



TEST REPORT

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Report Number: 2401X44887E-RF-00 FCC ID: 2BHJX-ATS20BR2424

Test Standard (s) FCC PART 15.249

Sample Description

Product Type: REMOTE

Model No.: DR-ATS20B

Multiple Model(s) No.: DR-UHF20B

Trade Mark: N/A

Date Received: 2024/09/06 Issue Date: 2025/01/11

Test Result: Pass▲

▲ In the configuration tested, the EUT complied with the standards above.

Prepared and Checked By:

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Approved By:

RF Engineer RF Supervisor

Note: The information marked # is provided by the applicant, the laboratory is not responsible for its authenticity and this information can affect the validity of the result in the test report. Customer model name, addresses, names, trademarks etc. are included.

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DOCUMENT REVISION HISTORY

Revision Number	Report Number	Description of Revision	Date of Revision
0	2401X44887E-RF-00	Original Report	2025/01/11

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GENERAL INFORMATION

Product Description for Equipment under Test (EUT)

Product	REMOTE
Tested Model	DR-ATS20B
Multiple Model(s)	DR-UHF20B
Frequency Range	2440-2475MHz
Modulation Technique	GFSK
Antenna Specification [#]	2dBi (provided by the applicant)
Voltage Range	DC 1.5V AAA Battery*3
Sample serial number	2RBC-1 (Assigned by BACL, Shenzhen)
Sample/EUT Status	Good condition
Adapter Information	N/A
Note: The Multiple models are	electrically identical with the test model except for model name and sales

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Note: The Multiple models are electrically identical with the test model except for model name and sales channels. Please refer to the declaration letter[#] for more detail, which was provided by manufacturer.

Objective

This test report is in accordance with Part 2-Subpart J, and Part 15-Subparts A and C of the Federal Communication Commissions rules.

The tests were performed in order to determine compliance with FCC Part 15, Subpart C, and section 15.203, 15.205, 15.209 and 15.249 rules.

Test Methodology

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

All emissions measurement was performed at Bay Area Compliance Laboratories Corp. (Shenzhen). The radiated testing was performed at an antenna-to-EUT distance of 3 meters.

Each test item follows test standards and with no deviation.

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Measurement Uncertainty

	Parameter		Uncertainty
Occupied	Channel I	Bandwidth	±5%
RI	Frequen	су	213.55 Hz(k=2, 95% level of confidence)
RF outpu	t power, c	onducted	0.72 dB(k=2, 95% level of confidence)
Unwanted	Emission,	conducted	1.75 dB(k=2, 95% level of confidence)
AC Power Lines Cond	ucted	9kHz-150kHz	3.94dB(k=2, 95% level of confidence)
Emissions		150kHz-30MHz	3.84dB(k=2, 95% level of confidence)
		9kHz - 30MHz	3.30dB(k=2, 95% level of confidence)
	30MH	z~200MHz (Horizontal)	4.48dB(k=2, 95% level of confidence)
	30MI	Hz~200MHz (Vertical)	4.55dB(k=2, 95% level of confidence)
Radiated Emissions	200MH	z~1000MHz (Horizontal)	4.85dB(k=2, 95% level of confidence)
Radiated Emissions	200MI	Hz~1000MHz (Vertical)	5.05dB(k=2, 95% level of confidence)
		1GHz - 6GHz	5.35dB(k=2, 95% level of confidence)
		6GHz - 18GHz	5.44dB(k=2, 95% level of confidence)
	18GHz - 40GHz		5.16dB(k=2, 95% level of confidence)
T	Temperature		±1°C
Humidity			±1%
Sup	ply volta	ges	±0.4%

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

Test Facility

The Test site used by Bay Area Compliance Laboratories Corp. (Shenzhen) to collect test data is located on the 5F(B-West), 6F, 7F, the 3rd Phase of Wan Li Industrial Building D, Shihua Rd, FuTian Free Trade Zone, Shenzhen, 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.: 715558, the FCC Designation No.: CN5045.

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SYSTEM TEST CONFIGURATION

Description of Test Configuration

The system was configured for testing by manufacturer.

Frequency Channel List:

Channel No.	Frequency (MHz)	Channel No.	Frequency (MHz)	Channel No.	Frequency (MHz)
1	2440	13	2452	25	2464
2	2441	14	2453	26	2465
3	2442	15	2454	27	2466
4	2443	16	2455	28	2467
5	2444	17	2456	29	2468
6	2445	18	2457	30	2469
7	2446	19	2458	31	2470
8	2447	20	2459	32	2471
9	2448	21	2460	33	2472
10	2449	22	2461	34	2473
11	2450	23	2462	35	2474
12	2451	24	2463	36	2475

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Note: Test on Channel 1, 18 and 36.

EUT Exercise Software

Test in the engineering mode and the power level is Default[#]. The power level was provided by the manufacturer.

Equipment Modifications

No modifications were made to the unit tested.

Support Equipment List and Details

Manufacturer	Description	Model	Serial Number
/	/	/	/

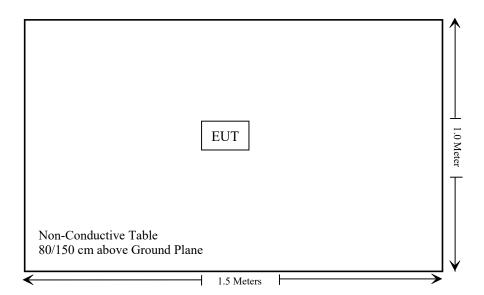
Support Cable Descriptions

Cable Description	Length (m)	From/Port	To
/	/	/	/

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Block Diagram of Test Setup

For Radiated Emission:



SUMMARY OF TEST RESULTS

FCC Rules	Description of Test	Result
§1.1307 (b) (1) &§2.1093	RF Exposure	Compliant
§15.203	Antenna Requirement	Compliant
§15.207(a)	Conduction Emissions	Not Applicable
15.205, §15.209, §15.249(d)	Radiated Emissions& Outside of Band Emission	Compliant
§15.215 (c)	20 dB Bandwidth	Compliant

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Not Applicable: The EUT powered by battery only.

