FCC Test Report

Product Name	:	Dual-Band Wireless AC/N VDSL2 Combo WAN Gigabit Gateway
Brand Name	:	ZYXEL
Model No.	:	VMG3625-T50B
FCC ID	:	I88VMG3625-T50B
Applicant	:	ZyXEL Communications Corporation
Address	:	No.2 Industry East RD. IX, Science Park, Hsinchu, Taiwan
Date of Receipt	:	Sep. 09, 2019
Issued Date	:	Jul. 18, 2022
Report No.	:	2230646R-RFUSWL5V01-A
Report Version	:	V1.0

Testing Laboratory
3024

The test results relate only to the samples tested.
The test results shown in the test report are traceable to the national/international standard through the calibration of the equipment and evaluated measurement uncertainty herein.
This report must not be used to claim product endorsement by TAF or any agency of the government.
Measurement uncertainties evaluated for each testing system and associated connections are given here to provide the system information for reference. Compliance determinations do not take into account measurement uncertainties for each testing system, but are based on the results of the compliance measurement.
The test report shall not be reproduced except in full without the written approval of DEKRA Testing and Certification Co., Ltd.

Product Name	:	Dual-Band Wireless AC/N VDSL2 Combo WAN Gigabit Gateway
Applicant	:	ZyXEL Communications Corporation
Address	:	No.2 Industry East RD. IX, Science Park, Hsinchu, Taiwan
Manufacturer	:	ZyXEL Communications Corporation
Address	:	No.2 Industry East RD. IX, Science Park, Hsinchu, Taiwan
Brand Name	:	ZYXEL
Model No.	:	VMG3625-T50B
FCC ID	:	I88VMG3625-T50B
EUT Voltage	:	DC 12V (adapter)
Testing Voltage	:	AC 120V/60Hz
Applicable Standard	:	FCC CFR Title 47 Part 15 Subpart E Section 15.407 ANSI C63.10: 2013
Laboratory Name	:	DEKRA Testing and Certification Co., Ltd. Hsin Chu Laboratory
Address	:	No.372-2, Sec. 4, Zhongxing Rd., Zhudong Township, Hsinchu County 310, Taiwan, R.O.C.
Test Result	:	Complied

Documented By : Hailey Peng

(Hailey Peng / Senior Engineer)

Approved By : Rueyyan.Lin

(Rueyyan Lin / Supervisor)

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Revision History

Version	Description	Issued Date
V1.0	Initial issue of report	Jul. 18, 2022

TABLE OF CONTENTS

1. General Information

1.1. EUT Description

Product Name	Dual-Band Wireless AC/N VDSL2 Combo WAN Gigabit Gateway	
Brand Name	ZYXEL	
Model No.	VMG3625-T50B	
Frequency Range / Channel Number	IEEE 802.11a / IEEE 802.11n (20 MHz) / IEEE 802.11ac (20 MHz)	5180 ~ 5240 MHz / 4 Channels 5745 ~ 5825 MHz / 5 Channels
	IEEE 802.11n (40 MHz) / IEEE 802.11ac (40 MHz)	5190 ~ 5230 MHz / 2 Channels 5755 ~ 5795 MHz / 2 Channels
	IEEE 802.11ac (80 MHz)	5210 MHz / 1 Channel 5775 MHz / 1 Channel
Type of Modulation	IEEE 802.11a/n/ac	OFDM
Data Rate	IEEE 802.11a	6, 9, 12, 18, 24, 36, 48, 54 Mbps
	IEEE 802.11n	Support a subset of the combination of GI, MCS 0 ~ MCS 15 and bandwidth defined in 802.11n
	IEEE 802.11ac	Support a subset of the combination of GI, MCS 0 ~ MCS 9 and bandwidth defined in 802.11ac

The EUT can support beamforming function for 802.11n/ac mode at WiFi 5 GHz.

Accessories Information				
No.	Equipment Name	Brand Name	Model No.	Rating
1	Adapter	APD	WB-24J12FU	INPUT: AC 100~240V, 50~60Hz, 0.7A Max. OUTPUT: DC 12V, 2A
No.	Equipment Name	Brand Name	Model No.	Description
2	VDSL Micro Filter	MAGCOM	VFN773P	Non-Shielded, 0.1m
3	Ethernet Cable	-	-	Non-Shielded, 1.5m
4	DSL Cable	-	-	Non-Shielded, 1.5m

Antenna Information						
Ant.	Brand Name	Model No.	Type	Antenna Gain (dBi)	Maximum Antenna Gain (dBi)	Directional Gain (dBi)
0	ZYXEL	5G Antenna #1	Internal Printed	4.05	4.36	7.22
1	ZYXEL	5G Antenna #2	Internal Printed	4.36		

Directional Gain = 10log $[(10^{G1/20} + 10^{G2/20} + \ldots + 10^{GN/20})^2 / N_{Ant}]$

For IEEE 802.11a/n/ac mode: (2TX, 2RX)

Both Ant. 0 and Ant. 1 can be used as transmitting/receiving antennas, and them can transmit/receive signal simultaneously.

IEEE 802.11a & IEEE 802.11n/ac (20 MHz)

Working Frequency of Each Channel							
Channel	Frequency	Channel	Frequency	Channel	Frequency	Channel	Frequency
36	5180 MHz	40	5200 MHz	44	5220 MHz	48	5240 MHz
149	5745 MHz	153	5765 MHz	157	5785 MHz	161	5805 MHz
165	5825 MHz	-	-	-	-	-	-

IEEE 802.11n/ac (40 MHz)

Working Frequency of Each Channel							
Channel	Frequency	Channel	Frequency	Channel	Frequency	Channel	Frequency
38	5190 MHz	46	5230 MHz	151	5755 MHz	159	5795 MHz

IEEE 802.11ac (80 MHz)

Working Frequency of Each Channel							
Channel	Frequency	Channel	Frequency	Channel	Frequency	Channel	Frequency
42	5210 MHz	155	5775 MHz	-	-	-	-

Note:

1. Regards to the frequency band operation; the lowest、middle and highest frequency of channel were selected to perform the test, and then shown on this report.
2. The above EUT information is declared by the manufacturer.

1.2. Test Mode

DEKRA has verified the construction and function in typical operation. The preliminary tests were performed in different data rate, and to find the worst condition, which was shown in this test report. The following table is the final test mode.

Test Mode	Mode 1: Transmit

Test Items	Modulation	Channel	Antenna	Result
AC Power Line Conducted Emission	11a	149	0+1	Pass
Emission Bandwidth	11a	36/44/48/149/157/165	0+1	Pass
	11ac (20 MHz)	36/44/48/149/157/165	0+1	Pass
	11ac (40 MHz)	38/46/151/159	0+1	Pass
	11ac (80 MHz)	42/155	0+1	Pass
Maximum Conducted Output Power	11a	36/44/48/149/157/165	0+1	Pass
	11ac (20 MHz)	36/44/48/149/157/165	0+1	Pass
	11ac (40 MHz)	38/46/151/159	0+1	Pass
	11ac (80 MHz)	42/155	0+1	Pass
Maximum Power Spectral Density	11a	36/44/48/149/157/165	0+1	Pass
	11ac (20 MHz)	36/44/48/149/157/165	0+1	Pass
	11ac (40 MHz)	38/46/151/159	0+1	Pass
	11ac (80 MHz)	42/155	0+1	Pass
Radiated Emission Below 1 GHz	11a	149	0+1	Pass
Radiated Emission Above 1 GHz	11a	36/44/48/149/157/165	0+1	Pass
	11ac (20 MHz)	36/44/48/149/157/165	0+1	Pass
	11ac (40 MHz)	38/46/151/159	0+1	Pass
	11ac (80 MHz)	42/155	0+1	Pass
Radiated Emission Band Edge	11a	36/44/48/149/157/165	0+1	Pass
	11ac (20 MHz)	36/44/48/149/157/165	0+1	Pass
	11ac (40 MHz)	38/46/151/159	0+1	Pass
	11ac (80 MHz)	42/155	0+1	Pass

Note:

1. Determining compliance shall be based on the results of the compliance measurement, not taking into account measurement instrumentation uncertainty.
2. The worst case of data rate for 802.11a is 6 Mbps, for 802.11ac (20 MHz)/802.11ac (40 MHz)/802.11ac (80 MHz) are MCS 0, Nss1.
3. For radiated emission below 1 GHz and AC Power Line Conducted Emission have performed all modes of operation were investigated and the worst-case emissions are reported.
4. The modulation and bandwidth are similar for 802.11n mode for HT20/HT40 and 802.11ac mode for VHT20/VHT40, therefore investigated worst case to representative mode in test report.

5. There are two functions of EUT, one is non-beamforming function, and the other is beamforming function for 802.11n/ac for 802.11n/ac mode at WiFi 5 GHz.
   (1) For maximum conducted output power, maximum power spectral density and radiated emission band edge: Both non-beamforming function and beamforming function were to test and record in this test report.
   (2) For other test: After evaluating, non-beamforming function has been evaluated to be the worst case, so it was selected to test and record in this test report.
6. The EUT could be applied with WiFi 2.4 GHz function and WiFi 5 GHz function; therefore Co-location Maximum Permissible Exposure (Please refer to DEKRA Report No.: 2230646R-RFUSMPEV02-A) and Radiated Emission Co-location (Please refer to Appendix A) tests are added for simultaneously transmit between WiFi 2.4 GHz function and WiFi 5 GHz function.
7. Reference to DEKRA Project No.: 1990099R (After evaluating, related test items have been verified, and the original test data is replaced.).

1.3. Comments and Remarks

The product specification and testing instructions for the EUT declared in the report are provided by the manufacturer who will take all responsibilities for the accuracy.

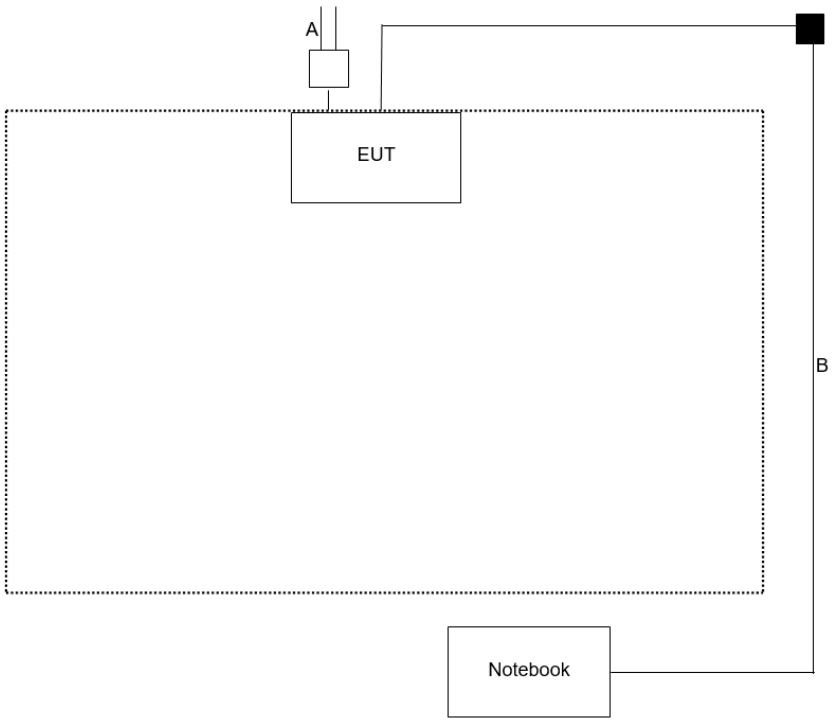
1.4. Tested System Details

The types for all equipment, plus descriptions of all cables used in the tested system.

Product		Manufacturer	Model No.	Serial No.	FCC ID
1	Notebook	Lenovo	Lenovo Ideapad 110 15IBR	PF0MEEB0	SDoC

1.5. Configuration of tested System

Connection Diagram



Signal Cable Type		Signal cable Description
A	DSL Cable	Non-Shielded, 1.5m
B	Ethernet Cable	Non-Shielded, 10m

1.6. EUT Operation of during Test

1	Execute control command by software “QATool ver 0.0.1.85”.
2	Configure the test mode, the test channel, and the data rate.
3	Press “Start TX” to start the continuous transmitting.
4	Verify that the EUT works properly.

1.7. Test Facility

Ambient conditions in the laboratory:

Items	Test Item	Actually	Tested by	Test Date	Test Site
Temperature (°C)	AC Power Line Conducted Emission	24.5	Ling Chen	2022/07/08	HC-SR02
Humidity (%RH)		64			
Temperature (°C)	99% & 26dB & DTS Bandwidth	24.7 ~ 24.8	Clemens Fang	2019/10/02 ~ 2019/10/03	HC-SR12
Humidity (%RH)		56			
Temperature (°C)	Maximum Conducted Output Power	23	Clemens Fang	2019/11/21 ~ 2019/11/22	HC-SR12
Humidity (%RH)		60			
Temperature (°C)	Maximum Power Spectral Density	24	Clemens Fang	2019/11/21	HC-SR12
Humidity (%RH)		59			
Temperature (°C)	Radiated Emission Below 1GHz	24	Ling Chen	2022/07/07	HC-CB04
Humidity (%RH)		60			
Temperature (°C)	Radiated Emission Above 1GHz	24.5 ~ 25	Ling Chen Elwin Lin	2019/09/28 ~ 2019/10/10	HC-CB04
Humidity (%RH)		55 ~ 56			
Temperature (°C)	Radiated Emission Band Edge	23.5 ~ 25.6	Elwin Lin Lion Wnag	2019/09/25 ~ 2019/11/21	HC-CB04
Humidity (%RH)		53 ~ 59			
Temperature (°C)	Radiated Emission Co-location	24	Ling Chen	2022/07/07	HC-CB04
Humidity (%RH)		60			

Note: Test site information refers to Laboratory Information.

USA : FCC Registration Number: TW3024

Canada CAB identifier : TW3024

The address and introduction of DEKRA Testing and Certification Co., Ltd. laboratories can be founded in our Web site: http://www.dekra.com.tw

If you have any comments, please don't hesitate to contact us. Our test sites as below:

Test Laboratory	DEKRA Testing and Certification Co., Ltd.
Address	1. No.372-2, Sec. 4, Zhongxing Rd., Zhudong Township, Hsinchu County 31061, Taiwan, R.O.C. 2. No.372, Sec. 4, Zhongxing Rd., Zhudong Township, Hsinchu County 31061, Taiwan, R.O.C.
Phone number	1. +886-3-582-8001 2. +886-3-582-8001
Fax number	1. +886-3-582-8958 2. +886-3-582-8958
E mail address	info.tw@dekra.com
Website	http://www.dekra.com.tw
Note: Test site number for address 1 includes HC-SR02. Test site number for address 2 includes HC-CB02, HC-CB03, HC-CB04, HC-SR10 and HC-SR12.	

1.8. List of Test Equipment

HC-SR02

Instrument	Manufacturer	Model No.	Serial No.	Cal. Date	Next Cal. Date
Artificial Mains Network	R&S	ENV4200	848411/010	2021/12/27	2022/12/26
EMI Test Receiver	R&S	ESR3	102608	2022/05/30	2023/05/29
LISN	R&S	ENV216	100092	2022/04/29	2023/04/28
Coaxial Cable(9 m)	Harbour	RG-400	HC-SR02	2021/08/15	2022/08/14
DEKRA Testing System	DEKRA	Version 2.0	HC-SR02	N/A	N/A

HC-SR12

Instrument	Manufacturer	Model No.	Serial No.	Cal. Date	Next Cal. Date
High Speed Peak Power Meter Dual Input	Anritsu	ML2496A	1602004	2018/12/17	2019/12/16
Pulse Power Sensor	Anritsu	MA2411B	1531043	2018/12/17	2019/12/16
Pulse Power Sensor	Anritsu	MA2411B	1531044	2018/12/17	2019/12/16
Power Meter	Keysight	8990B	MY51000248	2019/05/21	2020/05/20
Power Sensor	Keysight	N1923A	MY57240005	2019/05/21	2020/05/20
Spectrum Analyzer	Agilent	N9010A	US47140172	2019/06/28	2020/06/27
Signal & Spectrum Analyzer	R&S	FSV40	101049	2019/09/11	2020/09/10
Spectrum Analyzer	Keysight	N9030B	MY57140404	2019/06/18	2020/06/17
Spectrum Analyzer	Keysight	N9010B	MY57110159	2019/05/03	2020/05/02

HC-CB04

Instrument	Manufacturer	Model No.	Serial No.	Cal. Date	Next Cal. Date
Signal Analyzer	R&S	FSVA40	101455	2019/10/21	2020/10/20
Signal Analyzer	R&S	FSVA40	101455	2021/10/22	2022/10/21
Signal & Spectrum Analyzer	R&S	FSV40	101049	2019/09/11	2020/09/10
Signal & Spectrum Analyzer	R&S	FSV40	101049	2022/04/25	2023/04/24
EXA Signal Analyzer	Keysight	N9010A	MY51440132	2019/03/15	2020/03/14
EXA Signal Analyzer	Keysight	N9010A	MY51440132	2022/01/07	2023/01/06
Trilog Broadband Antenna	Schwarzbeck	VULB 9168	1209	2022/06/14	2023/06/13
Horn Antenna	Schwarzbeck	BBHA 9120D	639	2019/05/28	2020/05/27
Horn Antenna	Schwarzbeck	BBHA 9170	202	2019/01/16	2020/01/15
Pre-Amplifier	EMCI	EMC01820I	980364	2021/08/27	2022/08/26
Pre-Amplifier	DEKRA	AP-025C	201801236	2019/09/24	2020/09/23
Pre-Amplifier	EMCI	EMC11830I	980366	2018/12/21	2019/12/20
Pre-Amplifier	DEKRA	AP-400C	201801231	2018/12/05	2019/12/04
Horn Antenna	Schwarzbeck	BBHA 9120D	01656	2019/10/25	2020/10/24
Signal Analyzer	R&S	FSV40	101435	2019/07/08	2020/070/7
Signal and Spectrum Analyzer	R&S	FSVA40	101435	2022/05/30	2023/05/29
EMI Test Receiver	R&S	ESR7	102260	2021/12/22	2022/12/21
Magnetic Loop Antenna	Teseq	HLA 6121	44287	2021/09/06	2022/09/05
Coaxial Cable(10m)	Suhner	SF102_SF104	HC-CB04	2021/08/09	2022/08/08
Coaxial Cable(19m)	Suhner	SF102_SF104_SF106	HC-CB04_2	2019/07/25	2020/07/24
DEKRA Testing System	DEKRA	Version 2.0	HC-CB04	N/A	N/A
Radiated Software	AUDIX	e3 V9	HC-CB04_1	N/A	N/A
Signal Analyzer	R&S	FSVA40	101455	2019/10/21	2020/10/20

Note: All equipment upon which need to calibrated are with calibration period of 1 year.

1.9. Measurement Uncertainty

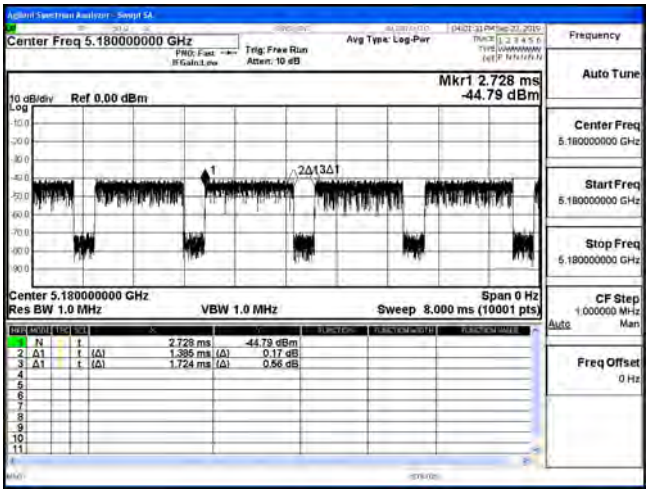
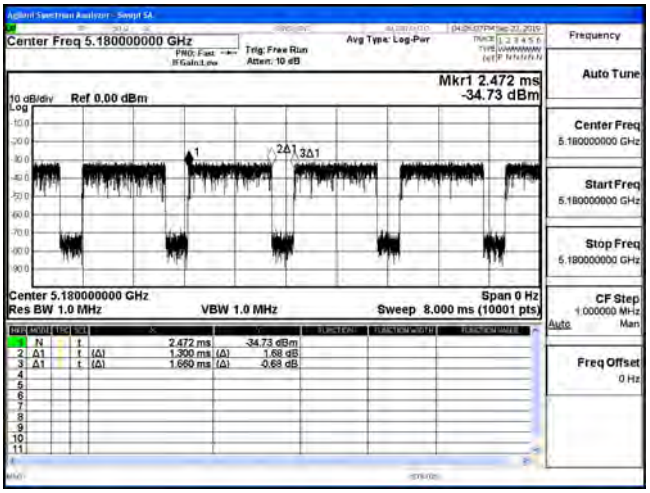
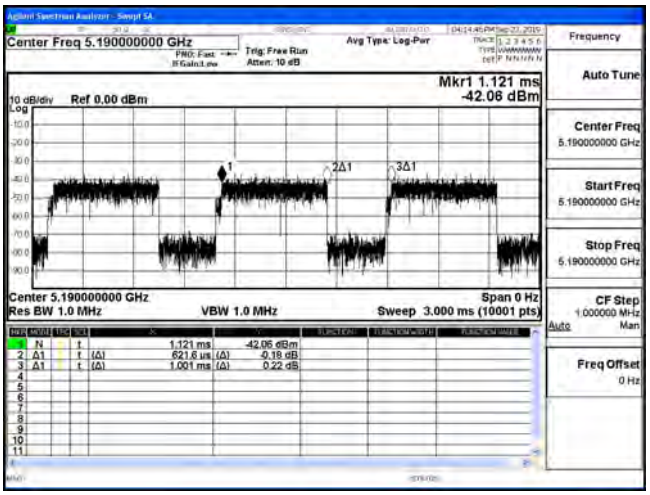
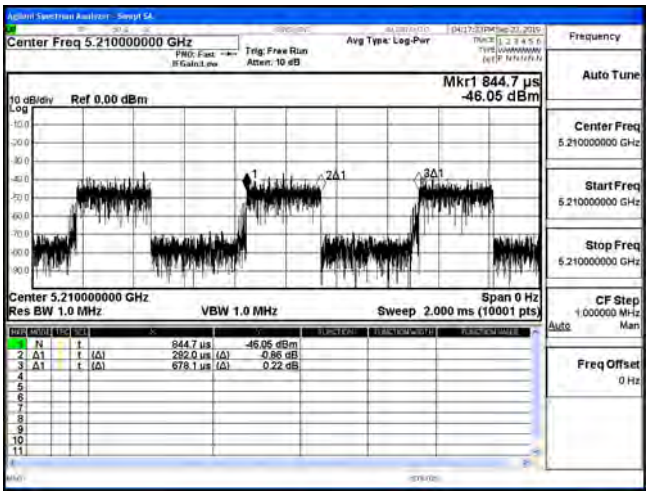
Uncertainties have been calculated according to the DEKRA internal document with the emissions test results be included in the report. The measurement uncertainties given below are based on a 95% confidence level (based on a coverage factor (k=2).

