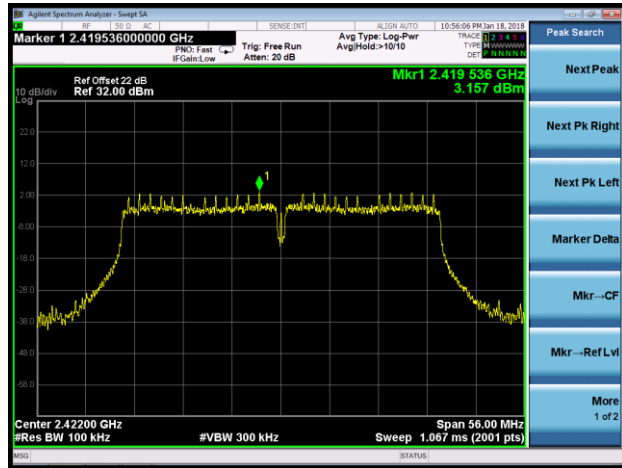


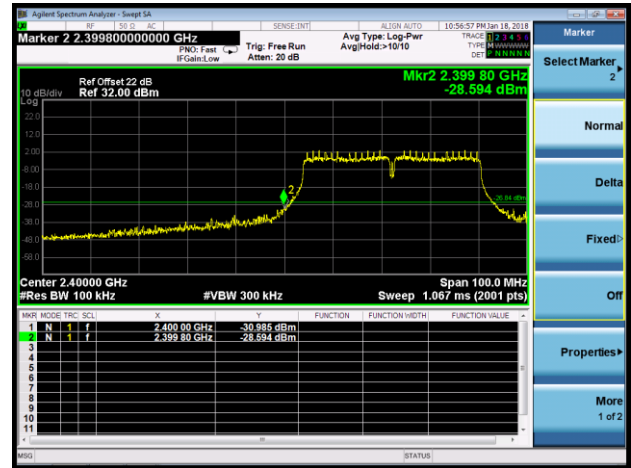
## 802.11n-HT40 Out-of-Band Emissions

## Channel 03 (2422MHz)

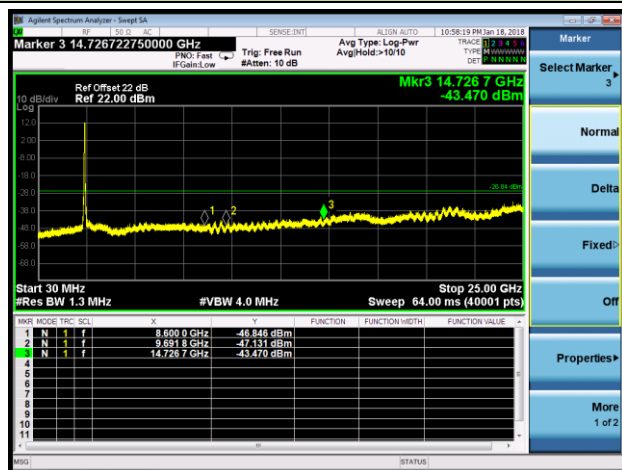
## 100kHz PSD Reference Level



## High Band Edge

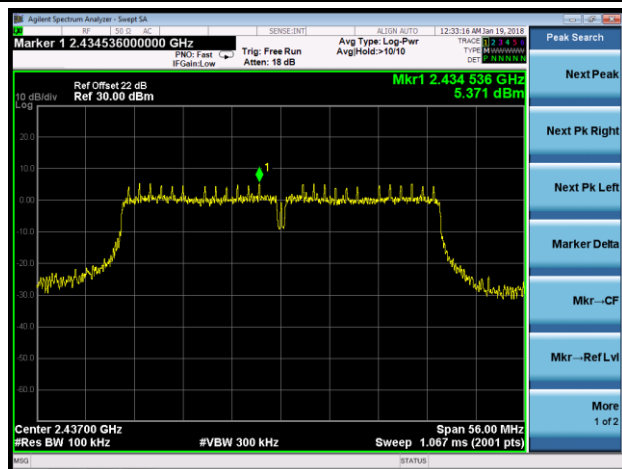


## Spurious Emission

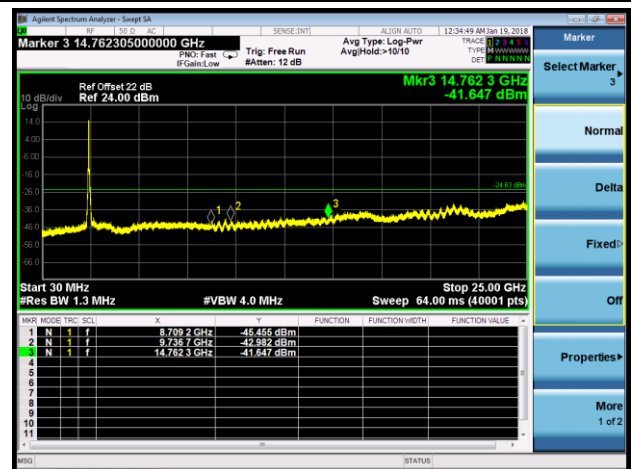


## Channel 06 (2437MHz)

## 100kHz PSD Reference Level



## Spurious Emission

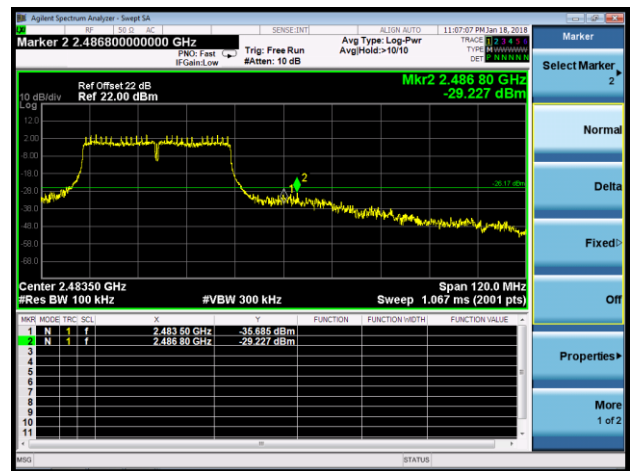


## Channel 09 (2452MHz)

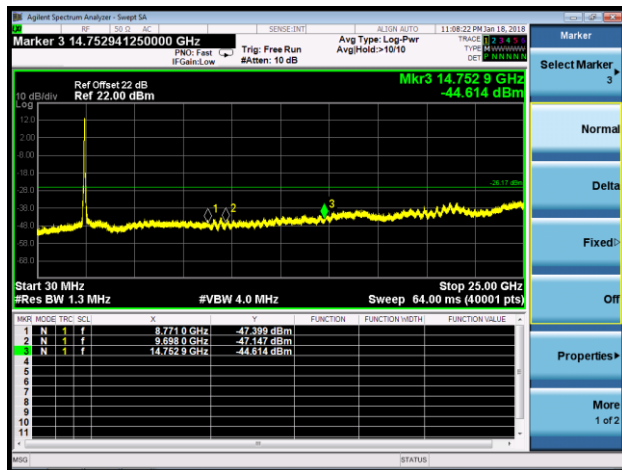
## 100kHz PSD Reference Level



## High Band Edge



## Spurious Emission



## 7.6. Radiated Spurious Emission Measurement

### 7.6.1. Test Limit

All out of band emissions appearing in a restricted band as specified in Section 15.205 of the Title 47 CFR must not exceed the limits shown in Table per Section 15.209.

All out of band emissions appearing in a restricted band as specified in Section 8.10 of the RSS-Gen Issue 4 must not exceed the limits shown in Table per Section 8.9.

FCC Part 15 Subpart C Paragraph 15.209 & RSS-Gen Issue4 Section 8.9		
Frequency [MHz]	Field Strength [uV/m]	Measured Distance [Meters]
0.009 ~ 0.490	2400/F (kHz)	300
0.490 ~ 1.705	24000/F (kHz)	30
1.705 ~ 30	30	30
30 ~ 88	100	3
88 ~ 216	150	3
216 ~ 960	200	3
Above 960	500	3

### 7.6.2. Test Procedure Used

ANSI C63.10 Section 6.3 (General Requirements)

ANSI C63.10 Section 6.4 (Standard test method below 30MHz)

ANSI C63.10 Section 6.5 (Standard test method above 30MHz to 1GHz)

ANSI C63.10 Section 6.6 (Standard test method above 1GHz)

### **7.6.3. Test Setting**

#### **Quasi-Peak & Average Measurements below 30MHz**

1. Analyzer center frequency was set to the frequency of the radiated spurious emission of interest
2. Span was set greater than 1MHz
3. RBW = 200Hz for 9kHz to 150kHz frequency; RBW = 9kHz for 0.15MHz to 30MHz frequency
4. Detector = CISPR quasi-peak or power average (Average)
5. Sweep time = auto couple
6. Trace was allowed to stabilize

#### **Quasi-Peak Measurements below 1GHz**

1. Analyzer center frequency was set to the frequency of the radiated spurious emission of interest
2. Span was set greater than 1MHz
3. RBW = 120 kHz
4. Detector = CISPR quasi-peak
5. Sweep time = auto couple
6. Trace was allowed to stabilize

#### **Peak Measurements above 1GHz**

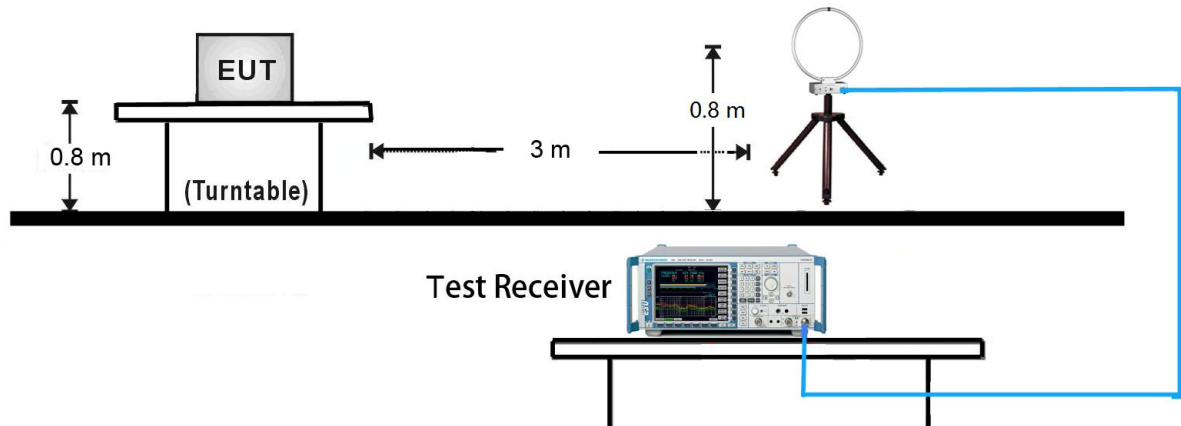
1. Analyzer center frequency was set to the frequency of the radiated spurious emission of interest
2. RBW = 1MHz
3. VBW = 3MHz
4. Detector = peak
5. Sweep time = auto couple
6. Trace mode = max hold
7. Trace was allowed to stabilize

#### **Average Measurements above 1GHz (Method AD)**

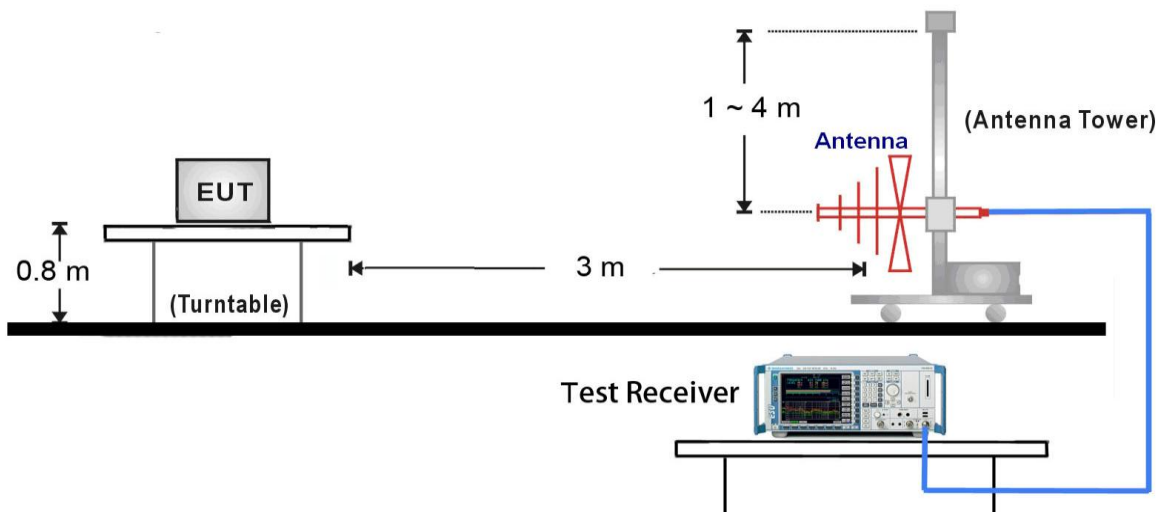
1. Analyzer center frequency was set to the frequency of the radiated spurious emission of interest
2. RBW = 1MHz
3. VBW = 3MHz
4. Detector = power average (Average)
5. Number of measurement points = 1001 (Number of points must be  $> 2 \times \text{span/RBW}$ )
6. Sweep time = auto
7. Trace was averaged over at 100 sweeps

#### 7.6.4. Test Setup

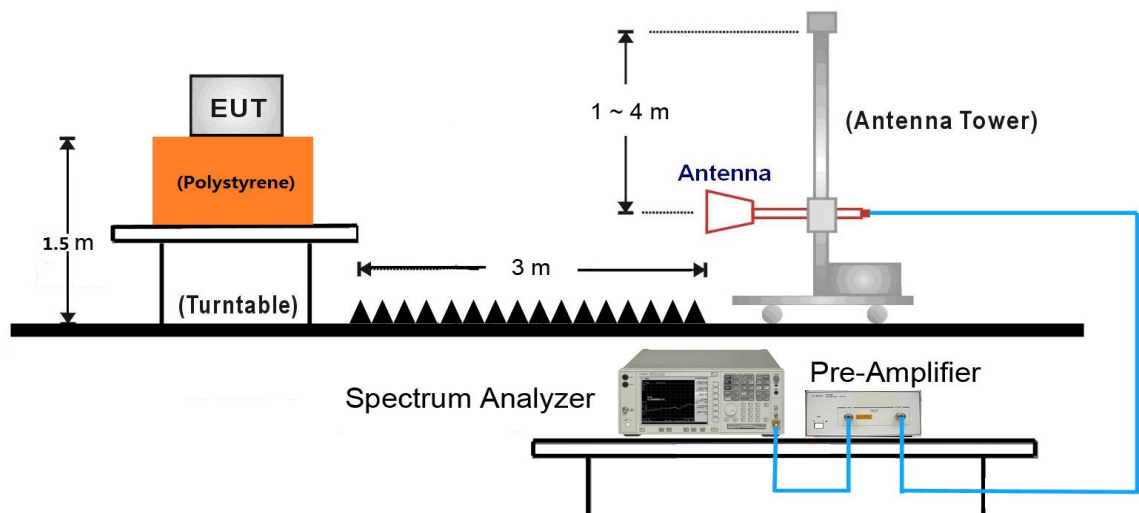
##### 9kHz ~ 30MHz Test Setup:



##### 30MHz ~ 1GHz Test Setup:



##### 1GHz ~ 40GHz Test Setup:



### 7.6.5. Test Result

Product	Speed Dome Camera (1080P WiFi PTZ)	Temperature	23°C
Test Engineer	Snake Ni	Relative Humidity	52%
Test Site	AC2	Test Date	2018/01/23
Test Mode:	802.11b	Test Channel:	01
Remark:	1. Average measurement was not performed if peak level lower than average limit. 2. Other frequency was 20dB below limit line within 1-18GHz, there is not show in the report.		

Mark	Frequency (MHz)	Reading Level (dBμV)	Factor (dB)	Measure Level (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector	Polarization
*	3082.5	53.6	0.3	53.9	74.0	-20.1	Peak	Horizontal
*	3235.5	53.3	0.5	53.8	74.0	-20.2	Peak	Horizontal
	4986.5	37.5	5.7	43.2	74.0	-30.8	Peak	Horizontal
	7273.0	36.9	14.0	50.9	74.0	-23.1	Peak	Horizontal
*	3108.0	53.4	0.3	53.7	74.0	-20.3	Peak	Vertical
*	3244.0	55.7	0.5	56.2	74.0	-17.8	Peak	Vertical
	4978.0	37.9	5.7	43.6	74.0	-30.4	Peak	Vertical
	7366.5	38.9	13.9	52.8	74.0	-21.2	Peak	Vertical

Note 1: “\*” is not in restricted band, its limit is 30dBc of the fundamental emission level (100.5dBμV/m) or 15.209 which is higher.

Note 2: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m) - Pre\_Amplifier Gain (dB)

Product	Speed Dome Camera (1080P WiFi PTZ)	Temperature	23°C
Test Engineer	Snake Ni	Relative Humidity	52%
Test Site	AC2	Test Date	2018/01/23
Test Mode:	802.11b	Test Channel:	06
Remark:	1. Average measurement was not performed if peak level lower than average limit. 2. Other frequency was 20dB below limit line within 1-18GHz, there is not show in the report.		

