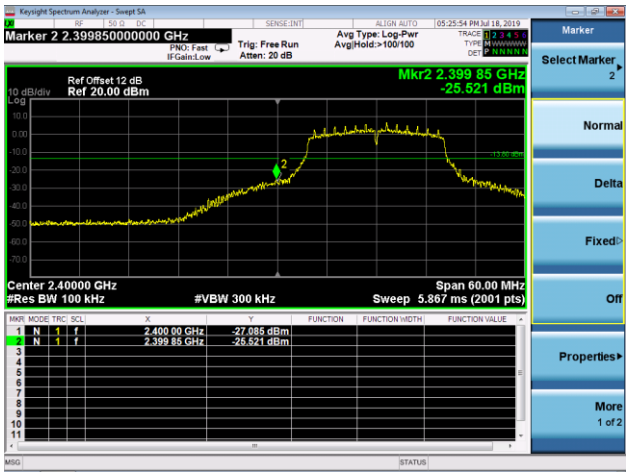
802.11g Out-of-Band Emissions

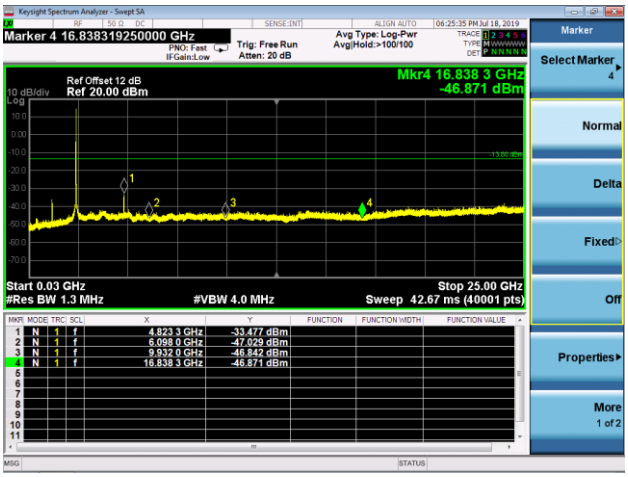
Channel 01 (2412MHz)

100kHz PSD Reference Level

Low Band Edge



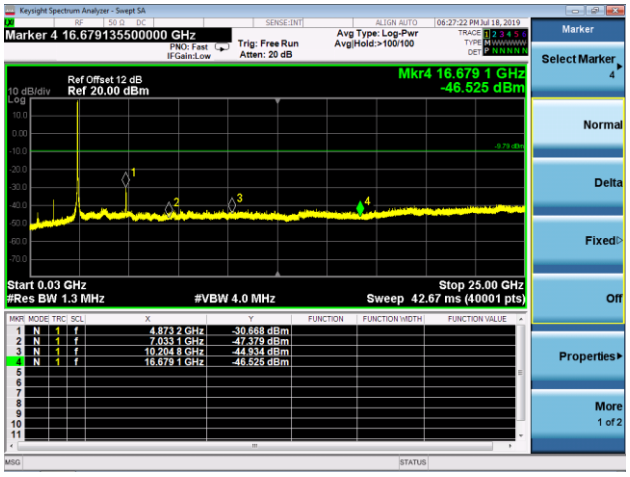
Spurious Emission



Channel 06 (2437MHz)

100kHz PSD Reference Level

Spurious Emission



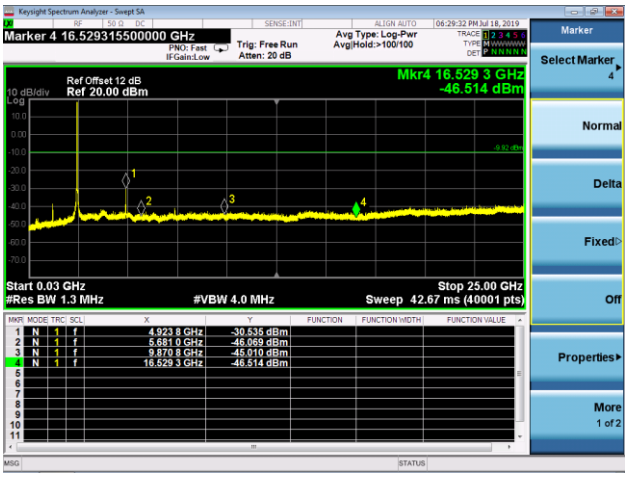
802.11g Out-of-Band Emissions

Channel 11 (2462MHz)

100kHz PSD Reference Level

High Band Edge

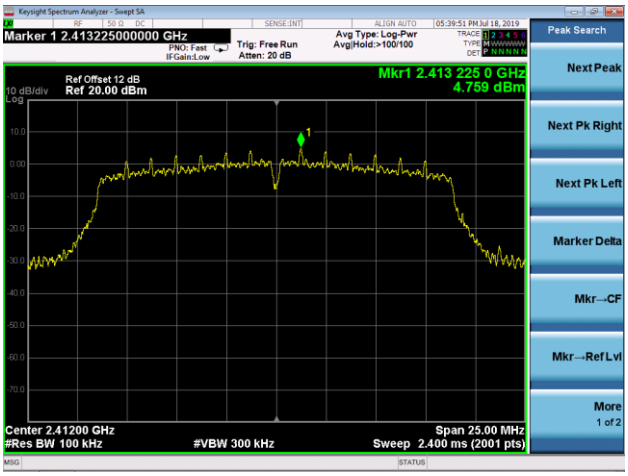
Spurious Emission



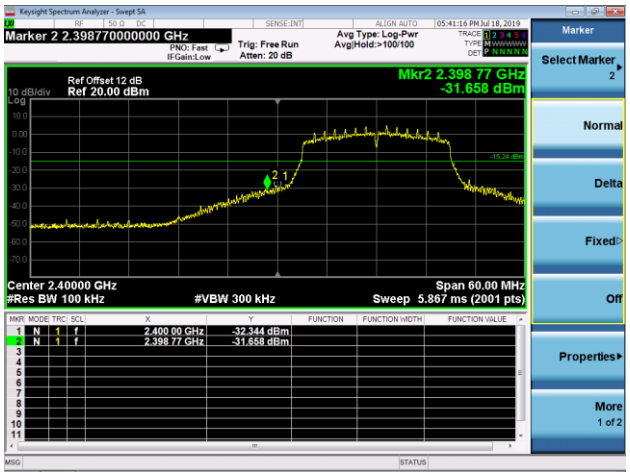
802.11n-HT20 Out-of-Band Emissions

Channel 01 (2412MHz)

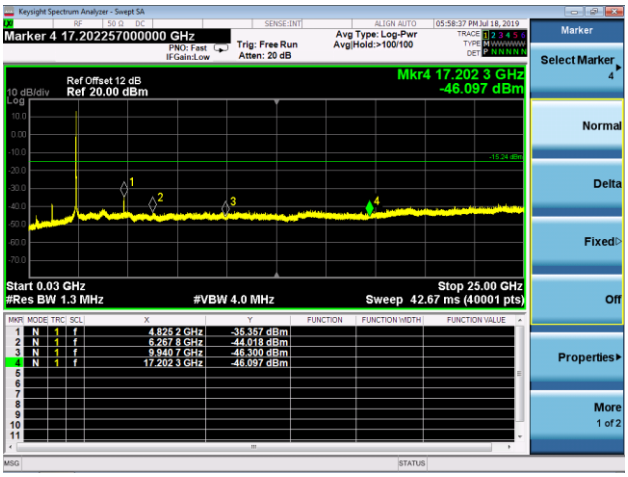
100kHz PSD Reference Level



Low Band Edge

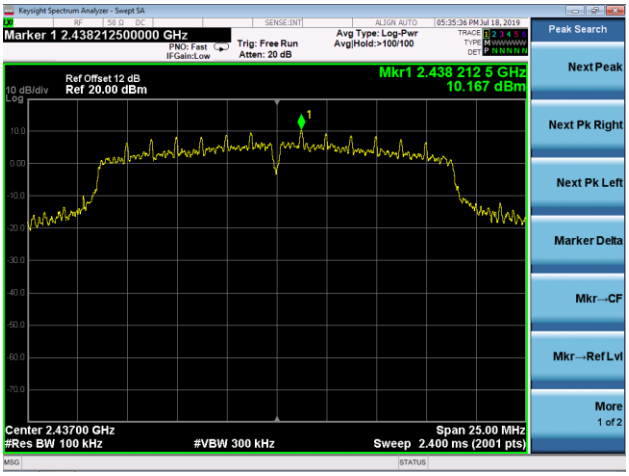


Spurious Emission

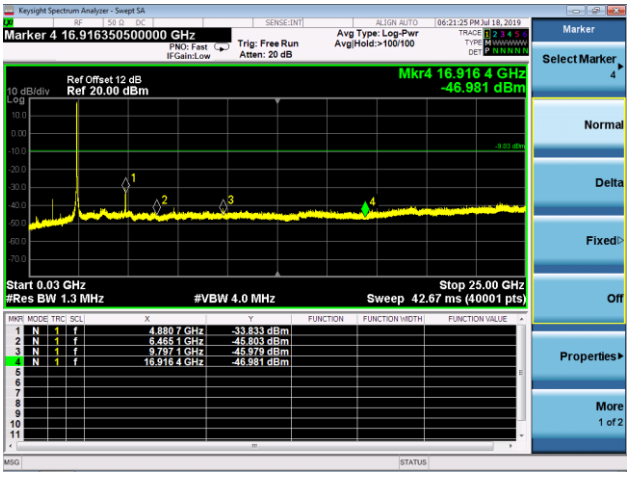


Channel 06 (2437MHz)

100kHz PSD Reference Level



Spurious Emission



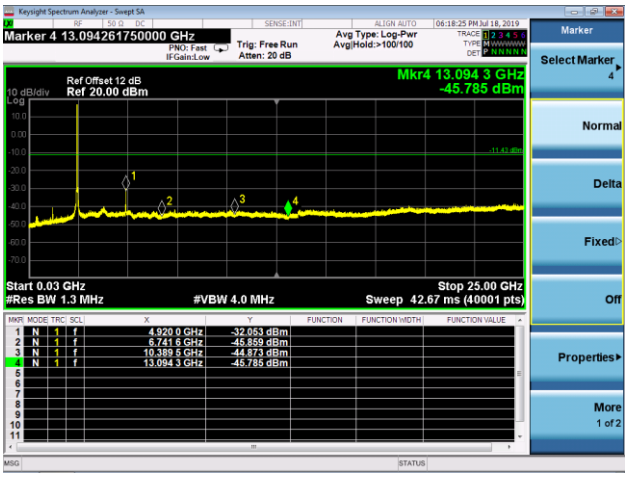
802.11n-HT20 Out-of-Band Emissions

Channel 11 (2462MHz)

100kHz PSD Reference Level

High Band Edge

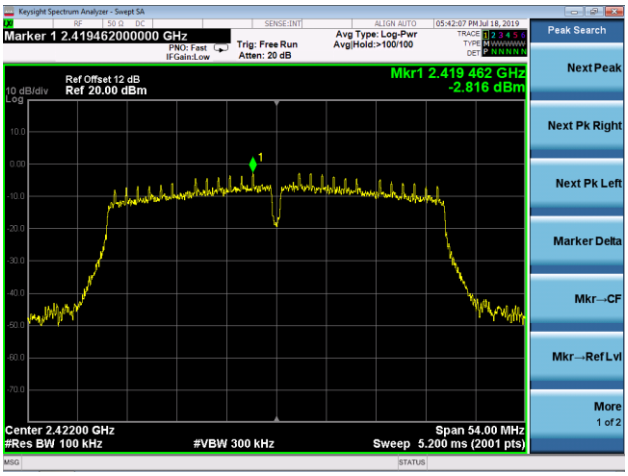
Spurious Emission



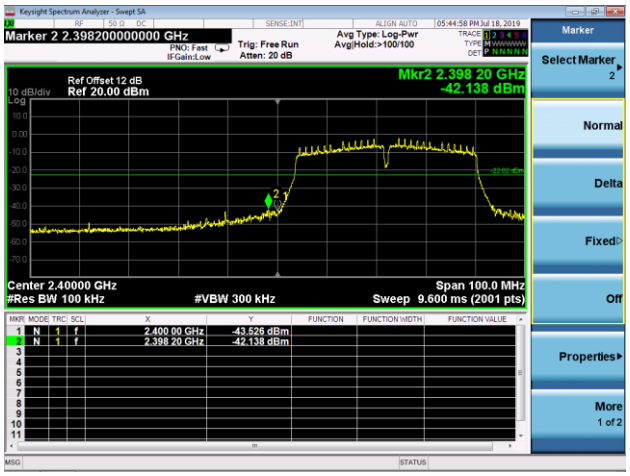
802.11n-HT40 Out-of-Band Emissions

Channel 03 (2422MHz)

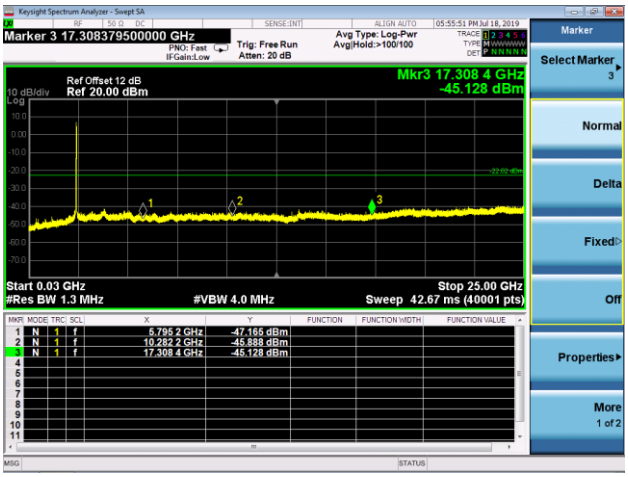
100kHz PSD Reference Level



Low Band Edge

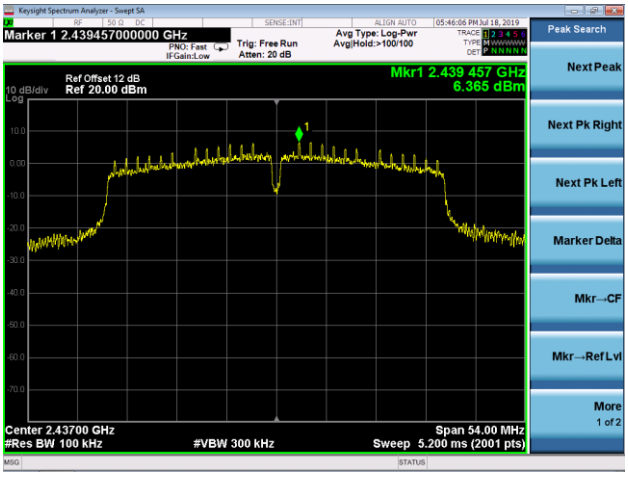


Spurious Emission

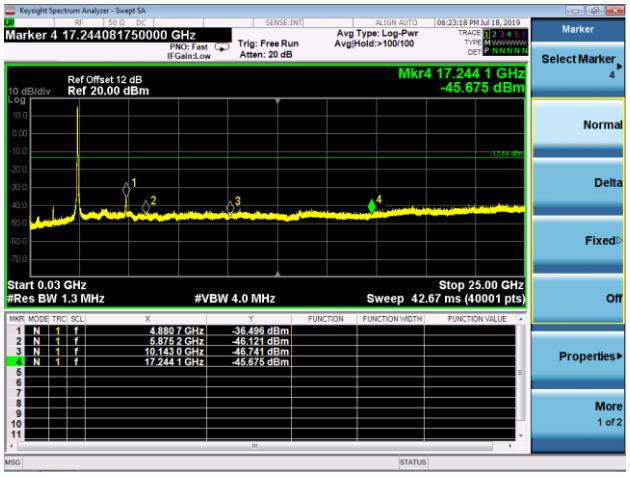


Channel 06 (2437MHz)

100kHz PSD Reference Level



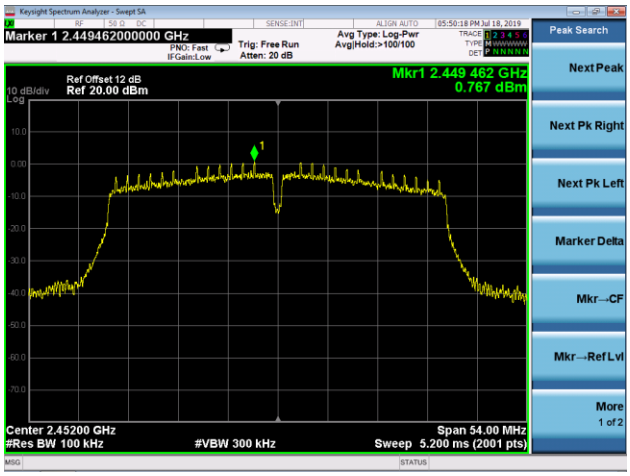
Spurious Emission



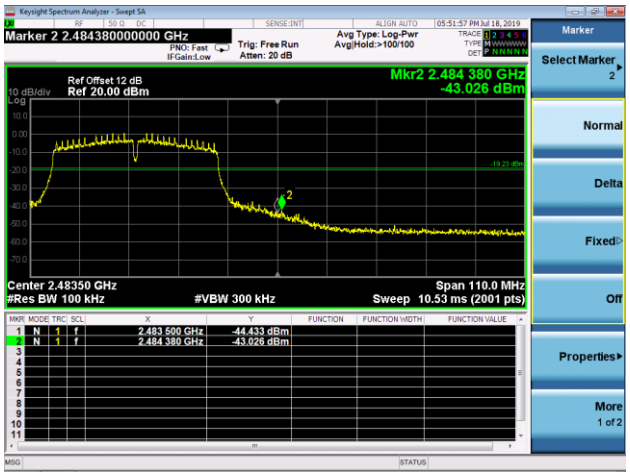
802.11n-HT40 Out-of-Band Emissions

Channel 09 (2452MHz)

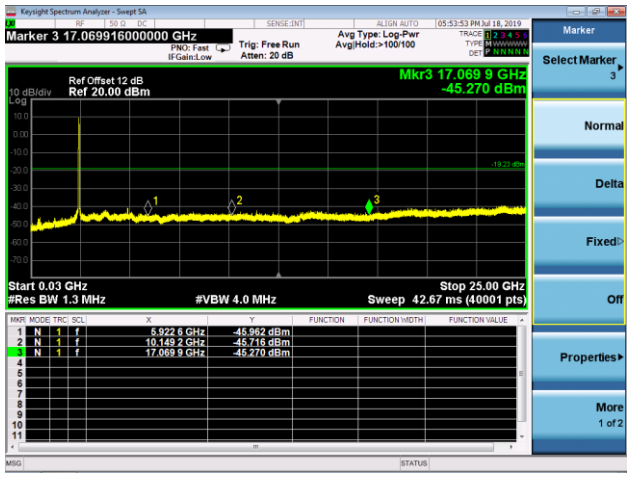
100kHz PSD Reference Level



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.

