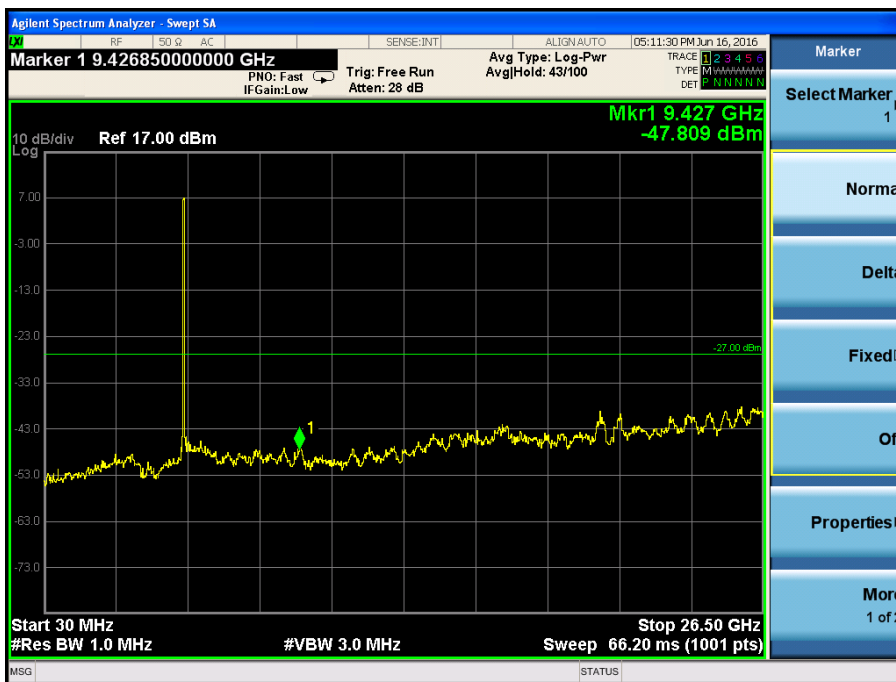


Emissions above 26.5GHz are attenuated more than 20dB below the permissible limits and test data are not reported.

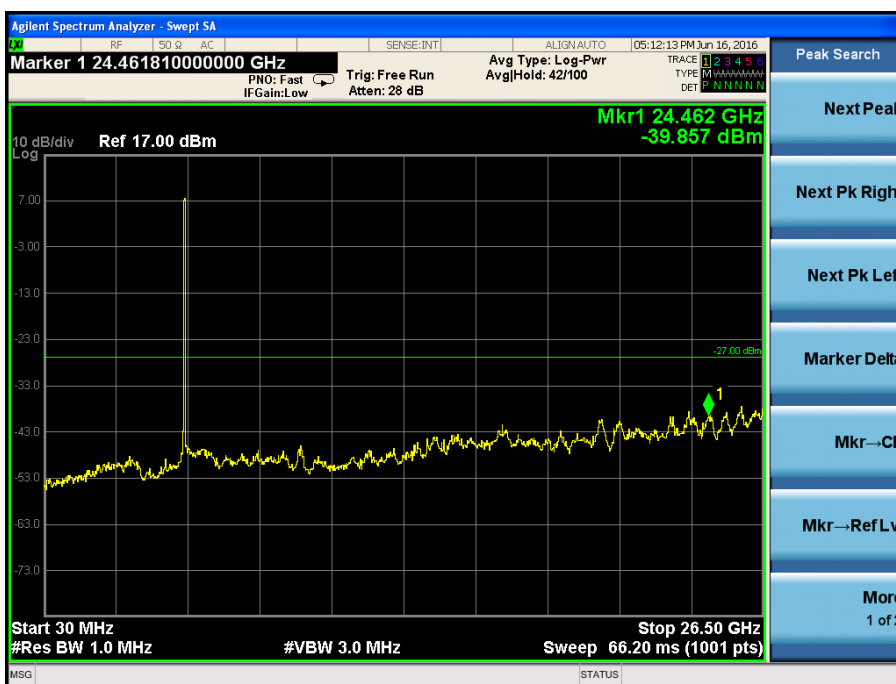
Antenna 1

802.11a

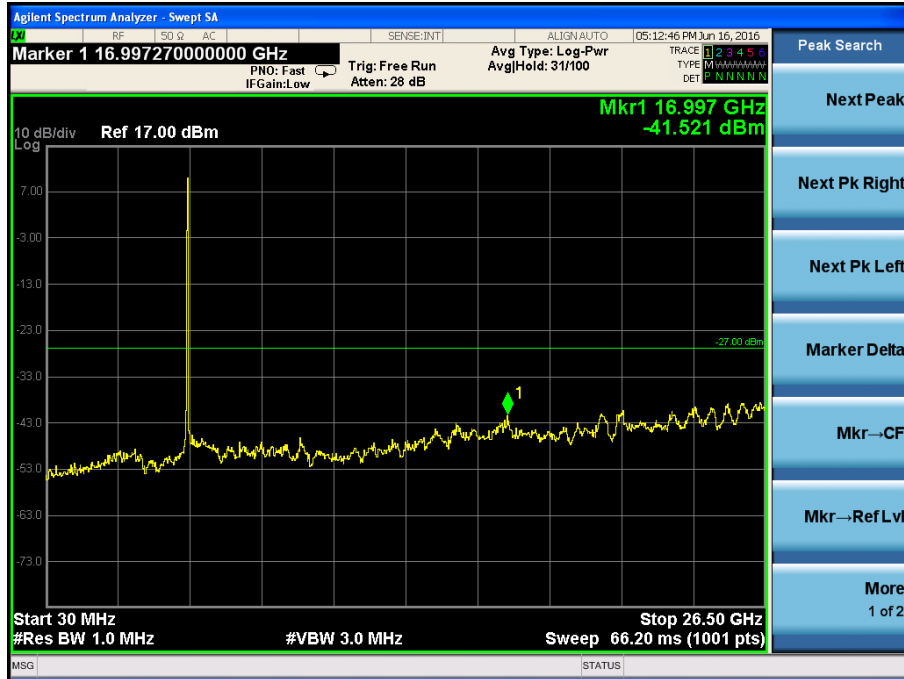
5180MHz



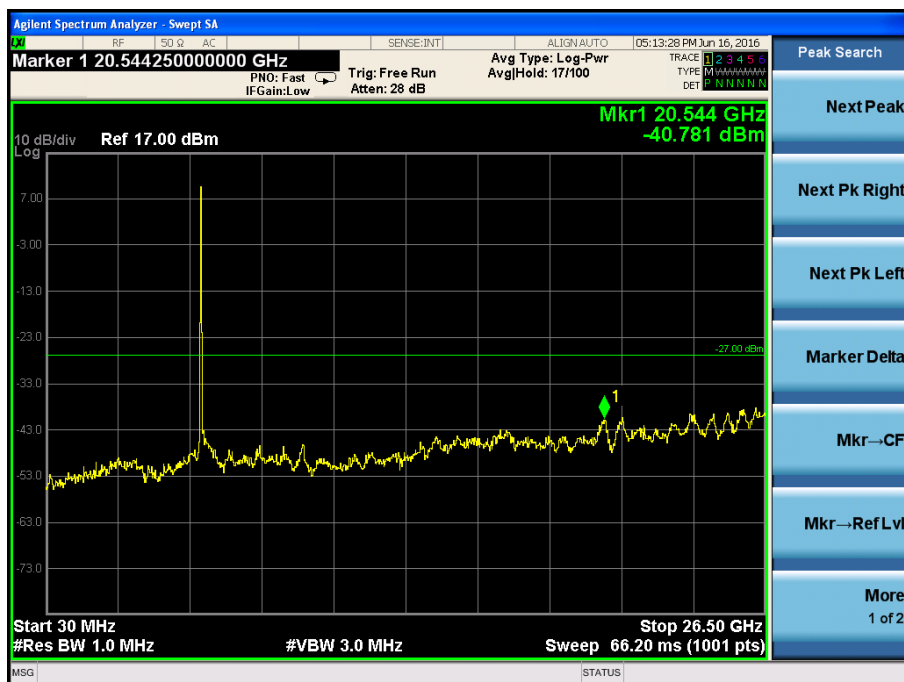
5200MH



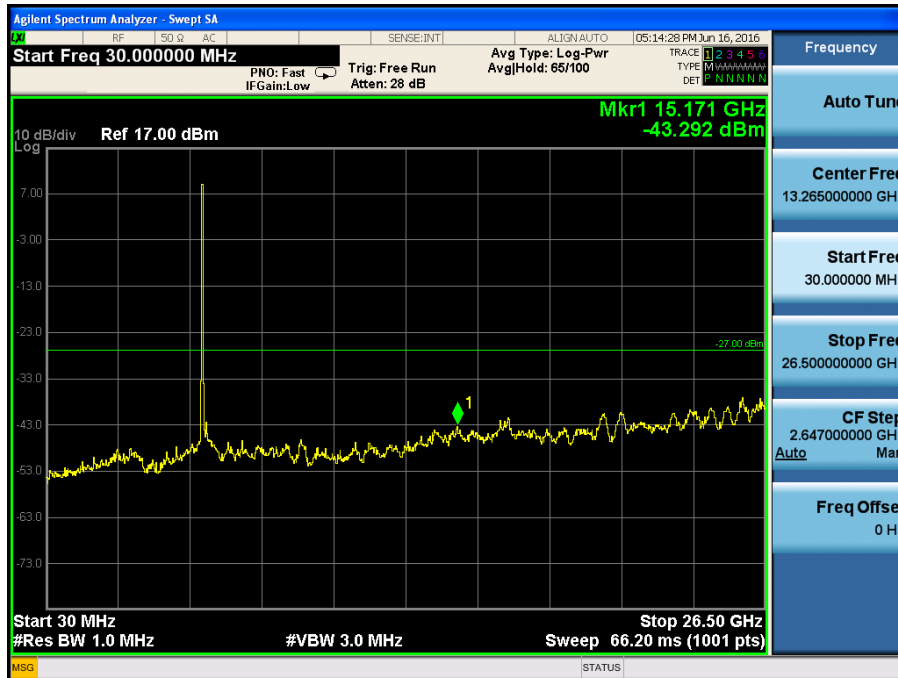
5240MHz



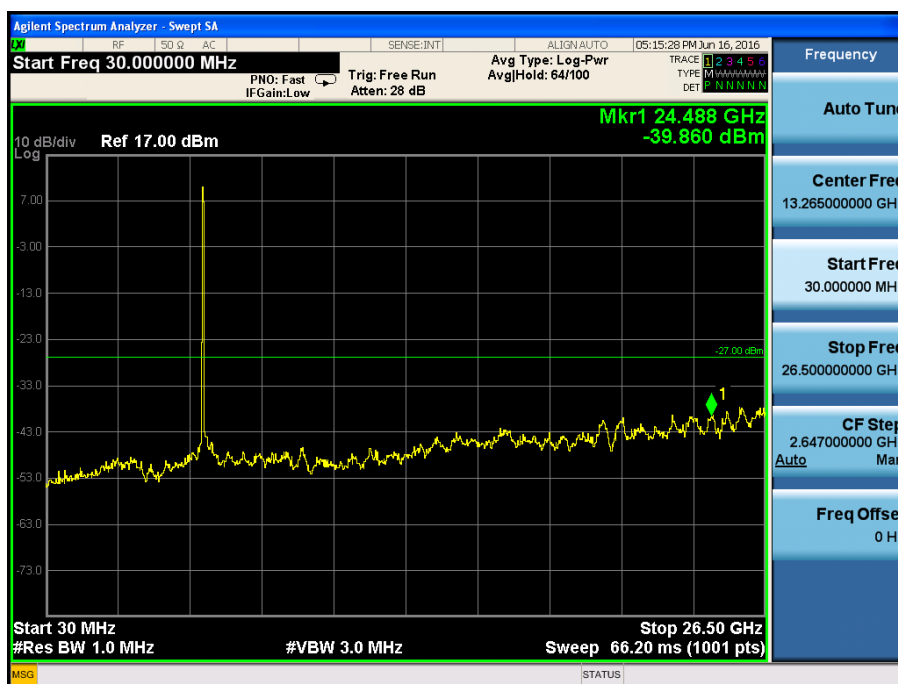
5745MHz



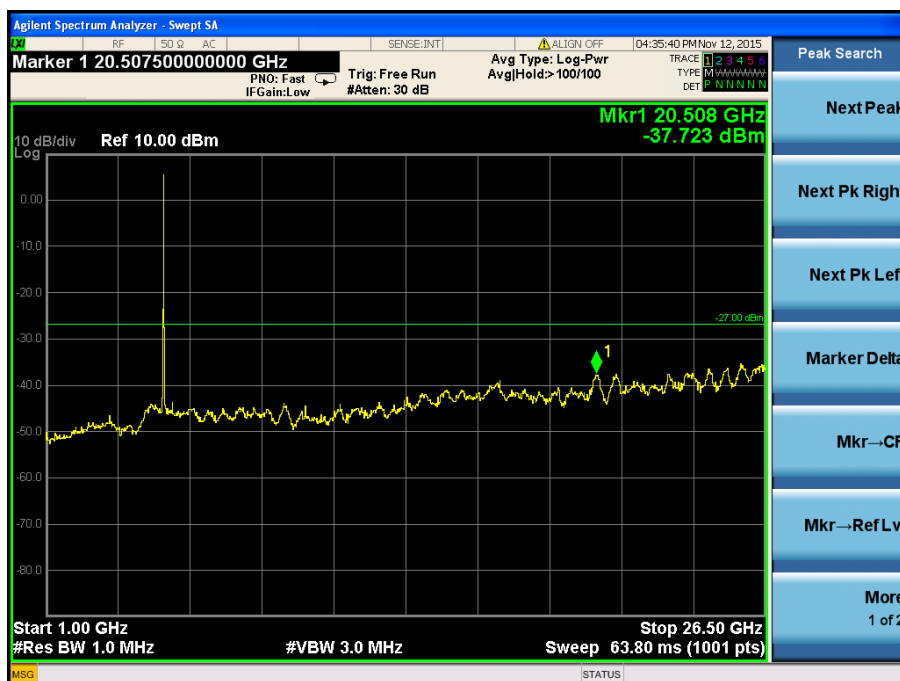
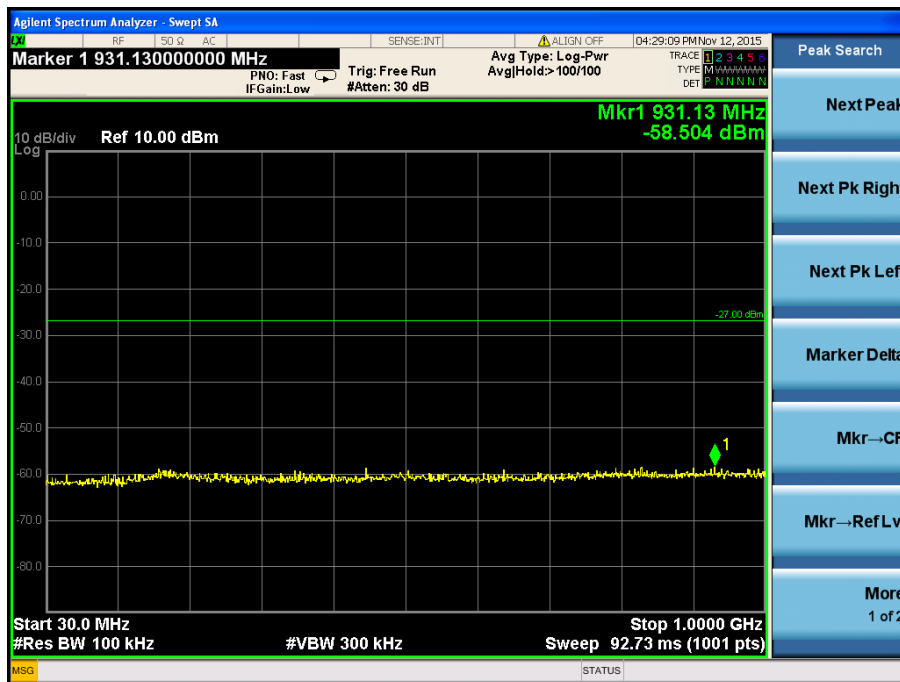
5785MHz



5825MHz

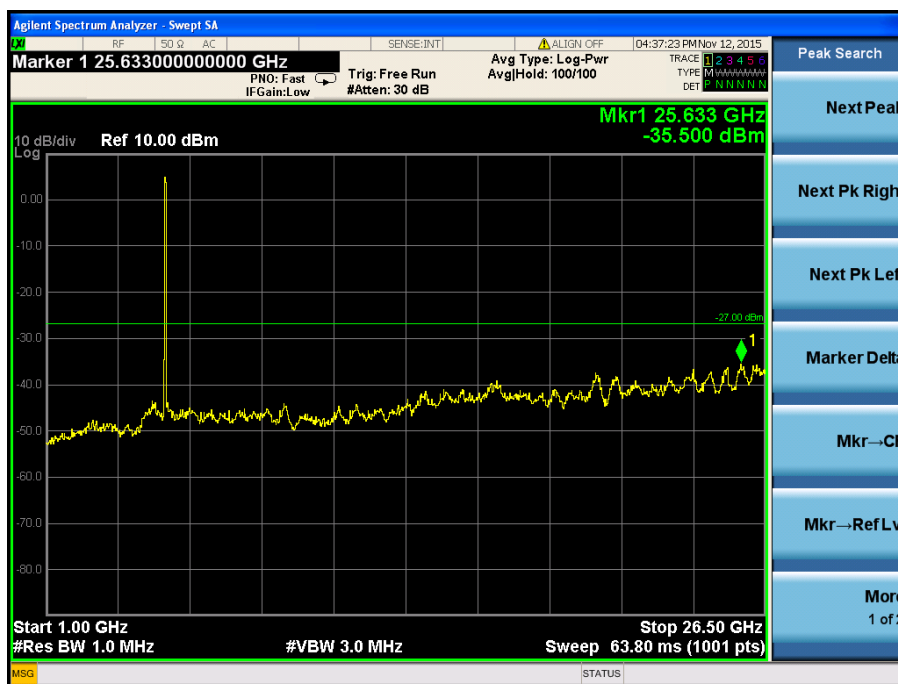
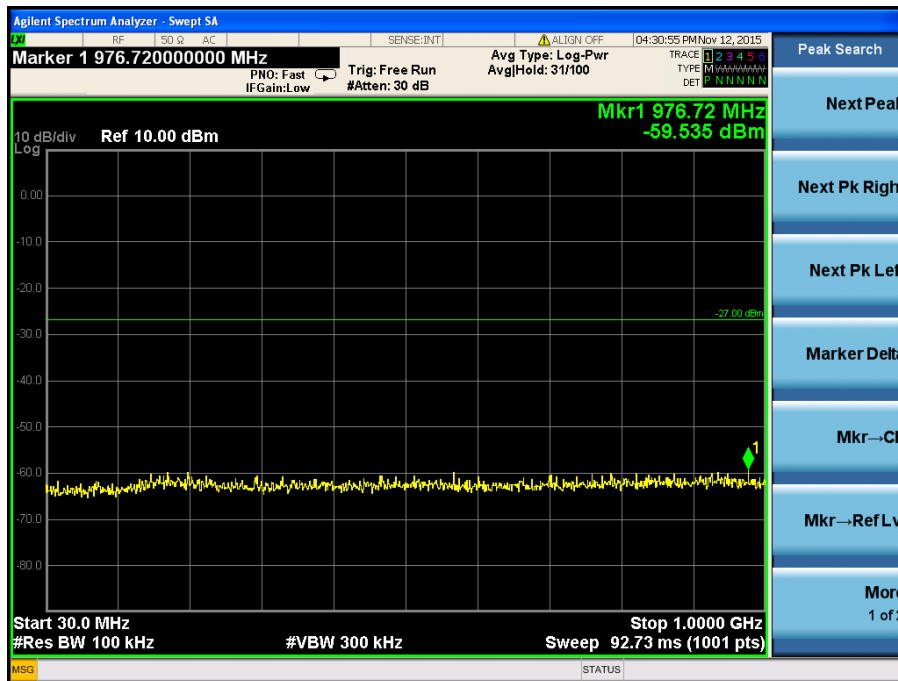


802.11n-HT20  
5180MHz

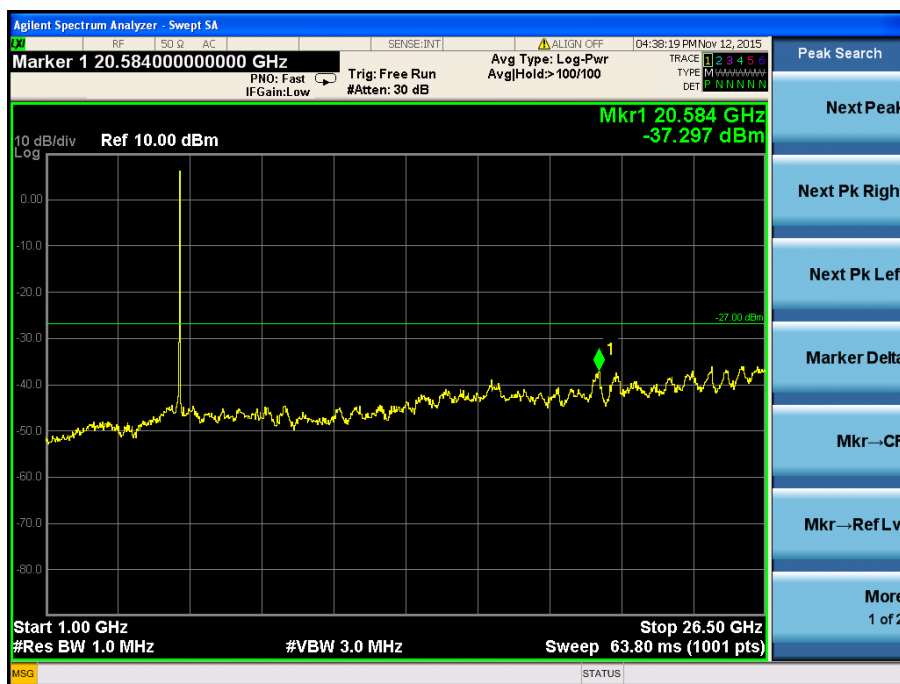
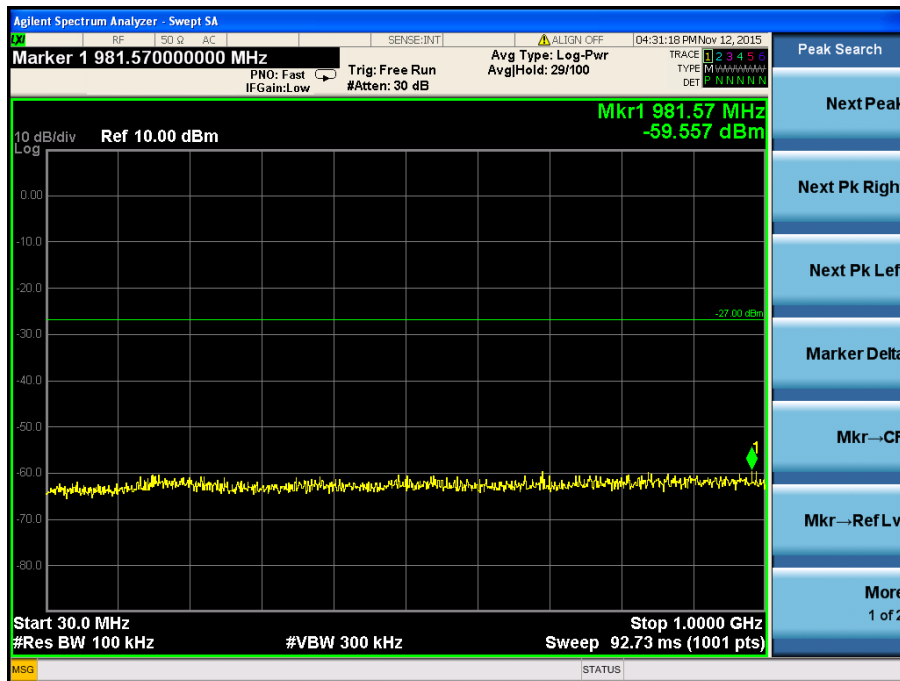




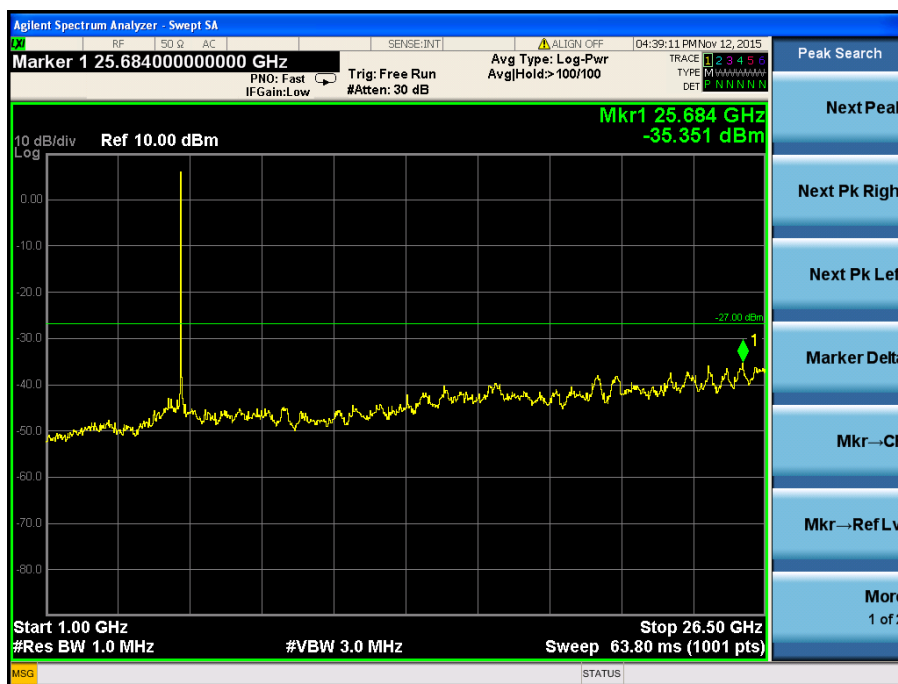
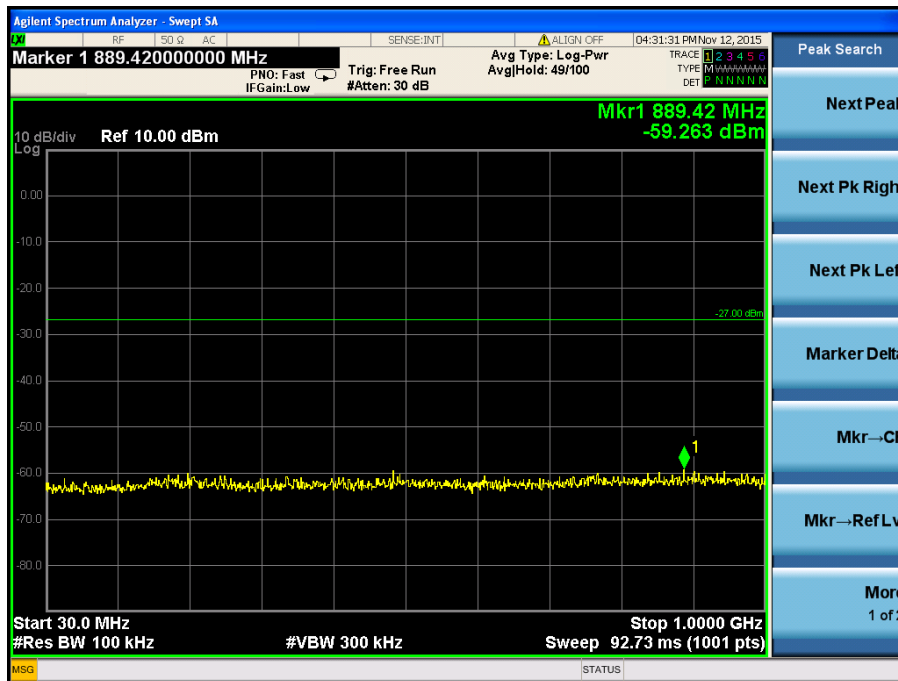
5240MHz



5745MHz

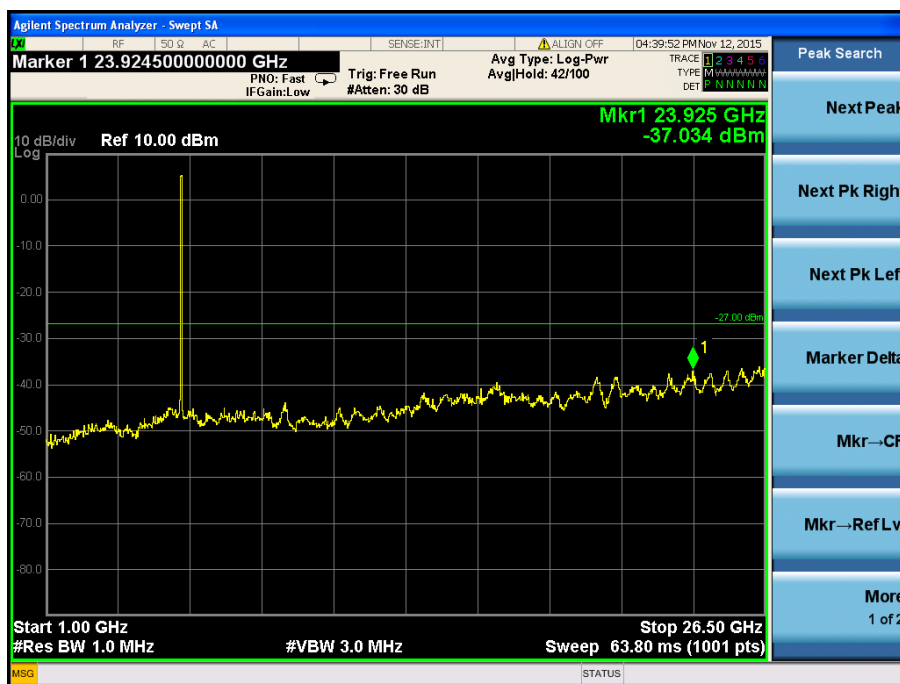
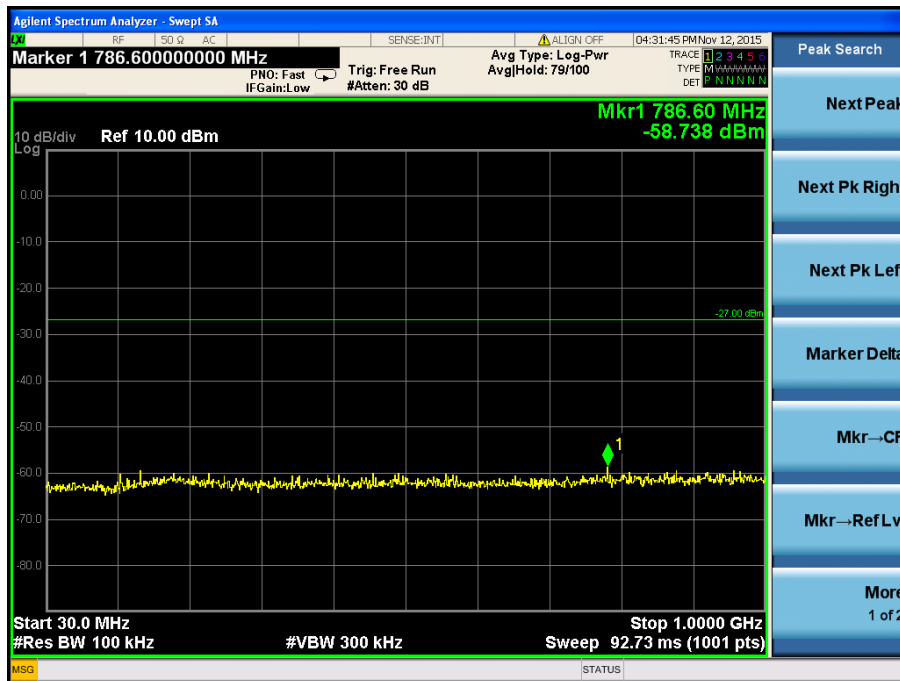


5785MHz



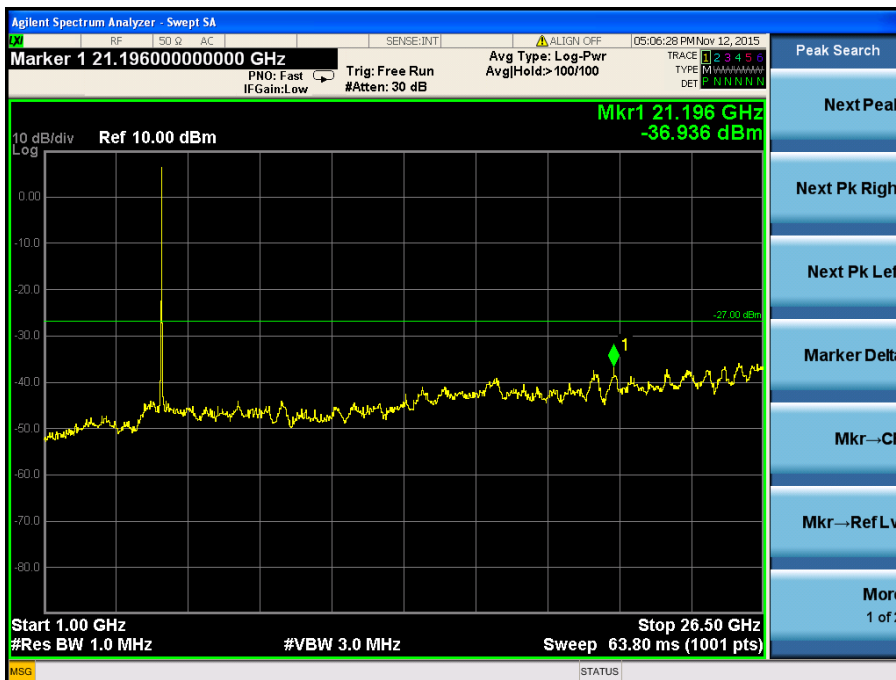
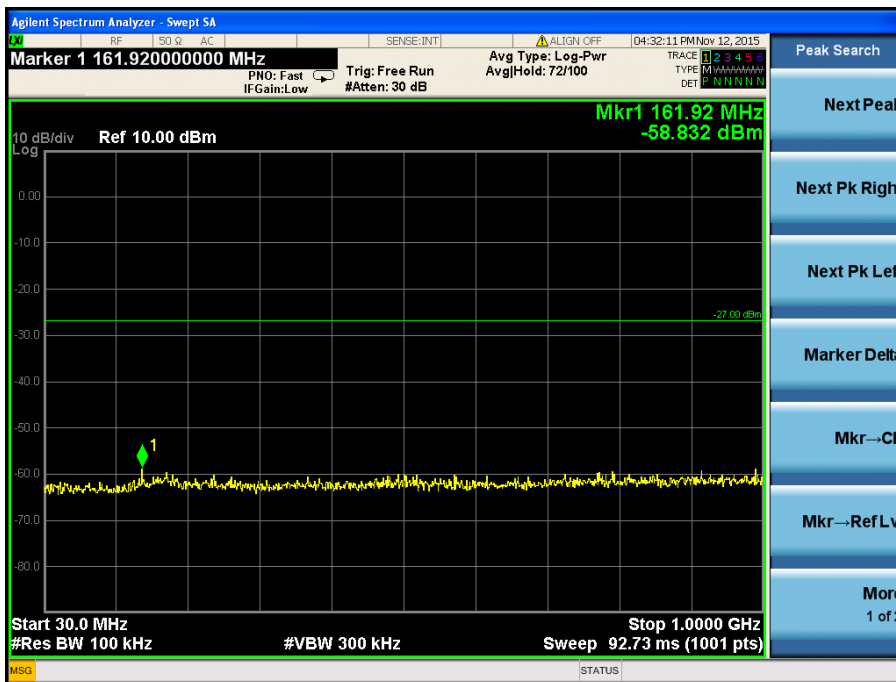