Mark	Frequency (MHz)	Reading Level (dBμV)	Factor (dB)	Measure Level (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector	Polarization
*	3116.5	52.7	0.4	53.1	74.0	-20.9	Peak	Horizontal
*	3278.0	55.5	0.4	55.9	74.0	-18.1	Peak	Horizontal
	4986.5	36.3	5.7	42.0	74.0	-32.0	Peak	Horizontal
	7528.0	35.5	14.5	50.0	74.0	-24.0	Peak	Horizontal
*	3057.0	53.3	0.2	53.5	74.0	-20.5	Peak	Vertical
*	3244.0	53.4	0.5	53.9	74.0	-20.1	Peak	Vertical
	4995.0	37.2	5.8	43.0	74.0	-31.0	Peak	Vertical
	7349.5	38.1	14.0	52.1	74.0	-21.9	Peak	Vertical

Note 1: "\*" is not in restricted band, its limit is 30dBc of the fundamental emission level (101.9dBμV/m) or 15.209 which is higher.

Note 2: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m) - Pre\_Amplifier Gain (dB)

Product	Speed Dome Camera (1080P WiFi PTZ)	Temperature	23°C
Test Engineer	Snake Ni	Relative Humidity	52%
Test Site	AC2	Test Date	2018/01/23
Test Mode:	802.11b	Test Channel:	11
Remark:	1. Average measurement was not performed if peak level lower than average limit. 2. Other frequency was 20dB below limit line within 1-18GHz, there is not show in the report.		

Mark	Frequency (MHz)	Reading Level (dBμV)	Factor (dB)	Measure Level (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector	Polarization
*	3099.5	52.8	0.3	53.1	74.0	-20.9	Peak	Horizontal
*	3269.5	55.6	0.5	56.1	74.0	-17.9	Peak	Horizontal
	5012.0	35.9	5.8	41.7	74.0	-32.3	Peak	Horizontal
	7409.0	35.7	13.9	49.6	74.0	-24.4	Peak	Horizontal
*	3099.5	54.5	0.3	54.8	74.0	-19.2	Peak	Vertical
*	3269.5	54.1	0.5	54.6	74.0	-19.4	Peak	Vertical
	4978.0	36.7	5.7	42.4	74.0	-31.6	Peak	Vertical
	7426.0	38.2	14.2	52.4	74.0	-21.6	Peak	Vertical

Note 1: "\*" is not in restricted band, its limit is 30dBc of the fundamental emission level (101.3dBμV/m) or 15.209 which is higher.

Note 2: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m) - Pre\_Amplifier Gain (dB)



Product	Speed Dome Camera (1080P WiFi PTZ)	Temperature	23°C
Test Engineer	Snake Ni	Relative Humidity	52%
Test Site	AC2	Test Date	2018/01/23
Test Mode:	802.11g	Test Channel:	01
Remark:	1. Average measurement was not performed if peak level lower than average limit. 2. Other frequency was 20dB below limit line within 1-18GHz, there is not show in the report.		

Mark	Frequency (MHz)	Reading Level (dBμV)	Factor (dB)	Measure Level (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector	Polarization
*	3099.5	53.4	0.3	53.7	74.0	-20.3	Peak	Horizontal
*	3258.3	53.5	0.4	53.9	74.0	-20.1	Peak	Horizontal
	4638.0	36.3	5.0	41.3	74.0	-32.7	Peak	Horizontal
	7375.0	36.2	13.9	50.1	74.0	-23.9	Peak	Horizontal
*	3099.5	53.5	0.3	53.8	74.0	-20.2	Peak	Vertical
*	3210.0	53.1	0.6	53.7	74.0	-20.3	Peak	Vertical
	4986.5	37.7	5.7	43.4	74.0	-30.6	Peak	Vertical
	7315.5	37.8	13.7	51.5	74.0	-22.5	Peak	Vertical

Note 1: "\*" is not in restricted band, its limit is 30dBc of the fundamental emission level (100.7dBμV/m) or 15.209 which is higher.

Note 2: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m) - Pre\_Amplifier Gain (dB)

Product	Speed Dome Camera (1080P WiFi PTZ)	Temperature	23°C
Test Engineer	Snake Ni	Relative Humidity	52%
Test Site	AC2	Test Date	2018/01/23
Test Mode:	802.11g	Test Channel:	06
Remark:	1. Average measurement was not performed if peak level lower than average limit. 2. Other frequency was 20dB below limit line within 1-18GHz, there is not show in the report.		

Mark	Frequency (MHz)	Reading Level (dBμV)	Factor (dB)	Measure Level (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector	Polarization
*	3108.0	52.9	0.3	53.2	74.0	-20.8	Peak	Horizontal
*	3255.0	53.3	0.4	53.7	74.0	-20.3	Peak	Horizontal
	4918.5	36.1	5.6	41.7	74.0	-32.3	Peak	Horizontal
	7434.5	35.4	14.3	49.7	74.0	-24.3	Peak	Horizontal
*	3116.5	53.1	0.4	53.5	74.0	-20.5	Peak	Vertical
*	3257.0	52.9	0.4	53.3	74.0	-20.7	Peak	Vertical
	4986.5	36.9	5.7	42.6	74.0	-31.4	Peak	Vertical
	7417.5	38.1	14.1	52.2	74.0	-21.8	Peak	Vertical

Note 1: "\*" is not in restricted band, its limit is 30dBc of the fundamental emission level (102.7dBμV/m) or 15.209 which is higher.

Note 2: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m) - Pre\_Amplifier Gain (dB)

Product	Speed Dome Camera (1080P WiFi PTZ)	Temperature	23°C
Test Engineer	Snake Ni	Relative Humidity	52%
Test Site	AC2	Test Date	2018/01/23
Test Mode:	802.11g	Test Channel:	11
Remark:	1. Average measurement was not performed if peak level lower than average limit. 2. Other frequency was 20dB below limit line within 1-18GHz, there is not show in the report.		

Mark	Frequency (MHz)	Reading Level (dBμV)	Factor (dB)	Measure Level (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector	Polarization
*	3099.5	53.5	0.3	53.8	74.0	-20.2	Peak	Horizontal
*	3258.0	52.3	0.4	52.7	74.0	-21.3	Peak	Horizontal
	4850.5	35.5	5.6	41.1	74.0	-32.9	Peak	Horizontal
	7392.0	35.4	13.8	49.2	74.0	-24.8	Peak	Horizontal
*	3074.0	53.2	0.3	53.5	74.0	-20.5	Peak	Vertical
*	3257.5	53.1	0.4	53.5	74.0	-20.5	Peak	Vertical
	4978.0	36.6	5.7	42.3	74.0	-31.7	Peak	Vertical
	7409.0	37.8	13.9	51.7	74.0	-22.3	Peak	Vertical

Note 1: "\*" is not in restricted band, its limit is 30dBc of the fundamental emission level (101.2dBμV/m) or 15.209 which is higher.

Note 2: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m) - Pre\_Amplifier Gain (dB)

Product	Speed Dome Camera (1080P WiFi PTZ)	Temperature	23°C
Test Engineer	Snake Ni	Relative Humidity	52%
Test Site	AC2	Test Date	2018/01/23
Test Mode:	802.11n-HT20	Test Channel:	01
Remark:	1. Average measurement was not performed if peak level lower than average limit. 2. Other frequency was 20dB below limit line within 1-18GHz, there is not show in the report.		

Mark	Frequency (MHz)	Reading Level (dBμV)	Factor (dB)	Measure Level (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector	Polarization
*	3099.5	53.6	0.3	53.9	74.0	-20.1	Peak	Horizontal
*	3257.0	53.5	0.4	53.9	74.0	-20.1	Peak	Horizontal
	4799.5	35.9	5.5	41.4	74.0	-32.6	Peak	Horizontal
	7366.5	36.4	13.9	50.3	74.0	-23.7	Peak	Horizontal
*	3116.5	53.1	0.4	53.5	74.0	-20.5	Peak	Vertical
*	3256.0	53.4	0.4	53.8	74.0	-20.2	Peak	Vertical
	4867.5	36.8	5.6	42.4	74.0	-31.6	Peak	Vertical
	7426.0	38.1	14.2	52.3	74.0	-21.7	Peak	Vertical

Note 1: "\*" is not in restricted band, its limit is 30dBc of the fundamental emission level (99.1dBμV/m) or 15.209 which is higher.

Note 2: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m) - Pre\_Amplifier Gain (dB)

Product	Speed Dome Camera (1080P WiFi PTZ)	Temperature	23°C
Test Engineer	Snake Ni	Relative Humidity	52%
Test Site	AC2	Test Date	2018/01/23
Test Mode:	802.11n-HT20	Test Channel:	06
Remark:	1. Average measurement was not performed if peak level lower than average limit. 2. Other frequency was 20dB below limit line within 1-18GHz, there is not show in the report.		

Mark	Frequency (MHz)	Reading Level (dBμV)	Factor (dB)	Measure Level (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector	Polarization
*	3125.0	53.2	0.4	53.6	74.0	-20.4	Peak	Horizontal
*	3255.0	52.9	0.4	53.3	74.0	-20.7	Peak	Horizontal
	4986.5	37.6	5.7	43.3	74.0	-30.7	Peak	Horizontal
	7358.0	35.4	14.0	49.4	74.0	-24.6	Peak	Horizontal
*	3091.0	53.0	0.3	53.3	74.0	-20.7	Peak	Vertical
*	3244.0	53.4	0.5	53.9	74.0	-20.1	Peak	Vertical
	5063.0	36.1	6.0	42.1	74.0	-31.9	Peak	Vertical
	7485.5	37.5	14.0	51.5	74.0	-22.5	Peak	Vertical

Note 1: "\*" is not in restricted band, its limit is 30dBc of the fundamental emission level (100.8dBμV/m) or 15.209 which is higher.

Note 2: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m) - Pre\_Amplifier Gain (dB)

Product	Speed Dome Camera (1080P WiFi PTZ)	Temperature	23°C
Test Engineer	Snake Ni	Relative Humidity	52%
Test Site	AC2	Test Date	2018/01/23
Test Mode:	802.11n-HT20	Test Channel:	11
Remark:	1. Average measurement was not performed if peak level lower than average limit. 2. Other frequency was 20dB below limit line within 1-18GHz, there is not show in the report.		

Mark	Frequency (MHz)	Reading Level (dBμV)	Factor (dB)	Measure Level (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector	Polarization
*	3099.5	53.4	0.3	53.7	74.0	-20.3	Peak	Horizontal
*	3254.0	53.4	0.4	54.8	74.0	-20.2	Peak	Horizontal
	4961.0	35.7	5.7	41.4	74.0	-32.6	Peak	Horizontal
	7392.0	35.8	13.8	49.6	74.0	-24.4	Peak	Horizontal
*	3099.5	53.0	0.3	53.3	74.0	-20.7	Peak	Vertical
*	3254.0	53.3	0.4	53.7	74.0	-20.3	Peak	Vertical
	4986.5	37.5	5.7	43.2	74.0	-30.8	Peak	Vertical
	7375.0	37.8	13.9	51.7	74.0	-22.3	Peak	Vertical

Note 1: "\*" is not in restricted band, its limit is 30dBc of the fundamental emission level (99.7dBμV/m) or 15.209 which is higher.

Note 2: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m) - Pre\_Amplifier Gain (dB)

Product	Speed Dome Camera (1080P WiFi PTZ)	Temperature	23°C
Test Engineer	Snake Ni	Relative Humidity	52%
Test Site	AC2	Test Date	2018/01/23
Test Mode:	802.11n-HT40	Test Channel:	03
Remark:	1. Average measurement was not performed if peak level lower than average limit. 2. Other frequency was 20dB below limit line within 1-18GHz, there is not show in the report.		

Mark	Frequency (MHz)	Reading Level (dBμV)	Factor (dB)	Measure Level (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector	Polarization
*	3099.5	53.1	0.3	53.4	74.0	-20.6	Peak	Horizontal
*	3255.0	52.5	0.4	52.9	74.0	-21.1	Peak	Horizontal
	5080.0	37.0	6.2	43.2	74.0	-30.8	Peak	Horizontal
	7349.5	35.3	14.0	49.3	74.0	-24.7	Peak	Horizontal
*	3091.0	52.7	0.3	53.0	74.0	-21.0	Peak	Vertical
*	3255.0	52.0	0.4	52.4	74.0	-21.6	Peak	Vertical
	4986.5	36.2	5.7	41.9	74.0	-32.1	Peak	Vertical
	7477.0	36.9	14.0	50.9	74.0	-23.1	Peak	Vertical

Note 1: "\*" is not in restricted band, its limit is 30dBc of the fundamental emission level (96.1dBμV/m) or 15.209 which is higher.

Note 2: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m) - Pre\_Amplifier Gain (dB)

Product	Speed Dome Camera (1080P WiFi PTZ)	Temperature	23°C
Test Engineer	Snake Ni	Relative Humidity	52%
Test Site	AC2	Test Date	2018/01/23
Test Mode:	802.11n-HT40	Test Channel:	06
Remark:	1. Average measurement was not performed if peak level lower than average limit. 2. Other frequency was 20dB below limit line within 1-18GHz, there is not show in the report.		

Mark	Frequency (MHz)	Reading Level (dBμV)	Factor (dB)	Measure Level (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector	Polarization
*	3091.0	54.9	0.3	55.2	74.0	-18.8	Peak	Horizontal
*	3234.7	42.7	0.5	43.2	54.0	-10.8	Average	Horizontal
	4978.0	36.4	5.7	42.1	74.0	-31.9	Peak	Horizontal
	7358.0	35.5	14.0	49.5	74.0	-24.5	Peak	Horizontal
*	3099.5	53.1	0.3	53.4	74.0	-20.6	Peak	Vertical
*	3269.5	53.3	0.5	53.8	74.0	-20.2	Peak	Vertical
	4876.0	35.7	5.6	41.3	74.0	-32.7	Peak	Vertical
	7324.0	38.2	13.8	52.0	74.0	-22.0	Peak	Vertical

Note 1: "\*" is not in restricted band, its limit is 30dBc of the fundamental emission level (98.4dBμV/m) or 15.209 which is higher.

Note 2: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m) - Pre\_Amplifier Gain (dB)



Product	Speed Dome Camera (1080P WiFi PTZ)	Temperature	23°C
Test Engineer	Snake Ni	Relative Humidity	52%
Test Site	AC2	Test Date	2018/01/23
Test Mode:	802.11n-HT40	Test Channel:	09
Remark:	1. Average measurement was not performed if peak level lower than average limit. 2. Other frequency was 20dB below limit line within 1-18GHz, there is not show in the report.		

Mark	Frequency (MHz)	Reading Level (dBμV)	Factor (dB)	Measure Level (dBμV/m)	Limit (dBμV/m)	Margin (dB)	Detector	Polarization
*	3108.0	53.0	0.3	53.3	74.0	-20.7	Peak	Horizontal
*	3278.0	53.1	0.4	53.5	74.0	-20.5	Peak	Horizontal
	4901.5	35.5	5.6	41.1	74.0	-32.9	Peak	Horizontal
	7324.0	34.8	13.8	48.6	74.0	-25.4	Peak	Horizontal
*	3091.0	53.0	0.3	53.3	74.0	-20.7	Peak	Vertical
*	3269.5	53.4	0.5	53.9	74.0	-20.1	Peak	Vertical
	4978.0	36.7	5.7	42.4	74.0	-31.6	Peak	Vertical
	7341.0	37.4	13.9	51.3	74.0	-22.7	Peak	Vertical

Note 1: "\*" is not in restricted band, its limit is 30dBc of the fundamental emission level (96.6dBμV/m) or 15.209 which is higher.

Note 2: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m) - Pre\_Amplifier Gain (dB)

### The Worst Case of Radiated Emission below 1GHz:

Site: AC2	Time: 2018/01/23 - 20:24
Limit: FCC_Part15.109_RE(3m)_Class B	Engineer: Alex Ma
Probe: VULB 9168_20-2000MHz	Polarity: Horizontal
EUT: Speed Dome Camera (1080P WiFi PTZ)	Power: AC 120V/60Hz
<b>Worse Case Mode:</b> Transmit by 802.11b at Channel 2437MHz	



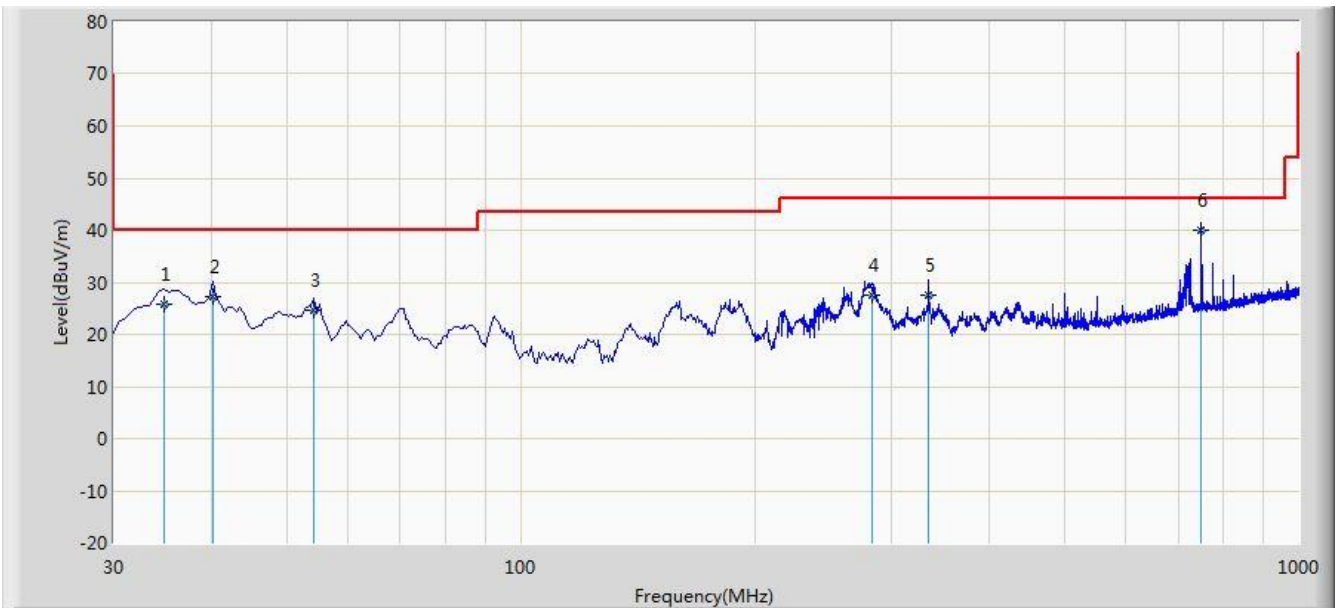
No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1			92.565	22.810	10.768	-20.690	43.500	12.042	QP
2			215.270	30.108	17.321	-13.392	43.500	12.787	QP
3			243.885	34.840	21.053	-11.160	46.000	13.787	QP
4			259.890	33.788	19.634	-12.212	46.000	14.154	QP
5			334.095	32.636	16.834	-13.364	46.000	15.802	QP
6		*	750.225	38.860	16.216	-7.140	46.000	22.643	QP

Note 1: Measure Level (dBuV/m) = Reading Level (dBuV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Note 2: The test trace is same as the ambient noise and the amplitude of the emissions are attenuated more than 20dB below the permissible (the test frequency range: 9kHz ~ 30MHz, 18GHz ~ 25GHz), therefore no data appear in the report.

