

FCC PART 15C TEST REPORT FOR CERTIFICATION
On Behalf of

You Long Electrical Ind.(Shenzhen) Co., Ltd.,

Air washer

Model Number: Robert

FCC ID: 2AB68ROBERTW

Prepared for : You Long Electrical Ind.(Shenzhen) Co., Ltd.,
Da Wang San Tseng Ind Zone, Shajing, Baoan,
Shenzhen,Guangdong

Prepared By : EST Technology Co., Ltd.
Santun(guantai Road), Houjie Town, DongGuan City,
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Tel: 86-769-83081888-808

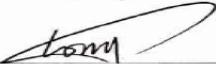
Report Number: ESTE-R1404019
Date of Test : March 27,2014~ April 22, 2014
Date of Report : April 25, 2014

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Test Report Verification

Applicant:	You Long Electrical Ind.(Shenzhen) Co., Ltd.,	
Address:	Da Wang San Tseng Ind Zone, Shajing, Baoan, Shenzhen,Guangdong	
Manufacturer	You Long Electrical Ind.(Shenzhen) Co., Ltd.,	
Address:	Da Wang San Tseng Ind Zone, Shajing, Baoan, Shenzhen,Guangdong	
E.U.T:	Air washer	
Model Number:	Robert	
Power Supply:	AC 120V/60Hz	
Test Voltage:	AC 120V/60Hz	
Trade Name:	-----	Serial No.: -----
Date of Receipt:	March 27, 2014	Date of Test: March 27~ April 22, 2014
Test Specification:	FCC Rules and Regulations Part 15 Subpart C:2013 ANSI C63.4:2009	
Test Result:	<p>The device described above is tested by EST Technology Co., Ltd.. The measurement results were contained in this test report and EST Technology Co., Ltd. was assumed full responsibility for the accuracy and completeness of these measurements. Also, this report shows that the EUT to be technically compliance with the FCC Rules and Regulations Part 15 Subpart C requirements.</p> <p>This report applies to above tested sample only and shall not be reproduced in part without written approval of EST Technology Co., Ltd.</p>	
Date: April 25, 2014		
Prepared by:	Tested by:	Approved by:
		
Ada / Assistant	Tony.Tang/ Engineer	IcemanHu / Manager
Other Aspects: None.		
Abbreviations: OK/P=passed fail/F=failed n.a/N=not applicable E.U.T=equipment under tested		
<p><i>This test report is based on a single evaluation of one sample of above mentioned products ,It is not permitted to be duplicated in extracts without written approval of EST Technology Co., Ltd.</i></p>		

1. GENERAL INFORMATION

1.1. Description of Device (EUT)

Product Name

: Air washer

Model Number

: Robert

FCC ID

: 2AB68ROBERTW

Operation frequency

: IEEE 802.11b:2412MHz-2462MHz
IEEE 802.11g:2412MHz-2462MHz

Number of channel

: 11

Antenna

: Internal antenna, 2 dBi gain

Modulation

: IEEE 802.11b:DSSS(CKK,DQPSK,DBPSK)
IEEE 802.11g:OFDM(64QAM,16QAM,QPSK,BPSK)

Power Supply

: AC 120V/60Hz

Sample Type

: Prototype production

2. SUMMARY OF TEST

2.1. Summary of test result

Description of Test Item	Standard	Results
Power Line Conducted Emission	FCC Part 15: 15.207 ANSI C63.4:2009	PASS
Radiated Emission	FCC Part 15: 15.209 ANSI C63.4:2009 KDB 558074	PASS
Band Edge Compliance	FCC Part 15: 15.247 ANSI C63.4:2009 KDB 558074	PASS
Conducted spurious emissions	FCC Part 15: 15.247 ANSI C63.4:2009 KDB 558074	PASS
6dB Bandwidth	FCC Part 15: 15.247 ANSI C63.4:2009 KDB 558074	PASS
Peak Output Power	FCC Part 15: 15.247 ANSI C63.4:2009 KDB 558074	PASS
Power Spectral Density	FCC Part 15: 15.247 ANSI C63.4:2009 KDB 558074	PASS
Antenna requirement	FCC Part 15: 15.203	PASS

2.2. Test Facilities

EMC Lab : Certificated by CNAL, CHINA
Registration No.: L5288
Date of registration: October 28, 2011

Certificated by FCC, USA
Registration No.: 989591
Date of registration: November 20, 2013

Certificated by Industry Canada
Registration No.: 46405-9405
Date of registration: January 03, 2013

Certificated by VCCI, Japan
Registration No.: R-3663 & C-4103
Date of registration: July 25, 2011

Certificated by TUV Rheinland, Germany
Registration No.: UA 50195514 0001
Date of registration: January 07, 2011

Certificated by TUV/PS, Shenzhen
Registration No.: SCN1017
Date of registration: January 27, 2011

Certificated by Intertek ETL SEMKO
Registration No.: 2011-RTL-L1-18
Date of registration: April 28, 2011

Certificated by Siemic, Inc.
Registration No.: SLCN021
Date of registration: November 8, 2011

Certificated by Nemko, Hong Kong
Registration No.: 175193
Date of registration: May 4, 2011

Name of Firm : EST Technology Co., Ltd.

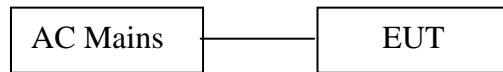
Site Location : San Tun Management Zone, Houjie Town, Dongguan, Guangdong, China

2.3. Assistant equipment used for test

2.3.1. N/A

2.4. Block Diagram

For radiated emissions test: EUT was placed on a turn table, which is 0.8 meter high above ground. EUT was set into BT test mode by Bluesuite software before test.



(EUT: Air washer)

2.5. Test mode

A special test software was used to control EUT work in Continuous TX mode(100% duty cycle), and select test channel, wireless mode and data rate.

Mode	data rate (Mbps)(see Note)	Channel	Frequency
IEEE 802.11b	11	Low:CH1	2412MHz
	11	Middle:CH6	2437MHz
	11	High:CH11	2462MHz
IEEE 802.11g	54	Low:CH1	2412MHz
	54	Middle:CH6	2437MHz
	54	High:CH11	2462MHz
Note1: According to exploratory test, EUT will have maximum output power in those data rate, so those data rate were used for all test.			

2.6. Test Equipment

2.6.1. For conducted emission test

Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
EMI Test Receiver	Rohde & Schwarz	ESHS30	832354	Jun,23,13	1 Year
Artificial Mains Network	Rohde & Schwarz	ENV216	101260	Jun,23,13	1 Year
Pulse Limiter	Rohde & Schwarz	ESH3-Z2	101100	Jun,23,13	1 Year

2.6.2. For radiated emission test(30-1000MHz)

Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
EMI Test Receiver	Rohde & Schwarz	ESVS10	100004	Jun,23,13	1 Year
Spectrum Analyzer	Agilent	E4411B	MY5014069 7	Jun ,23,13	1 Year
Bilog Antenna	Teseq	CBL 6111D	27090	Jun ,29,13	1 Year
Signal Amplifier	Agilent	310N	187037	Jun .23,13	1 Year
RF Cable	Hubersuhner	W10.02	534123	Jun .21,13	1 Year

2.6.3. For radiated emission test(above 1GHz)

Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Next Cal.
Horn Antenna	SCHWARZB ECK	BBHA 9120 D	BBHA9120D1 002	Jun .29,13	1 Year
Signal Amplifier	SCHWARZB ECK	BBV9718	9718-212	Jun .23,13	1 Year
Spectrum Analyzer	Agilent	E4408B	MY44211139	Jun .23,13	1 Year
RF Cable	Hubersuhner	RG 214/U	513423	Jun .21.13	1 Year

3 POWER LINE CONDUCTED EMISSION TEST

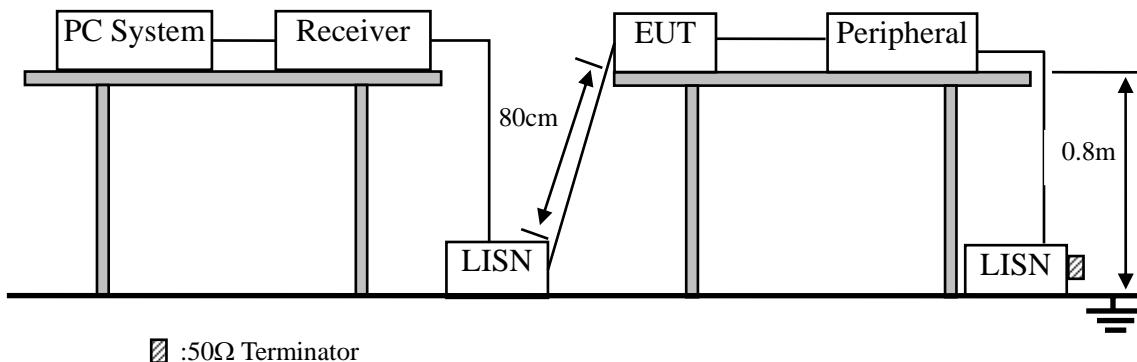
3.1. Limit

Frequency	Maximum RF Line Voltage	
	Quasi-Peak Level dB(μV)	Average Level dB(μV)
150kHz ~ 500kHz	66 ~ 56*	56 ~ 46*
500kHz ~ 5MHz	56	46
5MHz ~ 30MHz	60	50

Notes: 1. * Decreasing linearly with logarithm of frequency.

2. The lower limit shall apply at the transition frequencies.

3.2. Block Diagram of Test Setup



3.3 Test Procedure

The EUT was placed on a non-metallic table, 80cm above the ground plane. The EUT Power connected to the power mains through a line impedance stabilization network (L.I.S.N. 1#). This provides a 50 ohm coupling impedance for the EUT (Please refer the block diagram of the test setup and photographs). The AC line are checked to find out the maximum conducted emission. In order to find the maximum emission levels, the relative positions of equipment and all of the interface cables shall be changed according to ANSI C63.10: 2009 on Conducted Emission Test.

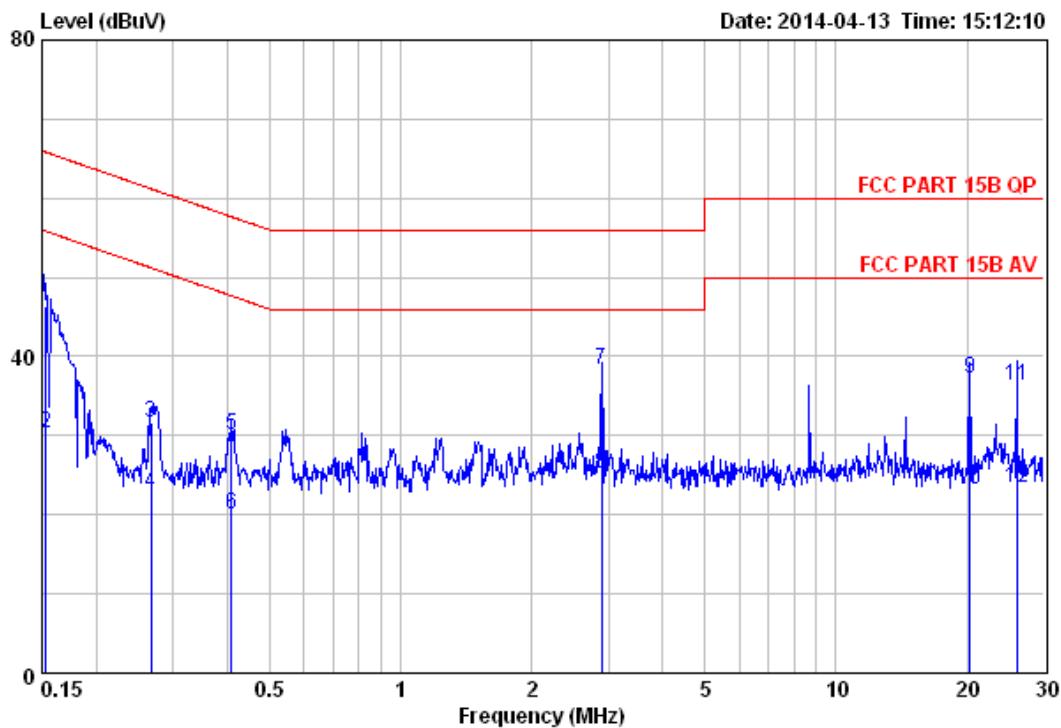
The bandwidth of test receiver (R & S ESHS30) is set at 10kHz.

The frequency range from 150kHz to 30MHz is checked.

3.4. Test Result

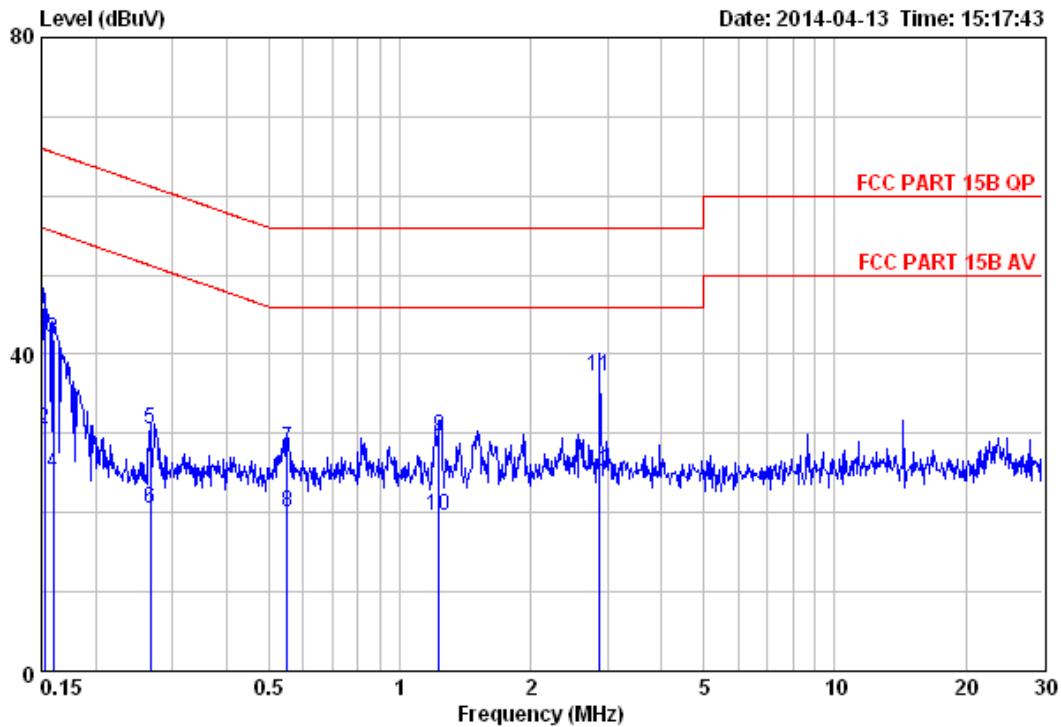
PASS. (All emissions not reported below are too low against the prescribed limits.)

3.5. Test data



Site no : EST Conduction Shielded Room
 Limit : FCC PART 15B QP LINE Phase:LINE
 Env. / Ins. : Temp:25.3'C Humi:58% Press:101.50kPa
 Engineer : Dick
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : TX Mode

Freq. (MHz)	LISN Factor (dB)	Cable		Emission				Remark
		Loss (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)		
1 0.15	9.61	9.81	26.89	46.31	65.82	19.51	QP	
2 0.15	9.61	9.81	10.89	30.31	55.82	25.51	Average	
3 0.27	9.61	9.83	12.31	31.75	61.20	29.45	QP	
4 0.27	9.61	9.83	3.31	22.75	51.20	28.45	Average	
5 0.41	9.61	9.82	10.56	29.99	57.68	27.69	QP	
6 0.41	9.61	9.82	0.56	19.99	47.68	27.69	Average	
7 2.90	9.63	9.84	18.82	38.29	56.00	17.71	QP	
8 2.90	9.63	9.84	5.82	25.29	46.00	20.71	Average	
9 20.27	9.67	9.98	17.56	37.21	60.00	22.79	QP	
10 20.27	9.67	9.98	3.56	23.21	50.00	26.79	Average	
11 26.00	9.68	10.04	16.68	36.40	60.00	23.60	QP	
12 26.00	9.68	10.04	3.68	23.40	50.00	26.60	Average	



Site no : EST Conduction Shielded Room
 Limit : FCC PART 15B QP LINE Phase:NEUTRAL
 Env. / Ins. : Temp:25.3'C Humi:58% Press:101.50kPa
 Engineer : Dick
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : TX Mode

Freq. (MHz)	LISN	Cable	Emission				Remark
	Factor (dB)	Loss (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	
1	0.15	9.47	9.81	26.33	45.61	65.87	QP
2	0.15	9.47	9.81	11.33	30.61	55.87	Average
3	0.16	9.49	9.81	22.63	41.93	65.47	QP
4	0.16	9.49	9.81	5.63	24.93	55.47	Average
5	0.27	9.60	9.83	10.99	30.42	61.20	QP
6	0.27	9.60	9.83	0.99	20.42	51.20	Average
7	0.55	9.60	9.82	8.65	28.07	56.00	QP
8	0.55	9.60	9.82	0.65	20.07	46.00	Average
9	1.23	9.61	9.82	10.25	29.68	56.00	QP
10	1.23	9.61	9.82	0.25	19.68	46.00	Average
11	2.88	9.63	9.84	17.71	37.18	56.00	QP
12	2.88	9.63	9.84	5.71	25.18	46.00	Average

4 RADIATED EMISSION TEST

4.1 Limit

4.1.1 15.209 limits

FREQUENCY MHz	DISTANCE Meters	FIELD STRENGTHS LIMIT	
		µV/m	dB(µV)/m
30 ~ 88	3	100	40.0
88 ~ 216	3	150	43.5
216 ~ 960	3	200	46.0
960 ~ 1000	3	500	54.0
Above 1000	3	74.0 dB(µV)/m (Peak) 54.0 dB(µV)/m (Average)	

Remark : (1) Emission level dBµV = 20 log Emission level µV/m

- (2) The smaller limit shall apply at the cross point between two frequency bands.
- (3) Distance is the distance in meters between the measuring instrument, antenna and the closest point of any part of the device or system.

4.1.2 15.205 Restricted bands of operation

MHz	MHz	MHz	GHz
0.090 - 0.110	16.42 - 16.423	399.9 - 410	4.5 - 5.15
¹ 0.495 - 0.505	16.69475 - 16.69525	608 - 614	5.35 - 5.46
2.1735 - 2.1905	16.80425 - 16.80475	960 - 1240	7.25 - 7.75
4.125 - 4.128	25.5 - 25.67	1300 - 1427	8.025 - 8.5
4.17725 - 4.17775	37.5 - 38.25	1435 - 1626.5	9.0 - 9.2
4.20725 - 4.20775	73 - 74.6	1645.5 - 1646.5	9.3 - 9.5
6.215 - 6.218	74.8 - 75.2	1660 - 1710	10.6 - 12.7
6.26775 - 6.26825	108 - 121.94	1718.8 - 1722.2	13.25 - 13.4
6.31175 - 6.31225	123 - 138	2200 - 2300	14.47 - 14.5
8.291 - 8.294	149.9 - 150.05	2310 - 2390	15.35 - 16.2
8.362 - 8.366	156.52475 - 156.52525	2483.5 - 2500	17.7 - 21.4
8.37625 - 8.38675	156.7 - 156.9	2690 - 2900	22.01 - 23.12
8.41425 - 8.41475	162.0125 - 167.17	3260 - 3267	23.6 - 24.0
12.29 - 12.293	167.72 - 173.2	3332 - 3339	31.2 - 31.8
12.51975 - 12.52025	240 - 285	3345.8 - 3358	36.43 - 36.5
12.57675 - 12.57725	322 - 335.4	3600 - 4400	(²)

All the emissions appearing within 15.205 restricted frequency bands shall not exceed the limits shown in 15.209, all the other emissions shall be at least 20dB below the fundamental emissions, or comply with 15.209 limits.

4.2. Test Procedure

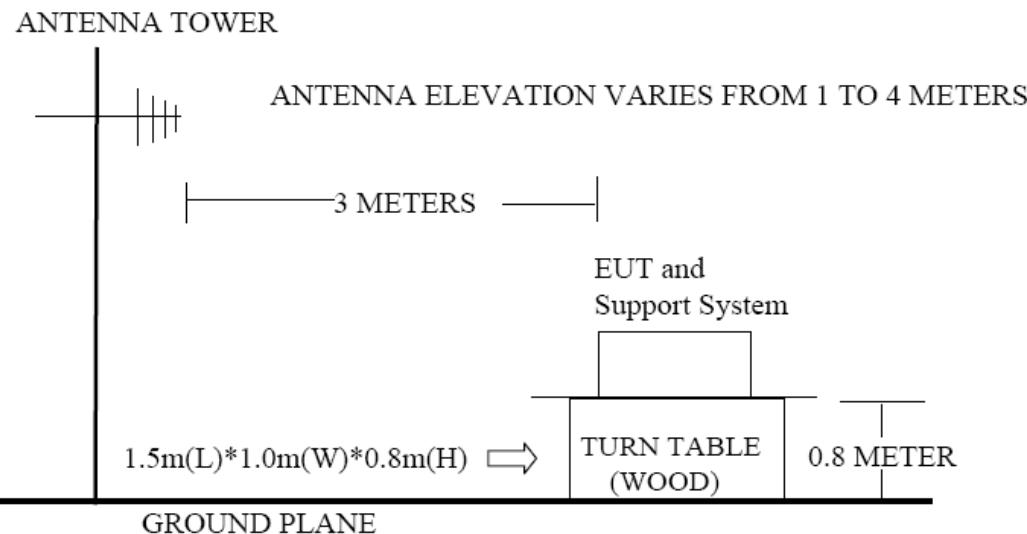
EUT and its simulators are placed on a turn table, which is 0.8 meter high above ground. The turn table can rotate 360 degrees to determine the position of the maximum emission level. Power on the EUT and let it working in test mode, then test it. EUT is set 3 meters away from the receiving antenna, which is mounted on a antenna tower. The antenna can be moved up and down between 1 meter and 4 meters to find out the maximum emission level. Broadband antenna (calibrated bilog antenna) is used as receiving antenna. Both horizontal and vertical polarization of the antenna are set on test.

The bandwidth of the EMI test receiver is set at 120kHz for frequency range from 30MHz to 1000 MHz.

The bandwidth of the Spectrum's VBW is set at 3MHz and RBW is set at 1MHz for peak emissions measurement above 1GHz and 1MHz RBW, 10Hz VBW for average emissions measure above 1GHz

The frequency range from 30MHz to 10th harmonic (25GHz) are checked. and no any emissions were found from 18GHz to 25 GHz, So the radiated emissions from 18GHz to 25GHz were not record.

4.3 Block Diagram of Test setup



4.4 Test Result

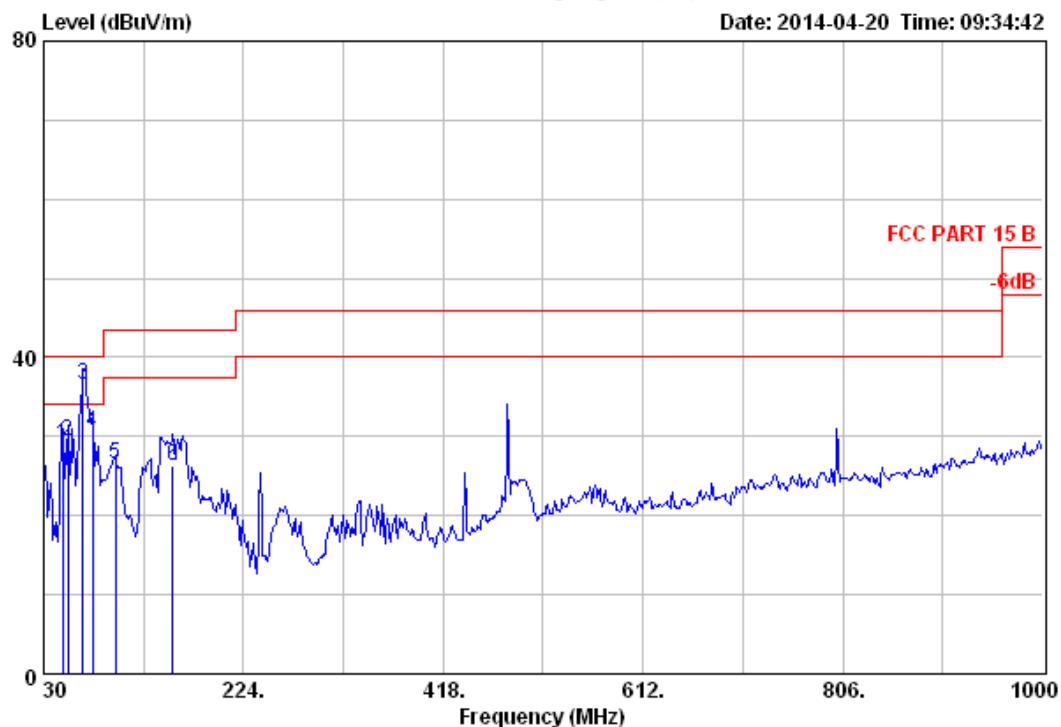
PASS.

All the emissions from 30MHz to 25 GHz were comply with 15.209 limits.

- Note:
- 1、For emissions above 1GHz, if peak level comply with average limit, then the average level is deemed to comply with average limit.
 - 2、The frequency 2412MHz 、2437MHz and 2462 MHz is fundamental frequency which no limit, the limit on plots is automatically generated by the software, it's not fundamental limit, we can't remove it.

