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Report Template Version: V06

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TEST REPORT

Report No.: CQASZ20260600010EX-04
Applicant: Shanghai Sunmi Technology Co.,Ltd.
Address of Applicant: Room 505,No.388,Song Hu Road,Yang Pu District,Shanghai,China
Equipment Under Test (EUT):
Product: Smart Interactive terminal
Model No.: F951A
Test Model No.: F951A
Brand Name: SUNMI
FCC ID: 2AH25F951A
Standards: 47 CFR Part 15, Subpart C
KDB558074 D01 15.247 Meas Guidance v05r02
ANSI C63.10:2020
Date of Receipt: April 29, 2026
Date of Test: May 18, 2026 to June 25, 2026
Date of Issue: July 1, 2026
Test Result : **PASS***

*In the configuration tested, the EUT complied with the standards specified above

Tested By: Azir Wang
(Azir Wang)

Reviewed By: Timo Lei
(Timo Lei)

Approved By: Jack Ai
(Jack Ai)



1 Version

Revision History Of Report

Report No.	Version	Description	Issue Date
CQASZ20260600010EX-04	Rev.01	Initial report	July 1, 2026

2 Test Summary

Test Item	Test Requirement	Test method	Result
Antenna Requirement	47 CFR Part 15.203	N/A	PASS
AC Power Line Conducted Emission	47 CFR Part 15.207	ANSI C63.10- 2020+Cor. 1- 2023+C63.10a-2024 + Errata to C63.10a- 2024	PASS
Conducted Peak & Average Output Power	47 CFR Part 15.247	ANSI C63.10- 2020+Cor. 1- 2023+C63.10a-2024 + Errata to C63.10a- 2024	PASS
6dB Occupied Bandwidth	47 CFR Part 15.247	ANSI C63.10- 2020+Cor. 1- 2023+C63.10a-2024 + Errata to C63.10a- 2024	PASS
Power Spectral Density	47 CFR Part 15.247	ANSI C63.10- 2020+Cor. 1- 2023+C63.10a-2024 + Errata to C63.10a- 2024	PASS
Band-edge for RF Conducted Emissions	47 CFR Part 15.247	ANSI C63.10- 2020+Cor. 1- 2023+C63.10a-2024 + Errata to C63.10a- 2024	PASS
RF Conducted Spurious Emissions	47 CFR Part 15.247	ANSI C63.10- 2020+Cor. 1- 2023+C63.10a-2024 + Errata to C63.10a- 2024	PASS
Radiated Spurious Emissions	47 CFR Part 15.209	ANSI C63.10- 2020+Cor. 1- 2023+C63.10a-2024 + Errata to C63.10a- 2024	PASS
Restricted bands around fundamental frequency (Radiated Emission)	47 CFR Part 15.205/15.209	ANSI C63.10- 2020+Cor. 1- 2023+C63.10a-2024 + Errata to C63.10a- 2024	PASS

Remark:

The tested sample(s) and the sample information are provided by the client.

Tx: In this whole report Tx (or tx) means Transmitter.

Rx: In this whole report Rx (or rx) means Receiver.

RF: In this whole report RF means Radiated Frequency.

CH: In this whole report CH means channel.

Volt: In this whole report Volt means Voltage.

Temp: In this whole report Temp means Temperature.

Humid: In this whole report Humid means humidity.

Press: In this whole report Press means Pressure.

N/A: In this whole report not application

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4 General Information

4.1 Client Information

Applicant:	Shanghai Sunmi Technology Co.,Ltd.
Address of Applicant:	Room 505,No.388,Song Hu Road,Yang Pu District,Shanghai,China
Manufacturer:	Shanghai Sunmi Technology Co.,Ltd.
Address of Manufacturer:	Room 505,No.388,Song Hu Road,Yang Pu District,Shanghai,China
Factory:	
Address of Factory:	

4.2 General Description of EUT

Product Name:	Smart Interactive terminal
Model No.:	F951A
Test Model No.:	F951A
Trade Mark:	SUNMI
Software Version:	V4.4.1
Hardware Version:	FLEX3 V1.0
Power Supply:	Input of AC Adapter: AC 100-240V, 0.9A, 50-60Hz Output of AC Adapter/Input of EUT: DC 24V, 1.5A
EUT Supports Radios application:	IEEE 802.11a/b/g/n/ac, Bluetooth
Simultaneous Transmission	☐ Simultaneous TX is supported and evaluated in this report. ☒ Simultaneous TX is not supported.

4.3 Product Specification subjective to this standard

Operation Frequency:	IEEE 802.11b/g/n(HT20): 2412MHz to 2462MHz IEEE 802.11n(HT40): 2422MHz to 2452MHz
Channel Numbers:	IEEE 802.11b/g, IEEE 802.11n HT20: 11 Channels IEEE 802.11n HT40: 7 Channels
Channel Separation:	5MHz
Type of Modulation:	IEEE for 802.11b: DSSS(CCK,DQPSK,DBPSK) IEEE for 802.11g : OFDM(64QAM, 16QAM, QPSK, BPSK) IEEE for 802.11n(HT20 and HT40) : OFDM (64QAM, 16QAM, QPSK, BPSK)
Transfer Rate:	IEEE for 802.11b: 1Mbps/2Mbps/5.5Mbps/11Mbps IEEE for 802.11g : 6Mbps/9Mbps/12Mbps/18Mbps/24Mbps/36Mbps/48Mbps/54Mbps IEEE for 802.11n(HT20) : 6.5Mbps/13Mbps/19.5Mbps/26Mbps/39Mbps/52Mbps/58.5Mbps/65Mbps IEEE for 802.11n(HT40) : 13.5Mbps/27Mbps/40.5Mbps/54Mbps/81Mbps/108Mbps/121.5Mbps/135Mbps
Product Type:	☒ Mobile ☐ Portable ☐ Fix Location
Test Software of EUT:	Qualcomm QRCT4
Antenna Type:	FPC

Antenna Gain:	2.1 dBi
---------------	---------

Operation Frequency each of channel(802.11b/g/n HT20)							
Channel	Frequency	Channel	Frequency	Channel	Frequency	Channel	Frequency
1	2412MHz	4	2427MHz	7	2442MHz	10	2457MHz
2	2417MHz	5	2432MHz	8	2447MHz	11	2462MHz
3	2422MHz	6	2437MHz	9	2452MHz		
Operation Frequency each of channel(802.11n HT40)							
Channel		Frequency		Channel		Frequency	
3		2422MHz		6		2437MHz	
4		2427MHz		7		2442MHz	
5		2432MHz		8		2447MHz	

Note:

In section 15.31(m), regards to the operating frequency range over 10 MHz, the Lowest frequency, the middle frequency, and the highest frequency of channel were selected to perform the test, and the selected channel see below:

For 802.11b/g/n (HT20):

Channel	Frequency
The Lowest channel	2412MHz
The Middle channel	2437MHz
The Highest channel	2462MHz

For 802.11n (HT40):

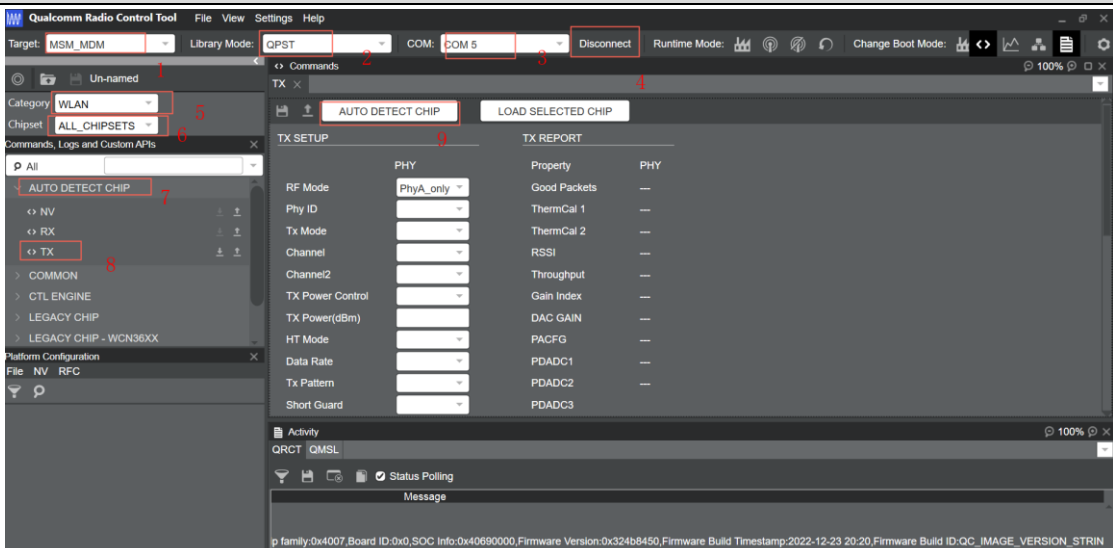
Channel	Frequency
The Lowest channel	2422MHz
The Middle channel	2437MHz
The Highest channel	2452MHz

Note:

Software provided by client enabled the EUT to transmit and receive data at lowest, middle and highest channel individually.

4.4 Test Environment and Mode

Operating Environment:	
Radiated Emissions:	
Temperature:	25.3 °C
Humidity:	55 % RH
Atmospheric Pressure:	1009 mbar
Conducted Emissions:	
Temperature:	25.6 °C
Humidity:	60 % RH
Atmospheric Pressure:	1009 mbar
Radio conducted item test (RF Conducted test room):	
Temperature:	25.5 °C
Humidity:	52 % RH
Atmospheric Pressure:	1009 mbar
Test mode:	
Transmitting mode:	EUT is set in RF test mode in all supported modulation types, bandwidth and data rate, etc.

Run Software:	
	

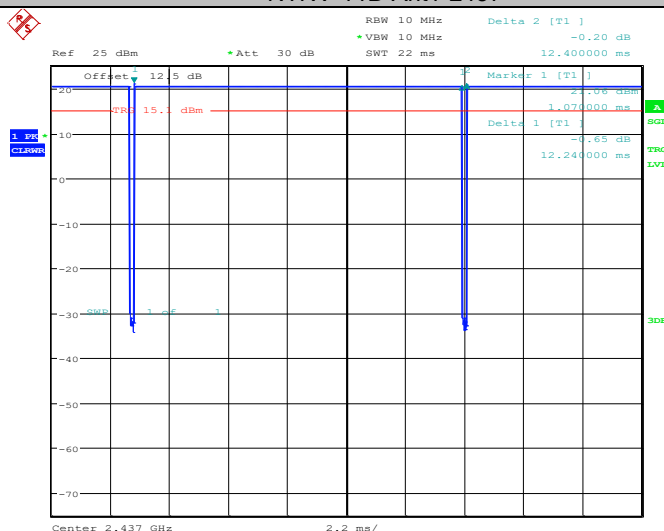
Ant1

Operated Mode for Worst Duty Cycle:				
Test Mode	On time [Ton] (ms)	Period [Ttotal] ms)	Duty Cycle(%)	Average correction factor(dB)
IEEE802.11b	12.24	12.4	98.71	0.06
IEEE802.11g	2.03	2.06	98.54	0.06
IEEE802.11n (HT20)	1.89	1.93	97.93	0.09
IEEE802.11n (HT40)	0.93	0.98	94.90	0.23

Remark:

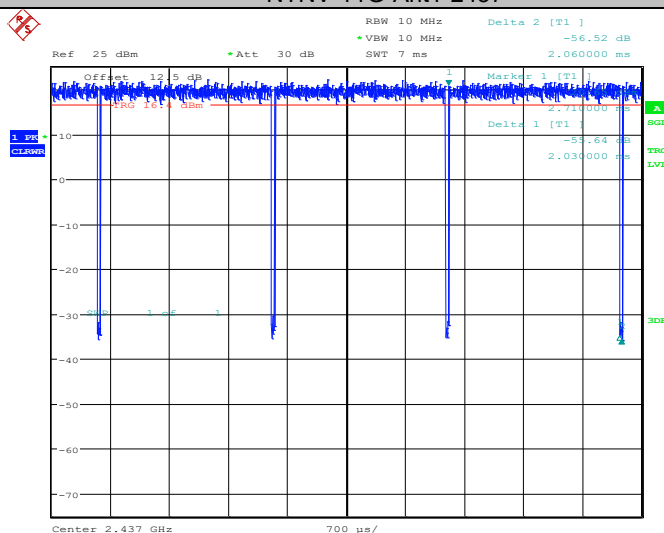
- 1) Duty cycle= On Time/ Period;
- 2) Duty Cycle factor = $10 * \log(1/ \text{Duty cycle})$;

NTNV-11B-Ant1-2437



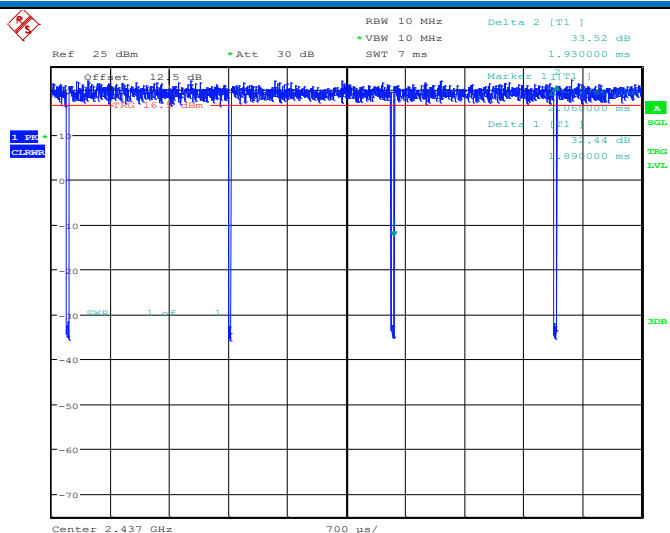
Date: 18.MAY.2026 10:33:30

NTNV-11G-Ant1-2437



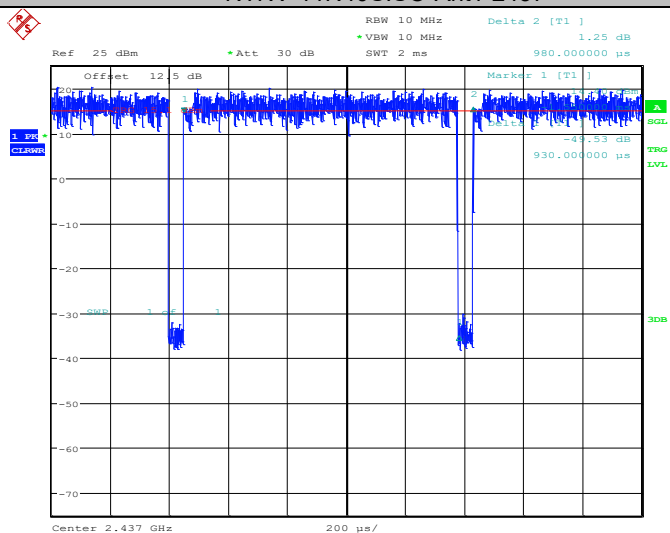
Date: 18.MAY.2026 11:21:20

NTNV-11N20SISO-Ant1-2437



Date: 18.MAY.2026 13:36:37

NTNV-11N40SISO-Ant1-2437



Date: 18.MAY.2026 14:52:11

4.5 Description of Support Units

The EUT has been tested with associated equipment below.

1) Support equipment

Description	Manufacturer	Model No.	Certification	Supplied by

2) Cable

Cable No.	Description	Manufacturer	Cable Type/Length	Supplied by
/	/	/	/	/

4.6 Test Location

All tests were performed at:

SHENZHEN HUAXIA TESTING TECHNOLOGY CO., LTD

102A, 102B, Building 2, Shanghenglang New Industrial Zone, Shanghenglang Community, Dalang Street, Longhua District, Shenzhen, Guangdong, People's Republic of China, 518000

4.7 Test Facility

The test facility is recognized, certified, or accredited by the following organizations:

• **A2LA (Certificate No. 4742.01)**

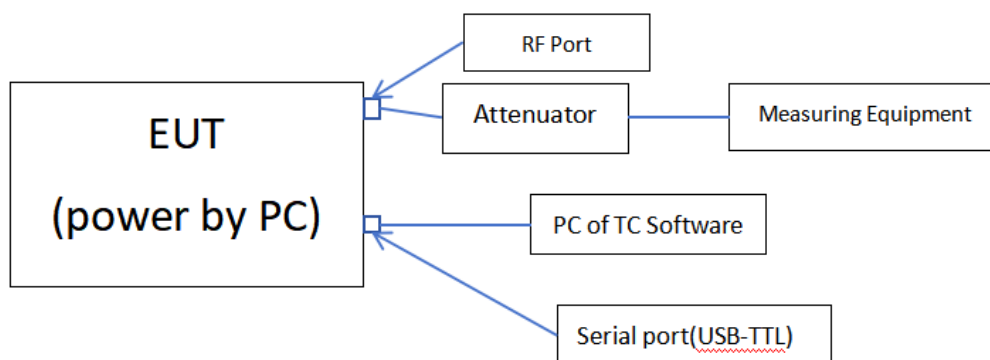
SHENZHEN HUAXIA TESTING TECHNOLOGY CO., LTD, Shenzhen EMC Laboratory is accredited by the

American Association for Laboratory Accreditation(A2LA). Certificate No. 4742.01.

• **FCC Registration No.: 522263**

SHENZHEN HUAXIA TESTING TECHNOLOGY CO., LTD, Shenzhen EMC Laboratory has been registered and fully described in a report filed with the (FCC) Federal Communications Commission. The acceptance letter from the FCC is maintained in our files. Registration No.:522263

4.8 Test configuration



4.9 Statement of the measurement uncertainty

The data and results referenced in this document are true and accurate.

The reader is cautioned that there may be errors within the calibration limits of the equipment and facilities.

The measurement uncertainty was calculated for all measurements listed in this test report acc. to CISPR 16 - 4 „Specification for radio disturbance and immunity measuring apparatus and methods – Part 4: Uncertainty in EMC Measurements“ and is documented in the **SHENZHEN HUAXIA TESTING TECHNOLOGY CO., LTD** quality system acc. to DIN EN ISO/IEC 17025.

Furthermore, component and process variability of devices similar to that tested may result in additional deviation. The manufacturer has the sole responsibility of continued compliance of the device.

Hereafter the best measurement capability for CQA laboratory is reported:

No.	Item	Uncertainty	Notes
1	Radiated Emission (Below 1GHz)	5.12dB	(1)
2	Radiated Emission (Above 1GHz)	4.60dB	(1)
3	Conducted Disturbance (0.15~30MHz)	3.34dB	(1)
4	Radio Frequency	3×10^{-8}	(1)
5	Duty cycle	0.6 %.	(1)
6	Occupied Bandwidth	1.1%	(1)
7	RF conducted power	0.86dB	(1)
8	RF power density	0.74	(1)
9	Conducted Spurious emissions	0.86dB	(1)
10	Temperature test	0.8°C	(1)
11	Humidity test	2.0%	(1)
12	Supply voltages	0.5 %.	(1)
13	Frequency Error	5.5 Hz	(1)

(1) This uncertainty represents an expanded uncertainty expressed at approximately the 95% confidence level using a coverage factor of $k=2$.

4.10 Deviation from Standards

None.

4.11 Abnormalities from Standard Conditions

None.

4.12 Other Information Requested by the Customer

None.

4.13 Equipment List

Test Equipment	Manufacturer	Model No.	Instrument No.	Calibration Date	Calibration Due Date
EMI Test Receiver	R&S	ESR7	CQA-005	2025/9/1	2026/8/31
Spectrum analyzer	R&S	FSU26	CQA-038	2025/9/1	2026/8/31
Spectrum analyzer	R&S	FSU40	CQA-075	2025/9/1	2026/8/31
Preamplifier	MITEQ	AFS4-00010300-18-10P-4	CQA-035	2025/9/1	2026/8/31
Preamplifier	MITEQ	AMF-6D-02001800-29-20P	CQA-036	2025/9/1	2026/8/31
Preamplifier	EMCI	EMC184055SE	CQA-089	2025/9/1	2026/8/31
Loop antenna	Schwarzbeck	FMZB1516	CQA-060	2023/9/8	2026/9/7
Bilog Antenna	R&S	HL562	CQA-011	2023/11/01	2026/10/31
Horn Antenna	R&S	HF906	CQA-012	2023/11/01	2026/10/31
Horn Antenna	Schwarzbeck	BBHA 9170	CQA-088	2023/9/7	2026/9/6
Coaxial Cable (Above 1GHz)	CQA	N/A	C007	2025/9/1	2026/8/31
Coaxial Cable (Below 1GHz)	CQA	N/A	C013	2025/9/1	2026/8/31
Antenna Connector	CQA	RFC-01	CQA-080	2025/9/1	2026/8/31
RF cable(9KHz~40GHz)	CQA	RF-01	CQA-079	2025/9/1	2026/8/31
Power meter	R&S	NRVD	CQA-029	2025/9/1	2026/8/31
Power divider	MIDWEST	PWD-2533-02-SMA-79	CQA-067	2025/9/1	2026/8/31
EMI Test Receiver	R&S	ESR7	CQA-005	2025/9/1	2026/8/31
LISN	R&S	ENV216	CQA-003	2025/9/1	2026/8/31
Coaxial cable	CQA	N/A	CQA-C009	2025/9/1	2026/8/31
DC power	KEYSIGHT	E3631A	CQA-028	2025/9/1	2026/8/31

Test software:

	Manufacturer	Software brand	Software version
Radiated Emissions test software	Tonscend	JS1120-3	Version:8
Conducted Emissions test software	Audix	e3	Version:9
RF Conducted test software	Audix	e3	V3.5.39

Note:

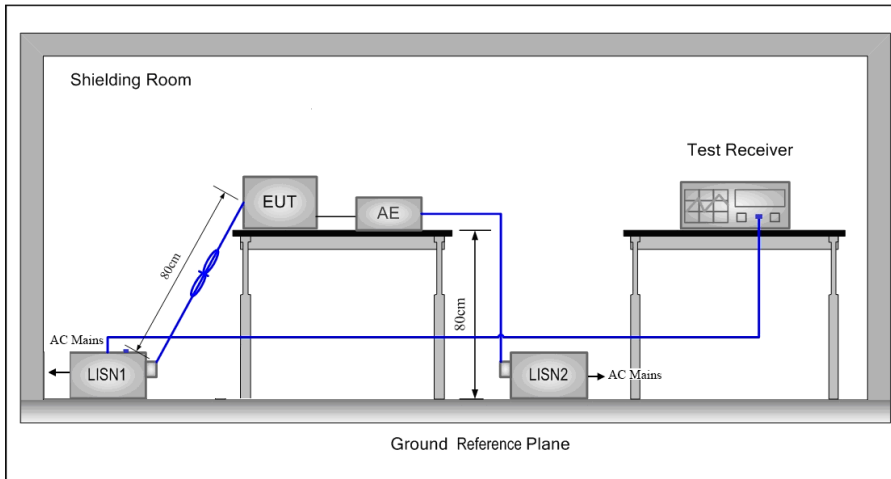
The temporary antenna connector is soldered on the PCB board in order to perform conducted tests and this temporary antenna connector is listed in the equipment list.

5 Test results and Measurement Data

5.1 Antenna Requirement

Standard requirement:	47 CFR Part 15C Section 15.203 /247(c)
15.203 requirement: An intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device. The use of a permanently attached antenna or of an antenna that uses a unique coupling to the intentional radiator, the manufacturer may design the unit so that a broken antenna can be replaced by the user, but the use of a standard antenna jack or electrical connector is prohibited. 15.247(b) (4) requirement: The conducted output power limit specified in paragraph (b) of this section is based on the use of antennas with directional gains that do not exceed 6 dBi. Except as shown in paragraph (c) of this section, if transmitting antennas of directional gain greater than 6 dBi are used, the conducted output power from the intentional radiator shall be reduced below the stated values in paragraphs (b)(1), (b)(2), and (b)(3) of this section, as appropriate, by the amount in dB that the directional gain of the antenna exceeds 6 dBi.	
EUT Antenna:	
The antenna is FPC antenna. The connection/connection type between the antenna to the EUT's antenna port is: Antenna Connector is on the PCB within enclosure and not accessible to user. This is either permanently attachment or a unique coupling that satisfies the requirement.	

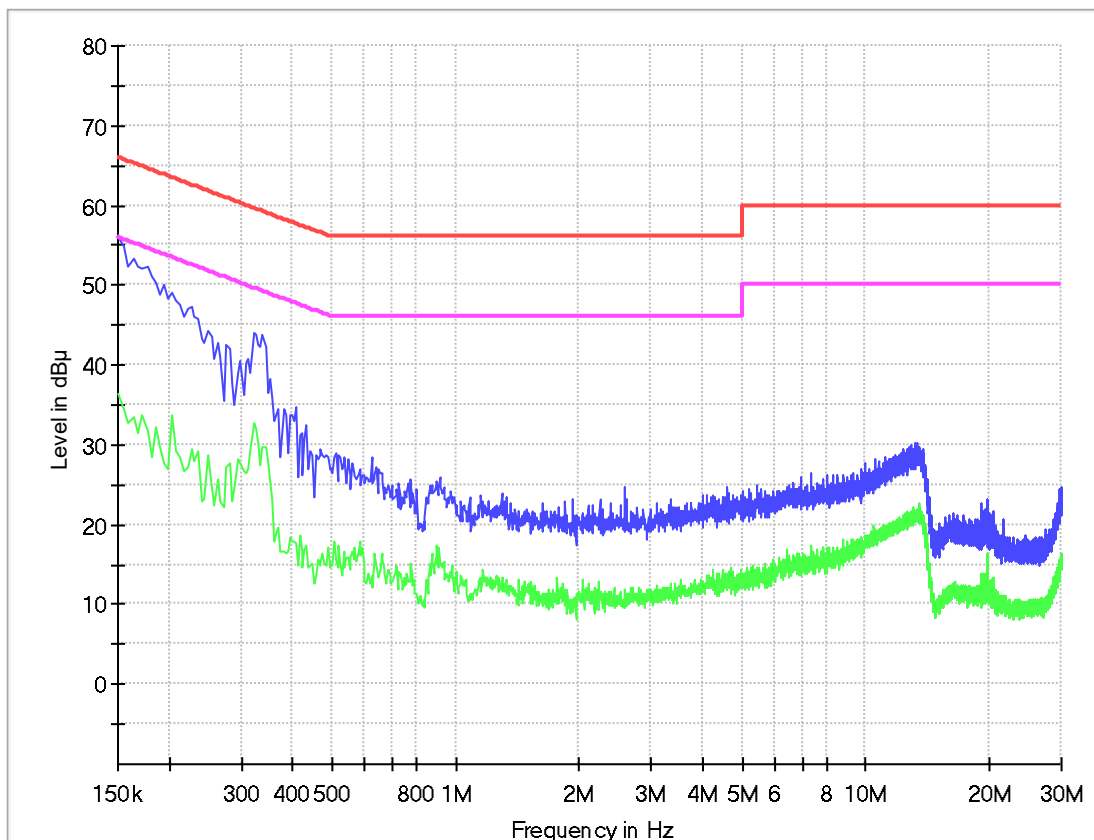
5.2 Conducted Emissions

Test Requirement:	47 CFR Part 15C Section 15.207		
Test Method:	ANSI C63.10-2020+Cor. 1-2023+C63.10a-2024 + Errata to C63.10a-2024		
Test Frequency Range:	150kHz to 30MHz		
Limit:	Frequency range (MHz)	Limit (dBuV)	
		Quasi-peak	Average
	0.15-0.5	66 to 56*	56 to 46*
	0.5-5	56	46
	5-30	60	50
* Decreases with the logarithm of the frequency.			
Test Procedure:	1) The mains terminal disturbance voltage test was conducted in a shielded room.		
	2) The EUT was connected to AC power source through a LISN 1 (Line Impedance Stabilization Network) which provides a 50Ω/50μH + 5Ω linear impedance. The power cables of all other units of the EUT were connected to a second LISN 2, which was bonded to the ground reference plane in the same way as the LISN 1 for the unit being measured. A multiple socket outlet strip was used to connect multiple power cables to a single LISN provided the rating of the LISN was not exceeded.		
	3) The tabletop EUT was placed upon a non-metallic table 0.8m above the ground reference plane. And for floor-standing arrangement, the EUT was placed on the horizontal ground reference plane,		
	4) The test was performed with a vertical ground reference plane. The rear of the EUT shall be 0.4 m from the vertical ground reference plane. The vertical ground reference plane was bonded to the horizontal ground reference plane. The LISN 1 was placed 0.8 m from the boundary of the unit under test and bonded to a ground reference plane for LISNs mounted on top of the ground reference plane. This distance was between the closest points of the LISN 1 and the EUT. All other units of the EUT and associated equipment was at least 0.8 m from the LISN 2.		
	5) In order to find the maximum emission, the relative positions of equipment and all of the interface cables must be changed according to ANSI C63.10: 2020 on conducted measurement.		
Test Setup:			

Exploratory Test Mode:	Transmitting with all kind of modulations, data rates at lowest, middle and highest channel.
Final Test Mode:	Through Pre-scan, find the 1Mbps of rate of 802.11b at middle channel is the worst case. Only the worst case is recorded in the report.
Test Voltage:	AC120V/60Hz
Test Results:	Pass

Measurement Data

Live Line:

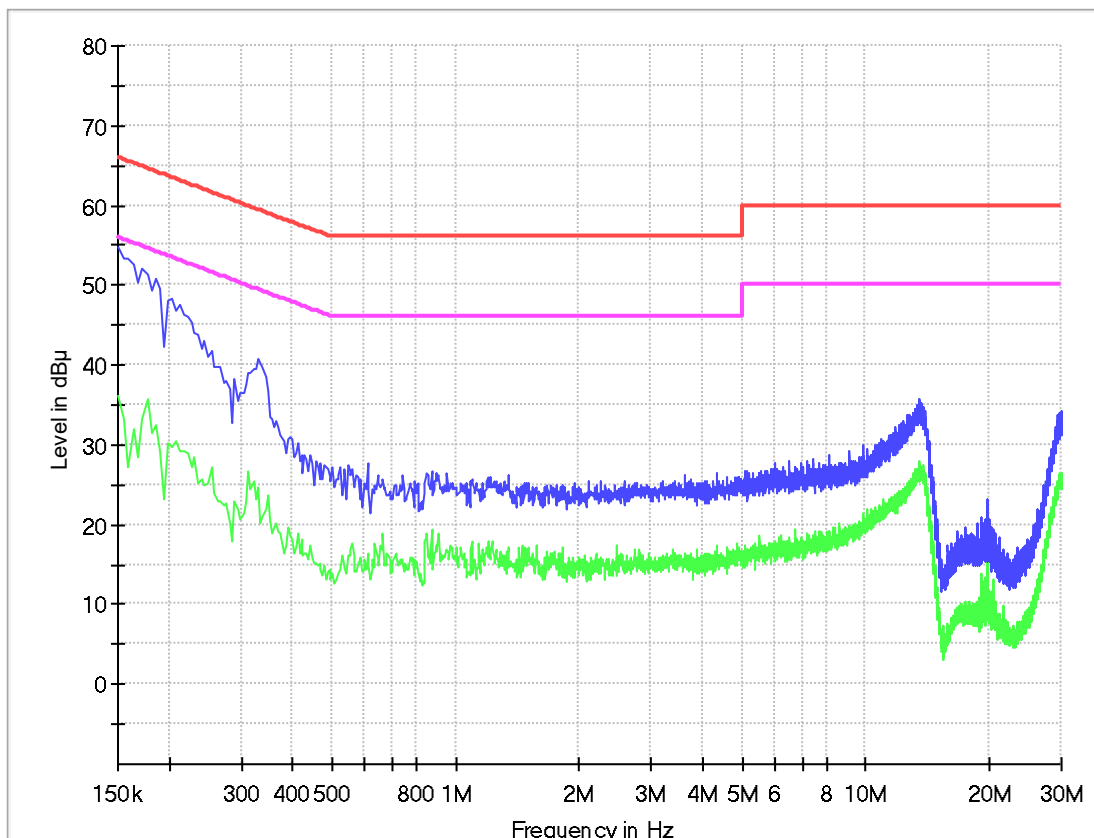


Frequency (MHz)	Correction Factor (dB)	Quasi-Peak			Average		
		Reading (dBμV)	Emission Level (dBμV)	Limit (dBμV)	Reading (dBμV)	Emission Level (dBμV)	Limit (dBμV)
0.151	9.7	46.5	56.2	65.9	31.7	41.4	55.9
0.195	9.7	40.3	50	63.8	24.4	34.1	53.8
0.321	9.7	34.9	44.6	59.7	23.9	33.6	49.7
0.352	9.7	29.4	39.1	58.9	15.4	25.1	48.9
0.406	9.7	24.8	34.5	57.7	9.3	19.0	47.7
2.575	9.9	14.3	24.2	56	2.8	12.7	46

Remark:

1. The following Quasi-Peak and Average measurements were performed on the EUT:
2. Final Test Level = Receiver Reading + LISN Factor + Cable Loss.
3. If the Peak value under Average limit, the Average value is not recorded in the report.

Neutral Line:

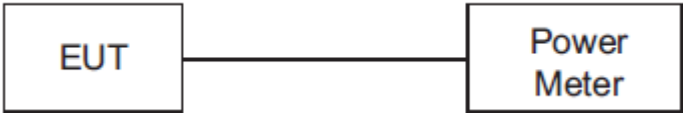
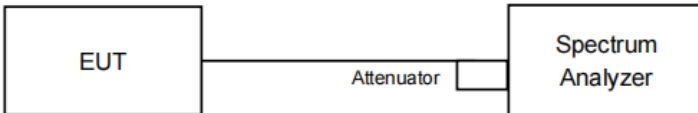


Frequency (MHz)	Correction Factor (dB)	Quasi-Peak			Average		
		Reading (dBμV)	Emission Level (dBμV)	Limit (dBμV)	Reading (dBμV)	Emission Level (dBμV)	Limit (dBμV)
0.150	9.7	43.3	53	66	29.6	39.3	56
0.172	9.7	39.6	49.3	64.9	26.2	35.9	54.9
0.205	9.7	35.2	44.9	63.4	25.4	35.1	53.4
0.330	9.7	27.8	37.5	59.5	16.2	25.9	49.5
0.609	9.8	11.5	21.3	56	6.7	16.5	46
13.515	9.7	21.7	31.6	60	17.5	27.4	50

Remark:

1. The following Quasi-Peak and Average measurements were performed on the EUT:
2. Final Test Level =Receiver Reading + LISN Factor + Cable Loss.
3. If the Peak value under Average limit, the Average value is not recorded in the report.