Site: AC2	Time: 2018/01/23 - 20:26
Limit: FCC_Part15.109_RE(3m)_Class B	Engineer: Alex Ma
Probe: VULB 9168_20-2000MHz	Polarity: Vertical
EUT: Speed Dome Camera (1080P WiFi PTZ)	Power: AC 120V/60Hz
<b>Worse Case Mode:</b> Transmit by 802.11b at Channel 2437MHz	



No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1			34.850	25.739	12.726	-14.261	40.000	13.013	QP
2			40.185	27.224	13.218	-12.776	40.000	14.006	QP
3			54.250	24.558	9.625	-15.442	40.000	14.933	QP
4			282.685	27.453	12.937	-18.547	46.000	14.516	QP
5			334.095	27.666	11.864	-18.334	46.000	15.802	QP
6		*	749.740	39.918	17.281	-6.082	46.000	22.637	QP

Note 1: Measure Level (dBuV/m) = Reading Level (dBuV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Note 2: The test trace is same as the ambient noise and the amplitude of the emissions are attenuated more than 20dB below the permissible (the test frequency range: 9kHz ~ 30MHz, 18GHz ~ 25GHz), therefore no data appear in the report.

## 7.7. Radiated Restricted Band Edge Measurement

### 7.7.1. Test Limit

#### For 15.205 requirement:

Radiated emissions which fall in the restricted bands, as defined in Section 15.205(a) of FCC part 15, must also comply with the radiated emission limits specified in Section 15.209(a).

Frequency (MHz)	Frequency (MHz)	Frequency (MHz)	Frequency (GHz)
0.090 - 0.110	16.42 - 16.423	399.9 - 410	4.5 - 5.15
<sup>1</sup> 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	8.25 - 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 - 156.525	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	( <sup>2</sup> )
13.36 - 13.41	--	--	--

All out of band emissions appearing in a restricted band as specified in Section 15.205 of the Title 47CFR must not exceed the limits shown in Table per Section 15.209.

FCC Part 15 Subpart C Paragraph 15.209		
Frequency [MHz]	Field Strength [uV/m]	Measured Distance [Meters]
0.009 ~ 0.490	2400/F (kHz)	300
0.490 ~ 1.705	24000/F (kHz)	30
1.705 ~ 30	30	30
30 ~ 88	100	3
88 ~ 216	150	3
216 ~ 960	200	3
Above 960	500	3

### **For RSS-Gen Section 8.10 requirement:**

Radiated emissions which fall in the restricted bands, as defined in Section 8.10 of RSS-Gen, must also comply with the radiated emission limits specified in Section 8.9.

Frequency (MHz)	Frequency (MHz)	Frequency (MHz)
0.009 - 0.110	240 - 285	9.0 - 9.2
2.1735 - 2.1905	322 - 335.4	9.3 - 9.5
3.020 - 3.026	399.9 - 410	10.6 - 12.7
4.125 - 4.128	608 - 614	13.25 - 13.4
4.17725 - 4.17775	960 - 1427	14.47 - 14.5
4.20725 - 4.20775	1435 - 1626.5	15.35 - 16.2
5.677 - 5.683	1645.5 - 1646.5	17.7 - 21.4
6.215 - 6.218	1660 - 1710	22.01 - 23.12
6.26775 - 6.26825	1718.8 -1722.2	23.6 - 24.0
6.31175 - 6.31225	2200 - 2300	31.2 - 31.8
8.291 - 8.294	2310 -2390	36.43 - 36.5
8.362 - 8.366	2655 - 2900	Above 38.6
8.37625 - 8.38675	3260 - 3267	--
8.41425 - 8.41475	3332 -3339	
12.29 - 12.293	334.5 - 3358	
12.51975 - 12.52025	3500 - 4400	
12.57675 - 12.57725	4500 - 5150	
13.36 -13.41	5350 - 5460	
16.42 - 16.423	7250 - 7750	
16.69475 - 16.69525	8025 - 8500	
16.80425 - 16.80475	--	
25.5 - 25.67		
37.5 - 38.25		
73 - 74.6		
74.8 - 75.2		
108 - 138		
156.52475 - 156.525225		
156.7 - 156.9		

Note: \*Certain frequency bands listed in Table 6 and in bands above 38.6 GHz are designated for licence-exempt applications. These frequency bands and the requirements that apply to the devices

are set out in the 200- and 300-series of RSSs, such as RSS-210 and RSS-310, which contain the requirements that apply to licence-exempt radio apparatus.

All out of band emissions appearing in a restricted band as specified in Section 8.10 of the RSS-Gen must not exceed the limits shown in Table per Section 8.9.

RSS-Gen Section 8.9		
Frequency [MHz]	Field Strength [uV/m]	Measured Distance [Meters]
0.009 ~ 0.490	2400/F (kHz)	300
0.490 ~ 1.705	24000/F (kHz)	30
1.705 ~ 30	30	30
30 ~ 88	100	3
88 ~ 216	150	3
216 ~ 960	200	3
Above 960	500	3

### 7.7.2.Test Procedure Used

ANSI C63.10 Section 6.3 (General Requirements)

ANSI C63.10 Section 6.6 (Standard test method above 1GHz)

### 7.7.3.Test Setting

#### Peak Field Strength Measurements

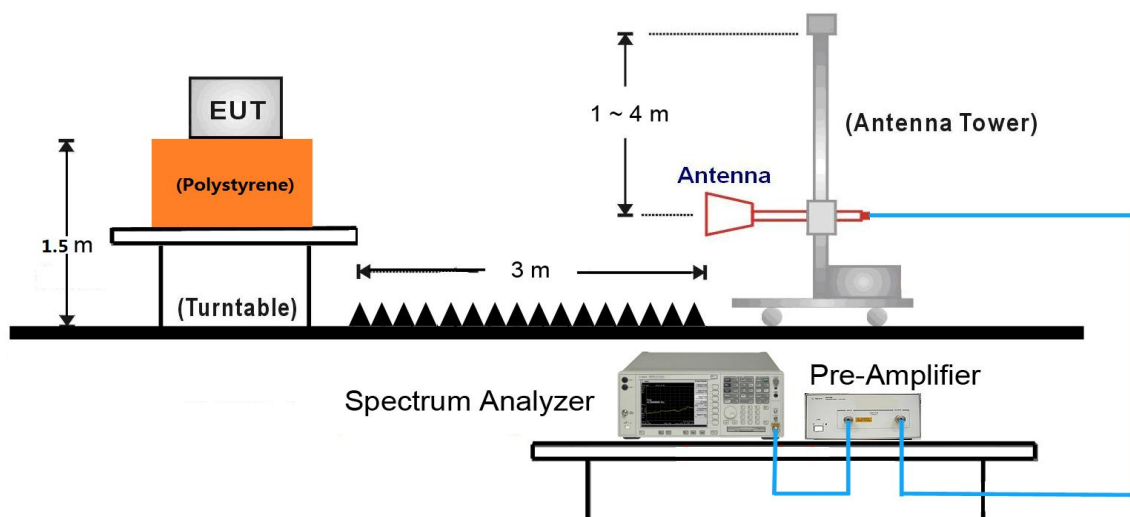
1. Analyzer center frequency was set to the frequency of the radiated spurious emission of interest
2. RBW = as specified in Table 1
3. VBW = 3MHz
4. Detector = peak
5. Sweep time = auto couple
6. Trace mode = max hold
7. Trace was allowed to stabilize

### Average Field Strength Measurements

1. Analyzer center frequency was set to the frequency of the radiated spurious emission of interest
2. RBW = 1MHz
3. VBW  $\geq 1/T$
4. De As an alternative, the instrument may be set to linear detector mode. Ensure that video filtering is applied in linear voltage domain (rather than in a log or dB domain). Some instruments require linear display mode in order to accomplish this. Others have a setting for Average-VBW Type, which can be set to "Voltage" regardless of the display mode
5. Detector = Peak
6. Sweep time = auto
7. Trace mode = max hold
8. Allow max hold to run for at least 50 times (1/duty cycle) traces

### **7.7.4.Test Setup**

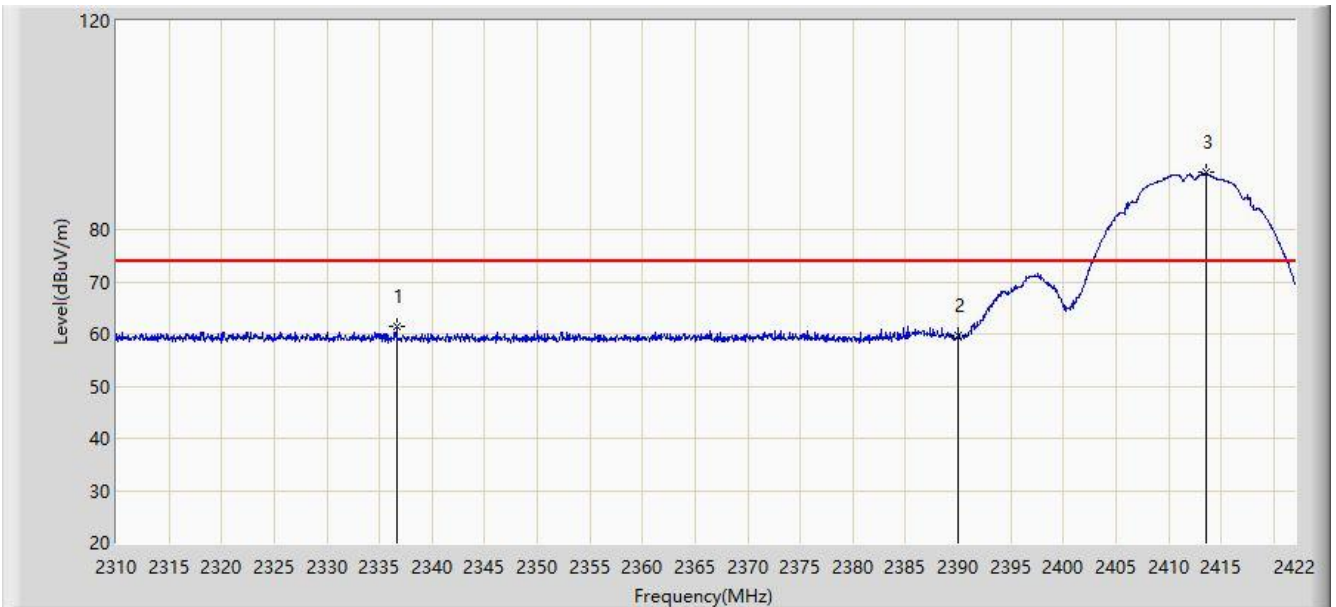
#### 1GHz ~ 18GHz Test Setup:





### 7.7.5.Test Result

Site: AC2	Time: 2018/01/13 - 00:13
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Speed Dome Camera (1080P WiFi PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at Channel 2412MHz	

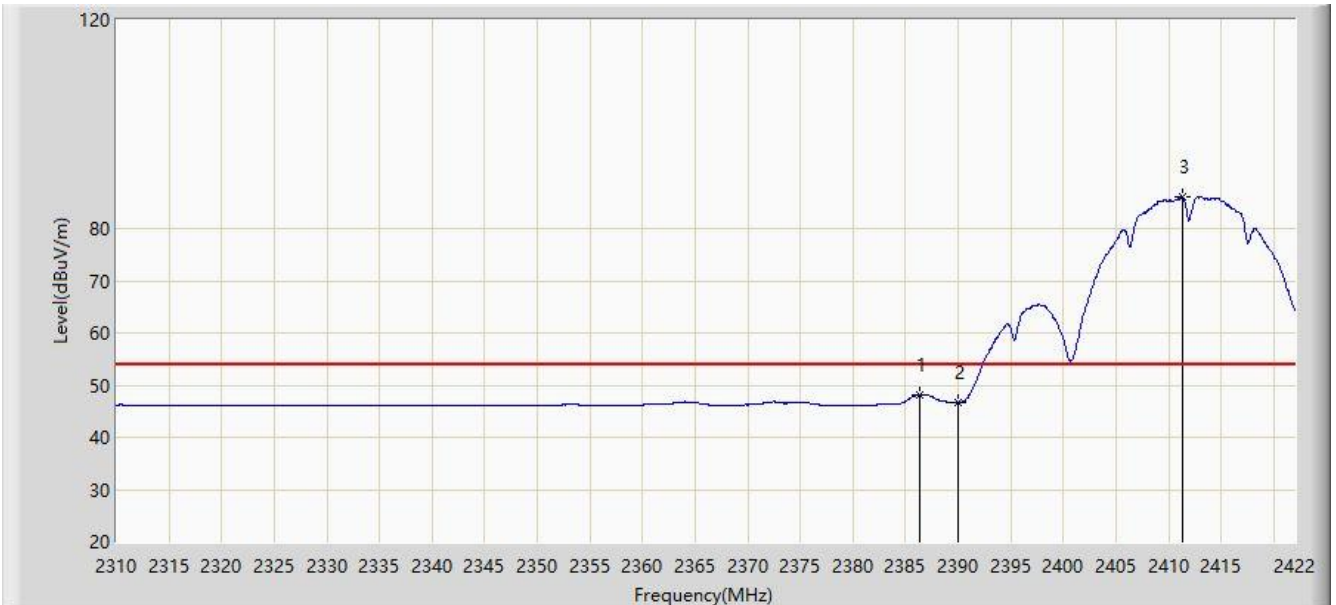


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2336.600	61.466	28.767	-12.534	74.000	32.699	PK
2			2390.000	59.849	27.274	-14.151	74.000	32.575	PK
3		*	2413.600	90.980	58.434	N/A	N/A	N/A	PK

Note: Measure Level (dBuV/m) = Reading Level (dBuV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 00:16
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at Channel 2412MHz	

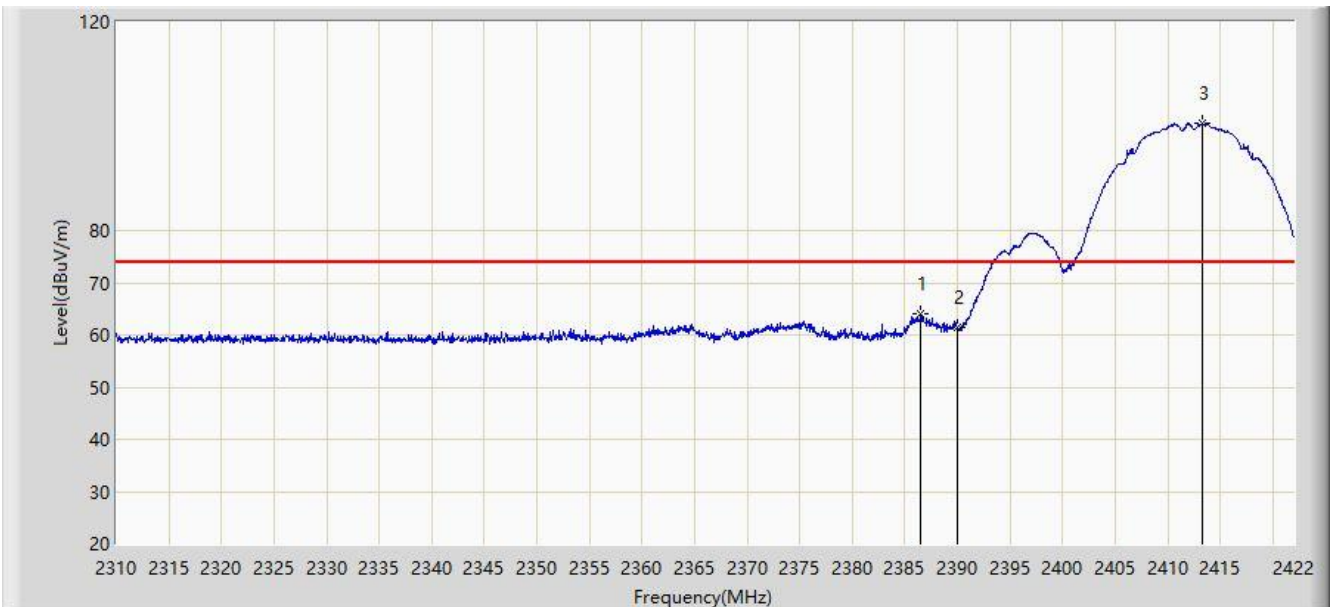


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2386.384	48.146	15.565	-5.854	54.000	32.581	AV
2			2390.000	46.636	14.061	-7.364	54.000	32.575	AV
3		*	2411.304	86.088	53.539	N/A	N/A	N/A	AV