FCC Part 15 Subpart C Paragraph 15.209		
Frequency (MHz)	Field Strength (μV/m)	Measured Distance (m)
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

Table 1 - RBW as a function of frequency

Frequency	RBW
9 ~ 150 kHz	200 ~ 300 Hz
0.15 ~ 30 MHz	9 ~ 10 kHz
30 ~ 1000 MHz	100 ~ 120 kHz
> 1000 MHz	1 MHz

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 = as specified in Table 1
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

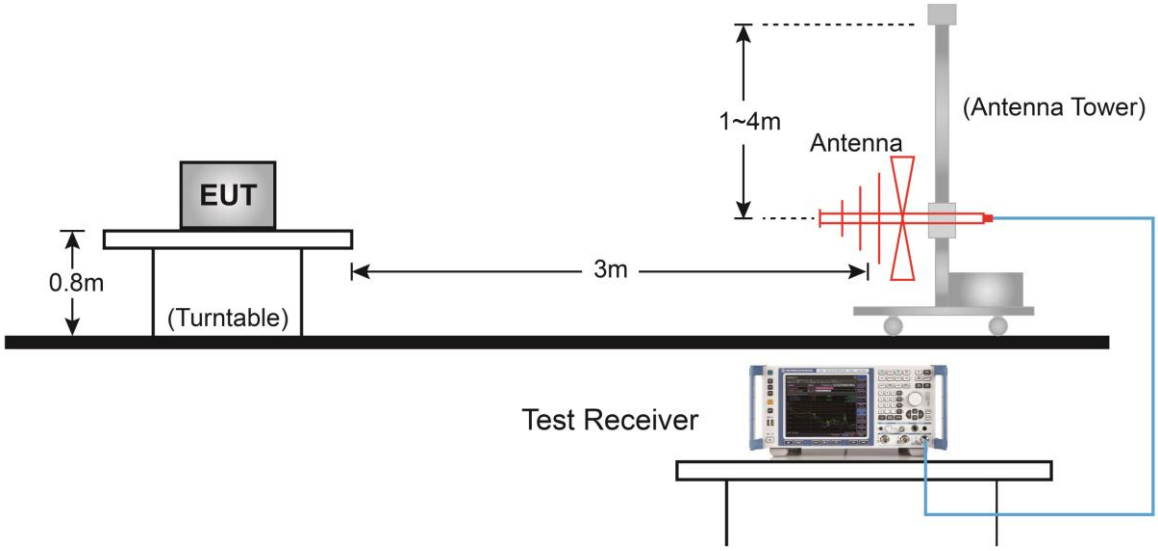
Average Measurements above 1GHz (Method VB)

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 = 10Hz

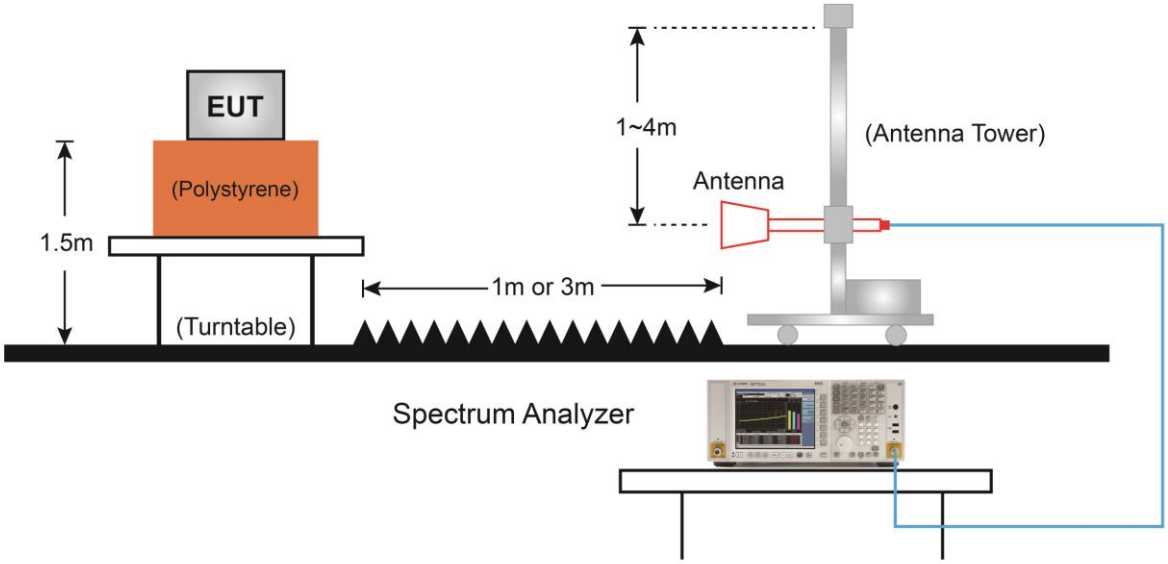
   If the EUT duty cycle is < 98%, set VBW ≥ 1/T. T is the minimum transmission duration
4. Detector = Peak
5. Sweep time = auto
6. Trace mode = max hold
7. Trace was allowed to stabilize

7.6.4.Test Setup

Below 1GHz Test Setup:



Above 1GHz Test Setup:



7.6.5.Test Result

Product	Flat Panel Integrated Satellite Communication Terminal	Temperature	25℃
Test Engineer	Dandy Li	Relative Humidity	54%
Test Site	AC1	Test Date	2019/07/17
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
	4068.5	39.2	2.7	41.9	74.0	-32.1	Peak	Horizontal
	4825.0	43.5	5.5	49.0	74.0	-25.0	Peak	Horizontal
*	5836.5	36.2	7.4	43.6	84.0	-40.4	Peak	Horizontal
*	6916.0	35.8	10.3	46.1	84.0	-37.9	Peak	Horizontal
	4247.0	38.8	3.3	42.1	74.0	-31.9	Peak	Vertical
	4824.0	49.9	5.5	55.4	74.0	-18.6	Peak	Vertical
	4824.0	48.2	5.5	53.7	54.0	-0.3	Average	Vertical
*	5870.5	36.6	7.4	44.0	84.0	-40.0	Peak	Vertical
*	6720.5	36.3	9.6	45.9	84.0	-38.1	Peak	Vertical

Note 1: "*" is not in restricted band, its limit is 20dBc of the fundamental emission level (104.0dBμV/m) or FCC 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	Flat Panel Integrated Satellite Communication Terminal	Temperature	25℃
Test Engineer	Dandy Li	Relative Humidity	54%
Test Site	AC1	Test Date	2019/07/17
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
	4026.0	38.2	2.6	40.8	74.0	-33.2	Peak	Horizontal
	4876.0	48.1	5.7	53.8	74.0	-20.2	Peak	Horizontal
*	6015.0	35.6	7.5	43.1	83.6	-40.5	Peak	Horizontal
*	6610.0	36.3	9.6	45.9	83.6	-37.7	Peak	Horizontal
	4017.5	38.3	2.5	40.8	74.0	-33.2	Peak	Vertical
	4874.0	49.4	5.7	55.1	74.0	-18.9	Peak	Vertical
	4874.0	47.6	5.7	53.3	54.0	-0.7	Average	Vertical
*	5505.0	36.1	6.7	42.8	83.6	-40.8	Peak	Vertical
*	6771.5	37.3	9.5	46.8	83.6	-36.8	Peak	Vertical

Note 1: "*" is not in restricted band, its limit is 20dBc of the fundamental emission level (103.6dBμV/m) or FCC 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	Flat Panel Integrated Satellite Communication Terminal	Temperature	25℃
Test Engineer	Dandy Li	Relative Humidity	54%
Test Site	AC1	Test Date	2019/07/17
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
	4924.0	50.2	5.8	56.0	74.0	-18.0	Peak	Horizontal
	4924.0	43.7	5.8	49.5	54.0	-4.5	Average	Horizontal
	7383.5	39.8	11.7	51.5	74.0	-22.5	Peak	Horizontal
*	7834.0	34.4	12.1	46.5	83.2	-36.7	Peak	Horizontal
*	8777.5	35.1	13.3	48.4	83.2	-34.8	Peak	Horizontal
	4924.0	49.2	5.8	55.0	74.0	-19.0	Peak	Vertical
	4924.0	47.5	5.8	53.3	54.0	-0.7	Average	Horizontal
	7386.0	45.1	11.7	56.8	74.0	-17.2	Peak	Vertical
	7386.0	40.7	11.7	52.4	54.0	-1.6	Average	Vertical
*	7936.0	35.9	12.6	48.5	83.2	-34.7	Peak	Vertical
*	8701.0	35.2	13.2	48.4	83.2	-34.8	Peak	Vertical

Note 1: "*" is not in restricted band, its limit is 20dBc of the fundamental emission level (103.2dBμV/m) or FCC 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	Flat Panel Integrated Satellite Communication Terminal	Temperature	25℃
Test Engineer	Dandy Li	Relative Humidity	54%
Test Site	AC1	Test Date	2019/07/17
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
	4255.5	38.4	3.3	41.7	74.0	-32.3	Peak	Horizontal
	4825.0	44.3	5.5	49.8	74.0	-24.2	Peak	Horizontal
*	5930.0	36.4	7.3	43.7	84.2	-40.5	Peak	Horizontal
*	7120.0	35.7	11.4	47.1	84.2	-37.1	Peak	Horizontal
	4051.5	37.8	2.7	40.5	74.0	-33.5	Peak	Vertical
	4824.0	52.7	5.5	58.2	74.0	-15.8	Peak	Vertical
	4824.0	36.8	5.5	42.3	54.0	-11.7	Average	Vertical
*	5862.0	36.3	7.3	43.6	84.2	-40.6	Peak	Vertical
*	6584.5	36.1	9.7	45.8	84.2	-38.4	Peak	Vertical

Note 1: "*" is not in restricted band, its limit is 20dBc of the fundamental emission level (104.2dBμV/m) or FCC 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	Flat Panel Integrated Satellite Communication Terminal	Temperature	25℃
Test Engineer	Dandy Li	Relative Humidity	54%
Test Site	AC1	Test Date	2019/07/17
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
	4874.0	50.6	5.7	56.3	74.0	-17.7	Peak	Horizontal
	4874.0	34.0	5.7	39.7	54.0	-14.3	Average	Horizontal
	7315.5	39.5	11.7	51.2	74.0	-22.8	Peak	Horizontal
*	7961.5	35.5	12.5	48.0	83.6	-35.6	Peak	Horizontal
*	8667.0	35.4	13.0	48.4	83.6	-35.2	Peak	Horizontal
	4874.0	52.0	5.7	57.7	74.0	-16.3	Peak	Vertical
	4874.0	36.7	5.7	42.4	54.0	-11.6	Average	Vertical
	7311.0	46.1	11.7	57.8	74.0	-16.2	Peak	Vertical
	7311.0	28.8	11.7	40.5	54.0	-13.5	Average	Vertical
*	7927.5	35.5	12.5	48.0	83.6	-35.6	Peak	Vertical
*	8650.0	34.8	13.1	47.9	83.6	-35.7	Peak	Vertical

Note 1: "*" is not in restricted band, its limit is 20dBc of the fundamental emission level (103.6dBμV/m) or FCC 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	Flat Panel Integrated Satellite Communication Terminal	Temperature	25℃
Test Engineer	Dandy Li	Relative Humidity	54%
Test Site	AC1	Test Date	2019/07/17
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
	4924.0	48.8	5.8	54.6	74.0	-19.4	Peak	Horizontal
	4924.0	31.3	5.8	37.1	54.0	-16.9	Average	Horizontal
	7386.0	42.8	11.7	54.5	74.0	-19.5	Peak	Horizontal
	7386.0	31.6	11.7	43.3	54.0	-10.7	Average	Horizontal
*	7919.0	35.7	12.4	48.1	83.0	-34.9	Peak	Horizontal
*	8599.0	35.5	12.9	48.4	83.0	-34.6	Peak	Horizontal
	4927.0	47.2	5.8	53.0	74.0	-21.0	Peak	Vertical
	7386.0	47.5	11.7	59.2	74.0	-14.8	Peak	Vertical
	7386.0	32.8	11.7	44.5	54.0	-9.5	Average	Vertical
*	7927.5	36.4	12.5	48.9	83.0	-34.1	Peak	Vertical
*	8930.5	36.2	13.4	49.6	83.0	-33.4	Peak	Vertical

Note 1: "*" is not in restricted band, its limit is 20dBc of the fundamental emission level (103.0dBμV/m) or FCC 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	Flat Panel Integrated Satellite Communication Terminal	Temperature	25℃
Test Engineer	Dandy Li	Relative Humidity	54%
Test Site	AC1	Test Date	2019/07/17
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
	4009.0	37.6	2.5	40.1	74.0	-33.9	Peak	Horizontal
	4816.5	46.5	5.6	52.1	74.0	-21.9	Peak	Horizontal
*	5785.5	35.8	7.1	42.9	82.4	-39.5	Peak	Horizontal
*	6975.5	35.6	10.6	46.2	82.4	-36.2	Peak	Horizontal
	4298.0	37.1	3.6	40.7	74.0	-33.3	Peak	Vertical
	4824.0	53.0	5.5	58.5	74.0	-15.5	Peak	Vertical
	4824.0	41.2	5.5	46.7	54.0	-7.3	Average	Vertical
*	6006.5	36.3	7.5	43.8	82.4	-38.6	Peak	Vertical
*	7094.5	35.6	11.3	46.9	82.4	-35.5	Peak	Vertical

Note 1: "*" is not in restricted band, its limit is 20dBc of the fundamental emission level (102.4dBμV/m) or FCC 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	Flat Panel Integrated Satellite Communication Terminal	Temperature	25℃
Test Engineer	Dandy Li	Relative Humidity	54%
Test Site	AC1	Test Date	2019/07/17
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
	4281.0	37.7	3.5	41.2	74.0	-32.8	Peak	Horizontal
	4874.0	50.4	5.7	56.1	74.0	-17.9	Peak	Horizontal
	4874.0	35.5	5.7	41.2	54.0	-12.8	Average	Horizontal
*	5853.5	35.6	7.3	42.9	82.2	-39.3	Peak	Horizontal
*	7128.5	36.3	11.4	47.7	82.2	-34.5	Peak	Horizontal
	4874.0	50.6	5.7	56.3	74.0	-17.7	Peak	Vertical
	4874.0	39.6	5.7	45.3	54.0	-8.7	Average	Vertical
	7307.0	41.1	11.7	52.8	74.0	-21.2	Peak	Vertical
*	7885.0	35.8	12.3	48.1	82.2	-34.1	Peak	Vertical
*	8837.0	35.7	13.3	49.0	82.2	-33.2	Peak	Vertical

Note 1: "*" is not in restricted band, its limit is 20dBc of the fundamental emission level (102.2dBμV/m) or FCC 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	Flat Panel Integrated Satellite Communication Terminal	Temperature	25℃
Test Engineer	Dandy Li	Relative Humidity	54%
Test Site	AC1	Test Date	2019/07/17
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
	4918.5	46.7	5.8	52.5	74.0	-21.5	Peak	Horizontal
	7383.5	39.2	11.7	50.9	74.0	-23.1	Peak	Horizontal
*	7859.5	35.5	12.2	47.7	81.9	-34.2	Peak	Horizontal
*	8998.5	35.2	13.5	48.7	81.9	-33.2	Peak	Horizontal
	4927.0	46.2	5.8	52.0	74.0	-22.0	Peak	Vertical
	7386.0	45.1	11.7	56.8	74.0	-17.2	Peak	Vertical
	7386.0	32.9	11.7	44.6	54.0	-9.4	Average	Vertical
*	7919.0	35.2	12.4	47.6	81.9	-34.3	Peak	Vertical
*	8845.5	35.4	13.4	48.8	81.9	-33.1	Peak	Vertical

Note 1: "*" is not in restricted band, its limit is 20dBc of the fundamental emission level (101.9dBμV/m) or FCC 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	Flat Panel Integrated Satellite Communication Terminal	Temperature	25℃
Test Engineer	Dandy Li	Relative Humidity	54%
Test Site	AC1	Test Date	2019/07/17
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
	4026.0	38.1	2.6	40.7	74.0	-33.3	Peak	Horizontal
	4842.0	38.7	5.5	44.2	74.0	-29.8	Peak	Horizontal
*	5836.5	36.2	7.4	43.6	75.8	-32.2	Peak	Horizontal
*	6550.5	35.7	9.5	45.2	75.8	-30.6	Peak	Horizontal
	4043.0	38.1	2.7	40.8	74.0	-33.2	Peak	Vertical
	4833.5	41.6	5.5	47.1	74.0	-26.9	Peak	Vertical
*	5930.0	36.6	7.3	43.9	75.8	-31.9	Peak	Vertical
*	7120.0	36.0	11.4	47.4	75.8	-28.4	Peak	Vertical

Note 1: “*” is not in restricted band, its limit is 20dBc of the fundamental emission level (95.8dBμV/m) or FCC 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	Flat Panel Integrated Satellite Communication Terminal	Temperature	25℃
Test Engineer	Dandy Li	Relative Humidity	54%
Test Site	AC1	Test Date	2019/07/17
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
	4153.5	37.3	3.1	40.4	74.0	-33.6	Peak	Horizontal
	4874.0	48.6	5.7	54.3	74.0	-19.7	Peak	Horizontal
	4874.0	35.3	5.7	41.0	54.0	-13.0	Average	Horizontal
*	5989.5	36.3	7.4	43.7	76.8	-33.1	Peak	Horizontal
*	6958.5	35.7	10.5	46.2	76.8	-30.6	Peak	Horizontal
	4859.0	46.3	5.7	52.0	74.0	-22.0	Peak	Vertical
	7315.5	39.6	11.7	51.3	74.0	-22.7	Peak	Vertical
*	7851.0	34.6	12.1	46.7	76.8	-30.1	Peak	Vertical
*	8709.5	34.7	13.2	47.9	76.8	-28.9	Peak	Vertical

