



FCC PART 15.407

TEST REPORT

For

Fujian Newland Auto-ID Tech Co., Ltd.

Newland Science & Technology Park No.1 Rujiang West Rd., Mawei district, Fuzhou, Fujian,
China

FCC ID: SL9NLS-NQUIRE

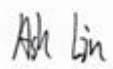
Report Type: Original Report	Product Name: Information Terminal
Report Number:	<u>2407V20721E-RF-03</u>
Report Date:	<u>2025-01-06</u>
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REPORT REVISION HISTORY

Number of Revisions	Report No.	Version	Issue Date	Description
0	2407V20721E-RF-03	R1V1	2025-01-06	Initial Release

GENERAL INFORMATION**Product Description for Equipment under Test (EUT)**

Applicant:		Fujian Newland Auto-ID Tech Co., Ltd.
Product Name:		Information Terminal
Tested Model:		NLS-NQuire1500, NLS-NQuire500, NLS-NQuire700, NLS-NQuire1000
NLS-NQuire1500 Series model(s):		NLS-NQuire
Adapter Information	Model:	R361-1203000I
	Input:	AC 100-240V, 50/60Hz, 1.5A
	Output:	DC 12V, 3A, 36W
Power Supply:		DC 12V from Adapter
Maximum Output Power:		13.926dBm in 5150-5250 MHz Band; 13.852dBm in 5250-5350 MHz Band 12.053dBm in 5470-5725 MHz Band; 10.932dBm in 5725-5850 MHz Band
Operating Frequency:		Band1: 5180-5240 MHz (802.11a/n ht20/ac vht20) 5190-5230 MHz(802.11n ht40/ac vht40) 5210 MHz(802.11ac vht80) Band2: 5260-5320 MHz (802.11a/n ht20/ac vht20) 5270-5310 MHz(802.11n ht40/ac vht40) 5290 MHz(802.11ac vht80) Band3: 5500-5720 MHz (802.11a/n ht20/ac vht20) 5510-5710 MHz(802.11n ht40/ac vht40) 5530-5690MHz(802.11ac vht80) Band4: 5745-5825 MHz (802.11a/n ht20/ac vht20) 5755-5795 MHz(802.11n ht40/ac vht40) 5775 MHz(802.11ac vht80)
Modulation Type:		802.11a/n/ac: OFDM-BPSK, QPSK, 16QAM, 64QAM, 256QAM
Antenna Type:		FPC Antenna
★Maximum Antenna Gain:		NLS-NQuire1500: 4.02dBi@B1, 3.71dBi@B2, 3.09dBi@B3, 3.53dBi@B4 NLS-NQuire500: 3.1dBi@B1, 3.1dBi@B2, 3.63dBi@B3, 3.82dBi@B4 NLS-NQuire700: 3.61dBi@B1, 3.61dBi@B2, 3.67dBi@B3, 2.23dBi@B4 NLS-NQuire1000: 4.59dBi@B1, 4.59dBi@B2, 3.26dBi@B3, 2.08dBi@B4
EUT Received Status:		Good
<i>Note:</i> 1. The Maximum Antenna Gain was declared by manufacturer. 2. All models have the same motherboard except for screen size, USB interface and antenna. NLS-NQuire is identify with NLS-NQuire1500 except for the model name, please refer to declaration for more details. 3. All measurement and test data in this report was gathered from production sample serial number: 2ORR-1(NLS-NQuire1500), 2PL7-1(NLS-NQuire500), 2PL8-1(NLS-NQuire700), 2PL5-1 (NLS-NQuire1000) (Assigned by the BACL (Xiamen). The EUT supplied by the applicant was received on 2024-08-02) 4. All models have the same RF circuit design. Therefore, except for the NLS-NQuire1500 model, other models are only tested for AC line conducted emissions and radiated spurious emissions.		

Objective

This type approval report is prepared for *Fujian Newland Auto-ID Tech Co., Ltd.* in accordance with Part 2-Subpart J, Part 15-Subparts A and E of the Federal Communication Commissions' rules.

The tests were performed in order to determine compliance with FCC Part 15, Subpart E, section 15.203, 15.205, 15.207, 15.209 and 15.407 rules.

Test Methodology

All measurements contained in this report were conducted with ANSI C63.10-2013, American National Standard of Procedures for Compliance Testing of Unlicensed Wireless Devices.

All emissions measurement was performed and Bay Area Compliance Laboratories Corp. (Xiamen).

Measurement Uncertainty

Item		U _{lab} = 2 U _c (y) (Confidence of 95%)
Conducted Emission	150kHz-30MHz	2.33 dB
Radiated Emission	9kHz-30MHz	2.59 dB
	30MHz~200MHz	4.38 dB
	200MHz~1GHz	4.50 dB
	1GHz~6GHz	4.58 dB
	6GHz~18GHz	5.43 dB
	18GHz~26.5GHz	5.47 dB
	26.5GHz~40GHz	5.63 dB
Occupied Channel Bandwidth		0.053 kHz
Transmitter Conducted Power		0.624 dB
Power Spectral Density		0.61 dB
Duty Cycle		1%
Temperature		1°C
Humidity		5%

Test Facility

The Test site used by Bay Area Compliance Laboratories Corp. (Xiamen) to collect test data is located on the Unit 102, No. 902 Meifeng South Road, Binhai West Avenue, Science and Technology Innovation Park, Torch High tech Zone Xiamen

Bay Area Compliance Laboratories Corp. (Xiamen) Lab is accredited to ISO/IEC 17025 by A2LA (Certificate Number: 7134.01) and the lab has been recognized as the FCC accredited lab under the KDB 974614 D01, the FCC Designation No. : CN1384.

SYSTEM TEST CONFIGURATION

Test Mode and Voltage

The system was configured for testing in a typical mode (as normally used by a typical user).	
Test mode:	Test mode 1: Transmitting
Test voltage:	AC 120V/60Hz
Remark:	During all emission tests, the EUT was configured to measure its highest possible emission level and the worst case's test data was presented in this test report.

Description of Test Configuration

The EUT was configured for testing in an engineering mode which was provided by the manufacturer. The system support 802.11a/n ht20/n ht40/ac vht20/ac vht40/ac vht80, the vht20/vht40 were reduced since the identical parameters with 802.11n ht20 and ht40.

For **5150~5250 MHz** band, test channel list is as below,

802.11a/ac20/n20 mode Channel 36, 40, 48 were tested.
802.11n40/ac40 mode Channel 38, 46 were tested.
802.11ac80 mode Channel 42 was tested.

Channel	Frequency (MHz)	Channel	Frequency (MHz)
36	5180	44	5220
38	5190	46	5230
40	5200	48	5240
42	5210	/	/

For **5250~5350 MHz** band, test channel list is as below,

802.11a/ac20/n20 mode Channel 52, 56, 64 were tested.
802.11n40/ac40 mode Channel 54, 62 were tested.
802.11ac80 mode Channel 58 was tested.

Channel	Frequency (MHz)	Channel	Frequency (MHz)
52	5260	60	5300
54	5270	64	5320
56	5280	62	5310
58	5290	/	/

For **5470~5725 MHz** band, test channel list is as below,

802.11a/ac20/n20 mode Channel 100, 116, 140, 144 were tested.

802.11n40/ac40 mode Channel 102, 110, 134, 142 were tested.

802.11ac80 mode Channel 106, 122, 138 was tested.

Channel	Frequency (MHz)	Channel	Frequency (MHz)
100	5500	124	5620
102	5510	126	5630
104	5520	128	5640
106	5530	132	5660
108	5540	134	5670
110	5550	136	5680
112	5560	138	5690
116	5580	140	5700
118	5590	142	5710
120	5600	144	5720
122	5610		

For **5725~5850 MHz** band,

802.11a/ac20/n20 mode Channel 149, 157, 165 were tested.

802.11n40/ac40 mode Channel 151, 159 were tested.

802.11ac80 mode Channel 155 was tested.

Channel	Frequency (MHz)	Channel	Frequency (MHz)
149	5745	159	5795
151	5755	161	5805
153	5765	165	5825
155	5775	/	/
157	5785	/	/

Note: Additional channels cross the band 5470-5725MHz and 5725-5850 MHz, Conducted output power/ Power Spectral Density/bandwidth test with the additional channel to compliance with stricter limit of the two bands(5470-5725MHz more stricter).

★EUT Exercise Software

The system was configured for testing in Engineering Mode, which was provided by the manufacturer.

5150-5250 MHz Band:				
Test Modes	Test Channels	Test Frequency	Data rate	Power Level Setting
802.11a	Lowest	5180	6Mbps	17
	Middle	5200	6Mbps	17
	Highest	5240	6Mbps	17
802.11n ht20	Lowest	5180	MCS0	17
	Middle	5200	MCS0	17
	Highest	5240	MCS0	17
802.11n ht40	Lowest	5190	MCS0	15
	Highest	5230	MCS0	16
802.11ac vht80	Middle	5210	MCS0	15
5250-5350 MHz Band:				
Test Modes	Test Channels	Test Frequency	Data rate	Power Level Setting
802.11a	Lowest	5260	6Mbps	17
	Middle	5280	6Mbps	17
	Highest	5320	6Mbps	17
802.11n ht20	Lowest	5260	MCS0	17
	Middle	5280	MCS0	17
	Highest	5320	MCS0	17
802.11n ht40	Lowest	5270	MCS0	16
	Highest	5310	MCS0	15
802.11ac vht80	Middle	5290	MCS0	14.5
5470-5725 MHz Band:				
Test Modes	Test Channels	Test Frequency	Data rate	Power Level Setting
802.11a	Lowest	5500	6Mbps	15.5
	Middle	5580	6Mbps	15.5
	Highest	5700	6Mbps	15.5
	Cross	5720	6Mbps	15.5
802.11n ht20	Lowest	5500	MCS0	15.5
	Middle	5580	MCS0	15.5
	Highest	5700	MCS0	15.5
	Cross	5720	MCS0	15.5
802.11n ht40	Lowest	5510	MCS0	13.5
	Middle	5550	MCS0	14.5
	Highest	5670	MCS0	14.5
	Cross	5710	MCS0	14.5
802.11ac vht80	Lowest	5530	MCS0	13.5
	Middle	5610	MCS0	14.5
	Cross	5690	MCS0	14.5

5725-5850 MHz Band:				
Test Modes	Test Channels	Test Frequency	Data rate	Power Level Setting
802.11a	Lowest	5745	6Mbps	16
	Middle	5785	6Mbps	16
	Highest	5825	6Mbps	16
802.11n ht20	Lowest	5745	MCS0	16
	Middle	5785	MCS0	16
	Highest	5825	MCS0	16
802.11n ht40	Lowest	5755	MCS0	15
	Highest	5795	MCS0	15
802.11ac vht80	Middle	5775	MCS0	15

Duty Cycle

5.2G

Mode	Ton (ms)	Ton+Toff (ms)	Duty Cycle (%)	1/T (Hz)	Duty Cycle Factor (dB)	VBW Setting (kHz)
802.11a	1.393	1.439	96.80	718	0.14	1.00
802.11n ht20	1.299	1.345	96.58	770	0.15	1.00
802.11n ht40	0.648	0.692	93.64	1543	0.29	2.00
802.11ac vht80	0.318	0.369	86.18	3145	0.65	4.00

5.3G

Mode	Ton (ms)	Ton+Toff (ms)	Duty Cycle (%)	1/T (Hz)	Duty Cycle Factor (dB)	VBW Setting (kHz)
802.11a	1.392	1.439	96.73	718	0.14	1.00
802.11n ht20	1.299	1.345	96.58	770	0.15	1.00
802.11n ht40	0.387	0.433	89.38	2584	0.49	3.00
802.11ac vht80	0.32	0.368	86.96	3125	0.61	4.00

5.6G

Mode	Ton (ms)	Ton+Toff (ms)	Duty Cycle (%)	1/T (Hz)	Duty Cycle Factor (dB)	VBW Setting (kHz)
802.11a	1.393	1.439	96.80	718	0.14	1.00
802.11n ht20	1.299	1.345	96.58	770	0.15	1.00
802.11n ht40	0.648	0.693	93.51	1543	0.29	2.00
802.11ac vht80	0.32	0.368	86.96	3125	0.61	4.00

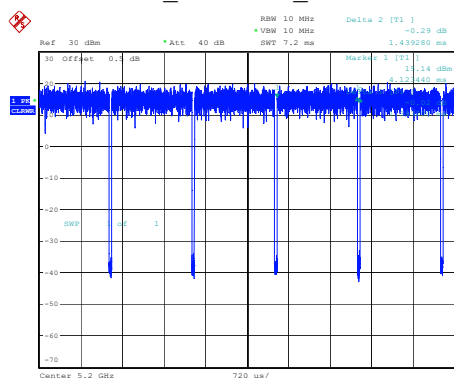
5.8G

Mode	Ton (ms)	Ton+Toff (ms)	Duty Cycle (%)	1/T (Hz)	Duty Cycle Factor (dB)	VBW Setting (kHz)
802.11a	1.393	1.439	96.80	718	0.14	1.00
802.11n ht20	1.299	1.345	96.58	770	0.15	1.00
802.11n ht40	0.65	0.694	93.66	1538	0.28	2.00
802.11ac vht80	0.318	0.366	86.89	3145	0.61	4.00

$$\text{Duty Cycle} = \text{Ton}/(\text{Ton}+\text{Toff}) * 100\%$$

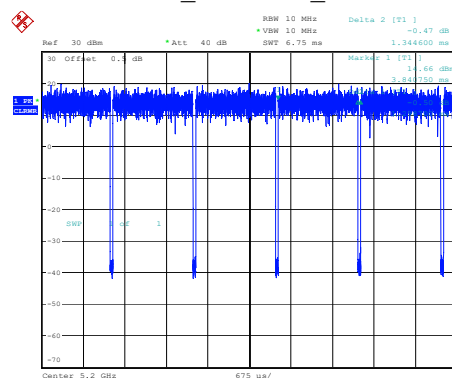
5.2G

a_5200MHz_Chain 0



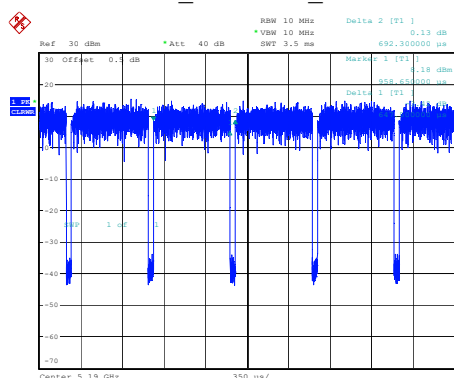
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n20_5200MHz_Chain 0



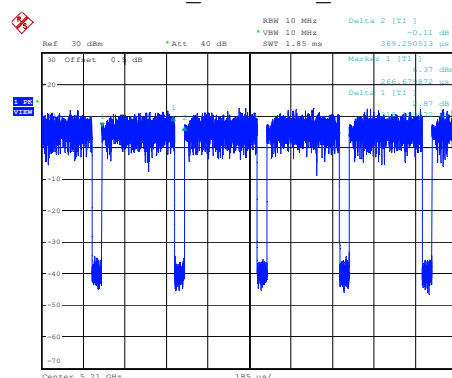
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n40_5190MHz_Chain 0



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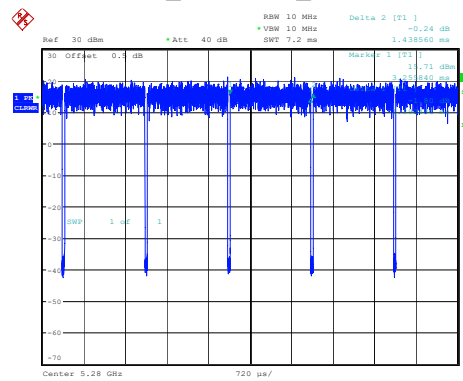
ac80_5210MHz_Chain 0



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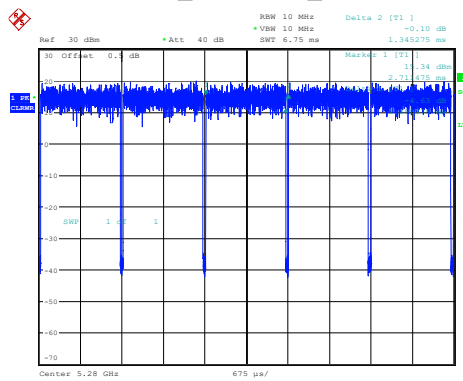
5.3G

a_5280MHz_Chain 0



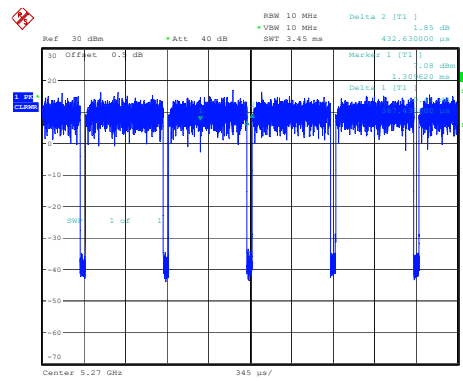
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n20_5280MHz_Chain 0



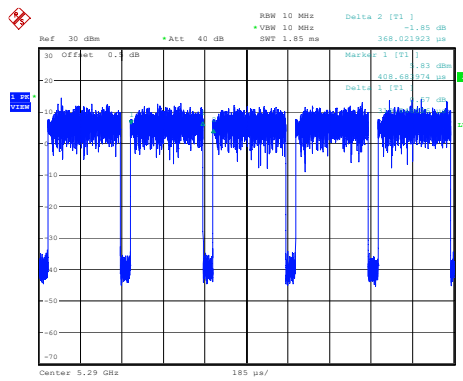
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n40_5270MHz_Chain 0



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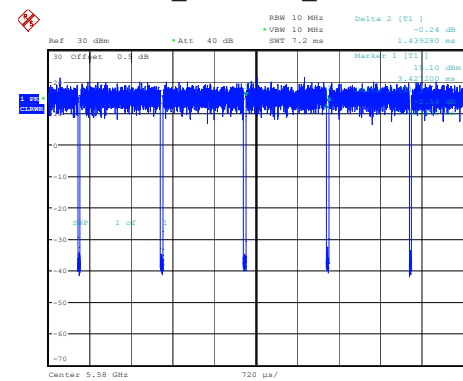
ac80_5290MHz_Chain 0



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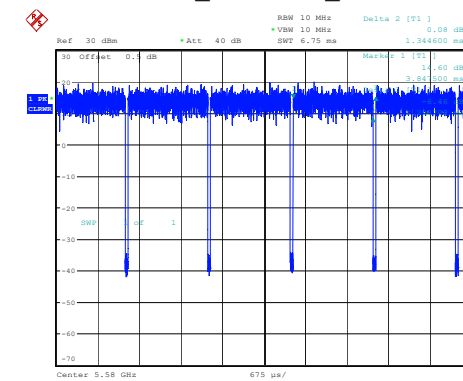
5.6G

a_5580MHz_Chain 0



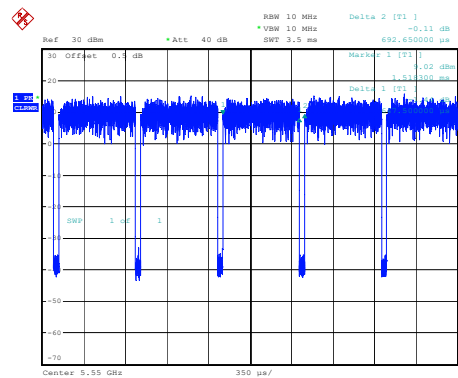
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n20_5580MHz_Chain 0



