

# FCC Part 15C Measurement and Test Report

For

**Amelia World Corporation dba LINSAY**

**16340 West Dixie Highway, North Miami Beach, Florida**

**FCC ID: 2AAC37HD2CORE**

**FCC Rules:** FCC Part 15C

**Product Description:** Tablet PC

**Tested Model:** F-7HD2Core

**Report No.:** STR13078320I-1

**Tested Date:** 2013-07-24 to 2013-07-29

**Issued Date:** 2013-07-30

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Note: This test report is limited to the above client company and the product model only. It may not be duplicated without prior permitted by SEM.Test Compliance Service Co., Ltd

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## 1. GENERAL INFORMATION

### 1.1 Product Description for Equipment Under Test (EUT)

**Client Information**

Applicant: Amelia World Corporation dba LINSAY  
Address of applicant: 16340 West Dixie Highway, North Miami Beach,  
Florida  
Manufacturer: Amelia World Corporation dba LINSAY  
Address of manufacturer: 16340 West Dixie Highway, North Miami Beach,  
Florida

General Description of EUT	
Product Name:	Tablet PC
Trade Name:	LINSAY
Model No.:	F-7HD2Core
Adding Model(s):	/
Rated Voltage:	DC 3.7V battery
Power Adapter Model:	XHY050200UUCH (Input: AC 100-240V/0.5A; Output: DC 5V/2A)
<i>Note: The test data is gathered from a production sample, provided by the manufacturer.</i>	

Technical Characteristics of EUT	
Support Standards:	802.11b/g/n
Frequency Range:	2412-2462MHz, 2422-2452MHz
RF Output Power:	7.77 dBm (Conducted)
Data Rate:	1-11Mbps, 6-54Mbps, up to 150Mbps
Modulation:	CCK, BPSK, QPSK, 16QAM, 64QAM
Quantity of Channels:	11/7
Channel Separation:	5MHz
Antenna Type:	Integral Antenna
Antenna Gain:	2 dBi
Lowest Internal Frequency of EUT:	32.768kHz
Device Category:	Portable Device

## 1.2 Test Standards

The following report is prepared on behalf of the Amelia World Corporation dba LINSAY in accordance with FCC Part 15, Subpart C, and section 15.203, 15.205, 15.207, 15.209 and 15.247 of the Federal Communication Commissions rules.

The objective is to determine compliance with FCC Part 15, Subpart C, and section 15.203, 15.205, 15.207, 15.209 and 15.247 of the Federal Communication Commissions rules.

**Maintenance of compliance** is the responsibility of the manufacturer. Any modification of the product, which result in lowering the emission, should be checked to ensure compliance has been maintained.

## 1.3 Test Methodology

All measurements contained in this report were conducted with ANSI C63.4-2003, American National Standard for Methods of Measurement of Radio-Noise Emissions from Low-Voltage Electrical and Electronic Equipment in the range of 9 kHz to 40 GHz. The public notice KDB 558074 for digital transmission systems shall be performed also.

## 1.4 Test Facility

- **FCC – Registration No.: 994117**

SEM.Test Compliance Services Co., Ltd. EMC Laboratory has been registered and fully described in a report filed with the (FCC) Federal Communications Commission. The acceptance letter from the FCC is maintained in our files and the Registration is 994117.

- **Industry Canada (IC) Registration No.: 7673A**

The 3m Semi-anechoic chamber of SEM.Test Compliance Services Co., Ltd. has been registered by Certification and Engineering Bureau of Industry Canada for radio equipment testing with Registration No.: 7673A.

- **CNAS Registration No.: L4062**

Shenzhen SEM.Test Electronics Service Co., Ltd. is a testing organization accredited by China National Accreditation Service for Conformity Assessment (CNAS) according to ISO/IEC 17025. The accreditation certificate number is L4062. All measurement facilities used to collect the measurement data are located at 3/F, Jinbao Commerce Building, Xin'an Fanshen Road, Bao'an District, Shenzhen, P.R.C (518101)

## 1.5 EUT Setup and Test Mode

The EUT was operated in the engineering mode to fix the Tx frequency that was for the purpose of the measurements. All testing shall be performed under maximum output power condition, and to measure its highest possible emissions level, more detailed description as follows:

Test Mode List		
Test Mode	Description	Remark
TM1	802.11b	2412MHz, 2437MHz, 2462MHz
TM2	802.11g	2412MHz, 2437MHz, 2462MHz
TM3	802.11n-HT20	2412MHz, 2437MHz, 2462MHz
TM4	802.11n-HT40	2422MHz, 2437MHz, 2452MHz

Special Cable List and Details			
Cable Description	Length (m)	Shielded/Unshielded	With / Without Ferrite
USB Cable	1.0	Shielded	Without Ferrite

Auxiliary Equipment List and Details			
Description	Manufacturer	Model	Serial Number
Notebook	IBM	E10	/

## 2. SUMMARY OF TEST RESULTS

<b>FCC Rules</b>	<b>Description of Test Item</b>	<b>Result</b>
§ 15.203; § 15.247(b)(4)(i)	Antenna Requirement	Compliant
§ 15.207(a)	Conducted Emission	Compliant
§ 15.247(e)	Power Spectral Density	Compliant
§ 15.247(a)(2)	6 dB Bandwidth	Compliant
§ 15.247(b)(3)	RF Output Power	Compliant
§ 15.209(a)(d)	Radiated Emission	Compliant
§ 15.247(d)	Band Edge (Out of Band Emissions)	Compliant

N/A: not applicable

### **3. RF Exposure**

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#### **3.1 Standard Applicable**

According to § 1.1307 and § 2.1093, the portable transmitter must comply the RF exposure requirements.

#### **3.2 Test Result**

This product complied with the requirement of the RF exposure, please see the RF Exposure report.

## **4. Antenna Requirement**

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### **4.1 Standard Applicable**

According to FCC Part 15.203, an intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device. The use of a permanently attached antenna or of an antenna that uses a unique coupling to the intentional radiator shall be considered sufficient to comply with the provisions of this section.

### **4.2 Evaluation Information**

This product has a permanent antenna, fulfill the requirement of this section.



## 5. Power Spectral Density

### 5.1 Standard Applicable

According to 15.247(a)(1)(iii), For digitally modulated systems, the power spectral density conducted from the intentional radiator to the antenna shall not be greater than 8 dBm in any 3 kHz band during any time interval of continuous transmission.

### 5.2 Test Equipment List and Details

Description	Manufacturer	Model	Serial Number	Cal. Date	Due. Date
Spectrum Analyzer	Agilent	E4402B	US41192821	2013-05-07	2014-05-06
Attenuator	ATTEN	ATS100-4-20	/	2013-05-07	2014-05-06

### 5.3 Test Procedure

According to the KDB 558074 D01 v03r01, the test method of power spectral density as below:

- Set analyzer center frequency to DTS channel center frequency.
- Set the span to 1.5 times the DTS bandwidth.
- Set the RBW to:  $3 \text{ kHz} \leq \text{RBW} \leq 100 \text{ kHz}$ .
- Set the VBW  $\geq 3 \text{ RBW}$ .
- Detector = peak.
- Sweep time = auto couple.
- Trace mode = max hold.
- Allow trace to fully stabilize.
- Use the peak marker function to determine the maximum amplitude level within the RBW.
- If measured value exceeds limit, reduce RBW (no less than 3 kHz) and repeat.

### 5.4 Environmental Conditions

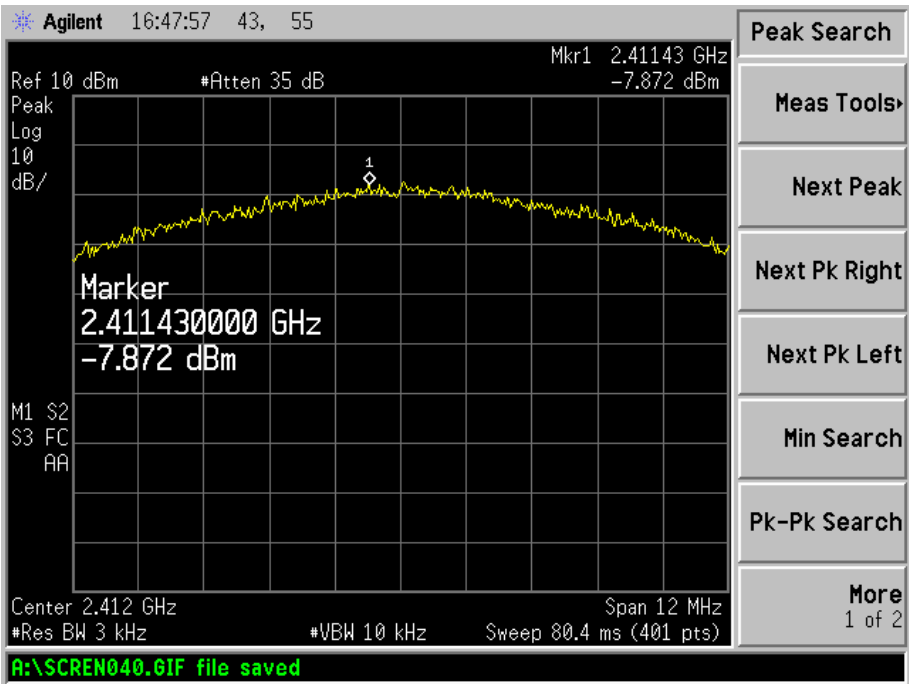
Temperature:	20° C
Relative Humidity:	54%
ATM Pressure:	1011 mbar

**5.5 Summary of Test Results/Plots**

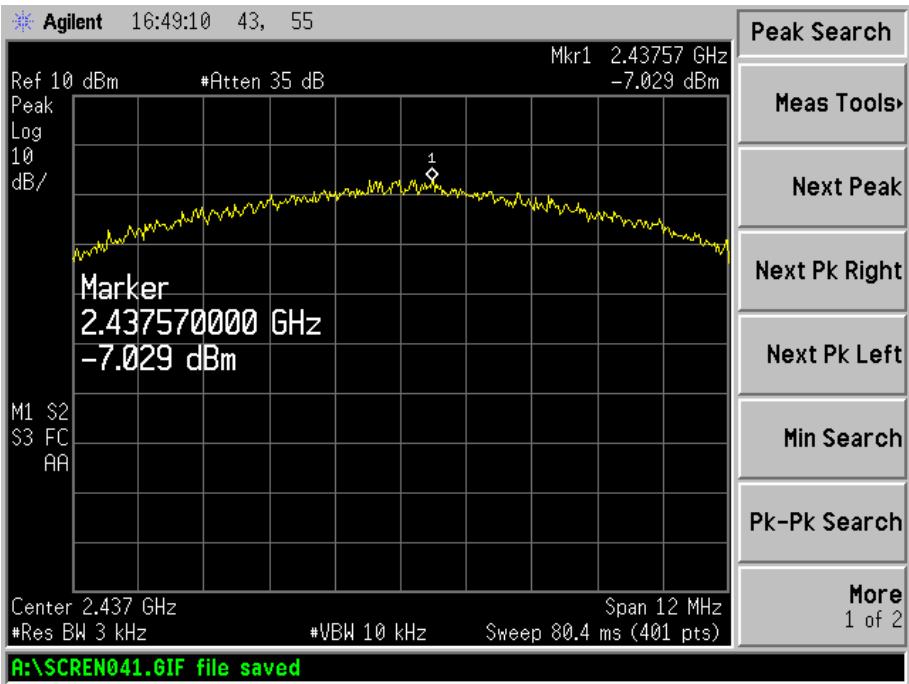
Test Mode	Test Channel MHz	Power Spectral Density dBm/3kHz	Limit dBm
802.11b	2412	-7.872	8
	2437	-7.029	8
	2462	-7.205	8
802.11g	2412	-7.801	8
	2437	-7.100	8
	2462	-7.770	8
802.11n HT20	2412	-8.753	8
	2437	-8.651	8
	2462	-8.452	8
802.11n HT40	2422	-10.890	8
	2437	-8.394	8
	2452	-11.060	8

Please refer to the following test plots:

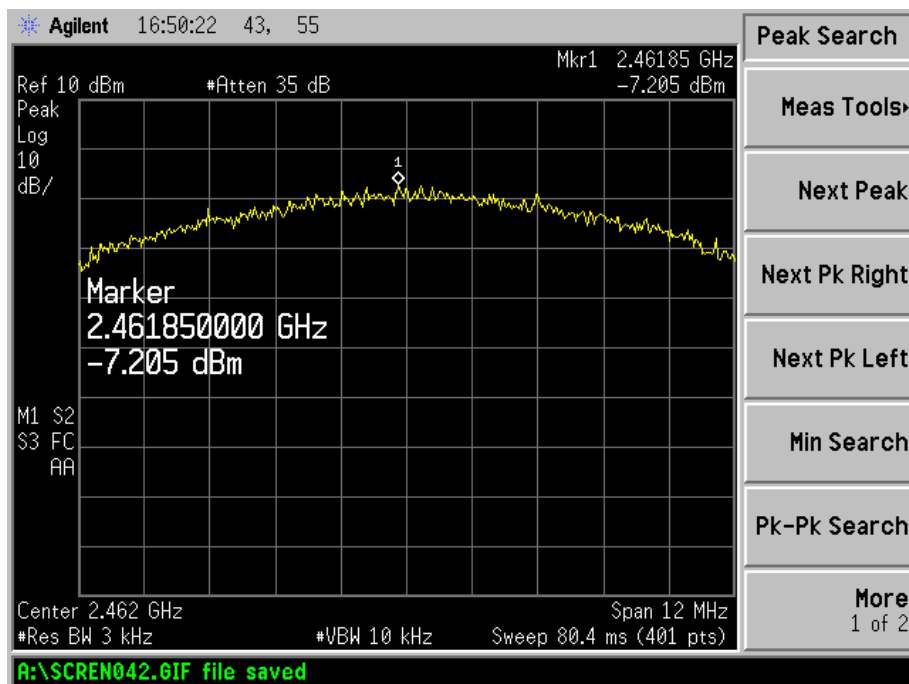
802.11b-Low Channel



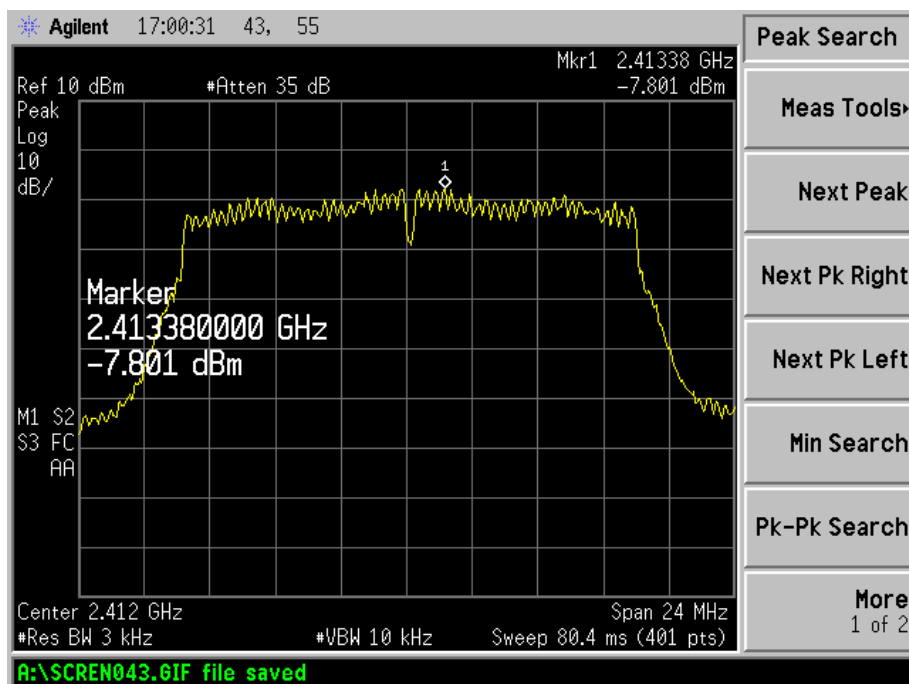
802.11b-Middle Channel



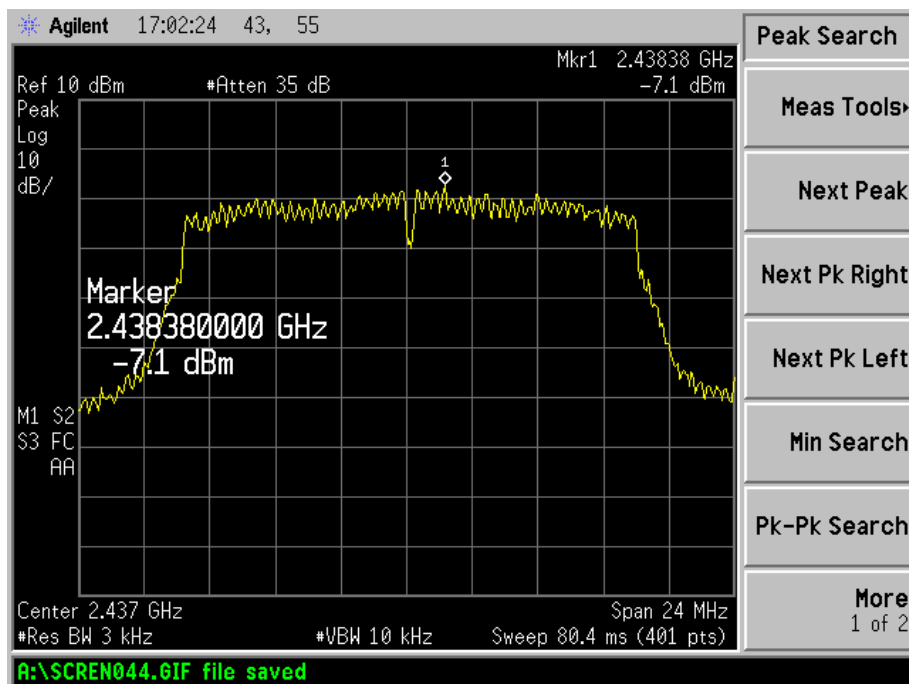
## 802.11b-High Channel



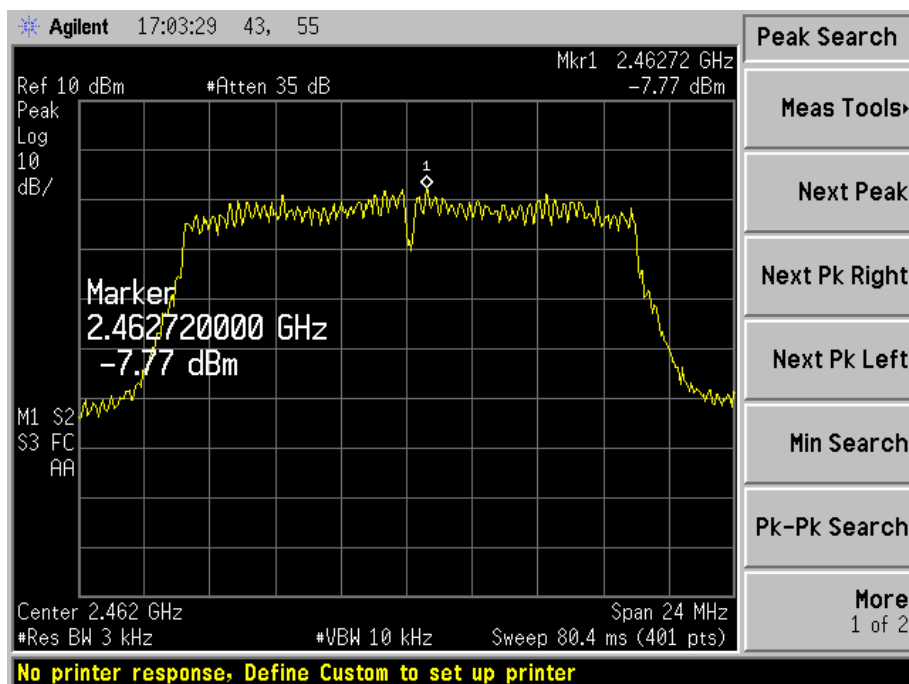
## 802.11g-Low Channel



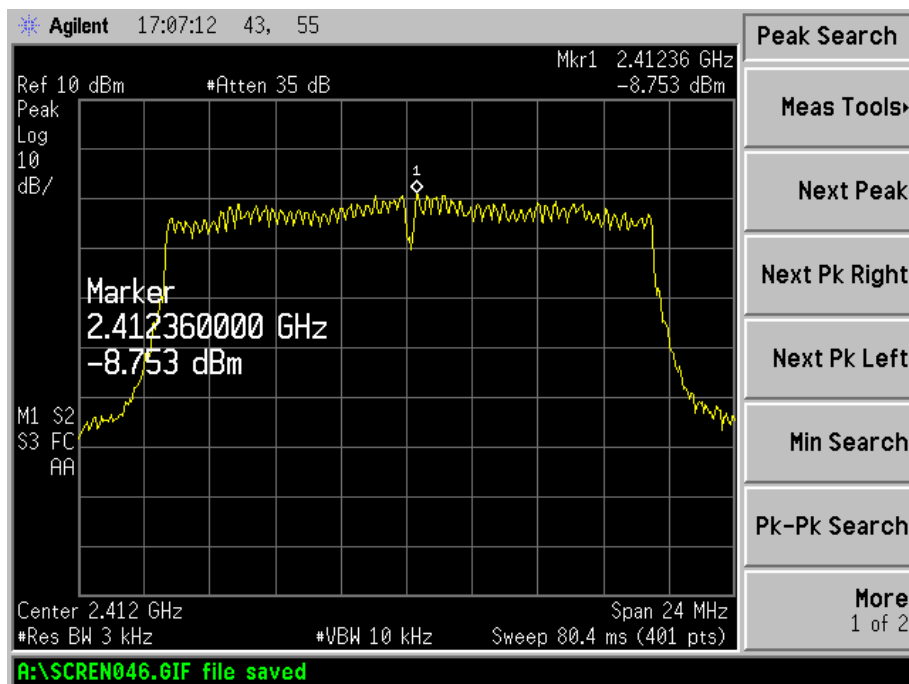
## 802.11g-Middle Channel



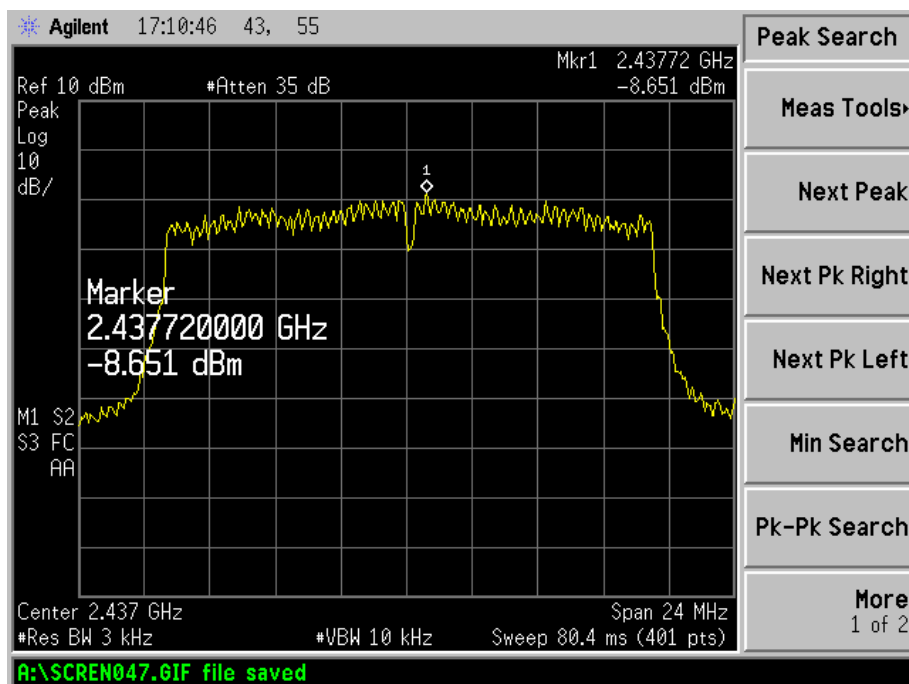
## 802.11g-High Channel



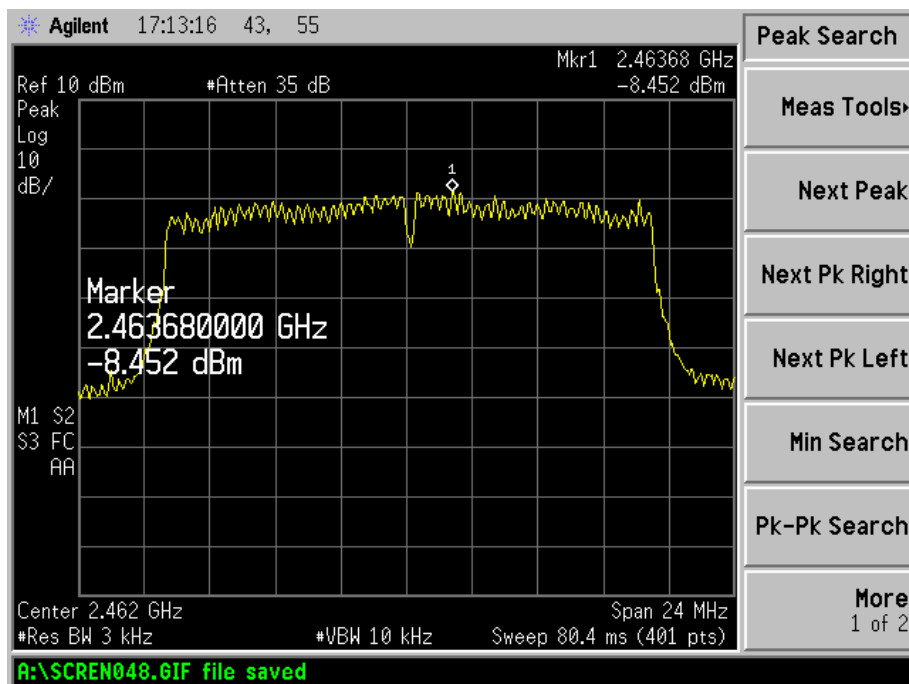
## 802.11n-HT20-Low Channel



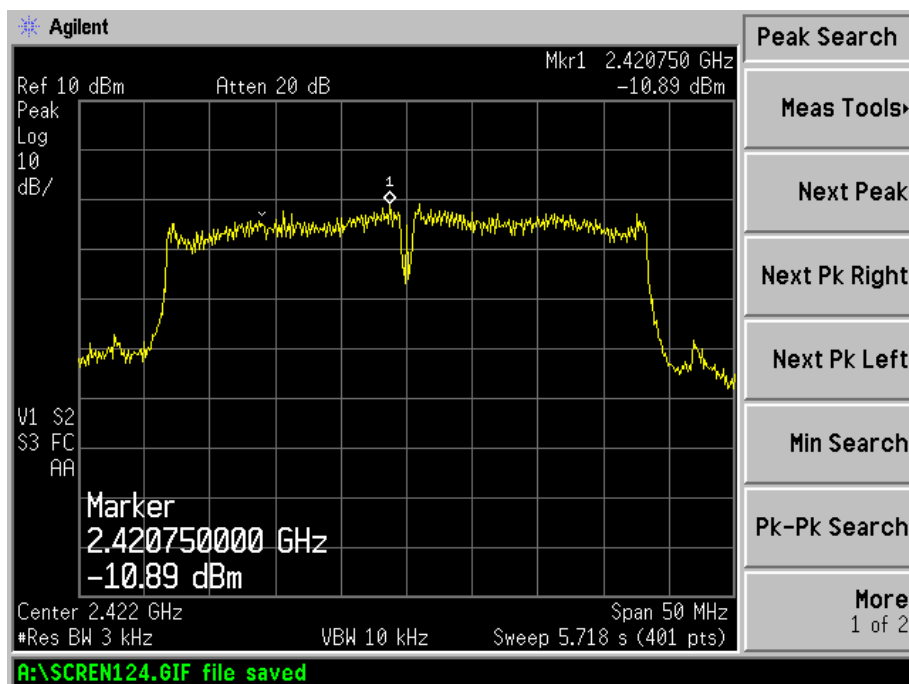
## 802.11n-HT20-Middle Channel



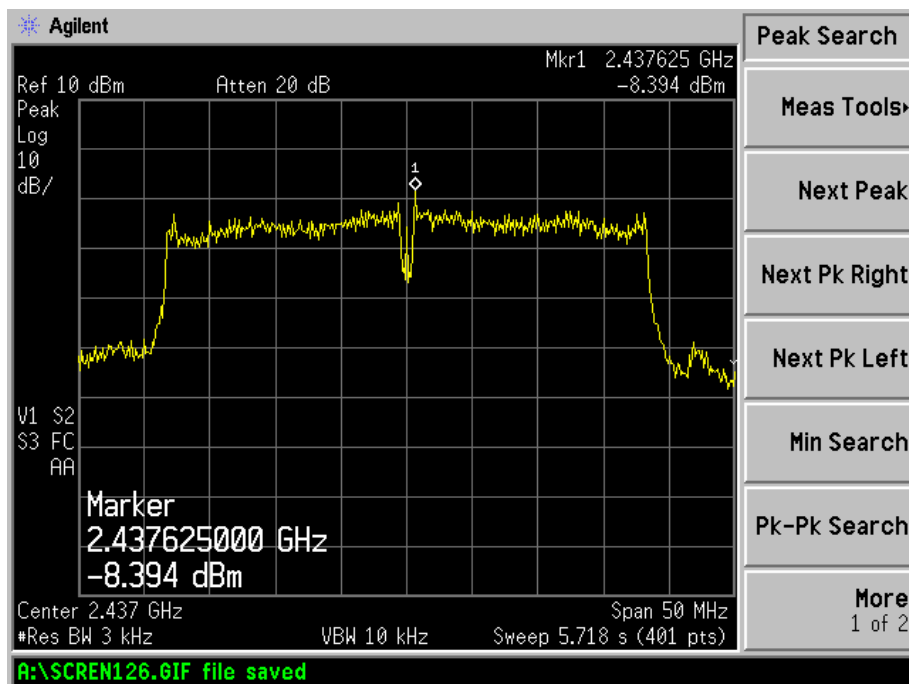
## 802.11n-HT20-High Channel



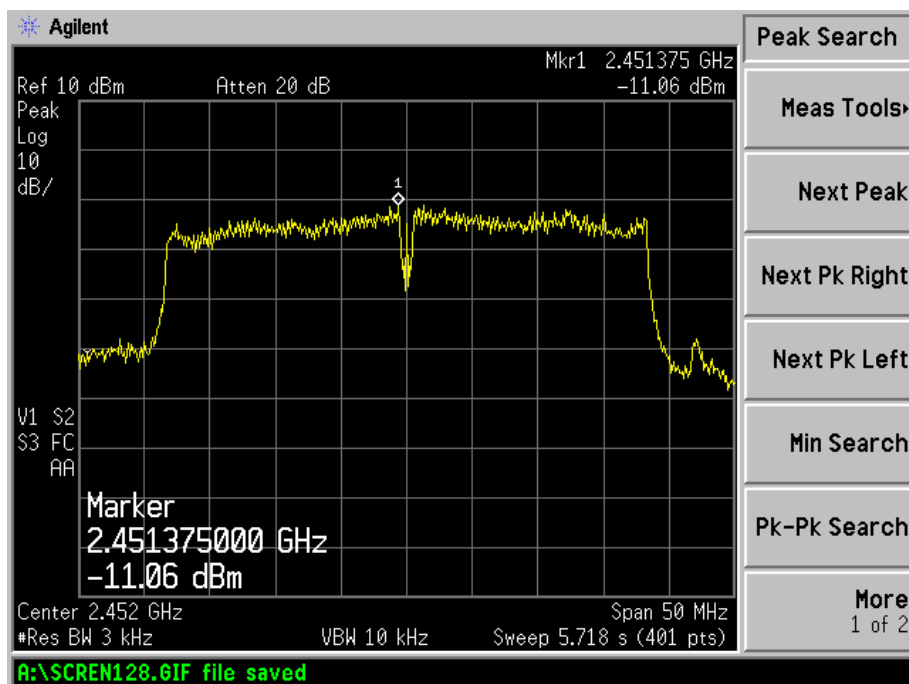
## 802.11n-HT40-Low Channel



## 802.11n-HT40-Middle Channel



## 802.11n-HT40-High Channel





## 6. 6dB Bandwidth

### 6.1 Standard Applicable

According to 15.247(a)(2). Systems using digital modulation techniques may operate in the 902–928 MHz, 2400–2483.5 MHz, and 5725–5850 MHz bands. The minimum 6 dB bandwidth shall be at least 500 kHz.