5825MHz

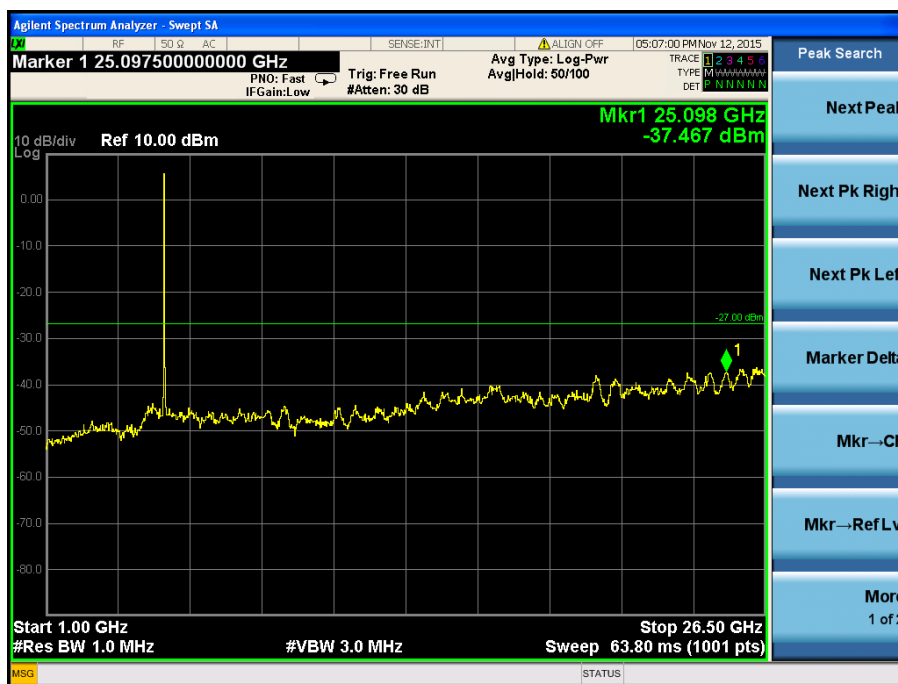
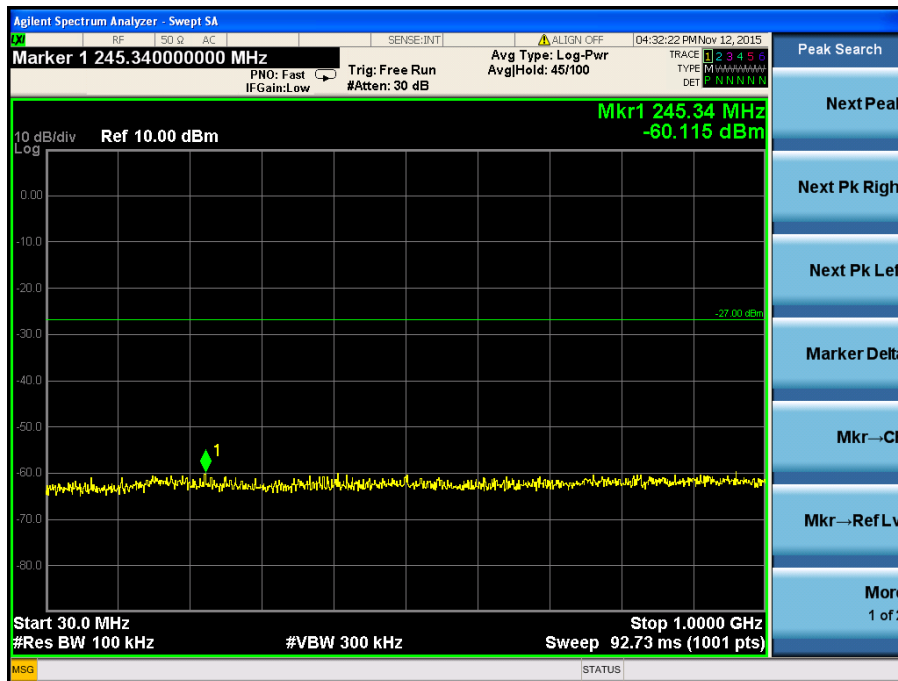


# 802.11n-HT40

5190MHz

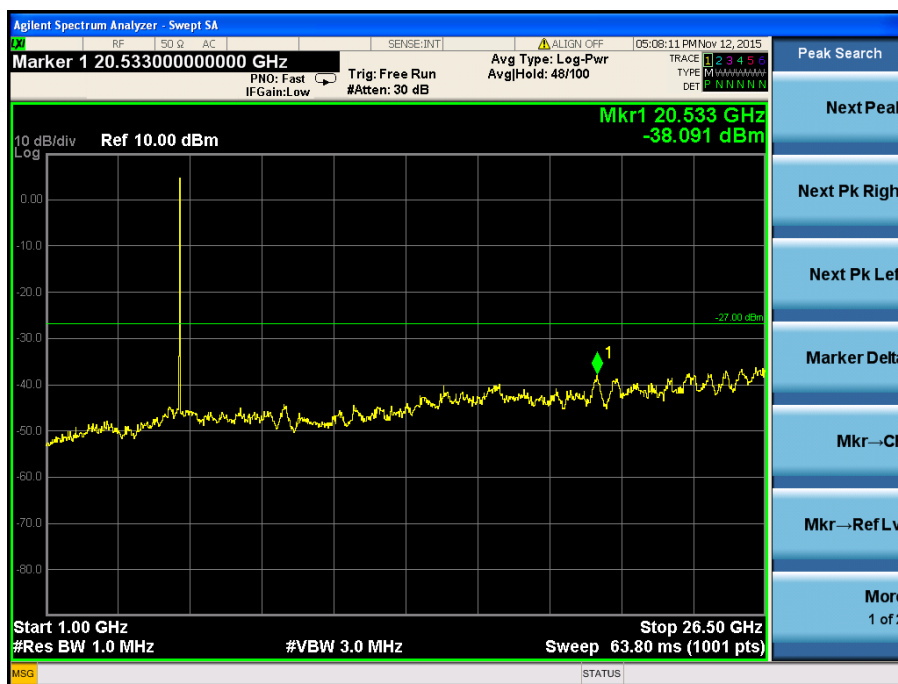
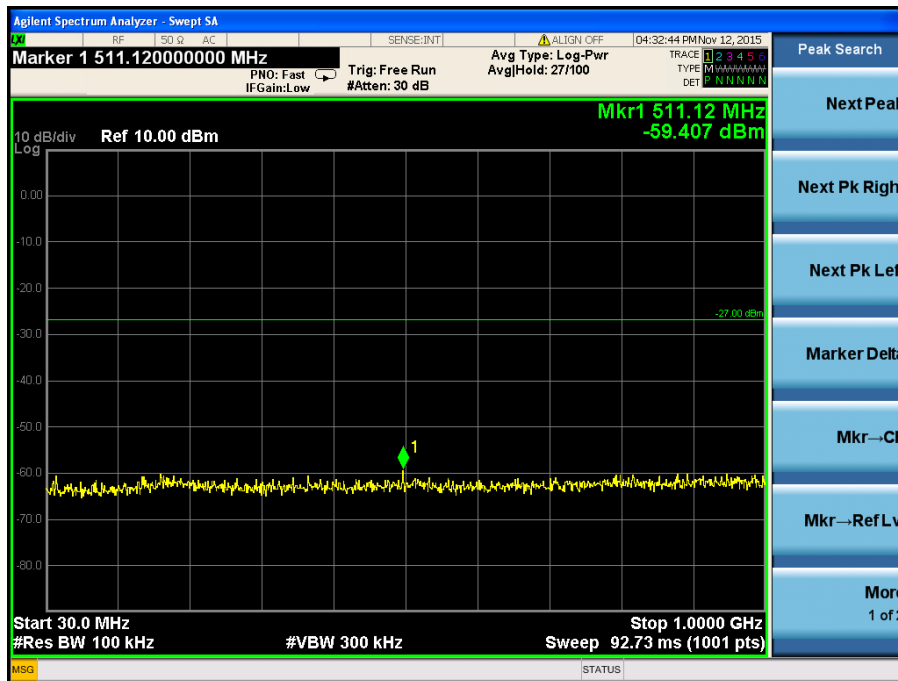


5230MHz





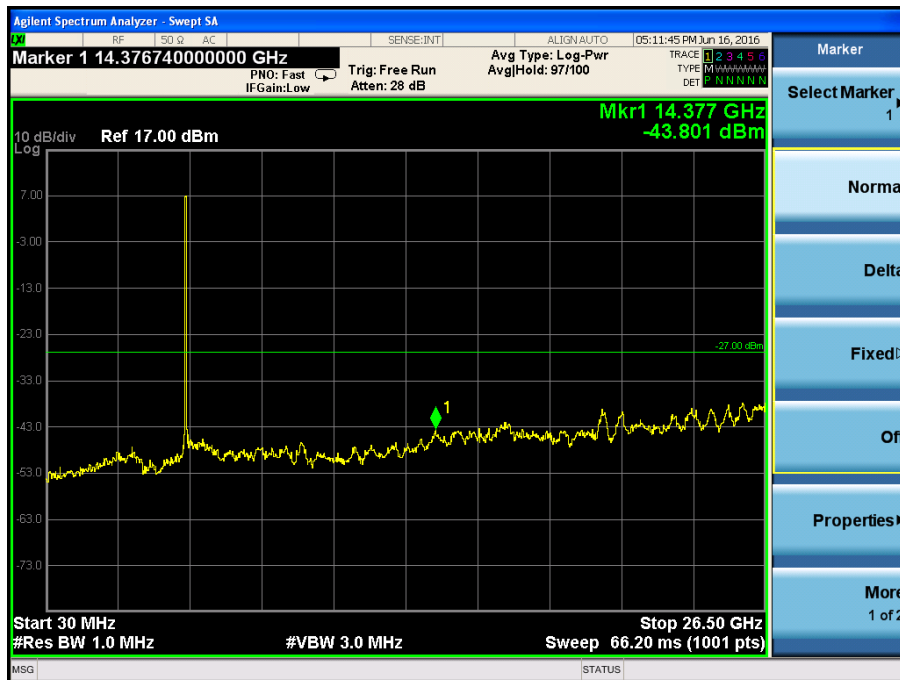
5795MHz



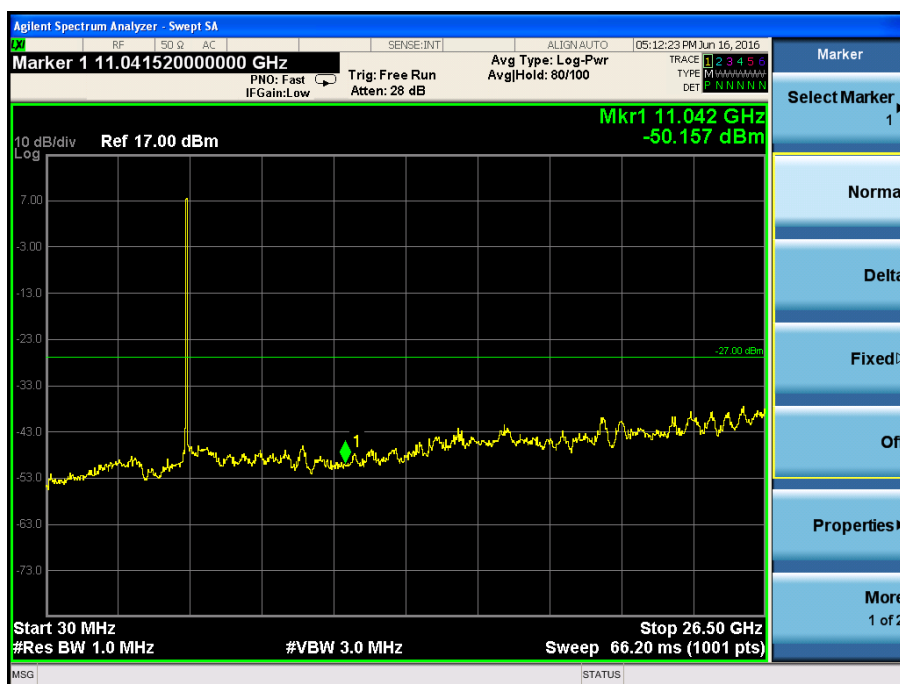
Antenna 2

802.11a

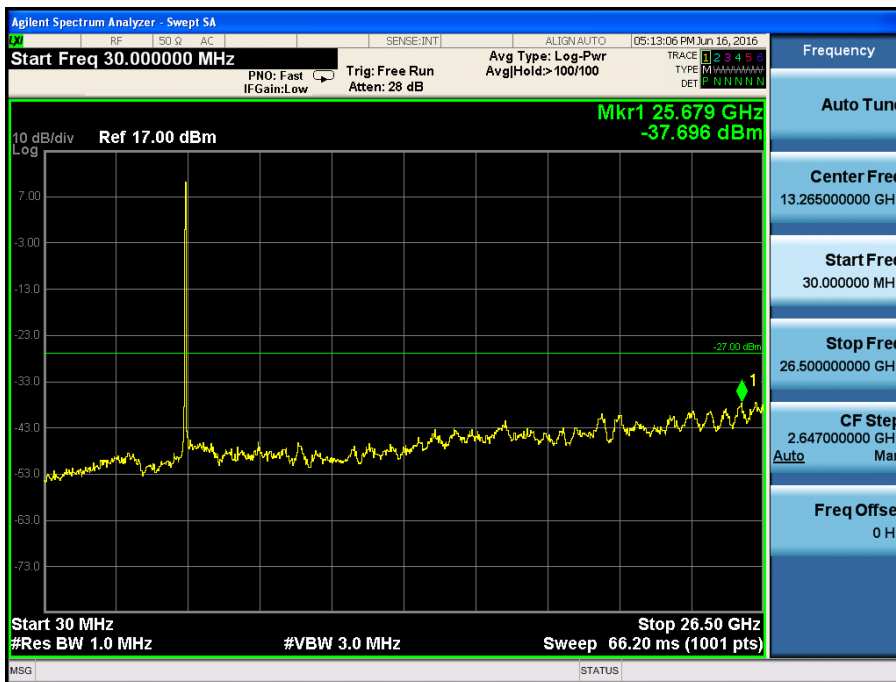
5180MHz



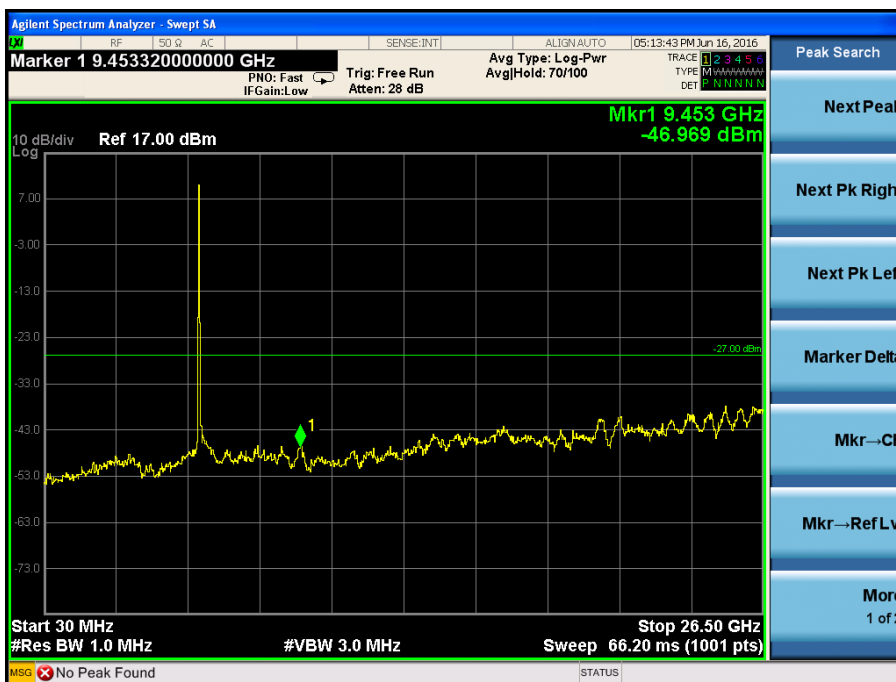
5200MHz



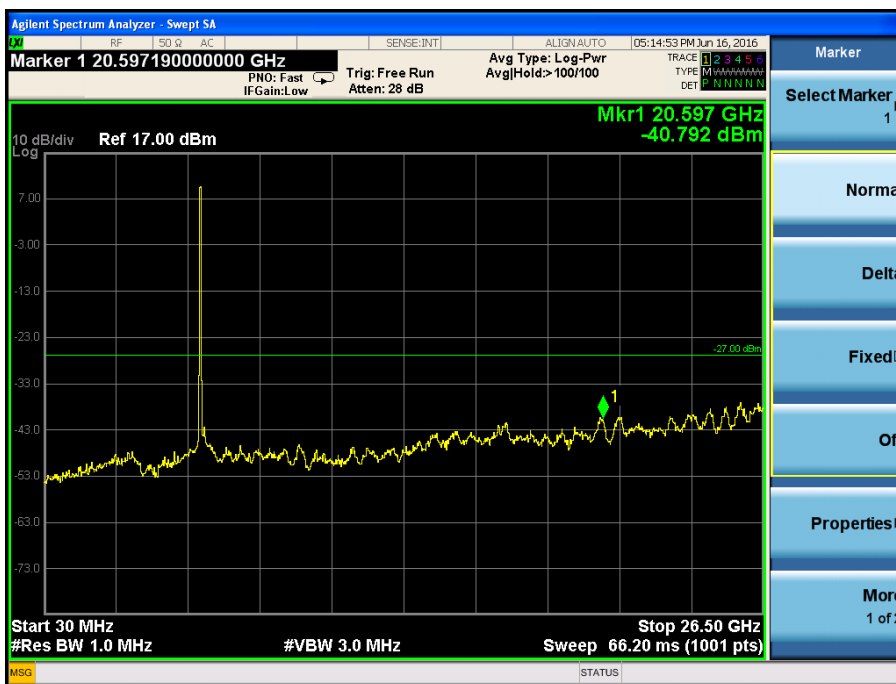
5240MHz



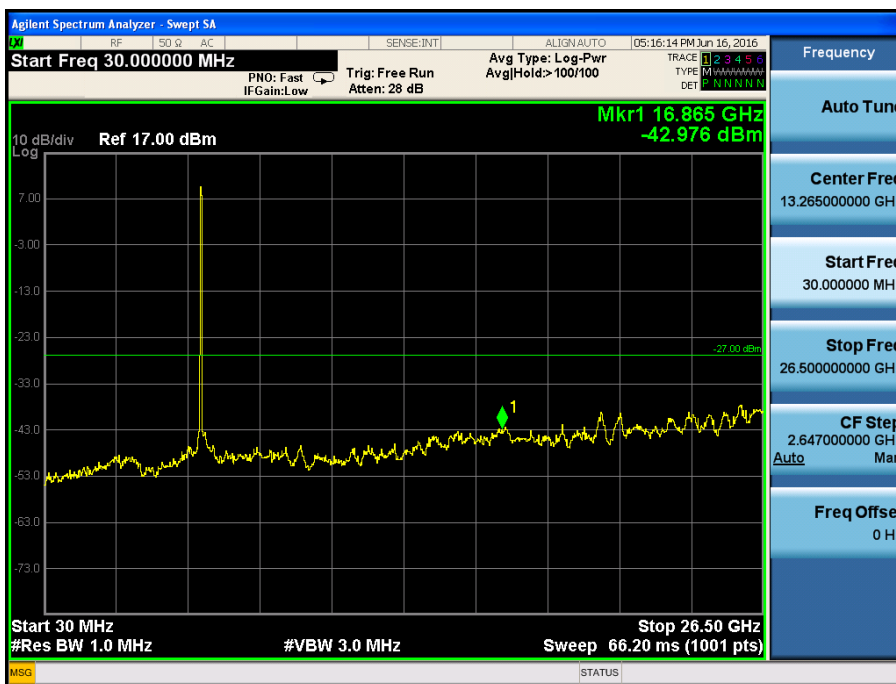
5745MHz



5785MHz

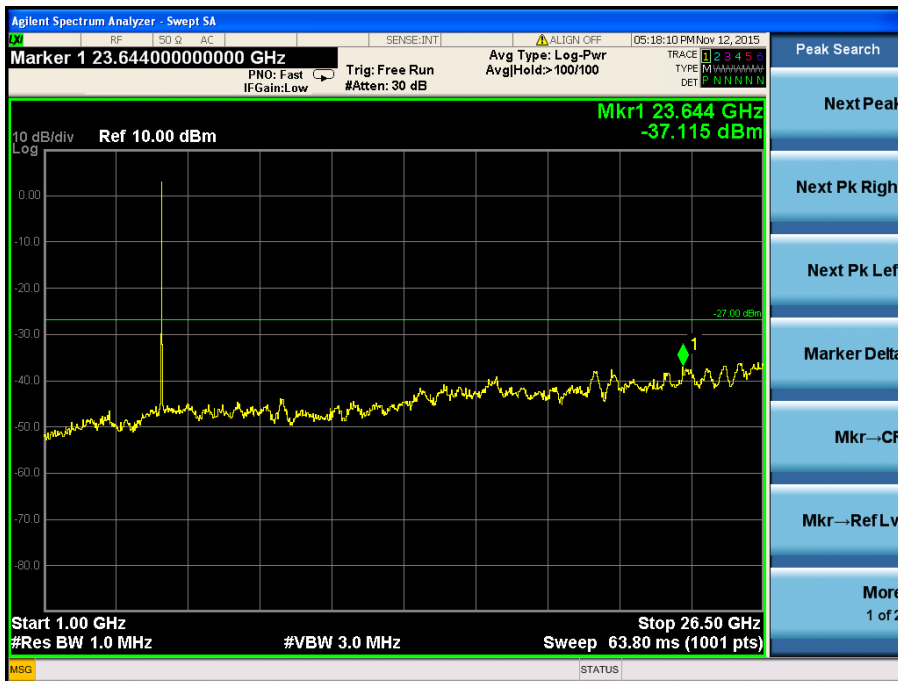
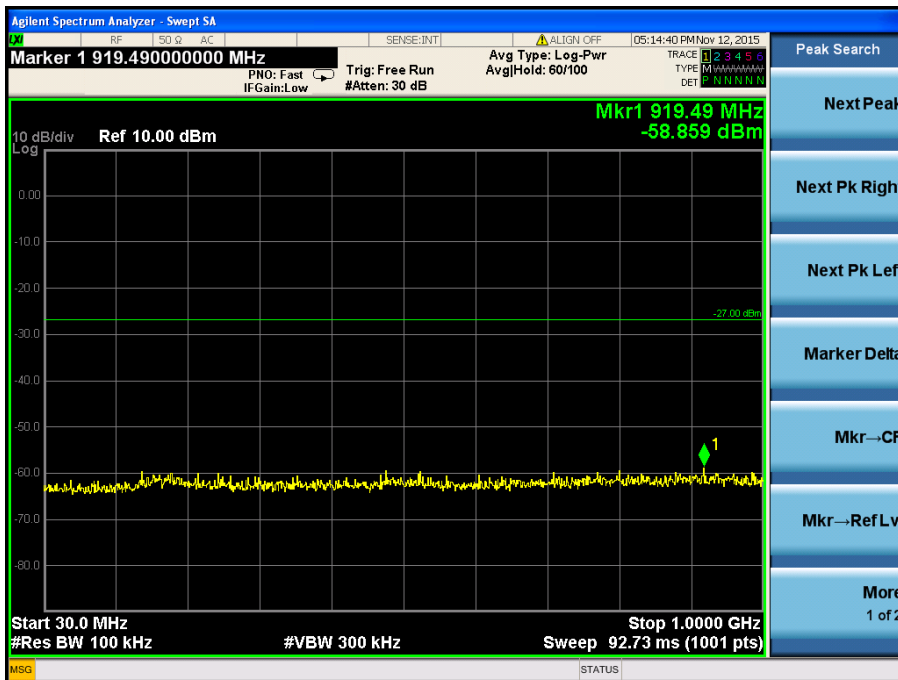


5825MHz

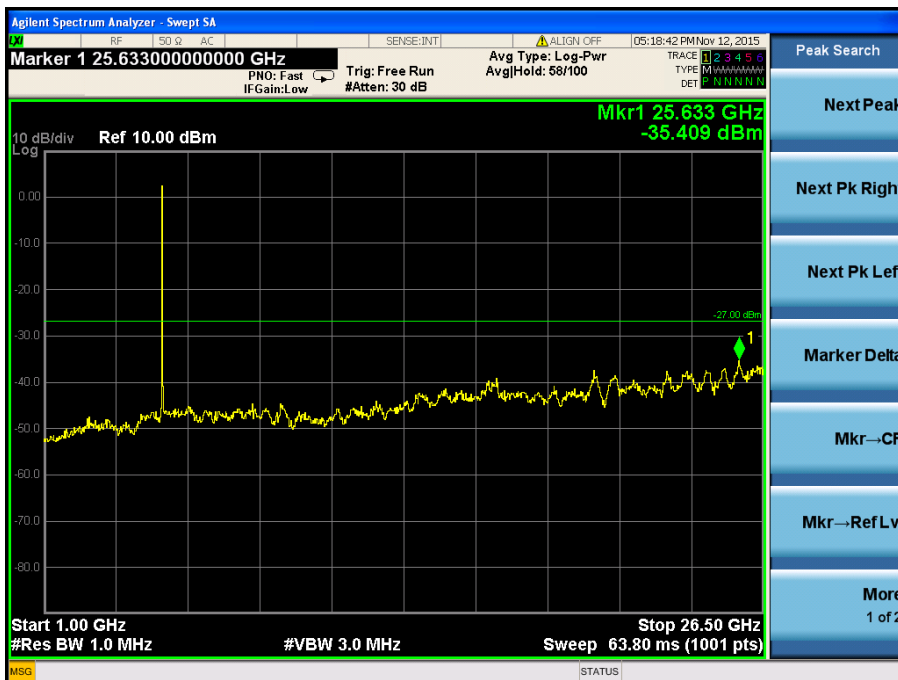
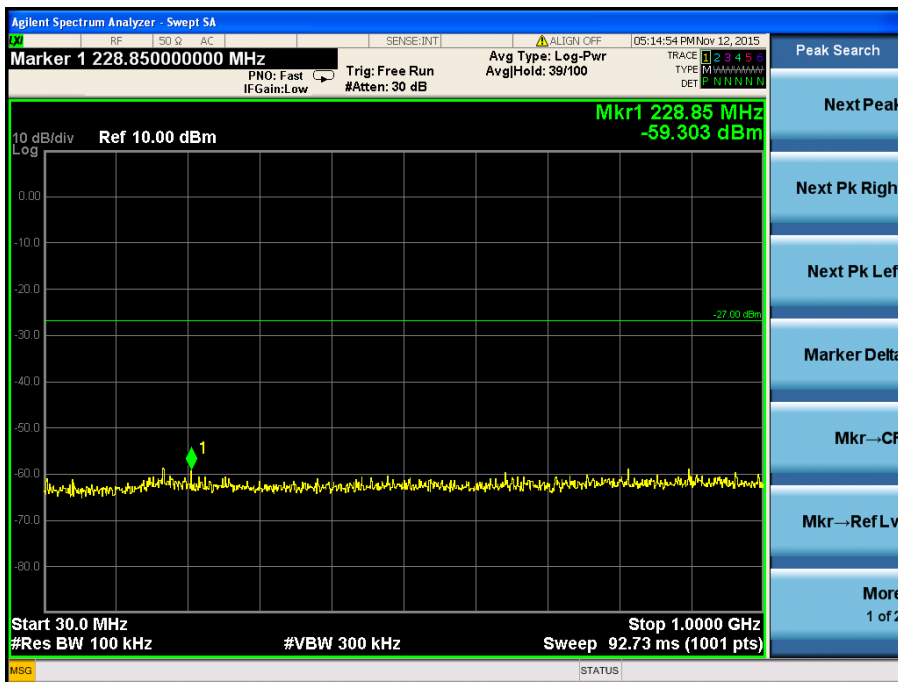




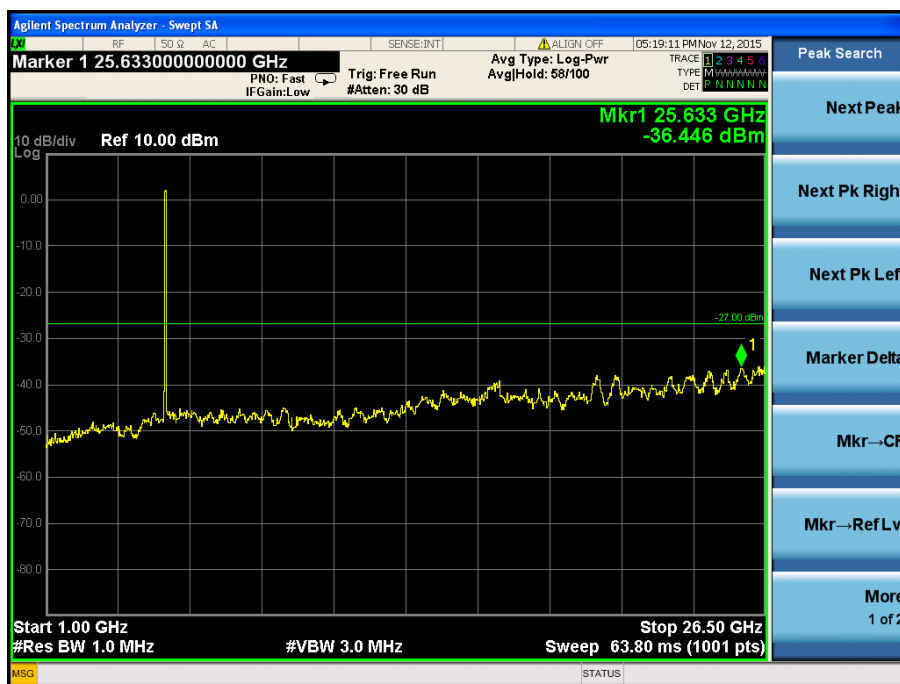
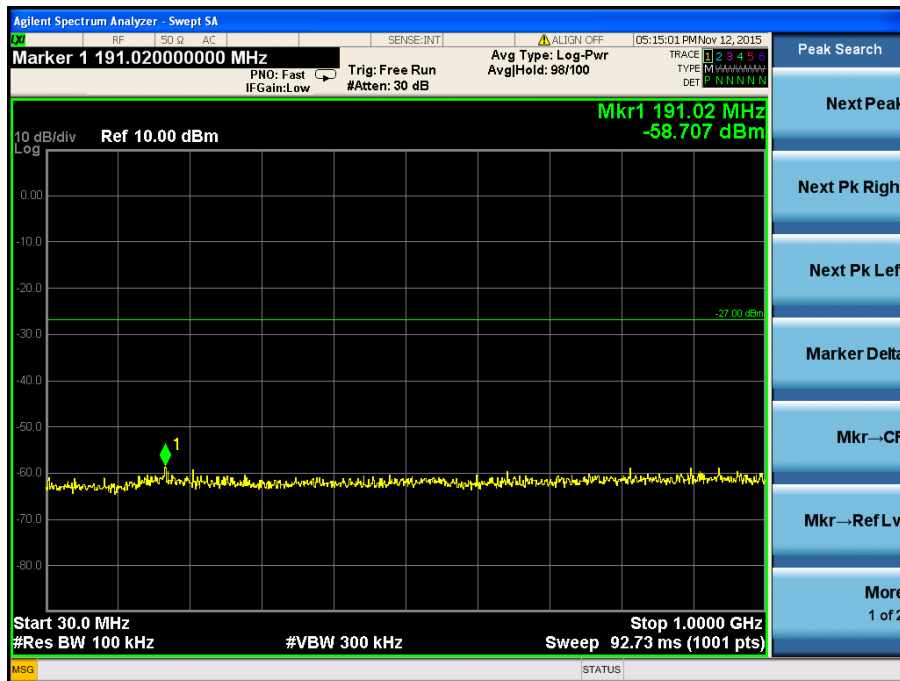
802.11n-HT20  
5180MHz



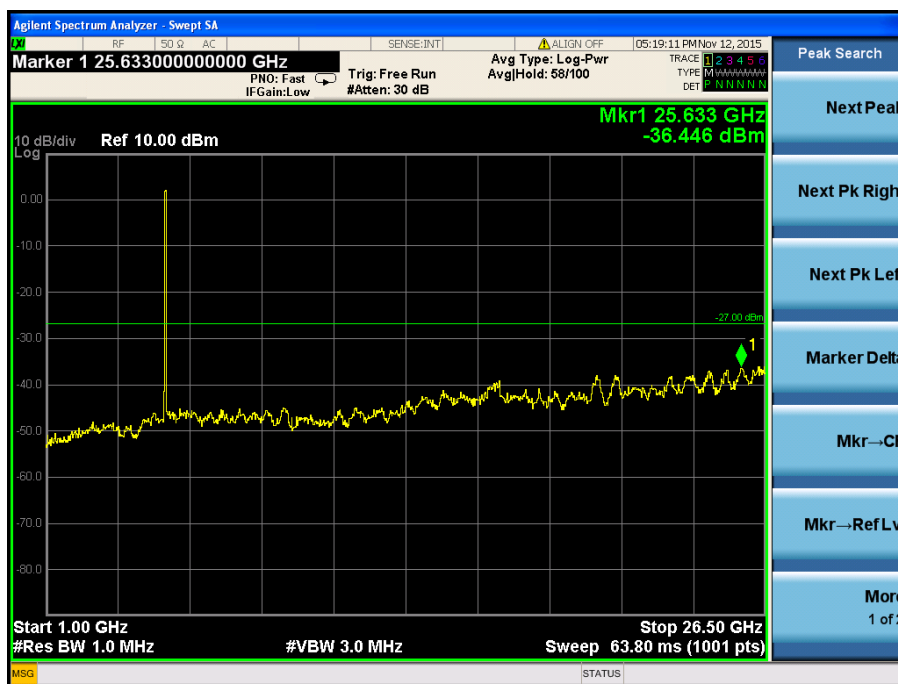
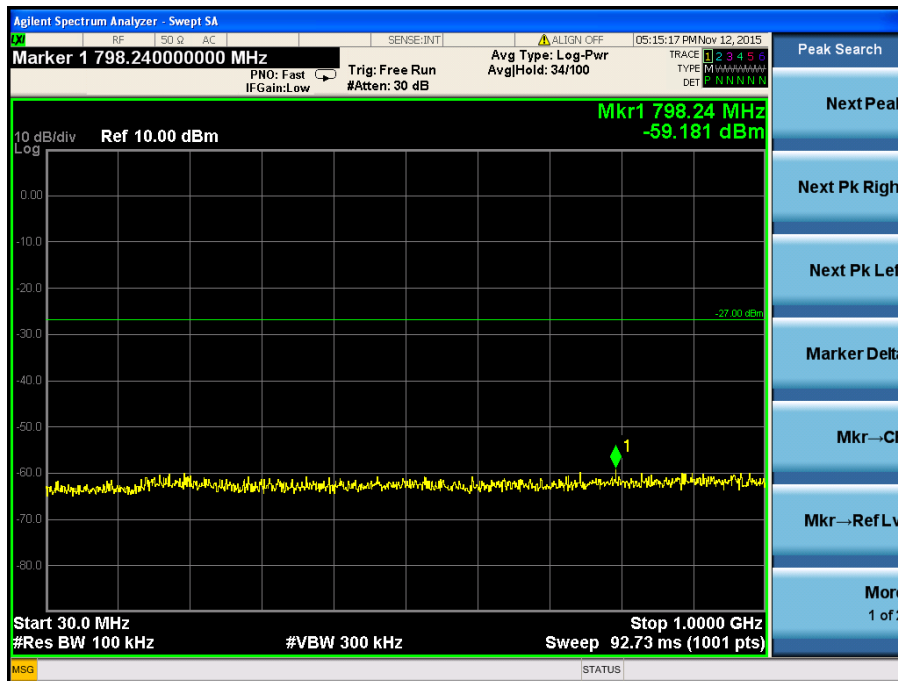
5200MHz



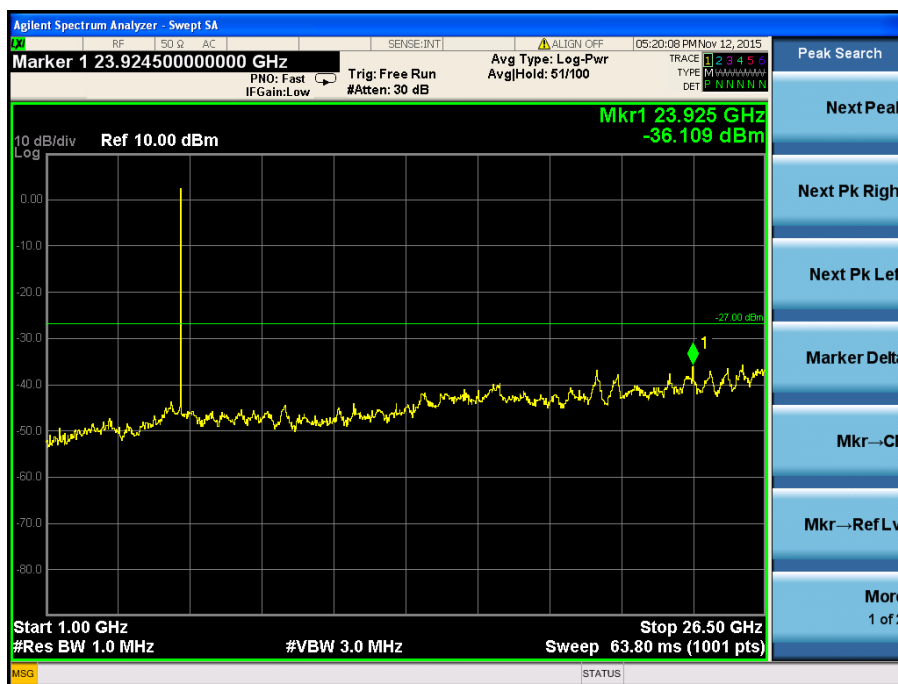
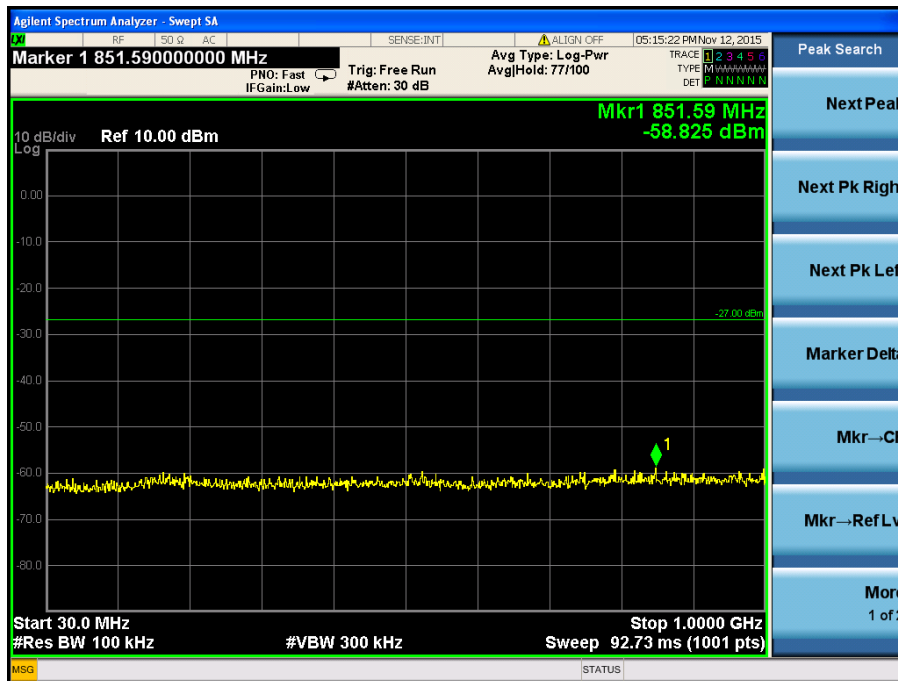
5240MHz



