SPOT CHECK RADIO PARTIAL TEST REPORT

FCC ID	:	MSQ-RTBE6J00
Equipment	:	ROG Rapture GT-BE19000 WiFi 7 Tri-band Gaming Router
Brand Name	:	ASUS
Model Name	:	GT-BE19000
Applicant	:	ASUSTeK COMPUTER INC. 1F., No. 15, Lide Rd., Beitou, Taipei City 112, Taiwan
Standard	:	47 CFR FCC Part 15.407

The product was received on Mar. 04, 2024, and testing was started from Mar. 11, 2024 and completed on May 15, 2024. We, Sporton International Inc. Hsinchu Laboratory, would like to declare that the tested sample has been evaluated in accordance with the procedures given in ANSI C63.10-2013 and shown compliance with the applicable technical standards.

The test results in this partial report apply exclusively to the tested model / sample. Without written approval of Sporton International Inc. Hsinchu Laboratory, the test report shall not be reproduced except in full.

Approved by: Sam Chen

Sporton International Inc. Hsinchu Laboratory
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Appendix E. Test Results of Contention-Based Protocol

Appendix F. Test Photos

Photographs of EUT v01

History of this test report

Report No.	Version	Description	Issued Date
FR422102AC	01	Initial issue of report	May 17, 2024

Summary of Test Result

Report Clause	Ref Std. Clause	Test Items	Result (PASS/FAIL)	Remark
1.1.2	15.203	Antenna Requirement	PASS	-
4.1	15.207	AC Power-line Conducted Emissions	PASS	-
-	15.407(a)	Emission Bandwidth	N/A	Refer to note
4.2	15.407(a)	Maximum Equivalent Isotopically Radiated Power (E.I.R.P.)	PASS	-
-	15.407(a)	Proper Power Adjustment	N/A	Non-Dual Client or non-Standard Client w/o test
4.3	15.407(a)	Peak Power Spectral Density (E.I.R.P.)	PASS	-
4.4	15.407(b)	Unwanted Emissions	PASS	-
4.5	15.407(d)	Contention-Based Protocol	PASS	-

Note:
This report is a spot-check partial report to the original Sporton report no.: FR262427 and FR262427-05AC (FCC ID: MSQ-RTBE6G00).
The variant device of this application (FCC ID: MSQ-RTBE6J00) is electrically identical to the reference device (FCC ID: MSQ-RTBE6G00) for the portions of the circuitry corresponding to the data referencing.
The differences compared with the reference device design are as follows. Exhibit prepared for the spot-check verification report, the format, test items, and amount of spot-check test data are decided by the applicant's engineering judgment. Therefore, only AC Power-line Conducted Emissions, Maximum E.I.R.P., Power Spectral Density, Unwanted Emissions, and Contention-Based Protocol were verified and recorded in this report.
Maximum E.I.R.P., and Unwanted Emissions above 1GHz tests according to the original report worst channel.
The applicant takes full responsibility that the test data as referenced in FCC ID: MSQ-RTBE6G00 represents compliance for the new FCC ID: MSQRTBE6J00.
Difference:
1. The appearance design is different.
2. The heatsink design on the back of the EUT is different.
3. Add a LAN port.
4. Add 2.4G band pass filter
5. Add pressure sensor.

Conformity Assessment Condition:

1. The test results (PASS/FAIL) with all measurement uncertainty excluded are presented against the regulation limits or in accordance with the requirements stipulated by the applicant/manufacturer who shall bear all the risks of non-compliance that may potentially occur if measurement uncertainty is taken into account.
2. The measurement uncertainty please refer to each test result in the chapter "Measurement Uncertainty".

Disclaimer:

The product specifications of the EUT presented in the test report that may affect the test assessments are declared by the manufacturer who shall take full responsibility for the authenticity.

Reviewed by: Sam Chen
Report Producer: Vicky Huang

1 General Description

1.1 Information

1.1.1 RF General Information

For LPI Access Point:

Frequency Range (MHz)	IEEE Std. 802.11	Ch. Frequency (MHz)	Channel Number
5925-7125	ax (HEW20), be (EHT20)	5955-7095	1-229 [58]
5925-7125	ax (HEW40), be (EHT40)	5965-7085	3-227 [29]
5925-7125	ax (HEW80), be (EHT80)	5985-7025	7-215 [14]
5925-7125	ax (HEW160), be (EHT160)	6025-6985	15-207 [7]
5925-7125	be (EHT320)	6105-6905	31-191 [6]

Band	Mode	BWch (MHz)	Nant
UNII 5-8	ax (HEW20)	20	4TX
UNII 5-8	ax (HEW20)-BF	20	4TX
UNII 5-8	be (EHT20)	20	4TX
UNII 5-8	be (EHT20)-BF	20	4TX
UNII 5-8	ax (HEW40)	40	4TX
UNII 5-8	ax (HEW40)-BF	40	4TX
UNII 5-8	be (EHT40)	40	4TX
UNII 5-8	be (EHT40)-BF	40	4TX
UNII 5-8	ax (HEW80)	80	4TX
UNII 5-8	ax (HEW80)-BF	80	4TX
UNII 5-8	be (EHT80)	80	4TX
UNII 5-8	be (EHT80)-BF	80	4TX
UNII 5-8	ax (HEW160)	160	4TX
UNII 5-8	ax (HEW160)-BF	160	4TX
UNII 5-8	be (EHT160)	160	4TX
UNII 5-8	be (EHT160)-BF	160	4TX
UNII 5-8	be (EHT320)	320	4TX
UNII 5-8	be (EHT320)-BF	320	4TX

Note:
- HEW20, HEW40, HEW80 and HEW160 use a combination of OFDMA-BPSK, QPSK, 16QAM, 64QAM, 256QAM, 1024QAM modulation.
- EHT20, EHT40, EHT80 and EHT160, EHT320 use a combination of OFDMA-BPSK, QPSK, 16QAM, 64QAM, 256QAM, 1024QAM, 4096QAM modulation.
- BWch is the nominal channel bandwidth.

1.1.2 Antenna Information

For EUT 1:

Ant.	Port			Brand	Model Name	Antenna Type	Connector	Gain (dBi)
	WLAN 6GHz	WLAN 2.4GHz	WLAN 5GHz					
1	1	-	-	WHA Yu	C660-510587-A	Dipole Antenna	I-PEX	Note 1
2	2	-	-	WHA Yu	C660-510588-A	Dipole Antenna	I-PEX	
3	3	-	-	WHA Yu	C660-510589-A	Dipole Antenna	I-PEX	
4	4	-	-	WHA Yu	C660-510590-A	Dipole Antenna	I-PEX	
5	-	1	1	WHA Yu	C660-510591-A	Dipole Antenna	I-PEX	
6	-	4	4	WHA Yu	C660-510592-A	Dipole Antenna	I-PEX	
7	-	3	3	WHA Yu	C660-510593-A	Dipole Antenna	I-PEX	
8	-	2	2	WHA Yu	C660-510594-A	Dipole Antenna	I-PEX	

For EUT 2:

Ant.	Port			Brand	Model Name	Antenna Type	Connector	Gain (dBi)
	WLAN 6GHz	WLAN 2.4GHz	WLAN 5GHz					
1	1	-	-	WHA Yu	C660-510587-AW1	Dipole Antenna	I-PEX	Note 1
2	2	-	-	WHA Yu	C660-510588-AW1	Dipole Antenna	I-PEX	
3	3	-	-	WHA Yu	C660-510589-AW1	Dipole Antenna	I-PEX	
4	4	-	-	WHA Yu	C660-510590-AW1	Dipole Antenna	I-PEX	
5	-	1	1	WHA Yu	C660-510591-AW1	Dipole Antenna	I-PEX	
6	-	4	4	WHA Yu	C660-510592-AW1	Dipole Antenna	I-PEX	
7	-	3	3	WHA Yu	C660-510593-AW1	Dipole Antenna	I-PEX	
8	-	2	2	WHA Yu	C660-510594-AW1	Dipole Antenna	I-PEX	

Note 1

Ant.	Antenna Gain (dBi)								
	WLAN 2.4GHz	WLAN 5GHz UNII 1	WLAN 5GHz UNII 2A	WLAN 5GHz UNII 2C	WLAN 5GHz UNII 3	WLAN 6GHz UNII 5	WLAN 6GHz UNII 6	WLAN 6GHz UNII 7	WLAN 6GHz UNII 8
1	-	-	-	-	-	1.75	1.52	2.13	2.17
2	-	-	-	-	-	1.95	2.41	2.19	1.64
3	-	-	-	-	-	1.61	1.96	1.51	1.93
4	-	-	-	-	-	1.98	1.44	1.47	2.21
5	2.09	1.52	1.17	1.98	1.08	-	-	-	-
6	1.84	2.29	2.9	3.09	2.51	-	-	-	-
7	2.91	2.7	3.04	2.48	3.39	-	-	-	-
8	2.14	1.21	1.19	3.23	1.87	-	-	-	-

Item	Directional gain (dBi)								
	WLAN 2.4GHz	WLAN 5GHz UNII 1	WLAN 5GHz UNII 2A	WLAN 5GHz UNII 2C	WLAN 5GHz UNII 3	WLAN 6GHz UNII 5	WLAN 6GHz UNII 6	WLAN 6GHz UNII 7	WLAN 6GHz UNII 8
4T1S	5.99	4.72	5.97	5.72	5.64	5.99	5.46	5.38	5.5
4T2S	2.99	2.7	3.04	3.23	3.39	2.99	2.46	2.38	2.5

Note 2: The above information(excepting antenna gain and directional gain) was declared by manufacturer.
Note 3: The antenna gain and directional gain are measured which follow the procedure of KDB 662911 D03.
Note 4: **For 2.4GHz function:**
For IEEE 802.11 b/g/n/VHT/ax/be (4TX/4RX):
Port 1, Port 2, Port 3 and Port 4 can be used as transmitting/receiving antenna.
Port 1, Port 2, Port 3 and Port 4 could transmit/receive simultaneously.
For 5GHz function:
For IEEE 802.11a/n/ac/ax/be (4TX/4RX):
Port 1, Port 2, Port 3 and Port 4 can be used as transmitting/receiving antenna.
Port 1, Port 2, Port 3 and Port 4 could transmit/receive simultaneously.
For 6GHz function:
For IEEE 802.11ax/be mode (4TX/4RX):
Port 1, Port 2, Port 3 and Port 4 can be used as transmitting/receiving antenna.
Port 1, Port 2, Port 3 and Port 4 could transmit/receive simultaneously.

1.1.3 Mode Test Duty Cycle

Mode	DC	DCF (dB)	T (s)	VBW (Hz)_1/T
802.11be EHT20-BF_Nss 1,(M0)	**0.95**	0.22	3.123m	1k
802.11be EHT320-BF_Nss 1,(M0)	0.984	0.07	n/a (DC>=0.98)	n/a (DC>=0.98)

Note:
- DC is Duty Cycle.
- DCF is Duty Cycle Factor.

1.1.4 EUT Operational Condition

EUT Power Type	From Power Adapter			
Beamforming Function	☒	With beamforming	☐	Without beamforming
	The product has beamforming function for n/VHT/ax/be in 2.4GHz, n/ac/ax/be in 5GHz and ax/be in 6GHz.			
Device Type	☒	Indoor Access Point	☒	Subordinate
	☐	Indoor Client	☒	Standard Power Access Point (Note2)
	☐	Dual Client	☐	Standard Client
	☐	Fixed Client	☐	Very Low Power
Condition of EUT	☒	Indoor	☐	Outdoor
Channel Puncturing Function	☐	Supported	☒	Unsupported
Support RU	☒	Full RU	☐	Partial RU

Test Software Version	Others: accessMtool 3.3.0.4 Beamforming: DOS[ver 6.1.7601]
Software / Firmware Version for CBP	3.0.0.6.102_34503-ge57a3f0_624-g9cfea_BA08

Note1: The above information was declared by manufacturer.

Note2: The test results of Indoor Access Point and Subordinate mode were recorded in this test report.

For Standard Power Access Point mode test results, please refer to Sporton Report No.: FR422102AD.

1.1.5 Table for Multiple Listing

The difference for each EUT is shown as below:

EUT	Enclosure/Antenna Color	Heatsink Color on the Back of the EUT
1	Black	Red
2	White	Black

Note 1: The difference between EUT 1 and EUT 2 is only color, there is only EUT 1 tested and recorded in this report.

Note 2: The above information was declared by manufacturer.

1.1.6 Table for EUT Supports Functions

Function	Support Type
AP Router	Master
Bridge	Slave without radar detection
Extender	Master
Mesh	Master

Note 1: After evaluating, AP Router mode was selected to test and recorded in the report.

Note 2: The above information was declared by manufacturer.

1.1.7 Table for Radio Function

Radio 1	Radio 2	Radio 3
WLAN 2.4GHz	WLAN 5GHz UNII 1~3	WLAN 6GHz UNII 5~8

Note: The above information was declared by manufacturer.

1.2 Applicable Standards

According to the specifications of the manufacturer, the EUT must comply with the requirements of the following standards:

- 47 CFR FCC Part 15.407
- ANSI C63.10-2013
- FCC KDB 789033 D02 v02r01

The following reference test guidance is not within the scope of accreditation of TAF.

- FCC KDB 987594 D02 v02r01
- FCC KDB 662911 D03 v01
- FCC KDB 412172 D01 v01r01
- FCC KDB 414788 D01 v01r01

1.3 Testing Location Information

Testing Location Information	
Test Lab.：Sporton International Inc. Hsinchu Laboratory	
Hsinchu (TAF: 3787)	ADD: No.8, Ln. 724, Bo'ai St., Zhubei City, Hsinchu County 302010, Taiwan (R.O.C.) TEL: 886-3-656-9065 FAX: 886-3-656-9085 Test site Designation No. TW3787 with FCC. Conformity Assessment Body Identifier (CABID) TW3787 with ISED.

Test Condition	Test Site No.	Test Engineer	Test Environment (°C / %)	Test Date
Radiated (for Maximum Equivalent Isotopically Radiated Power, Peak Power Spectral Density and above 1GHz)	03CH02-CB	Stim Sung	22-23 / 55-58	Mar. 12, 2024~ Mar. 21, 2024
	03CH06-CB		21.9-22.4 / 55-58	
Radiated (below 1GHz)	03CH05-CB	Stim Sung	21.8-22.7 / 56-59	May 09, 2024
AC Conduction	CO01-CB	Gray Lee	22~23 / 51~52	May 09, 2024
RF Conducted (Contention-Based Protocol test)	DF02-CB	Kevin Huang	22.5~23.5 / 64~65	Apr. 27, 2024~ May 15, 2024

1.4 Measurement Uncertainty

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

Test Items	Uncertainty	Remark
Conducted Emission (150kHz ~ 30MHz)	2.0 dB	Confidence levels of 95%
Radiated Emission (30MHz ~ 1,000MHz)	4.3 dB	Confidence levels of 95%
Radiated Emission (1GHz ~ 18GHz)	4.3 dB	Confidence levels of 95%
Radiated Emission (18GHz ~ 40GHz)	5.1 dB	Confidence levels of 95%
Conducted Emission	3.1 dB	Confidence levels of 95%
Output Power Measurement	1.5 dB	Confidence levels of 95%
Power Density Measurement	2.4 dB	Confidence levels of 95%

2 Spot Check Test Plan

2.1 Cross Reference Table

Rule	Test Item	Data Referencing (FCC ID: MSQ-RTBE6G00)	Description	Reference Report No.
15.207	AC Power-line Conducted Emissions	N	Full Test	-
15.407(a)	Emission Bandwidth	Y	Data referencing	FR262427-05AC: Other modes FR262427-01AC: 320MHz_4T1S(6265/6585/6905MHz)
15.407(a)	Maximum Equivalent Isotopically Radiated Power (E.I.R.P.)	Y	Data referencing	
15.407(a)	Peak Power Spectral Density (E.I.R.P.)	Y	Data referencing	
15.407(b)	Unwanted Emissions Below 1GHz	N	Full Test	-
	Unwanted Emissions Above 1GHz	Y	Data referencing	FR262427: All BW_4T1S(Excepting 320MHz 6265/6585/6905MHz) FR262427-01AC: 320MHz_4T1S(6265/6585/6905MHz)& All BW_4T2S
	Emission MASK	Y	Data referencing	FR262427-05AC: Other modes FR262427-01AC: 320MHz_4T1S(6265/6585/6905MHz)
15.407(d)	Contention-Based Protocol	N	Full Test	-

2.2 Spot Check Verification Data Section

The evaluation of test items against the variant model based on the worst-case condition from the original model was performed in this filing to demonstrate the test data from the original model remains representative of the variant model.
All test procedures follow the related section of the parent report.

For any given test, the maximum identified difference between spot check and reference data shall be no larger than 3dB.

Formula :

$$d_{dB} = | V_{dB} - R_{dB} | \leq 3 \text{ dB}$$

Where between V_{dB} , the variant spot-check level in dB, and R_{dB} is the corresponding measurement level in dB for the reference model.

2.3 Results of Spot-Check

Test Items	Mode	Reference Worst Level(dBuV/m)	Variant Spot-Check Level(dBuV/m)	Deviation(dB)	Limit(dB)
Unwanted Emissions (Band edge)	802.11be20(MCS0 Nss1) 5955MHz 4TX_Beamforming	50.23	50.19	-0.04	**≤ 3**
Unwanted Emissions (Band edge)	802.11be320(MCS0 Nss1) 6105MHz 4TX_Beamforming	62.98	52.64	-10.34	**≤ 3**
Test Items	**Mode**	**Reference Worst Level(dBuV/m)**	**Variant Spot-Check Level(dBuV/m)**	**Deviation(dB)**	**Limit(dB)**
Maximum EIRP Output Power	802.11be20(MCS0 Nss1) 5955MHz 4TX_Beamforming	15.69	13.09	-2.6	**≤ 3**
Maximum EIRP Output Power	802.11be320(MCS0 Nss1) 6105MHz 4TX_Beamforming	27.32	28.33	1.01	**≤ 3**
Test Items	**Mode**	**Reference Worst Level(dBm)**	**Variant Spot-Check Level(dBm)**	**Deviation(dB)**	**Limit(dB)**
EIRP Power Spectral Density	802.11be20(MCS0 Nss1) 5955MHz 4TX_Beamforming	4.04	3.04	-1	**≤ 3**
EIRP Power Spectral Density	802.11be320(MCS0 Nss1) 6105MHz 4TX_Beamforming	4.05	4.07	0.02	**≤ 3**

2.4 Conclusion

Based on the above tables (Results of Spot-Check), the test data from the reference device still represents the variant device and demonstrates compliance.

We confirm that the test data referencing policy of FCC 484596 D01 Referencing Test Data v02r03 has been followed and the test data as referenced from the reports of the reference device (FCC ID: MSQ-RTBE6G00) represent compliance of variant device with FCC ID: MSQ-RTBE6J00.

3 Test Configuration of EUT

3.1 Test Channel Mode

Mode
802.11be EHT20-BF_Nss1,(MCS0)_4TX
5955MHz
802.11be EHT320-BF_Nss1,(MCS0)_4TX
6105MHz Straddle 5.925-6.425GHz

3.2 The Worst Case Measurement Configuration

The Worst Case Mode for Following Conformance Tests	
Tests Item	AC power-line conducted emissions
Condition	AC power-line conducted measurement for line and neutral Test Voltage: 120Vac / 60Hz
Operating Mode	Normal Link
1	AP Router Mode / WAN Mode_EUT 1-10G WAN/LAN1 (WAN) + 2.5G WAN/LAN1 (LAN) + 2.5G LAN 2 (LAN) + 1G LAN 5 (LAN) + 10G LAN 6 (LAN) + USB 2.0 Port (Read/Write) + USB 3.0 Port (Read/Write) + Adapter 1 with power cord
2	AP Router Mode / WAN Mode_EUT 1-2.5G WAN/LAN1 (WAN) + 10G WAN/LAN1 (LAN) + 2.5G LAN 2 (LAN) + 1G LAN 5 (LAN) + 10G LAN 6 (LAN) + USB 2.0 Port (Read/Write) + USB 3.0 Port (Read/Write) + Adapter 1 with power cord
3	AP Router Mode / WWAN Mode_EUT 1-10G WAN/LAN1 (LAN) + 2.5G WAN/LAN1 (LAN) + 2.5G LAN 2 (LAN) + 1G LAN 5 (LAN) + 10G LAN 6 (LAN) + USB 2.0 Port (WWAN) + USB 3.0 Port (Read/Write) + Adapter 1 with power cord
4	AP Router Mode / WWAN Mode_EUT 1-10G WAN/LAN1 (LAN) + 2.5G WAN/LAN1 (LAN) + 2.5G LAN 2 (LAN) + 1G LAN 5 (LAN) + 10G LAN 6 (LAN) + USB 2.0 Port (Read/Write) + USB 3.0 Port (WWAN) + Adapter 1 with power cord
Mode 4 has been evaluated to be the worst case among Mode 1~4, thus measurement for Mode 5 will follow this same test mode.	
5	AP Router Mode / WWAN Mode_EUT 1-10G WAN/LAN1 (LAN) + 2.5G WAN/LAN1 (LAN) + 2.5G LAN 2 (LAN) + 1G LAN 5 (LAN) + 10G LAN 6 (LAN) + USB 2.0 Port (Read/Write) + USB 3.0 Port (WWAN) + Adapter 3
For operating mode 5 is the worst case and it was record in this test report.	

The Worst Case Mode for Following Conformance Tests	
Tests Item	Maximum Equivalent Isotopically Radiated Power (E.I.R.P.) Peak Power Spectral Density (E.I.R.P.)
Test Condition	Radiated measurement If EUT consist of multiple antenna assembly (multiple antenna are used in EUT regardless of spatial multiplexing MIMO configuration), the radiated test should be performed with highest antenna gain of each antenna type.
	After evaluating, the worst case was found at Z axis, thus the measurement will follow this same test configuration.
1	EUT 1 in Z axis

The Worst Case Mode for Following Conformance Tests		
Tests Item	Contention Based Protocol	
Test Condition	Conducted measurement at transmit chains	
Operating Mode	1	EUT 1

The Worst Case Mode for Following Conformance Tests	
Tests Item	Unwanted Emissions
Test Condition	Radiated measurement If EUT consist of multiple antenna assembly (multiple antenna are used in EUT regardless of spatial multiplexing MIMO configuration), the radiated test should be performed with highest antenna gain of each antenna type.
Operating Mode < 1GHz	CTX
	After evaluating, the worst case was found at Z axis, thus the measurement will follow this same test configuration.
1	EUT 1 in Z axis_WLAN 2.4GHz + Adapter 1 with power cord
2	EUT 1 in Z axis_WLAN 5GHz + Adapter 1 with power cord
3	EUT 1 in Z axis_WLAN 6GHz + Adapter 1 with power cord
Mode 1 has been evaluated to be the worst case among Mode 1~3, so measurement for Mode 4 will follow this same test mode.	
4	EUT 1 in Z axis_WLAN 2.4GHz + Adapter 3
For operating mode 4 is the worst case and it was record in this test report.	
Operating Mode > 1GHz	CTX
	After evaluating, the worst case was found at Z axis, thus the measurement will follow this same test configuration.
1	EUT 1 in Z axis

The Worst Case Mode for Following Conformance Tests	
Tests Item	Simultaneous Transmission Analysis - Co-location RF Exposure Evaluation
Operating Mode	
1	EUT 1-WLAN 2.4GHz + WLAN 5GHz + WLAN 6GHz
2	EUT 1-WLAN 2.4GHz + WLAN 5GHz + WLAN 6GHz + WWAN
Refer to Sporton Test Report No.: FA422102 for Co-location RF Exposure Evaluation.	