5.3 Conducted Peak & Average Output Power

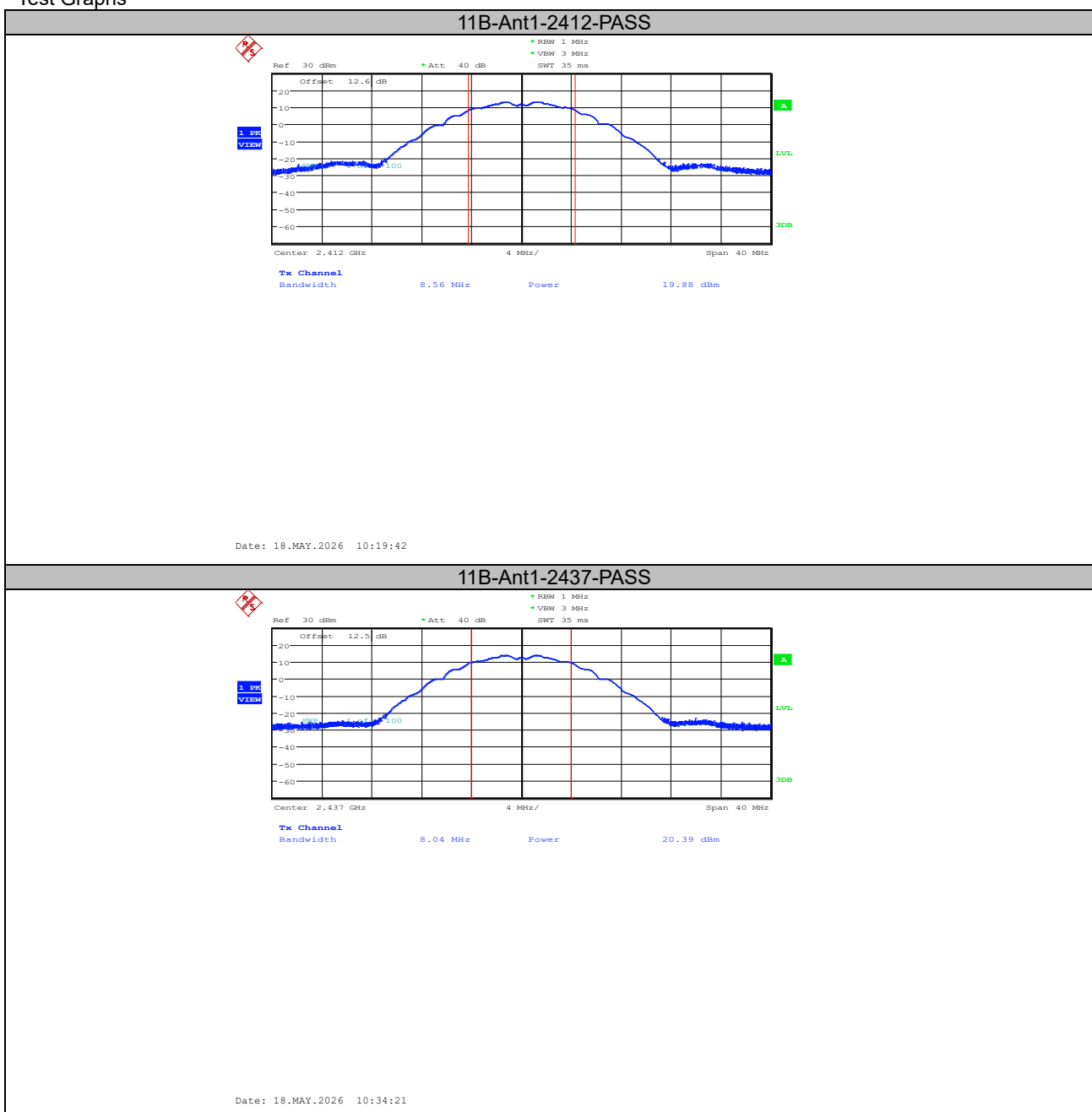
Test Requirement:	47 CFR Part 15C Section 15.247 (b)(3)
Test Method:	ANSI C63.10-2020+Cor. 1-2023+C63.10a-2024 + Errata to C63.10a-2024
Test Setup:	Setup for Power meter measurement method  Setup for Spectrum analyser measurement method 
Exploratory Test Mode:	Transmitting with all kind of modulations, data rates
Final Test Mode:	Only the worst case is recorded in the report.
Limit:	30dBm
Test Results:	Pass

Test Result

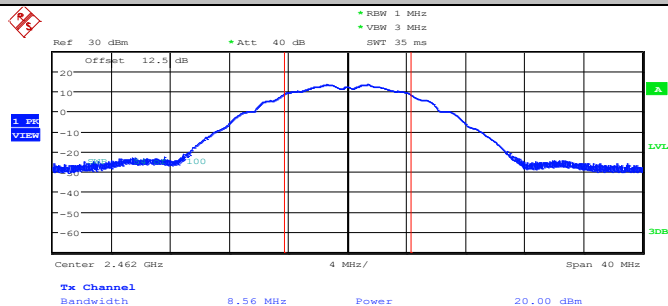
TestMode	Ant	Freq [MHz]	Peak power [dBm]	Limit [dBm]	Verdict
11B	Ant1	2412	19.88	≤30.00	PASS
11B	Ant1	2437	20.39	≤30.00	PASS
11B	Ant1	2462	20.00	≤30.00	PASS
11G	Ant1	2412	20.91	≤30.00	PASS
11G	Ant1	2437	25.44	≤30.00	PASS
11G	Ant1	2462	21.82	≤30.00	PASS
11N20SISO	Ant1	2412	22.40	≤30.00	PASS
11N20SISO	Ant1	2437	25.93	≤30.00	PASS
11N20SISO	Ant1	2462	22.12	≤30.00	PASS
11N40SISO	Ant1	2422	22.20	≤30.00	PASS
11N40SISO	Ant1	2437	25.85	≤30.00	PASS
11N40SISO	Ant1	2452	22.44	≤30.00	PASS

Test Mode	Antenna	Frequency[MHz]	Average Power [dBm]
11B	Ant1	2412	17.13
11B	Ant1	2442	17.39
11B	Ant1	2462	17.16
11G	Ant1	2412	17.12
11G	Ant1	2442	18.96
11G	Ant1	2462	17.36
11N20SISO	Ant1	2412	17.04
11N20SISO	Ant1	2442	19.38
11N20SISO	Ant1	2462	17.21
11N40SISO	Ant1	2422	17.86
11N40SISO	Ant1	2442	18.98
11N40SISO	Ant1	2452	17.25

Test Graphs

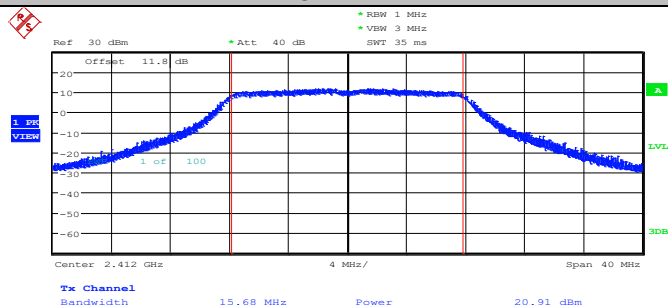


11B-Ant1-2462-PASS



Date: 18.MAY.2026 10:46:04

11G-Ant1-2412-PASS



Date: 25.JUN.2026 18:28:00

11G-Ant1-2437-PASS



Ref 30 dBm

Offset 11.7 dB

Att 40 dB

RBW 1 MHz

VBW 3 MHz

SWT 35 ms

1 dB

VIEW

1 of 100

Center 2.462 GHz

4 MHz/

Span 40 MHz

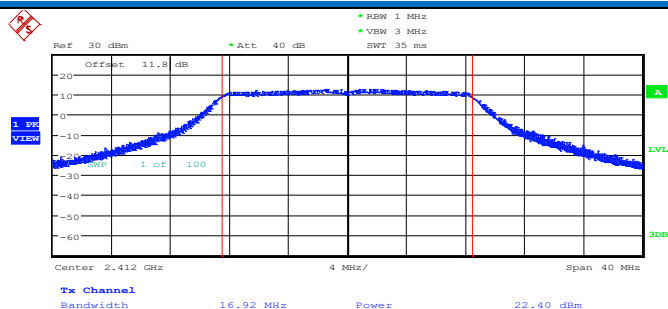
Tx Channel

Bandwidth 16.08 MHz

Power 21.82 dBm

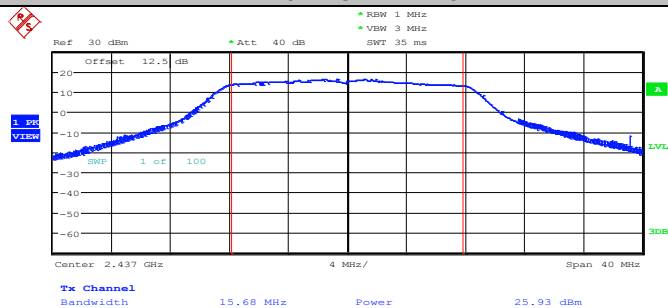
Date: 25.JUN.2026 18:44:06

Page:23 of 109



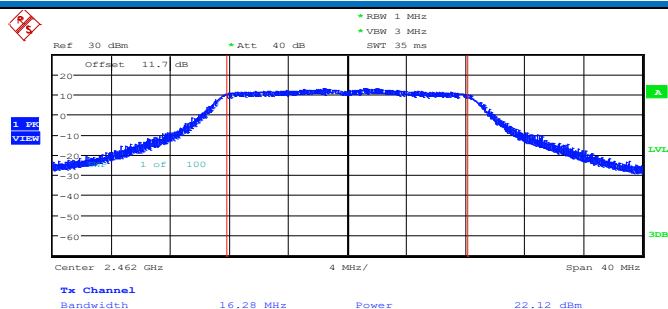
Date: 25.JUN.2026 19:16:20

11N20SISO-Ant1-2437-PASS



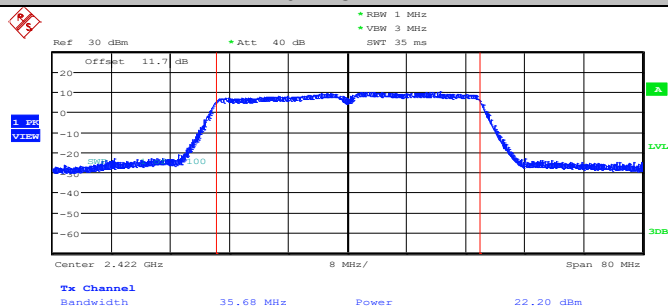
Date: 18.MAY.2026 13:52:27

11N20SISO-Ant1-2462-PASS



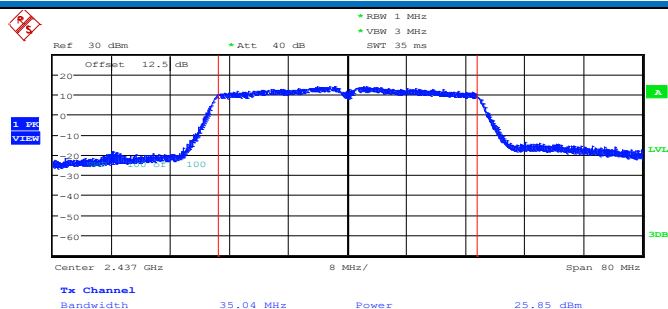
Date: 25.JUN.2026 19:27:58

11N40SISO-Ant1-2422-PASS



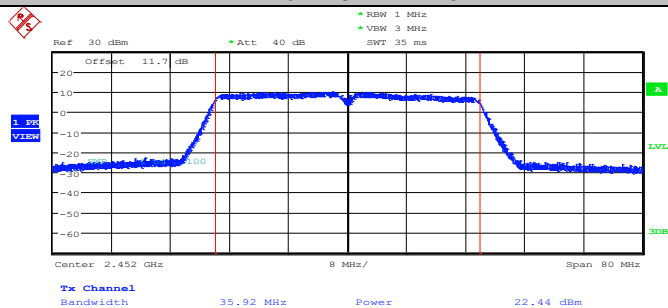
Date: 25.JUN.2026 19:41:25

11N40SISO-Ant1-2437-PASS



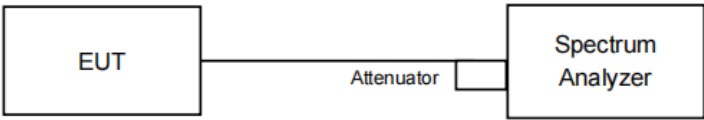
Date: 18.MAY.2026 14:52:47

11N40SISO-Ant1-2452-PASS



Date: 25.JUN.2026 20:06:09

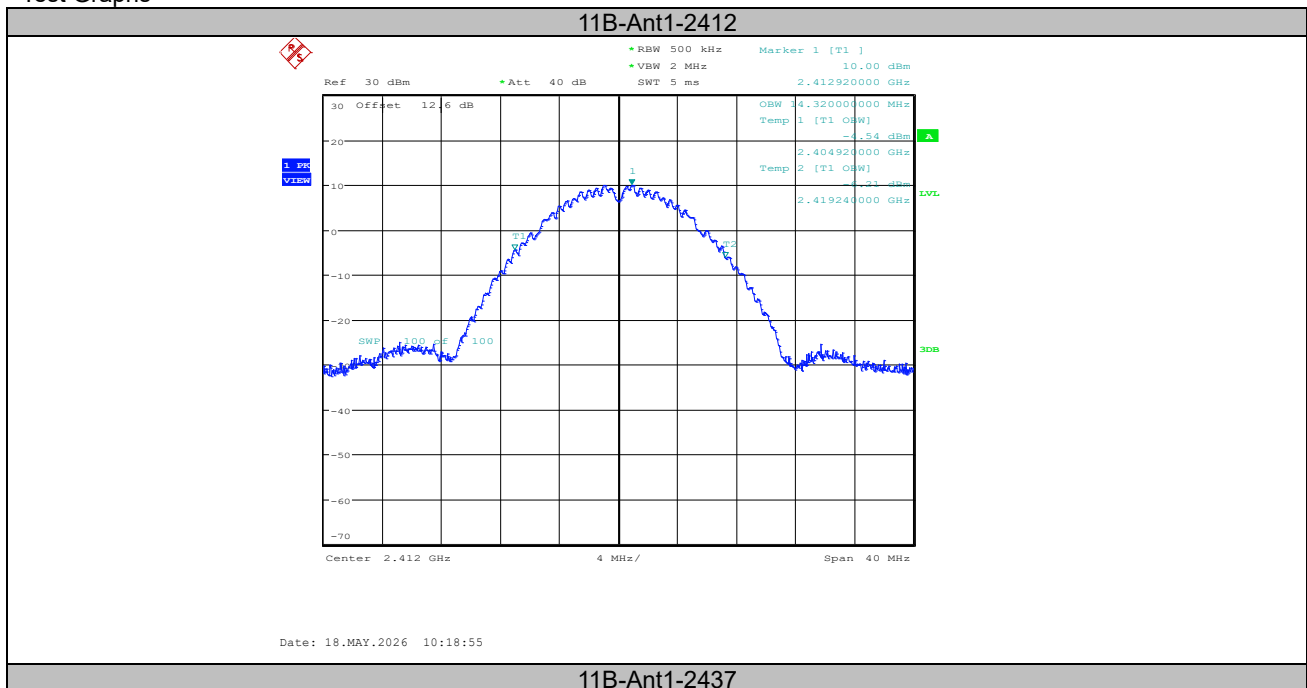
5.4 99% Occupied Bandwidth

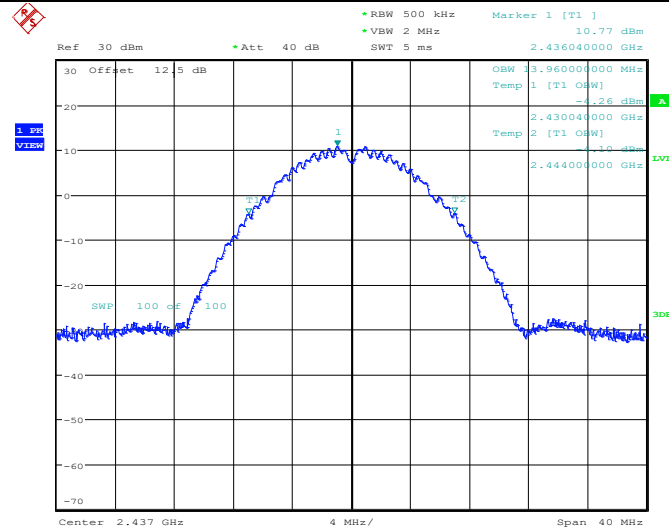
Test Requirement:	47 CFR Part 15C
Test Method:	ANSI C63.10-2020+Cor. 1-2023+C63.10a-2024 + Errata to C63.10a-2024
Test Setup:	 Offset=cable loss+ attenuation factor
Exploratory Test Mode:	Transmitting with all kind of modulations, data rates
Final Test Mode:	Only the worst case is recorded in the report.
Test Results:	Pass

Test Result

TestMode	Antenna	Channel Frequency[MHz]	OCB [MHz]	FL[MHz]	FH[MHz]
11B	Ant1	2412	14.320	2404.9200	2419.2400
11B	Ant1	2437	13.960	2430.0400	2444.0000
11B	Ant1	2462	14.120	2454.9600	2469.0800
11G	Ant1	2412	17.560	2403.2400	2420.8000
11G	Ant1	2437	17.320	2428.4000	2445.7200
11G	Ant1	2462	17.360	2453.3200	2470.6800
11N20SISO	Ant1	2412	18.640	2402.6800	2421.3200
11N20SISO	Ant1	2437	18.400	2427.8400	2446.2400
11N20SISO	Ant1	2462	18.400	2452.7600	2471.1600
11N40SISO	Ant1	2422	36.720	2403.7600	2440.4800
11N40SISO	Ant1	2437	36.480	2418.8400	2455.3200
11N40SISO	Ant1	2452	36.640	2433.6000	2470.2400

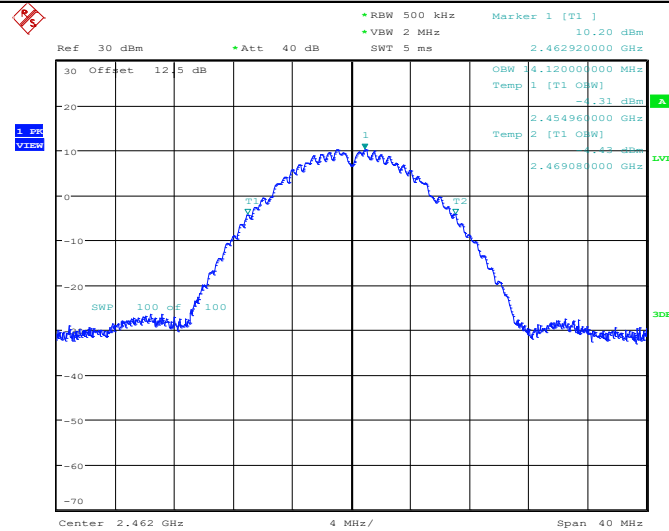
Test Graphs





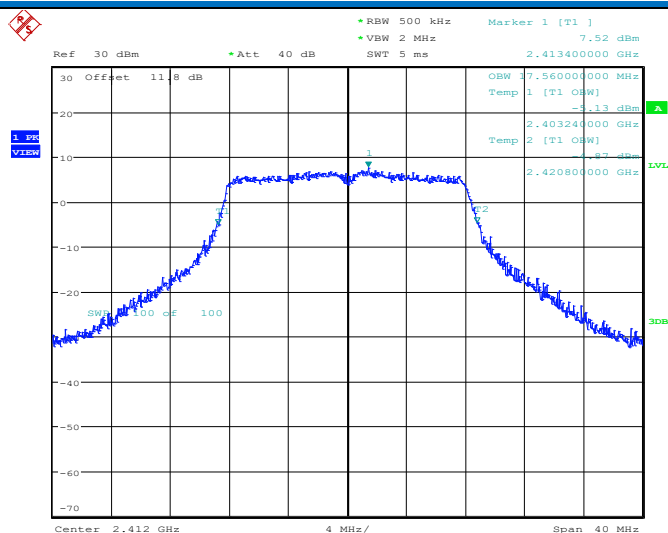
Date: 18.MAY.2026 10:33:46

11B-Ant1-2462



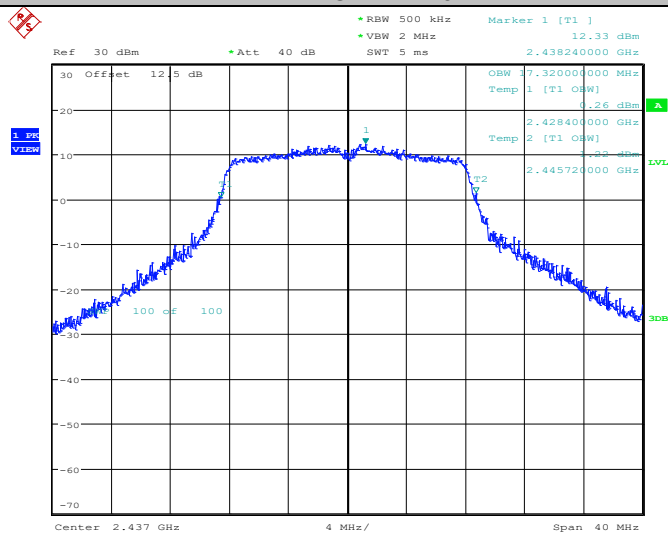
Date: 18.MAY.2026 10:45:37

11G-Ant1-2412



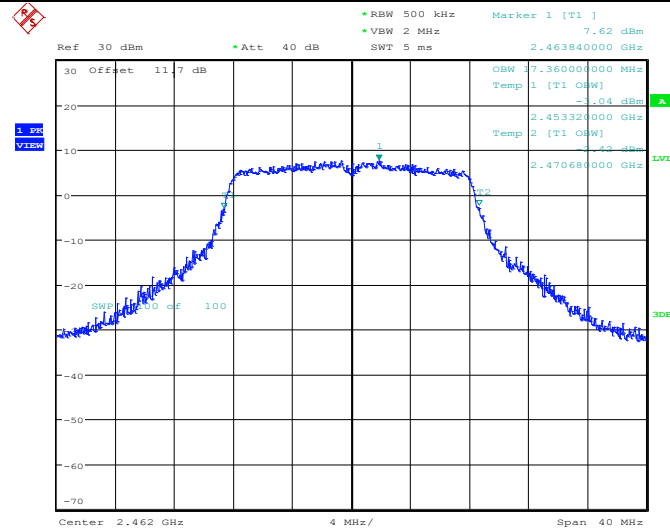
Date: 25.JUN.2026 18:27:26

11G-Ant1-2437



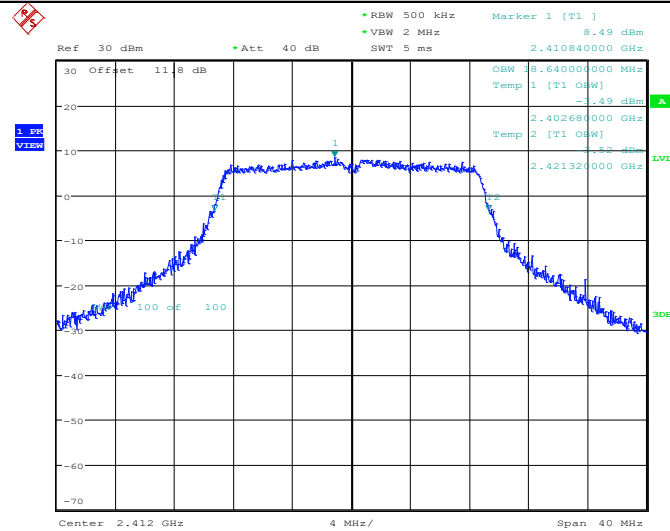
Date: 18.MAY.2026 11:21:36

11G-Ant1-2462



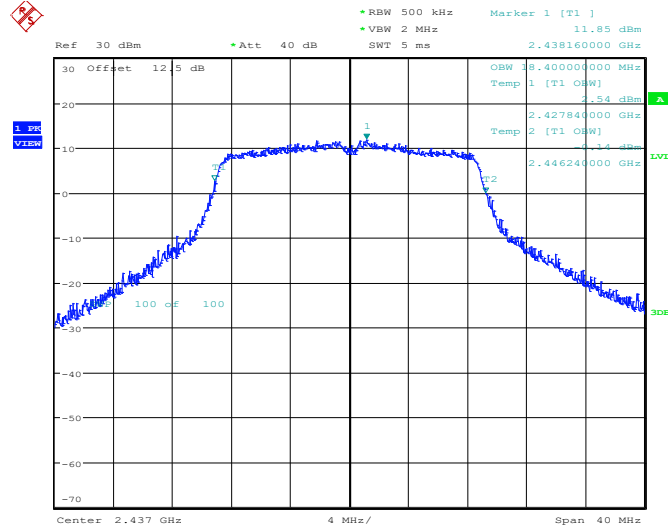
Date: 25.JUN.2026 18:41:37

11N20SISO-Ant1-2412



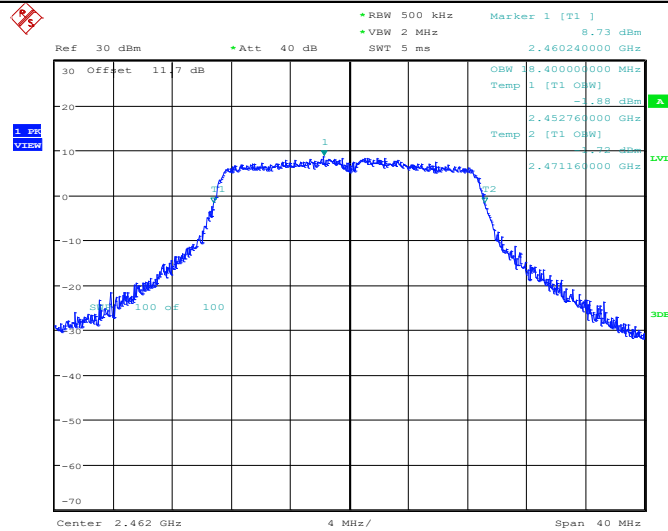
Date: 25.JUN.2026 19:15:31

11N20SISO-Ant1-2437



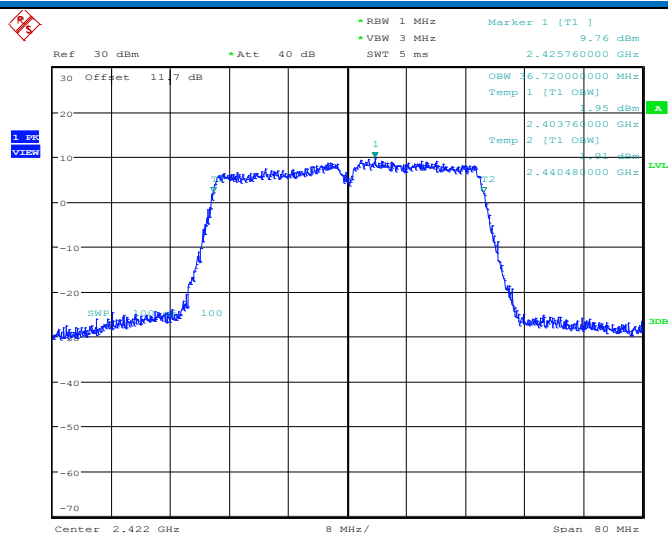
Date: 18.MAY.2026 13:36:53

11N20SISO-Ant1-2462



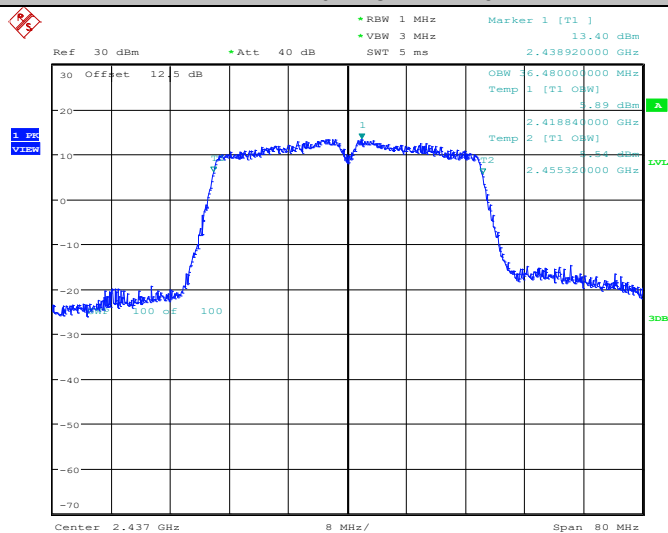
Date: 25.JUN.2026 19:27:32

11N40SISO-Ant1-2422



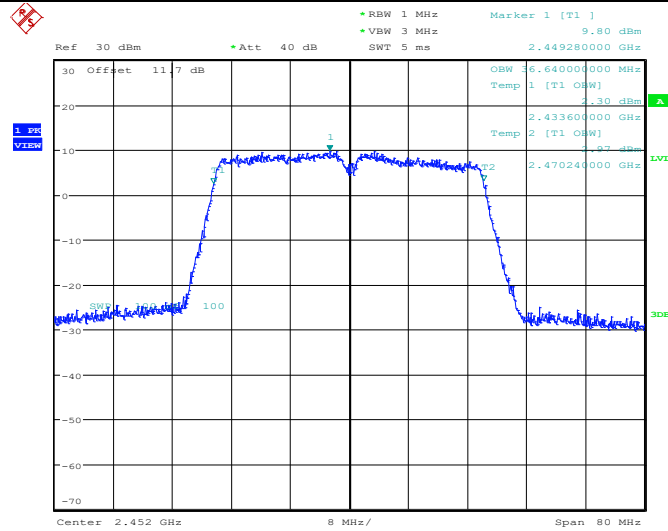
Date: 25.JUN.2026 19:40:43

11N40SISO-Ant1-2437



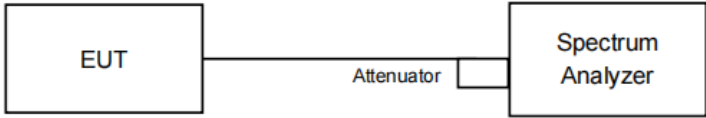
Date: 18.MAY.2026 14:52:25

11N40SISO-Ant1-2452



Date: 25.JUN.2026 20:05:46

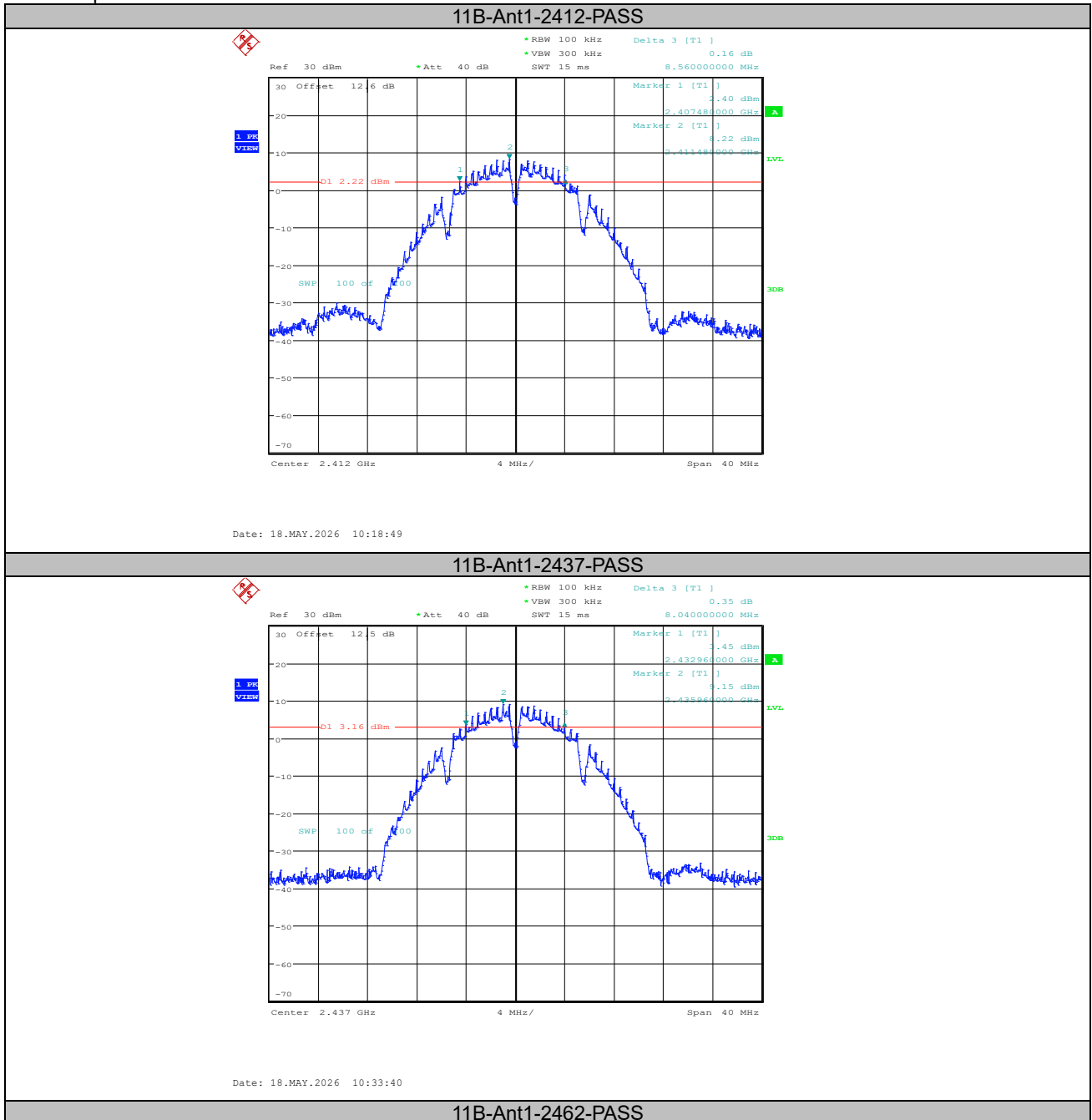
5.5 6dB Occupied Bandwidth

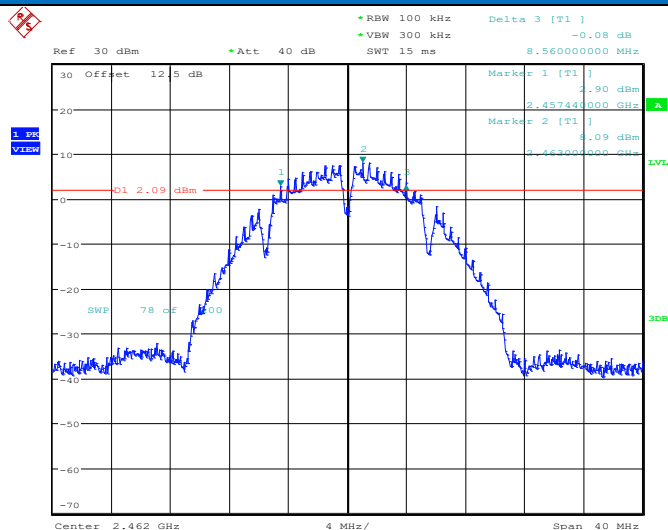
Test Requirement:	47 CFR Part 15C Section 15.247 (a)(2)
Test Method:	ANSI C63.10-2020+Cor. 1-2023+C63.10a-2024 + Errata to C63.10a-2024
Test Setup:	 Offset=cable loss+ attenuation factor
Exploratory Test Mode:	Transmitting with all kind of modulations, data rates
Final Test Mode:	Only the worst case is recorded in the report.
Limit:	≥ 500 kHz
Test Results:	Pass

Test Result

TestMode	Antenna	Frequency[MHz]	DTS BW [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
11B	Ant1	2412	8.56	2407.48	2416.04	0.5	PASS
11B	Ant1	2437	8.04	2432.96	2441.00	0.5	PASS
11B	Ant1	2462	8.56	2457.44	2466.00	0.5	PASS
11G	Ant1	2412	15.68	2404.08	2419.76	0.5	PASS
11G	Ant1	2437	15.08	2429.44	2444.52	0.5	PASS
11G	Ant1	2462	16.08	2453.84	2469.92	0.5	PASS
11N20SISO	Ant1	2412	16.92	2403.60	2420.52	0.5	PASS
11N20SISO	Ant1	2437	15.68	2428.84	2444.52	0.5	PASS
11N20SISO	Ant1	2462	16.28	2453.60	2469.88	0.5	PASS
11N40SISO	Ant1	2422	35.68	2404.48	2440.16	0.5	PASS
11N40SISO	Ant1	2437	35.04	2419.48	2454.52	0.5	PASS
11N40SISO	Ant1	2452	35.92	2433.84	2469.76	0.5	PASS