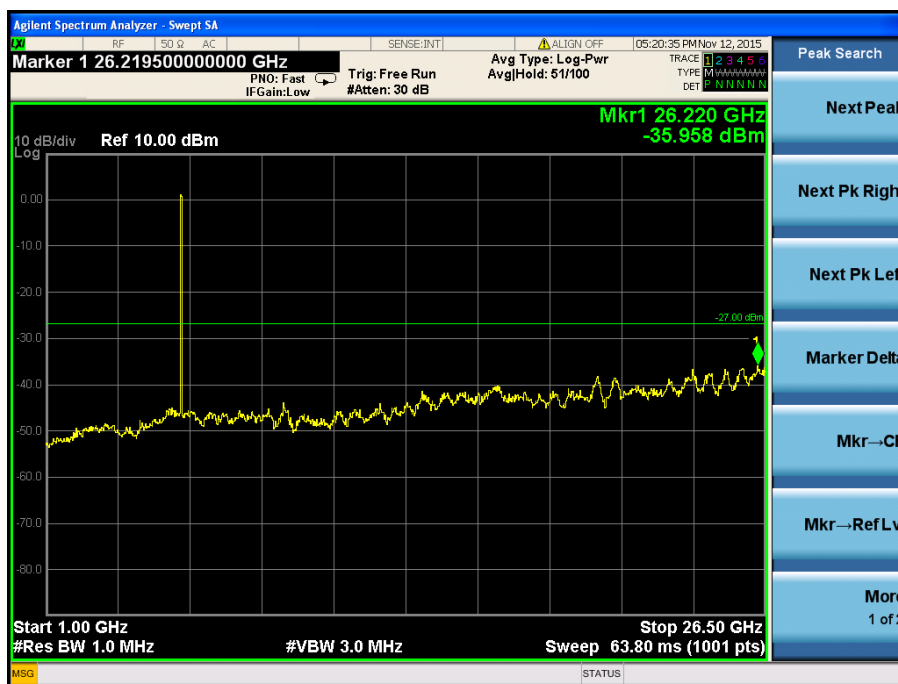
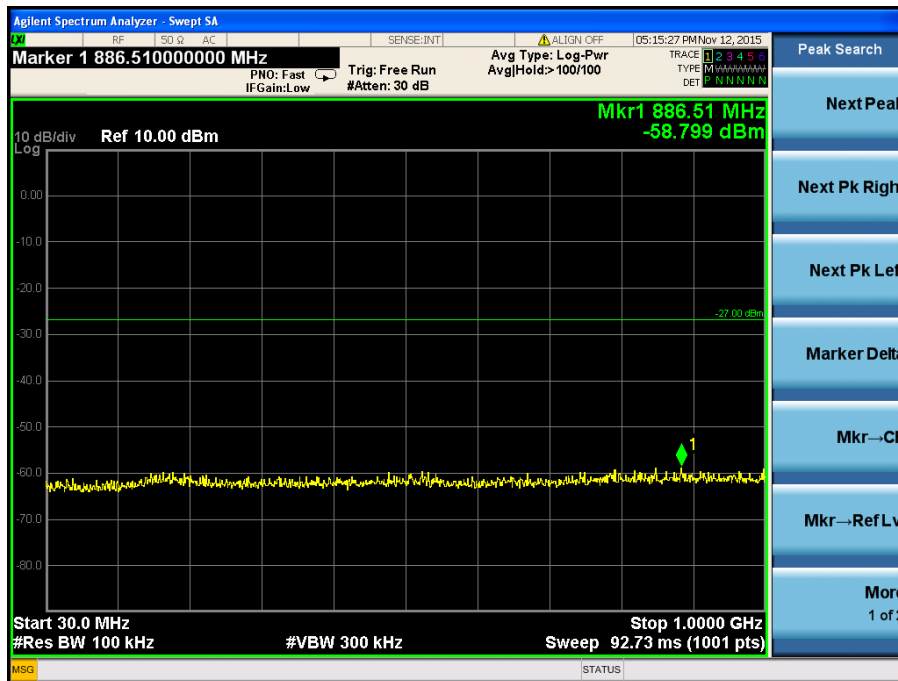
5745MHz



5785MHz

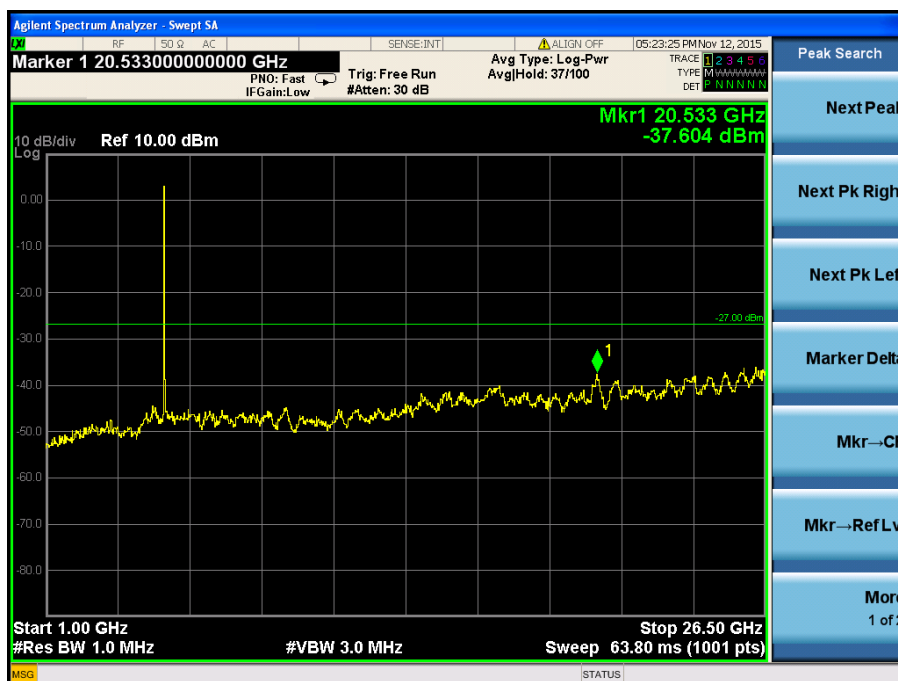
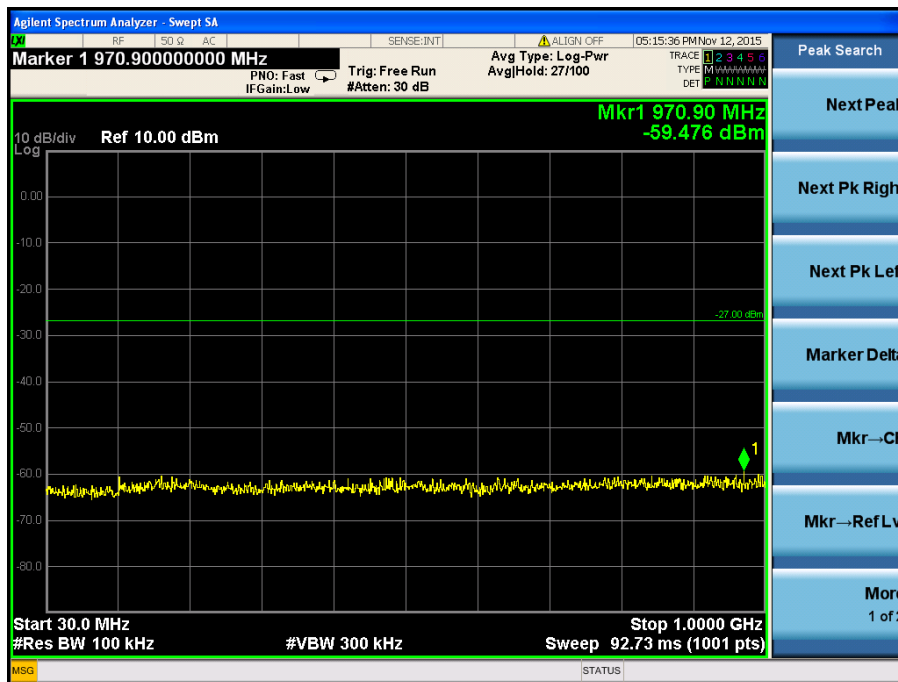


5825MHz

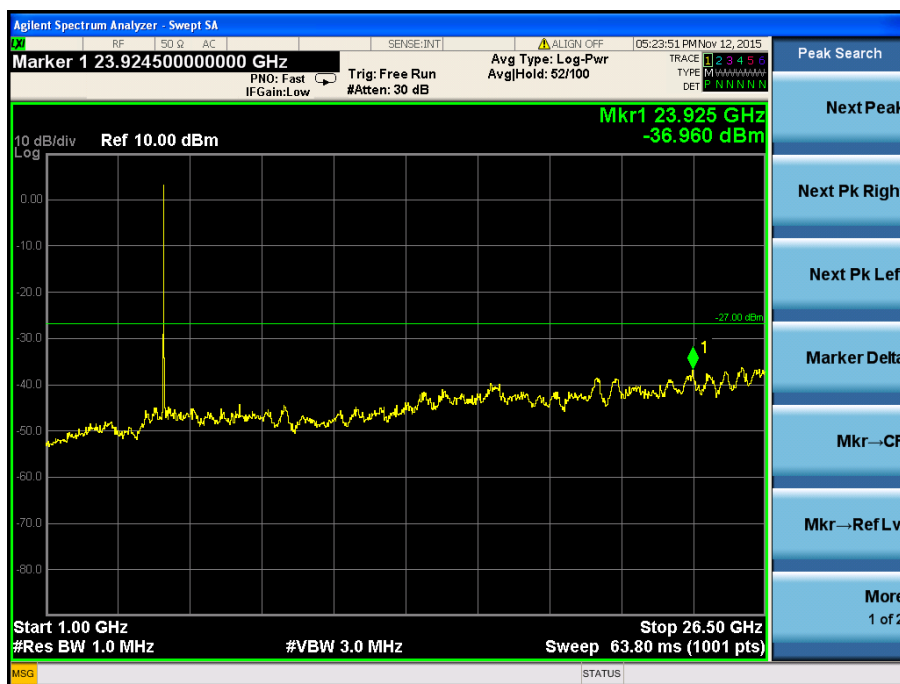
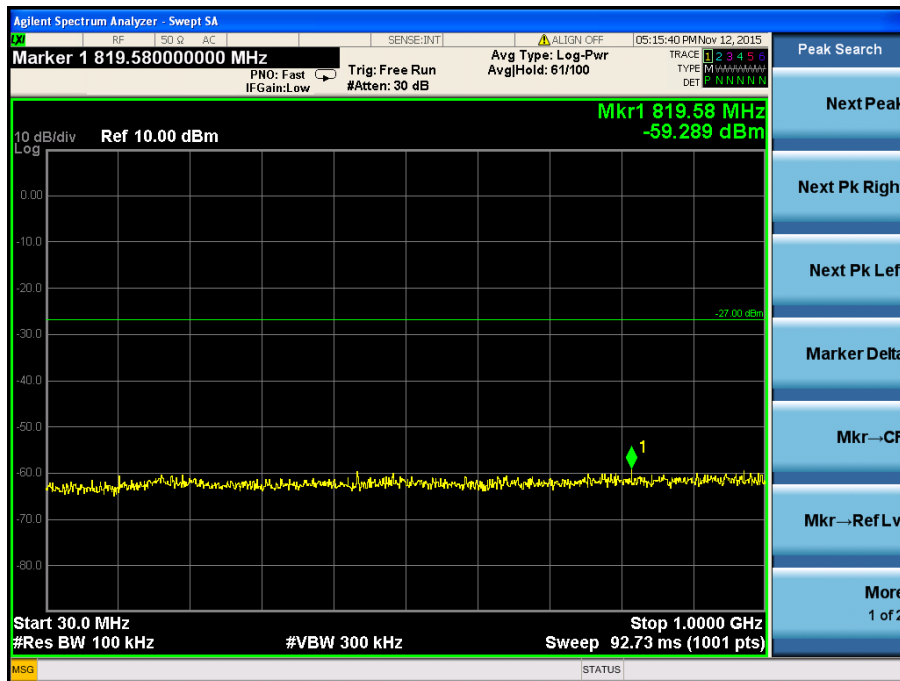


# 802.11n-HT40

5190MHz

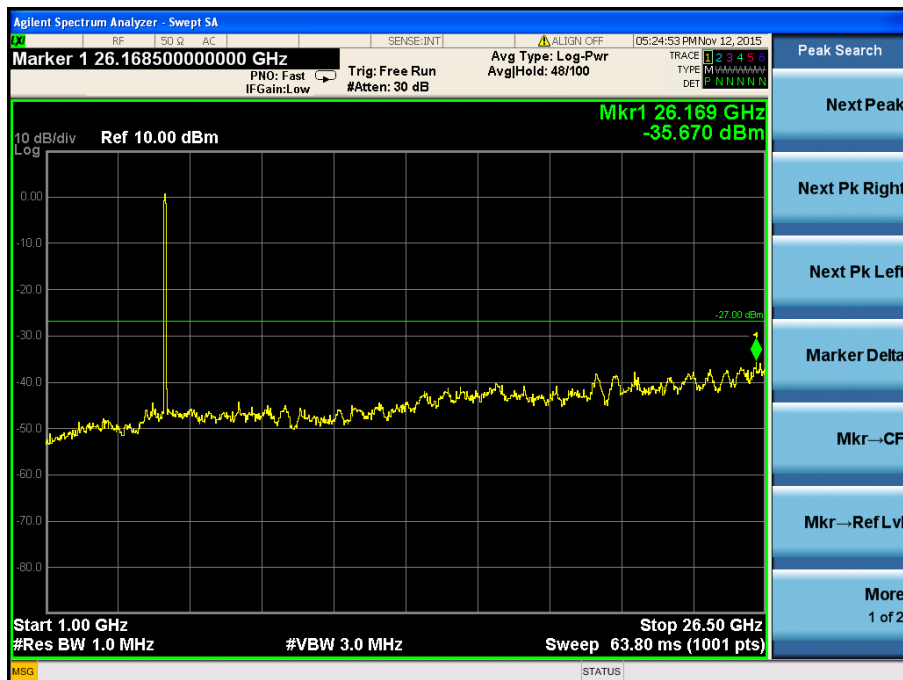
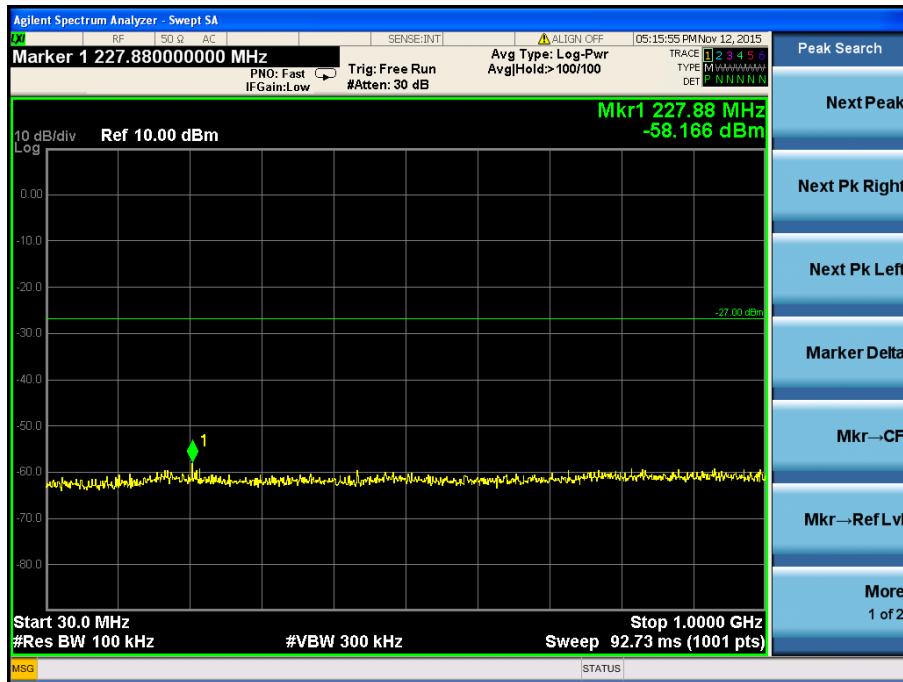


5230MHz

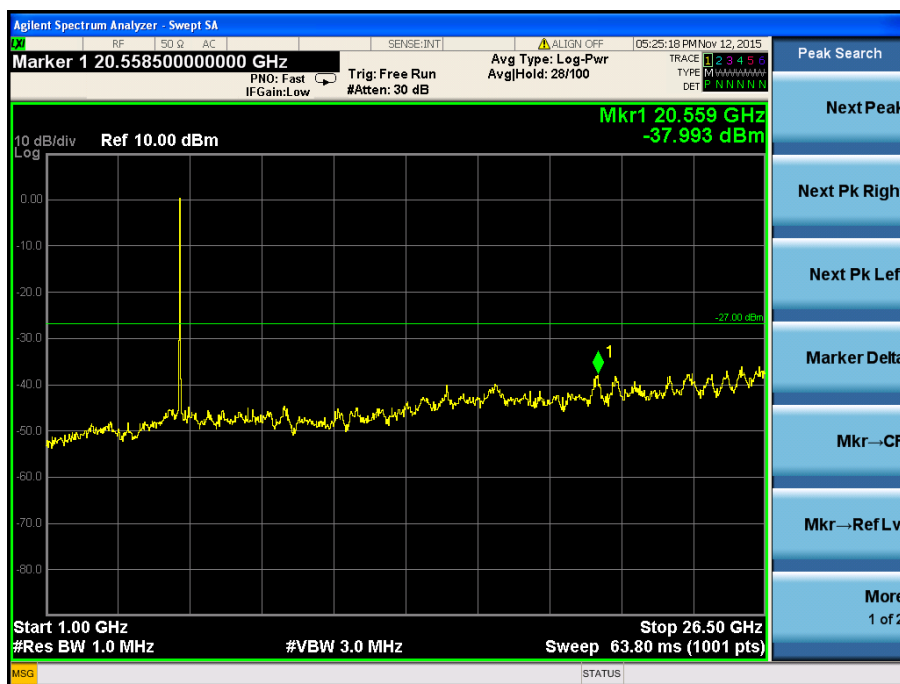
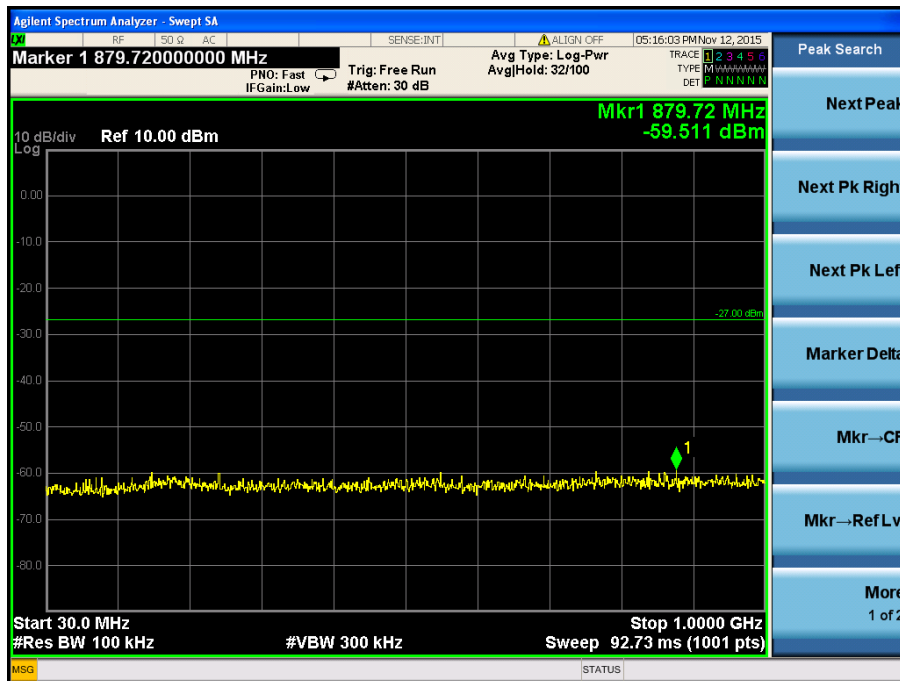




5755MHz



5795MHz



## 9. Radiated Spurious Emissions

### 9.1 Measurement Uncertainty

Based on NIS 81, The Treatment of Uncertainty in EMC Measurements, the best estimate of the uncertainty of a radiation emissions measurement is  $\pm 5.10$  dB.

### 9.2 Standard Applicable

According to §15.407(b)(6), Unwanted emissions below 1 GHz must comply with the general field strength limits set forth in §15.209. Further, any U-NII devices using an AC power line are required to comply also with the conducted limits set forth in §15.207.

According to §15.407(b)(7), The provisions of §15.205 apply to intentional radiators operating under this section. 789033 D02 General UNII Test Procedures New Rules v01

If radiated measurements are performed, field strength is then converted to EIRP as follows:

$$\text{EIRP} = ((E*d)^2) / 30$$

where:

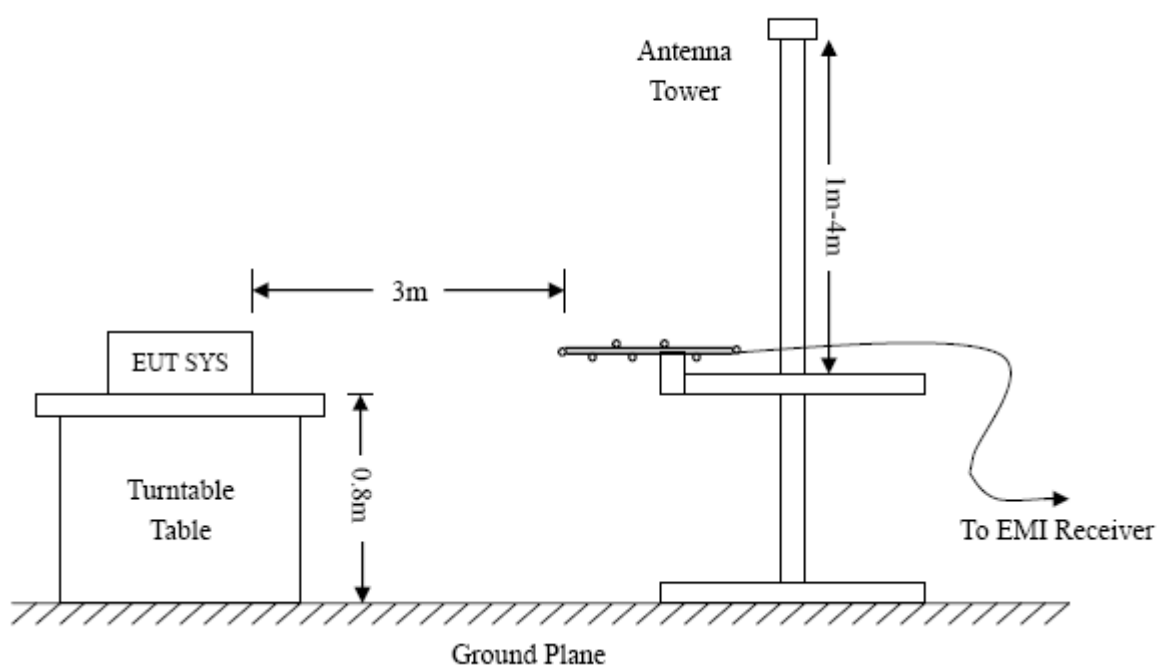
- E is the field strength in V/m;
- d is the measurement distance in meters;
- EIRP is the equivalent isotropically radiated power in watts.

### 9.3 Test Procedure

The setup of EUT is according with per ANSI C63.4-2014 measurement procedure. The specification used was with the FCC Part 15.205 15.407(b)(6) and FCC Part 15.209 Limit..

The external I/O cables were draped along the test table and formed a bundle 30 to 40 cm long in the middle.

The spacing between the peripherals was 10 cm.



## 9.4 Test Receiver Setup

During the radiated emission test for above 1GHz, the test receiver was set with the following configurations:

For peak detector:

RBW = 1000kHz, VBW = 3000kHz, Sweep Time = Auto

For average detector:

RBW = 1000kHz, VBW = 10Hz, Sweep Time = Auto

## 9.5 Corrected Amplitude & Margin Calculation

The Corrected Amplitude is calculated adding the Antenna Factor and the Cable Factor, and subtracting the Amplifier Gain from the Amplitude reading. The basic equation is as follows:

$$\text{Corr. Ampl.} = \text{Indicated Reading} + \text{Ant. Factor} + \text{Cable Loss} - \text{Ampl. Gain}$$

The “**Margin**” column of the following data tables indicates the degree of compliance with the applicable limit. For example, a margin of -6dB $\mu$ V means the emission is 6dB $\mu$ V below the maximum limit. The equation for margin calculation is as follows:

$$\text{Margin} = \text{Corr. Ampl.} - \text{FCC Part 15 Limit}$$

## 9.6 Environmental Conditions

Temperature:	22° C
Relative Humidity:	52%
ATM Pressure:	1012 mbar

## 9.7 Summary of Test Results/Plots

According to the data below, the FCC Part 15.205, 15.209 and 15.407(b)(6) standards, and had the worst margin of:

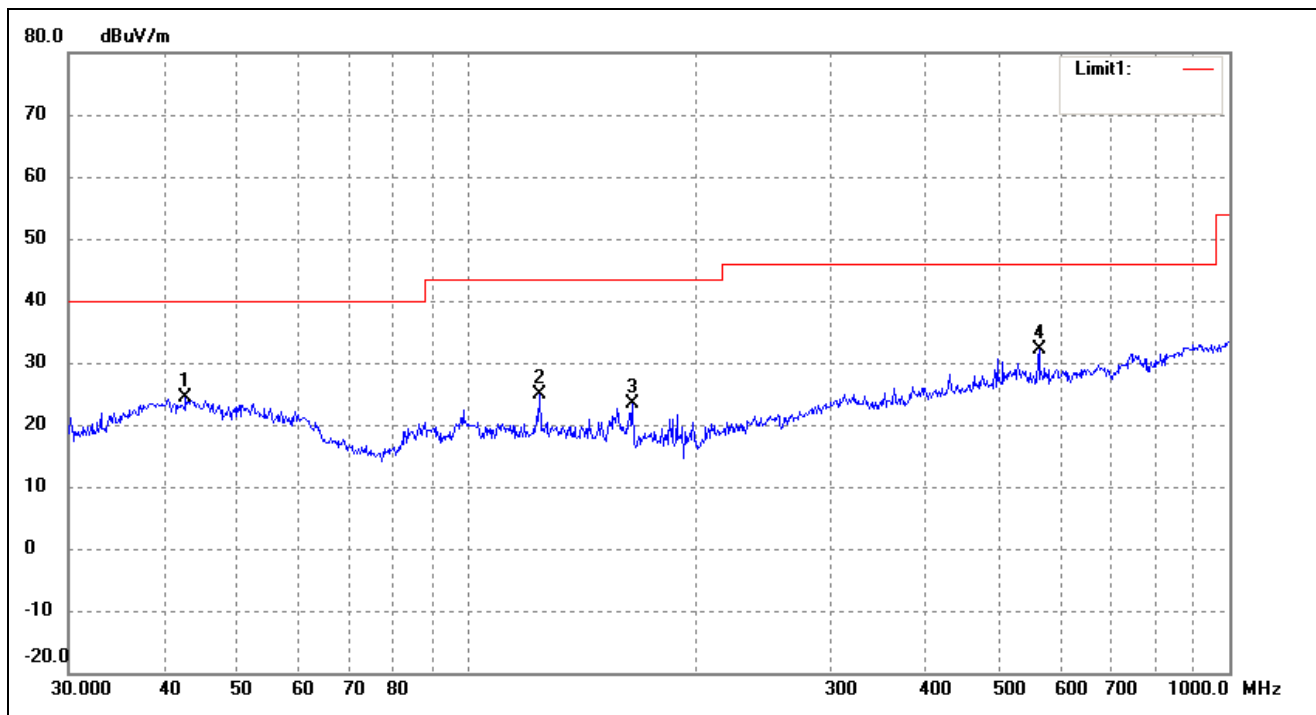
*Note: this EUT was tested in 3 orthogonal positions and the worst case position data was reported.*

For 802.11n-HT20(11a and 11n-HT20,11n-HT20 is worst case)

Spurious Emission From 30 MHz to 1 GHz

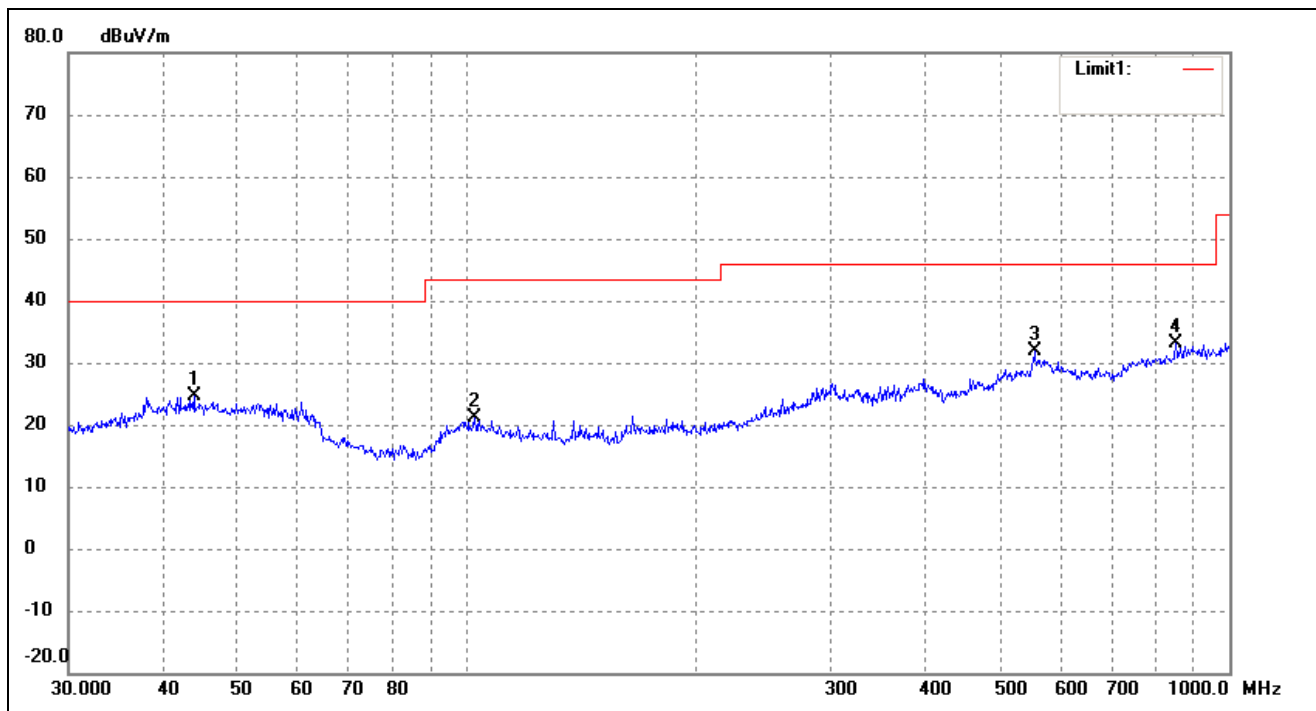
Test mode: Transmitting Channel 5180MHz

Horizontal



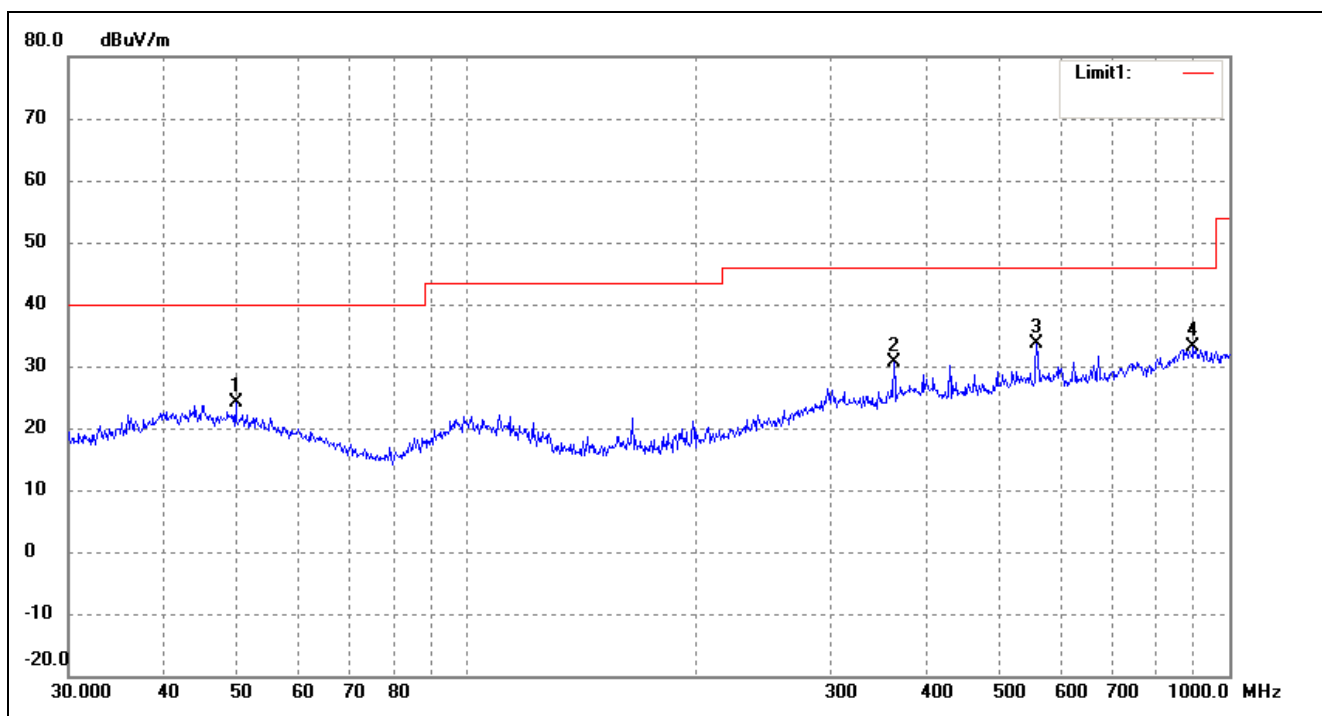
No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	42.7496	17.30	6.98	24.28	40.00	-15.72	35	100	peak
2	124.5690	21.12	3.65	24.77	43.50	-18.73	68	100	peak
3	164.9071	20.76	2.65	23.41	43.50	-20.09	105	100	peak
4	562.6624	20.52	11.67	32.19	46.00	-13.81	138	100	peak