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TEST EQUIPMENT LIST

Manufacturer	Description	Model	Serial Number	Calibration Date	Calibration Due Date		
	Radiated Emissions Test						
Rohde & Schwarz	EMI Test Receiver	ESR3	102455	2024/01/16	2025/01/15		
Sonoma instrument	Pre-amplifier	310 N	186238	2024/05/21	2025/05/20		
Sunol Sciences	Broadband Antenna	ЈВ1	A040904-1	2023/07/20	2026/07/19		
Unknown	Cable	Chamber A Cable 1	N/A	2024/06/18	2025/06/17		
Unknown	Cable	XH500C	J-10M-A	2024/06/18	2025/06/17		
BACL	Active Loop Antenna	1313-1A	4031911	2024/05/14	2027/05/13		
Unknown	Cable	2Y194	0735	2024/05/21	2025/05/20		
Unknown	Cable	PNG214	1354	2024/05/21	2025/05/20		
Audix	EMI Test software	E3	19821b(V9)	NCR	NCR		
Rohde & Schwarz	Spectrum Analyzer	FSV40	101605	2024/03/27	2025/03/26		
COM-POWER	Pre-amplifier	PA-122	181919	2024/06/18	2025/06/17		
Schwarzbeck	Horn Antenna	BBHA9120D(12 01)	1143	2023/07/26	2026/07/25		
Unknown	RF Cable	KMSE	735	2024/06/18	2025/06/17		
Unknown	RF Cable	UFA147	219661	2024/06/18	2025/06/17		
Unknown	RF Cable	XH750A-N	J-10M	2024/06/18	2025/06/17		
JD	Multiplex Switch Test Control Set	DT7220FSU	DQ77926	2024/06/18	2025/06/17		
A.H.System	Pre-amplifier	PAM-1840VH	190	2024/06/18	2025/06/17		
Electro-Mechanics Co	Horn Antenna	3116	9510-2270	2023/09/18	2026/09/17		
UTIFLEX	RF Cable	NO. 13	232308-001	2024/06/18	2025/06/17		
Audix	EMI Test software	Е3	191218(V9)	NCR	NCR		

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

FCC§1.1307 (b) (1) &§2.1093 – RF EXPOSURE

Applicable Standard

According to FCC §2.1093 and §1.1307(b) (1), systems operating under the provisions of this section shall be operated in a manner that ensure that the public is not exposed to radio frequency energy level in excess of the Commission's guideline.

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According to KDB 447498 D01 General RF Exposure Guidance

The 1-g and 10-g SAR test exclusion thresholds for 100 MHz to 6 GHz at test separation distances \leq 50 mm are determined by:

[(max. power of channel, including tune-up tolerance, mW)/(min. test separation distance, mm)] \cdot [$\sqrt{f(GHz)}$] \leq 3.0 for 1-g SAR and \leq 7.5 for 10-g extremity SAR, where

- 1. f(GHz) is the RF channel transmit frequency in GHz.
- 2. Power and distance are rounded to the nearest mW and mm before calculation.
- 3. The result is rounded to one decimal place for comparison.
- 4. When the minimum test separation distance is < 5 mm, a distance of 5 mm is applied to determine SAR test Exclusion.

Measurement Result

For worst case:

Mode	Frequency (MHz)	Max tune _# up power [#] (dBm)	Max tune up power (mW)	Distance (mm)	Calculated value	Threshold (10-g extremity SAR)	SAR Test Exclusion
GFSK	2440-2475	8.0	6.31	5	2.0	7.5	Yes

Note 1: The power of EUT: E Field@3m is 102.90dBuV/m = 7.70dBm

Note 2: $E[dB\mu V/m] = EIRP[dBm] + 95.2$ for d = 3 m.

Note 3: The EUT is a handheld device.

Result: Compliant

FCC§15.203 - ANTENNA REQUIREMENT

Applicable Standard

According to 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.

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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.

Antenna Connector Construction

The EUT has one internal antenna which was permanently attached and the antenna gain[#] is 2dBi, fulfill the requirement of this section. Please refer to the EUT photos.

Antenna Type	Antenna Gain#	Impedance	Frequency Range
Monopole	2dBi	50Ω	2440-2475MHz

Result: Compliant.

FCC§15.205, §15.209 & §15.249(d) - RADIATED EMISSIONS

Applicable Standard

As per FCC§15.249 (a), except as provided in paragraph (b) of this section, the field strength of emissions from intentional radiators operated within these frequency bands shall comply with the following:

Fundamental frequency	Field strength of fundamental (millivolts/meter)	Field strength of harmonics (microvolts/meter)
902–928 MHz	50	500
2400–2483.5 MHz	50	500
5725–5875 MHz	50	500
24.0–24.25 GHz	250	2500

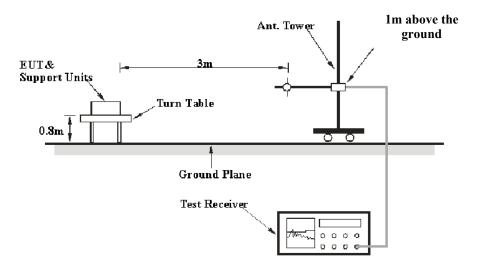
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As per FCC§15.249 (c), Field strength limits are specified at a distance of 3 meters.

As per FCC§15.249 (d), Emissions radiated outside of the specified frequency bands, except for harmonics, shall be attenuated by at least 50 dB below the level of the fundamental or to the general radiated emission limits in §15.209, whichever is the lesser attenuation.

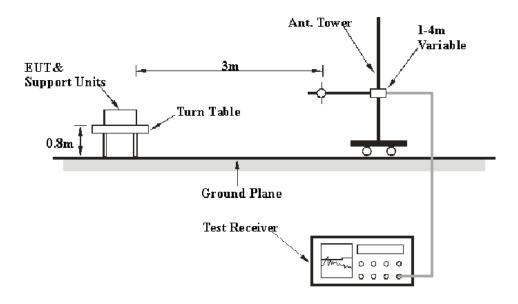
EUT Setup

9 kHz-30MHz:

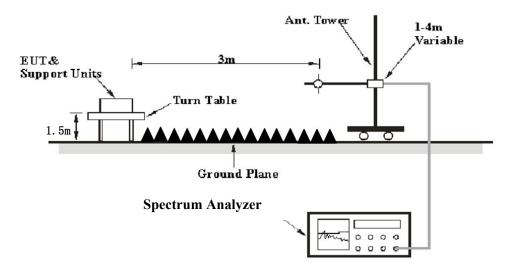


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30MHz-1GHz:



Above 1GHz:



The radiated emission and out of band 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 the FCC 15.209/15.205 and FCC 15.249 limits.