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 00:24
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at Channel 2412MHz	

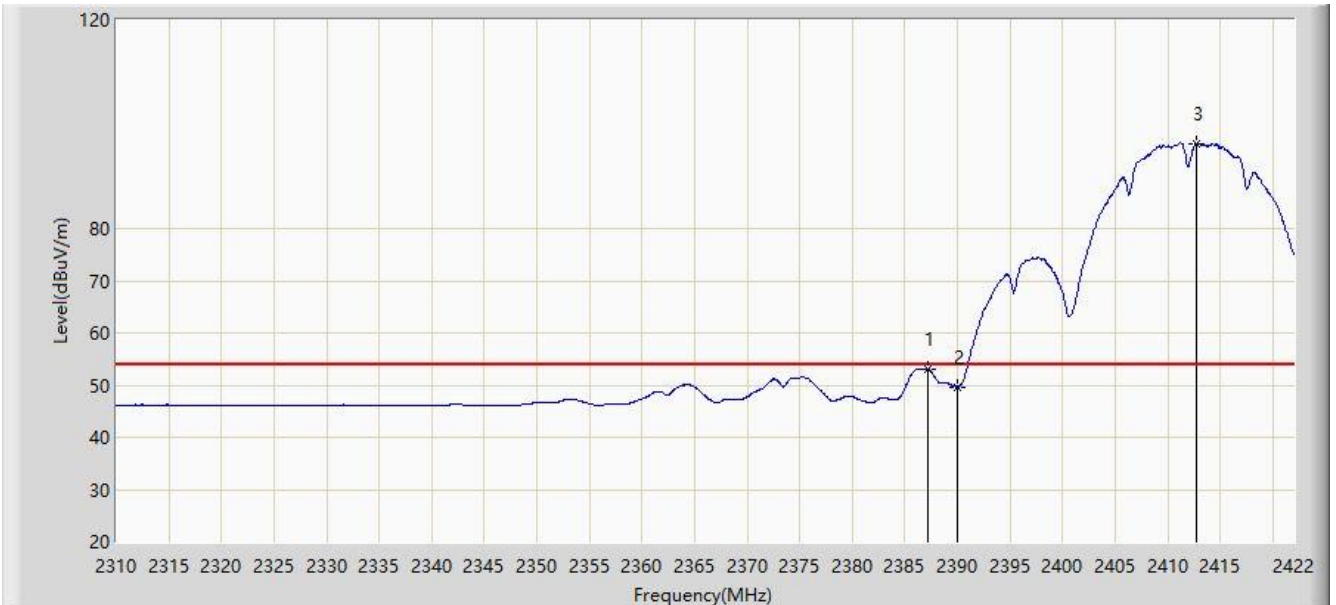


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2386.496	64.070	31.489	-9.930	74.000	32.581	PK
2			2390.000	61.350	28.775	-12.650	74.000	32.575	PK
3		*	2413.264	100.507	67.961	N/A	N/A	N/A	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 00:26
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at Channel 2412MHz	

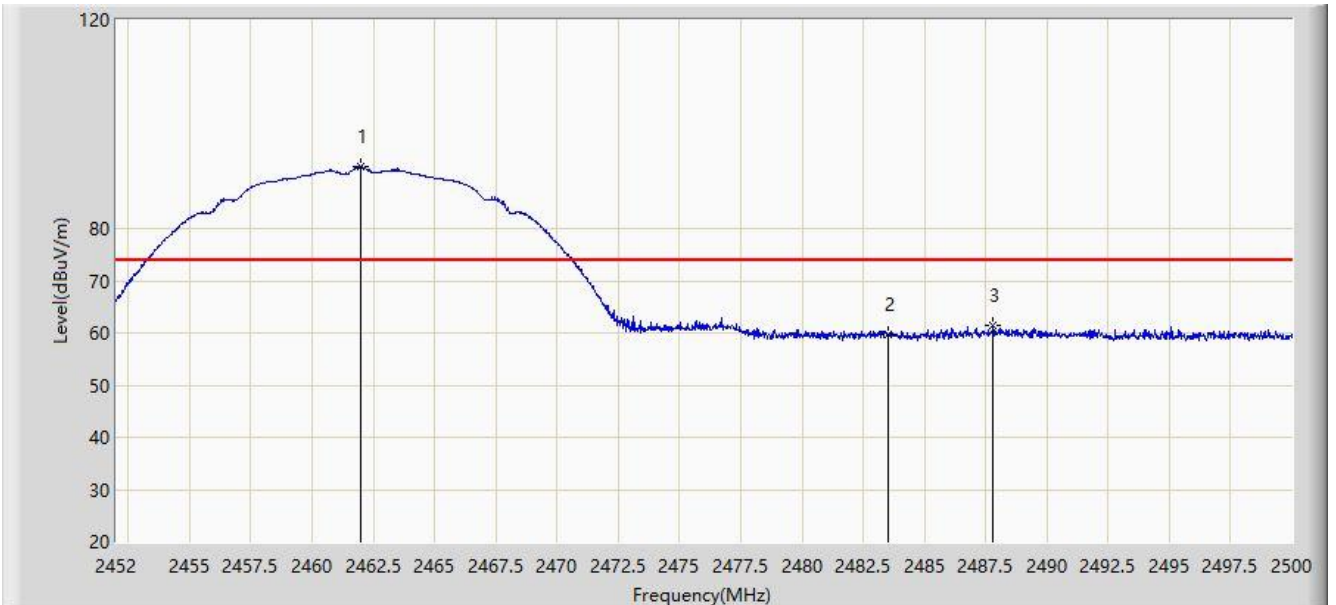


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2387.168	53.146	20.566	-0.854	54.000	32.579	AV
2			2390.000	49.700	17.125	-4.300	54.000	32.575	AV
3		*	2412.704	96.335	63.788	N/A	N/A	N/A	AV

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 00:43
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at Channel 2462MHz	

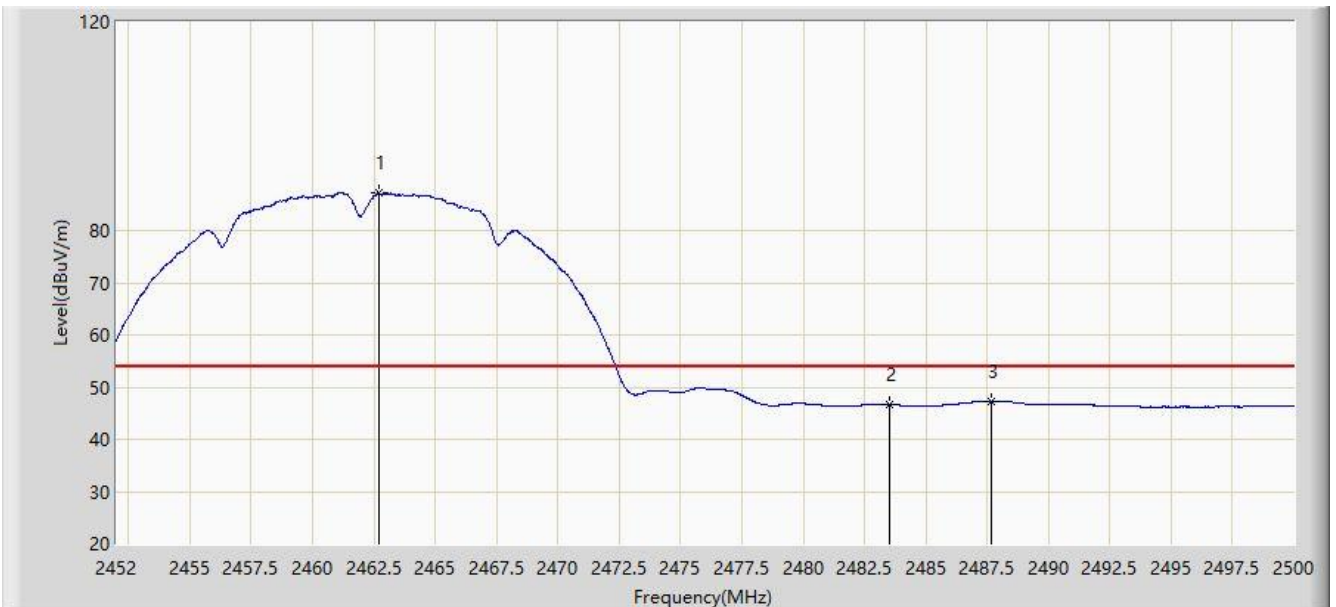


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2461.984	91.919	59.379	17.919	74.000	32.540	PK
2			2483.500	59.612	27.016	-14.388	74.000	32.596	PK
3			2487.808	61.476	28.869	N/A	N/A	N/A	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 00:46
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at Channel 2462MHz	



No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2462.704	87.269	54.727	N/A	N/A	N/A	AV
2			2483.500	46.666	14.070	-7.334	54.000	32.596	AV
3			2487.664	47.327	14.721	-6.673	54.000	32.606	AV

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 00:40
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at Channel 2462MHz	



No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2462.056	101.246	68.706	N/A	N/A	N/A	PK
2			2483.500	62.177	29.581	-11.823	74.000	32.596	PK
3			2487.472	63.581	30.975	-10.419	74.000	32.606	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 00:43
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at Channel 2462MHz	



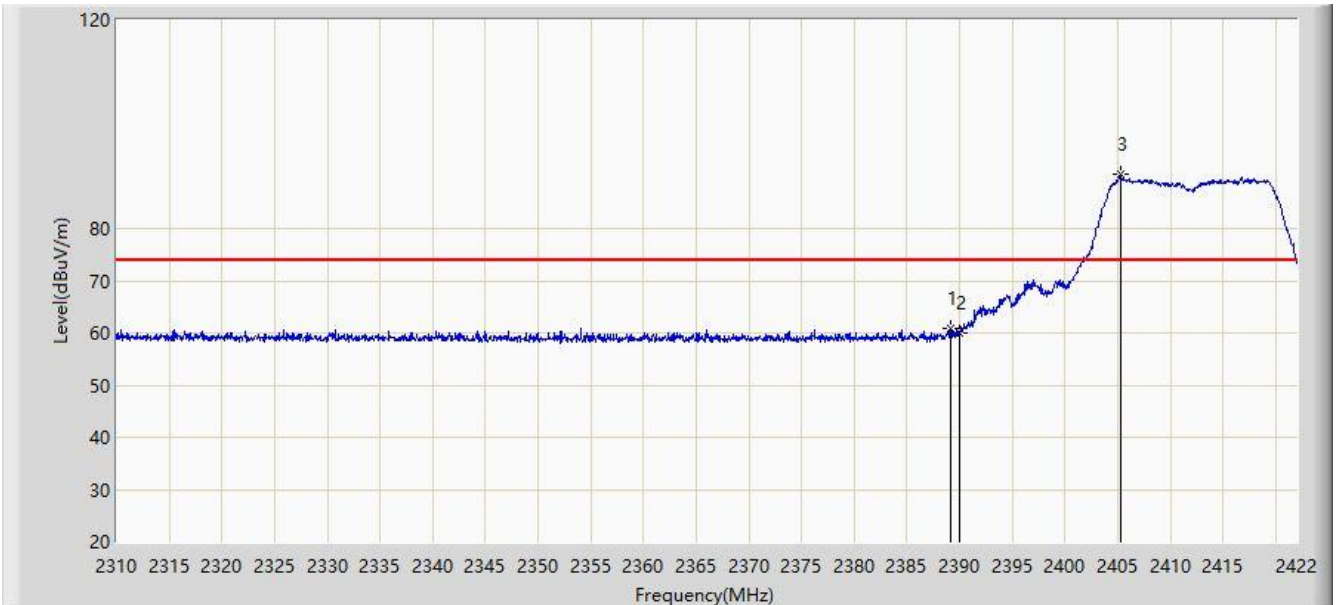
No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2461.168	95.997	63.459	N/A	N/A	N/A	AV
2			2483.500	50.324	17.728	-3.676	54.000	32.596	AV
3			2487.760	53.188	20.581	-0.812	54.000	32.606	AV

Note: Measure Level (dBuV/m) = Reading Level (dBuV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)



Site: AC2	Time: 2018/01/13 - 00:58
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at Channel 2412MHz	

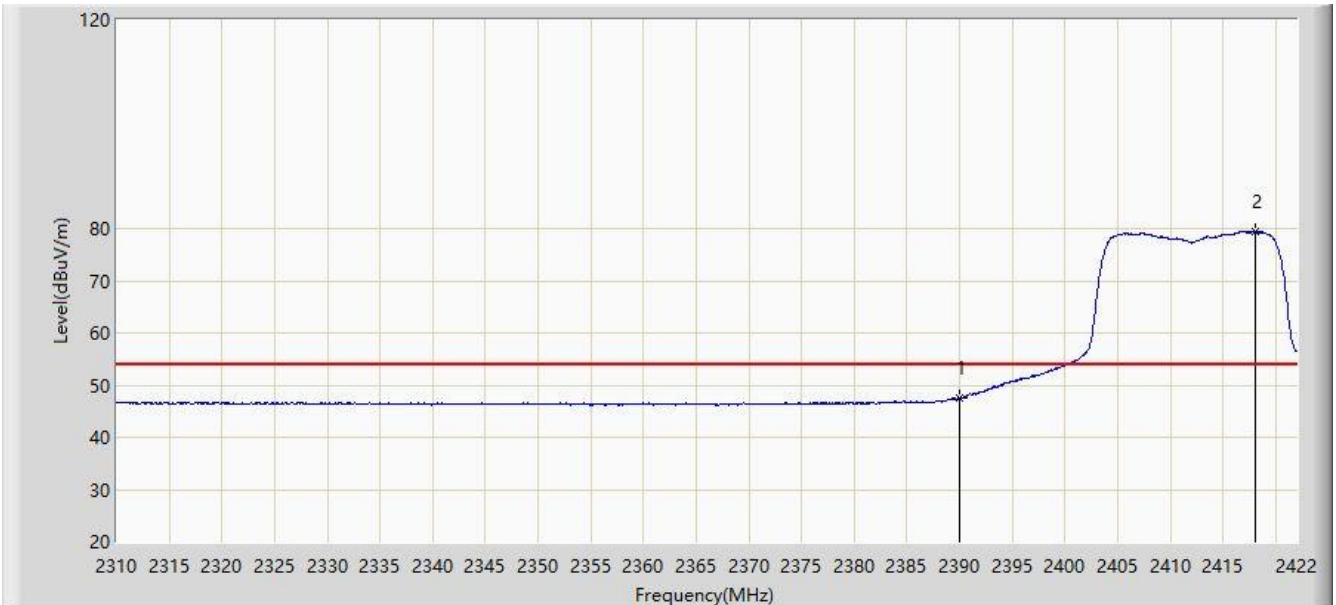


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2389.128	60.804	28.228	-13.196	74.000	32.576	PK
2			2390.000	60.034	27.459	-13.966	74.000	32.575	PK
3		*	2405.368	90.367	57.812	N/A	N/A	N/A	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:00
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at Channel 2412MHz	

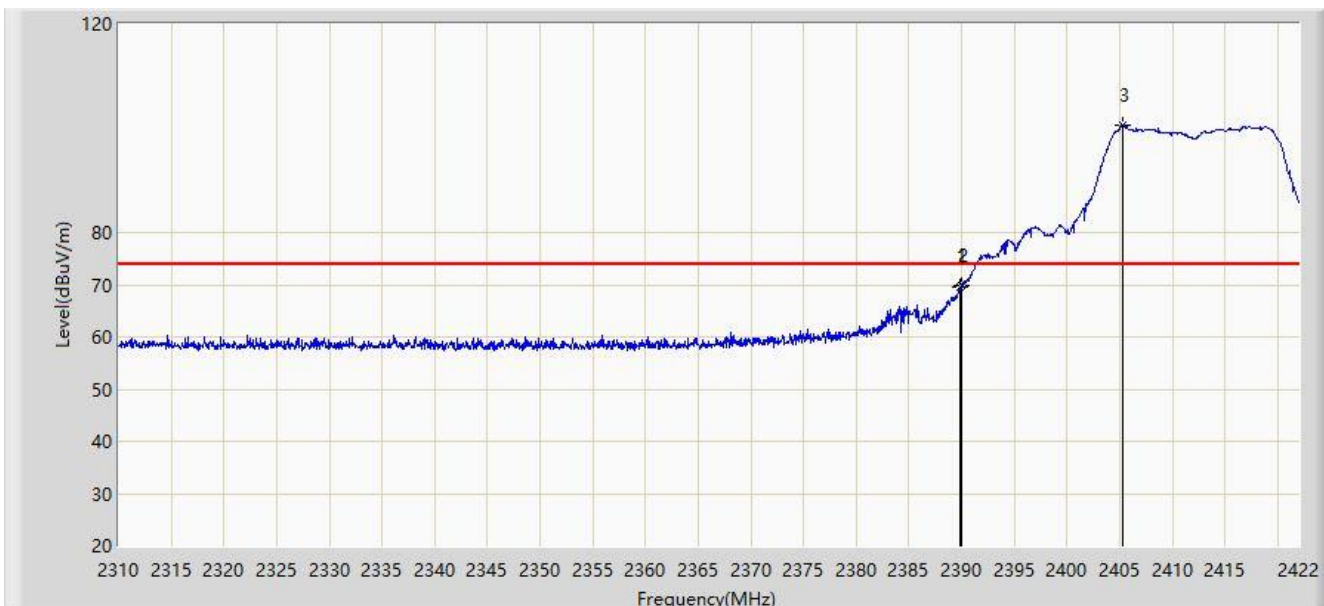


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2390.000	47.519	14.944	-6.481	54.000	32.575	AV
2		*	2418.024	79.489	46.949	N/A	N/A	32.540	AV

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 00:57
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at Channel 2412MHz	