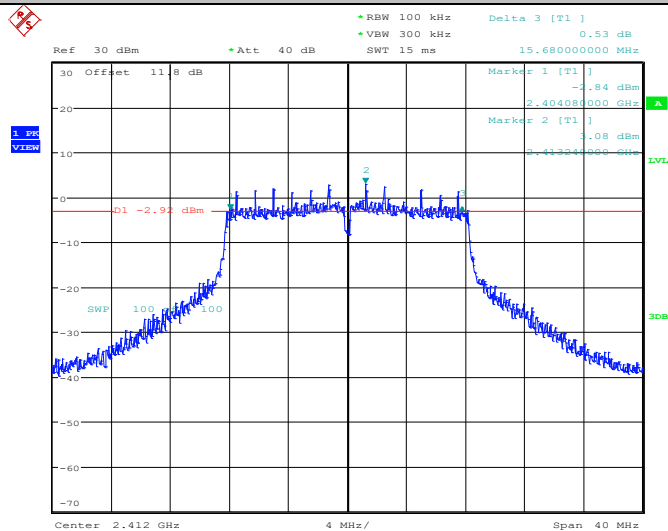
Test Graphs





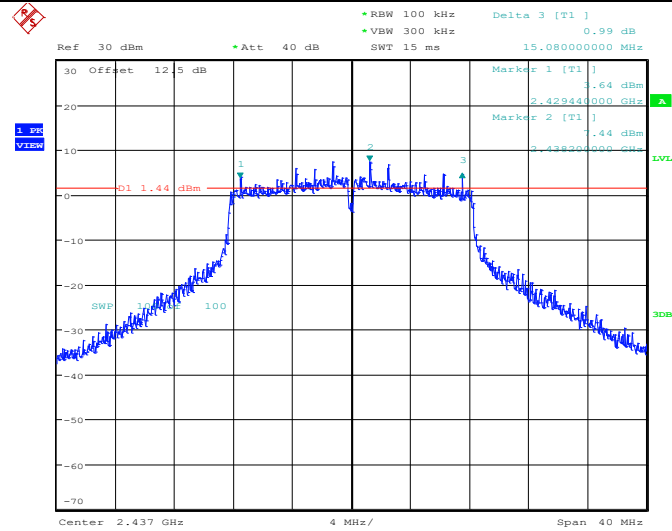
Date: 18.MAY.2026 10:45:31

11G-Ant1-2412-PASS



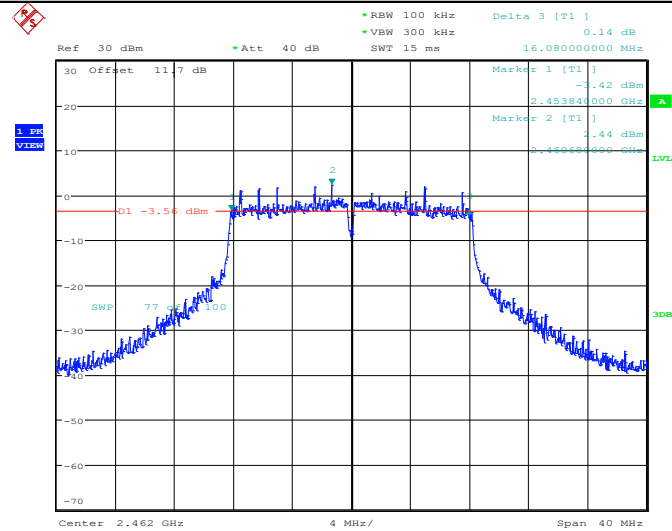
Date: 25.JUN.2026 18:27:19

11G-Ant1-2437-PASS



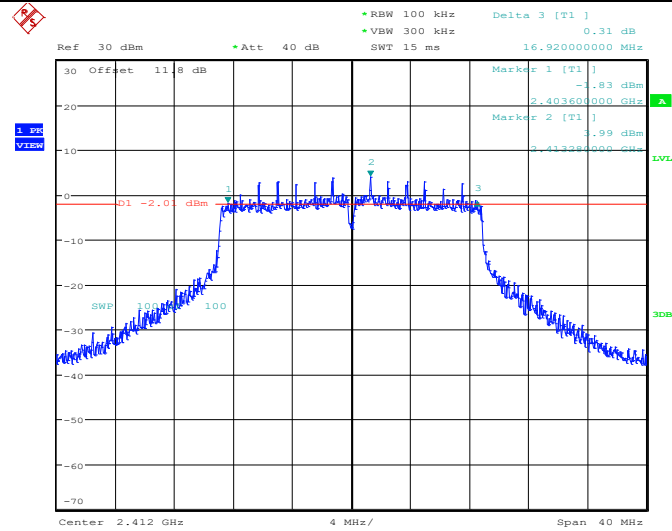
Date: 18.MAY.2026 11:21:30

11G-Ant1-2462-PASS



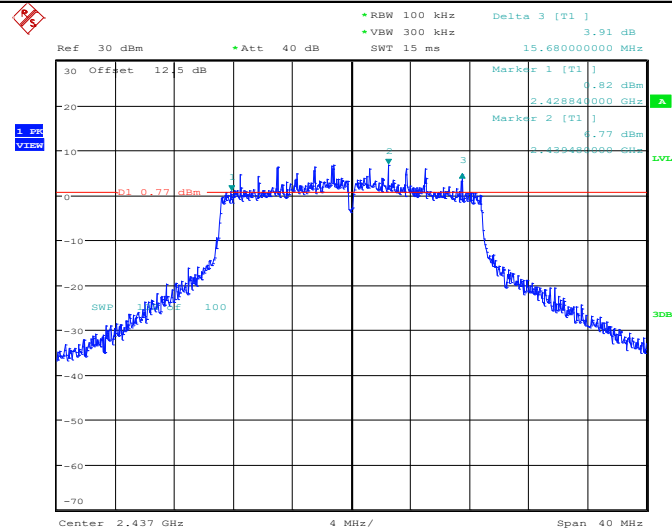
Date: 25.JUN.2026 18:41:31

11N20SISO-Ant1-2412-PASS



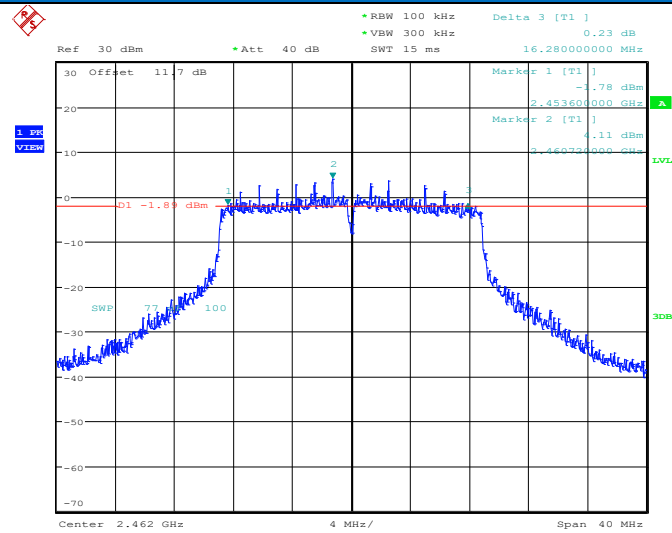
Date: 25.JUN.2026 19:15:25

11N20SISO-Ant1-2437-PASS



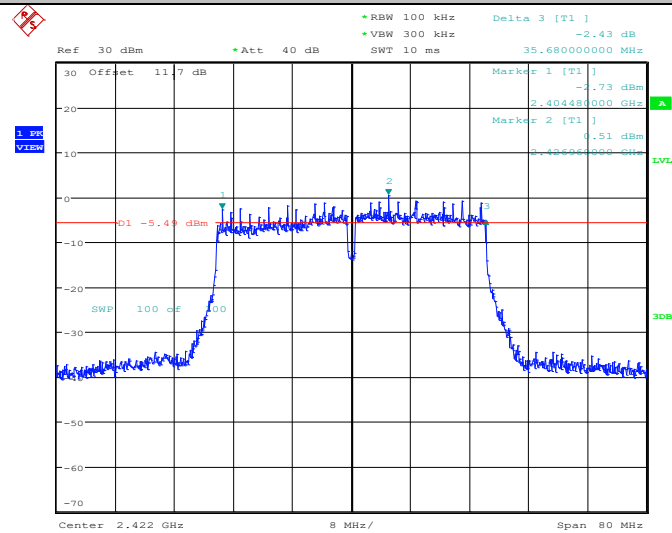
Date: 18.MAY.2026 13:36:46

11N20SISO-Ant1-2462-PASS



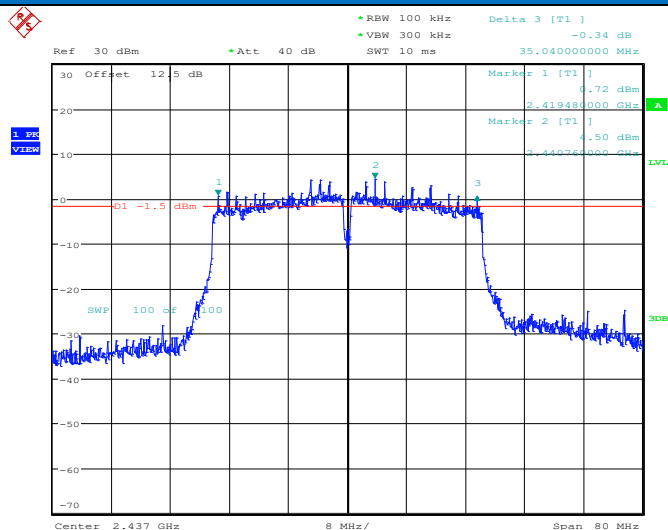
Date: 25.JUN.2026 19:27:26

11N40SISO-Ant1-2422-PASS



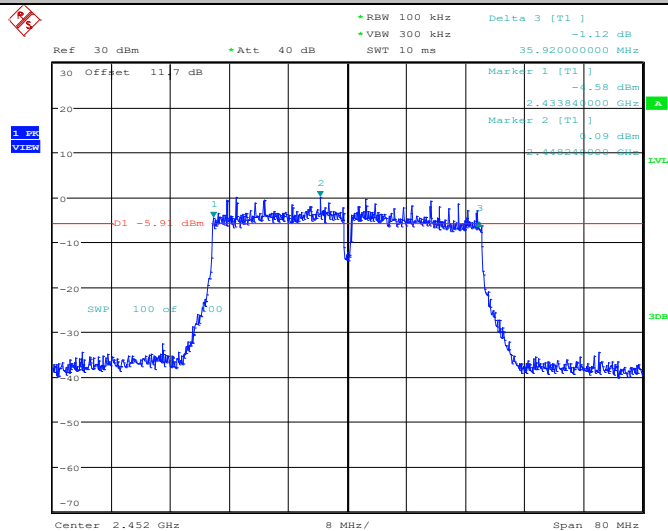
Date: 25.JUN.2026 19:40:36

11N40SISO-Ant1-2437-PASS



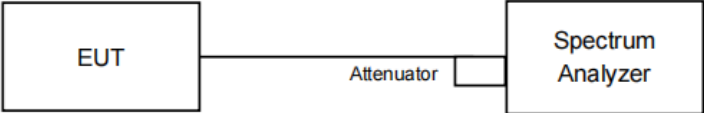
Date: 18.MAY.2026 14:52:19

11N40SISO-Ant1-2452-PASS



Date: 25.JUN.2026 20:05:39

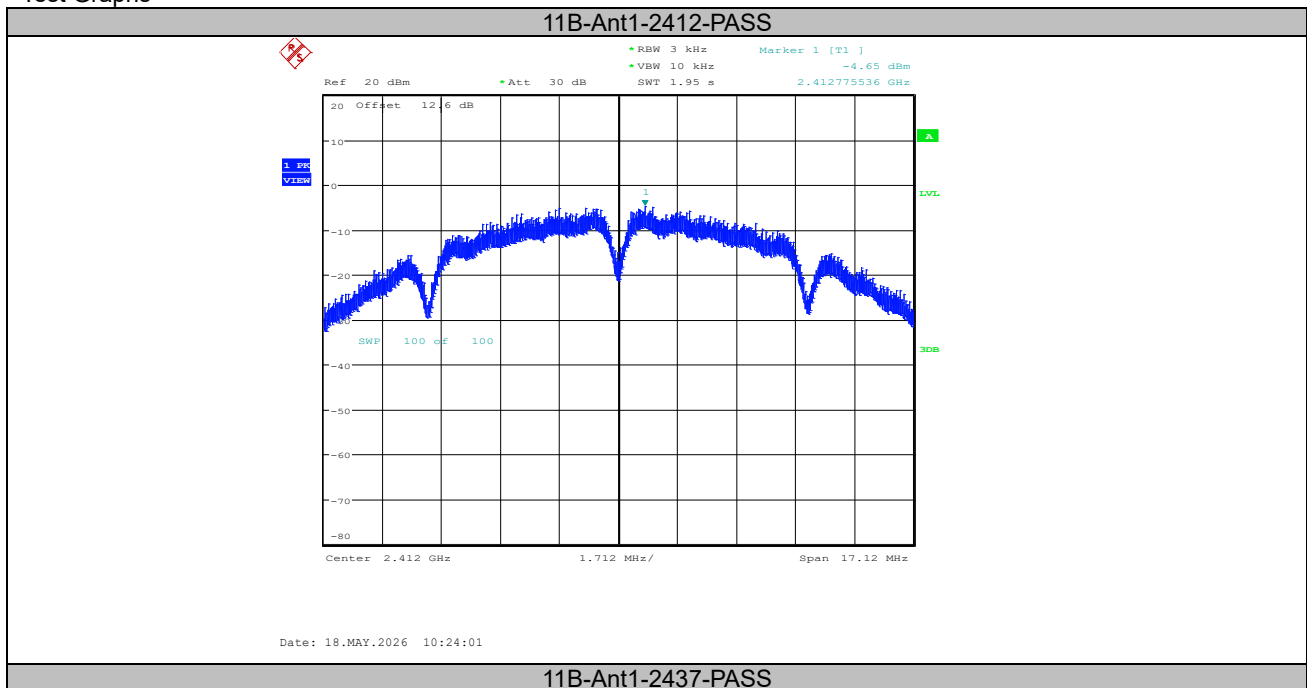
5.6 Power Spectral Density

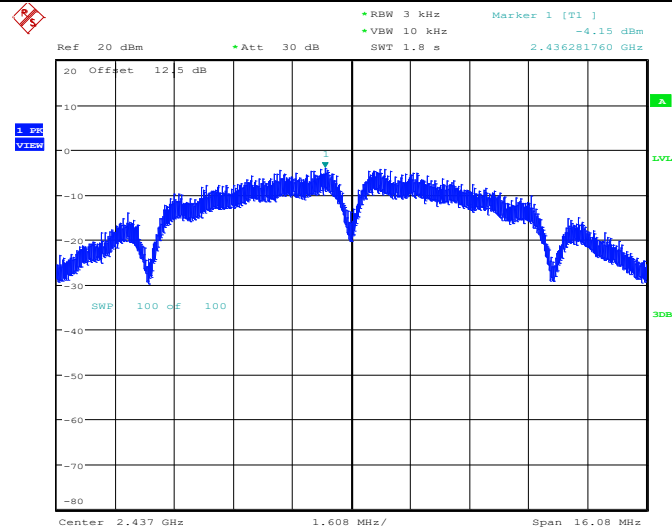
Test Requirement:	47 CFR Part 15C Section 15.247 (e)
Test Method:	ANSI C63.10-2020+Cor. 1-2023+C63.10a-2024 + Errata to C63.10a-2024
Test Setup:	 Offset=cable loss+ attenuation factor
Exploratory Test Mode:	Transmitting with all kind of modulations, data rates
Final Test Mode:	Only the worst case is recorded in the report.
Limit:	≤8.00dBm/3kHz
Test Results:	Pass

Test Result

TestMode	Antenna	Frequency[MHz]	Result[dBm/3-100kHz]	Limit[dBm/3kHz]	Verdict
11B	Ant1	2412	-4.65	≤8.00	PASS
11B	Ant1	2437	-4.15	≤8.00	PASS
11B	Ant1	2462	-4.30	≤8.00	PASS
11G	Ant1	2412	-10.42	≤8.00	PASS
11G	Ant1	2437	-5.61	≤8.00	PASS
11G	Ant1	2462	-10.74	≤8.00	PASS
11N20SISO	Ant1	2412	-9.65	≤8.00	PASS
11N20SISO	Ant1	2437	-6.79	≤8.00	PASS
11N20SISO	Ant1	2462	-10.09	≤8.00	PASS
11N40SISO	Ant1	2422	-12.48	≤8.00	PASS
11N40SISO	Ant1	2437	-8.73	≤8.00	PASS
11N40SISO	Ant1	2452	-12.44	≤8.00	PASS

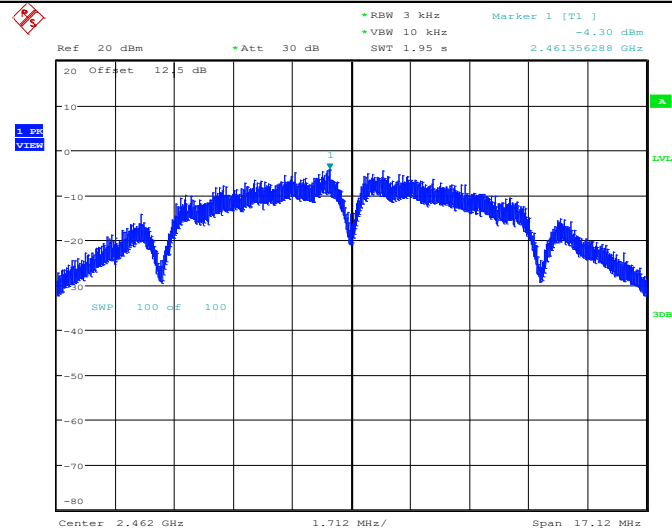
Test Graphs





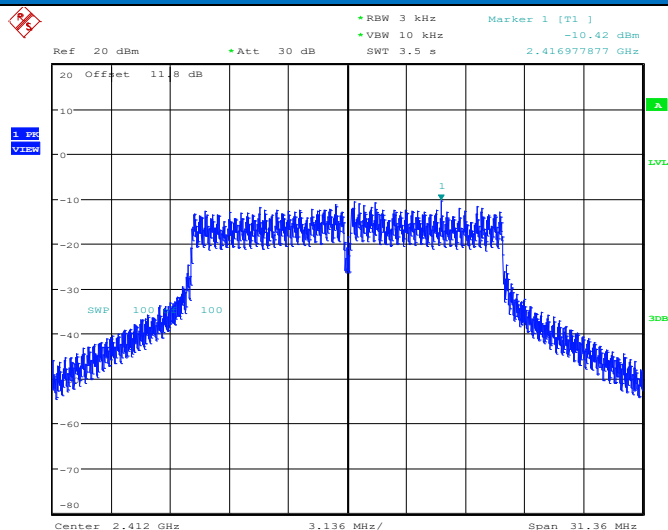
Date: 18.MAY.2026 10:38:19

11B-Ant1-2462-PASS



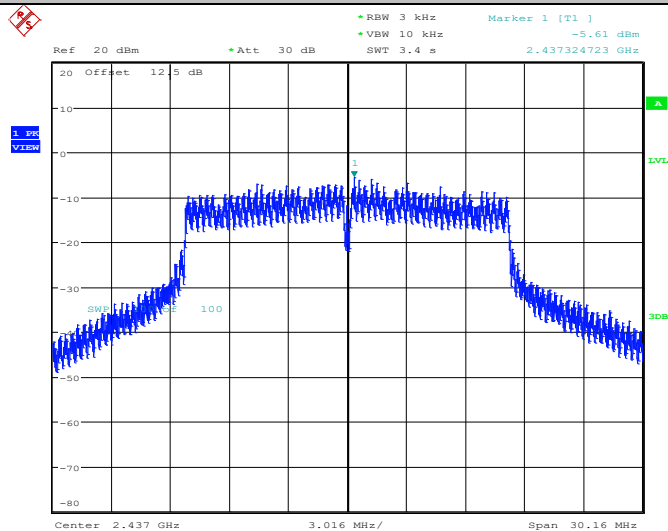
Date: 18.MAY.2026 10:50:22

11G-Ant1-2412-PASS



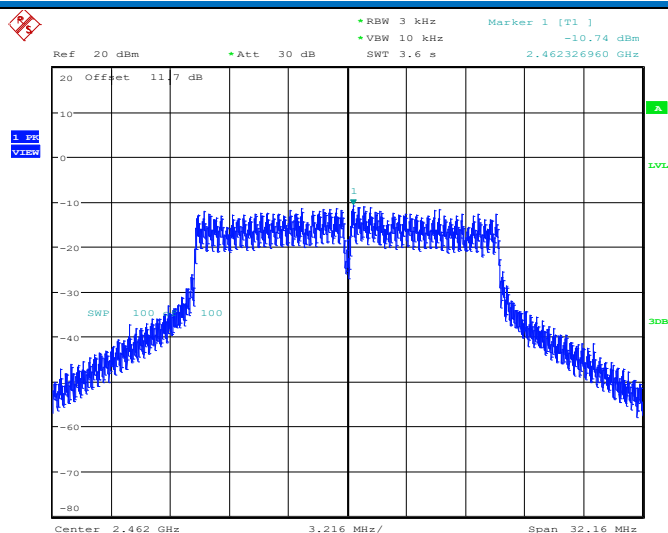
Date: 25.JUN.2026 18:35:40

11G-Ant1-2437-PASS



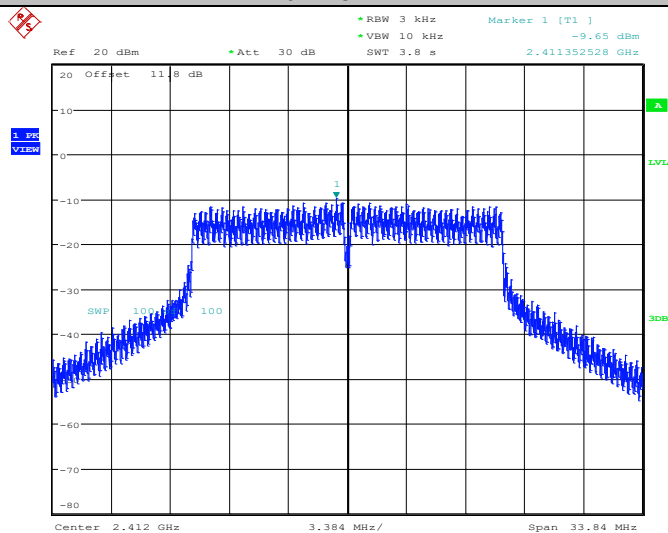
Date: 18.MAY.2026 11:29:57

11G-Ant1-2462-PASS



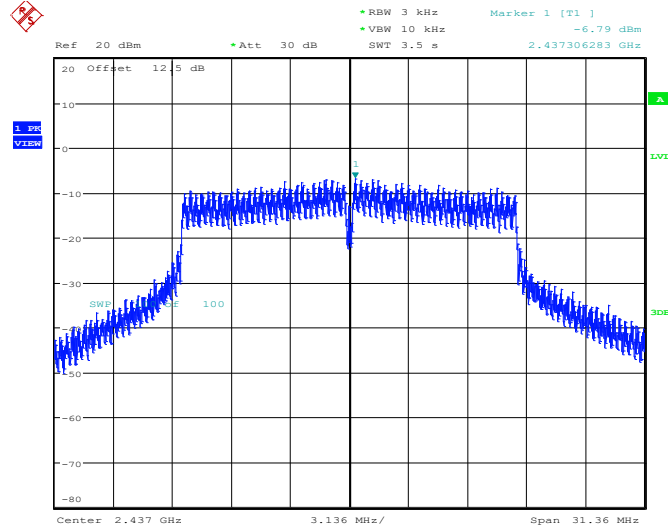
Date: 25.JUN.2026 18:51:59

11N20SISO-Ant1-2412-PASS



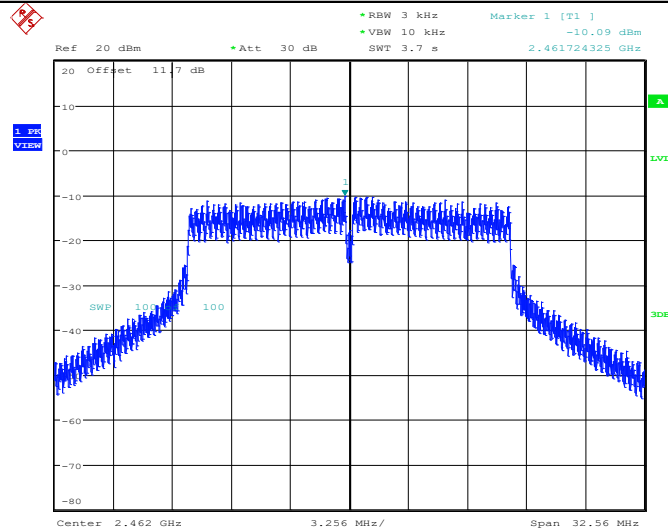
Date: 25.JUN.2026 19:24:38

11N20SISO-Ant1-2437-PASS



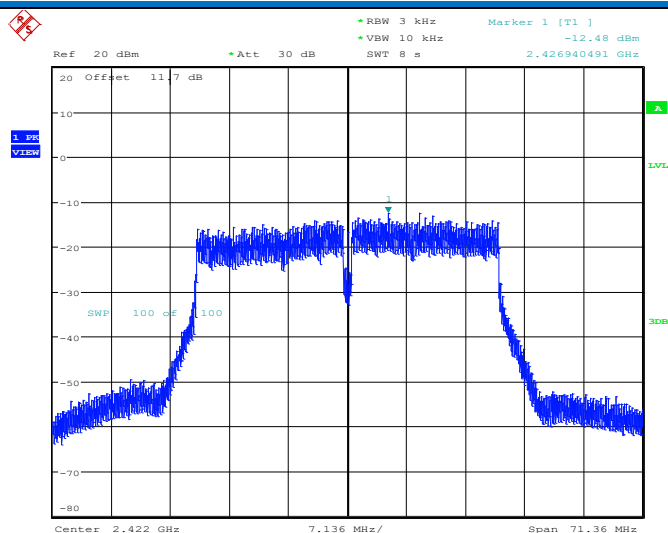
Date: 18.MAY.2026 14:00:07

11N20SISO-Ant1-2462-PASS



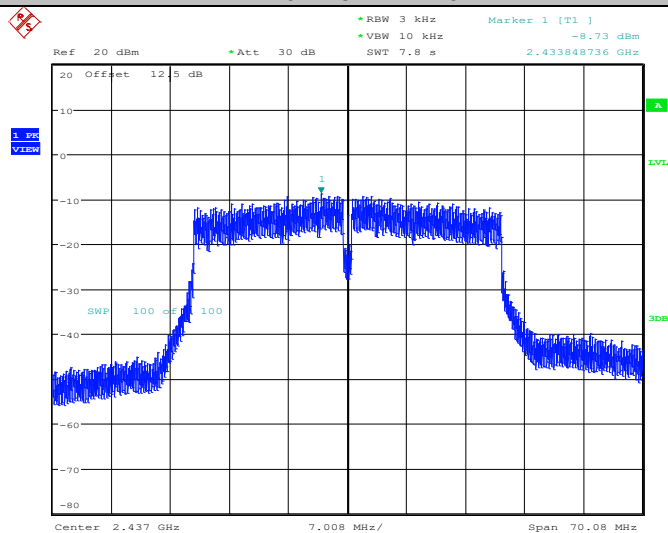
Date: 25.JUN.2026 19:36:04

11N40SISO-Ant1-2422-PASS



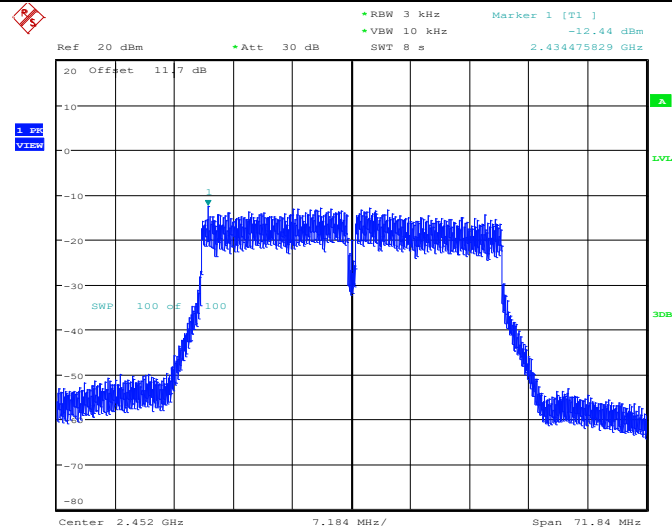
Date: 25.JUN.2026 19:58:50

11N40SISO-Ant1-2437-PASS



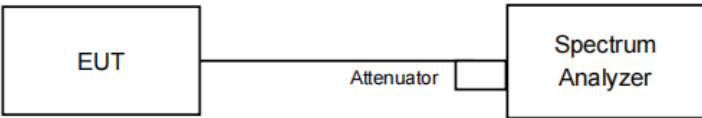
Date: 18.MAY.2026 15:09:45

11N40SISO-Ant1-2452-PASS



Date: 25.JUN.2026 20:23:33

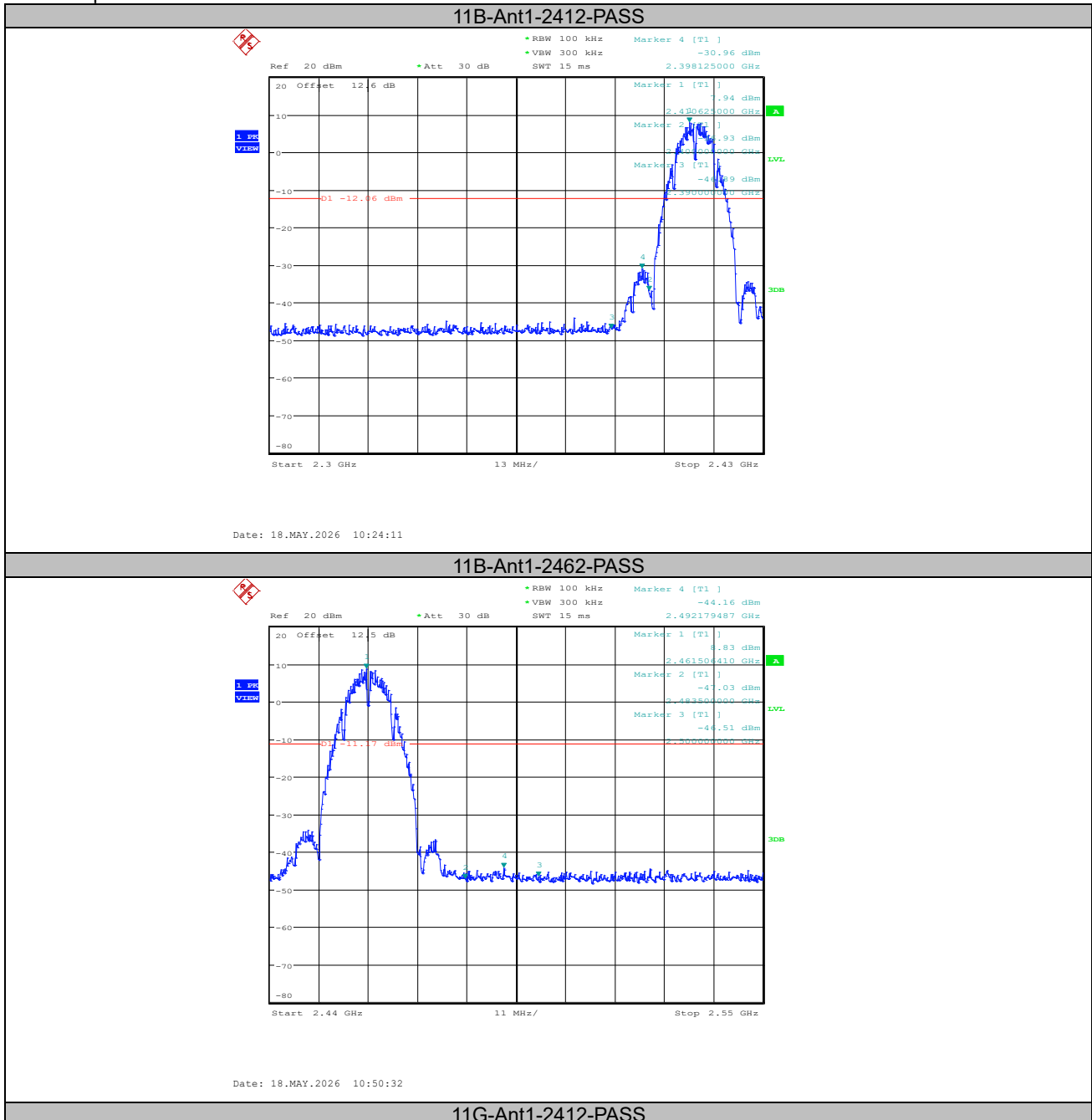
5.7 Band-edge for RF Conducted Emissions

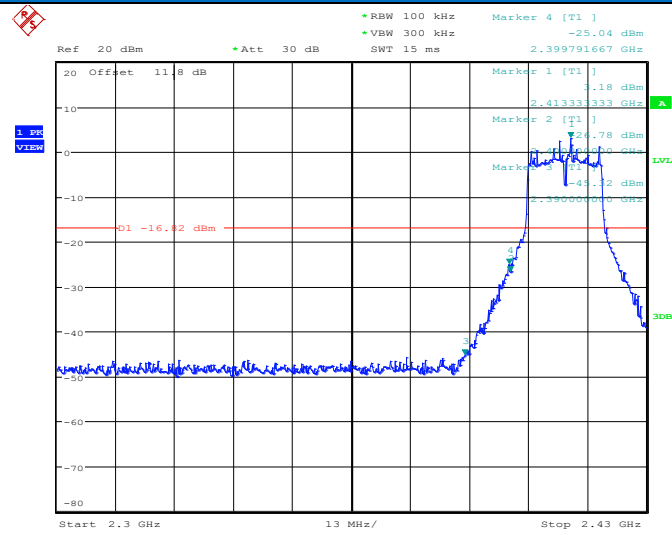
Test Requirement:	47 CFR Part 15C Section 15.247 (d)
Test Method:	ANSI C63.10-2020+Cor. 1-2023+C63.10a-2024 + Errata to C63.10a-2024
Test Setup:	 Offset=cable loss+ attenuation factor
Exploratory Test Mode:	Transmitting with all kind of modulations, data rates
Final Test Mode:	Only the worst case is recorded in the report.
Limit:	In any 100 kHz bandwidth outside the frequency band in which the spread spectrum intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 30 dB below that in the 100 kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement.
Test Results:	Pass

Test Result

TestMode	Antenna	ChName	Frequency[MHz]	RefLevel[dBm]	Result[dBm]	Limit[dBm]	Verdict
11B	Ant1	Low	2412	7.94	-30.96	≤-12.06	PASS
11B	Ant1	High	2462	8.83	-44.16	≤-11.17	PASS
11G	Ant1	Low	2412	3.18	-25.04	≤-16.82	PASS
11G	Ant1	High	2462	2.59	-45.24	≤-17.41	PASS
11N20SISO	Ant1	Low	2412	3.67	-24.1	≤-16.33	PASS
11N20SISO	Ant1	High	2462	4.68	-44.88	≤-15.32	PASS
11N40SISO	Ant1	Low	2422	0.44	-33.73	≤-19.56	PASS
11N40SISO	Ant1	High	2452	0.83	-41.01	≤-19.17	PASS

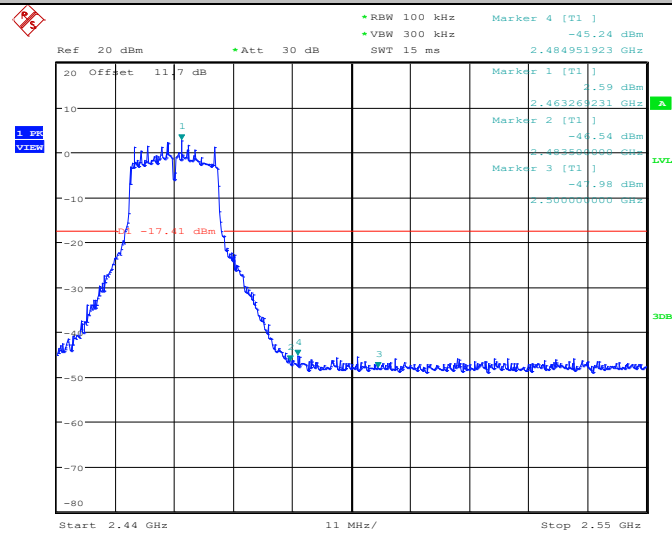
Test Graphs





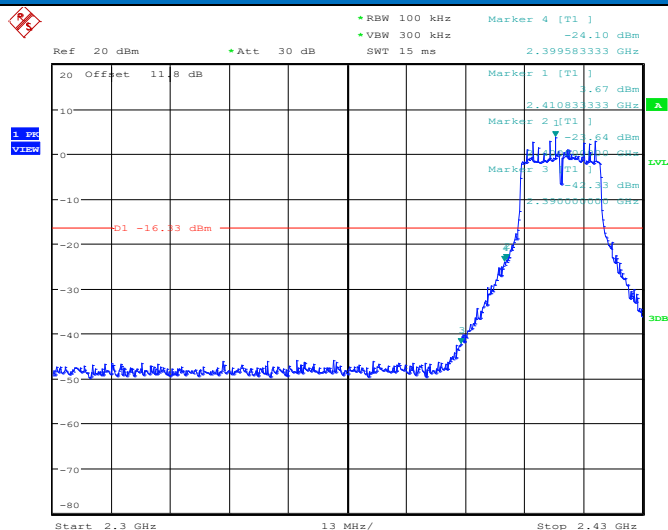
Date: 25.JUN.2026 18:35:50

11G-Ant1-2462-PASS



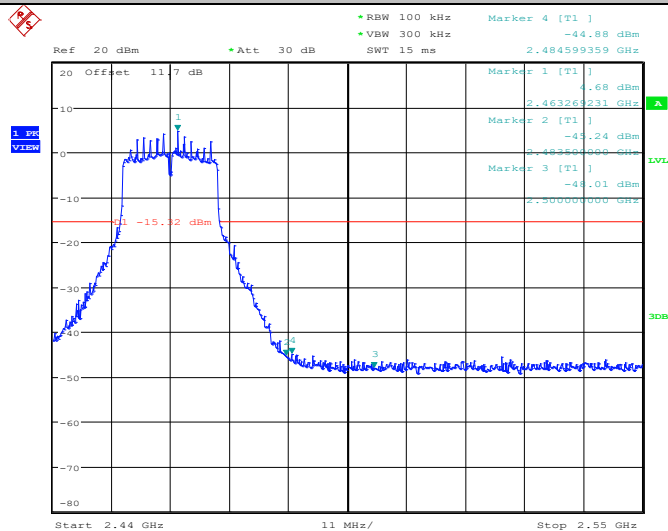
Date: 25.JUN.2026 18:52:09

11N20SISO-Ant1-2412-PASS



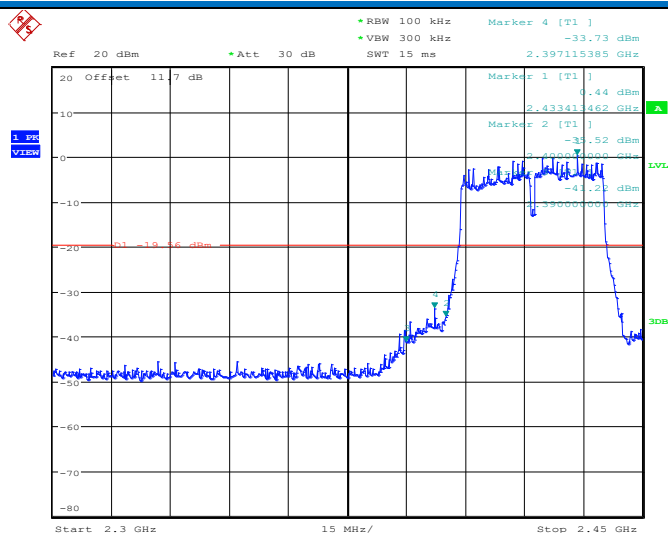
Date: 25.JUN.2026 19:24:48

11N20SISO-Ant1-2462-PASS



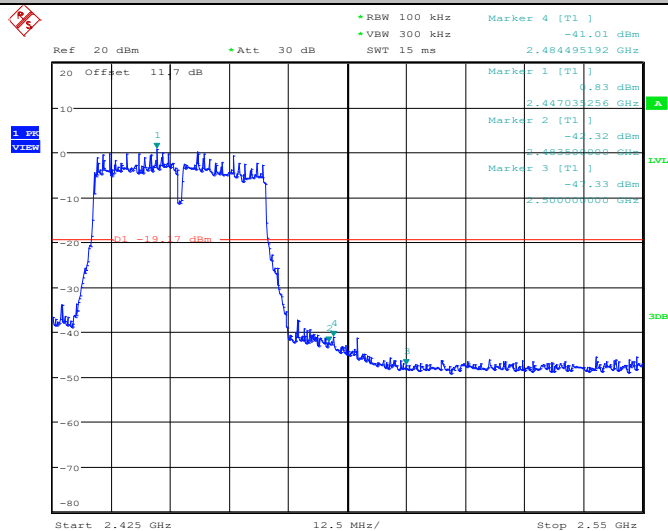
Date: 25.JUN.2026 19:36:14

11N40SISO-Ant1-2422-PASS



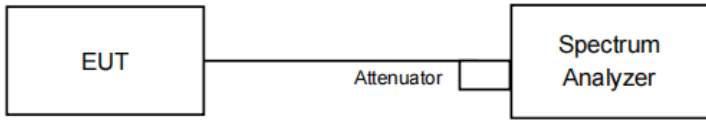
Date: 25.JUN.2026 19:58:59

11N40SISO-Ant1-2452-PASS



Date: 25.JUN.2026 20:23:43

5.8 RF Conducted Spurious Emissions

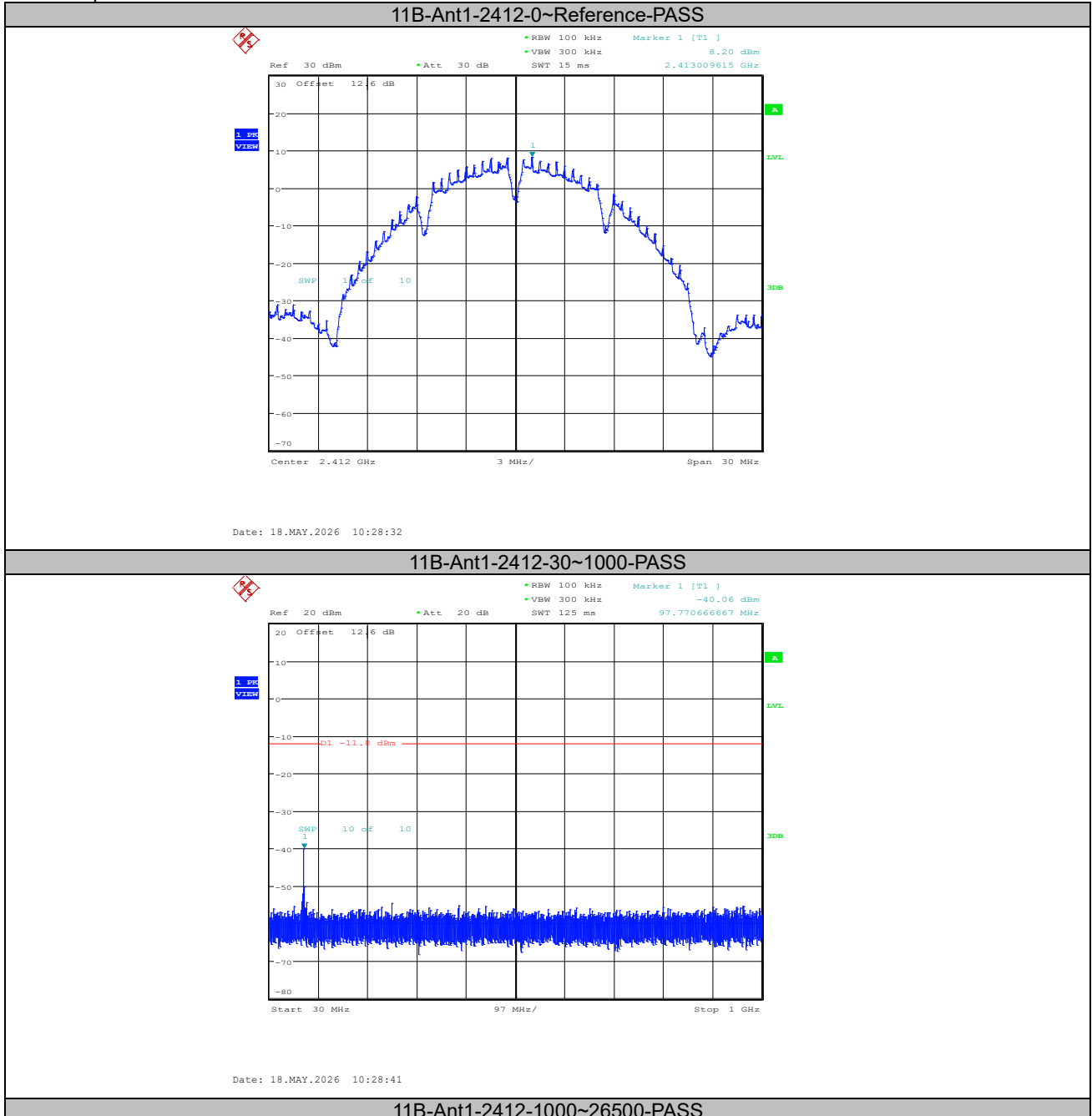
Test Requirement:	47 CFR Part 15C Section 15.247 (d)
Test Method:	ANSI C63.10-2020+Cor. 1-2023+C63.10a-2024 + Errata to C63.10a-2024
Test Setup:	 Offset=cable loss+ attenuation factor
Exploratory Test Mode:	Transmitting with all kind of modulations, data rates
Final Test Mode:	Only the worst case is recorded in the report.
Limit:	In any 100 kHz bandwidth outside the frequency band in which the spread spectrum intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 30 dB below that in the 100 kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement.
Test Results:	Pass