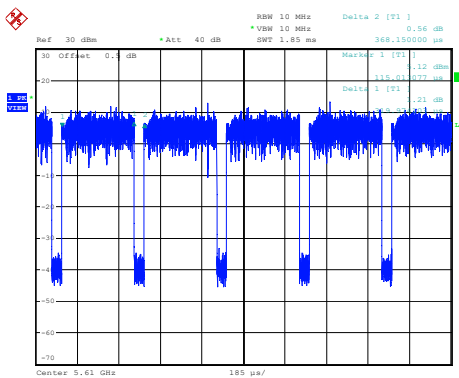
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n40_5550MHz_Chain 0



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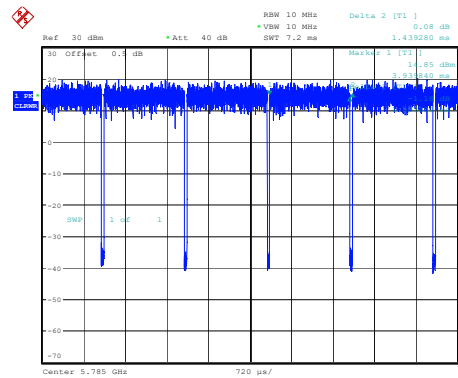
ac80_5610MHz_Chain 0



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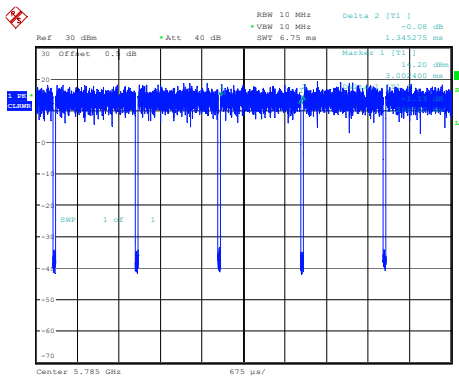
5.8G

a_5785MHz_Chain 0



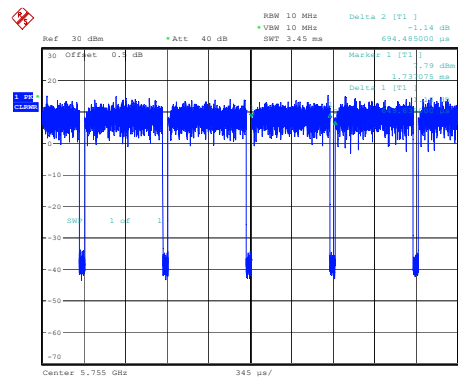
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n20_5785MHz_Chain 0



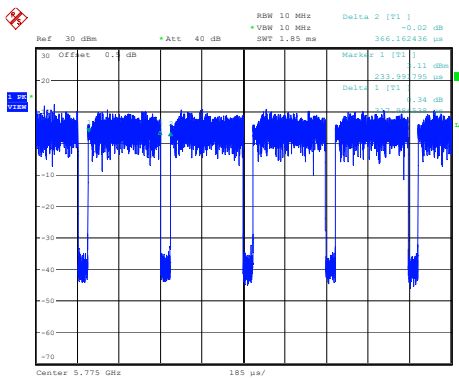
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n40_5755MHz_Chain 0



ProjectNo.:2407V20721E-RF Tester:Stein Peng
Date: 5.AUG.2024 20:21:23

ac80_5775MHz_Chain 0



ProjectNo.:2407V20721E-RF Tester:Stein Peng
Date: 6.AUG.2024 09:11:13

Equipment Modifications

No modification was made to the EUT.

Support Equipment List and Details

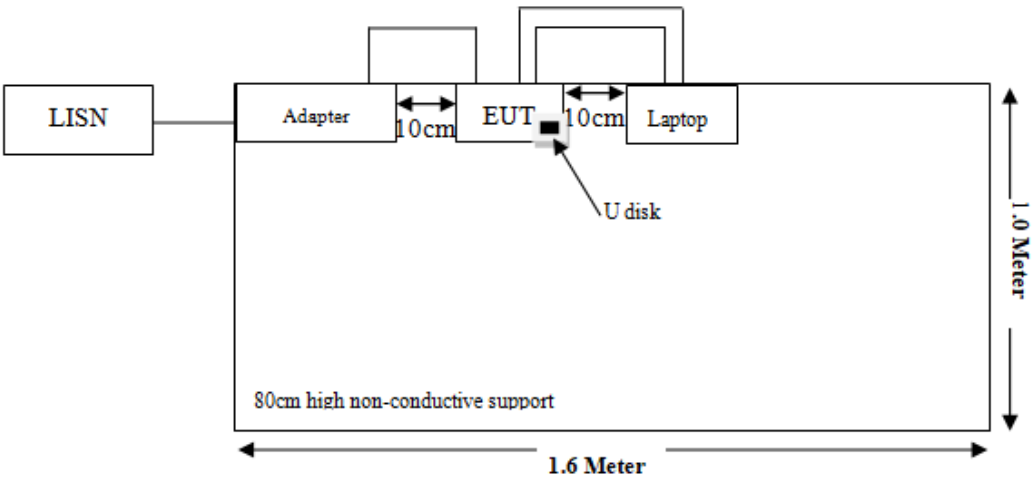
Manufacturer	Description	Model	Serial Number
Lenovo	Laptop	T480	PF1P5K4F
Kingston	U disk	DTSE9G3	Unknown

External I/O Cable

Cable Description	Length (m)	From Port	To
Network cable	1	EUT	Laptop
USB cable	1	EUT	Laptop

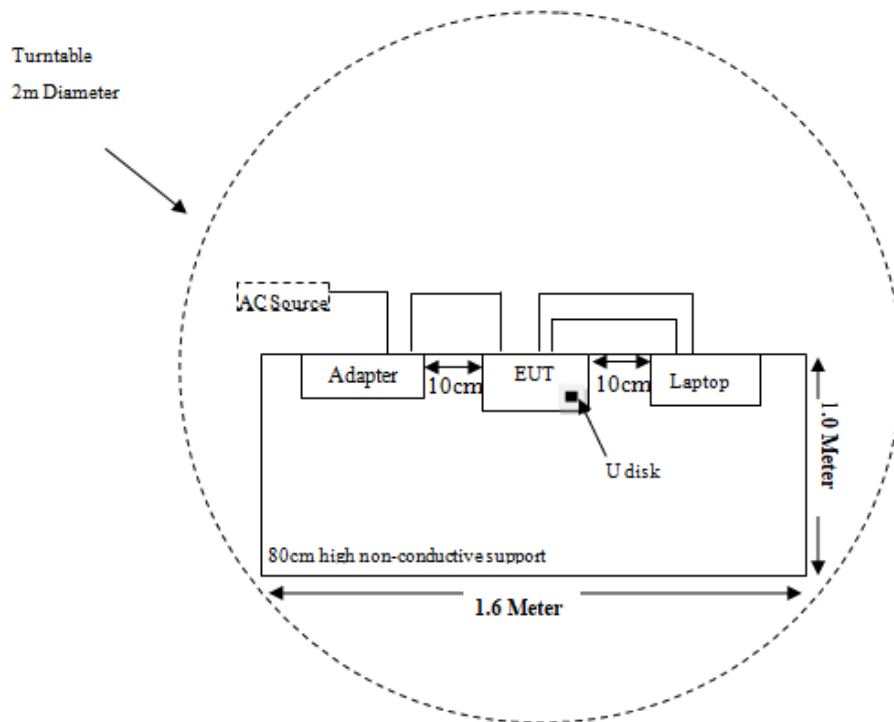
Block Diagram of Test Setup

Conducted Emission:

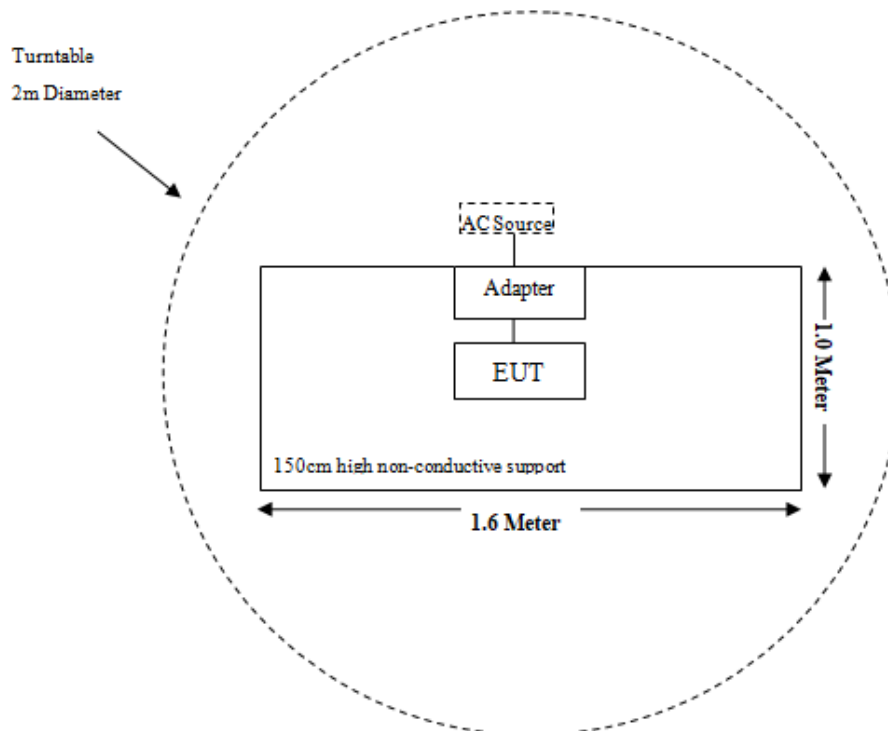


Radiated Emissions:

Below 1GHz



Above 1GHz



SUMMARY OF TEST RESULTS

FCC Rules	Description of Test	Result
§15.203	Antenna Requirement	Compliant
§15.207 (a)	AC Power Line Conducted Emissions	Compliant
§15.205, §15.209, §15.407(b)	Radiated Spurious Emissions	Compliant
§15.407 (a)(e)	Emission Bandwidth	Compliant
§15.407(a)	Conducted Transmitter Output Power	Compliant
§15.407(a)	Power Spectral Density	Compliant

Note 1: For AC line conducted emissions, the maximum output power mode and channel was tested.

Note 2: For Radiated Spurious Emissions 9kHz~ 1GHz, the maximum output power mode and channel was tested.

Note 3: The system support 802.11a/n ht20/n ht40/ac vht20 /ac vht40 /ac vht80, modes 802.11ac vht20/vht40 reduced since the identical parameters with 802.11n ht20 and ht40.

TEST EQUIPMENT LIST

Test Equipment	Manufacturer	Model	Serial Number	Calibration Date	Calibration Due Date
Conducted Emissions					
EMI Test Receiver	Rohde & Schwarz	ESR	103105	2024/03/29	2025/03/28
LISN	Rohde & Schwarz	ENV216	100129	2024/03/29	2025/03/28
Pulse Limiter	Rohde & Schwarz	ESH3-Z2	0357.8810.54	2024/03/29	2025/03/28
Coaxial Cable	XINHANGWEIBO	XH400T-N-4M	CC001	2024/03/29	2025/03/28
Test Software	Audix	E3	18621a	N/A	N/A
Radiated Emissions Below 1GHz					
EMI Test Receiver	Rohde & Schwarz	ESR	103103	2024/03/29	2025/03/28
Loop Antenna	Rohde & Schwarz	HFH2-Z2	830749/001	2023/07/27	2026/07/26
Antenna	Sunol Sciences	JB6	A122022-5	2023/07/27	2026/07/26
Amplifier	Sonoma	310B	120903	2024/03/29	2025/03/28
Coaxial Cable	XINHANGWEIBO	XH400T-N-4M	CC002	2024/03/29	2025/03/28
Coaxial Cable	XINHANGWEIBO	XH460B-N-2M	CC006	2024/03/29	2025/03/28
Coaxial Cable	XINHANGWEIBO	XH460B-N-12M	CC007	2024/03/29	2025/03/28
Coaxial Cable	XINHANGWEIBO	HFH2-CC	335.3609	2024/03/29	2025/03/28
Test Software	Audix	E3	18621a	N/A	N/A
Radiated Emissions Above 1 GHz					
Spectrum Analyzer	Rohde & Schwarz	FSV40-N	102051	2024/03/29	2025/03/28
Double Ridge Guide Horn Antenna	A.H.Systems	SAS-571	1980	2023/07/28	2026/07/27
Horn Antenna	EMCO	3115	9002-3355	2024/11/19	2027/11/18
Horn Antenna	EMCO	3116	9407-2232	2023/07/31	2026/07/30
Preamplifier	A.H.Systems	PAM-0118P	489	2024/03/29	2025/03/28
Preamplifier	A.H.Systems	PAM-1840	200	2024/03/29	2025/03/28
Filter Switch Unit	Decentest	DT7220FSU	DS79904	2024/02/23	2025/02/22
Multiplex Switch Test Control Set	Decentest	DT7220SCU	DS79901	2024/02/23	2025/02/22
Coaxial Cable	XINHANGWEIBO	XH800A-N-6M	CC003	2024/03/29	2025/03/28
Coaxial Cable	XINHANGWEIBO	XH800A-N-1M	CC005	2024/03/29	2025/03/28
Coaxial Cable	XINHANGWEIBO	XH360A-2.92-3M	CC008	2024/03/29	2025/03/28
Coaxial Cable	XINHANGWEIBO	XH360A-2.92-1M	CC009	2024/03/29	2025/03/28
Test Software	Audix	E3	18621a	N/A	N/A
RF Conducted Test					
Spectrum Analyzer	Rohde & Schwarz	FSU	100405	2024/03/29	2025/03/28
Spectrum Analyzer	Rohde & Schwarz	FSV40-N	102051	2024/03/29	2025/03/28
Coaxial Cable	Lianxun	RF113	N/A	2024/03/29	2025/03/28
USB Wideband Power Sensor	Boonton	55318	8934	2023/09/20	2024/09/19

Statement of Traceability: Bay Area Compliance Laboratories Corp. (Xiamen) attests that all calibrations have been performed in accordance to requirements that traceable to National Primary Standards and International System of Units (SI).

FCC §15.203 – ANTENNA REQUIREMENT

Applicable Standard

According to § 15.203, 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 shall be considered sufficient to comply with the provisions of this section. The manufacturer may design the unit so that a broken antenna can be replaced by the user, but the user of a standard antenna jack or electrical connector is prohibited. The structure and application of the EUT were analyzed to determine compliance with section §15.203 of the rules. §15.203 state that the subject device must meet the following criteria:

- a. Antenna must be permanently attached to the unit.
- b. Antenna must use a unique type of connector to attach to the EUT.
- c. Unit must be professionally installed, and installer shall be responsible for verifying that the correct antenna is employed with the unit.

And according to FCC 47 CFR section 15.407, if the transmitting antennas of directional gain greater than 6dBi are used, the power shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.

Antenna Connector Construction

For NLS-NQuire1500, the EUT has an FPC antenna for 5G Wi-Fi which the max. antenna gain is 4.02dBi, fulfill the requirement of this section. Please refer to the EUT photos.

For NLS-NQuire500, the EUT has an FPC antenna for 5G Wi-Fi which the max. antenna gain is 3.82dBi, fulfill the requirement of this section. Please refer to the EUT photos.

For NLS-NQuire700, the EUT has an FPC antenna for 5G Wi-Fi which the max. antenna gain is 3.67dBi, fulfill the requirement of this section. Please refer to the EUT photos.

For NLS-NQuire1000, the EUT has an FPC antenna for 5G Wi-Fi which the max. antenna gain is 4.59dBi, fulfill the requirement of this section. Please refer to the EUT photos.

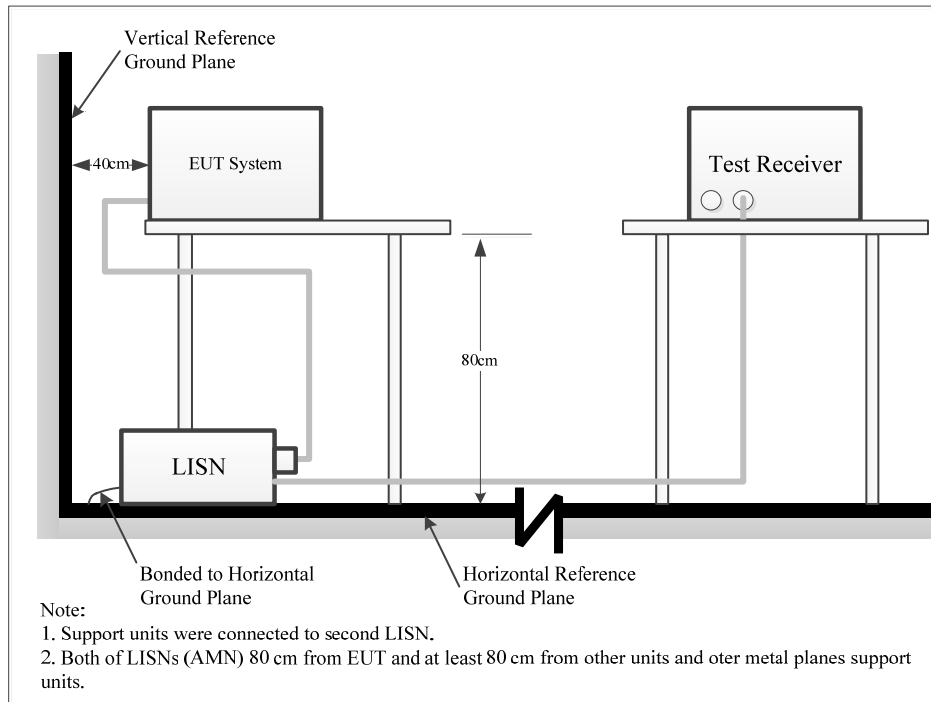
Result: Compliant.

FCC §15.207 (a) – AC POWER LINE CONDUCTED EMISSIONS

Applicable Standard

FCC §15.207(a)

Test System Setup



The setup of EUT is according with per ANSI C63.10-2013 measurement procedure. The specification used was with the FCC Part 15.207 limits.

The spacing between the peripherals was 10 cm.

EMI Test Receiver Setup

The EMI test receiver was set to investigate the spectrum from 150 kHz to 30 MHz

During the conducted emission test, the EMI test receiver was set with the following configurations:

Frequency Range	IF B/W
150 kHz – 30 MHz	9 kHz

Test Procedure

The frequency and amplitude of the six highest ac power-line conducted emissions relative to the limit, measured over all the current-carrying conductors of the EUT power cords, and the operating frequency or frequency to which the EUT is tuned (if appropriate), should be reported, unless such emissions are more than 20 dB below the limit. AC power-line conducted emissions measurements are to be separately carried out only on each of the phase (“hot”) line(s) and (if used) on the neutral line(s), but not on the ground [protective earth] line(s). If less than six emission frequencies are within 20 dB of the limit, then the noise level of the measuring instrument at representative frequencies should be reported. The specific conductor of the power-line cord for each of the reported emissions should be identified. Measure the six highest emissions with respect to the limit on each current-carrying conductor of each power cord associated with the EUT (but not the power cords of associated or peripheral equipment that are part of the test configuration). Then, report the six highest emissions with respect to the limit from among all the measurements identifying the frequency and specific current-carrying conductor identified with the emission. The six highest emissions should be reported for each of the current-carrying conductors, or the six highest emissions may be reported over all the current-carrying conductors.