3.3 EUT Operation during Test

For CTX Mode:

non-beamforming mode:

The EUT was programmed to be in continuously transmitting mode.

beamforming mode:

For Conducted Mode:

The EUT was programmed to be in continuously transmitting mode.

For Radiated Mode:

During the test, the following programs under WIN 7 were executed.
The program was executed as follows:
1. During the test, the EUT operation to normal function.
2. Executed command fixed test channel under DOS.
3. Executed "Lantest.exe" to link with the remote workstation to transmit and receive packet by Router and transmit duty cycle no less than 98%.

For Normal Link Mode:

During the test, the EUT operation to normal function.

3.4 Accessories

Power	Brand	Model	Rating	Remark
Adapter 1	AcBel	ADD011	INPUT: 100-240V~ 1.7A, 50-60Hz OUTPUT: +19.5V, 3.33A, 65.0W MAX.	With the DC cable: Non-shielded, 1.5m
Adapter 2	AcBel	ADD011	INPUT: 100-240V~ 1.7A, 50-60Hz OUTPUT: +19.5V, 3.33A, 65.0W MAX.	With the DC cable: Non-shielded, 1.5m
Adapter 3	LEI	MU60B3120500-A1	INPUT: 100-240V~50/60Hz, 1.5A OUTPUT: 12.0V, 5.0A	-
Others				
RJ-45 cable*1: Shielded, 1.5m Power cord*1: Non-shielded, 0.9m for Adapter 1 and Adapter 2 use				

Note1: Adapter 1 & Adapter 2 is identical; Therefore, Adapter 1 were selected to test and recorded in this report.
Note2: Refer to photographs of EUT for the detail information of difference between Adapter 1 & Adapter 2.

3.5 Support Equipment

For AC Conduction:

Support Equipment				
No.	**Equipment**	**Brand Name**	**Model Name**	**FCC ID**
A	10G WAN/LAN1 PC	DELL	OPTIPLEX 3010	N/A
B	3G Dongle	CHT	E169	N/A
C	2.5G WAN/LAN1 PC	DELL	OPTIPLEX 3010	N/A
D	1G LAN5 PC	DELL	OPTIPLEX 3010	N/A
E	2.4G NB	Apple	A1278	N/A
F	5G NB	Apple	A1278	N/A
G	Flash disk3.0	Transcend	JetFlash-703	N/A
H	2.5G LAN4 PC	DELL	OPTIPLEX 3010	N/A
I	SIM Card	Anritsu	N/A	N/A
J	10G LAN6 PC	DELL	OPTIPLEX 3010	N/A
K	6G Client	ASUS	GT-AXE16000	N/A
L	6G Client NB	DELL	E6430	N/A
M	LTE Base station	Anritsu	MT8820C	N/A

For Radiated (below 1GHz):

Support Equipment				
No.	**Equipment**	**Brand Name**	**Model Name**	**FCC ID**
A	NB	DELL	E4300	N/A

For Radiated (above 1GHz) and RF Radiated (Maximum Equivalent Isotopically Radiated Power (E.I.R.P.) and Peak Power Spectral Density (E.I.R.P.):
Beamforming mode:

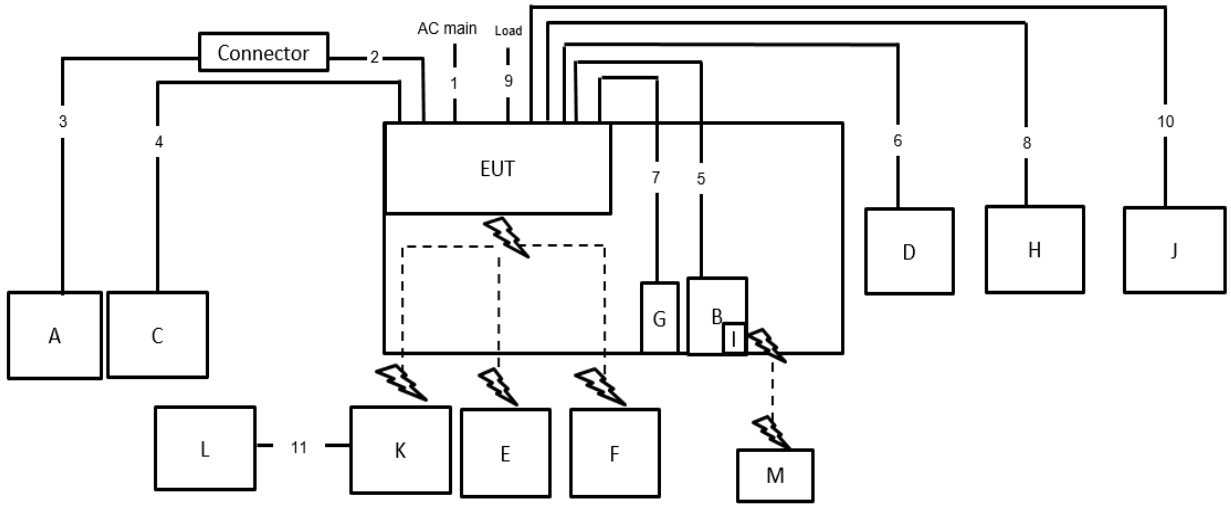
Support Equipment				
No.	**Equipment**	**Brand Name**	**Model Name**	**FCC ID**
A	NB	DELL	E4300	N/A
B	Router	ASUS	GT-BE19000 AFC	N/A
C	NB	DELL	E4300	N/A

For RF Conducted (Contention Based Protocol test):

Support Equipment				
No.	**Equipment**	**Brand Name**	**Model Name**	**FCC ID**
A	NB	DELL	E4300	N/A
B	NB	DELL	E6230	N/A
C	WLAN AP	ASUS	RT-BE96U	MSQ-RTBE6G00

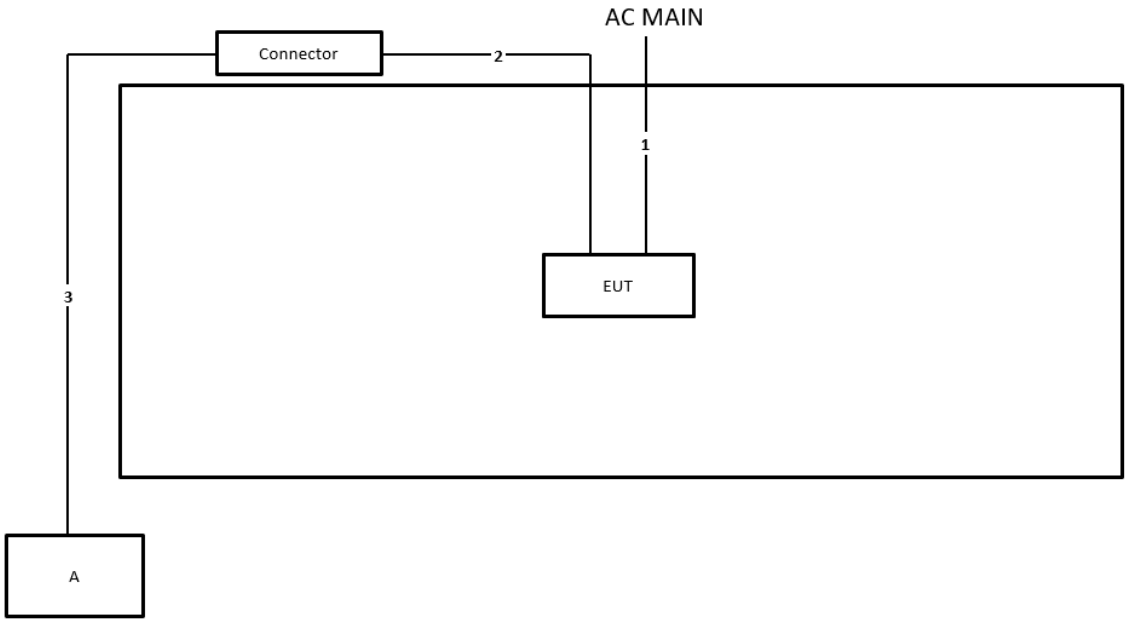
3.6 Test Setup Diagram

Test Setup Diagram – AC Line Conducted Emission Test



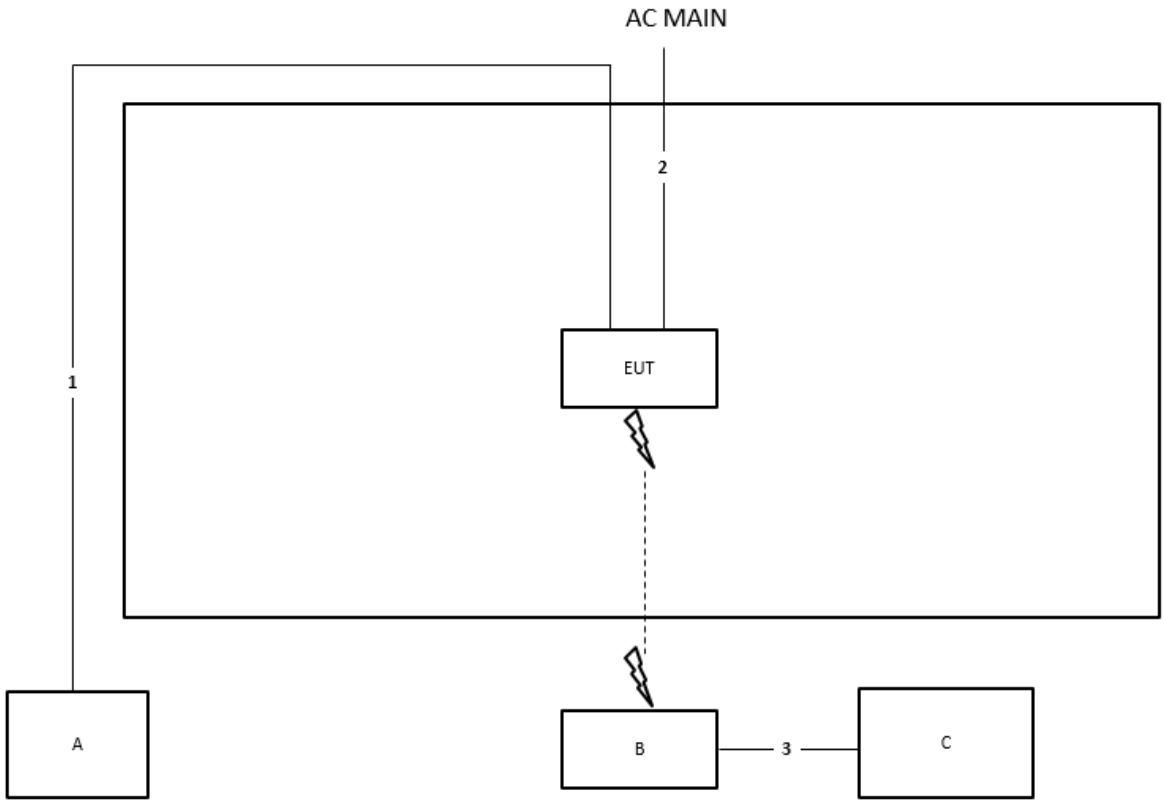
Item	Connection	Shielded	Length
1	Power cable	No	1.8m
2	Cat.6 RJ-45 cable	Yes	1.5m
3	Cat.6 RJ-45 cable	Yes	10m
4	Cat.5e RJ-45 cable	No	10m
5	USB cable	Yes	1.8m
6	Cat.5e RJ-45 cable	No	10m
7	USB cable	Yes	1.8m
8	Cat.5e RJ-45 cable	No	10m
9	Cat.5e RJ-45 cable*2	No	1.5m
10	Cat.6 RJ-45 cable	No	10m
11	Cat.5e RJ-45 cable	No	1.5m

Test Setup Diagram - Radiated Test < 1GHz



Item	Connection	Shielded	Length
1	Power cable	No	1.8m
2	RJ-45 cable	Yes	1.5m
3	RJ-45 cable	Yes	10m

Test Setup Diagram - Radiated Test > 1GHz
(Beamforming mode)



Item	Connection	Shielded	Length
1	RJ-45 cable	No	10m
2	Power cable	No	2.4m
3	RJ-45 cable	No	1.5m

4 Transmitter Test Result

4.1 AC Power-line Conducted Emissions

4.1.1 AC Power-line Conducted Emissions Limit

AC Power-line Conducted Emissions Limit		
Frequency Emission (MHz)	**Quasi-Peak**	**Average**
0.15-0.5	66 - 56 *	56 - 46 *
0.5-5	56	46
5-30	60	50
Note 1: * Decreases with the logarithm of the frequency.		

4.1.2 Measuring Instruments

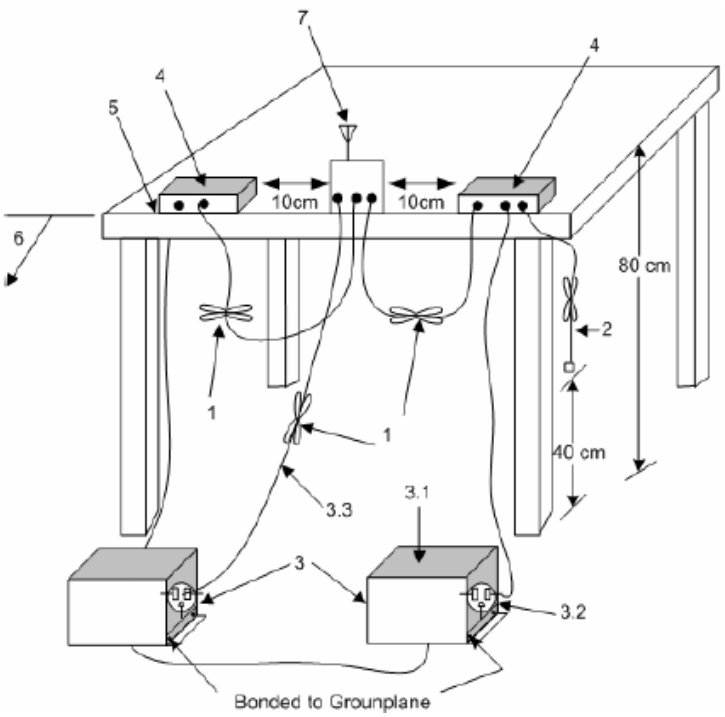
Refer a test equipment and calibration data table in this test report.

4.1.3 Test Procedures

Test Method
☒ Refer as ANSI C63.10-2013, clause 6.2 for AC power-line conducted emissions.

4.1.4 Test Setup

AC Power-line Conducted Emissions



1—Interconnecting cables that hang closer than 40 cm to the ground plane shall be folded back and forth in the center forming a bundle 30 cm to 40 cm long.
2—The I/O cables that are not connected to an accessory shall be bundled in the center. The end of the cable may be terminated, if required, using the correct terminating impedance. The overall length shall not exceed 1 m.
3—EUT connected to one LISN. Unused LISN measuring port connectors shall be terminated in 50 Ω loads. LISN may be placed on top of, or immediately beneath, reference ground plane.
3.1—All other equipment powered from additional LISN(s).
3.2—A multiple-outlet strip may be used for multiple power cords of non-EUT equipment.
3.3—LISN at least 80 cm from nearest part of EUT chassis.
4—Non-EUT components of EUT system being tested.
5—Rear of EUT, including peripherals, shall all be aligned and flush with edge of tabletop.
6—Edge of tabletop shall be 40 cm removed from a vertical conducting plane that is bonded to the ground plane.
7—Antenna can be integral or detachable. If detachable, then the antenna shall be attached for this test.

4.1.5 Measurement Results Calculation

The measured Level is calculated using:

a. Corrected Reading (dBuV) = LISN Factor + Cable Loss + Read Level = Level

b. Margin = - Limit + (Read Level + LISN Factor + Cable Loss)

4.1.6 Test Result of AC Power-line Conducted Emissions

Refer as Appendix A

4.2 Maximum Equivalent Isotopically Radiated Power (E.I.R.P.)

4.2.1 Maximum Equivalent Isotopically Radiated Power (E.I.R.P.) Limit

Maximum Equivalent Isotopically Radiated Power (E.I.R.P.) Limit	
UNII Devices	
☒	For the 5.925 ~ 6.425 GHz band:
	▪ For standard power access point and fixed client device : e.i.r.p < 36 dBm. For outdoor devices, the maximum e.i.r.p. at any elevation angle above 30 degrees not exceed 125 mW (21 dBm).
	▪ For indoor access point : e.i.r.p < 30 dBm.
	▪ For subordinate device control of an indoor access point : e.i.r.p < 30 dBm.
	▪ For client device control of a standard power access point : e.i.r.p < 30 dBm.
	▪ For client device control of an indoor access point : e.i.r.p < 24 dBm.
	▪ For very low power device : e.i.r.p < 14 dBm.
☒	For the 6.425 ~ 6.525 GHz band:
	▪ For indoor access point : e.i.r.p < 30 dBm.
	▪ For client device control of an indoor access point : e.i.r.p < 24 dBm.
☒	For the 6.525 ~ 6.875 GHz band:
	▪ For standard power access point and fixed client device : e.i.r.p < 36 dBm. For outdoor devices, the maximum e.i.r.p. at any elevation angle above 30 degrees not exceed 125 mW (21 dBm).
	▪ For indoor access point : e.i.r.p < 30 dBm.
	▪ For subordinate device control of an indoor access point : e.i.r.p < 30 dBm.
	▪ For client device control of a standard power access point : e.i.r.p < 30 dBm.
	▪ For client device control of an indoor access point : e.i.r.p < 24 dBm.
	▪ For very low power device : e.i.r.p < 14 dBm.
☒	For the 6.875 ~ 7.125 GHz band:
	▪ For indoor access point : e.i.r.p < 30 dBm.
	▪ For client device control of an indoor access point : e.i.r.p < 24 dBm.
RLAN Devices	
☐	For the 5.925 ~ 7.125 GHz band:
	▪ For low-power indoor access-points & indoor subordinate devices < 30 dBm .
	▪ For low-power client devices < 24 dBm.
☐	For the 5.925 ~ 6.875 GHz band:
	▪ For standard-power access points & fixed client devices < 36 dBm. For outdoor devices, the maximum e.i.r.p. at any elevation angle above 30 degrees not exceed 125 mW (21 dBm).
	▪ For standard client devices < 30 dBm.

4.2.2 Measuring Instruments

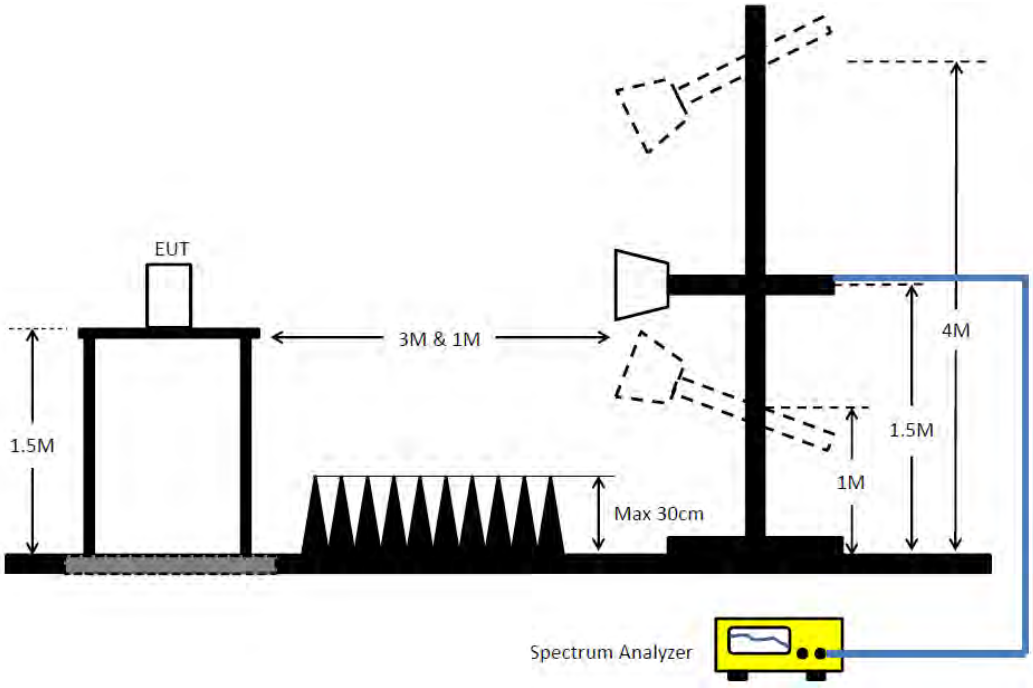
Refer a test equipment and calibration data table in this test report.

4.2.3 Test Procedures

Test Method	
▪ According to FCC KDB 987594 D02 clause II.E, the test measurement procedure shall refer to KDB 789033.	
	Average over on/off periods with duty factor
	☒ Refer as FCC KDB 789033 D02, clause E Method SA-2 (spectral trace averaging). Spectrum analyzer setting: RBW/VBW : 1/3MHz ; Detector : RMS ; Trace mode : Average ; Sweep Count 100.
	☐ Refer as FCC KDB 789033 D02, clause E Method SA-2 Alt. (RMS detection with slow sweep speed)
	Wideband RF power meter and average over on/off periods with duty factor
	☐ Refer as FCC KDB 789033 D02, clause E Method PM-G (using an RF average power meter).
☐ For conducted measurement.	
	▪ If the EUT supports multiple transmit chains using options given below: Refer as FCC KDB 662911, In-band power measurements. Using the measure-and-sum approach, measured all transmit ports individually. Sum the power (in linear power units e.g., mW) of all ports for each individual sample and save them.
	▪ If multiple transmit chains, EIRP calculation could be following as methods: $P_{total} = P_1 + P_2 + \ldots + P_n$ (calculated in linear unit [mW] and transfer to log unit [dBm]) $EIRP_{total} = P_{total} + DG$
☒ For radiated measurement.	
	▪ Refer as FCC KDB 789033 D02 clause II A.1.F ”Antenna-port Conducted versus Radiated Testing”
	▪ Refer as ANSI C63.10, clause 6.6 for radiated emissions above 1GHz.
	▪ Refer as FCC KDB 412172 D01 clause 2.2 for EIRP calculation.