Note 1: "*" is not in restricted band, its limit is 20dBc of the fundamental emission level (96.8dBμV/m) or FCC 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	Flat Panel Integrated Satellite Communication Terminal	Temperature	25℃
Test Engineer	Dandy Li	Relative Humidity	54%
Test Site	AC1	Test Date	2019/07/17
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
	4060.0	37.8	2.7	40.5	74.0	-33.5	Peak	Horizontal
	4901.5	44.0	5.7	49.7	74.0	-24.3	Peak	Horizontal
*	6091.5	35.5	7.7	43.2	77.9	-34.7	Peak	Horizontal
*	6797.0	34.3	9.7	44.0	77.9	-33.9	Peak	Horizontal
	4128.0	37.6	2.9	40.5	74.0	-33.5	Peak	Vertical
	4901.5	40.4	5.7	46.1	74.0	-27.9	Peak	Vertical
*	5802.5	34.3	7.1	41.4	77.9	-36.5	Peak	Vertical
*	6873.5	36.1	10.0	46.1	77.9	-31.8	Peak	Vertical

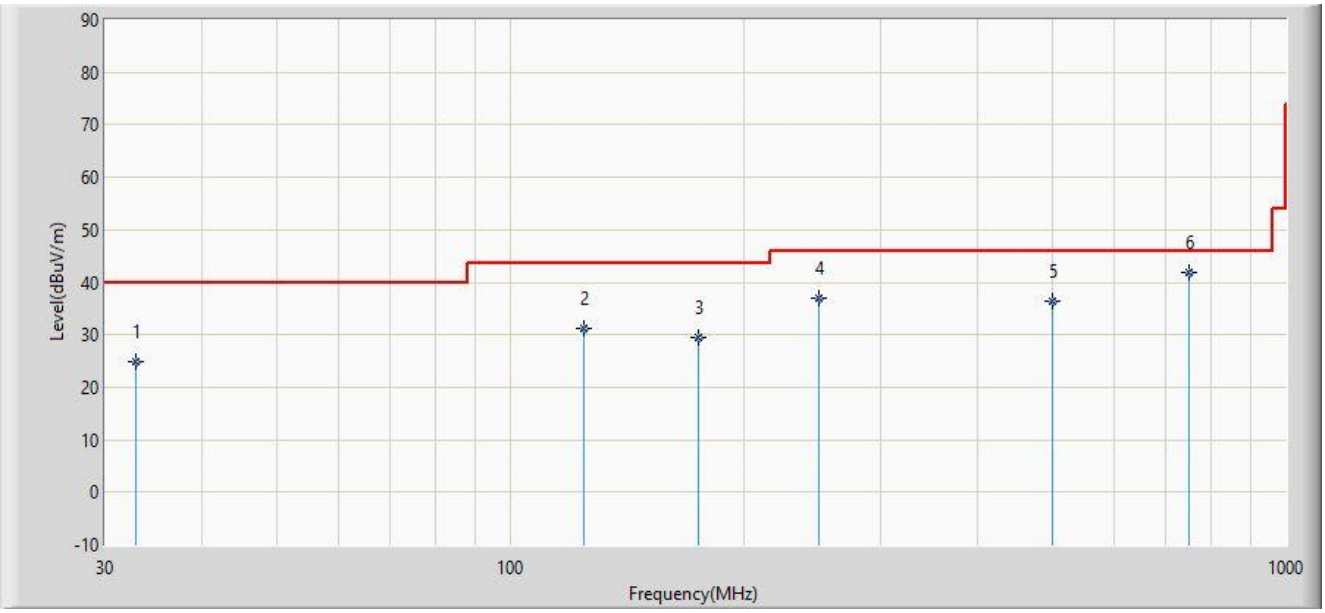
Note 1: "*" is not in restricted band, its limit is 20dBc of the fundamental emission level (97.9dBμV/m) or FCC 15.209 which is higher.

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: 2019/07/18 - 09:37
Limit: FCC_Part15.209_RSE(3m)	Engineer: Kyrie Xie
Probe: VULB 9168 _20-2000MHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at Channel 2412MHz	



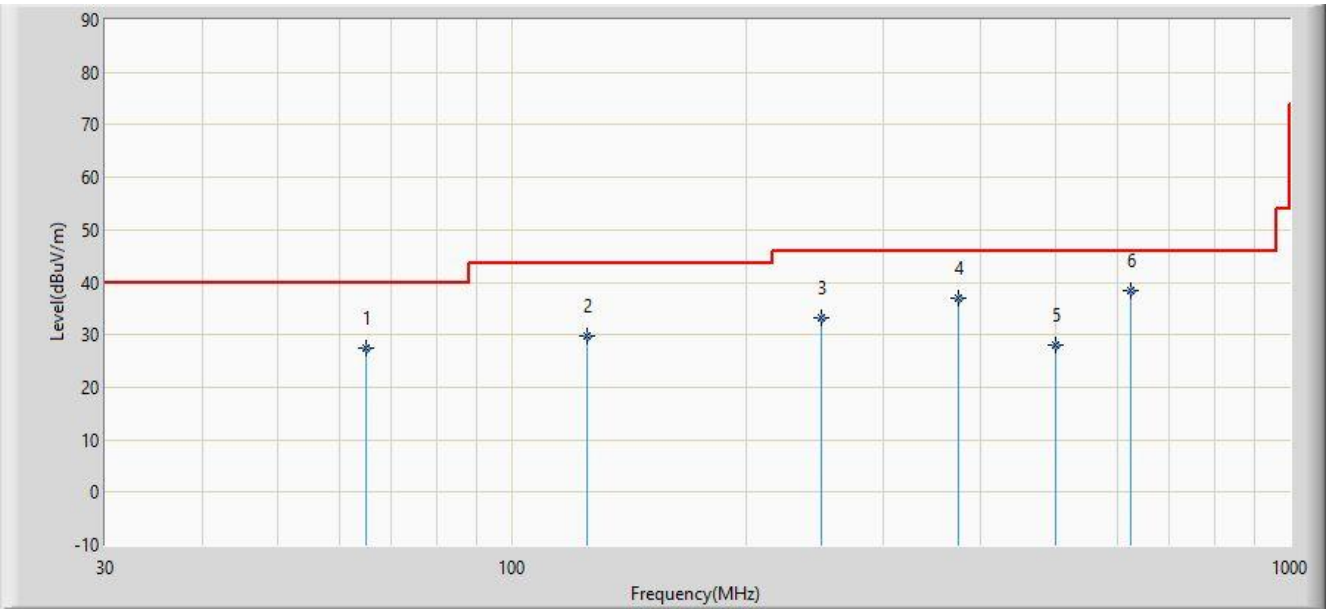
No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		32.910	25.013	11.115	-14.987	40.000	13.899	QP
2		124.575	31.226	17.611	-12.274	43.500	13.615	QP
3		175.015	29.340	15.579	-14.160	43.500	13.761	QP
4		249.705	37.058	23.915	-8.942	46.000	13.142	QP
5		499.965	36.272	17.538	-9.728	46.000	18.734	QP
6	*	750.225	41.967	18.814	-4.033	46.000	23.152	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: 2019/07/18 - 09:47
Limit: FCC_Part15.209_RSE(3m)	Engineer: Kyrie Xie
Probe: VULB 9168 _20-2000MHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at Channel 2412MHz	



No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		64.920	27.350	14.736	-12.650	40.000	12.614	QP
2		124.724	29.894	16.271	-13.606	43.500	13.623	QP
3		249.705	33.190	20.047	-12.810	46.000	13.142	QP
4		374.660	37.109	20.871	-8.891	46.000	16.238	QP
5		499.627	28.148	9.421	-17.852	46.000	18.727	QP
6	*	625.095	38.337	16.910	-7.663	46.000	21.426	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	8.025 - 8.5
4.17725 - 4.17775	37.5 - 38.25	1435 - 1626.5	9.0 - 9.2
4.20725 - 4.20775	73 - 74.6	1645.5 - 1646.5	9.3 - 9.5
6.215 - 6.218	74.8 - 75.2	1660 - 1710	10.6 - 12.7
6.26775 - 6.26825	108 - 121.94	1718.8 - 1722.2	13.25 - 13.4
6.31175 - 6.31225	123 - 138	2200 - 2300	14.47 - 14.5
8.291 - 8.294	149.9 - 150.05	2310 – 2390	15.35 - 16.2
8.362 - 8.366	156.52475 - 156.52525	2483.5 - 2500	17.7 - 21.4
8.37625 - 8.38675	156.7 - 156.9	2690 - 2900	22.01 - 23.12
8.41425 - 8.41475	162.0125 - 167.17	3260 - 3267	23.6 - 24.0
12.29 - 12.293	167.72 - 173.2	3332 - 3339	31.2 - 31.8
12.51975 - 12.52025	240 - 285	3345.8 - 3358	36.43 - 36.5
12.57675 - 12.57725	322 - 335.4	3600 - 4400	([2])
13.36 - 13.41	--	--	--

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 (μV/m)	Measured Distance (m)
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

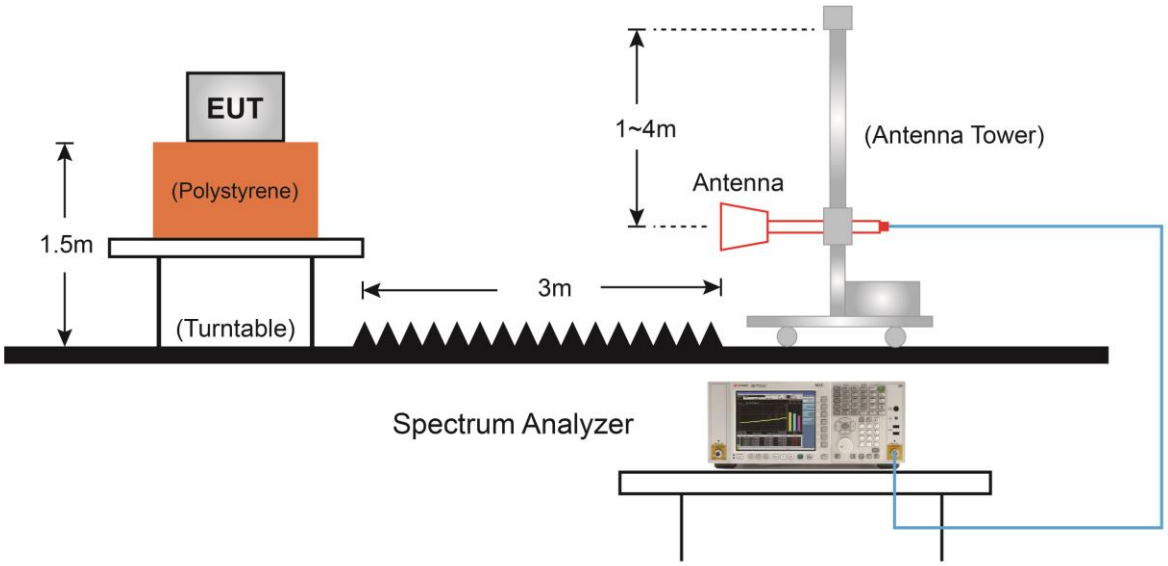
1. Analyzer center frequency was set to the frequency of the radiated spurious emission of interest
2. RBW = 1MHz
3. VBW = 3MHz
4. Detector = Peak
5. Sweep time = Auto couple
6. Trace mode = Max hold
7. Trace was allowed to stabilize

Average Field Strength Measurements

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 = 10Hz
4. If the EUT duty cycle is < 98%, set VBW ≥ 1/T. T is the minimum transmission duration
5. Detector = Peak
6. Sweep time = Auto
7. Trace mode = Max hold

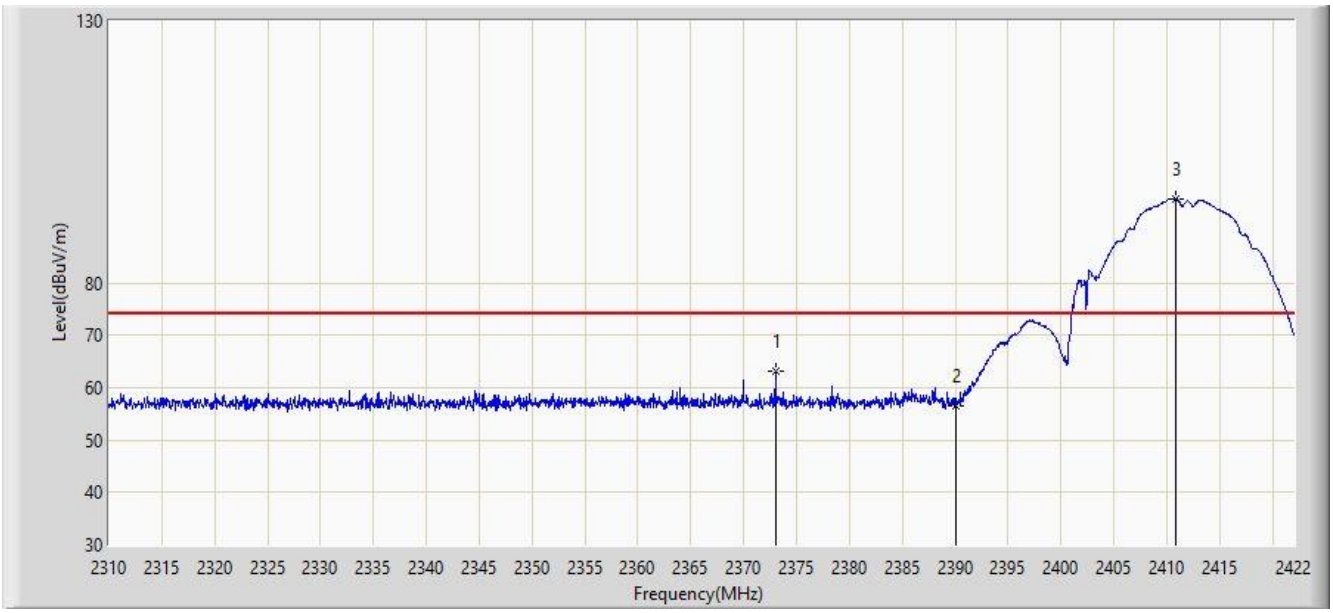
Trace was allowed to stabilize

7.7.4.Test Setup



7.7.5.Test Result

Site: AC1	Time: 2019/07/17 - 19:55
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at channel 2412MHz	

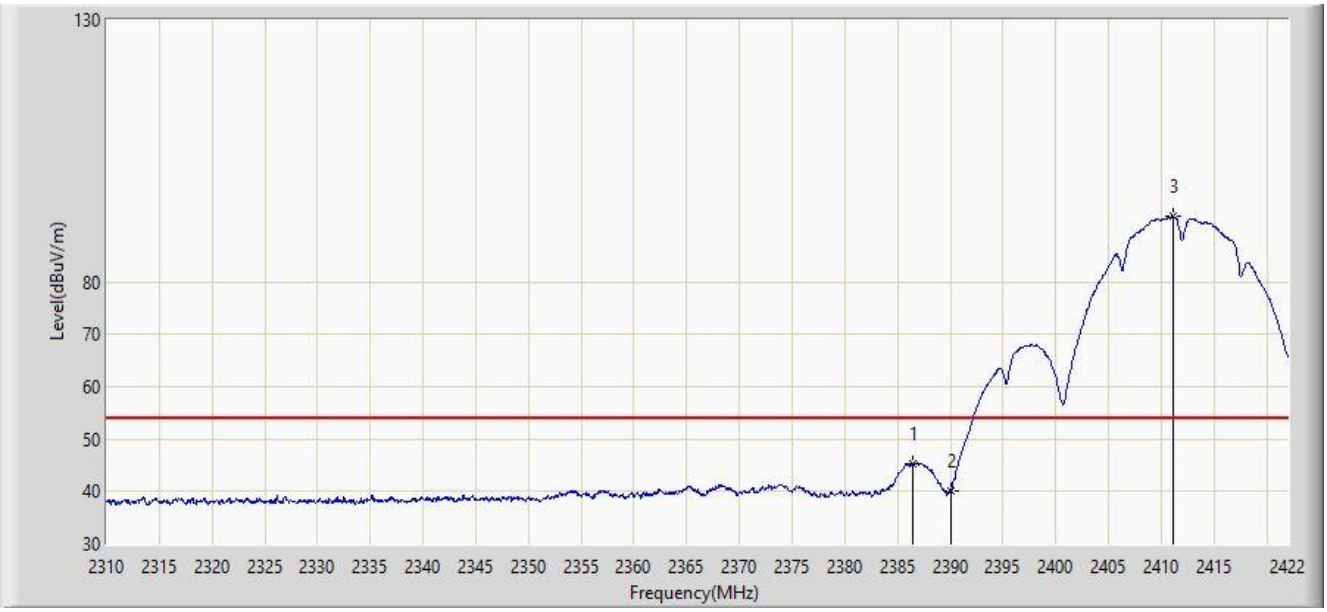


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2373.000	63.216	30.770	-10.784	74.000	32.446	PK
2		2390.000	56.415	24.002	-17.585	74.000	32.413	PK
3	*	2410.800	96.013	63.627	N/A	N/A	32.386	PK

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

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

Site: AC1	Time: 2019/07/17 - 19:57
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at channel 2412MHz	