### 6.2 Test Equipment List and Details

Description	Manufacturer	Model	Serial Number	Cal. Date	Due. Date
Spectrum Analyzer	Agilent	E4402B	US41192821	2013-05-07	2014-05-06
Attenuator	ATTEN	ATS100-4-20	/	2013-05-07	2014-05-06

### 6.3 Test Procedure

1. Remove the antenna from the EUT and then connect a low loss RF cable from the antenna port to the spectrum analyzer.
2. Set RBW = 100 kHz.
3. Set the video bandwidth (VBW)  $\geq 3 \times \text{RBW}$ .
4. Detector = Peak.
5. Trace mode = max hold.
6. Sweep = auto couple.
7. Allow the trace to stabilize.
8. Measure the maximum width of the emission that is constrained by the frequencies associated with the two outermost amplitude points (upper and lower frequencies) that are attenuated by 6 dB relative to the maximum level measured in the fundamental emission.

### 6.4 Environmental Conditions

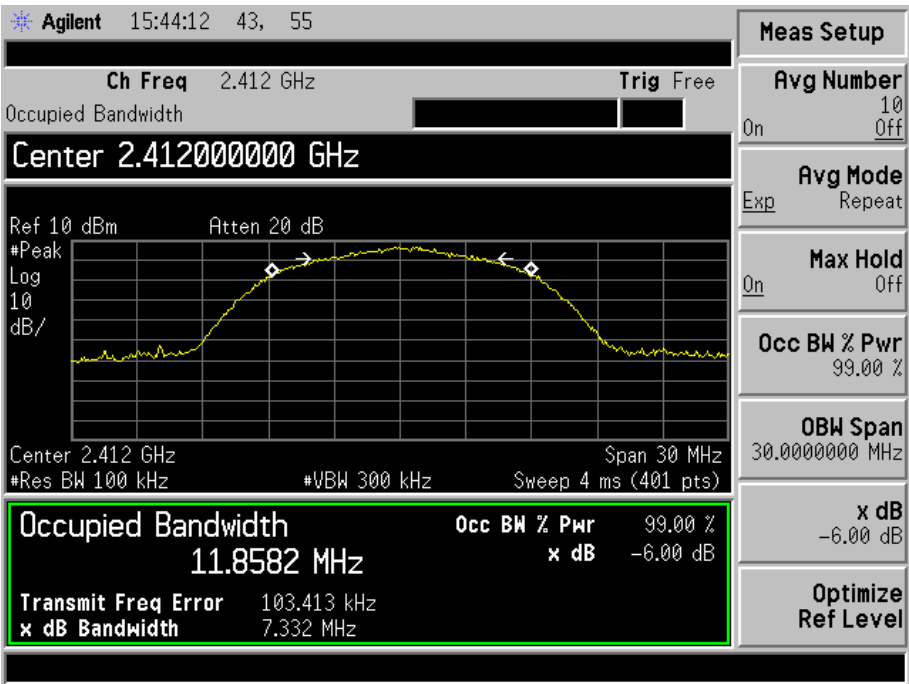
Temperature:	24° C
Relative Humidity:	53%
ATM Pressure:	1018 mbar

**6.5 Summary of Test Results/Plots**

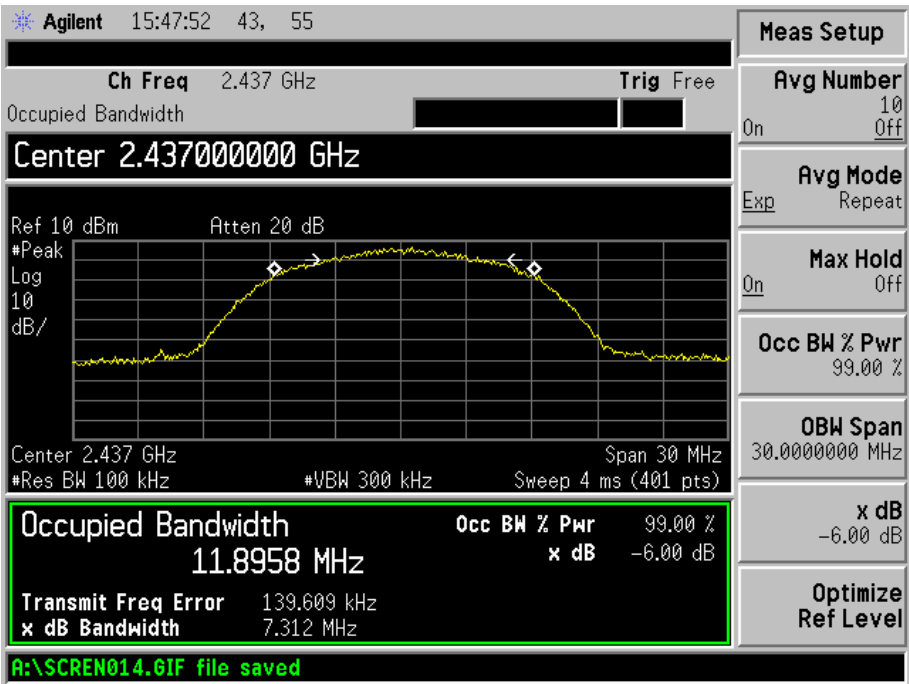
<b>Test Mode</b>	<b>Test Channel MHz</b>	<b>6 dB Bandwidth kHz</b>	<b>Limit kHz</b>
802.11b	2412	7332	500
	2437	7312	500
	2462	7154	500
802.11g	2412	15081	500
	2437	15512	500
	2462	15171	500
802.11n-HT20	2412	17566	500
	2437	17217	500
	2462	17196	500
802.11n-HT40	2422	34815	500
	2437	34733	500
	2452	34661	500

Please refer to the following test plots:

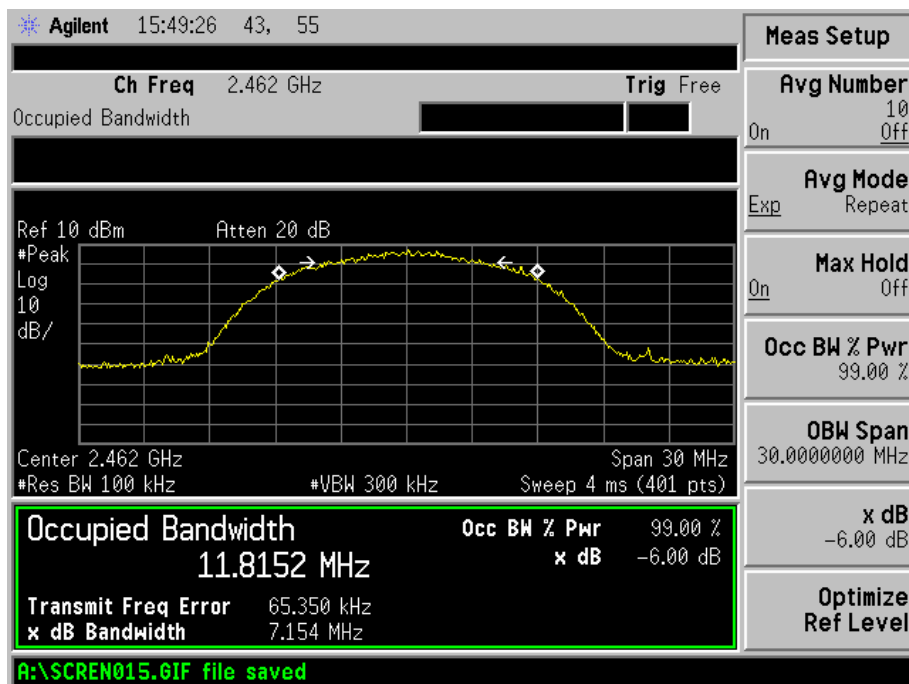
802.11b-Low Channel



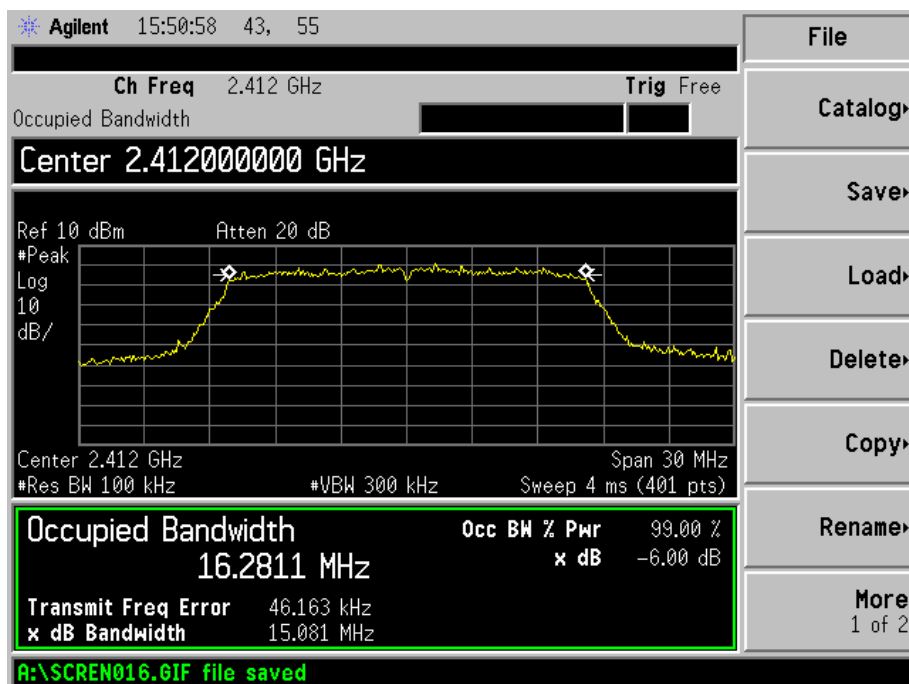
802.11b-Middle Channel



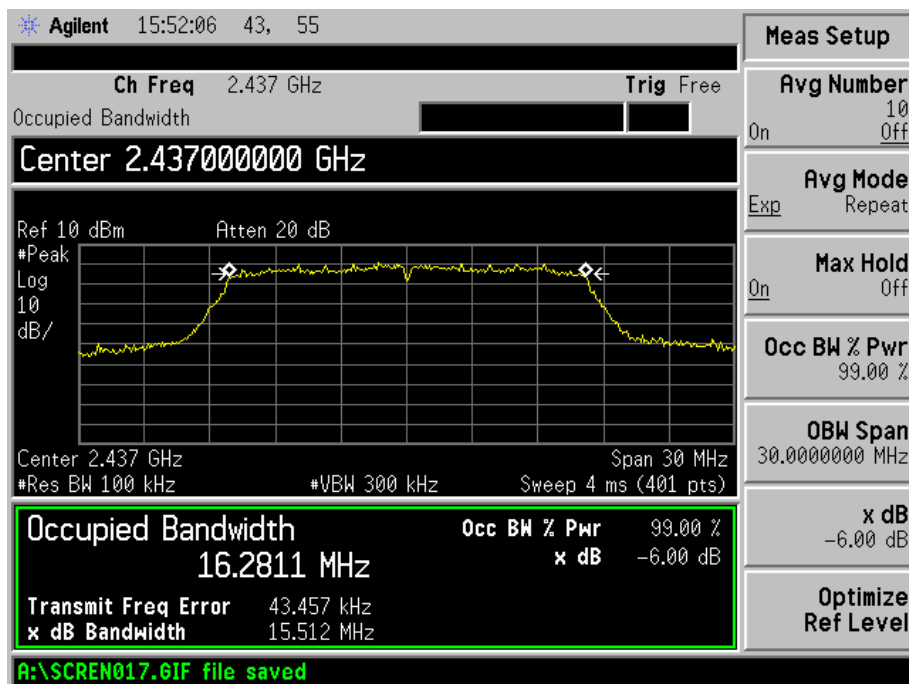
## 802.11b-High Channel



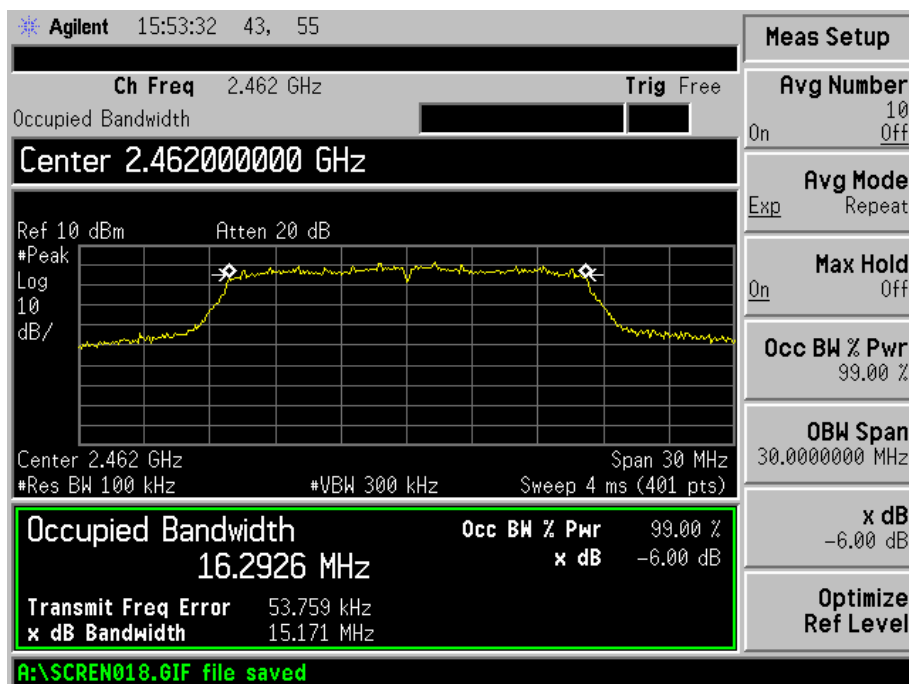
## 802.11g-Low Channel



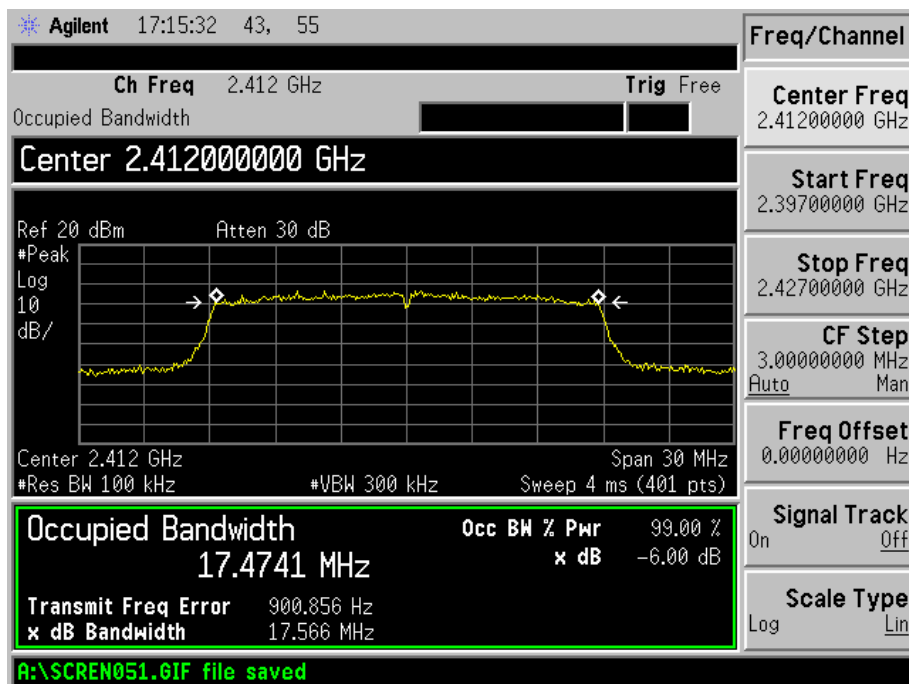
## 802.11g-Middle Channel



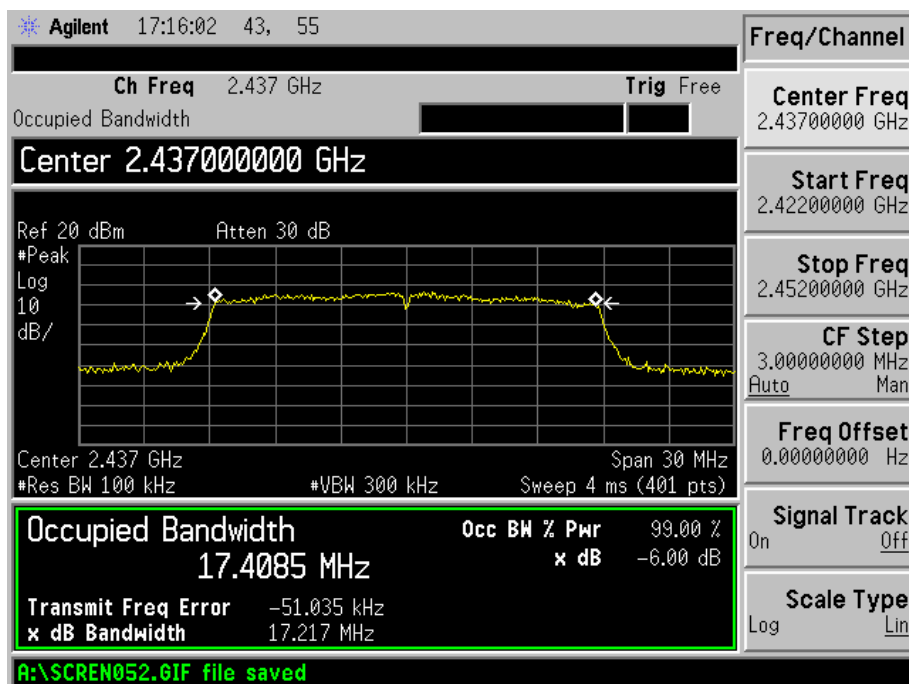
## 802.11g-High Channel



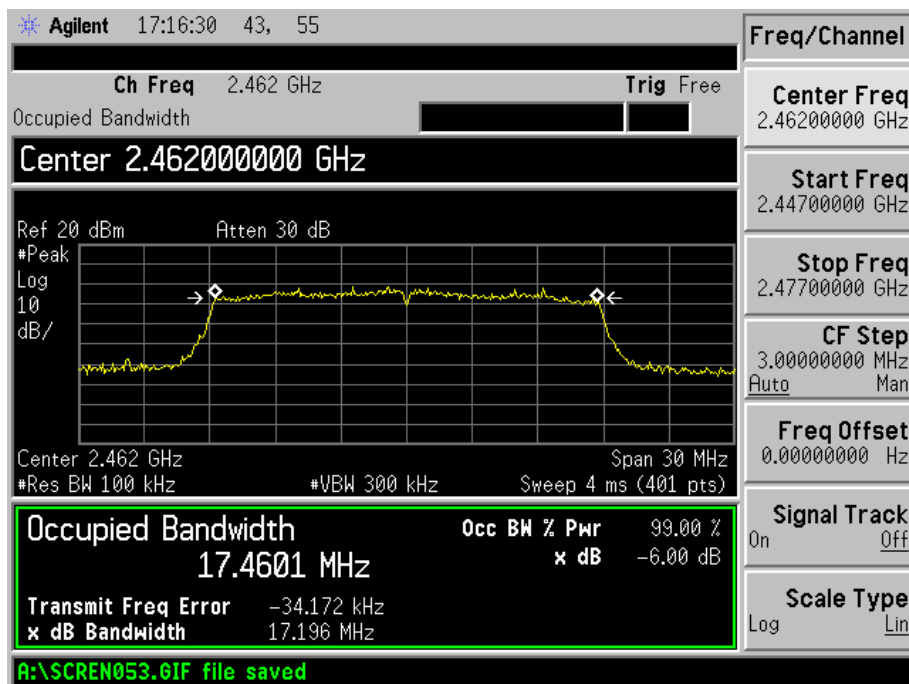
## 802.11n-HT20-Low Channel



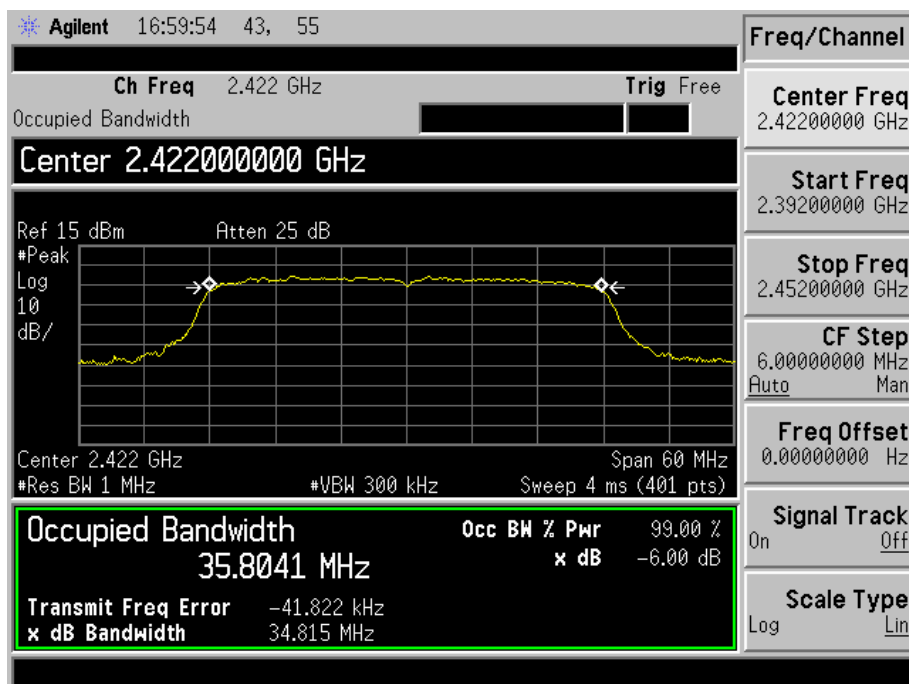
## 802.11n-HT20-Middle Channel



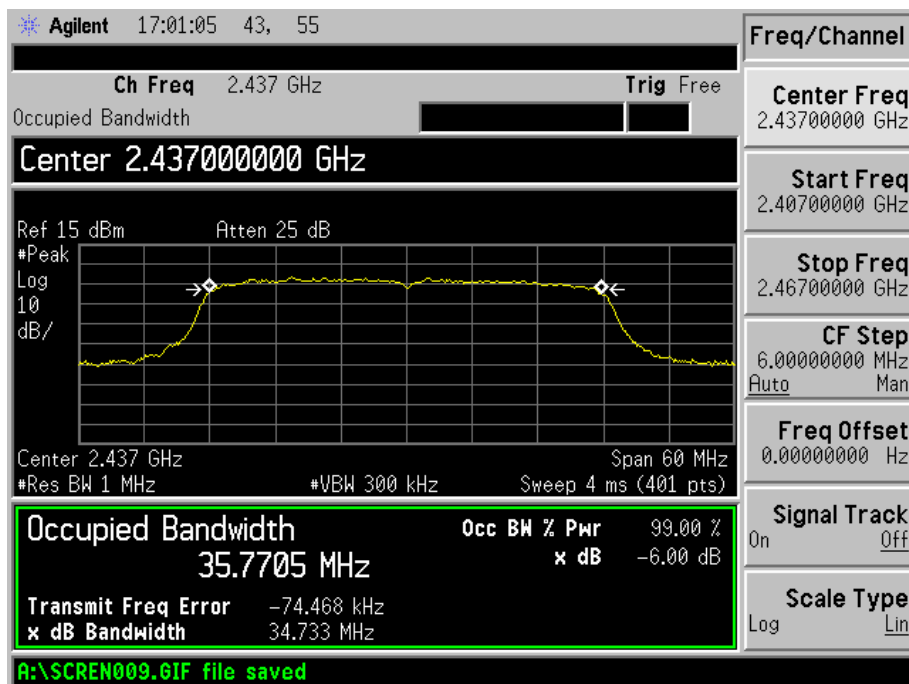
## 802.11n-HT20-High Channel



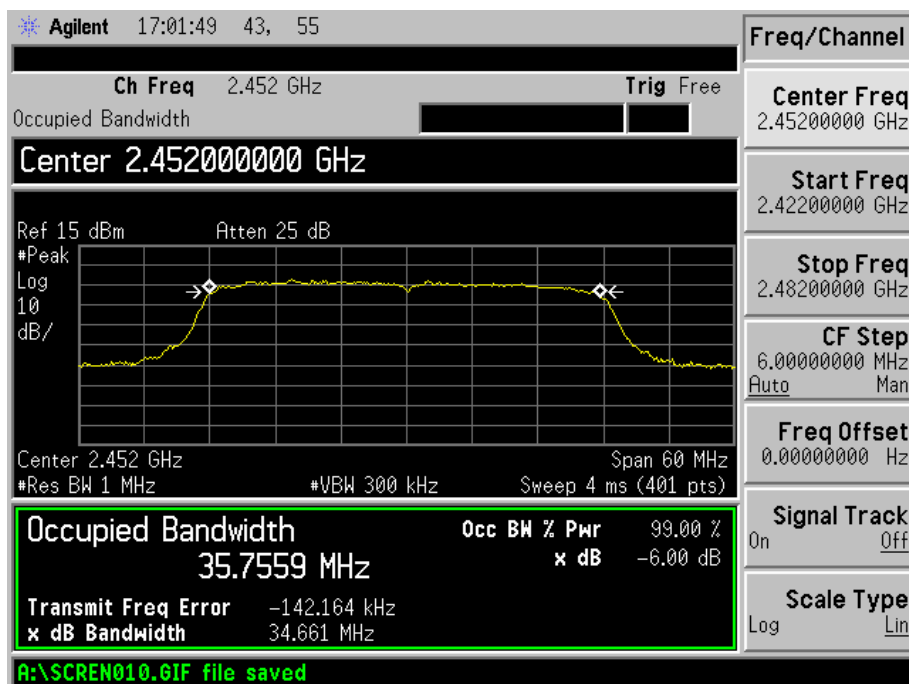
## 802.11n-HT40-Low Channel



## 802.11n-HT40-Middle Channel



## 802.11n-HT40-High Channel





## 7. RF Output Power

### 7.1 Standard Applicable

According to 15.247(b)(3). For systems using digital modulation in the 902–928 MHz, 2400–2483.5 MHz, and 5725–5850 MHz bands: 1 Watt.

### 7.2 Test Equipment List and Details

Description	Manufacturer	Model	Serial Number	Cal. Date	Due. Date
Spectrum Analyzer	Agilent	E4402B	US41192821	2013-05-07	2014-05-06
Attenuator	ATTEN	ATS100-4-20	/	2013-05-07	2014-05-06

**Statement of Traceability:** All calibrations have been performed per the NVLAP requirements traceable to the NIST.

### 7.3 Test Procedure

According to section 15.247(b)-power output of the KDB 558074 D01 v03r01, 8.1.2 Option 2 (channel integration method) this procedure should only be used when the maximum available RBW of the spectrum/signal analyzer is less than the DTS bandwidth.

1. Set the RBW = 1 MHz.
2. Set the VBW  $\geq$  3 RBW
3. Set the span  $\geq$  1.5 x DTS bandwidth.
4. Detector = peak.
5. Sweep time = auto couple.
6. Trace mode = max hold.
7. Allow trace to fully stabilize.
8. Use the instrument's band/channel power measurement function with the band limits set equal to the DTS bandwidth edges (for some instruments, this may require a manual override to select peak detector). If the instrument does not have a band power function, sum the spectrum levels (in linear power units) at intervals equal to the RBW extending across the DTS bandwidth.