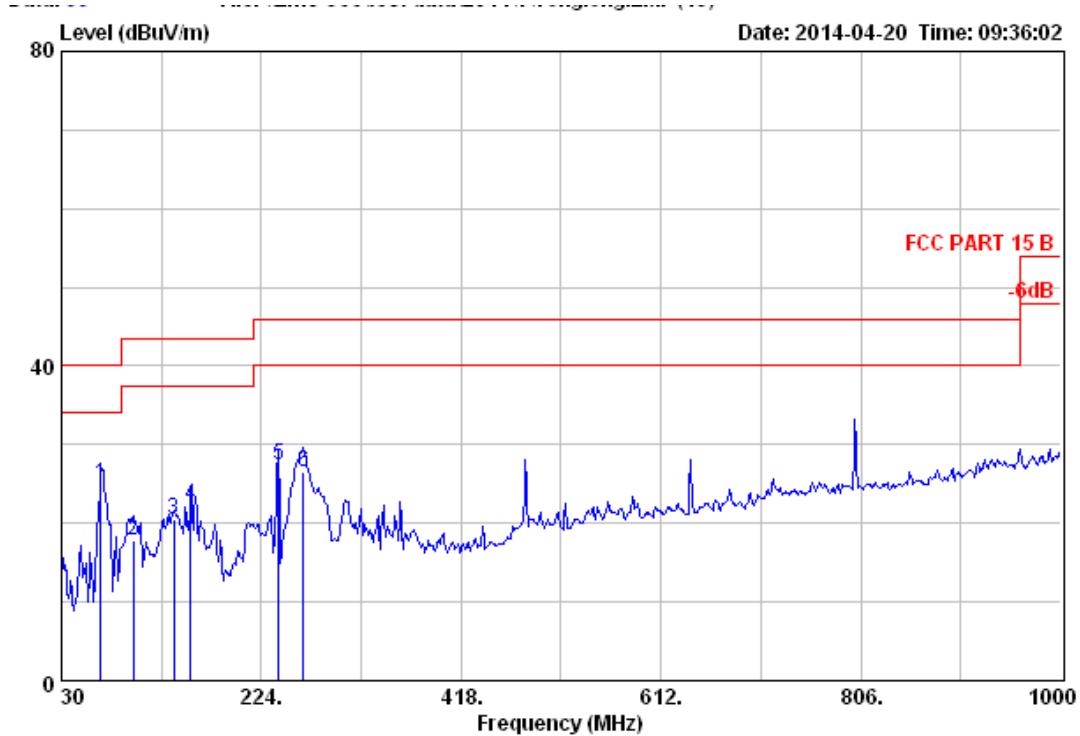
4.5 Test Data

30-1000 MHz



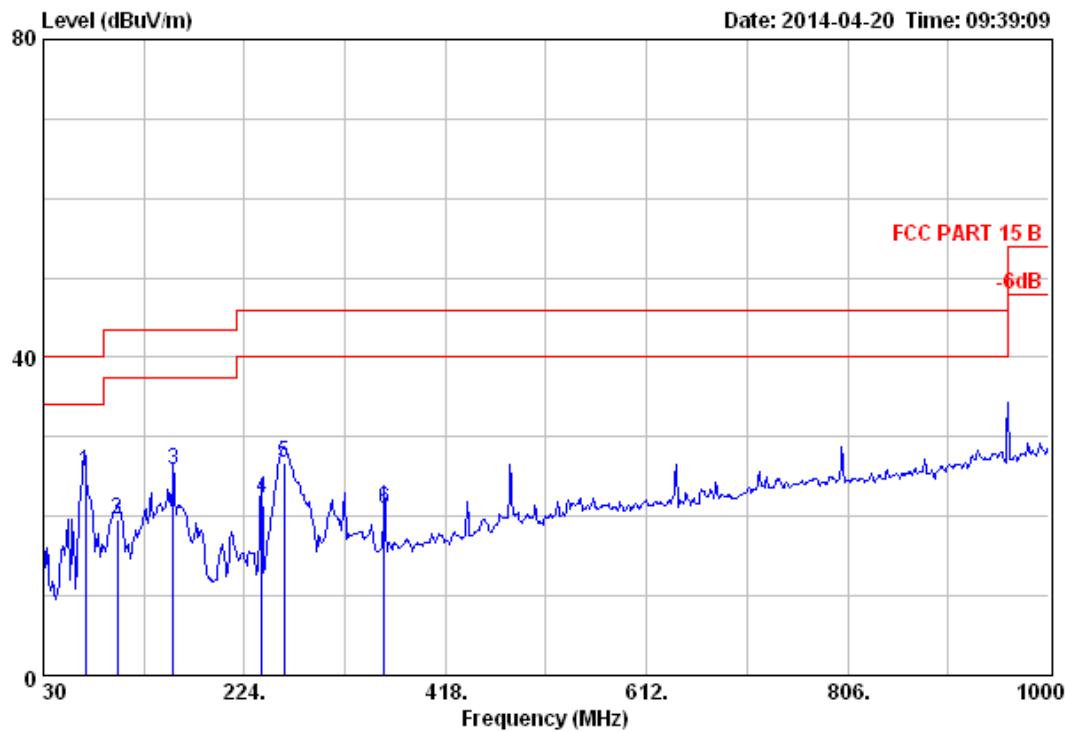
Site no : 3m Chamber
 Dis. / Ant. : 3m 27137
 Limit : FCC PART 15 B
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH1 2412TX

Freq. (MHz)	Ant Factor (dB/m)	Cable Loss (dB)	Reading (dBuV)	Emission			
				Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1 48.43	8.37	0.98	19.68	29.03	40.00	10.97	QP
2 53.28	6.11	0.91	22.35	29.37	40.00	10.63	QP
3 67.83	5.39	1.13	30.06	36.58	40.00	3.42	QP
4 77.53	6.80	1.20	22.45	30.45	40.00	9.55	QP
5 99.84	9.45	1.34	15.82	26.61	43.50	16.89	QP
6 155.13	10.67	1.69	13.96	26.32	43.50	17.18	QP



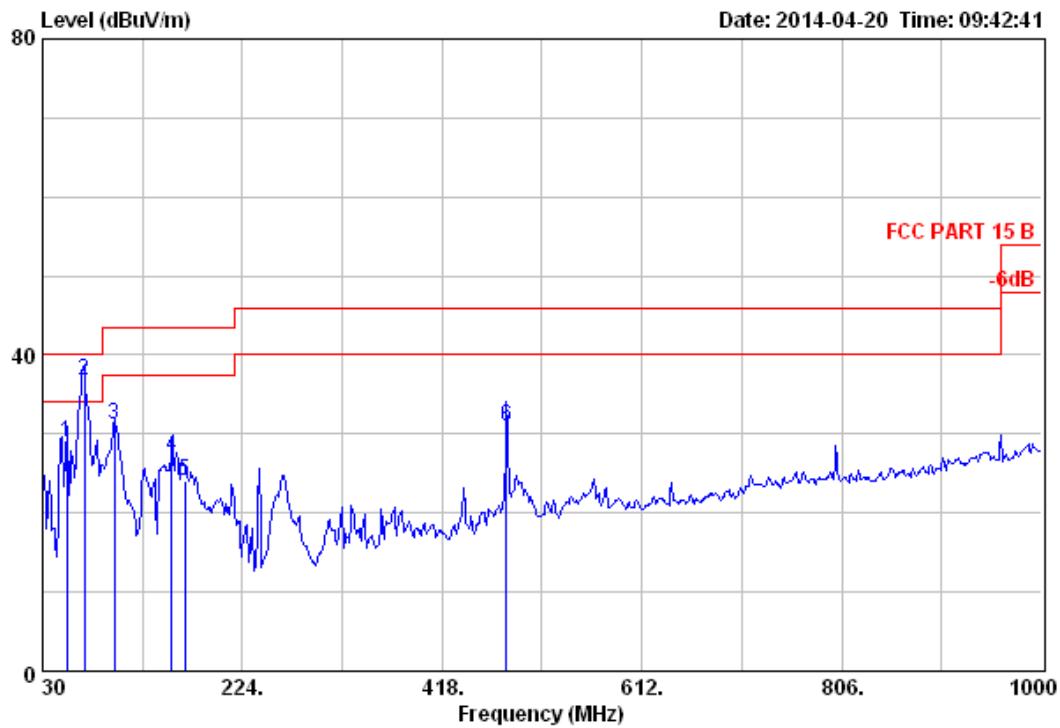
Site no : 3m Chamber Data no : 39
 Dis. / Ant. : 3m 27137 Ant./Pol.:HORIZONTAL
 Limit : FCC PART 15 B
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH1 2412TX

Freq. (MHz)	Ant Factor (dB/m)	Cable Loss (dB)	Reading (dBuV)	Emission				Remark
				Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)		
1 67.83	5.39	1.13	18.53	25.05	40.00	14.95	QP	
2 99.84	9.45	1.34	7.06	17.85	43.50	25.65	QP	
3 138.64	11.42	1.54	7.59	20.55	43.50	22.95	QP	
4 155.13	10.67	1.69	9.83	22.19	43.50	21.31	QP	
5 240.49	10.36	2.11	14.89	27.36	46.00	18.64	QP	
6 264.74	12.94	2.28	11.35	26.57	46.00	19.43	QP	



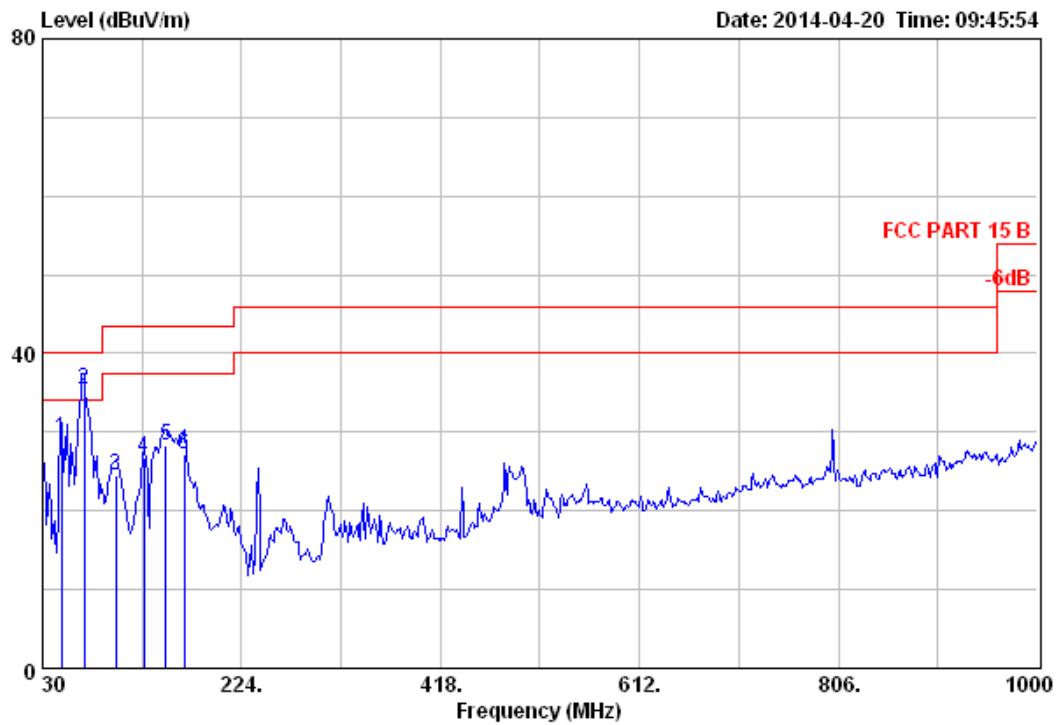
Site no : 3m Chamber Data no : 40
 Dis. / Ant. : 3m 27137 Ant./Pol.:HORIZONTAL
 Limit : FCC PART 15 B
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH6 2437TX

Freq. (MHz)	Ant Factor (dB/m)	Cable Loss (dB)	Reading (dBuV)	Emission				Remark
				Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)		
1 70.74	5.82	1.04	18.70	25.56	40.00	14.44	QP	
2 101.78	9.65	1.31	8.63	19.59	43.50	23.91	QP	
3 155.13	10.67	1.69	13.44	25.80	43.50	17.70	QP	
4 240.49	10.36	2.11	9.78	22.25	46.00	23.75	QP	
5 261.83	12.96	2.19	11.58	26.73	46.00	19.27	QP	
6 358.83	14.45	2.56	3.86	20.87	46.00	25.13	QP	



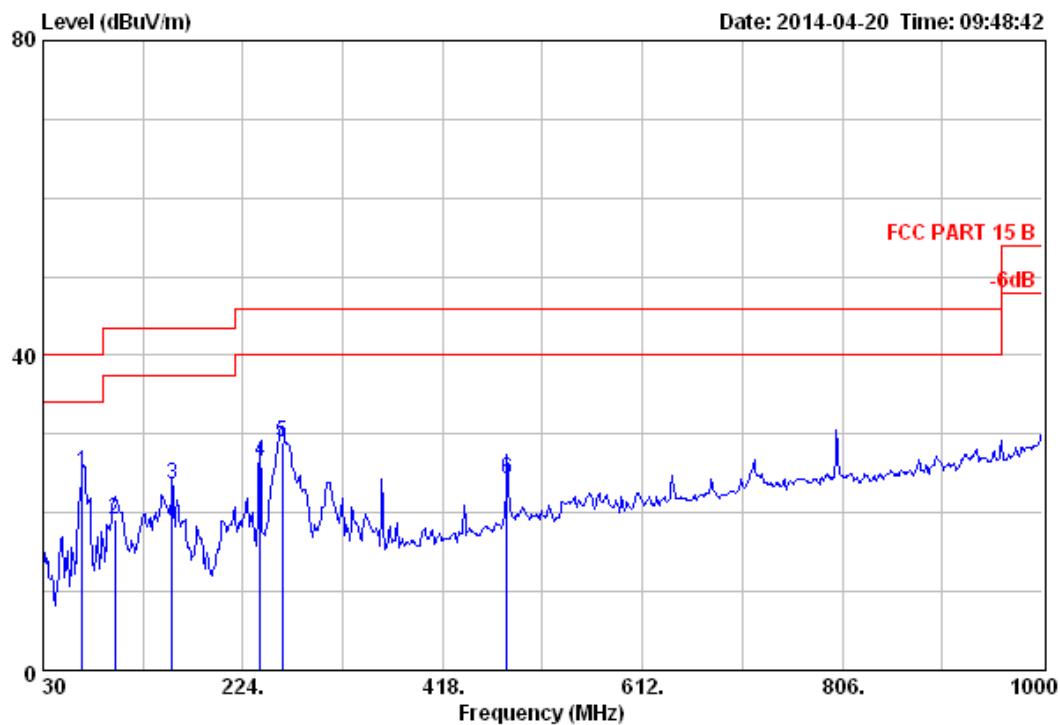
Site no : 3m Chamber Data no : 41
 Dis. / Ant. : 3m 27137 Ant./Pol.: VERTICAL
 Limit : FCC PART 15 B
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH6 2437TX

Freq. (MHz)	Ant Factor (dB/m)	Cable Loss (dB)	Reading (dBuV)	Emission			
				Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1 53.28	6.11	0.91	22.01	29.03	40.00	10.97	QP
2 70.74	5.82	1.04	29.88	36.74	40.00	3.26	QP
3 99.84	9.45	1.34	20.31	31.10	43.50	12.40	QP
4 155.13	10.67	1.69	14.93	27.29	43.50	16.21	QP
5 167.74	9.43	1.71	13.01	24.15	43.50	19.35	QP
6 480.08	17.45	3.10	10.51	31.06	46.00	14.94	QP



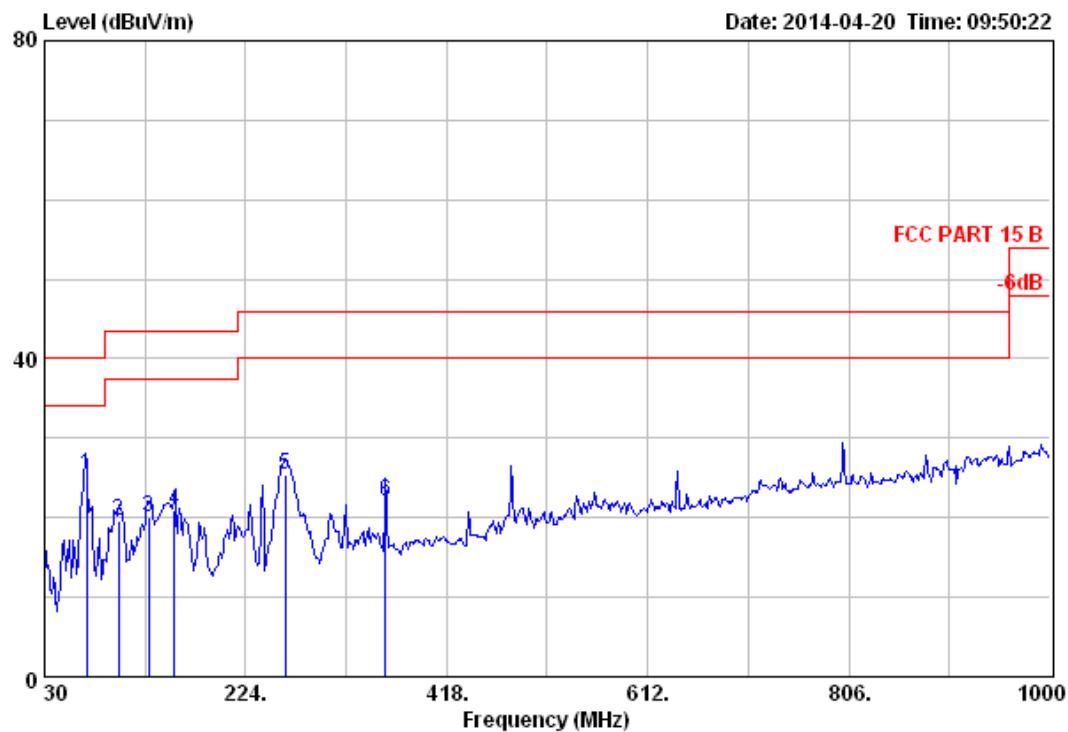
Site no : 3m Chamber Data no : 42
 Dis. / Ant. : 3m 27137 Ant./Pol.: VERTICAL
 Limit : FCC PART 15 B
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH11 2462TX

Freq. (MHz)	Ant Factor (dB/m)	Cable Loss (dB)	Reading (dBuV)	Emission			
				Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1 48.43	8.37	0.98	19.85	29.20	40.00	10.80	QP
2 70.74	5.82	1.04	28.62	35.48	40.00	4.52	QP
3 101.78	9.65	1.31	13.58	24.54	43.50	18.96	QP
4 128.94	11.33	1.47	14.02	26.82	43.50	16.68	QP
5 150.28	10.86	1.60	15.93	28.39	43.50	15.11	QP
6 167.74	9.43	1.71	16.07	27.21	43.50	16.29	QP



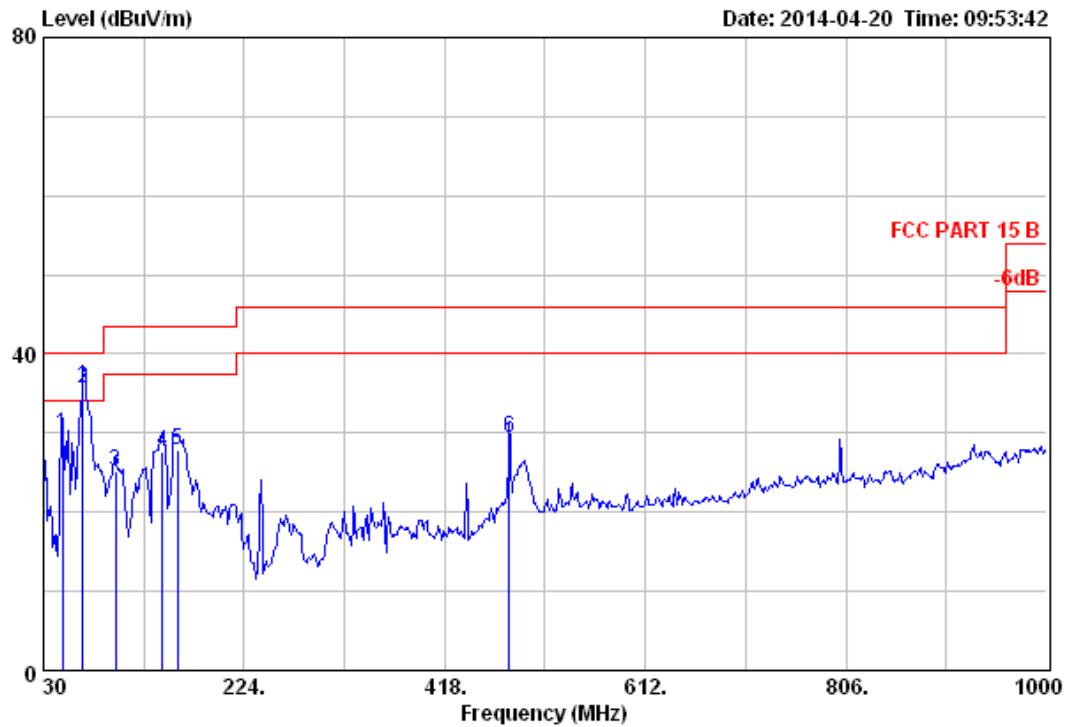
Site no : 3m Chamber Data no : 43
 Dis. / Ant. : 3m 27137 Ant./Pol.:HORIZONTAL
 Limit : FCC PART 15 B
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH11 2462TX

Freq. (MHz)	Ant Factor (dB/m)	Cable		Emission				Remark
		Loss (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)		
1 67.83	5.39	1.13	18.73	25.25	40.00	14.75	QP	
2 99.84	9.45	1.34	8.27	19.06	43.50	24.44	QP	
3 155.13	10.67	1.69	11.16	23.52	43.50	19.98	QP	
4 240.49	10.36	2.11	14.16	26.63	46.00	19.37	QP	
5 261.83	12.96	2.19	13.88	29.03	46.00	16.97	QP	
6 480.08	17.45	3.10	3.81	24.36	46.00	21.64	QP	



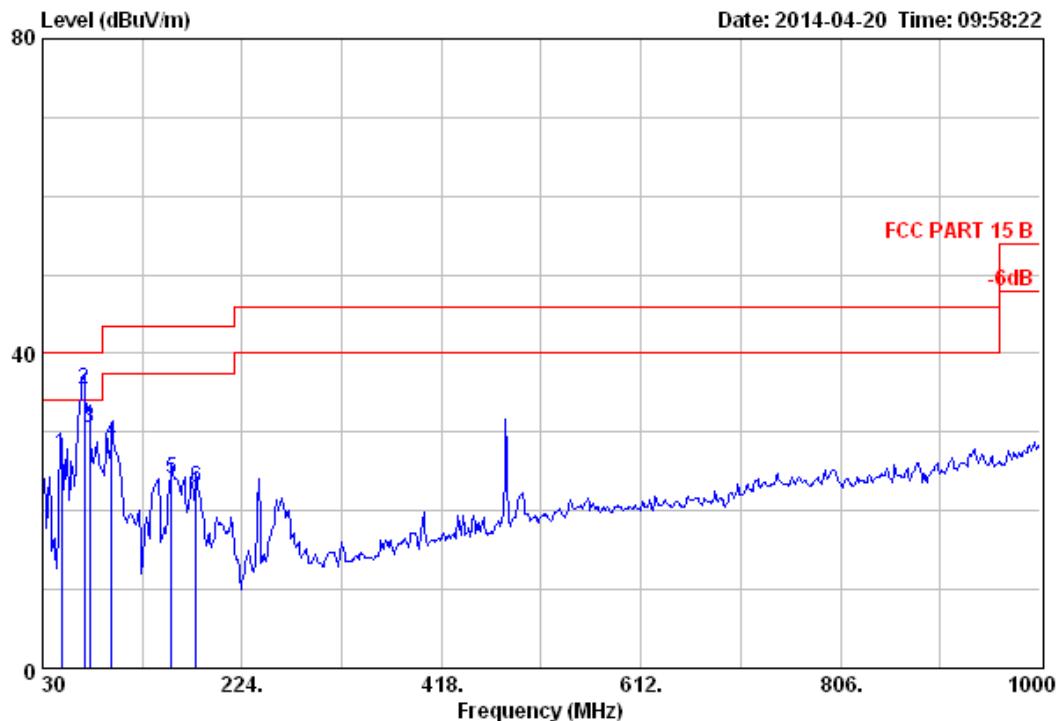
Site no : 3m Chamber Data no : 44
 Dis. / Ant. : 3m 27137 Ant./Pol.:HORIZONTAL
 Limit : FCC PART 15 B
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH1 2412TX

Freq. (MHz)	Ant Factor (dB/m)	Cable Loss (dB)	Reading (dBuV)	Emission			
				Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1 70.74	5.82	1.04	18.52	25.38	40.00	14.62	QP
2 101.78	9.65	1.31	8.55	19.51	43.50	23.99	QP
3 130.88	11.33	1.47	7.32	20.12	43.50	23.38	QP
4 155.13	10.67	1.69	8.59	20.95	43.50	22.55	QP
5 261.83	12.96	2.19	10.27	25.42	46.00	20.58	QP
6 358.83	14.45	2.56	5.01	22.02	46.00	23.98	QP



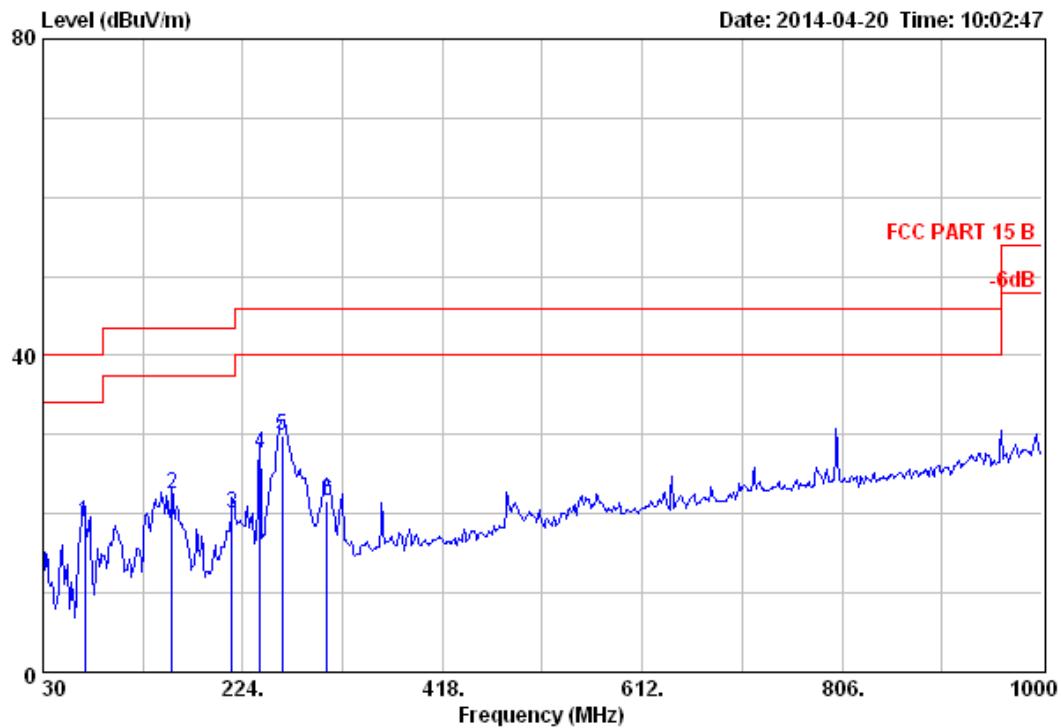
Site no : 3m Chamber Data no : 45
 Dis. / Ant. : 3m 27137 Ant./Pol.: VERTICAL
 Limit : FCC PART 15 B
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH1 2412TX

Freq. (MHz)	Ant Factor (dB/m)	Cable Loss (dB)	Reading (dBuV)	Emission			
				Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1 48.43	8.37	0.98	20.45	29.80	40.00	10.20	QP
2 67.83	5.39	1.13	29.11	35.63	40.00	4.37	QP
3 99.84	9.45	1.34	14.35	25.14	43.50	18.36	QP
4 145.43	11.22	1.53	14.86	27.61	43.50	15.89	QP
5 159.98	10.36	1.71	15.70	27.77	43.50	15.73	QP
6 480.08	17.45	3.10	8.92	29.47	46.00	16.53	QP



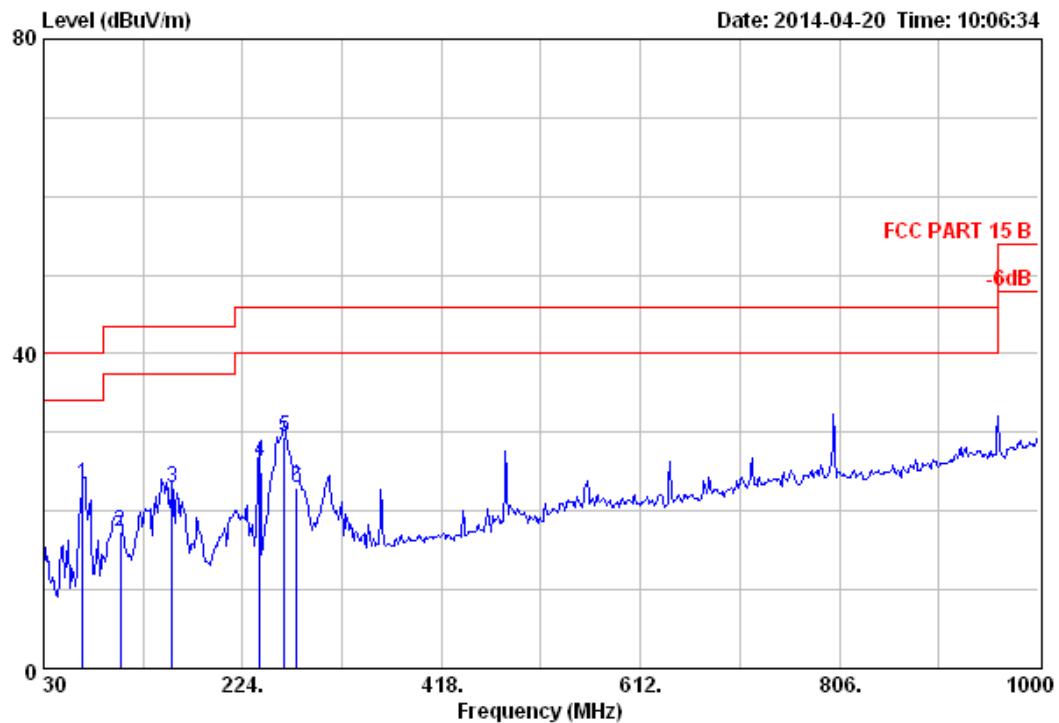
Site no : 3m Chamber Data no : 46
 Dis. / Ant. : 3m 27137 Ant./Pol.: VERTICAL
 Limit : FCC PART 15 B
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH6 2437TX

Freq. (MHz)	Ant Factor (dB/m)	Cable Loss (dB)	Reading (dBuV)	Emission			
				Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1 48.43	8.37	0.98	17.75	27.10	40.00	12.90	QP
2 70.74	5.82	1.04	28.50	35.36	40.00	4.64	QP
3 75.59	6.51	1.19	22.77	30.47	40.00	9.53	QP
4 96.93	8.92	1.33	18.39	28.64	43.50	14.86	QP
5 155.13	10.67	1.69	11.77	24.13	43.50	19.37	QP
6 179.38	8.96	1.72	12.28	22.96	43.50	20.54	QP



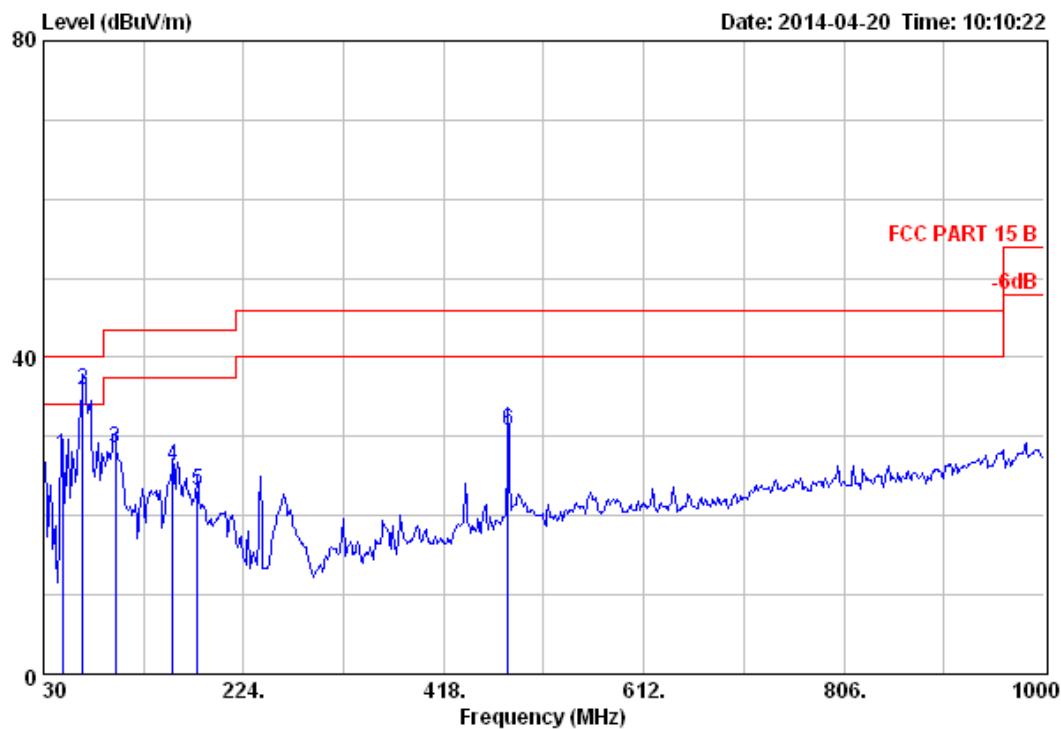
Site no : 3m Chamber Data no : 47
 Dis. / Ant. : 3m 27137 Ant./Pol.:HORIZONTAL
 Limit : FCC PART 15 B
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH6 2437TX

