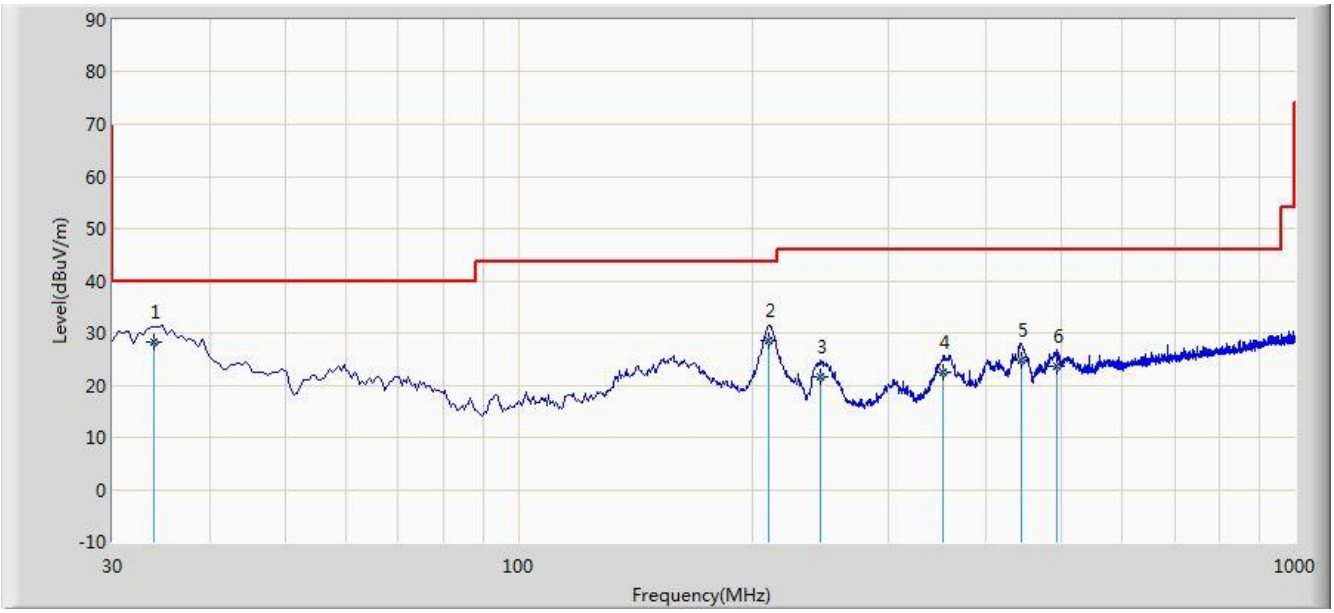
Site: AC1	Time: 2018/07/08 - 17:30
Limit: FCC_Part15.209_RSE(3m)	Engineer: Kevin Ker
Probe: VULB9162_0.03GHz_8GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: There is the worst case within frequency range 30MHz~1GHz.	



No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	33.880	28.381	15.637	-11.619	40.000	12.743	QP
2			210.420	28.539	15.964	-14.961	43.500	12.575	QP
3			244.370	21.530	7.829	-24.470	46.000	13.701	QP
4			353.010	22.508	6.415	-23.492	46.000	16.094	QP
5			444.675	24.925	7.362	-21.075	46.000	17.563	QP
6			493.175	23.666	5.204	-22.334	46.000	18.462	QP

Note 1: Measure Level (dBμV/m) = Reading Level (dBμV) + 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.

Product	ACCESS POINT	Temperature	26°C
Test Engineer	Kevin Ker	Relative Humidity	56%
Test Site	AC1	Test Date	2018/06/23
Model No.	APIN0515	Test Channel	11
Remark	1. Average measurement was not performed if peak level lower than average limit. So the margin was calculated using the average limit for emissions fall within the restricted bands. So the margin was calculated using the average limit for emissions fall within the restricted bands. 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
*	7137.0	35.7	11.7	47.4	81.8	-34.4	Peak	Horizontal
*	7953.0	35.8	12.5	48.3	81.8	-33.5	Peak	Horizontal
	8191.0	35.8	12.0	47.8	54.0	-6.20	Peak	Horizontal
	9117.5	34.1	14.5	48.6	54.0	-5.40	Peak	Horizontal
*	7035.0	36.2	10.9	47.1	81.8	-34.7	Peak	Vertical
*	7970.0	37.2	12.5	49.7	81.8	-32.1	Peak	Vertical
	8429.0	35.7	12.4	48.1	54.0	-5.90	Peak	Vertical
	9134.5	32.4	14.6	47.0	54.0	-7.00	Peak	Vertical

Note 1: “*” is not in restricted band, its limit is 20dBc of the fundamental emission level (101.8dBμV/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	ACCESS POINT	Temperature	26°C
Test Engineer	Kevin Ker	Relative Humidity	56%
Test Site	AC1	Test Date	2018/06/23
Model No.	APIN0515	Test Channel	18
Remark	1. Average measurement was not performed if peak level lower than average limit. So the margin was calculated using the average limit for emissions fall within the restricted bands. So the margin was calculated using the average limit for emissions fall within the restricted bands. 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
*	7120.0	34.7	11.6	46.3	83.2	-36.9	Peak	Horizontal
*	7876.5	35.8	12.4	48.2	83.2	-35.0	Peak	Horizontal
	8242.0	35.7	11.9	47.6	54.0	-6.40	Peak	Horizontal
	9092.0	32.7	14.4	47.1	54.0	-6.90	Peak	Horizontal
*	7171.0	35.4	11.9	47.3	83.2	-35.9	Peak	Vertical
*	7842.5	34.9	12.4	47.3	83.2	-35.9	Peak	Vertical
	8301.5	36.3	11.9	48.2	54.0	-5.80	Peak	Vertical
	9126.0	34.4	14.6	49.0	54.0	-5.00	Peak	Vertical

Note 1: "*" is not in restricted band, its limit is 20dBc of the fundamental emission level (103.2dBμV/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	ACCESS POINT	Temperature	26°C
Test Engineer	Kevin Ker	Relative Humidity	56%
Test Site	AC1	Test Date	2018/06/23
Model No.	APIN0515	Test Channel	26
Remark	1. Average measurement was not performed if peak level lower than average limit. So the margin was calculated using the average limit for emissions fall within the restricted bands. So the margin was calculated using the average limit for emissions fall within the restricted bands. 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
*	7154.0	36.9	11.9	48.8	74.6	-25.8	Peak	Horizontal
*	7910.5	35.5	12.4	47.9	74.6	-26.7	Peak	Horizontal
	8386.5	35.6	12.1	47.7	54.0	-6.30	Peak	Horizontal
	9049.5	32.9	14.2	47.1	54.0	-6.90	Peak	Horizontal
*	7154.0	37.1	11.9	49.0	74.6	-25.6	Peak	Vertical
*	7876.5	35.4	12.4	47.8	74.6	-26.8	Peak	Vertical
	8361.0	35.0	12.0	47.0	54.0	-7.00	Peak	Vertical
	9143.0	35.8	14.6	50.4	54.0	-3.60	Peak	Vertical

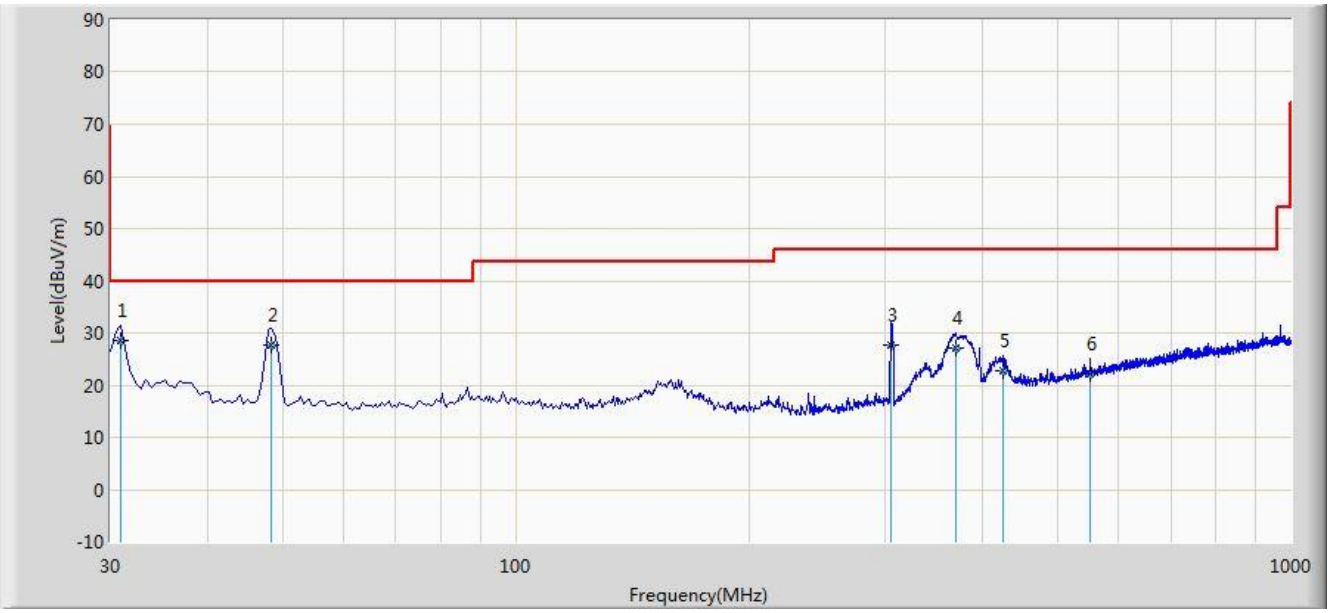
Note 1: “*” is not in restricted band, its limit is 20dBc of the fundamental emission level (94.6dBμV/m) or 15.209 which is higher.

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: AC1	Time: 2018/07/08 - 17:09
Limit: FCC_Part15.209_RSE(3m)	Engineer: Kevin Ker
Probe: VULB9162_0.03GHz_8GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: There is the worst case within frequency range 30MHz~1GHz.	



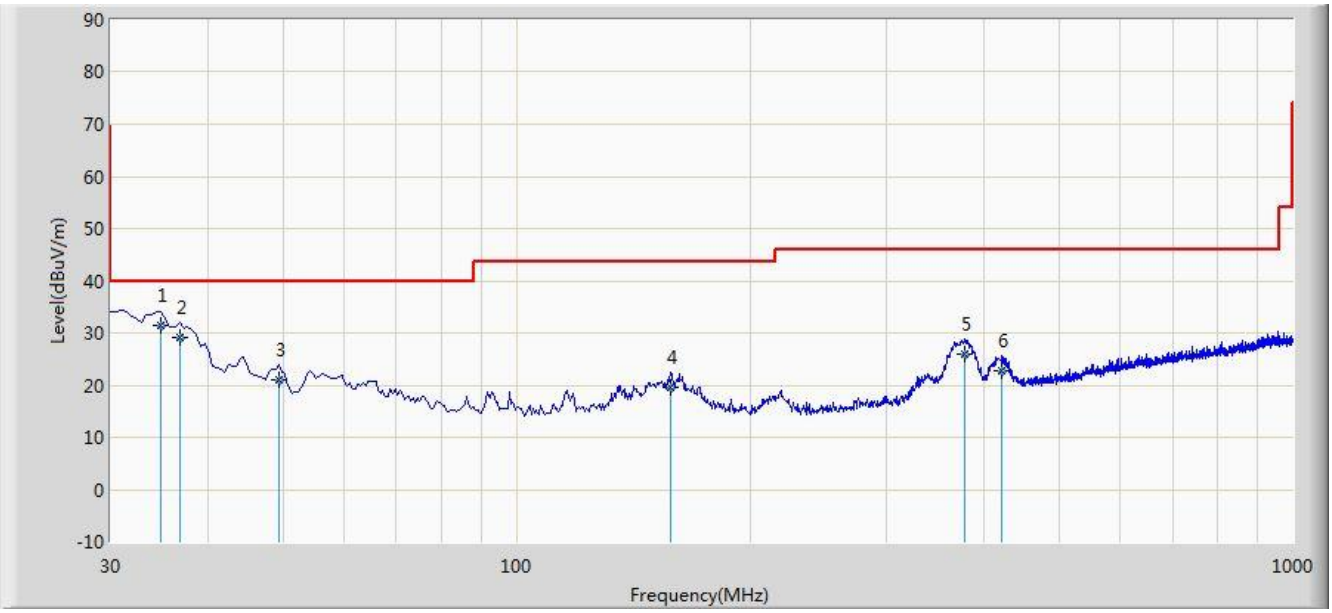
No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	30.970	28.568	16.351	-11.432	40.000	12.217	QP
2			48.430	27.745	12.768	-12.255	40.000	14.977	QP
3			305.480	27.733	12.836	-18.267	46.000	14.897	QP
4			369.500	26.982	10.637	-19.018	46.000	16.345	QP
5			424.790	22.760	5.460	-23.240	46.000	17.300	QP
6			551.375	22.136	2.716	-23.864	46.000	19.419	QP

Note 1: Measure Level (dBμV/m) = Reading Level (dBμV) + 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: AC1	Time: 2018/07/08 - 17:10
Limit: FCC_Part15.209_RSE(3m)	Engineer: Kevin Ker
Probe: VULB9162_0.03GHz_8GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: There is the worst case within frequency range 30MHz~1GHz.	



