



中认信通

CHINA CERTIFICATION ICT CO., LTD (DONGGUAN)



TEST REPORT

Applicant: Autel Robotics Co., Ltd.

Address: 601,701,801,901, Block B1, Nanshan iPark, No. 1001 Xueyuan Avenue,
Nanshan District, Shenzhen, Guangdong, 518055, China

FCC ID: 2AGNTMDX600958S

Product Name: EVO Max 4T, EVO Max 4N, EVO Max 4T Pro, EVO
Max 4T XE

Standard(s): 47 CFR Part 15, Subpart E(15.407)
ANSI C63.10-2013
KDB 789033 D02 General U-NII Test Procedures New
Rules v02r01

The above device has been tested and found compliant with the requirement of the relative standards by
China Certification ICT Co., Ltd (Dongguan)

Report Number: 2503P42421E-RF-00C

Date Of Issue: 2025/2/28

Reviewed By: Calvin Chen

Title: RF Engineer

Approved By: Sun Zhong

Title: Manager

Test Laboratory: China Certification ICT Co., Ltd (Dongguan)

No. 113, Pingkang Road, Dalang Town, Dongguan, Guangdong, China

Tel: +86-769-83085888

www.cctft.com.cn

Test Facility

The Test site used by China Certification ICT Co., Ltd (Dongguan) to collect test data is located on the No. 113, Pingkang Road, Dalang Town, Dongguan, Guangdong, China.

The lab has been recognized as the FCC accredited lab under the KDB 974614 D01 and is listed in the FCC Public Access Link (PAL) database, FCC Registration No. : 442868, the FCC Designation No. : CN1314.

Declarations

China Certification ICT Co., Ltd (Dongguan) is not responsible for the authenticity of any test data provided by the applicant. Data included from the applicant that may affect test results are marked with a triangle symbol “▲”. Customer model name, addresses, names, trademarks etc. are not considered data.

Unless otherwise stated the results shown in this test report refer only to the sample(s) tested.

This report cannot be reproduced except in full, without prior written approval of the Company.

This report is valid only with a valid digital signature. The digital signature may be available only under the Adobe software above version 7.0.

This report may contain data that are not covered by the accreditation scope and shall be marked with an asterisk “★”.

Each test item follows the test standard(s) without deviation.

CONTENTS

DOCUMENT REVISION HISTORY	5
1. GENERAL INFORMATION	6
1.1 PRODUCT DESCRIPTION FOR EQUIPMENT UNDER TEST (EUT)	6
1.2 DESCRIPTION OF TEST CONFIGURATION.....	10
1.2.1 EUT Operation Condition:.....	10
1.2.2 Support Equipment List and Details	11
1.2.3 Support Cable List and Details	11
1.2.4 Block Diagram of Test Setup.....	11
1.3 MEASUREMENT UNCERTAINTY	12
2. SUMMARY OF TEST RESULTS	13
3. REQUIREMENTS AND TEST PROCEDURES	14
3.1 AC LINE CONDUCTED EMISSIONS.....	14
3.1.1 Applicable Standard.....	14
3.1.2 EUT Setup.....	15
3.1.3 EMI Test Receiver Setup	15
3.1.4 Test Procedure	16
3.1.5 Corrected Amplitude & Margin Calculation.....	16
3.2 RADIATION SPURIOUS EMISSIONS	17
3.2.1 Applicable Standard.....	17
3.2.2 EUT Setup.....	18
3.2.3 EMI Test Receiver & Spectrum Analyzer Setup	20
3.2.4 Test Procedure	21
3.2.5 Corrected Amplitude & Margin Calculation.....	21
3.3 EMISSION BANDWIDTH.....	22
3.3.1 Applicable Standard.....	22
3.3.2 EUT Setup.....	22
3.3.3 Test Procedure	22
3.4 MAXIMUM CONDUCTED OUTPUT POWER.....	24
3.4.1 Applicable Standard.....	24
3.4.2 EUT Setup.....	24
3.4.3 Test Procedure	24
3.5 MAXIMUM POWER SPECTRAL DENSITY	25
3.5.1 Applicable Standard.....	25
3.5.2 EUT Setup.....	25
3.5.3 Test Procedure	26
3.6 DUTY CYCLE	27
3.6.1 EUT Setup.....	27
3.6.2 Test Procedure	27
3.7 ANTENNA REQUIREMENT.....	28
3.7.1 Applicable Standard.....	28
3.7.2 Judgment.....	28

4. Test DATA AND RESULTS 29

4.1 AC LINE CONDUCTED EMISSIONS 29

4.2 RADIATION SPURIOUS EMISSIONS 30

 4.2.1 9 kHz – 1 GHz 30

 4.2.2 1 GHz – 40 GHz 39

4.3 EMISSION BANDWIDTH 98

4.4 MAXIMUM CONDUCTED OUTPUT POWER 112

4.5 MAXIMUM POWER SPECTRAL DENSITY 114

4.6 DUTY CYCLE 128

5. EUT PHOTOGRAPHS 130

6. TEST SETUP PHOTOGRAPHS 131

DOCUMENT REVISION HISTORY

Revision Number	Report Number	Description of Revision	Date of Revision
1.0	2503P42421E-RF-00C	Original Report	2025/2/28

1. GENERAL INFORMATION

1.1 Product Description for Equipment under Test (EUT)

1.1.1 General:

EUT Name:	EVO Max 4T, EVO Max 4N, EVO Max 4T Pro, EVO Max 4T XE
EUT Model:	MDX
Operation Frequency:	5150-5250 MHz band: SRD 1.4MHz:5154-5246 MHz SRD 10MHz: 5157-5243MHz SRD 20MHz: 5167-5233MHz 5725-5850 MHz band SRD 1.4MHz: 5728-5847 MHz SRD 10MHz: 5733-5842 MHz SRD 20MHz: 5738-5839 MHz
Maximum Average Output Power (Conducted):	19.50dBm (5150-5250 MHz) 27.24dBm (5725-5850 MHz)
Modulation Type:	QPSK
Rated Input Voltage:	DC 14.88V or DC 14.76V from battery
Serial Number:	2XO4-1 (For RF Conducted Test) 2XO4-2 (For RE Test)
EUT Received Date:	2025/1/22
EUT Received Status:	Good

This device supports multiple configurations, the detailed configuration is as follows:

Battery Information:

No.	Nominal Voltage	Model
Battery 1#	DC 14.88V	MDX 8070 1488
Battery 2#	DC 14.88V	ABX40
Battery 3#	DC 14.76V	ABX41
Note: MDX 8070 1488 and ABX40 are only different model name.		

Gimbal Camera Information:

Product Name	Model
EVO Max 4T	Fusion 4T
EVO Max 4N	Fusion 4N
EVO Max 4T Pro	Fusion 4T Pro
EVO Max 4T XE	Fusion 4T XE
Note: Fusion 4T Pro and Fusion 4T XE are only different model name.	

1.1.2 Operation Frequency Detail:

For SRD-5.2GHz band:

1.4MHz Bandwidth Mode:

Channel	Frequency (MHz)	Channel	Frequency (MHz)
1	5154	48	5201
2	5155	49	5202
3	5156	...	...
...
...	...	92	5245
46	5199	93	5246
47	5200	/	/

Per section 15.31(m), the below frequencies were performed the test as below:

Test Channel	Frequency (MHz)
Lowest	5154
Middle	5201
Highest	5246

10MHz Bandwidth Mode:

Channel	Frequency (MHz)	Channel	Frequency (MHz)
1	5157	45	5201
2	5158	46	5202
3	5159	...	...
...
...	...	86	5242
43	5199	87	5243
44	5200	/	/

Per section 15.31(m), the below frequencies were performed the test as below:

Test Channel	Frequency (MHz)
Lowest	5157
Middle	5201
Highest	5243

20MHz Bandwidth Mode:

Channel	Frequency (MHz)	Channel	Frequency (MHz)
1	5167	35	5201
2	5168	36	5202
3	5169	...	...
...
...	...	66	5232
33	5199	67	5233
34	5200	/	/

Per section 15.31(m), the below frequencies were performed the test as below:

Test Channel	Frequency (MHz)
Lowest	5167
Middle	5201
Highest	5233

**For SRD-5.8GHz band:
1.4MHz Bandwidth Mode:**

Channel	Frequency (MHz)	Channel	Frequency (MHz)
1	5728	61	5788
2	5729	62	5789
3	5730	...	...
...
...	...	118	5845
59	5786	119	5846
60	5787	120	5847

Per section 15.31(m), the below frequencies were performed the test as below:

Test Channel	Frequency (MHz)
Lowest	5728
Middle	5789
Highest	5847

For SRD-5.8GHz band 10MHz Bandwidth Mode:

Channel	Frequency (MHz)	Channel	Frequency (MHz)
1	5733	56	5788
2	5734	57	5789
3	5735	...	...
...
...	...	108	5840
54	5786	109	5841
55	5787	110	5842

Per section 15.31(m), the below frequencies were performed the test as below:

Test Channel	Frequency (MHz)
Lowest	5733
Middle	5789
Highest	5842

For SRD-5.8GHz band 20MHz Bandwidth Mode:

Channel	Frequency (MHz)	Channel	Frequency (MHz)
1	5738	52	5789
2	5739	53	5790
3	5740	...	...
...
...	...	100	5837
50	5787	101	5838
51	5788	102	5839

Per section 15.31(m), the below frequencies were performed the test as below:

Test Channel	Frequency (MHz)
Lowest	5738
Middle	5790
Highest	5839

1.1.3 Antenna Information Detail▲:

Antenna	Antenna Type	input impedance (Ohm)	Antenna Frequency Range (MHz)	Antenna Gain (dBi)
ANT 1 (Chain 0)	PCB	50	5150-5250	-1.6
			5725-5850	1.6
ANT 3 (Chain 1)	PCB	50	5150-5250	0.7
			5725-5850	1.7

The Method of §15.203 Compliance:

Antenna was permanently attached to the unit.

Antenna use a unique type of connector to attach to the EUT.

Unit was professionally installed, and installer shall be responsible for verifying that the correct antenna is employed with the unit.

1.1.4 Accessory Information:

Accessory Description	Manufacturer	Model
Adapter	Shenzhen Esun Power Technology Co.,Ltd	MDX120W

1.2 Description of Test Configuration

1.2.1 EUT Operation Condition:

EUT Operation Mode:		The system was configured for testing in Engineering Mode, which was provided by the manufacturer. The device only supports MIMO mode 2Tx4Rx. Per 2.4G Wi-Fi report test, radiated emissions test with Gimbal Camera (Fusion 4T XE) & Battery 2# was the worst.			
Equipment Modifications:		No			
EUT Exercise Software:		RRTL6.0.0_VCOM			
The software was provided by manufacturer. The maximum power was configured as below, that was provided by the manufacturer ▲:					
5150-5250 MHz Band:					
Test Modes	Test Channels	Test Frequency (MHz)	Data rate	Power Level Setting	
				Chain 0	Chain 1
1.4MHz QPSK	Lowest	5154	120kbps	68	78
	Middle	5201	120kbps	68	78
	Highest	5246	120kbps	68	78
10MHz QPSK	Lowest	5157	19Mbps	78	78
	Middle	5201	19Mbps	78	78
	Highest	5243	19Mbps	78	78
20MHz QPSK	Lowest	5167	38Mbps	70	70
	Middle	5201	38Mbps	70	70
	Highest	5233	38Mbps	70	70
5725-5850 MHz Band:					
Test Modes	Test Channels	Test Frequency (MHz)	Data rate	Power Level Setting	
				Chain 0	Chain 1
1.4MHz QPSK	Lowest	5728	120kbps	30	30
	Middle	5789	120kbps	30	30
	Highest	5847	120kbps	30	30
10MHz QPSK	Lowest	5733	19Mbps	30	30
	Middle	5789	19Mbps	30	30
	Highest	5842	19Mbps	30	30
20MHz QPSK	Lowest	5738	38Mbps	35	35
	Middle	5790	38Mbps	35	35
	Highest	5839	38Mbps	35	35

1.2.2 Support Equipment List and Details

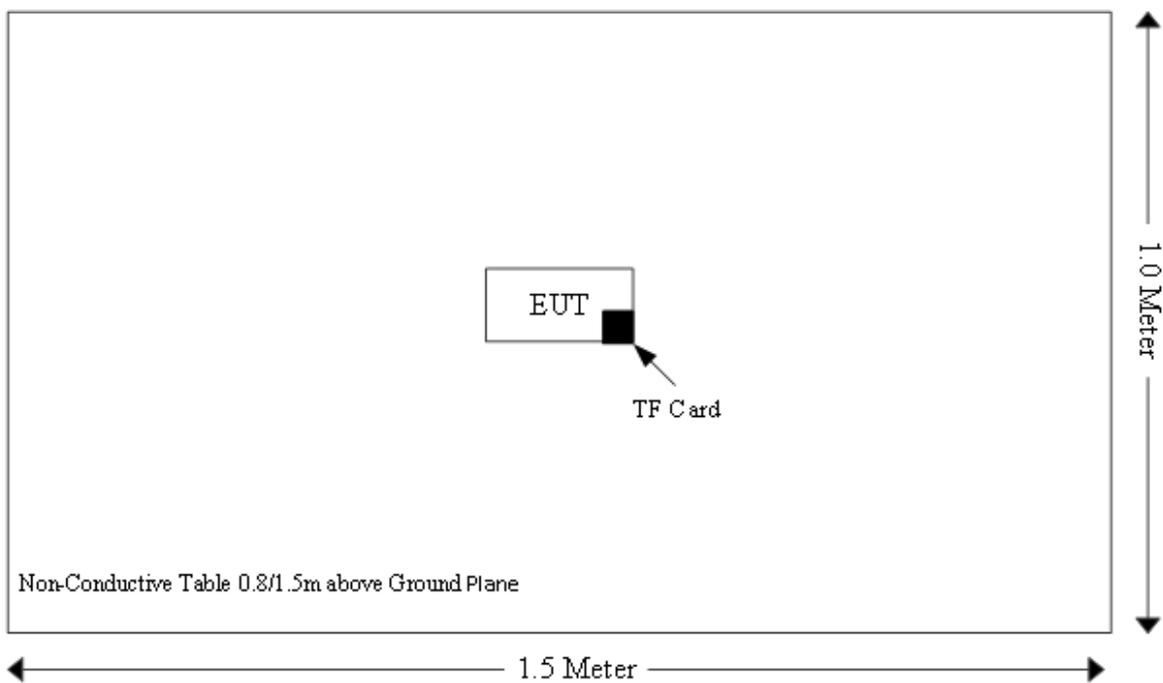
Manufacturer	Description	Model	Serial Number
SanDisk	TF Card	32 GB	521005904013

1.2.3 Support Cable List and Details

Cable Description	Shielding Type	Ferrite Core	Length (m)	From Port	To
/	/	/	/	/	/

1.2.4 Block Diagram of Test Setup

Spurious Emissions:



1.3 Measurement Uncertainty

Otherwise required by the applicant or Product Regulations, Decision Rule in this report did not consider the uncertainty. The extended uncertainty given in this report is obtained by combining the standard uncertainty times the coverage factor K with the 95% confidence interval.

Parameter	Measurement Uncertainty
Occupied Channel Bandwidth	±5 %
RF output power, conducted	±0.61dB
Power Spectral Density, conducted	±0.61 dB
Unwanted Emissions, radiated	30M~200MHz: 4.15 dB,200M~1GHz: 5.61 dB,1G~6GHz: 5.14 dB, 6G~18GHz: 5.93 dB,18G~26.5G:5.47 dB,26.5G~40G:5.63 dB
Unwanted Emissions, conducted	±1.26 dB
Temperature	±1 °C
Humidity	±5%
DC and low frequency voltages	±0.4%
Duty Cycle	1%
AC Power Lines Conducted Emission	2.8 dB (150 kHz to 30 MHz)

2. SUMMARY OF TEST RESULTS

Standard(s) Section	Test Items	Result
§15.207(a)	AC line conducted emissions	Not Applicable
FCC§15.205& §15.209 &§15.407(b)	Radiated Spurious Emissions	Compliant
FCC§15.407(a) (e)	Emission Bandwidth	Compliant
FCC§15.407(a)	Maximum Conducted Output Power	Compliant
FCC§15.407 (a)	Power Spectral Density	Compliant
§15.203	Antenna Requirement	Compliant

3. REQUIREMENTS AND TEST PROCEDURES

3.1 AC Line Conducted Emissions

3.1.1 Applicable Standard

FCC§15.207(a).

(a) Except as shown in paragraphs (b) and (c) of this section, for an intentional radiator that is designed to be connected to the public utility (AC) power line, the radio frequency voltage that is conducted back onto the AC power line on any frequency or frequencies, within the band 150 kHz to 30 MHz, shall not exceed the limits in the following table, as measured using a 50 μ H/50 ohms line impedance stabilization network (LISN). Compliance with the provisions of this paragraph shall be based on the measurement of the radio frequency voltage between each power line and ground at the power terminal. The lower limit applies at the boundary between the frequency ranges.

Frequency of emission (MHz)	Conducted limit (dB μ V)	
	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.

(b) The limit shown in paragraph (a) of this section shall not apply to carrier current systems operating as intentional radiators on frequencies below 30 MHz. In lieu thereof, these carrier current systems shall be subject to the following standards:

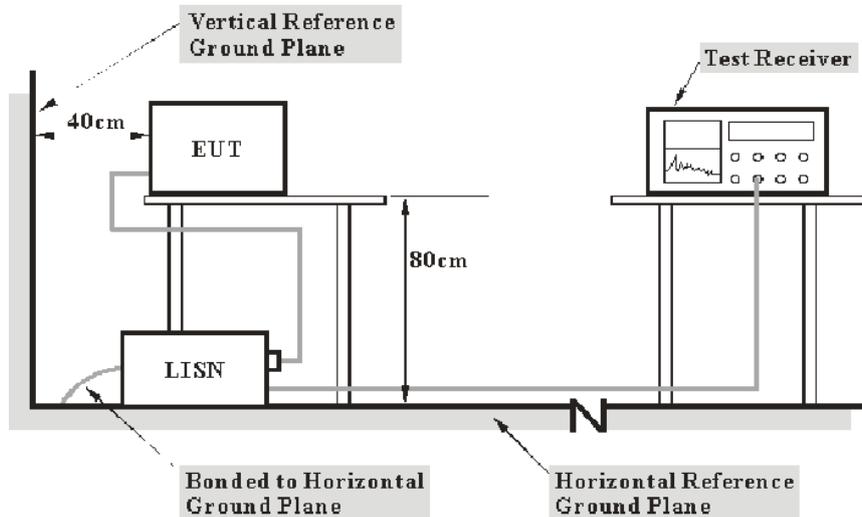
(1) For carrier current system containing their fundamental emission within the frequency band 535-1705 kHz and intended to be received using a standard AM broadcast receiver: no limit on conducted emissions.

(2) For all other carrier current systems: 1000 μ V within the frequency band 535-1705 kHz, as measured using a 50 μ H/50 ohms LISN.

(3) Carrier current systems operating below 30 MHz are also subject to the radiated emission limits in §15.205, §15.209, §15.221, §15.223, or §15.227, as appropriate.

(c) Measurements to demonstrate compliance with the conducted limits are not required for devices which only employ battery power for operation and which do not operate from the AC power lines or contain provisions for operation while connected to the AC power lines. Devices that include, or make provisions for, the use of battery chargers which permit operating while charging, AC adapters or battery eliminators or that connect to the AC power lines indirectly, obtaining their power through another device which is connected to the AC power lines, shall be tested to demonstrate compliance with the conducted limits.

3.1.2 EUT Setup



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

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.

The adapter or EUT was connected to the main LISN with a 120 V/60 Hz AC power source.

3.1.3 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

3.1.4 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.

3.1.5 Corrected Amplitude & Margin Calculation

The basic equation is as follows:

Result = Reading + Factor

Factor = attenuation caused by cable loss + voltage division factor of AMN

The “**Margin**” column of the following data tables indicates the degree of compliance within the applicable limit. The equation for margin calculation is as follows:

Margin = Limit – Result

3.2 Radiation Spurious Emissions

3.2.1 Applicable Standard

FCC §15.407 (b);

Undesirable emission limits. Except as shown in paragraph (b)(7) of this section, the maximum emissions outside of the frequency bands of operation shall be attenuated in accordance with the following limits:

(1) For transmitters operating in the 5.15-5.25 GHz band: All emissions outside of the 5.15-5.35 GHz band shall not exceed an e.i.r.p. of -27 dBm/MHz.

(2) For transmitters operating in the 5.25-5.35 GHz band: All emissions outside of the 5.15-5.35 GHz band shall not exceed an e.i.r.p. of -27 dBm/MHz.

(3) For transmitters operating in the 5.47-5.725 GHz band: All emissions outside of the 5.47-5.725 GHz band shall not exceed an e.i.r.p. of -27 dBm/MHz.

(4) For transmitters operating solely in the 5.725-5.850 GHz band:

(i) All emissions shall be limited to a level of -27 dBm/MHz at 75 MHz or more above or below the band edge increasing linearly to 10 dBm/MHz at 25 MHz above or below the band edge, and from 25 MHz above or below the band edge increasing linearly to a level of 15.6 dBm/MHz at 5 MHz above or below the band edge, and from 5 MHz above or below the band edge increasing linearly to a level of 27 dBm/MHz at the band edge.

(ii) Devices certified before March 2, 2017 with antenna gain greater than 10 dBi may demonstrate compliance with the emission limits in § 15.247(d), but manufacturing, marketing and importing of devices certified under this alternative must cease by March 2, 2018. Devices certified before March 2, 2018 with antenna gain of 10 dBi or less may demonstrate compliance with the emission limits in § 15.247(d), but manufacturing, marketing and importing of devices certified under this alternative must cease before March 2, 2020.

(8) The emission measurements shall be performed using a minimum resolution bandwidth of 1 MHz. A lower resolution bandwidth may be employed near the band edge, when necessary, provided the measured energy is integrated to show the total power over 1 MHz.

(9) Unwanted emissions below 1 GHz must comply with the general field strength limits set forth in § 15.209. Further, any U-NII devices using an AC power line are required to comply also with the conducted limits set forth in § 15.207.

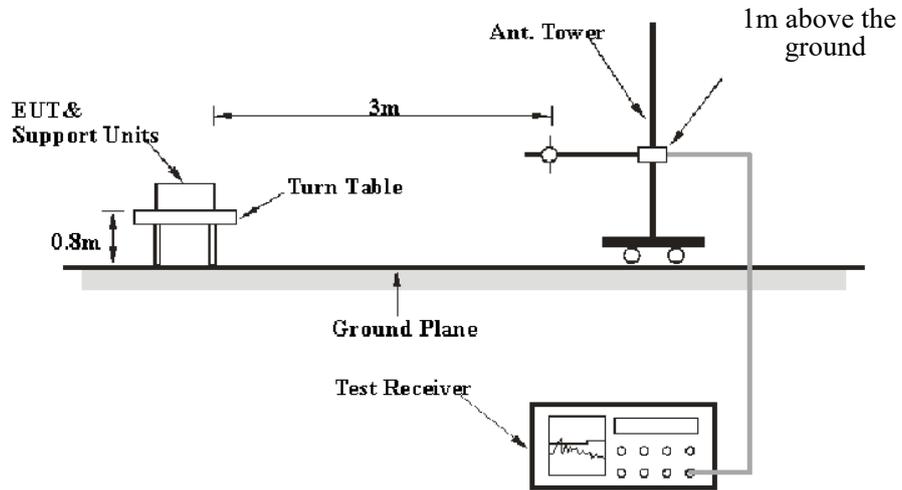
(10) The provisions of § 15.205 apply to intentional radiators operating under this section.

(11) When measuring the emission limits, the nominal carrier frequency shall be adjusted as close to the upper and lower frequency band edges as the design of the equipment permits.

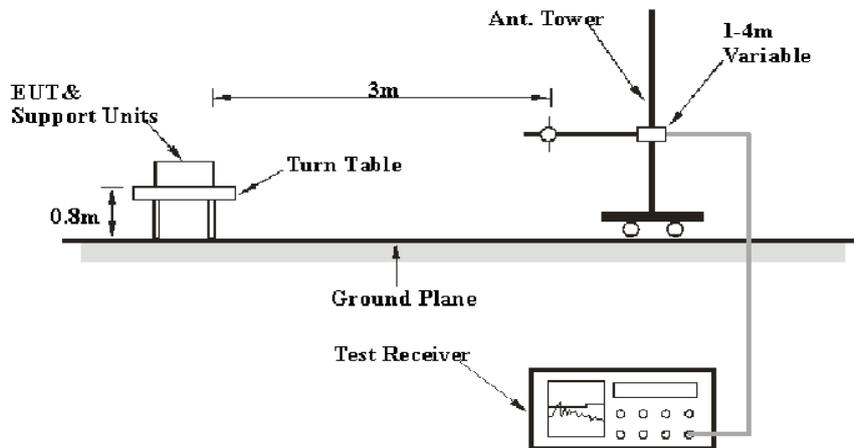
(c) The device shall automatically discontinue transmission in case of either absence of information to transmit or operational failure. These provisions are not intended to preclude the transmission of control or signalling information or the use of repetitive codes used by certain digital technologies to complete frame or burst intervals. Applicants shall include in their application for equipment authorization a description of how this requirement is met.

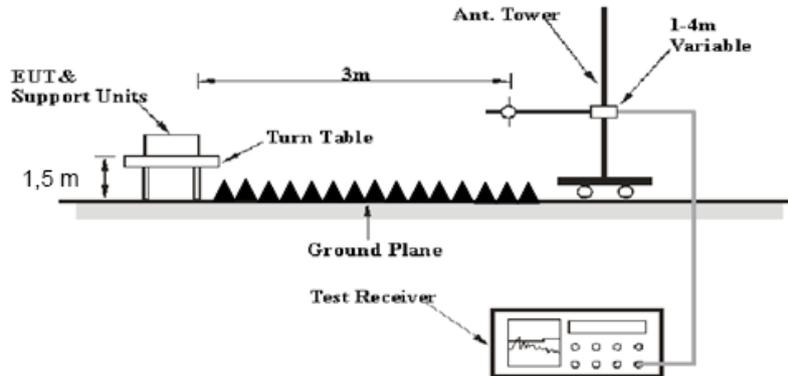
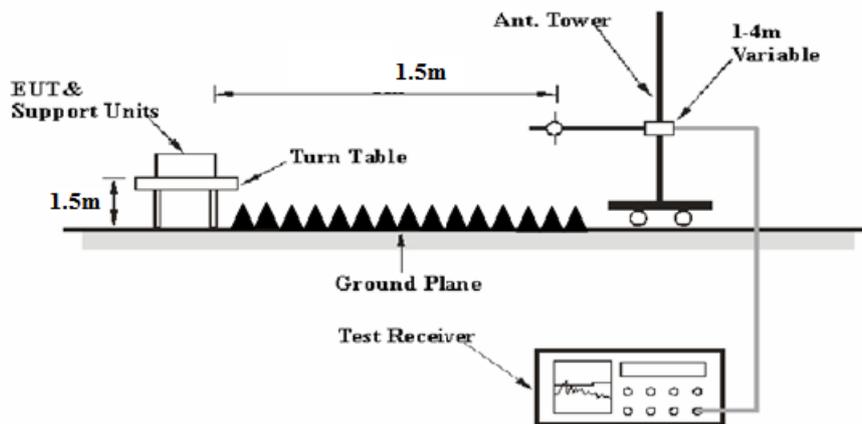
3.2.2 EUT Setup

9kHz - 30MHz:



30MHz - 1GHz:



1GHz – 26.5GHz:**26.5GHz - 40 GHz:**

The radiated emission tests were performed in the 3 meters chamber test site, using the setup accordance with the ANSI C63.10-2013. The specification used was FCC 15.209, 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.

For 9kHz-30MHz test, the lowest height of the magnetic antenna shall be 1 m above the ground and three antenna orientations (parallel, perpendicular, and ground-parallel) shall be measured.

3.2.3 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 & Spectrum Analyzer Setup were set with the following configurations:

Frequency Range	RBW	Video B/W	IF B/W	Detector	Measurement
9 kHz – 150 kHz	300 Hz	1 kHz	/	Peak	PK
	/	/	200 Hz	Quasi Peak/ Average	QP/AV
150 kHz – 30 MHz	10 kHz	30 kHz	/	Peak	PK
	/	/	9 kHz	Quasi Peak/ Average	QP/AV
30MHz – 1000 MHz	120 kHz	300 kHz	/	Peak	PK
	/	/	120kHz	Quasi Peak	QP

1GHz- 40GHz:

Pre-scan:

Measurement	Duty cycle	RBW	Video B/W	Detector
PK	Any	1MHz	3 MHz	Peak
Ave.	>98%	1MHz	5 kHz	Peak
	<98%	1MHz	5 kHz	Peak

Note: T is minimum transmission duration

Final measurement for emission identified during the pre-scan:

Measurement	Duty cycle	RBW	Video B/W	Detector
PK	Any	1MHz	3 MHz	Peak
Ave.	>98%	1MHz	10 Hz	Peak
	<98%	1MHz	$\geq 1/T$	Peak

Note: T is minimum transmission duration

If the maximized peak measured value complies with under the QP/Average limit more than 6dB, then it is unnecessary to perform an QP/Average measurement.

3.2.4 Test Procedure

During the radiated emission test, the adapter was connected to the first AC floor outlet.

Data was recorded in Quasi-peak detection mode for frequency range of 9 kHz-1 GHz except 9–90 kHz, 110–490 kHz, employing an average detector, peak and Average detection modes for frequencies above 1 GHz.

According to KDB 789033 D02 General UNII Test Procedures New Rules v02r01, emission shall be computed as: $E [dB\mu V/m] = EIRP[dBm] + 95.2$, for $d = 3$ meters.

According to C63.10, the above 1G 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 = 6.02 dB

All emissions under the average limit and under the noise floor have not recorded in the report.

3.2.5 Corrected Amplitude & Margin Calculation

The basic equation is as follows:

Result = Reading + Factor

For 9kHz-26.5GHz:

Factor = Antenna Factor + Cable Loss- Amplifier Gain

For 26.5GHz-40GHz

Factor = Antenna Factor + Cable Loss- Amplifier Gain -Distance extrapolation Factor

The “**Margin**” column of the following data tables indicates the degree of compliance within the applicable limit. The equation for margin calculation is as follows:

Margin = Limit – Result

3.3 Emission Bandwidth

3.3.1 Applicable Standard

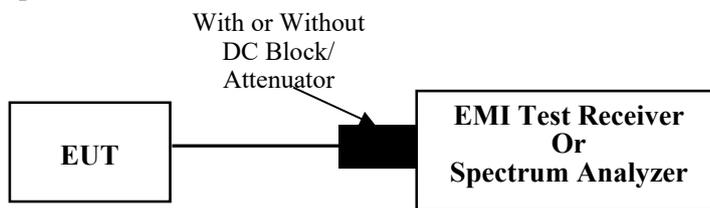
FCC §15.407 (a),(h)

(h)(2) Radar Detection Function of Dynamic Frequency Selection (DFS). U-NII devices operating with any part of its 26 dB emission bandwidth in the 5.25-5.35 GHz and 5.47-5.725 GHz bands shall employ a DFS radar detection mechanism to detect the presence of radar systems and to avoid co-channel operation with radar systems.

FCC §15.407 (e)

Within the 5.725-5.850 GHz and 5.850-5.895 GHz bands, the minimum 6 dB bandwidth of U-NII devices shall be at least 500 kHz.

3.3.2 EUT Setup



3.3.3 Test Procedure

26dB Emission Bandwidth:

According to ANSI C63.10-2013 Section 12.4.1

- Set RBW = approximately 1% of the emission bandwidth.
- Set the VBW > RBW.
- Detector = peak.
- Trace mode = max hold
- Measure the maximum width of the emission that is 26 dB down from the peak of the emission. Compare this with the RBW setting of the instrument. Readjust RBW and repeat measurement as needed until the RBW/EBW ratio is approximately 1%.

6 dB emission bandwidth:

According to KDB 789033 D02 General UNII Test Procedures New Rules v02r01

- Set RBW = 100 kHz.
- Set the video bandwidth (VBW) ≥ 3 RBW.
- Detector = Peak.
- Trace mode = max hold.
- Sweep = auto couple.
- Allow the trace to stabilize.
- Measure the maximum width of the emission that is constrained by the frequencies associated with the two outermost amplitude points (upper and lower frequencies) that are attenuated by 6 dB relative to the maximum level measured in the fundamental emission.