Test Item	Uncertainty
AC Power Line Conducted Emission	± 2.10 dB
99% & 26dB & DTS Bandwidth	± 637 Hz
Maximum Conducted Output Power	± 1.16 dB
Maximum Power Spectral Density	± 2.11 dB
Radiated Emission	± 3.25 dB below 1 GHz ± 3.46 dB above 1 GHz
Radiated Emission Band Edge	± 3.46 dB above 1 GHz

1.10. Duty Cycle

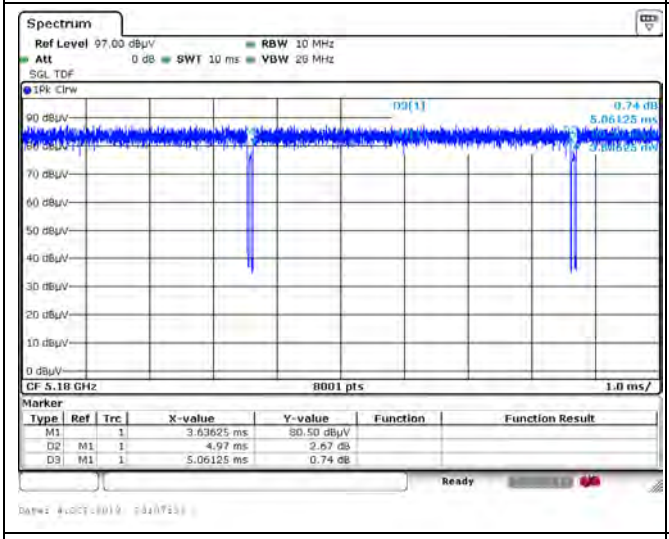
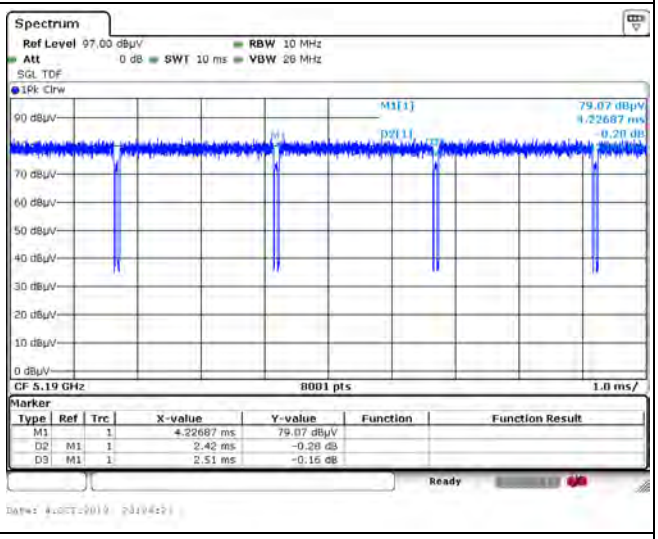
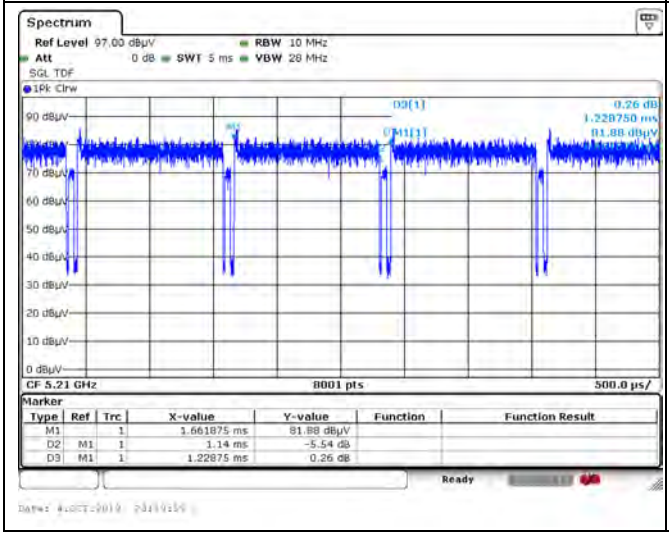
<Non-beamforming function>

Modulation	On Time (ms)	On+Off Time (ms)	Duty Cycle (%)	Duty Factor (dB)	1/T Minimum VBW (kHz)
802.11a	1.385	1.724	80.34	1.902	0.722
802.11ac (20 MHz)	1.300	1.660	78.31	2.123	0.769
802.11ac (40 MHz)	0.622	1.001	62.14	4.133	0.010
802.11ac (80 MHz)	0.292	0.678	43.07	7.316	0.003

802.11a	802.11ac (20 MHz)
	
802.11ac (40 MHz)	**802.11ac (80 MHz)**
	

<Beamforming function>

Modulation	On Time (ms)	On+Off Time (ms)	Duty Cycle (%)	Duty Factor (dB)	1/T Minimum VBW (kHz)
802.11ac (20 MHz)	4.970	5.061	98.20	0.158	0.010
802.11ac (40 MHz)	2.420	2.510	96.41	0.317	0.413
802.11ac (80 MHz)	1.140	1.229	92.83	0.646	0.877

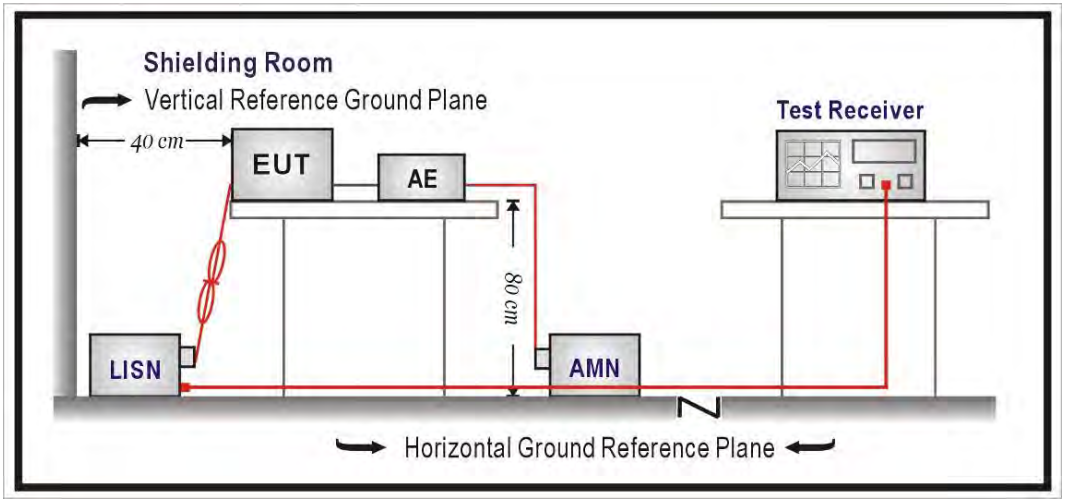
802.11ac (20 MHz)	802.11ac (40 MHz)
	
802.11ac (80 MHz)	**-**
	-

2. Antenna Requirements

According to FCC 47CFR 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.

3. AC Power Line Conducted Emission

3.1. Test Setup



3.2. Test Limit

Frequency (MHz)	QP (dBuV)	AV (dBuV)
0.15 - 0.50	66 - 56	56 - 46
0.50 - 5.0	56	46
5.0 - 30	60	50

Remark: In the above table, the tighter limit applies at the band edges.

3.3. Test Procedure

The EUT was setup according to ANSI C63.10: 2013. The EUT was placed on a platform of nominal size, 1 m by 1.5 m, raised 80 cm above the conducting ground plane. The vertical conducting plane was located 40 cm to the rear of the EUT. All other surfaces of EUT were at least 80 cm from any other grounded conducting surface. The EUT and simulators are connected to the main power through a line impedance stabilization network (LISN). The LISN provides a 50 ohm /50uH coupling impedance for the measuring equipment. The peripheral devices are also connected to the main power through a LISN. (Please refer to the block diagram of the test setup and photographs.)

Each current-carrying conductor of the EUT power cord, except the ground (safety) conductor, was individually connected through a LISN to the input power source.

The excess length of the power cord between the EUT and the LISN receptacle were folded back and forth at the center of the lead to form a bundle not exceeding 40 cm in length.

Conducted emissions were investigated over the frequency range from 0.15 MHz to 30 MHz using a receiver bandwidth of 9 kHz.

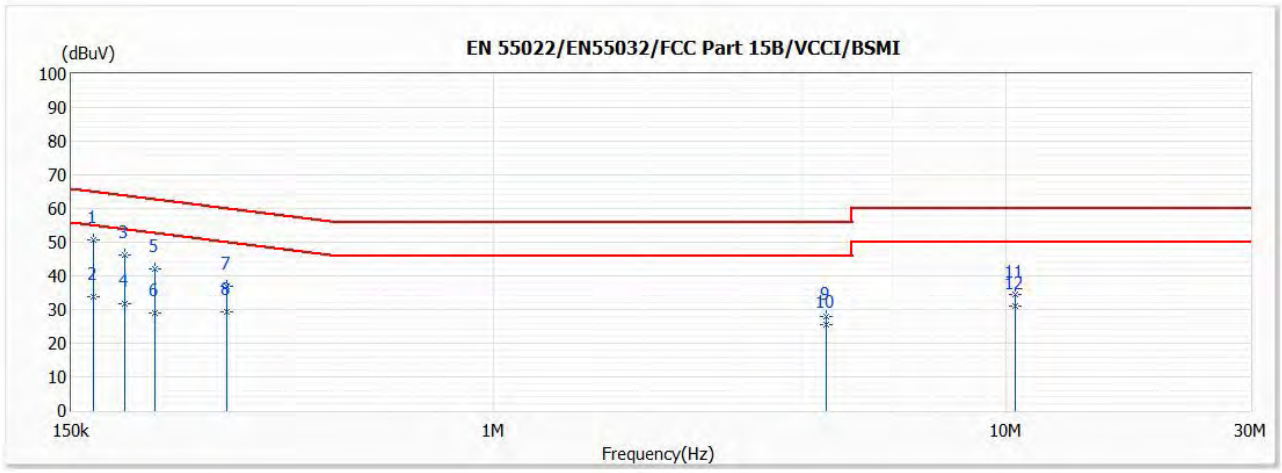
3.4. Test Specification

According to FCC CFR Title 47 Part 15 Subpart E.

3.5. Test Result of AC Power Line Conducted Emission

<Non-beamforming function>

Test Mode	Mode 1	Phase	Line
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5745 MHz		

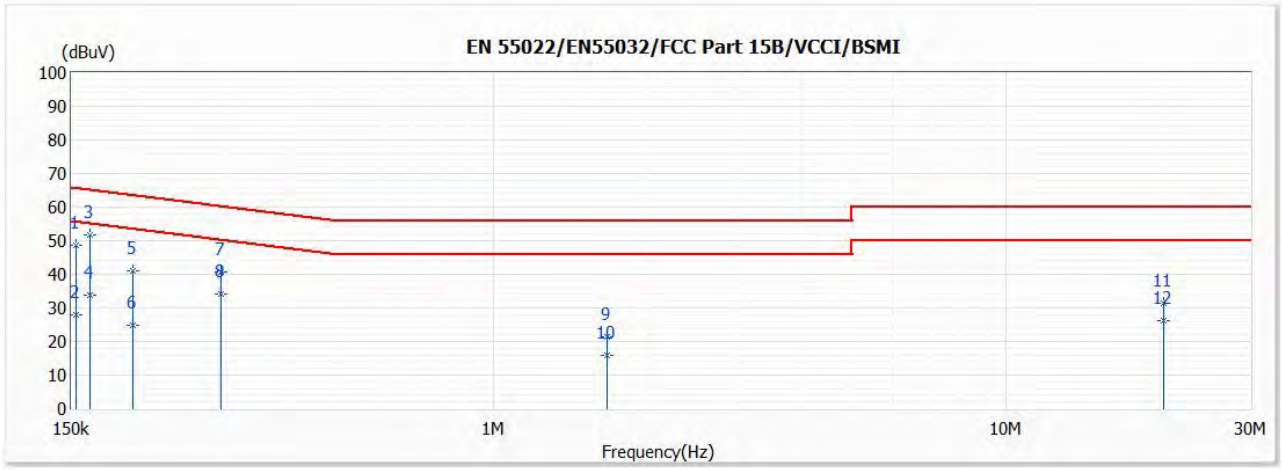


No	Frequency (MHz)	Emission Level (dBuV)	Limit (dBuV)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
*1	0.166	50.54	65.17	-14.63	40.92	9.62	QP
2	0.166	33.90	55.17	-21.27	24.28	9.62	AV
3	0.190	46.18	64.02	-17.84	36.56	9.62	QP
4	0.190	31.63	54.02	-22.39	22.01	9.62	AV
5	0.219	42.07	62.87	-20.80	32.44	9.63	QP
6	0.219	28.82	52.87	-24.05	19.19	9.63	AV
7	0.301	36.99	60.20	-23.21	27.36	9.63	QP
8	0.301	29.41	50.20	-20.79	19.78	9.63	AV
9	4.465	27.76	56.00	-28.24	17.89	9.87	QP
10	4.465	25.67	46.00	-20.33	15.80	9.87	AV
11	10.420	34.64	60.00	-25.36	24.55	10.09	QP
12	10.420	31.07	50.00	-18.93	20.98	10.09	AV

Note:

1. All Reading Levels are Quasi-Peak and average value.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.

Test Mode	Mode 1	Phase	Neutral
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5745 MHz		



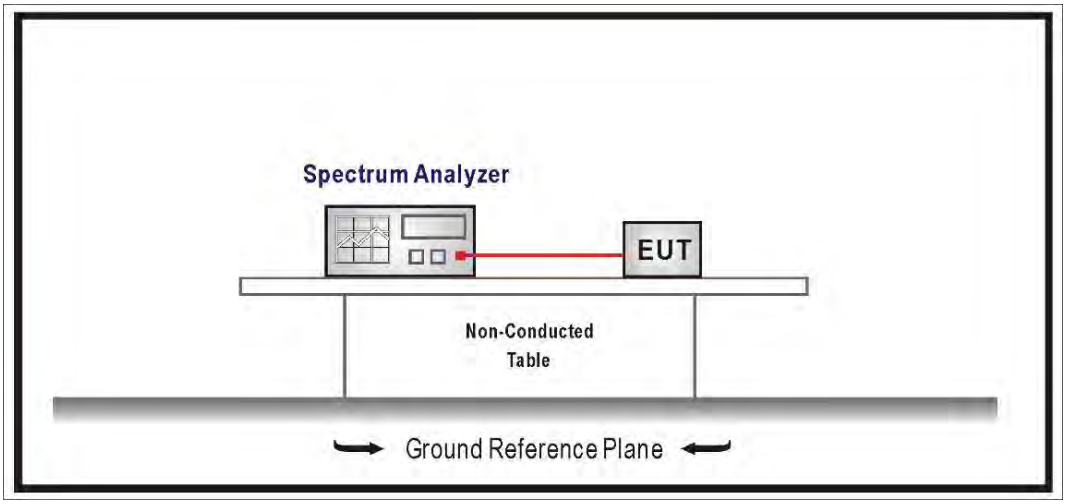
No	Frequency (MHz)	Emission Level (dBuV)	Limit (dBuV)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	0.153	48.62	65.82	-17.20	39.00	9.62	QP
2	0.153	27.96	55.82	-27.86	18.34	9.62	AV
*3	0.163	51.71	65.32	-13.61	42.09	9.62	QP
4	0.163	33.67	55.32	-21.65	24.05	9.62	AV
5	0.198	41.07	63.69	-22.62	31.46	9.61	QP
6	0.198	24.84	53.69	-28.85	15.23	9.61	AV
7	0.294	40.72	60.40	-19.68	31.10	9.62	QP
8	0.294	34.05	50.40	-16.35	24.43	9.62	AV
9	1.668	21.55	56.00	-34.45	11.81	9.74	QP
10	1.668	15.70	46.00	-30.30	5.96	9.74	AV
11	20.333	31.44	60.00	-28.56	20.93	10.51	QP
12	20.333	26.21	50.00	-23.79	15.70	10.51	AV

Note:

1. All Reading Levels are Quasi-Peak and average value.
2. " * ", means this data is the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.

4. Emission Bandwidth

4.1. Test Setup



4.2. Test Limit

99% & 26dB Bandwidth : No Required

6dB Bandwidth ≧ 500kHz

4.3. Test Procedure

99% & 26dB Bandwidth :

The EUT was tested according to U-NII test procedure of KDB 789033.D02 V02r01

Set RBW 1% of the emission bandwidth, VBW equal to 3 times the RBW.

DTS Bandwidth :

Set RBW = 100kHz, VBW≧3xRBW, Sweep time=Auto, Set Peak detector.

4.4. Test Specification

According to FCC CFR Title 47 Part 15 Subpart E.

4.5. Test Result of Emission Bandwidth

<Non-beamforming function>

Modulation	Channel	Frequency (MHz)	99% Bandwidth (MHz)		26dB Bandwidth (MHz)		Limit (MHz)	
			Ant. 0	Ant. 1	Ant. 0	Ant. 1	99% & 26dB Bandwidth	
802.11a	36	5180	16.831	16.640	20.100	19.810	-	
	44	5220	16.848	16.637	20.180	19.960	-	
	48	5240	16.872	16.623	20.470	19.970	-	
Modulation	Channel	Frequency (MHz)	99% Bandwidth (MHz)		DTS Bandwidth (MHz)		Limit (MHz)	
			Ant. 0	Ant. 1	Ant. 0	Ant. 1	99% Bandwidth	DTS Bandwidth
802.11a	149	5745	16.863	16.657	15.120	14.940	-	≧0.50
	157	5785	17.050	16.642	15.120	15.180	-	≧0.50
	165	5825	16.869	16.679	15.110	15.020	-	≧0.50