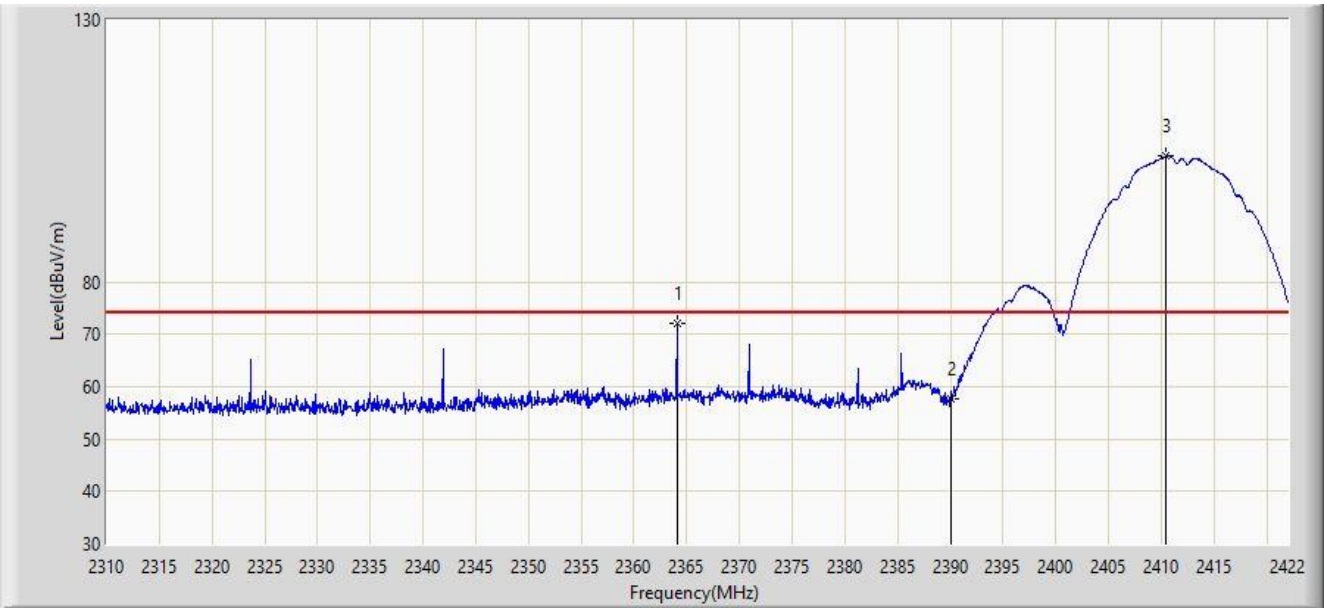


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2386.384	45.402	12.983	-8.598	54.000	32.419	AV
2		2390.000	40.047	7.634	-13.953	54.000	32.413	AV
3	*	2411.136	92.585	60.200	N/A	N/A	32.385	AV

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

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

Site: AC1	Time: 2019/07/17 - 19:54
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at channel 2412MHz	

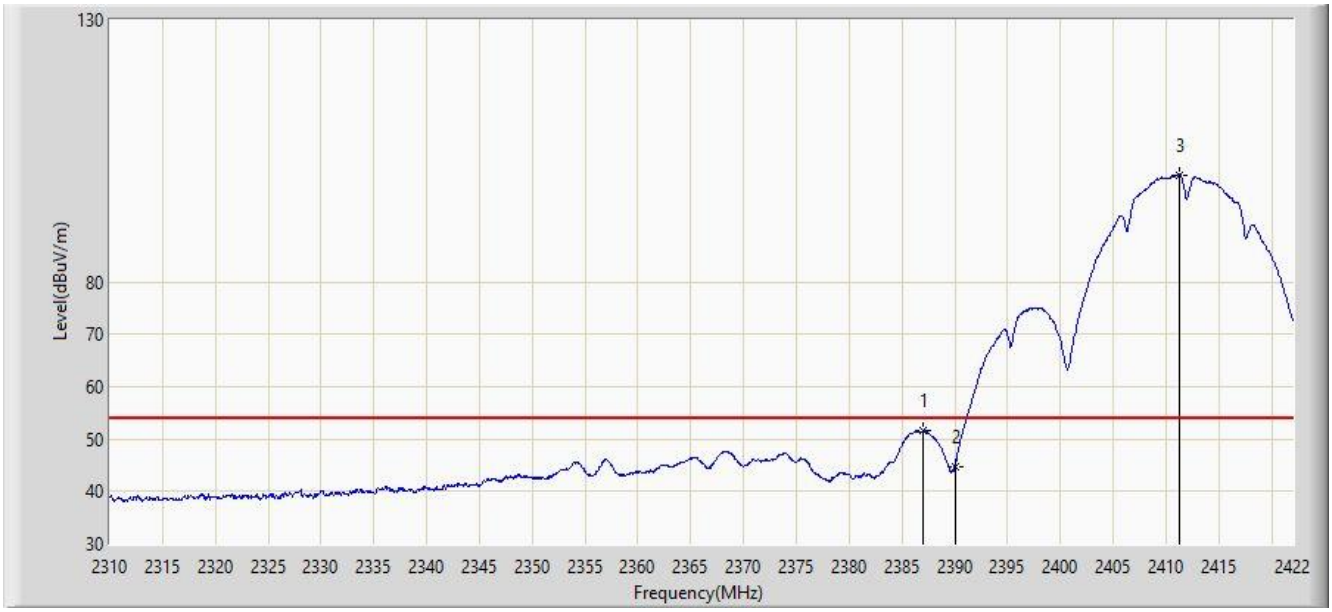


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2364.096	72.086	39.620	-1.914	74.000	32.465	PK
2		2390.000	57.641	25.228	-16.359	74.000	32.413	PK
3	*	2410.464	103.953	71.567	N/A	N/A	32.386	PK

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

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

Site: AC1	Time: 2019/07/17 - 19:54
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at channel 2412MHz	

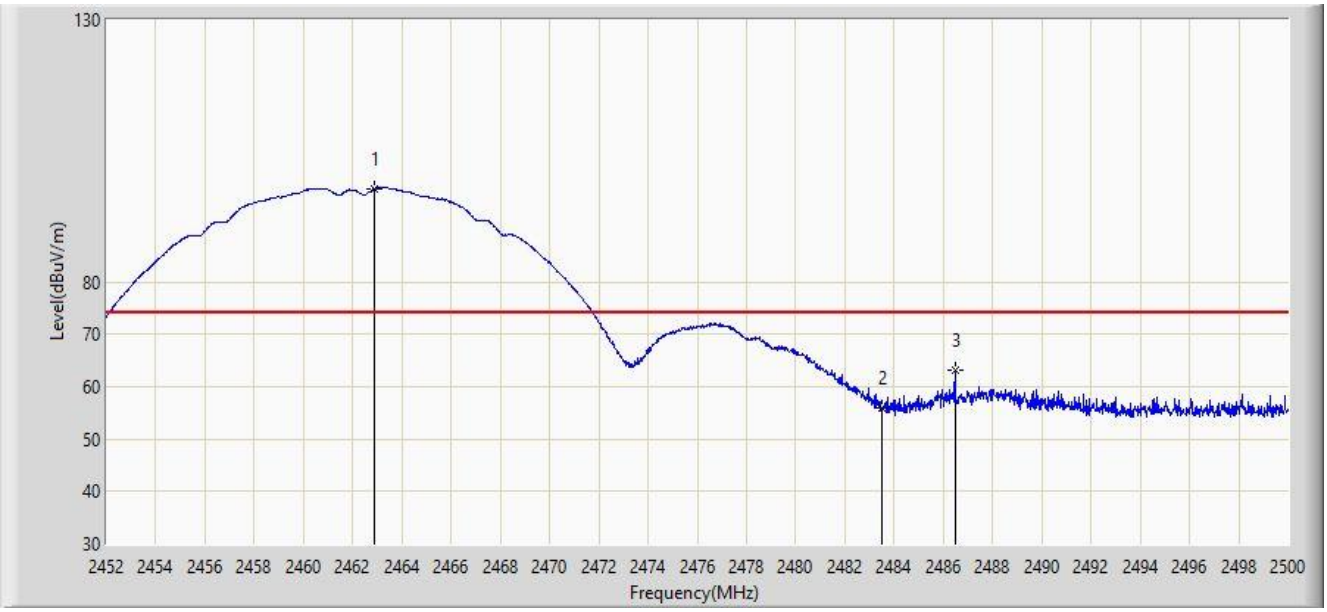


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2387.000	51.489	19.071	-2.511	54.000	32.419	AV
2		2390.000	44.719	12.306	-9.281	54.000	32.413	AV
3	*	2411.304	100.399	68.014	N/A	N/A	32.385	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:02
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at channel 2462MHz	



No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2462.896	97.864	65.496	N/A	N/A	32.368	PK
2		2483.500	55.800	23.385	-18.200	74.000	32.416	PK
3		2486.464	63.214	30.793	-10.786	74.000	32.421	PK

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

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

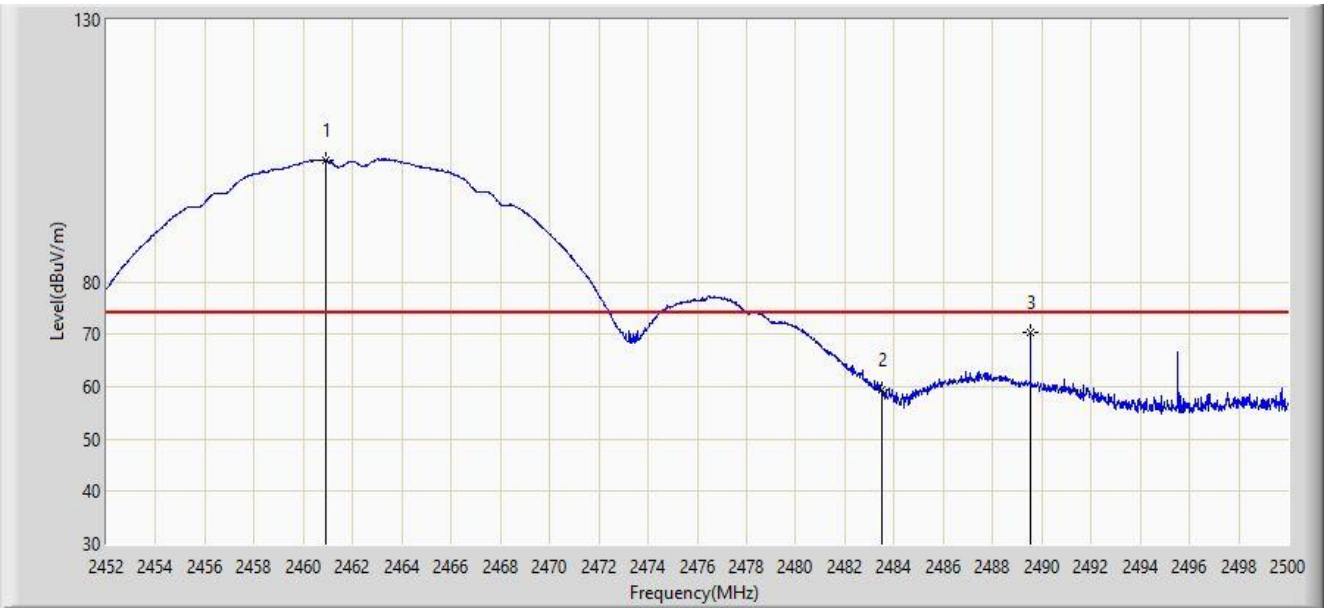
Site: AC1	Time: 2019/07/17 - 20:03
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at channel 2462MHz	

No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2461.312	94.279	61.914	N/A	N/A	32.365	AV
2		2483.500	44.287	11.872	-9.713	54.000	32.416	AV
3		2487.016	47.548	15.126	-6.452	54.000	32.422	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:01
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at channel 2462MHz	



No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2460.880	103.239	70.875	N/A	N/A	32.364	PK
2		2483.500	59.306	26.891	-14.694	74.000	32.416	PK
3		2489.536	70.417	37.990	-3.583	74.000	32.428	PK

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

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

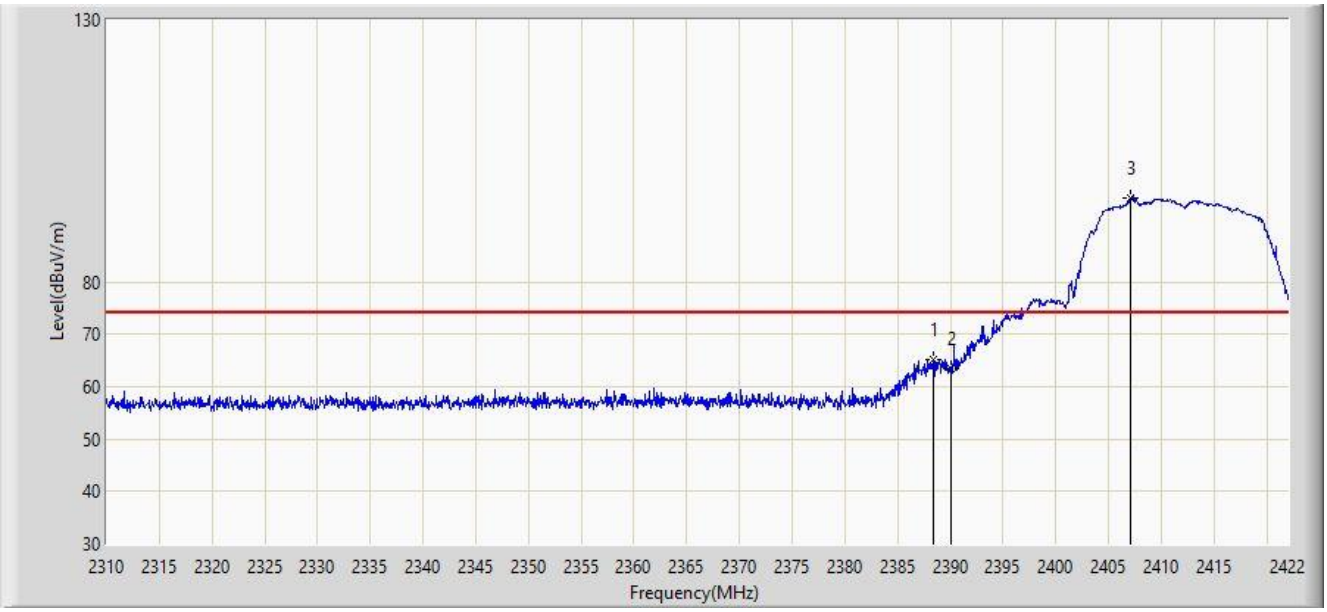
Site: AC1	Time: 2019/07/17 - 20:01
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11b at channel 2462MHz	

No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2461.096	99.755	67.390	N/A	N/A	32.365	AV
2		2483.500	48.833	16.418	-5.167	54.000	32.416	AV
3		2487.424	52.851	20.428	-1.149	54.000	32.423	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:08
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at channel 2412MHz	

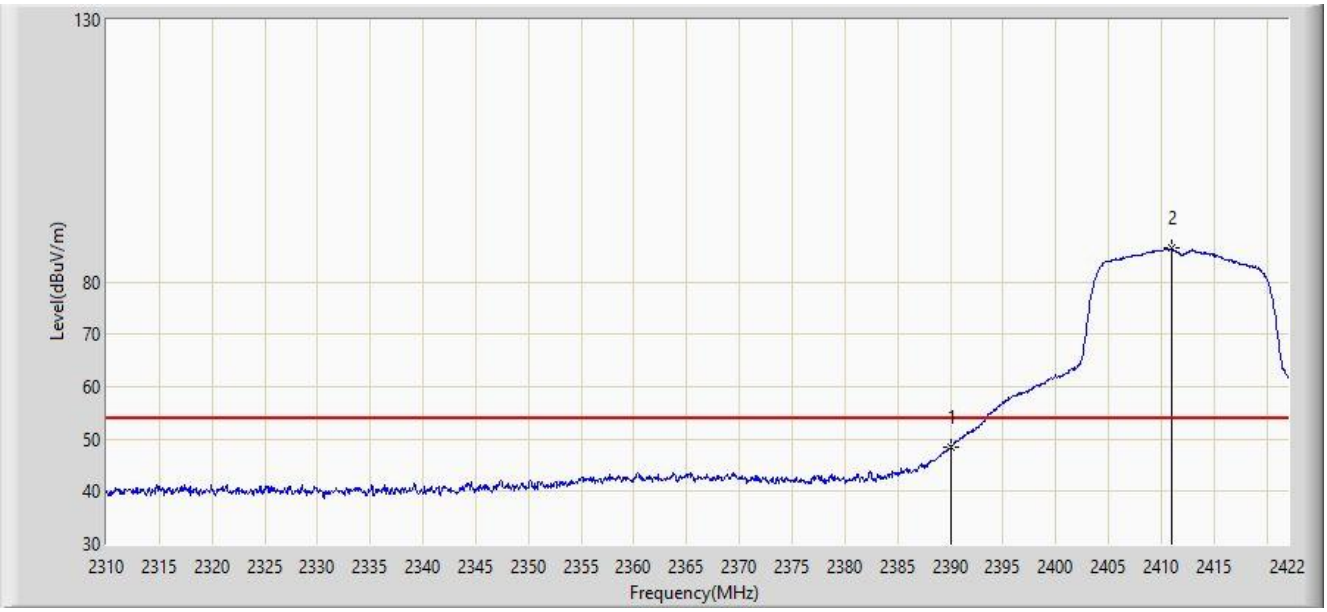


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2388.400	65.086	32.670	-8.914	74.000	32.416	PK
2		2390.000	63.410	30.997	-10.590	74.000	32.413	PK
3	*	2407.104	96.030	63.640	N/A	N/A	32.390	PK

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

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

Site: AC1	Time: 2019/07/17 - 20:09
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at channel 2412MHz	