Note: The automatic bandwidth measurement capability of a spectrum analyzer or EMI receiver may be employed if it implements the functionality described in this section. For devices that use channel aggregation refer to III.A and III.C for determining emission bandwidth.

99% Occupied Bandwidth:

According to ANSI C63.10-2013 Section 12.4.2&6.9.3

The occupied bandwidth is the frequency bandwidth such that, below its lower and above its upper frequency limits, the mean powers are each equal to 0.5% of the total mean power of the given emission. The following procedure shall be used for measuring 99% power bandwidth:

- a) The instrument center frequency is set to the nominal EUT channel center frequency. The frequency span for the spectrum analyzer shall be between 1.5 times and 5.0 times the OBW.
- b) The nominal IF filter bandwidth (3 dB RBW) shall be in the range of 1% to 5% of the OBW, and VBW shall be approximately three times the RBW, unless otherwise specified by the applicable requirement.
- c) Set the reference level of the instrument as required, keeping the signal from exceeding the maximum input mixer level for linear operation. In general, the peak of the spectral envelope shall be more than $[10 \log (OBW/RBW)]$ below the reference level. Specific guidance is given in 4.1.5.2.
- d) Step a) through step c) might require iteration to adjust within the specified range.
- e) Video averaging is not permitted. Where practical, a sample detection and single sweep mode shall be used. Otherwise, peak detection and max hold mode (until the trace stabilizes) shall be used.
- f) Use the 99% power bandwidth function of the instrument (if available) and report the measured bandwidth.
- g) If the instrument does not have a 99% power bandwidth function, then the trace data points are recovered and directly summed in linear power terms. The recovered amplitude data points, beginning at the lowest frequency, are placed in a running sum until 0.5% of the total is reached; that frequency is recorded as the lower frequency. The process is repeated until 99.5% of the total is reached; that frequency is recorded as the upper frequency. The 99% power bandwidth is the difference between these two frequencies.
- h) The occupied bandwidth shall be reported by providing plot(s) of the measuring instrument display; the plot axes and the scale units per division shall be clearly labeled. Tabular data may be reported in addition to the plot(s).

3.4 Maximum Conducted Output Power

3.4.1 Applicable Standard

FCC §15.407(a) (1)(i)

For an outdoor access point operating in the band 5.15-5.25 GHz, the maximum conducted output power over the frequency band of operation shall not exceed 1 W provided the maximum antenna gain does not exceed 6 dBi. In addition, the maximum power spectral density shall not exceed 17 dBm in any 1 megahertz band. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi. The maximum e.i.r.p. at any elevation angle above 30 degrees as measured from the horizon must not exceed 125 mW (21 dBm).

§

FCC §15.407(a) (2)§

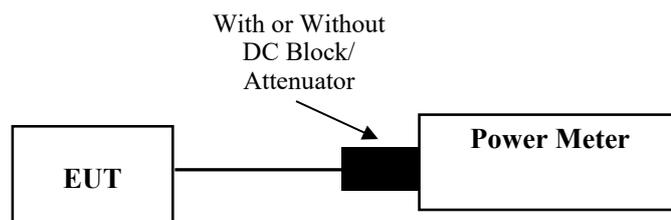
For the 5.25-5.35 GHz and 5.47-5.725 GHz bands, the maximum conducted output power over the frequency bands of operation shall not exceed the lesser of 250 mW or $11 \text{ dBm} + 10 \log B$, where B is the 26 dB emission bandwidth in megahertz. In addition, the maximum power spectral density shall not exceed 11 dBm in any 1 megahertz band. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.

§

FCC §15.407(a) (3)(i)

For the band 5.725-5.850 GHz, the maximum conducted output power over the frequency band of operation shall not exceed 1 W. In addition, the maximum power spectral density shall not exceed 30 dBm in any 500-kHz band. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi. However, fixed point-to-point U-NII devices operating in this band may employ transmitting antennas with directional gain greater than 6 dBi without any corresponding reduction in transmitter conducted power. Fixed, point-to-point operations exclude the use of point-to-multipoint systems, omnidirectional applications, and multiple collocated transmitters transmitting the same information. The operator of the U-NII device, or if the equipment is professionally installed, the installer, is responsible for ensuring that systems employing high gain directional antennas are used exclusively for fixed, point-to-point operations.

3.4.2 EUT Setup



3.4.3 Test Procedure

According to ANSI C63.10-2013 Section 12.3.3.1

Method PM-G is measurement using a gated RF average power meter.

Measurements may be performed using a wideband gated RF power meter provided that the gate parameters are adjusted such that the power is measured only when the EUT is transmitting at its maximum power control level. Because the measurement is made only during the ON time of the transmitter, no duty cycle correction factor is required.

3.5 Maximum Power Spectral Density

3.5.1 Applicable Standard

FCC §15.407(a) (1)(i)

For an outdoor access point operating in the band 5.15-5.25 GHz, the maximum conducted output power over the frequency band of operation shall not exceed 1 W provided the maximum antenna gain does not exceed 6 dBi. In addition, the maximum power spectral density shall not exceed 17 dBm in any 1 megahertz band. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi. The maximum e.i.r.p. at any elevation angle above 30 degrees as measured from the horizon must not exceed 125 mW (21 dBm).

§

FCC §15.407(a) (2)§

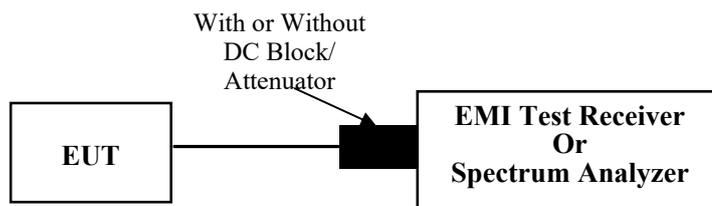
For the 5.25-5.35 GHz and 5.47-5.725 GHz bands, the maximum conducted output power over the frequency bands of operation shall not exceed the lesser of 250 mW or $11 \text{ dBm} + 10 \log B$, where B is the 26 dB emission bandwidth in megahertz. In addition, the maximum power spectral density shall not exceed 11 dBm in any 1 megahertz band. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.

§

FCC §15.407(a) (3)(i)

For the band 5.725-5.850 GHz, the maximum conducted output power over the frequency band of operation shall not exceed 1 W. In addition, the maximum power spectral density shall not exceed 30 dBm in any 500-kHz band. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi. However, fixed point-to-point U-NII devices operating in this band may employ transmitting antennas with directional gain greater than 6 dBi without any corresponding reduction in transmitter conducted power. Fixed, point-to-point operations exclude the use of point-to-multipoint systems, omnidirectional applications, and multiple collocated transmitters transmitting the same information. The operator of the U-NII device, or if the equipment is professionally installed, the installer, is responsible for ensuring that systems employing high gain directional antennas are used exclusively for fixed, point-to-point operations.

3.5.2 EUT Setup



3.5.3 Test Procedure

According to KDB 789033 D02 General UNII Test Procedures New Rules v02r01

Duty cycle $\geq 98\%$

KDB 789033 D02 General UNII Test Procedures New Rules v02r01 Method SA-1 should be applied.

Duty cycle $< 98\%$, duty cycle variations are less than $\pm 2\%$

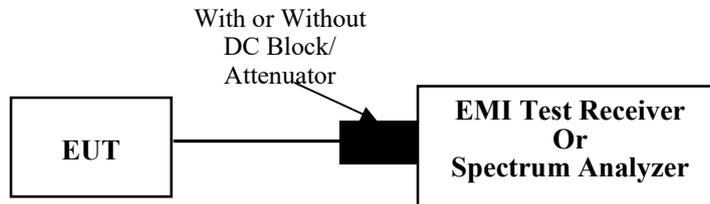
KDB 789033 D02 General UNII Test Procedures New Rules v02r01 Method SA-2 should be applied.

Duty cycle $< 98\%$, duty cycle variations exceed $\pm 2\%$

KDB 789033 D02 General UNII Test Procedures New Rules v02r01 Method SA-3 should be applied.

3.6 Duty Cycle

3.6.1 EUT Setup



3.6.2 Test Procedure

According to ANSI C63.10-2013 Section 12.2

The zero-span mode on a spectrum analyzer or EMI receiver if the response time and spacing between bins on the sweep are sufficient to permit accurate measurements of the ON and OFF times of the transmitted signal:

- 1) Set the center frequency of the instrument to the center frequency of the transmission.
- 2) Set $RBW \geq OBW$ if possible; otherwise, set RBW to the largest available value.
- 3) Set $VBW \geq RBW$. Set detector = peak or average.
- 4) The zero-span measurement method shall not be used unless both RBW and VBW are $> 50/T$ and the number of sweep points across duration T exceeds 100. (For example, if VBW and/or RBW are limited to 3 MHz, then the zero-span method of measuring the duty cycle shall not be used if $T \leq 16.7 \mu s$.)

3.7 Antenna Requirement

3.7.1 Applicable Standard

FCC §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 use of a standard antenna jack or electrical connector is prohibited. This requirement does not apply to carrier current devices or to devices operated under the provisions of §§15.211, 15.213, 15.217, 15.219, 15.221, or §15.236. Further, this requirement does not apply to intentional radiators that must be professionally installed, such as perimeter protection systems and some field disturbance sensors, or to other intentional radiators which, in accordance with §15.31(d), must be measured at the installation site. However, the installer shall be responsible for ensuring that the proper antenna is employed so that the limits in this part are not exceeded.

3.7.2 Judgment

Result: Compliant. Please refer to the Antenna Information detail in Section 1.

4. Test DATA AND RESULTS

4.1 AC Line Conducted Emissions

Not Applicable, the device was powered by battery when operating.

4.2 Radiation Spurious Emissions

4.2.1 9 kHz – 1 GHz

Sample Number:	2XO4-2	Test Date:	2025/2/7
Test Site:	966-2	Test Mode:	Transmitting (maximum output power mode, 1.4MHz 5789MHz)
Tester:	Roinin Fu	Test Result:	Pass

Environmental Conditions:

Temperature: (°C)	24.9	Relative Humidity: (%)	55	ATM Pressure: (kPa)	102.1
----------------------	------	---------------------------	----	---------------------------	-------

Test Equipment List and Details:

Manufacturer	Description	Model	Serial Number	Calibration Date	Calibration Due Date
Sunol Sciences	Antenna	JB6	A082520-5	2023/12/1	2026/11/30
BACL	Loop Antenna	1313-1A	3110611	2023/12/4	2026/12/3
Daruikang	Coaxial Cable	BNC-JJ-RG58	C-0300-01	2025/1/10	2026/1/9
Daruikang	Coaxial Cable	BNC-JJ-RG58	C-0500-01	2025/1/10	2026/1/9
R&S	EMI Test Receiver	ESR3	102724	2024/2/29	2025/2/28
TIMES MICROWAVE	Coaxial Cable	LMR-600- UltraFlex	C-0100-03	2024/12/3	2025/12/2
TIMES MICROWAVE	Coaxial Cable	LMR-600- UltraFlex	C-0370-01	2024/12/3	2025/12/2
XQY	Coaxial Cable	XQY- CMR400UF-NJ- NJ-7M	24056379	2024/6/11	2025/6/10
Sonoma	Amplifier	310N	186165	2024/12/3	2025/12/2
Audix	Test Software	E3	191218 (V9)	N/A	N/A

* Statement of Traceability: China Certification ICT Co., Ltd (Dongguan) attests that all calibrations have been performed, traceable to National Primary Standards and International System of Units (SI).

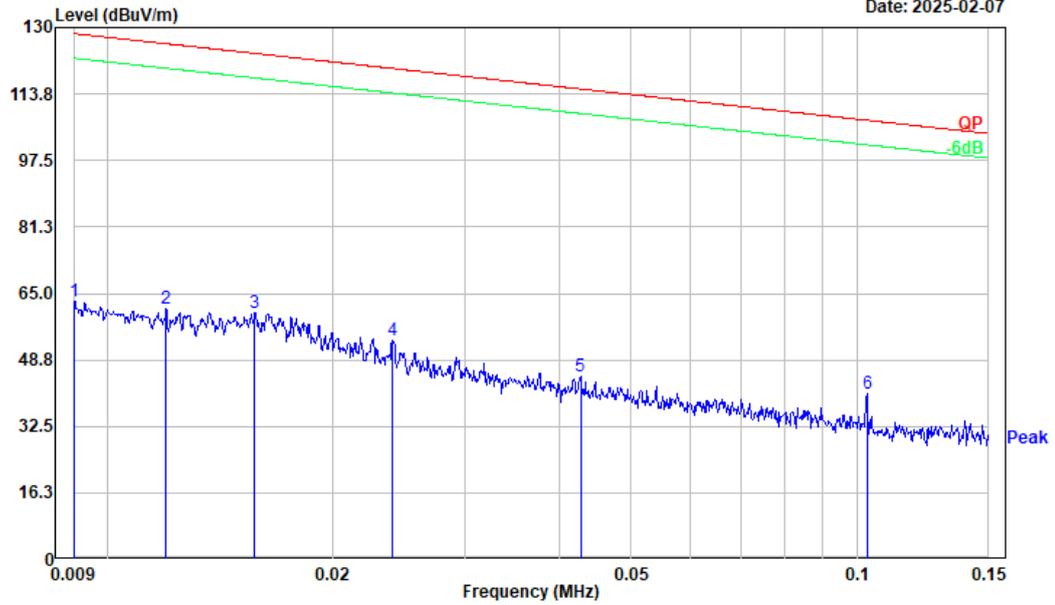
Test Data:

Please refer to the below table and plots.

1) 9 kHz-30 MHz

Project No.: 2503P42421E-RF
 Tester: Roinin Fu
 Condition: RBW:0.3 kHz VBW:1 kHz SWT:0.1 sec
 Polarization: Parallel
 Note: Transmitting

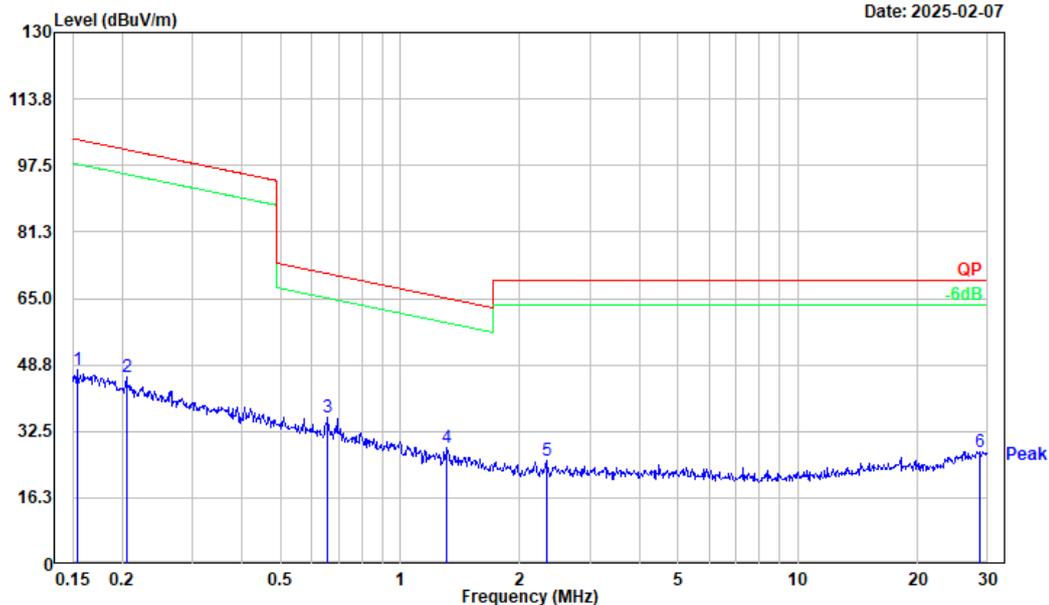
Date: 2025-02-07



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector
1	0.009	27.45	35.70	63.15	128.50	65.35	Peak
2	0.012	27.65	33.48	61.13	126.05	64.92	Peak
3	0.016	28.77	31.64	60.41	123.68	63.27	Peak
4	0.024	25.79	27.60	53.39	120.02	66.63	Peak
5	0.043	22.77	21.96	44.73	114.98	70.25	Peak
6	0.103	26.13	14.50	40.63	107.33	66.70	Peak

Project No.: 2503P42421E-RF
 Tester: Roinin Fu
 Condition: RBW:10 kHz VBW:30 kHz SWT:0.1 sec
 Polarization: Parallel
 Note: Transmitting

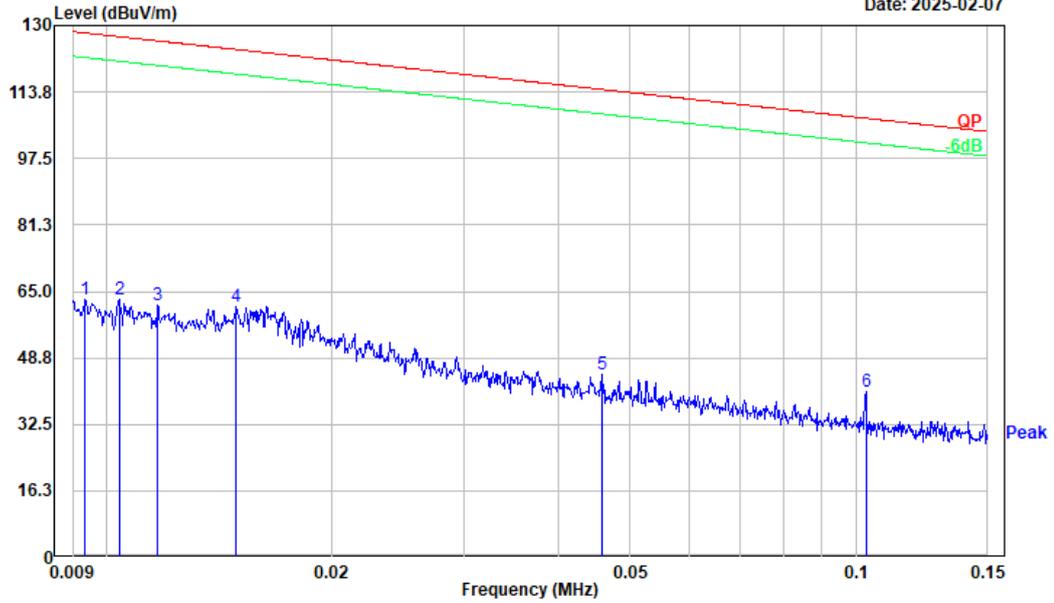
Date: 2025-02-07



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector
1	0.154	35.32	12.14	47.46	103.85	56.39	Peak
2	0.205	36.07	9.77	45.84	101.37	55.53	Peak
3	0.658	36.68	-0.85	35.83	71.19	35.36	Peak
4	1.310	33.88	-5.30	28.58	65.08	36.50	Peak
5	2.334	33.41	-7.93	25.48	69.54	44.06	Peak
6	28.603	34.89	-7.29	27.60	69.54	41.94	Peak

Project No.: 2503P42421E-RF
 Tester: Roinin Fu
 Condition: RBW:0.3 kHz VBW:1 kHz SWT:0.1 sec
 Polarization: Perpendicular
 Note: Transmitting

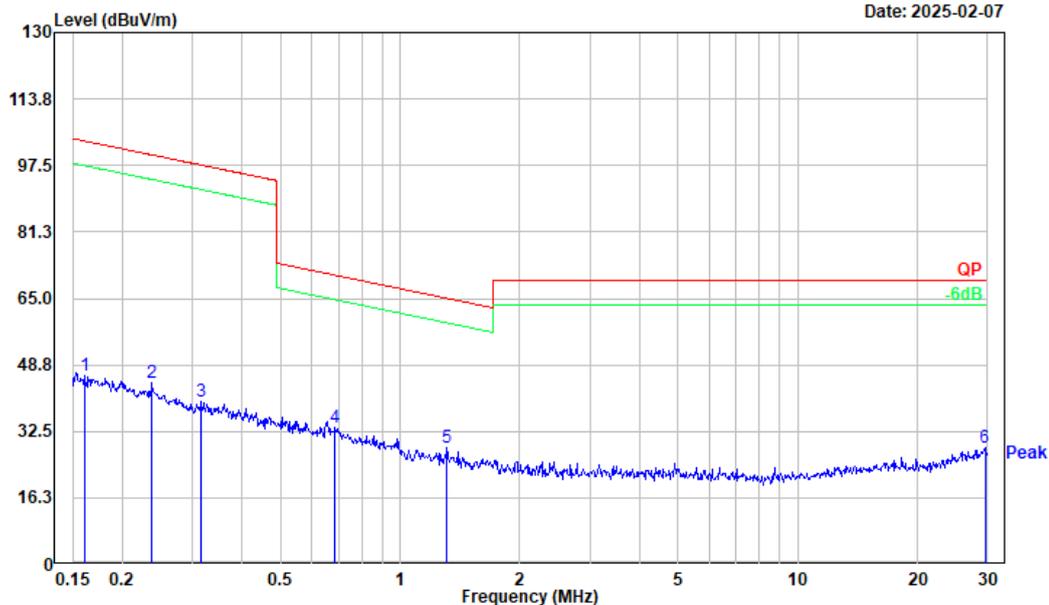
Date: 2025-02-07



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector
1	0.009	27.64	35.26	62.90	128.18	65.28	Peak
2	0.010	28.81	34.25	63.06	127.27	64.21	Peak
3	0.012	28.17	33.61	61.78	126.25	64.47	Peak
4	0.015	29.23	32.04	61.27	124.15	62.88	Peak
5	0.046	23.42	21.33	44.75	114.40	69.65	Peak
6	0.103	26.07	14.50	40.57	107.33	66.76	Peak

Project No.: 2503P42421E-RF
 Tester: Roinin Fu
 Condition: RBW:10 kHz VBW:30 kHz SWT:0.1 sec
 Polarization: Perpendicular
 Note: Transmitting

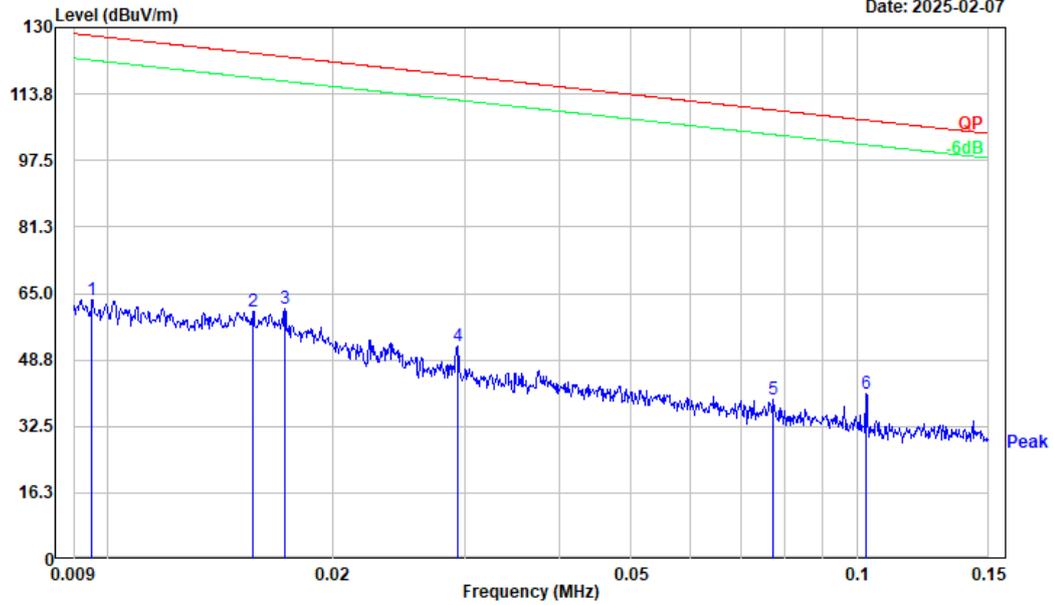
Date: 2025-02-07



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector
1	0.161	34.37	11.83	46.20	103.48	57.28	Peak
2	0.238	36.03	8.25	44.28	100.08	55.80	Peak
3	0.317	34.93	5.00	39.93	97.59	57.66	Peak
4	0.686	34.71	-1.18	33.53	70.81	37.28	Peak
5	1.310	33.81	-5.30	28.51	65.08	36.57	Peak
6	29.527	35.78	-7.14	28.64	69.54	40.90	Peak

Project No.: 2503P42421E-RF
 Tester: Roinin Fu
 Condition: RBW:0.3 kHz VBW:1 kHz SWT:0.1 sec
 Polarization: Ground-parallel
 Note: Transmitting

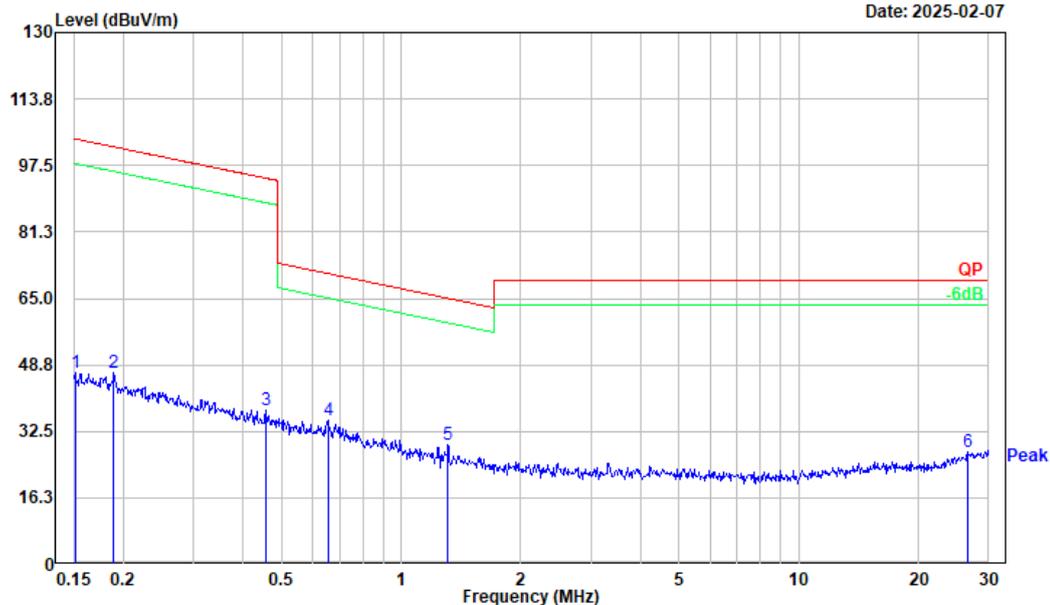
Date: 2025-02-07



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector
1	0.010	28.47	35.06	63.53	128.03	64.50	Peak
2	0.016	28.96	31.69	60.65	123.73	63.08	Peak
3	0.017	30.50	30.89	61.39	122.87	61.48	Peak
4	0.029	27.14	24.96	52.10	118.26	66.16	Peak
5	0.077	22.28	16.70	38.98	109.83	70.85	Peak
6	0.103	25.83	14.52	40.35	107.36	67.01	Peak

Project No.: 2503P42421E-RF
 Tester: Roinin Fu
 Condition: RBW:10 kHz VBW:30 kHz SWT:0.1 sec
 Polarization: Ground-parallel
 Note: Transmitting

Date: 2025-02-07

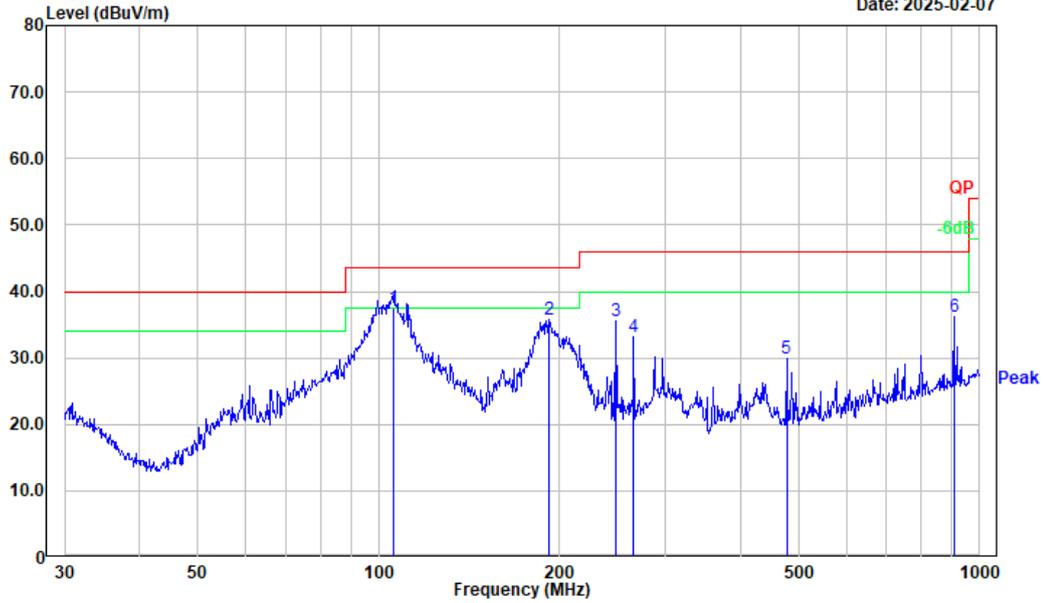


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector
1	0.152	34.48	12.25	46.73	103.99	57.26	Peak
2	0.189	36.40	10.49	46.89	102.06	55.17	Peak
3	0.459	35.85	1.88	37.73	94.37	56.64	Peak
4	0.654	36.20	-0.81	35.39	71.24	35.85	Peak
5	1.310	34.56	-5.30	29.26	65.08	35.82	Peak
6	26.558	34.87	-7.48	27.39	69.54	42.15	Peak

2) 30 MHz-1GHz:

Project No.: 2503P42421E-RF
 Tester: Roinin Fu
 Condition: RBW:100 kHz VBW:300 kHz SWT:0.1 sec
 Polarization: horizontal
 Note: Transmitting

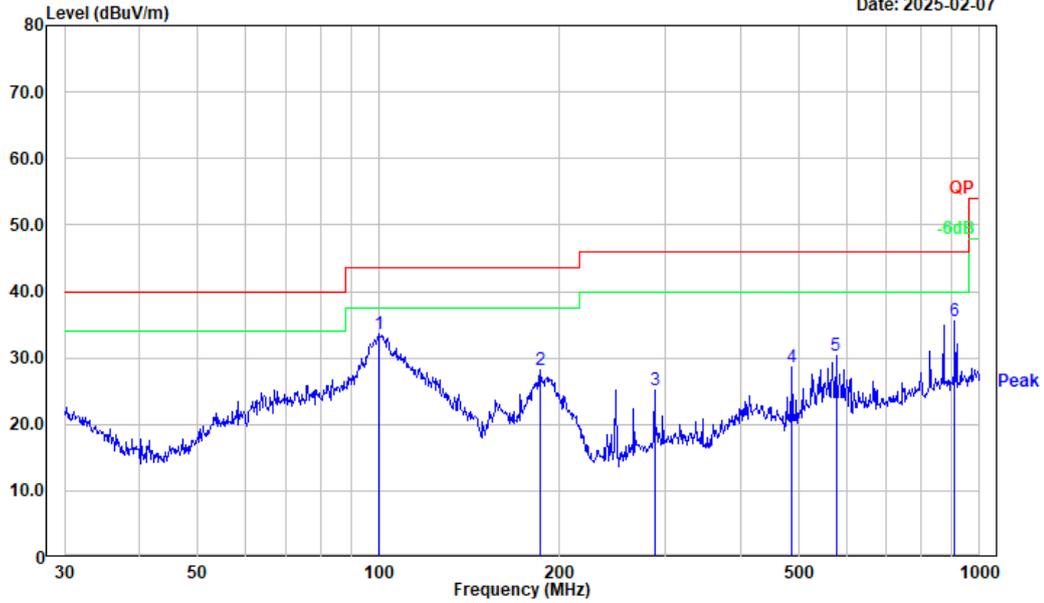
Date: 2025-02-07



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector
1	105.642	50.68	-13.07	37.61	43.50	5.89	QP
2	192.419	49.29	-13.49	35.80	43.50	7.70	Peak
3	248.552	48.45	-12.93	35.52	46.00	10.48	Peak
4	265.676	44.23	-11.10	33.13	46.00	12.87	Peak
5	477.169	36.22	-6.27	29.95	46.00	16.05	Peak
6	906.482	36.10	0.17	36.27	46.00	9.73	Peak

Project No.: 2503P42421E-RF
 Tester: Roinin Fu
 Condition: RBW:100 kHz VBW:300 kHz SWT:0.1 sec
 Polarization: vertical
 Note: Transmitting

Date: 2025-02-07



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector
1	99.878	48.26	-14.58	33.68	43.50	9.82	Peak
2	185.788	41.98	-13.82	28.16	43.50	15.34	Peak
3	287.990	35.57	-10.44	25.13	46.00	20.87	Peak
4	487.315	34.83	-6.11	28.72	46.00	17.28	Peak
5	576.644	34.97	-4.64	30.33	46.00	15.67	Peak
6	909.667	35.25	0.29	35.54	46.00	10.46	Peak

4.2.2 1 GHz – 40 GHz

Sample Number	2XO4-2	Test Date:	2025/1/24~2025/2/5
Test Site:	966-1	Test Mode:	Transmitting
Tester:	Mack Huang	Test Result:	Pass

Environmental Conditions:

Temperature: (°C)	21.7-23.2	Relative Humidity: (%)	35-41	ATM Pressure: (kPa)	101.2-101.4
----------------------	-----------	---------------------------	-------	---------------------------	-------------

Test Equipment List and Details:

Manufacturer	Description	Model	Serial Number	Calibration Date	Calibration Due Date
ETS-Lindgren	Horn Antenna	3115	9912-5985	2023/12/06	2026/12/05
R&S	Spectrum Analyzer	FSV40	101591	2024/04/01	2025/03/31
MICRO-COAX	Coaxial Cable	UFA210A-1-1200-70U300	217423-008	2025/01/10	2026/01/09
MICRO-COAX	Coaxial Cable	UFA210A-1-2362-300300	235780-001	2025/01/10	2026/01/09
BACL	Preamplifier	1313-A20M18G	4032311	2024/04/01	2025/03/31
Audix	Test Software	E3	191218 (V9)	N/A	N/A
PASTERNAK	Horn Antenna	PE9852/2F-20	112002	2024/02/04	2027/02/03
PASTERNAK	Horn Antenna	PE9850/2F-20	072001	2024/2/4	2027/2/3
Quinstar	Preamplifier	QLW-18405536-JO	15964001005	2025/01/06	2026/01/05
MICRO-COAX	Coaxial Cable	UFB142A-1-2362-200200	235772-001	2025/01/06	2026/01/05
JD	Multiplex Switch Test Control Set	DT7220SCU	DQ77925	2024/08/05	2025/08/04
JD	Filter Switch Unit	DT7220FSU	DQ77928	2024/08/05	2025/08/04

* Statement of Traceability: China Certification ICT Co., Ltd (Dongguan) attests that all calibrations have been performed, traceable to National Primary Standards and International System of Units (SI).