No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	34.850	31.553	18.634	-8.447	40.000	12.919	QP
2			36.790	29.252	15.981	-10.748	40.000	13.271	QP
3			49.400	20.871	5.908	-19.129	40.000	14.964	QP
4			158.040	19.608	9.725	-23.892	43.500	9.883	QP
5			378.230	25.822	9.345	-20.178	46.000	16.477	QP
6			422.365	22.697	5.427	-23.303	46.000	17.270	QP

Note 1: Measure Level (dBμV/m) = Reading Level (dBμV) + 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
[1] 0.495 - 0.505	16.69475 - 16.69525	608 - 614	5.35 - 5.46
2.1735 - 2.1905	16.80425 - 16.80475	960 - 1240	7.25 - 7.75
4.125 - 4.128	25.5 - 25.67	1300 - 1427	8.25 - 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	([2])
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

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 = 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 VB)

1. Analyzer center frequency was set to the frequency of the radiated spurious emission of interest

2. RBW = 1MHz

3. VBW; If the EUT is configured to transmit with duty cycle ≥ 98%, set VBW = 10 Hz.

If the EUT duty cycle is < 98%, set VBW ≥ 1/T. T is the minimum transmission duration.

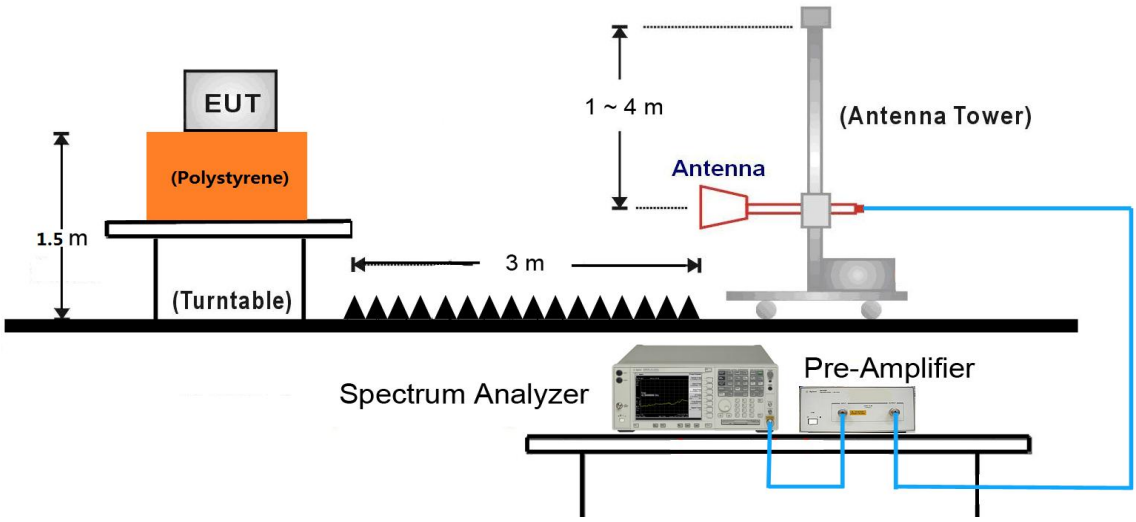
4. Detector = Peak

5. Sweep time = auto

6. Trace mode = max hold

7. Trace was allowed to stabilize

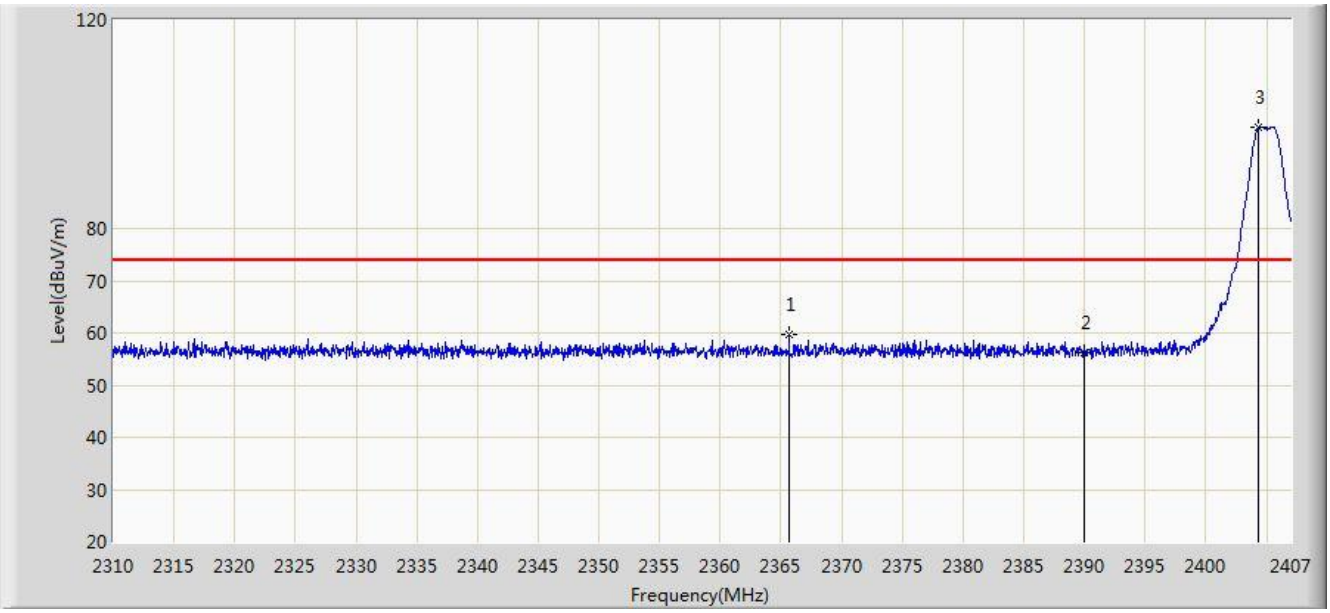
7.7.4.Test Setup



Note: This item was performed with the ZigBee antenna connected.

7.7.5.Test Result

Site: AC1	Time: 2018/07/08 - 14:14
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2405MHz	

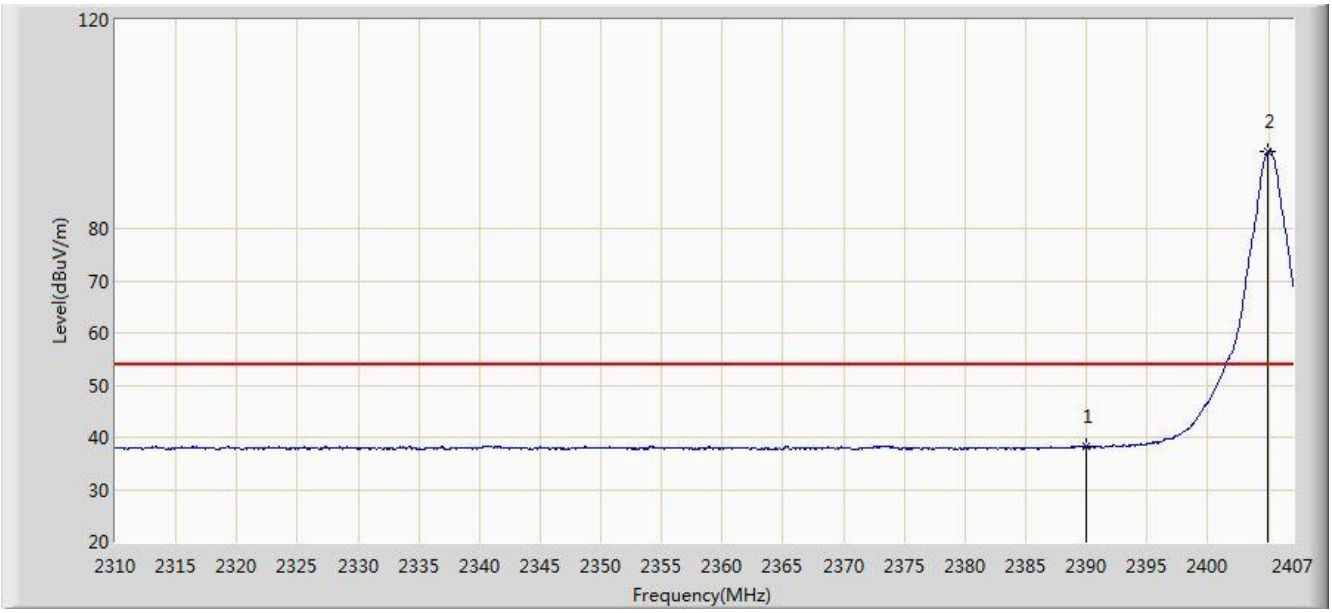


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1			2365.678	59.792	27.204	-14.208	74.000	32.588	PK
2			2390.000	56.213	23.659	-17.787	74.000	32.554	PK
3		*	2404.381	99.406	66.871	N/A	N/A	32.535	PK

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

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

Site: AC1	Time: 2018/07/08 - 14:27
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2405MHz	

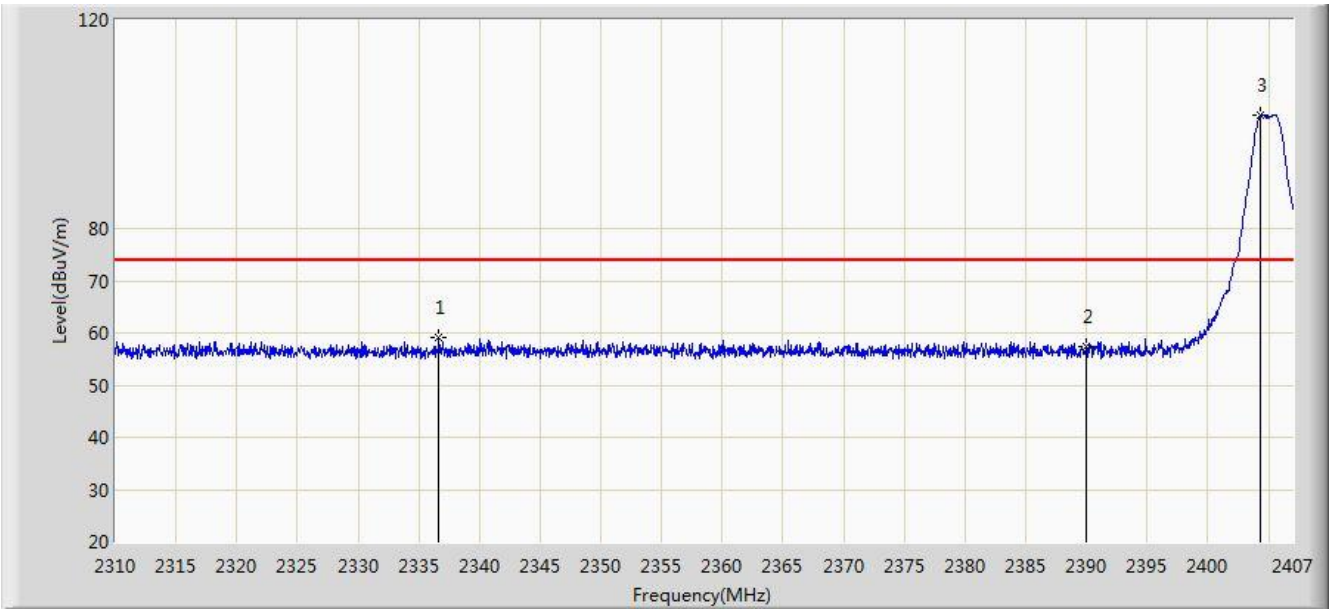


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1			2390.000	38.148	5.594	-15.852	54.000	32.554	AV
2		*	2404.963	94.794	62.259	N/A	N/A	32.535	AV

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

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

Site: AC1	Time: 2018/07/08 - 14:28
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2405MHz	