Result & Over Limit Calculation

The Result is calculated by adding LISN VDF (Voltage Division Factor), Cable Loss and Transient Limiter Attenuation from the Meter Reading. The basic equation is as follows:

$$\begin{aligned}\text{Factor (dB)} &= \text{LISN VDF (dB)} + \text{Cable Loss (dB)} + \text{Transient Limiter Attenuation (dB)} \\ \text{Result (dB}\mu\text{V)} &= \text{Read level (dB}\mu\text{V)} + \text{Factor (dB)}\end{aligned}$$

The “**Margin**” column of the following data tables indicates the degree of compliance with the applicable limit. For example, a margin of 7dB means the emission is 7dB below the limit. The equation for margin calculation is as follows:

$$\text{Margin (dB)} = \text{Limit (dB}\mu\text{V)} - \text{Result (dB}\mu\text{V)}$$

Test Results Summary

According to the recorded data in following table, the EUT complied with the FCC Part 15.207.

Test Data

Environmental Conditions & Test Information

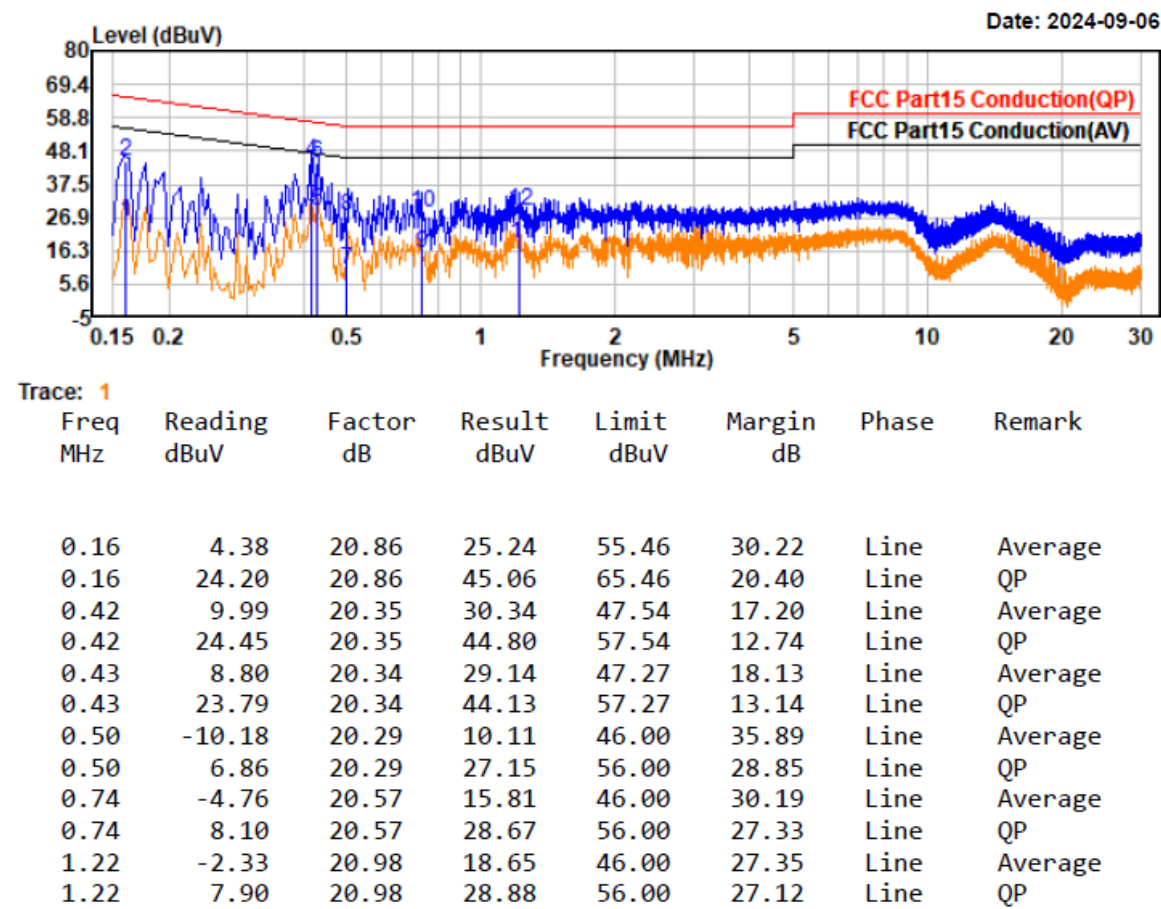
Temperature:	22.9 °C
Relative Humidity:	53 %
ATM Pressure:	100.1 kPa
Test Date:	2024-09-06
Test Engineer:	Spike Gao

EUT operation mode: Transmitting in 802.11a mode high channel (worst case).

EUT Model: NLS-NQuire1500

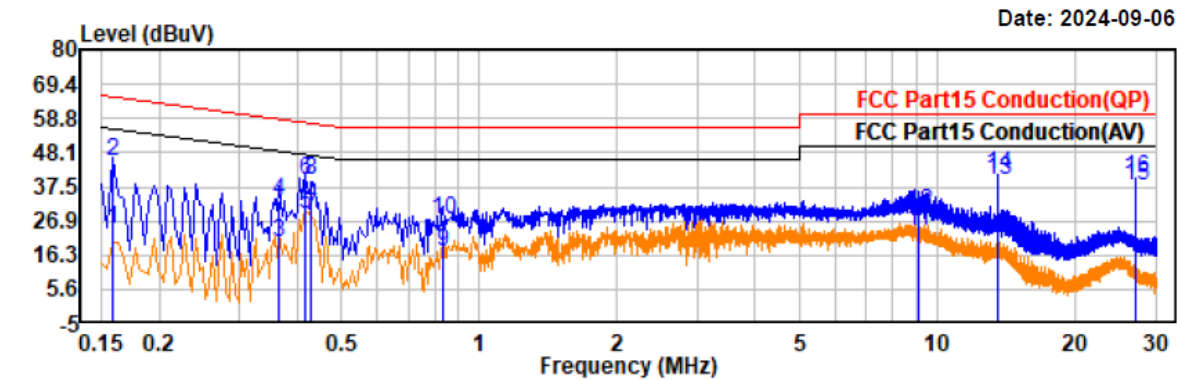
Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-NQuire1500

Temp/Humi/ATM: 22.9°C/53%/100.1kPa
Tested by: Spike Gao
Power Source: AC 120V/60Hz



Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-NQuire1500

Temp/Humi/ATM: 22.9°C/53%/100.1kPa
Tested by: Spike Gao
Power Source: AC 120V/60Hz



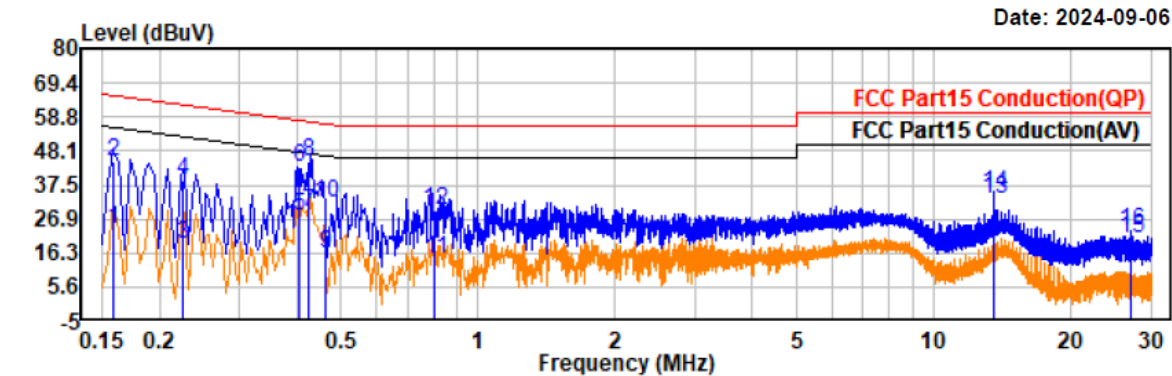
Trace: 1

Freq MHz	Reading dBuV	Factor dB	Result dBuV	Limit dBuV	Margin dB	Phase	Remark
0.16	3.37	20.73	24.10	55.56	31.46	Neutral	Average
0.16	24.66	20.73	45.39	65.56	20.17	Neutral	QP
0.37	-0.38	20.49	20.11	48.59	28.48	Neutral	Average
0.37	12.62	20.49	33.11	58.59	25.48	Neutral	QP
0.42	8.67	20.45	29.12	47.52	18.40	Neutral	Average
0.42	19.15	20.45	39.60	57.52	17.92	Neutral	QP
0.43	7.80	20.44	28.24	47.26	19.02	Neutral	Average
0.43	18.99	20.44	39.43	57.26	17.83	Neutral	QP
0.84	-3.37	20.61	17.24	46.00	28.76	Neutral	Average
0.84	6.38	20.61	26.99	56.00	29.01	Neutral	QP
9.11	2.78	20.80	23.58	50.00	26.42	Neutral	Average
9.11	8.96	20.80	29.76	60.00	30.24	Neutral	QP
13.56	18.38	21.01	39.39	50.00	10.61	Neutral	Average
13.56	20.03	21.01	41.04	60.00	18.96	Neutral	Peak
27.12	16.41	21.46	37.87	50.00	12.13	Neutral	Average
27.12	18.64	21.46	40.10	60.00	19.90	Neutral	Peak

EUT Model: NLS-NQuire500

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-NQuire500

Temp/Humi/ATM: 22.9°C/53%/100.1kPa
Tested by: Spike Gao
Power Source: AC 120V/60Hz



Trace: 1

Freq MHz	Reading dBuV	Factor dB	Result dBuV	Limit dBuV	Margin dB	Phase	Remark
0.16	2.65	20.88	23.53	55.56	32.03	Line	Average
0.16	23.96	20.88	44.84	65.56	20.72	Line	QP
0.22	-1.36	20.53	19.17	52.66	33.49	Line	Average
0.22	18.67	20.53	39.20	62.66	23.46	Line	QP
0.41	7.48	20.36	27.84	47.74	19.90	Line	Average
0.41	22.82	20.36	43.18	57.74	14.56	Line	QP
0.43	8.78	20.34	29.12	47.33	18.21	Line	Average
0.43	24.45	20.34	44.79	57.33	12.54	Line	QP
0.46	-4.15	20.32	16.17	46.67	30.50	Line	Average
0.46	11.90	20.32	32.22	56.67	24.45	Line	QP
0.80	-6.36	20.66	14.30	46.00	31.70	Line	Average
0.80	8.88	20.66	29.54	56.00	26.46	Line	QP
13.55	12.44	20.80	33.24	50.00	16.76	Line	Average
13.55	14.14	20.80	34.94	60.00	25.06	Line	QP
27.08	-0.56	21.50	20.94	50.00	29.06	Line	Average
27.08	1.66	21.50	23.16	60.00	36.84	Line	QP

Project No.: 2407V20721E-RF

Test Mode: 11a-5240

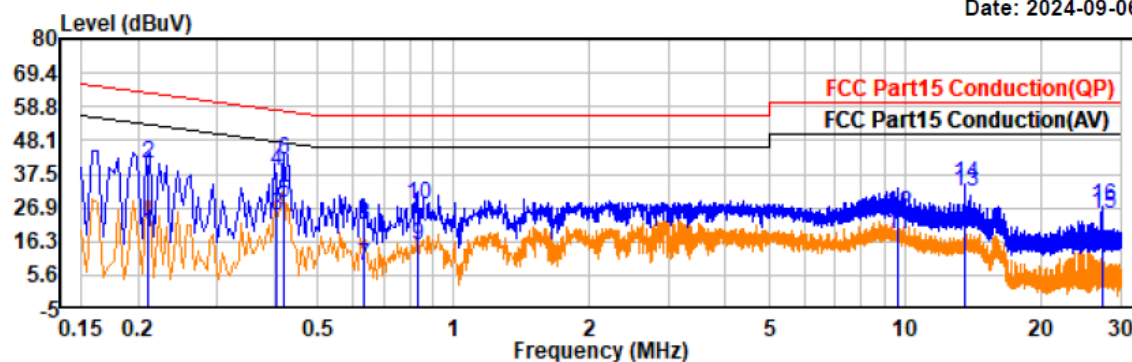
EUT Model: NLS-NQuire500

Temp/Humi/ATM: 22.9°C/53%/100.1kPa

Tested by: Spike Gao

Power Source: AC 120V/60Hz

Date: 2024-09-06



Trace: 1

Freq MHz	Reading dBuV	Factor dB	Result dBuV	Limit dBuV	Margin dB	Phase	Remark
0.21	-1.42	20.65	19.23	53.16	33.93	Neutral	Average
0.21	20.11	20.65	40.76	63.16	22.40	Neutral	QP
0.41	4.02	20.46	24.48	47.74	23.26	Neutral	Average
0.41	18.17	20.46	38.63	57.74	19.11	Neutral	QP
0.42	7.81	20.45	28.26	47.46	19.20	Neutral	Average
0.42	21.18	20.45	41.63	57.46	15.83	Neutral	QP
0.63	-12.03	20.33	8.30	46.00	37.70	Neutral	Average
0.63	1.26	20.33	21.59	56.00	34.41	Neutral	QP
0.84	-5.39	20.61	15.22	46.00	30.78	Neutral	Average
0.84	7.16	20.61	27.77	56.00	28.23	Neutral	QP
9.60	-2.21	20.76	18.55	50.00	31.45	Neutral	Average
9.60	4.22	20.76	24.98	60.00	35.02	Neutral	QP
13.57	11.14	21.01	32.15	50.00	17.85	Neutral	Average
13.57	13.41	21.01	34.42	60.00	25.58	Neutral	QP
27.26	3.68	21.43	25.11	50.00	24.89	Neutral	Average
27.26	5.89	21.43	27.32	60.00	32.68	Neutral	QP

EUT Model: NLS-Nquire700

Project No.: 2407V20721E-RF

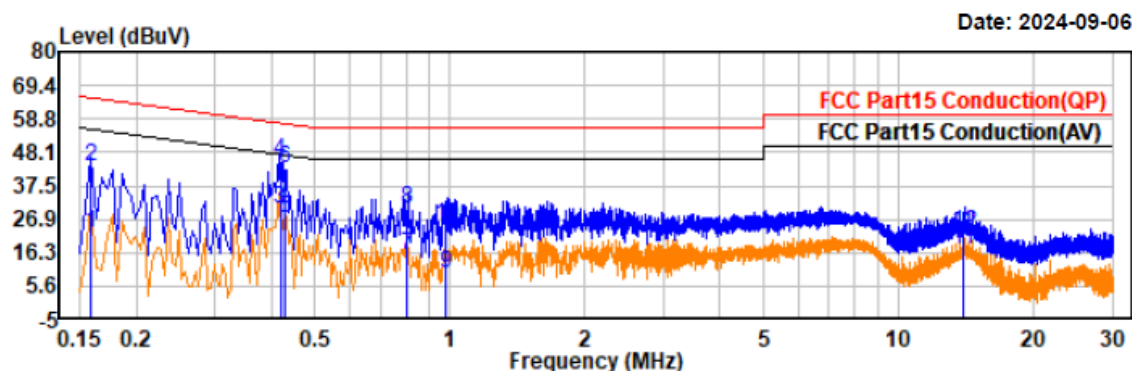
Test Mode: 11a-5240

EUT Model: NLS-Nquire700

Temp/Humi/ATM: 22.9°C/53%/100.1kPa

Tested by: Spike Gao

Power Source: AC 120V/60Hz

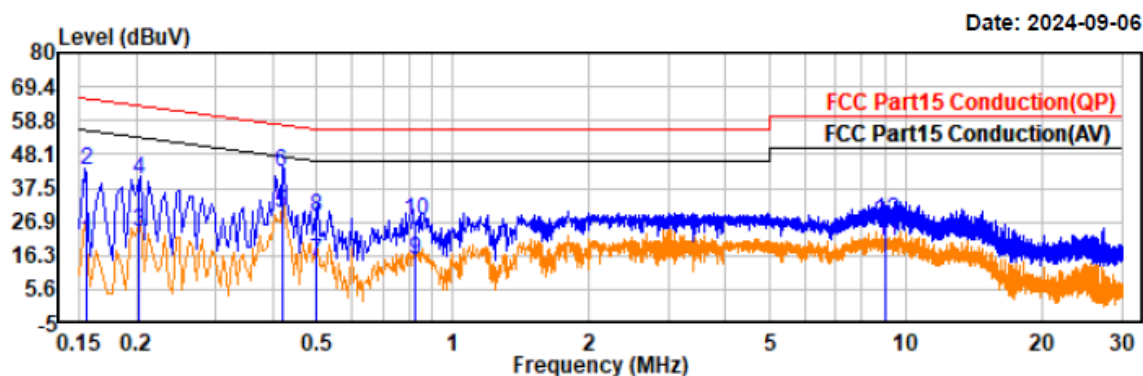


Trace: 1

Freq MHz	Reading dBuV	Factor dB	Result dBuV	Limit dBuV	Margin dB	Phase	Remark
0.16	1.80	20.87	22.67	55.51	32.84	Line	Average
0.16	22.52	20.87	43.39	65.51	22.12	Line	QP
0.42	10.08	20.35	30.43	47.46	17.03	Line	Average
0.42	25.00	20.35	45.35	57.46	12.11	Line	QP
0.43	6.63	20.34	26.97	47.26	20.29	Line	Average
0.43	22.50	20.34	42.84	57.26	14.42	Line	QP
0.80	-5.33	20.67	15.34	46.00	30.66	Line	Average
0.80	9.23	20.67	29.90	56.00	26.10	Line	QP
0.98	-11.02	20.90	9.88	46.00	36.12	Line	Average
0.98	3.86	20.90	24.76	56.00	31.24	Line	QP
13.93	-3.83	20.83	17.00	50.00	33.00	Line	Average
13.93	1.81	20.83	22.64	60.00	37.36	Line	QP

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-NQuire700

Temp/Humi/ATM: 22.9°C/53%/100.1kPa
Tested by: Spike Gao
Power Source: AC 120V/60Hz