Test Specification: Vertical



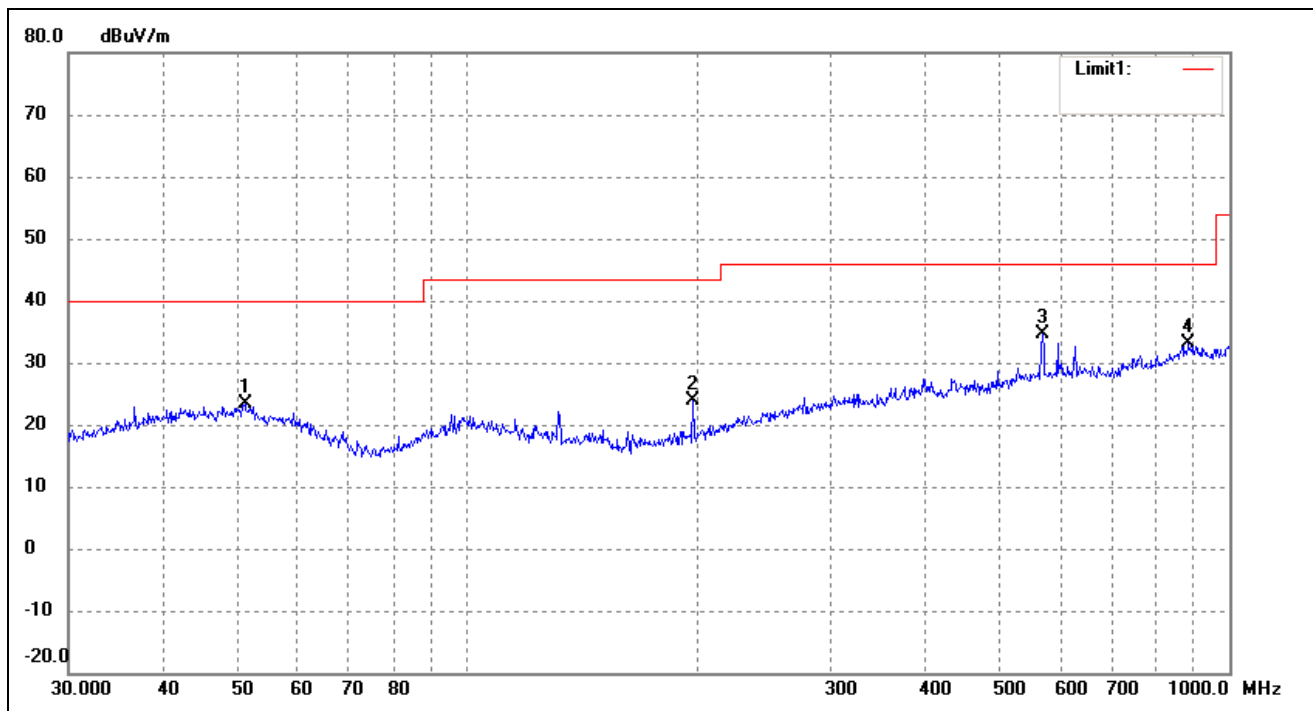
No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	43.8119	16.42	8.12	24.54	40.00	-15.46	41	100	peak
2	102.3597	15.15	5.88	21.03	43.50	-22.47	77	100	peak
3	554.8252	20.44	11.46	31.90	46.00	-14.10	114	100	peak
4	851.0353	17.11	15.97	33.08	46.00	-12.92	172	100	peak

Test mode: Transmitting Channel 5200MHz  
 Horizontal



No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	49.7068	17.83	6.29	24.12	40.00	-15.88	39	100	peak
2	362.9845	21.39	9.24	30.63	46.00	-15.37	164	100	peak
3	558.7301	22.04	11.52	33.56	46.00	-12.44	204	100	peak
4	896.9964	16.18	16.85	33.03	46.00	-12.97	255	100	peak

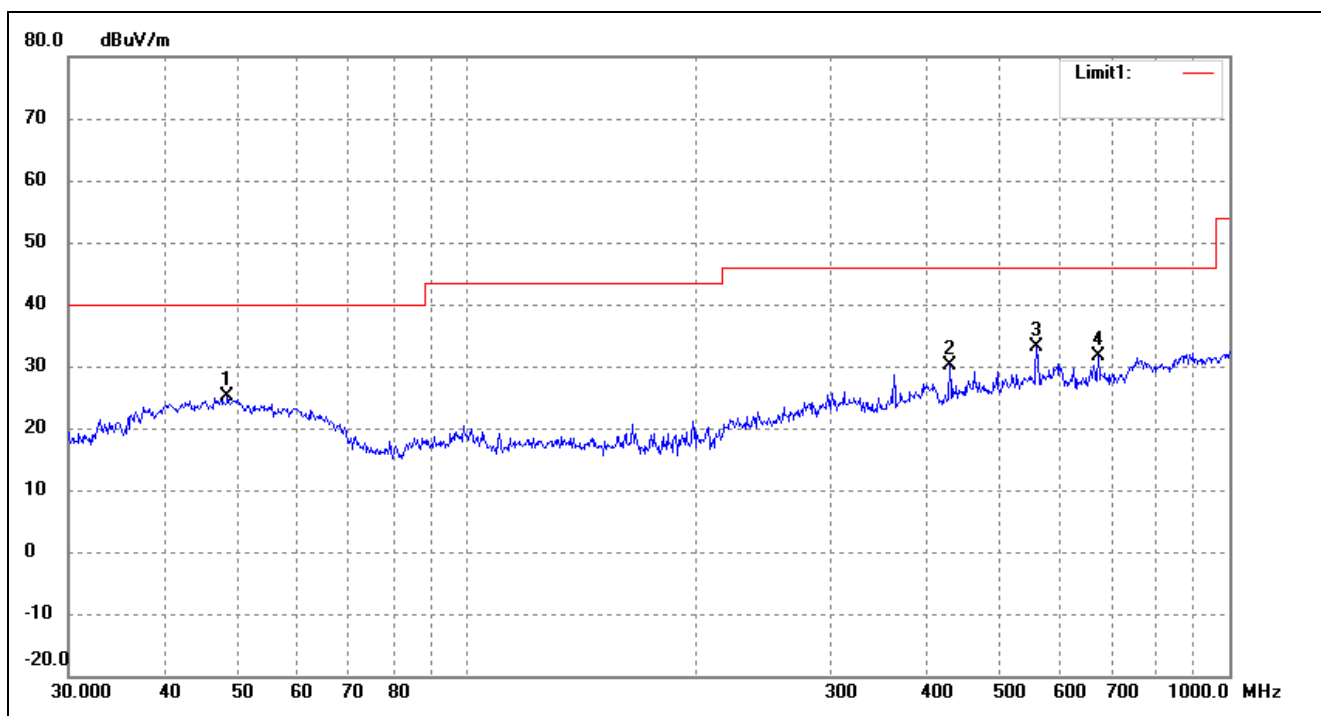
Test Specification: Vertical



No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	51.1208	17.10	6.16	23.26	40.00	-16.74	50	100	peak
2	197.8927	20.40	3.58	23.98	43.50	-19.52	89	100	peak
3	568.6127	22.66	11.98	34.64	46.00	-11.36	135	100	peak
4	884.5028	16.19	16.83	33.02	46.00	-12.98	169	100	peak

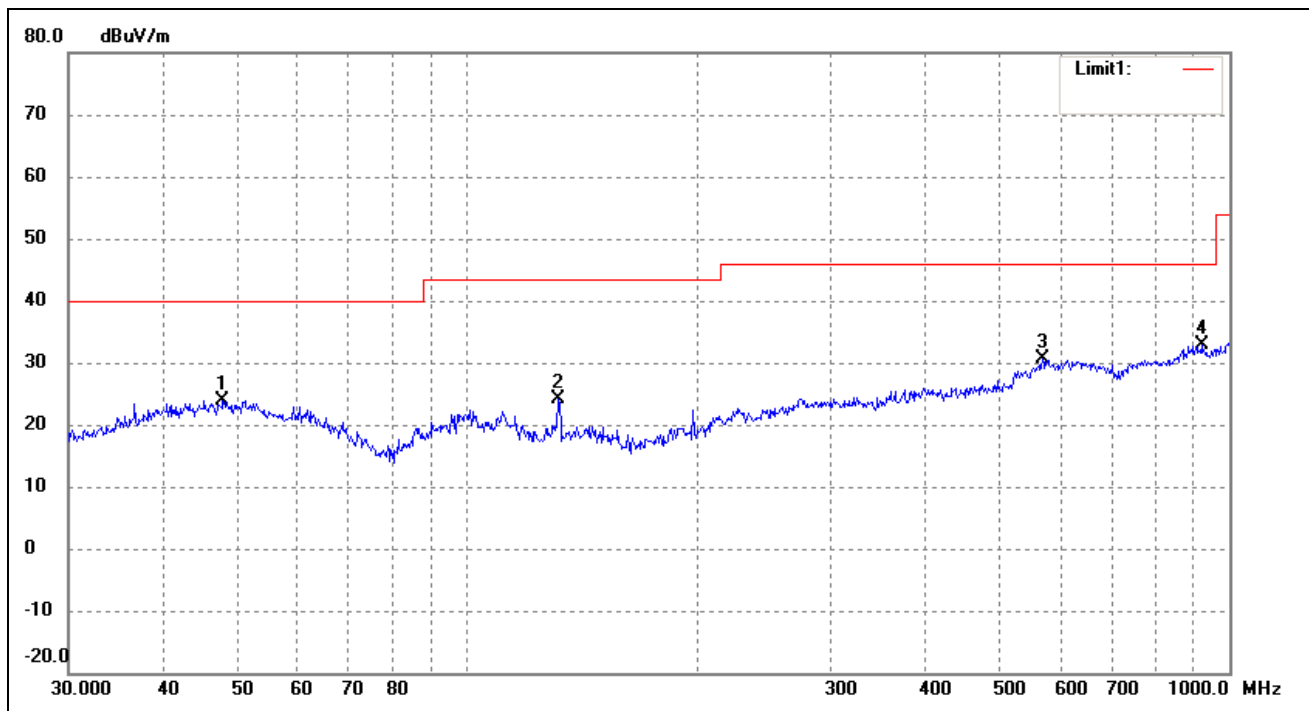


Test mode: Transmitting Channel 5240MHz  
 Horizontal



No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	48.5016	18.61	6.41	25.02	40.00	-14.98	44	100	peak
2	429.5228	20.36	9.68	30.04	46.00	-15.96	149	100	peak
3	558.7300	21.54	11.52	33.06	46.00	-12.94	183	100	peak
4	672.8445	19.38	12.22	31.60	46.00	-14.40	226	100	peak

Test Specification: Vertical

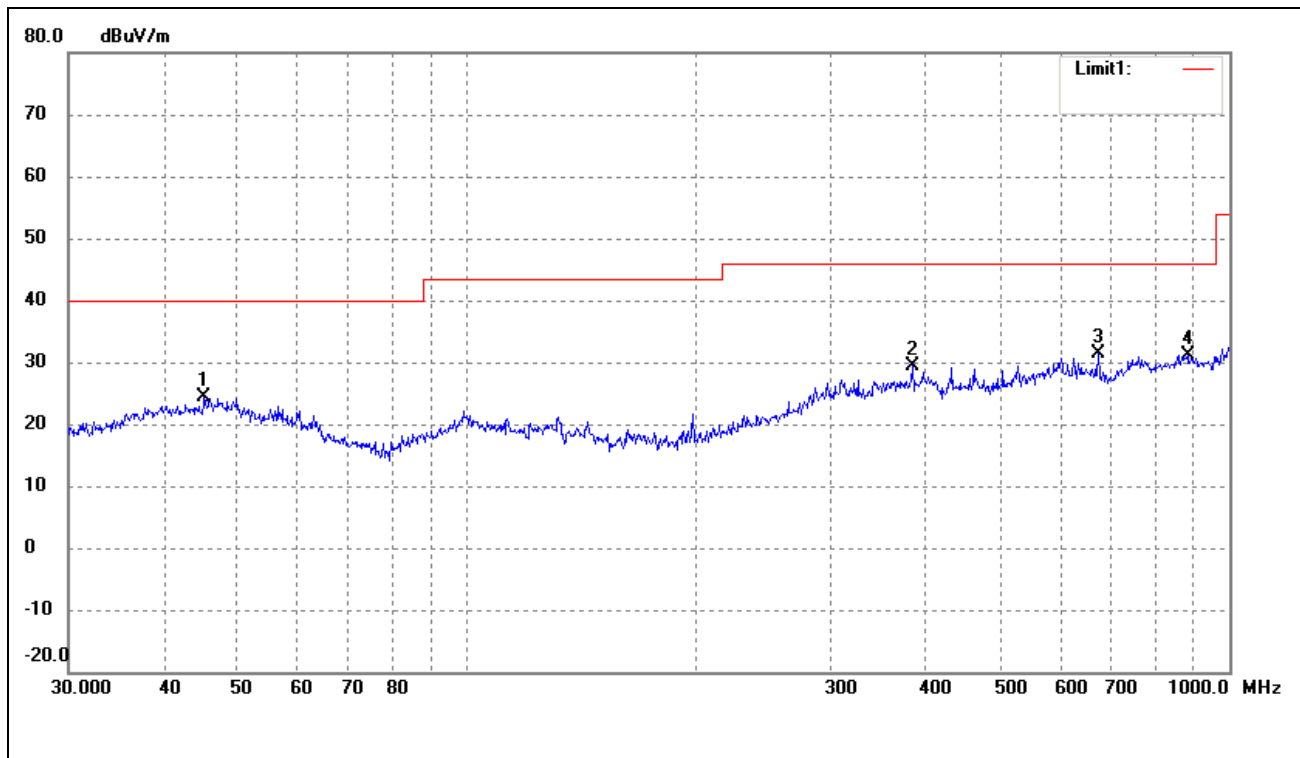


No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	47.8260	16.91	6.91	23.82	40.00	-16.18	42	100	peak
2	131.7574	21.00	3.07	24.07	43.50	-19.43	79	100	peak
3	568.6127	18.66	11.98	30.64	46.00	-15.36	176	100	peak
4	919.2866	16.36	16.50	32.86	46.00	-13.14	255	100	peak

For 802.11n-HT40

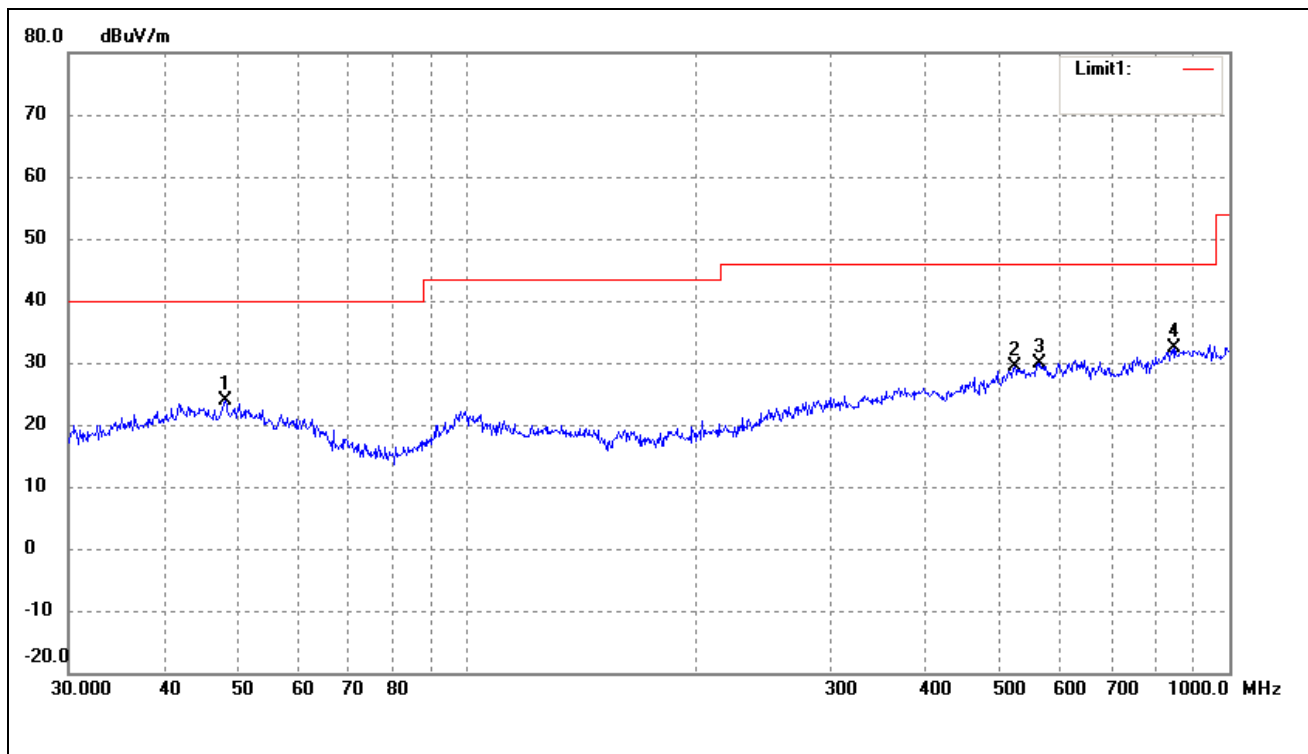
Test mode: Transmitting Channel 5190MHz

Horizontal



No.	Frequency (MHz)	Reading (dBuV/m)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	45.2165	17.53	6.74	24.27	40.00	-15.73	54	100	peak
2	383.9318	20.07	9.38	29.45	46.00	-16.55	125	100	peak
3	672.8445	19.24	12.22	31.46	46.00	-14.54	167	100	peak
4	881.4067	14.27	16.82	31.09	46.00	-14.91	241	100	peak

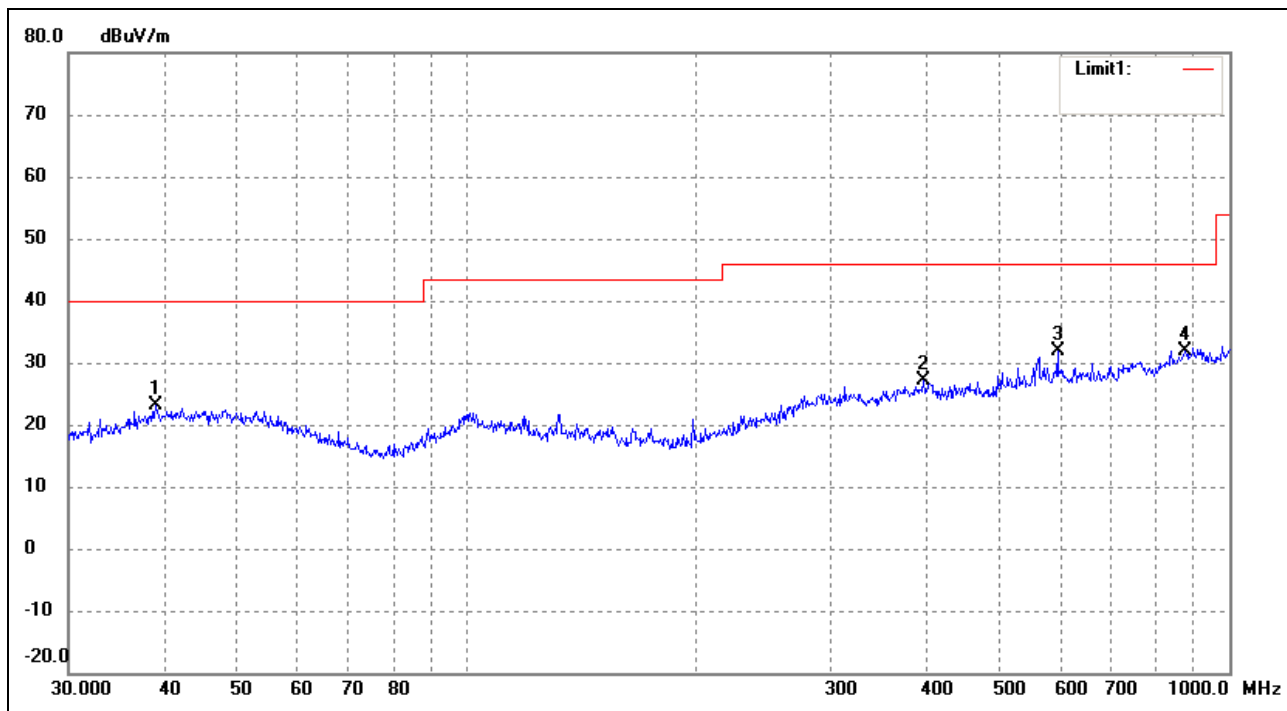
Test Specification: Vertical



No.	Frequency (MHz)	Reading (dBuV/m)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	48.1625	16.97	6.81	23.78	40.00	-16.22	37	100	peak
2	522.7178	18.12	11.37	29.49	46.00	-16.51	204	100	peak
3	564.6389	18.12	11.77	29.89	46.00	-16.11	232	100	peak
4	848.0561	16.42	15.86	32.28	46.00	-13.72	268	100	peak

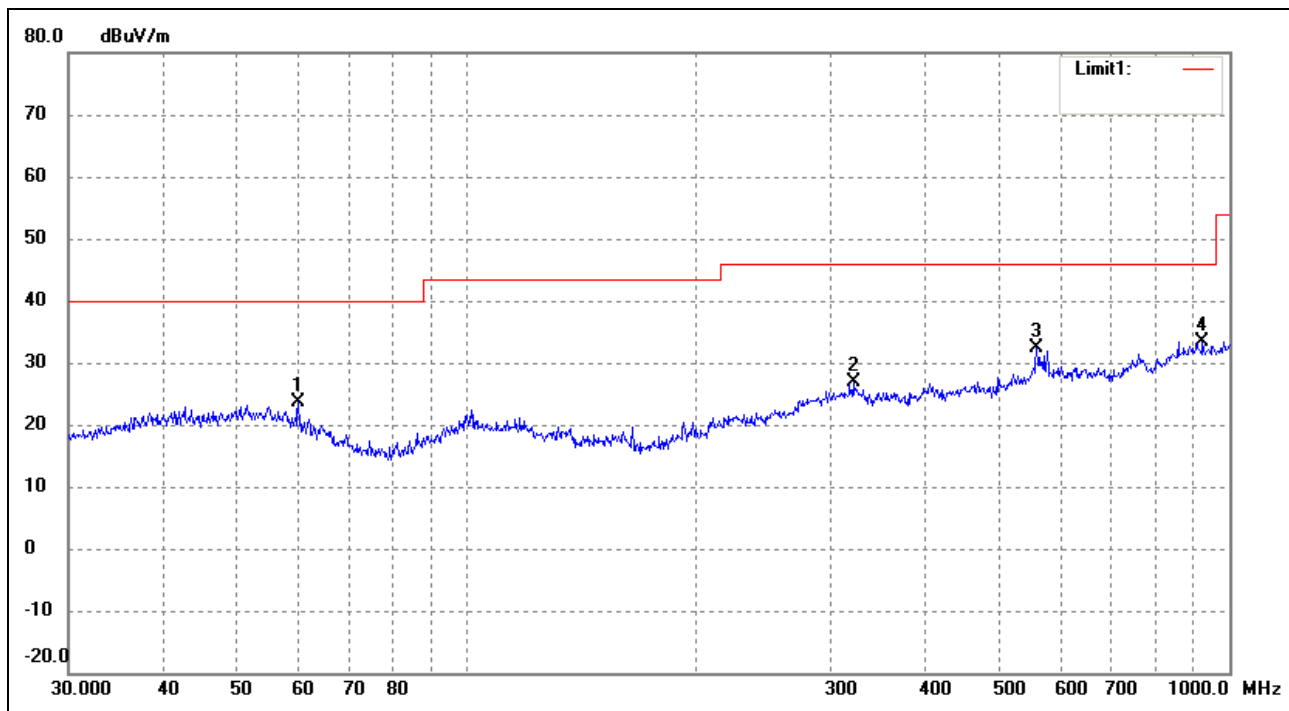
Test mode: Transmitting Channel 5230MHz

Horizontal



No.	Frequency (MHz)	Reading (dBuV/m)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	39.0245	14.03	9.08	23.11	40.00	-16.89	29	100	peak
2	396.2413	17.29	9.95	27.24	46.00	-18.76	135	100	peak
3	595.1326	18.85	13.14	31.99	46.00	-14.01	174	100	peak
4	875.2468	15.18	16.70	31.88	46.00	-14.12	218	100	peak

Test Specification: Vertical

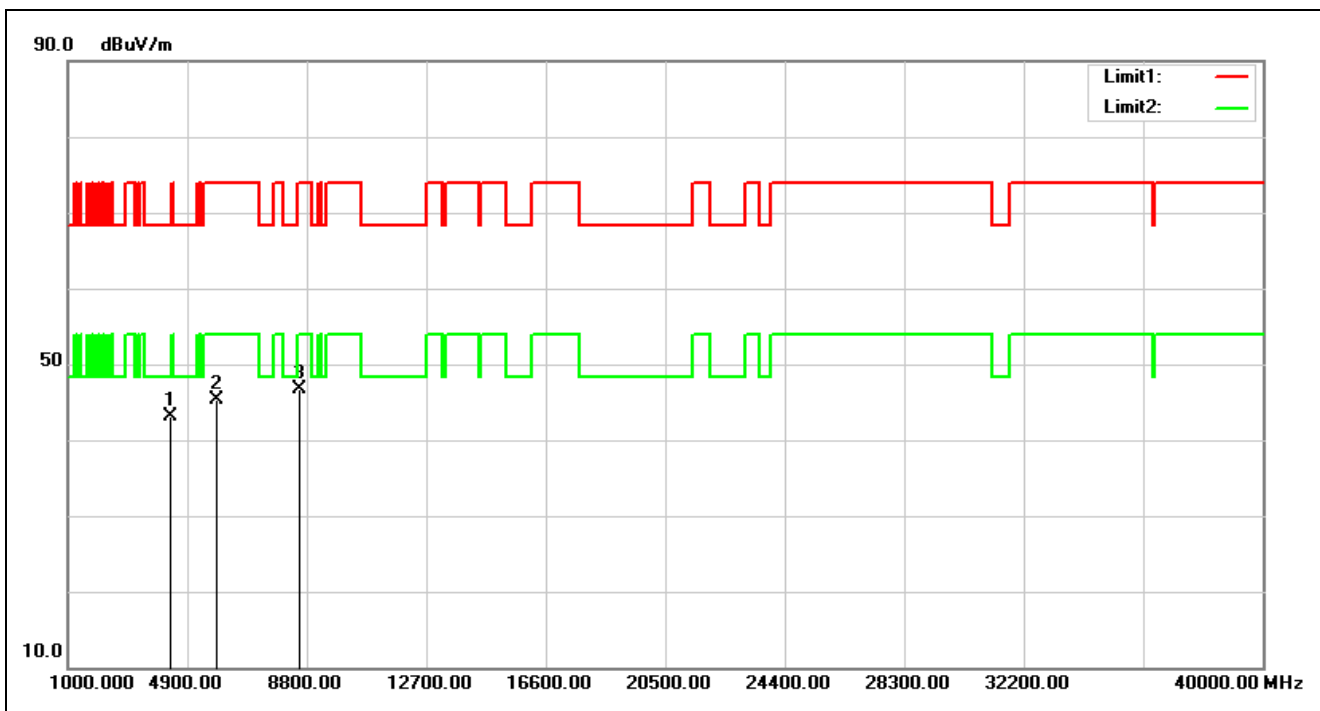


No.	Frequency (MHz)	Reading (dBuV/m)	Correct (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	60.0690	18.15	5.36	23.51	40.00	-16.49	54	100	peak
2	321.0606	17.67	9.26	26.93	46.00	-19.07	165	100	peak
3	558.7300	20.75	11.52	32.27	46.00	-13.73	194	100	peak
4	922.5157	16.89	16.44	33.33	46.00	-12.67	237	100	peak

Above 1GHz

Worst case

Standard:	FCC(1G-40G)-PEAK	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 110V/60Hz
Model Number:	WT31M2311A	Temp.( )/Hum.(%RH):	( )/%RH
Mode:	11a-5180-H		
Ant.Polar.:	Horizontal		
Description:	11a-5180-H		

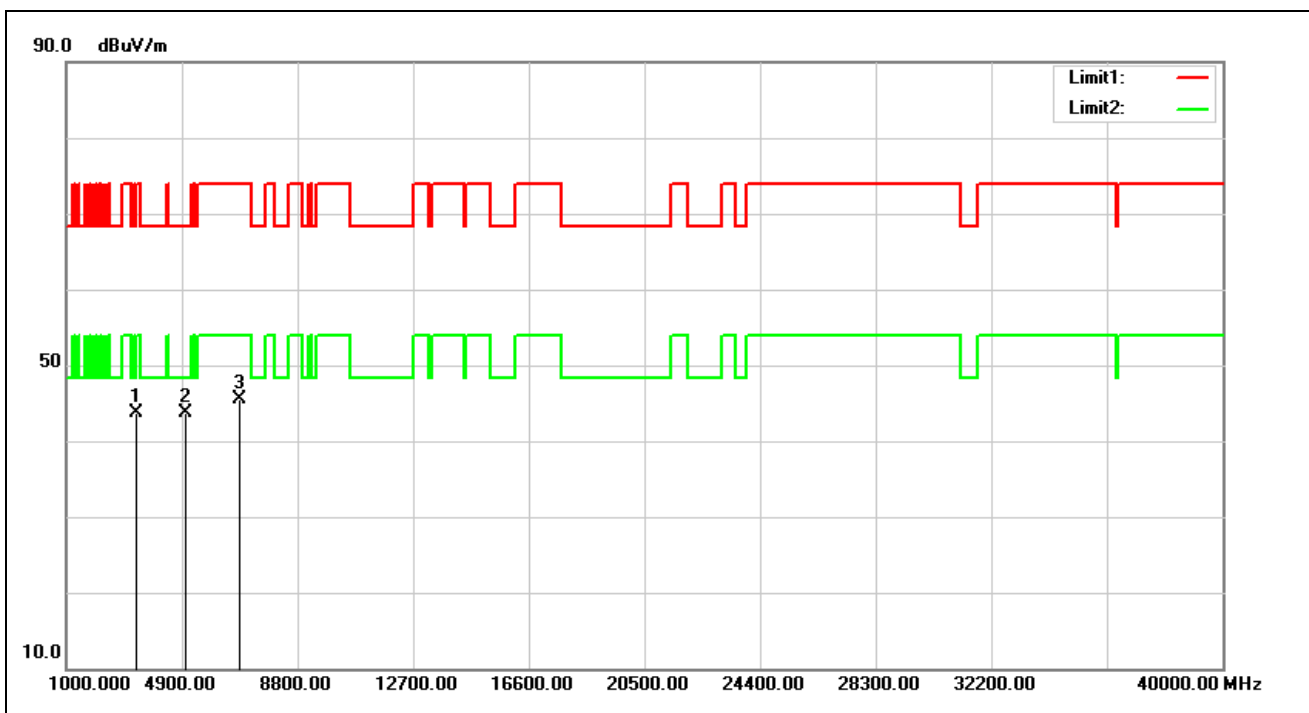


No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Height (cm)	Degree ( )	Remark
1	4354.000	51.24	-8.22	43.02	68.20	-25.18			peak
2	5836.000	51.91	-6.69	45.22	74.00	-28.78			peak
3	8566.000	48.52	-1.79	46.73	74.00	-27.27			peak

Note:1. Result (dBuV) = Correction factor (dB) + Reading(dBuV).

2. Correction factor (dB/m) = Antenna Factor (dB/m) + Cable loss (dB) Pre-Amplifier gain (dB).

Standard:	FCC(1G-40G)-PEAK	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 110V/60Hz
Model Number:	WT31M2311A	Temp.( )/Hum.(%RH):	( )/%RH
Mode:	11a-5180-V		
Ant.Polar.:	Vertical		
Description:	11a-5180-V		



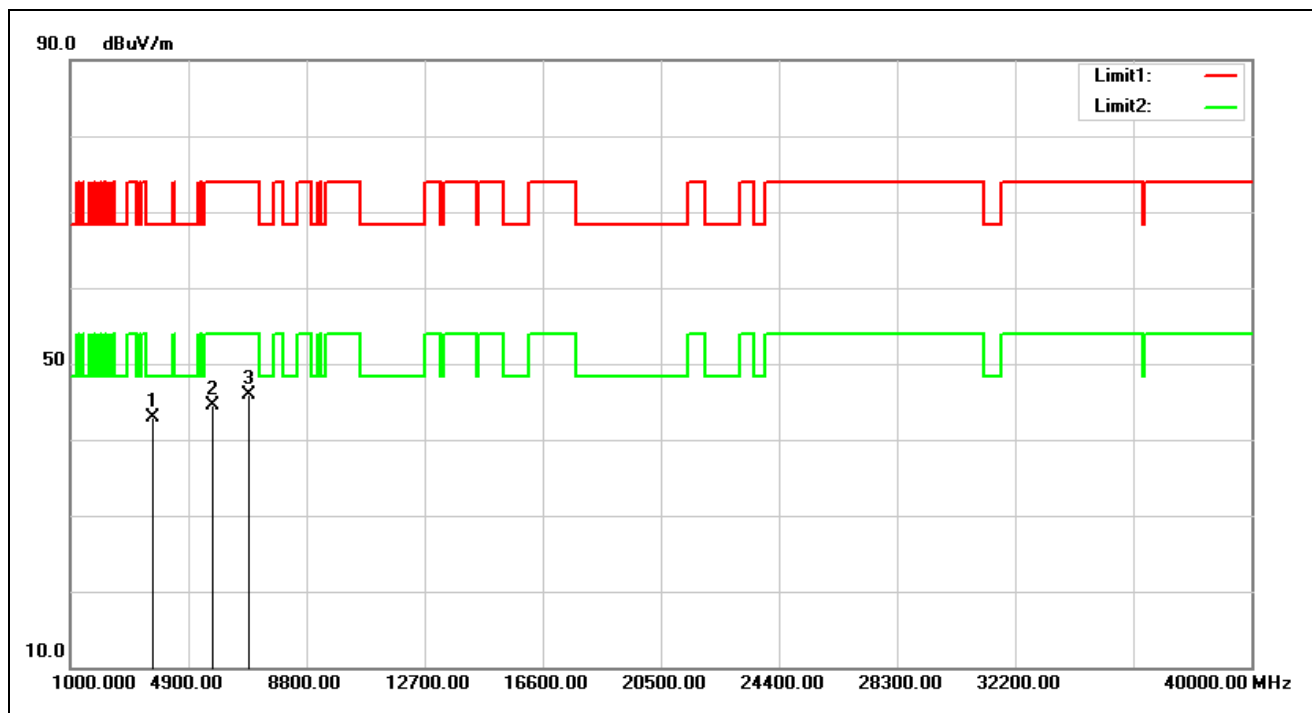
No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Height (cm)	Degree ( )	Remark
1	3379.000	53.55	-9.92	43.63	74.00	-30.37			peak
2	5017.000	51.33	-7.57	43.76	68.20	-24.44			peak
3	6850.000	50.01	-4.47	45.54	74.00	-28.46			peak

Note:1. Result (dBuV) = Correction factor (dB) + Reading(dBuV).

2. Correction factor (dB/m) = Antenna Factor (dB/m) + Cable loss (dB) Pre-Amplifier gain (dB).



Standard:	FCC(1G-40G)-PEAK	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 110V/60Hz
Model Number:	WT31M2311A	Temp.( )/Hum.(%RH):	( )/%RH
Mode:		Date:	2017/1/3
Ant.Polar.:	Horizontal	Test By:	
Description:	11n20-5240-H		

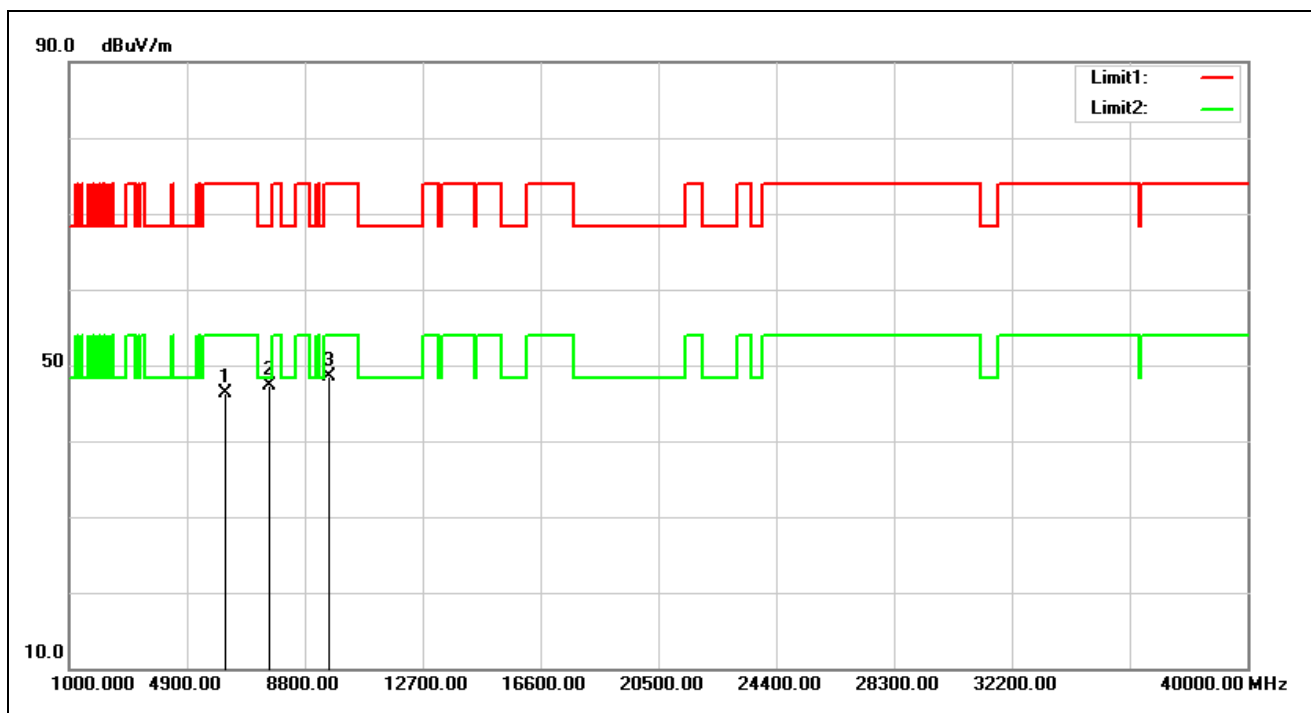


No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Height (cm)	Degree ( )	Remark
1	3730.000	51.88	-9.07	42.81	68.20	-25.39			peak
2	5719.000	51.35	-6.83	44.52	74.00	-29.48			peak
3	6889.000	50.28	-4.43	45.85	74.00	-28.15			peak

Note:1. Result (dBuV) = Correction factor (dB) + Reading(dBuV).

