



**CFR 47 FCC PART 15 SUBPART E
ISED RSS-247 ISSUE 2**

CERTIFICATION TEST REPORT

For

Integrated video conference terminal

Model for Canada:	UC S10
Model for USA:	UC S10, MSA10, MSA11, MSA12, MSA13, MSA14, MSA15, MSA16, MSA17, MSA18, MSA19, MS10, MS11, MS12, MS13, MS14, MS15, MS16, MS17, MS18, MS19, UC S11, UC S12, UC S13, UC S14, UC S15, UC S16, UC S17, UC S18, UC S19

**FCC ID: 2AFG6-UCS10
IC: 22166-UCS10**

REPORT NUMBER: 4789531252-4

ISSUE DATE: July 22, 2020

Prepared for

**GUANGZHOU SHIRUI ELECTRONICS CO LTD
NO. 192 KEZHU ROAD SCIENCE PARK ECONOMIC-TECHNOLOGICAL
DEVELOPMENT AREA GUANGZHOU GUANGDONG 510530 CHINA**

Prepared by

UL Verification Services (Guangzhou) Co., Ltd, Song Shan Lake Branch

Building 10, Innovation Technology Park, No. 1, Li Bin Road, Song Shan Lake Hi-Tech Development Zone Dongguan, 523808, People's Republic of China

**Tel: +86 769 22038881
Fax: +86 769 33244054
Website: www.ul.com**

The results reported herein have been performed in accordance with the laboratory's terms of accreditation. This report shall not be reproduced except in full without the written approval of the Laboratory. The results in this report apply to the test sample(s) mentioned above at the time of the testing period only and are not to be used to indicate applicability to other similar products. This report does not imply that the product(s) has met the criteria for certification.



Revision History

Rev.	Issue Date	Revisions	Revised By
V0	07/22/2020	Initial Issue	



Summary of Test Results			
Clause	Test Items	FCC/IC Rules	Test Results
1	6dB/26dB Bandwidth	FCC 15.407 (a)&(e) RSS-247 Clause 6.2	PASS
2	99% Occupied Bandwidth	RSS-Gen Clause 6.7	PASS
3	Maximum Conducted Output Power	FCC 15.407 (a) RSS-247 Clause 6.2	PASS
4	Power Spectral Density	FCC 15.407 (a) RSS-247 Clause 6.2	PASS
5	Radiated Bandedge and Spurious Emission	FCC 15.407 (b) FCC 15.209 FCC 15.205 RSS-247 Clause 6.2 RSS-GEN Clause 8.9	PASS
6	Conducted Emission Test for AC Power Port	FCC 15.207 RSS-GEN Clause 8.8	PASS
7	Frequency Stability	FCC 15.407 (g)	PASS
8	Antenna Requirement	FCC 15.203 RSS-GEN Clause 6.8	PASS
Note: 1. This test report is only published to and used by the applicant, and it is not for evidence purpose in China. 2. The measurement result for the sample received is <Pass> according to < CFR 47 FCC PART 15 SUBPART C >> ISSED RSS-247 > when <Accuracy Method> decision rule is applied.			



TABLE OF CONTENTS

1. ATTESTATION OF TEST RESULTS	6
2. TEST METHODOLOGY	7
3. FACILITIES AND ACCREDITATION	7
4. CALIBRATION AND UNCERTAINTY	8
4.1. MEASURING INSTRUMENT CALIBRATION	8
4.2. MEASUREMENT UNCERTAINTY	8
5. EQUIPMENT UNDER TEST	9
5.1. DESCRIPTION OF EUT	9
5.2. MAXIMUM OUTPUT POWER	10
5.3. CHANNEL LIST	10
5.4. TEST CHANNEL CONFIGURATION	11
5.5. DESCRIPTION OF AVAILABLE ANTENNAS	12
5.6. THE WORSE CASE POWER SETTING PARAMETER	13
5.7. THE WORSE CASE CONFIGURATIONS	14
5.8. DESCRIPTION OF TEST SETUP	15
6. MEASURING INSTRUMENT AND SOFTWARE USED	16
7. ANTENNA PORT TEST RESULTS	18
7.1. ON TIME AND DUTY CYCLE	18
7.2. 6/26 EMISSION BANDWIDTH AND 99% OCCUPIED BANDWIDTH	19
7.3. CONDUCTED OUTPUT POWER	21
7.4. POWER SPECTRAL DENSITY	23
8. RADIATED TEST RESULTS	25
8.1. 802.11a20 MODE	32
8.1.1. UNII-1 BAND	32
8.1.2. UNII-3 BAND	48
8.2. 802.11ac VHT20 MODE	64
8.2.1. UNII-1 BAND	64
8.2.2. UNII-3 BAND	80
8.3. 802.11ac VHT40 MODE	96
8.3.1. UNII-1 BAND	96
8.3.2. UNII-3 BAND	108
8.4. 802.11ac VHT80 MODE	120
8.4.1. UNII-1 BAND	120
8.4.2. UNII-3 BAND	128
8.5. SPURIOUS EMISSIONS (18GHz ~ 26GHz)	134



8.5.1.	802.11a20 MODE.....	134
8.6.	SPURIOUS EMISSIONS (26GHz ~ 40GHz)	136
8.6.1.	802.11a20 MODE.....	136
8.7.	SPURIOUS EMISSIONS (30MHz ~ 1 GHz).....	138
8.7.1.	802.11a20 MODE.....	138
8.8.	SPURIOUS EMISSIONS BELOW 30MHz	140
8.8.1.	802.11a20 MODE.....	140
9.	AC POWER LINE CONDUCTED EMISSIONS.....	143
9.1.	802.11a20 MODE.....	144
10.	FREQUENCY STABILITY	146
11.	ANTENNA REQUIREMENTS.....	148
11.1.	Appendix A1: Emission Bandwidth	149
11.1.1.	Test Result.....	149
11.1.2.	Test Graphs	150
11.2.	Appendix A2: Occupied channel bandwidth	164
11.2.1.	Test Result.....	164
11.2.2.	Test Graphs	165
11.3.	Appendix A3: Min emission bandwidth	179
11.3.1.	Test Result.....	179
11.3.2.	Test Graphs	180
11.4.	Appendix B: Maximum conducted output power.....	185
11.4.1.	Test Result.....	185
11.5.	Appendix C: Maximum power spectral density	186
11.5.1.	Test Result.....	186
11.5.2.	Test Graphs	187
11.6.	Appendix D: Duty Cycle	196
11.6.1.	Test Result.....	196
11.6.2.	Test Graphs	197
11.7.	Appendix E: Frequency Stability	200
11.7.1.	Test Result.....	200



1. ATTESTATION OF TEST RESULTS

Applicant Information

Company Name: GUANGZHOU SHIRUI ELECTRONICS CO LTD
Address: NO. 192 KEZHU ROAD SCIENCE PARK ECONOMIC-TECHNOLOGICAL DEVELOPMENT AREA GUANGZHOU GUANGDONG 510530 CHINA

Manufacturer Information

Company Name: GUANGZHOU SHIRUI ELECTRONICS CO LTD
Address: NO. 192 KEZHU ROAD SCIENCE PARK ECONOMIC-TECHNOLOGICAL DEVELOPMENT AREA GUANGZHOU GUANGDONG 510530 CHINA

EUT Information

EUT Name: Integrated video conference terminal
Model for Canada: UC S10
Model for USA: Please refer to clause 5.1. Description of EUT
Sample Received Date: July 1, 2020
Sample Status: Normal
Sample ID: 3147330
Date of Tested: July 1 ~ 17, 2020

APPLICABLE STANDARDS	
STANDARD	TEST RESULTS
CFR 47 FCC PART 15 SUBPART E	PASS
ISED RSS-247 Issue 2	PASS
ISED RSS-GEN Issue 5	PASS

Prepared By:

Kebo Zhang
Project Engineer

Checked By:

Shawn Wen
Laboratory Leader

Approved By:

Stephen Guo
Laboratory Manager



2. TEST METHODOLOGY

The tests documented in this report were performed in accordance with ANSI C63.10-2013, CFR 47 FCC Part 2, CFR 47 FCC Part 15, KDB 789033 D02 v02r01, RSS-GEN Issue 5, RSS-247 Issue 2, KDB414788 D01 Radiated Test Site v01.

3. FACILITIES AND ACCREDITATION

Accreditation Certificate	A2LA (Certificate No.: 4102.01) UL Verification Services (Guangzhou) Co., Ltd. Song Shan Lake Branch. has been assessed and proved to be in compliance with A2LA. FCC (FCC Designation No.: CN1187) UL Verification Services (Guangzhou) Co., Ltd. Song Shan Lake Branch. Has been recognized to perform compliance testing on equipment subject to the Commission's Declaration of Conformity (DoC) and Certification rules ISED (Company No.: 21320) UL Verification Services (Guangzhou) Co., Ltd. Song Shan Lake Branch. has been registered and fully described in a report filed with ISED. The Company Number is 21320. VCCI (Registration No.: G-20019, R-20004, C-20012 and T-20011) UL Verification Services (Guangzhou) Co., Ltd. Song Shan Lake Branch. has been assessed and proved to be in compliance with VCCI, the Membership No. is 3793. Facility Name: Chamber D, the VCCI registration No. is G-20019 and R-20004 Shielding Room B, the VCCI registration No. is C-20012 and T-20011
---------------------------	--

Note 1: All tests measurement facilities use to collect the measurement data are located at Building 10, Innovation Technology Park, Song Shan Lake Hi tech Development Zone, Dongguan, 523808, China

Note 2: The test anechoic chamber in UL Verification Services (Guangzhou) Co., Ltd. Song Shan Lake Branch had been calibrated and compared to the open field sites and the test anechoic chamber is shown to be equivalent to or worst case from the open field site.

Note 3: For below 30MHz, lab had performed measurements at test anechoic chamber and comparing to measurements obtained on an open field site. And these measurements below 30MHz had been correlated to measurements performed on an OFS.



4. CALIBRATION AND UNCERTAINTY

4.1. MEASURING INSTRUMENT CALIBRATION

The measuring equipment utilized to perform the tests documented in this report has been calibrated in accordance with the manufacturer's recommendations and is traceable to recognize national standards.

4.2. MEASUREMENT UNCERTAINTY

Where relevant, the following measurement uncertainty levels have been estimated for tests performed on the apparatus:

Test Item	Uncertainty
Conduction Emission	3.62dB
Radiated Emission (Included Fundamental Emission) (9kHz ~ 30MHz)	2.2dB
Radiated Emission (Included Fundamental Emission) (30MHz ~ 1GHz)	4.00dB
Radiated Emission (Included Fundamental Emission) (1GHz to 40GHz)	5.78dB (1GHz ~ 18GHz)
	5.23dB (18GHz ~ 26GHz)
	5.64dB (26GHz-40GHz)
Note: This uncertainty represents an expanded uncertainty expressed at approximately the 95% confidence level using a coverage factor of k=2.	



5. EQUIPMENT UNDER TEST

5.1. DESCRIPTION OF EUT

EUT Name	Integrated video conference terminal
Model for Canada	UC S10
Model for USA	UC S10,MSA10, MSA11,MSA12,MSA13,MSA14,MSA15,MSA16,MSA17, MSA18,MSA19,MS10,MS11,MS12,MS13,MS14,MS15,MS16,MS17,MS18,M S19,UC S11,UC S12,UC S13,UC S14,UC S15,UC S16,UC S17,UC S18, UC S19
Model Difference	The only difference is the model name.
Radio Technology	WLAN (IEEE 802.11a 20/n HT20/n HT40/ac VHT20/VHT 40/VHT 80)
Operation frequency	UNII-1: 5150-5250 MHz UNII-3: 5725-5850 MHz
Modulation	IEEE 802.11a: OFDM (64QAM, 16QAM, QPSK, BPSK) IEEE 802.11n HT20: OFDM (64QAM, 16QAM, QPSK, BPSK) IEEE 802.11n HT40: OFDM (64QAM, 16QAM, QPSK, BPSK) IEEE 802.11ac VHT20: OFDM (256QAM, 64QAM, 16QAM, QPSK, BPSK) IEEE 802.11ac VHT40: OFDM (256QAM, 64QAM, 16QAM, QPSK, BPSK) IEEE 802.11ac VHT80: OFDM (256QAM, 64QAM, 16QAM, QPSK, BPSK)
Rated Input	AC120V,60Hz
Wireless Module	SKI.WB8821CU.1

5.2. MAXIMUM OUTPUT POWER

UNII-1 BAND

IEEE Std. 802.11	Frequency (MHz)	Maximum Average Conducted Power (dBm)	Max Average EIRP (dBm)
a 20	5150 ~ 5250	9.61	13.09
n HT20		7.57	11.05
n HT40		8.09	11.57
ac VHT20		8.10	11.58
ac VHT40		8.07	11.55
ac VHT80		8.73	12.21

UNII-3 BAND

IEEE Std. 802.11	Frequency (MHz)	Max Power (dBm)
a 20	5725 ~ 5850	11.00
n HT20		8.73
n HT40		9.57
ac VHT20		8.64
ac VHT40		10.00
ac VHT80		10.54

5.3. CHANNEL LIST

UNII-1 (For Bandwidth=20MHz)		UNII-1 (For Bandwidth=40MHz)		UNII-1 (For Bandwidth=80MHz)	
Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)
36	5180	38	5190	42	5210
40	5200	46	5230		
44	5220				
48	5240				

UNII-3		UNII-3		UNII-3	
Channel	Frequency (MHz)	Channel	Frequency (MHz)	Channel	Frequency (MHz)
149	5745	151	5755	155	5775
153	5765	159	5795		
157	5785				
161	5805				
165	5825				



5.4. TEST CHANNEL CONFIGURATION

UNII-1 Test Channel Configuration		
IEEE Std.	Test Channel Number	Frequency
802.11a 20	CH 36(Low Channel), CH 40(MID Channel), CH 48(High Channel)	5180MHz, 5200MHz, 5240MHz
802.11n HT20	CH 36(Low Channel), CH 40(MID Channel), CH 48(High Channel)	5180MHz, 5200MHz, 5240MHz
802.11n HT40	CH 38(Low Channel), CH 46(High Channel)	5190MHz, 5230MHz
802.11ac HT20	CH 36(Low Channel), CH 40(MID Channel), CH 48(High Channel)	5180MHz, 5200MHz, 5240MHz
802.11ac HT40	CH 38(Low Channel), CH 46(High Channel)	5190MHz, 5230MHz
802.11ac HT80	CH 42(Low Channel)	5210MHz

UNII-3 Test Channel Configuration		
IEEE Std.	Test Channel Number	Frequency
802.11a 20	CH 149(Low Channel), CH 157(MID Channel), CH 165(High Channel)	5745MHz, 5785MHz, 5825MHz
802.11n HT20	CH 149(Low Channel), CH 157(MID Channel), CH 165(High Channel)	5745MHz, 5785MHz, 5825MHz
802.11n HT40	CH 151(Low Channel), CH 159(High Channel)	5755MHz, 5795MHz
802.11ac HT20	CH 149(Low Channel), CH 157(MID Channel), CH 165(High Channel)	5745MHz, 5785MHz, 5825MHz
802.11ac HT40	CH 151(Low Channel), CH 159(High Channel)	5755MHz, 5795MHz
802.11ac HT80	CH 155(Low Channel)	5775MHz



5.5. DESCRIPTION OF AVAILABLE ANTENNAS

Antenna No.	Frequency Band	Antenna Type	Max Antenna Gain (dBi)
2	UNII1	FPC	3.48
2	UNII3	FPC	2.32

Note: Antenna 2 only support WLAN5G, Antenna 1 only support WLAN2.4G.

Note: The value of the antenna gain was declared by customer.

IEEE Std. 802.11	Transmit and Receive Mode	Description
802.11a20	☒ 1TX, 1RX	ANT 2 can be used as transmitting/receiving antenna
802.11n HT20	☒ 1TX, 1RX	ANT 2 can be used as transmitting/receiving antenna
802.11n HT40	☒ 1TX, 1RX	ANT 2 can be used as transmitting/receiving antenna
802.11ac VHT20	☒ 1TX, 1RX	ANT 2 can be used as transmitting/receiving antenna
802.11ac VHT40	☒ 1TX, 1RX	ANT 2 can be used as transmitting/receiving antenna
802.11ac VHT80	☒ 1TX, 1RX	ANT 2 can be used as transmitting/receiving antenna

5.6. THE WORSE CASE POWER SETTING PARAMETER

The Worst Case Power Setting Parameter	
Test Software	Ampak RFTTestTool

UNII-1

IEEE Std. 802.11	Rate	Channel	Test Software Setting Value
			ANT2
a20	6M	36	default
		40	
		48	
n HT20	MCS0	36	
		40	
		48	
n HT40	MCS0	38	
		46	
ac VHT20	MCS0	36	
		40	
		48	
ac VHT40	MCS0	38	
		46	
ac VHT80	MCS0	42	

UNII-3

IEEE Std. 802.11	Rate	Channel	Soft set value
			ANT2
a20	6M	149	default
		157	
		165	
n HT20	MCS0	149	
		157	
		165	
n HT40	MCS0	151	
		159	
ac VHT20	MCS0	149	
		157	
		165	
ac VHT40	MCS0	151	
		159	
ac VHT80	MCS0	155	

5.7. THE WORSE CASE CONFIGURATIONS

The EUT was tested in the following configuration(s):

Controlled in test mode using a software application on the EUT supplied by customer. The application was used to enable a continuous transmission and to select the mode, test channels, bandwidth, data rates as required.

Test channels referring to section 5.4.

Maximum power setting referring to section 5.6.

Worst case Data Rates declared by the customer:

802.11a20 mode: 6 Mbps
802.11n HT20 mode: MCS0
802.11n HT40 mode: MCS0
802.11ac VHT20 mode: MCS0
802.11ac VHT40 mode: MCS0
802.11ac VHT80 mode: MCS0

Since 802.11ac VHT20/VHT40 mode are different from 802.11n HT20/HT40 only in control messages, so all the tests (except conducted output power and power spectral density) were performed on the worst case (802.11ac VHT20/802.11ac VHT40) mode between these 4 modes and only the worst data was recorded in this report.

The measured additional path loss was included in any path loss calculations for all RF cable used during tested.

Note: The EUT have two wireless modules, one is called module SKI.WB7668U.1 and the other one called module SKI.WB8821CU.1.

Condition	Technology		Support (YES/NO)
1 (Module SKI.WB7668U.1)	WLAN(2.4G)	WLAN(5G)	NO
2 (Module SKI.WB8821CU.1)	WLAN(2.4G)	WLAN(5G)	NO

Co-Location condition.

Condition	Technology (Module SKI.WB7668U.1)	Technology (Module SKI.WB8821CU.1)	Support (YES/NO)
1	WLAN (2.4G)	WLAN (2.4G)	YES
2	WLAN (5G)	WLAN (5G)	YES
3	WLAN (2.4G)	WLAN (5G)	YES
4	WLAN (5G)	WLAN (2.4G)	YES

For the Co-Location test result please refer to test report 4789531252-18.



5.8. DESCRIPTION OF TEST SETUP

SUPPORT EQUIPMENT

Item	Equipment	Brand Name	Model Name	Remarks
1	Laptop	ThinkPad	TP00094A	/
2	AC adapter	Yealink	GQ36-120300-AU	Input: AC 100-240V, 50/60Hz 1.0A Output: DC 12V 3.0A
3	Monitor	DELL	P2715Qt	27 inch
4	Mouse	Lenovo	NO28UKB	/
4	USB TO UART	/	/	/
5	Earphone	Apple	/	/
6	RJ45 Terminal load	Adafruit	485-4511	/

I/O CABLES

Item	Port	Connector Type	Cable Type	Cable Length(m)	Remarks
1	USB	/	/	1	/
2	RJ45	/	/	1	/
3	HDMI	/	/	1	/

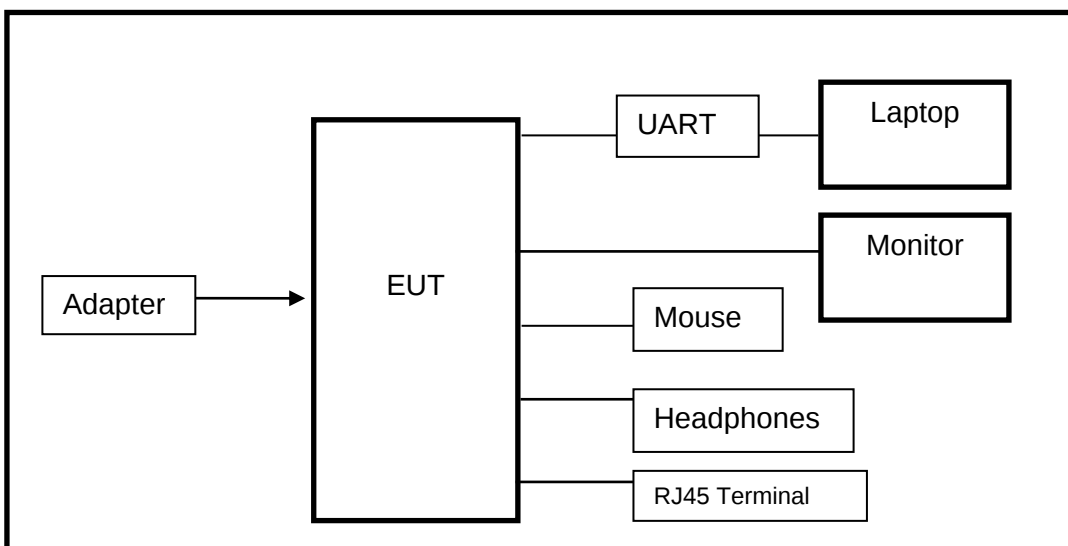
ACCESSORIES

Item	Accessory	Brand Name	Model Name	Description
1	/	/	/	/

TEST SETUP

The EUT can work in engineering mode with a software through a Laptop.

SETUP DIAGRAM FOR TESTS



**6. MEASURING INSTRUMENT AND SOFTWARE USED**

Conducted Emissions						
Instrument						
Used	Equipment	Manufactur er	Model No.	Serial No.	Last Cal.	Next Cal.
☒	EMI Test Receiver	R&S	ESR3	101961	Dec.05,2019	Dec.05,2020
☒	Two-Line V- Network	R&S	ENV216	101983	Dec.05,2019	Dec.05,2020
Software						
Used	Description			Manufacturer	Name	Version
☒	Test Software for Conducted disturbance			Farad	EZ-EMC	Ver. UL-3A1
Radiated Emissions						
Instrument						
Used	Equipment	Manufactur er	Model No.	Serial No.	Last Cal.	Next Cal.
☒	MXE EMI Receiver	KESIGHT	N9038A	MY56400 036	Dec.06,2019	Dec.06,2020
☒	Hybrid Log Periodic Antenna	TDK	HLP-3003C	130960	Sep.17, 2018	Sep.17, 2021
☒	Preamplifier	HP	8447D	2944A090 99	Dec.05,2019	Dec.05,2020
☒	EMI Measurement Receiver	R&S	ESR26	101377	Dec.05,2019	Dec.05,2020
☒	Horn Antenna	TDK	HRN-0118	130939	Sep.17, 2018	Sep.17, 2021
☒	High Gain Horn Antenna	Schwarzbe ck	BBHA-9170	691	Aug.11, 2018	Aug.11, 2021
☒	Preamplifier	TDK	PA-02-0118	TRS-305- 00066	Dec.05,2019	Dec.05,2020
☒	Preamplifier	TDK	PA-02-2	TRS-307- 00003	Dec.05,2019	Dec.05,2020
☒	Preamplifier	TDK	PA-02-3	TRS-308- 00002	Dec.05,2019	Dec.05,2020
☒	Loop antenna	Schwarzbe ck	1519B	00008	Jan.07, 2019	Jan.07, 2022
☒	Band Reject Filter	Wainwright	WRCJV12-5695- 5725-5850-5880- 40SS	4	Dec.05,2019	Dec.05,2020
☒	Band Reject Filter	Wainwright	WRCJV20-5120- 5150-5350-5380- 60SS	2	Dec.05,2019	Dec.05,2020
☒	High Pass Filter	Wainwright	WHKX10-5850- 6500-1800-40SS	4	Dec.05,2019	Dec.05,2020



Software						
Used	Description		Manufacturer	Name		Version
☒	Test Software for Radiated disturbance		Farad	EZ-EMC		Ver. UL-3A1
Other instruments						
Used	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
☒	Spectrum Analyzer	Keysight	N9030A	MY55410512	Dec.06,2019	Dec.06,2020
☒	Power sensor, Power Meter	R&S	OSP120	100921	Dec.06,2019	Dec.06,2020
☒	Temperature & Humidity Chamber	SANMOOD	SG-80-CC-2	2088	Dec.06,2019	Dec.06,2020
☒	DC power supply	Array	3662A	A1512015	Dec.05,2019	Dec.05,2020



7. ANTENNA PORT TEST RESULTS

7.1. ON TIME AND DUTY CYCLE

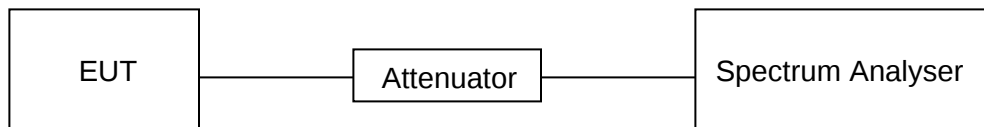
LIMITS

None; for reporting purposes only.

PROCEDURE

Refer to KDB 789033 D02 General U-NII Test Procedures New Rules v02r01 section II.B.

TEST SETUP



TEST ENVIRONMENT

Temperature	26.3°C	Relative Humidity	60.1%
Atmosphere Pressure	101kPa	Test Voltage	AC120V,60Hz

RESULTS

Please refer to appendix D.



7.2. 6/26 EMISSION BANDWIDTH AND 99% OCCUPIED BANDWIDTH

LIMITS

CFR 47 FCC Part15, Subpart E ISED RSS-247 ISSUE 2		
Test Item	Limit	Frequency Range (MHz)
26 dB Emission Bandwidth	For reporting purposes only.	5150 ~ 5250
6dB Emission Bandwidth	The minimum 6 dB emission bandwidth shall be 500 kHz.	5725 ~ 5850
99% Occupied Bandwidth	For reporting purposes only.	5150 ~ 5825 (For ISSED)

TEST PROCEDURE

Refer to KDB 789033 D02 General U-NII Test Procedures New Rules v02r01 section II.C1. for 26dB Emission Bandwidth; section II.C2. for 6 dB Emission Bandwidth; section II.D. for 99% Occupied Bandwidth.

Connect the EUT to the spectrum analyser and use the following settings:

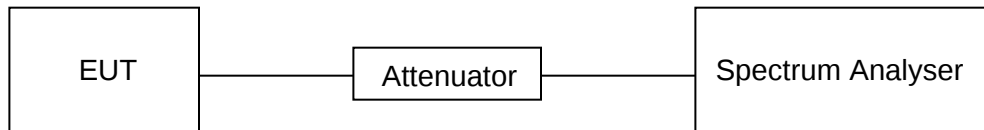
Center Frequency	The center frequency of the channel under test
Detector	Peak
RBW	For 6dB Emission Bandwidth: RBW=100kHz For 26dB Emission bandwidth: approximately 1% of the EBW. For 99% Occupied Bandwidth: approximately 1% ~ 5% of the OBW.
VBW	For 6dB Bandwidth: $\geq 3 \times \text{RBW}$ For 26dB Bandwidth: approximately three times RBW For 99% Bandwidth: $> 3 \times \text{RBW}$
Trace	Max hold
Sweep	Auto couple

a) Use the 99% power bandwidth function of the instrument, allow the trace to stabilize and report the measured bandwidth.

b) Allow the trace to stabilize and measure the maximum width of the emission that is constrained by the frequencies associated with the two outermost amplitude points (upper and lower frequencies) that are attenuated by 6/26 dB relative to the maximum level measured in the fundamental emission.



TEST SETUP



TEST ENVIRONMENT

Temperature	26.3°C	Relative Humidity	60.1%
Atmosphere Pressure	101kPa	Test Voltage	AC120V,60Hz

RESULTS

Please refer to Appendix A1&A2&A3.



7.3. CONDUCTED OUTPUT POWER

LIMITS

CFR 47 FCC Part15, Subpart E		
Test Item	Limit	Frequency Range (MHz)
Conducted Output Power	☐ Outdoor Access Point: 1W (30dBm) ☐ Indoor Access Point: 1W (30dBm) ☐ Fixed Point-To-Point Access Points: 1W (30dBm) ☒ Client Devices: 250mW (24dBm)	5150 ~ 5250
	Shall not exceed 1 Watt (30dBm).	5725 ~ 5850

ISED RSS-247 ISSUE 2		
Test Item	Limit	Frequency Range (MHz)
Conducted Output Power or e.i.r.p.	The maximum e.i.r.p. shall not exceed 200 mW (23dBm) or $10 + 10 \log_{10} B$, dBm, whichever power is less. B is the 99% emission bandwidth in megahertz.	5150 ~ 5250
	Shall not exceed 1 Watt (30dBm). The e.i.r.p. shall not exceed 4 W	5725 ~ 5850

Note:

The above limits are based upon the maximum antenna gain does not exceed 6 dBi.

If transmitting antennas of directional gain greater than 6 dBi are used, the maximum conducted output power shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.



TEST PROCEDURE

Refer to KDB 789033 D02 General U-NII Test Procedures New Rules v02r01 section II.E.

Method PM (Measurement using an RF average power meter):

(i) Measurements may be performed using a wideband RF power meter with a thermocouple detector or equivalent if all of the following conditions are satisfied:

a. The EUT is configured to transmit continuously or to transmit with a constant duty cycle.

b. At all times when the EUT is transmitting, it must be transmitting at its maximum power control level.

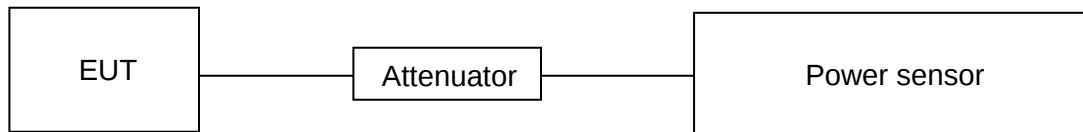
c. The integration period of the power meter exceeds the repetition period of the transmitted signal by at least a factor of five.

(ii) If the transmitter does not transmit continuously, measure the duty cycle, x , of the transmitter output signal as described in II.B.

(iii) Measure the average power of the transmitter. This measurement is an average over both the on and off periods of the transmitter.

(iv) Adjust the measurement in dBm by adding $10 \log (1/x)$ where x is the duty cycle (e.g., $10 \log (1/0.25)$ if the duty cycle is 25%).

TEST SETUP



TEST ENVIRONMENT

Temperature	26.3°C	Relative Humidity	60.1%
Atmosphere Pressure	101kPa	Test Voltage	AC120V,60Hz

RESULTS

Please refer to Appendix B.



7.4. POWER SPECTRAL DENSITY

LIMITS

CFR 47 FCC Part15, Subpart E		
Test Item	Limit	Frequency Range (MHz)
Power Spectral Density	☐ Outdoor Access Point: 17dBm/MHz ☐ Indoor Access Point: 17dBm/MHz ☐ Fixed Point-To-Point Access Points: 17dBm/MHz ☒ Client Devices: 11dBm/MHz	5150 ~ 5250
	30dBm/500kHz	5725 ~ 5850

ISED RSS-247 ISSUE 2		
Test Item	Limit	Frequency Range (MHz)
Power Spectral Density	The e.i.r.p. spectral density shall not exceed 10 dBm in any 1.0 MHz band.	5150 ~ 5250
	30dBm/500kHz	5725 ~ 5850

Note:

The above limits are based upon the maximum antenna gain does not exceed 6 dBi.

If transmitting antennas of directional gain greater than 6 dBi are used, maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.

TEST PROCEDURE

Refer to KDB 789033 D02 General U-NII Test Procedures New Rules v02r01 section II.F.



Connect the EUT to the spectrum analyser and use the following settings:

For U-NII-1:

Center Frequency	The center frequency of the channel under test
Detector	RMS
RBW	1MHz
VBW	$\geq 3 \times \text{RBW}$
Span	Encompass the entire emissions bandwidth (EBW) of the signal
Trace	Max hold
Sweep time	Auto

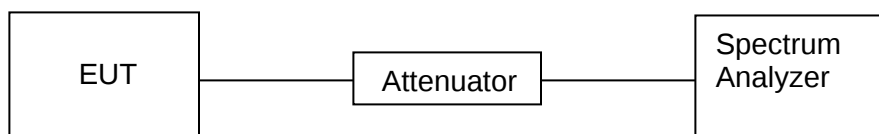
For U-NII-3:

Center Frequency	The center frequency of the channel under test
Detector	RMS
RBW	500kHz
VBW	$\geq 3 \times \text{RBW}$
Span	Encompass the entire emissions bandwidth (EBW) of the signal
Trace	Max hold
Sweep time	Auto

Allow trace to fully stabilize and Use the peak search function on the instrument to find the peak of the spectrum and record its value.

Add $10 \log(1/x)$, where x is the duty cycle, to the peak of the spectrum, the result is the Maximum PSD over 1 MHz/500kHz reference bandwidth.

TEST SETUP



TEST ENVIRONMENT

Temperature	26.3C	Relative Humidity	60.1%
Atmosphere Pressure	101kPa	Test Voltage	AC120V,60Hz

RESULTS

Please refer to Appendix C.



8. RADIATED TEST RESULTS

LIMITS

Refer to CFR 47 FCC §15.205, §15.209 and §15.407 (b).

Refer to ISED RSS-GEN Clause 8.9, Clause 8.10 and ISED RSS-247 6.2.

Radiation Disturbance Test Limit for FCC (Class B) (9kHz-1GHz)

Emissions radiated outside of the specified frequency bands above 30MHz			
Frequency Range (MHz)	Field Strength Limit ($\mu\text{V/m}$) at 3 m	Field Strength Limit (dBuV/m) at 3 m	
		Quasi-Peak	
30 - 88	100	40	
88 - 216	150	43.5	
216 - 960	200	46	
Above 960	500	54	
Above 1000	500	Peak	Average
		74	54

FCC Emissions radiated outside of the specified frequency bands below 30MHz		
Frequency (MHz)	Field strength (microvolts/meter)	Measurement distance (meters)
0.009-0.490	2400/F(kHz)	300
0.490-1.705	24000/F(kHz)	30
1.705-30.0	30	30

ISED General field strength limits at frequencies below 30 MHz

Table 6 – General field strength limits at frequencies below 30 MHz		
Frequency	Magnetic field strength (H-Field) ($\mu\text{A/m}$)	Measurement distance (m)
9 - 490 kHz ^{Note 1}	6.37/F (F in kHz)	300
490 - 1705 kHz	63.7/F (F in kHz)	30
1.705 - 30 MHz	0.08	30

Note 1: The emission limits for the ranges 9-90 kHz and 110-490 kHz are based on measurements employing a linear average detector.

ISED Restricted bands refer to ISED RSS-GEN Clause 8.10



Table 7 – Restricted frequency bands ^{Note 1}		
MHz	MHz	GHz
0.090 - 0.110	149.9 - 150.05	9.0 - 9.2
0.495 - 0.505	156.52475 - 156.52525	9.3 - 9.5
2.1735 - 2.1905	156.7 - 156.9	10.6 - 12.7
3.020 - 3.028	162.0125 - 167.17	13.25 - 13.4
4.125 - 4.128	167.72 - 173.2	14.47 - 14.5
4.17725 - 4.17775	240 - 285	15.35 - 16.2
4.20725 - 4.20775	322 - 335.4	17.7 - 21.4
5.677 - 5.683	399.9 - 410	22.01 - 23.12
6.215 - 6.218	608 - 614	23.6 - 24.0
6.26775 - 6.26825	960 - 1427	31.2 - 31.8
6.31175 - 6.31225	1435 - 1626.5	36.43 - 36.5
8.291 - 8.294	1645.5 - 1646.5	Above 38.6
8.362 - 8.366	1660 - 1710	
8.37625 - 8.38675	1718.8 - 1722.2	
8.41425 - 8.41475	2200 - 2300	
12.29 - 12.293	2310 - 2390	
12.51975 - 12.52025	2483.5 - 2500	
12.57675 - 12.57725	2655 - 2900	
13.36 - 13.41	3260 - 3267	
16.42 - 16.423	3332 - 3339	
16.69475 - 16.69525	3345.8 - 3358	
16.80425 - 16.80475	3500 - 4400	
25.5 - 25.67	4500 - 5150	
37.5 - 38.25	5350 - 5460	
73 - 74.6	7250 - 7750	
74.8 - 75.2	8025 - 8500	
108 - 138		

Note 1: Certain frequency bands listed in table 7 and in bands above 38.6 GHz are designated for licence-exempt applications. These frequency bands and the requirements that apply to related devices are set out in the 200 and 300 series of RSSs.

FCC Restricted bands of operation refer to FCC §15.205 (a):

MHz	MHz	MHz	GHz
0.090-0.110	16.42-16.423	399.9-410	4.5-5.15
¹ 0.495-0.505	16.69475-16.69525	608-614	5.35-5.46
2.1735-2.1905	16.80425-16.80475	960-1240	7.25-7.75
4.125-4.128	25.5-25.67	1300-1427	8.025-8.5
4.17725-4.17775	37.5-38.25	1435-1626.5	9.0-9.2
4.20725-4.20775	73-74.6	1645.5-1646.5	9.3-9.5
6.215-6.218	74.8-75.2	1660-1710	10.6-12.7
6.26775-6.26825	108-121.94	1718.8-1722.2	13.25-13.4
6.31175-6.31225	123-138	2200-2300	14.47-14.5
8.291-8.294	149.9-150.05	2310-2390	15.35-16.2
8.362-8.366	156.52475-156.52525	2483.5-2500	17.7-21.4
8.37625-8.38675	156.7-156.9	2690-2900	22.01-23.12
8.41425-8.41475	162.0125-167.17	3260-3267	23.6-24.0
12.29-12.293	167.72-173.2	3332-3339	31.2-31.8
12.51975-12.52025	240-285	3345.8-3358	36.43-36.5
12.57675-12.57725	322-335.4	3600-4400	(²)
13.36-13.41			

Note: ¹Until February 1, 1999, this restricted band shall be 0.490-0.510 MHz.

²Above 38.6c

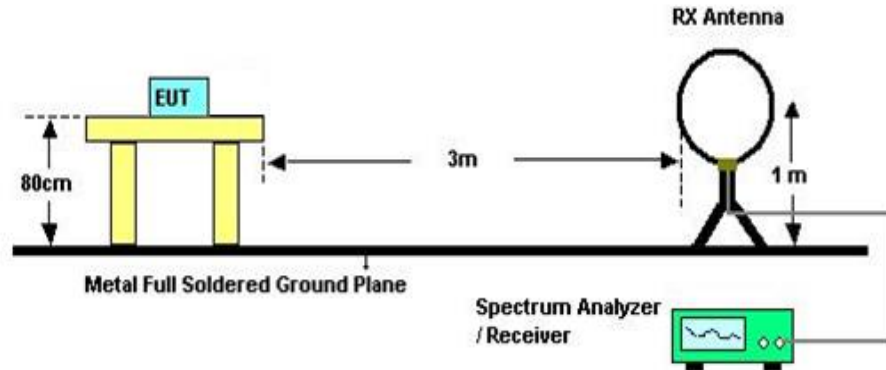
Limits of unwanted/undesirable emission out of the restricted bands refer to CFR 47 FCC §15.407 (b) and ISSED RSS-247 6.2.



LIMITS OF RADIATED EMISSION MEASUREMENT (Above 1GHz)		
Frequency Range (MHz)	EIRP Limit	Field Strength Limit (dBuV/m) at 3 m
5150~5250 MHz	PK: -27 (dBm/MHz)	PK:68.2(dBμV/m)
5250~5350 MHz		
5470~5725 MHz		
5725~5850 MHz	PK: -27 (dBm/MHz) *1 PK: 10 (dBm/MHz) *2 PK: 15.6 (dBm/MHz) *3 PK: 27 (dBm/MHz) *4	PK: 68.2(dBμV/m) *1 PK: 105.2 (dBμV/m) *2 PK: 110.8(dBμV/m) *3 PK: 122.2 (dBμV/m) *4
Note: *1 beyond 75 MHz or more above of the band edge. *2 below the band edge increasing linearly to 10 dBm/MHz at 25 MHz above. *3 below the band edge increasing linearly to a level of 15.6 dBm/MHz at 5 MHz above. *4 from 5 MHz above or below the band edge increasing linearly to a level of 27 dBm/MHz at the band edge.		

TEST SETUP AND PROCEDURE

Below 30MHz

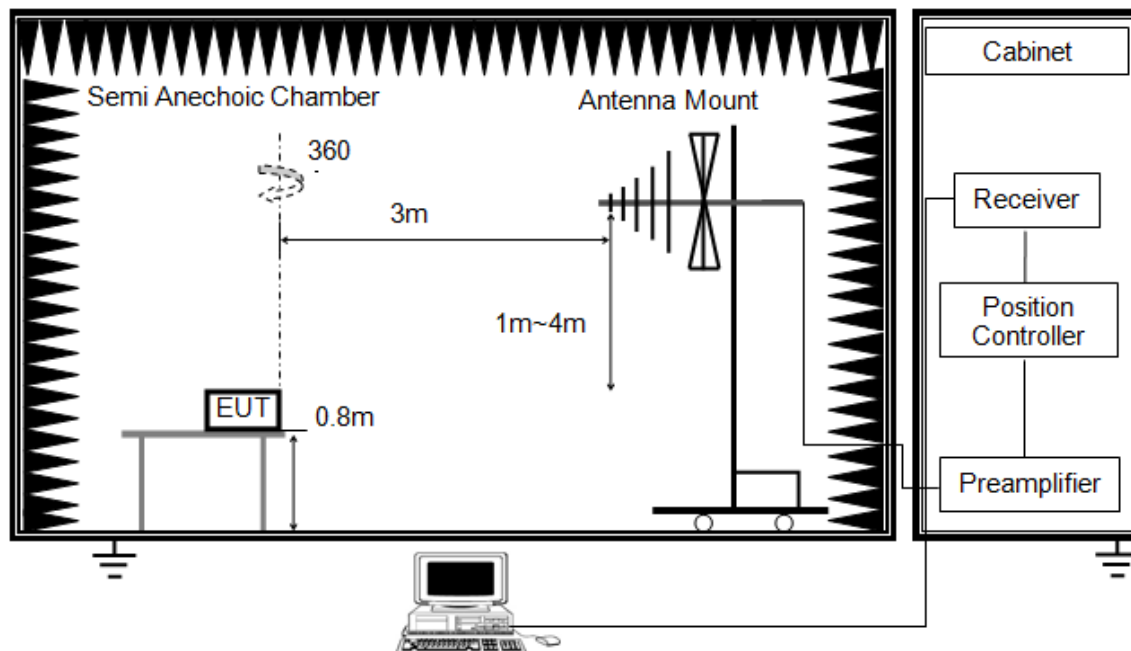


The setting of the spectrum analyser

RBW	200Hz (From 9kHz to 0.15MHz)/ 9kHz (From 0.15MHz to 30MHz)
VBW	200Hz (From 9kHz to 0.15MHz)/ 9kHz (From 0.15MHz to 30MHz)
Sweep	Auto
Trace	Max hold

1. The testing follows the guidelines in ANSI C63.10-2013 clause 11.11.
2. The EUT was arranged to its worst case and then turntable (from 0 degree to 360 degrees) to find the maximum reading. A pre-amp and a high pass filter are used for the test in order to get better signal level. Both Horizontal, Face-on and Face-off polarizations of the antenna are set to make the measurement.
3. The EUT was placed on a turntable with 80cm above ground.
4. The EUT was set 3 meters from the interference receiving antenna, which was mounted on the top of a variable height antenna tower.
5. The radiated emission limits are based on measurements employing a CISPR quasi-peak detector except for the frequency bands 9-90 kHz, 110-490 kHz and above 1000 MHz. Radiated emission limits in these three bands are based on measurements employing an average detector.
6. For measurement below 1GHz, the initial step in collecting conducted emission data is a spectrum analyzer peak detector mode pre-scanning the measurement frequency range. Significant peaks are then marked and then Quasi Peak and average detector mode re-measured. If the emission level of the EUT measured by the peak detector is 3 dB lower than the applicable limit, the peak emission level will be reported. Otherwise, the emission measurement will be repeated using the quasi-peak and average detector and reported.
7. Although these tests were performed other than open field site, adequate comparison measurements were confirmed against 30m open field site. Therefore sufficient tests were made to demonstrate that the alternative site produces results that correlate with the ones of tests made in an open field site based on KDB 414788.

Below 1G and above 30MHz

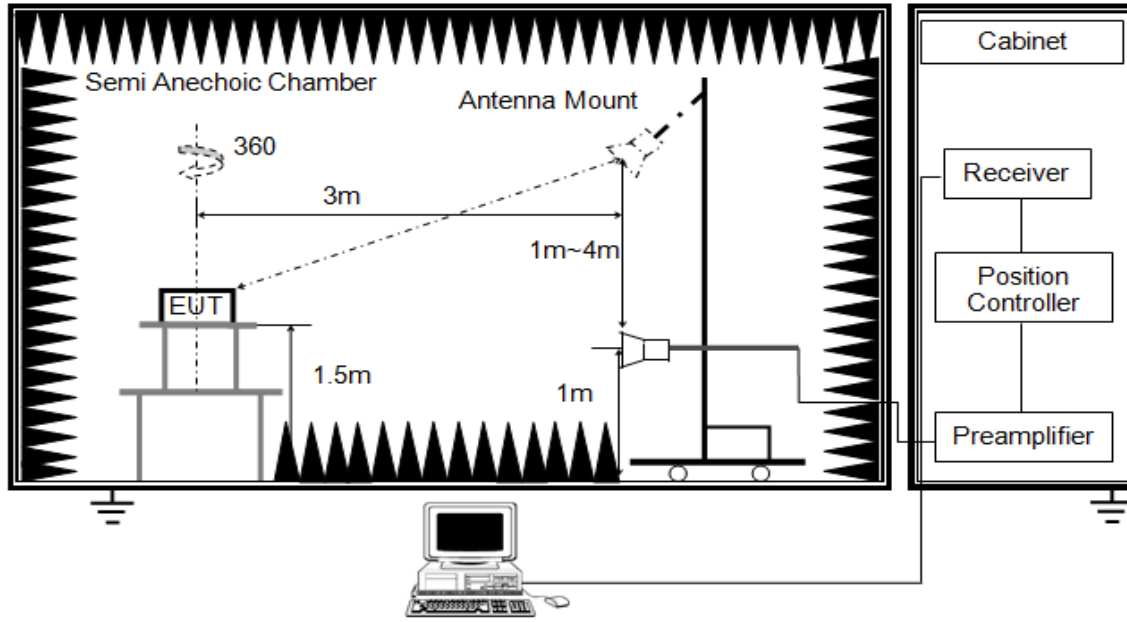


The setting of the spectrum analyser

RBW	120kHz
VBW	300kHz
Sweep	Auto
Detector	Peak/QP
Trace	Max hold

1. The testing follows the guidelines in ANSI C63.10-2013 clause 11.11.
2. The EUT was arranged to its worst case and then tune the antenna tower (from 1 m to 4 m) and turntable (from 0 degree to 360 degrees) to find the maximum reading. A pre-amp and a high pass filter are used for the test in order to get better signal level. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
3. The EUT was placed on a turntable with 80cm above ground.
4. The EUT was set 3 meters from the interference receiving antenna, which was mounted on the top of a variable height antenna tower.
5. For measurement below 1GHz, the initial step in collecting conducted emission data is a spectrum analyzer peak detector mode pre-scanning the measurement frequency range. Significant peaks are then marked and then Quasi Peak detector mode re-measured. If the emission level of the EUT measured by the peak detector is 3 dB lower than the applicable limit, the peak emission level will be reported. Otherwise, the emission measurement will be repeated using the quasi-peak detector and reported.

Above 1GHz

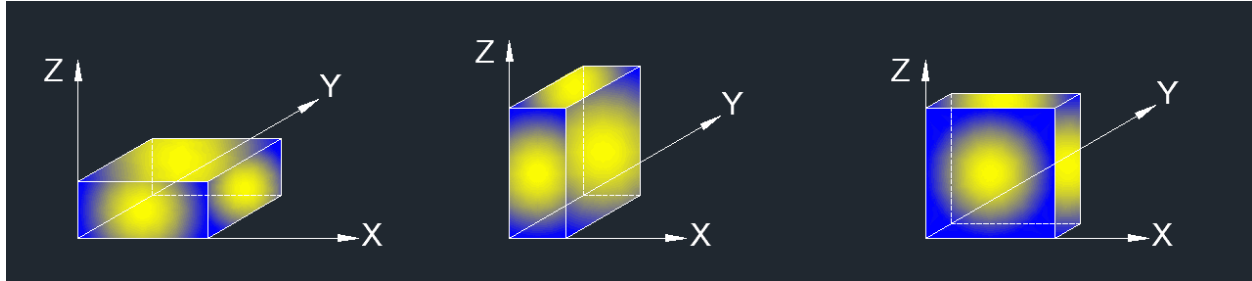


The setting of the spectrum analyser

RBW	1MHz
VBW	PEAK: 3MHz AVG: see note 6
Sweep	Auto
Detector	Peak
Trace	Max hold

1. The testing follows the guidelines in KDB 789033 D02 General U-NII Test Procedures New Rules v02r01 section II.G.3 ~ II.G.6.
2. The EUT was arranged to its worst case and then tune the antenna tower (1.5 m) and turntable (from 0 degree to 360 degrees) to find the maximum reading. A pre-amp and a high pass filter are used for the test in order to get better signal level. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
3. The EUT was placed on a turntable with 1.5m above ground.
4. The EUT was set 3 meters from the interference receiving antenna, which was mounted on the top of a variable height antenna tower.
5. For measurement above 1GHz, the emission measurement will be measured by the peak detector. This peak level, once corrected, must comply with the limit specified in Section 15.209.
6. For measurements above 1 GHz the resolution bandwidth is set to 1 MHz, then the video bandwidth is set to 3 MHz for peak measurements and 1 MHz resolution bandwidth with 1/T video bandwidth with peak detector for average measurements. For the Duty Cycle please refer to clause 7.1.ON TIME AND DUTY CYCLE.

X axis, Y axis, Z axis positions:



Note 1: For all radiated test, EUT in each of three orthogonal axis emissions had been tested, but only the worst case (X axis) data recorded in the report.

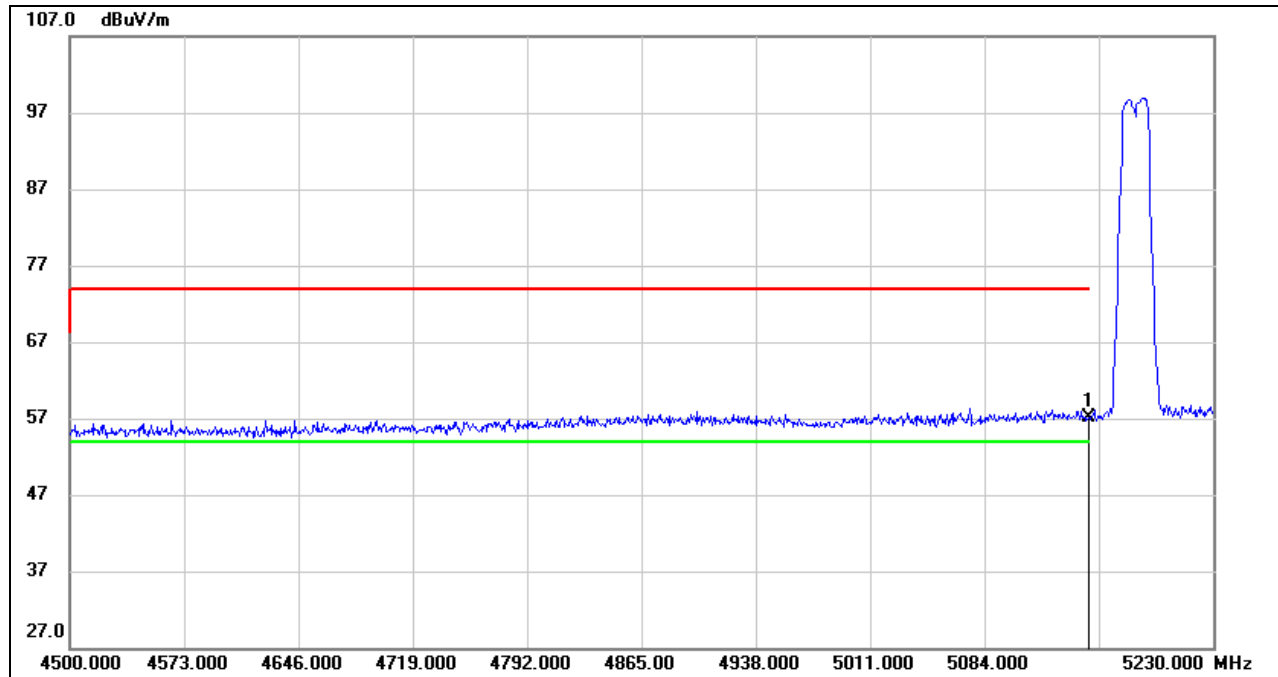
Note 2: The EUT does not support simultaneous transmission.