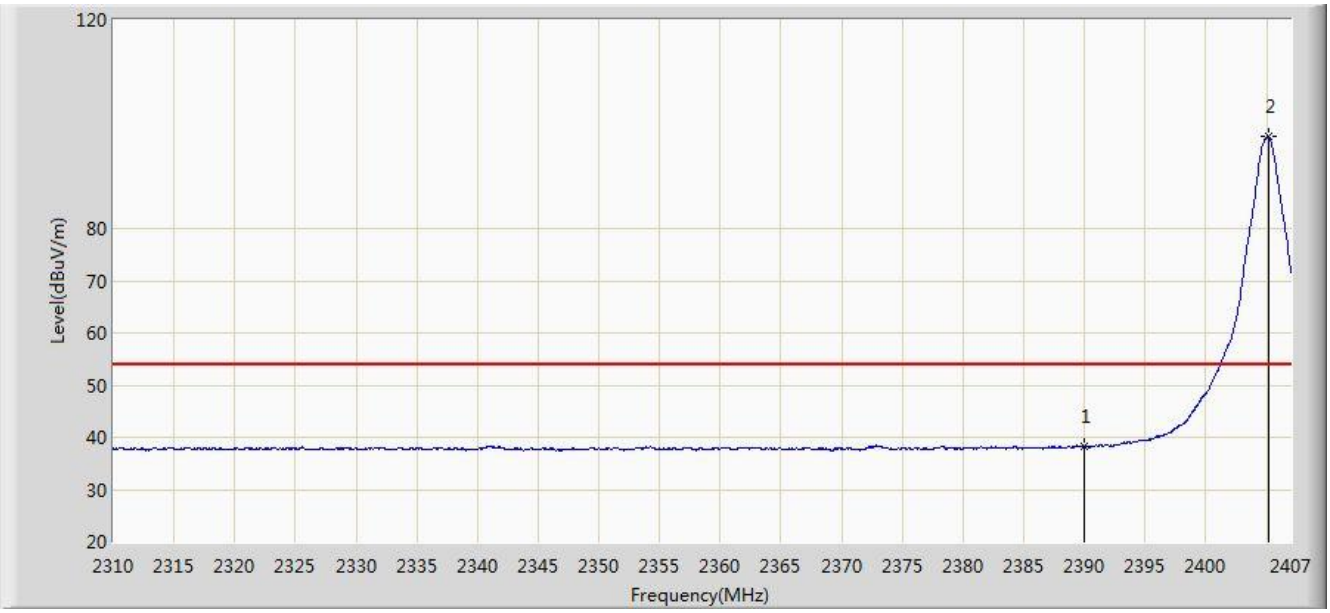


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1			2336.626	59.139	26.473	-14.861	74.000	32.666	PK
2			2390.000	57.343	24.789	-16.657	74.000	32.554	PK
3		*	2404.381	101.655	69.120	N/A	N/A	32.535	PK

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

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

Site: AC1	Time: 2018/07/08 - 14:30
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2405MHz	

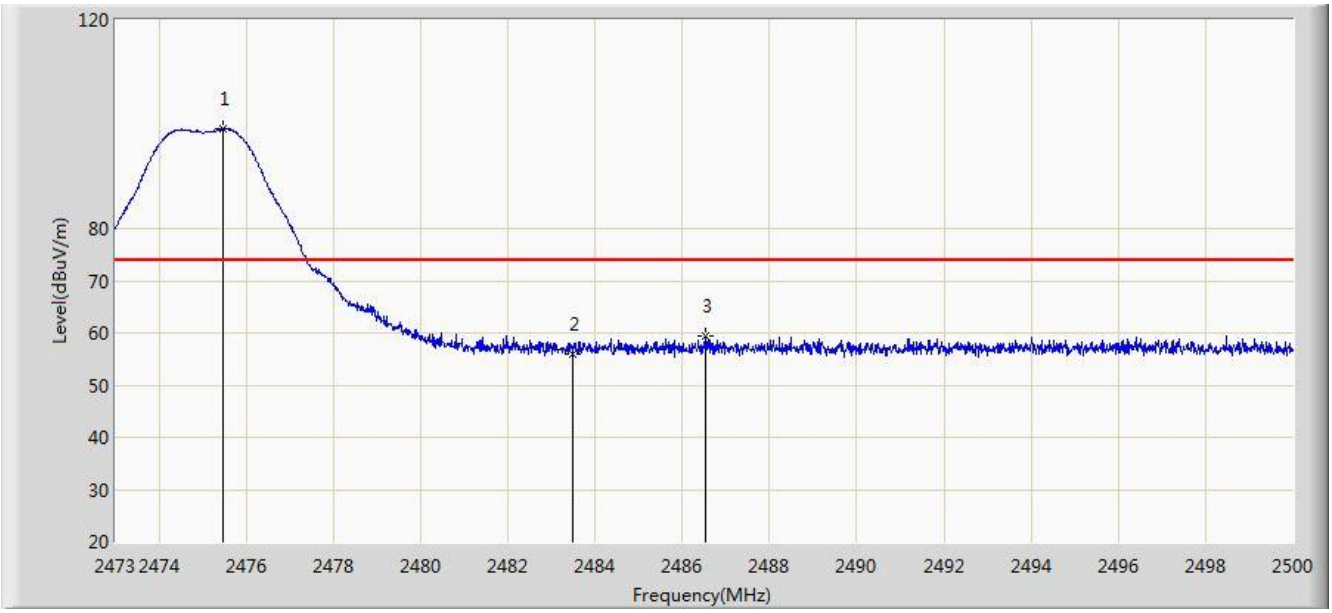


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1			2390.000	38.172	5.618	-15.828	54.000	32.554	AV
2		*	2405.157	97.541	65.007	N/A	N/A	32.534	AV

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

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

Site: AC1	Time: 2018/07/08 - 14:31
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2475MHz	

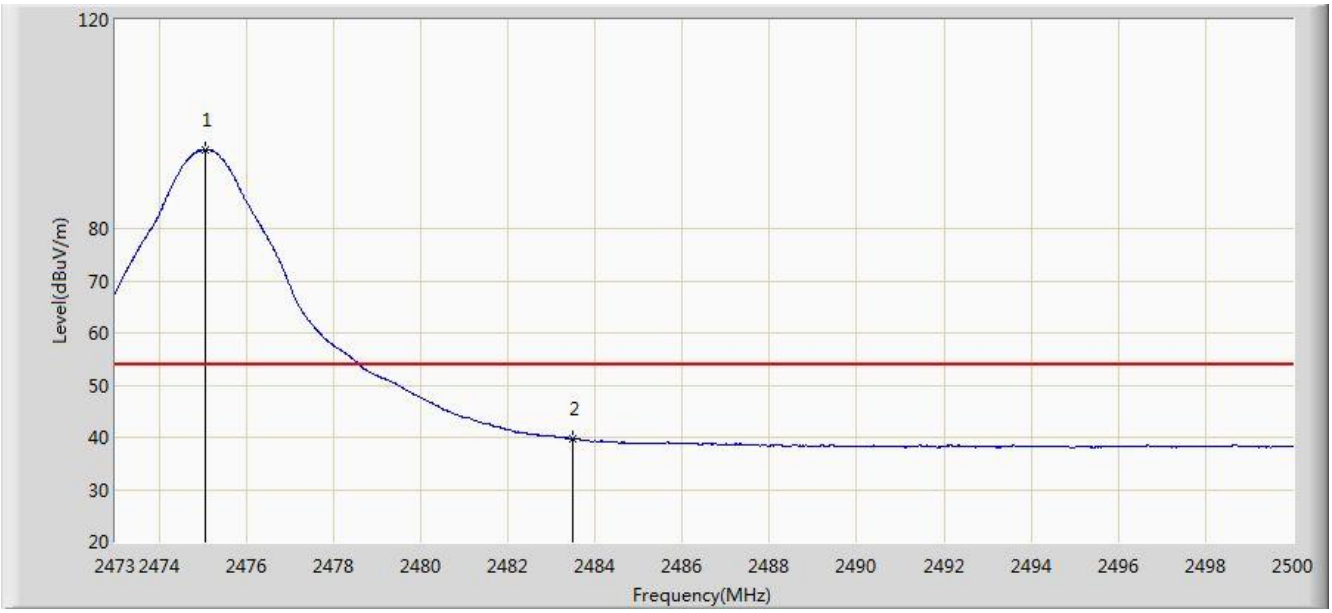


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2475.457	99.052	66.496	N/A	N/A	32.557	PK
2			2483.500	56.078	23.497	-17.922	74.000	32.580	PK
3			2486.527	59.472	26.882	-14.528	74.000	32.590	PK

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

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

Site: AC1	Time: 2018/07/08 - 14:35
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2475MHz	

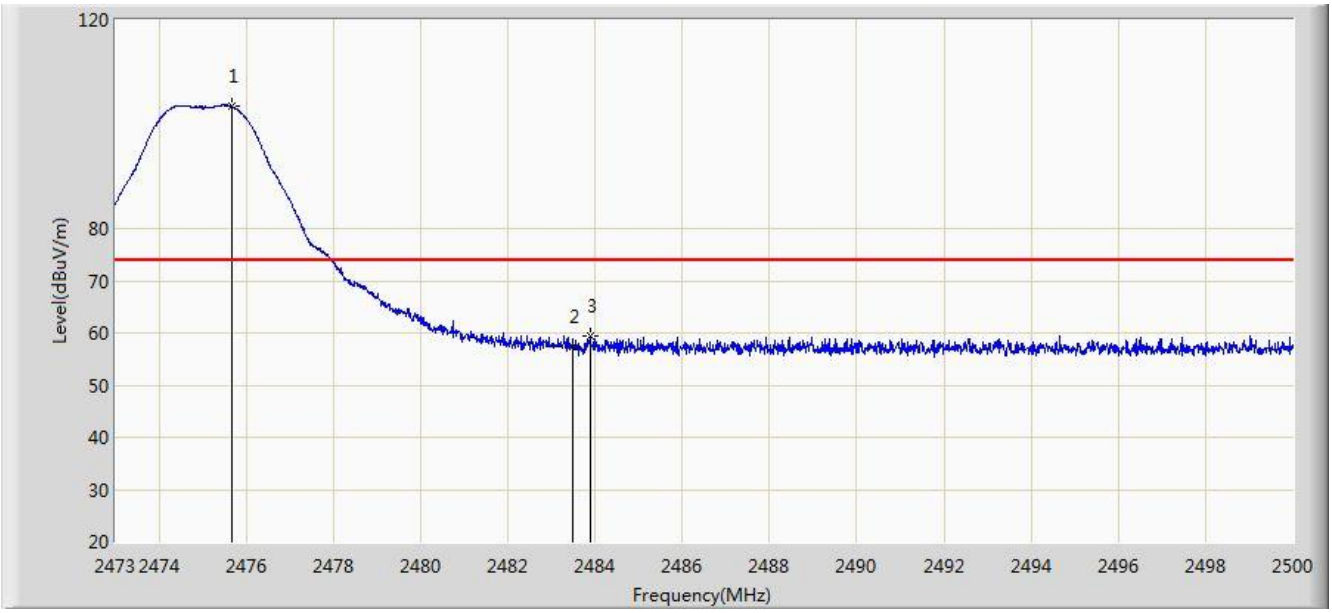


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2475.079	95.120	62.565	N/A	N/A	32.555	AV
2			2483.500	39.740	7.159	-14.260	54.000	32.580	AV

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

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

Site: AC1	Time: 2018/07/08 - 14:36
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2475MHz	

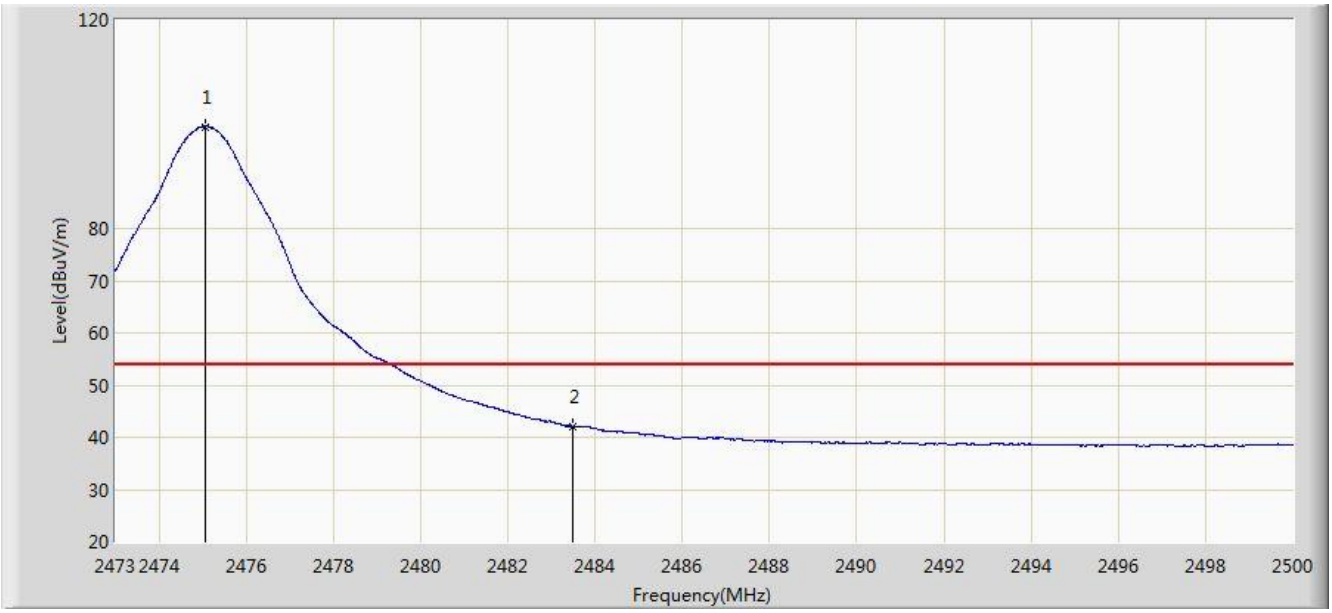


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2475.673	103.410	70.853	N/A	N/A	32.557	PK
2			2483.500	57.300	24.719	-16.700	74.000	32.580	PK
3			2483.881	59.335	26.753	-14.665	74.000	32.582	PK