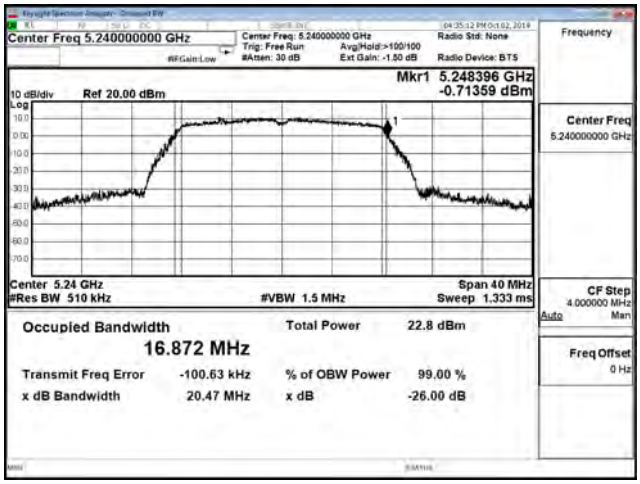
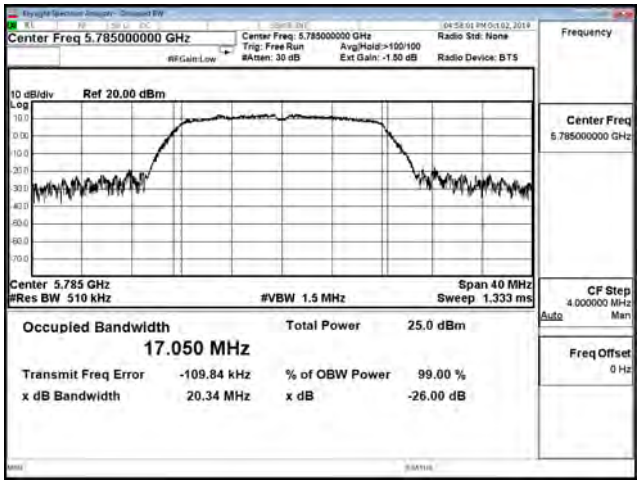
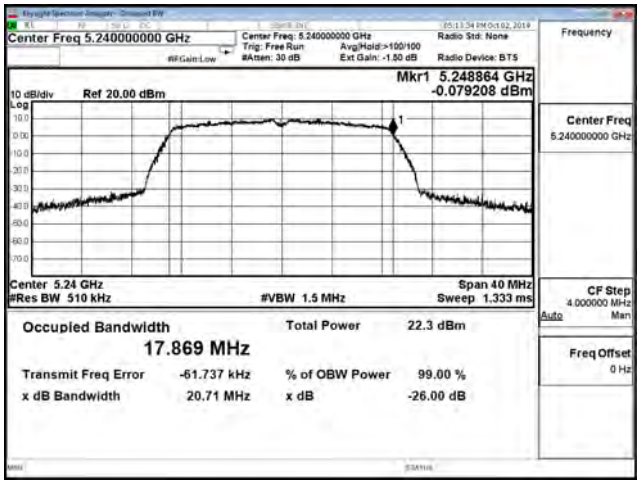
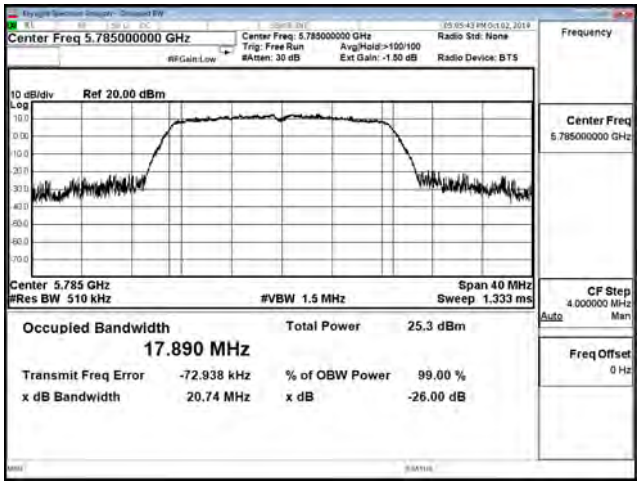
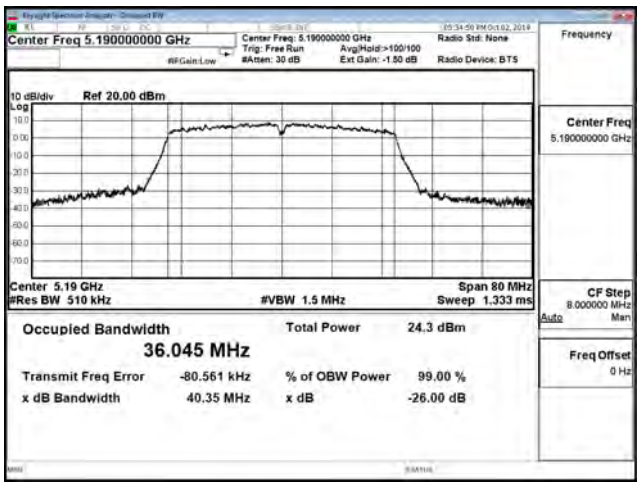
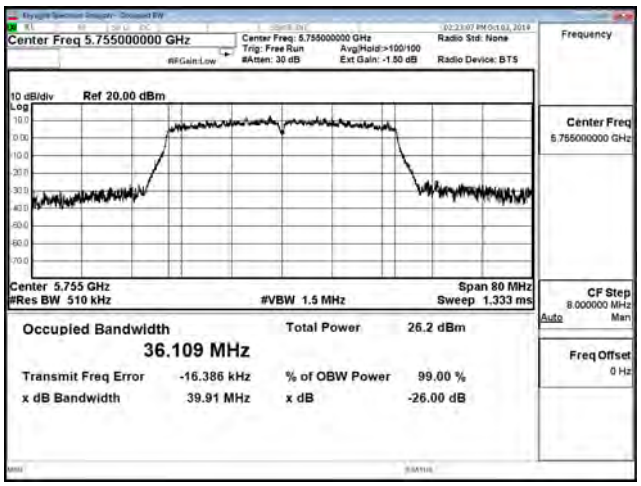
Modulation	Channel	Frequency (MHz)	99% Bandwidth (MHz)		26dB Bandwidth (MHz)		Limit (MHz)	
			Ant. 0	Ant. 1	Ant. 0	Ant. 1	99% & 26dB Bandwidth	
802.11ac (20 MHz)	36	5180	17.765	17.613	20.570	20.160	-	
	44	5220	17.853	17.615	20.710	20.210	-	
	48	5240	17.869	17.636	20.710	20.270	-	
Modulation	Channel	Frequency (MHz)	99% Bandwidth (MHz)		DTS Bandwidth (MHz)		Limit (MHz)	
			Ant. 0	Ant. 1	Ant. 0	Ant. 1	99% Bandwidth	DTS Bandwidth
802.11ac (20 MHz)	149	5745	17.884	17.609	15.070	16.520	-	≧0.50
	157	5785	17.890	17.624	15.130	16.530	-	≧0.50
	165	5825	17.823	17.658	15.130	16.280	-	≧0.50

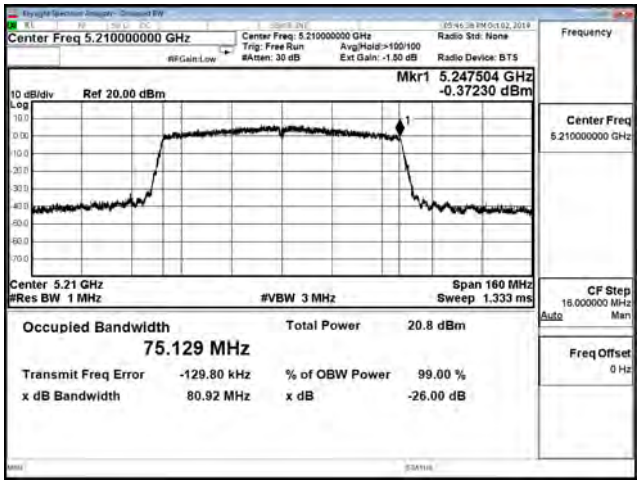
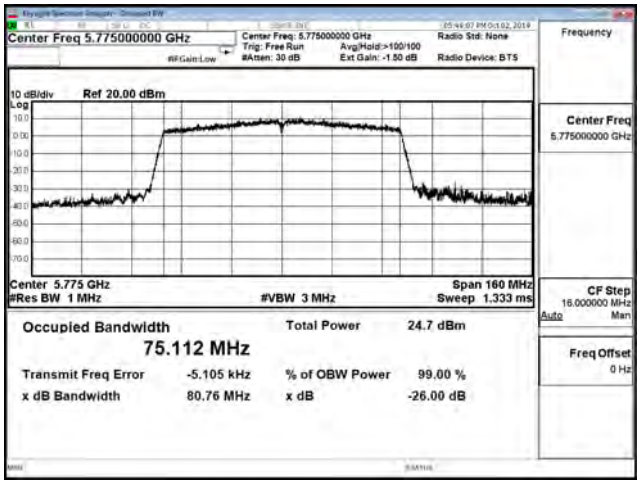
Modulation	Channel	Frequency (MHz)	99% Bandwidth (MHz)		26dB Bandwidth (MHz)		Limit (MHz)	
			Ant. 0	Ant. 1	Ant. 0	Ant. 1	99% & 26dB Bandwidth	
802.11ac (40 MHz)	38	5190	36.045	36.074	40.350	39.650	-	
	46	5230	36.011	35.993	40.430	39.800	-	
Modulation	Channel	Frequency (MHz)	99% Bandwidth (MHz)		DTS Bandwidth (MHz)		Limit (MHz)	
			Ant. 0	Ant. 1	Ant. 0	Ant. 1	99% Bandwidth	DTS Bandwidth
802.11ac (40 MHz)	151	5755	36.029	36.109	35.110	35.090	-	≧0.50
	159	5795	36.062	36.089	35.100	35.090	-	≧0.50

Modulation	Channel	Frequency (MHz)	99% Bandwidth (MHz)		26dB Bandwidth (MHz)		Limit (MHz)
			Ant. 0	Ant. 1	Ant. 0	Ant. 1	99% & 26dB Bandwidth
802.11ac (80 MHz)	42	5210	75.129	74.893	80.920	79.290	-

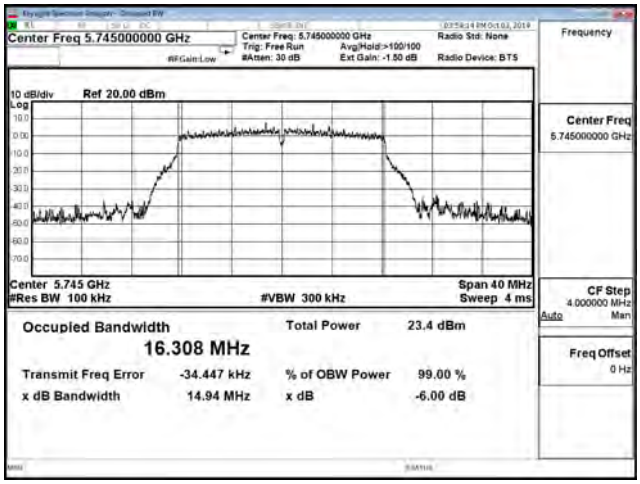
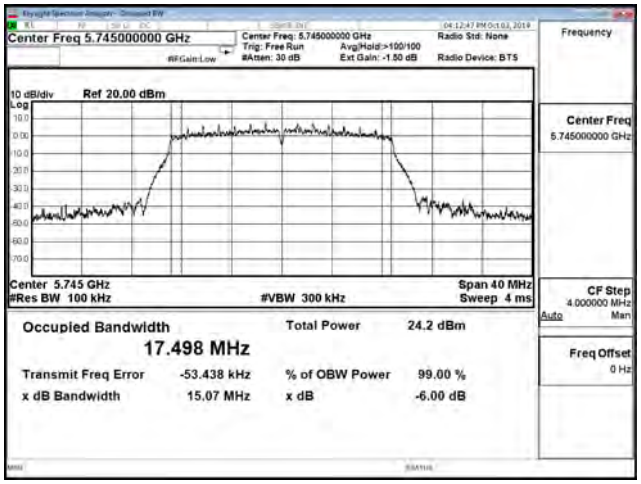
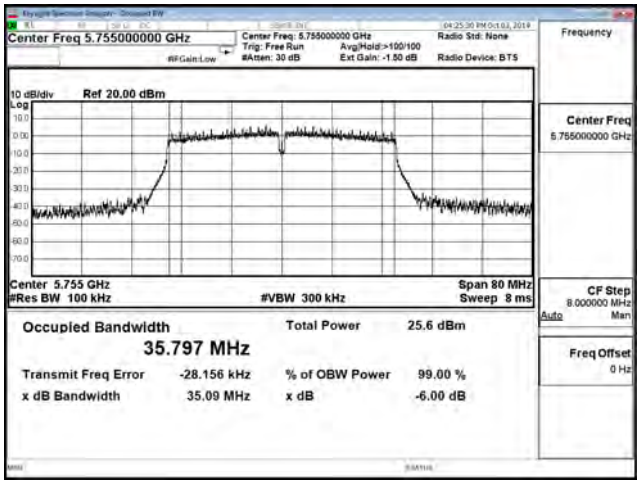
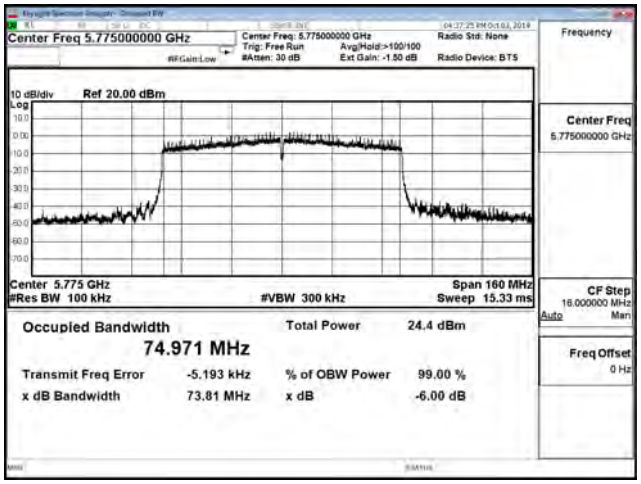
Modulation	Channel	Frequency (MHz)	99% Bandwidth (MHz)		DTS Bandwidth (MHz)		Limit (MHz)	
			Ant. 0	Ant. 1	Ant. 0	Ant. 1	99% Bandwidth	DTS Bandwidth
802.11ac (80 MHz)	155	5755	75.112	74.883	73.840	73.810	-	≧0.50

For 99% Bandwidth & 26dB Bandwidth:

Spectrum plot of worst value	
802.11a / Ant. 0 / 5240 MHz (U-NII-1)	802.11a / Ant. 0 / 5785 MHz (U-NII-3)
	
802.11ac (20 MHz) / Ant. 0 / 5240 MHz (U-NII-1)	802.11ac (20 MHz) / Ant. 0 / 5785 MHz (U-NII-3)
	
802.11ac (40 MHz) / Ant. 0 / 5190 MHz (U-NII-1)	802.11ac (40 MHz) / Ant. 1 / 5755 MHz (U-NII-3)
	

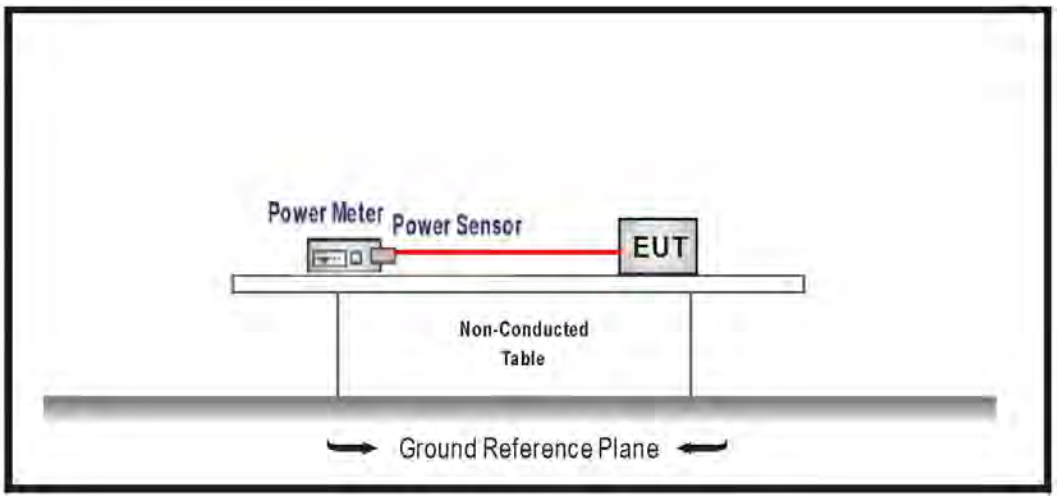
Spectrum plot of worst value	
802.11ac (80 MHz) / Ant. 0 / 5210 MHz (U-NII-1)	802.11ac (80 MHz) / Ant. 0 / 5775 MHz (U-NII-3)
	

For DTS Bandwidth:

Spectrum plot of worst value	
802.11a / Ant. 1 / 5745 MHz	802.11ac (20 MHz) / Ant. 0 / 5745 MHz
	
802.11ac (40 MHz) / Ant. 1 / 5755 MHz	802.11ac (80 MHz) / Ant. 1 / 5775 MHz
	

5. Maximum Conducted Output Power

5.1. Test Setup



5.2. Test Limit

1. For an outdoor access point and an indoor access point operating in the band 5.15-5.25 GHz, the maximum conducted output power over the frequency band of operation shall not exceed 1 W provided the maximum antenna gain does not exceed 6 dBi. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi. For client devices in the 5.15-5.25 GHz band, the maximum conducted output power over the frequency band of operation shall not exceed 250 mW provided the maximum antenna gain does not exceed 6 dBi. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.
2. For the 5.25-5.35 GHz and 5.47-5.725 GHz bands, the maximum conducted output power over the frequency bands of operation shall not exceed the lesser of 250 mW or 11 dBm + 10 log B, where B is the 26 dB emission bandwidth in megahertz. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.
3. For the band 5.725-5.850 GHz, the maximum conducted output power over the frequency band of operation shall not exceed 1 W. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.

5.3. Test Procedure

The EUT was setup to ANSI C63.10: 2013; tested to U-NII test procedure of 789033 D02 V02r01 for compliance to FCC CFR Title 47 Part 15 Subpart E.

5.4. Test Specification

According to FCC CFR Title 47 Part 15 Subpart E.

5.5. Test Result of Maximum Conducted Output Power

<Non-beamforming function>

Modulation	Channel	Frequency (MHz)	Maximum Conducted Output Power (dBm)			Limit (dBm)	Result
			Ant. 0	Ant. 1	Total		
802.11a	36	5180	17.870	18.920	21.437	≦30.00	Pass
	44	5220	17.980	18.760	21.398	≦30.00	Pass
	48	5240	17.810	18.250	21.046	≦30.00	Pass
	149	5745	19.690	19.780	22.746	≦30.00	Pass
	157	5785	19.830	20.120	22.988	≦30.00	Pass
	165	5825	18.550	19.360	21.984	≦30.00	Pass
802.11ac (20 MHz)	36	5180	17.350	18.210	20.812	≦30.00	Pass
	44	5220	17.660	17.870	20.777	≦30.00	Pass
	48	5240	17.410	17.650	20.542	≦30.00	Pass
	149	5745	19.960	20.620	23.313	≦30.00	Pass
	157	5785	19.950	20.790	23.401	≦30.00	Pass
	165	5825	19.830	18.980	22.436	≦30.00	Pass
802.11ac (40 MHz)	38	5190	18.680	19.120	21.916	≦30.00	Pass
	46	5230	19.420	19.110	22.278	≦30.00	Pass
	151	5755	20.710	20.820	23.776	≦30.00	Pass
	159	5795	20.280	20.630	23.469	≦30.00	Pass
802.11ac (80 MHz)	42	5210	15.080	15.820	18.476	≦30.00	Pass
	155	5775	19.380	19.760	22.584	≦30.00	Pass

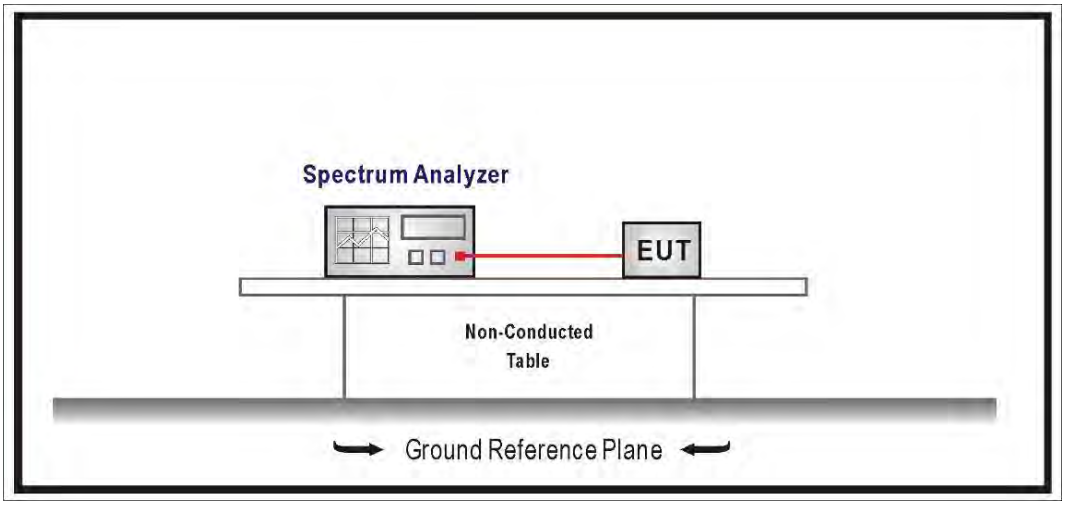
<Beamforming function>

Modulation	Channel	Frequency (MHz)	Maximum Conducted Output Power (dBm)			Limit (dBm)	Result
			Ant. 0	Ant. 1	Total		
802.11ac (20 MHz)	36	5180	15.620	16.400	19.038	≦28.78	Pass
	44	5220	15.000	16.770	18.985	≦28.78	Pass
	48	5240	15.330	15.980	18.677	≦28.78	Pass
	149	5745	18.660	18.460	21.571	≦28.78	Pass
	157	5785	18.280	18.930	21.627	≦28.78	Pass
	165	5825	17.480	17.730	20.617	≦28.78	Pass
802.11ac (40 MHz)	38	5190	16.820	17.390	20.125	≦28.78	Pass
	46	5230	17.180	17.860	20.544	≦28.78	Pass
	151	5755	18.780	19.300	22.058	≦28.78	Pass
	159	5795	18.490	18.820	21.668	≦28.78	Pass
802.11ac (80 MHz)	42	5210	13.330	14.020	16.699	≦28.78	Pass
	155	5775	17.510	17.880	20.709	≦28.78	Pass

Note: Directional Gain = 10log [$(10^{G1/20} + 10^{G2/20} + \ldots + 10^{GN/20})^2 / N_{Ant}$] = 7.22dBi >6dBi, so the limit = 30 – (7.22 – 6) = 28.78dBm.

6. Maximum Power Spectral Density

6.1. Test Setup



6.2. Test Limit

1. For the band 5.15 ~ 5.25 GHz, the peak power spectral density shall not exceed 17 dBm in any 1 MHz band. If transmitting antenna of directional gain greater than 6 dBi are used, the peak power spectral density shall be reduced by the amount in dB that directional gain of the antenna exceeds 6 dBi.
2. For client devices in the 5.15 ~ 5.25 GHz band, the maximum power spectral density shall not exceed 11 dBm in any 1 megahertz band. If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the maximum power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi
3. For the 5.25 ~ 5.35 GHz ,5470 ~ 5600 MHz and 5650 ~ 5725 MHz, the peak power spectral density shall not exceed 11 dBm in any 1-MHz band. If transmitting antenna of directional gain greater than 6 dBi are used, the peak power spectral density shall be reduced by the amount in dB that directional gain of the antenna exceeds 6 dBi.
4. For the band 5.725 ~ 5.850 GHz, the peak power spectral density shall not exceed 30 dBm in any 500 kHz band. If transmitting antenna of directional gain greater than 6 dBi are used, the peak power spectral density shall be reduced by the amount in dB that directional gain of the antenna exceeds 6 dBi.