5150-5250MHz**1.4MHz, QPSK:**

Frequency (MHz)	Receiver		Polar (H/V)	Factor (dB/m)	Result (dB μ V/m)	Limit (dB μ V/m)	Margin (dB)
	Reading (dB μ V)	Remark					
Low Channel:				5154	MHz		
10308.000	37.24	PK	H	12.75	49.99	68.20	18.21
10308.000	36.85	PK	V	12.75	49.60	68.20	18.60
15462.000	35.22	PK	H	17.76	52.98	74.00	21.02
15462.000	23.01	AV	H	17.76	40.77	54.00	13.23
15462.000	37.49	PK	V	17.76	55.25	74.00	18.75
15462.000	25.94	AV	V	17.76	43.70	54.00	10.30
Middle Channel:				5201	MHz		
10402.000	35.12	PK	H	13.57	48.69	68.20	19.51
10402.000	36.20	PK	V	13.57	49.77	68.20	18.43
15603.000	37.46	PK	H	16.52	53.98	74.00	20.02
15603.000	25.96	AV	H	16.52	42.48	54.00	11.52
15603.000	37.36	PK	V	16.52	53.88	74.00	20.12
15603.000	25.45	AV	V	16.52	41.97	54.00	12.03
High Channel:				5246	MHz		
10492.000	34.77	PK	H	14.44	49.21	68.20	18.99
10492.000	35.11	PK	V	14.44	49.55	68.20	18.65
15738.000	35.64	PK	H	16.44	52.08	74.00	21.92
15738.000	23.97	AV	H	16.44	40.41	54.00	13.59
15738.000	35.78	PK	V	16.44	52.22	74.00	21.78
15738.000	23.63	AV	V	16.44	40.07	54.00	13.93

10MHz, QPSK:

Frequency (MHz)	Receiver		Polar (H/V)	Factor (dB/m)	Result (dB μ V/m)	Limit (dB μ V/m)	Margin (dB)
	Reading (dB μ V)	Remark					
Low Channel:				5157	MHz		
10314.000	35.57	PK	H	12.80	48.37	68.20	19.83
10314.000	34.99	PK	V	12.80	47.79	68.20	20.41
15471.000	35.68	PK	H	17.80	53.48	74.00	20.52
15471.000	23.69	AV	H	17.80	41.49	54.00	12.51
15471.000	35.74	PK	V	17.80	53.54	74.00	20.46
15471.000	23.12	AV	V	17.80	40.92	54.00	13.08
Middle Channel:				5201	MHz		
10402.000	35.89	PK	H	13.57	49.46	68.20	18.74
10402.000	35.03	PK	V	13.57	48.60	68.20	19.60
15603.000	35.70	PK	H	16.52	52.22	74.00	21.78
15603.000	23.53	AV	H	16.52	40.05	54.00	13.95
15603.000	34.98	PK	V	16.52	51.50	74.00	22.50
15603.000	22.54	AV	V	16.52	39.06	54.00	14.94
High Channel:				5243	MHz		
10486.000	35.12	PK	H	14.38	49.50	68.20	18.70
10486.000	34.36	PK	V	14.38	48.74	68.20	19.46
15729.000	34.55	PK	H	16.38	50.93	74.00	23.07
15729.000	22.51	AV	H	16.38	38.89	54.00	15.11
15729.000	35.27	PK	V	16.38	51.65	74.00	22.35
15729.000	23.64	AV	V	16.38	40.02	54.00	13.98

20MHz, QPSK:

Frequency (MHz)	Receiver		Polar (H/V)	Factor (dB/m)	Result (dB μ V/m)	Limit (dB μ V/m)	Margin (dB)
	Reading (dB μ V)	Remark					
Low Channel:				5167	MHz		
10334.000	33.80	PK	H	12.97	46.77	68.20	21.43
10334.000	34.58	PK	V	12.97	47.55	68.20	20.65
15501.000	33.93	PK	H	17.90	51.83	74.00	22.17
15501.000	21.25	AV	H	17.90	39.15	54.00	14.85
15501.000	34.19	PK	V	17.90	52.09	74.00	21.91
15501.000	22.23	AV	V	17.90	40.13	54.00	13.87
Middle Channel:				5201	MHz		
10402.000	34.20	PK	H	13.57	47.77	68.20	20.43
10402.000	34.57	PK	V	13.57	48.14	68.20	20.06
15603.000	35.59	PK	H	16.52	52.11	74.00	21.89
15603.000	22.58	AV	H	16.52	39.10	54.00	14.90
15603.000	35.65	PK	V	16.52	52.17	74.00	21.83
15603.000	22.82	AV	V	16.52	39.34	54.00	14.66
High Channel:				5233	MHz		
10466.000	33.66	PK	H	14.18	47.84	68.20	20.36
10466.000	33.36	PK	V	14.18	47.54	68.20	20.66
15699.000	37.50	PK	H	16.18	53.68	74.00	20.32
15699.000	25.12	AV	H	16.18	41.30	54.00	12.70
15699.000	37.35	PK	V	16.18	53.53	74.00	20.47
15699.000	25.41	AV	V	16.18	41.59	54.00	12.41

5725-5850MHz
1.4MHz, QPSK:

Frequency (MHz)	Receiver		Polar (H/V)	Factor (dB/m)	Result (dB μ V/m)	Limit (dB μ V/m)	Margin (dB)
	Reading (dB μ V)	Remark					
Low Channel:				5728	MHz		
11456.000	34.54	PK	H	14.01	48.55	74.00	25.45
11456.000	22.06	AV	H	14.01	36.07	54.00	17.93
11456.000	35.38	PK	V	14.01	49.39	74.00	24.61
11456.000	23.61	AV	V	14.01	37.62	54.00	16.38
17184.000	35.82	PK	H	21.60	57.42	68.20	10.78
17184.000	34.89	PK	V	21.60	56.49	68.20	11.71
Middle Channel:				5789	MHz		
11578.000	36.12	PK	H	15.76	51.88	74.00	22.12
11578.000	24.39	AV	H	15.76	40.15	54.00	13.85
11578.000	35.85	PK	V	15.76	51.61	74.00	22.39
11578.000	23.11	AV	V	15.76	38.87	54.00	15.13
17367.000	35.10	PK	H	21.64	56.74	68.20	11.46
17367.000	34.96	PK	V	21.64	56.60	68.20	11.60
High Channel:				5847	MHz		
11694.000	36.01	PK	H	15.19	51.20	74.00	22.80
11694.000	24.35	AV	H	15.19	39.54	54.00	14.46
11694.000	35.76	PK	V	15.19	50.95	74.00	23.05
11694.000	23.45	AV	V	15.19	38.64	54.00	15.36
17541.000	34.39	PK	H	23.40	57.79	68.20	10.41
17541.000	34.85	PK	V	23.40	58.25	68.20	9.95

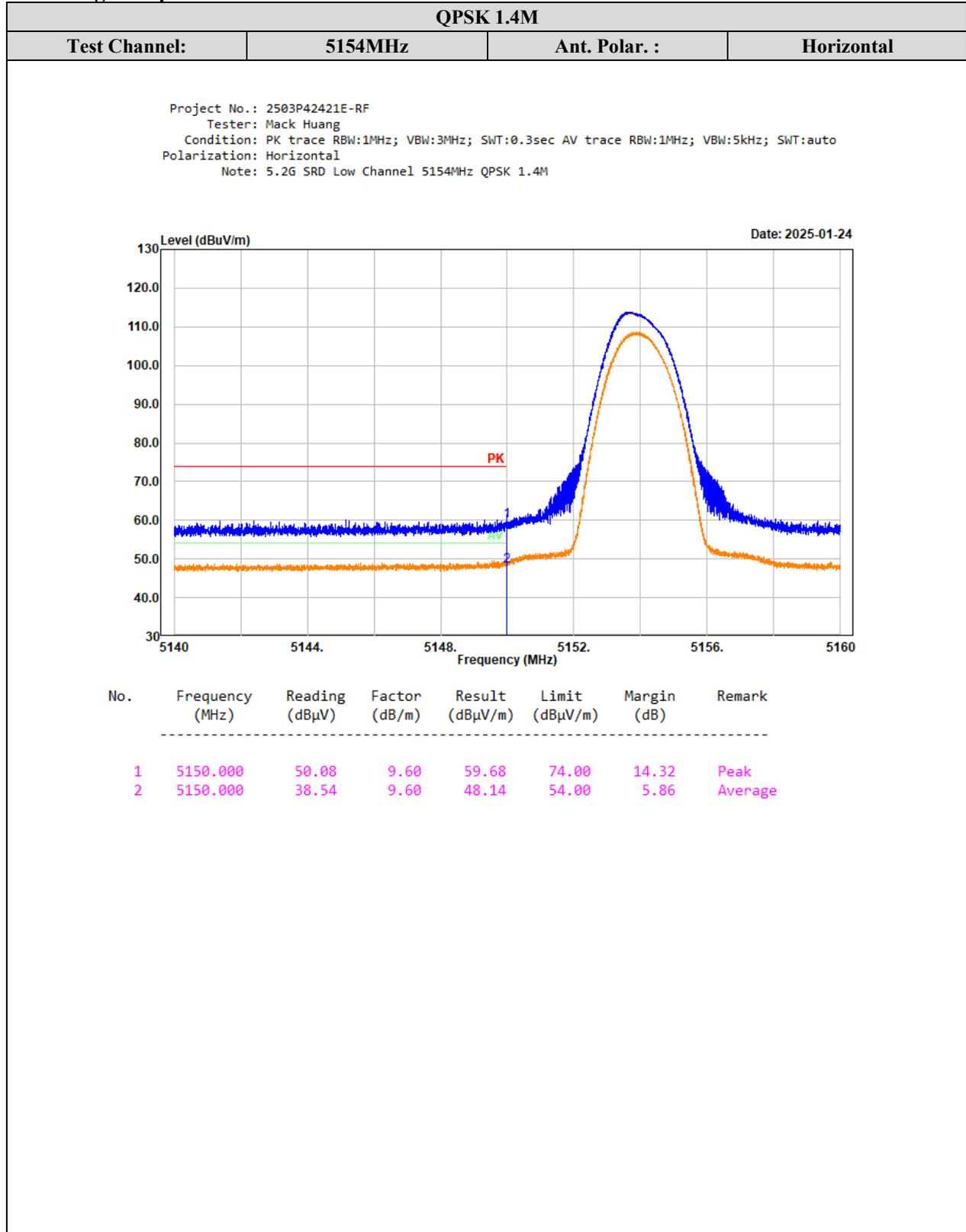
10MHz, QPSK:

Frequency (MHz)	Receiver		Polar (H/V)	Factor (dB/m)	Result (dB μ V/m)	Limit (dB μ V/m)	Margin (dB)
	Reading (dB μ V)	Remark					
Low Channel:				5733	MHz		
11466.000	35.58	PK	H	14.06	49.64	74.00	24.36
11466.000	23.41	AV	H	14.06	37.47	54.00	16.53
11466.000	34.39	PK	V	14.06	48.45	74.00	25.55
11466.000	22.55	AV	V	14.06	36.61	54.00	17.39
17199.000	34.89	PK	H	21.60	56.49	68.20	11.71
17199.000	35.01	PK	V	21.60	56.61	68.20	11.59
Middle Channel:				5789	MHz		
11578.000	34.74	PK	H	15.76	50.50	74.00	23.50
11578.000	22.30	AV	H	15.76	38.06	54.00	15.94
11578.000	35.26	PK	V	15.76	51.02	74.00	22.98
11578.000	23.14	AV	V	15.76	38.90	54.00	15.10
17367.000	34.79	PK	H	21.64	56.43	68.20	11.77
17367.000	35.19	PK	V	21.64	56.83	68.20	11.37
High Channel:				5842	MHz		
11684.000	35.01	PK	H	15.29	50.30	74.00	23.70
11684.000	23.66	AV	H	15.29	38.95	54.00	15.05
11684.000	34.87	PK	V	15.29	50.16	74.00	23.84
11684.000	22.96	AV	V	15.29	38.25	54.00	15.75
17526.000	33.45	PK	H	23.14	56.59	68.20	11.61
17526.000	34.62	PK	V	23.14	57.76	68.20	10.44

20MHz, QPSK:

Frequency (MHz)	Receiver		Polar (H/V)	Factor (dB/m)	Result (dB μ V/m)	Limit (dB μ V/m)	Margin (dB)
	Reading (dB μ V)	Remark					
Low Channel:				5738	MHz		
11476.000	33.58	PK	H	14.11	47.69	74.00	26.31
11476.000	21.41	AV	H	14.11	35.52	54.00	18.48
11476.000	33.20	PK	V	14.11	47.31	74.00	26.69
11476.000	21.20	AV	V	14.11	35.31	54.00	18.69
17214.000	34.13	PK	H	21.57	55.70	68.20	12.50
17214.000	34.11	PK	V	21.57	55.68	68.20	12.52
Middle Channel:				5790	MHz		
11580.000	34.44	PK	H	15.80	50.24	74.00	23.76
11580.000	22.56	AV	H	15.80	38.36	54.00	15.64
11580.000	33.96	PK	V	15.80	49.76	74.00	24.24
11580.000	21.84	AV	V	15.80	37.64	54.00	16.36
17370.000	34.02	PK	H	21.65	55.67	68.20	12.53
17367.000	33.57	PK	V	21.64	55.21	68.20	12.99
High Channel:				5839	MHz		
11678.000	33.73	PK	H	15.36	49.09	74.00	24.91
11678.000	21.28	AV	H	15.36	36.64	54.00	17.36
11678.000	34.24	PK	V	15.36	49.60	74.00	24.40
11678.000	22.06	AV	V	15.36	37.42	54.00	16.58
17517.000	34.36	PK	H	22.99	57.35	68.20	10.85
17517.000	34.46	PK	V	22.99	57.45	68.20	10.75

Band edge test plots

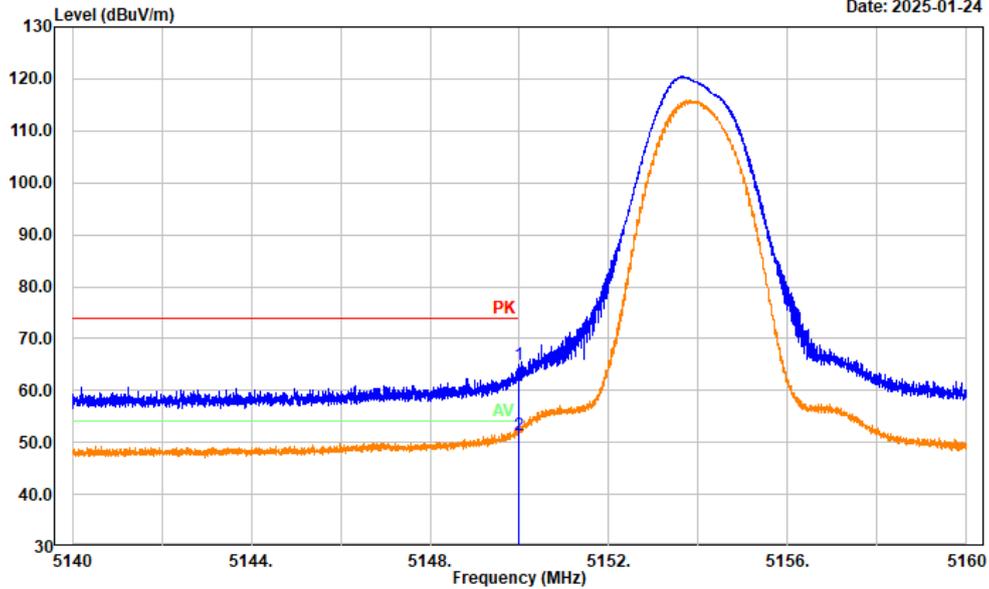


QPSK 1.4M

Test Channel:	5154MHz	Ant. Polar. :	Vertical
----------------------	----------------	----------------------	-----------------

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: Vertical
 Note: 5.2G SRD Low Channel 5154MHz QPSK 1.4M

Date: 2025-01-24

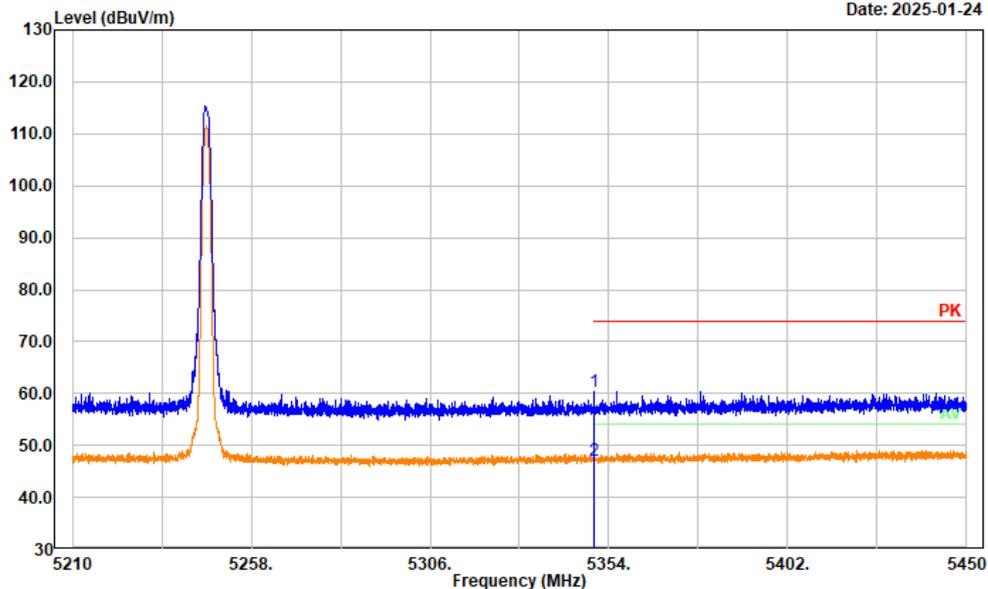


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5150.000	55.33	9.60	64.93	74.00	9.07	Peak
2	5150.000	41.84	9.60	51.44	54.00	2.56	Average

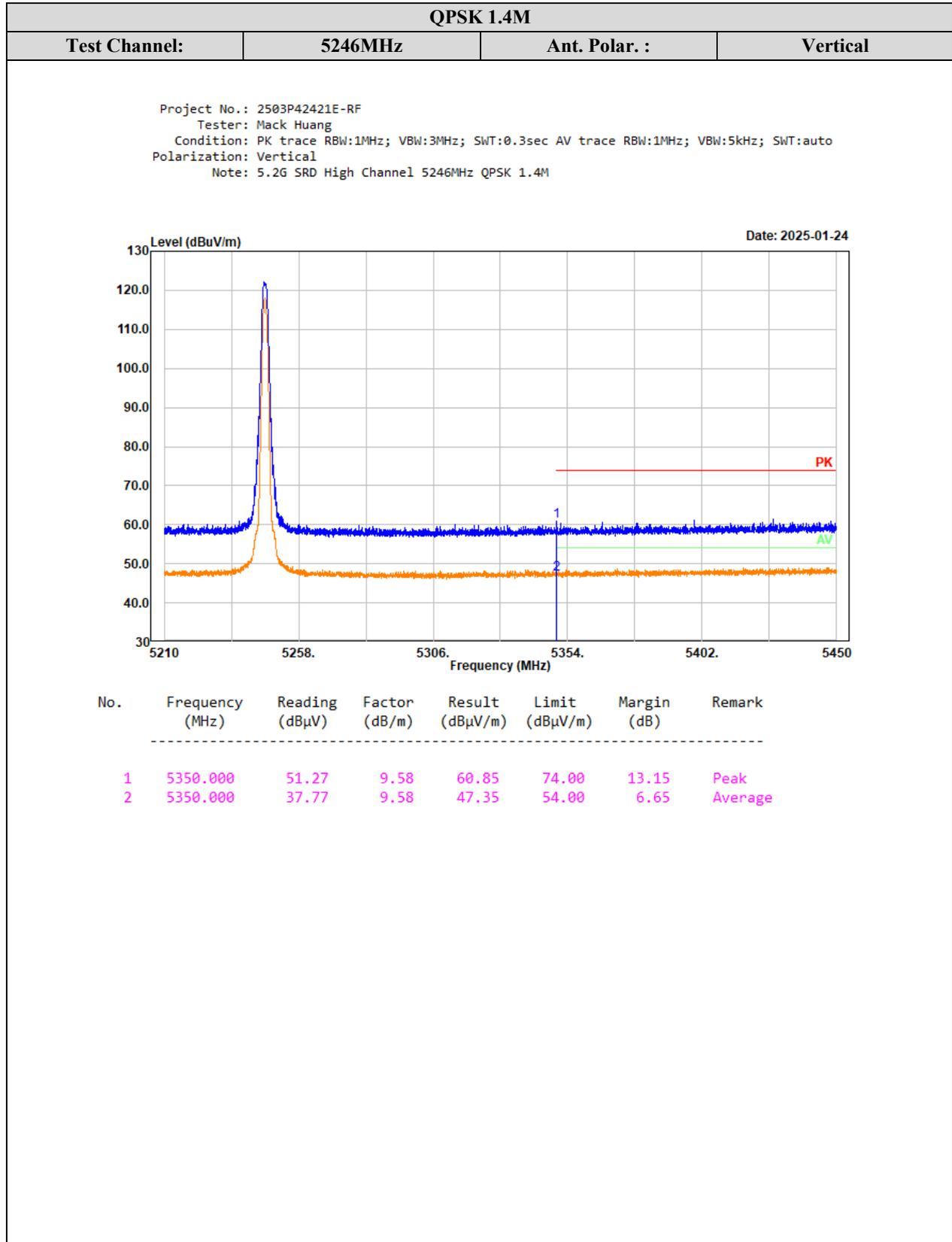
QPSK 1.4M			
Test Channel:	5246MHz	Ant. Polar. :	Horizontal

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: Horizontal
 Note: 5.2G SRD High Channel 5246MHz QPSK 1.4M

Date: 2025-01-24



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5350.000	50.67	9.58	60.25	74.00	13.75	Peak
2	5350.000	37.52	9.58	47.10	54.00	6.90	Average

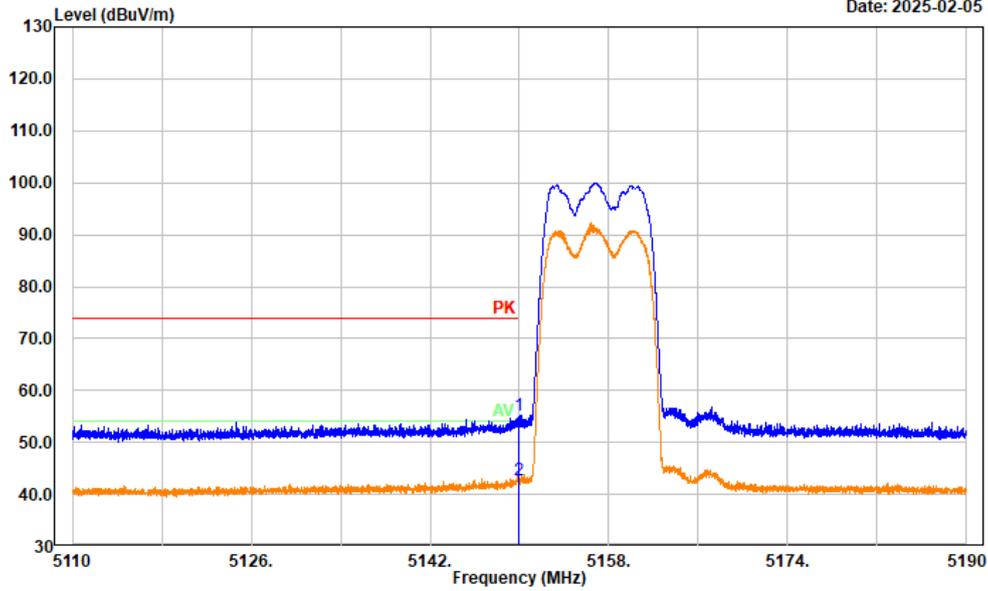


QPSK 10M

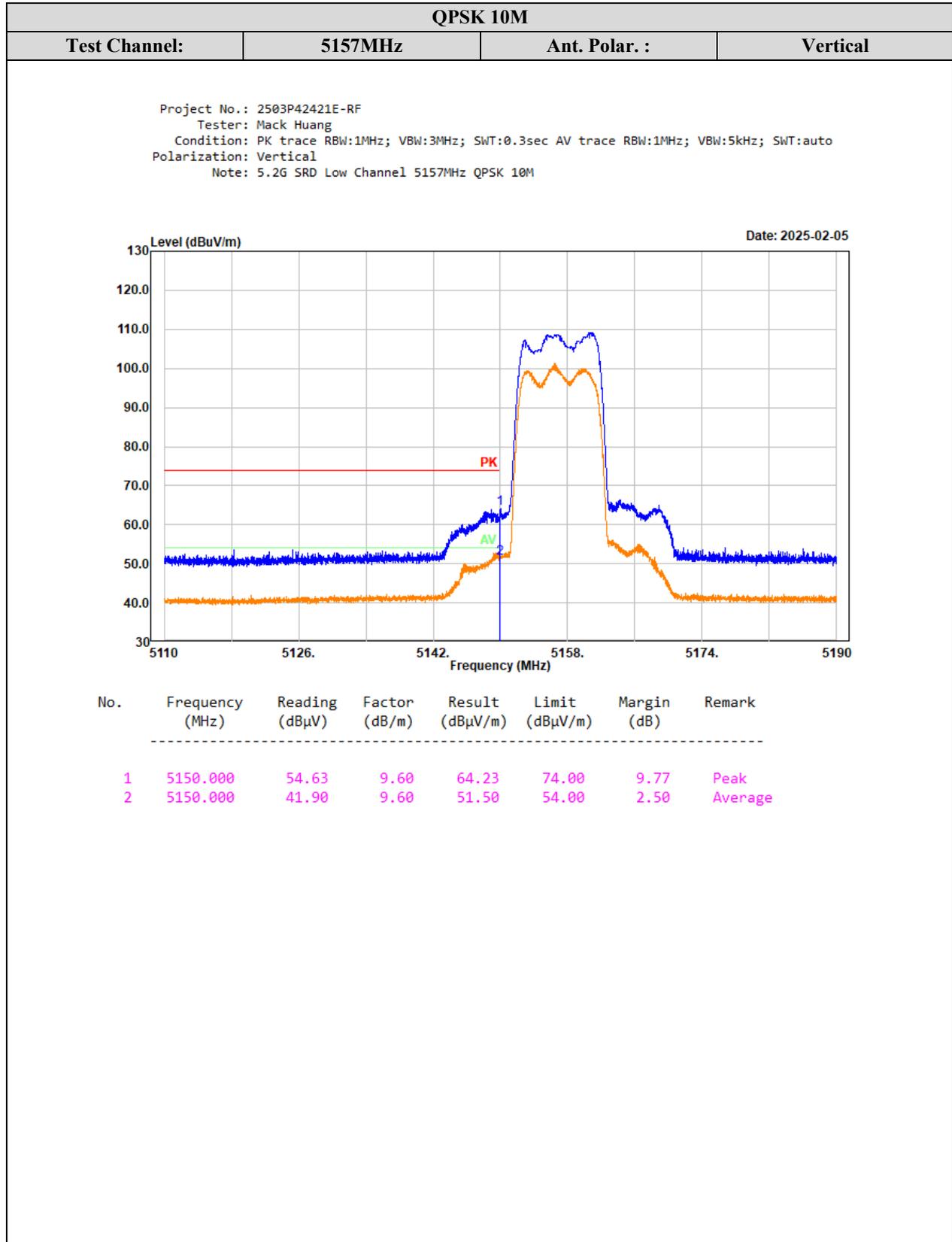
Test Channel:	5157MHz	Ant. Polar. :	Horizontal
----------------------	----------------	----------------------	-------------------

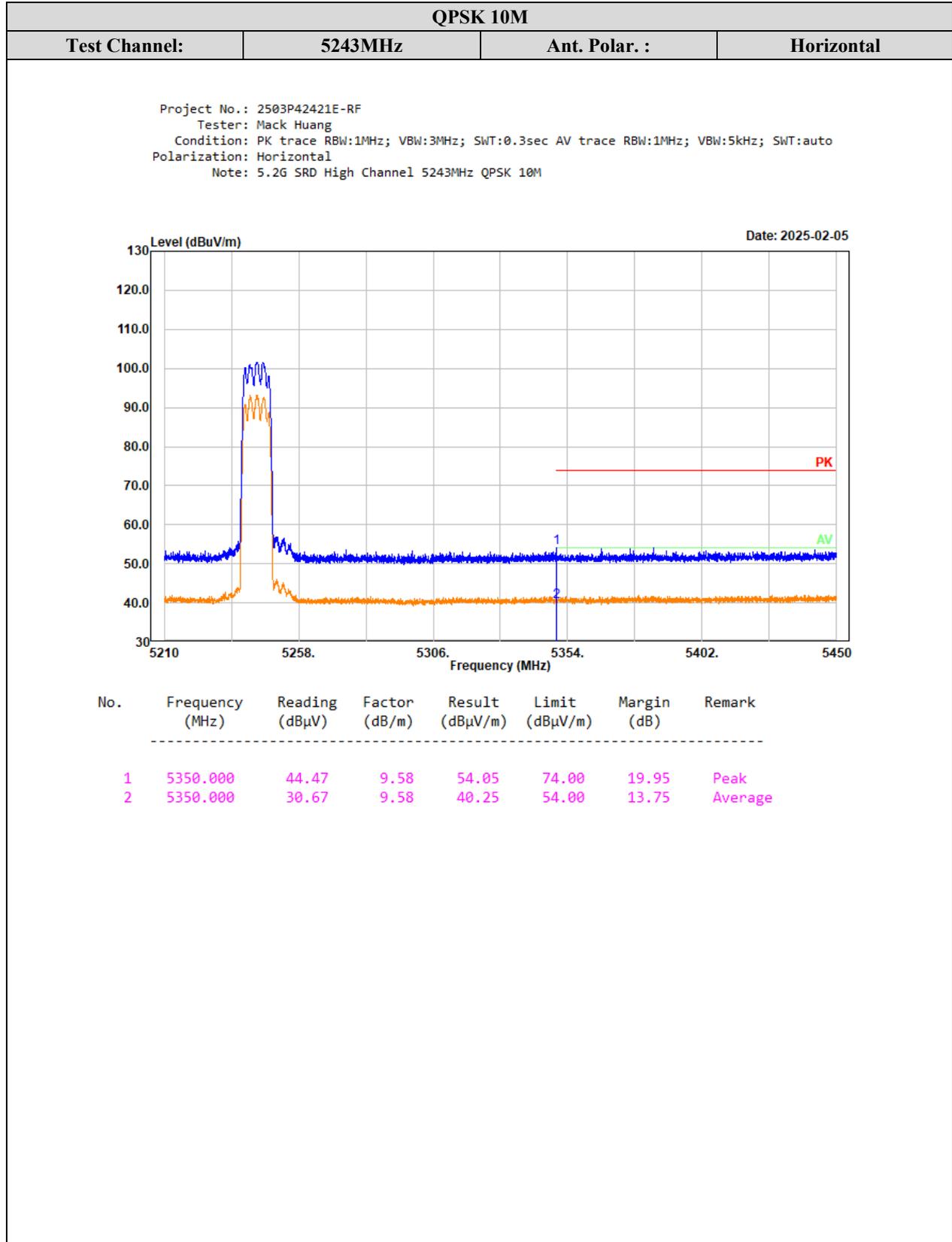
Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: Horizontal
 Note: 5.2G SRD Low Channel 5157MHz QPSK 10M