Note 3: The EUT was fully exercised with external accessories during the test. In the case of multiple accessory external ports, an external accessory shall be connected to one of each type of port.

TEST ENVIRONMENT

Temperature	23.5°C	Relative Humidity	64%
Atmosphere Pressure	101kPa	Test Voltage	AC120V,60HZ

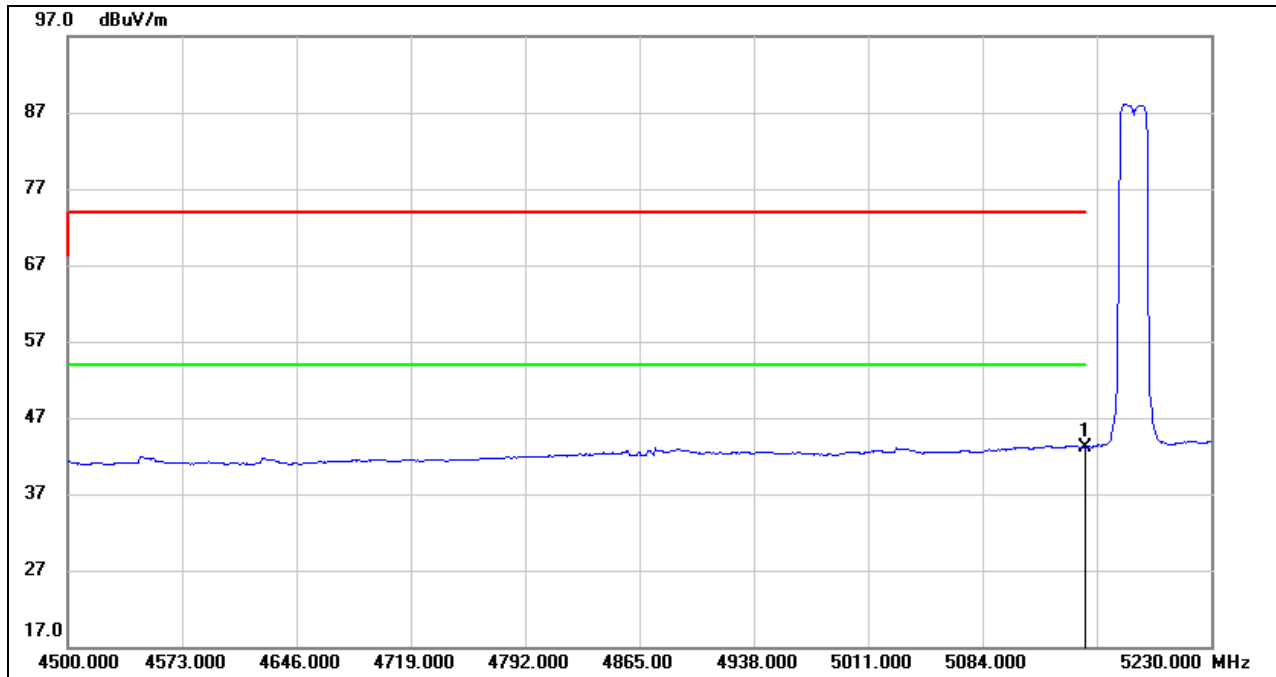
RESULTS

**8.1. 802.11a20 MODE****8.1.1. UNII-1 BAND****RESTRICTED BANDEDGE (LOW CHANNEL, HORIZONTAL)****PEAK**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	16.69	40.46	57.15	74.00	-16.85	peak

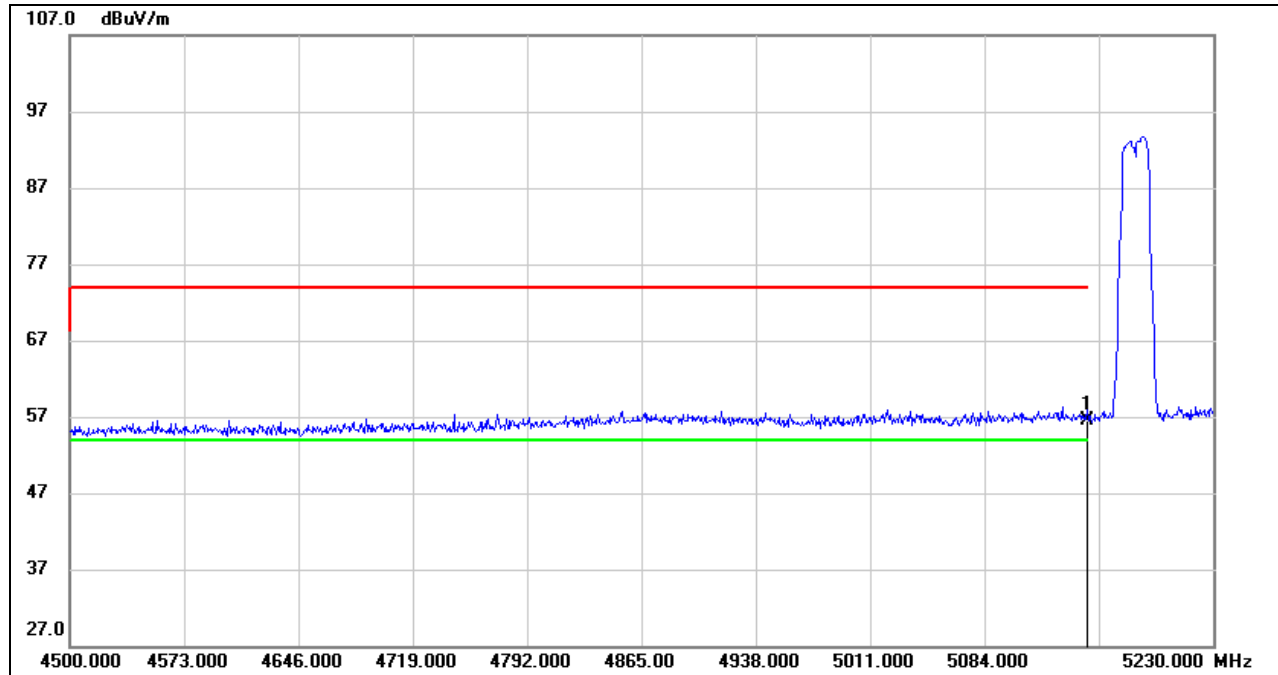
Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

AVG



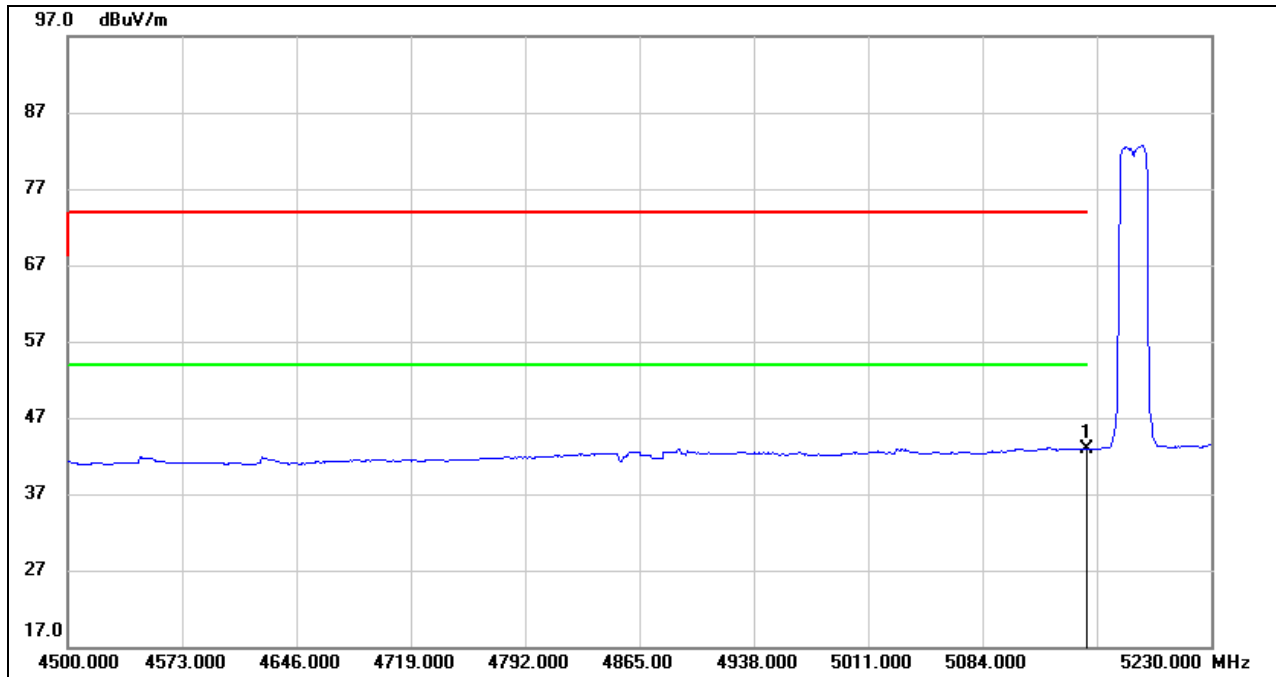
No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	2.68	40.46	43.14	54.00	-10.86	AVG

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. AVG: VBW=1/Ton, where: Ton is the transmitting duration.
4. For the transmitting duration, please refer to clause 7.1.
5. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

**RESTRICTED BANDEDGE (LOW CHANNEL, VERTICAL)****PEAK**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	16.02	40.46	56.48	74.00	-17.52	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

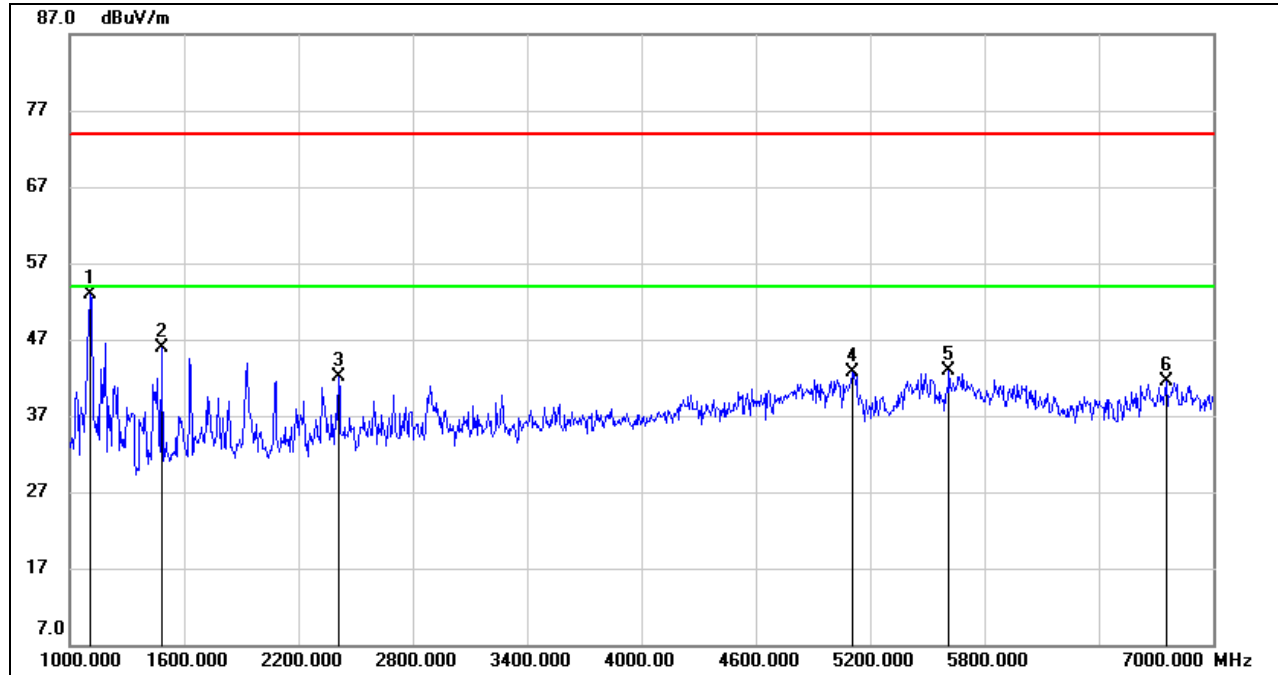
AVG

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	2.44	40.46	42.90	54.00	-11.10	AVG

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. AVG: $VBW=1/T_{on}$, where: T_{on} is the transmitting duration.
4. For the transmitting duration, please refer to clause 7.1.
5. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	66.42	-13.53	52.89	74.00	-21.11	peak
2	1480.000	58.25	-12.40	45.85	74.00	-28.15	peak
3	2410.000	50.75	-8.60	42.15	74.00	-31.85	peak
4	5110.000	41.32	1.43	42.75	74.00	-31.25	peak
5	5614.000	40.90	2.02	42.92	74.00	-31.08	peak
6	6754.000	37.06	4.45	41.51	74.00	-32.49	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

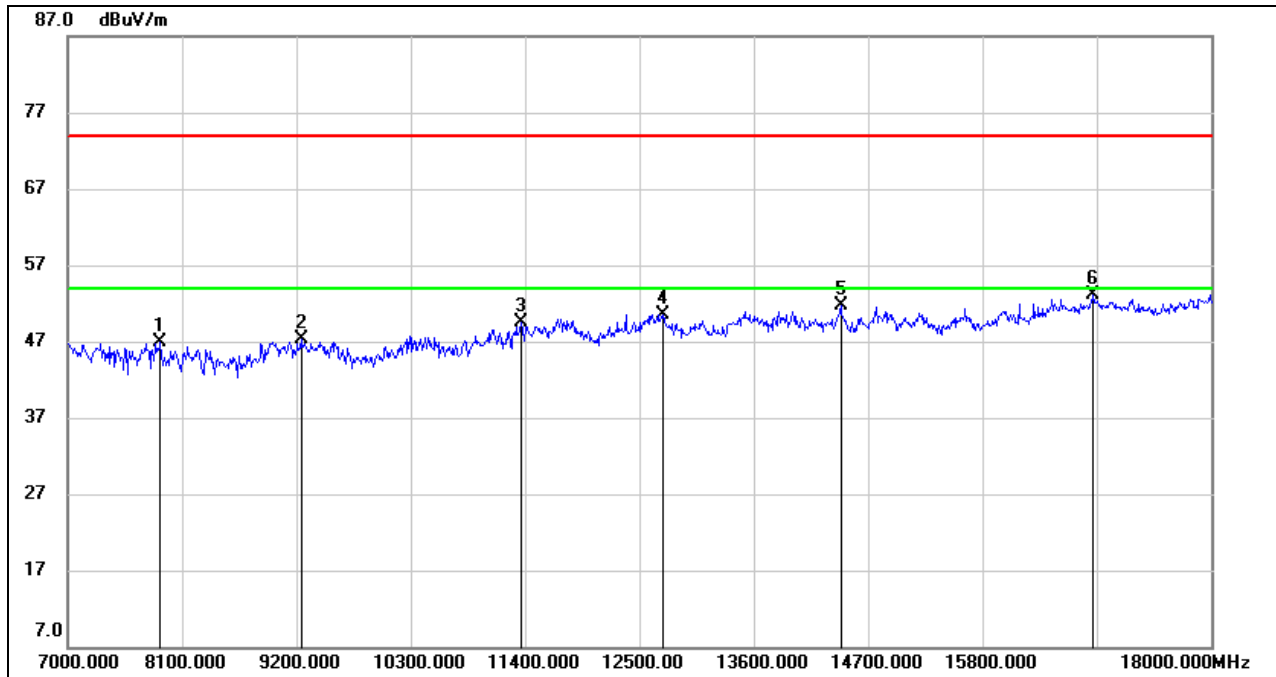
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

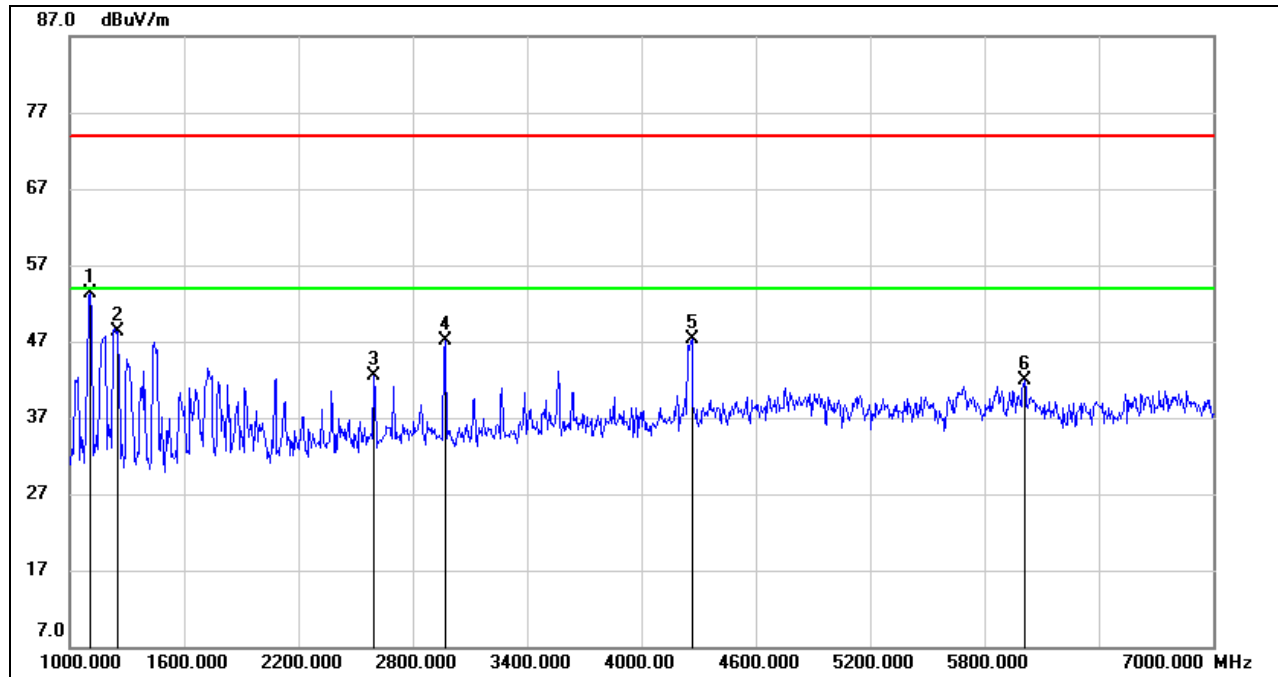
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7891.000	39.82	7.05	46.87	74.00	-27.13	peak
2	9244.000	37.98	9.29	47.27	74.00	-26.73	peak
3	11356.000	36.09	13.35	49.44	74.00	-24.56	peak
4	12731.000	35.34	15.26	50.60	74.00	-23.40	peak
5	14436.000	35.57	16.10	51.67	74.00	-22.33	peak
6	16867.000	32.80	20.23	53.03	74.00	-20.97	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, VERTICAL)****1-7GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	66.80	-13.53	53.27	74.00	-20.73	peak
2	1252.000	61.30	-13.00	48.30	74.00	-25.70	peak
3	2596.000	50.60	-8.18	42.42	74.00	-31.58	peak
4	2968.000	53.30	-6.22	47.08	74.00	-26.92	peak
5	4264.000	49.20	-1.84	47.36	74.00	-26.64	peak
6	6010.000	39.21	2.61	41.82	74.00	-32.18	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

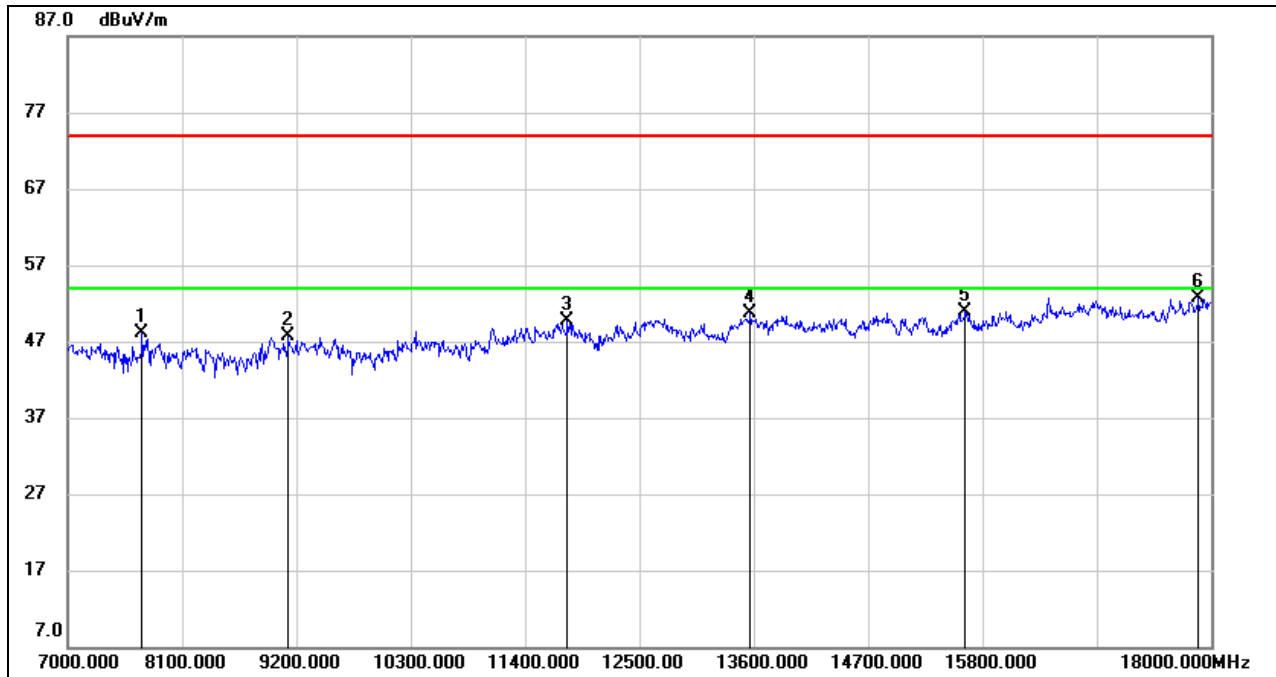
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

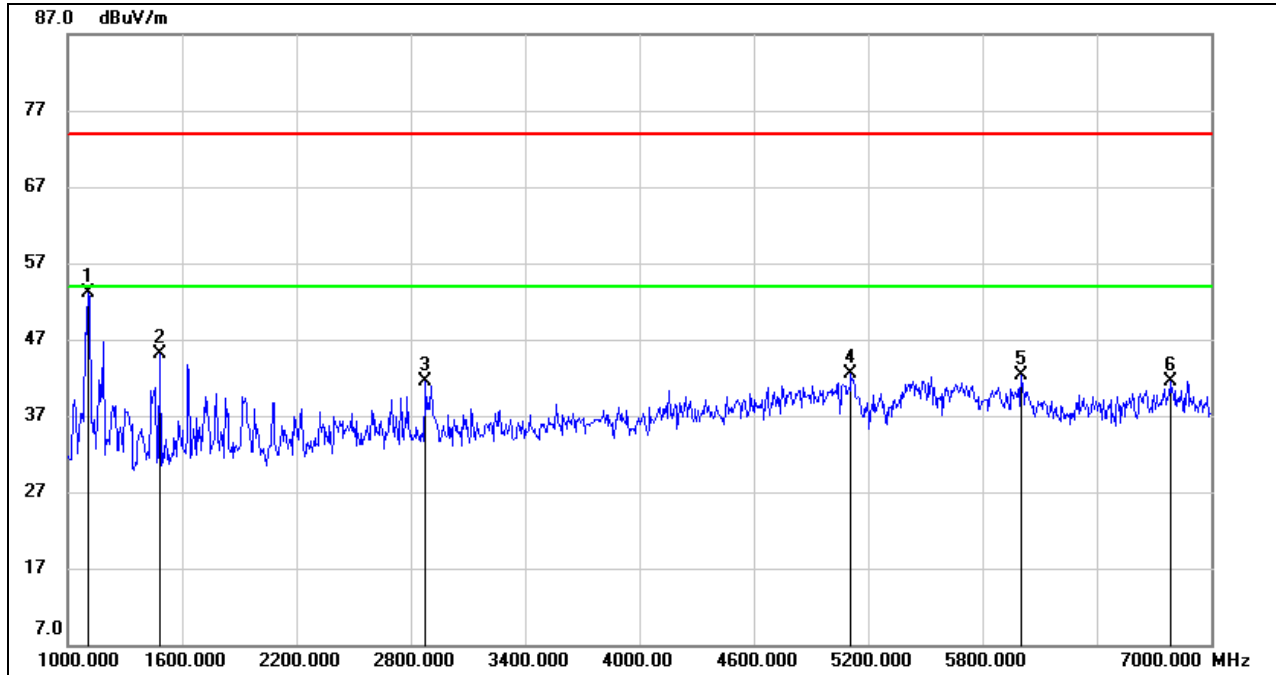


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7715.000	40.89	7.17	48.06	74.00	-25.94	peak
2	9123.000	38.21	9.51	47.72	74.00	-26.28	peak
3	11807.000	35.18	14.52	49.70	74.00	-24.30	peak
4	13567.000	34.87	15.89	50.76	74.00	-23.24	peak
5	15635.000	34.05	16.77	50.82	74.00	-23.18	peak
6	17879.000	29.15	23.57	52.72	74.00	-21.28	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (MID CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	66.71	-13.53	53.18	74.00	-20.82	peak
2	1480.000	57.57	-12.40	45.17	74.00	-28.83	peak
3	2878.000	48.17	-6.60	41.57	74.00	-32.43	peak
4	5110.000	41.16	1.43	42.59	74.00	-31.41	peak
5	6004.000	39.72	2.61	42.33	74.00	-31.67	peak
6	6784.000	37.10	4.44	41.54	74.00	-32.46	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

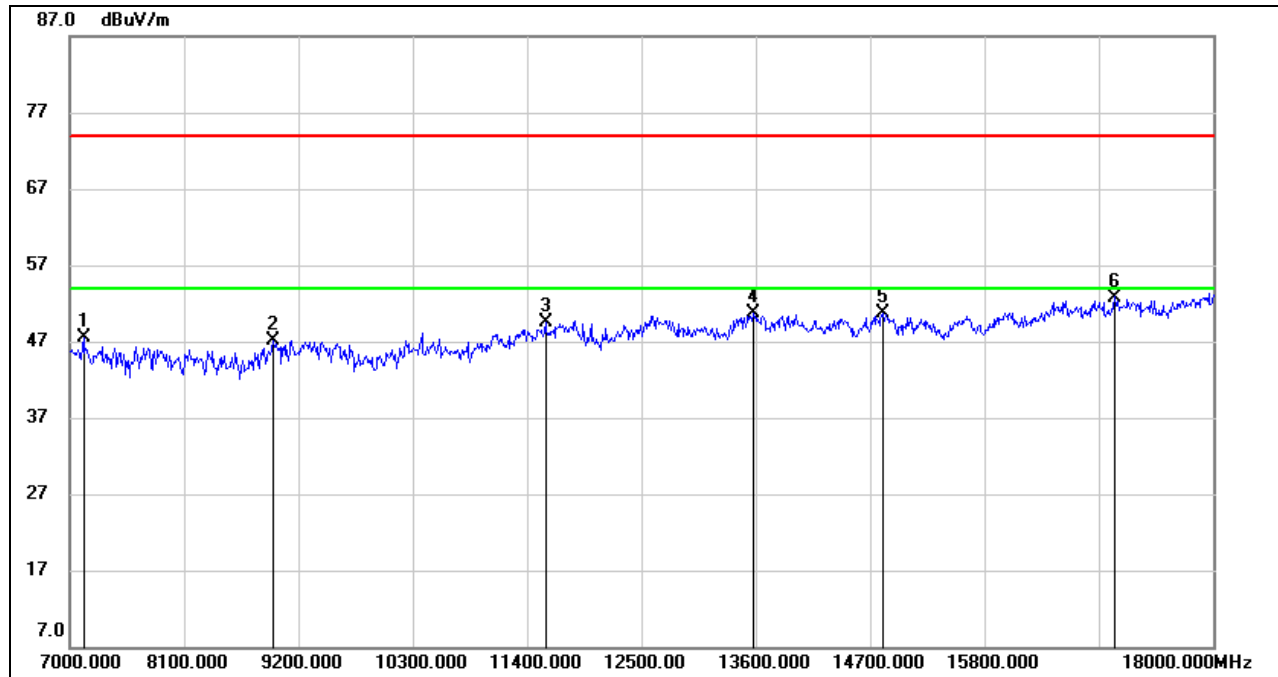
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

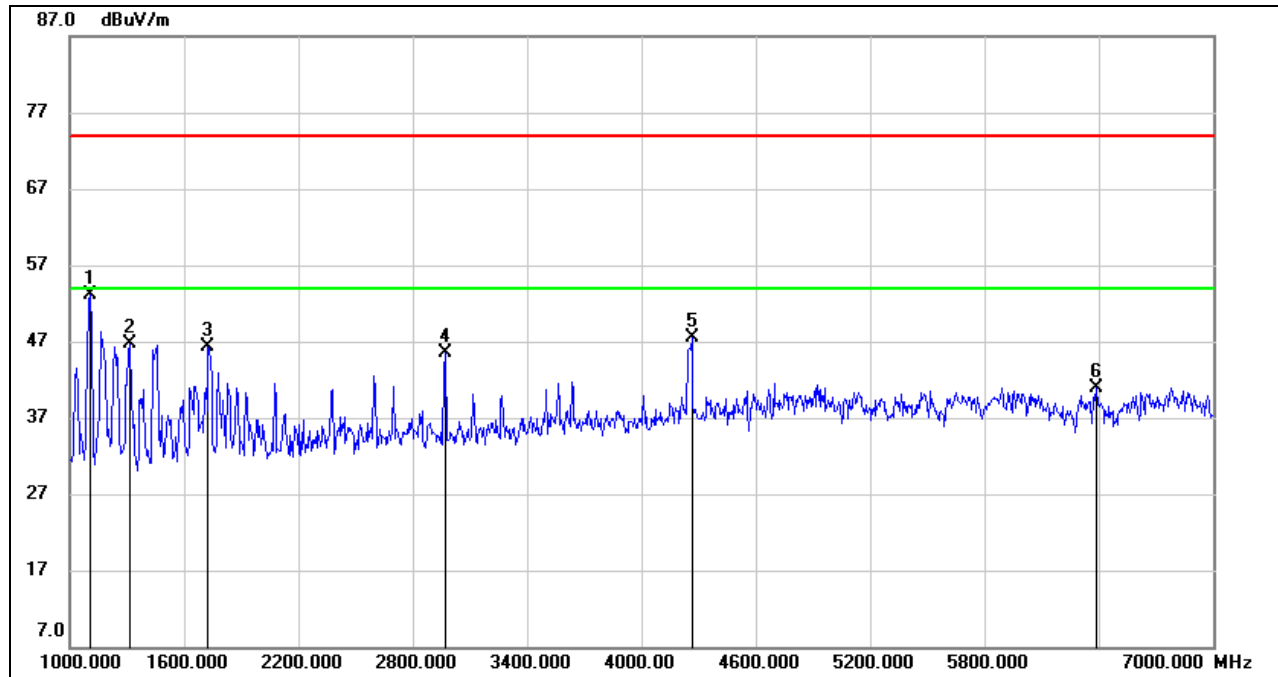


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7132.000	40.70	6.82	47.52	74.00	-26.48	peak
2	8958.000	37.38	9.76	47.14	74.00	-26.86	peak
3	11576.000	35.73	13.69	49.42	74.00	-24.58	peak
4	13578.000	34.79	15.89	50.68	74.00	-23.32	peak
5	14821.000	34.61	16.03	50.64	74.00	-23.36	peak
6	17054.000	32.01	20.79	52.80	74.00	-21.20	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for High Pass Filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (MID CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	66.60	-13.53	53.07	74.00	-20.93	peak
2	1318.000	59.69	-12.90	46.79	74.00	-27.21	peak
3	1726.000	56.87	-10.66	46.21	74.00	-27.79	peak
4	2974.000	51.66	-6.18	45.48	74.00	-28.52	peak
5	4264.000	49.27	-1.84	47.43	74.00	-26.57	peak
6	6388.000	37.57	3.40	40.97	74.00	-33.03	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

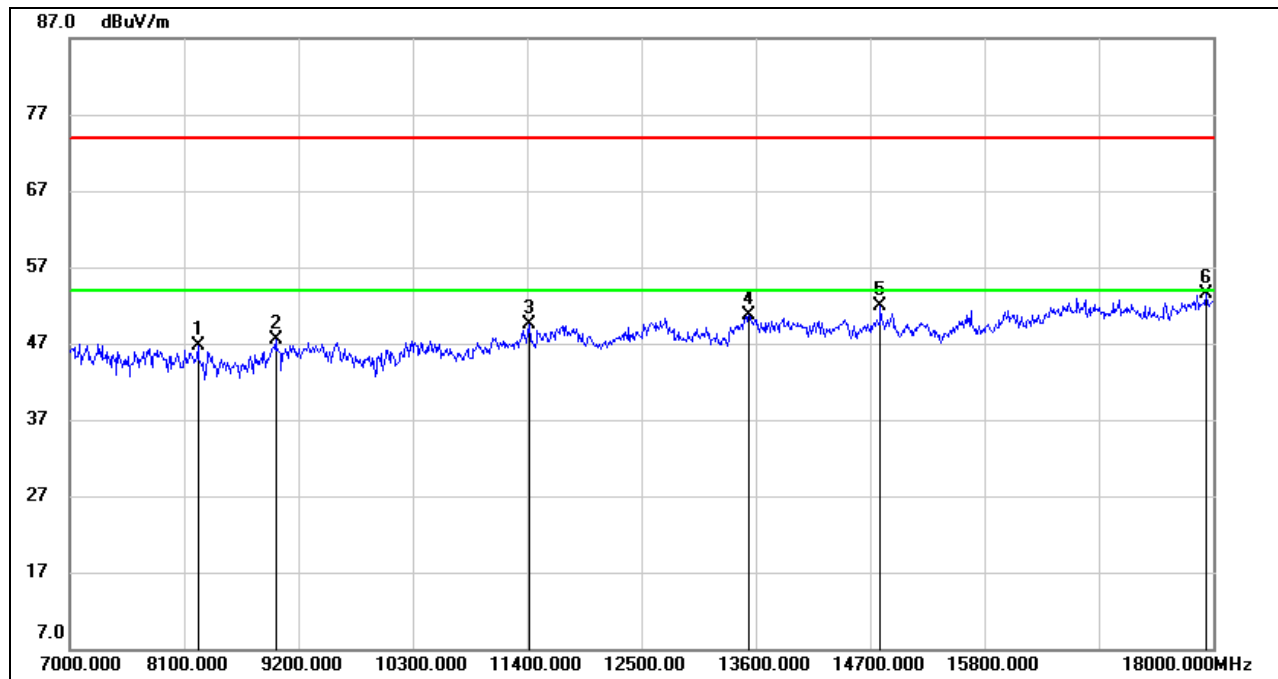
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

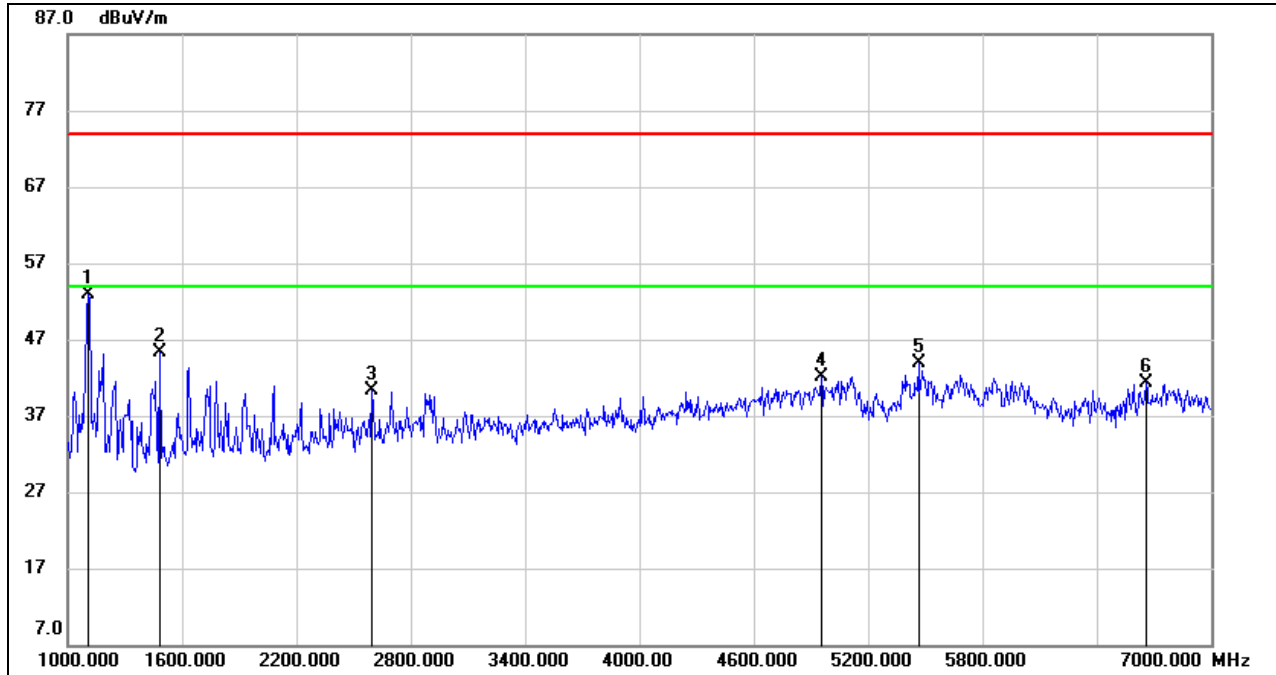


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	8232.000	38.37	8.28	46.65	74.00	-27.35	peak
2	8980.000	37.45	9.98	47.43	74.00	-26.57	peak
3	11422.000	35.98	13.48	49.46	74.00	-24.54	peak
4	13534.000	34.79	15.93	50.72	74.00	-23.28	peak
5	14799.000	35.86	16.03	51.89	74.00	-22.11	peak
6	17934.000	29.84	23.62	53.46	74.00	-20.54	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (HIGH CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	66.45	-13.53	52.92	74.00	-21.08	peak
2	1480.000	57.70	-12.40	45.30	74.00	-28.70	peak
3	2596.000	48.39	-8.18	40.21	74.00	-33.79	peak
4	4954.000	41.43	0.77	42.20	74.00	-31.80	peak
5	5464.000	42.25	1.72	43.97	74.00	-30.03	peak
6	6658.000	36.92	4.46	41.38	74.00	-32.62	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

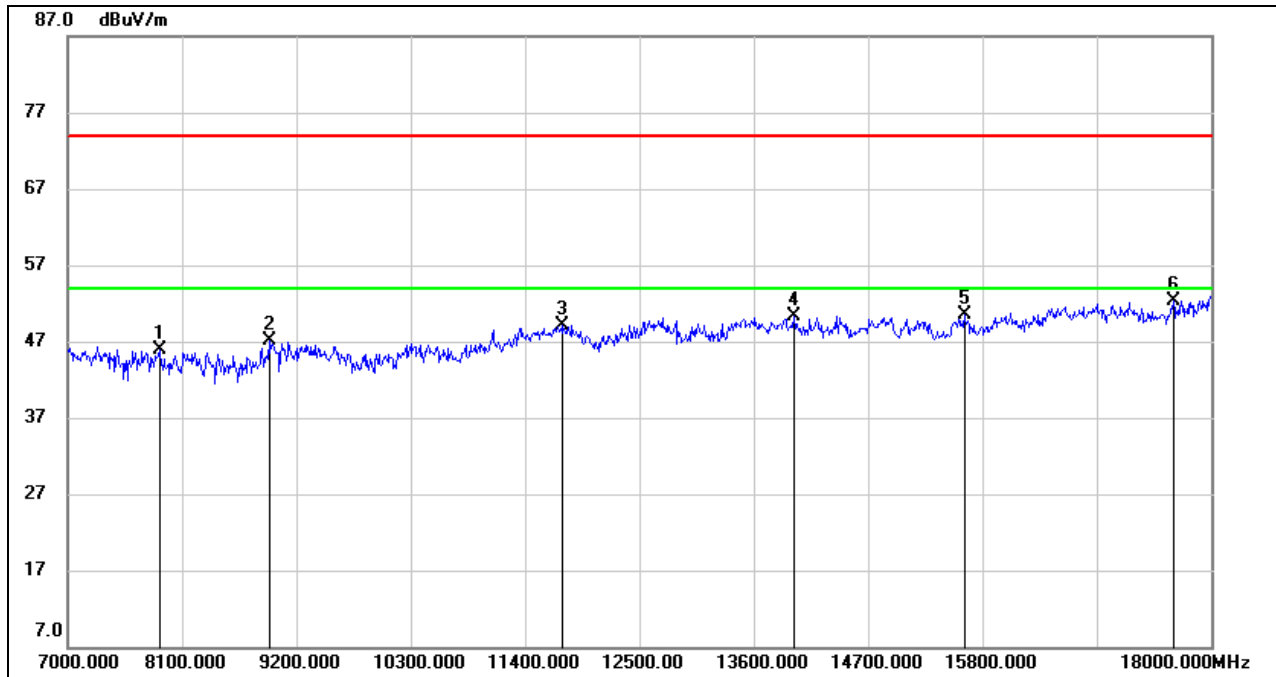
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

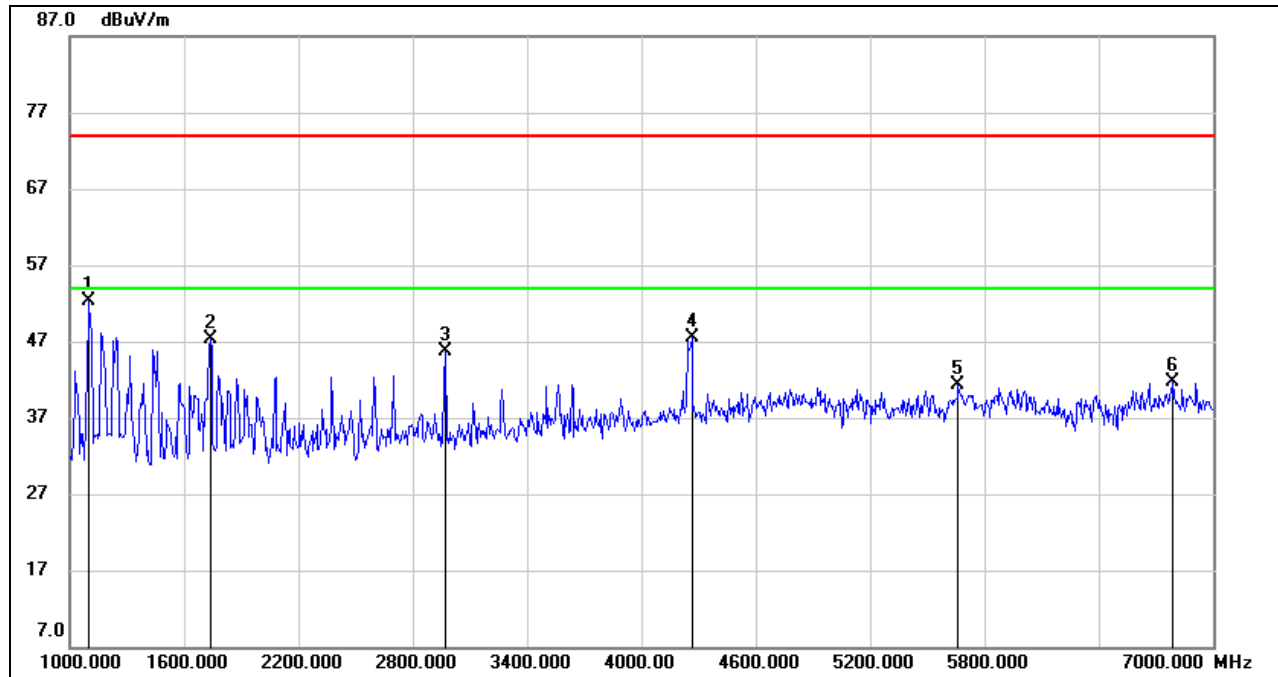
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7880.000	38.76	7.08	45.84	74.00	-28.16	peak
2	8936.000	37.61	9.53	47.14	74.00	-26.86	peak
3	11752.000	34.72	14.33	49.05	74.00	-24.95	peak
4	13985.000	34.21	16.13	50.34	74.00	-23.66	peak
5	15624.000	33.82	16.76	50.58	74.00	-23.42	peak
6	17637.000	30.09	22.29	52.38	74.00	-21.62	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**HARMONICS AND SPURIOUS EMISSIONS (HIGH CHANNEL, VERTICAL)****1-7GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1102.000	65.93	-13.56	52.37	74.00	-21.63	peak
2	1738.000	57.92	-10.57	47.35	74.00	-26.65	peak
3	2968.000	51.87	-6.22	45.65	74.00	-28.35	peak
4	4264.000	49.32	-1.84	47.48	74.00	-26.52	peak
5	5662.000	39.34	1.99	41.33	74.00	-32.67	peak
6	6790.000	37.25	4.44	41.69	74.00	-32.31	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

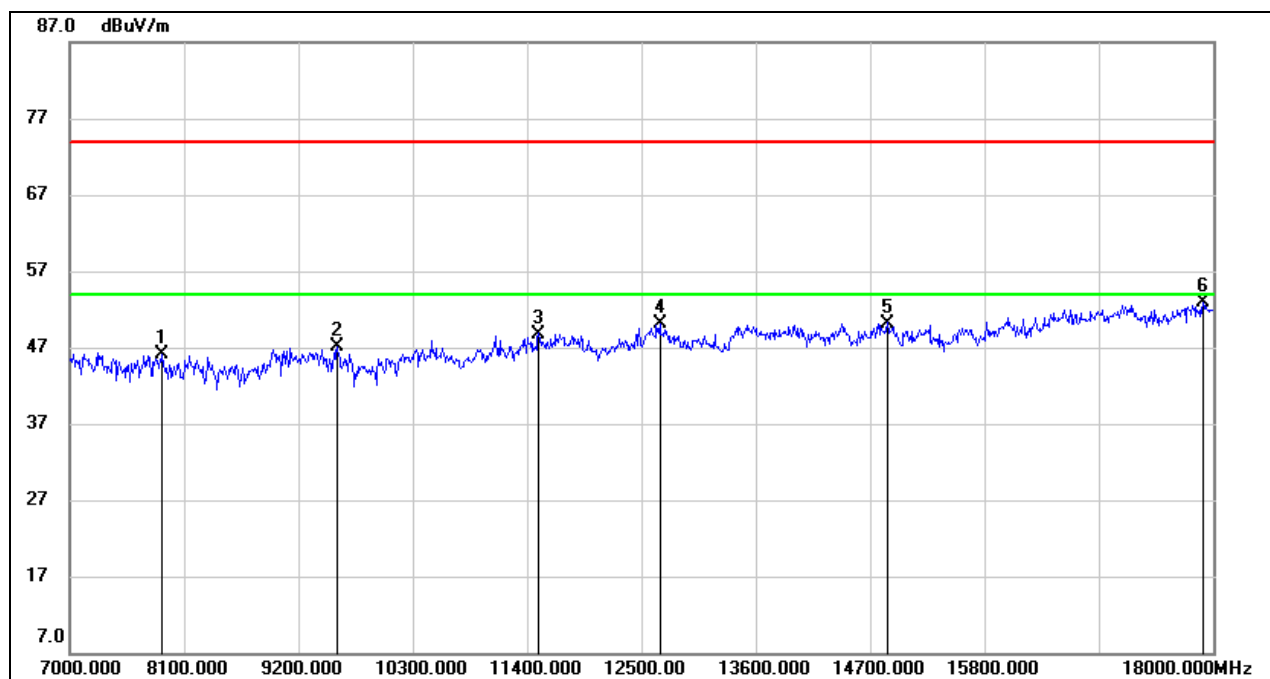
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7891.000	39.11	7.05	46.16	74.00	-27.84	peak
2	9574.000	36.56	10.49	47.05	74.00	-26.95	peak
3	11510.000	35.21	13.59	48.80	74.00	-25.20	peak
4	12676.000	34.79	15.23	50.02	74.00	-23.98	peak
5	14865.000	34.17	16.03	50.20	74.00	-23.80	peak
6	17901.000	29.22	23.59	52.81	74.00	-21.19	peak

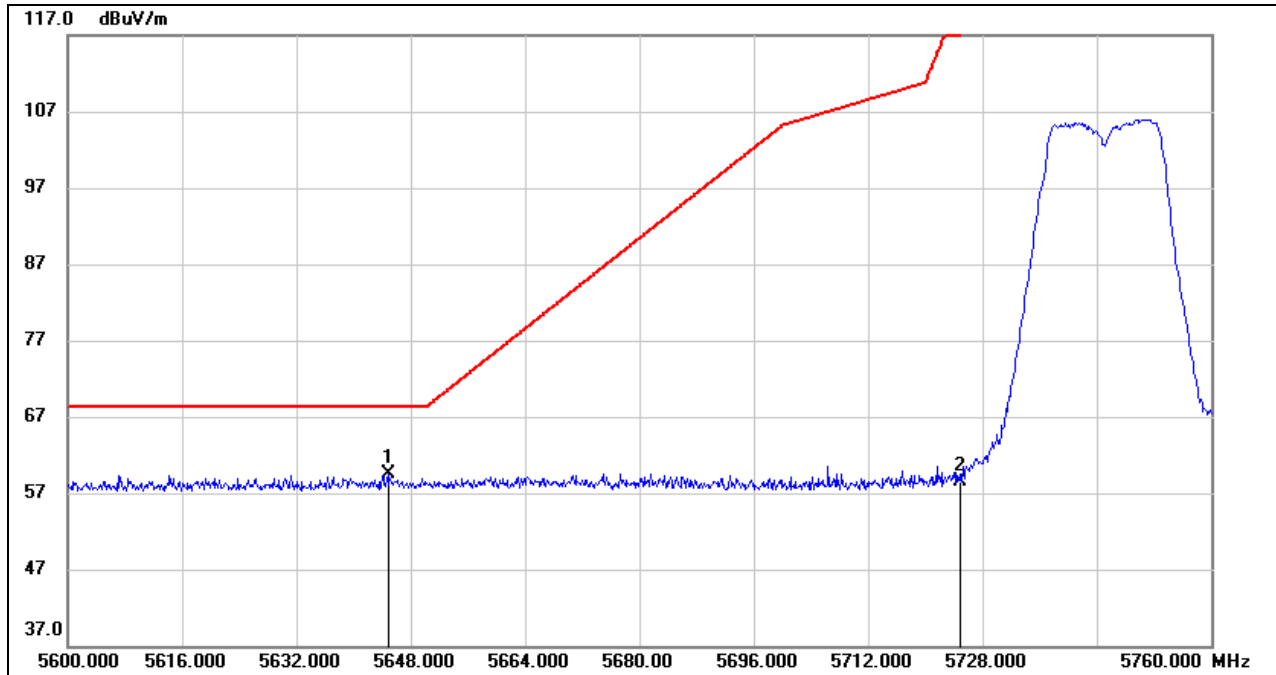
Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

8.1.2. UNII-3 BAND

ANTENNA 1 TEST RESULTS (WORST CASE)

RESTRICTED BANDEDGE (LOW CHANNEL, HORIZONTAL)

PEAK



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5644.800	18.08	41.47	59.55	68.20	-8.65	peak
2	5725.000	16.84	41.61	58.45	122.20	-63.75	peak

Note: 1. Measurement = Reading Level + Correct Factor.