2. Correction factor (dB/m) = Antenna Factor (dB/m) + Cable loss (dB) Pre-Amplifier gain (dB).

Standard:	FCC(1G-40G)-PEAK	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 110V/60Hz
Model Number:	WT31M2311A	Temp.( )/Hum.(%RH):	( )/%RH
Mode:	11n20-5240-V		
Ant.Polar.:	Vertical		
Description:	11n20-5240-V		

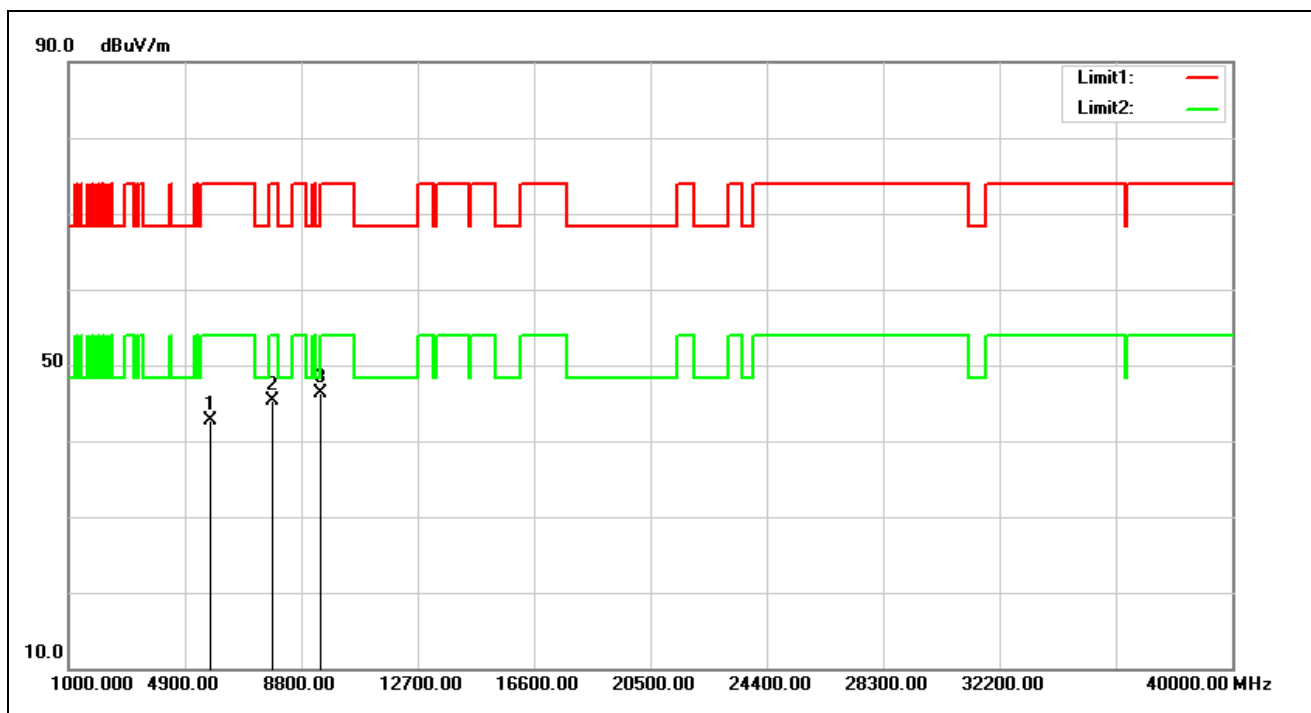


No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Height (cm)	Degree ( )	Remark
1	6148.000	52.24	-5.86	46.38	74.00	-27.62			peak
2	7630.000	50.66	-3.43	47.23	68.20	-20.97			peak
3	9619.000	47.66	0.82	48.48	74.00	-25.52			peak

Note:1. Result (dBuV) = Correction factor (dB) + Reading(dBuV).

2. Correction factor (dB/m) = Antenna Factor (dB/m) + Cable loss (dB) Pre-Amplifier gain (dB).

Standard:	FCC(1G-40G)-PEAK	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 110V/60Hz
Model Number:	WT31M2311A	Temp.( )/Hum.(%RH):	( )/%RH
Mode:	11n40-5230-H		
Ant.Polar.:	Horizontal		
Description:	11n40-5230-H		

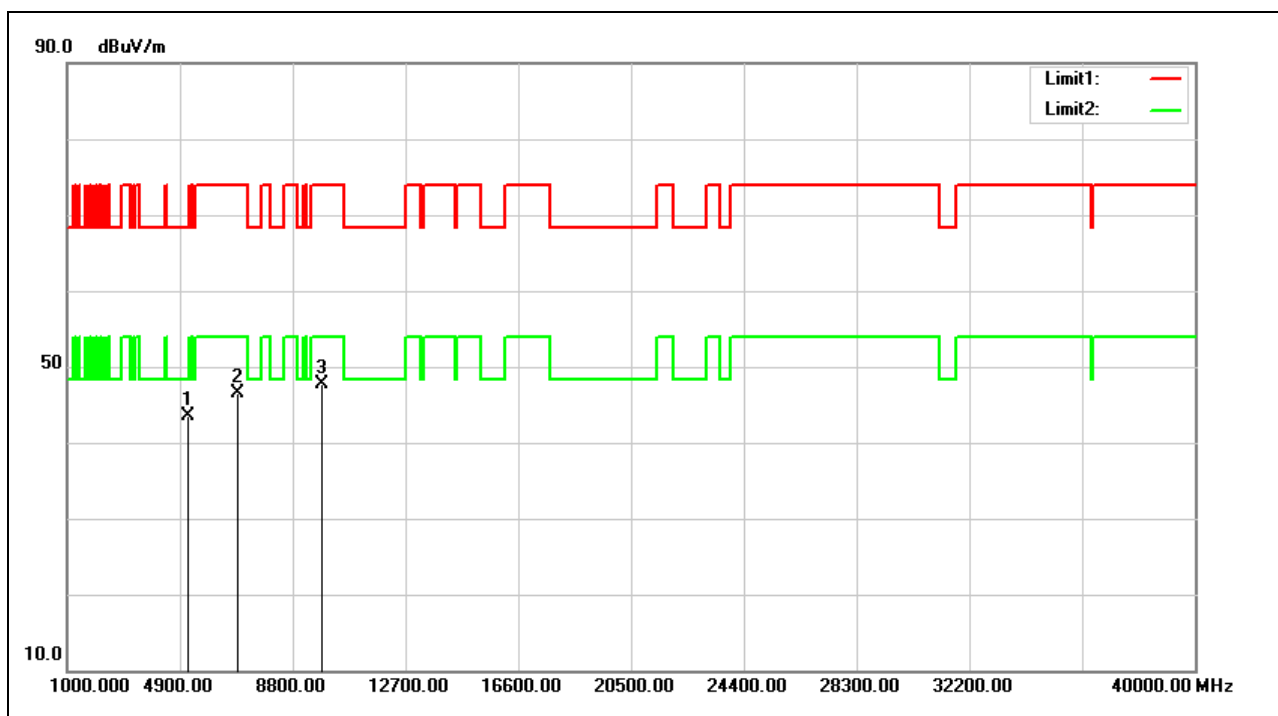


No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Height (cm)	Degree ( )	Remark
1	5758.000	49.65	-6.88	42.77	74.00	-31.23			peak
2	7825.000	48.38	-3.15	45.23	74.00	-28.77			peak
3	9463.000	46.24	0.00	46.24	68.20	-21.96			peak

Note:1. Result (dBuV) = Correction factor (dB) + Reading(dBuV).

2. Correction factor (dB/m) = Antenna Factor (dB/m) + Cable loss (dB) Pre-Amplifier gain (dB).

Standard:	FCC(1G-40G)-PEAK	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 110V/60Hz
Model Number:	PRM-X6PRO-01	Temp.( )/Hum.(%RH):	( )/%RH
Mode:	11n40-5230-V		
Ant.Polar.:	Vertical		
Description:	11n40-5230-V		



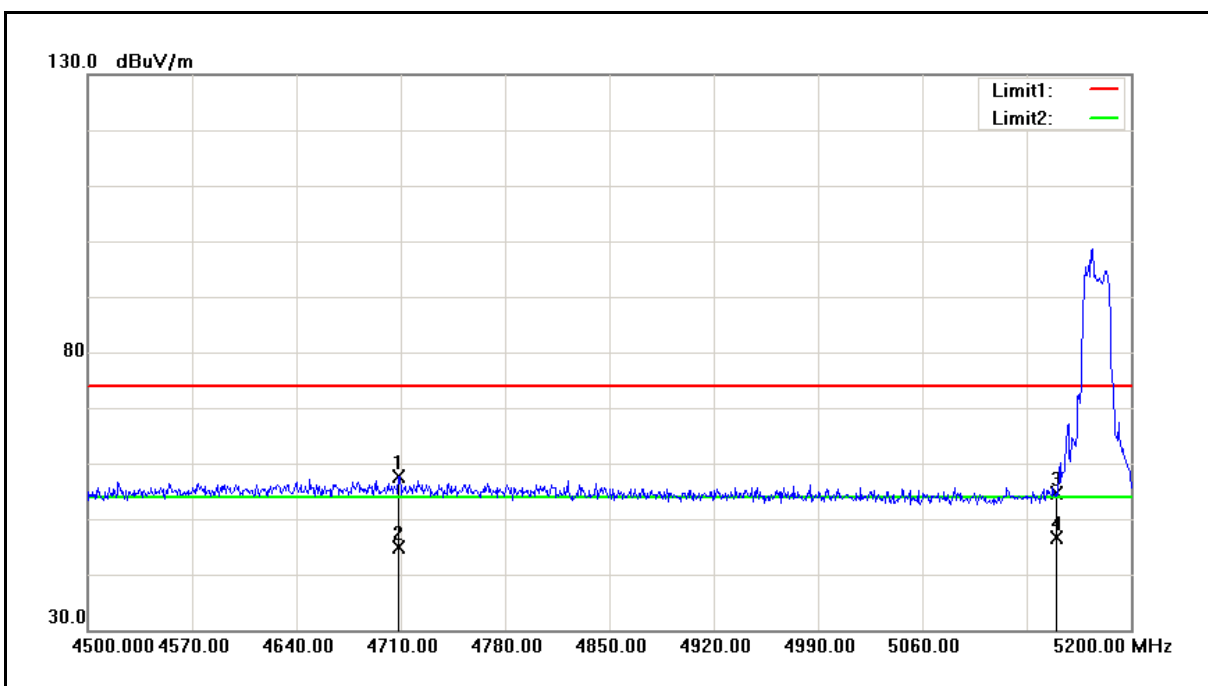
No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Height (cm)	Degree ( )	Remark
1	5173.000	51.12	-7.55	43.57	68.20	-24.63			peak
2	6889.000	50.89	-4.43	46.46	74.00	-27.54			peak
3	9814.000	46.88	0.86	47.74	74.00	-26.26			peak

Note:1. Result (dBuV) = Correction factor (dB) + Reading(dBuV).

2. Correction factor (dB/m) = Antenna Factor (dB/m) + Cable loss (dB) Pre-Amplifier gain (dB).

**Band Edge**

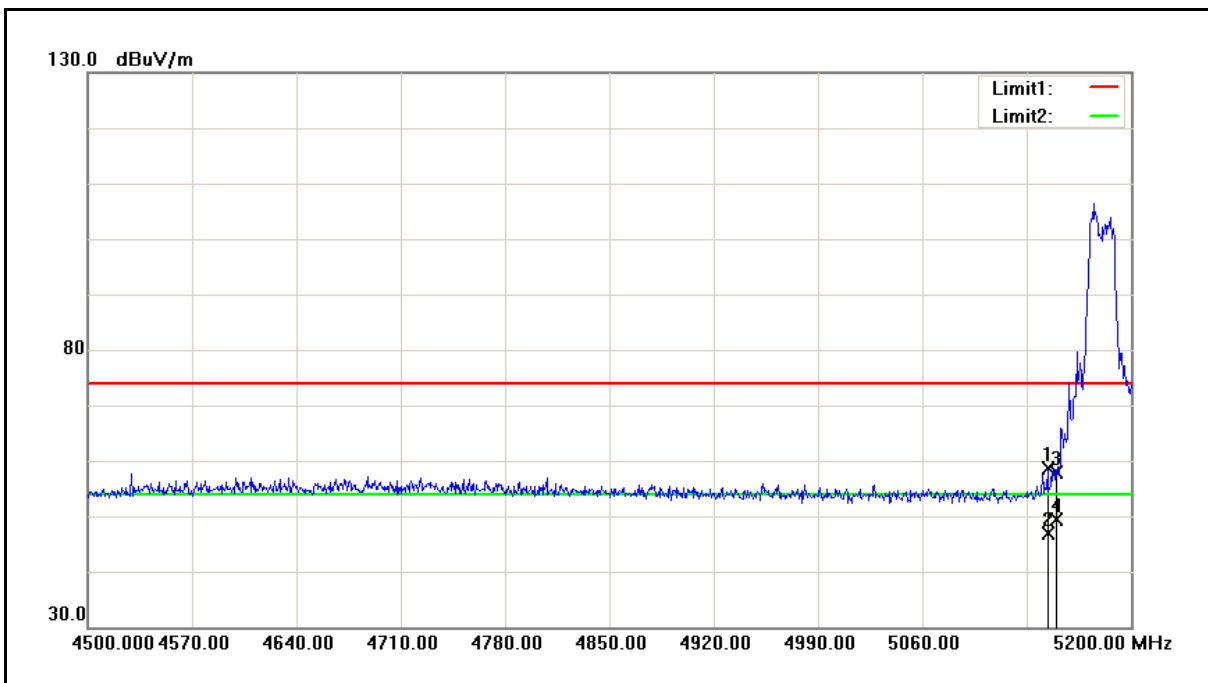
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11a Link Mode	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5180 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	4708.600	50.76	6.99	57.75	74.00	-16.25	peak
2	4708.600	37.95	6.99	44.94	54.00	-9.06	AVG
3	5150.000	46.45	8.16	54.61	74.00	-19.39	peak
4	5150.000	38.59	8.16	46.75	54.00	-7.25	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

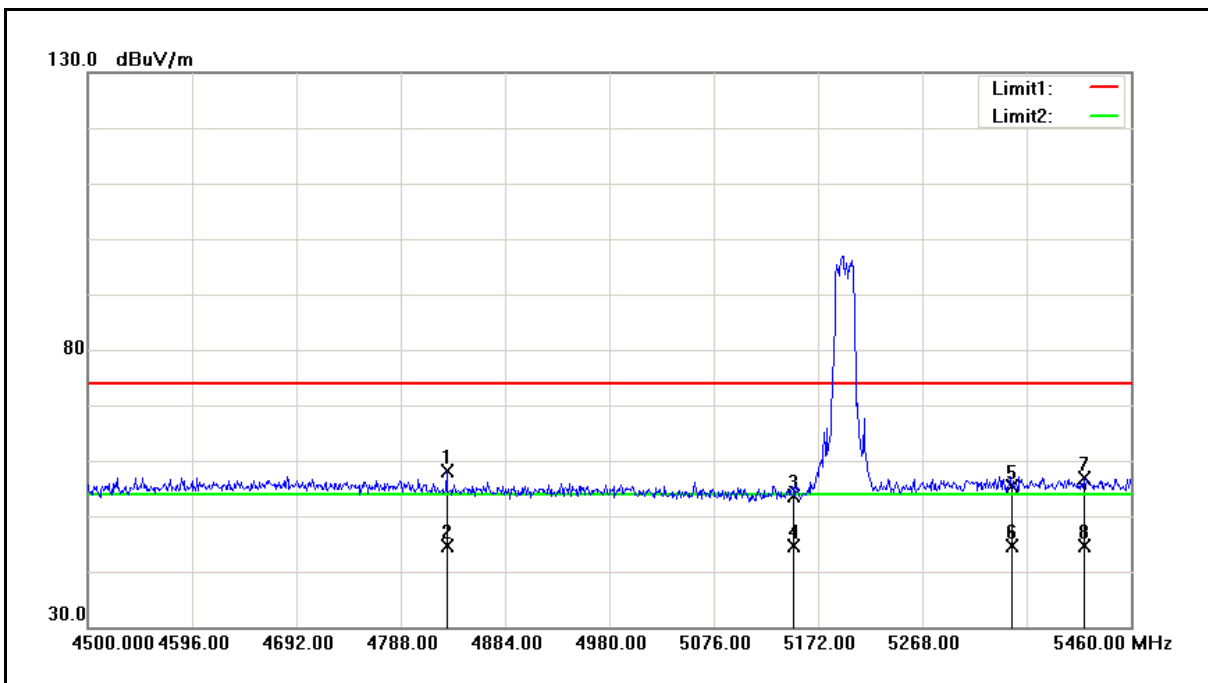
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11a Link Mode	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5180 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5144.000	50.42	8.15	58.57	74.00	-15.43	peak
2	5144.000	38.80	8.15	46.95	54.00	-7.05	AVG
3	5150.000	49.65	8.16	57.81	74.00	-16.19	peak
4	5150.000	41.16	8.16	49.32	54.00	-4.68	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

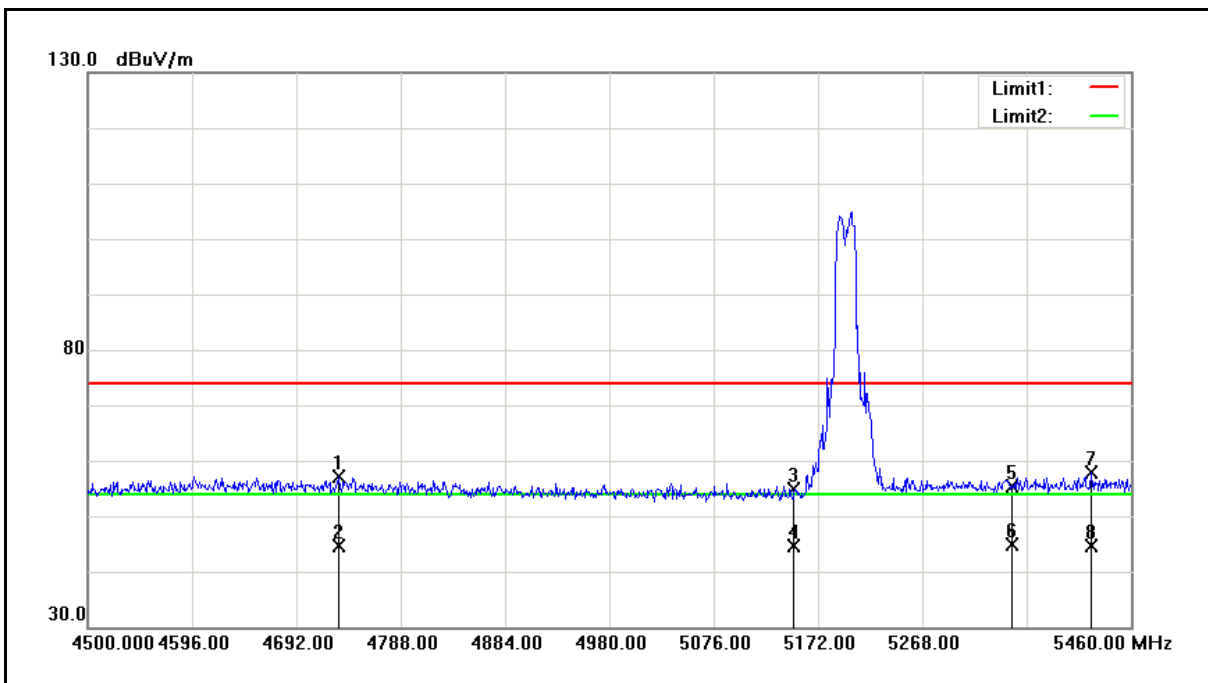
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11a Link Mode	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5200 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	4830.240	50.64	7.43	58.07	74.00	-15.93	peak
2	4830.240	37.25	7.43	44.68	54.00	-9.32	AVG
3	5150.000	45.58	8.16	53.74	74.00	-20.26	peak
4	5150.000	36.58	8.16	44.74	54.00	-9.26	AVG
5	5350.000	46.93	8.33	55.26	74.00	-18.74	peak
6	5350.000	36.26	8.33	44.59	54.00	-9.41	AVG
7	5416.800	48.48	8.39	56.87	74.00	-17.13	peak
8	5416.800	36.27	8.39	44.66	54.00	-9.34	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11a Link Mode	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5200 MHz		
Ant.Polar.:	Vertical		

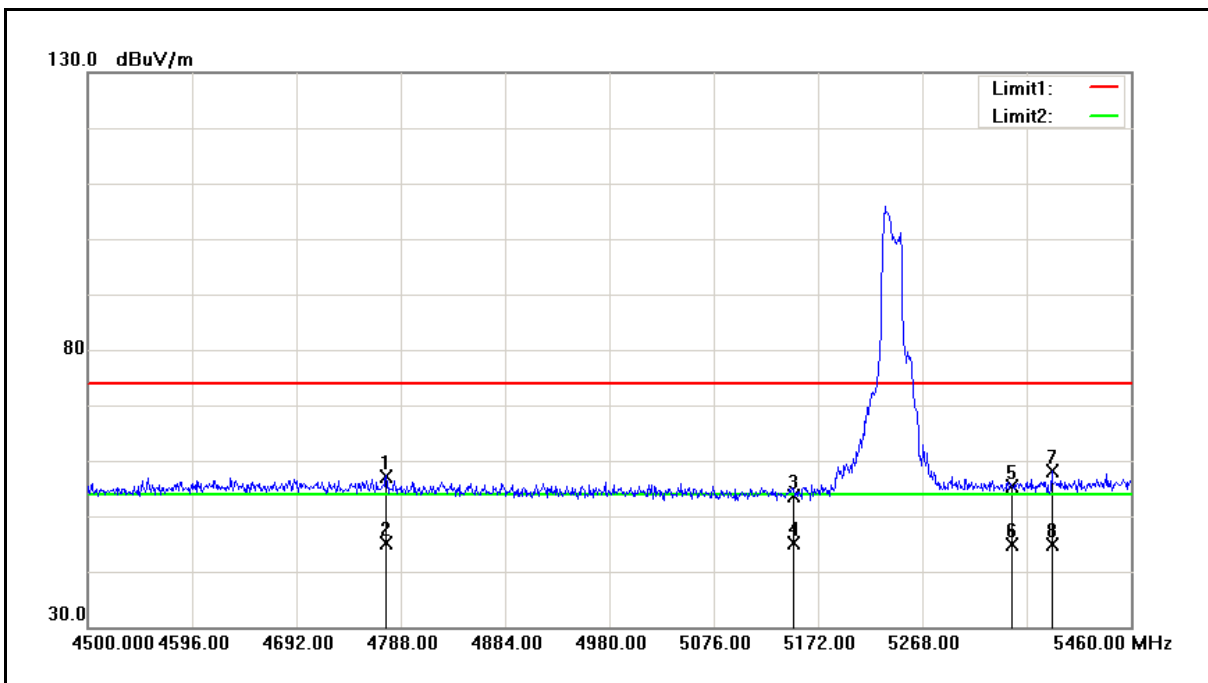


No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	4730.400	50.08	7.08	57.16	74.00	-16.84	peak
2	4730.400	37.45	7.08	44.53	54.00	-9.47	AVG
3	5150.000	46.79	8.16	54.95	74.00	-19.05	peak
4	5150.000	36.53	8.16	44.69	54.00	-9.31	AVG
5	5350.000	47.16	8.33	55.49	74.00	-18.51	peak
6	5350.000	36.44	8.33	44.77	54.00	-9.23	AVG
7	5423.520	49.59	8.40	57.99	74.00	-16.01	peak
8	5423.520	36.29	8.40	44.69	54.00	-9.31	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.



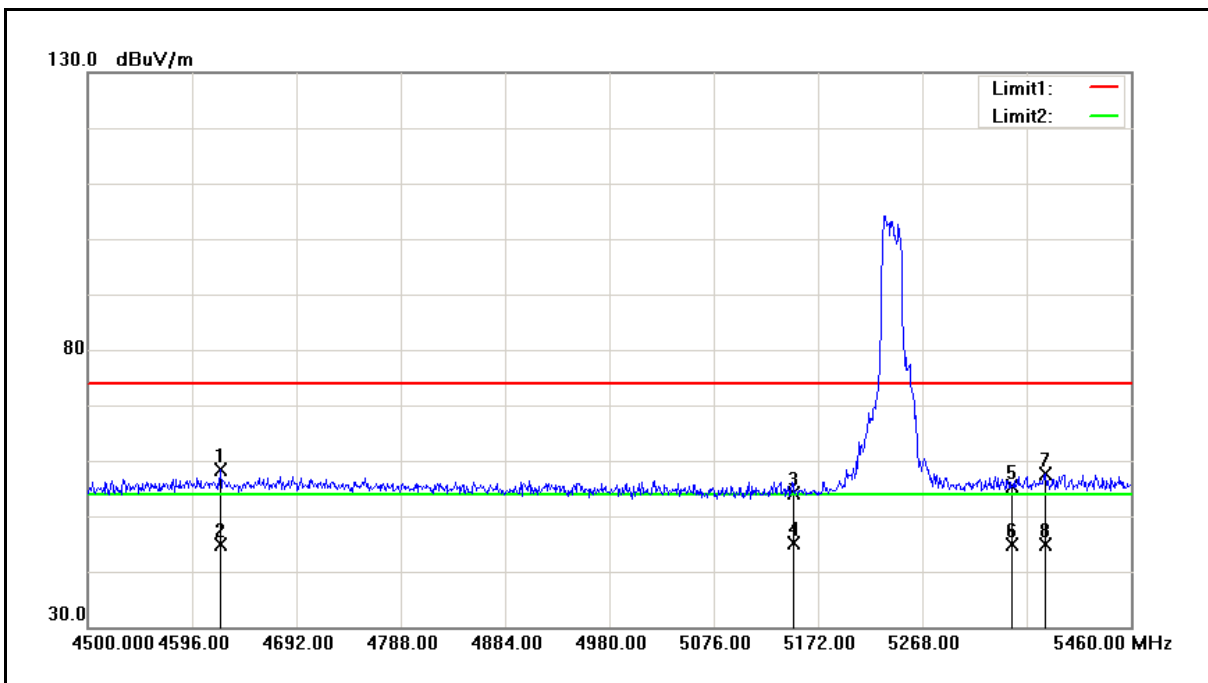
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	Mode 2	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5240 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	4774.560	50.02	7.23	57.25	74.00	-16.75	peak
2	4774.560	37.88	7.23	45.11	54.00	-8.89	AVG
3	5150.000	45.55	8.16	53.71	74.00	-20.29	peak
4	5150.000	36.86	8.16	45.02	54.00	-8.98	AVG
5	5350.000	47.04	8.33	55.37	74.00	-18.63	peak
6	5350.000	36.63	8.33	44.96	54.00	-9.04	AVG
7	5387.040	49.79	8.36	58.15	74.00	-15.85	peak
8	5387.040	36.55	8.36	44.91	54.00	-9.09	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

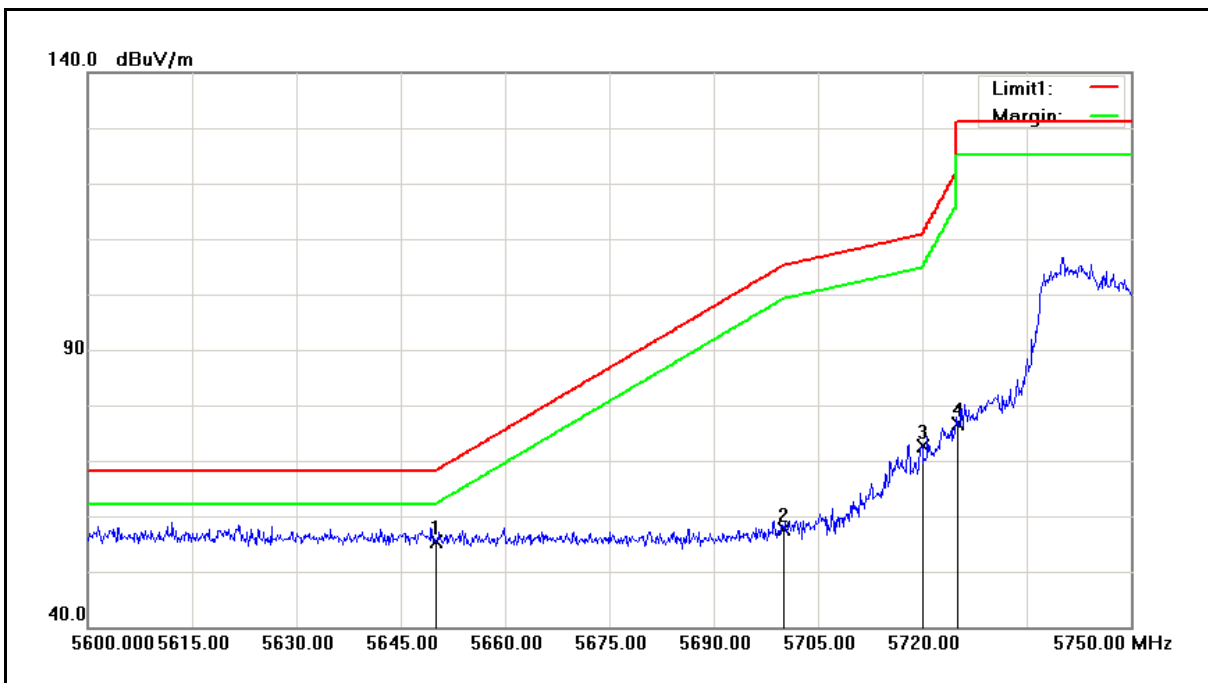
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11a Link Mode	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5240 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	4621.920	51.74	6.70	58.44	74.00	-15.56	peak
2	4621.920	38.16	6.70	44.86	54.00	-9.14	AVG
3	5150.000	45.90	8.16	54.06	74.00	-19.94	peak
4	5150.000	36.88	8.16	45.04	54.00	-8.96	AVG
5	5350.000	46.93	8.33	55.26	74.00	-18.74	peak
6	5350.000	36.43	8.33	44.76	54.00	-9.24	AVG
7	5381.280	49.17	8.36	57.53	74.00	-16.47	peak
8	5381.280	36.44	8.36	44.80	54.00	-9.20	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

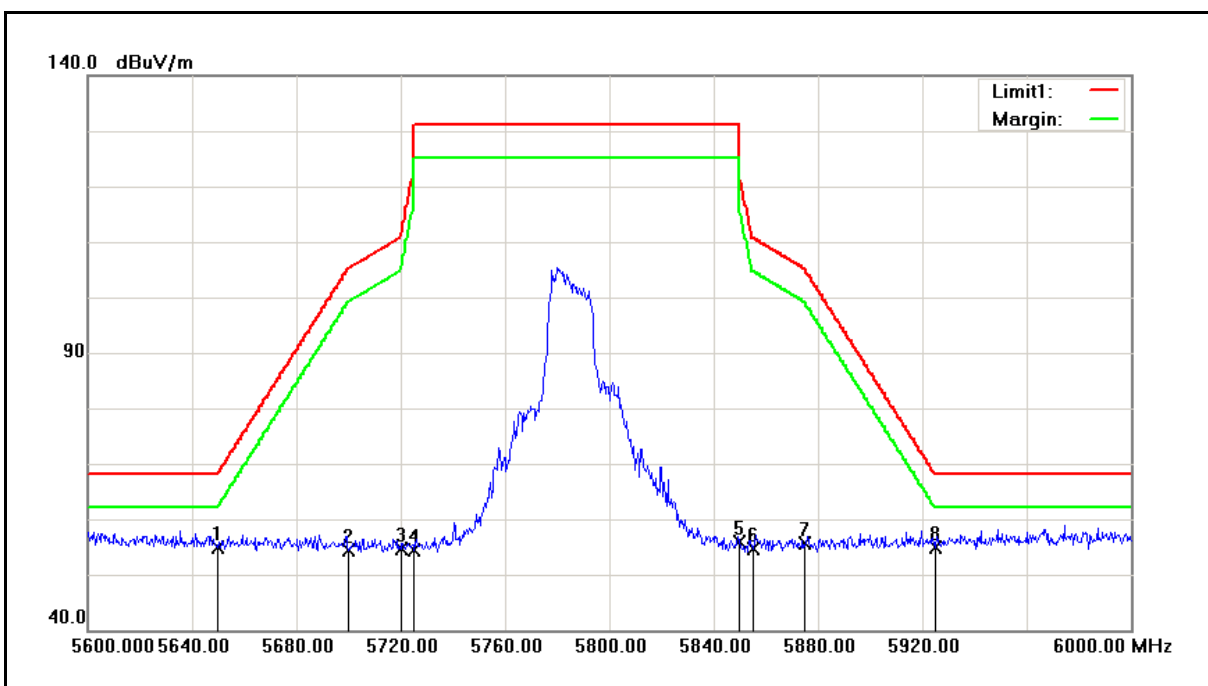
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11a Link Mode	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5745 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5650.000	46.55	8.84	55.39	68.20	-12.81	peak
2	5700.000	48.58	8.97	57.55	105.20	-47.65	peak
3	5720.000	63.72	9.01	72.73	110.80	-38.07	peak
4	5725.000	67.66	9.03	76.69	122.20	-45.51	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

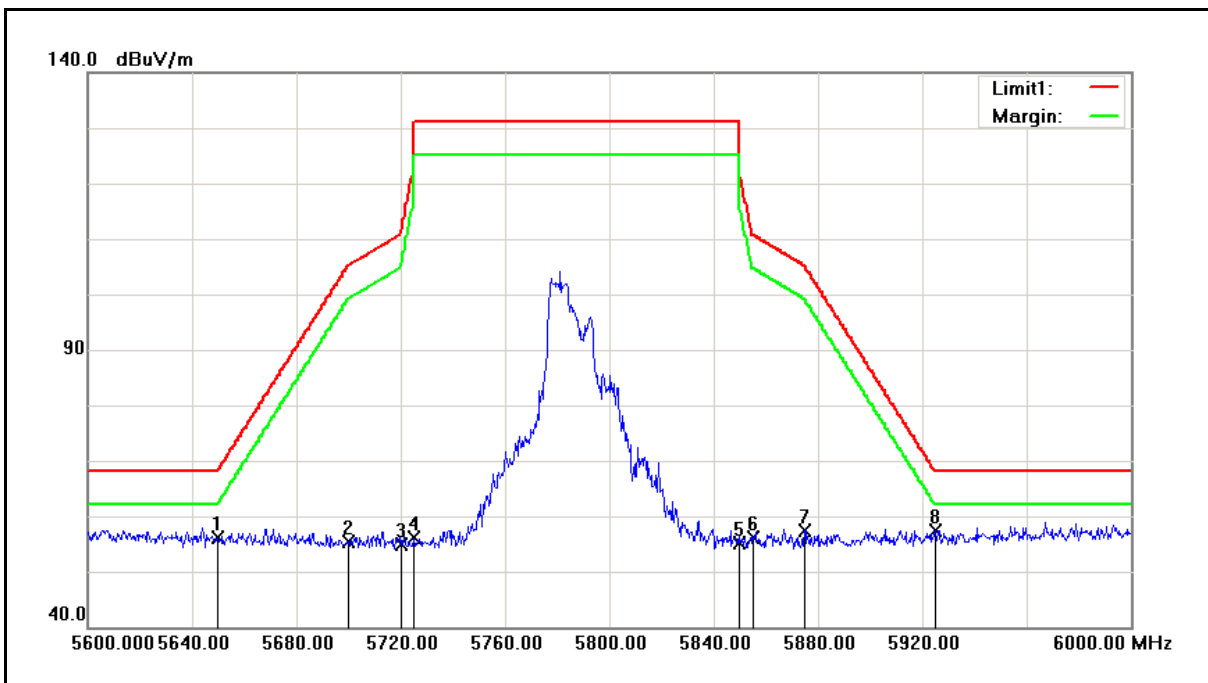
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11a Link Mode	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5785 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5650.000	46.09	8.84	54.93	68.20	-13.27	peak
2	5700.000	45.38	8.97	54.35	105.20	-50.85	peak
3	5720.000	45.60	9.01	54.61	110.80	-56.19	peak
4	5725.000	45.44	9.03	54.47	122.20	-67.73	peak
5	5850.000	46.57	9.33	55.90	122.20	-66.30	peak
6	5855.000	45.35	9.35	54.70	110.80	-56.10	peak
7	5875.000	46.20	9.40	55.60	105.20	-49.60	peak
8	5925.000	45.38	9.53	54.91	68.20	-13.29	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