Date: 2025-02-05



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5150.000	45.57	9.60	55.17	74.00	18.83	Peak
2	5150.000	33.01	9.60	42.61	54.00	11.39	Average



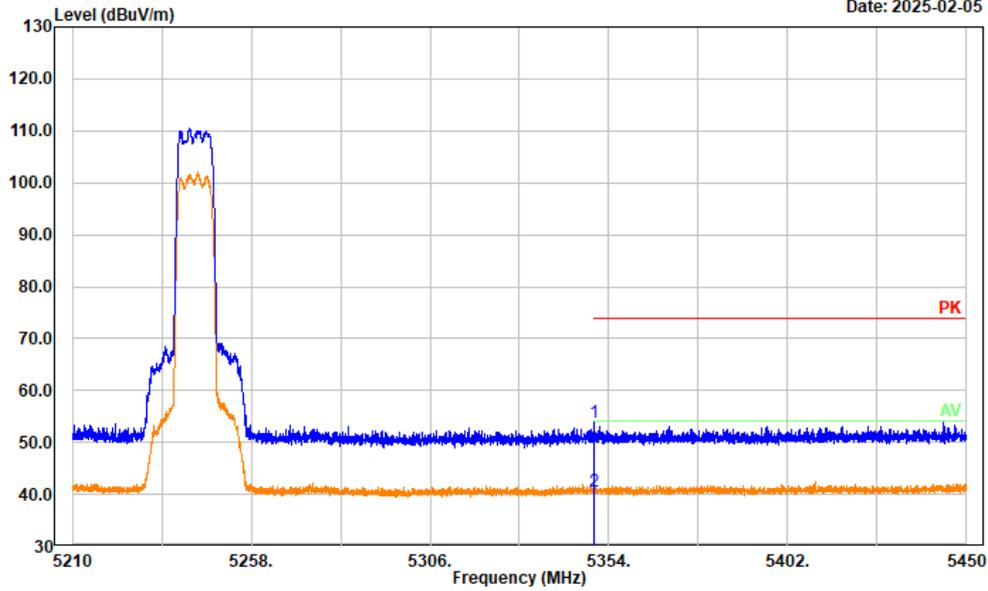


QPSK 10M

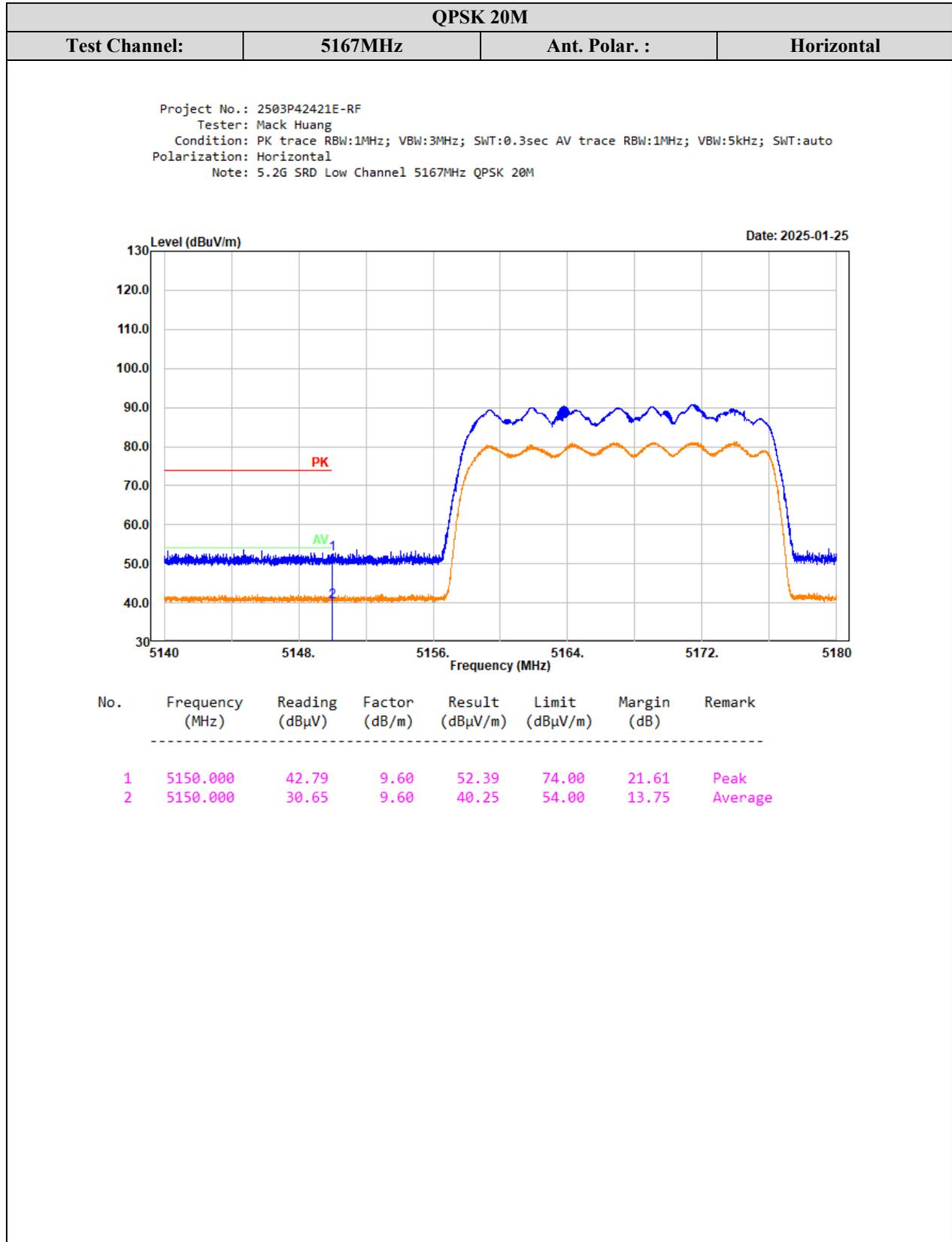
Test Channel:	5243MHz	Ant. Polar. :	Vertical
----------------------	----------------	----------------------	-----------------

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: Vertical
 Note: 5.2G SRD High Channel 5243MHz QPSK 10M

Date: 2025-02-05



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5350.000	44.34	9.58	53.92	74.00	20.08	Peak
2	5350.000	30.86	9.58	40.44	54.00	13.56	Average

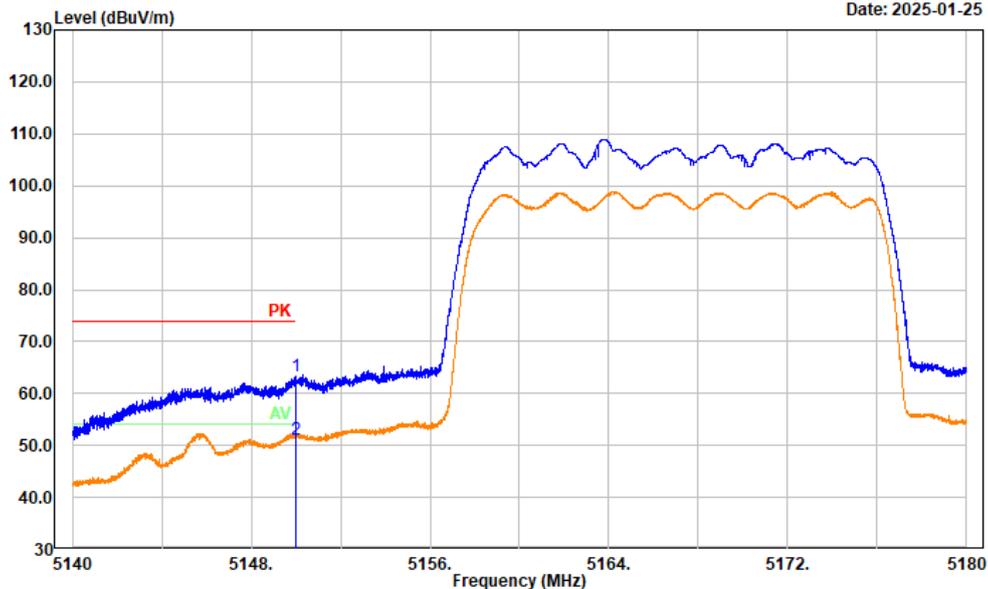


QPSK 20M

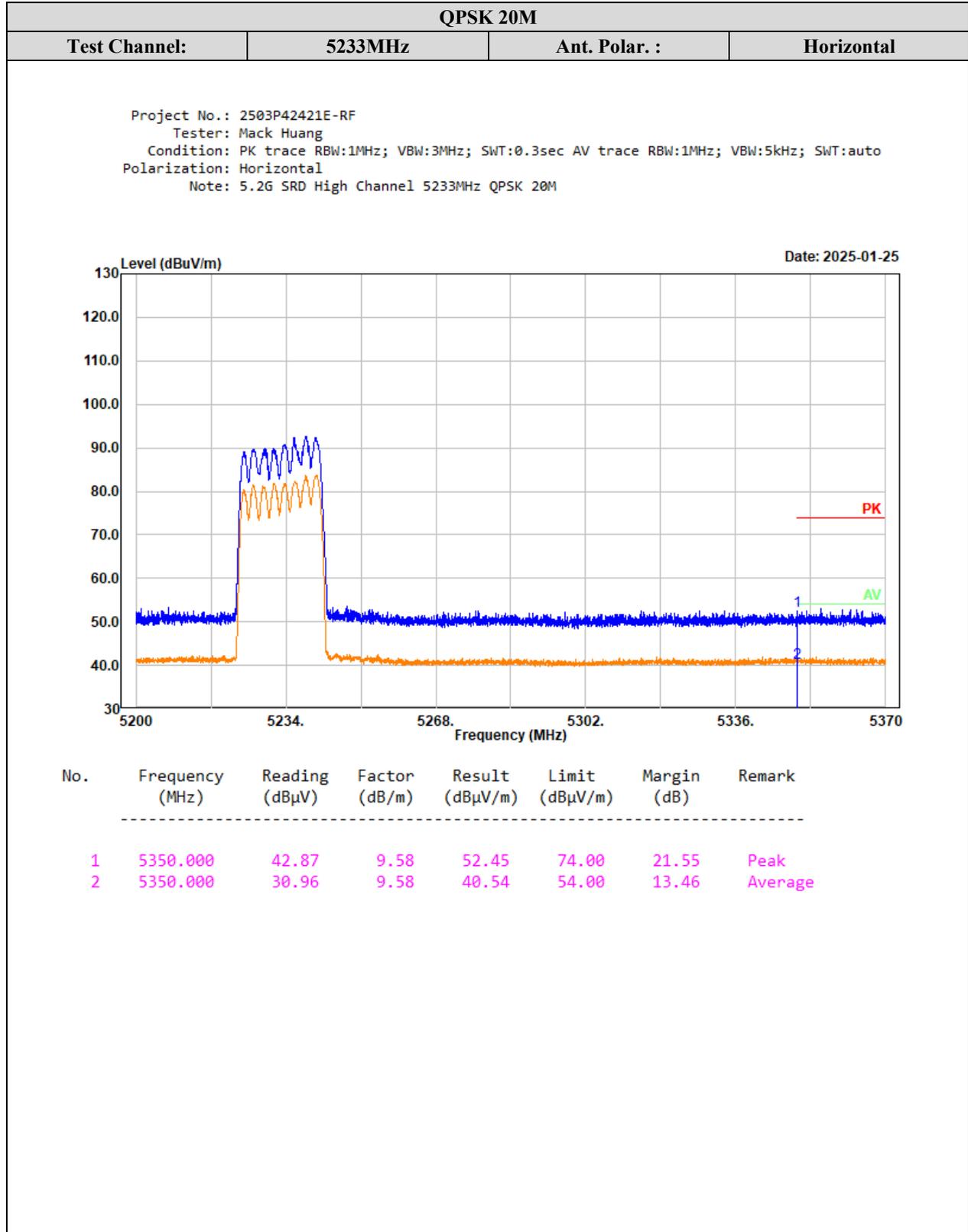
Test Channel:	5167MHz	Ant. Polar. :	Vertical
----------------------	----------------	----------------------	-----------------

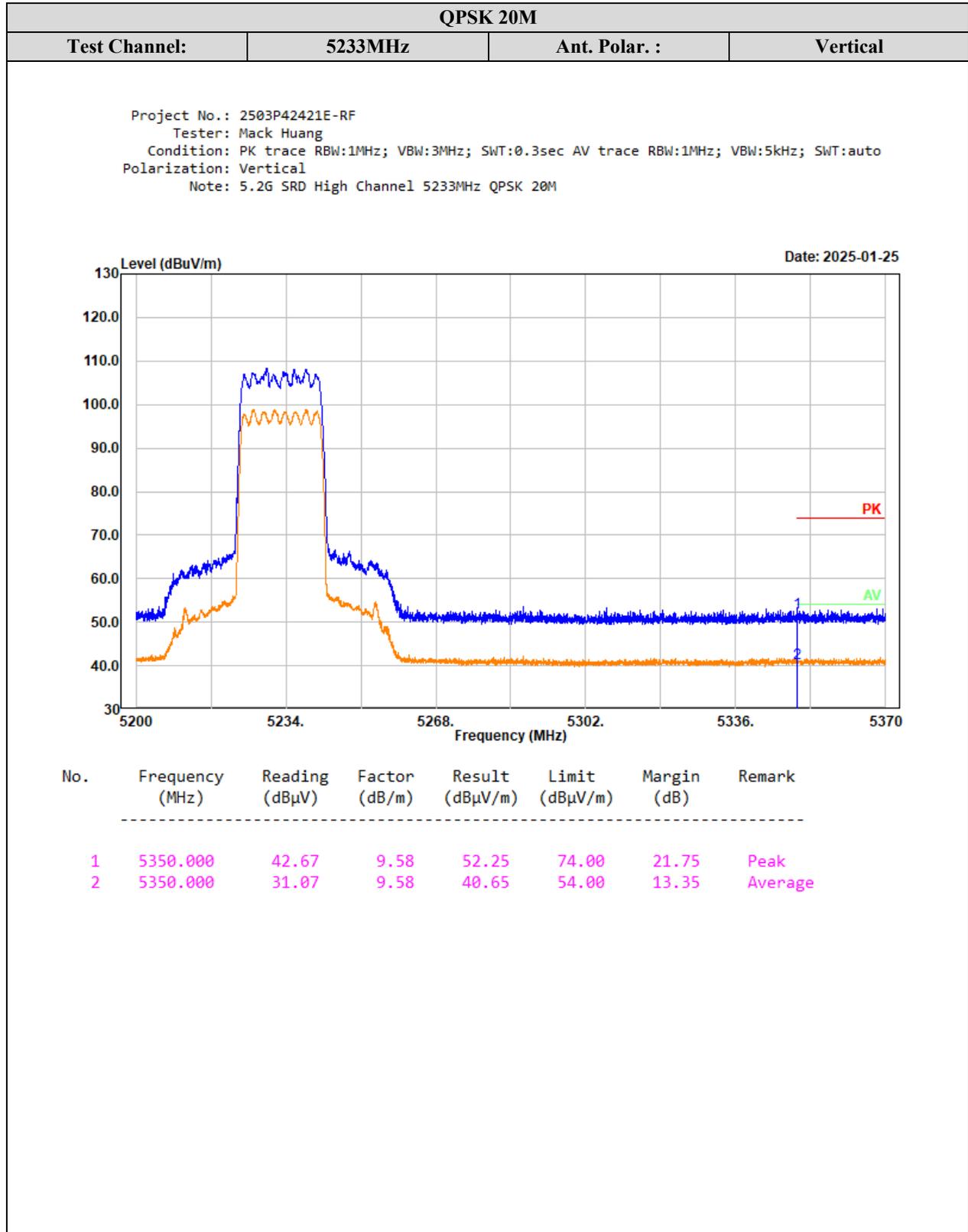
Project No. : 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: Vertical
 Note: 5.2G SRD Low Channel 5167MHz QPSK 20M

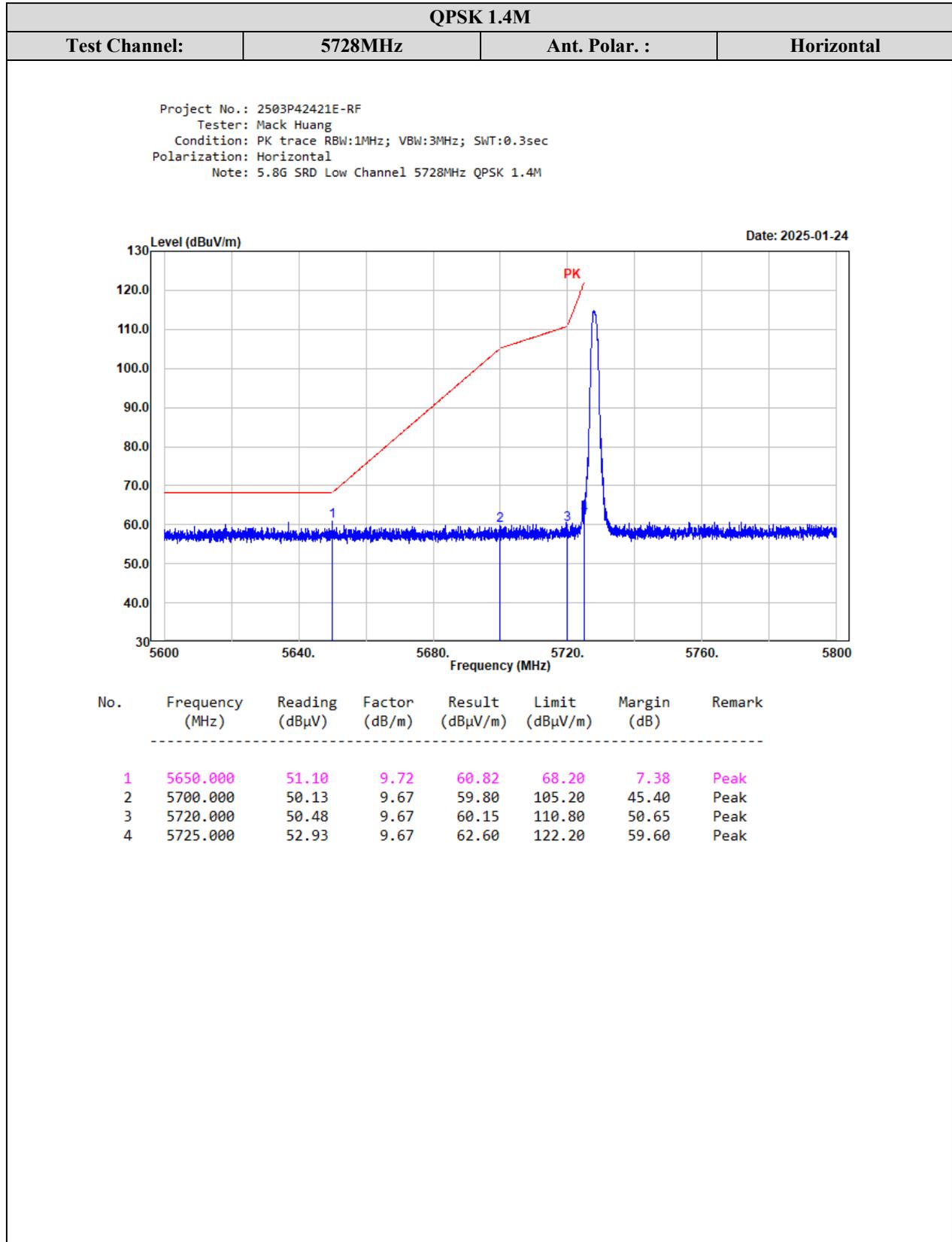
Date: 2025-01-25



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5150.000	53.71	9.60	63.31	74.00	10.69	Peak
2	5150.000	41.65	9.60	51.25	54.00	2.75	Average





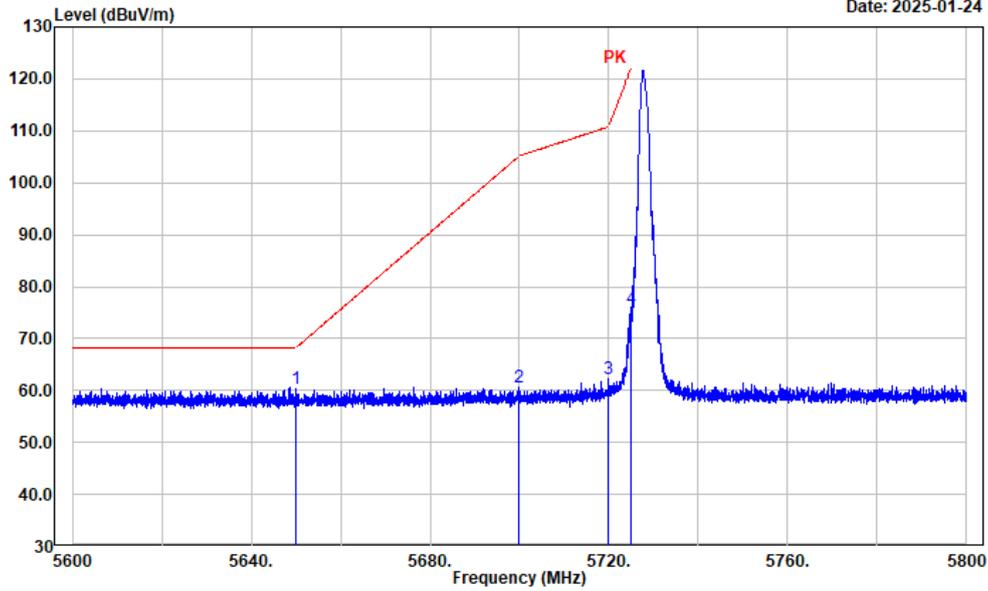


QPSK 1.4M

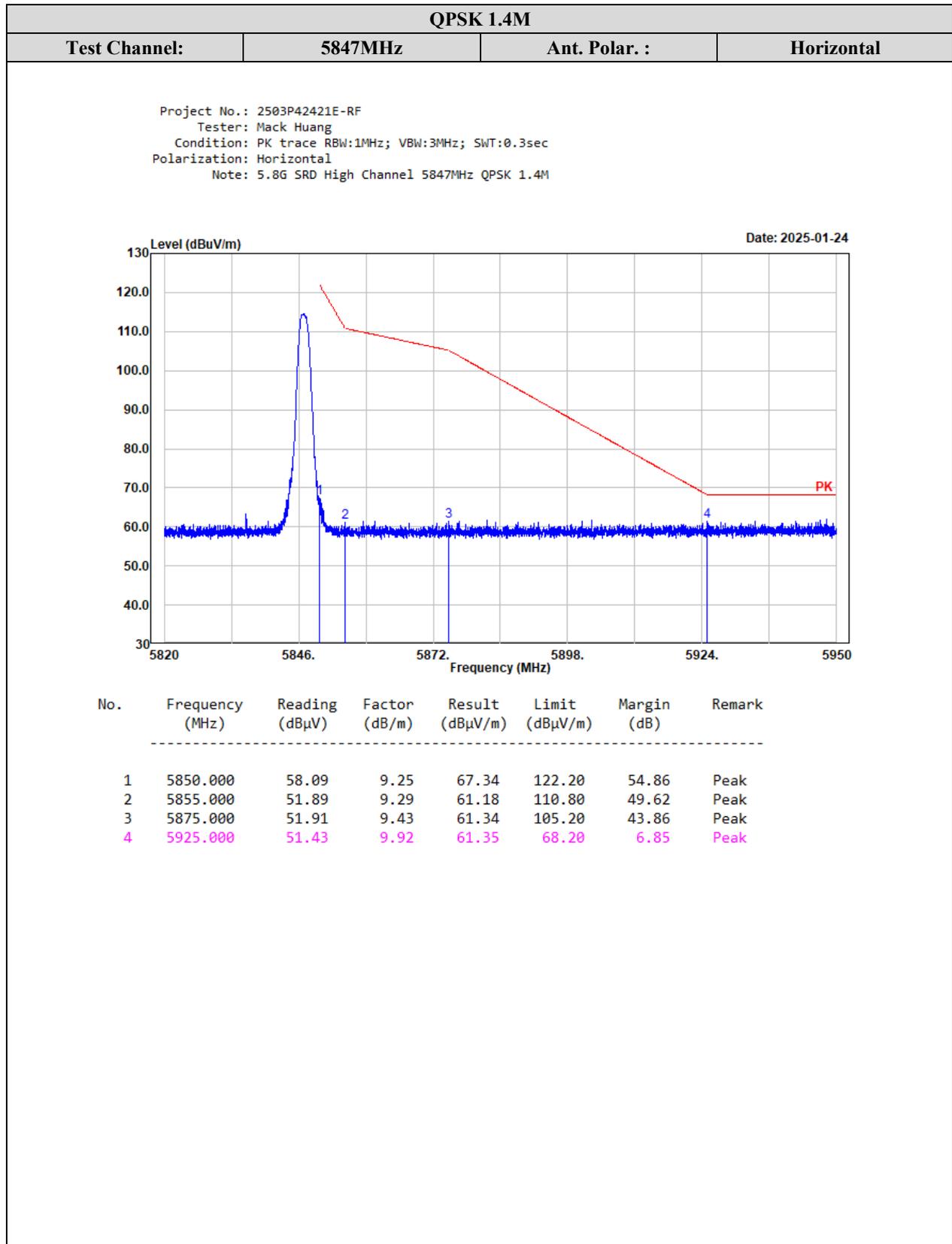
Test Channel:	5728MHz	Ant. Polar. :	Vertical
----------------------	----------------	----------------------	-----------------

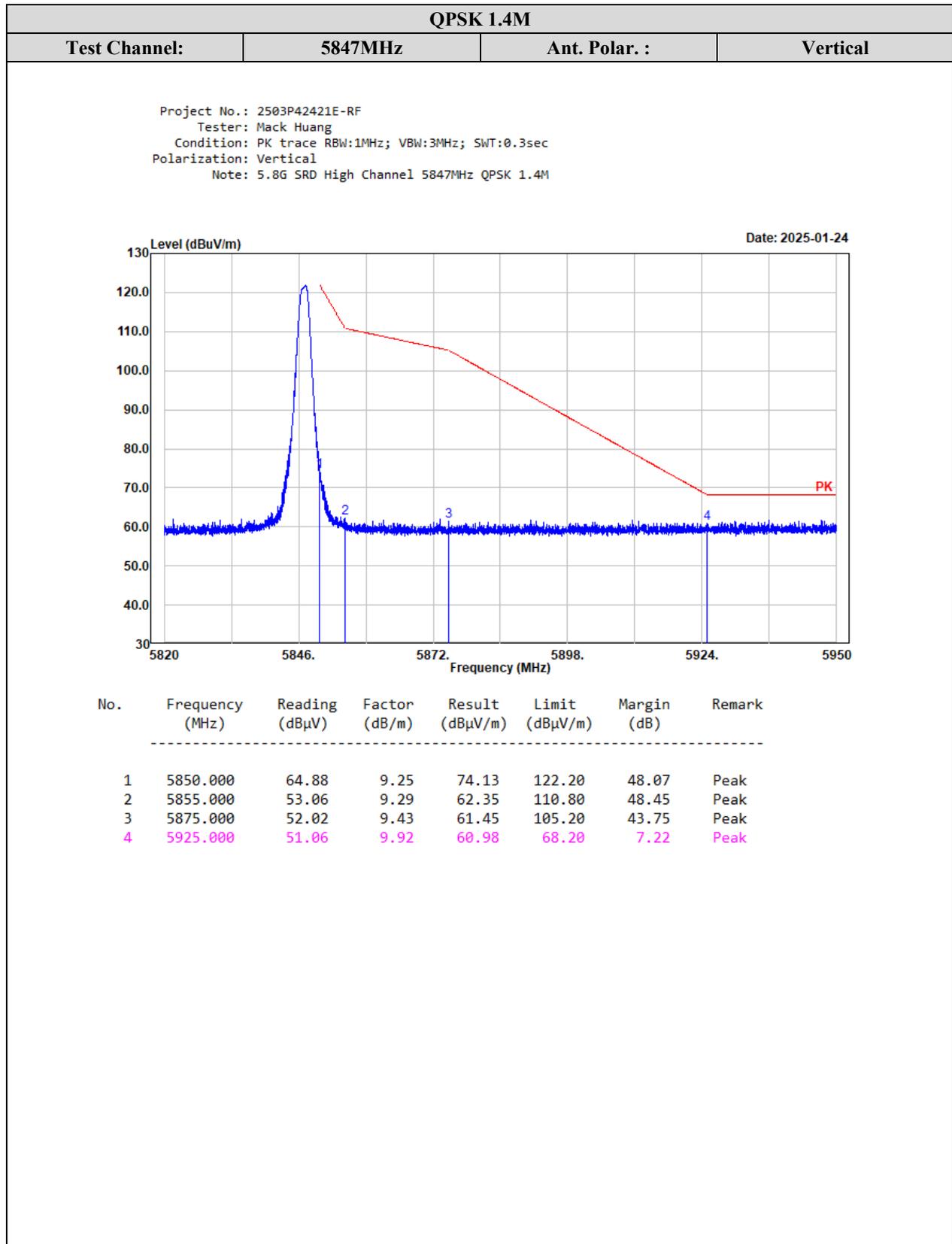
Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: Vertical
 Note: 5.8G SRD Low Channel 5728MHz QPSK 1.4M

Date: 2025-01-24



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5650.000	50.68	9.72	60.40	68.20	7.80	Peak
2	5700.000	51.03	9.67	60.70	105.20	44.50	Peak
3	5720.000	52.47	9.67	62.14	110.80	48.66	Peak
4	5725.000	66.26	9.67	75.93	122.20	46.27	Peak



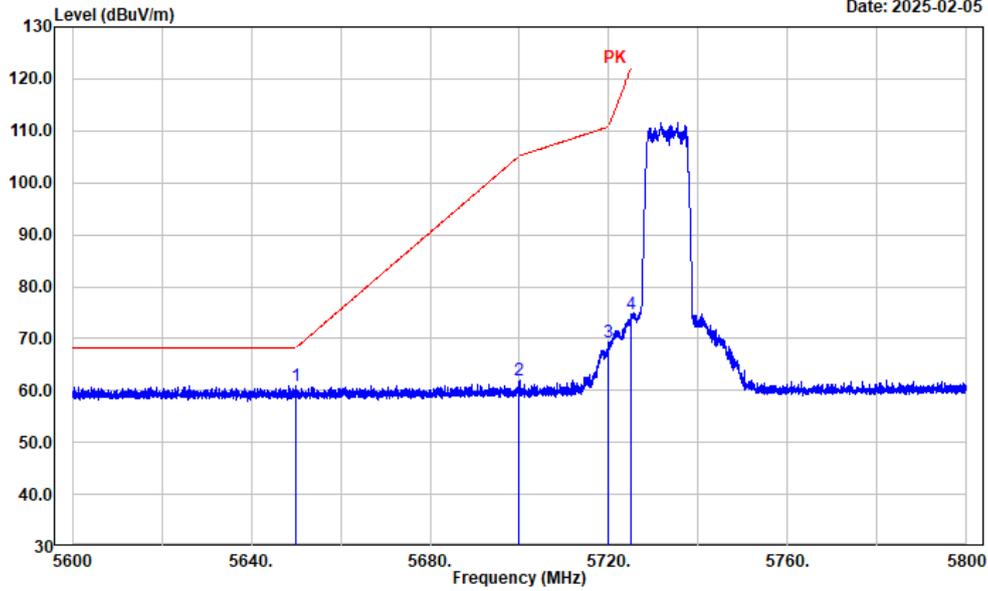


QPSK 10M

Test Channel:	5733MHz	Ant. Polar. :	Horizontal
----------------------	----------------	----------------------	-------------------