Freq. (MHz)	Ant Factor (dB/m)	Cable Loss (dB)	Reading (dBuV)	Emission				Remark
				Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)		
1 70.74	5.82	1.04	12.17	19.03	40.00	20.97	QP	
2 155.13	10.67	1.69	10.04	22.40	43.50	21.10	QP	
3 213.33	8.60	1.97	9.59	20.16	43.50	23.34	QP	
4 240.49	10.36	2.11	15.25	27.72	46.00	18.28	QP	
5 261.83	12.96	2.19	14.76	29.91	46.00	16.09	QP	
6 305.48	13.11	2.31	6.19	21.61	46.00	24.39	QP	



Site no : 3m Chamber Data no : 48
 Dis. / Ant. : 3m 27137 Ant./Pol.:HORIZONTAL
 Limit : FCC PART 15 B
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH11 2462TX

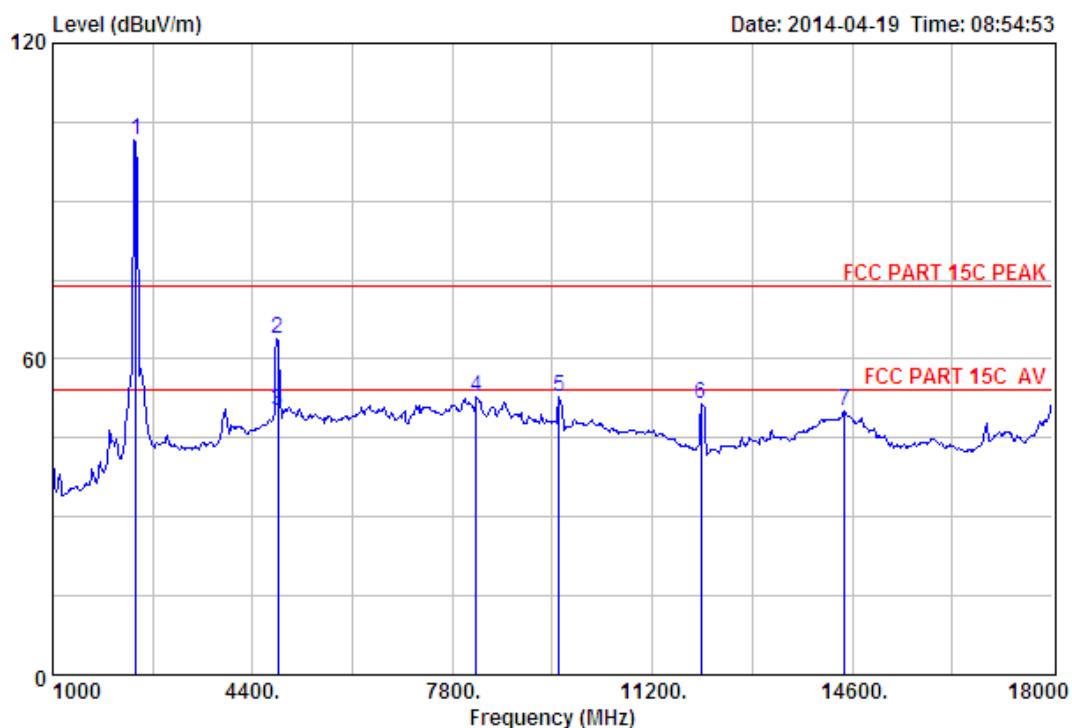
Freq. (MHz)	Ant Factor (dB/m)	Cable Loss (dB)	Reading (dBuV)	Emission			
				Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1 67.83	5.39	1.13	16.88	23.40	40.00	16.60	QP
2 104.69	9.95	1.44	6.07	17.46	43.50	26.04	QP
3 155.13	10.67	1.69	10.58	22.94	43.50	20.56	QP
4 240.49	10.36	2.11	13.89	26.36	46.00	19.64	QP
5 264.74	12.94	2.28	14.11	29.33	46.00	16.67	QP
6 276.38	12.36	2.26	8.27	22.89	46.00	23.11	QP



Site no : 3m Chamber Data no : 49
 Dis. / Ant. : 3m 27137 Ant./Pol.: VERTICAL
 Limit : FCC PART 15 B
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH11 2462TX

Freq. (MHz)	Ant Factor (dB/m)	Cable		Emission				Remark
		Loss (dB)	Reading (dBuV)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)		
1 48.43	8.37	0.98	18.37	27.72	40.00	12.28	QP	
2 67.83	5.39	1.13	29.42	35.94	40.00	4.06	QP	
3 99.84	9.45	1.34	17.70	28.49	43.50	15.01	QP	
4 155.13	10.67	1.69	13.93	26.29	43.50	17.21	QP	
5 179.38	8.96	1.72	12.56	23.24	43.50	20.26	QP	
6 480.08	17.45	3.10	10.16	30.71	46.00	15.29	QP	

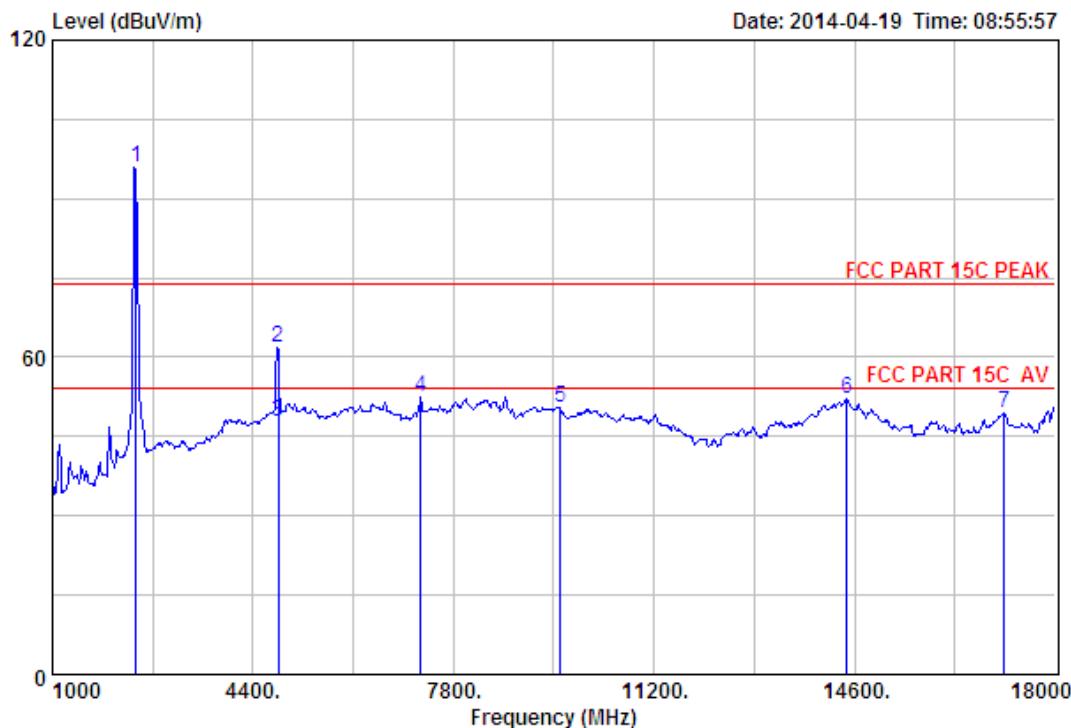
1000-18000 MHz



Site no. : 3m Chamber Data no. : 5
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH1 2412TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				Remark
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	
1 2412.00	27.60	6.64	34.15	101.43	101.52	74.00	-27.52	Peak
2 4824.00	31.28	11.84	31.83	52.61	63.90	74.00	10.10	Peak
3 4824.00	31.28	11.84	31.83	38.69	49.98	54.00	4.02	Average
4 8208.00	36.66	11.42	31.46	36.26	52.88	74.00	21.12	Peak
5 9619.00	37.93	11.68	31.92	35.22	52.91	74.00	21.09	Peak
6 12033.00	38.63	11.38	35.54	37.05	51.52	74.00	22.48	Peak
7 14464.00	41.85	10.93	32.96	30.19	50.01	74.00	23.99	Peak

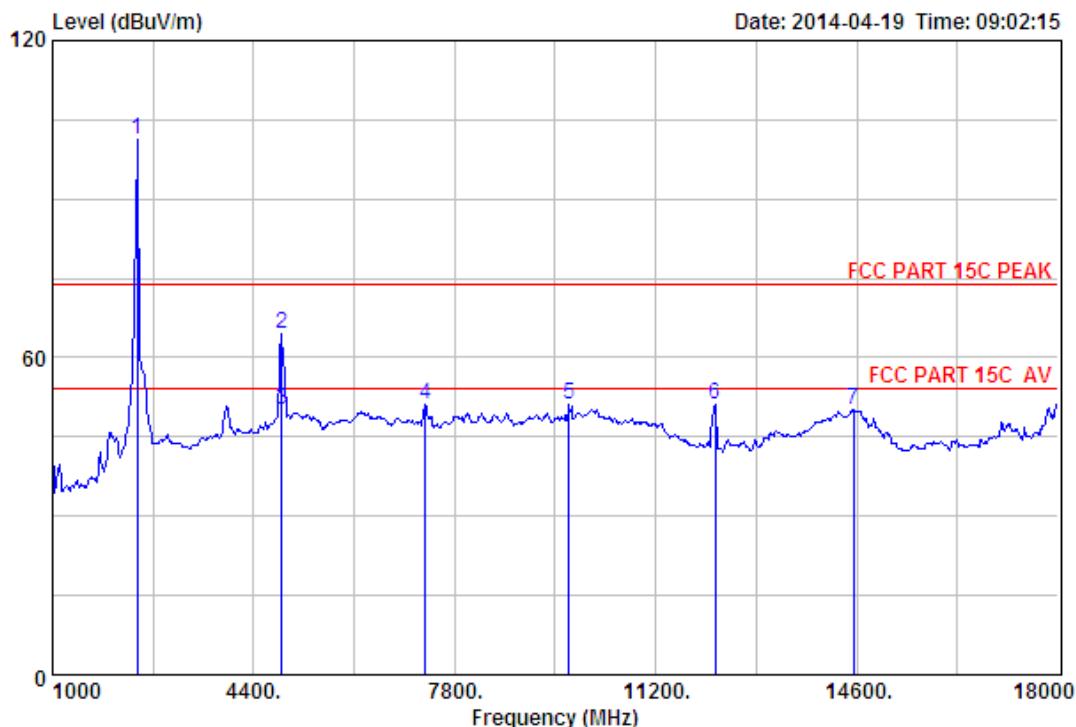
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 6
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH1 2412TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1 2412.00	27.60	6.64	34.15	95.82	95.91	74.00	-21.91	Peak
2 4824.00	31.28	11.84	31.83	50.45	61.74	74.00	12.26	Peak
3 4824.00	31.28	11.84	31.83	36.66	47.95	54.00	6.05	Average
4 7239.00	36.53	11.55	32.07	36.48	52.49	74.00	21.51	Peak
5 9619.00	37.93	11.68	31.92	32.76	50.45	74.00	23.55	Peak
6 14464.00	41.85	10.93	32.96	32.16	51.98	74.00	22.02	Peak
7 17133.00	40.26	10.94	33.03	31.29	49.46	74.00	24.54	Peak

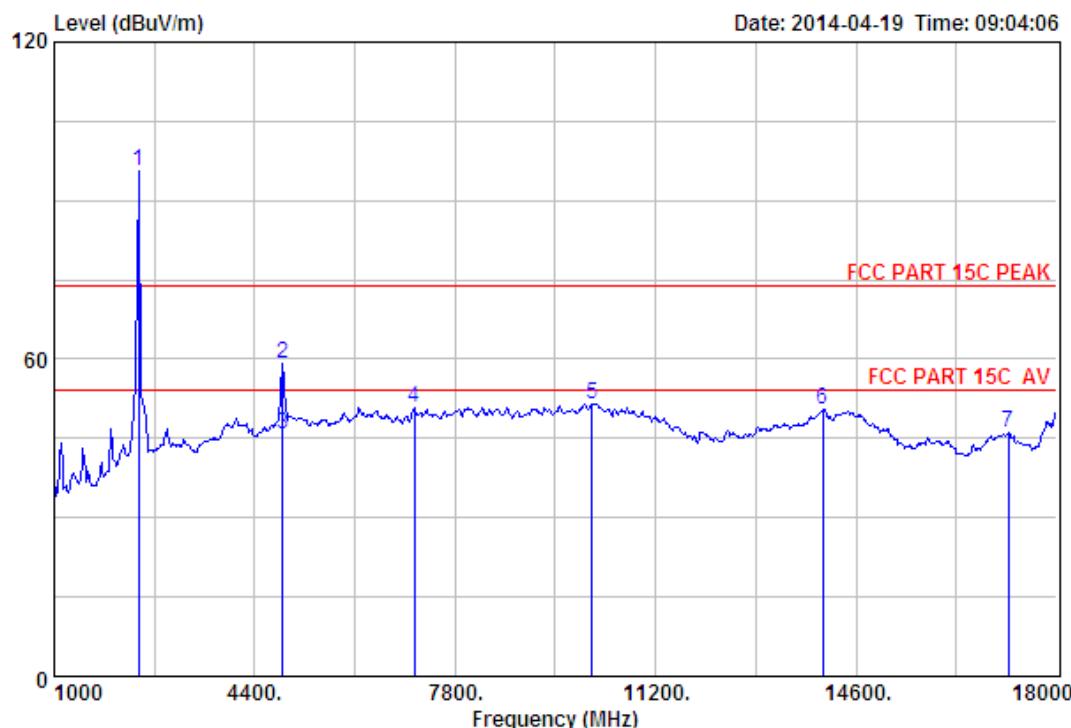
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 9
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH6 2437TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission					
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark	
<hr/>									
1 2437.00	27.60	6.67	34.12	101.22	101.37	74.00	-27.37	Peak	
2 4874.00	31.37	12.07	31.90	52.93	64.47	74.00	9.53	Peak	
3 4874.00	31.37	12.07	31.90	38.63	50.17	54.00	3.83	Average	
4 7307.00	36.55	11.57	32.00	34.99	51.11	74.00	22.89	Peak	
5 9738.00	38.11	11.65	31.87	33.17	51.06	74.00	22.94	Peak	
6 12203.00	38.68	11.20	35.71	37.03	51.20	74.00	22.80	Peak	
7 14549.00	41.77	10.92	33.26	30.80	50.23	74.00	23.77	Peak	
<hr/>									

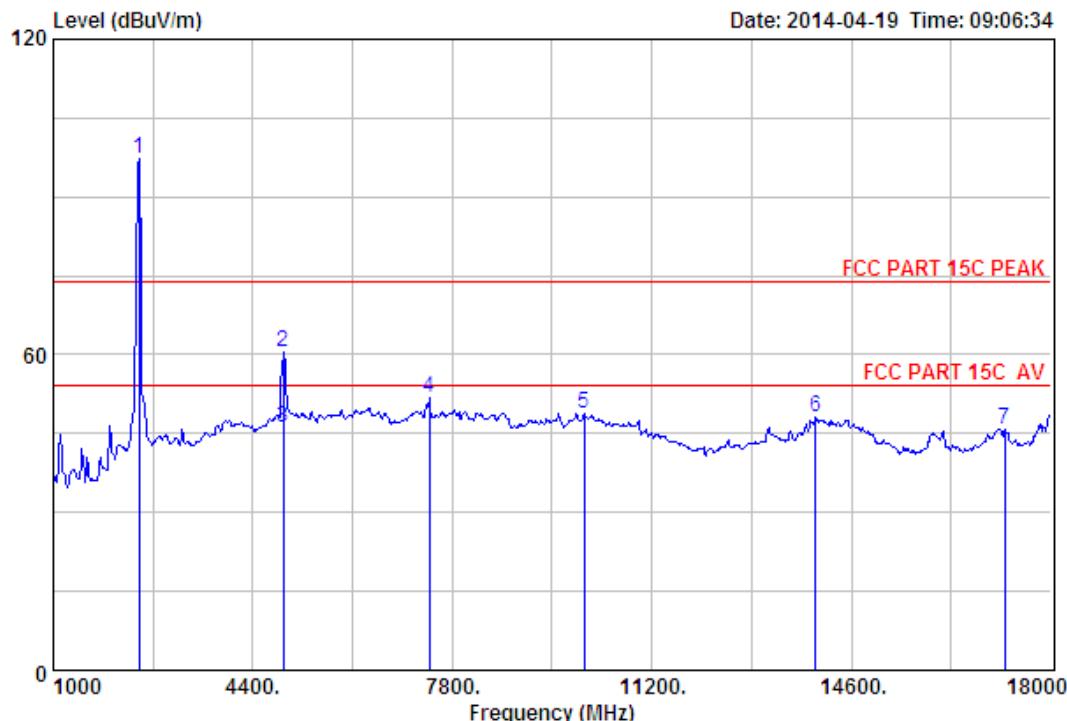
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 10
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH6 2437TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1 2437.00	27.60	6.67	34.12	95.50	95.65	74.00	-21.65	Peak
2 4874.00	31.37	12.07	31.90	47.69	59.23	74.00	14.77	Peak
3 4874.00	31.37	12.07	31.90	34.33	45.87	54.00	8.13	Average
4 7103.00	35.99	11.51	32.31	35.51	50.70	74.00	23.30	Peak
5 10129.00	38.33	11.52	32.01	33.64	51.48	74.00	22.52	Peak
6 14039.00	41.49	10.90	33.85	31.85	50.39	74.00	23.61	Peak
7 17184.00	40.45	10.92	33.34	28.12	46.15	74.00	27.85	Peak

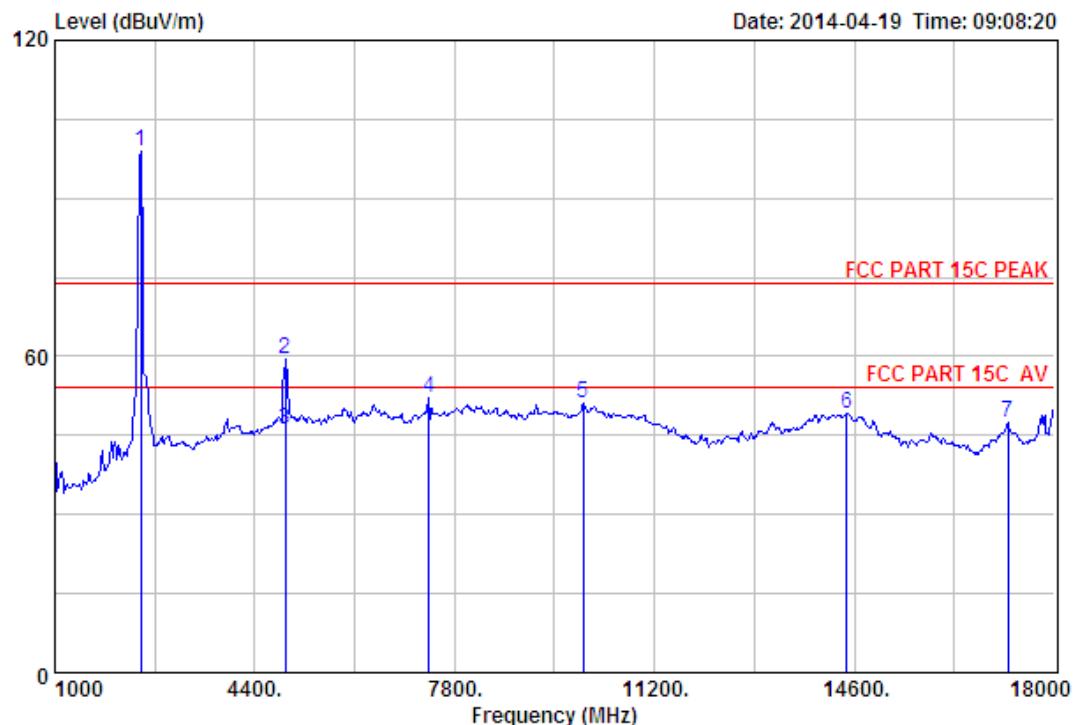
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 11
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH11 2462TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission					
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark	
<hr/>									
1 2462.00	27.58	6.69	34.06	97.02	97.23	74.00	-23.23	Peak	
2 4924.00	31.45	12.29	31.95	48.62	60.41	74.00	13.59	Peak	
3 4924.00	31.45	12.29	31.95	34.33	46.12	54.00	7.88	Average	
4 7409.00	36.58	11.60	31.97	35.60	51.81	74.00	22.19	Peak	
5 10044.00	38.18	11.56	31.85	31.07	48.96	74.00	25.04	Peak	
6 13988.00	41.45	10.92	34.00	29.78	48.15	74.00	25.85	Peak	
7 17218.00	40.58	10.91	33.55	27.97	45.91	74.00	28.09	Peak	
<hr/>									

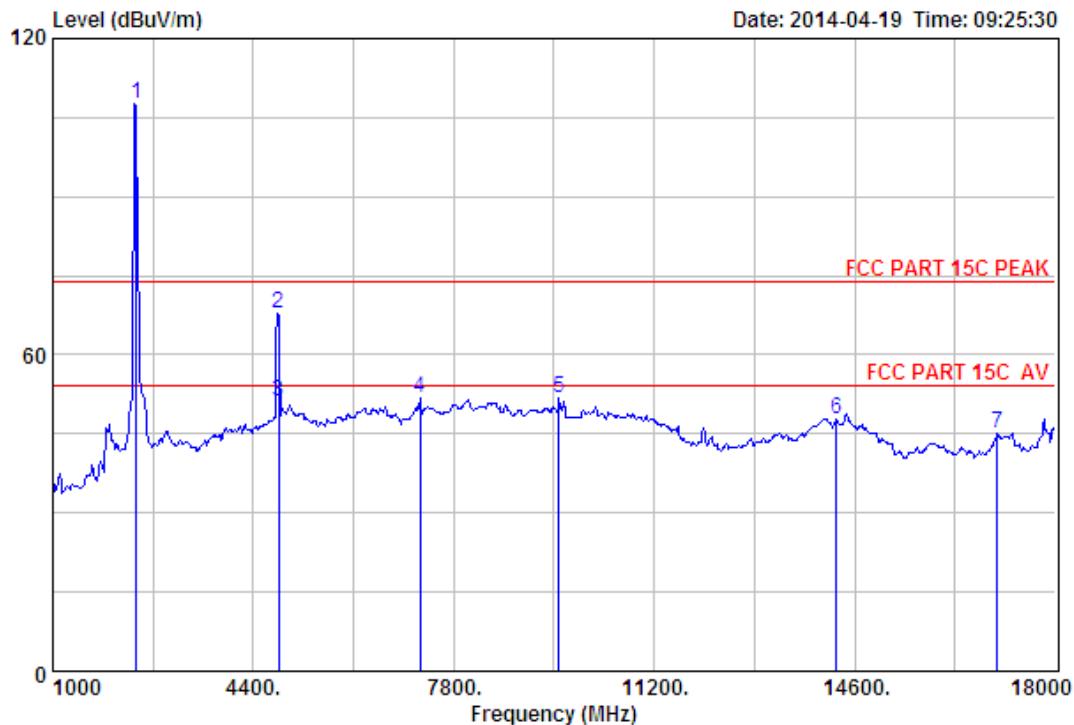
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 12
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH11 2462TX

Freq. (MHz)	Ant.			Emission				
	Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1 2462.00	27.58	6.69	34.06	98.76	98.97	74.00	-24.97	Peak
2 4924.00	31.45	12.29	31.95	47.71	59.50	74.00	14.50	Peak
3 4924.00	31.45	12.29	31.95	34.24	46.03	54.00	7.97	Average
4 7358.00	36.56	11.58	31.99	36.15	52.30	74.00	21.70	Peak
5 9993.00	38.12	11.59	31.78	33.06	50.99	74.00	23.01	Peak
6 14464.00	41.85	10.93	32.96	29.21	49.03	74.00	24.97	Peak
7 17218.00	40.58	10.91	33.55	29.42	47.36	74.00	26.64	Peak

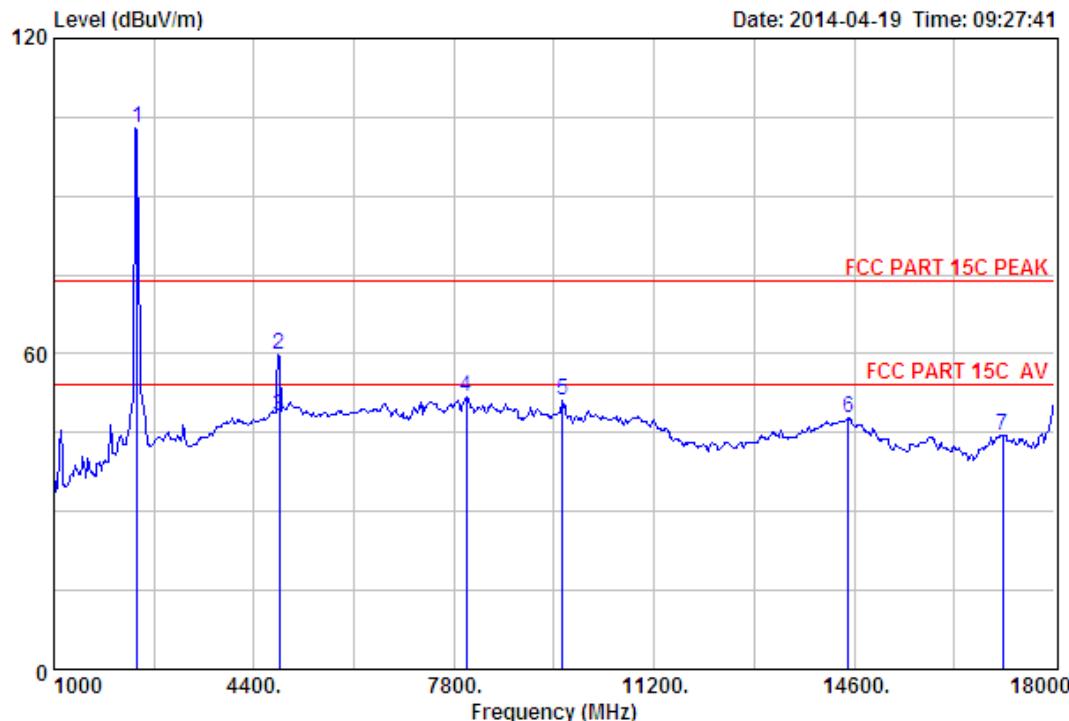
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 21
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH1 2412TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				Margin (dB)	Remark
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)			
1 2412.00	27.60	6.64	34.15	107.64	107.73	74.00	-33.73		Peak
2 4824.00	31.28	11.84	31.83	56.41	67.70	74.00	6.30		Peak
3 4824.00	31.28	11.84	31.83	40.00	51.29	54.00	2.71		Average
4 7222.00	36.52	11.54	32.09	35.93	51.90	74.00	22.10		Peak
5 9585.00	37.92	11.69	31.93	33.99	51.67	74.00	22.33		Peak
6 14294.00	41.71	10.92	33.08	28.35	47.90	74.00	26.10		Peak
7 17014.00	39.80	10.98	33.17	27.42	45.03	74.00	28.97		Peak

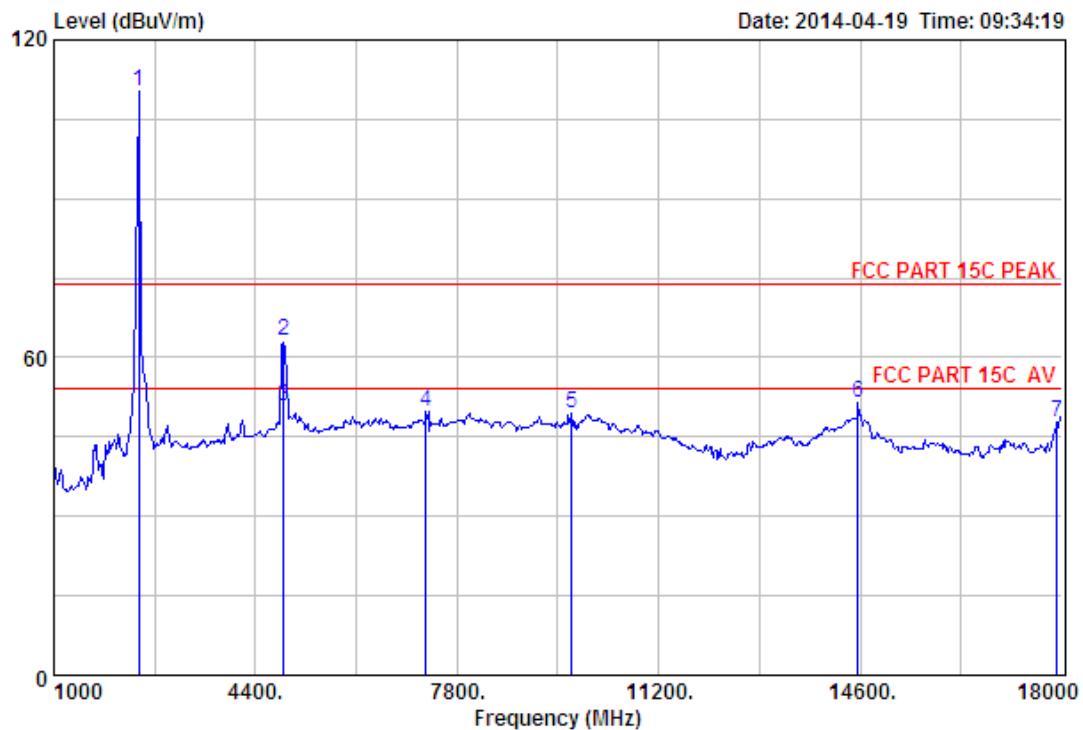
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 22
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH1 2412TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission					
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark	
<hr/>									
1 2412.00	27.60	6.64	34.15	102.84	102.93	74.00	-28.93	Peak	
2 4824.00	31.28	11.84	31.83	48.55	59.84	74.00	14.16	Peak	
3 4824.00	31.28	11.84	31.83	36.87	48.16	54.00	5.84	Average	
4 8004.00	37.01	11.40	31.22	34.52	51.71	74.00	22.29	Peak	
5 9636.00	37.96	11.68	31.91	33.36	51.09	74.00	22.91	Peak	
6 14498.00	41.88	10.93	33.08	27.99	47.72	74.00	26.28	Peak	
7 171116.00	40.19	10.95	32.92	26.38	44.60	74.00	29.40	Peak	
<hr/>									