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

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

Site: AC1	Time: 2018/07/08 - 14:37
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2475MHz	

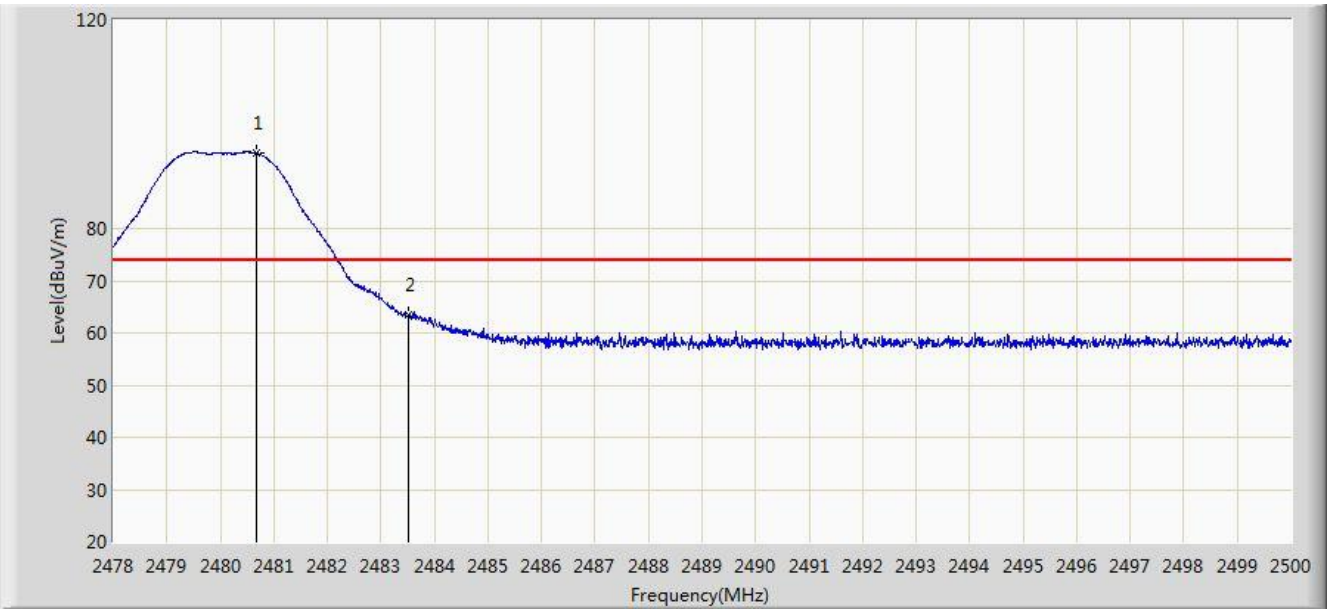


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2475.079	99.467	66.912	N/A	N/A	32.555	AV
2			2483.500	42.082	9.501	-11.918	54.000	32.580	AV

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

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

Site: AC1	Time: 2018/07/29 - 12:10
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2480MHz	

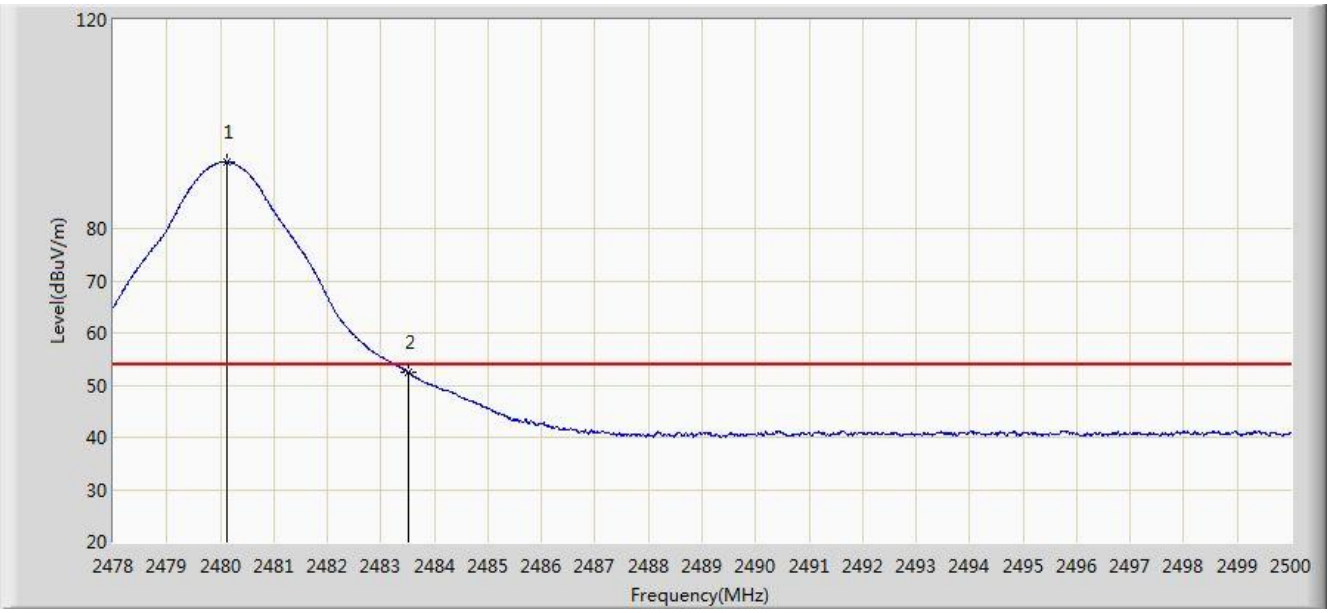


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2480.662	94.450	61.878	N/A	N/A	32.572	PK
2			2483.500	63.536	30.955	-10.464	74.000	32.580	PK

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

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

Site: AC1	Time: 2018/07/29 - 12:14
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2480MHz	

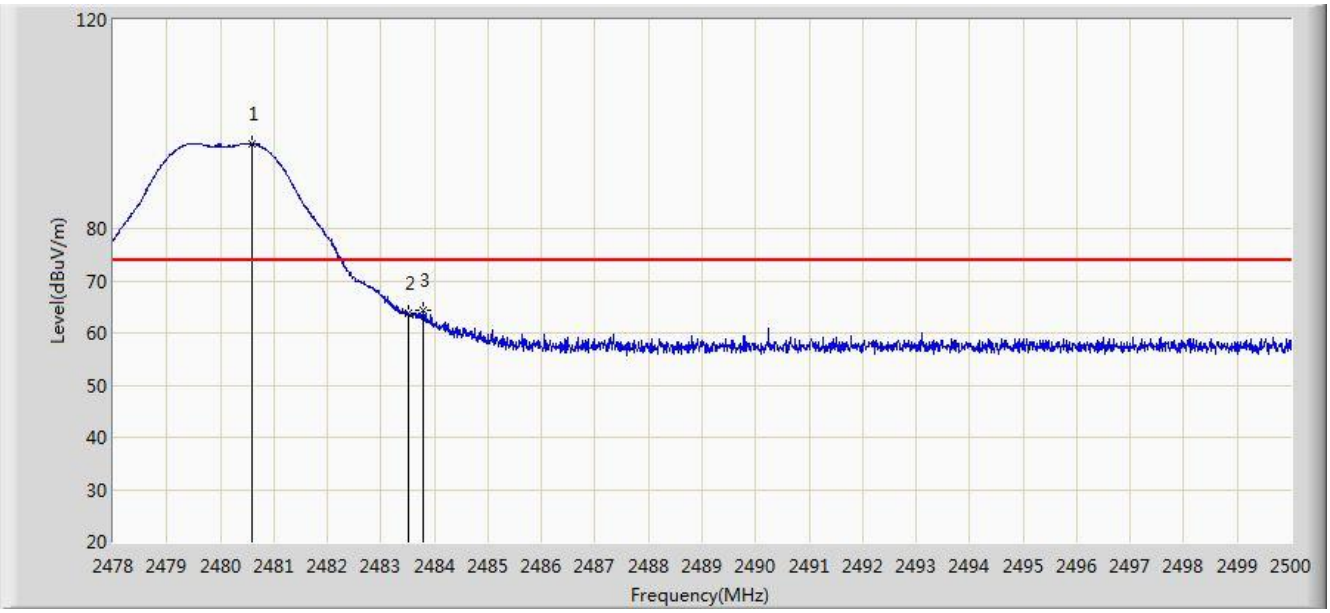


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2480.112	92.754	60.184	N/A	N/A	32.570	AV
2			2483.500	52.531	19.950	-1.469	54.000	32.580	AV

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

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

Site: AC1	Time: 2018/07/29 - 12:09
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2480MHz	

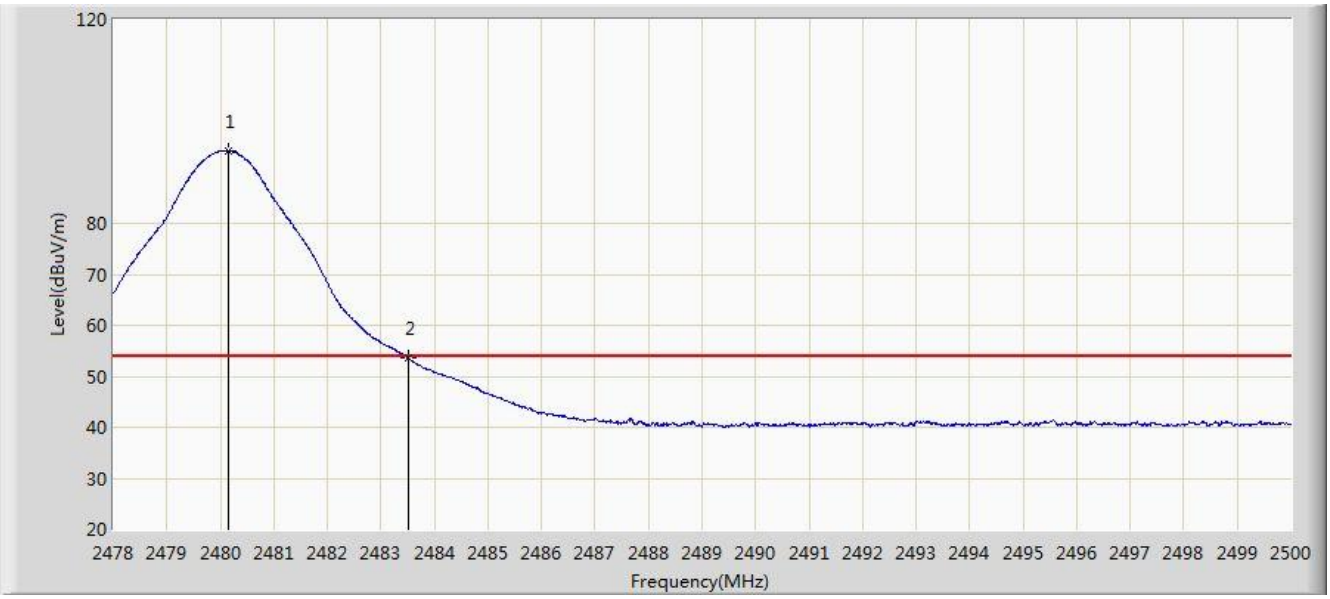


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2480.585	96.276	63.704	N/A	N/A	32.572	PK
2			2483.500	63.831	31.250	-10.169	74.000	32.580	PK
3			2483.797	64.279	31.698	-9.721	74.000	32.582	PK

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

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

Site: AC1	Time: 2018/07/29 - 12:05
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2480MHz	