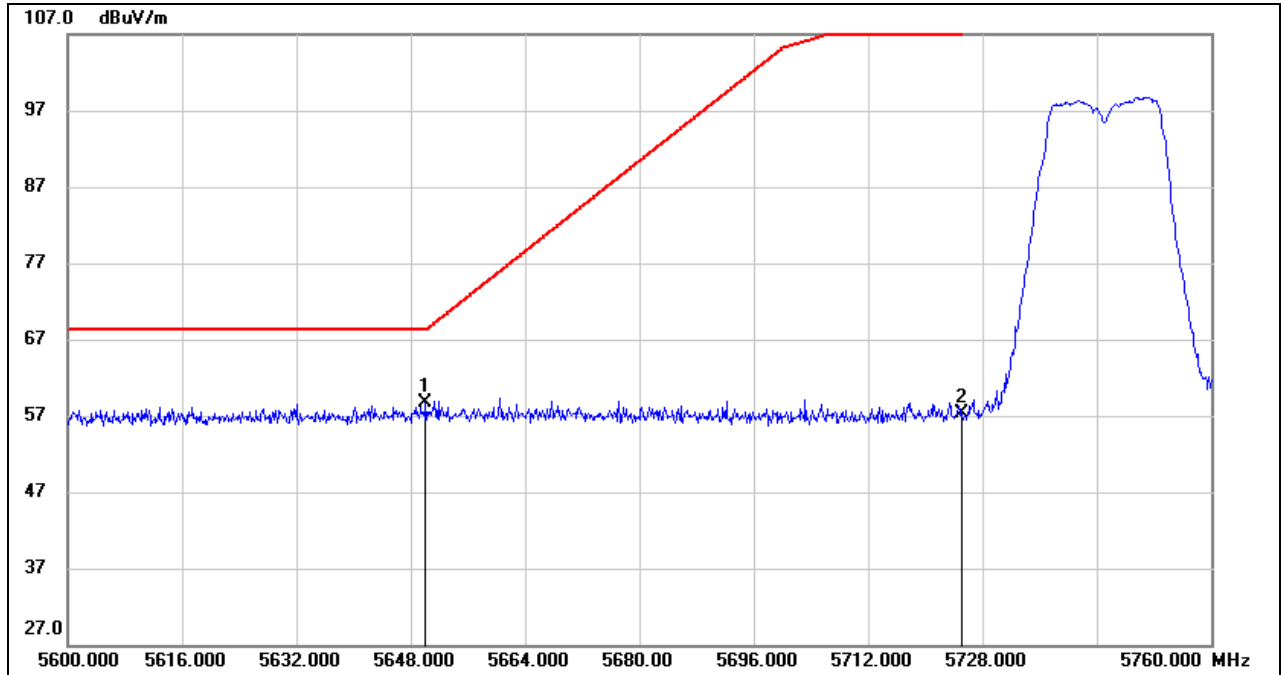
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

RESTRICTED BANDEDGE (LOW CHANNEL, VERTICAL)

PEAK

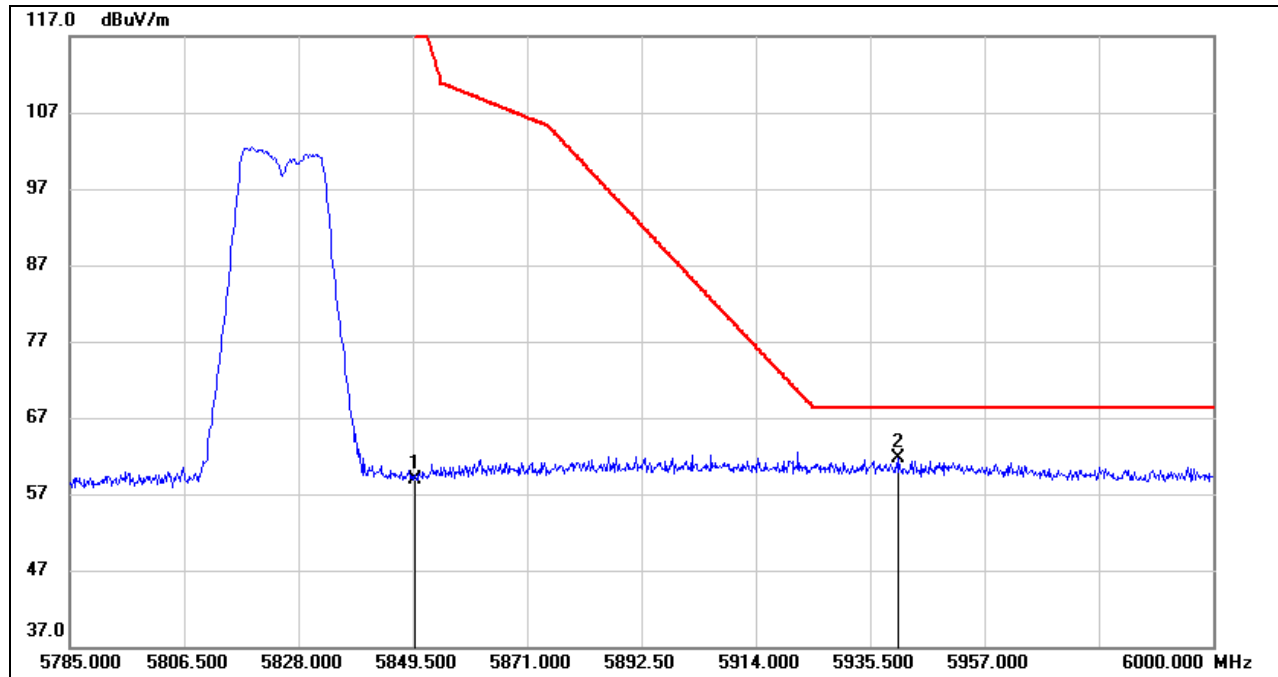


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5650.080	17.14	41.48	58.62	68.26	-9.64	peak
2	5725.000	15.70	41.61	57.31	122.20	-64.89	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

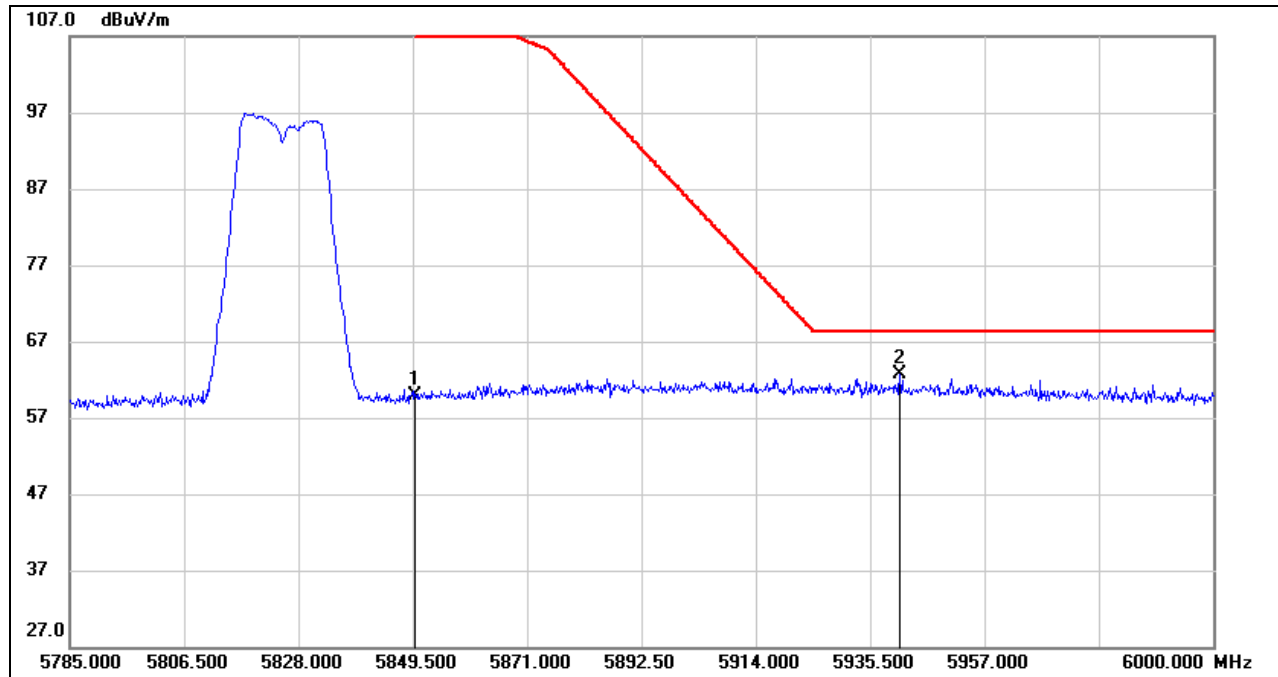
RESTRICTED BANDEDGE (HIGH CHANNEL, HORIZONTAL)

PEAK



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5850.000	16.05	42.89	58.94	122.20	-63.26	peak
2	5940.875	18.49	43.15	61.64	68.20	-6.56	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

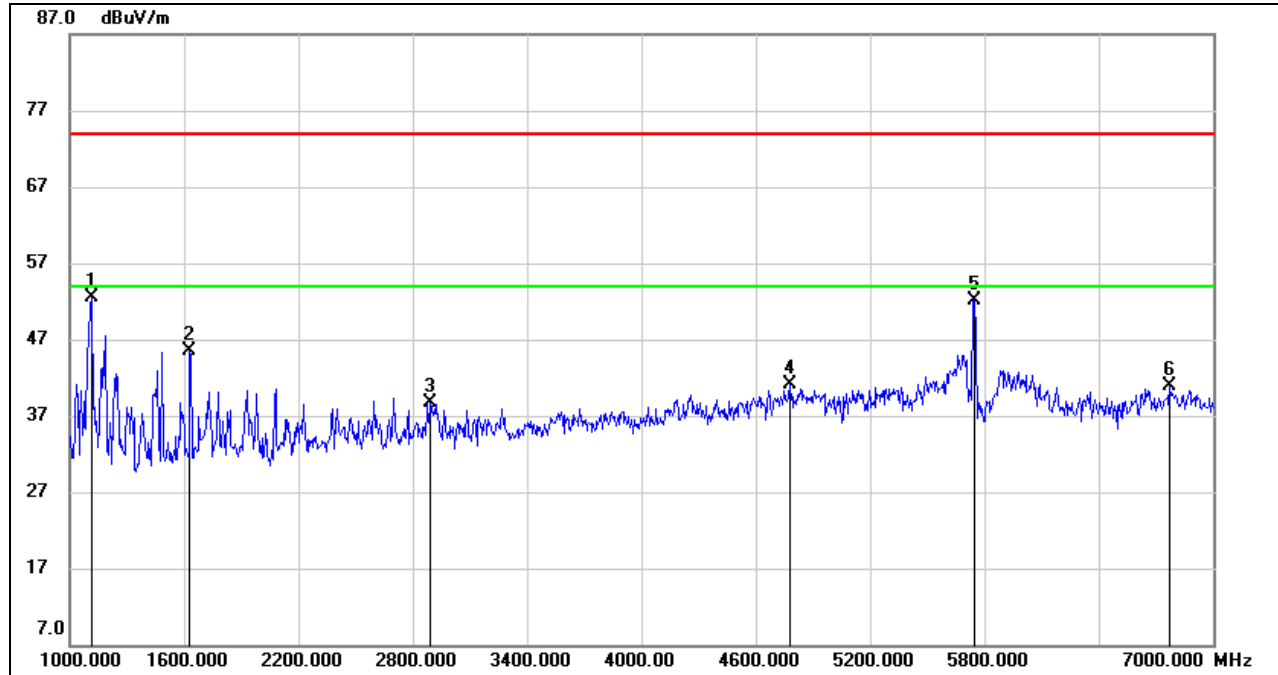
**RESTRICTED BANDEGE (HIGH CHANNEL, VERTICAL)****PEAK**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5850.000	17.05	42.89	59.94	122.20	-62.26	peak
2	5941.090	19.50	43.15	62.65	68.20	-5.55	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1114.000	66.09	-13.49	52.60	74.00	-21.40	peak
2	1630.000	56.90	-11.39	45.51	74.00	-28.49	peak
3	2890.000	45.33	-6.56	38.77	74.00	-35.23	peak
4	4780.000	40.60	0.41	41.01	74.00	-32.99	peak
5	5746.000	50.12	1.97	52.09	74.00	-21.91	peak
6	6772.000	36.42	4.45	40.87	74.00	-33.13	peak

Note: 1. Measurement = Reading Level + Correct Factor.

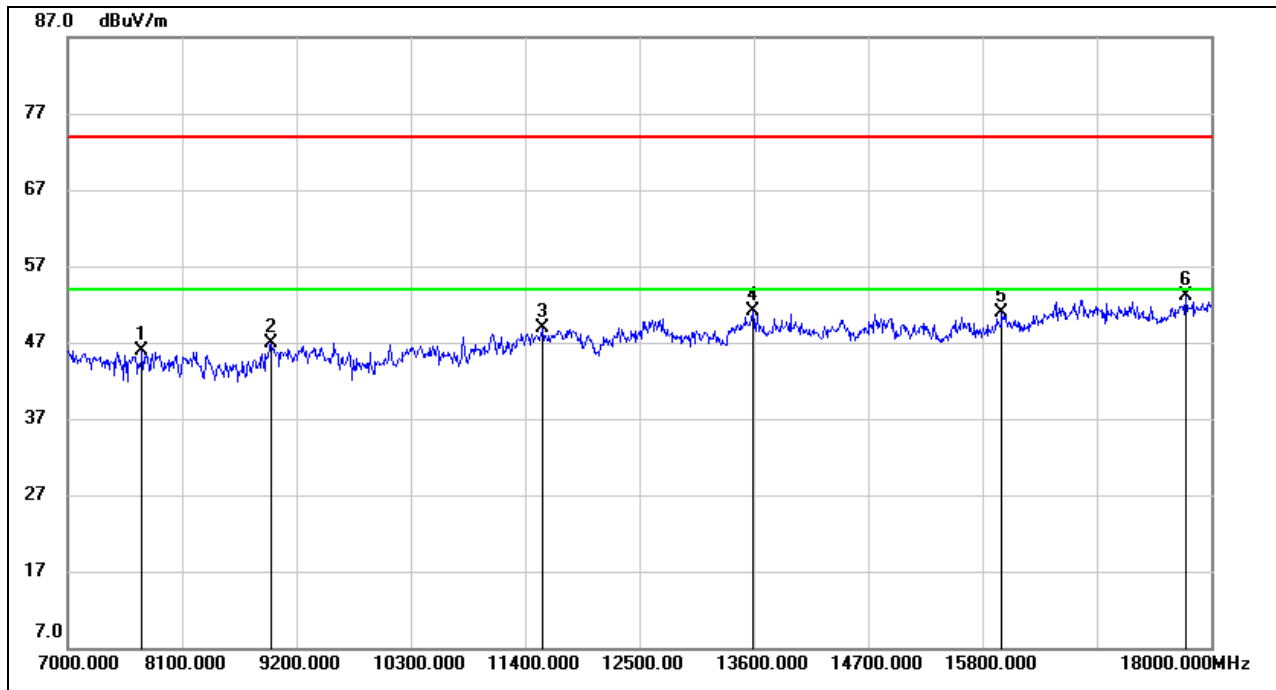
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**7-18GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7715.000	38.67	7.17	45.84	74.00	-28.16	peak
2	8958.000	37.23	9.76	46.99	74.00	-27.01	peak
3	11565.000	35.29	13.66	48.95	74.00	-25.05	peak
4	13589.000	35.24	15.87	51.11	74.00	-22.89	peak
5	15987.000	33.27	17.68	50.95	74.00	-23.05	peak
6	17758.000	29.99	23.19	53.18	74.00	-20.82	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

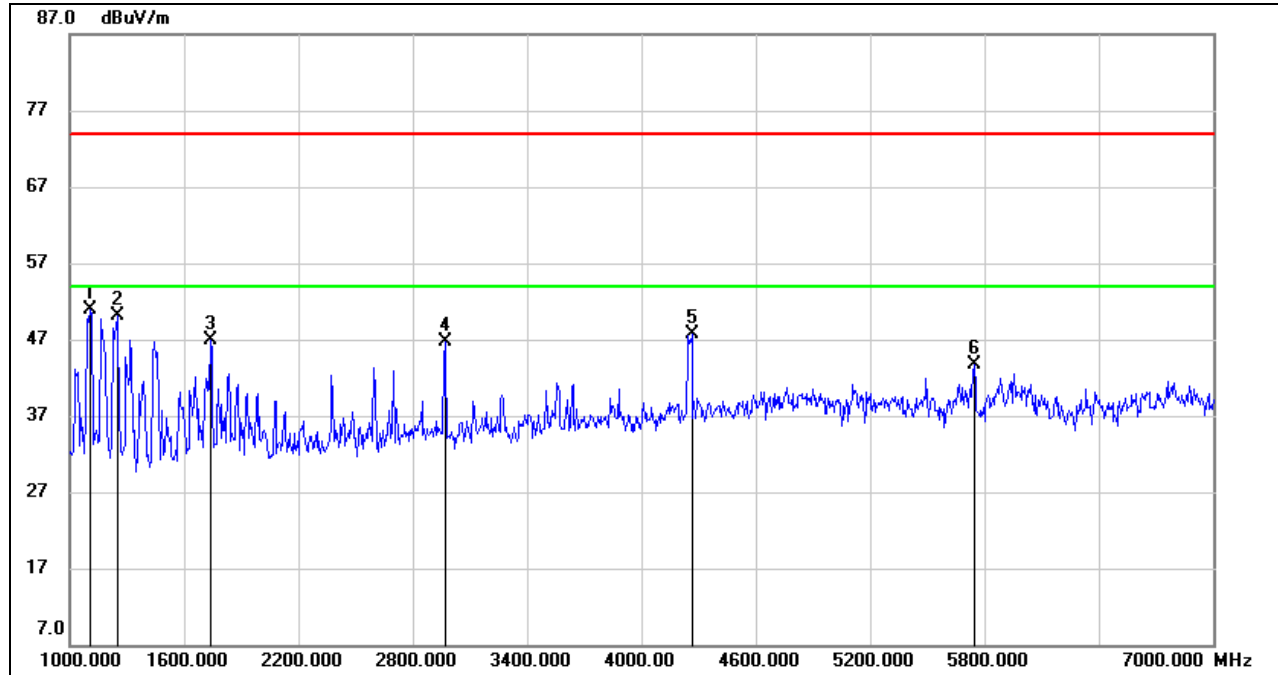
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	64.34	-13.53	50.81	74.00	-23.19	peak
2	1252.000	63.02	-13.00	50.02	74.00	-23.98	peak
3	1738.000	57.51	-10.57	46.94	74.00	-27.06	peak
4	2968.000	52.83	-6.22	46.61	74.00	-27.39	peak
5	4264.000	49.54	-1.84	47.70	74.00	-26.30	peak
6	5746.000	41.66	1.97	43.63	74.00	-30.37	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

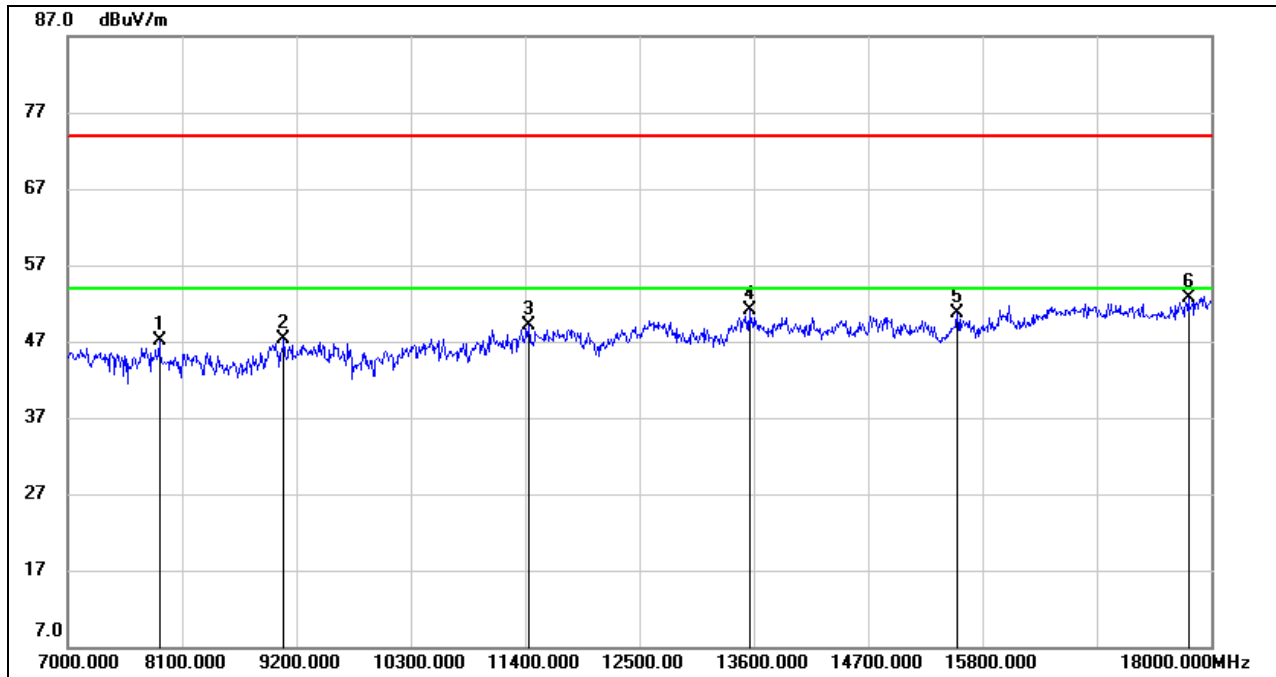
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

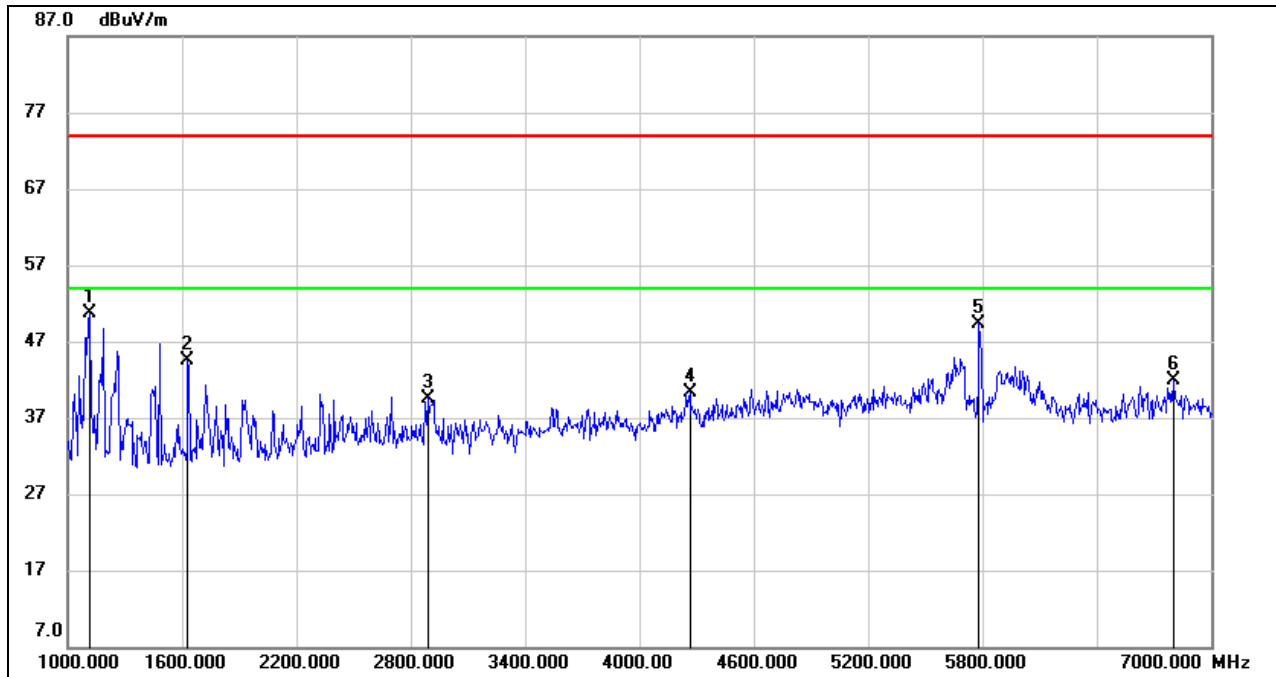


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7880.000	39.93	7.08	47.01	74.00	-26.99	peak
2	9079.000	37.48	9.75	47.23	74.00	-26.77	peak
3	11433.000	35.51	13.50	49.01	74.00	-24.99	peak
4	13556.000	35.24	15.90	51.14	74.00	-22.86	peak
5	15558.000	34.13	16.57	50.70	74.00	-23.30	peak
6	17780.000	29.27	23.35	52.62	74.00	-21.38	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (MID CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1114.000	64.29	-13.49	50.80	74.00	-23.20	peak
2	1630.000	55.94	-11.39	44.55	74.00	-29.45	peak
3	2890.000	46.16	-6.56	39.60	74.00	-34.40	peak
4	4264.000	42.24	-1.84	40.40	74.00	-33.60	peak
5	5782.000	47.45	1.95	49.40	74.00	-24.60	peak
6	6802.000	37.51	4.44	41.95	74.00	-32.05	peak

Note: 1. Measurement = Reading Level + Correct Factor.

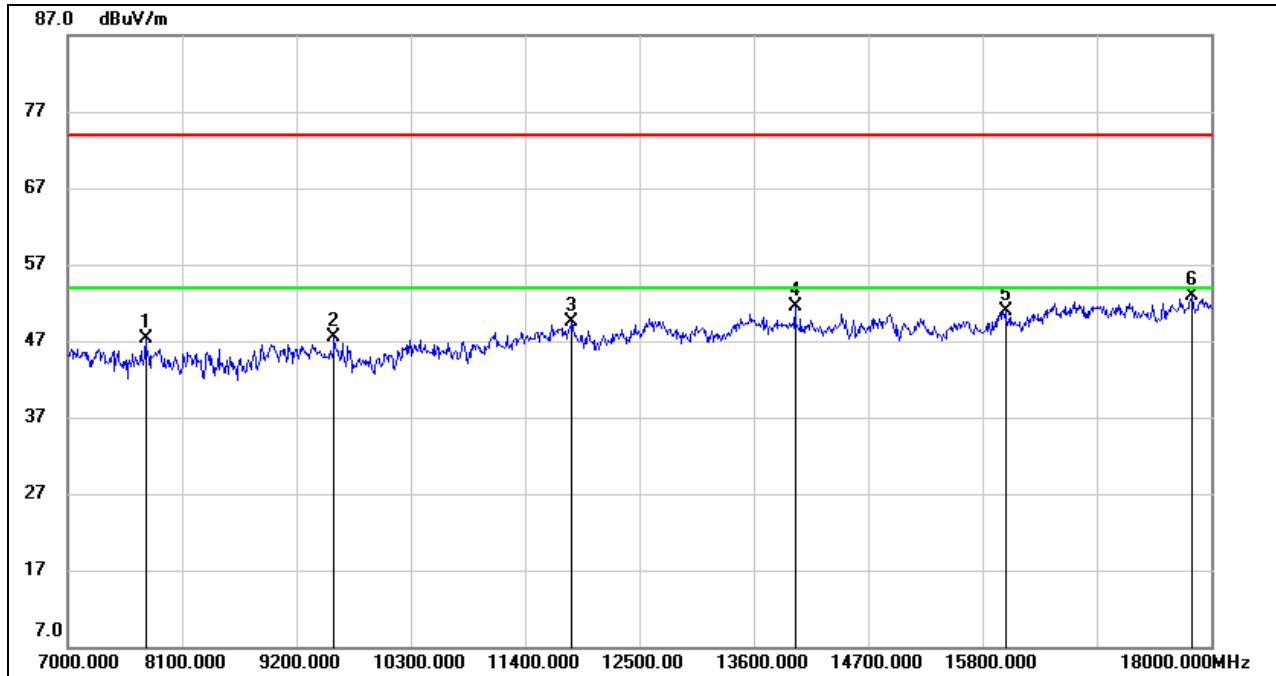
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**7-18GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7748.000	40.14	7.25	47.39	74.00	-26.61	peak
2	9563.000	37.00	10.46	47.46	74.00	-26.54	peak
3	11851.000	35.05	14.45	49.50	74.00	-24.50	peak
4	13996.000	35.46	16.12	51.58	74.00	-22.42	peak
5	16020.000	33.22	17.77	50.99	74.00	-23.01	peak
6	17813.000	29.32	23.50	52.82	74.00	-21.18	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

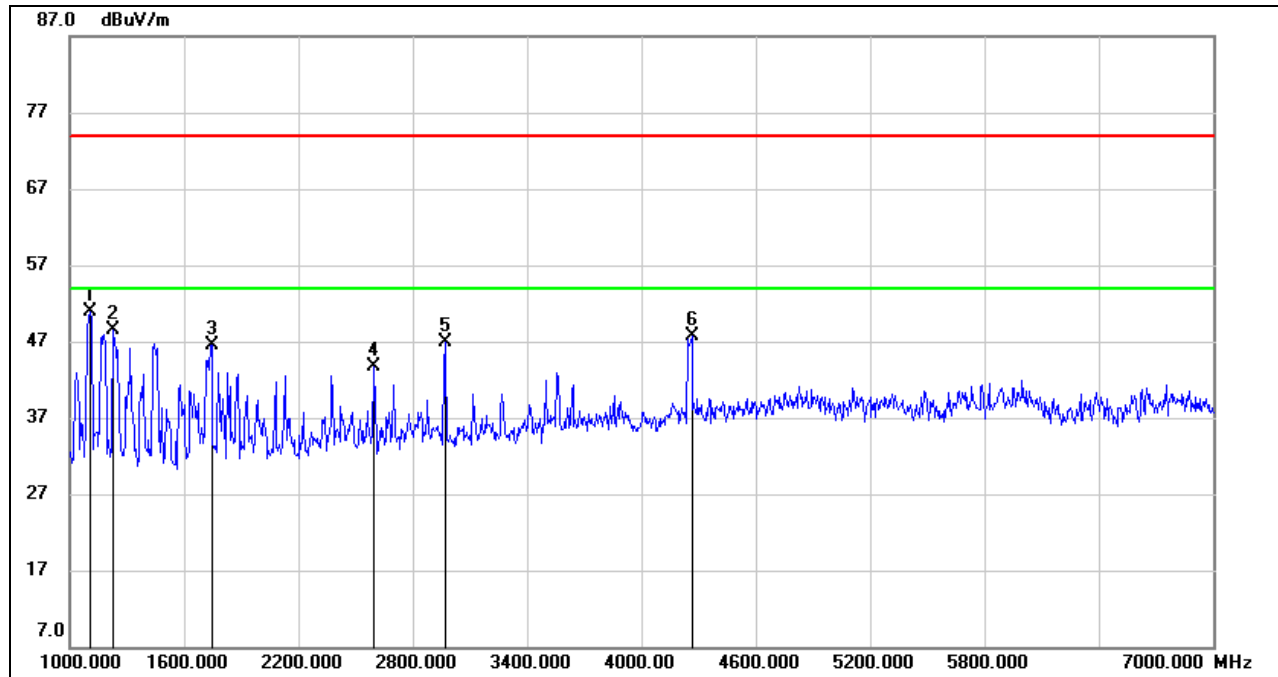
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (MID CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	64.34	-13.53	50.81	74.00	-23.19	peak
2	1228.000	61.56	-13.02	48.54	74.00	-25.46	peak
3	1744.000	57.09	-10.52	46.57	74.00	-27.43	peak
4	2596.000	51.84	-8.18	43.66	74.00	-30.34	peak
5	2968.000	53.21	-6.22	46.99	74.00	-27.01	peak
6	4264.000	49.64	-1.84	47.80	74.00	-26.20	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

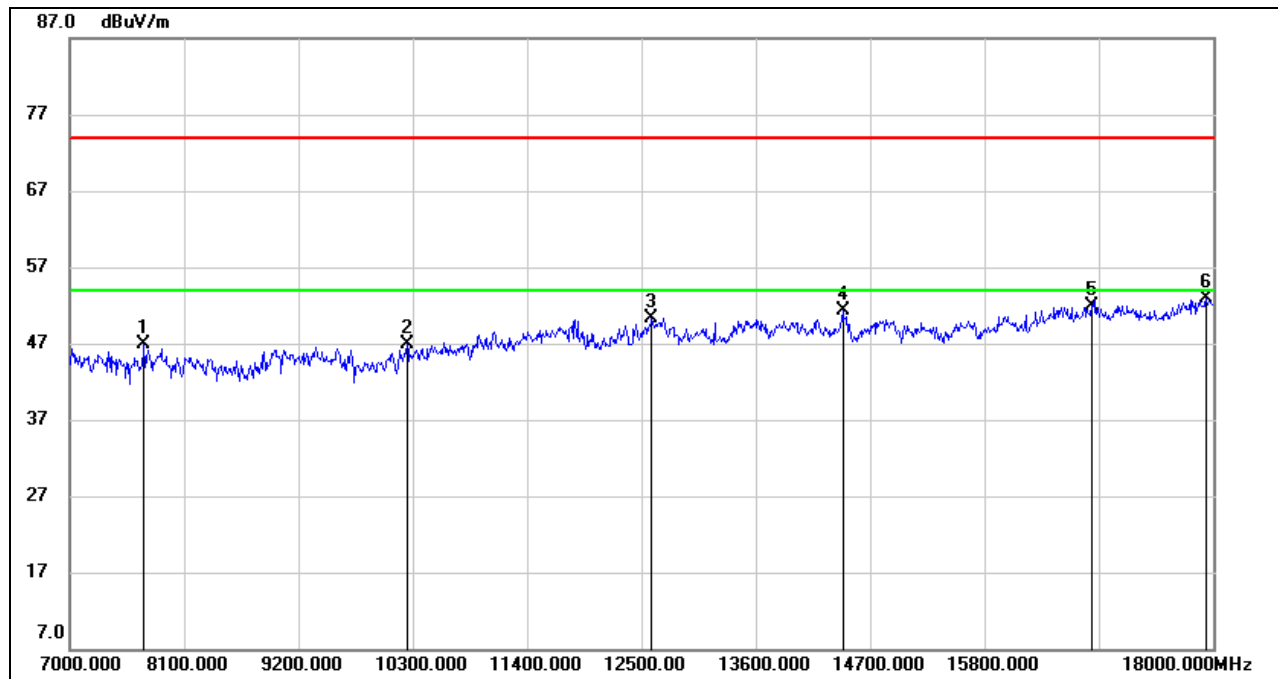
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

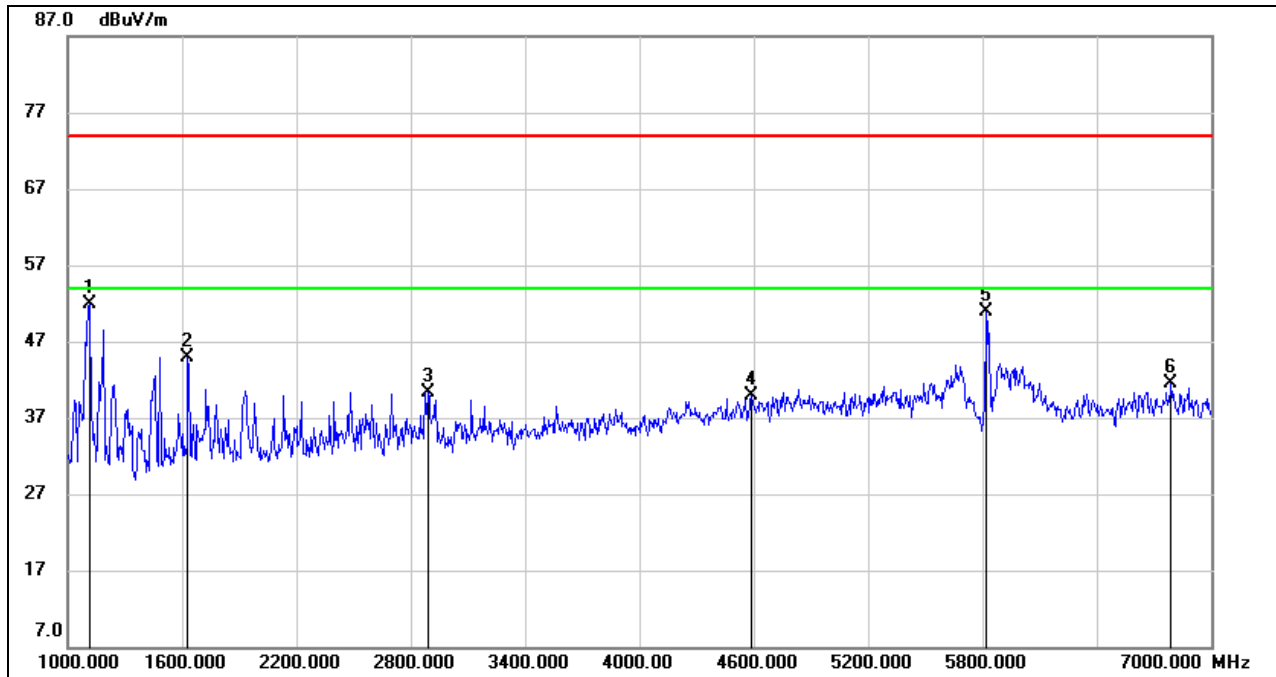


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7715.000	39.65	7.17	46.82	74.00	-27.18	peak
2	10245.000	36.46	10.52	46.98	74.00	-27.02	peak
3	12599.000	35.08	15.16	50.24	74.00	-23.76	peak
4	14436.000	35.18	16.10	51.28	74.00	-22.72	peak
5	16834.000	31.73	20.17	51.90	74.00	-22.10	peak
6	17934.000	29.27	23.62	52.89	74.00	-21.11	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (HIGH CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1114.000	65.40	-13.49	51.91	74.00	-22.09	peak
2	1630.000	56.37	-11.39	44.98	74.00	-29.02	peak
3	2890.000	46.88	-6.56	40.32	74.00	-33.68	peak
4	4588.000	40.68	-0.73	39.95	74.00	-34.05	peak
5	5818.000	48.85	2.00	50.85	74.00	-23.15	peak
6	6790.000	37.08	4.44	41.52	74.00	-32.48	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

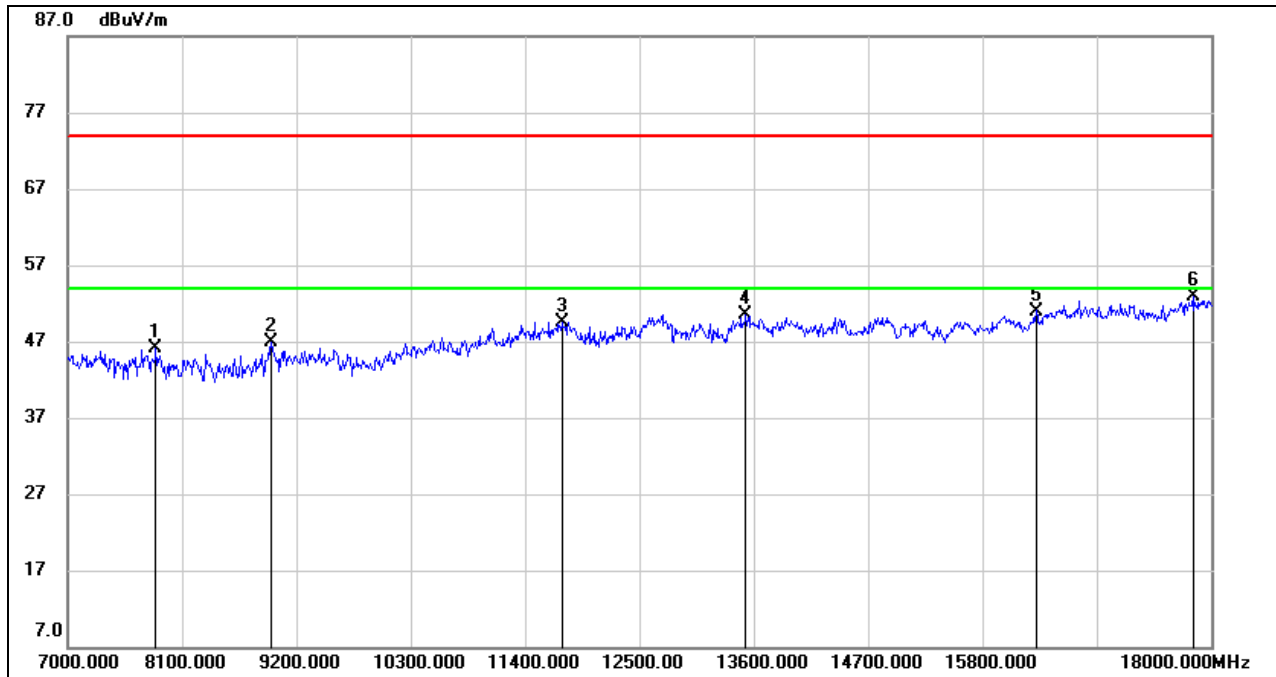
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

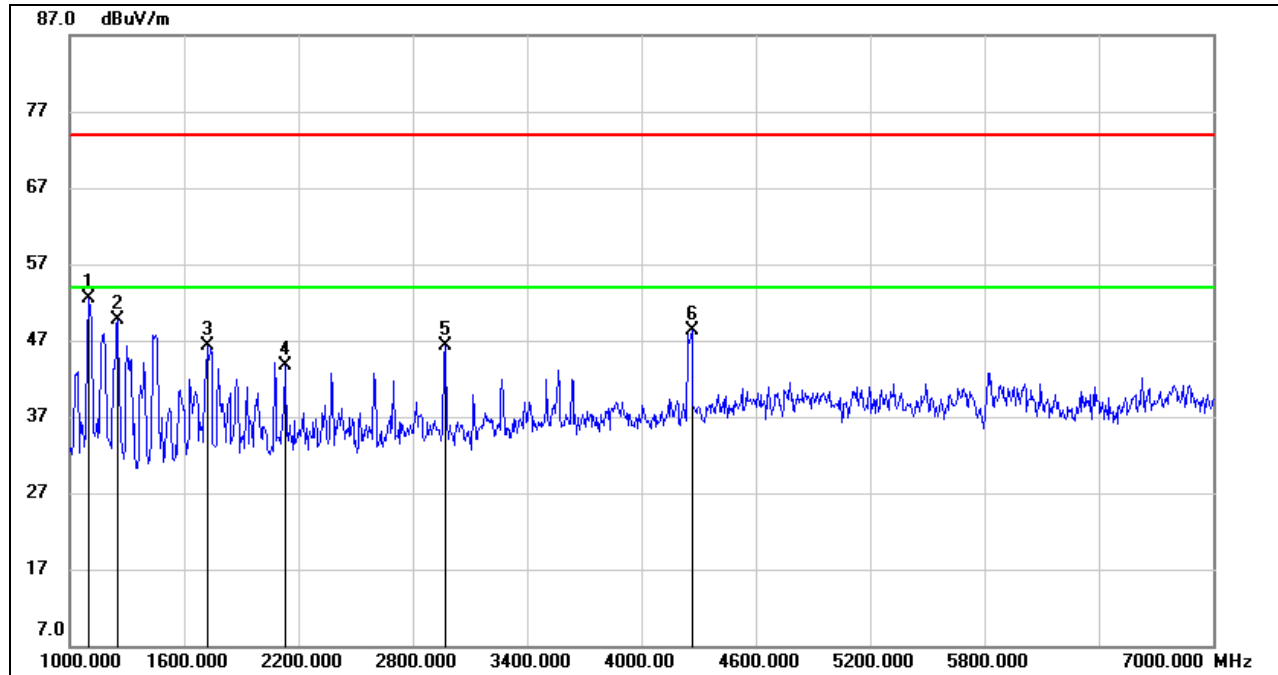


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7847.000	38.88	7.20	46.08	74.00	-27.92	peak
2	8958.000	37.16	9.76	46.92	74.00	-27.08	peak
3	11752.000	35.21	14.33	49.54	74.00	-24.46	peak
4	13523.000	34.48	15.93	50.41	74.00	-23.59	peak
5	16317.000	32.40	18.60	51.00	74.00	-23.00	peak
6	17824.000	29.41	23.52	52.93	74.00	-21.07	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (HIGH CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1102.000	66.15	-13.56	52.59	74.00	-21.41	peak
2	1252.000	62.67	-13.00	49.67	74.00	-24.33	peak
3	1720.000	56.99	-10.71	46.28	74.00	-27.72	peak
4	2128.000	53.26	-9.56	43.70	74.00	-30.30	peak
5	2968.000	52.59	-6.22	46.37	74.00	-27.63	peak
6	4264.000	50.17	-1.84	48.33	74.00	-25.67	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

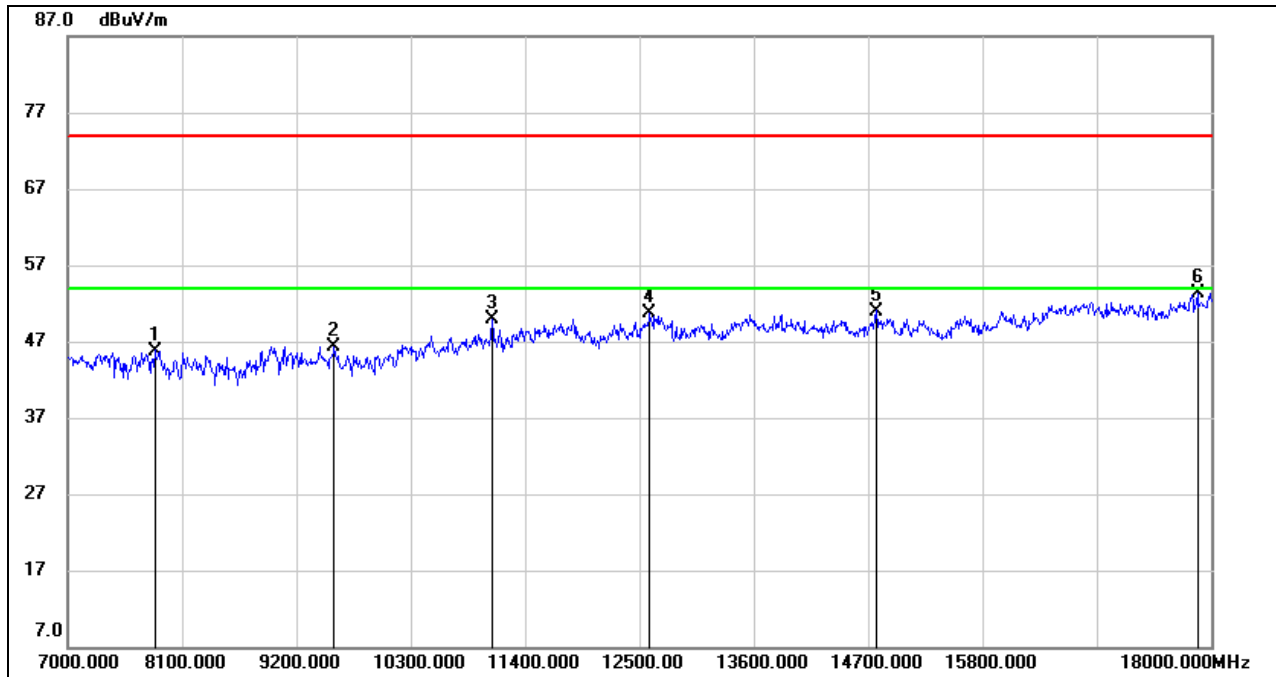
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7836.000	38.56	7.24	45.80	74.00	-28.20	peak
2	9563.000	35.89	10.46	46.35	74.00	-27.65	peak
3	11081.000	37.02	12.79	49.81	74.00	-24.19	peak
4	12599.000	35.58	15.16	50.74	74.00	-23.26	peak
5	14777.000	35.00	16.00	51.00	74.00	-23.00	peak
6	17868.000	29.71	23.56	53.27	74.00	-20.73	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

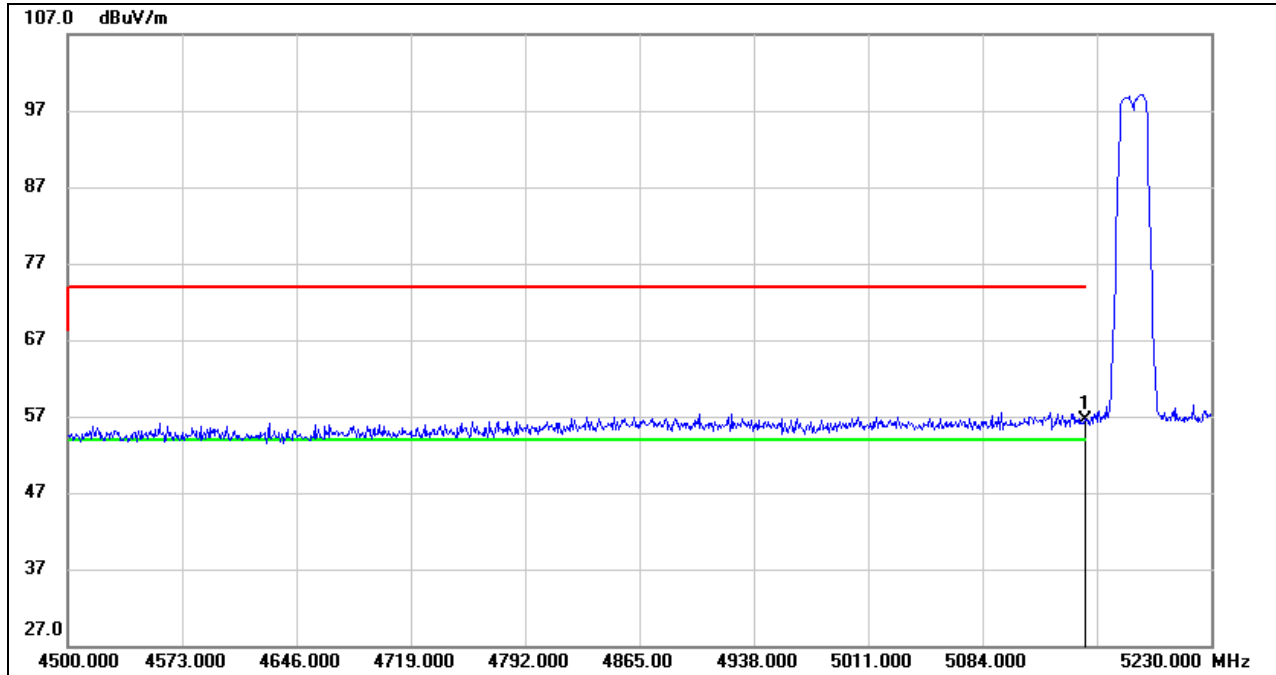


8.2. 802.11ac VHT20 MODE

8.2.1. UNII-1 BAND

RESTRICTED BANDEDGE (LOW CHANNEL, HORIZONTAL)

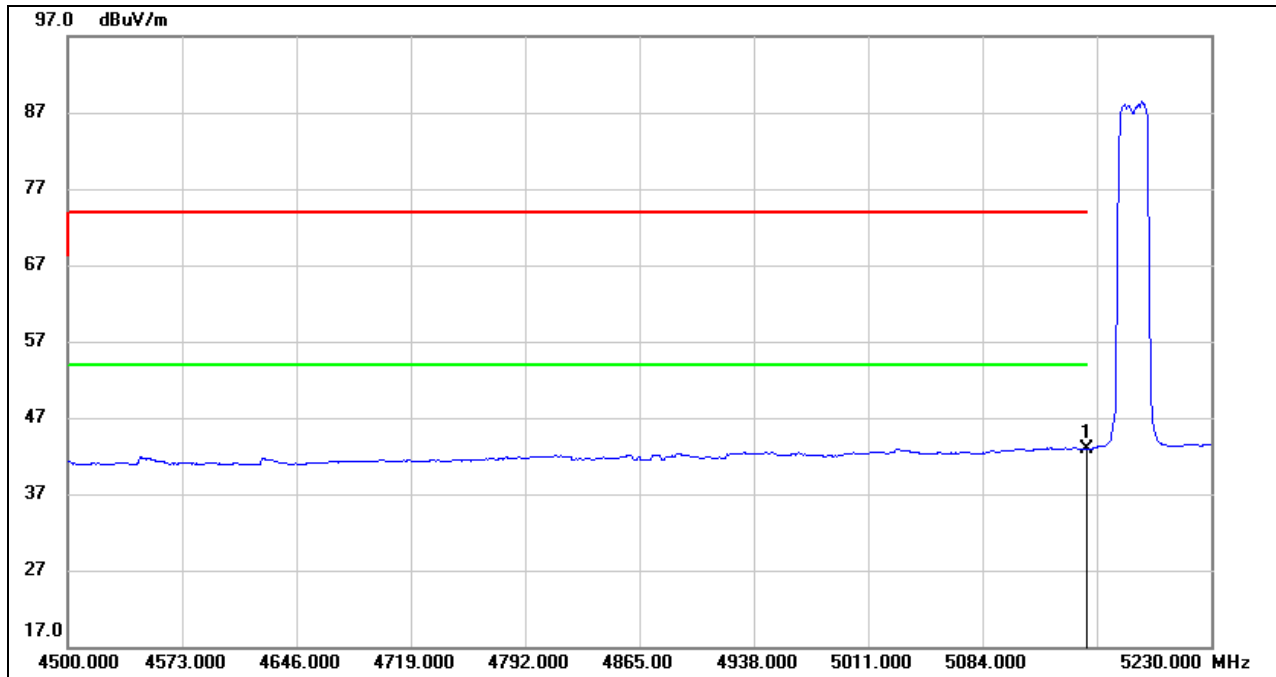
PEAK



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	16.00	40.46	56.46	74.00	-17.54	peak