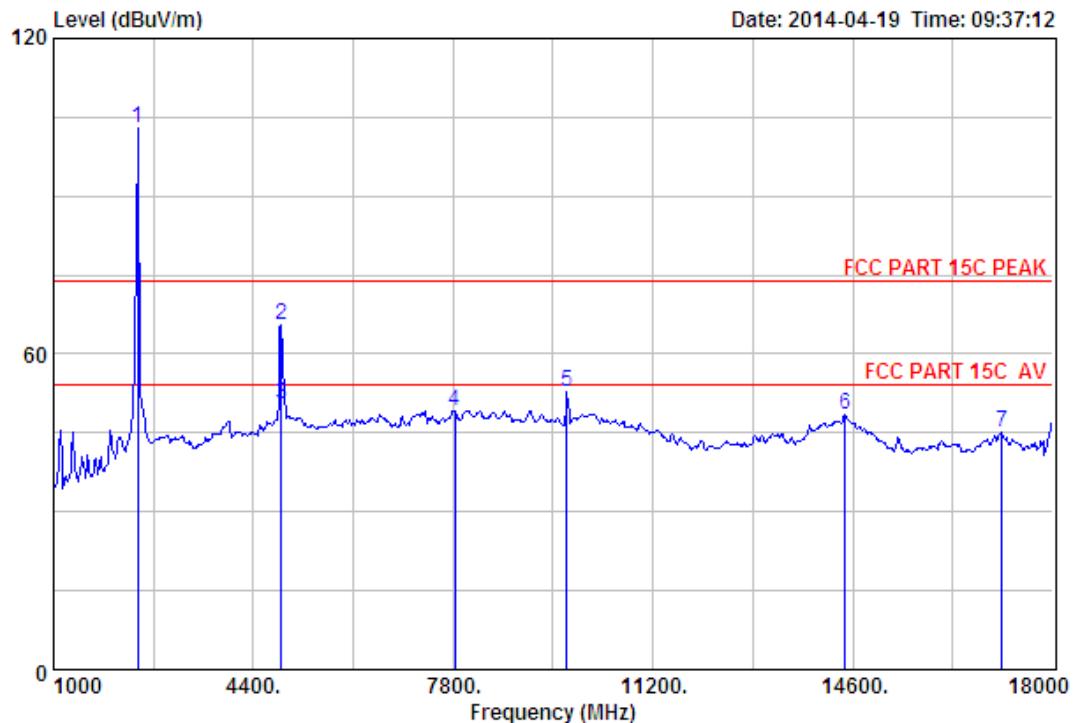
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 25
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH6 2437TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1 2437.00	27.60	6.67	34.12	110.03	110.18	74.00	-36.18	Peak
2 4874.00	31.37	12.07	31.90	51.68	63.22	74.00	10.78	Peak
3 4874.00	31.37	12.07	31.90	39.33	50.87	54.00	3.13	Average
4 7273.00	36.54	11.56	32.04	33.86	49.92	74.00	24.08	Peak
5 9738.00	38.11	11.65	31.87	31.53	49.42	74.00	24.58	Peak
6 14566.00	41.71	10.92	33.32	32.33	51.64	74.00	22.36	Peak
7 17915.00	45.62	11.28	30.22	21.21	47.89	74.00	26.11	Peak

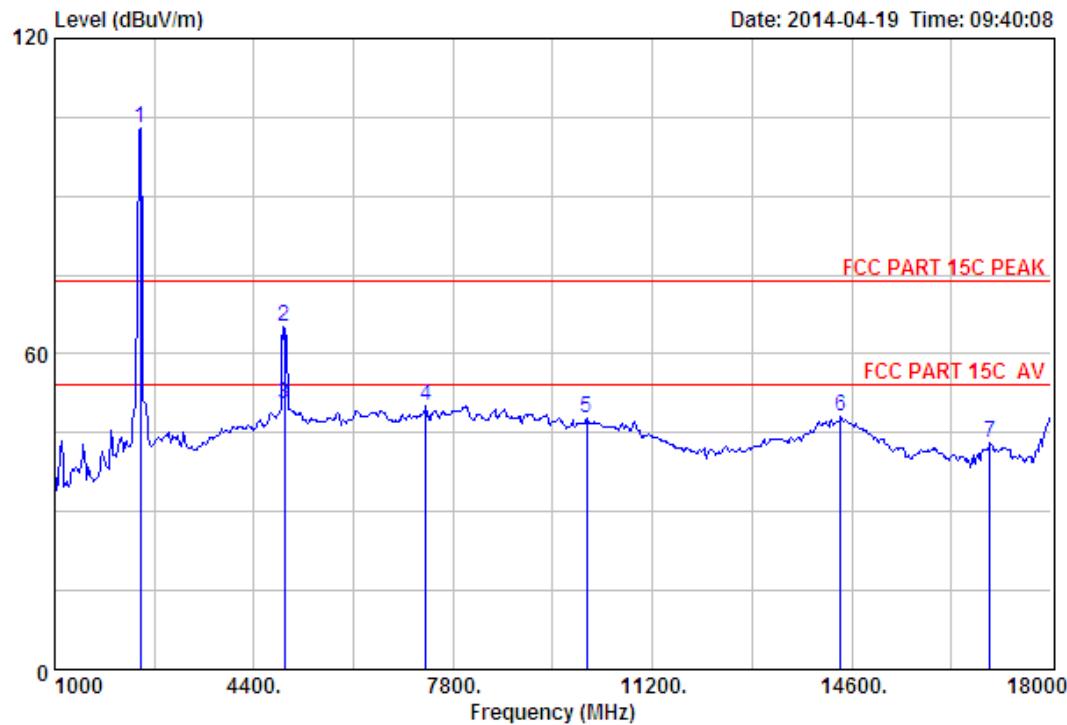
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 26
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH6 2437TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				Margin (dB)	Remark
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)			
<hr/>									
1 2437.00	27.60	6.67	34.12	102.79	102.94	74.00	-28.94	Peak	
2 4874.00	31.37	12.07	31.90	53.85	65.39	74.00	8.61	Peak	
3 4874.00	31.37	12.07	31.90	38.77	50.31	54.00	3.69	Average	
4 7834.00	36.68	11.47	31.40	32.54	49.29	74.00	24.71	Peak	
5 9738.00	38.11	11.65	31.87	34.80	52.69	74.00	21.31	Peak	
6 14464.00	41.85	10.93	32.96	28.58	48.40	74.00	25.60	Peak	
7 17133.00	40.26	10.94	33.03	26.89	45.06	74.00	28.94	Peak	

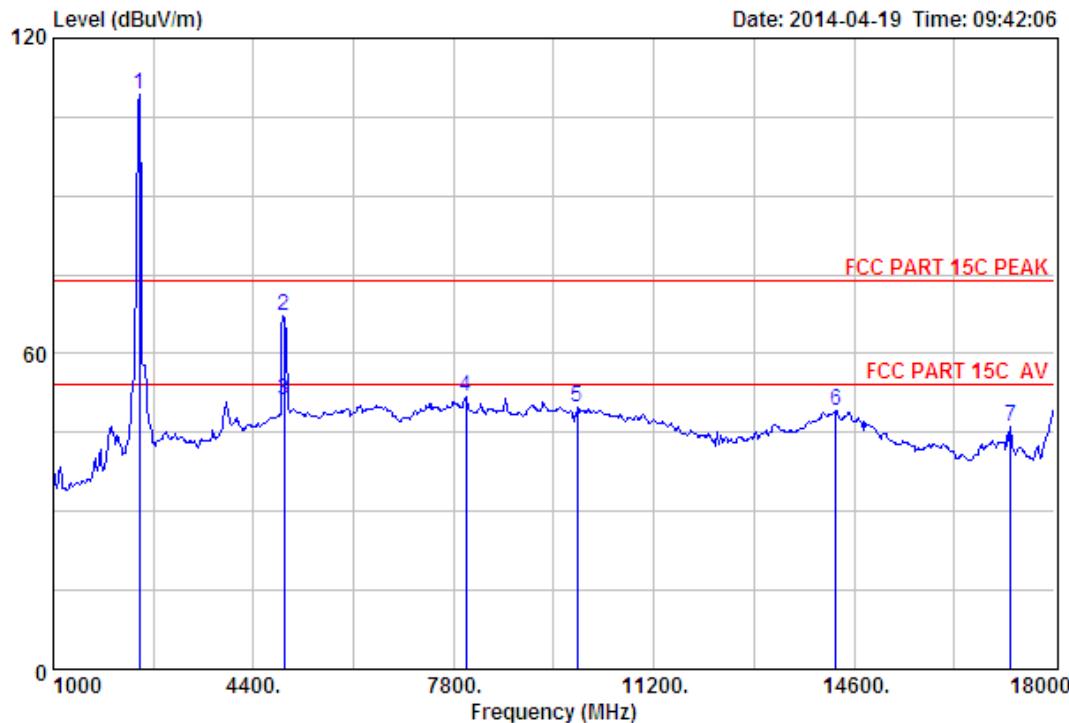
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 27
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH11 2462TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1 2462.00	27.58	6.69	34.06	102.75	102.96	74.00	-28.96	Peak
2 4924.00	31.45	12.29	31.95	53.55	65.34	74.00	8.66	Peak
3 4924.00	31.45	12.29	31.95	38.79	50.58	54.00	3.42	Average
4 7341.00	36.56	11.58	31.99	34.06	50.21	74.00	23.79	Peak
5 10078.00	38.24	11.54	31.92	30.06	47.92	74.00	26.08	Peak
6 14413.00	41.80	10.92	32.78	28.13	48.07	74.00	25.93	Peak
7 16963.00	39.64	10.96	33.42	25.92	43.10	74.00	30.90	Peak

Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

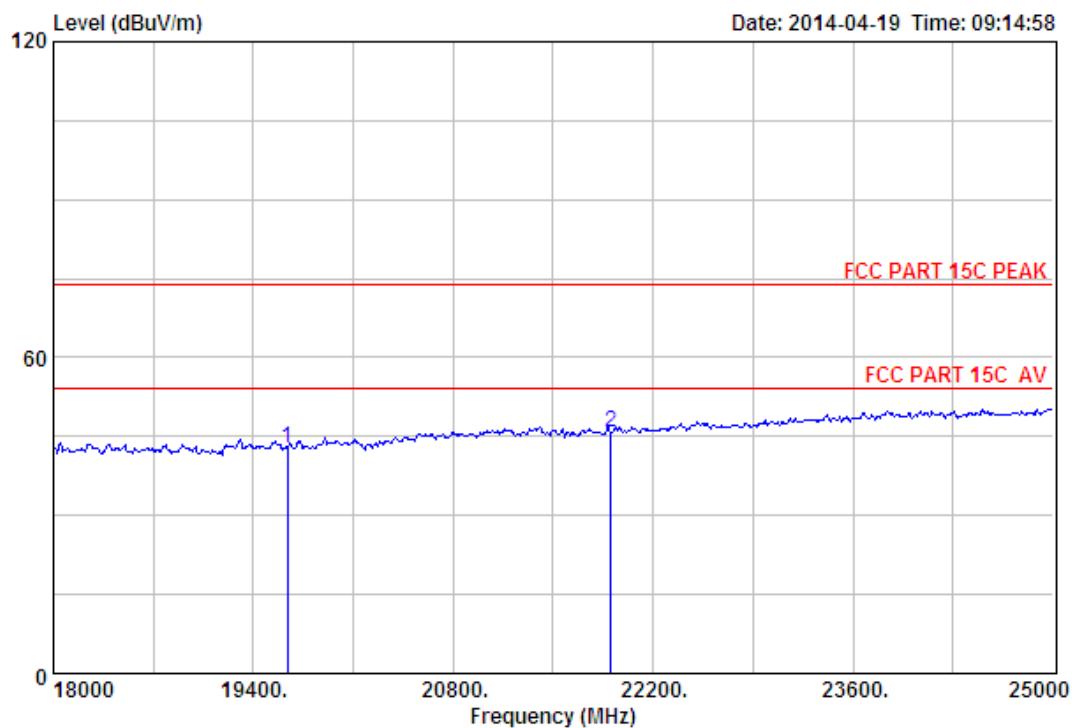


Site no. : 3m Chamber Data no. : 28
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH11 2462TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission					
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark	
<hr/>									
1 2462.00	27.58	6.69	34.06	108.95	109.16	74.00	-35.16	Peak	
2 4924.00	31.45	12.29	31.95	55.46	67.25	74.00	6.75	Peak	
3 4924.00	31.45	12.29	31.95	39.40	51.19	54.00	2.81	Average	
4 8004.00	37.01	11.40	31.22	34.58	51.77	74.00	22.23	Peak	
5 9891.00	38.15	11.61	31.75	31.76	49.77	74.00	24.23	Peak	
6 14294.00	41.71	10.92	33.08	29.49	49.04	74.00	24.96	Peak	
7 17252.00	40.71	10.90	33.76	28.14	45.99	74.00	28.01	Peak	

Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

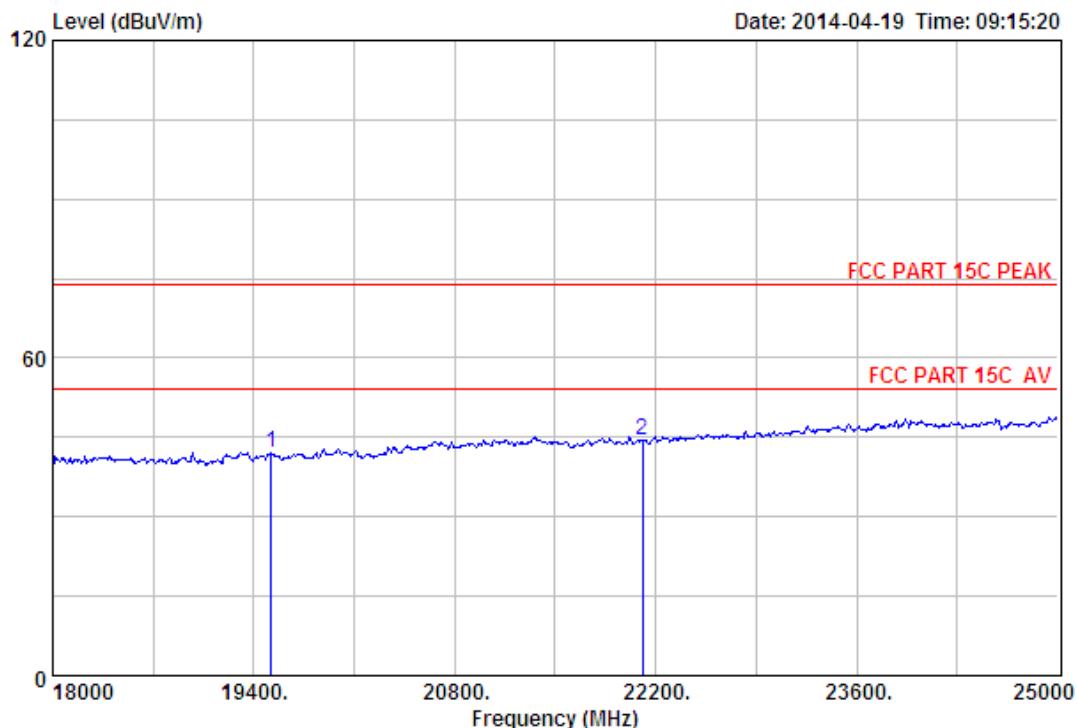
18000-25000 MHz



Site no. : 3m Chamber Data no. : 15
 Dis. / Ant. : 3m ANT ABOVE 18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH1 2412TX

Freq. (MHz)	Ant. Factor	Cable Loss (dB)	Amp Factor	Emission				
				Reading	Level	Limits	Margin	Remark
				(dBuV)	(dBuV/m)	(dBuV/m)	(dB)	
1 19638.00	45.95	19.27	36.40	14.01	42.83	74.00	31.17	Peak
2 21906.00	45.75	20.52	34.99	14.38	45.66	74.00	28.34	Peak

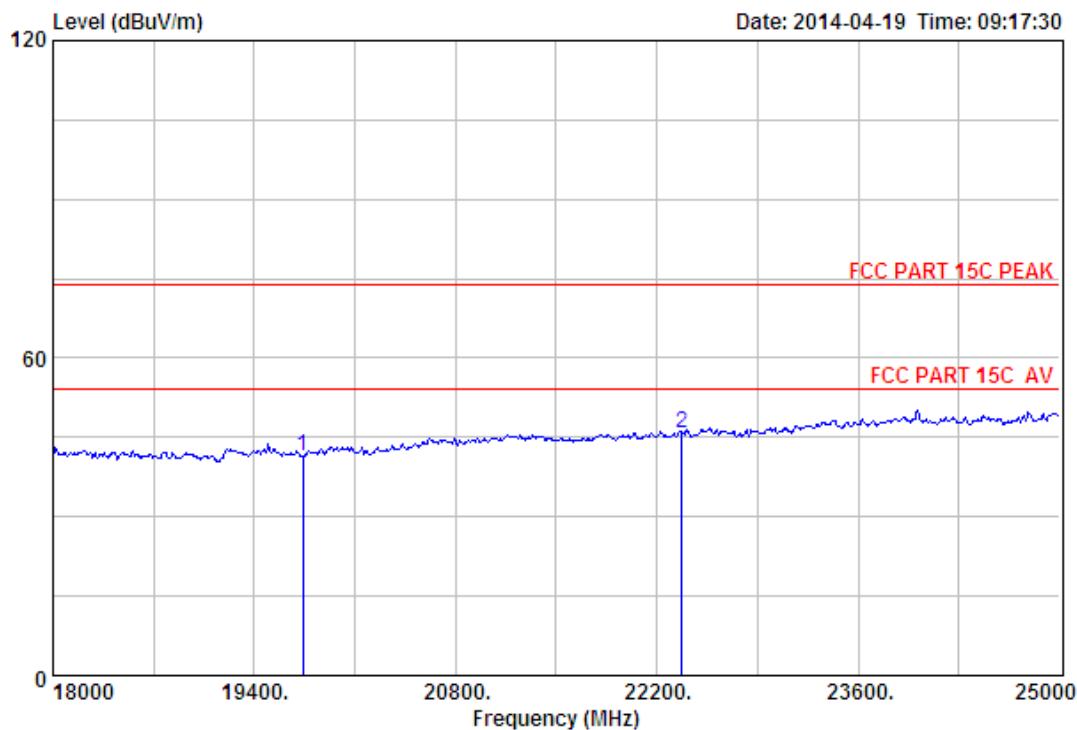
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 16
 Dis. / Ant. : 3m ANT ABVOE 18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH1 2412TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1 19519.00	45.91	19.14	36.30	13.20	41.95	74.00	32.05	Peak
2 22109.00	45.72	20.63	34.80	12.90	44.45	74.00	29.55	Peak

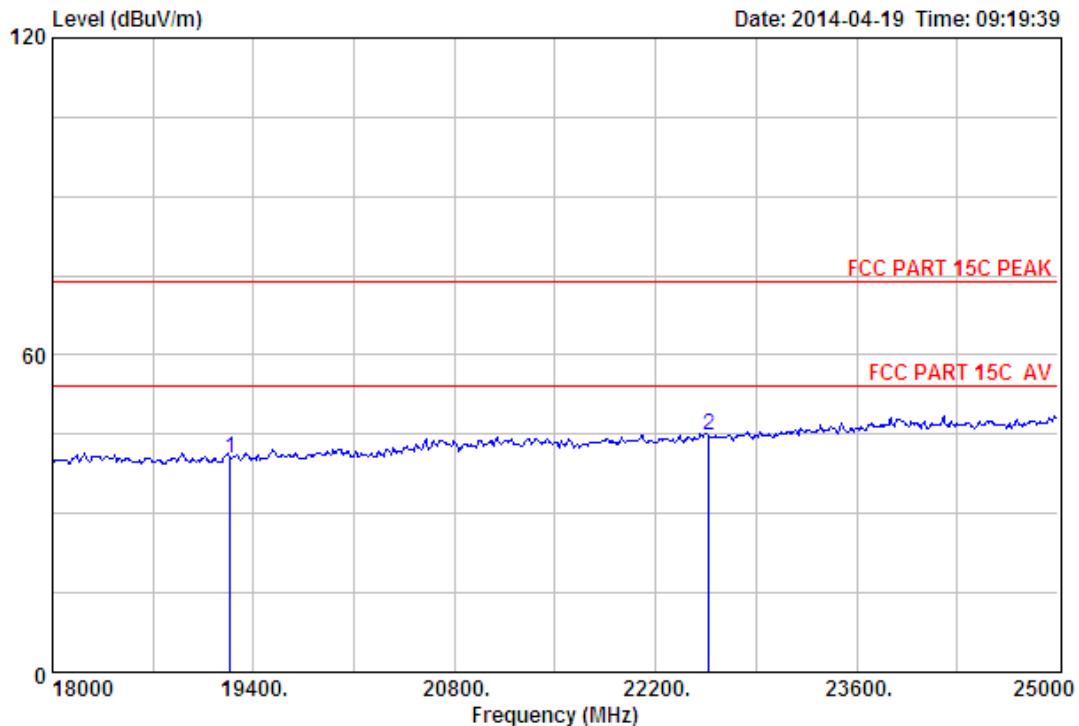
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 17
 Dis. / Ant. : 3m ANT ABVOE 18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH6 2437TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1 19736.00	46.00	19.38	36.47	12.55	41.46	74.00	32.54	Peak
2 22375.00	45.77	20.78	34.51	13.89	45.93	74.00	28.07	Peak

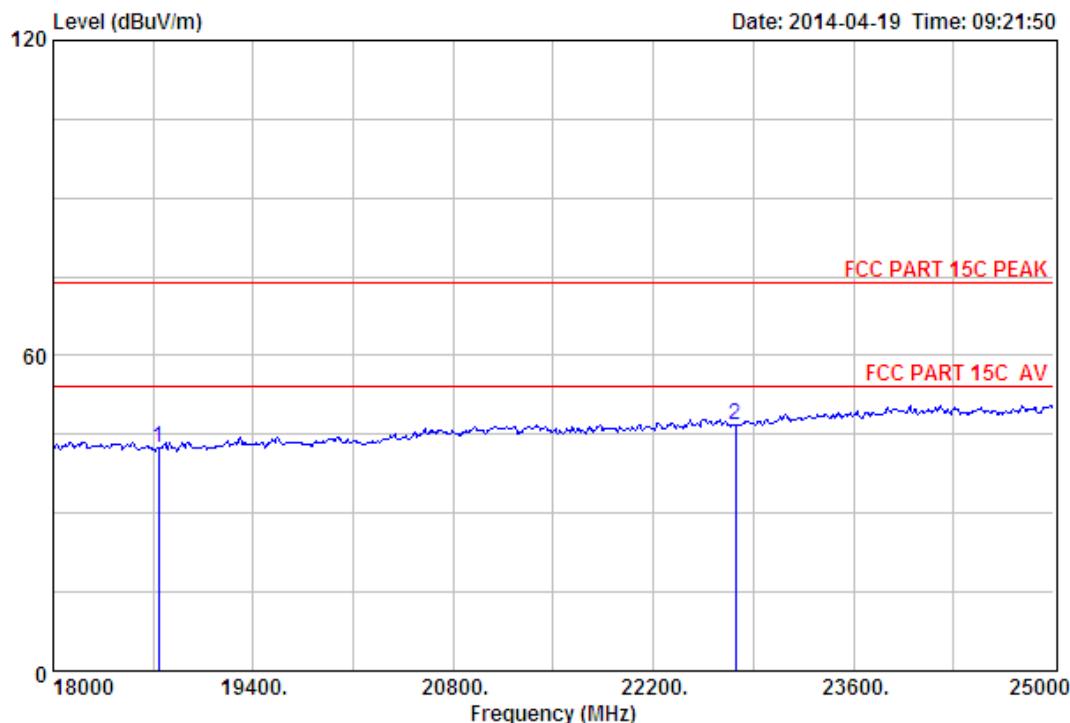
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 18
 Dis. / Ant. : 3m ANT ABOVE 18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH6 2437TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission			Margin (dB)	Remark
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)		
1 19239.00	45.64	18.82	36.06	12.02	40.42	74.00	33.58	Peak
2 22571.00	45.77	20.90	34.30	12.27	44.64	74.00	29.36	Peak

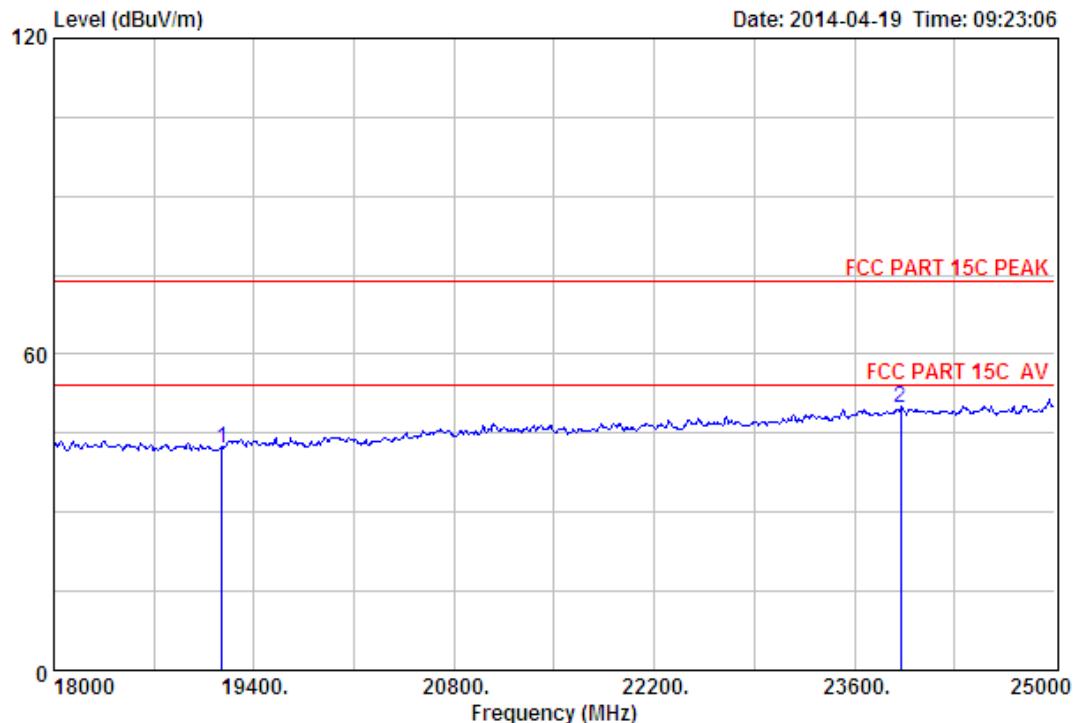
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 19
 Dis. / Ant. : 3m ANT ABOVE 18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH11 2462TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1 18735.00	45.13	18.22	35.62	14.82	42.55	74.00	31.45	Peak
2 22774.00	45.69	21.01	34.09	14.34	46.95	74.00	27.05	Peak

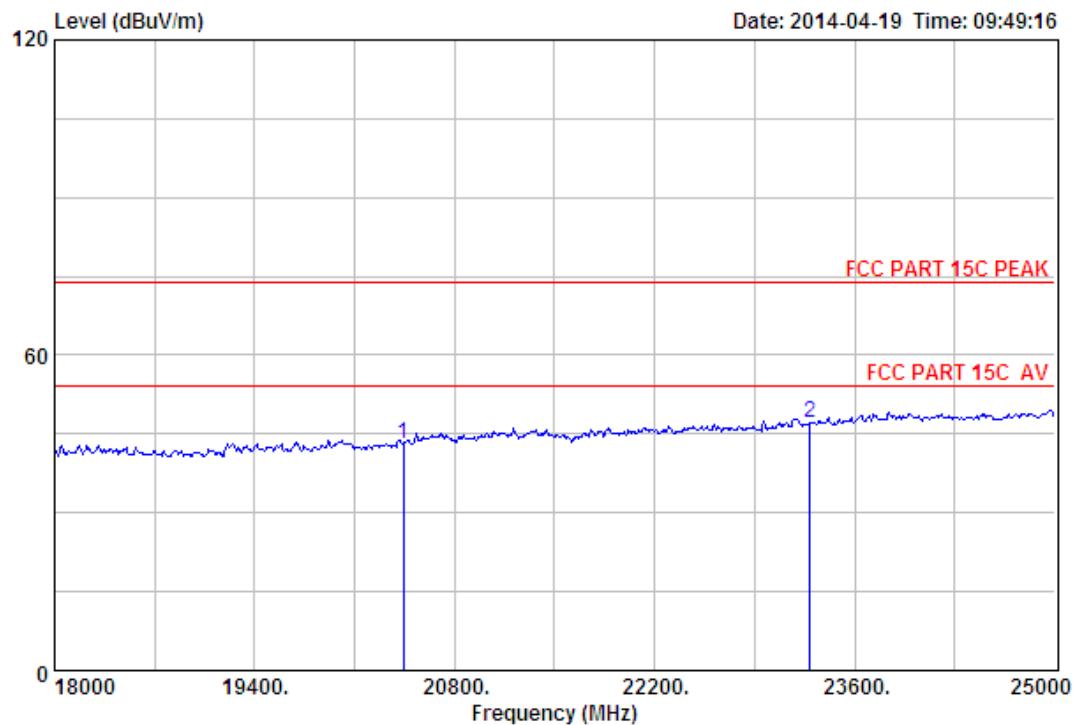
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 20
 Dis. / Ant. : 3m ANT ABVOE 18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH11 2462TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1 19176.00	45.57	18.75	36.00	13.92	42.24	74.00	31.76	Peak
2 23922.00	45.62	21.98	32.88	15.20	49.92	74.00	24.08	Peak