EMI Test Receiver & Spectrum Analyzer Setup

The EMI test receiver & Spectrum Analyzer Setup were set with the following configurations:

Frequency Range	RBW	Video B/W	IF B/W	Measurement			
9 kHz – 150 kHz	/	/	200 Hz	QP			
9 KHZ – 130 KHZ	300 Hz	1 kHz	/	PK			
150 kHz – 30 MHz	/	/	9 kHz	QP			
130 KHZ – 30 MHZ	10 kHz	30 kHz	/	PK			
30 MHz – 1000 MHz	/	/	120 kHz	QP			
30 MHZ – 1000 MHZ	100 kHz	300 kHz	/	PK			
	Fundamental & Harmonics						
	1MHz	3 MHz	/	PK			
Above 1 GHz	Average Emission Level=Peak Emission Level+20*log(Duty cycle)						
Above I GHZ		Band Edge & Ot	her Emissions				
	1MHz	3 MHz	/	PK			
	1MHz	10 Hz	/	Average			

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Test Procedure

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

The EUT is set 3 meter away from the testing antenna, which is varied from 1-4 meter, and the EUT is placed on a turntable, which is 0.8 meter above ground plane for below 1GHz or 1.5 meter for above 1GHz, the table shall be rotated for 360 degrees to find out the highest emission. The receiving antenna should be changed the polarization both of horizontal and vertical.

All final data was recorded in Quasi-peak detection mode except for the frequency bands 9–90 kHz, 110–490 kHz and above 1000 MHz, average detection modes for frequency bands 9–90 kHz and 110–490 kHz, peak and average detection modes for frequencies above 1 GHz.

For 9 kHz-30MHz, the report shall list the six emissions with the smallest margin relative to the limit, for each of the three antenna orientations (parallel, perpendicular, and ground-parallel) unless the margin is greater than 20 dB.

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

Factor & Over Limit/Margin Calculation

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

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Factor = Antenna Factor + Cable Loss - Amplifier Gain

The "Over Limit/Margin" column of the following data tables indicates the degree of compliance with the applicable limit. For example, an Over Limit/margin of -7dB means the emission is 7dB below the limit. The equation for calculation is as follows:

Over Limit = Level – Limit; Margin = Limit–Corrected Amplitude Level / Corrected Amplitude = Read Level + Factor

Test Data

Environmental Conditions

Temperature:	21~25.4 °C
Relative Humidity:	53~59 %
ATM Pressure:	101~101.2 kPa

The testing was performed by Jack Liu on 2024-09-20 for below 1GHz and Dylan Yang from 2024-10-11 to 2024-10-29 for above 1GHz.

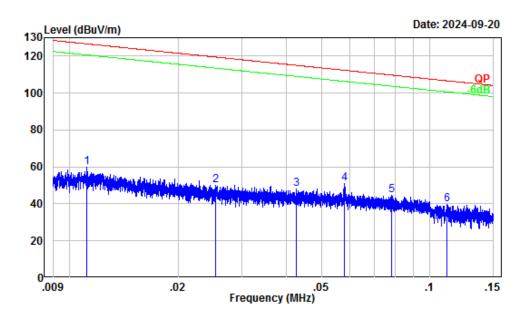
EUT operation mode: Transmitting

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

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9 kHz-30MHz: Maximum output power mode, Low Channel

Parallel (worst case)

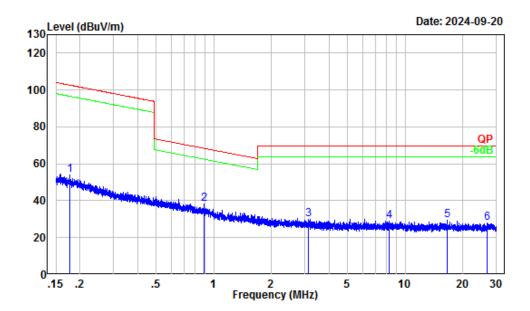


Site : Chamber A

Condition : 3m

Project Number: 2401X44887E-RF

	Freq	Factor			Limit Line		Remark	
	MHz	dB/m	dBuV	dBuV/m	dBuV/m	dB		
1	0.01	32.08	27.84	59.92	126.65	-66.73	Peak	
2	0.03	29.38	20.73	50.11	119.51	-69.40	Peak	
3	0.04	27.18	20.67	47.85	115.02	-67.17	Peak	
4	0.06	25.60	25.55	51.15	112.34	-61.19	Peak	
5	0.08	23.58	21.14	44.72	109.74	-65.02	Peak	
6	0.11	21.34	18.24	39.58	106.68	-67.10	Peak	



Site : Chamber A

Condition : 3m

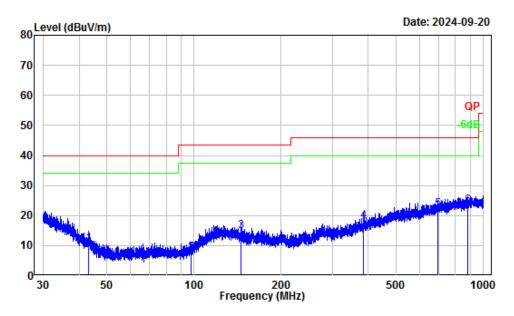
Project Number: 2401X44887E-RF

			Read		Limit	0ver	
	Freq	Factor	Level	Level	Line	Limit	Remark
	MHz	dB/m	dBuV	dBuV/m	dBuV/m	dB	
1	0.18	17.47	36.37	53.84	102.66	-48.82	Peak
2	0.90	1.99	36.18	38.17	68.46	-30.29	Peak
3	3.13	-2.22	32.09	29.87	69.54	-39.67	Peak
4	8.21	-2.98	31.93	28.95	69.54	-40.59	Peak
5	16.53	-2.46	32.01	29.55	69.54	-39.99	Peak
6	26.84	-3.09	31.20	28.11	69.54	-41.43	Peak