### 7.4 Environmental Conditions

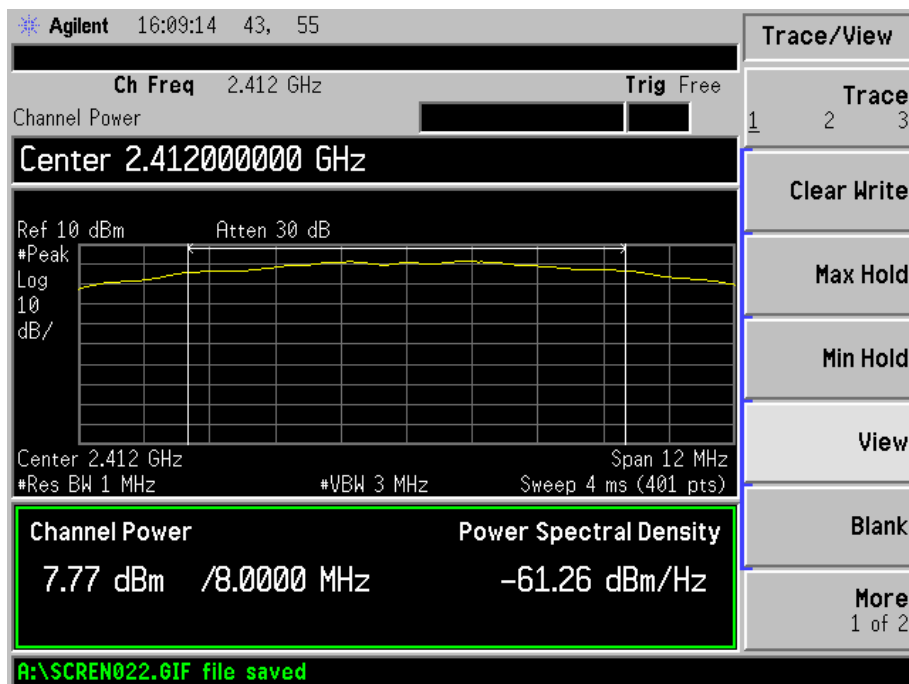
Temperature:	21° C
Relative Humidity:	55%
ATM Pressure:	1011 mbar

## 7.5 Summary of Test Results/Plots

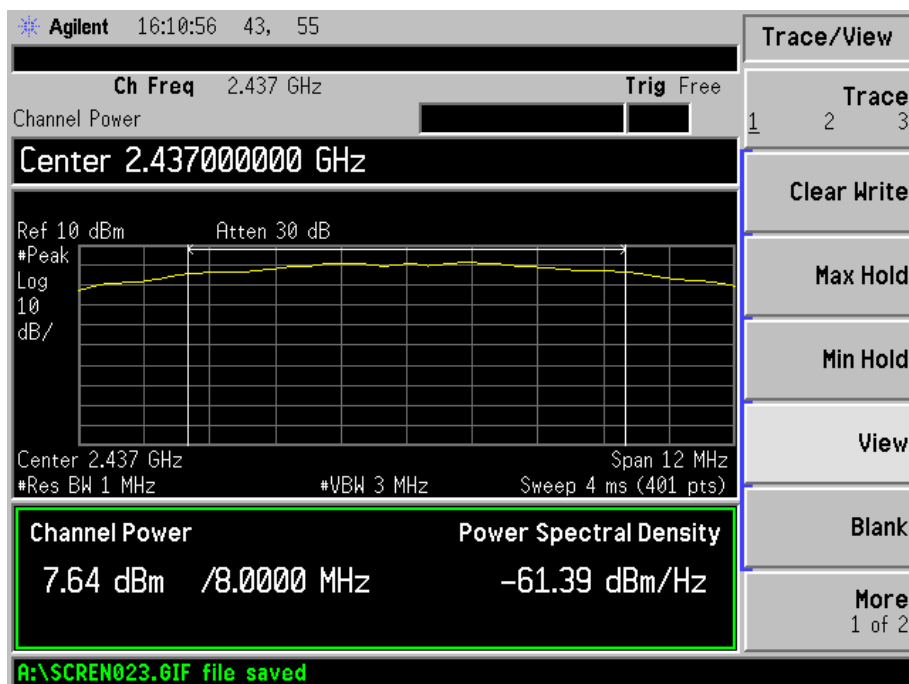
Test Mode	Frequency MHz	Reading dBm	Output Power mW	Limit mW
802.11b _1Mbps	2412	7.77	5.9841	1000
	2437	7.64	5.8076	1000
	2462	7.72	5.9156	1000
802.11b _11Mbps	2412	7.53	5.6624	1000
	2437	7.66	5.8345	1000
	2462	7.61	5.7677	1000
802.11g_6Mbps	2412	5.81	3.8107	1000
	2437	6.11	4.0832	1000
	2462	6.17	4.1400	1000
802.11g_54Mbps	2412	5.47	3.5237	1000
	2437	5.58	3.6141	1000
	2462	5.84	3.8371	1000
802.11n HT20_MCS0	2412	6.54	4.5082	1000
	2437	6.79	4.7753	1000
	2462	6.05	4.0272	1000
802.11n HT20_MCS7	2412	6.56	4.5290	1000
	2437	6.81	4.7973	1000
	2462	6.56	4.5290	1000
802.11n HT40_MCS0	2422	6.51	4.4771	1000
	2437	6.79	4.7753	1000
	2452	6.08	4.0551	1000
802.11n HT40_MCS7	2422	6.76	4.7424	1000
	2437	6.41	4.3752	1000
	2452	6.18	4.1495	1000

Please refer to the following test plots:

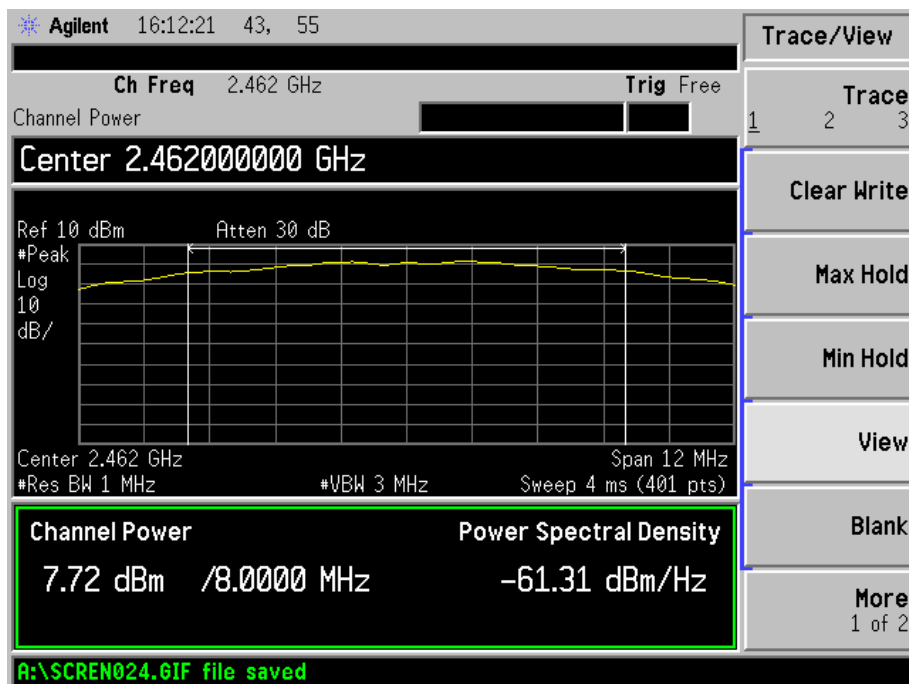
## 802.11b-1Mbps-Low Channel



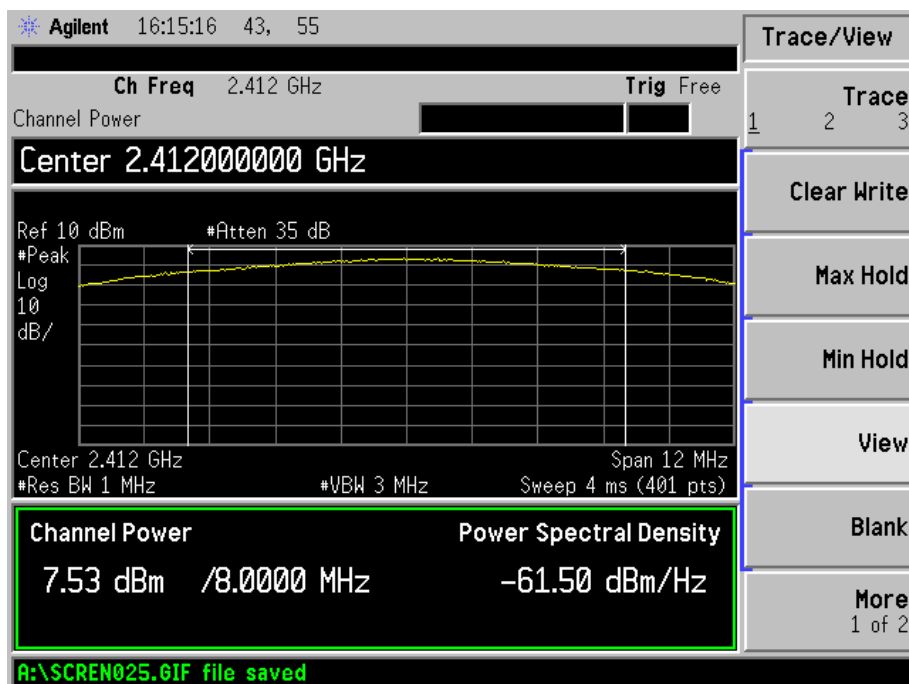
## 802.11b-1Mbps-Middle Channel



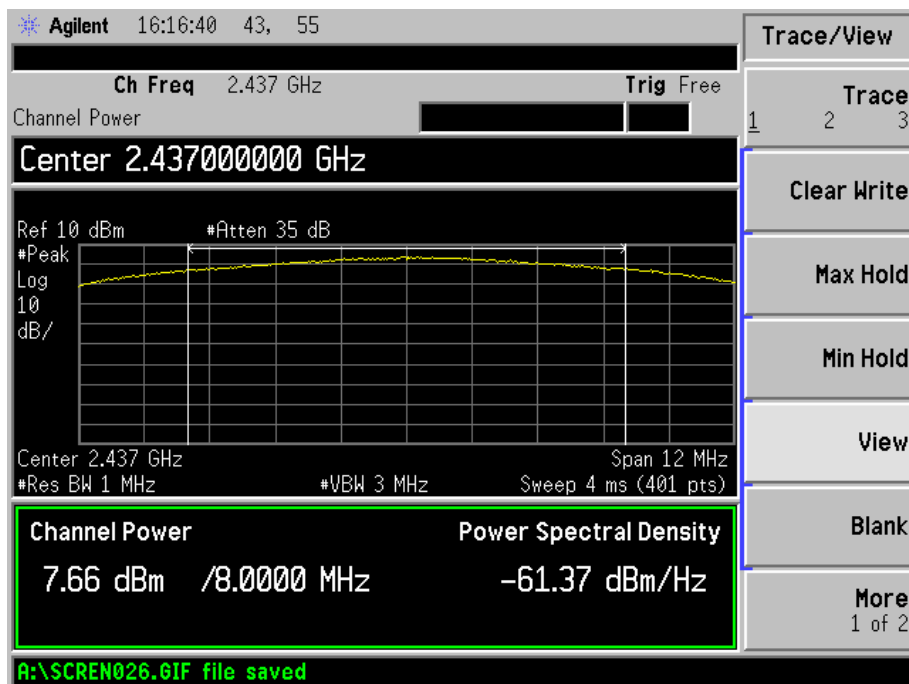
## 802.11b-1Mbps-High Channel



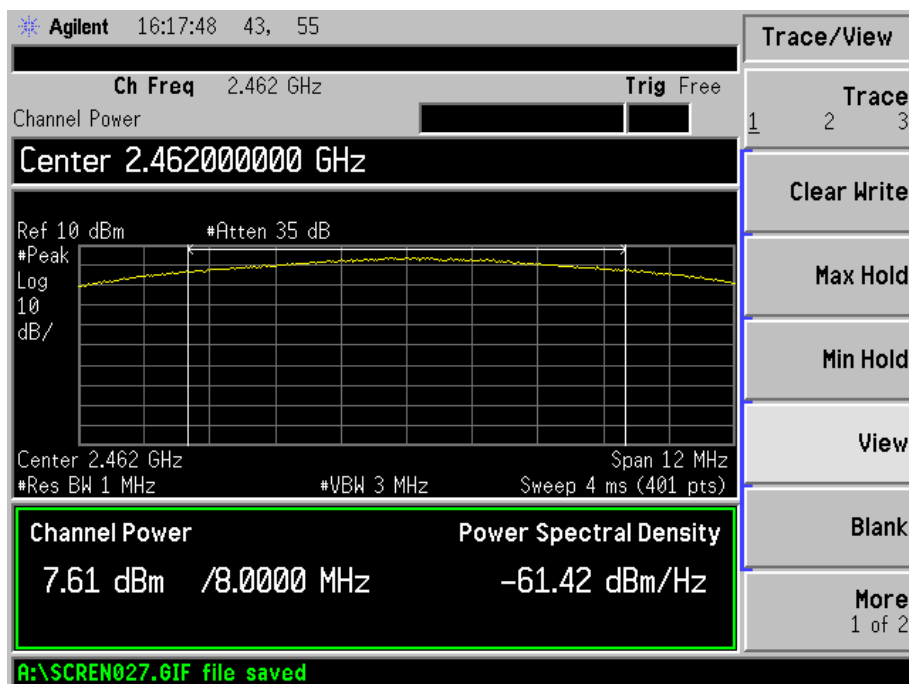
## 802.11b-11Mbps-Low Channel



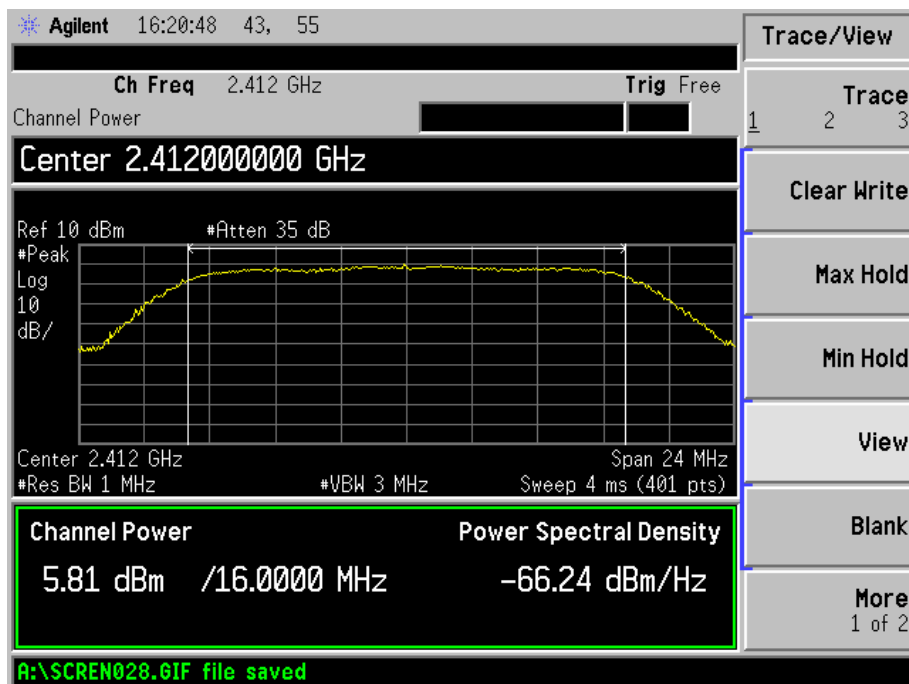
## 802.11b-11Mbps-Middle Channel



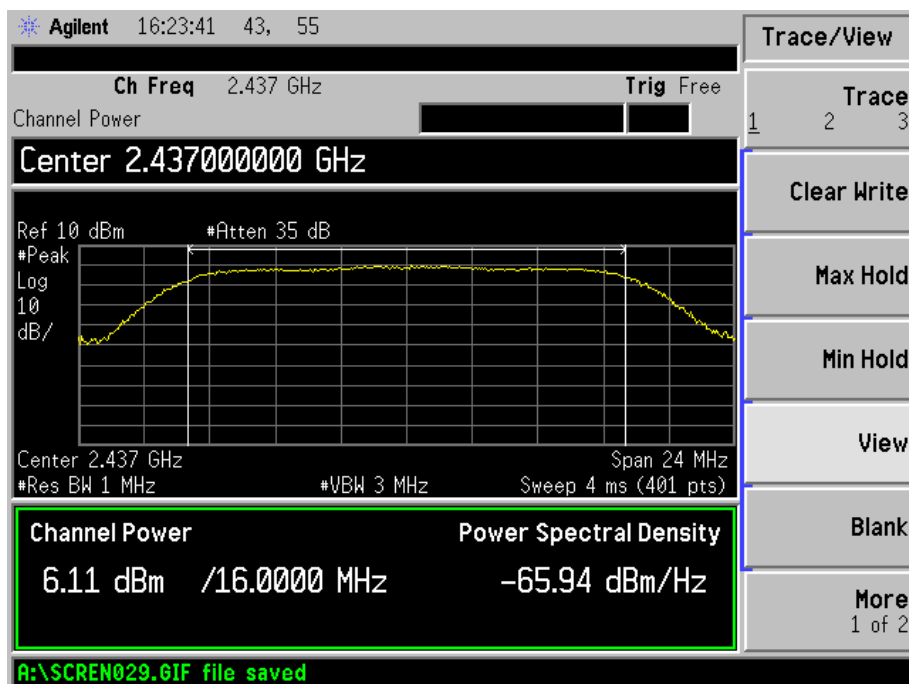
## 802.11b-11Mbps-High Channel



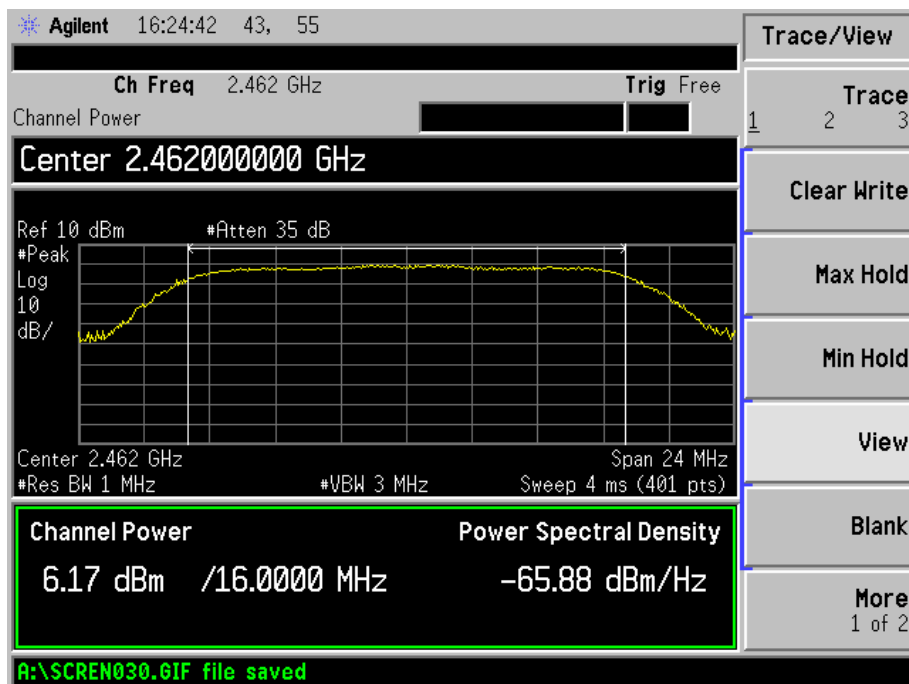
## 802.11g-6Mbps-Low Channel



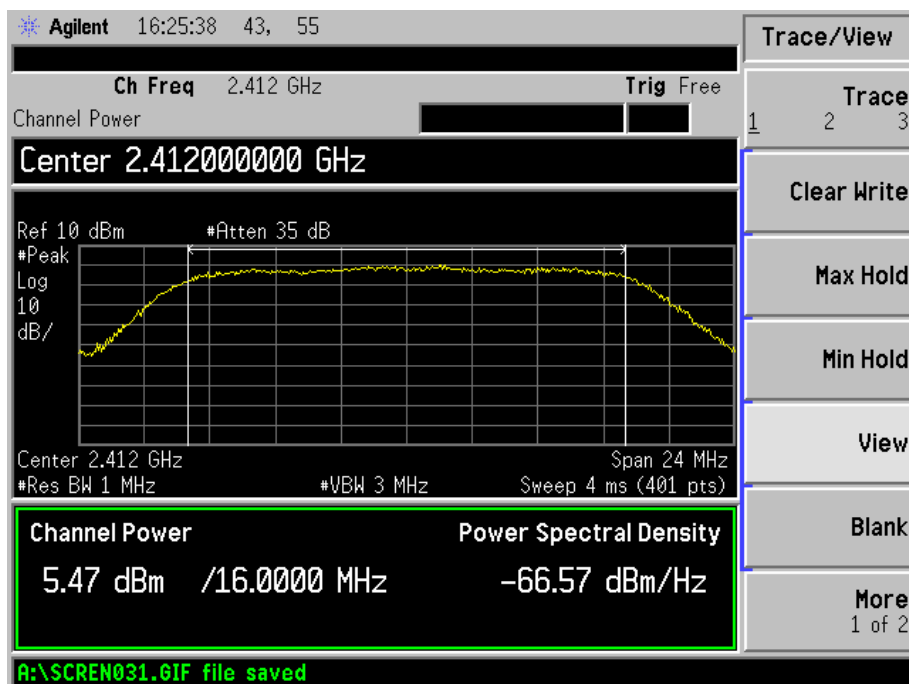
## 802.11g-6Mbps-Middle Channel



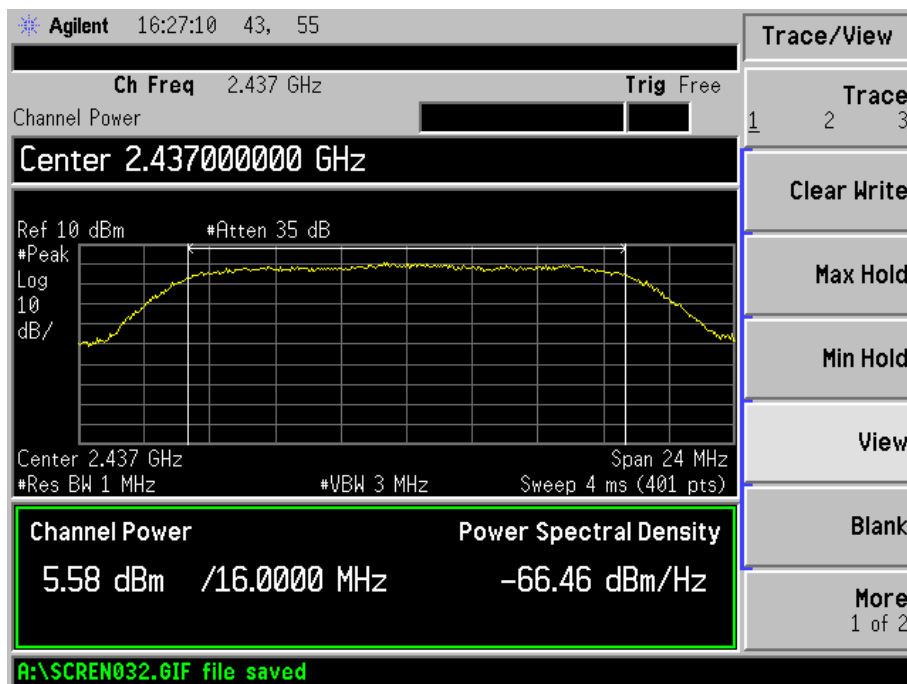
## 802.11g-6Mbps-High Channel



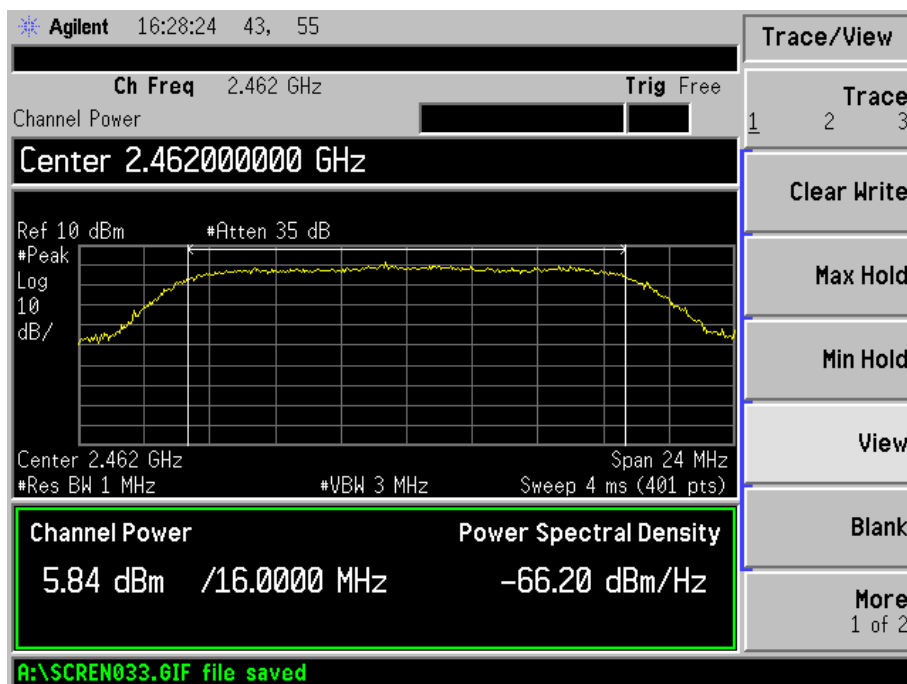
## 802.11g-54Mbps-Low Channel



## 802.11g-54Mbps-Middle Channel

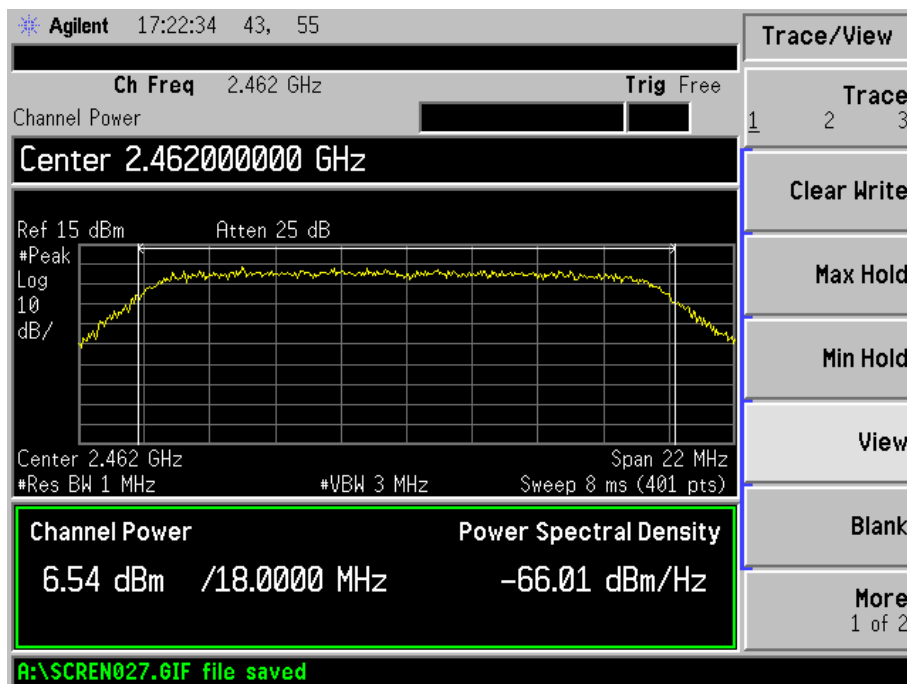


## 802.11g-54Mbps-High Channel

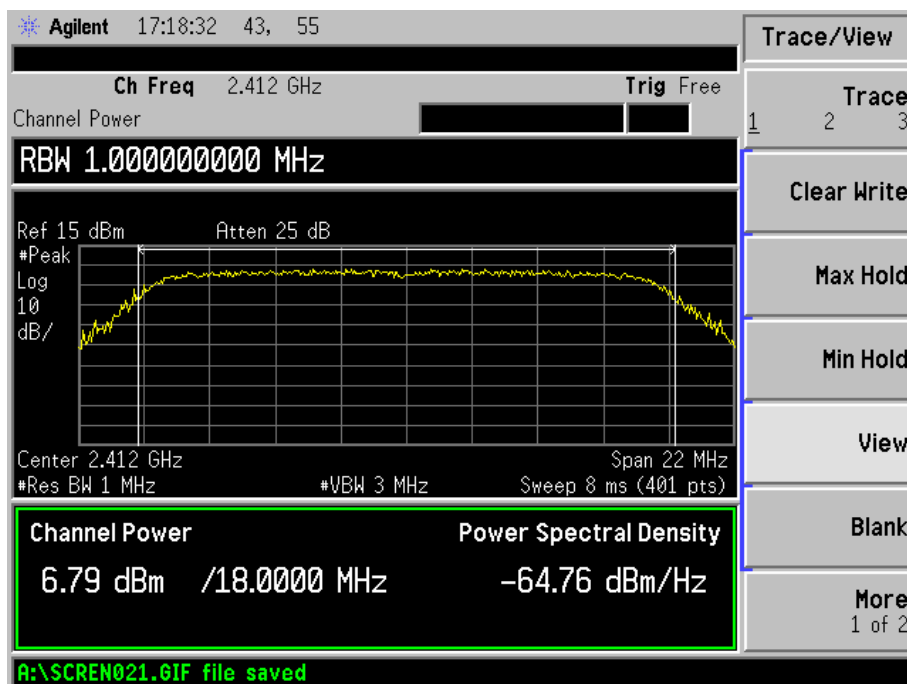




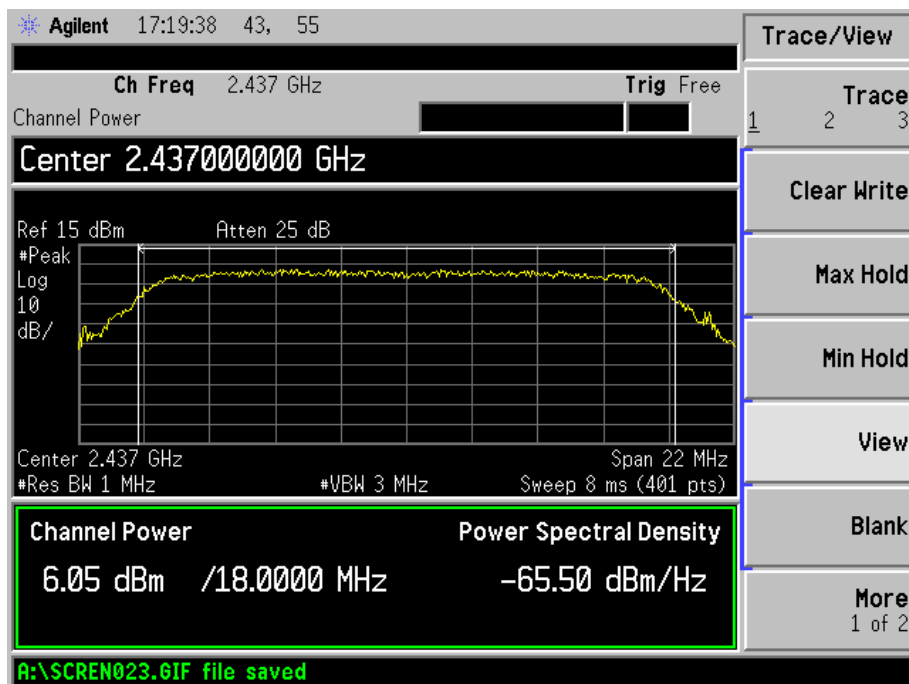
## 802.11n-HT20-MCS0-Low Channel



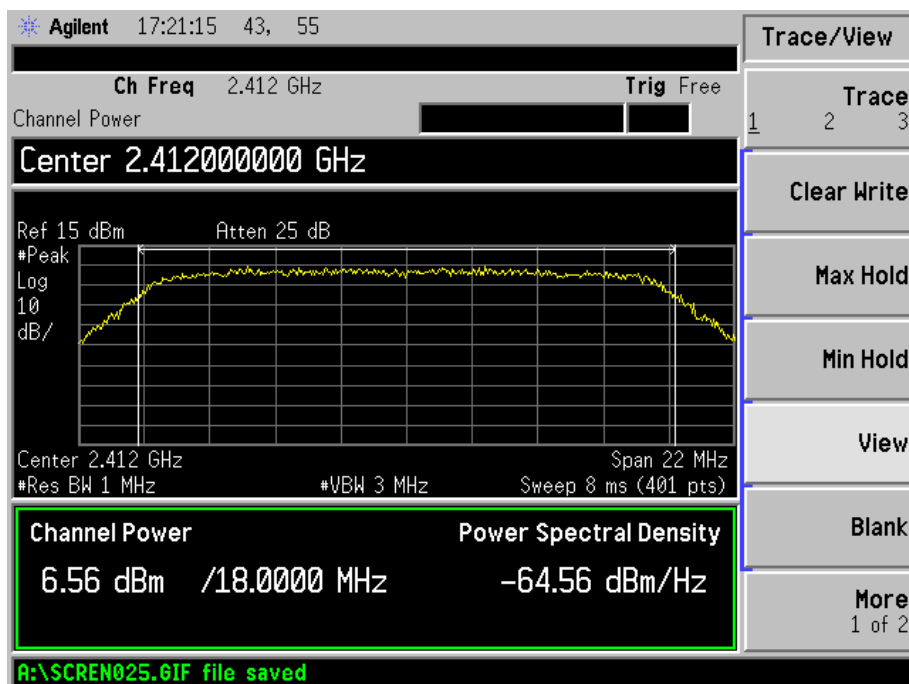
## 802.11n-HT20-MCS0-Middle Channel



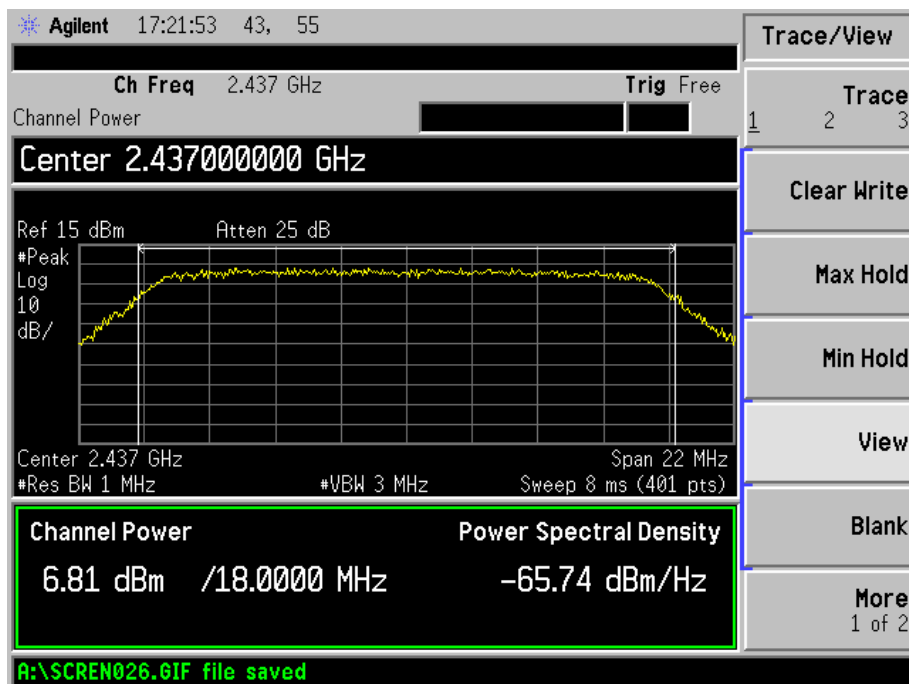
## 802.11n-HT20-MCS0-High Channel



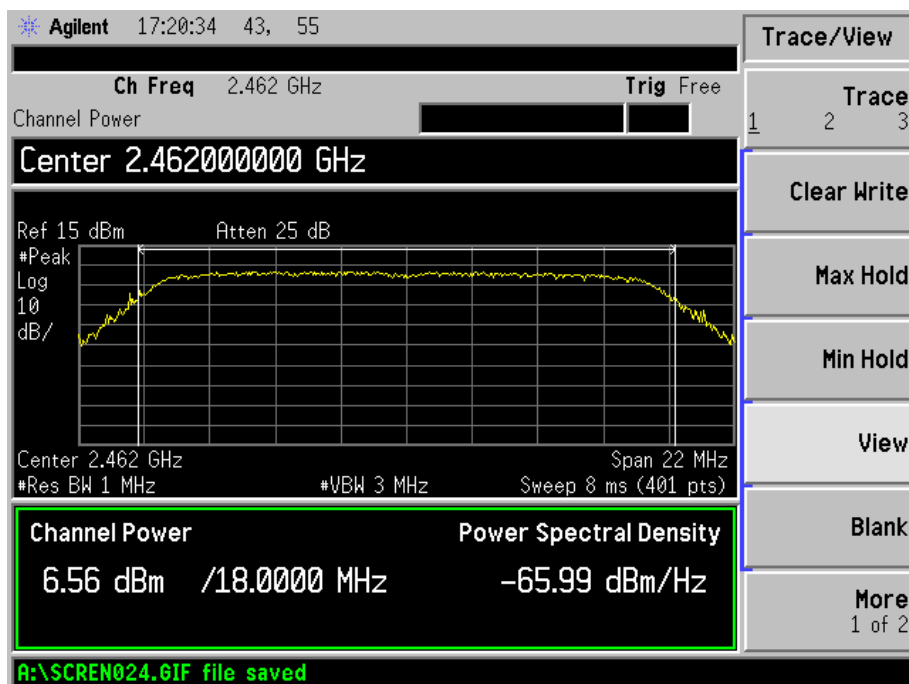
## 802.11n-HT20-MCS7-Low Channel



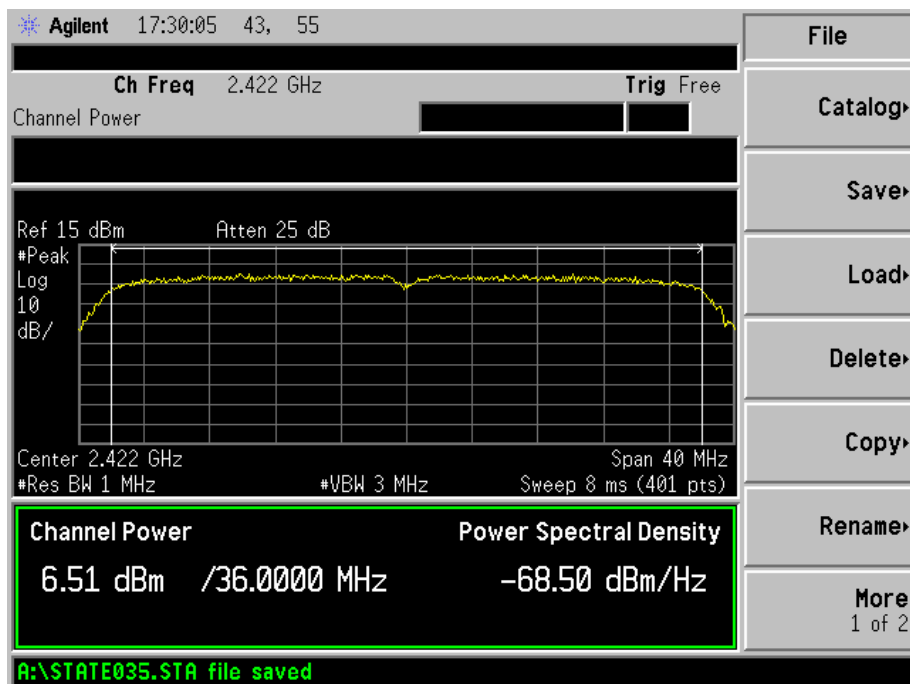
## 802.11n-HT20-MCS7-Middle Channel



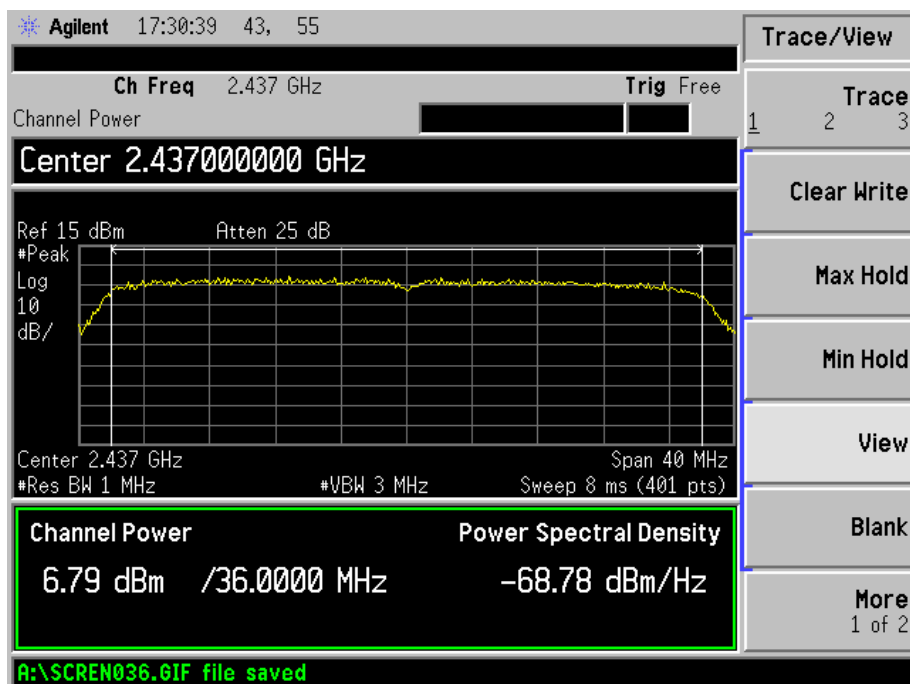
## 802.11n-HT20-MCS7-High Channel



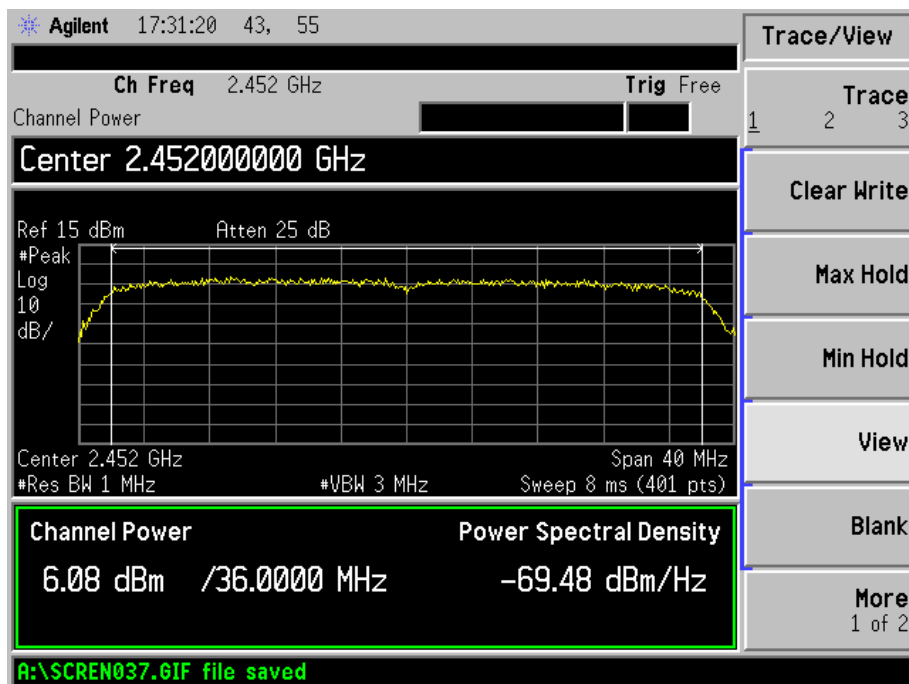
## 802.11n-HT40-MCS0-Low Channel



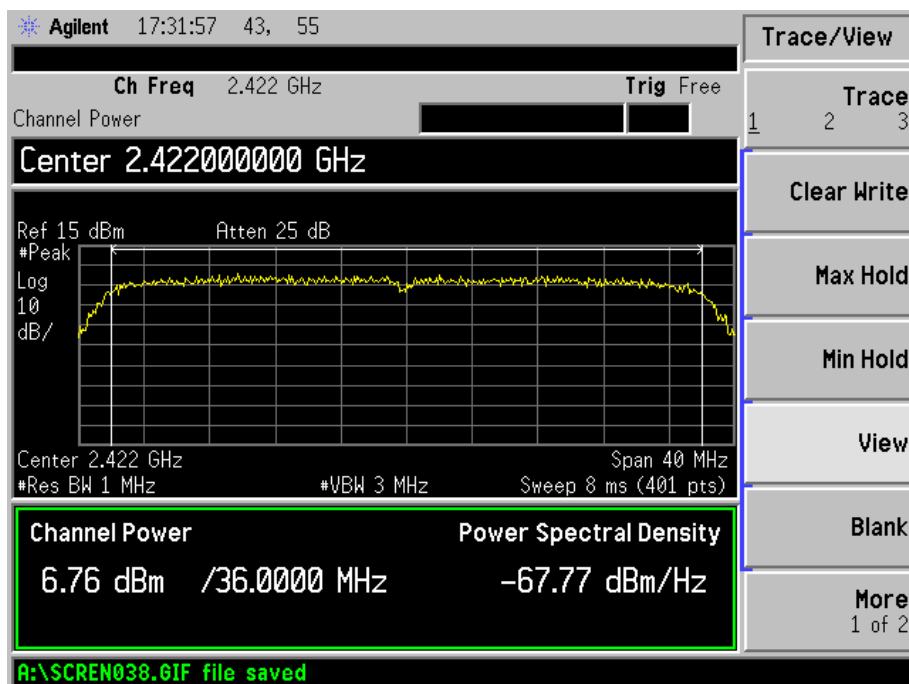
## 802.11n-HT40-MCS0-Middle Channel



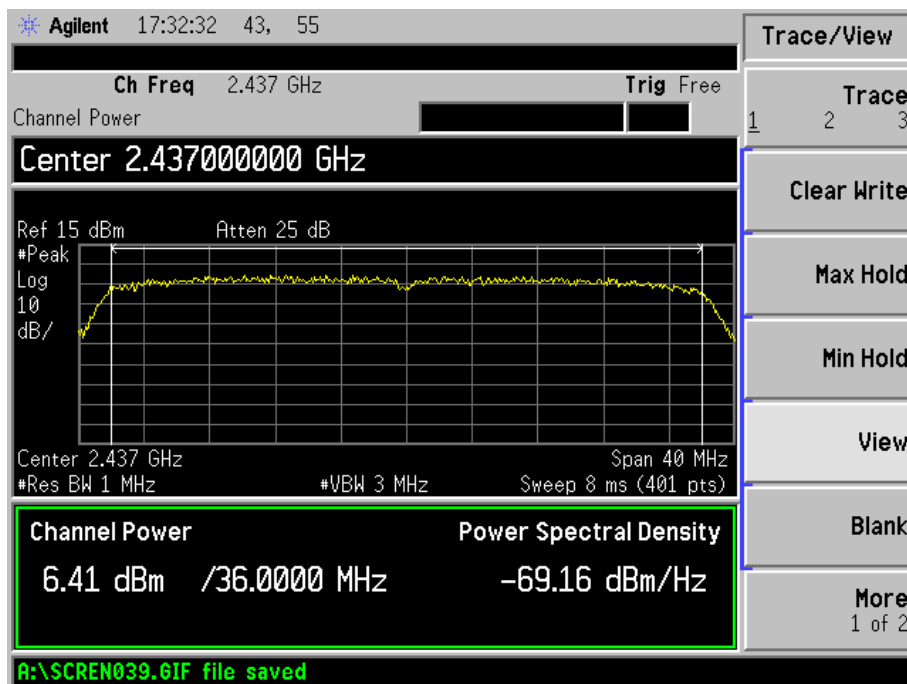
## 802.11n-HT40-MCS0-High Channel



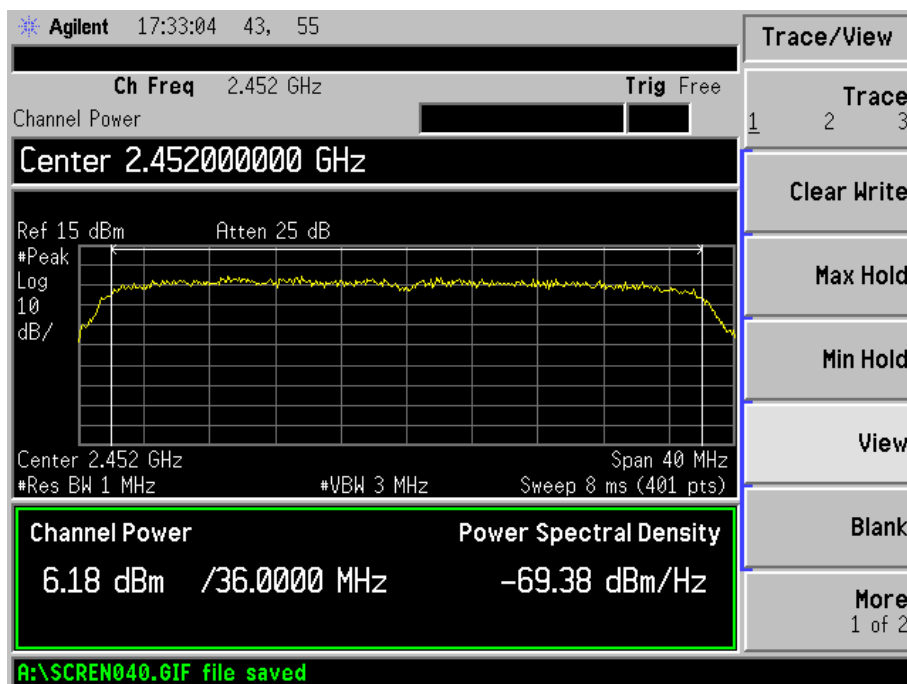
## 802.11n-HT40-MCS7-Low Channel



## 802.11n-HT40-MCS7-Middle Channel



## 802.11n-HT40-MCS7-High Channel



## 8. Field Strength of Spurious Emissions

### 8.1 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.

### 8.2 Standard Applicable

According to §15.247(d), in any 100 kHz bandwidth outside the frequency band in which the spread spectrum or digitally modulated intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 20 dB below that in the 100 kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement, provided the transmitter demonstrates compliance with the peak conducted power limits. If the transmitter complies with the conducted power limits based on the use of RMS averaging over a time interval, as permitted under paragraph (b)(3) of this section, the attenuation required under this paragraph shall be 30 dB instead of 20 dB. Attenuation below the general limits specified in §15.209(a) is not required. In addition, radiated emissions which fall in the restricted bands, as defined in §15.205(a), must also comply with the radiated emission limits specified in §15.209(a).

The emission limit in this paragraph is based on measurement instrumentation employing an average detector. The provisions in §15.35 for limiting peak emissions apply. Spurious Radiated Emissions measurements starting below or at the lowest crystal frequency.

### 8.3 Test Equipment List and Details

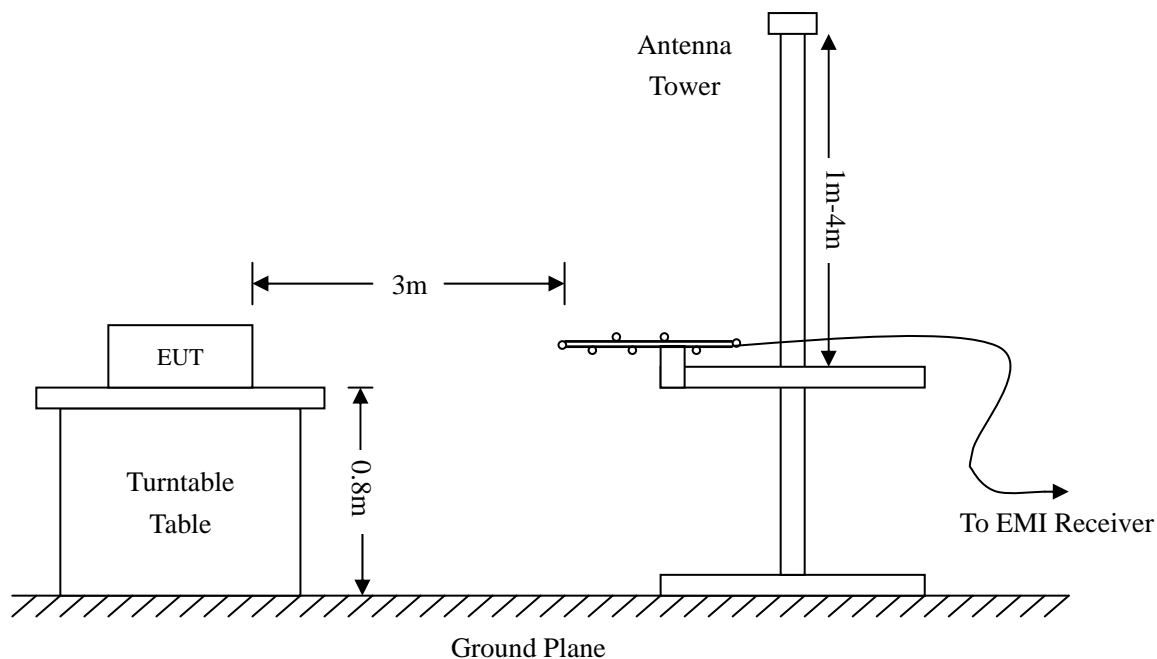
Description	Manufacturer	Model	Serial Number	Cal. Date	Due. Date
Spectrum Analyzer	R&S	FSP	836079/035	2013-05-07	2014-05-06
EMI Test Receiver	R&S	ESVB	825471/005	2013-05-07	2014-05-06
Pre-amplifier	Agilent	8447F	3113A06717	2013-05-07	2014-05-06
Pre-amplifier	Compliance Direction	PAP-0118	24002	2013-05-07	2014-05-06
Trilog Broadband Antenna	SCHWARZBECK	VULB9163	9163-333	2013-04-20	2014-04-19
Horn Antenna	ETS	3117	00086197	2013-04-20	2014-04-19
Horn Antenna	ETS	3116B	00088203	2013-04-20	2014-04-19
Loop Antenna	SCHWARZECK	HFRA 5165	9365	2013-04-20	2014-04-19

## 8.4 Test Procedure

The setup of EUT is according with per ANSI C63.4-2003 measurement procedure. The specification used was with the FCC Part 15.205 15.247(a) 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.



Frequency :9kHz-30MHz

RBW=10KHz,

VBW =30KHz

Sweep time= Auto

Detector function = peak

Frequency :30MHz-1GHz

RBW=120KHz,

VBW=300KHz

Sweep time= Auto

Detector function = peak

Frequency :Above 1GHz

RBW=1MHz,

VBW=3MHz(Peak), 10Hz(AV)

Sweep time= Auto

Detector function = peak, AV

## 8.5 Corrected Amplitude & Margin Calculation

The Corrected Amplitude is calculated by 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 -6dBμV means the emission is 6dBμV below the maximum limit for Class B. The equation for margin calculation is as follows:

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



## 8.6 Environmental Conditions

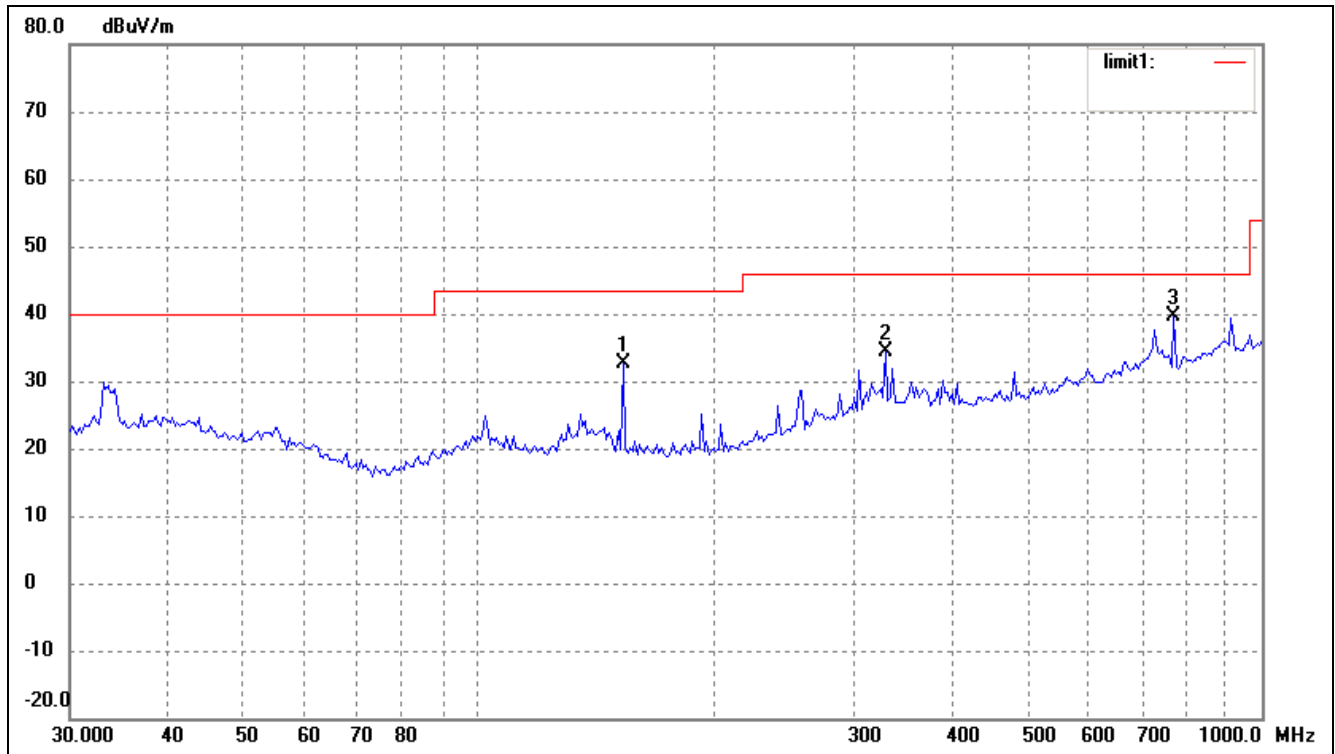
Temperature:	25 °C
Relative Humidity:	52%
ATM Pressure:	1012 mbar

## 8.7 Summary of Test Results/Plots

According to the data below, the FCC Part 15.205, 15.209 and 15.247 standards, and had the worst margin of:

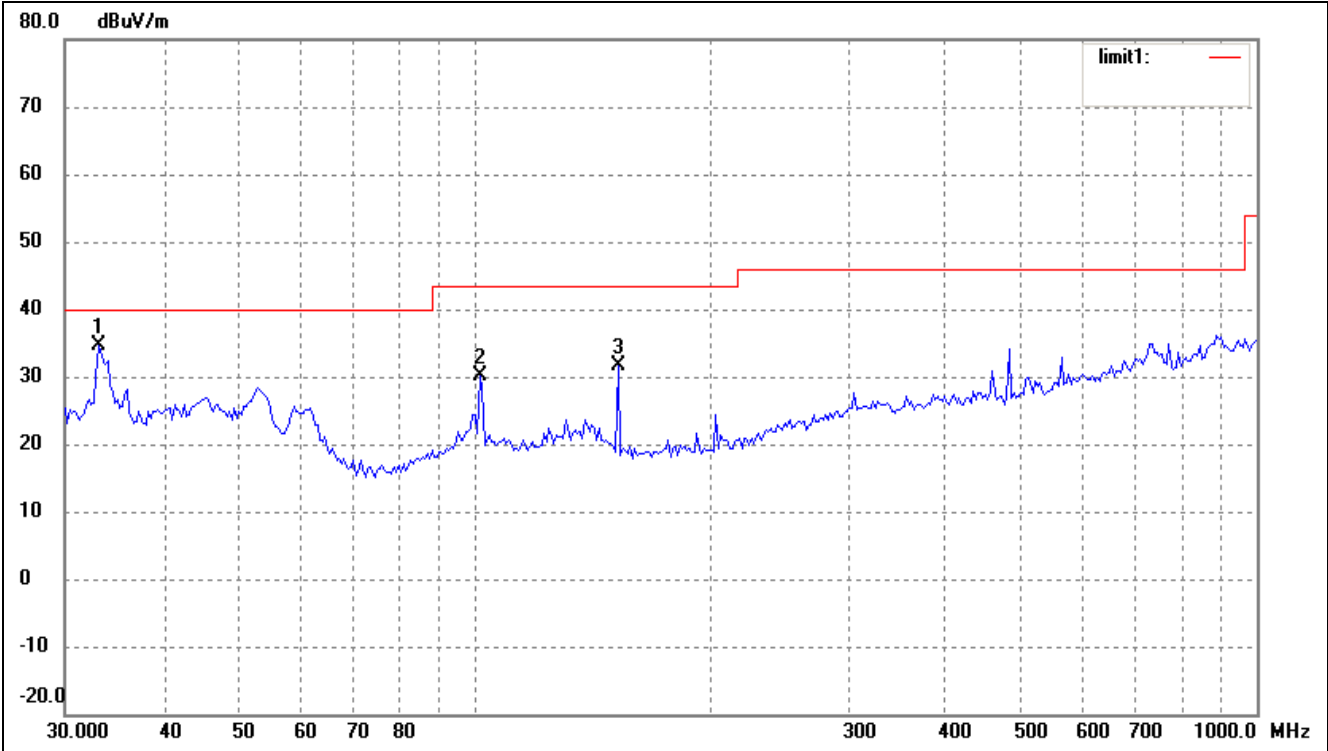
**-4.95 dB at 33.0950 MHz in the Vertical polarization for 802.11b-Middle Channel, 9kHz to 25 GHz, 3 Meters**

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

**Plot of Radiated Emissions Test Data (30MHz to 1GHz)***EUT: Tablet PC**Tested Model: F-7HD2Core**Operating Condition: 802.11b Transmitting Low Channel-2412MHz**Comment: AC 120V/60Hz; USB 5V**Test Specification: Horizontal*

No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree ( ° )	Height (cm)	Remark
1	152.6641	29.14	3.58	32.72	43.50	-10.78	240	100	peak
2	330.1949	24.22	10.28	34.50	46.00	-11.50	187	100	peak
3	771.4486	23.22	16.37	39.59	46.00	-6.41	220	100	peak

Test Specification: Vertical

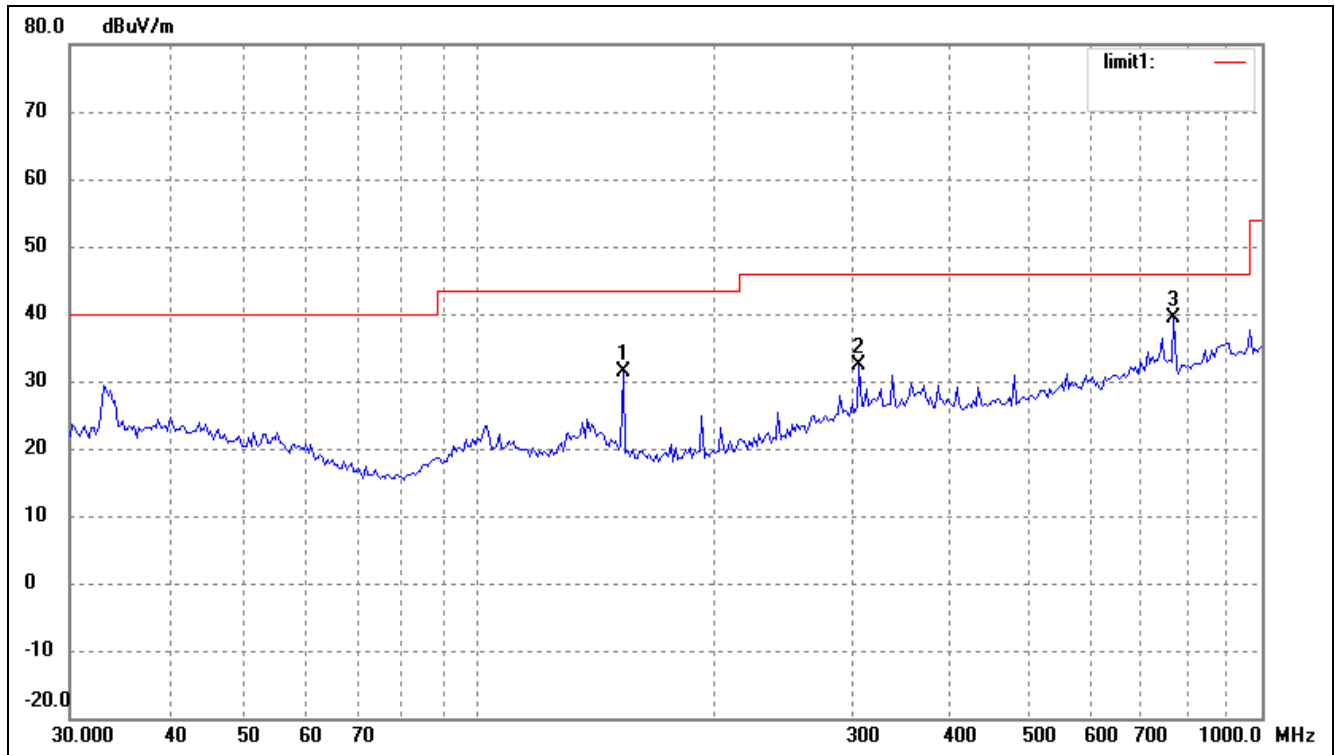


No.	Frequency	Reading	Correct	Result	Limit	Margin	Degree	Height	Remark
	(MHz)	(dBuV/m)	Factor(dB)	(dBuV/m)	(dBuV/m)	(dB)	( ° )	(cm)	
1	33.0950	26.05	8.56	34.61	40.00	-5.39	162	100	peak
2	101.6443	23.43	6.67	30.10	43.50	-13.40	200	100	peak
3	152.6641	27.93	3.58	31.51	43.50	-11.99	360	100	peak