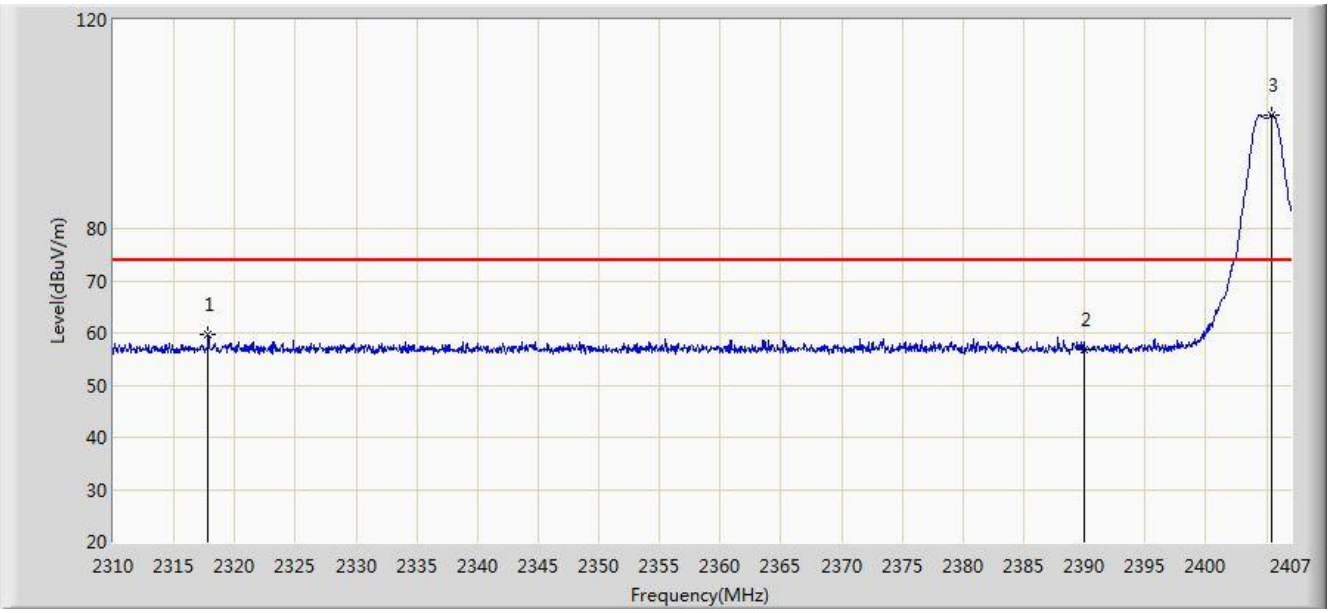


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2480.145	94.251	61.681	N/A	N/A	32.570	AV
2			2483.500	53.562	20.981	-0.438	54.000	32.580	AV

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

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

Site: AC1	Time: 2018/07/08 - 13:17
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2405MHz	

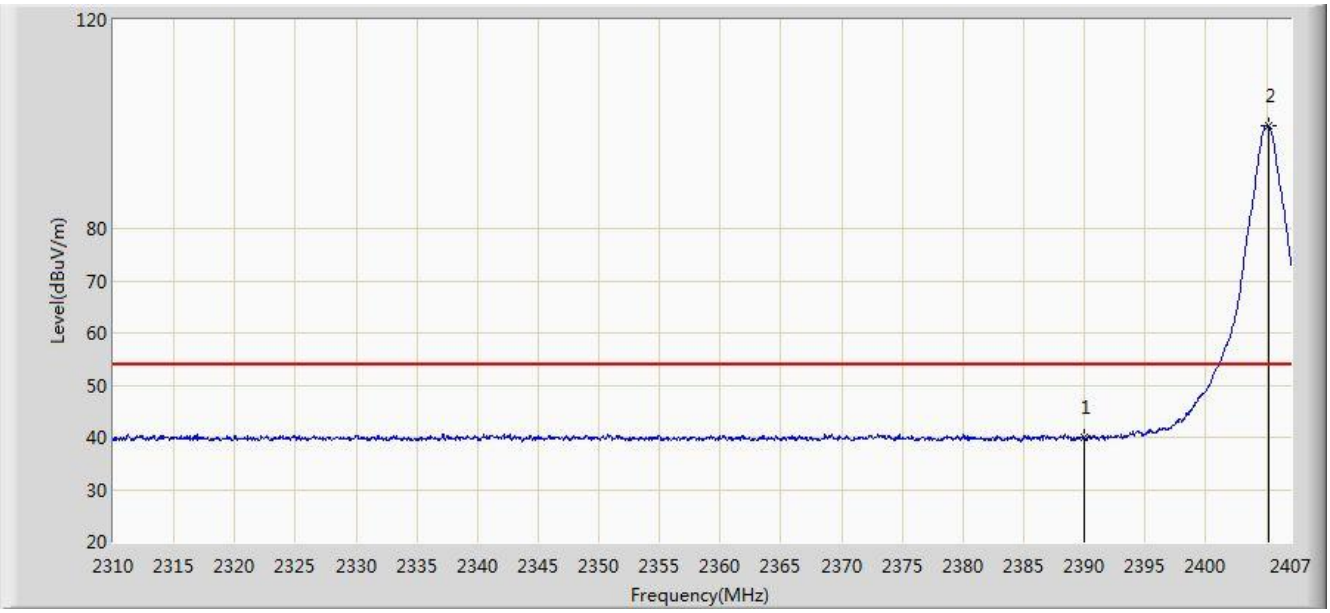


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1			2317.809	59.685	26.940	-14.315	74.000	32.745	PK
2			2390.000	56.775	24.221	-17.225	74.000	32.554	PK
3		*	2405.448	101.768	69.234	N/A	N/A	32.534	PK

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

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

Site: AC1	Time: 2018/07/08 - 13:32
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2405MHz	

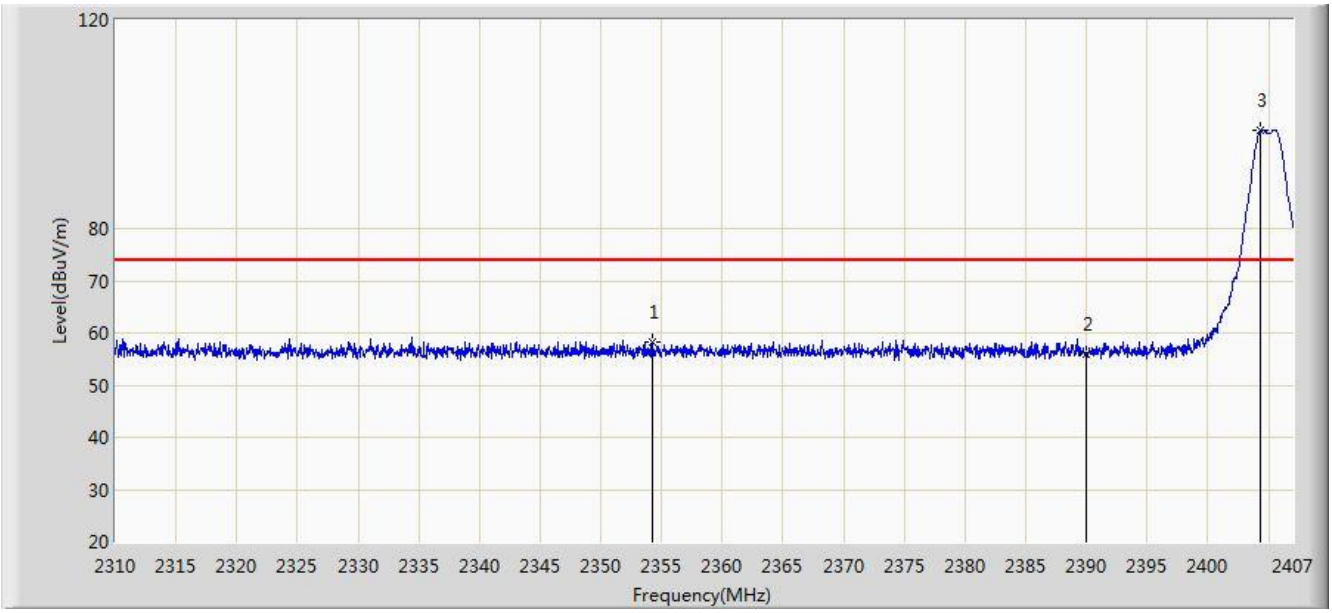


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1			2390.000	39.903	7.349	-14.097	54.000	32.554	AV
2		*	2405.157	99.824	67.290	N/A	N/A	32.534	AV

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

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

Site: AC1	Time: 2018/07/08 - 13:32
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2405MHz	

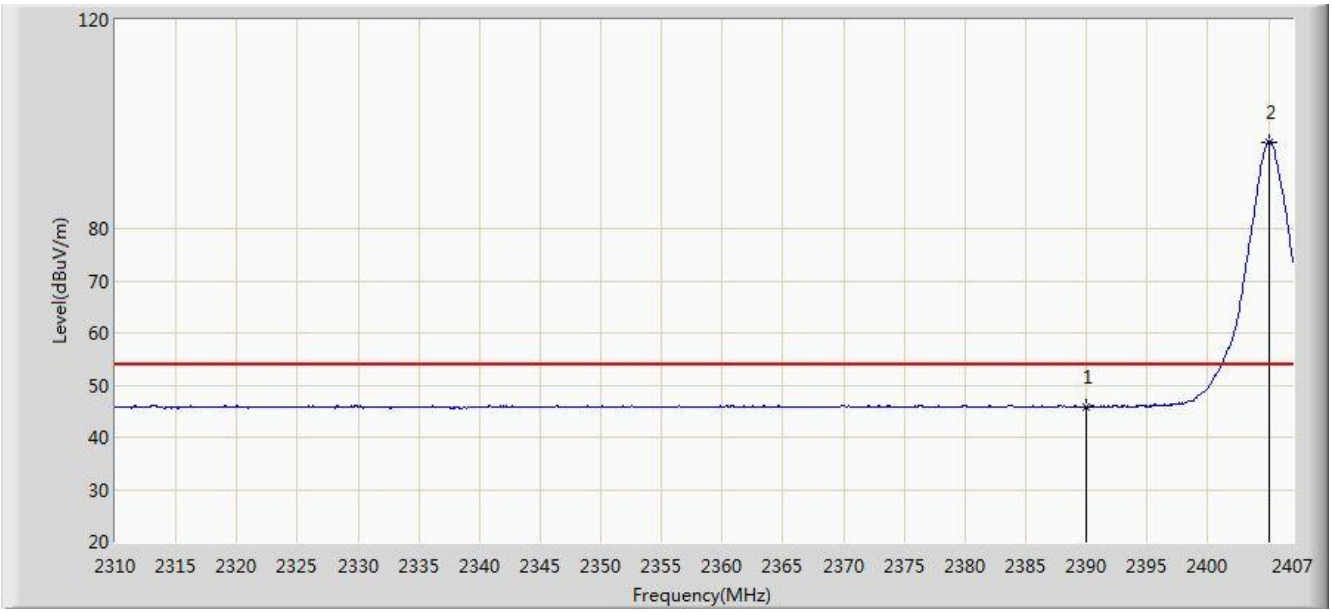


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1			2354.232	58.346	25.735	-15.654	74.000	32.611	PK
2			2390.000	55.826	23.272	-18.174	74.000	32.554	PK
3		*	2404.381	98.738	66.203	N/A	N/A	32.535	PK

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

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

Site: AC1	Time: 2018/07/08 - 13:35
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2405MHz	

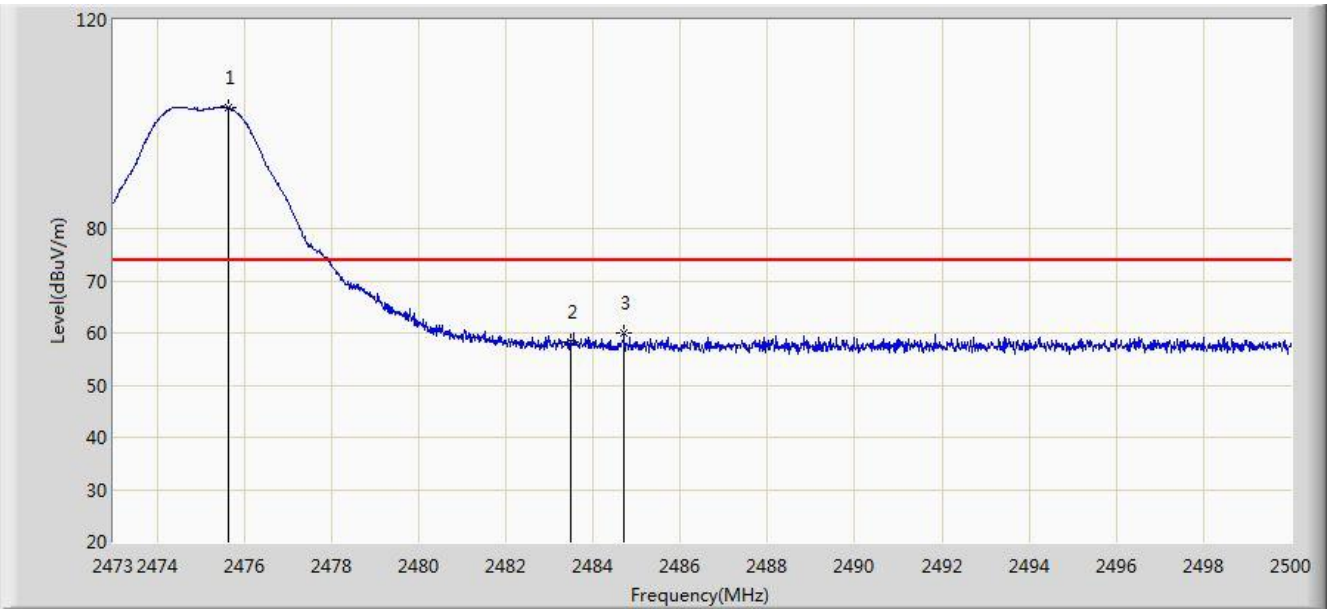


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1			2390.000	45.831	13.277	-8.169	54.000	32.554	AV
2		*	2405.011	96.571	64.036	N/A	N/A	32.535	AV

