.

4. AC POWER LINE CONDUCTED EMISSIONS

4.1 LIMIT

Frequency (MHz)	Limit (dBμV)	
	Quasi-peak	Average
0.15 - 0.5	66 to 56*	56 to 46*
0.5 - 5.0	56	46
5.0 - 30.0	60	50

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.

4.2 TEST PROCEDURE

a. The EUT was placed 0.8 meters from the horizontal ground plane with EUT being connected to the power mains through a line impedance stabilization network (LISN). All other support equipment 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.

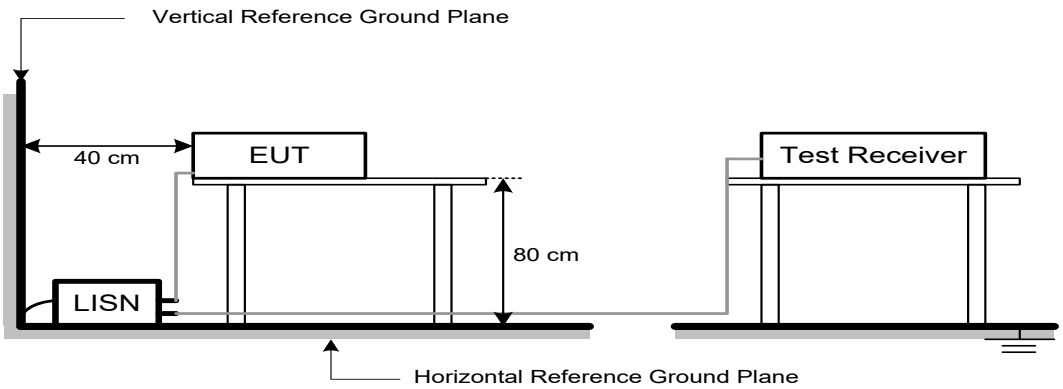
The following table is the setting of the receiver:

Receiver Parameter	Setting
Start Frequency	0.15 MHz
Stop Frequency	30 MHz
IF Bandwidth	9 kHz

4.3 DEVIATION FROM TEST STANDARD

No deviation

4.4 TEST SETUP



4.5 EUT OPERATION CONDITIONS

The EUT was configured for testing in a typical fashion (as a customer would normally use it). The EUT has been programmed to continuously transmit during test. This operating condition was tested and used to collect the included data.
The EUT was programmed to be in continuously transmitting/TX mode.

4.6 TEST RESULTS

Please refer to the APPENDIX A.

5. RADIATED EMISSIONS

5.1 LIMIT

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.

LIMITS OF RADIATED EMISSIONS MEASUREMENT (9 kHz to 1000 MHz)

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

LIMITS OF UNWANTED EMISSION OUT OF THE RESTRICTED BANDS (Above 1000 MHz)

Frequency (MHz)	EIRP Limit (dBm/MHz)	Band edge at 3m (dBμV/m)	Harmonic at 1m (dBμV/m)
5150-5250	-27	68.2	77.7 (Note 3)
5725-5850 **NOTE (2)**	-27	68.2	77.7 (Note 3)
	10	105.2	114.7 (Note 3)
	15.6	110.8	120.3 (Note 3)
	27	122.2	131.7 (Note 3)

NOTE:

(1) The following formula is used to convert the equipment isotropic radiated power (eirp) to field strength:

$E = \frac{1000000\sqrt{30P}}{3}$ μV/m, where P is the eirp (Watts)

(2) According to 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 15.6 dBm/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.

(3)

$$FS_{\text{limit}} = FS_{\max} - 20\log\left(\frac{d_{\text{limit}}}{d_{\text{measure}}}\right)$$

20log (dlimit/dmeasure)=20log (3/1)=9.5 dB.

5.2 TEST PROCEDURE

a. The measuring distance of 3 m shall be used for measurements. The EUT was placed on the top of a rotating table 0.8 meter above the ground at a 3 meter semi-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation.(below 1GHz)
b. The measuring distance of 3 m or 1m shall be used for measurements. The EUT was placed on the top of a rotating table 1.5 meter above the ground at a 3 meter semi-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation.(above 1GHz)
c. The height of the equipment or of the substitution antenna shall be 0.8m or 1.5m; 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. For each suspected emission, the EUT was arranged to its worst case and then the antenna was tuned to heights find the maximum reading (used Bore sight function).
e. The receiver system was set to peak and average detect function and specified bandwidth with maximum hold mode when the test frequency is above 1 GHz.
f. The initial step in collecting radiated emission data is a receiver peak detector mode pre-scanning the measurement frequency range. Significant peaks are then marked and then Quasi Peak detector mode re-measured.
g. All readings are Peak unless otherwise stated QP in column of Note. Peak denotes that the Peak reading compliance with the QP Limits and then QP Mode measurement didn‘t perform. (below 1 GHz)
h. All readings are Peak Mode value unless otherwise stated AVG in column of Note. If the Peak Mode Measured value compliance with the Peak Limits and lower than AVG Limits, the EUT shall be deemed to meet both Peak & AVG Limits and then only Peak Mode was measured, but AVG Mode didn‘t perform. (above 1 GHz)
i. For the actual test configuration, please refer to the related Item –EUT Test Photos.

The following table is the setting of the receiver:

Spectrum Parameters	Setting
Start ~ Stop Frequency	9 kHz~150 kHz for RBW 200 Hz
Start ~ Stop Frequency	0.15 MHz~30 MHz for RBW 9 kHz
Start ~ Stop Frequency	30 MHz~1000 MHz for RBW 100 kHz

Spectrum Parameters	Setting
Start Frequency	1000 MHz
Stop Frequency	10th carrier harmonic or 40 GHz, whichever is lower
RBW / VBW (Emission in restricted band)	1 MHz / 3 MHz for PK value 1 MHz / 1/T Hz for AVG value

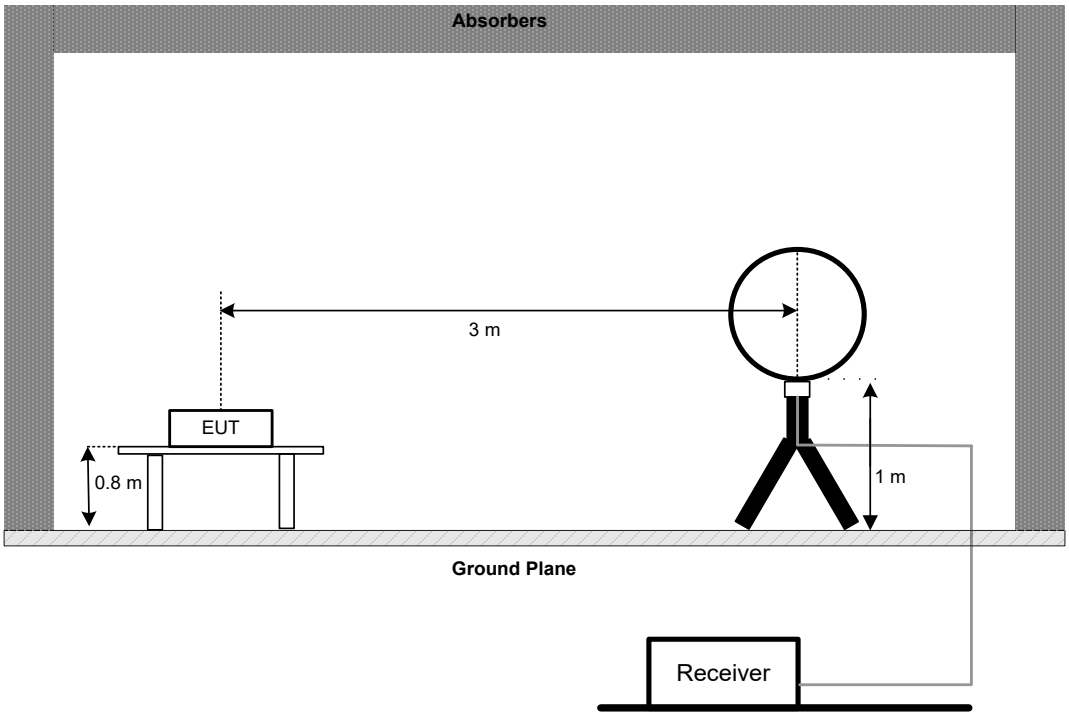
Receiver Parameters	Setting
Start ~ Stop Frequency	9 kHz~90 kHz for PK/AVG detector
Start ~ Stop Frequency	90 kHz~110 kHz for QP detector
Start ~ Stop Frequency	110 kHz~490 kHz for PK/AVG detector
Start ~ Stop Frequency	490 kHz~30 MHz for QP detector
Start ~ Stop Frequency	30 MHz~1000 MHz for QP detector
Start ~ Stop Frequency	1 GHz~40 GHz for PK/AVG detector

5.3 DEVIATION FROM TEST STANDARD

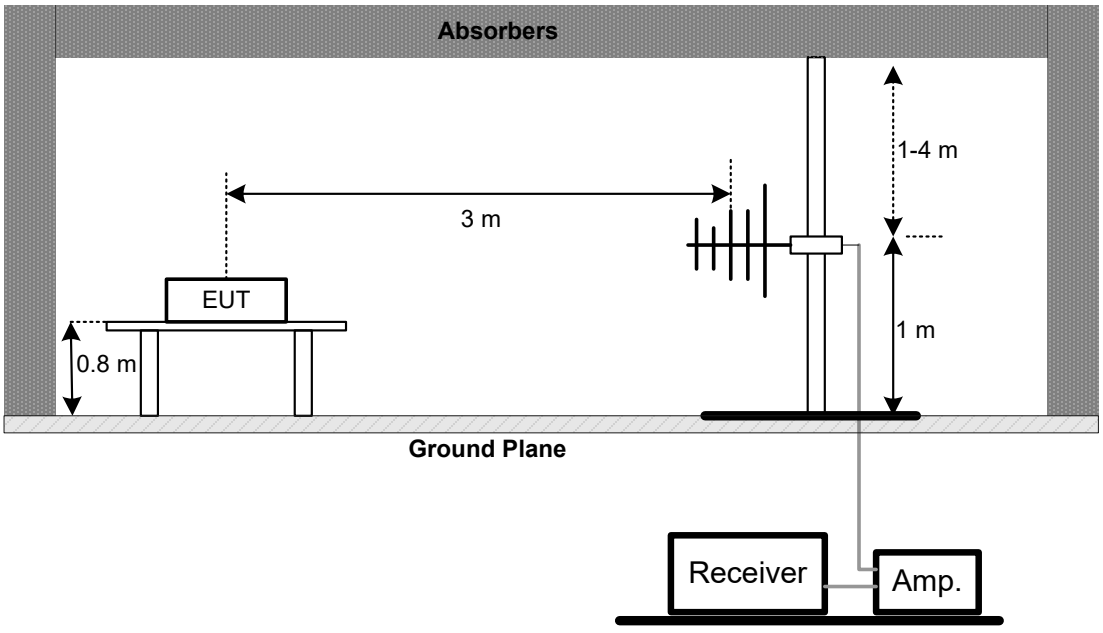
No deviation.

5.4 TEST SETUP

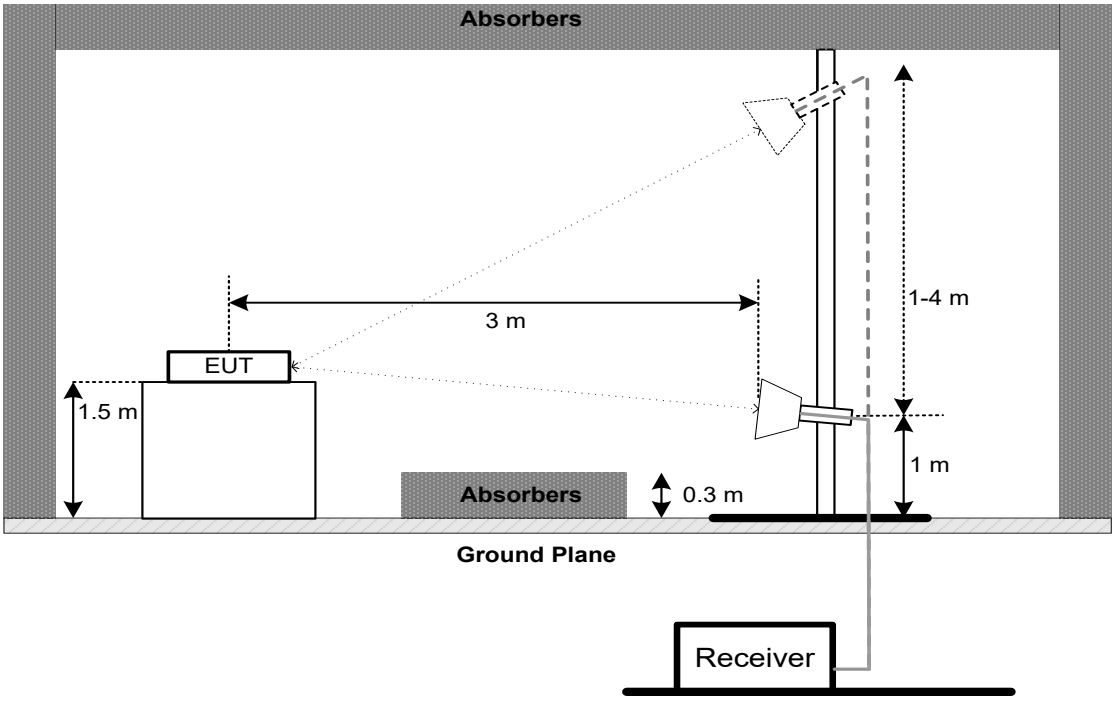
9 kHz to 30 MHz



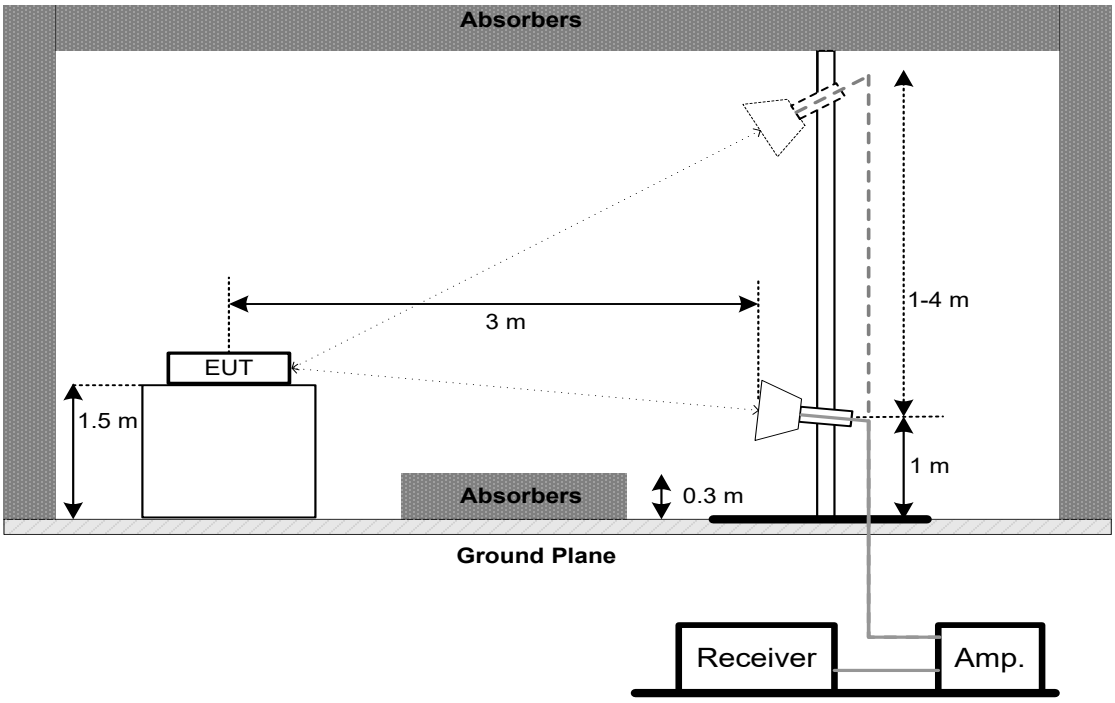
30 MHz to 1 GHz



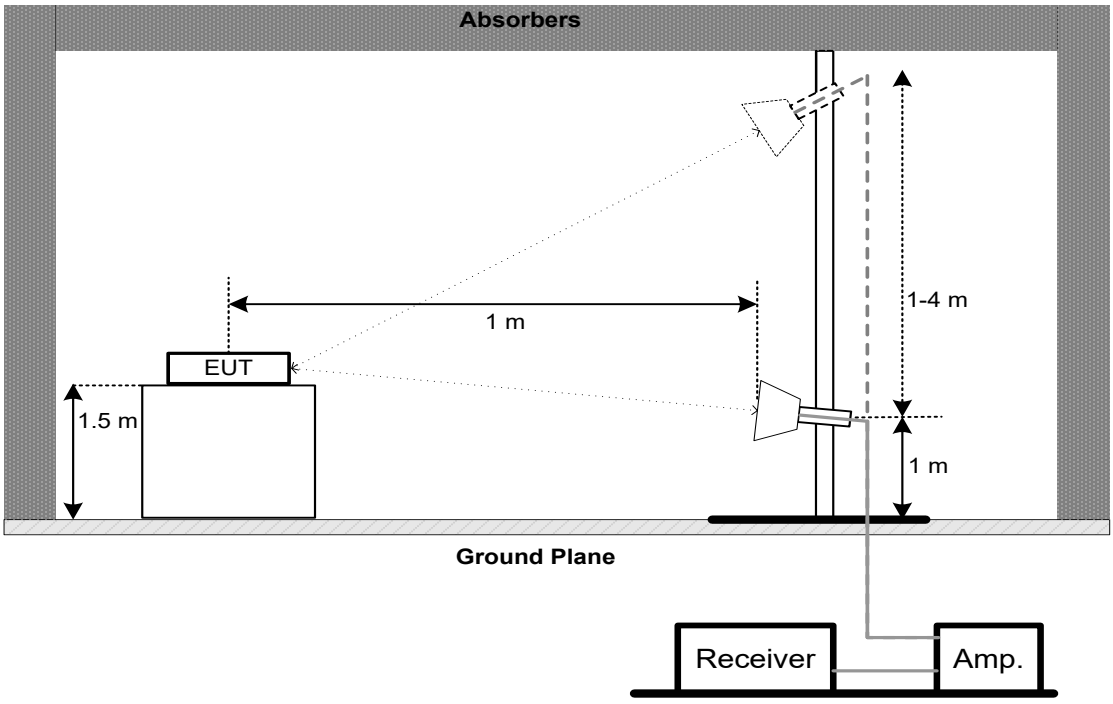
Above 1 GHz
Band edge



Harmonic (1 GHz to 18 GHz)



Harmonic (18 GHz to 40 GHz)



5.5 EUT OPERATION CONDITIONS

The EUT tested system was configured as the statements of 3.5 unless otherwise a special operating condition is specified in the follows during the testing.

5.6 TEST RESULTS - 9 KHZ TO 30 MHZ

Please refer to the APPENDIX B.

Remark:

(1) Distance extrapolation factor = 40 log (specific distance / test distance) (dB).
(2) Limit line = specific limits (dBuV) + distance extrapolation factor.

5.7 TEST RESULTS - 30 MHZ TO 1000 MHZ

Please refer to the APPENDIX C.

5.8 TEST RESULTS - ABOVE 1000 MHZ

Please refer to the APPENDIX D.

Remark:

(1) No limit: This is fundamental signal, the judgment is not applicable.
For fundamental signal judgment was referred to Peak output test.

6. MAXIMUM OUTPUT POWER

6.1 LIMIT

Section	Test Item	Limit	Frequency Range (MHz)
FCC 15.407(a)	Maximum Output Power	AP device: 1 Watt (30 dBm) Client device: 250 mW (23.98 dBm)	5150-5250
		1 Watt (30dBm)	5725-5850

Note:

a. For client devices in the 5.15-5.25 GHz band, the maximum conducted output power over the frequency band of operation shall not exceed 250 mW provided the maximum antenna gain does not exceed 6 dBi. In addition, the maximum power spectral density shall not exceed 11 dBm in any 1 megahertz band. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.

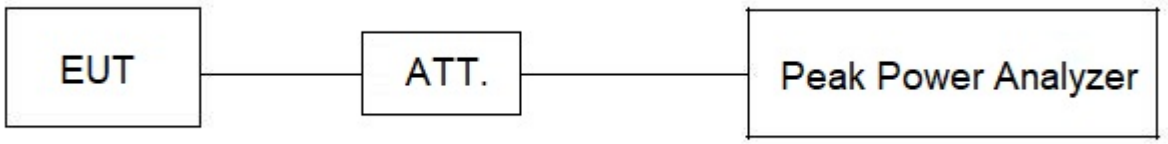
6.2 TEST PROCEDURE

a. The EUT was directly connected to the peak power analyzer and antenna output port as show in the block diagram below.
b. The test was performed in accordance with method of FCC KDB 789033 D02 General UNII Test Procedures New Rules v02r01.

6.3 DEVIATION FROM STANDARD

No deviation.

6.4 TEST SETUP



6.5 EUT OPERATION CONDITIONS

The EUT was programmed to be in continuously transmitting mode.

6.6 TEST RESULTS

Please refer to the APPENDIX E.