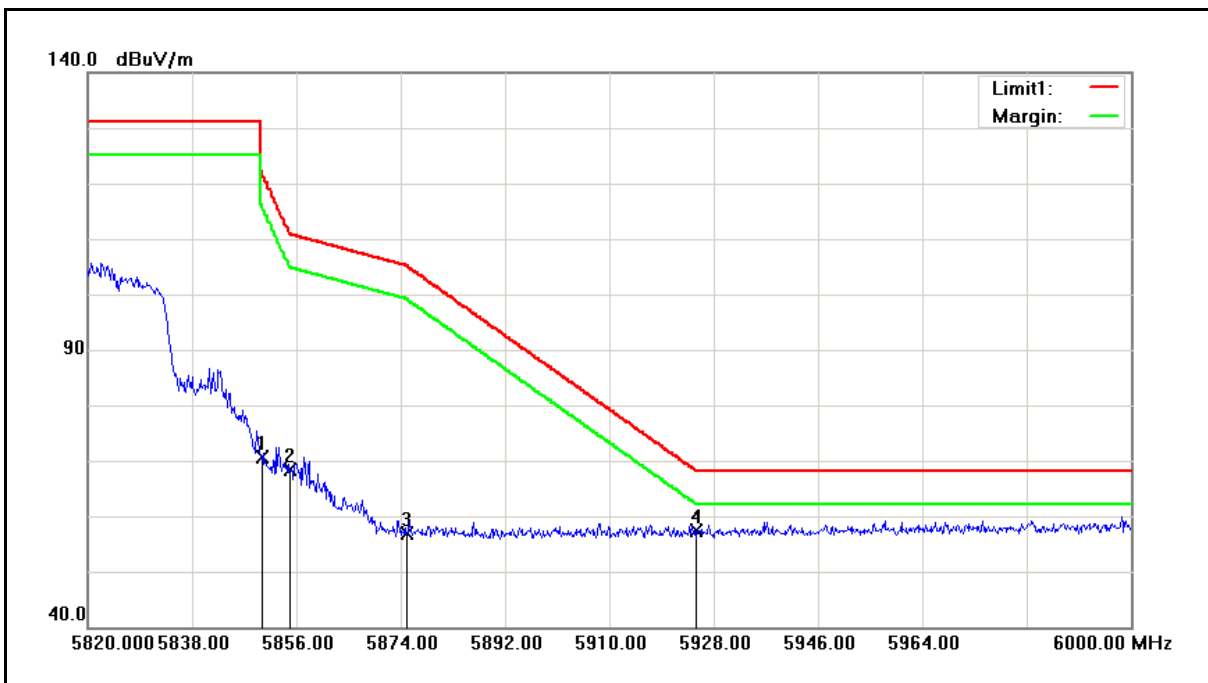
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11a Link Mode	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5785 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5650.000	47.27	8.84	56.11	68.20	-12.09	peak
2	5700.000	46.38	8.97	55.35	105.20	-49.85	peak
3	5720.000	45.89	9.01	54.90	110.80	-55.90	peak
4	5725.000	46.98	9.03	56.01	122.20	-66.19	peak
5	5850.000	45.78	9.33	55.11	122.20	-67.09	peak
6	5855.000	46.89	9.35	56.24	110.80	-54.56	peak
7	5875.000	47.87	9.40	57.27	105.20	-47.93	peak
8	5925.000	47.97	9.53	57.50	68.20	-10.70	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

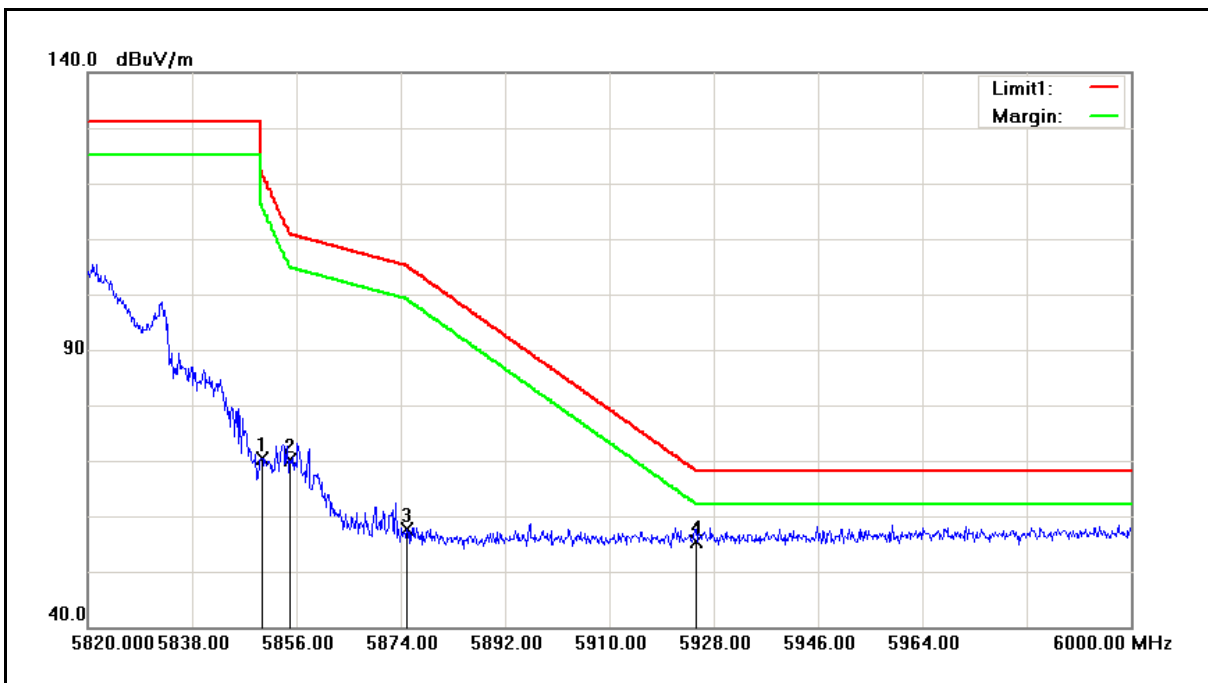
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11a Link Mode	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5825 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5850.000	61.35	9.33	70.68	122.20	-51.52	peak
2	5855.000	58.96	9.35	68.31	110.80	-42.49	peak
3	5875.000	47.43	9.40	56.83	105.20	-48.37	peak
4	5925.000	47.79	9.53	57.32	68.20	-10.88	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

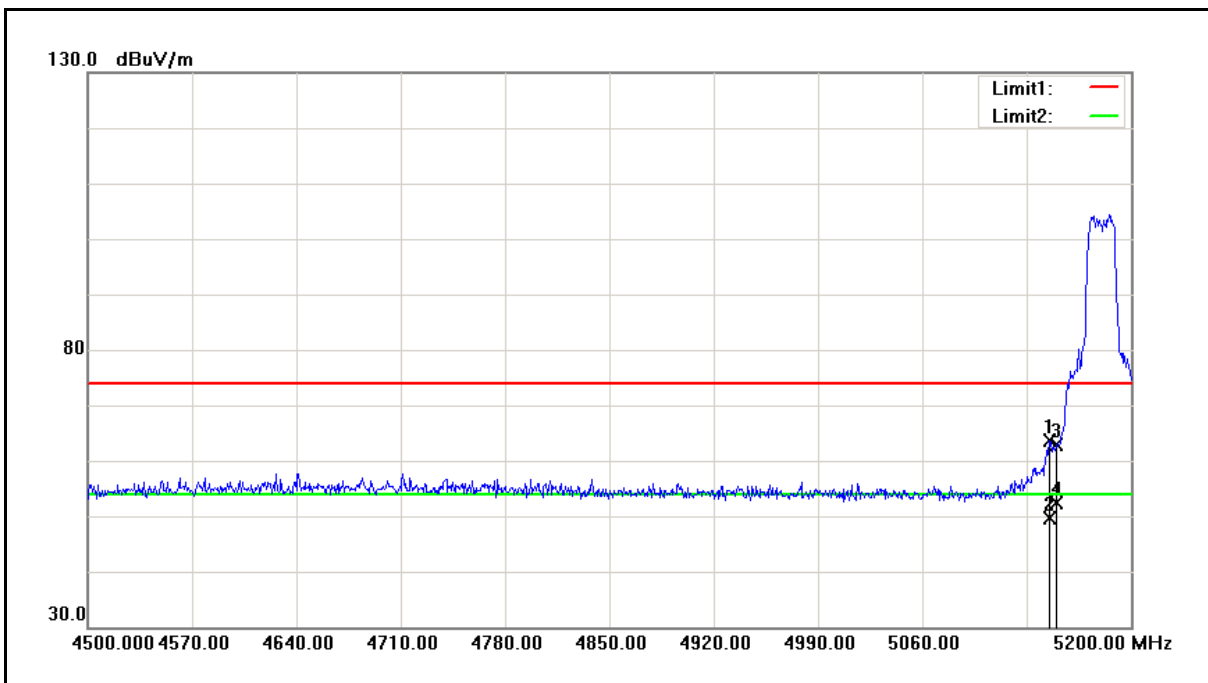
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11a Link Mode	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5825 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5850.000	61.05	9.33	70.38	122.20	-51.82	peak
2	5855.000	60.68	9.35	70.03	110.80	-40.77	peak
3	5875.000	48.19	9.40	57.59	105.20	-47.61	peak
4	5925.000	45.80	9.53	55.33	68.20	-12.87	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 20MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5180 MHz		
Ant.Polar.:	Horizontal		

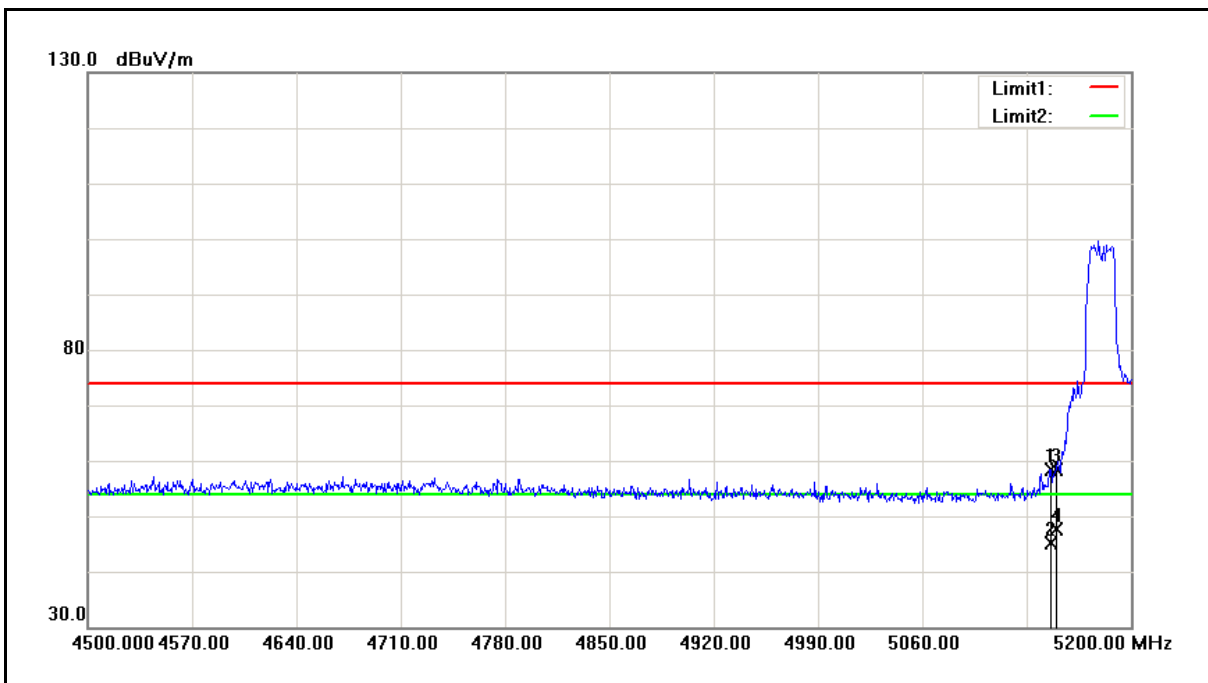


No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5145.400	55.40	8.15	63.55	74.00	-10.45	peak
2	5145.400	41.46	8.15	49.61	54.00	-4.39	AVG
3	5150.000	54.72	8.16	62.88	74.00	-11.12	peak
4	5150.000	44.21	8.16	52.37	54.00	-1.63	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.



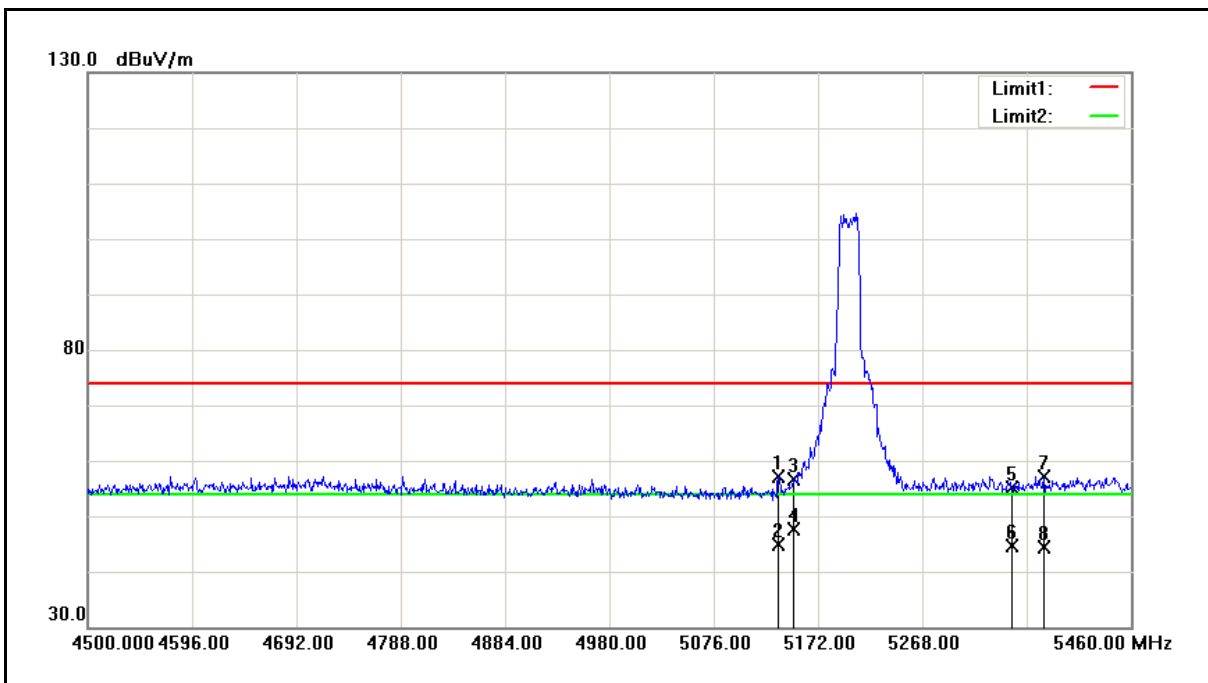
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 20MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5180 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5146.100	50.26	8.15	58.41	74.00	-15.59	peak
2	5146.100	37.07	8.15	45.22	54.00	-8.78	AVG
3	5150.000	50.24	8.16	58.40	74.00	-15.60	peak
4	5150.000	39.53	8.16	47.69	54.00	-6.31	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

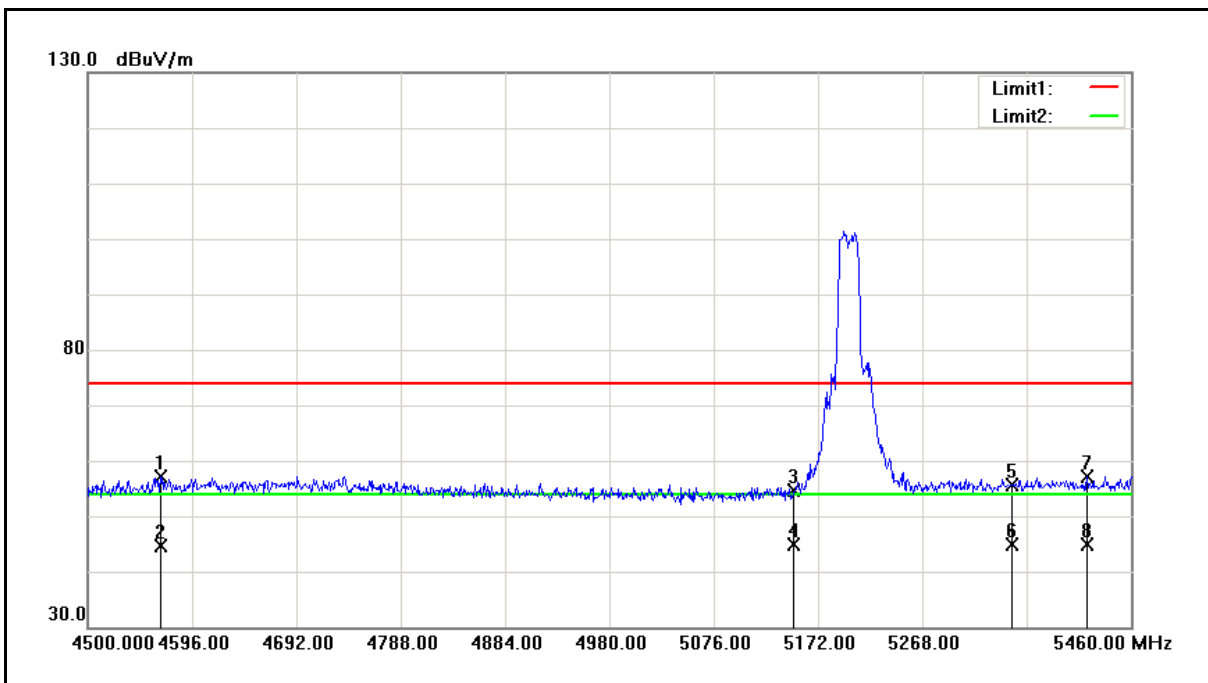
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 20MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5200 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5135.520	49.11	8.14	57.25	74.00	-16.75	peak
2	5135.520	36.62	8.14	44.76	54.00	-9.24	AVG
3	5150.000	48.36	8.16	56.52	74.00	-17.48	peak
4	5150.000	39.47	8.16	47.63	54.00	-6.37	AVG
5	5350.000	46.75	8.33	55.08	74.00	-18.92	peak
6	5350.000	36.35	8.33	44.68	54.00	-9.32	AVG
7	5379.360	48.86	8.36	57.22	74.00	-16.78	peak
8	5379.360	36.13	8.36	44.49	54.00	-9.51	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

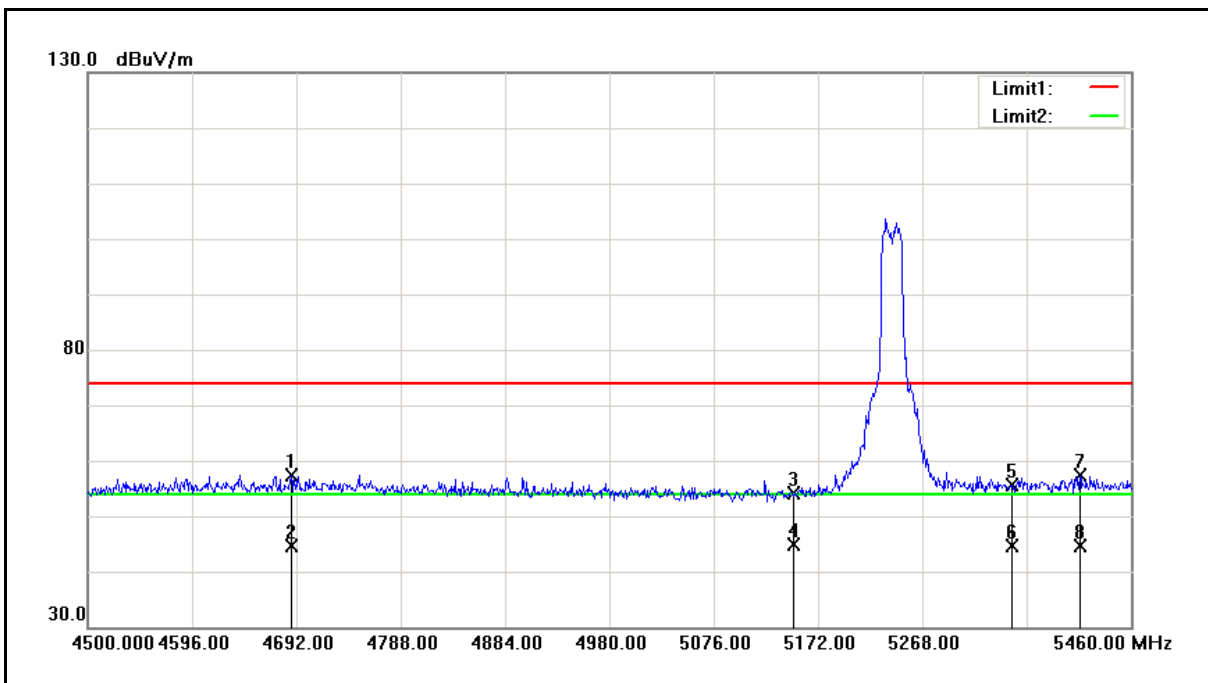
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 20MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5200 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	4567.200	50.72	6.51	57.23	74.00	-16.77	peak
2	4567.200	38.09	6.51	44.60	54.00	-9.40	AVG
3	5150.000	46.55	8.16	54.71	74.00	-19.29	peak
4	5150.000	36.75	8.16	44.91	54.00	-9.09	AVG
5	5350.000	47.41	8.33	55.74	74.00	-18.26	peak
6	5350.000	36.50	8.33	44.83	54.00	-9.17	AVG
7	5419.680	48.72	8.39	57.11	74.00	-16.89	peak
8	5419.680	36.40	8.39	44.79	54.00	-9.21	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

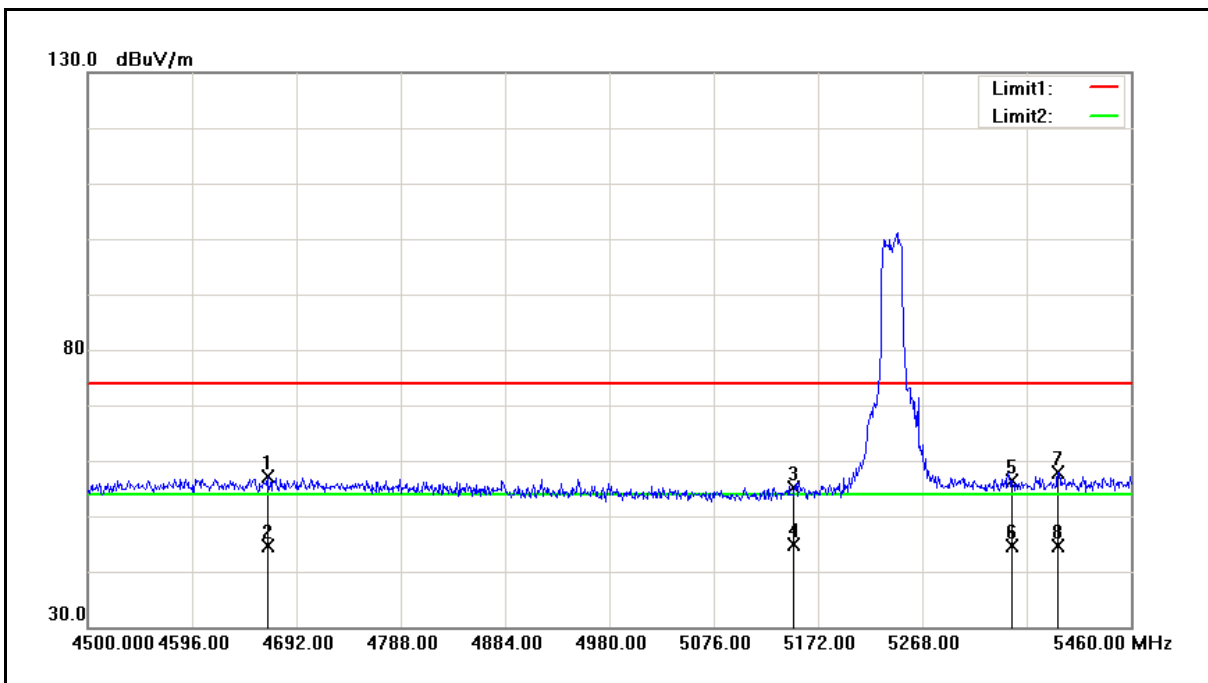
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 20MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5240 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	4687.200	50.57	6.92	57.49	74.00	-16.51	peak
2	4687.200	37.60	6.92	44.52	54.00	-9.48	AVG
3	5150.000	45.97	8.16	54.13	74.00	-19.87	peak
4	5150.000	36.60	8.16	44.76	54.00	-9.24	AVG
5	5350.000	47.41	8.33	55.74	74.00	-18.26	peak
6	5350.000	36.25	8.33	44.58	54.00	-9.42	AVG
7	5412.960	48.88	8.39	57.27	74.00	-16.73	peak
8	5412.960	36.25	8.39	44.64	54.00	-9.36	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

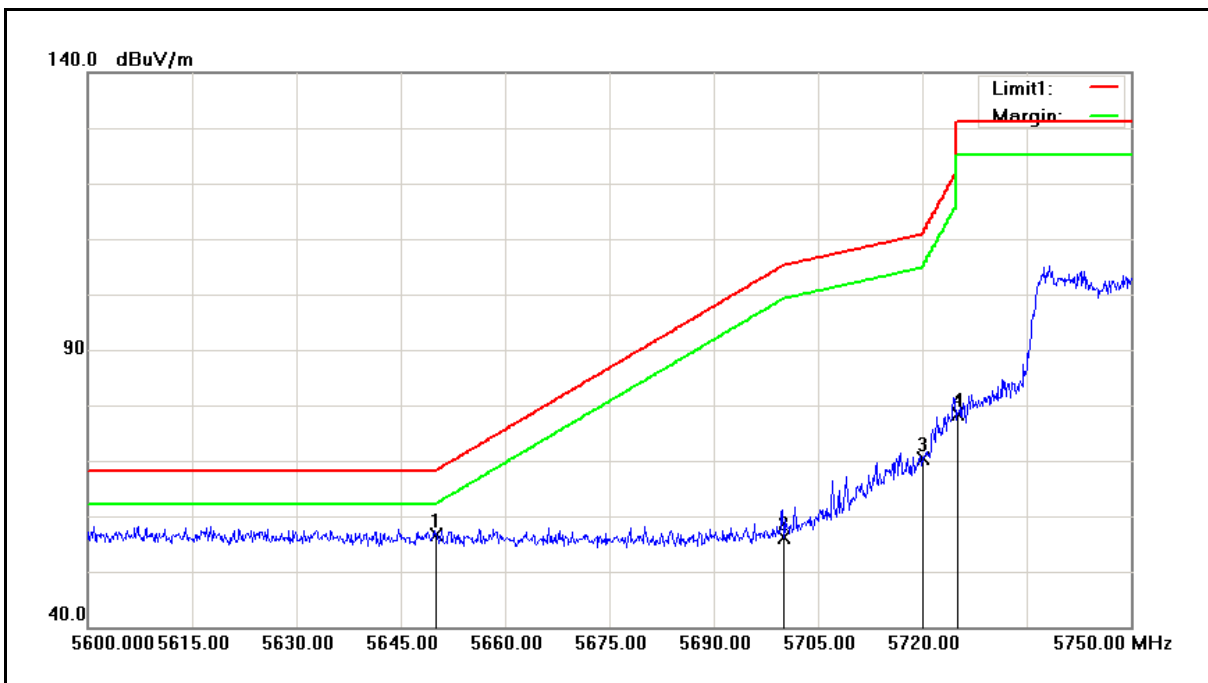
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 20MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5240 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	4665.120	50.38	6.84	57.22	74.00	-16.78	peak
2	4665.120	37.81	6.84	44.65	54.00	-9.35	AVG
3	5150.000	47.00	8.16	55.16	74.00	-18.84	peak
4	5150.000	36.71	8.16	44.87	54.00	-9.13	AVG
5	5350.000	48.14	8.33	56.47	74.00	-17.53	peak
6	5350.000	36.26	8.33	44.59	54.00	-9.41	AVG
7	5392.800	49.51	8.37	57.88	74.00	-16.12	peak
8	5392.800	36.34	8.37	44.71	54.00	-9.29	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

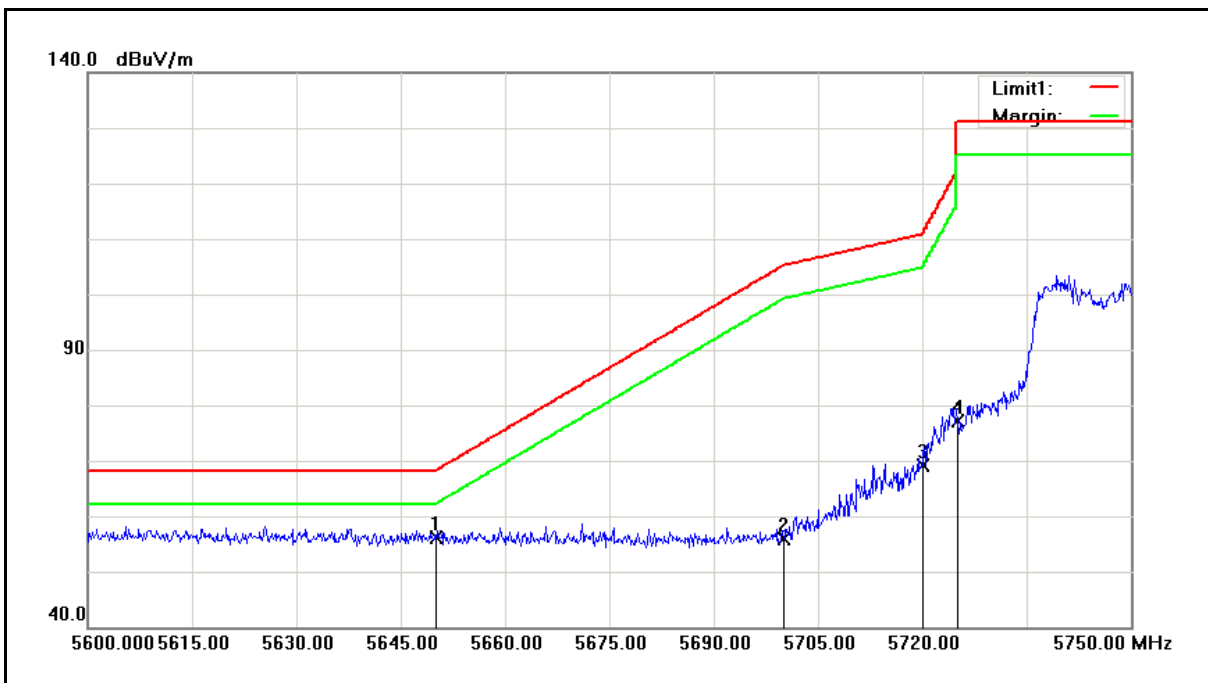
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 20MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5745 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5650.000	47.91	8.84	56.75	68.20	-11.45	peak
2	5700.000	47.22	8.97	56.19	105.20	-49.01	peak
3	5720.000	61.46	9.01	70.47	110.80	-40.33	peak
4	5725.000	69.41	9.03	78.44	122.20	-43.76	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

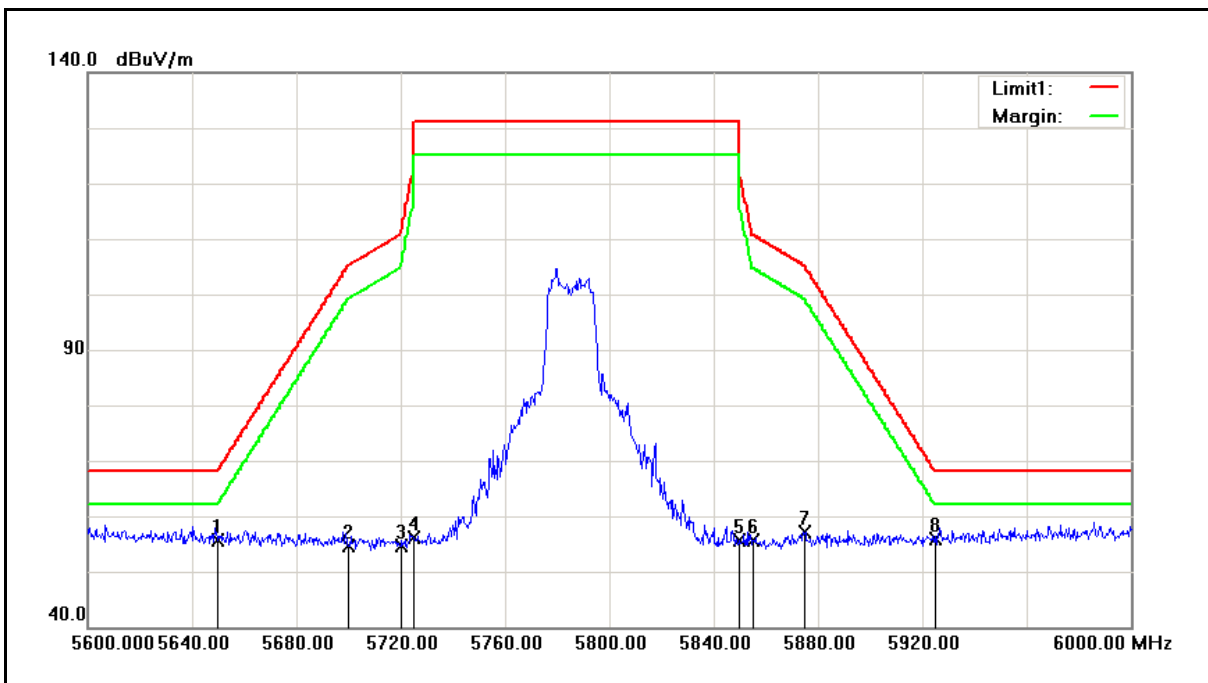
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 20MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5745 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5650.000	47.25	8.84	56.09	68.20	-12.11	peak
2	5700.000	46.88	8.97	55.85	105.20	-49.35	peak
3	5720.000	60.05	9.01	69.06	110.80	-41.74	peak
4	5725.000	68.17	9.03	77.20	122.20	-45.00	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 20MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5785 MHz		
Ant.Polar.:	Horizontal		

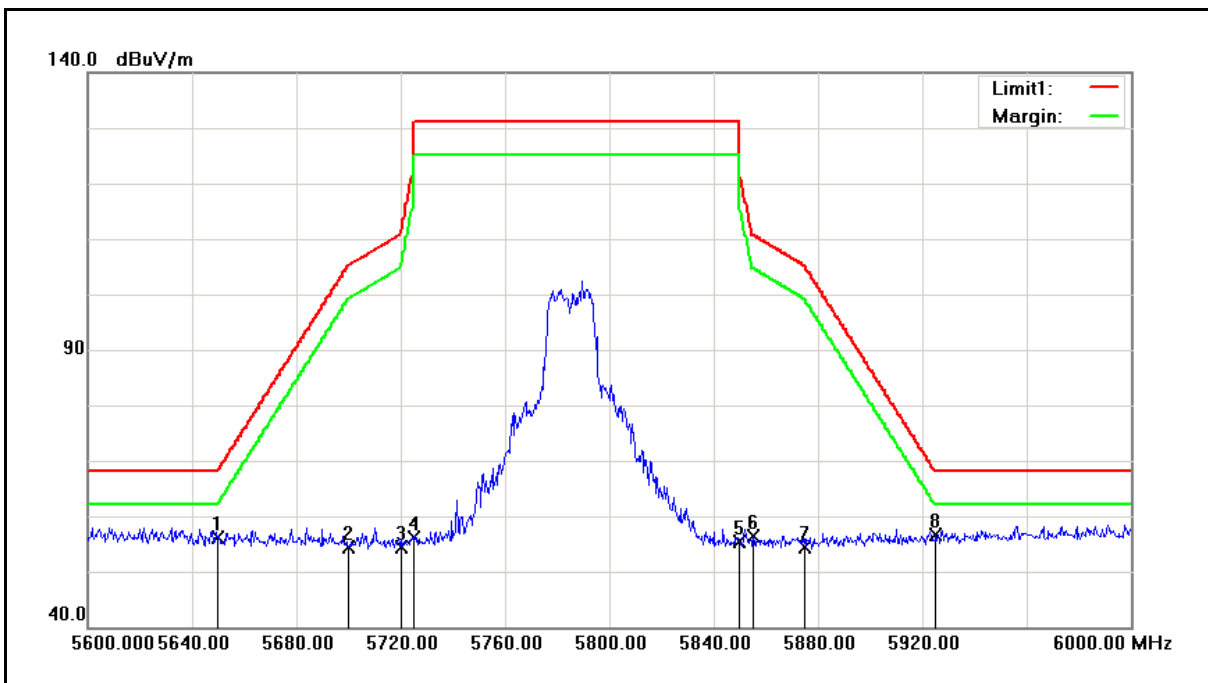


No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5650.000	46.71	8.84	55.55	68.20	-12.65	peak
2	5700.000	45.68	8.97	54.65	105.20	-50.55	peak
3	5720.000	45.66	9.01	54.67	110.80	-56.13	peak
4	5725.000	47.00	9.03	56.03	122.20	-66.17	peak
5	5850.000	46.37	9.33	55.70	122.20	-66.50	peak
6	5855.000	46.40	9.35	55.75	110.80	-55.05	peak
7	5875.000	47.78	9.40	57.18	105.20	-48.02	peak
8	5925.000	46.30	9.53	55.83	68.20	-12.37	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.