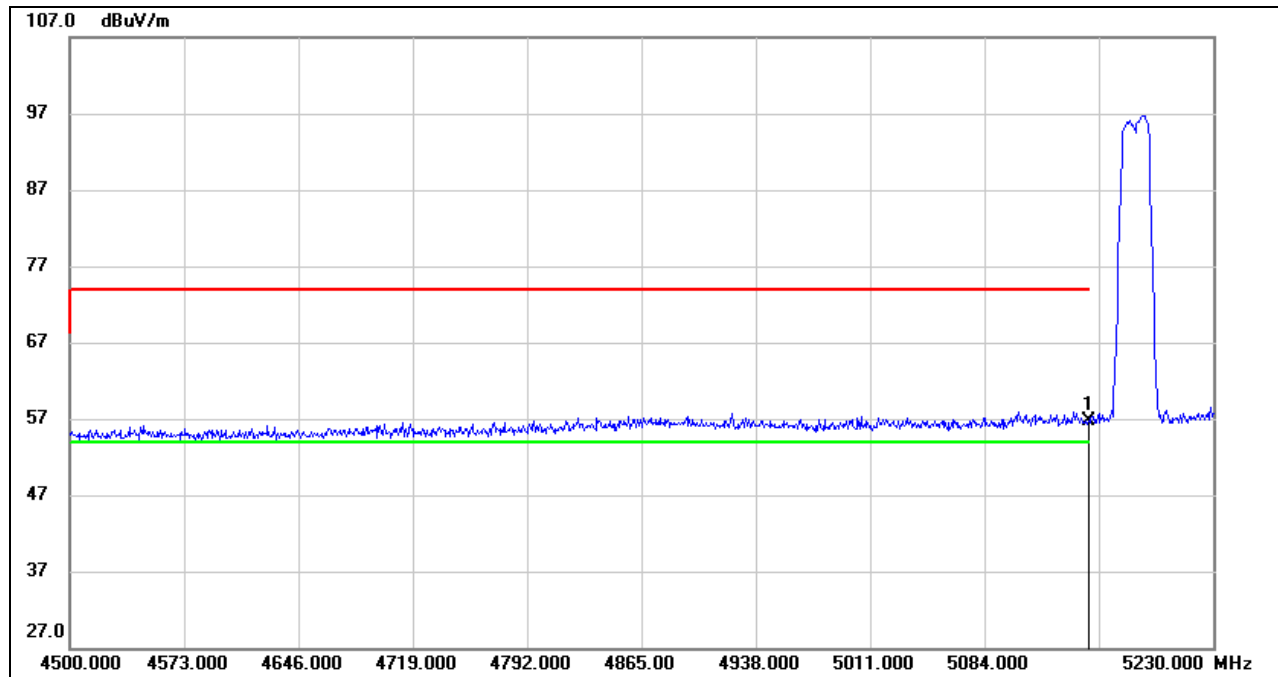
- Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

AVG



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	2.52	40.46	42.98	54.00	-11.02	AVG

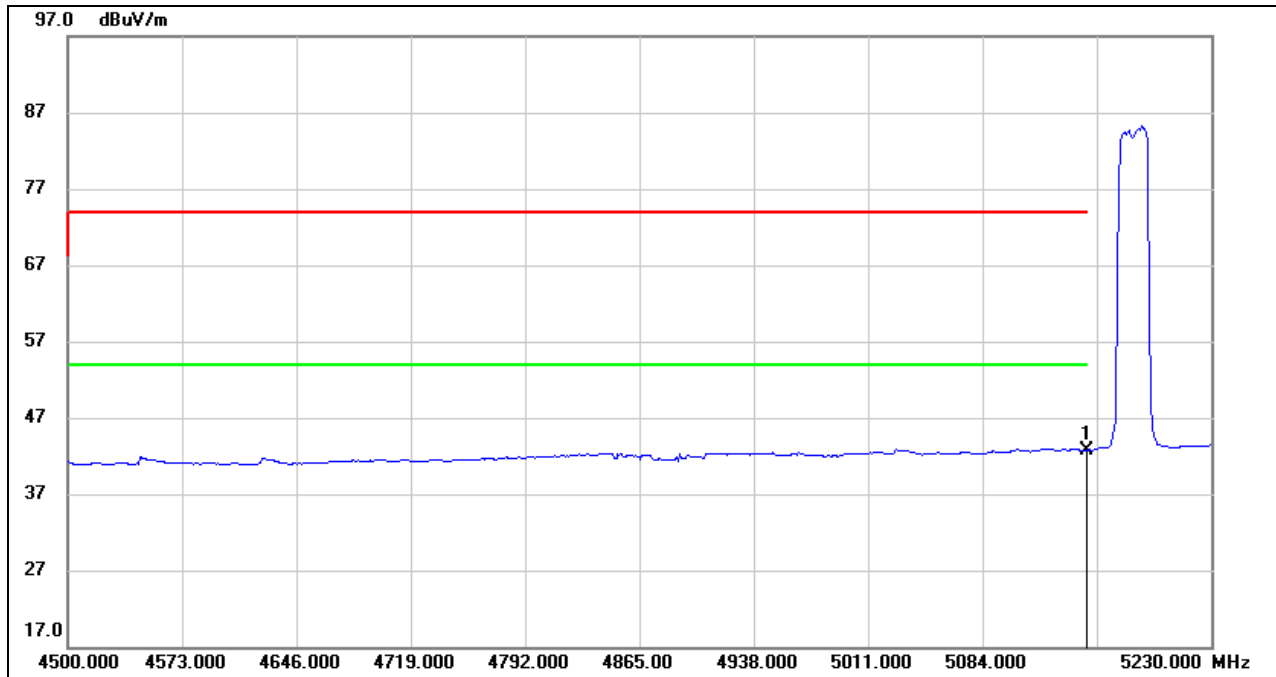
Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. AVG: $VBW=1/T_{on}$, where: T_{on} is the transmitting duration.
4. For the transmitting duration, please refer to clause 7.1.
5. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

**RESTRICTED BANDEDGE (LOW CHANNEL, VERTICAL)****PEAK**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	16.33	40.46	56.79	74.00	-17.21	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

AVG

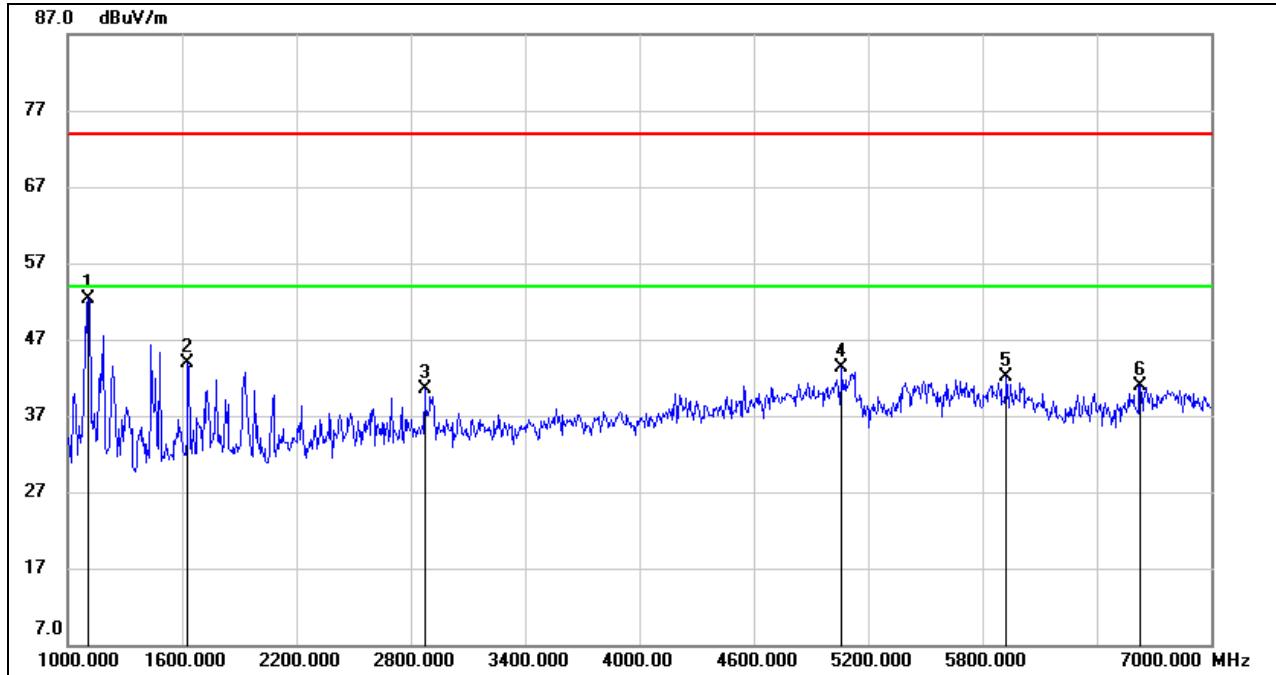


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	2.32	40.46	42.78	54.00	-11.22	AVG

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. AVG: $VBW=1/T_{on}$, where: T_{on} is the transmitting duration.
4. For the transmitting duration, please refer to clause 7.1.
5. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	65.76	-13.53	52.23	74.00	-21.77	peak
2	1630.000	55.26	-11.39	43.87	74.00	-30.13	peak
3	2872.000	47.15	-6.63	40.52	74.00	-33.48	peak
4	5062.000	42.18	1.18	43.36	74.00	-30.64	peak
5	5926.000	39.66	2.36	42.02	74.00	-31.98	peak
6	6628.000	36.50	4.47	40.97	74.00	-33.03	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

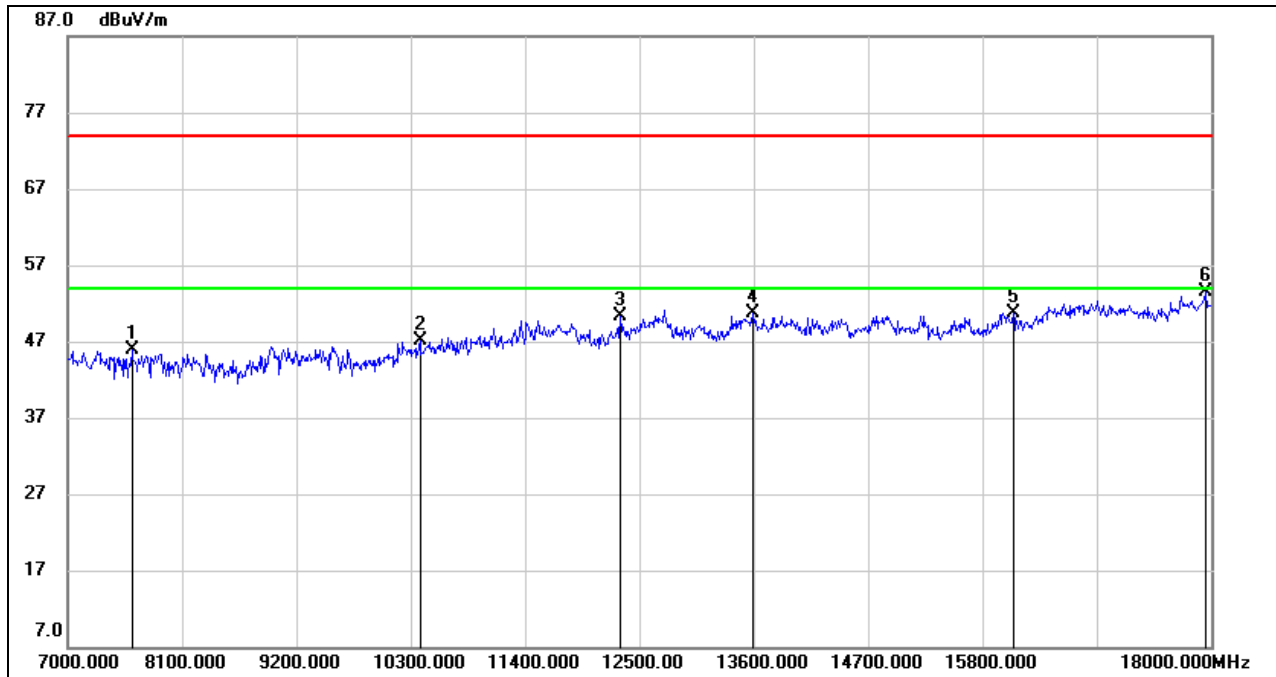
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

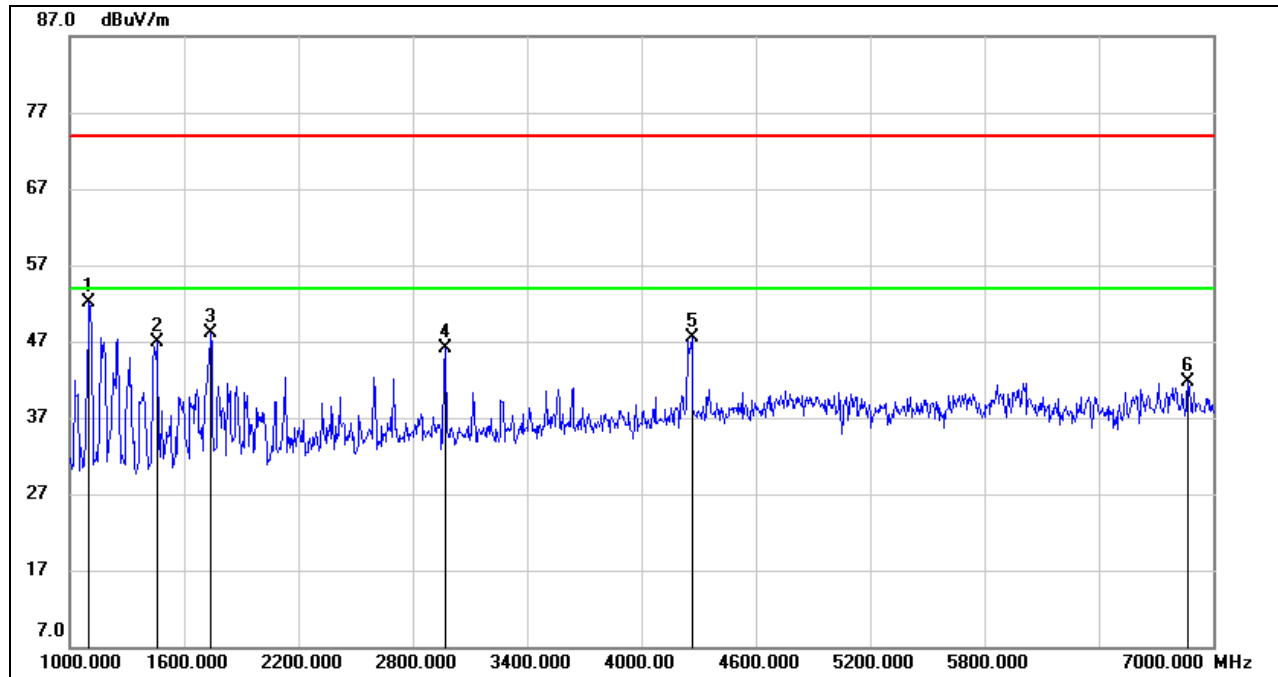


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7616.000	38.89	6.93	45.82	74.00	-28.18	peak
2	10388.000	36.02	11.06	47.08	74.00	-26.92	peak
3	12313.000	35.64	14.59	50.23	74.00	-23.77	peak
4	13589.000	34.76	15.87	50.63	74.00	-23.37	peak
5	16097.000	32.79	17.91	50.70	74.00	-23.30	peak
6	17945.000	29.90	23.63	53.53	74.00	-20.47	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1102.000	65.60	-13.56	52.04	74.00	-21.96	peak
2	1456.000	59.32	-12.50	46.82	74.00	-27.18	peak
3	1738.000	58.76	-10.57	48.19	74.00	-25.81	peak
4	2968.000	52.27	-6.22	46.05	74.00	-27.95	peak
5	4264.000	49.38	-1.84	47.54	74.00	-26.46	peak
6	6868.000	37.14	4.60	41.74	74.00	-32.26	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

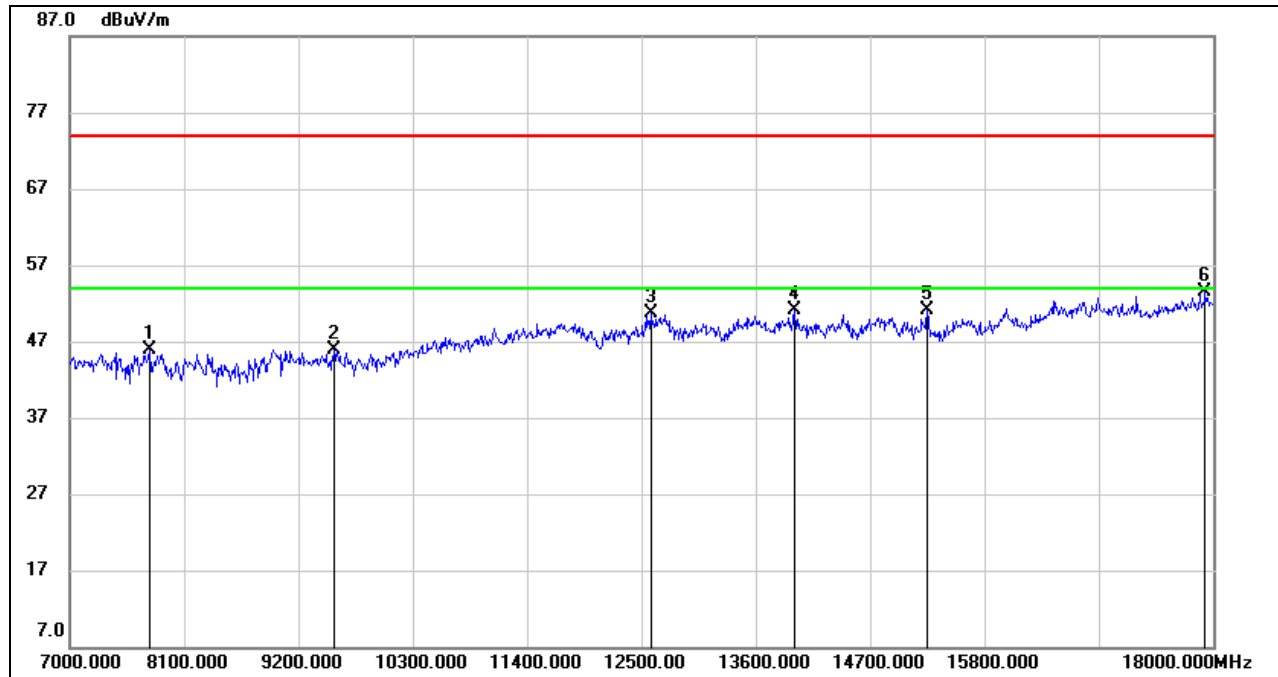
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

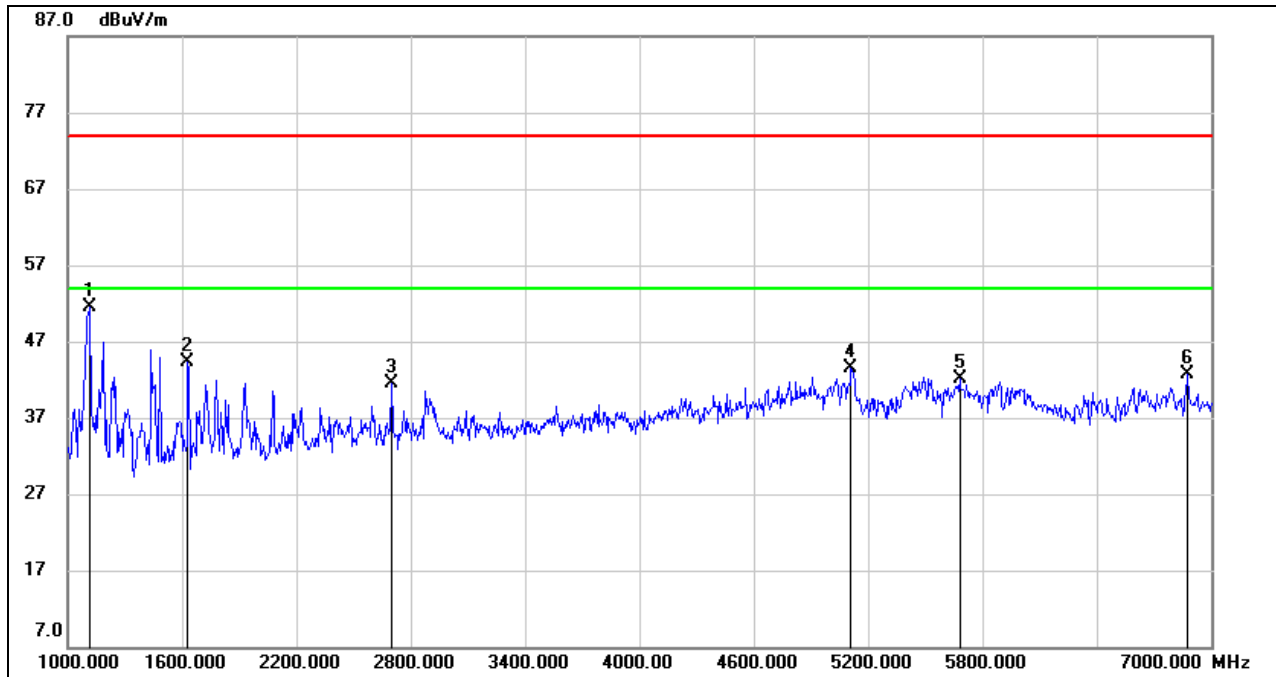


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7770.000	38.52	7.30	45.82	74.00	-28.18	peak
2	9541.000	35.57	10.41	45.98	74.00	-28.02	peak
3	12588.000	35.49	15.14	50.63	74.00	-23.37	peak
4	13974.000	34.91	16.15	51.06	74.00	-22.94	peak
5	15250.000	35.30	15.87	51.17	74.00	-22.83	peak
6	17923.000	29.82	23.61	53.43	74.00	-20.57	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (MID CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1114.000	64.92	-13.49	51.43	74.00	-22.57	peak
2	1630.000	55.75	-11.39	44.36	74.00	-29.64	peak
3	2698.000	49.09	-7.57	41.52	74.00	-32.48	peak
4	5110.000	42.08	1.43	43.51	74.00	-30.49	peak
5	5680.000	40.01	2.00	42.01	74.00	-31.99	peak
6	6874.000	38.05	4.61	42.66	74.00	-31.34	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

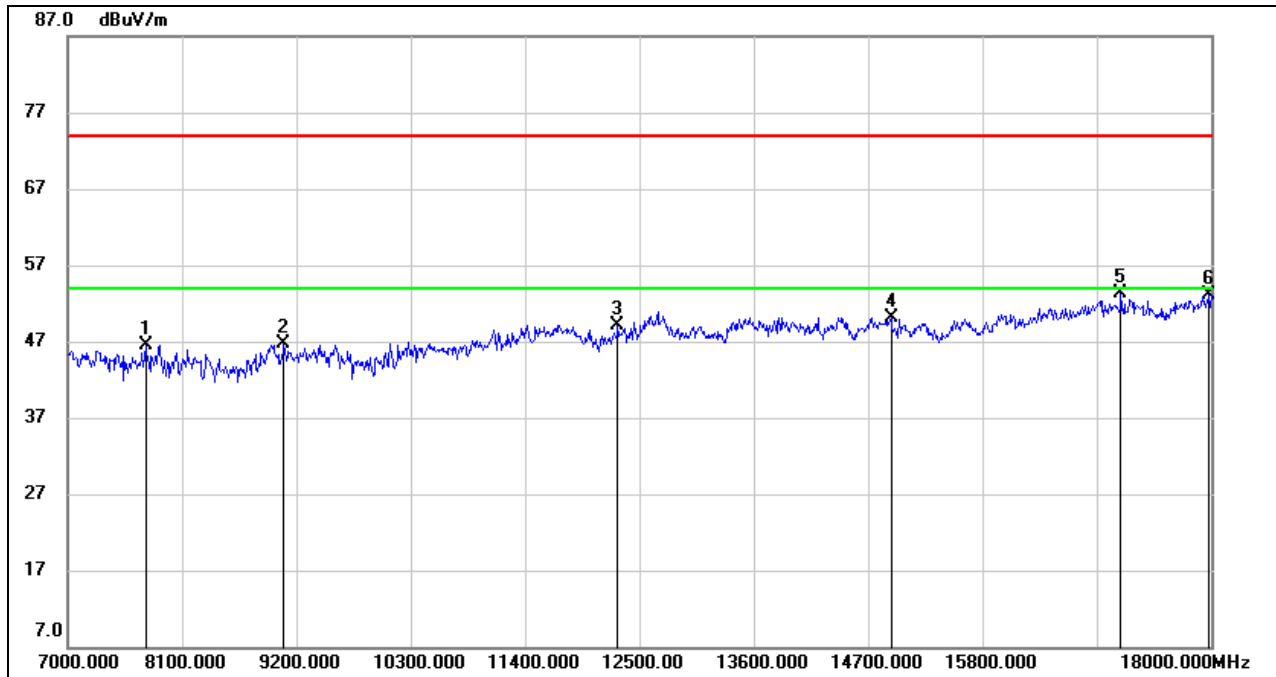
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

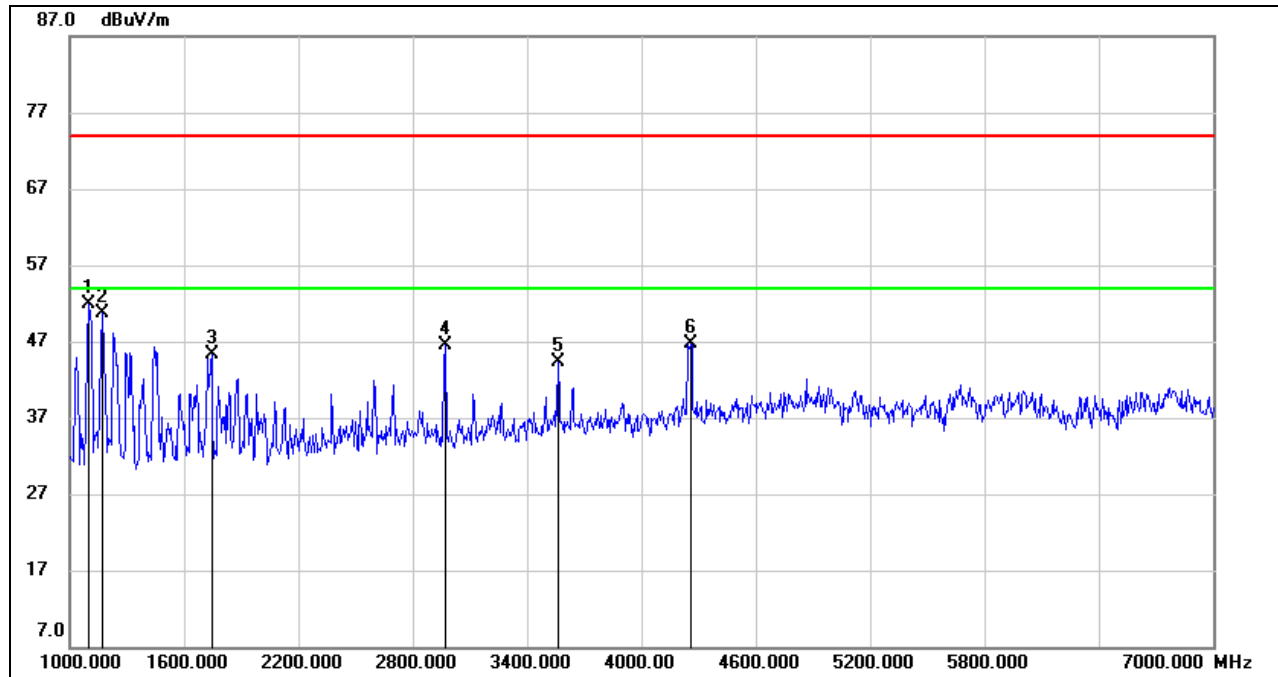


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7748.000	39.32	7.25	46.57	74.00	-27.43	peak
2	9079.000	36.97	9.75	46.72	74.00	-27.28	peak
3	12291.000	34.60	14.54	49.14	74.00	-24.86	peak
4	14920.000	34.13	16.05	50.18	74.00	-23.82	peak
5	17131.000	32.10	21.27	53.37	74.00	-20.63	peak
6	17978.000	29.37	23.67	53.04	74.00	-20.96	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (MID CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1102.000	65.52	-13.56	51.96	74.00	-22.04	peak
2	1174.000	63.84	-13.20	50.64	74.00	-23.36	peak
3	1744.000	55.90	-10.52	45.38	74.00	-28.62	peak
4	2974.000	52.78	-6.18	46.60	74.00	-27.40	peak
5	3562.000	48.93	-4.67	44.26	74.00	-29.74	peak
6	4258.000	48.57	-1.84	46.73	74.00	-27.27	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

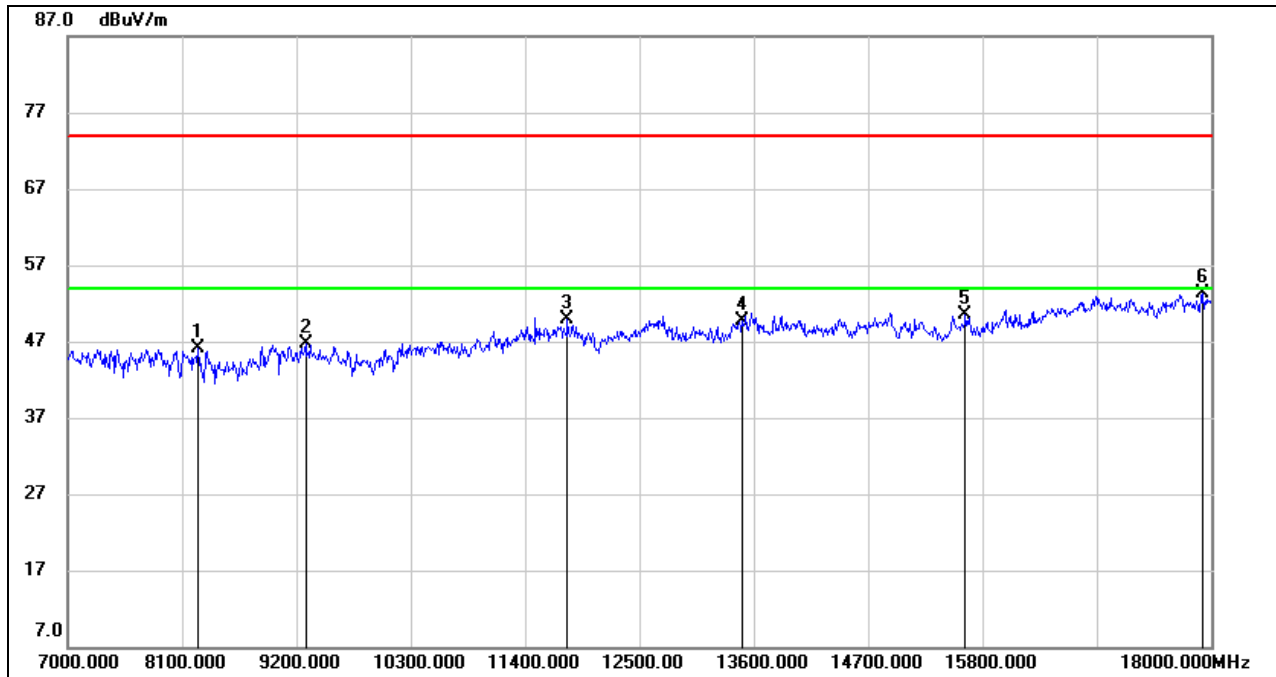
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

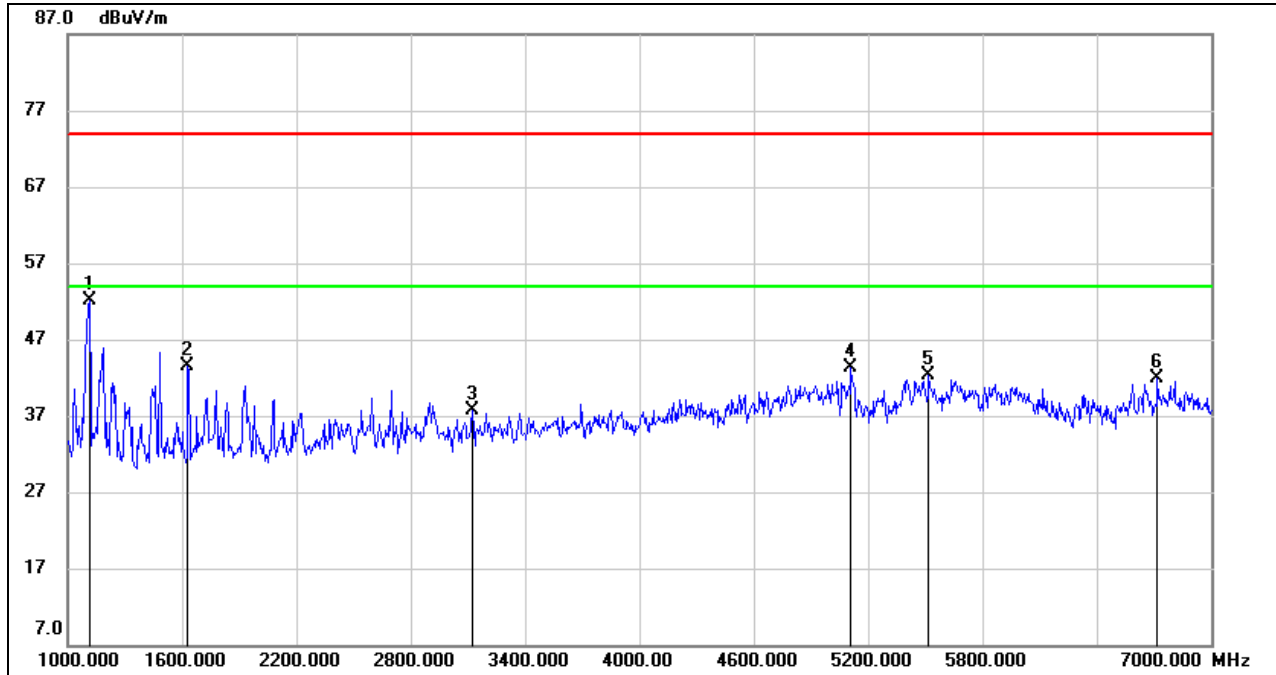


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	8254.000	37.87	8.23	46.10	74.00	-27.90	peak
2	9288.000	37.26	9.49	46.75	74.00	-27.25	peak
3	11807.000	35.31	14.52	49.83	74.00	-24.17	peak
4	13490.000	33.79	15.96	49.75	74.00	-24.25	peak
5	15635.000	33.69	16.77	50.46	74.00	-23.54	peak
6	17923.000	29.69	23.61	53.30	74.00	-20.70	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (HIGH CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1114.000	65.68	-13.49	52.19	74.00	-21.81	peak
2	1630.000	54.97	-11.39	43.58	74.00	-30.42	peak
3	3124.000	43.50	-5.82	37.68	74.00	-36.32	peak
4	5110.000	41.95	1.43	43.38	74.00	-30.62	peak
5	5518.000	40.44	1.84	42.28	74.00	-31.72	peak
6	6718.000	37.47	4.45	41.92	74.00	-32.08	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

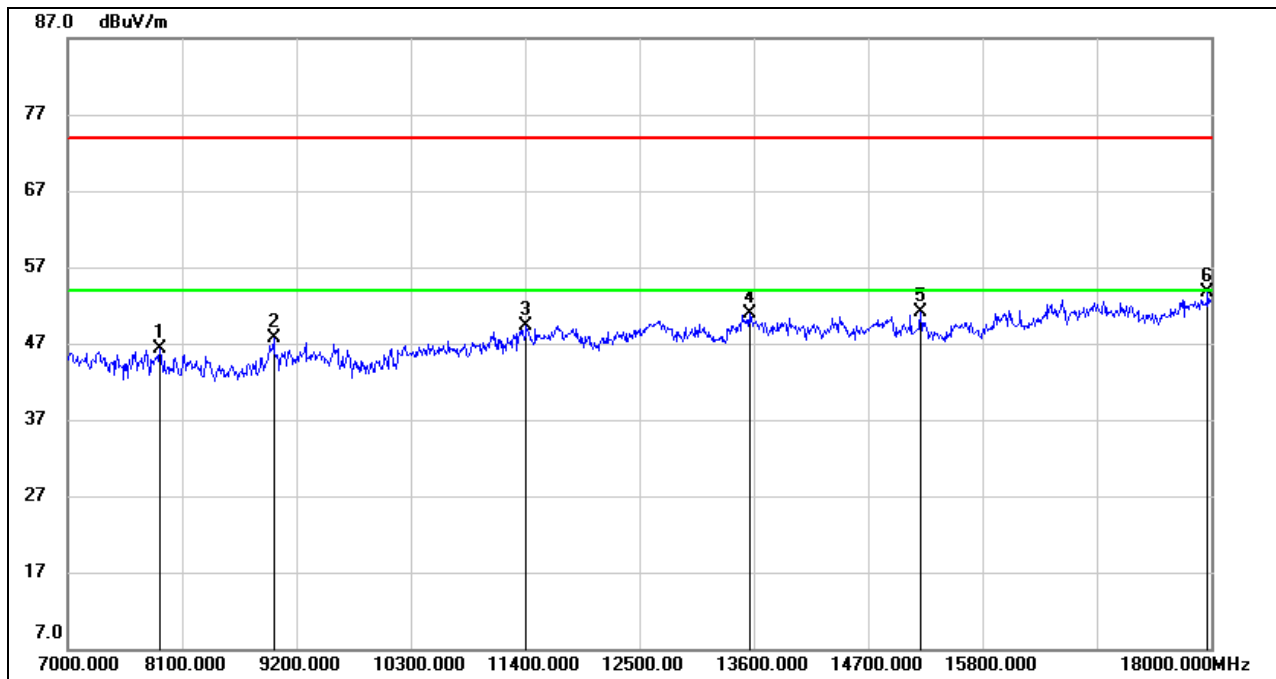
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

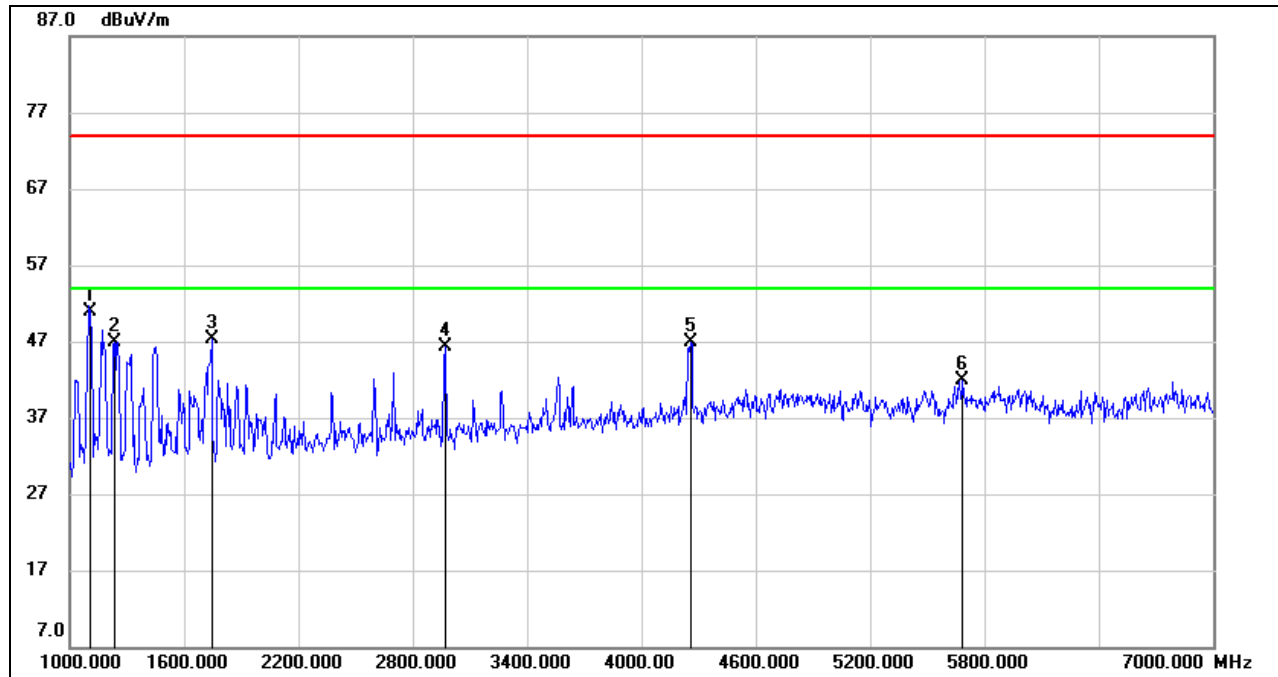


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7880.000	39.28	7.08	46.36	74.00	-27.64	peak
2	8980.000	37.74	9.98	47.72	74.00	-26.28	peak
3	11411.000	35.87	13.46	49.33	74.00	-24.67	peak
4	13556.000	34.91	15.90	50.81	74.00	-23.19	peak
5	15206.000	35.30	15.79	51.09	74.00	-22.91	peak
6	17967.000	30.01	23.65	53.66	74.00	-20.34	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (HIGH CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	64.44	-13.53	50.91	74.00	-23.09	peak
2	1234.000	59.99	-13.02	46.97	74.00	-27.03	peak
3	1744.000	57.85	-10.52	47.33	74.00	-26.67	peak
4	2968.000	52.61	-6.22	46.39	74.00	-27.61	peak
5	4258.000	48.69	-1.84	46.85	74.00	-27.15	peak
6	5686.000	39.93	1.98	41.91	74.00	-32.09	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

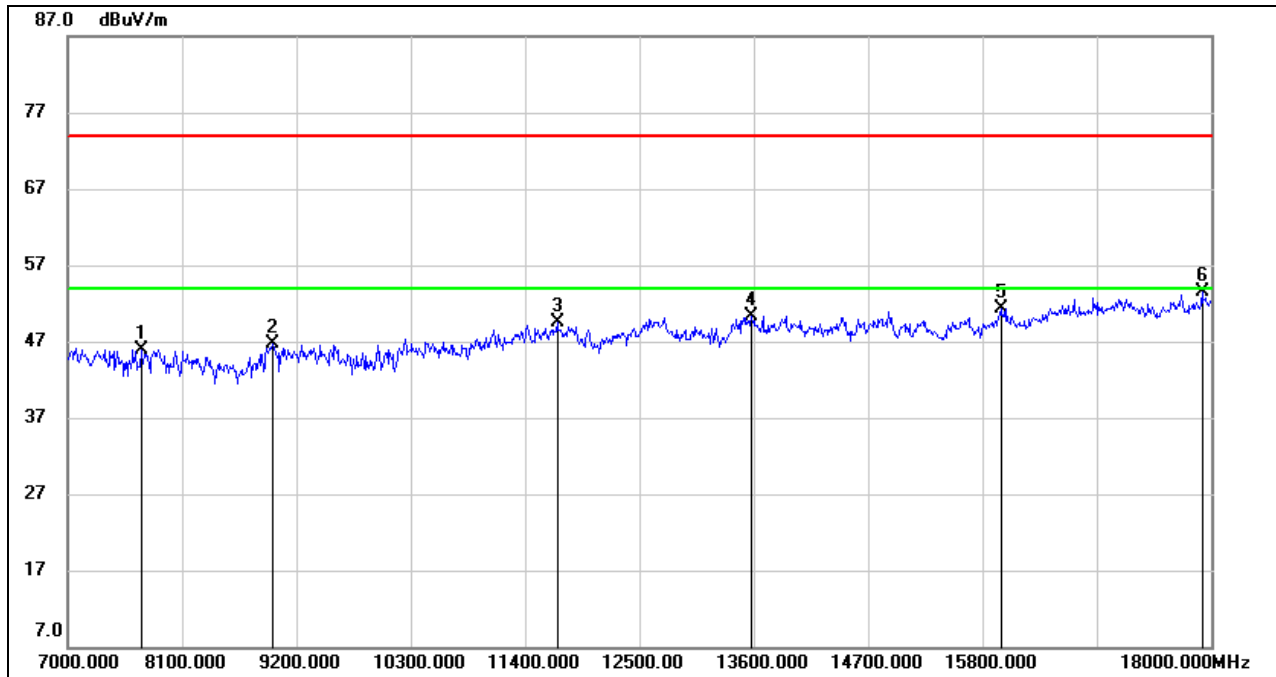
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz



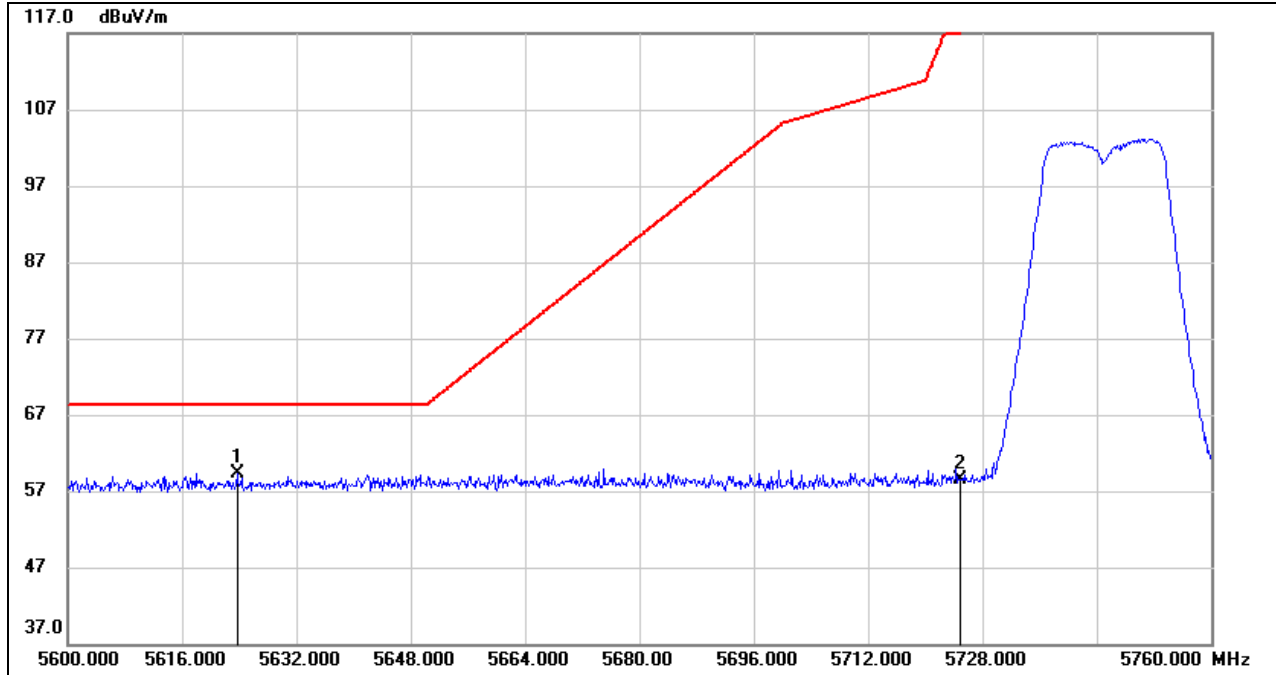
No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7704.000	38.78	7.14	45.92	74.00	-28.08	peak
2	8969.000	36.85	9.88	46.73	74.00	-27.27	peak
3	11708.000	35.43	14.16	49.59	74.00	-24.41	peak
4	13578.000	34.50	15.89	50.39	74.00	-23.61	peak
5	15976.000	33.65	17.64	51.29	74.00	-22.71	peak
6	17912.000	29.80	23.61	53.41	74.00	-20.59	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

8.2.2. UNII-3 BAND

RESTRICTED BANDEDGE (LOW CHANNEL, HORIZONTAL)

PEAK

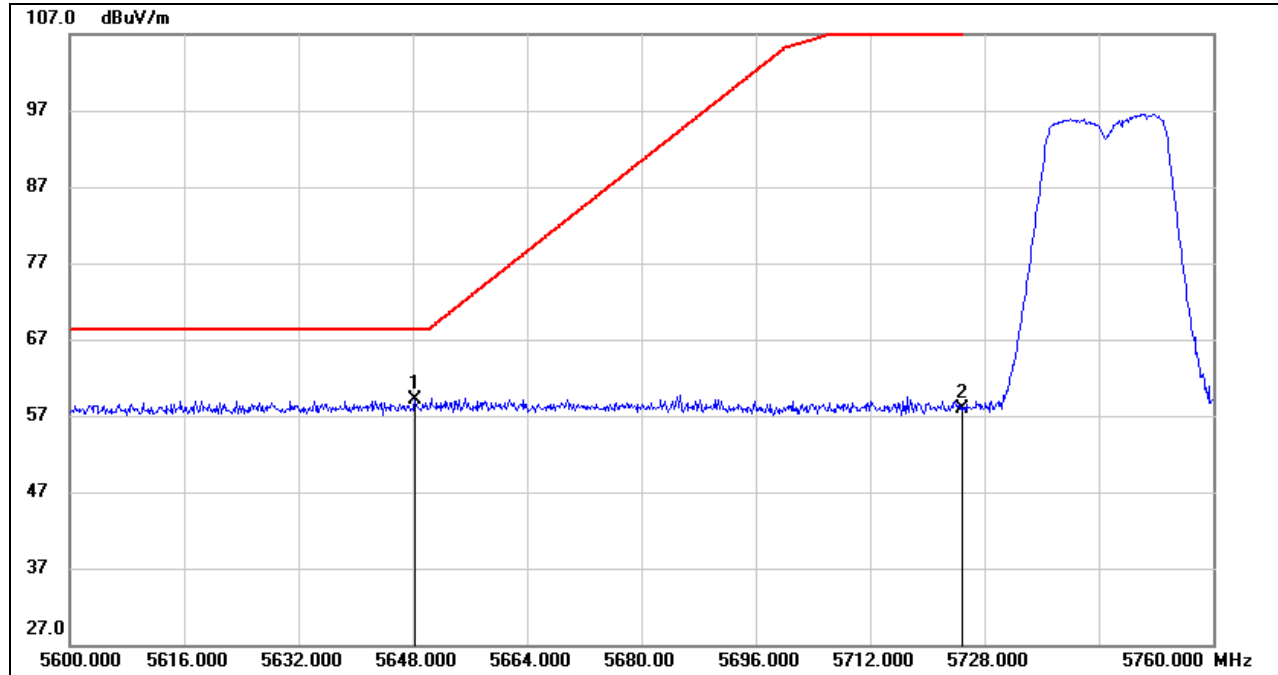


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5623.680	17.89	41.47	59.36	68.20	-8.84	peak
2	5725.000	16.82	41.61	58.43	122.20	-63.77	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

RESTRICTED BANDEDGE (LOW CHANNEL, VERTICAL)

PEAK

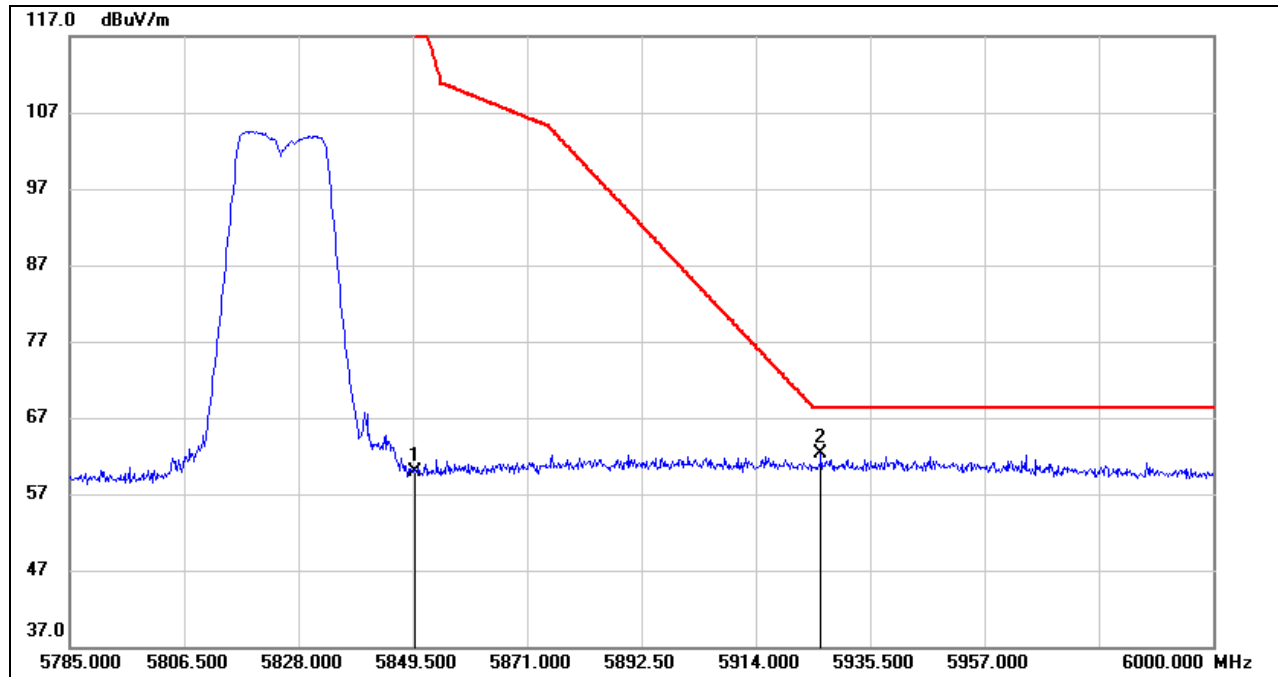


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5648.320	17.57	41.48	59.05	68.20	-9.15	peak
2	5725.000	16.34	41.61	57.95	122.20	-64.25	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

RESTRICTED BANDEDGE (HIGH CHANNEL, HORIZONTAL)

PEAK

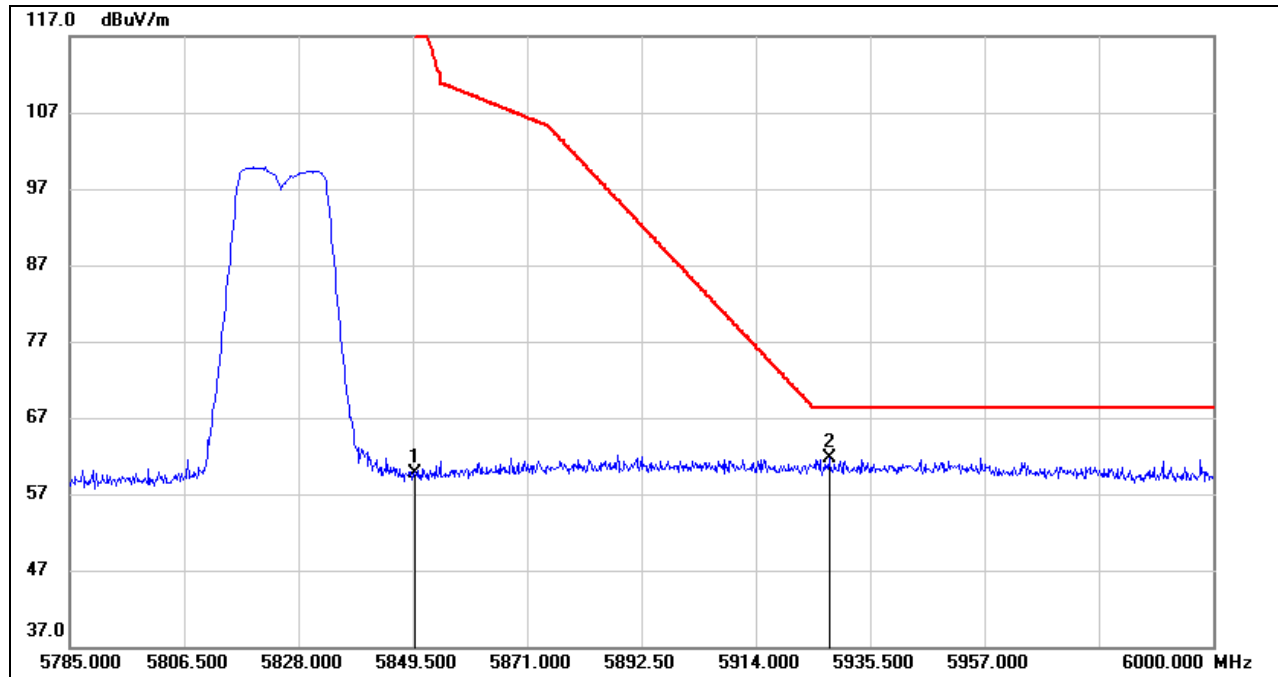


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5850.000	16.95	42.89	59.84	122.20	-62.36	peak
2	5926.255	18.90	43.40	62.30	68.20	-5.90	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

RESTRICTED BANDEGE (HIGH CHANNEL, VERTICAL)

PEAK

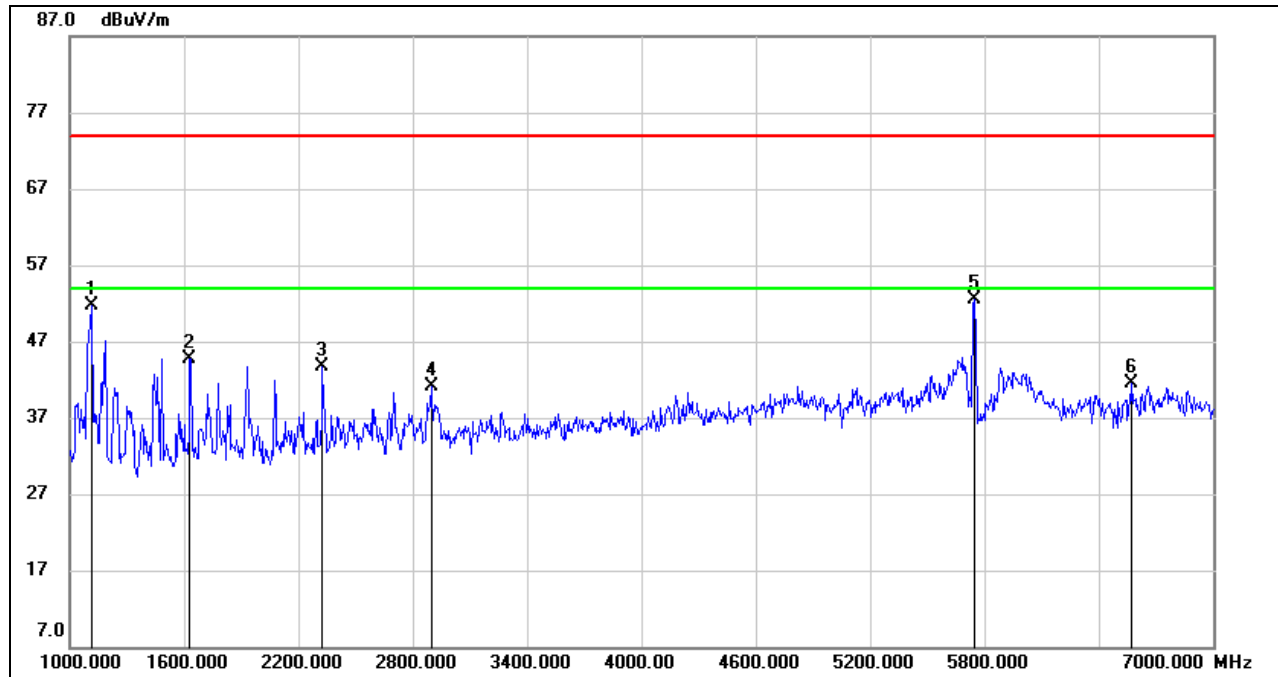


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5850.000	16.87	42.89	59.76	122.20	-62.44	peak
2	5927.760	18.34	43.37	61.71	68.20	-6.49	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1114.000	65.12	-13.49	51.63	74.00	-22.37	peak
2	1630.000	56.14	-11.39	44.75	74.00	-29.25	peak
3	2326.000	52.61	-8.83	43.78	74.00	-30.22	peak
4	2896.000	47.64	-6.53	41.11	74.00	-32.89	peak
5	5746.000	50.48	1.97	52.45	74.00	-21.55	peak
6	6574.000	37.18	4.34	41.52	74.00	-32.48	peak

Note: 1. Measurement = Reading Level + Correct Factor.