6.3. Test Procedure

The EUT was setup to ANSI C63.10: 2013; tested to U-NII test procedure of KDB 789033.D02 V02r01 for compliance to FCC CFR Title 47 Part 15 Subpart E requirements.

The following table is the setting of spectrum analyzer.

Spectrum Parameter	Setting
RBW	1 MHz for 5 GHz Band 1, 500 kHz for 5 GHz Band 4
VBW	3 MHz for 5GHz Band1, 2 MHz for 5 GHz Band 4

6.4. Test Specification

According to FCC CFR Title 47 Part 15 Subpart E.

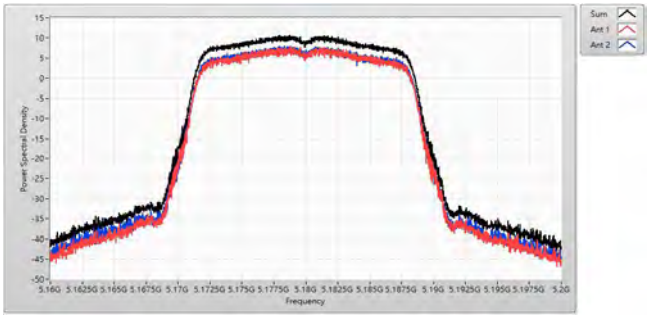
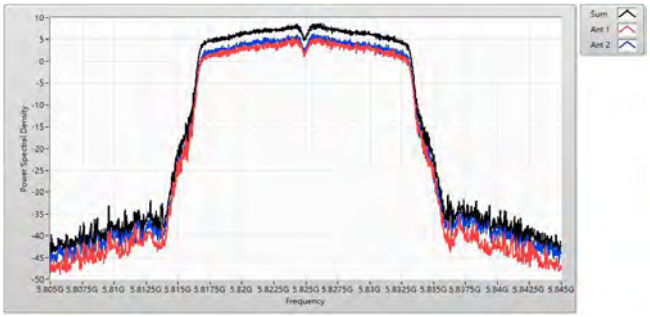
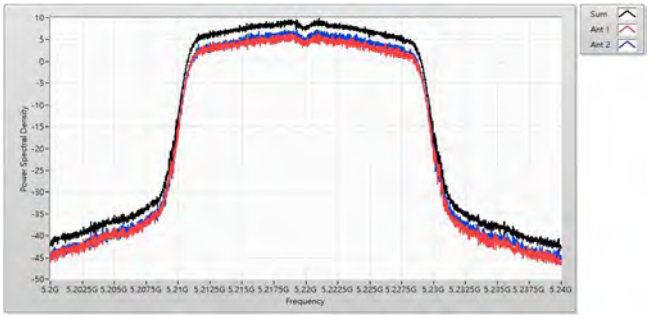
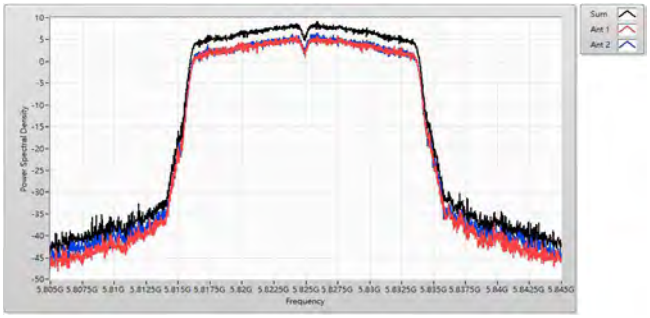
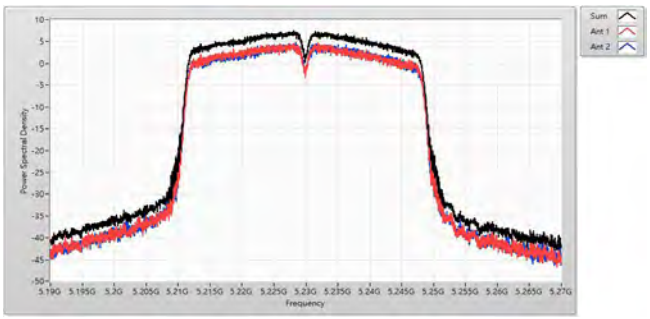
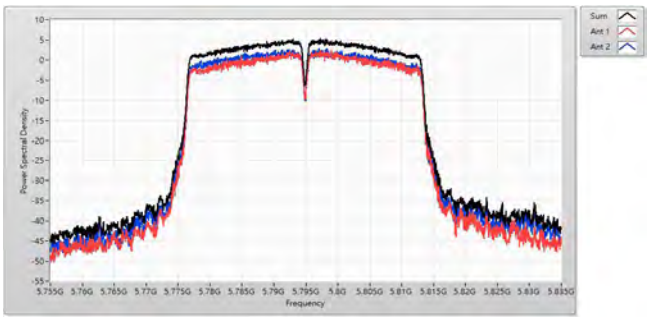
6.5. Test Result of Maximum Power Spectral Density

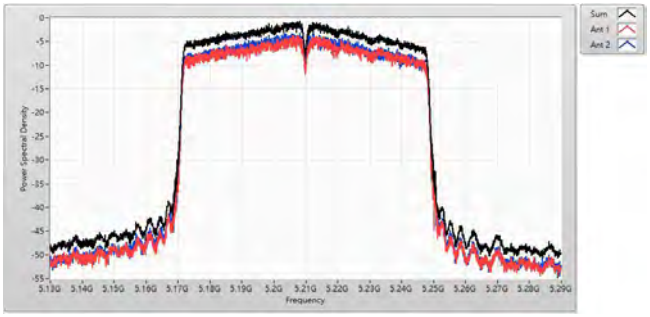
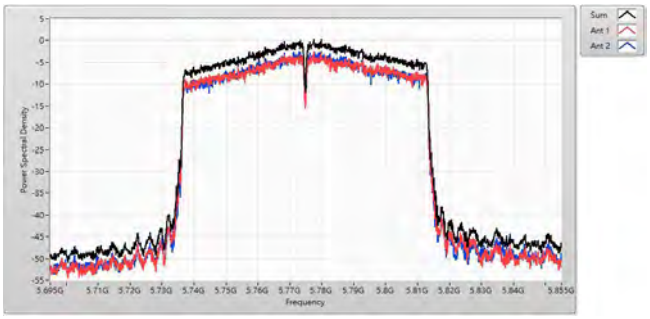
<Non-beamforming function>

Modulation	Channel	Frequency (MHz)	Power Spectral Density (dBm)	Limit (dBm)	Result
			Ant. 0 + Ant. 1		
802.11a	36	5180	10.580	≦15.78	Pass
	44	5220	10.480	≦15.78	Pass
	48	5240	10.140	≦15.78	Pass
	149	5745	8.230	≦28.78	Pass
	157	5785	8.510	≦28.78	Pass
	165	5825	8.590	≦28.78	Pass
802.11ac (20 MHz)	36	5180	9.530	≦15.78	Pass
	44	5220	9.840	≦15.78	Pass
	48	5240	9.570	≦15.78	Pass
	149	5745	8.290	≦28.78	Pass
	157	5785	8.980	≦28.78	Pass
	165	5825	9.120	≦28.78	Pass
802.11ac (40 MHz)	38	5190	6.880	≦15.78	Pass
	46	5230	7.460	≦15.78	Pass
	151	5755	5.260	≦28.78	Pass
	159	5795	5.330	≦28.78	Pass
802.11ac (80 MHz)	42	5210	-0.730	≦15.78	Pass
	155	5775	0.260	≦28.78	Pass

Note:

1. Total power spectral density = power spectral density + duty factor, and the duty factor refer to section 1.10.
2. Directional Gain = 10log $[(10^{G1/20} + 10^{G2/20} + \ldots + 10^{GN/20})^2 / N_{Ant}]$ = 7.22dBi >6dBi.
   (1) The band 1 limit = 17 – (7.22 – 6) = 15.78dBm.
   (2) The band 4 limit = 30 – (7.22 – 6) = 28.78dBm.

Spectrum plot of worst value	
802.11a / Ant. 0 + Ant. 1 / 5180 MHz (U-NII-1)	802.11a / Ant. 0 + Ant. 1 / 5825 MHz (U-NII-3)
	
802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5220 MHz (U-NII-1)	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5825 MHz (U-NII-3)
	
802.11ac (40 MHz) / Ant. 0 + Ant. 1 / 5230 MHz (U-NII-1)	802.11ac (40 MHz) / Ant. 0 + Ant. 1 / 5795 MHz (U-NII-3)
	

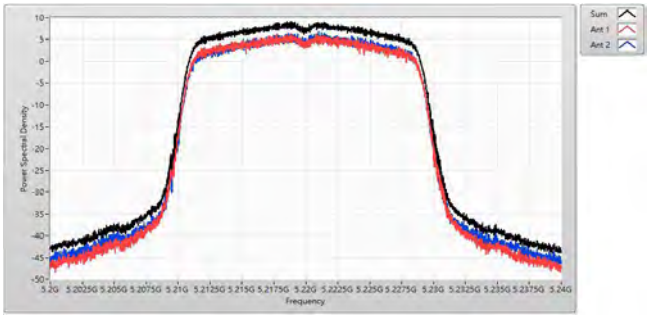
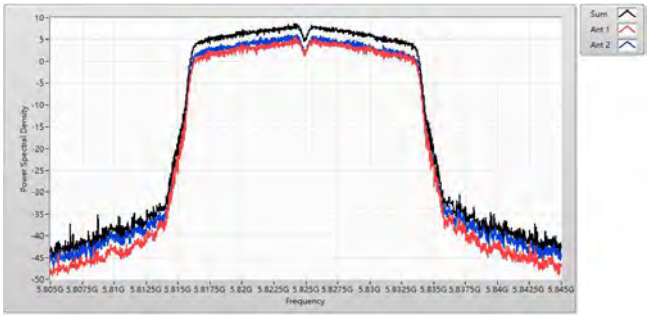
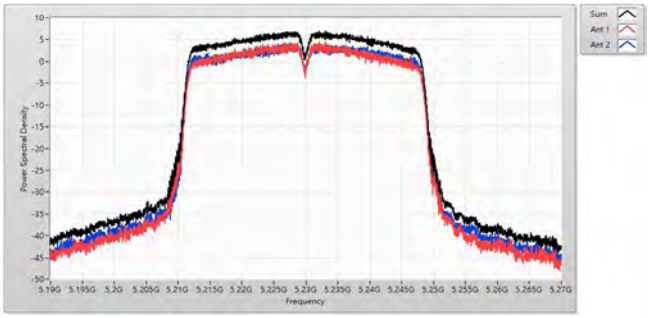
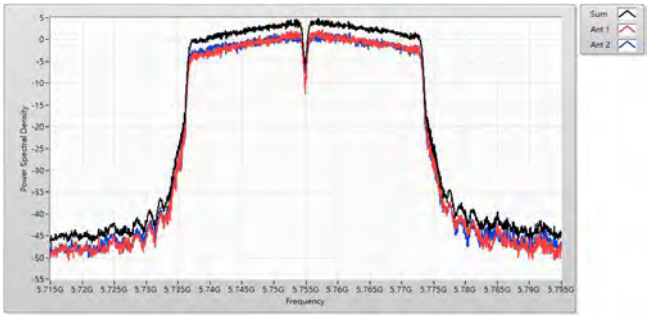
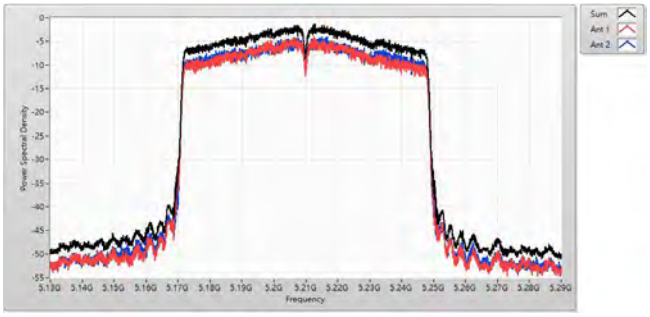
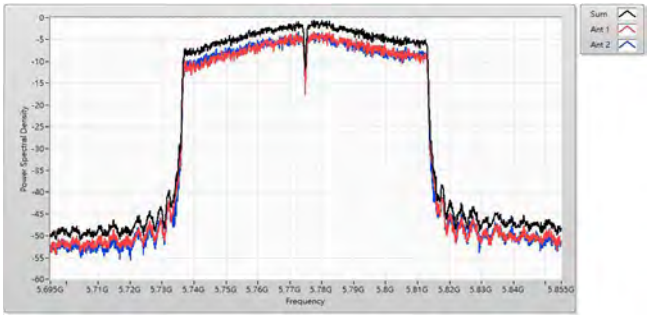
Spectrum plot of worst value	
802.11ac (80 MHz) / Ant. 0 + Ant. 1 / 5210 MHz (U-NII-1)	802.11ac (80 MHz) / Ant. 0 + Ant. 1 / 5775 MHz (U-NII-3)
	

<Beamforming function>

Modulation	Channel	Frequency (MHz)	Power Spectral Density (dBm)	Limit (dBm)	Result
			Ant. 0 + Ant. 1		
802.11ac (20 MHz)	36	5180	8.680	≦15.78	Pass
	44	5220	9.090	≦15.78	Pass
	48	5240	9.090	≦15.78	Pass
	149	5745	7.480	≦28.78	Pass
	157	5785	8.440	≦28.78	Pass
	165	5825	8.640	≦28.78	Pass
802.11ac (40 MHz)	38	5190	6.490	≦15.78	Pass
	46	5230	6.900	≦15.78	Pass
	151	5755	4.780	≦28.78	Pass
	159	5795	4.570	≦28.78	Pass
802.11ac (80 MHz)	42	5210	-1.350	≦15.78	Pass
	155	5775	-0.640	≦28.78	Pass

Note:

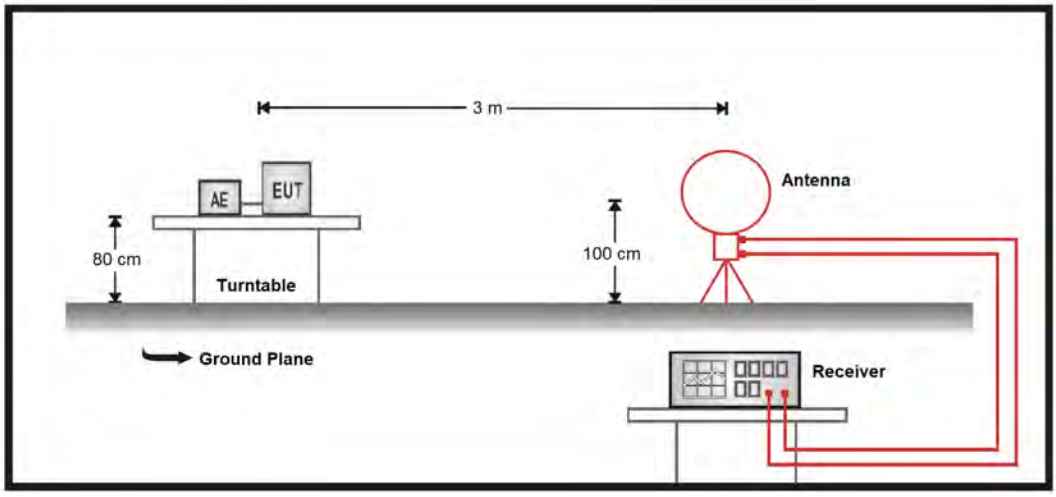
1. Total power spectral density = power spectral density + duty factor, and the duty factor refer to section 1.10.
2. Directional Gain = 10log $[(10^{G1/20} + 10^{G2/20} + \ldots + 10^{GN/20})^2 / N_{Ant}]$ = 7.22dBi >6dBi.
   (1) The band 1 limit = 17 – (7.22 – 6) = 15.78dBm.
   (2) The band 4 limit = 30 – (7.22 – 6) = 28.78dBm.

Spectrum plot of worst value	
802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5220 MHz (U-NII-1)	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5825 MHz (U-NII-3)
	
802.11ac (40 MHz) / Ant. 0 + Ant. 1 / 5230 MHz (U-NII-1)	802.11ac (40 MHz) / Ant. 0 + Ant. 1 / 5755 MHz (U-NII-3)
	
802.11ac (80 MHz) / Ant. 0 + Ant. 1 / 5210 MHz (U-NII-1)	802.11ac (80 MHz) / Ant. 0 + Ant. 1 / 5775 MHz (U-NII-3)
	

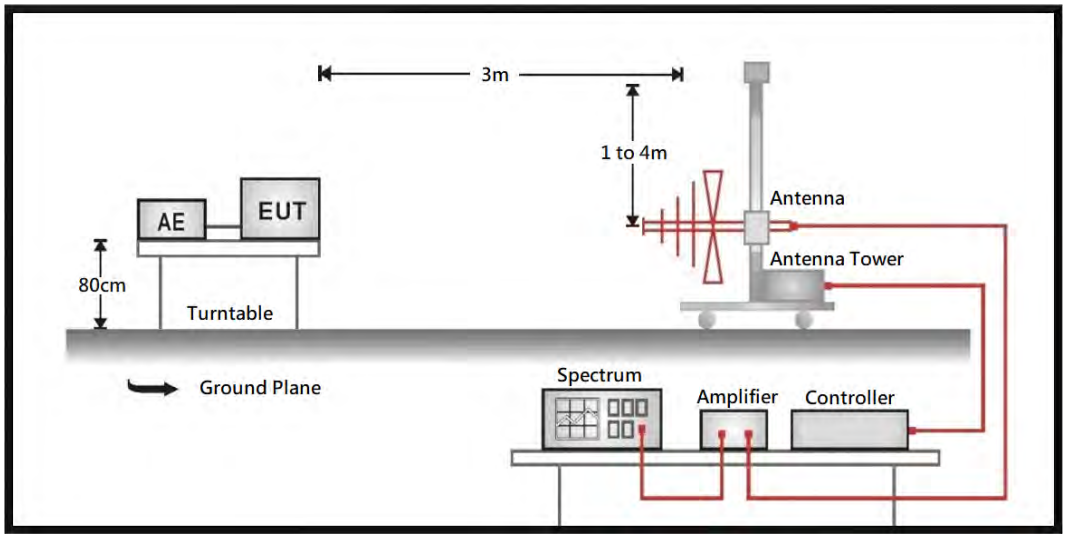
7. Radiated Emission

7.1. Test Setup

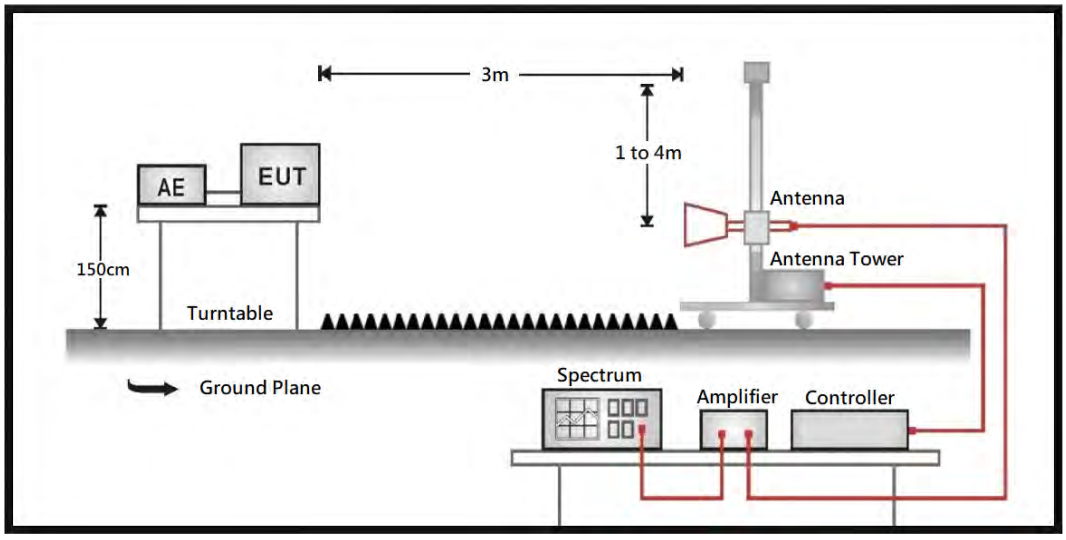
9 kHz ~ 30 MHz



30 MHz ~ 1 GHz



Above 1 GHz



7.2. Test Limit

General Radiated Emission Test Limit

Emissions radiated outside of the specified frequency bands, except for harmonics, shall be attenuated by at least 30 dB below the level of the fundamental or to the general radiated emission limit in paragraph 15.209, whichever is the lesser attenuation.

Frequency (MHz)	Field strength (uV/m)	Field strength (dBuV/m)	Measurement distance (m)
0.009 – 0.490	2400/F(kHz)	20 log (2400/F(kHz))	300
0.490 – 1.705	24000/F(kHz)	20 log (24000/F(kHz))	30
1.705 - 30	30	29.5	30
30 - 88	100	40	3
88 - 216	150	43.5	3
216 - 960	200	46	3
Above 960	500	54	3

Remarks:

1. Field strength (dBuV/m) = 20 log Field strength (uV/m)
2. In the Above Table, the tighter limit applies at the band edges.
3. Distance refers to the distance in meters between the measuring instrument antenna and the closed point of any part of the device or system

Unwanted Emission out of the restricted bands Test Limit

Frequency (MHz)	EIRP Limit (dBm/MHz)	Equivalent Field Strength (dBuV/m@3m)
5150 - 5250	-27	68.2
5250 - 5350	-27	68.2
5470 - 5725	-27	68.2
5725 - 5850	-27 *1	68.2 *1
	10 *2	105.2 *2
	15.6 *3	110.8 *3
	27 *4	122.2 *4

*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.