30MHz-1GHz: Maximum output power mode, Low Channel

Horizontal

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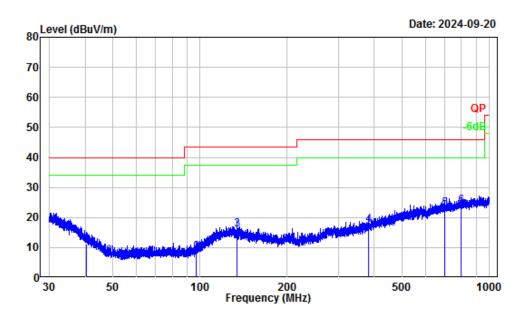


Site : Chamber A Condition : 3m Horizontal Project Number: 2401X44887E-RF

	Freq	Factor			Limit Line		Remark
	MHz	dB/m	dBuV	dBuV/m	dBuV/m	dB	
1	43.11	-14.64	25.28	10.64	40.00	-29.36	QP
2	97.33	-16.71	24.32	7.61	43.50	-35.89	QP
3	145.10	-12.18	26.88	14.70	43.50	-28.80	QP
4	384.94	-9.02	27.03	18.01	46.00	-27.99	QP
5	695.03	-3.54	25.71	22.17	46.00	-23.83	QP
6	884.89	-1.42	24.76	23.34	46.00	-22.66	QP

Vertical

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Site : Chamber A Condition : 3m Vertical Project Number: 2401X44887E-RF

			Read		Limit	0ver	
	Freq	Factor	Level	Level	Line	Limit	Remark
	MHz	dB/m	-dRuV	dBu\//m	dBu\//m		
	PILIZ	ub/III	ubuv	ubuv/III	ubuv/III	ub	
1	40.33	-12.60	23.66	11.06	40.00	-28.94	QP
2	97.03	-16.80	25.30	8.50	43.50	-35.00	QP
3	134.50	-11.45	27.39	15.94	43.50	-27.56	QP
4	382.09	-9.10	26.61	17.51	46.00	-28.49	QP
5	699.00	-3.52	26.42	22.90	46.00	-23.10	QP
6		-2.15	25.91	23.76	46.00	-22.24	QP

Above 1GHz:

Euganonari	Rece	iver	Polar	Factor	Absolute	Limit	Margin			
Frequency (MHz)	Reading (dBµV)	PK/AV	(H/V)	(dB/m)	Level (dBµV/m)	(dBµV/m)	(dB)			
			Low Channel							
2440.00	106.03	PK	Н	-3.13	102.90	114.00	-11.10			
2440.00	93.78	PK	V	-3.13	90.65	114.00	-23.35			
4880.00	50.81	PK	Н	2.58	53.39	74.00	-20.61			
4880.00	53.31	PK	V	2.58	55.89	74.00	-18.11			
	Middle Channel									
2457.00	105.86	PK	Н	-3.14	102.72	114.00	-11.28			
2457.00	94.82	PK	V	-3.14	91.68	114.00	-22.32			
4914.00	50.98	PK	Н	2.63	53.61	74.00	-20.39			
4914.00	53.52	PK	V	2.63	56.15	74.00	-17.85			
			High Channel							
2475.00	102.00	PK	Н	-3.15	98.85	114.00	-15.15			
2475.00	93.08	PK	V	-3.15	89.93	114.00	-24.07			
4950.00	53.42	PK	Н	2.61	56.03	74.00	-17.97			
4950.00	55.51	PK	V	2.61	58.12	74.00	-15.88			

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Note:

 $Factor = Antenna \ factor \ (RX) + Cable \ Loss - Amplifier \ Factor$

Absolute Level (Corrected Amplitude) = Factor + Reading

Margin = Absolute Level - Limit

The other spurious emission which is 20dB to the limit or in noise floor level was not recorded.

	Field Strength of Average											
Frequency (MHz)	Peak Measurement @3m (dBµV/m)	Polar (H/V)	Duty Cycle Corrected Factor (dB)	Average Level (dBμV/m)	Limit (dBµV/m)	Margin (dB)	Comment					
Low Channel												
2440.00	102.90	Н	-30.46	72.44	94	-21.56	Fundamental					
2440.00	90.65	V	-30.46	60.19	94	-33.81	Fundamental					
4880.00	53.39	Н	-30.46	22.93	54	-31.07	Harmonic					
4880.00	55.89	V	-30.46	25.43	54	-28.57	Harmonic					
			Middle (Channel								
2457.00	102.72	Н	-30.46	72.26	94	-21.74	Fundamental					
2457.00	91.68	V	-30.46	61.22	94	-32.78	Fundamental					
4914.00	53.61	Н	-30.46	23.15	54	-30.85	Harmonic					
4914.00	56.15	V	-30.46	25.69	54	-28.31	Harmonic					
			High Cl	hannel								
2475.00	98.85	Н	-30.46	68.39	94	-25.61	Fundamental					
2475.00	89.93	V	-30.46	59.47	94	-34.53	Fundamental					
4950.00	56.03	Н	-30.46	25.57	54	-28.43	Harmonic					
4950.00	58.12	V	-30.46	27.66	54	-26.34	Harmonic					

Report No.: 2401X44887E-RF-00

Note: Average level= Peak level+ Duty Cycle Corrected Factor

Worst case duty cycle:

Ton =0.45ms Tp = 15 ms

Duty cycle = Ton/Tp = 0.45/15=0.03 Duty Cycle Corrected Factor = 20lg (Duty cycle) = 20lg0.03= -30.46

Duty Cycle (50ms)

Duty Cycle (100ms)

Duty Cycle (1s)

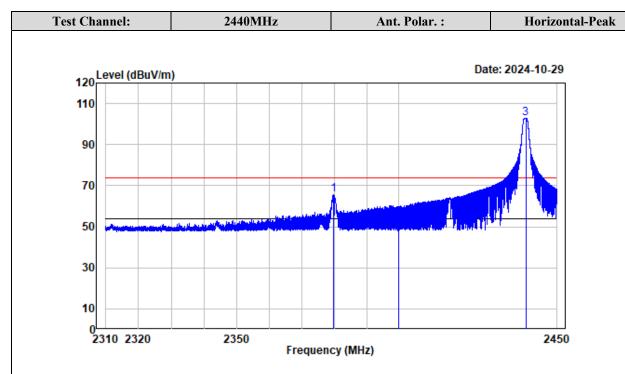
ProjectNo.:2401X44887E-RF Tester:Dylan.Yang