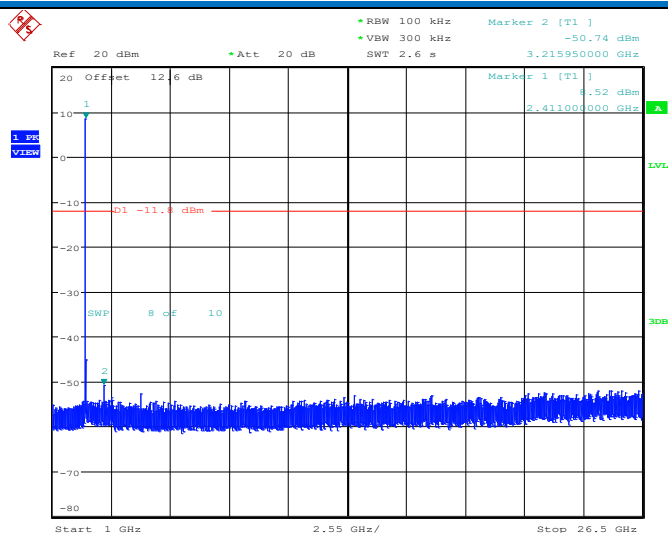
Test Result

TestMode	Antenna	Frequency[MHz]	FreqRange [Mhz]	RefLevel [dBm]	Result [dBm]	Limit [dBm]	Verdict
11B	Ant1	2412	0~Reference	8.20	8.20	---	PASS
11B	Ant1	2412	30~1000	8.20	-40.06	≤-11.8	PASS
11B	Ant1	2412	1000~26500	8.20	-50.74	≤-11.8	PASS
11B	Ant1	2437	0~Reference	9.40	9.40	---	PASS
11B	Ant1	2437	30~1000	9.40	-39.4	≤-10.6	PASS
11B	Ant1	2437	1000~26500	9.40	-51.64	≤-10.6	PASS
11B	Ant1	2462	0~Reference	8.37	8.37	---	PASS
11B	Ant1	2462	30~1000	8.37	-40.86	≤-11.63	PASS
11B	Ant1	2462	1000~26500	8.37	-51.73	≤-11.63	PASS
11G	Ant1	2412	0~Reference	2.73	2.73	---	PASS
11G	Ant1	2412	30~1000	2.73	-55.18	≤-17.27	PASS
11G	Ant1	2412	1000~26500	2.73	-50.6	≤-17.27	PASS
11G	Ant1	2437	0~Reference	7.71	7.71	---	PASS
11G	Ant1	2437	30~1000	7.71	-49.03	≤-12.29	PASS
11G	Ant1	2437	1000~26500	7.71	-49.3	≤-12.29	PASS
11G	Ant1	2462	0~Reference	2.85	2.85	---	PASS
11G	Ant1	2462	30~1000	2.85	-54.68	≤-17.15	PASS
11G	Ant1	2462	1000~26500	2.85	-52.78	≤-17.15	PASS
11N20SISO	Ant1	2412	0~Reference	3.88	3.88	---	PASS
11N20SISO	Ant1	2412	30~1000	3.88	-53.82	≤-16.12	PASS
11N20SISO	Ant1	2412	1000~26500	3.88	-47.12	≤-16.12	PASS
11N20SISO	Ant1	2437	0~Reference	7.59	7.59	---	PASS
11N20SISO	Ant1	2437	30~1000	7.59	-47.93	≤-12.41	PASS
11N20SISO	Ant1	2437	1000~26500	7.59	-48.35	≤-12.41	PASS
11N20SISO	Ant1	2462	0~Reference	4.12	4.12	---	PASS
11N20SISO	Ant1	2462	30~1000	4.12	-53.78	≤-15.88	PASS
11N20SISO	Ant1	2462	1000~26500	4.12	-52.37	≤-15.88	PASS
11N40SISO	Ant1	2422	0~Reference	0.45	0.45	---	PASS
11N40SISO	Ant1	2422	30~1000	0.45	-55.08	≤-19.55	PASS
11N40SISO	Ant1	2422	1000~26500	0.45	-48.02	≤-19.55	PASS
11N40SISO	Ant1	2437	0~Reference	4.43	4.43	---	PASS

11N40SISO	Ant1	2437	30~1000	4.43	-50.66	≤ -15.57	PASS
11N40SISO	Ant1	2437	1000~26500	4.43	-49.76	≤ -15.57	PASS
11N40SISO	Ant1	2452	0~Reference	0.83	0.83	---	PASS
11N40SISO	Ant1	2452	30~1000	0.83	-54.46	≤ -19.17	PASS
11N40SISO	Ant1	2452	1000~26500	0.83	-51.48	≤ -19.17	PASS

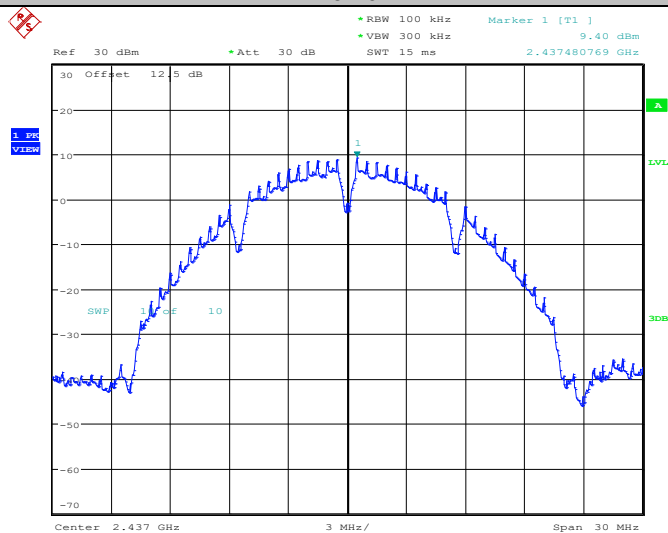
Test Graphs





Date: 18.MAY.2026 10:29:04

11B-Ant1-2437-0~Reference-PASS



Date: 18.MAY.2026 10:38:27

11B-Ant1-2437-30~1000-PASS



1 dB
VdB

Ref 20 dBm Att 20 dB RBW 100 kHz VBW 300 kHz SWT 2.6 s

Marker 1 [T1] 2.437350000 GHz 7.09 dBm
Marker 2 [T1] 4.873450000 GHz -51.64 dBm

Offset 12.5 dB

1

0

-10

-10.1 dBm

-20

-30

SWP 8 10

2

-50

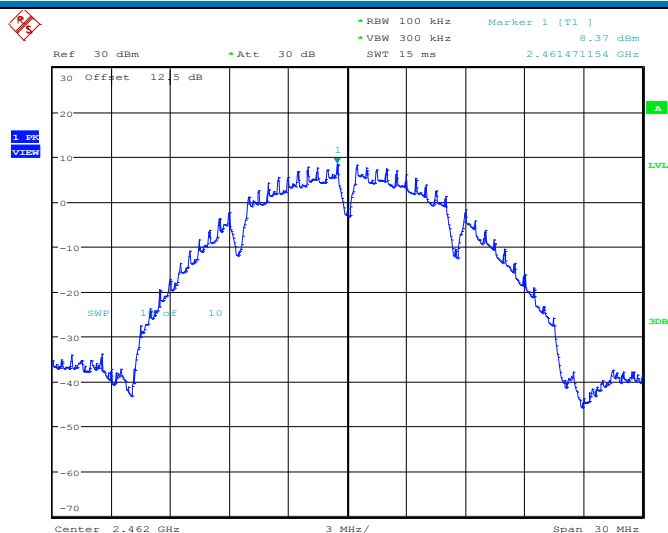
-70

-80

Start 1 GHz 2.55 GHz/ Stop 26.5 GHz

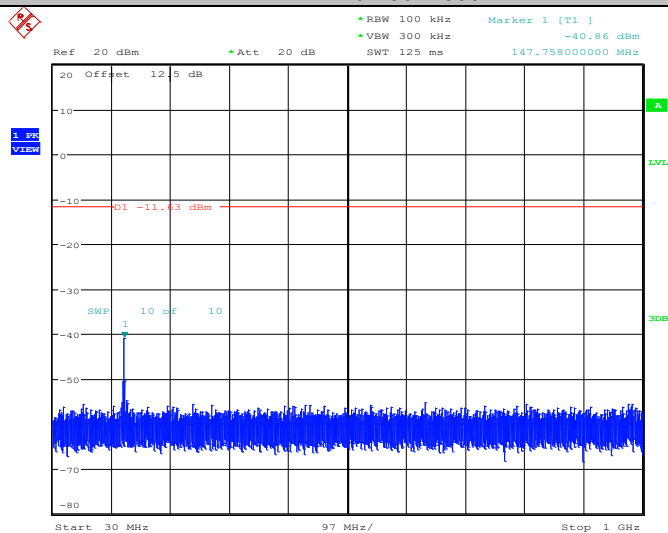
Date: 18.MAY.2026 10:38:59

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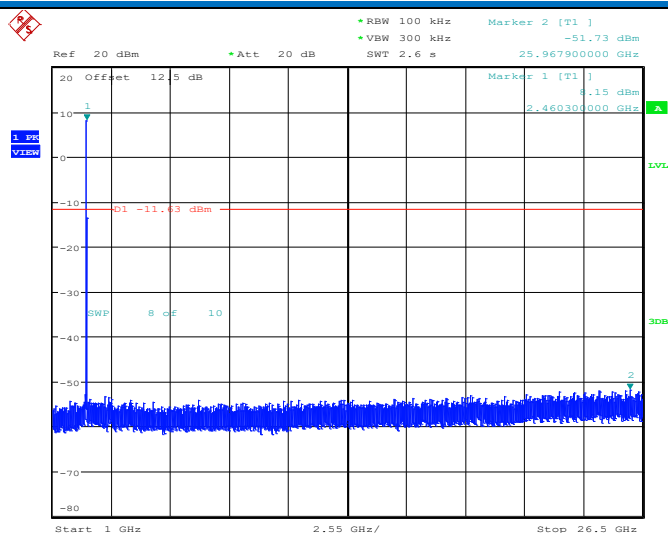
Date: 18.MAY.2026 10:53:25

11B-Ant1-2462-30~1000-PASS



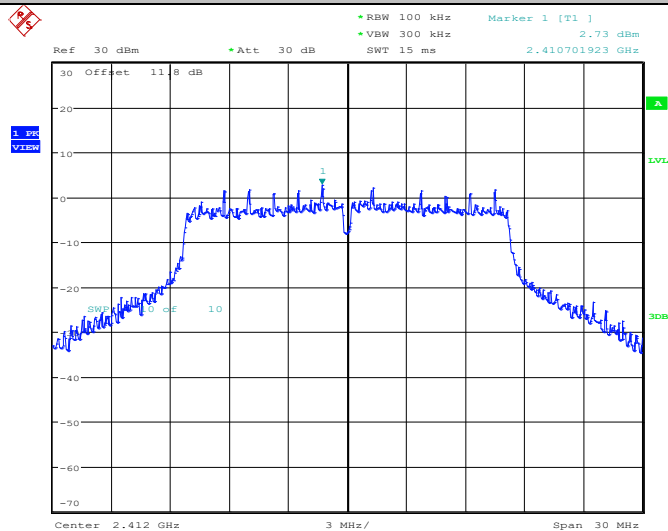
Date: 18.MAY.2026 10:53:33

11B-Ant1-2462-1000~26500-PASS



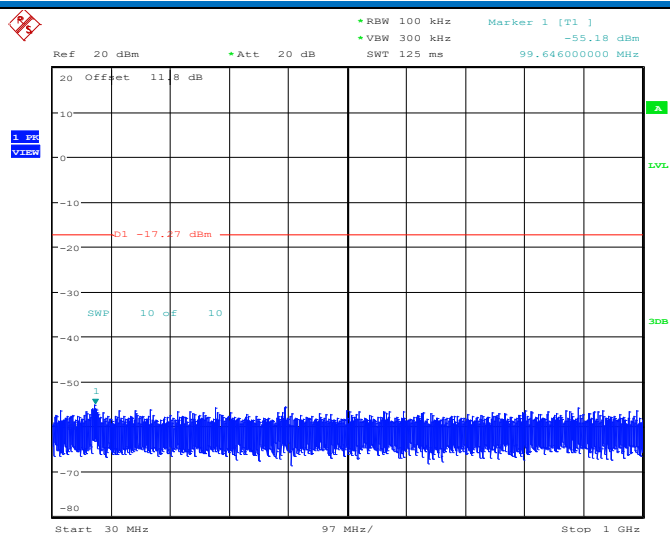
Date: 18.MAY.2026 10:53:56

11G-Ant1-2412-0~Reference-PASS



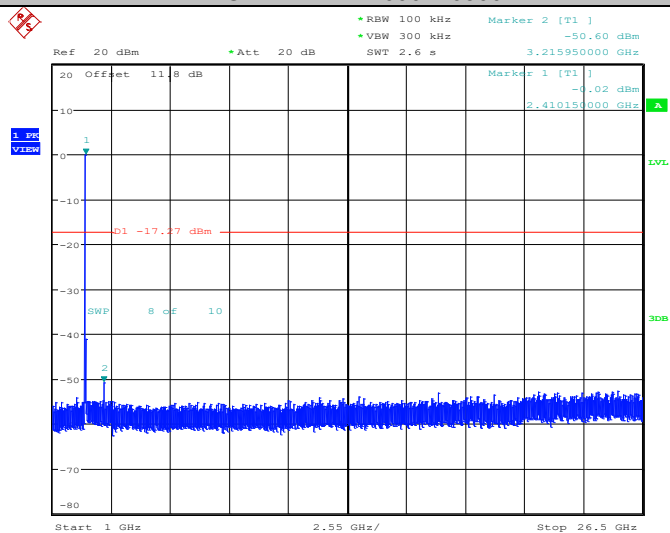
Date: 25.JUN.2026 18:39:06

11G-Ant1-2412-30~1000-PASS



Date: 25.JUN.2026 18:39:15

11G-Ant1-2412-1000~26500-PASS



Date: 25.JUN.2026 18:39:38

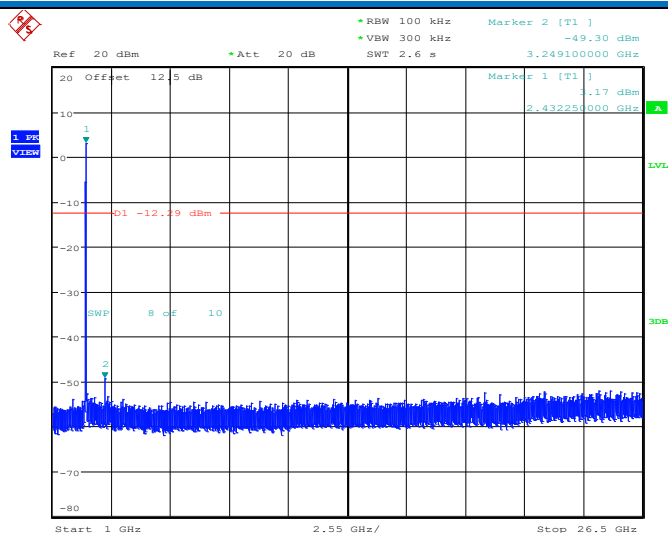
11G-Ant1-2437-0~Reference-PASS



The screenshot shows a Spectrum Analyzer interface. At the top left, there is a logo with the letters 'A' and 'S' in a red square. The main display area is a grid with a horizontal axis for frequency (MHz) and a vertical axis for power (dBm). The frequency axis ranges from 30 MHz to 1 GHz, with a major tick at 97 MHz. The power axis ranges from -80 dBm to 20 dBm, with a major tick at -10 dBm. A blue signal trace is visible, showing a peak at 30 MHz. A red horizontal line is drawn across the grid at -12.29 dBm, labeled 'D1 -12.29 dBm'. The signal trace is labeled 'SWP 10 cF 10'. The top right corner displays 'Marker 1 [T1]' and '-49.03 dBm'. The bottom right corner displays '122.15000000 MHz'. The bottom left corner displays 'Start 30 MHz' and 'Stop 1 GHz'. The bottom center displays '97 MHz/'. The top center displays 'Ref 20 dBm', 'Att 20 dB', 'RBW 100 kHz', 'VBW 300 kHz', and 'SWT 125 ms'.

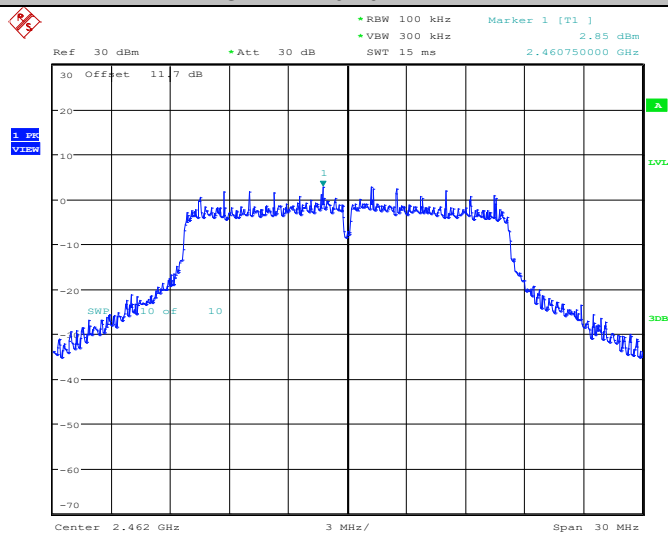
Date: 18.MAY.2026 11:30:14

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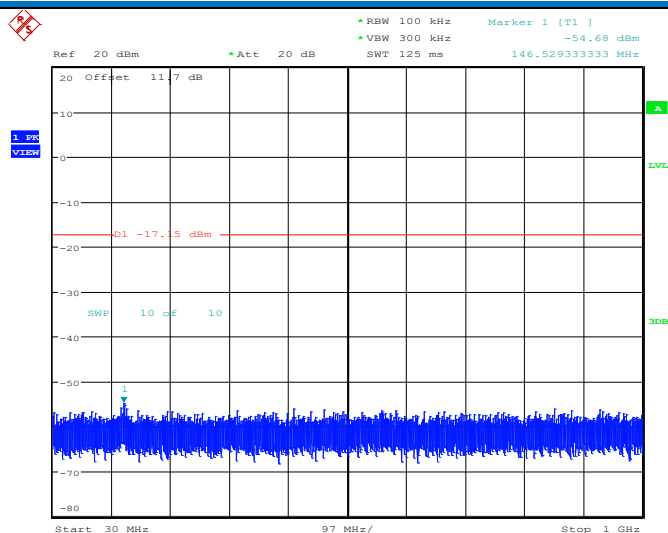
Date: 18.MAY.2026 11:30:37

11G-Ant1-2462-0~Reference-PASS



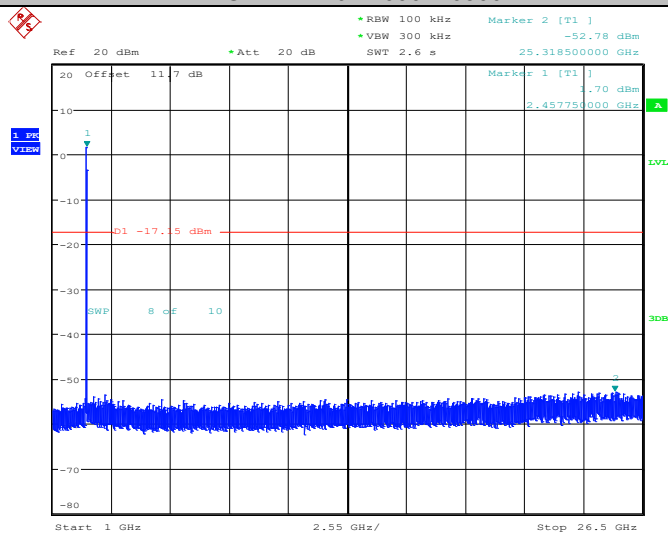
Date: 25.JUN.2026 18:55:03

11G-Ant1-2462-30~1000-PASS



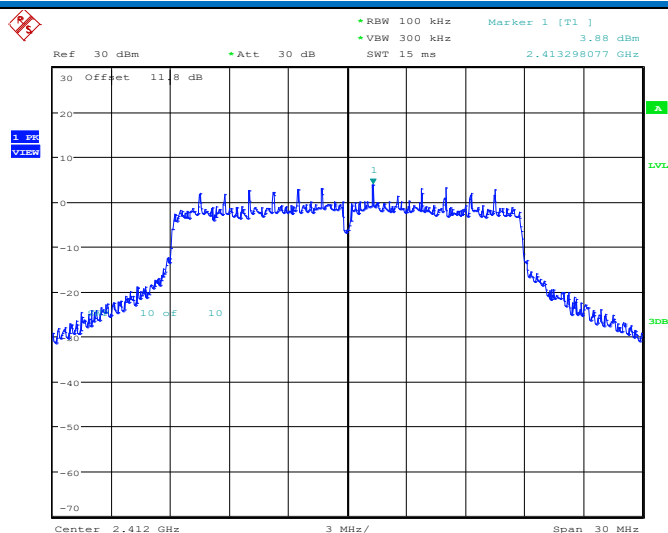
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11G-Ant1-2462-1000~26500-PASS



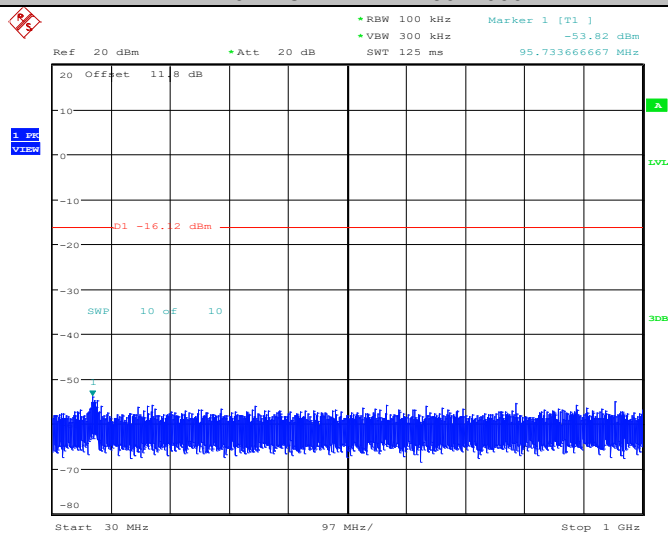
Date: 25.JUN.2026 18:55:34

11N20SISO-Ant1-2412-0~Reference-PASS



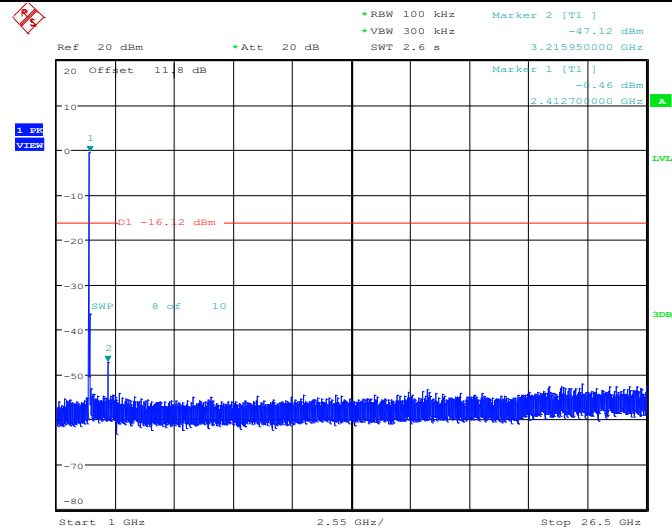
Date: 25.JUN.2026 19:25:57

11N20SISO-Ant1-2412-30~1000-PASS



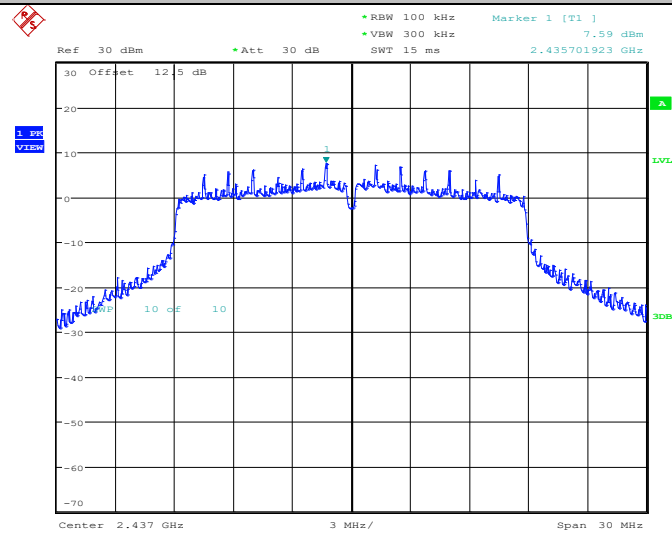
Date: 25.JUN.2026 19:26:06

11N20SISO-Ant1-2412-1000~26500-PASS



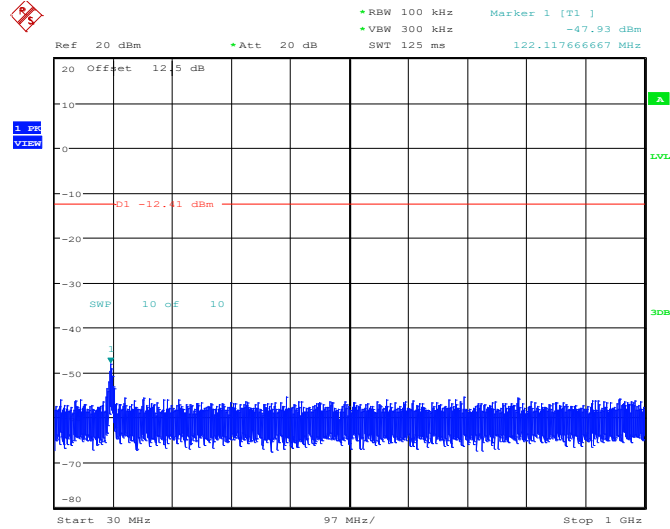
Date: 25.JUN.2026 19:26:29

11N20SISO-Ant1-2437-0~Reference-PASS



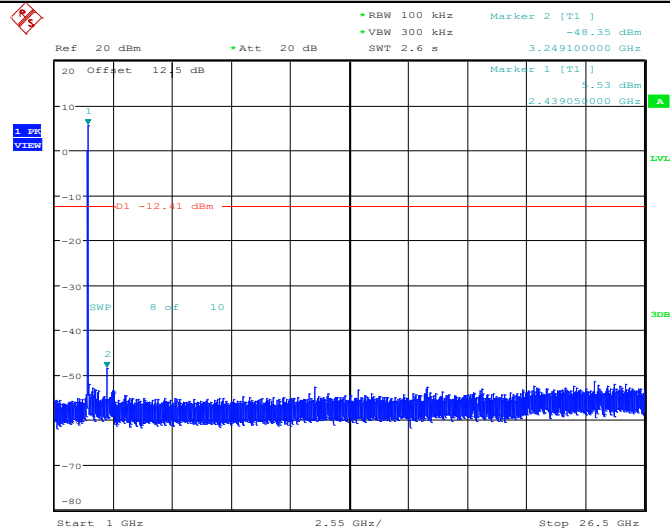
Date: 18.MAY.2026 14:00:15

11N20SISO-Ant1-2437-30~1000-PASS



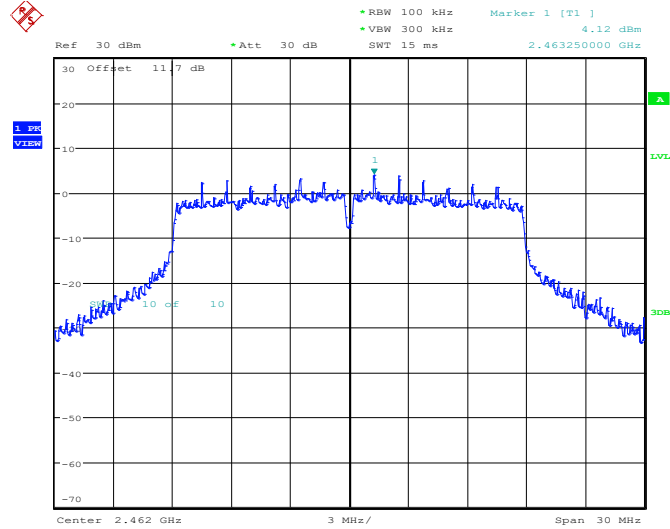
Date: 18.MAY.2026 14:00:24

11N20SISO-Ant1-2437-1000~26500-PASS



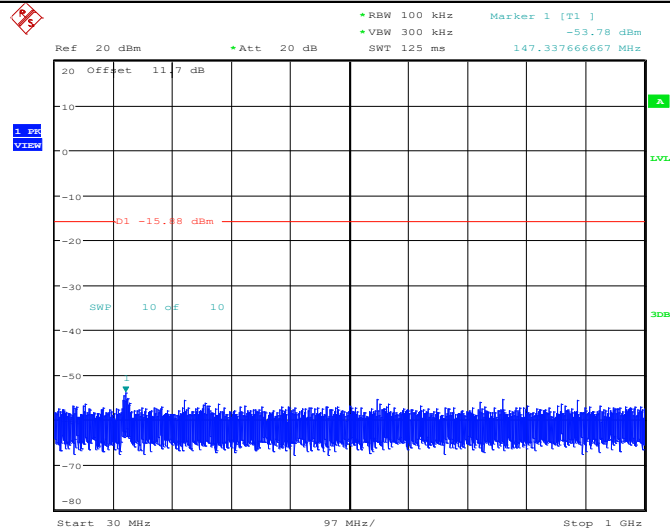
Date: 18.MAY.2026 14:00:47

11N20SISO-Ant1-2462-0~Reference-PASS



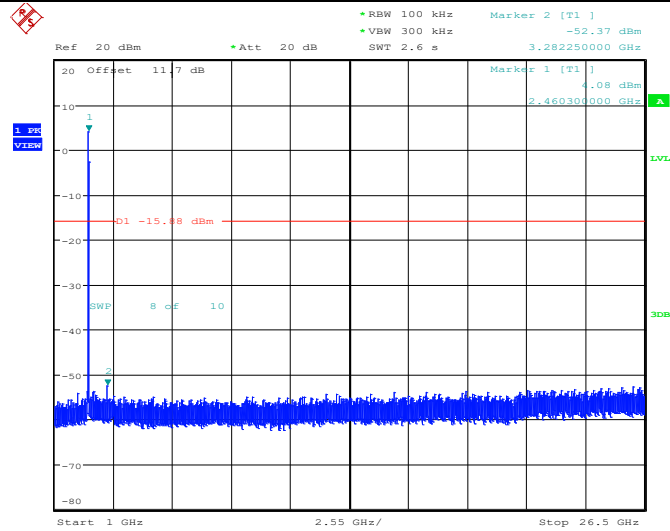
Date: 25.JUN.2026 19:39:07

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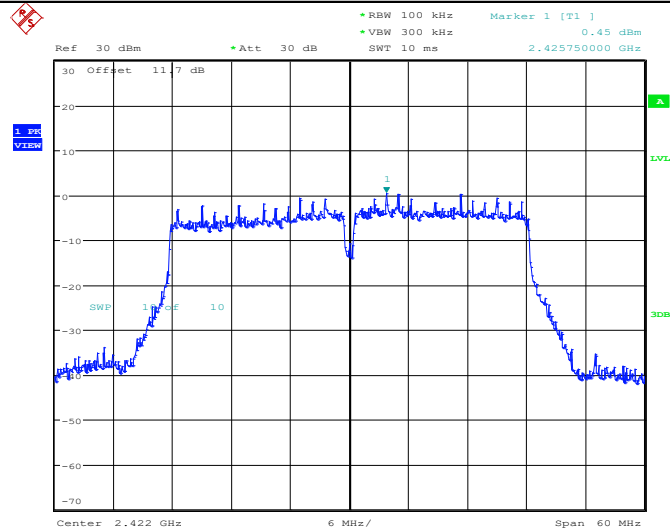
Date: 25.JUN.2026 19:39:16