4.2.4 Test Setup

Radiated Measurement



4.2.5 Test Result of Maximum Equivalent Isotopically Radiated Power (E.I.R.P)

Refer as Appendix B

4.3 Peak Power Spectral Density (E.I.R.P.)

4.3.1 Peak Power Spectral Density (E.I.R.P.) Limit

Peak Power Spectral Density (E.I.R.P.) Limit	
UNII Devices	
☒	For the 5.925 ~ 6.425 GHz band:
	▪ For standard power access point and fixed client device : e.i.r.p PSD < 23 dBm/MHz.
	▪ For indoor access point : e.i.r.p PSD < 5 dBm/MHz.
	▪ For subordinate device control of an indoor access point : e.i.r.p PSD < 5 dBm/MHz.
	▪ For client device control of a standard power access point : e.i.r.p PSD < 17 dBm/MHz.
	▪ For client device control of an indoor access point : e.i.r.p PSD < -1 dBm/MHz.
	▪ For very low power device : e.i.r.p PSD < -5 dBm/MHz.
☒	For the 6.425 ~ 6.525 GHz band:
	▪ For indoor access point : e.i.r.p PSD < 5 dBm/MHz.
	▪ For client device control of an indoor access point : e.i.r.p PSD < -1 dBm/MHz.
☒	For the 6.525 ~ 6.875 GHz band:
	▪ For standard power access point and fixed client device : e.i.r.p PSD < 23 dBm/MHz.
	▪ For indoor access point : e.i.r.p PSD < 5 dBm/MHz.
	▪ For subordinate device control of an indoor access point : e.i.r.p PSD < 5 dBm/MHz.
	▪ For client device control of a standard power access point : e.i.r.p PSD < 17 dBm/MHz.
	▪ For client device control of an indoor access point : e.i.r.p PSD < -1 dBm/MHz.
	▪ For very low power device : e.i.r.p PSD < -5 dBm/MHz.
☒	For the 6.875 ~ 7.125 GHz band:
	▪ For indoor access point : e.i.r.p PSD < 5 dBm/MHz.
	▪ For client device control of an indoor access point : e.i.r.p PSD < -1 dBm/MHz.
RLAN Devices	
☐	For the 5.925 ~ 7.125 GHz band:
	▪ For low-power indoor access-points & indoor subordinate devices < 5 dBm / MHz.
	▪ For low-power client devices < -1 dBm / MHz.
☐	For the 5.925 ~ 6.875 GHz band:
	▪ For standard-power access points & fixed client devices < 23 dBm / MHz.
	▪ For standard client devices < 17 dBm / MHz.

4.3.2 Measuring Instruments

Refer a test equipment and calibration data table in this test report.

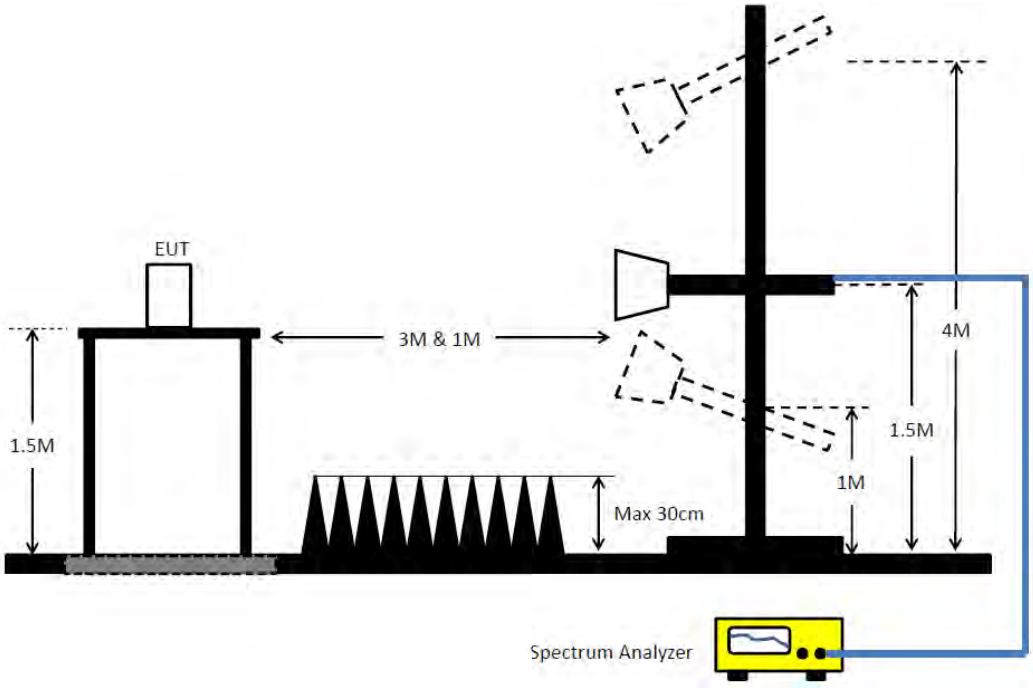
4.3.3 Test Procedures

Test Method	
▪ According to FCC KDB 987594 D02 clause II.F, the measurement procedure shall refer to KDB 789033. Peak power spectral density procedures that the same method as used to determine the conducted output power shall be used to determine the peak power spectral density and use the peak search function on the spectrum analyzer to find the peak of the spectrum. For the peak power spectral density shall be measured using below options:	
	☐ Refer as FCC KDB 789033 D02, F)5) power spectral density can be measured using resolution bandwidths < 1 MHz provided that the results are integrated over 1 MHz bandwidth
	[duty cycle ≥ 98% or external video / power trigger]
	☒ Refer as FCC KDB 789033 D02, clause E Method SA-1 (spectral trace averaging).
	☐ Refer as FCC KDB 789033 D02, clause E Method SA-1 Alt. (RMS detection with slow sweep speed)
	duty cycle < 98% and average over on/off periods with duty factor
	☒ Refer as FCC KDB 789033 D02, clause E Method SA-2 (spectral trace averaging).
	☐ Refer as FCC KDB 789033 D02, clause E Method SA-2 Alt. (RMS detection with slow sweep speed)
☐ For conducted measurement.	
	▪ If the EUT supports multiple transmit chains using options given below:
	☐ Option 1: Measure and sum the spectra across the outputs. Refer as FCC KDB 662911, In-band power spectral density (PSD). Sample all transmit ports simultaneously using a spectrum analyzer for each transmit port. Where the trace bin-by-bin of each transmit port summing can be performed. (i.e., in the first spectral bin of output 1 is summed with that in the first spectral bin of output 2 and that from the first spectral bin of output 3, and so on up to the NTX output to obtain the value for the first frequency bin of the summed spectrum.). Add up the amplitude (power) values for the different transmit chains and use this as the new data trace.
	☐ Option 2: Measure and sum spectral maxima across the outputs. With this technique, spectra are measured at each output of the device at the required resolution bandwidth. The maximum value (peak) of each spectrum is determined. These maximum values are then summed mathematically in linear power units across the outputs. These operations shall be performed separately over frequency spans that have different out-of-band or spurious emission limits,
	☐ Option 3: Measure and add 10 log(N) dB, where N is the number of transmit chains. Refer as FCC KDB 662911, In-band power spectral density (PSD). Performed at each transmit chains and each transmit chains shall be compared with the limit have been reduced with 10 log(N). Or each transmit chains shall be add 10 log(N) to compared with the limit.
	▪ If multiple transmit chains, EIRP PPSD calculation could be following as methods: $PPSD_{total} = PPSD_1 + PPSD_2 + \ldots + PPSD_n$ (calculated in linear unit [mW] and transfer to log unit [dBm]) $EIRP_{total} = PPSD_{total} + DG$

☒	For radiated measurement.
	▪ Refer as FCC KDB 789033 D02 clause II A.1.F ”Antenna-port Conducted versus Radiated Testing”
	▪ Refer as ANSI C63.10, clause 6.6 for radiated emissions above 1GHz.
	▪ Refer as FCC KDB 412172 D01 clause 2.2 for EIRP calculation.

4.3.4 Test Setup

Radiated Measurement



4.3.5 Test Result of Peak Power Spectral Density (E.I.R.P.)

Refer as Appendix C

4.4 Unwanted Emissions

4.4.1 Transmitter Unwanted Emissions Limit

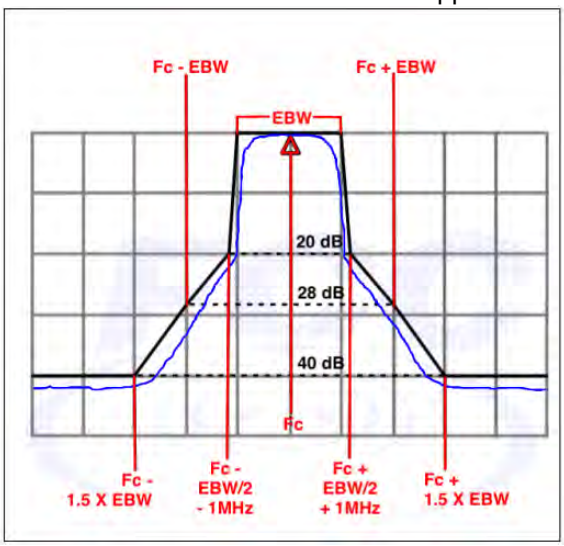
Unwanted emissions below 1 GHz and restricted band emissions above 1GHz limit			
Frequency Range (MHz)	**Field Strength (uV/m)**	**Field Strength (dBuV/m)**	**Measure Distance (m)**
0.009~0.490	2400/F(kHz)	48.5 - 13.8	300
0.490~1.705	24000/F(kHz)	33.8 - 23	30
1.705~30.0	30	29	30
30~88	100	40	3
88~216	150	43.5	3
216~960	200	46	3
Above 960	500	54	3

Note 1: Test distance for frequencies at or above 30 MHz, measurements may be performed at a distance other than the limit distance provided they are not performed in the near field and the emissions to be measured can be detected by the measurement equipment. When performing measurements at a distance other than that specified, the results shall be extrapolated to the specified distance using an extrapolation factor of 20 dB/decade (inverse of linear distance for field-strength measurements, inverse of linear distance-squared for power-density measurements).

Note 2: Test distance for frequencies at below 30 MHz, measurements may be performed at a distance closer than the EUT limit distance; however, an attempt should be made to avoid making measurements in the near field. When performing measurements below 30 MHz at a closer distance than the limit distance, the results shall be extrapolated to the specified distance by either making measurements at a minimum of two or more distances on at least one radial to determine the proper extrapolation factor or by using the square of an inverse linear distance extrapolation factor (40 dB/decade). The test report shall specify the extrapolation method used to determine compliance of the EUT.

Note 3: Using the distance of 1m during the test for above 18 GHz, and the test value to correct for the distance factor at 3m(20 x log (standard distance/ test distance) = 20log(3/1) = 9.54dB.
EX. Above 18GHz emission limit calculation (3m to 1m) = 54dBuV/m at 3m + 9.54dB = 63.54 dBuV/m at 1m.

Un-restricted band emissions above 1GHz Limit	
Frequency	**Limit**
Any outside the 5.945 – 7.125 GHz emission	e.i.r.p. -27 dBm [68.2 dBuV/m@3m]
	Note 1: Using the distance of 1m during the test for above 18 GHz, and the test value to correct for the distance factor at 3m(20 x log (standard distance/ test distance) = 20log(3/1) = 9.54dB. EX. Above 18GHz emission limit calculation (3m to 1m) = 68.2dBuV/m at 3m + 9.54dB = 77.74 dBuV/m at 1m. Note 2:-27 dBm EIRP OOBE is measured RMS which is a deviation from the current 15E rules for 5 GHz bands. In addition, 15.35(b) applies where the peak emissions must be limited to no more than 20 dB above the average limit.

Frequency	Emission MASK Limit
5.945 – 7.125 GHz	Power spectral density must be suppressed by 20 dB at 1 MHz outside of channel edge, by 28 dB at one channel bandwidth from the channel center, and by 40 dB at one- and one-half times the channel bandwidth away from channel center. At frequencies between one megahertz outside an unlicensed device's channel edge and one channel bandwidth from the center of the channel, the limits must be linearly interpolated between 20 dB and 28 dB suppression, and at frequencies between one and one- and one-half times an unlicensed device's channel bandwidth, the limits must be linearly interpolated between 28 dB and 40 dB suppression. Emissions removed from the channel center by more than one- and one-half times the channel bandwidth must be suppressed by at least 40 dB. 

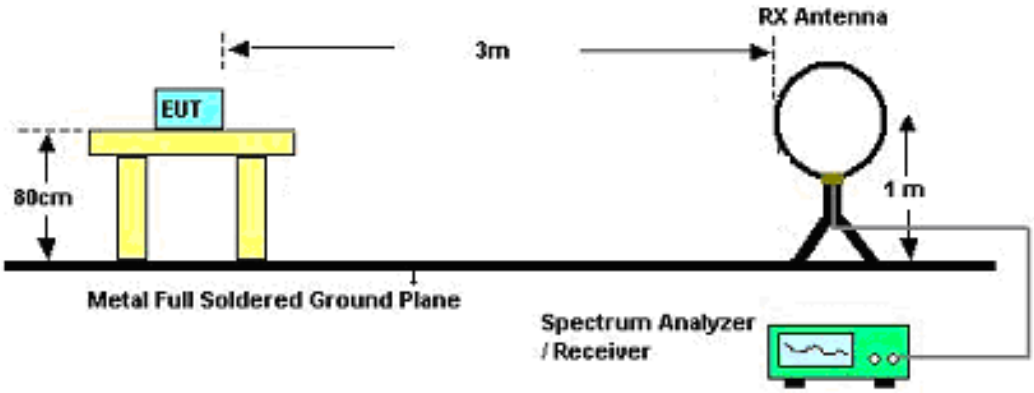
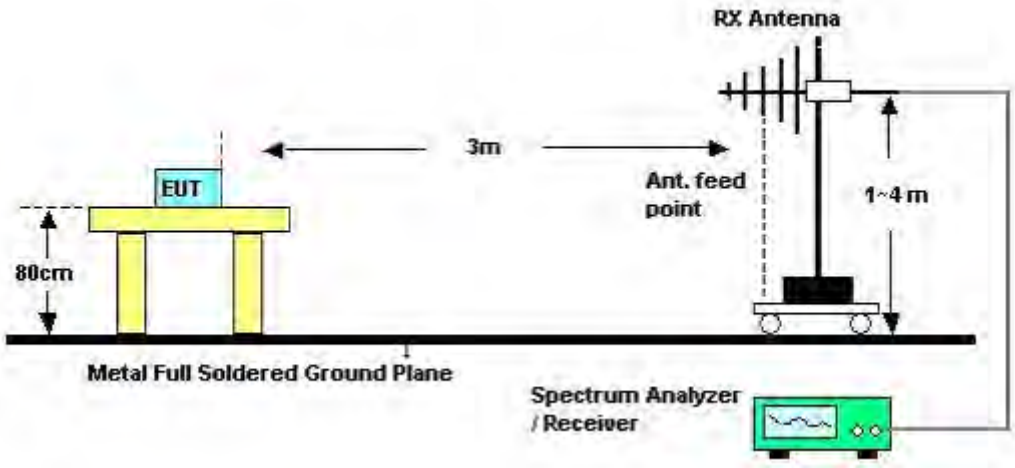
4.4.2 Measuring Instruments

Refer a test equipment and calibration data table in this test report.

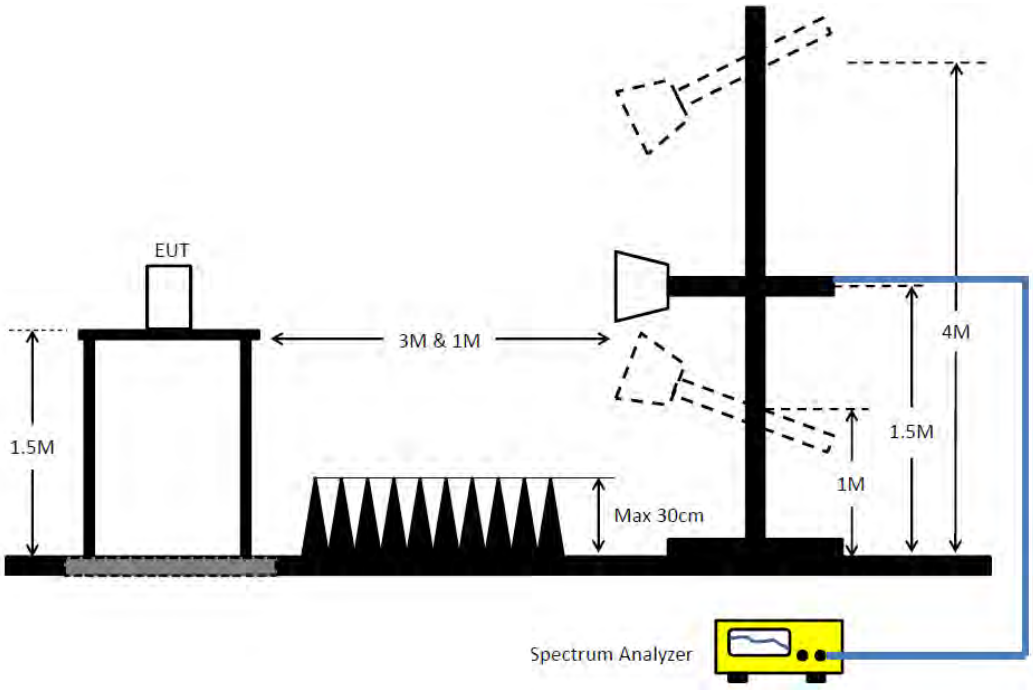
4.4.3 Test Procedures

Test Method
▪ According to FCC KDB 987594 D02 II.G. the unwanted emission measurement procedure shall refer to KDB 789300(except emission MASK). Measurements may be performed at a distance other than the limit distance provided they are not performed in the near field and the emissions to be measured can be detected by the measurement equipment. Measurements shall not be performed at a distance greater than 30 m for frequencies above 30 MHz, unless it can be further demonstrated that measurements at a distance of 30 m or less are impractical. When performing measurements at a distance other than that specified, the results shall be extrapolated to the specified distance using an extrapolation factor of 20 dB/decade (inverse of linear distance for field-strength measurements, inverse of linear distance-squared for power-density measurements).
▪ The average emission levels shall be measured in [duty cycle ≥ 98 or duty factor].
▪ For the transmitter unwanted emissions shall be measured using following options below:
▪ Refer as FCC KDB 789033 D02, clause G)2) for unwanted emissions into non-restricted bands.
▪ Refer as FCC KDB 789033 D02, clause G)1) for unwanted emissions into restricted bands.
☒ Refer as FCC KDB 789033 D02, G)6) Method AD (Trace Averaging). (For unrestricted band measurement)
☐ Refer as FCC KDB 789033 D02, G)6) Method VB (Reduced VBW).
☒ Refer as ANSI C63.10, clause 11.12.2.5.3 (Reduced VBW). VBW ≥ 1/T, where T is pulse time.(For restricted band average measurement)
☐ Refer as ANSI C63.10, clause 7.5 average value of pulsed emissions.
☒ Refer as FCC KDB 789033 D02, clause G)5) measurement procedure peak limit.
☐ Refer as ANSI C63.10, clause 4.1.4.2.2 measurement procedure peak limit.
▪ Refer as FCC KDB 789033 D02, clause G)3)d)ii) for Band edge Integration measurements.
▪ For emission MASK shall be measured using following options below:
☒ Refer as FCC KDB 987594 D02, J) In-Band Emissions
▪ For radiated measurement.
▪ Refer as ANSI C63.10, clause 6.4 for radiated emissions below 30 MHz and test distance is 3m.
▪ Refer as ANSI C63.10, clause 6.5 for radiated emissions 30 MHz to 1 GHz and test distance is 3m.
▪ Refer as ANSI C63.10, clause 6.6 for radiated emissions above 1GHz.
▪ The any unwanted emissions level shall not exceed the fundamental emission level.
▪ All amplitude of spurious emissions that are attenuated by more than 20 dB below the permissible value has no need to be reported.

4.4.4 Test Setup

Transmitter Radiated Unwanted Emissions
9kHz ~30MHz

30MHz~1GHz


Above 1GHz



4.4.5 Measurement Results Calculation

The measured Level is calculated using:

Corrected Reading: Antenna factor (AF) + Cable loss (CL) + Read level (Raw) - Preamp factor (PA)(if applicable) = Level

4.4.6 Transmitter Unwanted Emissions (Below 30MHz)

There is a comparison data of both open-field test site and alternative test site - semi-Anechoic chamber according to KDB414788 Radiated Test Site, and the result came out very similar.
All amplitude of spurious emissions that are attenuated by more than 20 dB below the permissible value has no need to be reported.
The radiated emissions were investigated from 9 kHz or the lowest frequency generated within the device, up to the 10th harmonic or 40 GHz, whichever is appropriate.

4.4.7 Test Result of Transmitter Unwanted Emissions

Refer as Appendix D

4.5 Contention Based Protocol

4.5.1 Contention Based Protocol Limit

EUT can detect an AWGN signal with 90% (or better) level of certainty.

4.5.2 Measuring Instruments

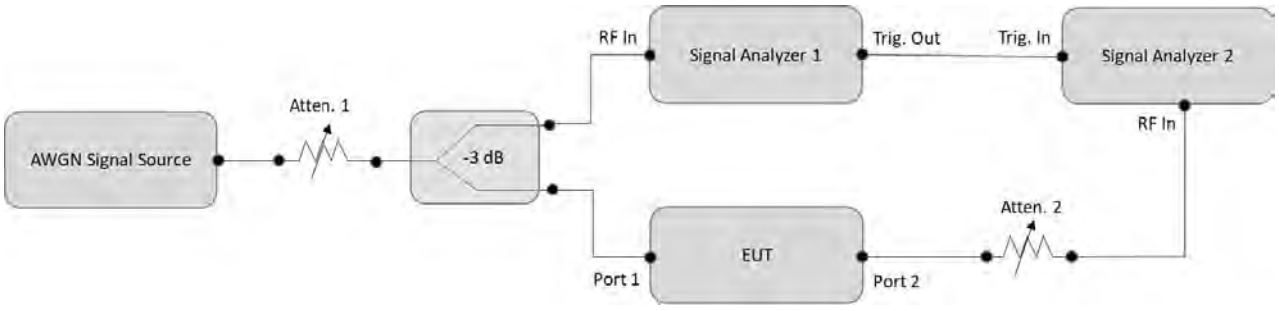
Refer a test equipment and calibration data table in this test report.

4.5.3 Test Procedures

Test Method	
▪	For Contention Based Protocol shall be measured using following options below:
☒	Refer as FCC KDB 987594 D02, I) Contention Based Protocol.