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

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

Site: AC1	Time: 2018/07/08 - 13:36
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2475MHz	

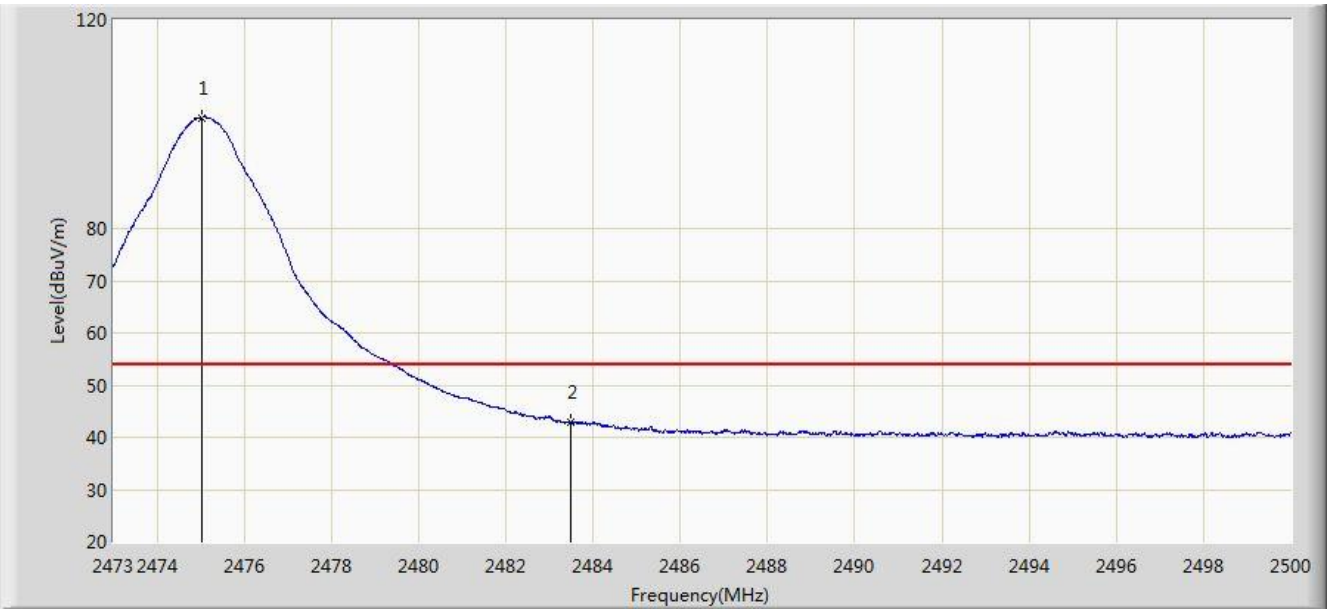


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2475.633	103.194	70.637	N/A	N/A	32.557	PK
2			2483.500	58.304	25.723	-15.696	74.000	32.580	PK
3			2484.705	60.039	27.455	-13.961	74.000	32.584	PK

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

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

Site: AC1	Time: 2018/07/08 - 13:43
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2475MHz	

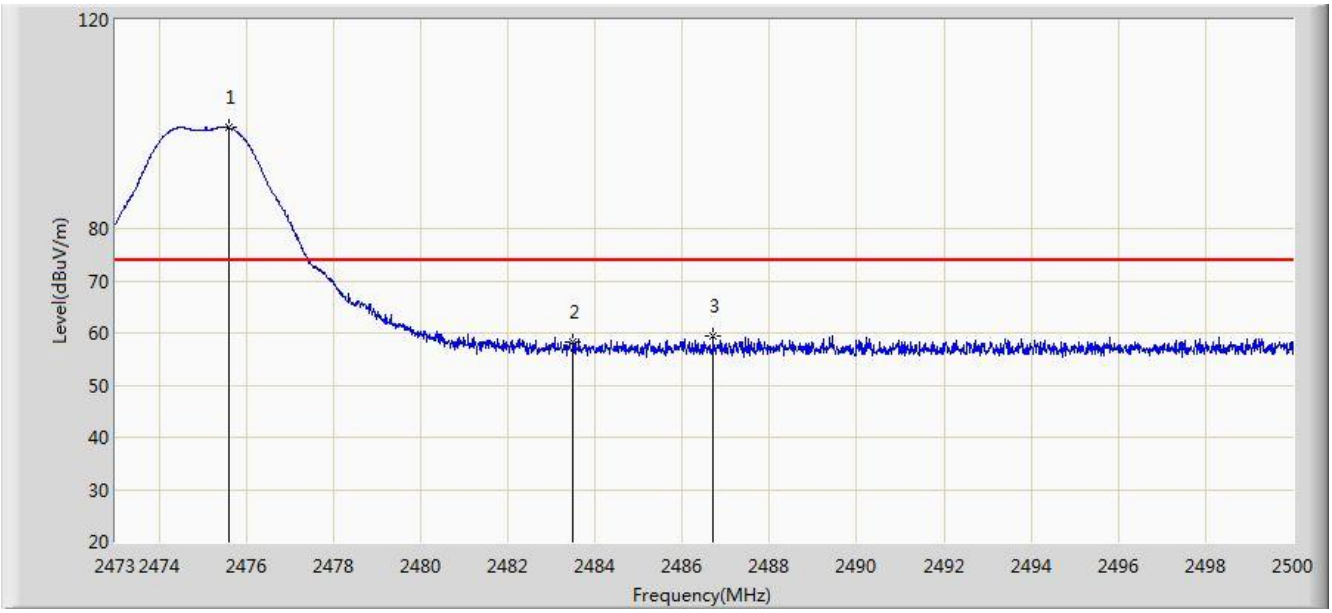


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2475.039	101.291	68.736	N/A	N/A	32.555	AV
2			2483.500	42.971	10.390	-11.029	54.000	32.580	AV

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

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

Site: AC1	Time: 2018/07/08 - 13:43
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2475MHz	

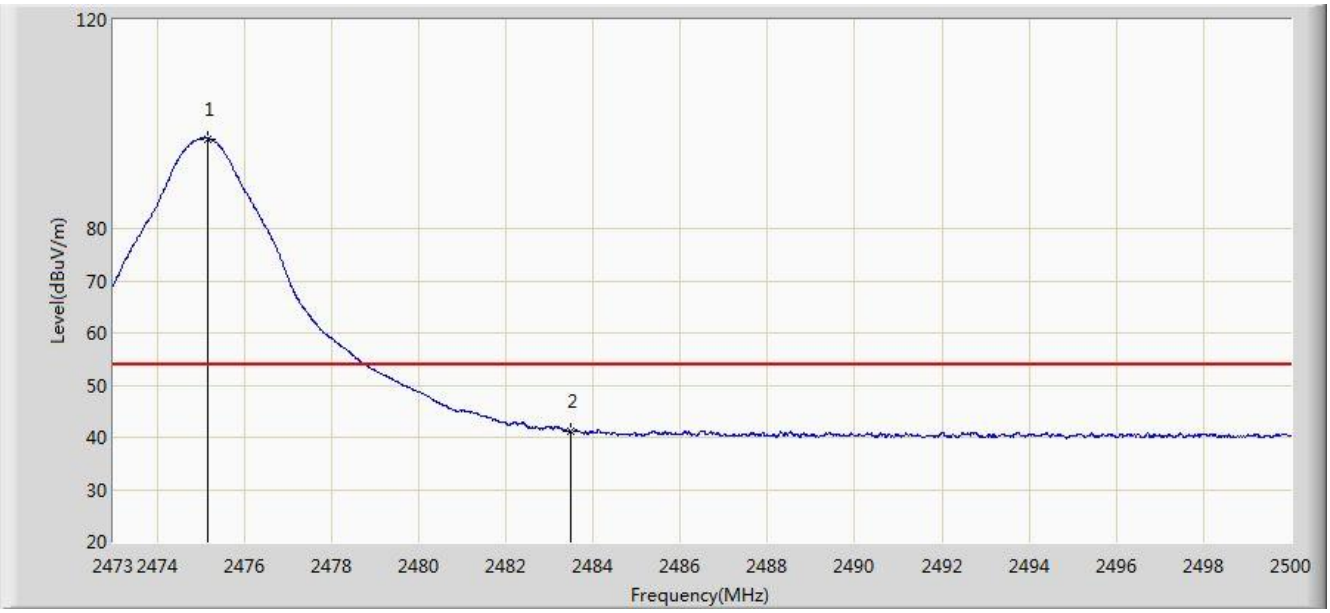


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2475.592	99.386	66.829	N/A	N/A	32.557	PK
2			2483.500	58.175	25.594	-15.825	74.000	32.580	PK
3			2486.702	59.357	26.767	-14.643	74.000	32.590	PK

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

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

Site: AC1	Time: 2018/07/08 - 13:45
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2475MHz	

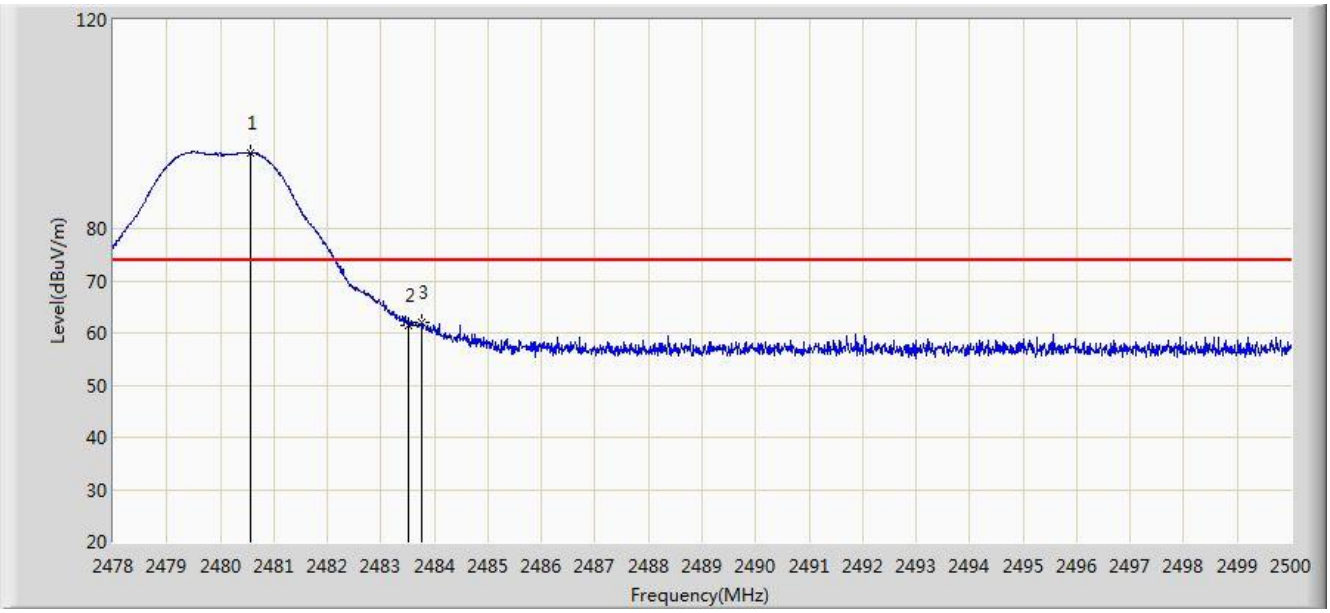


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2475.174	97.241	64.686	N/A	N/A	32.555	AV
2			2483.500	41.083	8.502	-12.917	54.000	32.580	AV

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

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

Site: AC1	Time: 2018/07/08 - 13:46
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2480MHz	