11N20SISO-Ant1-2462-1000~26500-PASS



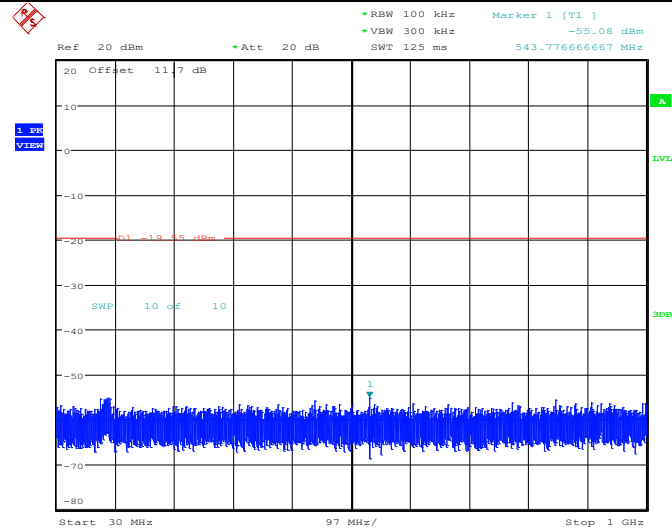
Date: 25.JUN.2026 19:39:39

11N40SISO-Ant1-2422-0~Reference-PASS



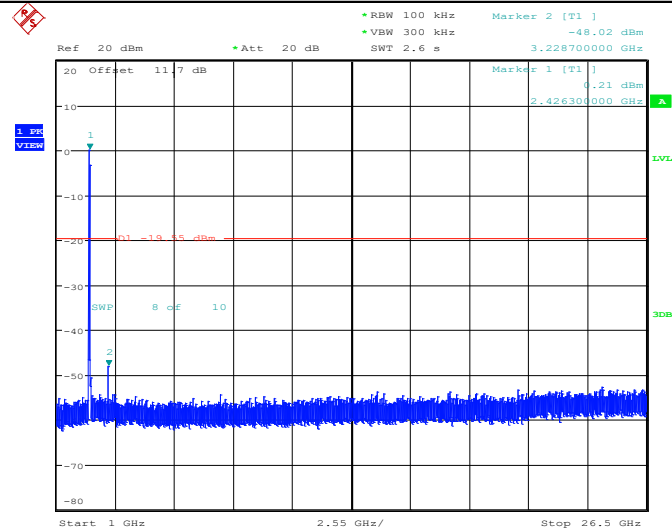
Date: 25.JUN.2026 20:00:09

11N40SISO-Ant1-2422-30~1000-PASS



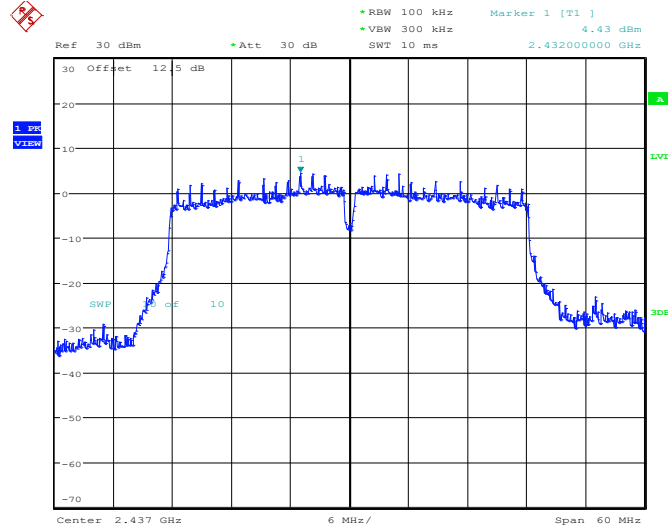
Date: 25.JUN.2026 20:00:18

11N40SISO-Ant1-2422-1000~26500-PASS



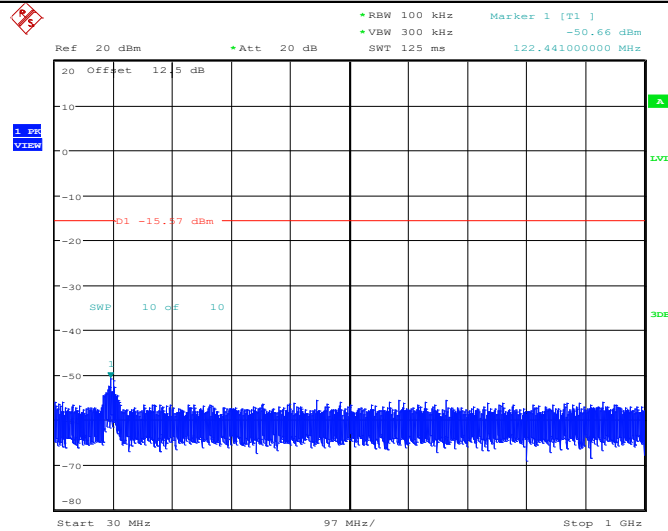
Date: 25.JUN.2026 20:00:41

11N40SISO-Ant1-2437-0~Reference-PASS



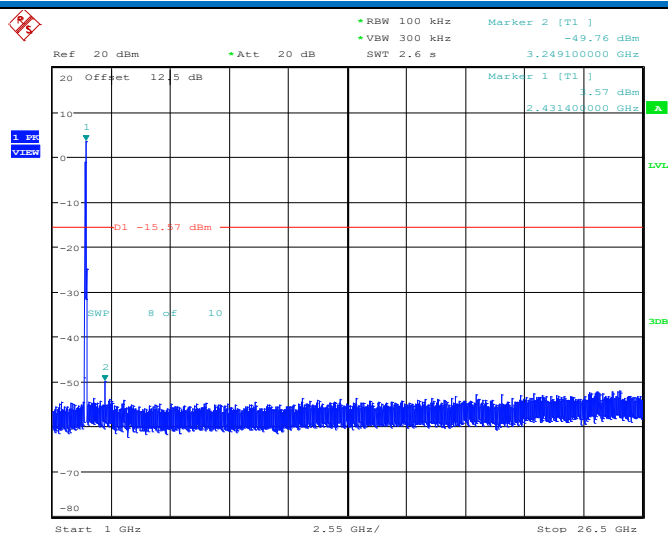
Date: 18.MAY.2026 15:10:00

11N40SISO-Ant1-2437-30~1000-PASS



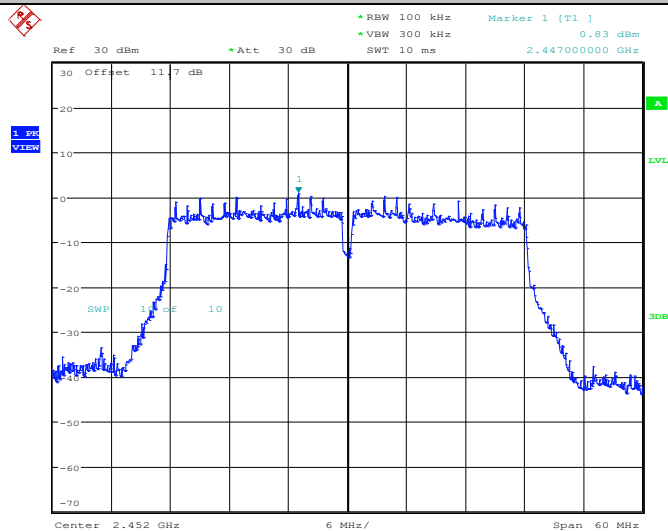
Date: 18.MAY.2026 15:10:09

11N40SISO-Ant1-2437-1000~26500-PASS



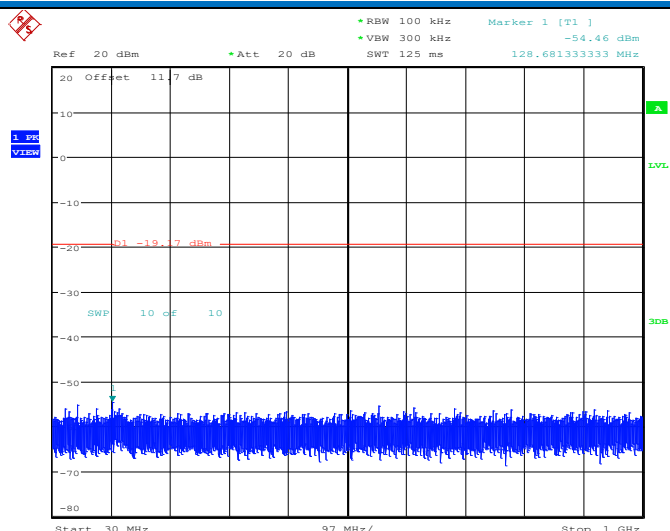
Date: 18.MAY.2026 15:10:32

11N40SISO-Ant1-2452-0~Reference-PASS



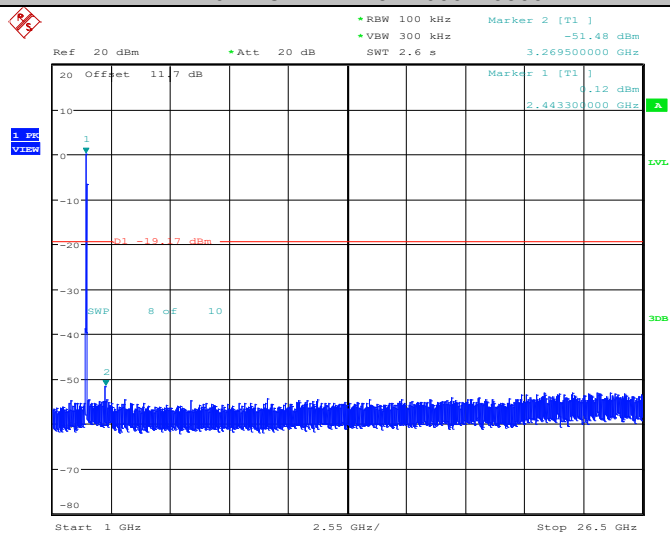
Date: 25.JUN.2026 20:24:53

11N40SISO-Ant1-2452-30~1000-PASS



Date: 25.JUN.2026 20:25:02

11N40SISO-Ant1-2452-1000~26500-PASS



Date: 25.JUN.2026 20:25:25

5.9 Radiated Spurious Emissions

Test Requirement:	47 CFR Part 15C Section 15.209 and 15.205				
Test Method:	ANSI C63.10-2020+Cor. 1-2023+C63.10a-2024 + Errata to C63.10a-2024				
Test Site:	Measurement Distance: 3m (Semi-Anechoic Chamber)				
Receiver Setup:	Frequency	Detector	RBW	VBW	Remark
	0.009MHz-0.090MHz	Peak	10kHz	30kHz	Peak
	0.009MHz-0.090MHz	Average	10kHz	30kHz	Average
	0.090MHz-0.110MHz	Quasi-peak	10kHz	30kHz	Quasi-peak
	0.110MHz-0.490MHz	Peak	10kHz	30kHz	Peak
	0.110MHz-0.490MHz	Average	10kHz	30kHz	Average
	0.490MHz -30MHz	Quasi-peak	10kHz	30kHz	Quasi-peak
	30MHz-1GHz	Quasi-peak	100 kHz	300kHz	Quasi-peak
	Above 1GHz	Peak	1MHz	3MHz	Peak
		Peak	1MHz	10Hz	Average
Limit:	Frequency	Field strength (microvolt/meter)	Limit (dBuV/m)	Remark	Measurement distance (m)
	0.009MHz-0.490MHz	2400/F(kHz)	-	-	300
	0.490MHz-1.705MHz	24000/F(kHz)	-	-	30
	1.705MHz-30MHz	30	-	-	30
	30MHz-88MHz	100	40.0	Quasi-peak	3
	88MHz-216MHz	150	43.5	Quasi-peak	3
	216MHz-960MHz	200	46.0	Quasi-peak	3
	960MHz-1GHz	500	54.0	Quasi-peak	3
	Above 1GHz	500	54.0	Average	3
	Note: 15.35(b), Unless otherwise specified, the limit on peak radio frequency emissions is 20dB above the maximum permitted average emission limit applicable to the equipment under test. This peak limit applies to the total peak emission level radiated by the device.				

Test Setup:

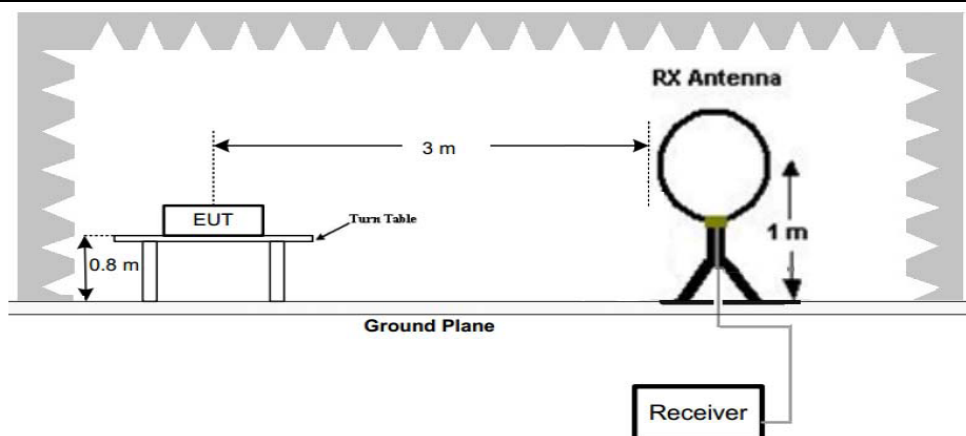


Figure 1. Below 30MHz

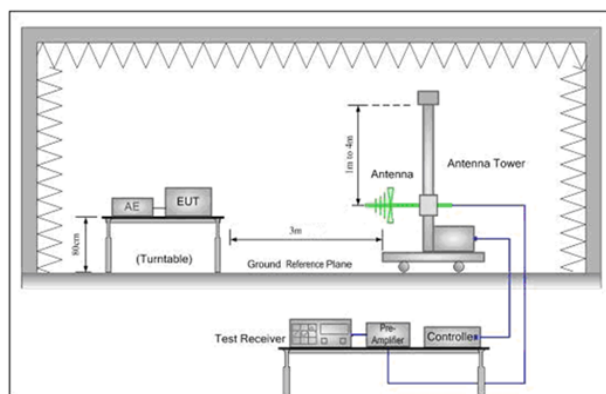


Figure 2. 30MHz to 1GHz

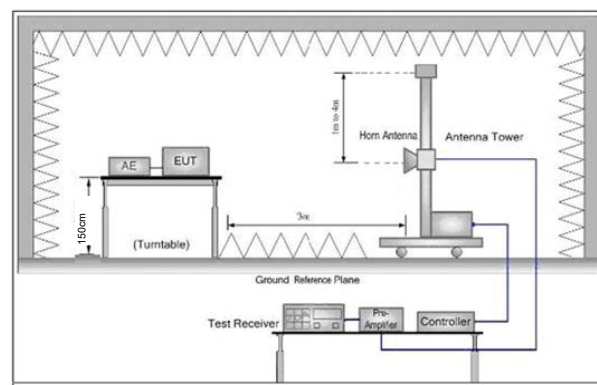


Figure 3. Above 1 GHz

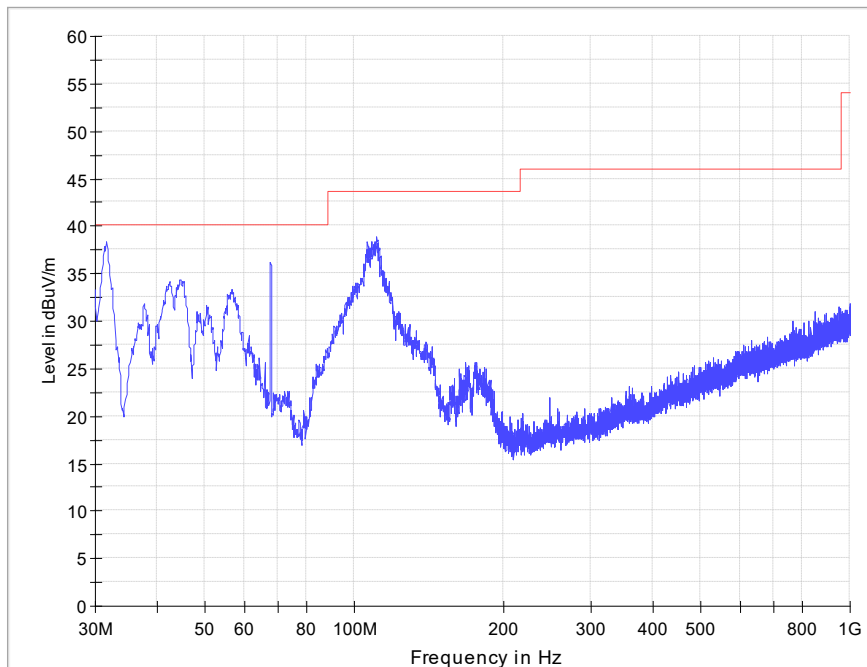
Test Procedure:

- a. 1) Below 1G: The EUT was placed on the top of a rotating table 0.8 meters above the ground at a 3 meter semi-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation.
2) Above 1G: The EUT was placed on the top of a rotating table 1.5 meters above the ground at a 3 meter semi-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation.
Note: For the radiated emission test above 1GHz:
Place the measurement antenna away from each area of the EUT determined to be a source of emissions at the specified measurement distance, while keeping the measurement antenna aimed at the source of emissions at each frequency of significant emissions, with polarization oriented for maximum response. The measurement antenna may have to be higher or lower than the EUT, depending on the radiation pattern of the emission and staying aimed at the emission source for receiving the maximum signal. The final measurement antenna elevation shall be that which maximizes the emissions. The measurement antenna elevation for maximum emissions shall be restricted to a range of heights of from 1 m to 4 m above the ground or reference ground plane.
- b. The EUT was set 3 meters away from the interference-receiving antenna, which was mounted on the top of a variable-height antenna tower.
- c. The antenna height is varied from one meter to four meters above the ground to determine the maximum value of the field strength. 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 from 1 meter to 4 meters (for the test frequency of below 30MHz, the antenna was tuned to heights 1 meter) and the rotatable table was turned from 0 degrees to 360 degrees to find the maximum reading. e. The test-receiver system was set to Peak Detect Function and Specified Bandwidth with Maximum Hold Mode. f. If the emission level of the EUT in peak mode was 10dB lower than the limit specified, then testing could be stopped and the peak values of the EUT would be reported. Otherwise the emissions that did not have 10dB margin would be re-tested one by one using peak, quasi-peak or average method as specified and then reported in a data sheet. g. Test the EUT in the lowest channel, the middle channel, the Highest channel. h. The radiation measurements are performed in X, Y, Z axis positioning for Transmitting mode, And found the X axis positioning which it is worse case . i. Repeat above procedures until all frequencies measured was complete.
Exploratory Test Mode:	Transmitting with all kind of modulations, data rates at lowest, middle and highest channel.
Final Test Mode:	Only the worst case is recorded in the report.
Test Results:	Pass

5.9.1 Radiated emission below 1GHz

30MHz~1GHz
Vertical



Frequency (MHz)	Cable Loss +preamp (dB)	Antenna Factor (dB)	Reading (dBμV/m)	Level (dBμV/m)	Polarity (Horizontal/Vertical)	Limit (dBμV/m)	Margin (dB)	Note
31.552	0.6	12.3	22.8	35.7	Vertical	40	4.3	QP
37.566	0.6	12.3	16.8	29.7	Vertical	40	10.3	QP
42.319	0.8	13.6	18.2	32.6	Vertical	40	7.4	QP
56.481	0.9	13.0	17.0	30.9	Vertical	40	9.1	QP
67.733	0.9	10.7	13.3	24.9	Vertical	40	15.1	QP
110.955	1.1	12.3	20.7	34.1	Vertical	43.5	9.4	QP

Remark:

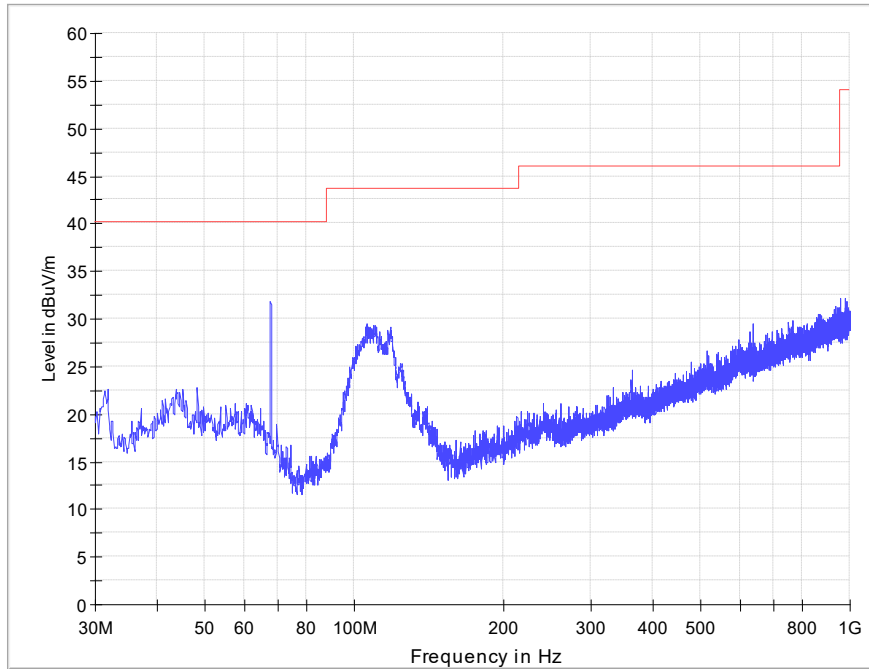
The field strength is calculated by adding the Antenna Factor, Cable Factor & Preamplifier. The basic equation with a sample calculation is as follows:

Factor= Antenna Factor + Cable Factor – Preamplifier Factor,

Level = Read Level + Factor,

Over Limit=Level-Limit Line.

Horizontal



Frequency (MHz)	Cable Loss +preamp (dB)	Antenna Factor (dB)	Reading (dBμV/m)	Level (dBμV/m)	Polarity (Horizontal/Vertical)	Limit (dBμV/m)	Margin (dB)	Note
31.358	0.6	12.3	8.7	21.6	Horizontal	40.0	18.4	QP
48.139	0.8	13.6	7.6	22	Horizontal	40.0	18.0	QP
67.733	0.9	10.7	11.0	22.6	Horizontal	40.0	17.4	QP
106.048	1.2	13.2	12.3	26.7	Horizontal	43.5	16.8	QP
118.076	1.3	12.3	12.4	26	Horizontal	43.5	17.5	QP
125.254	1.2	10.5	10.2	21.9	Horizontal	43.5	21.6	QP

Remark:

The field strength is calculated by adding the Antenna Factor, Cable Factor & Preamplifier. The basic equation with a sample calculation is as follows:

Factor= Antenna Factor + Cable Factor – Preamplifier Factor,

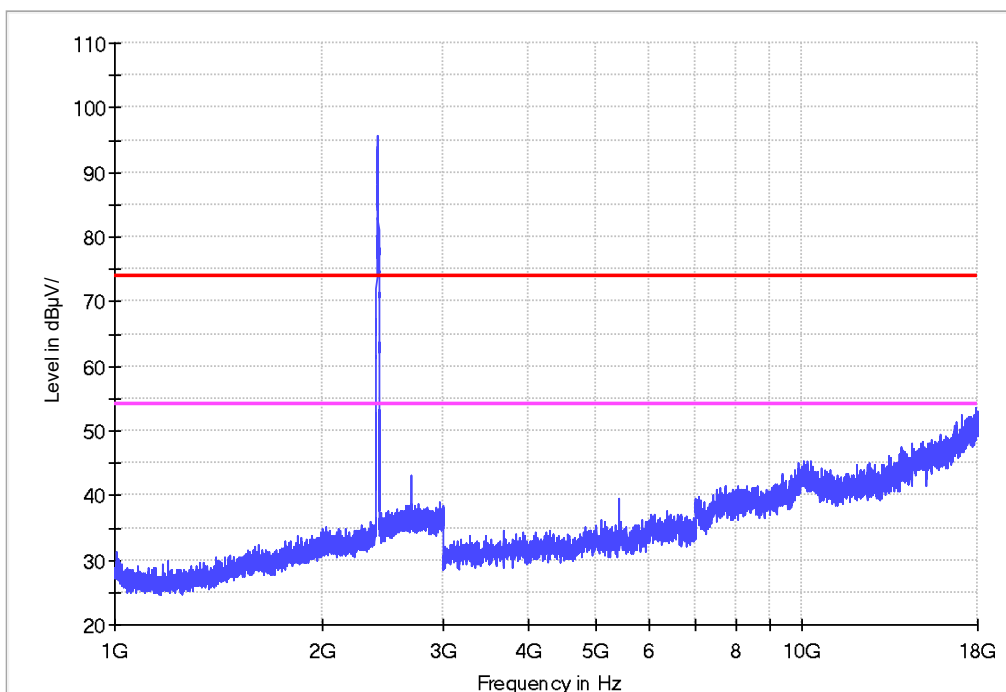
Level = Read Level + Factor,

Over Limit=Level-Limit Line.