2000 pts

CF 2.475 GHz

Date: 11.0CT.2024 23:16:47

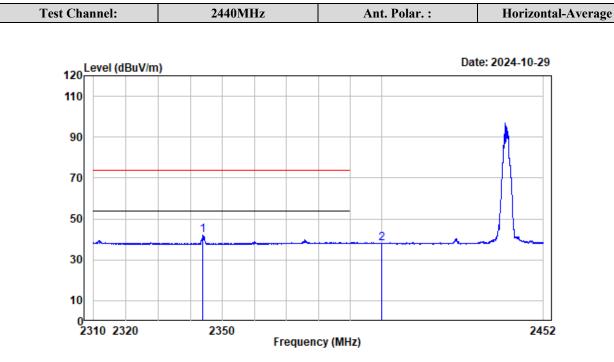
Test plots for Band Edge Measurements (Radiated):



Report No.: 2401X44887E-RF-00

Condition : Horizontal Project No.: 2401X44887E-RF Tester : Dylan.Yang

	Freq	Factor			Limit Line		Remark
	MHz	dB/m	dBuV	dBuV/m	dBuV/m	dB	
1	2379.720	-3.19	68.79	65.60	74.00	-8.40	Peak
2	2400.000	-3.21	51.69	48.48	74.00	-25.52	Peak
3	2440.000	-3.13	106.03	102.90	114.00	-11.10	Peak



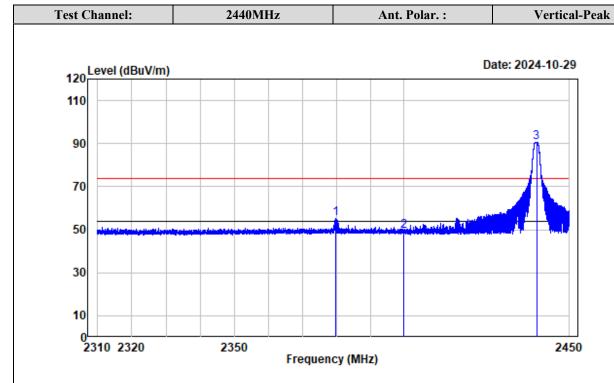
Condition : Horizontal Project No.: 2401X44887E-RF Tester : Dylan.Yang

Note : 2440

Read Limit Over Freq Factor Level Level Limit Remark

MHz dB/m dBuV dBuV/m dBuV/m dB

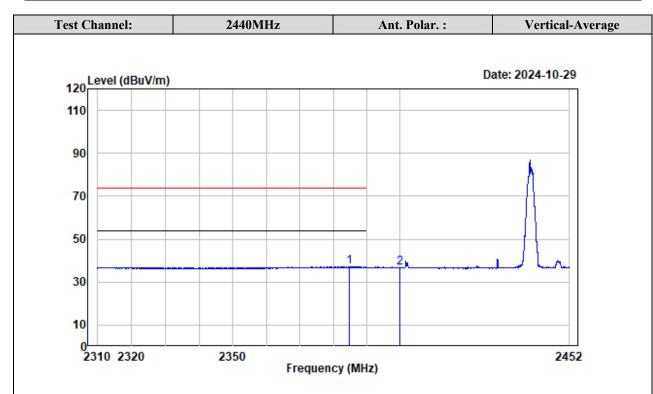
1 2343.836 -10.88 53.10 42.22 54.00 -11.78 Average 2 2400.000 -11.01 49.03 38.02 54.00 -15.98 Average



Condition : Vertical

Project No.: 2401X44887E-RF Tester : Dylan.Yang

	Freq	Factor			Limit Line		Remark	
	MHz	dB/m	dBuV	dBuV/m	dBuV/m	dB		_
1	2379.808	-3.19	58.53	55.34	74.00	-18.66	Peak	
2	2400.000	-3.21	52.35	49.14	74.00	-24.86	Peak	
3	2440.000	-3.13	93.78	90.65	114.00	-23.35	Peak	

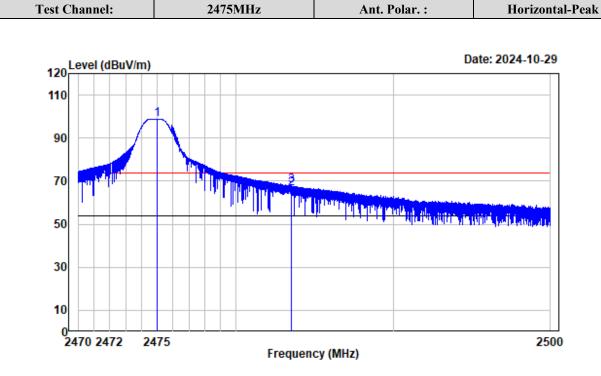


Condition : Vertical

Project No.: 2401X44887E-RF

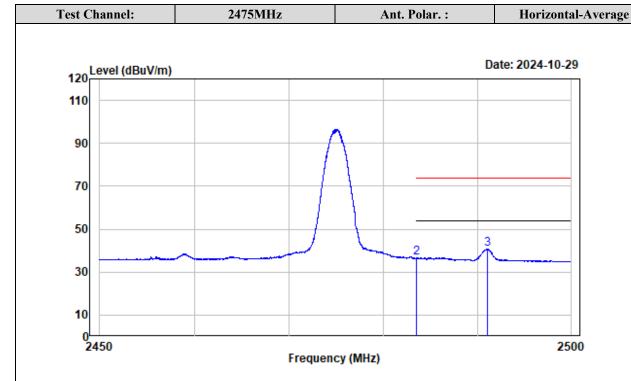
Tester : Dylan.Yang

	Freq	Factor			Limit Line		Remark
	MHz	dB/m	dBuV	dBuV/m	dBuV/m	dB	
1	2384.897	-10.97	48.27	37.30	54.00	-16.70	Average
2	2400.000	-11.01	47.71	36.70	54.00	-17.30	Average