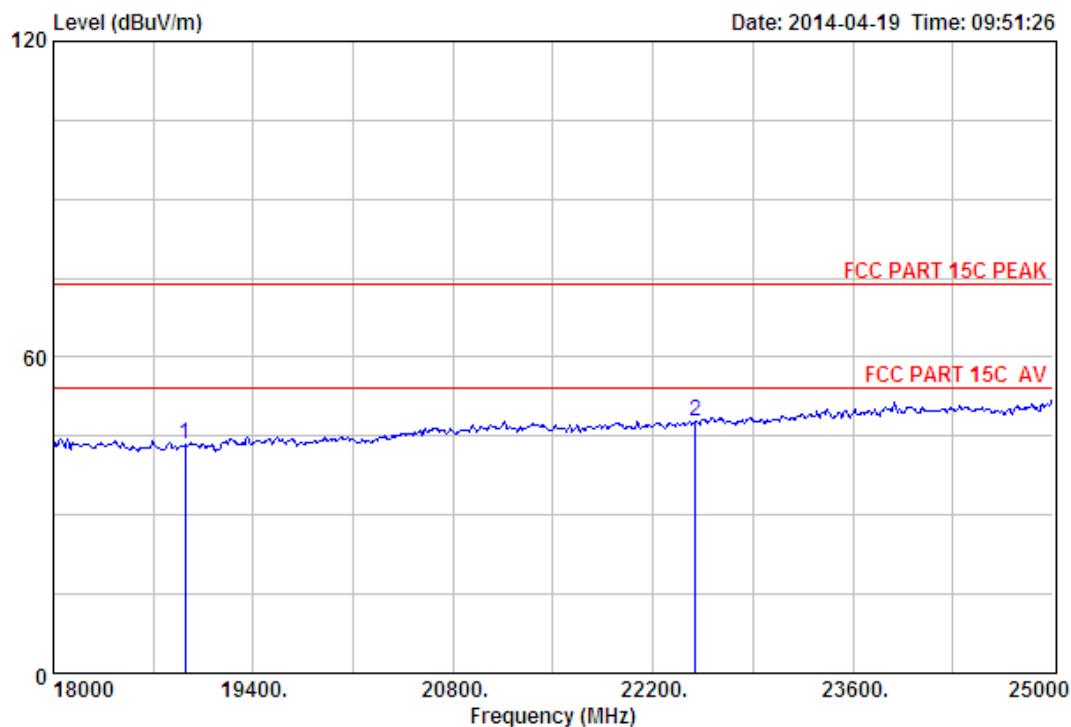
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 31
 Dis. / Ant. : 3m ANT ABOVE 18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH1 2412TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				Remark
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	
1 20443.00	46.01	19.88	36.30	13.66	43.25	74.00	30.75	Peak
2 23285.00	45.66	21.40	33.56	13.53	47.03	74.00	26.97	Peak

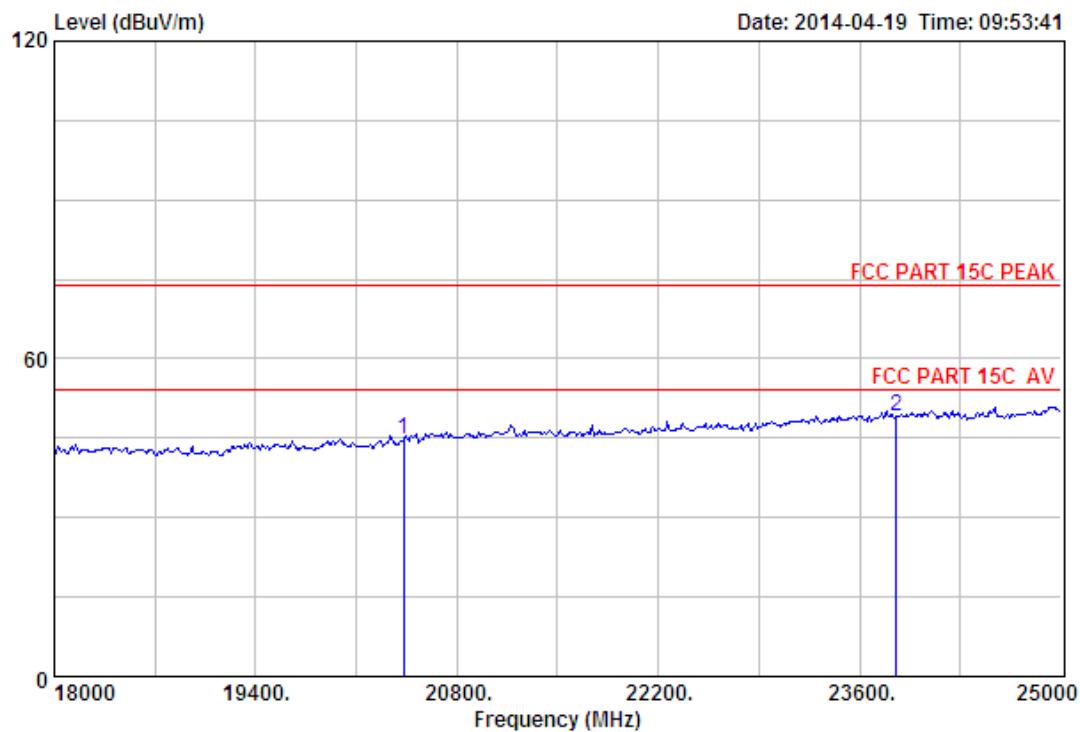
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 32
 Dis. / Ant. : 3m ANT ABVOE 18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH1 2412TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1 18924.00	45.33	18.45	35.79	15.37	43.36	74.00	30.64	Peak
2 22494.00	45.80	20.85	34.38	15.46	47.73	74.00	26.27	Peak

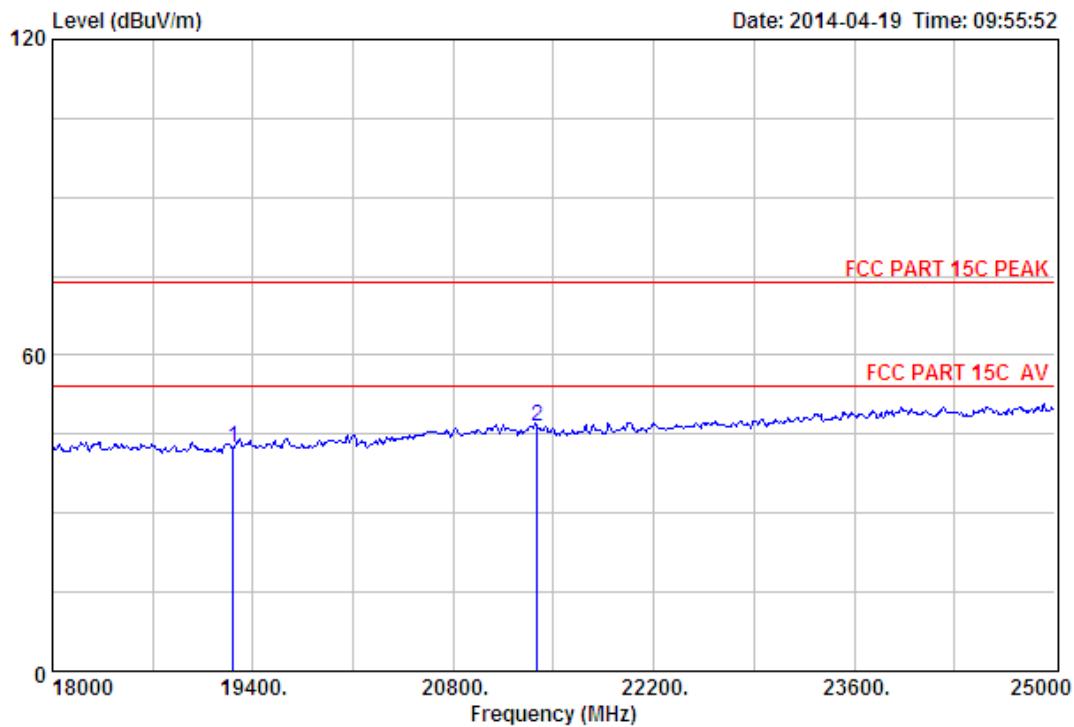
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 33
 Dis. / Ant. : 3m ANT ABVOE 18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH6 2437TX

Freq. (MHz)	Ant. Factor	Cable Loss	Amp Factor	Emission				Remark
				Reading	Level	Limits	Margin	
1 20429.00	46.02	19.87	36.32	15.10	44.67	74.00	29.33	Peak
2 23852.00	45.63	21.91	32.96	14.42	49.00	74.00	25.00	Peak

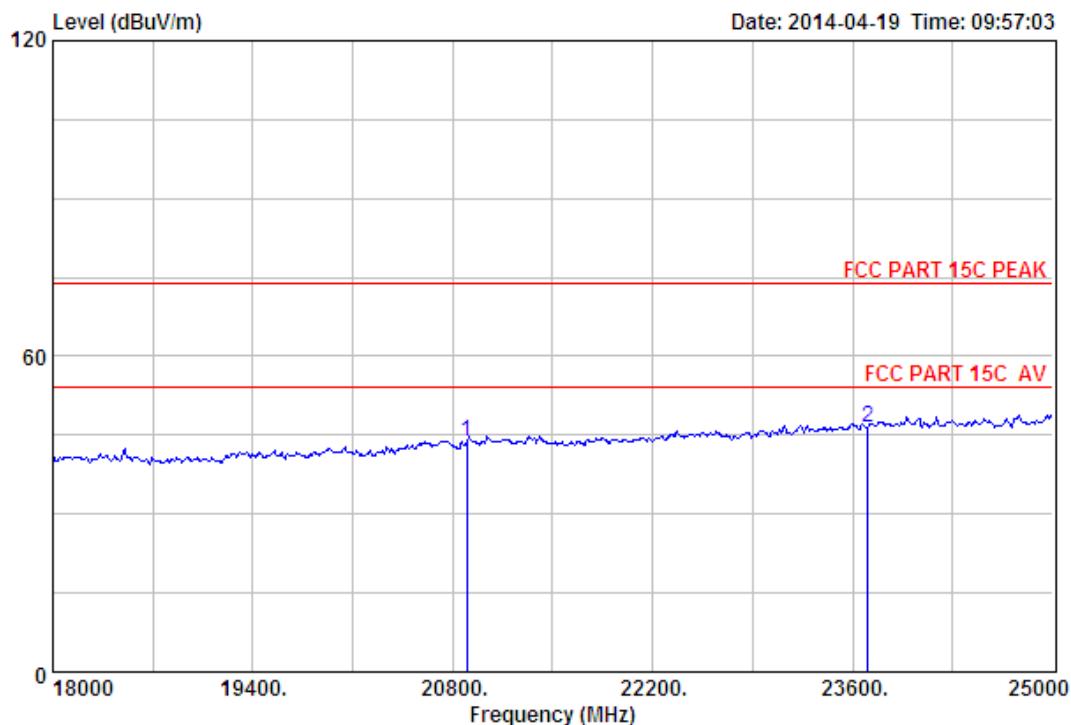
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 34
 Dis. / Ant. : 3m ANT ABOVE 18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH6 2437TX

Freq. (MHz)	Ant. Factor	Cable Loss (dB)	Amp Factor (dB)	Emission				Remark
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	
1 19260.00	45.66	18.84	36.06	14.08	42.52	74.00	31.48	Peak
2 21388.00	46.07	20.30	35.44	15.50	46.43	74.00	27.57	Peak

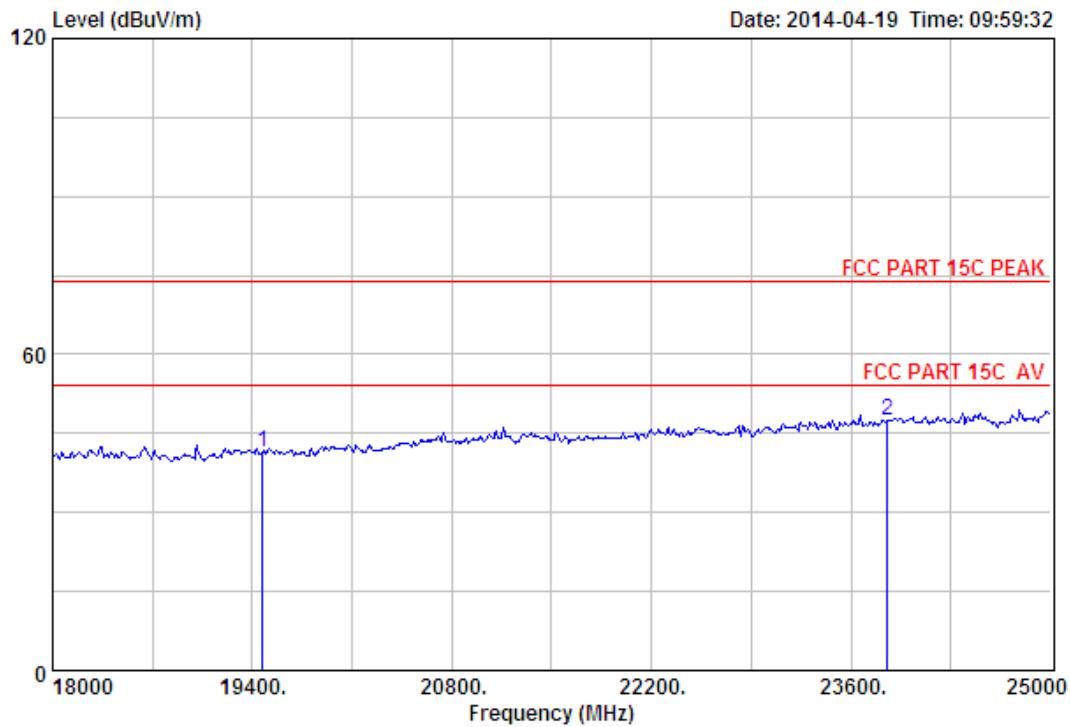
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 35
 Dis. / Ant. : 3m ANT ABOVE 18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH11 2462TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1 20898.00	46.25	20.09	35.89	13.19	43.64	74.00	30.36	Peak
2 23705.00	45.66	21.78	33.11	12.18	46.51	74.00	27.49	Peak

Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 36
 Dis. / Ant. : 3m ANT ABVOE 18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH11 2462TX

Freq. (MHz)	Ant. Factor	Cable Loss (dB/m)	Amp Factor (dB)	Emission				Margin (dB)	Remark
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)			
1 19470.00	45.88	19.07	36.25	12.65	41.35	74.00	32.65		Peak
2 23852.00	45.63	21.91	32.96	12.72	47.30	74.00	26.70		Peak

Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

5 CONDUCTED SPURIOUS EMISSION

5.1 Limit

In any 100kHz bandwidth outside the frequency bands in which the spread spectrum intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 20dB below that in the 100kHz bandwidth within the band that contains the highest level of the desired power.

5.2 Test Procedure

The transmitter output was connected to a spectrum analyzer. The resolution bandwidth is set to 100 kHz, The video bandwidth is set to 300 kHz and measure all the emissions detected.

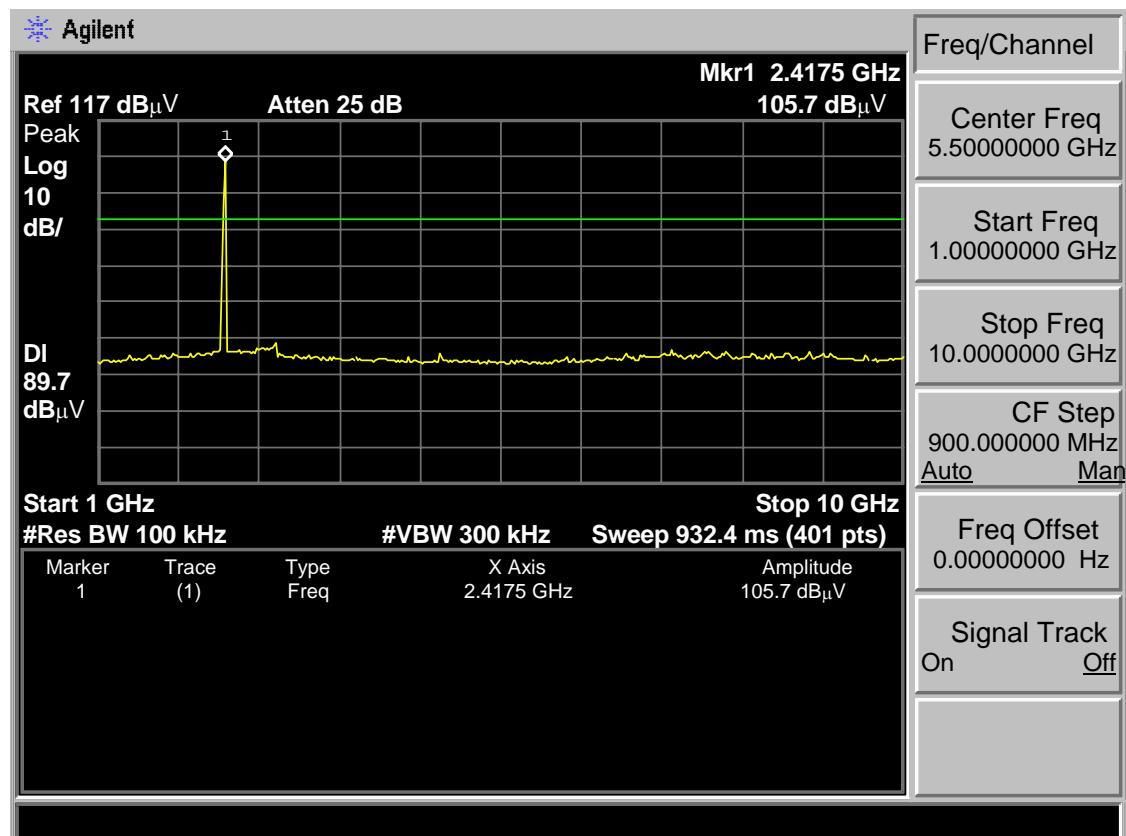
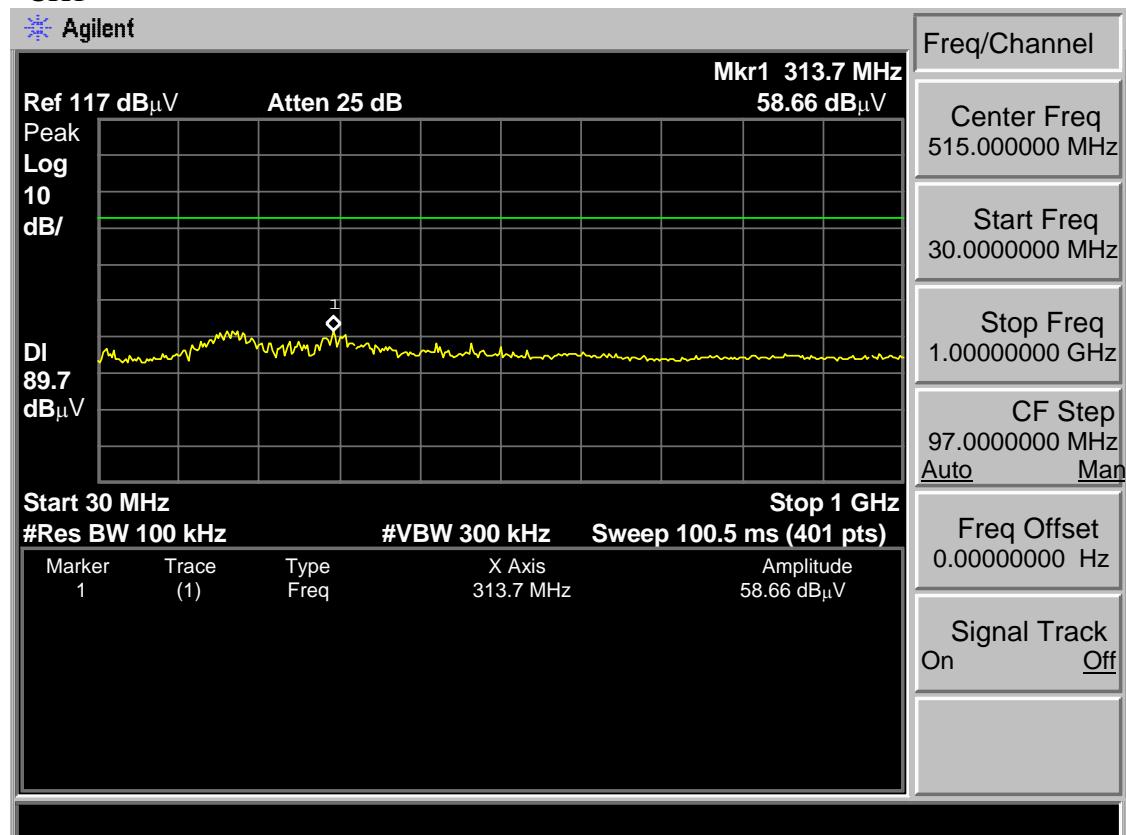
5.3 Test Result

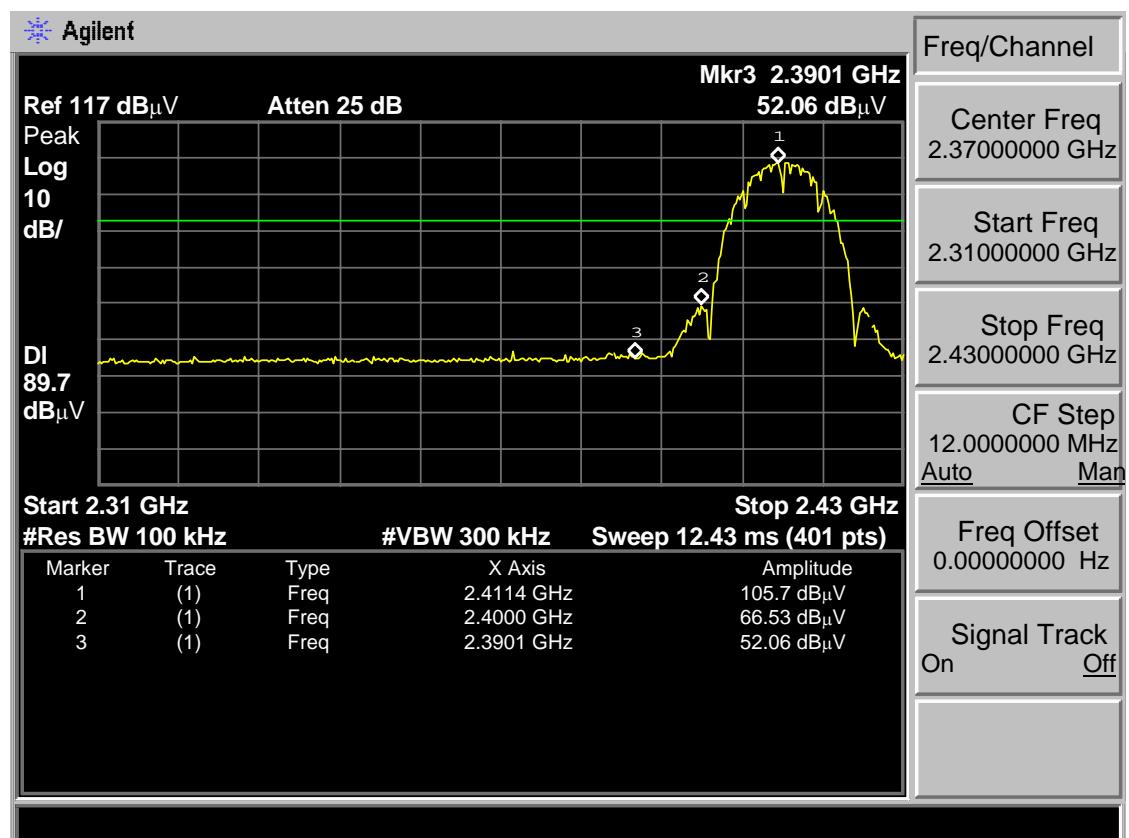
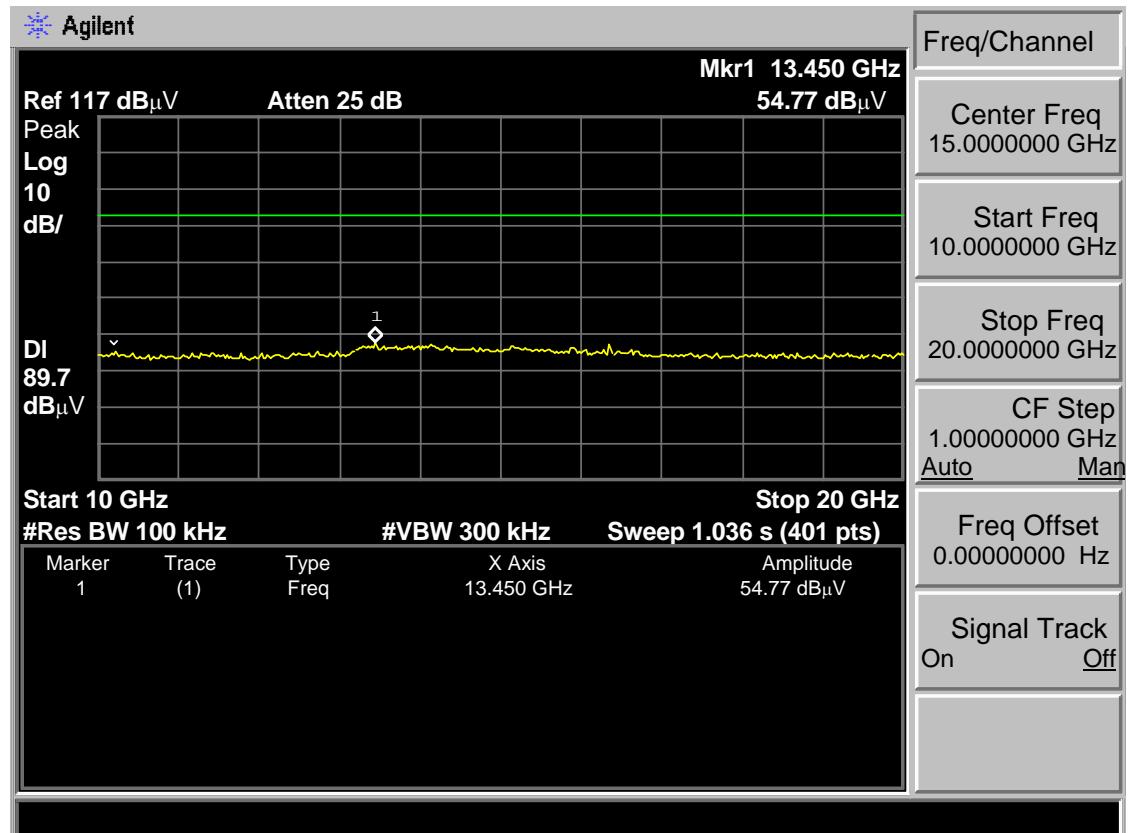
PASS (The testing data was attached in the next pages.)