Operating Condition: 802.11b Transmitting Middle Channel-2437MHz

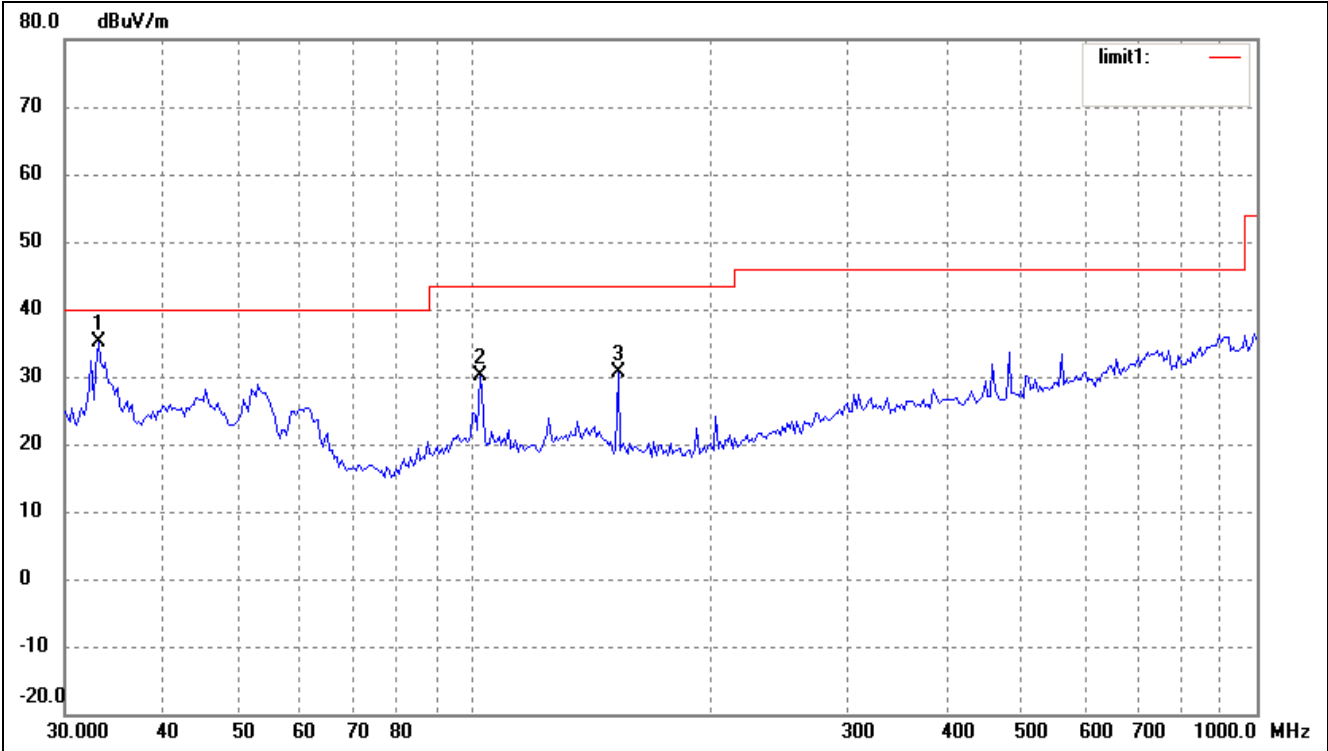
Comment: AC 120V/60Hz; USB 5V

Test Specification: Horizontal



No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree ( ° )	Height (cm)	Remark
1	152.6641	27.85	3.58	31.43	43.50	-12.07	240	100	peak
2	305.6800	22.12	10.27	32.39	46.00	-13.61	187	100	peak
3	771.4486	22.91	16.37	39.28	46.00	-6.72	220	100	peak

Test Specification: Vertical

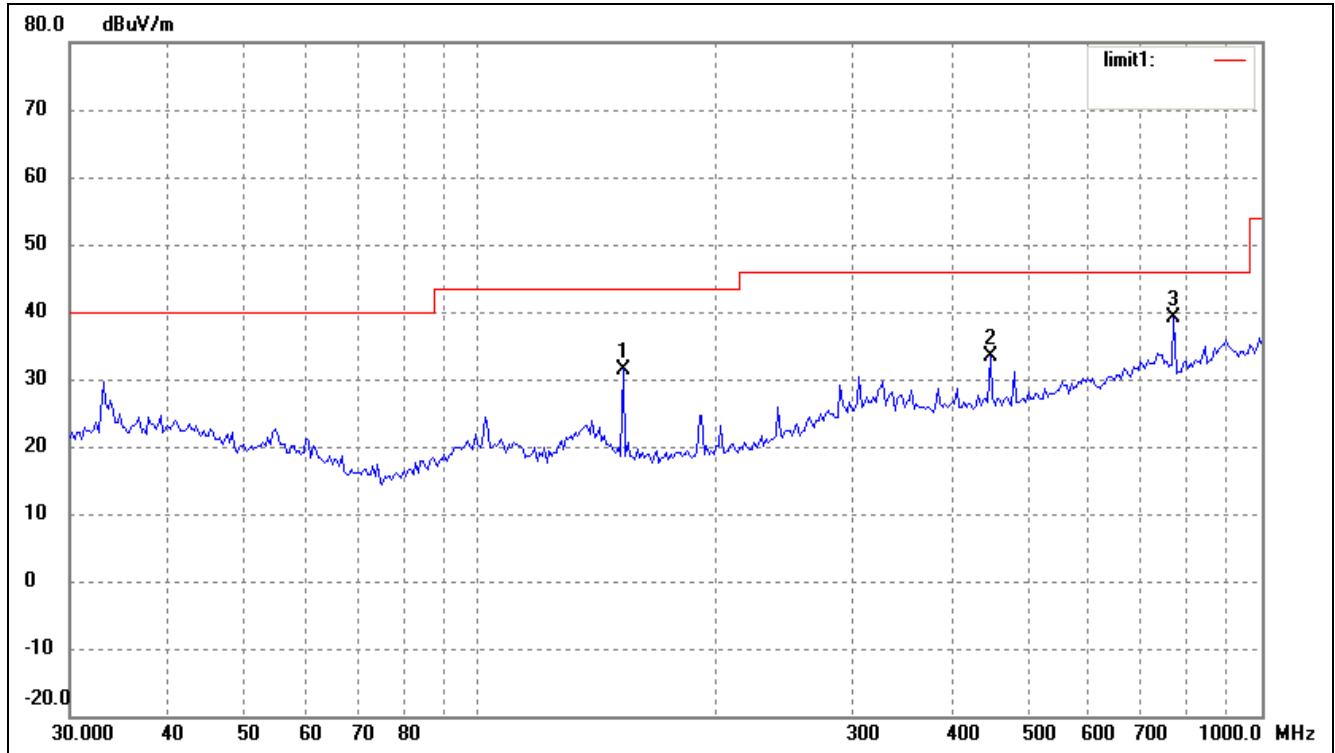


No.	Frequency	Reading	Correct	Result	Limit	Margin	Degree	Height	Remark
	(MHz)	(dBuV/m)	Factor(dB)	(dBuV/m)	(dBuV/m)	(dB)	( ° )	(cm)	
1	33.0950	26.49	8.56	35.05	40.00	-4.95	251	100	peak
2	101.6443	23.40	6.67	30.07	43.50	-13.43	36	100	peak
3	152.6641	27.16	3.58	30.74	43.50	-12.76	15	100	peak

Operating Condition: 802.11b Transmitting High Channel-2462MHz

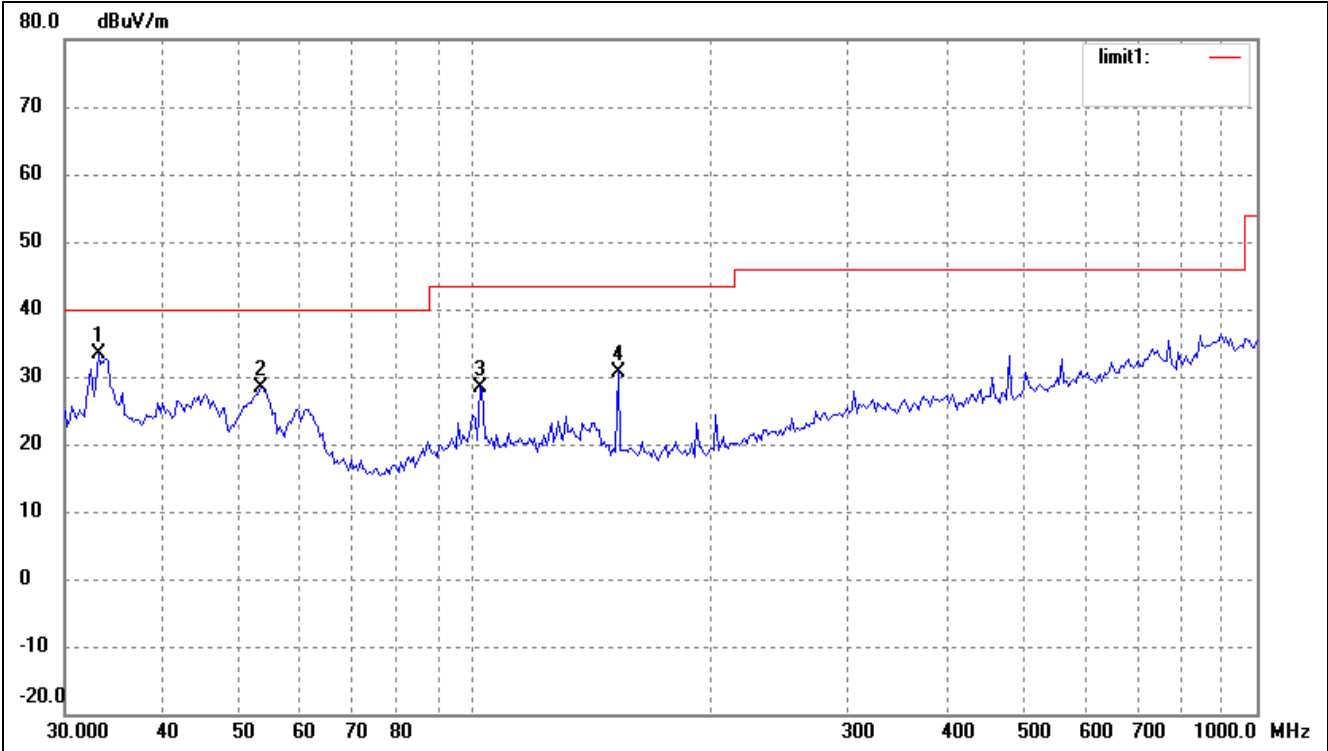
Comment: AC 120V/60Hz; USB 5V

Test Specification: Horizontal

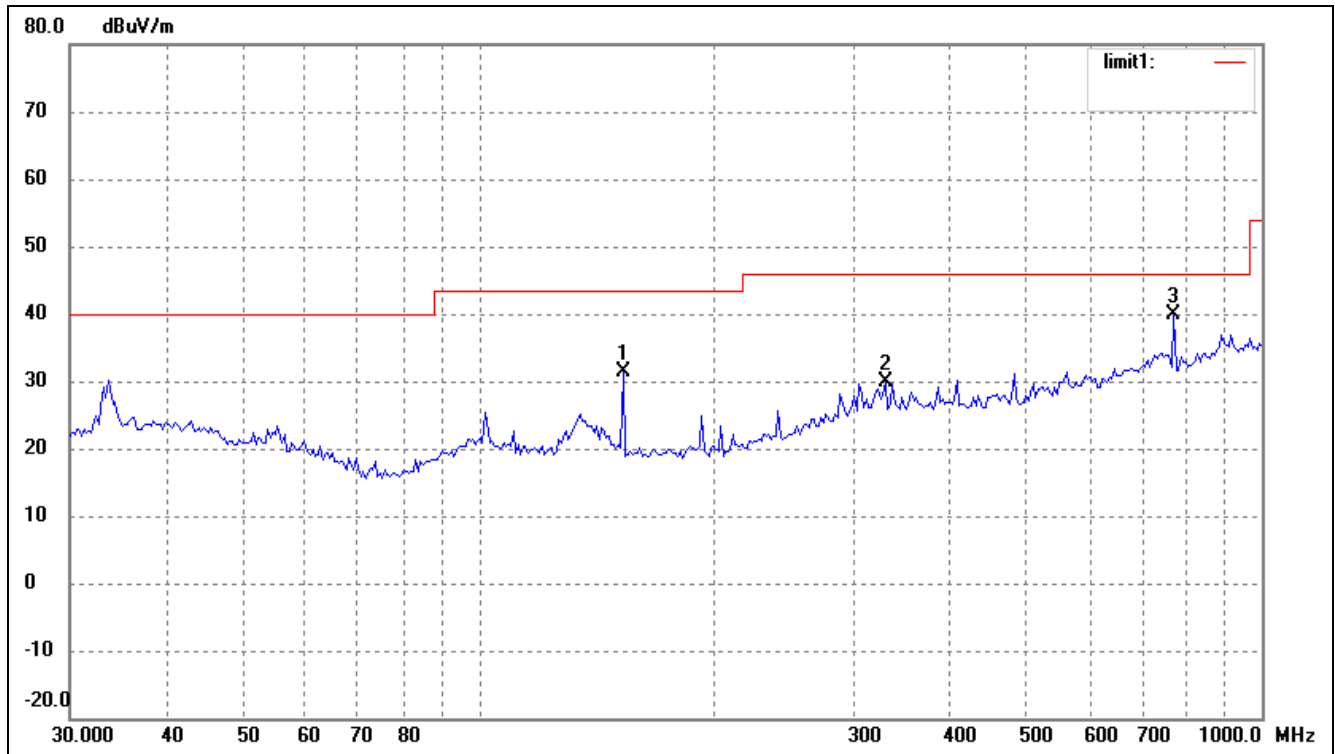


No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree ( ° )	Height (cm)	Remark
1	152.6641	27.92	3.58	31.50	43.50	-12.00	25	100	peak
2	449.5558	21.94	11.48	33.42	46.00	-12.58	139	100	peak
3	771.4486	22.64	16.37	39.01	46.00	-6.99	79	100	peak

Test Specification: Vertical



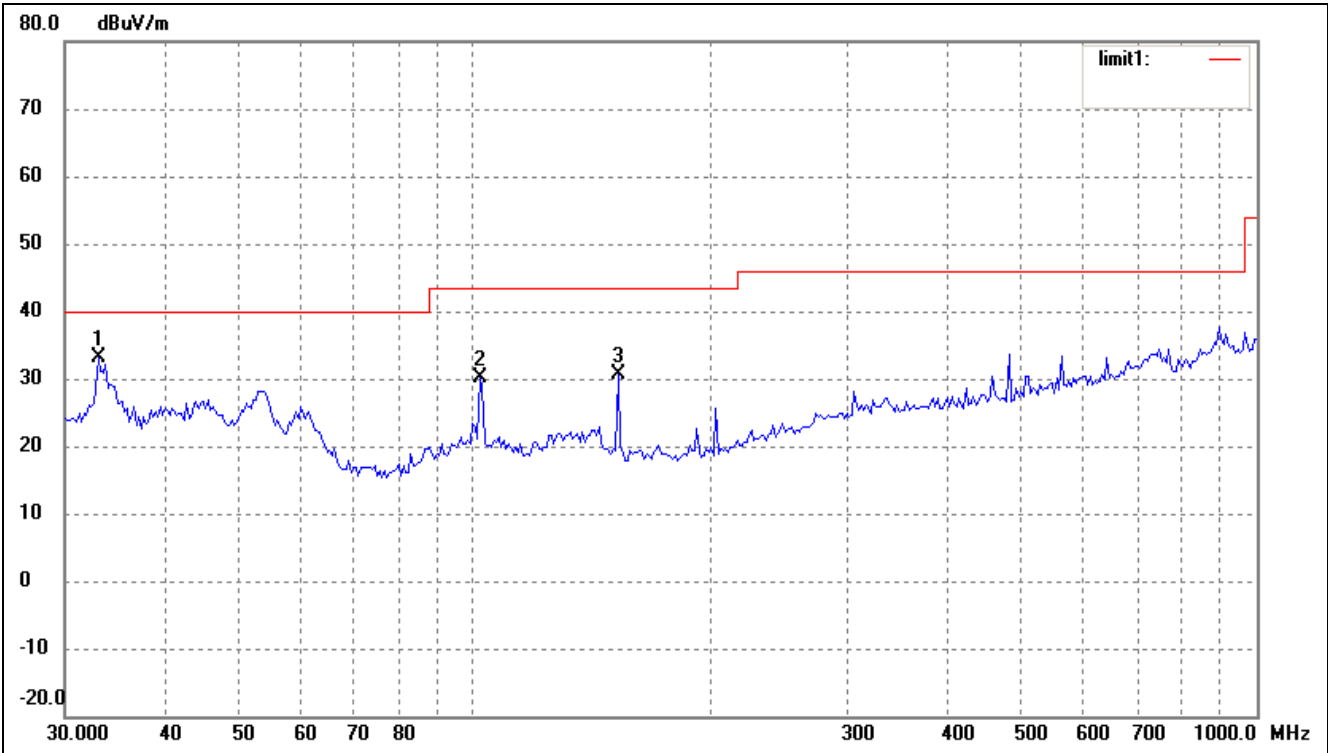
No.	Frequency	Reading	Correct	Result	Limit	Margin	Degree	Height	Remark
	(MHz)	(dBuV/m)	Factor(dB)	(dBuV/m)	(dBuV/m)	(dB)	( ° )	(cm)	
1	33.0950	24.77	8.56	33.33	40.00	-6.67	214	100	peak
2	53.3179	22.18	6.31	28.49	40.00	-11.51	76	100	peak
3	101.6443	21.73	6.67	28.40	43.50	-15.10	93	100	peak
4	152.6641	27.17	3.58	30.75	43.50	-12.75	125	100	peak

**Plot of Radiated Emissions Test Data (30MHz to 1GHz)***EUT: Tablet PC**Tested Model: F-7HD2Core**Operating Condition: 802.11g Transmitting Low Channel-2412MHz**Comment: AC 120V/60Hz; USB 5V**Test Specification: Horizontal*

No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree ( ° )	Height (cm)	Remark
1	152.6641	27.81	3.58	31.39	43.50	-12.11	241	100	peak
2	330.1949	19.72	10.28	30.00	46.00	-16.00	36	100	peak
3	771.4486	23.54	16.37	39.91	46.00	-6.09	24	100	peak



Test Specification: Vertical

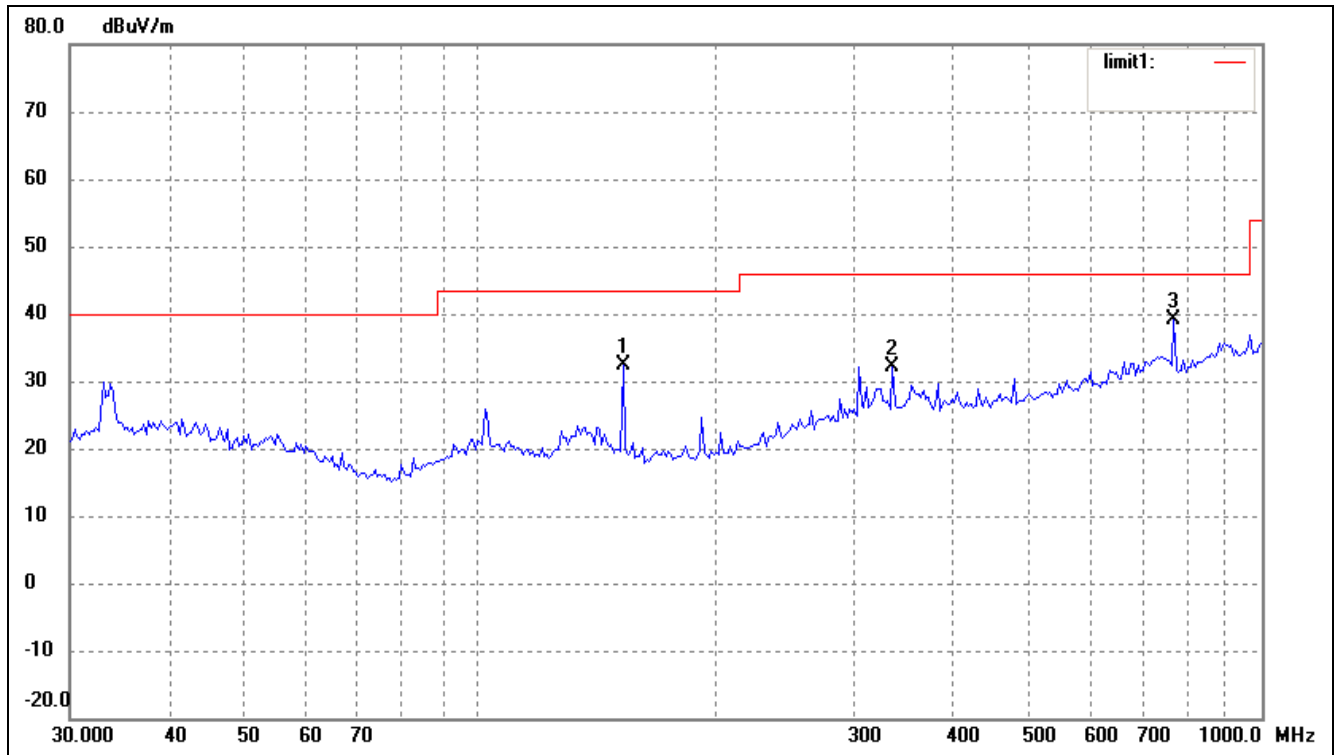


No.	Frequency	Reading	Correct	Result	Limit	Margin	Degree	Height	Remark
	(MHz)	(dBuV/m)	Factor(dB)	(dBuV/m)	(dBuV/m)	(dB)	( ° )	(cm)	
1	33.0950	24.60	8.56	33.16	40.00	-6.84	263	100	peak
2	101.6443	23.39	6.67	30.06	43.50	-13.44	14	100	peak
3	152.6641	27.04	3.58	30.62	43.50	-12.88	64	100	peak

Operating Condition: 802.11g Transmitting Middle Channel-2437MHz

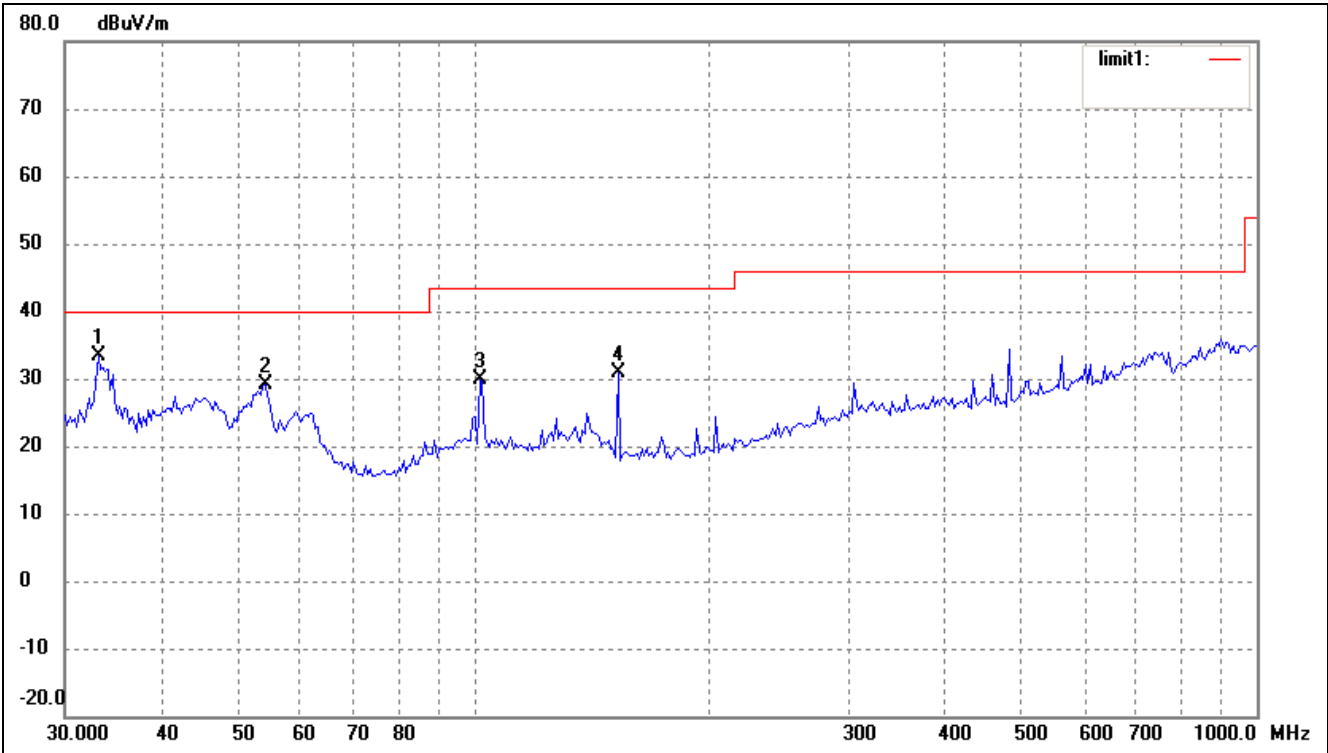
Comment: AC 120V/60Hz; USB 5V

Test Specification: Horizontal



No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree ( ° )	Height (cm)	Remark
1	152.6641	28.77	3.58	32.35	43.50	-11.15	254	100	peak
2	337.2155	22.06	10.14	32.20	46.00	-13.80	68	100	peak
3	771.4486	22.75	16.37	39.12	46.00	-6.88	15	100	peak

Test Specification: Vertical

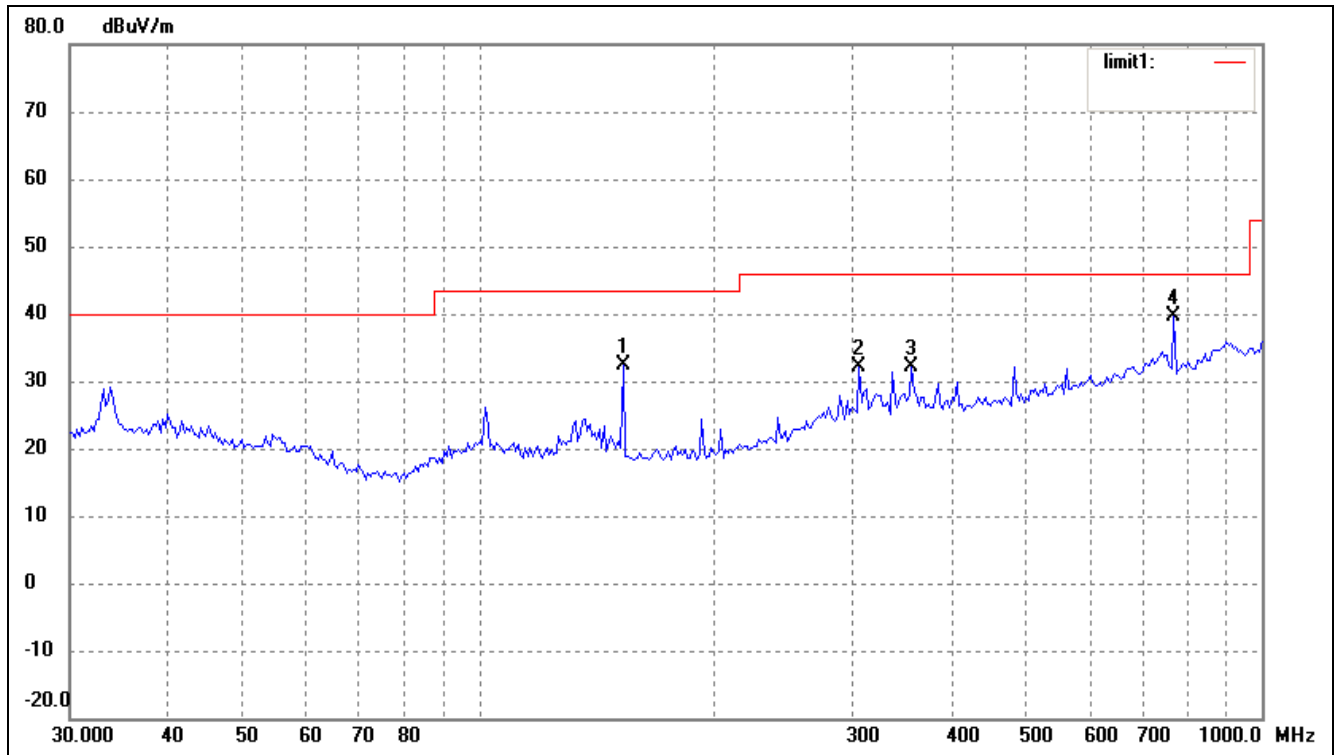


No.	Frequency	Reading	Correct	Result	Limit	Margin	Degree	Height	Remark
	(MHz)	(dBuV/m)	Factor(dB)	(dBuV/m)	(dBuV/m)	(dB)	( ° )	(cm)	
1	33.0950	24.82	8.56	33.38	40.00	-6.62	336	100	peak
2	54.0711	22.84	6.24	29.08	40.00	-10.92	185	100	peak
3	101.6443	23.27	6.67	29.94	43.50	-13.56	41	100	peak
4	152.6641	27.38	3.58	30.96	43.50	-12.54	214	100	peak

Operating Condition: 802.11g Transmitting High Channel-2462MHz

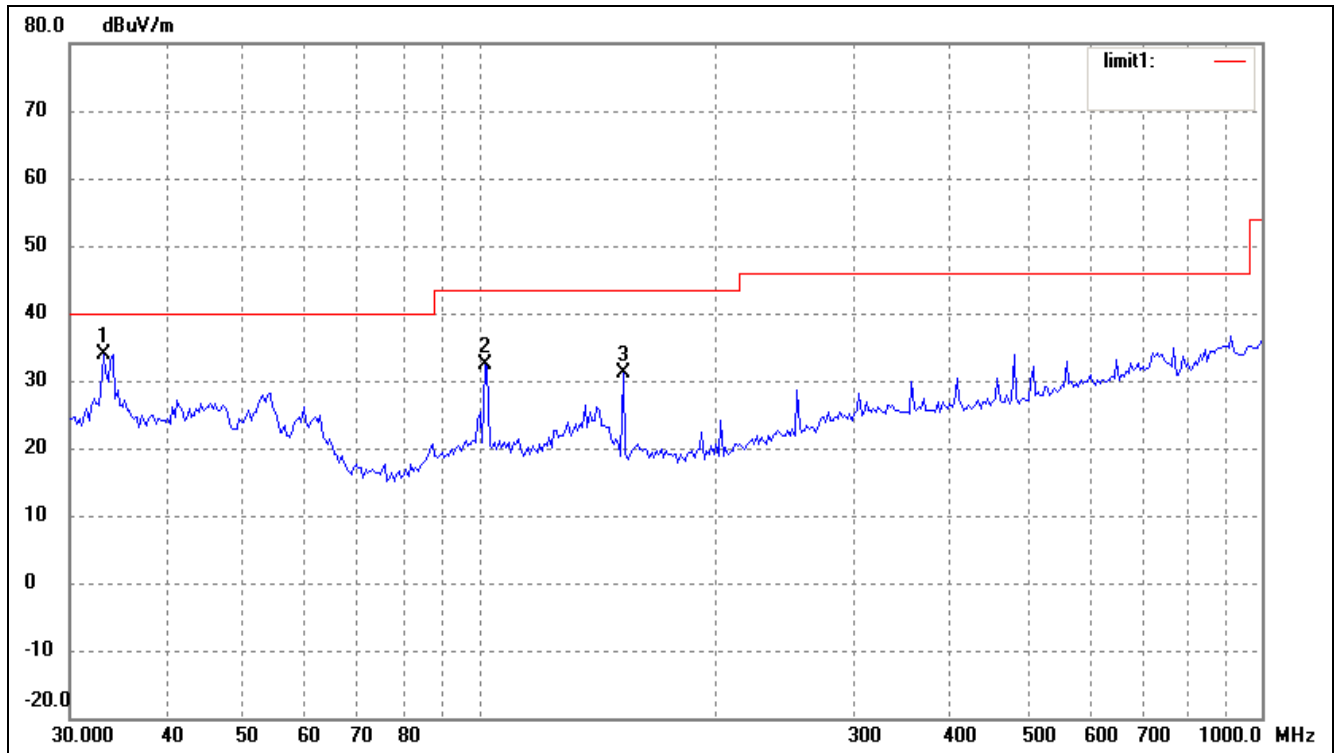
Comment: AC 120V/60Hz; USB 5V

Test Specification: Horizontal

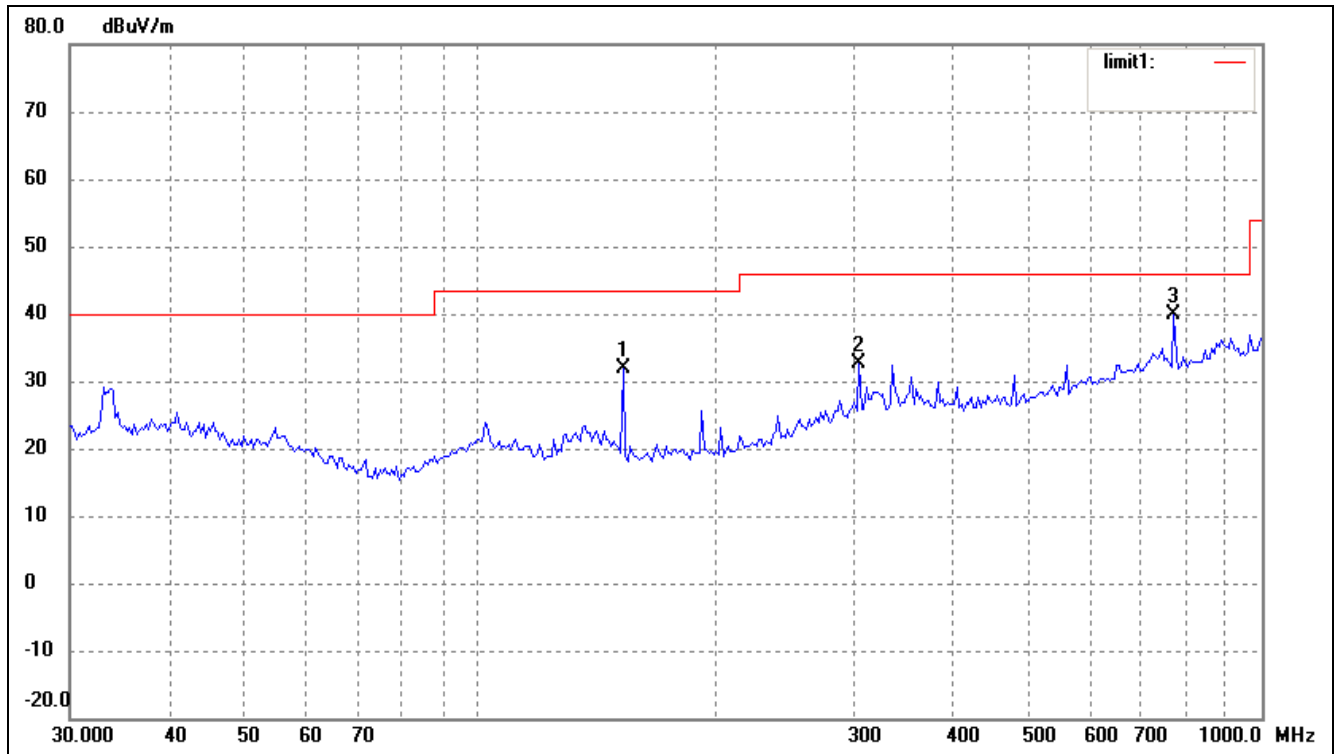


No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	152.6641	28.72	3.58	32.30	43.50	-11.20	254	100	peak
2	305.6800	21.97	10.27	32.24	46.00	-13.76	13	100	peak
3	356.6758	21.55	10.61	32.16	46.00	-13.84	47	100	peak
4	771.4486	23.20	16.37	39.57	46.00	-6.43	145	100	peak