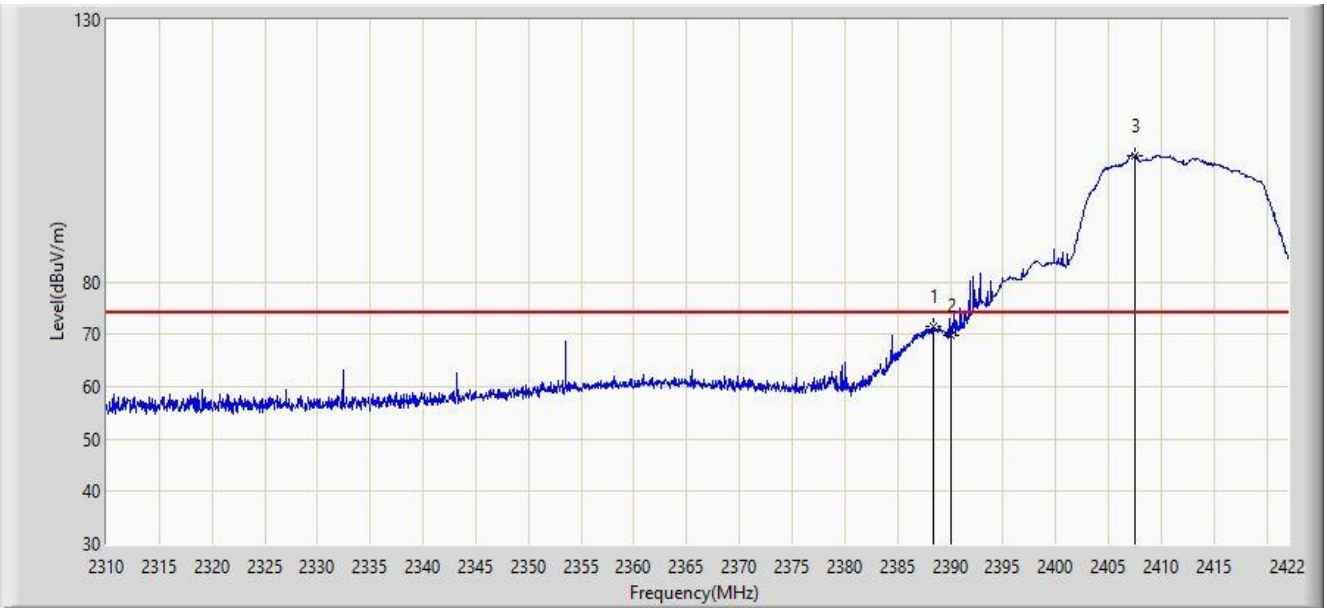


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2390.000	48.384	15.971	-5.616	54.000	32.413	AV
2	*	2410.912	86.374	53.989	N/A	N/A	32.385	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:07
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at channel 2412MHz	

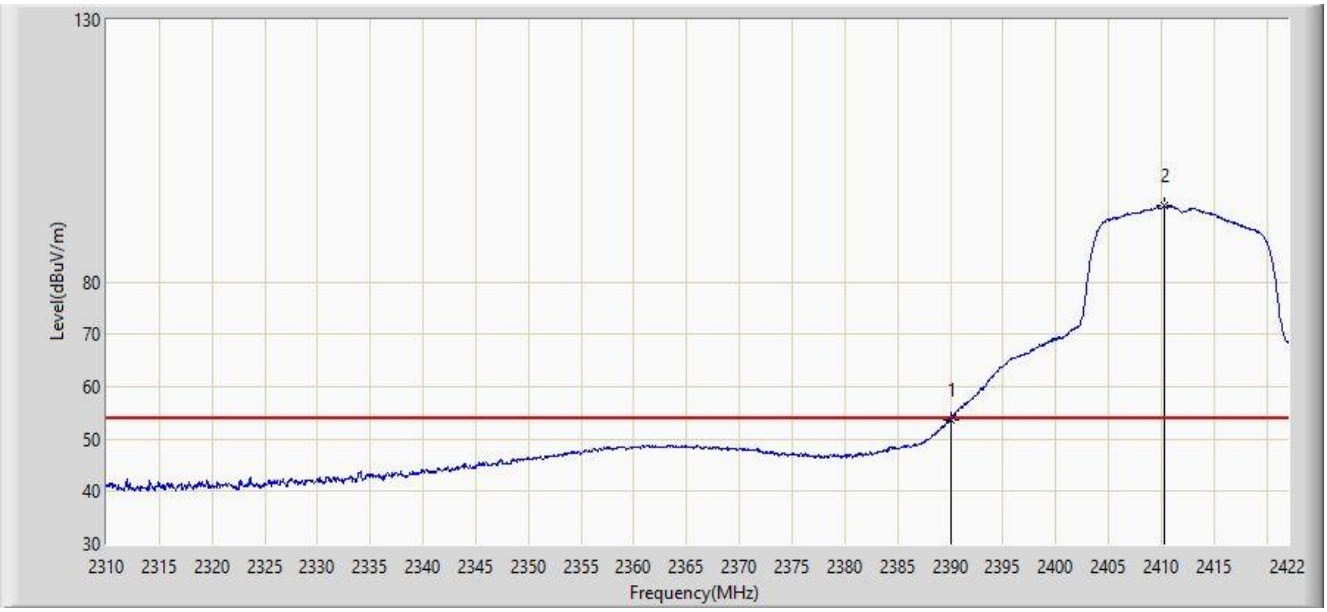


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2388.400	71.576	39.160	-2.424	74.000	32.416	PK
2		2390.000	69.877	37.464	-4.123	74.000	32.413	PK
3	*	2407.496	104.157	71.768	N/A	N/A	32.389	PK

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

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

Site: AC1	Time: 2019/07/17 - 20:07
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at channel 2412MHz	

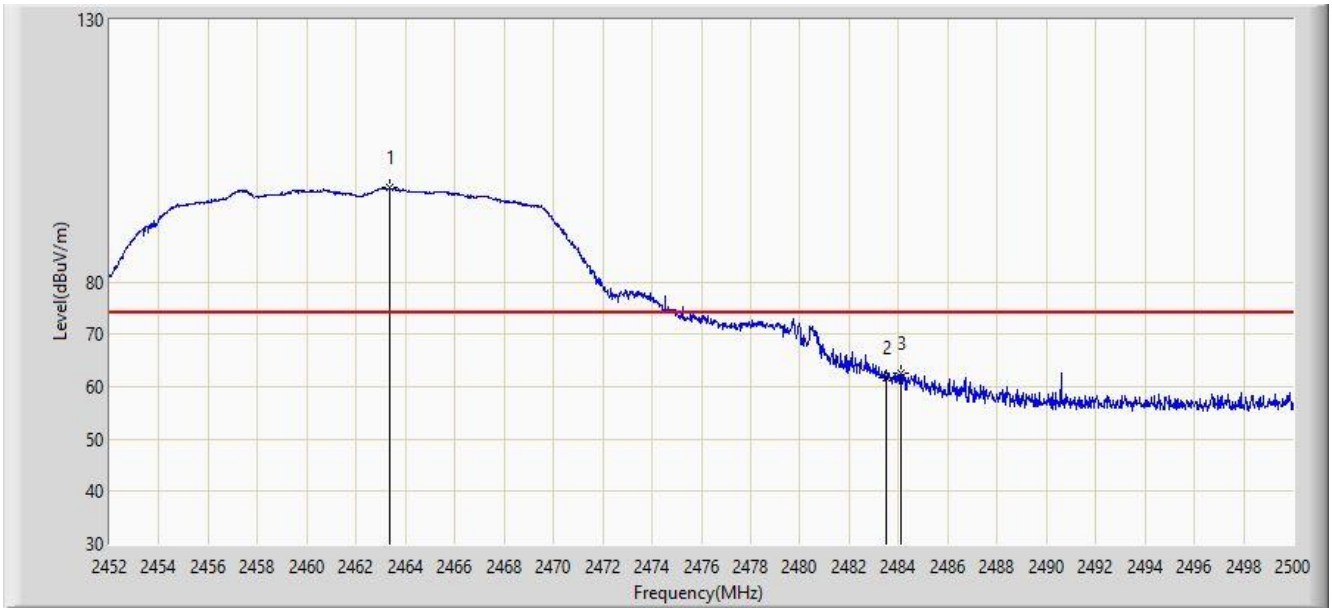


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2390.000	53.716	21.303	-0.284	54.000	32.413	AV
2	*	2410.240	94.445	62.059	N/A	N/A	32.386	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:20
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at channel 2462MHz	

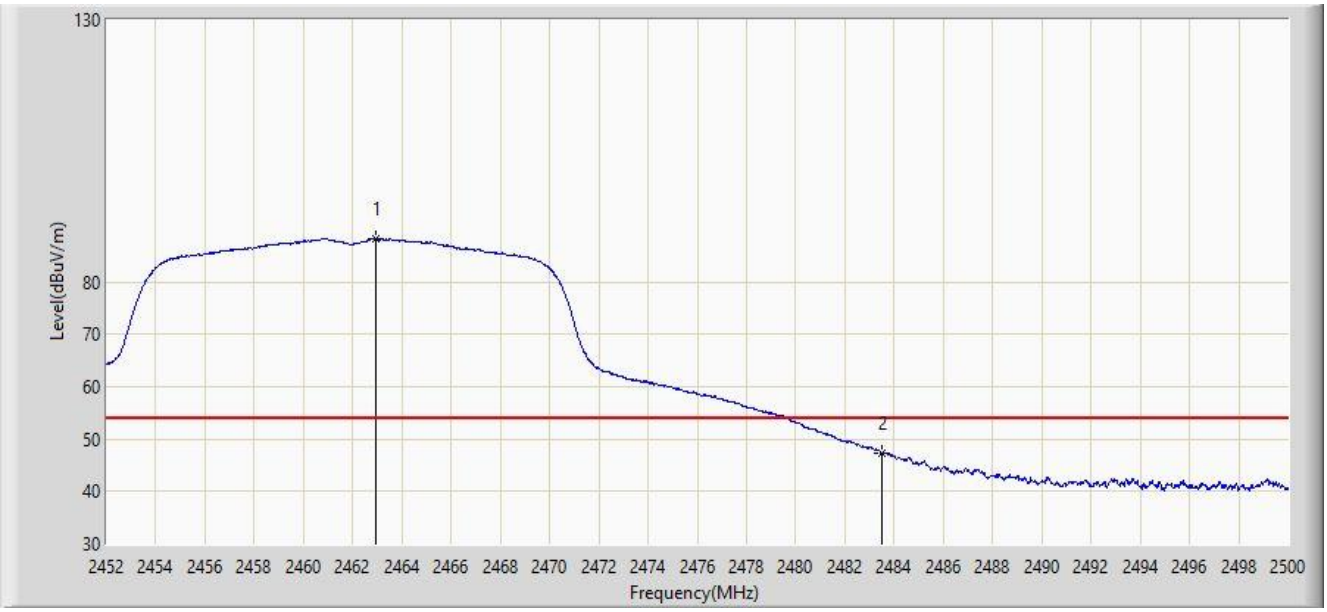


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2463.328	97.929	65.561	N/A	N/A	32.369	PK
2		2483.500	61.738	29.323	-12.262	74.000	32.416	PK
3		2484.088	62.464	30.047	-11.536	74.000	32.417	PK

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

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

Site: AC1	Time: 2019/07/17 - 20:21
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at channel 2462MHz	

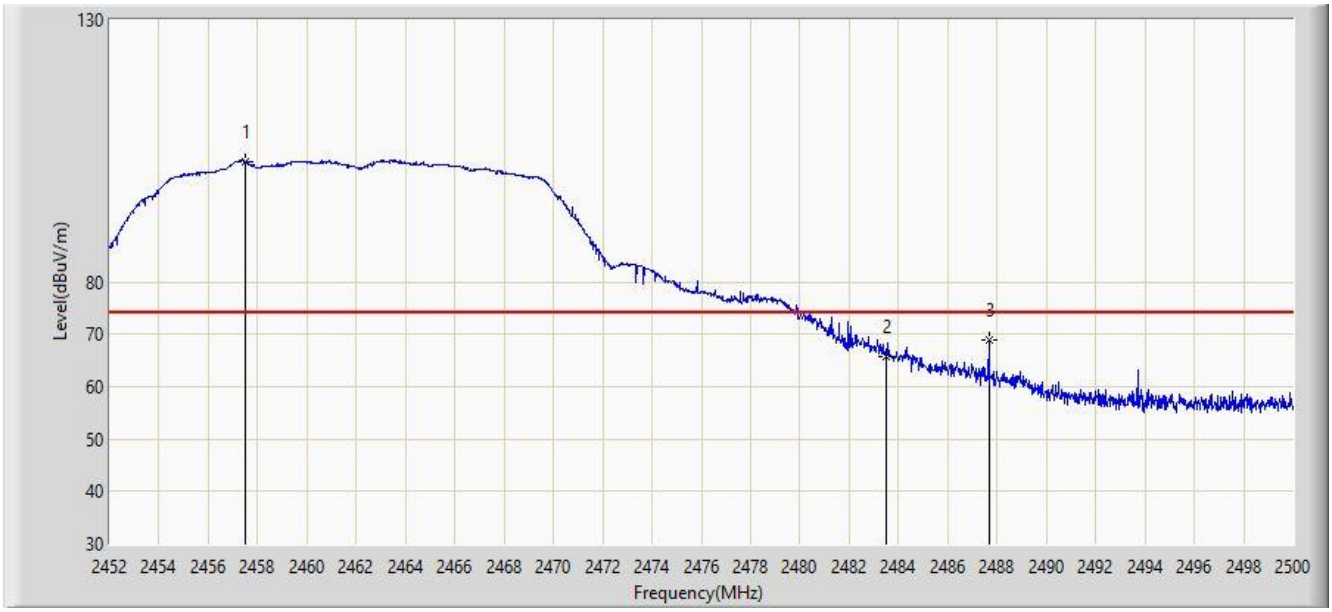


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2462.944	88.281	55.913	N/A	N/A	32.368	AV
2		2483.500	47.368	14.953	-6.632	54.000	32.416	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:19
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at channel 2462MHz	

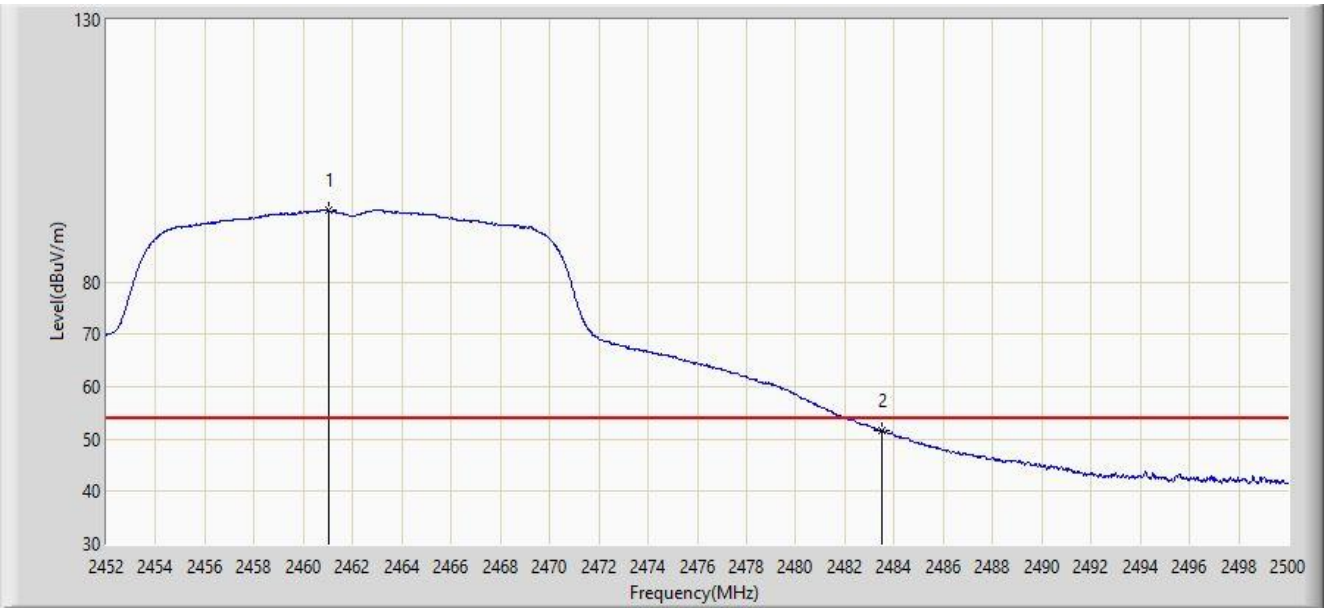


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2457.496	102.976	70.618	N/A	N/A	32.357	PK
2		2483.500	65.804	33.389	-8.196	74.000	32.416	PK
3		2487.664	68.982	36.558	-5.018	74.000	32.424	PK

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

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

Site: AC1	Time: 2019/07/17 - 20:19
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at channel 2462MHz	

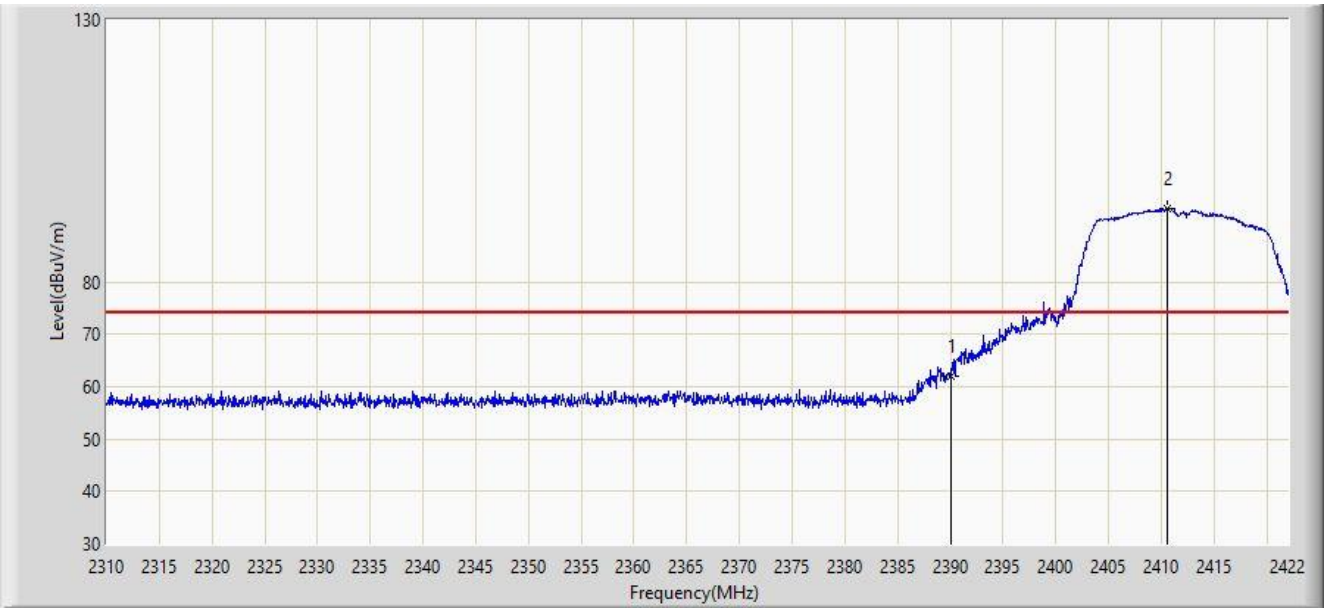


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2461.000	93.608	61.244	N/A	N/A	32.364	AV
2		2483.500	51.582	19.167	-2.418	54.000	32.416	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:24
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at channel 2412MHz	