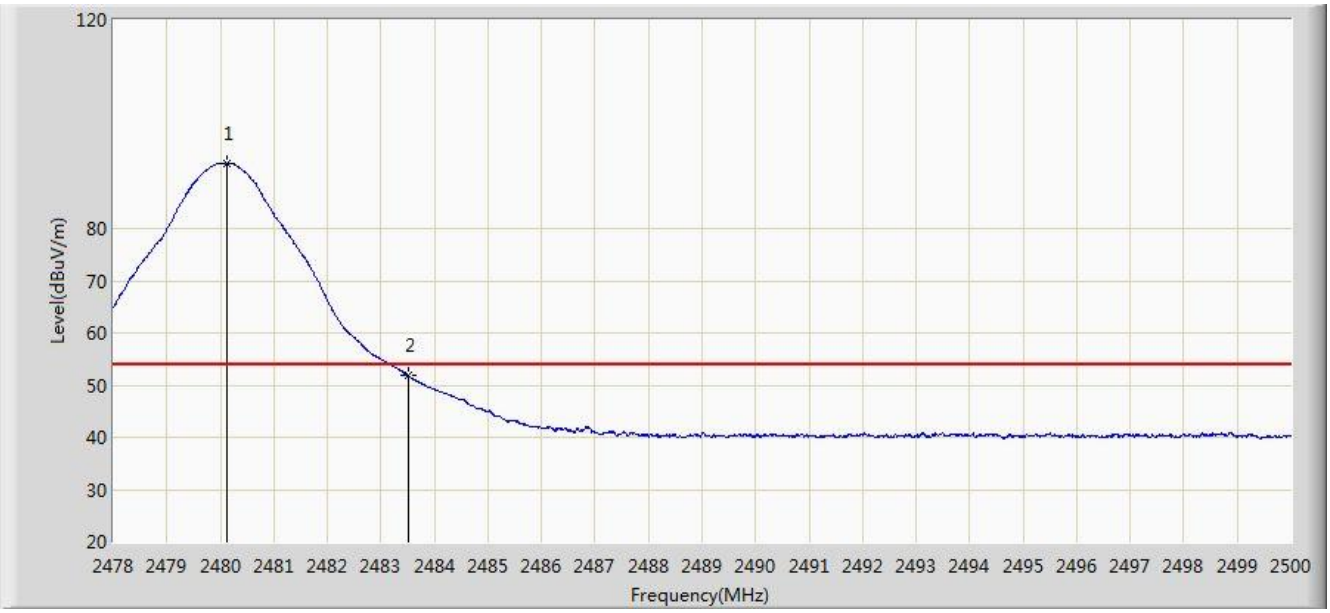


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2480.552	94.587	62.015	N/A	N/A	32.572	PK
2			2483.500	61.317	28.736	-12.683	74.000	32.580	PK
3			2483.753	62.095	29.514	-11.905	74.000	32.582	PK

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

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

Site: AC1	Time: 2018/07/08 - 13:49
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Horizontal
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2480MHz	

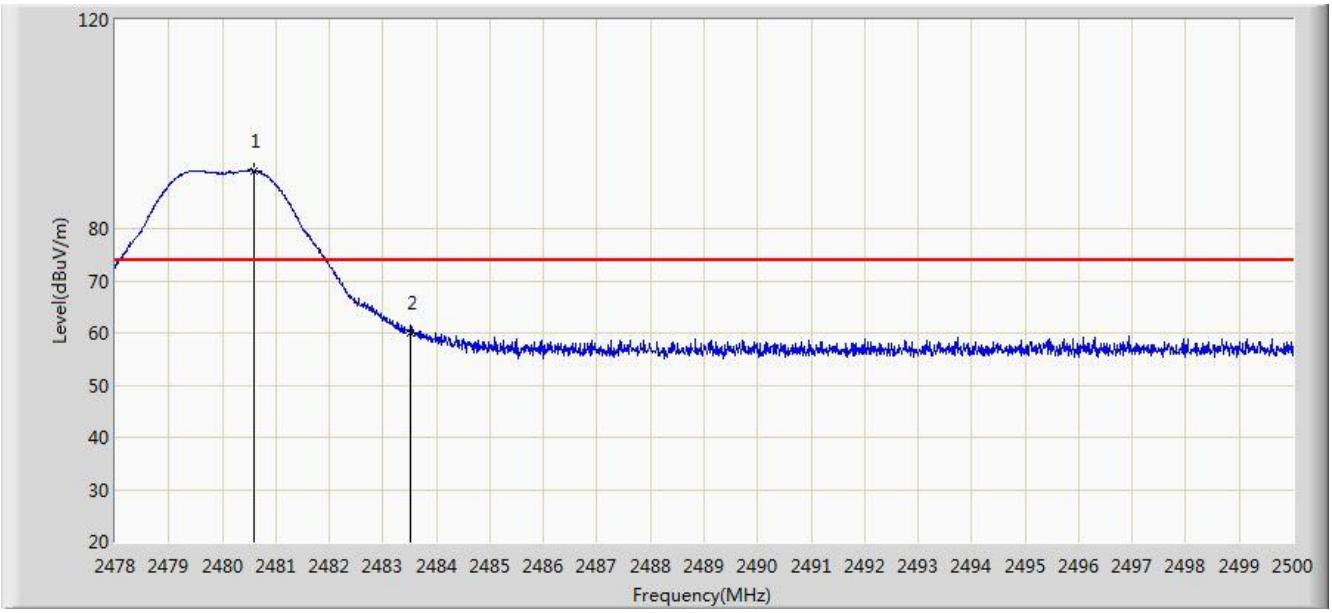


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2480.112	92.536	59.966	N/A	N/A	32.570	AV
2			2483.500	51.793	19.212	-2.207	54.000	32.580	AV

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

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

Site: AC1	Time: 2018/07/08 - 13:50
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2480MHz	

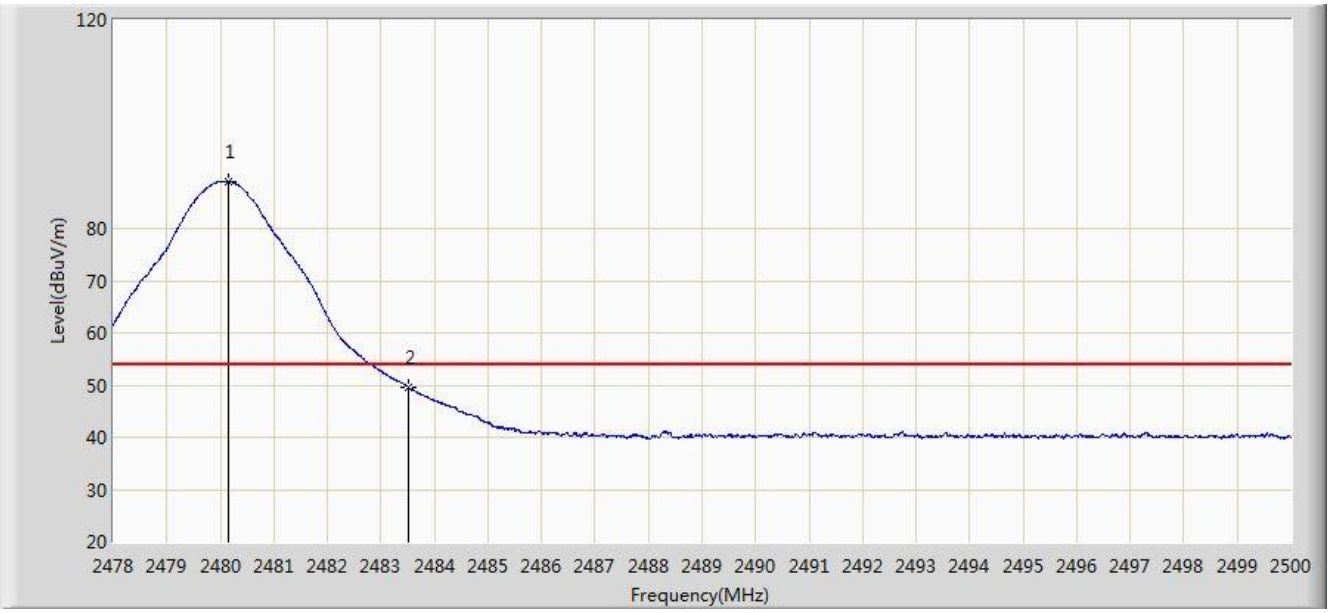


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2480.585	91.121	58.549	N/A	N/A	32.572	PK
2			2483.500	60.021	27.440	-13.979	74.000	32.580	PK

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

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

Site: AC1	Time: 2018/07/08 - 13:51
Limit: FCC_Part15.209_RE(3m)	Engineer: Kevin Ker
Probe: BBHA9120D_1GHz_18GHz	Polarity: Vertical
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode: Transmit by ZigBee at Channel 2480MHz	



No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		*	2480.145	88.970	56.400	N/A	N/A	32.570	AV
2			2483.500	49.595	17.014	-4.405	54.000	32.580	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

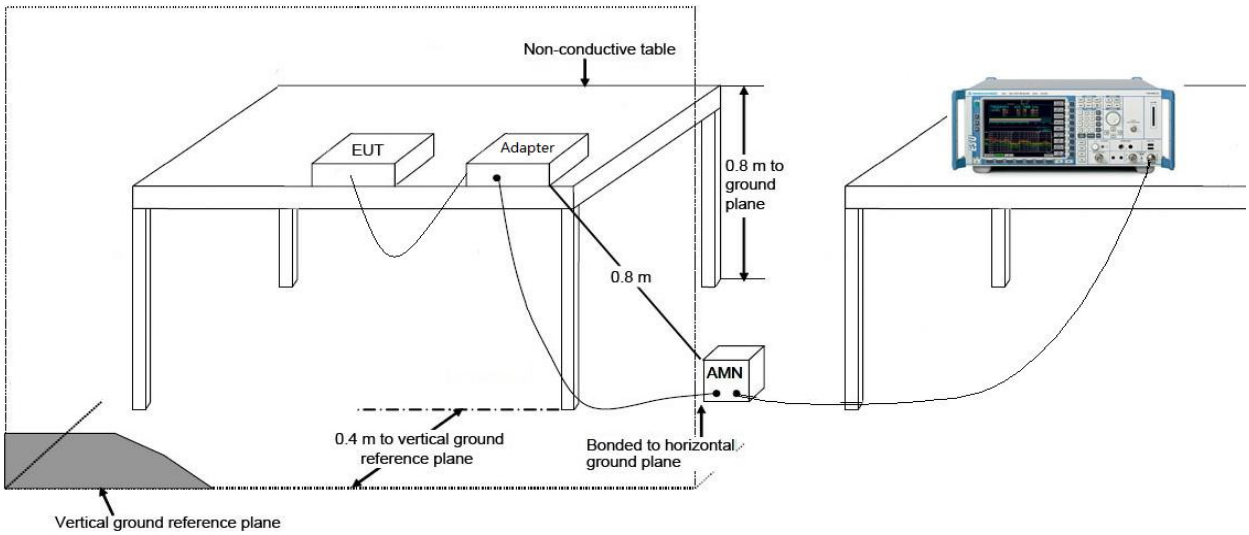
7.8.1.Test Limit

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.

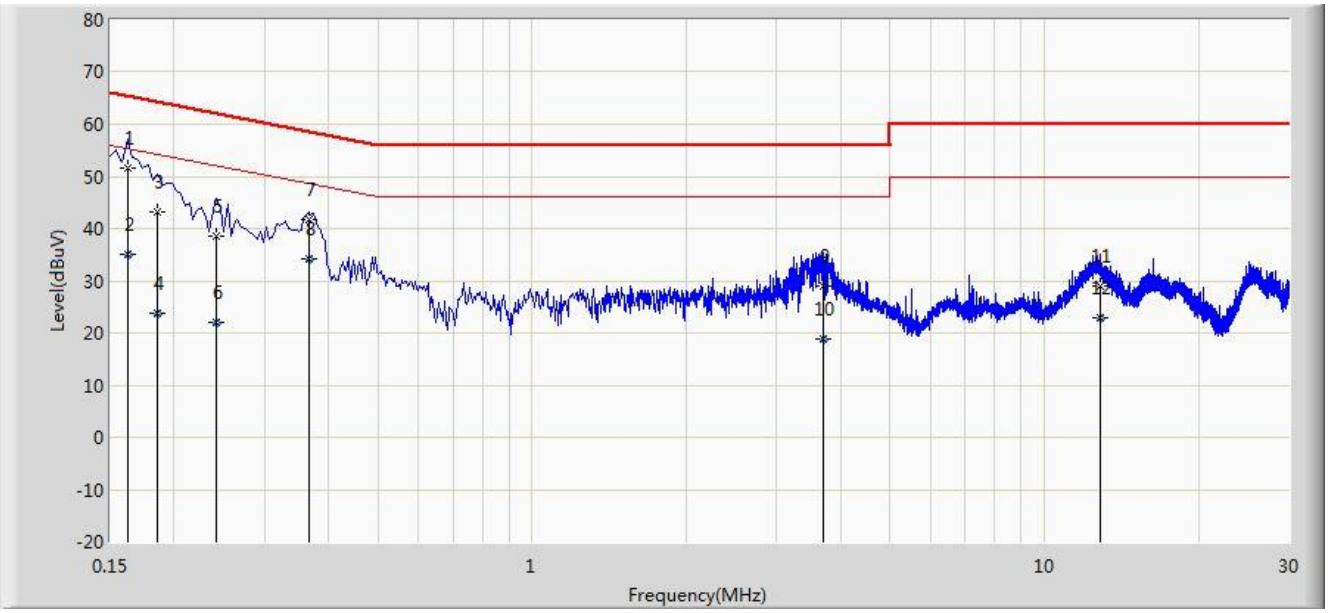
Note 2: The limit decreases linearly with the logarithm of the frequency in the range 0.15MHz to 0.5MHz.