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: Horizontal
 Note: 5.8G SRD Low Channel 5733MHz QPSK 10M

Date: 2025-02-05



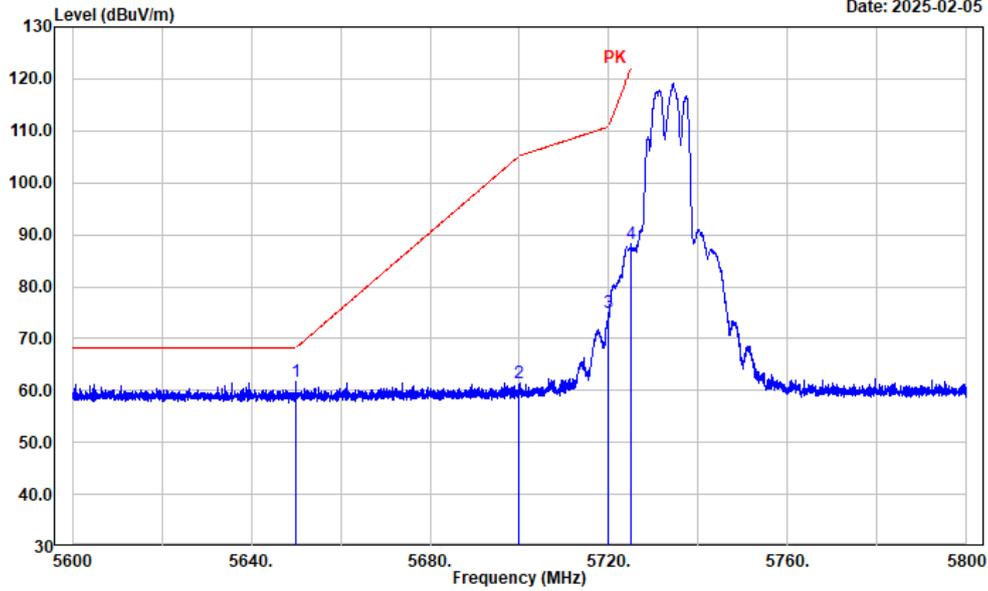
No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5650.000	51.25	9.72	60.97	68.20	7.23	Peak
2	5700.000	52.18	9.67	61.85	105.20	43.35	Peak
3	5720.000	59.75	9.67	69.42	110.80	41.38	Peak
4	5725.000	65.14	9.67	74.81	122.20	47.39	Peak

QPSK 10M

Test Channel:	5733MHz	Ant. Polar. :	Vertical
----------------------	----------------	----------------------	-----------------

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: Vertical
 Note: 5.8G SRD Low Channel 5733MHz QPSK 10M

Date: 2025-02-05

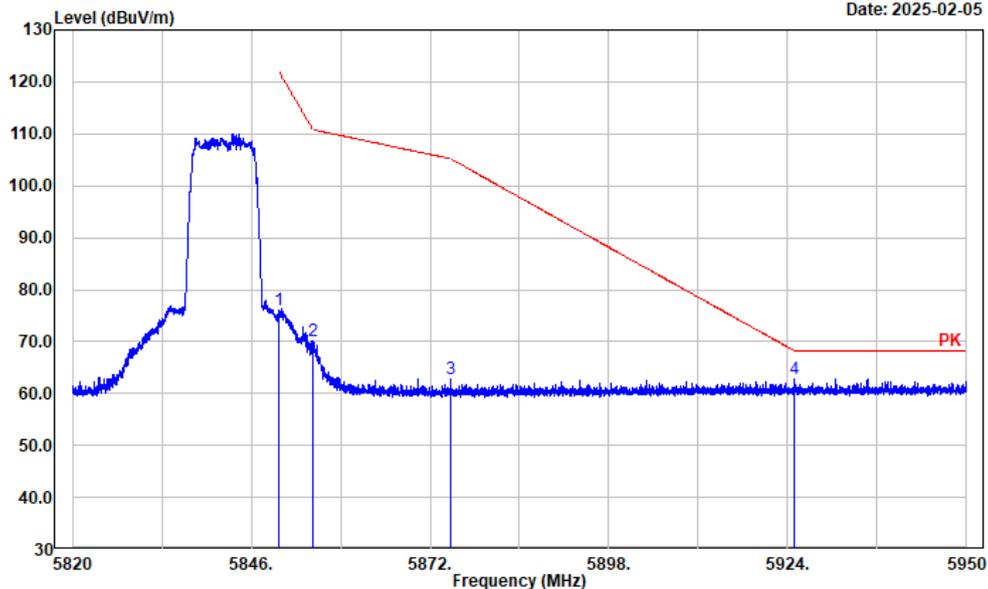


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5650.000	51.91	9.72	61.63	68.20	6.57	Peak
2	5700.000	51.82	9.67	61.49	105.20	43.71	Peak
3	5720.000	65.31	9.67	74.98	110.80	35.82	Peak
4	5725.000	78.66	9.67	88.33	122.20	33.87	Peak

QPSK 10M			
Test Channel:	5842MHz	Ant. Polar. :	Horizontal

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: Horizontal
 Note: 5.8G SRD High Channel 5842MHz QPSK 10M

Date: 2025-02-05



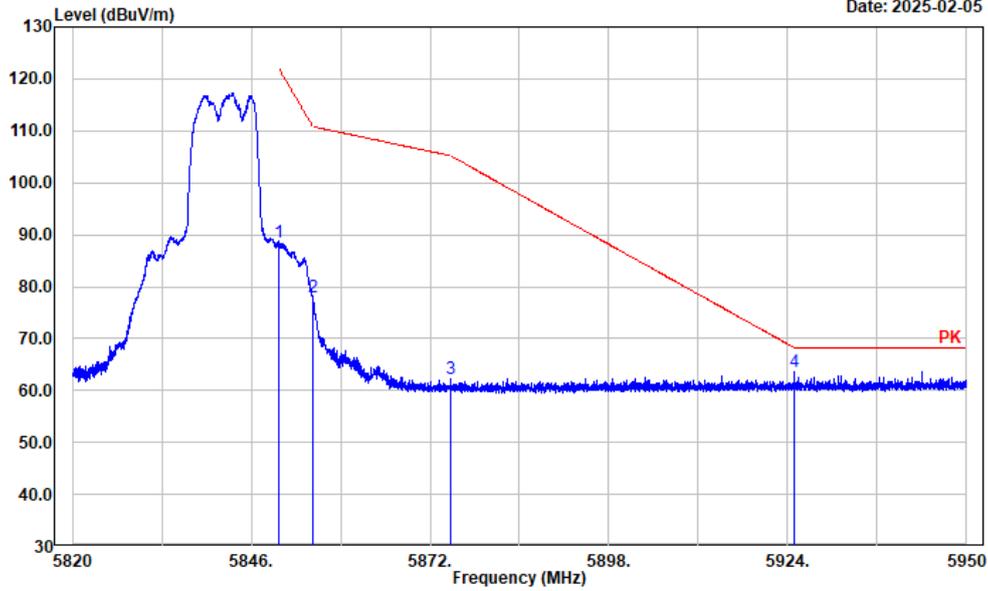
No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5850.000	66.87	9.25	76.12	122.20	46.08	Peak
2	5855.000	60.90	9.29	70.19	110.80	40.61	Peak
3	5875.000	53.28	9.43	62.71	105.20	42.49	Peak
4	5925.000	52.89	9.92	62.81	68.20	5.39	Peak

QPSK 10M

Test Channel:	5842MHz	Ant. Polar. :	Vertical
----------------------	----------------	----------------------	-----------------

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: Vertical
 Note: 5.8G SRD High Channel 5842MHz QPSK 10M

Date: 2025-02-05



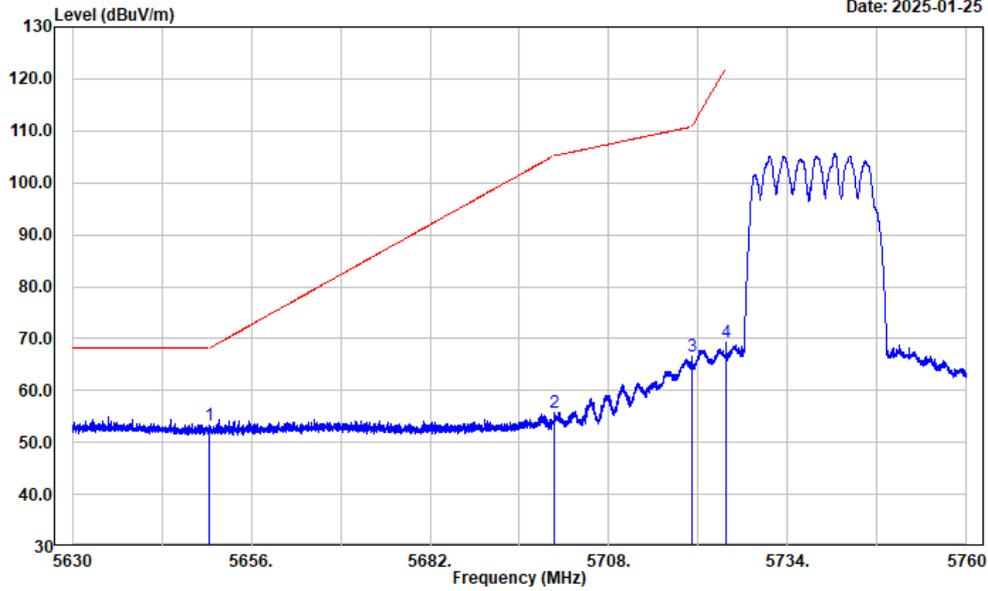
No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5850.000	79.33	9.25	88.58	122.20	33.62	Peak
2	5855.000	68.64	9.29	77.93	110.80	32.87	Peak
3	5875.000	52.89	9.43	62.32	105.20	42.88	Peak
4	5925.000	53.68	9.92	63.60	68.20	4.60	Peak

QPSK 20M

Test Channel: 5738MHz Ant. Polar. : Horizontal

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: Horizontal
 Note: 5.8G SRD Low Channel 5738MHz QPSK 20M

Date: 2025-01-25

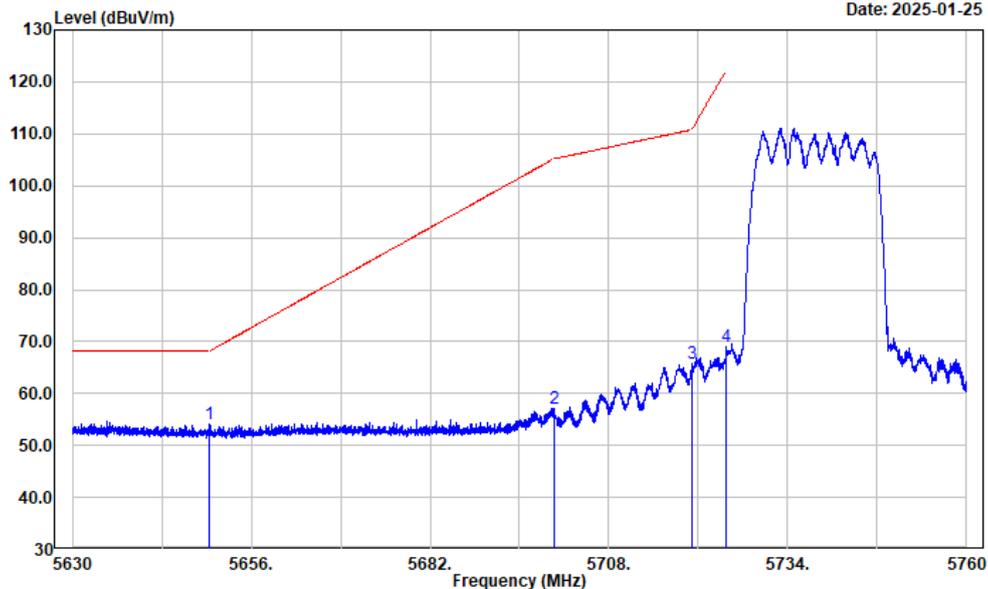


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5650.000	43.46	9.72	53.18	68.20	15.02	Peak
2	5700.000	46.17	9.67	55.84	105.20	49.36	Peak
3	5720.000	56.97	9.67	66.64	110.80	44.16	Peak
4	5725.000	59.51	9.67	69.18	122.20	53.02	Peak

QPSK 20M			
Test Channel:	5738MHz	Ant. Polar. :	Vertical

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: Vertical
 Note: 5.8G SRD Low Channel 5738MHz QPSK 20M

Date: 2025-01-25



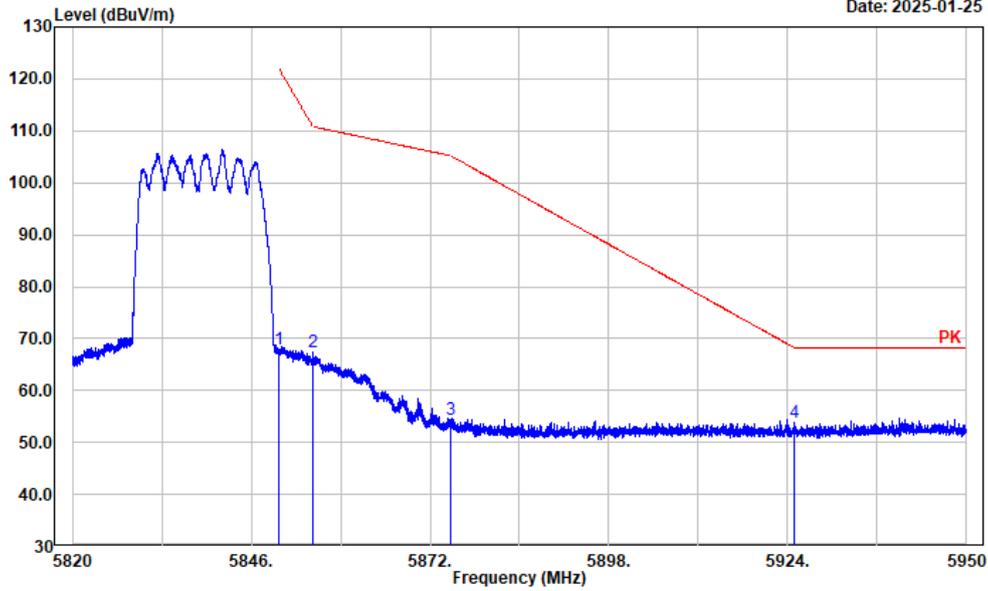
No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5650.000	44.43	9.72	54.15	68.20	14.05	Peak
2	5700.000	47.47	9.67	57.14	105.20	48.06	Peak
3	5720.000	56.20	9.67	65.87	110.80	44.93	Peak
4	5725.000	59.30	9.67	68.97	122.20	53.23	Peak

QPSK 20M

Test Channel:	5839MHz	Ant. Polar. :	Horizontal
----------------------	----------------	----------------------	-------------------

Project No. : 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: Horizontal
 Note: 5.8G SRD High Channel 5839MHz QPSK 20M

Date: 2025-01-25



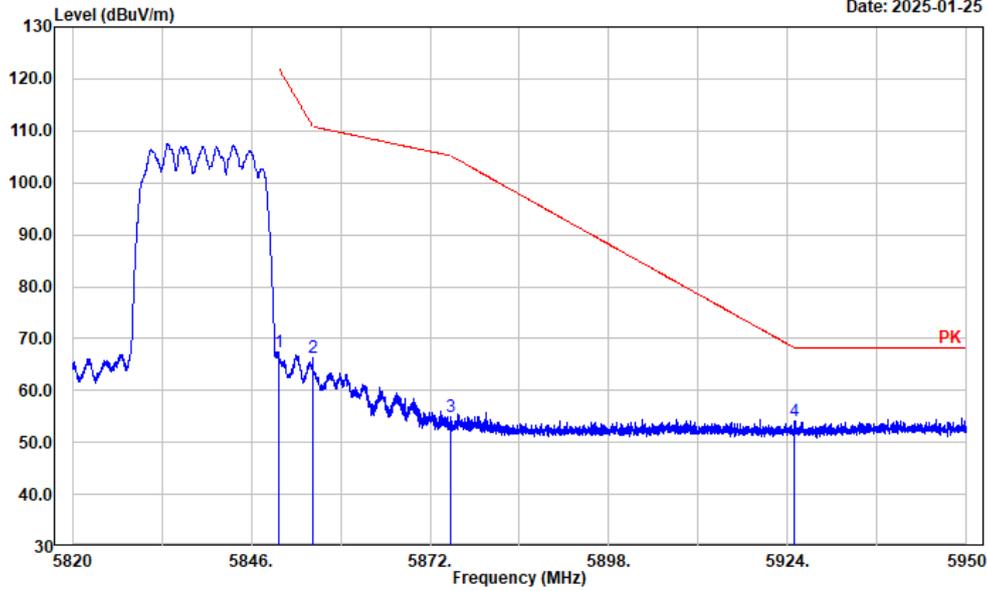
No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5850.000	58.78	9.25	68.03	122.20	54.17	Peak
2	5855.000	58.07	9.29	67.36	110.80	43.44	Peak
3	5875.000	45.05	9.43	54.48	105.20	50.72	Peak
4	5925.000	43.89	9.92	53.81	68.20	14.39	Peak

QPSK 20M

Test Channel:	5839MHz	Ant. Polar. :	Vertical
----------------------	----------------	----------------------	-----------------

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: Vertical
 Note: 5.8G SRD High Channel 5839MHz QPSK 20M

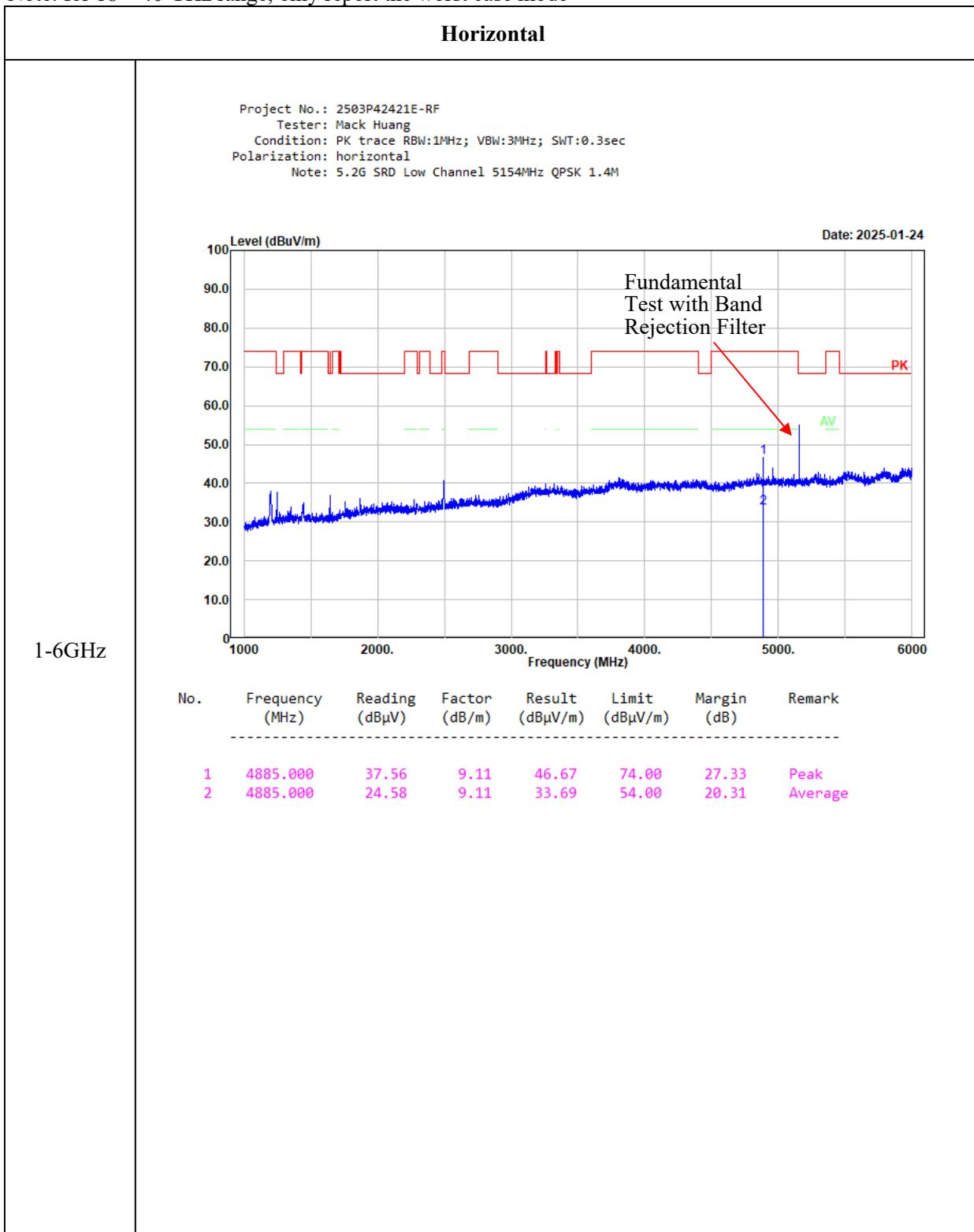
Date: 2025-01-25



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5850.000	58.20	9.25	67.45	122.20	54.75	Peak
2	5855.000	56.94	9.29	66.23	110.80	44.57	Peak
3	5875.000	45.47	9.43	54.90	105.20	50.30	Peak
4	5925.000	44.28	9.92	54.20	68.20	14.00	Peak

Worst radiation spurious emissions margin test plots for each mode

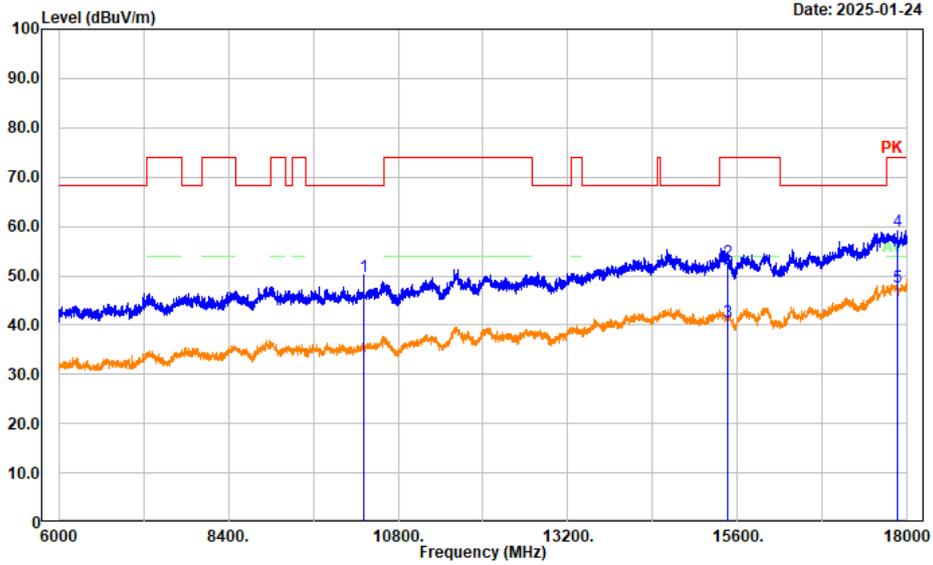
Note: for 18 – 40 GHz range, only report the worst case mode



1-6GHz

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: horizontal
 Note: 5.2G SRD Low Channel 5154MHz QPSK 1.4M

6-18GHz



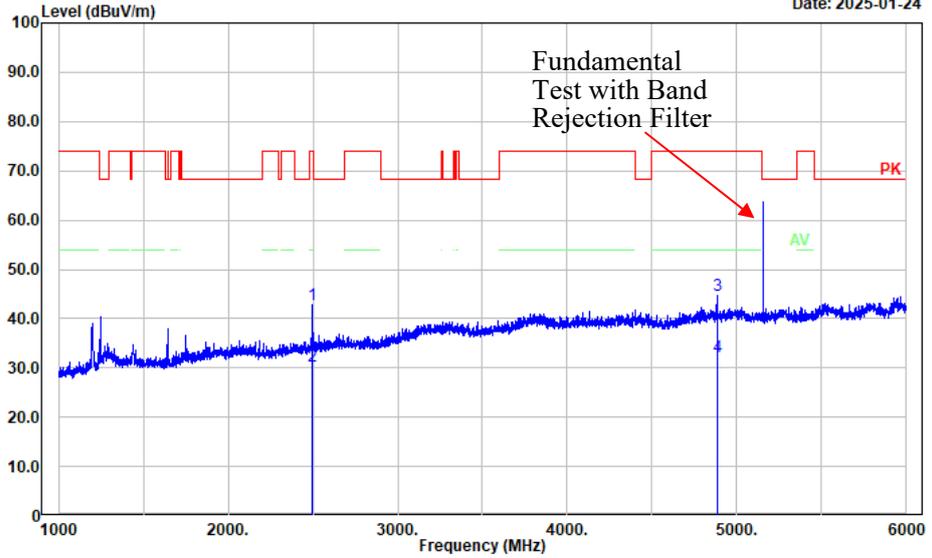
No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	10308.000	37.24	12.75	49.99	68.20	18.21	Peak
2	15462.000	35.22	17.76	52.98	74.00	21.02	Peak
3	15462.000	23.01	17.76	40.77	54.00	13.23	Average
4	17868.000	33.32	25.79	59.11	74.00	14.89	Peak
5	17868.000	21.84	25.79	47.63	54.00	6.37	Average

Vertical

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: vertical
 Note: 5.2G SRD Low Channel 5154MHz QPSK 1.4M

Date: 2025-01-24

1-6GHz

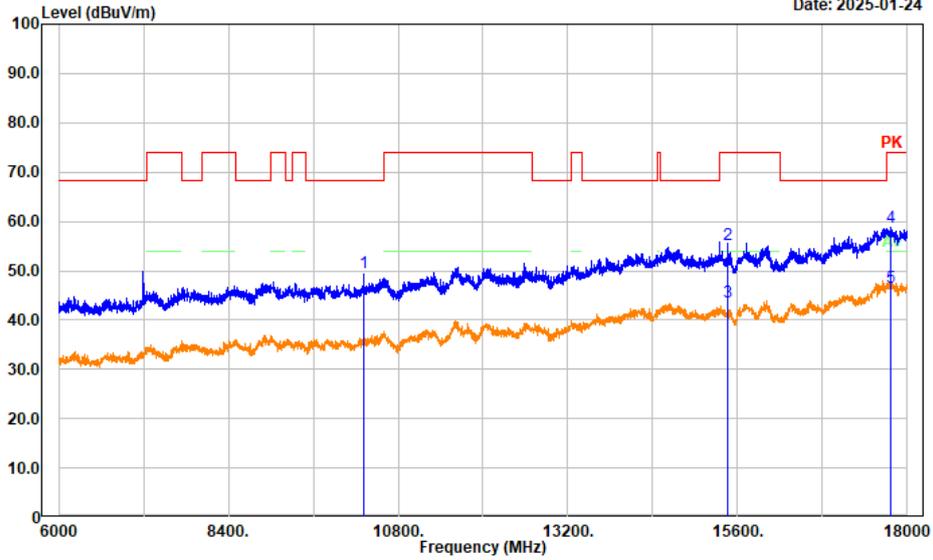


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	2495.000	39.38	3.39	42.77	74.00	31.23	Peak
2	2495.000	26.83	3.39	30.22	54.00	23.78	Average
3	4885.000	35.50	9.11	44.61	74.00	29.39	Peak
4	4885.000	23.05	9.11	32.16	54.00	21.84	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: vertical
 Note: 5.2G SRD Low Channel 5154MHz QPSK 1.4M

Date: 2025-01-24

6-18GHz



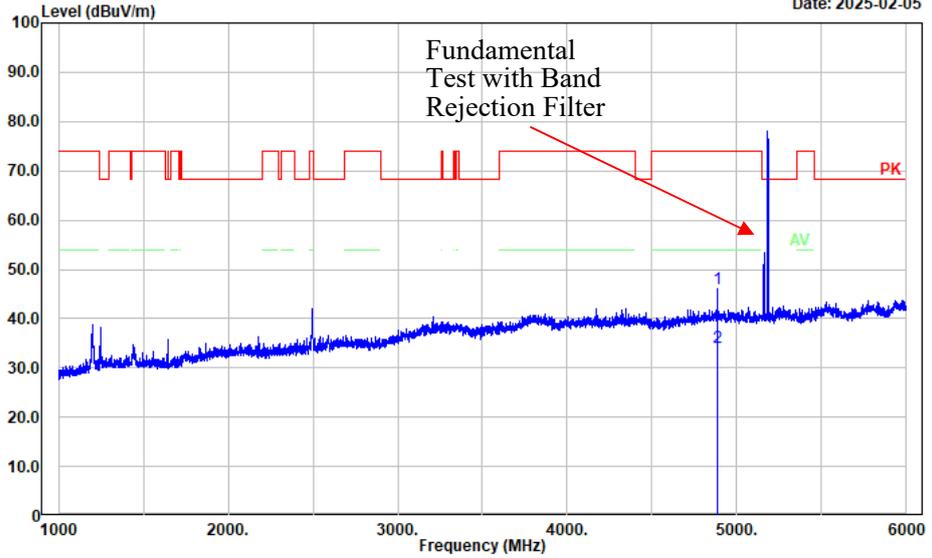
No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	10308.000	36.85	12.75	49.60	68.20	18.60	Peak
2	15462.000	37.49	17.76	55.25	74.00	18.75	Peak
3	15462.000	25.94	17.76	43.70	54.00	10.30	Average
4	17755.200	32.92	25.80	58.72	74.00	15.28	Peak
5	17755.200	20.85	25.80	46.65	54.00	7.35	Average

Horizontal

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: horizontal
 Note: 5.2G SRD Low Channel 5157MHz QPSK 10M

Date: 2025-02-05

1-6GHz

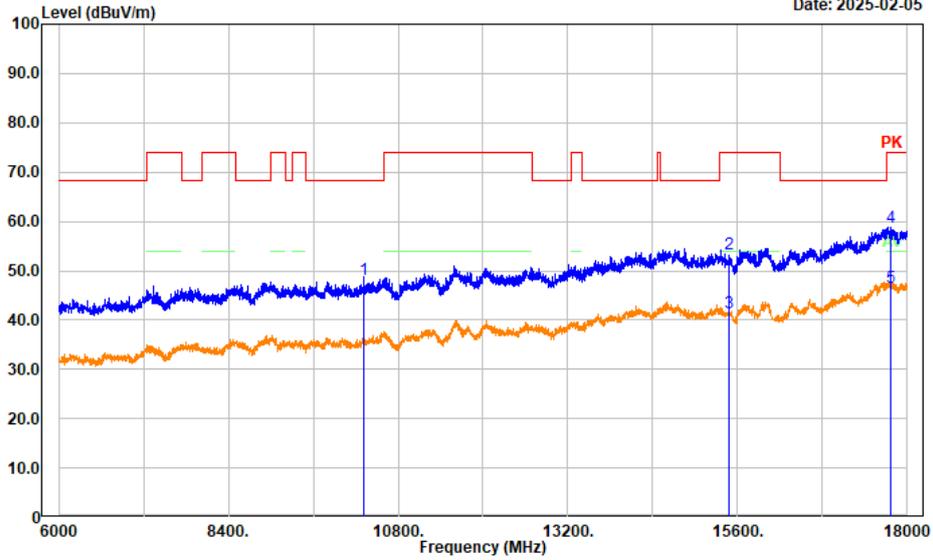


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	4885.000	37.05	9.11	46.16	74.00	27.84	Peak
2	4885.000	25.03	9.11	34.14	54.00	19.86	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: horizontal
 Note: 5.2G SRD Low Channel 5157MHz QPSK 10M