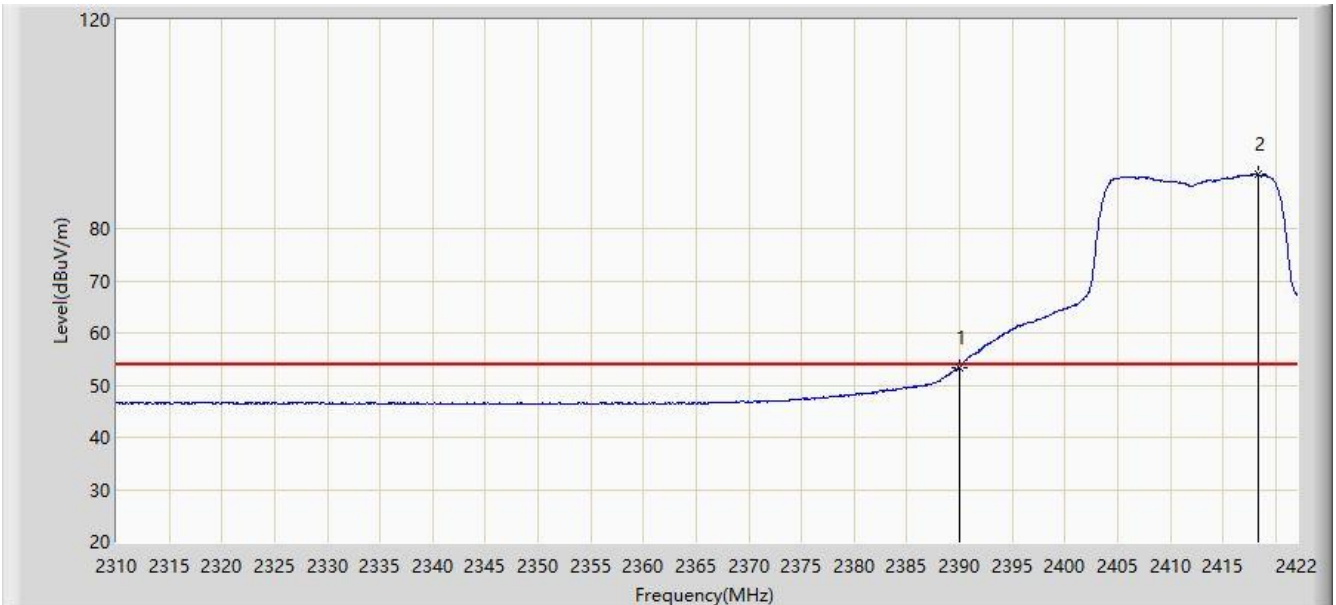


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2389.912	69.480	36.905	-4.520	74.000	32.575	PK
2			2390.000	69.787	37.212	-4.213	74.000	32.575	PK
3		*	2405.368	100.698	68.143	N/A	N/A	N/A	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 00:56
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at Channel 2412MHz	

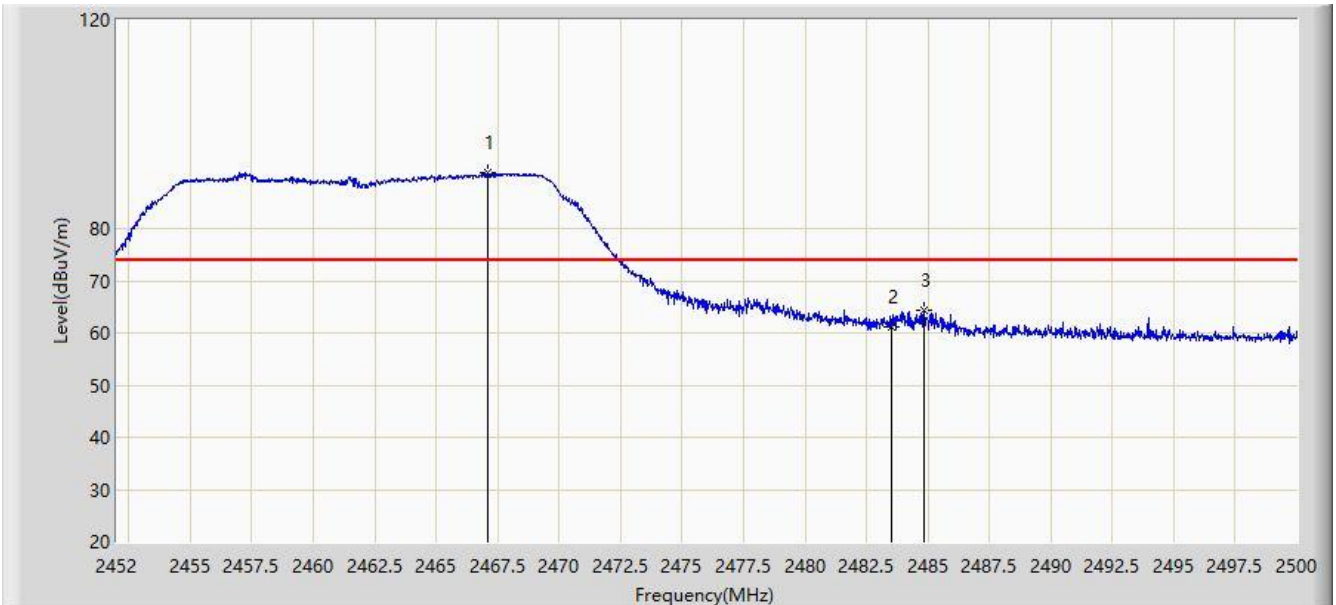


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2390.000	53.439	20.864	-0.561	54.000	32.575	AV
2		*	2418.304	90.394	57.855	N/A	N/A	N/A	AV

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:07
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at Channel 2462MHz	

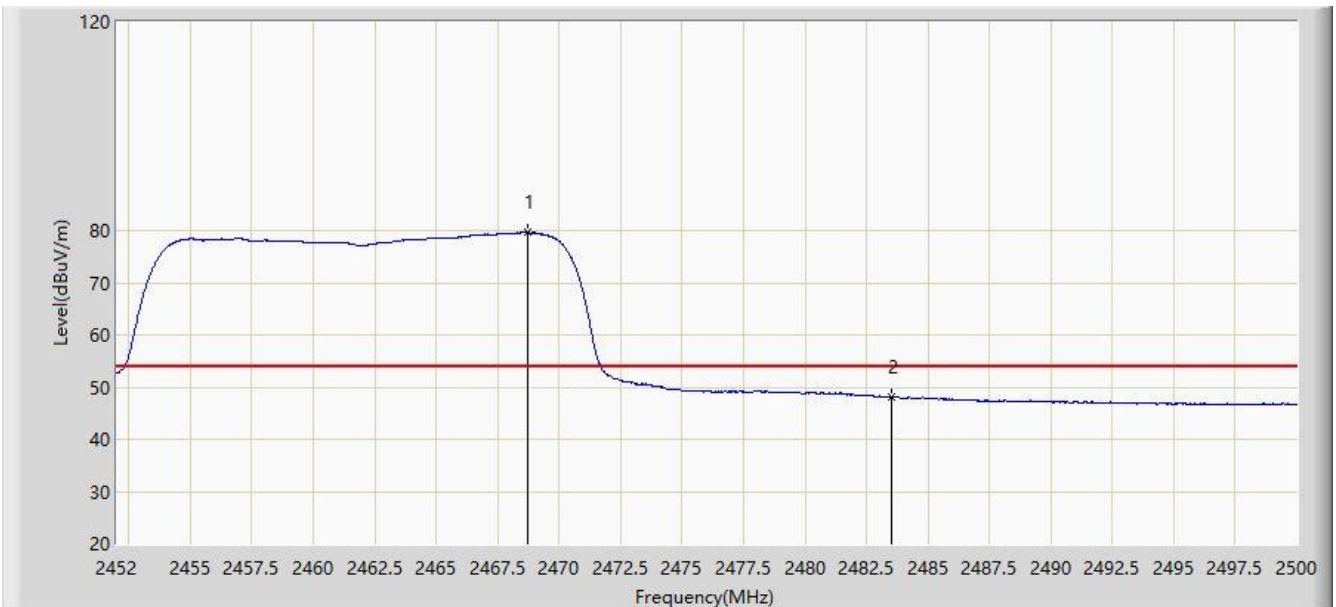


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2467.072	90.744	58.192	N/A	N/A	N/A	PK
2			2483.500	61.075	28.479	-12.925	74.000	32.596	PK
3			2484.856	64.480	31.881	-9.520	74.000	32.599	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:08
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at Channel 2462MHz	

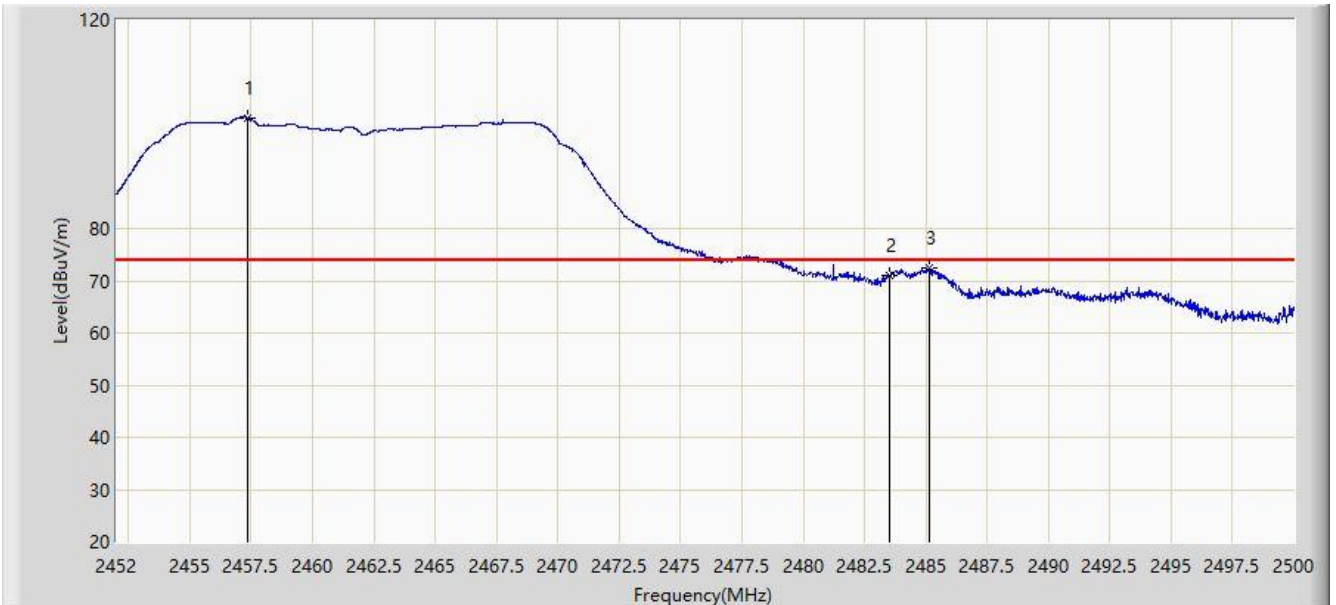


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2468.704	79.684	47.127	N/A	N/A	N/A	AV
2			2483.500	48.114	15.518	-5.886	54.000	32.596	AV

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:06
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at Channel 2462MHz	

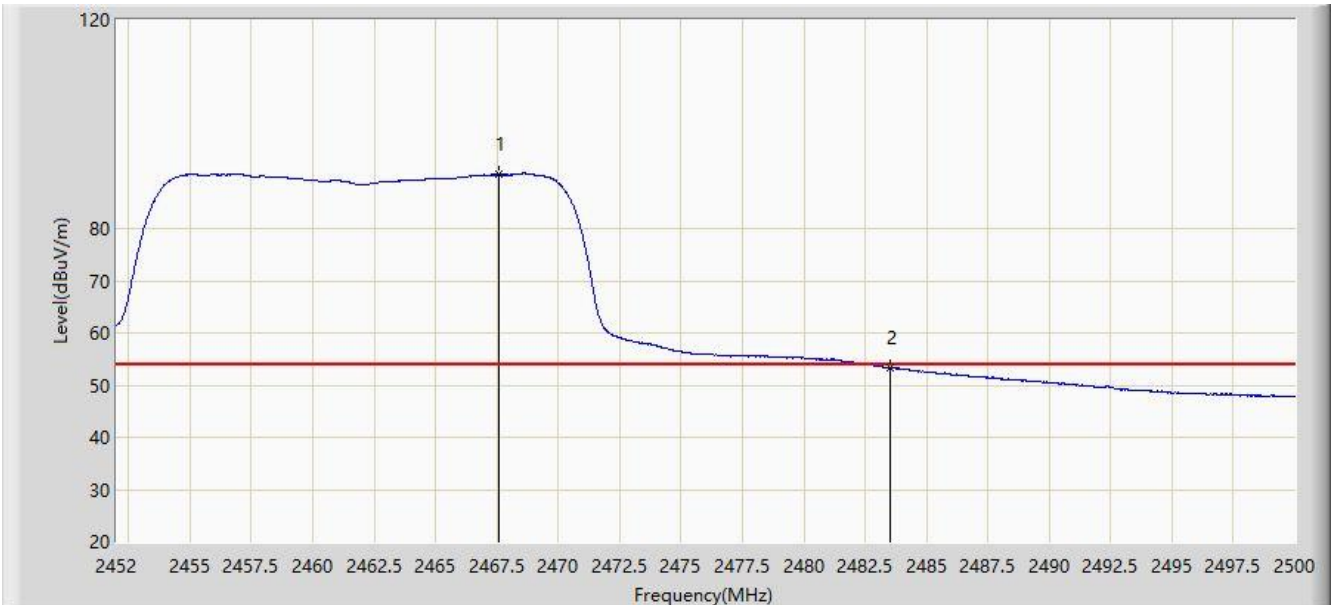


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2457.352	101.231	68.701	N/A	N/A	N/A	PK
2			2483.500	70.967	38.371	-3.033	74.000	32.596	PK
3			2485.144	72.373	39.773	-1.627	74.000	32.600	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:04
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at Channel 2462MHz	



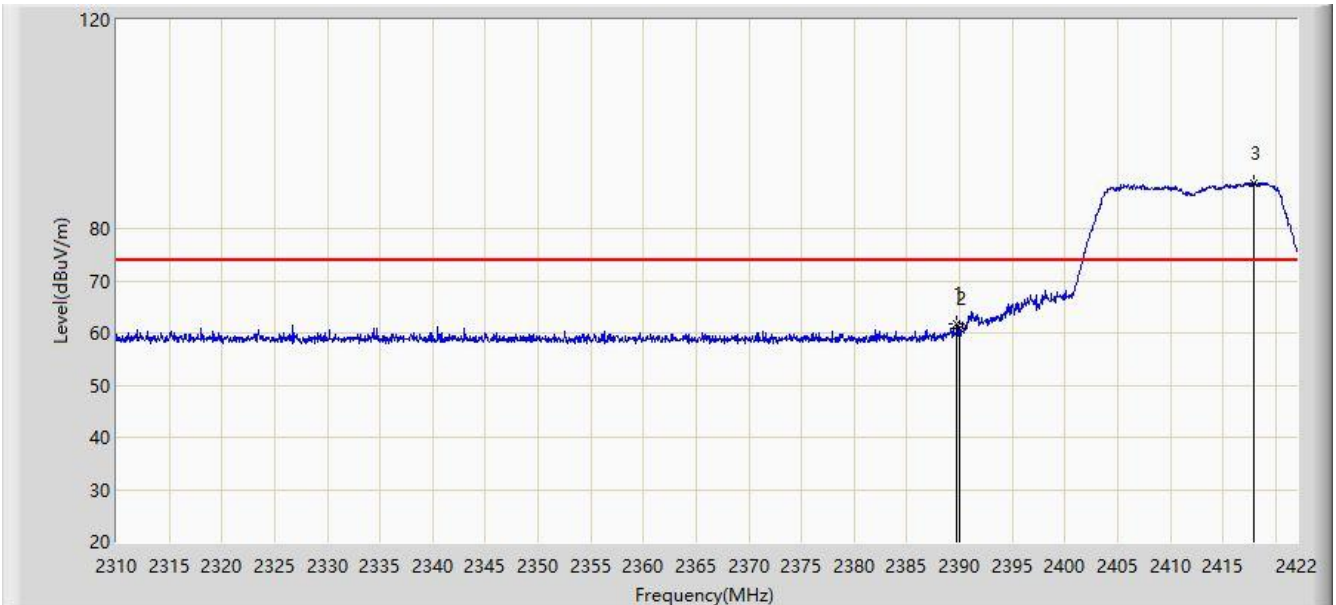
No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2467.576	90.381	57.827	N/A	N/A	N/A	AV
2			2483.500	53.409	20.813	-0.591	54.000	32.596	AV

Note: Measure Level (dBuV/m) = Reading Level (dBuV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)



Site: AC2	Time: 2018/01/13 - 01:17
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at Channel 2412MHz	