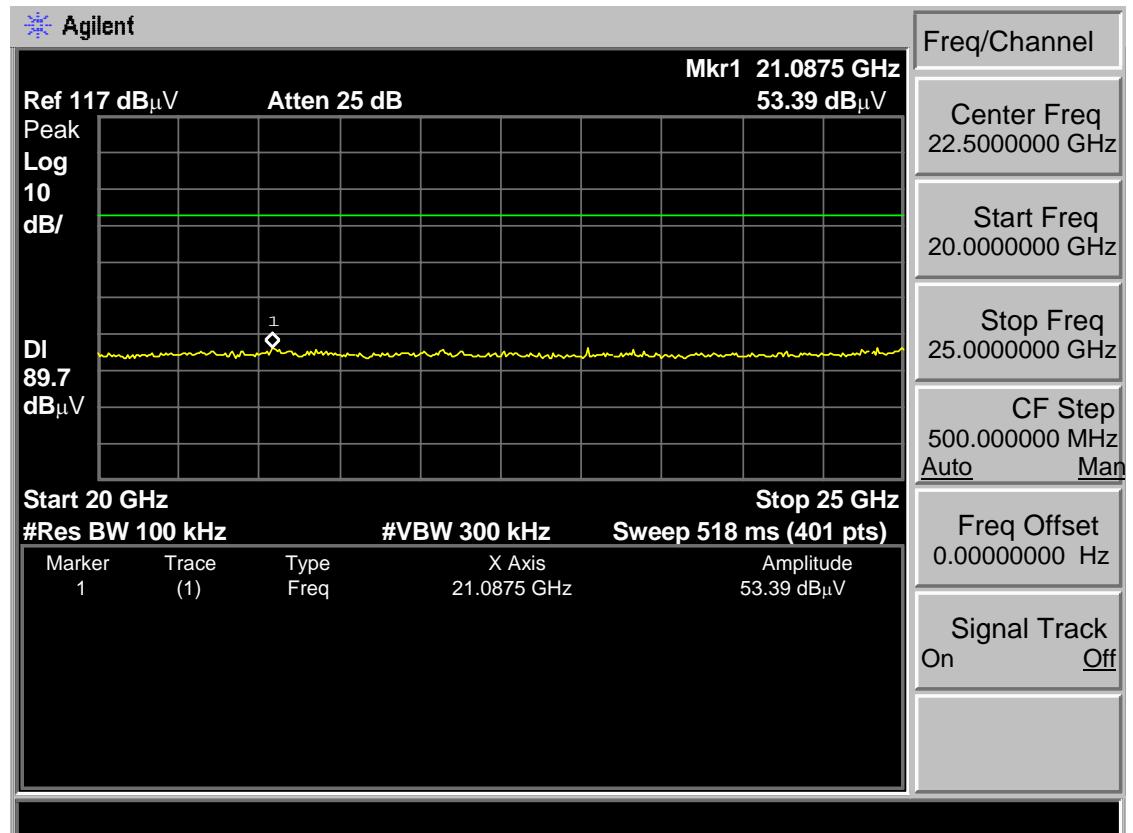
5.4 Test Data

Test Mode: IEEE 802.11b TX

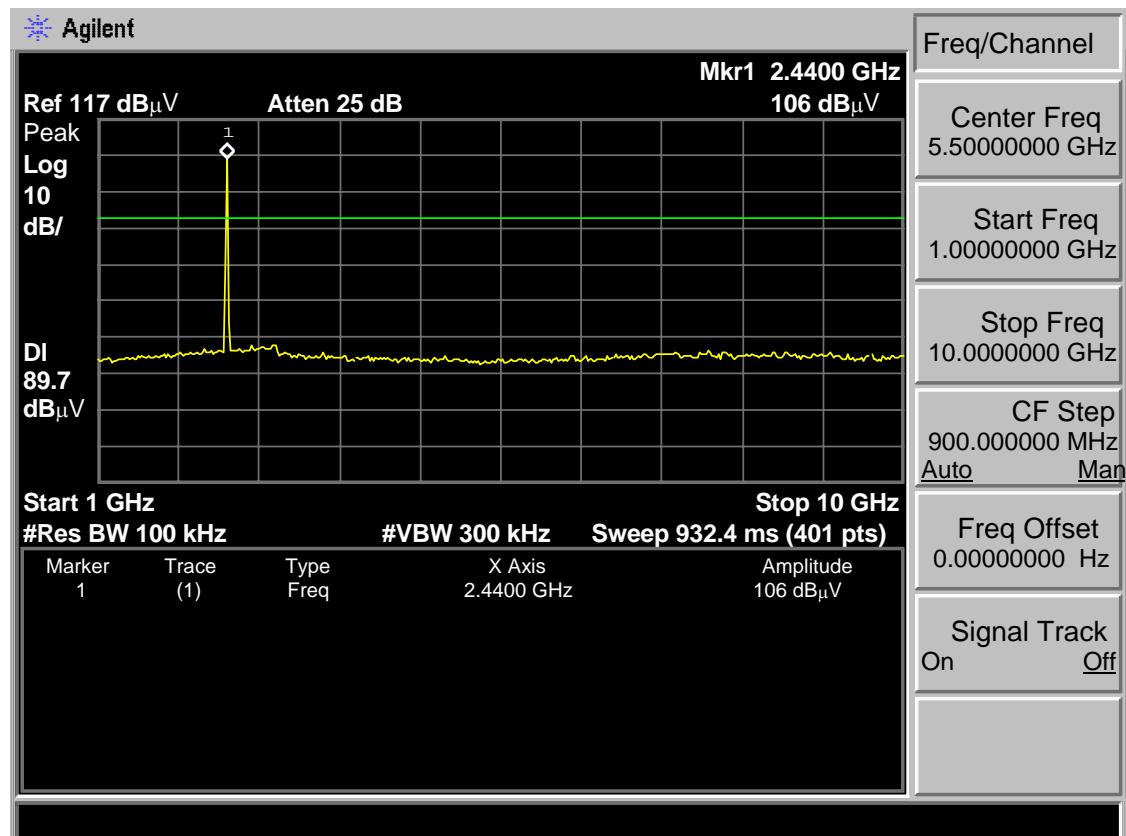
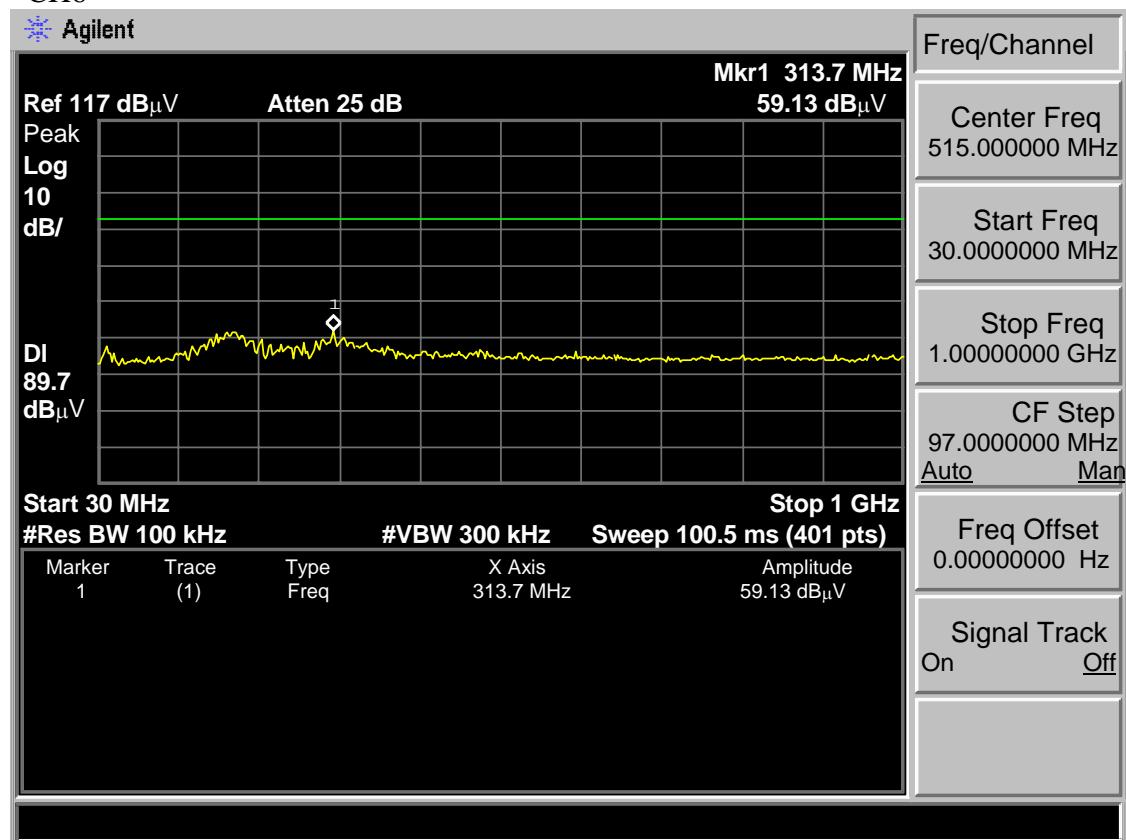
CH1

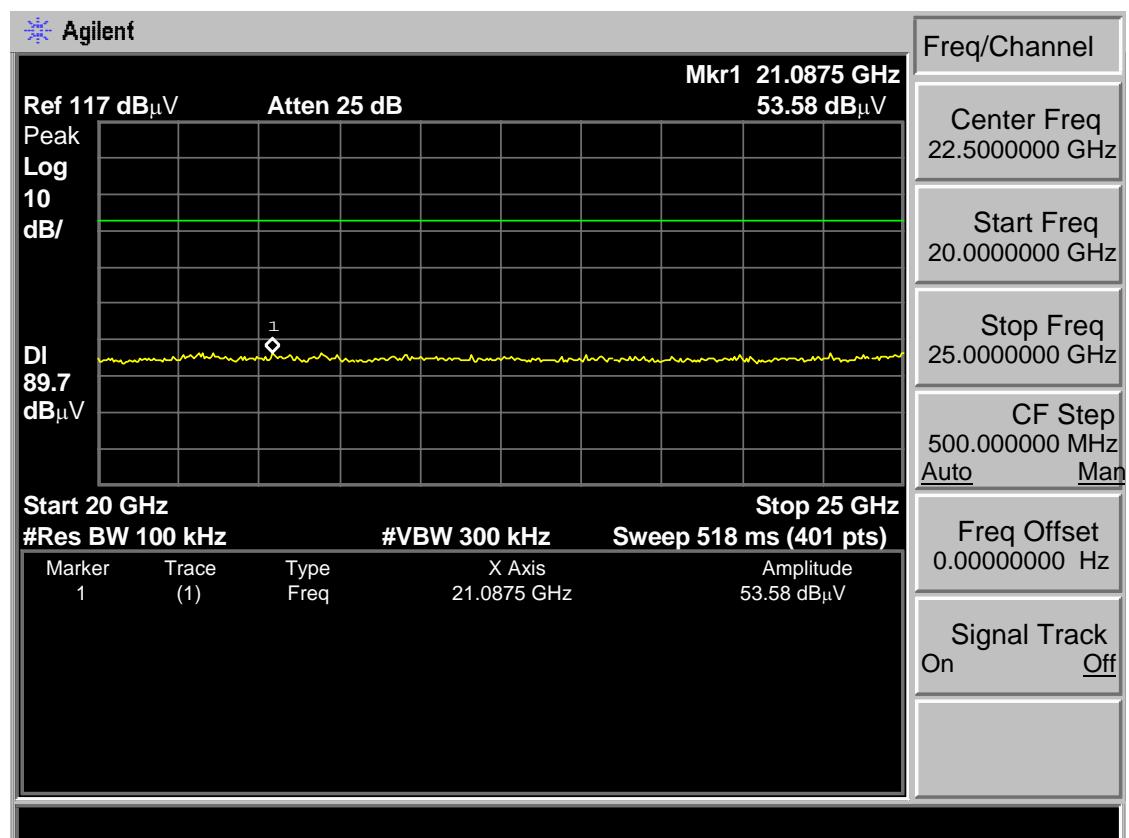
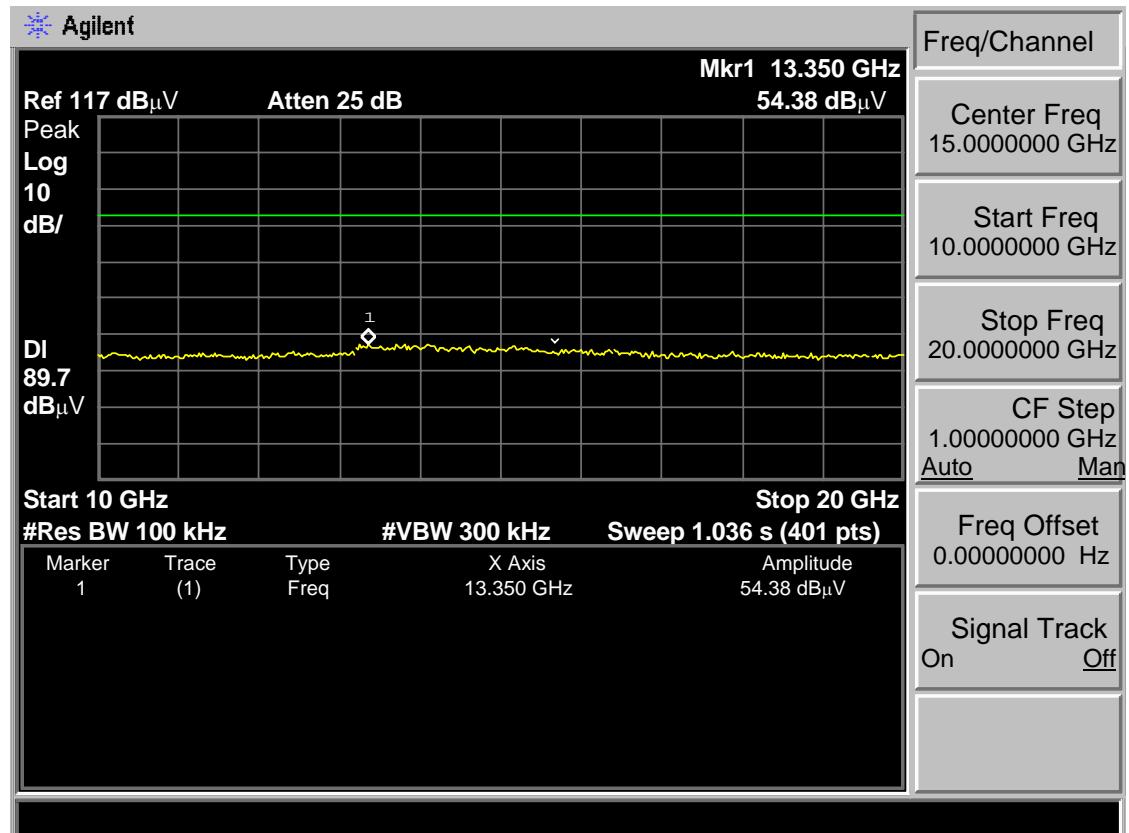




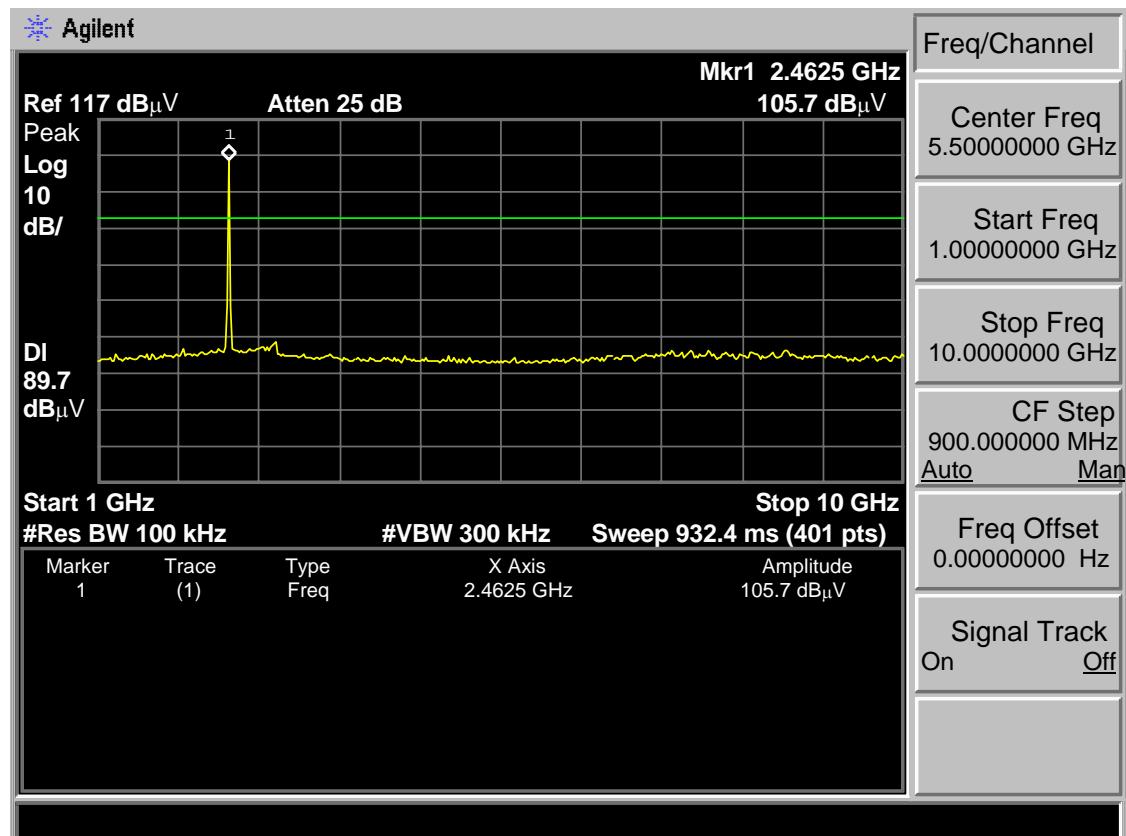
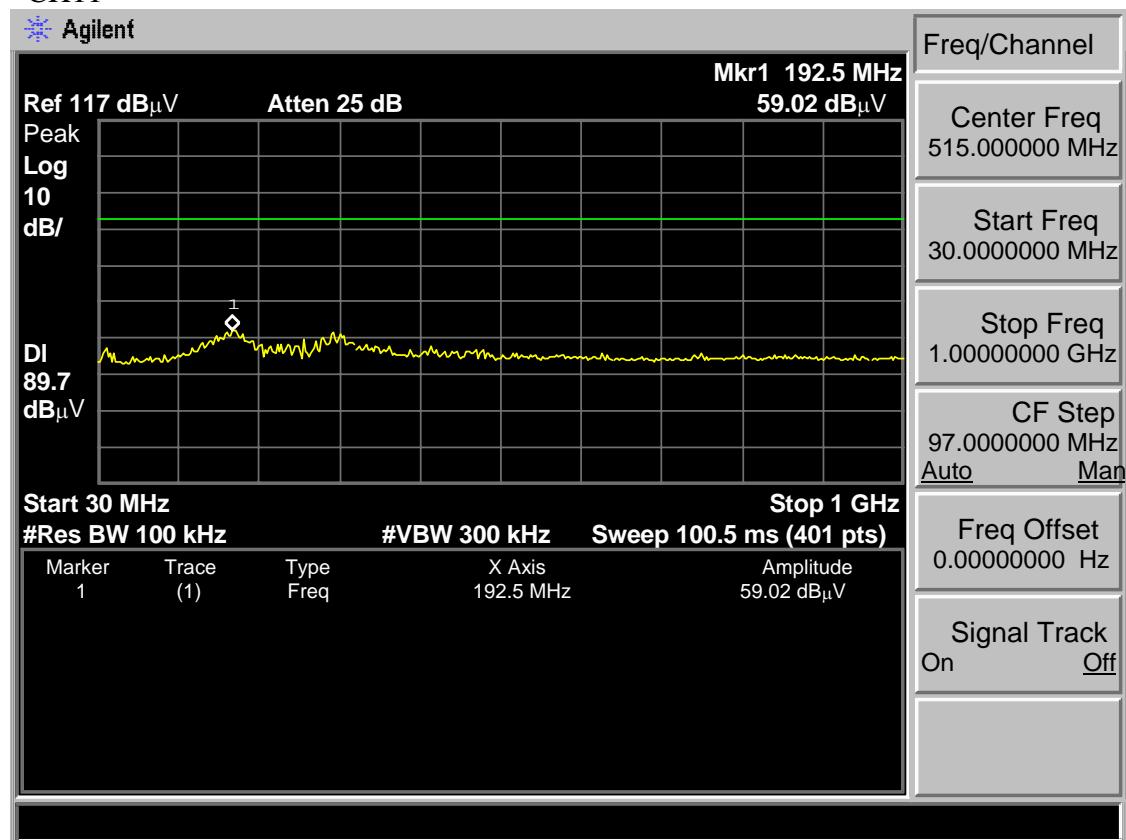


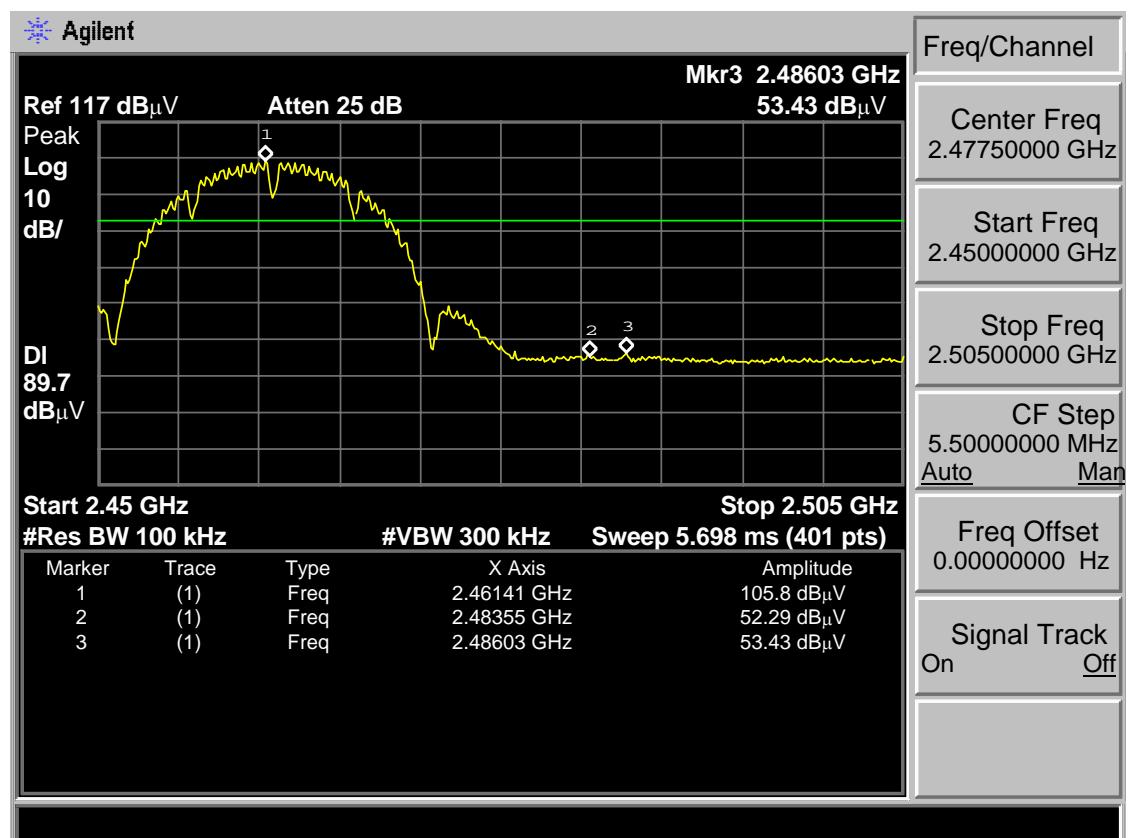
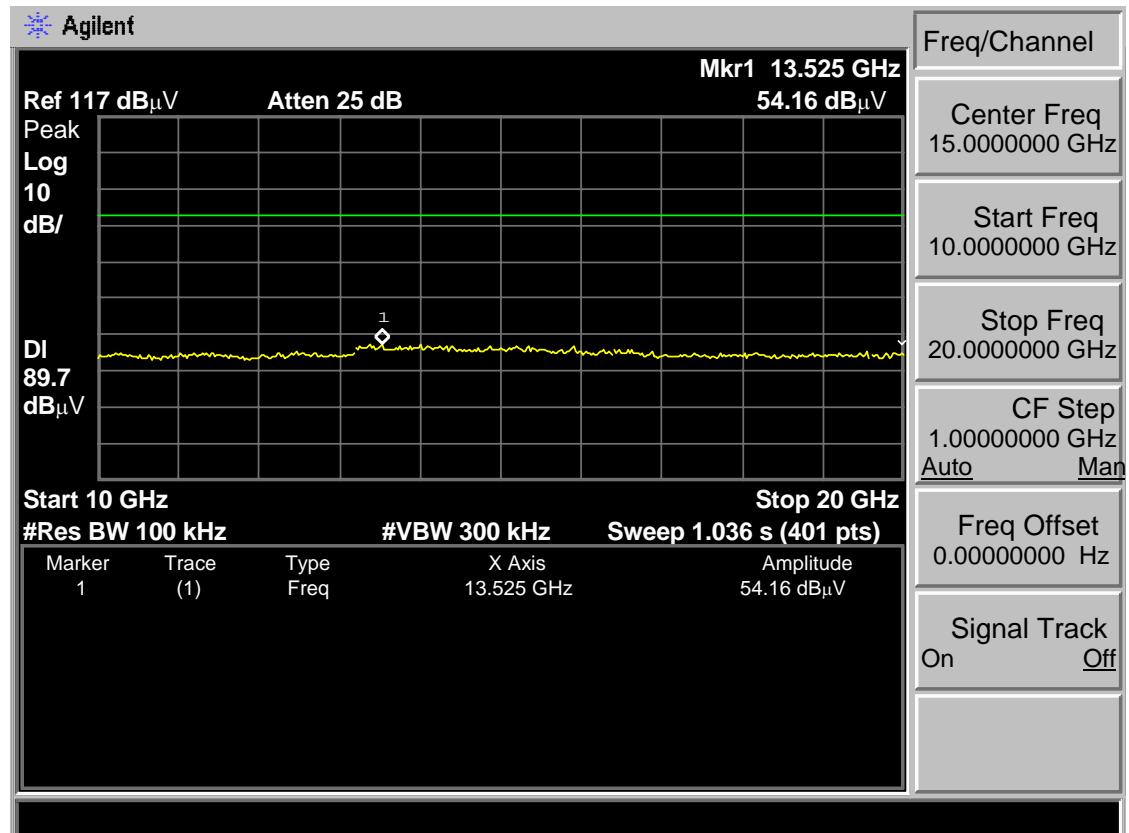
Test Mode: IEEE 802.11b TX
CH6