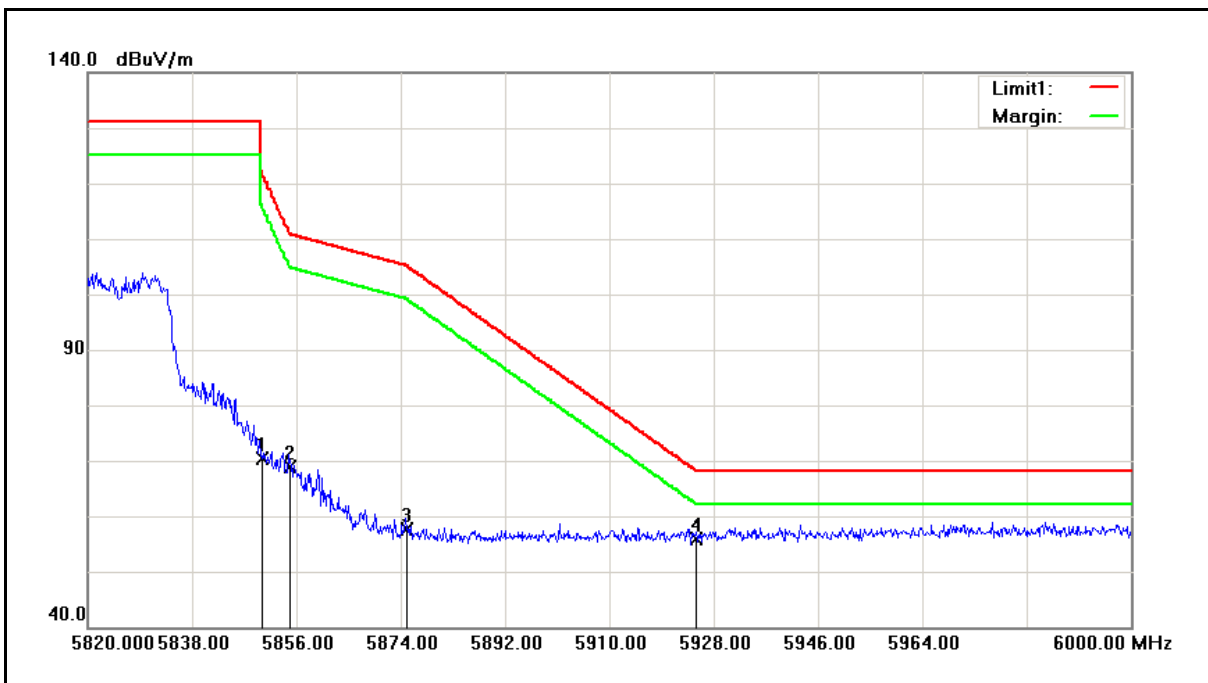
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 20MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5785 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5650.000	47.26	8.84	56.10	68.20	-12.10	peak
2	5700.000	45.46	8.97	54.43	105.20	-50.77	peak
3	5720.000	45.49	9.01	54.50	110.80	-56.30	peak
4	5725.000	47.12	9.03	56.15	122.20	-66.05	peak
5	5850.000	45.96	9.33	55.29	122.20	-66.91	peak
6	5855.000	47.04	9.35	56.39	110.80	-54.41	peak
7	5875.000	44.99	9.40	54.39	105.20	-50.81	peak
8	5925.000	47.12	9.53	56.65	68.20	-11.55	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

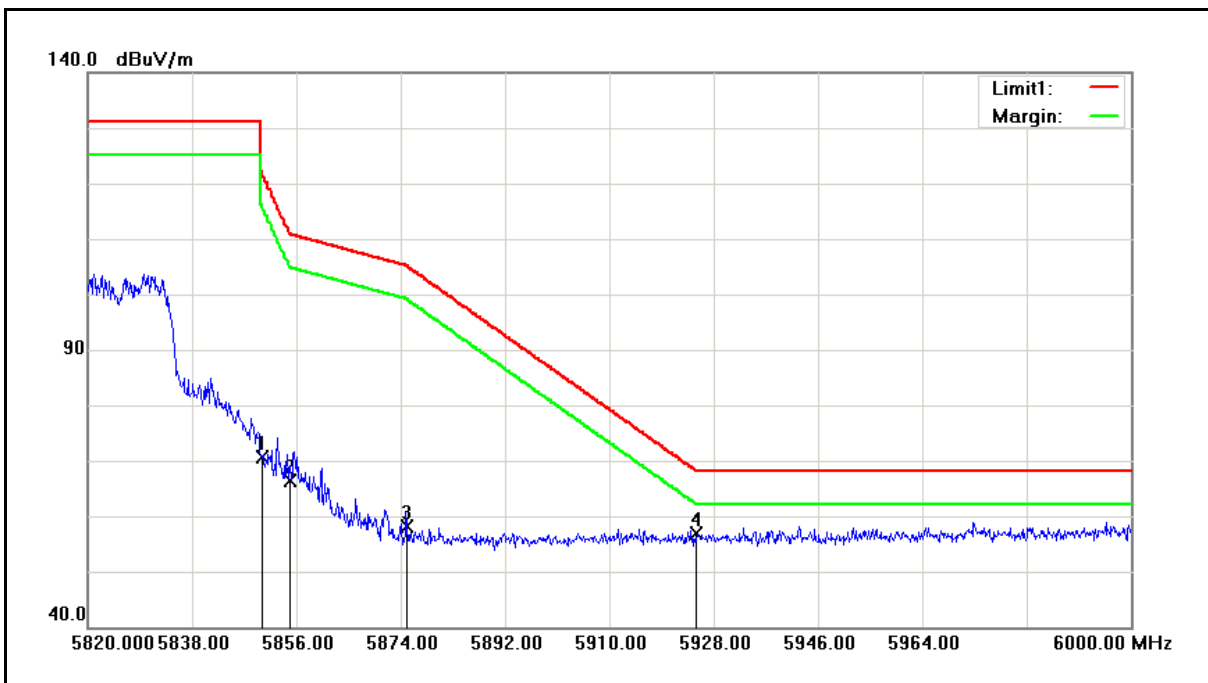
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 20MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5825 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5850.000	61.01	9.33	70.34	122.20	-51.86	peak
2	5855.000	59.57	9.35	68.92	110.80	-41.88	peak
3	5875.000	48.30	9.40	57.70	105.20	-47.50	peak
4	5925.000	46.45	9.53	55.98	68.20	-12.22	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

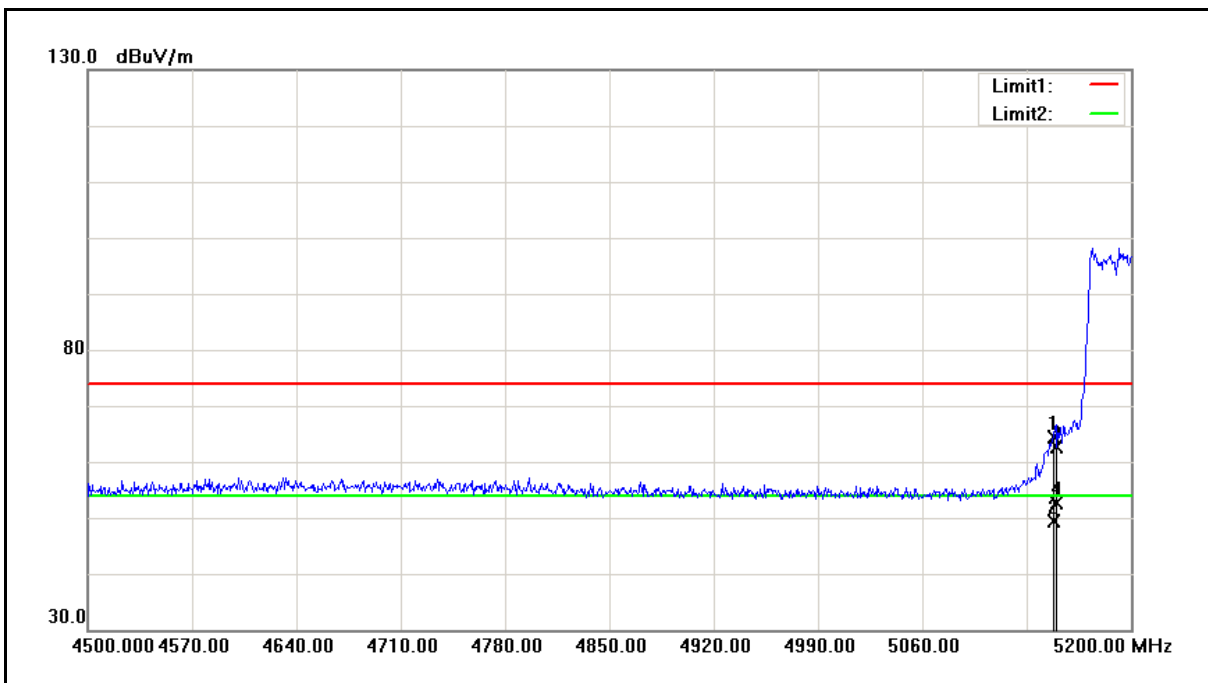
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 20MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5825 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5850.000	61.24	9.33	70.57	122.20	-51.63	peak
2	5855.000	57.14	9.35	66.49	110.80	-44.31	peak
3	5875.000	48.71	9.40	58.11	105.20	-47.09	peak
4	5925.000	47.46	9.53	56.99	68.20	-11.21	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

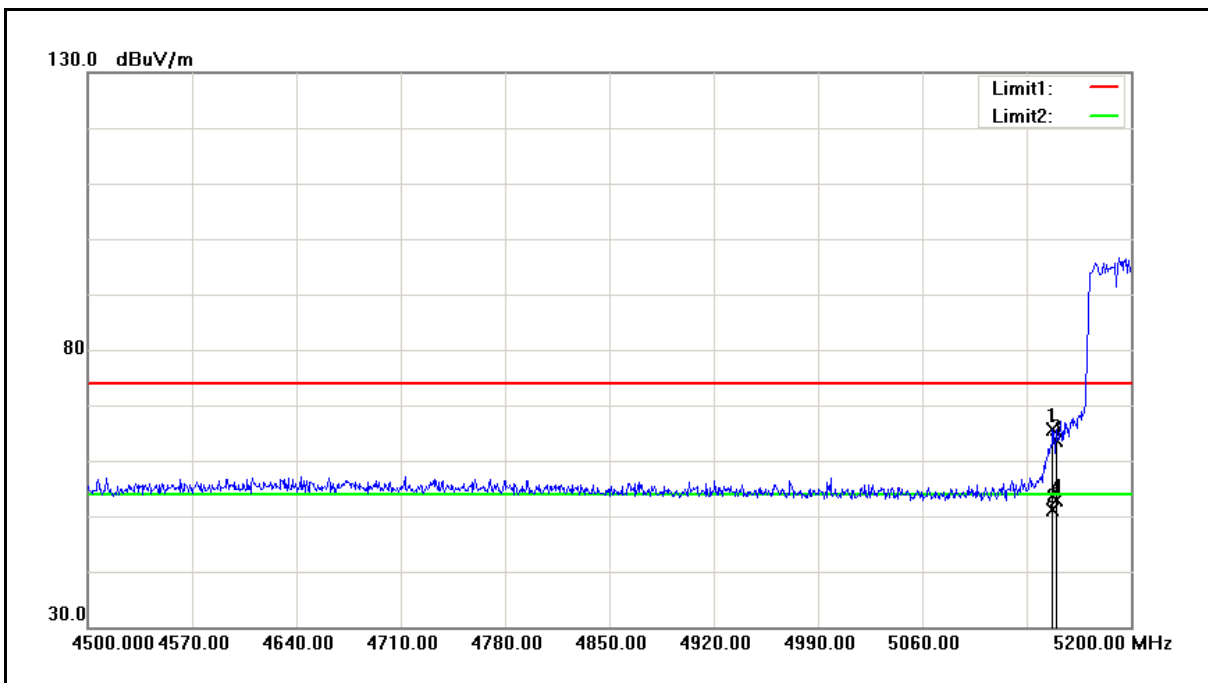
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 40MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5190 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5148.200	56.32	8.16	64.48	74.00	-9.52	peak
2	5148.200	41.30	8.16	49.46	54.00	-4.54	AVG
3	5150.000	54.48	8.16	62.64	74.00	-11.36	peak
4	5150.000	44.56	8.16	52.72	54.00	-1.28	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

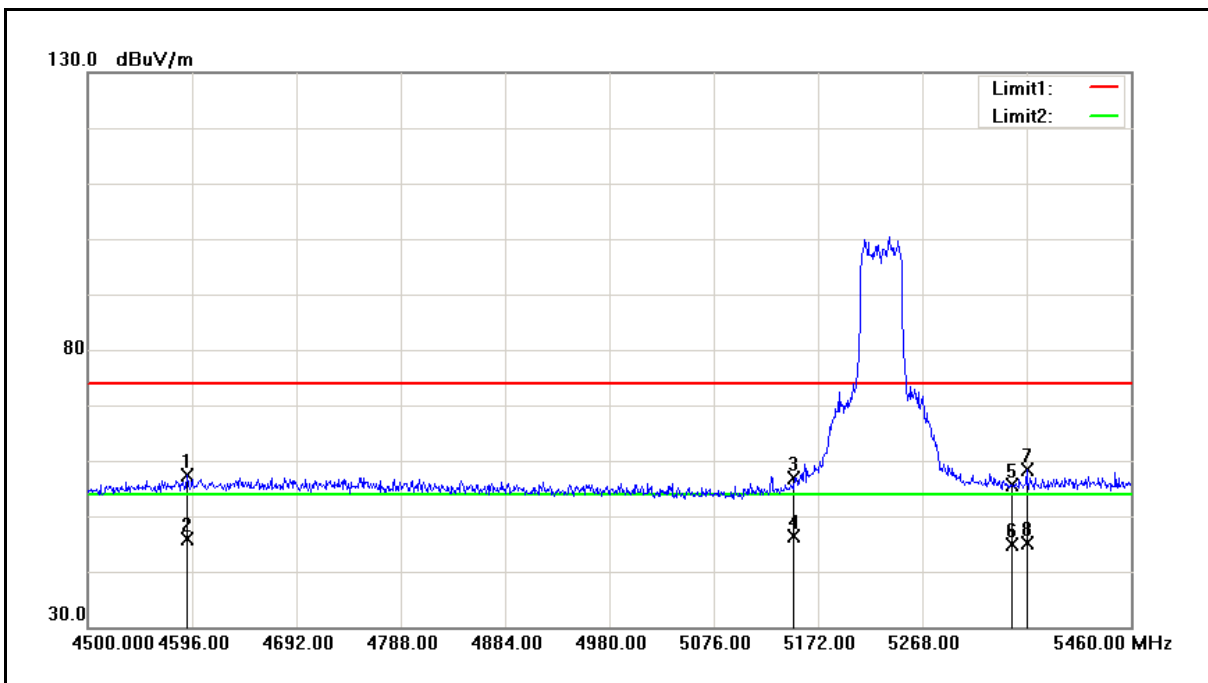
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 40MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5190 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5147.500	57.40	8.15	65.55	74.00	-8.45	peak
2	5147.500	43.05	8.15	51.20	54.00	-2.80	AVG
3	5150.000	55.35	8.16	63.51	74.00	-10.49	peak
4	5150.000	44.64	8.16	52.80	54.00	-1.20	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

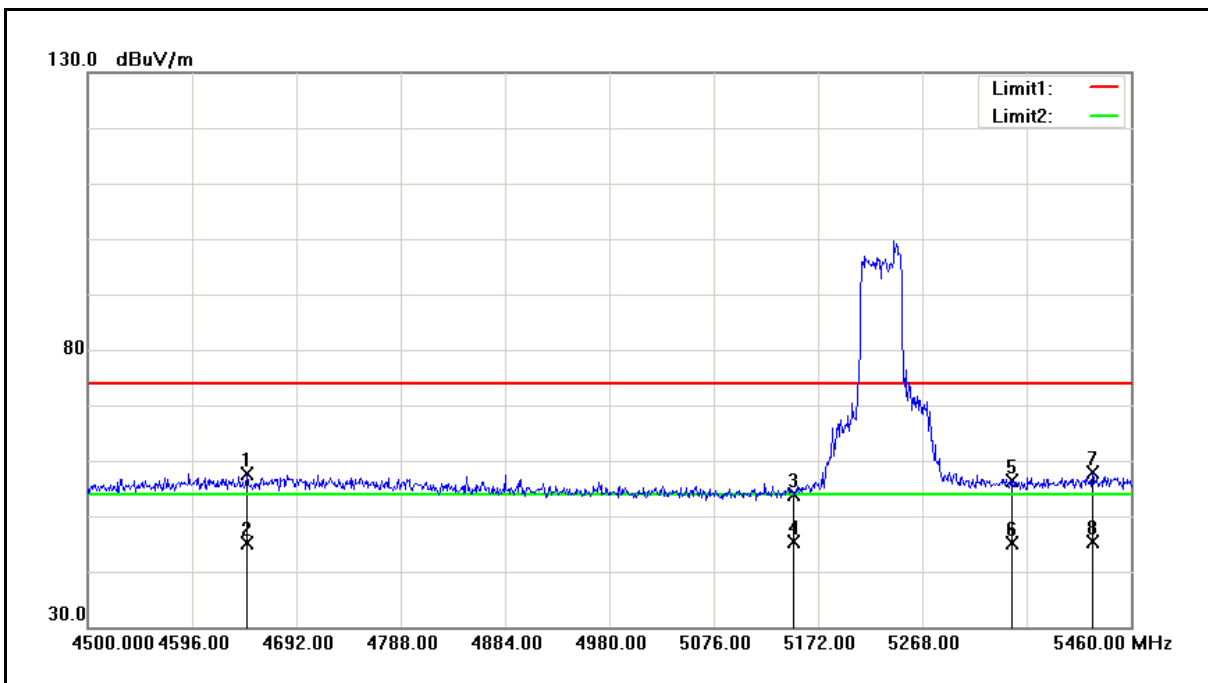
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 40MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5230 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	4591.200	50.78	6.58	57.36	74.00	-16.64	peak
2	4591.200	39.21	6.58	45.79	54.00	-8.21	AVG
3	5150.000	48.78	8.16	56.94	74.00	-17.06	peak
4	5150.000	38.29	8.16	46.45	54.00	-7.55	AVG
5	5350.000	47.40	8.33	55.73	74.00	-18.27	peak
6	5350.000	36.60	8.33	44.93	54.00	-9.07	AVG
7	5364.000	50.07	8.35	58.42	74.00	-15.58	peak
8	5364.000	36.77	8.35	45.12	54.00	-8.88	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

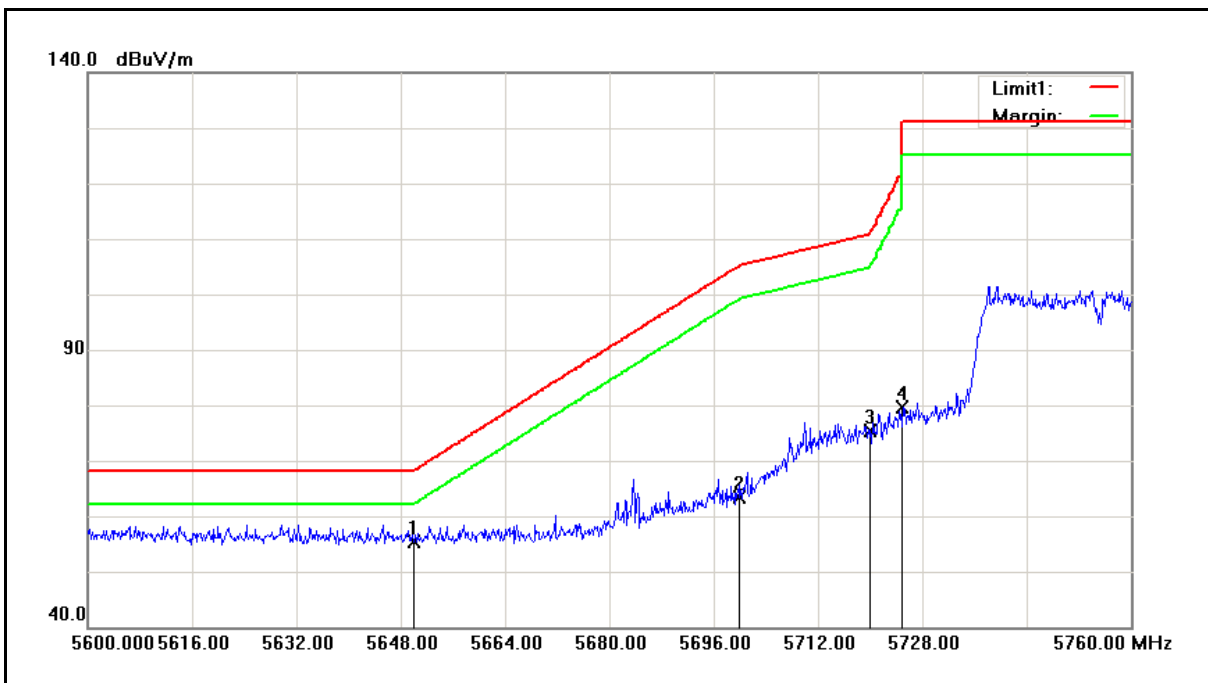
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 40MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5230 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	4646.880	50.76	6.77	57.53	74.00	-16.47	peak
2	4646.880	38.36	6.77	45.13	54.00	-8.87	AVG
3	5150.000	45.82	8.16	53.98	74.00	-20.02	peak
4	5150.000	37.22	8.16	45.38	54.00	-8.62	AVG
5	5350.000	48.12	8.33	56.45	74.00	-17.55	peak
6	5350.000	36.89	8.33	45.22	54.00	-8.78	AVG
7	5424.480	49.41	8.40	57.81	74.00	-16.19	peak
8	5424.480	36.91	8.40	45.31	54.00	-8.69	AVG

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 40MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5755 MHz		
Ant.Polar.:	Horizontal		

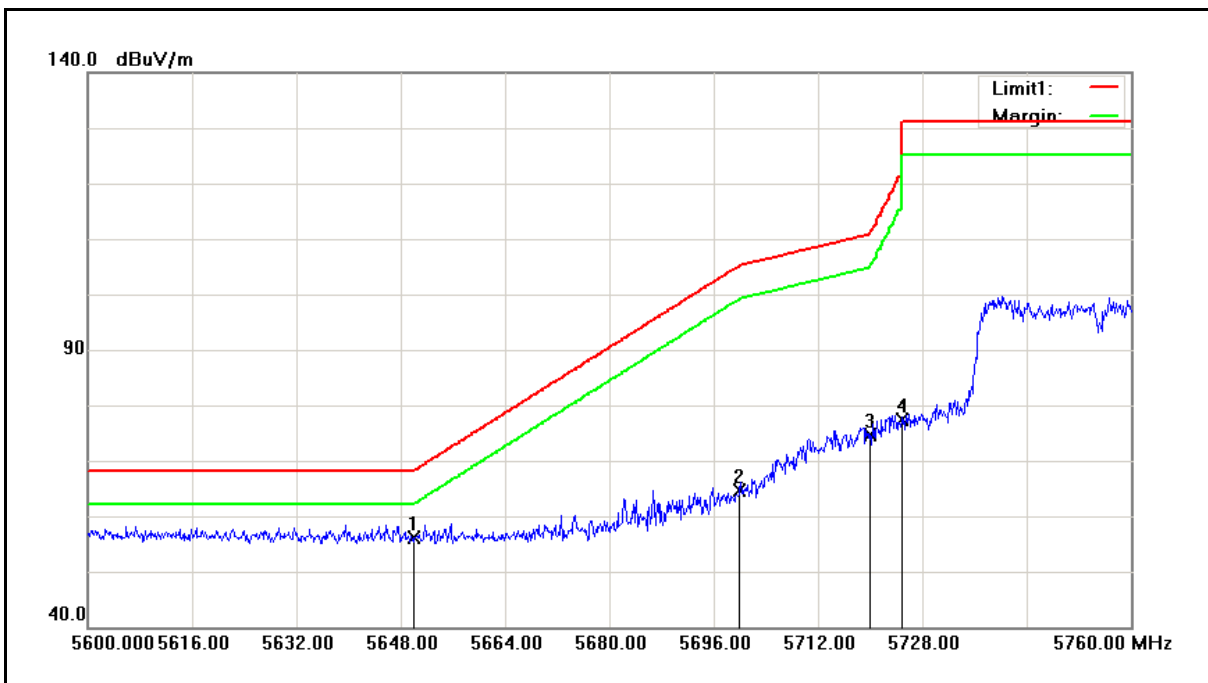


No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5650.000	46.65	8.84	55.49	68.20	-12.71	peak
2	5700.000	54.51	8.97	63.48	105.20	-41.72	peak
3	5720.000	66.32	9.01	75.33	110.80	-35.47	peak
4	5725.000	70.61	9.03	79.64	122.20	-42.56	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.



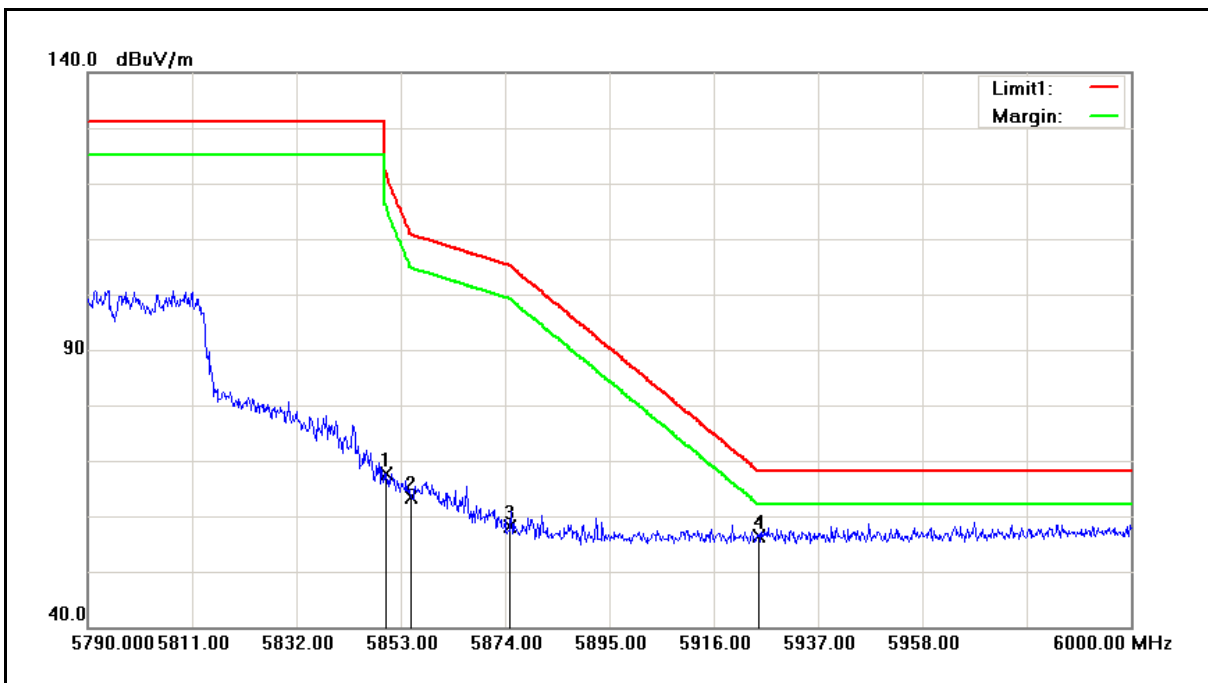
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 40MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5755 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5650.000	47.22	8.84	56.06	68.20	-12.14	peak
2	5700.000	55.71	8.97	64.68	105.20	-40.52	peak
3	5720.000	65.59	9.01	74.60	110.80	-36.20	peak
4	5725.000	68.32	9.03	77.35	122.20	-44.85	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

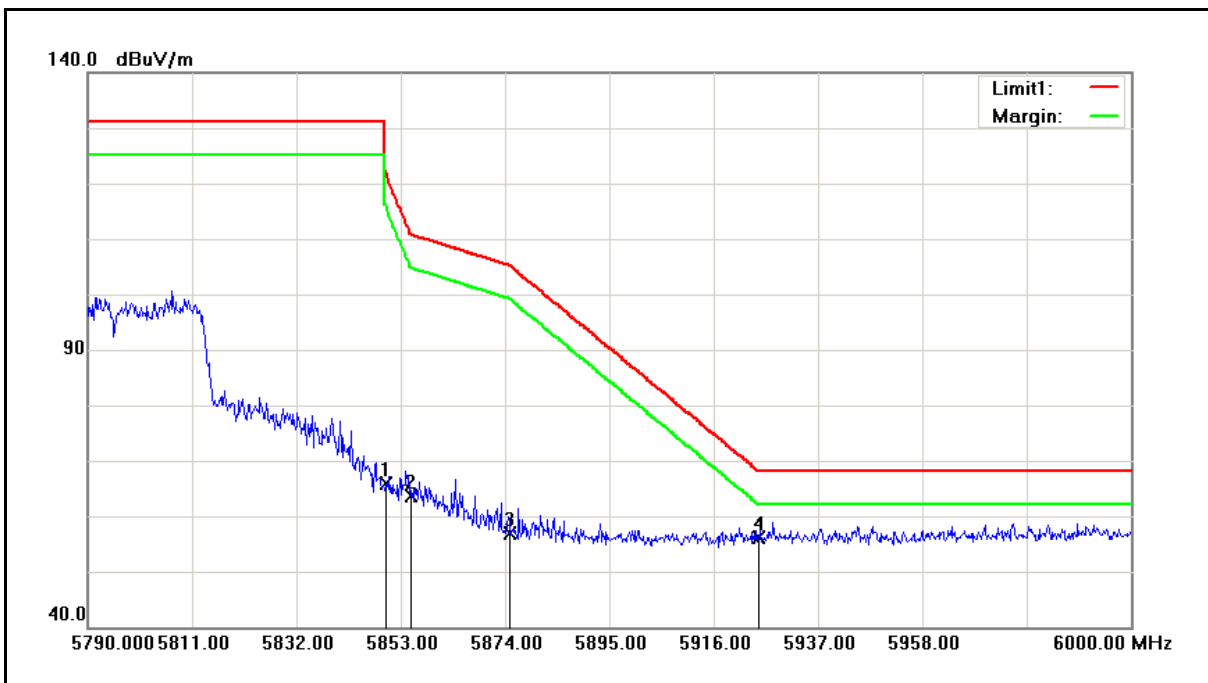
Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 40MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5795 MHz		
Ant.Polar.:	Horizontal		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5850.000	58.37	9.33	67.70	122.20	-54.50	peak
2	5855.000	54.12	9.35	63.47	110.80	-47.33	peak
3	5875.000	48.69	9.40	58.09	105.20	-47.11	peak
4	5925.000	46.97	9.53	56.50	68.20	-11.70	peak

- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

Standard:	FCC Part 15E	Test Distance:	3m
Test item:	Radiated Emission	Power:	AC 120V/60Hz
Test Mode:	IEEE 802.11ac 40MHz	Temp.(°C)/Hum.(%RH):	26(°C)/60%RH
Frequency:	5795 MHz		
Ant.Polar.:	Vertical		



No.	Frequency (MHz)	Reading (dBuV)	Correct Factor (dB/m)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	5850.000	56.64	9.33	65.97	122.20	-56.23	peak
2	5855.000	54.26	9.35	63.61	110.80	-47.19	peak
3	5875.000	47.44	9.40	56.84	105.20	-48.36	peak
4	5925.000	46.63	9.53	56.16	68.20	-12.04	peak

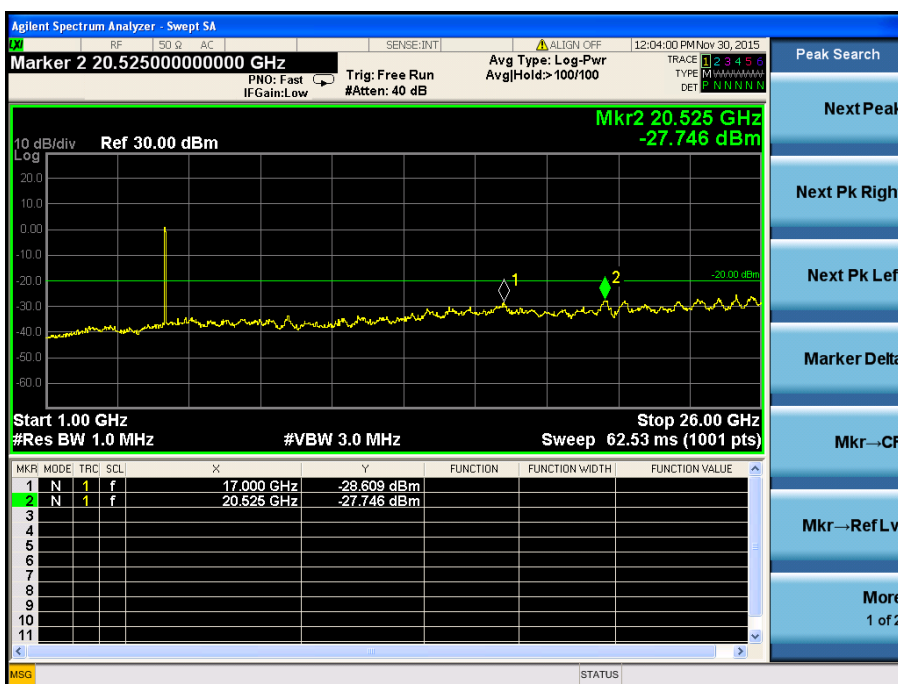
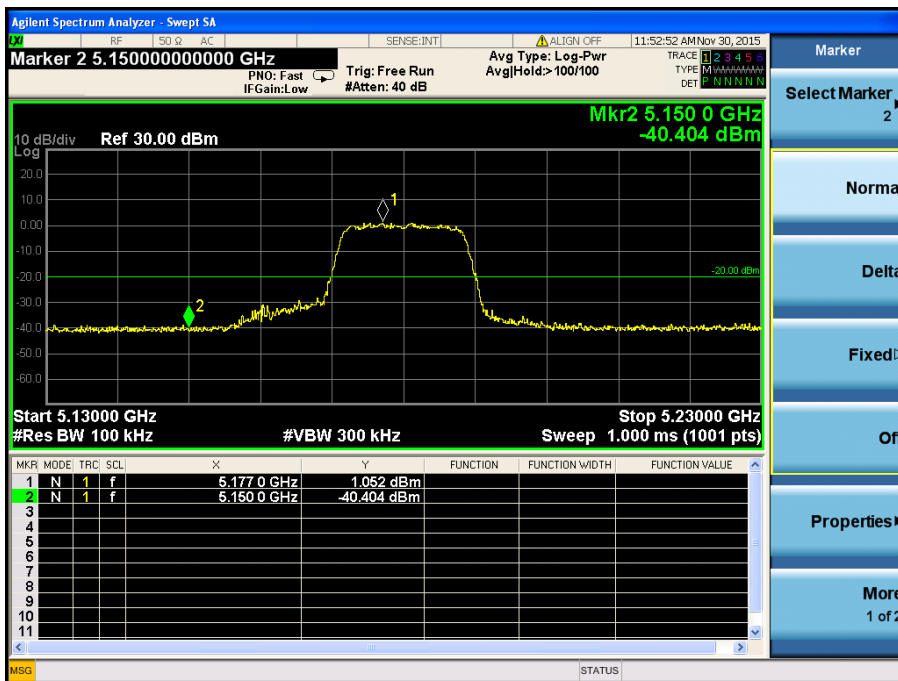
- Note:
1. Result = Correction factor + Reading
  2. Correction factor = Antenna Factor + Cable loss – Pre-Amplifier gain.
  3. When the peak results are less than average limit, so not need to evaluate the average.