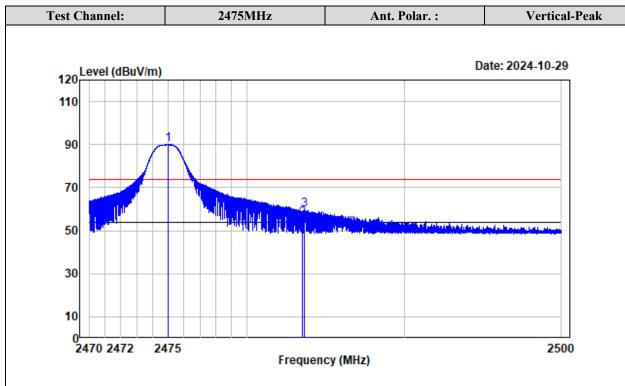
Condition : Horizontal Project No.: 2401X44887E-RF Tester : Dylan.Yang

	Freq	Factor			Limit Line		Remark
	MHz	dB/m	dBuV	dBuV/m	dBuV/m	dB	
1	2475.000	-3.15	102.00	98.85	114.00	-15.15	Peak
2	2483.500	-3.17	69.90	66.73	74.00	-7.27	Peak
3	2483.504	-3.17	70.89	67.72	74.00	-6.28	Peak



Condition : Horizontal Project No.: 2401X44887E-RF Tester : Dylan.Yang

	Freq	Factor			Line		Remark	
	MHz	dB/m	dBuV	dBuV/m	dBuV/m	dB		
2	2483.500	-10.97	47.64	36.67	54.00	-17.33	Average	
3	2491.018	-10.98	51.88	40.90	54.00	-13.10	Average	

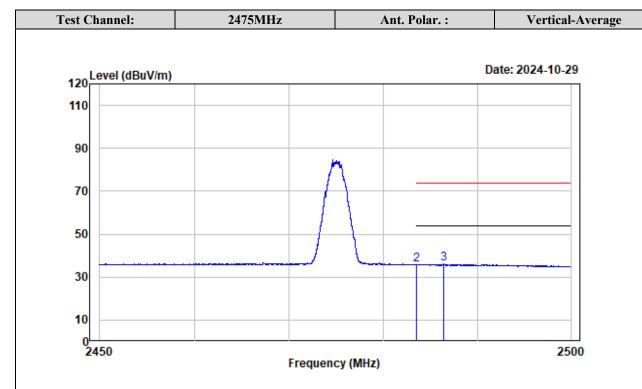


Condition : Vertical

Project No.: 2401X44887E-RF

Tester : Dylan.Yang

	Freq	Factor			Limit Line		Remark
	MHz	dB/m	dBuV	dBuV/m	dBuV/m	dB	
1	2475.000	-3.15	93.08	89.93	114.00	-24.07	Peak
2	2483.500	-3.17	58.70	55.53	74.00	-18.47	Peak
3	2483.627	-3.17	62.91	59.74	74.00	-14.26	Peak



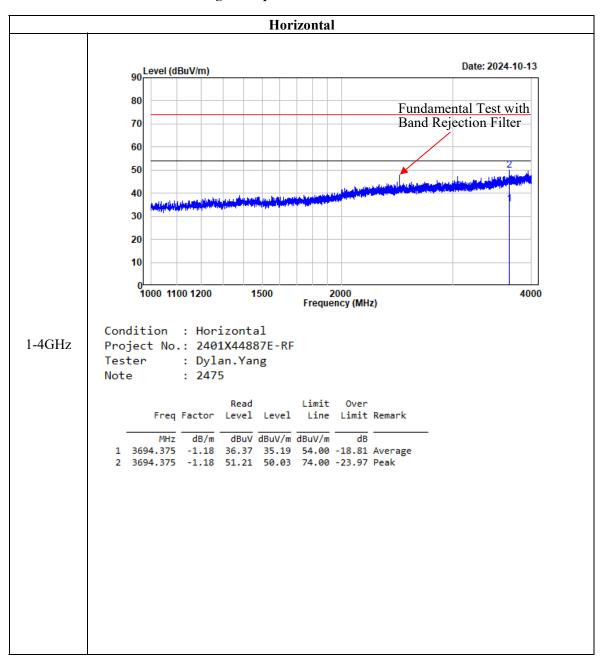
Condition : Vertical

Project No.: 2401X44887E-RF

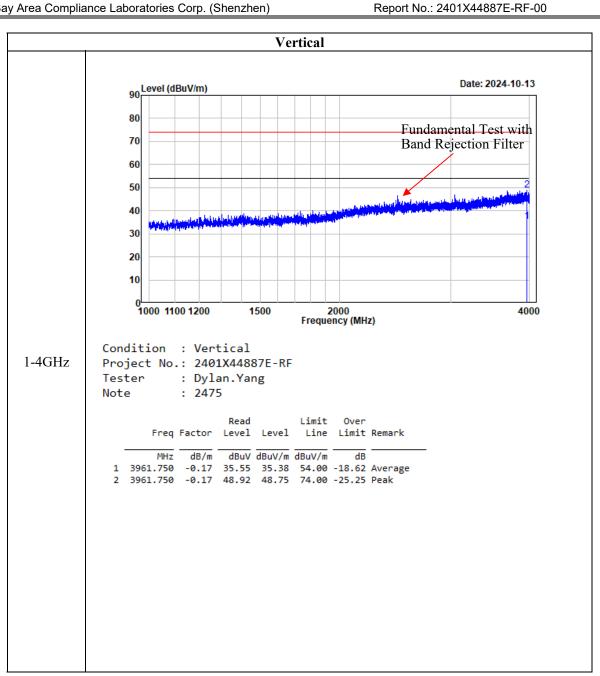
Tester : Dylan.Yang

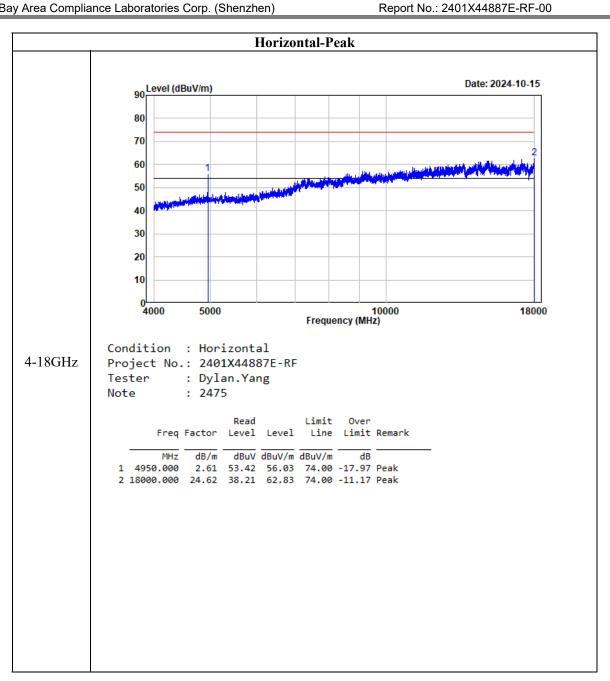
	Freq	Factor			Limit Line		Remark
	MHz	dB/m	dBuV	dBuV/m	dBuV/m	dB	
2	2483.500	-10.97	46.84	35.87	54.00	-18.13	Average
3	2486.417	-10.97	47.03	36.06	54.00	-17.94	Average