4.5.4 Test Setup

Contention Based Protocol



4.5.5 Test Result of Contention Based Protocol

Refer as Appendix E

5 Test Equipment and Calibration Data

Instrument	Brand	Model No.	Serial No.	Characteristics	Calibration Date	Calibration Due Date	Remark
EMI Receiver	Agilent	N9038A	My52260123	9kHz ~ 8.4GHz	Mar. 01, 2024	Feb. 28, 2025	Conduction (CO01-CB)
LISN	F.C.C.	FCC-LISN-50-16-2	04083	150kHz ~ 100MHz	Feb. 19, 2024	Feb. 18, 2025	Conduction (CO01-CB)
LISN	Schwarzbeck	NSLK 8127	8127647	9kHz ~ 30MHz	Apr. 24, 2024	Apr. 23, 2025	Conduction (CO01-CB)
Pulse Limiter	Rohde& Schwarz	ESH3-Z2	100430	9kHz ~ 30MHz	Feb. 08, 2024	Feb. 07, 2025	Conduction (CO01-CB)
COND Cable	Woken	Cable	Low cable-CO01	9kHz ~ 30MHz	Oct. 17, 2023	Oct. 16, 2024	Conduction (CO01-CB)
Software	SPORTON	SENSE	V5.10	-	N.C.R.	N.C.R.	Conduction (CO01-CB)
3m Semi Anechoic Chamber NSA	TDK	SAC-3M	03CH05-CB	30 MHz ~ 1 GHz	Aug. 02, 2023	Aug. 01, 2024	Radiation (03CH05-CB)
Bilog Antenna with 6dB Attenuator	TESEQ & EMCI	CBL 6112D & N-6-06	35236 & AT-N0610	30MHz ~ 2GHz	Mar. 23, 2024	Mar. 22, 2025	Radiation (03CH05-CB)
Loop Antenna	Teseq	HLA 6121	65417	9kHz - 30 MHz	Oct. 13, 2023	Oct. 12, 2024	Radiation (03CH05-CB)
Amplifier	EMCI	EMC330N	980331	20MHz ~ 3GHz	May 02, 2024	May 01, 2025	Radiation (03CH05-CB)
Spectrum Analyzer	R&S	FSP40	100304	9kHz ~ 40GHz	Apr. 17, 2024	Apr. 16, 2025	Radiation (03CH05-CB)
EMI Test Receiver	R&S	ESCS	826547/017	9kHz ~ 2.75GHz	Jun. 13, 2023	Jun. 12, 2024	Radiation (03CH05-CB
RF Cable-low	Woken	RG402	Low Cable-04+23	30MHz~1GHz	Dec. 06, 2023	Dec. 05, 2024	Radiation (03CH05-CB)
Test Software	SPORTON	SENSE	V5.10	-	N.C.R.	N.C.R.	Radiation (03CH05-CB)
3m Semi Anechoic Chamber VSWR	RIKEN	SAC-3M	03CH02-CB	1GHz ~18GHz	Mar. 25, 2023	Mar. 24, 2024	Radiation (03CH02-CB)
Horn Antenna	EMCO	3115	9610-4976	1GHz ~ 18GHz	Apr. 18, 2023	Apr. 17, 2024	Radiation (03CH02-CB)
Horn Antenna	Schwarzbeck	BBHA 9170	BBHA9170252	15GHz ~ 40GHz	Sep. 04, 2023	Sep. 03, 2024	Radiation (03CH02-CB)
Pre-Amplifier	Agilent	83017A	MY39501305	1GHz ~ 26.5GHz	Jun. 30, 2023	Jun. 29, 2024	Radiation (03CH02-CB)
Pre-Amplifier	SGH	SGH184	20221107-3	18GHz ~ 40GHz	Nov. 24, 2023	Nov. 23, 2024	Radiation (03CH02-CB)

Instrument	Brand	Model No.	Serial No.	Characteristics	Calibration Date	Calibration Due Date	Remark
Signal Analyzer	R&S	FSV40	101903	9kHz ~ 40GHz	May 29, 2023	May 28, 2024	Radiation (03CH02-CB)
RF Cable-high	Woken	RG402	High Cable-18	1GHz ~ 18GHz	Oct. 02, 2023	Oct. 01, 2024	Radiation (03CH02-CB)
RF Cable-high	Woken	RG402	High Cable-18+19	1GHz ~ 18GHz	Oct. 02, 2023	Oct. 01, 2024	Radiation (03CH02-CB)
High Cable	Woken	WCA0929M	40G#5+6	1GHz ~ 40 GHz	Jan. 11, 2024	Jan. 10, 2025	Radiation (03CH02-CB)
Band Rejector	MTJ	6G Band Rejector	BRJ-01	1GHz ~ 7.4GHz	Oct. 03, 2023	Oct. 02, 2024	Radiation (03CH02-CB)
Band Rejector	MTJ	6G Band Rejector	BRJ-02	1GHz ~ 8GHz	Oct. 03, 2023	Oct. 02, 2024	Radiation (03CH02-CB)
Test Software	SPORTON	SENSE	V5.10	-	N.C.R.	N.C.R.	Radiation (03CH02-CB)
3m Semi Anechoic Chamber VSWR	TDK	SAC-3M	03CH06-CB	1GHz ~18GHz 3m	Oct. 02, 2023	Oct. 01, 2024	Radiation (03CH06-CB)
Horn Antenna	SCHWARZBECK	BBHA9120D	BBHA 9120D-1292	1GHz~18GHz	Jul. 31, 2023	Jul. 30, 2024	Radiation (03CH06-CB)
Horn Antenna	Schwarzbeck	BBHA 9170	BBHA9170252	15GHz ~ 40GHz	Sep. 04, 2023	Sep. 03, 2024	Radiation (03CH06-CB)
Pre-Amplifier	Agilent	83017A	MY53270064	0.5GHz ~ 26.5GHz	Aug. 01, 2023	Jul. 31, 2024	Radiation (03CH06-CB)
Pre-Amplifier	SGH	SGH184	20221107-3	18GHz ~ 40GHz	Nov. 24, 2023	Nov. 23, 2024	Radiation (03CH06-CB)
Signal Analyzer	R&S	FSV40	101903	9kHz ~ 40GHz	May 29, 2023	May 28, 2024	Radiation (03CH06-CB)
RF Cable-high	Woken	RG402	High Cable-05+68	1GHz~18GHz	Oct. 02, 2023	Oct. 01, 2024	Radiation (03CH06-CB)
High Cable	Woken	WCA0929M	40G#5+6	1GHz ~ 40 GHz	Jan. 11, 2024	Jan. 10, 2025	Radiation (03CH06-CB)
Band Rejector	MTJ	6G Band Rejector	BRJ-01	1GHz ~ 7.4GHz	Oct. 03, 2023	Oct. 02, 2024	Radiation (03CH06-CB)
Band Rejector	MTJ	6G Band Rejector	BRJ-02	1GHz ~ 8GHz	Oct. 03, 2023	Oct. 02, 2024	Radiation (03CH06-CB)
Test Software	SPORTON	SENSE	V5.10	-	N.C.R.	N.C.R.	Radiation (03CH06-CB)
Spectrum Analyzer	R&S	FSV40	101025	9kHz ~ 40GHz	Nov. 07, 2023	Nov. 06, 2024	Conducted (DF02-CB)
Signal generator	R&S	SMB100A	181239	1MHz-40GHz	Jan. 08, 2024	Jan. 07, 2025	Conducted (DF02-CB)
Vector Signal generator	R&S	SMW200A	109426	100kHz- 7.5GHz	Dec. 21, 2023	Dec. 20, 2024	Conducted (DF02-CB)
RF Power Divider	STI	2 Way	DV-8G -05	1 ~ 8GHz	Oct. 03, 2023	Oct. 02, 2024	Conducted (DF02-CB)

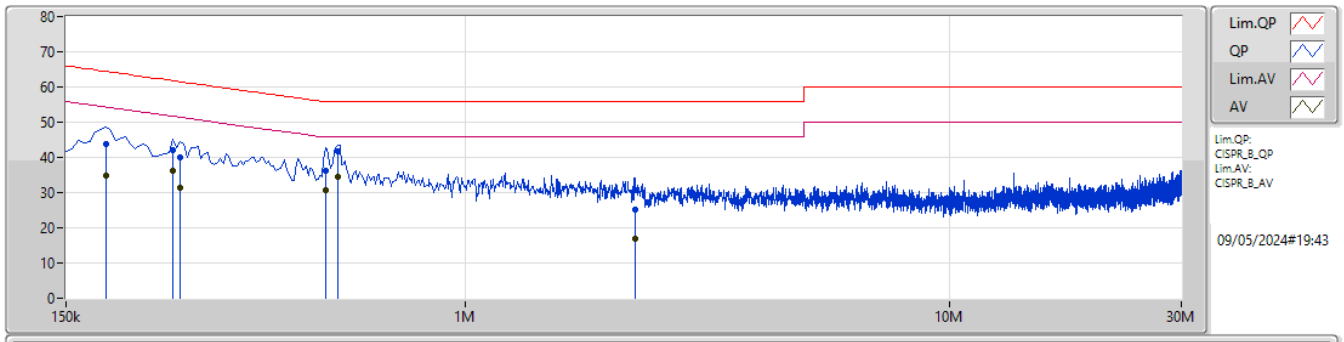
Instrument	Brand	Model No.	Serial No.	Characteristics	Calibration Date	Calibration Due Date	Remark
RF Power Divider	STI	2 Way	DV-8G -06	1 ~ 8GHz	Oct. 03, 2023	Oct. 02, 2024	Conducted (DF02-CB)
RF Power Divider	STI	2 Way	DV-8G -07	1 ~ 8GHz	Oct. 03, 2023	Oct. 02, 2024	Conducted (DF02-CB)
RF Power Divider	STI	2 Way	DV-8G -08	1 ~ 8GHz	Oct. 03, 2023	Oct. 02, 2024	Conducted (DF02-CB)
RF Cable-high	Woken	RG402	Cable-60	1~18 GHz	Oct. 03, 2023	Oct. 02, 2024	Conducted (DF02-CB)
RF Cable-high	Woken	RG402	Cable-61	1~18 GHz	Oct. 03, 2023	Oct. 02, 2024	Conducted (DF02-CB)
RF Cable-high	Woken	RG402	Cable-63	1~18 GHz	Oct. 03, 2023	Oct. 02, 2024	Conducted (DF02-CB)

Note: Calibration Interval of instruments listed above is one year.
NCR means Non-Calibration required.

Summary

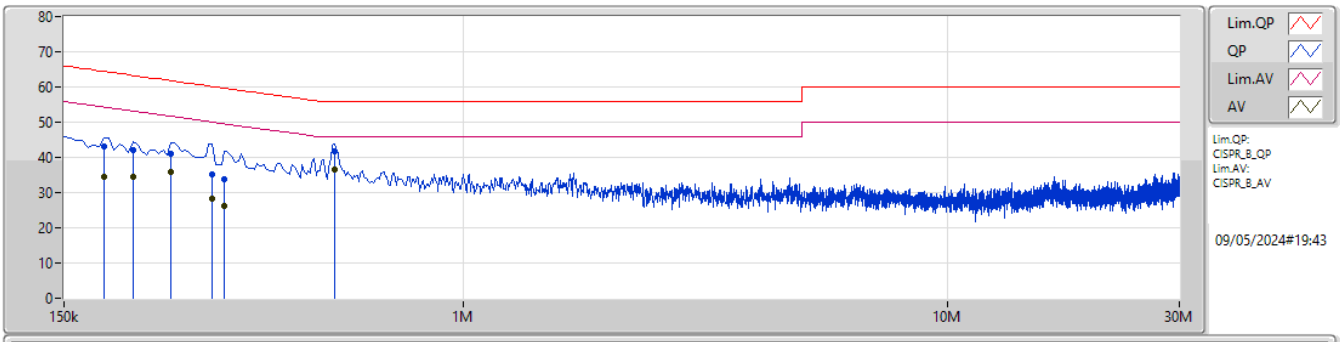
Mode	Result	Type	Freq (Hz)	Level (dBuV)	Limit (dBuV)	Margin (dB)	Condition
Mode 5	Pass	AV	541.5k	36.60	46.00	-9.40	Neutral

Mode 5



Type	Freq	Level	Limit	Margin	Factor	Condition	Comment	Raw	LISN	CL	AT
	(Hz)	(dBuV)	(dBuV)	(dB)	(dB)			(dBuV)	(dB)	(dB)	(dB)
QP	181.5k	43.70	64.41	-20.71	9.92	Line	-	33.78	0.04	0.02	9.86
AV	181.5k	34.78	54.41	-19.63	9.92	Line	-	24.86	0.04	0.02	9.86
QP	249k	42.11	61.79	-19.68	9.92	Line	-	32.19	0.04	0.02	9.86
AV	249k	36.07	51.79	-15.72	9.92	Line	-	26.15	0.04	0.02	9.86
QP	258k	39.98	61.49	-21.51	9.92	Line	-	30.06	0.04	0.02	9.86
AV	258k	31.22	51.49	-20.27	9.92	Line	-	21.30	0.04	0.02	9.86
QP	514.5k	36.13	56.00	-19.87	9.98	Line	-	26.15	0.06	0.02	9.90
AV	514.5k	30.86	46.00	-15.14	9.98	Line	-	20.88	0.06	0.02	9.90
QP	546k	41.78	56.00	-14.22	9.98	Line	-	31.80	0.06	0.02	9.90
AV	546k	34.65	46.00	-11.35	9.98	Line	"Worst"	24.67	0.06	0.02	9.90
QP	2.238M	25.21	56.00	-30.79	10.08	Line	-	15.13	0.11	0.08	9.89
AV	2.238M	17.03	46.00	-28.97	10.08	Line	-	6.95	0.11	0.08	9.89

Mode 5

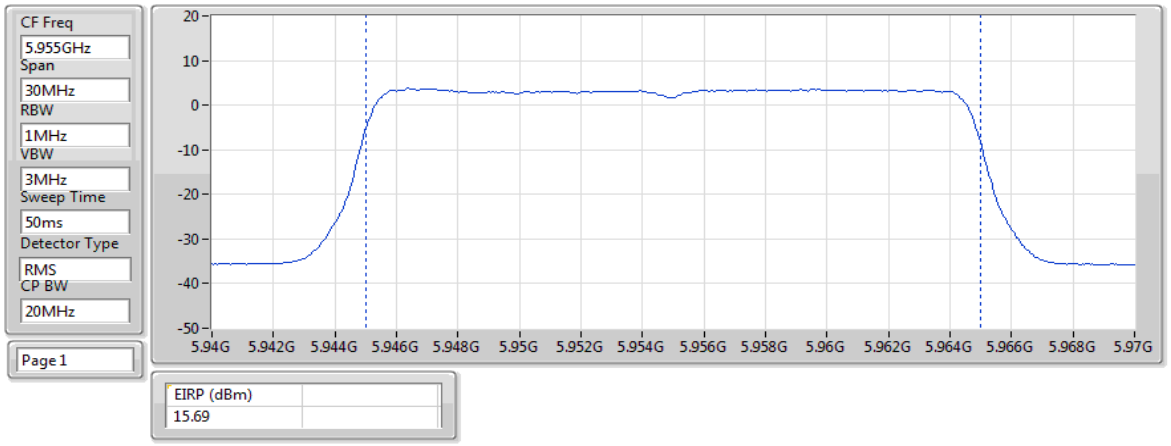


Type	Freq	Level	Limit	Margin	Factor	Condition	Comment	Raw	LISN	CL	AT
	(Hz)	(dBuV)	(dBuV)	(dB)	(dB)			(dBuV)	(dB)	(dB)	(dB)
QP	181.5k	43.16	64.41	-21.25	9.94	Neutral	-	33.22	0.06	0.02	9.86
AV	181.5k	34.52	54.41	-19.89	9.94	Neutral	-	24.58	0.06	0.02	9.86
QP	208.5k	42.00	63.27	-21.27	9.93	Neutral	-	32.07	0.06	0.02	9.85
AV	208.5k	34.55	53.27	-18.72	9.93	Neutral	-	24.62	0.06	0.02	9.85
QP	249k	41.12	61.79	-20.67	9.94	Neutral	-	31.18	0.06	0.02	9.86
AV	249k	35.82	51.79	-15.97	9.94	Neutral	-	25.88	0.06	0.02	9.86
QP	303k	35.25	60.17	-24.92	9.95	Neutral	-	25.30	0.06	0.02	9.87
AV	303k	28.31	50.17	-21.86	9.95	Neutral	-	18.36	0.06	0.02	9.87
QP	321k	33.76	59.67	-25.91	9.96	Neutral	-	23.80	0.06	0.02	9.88
AV	321k	26.06	49.67	-23.61	9.96	Neutral	-	16.10	0.06	0.02	9.88
QP	541.5k	41.58	56.00	-14.42	9.98	Neutral	-	31.60	0.06	0.02	9.90
AV	541.5k	36.60	46.00	-9.40	9.98	Neutral	"Worst"	26.62	0.06	0.02	9.90

Result

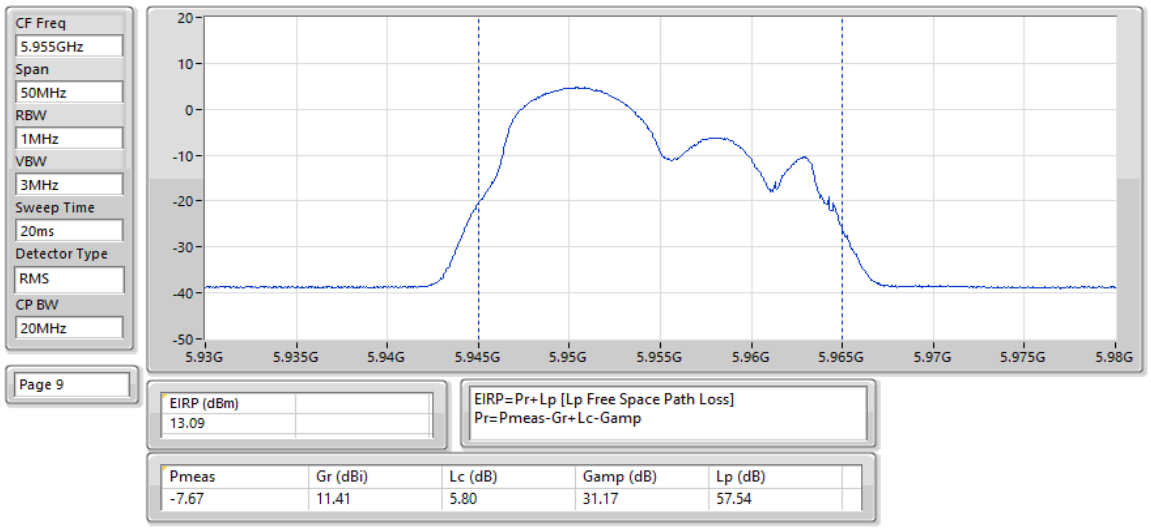
Reference Device / FCC ID: MSQ-RTBE6G00			
Mode	Result	EIRP (dBm)	EIRP Limit (dBm)
802.11be EHT20-BF_Nss1,(MCS0)_4TX	-	-	-
5955MHz	Pass	15.69	30.00

EIRP;Band:6.2G;be20,BF;BWch:20MHz;Nss:1,(M0);Nant:4;Ch:5955MHz;TX



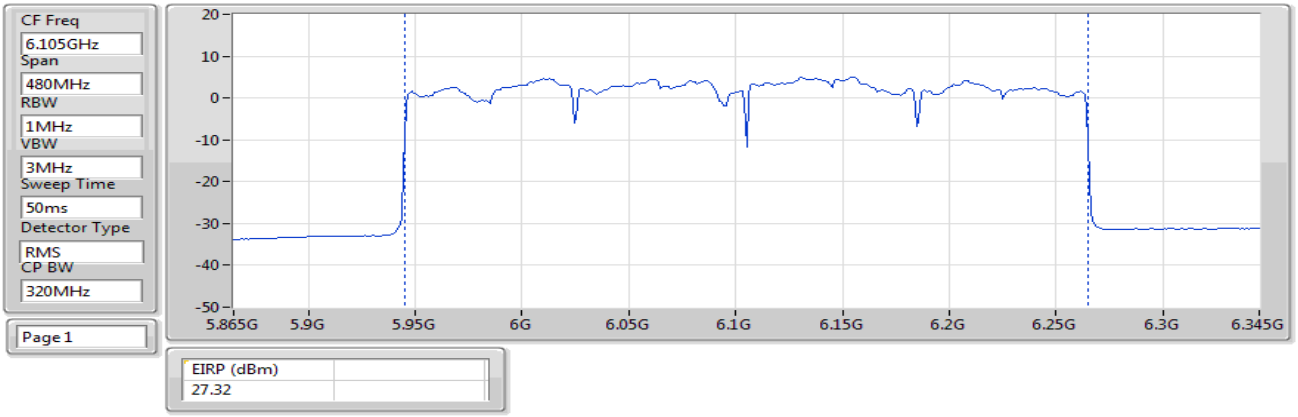
Variant Device / FCC ID: MSQ-RTBE6J00			
Mode	Result	EIRP (dBm)	EIRP Limit (dBm)
802.11be EHT20-BF_Nss1,(MCS0)_4TX	-	-	-
5955MHz	Pass	13.09	30

EIRP;Band:6.2G;be20-BF;BWch:20MHz;Nss:1,(M0);Nant:4;Ch:5955MHz;TX



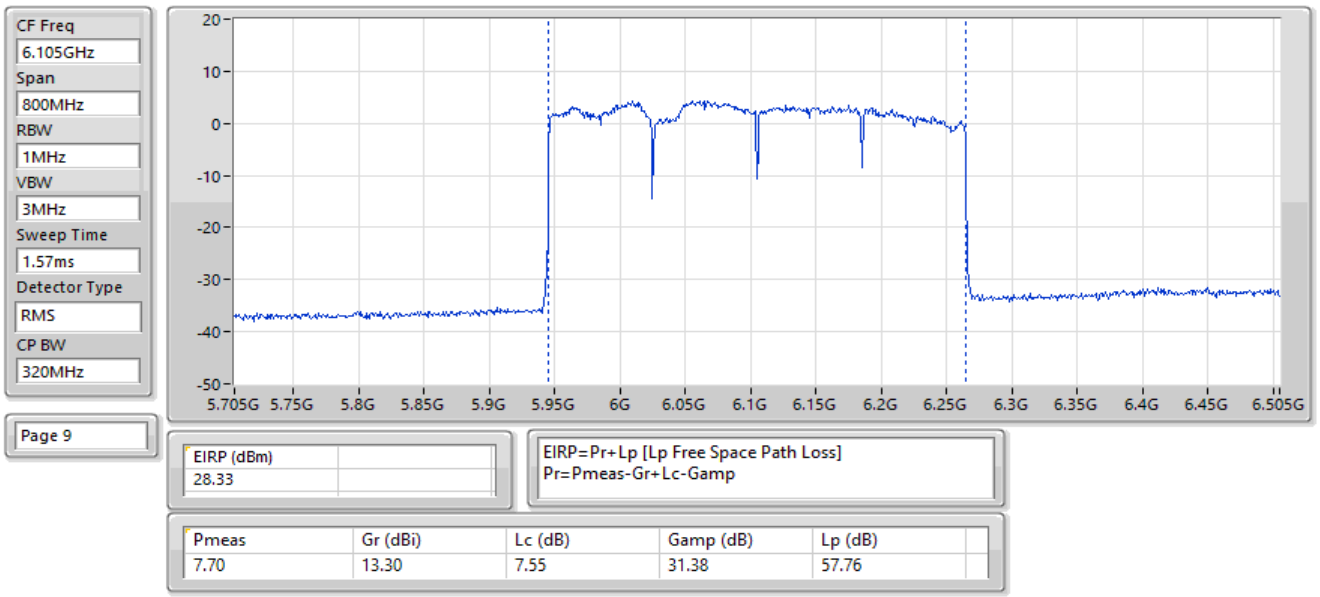
Reference Device / FCC ID: MSQ-RTBE6G00			
Mode	Result	EIRP (dBm)	EIRP Limit (dBm)
802.11be EHT320-BF_Nss1,(MCS0)_4TX	-	-	-
6105MHz	Pass	27.32	30.00

EIRP;Band:6.2G;be320,BF;BWch:320MHz;Nss:1,(M0);Nant:4;Ch:6105MHz;TX



Variant Device / FCC ID: MSQ-RTBE6J00			
Mode	Result	EIRP (dBm)	EIRP Limit (dBm)
802.11be EHT320-BF_Nss1,(MCS0)_4TX	-	-	-
6105MHz	Pass	28.33	30.00