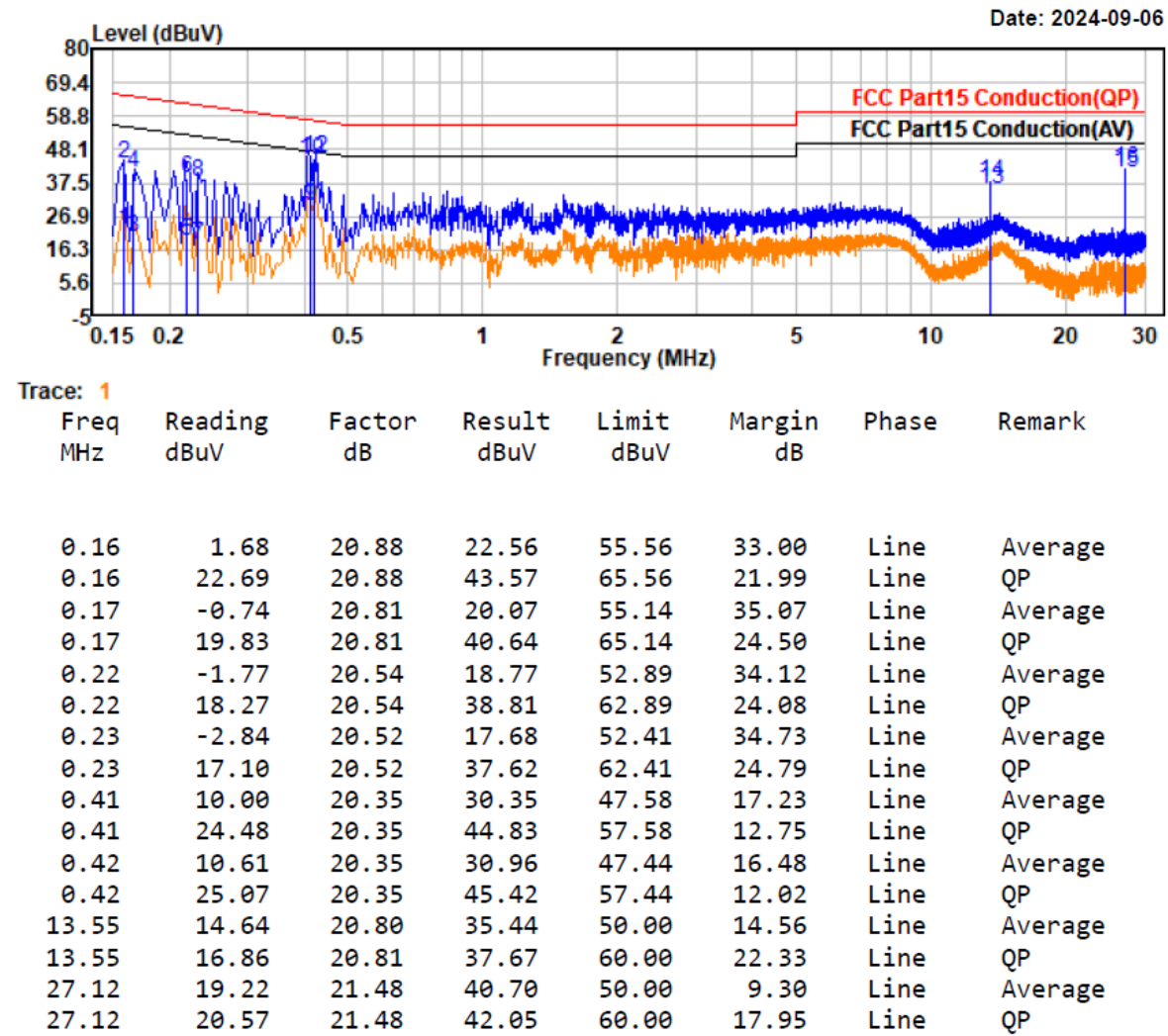
Trace: 1

Freq MHz	Reading dBUV	Factor dB	Result dBUV	Limit dBUV	Margin dB	Phase	Remark
0.16	-0.02	20.73	20.71	55.67	34.96	Neutral	Average
0.16	22.55	20.73	43.28	65.67	22.39	Neutral	QP
0.20	3.23	20.67	23.90	53.52	29.62	Neutral	Average
0.20	19.37	20.67	40.04	63.52	23.48	Neutral	QP
0.42	9.13	20.45	29.58	47.47	17.89	Neutral	Average
0.42	21.75	20.45	42.20	57.47	15.27	Neutral	QP
0.50	-5.99	20.39	14.40	46.00	31.60	Neutral	Average
0.50	7.93	20.39	28.32	56.00	27.68	Neutral	QP
0.82	-5.80	20.58	14.78	46.00	31.22	Neutral	Average
0.82	6.42	20.58	27.00	56.00	29.00	Neutral	QP
9.04	-0.23	20.80	20.57	50.00	29.43	Neutral	Average
9.04	6.30	20.80	27.10	60.00	32.90	Neutral	QP

EUT Model: NLS-Nquire1000

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-Nquire1000

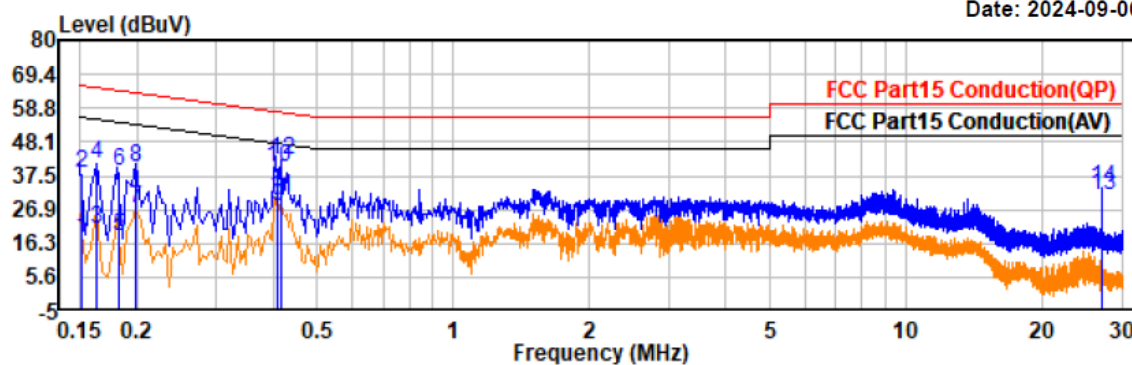
Temp/Humi/ATM: 22.9°C/53%/100.1kPa
Tested by: Spike Gao
Power Source: AC 120V/60Hz



Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-NQuire1000

Temp/Humi/ATM: 22.9°C/53%/100.1kPa
Tested by: Spike Gao
Power Source: AC 120V/60Hz

Date: 2024-09-06

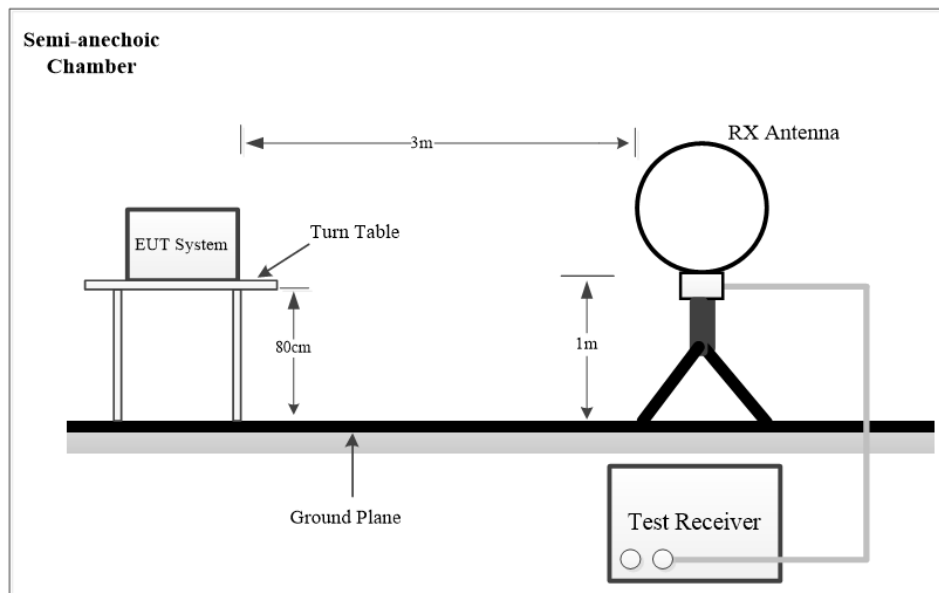
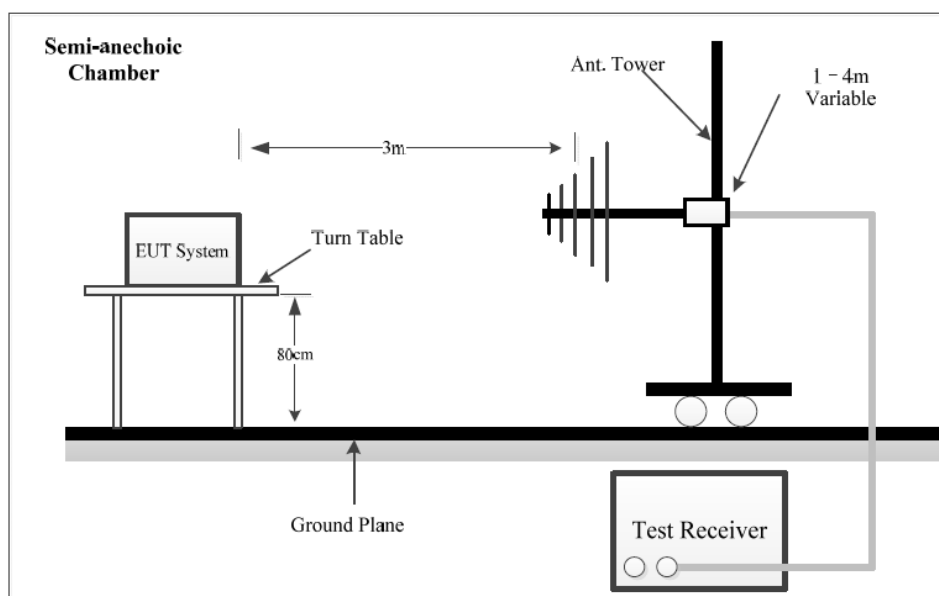


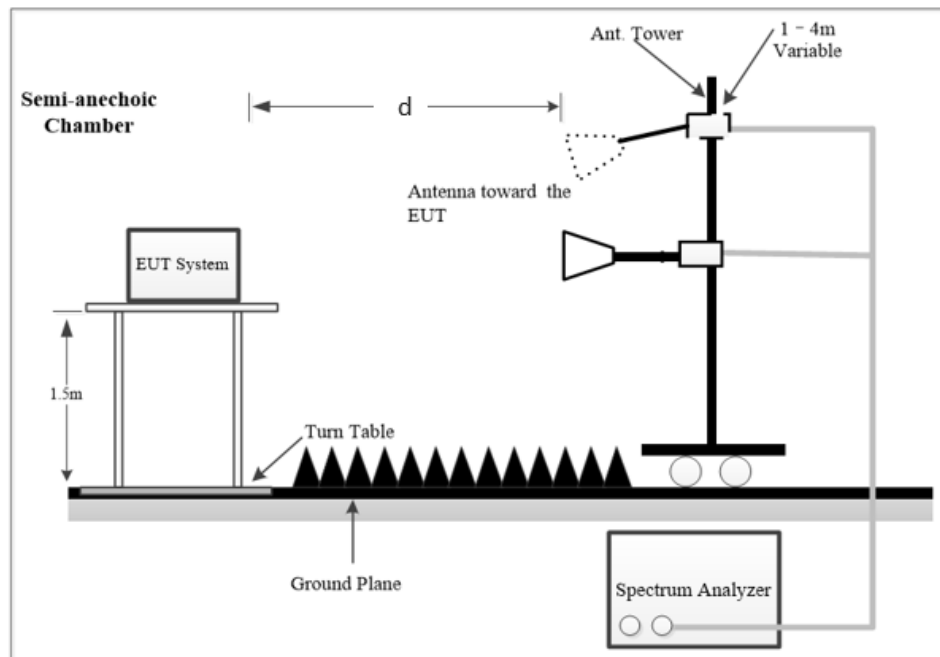
Trace: 1

Freq MHz	Reading dBuV	Factor dB	Result dBuV	Limit dBuV	Margin dB	Phase	Remark
0.15	-3.13	20.73	17.60	55.94	38.34	Neutral	Average
0.15	17.76	20.73	38.49	65.94	27.45	Neutral	QP
0.16	0.14	20.72	20.86	55.28	34.42	Neutral	Average
0.16	20.76	20.72	41.48	65.28	23.80	Neutral	QP
0.18	-2.19	20.68	18.49	54.37	35.88	Neutral	Average
0.18	18.47	20.68	39.15	64.37	25.22	Neutral	QP
0.20	6.78	20.67	27.45	53.62	26.17	Neutral	Average
0.20	19.72	20.67	40.39	63.62	23.23	Neutral	QP
0.41	7.38	20.46	27.84	47.67	19.83	Neutral	Average
0.41	19.67	20.46	40.13	57.67	17.54	Neutral	QP
0.42	10.10	20.45	30.55	47.54	16.99	Neutral	Average
0.42	21.93	20.45	42.38	57.54	15.16	Neutral	QP
27.11	10.09	21.47	31.56	50.00	18.44	Neutral	Average
27.11	12.11	21.47	33.58	60.00	26.42	Neutral	QP

FCC §15.205 & § 15.209 §15.407(b) – RADIATION SPURIOUS EMISSIONS**Applicable Standard**

FCC §15.407 (b); § 15.205 ; § 15.209

Test System Setup**9 kHz-30MHz:****30MHz -1 GHz:**

Above 1GHz:

The setup of EUT is according with per ANSI C63.10-2013 measurement procedure. The specification used was with the FCC 15.209 and FCC 15.407 limits.

The external I/O cables were draped along the test table and formed a bundle 30 to 40 cm long in the middle.

The spacing between the peripherals was 10 cm.

NOTE:

d is testing distance;

For Radiated Emission test (1GHz-18GHz) and Bandedge Emission test, which was performed at 3 m distance.

For Radiated Emission test (18GHz-40GHz), which was performed at 1.0 m distance, according to ANSI C63.10-2013, the test result shall be extrapolated to the specified distance using an extrapolation Factor of 20dB/decade from 3m to 1.5m.

Distance extrapolation Factor = $20 \log (\text{specific distance [3m]}/\text{test distance [1.5m]})$ dB = 6 dB

EMI Test Receiver & Spectrum Analyzer Setup

The system was investigated from 9 kHz to 40 GHz.

During the radiated emission test, the EMI test receiver Setup was set with the following configurations:

Below 1GHz:

Frequency Range	RBW	VBW	Measurement
9 kHz – 150 kHz	200Hz	1 kHz	PK
	200Hz	/	QP
150 kHz – 30 MHz	10 kHz	30 kHz	PK
	9kHz	/	QP
30 MHz – 1000 MHz	100 kHz	300 kHz	PK
	120kHz	/	QP

Above 1GHz:**Pre-scan:**

Duty Cycle	RBW	VBW	Measurement
Any	1MHz	3MHz	PK
>98%	1MHz	5kHz	AV
<98%	1MHz	≥1/T, not less than 5kHz	AV

Final measurement for emission identified during the pre-scan:

Duty Cycle	RBW	VBW	Measurement
Any	1MHz	3MHz	PK
>98%	1MHz	10Hz	AV
<98%	1MHz	1/T	AV

Note: T is minimum transmission duration

Test Procedure

Maximizing procedure was performed on the highest emissions to ensure that the EUT complied with all installation combinations.

For each measurement antenna alignment, the EUT shall be rotated through 0° to 360° on a turntable. The report shall list the six emissions with the smallest margin relative to the limit, for each of the three antenna orientations (parallel, perpendicular, and ground parallel) unless the margin is greater than 20 dB, then the following statement shall be made: “all emissions were greater than 20 dB below the limit.”

Below 1GHz, if the measured peak level of the emissions that the measuring receiver reading level plus corrected factor is at least 6 dB below the QP emission limit, there's no need to record the measured QP level of the emissions in the report.

Above 1GHz, if the measured peak level of the emissions that the measuring receiver reading level plus corrected factor is below the AV emission limit, there's no need to record the measured AV level of the emissions in the report.

Result & Margin Calculation

The Result is calculated by adding the Antenna Factor and Cable Loss, and subtracting the Amplifier Gain from the Meter Reading. The basic equation is as follows:

For 9 kHz to 18GHz Radiated emission test

Factor (dB/m) = Antenna Factor (dB/m) + Cable Loss (dB) - Amplifier Gain (dB)

For 18GHz to 40GHz Radiated emission test and Bandedge emissions test

Factor (dB/m) = Antenna Factor (dB/m) + Cable Loss (dB) - Amplifier Gain (dB) - Extrapolation factor (dB)

Extrapolation factor = 6dB (distance = 1.5m)

Result (dBμV/m) = Reading (dBμV) + Factor (dB/m)

The “**Margin**” column of the following data tables indicates the degree of compliance with the applicable limit. For example, a margin of 7dB means the emission is 7dB below the limit. The equation for margin calculation is as follows:

Margin (dB) = Limit (dBμV/m) – Result (dBμV/m)

Test Data

Please refer to the below table and plots.

Frequency Range:	Below 1 GHz	Above 1 GHz
Temperature:	22.5°C~24.1°C	21.5°C~24.5°C
Relative Humidity:	50%~56%	46%~55%
ATM Pressure:	100.1kPa~100.2kPa	100.1kPa
Test Date:	2024-08-31~2024-09-23	2024-09-07~2025-01-06
Test Engineer:	Wlif Wu	Wlif Wu

Note: Pre-scan in the X, Y and Z axes of orientation, the worst case Y-axis of orientation was recorded.

1) 9 kHz~30MHz

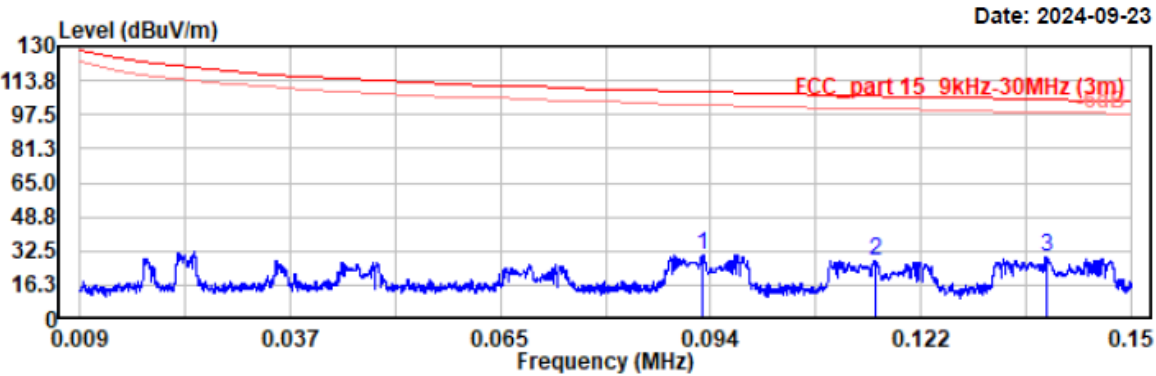
Pre-scan in parallel, ground-parallel and perpendicular of orientation of loop antenna, parallel is worst case

Note: The maximum output power mode: 802.11a mode high channel was tested.