7. MEASUREMENT INSTRUMENTS LIST

AC Power Line Conducted Emissions					
Item	Kind of Equipment	Manufacturer	Type No.	Serial No.	Calibrated until
1	EMI TEST RECEIVER	R&S	ESCI	100382	Dec. 22, 2024
2	TWO-LINE V-NETWORK	R&S	ENV216	101447	Dec. 22, 2024
3	Measurement Software	Farad	EZ-EMC Ver.NB-03A1-01	N/A	N/A
4	Cable	N/A	SFT205-NMNM-9M -001	9M	Nov. 27, 2024
5	643 Shield Room	ETS	6*4*3	N/A	N/A

Radiated Emissions - 9 kHz to 30 MHz					
Item	Kind of Equipment	Manufacturer	Type No.	Serial No.	Calibrated until
1	Active Loop Antenna	Schwarzbeck	FMZB 1513-60B	1513-60 B-034	Mar. 30, 2025
2	MXE EMI Receiver	Keysight	N9038A	MY56400091	Dec. 22, 2024
3	Cable	N/A	RW2350-3.8A-NMB M-1.5M	N/A	Jun. 09, 2025
4	Cable	N/A	RG 213/U	N/A	Jun. 09, 2025
5	Measurement Software	Farad	EZ-EMC Ver.NB-03A1-01	N/A	N/A
6	966 Chamber room	ETS	9*6*6	N/A	May 16, 2025

Radiated Emissions - 30 MHz to 1 GHz					
Item	Kind of Equipment	Manufacturer	Type No.	Serial No.	Calibrated until
1	Trilog-Broadband Antenna	Schwarzbeck	VULB 9168	1462	Dec. 13, 2024
2	Attenuator	EMC INSTRUMENT	EMCI-N-6-06	AT-06009	Dec. 13, 2024
3	Preamplifier	EMC INSTRUMENT	EMC001330	980998	Nov. 17, 2024
4	Cable	RegalWay	LMR400-NMNM -12.5m	N/A	Jun. 06, 2025
5	Cable	RegalWay	LMR400-NMNM -3m	N/A	Jun. 06, 2025
6	Cable	RegalWay	LMR400-NMNM -0.5m	N/A	Jun. 06, 2025
7	Receiver	Agilent	N9038A	MY52130039	Dec. 22, 2024
8	Filter	STI	STI15-9923	N/A	May 31, 2025
9	Positioning Controller	MF	MF-7802	N/A	N/A
10	Measurement Software	Farad	EZ-EMC Ver.NB-03A1-01	N/A	N/A
11	966 Chamber room	CM	9*6*6	N/A	May 16, 2025

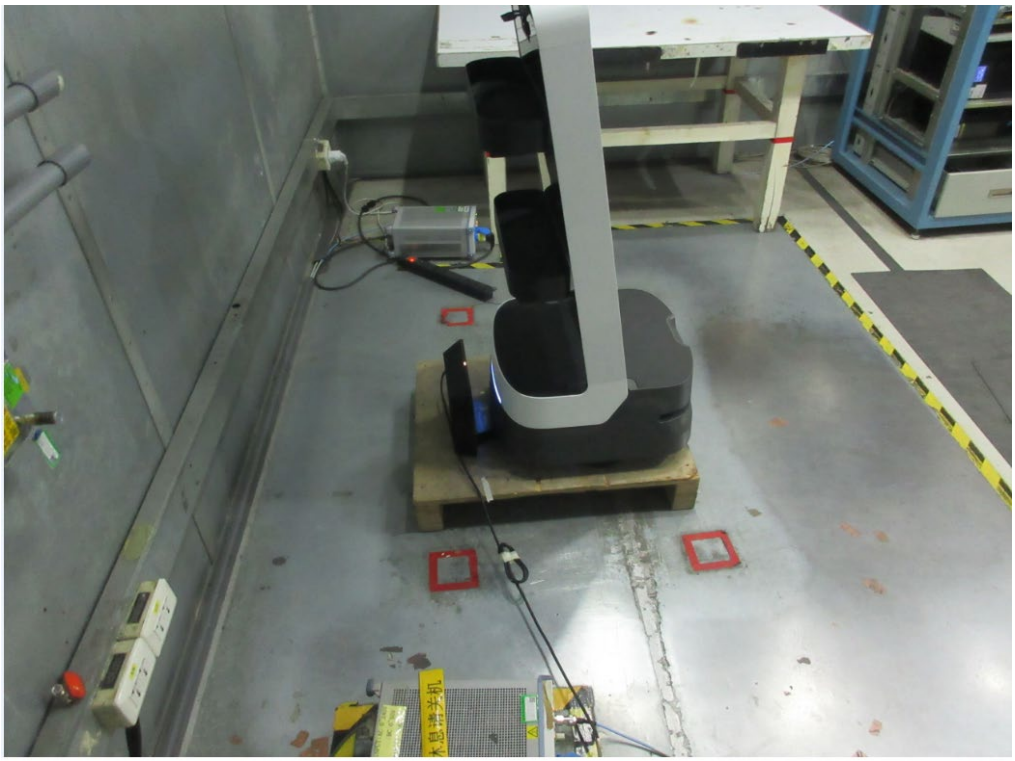
Radiated Emissions - Above 1 GHz					
Item	Kind of Equipment	Manufacturer	Type No.	Serial No.	Calibrated until
1	MXA Signal Analyzer	KEYSIGHT	N9020B	MY63380204	Nov. 17, 2024
2	Receiver	Agilent	N9038A	MY52130039	Dec. 22, 2024
3	Preamplifier	EMC INSTRUMENT	EMC118A45SE	980888	Nov. 17, 2024
4	EXA Spectrum Analyzer	Keysight	N9010A	MY55150209	May 31, 2025
5	Double Ridged Guide Antenna	ETS	3115	75789	Jun. 15, 2025
6	Cable	RegalWay	RWLP50-4.0A-SMSM-12.5M	N/A	Jul. 03, 2025
7	Cable	RegalWay	RWLP50-4.0A-NMRASM-2.5M	N/A	Jul. 03, 2025
8	Cable	RegalWay	RWLP50-4.0A-NMRASMRA-0.8M	N/A	Jul. 03, 2025
9	Preamplifier	EMC INSTRUMENT	EMC184045SE	980905	Nov. 19, 2024
10	Cable	RegalWay	RWLP50-2.6A-2.92M2.92M-1.1M	N/A	Jul. 26, 2024
11	Cable	Tonscend	HF160-KMKM-3M	N/A	Jul. 26, 2024
12	Broad-Band Horn Antenna	Schwarzbeck	BBHA9170(3m)	9170-319	Jun. 16, 2025
13	966 Chamber room	CM	9*6*6	N/A	May 19, 2025
14	Attenuator	Talent Microwave	TA10A2-S-18	N/A	N/A
15	Filter	STI	STI15-9969	N/A	May 31, 2025
16	Measurement Software	Farad	EZ-EMC Ver.NB-03A1-01	N/A	N/A
17	966 Chamber room	CM	9*6*6	N/A	May 16, 2025
18	Positioning Controller	MF	MF-7802	N/A	N/A

Maximum Output Power					
Item	Kind of Equipment	Manufacturer	Type No.	Serial No.	Calibrated until
1	Peak Power Analyzer	Keysight	8990B	MY51000506	May 31, 2025
2	Wideband power sensor	Keysight	N1923A	MY58310004	May 31, 2025
3	Attenuator	Talent Microwave	TA10A2-S-18	N/A	N/A

Remark: “N/A” denotes no model name, serial no. or calibration specified.
All calibration period of equipment list is one year.

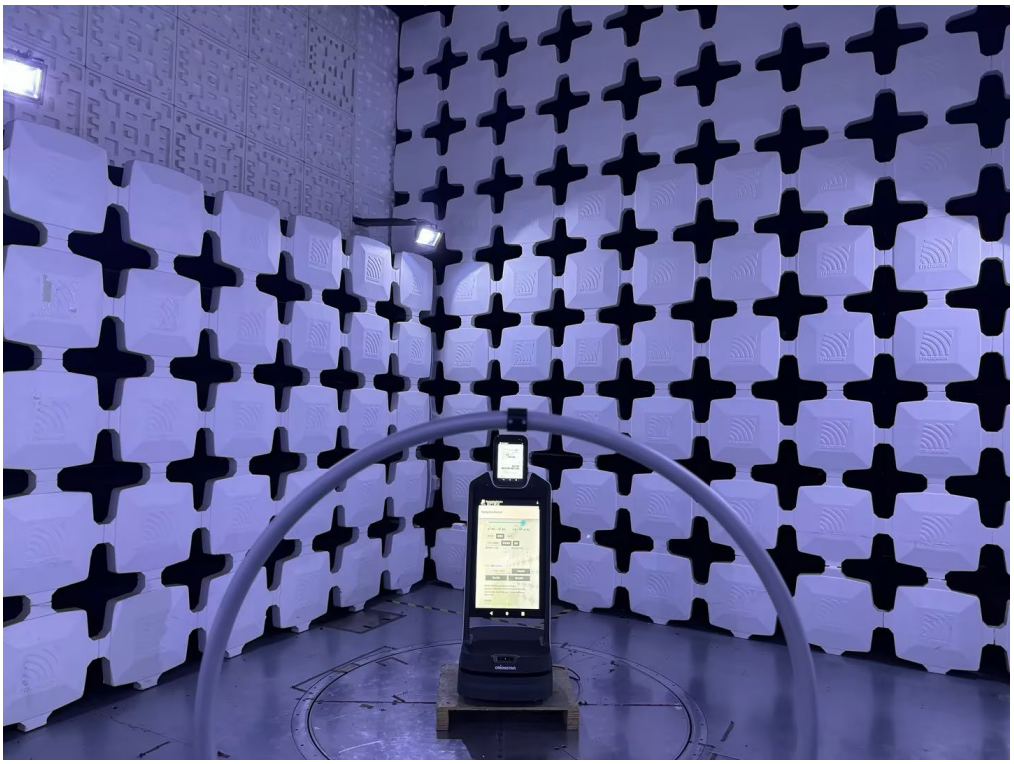
8. EUT TEST PHOTOS

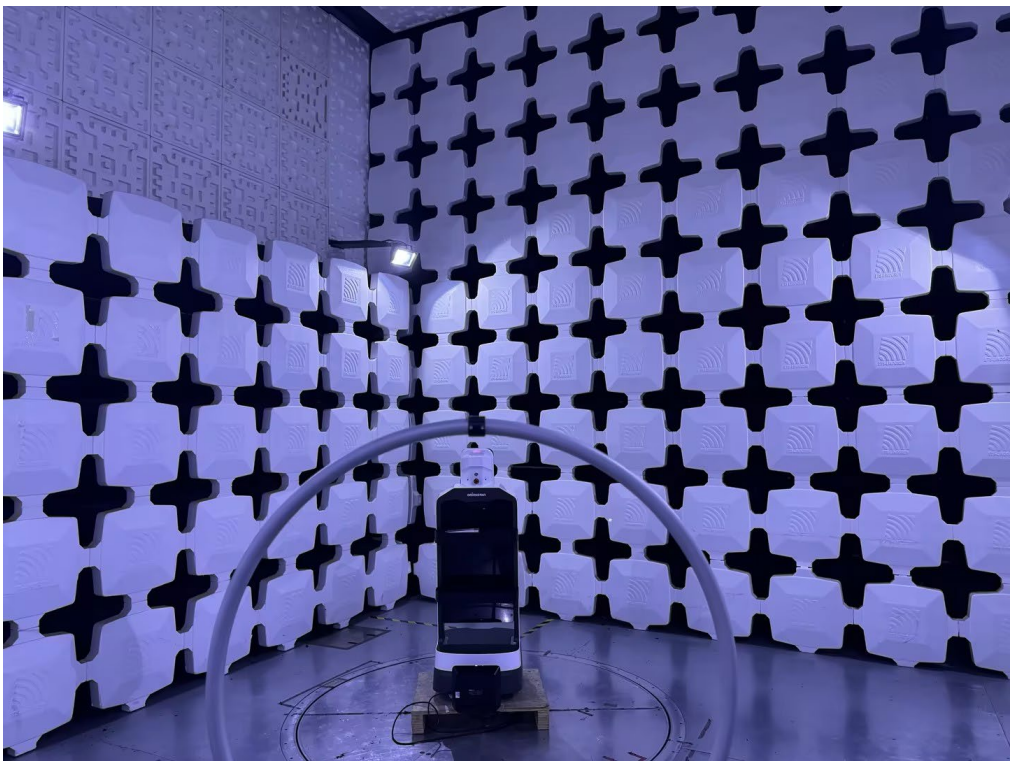
AC Power Line Conducted Emissions Test Photos