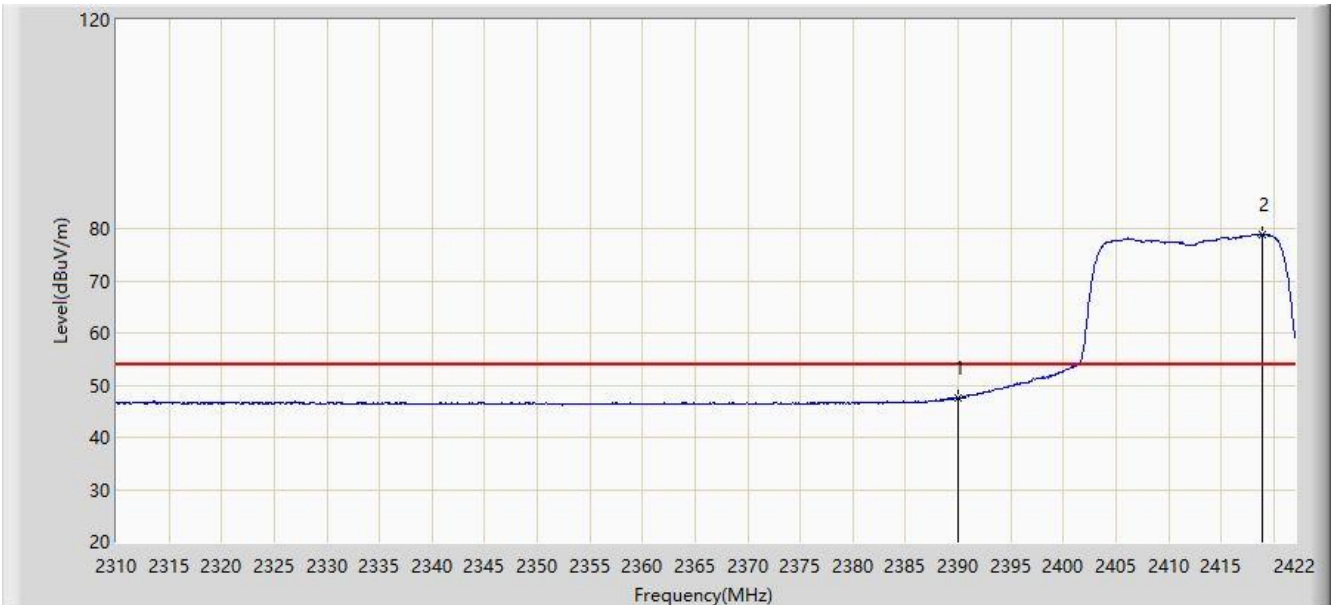


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2389.744	61.694	29.119	-12.306	74.000	32.574	PK
2			2390.000	60.755	28.180	-13.245	74.000	32.575	PK
3		*	2417.912	88.830	56.290	N/A	N/A	N/A	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:18
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at Channel 2412MHz	

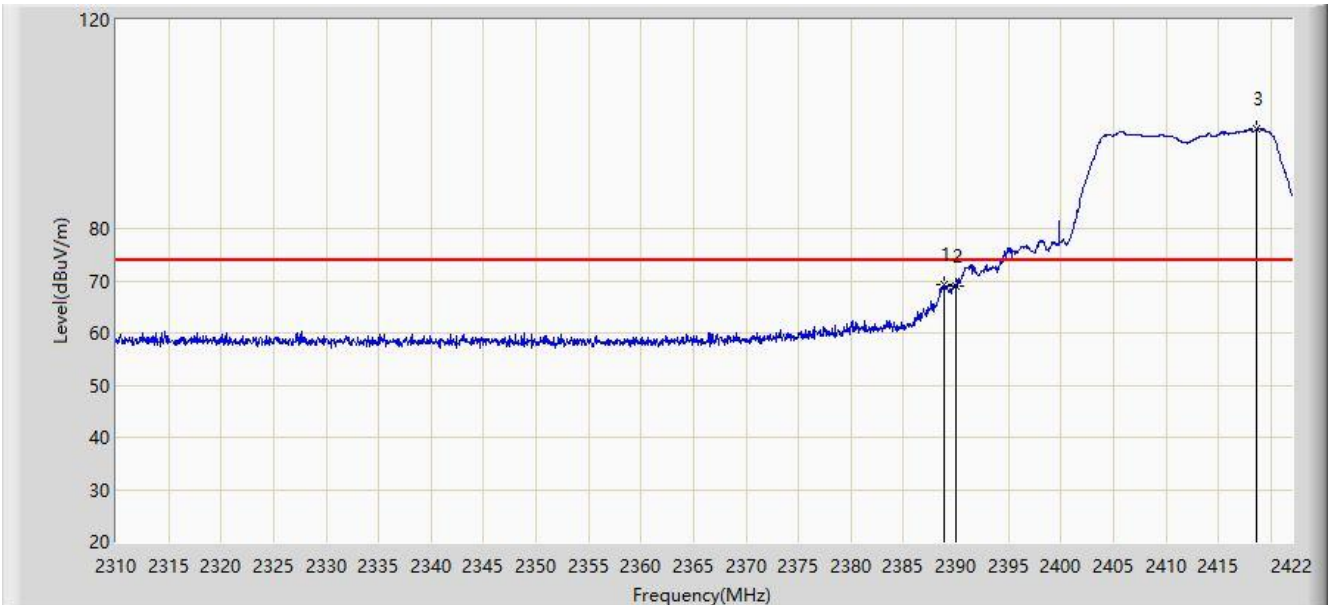


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2390.000	47.552	14.977	-6.448	54.000	32.575	AV
2		*	2418.864	78.822	46.284	N/A	N/A	N/A	AV

Note: Measure Level (dBuV/m) = Reading Level (dBuV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:16
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at Channel 2412MHz	

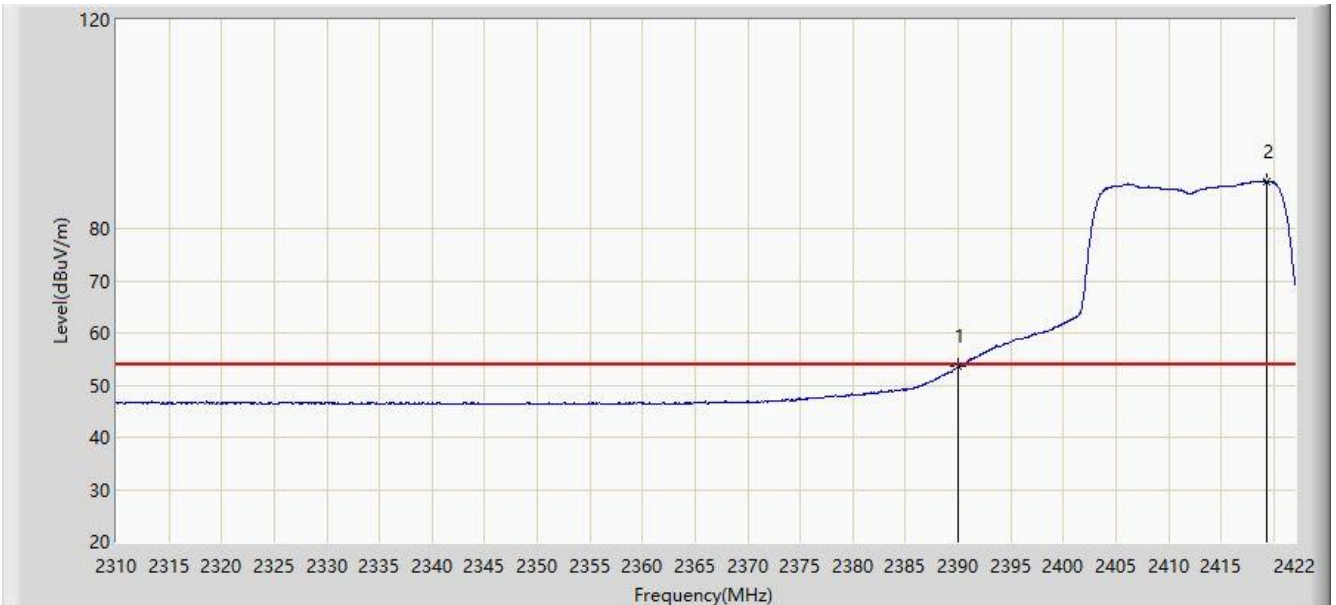


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2388.904	69.269	36.693	-4.731	74.000	32.577	PK
2			2390.000	69.002	36.427	-4.998	74.000	32.575	PK
3		*	2418.640	99.060	66.521	N/A	N/A	N/A	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:16
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at Channel 2412MHz	

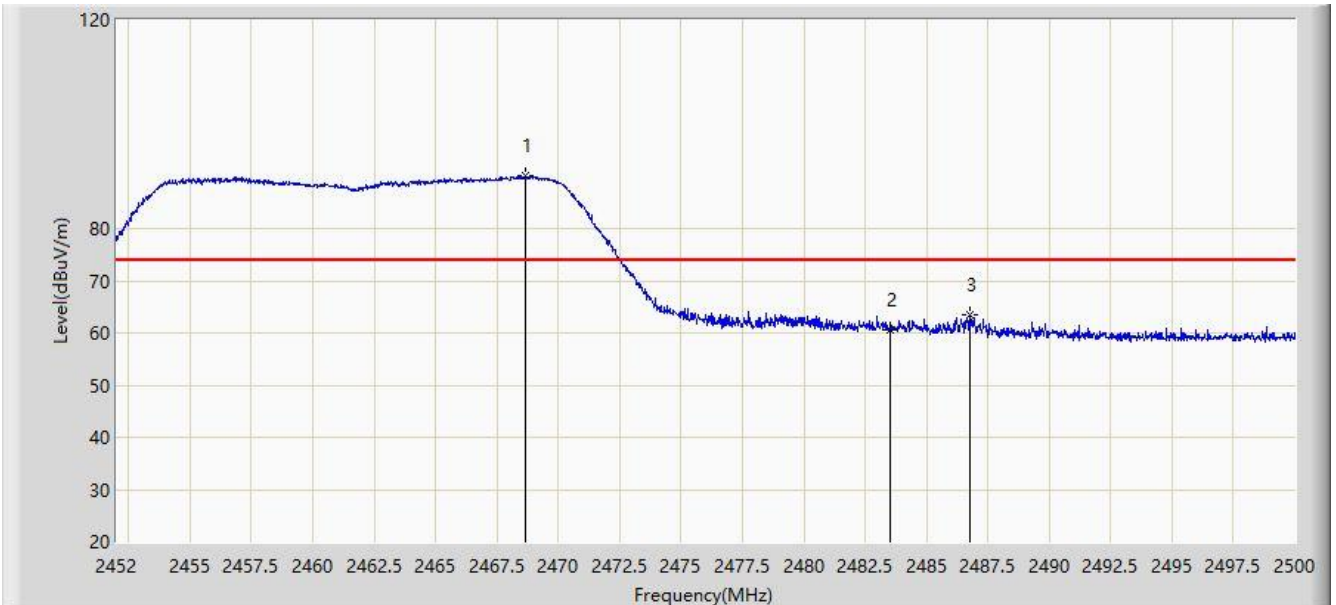


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2390.000	53.483	20.908	-0.517	54.000	32.575	AV
2		*	2419.312	89.124	56.586	N/A	N/A	N/A	AV

Note: Measure Level (dBuV/m) = Reading Level (dBuV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:30
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at Channel 2462MHz	

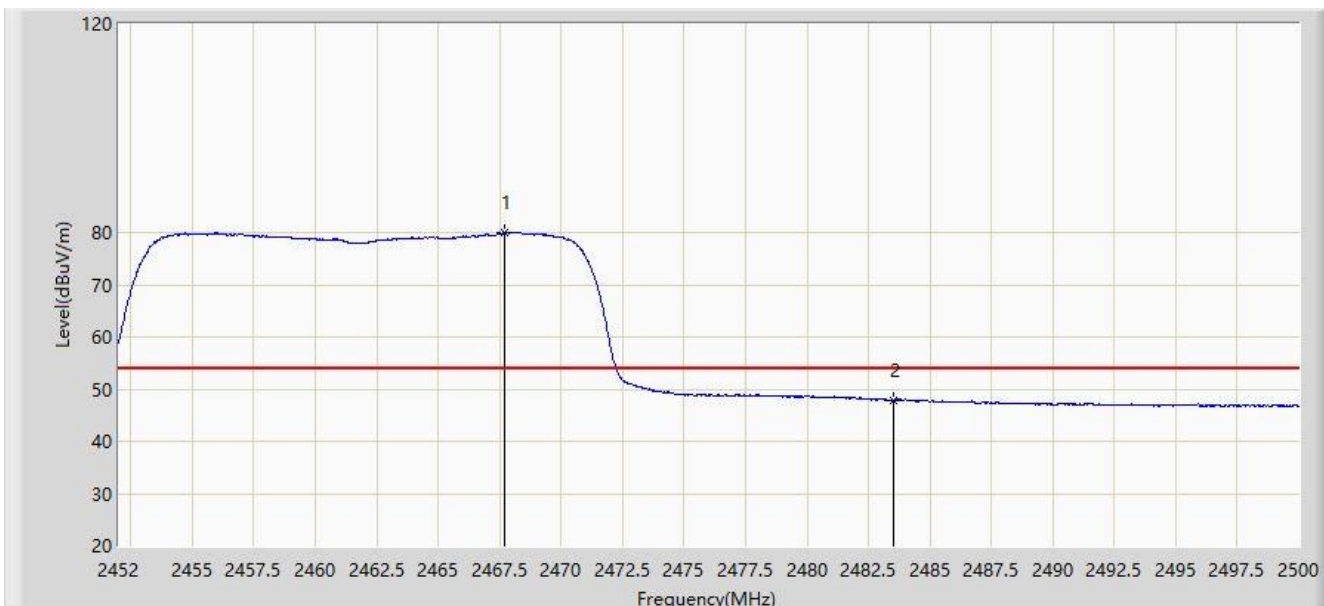


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2468.656	90.064	57.507	N/A	N/A	N/A	PK
2			2483.500	60.572	27.976	-13.428	74.000	32.596	PK
3			2486.776	63.457	30.853	-10.543	74.000	32.604	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:31
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at Channel 2462MHz	

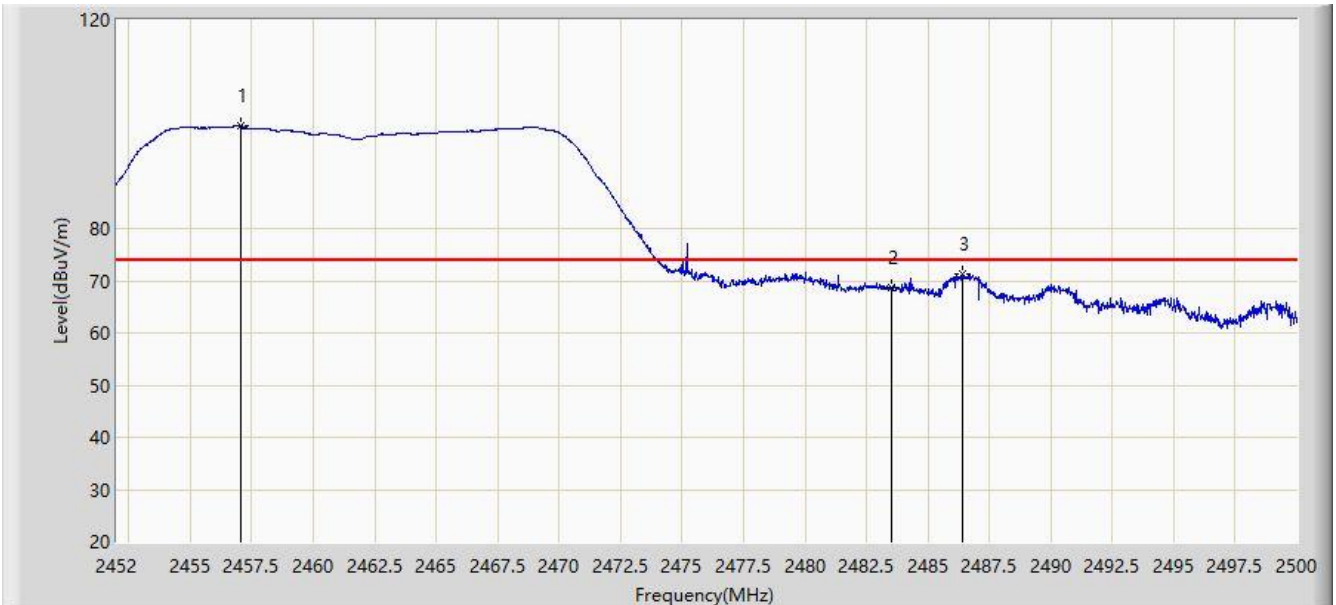


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2467.696	80.048	47.494	N/A	N/A	N/A	AV
2			2483.500	47.873	15.277	-6.127	54.000	32.596	AV

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:29
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at Channel 2462MHz	

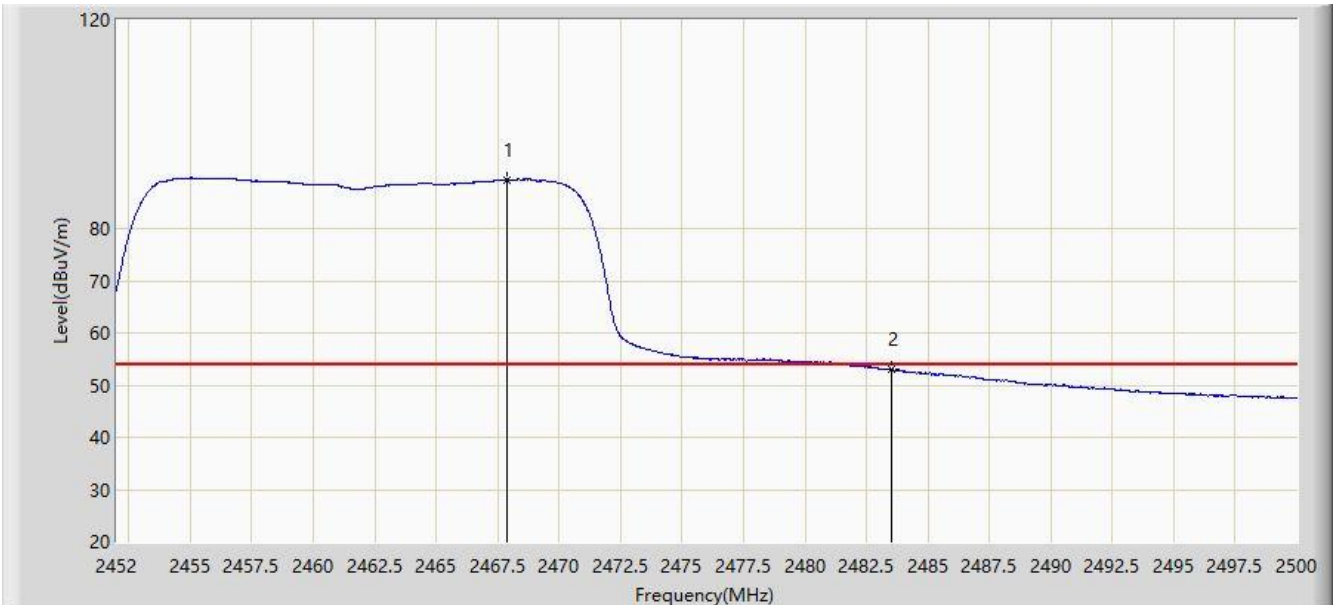


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2457.040	99.661	67.132	N/A	N/A	N/A	PK
2			2483.500	68.767	36.171	-5.233	74.000	32.596	PK
3			2486.392	71.340	38.737	-2.660	74.000	32.603	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:29
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at Channel 2462MHz	