Remark:

The following formula is used to convert the equipment isotropic radiated power (eirp) to field strength:

E = $\frac{1000000\sqrt{30P}}{3}$ uV/m, where P is the eirp (Watts).

7.3. Test Procedure

The EUT and its simulators are placed on a turn table which is 0.8 or 1.5 meter above ground. The turn table can rotate 360 degrees to determine the position of the maximum emission level. The EUT was positioned such that the distance from antenna to the EUT was 3 meters.
The antenna can move up and down between 1 meter and 4 meters to find out the maximum emission level. Both horizontal and vertical polarization of the antenna are set on measurement. In order to find the maximum emission, all of the interface cables must be manipulated according to ANSI C63.10: 2013 on radiated measurement.
The additional latch filter below 1 GHz was used to measure the level of harmonics radiated emission during field dtrength of harmonics measurement.
The bandwidth below 1 GHz setting on the field strength meter is 120 kHz, above 1 GHz are 1 MHz.
The frequency range from 30 MHz to 10th harmonics and included The frequency range from the lowest oscillator frequency generated within the device up to the 10th harmonic was checked is checked.

The following table is the setting of spectrum analyzer.

Spectrum Parameter	Setting
RBW	1 MHz for Peak, 1 MHz for Average
VBW	3 MHz for Peak, 1 kHz for Average

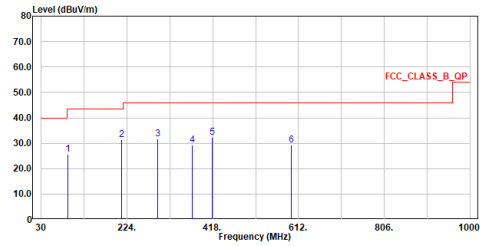
7.4. Test Specification

According to FCC CFR Title 47 Part 15 Subpart E.

7.5. Test Result of Radiated Emissions (30 MHz ~ 1 GHz)

<Non-beamforming function>

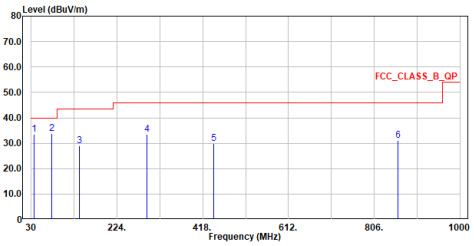
Site :HC-CB04
Condition :3m Horizontal
Mode :11a_TX_5745MHz
Test by :Ling



No.	Frequency	Level	Limit Line	Over Limit	Read Level	Factor	Remark
	MHz	dBuV/m	dBuV/m	dB	dBuV	dB	
1	91.013	25.60	43.50	-17.90	34.31	-8.71	QP
2	211.487	31.54	43.50	-11.96	38.05	-6.51	QP
3	292.967	31.73	46.00	-14.27	34.22	-2.49	QP
4	371.731	29.28	46.00	-16.72	29.82	-0.54	QP
5	417.127	32.43	46.00	-13.57	31.88	0.55	QP
6	595.316	29.26	46.00	-16.74	24.30	4.96	QP

Note:
1. Level = Read Level + Factor
2. Factor = Antenna Factor + Cable Loss - Preamp Factor
3. Over Limit = Level - Limit Line
4. The emission under 30MHz was not included since the emission levels are very low against the limit.
5. The other emission levels were very low against the limit.

Site :HC-CB04
Condition :3m Vertical
Mode :11a_TX_5745MHz
Test by :Ling



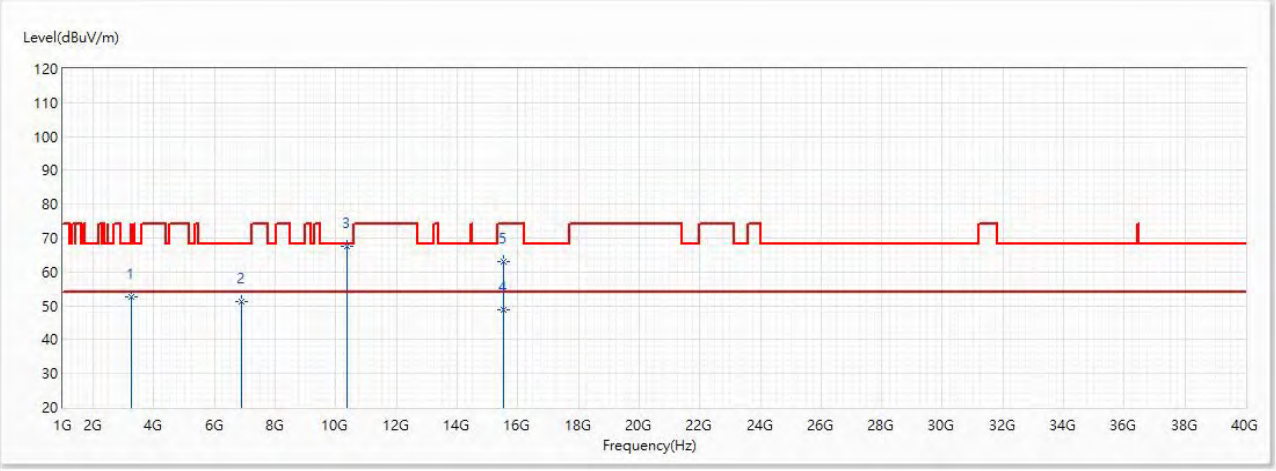
No.	Frequency	Level	Limit Line	Over Limit	Read Level	Factor	Remark
	MHz	dBuV/m	dBuV/m	dB	dBuV	dB	
1	36.984	33.49	40.00	-6.51	36.40	-2.91	QP
2	77.142	33.76	40.00	-6.24	40.13	-6.37	QP
3	139.416	28.92	43.50	-14.58	32.56	-3.64	QP
4	292.191	33.45	46.00	-12.55	35.94	-2.49	QP
5	442.929	29.93	46.00	-16.07	28.43	1.50	QP
6	860.514	31.14	46.00	-14.86	22.52	8.62	QP

Note:
1. Level = Read Level + Factor
2. Factor = Antenna Factor + Cable Loss - Preamp Factor
3. Over Limit = Level - Limit Line
4. The emission under 30MHz was not included since the emission levels are very low against the limit.
5. The other emission levels were very low against the limit.

7.6. Test Result of Radiated Emissions (1 GHz ~ 10th Harmonic)

<Non-beamforming function>

Test Mode	Mode 1	Phase	Horizontal
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5180 MHz		

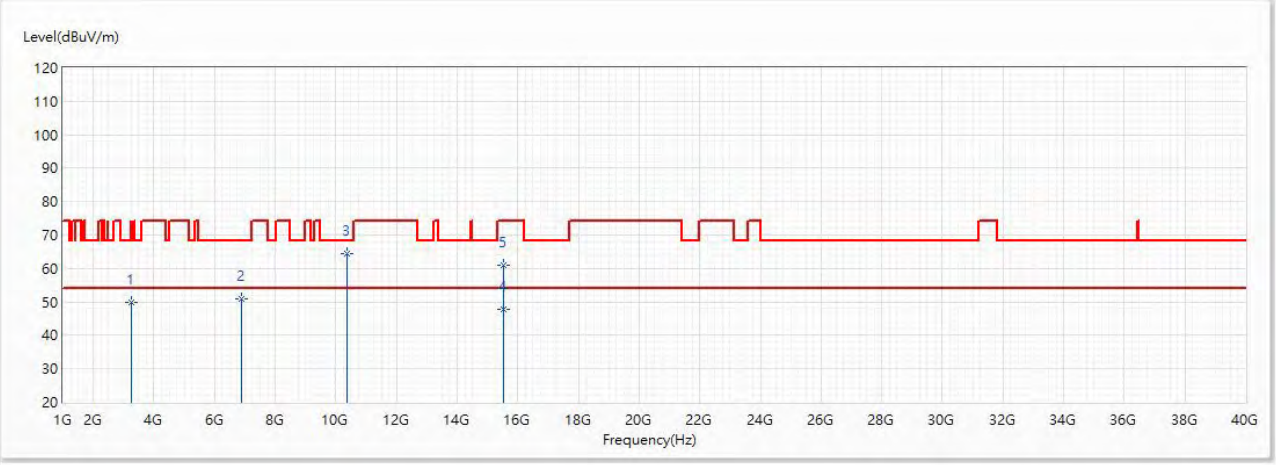


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	52.50	68.20	-15.70	55.71	-3.21	PK
2	6906.667	51.27	68.20	-16.93	39.88	11.39	PK
* 3	10360	67.53	68.20	-0.67	49.03	18.50	PK
4	15540	48.96	54.00	-5.04	26.45	22.51	AV
5	15540	63.20	74.00	-10.80	40.69	22.51	PK

Note:

1. " * ", means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5180 MHz		

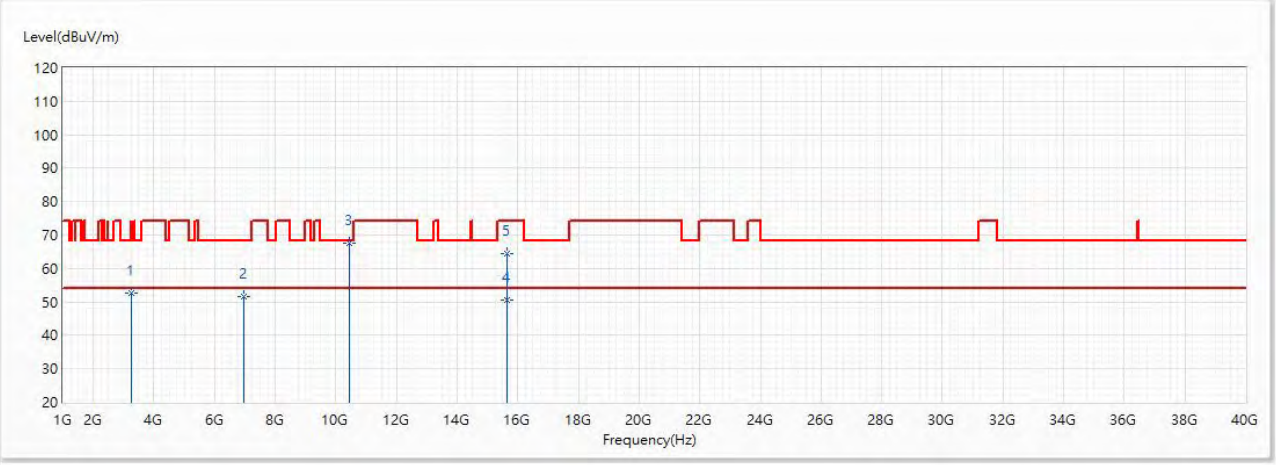


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	49.89	68.20	-18.31	53.10	-3.21	PK
2	6906.667	50.93	68.20	-17.27	39.54	11.39	PK
* 3	10360	64.45	68.20	-3.75	45.95	18.50	PK
4	15540	47.95	54.00	-6.05	25.44	22.51	AV
5	15540	61.09	74.00	-12.91	38.58	22.51	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Phase	Horizontal
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5220 MHz		

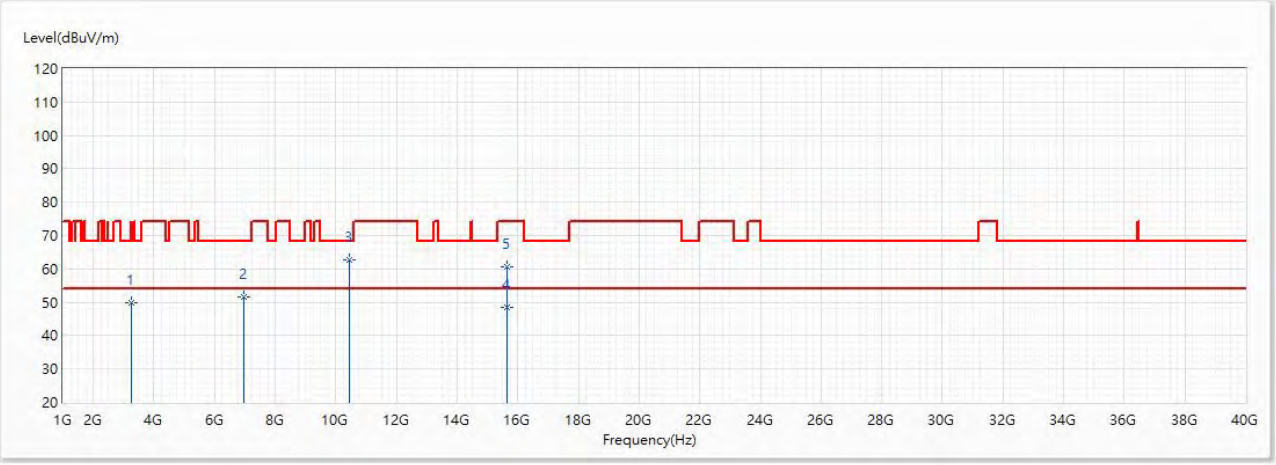


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	52.62	68.20	-15.58	55.83	-3.21	PK
2	6960	51.69	68.20	-16.51	40.11	11.58	PK
* 3	10440	67.66	68.20	-0.54	48.84	18.82	PK
4	15660	50.44	54.00	-3.56	28.21	22.23	AV
5	15660	64.61	74.00	-9.39	42.38	22.23	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5220 MHz		

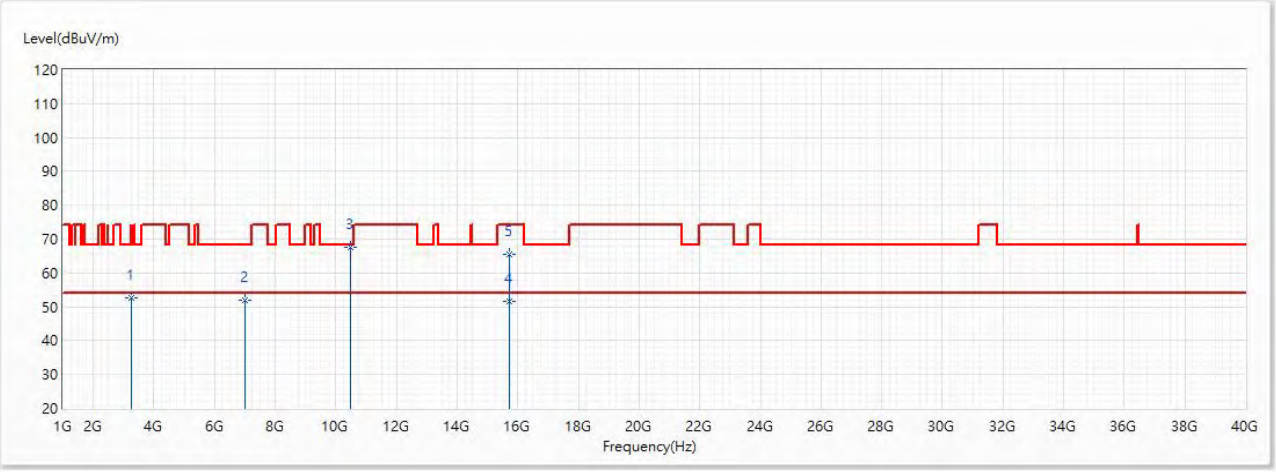


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	49.82	68.20	-18.38	53.03	-3.21	PK
2	6960	51.43	68.20	-16.77	39.85	11.58	PK
* 3	10440	62.76	68.20	-5.44	43.94	18.82	PK
4	15660	48.31	54.00	-5.69	26.08	22.23	AV
5	15660	60.63	74.00	-13.37	38.40	22.23	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5240 MHz		

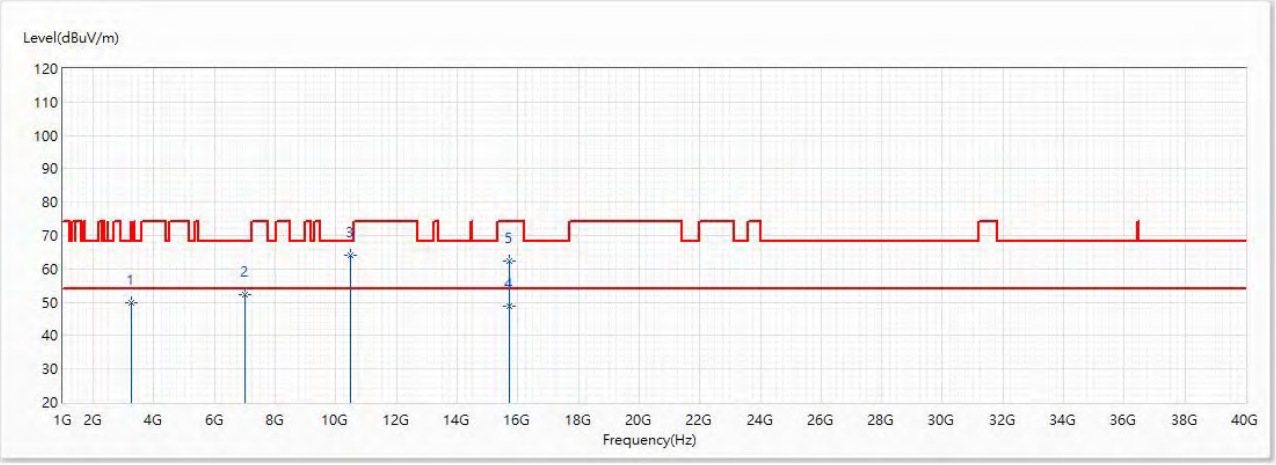


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	52.58	68.20	-15.62	55.79	-3.21	PK
2	6986.667	52.06	68.20	-16.14	40.38	11.68	PK
* 3	10480	67.40	68.20	-0.80	48.43	18.97	PK
4	15720	51.75	54.00	-2.25	29.66	22.09	AV
5	15720	65.39	74.00	-8.61	43.30	22.09	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5240 MHz		

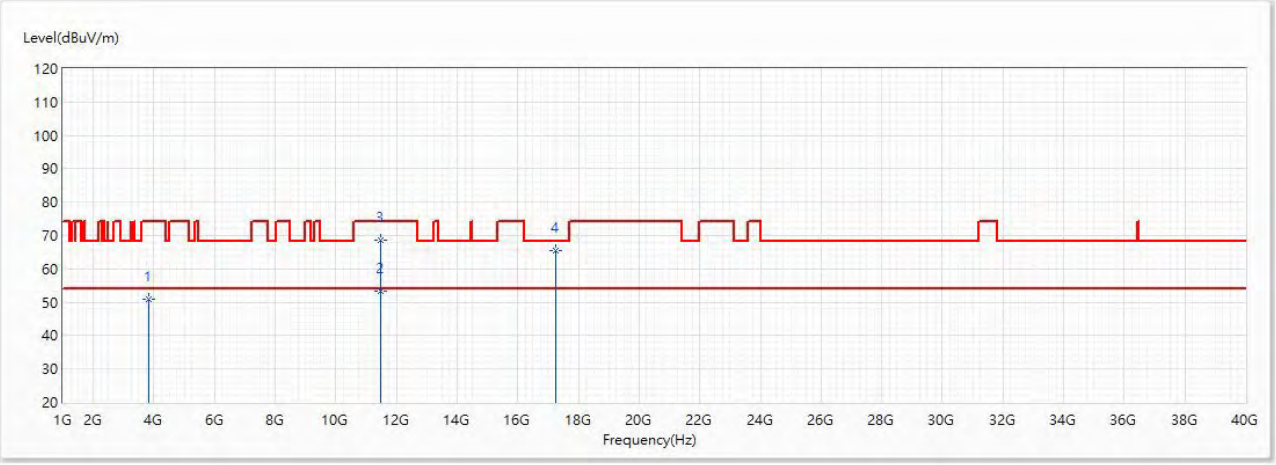


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	49.79	68.20	-18.41	53.00	-3.21	PK
2	6986.667	52.17	68.20	-16.03	40.49	11.68	PK
* 3	10480	64.06	68.20	-4.14	45.09	18.97	PK
4	15720	48.73	54.00	-5.27	26.64	22.09	AV
5	15720	62.20	74.00	-11.80	40.11	22.09	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5745 MHz		

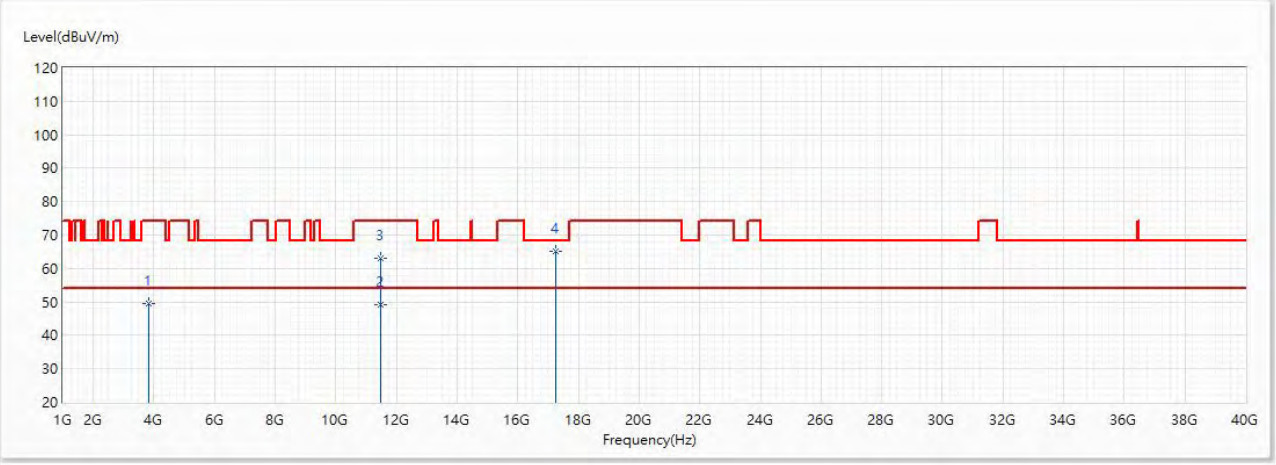


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	51.07	74.00	-22.93	52.40	-1.33	PK
* 2	11490	53.48	54.00	-0.52	32.80	20.68	AV
3	11490	68.66	74.00	-5.34	47.98	20.68	PK
4	17235	65.47	68.20	-2.73	40.51	24.96	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5745 MHz		