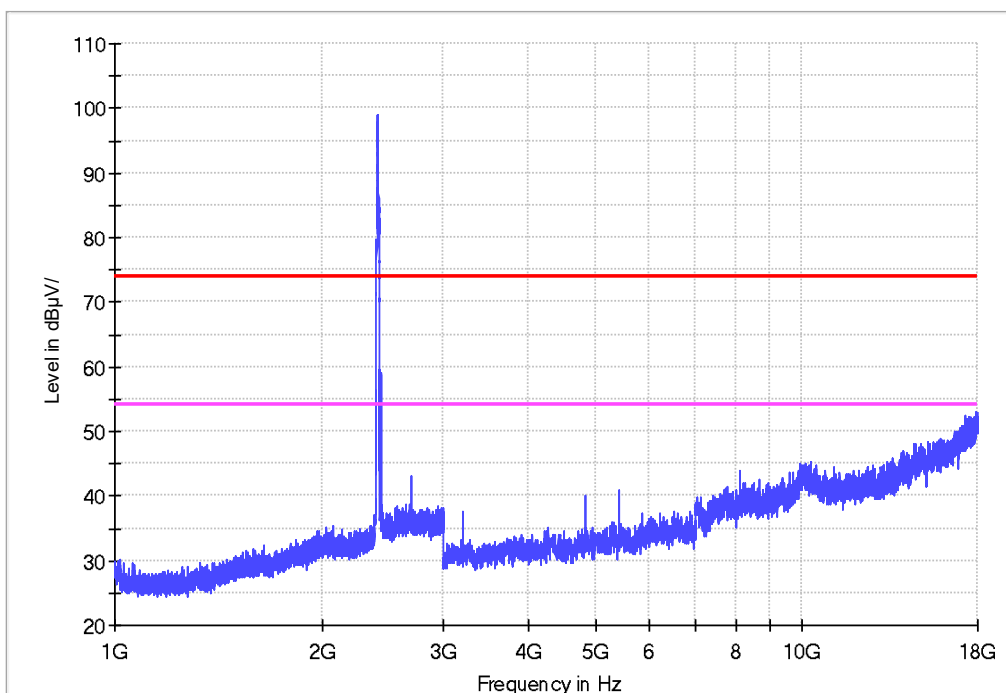
1-18G

802.11b CH1

Horizontal



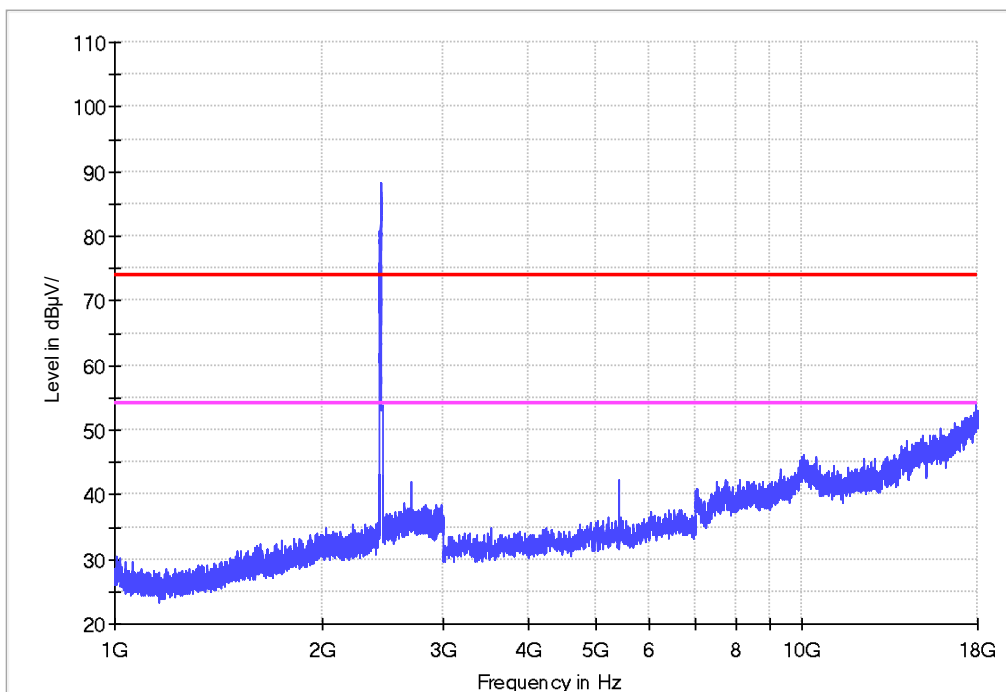
Vertical



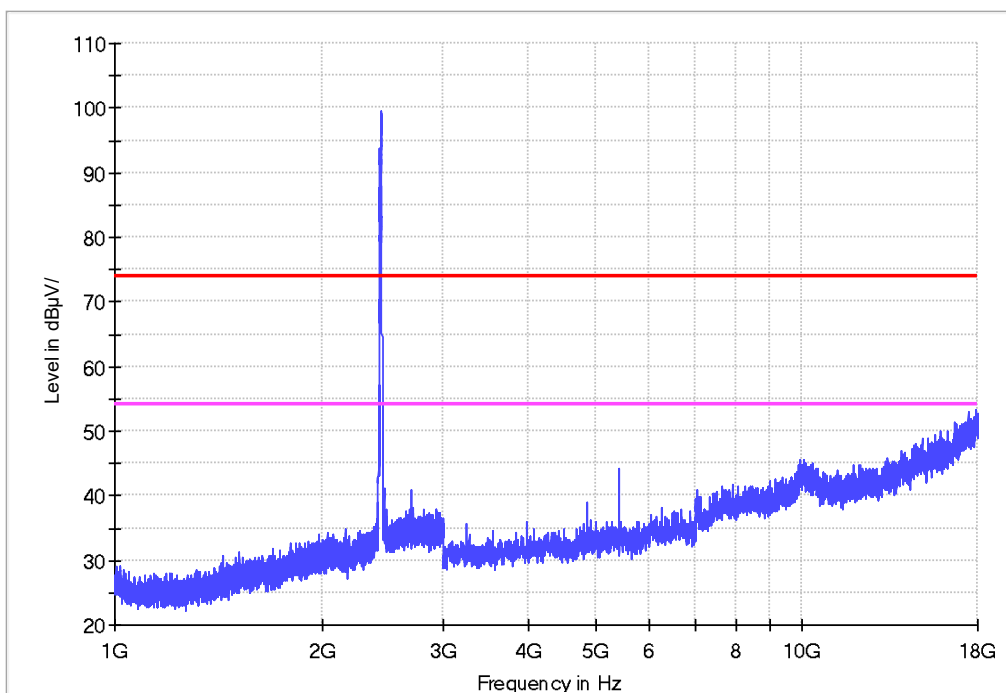
1-18G

802.11b CH6

Horizontal



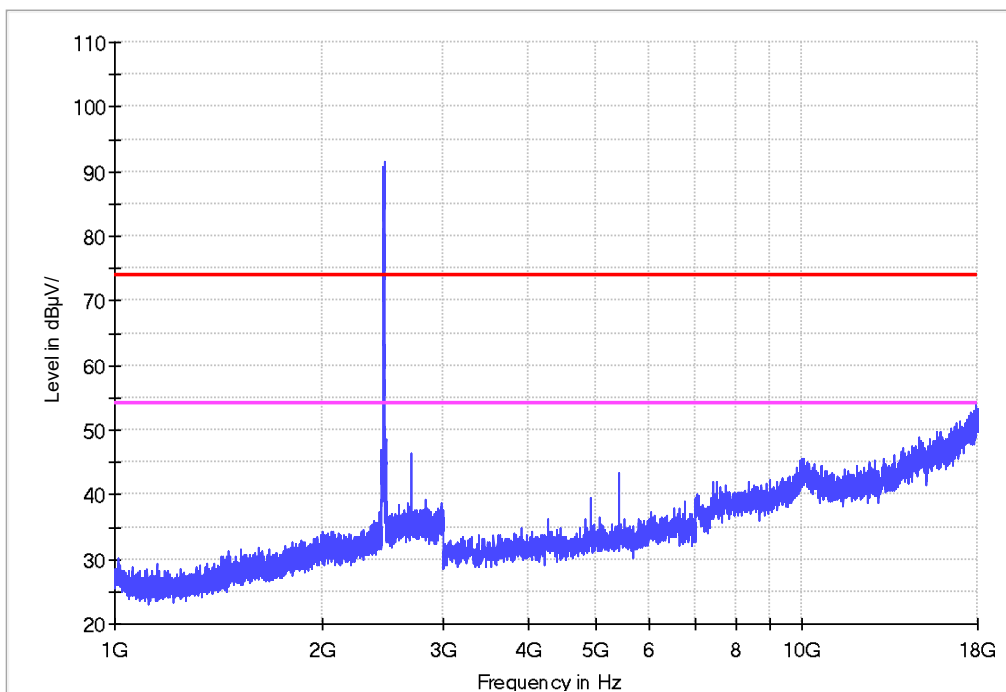
Vertical



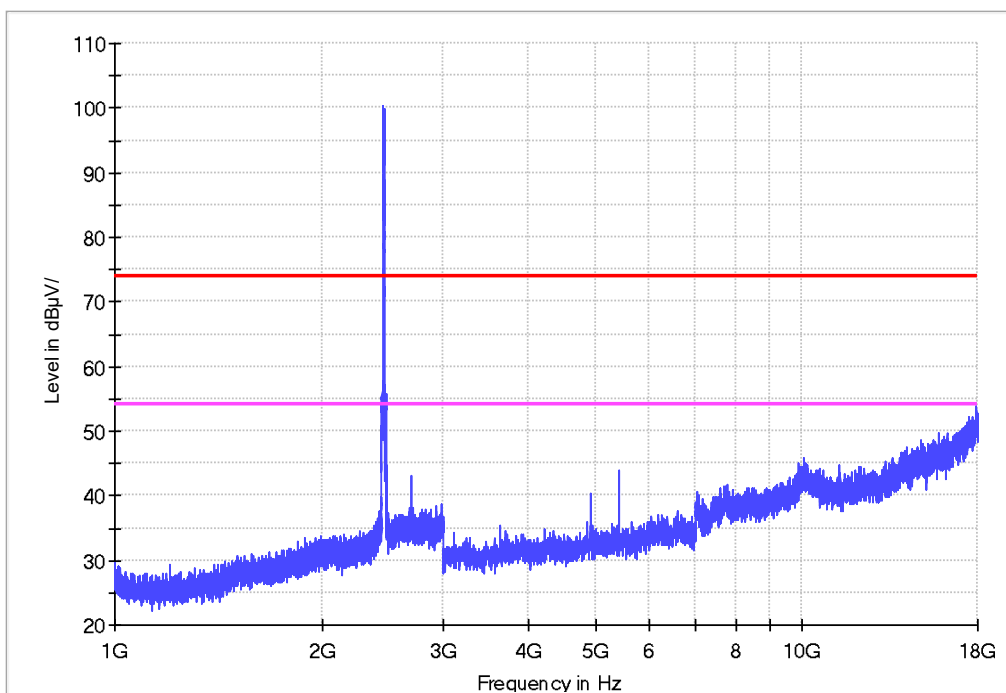
1-18G

802.11b CH11

Horizontal



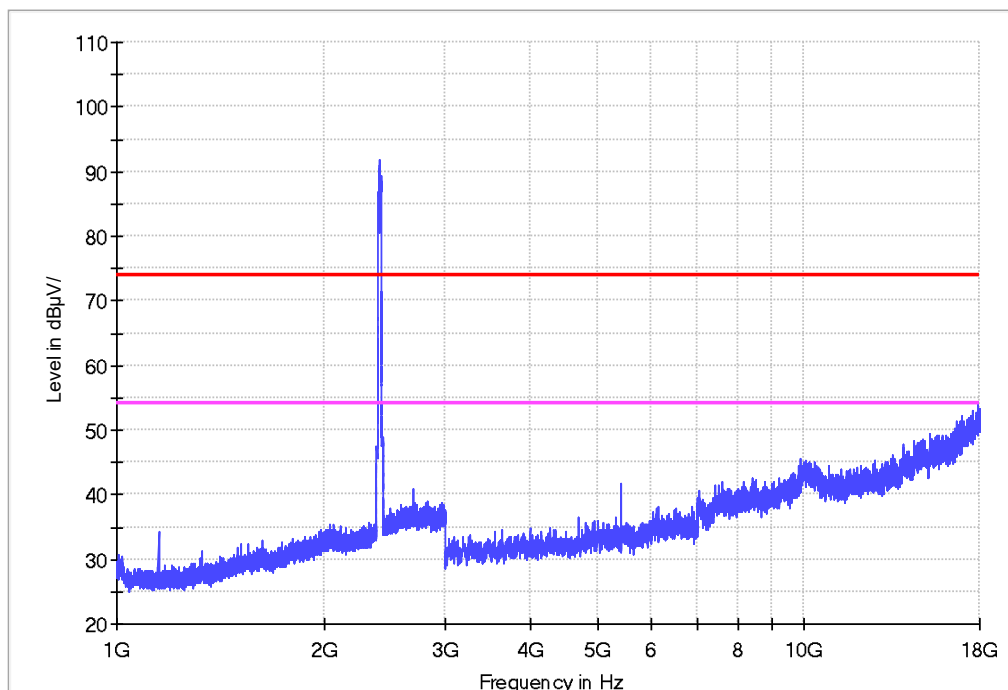
Vertical



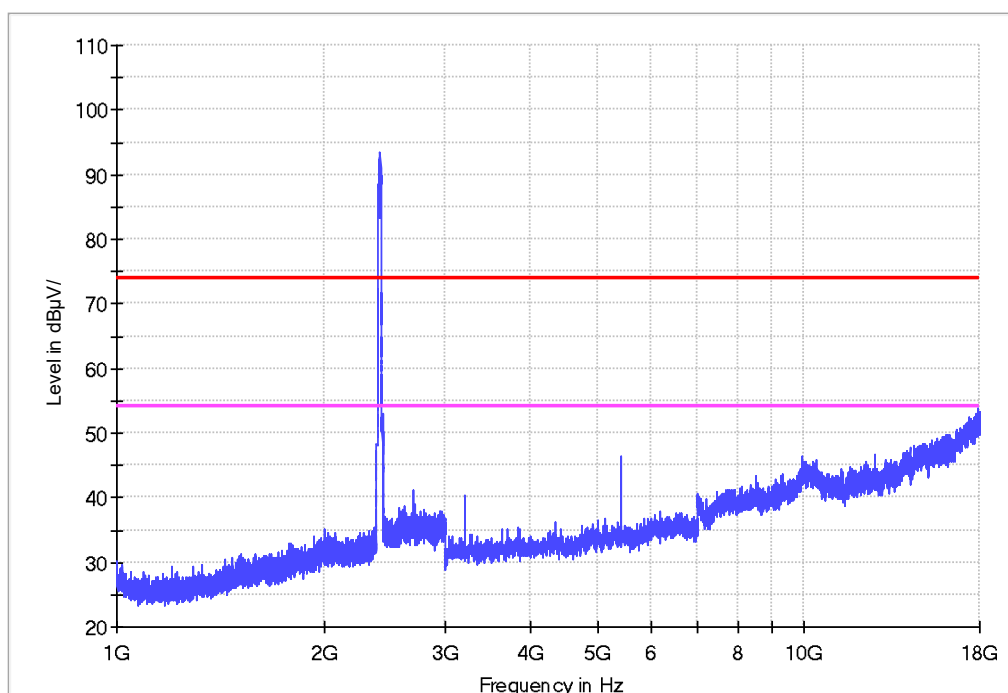
1-18G

802.11g CH1

Horizontal



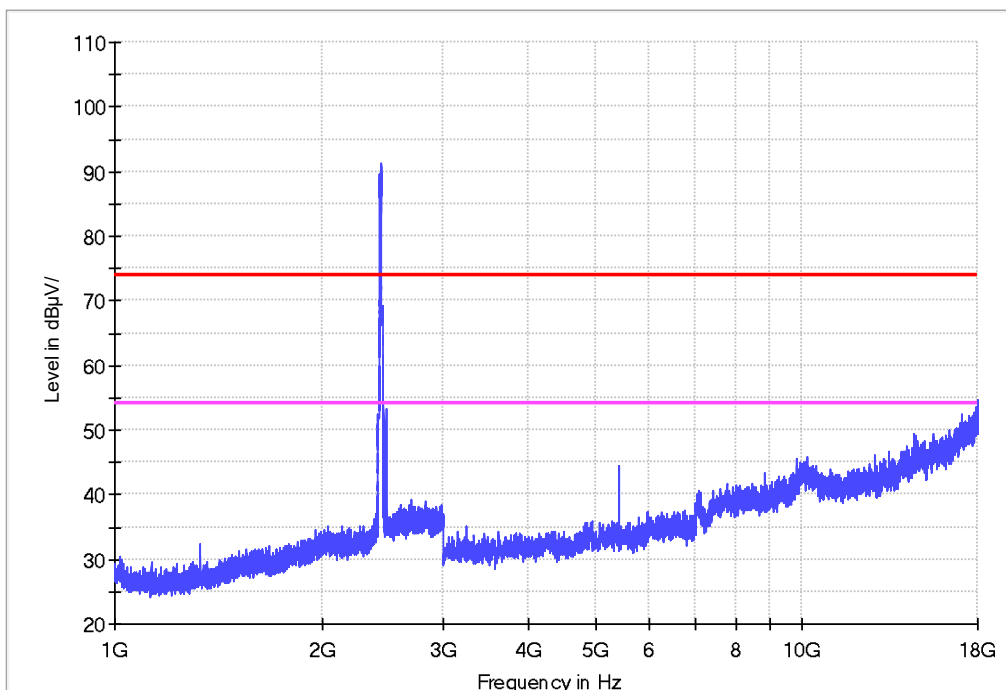
Vertical



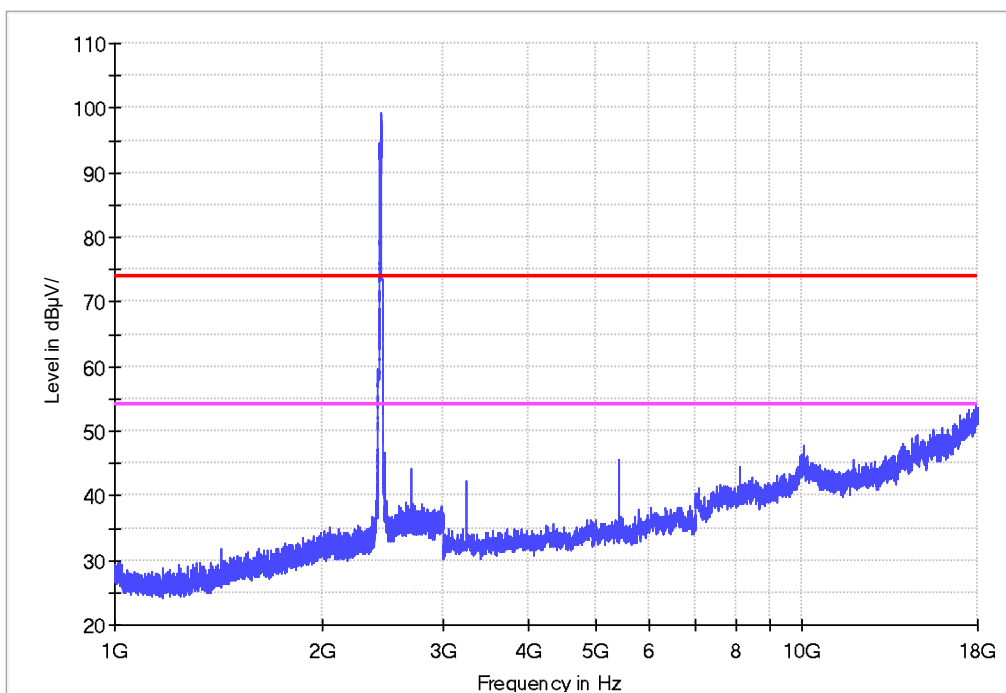
1-18G

802.11g CH6

Horizontal



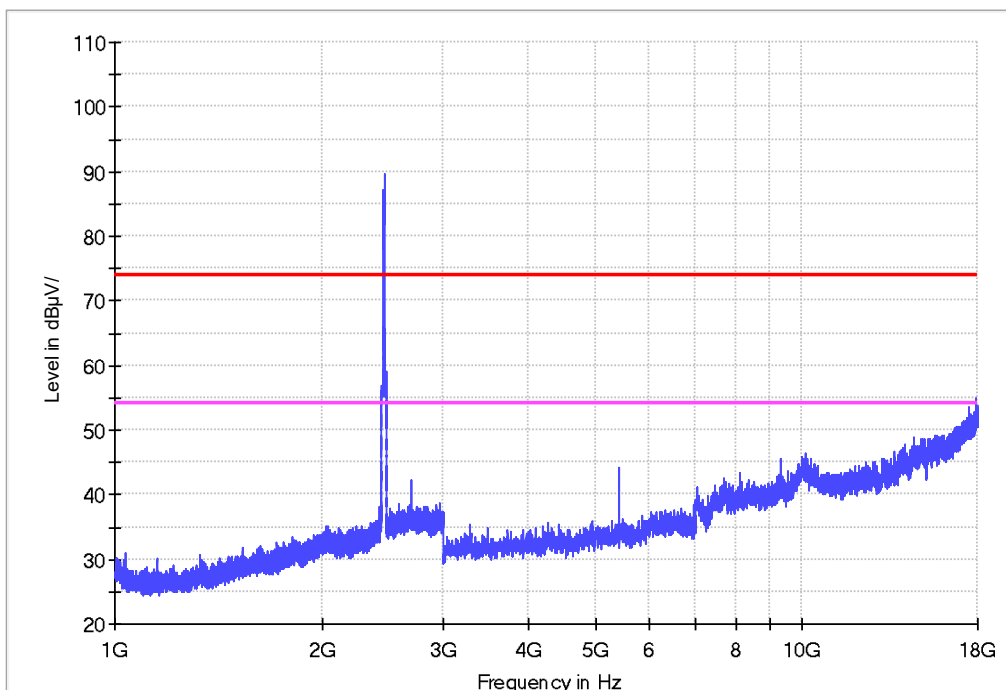
Vertical



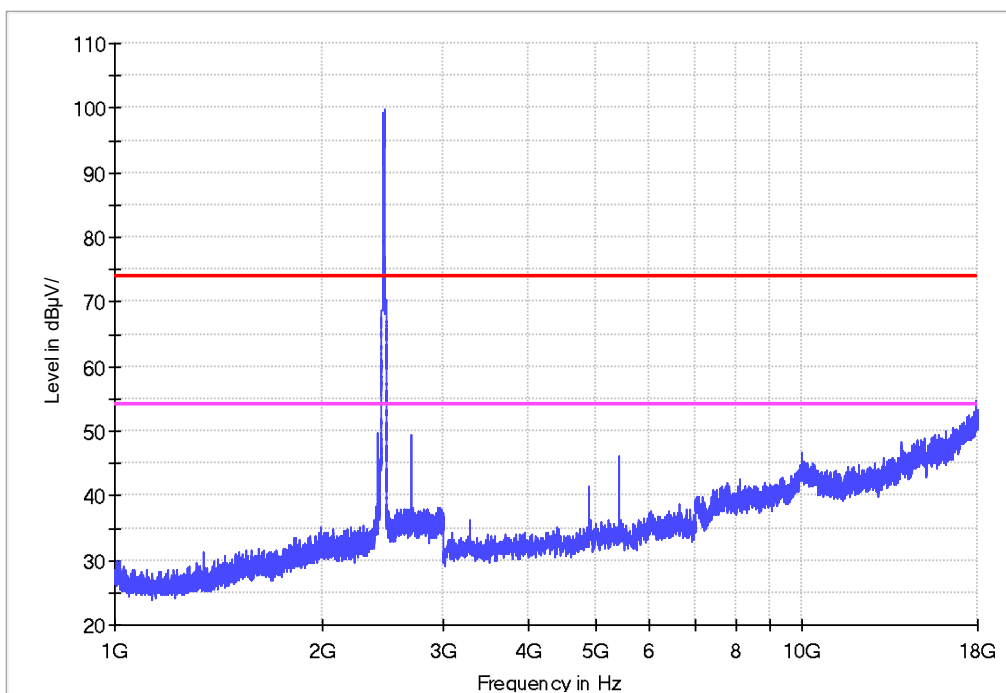
1-18G

802.11g CH11

Horizontal



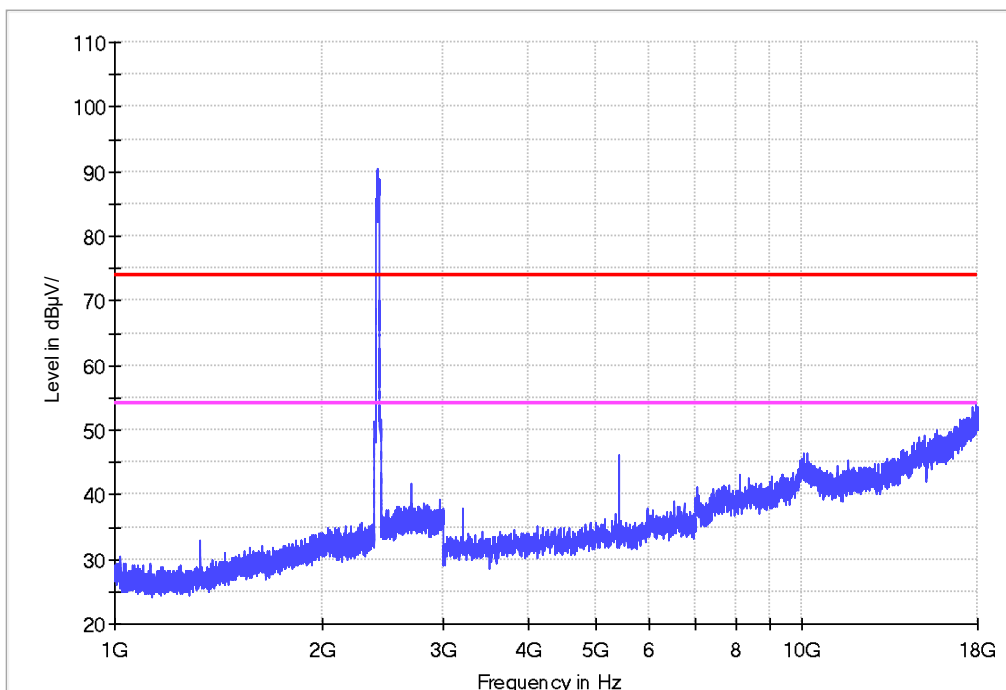
Vertical



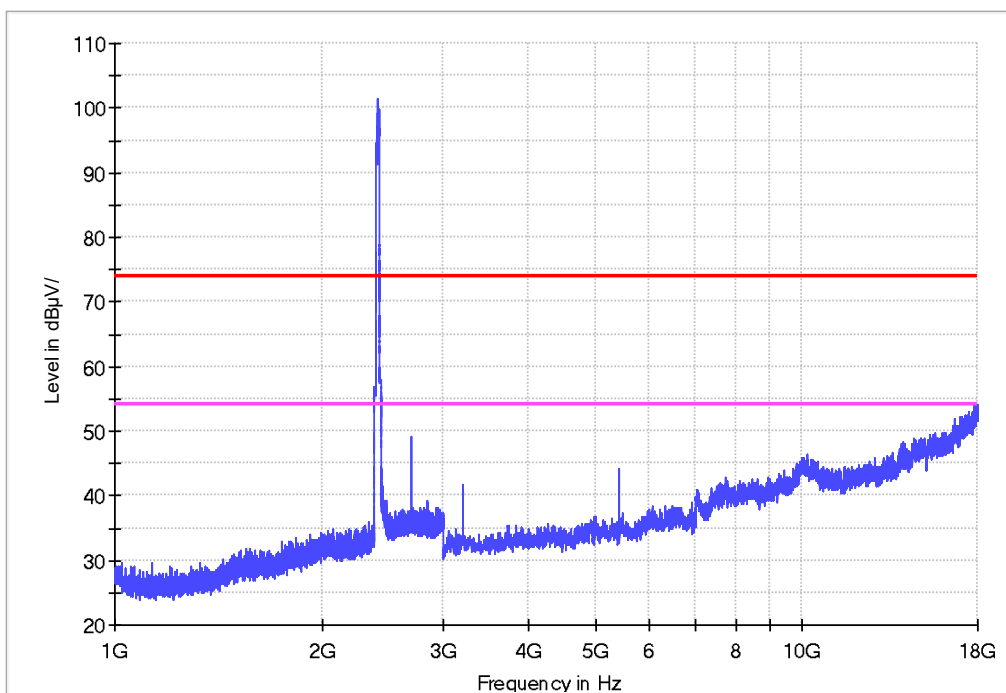
1-18G

802.11n-HT20 CH1

Horizontal



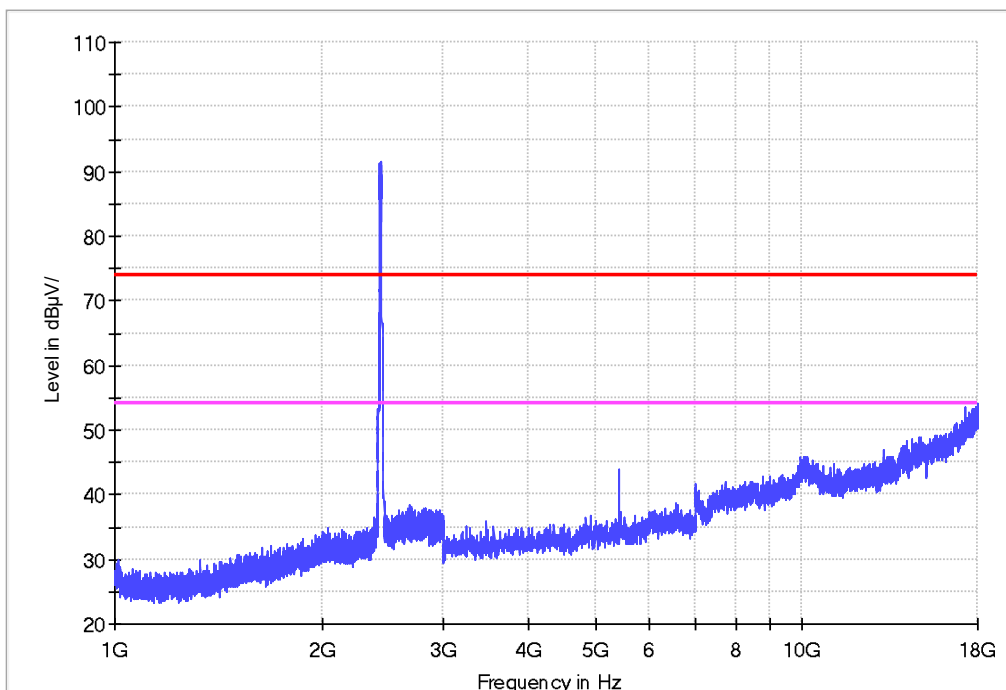
Vertical



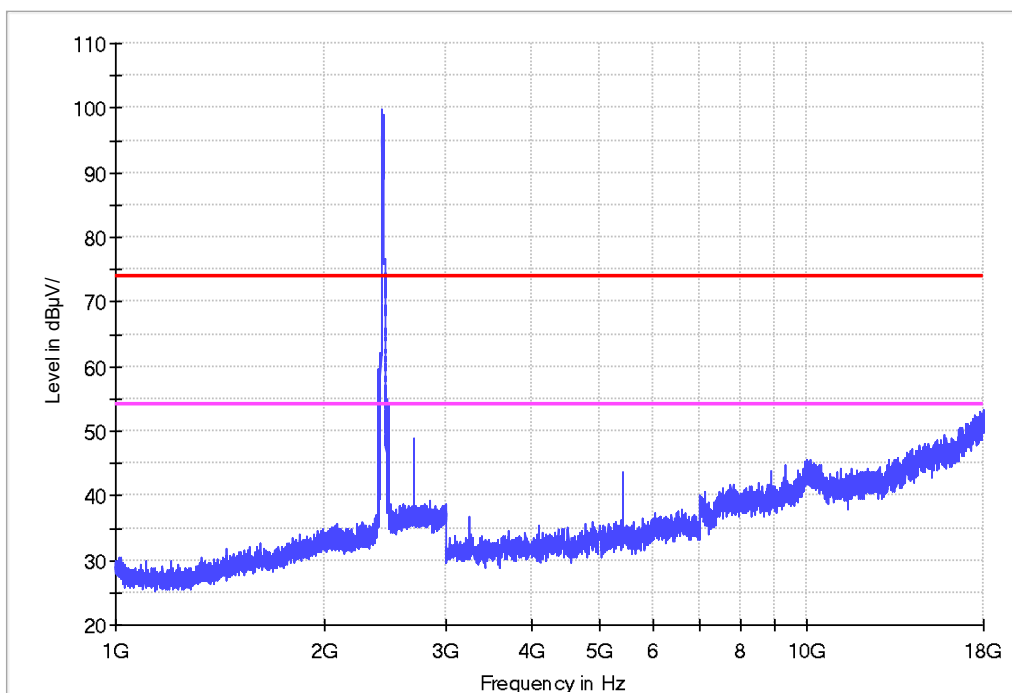
1-18G

802.11n-HT20 CH6

Horizontal



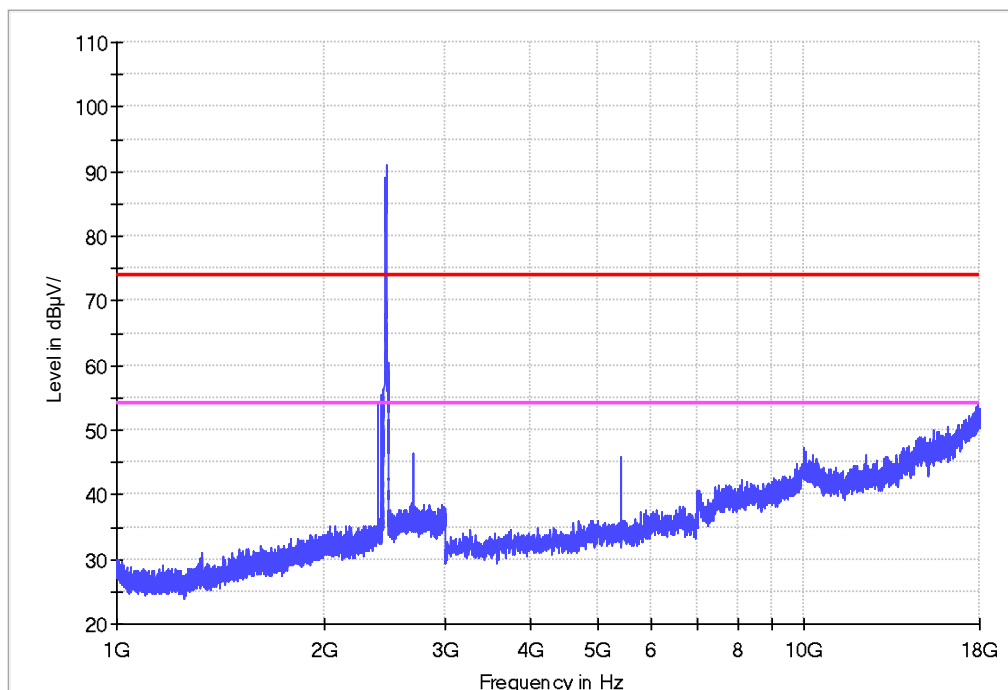
Vertical



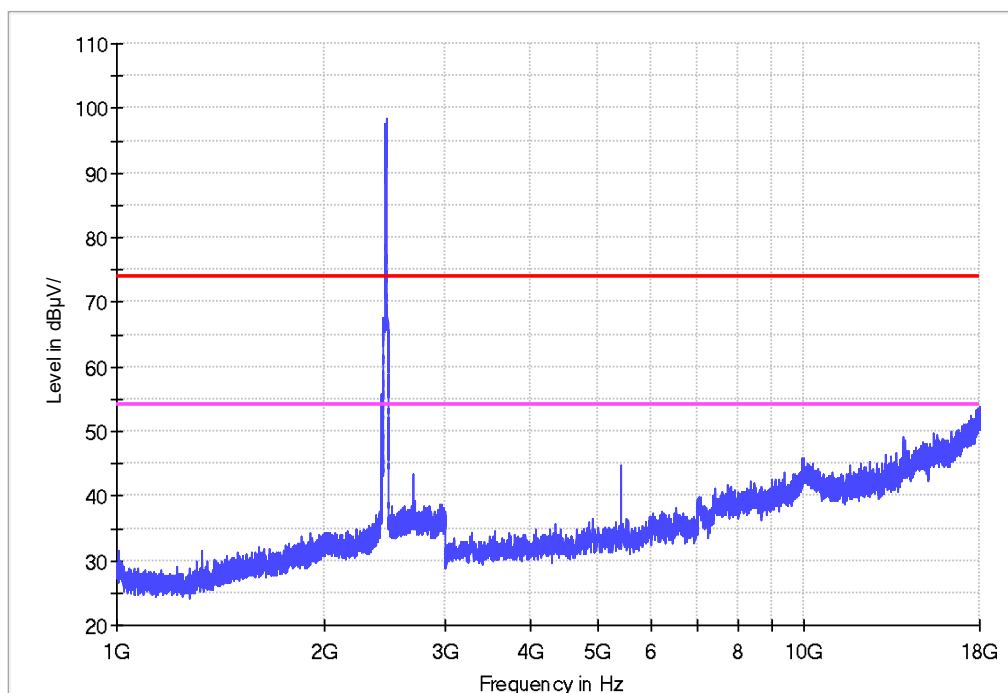
1-18G

802.11n-HT20 CH11

Horizontal



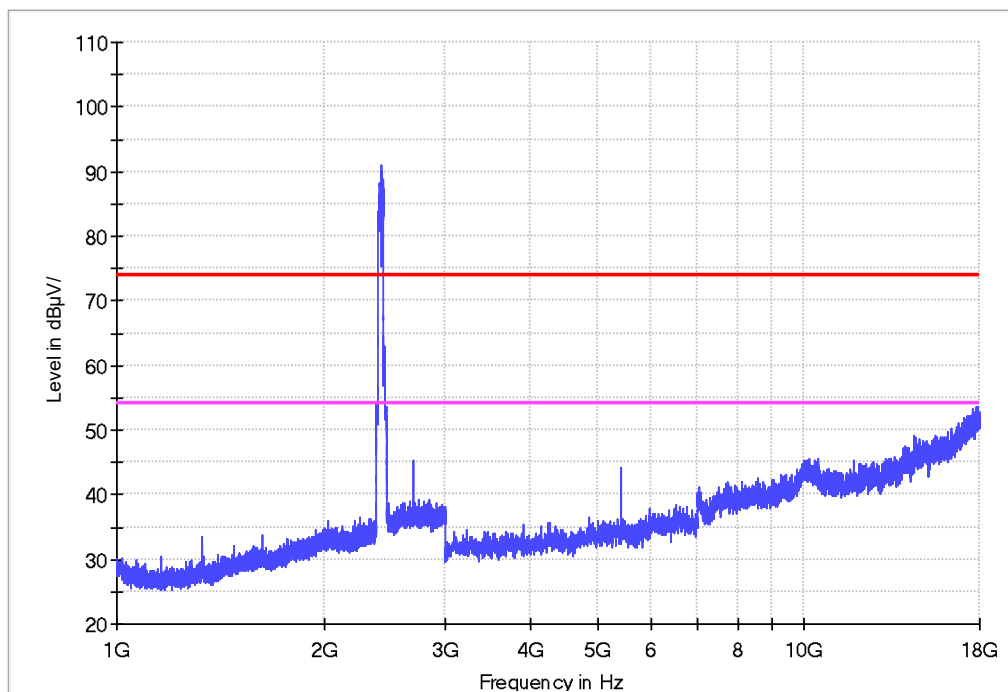
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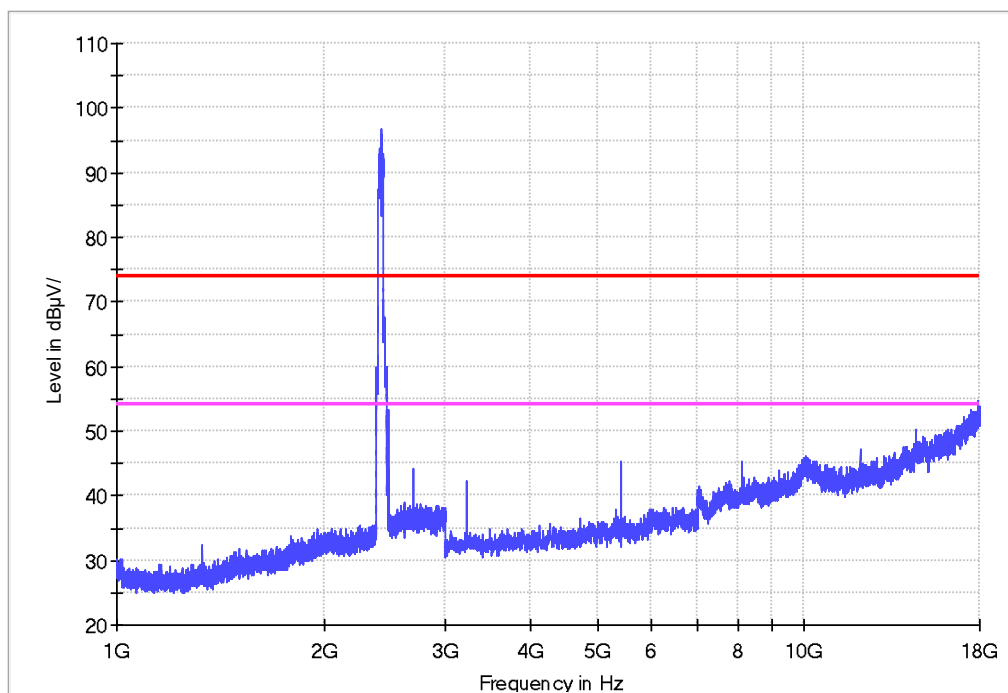
1-18G

802.11n-HT40 CH3

Horizontal



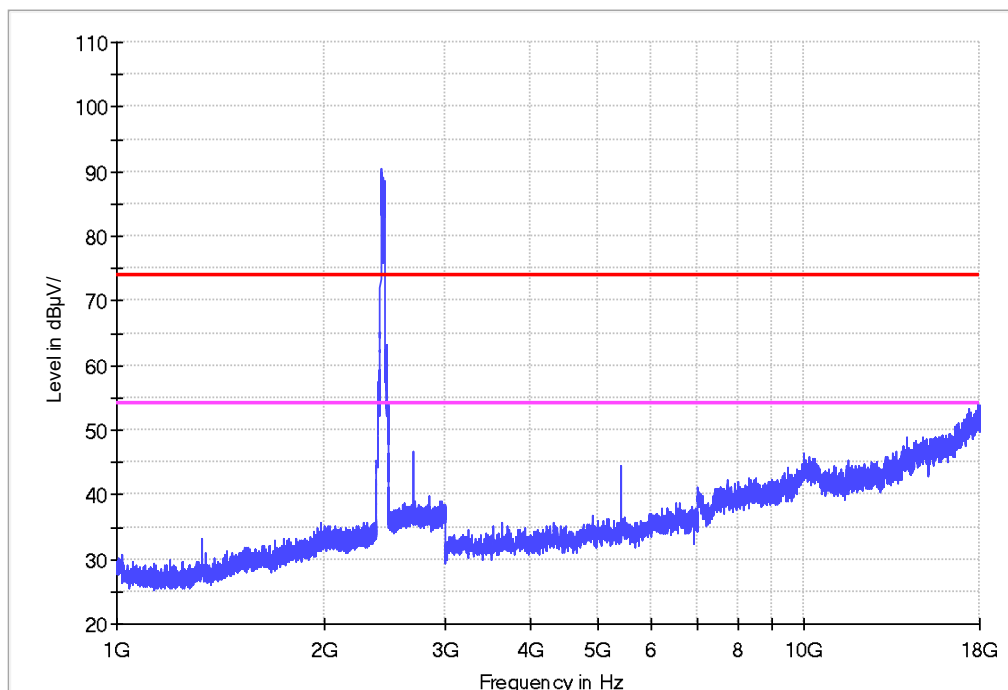
Vertical



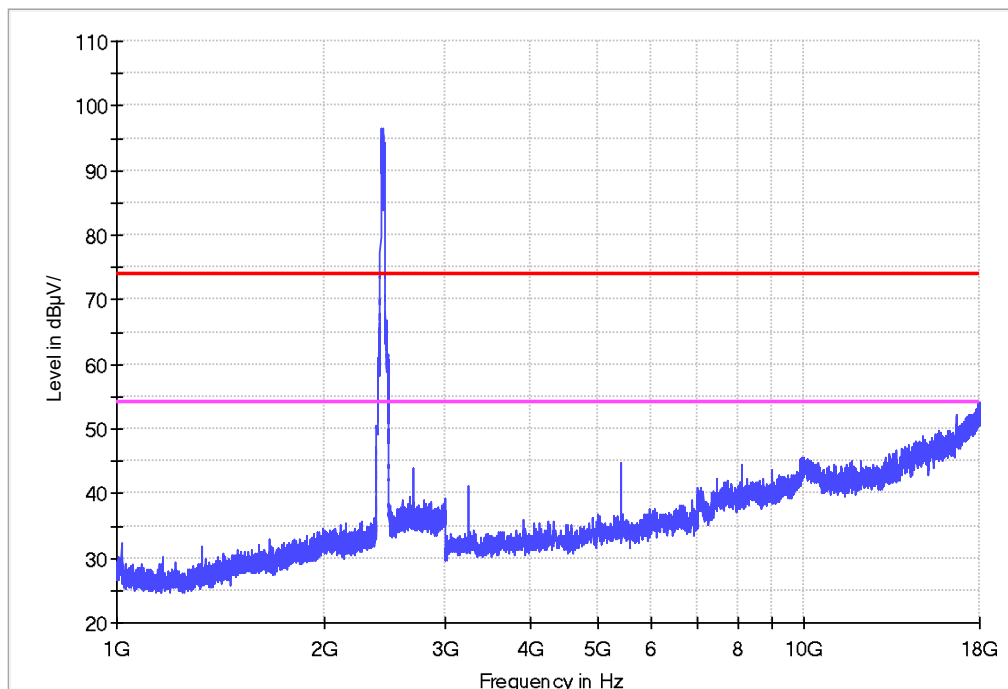
1-18G

802.11n-HT40 CH6

Horizontal



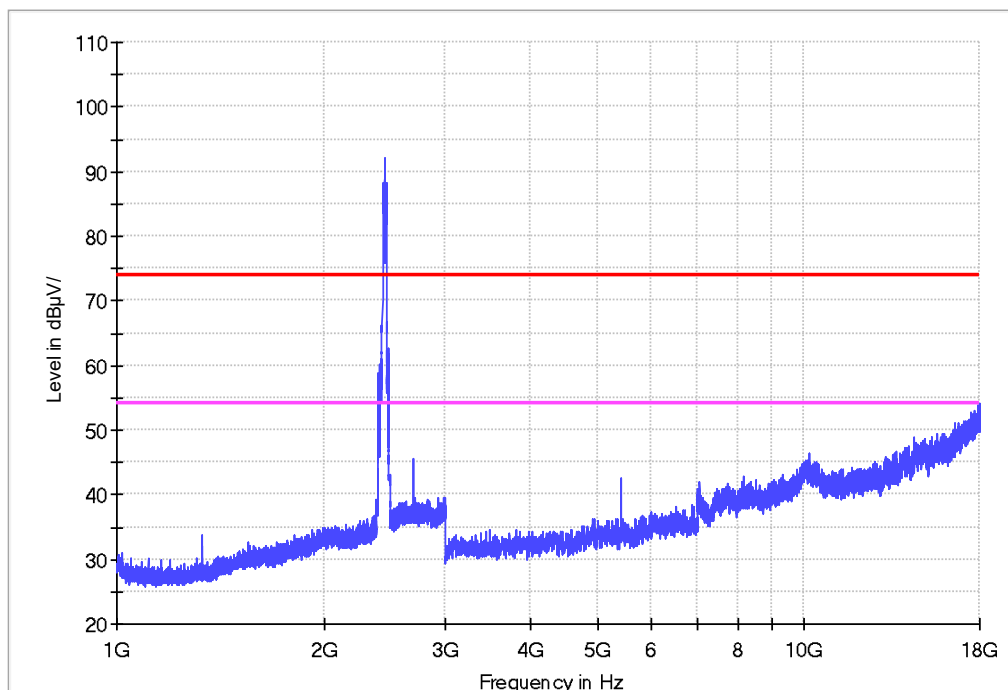
Vertical



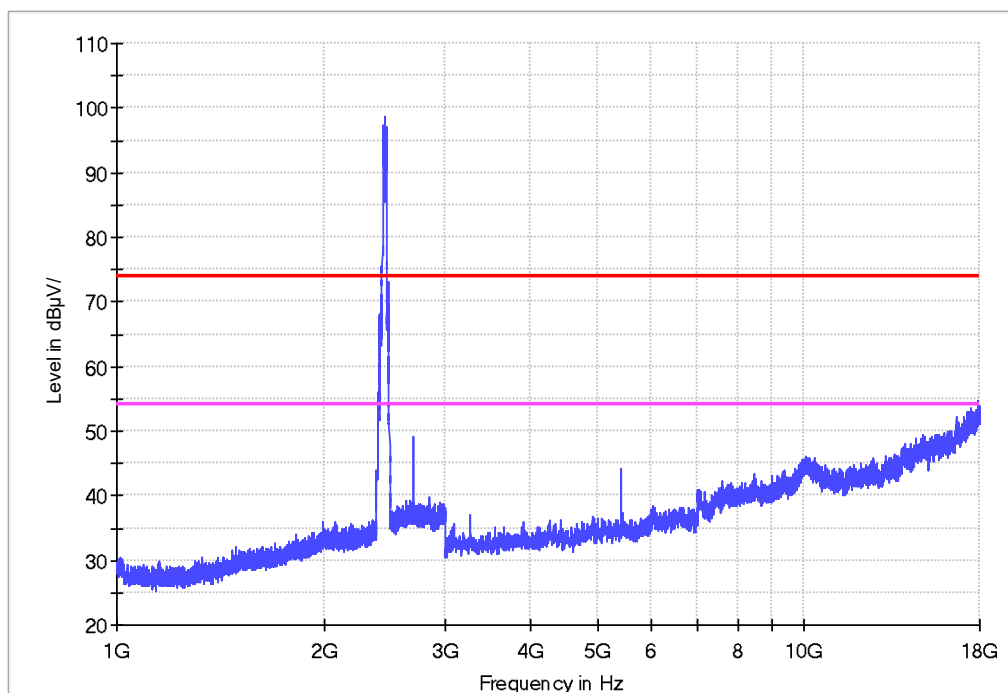
1-18G

802.11n-HT40 CH9

Horizontal

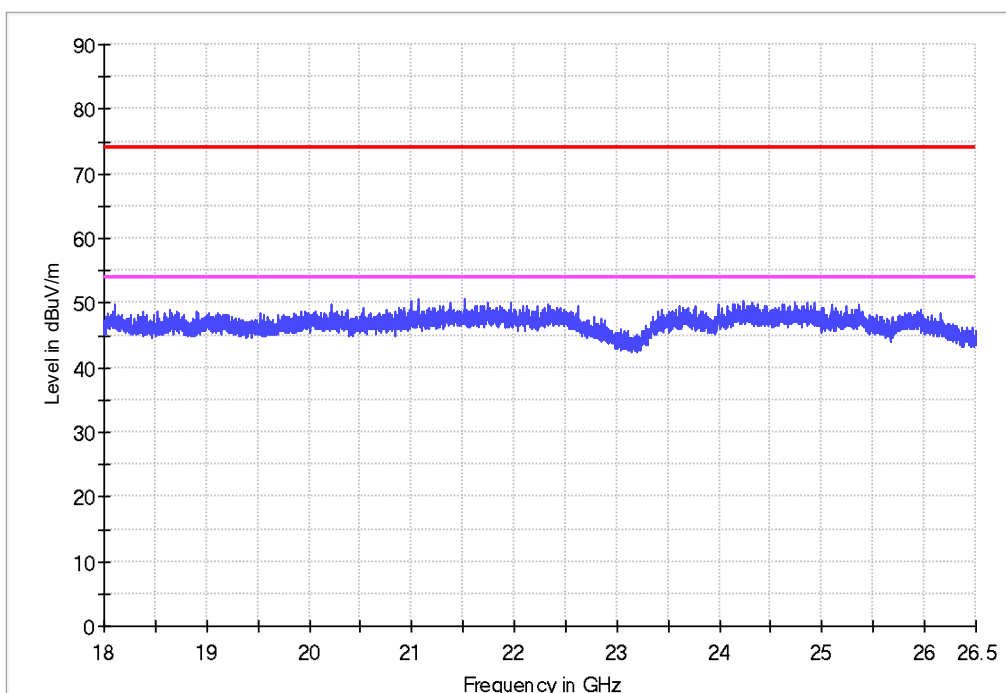


Vertical

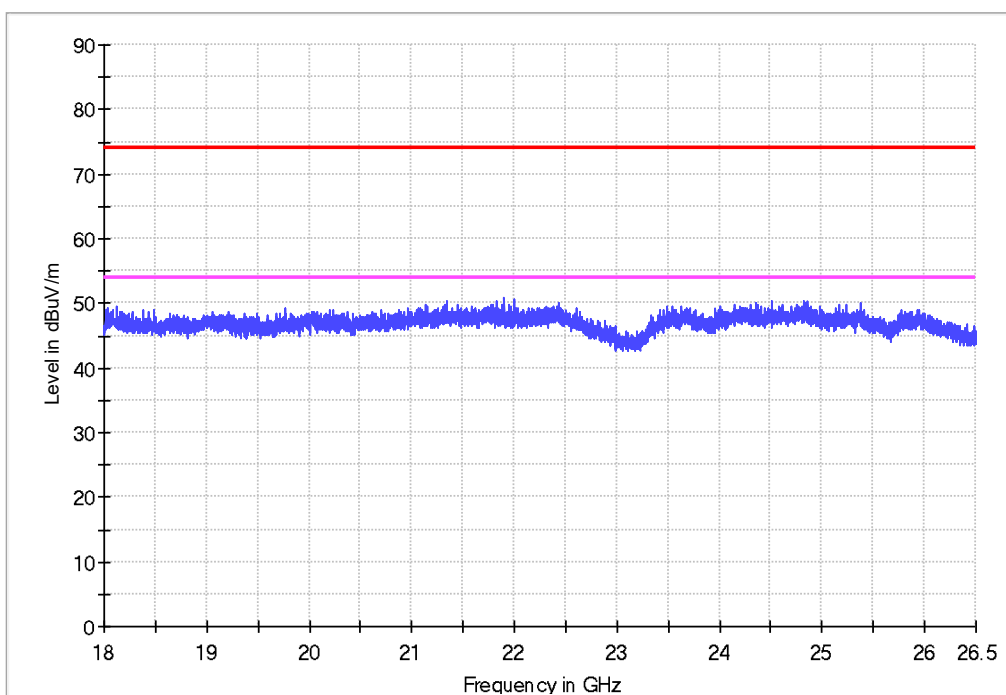


18-26.5G

(Worst Case)
Horizontal



Vertical



5.10 Restricted bands around fundamental frequency

Test Requirement:	47 CFR Part 15C Section 15.209 and 15.205		
Test Method:	ANSI C63.10 2020		
Test Site:	Measurement Distance: 3m (Semi-Anechoic Chamber)		
Limit:	Frequency	Limit (dBuV/m @3m)	Remark
	30MHz-88MHz	40.0	Quasi-peak Value
	88MHz-216MHz	43.5	Quasi-peak Value
	216MHz-960MHz	46.0	Quasi-peak Value
	960MHz-1GHz	54.0	Quasi-peak Value
	Above 1GHz	54.0	Average Value
		74.0	Peak Value