EUT Model: NLS-Nquire1500

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-Nquire1500
Test distance: 3m

Temp/Humi/ATM: 23.6℃/56%/100.2kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Remark
0.093	11.08	19.79	30.87	108.28	77.41	Peak
0.116	8.37	19.73	28.10	106.34	78.24	Peak
0.139	9.78	19.73	29.51	104.77	75.26	Peak

Project No.: 2407V20721E-RF

Test Mode: 11a-5240

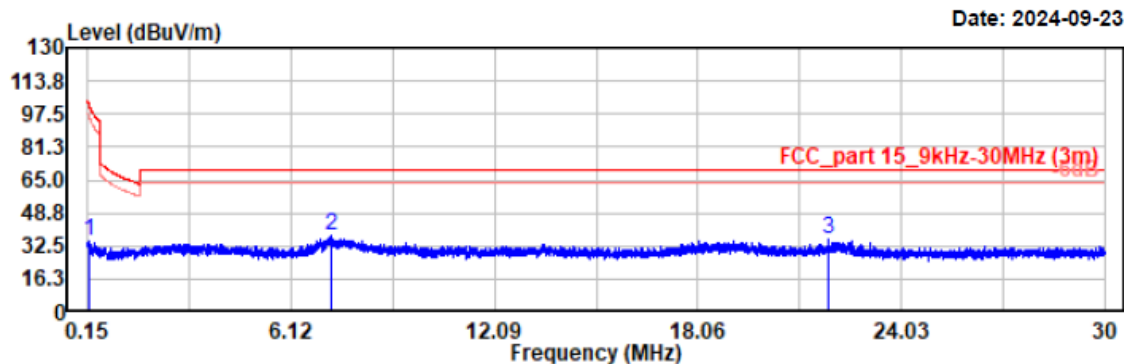
EUT Model: NLS-NQuire1500

Test distance: 3m

Temp/Humi/ATM: 23.6°C/56%/100.2kPa

Tested by: Wlif Wu

Power Source: AC120V/60Hz

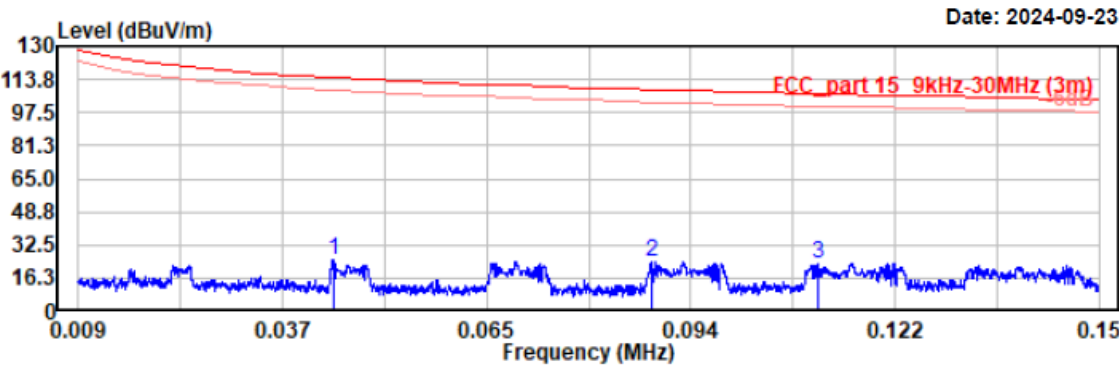


Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Remark
0.195	15.30	19.72	35.02	101.81	66.79	Peak
7.287	18.01	19.68	37.69	69.54	31.85	Peak
21.911	16.07	20.14	36.21	69.54	33.33	Peak

EUT Model: NLS-Nquire500

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-Nquire500
Test distance: 3m

Temp/Humi/ATM: 23.6℃/56%/100.2kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Remark
0.044	4.98	19.91	24.89	114.70	89.81	Peak
0.088	4.30	19.79	24.09	108.70	84.61	Peak
0.111	3.63	19.73	23.36	106.68	83.32	Peak

Project No.: 2407V20721E-RF

Test Mode: 11a-5240

EUT Model: NLS-NQuire500

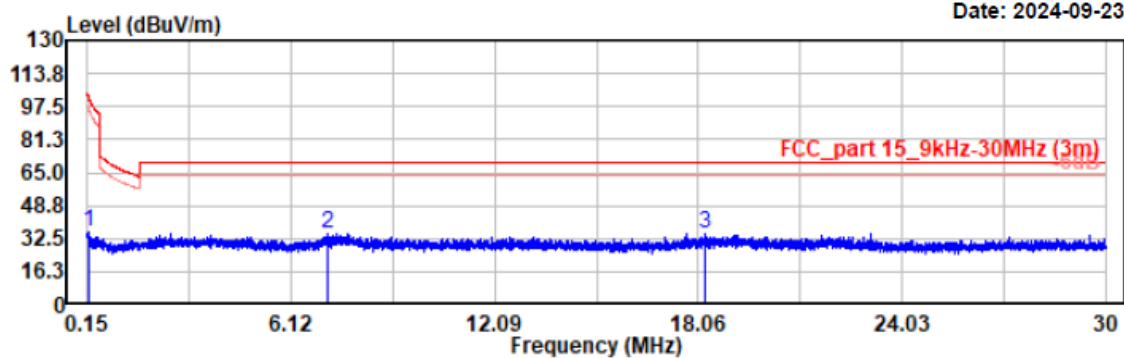
Test distance: 3m

Temp/Humi/ATM: 23.6°C/56%/100.2kPa

Tested by: Wlif Wu

Power Source: AC120V/60Hz

Date: 2024-09-23



EUT Model: NLS-Nquire700

Project No.: 2407V20721E-RF

Test Mode: 11a-5240

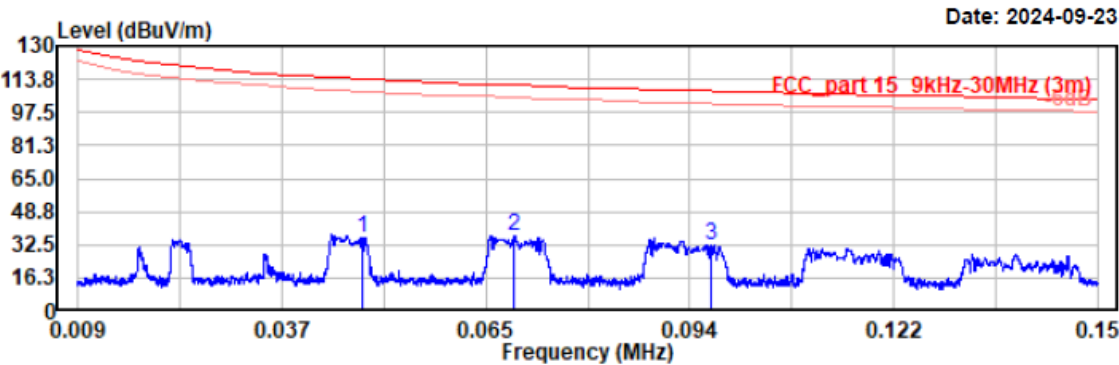
EUT Model: NLS-Nquire700

Test distance: 3m

Temp/Humi/ATM: 23.6℃/56%/100.2kPa

Tested by: Wlif Wu

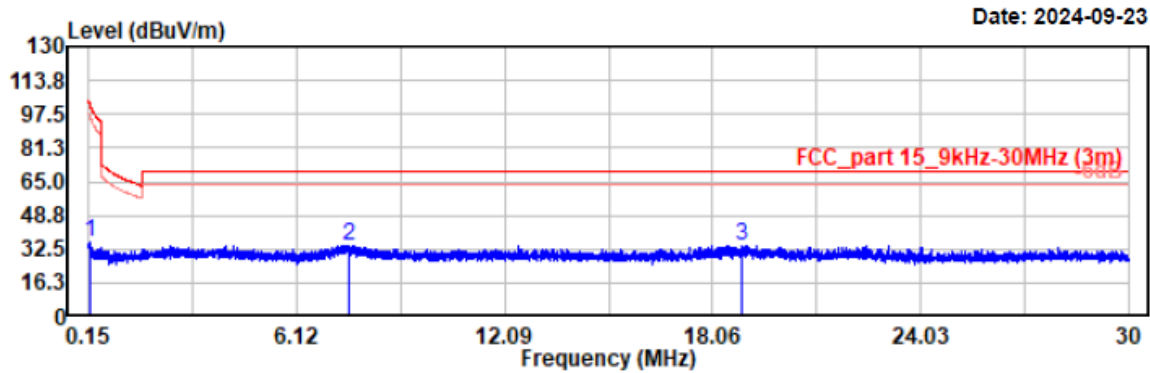
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Remark
0.048	16.25	19.91	36.16	113.94	77.78	Peak
0.069	17.17	19.82	36.99	110.78	73.79	Peak
0.097	12.77	19.75	32.52	107.91	75.39	Peak

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-NQuire700
Test distance: 3m

Temp/Humi/ATM: 23.6°C/56%/100.2kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz

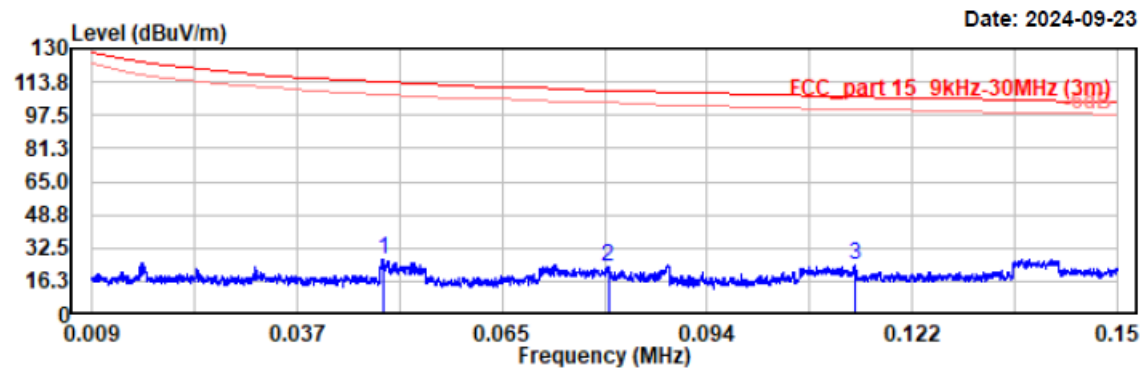


Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Remark
0.192	15.88	19.72	35.60	101.95	66.35	Peak
7.607	14.31	19.68	33.99	69.54	35.55	Peak
18.887	14.32	20.01	34.33	69.54	35.21	Peak

EUT Model: NLS-Nquire1000

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-Nquire1000
Test distance: 3m

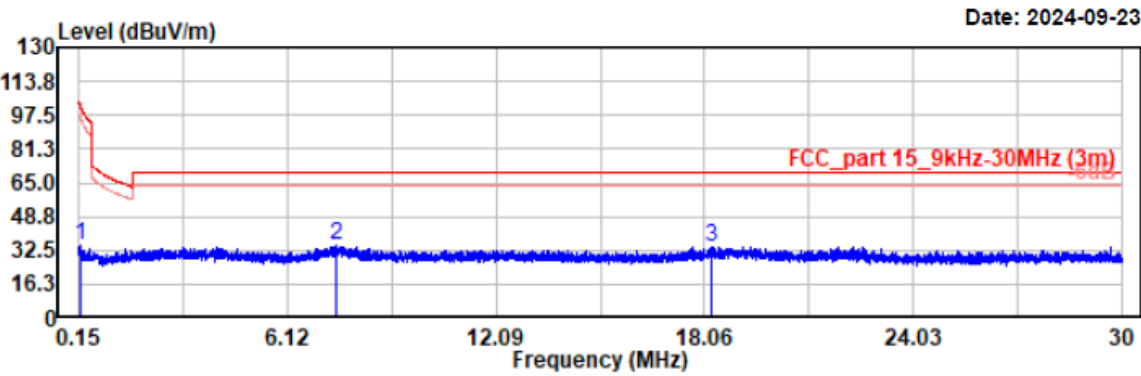
Temp/Humi/ATM: 23.6℃/56%/100.2kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Remark
0.049	6.96	19.91	26.87	113.81	86.94	Peak
0.080	3.53	19.71	23.24	109.54	86.30	Peak
0.114	4.41	19.73	24.14	106.47	82.33	Peak

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-NQuire1000
Test distance: 3m

Temp/Humi/ATM: 23.6°C/56%/100.2kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Remark
0.174	14.85	19.72	34.57	102.80	68.23	Peak
7.538	15.12	19.68	34.80	69.54	34.74	Peak
18.245	14.35	19.97	34.32	69.54	35.22	Peak

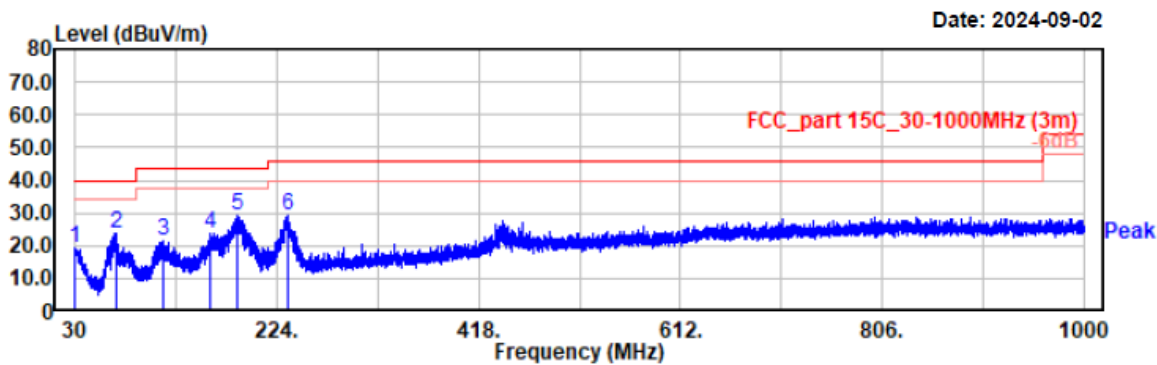
2) 30 MHz-1GHz

Note: The maximum output power mode: 802.11a mode high channel was tested.

EUT Model: NLS-Nquire1500

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-Nquire1500
Test distance: 3m

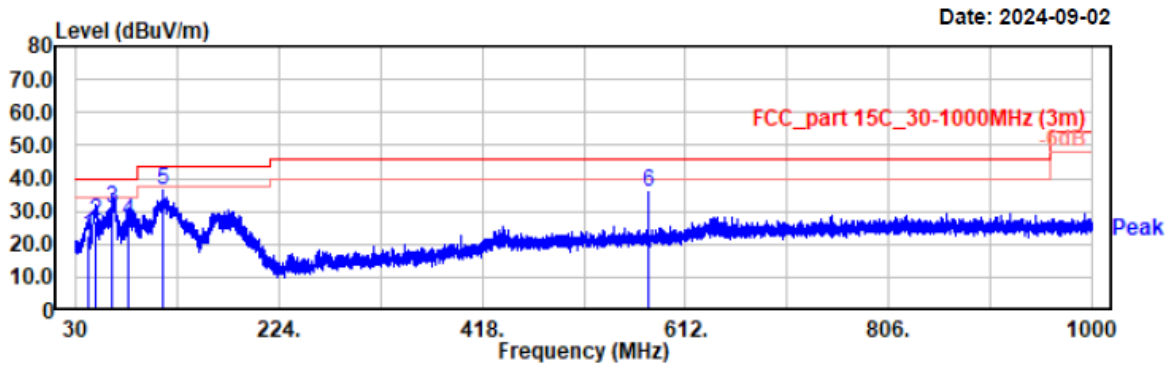
Temp/Humi/ATM: 23.2℃/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
30.29	25.20	-5.68	19.52	40.00	20.48	Horizontal	QP
68.90	41.18	-17.18	24.00	40.00	16.00	Horizontal	QP
114.29	32.38	-11.12	21.26	43.50	22.24	Horizontal	QP
160.56	35.50	-11.50	24.00	43.50	19.50	Horizontal	QP
186.56	41.66	-12.43	29.23	43.50	14.27	Horizontal	QP
234.67	41.17	-12.04	29.13	46.00	16.87	Horizontal	QP

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-NQuire1500
Test distance: 3m

Temp/Humi/ATM: 23.2℃/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz

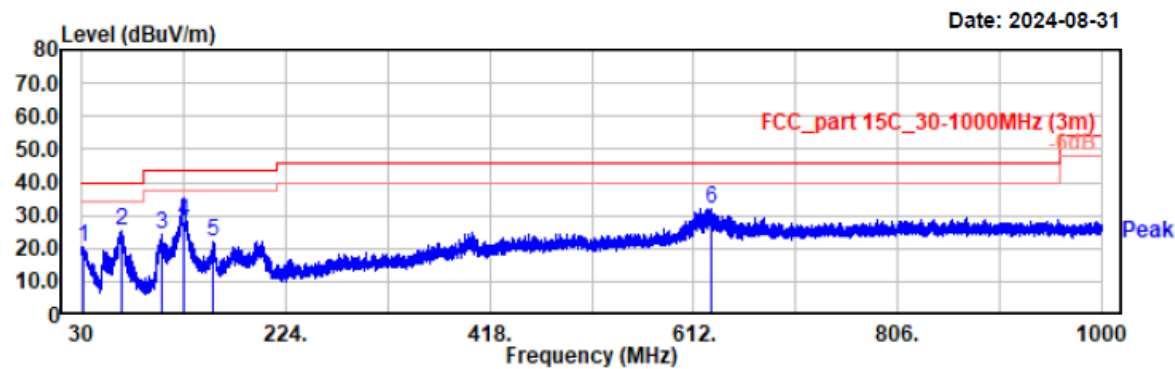


Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
41.64	35.35	-12.82	22.53	40.00	17.47	Vertical	QP
49.50	44.26	-17.29	26.97	40.00	13.03	Vertical	QP
64.53	48.16	-17.30	30.86	40.00	9.14	Vertical	QP
80.25	44.32	-17.07	27.25	40.00	12.75	Vertical	QP
113.71	47.75	-11.25	36.50	43.50	7.00	Vertical	QP
576.01	38.52	-2.54	35.98	46.00	10.02	Vertical	QP

EUT Model: NLS-Nquire500

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-Nquire500
Test distance: 3m

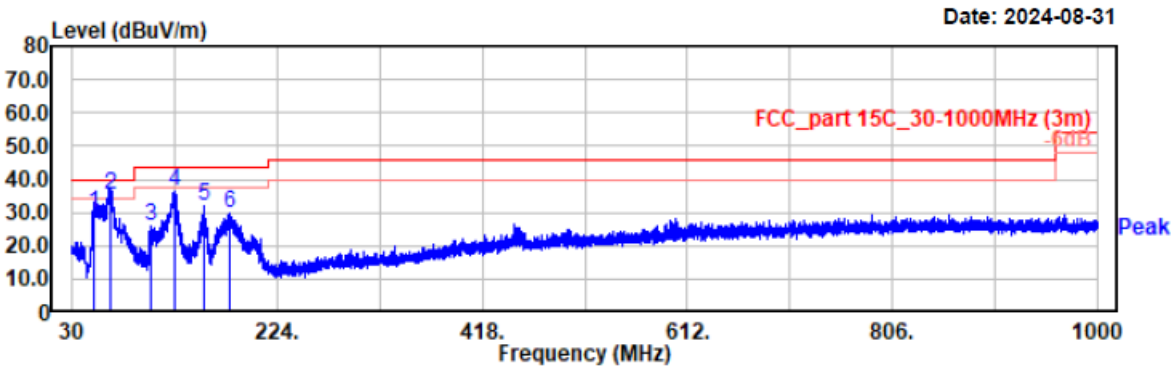
Temp/Humi/ATM: 22.5°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
31.46	26.54	-6.10	20.44	40.00	19.56	Horizontal	QP
68.32	42.33	-17.13	25.20	40.00	14.80	Horizontal	QP
105.37	37.39	-13.24	24.15	43.50	19.35	Horizontal	QP
126.22	38.17	-9.95	28.22	43.50	15.28	Horizontal	QP
154.94	33.44	-11.40	22.04	43.50	21.46	Horizontal	QP
629.17	33.25	-1.38	31.87	46.00	14.13	Horizontal	QP

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-NQuire500
Test distance: 3m

Temp/Humi/ATM: 22.5°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
50.18	47.01	-17.37	29.64	40.00	10.36	Vertical	QP
65.47	52.46	-17.29	35.17	40.00	4.83	Vertical	QP
104.79	39.12	-13.45	25.67	43.50	17.83	Vertical	QP
127.10	46.34	-10.02	36.32	43.50	7.18	Vertical	QP
154.94	43.58	-11.40	32.18	43.50	11.32	Vertical	QP
179.77	42.07	-12.34	29.73	43.50	13.77	Vertical	QP