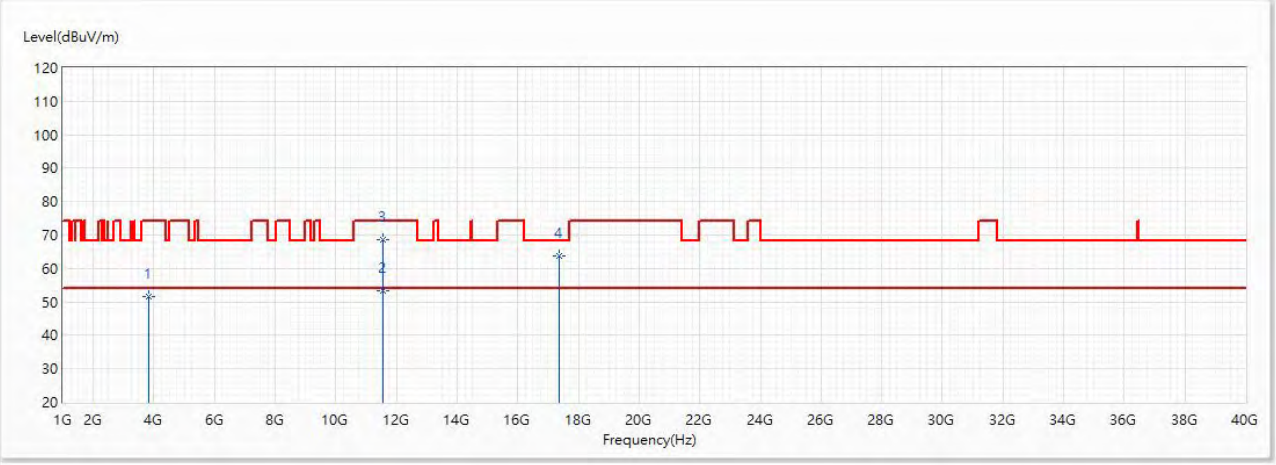


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	49.53	74.00	-24.47	50.86	-1.33	PK
2	11490	49.23	54.00	-4.77	28.55	20.68	AV
3	11490	63.13	74.00	-10.87	42.45	20.68	PK
* 4	17235	65.06	68.20	-3.14	40.10	24.96	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5785 MHz		

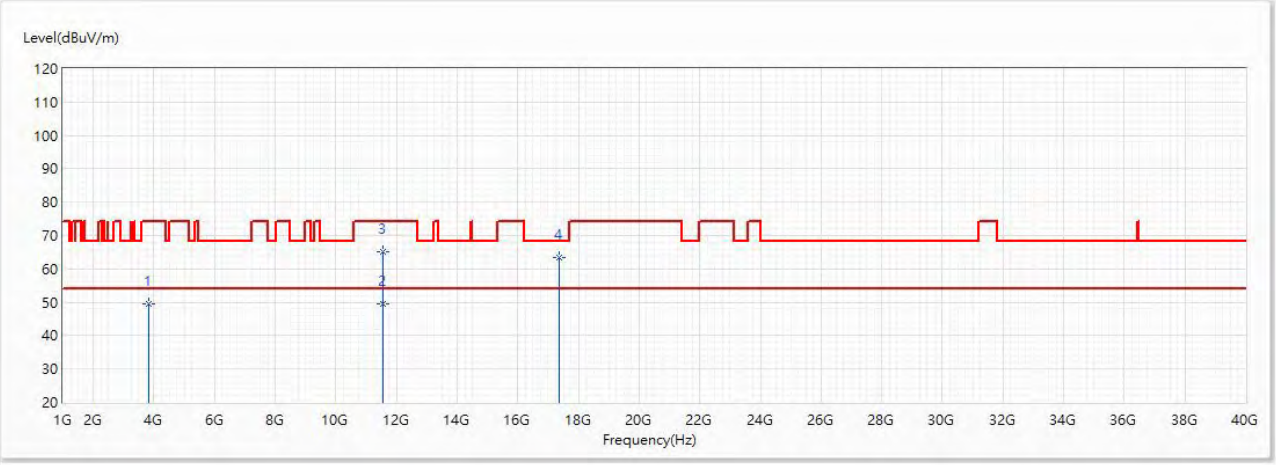


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	51.52	74.00	-22.48	52.85	-1.33	PK
* 2	11570	53.38	54.00	-0.62	32.70	20.68	AV
3	11570	68.52	74.00	-5.48	47.84	20.68	PK
4	17355	63.72	68.20	-4.48	38.15	25.57	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5785 MHz		

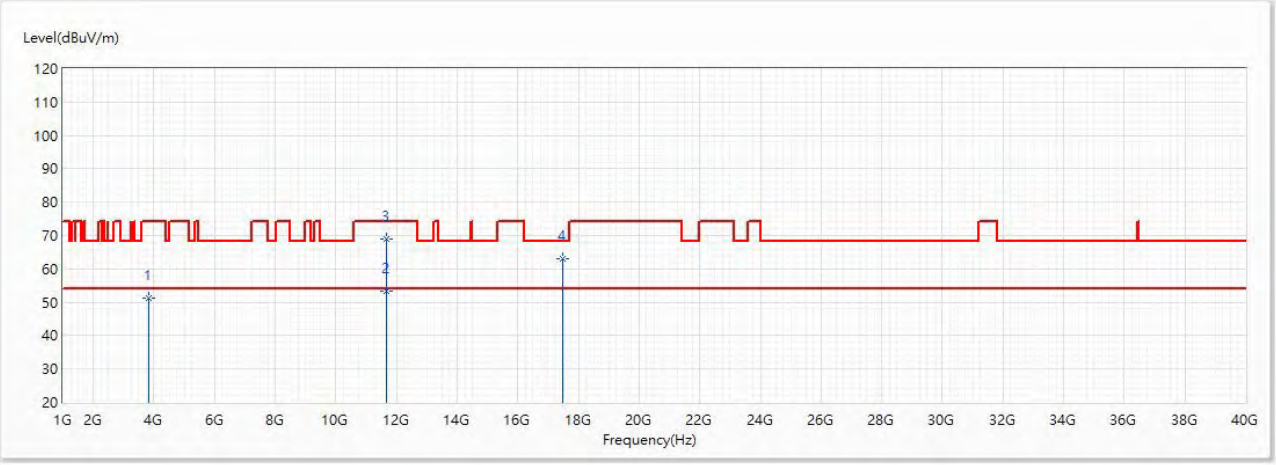


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	49.48	74.00	-24.52	50.81	-1.33	PK
* 2	11570	49.35	54.00	-4.65	28.67	20.68	AV
3	11570	65.13	74.00	-8.87	44.45	20.68	PK
4	17355	63.34	68.20	-4.86	37.77	25.57	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5825 MHz		

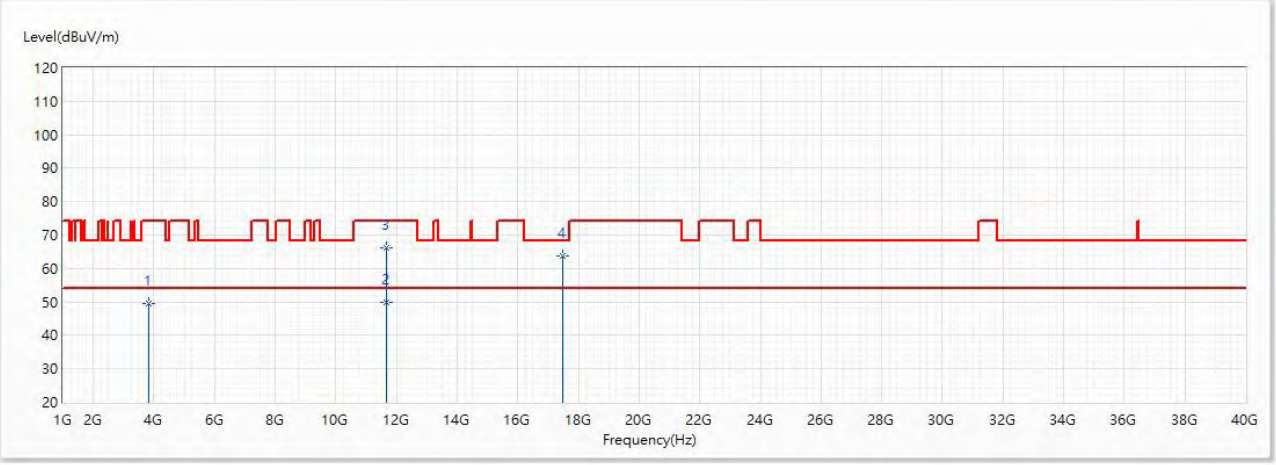


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	51.23	74.00	-22.77	52.56	-1.33	PK
* 2	11650	53.43	54.00	-0.57	32.78	20.65	AV
3	11650	68.87	74.00	-5.13	48.22	20.65	PK
4	17475	62.89	68.20	-5.31	36.71	26.18	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11a / Ant. 0 + Ant. 1 / 5825 MHz		

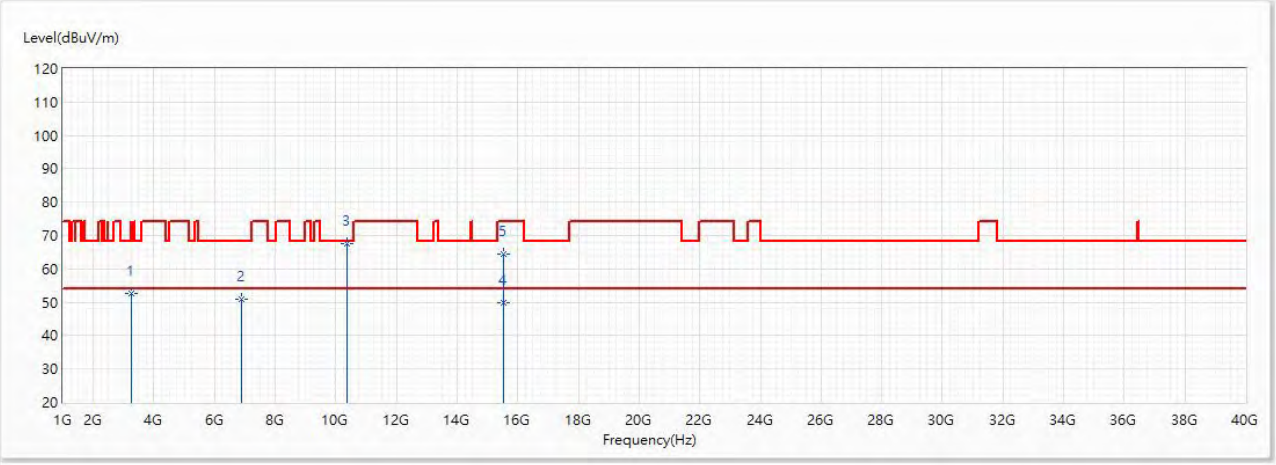


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	49.55	74.00	-24.45	50.88	-1.33	PK
* 2	11650	50.02	54.00	-3.98	29.37	20.65	AV
3	11650	66.30	74.00	-7.70	45.65	20.65	PK
4	17475	63.81	68.20	-4.39	37.63	26.18	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5180 MHz		

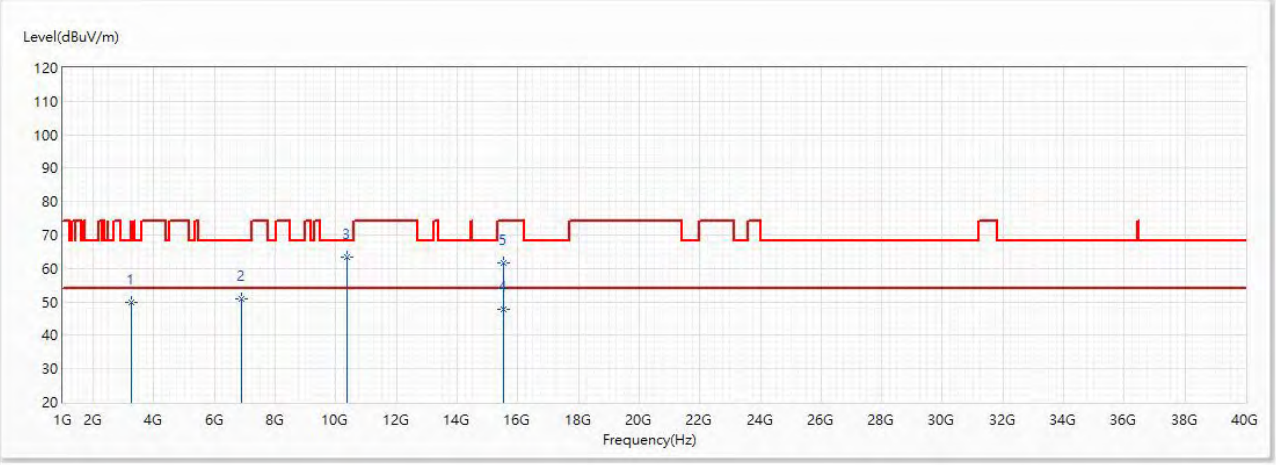


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	52.53	68.20	-15.67	55.74	-3.21	PK
2	6906.667	50.84	68.20	-17.36	39.45	11.39	PK
* 3	10360	67.59	68.20	-0.61	49.09	18.50	PK
4	15540	49.84	54.00	-4.16	27.33	22.51	AV
5	15540	64.38	74.00	-9.62	41.87	22.51	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5180 MHz		

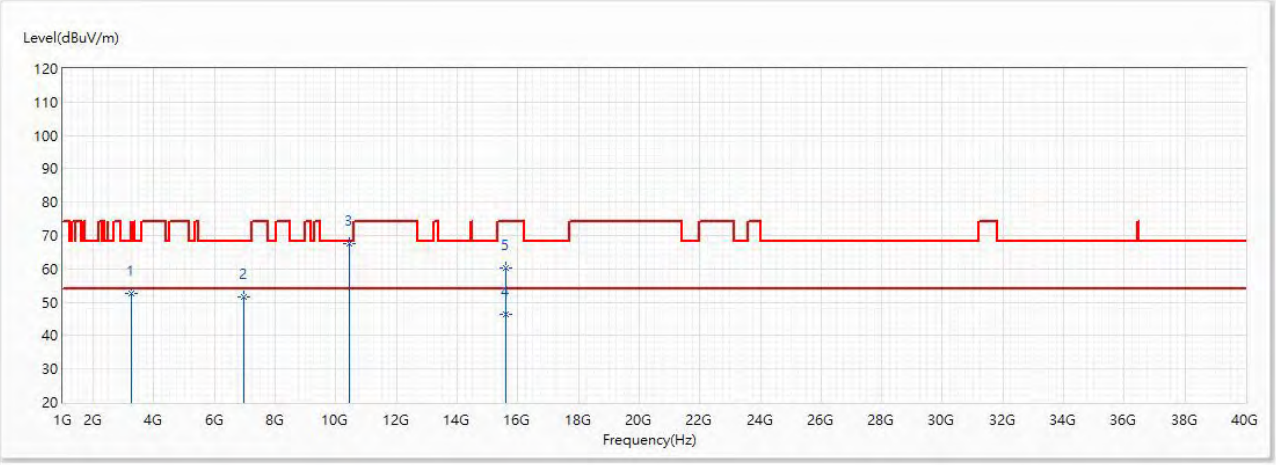


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	49.92	68.20	-18.28	53.13	-3.21	PK
2	6906.667	50.73	68.20	-17.47	39.34	11.39	PK
* 3	10360	63.55	68.20	-4.65	45.05	18.50	PK
4	15540	47.80	54.00	-6.20	25.29	22.51	AV
5	15540	61.70	74.00	-12.30	39.19	22.51	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5220 MHz		

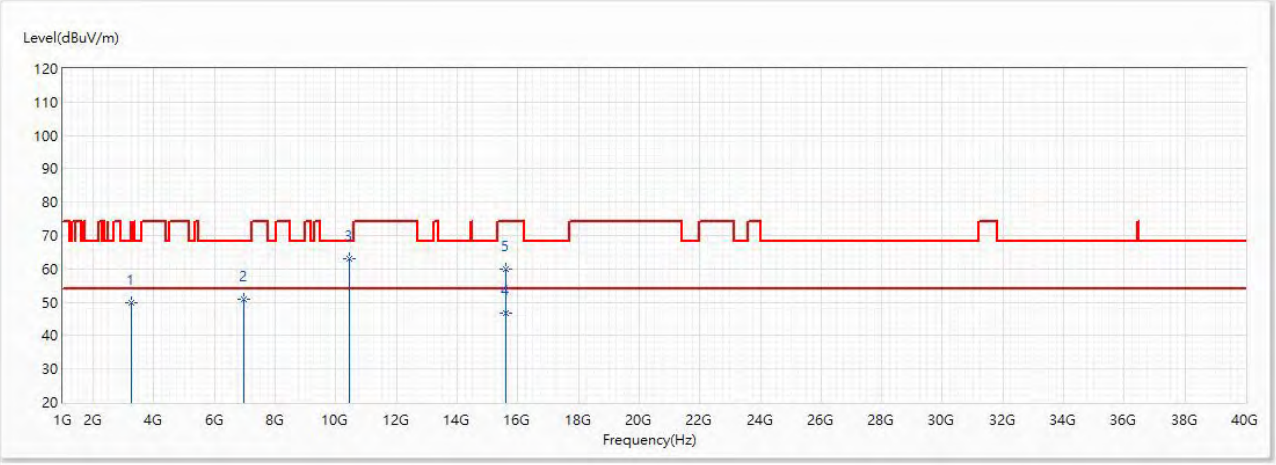


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	52.49	68.20	-15.71	55.70	-3.21	PK
2	6960	51.64	68.20	-16.56	40.06	11.58	PK
* 3	10440	67.55	68.20	-0.65	48.73	18.82	PK
4	15620	46.26	54.00	-7.74	23.94	22.32	AV
5	15620	60.13	74.00	-13.87	37.81	22.32	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5220 MHz		

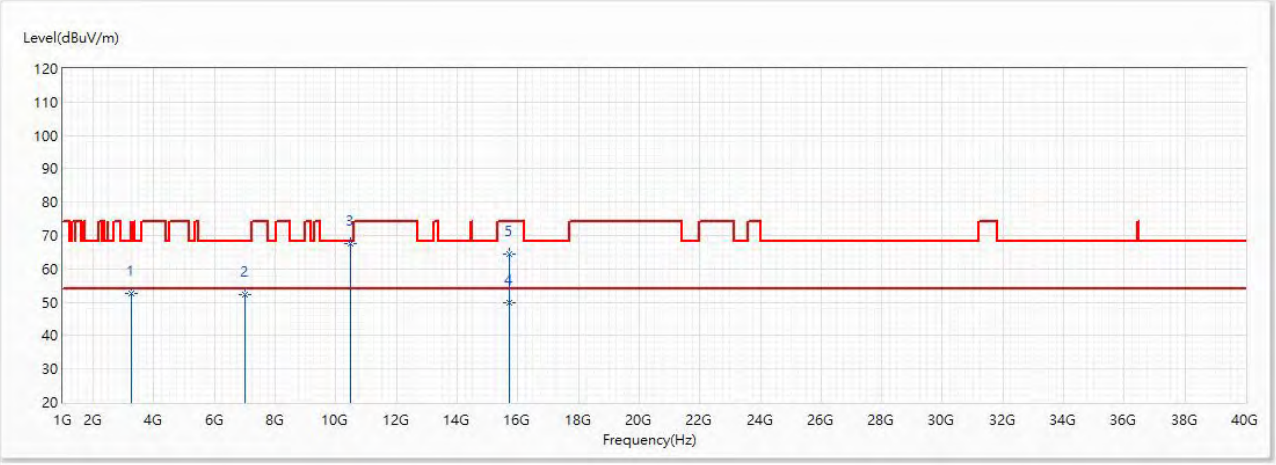


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	49.86	68.20	-18.34	53.07	-3.21	PK
2	6960	51.06	68.20	-17.14	39.48	11.58	PK
* 3	10440	63.12	68.20	-5.08	44.30	18.82	PK
4	15620	46.87	54.00	-7.13	24.55	22.32	AV
5	15620	59.84	74.00	-14.16	37.52	22.32	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5240 MHz		