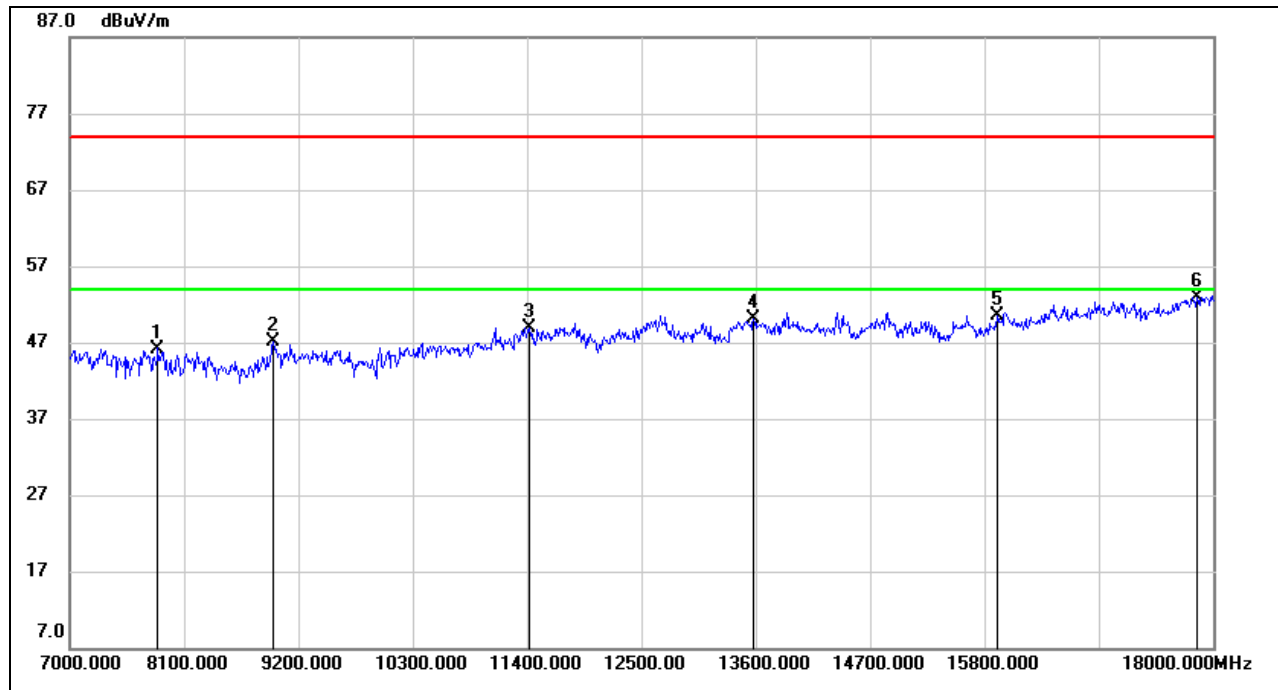
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7847.000	39.00	7.20	46.20	74.00	-27.80	peak
2	8958.000	37.31	9.76	47.07	74.00	-26.93	peak
3	11422.000	35.49	13.48	48.97	74.00	-25.03	peak
4	13578.000	34.19	15.89	50.08	74.00	-23.92	peak
5	15921.000	33.09	17.39	50.48	74.00	-23.52	peak
6	17846.000	29.41	23.54	52.95	74.00	-21.05	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

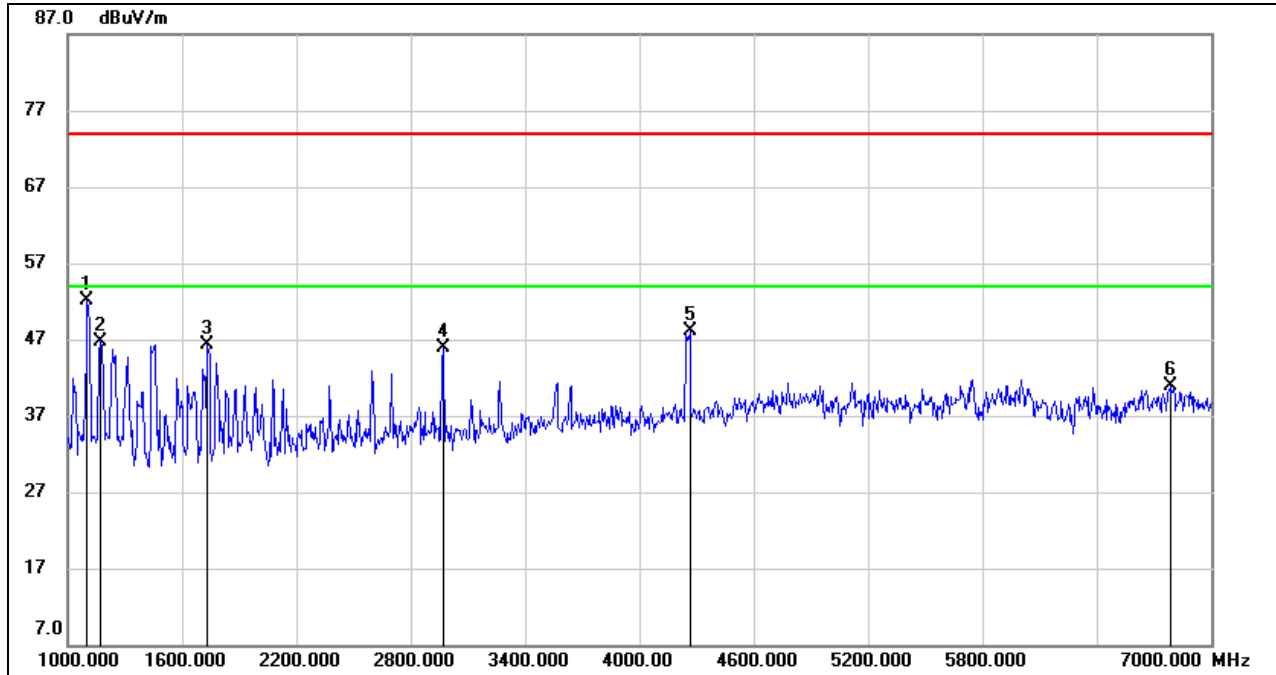
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1102.000	65.59	-13.56	52.03	74.00	-21.97	peak
2	1174.000	59.87	-13.20	46.67	74.00	-27.33	peak
3	1732.000	56.93	-10.62	46.31	74.00	-27.69	peak
4	2968.000	52.17	-6.22	45.95	74.00	-28.05	peak
5	4264.000	49.89	-1.84	48.05	74.00	-25.95	peak
6	6784.000	36.40	4.44	40.84	74.00	-33.16	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

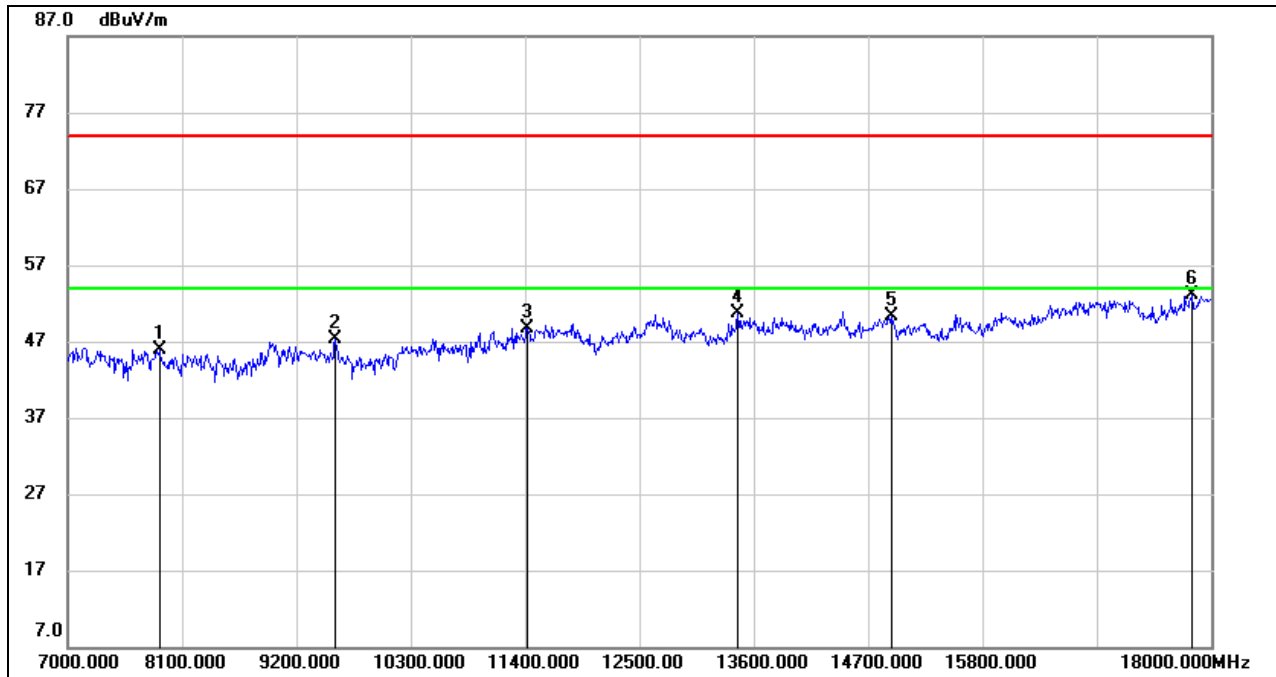
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

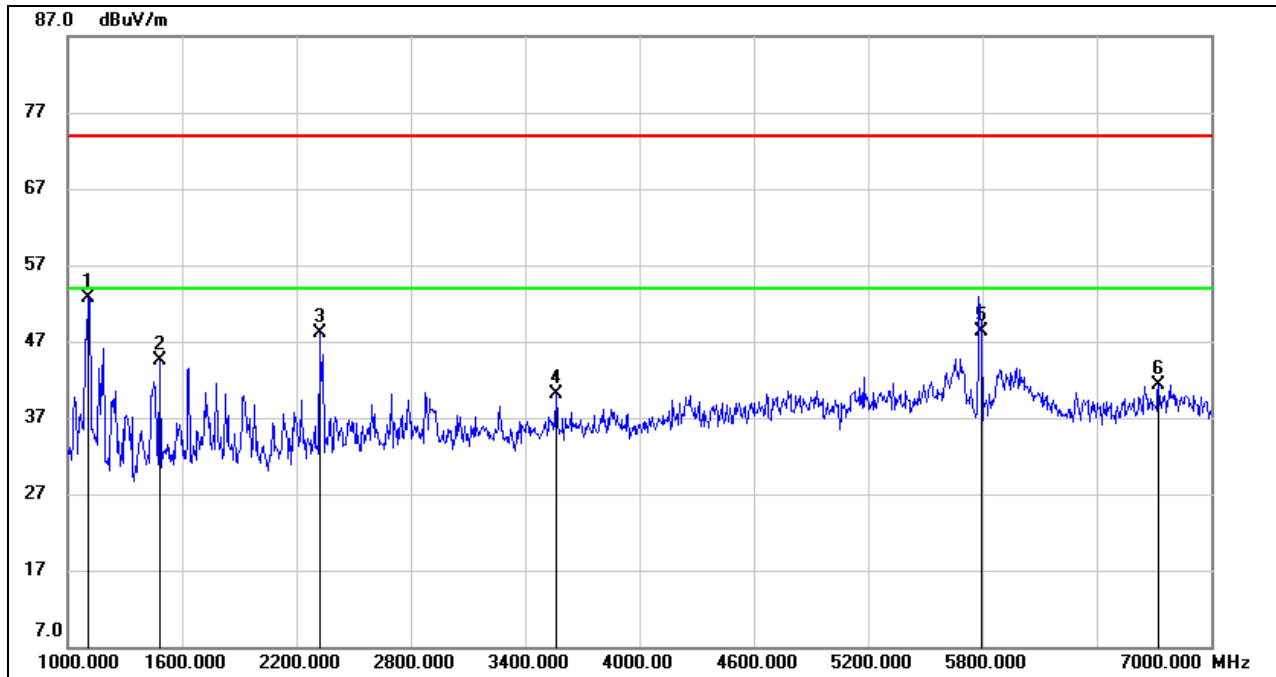


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7880.000	38.90	7.08	45.98	74.00	-28.02	peak
2	9574.000	36.78	10.49	47.27	74.00	-26.73	peak
3	11422.000	35.31	13.48	48.79	74.00	-25.21	peak
4	13446.000	34.72	15.96	50.68	74.00	-23.32	peak
5	14920.000	34.26	16.05	50.31	74.00	-23.69	peak
6	17813.000	29.59	23.50	53.09	74.00	-20.91	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (MID CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	66.32	-13.53	52.79	74.00	-21.21	peak
2	1480.000	57.00	-12.40	44.60	74.00	-29.40	peak
3	2320.000	56.96	-8.84	48.12	74.00	-25.88	peak
4	3562.000	44.84	-4.67	40.17	74.00	-33.83	peak
5	5794.000	46.36	1.95	48.31	74.00	-25.69	peak
6	6724.000	36.88	4.45	41.33	74.00	-32.67	peak

Note: 1. Measurement = Reading Level + Correct Factor.

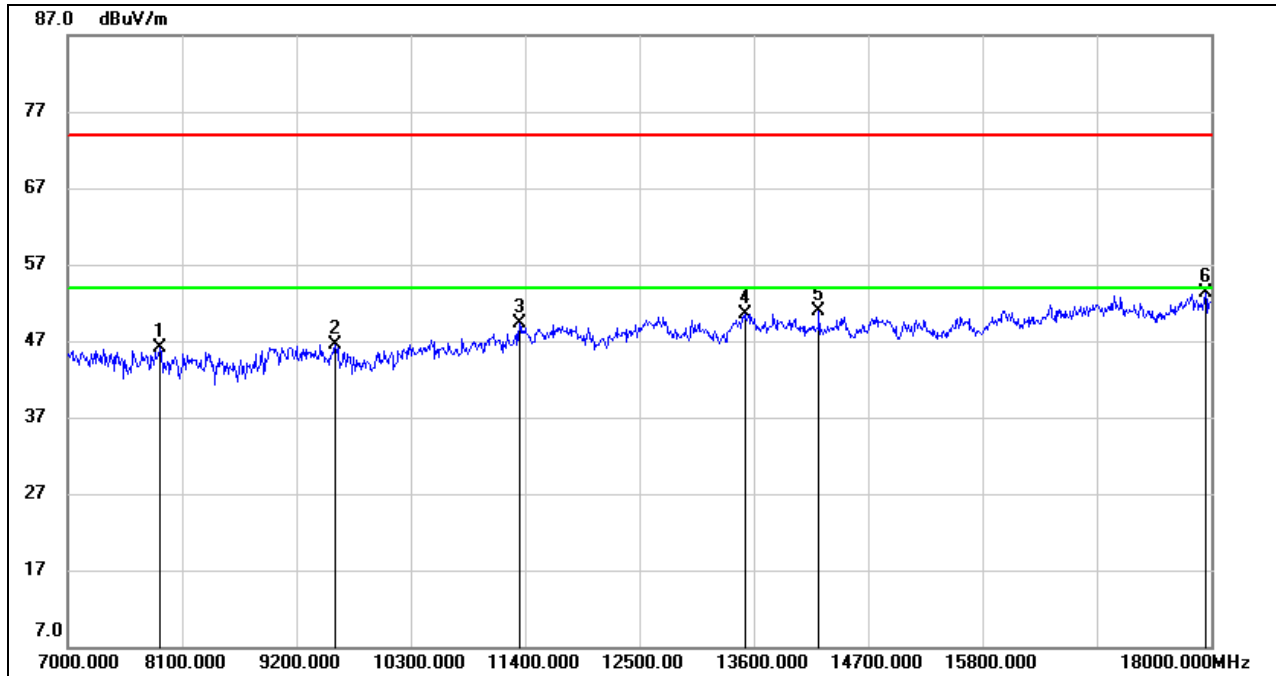
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**7-18GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7891.000	39.02	7.05	46.07	74.00	-27.93	peak
2	9574.000	35.98	10.49	46.47	74.00	-27.53	peak
3	11345.000	35.97	13.34	49.31	74.00	-24.69	peak
4	13523.000	34.65	15.93	50.58	74.00	-23.42	peak
5	14227.000	34.83	16.14	50.97	74.00	-23.03	peak
6	17945.000	29.58	23.63	53.21	74.00	-20.79	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

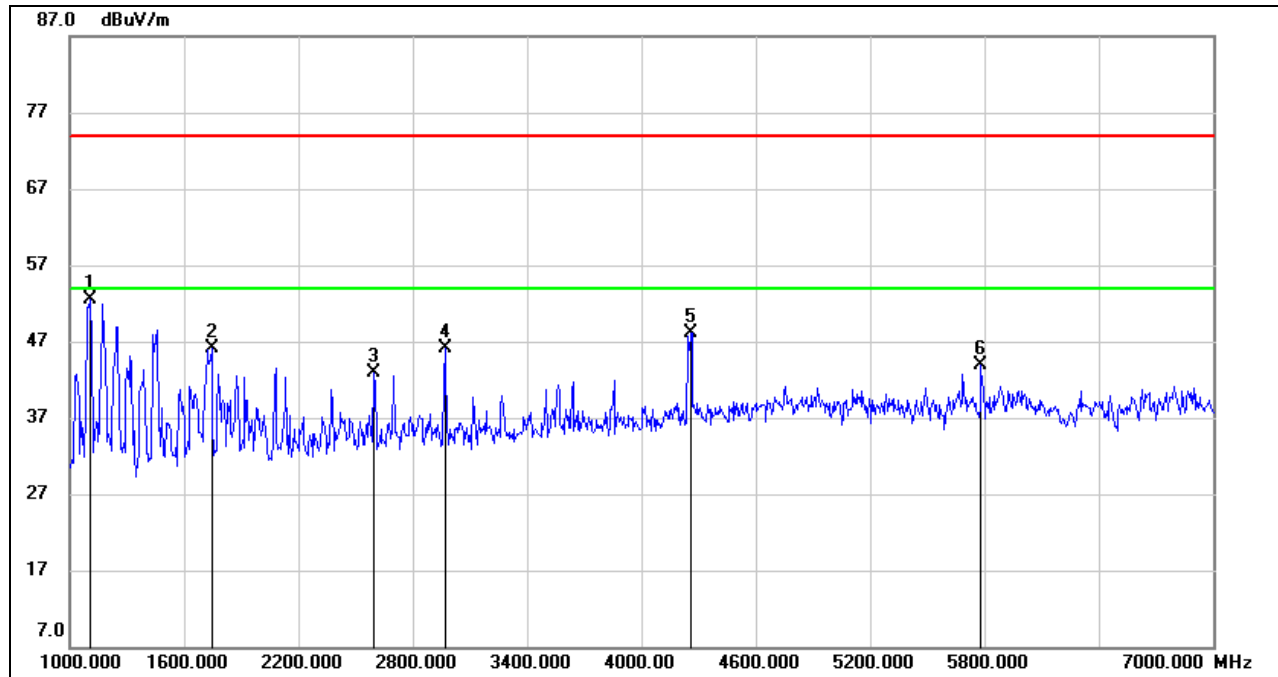
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (MID CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	65.98	-13.53	52.45	74.00	-21.55	peak
2	1744.000	56.66	-10.52	46.14	74.00	-27.86	peak
3	2596.000	51.07	-8.18	42.89	74.00	-31.11	peak
4	2968.000	52.29	-6.22	46.07	74.00	-27.93	peak
5	4258.000	50.00	-1.84	48.16	74.00	-25.84	peak
6	5782.000	41.95	1.95	43.90	74.00	-30.10	peak

Note: 1. Measurement = Reading Level + Correct Factor.

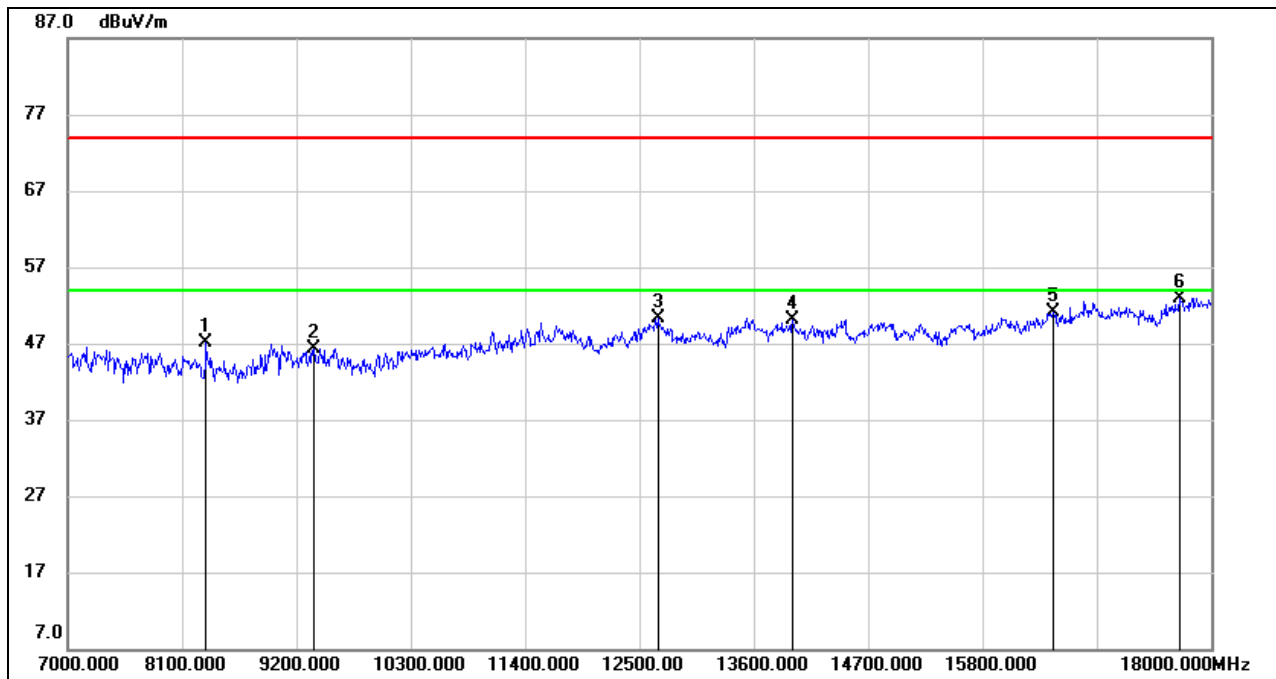
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

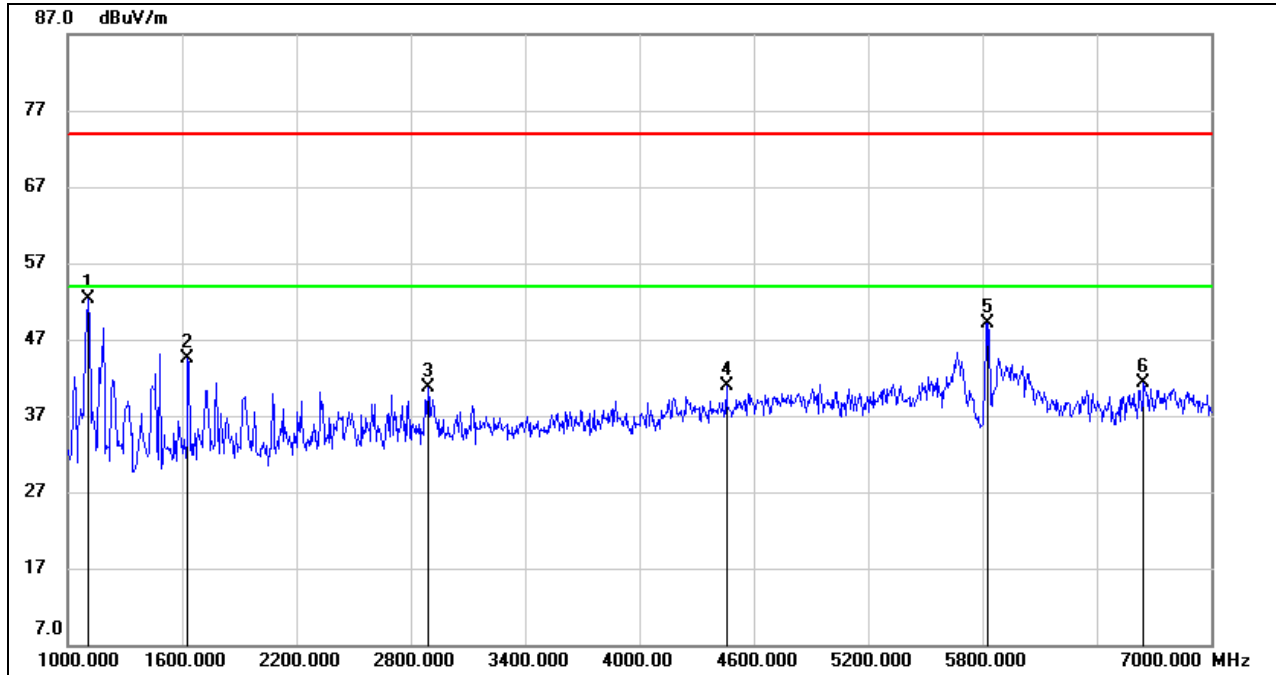
**7-18GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	8331.000	39.08	8.00	47.08	74.00	-26.92	peak
2	9365.000	36.50	9.84	46.34	74.00	-27.66	peak
3	12676.000	35.13	15.23	50.36	74.00	-23.64	peak
4	13974.000	34.01	16.15	50.16	74.00	-23.84	peak
5	16482.000	31.73	19.36	51.09	74.00	-22.91	peak
6	17692.000	30.31	22.69	53.00	74.00	-21.00	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (HIGH CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	65.90	-13.53	52.37	74.00	-21.63	peak
2	1630.000	55.88	-11.39	44.49	74.00	-29.51	peak
3	2890.000	47.19	-6.56	40.63	74.00	-33.37	peak
4	4456.000	42.44	-1.60	40.84	74.00	-33.16	peak
5	5830.000	47.13	2.05	49.18	74.00	-24.82	peak
6	6646.000	36.81	4.47	41.28	74.00	-32.72	peak

Note: 1. Measurement = Reading Level + Correct Factor.

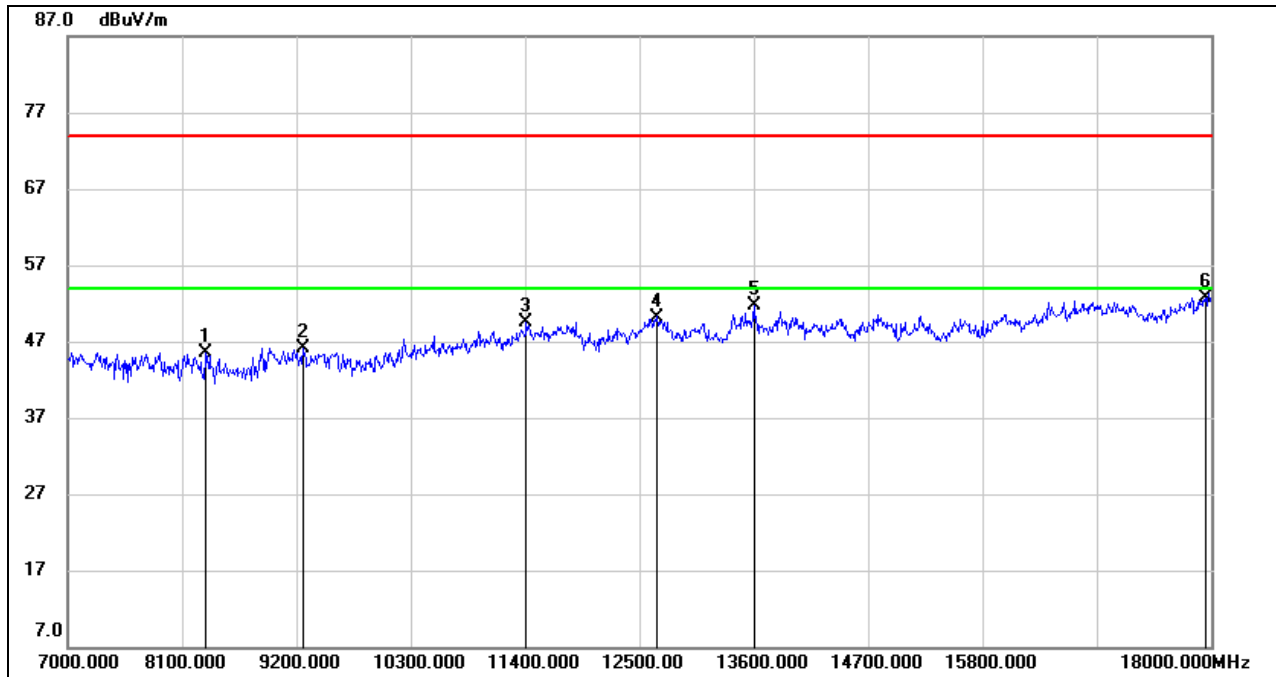
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

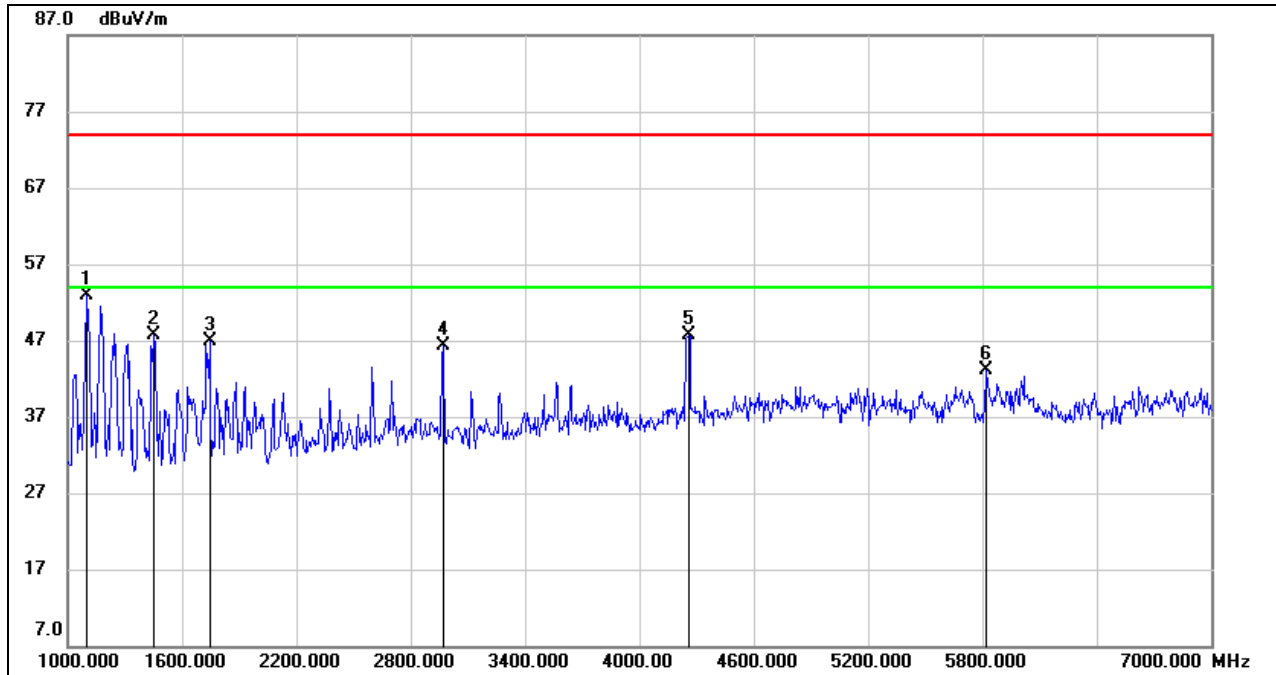
**7-18GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	8331.000	37.44	8.00	45.44	74.00	-28.56	peak
2	9266.000	36.66	9.38	46.04	74.00	-27.96	peak
3	11411.000	36.02	13.46	49.48	74.00	-24.52	peak
4	12665.000	34.98	15.22	50.20	74.00	-23.80	peak
5	13600.000	35.78	15.86	51.64	74.00	-22.36	peak
6	17945.000	29.06	23.63	52.69	74.00	-21.31	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (HIGH CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1102.000	66.45	-13.56	52.89	74.00	-21.11	peak
2	1450.000	60.22	-12.53	47.69	74.00	-26.31	peak
3	1744.000	57.50	-10.52	46.98	74.00	-27.02	peak
4	2968.000	52.44	-6.22	46.22	74.00	-27.78	peak
5	4258.000	49.58	-1.84	47.74	74.00	-26.26	peak
6	5818.000	41.02	2.00	43.02	74.00	-30.98	peak

Note: 1. Measurement = Reading Level + Correct Factor.

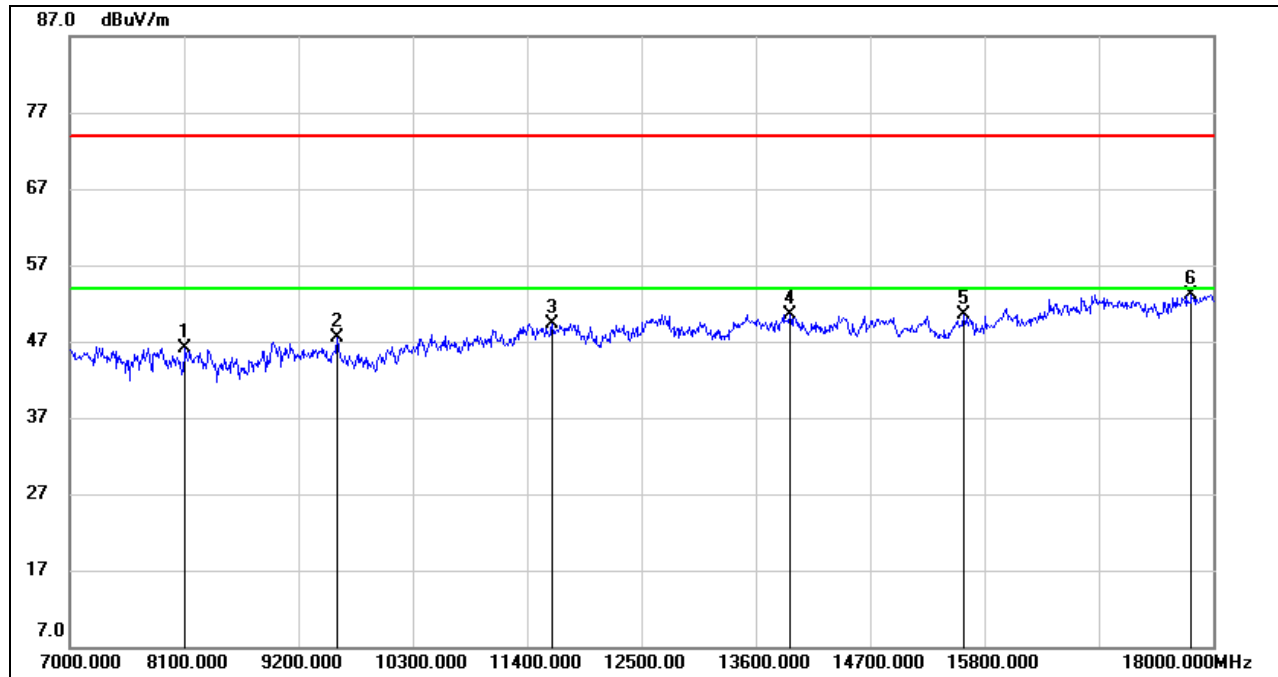
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

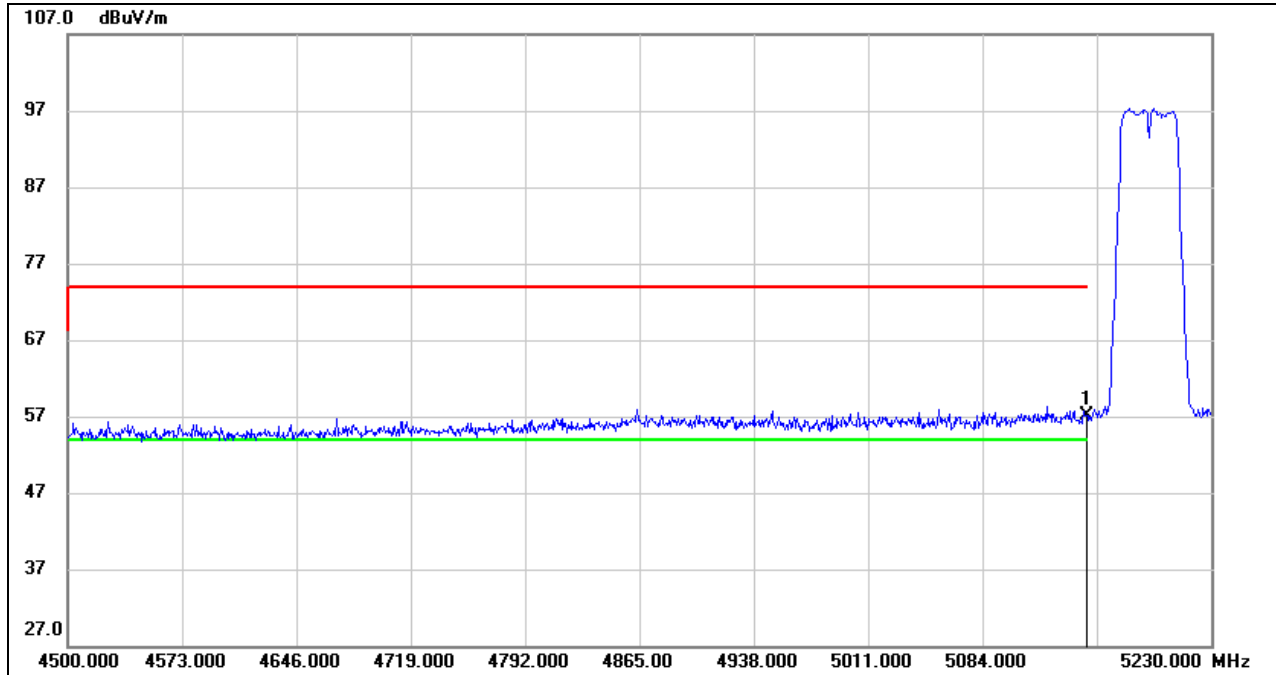
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**7-18GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	8111.000	38.54	7.61	46.15	74.00	-27.85	peak
2	9574.000	37.01	10.49	47.50	74.00	-26.50	peak
3	11642.000	35.45	13.89	49.34	74.00	-24.66	peak
4	13930.000	34.31	16.24	50.55	74.00	-23.45	peak
5	15602.000	33.78	16.74	50.52	74.00	-23.48	peak
6	17791.000	29.72	23.43	53.15	74.00	-20.85	peak

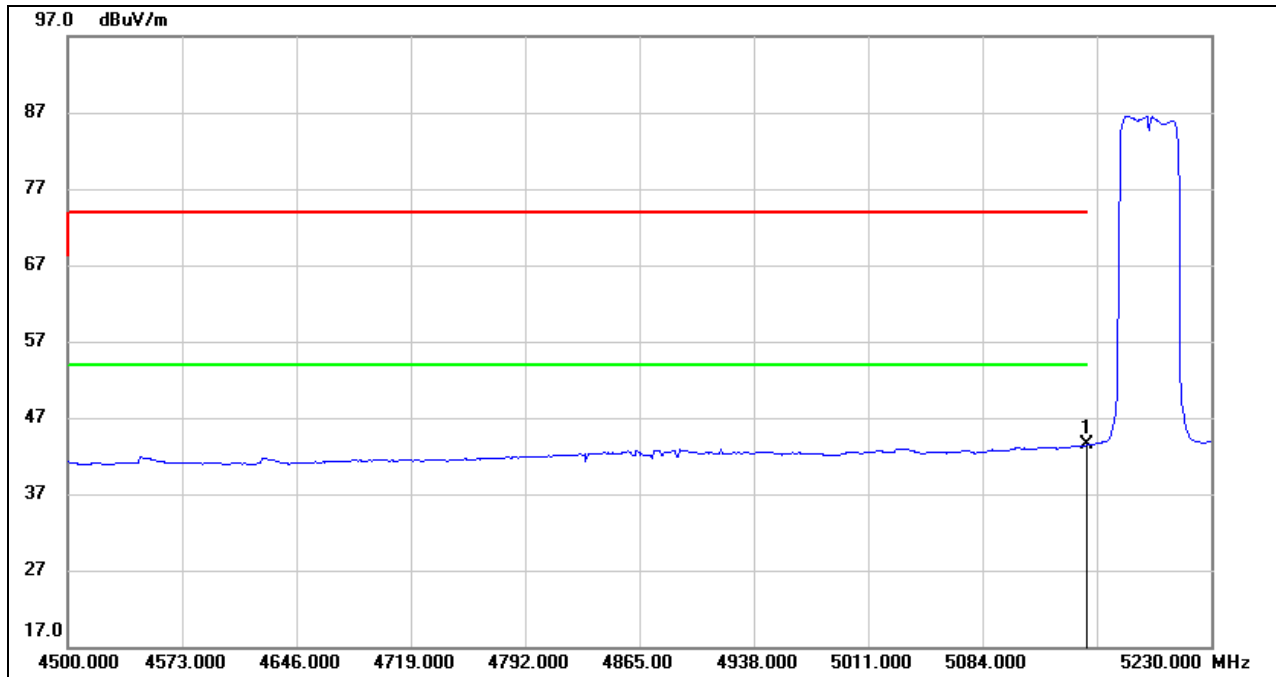
Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**8.3. 802.11ac VHT40 MODE****8.3.1. UNII-1 BAND****RESTRICTED BANDEDGE (LOW CHANNEL, HORIZONTAL)****PEAK**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	16.59	40.46	57.05	74.00	-16.95	peak

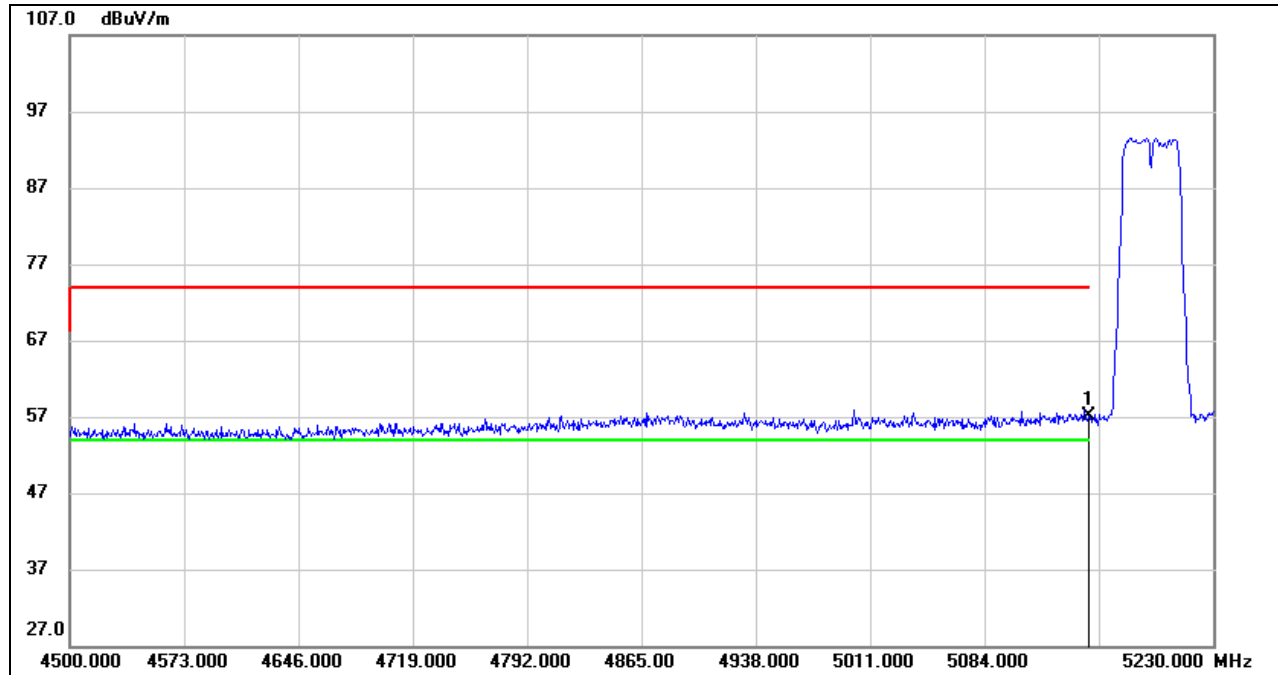
Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

AVG



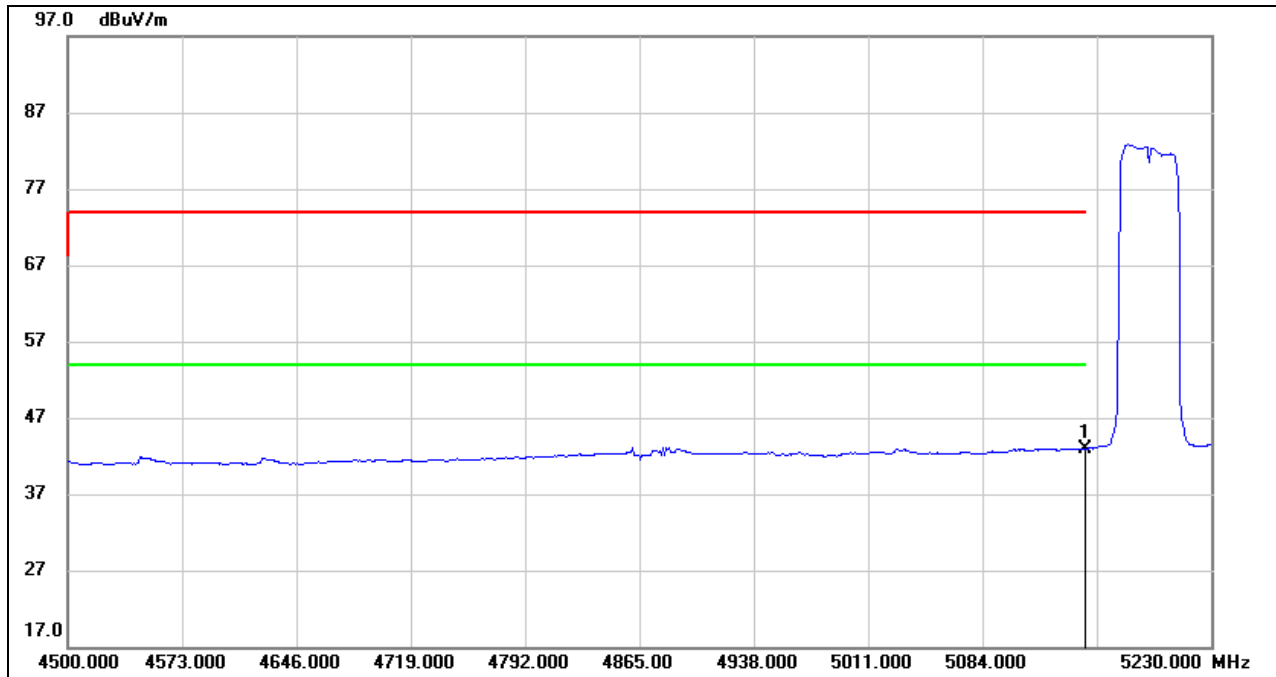
No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	2.96	40.46	43.42	54.00	-10.58	AVG