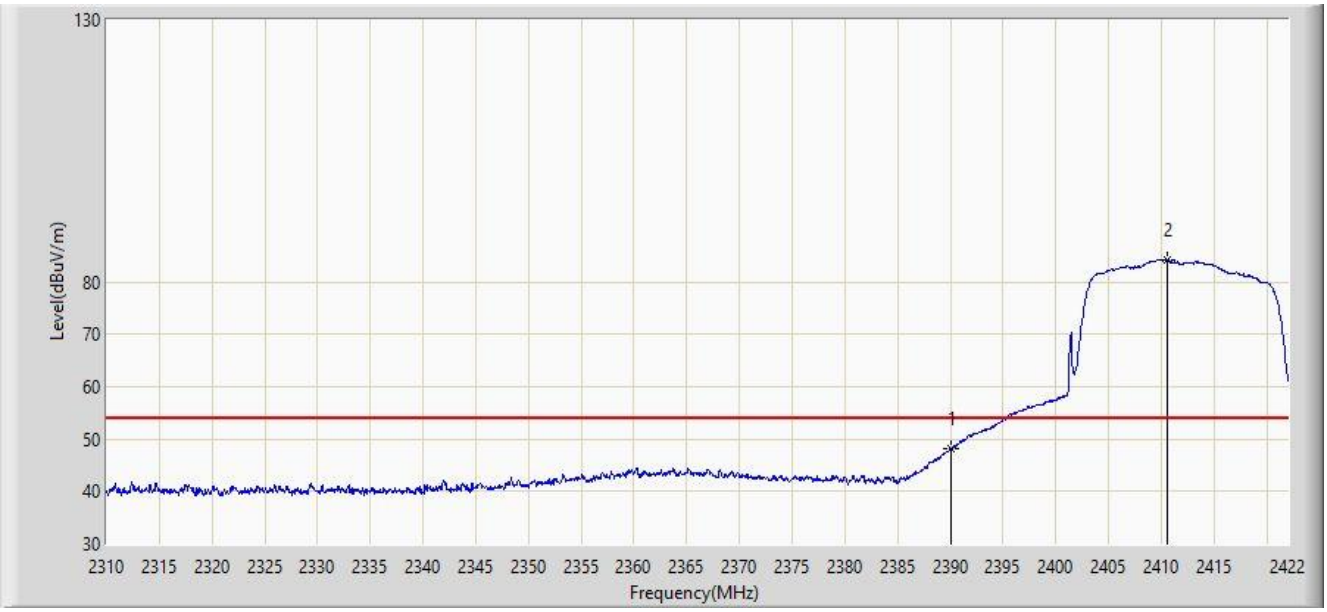


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2390.000	61.995	29.582	-12.005	74.000	32.413	PK
2	*	2410.632	93.925	61.539	N/A	N/A	32.386	PK

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

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

Site: AC1	Time: 2019/07/17 - 20:26
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at channel 2412MHz	

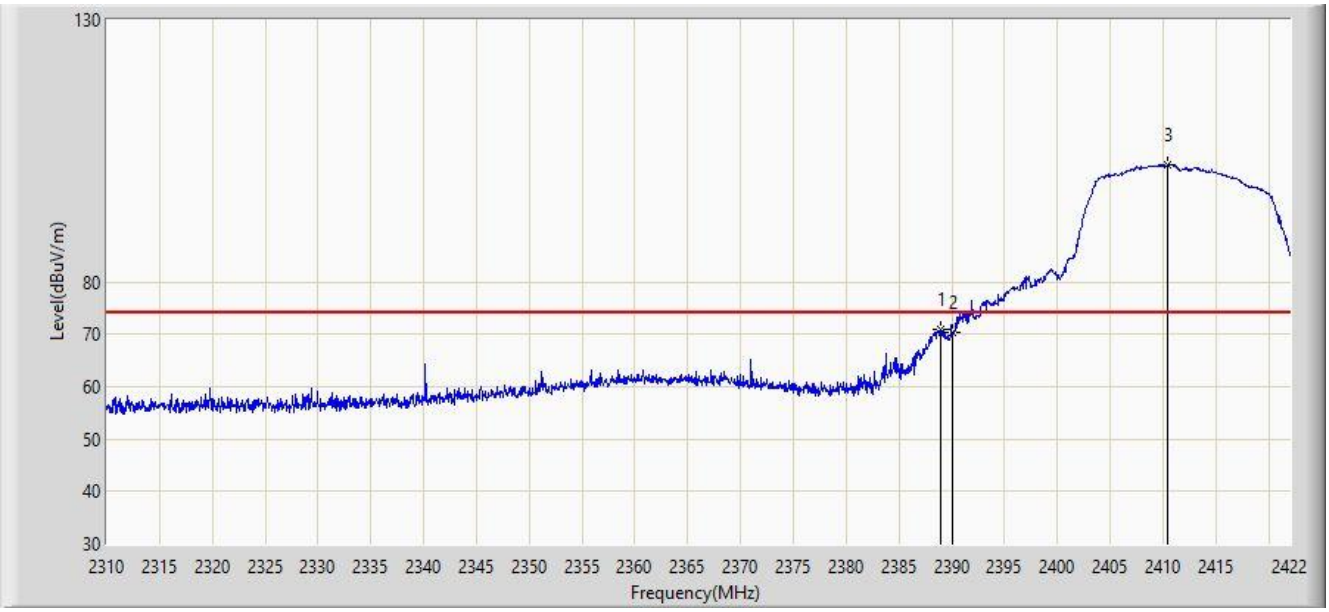


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2390.000	48.071	15.658	-5.929	54.000	32.413	AV
2	*	2410.520	84.300	51.914	N/A	N/A	32.385	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:24
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at channel 2412MHz	

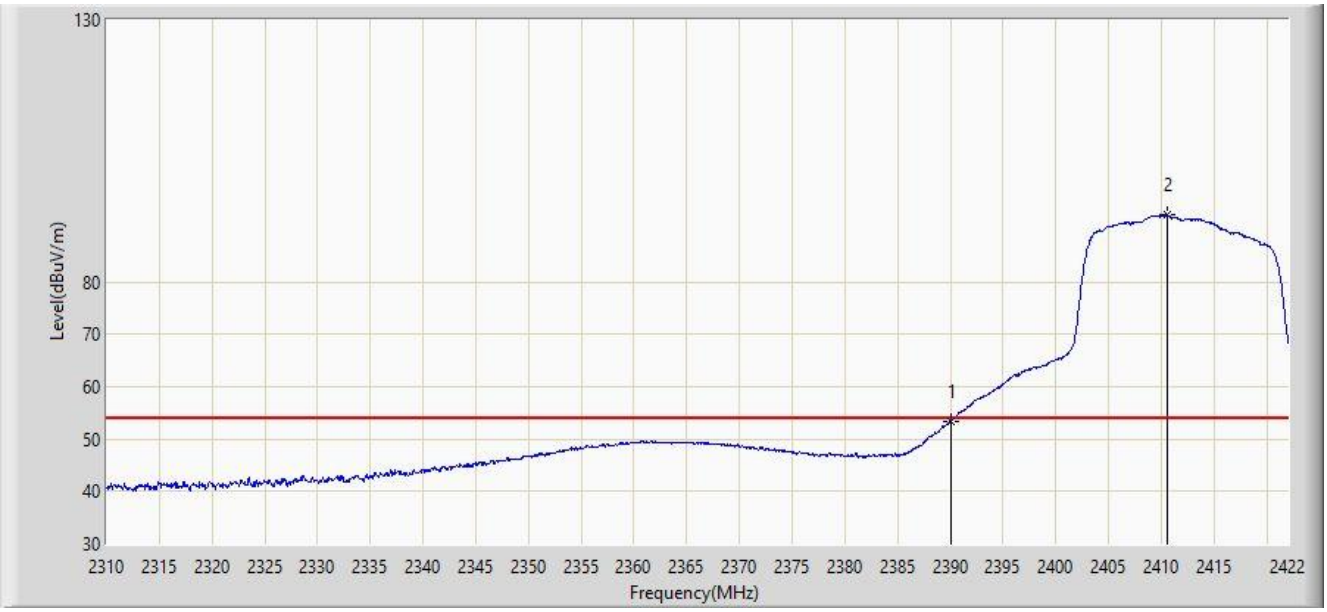


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2388.960	70.915	38.500	-3.085	74.000	32.414	PK
2		2390.000	70.468	38.055	-3.532	74.000	32.413	PK
3	*	2410.408	102.419	70.033	N/A	N/A	32.386	PK

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

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

Site: AC1	Time: 2019/07/17 - 20:24
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at channel 2412MHz	

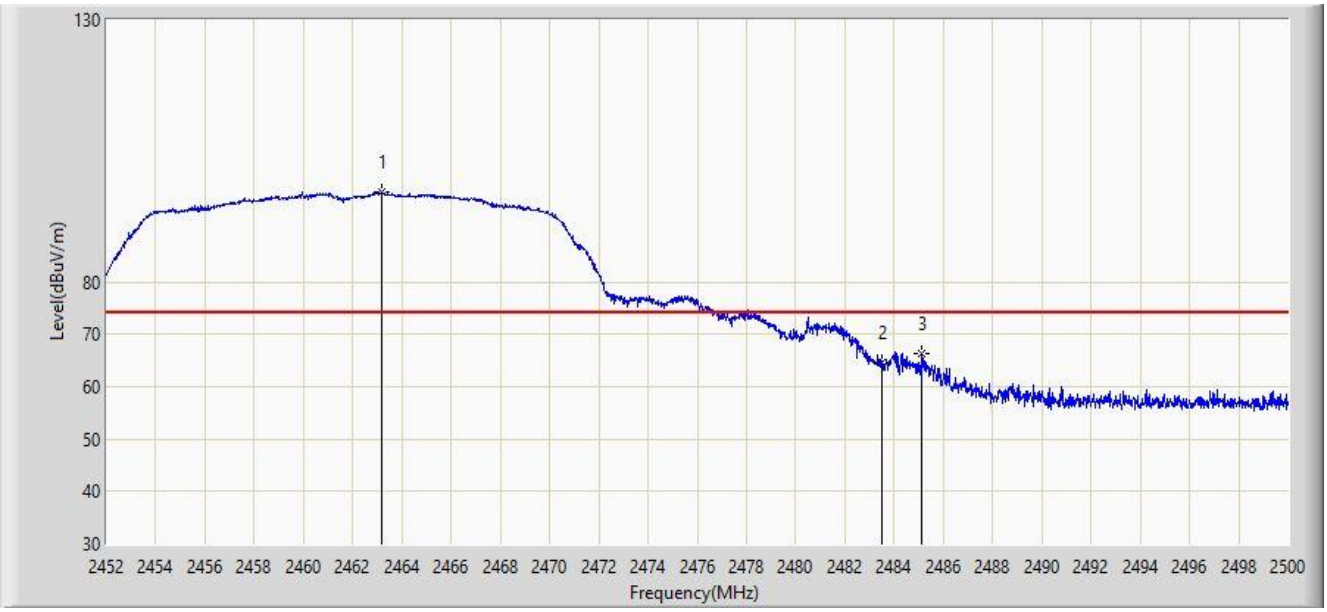


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2390.000	53.340	20.927	-0.660	54.000	32.413	AV
2	*	2410.632	92.701	60.315	N/A	N/A	32.386	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:37
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at channel 2462MHz	

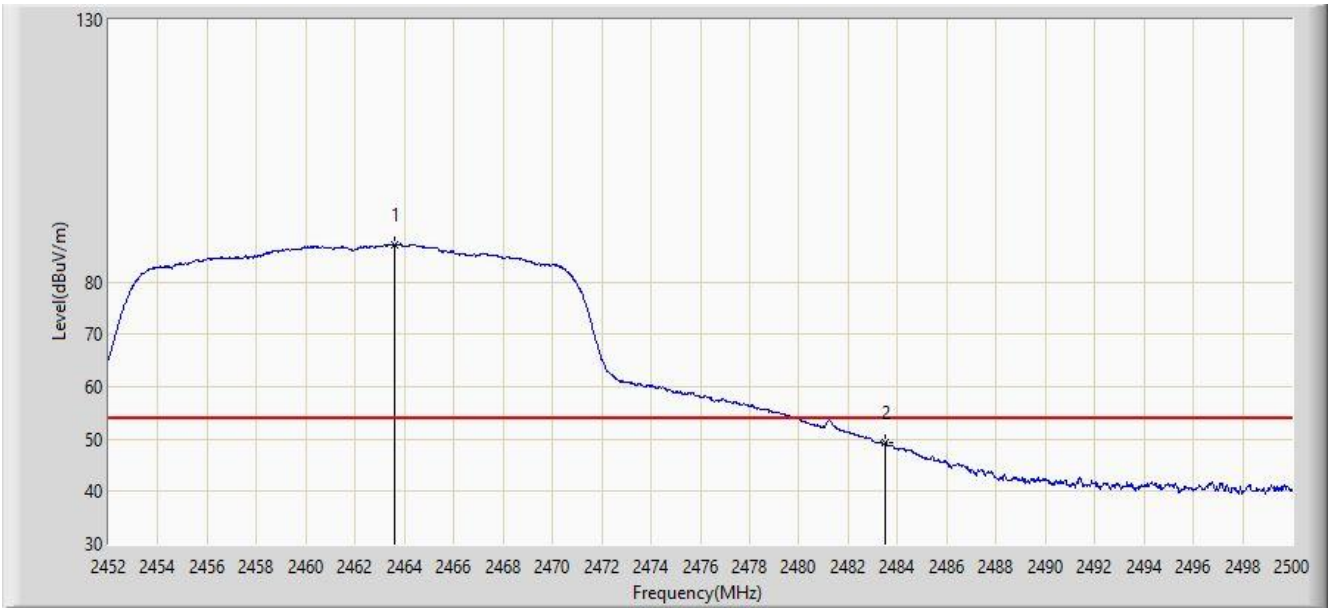


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2463.160	97.252	64.884	N/A	N/A	32.368	PK
2		2483.500	64.514	32.099	-9.486	74.000	32.416	PK
3		2485.120	66.321	33.902	-7.679	74.000	32.419	PK

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

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

Site: AC1	Time: 2019/07/17 - 20:38
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at channel 2462MHz	

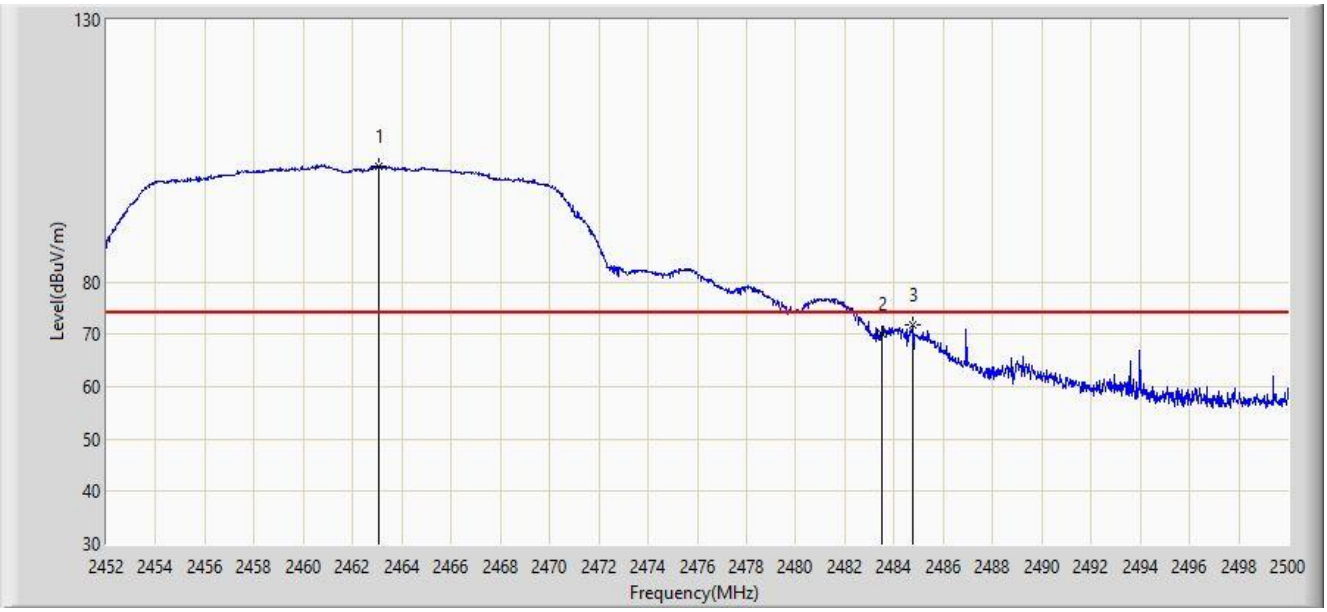


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2463.616	87.061	54.692	N/A	N/A	32.369	AV
2		2483.500	49.291	16.876	-4.709	54.000	32.416	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:36
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at channel 2462MHz	