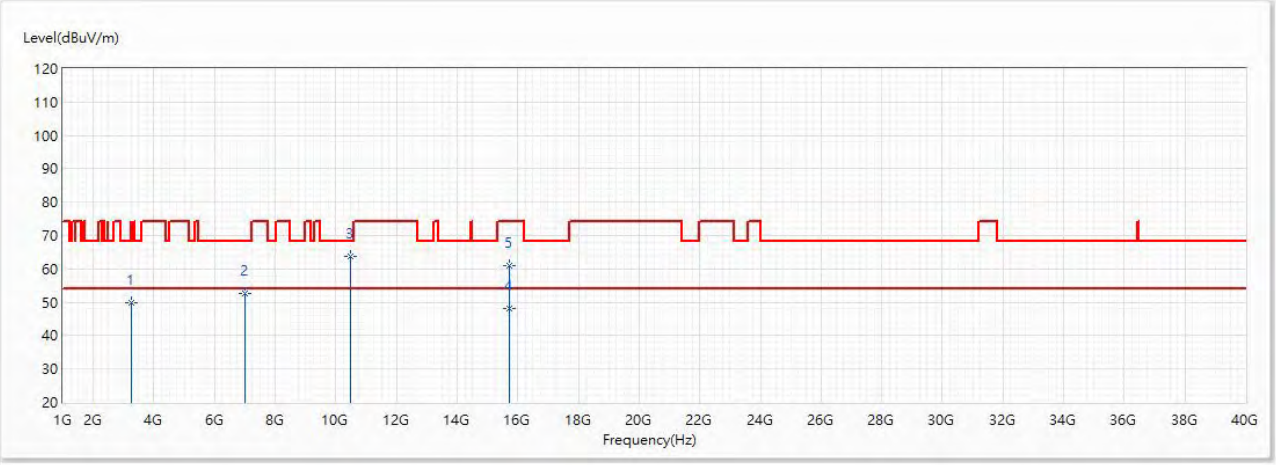


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	52.54	68.20	-15.66	55.75	-3.21	PK
2	6986.667	52.18	68.20	-16.02	40.50	11.68	PK
* 3	10480	67.61	68.20	-0.59	48.64	18.97	PK
4	15720	49.85	54.00	-4.15	27.76	22.09	AV
5	15720	64.52	74.00	-9.48	42.43	22.09	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5240 MHz		

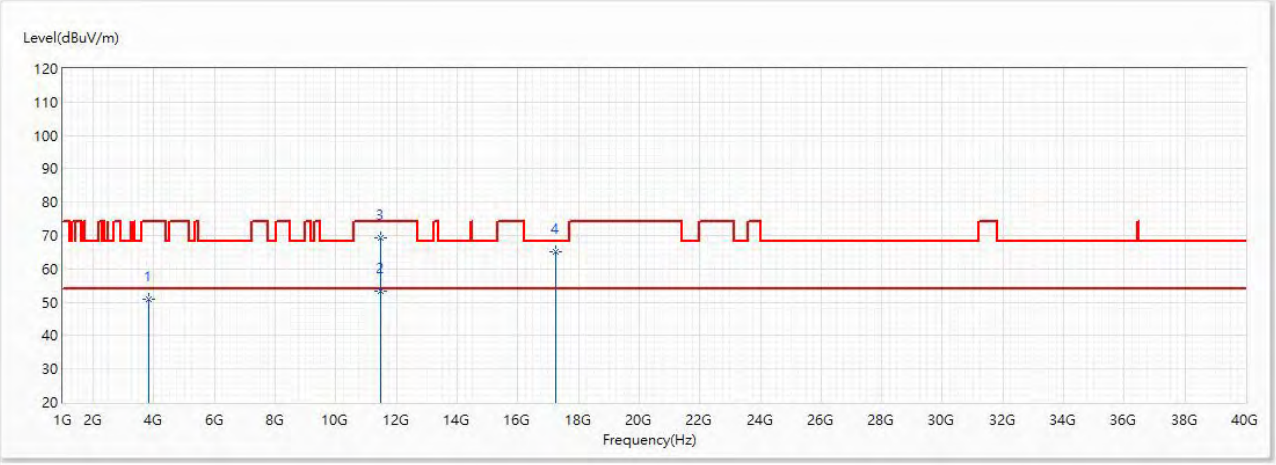


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	49.83	68.20	-18.37	53.04	-3.21	PK
2	6986.667	52.58	68.20	-15.62	40.90	11.68	PK
* 3	10480	63.78	68.20	-4.42	44.81	18.97	PK
4	15720	48.11	54.00	-5.89	26.02	22.09	AV
5	15720	61.00	74.00	-13.00	38.91	22.09	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5745 MHz		

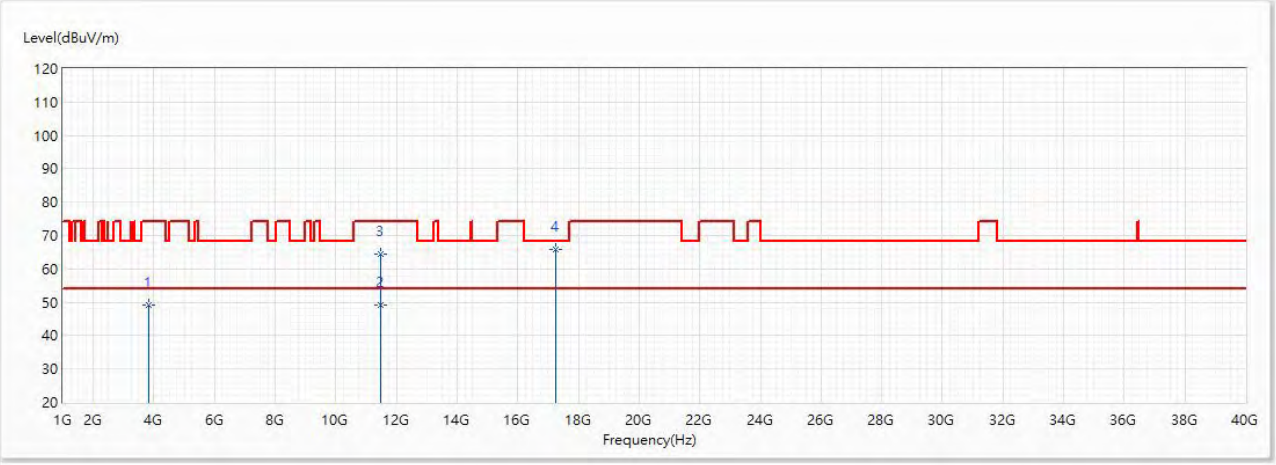


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	51.05	74.00	-22.95	52.38	-1.33	PK
* 2	11490	53.45	54.00	-0.55	32.77	20.68	AV
3	11490	69.32	74.00	-4.68	48.64	20.68	PK
4	17235	65.07	68.20	-3.13	40.11	24.96	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5745 MHz		

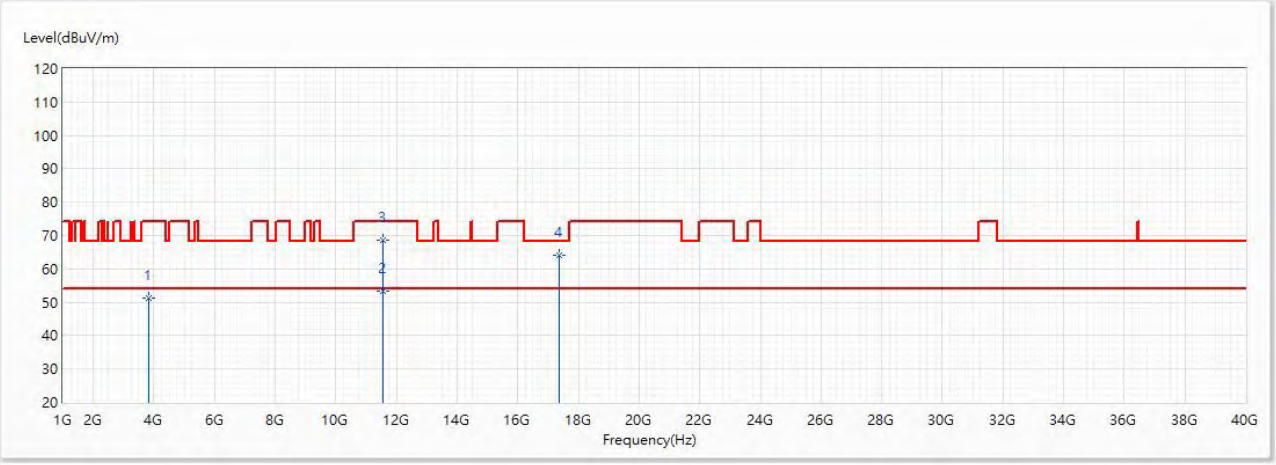


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	49.18	74.00	-24.82	50.51	-1.33	PK
2	11490	49.31	54.00	-4.69	28.63	20.68	AV
3	11490	64.45	74.00	-9.55	43.77	20.68	PK
* 4	17235	65.88	68.20	-2.32	40.92	24.96	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5785 MHz		

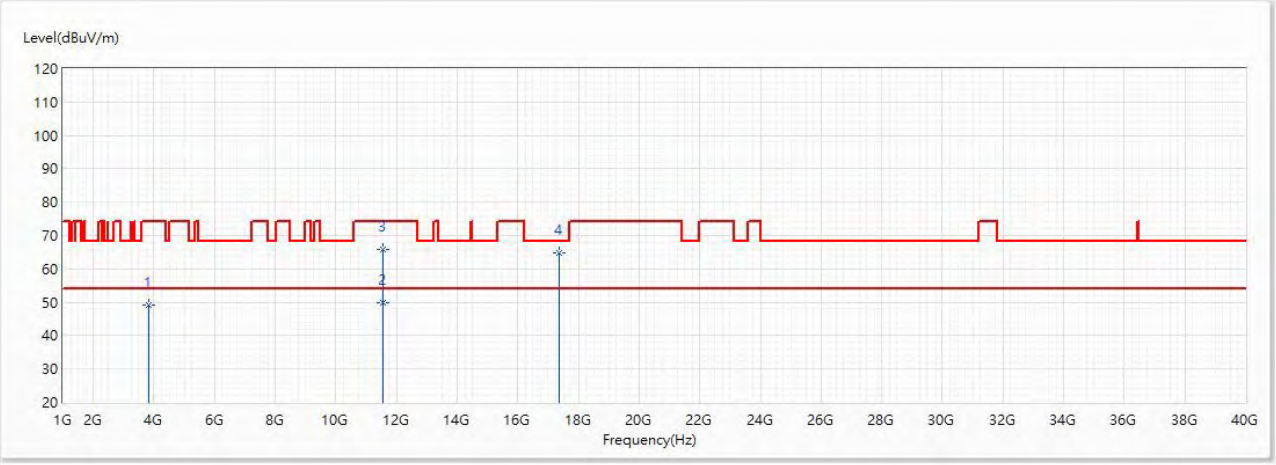


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	51.39	74.00	-22.61	52.72	-1.33	PK
* 2	11570	53.48	54.00	-0.52	32.80	20.68	AV
3	11570	68.72	74.00	-5.28	48.04	20.68	PK
4	17355	64.04	68.20	-4.16	38.47	25.57	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5785 MHz		

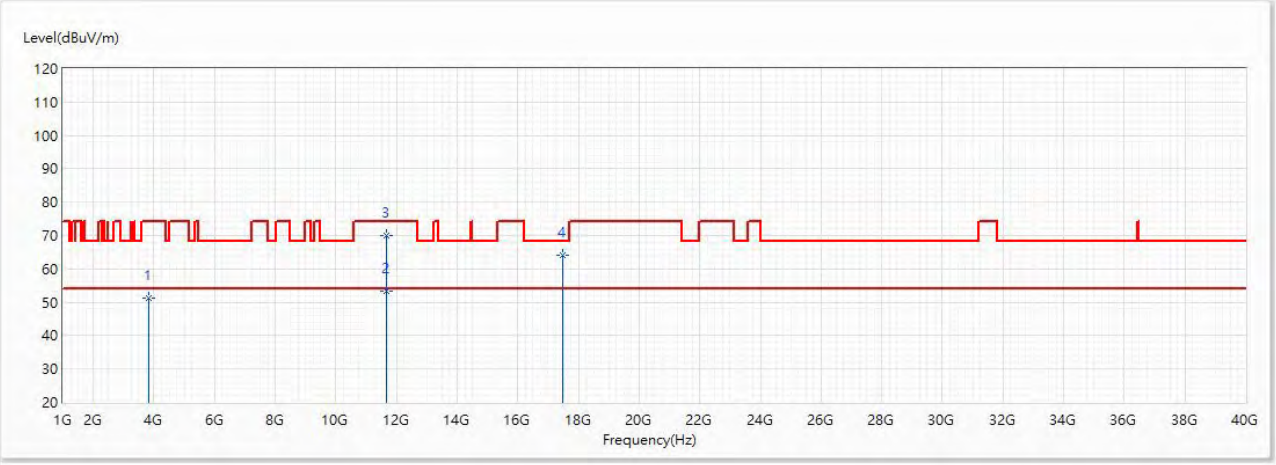


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	49.09	74.00	-24.91	50.42	-1.33	PK
2	11570	49.74	54.00	-4.26	29.06	20.68	AV
3	11570	65.88	74.00	-8.12	45.20	20.68	PK
* 4	17355	64.87	68.20	-3.33	39.30	25.57	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5825 MHz		

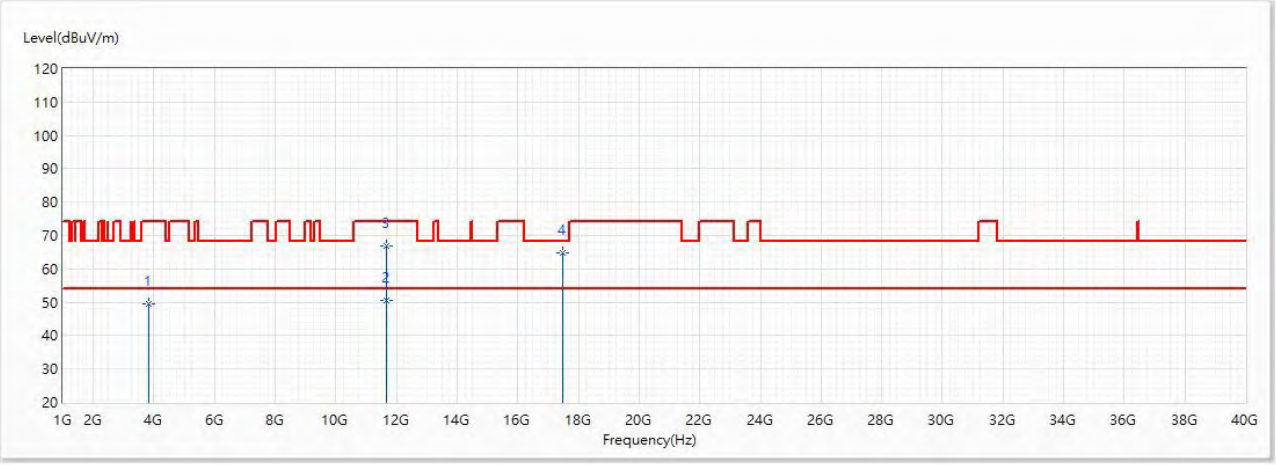


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	51.11	74.00	-22.89	52.44	-1.33	PK
* 2	11650	53.38	54.00	-0.62	32.73	20.65	AV
3	11650	69.96	74.00	-4.04	49.31	20.65	PK
4	17475	64.22	68.20	-3.98	38.04	26.18	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11ac (20 MHz) / Ant. 0 + Ant. 1 / 5825 MHz		

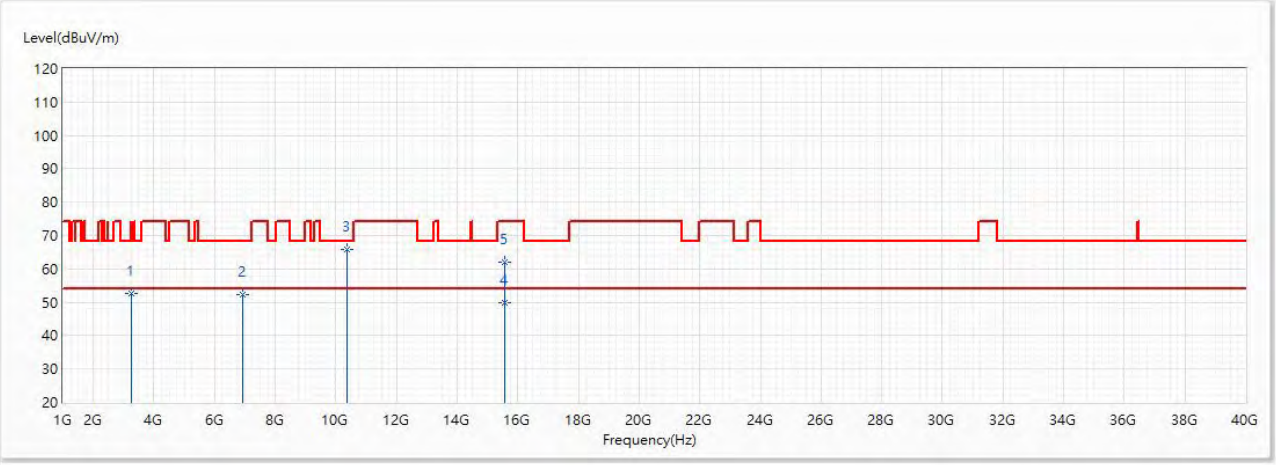


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	49.36	74.00	-24.64	50.69	-1.33	PK
2	11650	50.65	54.00	-3.35	30.00	20.65	AV
3	11650	66.72	74.00	-7.28	46.07	20.65	PK
* 4	17475	64.95	68.20	-3.25	38.77	26.18	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11ac (40 MHz) / Ant. 0 + Ant. 1 / 5190 MHz		

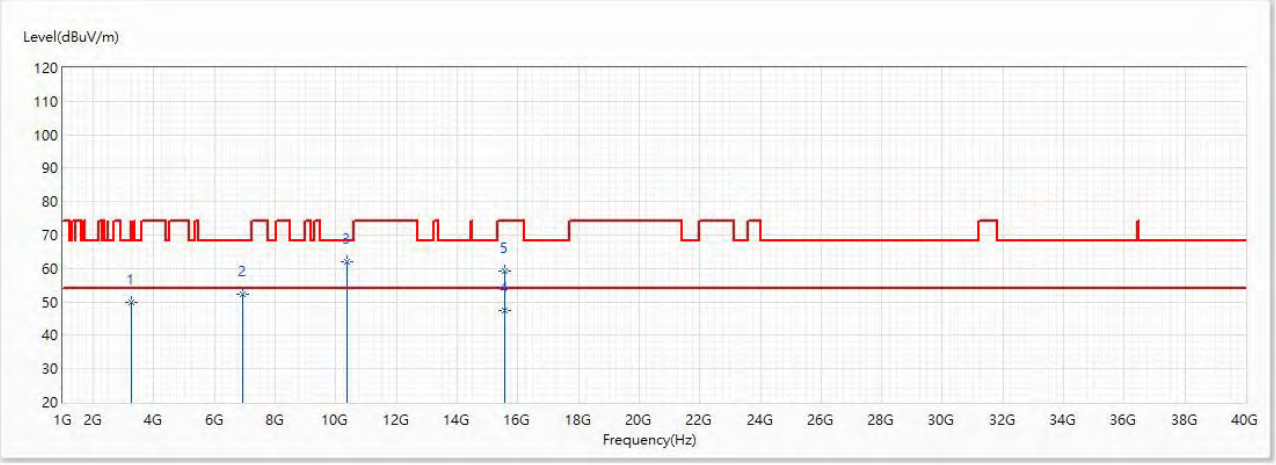


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	52.58	68.20	-15.62	55.79	-3.21	PK
2	6920	52.17	68.20	-16.03	40.74	11.43	PK
* 3	10380	65.88	68.20	-2.32	47.29	18.59	PK
4	15570	49.74	54.00	-4.26	27.30	22.44	AV
5	15570	61.94	74.00	-12.06	39.50	22.44	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11ac (40 MHz) / Ant. 0 + Ant. 1 / 5190 MHz		

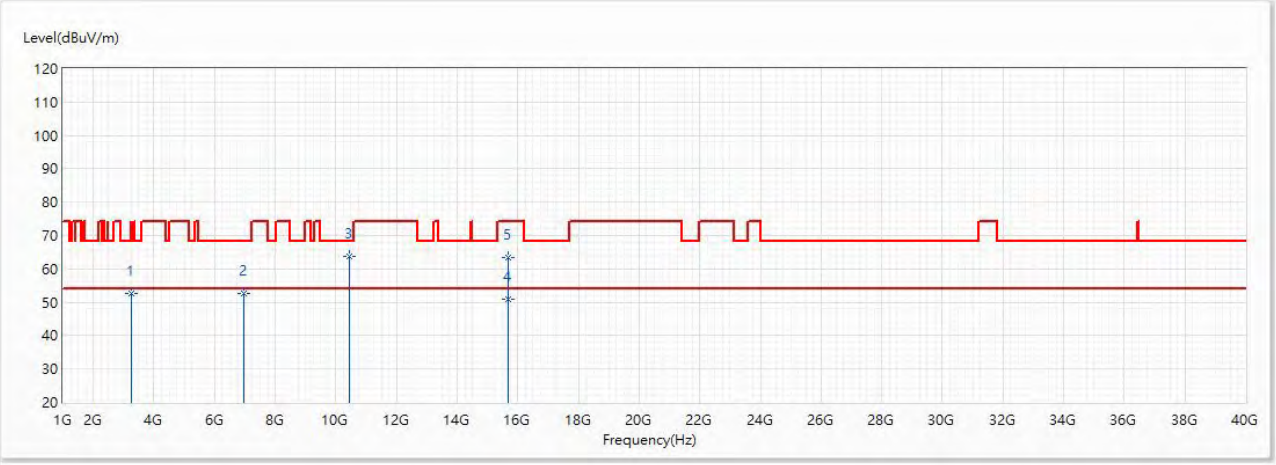


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	49.77	68.20	-18.43	52.98	-3.21	PK
2	6920	52.23	68.20	-15.97	40.80	11.43	PK
* 3	10380	61.87	68.20	-6.33	43.28	18.59	PK
4	15570	47.50	54.00	-6.50	25.06	22.44	AV
5	15570	59.35	74.00	-14.65	36.91	22.44	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11ac (40 MHz) / Ant. 0 + Ant. 1 / 5230 MHz		