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. AVG: $VBW=1/T_{on}$, where: T_{on} is the transmitting duration.
4. For the transmitting duration, please refer to clause 7.1.
5. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

**RESTRICTED BANDEDGE (LOW CHANNEL, VERTICAL)****PEAK**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	16.61	40.46	57.07	74.00	-16.93	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

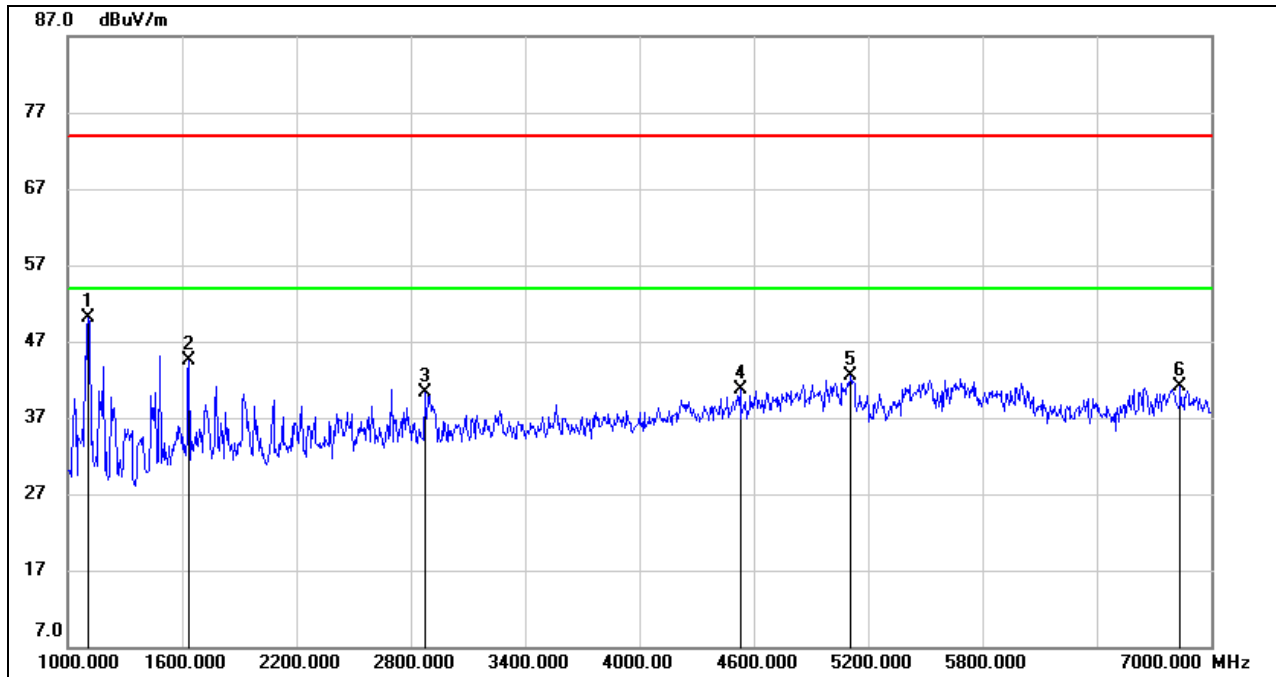
AVG

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	2.48	40.46	42.94	54.00	-11.06	AVG

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. AVG: $VBW=1/T_{on}$, where: T_{on} is the transmitting duration.
4. For the transmitting duration, please refer to clause 7.1.
5. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	63.66	-13.53	50.13	74.00	-23.87	peak
2	1636.000	55.93	-11.34	44.59	74.00	-29.41	peak
3	2872.000	46.98	-6.63	40.35	74.00	-33.65	peak
4	4528.000	41.79	-1.14	40.65	74.00	-33.35	peak
5	5110.000	41.07	1.43	42.50	74.00	-31.50	peak
6	6838.000	36.48	4.54	41.02	74.00	-32.98	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

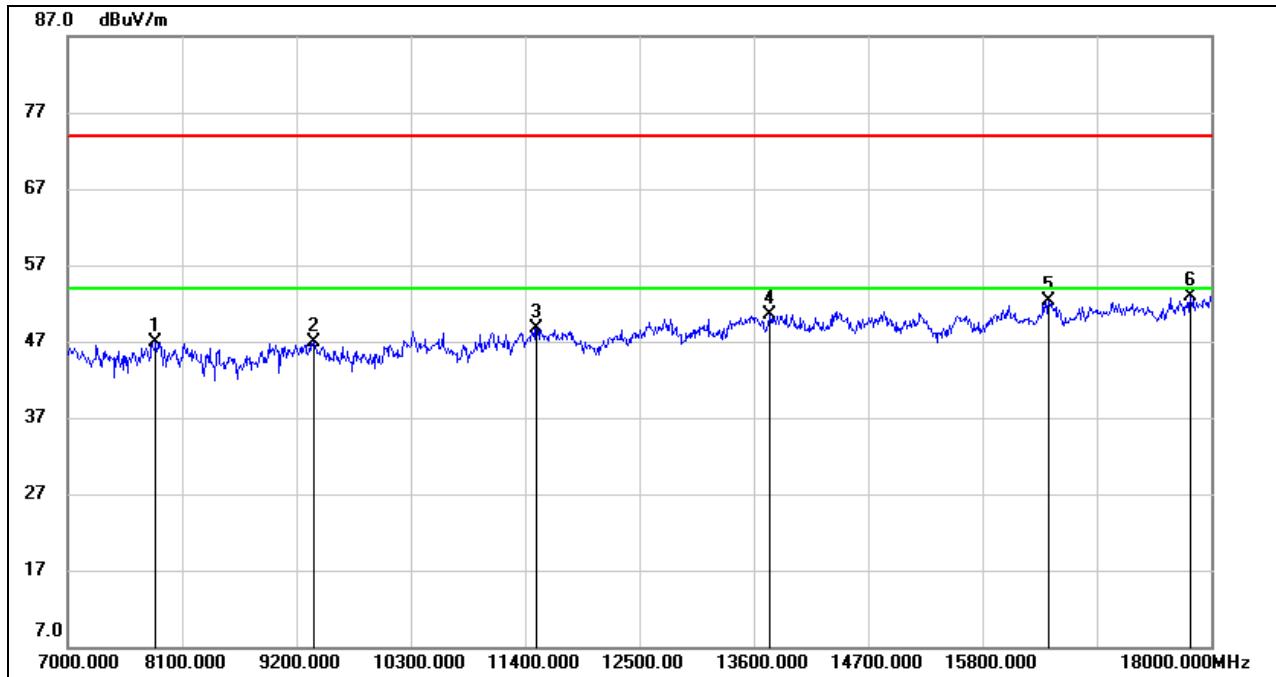
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

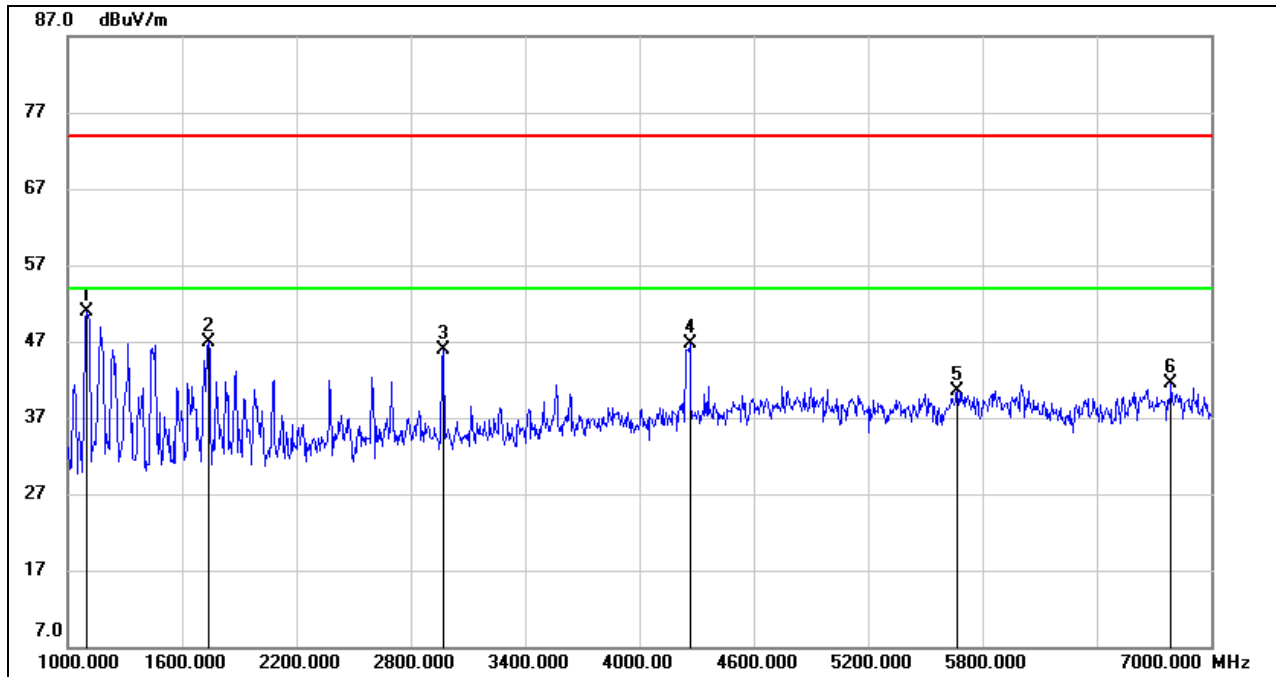


7-18GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7847.000	39.08	7.91	46.99	74.00	-27.01	peak
2	9365.000	37.20	9.72	46.92	74.00	-27.08	peak
3	11510.000	35.36	13.39	48.75	74.00	-25.25	peak
4	13754.000	33.86	16.60	50.46	74.00	-23.54	peak
5	16438.000	32.88	19.41	52.29	74.00	-21.71	peak
6	17802.000	29.53	23.41	52.94	74.00	-21.06	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, VERTICAL)****1-7GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1102.000	64.51	-13.56	50.95	74.00	-23.05	peak
2	1738.000	57.41	-10.57	46.84	74.00	-27.16	peak
3	2968.000	52.15	-6.22	45.93	74.00	-28.07	peak
4	4264.000	48.60	-1.84	46.76	74.00	-27.24	peak
5	5668.000	38.48	1.99	40.47	74.00	-33.53	peak
6	6790.000	37.14	4.44	41.58	74.00	-32.42	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

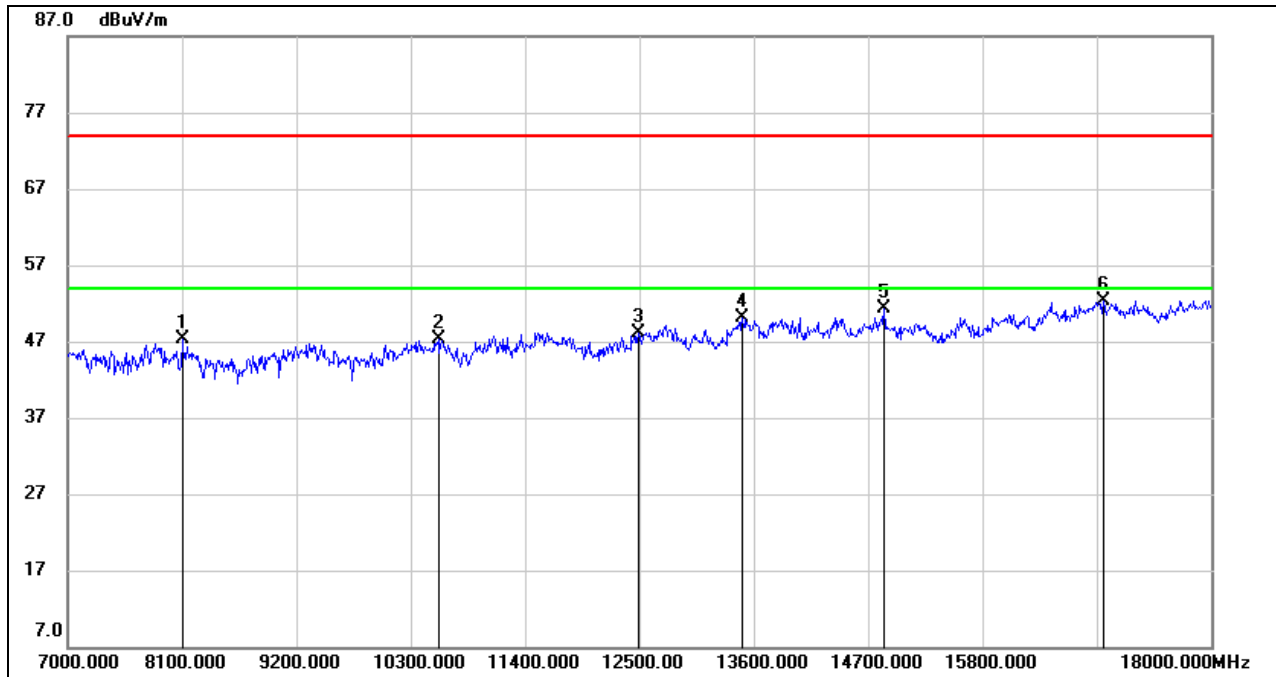
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

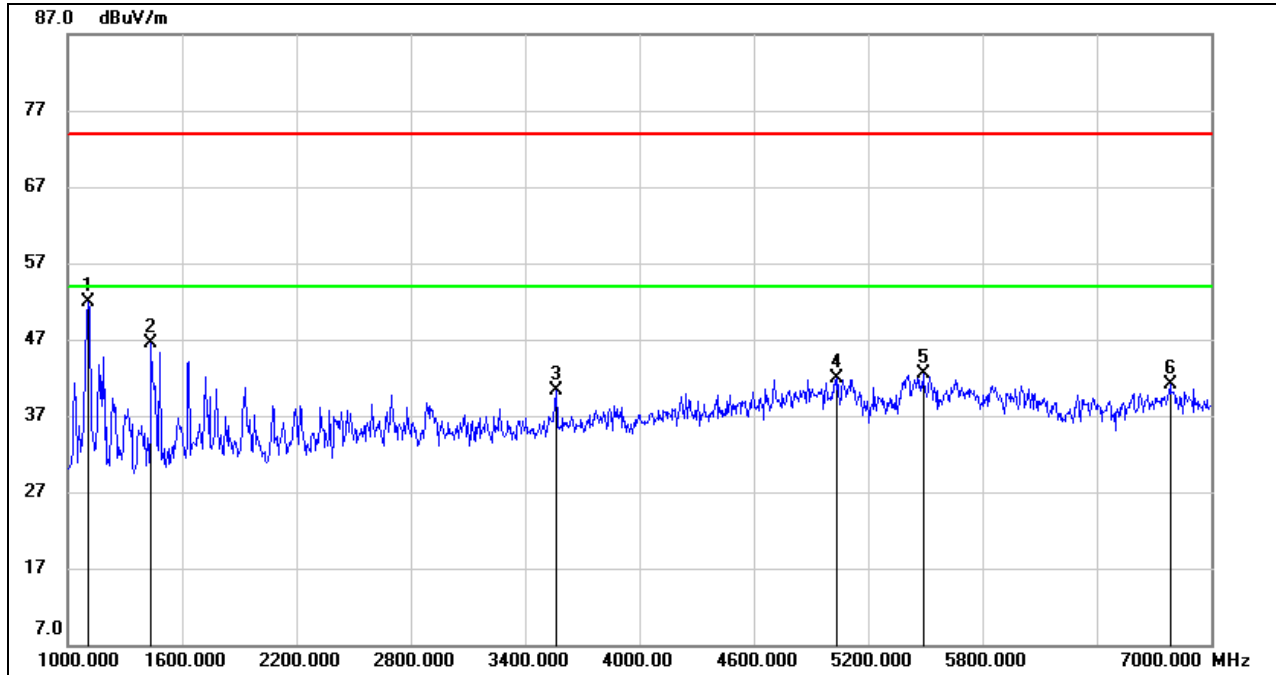


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	8100.000	39.10	8.13	47.23	74.00	-26.77	peak
2	10564.000	35.17	12.06	47.23	74.00	-26.77	peak
3	12489.000	33.40	14.79	48.19	74.00	-25.81	peak
4	13490.000	34.17	15.93	50.10	74.00	-23.90	peak
5	14854.000	35.23	16.13	51.36	74.00	-22.64	peak
6	16966.000	31.94	20.45	52.39	74.00	-21.61	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (HIGH CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	65.42	-13.53	51.89	74.00	-22.11	peak
2	1438.000	59.17	-12.59	46.58	74.00	-27.42	peak
3	3562.000	44.93	-4.67	40.26	74.00	-33.74	peak
4	5038.000	40.84	1.06	41.90	74.00	-32.10	peak
5	5488.000	40.64	1.77	42.41	74.00	-31.59	peak
6	6784.000	36.75	4.44	41.19	74.00	-32.81	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

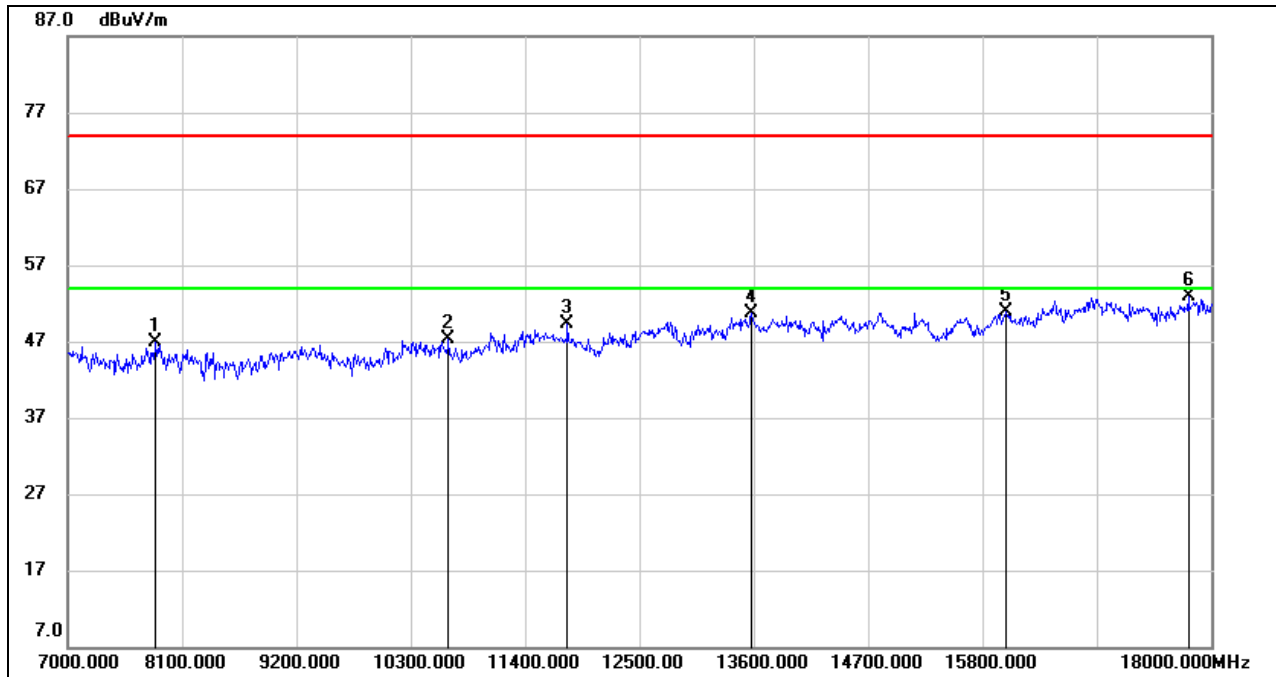
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz

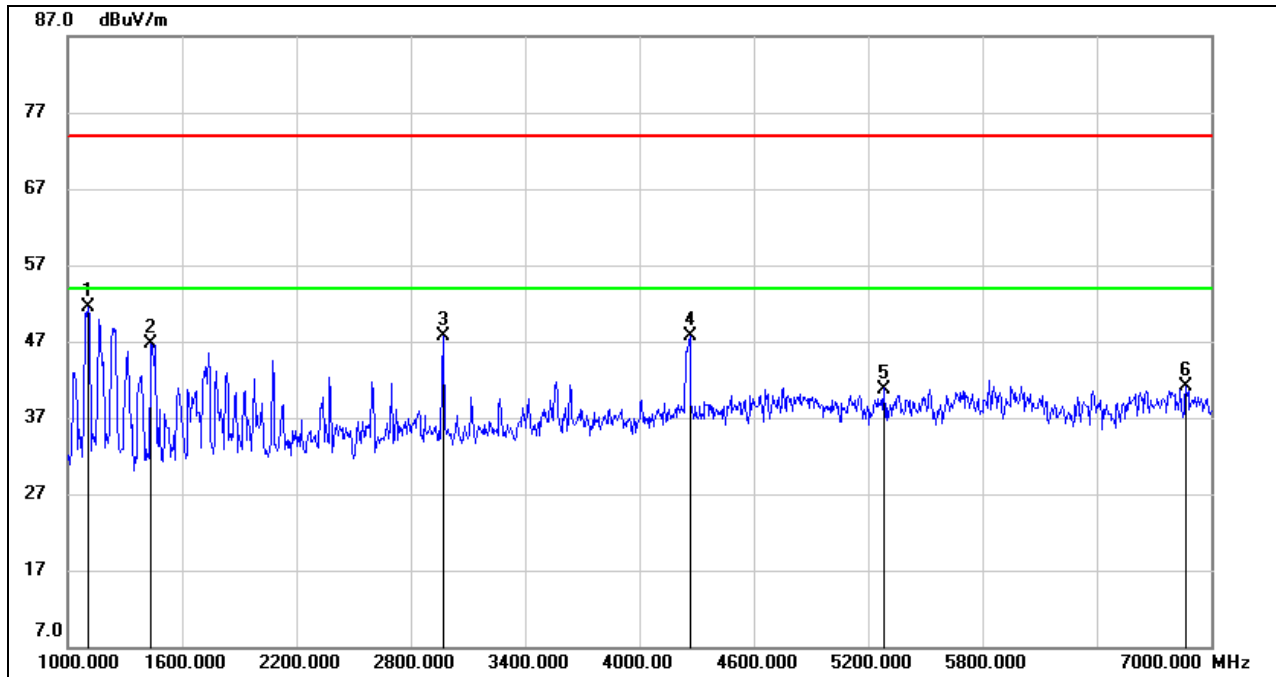


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7847.000	39.06	7.91	46.97	74.00	-27.03	peak
2	10663.000	35.19	12.02	47.21	74.00	-26.79	peak
3	11807.000	36.03	13.27	49.30	74.00	-24.70	peak
4	13578.000	34.59	16.06	50.65	74.00	-23.35	peak
5	16031.000	33.02	17.97	50.99	74.00	-23.01	peak
6	17780.000	29.65	23.23	52.88	74.00	-21.12	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (HIGH CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	65.06	-13.53	51.53	74.00	-22.47	peak
2	1438.000	59.39	-12.59	46.80	74.00	-27.20	peak
3	2968.000	53.85	-6.22	47.63	74.00	-26.37	peak
4	4264.000	49.50	-1.84	47.66	74.00	-26.34	peak
5	5284.000	39.02	1.78	40.80	74.00	-33.20	peak
6	6868.000	36.42	4.60	41.02	74.00	-32.98	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

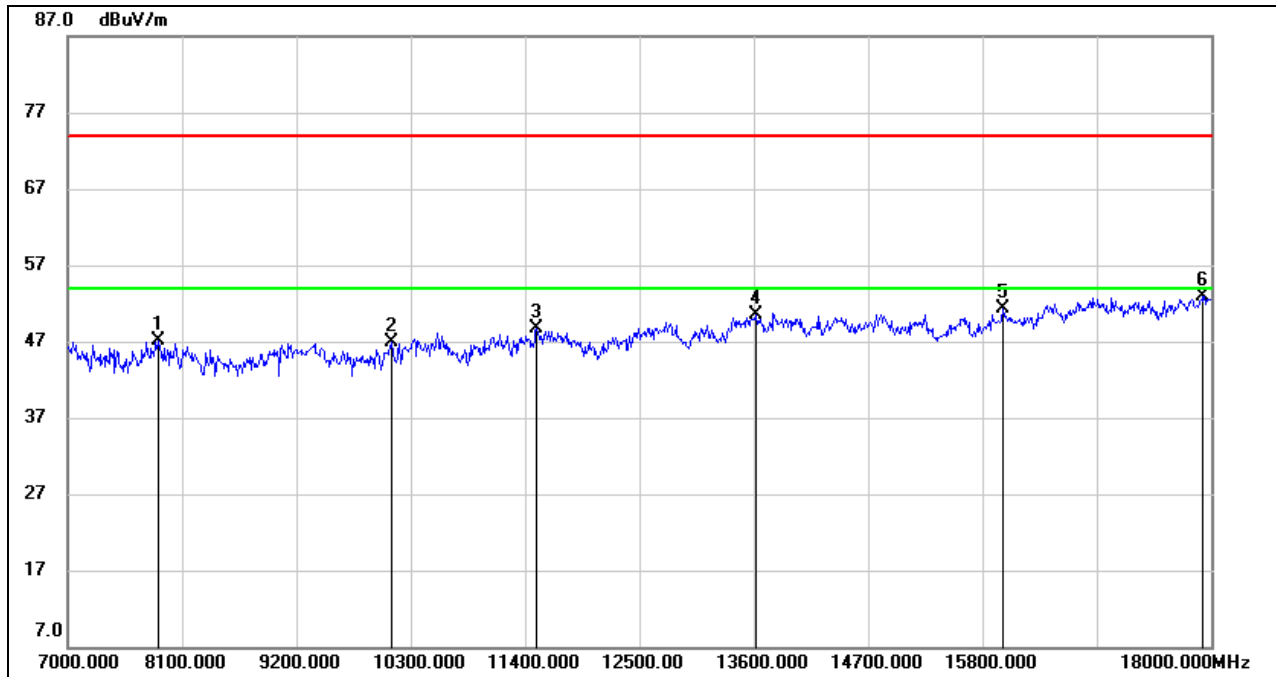
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz



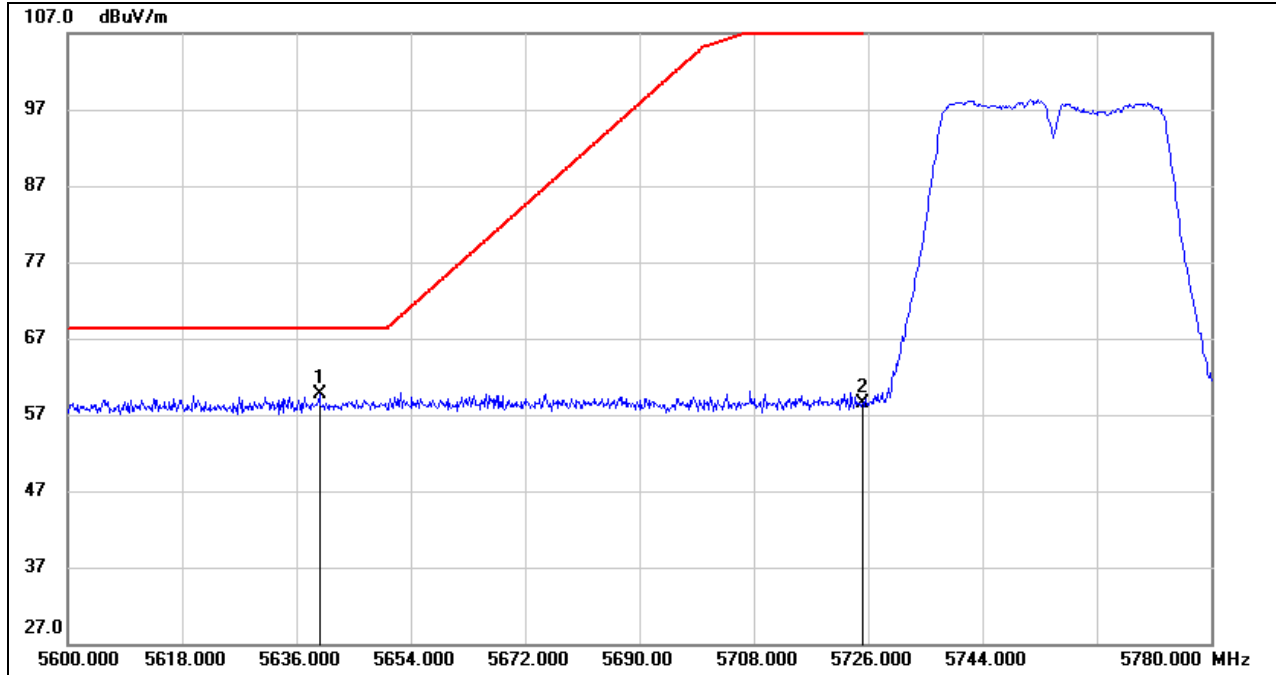
No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7869.000	39.35	7.79	47.14	74.00	-26.86	peak
2	10113.000	36.10	10.74	46.84	74.00	-27.16	peak
3	11510.000	35.24	13.39	48.63	74.00	-25.37	peak
4	13622.000	34.36	16.08	50.44	74.00	-23.56	peak
5	15998.000	33.47	17.80	51.27	74.00	-22.73	peak
6	17923.000	29.56	23.42	52.98	74.00	-21.02	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

8.3.2. UNII-3 BAND

RESTRICTED BANDEDGE (LOW CHANNEL, HORIZONTAL)

PEAK



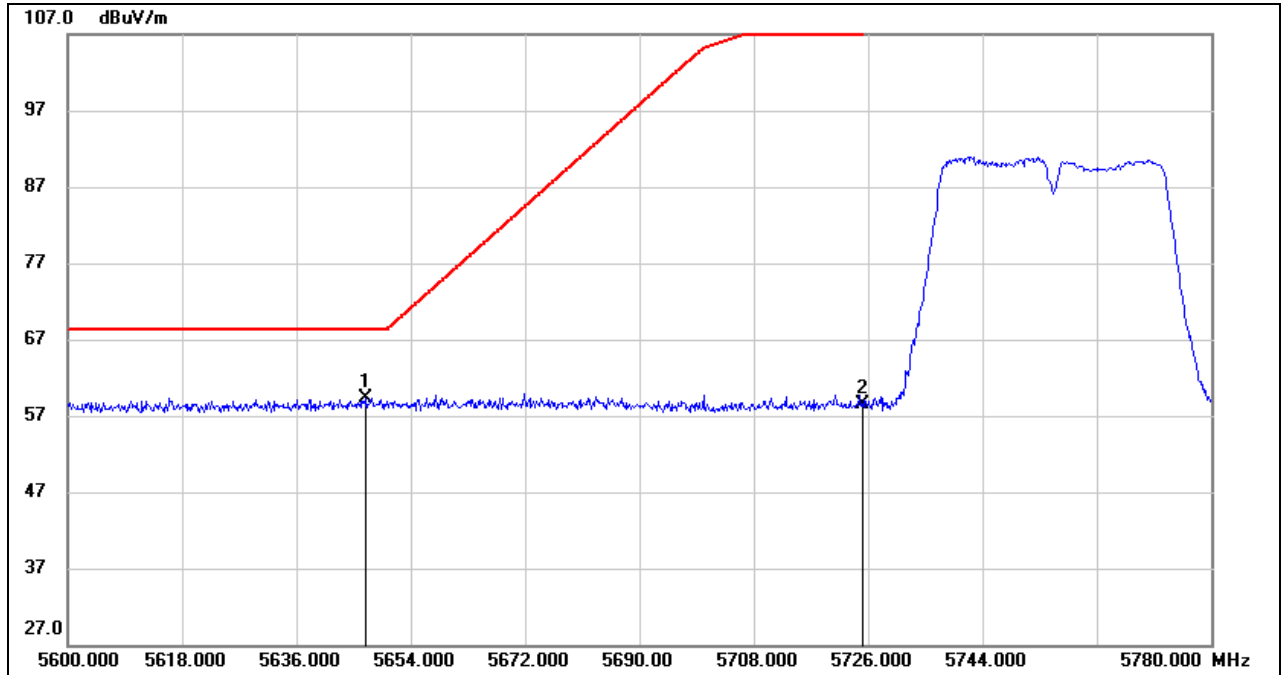
No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5639.600	18.25	41.48	59.73	68.20	-8.47	peak
2	5725.000	16.85	41.61	58.46	122.20	-63.74	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.



RESTRICTED BANDEDGE (LOW CHANNEL, VERTICAL)

PEAK

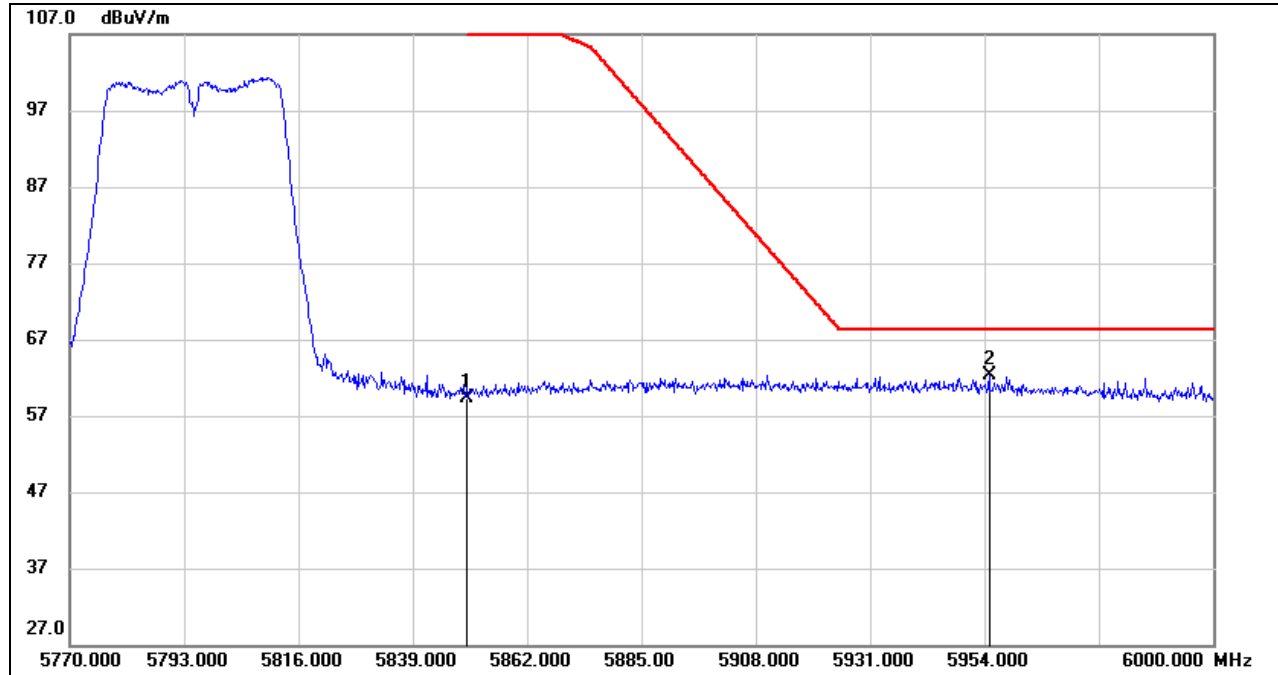


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5646.980	17.84	41.48	59.32	68.20	-8.88	peak
2	5725.000	16.88	41.61	58.49	122.20	-63.71	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

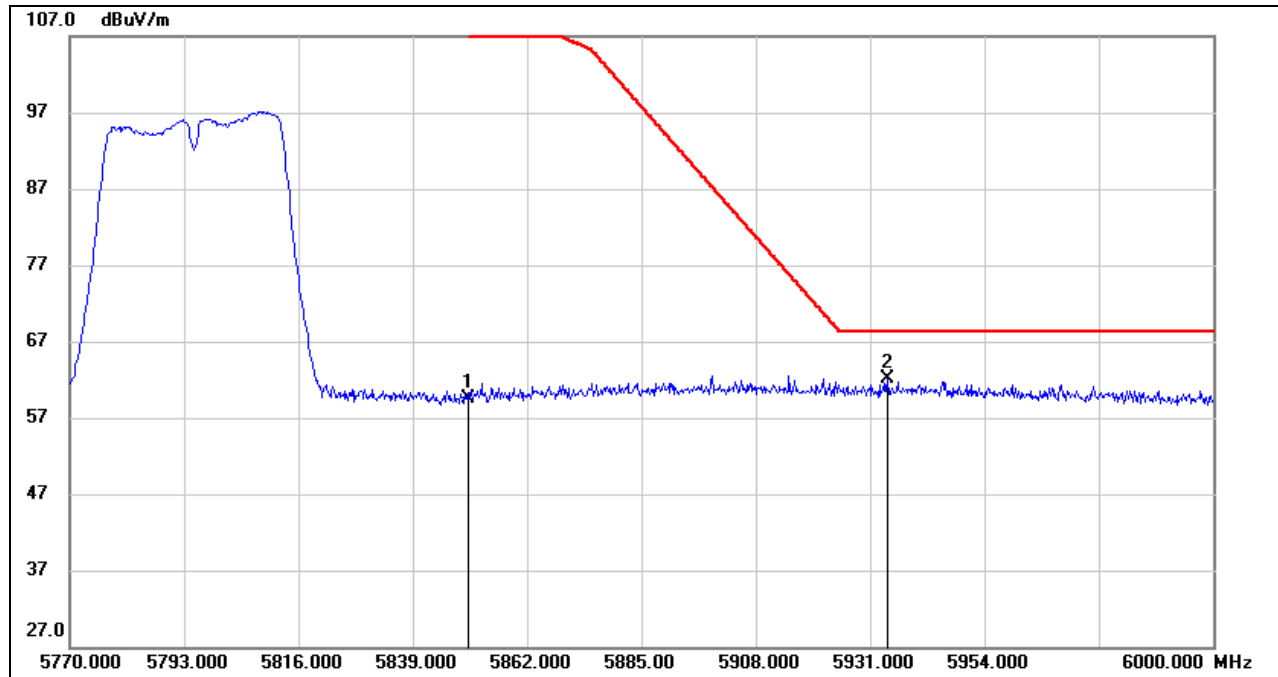
RESTRICTED BANDEDGE (HIGH CHANNEL, HORIZONTAL)

PEAK



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5850.000	16.33	42.89	59.22	122.20	-62.98	peak
2	5954.920	19.43	42.91	62.34	68.20	-5.86	peak

- Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

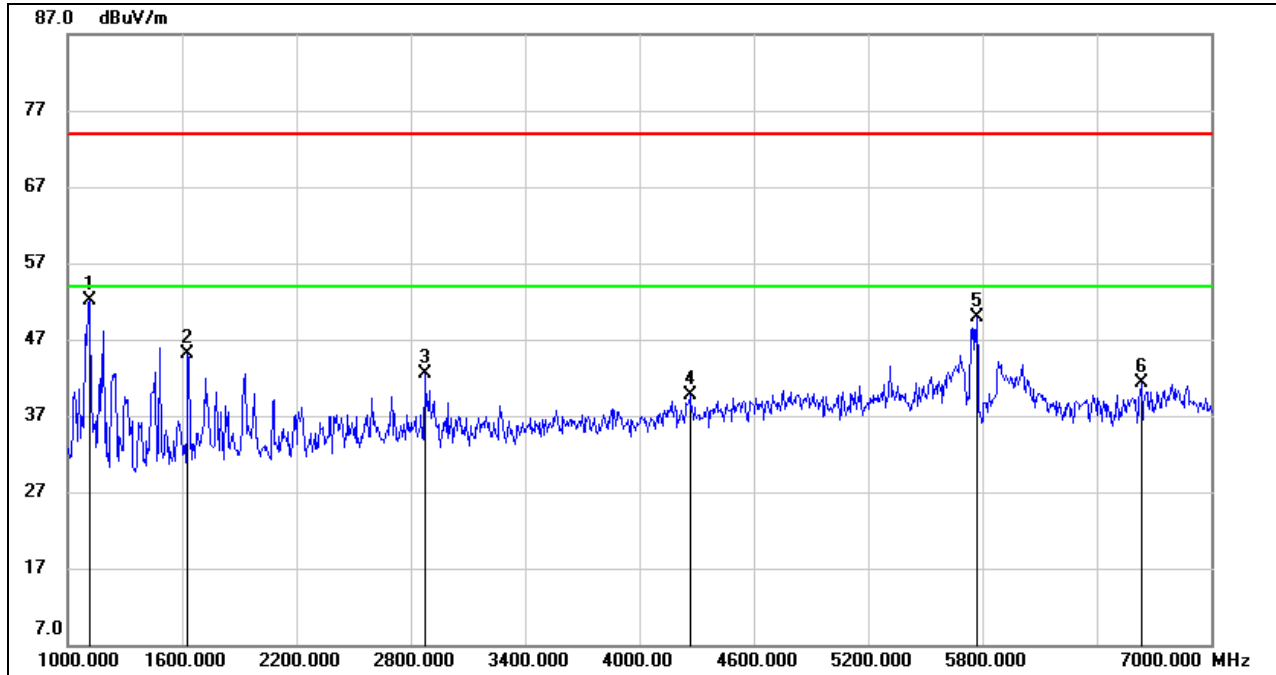
**RESTRICTED BANDEGE (HIGH CHANNEL, VERTICAL)****PEAK**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5850.000	16.70	42.89	59.59	122.20	-62.61	peak
2	5934.450	18.86	43.26	62.12	68.20	-6.08	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1114.000	65.59	-13.49	52.10	74.00	-21.90	peak
2	1630.000	56.47	-11.39	45.08	74.00	-28.92	peak
3	2872.000	49.19	-6.63	42.56	74.00	-31.44	peak
4	4264.000	41.51	-1.84	39.67	74.00	-34.33	peak
5	5770.000	47.89	1.96	49.85	74.00	-24.15	peak
6	6634.000	36.92	4.47	41.39	74.00	-32.61	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

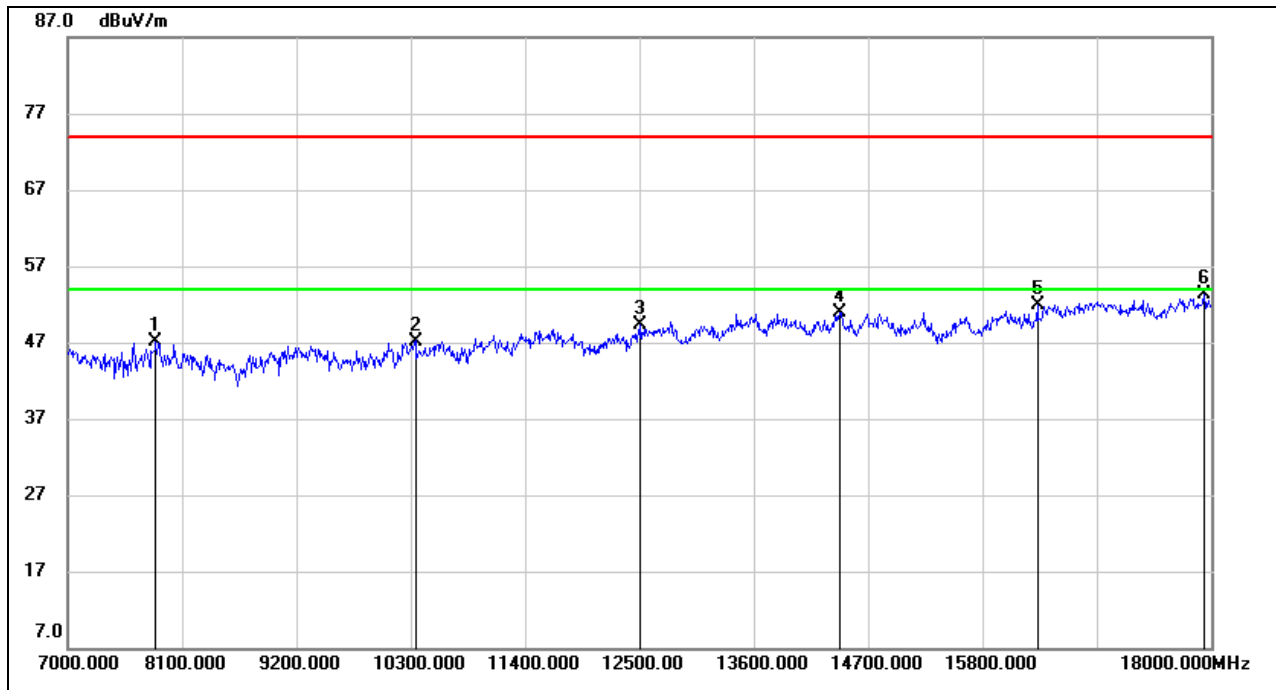
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7847.000	39.15	7.91	47.06	74.00	-26.94	peak
2	10344.000	35.95	11.25	47.20	74.00	-26.80	peak
3	12511.000	34.54	14.80	49.34	74.00	-24.66	peak
4	14425.000	34.29	16.65	50.94	74.00	-23.06	peak
5	16328.000	33.31	18.67	51.98	74.00	-22.02	peak
6	17934.000	29.82	23.45	53.27	74.00	-20.73	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

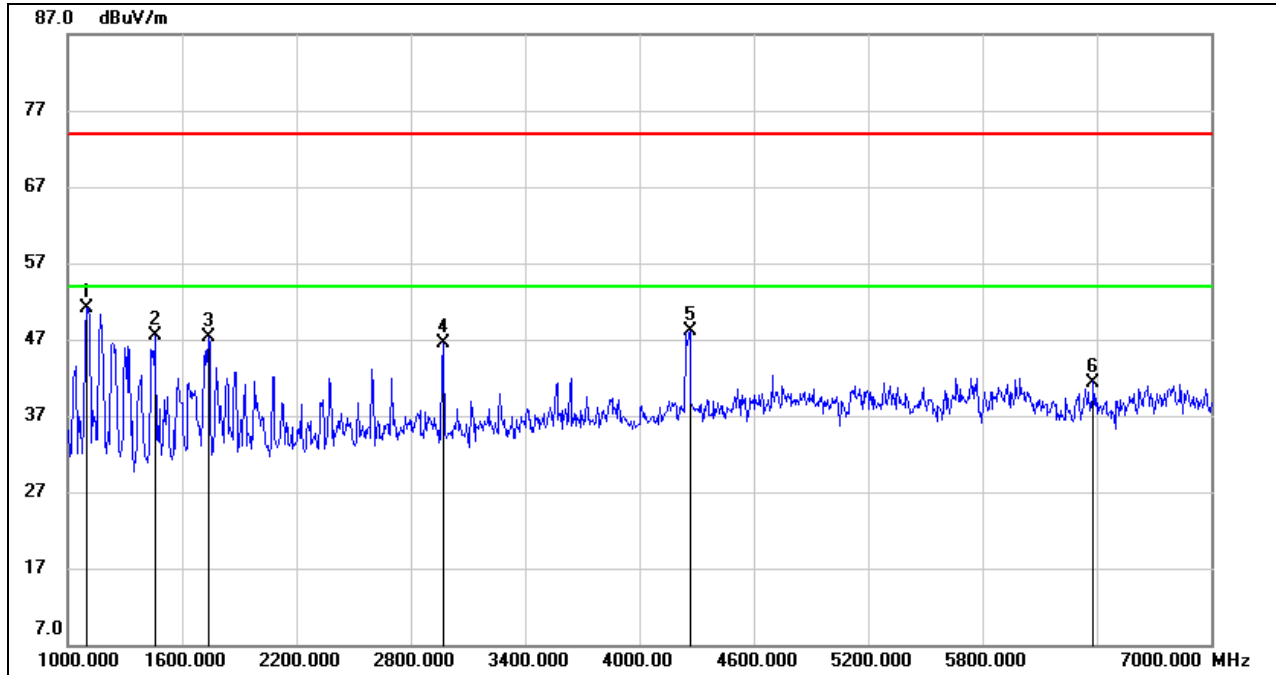
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1096.000	64.75	-13.59	51.16	74.00	-22.84	peak
2	1456.000	60.04	-12.50	47.54	74.00	-26.46	peak
3	1738.000	57.85	-10.57	47.28	74.00	-26.72	peak
4	2968.000	52.72	-6.22	46.50	74.00	-27.50	peak
5	4264.000	50.02	-1.84	48.18	74.00	-25.82	peak
6	6382.000	38.03	3.37	41.40	74.00	-32.60	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

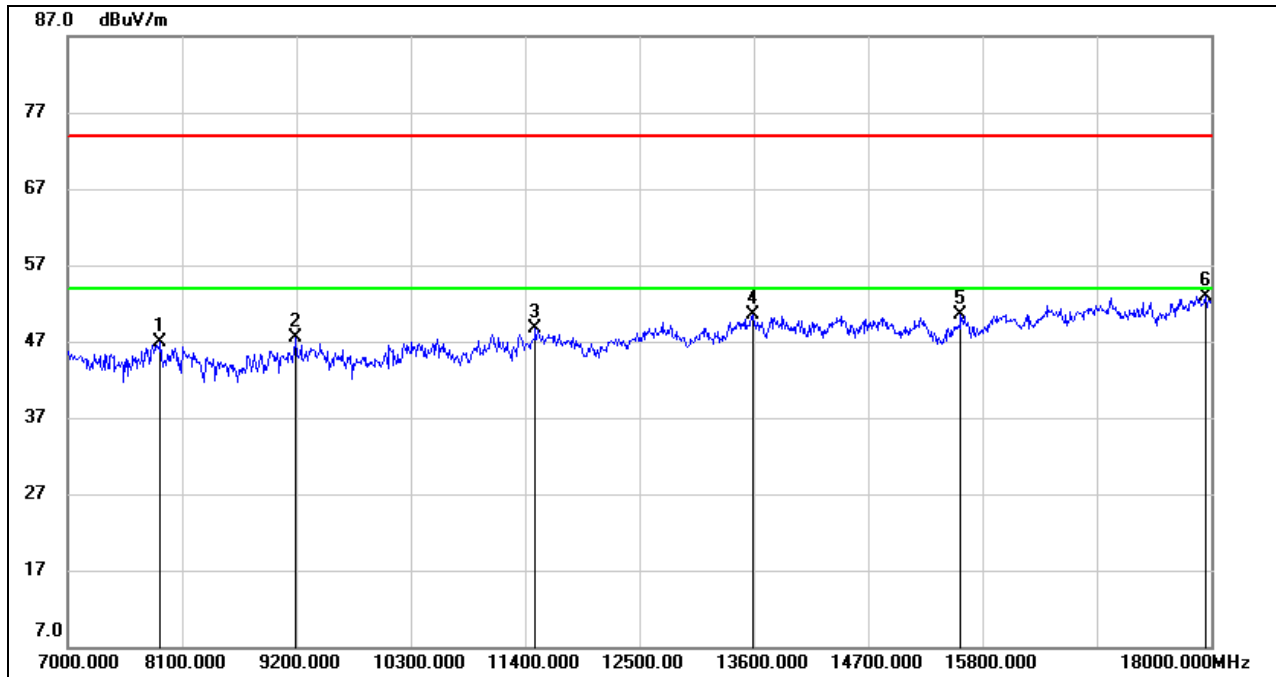
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

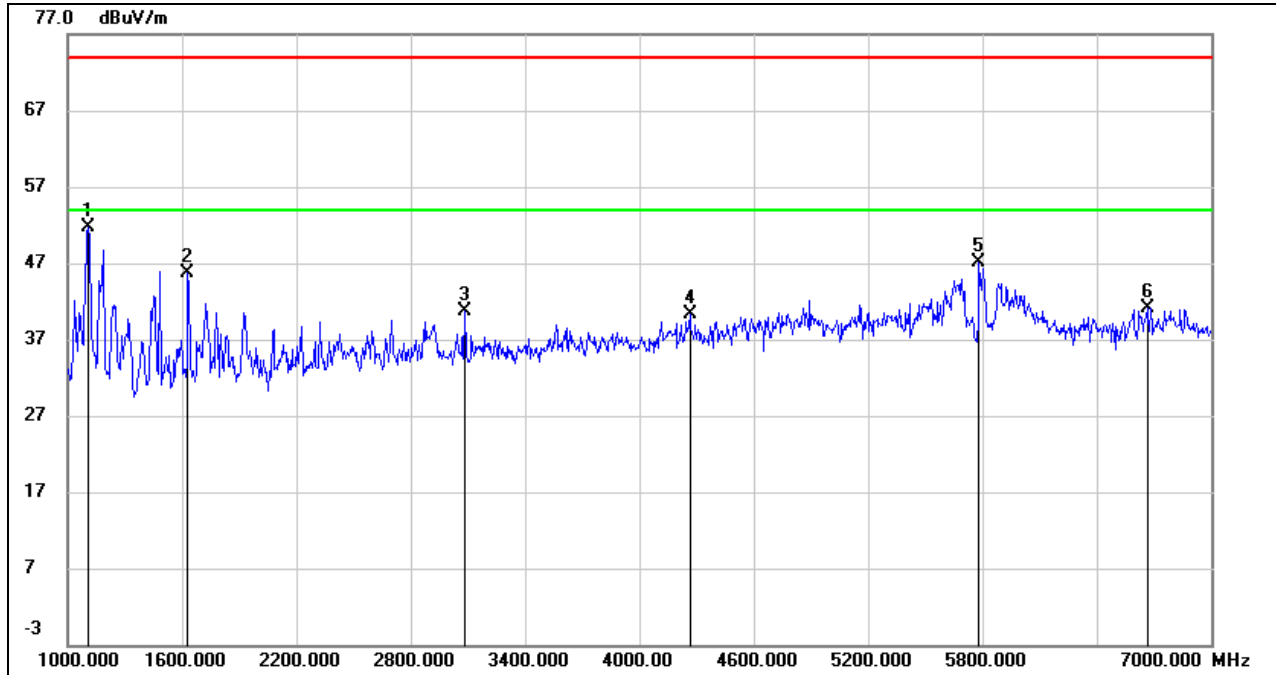


7-18GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7891.000	39.19	7.66	46.85	74.00	-27.15	peak
2	9189.000	38.54	8.95	47.49	74.00	-26.51	peak
3	11499.000	35.36	13.35	48.71	74.00	-25.29	peak
4	13589.000	34.33	16.08	50.41	74.00	-23.59	peak
5	15591.000	33.36	17.07	50.43	74.00	-23.57	peak
6	17945.000	29.37	23.46	52.83	74.00	-21.17	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**HARMONICS AND SPURIOUS EMISSIONS (HIGH CHANNEL, HORIZONTAL)****1-7GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	65.29	-13.53	51.76	74.00	-22.24	peak
2	1630.000	57.17	-11.39	45.78	74.00	-28.22	peak
3	3082.000	46.63	-5.90	40.73	74.00	-33.27	peak
4	4264.000	42.06	-1.84	40.22	74.00	-33.78	peak
5	5782.000	45.09	1.95	47.04	74.00	-26.96	peak
6	6664.000	36.65	4.47	41.12	74.00	-32.88	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