Date: 2025-02-05

6-18GHz



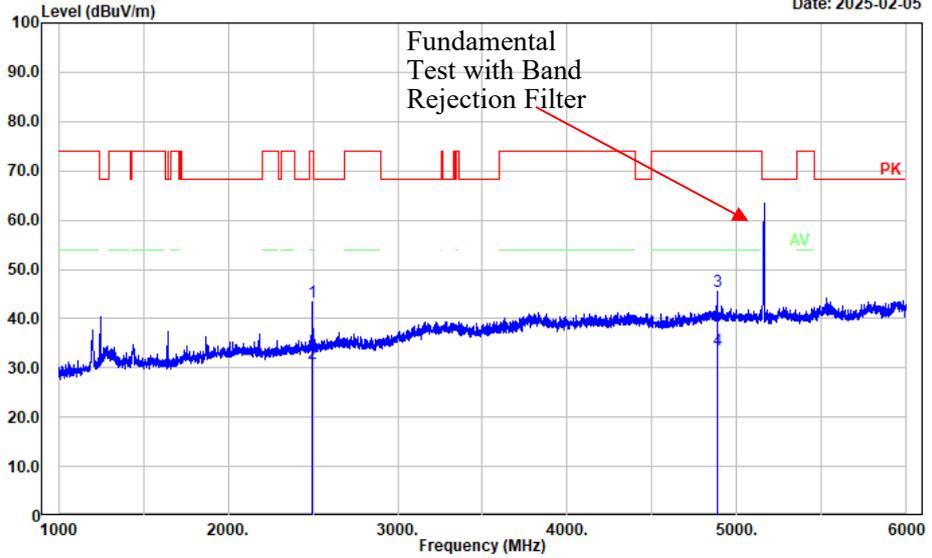
No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	10314.000	35.57	12.80	48.37	68.20	19.83	Peak
2	15471.000	35.68	17.80	53.48	74.00	20.52	Peak
3	15471.000	23.69	17.80	41.49	54.00	12.51	Average
4	17769.600	33.15	25.78	58.93	74.00	15.07	Peak
5	17769.600	20.71	25.78	46.49	54.00	7.51	Average

Vertical

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: vertical
 Note: 5.2G SRD Low Channel 5157MHz QPSK 10M

Date: 2025-02-05

1-6GHz

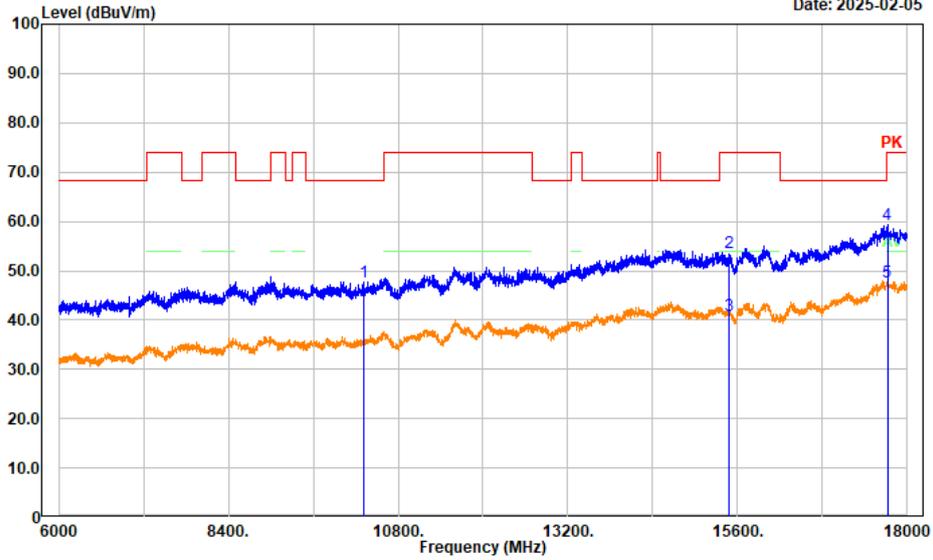


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	2495.000	39.93	3.39	43.32	74.00	30.68	Peak
2	2495.000	27.63	3.39	31.02	54.00	22.98	Average
3	4885.000	36.37	9.11	45.48	74.00	28.52	Peak
4	4885.000	24.58	9.11	33.69	54.00	20.31	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: vertical
 Note: 5.2G SRD Low Channel 5157MHz QPSK 10M

Date: 2025-02-05

6-18GHz



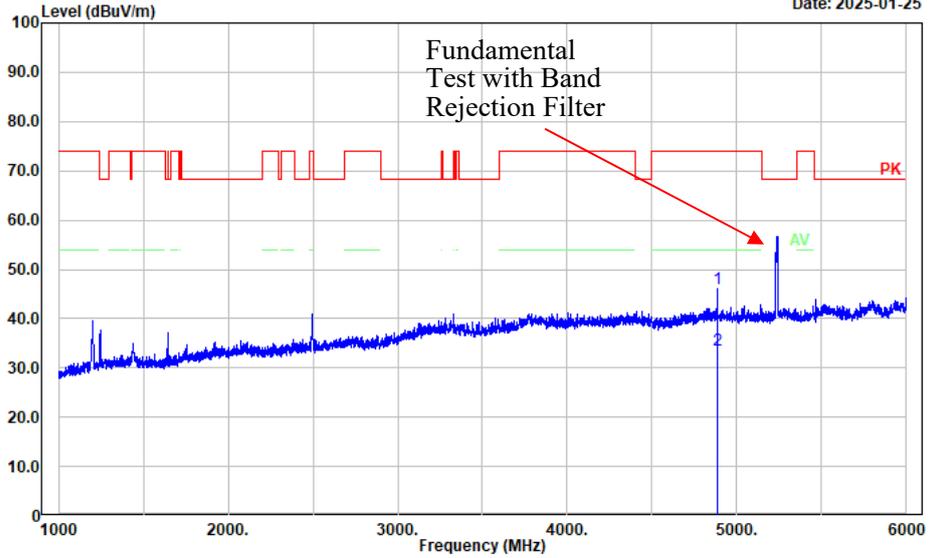
No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	10314.000	34.99	12.80	47.79	68.20	20.41	Peak
2	15471.000	35.74	17.80	53.54	74.00	20.46	Peak
3	15471.000	23.12	17.80	40.92	54.00	13.08	Average
4	17716.800	33.58	25.83	59.41	74.00	14.59	Peak
5	17716.800	21.86	25.83	47.69	54.00	6.31	Average

Horizontal

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: horizontal
 Note: 5.2G SRD High Channel 5233MHz QPSK 20M

Date: 2025-01-25

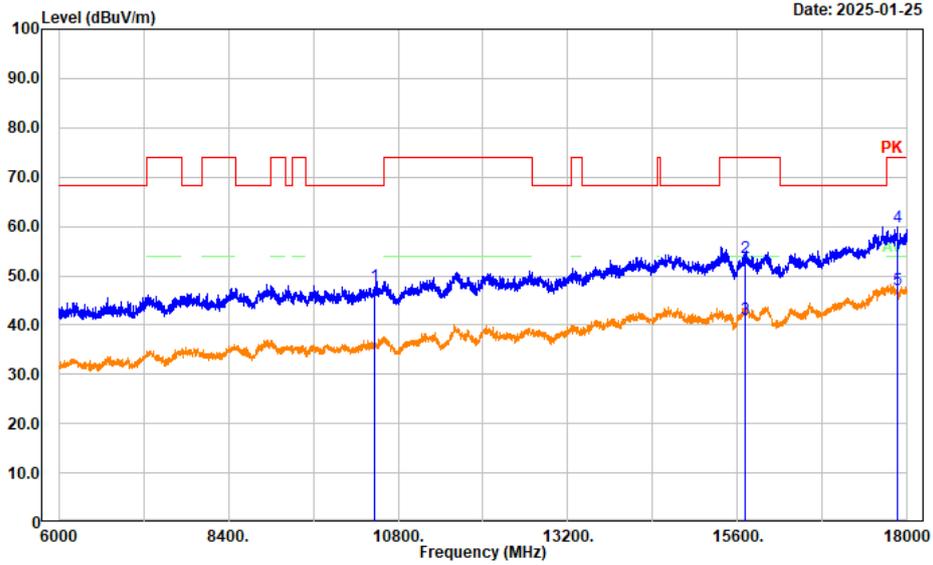
1-6GHz



No.	Frequency (MHz)	Reading (dB μ V)	Factor (dB/m)	Result (dB μ V/m)	Limit (dB μ V/m)	Margin (dB)	Remark
1	4885.000	37.04	9.11	46.15	74.00	27.85	Peak
2	4885.000	24.58	9.11	33.69	54.00	20.31	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: horizontal
 Note: 5.2G SRD High Channel 5233MHz QPSK 20M

6-18GHz

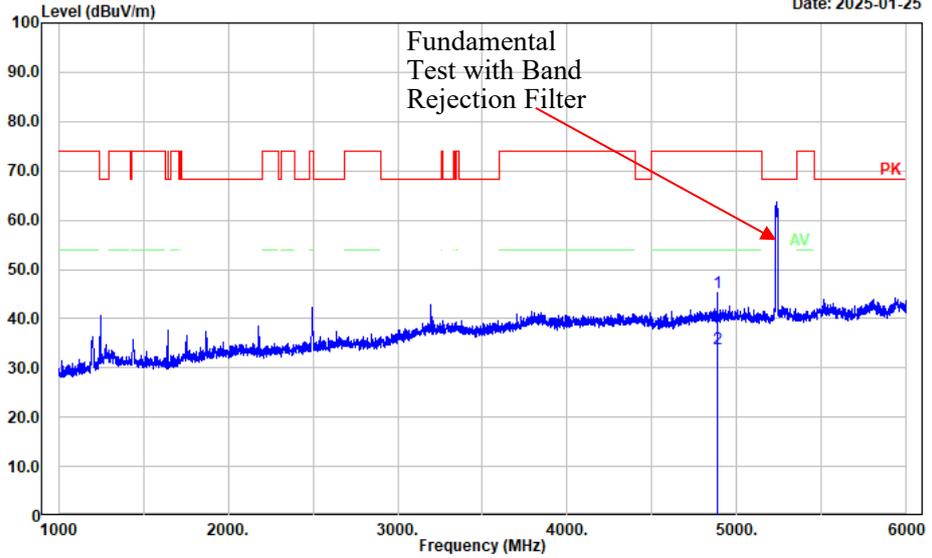


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	10466.000	33.66	14.18	47.84	68.20	20.36	Peak
2	15699.000	37.50	16.18	53.68	74.00	20.32	Peak
3	15699.000	25.12	16.18	41.30	54.00	12.70	Average
4	17851.200	34.13	25.78	59.91	74.00	14.09	Peak
5	17851.200	21.47	25.78	47.25	54.00	6.75	Average

Vertical

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: vertical
 Note: 5.2G SRD High Channel 5233MHz QPSK 20M

Date: 2025-01-25



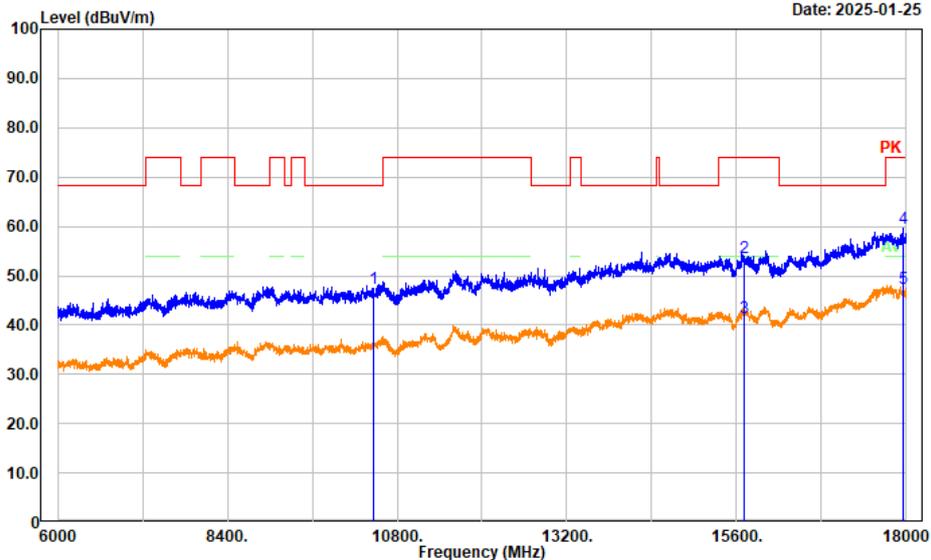
1-6GHz

No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	4885.000	36.03	9.11	45.14	74.00	28.86	Peak
2	4885.000	24.63	9.11	33.74	54.00	20.26	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: vertical
 Note: 5.2G SRD High Channel 5233MHz QPSK 20M

Date: 2025-01-25

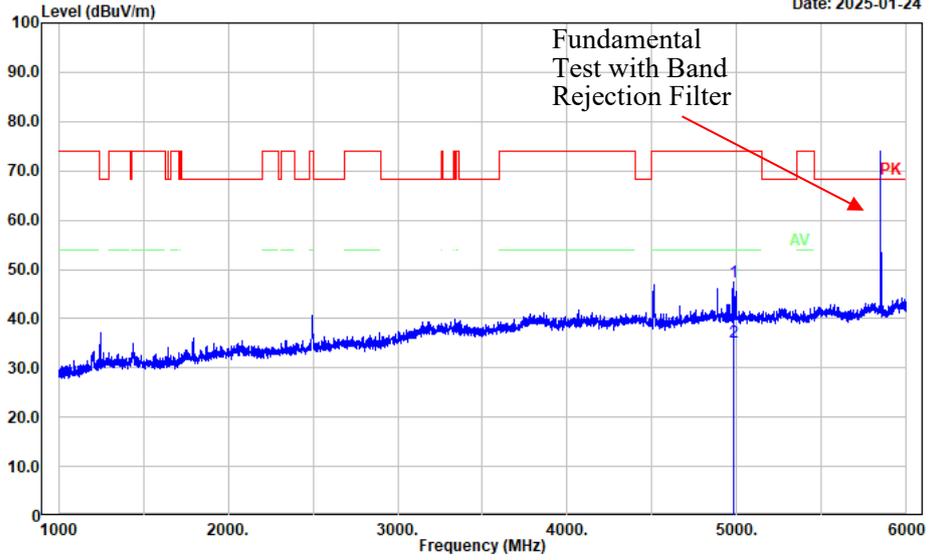
6-18GHz



Horizontal

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: horizontal
 Note: 5.8G SRD High Channel 5847MHz QPSK 1.4M

Date: 2025-01-24

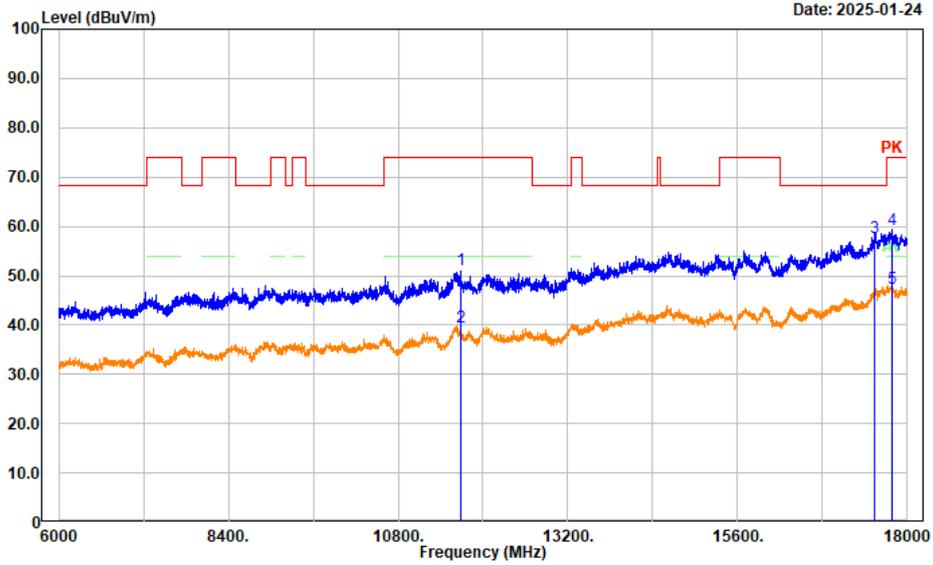


1-6GHz

No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	4984.000	38.58	8.89	47.47	74.00	26.53	Peak
2	4984.000	26.32	8.89	35.21	54.00	18.79	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: horizontal
 Note: 5.8G SRD High Channel 5847MHz QPSK 1.4M

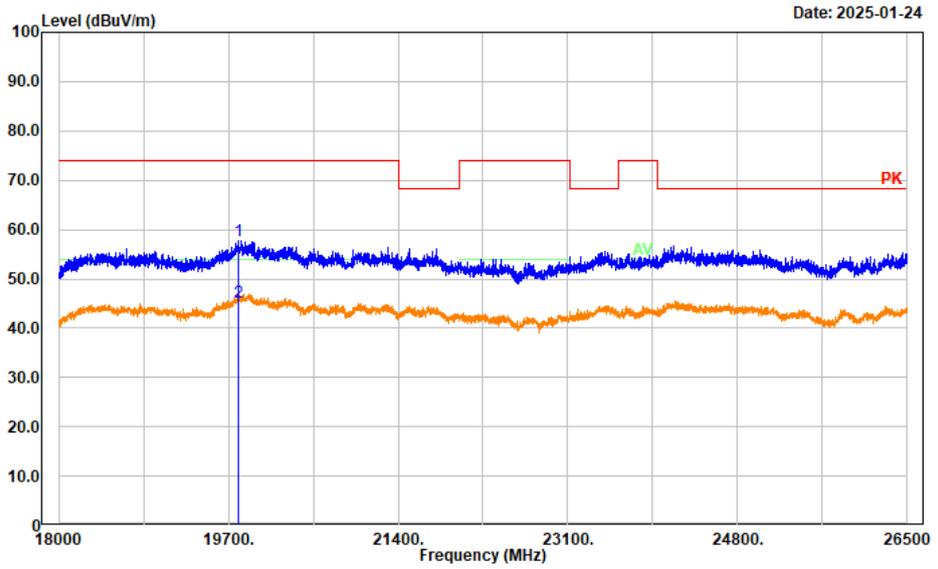
6-18GHz



No.	Frequency (MHz)	Reading (dB μ V)	Factor (dB/m)	Result (dB μ V/m)	Limit (dB μ V/m)	Margin (dB)	Remark
1	11694.000	36.01	15.19	51.20	74.00	22.80	Peak
2	11694.000	24.35	15.19	39.54	54.00	14.46	Average
3	17541.000	34.39	23.40	57.79	68.20	10.41	Peak
4	17774.400	33.52	25.77	59.29	74.00	14.71	Peak
5	17774.400	21.68	25.77	47.45	54.00	6.55	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: Horizontal
 Note: 5.8G SRD High Channel 5847MHz QPSK 1.4M

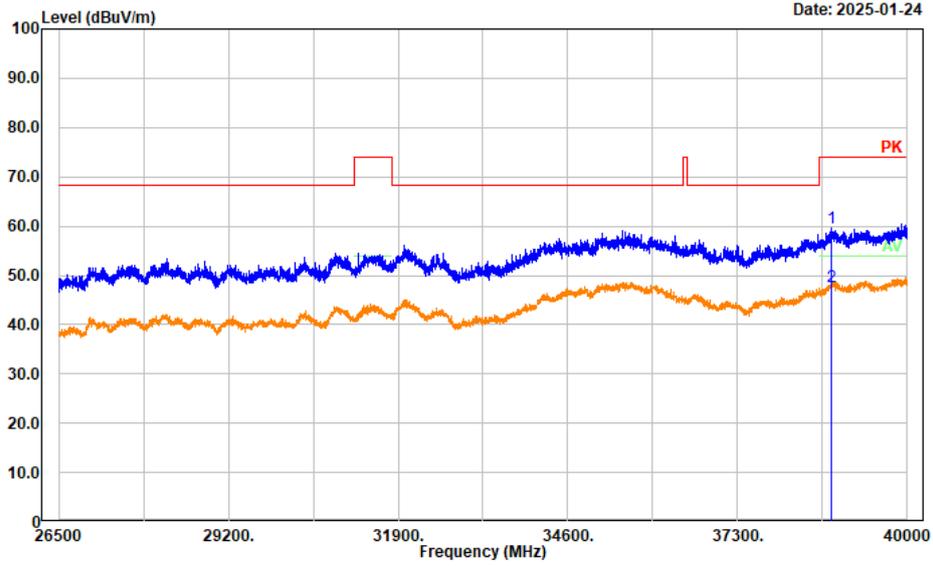
18-26.5GHz



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	19802.000	49.70	7.95	57.65	74.00	16.35	Peak
2	19802.000	37.44	7.95	45.39	54.00	8.61	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: Horizontal
 Note: 5.8G SRD High Channel 5847MHz QPSK 1.4M

26.5-40GHz

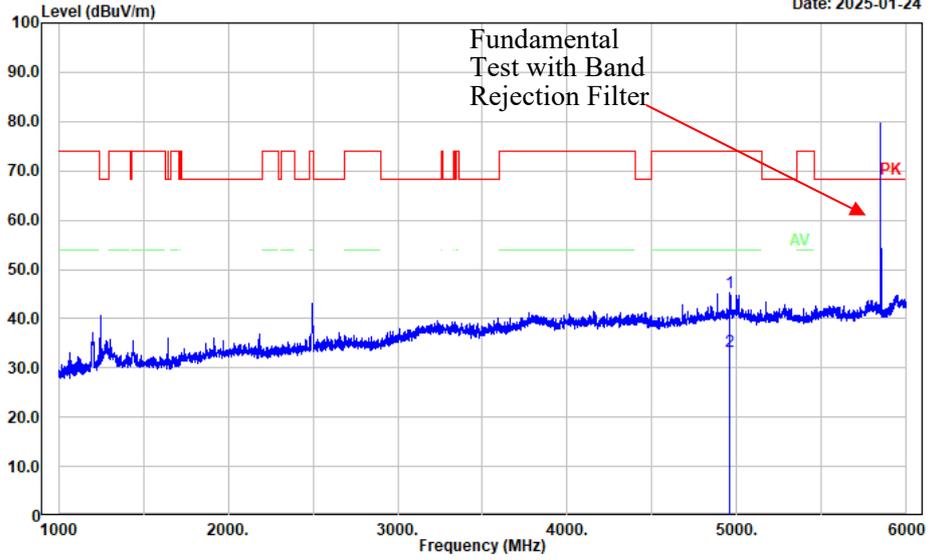


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	38798.500	50.87	8.63	59.50	74.00	14.50	Peak
2	38798.500	39.03	8.63	47.66	54.00	6.34	Average

Vertical

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: vertical
 Note: 5.8G SRD High Channel 5847MHz QPSK 1.4M

Date: 2025-01-24



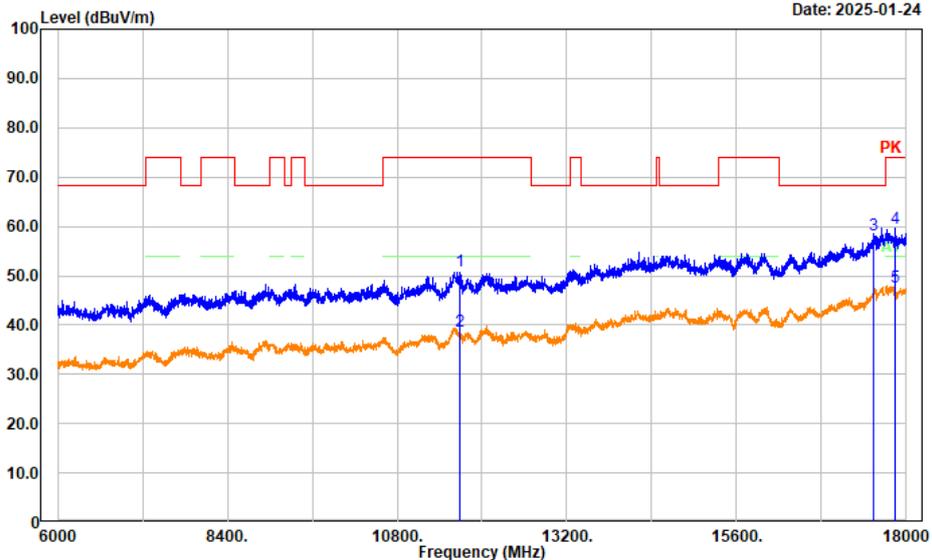
1-6GHz

No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	4959.000	36.51	8.88	45.39	74.00	28.61	Peak
2	4959.000	24.48	8.88	33.36	54.00	20.64	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: vertical
 Note: 5.8G SRD High Channel 5847MHz QPSK 1.4M

Date: 2025-01-24

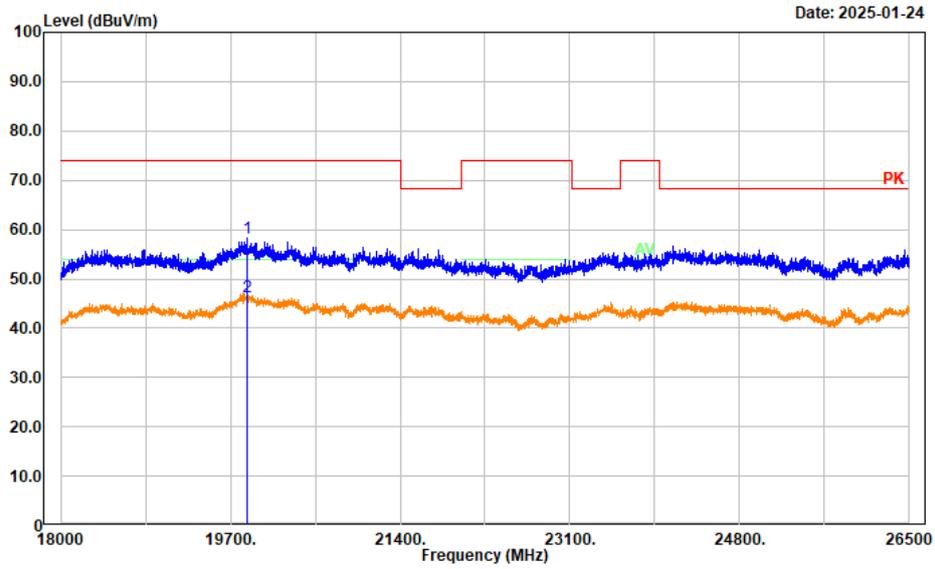
6-18GHz



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	11694.000	35.76	15.19	50.95	74.00	23.05	Peak
2	11694.000	23.45	15.19	38.64	54.00	15.36	Average
3	17541.000	34.85	23.40	58.25	68.20	9.95	Peak
4	17834.400	33.98	25.77	59.75	74.00	14.25	Peak
5	17834.400	21.92	25.77	47.69	54.00	6.31	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: Vertical
 Note: 5.8G SRD High Channel 5847MHz QPSK 1.4M

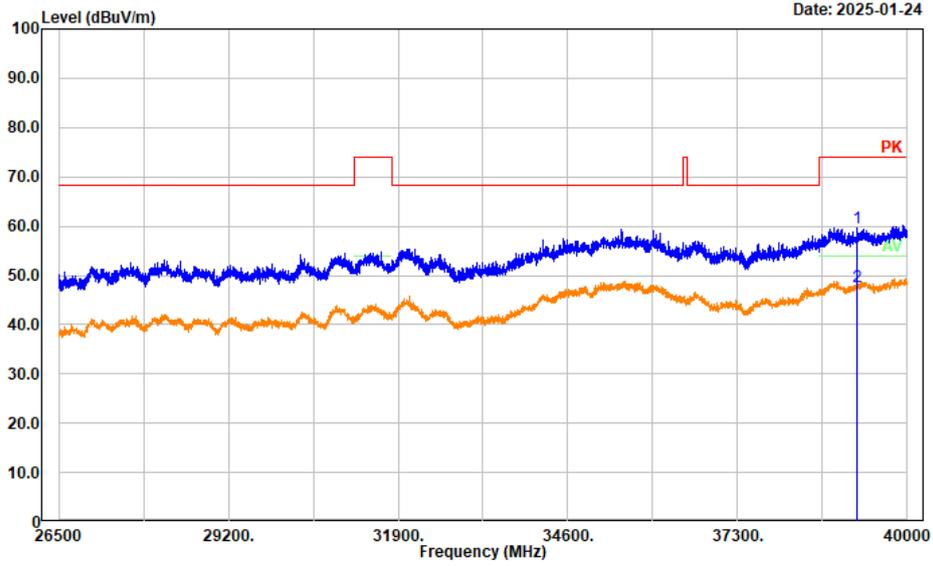
18-26.5GHz



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	19871.700	50.33	7.96	58.29	74.00	15.71	Peak
2	19871.700	38.43	7.96	46.39	54.00	7.61	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: Vertical
 Note: 5.8G SRD High Channel 5847MHz QPSK 1.4M

26.5-40GHz

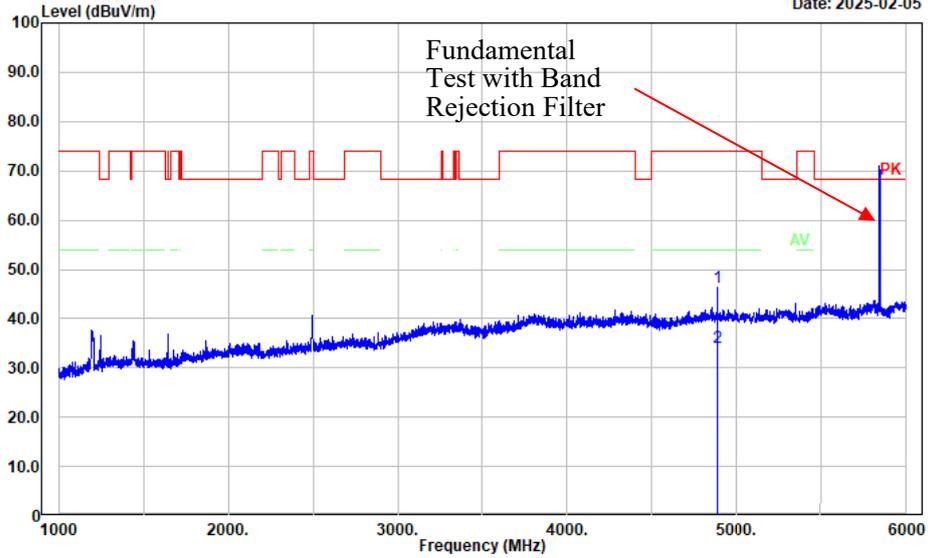


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	39208.900	51.25	8.40	59.65	74.00	14.35	Peak
2	39208.900	39.22	8.40	47.62	54.00	6.38	Average

Horizontal

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: horizontal
 Note: 5.8G SRD High Channel 5842MHz QPSK 10M

Date: 2025-02-05



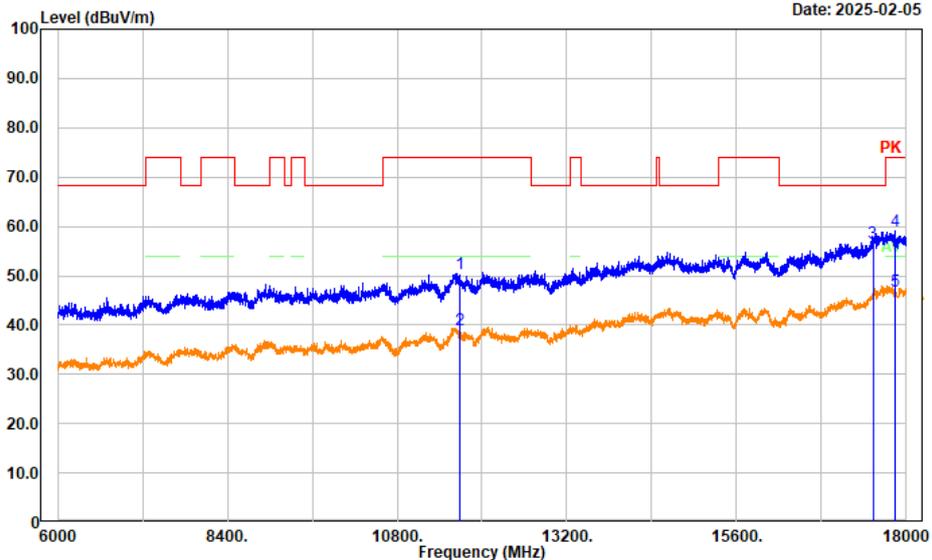
1-6GHz

No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	4885.000	37.24	9.11	46.35	74.00	27.65	Peak
2	4885.000	25.10	9.11	34.21	54.00	19.79	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: horizontal
 Note: 5.8G SRD High Channel 5842MHz QPSK 10M