Test Specification: Vertical

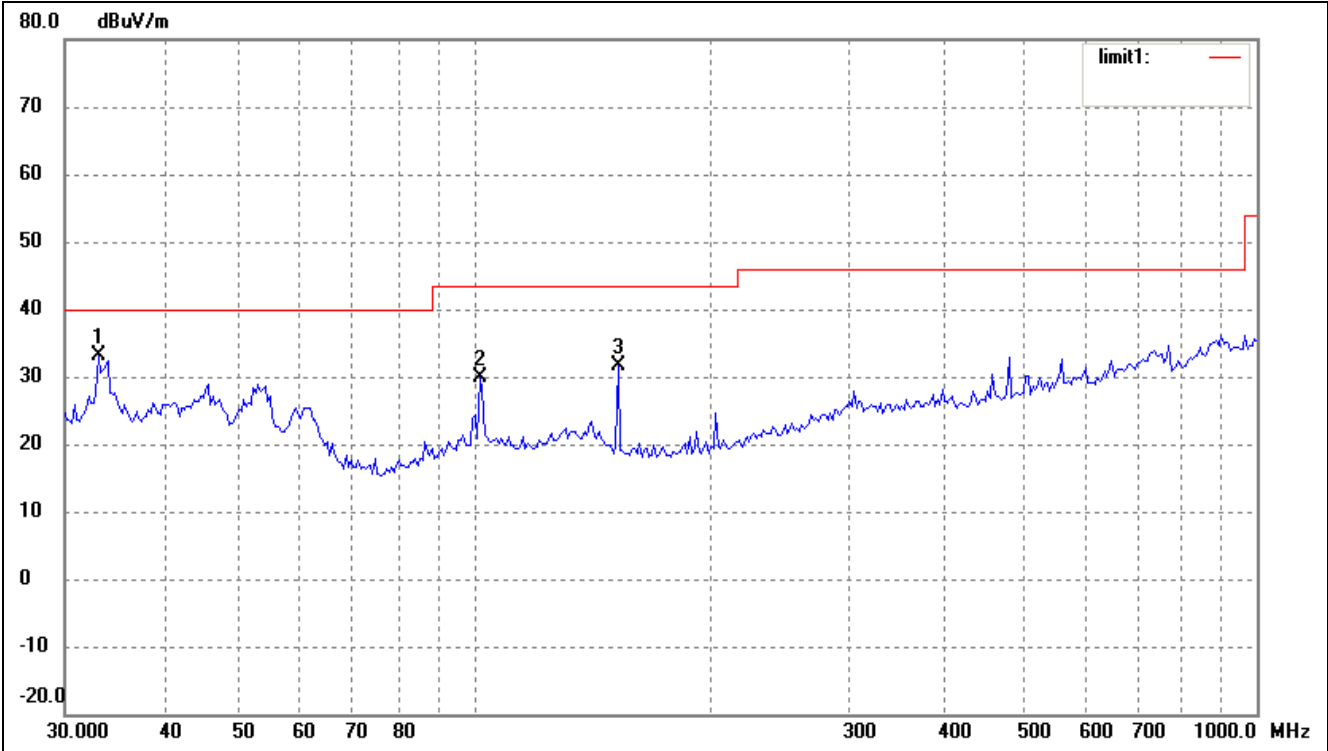


No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree ( ° )	Height (cm)	Remark
1	33.0950	25.33	8.56	33.89	40.00	-6.11	214	100	peak
2	101.6443	25.67	6.67	32.34	43.50	-11.16	31	100	peak
3	152.6641	27.59	3.58	31.17	43.50	-12.33	263	100	peak

**Plot of Radiated Emissions Test Data (30MHz to 1GHz)***EUT: Tablet PC**Tested Model: F-7HD2Core**Operating Condition: 802.11n-HT20 Transmitting Low Channel-2412MHz**Comment: AC 120V/60Hz; USB 5V**Test Specification: Horizontal*

No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree ( ° )	Height (cm)	Remark
1	152.6641	28.26	3.58	31.84	43.50	-11.66	23	100	peak
2	305.6800	22.24	10.27	32.51	46.00	-13.49	64	100	peak
3	771.4486	23.47	16.37	39.84	46.00	-6.16	261	100	peak

Test Specification: Vertical

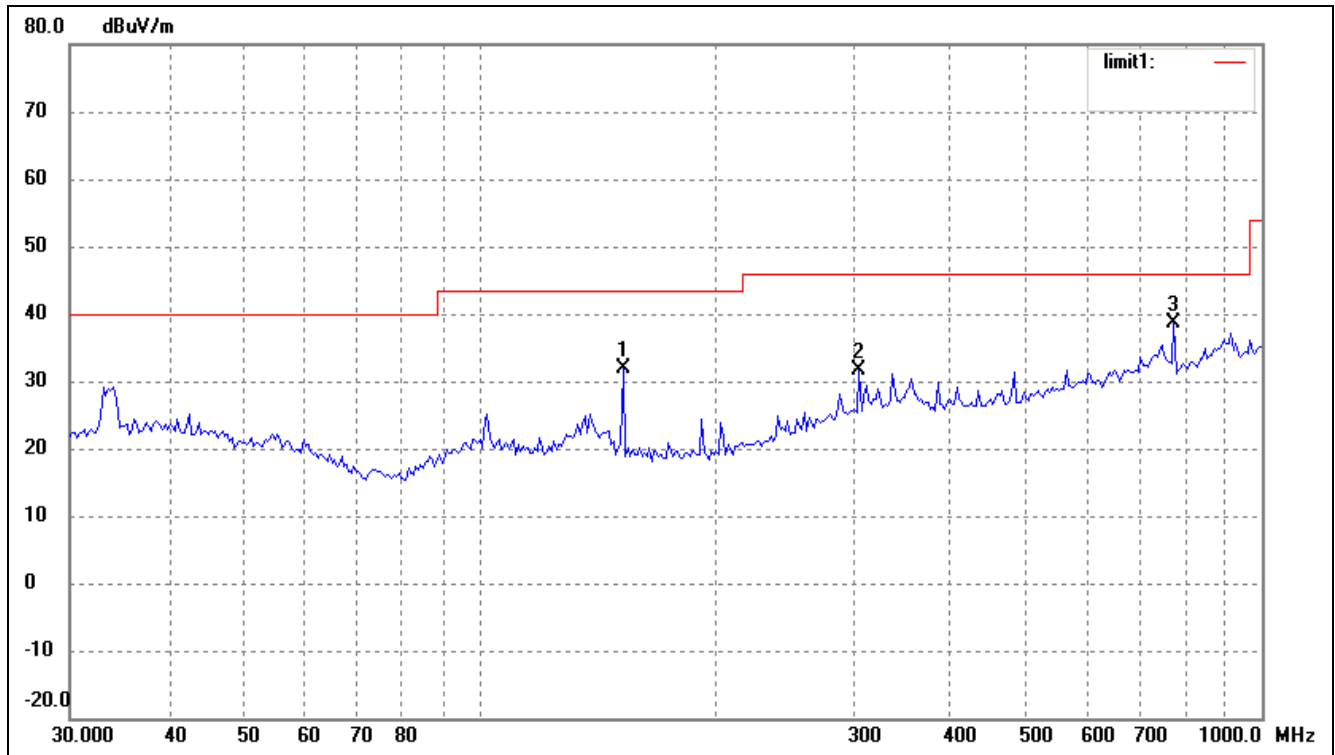


No.	Frequency	Reading	Correct	Result	Limit	Margin	Degree	Height	Remark
	(MHz)	(dBuV/m)	Factor(dB)	(dBuV/m)	(dBuV/m)	(dB)	( ° )	(cm)	
1	33.0950	24.53	8.56	33.09	40.00	-6.91	256	100	peak
2	101.6443	23.22	6.67	29.89	43.50	-13.61	34	100	peak
3	152.6641	28.00	3.58	31.58	43.50	-11.92	47	100	peak

Operating Condition: 802.11n-HT20 Transmitting Middle Channel-2437MHz

Comment: AC 120V/60Hz; USB 5V

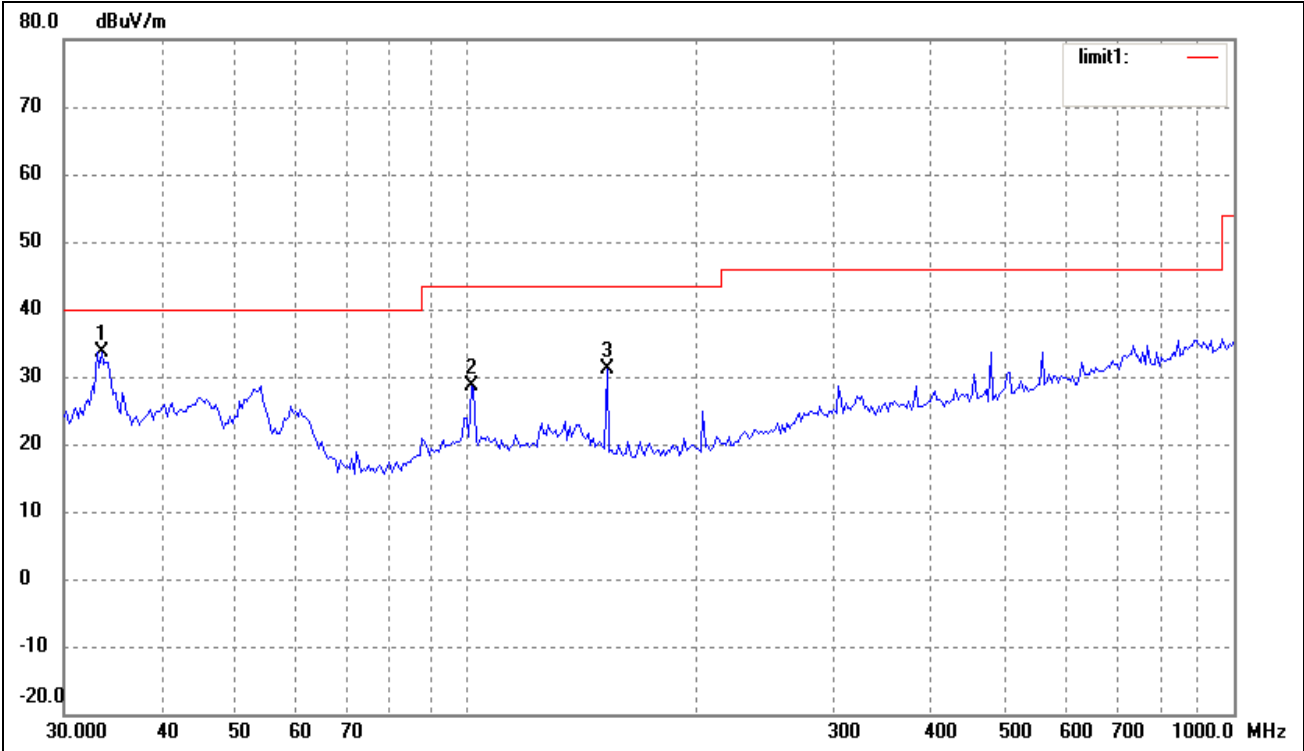
Test Specification: Horizontal



No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree ( ° )	Height (cm)	Remark
1	152.6641	28.23	3.58	31.81	43.50	-11.69	360	100	peak
2	305.6800	21.25	10.27	31.52	46.00	-14.48	24	100	peak
3	771.4486	22.26	16.37	38.63	46.00	-7.37	44	100	peak



Test Specification: Vertical

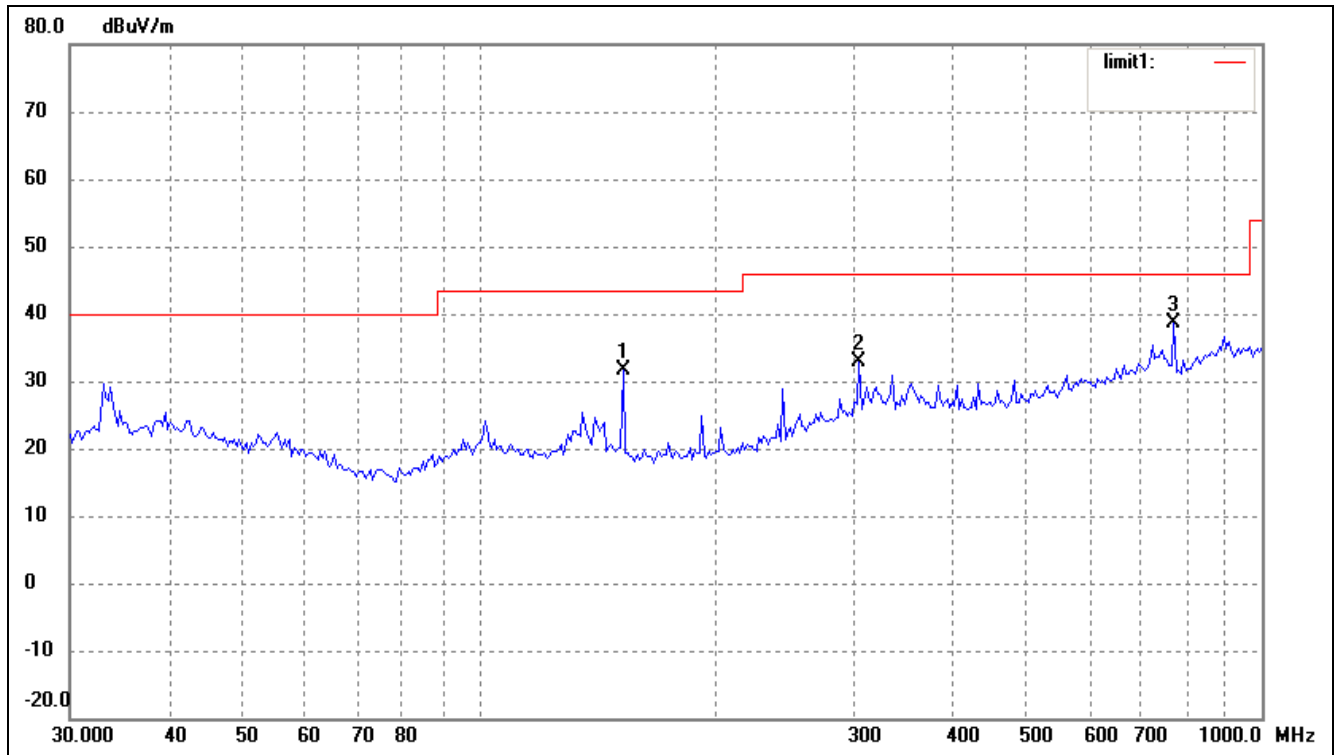


No.	Frequency	Reading	Correct	Result	Limit	Margin	Degree	Height	Remark
	(MHz)	(dBuV/m)	Factor(dB)	(dBuV/m)	(dBuV/m)	(dB)	( ° )	(cm)	
1	33.5624	24.94	8.63	33.57	40.00	-6.43	214	100	peak
2	101.6443	21.95	6.67	28.62	43.50	-14.88	334	100	peak
3	152.6641	27.47	3.58	31.05	43.50	-12.45	15	100	peak

Operating Condition: 802.11n-HT20 Transmitting High Channel-2462MHz

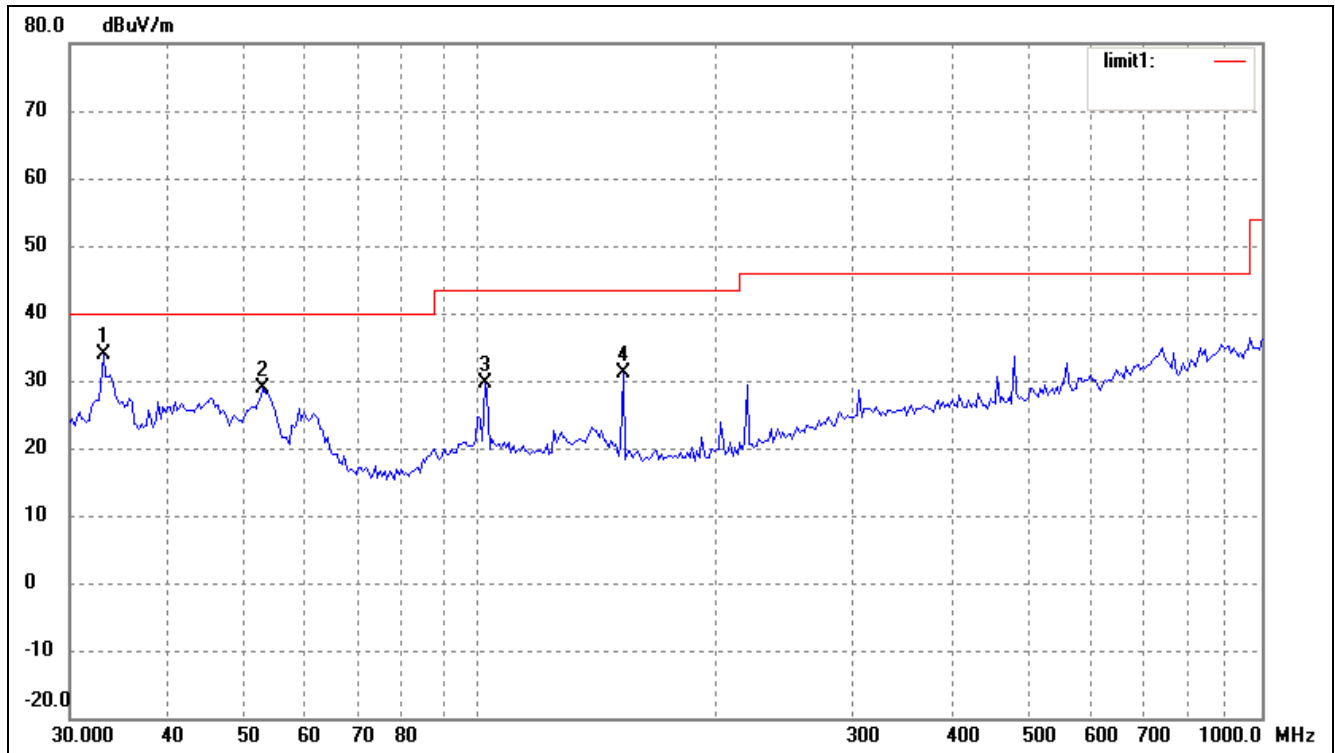
Comment: AC 120V/60Hz; USB 5V

Test Specification: Horizontal

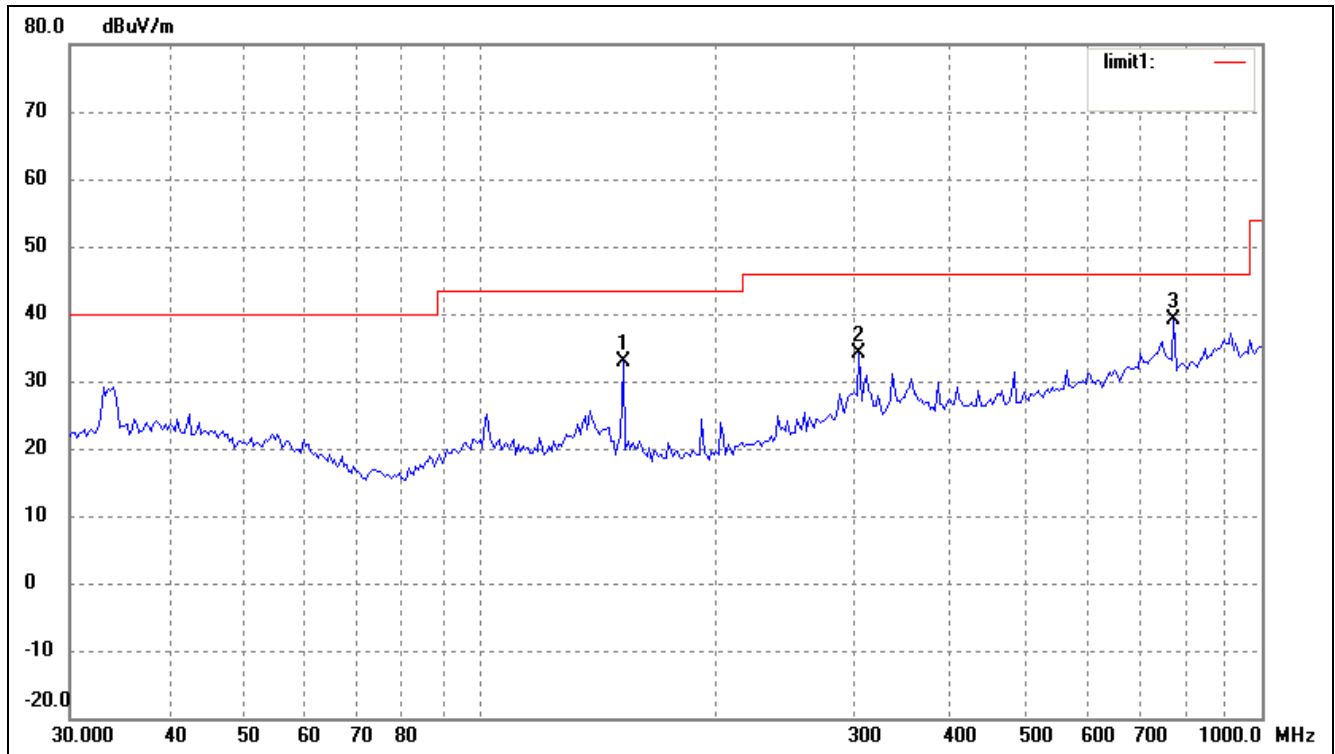


No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree ( ° )	Height (cm)	Remark
1	152.6641	27.98	3.58	31.56	43.50	-11.94	24	100	peak
2	305.6800	22.73	10.27	33.00	46.00	-13.00	35	100	peak
3	771.4486	22.24	16.37	38.61	46.00	-7.39	24	100	peak

Test Specification: Vertical

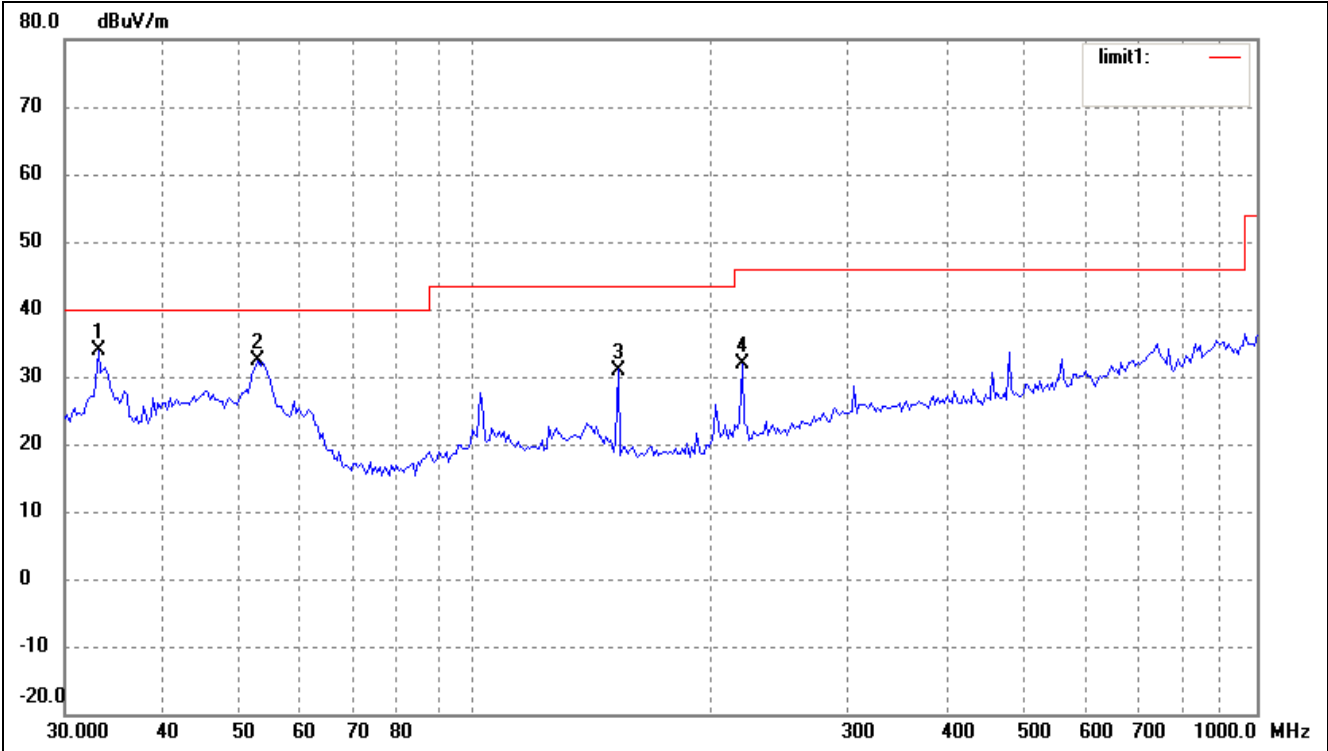


No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	33.0950	25.42	8.56	33.98	40.00	-6.02	147	100	peak
2	52.9453	22.62	6.34	28.96	40.00	-11.04	360	100	peak
3	101.6443	22.98	6.67	29.65	43.50	-13.85	145	100	peak
4	152.6641	27.43	3.58	31.01	43.50	-12.49	28	100	peak

**Plot of Radiated Emissions Test Data (30MHz to 1GHz)***EUT: Tablet PC**Tested Model: F-7HD2Core**Operating Condition: 802.11n-HT40 Transmitting Low Channel-2422MHz**Comment: AC 120V/60Hz; USB 5V**Test Specification: Horizontal*

No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree ( ° )	Height (cm)	Remark
1	152.6640	29.23	3.58	32.81	43.50	-10.69	321	100	peak
2	305.6800	23.75	10.27	34.02	46.00	-11.98	47	100	peak
3	771.4486	22.76	16.37	39.13	46.00	-6.87	266	100	peak

Test Specification: Vertical

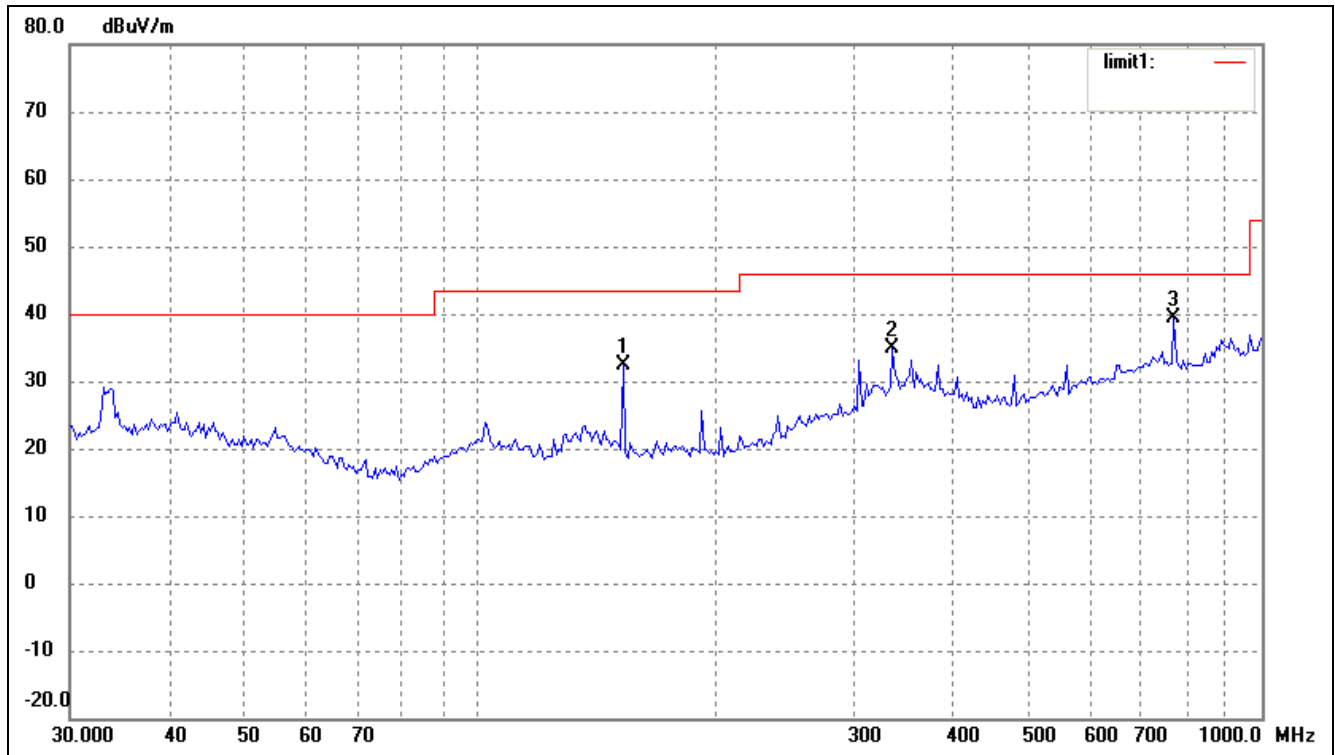


No.	Frequency	Reading	Correct	Result	Limit	Margin	Degree	Height	Remark
	(MHz)	(dBuV/m)	Factor(dB)	(dBuV/m)	(dBuV/m)	(dB)	( ° )	(cm)	
1	33.0949	25.43	8.56	33.99	40.00	-6.01	254	100	peak
2	52.9453	26.12	6.34	32.46	40.00	-7.54	27	100	peak
3	152.6640	27.42	3.58	31.00	43.50	-12.50	354	100	peak
4	219.8448	25.94	5.91	31.85	46.00	-14.15	154	100	peak