EUT Model: NLS-Nquire700

Project No.: 2407V20721E-RF

Test Mode: 11a-5240

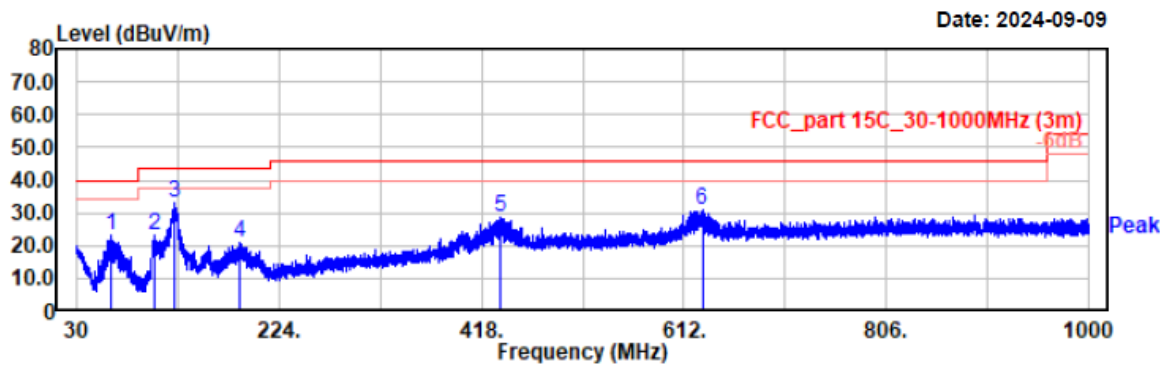
EUT Model: NLS-Nquire700

Test distance: 3m

Temp/Humi/ATM: 24.1℃/55%/100.1kPa

Tested by: Wlif Wu

Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
63.47	40.45	-17.36	23.09	40.00	16.91	Horizontal	Peak
103.72	36.82	-13.83	22.99	43.50	20.51	Horizontal	Peak
123.90	42.99	-9.95	33.04	43.50	10.46	Horizontal	Peak
186.27	33.33	-12.49	20.84	43.50	22.66	Horizontal	Peak
435.56	34.06	-5.26	28.80	46.00	17.20	Horizontal	Peak
629.65	32.10	-1.38	30.72	46.00	15.28	Horizontal	Peak

Project No.: 2407V20721E-RF

Test Mode: 11a-5240

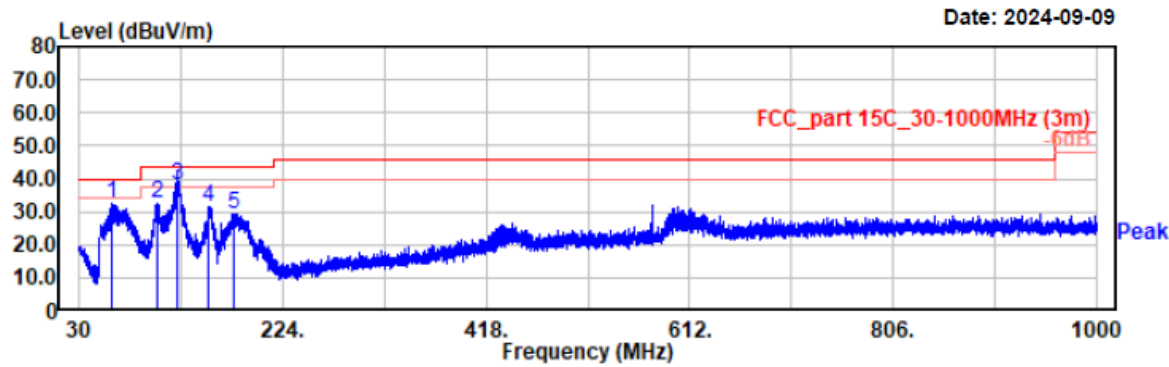
EUT Model: NLS-NQuire700

Test distance: 3m

Temp/Humi/ATM: 24.1℃/55%/100.1kPa

Tested by: Wlif Wu

Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
61.82	49.78	-17.44	32.34	40.00	7.66	Vertical	Peak
104.11	46.10	-13.72	32.38	43.50	11.12	Vertical	Peak
123.52	47.95	-9.95	38.00	43.50	5.50	Vertical	QP
153.77	42.67	-11.23	31.44	43.50	12.06	Vertical	Peak
177.34	41.64	-12.19	29.45	43.50	14.05	Vertical	Peak

EUT Model: NLS-Nquire1000

Project No.: 2407V20721E-RF

Test Mode: 11a-5240

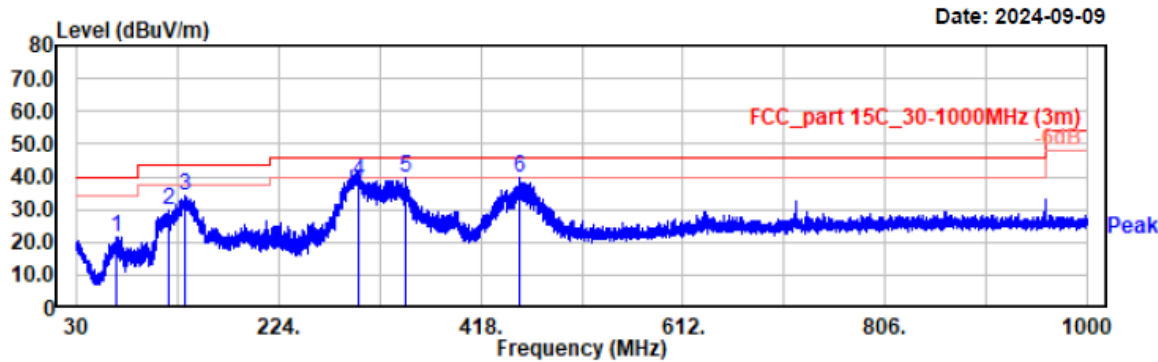
EUT Model: NLS-Nquire1000

Test distance: 3m

Temp/Humi/ATM: 24.1°C/55%/100.1kPa

Tested by: Wlif Wu

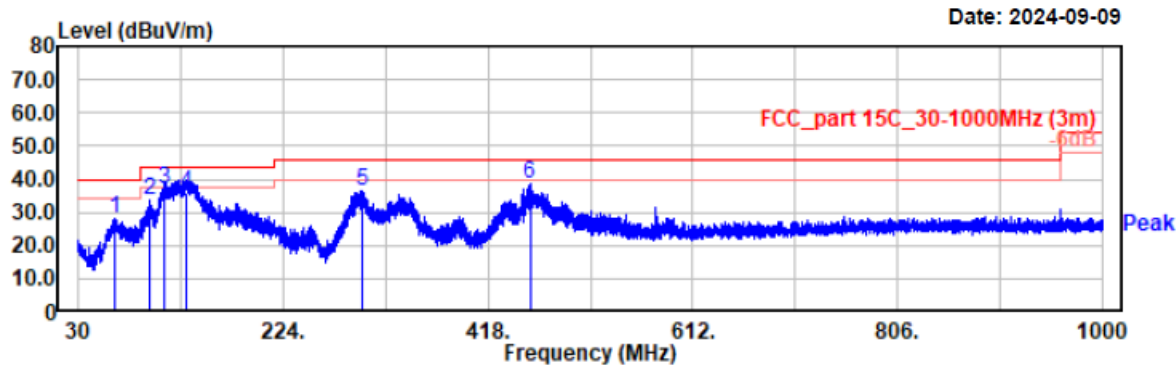
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
68.02	38.65	-17.10	21.55	40.00	18.45	Horizontal	Peak
117.79	40.43	-10.53	29.90	43.50	13.60	Horizontal	Peak
133.60	44.40	-10.25	34.15	43.50	9.35	Horizontal	Peak
300.44	48.05	-9.17	38.88	46.00	7.12	Horizontal	QP
345.25	47.74	-8.22	39.52	46.00	6.48	Horizontal	Peak
455.54	44.45	-4.70	39.75	46.00	6.25	Horizontal	Peak

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-NQuire1000
Test distance: 3m

Temp/Humi/ATM: 24.1℃/55%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
64.82	45.27	-17.27	28.00	40.00	12.00	Vertical	Peak
97.61	49.32	-15.58	33.74	43.50	9.76	Vertical	Peak
112.16	48.64	-11.53	37.11	43.50	6.39	Vertical	QP
132.43	46.00	-10.16	35.84	43.50	7.66	Vertical	QP
299.37	45.65	-9.18	36.47	46.00	9.53	Vertical	Peak
457.77	43.28	-4.68	38.60	46.00	7.40	Vertical	Peak

3) 1GHz~6GHz

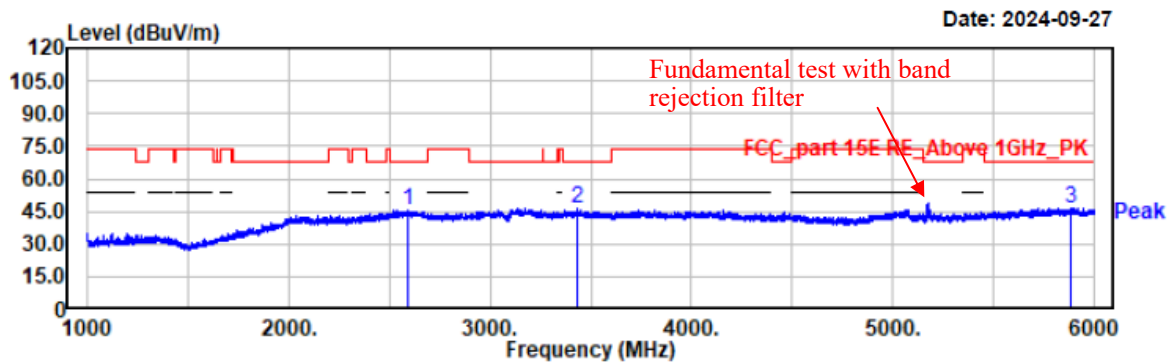
EUT operation mode: Transmitting in Y-axis of orientation (worst case)

EUT Model: NLS-Nquire1500

Band 1:

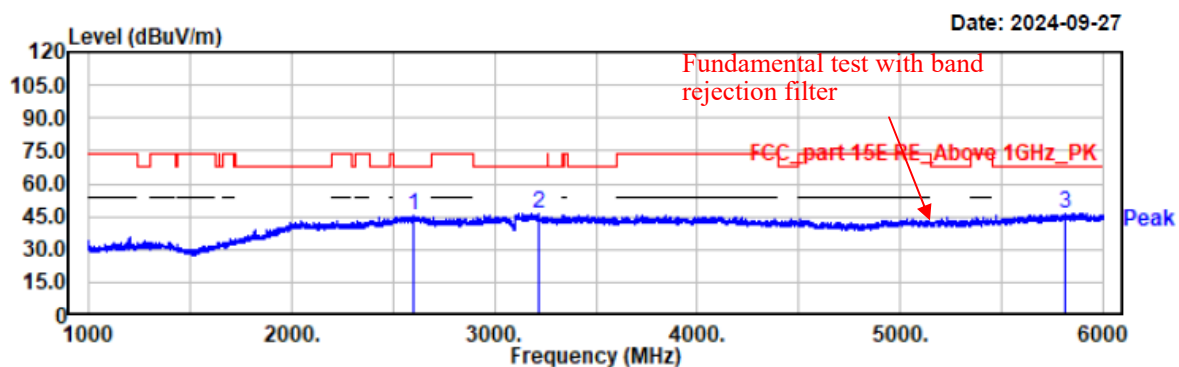
Project No.: 2407V20721E-RF
Test Mode: 11a-5180
EUT Model: NLS-Nquire1500
Test distance: 3m

Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Project No.: 2407V20721E-RF
Test Mode: 11a-5180
EUT Model: NLS-NQuire1500
Test distance: 3m

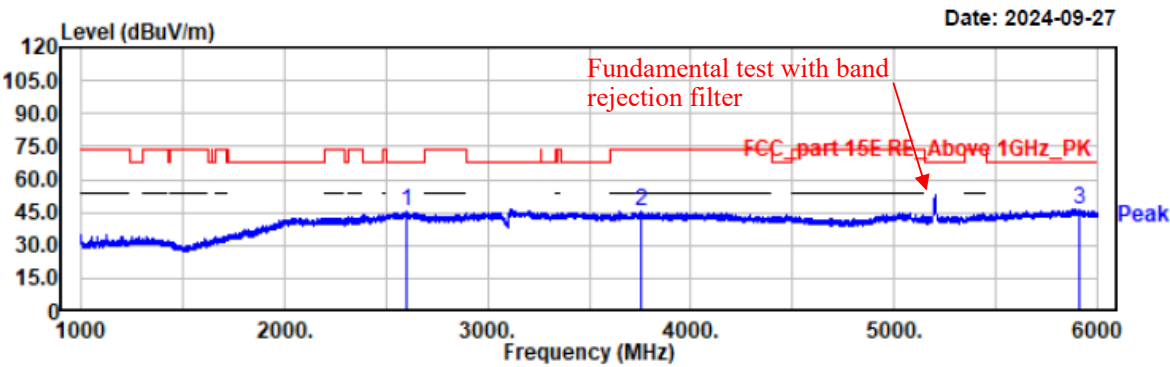
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2603.50	48.49	-3.31	45.18	68.20	23.02	vertical	Peak
3216.00	49.37	-3.19	46.18	68.20	22.02	vertical	Peak
5817.00	49.37	-2.78	46.59	68.20	21.61	vertical	Peak

Project No.: 2407V20721E-RF
Test Mode: 11a-5200
EUT Model: NLS-NQuire1500
Test distance: 3m

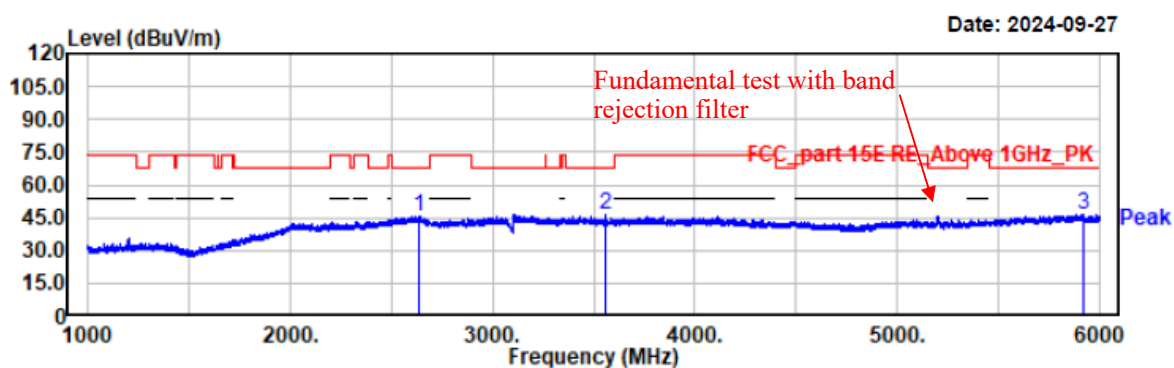
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2598.50	48.99	-3.31	45.68	68.20	22.52	horizontal	Peak
3751.50	49.45	-4.09	45.36	74.00	28.64	horizontal	Peak
5910.00	49.30	-2.75	46.55	68.20	21.65	horizontal	Peak

Project No.: 2407V20721E-RF
Test Mode: 11a-5200
EUT Model: NLS-NQuire1500
Test distance: 3m

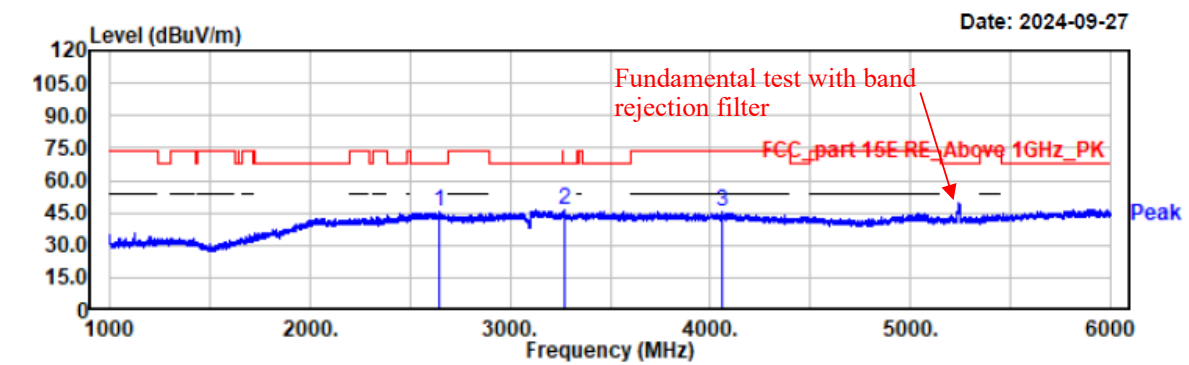
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2636.00	48.68	-3.35	45.33	68.20	22.87	vertical	Peak
3558.50	50.50	-4.44	46.06	68.20	22.14	vertical	Peak
5917.00	49.23	-2.84	46.39	68.20	21.81	vertical	Peak

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-NQuire1500
Test distance: 3m

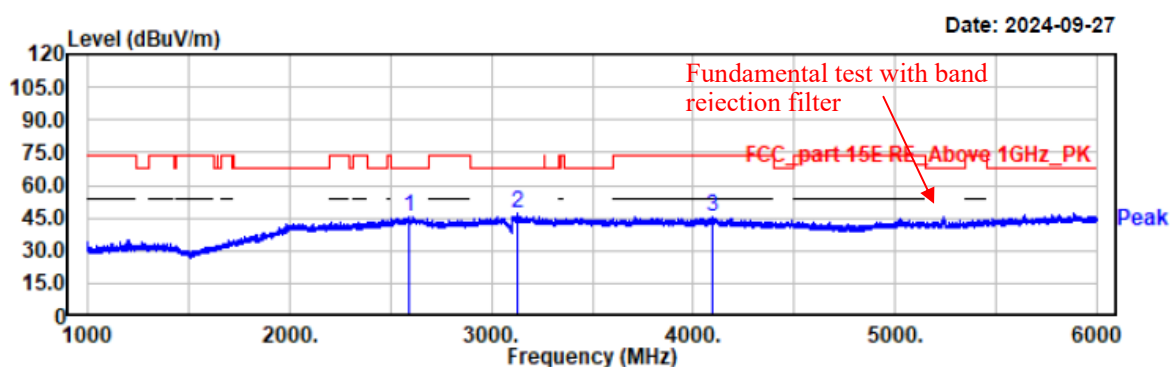
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2645.50	48.81	-3.36	45.45	68.20	22.75	horizontal	Peak
3269.50	50.19	-3.84	46.35	68.20	21.85	horizontal	Peak
4057.00	50.07	-4.22	45.85	74.00	28.15	horizontal	Peak

Project No.: 2407V20721E-RF
Test Mode: 11a-5240
EUT Model: NLS-NQuire1500
Test distance: 3m