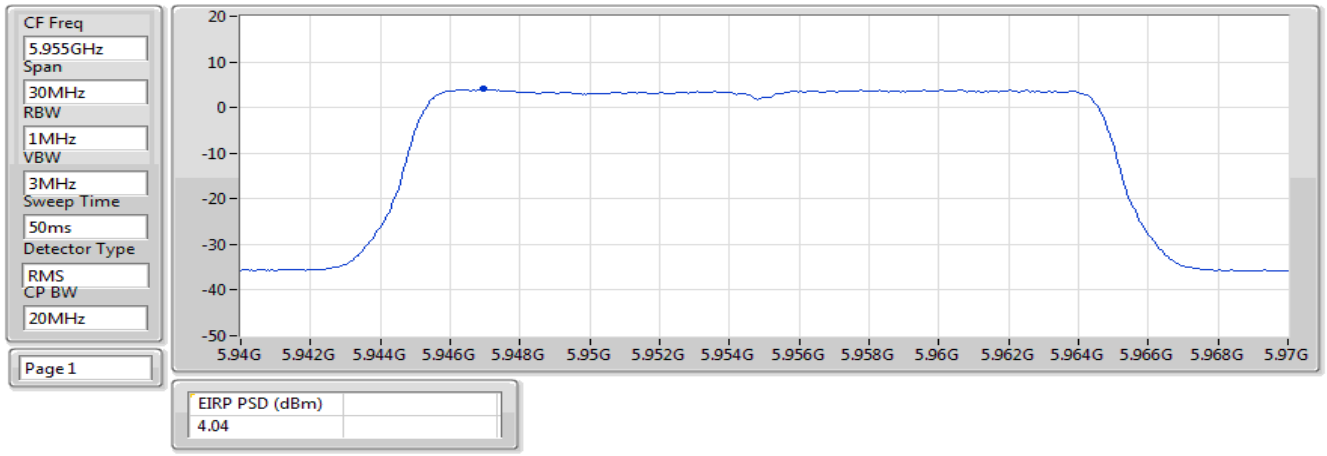
EIRP;Band:6.2G;be320-BF;BWch:320MHz;Nss:1,(M0);Nant:4;Ch:6105MHz;TX



Result

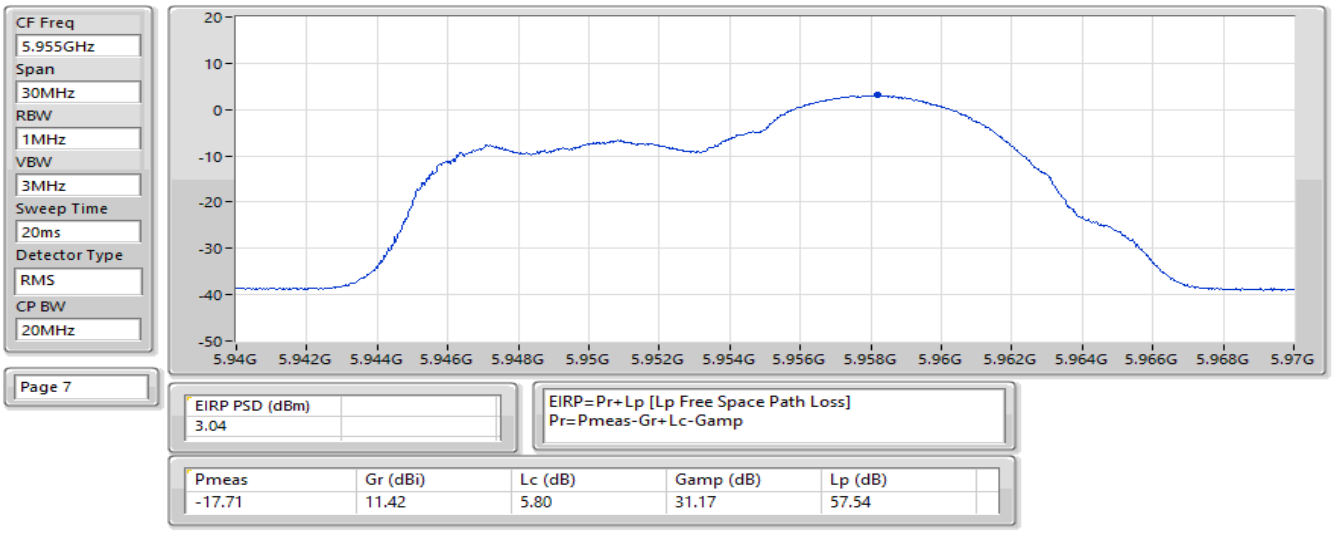
Reference Device / FCC ID: MSQ-RTBE6G00			
Mode	Result	EIRP PD (dBm/RBW)	EIRP PD Limit (dBm/RBW)
802.11be EHT20-BF_Nss1,(MCS0)_4TX	-	-	-
5955MHz	Pass	4.04	5.00

EIRP PSD;Band:6.2G;be20,BF;BWch:20MHz;Nss:1,(M0);Nant:4;Ch:5955MHz;TX



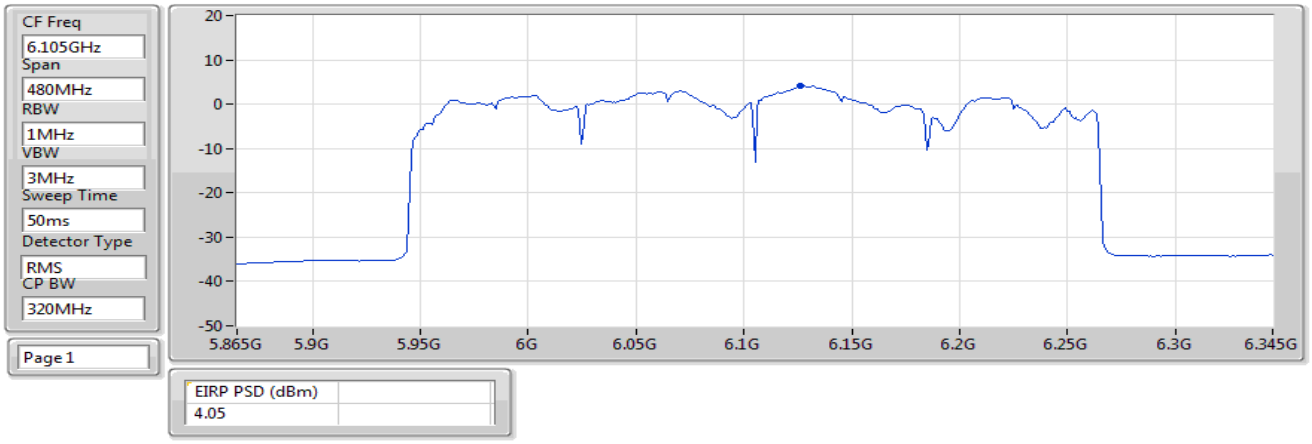
Variant Device / FCC ID: MSQ-RTBE6J00			
Mode	Result	EIRP PD (dBm/RBW)	EIRP PD Limit (dBm/RBW)
802.11be EHT20-BF_Nss1,(MCS0)_4TX	-	-	-
5955MHz	Pass	3.04	5.00

EIRP PSD;Band:6.2G;be20-BF;BWch:20MHz;Nss:1,(M0);Nant:4;Ch:5955MHz;TX



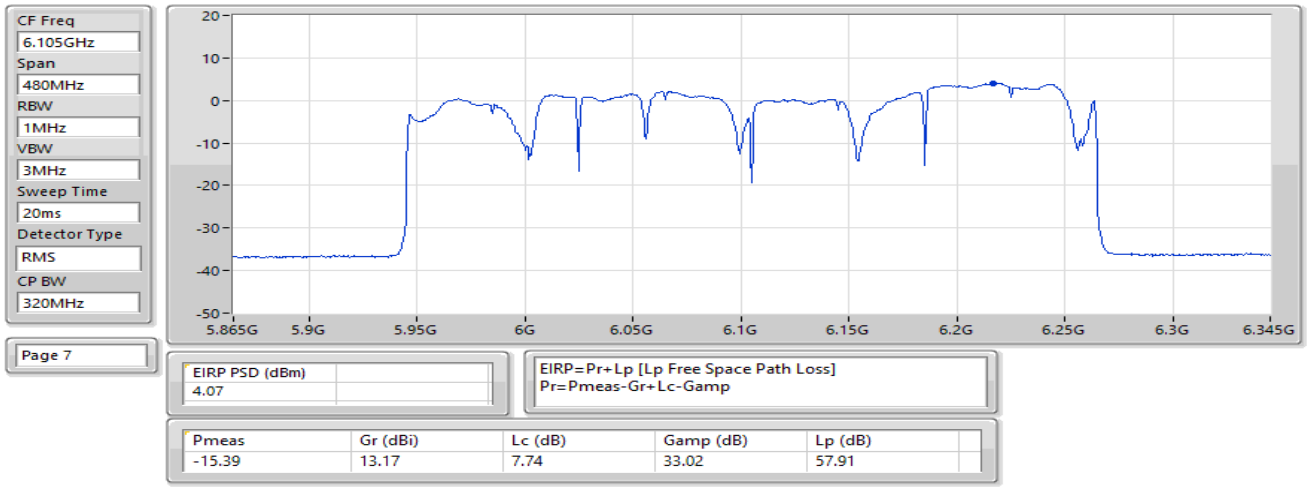
Reference Device / FCC ID: MSQ-RTBE6G00			
Mode	Result	EIRP PD (dBm/RBW)	EIRP PD Limit (dBm/RBW)
802.11be EHT320-BF_Nss1,(MCS0)_4TX	-	-	-
6105MHz	Pass	4.05	5.00

EIRP PSD;Band:6.2G;be320,BF;BWch:320MHz;Nss:1,(M0);Nant:4;Ch:6105MHz;TX



Variant Device / FCC ID: MSQ-RTBE6J00			
Mode	Result	EIRP PD (dBm/RBW)	EIRP PD Limit (dBm/RBW)
802.11be EHT320-BF_Nss1,(MCS0)_4TX	-	-	-
6105MHz	Pass	4.07	5.00

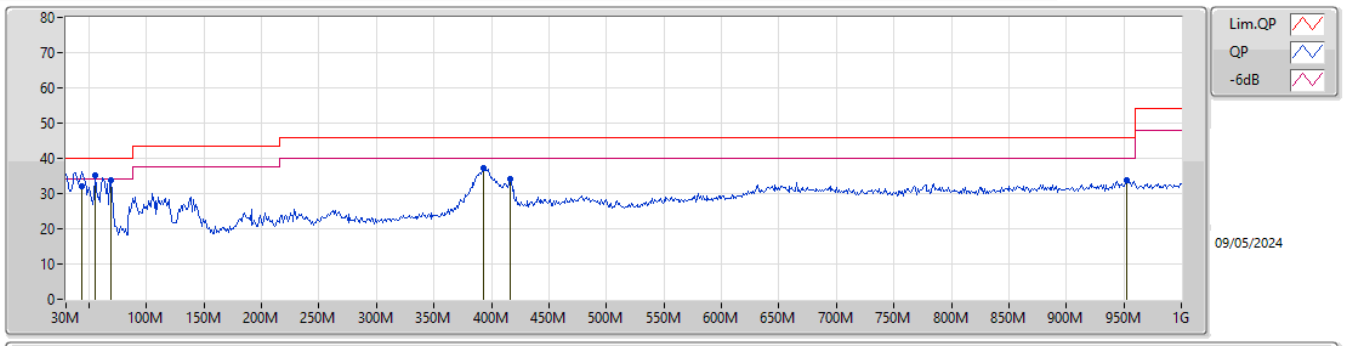
EIRP PSD;Band:6.2G;be320-BF;BWch:320MHz;Nss:1,(M0);Nant:4;Ch:6105MHz;TX



Summary

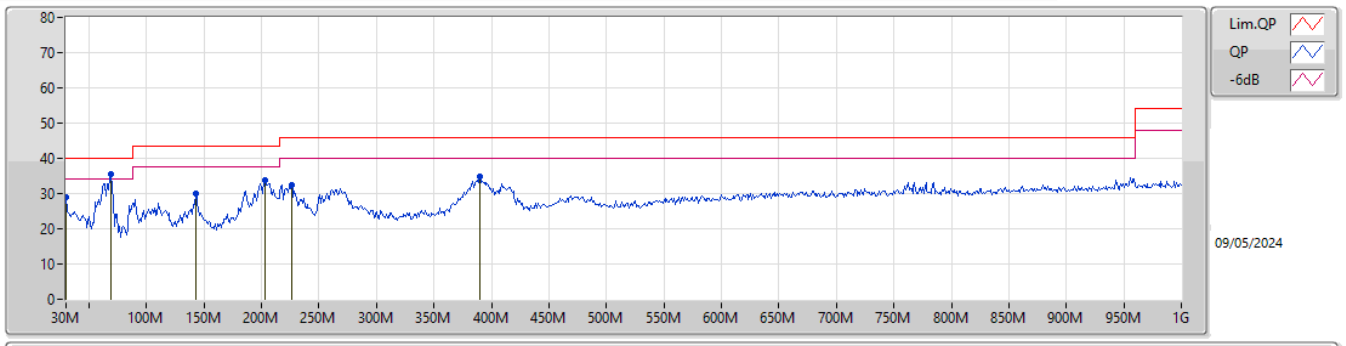
Mode	Result	Type	Freq (Hz)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Condition
Mode 4	Pass	PK	68.8M	35.56	40.00	-4.44	Horizontal

Mode 4



Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB/m)	(m)		(°)	(m)		(dBuV/m)	(dB/m)	(dB)	(dB)
QP	43.58M	32.06	40.00	-7.94	-13.28	3	Vertical	249	1.00	-	45.34	17.10	1.21	31.59
PK	55.22M	35.26	40.00	-4.74	-17.33	3	Vertical	2	1.00	"Worst"	52.59	13.00	1.33	31.66
PK	68.8M	33.95	40.00	-6.05	-17.64	3	Vertical	0	3.00	-	51.59	12.58	1.48	31.70
PK	392.78M	37.35	46.00	-8.65	-7.14	3	Vertical	358	1.25	-	44.49	21.19	3.65	31.98
PK	416.06M	34.04	46.00	-11.96	-5.93	3	Vertical	324	1.25	-	39.97	22.31	3.77	32.01
PK	952.47M	33.91	46.00	-12.09	0.32	3	Vertical	283	1.50	-	33.59	26.63	5.99	32.30

Mode 4



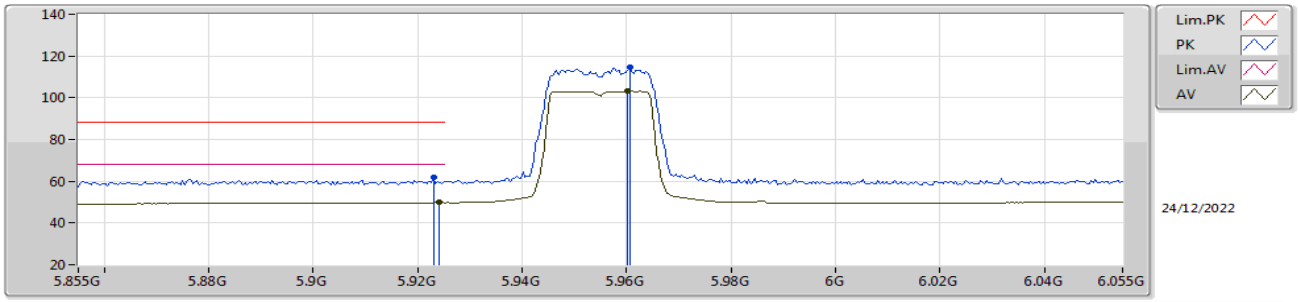
Type	Freq	Level	Limit	Margin	Factor	Dist	Condition	Azimuth	Height	Comment	Raw	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dB/m)	(m)		(°)	(m)		(dBuV/m)	(dB/m)	(dB)	(dB)
PK	30M	28.95	40.00	-11.05	-6.36	3	Horizontal	337	1.50	-	35.31	24.26	0.76	31.38
PK	68.8M	35.56	40.00	-4.44	-17.64	3	Horizontal	310	3.00	"Worst"	53.20	12.58	1.48	31.70
PK	142.52M	30.06	43.50	-13.44	-12.66	3	Horizontal	146	2.00	-	42.72	17.00	2.09	31.75
PK	202.66M	33.93	43.50	-9.57	-13.92	3	Horizontal	2	1.25	-	47.85	15.33	2.52	31.77
PK	225.94M	32.30	46.00	-13.70	-13.47	3	Horizontal	92	1.50	-	45.77	15.66	2.67	31.80
PK	389.87M	34.89	46.00	-11.11	-7.25	3	Horizontal	238	1.00	-	42.14	21.09	3.64	31.98

Result

Reference Device / FCC ID: MSQ-RTBE6G00 / Unwanted Emissions (Band edge): 802.11be20(MCS0 Nss1) 5955MHz 4TX_Beamforming

5.925-6.425GHz_802.11be EHT20-BF_Nss1,(MCS0)_4TX

5955MHz_TX



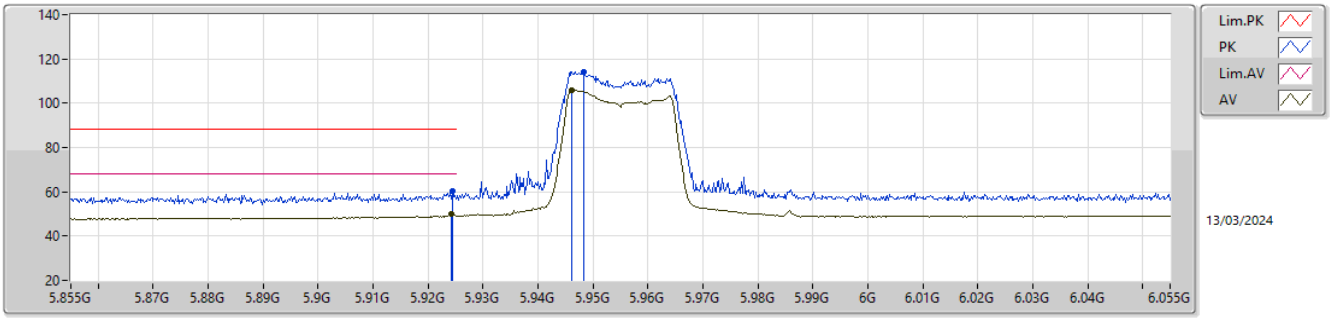
EUT Z_4TX
Setting 50
06-H-S-5-10

Type	Freq	Level	Limit	Margin	Raw	Dist	Condition	Azimuth	Height	Comment	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dBuV)	(m)		(°)	(m)		(dB)	(dB)	(dB)
PK	5.923G	61.67	88.20	-26.53	54.05	3	Vertical	232	1.80	-	32.60	7.38	32.36
RMS	5.9242G	50.23	68.20	-17.97	42.61	3	Vertical	232	1.80	-	32.60	7.38	32.36
PK	5.9606G	114.63	Inf	-Inf	107.01	3	Vertical	232	1.80	-	32.58	7.39	32.35
RMS	5.9602G	103.10	Inf	-Inf	95.48	3	Vertical	232	1.80	-	32.58	7.39	32.35

Variant Device / FCC ID: MSQ-RTBE6J00 / Unwanted Emissions (Band edge): 802.11be20(MCS0 Nss1) 5955MHz 4TX_Beamforming

5.925-6.425GHz_be20-BF_20MHz_Nss1,(MCS0)_4TX

5955MHz_TX



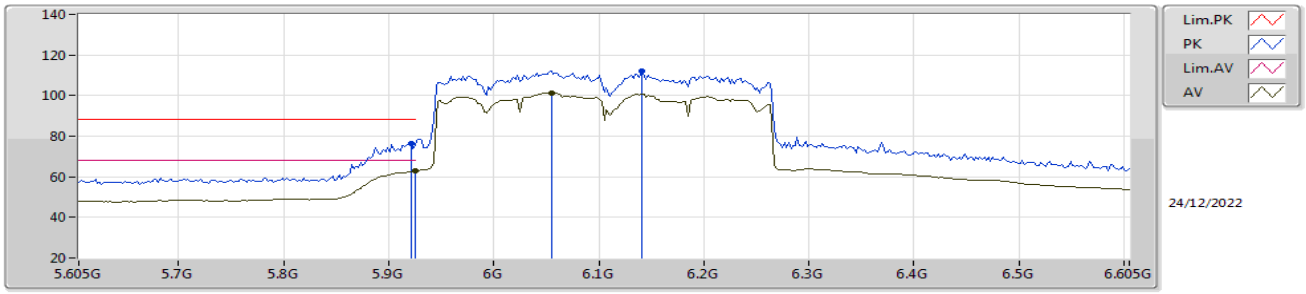
EUT Z_4TX
SET 29
02-C-E-2-10

Type	Freq	Level	Limit	Margin	Raw	Dist	Condition	Azimuth	Height	Comment	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dBuV)	(m)		(°)	(m)		(dB)	(dB)	(dB)
PK	5.9244G	60.15	88.20	-28.05	51.29	3	Vertical	253	1.85	-	34.25	5.77	31.16
RMS	5.9242G	50.19	68.20	-18.01	41.33	3	Vertical	253	1.85	-	34.25	5.77	31.16
PK	5.9484G	114.32	Inf	-Inf	105.40	3	Vertical	253	1.85	-	34.30	5.79	31.17
RMS	5.9462G	106.07	Inf	-Inf	97.16	3	Vertical	253	1.85	-	34.29	5.79	31.17

Reference Device / FCC ID: MSQ-RTBE6G00 / Unwanted Emissions (Band edge): 802.11be320(MCS0 Nss1) 6105MHz 4TX_Beamforming

5.925-6.425GHz_802.11be EHT320-BF_Nss1,(MCS0)_4TX

6105MHz_TX



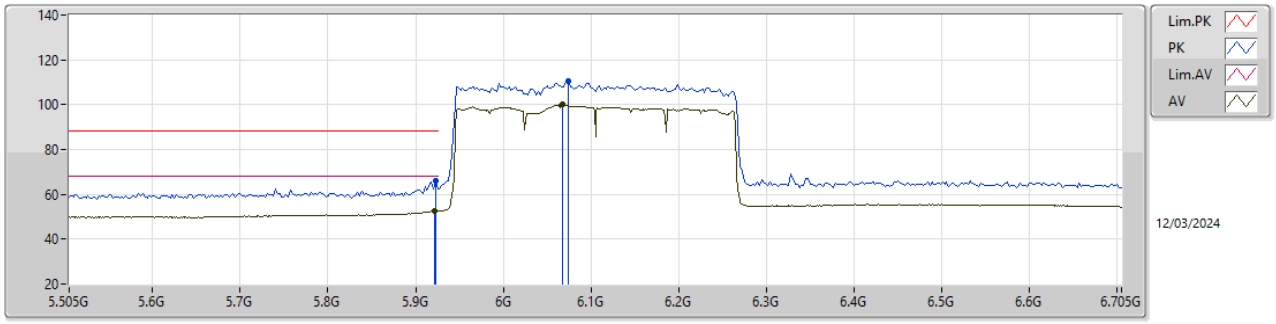
EUT Z_4TX
Setting 85
06-H-K-3-10

Type	Freq	Level	Limit	Margin	Raw	Dist	Condition	Azimuth	Height	Comment	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dBuV)	(m)		(°)	(m)		(dB)	(dB)	(dB)
PK	5.921G	76.14	88.20	-12.06	68.53	3	Vertical	234.7	1.79	-	32.60	7.38	32.37
RMS	5.925G	62.98	68.20	-5.22	55.36	3	Vertical	234.7	1.79	-	32.60	7.38	32.36
PK	6.141G	112.25	Inf	-Inf	104.62	3	Vertical	234.7	1.79	-	32.68	7.49	32.54
RMS	6.055G	101.32	Inf	-Inf	93.70	3	Vertical	234.7	1.79	-	32.60	7.44	32.42