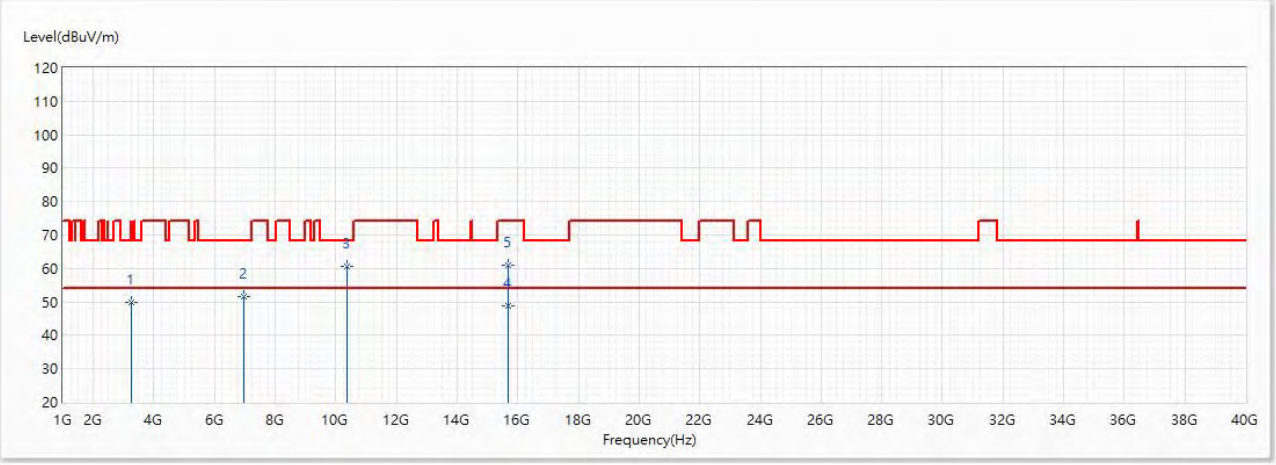


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	52.49	68.20	-15.71	55.70	-3.21	PK
2	6973.333	52.51	68.20	-15.69	40.88	11.63	PK
3	10460	63.87	68.20	-4.33	44.99	18.88	PK
* 4	15690	50.88	54.00	-3.12	28.72	22.16	AV
5	15690	63.27	74.00	-10.73	41.11	22.16	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11ac (40 MHz) / Ant. 0 + Ant. 1 / 5230 MHz		

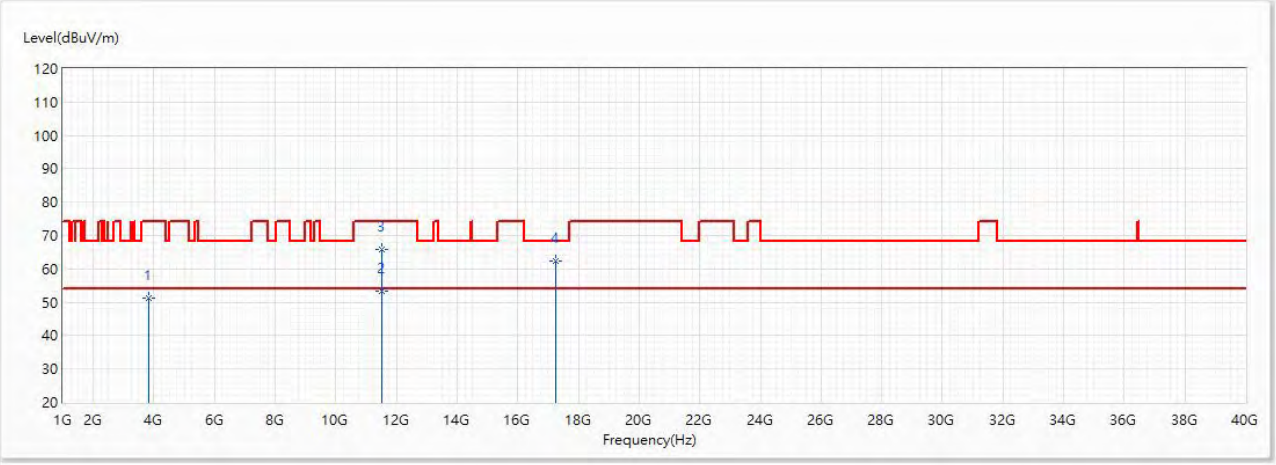


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	49.81	68.20	-18.39	53.02	-3.21	PK
2	6973.333	51.73	68.20	-16.47	40.10	11.63	PK
3	10380	60.75	68.20	-7.45	42.16	18.59	PK
* 4	15690	48.73	54.00	-5.27	26.57	22.16	AV
5	15690	60.93	74.00	-13.07	38.77	22.16	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11ac (40 MHz) / Ant. 0 + Ant. 1 / 5755 MHz		

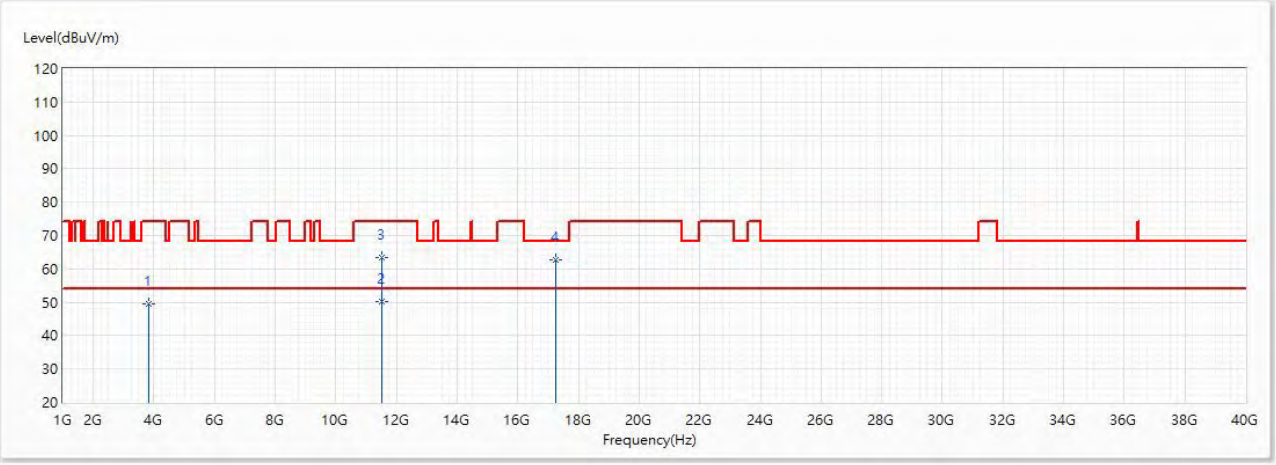


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	51.40	74.00	-22.60	52.73	-1.33	PK
* 2	11510	53.35	54.00	-0.65	32.66	20.69	AV
3	11510	65.85	74.00	-8.15	45.16	20.69	PK
4	17265	62.32	68.20	-5.88	37.21	25.11	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11ac (40 MHz) / Ant. 0 + Ant. 1 / 5755 MHz		

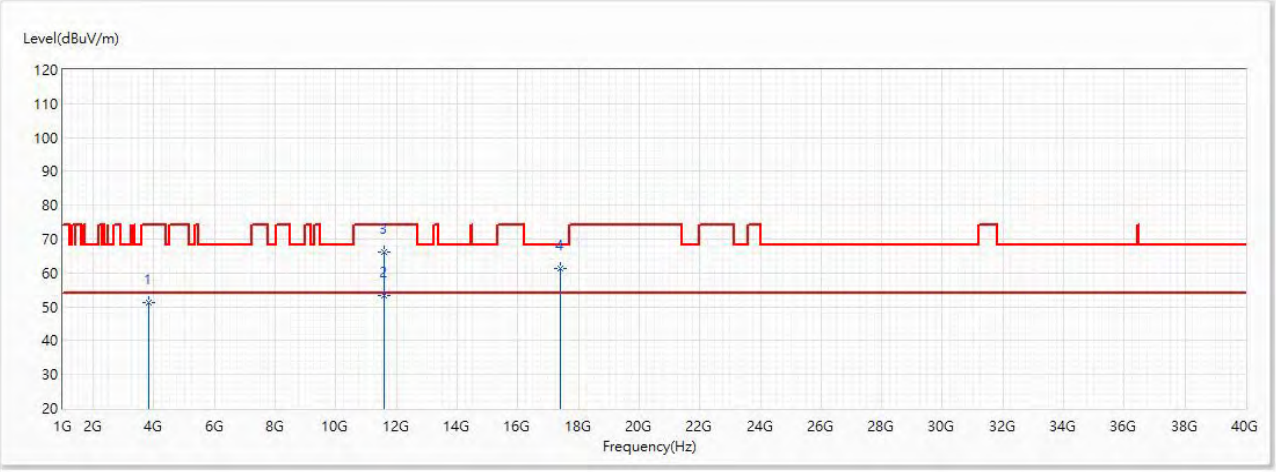


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	49.51	74.00	-24.49	50.84	-1.33	PK
* 2	11510	50.28	54.00	-3.72	29.59	20.69	AV
3	11510	63.52	74.00	-10.48	42.83	20.69	PK
4	17265	62.81	68.20	-5.39	37.70	25.11	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11ac (40 MHz) / Ant. 0 + Ant. 1 / 5795 MHz		

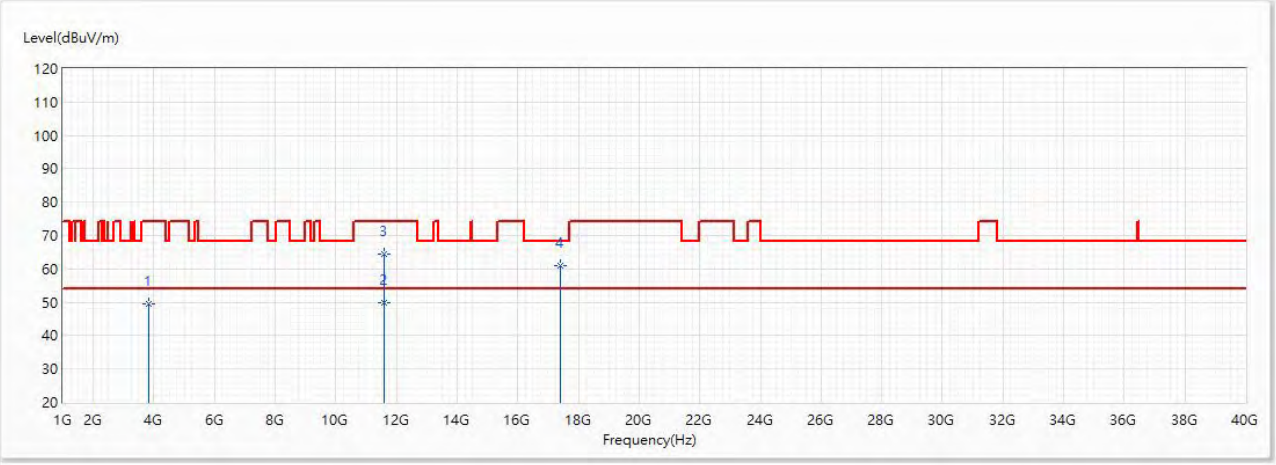


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	51.38	74.00	-22.62	52.71	-1.33	PK
* 2	11590	53.27	54.00	-0.73	32.60	20.67	AV
3	11590	66.32	74.00	-7.68	45.65	20.67	PK
4	17385	61.48	68.20	-6.72	35.76	25.72	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11ac (40 MHz) / Ant. 0 + Ant. 1 / 5795 MHz		

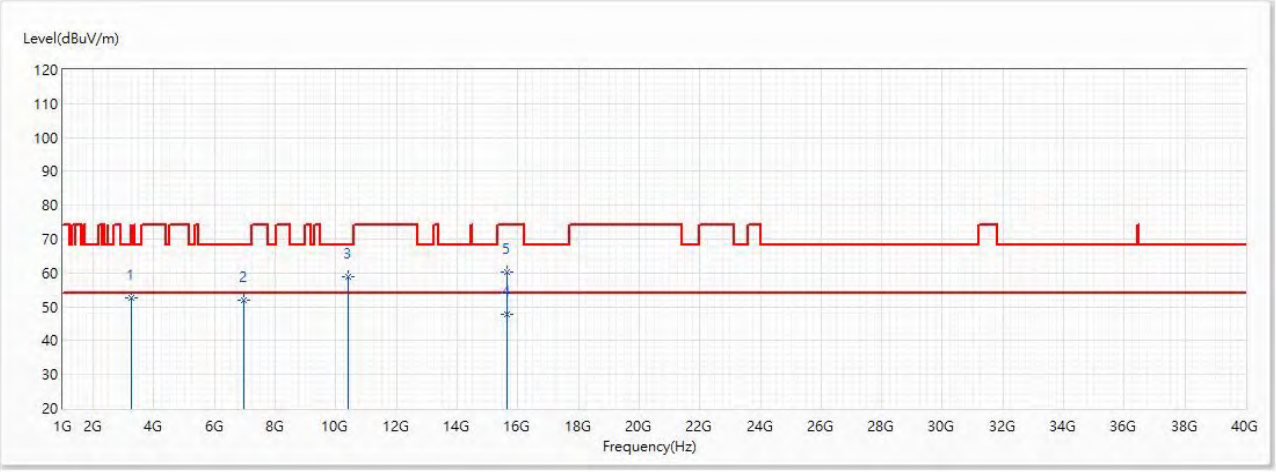


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	49.66	74.00	-24.34	50.99	-1.33	PK
* 2	11590	50.00	54.00	-4.00	29.33	20.67	AV
3	11590	64.57	74.00	-9.43	43.90	20.67	PK
4	17385	61.08	68.20	-7.12	35.36	25.72	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11ac (80 MHz) / Ant. 0 + Ant. 1 / 5210 MHz		

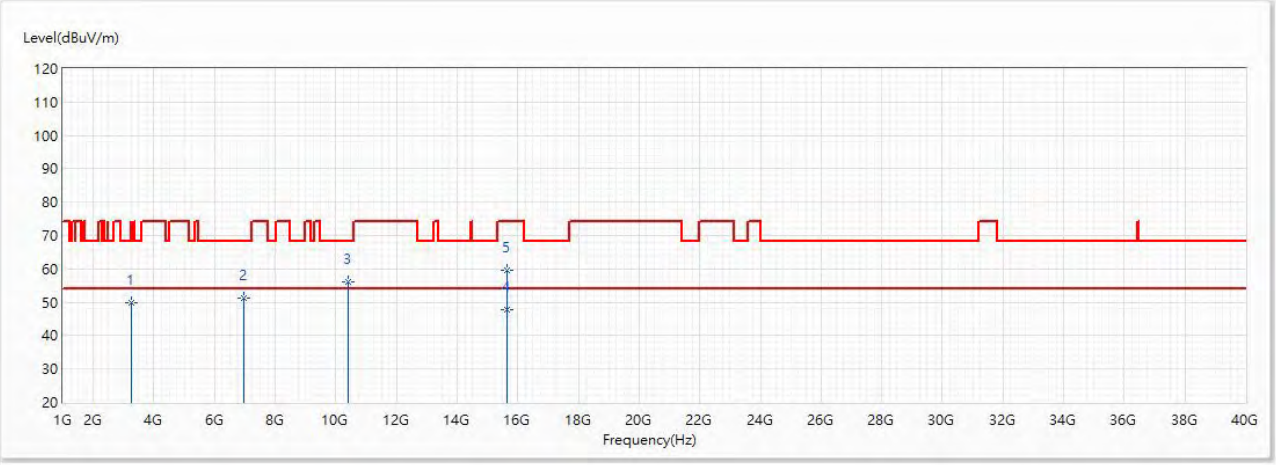


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	52.47	68.20	-15.73	55.68	-3.21	PK
2	6946.667	52.09	68.20	-16.11	40.56	11.53	PK
3	10420	58.98	68.20	-9.22	40.24	18.74	PK
* 4	15630	47.90	54.00	-6.10	25.60	22.30	AV
5	15630	60.34	74.00	-13.66	38.04	22.30	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11ac (80 MHz) / Ant. 0 + Ant. 1 / 5210 MHz		

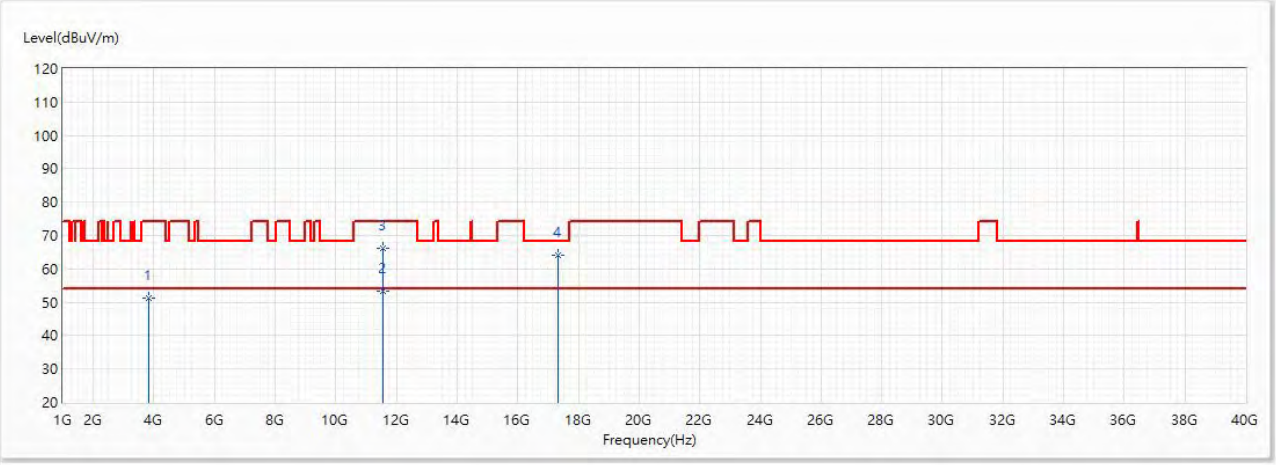


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3249.333	49.85	68.20	-18.35	53.06	-3.21	PK
2	6946.667	51.25	68.20	-16.95	39.72	11.53	PK
3	10420	56.12	68.20	-12.08	37.38	18.74	PK
* 4	15630	47.66	54.00	-6.34	25.36	22.30	AV
5	15630	59.56	74.00	-14.44	37.26	22.30	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Horizontal
Test Condition	802.11ac (80 MHz) / Ant. 0 + Ant. 1 / 5775 MHz		

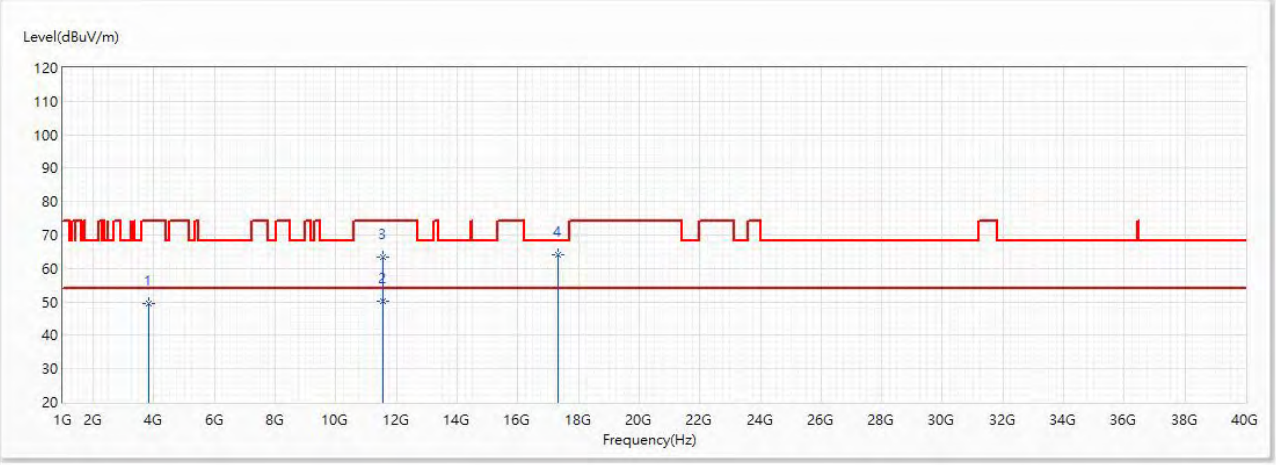


No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	51.09	74.00	-22.91	52.42	-1.33	PK
* 2	11550	53.45	54.00	-0.55	32.77	20.68	AV
3	11550	66.17	74.00	-7.83	45.49	20.68	PK
4	17325	63.94	68.20	-4.26	38.53	25.41	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.

Test Mode	Mode 1	Polarity	Vertical
Test Condition	802.11ac (80 MHz) / Ant. 0 + Ant. 1 / 5775 MHz		



No	Frequency (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Reading Level (dBuV)	Correct Factor (dB)	Detector Type
1	3830	49.47	74.00	-24.53	50.80	-1.33	PK
* 2	11550	50.08	54.00	-3.92	29.40	20.68	AV
3	11550	63.28	74.00	-10.72	42.60	20.68	PK
4	17325	64.12	68.20	-4.08	38.71	25.41	PK

Note:

1. “ * ”, means this data is the worst emission level.
2. Emission Level = Reading Level + Correct Factor.
3. The average measurement was not performed when the peak measured data under the limit of average detection.
4. The other emission levels were very low against the limit.