Radiated Emissions Test Photos

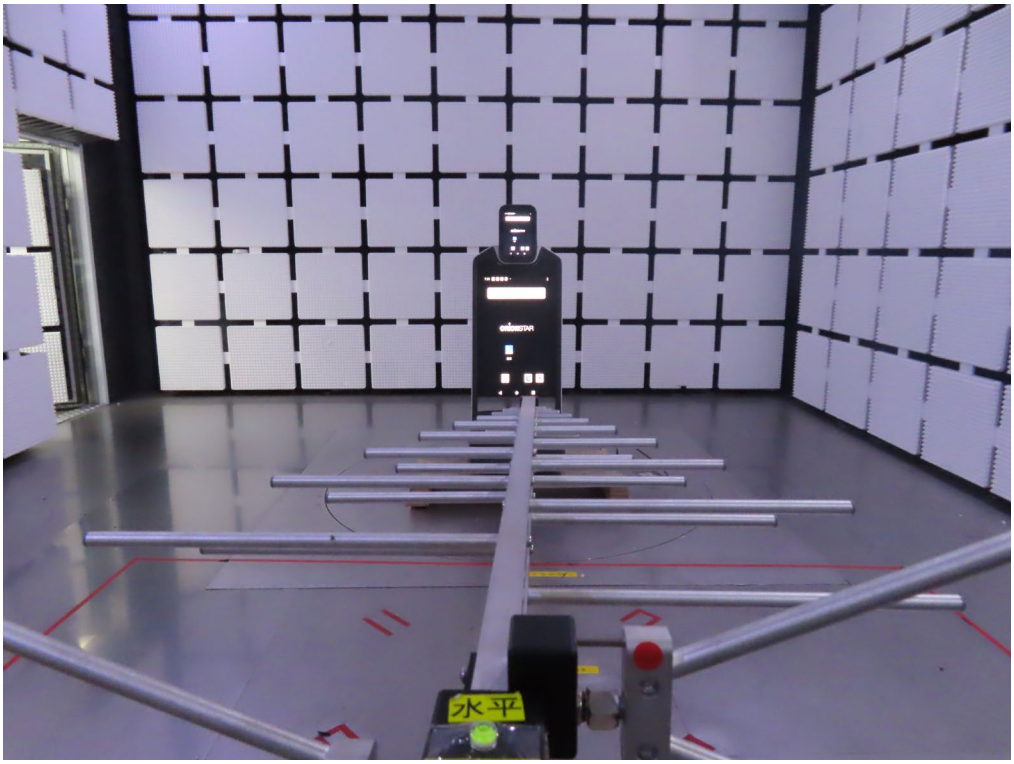
9 kHz to 30 MHz

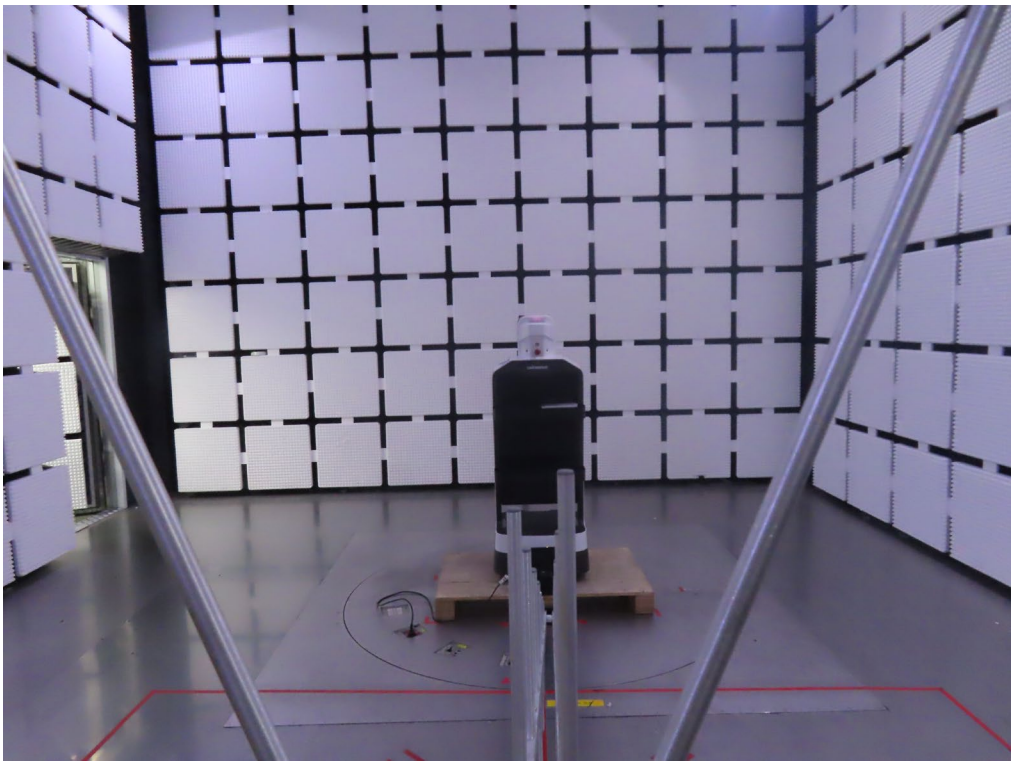




Radiated Emissions Test Photos

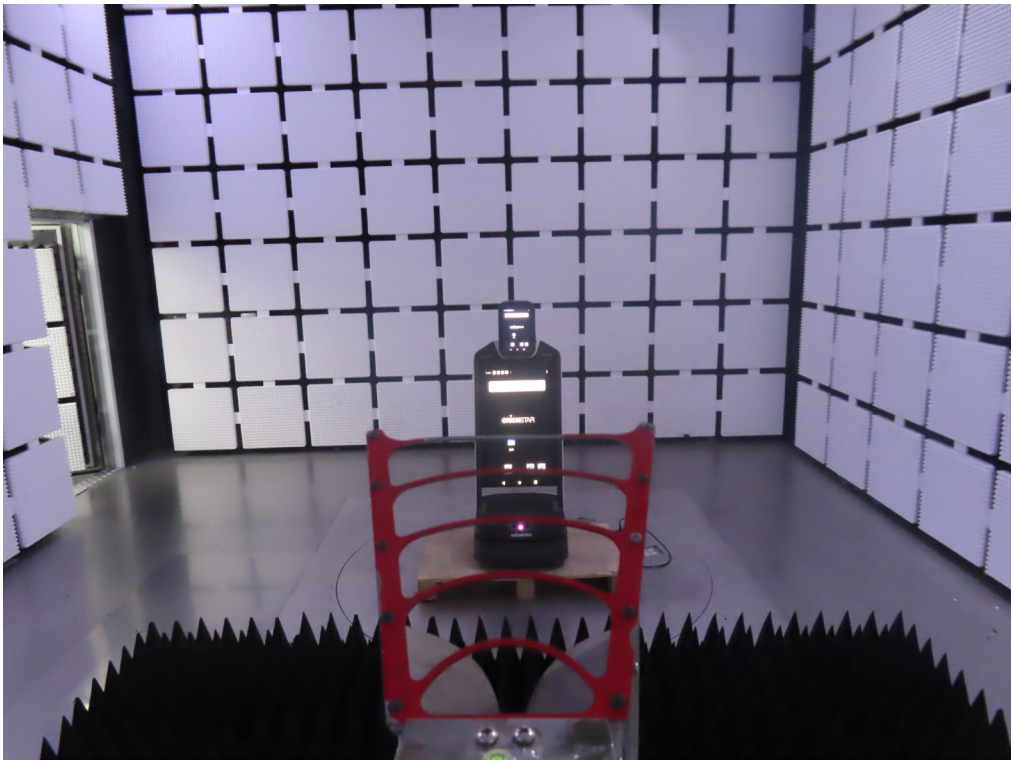
30 MHz to 1 GHz

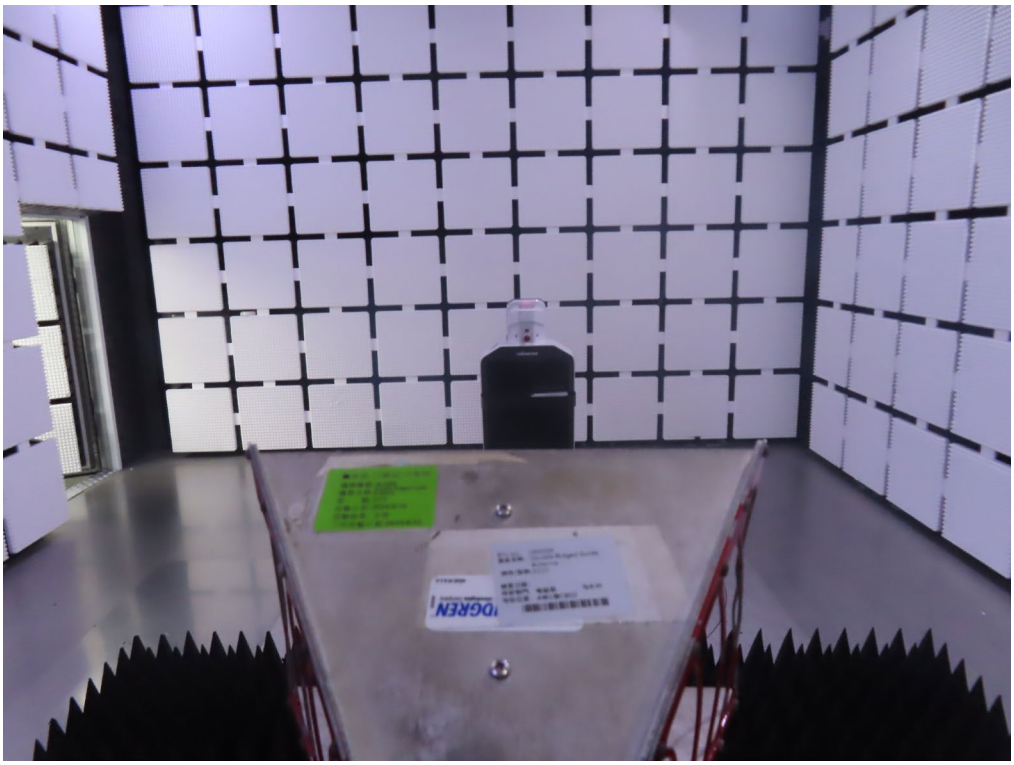




Radiated Emissions Test Photos

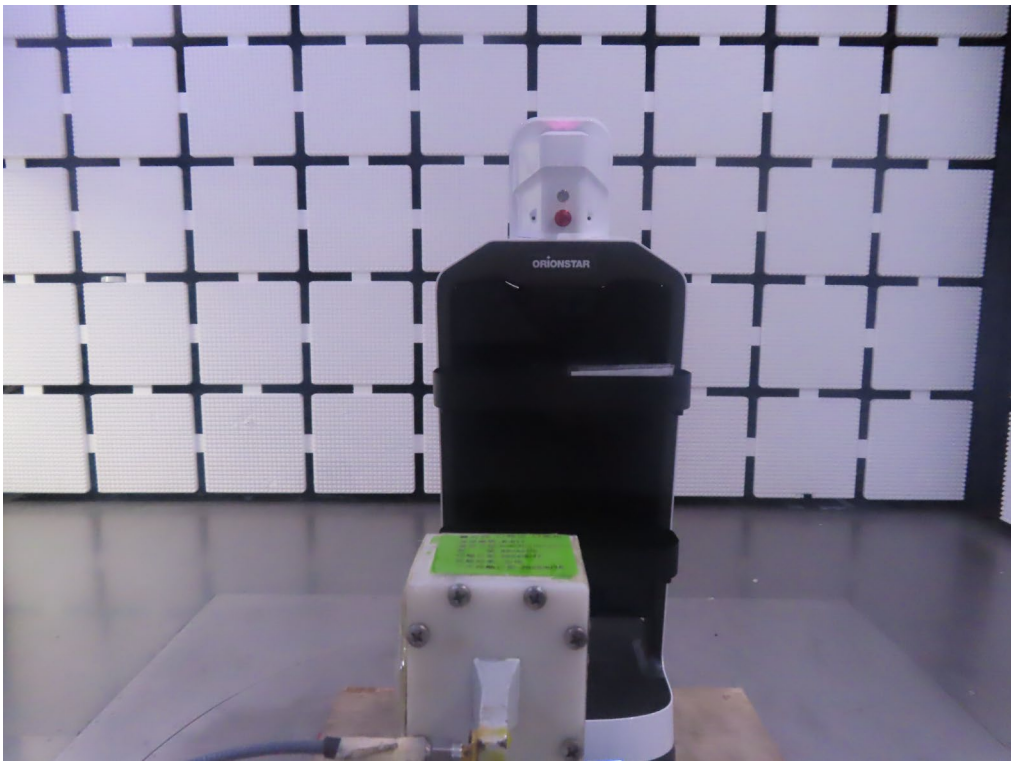
Harmonic (1 GHz to 18 GHz) & Band edge





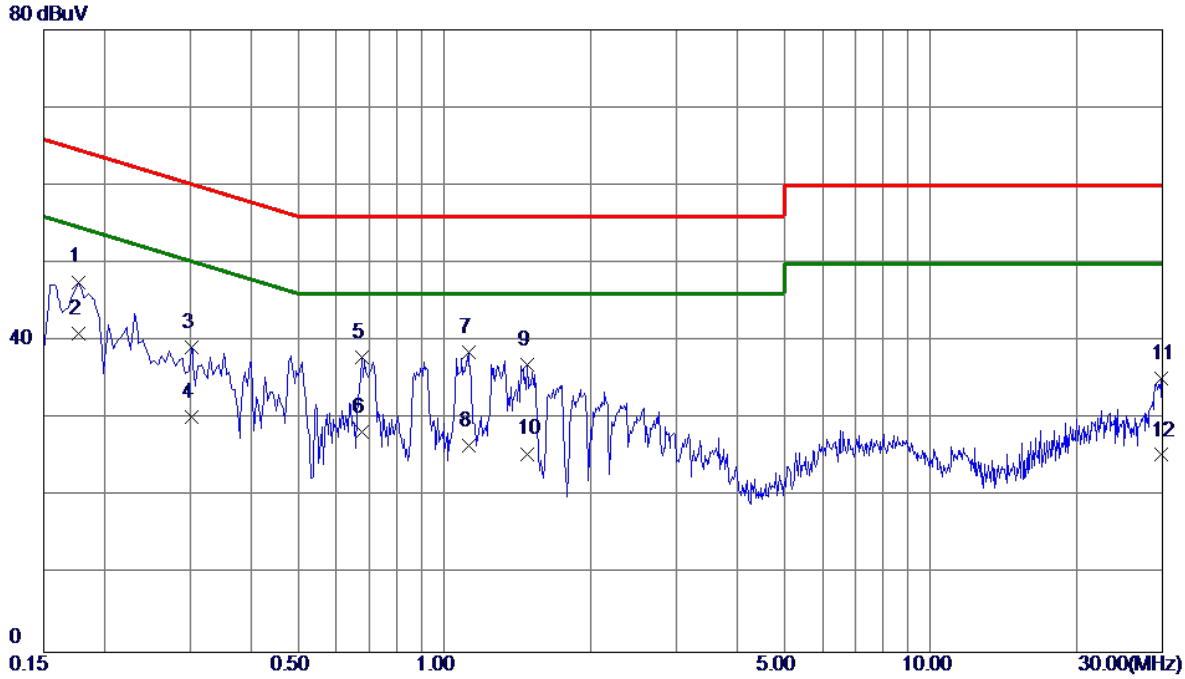
Radiated Emissions Test Photos

Harmonic (18 GHz to 40 GHz)



APPENDIX A - AC POWER LINE CONDUCTED EMISSIONS

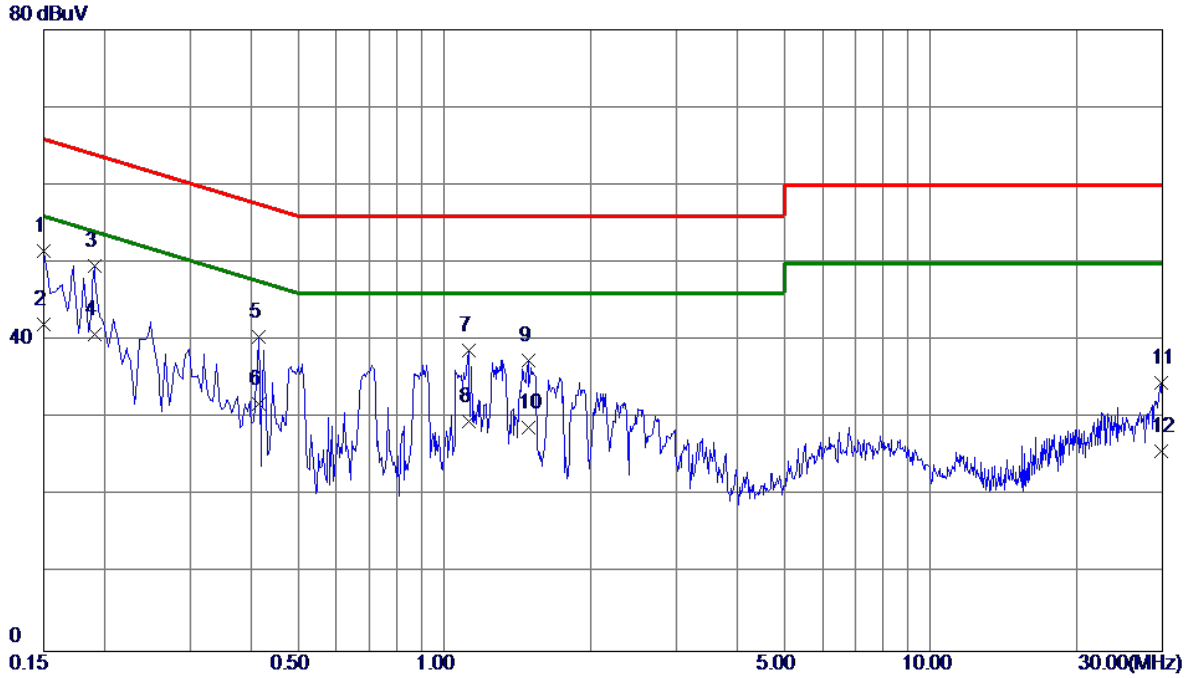
Test Mode	TX A Mode Channel 48 (UNII-1)	Phase	Line



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV	dB	dBuV	dBuV	dB	Detector	Comment
1	0.1770	37.63	9.97	47.60	64.63	-17.03	QP	
2 *	0.1770	30.97	9.97	40.94	54.63	-13.69	AVG	
3	0.3030	29.09	10.18	39.27	60.16	-20.89	QP	
4	0.3030	20.00	10.18	30.18	50.16	-19.98	AVG	
5	0.6765	26.90	10.96	37.86	56.00	-18.14	QP	
6	0.6765	17.40	10.96	28.36	46.00	-17.64	AVG	
7	1.1220	27.21	11.29	38.50	56.00	-17.50	QP	
8	1.1220	15.29	11.29	26.58	46.00	-19.42	AVG	
9	1.4819	25.75	11.27	37.02	56.00	-18.98	QP	
10	1.4819	14.25	11.27	25.52	46.00	-20.48	AVG	
11	29.8320	18.89	16.26	35.15	60.00	-24.85	QP	
12	29.8320	9.10	16.26	25.36	50.00	-24.64	AVG	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

Test Mode	TX A Mode Channel 48 (UNII-1)	Phase	Neutral

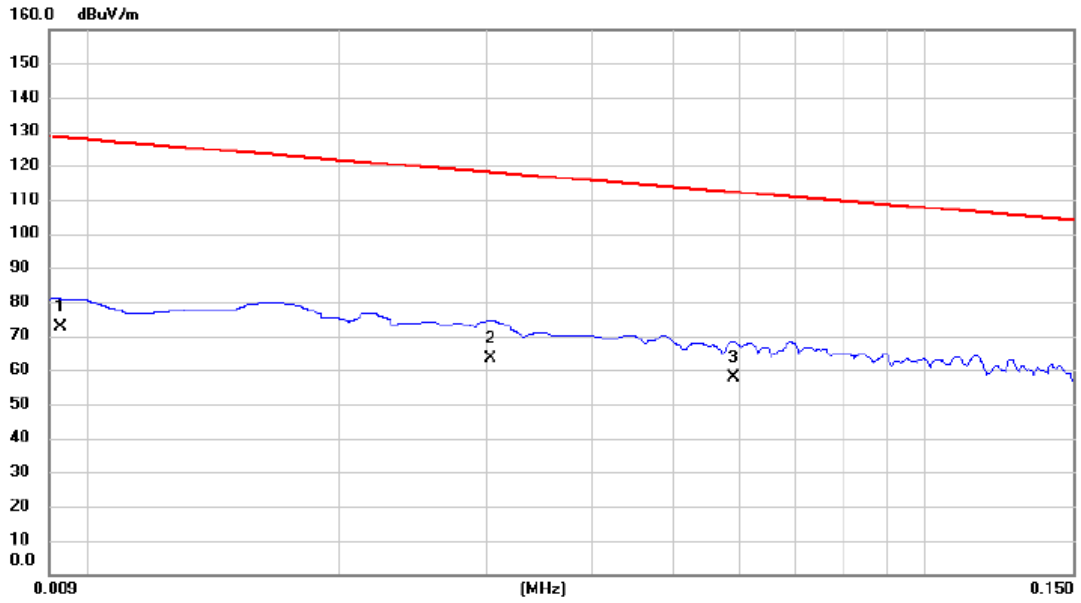


No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV	dB	dBuV	dBuV	dB	Detector	Comment
1	0.1500	41.55	9.93	51.48	66.00	-14.52	QP	
2	0.1500	32.10	9.93	42.03	56.00	-13.97	AVG	
3	0.1905	39.58	9.94	49.52	64.01	-14.49	QP	
4 *	0.1905	30.80	9.94	40.74	54.01	-13.27	AVG	
5	0.4155	30.06	10.40	40.46	57.54	-17.08	QP	
6	0.4155	21.39	10.40	31.79	47.54	-15.75	AVG	
7	1.1220	27.52	11.25	38.77	56.00	-17.23	QP	
8	1.1220	18.40	11.25	29.65	46.00	-16.35	AVG	
9	1.4865	26.29	11.22	37.51	56.00	-18.49	QP	
10	1.4865	17.59	11.22	28.81	46.00	-17.19	AVG	
11	29.8410	18.42	16.21	34.63	60.00	-25.37	QP	
12	29.8410	9.50	16.21	25.71	50.00	-24.29	AVG	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

APPENDIX B - RADIATED EMISSION - 9 KHZ TO 30 MHZ

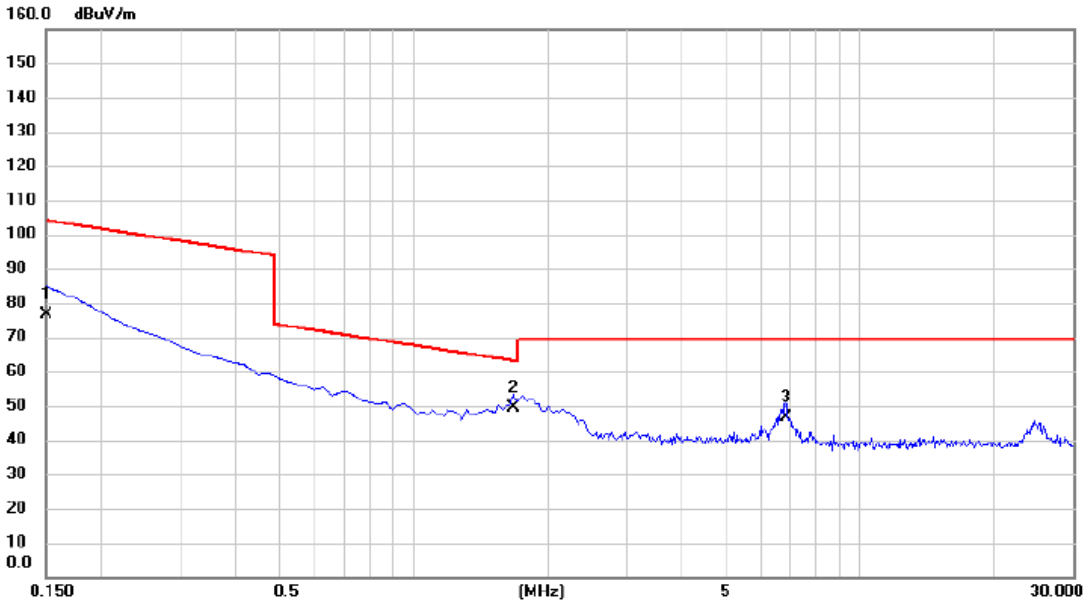
Test Mode	TX A Mode Channel 48 (UNII-1)	Polarization	Ant 0°



No.	Mk.	Freq.	Reading Level	Correct Factor	Measure-ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1		0.0093	52.36	20.43	72.79	128.24	-55.45	AVG	
2		0.0303	42.36	21.10	63.46	117.98	-54.52	AVG	
3	*	0.0590	36.59	21.23	57.82	112.19	-54.37	AVG	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

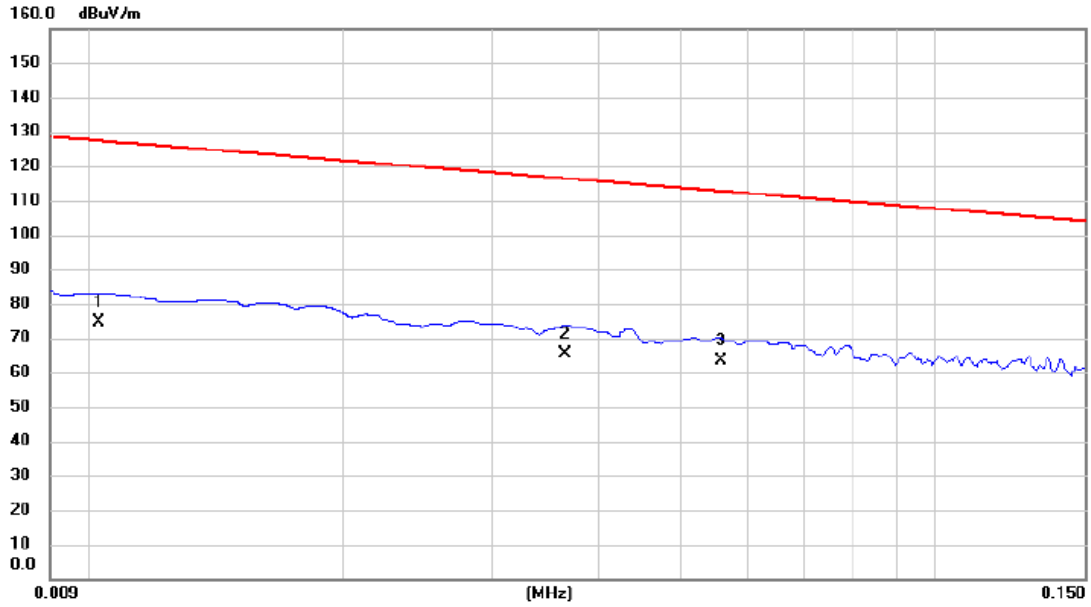
Test Mode	TX A Mode Channel 48 (UNII-1)	Polarization	Ant 0°



No.	Mk.	Freq.	Reading Level	Correct Factor	Measure-ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1		0.1500	55.22	21.27	76.49	104.09	-27.60	AVG	
2	*	1.6724	28.44	21.13	49.57	63.14	-13.57	QP	
3		6.8364	25.31	21.19	46.50	69.54	-23.04	QP	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

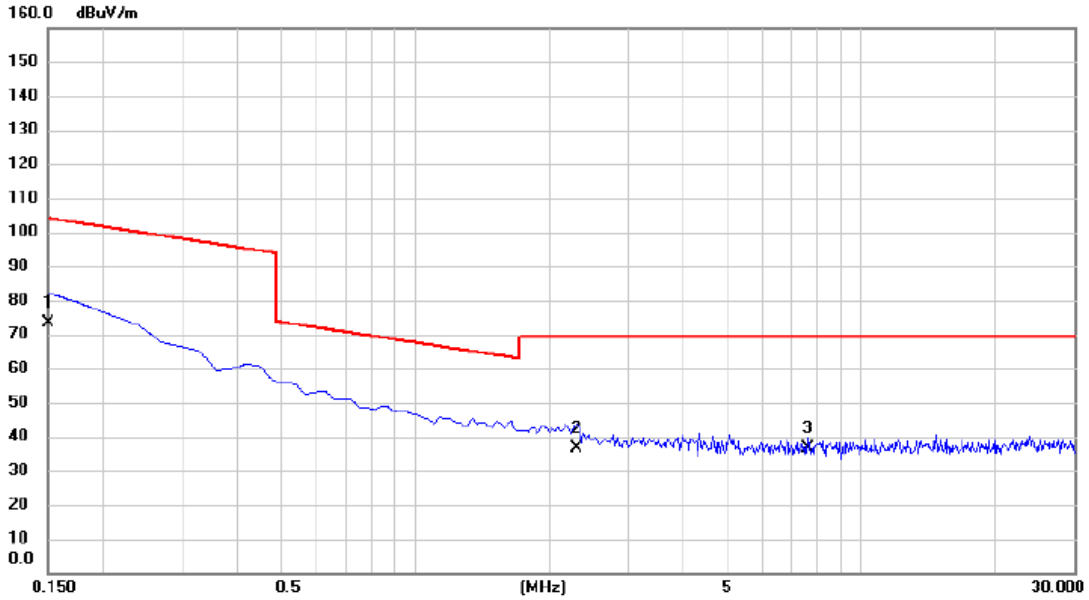
Test Mode	TX A Mode Channel 48 (UNII-1)	Polarization	Ant 90°



No.	Mk.	Freq.	Reading Level	Correct Factor	Measure-ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1		0.0103	54.23	20.51	74.74	127.35	-52.61	AVG	
2		0.0366	44.25	21.13	65.38	116.34	-50.96	AVG	
3	*	0.0558	42.33	21.22	63.55	112.67	-49.12	AVG	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

Test Mode	TX A Mode Channel 48 (UNII-1)	Polarization	Ant 90°

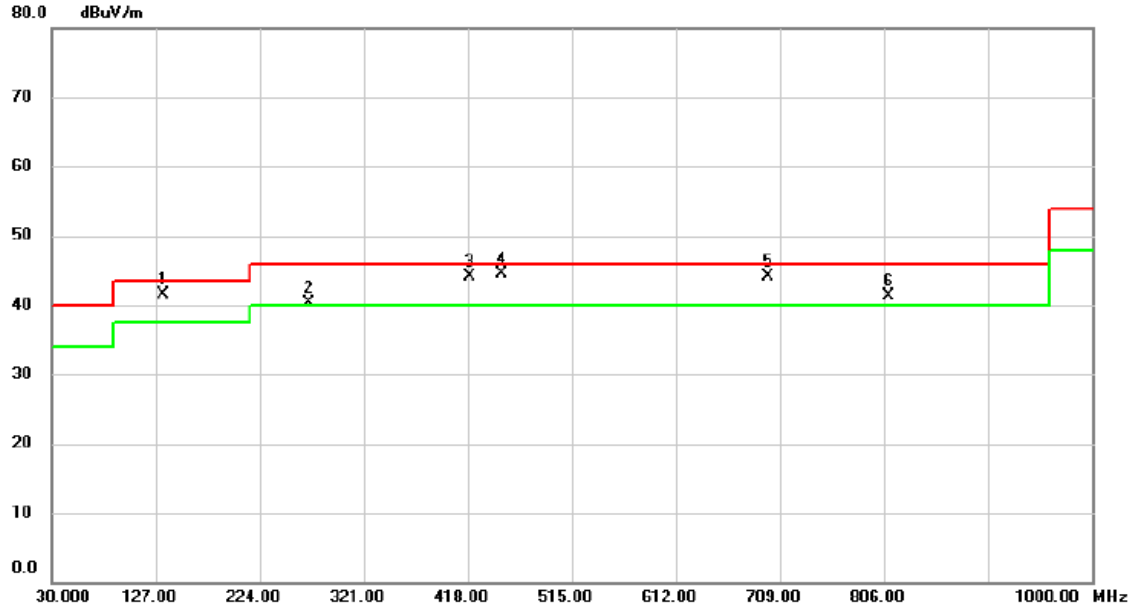


No.	Mk.	Freq.	Reading Level	Correct Factor	Measure-ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	*	0.1500	52.11	21.27	73.38	104.09	-30.71	AVG	
2		2.2992	15.62	21.12	36.74	69.54	-32.80	QP	
3		7.5827	15.22	21.21	36.43	69.54	-33.11	QP	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

APPENDIX C - RADIATED EMISSION - 30 MHZ TO 1000 MHZ

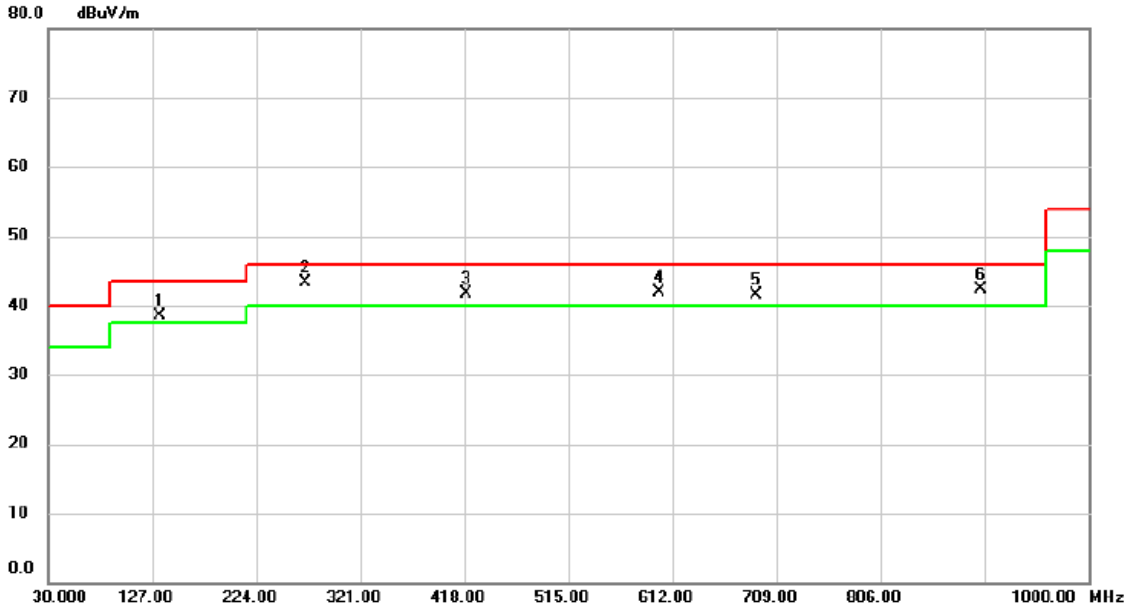
Test Mode	TX A Mode Channel 48 (UNII-1)	Polarization	Vertical