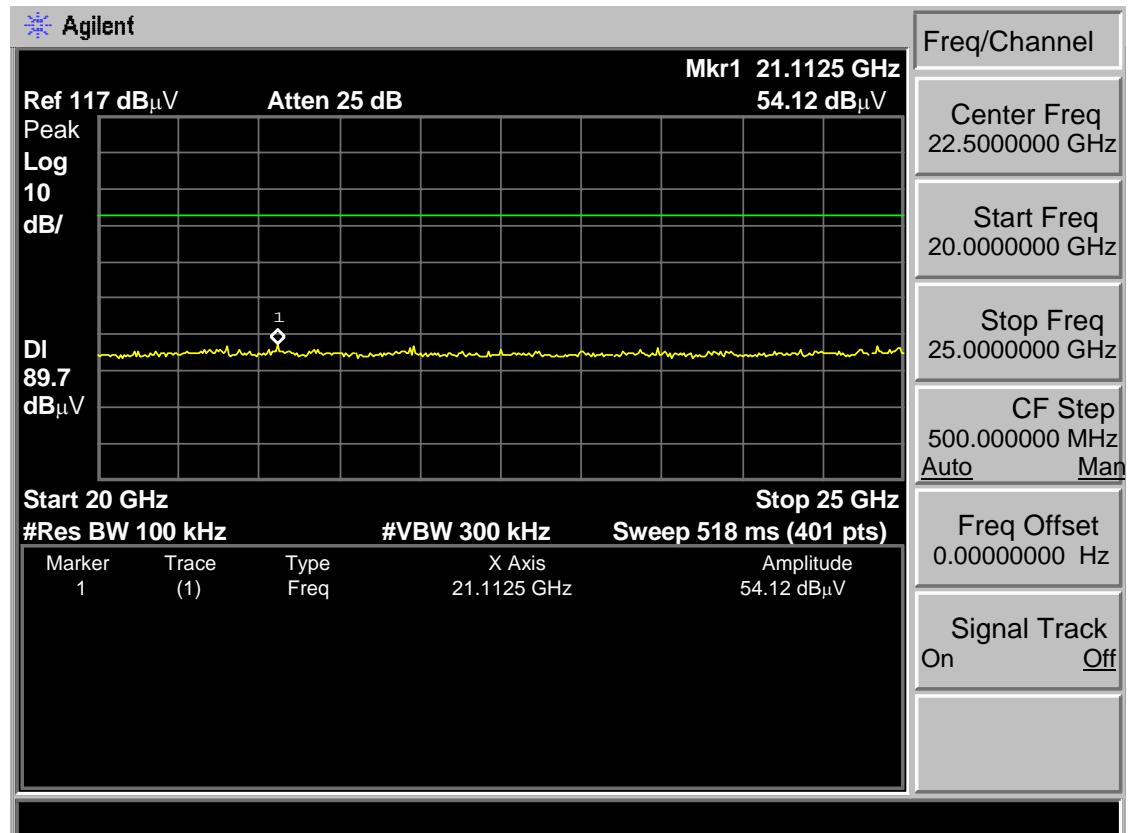




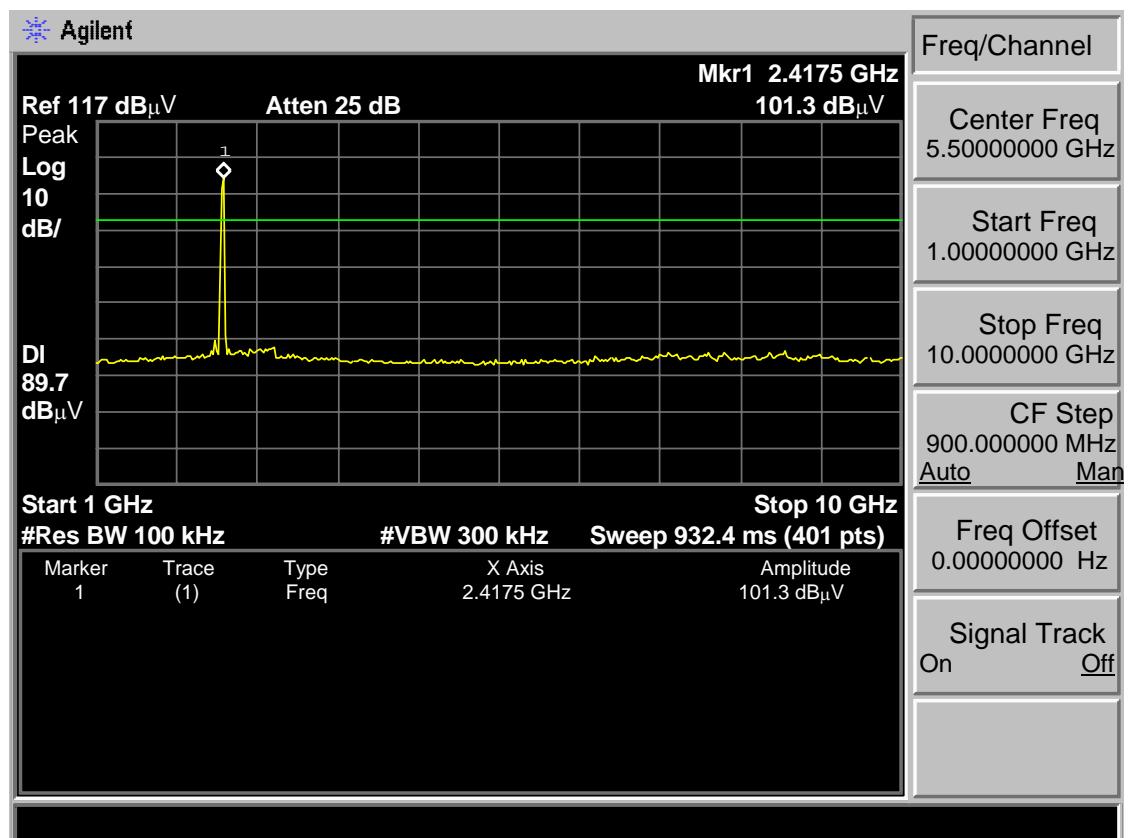
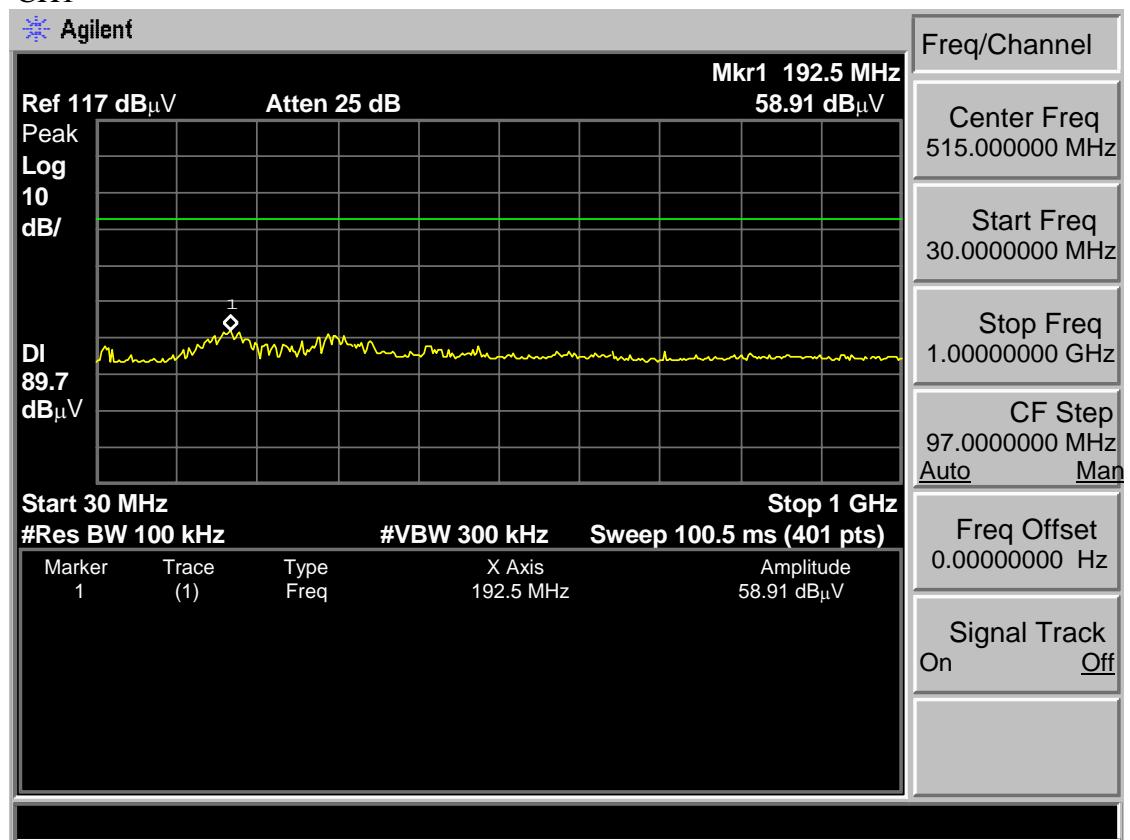
Test Mode: IEEE 802.11b TX
CH11

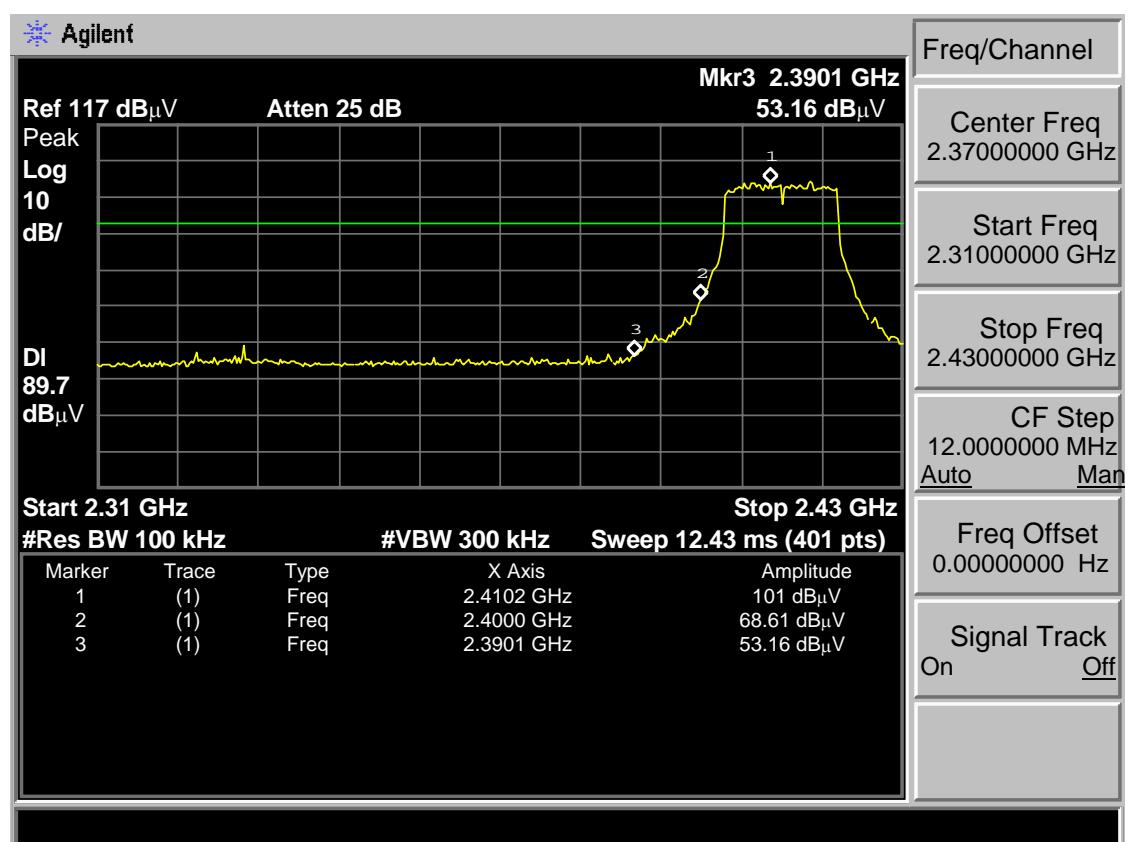
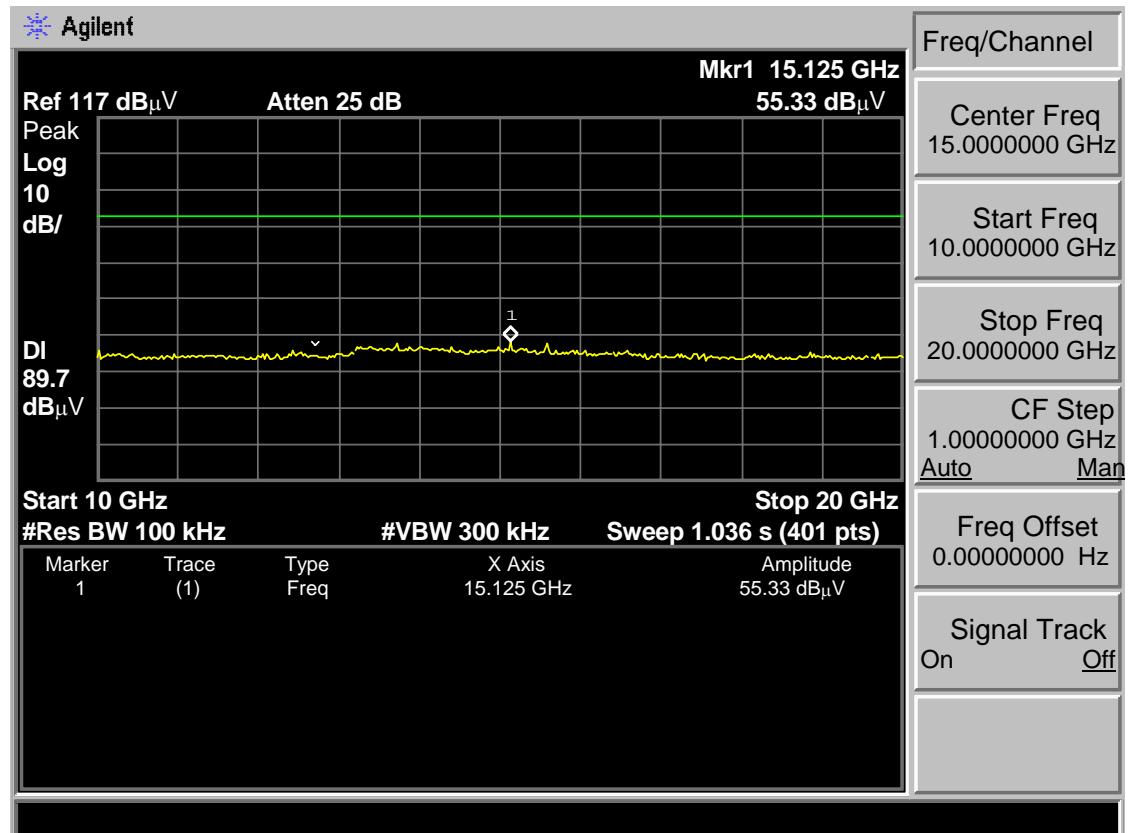


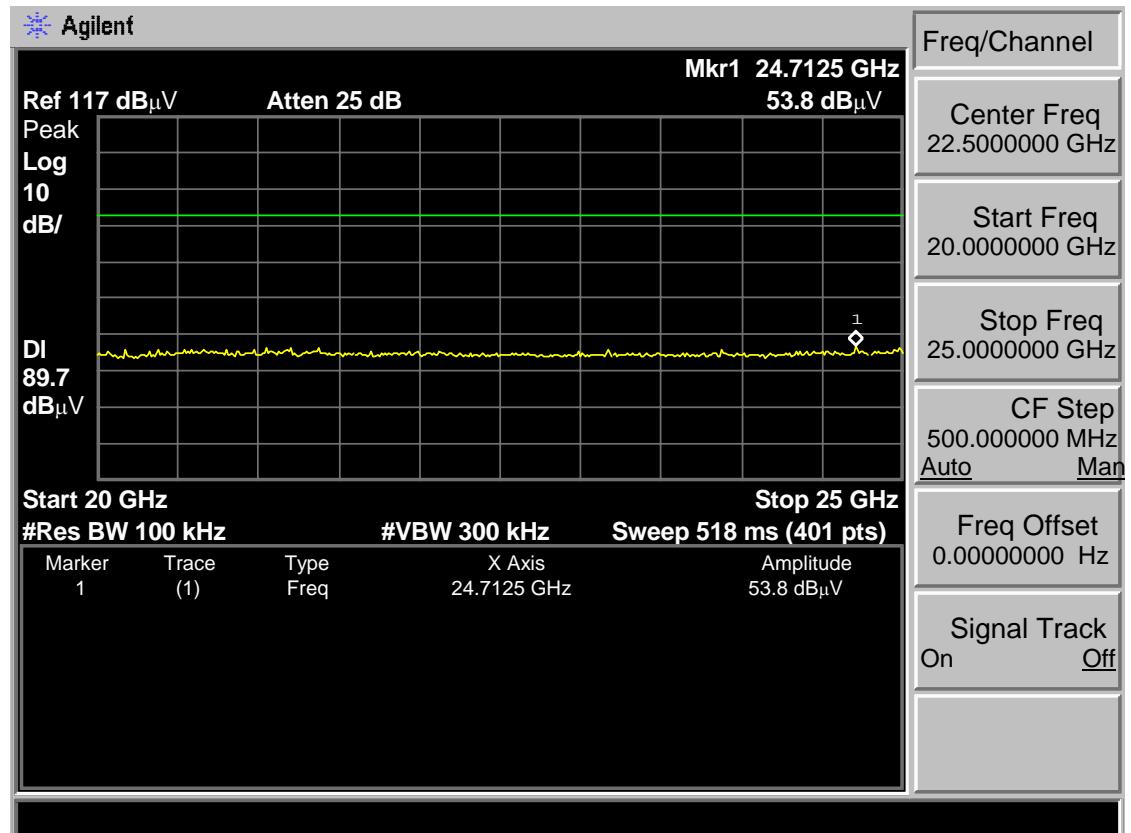




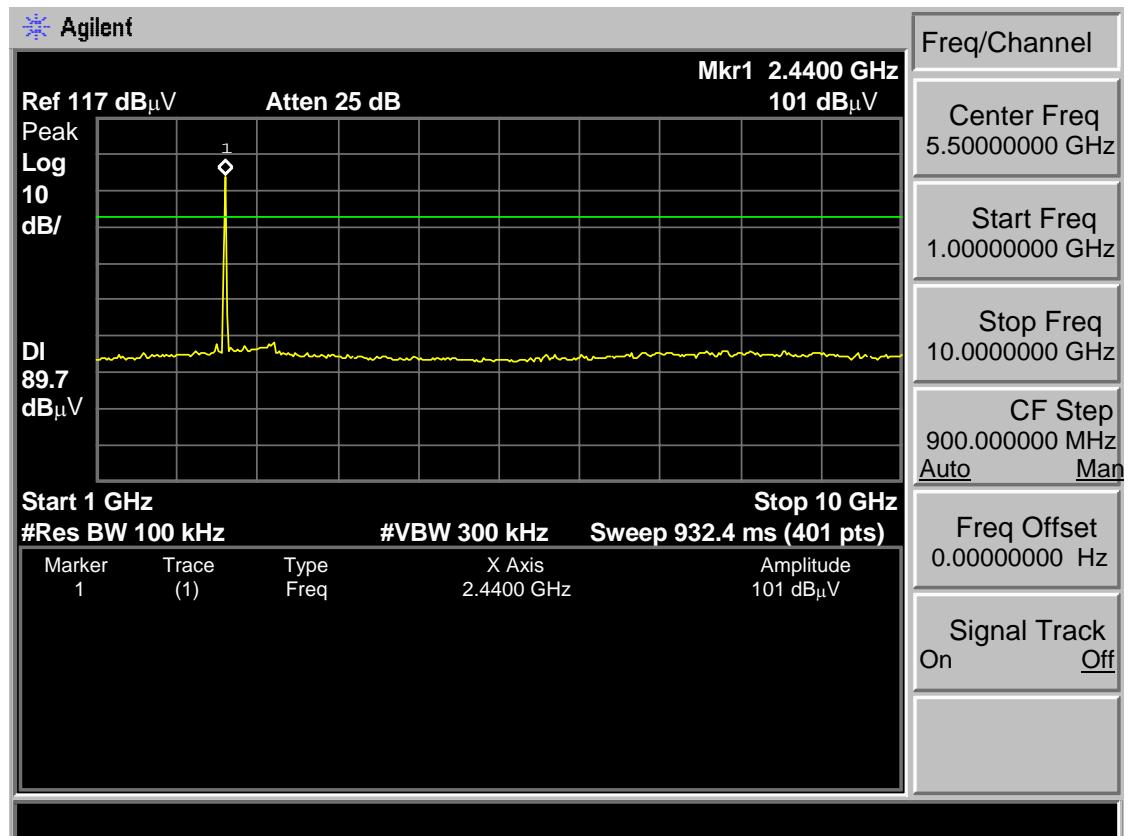
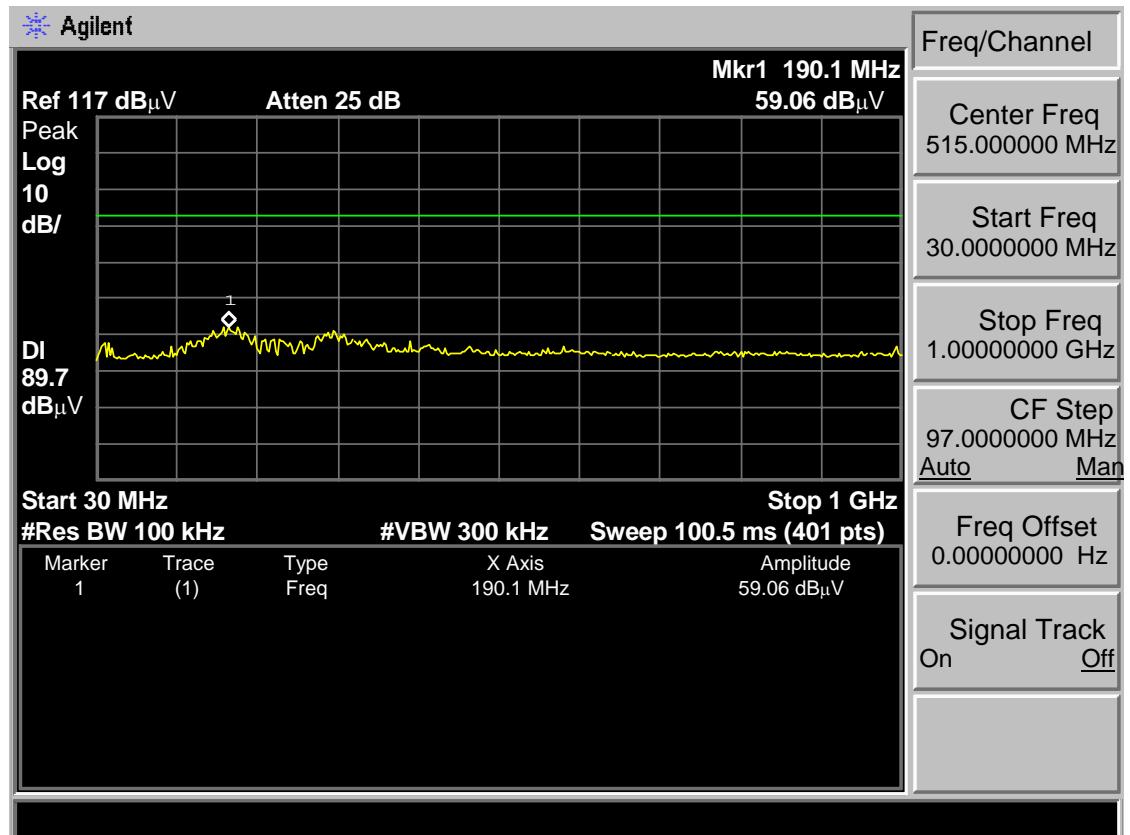
Test Mode: IEEE 802.11g TX
CH1

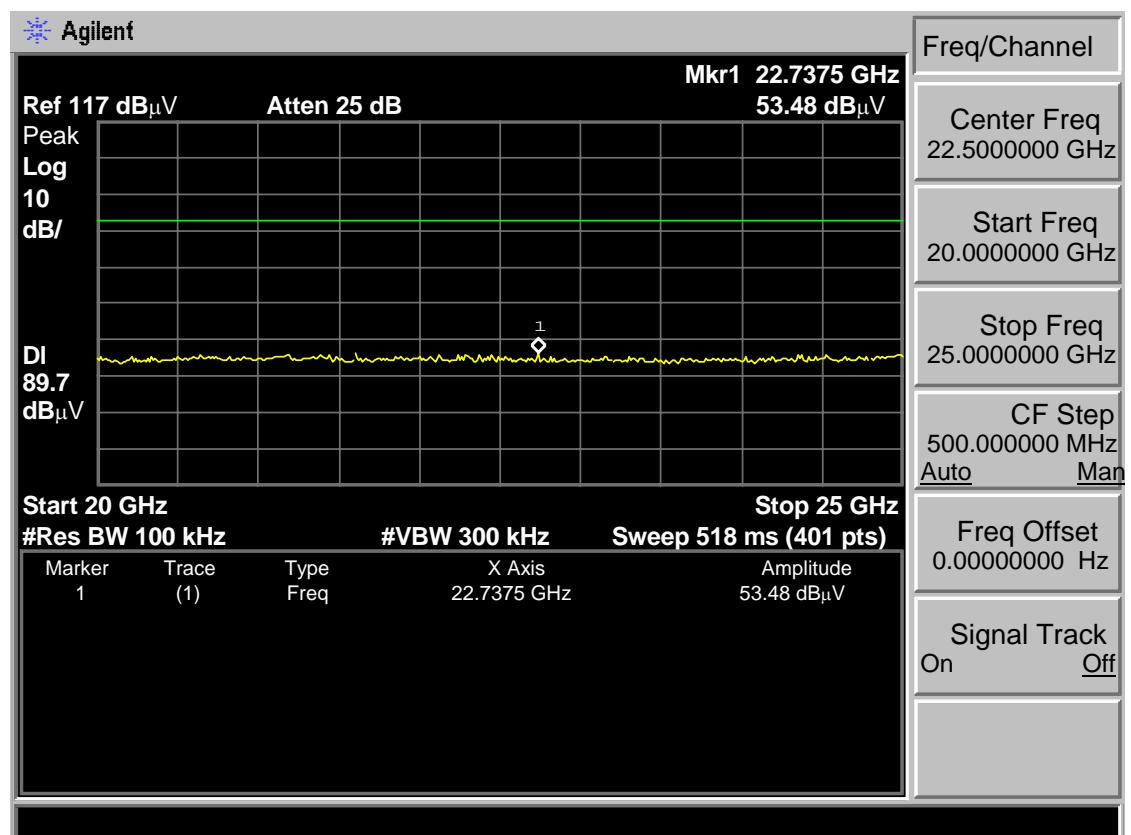
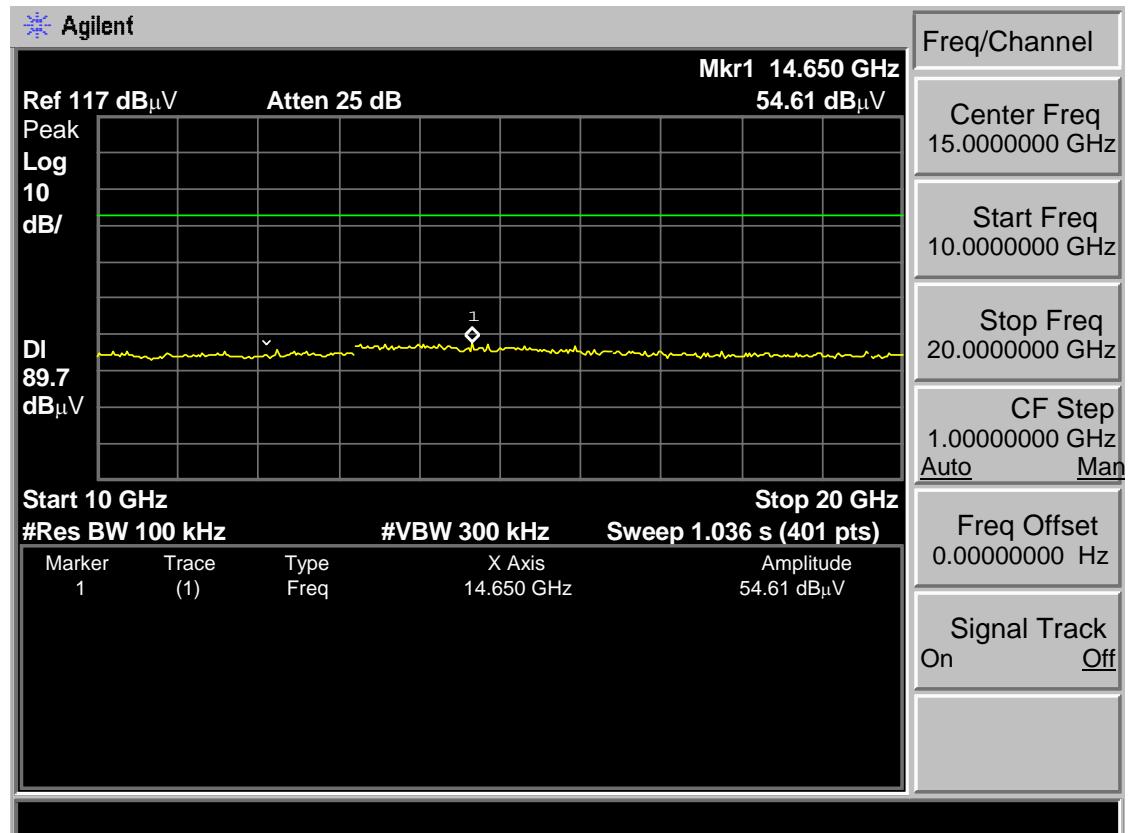




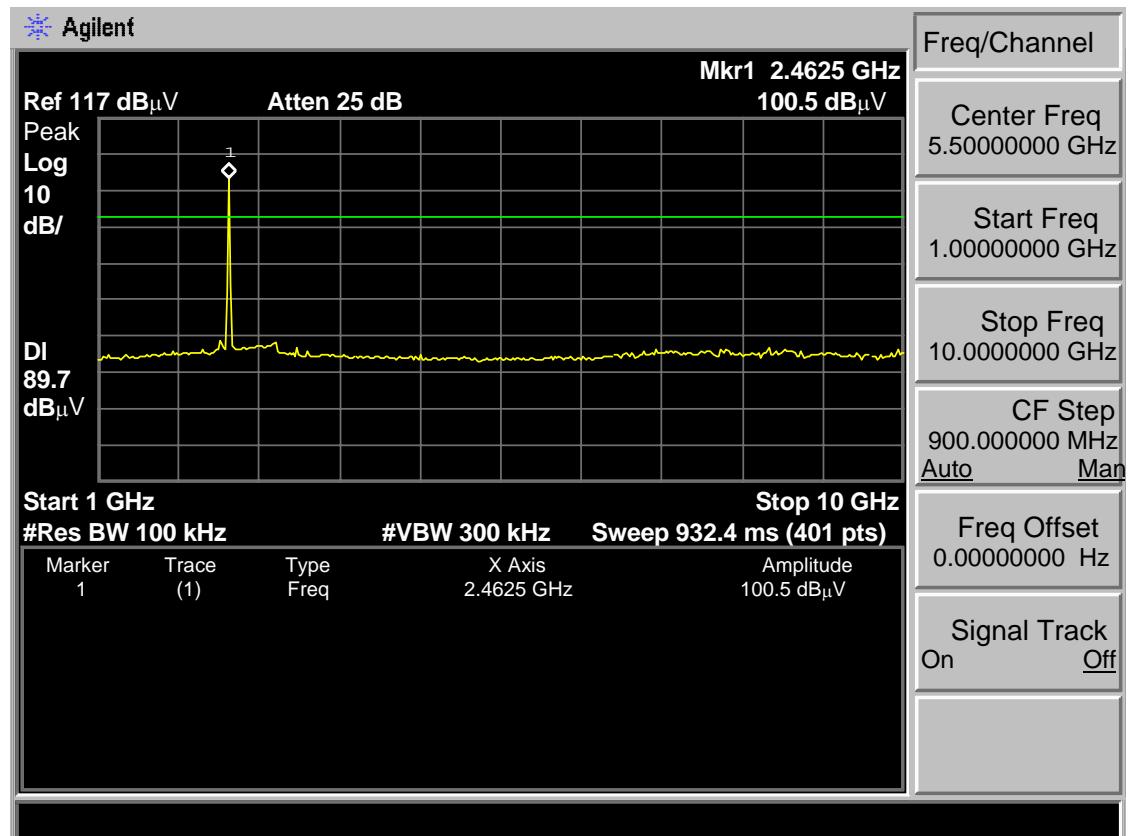
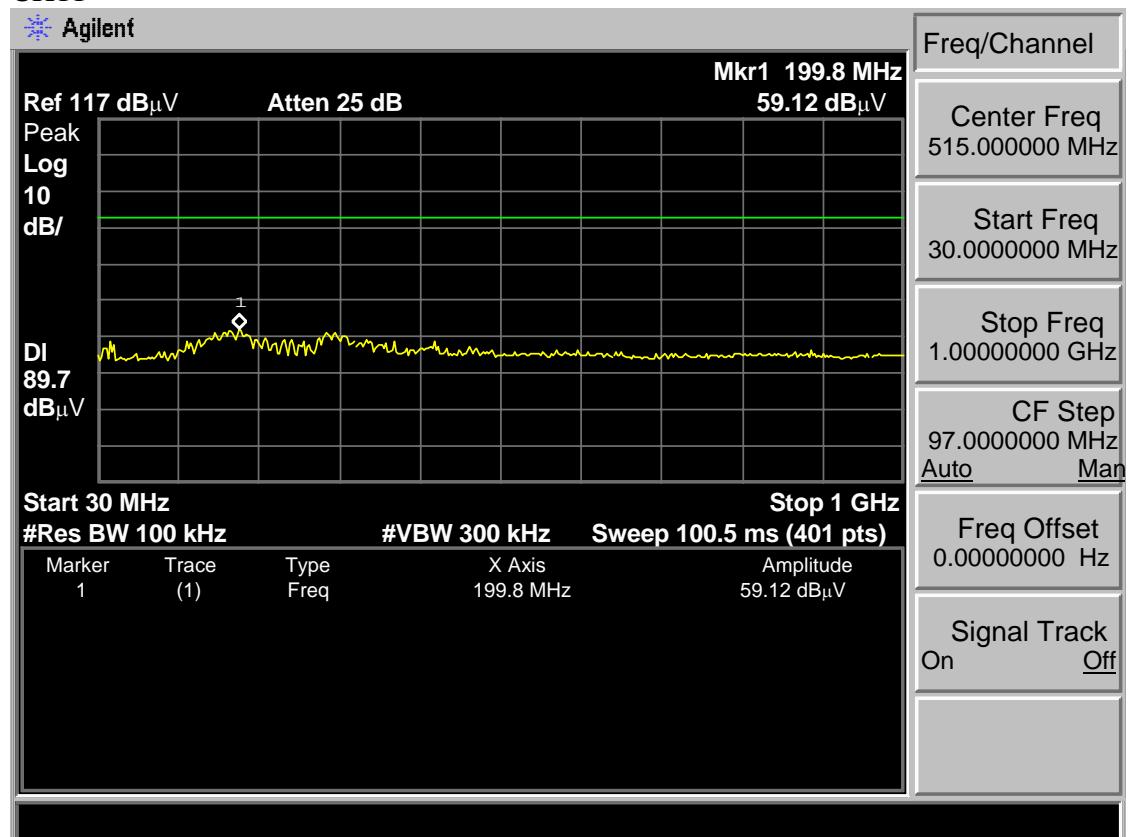