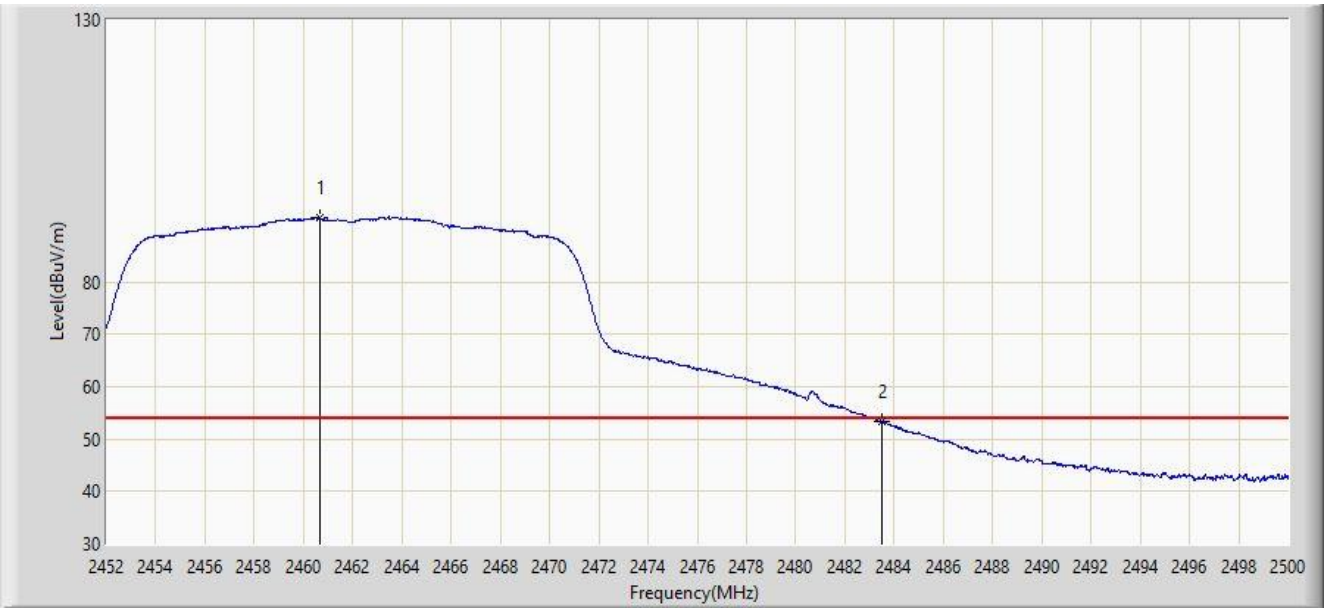


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2463.088	101.909	69.541	N/A	N/A	32.368	PK
2		2483.500	70.139	37.724	-3.861	74.000	32.416	PK
3		2484.736	71.749	39.331	-2.251	74.000	32.418	PK

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

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

Site: AC1	Time: 2019/07/17 - 20:36
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT20 at channel 2462MHz	

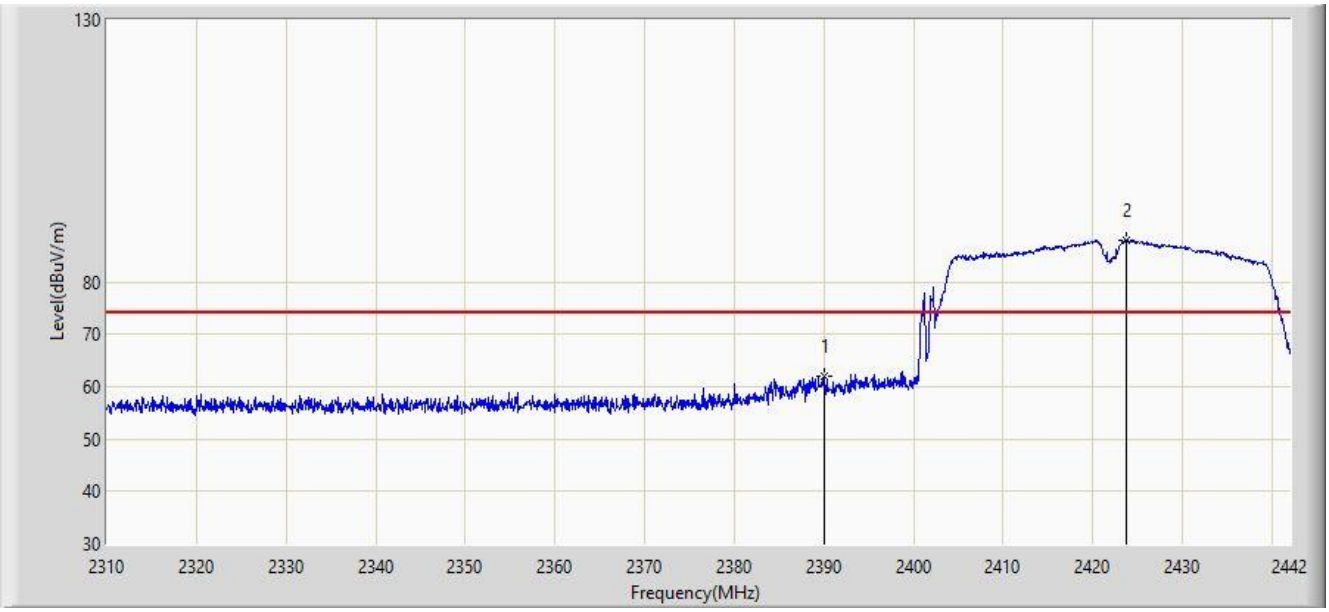


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2460.664	92.305	59.941	N/A	N/A	32.364	AV
2		2483.500	53.268	20.853	-0.732	54.000	32.416	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:44
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at channel 2422MHz	

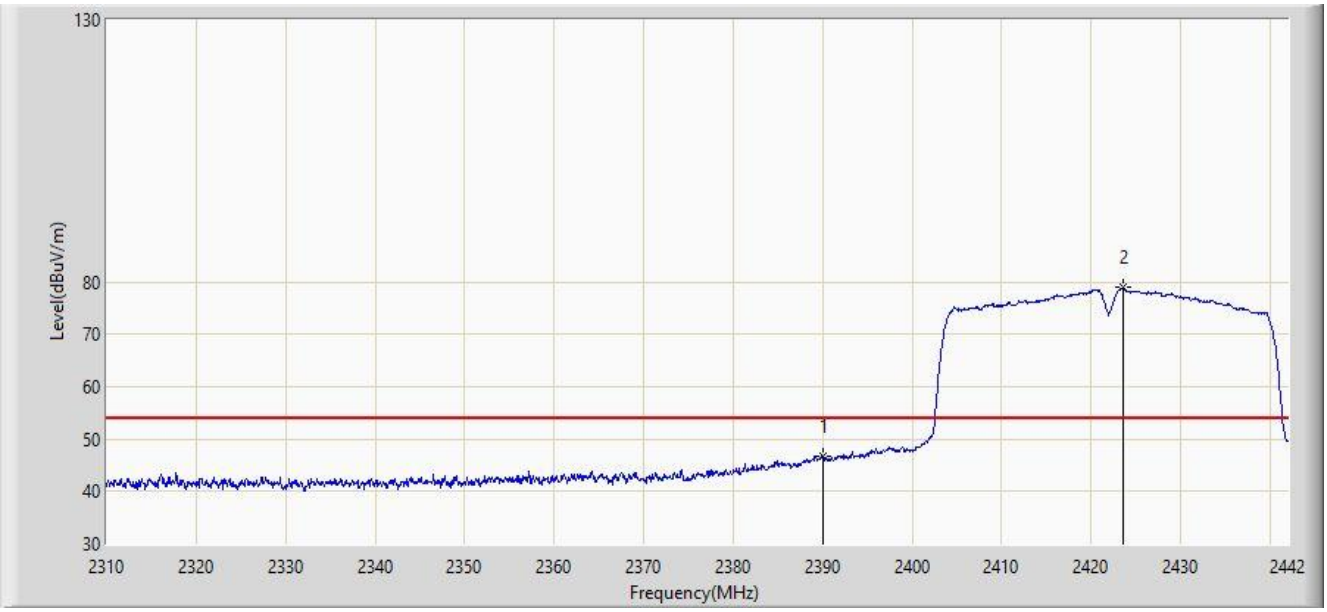


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2390.000	62.077	29.664	-11.923	74.000	32.413	PK
2	*	2423.784	87.969	55.598	N/A	N/A	32.371	PK

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

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

Site: AC1	Time: 2019/07/17 - 20:45
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at channel 2422MHz	

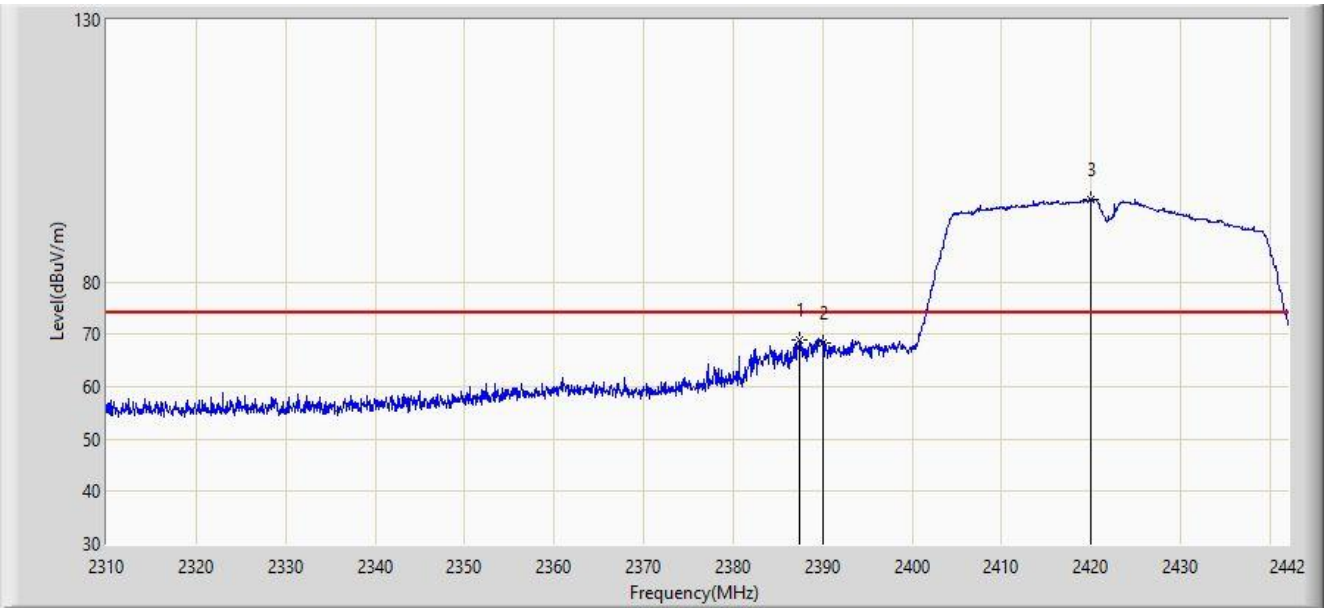


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2390.000	46.654	14.241	-7.346	54.000	32.413	AV
2	*	2423.520	78.883	46.512	N/A	N/A	32.371	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:43
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at channel 2422MHz	

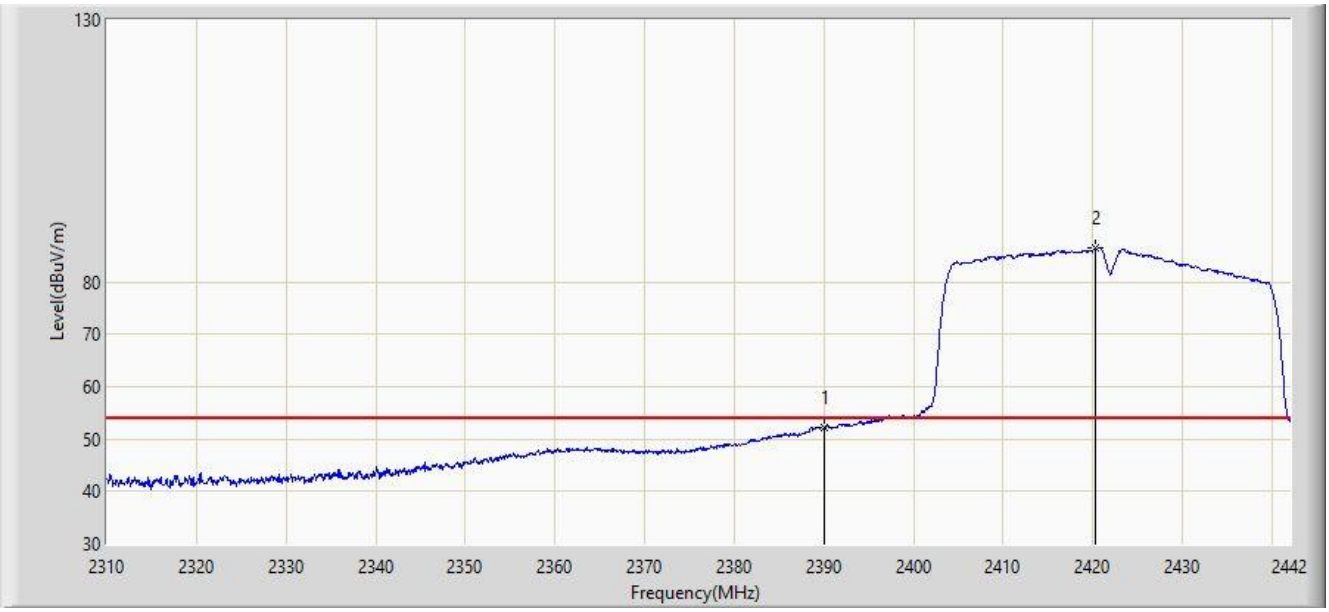


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2387.418	68.989	36.572	-5.011	74.000	32.418	PK
2		2390.000	68.240	35.827	-5.760	74.000	32.413	PK
3	*	2420.022	95.827	63.452	N/A	N/A	32.375	PK

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

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

Site: AC1	Time: 2019/07/17 - 20:43
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at channel 2422MHz	

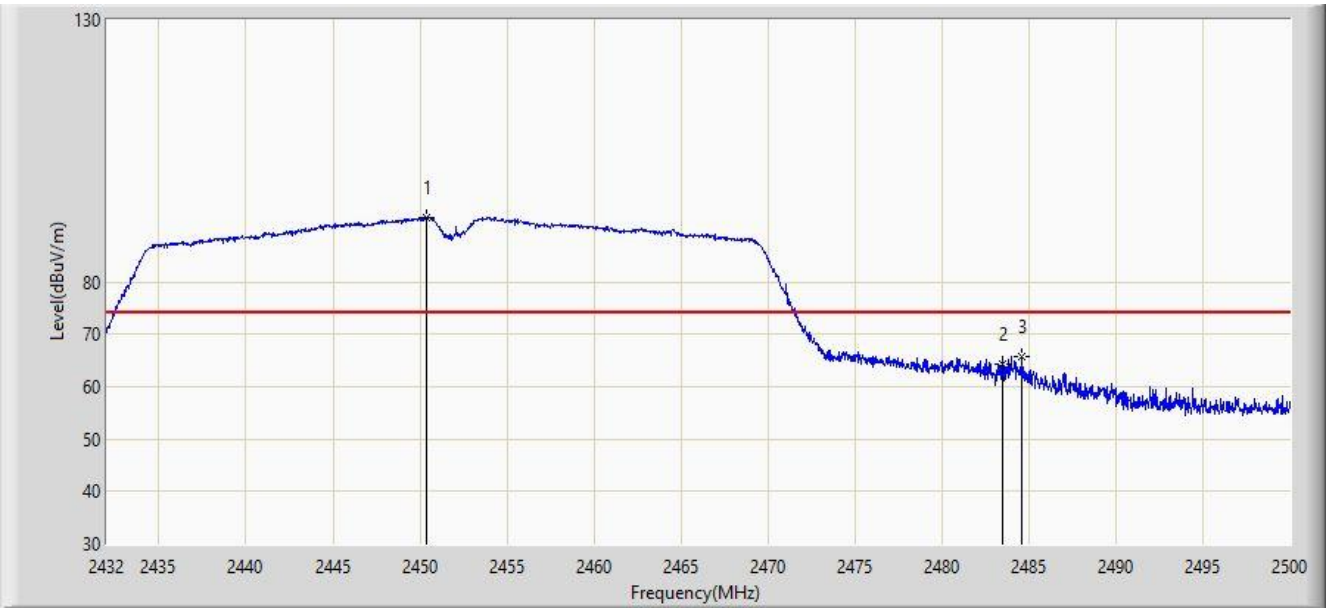


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1		2390.000	52.216	19.803	-1.784	54.000	32.413	AV
2	*	2420.352	86.391	54.016	N/A	N/A	32.375	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:49
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at channel 2452MHz	

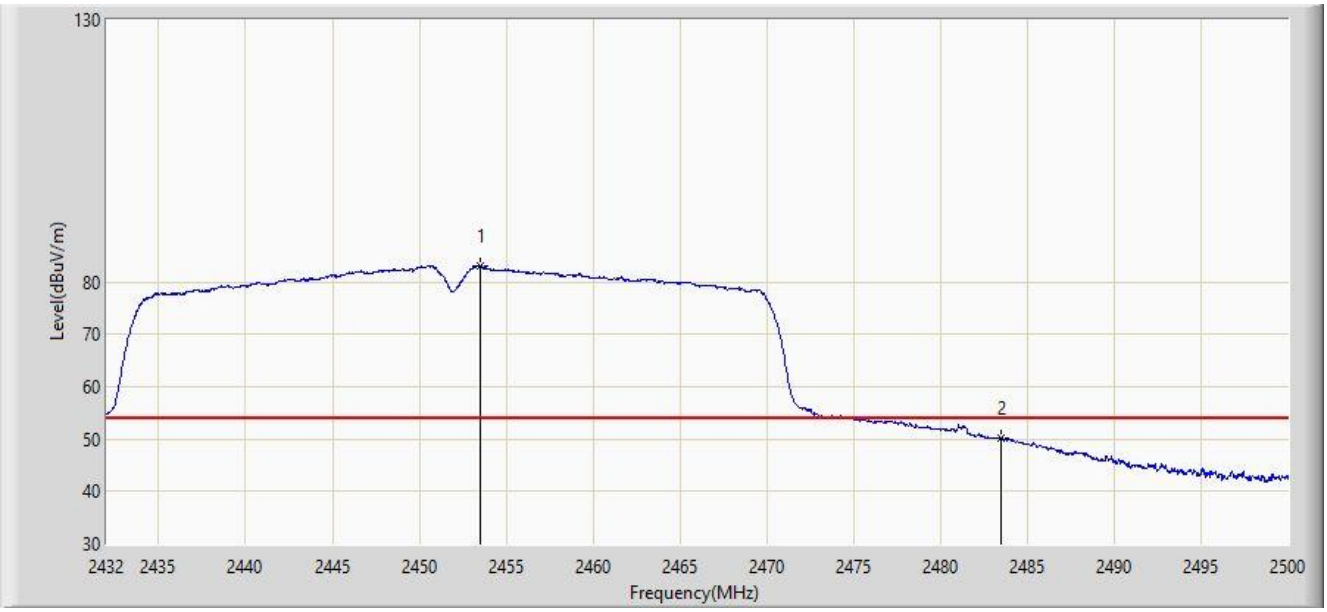


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2450.360	92.381	60.037	N/A	N/A	32.344	PK
2		2483.500	64.194	31.779	-9.806	74.000	32.416	PK
3		2484.598	65.603	33.185	-8.397	74.000	32.418	PK