No.	Mk.	Freq.	Reading Level	Correct Factor	Measure-ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	!	133.7900	53.61	-12.14	41.47	43.50	-2.03	peak	
2	!	270.0750	51.76	-11.52	40.24	46.00	-5.76	peak	
3	!	419.9400	51.73	-7.53	44.20	46.00	-1.80	peak	
4	*	450.0100	51.27	-6.78	44.49	46.00	-1.51	peak	
5	!	698.3300	46.46	-2.32	44.14	46.00	-1.86	peak	
6	!	809.8800	42.32	-1.09	41.23	46.00	-4.77	peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

Test Mode	TX A Mode Channel 48 (UNII-1)	Polarization	Horizontal

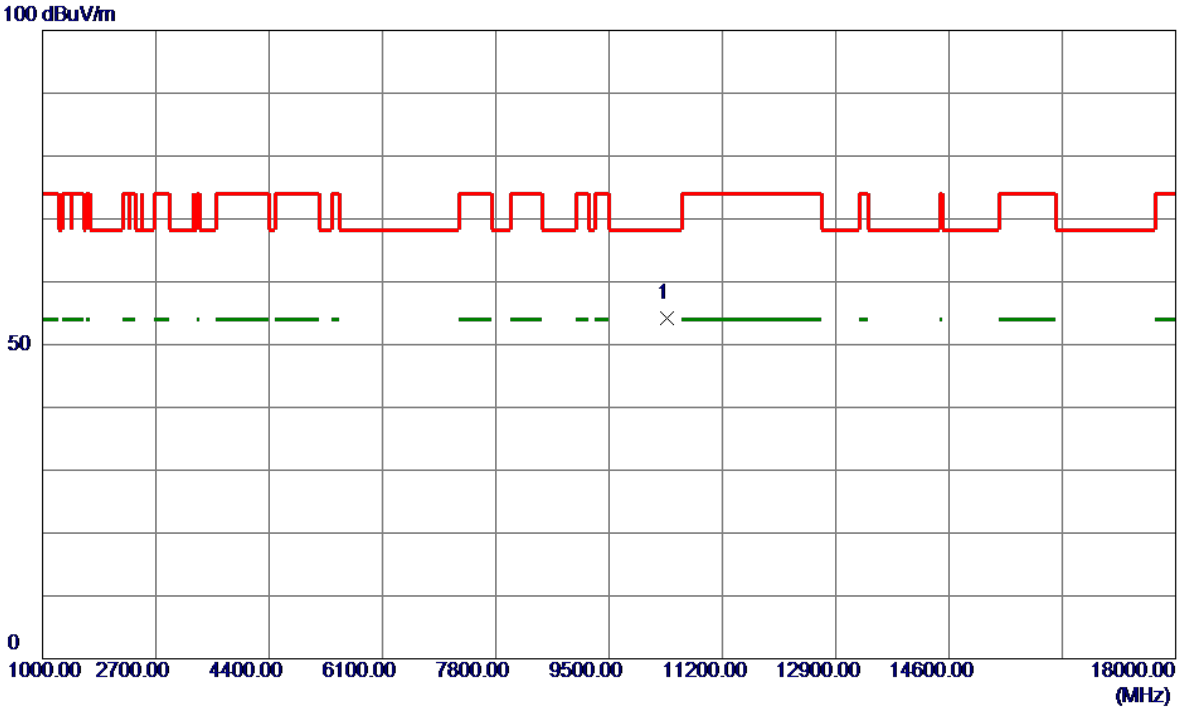


No.	Mk.	Freq.	Reading Level	Correct Factor	Measure-ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	!	133.7900	50.61	-12.14	38.47	43.50	-5.03	peak	
2	*	270.0750	54.76	-11.52	43.24	46.00	-2.76	peak	
3	!	419.9400	49.23	-7.53	41.70	46.00	-4.30	peak	
4	!	599.8750	45.43	-3.60	41.83	46.00	-4.17	peak	
5	!	689.6000	43.89	-2.41	41.48	46.00	-4.52	peak	
6	!	899.6050	42.05	0.30	42.35	46.00	-3.65	peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

APPENDIX D - RADIATED EMISSION - ABOVE 1000 MHZ

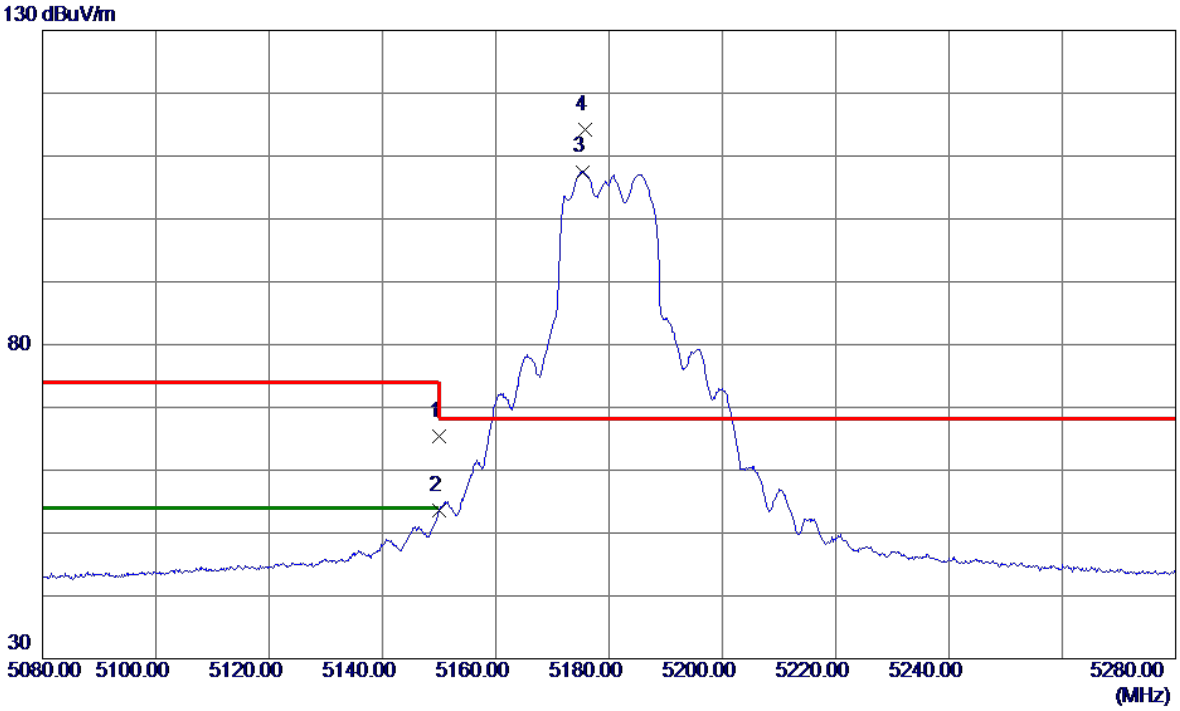
Test Mode	UNII-1_TX A Mode 5180 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	10364.9400	45.02	9.13	54.15	68.20	-14.05	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

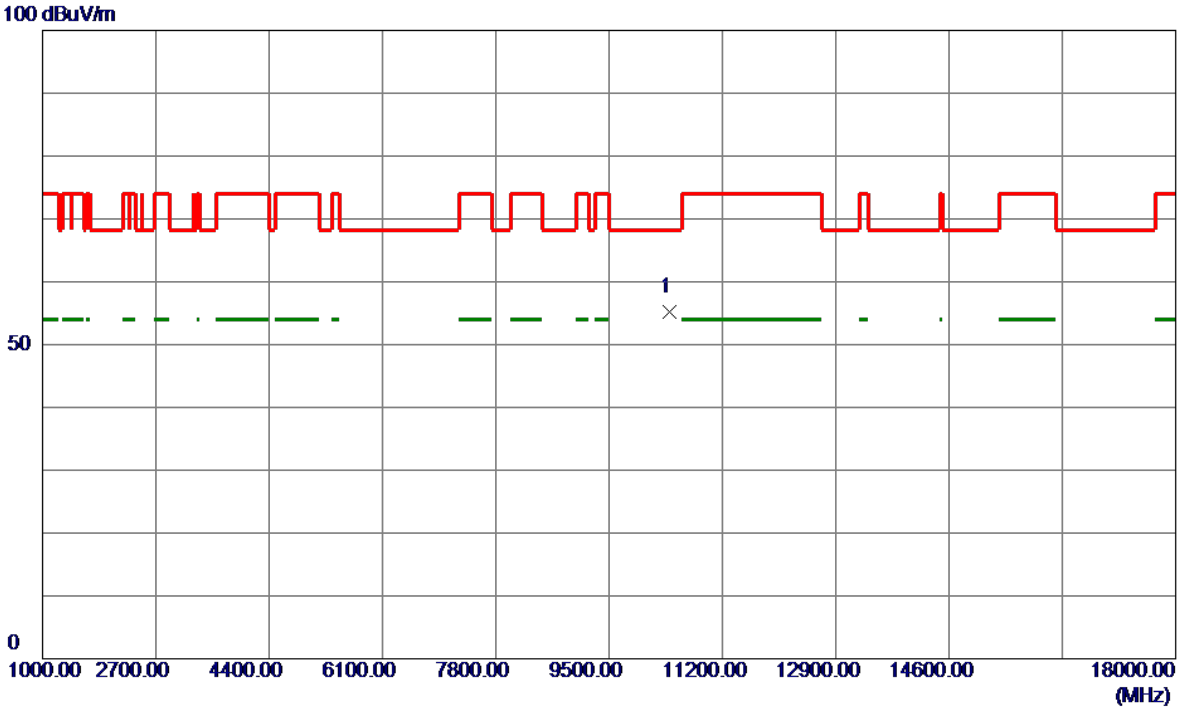
Test Mode	UNII-1_TX A Mode 5180 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	5150.0000	51.75	13.56	65.31	74.00	-8.69	Peak	
2	5150.0000	39.95	13.56	53.51	54.00	-0.49	AVG	
3	5175.4000	93.89	13.61	107.50	999.00	-891.50	AVG	No Limit
4 *	5175.7000	100.56	13.61	114.17	68.20	45.97	Peak	No Limit

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

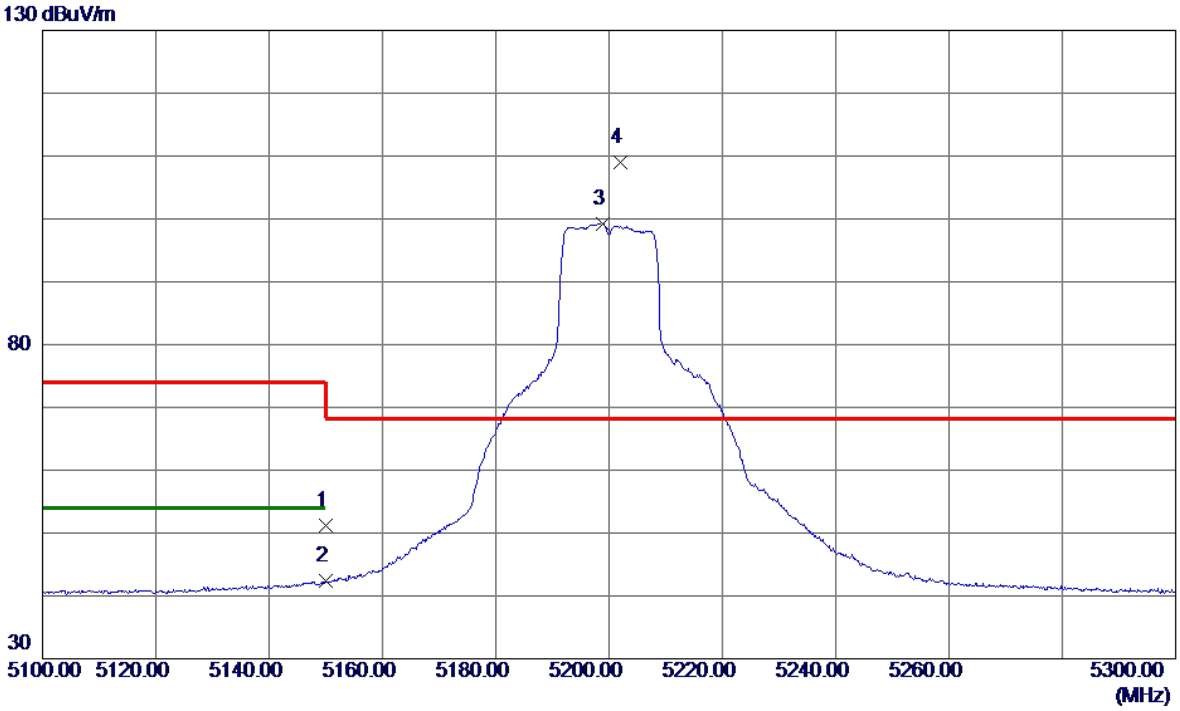
Test Mode	UNII-1_TX A Mode 5200 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	10400.8750	45.94	9.17	55.11	68.20	-13.09	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

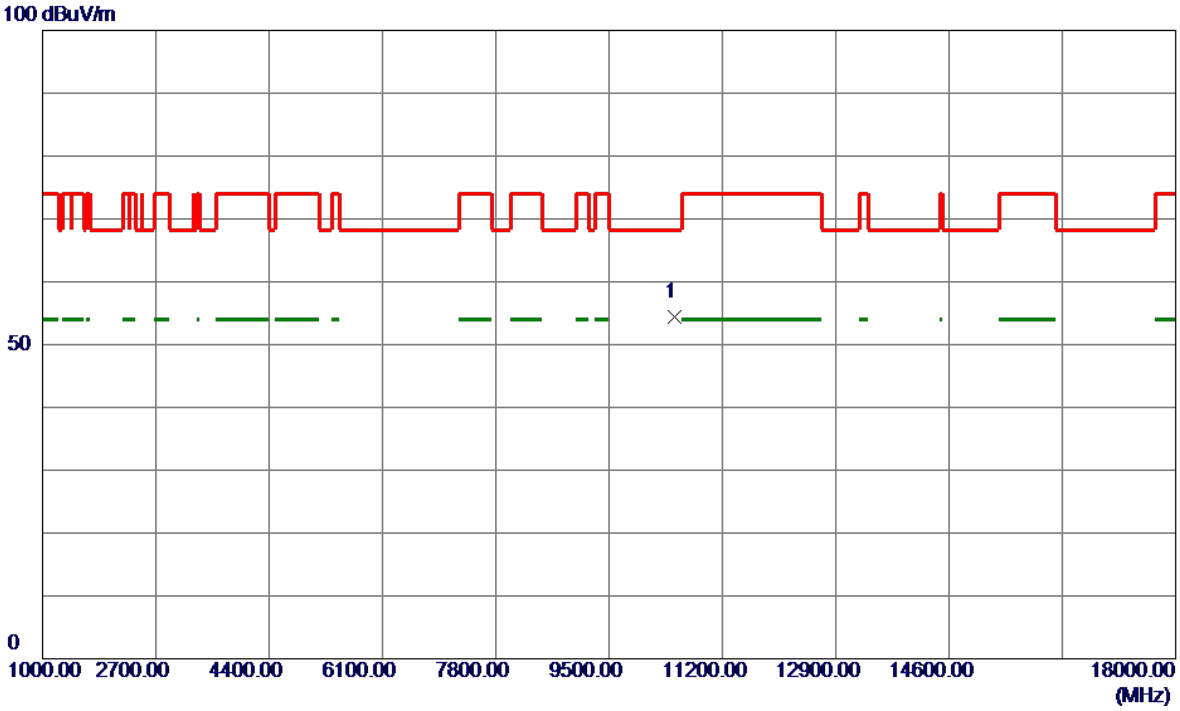
Test Mode	UNII-1_TX A Mode 5200 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	5150.0000	37.72	13.56	51.28	74.00	-22.72	Peak	
2	5150.0000	28.75	13.56	42.31	54.00	-11.69	AVG	
3	5198.9000	85.62	13.66	99.28	999.00	-899.72	AVG	No Limit
4 *	5201.9000	95.23	13.67	108.90	68.20	40.70	Peak	No Limit

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

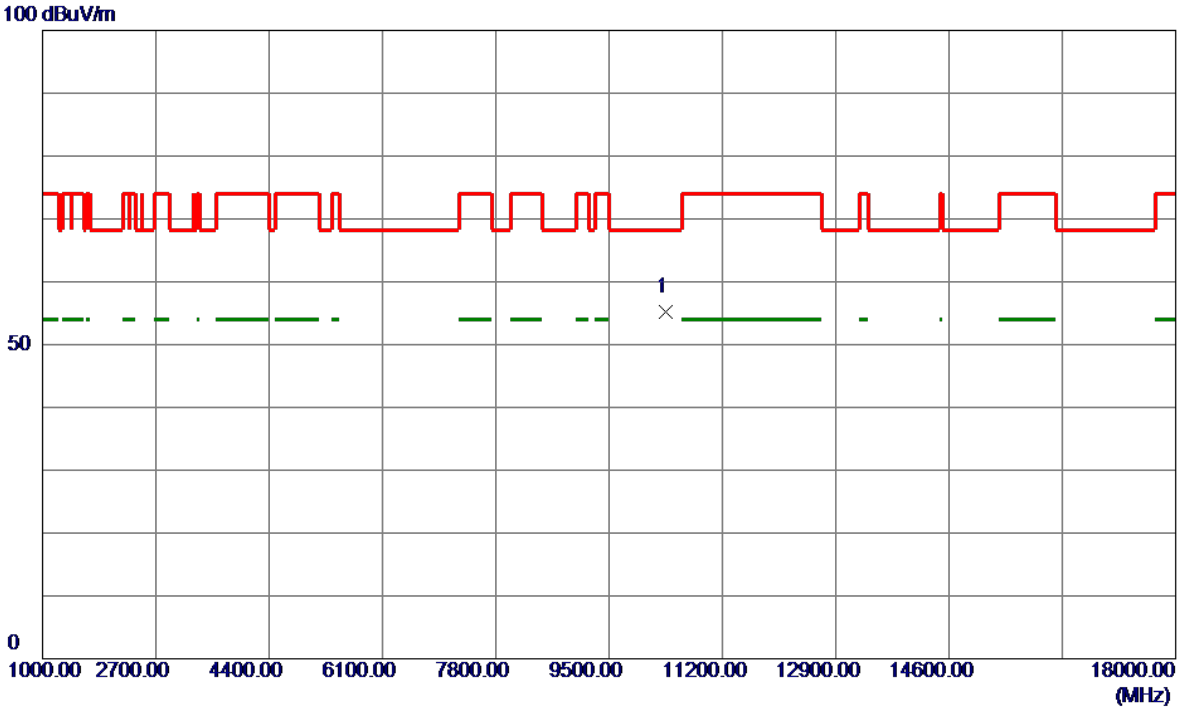
Test Mode	UNII-1_TX A Mode 5240 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	10480.3750	45.04	9.27	54.31	68.20	-13.89	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

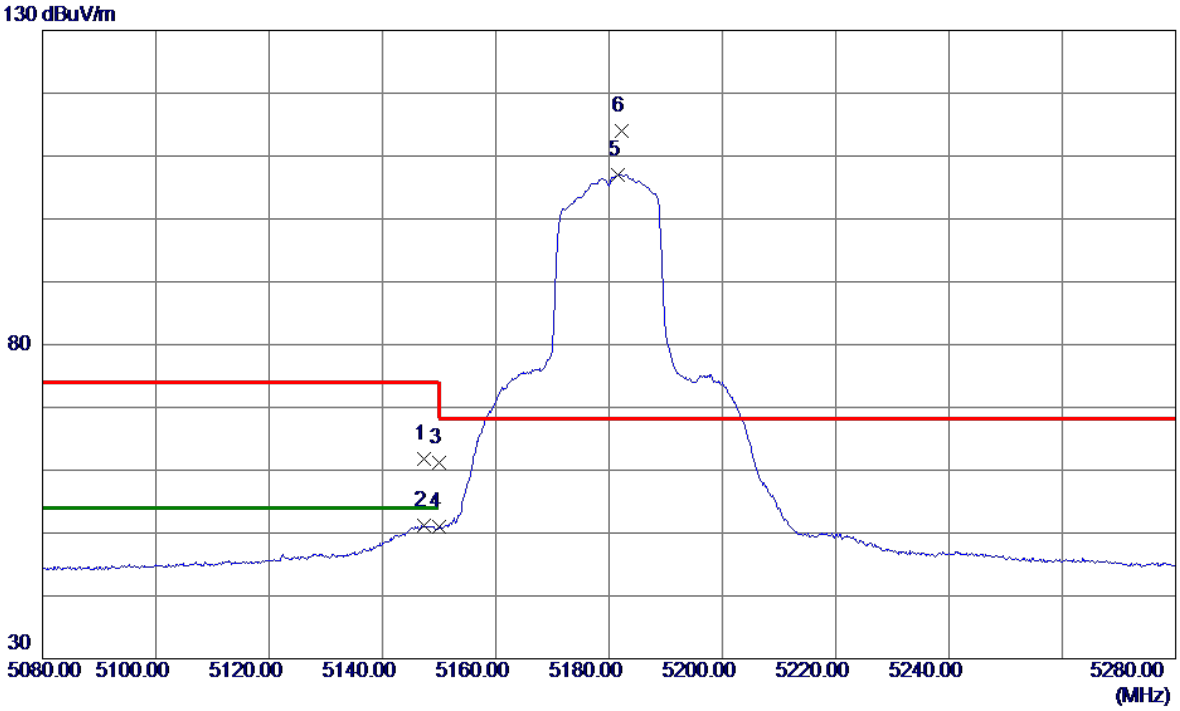
Test Mode	UNII-1_TX AC(VHT20) Mode 5180 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	10359.2250	46.08	9.13	55.21	68.20	-12.99	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