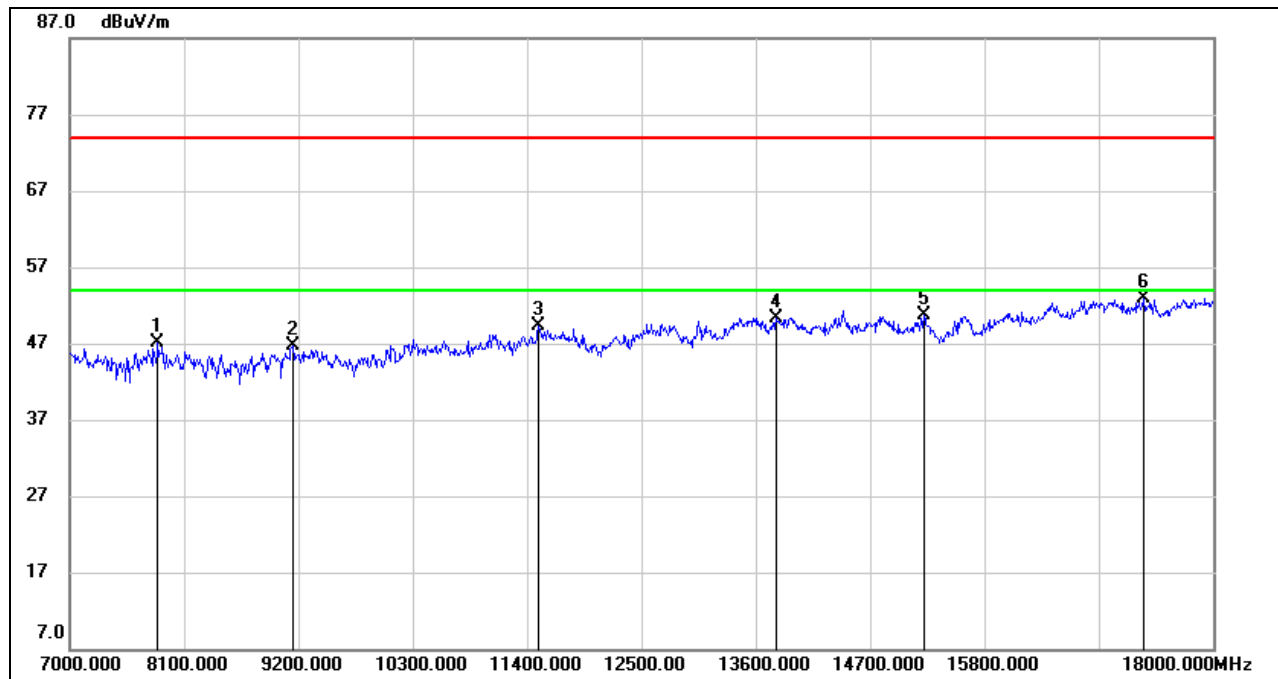
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

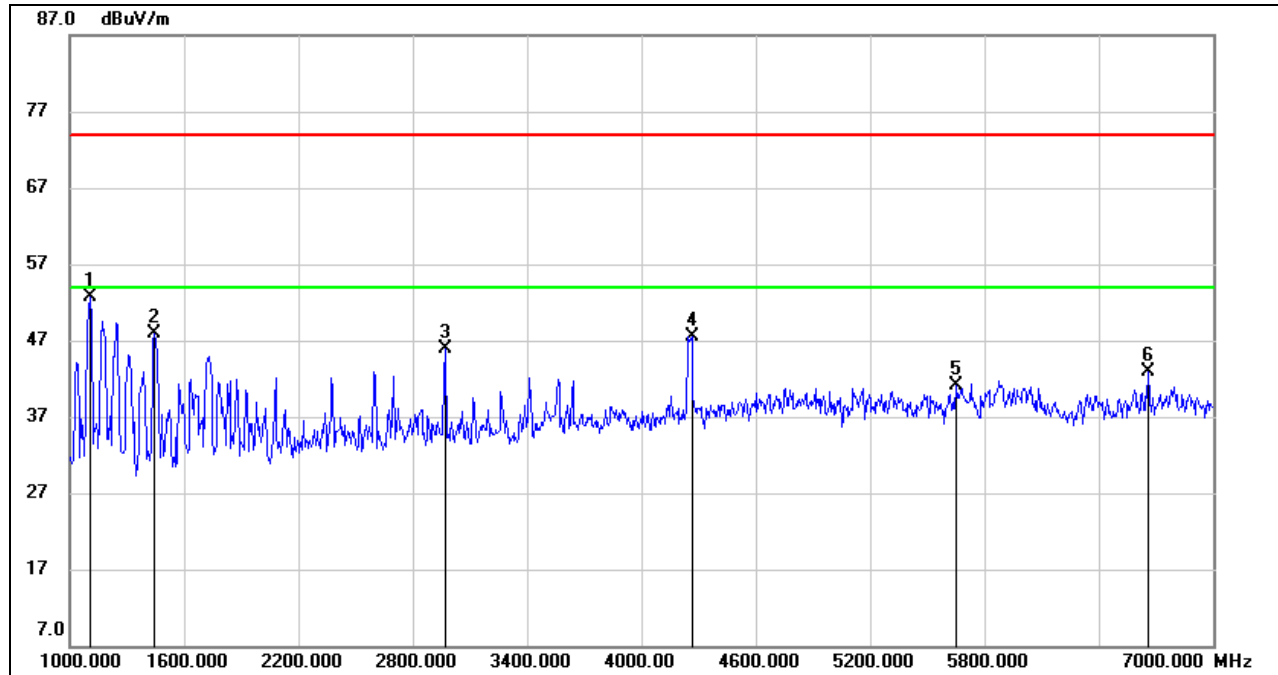
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7847.000	39.10	7.91	47.01	74.00	-26.99	peak
2	9145.000	37.49	9.22	46.71	74.00	-27.29	peak
3	11510.000	35.89	13.39	49.28	74.00	-24.72	peak
4	13798.000	33.26	17.05	50.31	74.00	-23.69	peak
5	15217.000	34.66	16.12	50.78	74.00	-23.22	peak
6	17329.000	31.03	21.78	52.81	74.00	-21.19	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**HARMONICS AND SPURIOUS EMISSIONS (HIGH CHANNEL, VERTICAL)****1-7GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	66.30	-13.53	52.77	74.00	-21.23	peak
2	1444.000	60.43	-12.56	47.87	74.00	-26.13	peak
3	2968.000	52.11	-6.22	45.89	74.00	-28.11	peak
4	4264.000	49.34	-1.84	47.50	74.00	-26.50	peak
5	5650.000	39.19	2.01	41.20	74.00	-32.80	peak
6	6658.000	38.41	4.46	42.87	74.00	-31.13	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

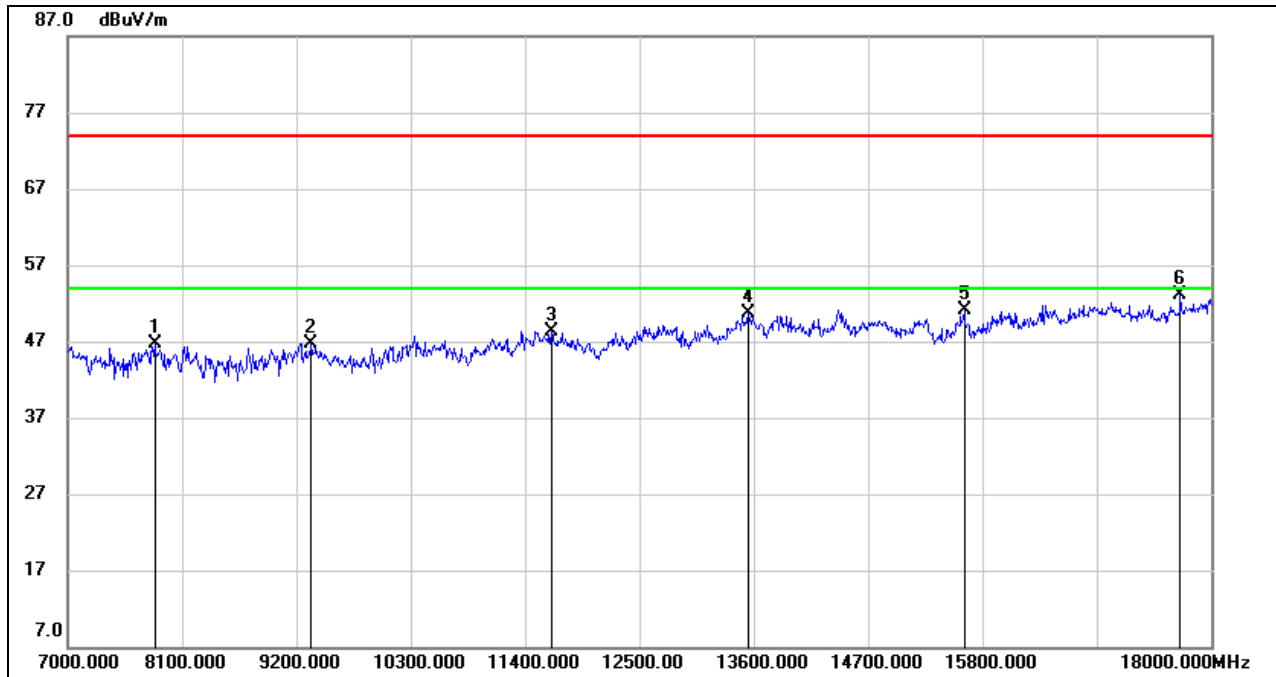
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7836.000	38.76	7.96	46.72	74.00	-27.28	peak
2	9343.000	37.13	9.57	46.70	74.00	-27.30	peak
3	11653.000	35.10	13.28	48.38	74.00	-25.62	peak
4	13545.000	34.78	15.98	50.76	74.00	-23.24	peak
5	15624.000	34.14	17.05	51.19	74.00	-22.81	peak
6	17703.000	30.61	22.52	53.13	74.00	-20.87	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

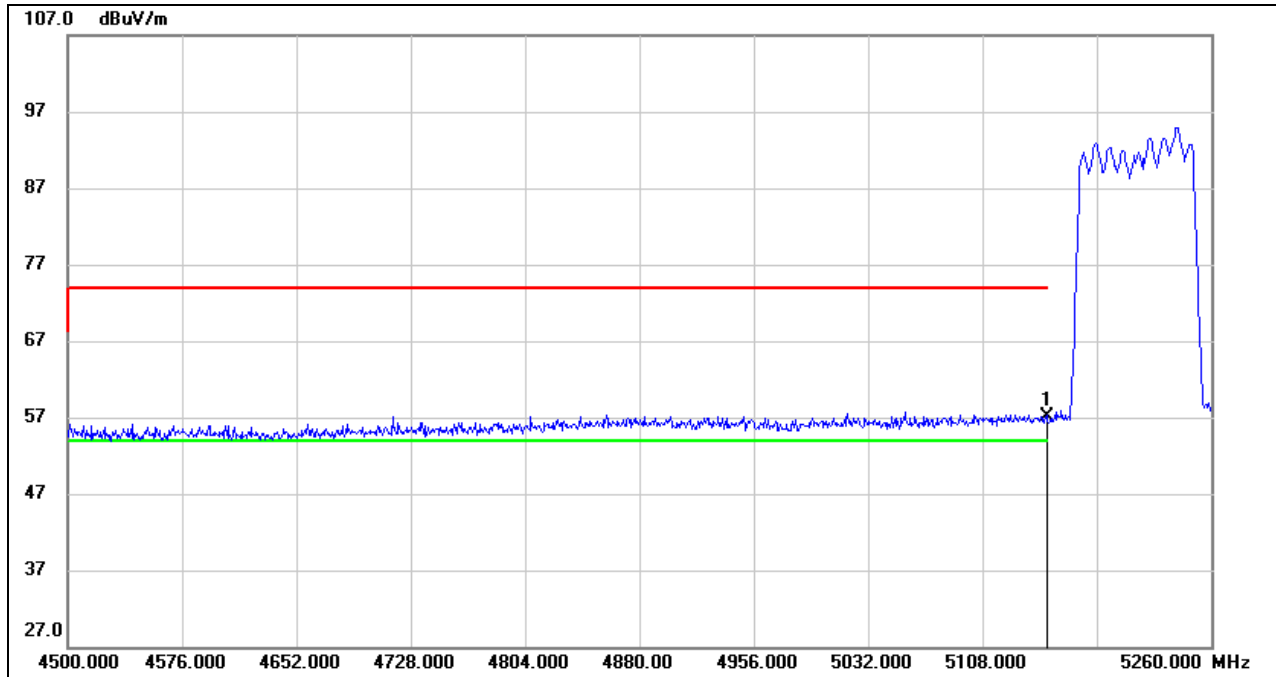


8.4. 802.11ac VHT80 MODE

8.4.1. UNII-1 BAND

RESTRICTED BANDEDGE (LOW CHANNEL, HORIZONTAL)

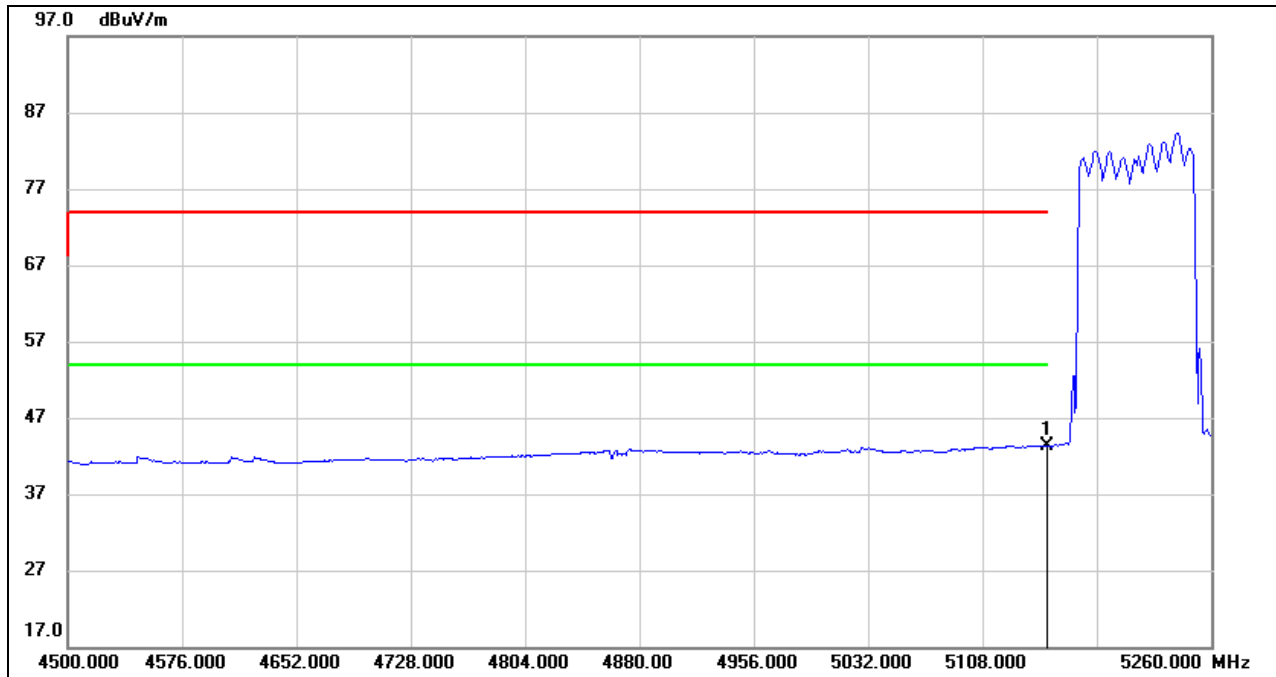
PEAK



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	16.74	40.46	57.20	74.00	-16.80	peak

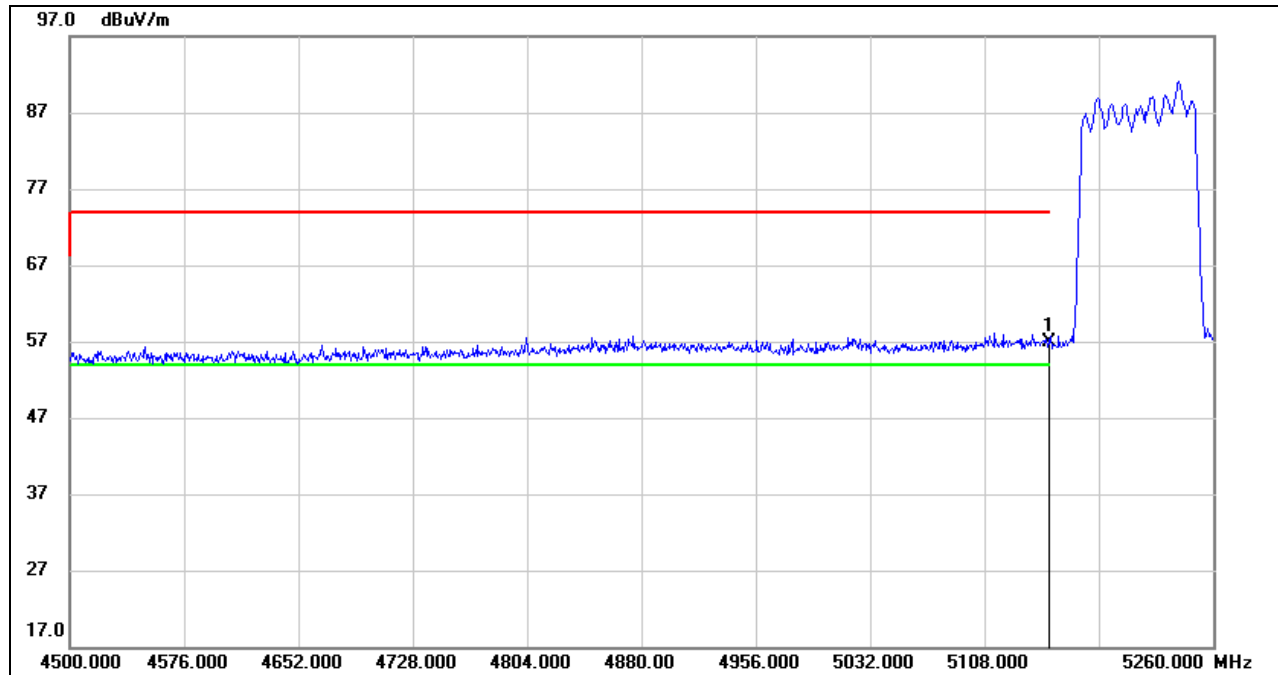
Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

AVG



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	2.82	40.46	43.28	54.00	-10.72	AVG

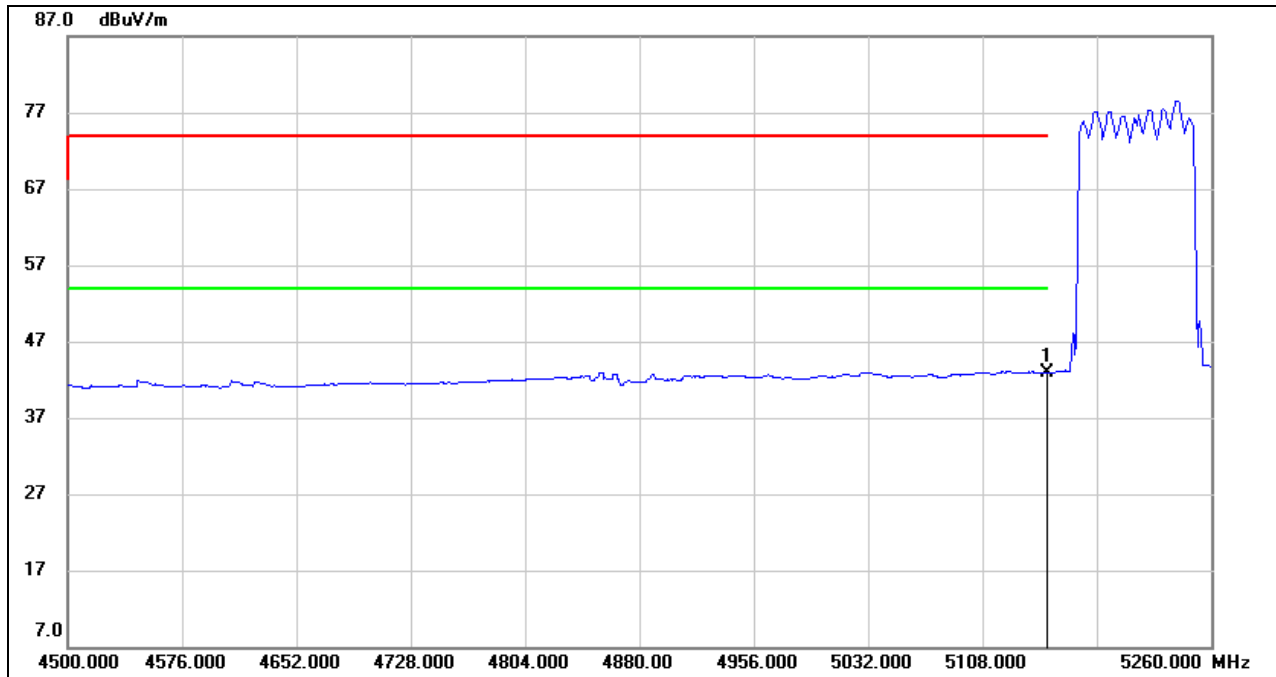
Note: 1. Measurement = Reading Level + Correct Factor.
 2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
 3. AVG: VBW=1/Ton, where: Ton is the transmitting duration.
 4. For the transmitting duration, please refer to clause 7.1.
 5. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

**RESTRICTED BANDEDGE (LOW CHANNEL, VERTICAL)****PEAK**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	16.37	40.46	56.83	74.00	-17.17	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

AVG

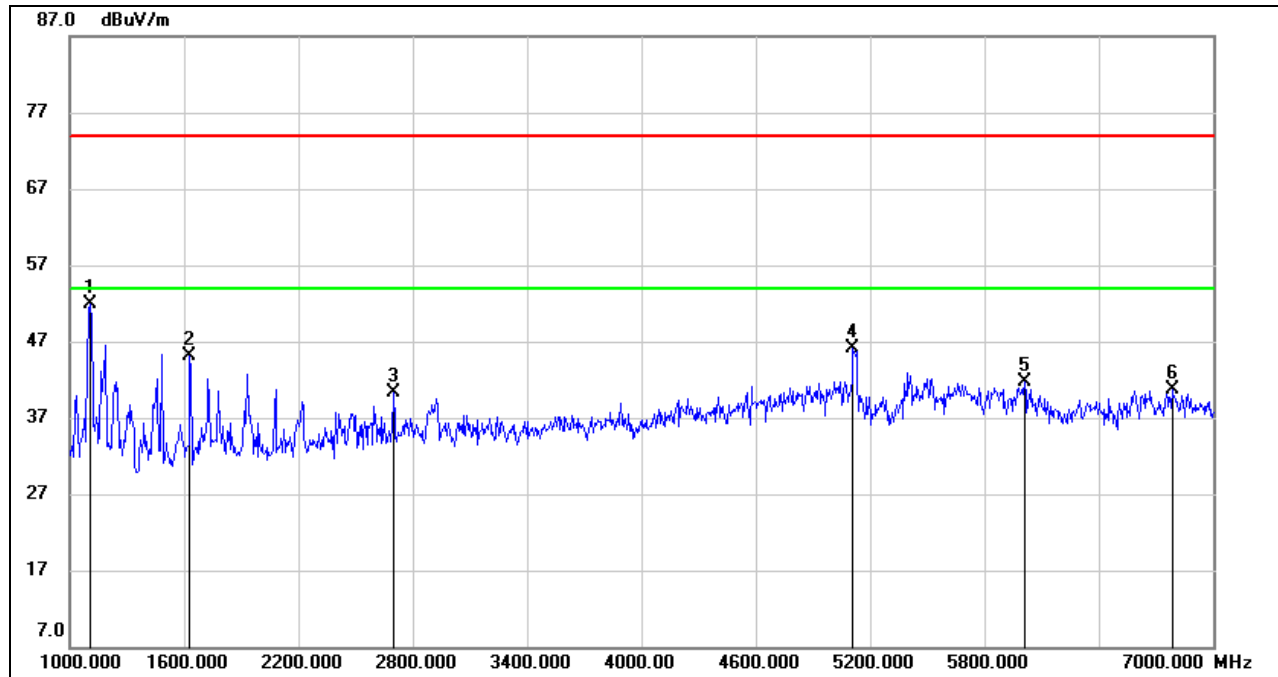


No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5150.000	2.48	40.46	42.94	54.00	-11.06	AVG

Note: 1. Measurement = Reading Level + Correct Factor.
 2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
 3. AVG: $VBW=1/T_{on}$, where: T_{on} is the transmitting duration.
 4. For the transmitting duration, please refer to clause 7.1.
 5. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1108.000	65.36	-13.53	51.83	74.00	-22.17	peak
2	1630.000	56.40	-11.39	45.01	74.00	-28.99	peak
3	2698.000	47.94	-7.57	40.37	74.00	-33.63	peak
4	5110.000	44.63	1.43	46.06	74.00	-27.94	peak
5	6010.000	39.08	2.61	41.69	74.00	-32.31	peak
6	6784.000	36.23	4.44	40.67	74.00	-33.33	peak

Note: 1. Measurement = Reading Level + Correct Factor.

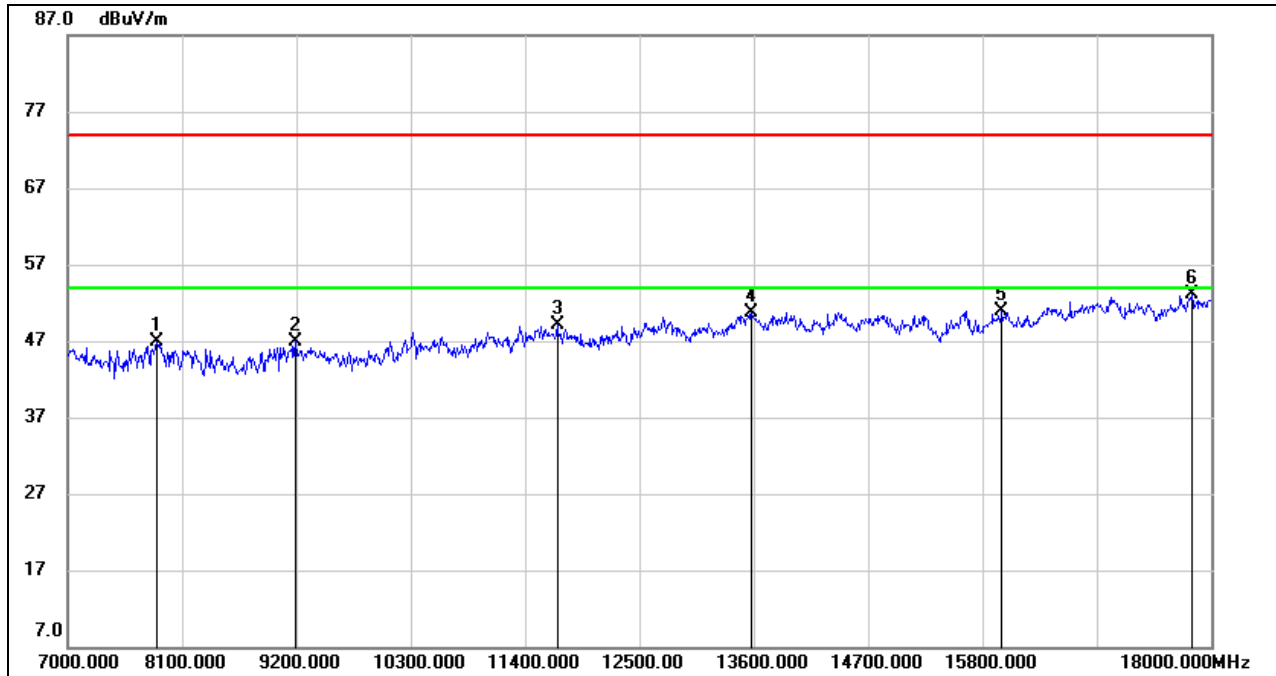
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**7-18GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7858.000	38.99	7.84	46.83	74.00	-27.17	peak
2	9189.000	38.05	8.95	47.00	74.00	-27.00	peak
3	11708.000	36.12	13.07	49.19	74.00	-24.81	peak
4	13578.000	34.57	16.06	50.63	74.00	-23.37	peak
5	15987.000	33.09	17.79	50.88	74.00	-23.12	peak
6	17813.000	29.62	23.41	53.03	74.00	-20.97	peak

Note: 1. Measurement = Reading Level + Correct Factor.

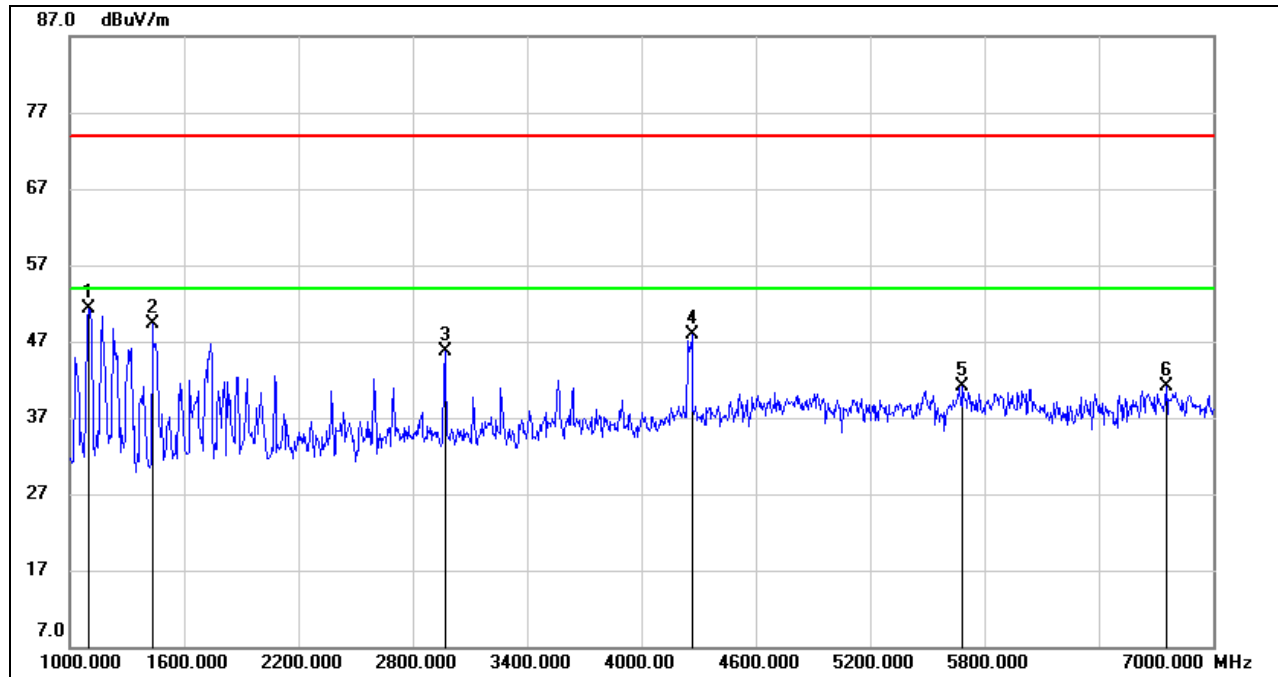
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, VERTICAL)****1-7GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1102.000	64.79	-13.56	51.23	74.00	-22.77	peak
2	1432.000	61.83	-12.62	49.21	74.00	-24.79	peak
3	2968.000	51.92	-6.22	45.70	74.00	-28.30	peak
4	4264.000	49.82	-1.84	47.98	74.00	-26.02	peak
5	5686.000	39.18	1.98	41.16	74.00	-32.84	peak
6	6754.000	36.61	4.45	41.06	74.00	-32.94	peak

Note: 1. Measurement = Reading Level + Correct Factor.

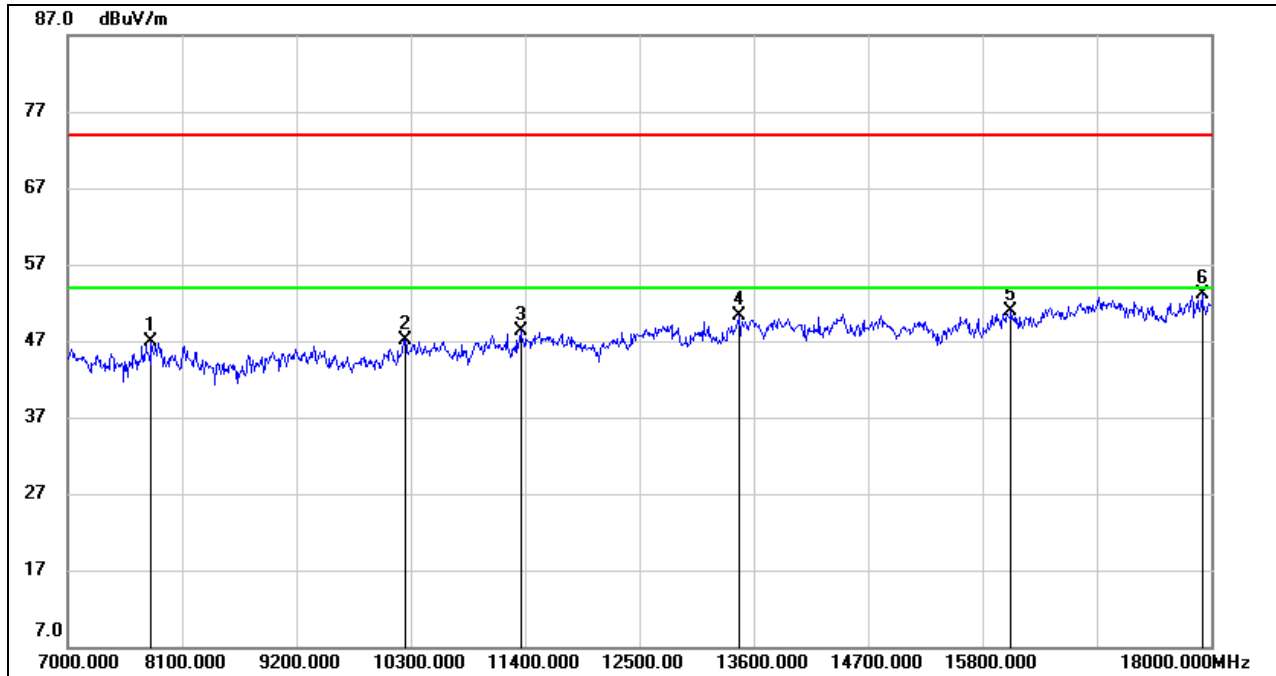
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**7-18GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7803.000	38.85	8.15	47.00	74.00	-27.00	peak
2	10245.000	36.32	10.82	47.14	74.00	-26.86	peak
3	11356.000	35.82	12.51	48.33	74.00	-25.67	peak
4	13457.000	34.33	16.02	50.35	74.00	-23.65	peak
5	16075.000	32.72	18.20	50.92	74.00	-23.08	peak
6	17912.000	29.75	23.42	53.17	74.00	-20.83	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

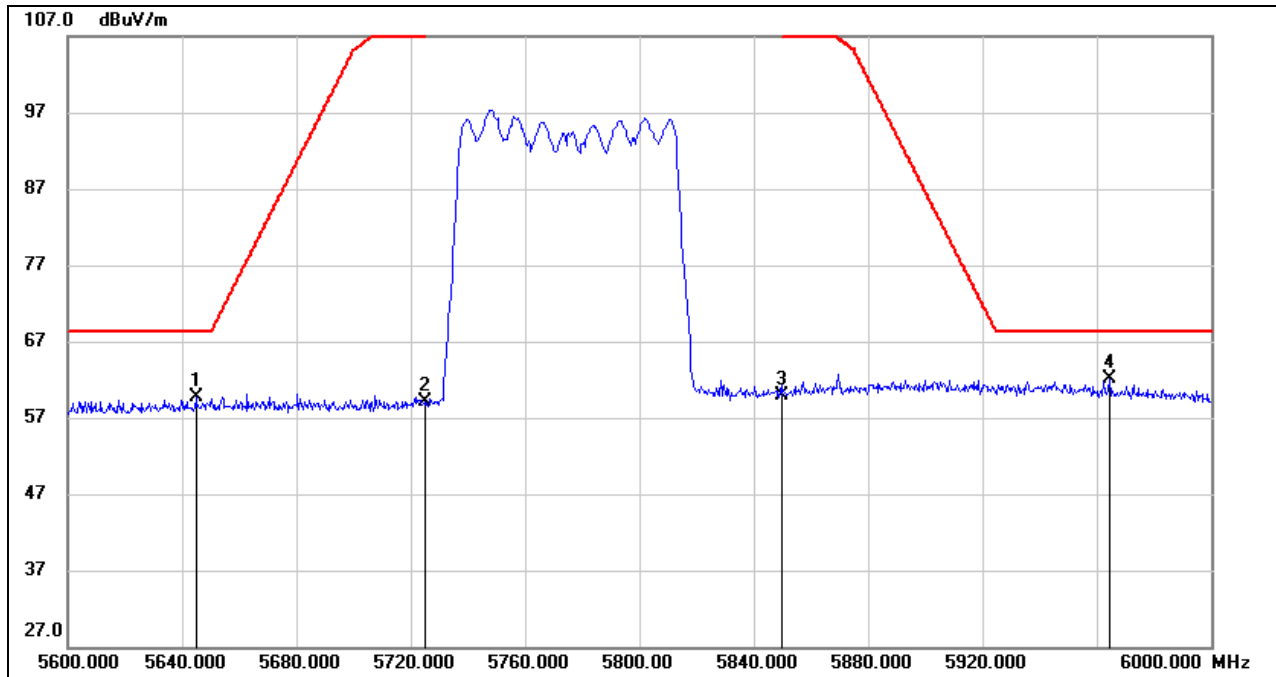
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

8.4.2. UNII-3 BAND

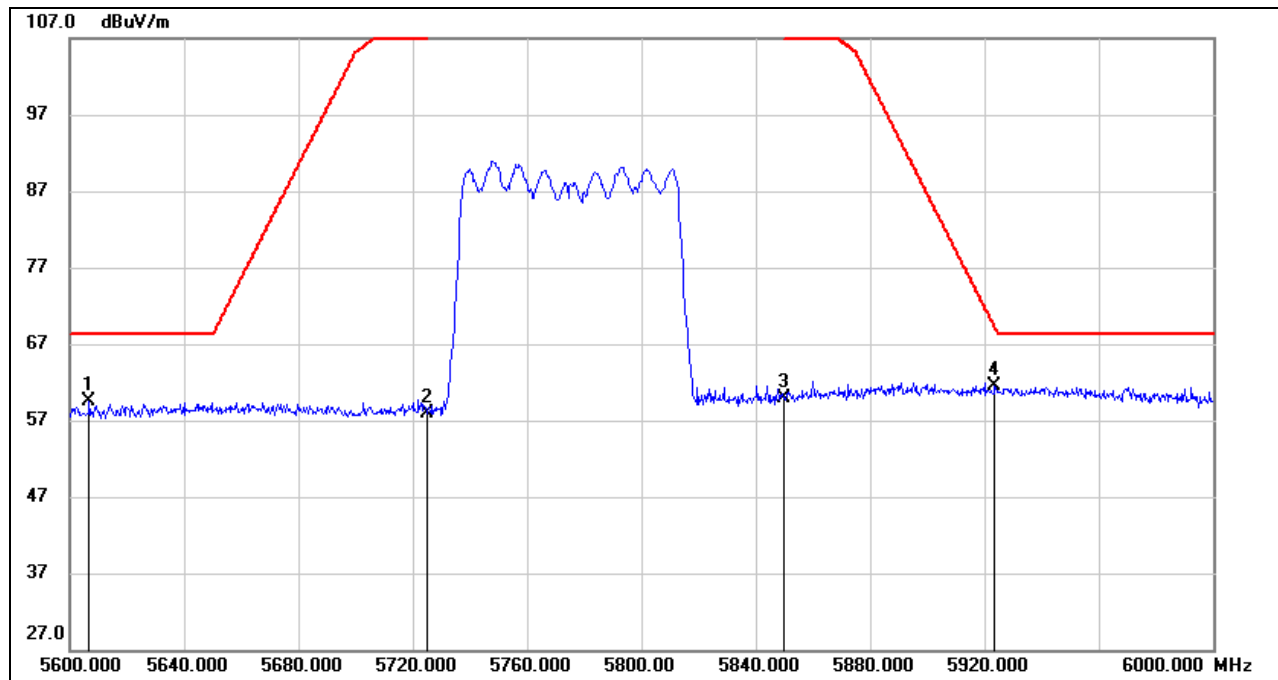
RESTRICTED BANDEDGE (LOW CHANNEL, HORIZONTAL)



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5644.800	18.22	41.47	59.69	68.20	-8.51	peak
2	5725.000	17.50	41.61	59.11	122.20	-63.09	peak
3	5850.000	17.03	42.89	59.92	122.20	-62.28	peak
4	5964.400	19.29	42.75	62.04	68.20	-6.16	peak

Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

RESTRICTED BANDEDGE (LOW CHANNEL, VERTICAL)



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5606.800	18.09	41.46	59.55	68.20	-8.65	peak
2	5725.000	16.35	41.61	57.96	122.20	-64.24	peak
3	5850.000	17.01	42.89	59.90	122.20	-62.30	peak
4	5923.600	18.03	43.45	61.48	69.23	-7.75	peak

Note: 1. Measurement = Reading Level + Correct Factor.

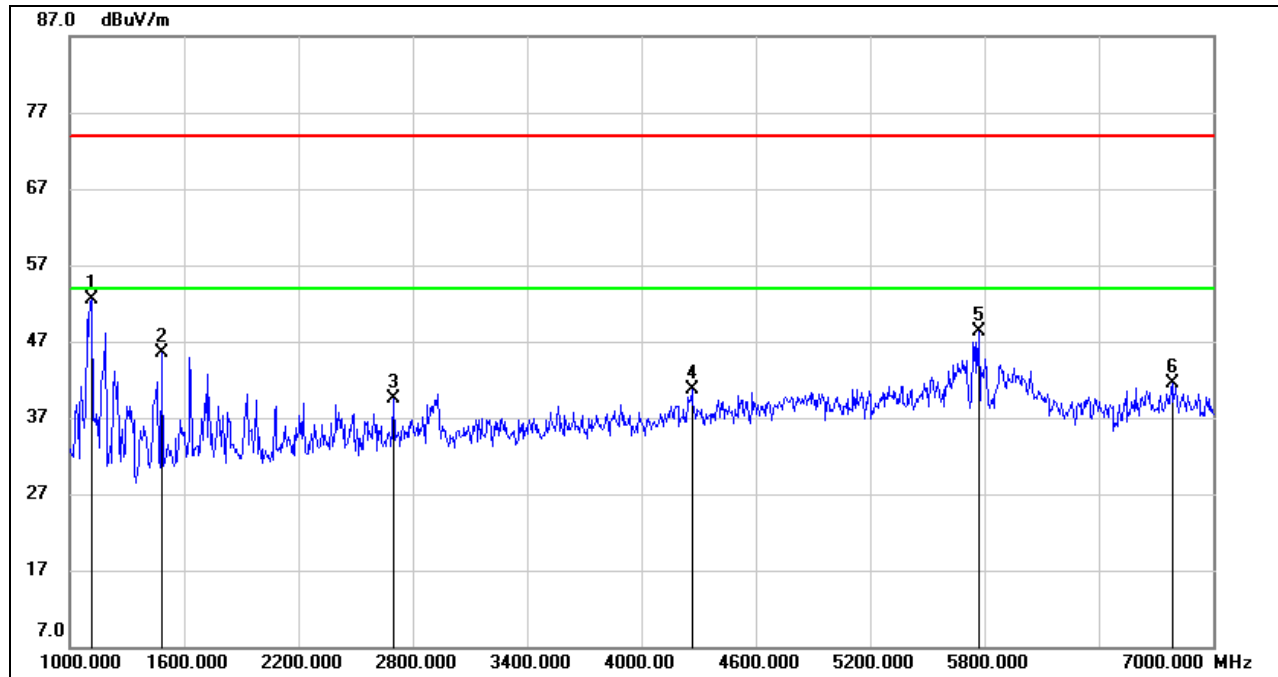
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Only the worst data was recorded, if it complies with the limit, the other emissions deemed to comply with the limit.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, HORIZONTAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1114.000	65.92	-13.49	52.43	74.00	-21.57	peak
2	1480.000	57.96	-12.40	45.56	74.00	-28.44	peak
3	2698.000	47.14	-7.57	39.57	74.00	-34.43	peak
4	4264.000	42.50	-1.84	40.66	74.00	-33.34	peak
5	5770.000	46.27	1.96	48.23	74.00	-25.77	peak
6	6784.000	36.97	4.44	41.41	74.00	-32.59	peak

Note: 1. Measurement = Reading Level + Correct Factor.

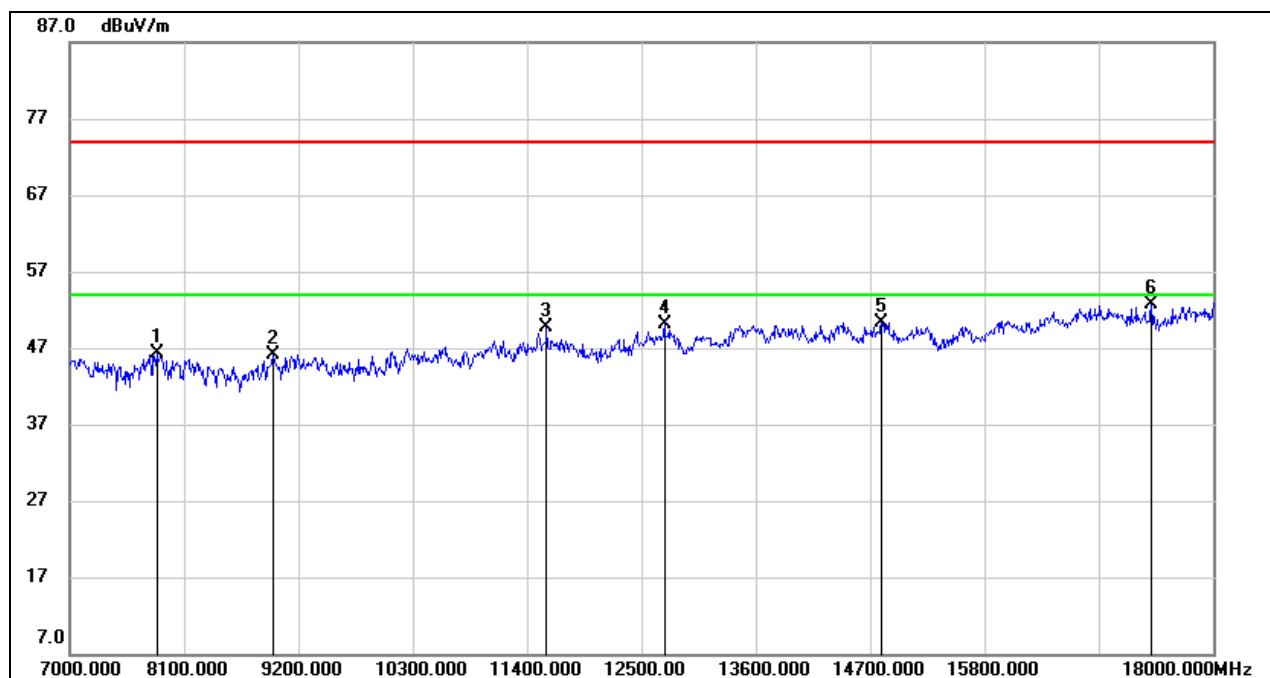
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

**7-18GHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7836.000	38.27	7.96	46.23	74.00	-27.77	peak
2	8958.000	37.04	9.10	46.14	74.00	-27.86	peak
3	11587.000	36.20	13.52	49.72	74.00	-24.28	peak
4	12720.000	35.41	14.79	50.20	74.00	-23.80	peak
5	14810.000	34.29	16.07	50.36	74.00	-23.64	peak
6	17406.000	31.14	21.53	52.67	74.00	-21.33	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

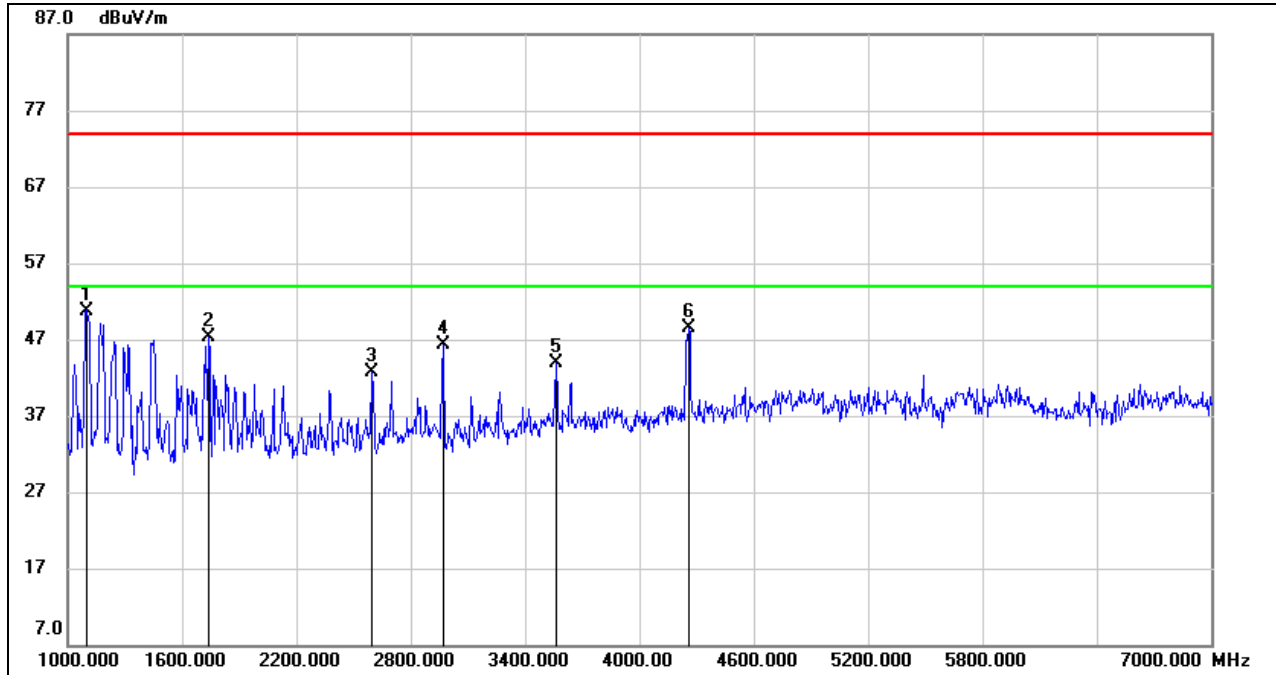
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

HARMONICS AND SPURIOUS EMISSIONS (LOW CHANNEL, VERTICAL)

1-7GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	1096.000	64.39	-13.59	50.80	74.00	-23.20	peak
2	1738.000	57.95	-10.57	47.38	74.00	-26.62	peak
3	2596.000	50.92	-8.18	42.74	74.00	-31.26	peak
4	2968.000	52.56	-6.22	46.34	74.00	-27.66	peak
5	3562.000	48.59	-4.67	43.92	74.00	-30.08	peak
6	4258.000	50.30	-1.84	48.46	74.00	-25.54	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

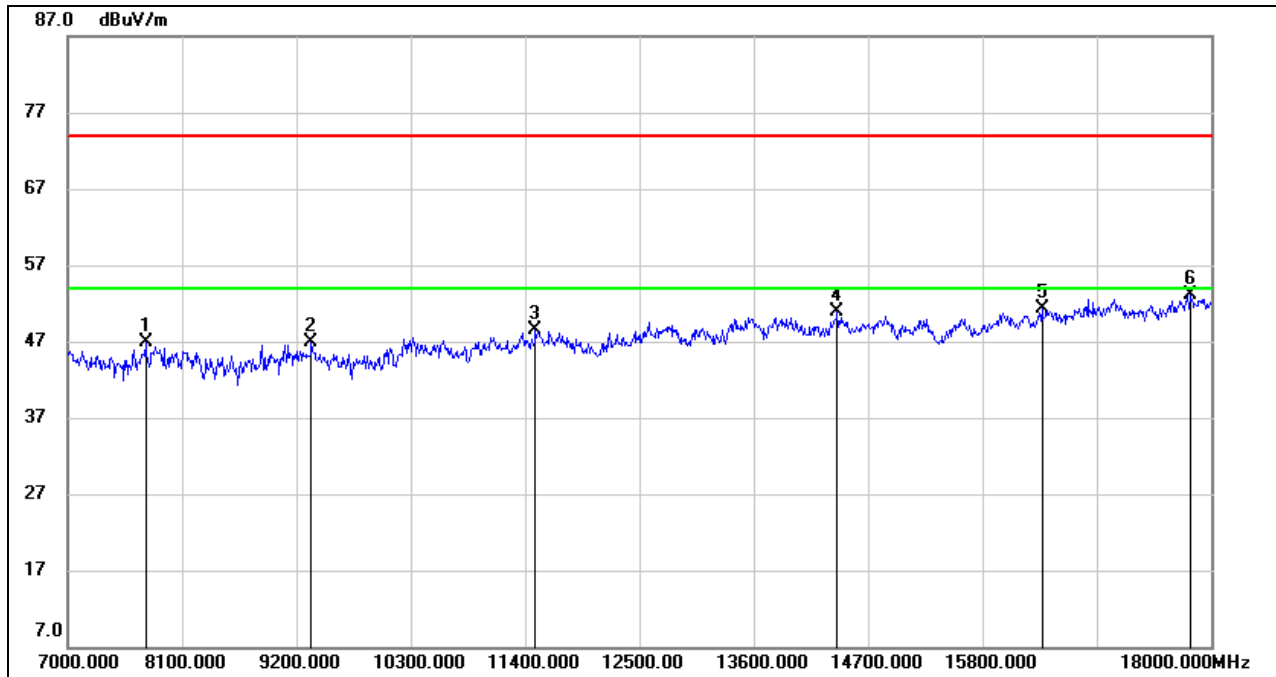
3. Peak: Peak detector.