Test Setup:	
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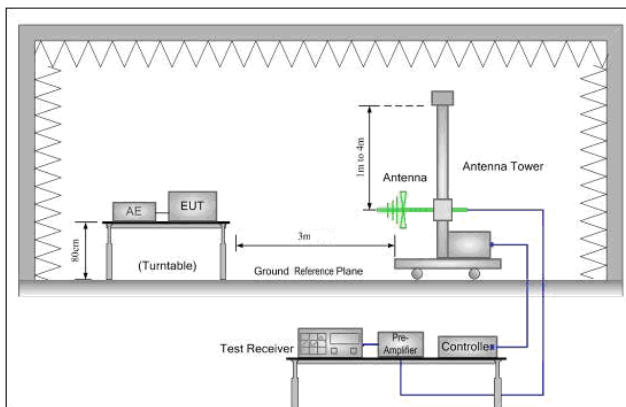


Figure 1. 30MHz to 1GHz

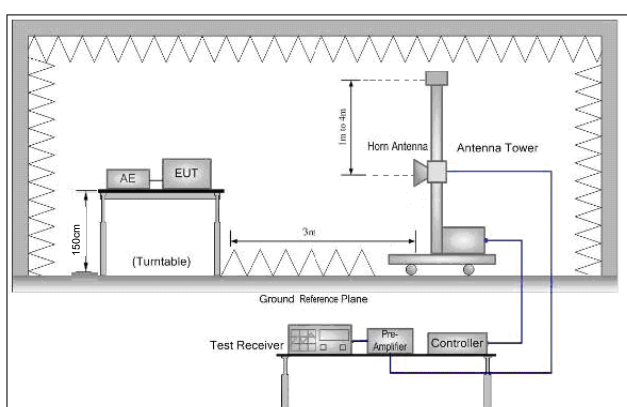


Figure 2. Above 1 GHz

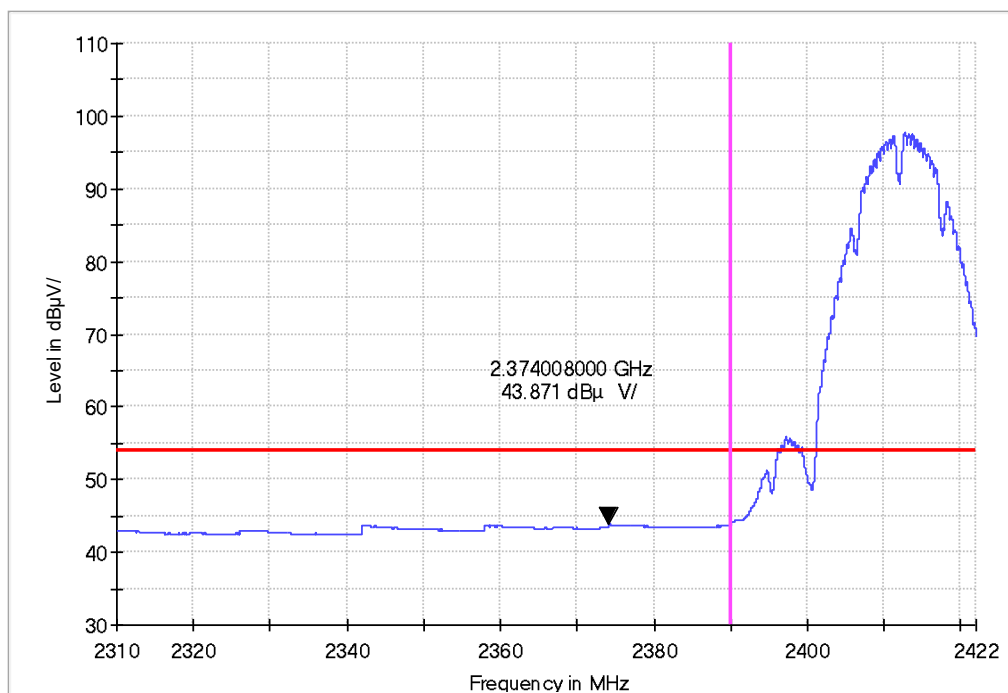
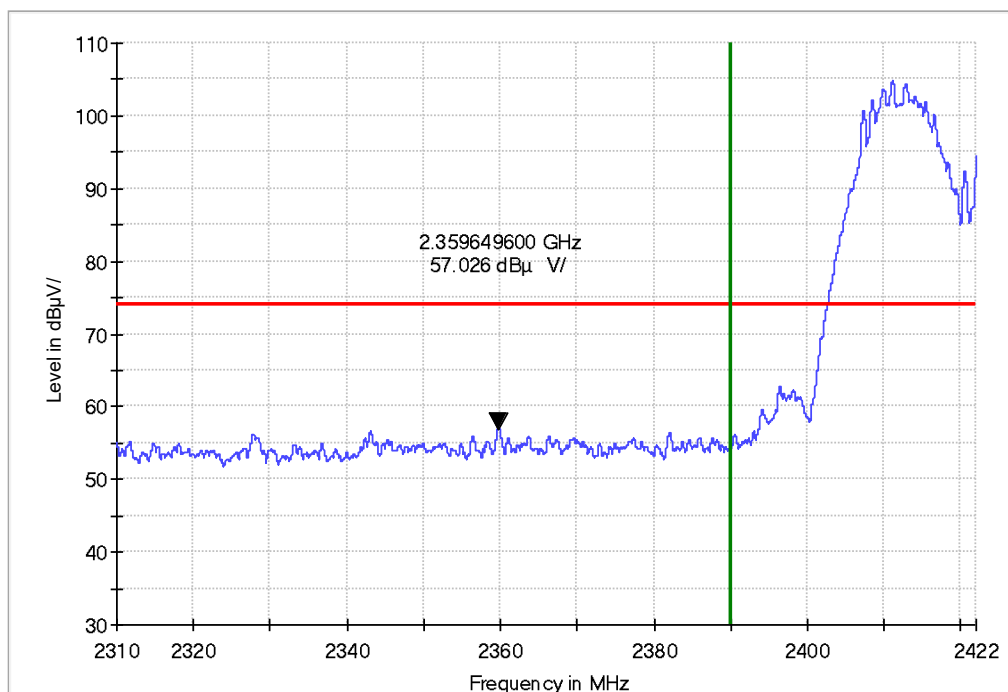
Test Procedure:	a. 1) Below 1G: The EUT was placed on the top of a rotating table 0.8 meters above the ground at a 3 meter semi-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation. 2) Above 1G: The EUT was placed on the top of a rotating table 1.5 meters above the ground at a 3 meter semi-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation. Note: For the radiated emission test above 1GHz: Place the measurement antenna away from each area of the EUT determined to be a source of emissions at the specified measurement distance, while keeping the measurement antenna aimed at the source of emissions at each frequency of significant emissions, with polarization oriented for maximum response. The measurement antenna may have to be higher or lower than the EUT, depending on the radiation pattern of the emission and staying aimed at the emission source for receiving the maximum signal. The final measurement antenna elevation shall be that which maximizes the emissions. The measurement antenna elevation for maximum emissions shall be restricted to a range of heights of from 1 m to 4 m above the ground or reference ground plane. b. The EUT was set 3 meters away from the interference-receiving antenna, which was mounted on the top of a variable-height antenna tower. c. The antenna height is varied from one meter to four meters above the ground to determine the maximum value of the field strength. 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
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	then the antenna was tuned to heights from 1 meter to 4 meters and the rotatable table was turned from 0 degrees to 360 degrees to find the maximum reading. e. The test-receiver system was set to Peak Detect Function and Specified Bandwidth with Maximum Hold Mode. f. Place a marker at the end of the restricted band closest to the transmit frequency to show compliance. Also measure any emissions in the restricted bands. Save the spectrum analyzer plot. Repeat for each power and modulation for lowest and highest channel g. Test the EUT in the lowest channel, the middle channel, the Highest channel. h. The radiation measurements are performed in X, Y, Z axis positioning for Transmitting mode, And found the X axis positioning which it is worse case . i. Repeat above procedures until all frequencies measured was complete.
Exploratory Test Mode:	Transmitting with all kind of modulations, data rates. Transmitting mode.
Final Test Mode:	Pretest the EUT at Transmitting mode, found the Transmitting mode which it is worse case. Through Pre-scan, find the 1Mbps of rate is the worst case of 802.11b; 6Mbps of rate is the worst case of 802.11g; 6.5Mbps of rate is the worst case of 802.11n(HT20); 13.5Mbps of rate is the worst case of 802.11n(HT40). Only the worst case is recorded in the report.
Test Results:	Pass

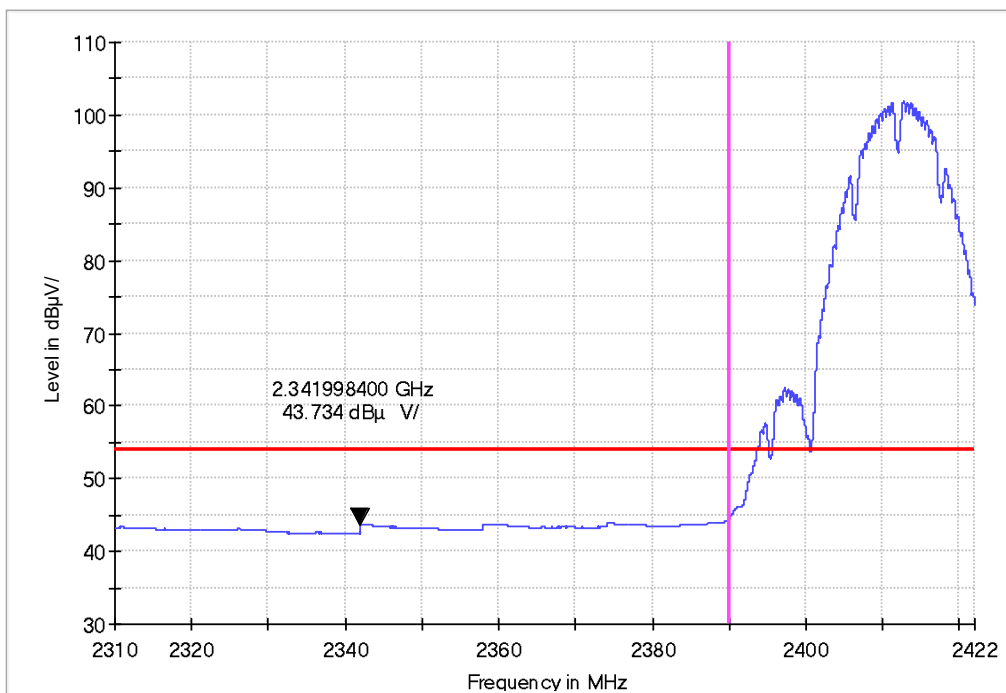
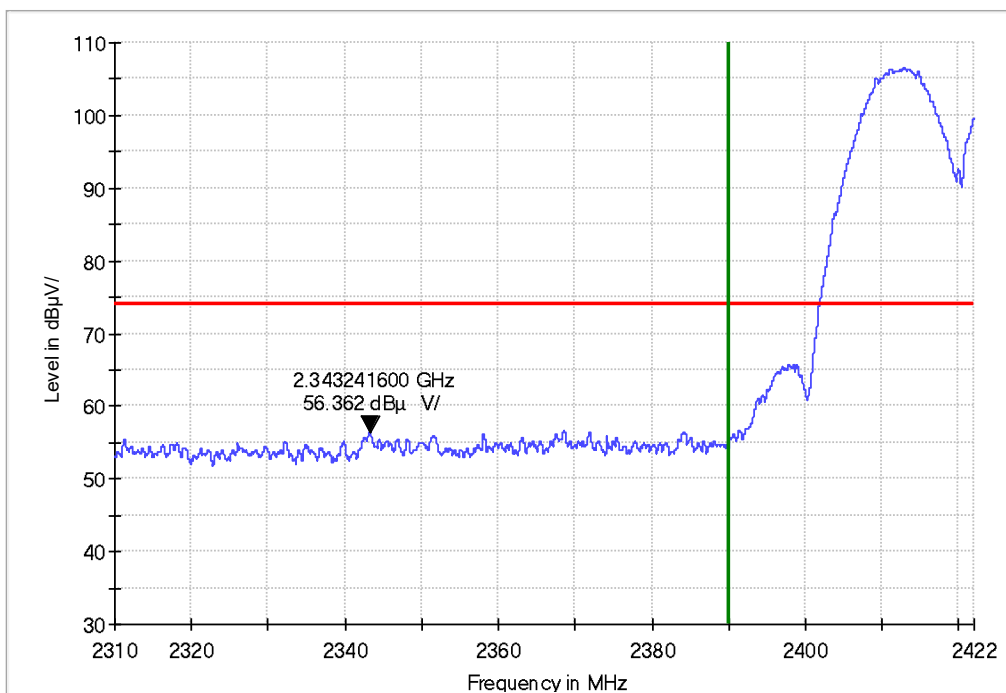
Band edge

11b
CH1

Horizontal



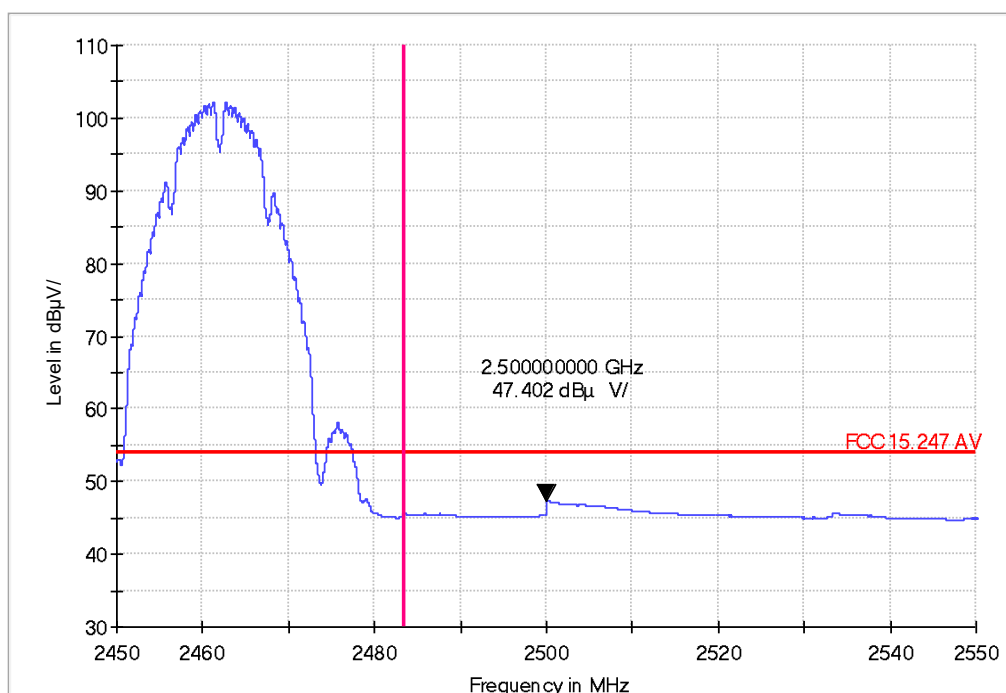
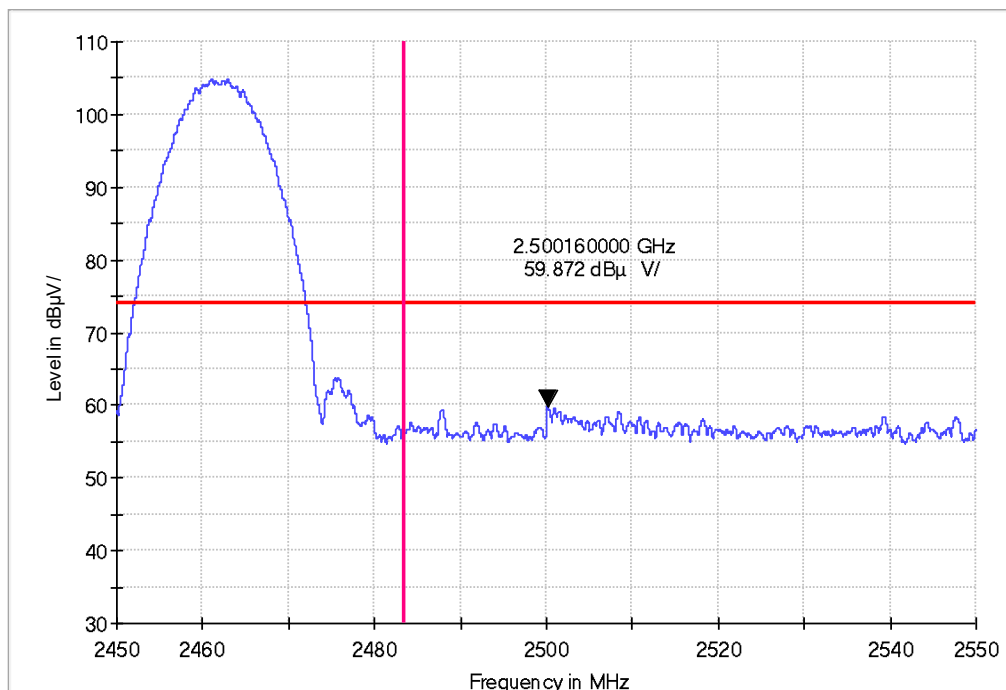
Vertical



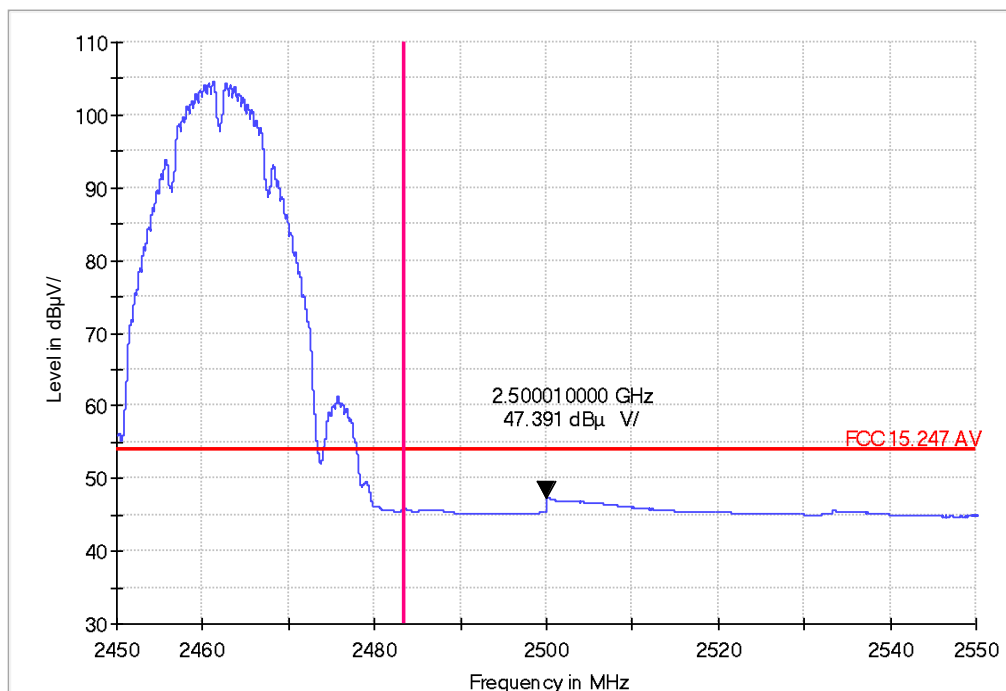
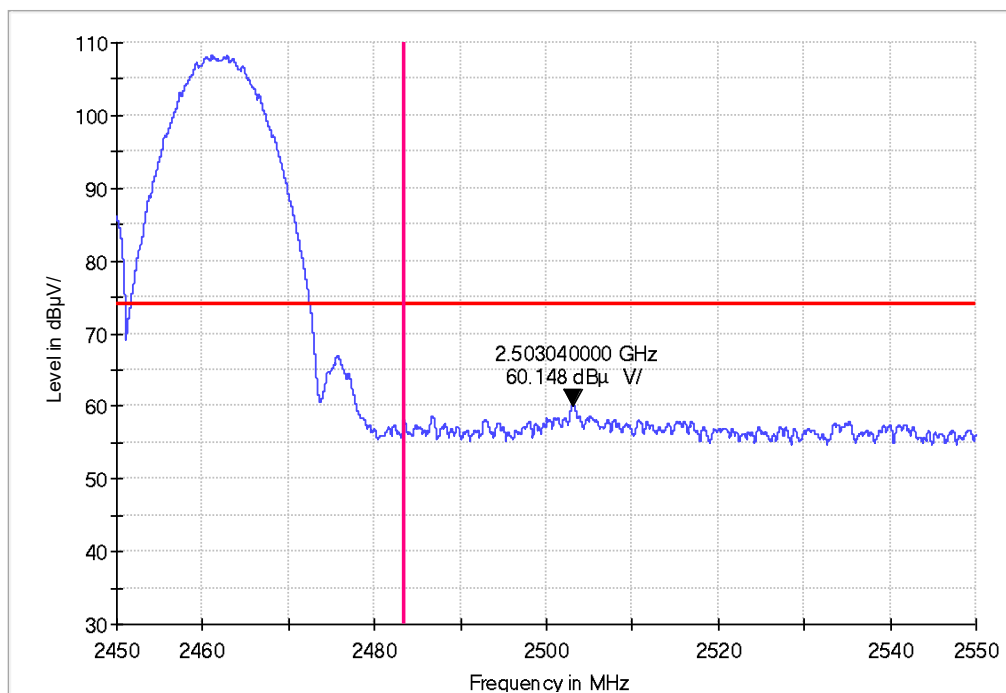
Band edge

11b
CH11

Horizontal



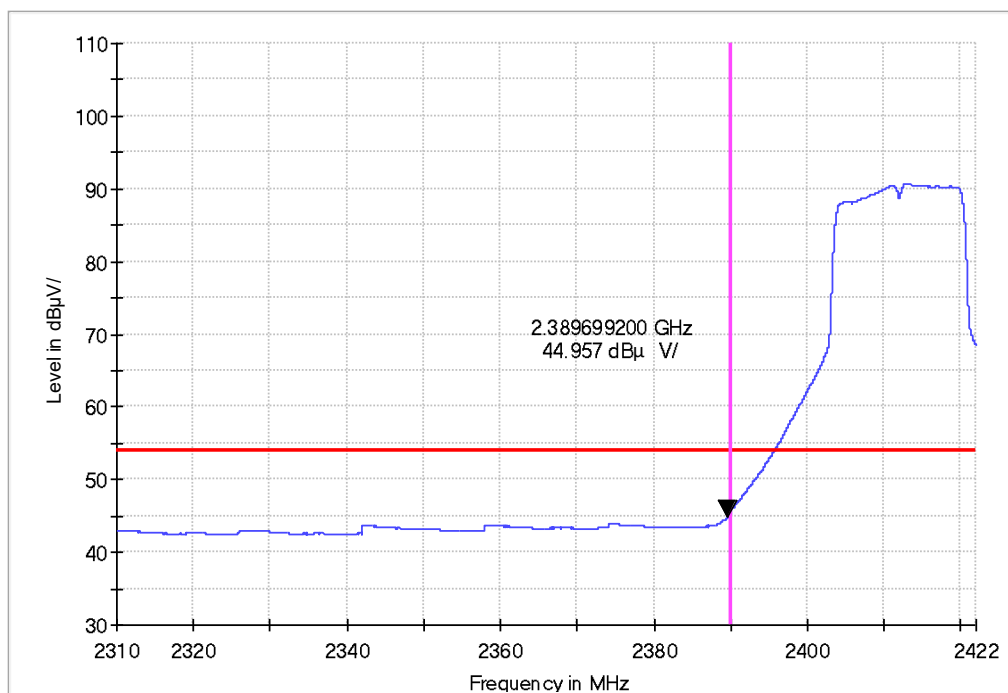
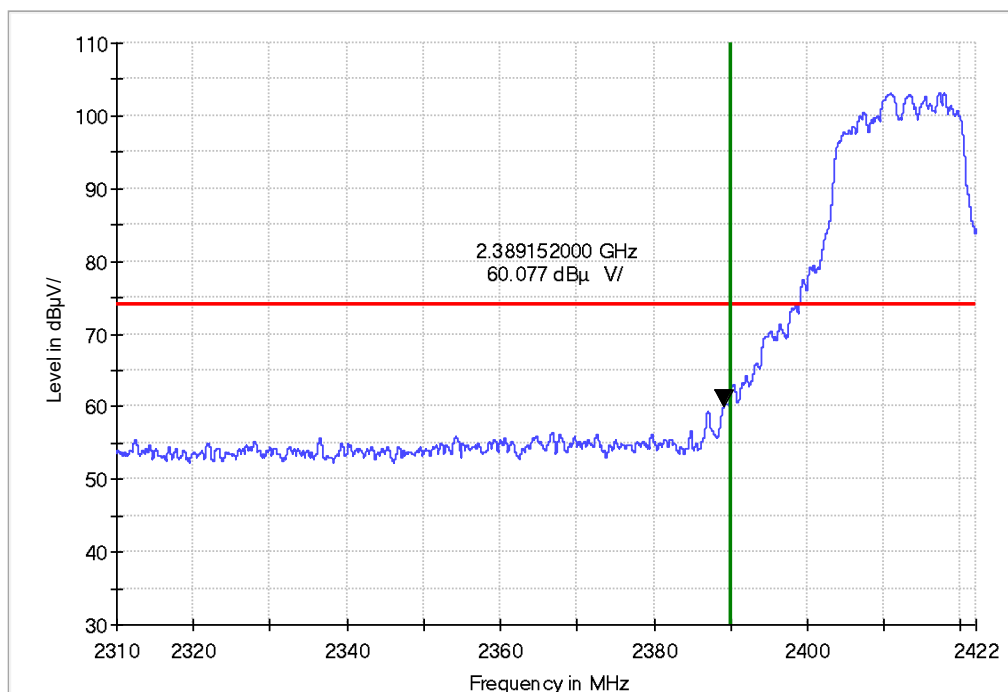
Vertical



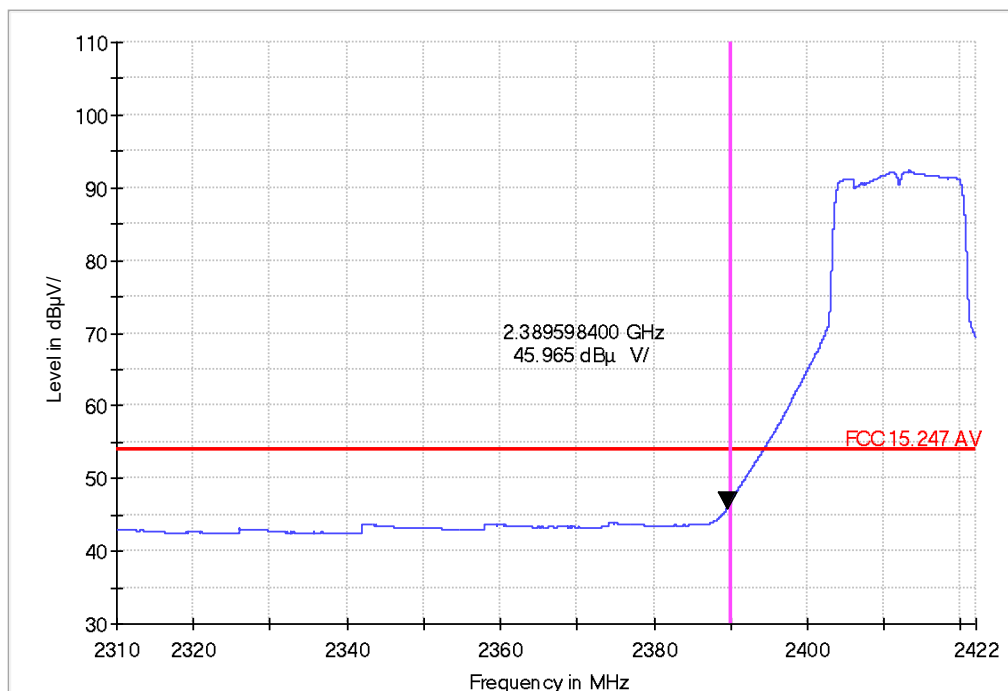
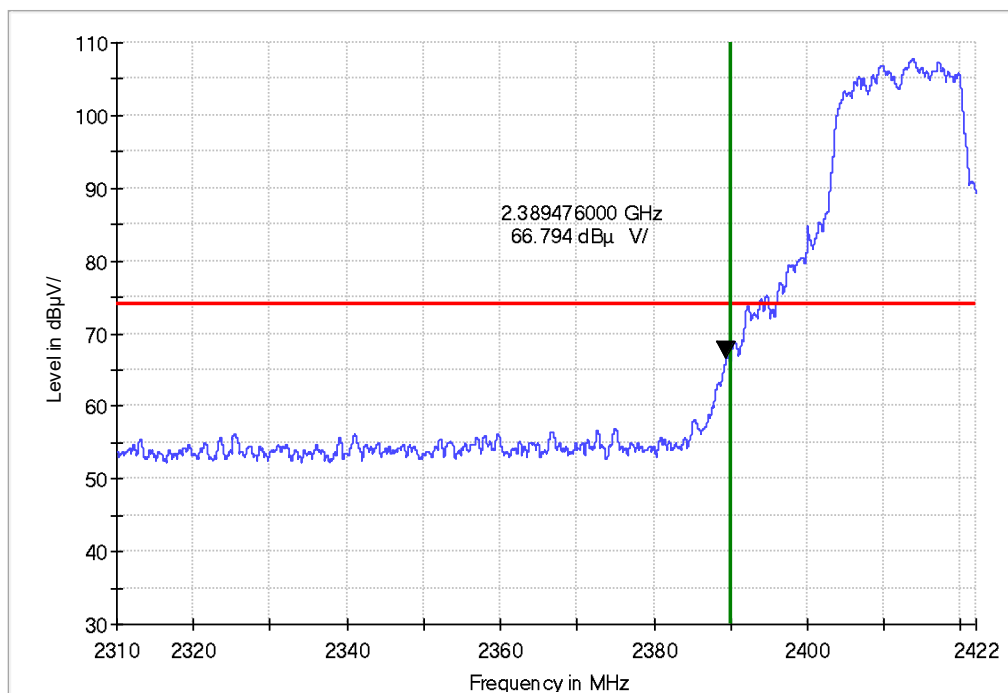
Band edge

11g
CH1

Horizontal



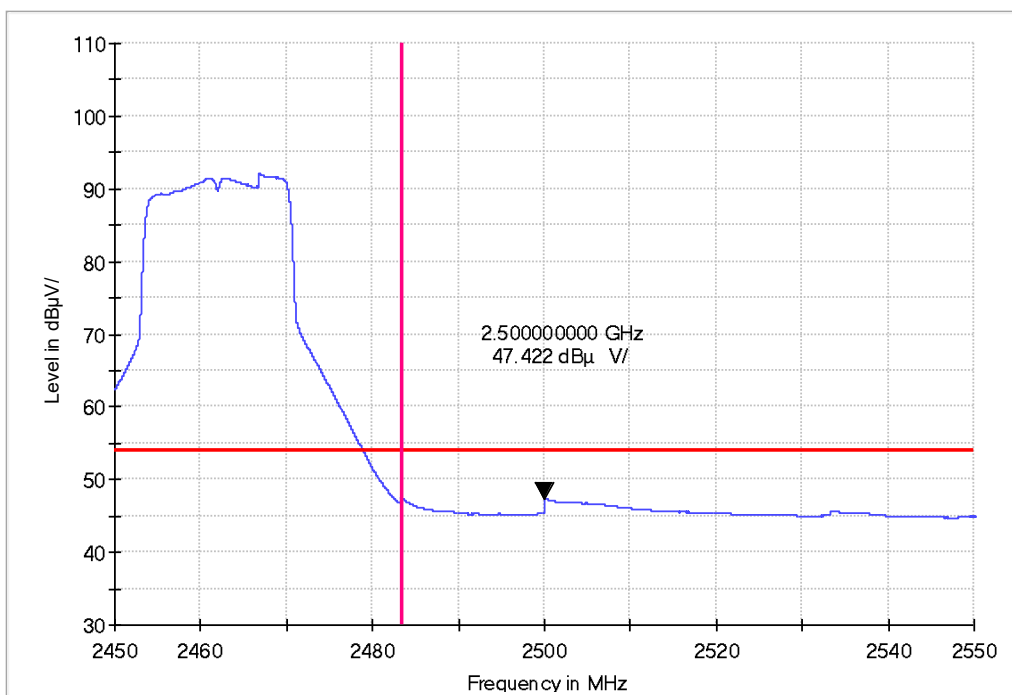
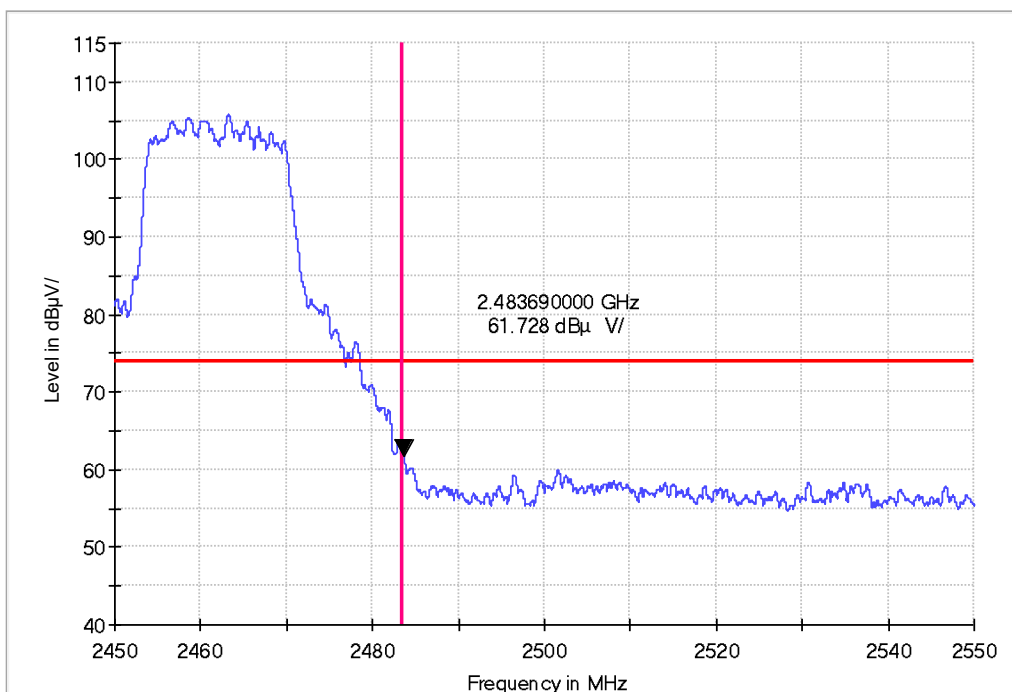
Vertical