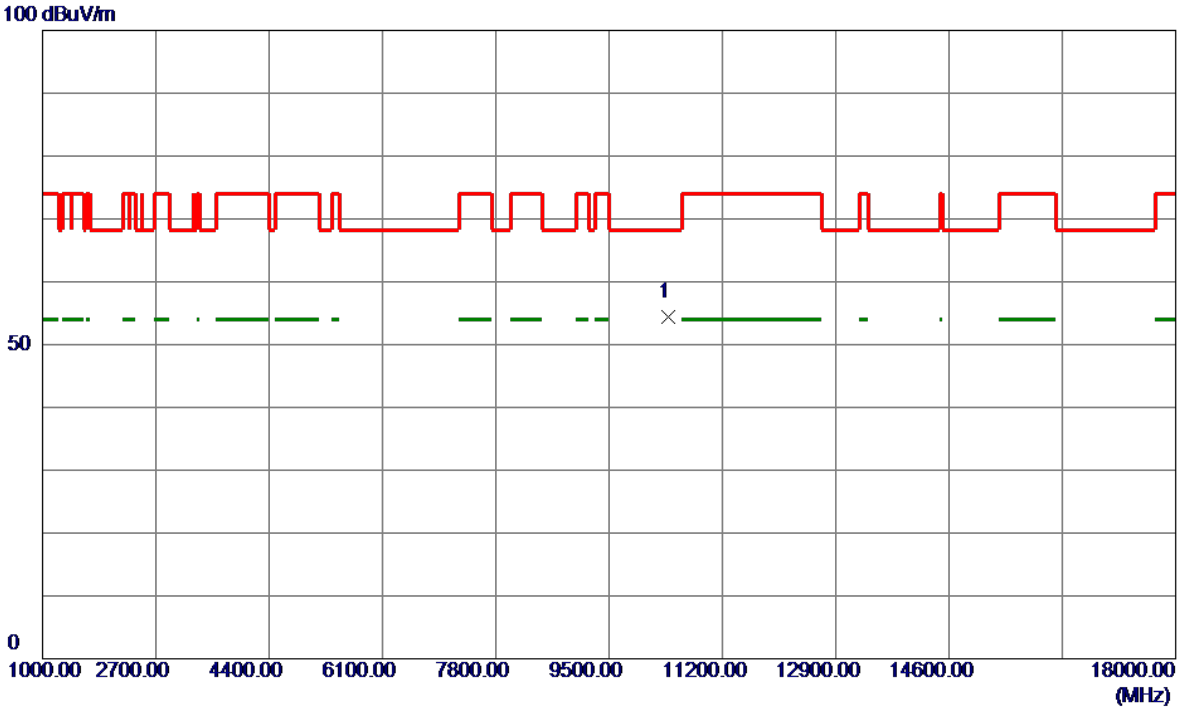
Test Mode	UNII-1_TX AC(VHT20) Mode 5180 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	5147.4000	48.16	13.56	61.72	74.00	-12.28	Peak	
2	5147.4000	37.64	13.56	51.20	54.00	-2.80	AVG	
3	5150.0000	47.57	13.56	61.13	74.00	-12.87	Peak	
4	5150.0000	37.40	13.56	50.96	54.00	-3.04	AVG	
5	5181.5000	93.41	13.63	107.04	999.00	-891.96	AVG	No Limit
6 *	5182.2000	100.29	13.63	113.92	68.20	45.72	Peak	No Limit

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

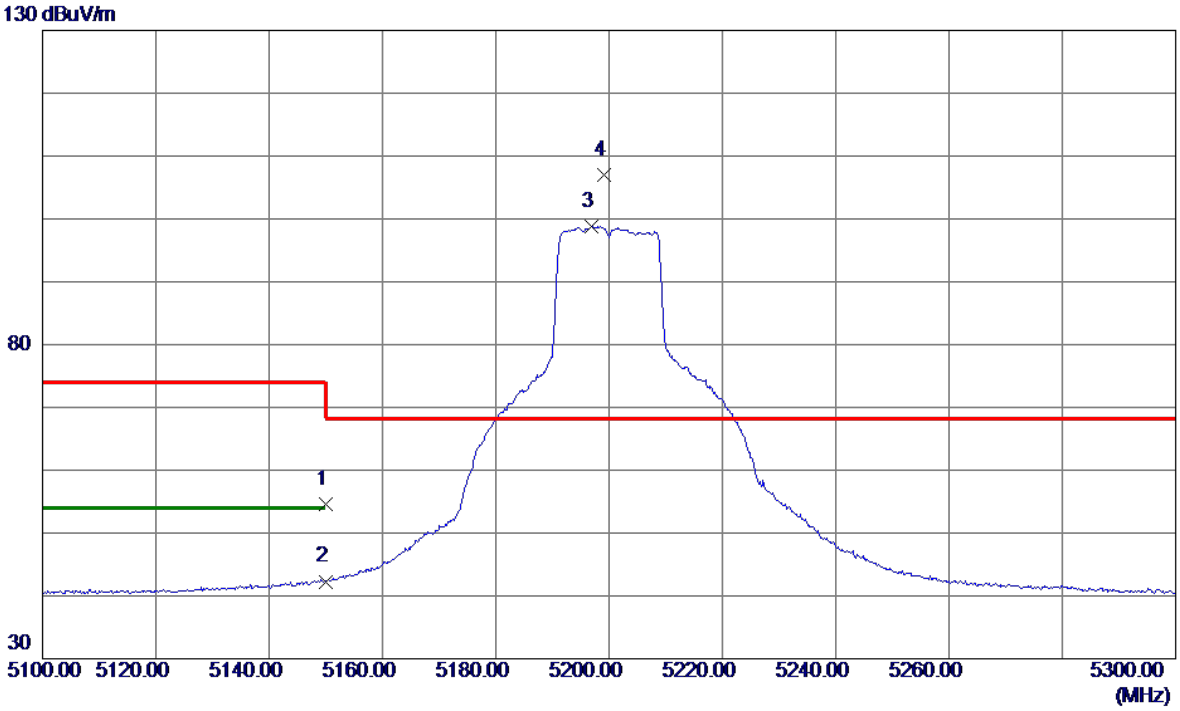
Test Mode	UNII-1_TX AC(VHT20) Mode 5200 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	10396.6500	45.31	9.17	54.48	68.20	-13.72	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

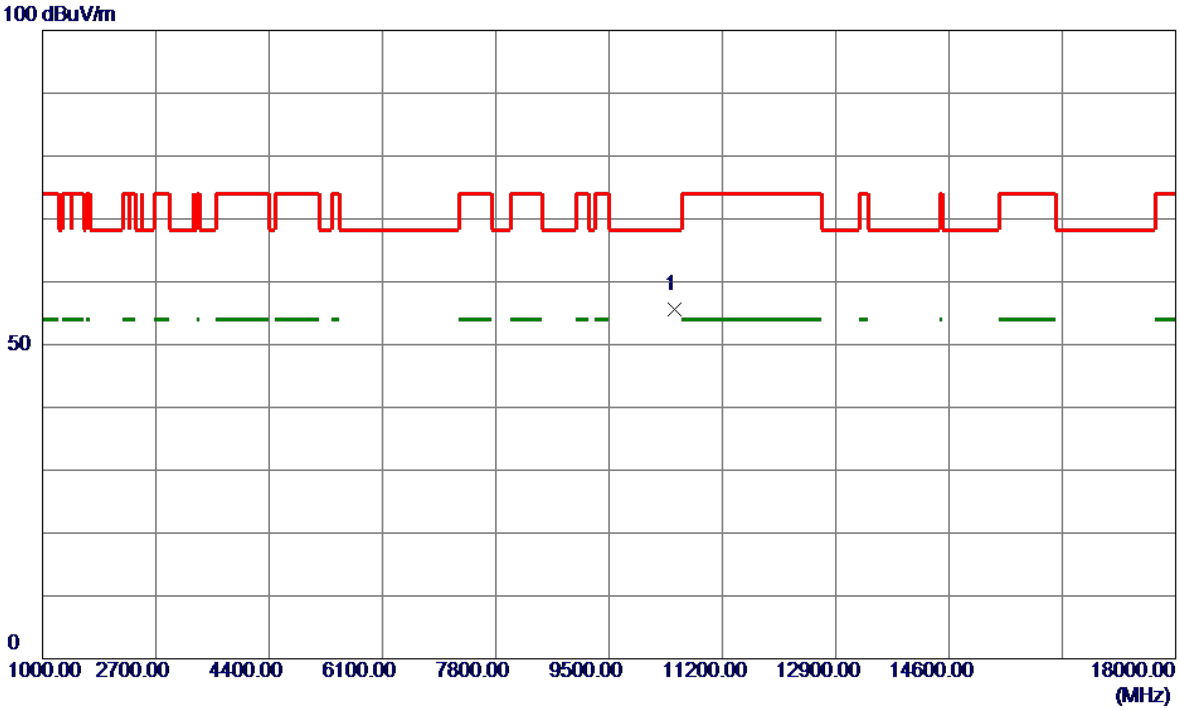
Test Mode	UNII-1_TX AC(VHT20) Mode 5200 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	5150.0000	40.95	13.56	54.51	74.00	-19.49	Peak	
2	5150.0000	28.74	13.56	42.30	54.00	-11.70	AVG	
3	5196.9000	85.17	13.66	98.83	999.00	-900.17	AVG	No Limit
4 *	5199.2000	93.32	13.66	106.98	68.20	38.78	Peak	No Limit

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

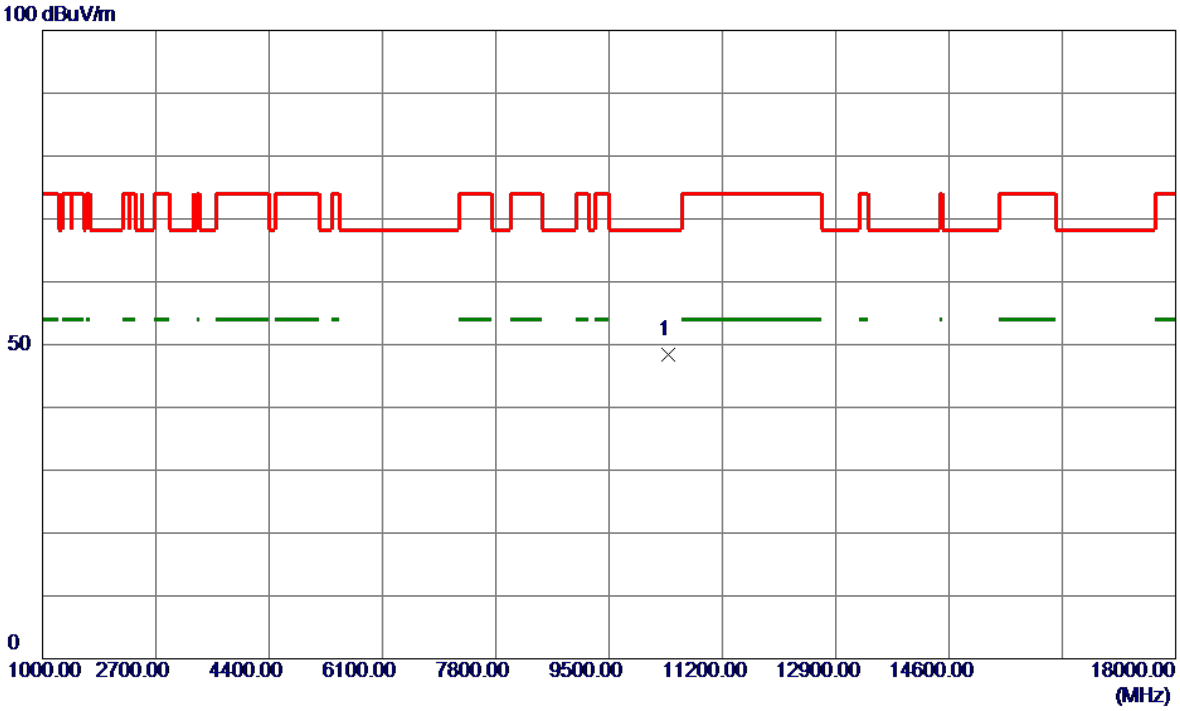
Test Mode	UNII-1_TX AC(VHT20) Mode 5240 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	10477.7750	46.34	9.26	55.60	68.20	-12.60	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

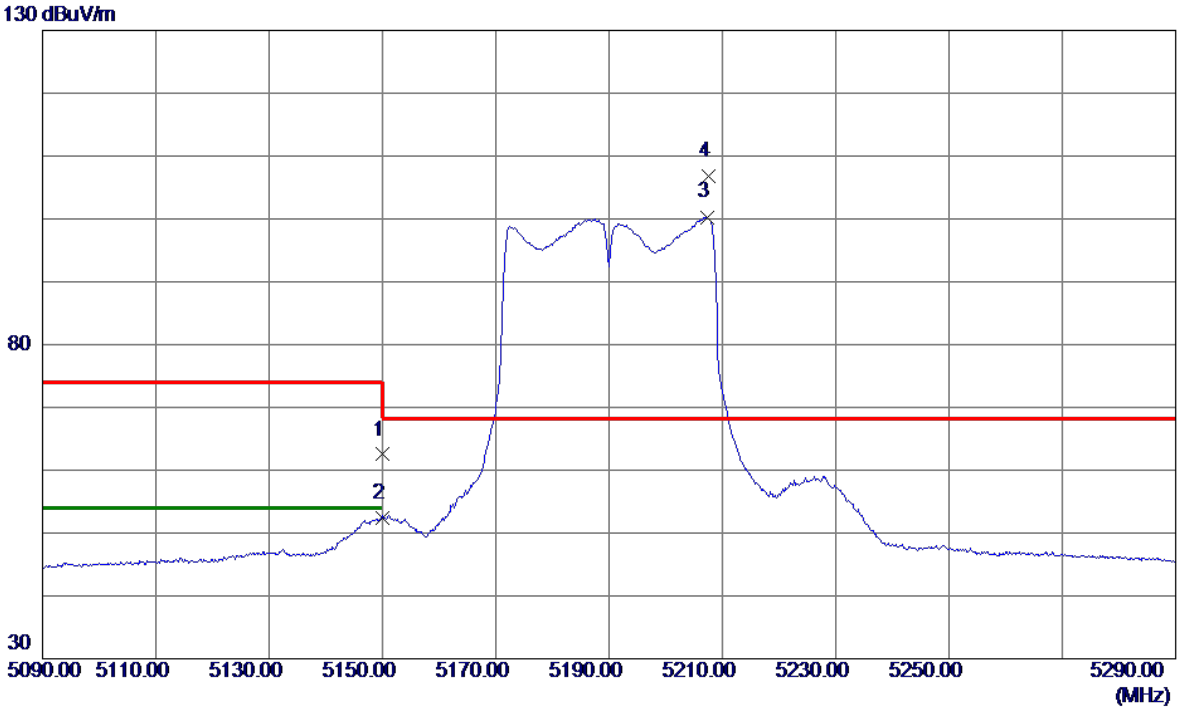
Test Mode	UNII-1_TX AC(VHT40) Mode 5190 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	10379.0500	39.33	9.15	48.48	68.20	-19.72	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

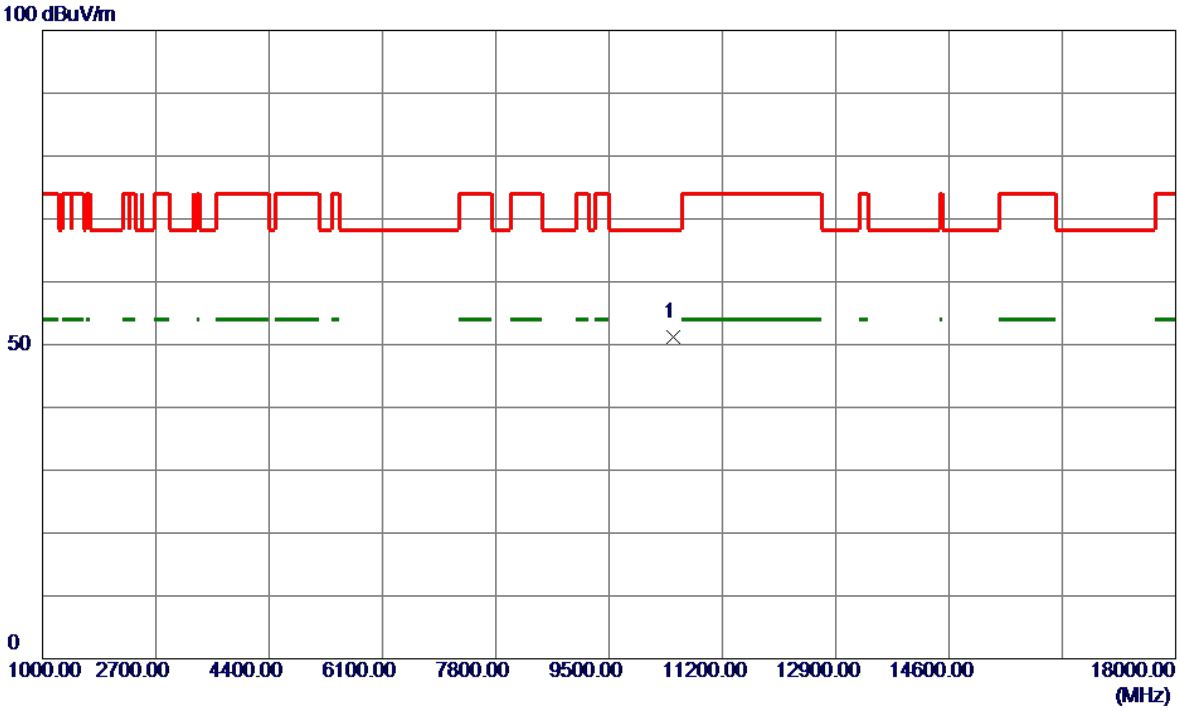
Test Mode	UNII-1_TX AC(VHT40) Mode 5190 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	5150.0000	48.94	13.56	62.50	74.00	-11.50	Peak	
2	5150.0000	38.90	13.56	52.46	54.00	-1.54	AVG	
3	5207.4000	86.62	13.68	100.30	999.00	-898.70	AVG	No Limit
4 *	5207.6000	93.19	13.68	106.87	68.20	38.67	Peak	No Limit

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

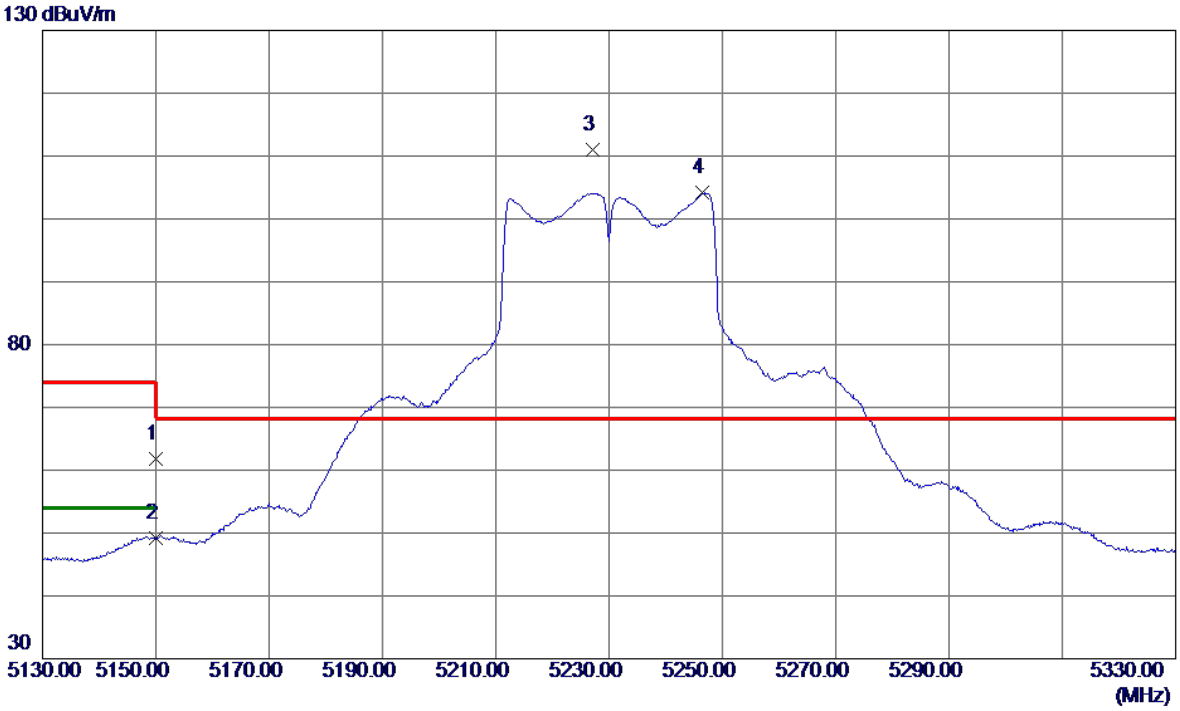
Test Mode	UNII-1_TX AC(VHT40) Mode 5230 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	10460.0500	41.96	9.24	51.20	68.20	-17.00	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