Date: 2025-02-05

6-18GHz

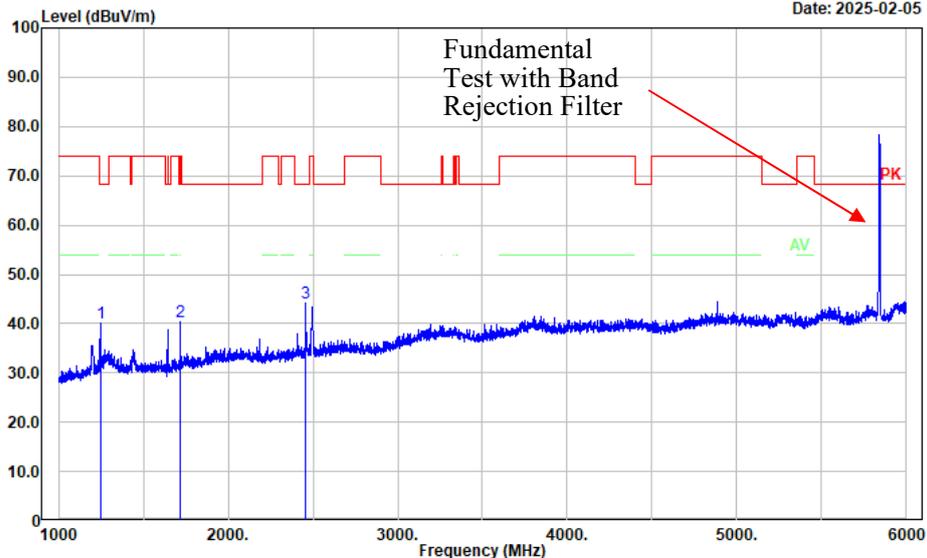


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	11684.000	35.01	15.29	50.30	74.00	23.70	Peak
2	11684.000	23.66	15.29	38.95	54.00	15.05	Average
3	17526.000	33.45	23.14	56.59	68.20	11.61	Peak
4	17841.600	33.18	25.77	58.95	74.00	15.05	Peak
5	17841.600	21.08	25.77	46.85	54.00	7.15	Average

Vertical

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: vertical
 Note: 5.8G SRD High Channel 5842MHz QPSK 10M

Date: 2025-02-05



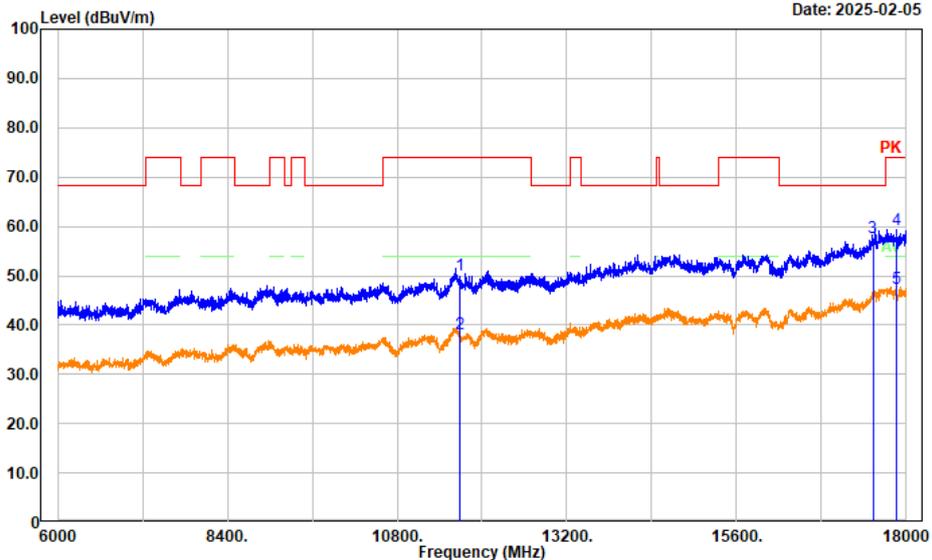
1-6GHz

No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	1247.000	40.42	-0.25	40.17	68.20	28.03	Peak
2	1717.000	39.64	0.87	40.51	68.20	27.69	Peak
3	2455.000	40.84	3.31	44.15	68.20	24.05	Peak

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: vertical
 Note: 5.8G SRD High Channel 5842MHz QPSK 10M

Date: 2025-02-05

6-18GHz

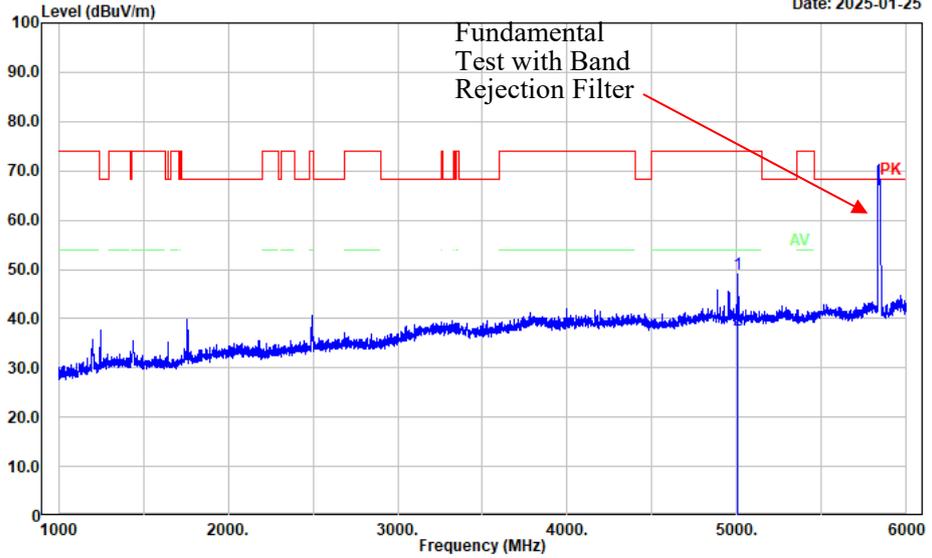


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	11684.000	34.87	15.29	50.16	74.00	23.84	Peak
2	11684.000	22.96	15.29	38.25	54.00	15.75	Average
3	17526.000	34.62	23.14	57.76	68.20	10.44	Peak
4	17868.000	33.62	25.79	59.41	74.00	14.59	Peak
5	17868.000	21.57	25.79	47.36	54.00	6.64	Average

Horizontal

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: horizontal
 Note: 5.8G SRD High Channel 5839MHz QPSK 20M

Date: 2025-01-25



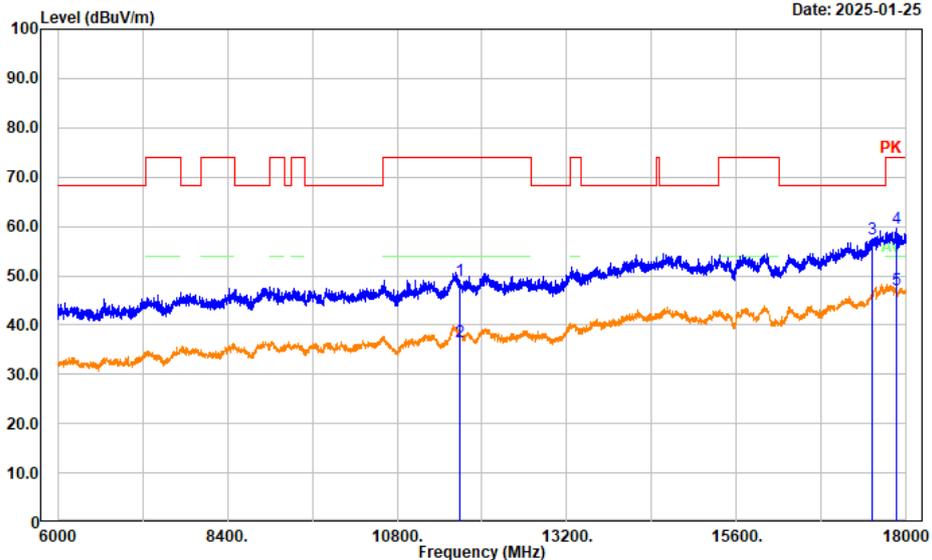
1-6GHz

No.	Frequency (MHz)	Reading (dB μ V)	Factor (dB/m)	Result (dB μ V/m)	Limit (dB μ V/m)	Margin (dB)	Remark
1	5002.000	40.22	8.91	49.13	74.00	24.87	Peak
2	5002.000	28.64	8.91	37.55	54.00	16.45	Average

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: horizontal
 Note: 5.8G SRD High Channel 5839MHz QPSK 20M

Date: 2025-01-25

6-18GHz

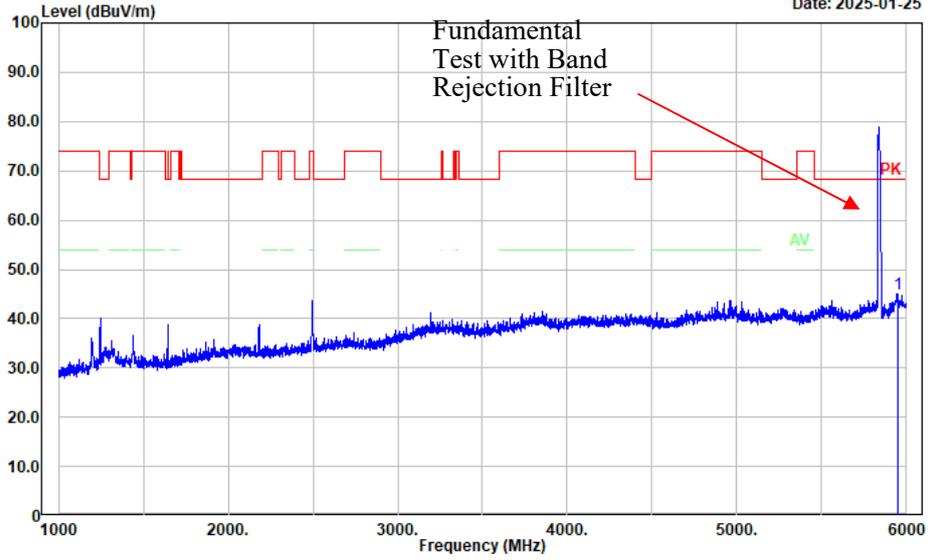


No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	11678.000	33.73	15.36	49.09	74.00	24.91	Peak
2	11678.000	21.28	15.36	36.64	54.00	17.36	Average
3	17517.000	34.36	22.99	57.35	68.20	10.85	Peak
4	17851.200	33.88	25.78	59.66	74.00	14.34	Peak
5	17851.200	21.34	25.78	47.12	54.00	6.88	Average

Vertical

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec
 Polarization: vertical
 Note: 5.8G SRD High Channel 5839MHz QPSK 20M

Date: 2025-01-25



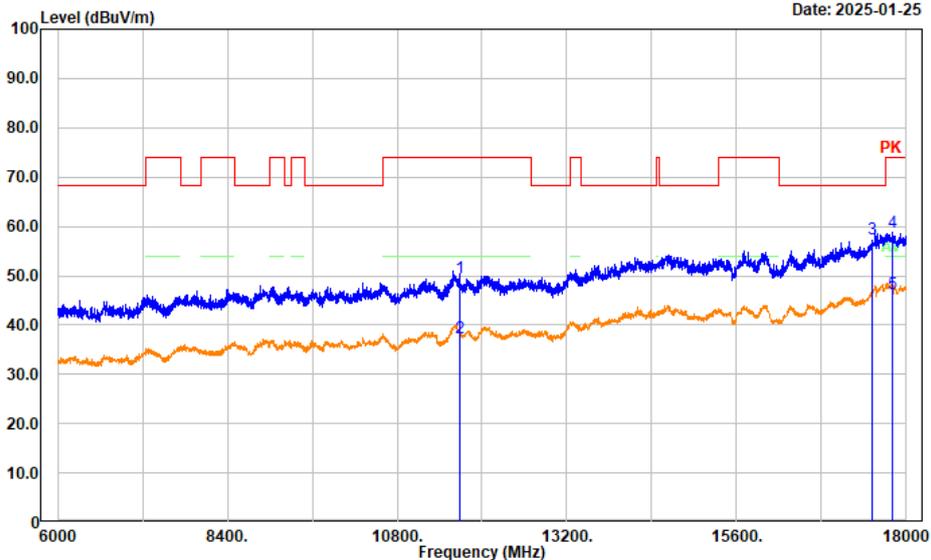
1-6GHz

No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	5948.000	34.90	10.21	45.11	68.20	23.09	Peak

Project No.: 2503P42421E-RF
 Tester: Mack Huang
 Condition: PK trace RBW:1MHz; VBW:3MHz; SWT:0.3sec AV trace RBW:1MHz; VBW:5kHz; SWT:auto
 Polarization: vertical
 Note: 5.8G SRD High Channel 5839MHz QPSK 20M

Date: 2025-01-25

6-18GHz



No.	Frequency (MHz)	Reading (dBμV)	Factor (dB/m)	Result (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Remark
1	11678.000	34.24	15.36	49.60	74.00	24.40	Peak
2	11678.000	22.06	15.36	37.42	54.00	16.58	Average
3	17517.000	34.46	22.99	57.45	68.20	10.75	Peak
4	17808.000	33.08	25.76	58.84	74.00	15.16	Peak
5	17808.000	20.57	25.76	46.33	54.00	7.67	Average

4.3 Emission Bandwidth

Sample Number:	2XO4-1	Test Date:	2025/01/25-2025/2/28
Test Site:	RF	Test Mode:	Transmitting
Tester:	LingLing Li	Test Result:	Pass

Environmental Conditions:

Temperature: (°C)	24.1-24.5	Relative Humidity: (%)	50-56	ATM Pressure: (kPa)	101.1-101.3
----------------------	-----------	------------------------------	-------	------------------------	-------------

Test Equipment List and Details:

Manufacturer	Description	Model	Serial Number	Calibration Date	Calibration Due Date
R&S	Spectrum Analyzer	FSU26	200256	2024/4/1	2025/3/31
eastsheep	Coaxial Attenuator	2W-SMA-JK-18G	21060301	Each time	N/A
zhuoxiang	Coaxial Cable	SMA-178	211003	Each time	N/A
R&S	Spectrum Analyzer	FSU26	100147	2024/4/1	2025/3/31

* Statement of Traceability: China Certification ICT Co., Ltd (Dongguan) attests that all calibrations have been performed, traceable to National Primary Standards and International System of Units (SI).

Test Data:

5150-5250 MHz:

Test Modes	Test Frequency (MHz)	26 dB Bandwidth (MHz)	99% Occupied Bandwidth (MHz)
1.4MHz QPSK	5154	1.221	1.092
	5201	1.231	1.080
	5246	1.269	1.086
10MHz QPSK	5157	9.647	8.960
	5201	9.647	8.960
	5243	9.647	8.960
20MHz QPSK	5167	19.487	18.000
	5201	19.487	18.000
	5233	19.423	18.000

Note: Test only was performed at Chain 0.

The 99% Occupied Bandwidth have not fall into the band 5250-5350MHz, please refer to the test plots of 99% Occupied Bandwidth.

5725-5850 MHz

Test Modes	Test Frequency (MHz)	6 dB Bandwidth (MHz)	99% Occupied Bandwidth (MHz)
1.4MHz QPSK	5728	1.154	1.116
	5789	1.154	1.104
	5847	1.135	1.098
10MHz QPSK	5733	9.071	8.960
	5789	9.071	8.960
	5842	9.071	8.960
20MHz QPSK	5738	18.141	18.080
	5790	18.141	18.080
	5839	18.205	18.080

Note:

6dB Emission Bandwidth Limit: ≥ 0.5 MHz

Test only was performed at Chain 0.

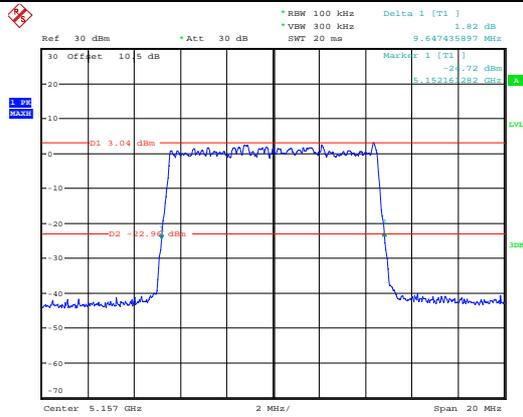
The 99% Occupied Bandwidth have not fall into the band 5470-5725MHz, please refer to the test plots of 99% Occupied Bandwidth.

5150-5250MHz:

26dB Emission Bandwidth	
1.4MHz, QPSK Lowest Channel	<p style="text-align: center;">ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 10:31:45</p>
1.4MHz, QPSK Middle Channel	<p style="text-align: center;">ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 10:33:18</p>
1.4MHz, QPSK Highest Channel	<p style="text-align: center;">ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 10:40:35</p>

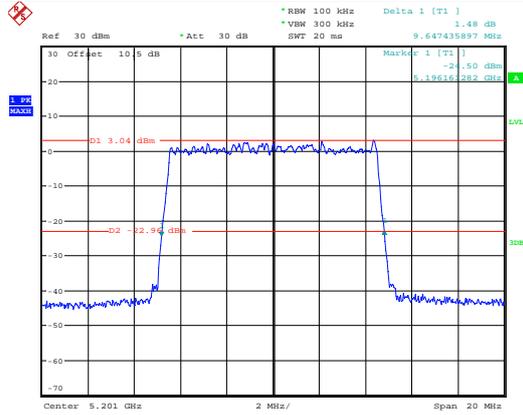
26dB Emission Bandwidth

10MHz, QPSK
Lowest Channel



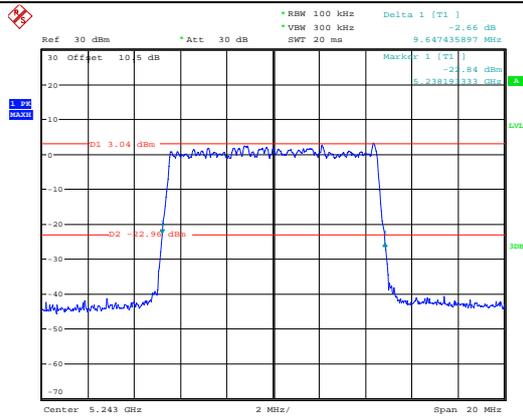
ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 10:57:30

10MHz, QPSK
Middle Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 10:58:18

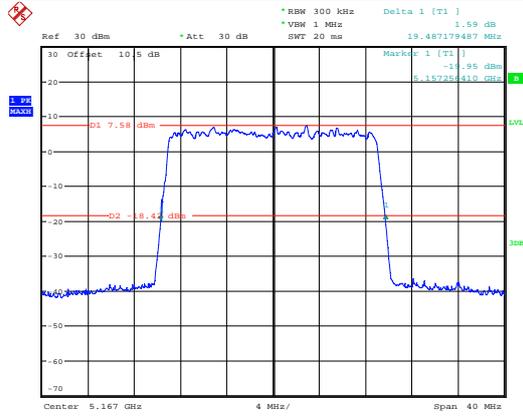
10MHz, QPSK
Highest Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 11:03:17

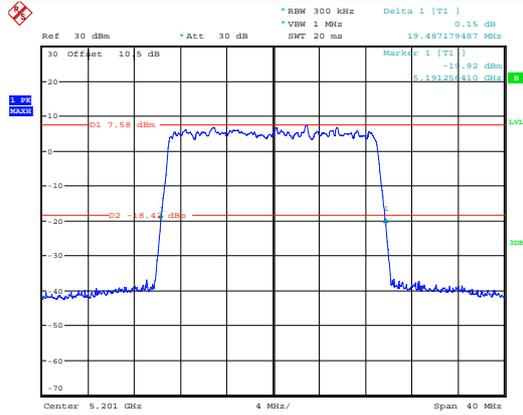
26dB Emission Bandwidth

20MHz, QPSK
Lowest Channel



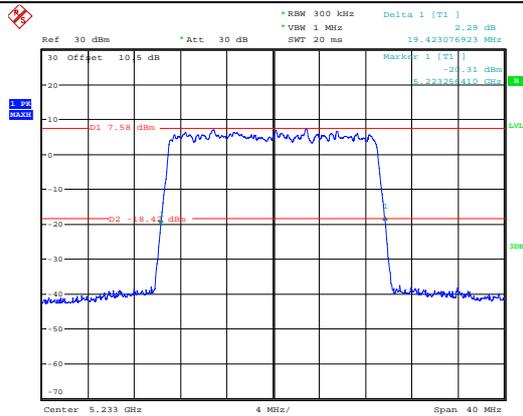
ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:09:40

20MHz, QPSK
Middle Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:11:49

20MHz, QPSK
Highest Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:12:35

99% Emission Bandwidth-QPSK

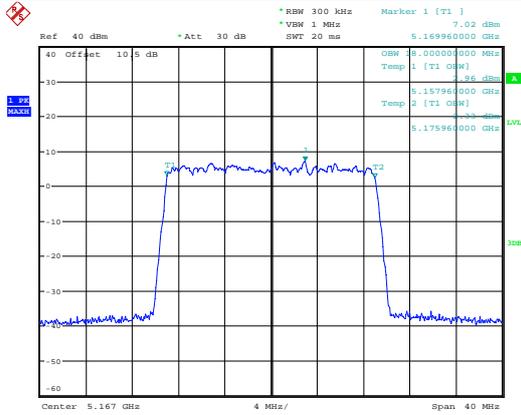
<p>1.4MHz, QPSK Lowest Channel</p>	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:06:39</p>
<p>1.4MHz, QPSK Middle Channel</p>	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:07:18</p>
<p>1.4MHz, QPSK Highest Channel</p>	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:09:39</p>

99% Emission Bandwidth

<p>10MHz, QPSK Lowest Channel</p>	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:10:56</p>
<p>10MHz, QPSK Middle Channel</p>	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:11:49</p>
<p>10MHz, QPSK Highest Channel</p>	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:13:04</p>

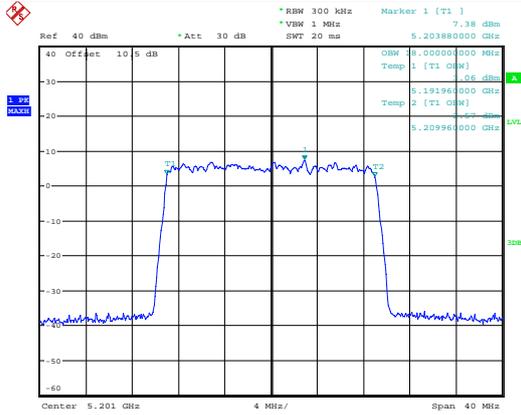
99% Emission Bandwidth

20MHz, QPSK
Lowest Channel



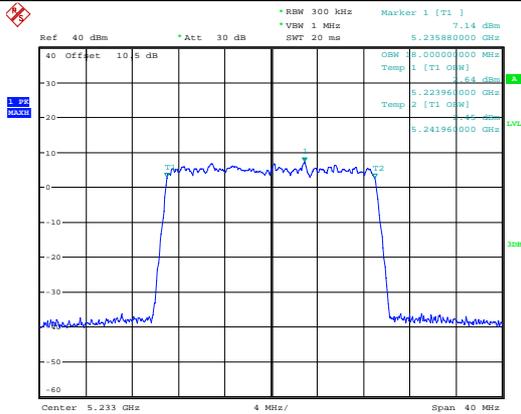
ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:10:55

20MHz, QPSK
Middle Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:11:23

20MHz, QPSK
Highest Channel



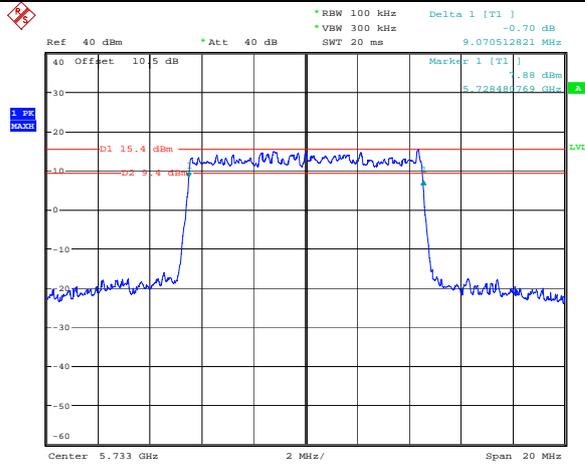
ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:12:51

5725-5850MHz:

6dB Emission Bandwidth	
1.4MHz, QPSK Lowest Channel	<p>Ref 40 dBm Att 40 dB RBW 100 kHz Delta 1 [T1] 0.77 dB VBW 300 kHz SWT 20 ms 1.153846154 MHz</p> <p>40 Offset 10 5 dB Marker 1 [T1] 14.94 dBm D1 22.1 dBm 5.72741462 GHz D2 19.1 dBm</p> <p>Center 5.728 GHz 300 kHz/ Span 3 MHz</p> <p>Comment: ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 28_FEB.2025 11:51:09</p>
1.4MHz, QPSK Middle Channel	<p>Ref 40 dBm Att 40 dB RBW 100 kHz Delta 1 [T1] 0.81 dB VBW 300 kHz SWT 20 ms 1.153846154 MHz</p> <p>40 Offset 10 5 dB Marker 1 [T1] 14.48 dBm D1 21.8 dBm 5.788419269 GHz D2 19.8 dBm</p> <p>Center 5.789 GHz 300 kHz/ Span 3 MHz</p> <p>Comment: ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 28_FEB.2025 13:33:28</p>
1.4MHz, QPSK Highest Channel	<p>Ref 40 dBm Att 40 dB RBW 100 kHz Delta 1 [T1] 0.70 dB VBW 300 kHz SWT 20 ms 1.134615385 MHz</p> <p>40 Offset 10 5 dB Marker 1 [T1] 14.73 dBm D1 21.1 dBm 5.846421895 GHz D2 19.1 dBm</p> <p>Center 5.847 GHz 300 kHz/ Span 3 MHz</p> <p>Comment: ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 28_FEB.2025 11:54:38</p>

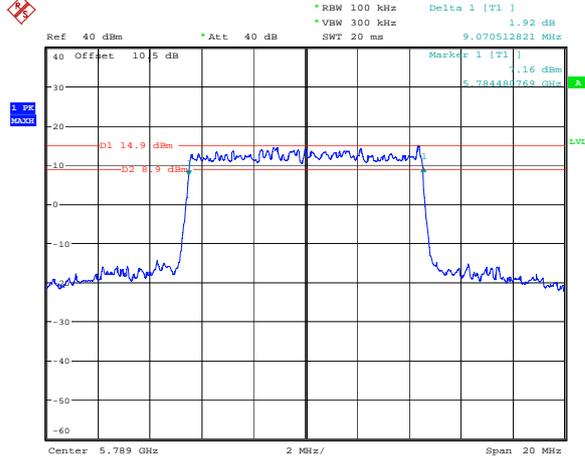
6dB Emission Bandwidth

10MHz, QPSK
Lowest Channel



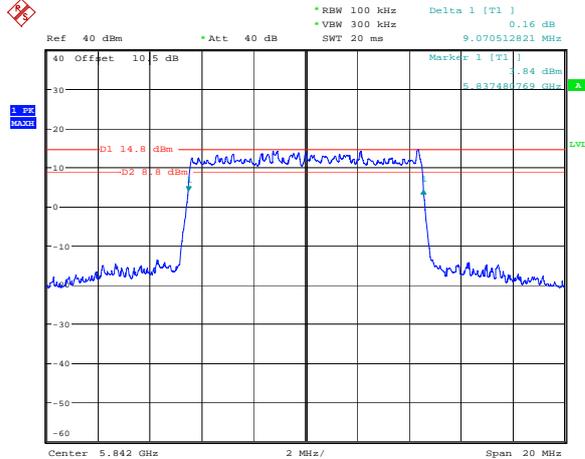
Comment: ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 28_FEB.2025 13:34:55

10MHz, QPSK
Middle Channel



Comment: ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 28_FEB.2025 13:24:59

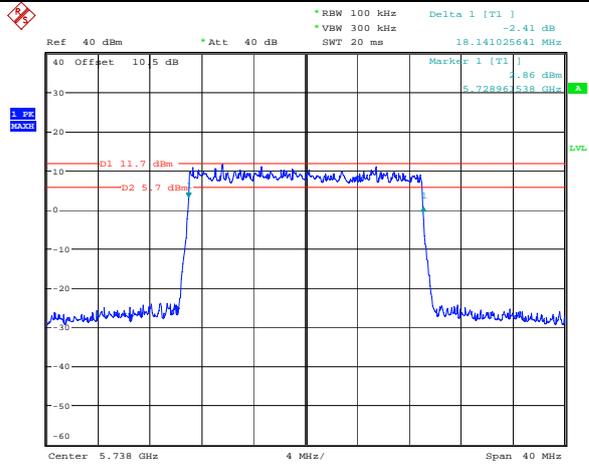
10MHz, QPSK
Highest Channel



Comment: ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 28_FEB.2025 13:26:38

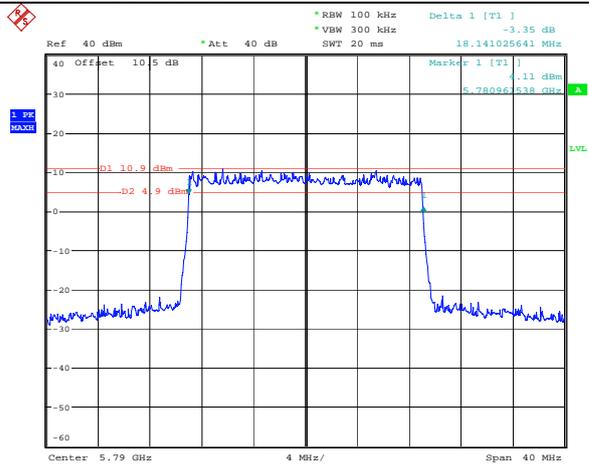
6dB Emission Bandwidth

20MHz, QPSK
Lowest Channel



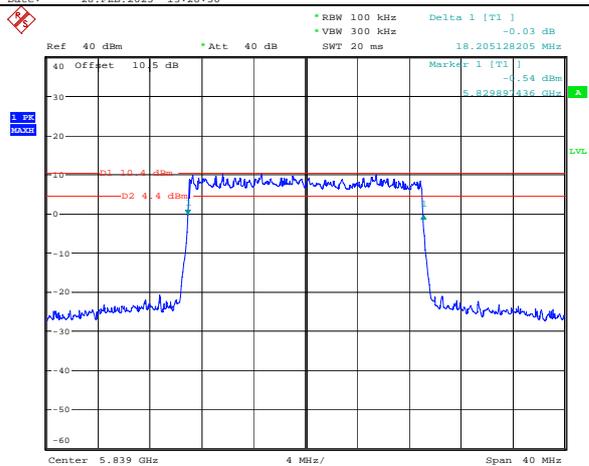
Comment: ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 28.FEB.2025 13:27:59

20MHz, QPSK
Middle Channel



Comment: ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 28.FEB.2025 13:28:56

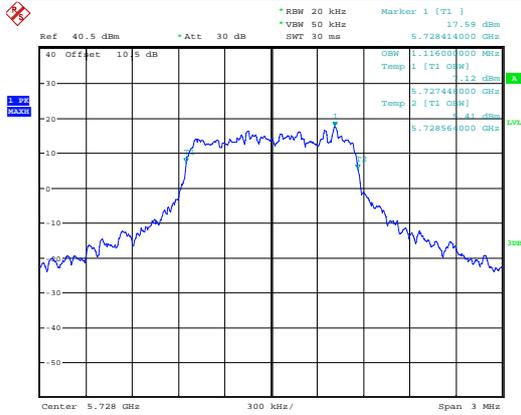
20MHz, QPSK
Highest Channel



Comment: ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 28.FEB.2025 13:30:31

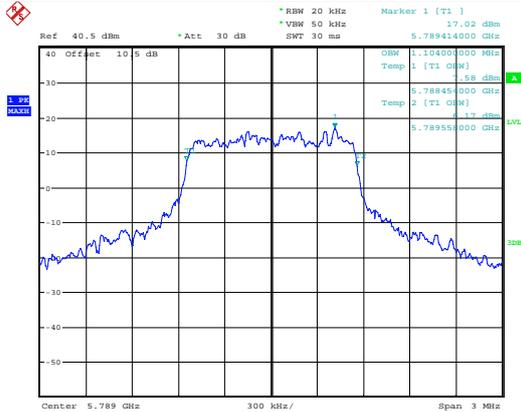
99% Emission Bandwidth

1.4MHz, QPSK
Lowest Channel



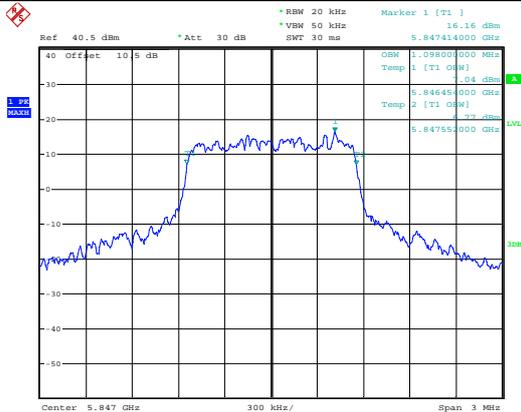
ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:35:28

1.4MHz, QPSK
Middle Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:36:00

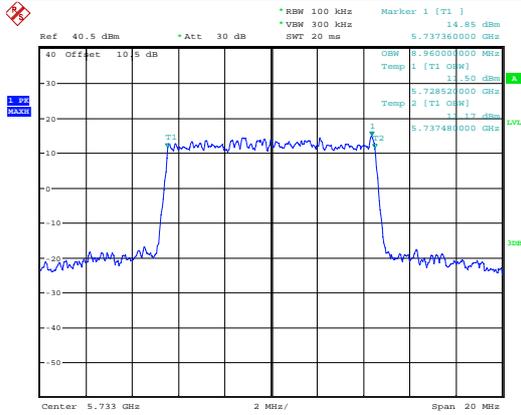
1.4MHz, QPSK
Highest Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:36:26

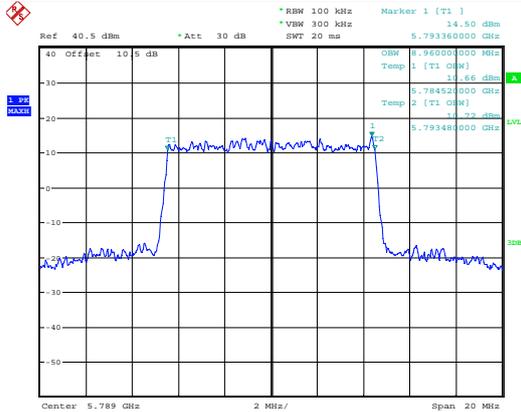
99% Emission Bandwidth

10MHz, QPSK
Lowest Channel



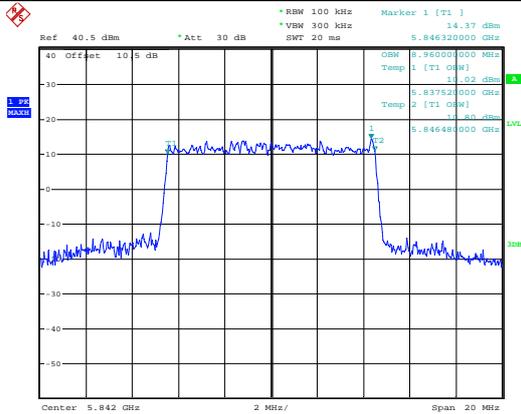
ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:37:30

10MHz, QPSK
Middle Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:38:00

10MHz, QPSK
Highest Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:38:57

99% Emission Bandwidth

<p>20MHz, QPSK Lowest Channel</p>	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 14:42:48</p>
<p>20MHz, QPSK Middle Channel</p>	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 14:43:13</p>
<p>20MHz, QPSK Highest Channel</p>	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 14:43:42</p>

4.4 Maximum Conducted Output Power

Sample Number:	2XO4-1	Test Date:	2025/01/25
Test Site:	RF	Test Mode:	Transmitting
Tester:	LingLing Li	Test Result:	Pass

Environmental Conditions:

Temperature: (°C)	24.1	Relative Humidity: (%)	50	ATM Pressure: (kPa)	101.1
----------------------	------	------------------------------	----	------------------------	-------

Test Equipment List and Details:

Manufacturer	Description	Model	Serial Number	Calibration Date	Calibration Due Date
zhuoxiang	Coaxial Cable	SMA-178	211003	Each time	N/A
Anritsu	Power Meter	ML2495A	1106009	2024/08/03	2025/08/02
Anritsu	Pulse Power Sensor	MA2411A	10780	2024/08/03	2025/08/02
eastsheep	Coaxial Attenuator	2W-SMA-JK-18G	21060301	Each time	N/A

* Statement of Traceability: China Certification ICT Co., Ltd (Dongguan) attests that all calibrations have been performed, traceable to National Primary Standards and International System of Units (SI).