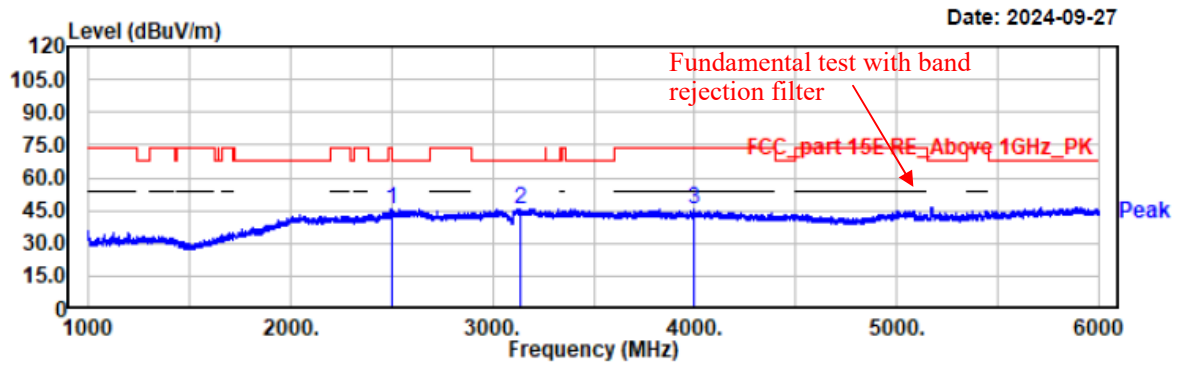
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2593.00	48.79	-3.32	45.47	68.20	22.73	vertical	Peak
3130.50	50.02	-2.98	47.04	68.20	21.16	vertical	Peak
4097.00	49.55	-4.25	45.30	74.00	28.70	vertical	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n20-5180
EUT Model: NLS-NQuire1500
Test distance: 3m

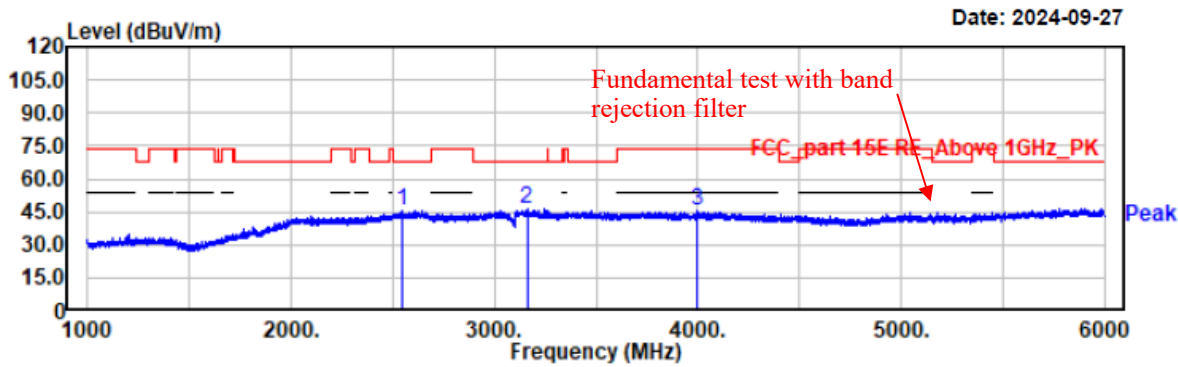
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2500.00	49.77	-4.14	45.63	68.20	22.57	horizontal	Peak
3133.50	48.84	-2.97	45.87	68.20	22.33	horizontal	Peak
3998.00	50.01	-4.47	45.54	74.00	28.46	horizontal	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n20-5180
EUT Model: NLS-NQuire1500
Test distance: 3m

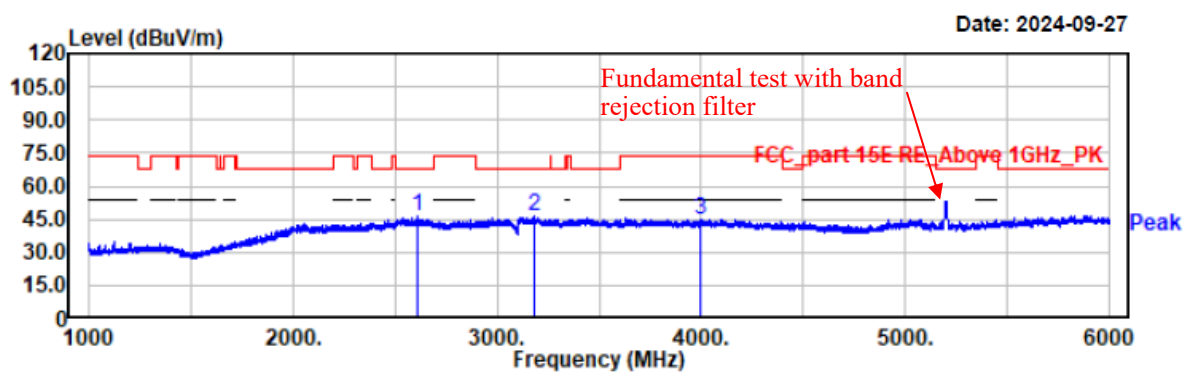
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2547.00	48.86	-3.51	45.35	68.20	22.85	vertical	Peak
3160.00	48.98	-2.94	46.04	68.20	22.16	vertical	Peak
3999.00	49.64	-4.47	45.17	74.00	28.83	vertical	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n20-5200
EUT Model: NLS-NQuire1500
Test distance: 3m

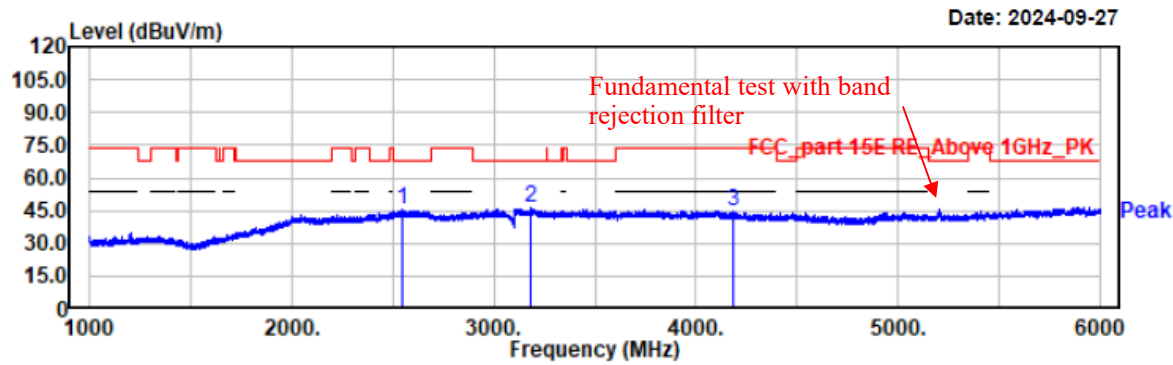
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2608.00	49.62	-3.31	46.31	68.20	21.89	horizontal	Peak
3184.50	49.27	-2.94	46.33	68.20	21.87	horizontal	Peak
3996.50	49.47	-4.46	45.01	74.00	28.99	horizontal	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n20-5200
EUT Model: NLS-NQuire1500
Test distance: 3m

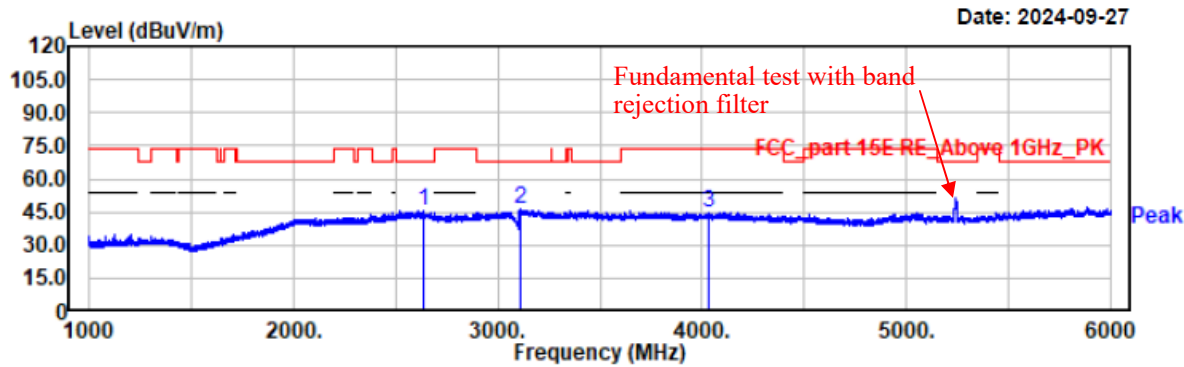
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2546.50	49.28	-3.52	45.76	68.20	22.44	vertical	Peak
3181.00	49.22	-2.94	46.28	68.20	21.92	vertical	Peak
4188.50	50.00	-4.92	45.08	74.00	28.92	vertical	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n20-5240
EUT Model: NLS-NQuire1500
Test distance: 3m

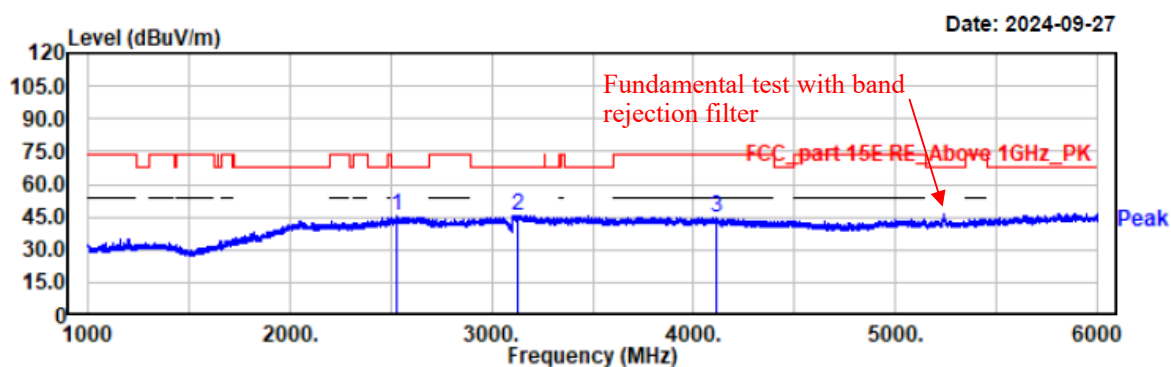
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2634.00	48.75	-3.35	45.40	68.20	22.80	horizontal	Peak
3107.50	49.10	-3.03	46.07	68.20	22.13	horizontal	Peak
4035.00	49.08	-4.28	44.80	74.00	29.20	horizontal	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n20-5240
EUT Model: NLS-NQuire1500
Test distance: 3m

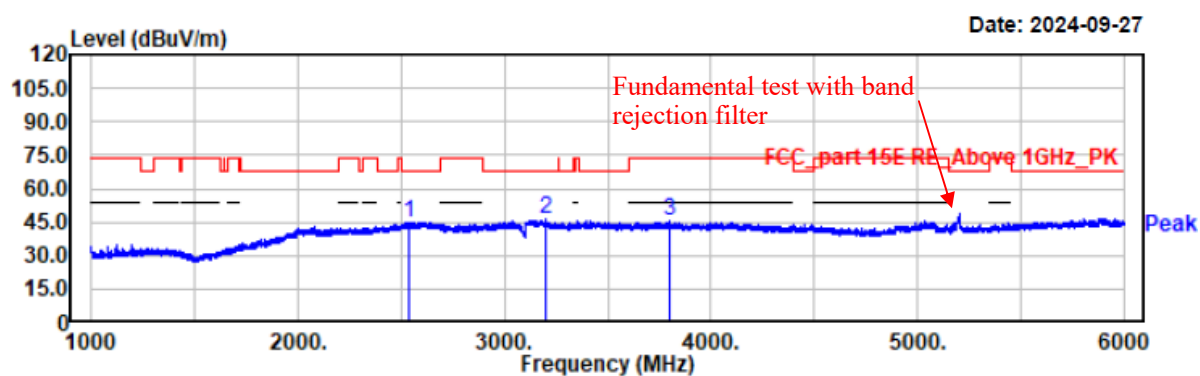
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2531.00	49.26	-3.72	45.54	68.20	22.66	vertical	Peak
3132.00	48.62	-2.98	45.64	68.20	22.56	vertical	Peak
4116.00	49.49	-4.43	45.06	74.00	28.94	vertical	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n40-5190
EUT Model: NLS-NQuire1500
Test distance: 3m

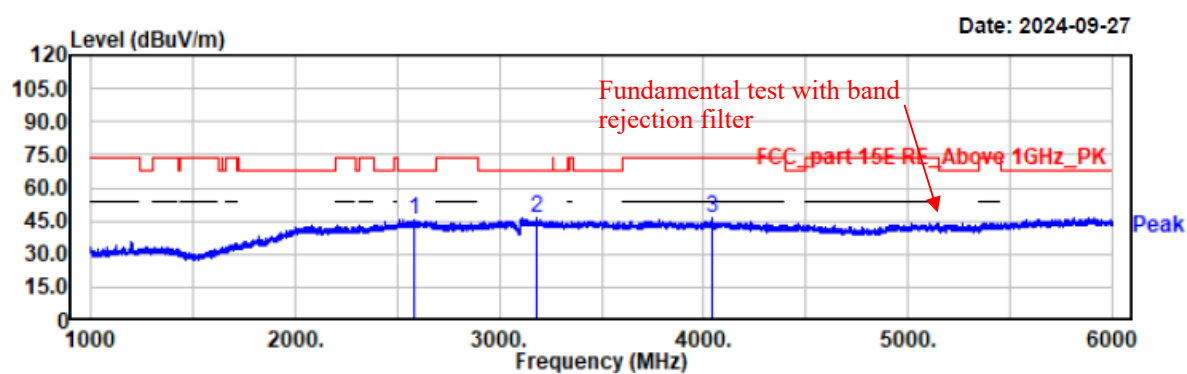
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2537.50	48.63	-3.64	44.99	68.20	23.21	horizontal	Peak
3204.50	49.06	-3.01	46.05	68.20	22.15	horizontal	Peak
3798.00	49.37	-4.15	45.22	74.00	28.78	horizontal	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n40-5190
EUT Model: NLS-NQuire1500
Test distance: 3m

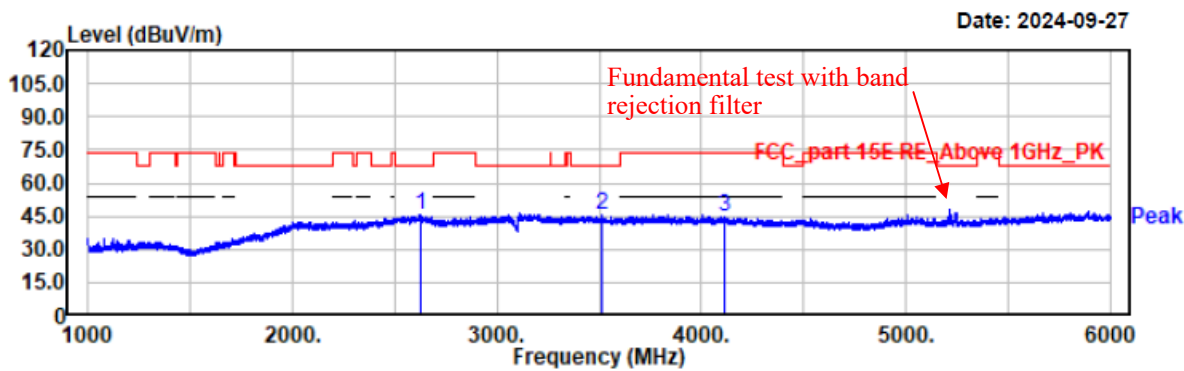
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2586.00	49.16	-3.35	45.81	68.20	22.39	vertical	Peak
3183.00	48.97	-2.94	46.03	68.20	22.17	vertical	Peak
4039.50	50.43	-4.26	46.17	74.00	27.83	vertical	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n40-5230
EUT Model: NLS-NQuire1500
Test distance: 3m

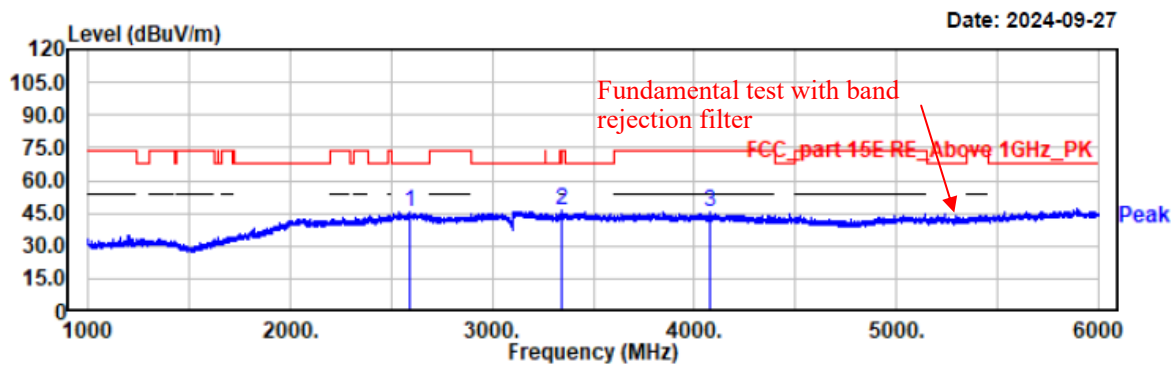
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2627.50	49.12	-3.34	45.78	68.20	22.42	horizontal	Peak
3512.00	49.82	-4.18	45.64	68.20	22.56	horizontal	Peak
4117.00	48.75	-4.44	44.31	74.00	29.69	horizontal	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n40-5230
EUT Model: NLS-NQuire1500
Test distance: 3m

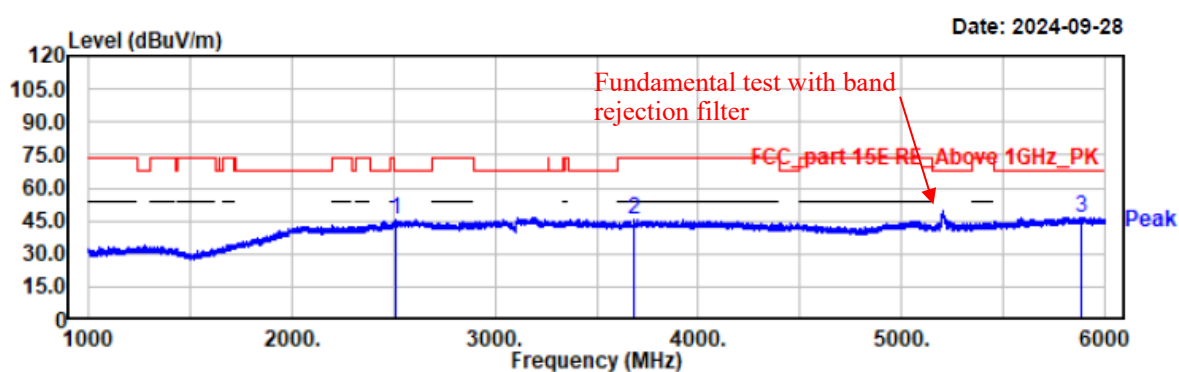
Temp/Humi/ATM: 23.9°C/50%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2587.50	49.19	-3.34	45.85	68.20	22.35	vertical	Peak
3342.00	50.24	-3.82	46.42	68.20	21.78	vertical	Peak
4077.50	49.41	-4.23	45.18	74.00	28.82	vertical	Peak

Project No.: 2407V20721E-RF
Test Mode: 11ac80-5210
EUT Model: NLS-NQuire1500
Test distance: 3m