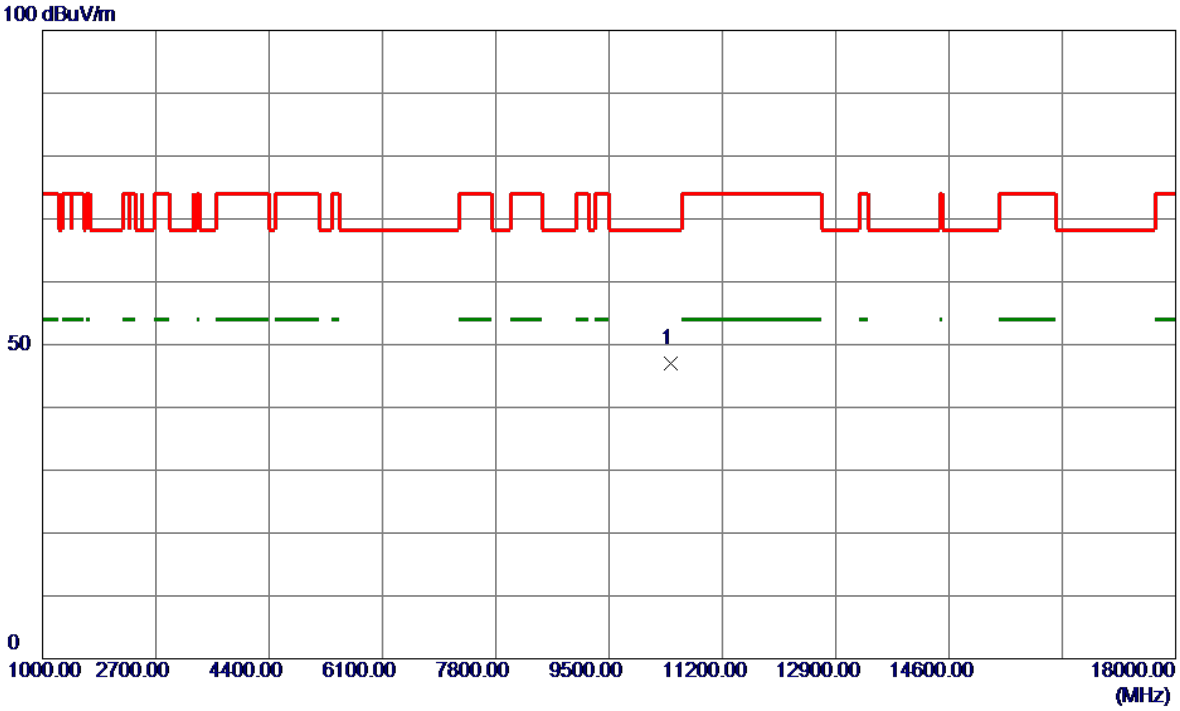
Test Mode	UNII-1_TX AC(VHT40) Mode 5230 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	5150.0000	48.22	13.56	61.78	74.00	-12.22	Peak	
2	5150.0000	35.64	13.56	49.20	54.00	-4.80	AVG	
3 *	5227.2000	97.32	13.72	111.04	68.20	42.84	Peak	No Limit
4	5246.5000	90.36	13.76	104.12	999.00	-894.88	AVG	No Limit

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

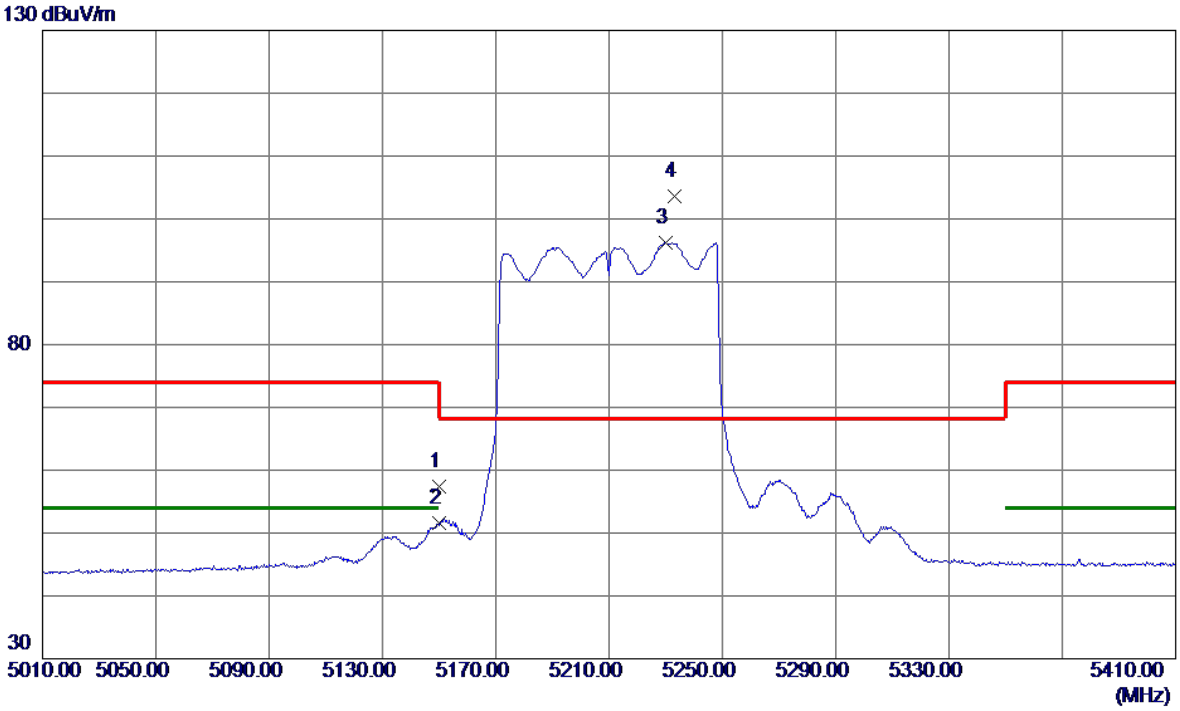
Test Mode	UNII-1_TX AC(VHT80) Mode 5210 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	10434.6000	37.74	9.21	46.95	68.20	-21.25	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

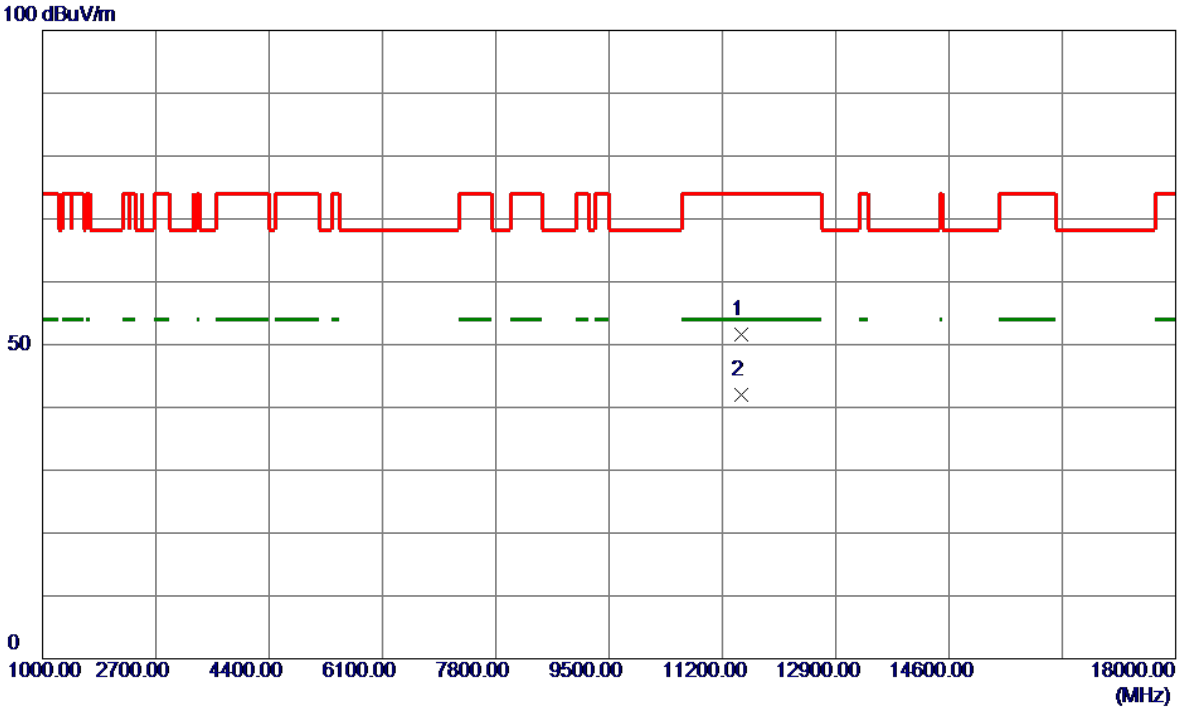
Test Mode	UNII-1_TX AC(VHT80) Mode 5210 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	5150.0000	43.91	13.56	57.47	74.00	-16.53	Peak	
2	5150.0000	38.02	13.56	51.58	54.00	-2.42	AVG	
3	5230.2000	82.50	13.73	96.23	999.00	-902.77	AVG	No Limit
4 *	5233.2000	89.81	13.73	103.54	68.20	35.34	Peak	No Limit

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

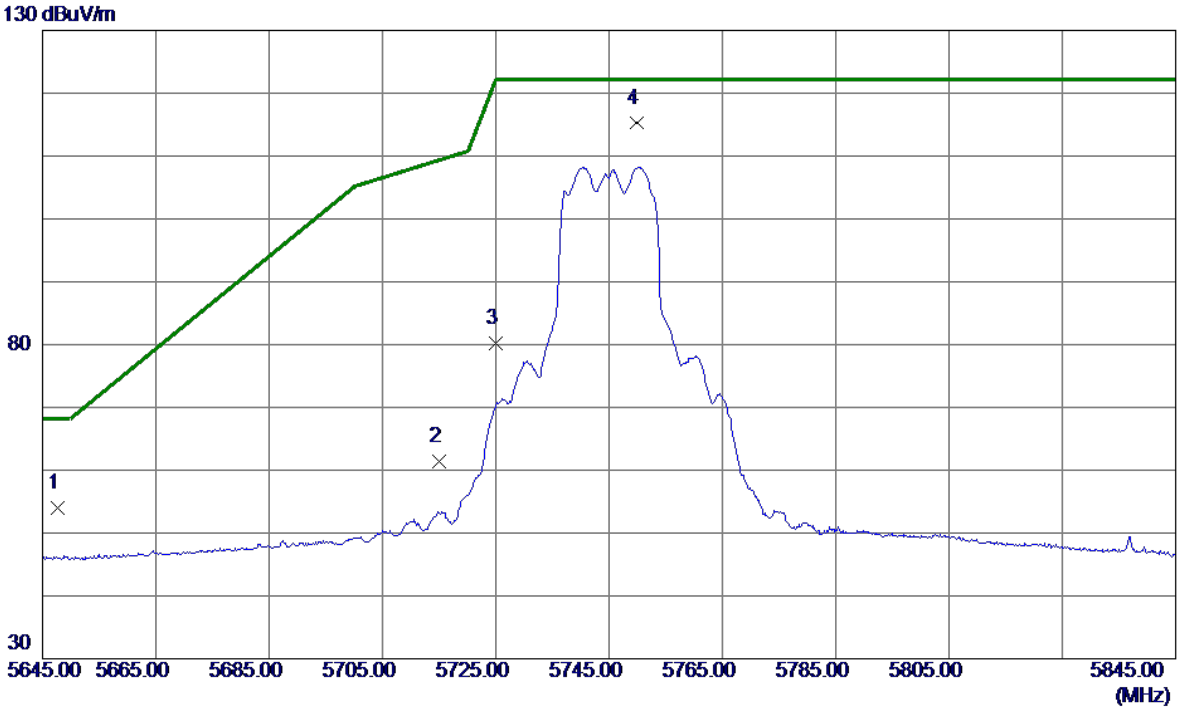
Test Mode	UNII-3_TX A Mode 5745 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	11491.6000	41.97	9.67	51.64	74.00	-22.36	Peak	
2 *	11491.8750	32.28	9.67	41.95	54.00	-12.05	AVG	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

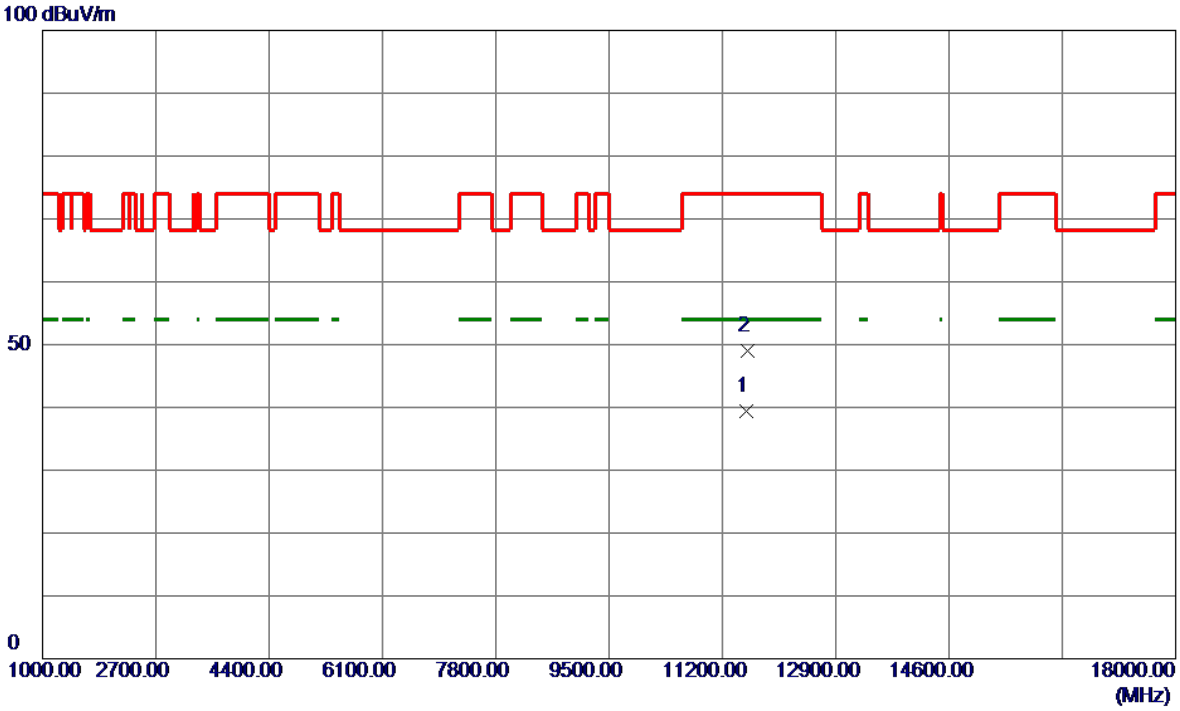
Test Mode	UNII-3_TX A Mode 5745 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	5647.7000	39.32	14.75	54.07	68.20	-14.13	Peak	
2	5715.0000	46.46	14.97	61.43	109.40	-47.97	Peak	
3	5725.0000	65.16	15.00	80.16	122.20	-42.04	Peak	
4 *	5749.8000	100.22	15.08	115.30	122.20	-6.90	Peak	No Limit

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

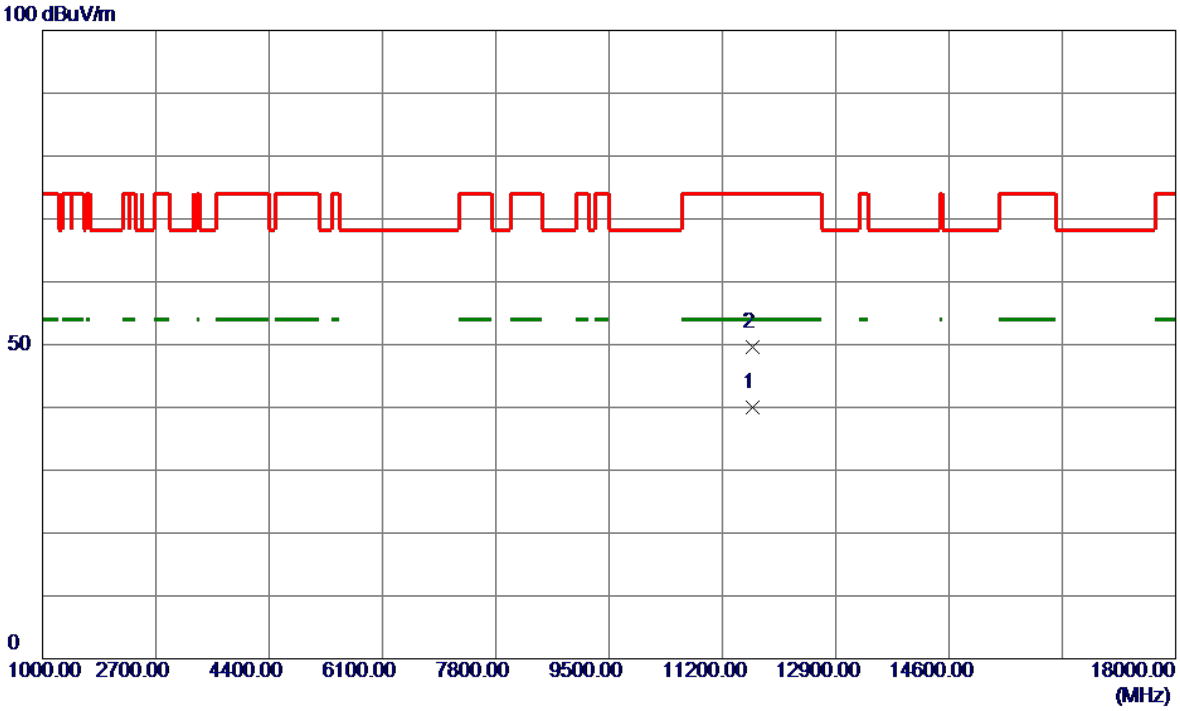
Test Mode	UNII-3_TX A Mode 5785 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	11567.7750	29.80	9.66	39.46	54.00	-14.54	AVG	
2	11572.2250	39.29	9.66	48.95	74.00	-25.05	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

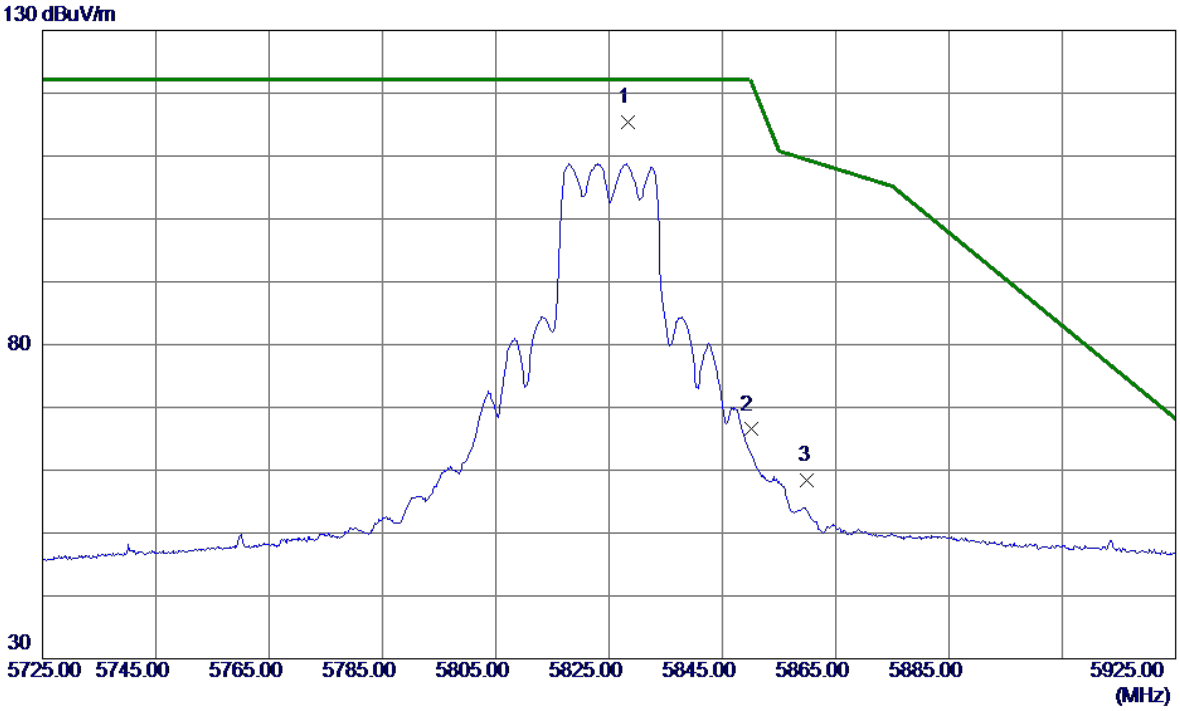
Test Mode	UNII-3_TX A Mode 5825 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	11648.0250	30.32	9.65	39.97	54.00	-14.03	AVG	
2	11657.8500	40.02	9.65	49.67	74.00	-24.33	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

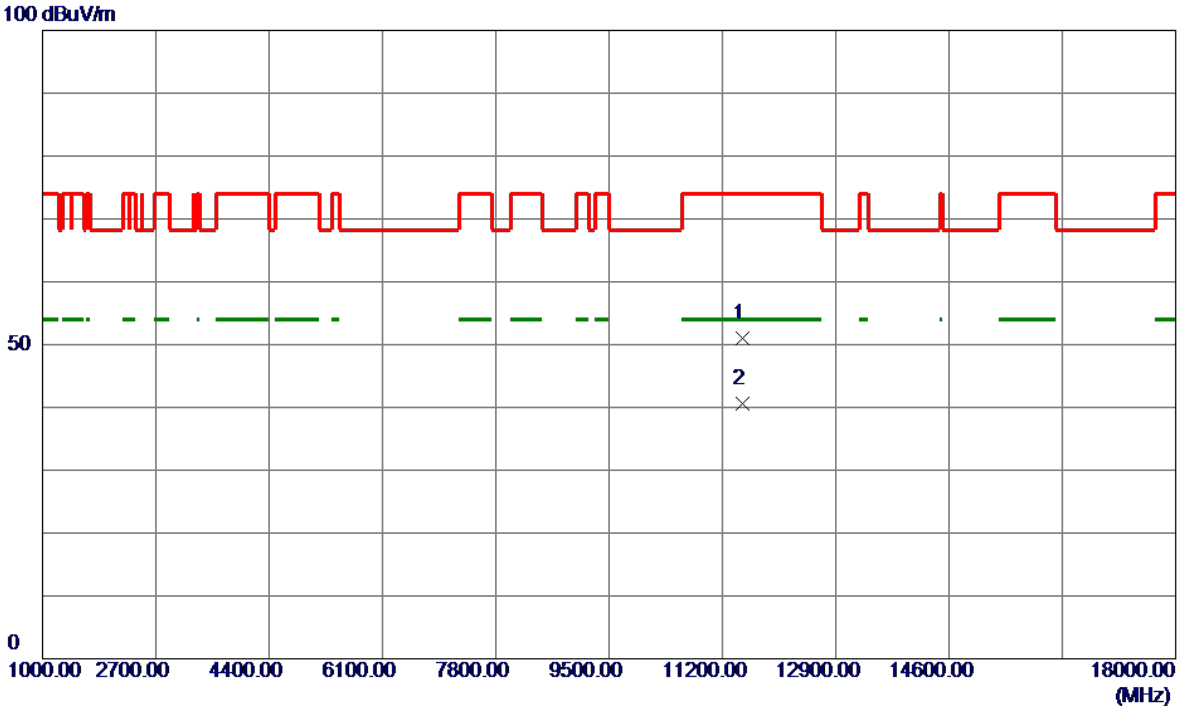
Test Mode	UNII-3_TX A Mode 5825 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	5828.3000	100.08	15.33	115.41	122.20	-6.79	Peak	No Limit
2	5850.0000	51.11	15.39	66.50	122.20	-55.70	Peak	
3	5860.0000	42.96	15.43	58.39	109.40	-51.01	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