7.8.2.Test Setup



7.8.3.Test Result

Site: SR2	Time: 2018/07/25 - 10:47
Limit: FCC_Part15.207_CE_AC Power	Engineer: Kevin Ker
Probe: ENV216_101683_Filter On	Polarity: Line
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode 1	

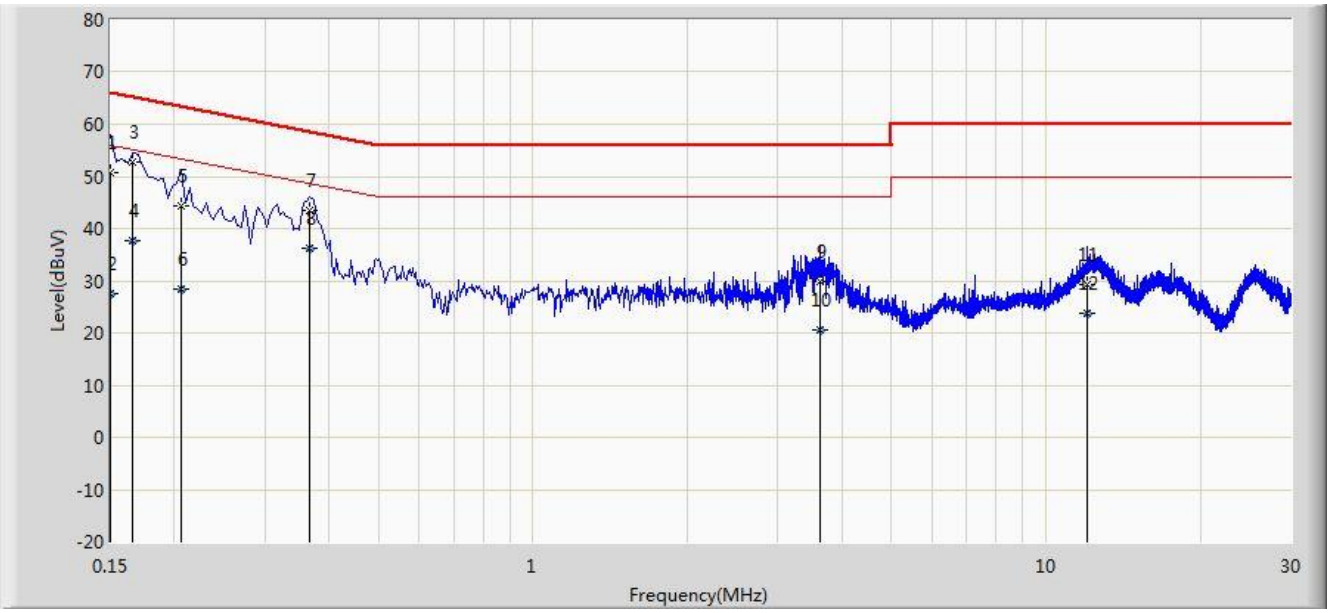


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV)	Factor (dB)	Type
1		*	0.162	51.545	41.448	-13.815	65.361	10.097	QP
2			0.162	35.209	25.112	-20.152	55.361	10.097	AV
3			0.186	43.150	33.112	-21.063	64.213	10.039	QP
4			0.186	23.869	13.830	-30.345	54.213	10.039	AV
5			0.242	38.452	28.495	-23.575	62.027	9.958	QP
6			0.242	21.990	12.033	-30.037	52.027	9.958	AV
7			0.366	41.613	31.556	-16.978	58.591	10.058	QP
8			0.366	34.250	24.193	-14.341	48.591	10.058	AV
9			3.698	28.888	18.945	-27.112	56.000	9.942	QP
10			3.698	18.895	8.953	-27.105	46.000	9.942	AV
11			12.822	29.092	19.016	-30.908	60.000	10.076	QP
12			12.822	22.839	12.762	-27.161	50.000	10.076	AV

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

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

Site: SR2	Time: 2018/07/25 - 10:51
Limit: FCC_Part15.207_CE_AC Power	Engineer: Kevin Ker
Probe: ENV216_101683_Filter On	Polarity: Neutral
EUT: ACCESS POINT(APIN0514)	Power: AC 120V/60Hz
Test Mode 1	

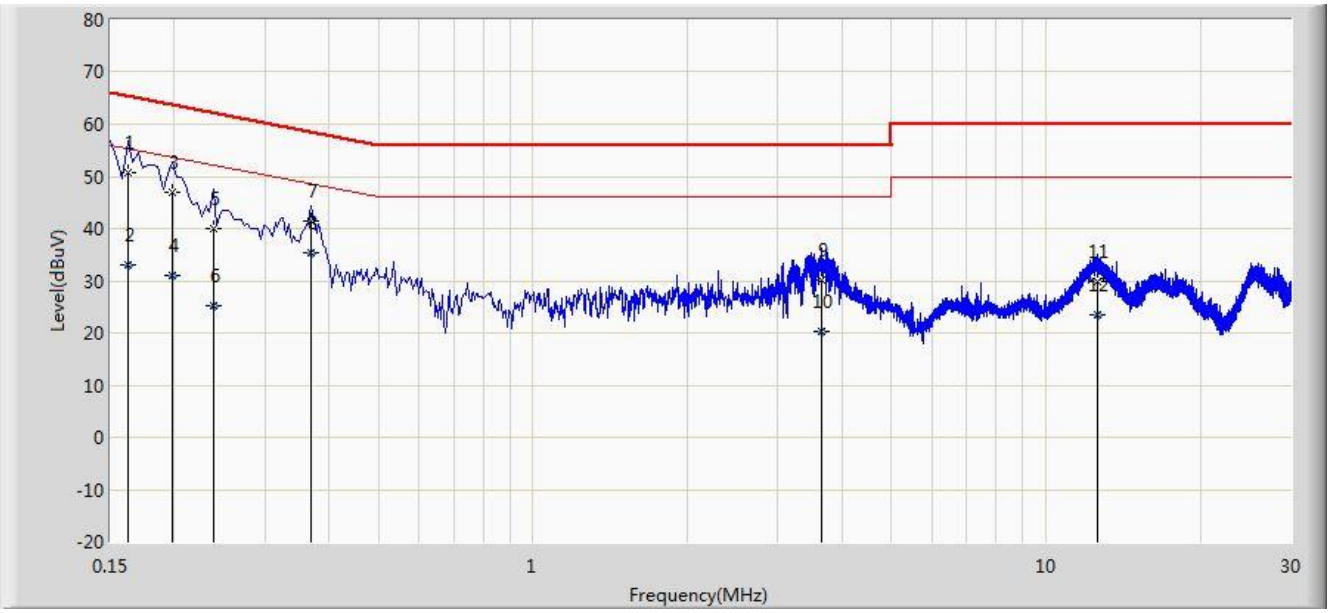


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV)	Factor (dB)	Type
1			0.150	50.786	39.644	-15.214	66.000	11.142	QP
2			0.150	27.526	16.384	-28.474	56.000	11.142	AV
3			0.166	52.633	42.562	-12.525	65.158	10.071	QP
4			0.166	37.729	27.657	-17.430	55.158	10.071	AV
5			0.206	44.390	34.389	-18.975	63.365	10.001	QP
6			0.206	28.424	18.423	-24.941	53.365	10.001	AV
7			0.366	43.452	33.365	-15.139	58.591	10.087	QP
8		*	0.366	36.187	26.100	-12.405	48.591	10.087	AV
9			3.622	29.841	19.913	-26.159	56.000	9.928	QP
10			3.622	20.623	10.695	-25.377	46.000	9.928	AV
11			12.002	29.272	19.161	-30.728	60.000	10.111	QP
12			12.002	23.712	13.601	-26.288	50.000	10.111	AV

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

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

Site: SR2	Time: 2018/07/25 - 10:10
Limit: FCC_Part15.207_CE_AC Power	Engineer: Kevin Ker
Probe: ENV216_101683_Filter On	Polarity: Line
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode 1	

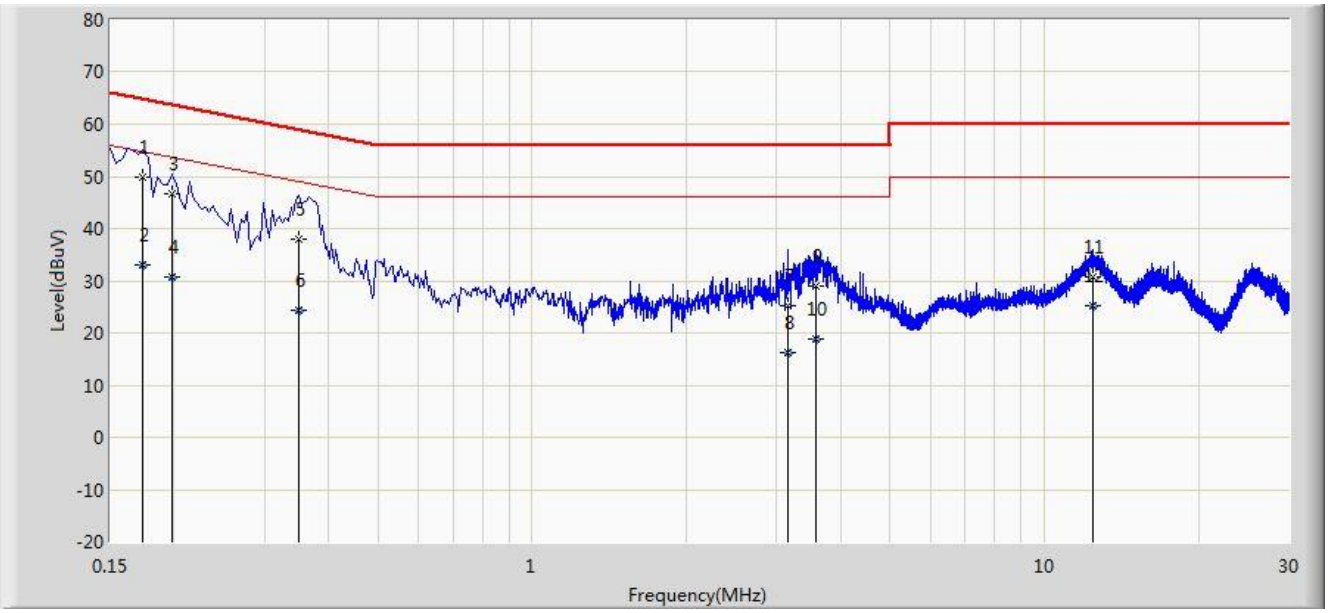


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV)	Factor (dB)	Type
1			0.162	50.688	40.591	-14.673	65.361	10.097	QP
2			0.162	32.952	22.855	-22.409	55.361	10.097	AV
3			0.198	46.843	36.838	-16.851	63.694	10.005	QP
4			0.198	30.941	20.936	-22.753	53.694	10.005	AV
5			0.238	40.023	30.069	-22.142	62.166	9.954	QP
6			0.238	25.151	15.197	-27.015	52.166	9.954	AV
7			0.370	41.371	31.310	-17.130	58.501	10.061	QP
8		*	0.370	35.380	25.319	-13.121	48.501	10.061	AV
9			3.650	30.278	20.349	-25.722	56.000	9.930	QP
10			3.650	20.358	10.428	-25.642	46.000	9.930	AV
11			12.562	29.744	19.681	-30.256	60.000	10.064	QP
12			12.562	23.611	13.548	-26.389	50.000	10.064	AV

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

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

Site: SR2	Time: 2018/07/25 - 10:15
Limit: FCC_Part15.207_CE_AC Power	Engineer: Kevin Ker
Probe: ENV216_101683_Filter On	Polarity: Neutral
EUT: ACCESS POINT(APIN0515)	Power: AC 120V/60Hz
Test Mode 1	



No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV)	Reading Level (dBuV)	Over Limit (dB)	Limit (dBuV)	Factor (dB)	Type
1		*	0.174	49.758	39.701	-15.009	64.767	10.057	QP
2			0.174	33.013	22.956	-21.754	54.767	10.057	AV
3			0.198	46.675	36.661	-17.019	63.694	10.015	QP
4			0.198	30.811	20.796	-22.883	53.694	10.015	AV
5			0.350	38.101	28.026	-20.861	58.962	10.074	QP
6			0.350	24.411	14.336	-24.552	48.962	10.074	AV
7			3.162	25.318	15.455	-30.682	56.000	9.863	QP
8			3.162	16.346	6.483	-29.654	46.000	9.863	AV
9			3.578	29.019	19.097	-26.981	56.000	9.922	QP
10			3.578	18.908	8.986	-27.092	46.000	9.922	AV
11			12.450	30.757	20.652	-29.243	60.000	10.105	QP
12			12.450	25.094	14.990	-24.906	50.000	10.105	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 **ACCESS POINT FCC ID:**

Q9DAPIN0514515 is in compliance with Part 15C of the FCC Rules.

The End