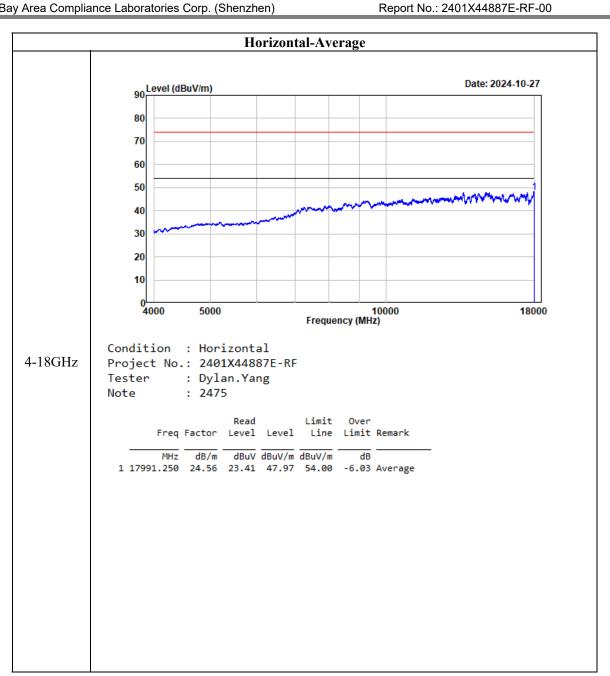
Listed with the worst harmonic margin test plot:

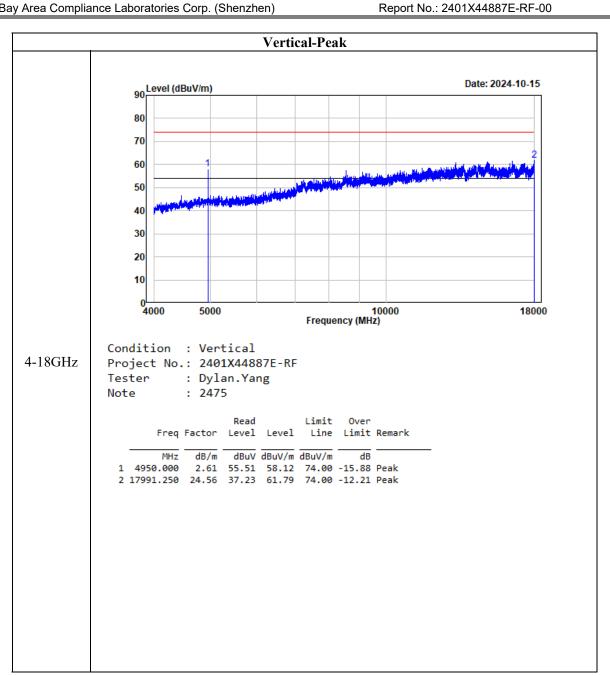


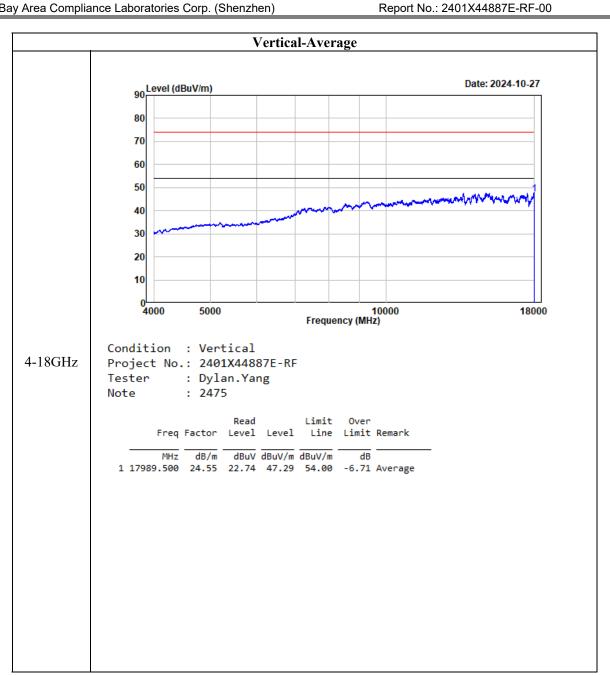
Report No.: 2401X44887E-RF-00

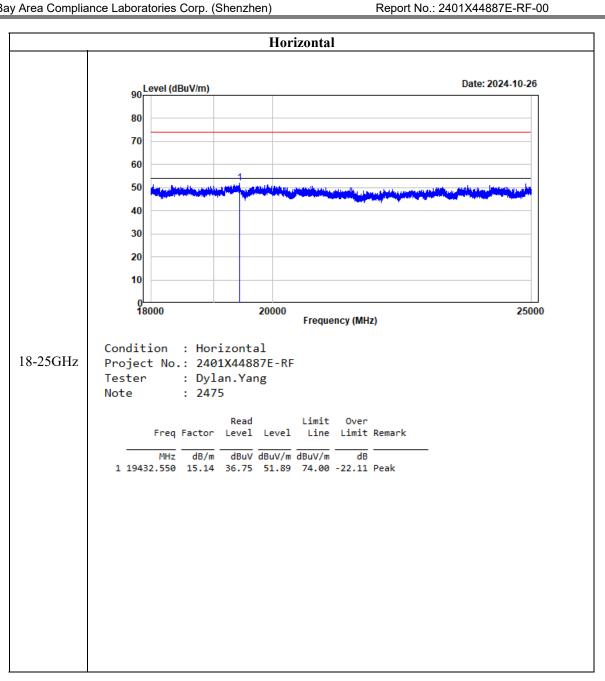


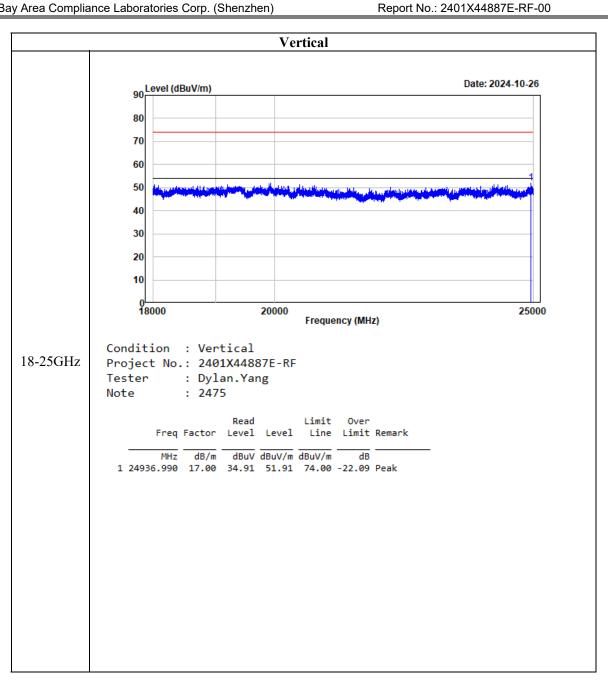












FCC§15.215(c) - 20dB EMISSION BANDWIDTH

Applicable Standard

Intentional radiators operating under the alternative provisions to the general emission limits, as contained in § 15.217 through 15.257 and in Subpart E of this part, must be designed to ensure that the 20 dB bandwidth of the emission, or whatever bandwidth may otherwise be specified in the specific rule section under which the equipment operates, is contained within the frequency band designated in the rule section under which the equipment is operated.

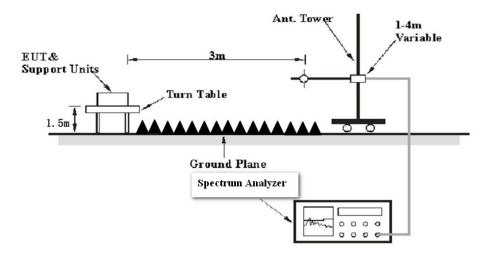
Report No.: 2401X44887E-RF-00

Test Procedure

Test Method: ANSI C63.10-2013 Clause 6.9.2

The following conditions shall be observed for measuring the occupied bandwidth and 20 dB bandwidth:

- The transmitter shall be operated at its maximum carrier power measured under normal test conditions.
- The span of the spectrum analyzer shall be set large enough to capture all products of the modulation process, including the emission skirts, around the carrier frequency, but small enough to avoid having other emissions (e.g. on adjacent channels) within the span.
- The detector of the spectrum analyzer shall be set to "Sample". However, a peak, or peak hold, may be used in place of the sampling detector since this usually produces a wider bandwidth than the actual bandwidth (worst-case measurement). Use of a peak hold (or "Max Hold") may be necessary to determine the occupied / 20 dB bandwidth if the device is not transmitting continuously.
- The nominal IF filter bandwidth (3 dB RBW) shall be in the range of 1% to 5% of the OBW/ 20dB bandwidth and video bandwidth (VBW) shall be approximately three times RBW, unless otherwise specified by the applicable requirement.



Test Data

Environmental Conditions

Temperature:	25.4 °C
Relative Humidity:	53 %
ATM Pressure:	101.2 kPa

The testing was performed by Dylan Yang on 2024-10-17.

EUT operation mode: Transmitting

Please refer to the following table and plots.

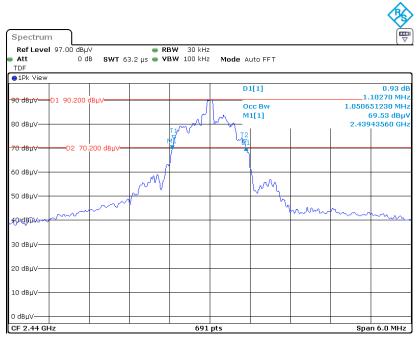
Channel	Frequency (MHz)	20dB Bandwidth (MHz)
Low	2440	1.103
Middle	2457	1.111
High	2475	1.111

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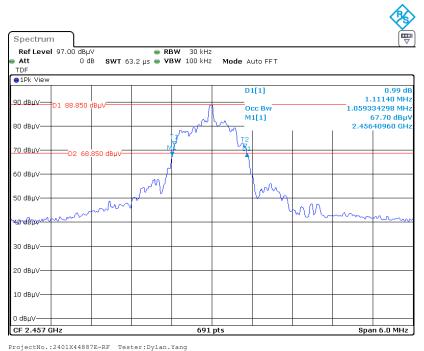
Low channel

Report No.: 2401X44887E-RF-00



ProjectNo.:2401X44887E-RF Tester:Dylan.Yang
Date: 17.0CT.2024 00:25:23

Middle Channel

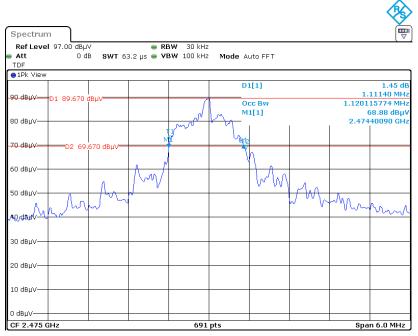


ProjectNo.:2401X4488/E-RF Tester:Dylan.rang
Date: 17.0CT.2024 00:07:12

Date: 17.OCT.2024 00:07:12

High Channel

Report No.: 2401X44887E-RF-00



ProjectNo.:2401X44887E-RF Tester:Dylan.Yang

Date: 17.0CT.2024 00:15:10

Bay Area Compliance Laboratories Corp. (Shenzhen)	Report No.: 2401X44887E-RF-00
EUT PHOTOGRAPHS	
Please refer to the attachment 2401X44887E-RF External	nhoto and 2401 X44887E-RE Internal photo
T lease felor to the attachment 2401/A4400/E-Kr External	photo and 2401X4400/E-KI Internal photo.

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TEST SETUP PHOTOGRAPHS

Please refer to the attachment 2401X44887E-RF Test Setup photo.

***** END OF REPORT *****

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