Test Data:

5150-5250 MHz:

Test Modes	Test Frequency (MHz)	Max. Conducted Average Output Power (dBm)			
		Chain 0	Chain 1	Total	Limit
1.4MHz QPSK	5154	15.47	15.00	18.25	30
	5201	15.30	15.99	18.67	30
	5246	15.37	16.27	18.85	30
10MHz QPSK	5157	11.97	15.01	16.76	30
	5201	11.96	15.08	16.80	30
	5243	11.82	15.44	17.01	30
20MHz QPSK	5167	14.50	17.12	19.01	30
	5201	14.54	17.57	19.32	30
	5233	14.68	17.76	19.50	30

Note:

The device is a master device when these modes operating.

The system supports 2T2R CDD modes. Per KDB 662911 D01 Multiple Transmitter Output v02r01:

Array Gain = 0 dB (i.e., no array gain) for $N_{ANT} \leq 4$.

The Maximum antenna gain is 0.7dBi, so directional gain = $0.7 + 0 = 0.7$ dBi.

The Maximum EIRP=20.20 dBm, meet the requirement of the maximum e.i.r.p. at any elevation angle above 30 degrees as measured from the horizon must not exceed 125 mW (21 dBm).

5725-5850 MHz:

Test Modes	Test Frequency (MHz)	Max. Conducted Average Output Power (dBm)			
		Chain 0	Chain 1	Total	Limit
1.4MHz QPSK	5728	24.38	24.07	27.24	30
	5789	24.06	24.40	27.24	30
	5847	23.28	23.93	26.63	30
10MHz QPSK	5733	24.07	23.67	26.88	30
	5789	23.43	23.71	26.58	30
	5842	22.83	23.28	26.07	30
20MHz QPSK	5738	23.16	22.75	25.97	30
	5790	22.62	22.67	25.66	30
	5839	21.81	22.4	25.13	30

Note:

The system supports 2T2R CDD modes. Per KDB 662911 D01 Multiple Transmitter Output v02r01:

Array Gain = 0 dB (i.e., no array gain) for $N_{ANT} \leq 4$.

The Maximum antenna gain is 1.7dBi, so directional gain = $1.7 + 0 = 1.7$ dBi.

4.5 Maximum power spectral density

Sample Number:	2XO4-1	Test Date:	2025/01/25
Test Site:	RF	Test Mode:	Transmitting
Tester:	LingLing Li	Test Result:	Pass

Environmental Conditions:

Temperature: (°C)	24.1	Relative Humidity: (%)	50	ATM Pressure: (kPa)	101.1
----------------------	------	------------------------------	----	---------------------------	-------

Test Equipment List and Details:

Manufacturer	Description	Model	Serial Number	Calibration Date	Calibration Due Date
R&S	Spectrum Analyzer	FSU26	200256	2024/04/01	2025/03/31
eastsheep	Coaxial Attenuator	2W-SMA-JK-18G	21060301	Each time	N/A
zhuoxiang	Coaxial Cable	SMA-178	211003	Each time	N/A
R&S	Spectrum Analyzer	FSU26	100147	2024/04/01	2025/03/31

* Statement of Traceability: China Certification ICT Co., Ltd (Dongguan) attests that all calibrations have been performed, traceable to National Primary Standards and International System of Units (SI).

Test Data:

5150-5250 MHz:

Test Modes	Test Frequency (MHz)	Maximum Power Spectral Density (dBm/MHz)			
		Chain 0	Chain 1	Total	Limit
1.4MHz	5154	13.20	13.88	16.56	17
	5201	13.62	14.26	16.96	17
	5246	13.59	14.30	16.97	17
10MHz	5157	2.53	5.20	7.08	17
	5201	2.68	5.96	7.63	17
	5243	2.87	6.30	7.93	17
20MHz	5167	1.69	4.82	6.54	17
	5201	1.63	5.05	6.68	17
	5233	1.62	5.09	6.70	17

Note:

The device is a master device when these modes operating.

Method SA-1 in KDB 789033 D02 General UNII Test Procedures New Rules v02r01 was used for PSD test.

The system supports 2T2R CDD modes. Per KDB 662911 D01 Multiple Transmitter Output v02r01:

Array Gain = $10 \log(N_{ANT}/N_{SS})$ dB.The Maximum antenna gain is 0.7dBi, so directional gain = $0.7 + 10 * \log(2/1) = 3.7$ dBi.

5725-5850 MHz:

Test Modes	Test Frequency (MHz)	Maximum Power Spectral Density (dBm/500kHz)			
		Chain 0	Chain 1	Total	Limit
1.4MHz	5728	20.74	20.30	23.54	30
	5789	20.37	20.73	23.56	30
	5847	19.98	20.52	23.27	30
10MHz	5733	11.57	11.53	14.56	30
	5789	11.37	11.67	14.53	30
	5842	10.76	11.42	14.11	30
20MHz	5738	7.84	7.31	10.59	30
	5790	7.24	7.36	10.31	30
	5839	6.99	7.19	10.10	30

Note:

The Maximum antenna gain is 1.7dBi

Method SA-1 in KDB 789033 D02 General UNII Test Procedures New Rules v02r01 was used for PSD test.

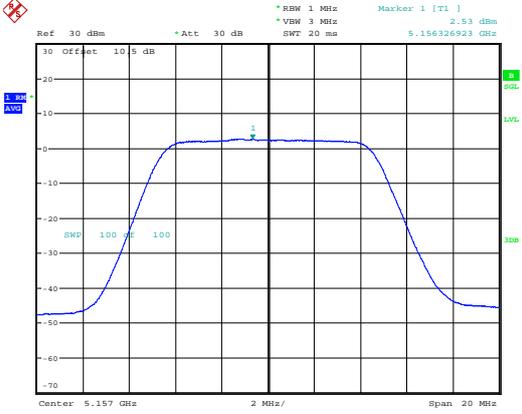
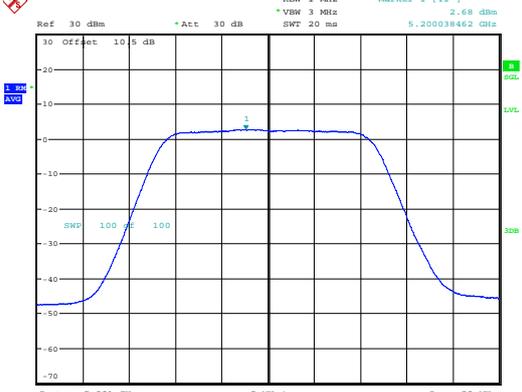
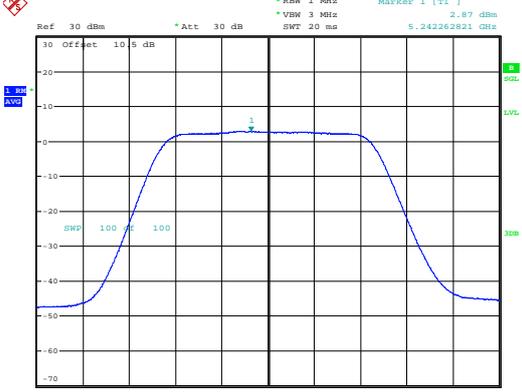
The system supports 2T2R CDD modes. Per KDB 662911 D01 Multiple Transmitter Output v02r01:

Array Gain = $10 \log(N_{ANT}/N_{SS})$ dB.The Maximum antenna gain is 1.7dBi, so directional gain = $1.7 + 10 * \log(2/1) = 4.7$ dBi.

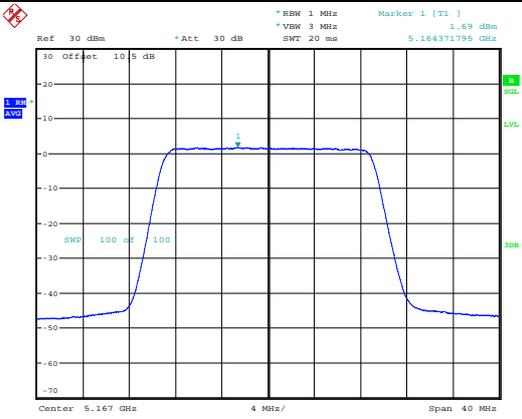
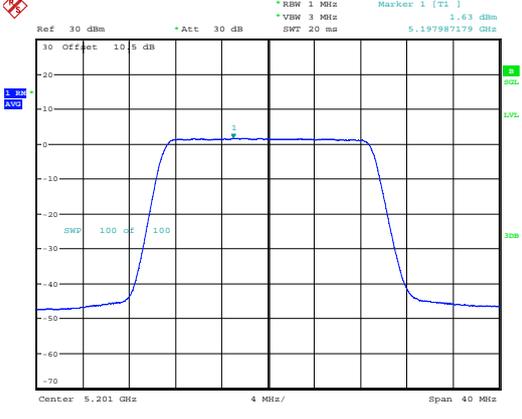
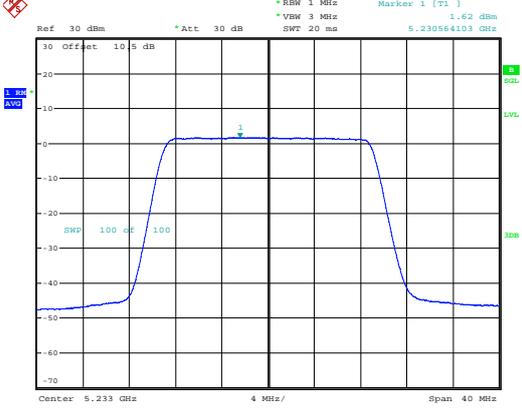
5150-5250MHz:
Chain 0

Maximum power spectral density	
1.4MHz, QPSK Lowest Channel	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 10:26:24</p>
1.4MHz, QPSK Middle Channel	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 10:38:38</p>
1.4MHz, QPSK Highest Channel	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 10:39:46</p>

Maximum power spectral density

<p>10MHz, QPSK Lowest Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 10:52:47</p>
<p>10MHz, QPSK Middle Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 10:59:18</p>
<p>10MHz, QPSK Highest Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:02:44</p>

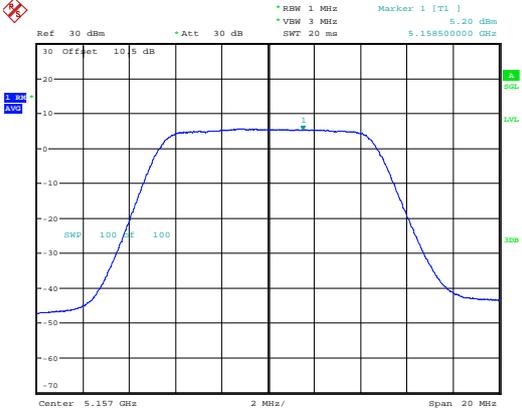
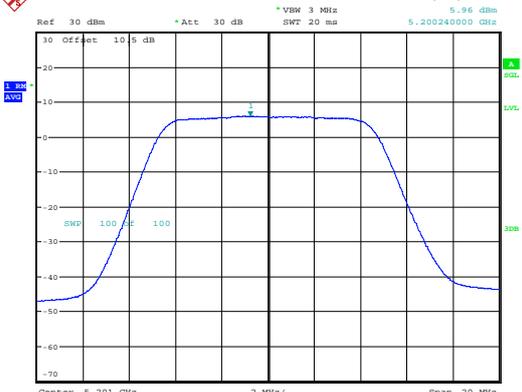
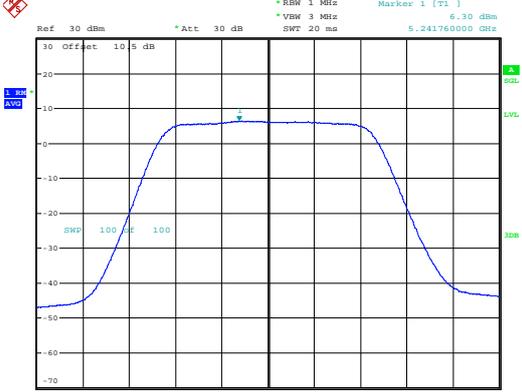
Maximum power spectral density

<p>20MHz, QPSK Lowest Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 14:01:08</p>
<p>20MHz, QPSK Middle Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 14:02:07</p>
<p>20MHz, QPSK Highest Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 14:02:36</p>

Chain 1:

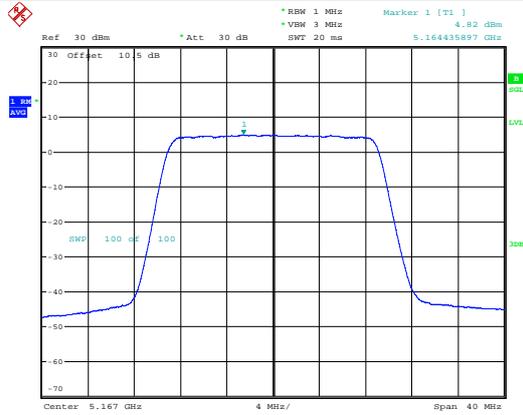
Maximum power spectral density	
1.4MHz, QPSK Lowest Channel	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:15:47</p>
1.4MHz, QPSK Middle Channel	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:16:18</p>
1.4MHz, QPSK Highest Channel	<p>Comment: ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:16:57</p>

Maximum power spectral density

<p>10MHz, QPSK Lowest Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:18:06</p>
<p>10MHz, QPSK Middle Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:20:31</p>
<p>10MHz, QPSK Highest Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:27:36</p>

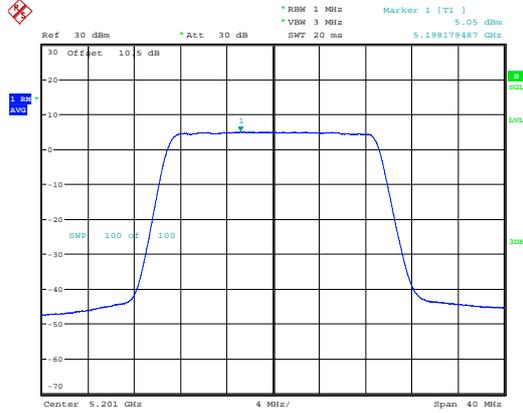
Maximum power spectral density

20MHz, QPSK
Lowest Channel



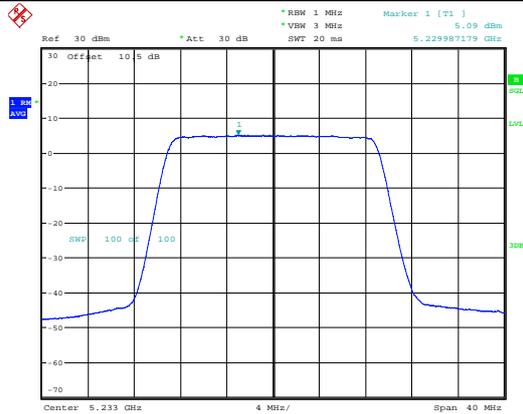
ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:04:13

20MHz, QPSK
Middle Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:03:42

20MHz, QPSK
Highest Channel

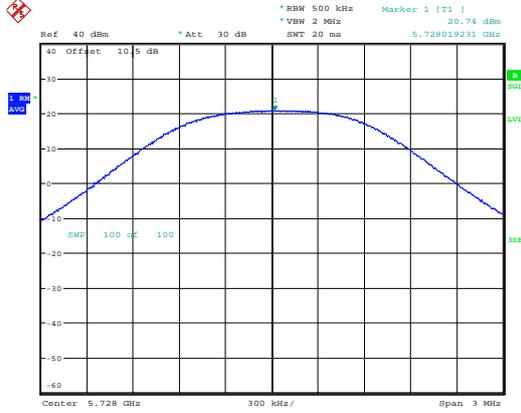


ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:03:16

5725-5850MHz:
Chain 0

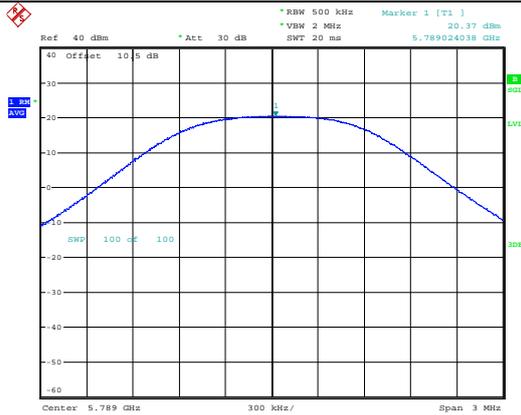
Maximum power spectral density

1.4MHz, QPSK
Lowest Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:17:27

1.4MHz, QPSK
Middle Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:19:39

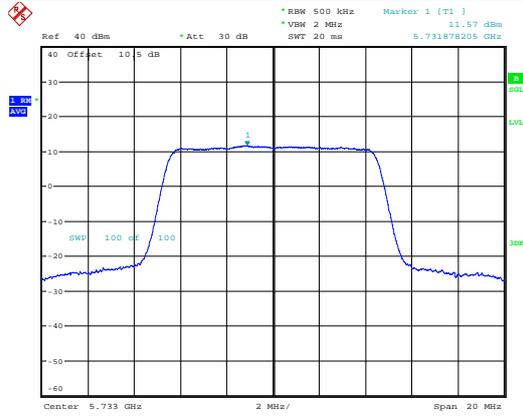
1.4MHz, QPSK
Highest Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:20:13

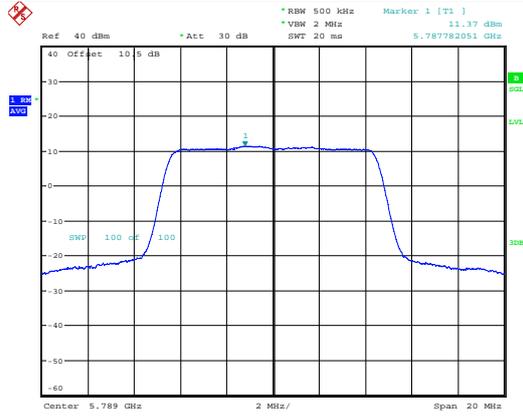
Maximum power spectral density

10MHz, QPSK
Lowest Channel



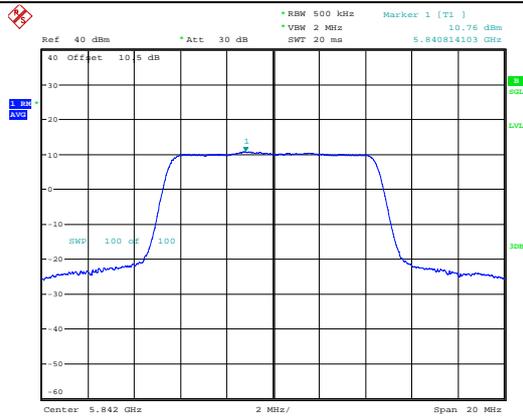
ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:22:55

10MHz, QPSK
Middle Channel



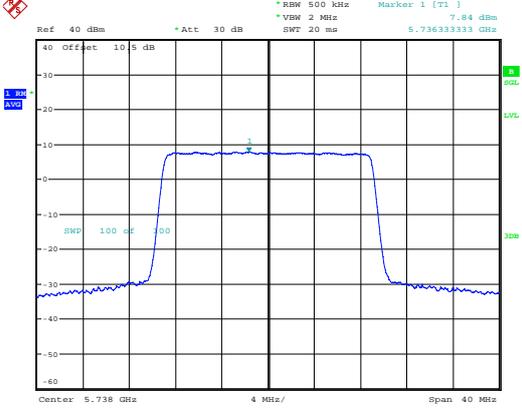
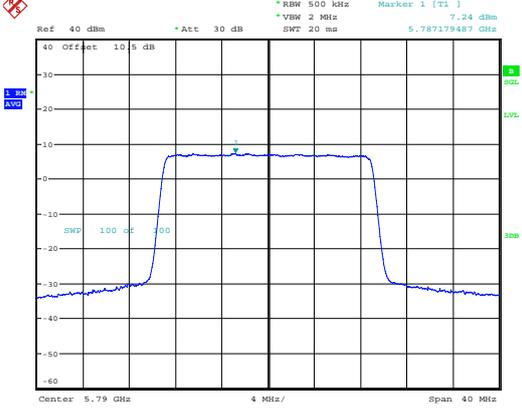
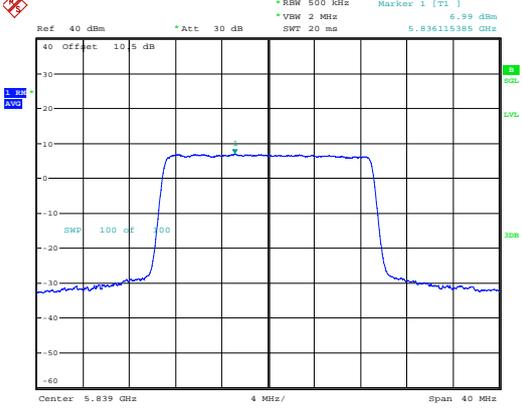
ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:23:37

10MHz, QPSK
Highest Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 14:25:45

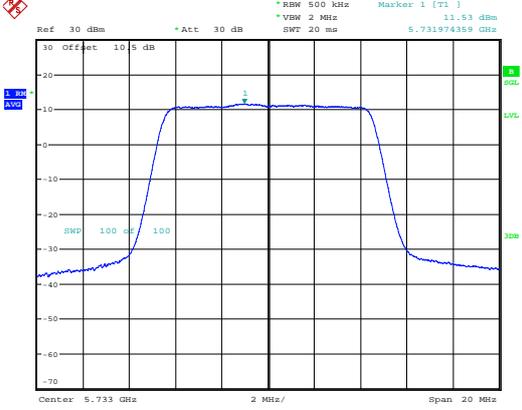
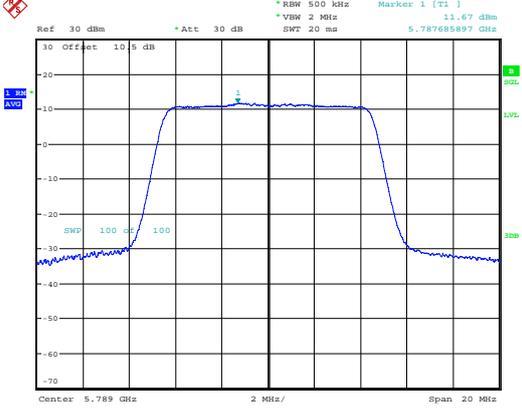
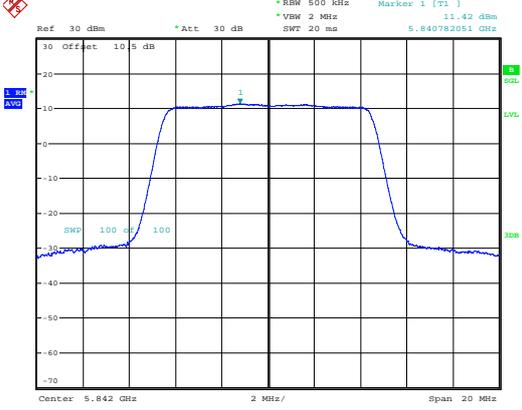
Maximum power spectral density

<p>20MHz, QPSK Lowest Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 14:27:19</p>
<p>20MHz, QPSK Middle Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 14:29:13</p>
<p>20MHz, QPSK Highest Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 14:29:47</p>

Chain 1:

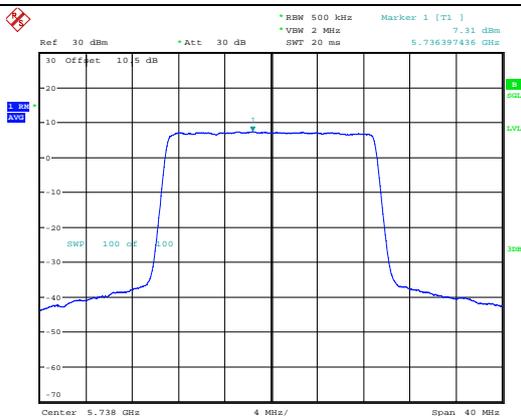
Maximum power spectral density	
<p>1.4MHz, QPSK Lowest Channel</p>	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 15:33:05</p>
<p>1.4MHz, QPSK Middle Channel</p>	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 15:33:42</p>
<p>1.4MHz, QPSK Highest Channel</p>	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 15:34:14</p>

Maximum power spectral density

<p>10MHz, QPSK Lowest Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 15:34:56</p>
<p>10MHz, QPSK Middle Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 15:35:27</p>
<p>10MHz, QPSK Highest Channel</p>	 <p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 15:35:59</p>

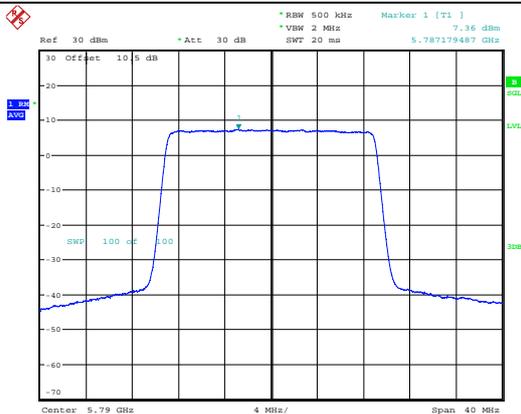
Maximum power spectral density

20MHz, QPSK
Lowest Channel



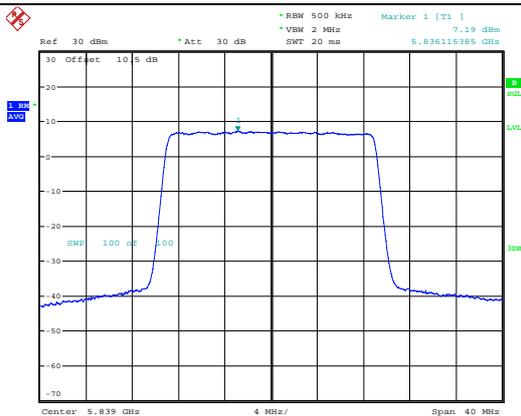
ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 15:37:09

20MHz, QPSK
Middle Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 15:44:18

20MHz, QPSK
Highest Channel



ProjectNo.:2503P42421E-RF Tester:LingLing Li
Date: 25.JAN.2025 15:44:56

4.6 Duty Cycle

Sample Number:	2XO4-1	Test Date:	2025/01/25
Test Site:	RF	Test Mode:	Transmitting
Tester:	LingLing Li	Test Result:	N/A

Environmental Conditions:

Temperature: (°C)	24.1	Relative Humidity: (%)	50	ATM Pressure: (kPa)	101.1
----------------------	------	---------------------------	----	---------------------------	-------

Test Equipment List and Details:

Manufacturer	Description	Model	Serial Number	Calibration Date	Calibration Due Date
R&S	Spectrum Analyzer	FSU26	200256	2024/04/01	2025/03/31
eastsheep	Coaxial Attenuator	2W-SMA-JK-18G	21060301	Each time	N/A
zhuoxiang	Coaxial Cable	SMA-178	211003	Each time	N/A

* Statement of Traceability: China Certification ICT Co., Ltd (Dongguan) attests that all calibrations have been performed, traceable to National Primary Standards and International System of Units (SI).

Test Data:

Test only was performed at Chain 0.

Test Modes	Ton (ms)	Ton+off (ms)	Duty cycle (%)	VBW Setting (Hz)
1.4MHz QPSK	100	100	100.00	10
10MHz QPSK	100	100	100.00	10
20MHz QPSK	100	100	100.00	10

Duty Cycle	
1.4MHz, QPSK	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:08:56</p>
10MHz, QPSK	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 11:12:20</p>
20MHz, QPSK	<p>ProjectNo.:2503P42421E-RF Tester:LingLing Li Date: 25.JAN.2025 14:13:59</p>

5. EUT PHOTOGRAPHS

Please refer to the attachment 2503P42421E-RF-EXP EUT EXTERNAL PHOTOGRAPHS and 2503P42421E-RF-INP EUT INTERNAL PHOTOGRAPHS

6. TEST SETUP PHOTOGRAPHS

Please refer to the attachment 2503P42421E-RF-00C-TSP TEST SETUP PHOTOGRAPHS.

===== END OF REPORT =====