Operating Condition: 802.11n-HT40 Transmitting Middle Channel-2437MHz

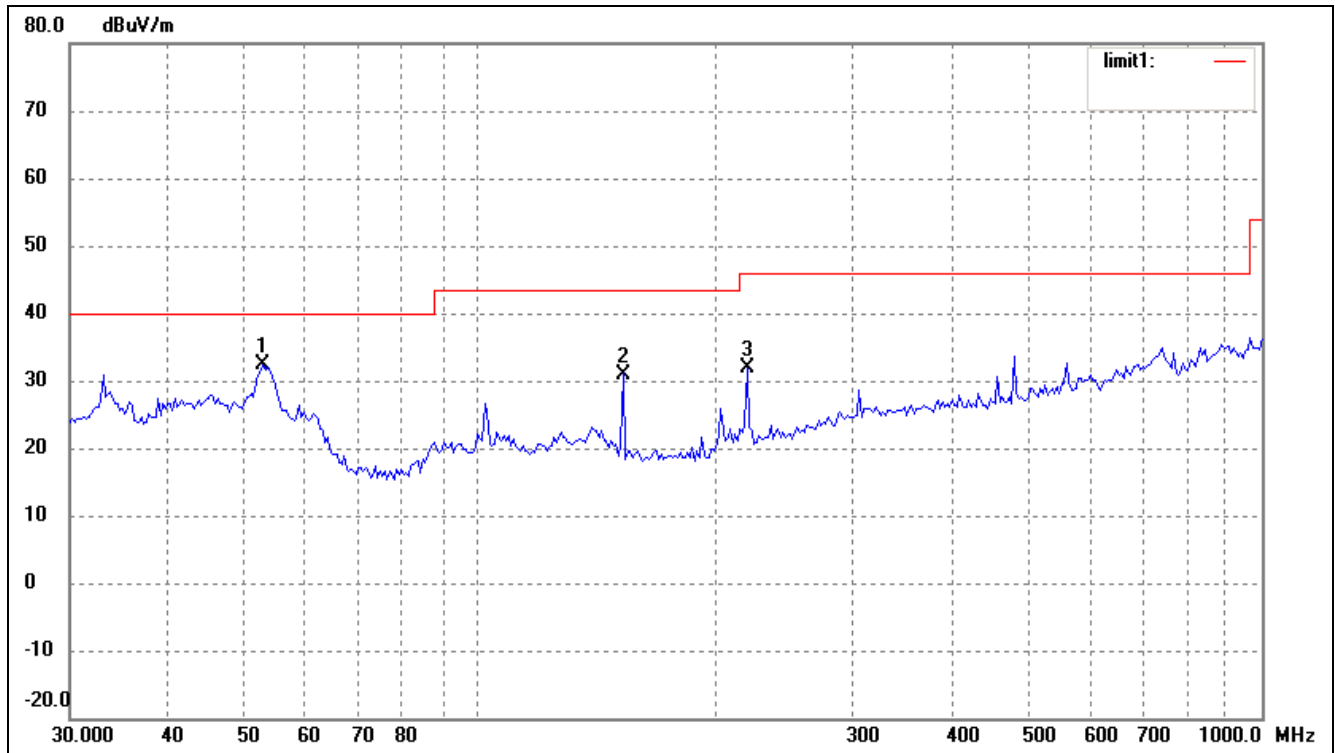
Comment: AC 120V/60Hz; USB 5V

Test Specification: Horizontal



No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree ( ° )	Height (cm)	Remark
1	152.6640	28.76	3.58	32.34	43.50	-11.16	354	100	peak
2	337.2155	24.68	10.14	34.82	46.00	-11.18	12	100	peak
3	771.4486	22.97	16.37	39.34	46.00	-6.66	27	100	peak

Test Specification: Vertical

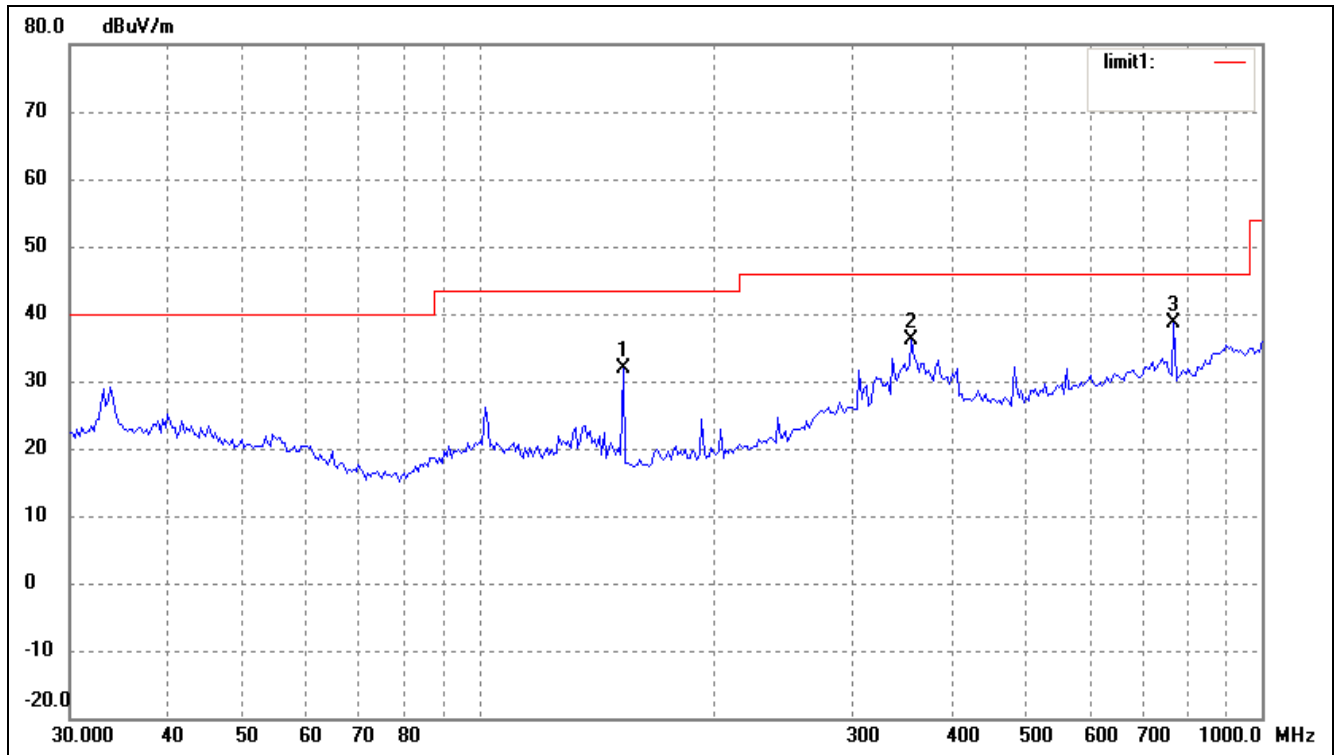


No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree (°)	Height (cm)	Remark
1	52.9453	26.12	6.34	32.46	40.00	-7.54	257	100	peak
2	152.6640	27.42	3.58	31.00	43.50	-12.50	34	100	peak
3	219.8448	25.94	5.91	31.85	46.00	-14.15	57	100	peak

Operating Condition: 802.11n-HT40 Transmitting High Channel-2452MHz

Comment: AC 120V/60Hz; USB 5V

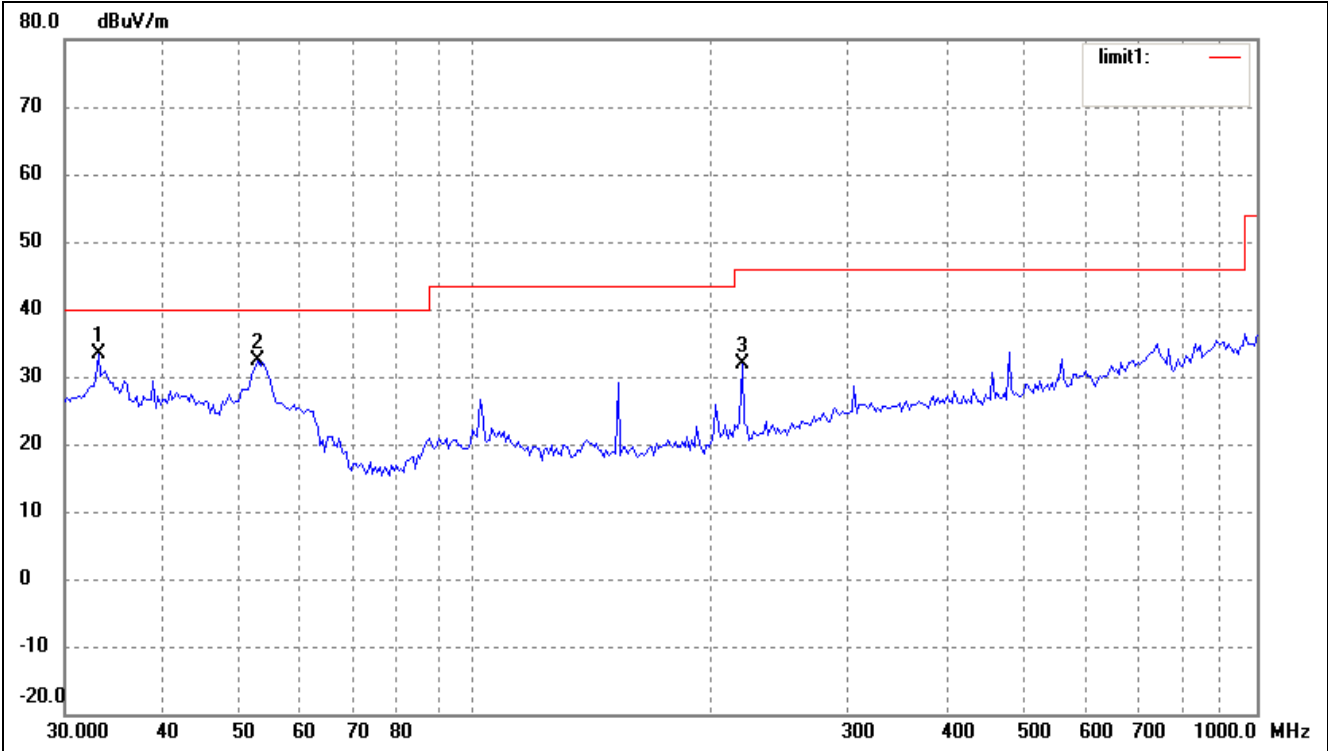
Test Specification: Horizontal



No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Degree ( ° )	Height (cm)	Remark
1	152.6640	28.22	3.58	31.80	43.50	-11.70	241	100	peak
2	356.6757	25.55	10.61	36.16	46.00	-9.84	65	100	peak
3	771.4486	22.20	16.37	38.57	46.00	-7.43	26	100	peak



Test Specification: Vertical



No.	Frequency	Reading	Correct	Result	Limit	Margin	Degree	Height	Remark
	(MHz)	(dBuV/m)	Factor(dB)	(dBuV/m)	(dBuV/m)	(dB)	( ° )	(cm)	
1	33.0949	24.93	8.56	33.49	40.00	-6.51	36	100	peak
2	52.9453	26.12	6.34	32.46	40.00	-7.54	145	100	peak
3	219.8448	25.94	5.91	31.85	46.00	-14.15	26	100	peak

*Spurious Emissions Above 1GHz**Test Mode: 802.11b*

Frequency	Reading	Correct	Result	Limit	Margin	Polar	Detector
(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	H/V	
Low Channel-2412MHz							
4824	57.24	0.57	56.67	74.00	-17.33	H	PK
4824	43.10	0.57	42.53	54.00	-11.47	H	AV
7236	49.40	3.69	45.71	74.00	-28.29	H	PK
7236	40.61	3.69	36.92	54.00	-17.08	H	AV
4824	52.90	0.57	52.33	74.00	-21.67	V	PK
4824	41.84	0.57	41.27	54.00	-12.73	V	AV
7236	49.72	3.69	46.03	74.00	-27.97	V	PK
7236	39.93	3.69	36.24	54.00	-17.76	V	AV
Middle Channel-2437MHz							
4874	55.16	0.64	54.52	74.00	-19.48	H	PK
4874	40.54	0.64	39.9	54.00	-14.10	H	AV
7311	51.22	3.75	47.47	74.00	-26.53	H	PK
7311	41.07	3.75	37.32	54.00	-16.68	H	AV
4874	56.55	0.64	55.91	74.00	-18.09	V	PK
4874	42.09	0.64	41.45	54.00	-12.55	V	AV
7311	48.48	3.75	44.73	74.00	-29.27	V	PK
7311	41.28	3.75	37.53	54.00	-16.47	V	AV
High Channel-2462MHz							
4924	55.62	0.72	54.90	74.00	-19.10	H	PK
4924	41.93	0.72	41.21	54.00	-12.79	H	AV
7386	50.65	3.81	46.84	74.00	-27.16	H	PK
7386	40.50	3.81	36.69	54.00	-17.31	H	AV
4924	52.59	0.72	51.87	74.00	-22.13	V	PK
4924	40.04	0.72	39.32	54.00	-14.68	V	AV
7386	49.18	3.81	45.37	74.00	-28.63	V	PK
7386	39.47	3.81	35.66	54.00	-18.34	V	AV

*Test Mode: 802.11g*

Frequency	Reading	Correct	Result	Limit	Margin	Polar	Detector
(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	H/V	
Low Channel-2412MHz							
4824	55.39	0.57	54.82	74.00	-19.18	H	PK
4824	39.41	0.57	38.84	54.00	-15.16	H	AV
7236	52.01	3.69	48.32	74.00	-25.68	H	PK
7236	36.14	3.69	32.45	54.00	-21.55	H	AV
4824	52.31	0.57	51.74	74.00	-22.26	V	PK
4824	39.58	0.57	39.01	54.00	-14.99	V	AV
7236	50.04	3.69	46.35	74.00	-27.65	V	PK
7236	39.17	3.69	35.48	54.00	-18.52	V	AV
Middle Channel-2437MHz							
4874	54.53	0.64	53.89	74.00	-20.11	H	PK
4874	45.95	0.64	45.31	54.00	-8.69	H	AV
7311	51.12	3.75	47.37	74.00	-26.63	H	PK
7311	40.13	3.75	36.38	54.00	-17.62	H	AV
4874	51.19	0.64	50.55	74.00	-23.45	V	PK
4874	40.48	0.64	39.84	54.00	-14.16	V	AV
7311	49.11	3.75	45.36	74.00	-28.64	V	PK
7311	39.09	3.75	35.34	54.00	-18.66	V	AV
High Channel-2462MHz							
4924	54.22	0.72	53.50	74.00	-20.50	H	PK
4924	41.47	0.72	40.75	54.00	-13.25	H	AV
7386	52.16	3.81	48.35	74.00	-25.65	H	PK
7386	39.08	3.81	35.27	54.00	-18.73	H	AV
4924	51.11	0.72	50.39	74.00	-23.61	V	PK
4924	36.71	0.72	35.99	54.00	-18.01	V	AV
7386	48.04	3.81	44.23	74.00	-29.77	V	PK
7386	39.13	3.81	35.32	54.00	-18.68	V	AV

Test Mode: 802.11n-HT20

Frequency	Reading	Correct	Result	Limit	Margin	Polar	Detector
(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	H/V	
Low Channel-2412MHz							
4824	56.77	0.57	56.20	74.00	-17.80	H	PK
4824	37.94	0.57	37.37	54.00	-16.63	H	AV
7236	47.64	3.69	43.95	74.00	-30.05	H	PK
7236	40.14	3.69	36.45	54.00	-17.55	H	AV
4824	52.09	0.57	51.52	74.00	-22.48	V	PK
4824	39.40	0.57	38.83	54.00	-15.17	V	AV
7236	48.24	3.69	44.55	74.00	-29.45	V	PK
7236	39.12	3.69	35.43	54.00	-18.57	V	AV
Middle Channel-2437MHz							
4874	57.92	0.64	57.28	74.00	-16.72	H	PK
4874	44.26	0.64	43.62	54.00	-10.38	H	AV
7311	52.08	3.75	48.33	74.00	-25.67	H	PK
7311	40.58	3.75	36.83	54.00	-17.17	H	AV
4874	55.16	0.64	54.52	74.00	-19.48	V	PK
4874	42.31	0.64	41.67	54.00	-12.33	V	AV
7311	50.92	3.75	47.17	74.00	-26.83	V	PK
7311	39.57	3.75	35.82	54.00	-18.18	V	AV
High Channel-2462MHz							
4924	52.56	0.72	51.84	74.00	-22.16	H	PK
4924	35.34	0.72	34.62	54.00	-19.38	H	AV
7386	50.25	3.81	46.44	74.00	-27.56	H	PK
7386	39.06	3.81	35.25	54.00	-18.75	H	AV
4924	49.89	0.72	49.17	74.00	-24.83	V	PK
4924	41.59	0.72	40.87	54.00	-13.13	V	AV
7386	48.90	3.81	45.09	74.00	-28.91	V	PK
7386	41.09	3.81	37.28	54.00	-16.72	V	AV

Test Mode: 802.11n-HT40

Frequency	Reading	Correct	Result	Limit	Margin	Polar	Detector
(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	H/V	
Low Channel-2422MHz							
4844	51.6	0.60	51.00	74.00	-23.00	H	PK
4844	35.73	0.60	35.13	54.00	-18.87	H	AV
7266	53.18	3.72	49.46	74.00	-24.54	H	PK
7266	40.54	3.72	36.82	54.00	-17.18	H	AV
4844	49.28	0.60	48.68	74.00	-25.32	V	PK
4844	36.97	0.60	36.37	54.00	-17.63	V	AV
7266	47.53	3.72	43.81	74.00	-30.19	V	PK
7266	39.44	3.72	35.72	54.00	-18.28	V	AV
Middle Channel-2437MHz							
4874	50.36	0.64	49.72	74.00	-24.28	H	PK
4874	36.26	0.64	35.62	54.00	-18.38	H	AV
7311	50.22	3.75	46.47	74.00	-27.53	H	PK
7311	39.04	3.75	35.29	54.00	-18.71	H	AV
4874	47.3	0.64	46.66	74.00	-27.34	V	PK
4874	46.34	0.64	45.70	54.00	-8.30	V	AV
7311	52.12	3.75	48.37	74.00	-25.63	V	PK
7311	39.86	3.75	36.11	54.00	-17.89	V	AV
High Channel-2452MHz							
4904	49.92	0.68	49.24	74.00	-24.76	H	PK
4904	35.78	0.68	35.10	54.00	-18.90	H	AV
7356	49.52	3.79	45.73	74.00	-28.27	H	PK
7356	40.00	3.79	36.21	54.00	-17.79	H	AV
4904	46.04	0.68	45.36	74.00	-28.64	V	PK
4904	45.41	0.68	44.73	54.00	-9.27	V	AV
7356	46.57	3.79	42.78	74.00	-31.22	V	PK
7356	40.63	3.79	36.84	54.00	-17.16	V	AV

Note: Testing is carried out with frequency rang 9kHz to the tenth harmonics, which above 3<sup>th</sup> Harmonics are attenuated more than 20dB below the permissible limits or the field strength is too small to be measured.

The measurements greater than 20dB below the limit from 9kHz to 30MHz and the data is not display.

## 9. Out of Band Emissions

### 9.1 Standard Applicable

According to §15.247 (d) In any 100 kHz bandwidth outside the frequency band in which the spread spectrum or digitally modulated intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 20 dB below that in the 100 kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement, provided the transmitter demonstrates compliance with the peak conducted power limits. If the transmitter complies with the conducted power limits based on the use of RMS averaging over a time interval, as permitted under paragraph (b)(3) of this section, the attenuation required under this paragraph shall be 30 dB instead of 20 dB. Attenuation below the general limits specified in §15.209(a) is not required. In addition, radiated emissions which fall in the restricted bands, as defined in §15.205(a), must also comply with the radiated emission limits specified in §15.209(a).

### 9.2 Test Equipment List and Details

Description	Manufacturer	Model	Serial Number	Cal. Date	Due. Date
Spectrum Analyzer	R&S	FSP	836079/035	2013-05-07	2014-05-06
EMI Test Receiver	R&S	ESVB	825471/005	2013-05-07	2014-05-06
Pre-amplifier	Agilent	8447F	3113A06717	2013-05-07	2014-05-06
Pre-amplifier	Compliance Direction	PAP-0118	24002	2013-05-07	2014-05-06
Trilog Broadband Antenna	SCHWARZBECK	VULB9163	9163-333	2013-04-20	2014-04-19
Horn Antenna	ETS	3117	00086197	2013-04-20	2014-04-19

### 9.3 Test Procedure

According to the KDB 558074 D01 v03r01, the band-edge radiated test method as follows:

Set span = wide enough to capture the peak level of the emission operating on the channel closest to the bandedge, as well as any modulation products which fall outside of the authorized band of operation (2310MHz to 2420MHz for low bandedge, 2460MHz to 2500MHz for the high bandedge)

RBW = 1MHz, VBW = 1MHz for peak value measured

RBW = 1MHz, VBW = 10Hz for average value measured

Sweep = auto; Detector function = peak/average; Trace = max hold

All the trace to stabilize, set the marker on the emission at the bandedge, or on the highest modulation product outside of the band, if this level is greater than that at the bandedge. Enable the marker-delta function, then use the marker-to-peak function to move the marker to the peak of the in-band emission. Those emission must comply with the 15.209 limit for fall in the restricted bands listed in section 15.205. Note that the method of measurement KDB publication number: 913591 may be used for the radiated bandedge measurements.

## 9.4 Environmental Conditions

Temperature:	23°C
Relative Humidity:	54%
ATM Pressure:	1011 mbar

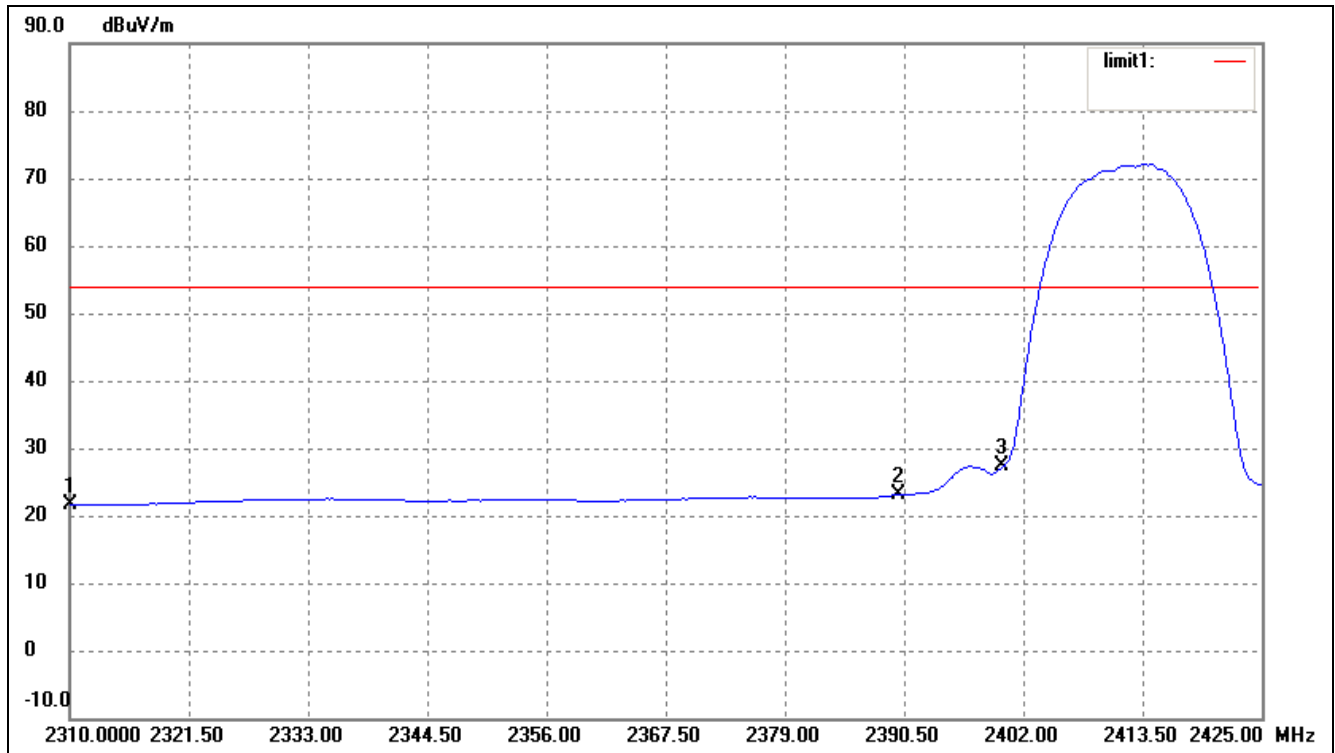
## 9.5 Summary of Test Results/Plots

Test Mode	Test Frequency MHz	Limit dBuV / dBc	Result
802.11b	2390.00	<54 dBuV	Pass
	2400.00	<54 dBuV	Pass
	2483.50	<54 dBuV	Pass
802.11g	2390.00	<54 dBuV	Pass
	2400.00	<54 dBuV	Pass
	2483.50	<54 dBuV	Pass
802.11n-HT20	2390.00	<54 dBuV	Pass
	2400.00	<54 dBuV	Pass
	2483.50	<54 dBuV	Pass
802.11n-HT40	2390.00	<54 dBuV	Pass
	2400.00	<54 dBuV	Pass
	2483.50	<54 dBuV	Pass

The edge emissions are below the FCC 15.209 Limits or complies with the 15.247(d) requirements.

Please refer to the test plots as below.

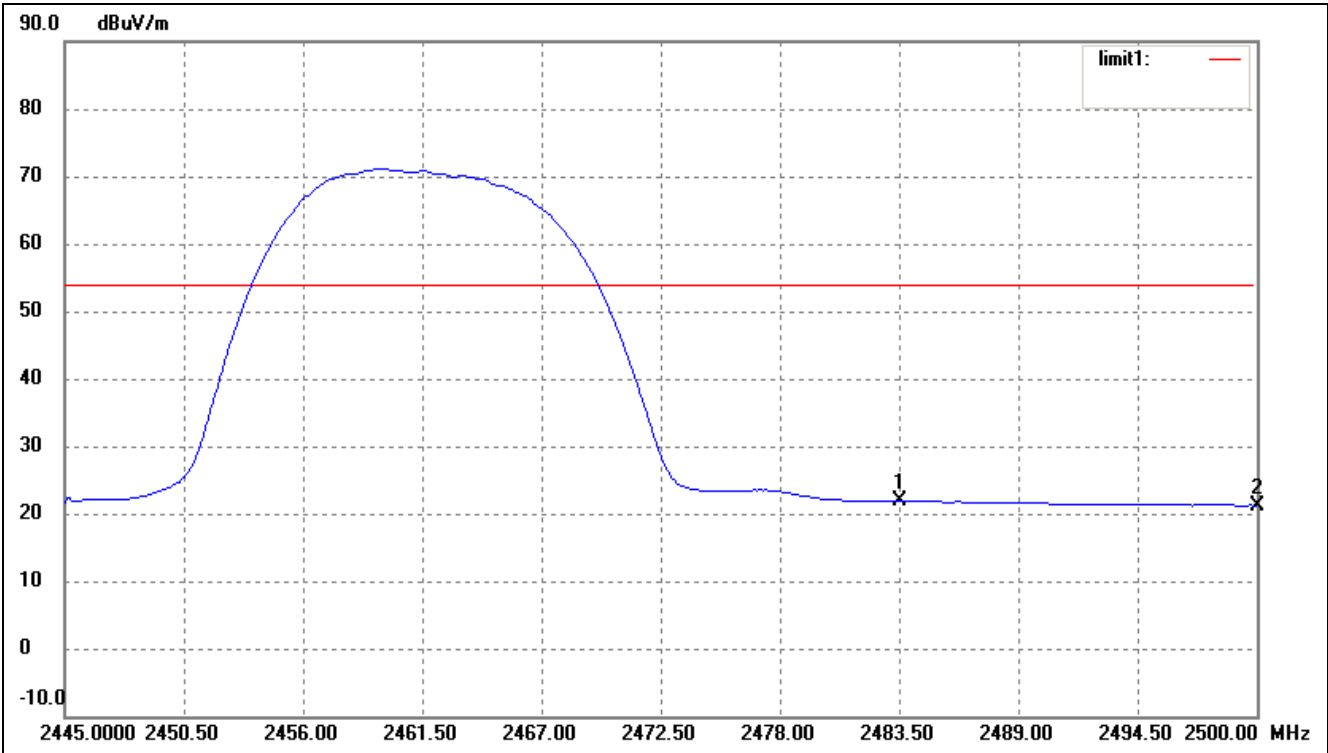
## 802.11b-Lowest Bandedge



No.	Frequency (MHz)	Reading (dBuV/m)	Correct dB/m	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	2310.000	33.29	-11.72	21.57	54.00	-32.43	AV Detector
	2310.000	47.32	-11.72	35.60	74.00	-38.40	Peak Detector
2	2390.000	34.87	-11.75	23.12	54.00	-30.88	AV Detector
	2390.000	49.85	-11.75	38.10	74.00	-35.90	Peak Detector
3	2400.000	39.16	-11.75	27.41	54.00	-26.59	AV Detector
	2400.000	53.37	-11.75	41.62	74.00	-32.38	Peak Detector