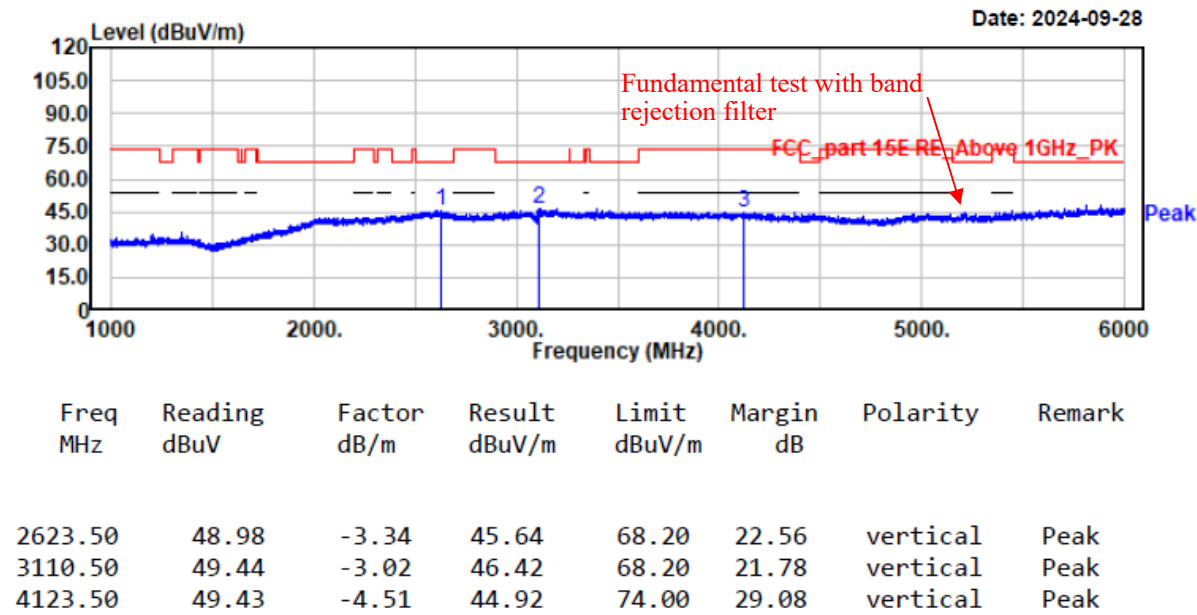
Temp/Humi/ATM: 23.9°C/53%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2514.50	49.34	-3.95	45.39	68.20	22.81	horizontal	Peak
3686.00	49.96	-4.27	45.69	74.00	28.31	horizontal	Peak
5883.00	49.28	-2.73	46.55	68.20	21.65	horizontal	Peak

Project No.: 2407V20721E-RF
Test Mode: 11ac80-5210
EUT Model: NLS-NQuire1500
Test distance: 3m

Temp/Humi/ATM: 23.9°C/53%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Band 2:

Project No.: 2407V20721E-RF

Test Mode: 11a-5260

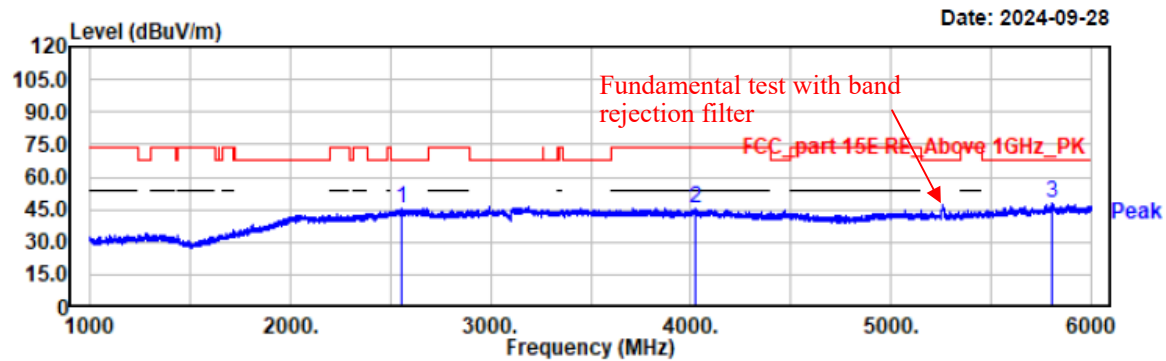
EUT Model: NLS-NQuire1500

Test distance: 3m

Temp/Humi/ATM: 23.9°C/53%/100.1kPa

Tested by: Wlif Wu

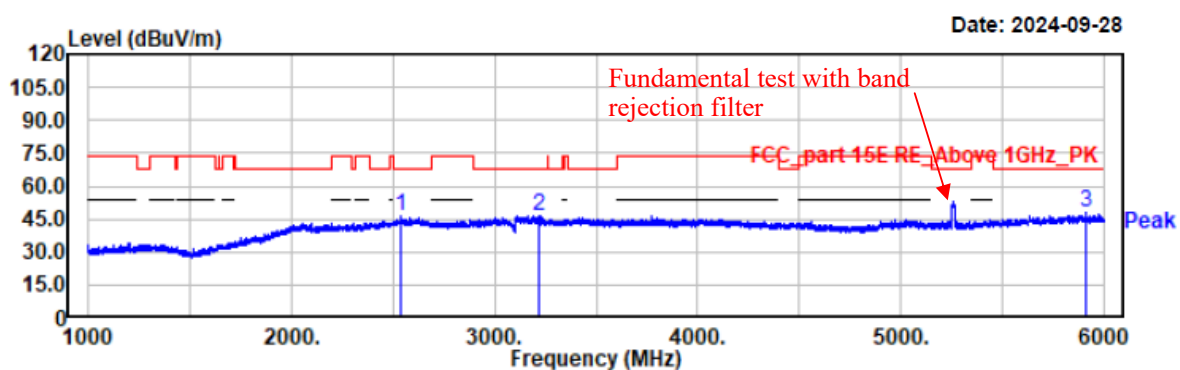
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2557.50	49.33	-3.44	45.89	68.20	22.31	horizontal	Peak
4021.00	49.52	-4.37	45.15	74.00	28.85	horizontal	Peak
5808.50	50.30	-2.71	47.59	68.20	20.61	horizontal	Peak

Project No.: 2407V20721E-RF
Test Mode: 11a-5260
EUT Model: NLS-NQuire1500
Test distance: 3m

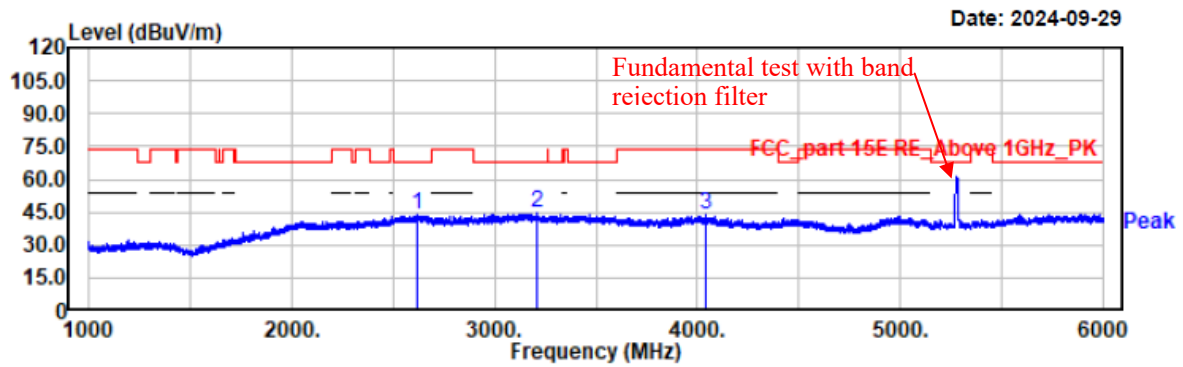
Temp/Humi/ATM: 23.9°C/53%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2537.50	49.61	-3.64	45.97	68.20	22.23	vertical	Peak
3215.00	49.69	-3.17	46.52	68.20	21.68	vertical	Peak
5911.00	50.72	-2.76	47.96	68.20	20.24	vertical	Peak

Project No.: 2407V20721E-RF
Test Mode: 11a-5280
EUT Model: NLS-NQuire1500
Test distance: 3m

Temp/Humi/ATM: 24.2°C/54%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2622.50	47.26	-3.33	43.93	68.20	24.27	horizontal	Peak
3212.50	47.44	-3.13	44.31	68.20	23.89	horizontal	Peak
4040.00	48.02	-4.26	43.76	74.00	30.24	horizontal	Peak

Project No.: 2407V20721E-RF

Test Mode: 11a-5280

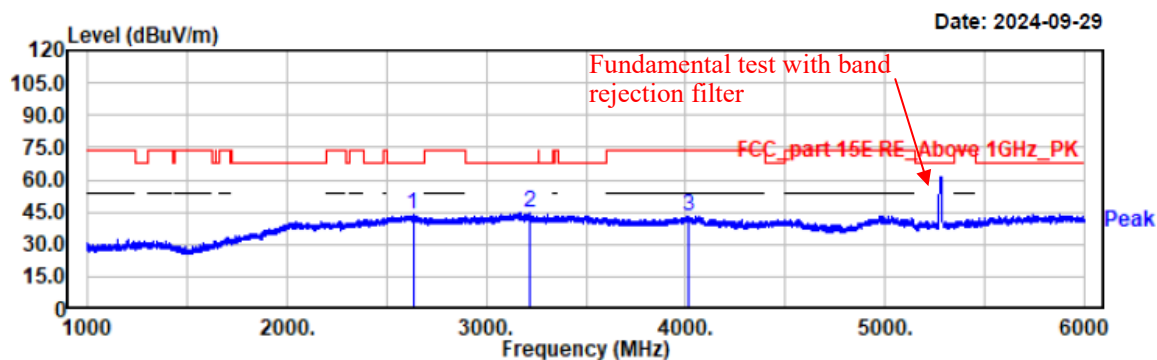
EUT Model: NLS-NQuire1500

Test distance: 3m

Temp/Humi/ATM: 24.2°C/54%/100.1kPa

Tested by: Wlif Wu

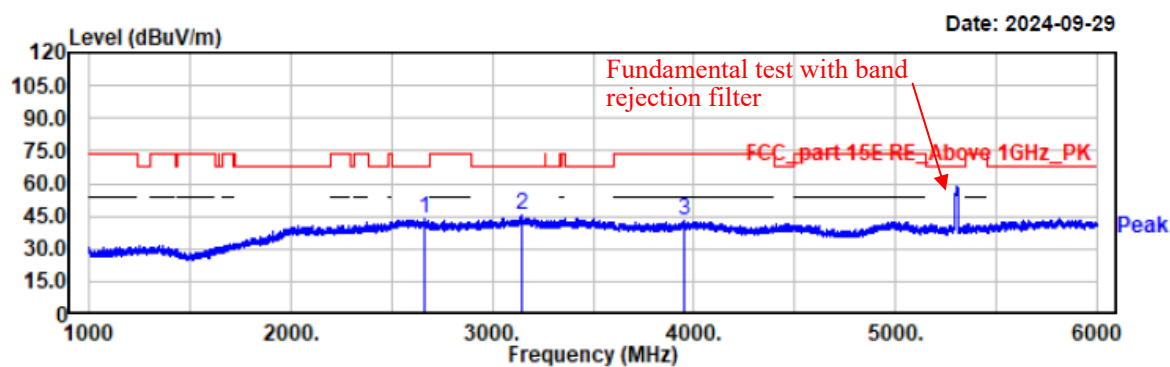
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2632.00	47.04	-3.34	43.70	68.20	24.50	vertical	Peak
3221.50	48.06	-3.26	44.80	68.20	23.40	vertical	Peak
4011.00	47.81	-4.42	43.39	74.00	30.61	vertical	Peak

Project No.: 2407V20721E-RF
Test Mode: 11a-5320
EUT Model: NLS-NQuire1500
Test distance: 3m

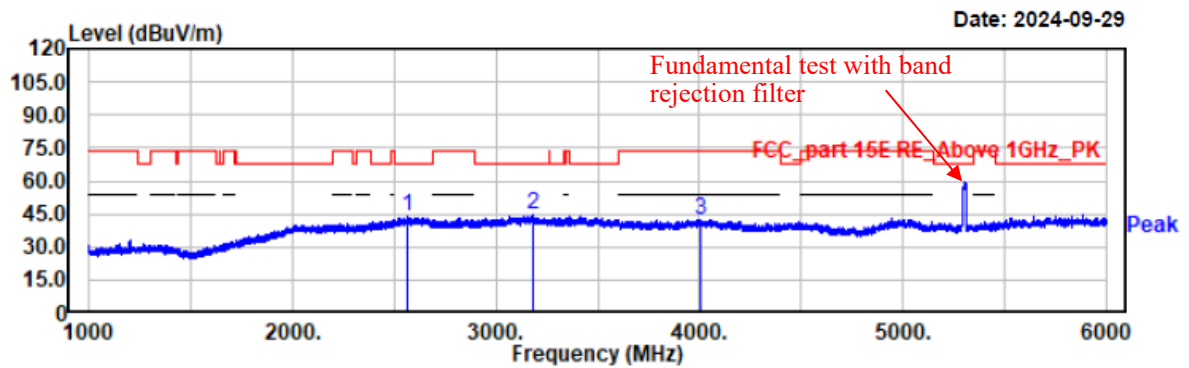
Temp/Humi/ATM: 24.2°C/54%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2661.50	47.31	-3.67	43.64	68.20	24.56	horizontal	Peak
3145.00	48.11	-2.95	45.16	68.20	23.04	horizontal	Peak
3948.50	47.39	-4.35	43.04	74.00	30.96	horizontal	Peak

Project No.: 2407V20721E-RF
Test Mode: 11a-5320
EUT Model: NLS-NQuire1500
Test distance: 3m

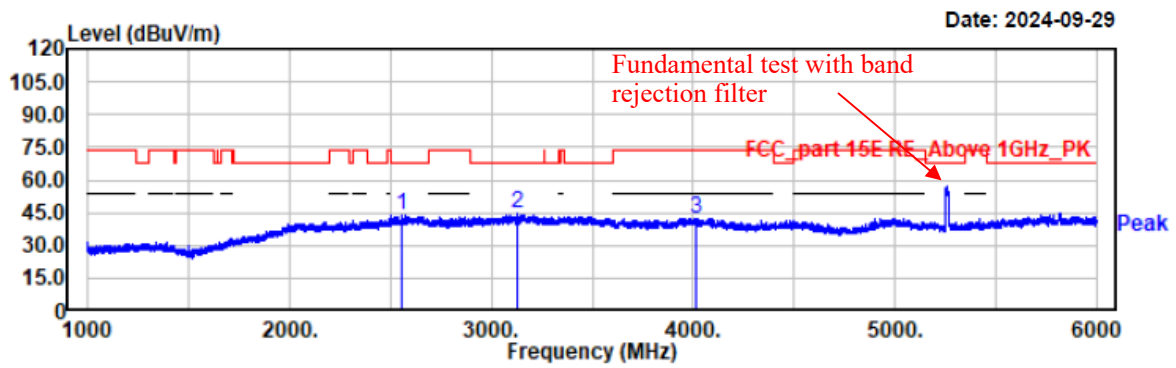
Temp/Humi/ATM: 24.2°C/54%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2567.50	47.20	-3.40	43.80	68.20	24.40	vertical	Peak
3182.00	47.85	-2.94	44.91	68.20	23.29	vertical	Peak
4006.50	47.03	-4.44	42.59	74.00	31.41	vertical	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n20-5260
EUT Model: NLS-NQuire1500
Test distance: 3m

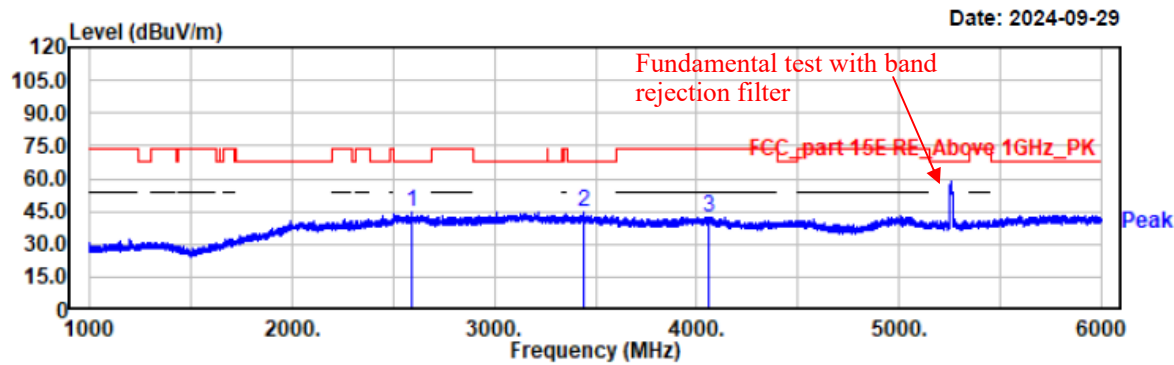
Temp/Humi/ATM: 24.2°C/54%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2555.00	47.24	-3.45	43.79	68.20	24.41	horizontal	Peak
3131.50	47.31	-2.98	44.33	68.20	23.87	horizontal	Peak
4018.00	46.82	-4.38	42.44	74.00	31.56	horizontal	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n20-5260
EUT Model: NLS-NQuire1500
Test distance: 3m

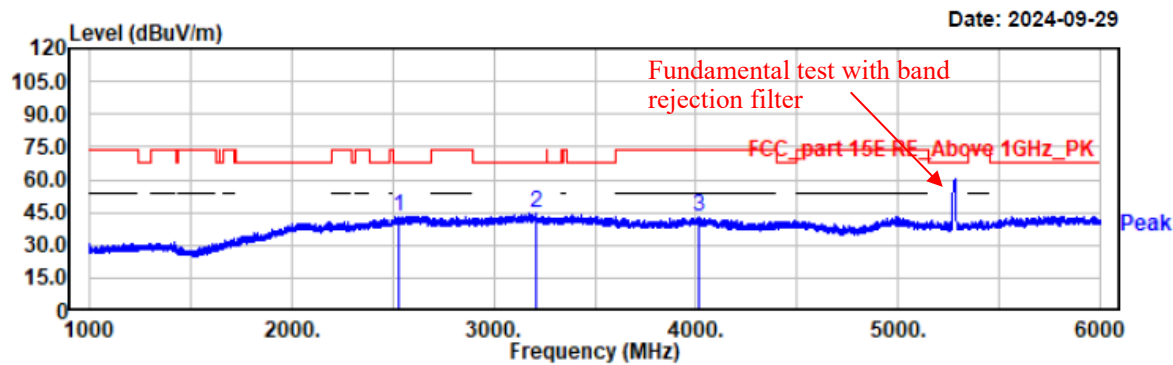
Temp/Humi/ATM: 24.2°C/54%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2588.50	47.88	-3.34	44.54	68.20	23.66	vertical	Peak
3443.50	48.71	-3.64	45.07	68.20	23.13	vertical	Peak
4056.00	46.66	-4.21	42.45	74.00	31.55	vertical	Peak

Project No.: 2407V20721E-RF
Test Mode: 11n20-5280
EUT Model: NLS-NQuire1500
Test distance: 3m

Temp/Humi/ATM: 24.2℃/54%/100.1kPa
Tested by: Wlif Wu
Power Source: AC120V/60Hz



Freq MHz	Reading dBuV	Factor dB/m	Result dBuV/m	Limit dBuV/m	Margin dB	Polarity	Remark
2527.50	46.99	-3.78	43.21	68.20	24.99	horizontal	Peak
3212.50	47.57	-3.13	44.44	68.20	23.76	horizontal	Peak
4014.00	47.34	-4.40	42.94	74.00	31.06	horizontal	Peak