Variant Device / FCC ID: MSQ-RTBE6J00 / Unwanted Emissions (Band edge): 802.11be320(MCS0 Nss1) 6105MHz 4TX_Beamforming

5.925-6.425GHz_be320-BF_320MHz_Nss1,(MCS0)_4TX

6105MHz_TX



EUT Z_4TX
Setting 70
06-K-S-5-10

Type	Freq	Level	Limit	Margin	Raw	Dist	Condition	Azimuth	Height	Comment	AF	CL	PA
	(Hz)	(dBuV/m)	(dBuV/m)	(dB)	(dBuV)	(m)		(°)	(m)		(dB)	(dB)	(dB)
PK	5.9226G	66.01	88.20	-22.19	57.62	3	Vertical	222	2.03	-	32.55	7.44	31.60
RMS	5.9214G	52.64	68.20	-15.56	44.26	3	Vertical	222	2.03	-	32.54	7.44	31.60
PK	6.0738G	110.45	Inf	-Inf	101.77	3	Vertical	222	2.03	-	32.60	7.53	31.45
RMS	6.0678G	99.95	Inf	-Inf	91.29	3	Vertical	222	2.03	-	32.60	7.52	31.46

Contention Based Protocol Threshold Level 802.11ax HEW20										
UNII Band	**Channel**	**Bandwidth (MHz)**	**Frequency (MHz)**	**Interference frequency (MHz)**		**EUT Status**	**Injected AWGN Power (dBm)**	**Ant Gain (dBi)**	**Detection Power(dBm)**	**Detection Limit (dBm)**
5	**53**	**20**	**6215**	Center	6215	OFF	-69.56	1.44	-71.03	≤ -62
						Minimal	-70.56	1.44	-72.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
6	**101**	**20**	**6455**	Center	6455	OFF	-71.56	1.44	-73.05	≤ -62
						Minimal	-72.56	1.44	-74.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
7	**149**	**20**	**6695**	Center	6695	OFF	-69.56	1.44	-71.01	≤ -62
						Minimal	-70.56	1.44	-72.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
8	**213**	**20**	**7015**	Center	7015	OFF	-68.56	1.44	-70.07	≤ -62
						Minimal	-69.56	1.44	-71.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62

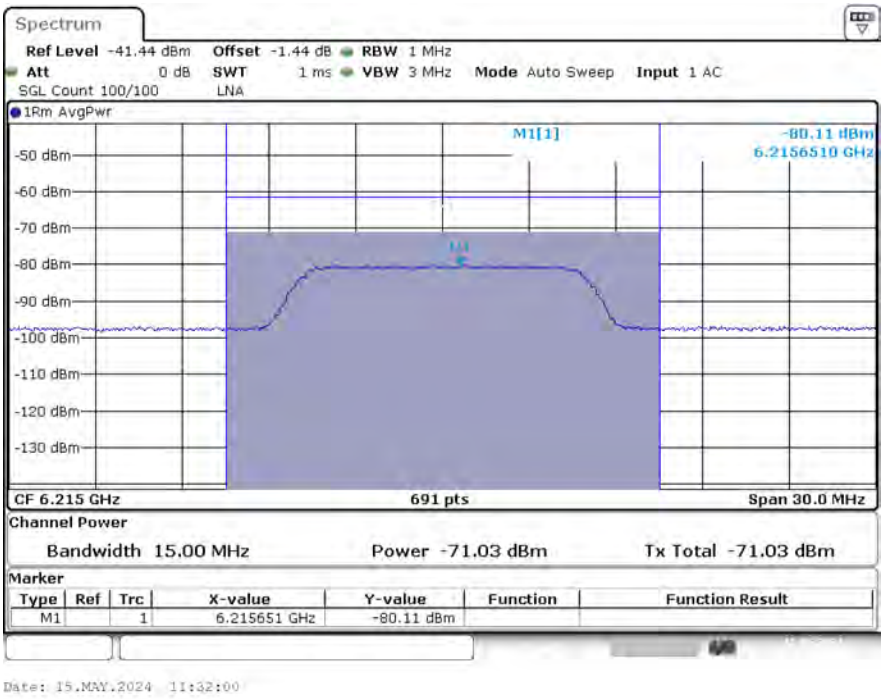
Contention Based Protocol Threshold Level 802.11ax HEW320										
UNII Band	**Channel**	**Bandwidth (MHz)**	**Frequency (MHz)**	**Interference frequency (MHz)**		**EUT Status**	**Injected AWGN Power (dBm)**	**Ant Gain (dBi)**	**Detection Power(dBm)**	**Detection Limit (dBm)**
5	**31**	**320**	**6105**	Low edge	5950	OFF	-67.56	1.44	-69.03	≤ -62
						Minimal	-68.56	1.44	-70.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
				Center	6105	OFF	-73.56	1.44	-75.05	≤ -62
						Minimal	-74.56	1.44	-76.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
				High edge	6260	OFF	-69.56	1.44	-71.04	≤ -62
						Minimal	-70.56	1.44	-72.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
5/6/7	**95**	**320**	**6425**	Low edge	6270	OFF	-65.56	1.44	-67.02	≤ -62
						Minimal	-66.56	1.44	-68.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
				Center	6425	OFF	-72.56	1.44	-74.01	≤ -62
						Minimal	-73.56	1.44	-75.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
				High edge	6580	OFF	-66.56	1.44	-68.05	≤ -62
						Minimal	-67.56	1.44	-69.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
7/8	**159**	**320**	**6745**	Low edge	6590	OFF	-70.56	1.44	-72.06	≤ -62
						Minimal	-71.56	1.44	-73.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
				Center	6745	OFF	-76.56	1.44	-78.03	≤ -62
						Minimal	-77.56	1.44	-79.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
				High edge	6900	OFF	-68.56	1.44	-70.09	≤ -62
						Minimal	-69.56	1.44	-71.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62

7/8	**191**	**320**	**6905**	Low edge	6750	OFF	-69.56	1.44	-71.08	≤ -62
						Minimal	-70.56	1.44	-72.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
				Center	6905	OFF	-76.56	1.44	-78.03	≤ -62
						Minimal	-77.56	1.44	-79.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62
				High edge	7060	OFF	-69.56	1.44	-71.02	≤ -62
						Minimal	-70.56	1.44	-72.00	≤ -62
						ON	-80.56	1.44	-82.00	≤ -62

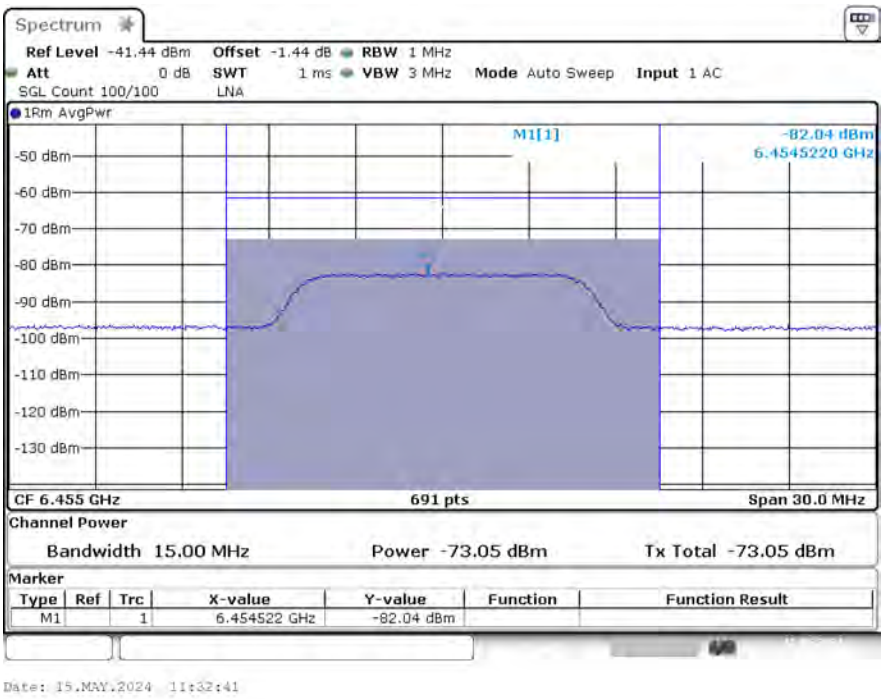
Contention Based protocol 802.11ax HEW20											
UNII Band	**Channel**	**Bandwidth (MHz)**	**Frequency (MHz)**	**Interference frequency (MHz)**		**AWGN Threshold Level (dBm)**	**EUT Status**	**Number of Detected (out of 10 times)**	**Detection Probability (%)**	**Limit (%)**	**Test Result**
5	**53**	**20**	**6215**	Center	6215	-71.03	OFF	10	100	90	**PASS**
6	**101**	**20**	**6455**	Center	6455	-73.05	OFF	10	100	90	**PASS**
7	**149**	**20**	**6695**	Center	6695	-71.01	OFF	9	90	90	**PASS**
8	**213**	**20**	**7015**	Center	7015	-70.07	OFF	9	90	90	**PASS**

Contention Based protocol 802.11ax HEW320											
UNII Band	**Channel**	**Bandwidth (MHz)**	**Frequency (MHz)**	**Interference frequency (MHz)**		**AWGN Threshold Level (dBm)**	**EUT Status**	**Number of Detected (out of 10 times)**	**Detection Probability (%)**	**Limit (%)**	**Test Result**
5	**31**	**320**	**6105**	Low edge	5950	-69.03	OFF	9	90	90	**PASS**
				Center	6105	-75.05	OFF	10	100	90	**PASS**
				High edge	6260	-71.04	OFF	10	100	90	**PASS**
5/6/7	**95**	**320**	**6425**	Low edge	6270	-67.02	OFF	10	100	90	**PASS**
				Center	6425	-74.01	OFF	10	100	90	**PASS**
				High edge	6580	-68.05	OFF	9	90	90	**PASS**
7/8	**159**	**320**	**6745**	Low edge	6590	-72.06	OFF	9	90	90	**PASS**
				Center	6745	-78.03	OFF	10	100	90	**PASS**
				High edge	6900	-70.09	OFF	10	100	90	**PASS**
7/8	**191**	**320**	**6905**	Low edge	6750	-71.08	OFF	9	90	90	**PASS**
				Center	6905	-78.03	OFF	10	100	90	**PASS**
				High edge	7060	-71.02	OFF	9	90	90	**PASS**

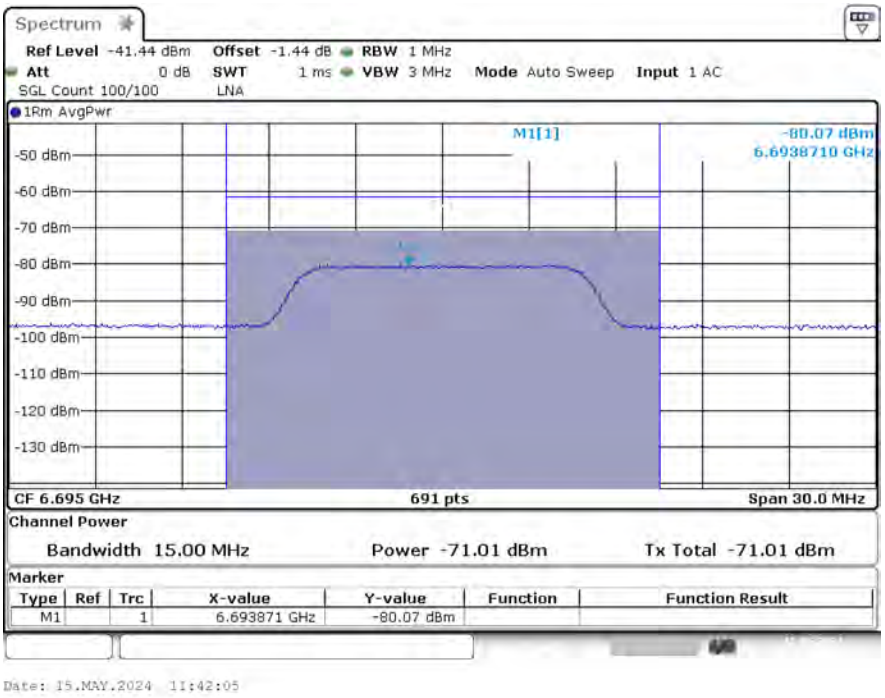
Incumbent signal (AWGN) Plot
Bandwidth: 20MHz
Frequency (MHz): 6215 MHz