4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.

5. Proper operation of the transmitter prior to adding the filter to the measurement chain.

6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.

7-18GHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	7748.000	39.40	7.48	46.88	74.00	-27.12	peak
2	9343.000	37.42	9.57	46.99	74.00	-27.01	peak
3	11499.000	35.06	13.35	48.41	74.00	-25.59	peak
4	14403.000	34.20	16.68	50.88	74.00	-23.12	peak
5	16372.000	32.18	19.05	51.23	74.00	-22.77	peak
6	17802.000	29.73	23.41	53.14	74.00	-20.86	peak

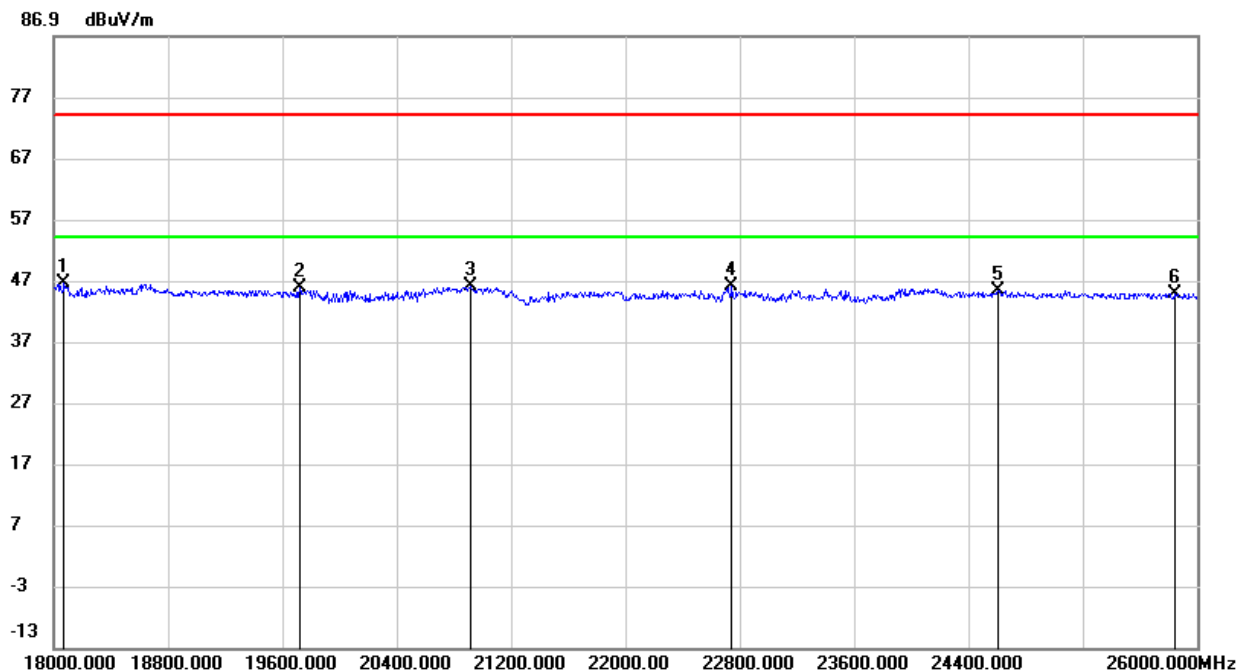
Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.
4. Filter losses were only considered in the spurious frequency bands and the authorized band was not corrected for Band reject filter losses.
5. Proper operation of the transmitter prior to adding the filter to the measurement chain.
6. Owing to the highest peak level of unwanted emission out of the restricted bands complies with the lowest limit(54dBuV/m), so all the test point was deemed to comply with the limits list in the standard.



8.5. SPURIOUS EMISSIONS (18GHz ~ 26GHz)

8.5.1. 802.11a20 MODE

SPURIOUS EMISSIONS (UNII-3 BAND LOW CHANNEL, HORIZONTAL, WORST-CASE CONFIGURATION)



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	18072.000	50.55	-4.02	46.53	74.00	-27.47	peak
2	19720.000	50.08	-4.39	45.69	74.00	-28.31	peak
3	20920.000	51.32	-5.23	46.09	74.00	-27.91	peak
4	22744.000	51.68	-5.74	45.94	74.00	-28.06	peak
5	24608.000	47.68	-2.31	45.37	74.00	-28.63	peak
6	25840.000	46.57	-1.73	44.84	74.00	-29.16	peak

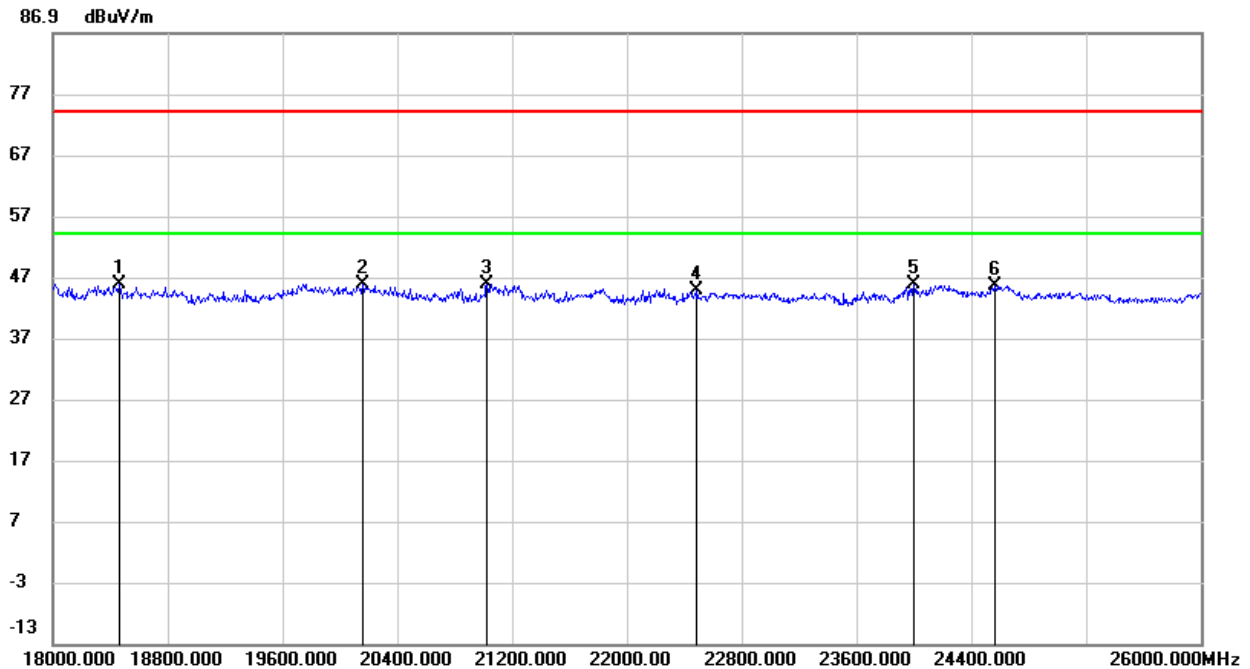
Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.



SPURIOUS EMISSIONS (UNII-3 BAND LOW CHANNEL, VERTICAL, WORST-CASE CONFIGURATION)



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	18464.000	50.20	-4.39	45.81	74.00	-28.19	peak
2	20160.000	50.57	-4.70	45.87	74.00	-28.13	peak
3	21024.000	51.14	-5.30	45.84	74.00	-28.16	peak
4	22488.000	50.60	-5.81	44.79	74.00	-29.21	peak
5	24000.000	49.91	-4.01	45.90	74.00	-28.10	peak
6	24560.000	48.00	-2.43	45.57	74.00	-28.43	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.

Note: All the modes and antennas had been tested, but only the worst data was recorded in the report.

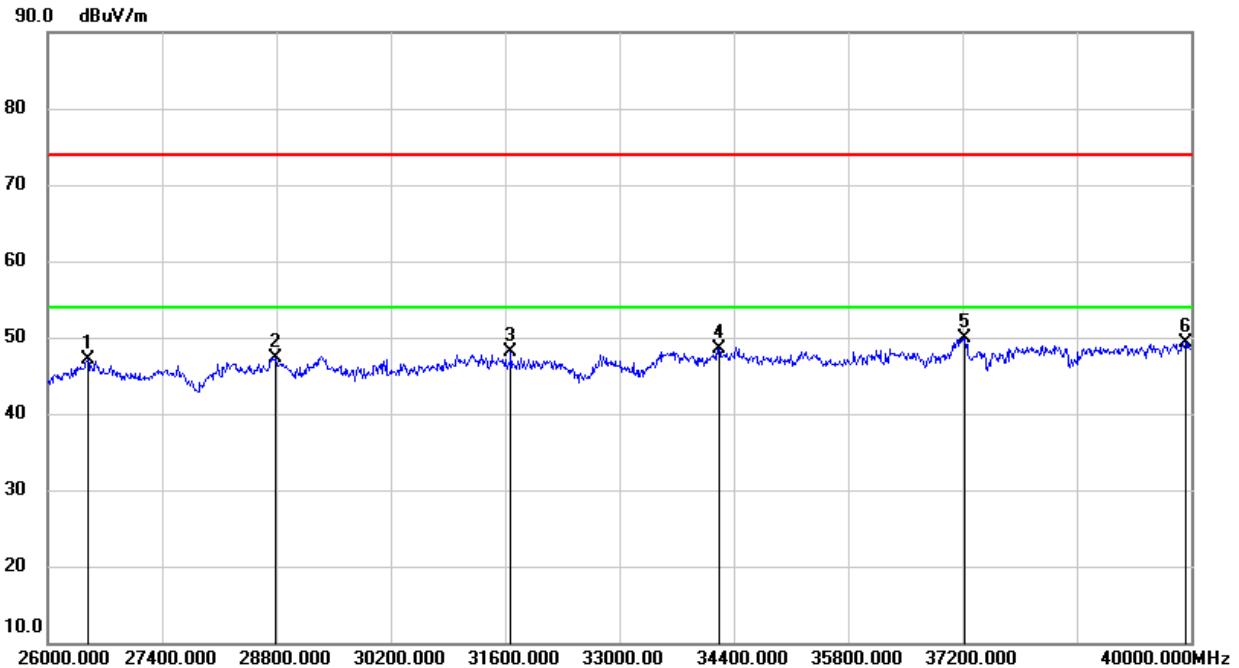


8.6. SPURIOUS EMISSIONS (26GHz ~ 40GHz)

8.6.1. 802.11a20 MODE

ANTENNA 1 TEST RESULTS (WORST CASE)

SPURIOUS EMISSIONS (UNII-3 BAND LOW CHANNEL, HORIZONTAL, WORST-CASE CONFIGURATION)



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	26490.000	51.79	-4.74	47.05	74.00	-26.95	peak
2	28786.000	47.99	-0.64	47.35	74.00	-26.65	peak
3	31670.000	49.36	-1.21	48.15	74.00	-25.85	peak
4	34218.000	47.46	1.13	48.59	74.00	-25.41	peak
5	37228.000	46.73	3.14	49.87	74.00	-24.13	peak
6	39930.000	44.18	5.08	49.26	74.00	-24.74	peak

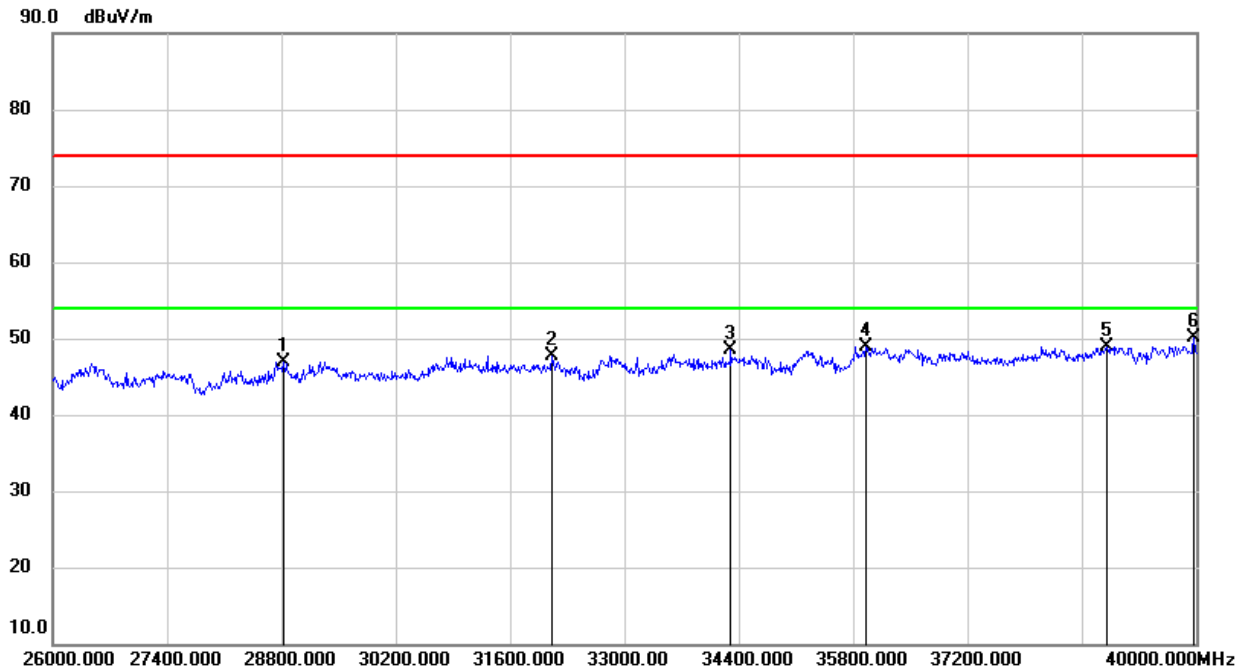
Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Peak: Peak detector.



SPURIOUS EMISSIONS (UNII-3 BAND LOW CHANNEL, VERTICAL, WORST-CASE CONFIGURATION)



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	28828.000	47.63	-0.79	46.84	74.00	-27.16	peak
2	32104.000	49.49	-1.75	47.74	74.00	-26.26	peak
3	34302.000	47.45	1.10	48.55	74.00	-25.45	peak
4	35954.000	44.88	3.94	48.82	74.00	-25.18	peak
5	38908.000	44.58	4.28	48.86	74.00	-25.14	peak
6	39972.000	44.95	5.13	50.08	74.00	-23.92	peak

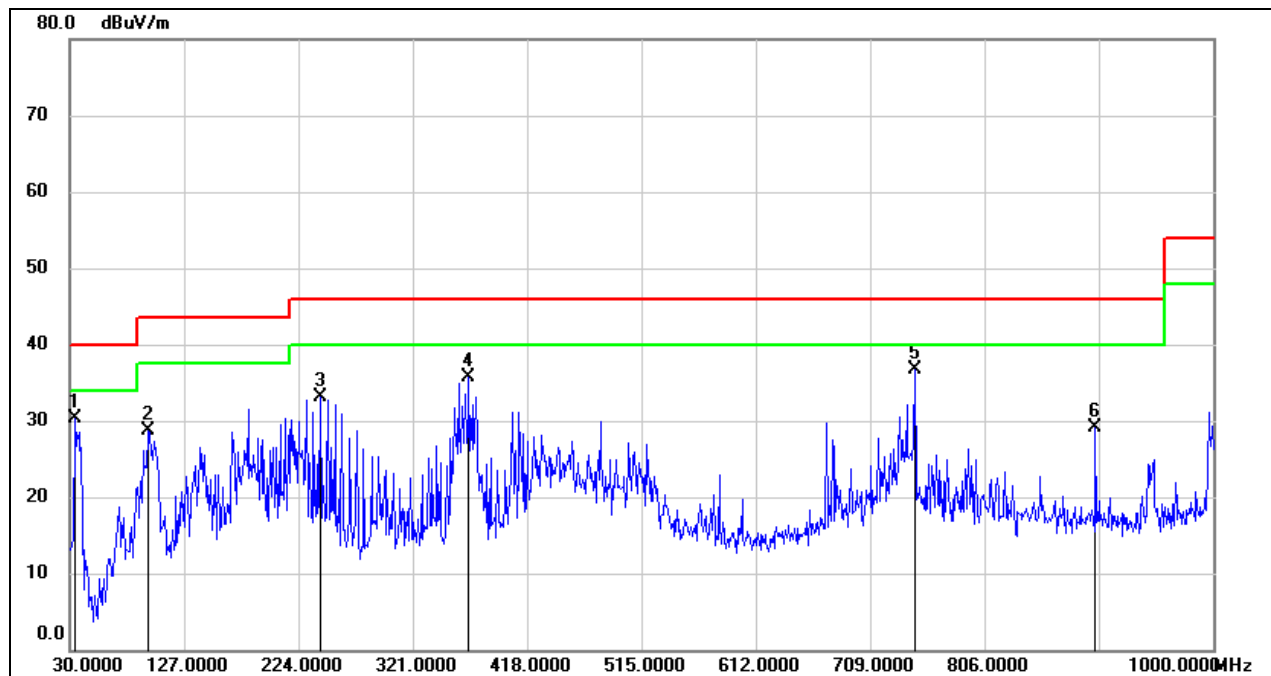
Note: 1. Measurement = Reading Level + Correct Factor.
2. If Peak Result complies with AV limit, AV Result is deemed to comply with AV limit.
3. Peak: Peak detector.

Note: All the modes and antennas had been tested, but only the worst data was recorded in the report.

8.7. SPURIOUS EMISSIONS (30MHz ~ 1 GHz)

8.7.1. 802.11a20 MODE

SPURIOUS EMISSIONS (UNII-3 BAND LOW CHANNEL, HORIZONTAL, WORST-CASE CONFIGURATION)



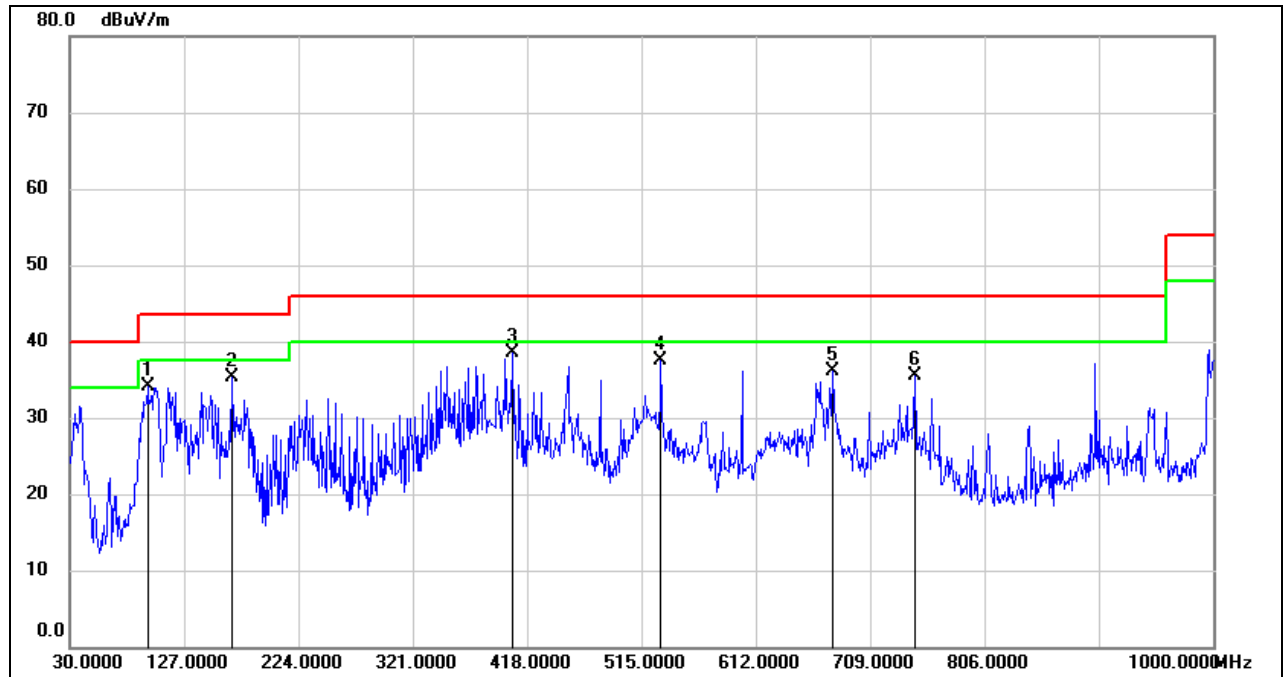
No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	33.8800	49.62	-19.38	30.24	40.00	-9.76	QP
2	96.9300	50.21	-21.49	28.72	43.50	-14.78	QP
3	242.4300	52.51	-19.39	33.12	46.00	-12.88	QP
4	368.5300	49.78	-14.09	35.69	46.00	-10.31	QP
5	746.8300	45.05	-8.39	36.66	46.00	-9.34	QP
6	900.0900	34.72	-5.65	29.07	46.00	-16.93	QP

Note: 1. Result Level = Read Level + Correct Factor.

2. If Peak Result complies with QP limit, QP Result is deemed to comply with QP limit.

3. Test setup: RBW: 120 kHz, VBW: 300 kHz, Sweep time: auto.

SPURIOUS EMISSIONS (UNII-1 BAND LOW CHANNEL, VERTICAL, WORST-CASE CONFIGURATION)



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	95.9600	55.75	-21.56	34.19	43.50	-9.31	QP
2	167.7400	52.79	-17.45	35.34	43.50	-8.16	QP
3	405.3900	51.78	-13.35	38.43	46.00	-7.57	QP
4	531.4900	48.65	-11.08	37.57	46.00	-8.43	QP
5	676.9900	45.07	-9.01	36.06	46.00	-9.94	QP
6	746.8300	43.96	-8.39	35.57	46.00	-10.43	QP

- Note: 1. Result Level = Read Level + Correct Factor.
2. If Peak Result complies with QP limit, QP Result is deemed to comply with QP limit.
3. Test setup: RBW: 120 kHz, VBW: 300 kHz, Sweep time: auto

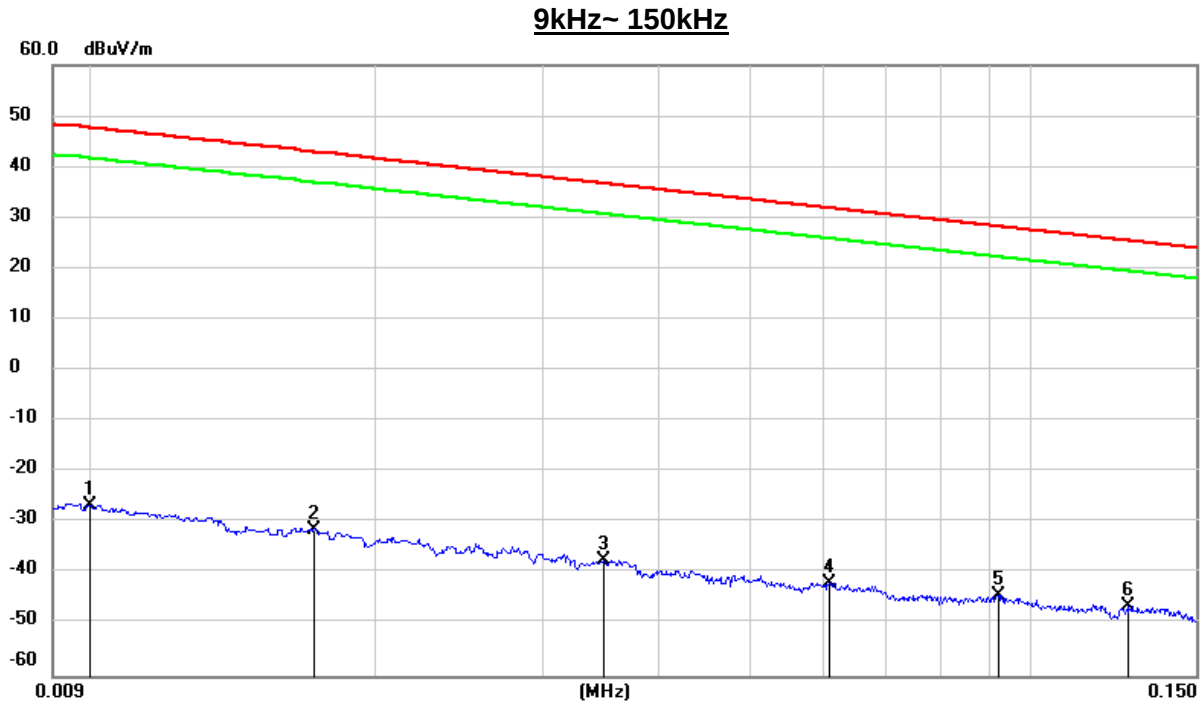
Note: All the modes and antennas had been tested, but only the worst data was recorded in the report.



8.8. SPURIOUS EMISSIONS BELOW 30MHz

8.8.1. 802.11a20 MODE

SPURIOUS EMISSIONS (UNII-3 BAND LOW CHANNEL, LOOP ANTENNA FACE ON TO THE EUT, WORST-CASE CONFIGURATION)



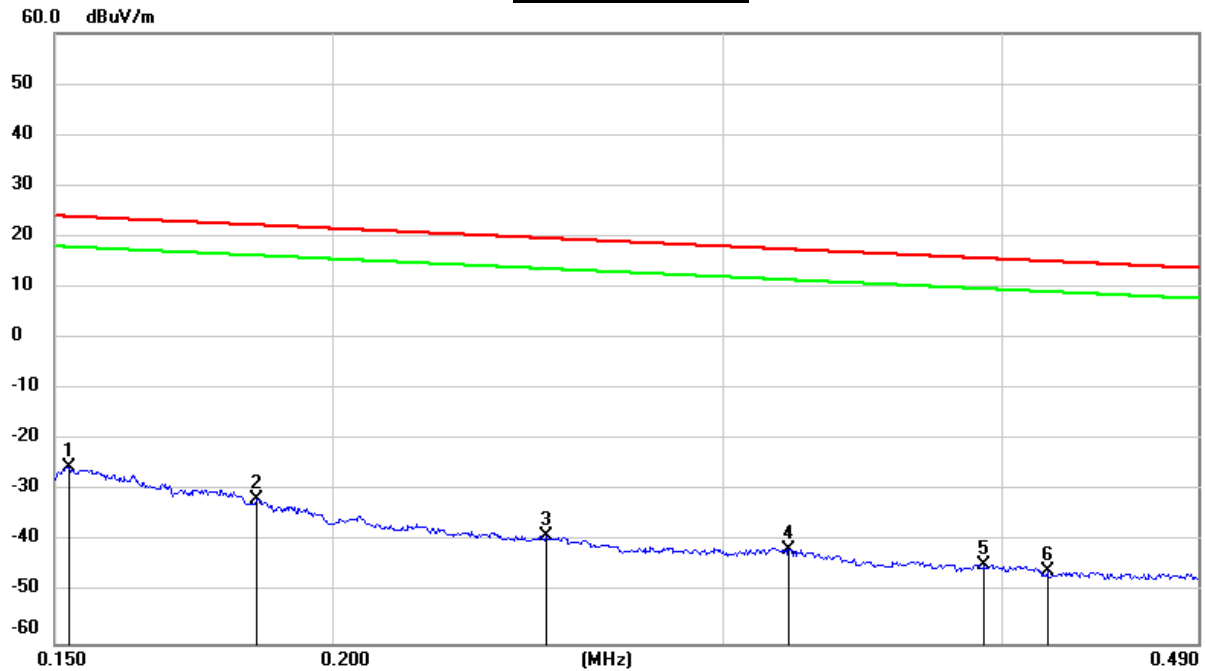
No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	FCC Result (dBuV/m)	FCC Limit (dBuV/m)	ISED Result (dBuA/m)	ISED Limit (dBuA/m)	Margin (dB)	Remark
1	0.0100	74.85	-101.40	-26.55	47.60	-78.05	-3.90	-74.15	peak
2	0.0171	69.88	-101.36	-31.48	42.94	-82.98	-8.56	-74.42	peak
3	0.0349	64.03	-101.41	-37.38	36.75	-88.88	-14.75	-74.13	peak
4	0.0609	59.83	-101.53	-41.70	31.91	-93.20	-19.59	-73.61	peak
5	0.0922	57.51	-101.74	-44.23	28.31	-95.73	-23.19	-72.54	peak
6	0.1272	55.35	-101.71	-46.36	25.52	-97.86	-25.98	-71.88	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV and QP limit, AV and QP Result are deemed to comply with AV limit.

3. All 3 polarizations (Horizontal, Face-on and Face-off) of the loop antenna had been tested, but only the worst data recorded in the report.

4. $\text{dBuA/m} = \text{dBuV/m} - 20\log_{10}(120\pi) = \text{dBuV/m} - 51.5$.

**150kHz ~ 490kHz**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	FCC Result (dBuV/m)	FCC Limit (dBuV/m)	ISED Result (dBuA/m)	ISED Limit (dBuA/m)	Margin (dB)	Remark
1	0.1524	76.30	-101.63	-25.33	23.94	-76.83	-27.56	-49.27	peak
2	0.1849	70.04	-101.70	-31.66	22.27	-83.16	-29.23	-53.93	peak
3	0.2494	62.96	-101.80	-38.84	19.66	-90.34	-31.84	-58.50	peak
4	0.3205	60.45	-101.88	-41.43	17.49	-92.93	-34.01	-58.92	peak
5	0.3930	57.55	-101.96	-44.41	15.71	-95.91	-35.79	-60.12	peak
6	0.4193	56.18	-101.98	-45.80	15.15	-97.30	-36.35	-60.95	peak

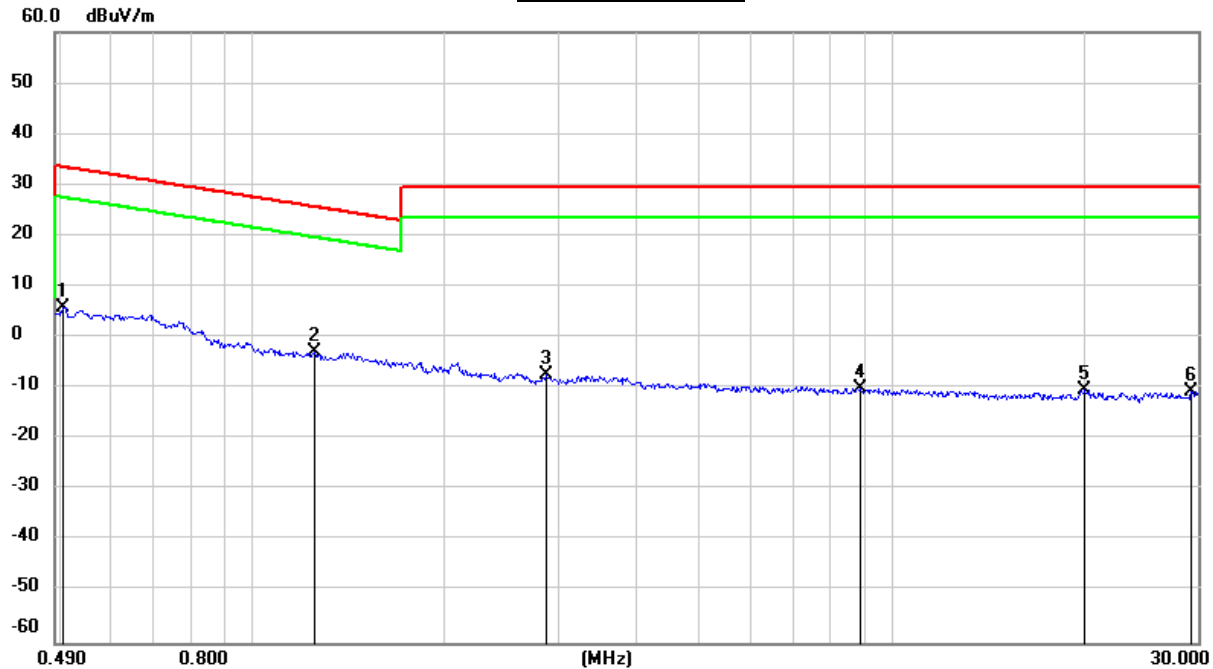
Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV and QP limit, AV and QP Result are deemed to comply with AV limit.

3. All 3 polarizations (Horizontal, Face-on and Face-off) of the loop antenna had been tested, but only the worst data recorded in the report.

4. $\text{dBuA/m} = \text{dBuV/m} - 20\log_{10}(120\pi) = \text{dBuV/m} - 51.5$.

490kHz ~ 30MHz



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB/m)	FCC Result (dBuV/m)	FCC Limit (dBuV/m)	ISED Result (dBuA/m)	ISED Limit (dBuA/m)	Margin (dB)	Remark
1	0.5039	67.94	-62.07	5.87	33.56	-45.63	-17.94	-27.69	peak
2	1.2459	59.25	-62.16	-2.91	25.70	-54.41	-25.80	-28.61	peak
3	2.8803	54.34	-61.60	-7.26	29.54	-58.76	-21.96	-36.80	peak
4	8.9001	50.91	-60.95	-10.04	29.54	-61.54	-21.96	-39.58	peak
5	19.9954	50.44	-60.83	-10.39	29.54	-61.89	-21.96	-39.93	peak
6	29.3213	49.30	-60.02	-10.72	29.54	-62.22	-21.96	-40.26	peak

Note: 1. Measurement = Reading Level + Correct Factor.

2. If Peak Result complies with AV and QP limit, AV and QP Result are deemed to comply with AV limit.

3. All 3 polarizations (Horizontal, Face-on and Face-off) of the loop antenna had been tested, but only the worst data recorded in the report.

4. $\text{dBuA/m} = \text{dBuV/m} - 20\log_{10}(120\pi) = \text{dBuV/m} - 51.5$.

Note: All the modes and antennas had been tested, but only the worst data was recorded in the report.

9. AC POWER LINE CONDUCTED EMISSIONS

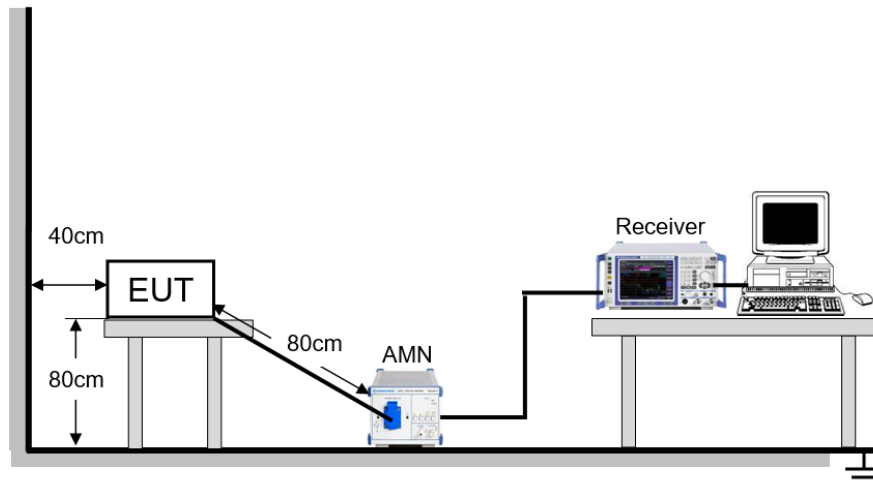
LIMITS

Please refer to CFR 47 FCC §15.207 (a) and ISED RSS-Gen Clause 8.8

FREQUENCY (MHz)	Quasi-peak	Average
0.15 -0.5	66 - 56 *	56 - 46 *
0.50 -5.0	56.00	46.00
5.0 -30.0	60.00	50.00

TEST SETUP AND PROCEDURE

Refer to ANSI C63.10-2013 clause 6.2.

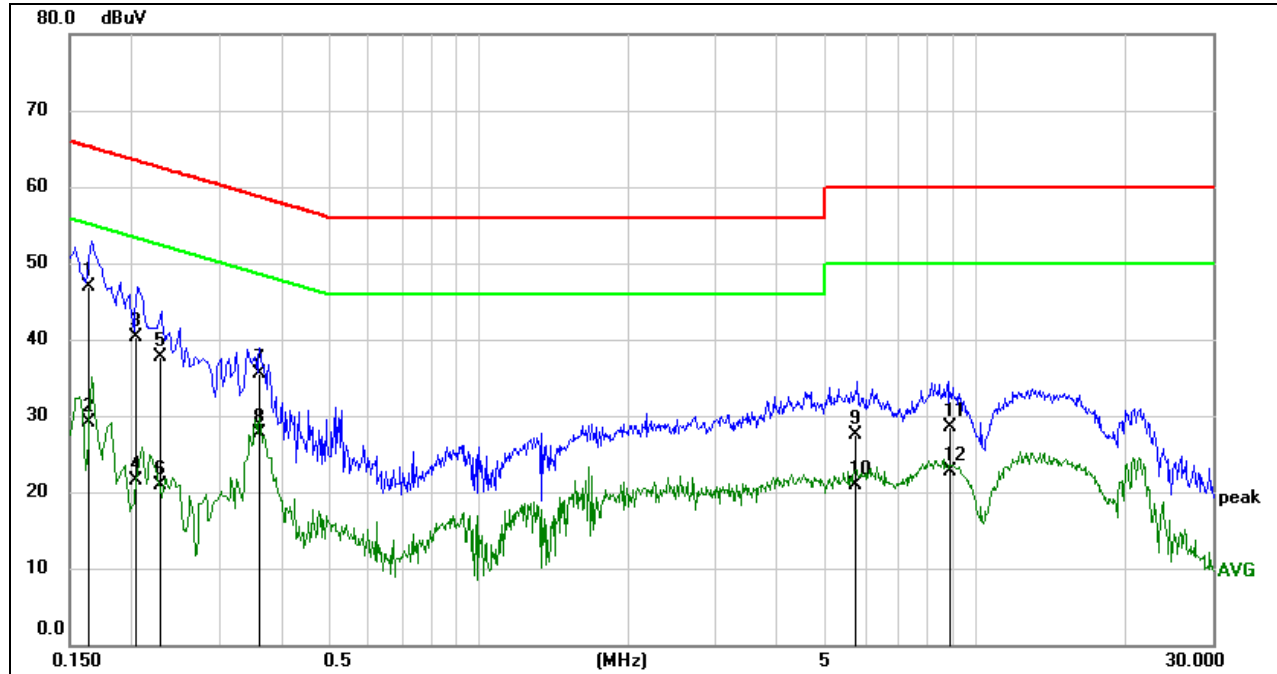


The EUT is put on a table of non-conducting material that is 80cm high. The vertical conducting wall of shielding is located 40cm to the rear of the EUT. The power line of the EUT is connected to the AC mains through a Artificial Mains Network (A.M.N.). A EMI Measurement Receiver (R&S Test Receiver ESR3) is used to test the emissions from both sides of AC line. According to the requirements in Section 6.2 of ANSI C63.10-2013. Conducted emissions from the EUT measured in the frequency range between 0.15 MHz and 30MHz using CISPR Quasi-Peak and average detector mode. The bandwidth of EMI test receiver is set at 9kHz.

The arrangement of the equipment is installed to meet the standards and operating in a manner, which tends to maximize its emission characteristics in a normal application.

TEST ENVIRONMENT

Temperature	23.6°C	Relative Humidity	64.2%
Atmosphere Pressure	101kPa	Test Voltage	AC120V,60Hz

**RESULTS****9.1. 802.11a20 MODE****LINE N RESULTS (UNII-1 BAND LOW CHANNEL, WORST-CASE CONFIGURATION)**

No.	Frequency (MHz)	Reading (dBuV)	Correct (dB)	Result (dBuV)	Limit (dBuV)	Margin (dB)	Remark
1	0.1637	37.29	9.60	46.89	65.27	-18.38	QP
2	0.1637	19.46	9.60	29.06	55.27	-26.21	AVG
3	0.2033	30.77	9.60	40.37	63.47	-23.10	QP
4	0.2033	11.88	9.60	21.48	53.47	-31.99	AVG
5	0.2275	28.10	9.60	37.70	62.54	-24.84	QP
6	0.2275	11.31	9.60	20.91	52.54	-31.63	AVG
7	0.3601	25.88	9.60	35.48	58.73	-23.25	QP
8	0.3601	18.02	9.60	27.62	48.73	-21.11	AVG
9	5.7574	17.88	9.70	27.58	60.00	-32.42	QP
10	5.7574	11.24	9.70	20.94	50.00	-29.06	AVG
11	8.8400	18.77	9.74	28.51	60.00	-31.49	QP
12	8.8400	13.06	9.74	22.80	50.00	-27.20	AVG

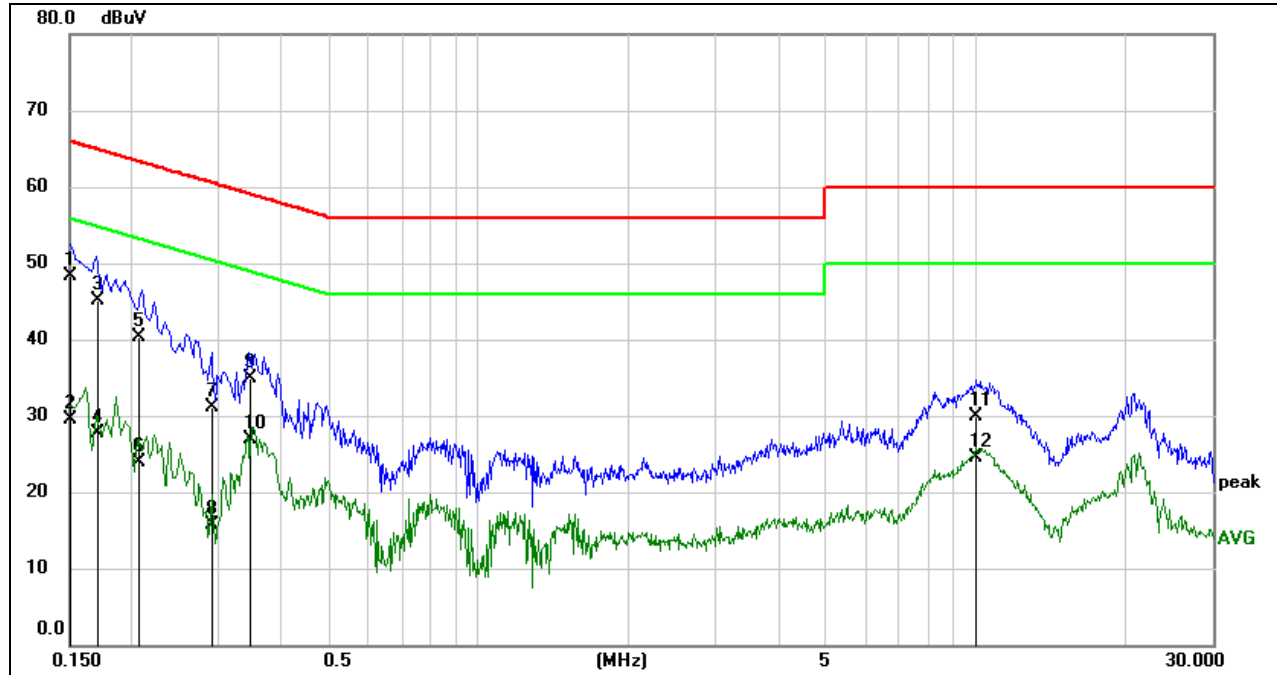
Note: 1. Result = Reading +Correct Factor.

2. If QP Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Test setup: RBW: 200 Hz (9 kHz—150 kHz), 9 kHz (150 kHz—30 MHz).

4. Step size: 80Hz (0.009MHz-0.15MHz), 4 kHz (0.15MHz-30MHz), Scan time: auto.

LINE L RESULTS (UNII-1 BAND LOW CHANNEL, WORST-CASE CONFIGURATION)



No.	Frequency (MHz)	Reading (dBuV)	Correct (dB)	Result (dBuV)	Limit (dBuV)	Margin (dB)	Remark
1	0.1505	38.75	9.61	48.36	65.97	-17.61	QP
2	0.1505	19.92	9.61	29.53	55.97	-26.44	AVG
3	0.1709	35.54	9.61	45.15	64.92	-19.77	QP
4	0.1709	18.01	9.61	27.62	54.92	-27.30	AVG
5	0.2062	30.80	9.60	40.40	63.36	-22.96	QP
6	0.2062	14.40	9.60	24.00	53.36	-29.36	AVG
7	0.2886	21.50	9.60	31.10	60.56	-29.46	QP
8	0.2886	6.19	9.60	15.79	50.56	-34.77	AVG
9	0.3493	25.28	9.60	34.88	58.98	-24.10	QP
10	0.3493	17.34	9.60	26.94	48.98	-22.04	AVG
11	10.0644	20.26	9.74	30.00	60.00	-30.00	QP
12	10.0644	14.77	9.74	24.51	50.00	-25.49	AVG

Note: 1. Result = Reading +Correct Factor.

2. If QP Result complies with AV limit, AV Result is deemed to comply with AV limit.

3. Test setup: RBW: 200 Hz (9 kHz—150 kHz), 9 kHz (150 kHz—30 MHz).

4. Step size: 80Hz (0.009MHz-0.15MHz), 4 kHz (0.15MHz-30MHz), Scan time: auto.

Note: All the modes had been tested, but only the worst data was recorded in the report.

10. FREQUENCY STABILITY

LIMITS

The frequency of the carrier signal shall be maintained within band of operation.

TEST PROCEDURE

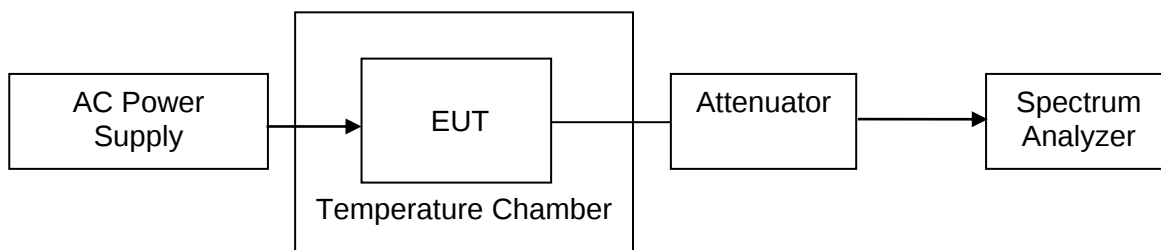
1. The EUT was placed inside an environmental chamber as the temperature in the chamber was varied between 0°C ~ 40°C (declared by customer).
2. The temperature was incremented by 10°C intervals and the unit allowed to stabilize at each temperature before each measurement. The center frequency of the transmitting channel was evaluated at each temperature and the frequency deviation from the channel's center frequency was recorded.
3. The primary supply voltage is varied from 85% to 115% of the nominal value for non hand-carried battery and AC powered equipment. For hand-carried, battery-powered equipment, primary supply voltage is reduced to the battery operating end point which shall be specified by the manufacturer.

Connect the EUT to the spectrum analyser and use the following settings:

Center Frequency	The center frequency of the channel under test
Detector	Peak
RBW	10kHz
VBW	$\geq 3 \times \text{RBW}$
Span	Encompass the entire emissions bandwidth (EBW) of the signal
Trace	Max hold
Sweep time	Auto

4. While maintaining a constant temperature inside the environmental chamber, turn the EUT on and record the operating frequency at startup, and at 2 minutes, 5minutes, and 10 minutes after the EUT is energized.
5. Allow the trace to stabilize, find the peak value of the power envelope and record the frequency, then calculated the frequency drift.

TEST SETUP



**TEST ENVIRONMENT**

	Normal Test Conditions	Extreme Test Conditions
Relative Humidity	20% - 75%	/
Atmospheric Pressure	100kPa ~102kPa	/
Temperature	T _N (Normal Temperature): 23.14°C	T _L (Low Temperature): 0°C
		T _H (High Temperature): 40°C
Supply Voltage	V _N (Normal Voltage): AC120V,60Hz	VL (Low Voltage): AC 108V,60Hz
		VH (High Voltage): AC 132V,60Hz

RESULTS

Please refer to Appendix E.



11. ANTENNA REQUIREMENTS

APPLICABLE REQUIREMENTS

Please refer 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.

Please refer to FCC §15.247(b)(4)

The conducted output power limit specified in paragraph (b) of this section is based on the use of antennas with directional gains that do not exceed 6 dBi. Except as shown in paragraph (c) of this section, if transmitting antennas of directional gain greater than 6 dBi are used, the conducted output power from the intentional radiator shall be reduced below the stated values in paragraphs (b)(1), (b)(2), and (b)(3) of this section, as appropriate, by the amount in dB that the directional gain of the antenna exceeds 6 dBi.

RESULTS

Complies

**11.1. Appendix A1: Emission Bandwidth****11.1.1. Test Result**

Test Mode	Antenna	Channel	26db EBW [MHz]	FL[MHz]	FH[MHz]	Limit[MHz]	Verdict
11A20	Ant2	5180	20.560	5169.840	5190.400	---	PASS
		5200	20.440	5190.000	5210.440	---	PASS
		5240	20.840	5229.720	5250.560	---	PASS
		5745	20.480	5734.560	5755.040	---	PASS
		5785	19.800	5775.040	5794.840	---	PASS
		5825	20.400	5814.760	5835.160	---	PASS
11N20SISO	Ant2	5180	20.920	5169.520	5190.440	---	PASS
		5200	21.880	5189.120	5211.000	---	PASS
		5240	20.920	5229.560	5250.480	---	PASS
		5745	20.600	5734.800	5755.400	---	PASS
		5785	21.240	5774.320	5795.560	---	PASS
		5825	21.200	5814.120	5835.320	---	PASS
11N40SISO	Ant2	5190	40.880	5169.680	5210.560	---	PASS
		5230	40.720	5208.880	5249.600	---	PASS
		5755	41.520	5734.280	5775.800	---	PASS
		5795	41.360	5774.280	5815.640	---	PASS
11AC20SISO	Ant2	5180	20.560	5169.600	5190.160	---	PASS
		5200	20.800	5189.680	5210.480	---	PASS
		5240	20.720	5229.640	5250.360	---	PASS
		5745	21.040	5734.400	5755.440	---	PASS
		5785	20.840	5774.520	5795.360	---	PASS
		5825	20.680	5814.640	5835.320	---	PASS
11AC40SISO	Ant2	5190	41.120	5169.280	5210.400	---	PASS
		5230	42.320	5209.280	5251.600	---	PASS
		5755	40.800	5734.280	5775.080	---	PASS
		5795	40.640	5774.440	5815.080	---	PASS
11AC80SISO	Ant2	5210	83.680	5167.920	5251.600	---	PASS
		5775	81.760	5733.560	5815.320	---	PASS

Note: For UNII-3bands test EBW data only for reference.



11.1.2. Test Graphs







11A Ant2 5785



11A Ant2 5825