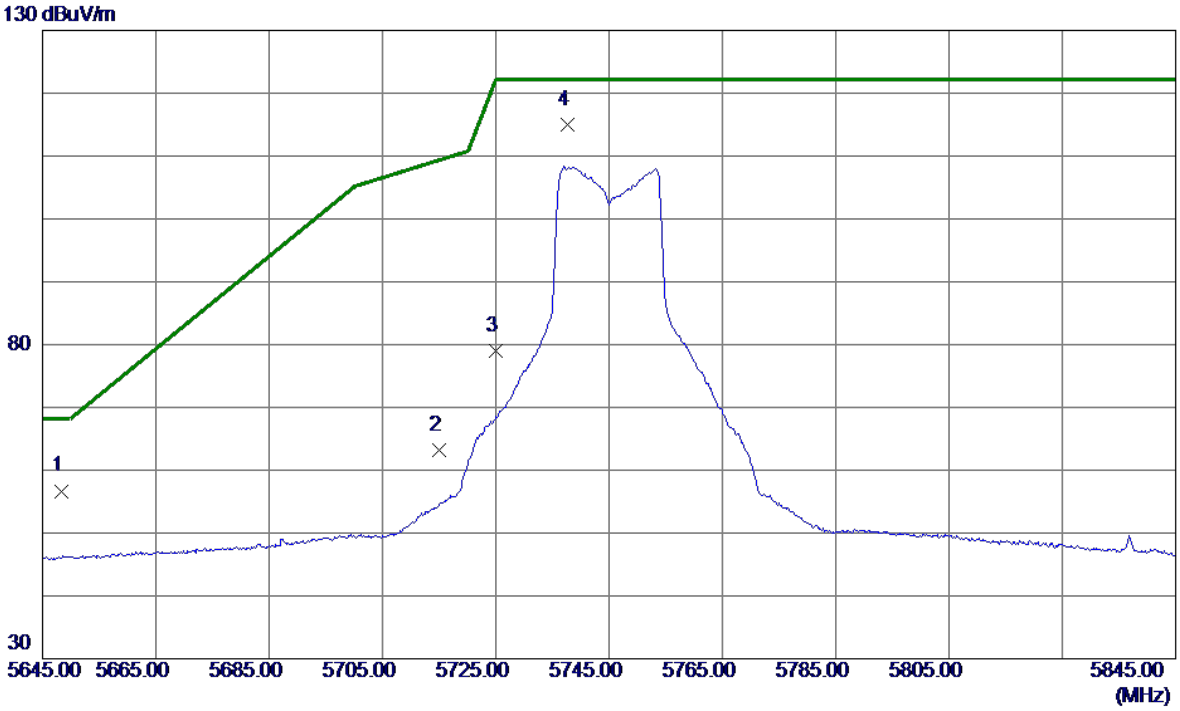
Test Mode	UNII-3_TX AC(VHT20) Mode 5745 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	11494.3000	41.39	9.67	51.06	74.00	-22.94	Peak	
2 *	11495.3000	30.92	9.67	40.59	54.00	-13.41	AVG	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

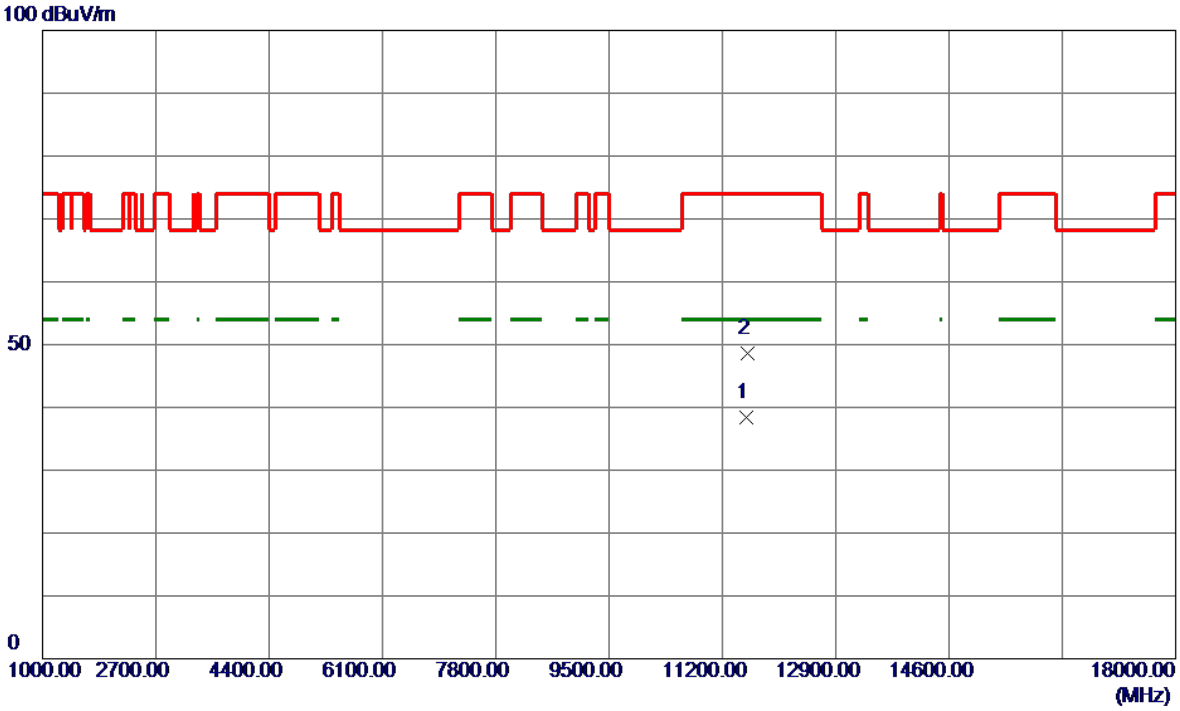
Test Mode	UNII-3_TX AC(VHT20) Mode 5745 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	5648.4000	41.94	14.76	56.70	68.20	-11.50	Peak	
2	5715.0000	48.23	14.97	63.20	109.40	-46.20	Peak	
3	5725.0000	63.95	15.00	78.95	122.20	-43.25	Peak	
4 *	5737.6000	99.90	15.04	114.94	122.20	-7.26	Peak	No Limit

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

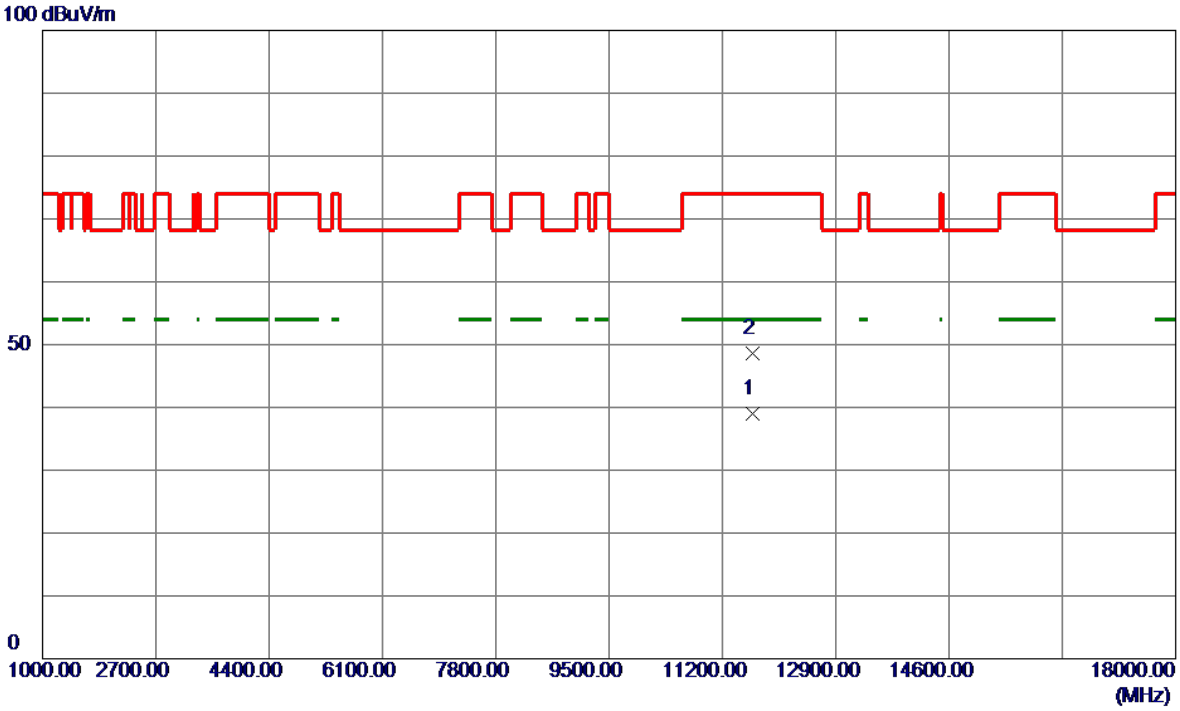
Test Mode	UNII-3_TX AC(VHT20) Mode 5785 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	11561.6250	28.64	9.67	38.31	54.00	-15.69	AVG	
2	11578.0750	38.86	9.66	48.52	74.00	-25.48	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

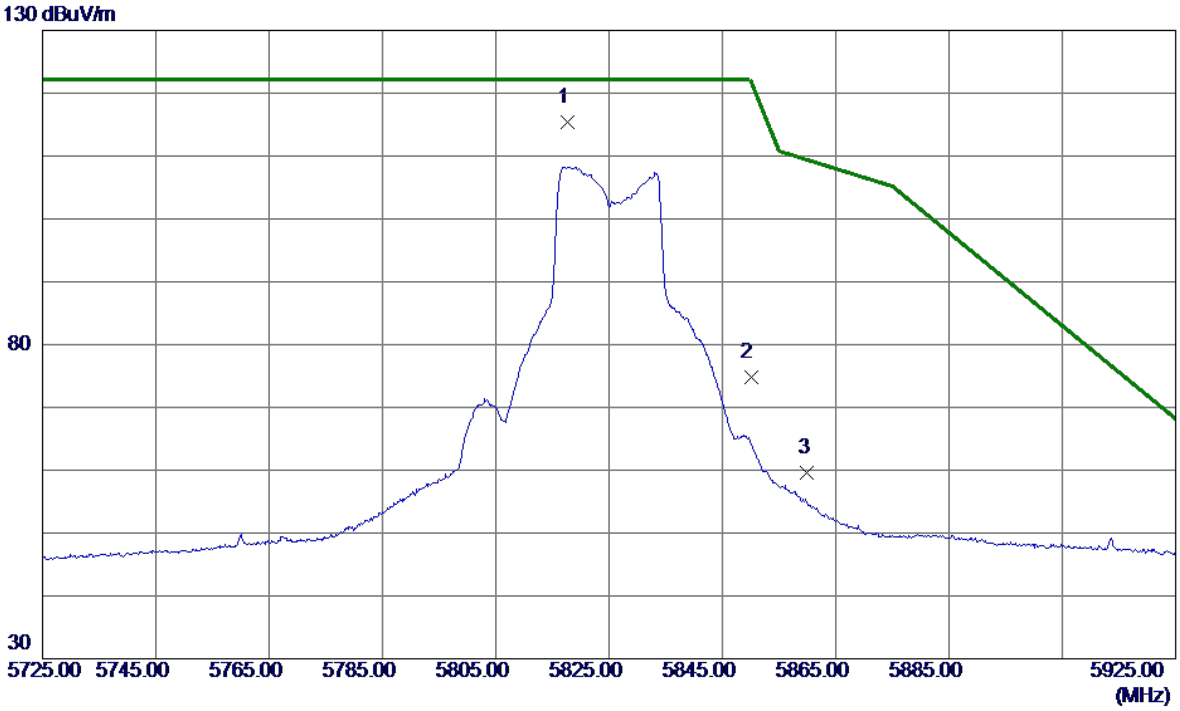
Test Mode	UNII-3_TX AC(VHT20) Mode 5825 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	11655.0000	29.44	9.65	39.09	54.00	-14.91	AVG	
2	11655.4250	38.96	9.65	48.61	74.00	-25.39	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

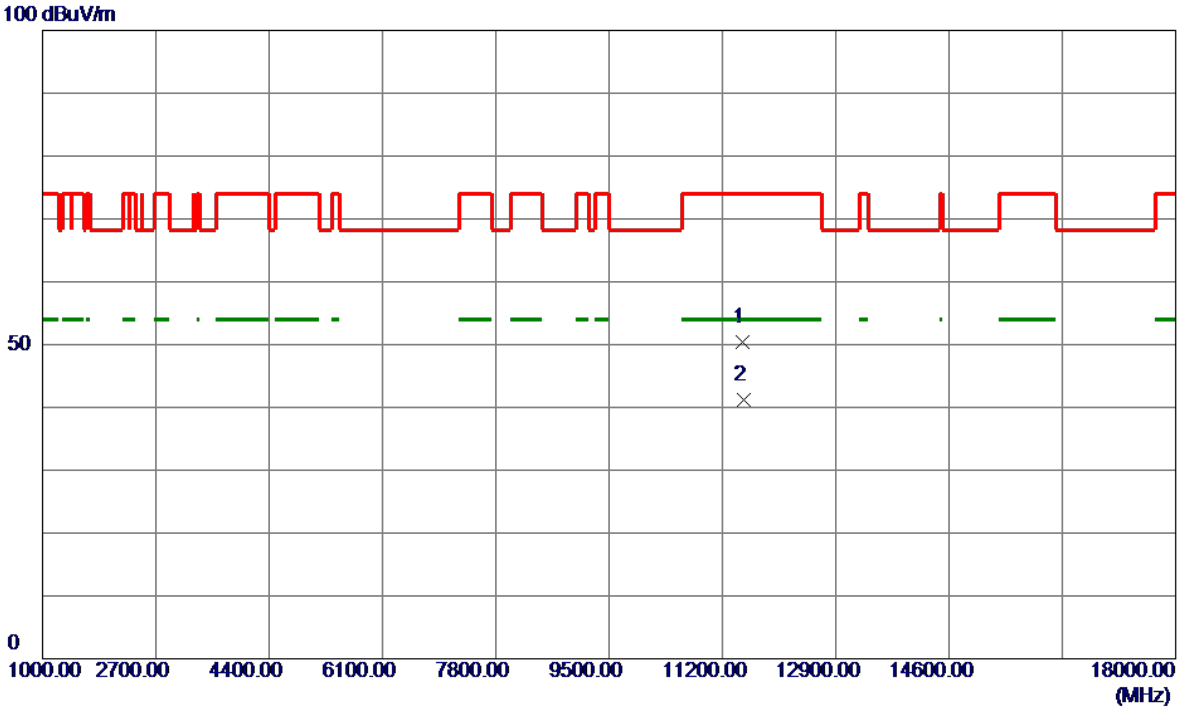
Test Mode	UNII-3_TX AC(VHT20) Mode 5825 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	5817.6000	100.04	15.29	115.33	122.20	-6.87	Peak	No Limit
2	5850.0000	59.45	15.39	74.84	122.20	-47.36	Peak	
3	5860.0000	44.10	15.43	59.53	109.40	-49.87	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

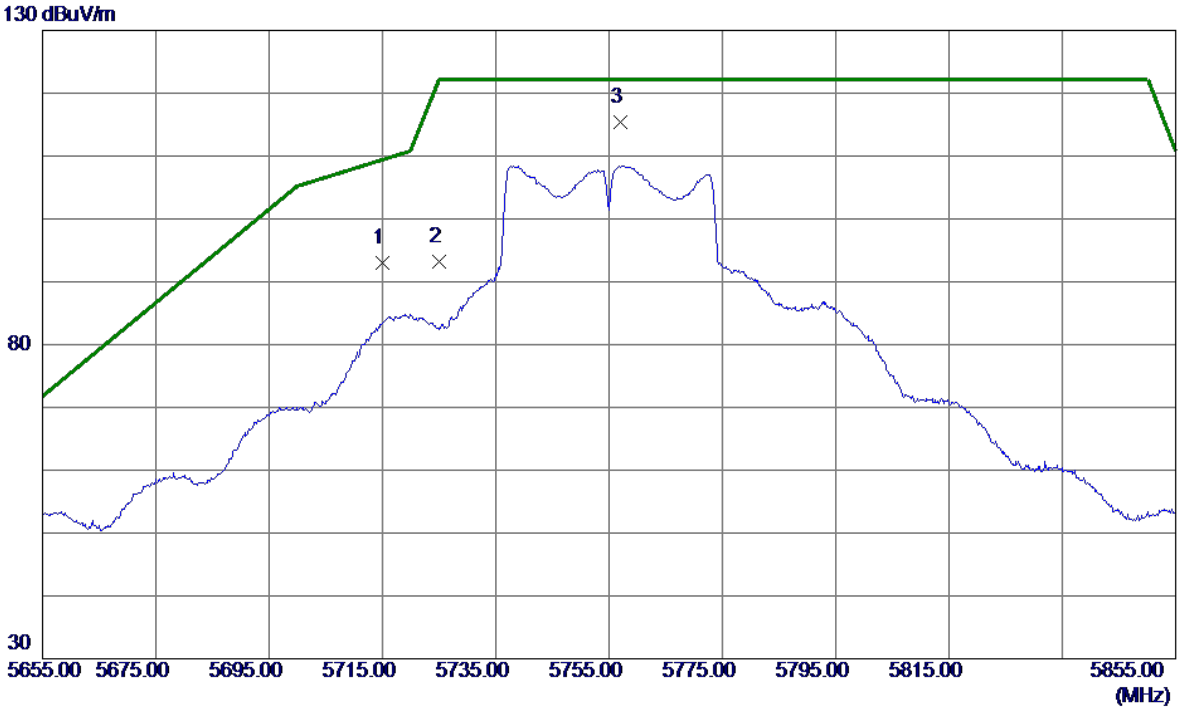
Test Mode	UNII-3_TX AC(VHT40) Mode 5755 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	11497.6500	40.67	9.67	50.34	74.00	-23.66	Peak	
2 *	11514.5000	31.51	9.67	41.18	54.00	-12.82	AVG	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

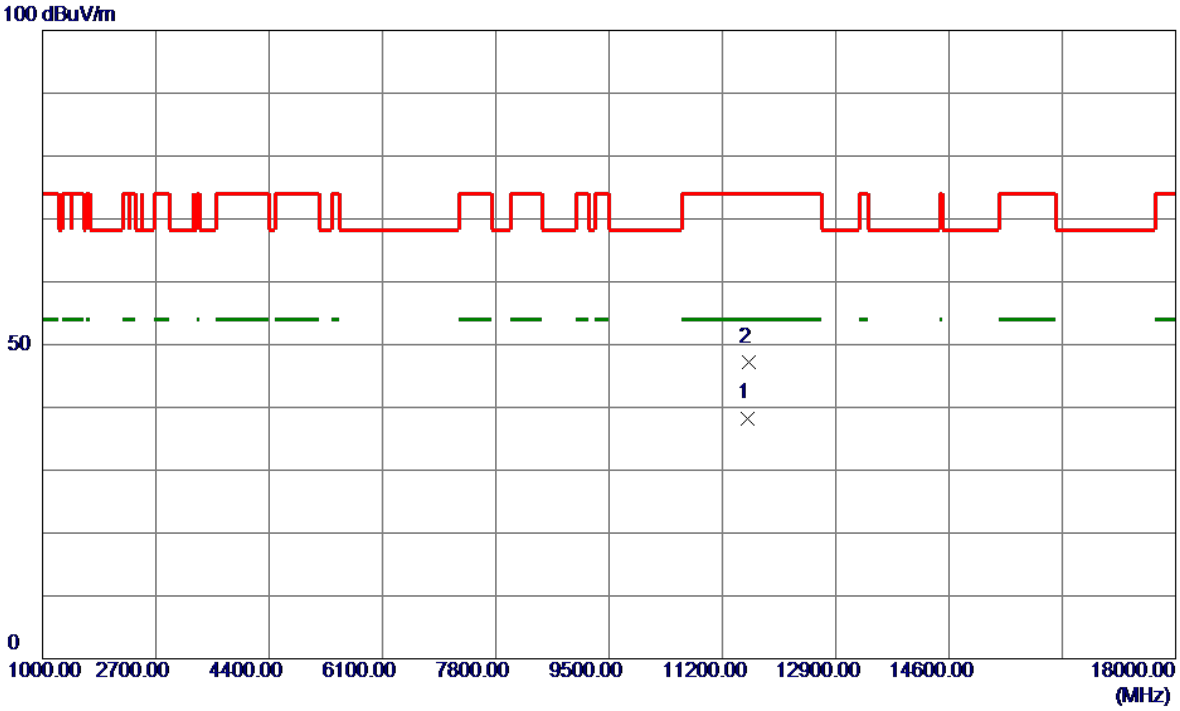
Test Mode	UNII-3_TX AC(VHT40) Mode 5755 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	5715.0000	77.95	14.97	92.92	109.40	-16.48	Peak	
2	5725.0000	78.29	15.00	93.29	122.20	-28.91	Peak	
3 *	5757.1000	100.34	15.10	115.44	122.20	-6.76	Peak	No Limit

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

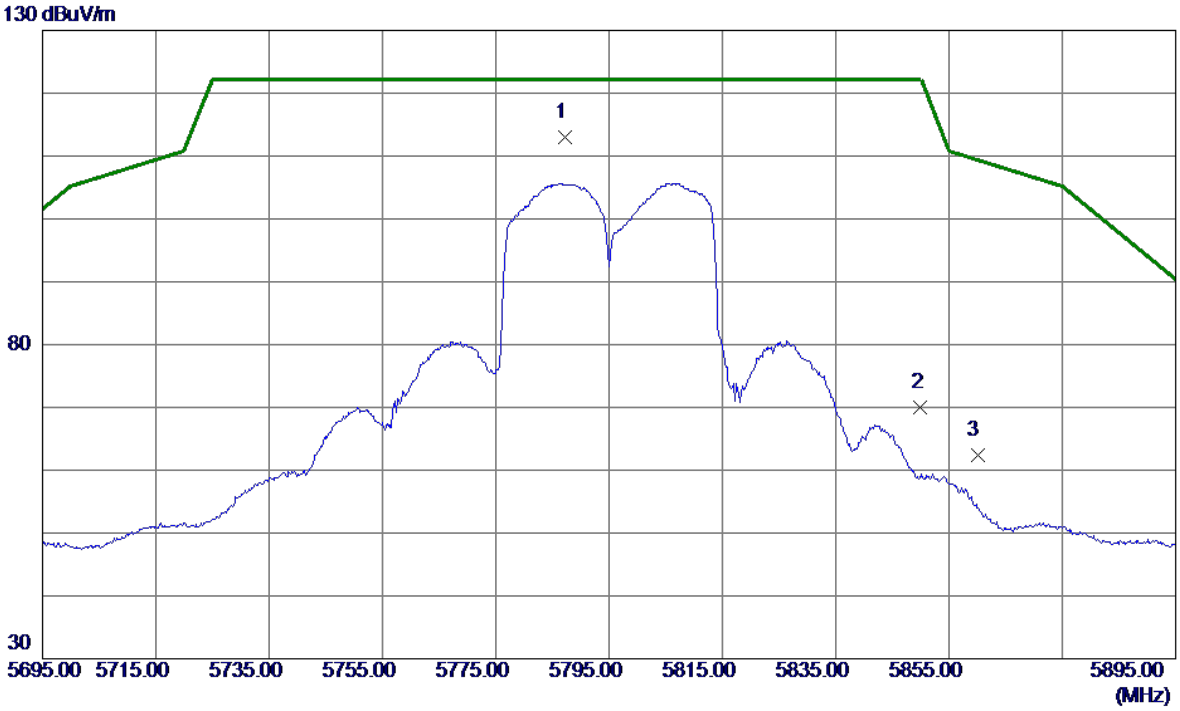
Test Mode	UNII-3_TX AC(VHT40) Mode 5795 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	11586.5000	28.64	9.66	38.30	54.00	-15.70	AVG	
2	11592.9500	37.60	9.66	47.26	74.00	-26.74	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