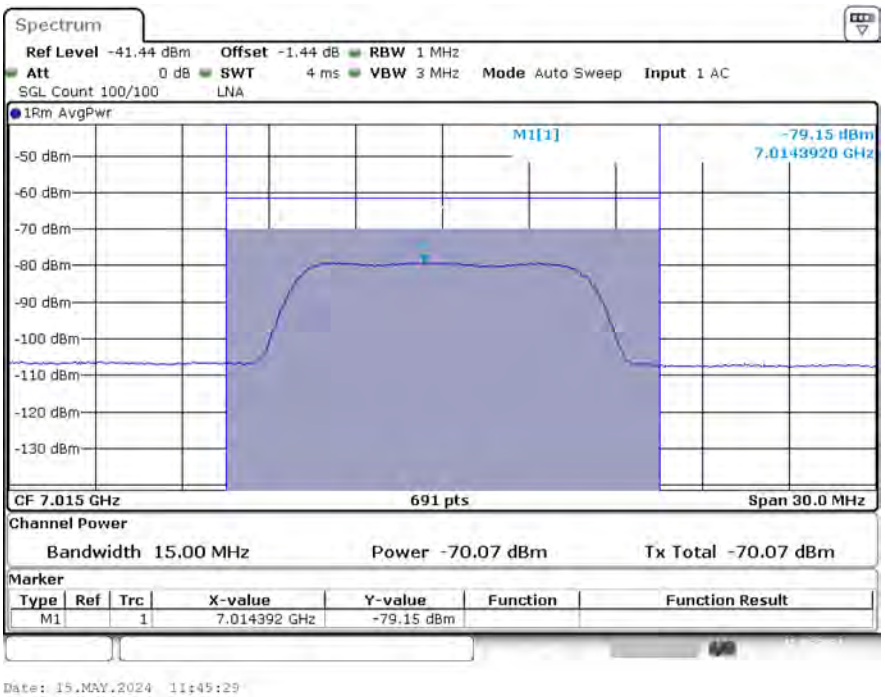
Frequency (MHz): 6455 MHz



Frequency (MHz): 6695 MHz

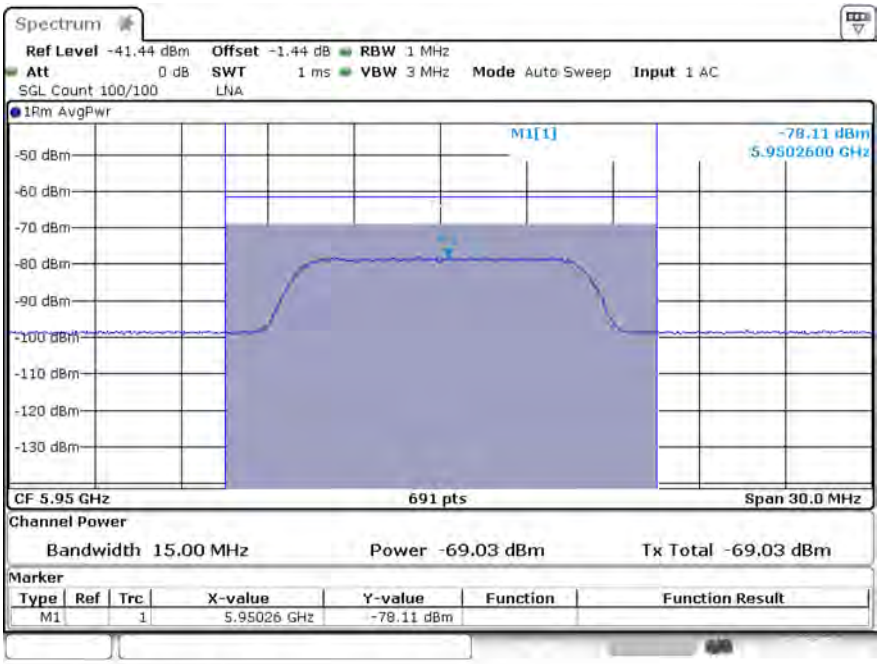


Frequency (MHz): 7015 MHz

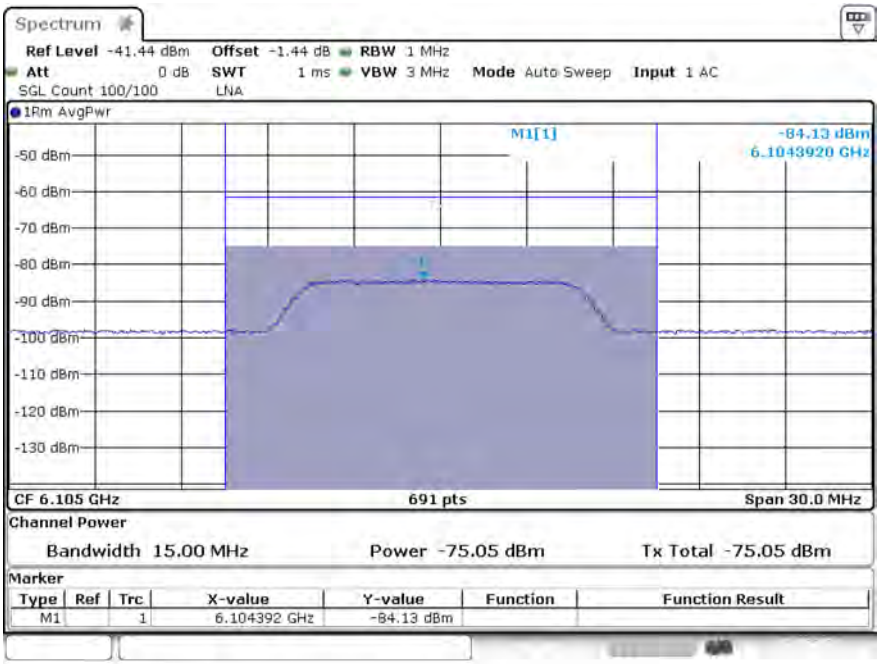


Bandwidth: 320MHz

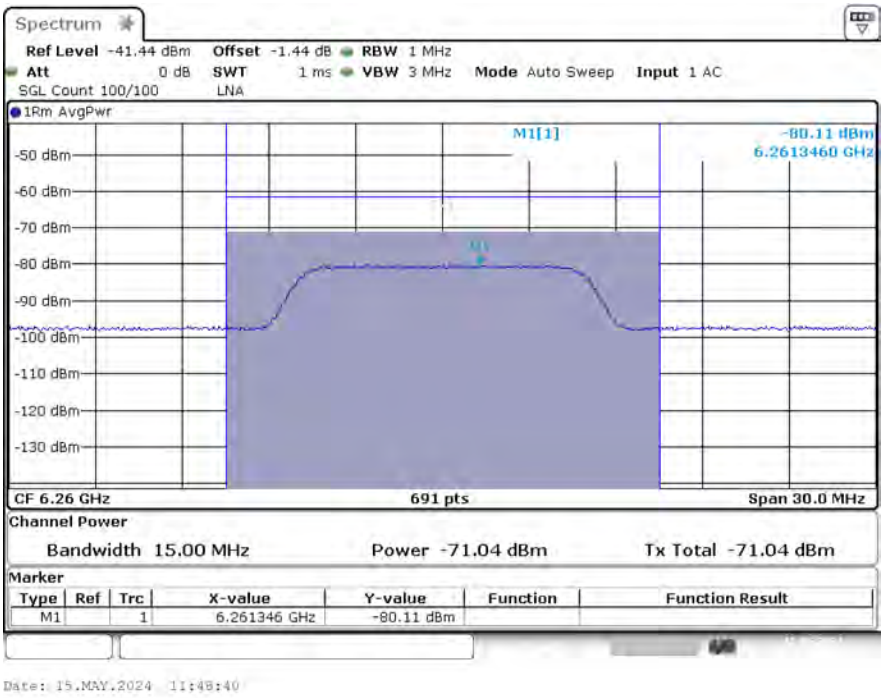
Frequency (MHz): 5950 MHz



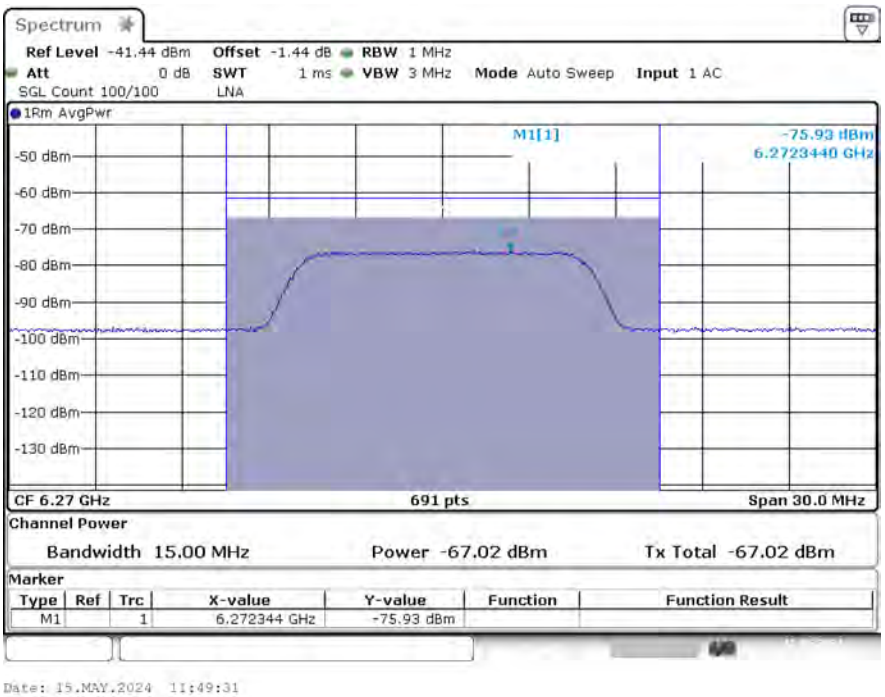
Frequency (MHz): 6105 MHz



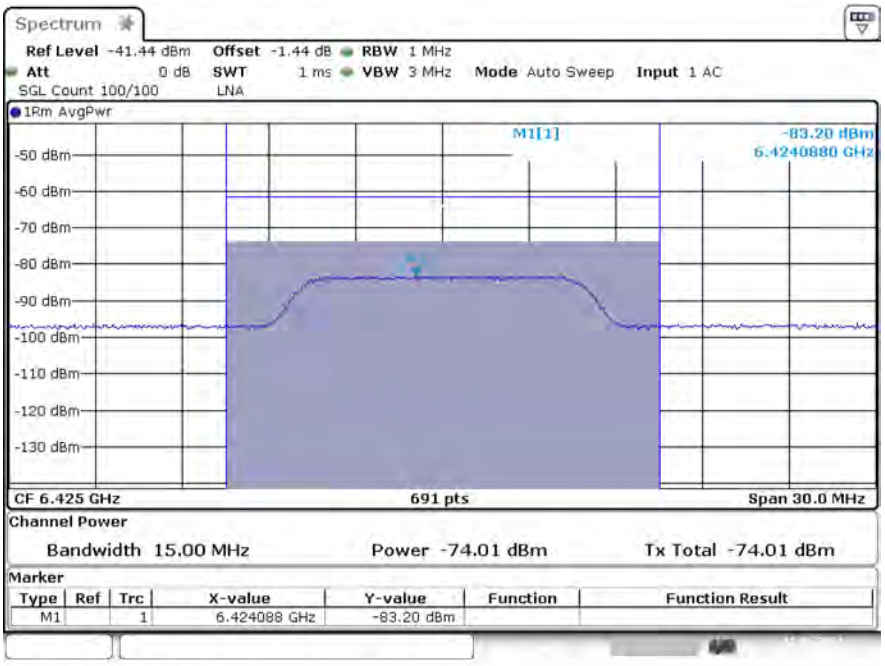
Frequency (MHz): 6260 MHz



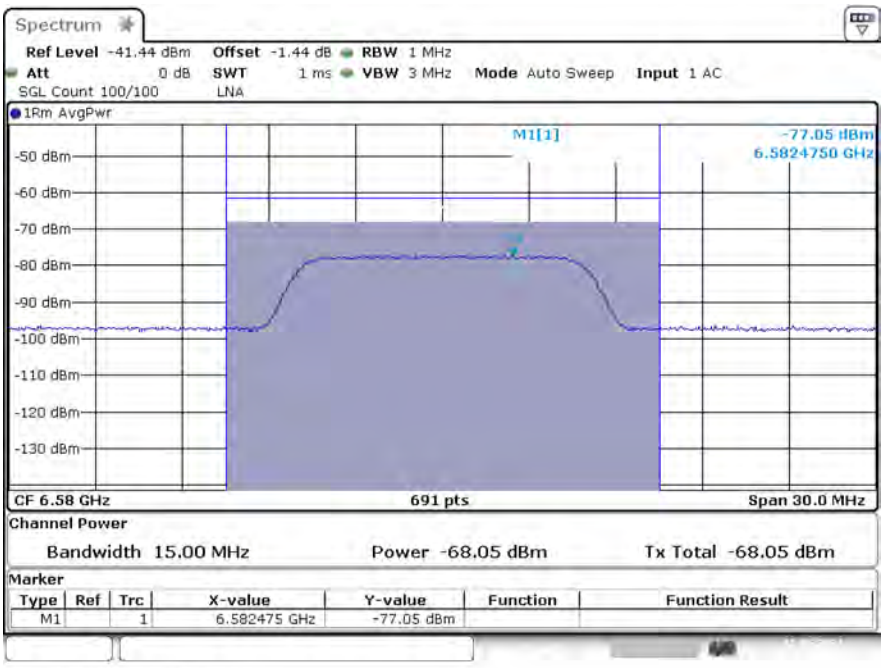
Frequency (MHz): 6270 MHz



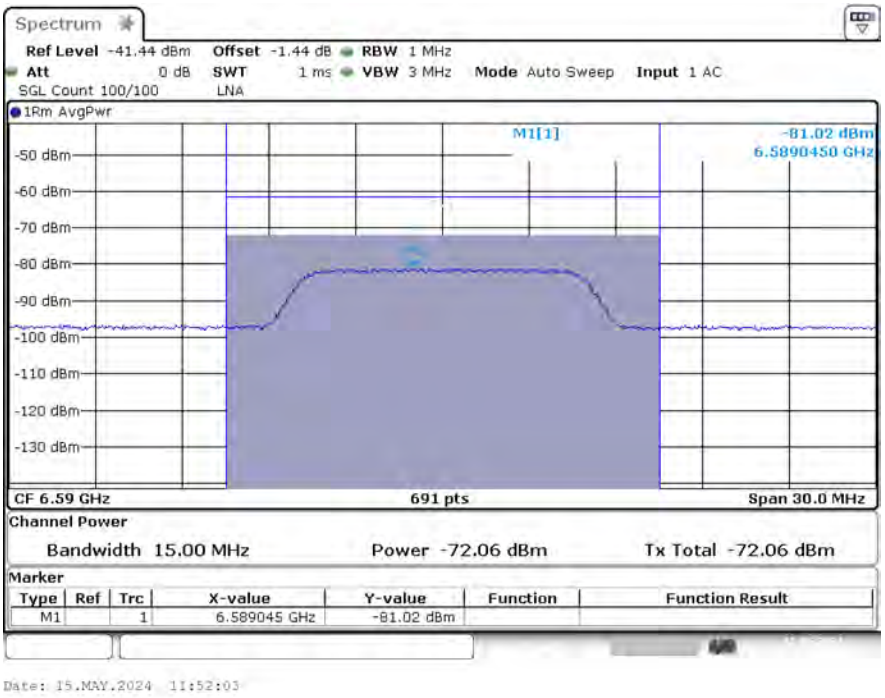
Frequency (MHz): 6425 MHz



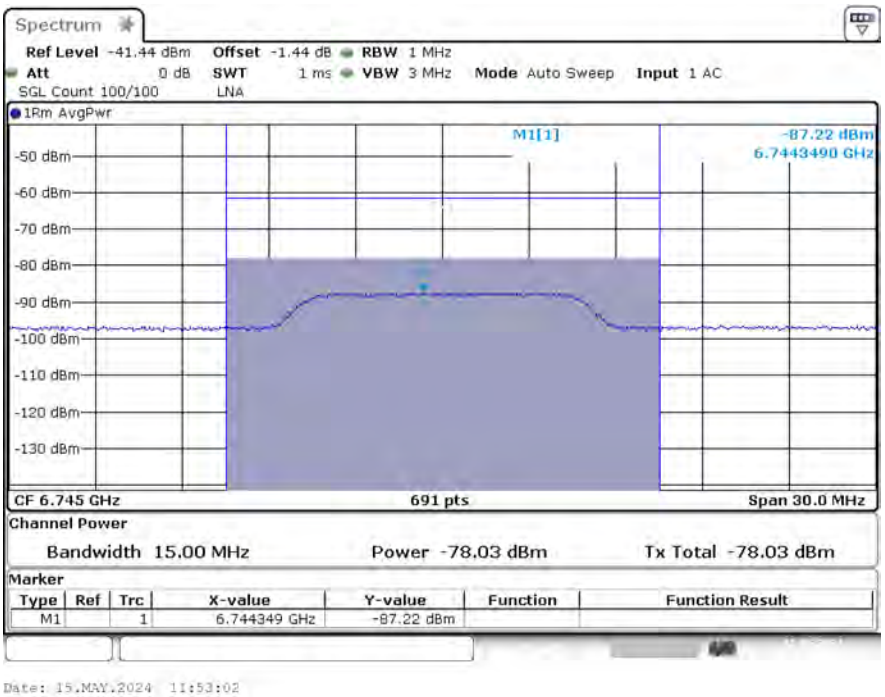
Frequency (MHz): 6580 MHz



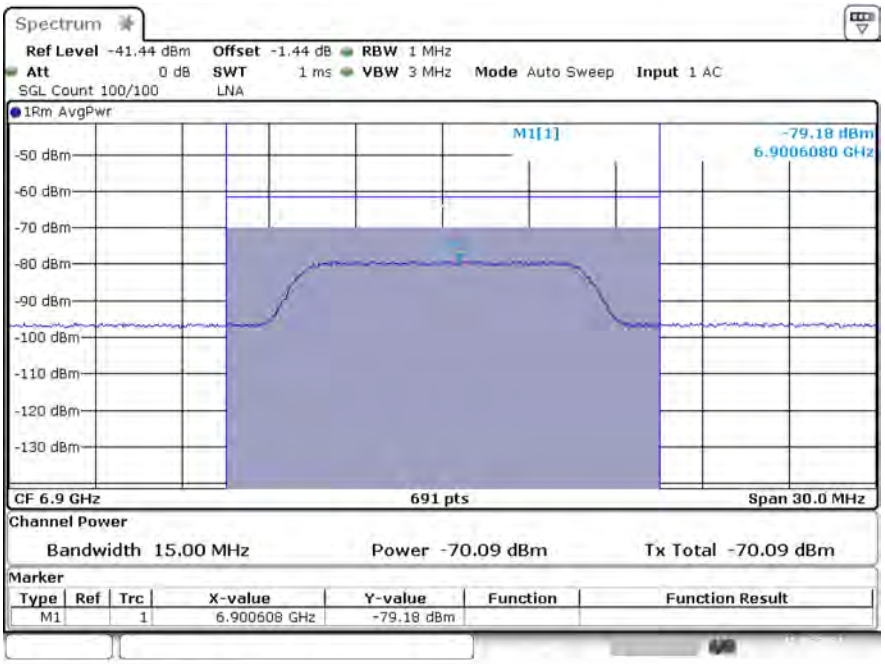
Frequency (MHz): 6590 MHz



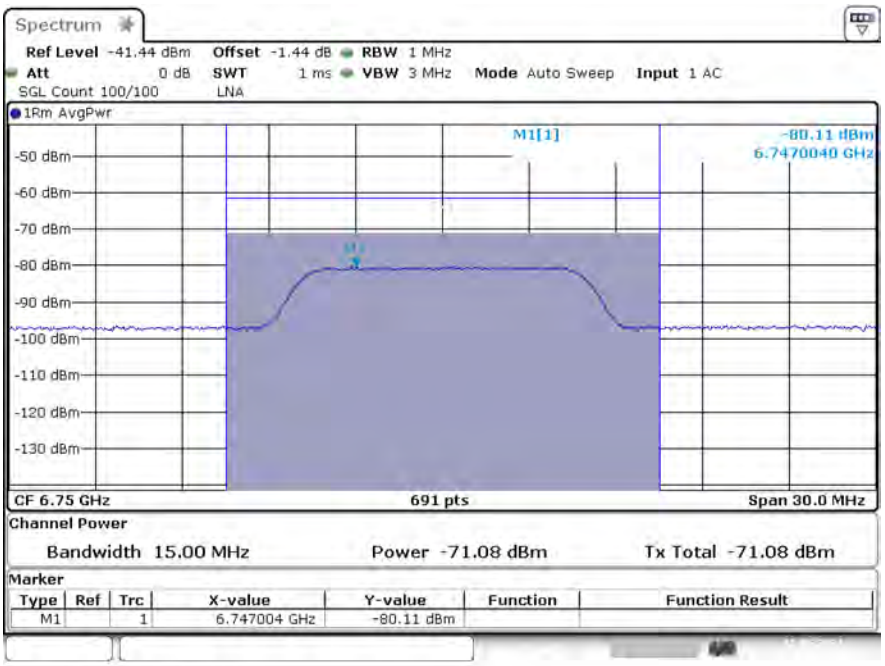
Frequency (MHz): 6745 MHz



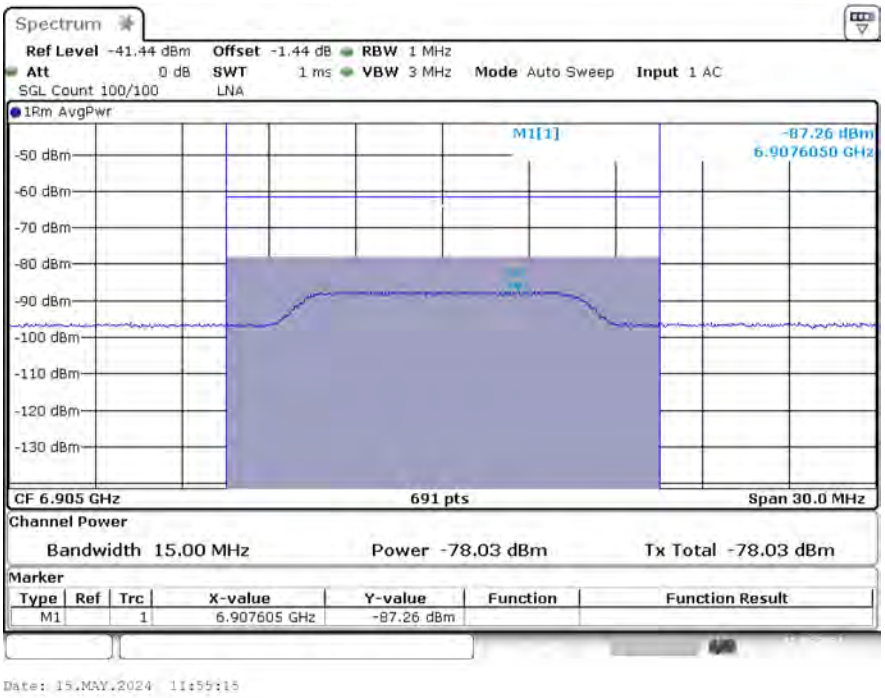
Frequency (MHz): 6900 MHz



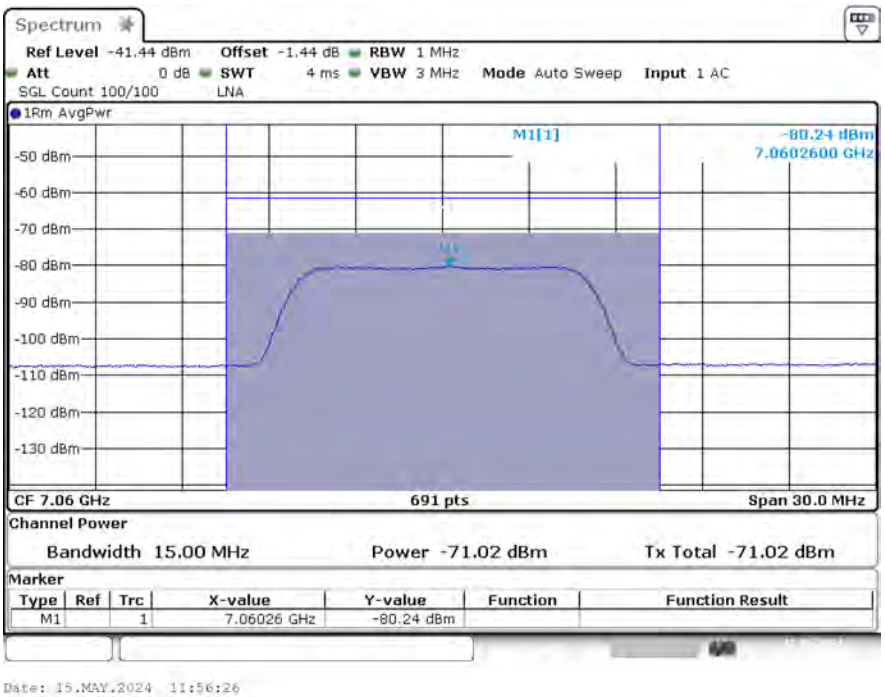
Frequency (MHz): 6750 MHz



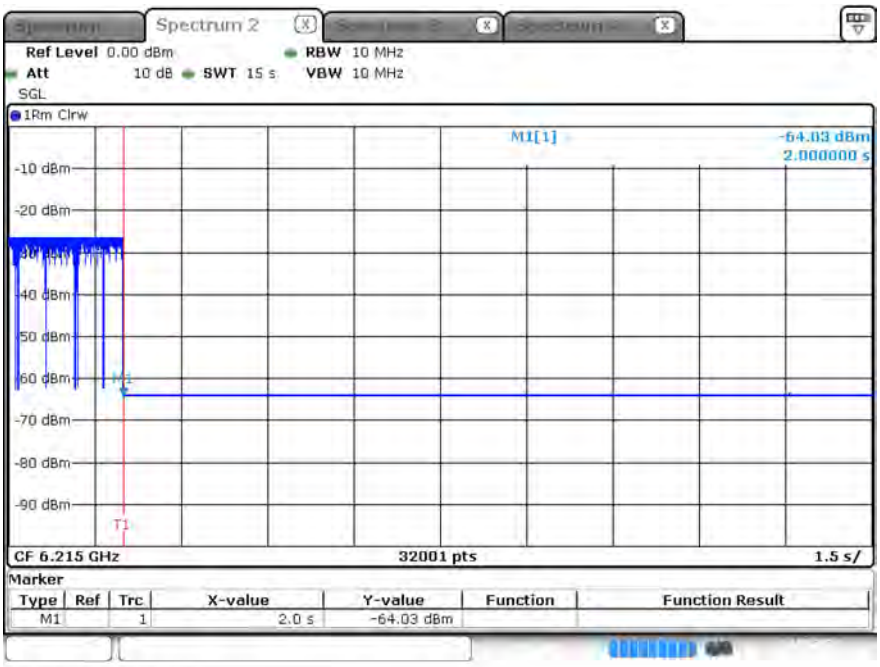
Frequency (MHz): 6905 MHz



Frequency (MHz): 7060 MHz

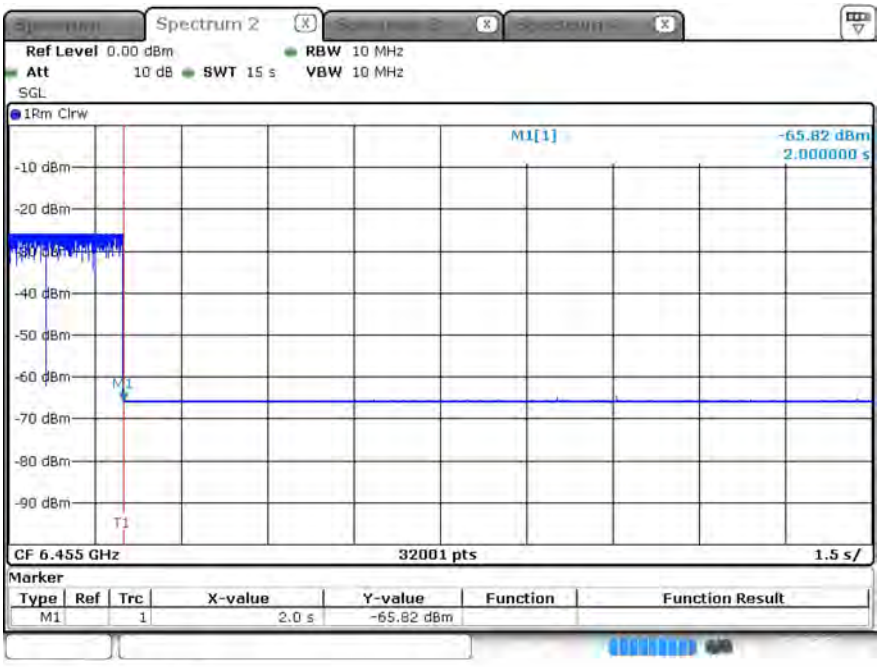


Contention-Based Protocol Plot
Bandwidth: 20MHz
Test CH 53 ; Incumbent signal 6215 MHz