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

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

Site: AC1	Time: 2019/07/17 - 20:49
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Horizontal
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at channel 2452MHz	

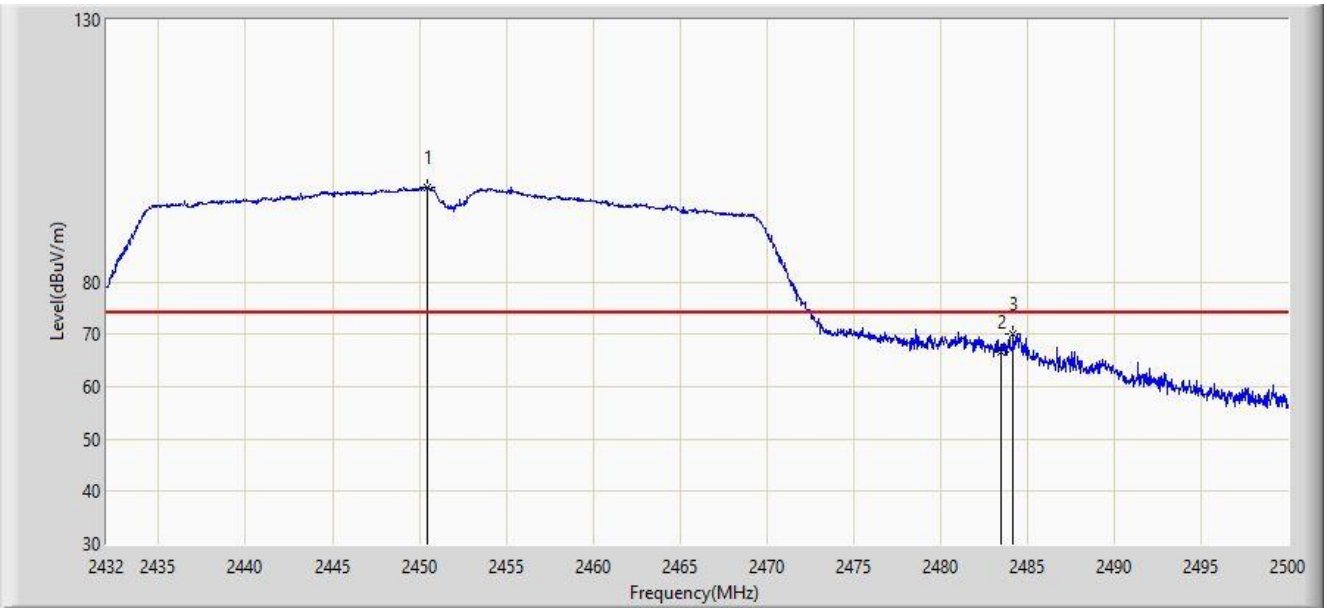


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2453.522	83.110	50.760	N/A	N/A	32.351	AV
2		2483.500	50.229	17.814	-3.771	54.000	32.416	AV

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

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

Site: AC1	Time: 2019/07/17 - 20:48
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at channel 2452MHz	

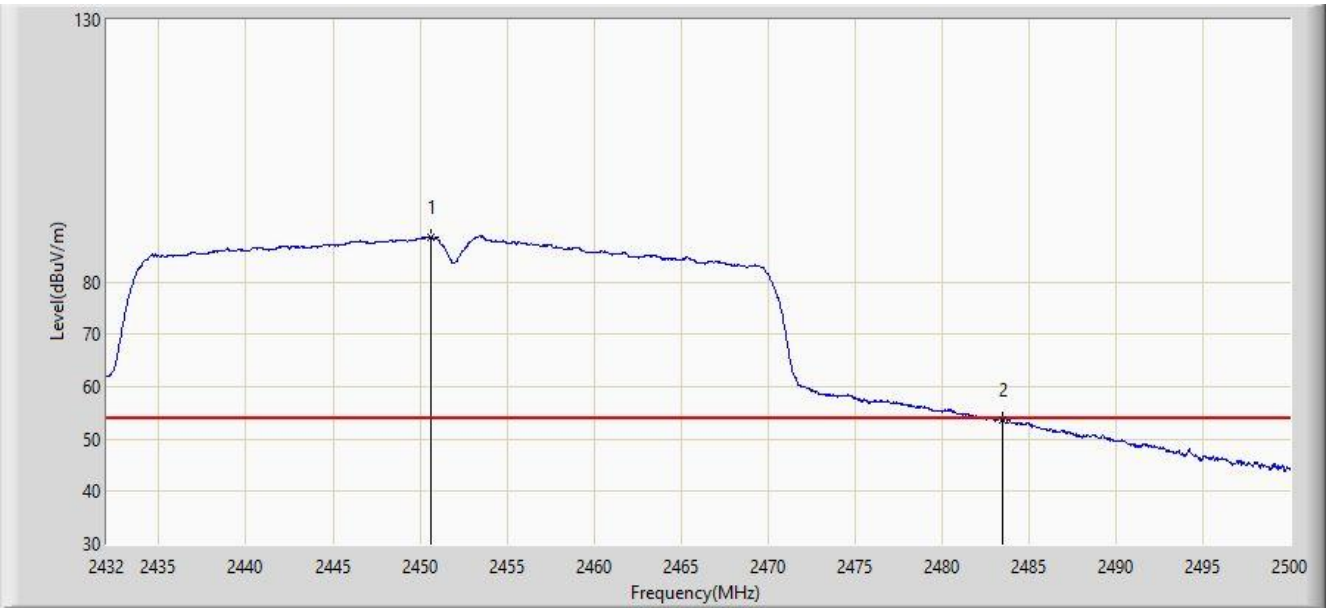


No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2450.462	97.868	65.524	N/A	N/A	32.344	PK
2		2483.500	66.555	34.140	-7.445	74.000	32.416	PK
3		2484.190	70.011	37.594	-3.989	74.000	32.417	PK

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

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

Site: AC1	Time: 2019/07/17 - 20:47
Limit: FCC_Part15.209_RE(3m)	Engineer: Dandy Li
Probe: BBHA9120D_1-18GHz	Polarity: Vertical
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11n-HT40 at channel 2452MHz	



No	Mark	Frequency (MHz)	Measure Level (dBuV/m)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV/m)	Factor (dB)	Type
1	*	2450.598	88.549	56.204	N/A	N/A	32.345	AV
2		2483.500	53.542	21.127	-0.458	54.000	32.416	AV

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

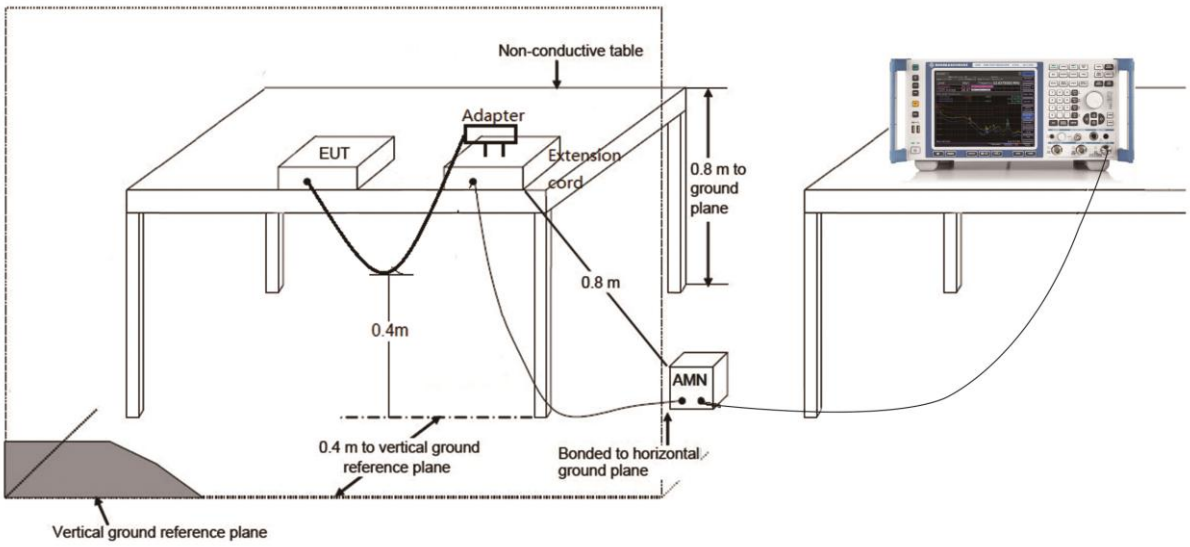
Factor (dB) = Cable Loss (dB) + Antenna Factor (dB/m)

7.8. AC Conducted Emissions Measurement

7.8.1.Test Limit

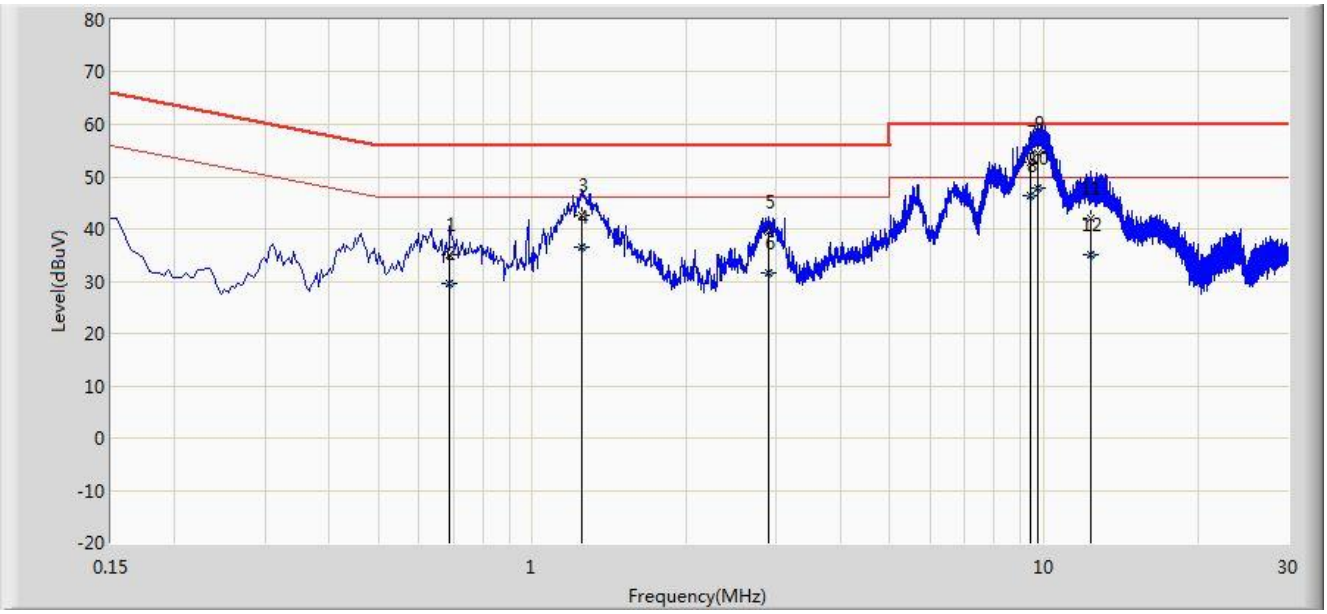
FCC Part 15.207 - Limits		
Frequency (MHz)	QP (dBμV)	Average (dBμV)
0.15 - 0.50	66 - 56	56 - 46
0.50 - 5.0	56	46
5.0 - 30	60	50
Note 1: The lower limit shall apply at the transition frequencies. Note 2: The limit decreases linearly with the logarithm of the frequency in the range 0.15MHz to 0.5MHz.		

7.8.2.Test Setup



7.8.3.Test Result

Site: SR2	Time: 2019/07/19 - 13:45
Limit: FCC_Part15.207_CE_AC Power	Engineer: Liz Yuan
Probe: ENV216_101683_Filter On	Polarity: Line
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at Channel 2412MHz	

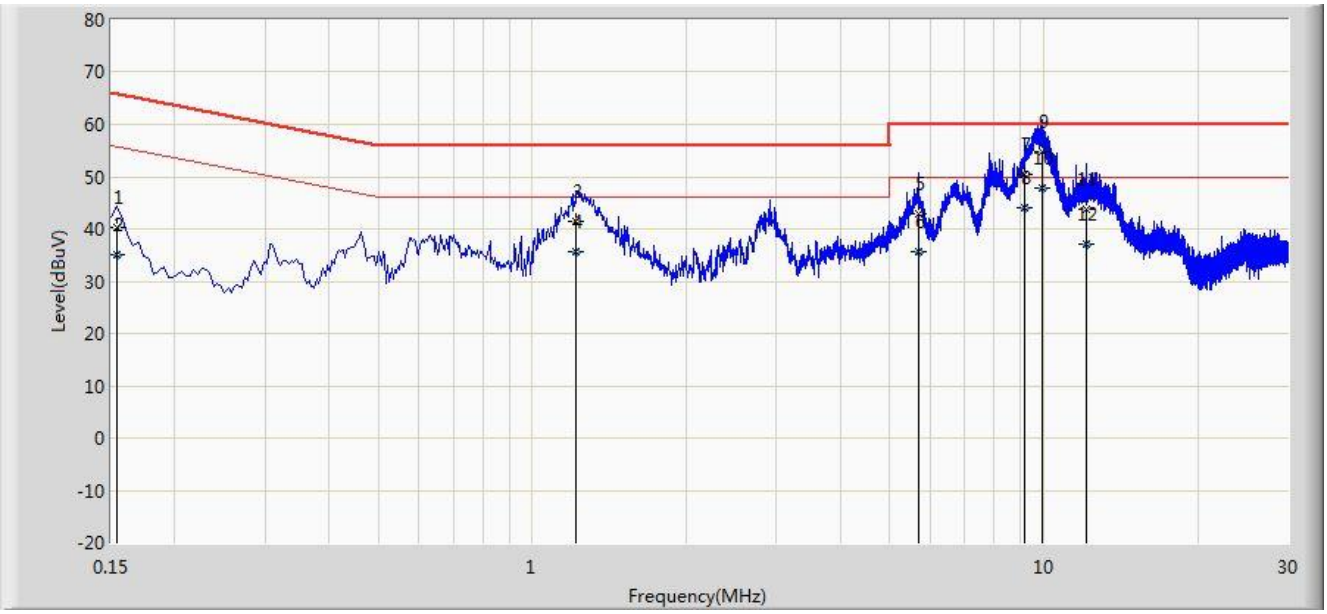


No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV)	Factor (dB)	Type
1			0.690	34.946	24.878	-21.054	56.000	10.068	QP
2			0.690	29.524	19.455	-16.476	46.000	10.068	AV
3			1.250	42.533	32.633	-13.467	56.000	9.900	QP
4			1.250	36.562	26.663	-9.438	46.000	9.900	AV
5			2.890	39.519	29.670	-16.481	56.000	9.849	QP
6			2.890	31.525	21.676	-14.475	46.000	9.849	AV
7			9.394	52.803	42.654	-7.197	60.000	10.149	QP
8			9.394	46.307	36.158	-3.693	50.000	10.149	AV
9			9.706	54.349	44.200	-5.651	60.000	10.149	QP
10		*	9.706	47.849	37.700	-2.151	50.000	10.149	AV
11			12.374	41.974	31.899	-18.026	60.000	10.075	QP
12			12.374	35.171	25.096	-14.829	50.000	10.075	AV

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

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

Site: SR2	Time: 2019/07/19 - 13:50
Limit: FCC_Part15.207_CE_AC Power	Engineer: Liz Yuan
Probe: ENV216_101683_Filter On	Polarity: Neutral
EUT: Flat Panel Integrated Satellite Communication Terminal	Power: AC 120V/60Hz
Test Mode: Transmit by 802.11g at Channel 2412MHz	



No	Flag	Mark	Frequency (MHz)	Measure Level (dBuV)	Reading Level (dBuV)	Margin (dB)	Limit (dBuV)	Factor (dB)	Type
1			0.154	40.180	29.464	-25.601	65.781	10.716	QP
2			0.154	35.083	24.367	-20.698	55.781	10.716	AV
3			1.218	41.319	31.417	-14.681	56.000	9.901	QP
4			1.218	35.617	25.715	-10.383	46.000	9.901	AV
5			5.678	42.888	32.781	-17.112	60.000	10.106	QP
6			5.678	35.646	25.540	-14.354	50.000	10.106	AV
7			9.174	50.440	40.256	-9.560	60.000	10.184	QP
8			9.174	44.081	33.897	-5.919	50.000	10.184	AV
9			9.911	54.761	44.600	-5.239	60.000	10.161	QP
10		*	9.911	47.861	37.700	-2.139	50.000	10.161	AV
11			12.122	43.719	33.595	-16.281	60.000	10.125	QP
12			12.122	37.095	26.971	-12.905	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 device is in compliance with Part 15C of the FCC rules.

The End

Appendix A - Test Setup Photograph

Refer to “1907RSU030-UT” file.

Appendix B - EUT Photograph

Refer to “1907RSU030-UE” file.