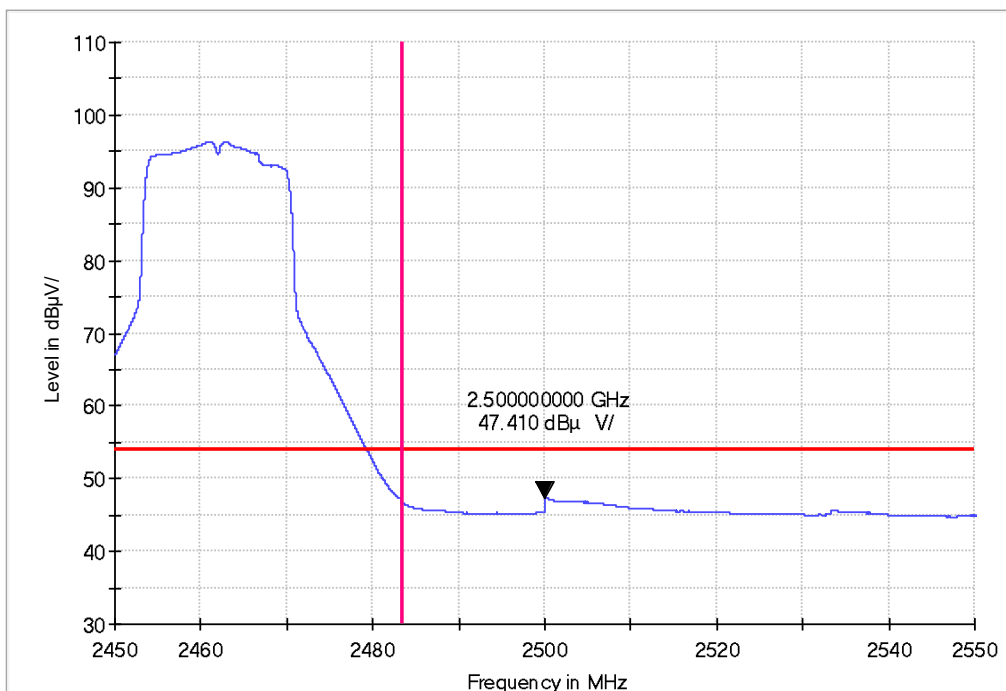
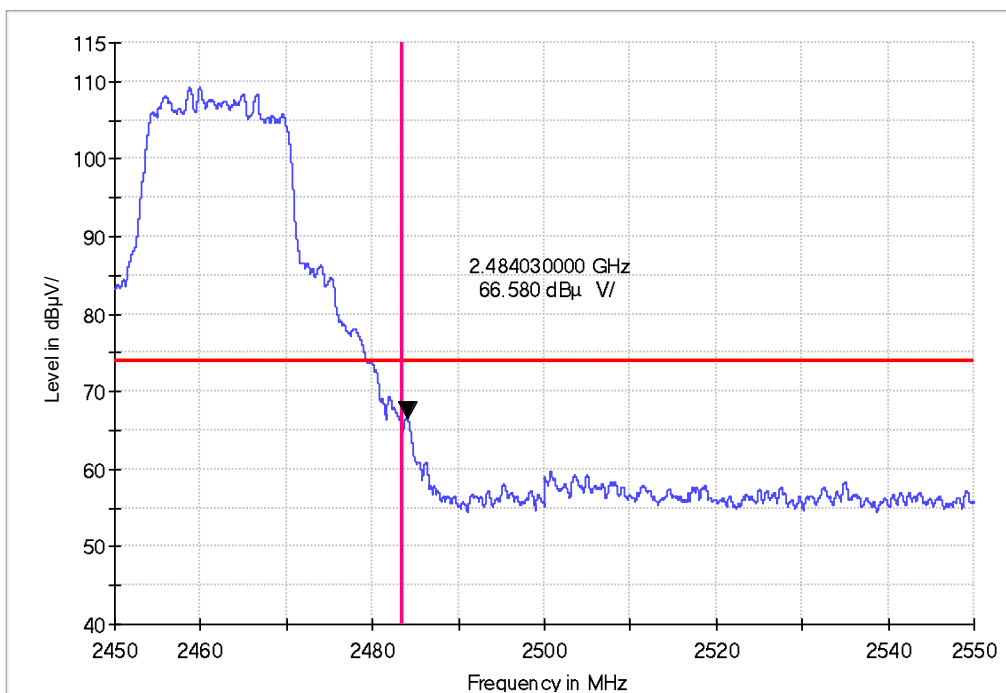
Band edge

11g
CH11

Horizontal



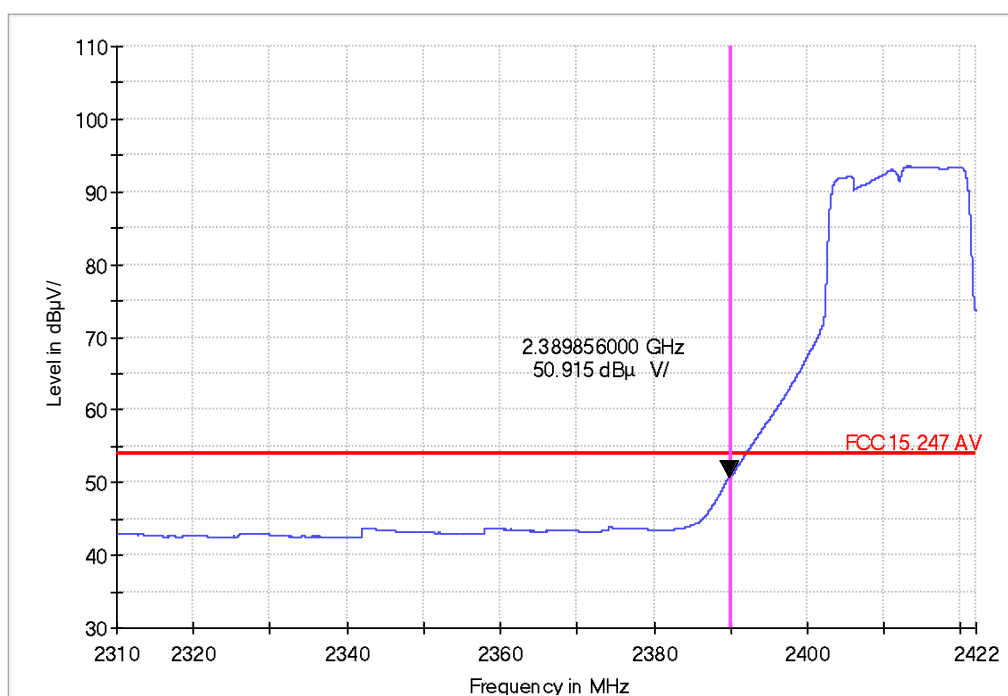
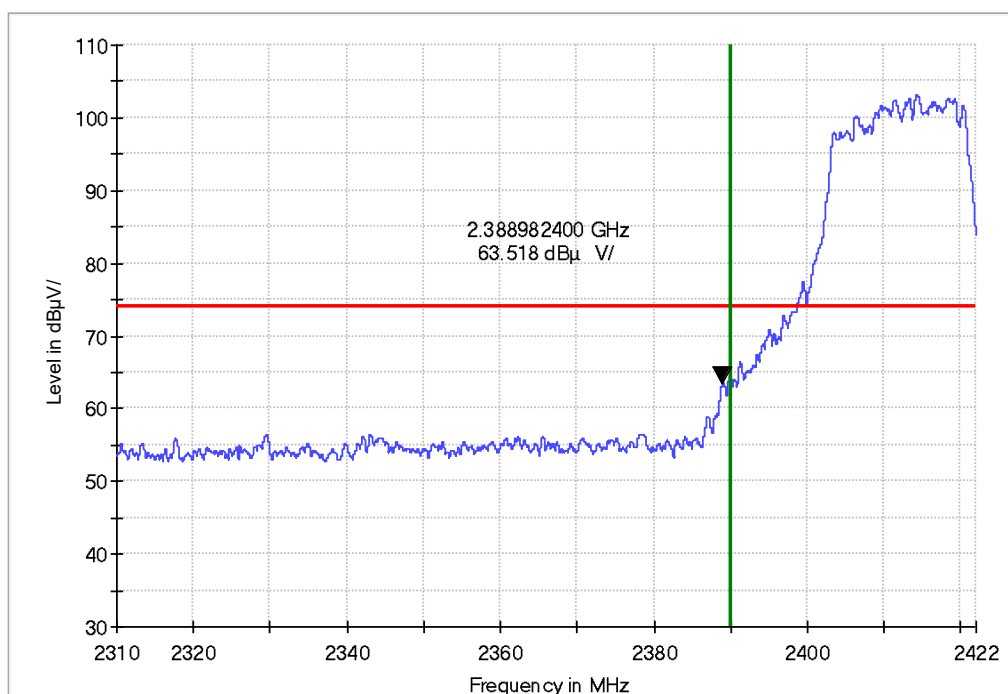
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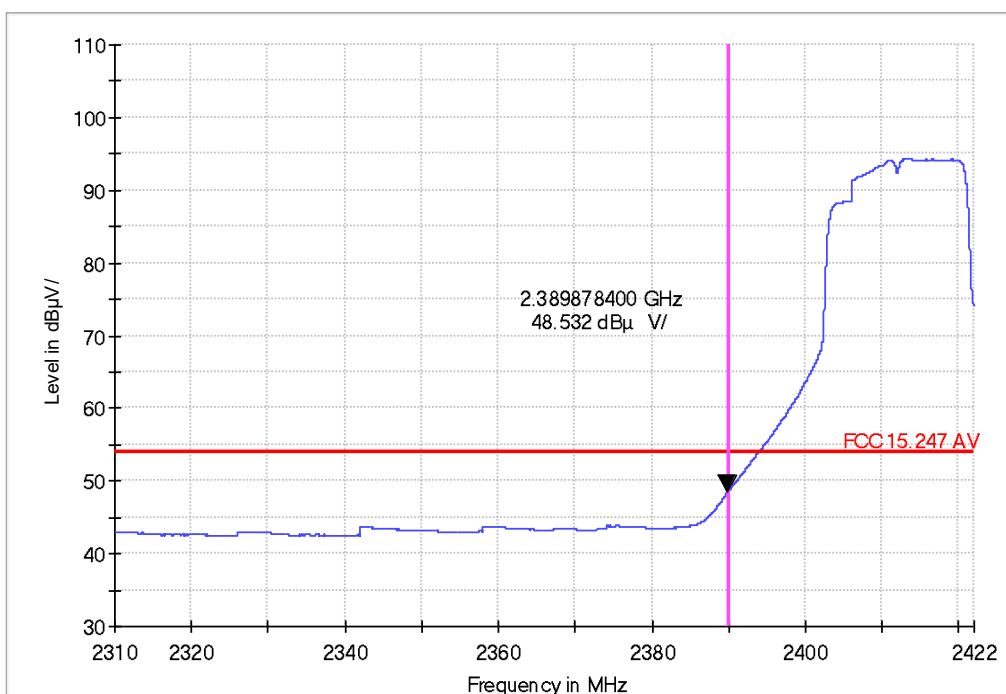
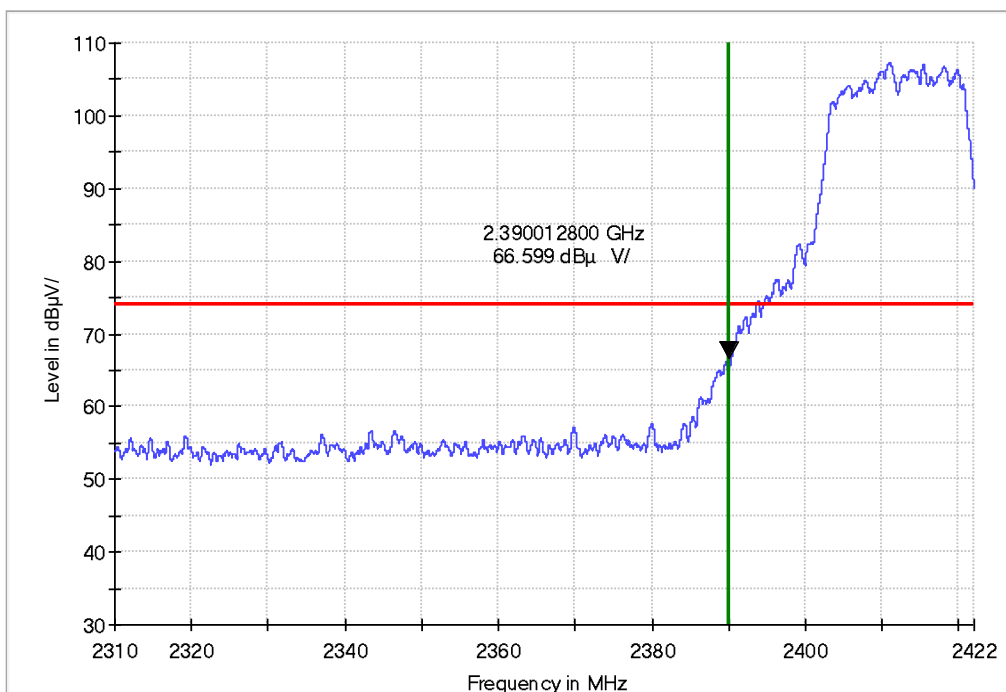
Band edge

11n-HT20
CH1

Horizontal



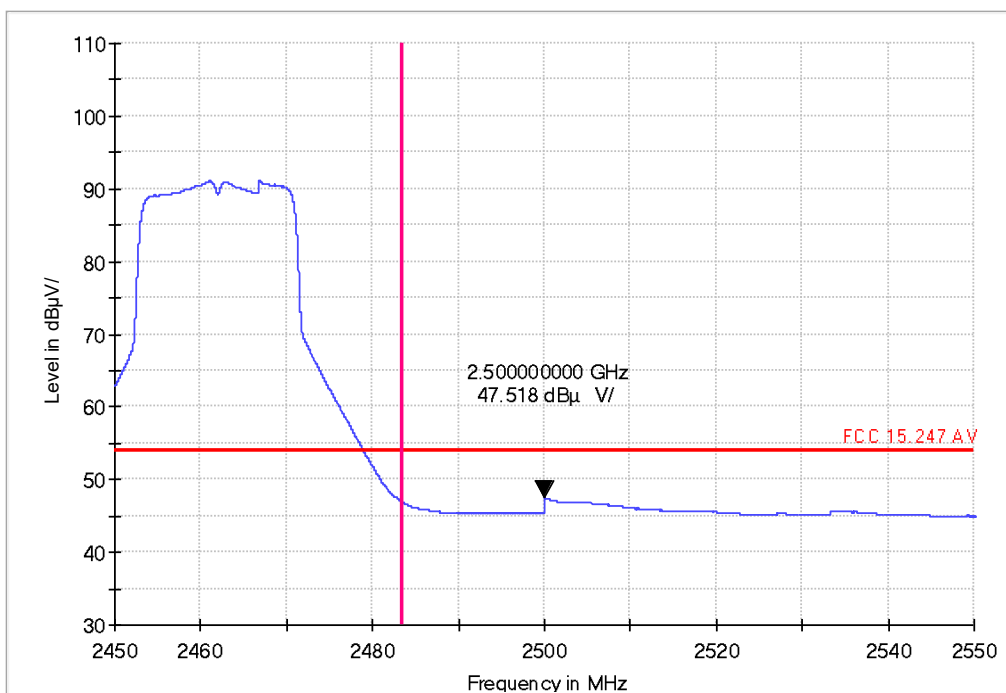
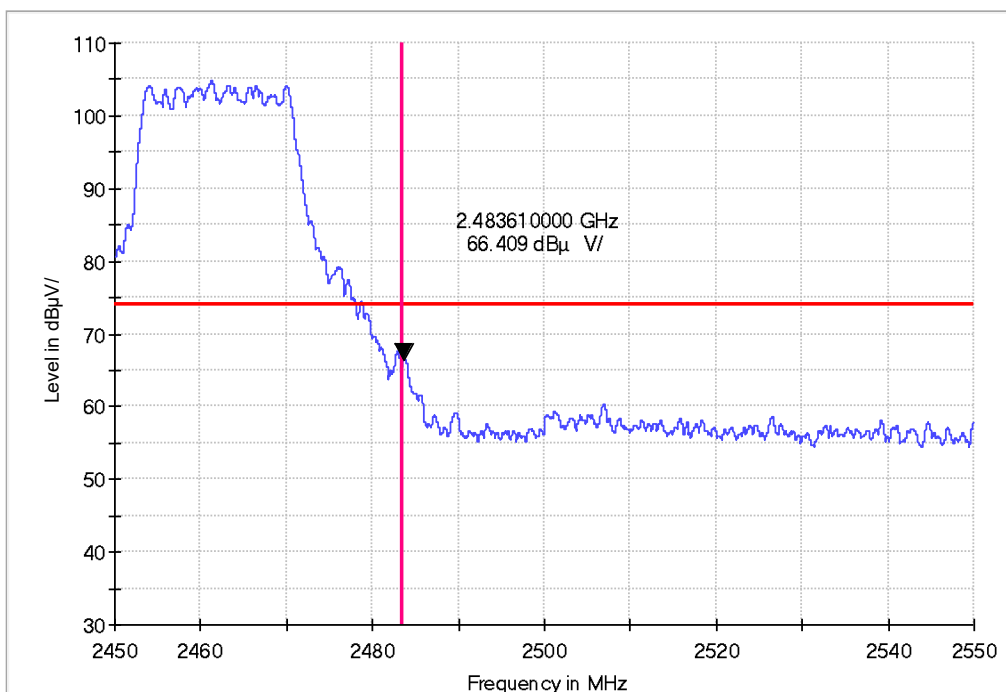
Vertical



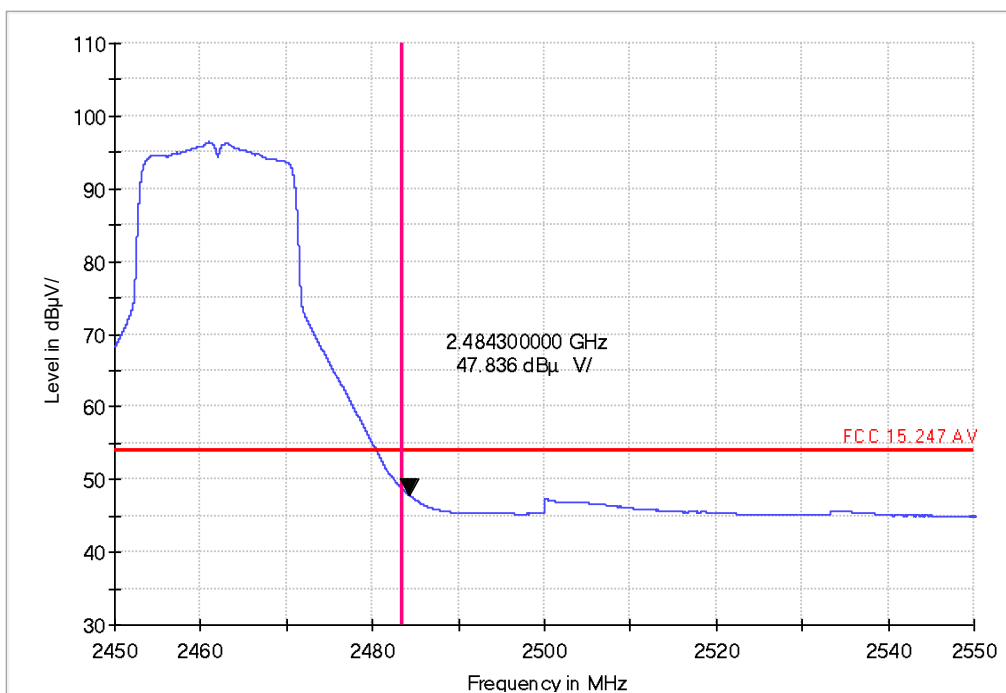
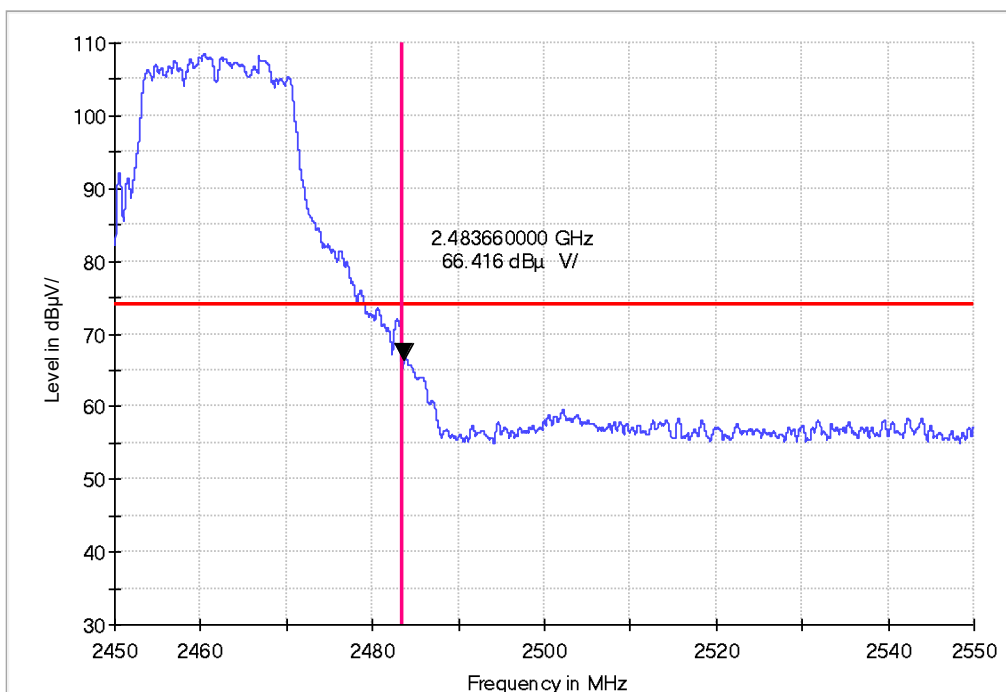
Band edge

11n-HT20
CH11

Horizontal



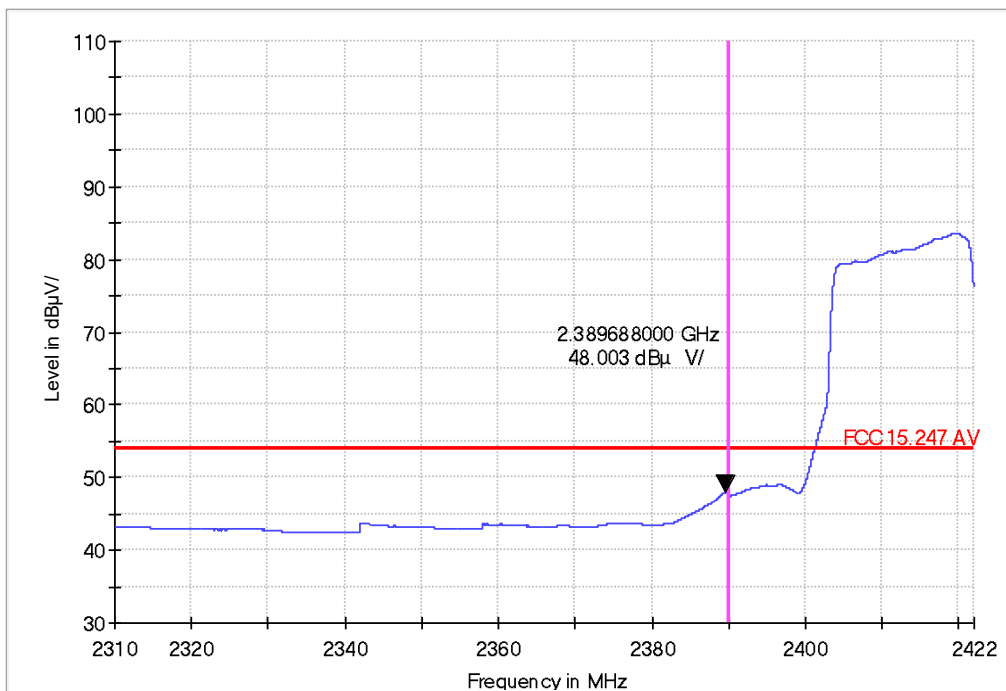
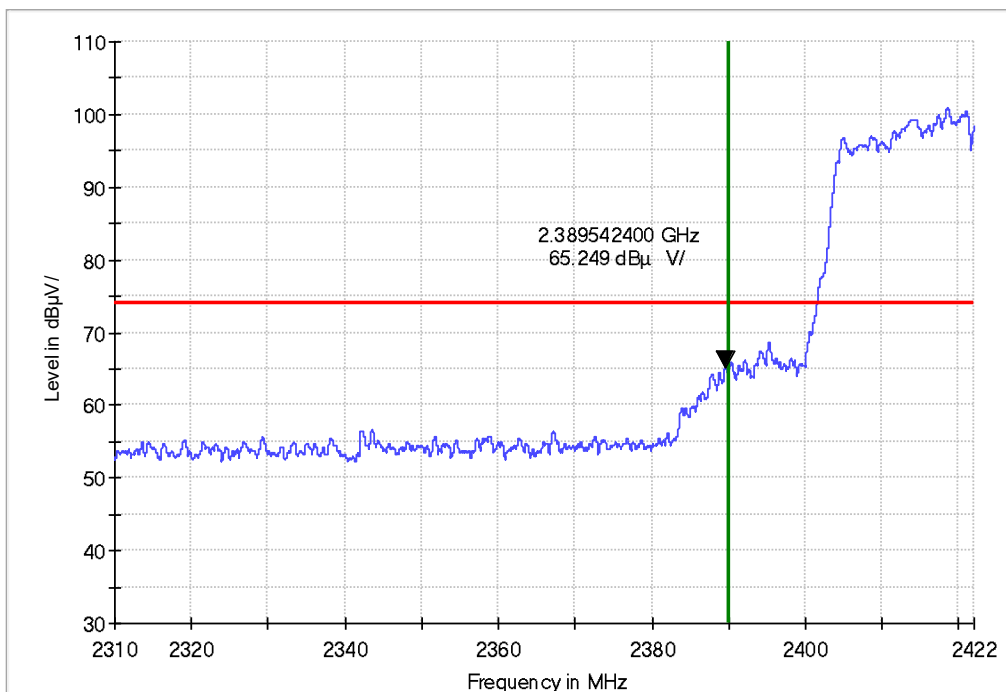
Vertical



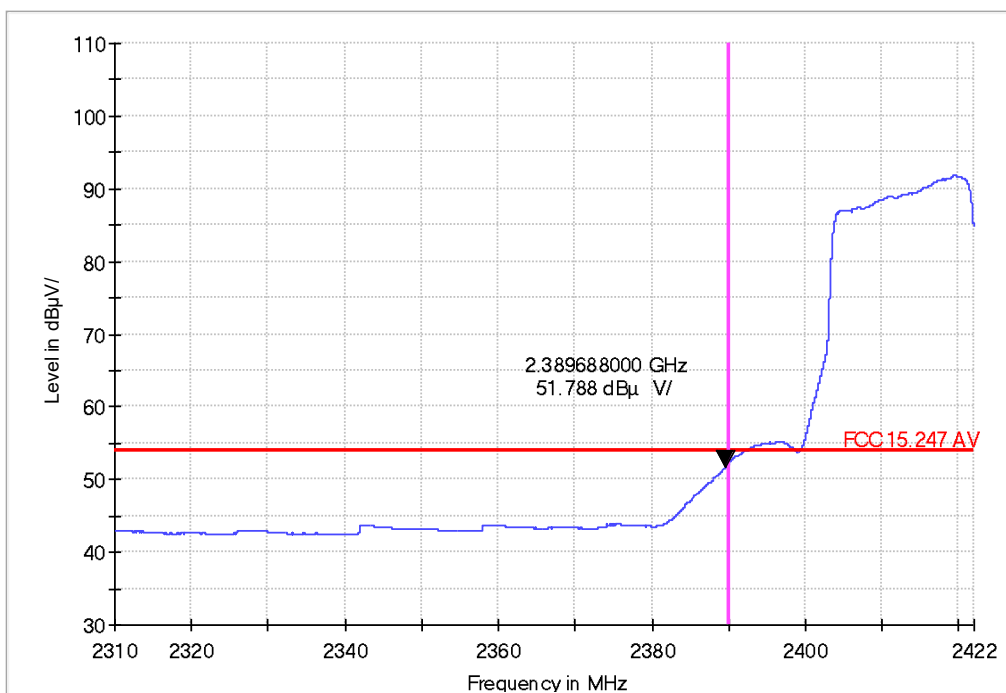
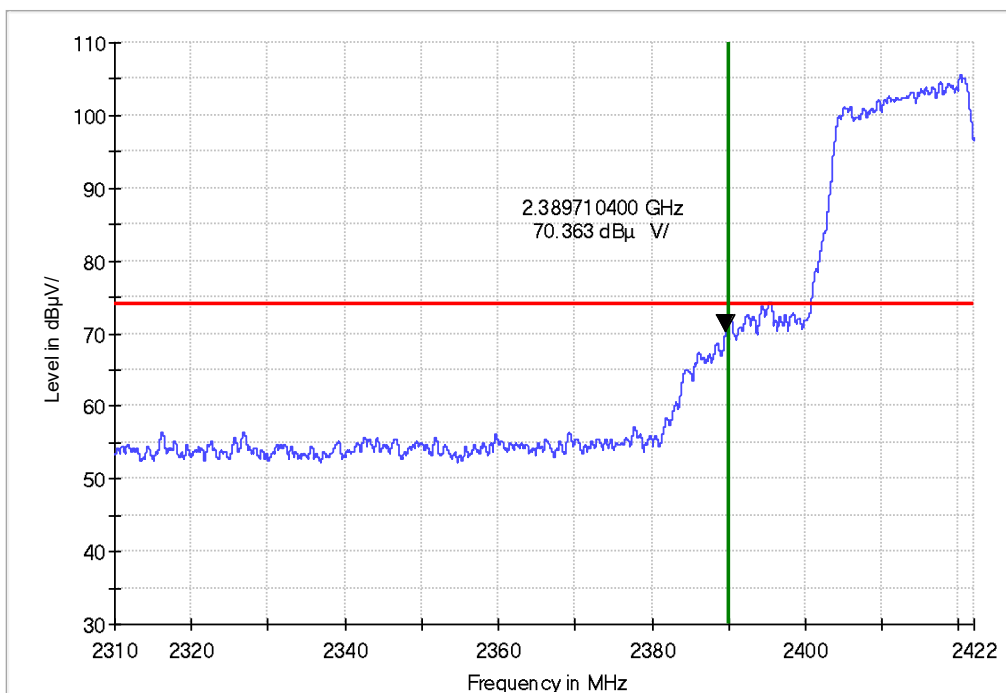
Band edge

11n-HT40
CH3

Horizontal



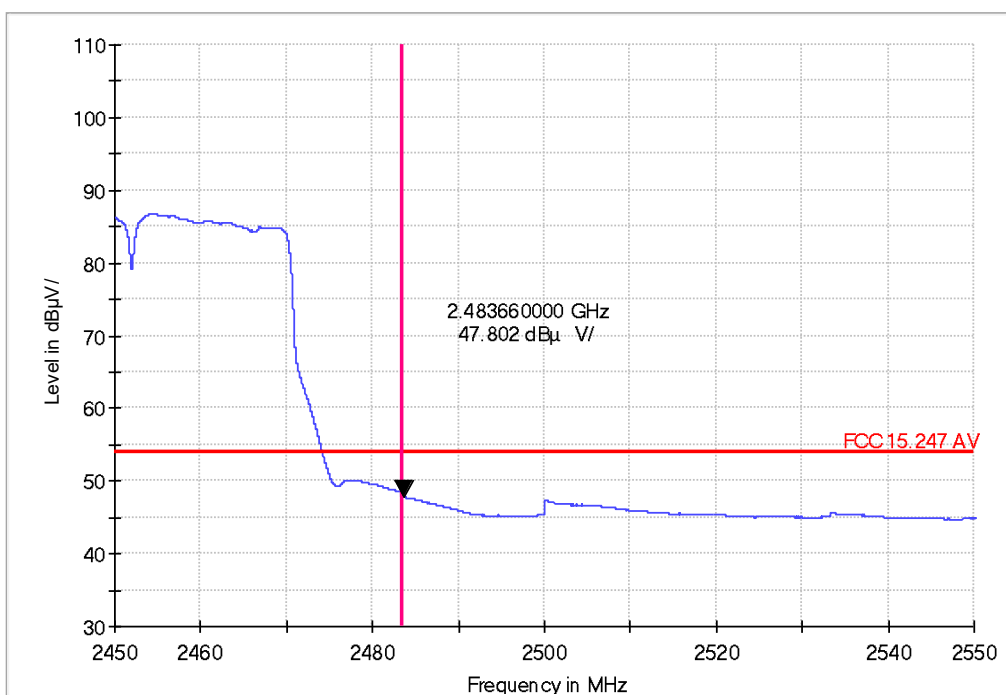
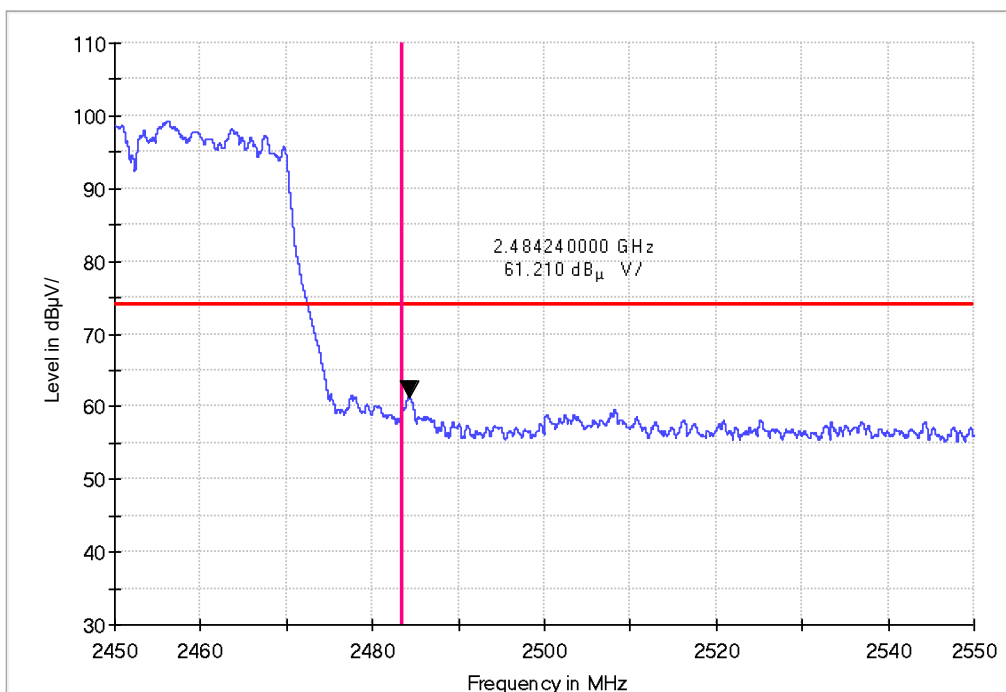
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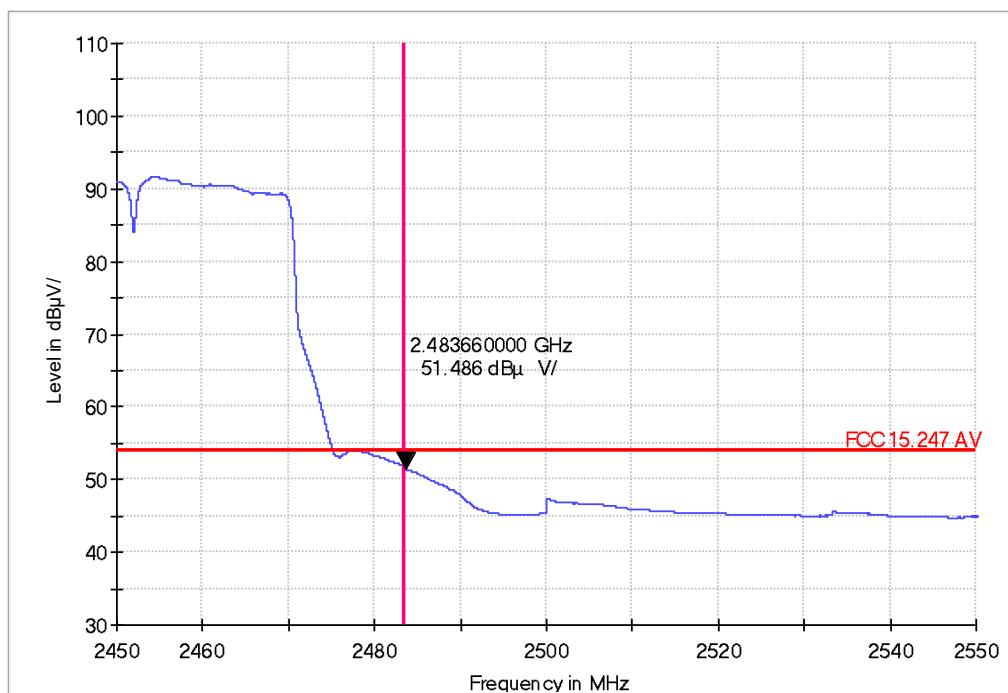
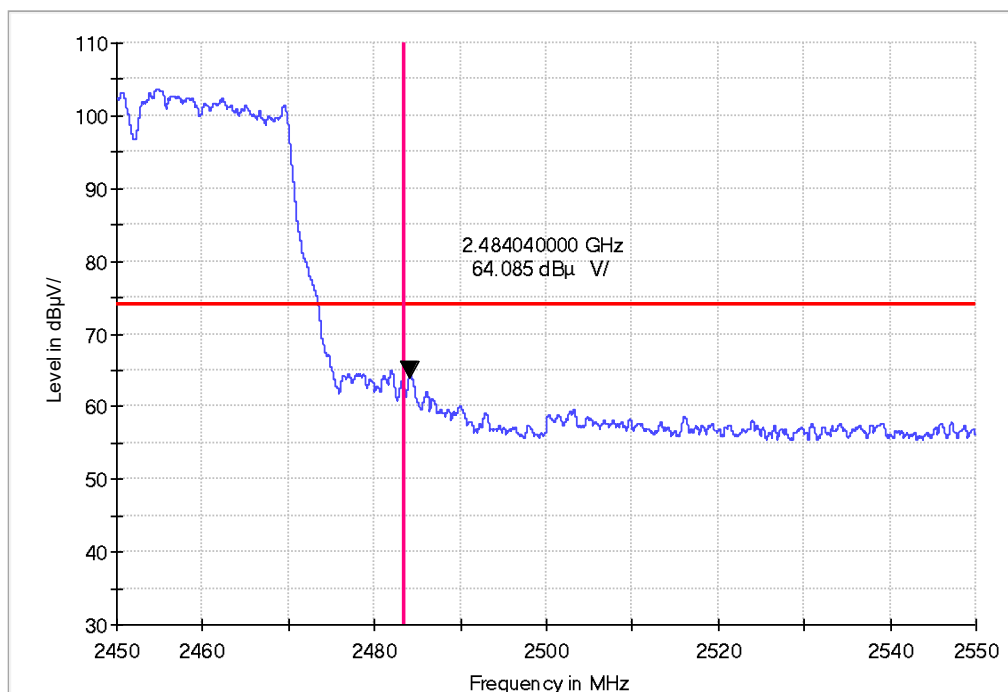
Band edge

11n-HT40
CH9

Horizontal



Vertical



*** END OF REPORT ***