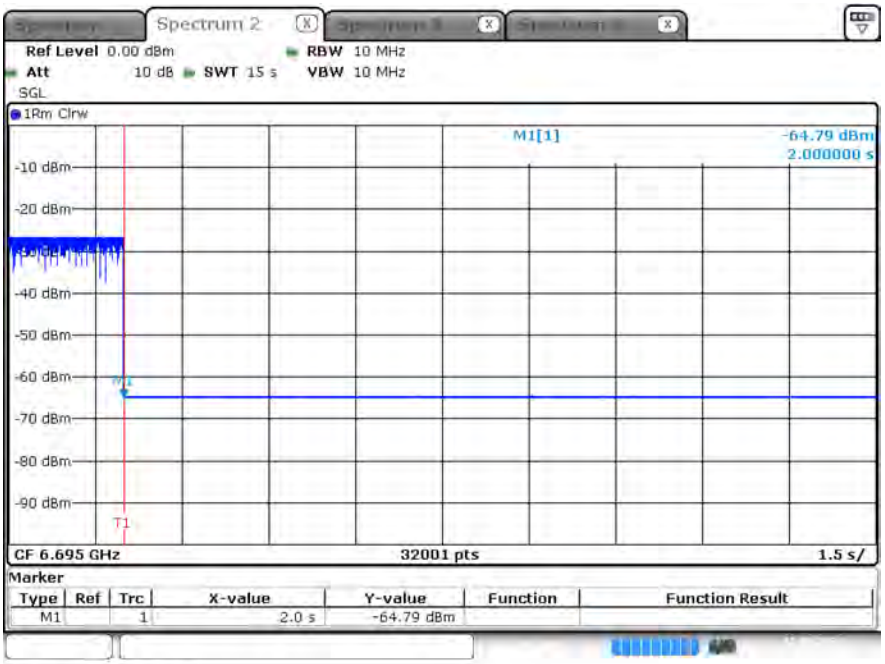
Note : M1 : Inject AWGN signal

Test CH 101 ; Incumbent signal 6455 MHz



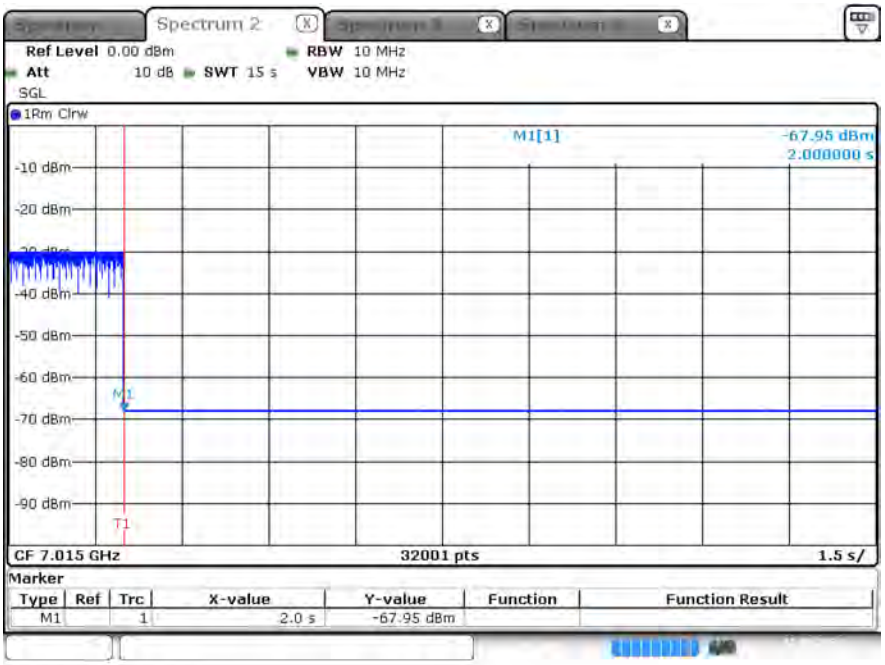
Note : M1 : Inject AWGN signal

Test CH 149 ; Incumbent signal 6695 MHz



Note : M1 : Inject AWGN signal

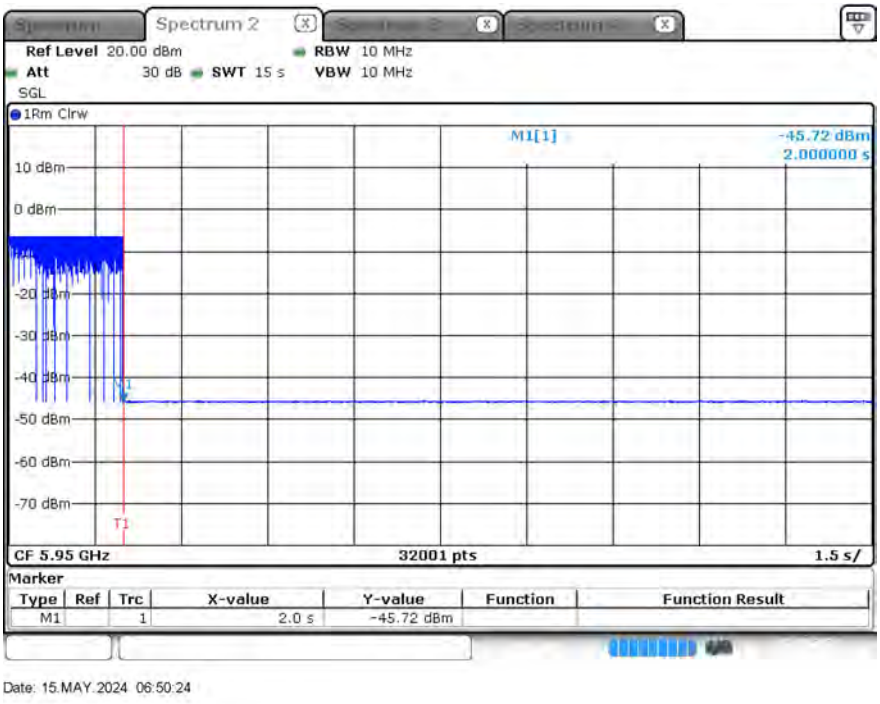
Test CH 213 ; Incumbent signal 7015 MHz



Note : M1 : Inject AWGN signal

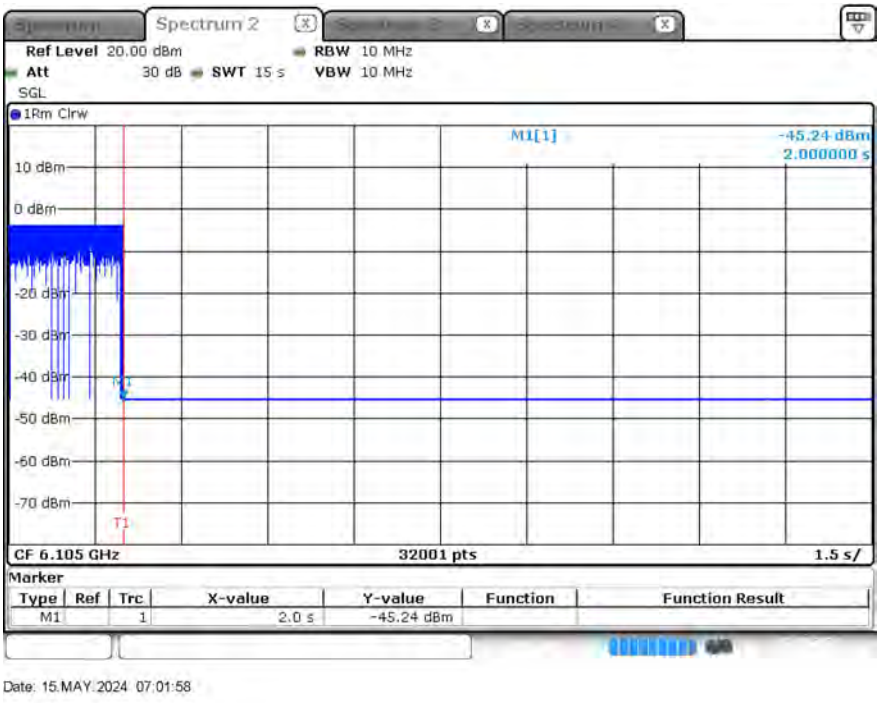
Bandwidth: 320MHz

Test CH 31 ; Incumbent signal 5950 MHz



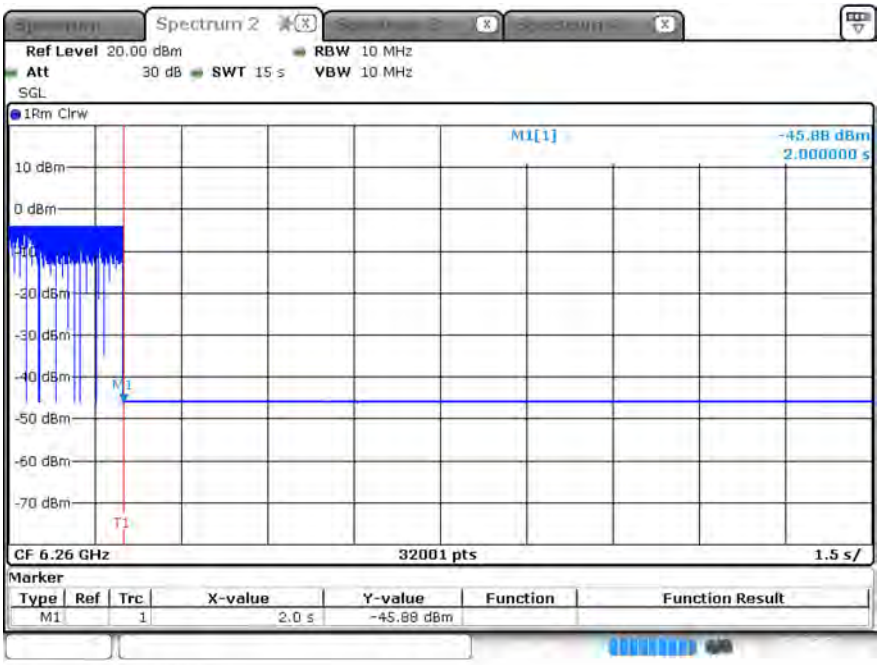
Note : M1 : Inject AWGN signal

Test CH 31 ; Incumbent signal 6105 MHz



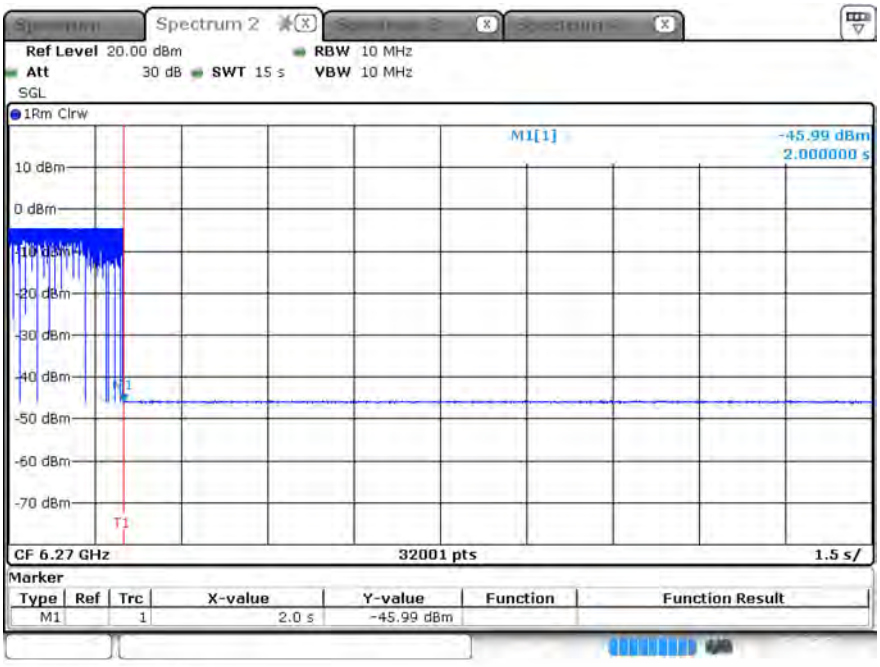
Note : M1 : Inject AWGN signal

Test CH 31 ; Incumbent signal 6260 MHz



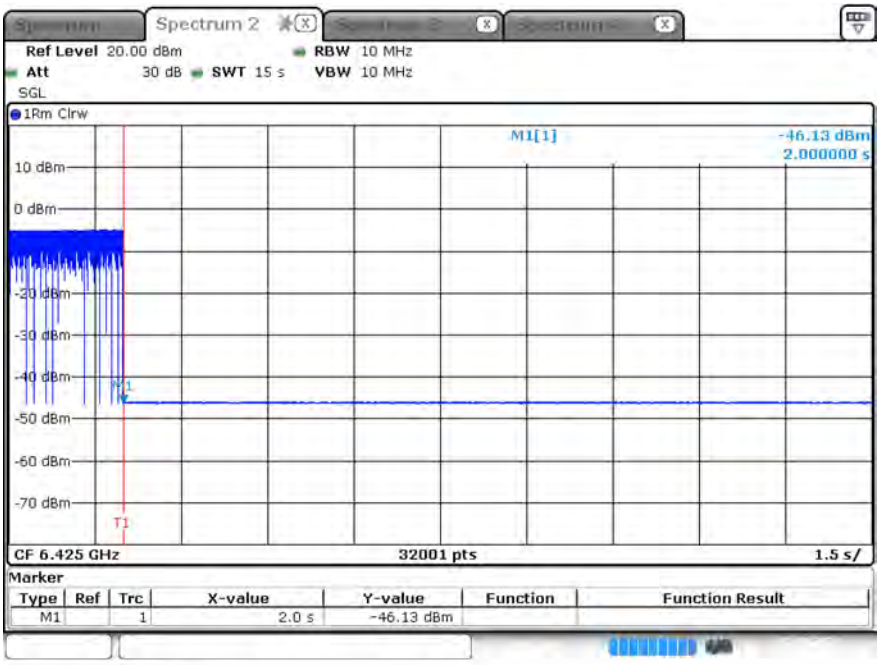
Note : M1 : Inject AWGN signal

Test CH 95 ; Incumbent signal 6270 MHz



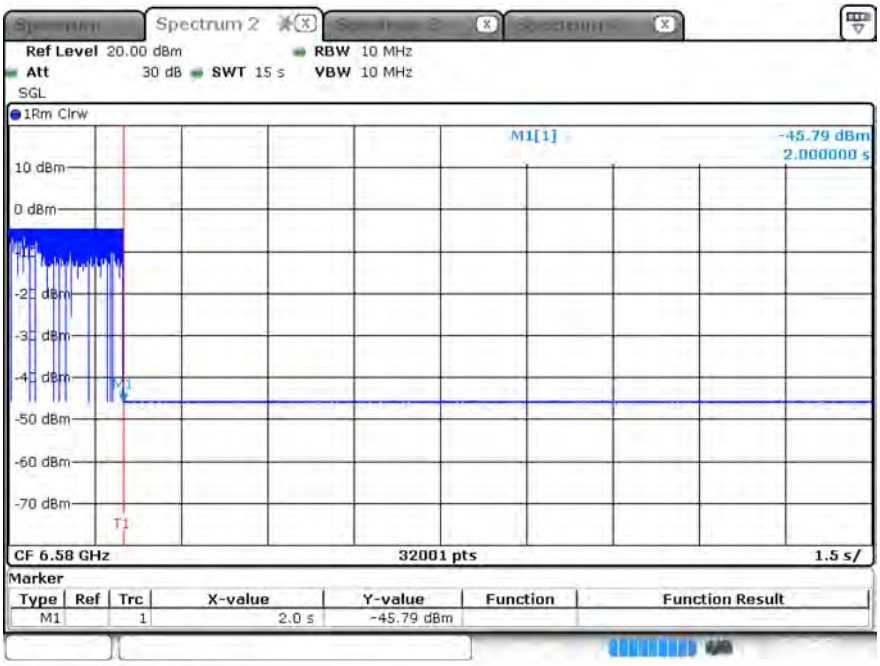
Note : M1 : Inject AWGN signal

Test CH 95 ; Incumbent signal 6425 MHz



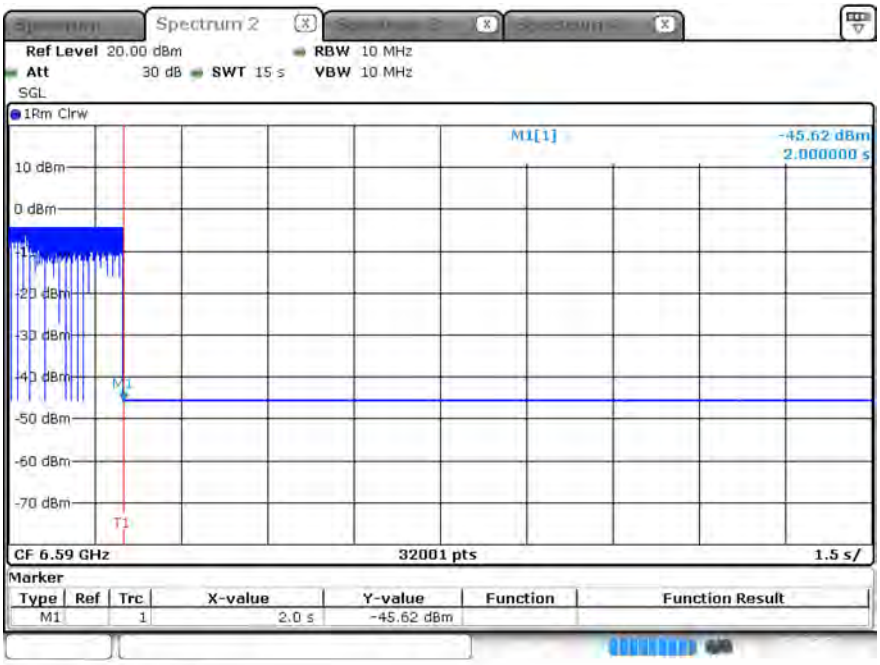
Note : M1 : Inject AWGN signal

Test CH 95 ; Incumbent signal 6580 MHz



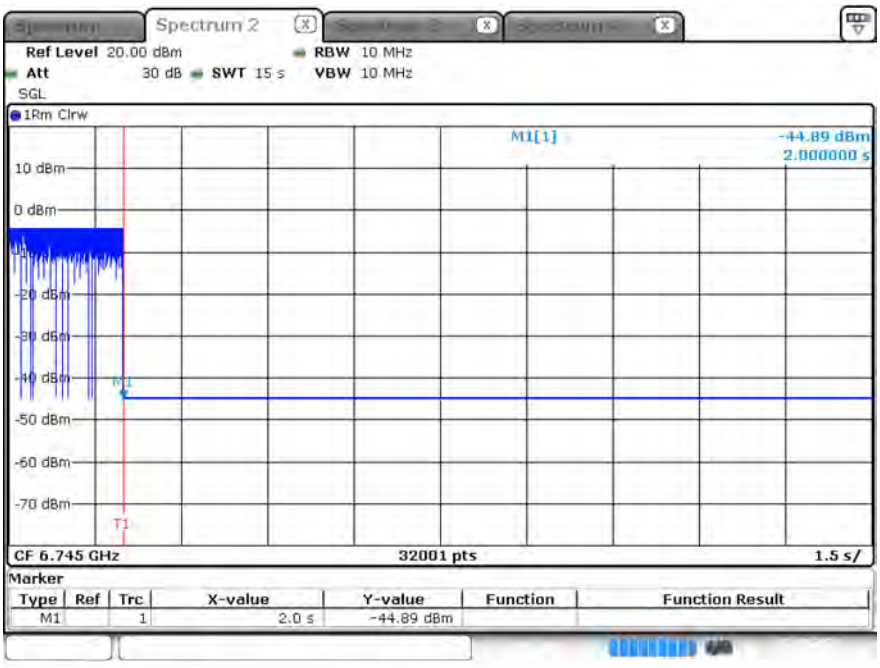
Note : M1 : Inject AWGN signal

Test CH 159 ; Incumbent signal 6590 MHz



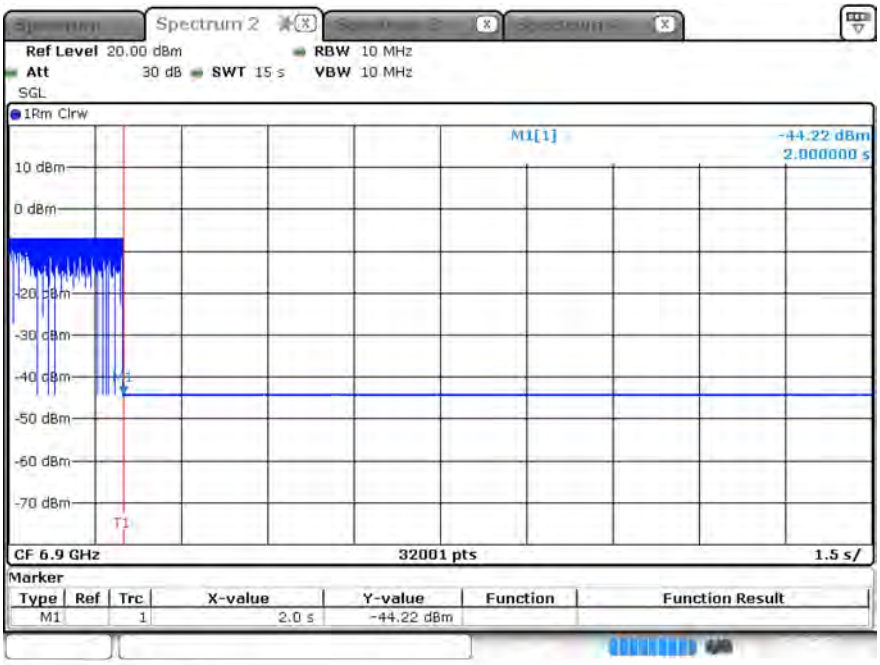
Note : M1 : Inject AWGN signal

Test CH 159 ; Incumbent signal 6745 MHz



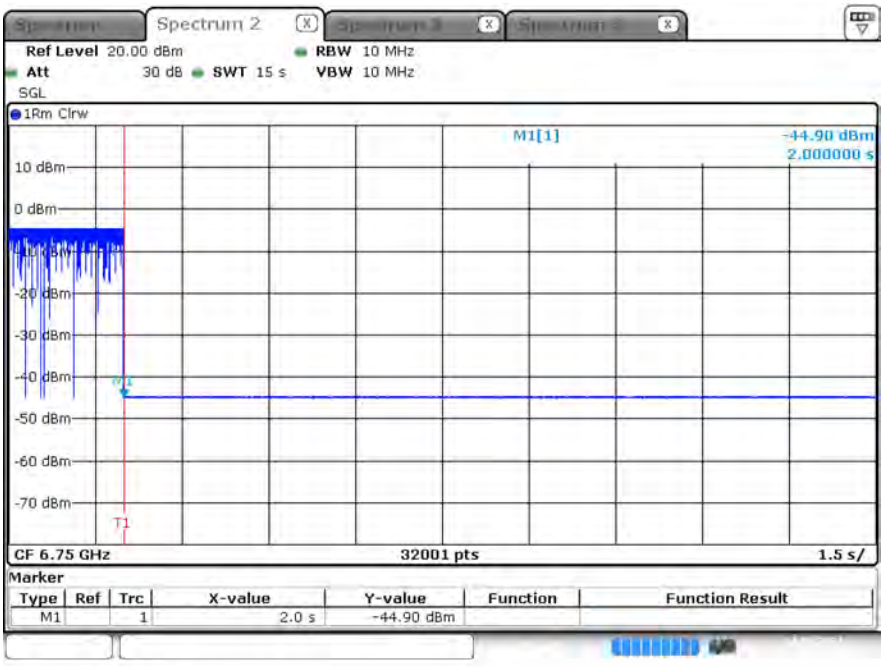
Note : M1 : Inject AWGN signal

Test CH 159 ; Incumbent signal 6900 MHz



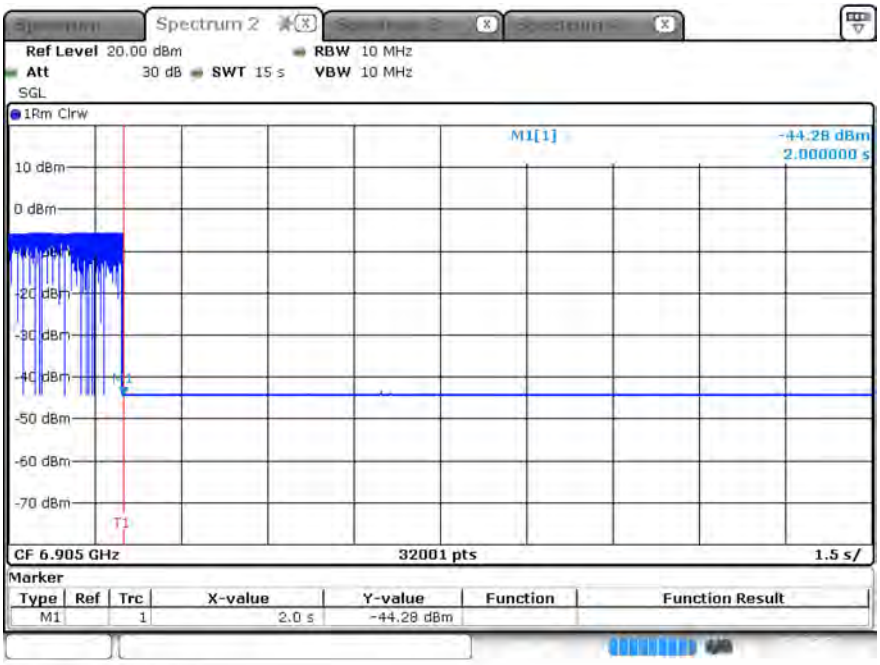
Note : M1 : Inject AWGN signal

Test CH 191 ; Incumbent signal 6750 MHz



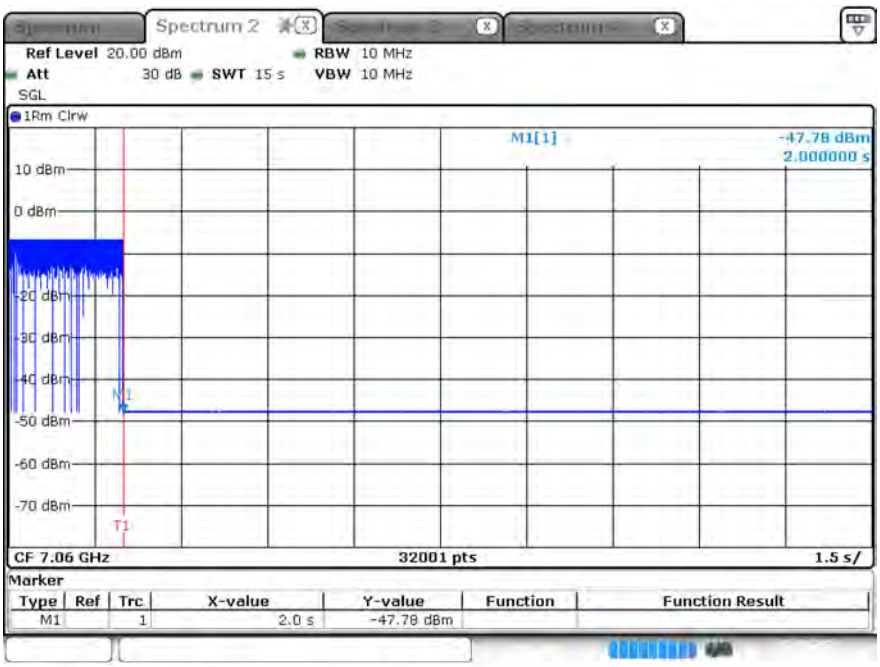
Note : M1 : Inject AWGN signal

Test CH 191 ; Incumbent signal 6905 MHz



Note : M1 : Inject AWGN signal

Test CH 191 ; Incumbent signal 7060 MHz



Note : M1 : Inject AWGN signal