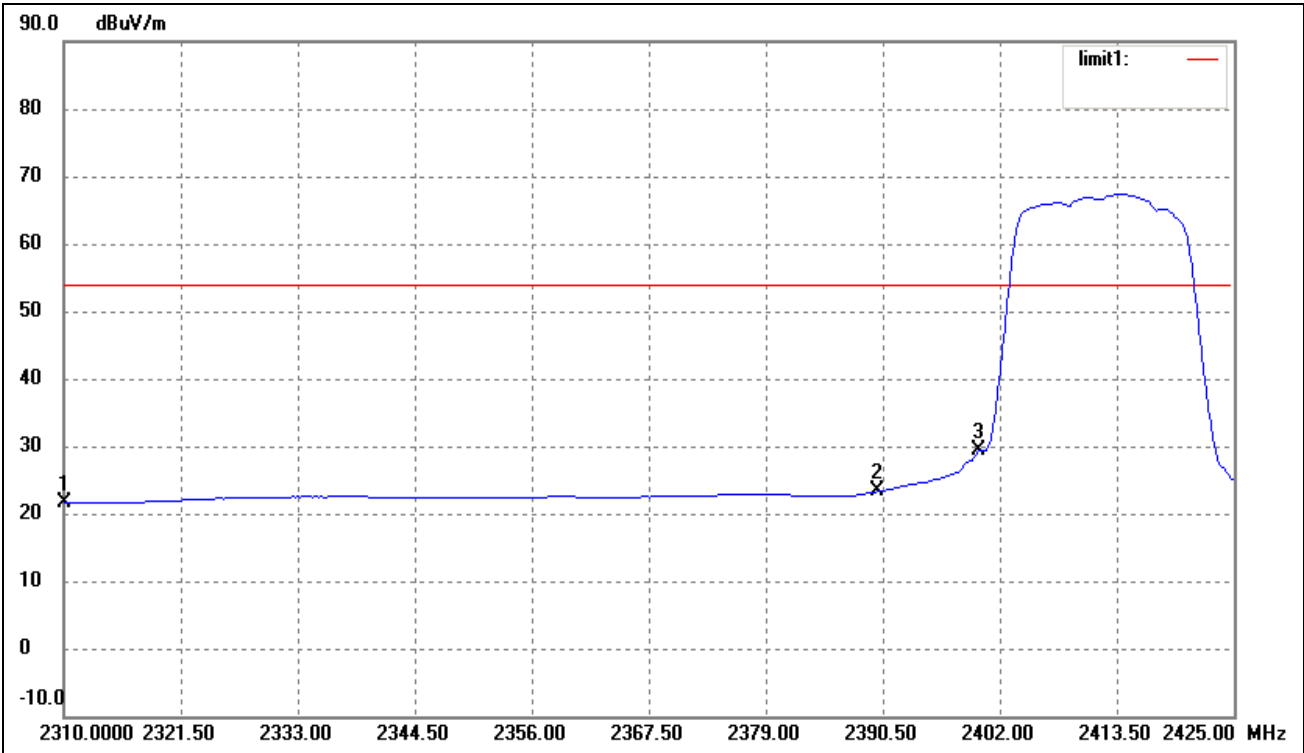


802.11b-Highest Bandedge



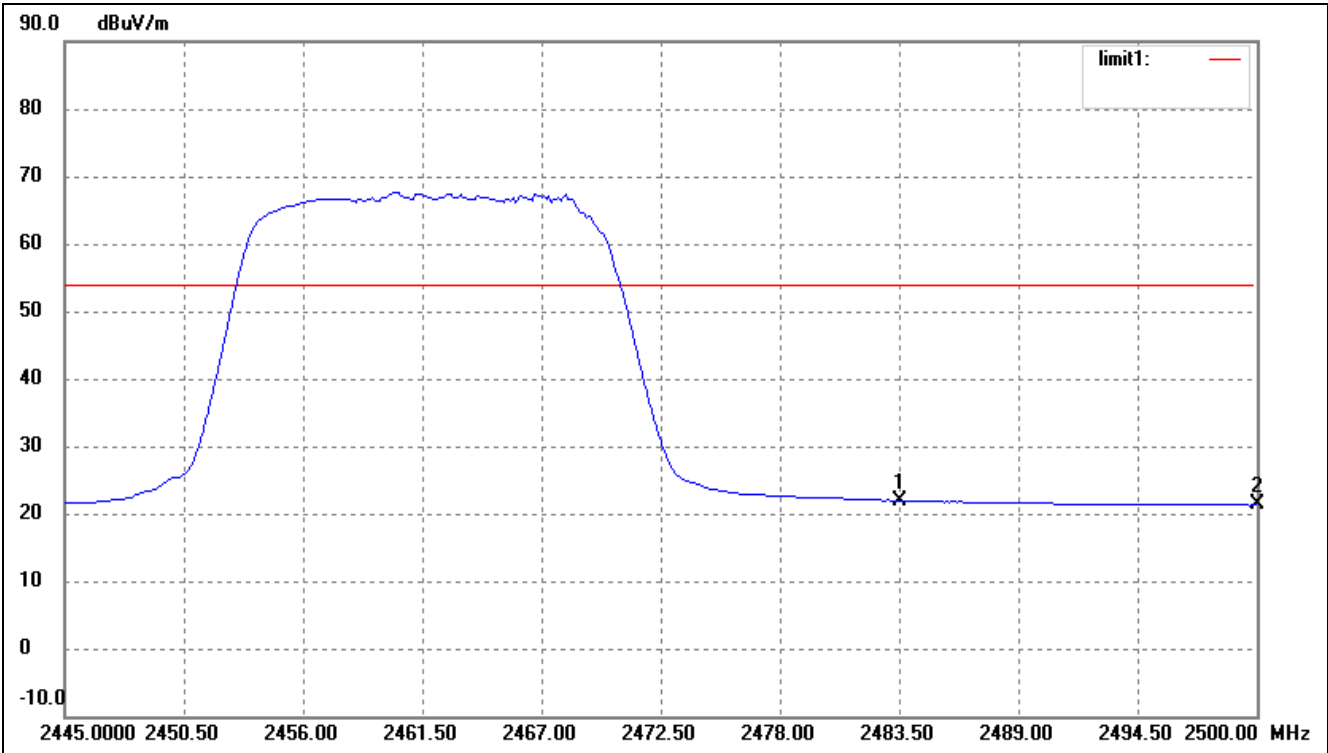
No.	Frequency	Reading	Correct	Result	Limit	Margin	Remark
	(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	
1	2483.500	33.62	-11.78	21.84	54.00	-32.16	AV Detector
	2483.500	47.02	-11.78	35.24	74.00	-38.76	Peak Detector
2	2500.000	33.01	-11.78	21.23	54.00	-32.77	AV Detector
	2500.000	46.91	-11.78	35.13	74.00	-38.87	Peak Detector

802.11g-Lowest Bandedge



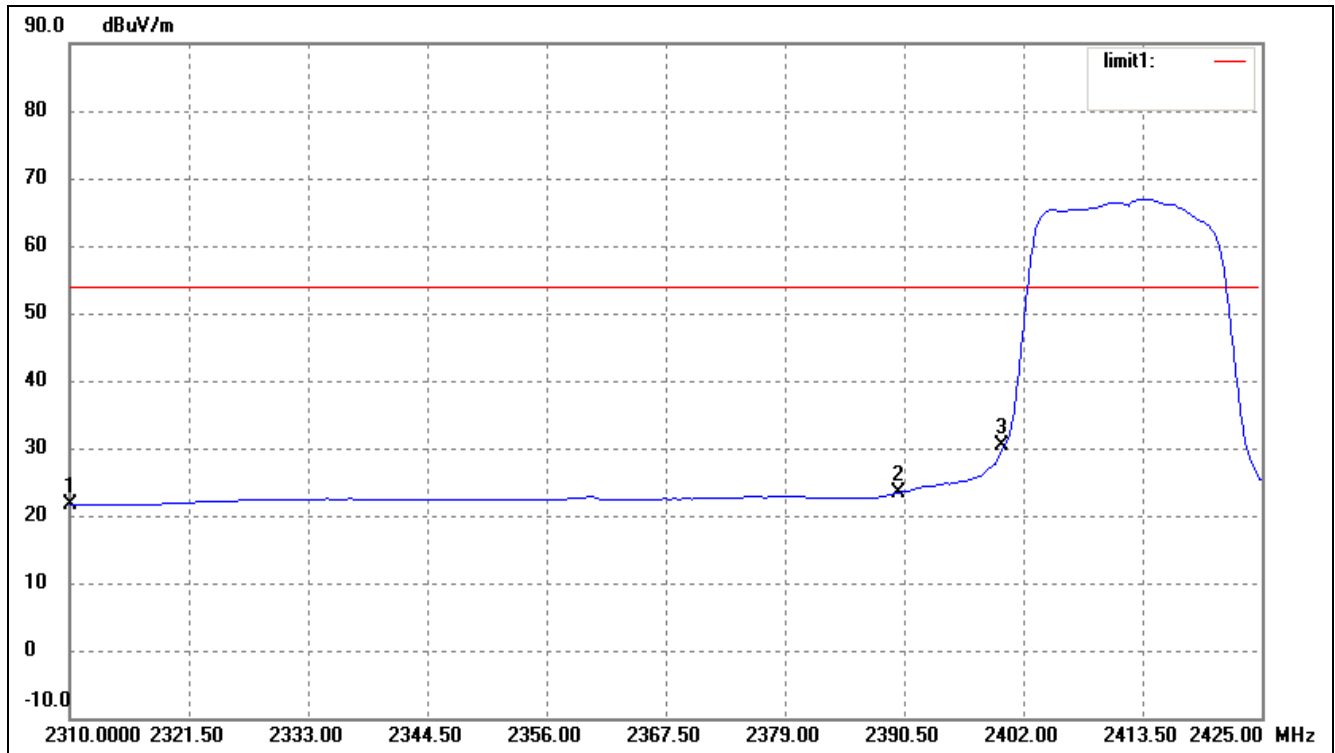
No.	Frequency	Reading	Correct	Result	Limit	Margin	Remark
	(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	
1	2310.000	33.29	-11.72	21.57	54.00	-32.43	AV Detector
	2310.000	46.44	-11.72	34.72	74.00	-39.28	Peak Detector
2	2390.000	35.04	-11.75	23.29	54.00	-30.71	AV Detector
	2390.000	48.81	-11.75	37.06	74.00	-36.94	Peak Detector
3	2400.000	41.19	-11.75	29.44	54.00	-24.56	AV Detector
	2400.000	59.00	-11.75	47.25	74.00	-26.75	Peak Detector

802.11g-Highest Bandedge



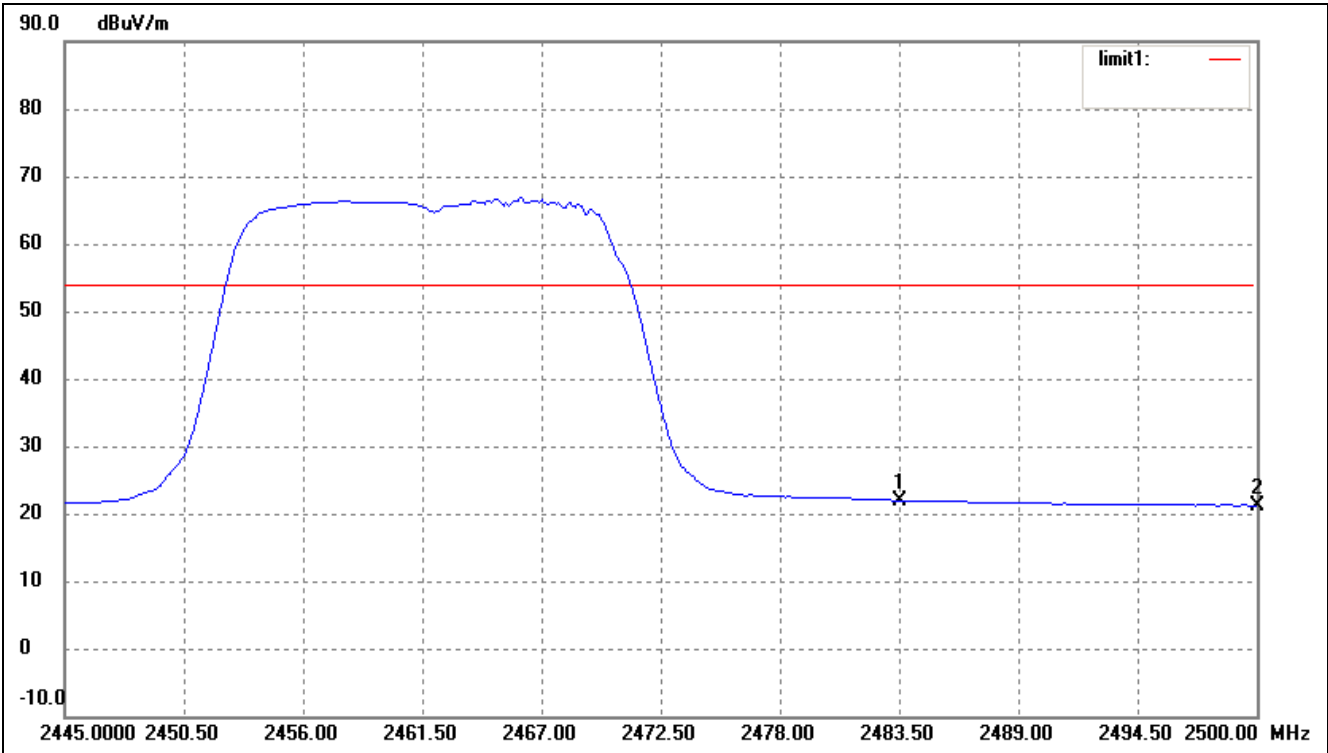
No.	Frequency	Reading	Correct	Result	Limit	Margin	Remark
	(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	
1	2483.500	33.68	-11.78	21.90	54.00	-32.10	AV Detector
	2483.500	46.96	-11.78	35.18	74.00	-38.82	Peak Detector
2	2500.000	33.07	-11.78	21.29	54.00	-32.71	AV Detector
	2500.000	46.98	-11.78	35.20	74.00	-38.80	Peak Detector

## 802.11n-HT20-Lowest Bandedge



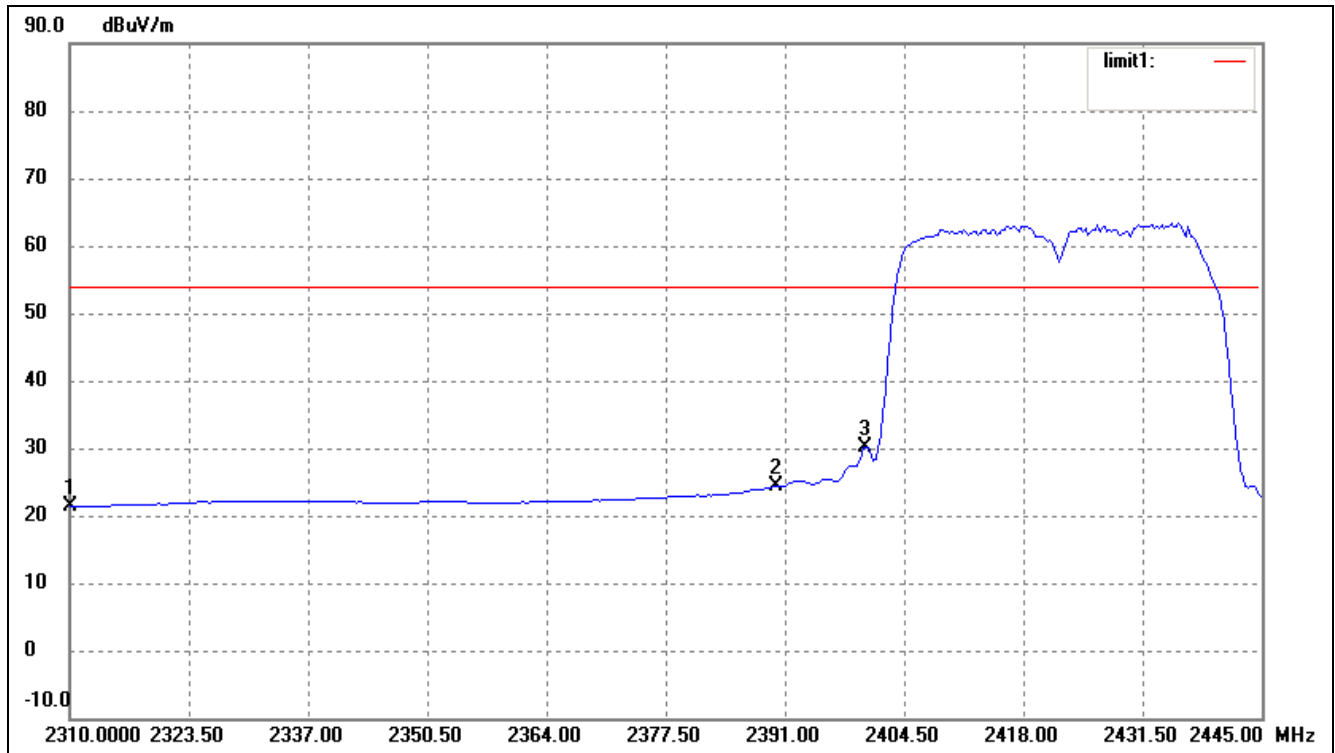
No.	Frequency (MHz)	Reading (dBuV/m)	Correct dB/m	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	2310.000	33.26	-11.72	21.54	54.00	-32.46	AV Detector
	2310.000	46.79	-11.72	35.07	74.00	-38.93	Peak Detector
2	2390.000	35.17	-11.75	23.42	54.00	-30.58	AV Detector
	2390.000	52.32	-11.75	40.57	74.00	-33.43	Peak Detector
3	2400.000	42.24	-11.75	30.49	54.00	-23.51	AV Detector
	2400.000	55.93	-11.75	44.18	74.00	-29.82	Peak Detector

802.11n-HT20-Highest Bandedge



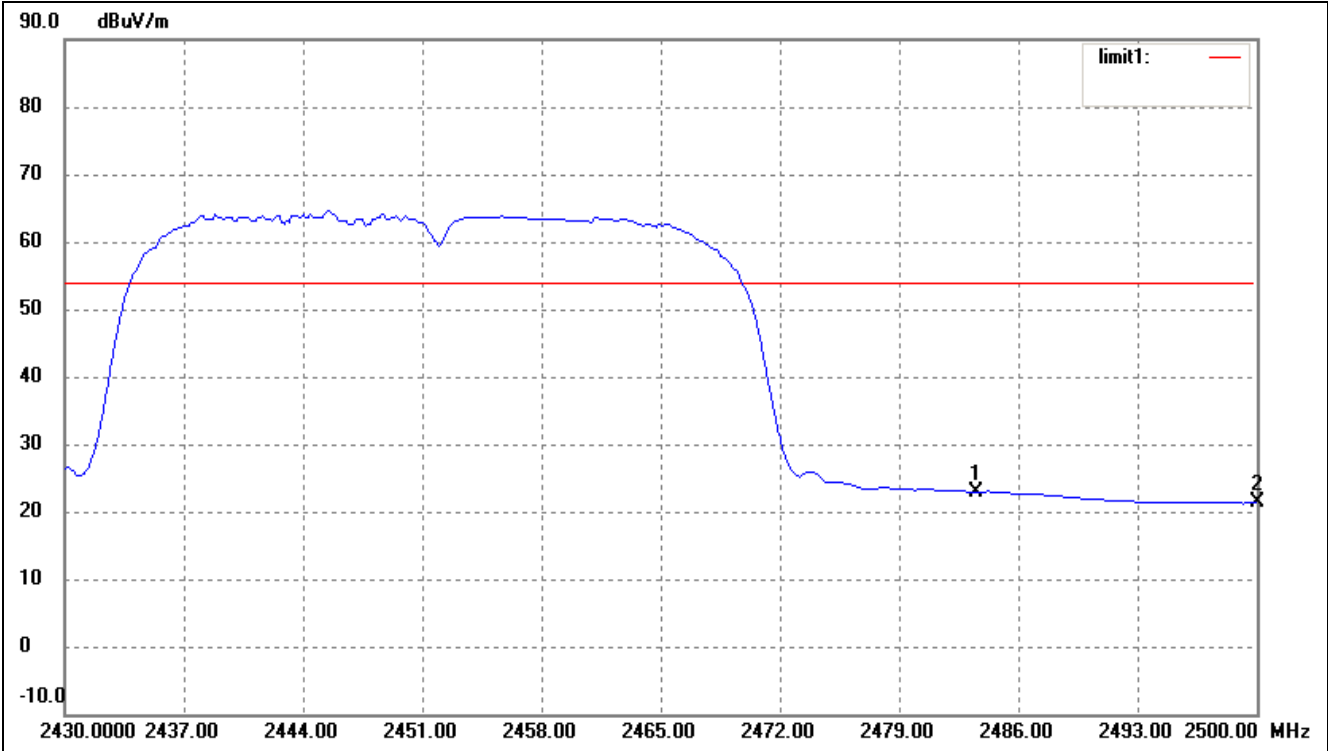
No.	Frequency	Reading	Correct	Result	Limit	Margin	Remark
	(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	
1	2483.500	33.74	-11.78	21.96	54.00	-32.04	AV Detector
	2483.500	47.69	-11.78	35.91	74.00	-38.09	Peak Detector
2	2500.000	33.03	-11.78	21.25	54.00	-32.75	AV Detector
	2500.000	47.14	-11.78	35.36	74.00	-38.64	Peak Detector

## 802.11n-HT40-Lowest Bandedge



No.	Frequency (MHz)	Reading (dBuV/m)	Correct dB/m	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	2310.000	33.13	-11.72	21.41	54.00	-32.59	AV Detector
	2310.000	46.45	-11.72	34.73	74.00	-39.27	Peak Detector
2	2390.000	36.20	-11.75	24.45	54.00	-29.55	AV Detector
	2390.000	55.96	-11.75	44.21	74.00	-29.79	Peak Detector
3	2400.000	41.92	-11.75	30.17	54.00	-23.83	AV Detector
	2400.000	59.66	-11.75	47.91	74.00	-26.09	Peak Detector

802.11n-HT40-Highest Bandedge



No.	Frequency	Reading	Correct	Result	Limit	Margin	Remark
	(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	
1	2483.500	34.75	-11.78	22.97	54.00	-31.03	AV Detector
	2483.500	50.07	-11.78	38.29	74.00	-35.71	Peak Detector
2	2500.000	33.07	-11.78	21.29	54.00	-32.71	AV Detector
	2500.000	46.88	-11.78	35.10	74.00	-38.90	Peak Detector

## 10. Conducted Emissions

### 10.1 Measurement Uncertainty

Base on NIS 81, The Treatment of Uncertainty in EMC Measurements, the best estimate of the uncertainty of any conducted emissions measurement is  $\pm 2.88$  dB.

### 10.2 Test Equipment List and Details

Description	Manufacturer	Model	Serial Number	Cal. Date	Due. Date
EMI Test Receiver	Rohde & Schwarz	ESPI	101611	2013-05-07	2014-05-06
L.I.S.N	Schwarz beck	NSLK8126	8126-224	2013-05-07	2014-05-06
Pulse Limiter	Rohde & Schwarz	ESH3-Z2	100911	2013-05-07	2014-05-06

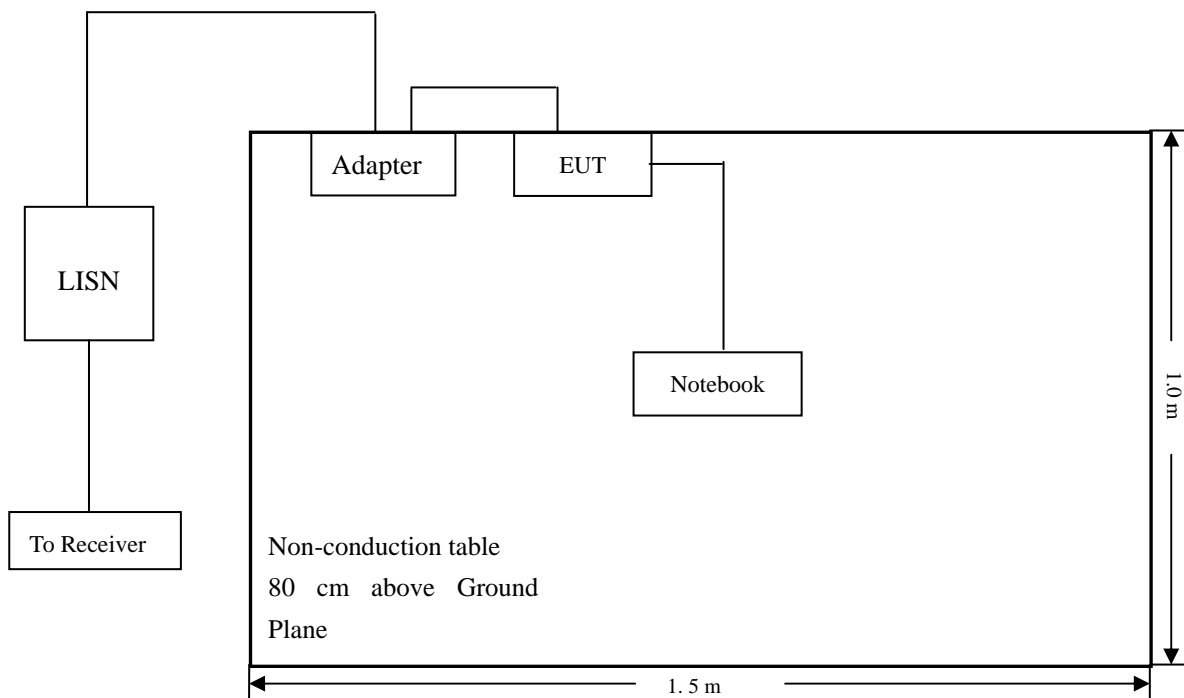
### 10.3 Test Procedure

The setup of EUT is according with per ANSI C63.4-2003 measurement procedure. The specification used was with the FCC Part 15.207 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.

### 10.4 Basic Test Setup Block Diagram





10.5 Environmental Conditions

Temperature:	25 °C
Relative Humidity:	52%
ATM Pressure:	1012 mbar

10.6 Test Receiver Setup

During the conducted emission test, the test receiver was set with the following configurations:

Start Frequency ..... 150 kHz  
Stop Frequency..... 30 MHz  
Sweep Speed ..... Auto  
IF Bandwidth..... 10 kHz  
Quasi-Peak Adapter Bandwidth ..... 9 kHz  
Quasi-Peak Adapter Mode ..... Normal

10.7 Summary of Test Results/Plots

According to the data in section 9.8, the EUT complied with the FCC Part 15.207 Conducted margin for a Class B device, with the *worst* margin reading of:

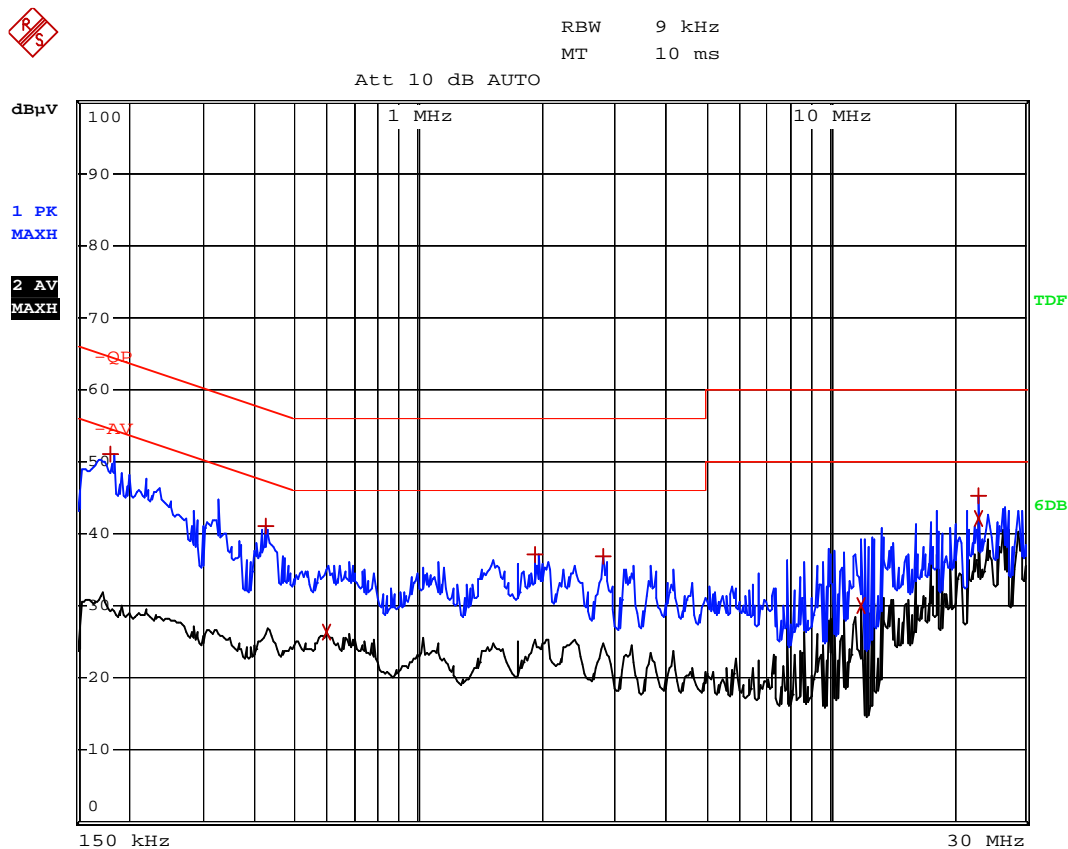
**-7.63 dB** at **23.13 MHz** in the **Line, Average** detector, 0.15-30MHz

10.8 Conducted Emissions Test Data

Plot of Conducted Emissions Test Data

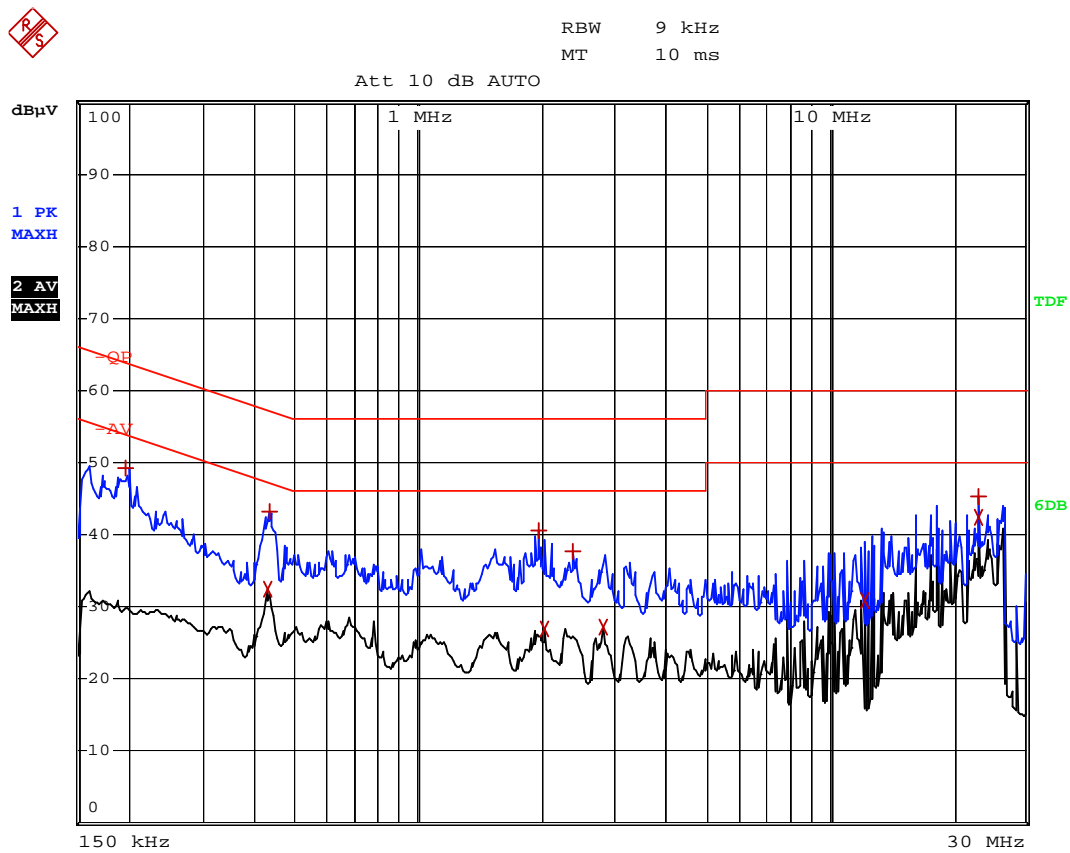
EUT: Tablet PC  
Tested Model: F-7HD2Core  
Operating Condition: Wireless Transmitting  
Comment: AC 120V/60Hz; Adapter DC 5V

Test Specification: Neutral



EDIT PEAK LIST (Prescan Results)			
Trace1:	-QP		
Trace2:	-AV		
Trace3:	---		
TRACE	FREQUENCY	LEVEL dBµV	DELTA LIMIT dB
1 Max Peak	182 kHz	50.99	-13.39
1 Max Peak	426 kHz	41.15	-16.17
2 Average	594 kHz	26.39	-19.60
1 Max Peak	1.934 MHz	37.21	-18.78
1 Max Peak	2.826 MHz	36.90	-19.09
2 Average	11.89 MHz	30.05	-19.94
1 Max Peak	23.13 MHz	45.37	-14.62
2 Average	23.13 MHz	42.04	-7.95

Test Specification: Line



EDIT PEAK LIST (Prescan Results)			
Trace1:	-QP		
Trace2:	-AV		
Trace3:	---		
TRACE	FREQUENCY	LEVEL dBμV	DELTA LIMIT dB
1 Max Peak	198 kHz	49.11	-14.58
2 Average	430 kHz	32.33	-14.91
1 Max Peak	434 kHz	43.19	-13.98
1 Max Peak	1.962 MHz	40.44	-15.55
2 Average	2.022 MHz	26.84	-19.16
1 Max Peak	2.37 MHz	37.76	-18.23
2 Average	2.822 MHz	27.21	-18.78
2 Average	12.198 MHz	30.86	-19.13
1 Max Peak	23.126 MHz	45.21	-14.78
2 Average	23.13 MHz	42.36	-7.63

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