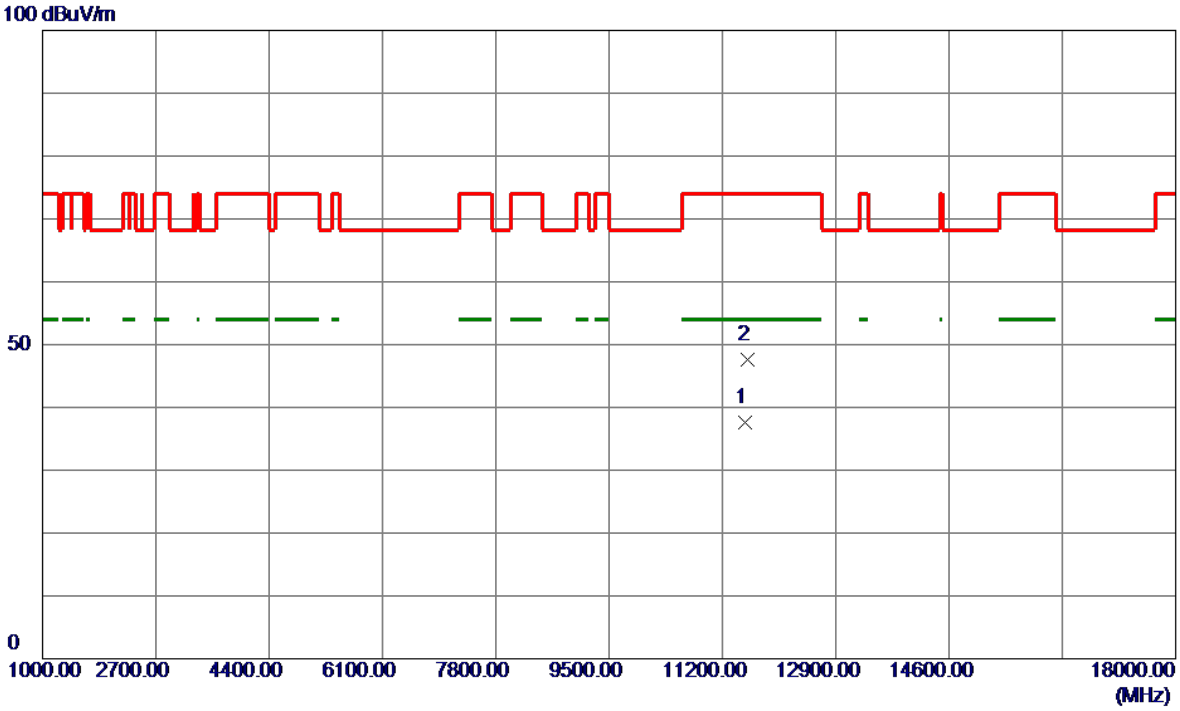
Test Mode	UNII-3_TX AC(VHT40) Mode 5795 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	5787.3000	97.75	15.20	112.95	122.20	-9.25	Peak	No Limit
2	5850.0000	54.56	15.39	69.95	122.20	-52.25	Peak	
3	5860.0000	47.01	15.43	62.44	109.40	-46.96	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

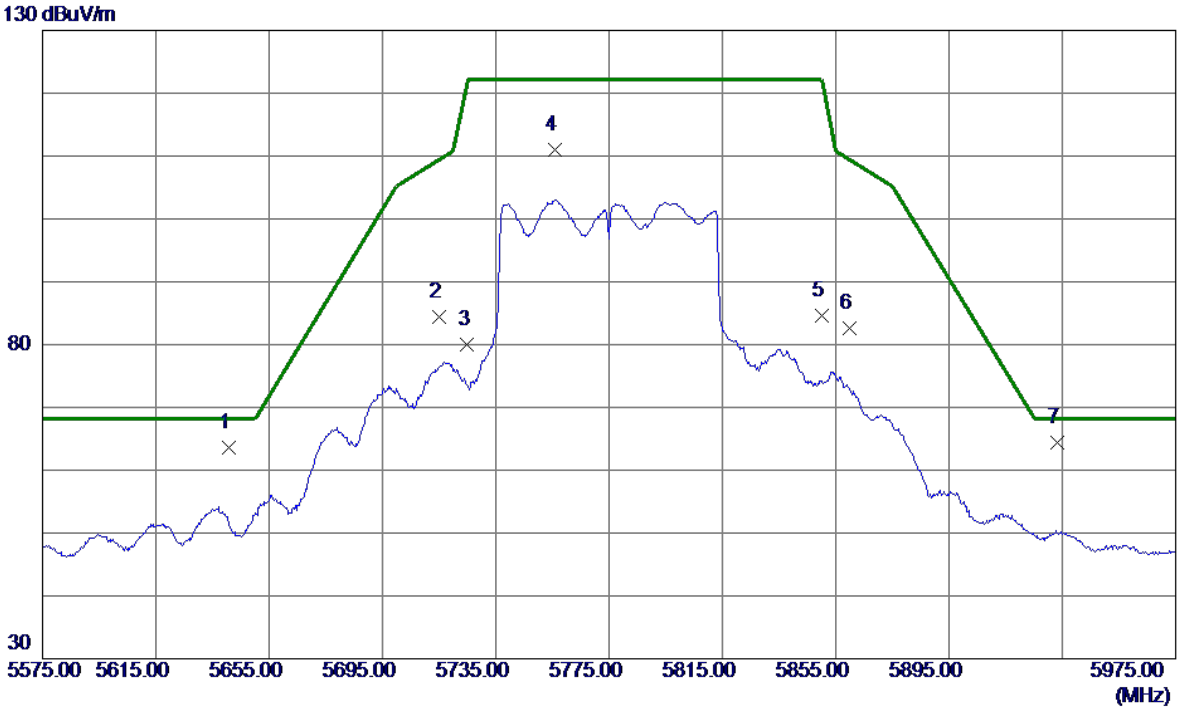
Test Mode	UNII-3_TX AC(VHT80) Mode 5775 MHz	Polarization	Vertical



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1 *	11542.8000	27.92	9.67	37.59	54.00	-16.41	AVG	
2	11580.5000	38.01	9.66	47.67	74.00	-26.33	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

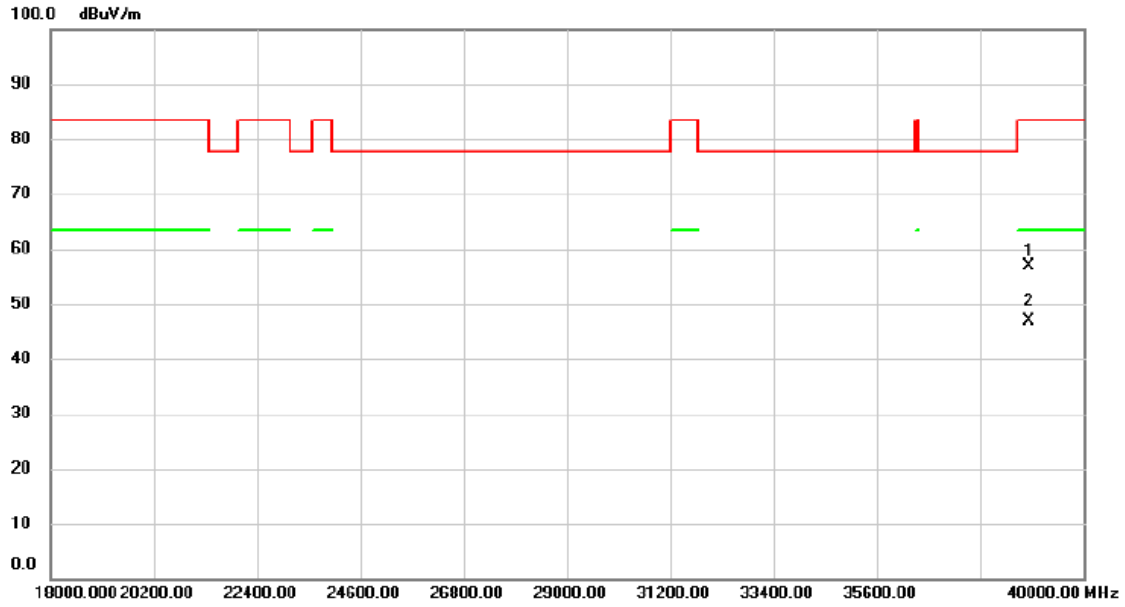
Test Mode	UNII-3_TX AC(VHT80) Mode 5775 MHz	Polarization	Horizontal



No.	Freq.	Reading Level	Correct Factor	Measure ment	Limit	Margin		
	MHz	dBuV/m	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1	5640.8000	48.95	14.73	63.68	68.20	-4.52	Peak	
2	5715.0000	69.49	14.97	84.46	109.40	-24.94	Peak	
3	5725.0000	64.98	15.00	79.98	122.20	-42.22	Peak	
4	5755.8000	95.86	15.10	110.96	122.20	-11.24	Peak	No Limit
5	5850.0000	69.14	15.39	84.53	122.20	-37.67	Peak	
6	5860.0000	67.22	15.43	82.65	109.40	-26.75	Peak	
7 *	5933.4000	48.79	15.66	64.45	68.20	-3.75	Peak	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

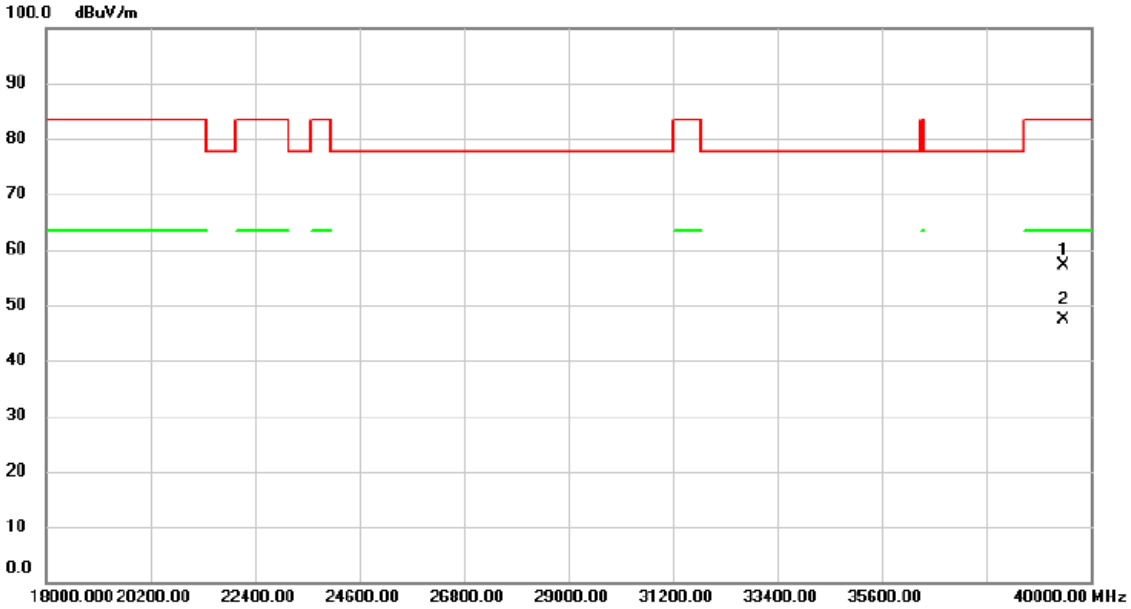
Test Mode	UNII-1_TX AC(VHT20) Mode 5240 MHz	Polarization	Vertical



No.	Mk.	Freq.	Reading Level	Correct Factor	Measure-ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1		38834.00	52.02	4.82	56.84	83.50	-26.66	peak	
2	*	38834.00	42.02	4.82	46.84	63.50	-16.66	AVG	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

Test Mode	UNII-1_TX AC(VHT20) Mode 5240 MHz	Polarization	Horizontal



No.	Mk.	Freq.	Reading Level	Correct Factor	Measure-ment	Limit	Margin		
		MHz	dBuV	dB	dBuV/m	dBuV/m	dB	Detector	Comment
1		39417.00	52.01	5.21	57.22	83.50	-26.28	peak	
2	*	39417.00	42.11	5.21	47.32	63.50	-16.18	AVG	

REMARKS:
(1) Measurement Value = Reading Level + Correct Factor.
(2) Margin Level = Measurement Value - Limit Value.

APPENDIX E - MAXIMUM OUTPUT POWER

Test Mode	UNII-1_TX A Mode_Ant. 1

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
36	5180	11.25	0.00	11.25	23.98	0.2500	Complies
40	5200	11.01	0.00	11.01	23.98	0.2500	Complies
48	5240	10.87	0.00	10.87	23.98	0.2500	Complies

Test Mode	UNII-1_TX A Mode_Ant. 2

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
36	5180	11.23	0.00	11.23	23.98	0.2500	Complies
40	5200	11.40	0.00	11.40	23.98	0.2500	Complies
48	5240	11.72	0.00	11.72	23.98	0.2500	Complies

Test Mode	UNII-1_TX A Mode_Total

Channel	Frequency (MHz)	Output Power (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
36	5180	14.25	23.98	0.2500	Complies
40	5200	14.22	23.98	0.2500	Complies
48	5240	14.33	23.98	0.2500	Complies

Test Mode	UNII-1_TX N(HT20) Mode_Ant. 1

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
36	5180	10.16	0.00	10.16	23.98	0.2500	Complies
40	5200	10.01	0.00	10.01	23.98	0.2500	Complies
48	5240	10.13	0.00	10.13	23.98	0.2500	Complies

Test Mode	UNII-1_TX N(HT20) Mode_Ant. 2

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
36	5180	10.41	0.00	10.41	23.98	0.2500	Complies
40	5200	10.12	0.00	10.12	23.98	0.2500	Complies
48	5240	10.21	0.00	10.21	23.98	0.2500	Complies

Test Mode	UNII-1_TX N(HT20) Mode_Total

Channel	Frequency (MHz)	Output Power (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
36	5180	13.30	23.98	0.2500	Complies
40	5200	13.08	23.98	0.2500	Complies
48	5240	13.18	23.98	0.2500	Complies

Test Mode	UNII-1_TX N(HT40) Mode_Ant. 1

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
38	5190	9.04	0.18	9.22	23.98	0.2500	Complies
46	5230	9.02	0.18	9.20	23.98	0.2500	Complies

Test Mode	UNII-1_TX N(HT40) Mode_Ant. 2

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
38	5190	9.03	0.18	9.21	23.98	0.2500	Complies
46	5230	9.23	0.18	9.41	23.98	0.2500	Complies

Test Mode	UNII-1_TX N(HT40) Mode_Total

Channel	Frequency (MHz)	Output Power (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
38	5190	12.22	23.98	0.2500	Complies
46	5230	12.32	23.98	0.2500	Complies

Test Mode	UNII-1_TX AC(VHT20) Mode_Ant. 1

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
36	5180	10.48	0.00	10.48	23.98	0.2500	Complies
40	5200	10.34	0.00	10.34	23.98	0.2500	Complies
48	5240	10.45	0.00	10.45	23.98	0.2500	Complies

Test Mode	UNII-1_TX AC(VHT20) Mode_Ant. 2

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
36	5180	10.13	0.00	10.13	23.98	0.2500	Complies
40	5200	10.12	0.00	10.12	23.98	0.2500	Complies
48	5240	10.31	0.00	10.31	23.98	0.2500	Complies

Test Mode	UNII-1_TX AC(VHT20) Mode_Total

Channel	Frequency (MHz)	Output Power (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
36	5180	13.32	23.98	0.2500	Complies
40	5200	13.24	23.98	0.2500	Complies
48	5240	13.39	23.98	0.2500	Complies

Test Mode	UNII-1_TX AC(VHT40) Mode_Ant. 1

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
38	5190	9.20	0.18	9.38	23.98	0.2500	Complies
46	5230	9.06	0.18	9.24	23.98	0.2500	Complies

Test Mode	UNII-1_TX AC(VHT40) Mode_Ant. 2

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
38	5190	9.17	0.18	9.35	23.98	0.2500	Complies
46	5230	9.30	0.18	9.48	23.98	0.2500	Complies

Test Mode	UNII-1_TX AC(VHT40) Mode_Total

Channel	Frequency (MHz)	Output Power (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
38	5190	12.37	23.98	0.2500	Complies
46	5230	12.37	23.98	0.2500	Complies

Test Mode	UNII-1_TX AC(VHT80) Mode_Ant. 1

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
42	5210	9.40	0.31	9.71	23.98	0.2500	Complies

Test Mode	UNII-1_TX AC(VHT80) Mode_Ant. 2

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
42	5210	9.86	0.31	10.17	23.98	0.2500	Complies

Test Mode	UNII-1_TX AC(VHT80) Mode_Total

Channel	Frequency (MHz)	Output Power (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
42	5210	12.96	23.98	0.2500	Complies

Test Mode	UNII-3_TX A Mode_Ant. 1

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
149	5745	10.23	0.00	10.23	30.00	1.0000	Complies
157	5785	10.26	0.00	10.26	30.00	1.0000	Complies
165	5825	10.57	0.00	10.57	30.00	1.0000	Complies

Test Mode	UNII-3_TX A Mode_Ant. 2

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
149	5745	11.91	0.00	11.91	30.00	1.0000	Complies
157	5785	11.59	0.00	11.59	30.00	1.0000	Complies
165	5825	10.16	0.00	10.16	30.00	1.0000	Complies

Test Mode	UNII-3_TX A Mode_Total

Channel	Frequency (MHz)	Output Power (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
149	5745	14.16	30.00	1.0000	Complies
157	5785	13.99	30.00	1.0000	Complies
165	5825	13.38	30.00	1.0000	Complies

Test Mode	UNII-3_TX N(HT20) Mode_Ant. 1

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
149	5745	10.36	0.00	10.36	30.00	1.0000	Complies
157	5785	10.33	0.00	10.33	30.00	1.0000	Complies
165	5825	10.18	0.00	10.18	30.00	1.0000	Complies

Test Mode	UNII-3_TX N(HT20) Mode_Ant. 2

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
149	5745	10.24	0.00	10.24	30.00	1.0000	Complies
157	5785	10.06	0.00	10.06	30.00	1.0000	Complies
165	5825	10.26	0.00	10.26	30.00	1.0000	Complies

Test Mode	UNII-3_TX N(HT20) Mode_Total

Channel	Frequency (MHz)	Output Power (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
149	5745	13.31	30.00	1.0000	Complies
157	5785	13.21	30.00	1.0000	Complies
165	5825	13.23	30.00	1.0000	Complies

Test Mode	UNII-3_TX N(HT40) Mode_Ant. 1

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
151	5755	10.13	0.18	10.31	30.00	1.0000	Complies
159	5795	10.25	0.18	10.43	30.00	1.0000	Complies

Test Mode	UNII-3_TX N(HT40) Mode_Ant. 2

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
151	5755	10.14	0.18	10.32	30.00	1.0000	Complies
159	5795	10.03	0.18	10.21	30.00	1.0000	Complies

Test Mode	UNII-3_TX N(HT40) Mode_Total

Channel	Frequency (MHz)	Output Power (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
151	5755	13.32	30.00	1.0000	Complies
159	5795	13.33	30.00	1.0000	Complies

Test Mode	UNII-3_TX AC(VHT20) Mode_Ant. 1

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
149	5745	10.72	0.00	10.72	30.00	1.0000	Complies
157	5785	10.37	0.00	10.37	30.00	1.0000	Complies
165	5825	10.61	0.00	10.61	30.00	1.0000	Complies

Test Mode	UNII-3_TX AC(VHT20) Mode_Ant. 2

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
149	5745	10.36	0.00	10.36	30.00	1.0000	Complies
157	5785	10.28	0.00	10.28	30.00	1.0000	Complies
165	5825	10.10	0.00	10.10	30.00	1.0000	Complies

Test Mode	UNII-3_TX AC(VHT20) Mode_Total

Channel	Frequency (MHz)	Output Power (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
149	5745	13.55	30.00	1.0000	Complies
157	5785	13.34	30.00	1.0000	Complies
165	5825	13.37	30.00	1.0000	Complies

Test Mode	UNII-3_TX AC(VHT40) Mode_Ant. 1

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
151	5755	10.83	0.18	11.01	30.00	1.0000	Complies
159	5795	10.93	0.18	11.11	30.00	1.0000	Complies

Test Mode	UNII-3_TX AC(VHT40) Mode_Ant. 2

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
151	5755	10.97	0.18	11.15	30.00	1.0000	Complies
159	5795	10.88	0.18	11.06	30.00	1.0000	Complies

Test Mode	UNII-3_TX AC(VHT40) Mode_Total

Channel	Frequency (MHz)	Output Power (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
151	5755	14.09	30.00	1.0000	Complies
159	5795	14.09	30.00	1.0000	Complies

Test Mode	UNII-3_TX AC(VHT80) Mode_Ant. 1

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
155	5775	10.40	0.31	10.71	30.00	1.0000	Complies

Test Mode	UNII-3_TX AC(VHT80) Mode_Ant. 2

Channel	Frequency (MHz)	Output Power (dBm)	Duty Factor	Output Power + Duty Factor (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
155	5775	10.14	0.31	10.45	30.00	1.0000	Complies

Test Mode	UNII-3_TX AC(VHT80) Mode_Total

Channel	Frequency (MHz)	Output Power (dBm)	Max. Limit (dBm)	Max. Limit (W)	Result
155	5775	13.59	30.00	1.0000	Complies

End of Test Report