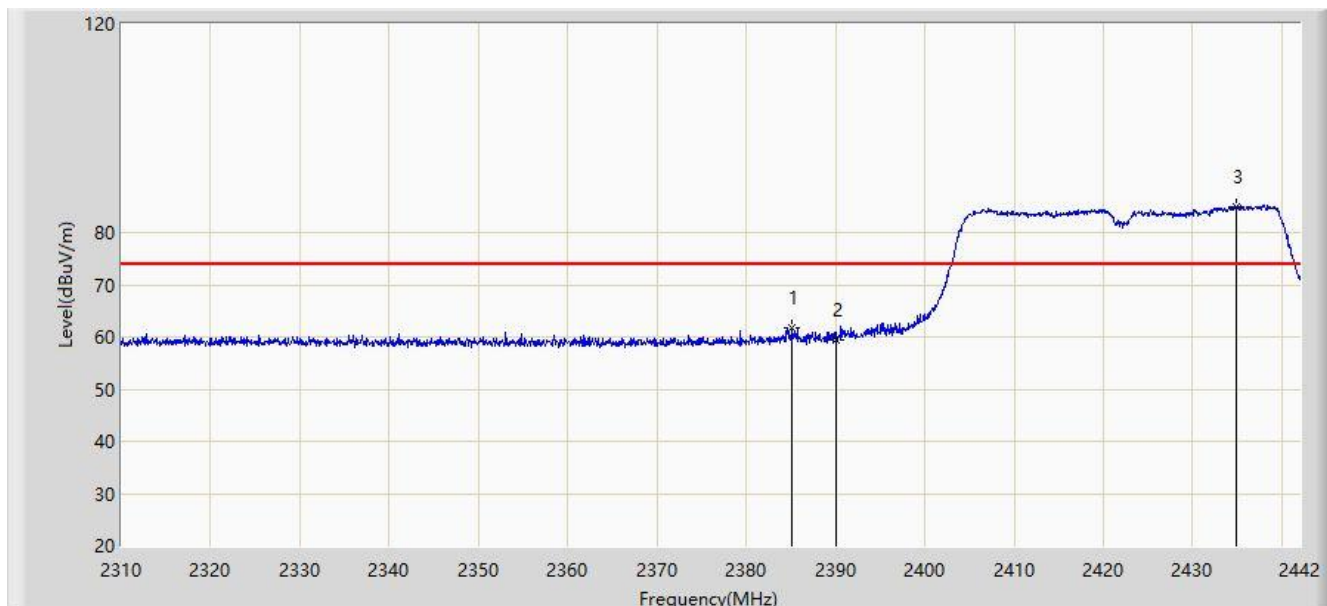
No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2467.864	89.416	56.861	N/A	N/A	N/A	AV
2			2483.500	52.990	20.394	-1.010	54.000	32.596	AV

Note: Measure Level (dBuV/m) = Reading Level (dBuV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)



Site: AC2	Time: 2018/01/13 - 01:39
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at Channel 2422MHz	

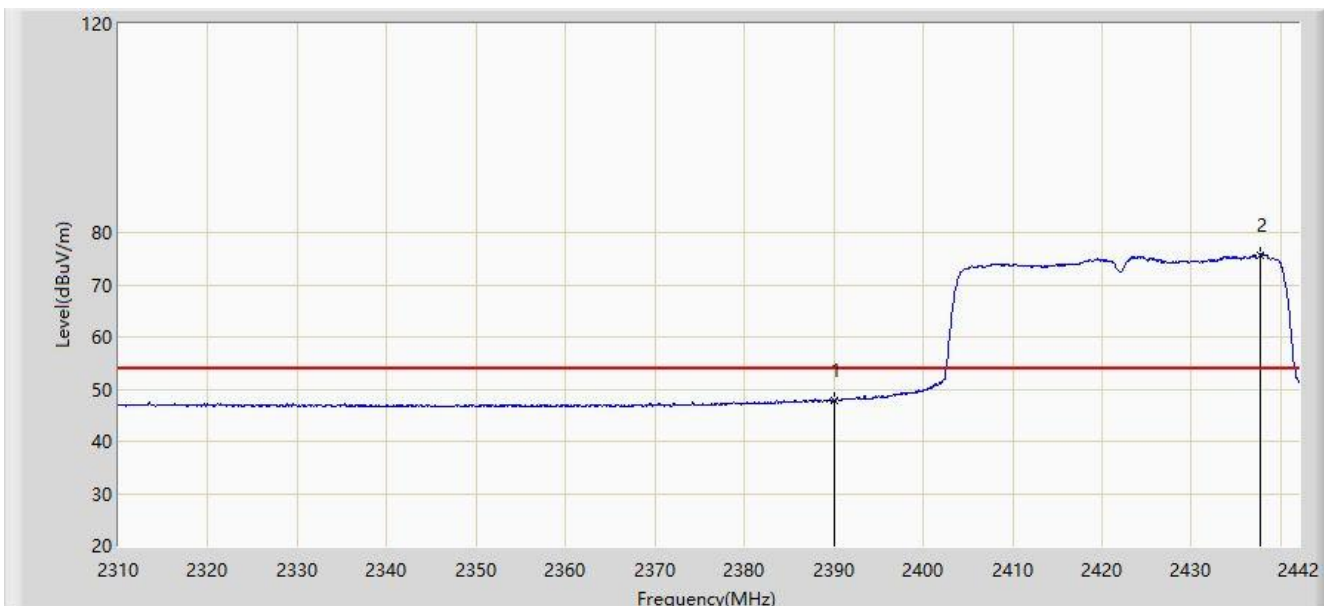


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2385.174	61.624	29.041	-12.376	74.000	32.583	PK
2			2390.000	59.353	26.778	-14.647	74.000	32.575	PK
3		*	2434.806	85.030	52.512	N/A	N/A	N/A	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:41
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at Channel 2422MHz	

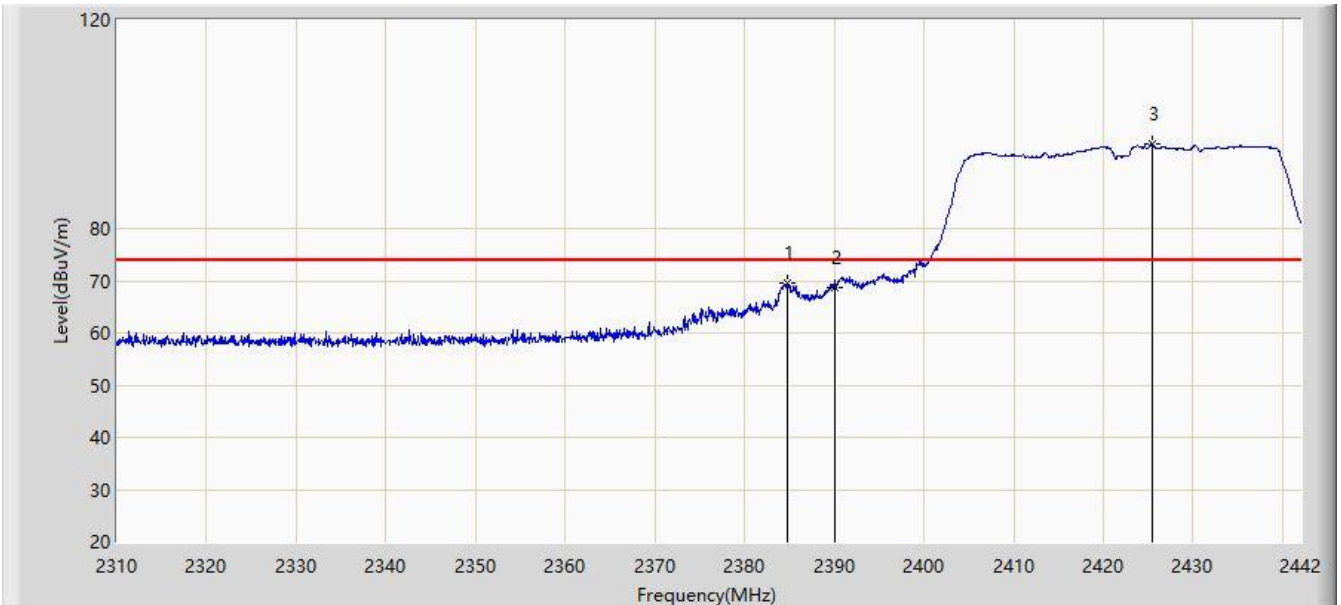


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2390.000	47.954	15.379	-6.046	54.000	32.575	AV
2		*	2437.776	75.797	43.283	N/A	N/A	N/A	AV

Note: Measure Level (dBuV/m) = Reading Level (dBuV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:38
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at Channel 2422MHz	

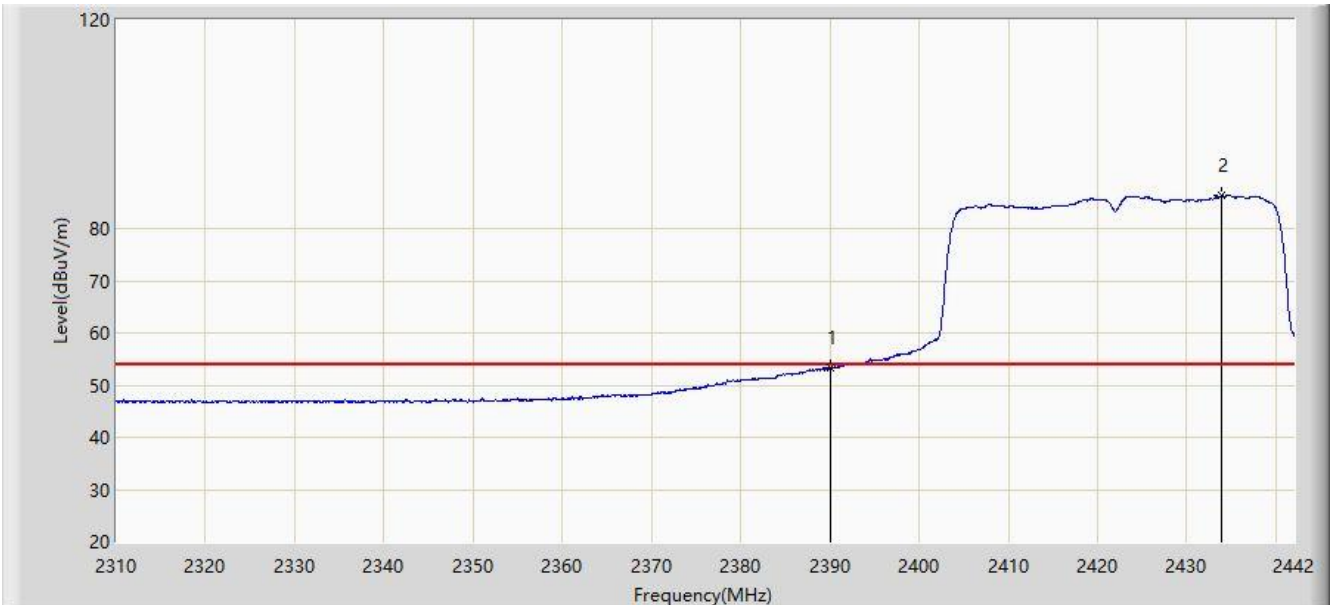


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2384.844	69.491	36.907	-4.509	74.000	32.583	PK
2			2390.000	68.684	36.109	-5.316	74.000	32.575	PK
3		*	2425.434	96.105	63.576	N/A	N/A	N/A	PK

Note: Measure Level (dBuV/m) = Reading Level (dBuV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:38
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at Channel 2422MHz	

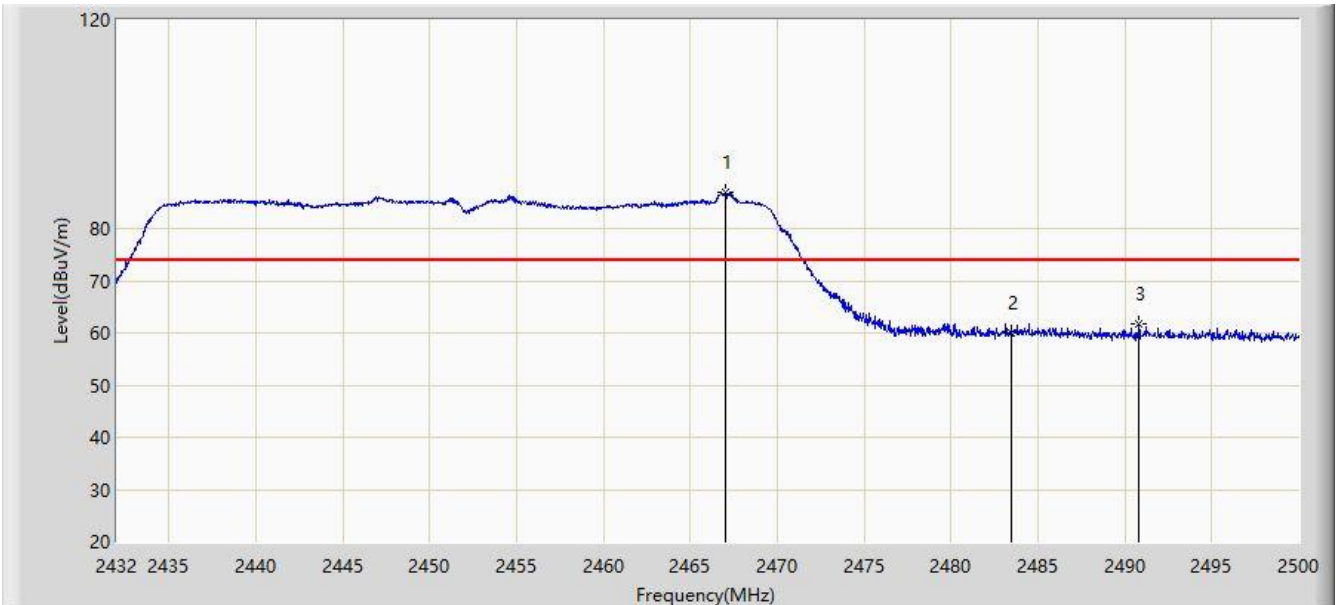


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1			2390.000	53.274	20.699	-0.726	54.000	32.575	AV
2		*	2433.882	86.313	53.794	N/A	N/A	N/A	AV

Note: Measure Level (dBuV/m) = Reading Level (dBuV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:46
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at Channel 2452MHz	

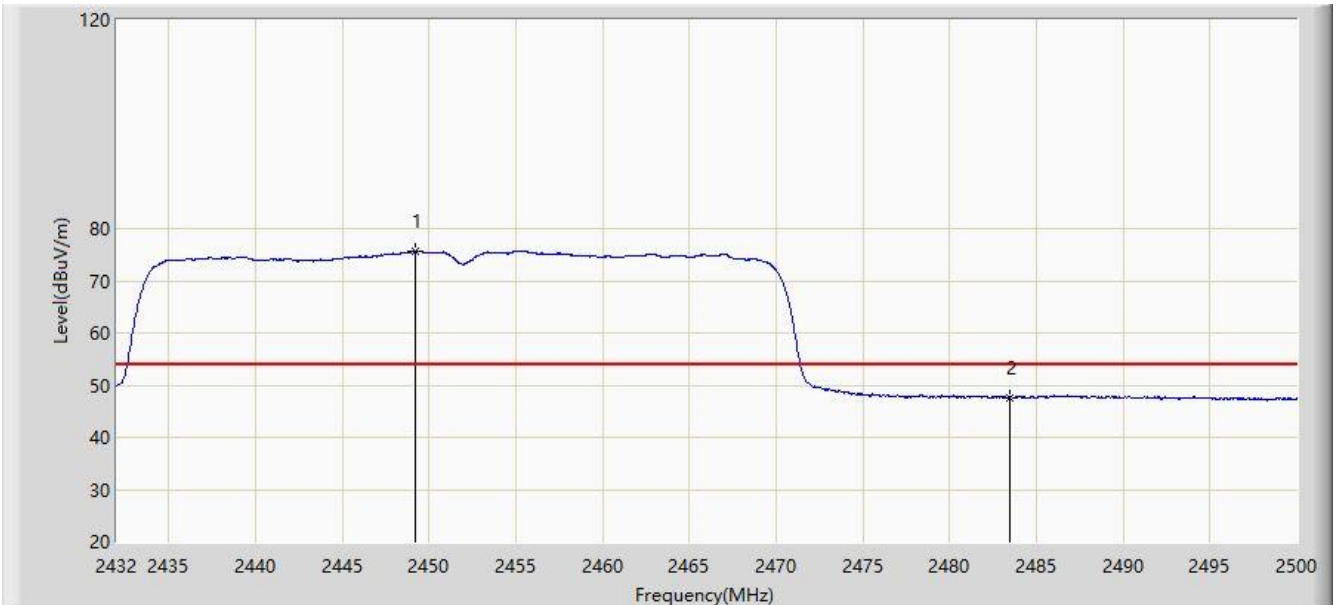


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2467.020	87.084	54.532	N/A	N/A	N/A	PK
2			2483.500	60.056	27.460	-13.944	74.000	32.596	PK
3			2490.820	61.616	29.002	-12.384	74.000	32.614	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:47
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at Channel 2452MHz	