Out-of-Band and Spurious Emission (Conducted)

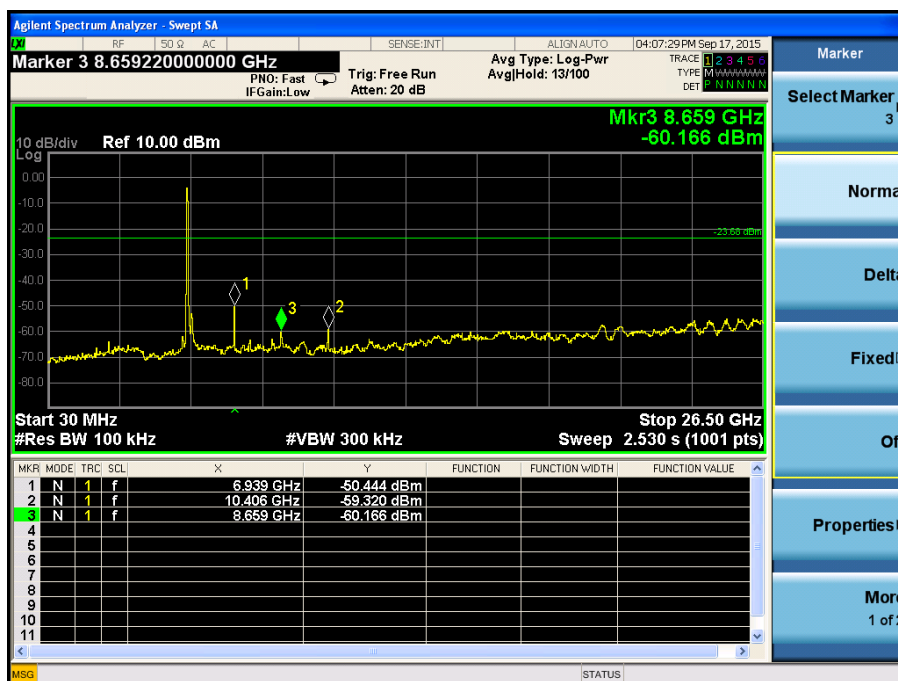
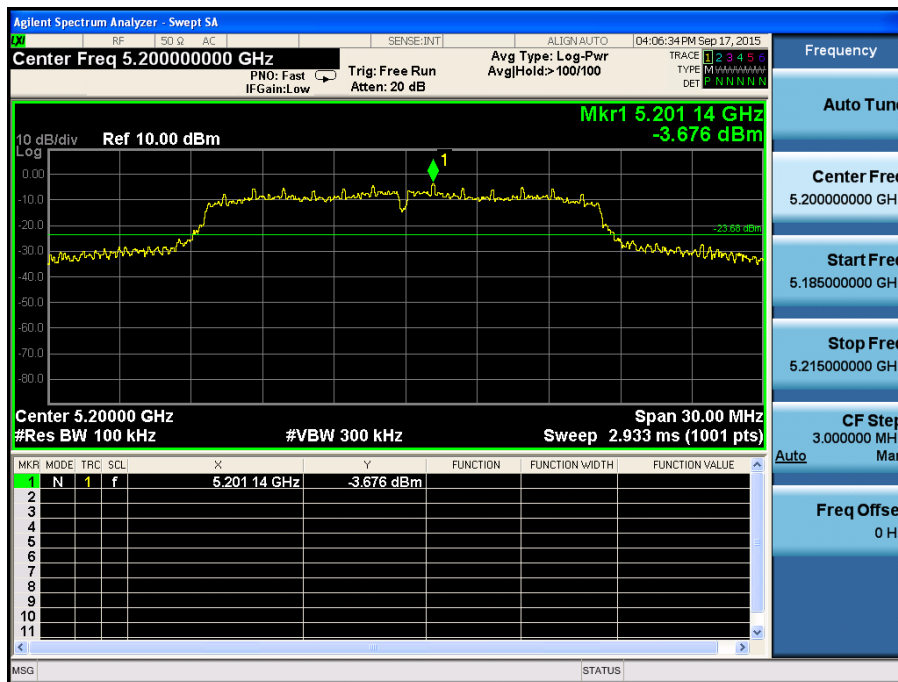
Antenna 1

802.11n-HT20

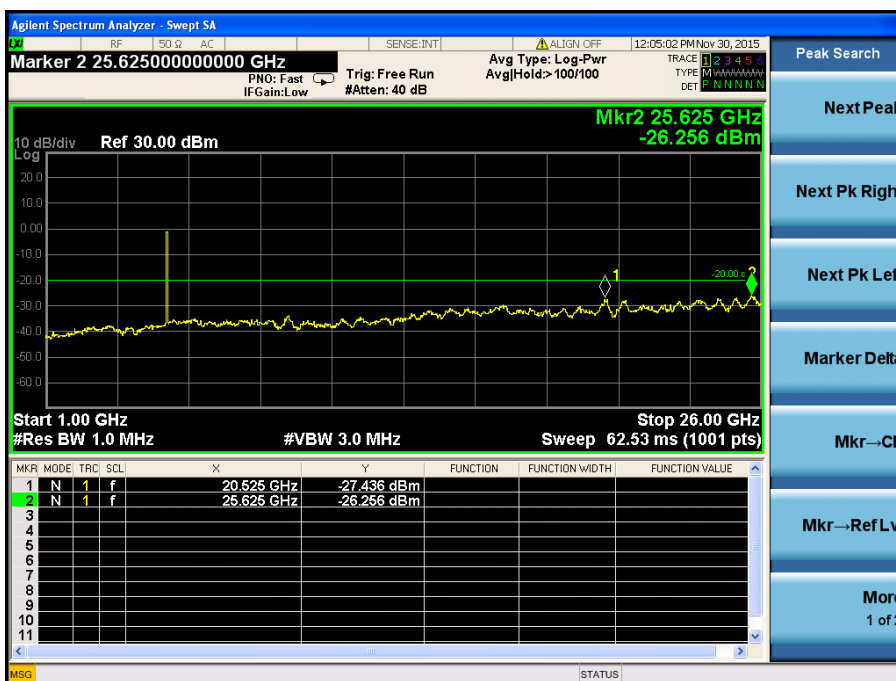
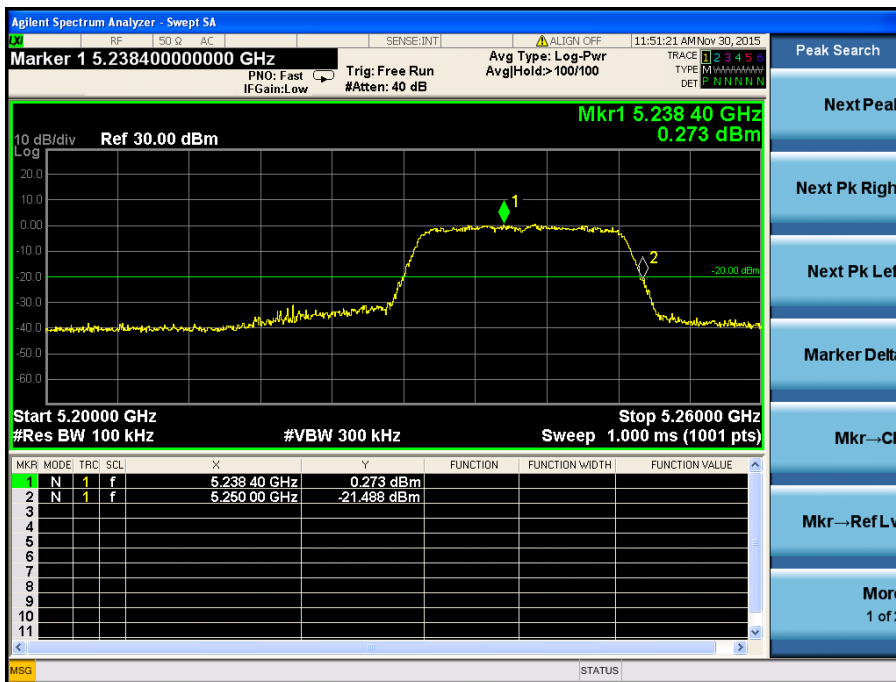
5180MHz



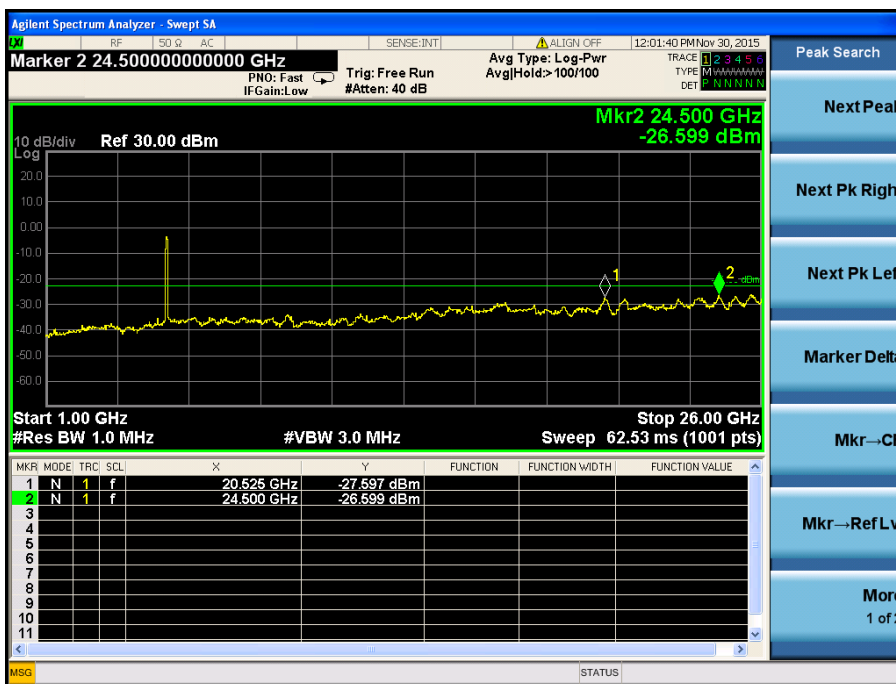
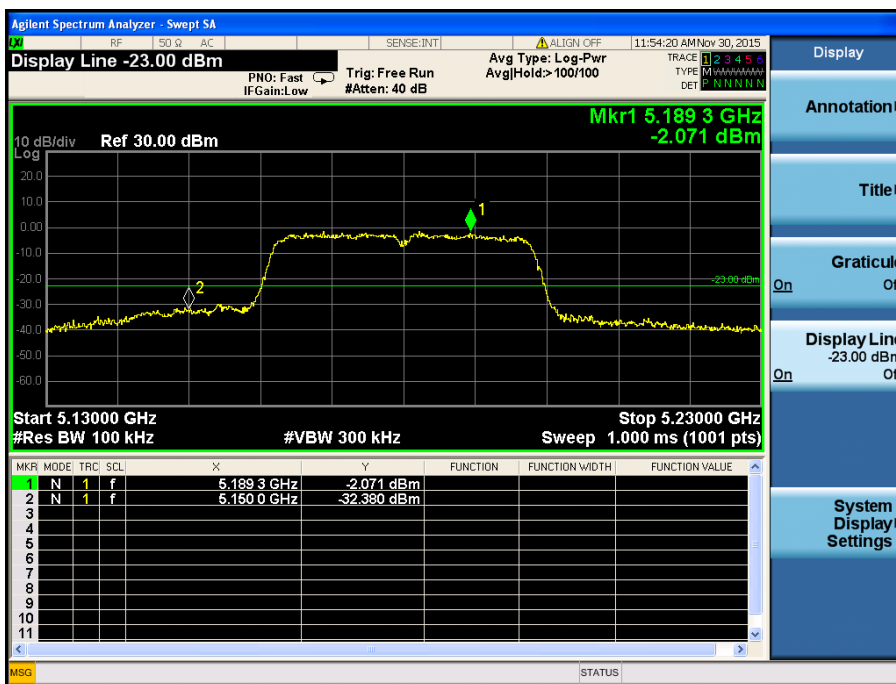
5200MHz



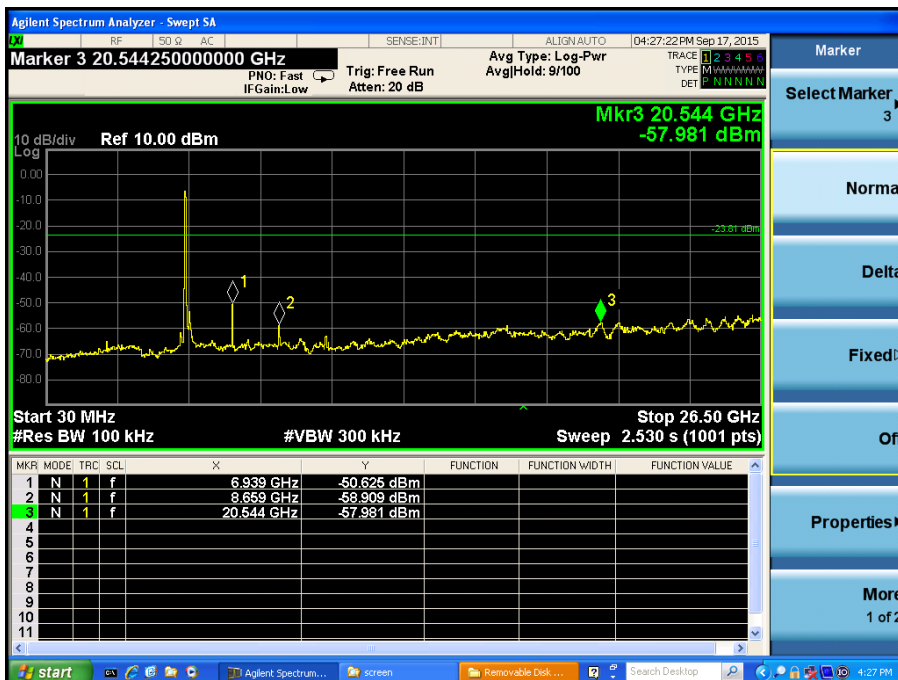
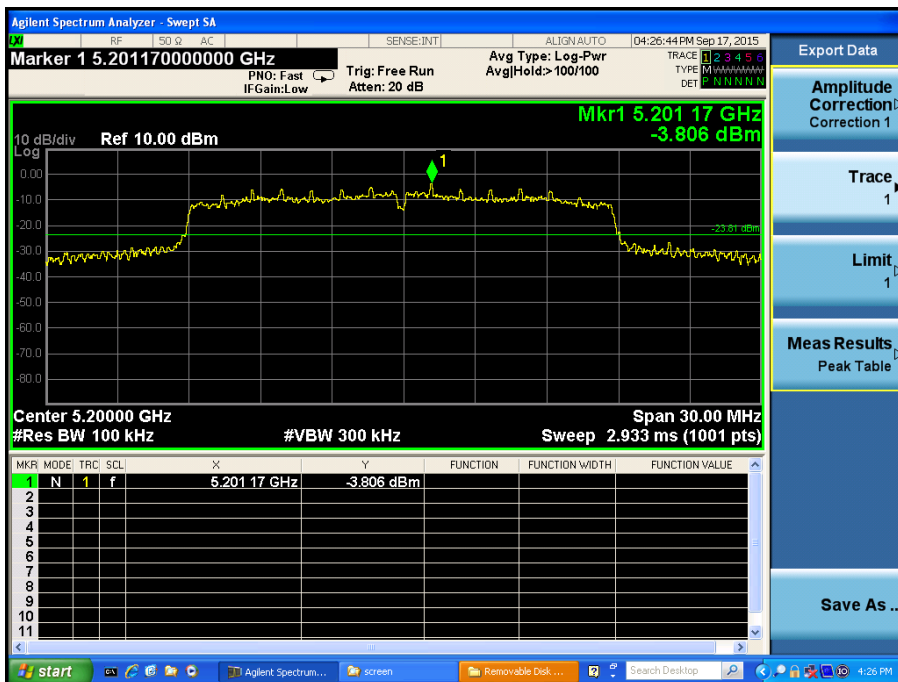
5240MHz



802.11n-HT40  
5190MHz

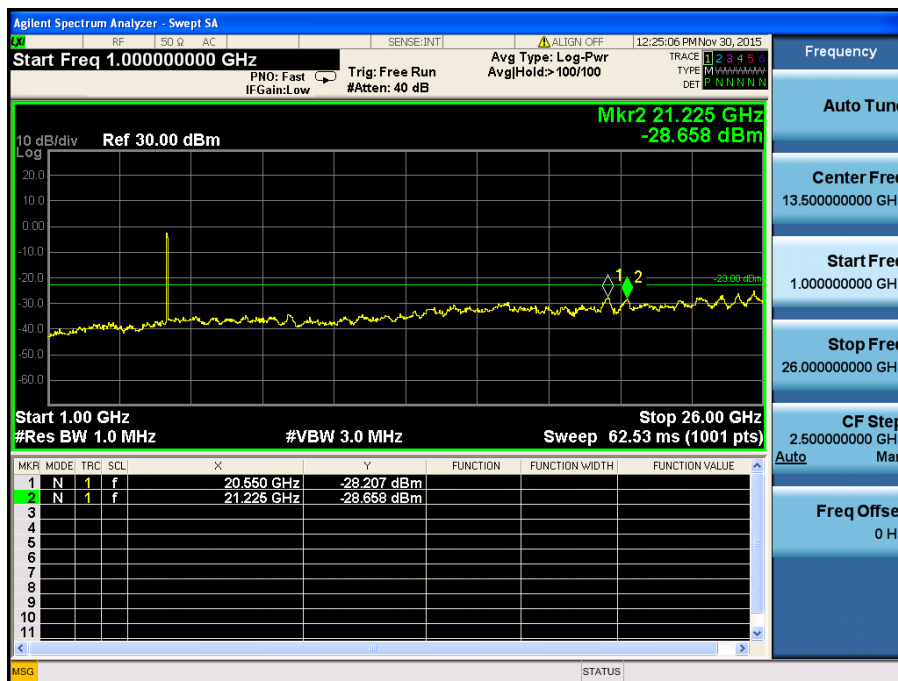
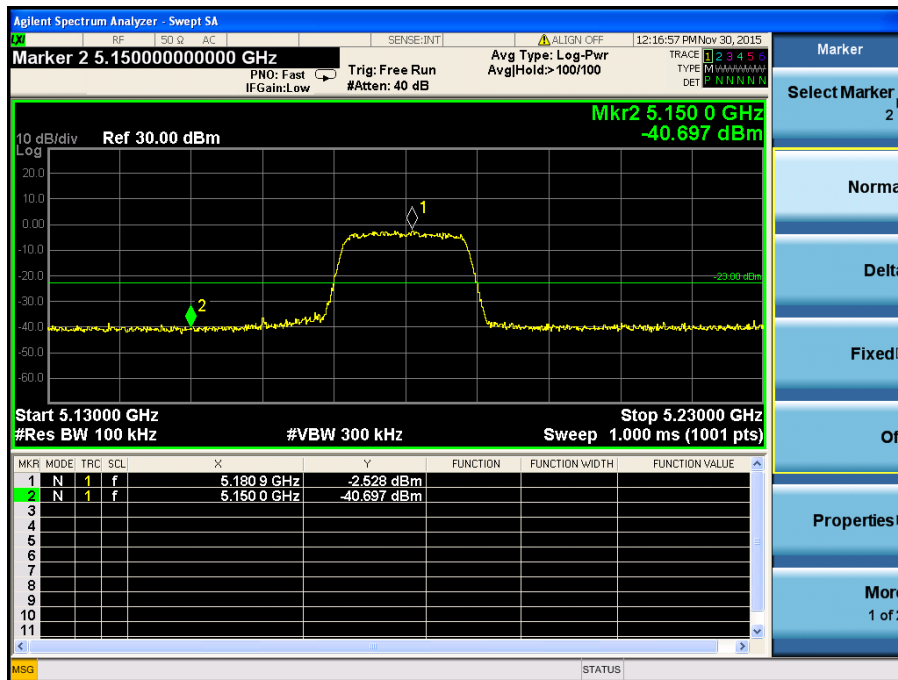


5230MHz

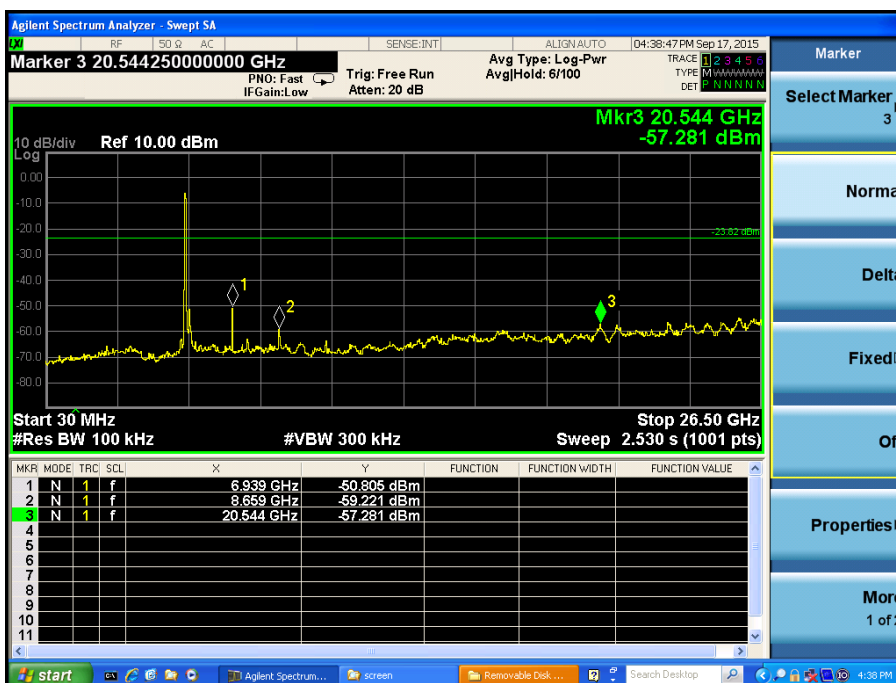
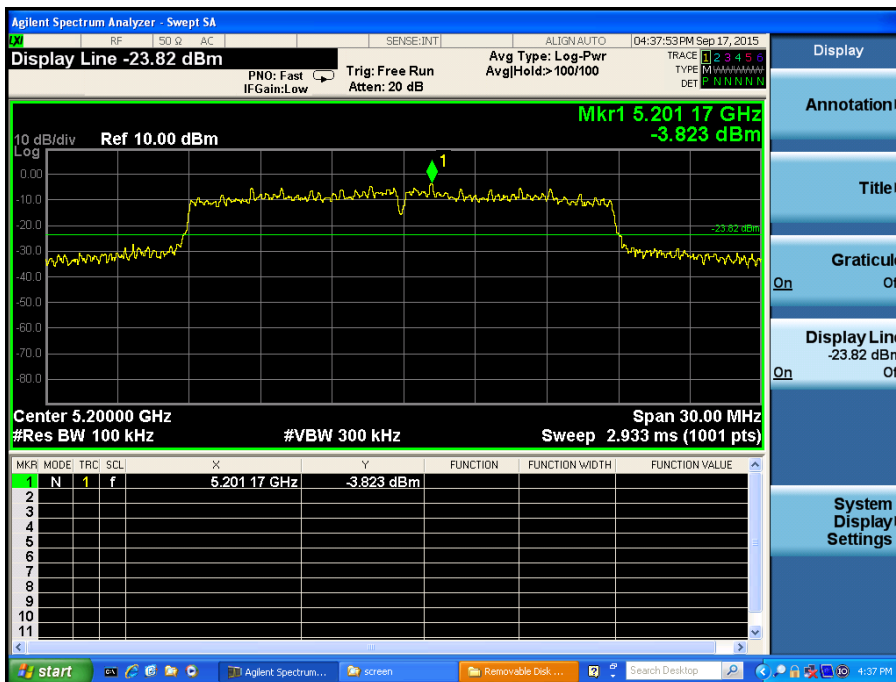




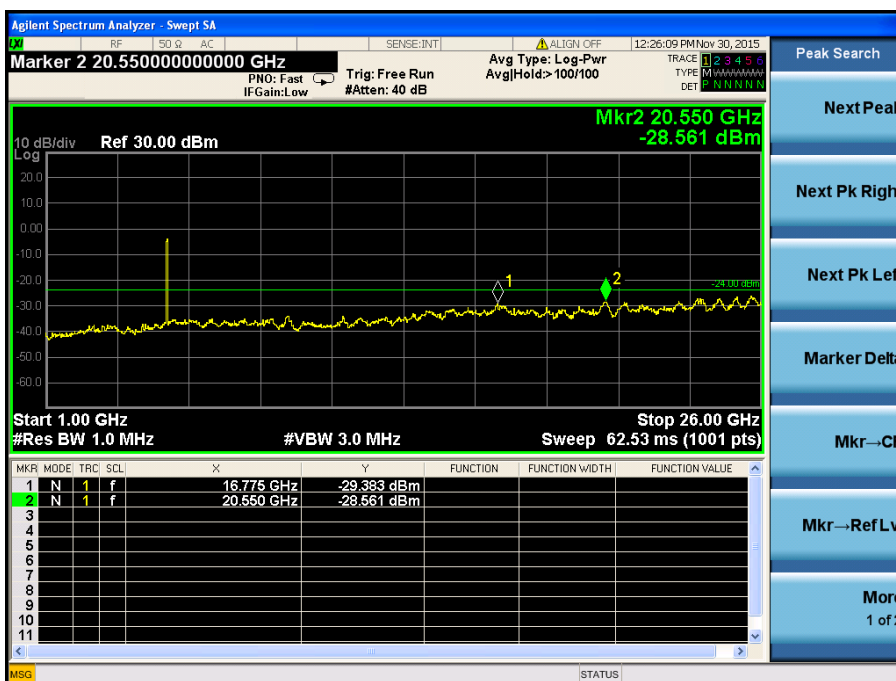
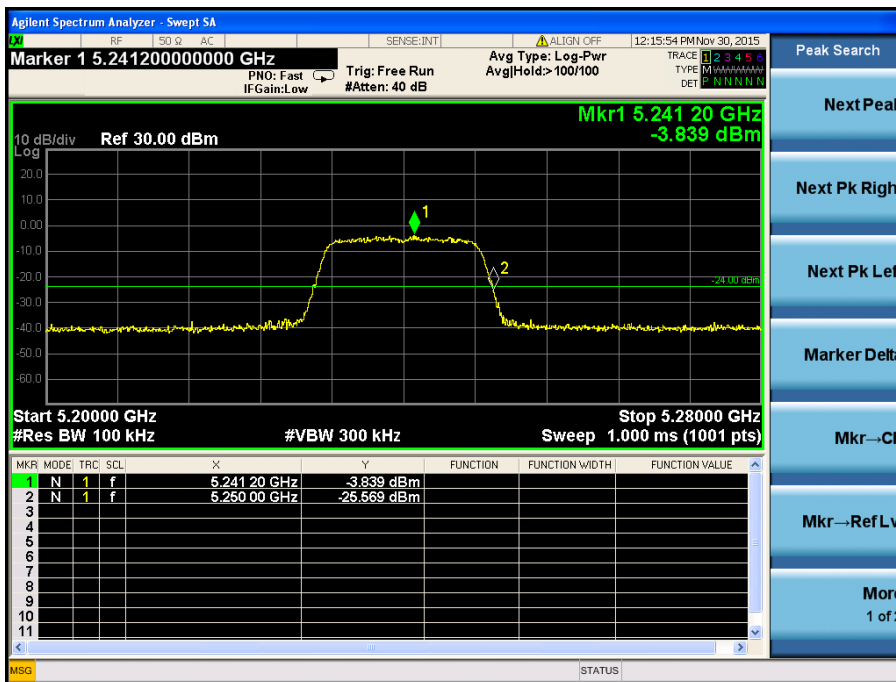
Antenna 2  
 802.11n-HT20  
 5180MHz



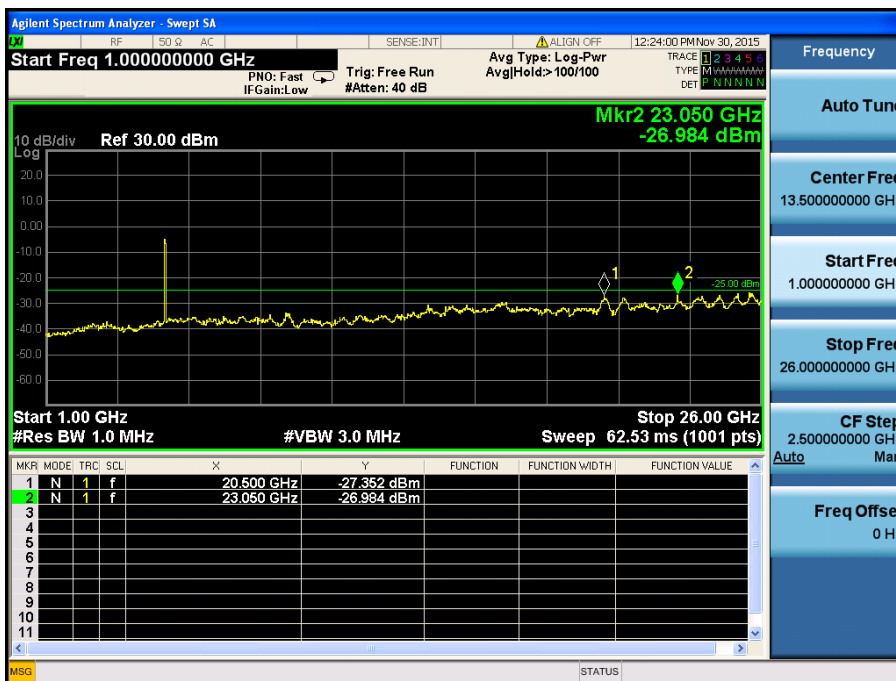
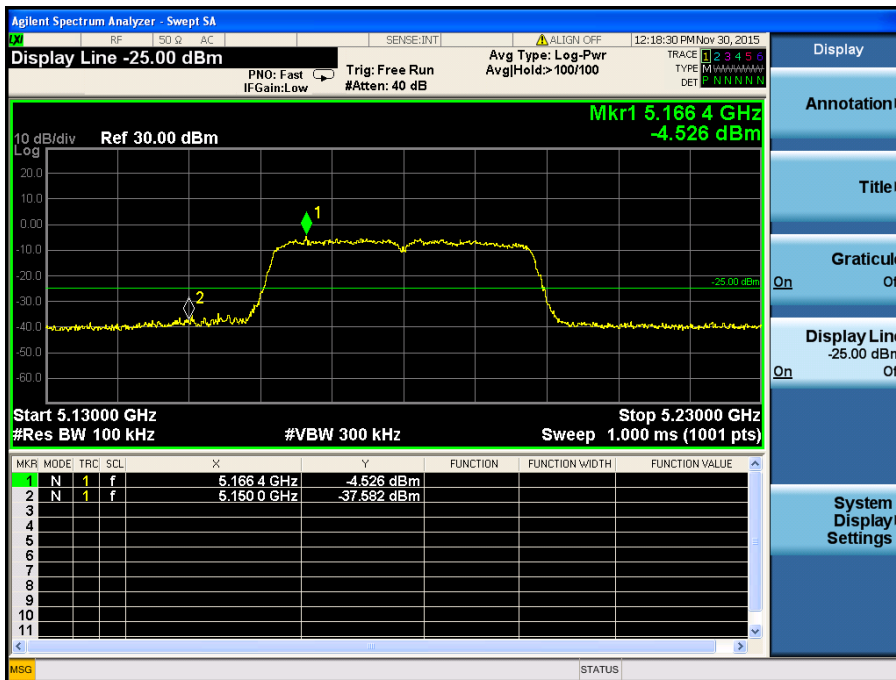
5200MHz



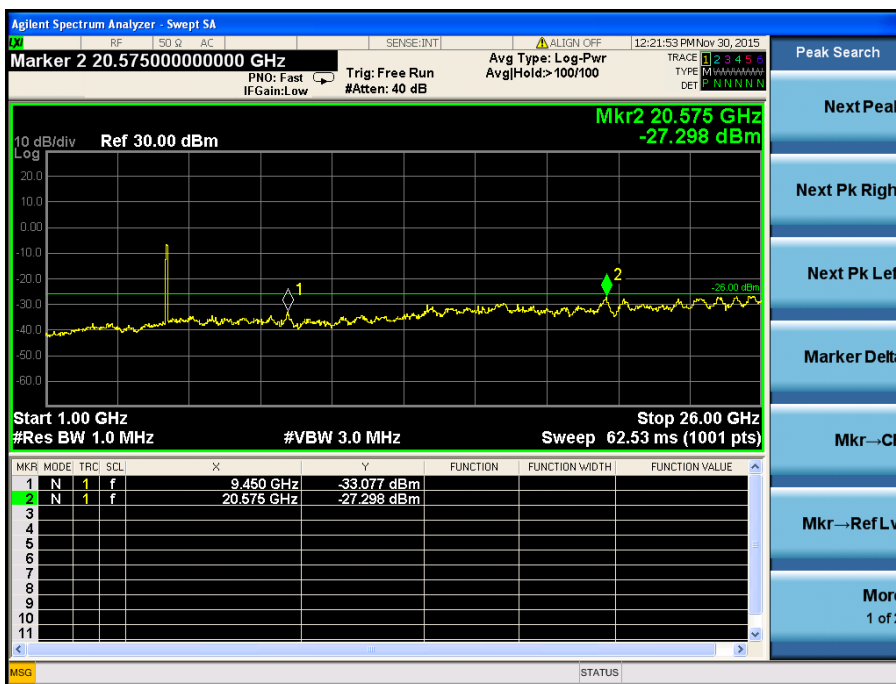
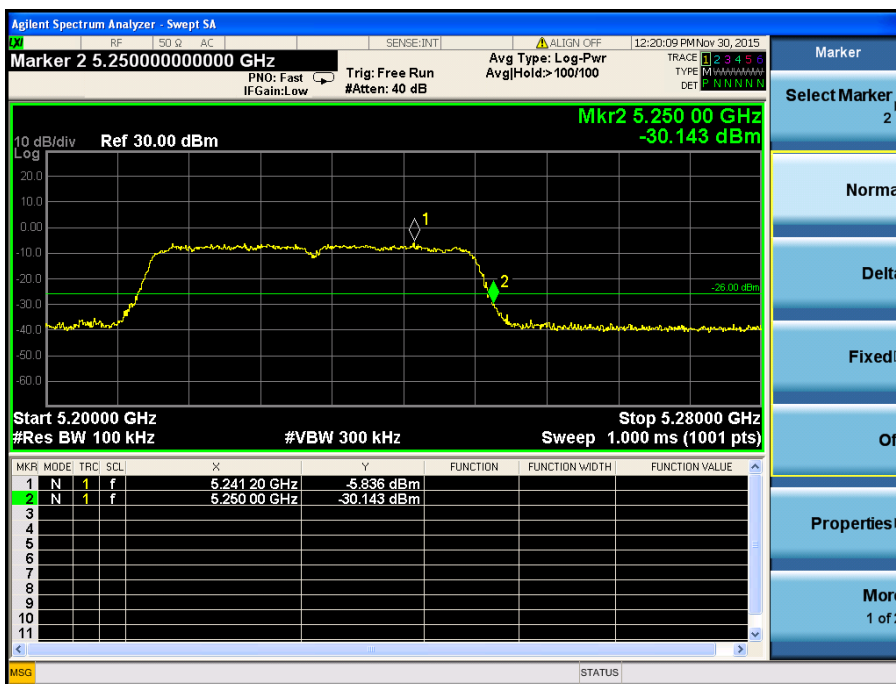
5240MHz



802.11n-HT40  
5190MHz



5230MHz



---

## 10. Frequency Stability

---

### 10.1 Standard Applicable

According to §15.407(g), Manufacturers of U-NII devices are responsible for ensuring frequency stability such that an emission is maintained within the band of operation under all conditions of normal operation as specified in the users manual.

### 10.2 Test Procedure

According to §2.1055, the following test procedure was performed.

The Frequency Stability is measured directly with a Frequency Domain Analyzer. Frequency Deviation in ppm is calculated from the measured peak to peak value.

The Carrier Frequency Stability over Power Supply Voltage and over Temperature is measured with a Frequency Domain Analyzer in histogram mode

Temperature:	Supply Voltage
20°C	85-115% of declared nominal voltage
-30°C to +50°C	Normal

### 10.3 Environmental Conditions

Temperature:	20°C
Relative Humidity:	54%
ATM Pressure:	1011 mbar

### 10.4 Summary of Test Results/Plots

5150-5250MHz

802.11n\_HT20

Reference Frequency(Middle Channel): 5200 MHz			
Environment Temperature (°C)	Power Supplied (VDC)	Frequency Measure with Time Elapsed	
		MCF (Hz)	Error (ppm)
50	3.3	141	0.0269
40	3.3	128	0.0244
30	3.3	124	0.0237
20	3.3	154	0.0294
10	3.3	114	0.0218
0	3.3	134	0.0256
-10	3.3	147	0.0281
-20	3.3	118	0.0225
-30	3.3	126	0.0240

802.11n\_HT40

Reference Frequency(Middle Channel): 5200 MHz			
Environment Temperature (°C)	Power Supplied (VDC)	Frequency Measure with Time Elapsed	
		MCF (Hz)	Error (ppm)
50	3.3	141	0.0270
40	3.3	145	0.0277
30	3.3	141	0.0270
20	3.3	131	0.0250
10	3.3	148	0.0283
0	3.3	152	0.0291
-10	3.3	158	0.0302
-20	3.3	151	0.0289
-30	3.3	149	0.0285

So, Frequency Stability Versus Input Voltage is:

5150-5250MHz

802.11n\_HT20

Reference Frequency(Middle Channel): 5200 MHz			
Environment Temperature (°C)	Power Supplied (VAC)	Frequency Measure with Time Elapsed	
		Frequency (Hz)	Error (ppm)
20	2.8	145	0.0277
	3.3	148	0.0282
	3.8	152	0.0290

802.11n\_HT40

Reference Frequency(Middle Channel): 5200 MHz			
Environment Temperature (°C)	Power Supplied (VAC)	Frequency Measure with Time Elapsed	
		Frequency (Hz)	Error (ppm)
20	2.8	145	0.0257
	3.3	148	0.0268
	3.8	152	0.0284

\*\*\*\*\* END OF REPORT \*\*\*\*\*