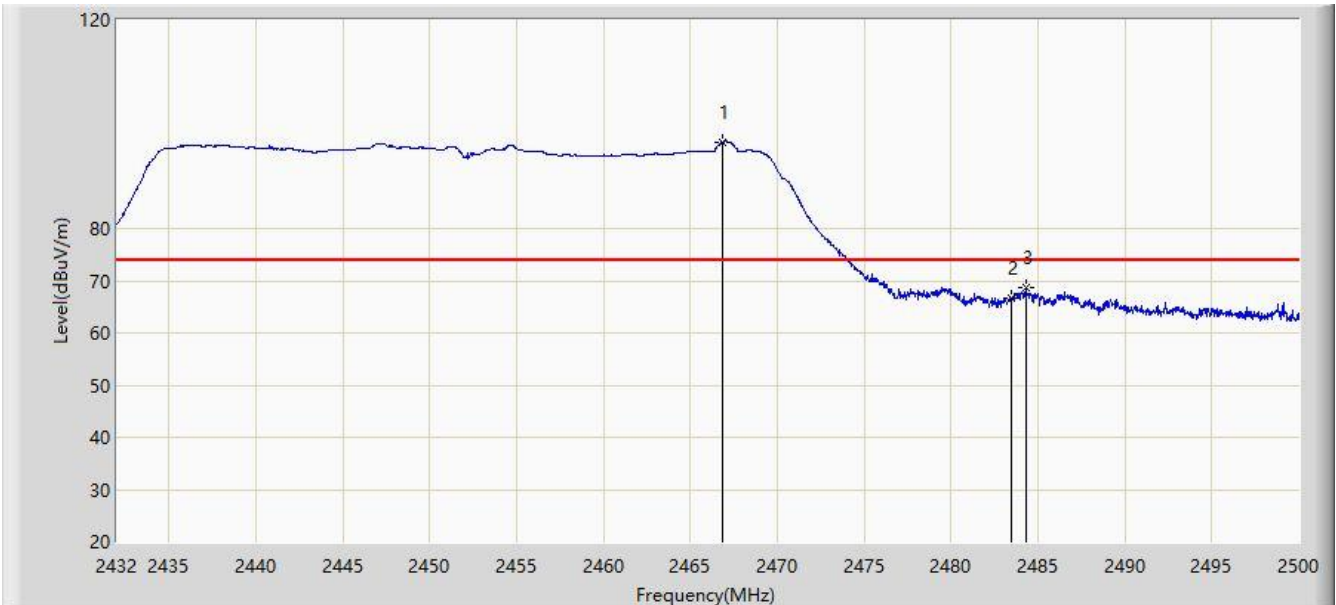


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2449.204	75.649	43.138	N/A	N/A	N/A	AV
2			2483.500	47.642	15.046	-6.358	54.000	32.596	AV

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:45
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at Channel 2452MHz	

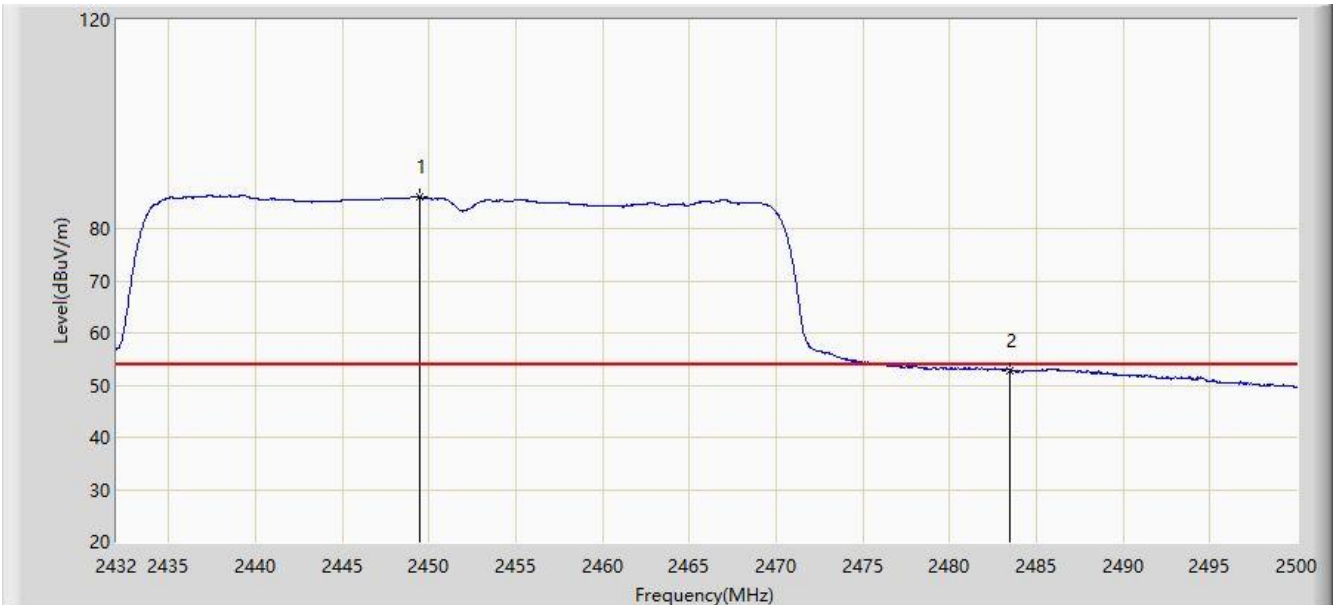


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2466.850	96.560	64.008	N/A	N/A	N/A	PK
2			2483.500	66.705	34.109	-7.295	74.000	32.596	PK
3			2484.292	68.582	35.984	-5.418	74.000	32.598	PK

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

Site: AC2	Time: 2018/01/13 - 01:44
Limit: FCC_Part15.209_RE(3m)	Engineer: Jone Zhang
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: SPEED DOME CAMERA (1080P WIFI PTZ)	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at Channel 2452MHz	



No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor	Type
1		*	2449.510	86.033	53.521	N/A	N/A	N/A	AV
2			2483.500	52.746	20.150	-1.254	54.000	32.596	AV

Note: Measure Level (dBμV/m) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)



## 7.8. AC Conducted Emissions Measurement

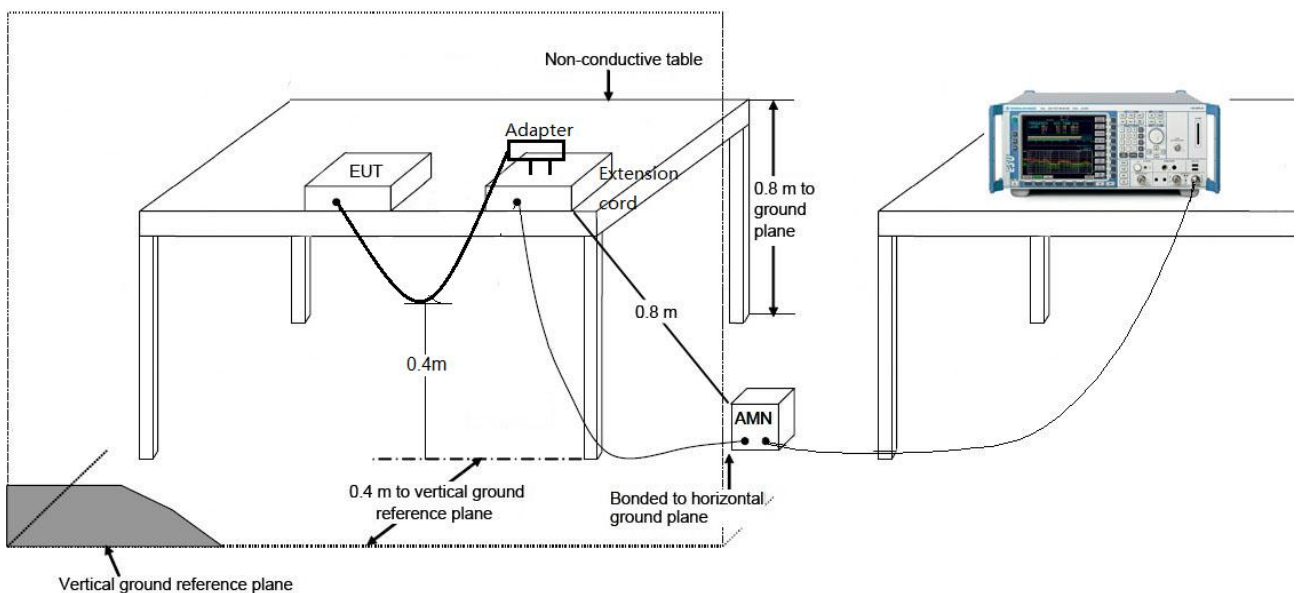
### 7.8.1. Test Limit

FCC Part 15 Subpart C Paragraph 15.207 Limits		
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

Note 1: The lower limit shall apply at the transition frequencies.

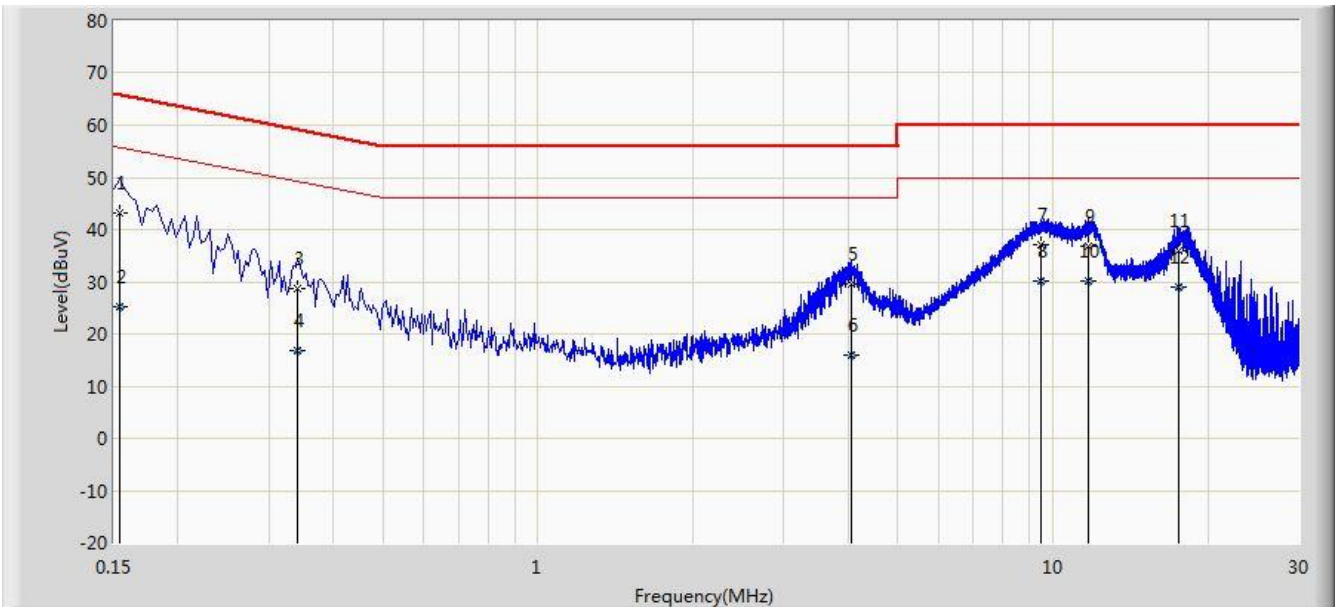
Note 2: The limit decreases linearly with the logarithm of the frequency in the range 0.15MHz to 0.5MHz.

### 7.8.2. Test Setup



### 7.8.3.Test Result

Site: SR2	Time: 2018/01/23 - 14:50
Limit: FCC_Part15.107_CE_Class B	Engineer: Polly Zong
Probe: ENV216_101683_Filter On	Polarity: Line
EUT: Speed Dome Camera (1080P WiFi PTZ)	Power: AC 120V/60Hz
<b>Worst Case Mode:</b> Transmit by 802.11b at Channel 2437MHz	

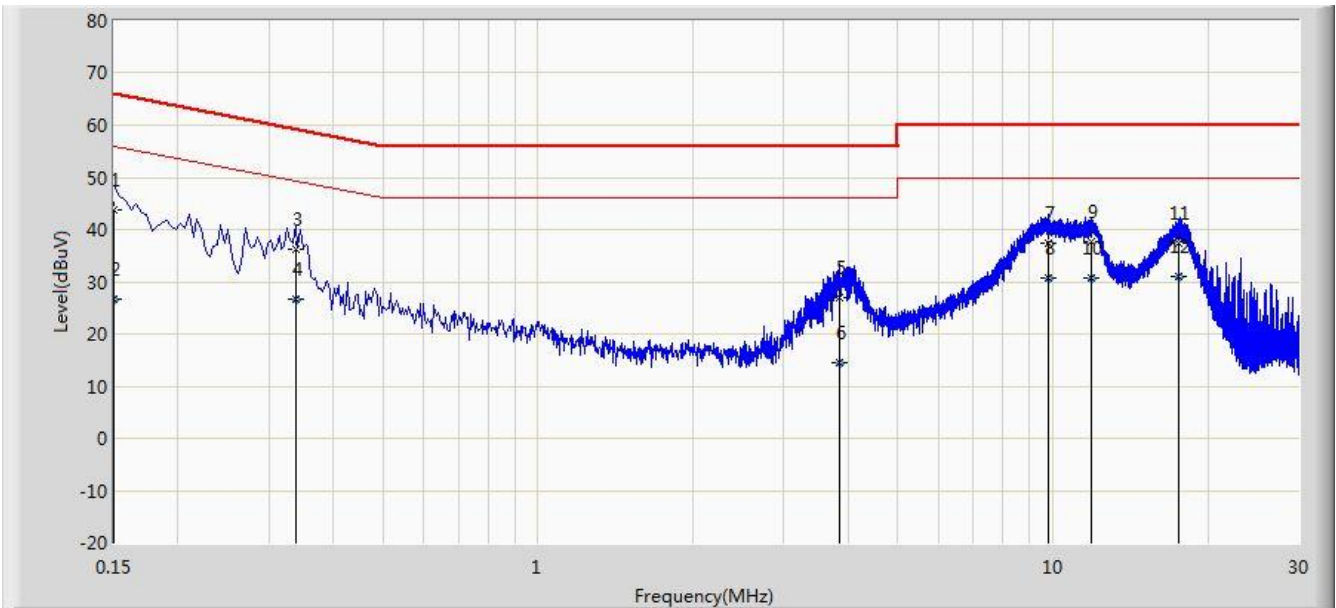


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV)	Factor (dB)	Type
1			0.154	43.045	32.305	-22.736	65.781	10.740	QP
2			0.154	25.359	14.620	-30.422	55.781	10.740	AV
3			0.342	28.697	18.659	-30.458	59.155	10.038	QP
4			0.342	16.930	6.892	-32.224	49.155	10.038	AV
5			4.050	29.502	19.534	-26.498	56.000	9.967	QP
6			4.050	16.012	6.045	-29.988	46.000	9.967	AV
7			9.474	37.236	27.087	-22.764	60.000	10.148	QP
8		*	9.474	30.249	20.100	-19.751	50.000	10.148	AV
9			11.746	36.761	26.678	-23.239	60.000	10.083	QP
10			11.746	30.127	20.044	-19.873	50.000	10.083	AV
11			17.570	35.846	25.760	-24.154	60.000	10.086	QP
12			17.570	29.090	19.005	-20.910	50.000	10.086	AV

Note: Measure Level (dBμV) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + LISN Factor (dB)

Site: SR2	Time: 2018/01/23 - 14:59
Limit: FCC_Part15.107_CE_Class B	Engineer: Polly Zong
Probe: ENV216_101683_Filter On	Polarity: Neutral
EUT: Speed Dome Camera (1080P WiFi PTZ)	Power: AC 120V/60Hz
<b>Worst Case Mode:</b> Transmit by 802.11b at Channel 2437MHz	



No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV)	Factor (dB)	Type
1			0.150	43.841	32.699	-22.159	66.000	11.142	QP
2			0.150	26.657	15.515	-29.343	56.000	11.142	AV
3			0.338	36.172	26.107	-23.080	59.252	10.066	QP
4			0.338	26.726	16.660	-22.526	49.252	10.066	AV
5			3.838	26.836	16.870	-29.164	56.000	9.965	QP
6			3.838	14.464	4.498	-31.536	46.000	9.965	AV
7			9.790	37.536	27.376	-22.464	60.000	10.160	QP
8			9.790	30.627	20.467	-19.373	50.000	10.160	AV
9			11.898	37.815	27.693	-22.185	60.000	10.122	QP
10			11.898	30.698	20.576	-19.302	50.000	10.122	AV
11			17.574	37.345	27.219	-22.655	60.000	10.125	QP
12		*	17.574	30.983	20.858	-19.017	50.000	10.125	AV

Note: Measure Level (dBμV) = Reading Level (dBμV) + Factor (dB)

Factor (dB) = Cable Loss (dB) + LISN Factor (dB)

## 8. CONCLUSION

The data collected relate only the item(s) tested and show that the **Speed Dome Camera (1080P WiFi PTZ)** is in compliance with Part 15C of the FCC Rules and RSS-247 of the ISED Rules.

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The End