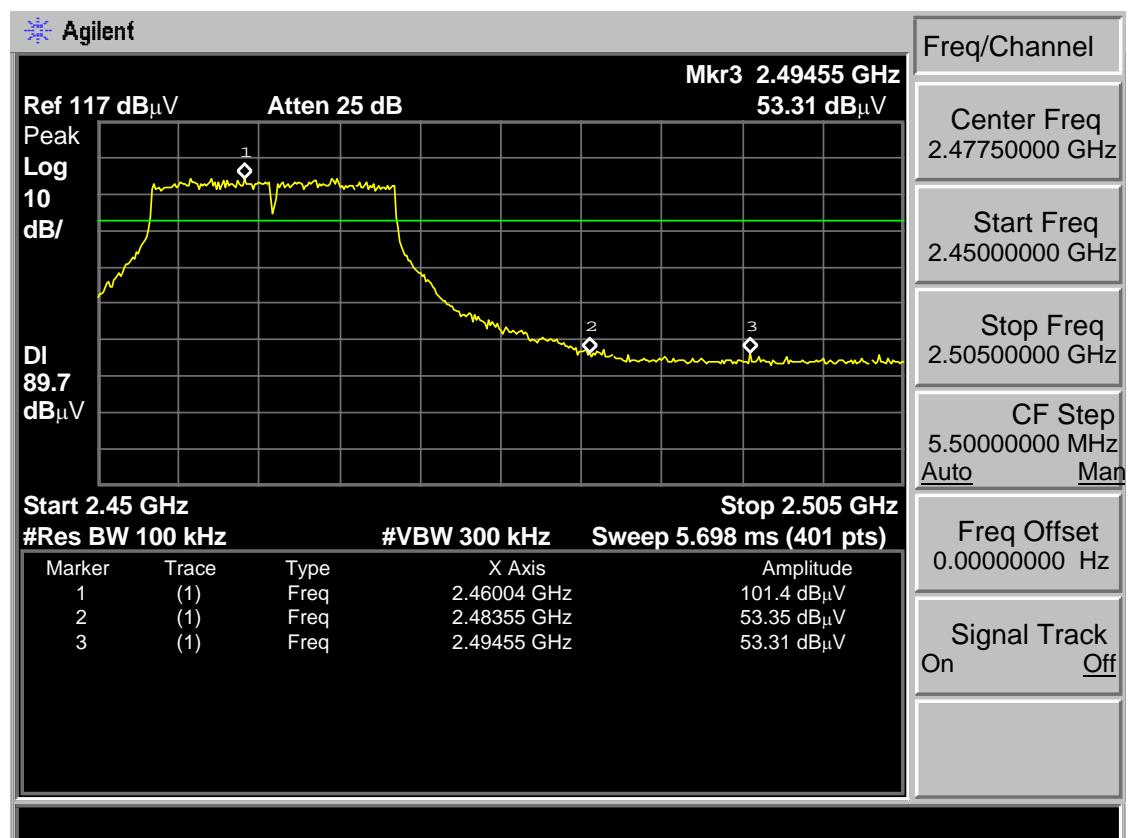
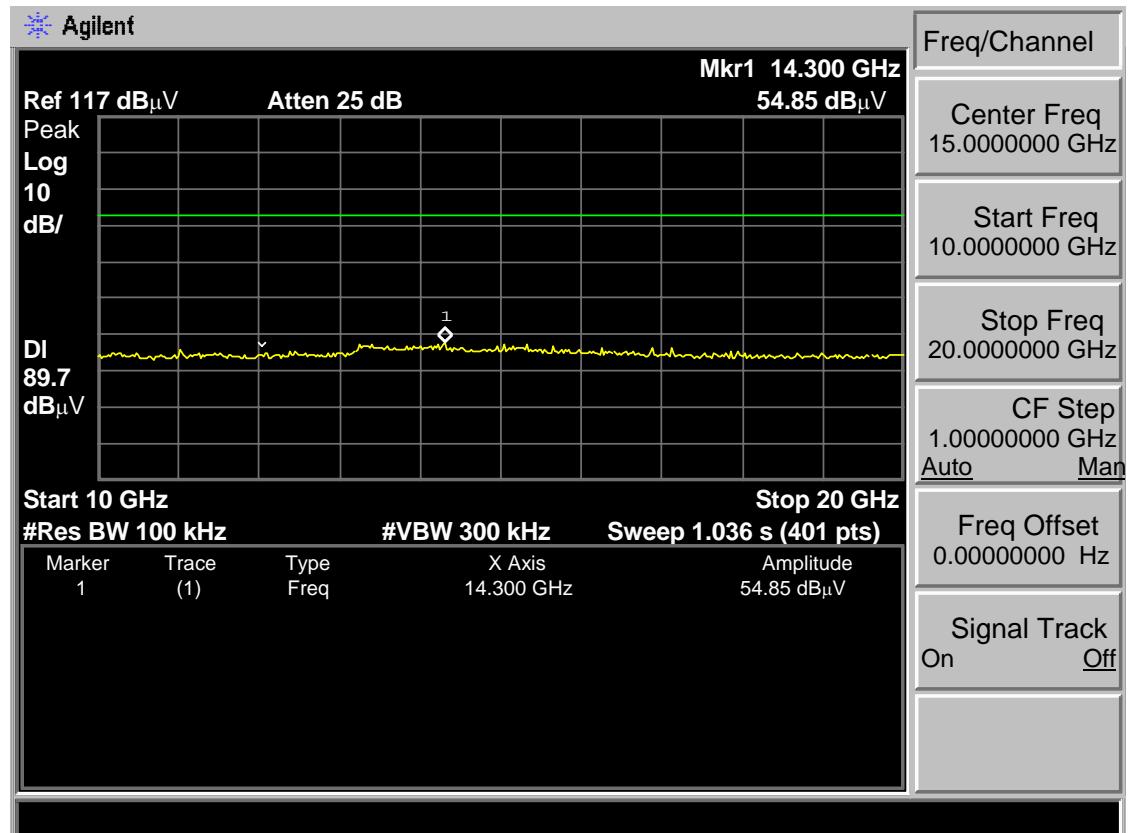
Test Mode: IEEE 802.11g TX
CH6

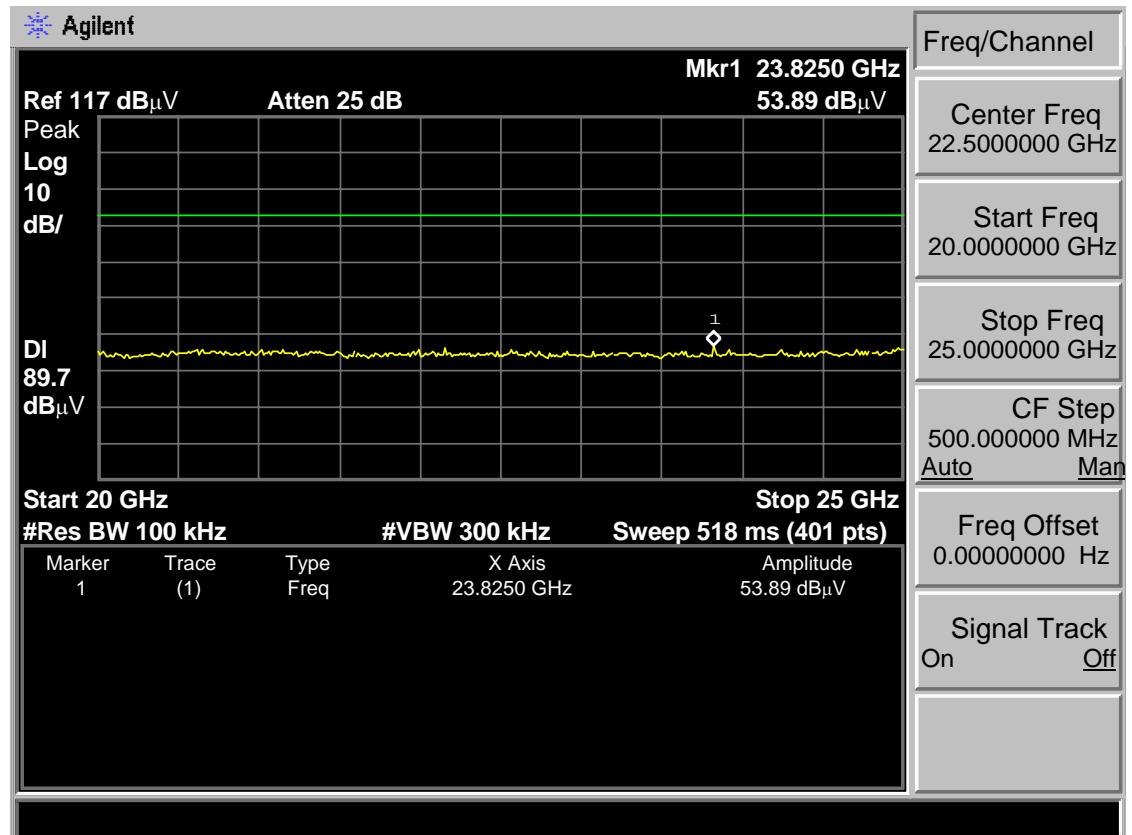




Test Mode: IEEE 802.11g TX
CH11







6 BAND EDGE COMPLIANCE TEST

6.1 Limit

All the lower and upper band-edges emissions appearing within 2310MHz to 2390MHz and 2483.5MHz to 2500MHz restricted frequency bands shall not exceed the limits shown in 15.209, all the other emissions outside operation frequency band 2400MHz to 2483.5MHz shall be at least 20dB below the fundamental emissions, or comply with 15.209 limits

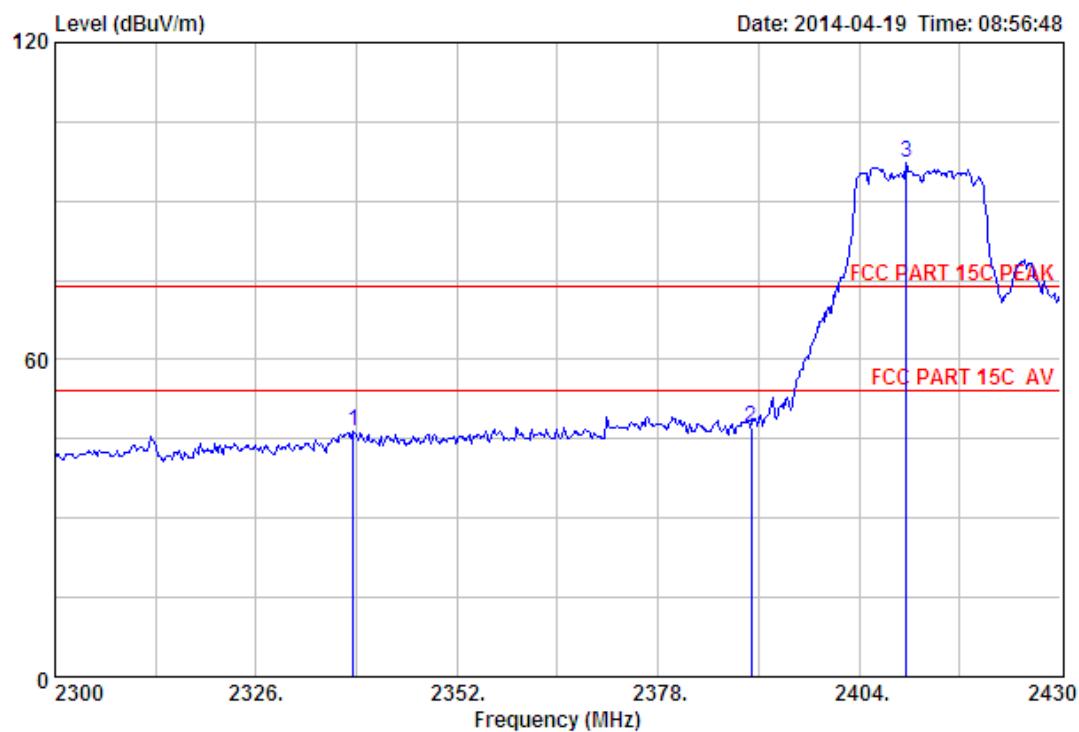
6.2 Test Procedure

1. The EUT is placed on a turntable, which is 0.8m above the ground plane and worked at highest radiated power.
2. The turntable was rotated for 360 degrees to determine the position of maximum emission level.
3. EUT is set 3m away from the receiving antenna, which is varied from 1m to 4m to find out the highest emission.
4. Set the spectrum analyzer in the following setting in order to capture the lower and upper band-edges of the emission:
 - (a) PEAK: RBW=1MHz; VBW=3MHz; Sweep=AUTO
 - (b) AVERAGE: RBW=1MHz; VBW=10Hz; Sweep=AUTO

6.3 Test Result

Pass (The testing data was attached in the next pages.)

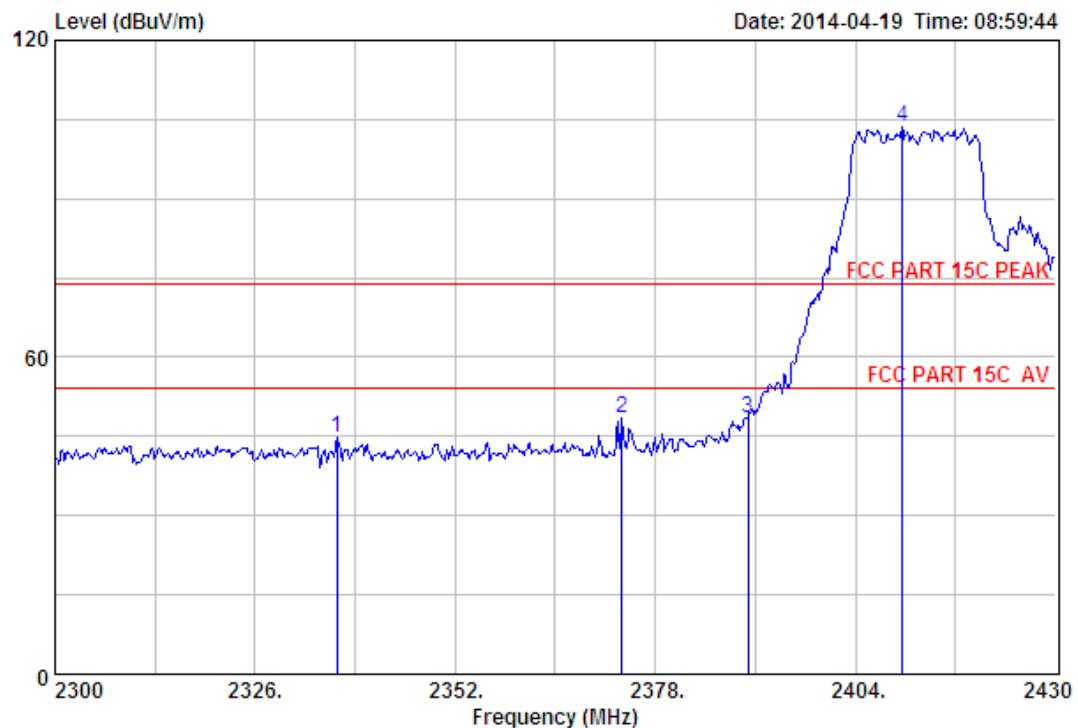
6.4 Test Data



Site no. : 3m Chamber Data no. : 7
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH1 2412TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				Margin (dB)	Remark
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)			
1 2338.61	27.73	6.56	34.23	46.56	46.62	74.00	27.38		Peak
2 2390.00	27.64	6.62	34.19	47.20	47.27	74.00	26.73		Peak
3 2410.11	27.60	6.64	34.15	97.29	97.38	74.00	-23.38		Peak

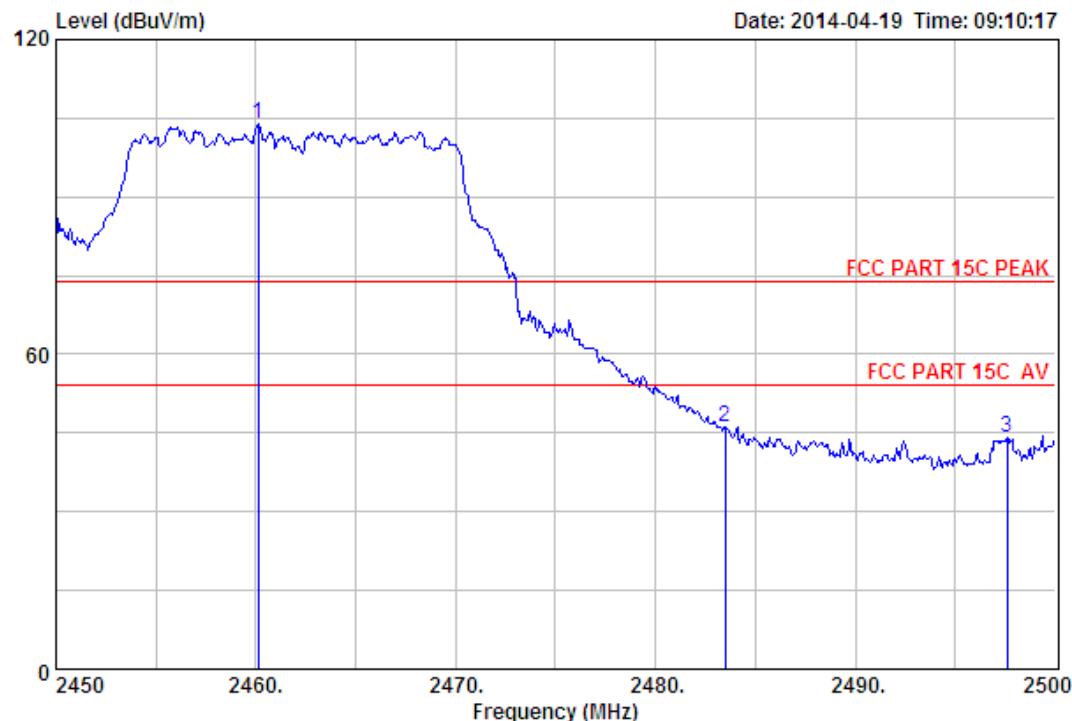
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 8
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH1 2412TX

Freq. (MHz)	Ant. Factor	Cable Loss	Amp Factor	Emission				
				Reading	Level	Limits	Margin	Remark
				(dBuV)	(dBuV/m)	(dBuV/m)	(dB)	
1 2336.66	27.73	6.56	34.23	44.71	44.77	74.00	29.23	Peak
2 2373.71	27.67	6.60	34.20	48.47	48.54	74.00	25.46	Peak
3 2390.00	27.64	6.62	34.19	48.41	48.48	74.00	25.52	Peak
4 2410.11	27.60	6.64	34.15	103.44	103.53	74.00	-29.53	Peak

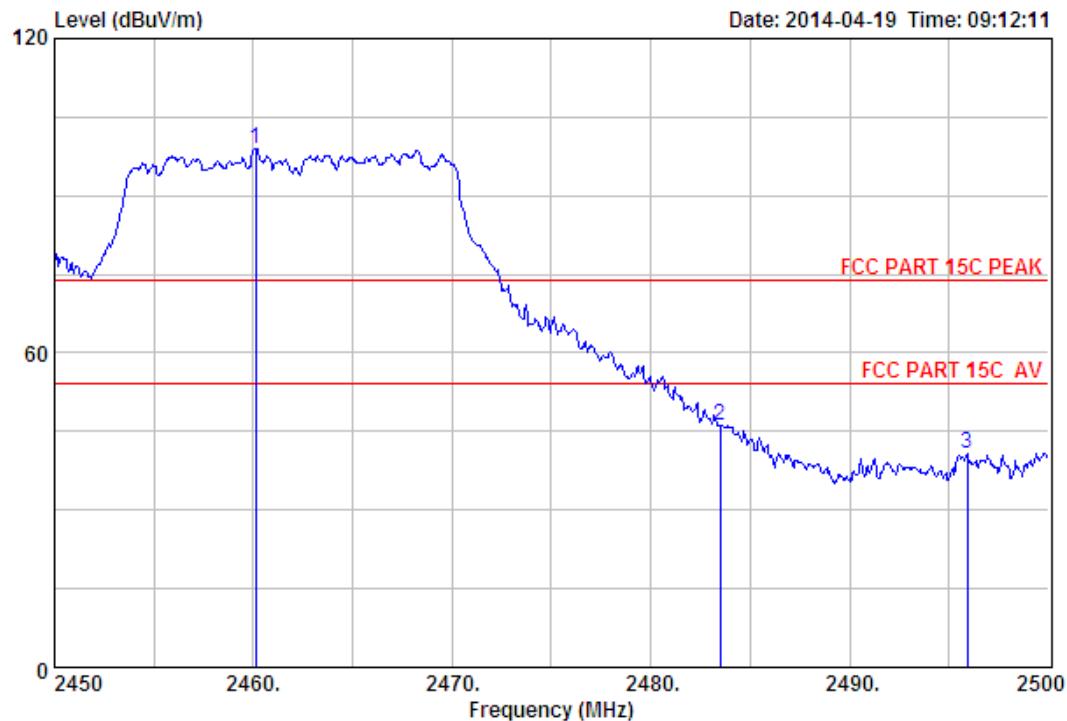
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 13
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH11 2462TX

Freq. (MHz)	Ant. Factor	Cable Loss	Amp Factor	Emission				
				Reading	Level	Limits	Margin	Remark
	(dB/m)	(dB)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)	
1 2460.10	27.58	6.69	34.06	103.76	103.97	74.00	-29.97	Peak
2 2483.50	27.58	6.71	34.03	45.82	46.08	74.00	27.92	Peak
3 2497.60	27.57	6.73	34.00	43.75	44.05	74.00	29.95	Peak

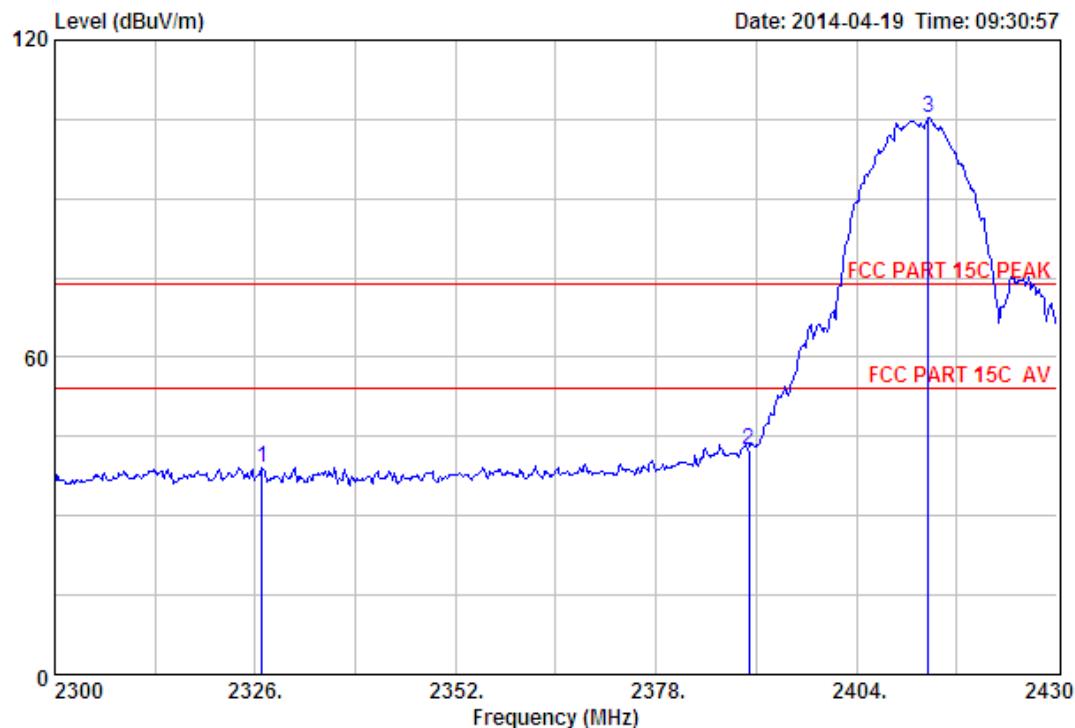
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 14
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11g CH11 2462TX

Freq. (MHz)	Ant. Factor	Cable Loss	Amp Factor	Emission				
				Reading	Level	Limits	Margin	Remark
				(dBuV)	(dBuV/m)	(dBuV/m)	(dB)	
1 2460.10	27.58	6.69	34.06	98.85	99.06	74.00	-25.06	Peak
2 2483.50	27.58	6.71	34.03	45.77	46.03	74.00	27.97	Peak
3 2495.90	27.57	6.73	34.00	40.46	40.76	74.00	33.24	Peak

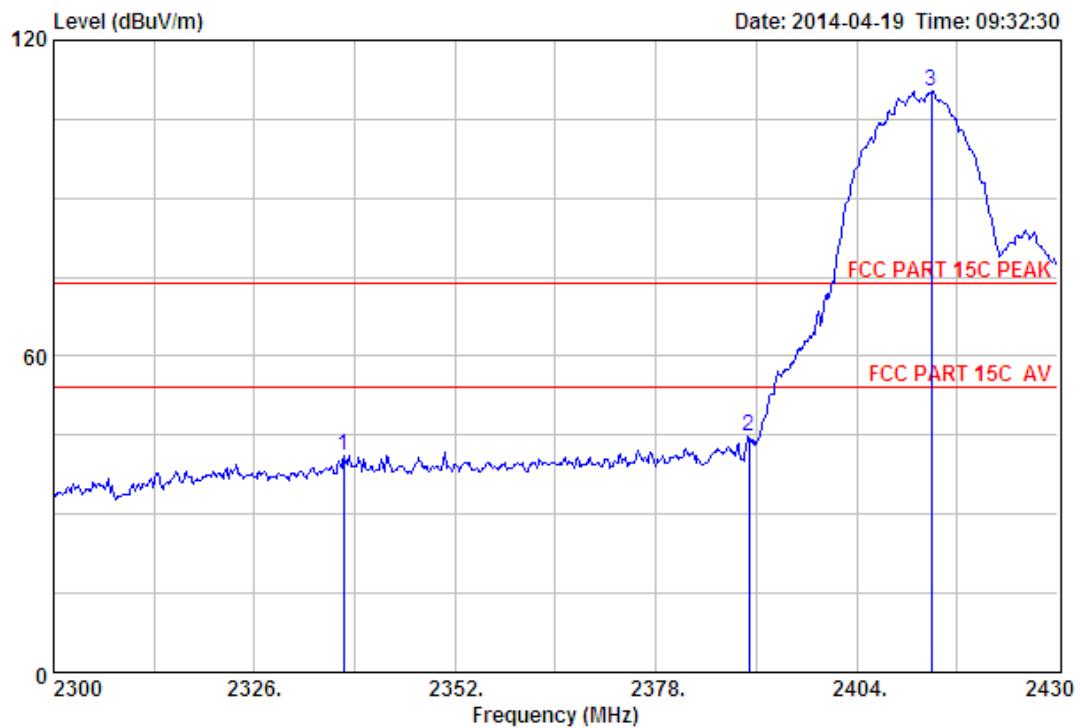
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 23
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH1 2412TX

Freq. (MHz)	Ant.	Cable	Amp	Emission				
	Factor (dB/m)	Loss (dB)	Factor (dB)	Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1 2326.91	27.73	6.54	34.23	39.10	39.14	74.00	34.86	Peak
2 2390.00	27.64	6.62	34.19	42.50	42.57	74.00	31.43	Peak
3 2413.36	27.60	6.64	34.15	105.12	105.21	74.00	-31.21	Peak

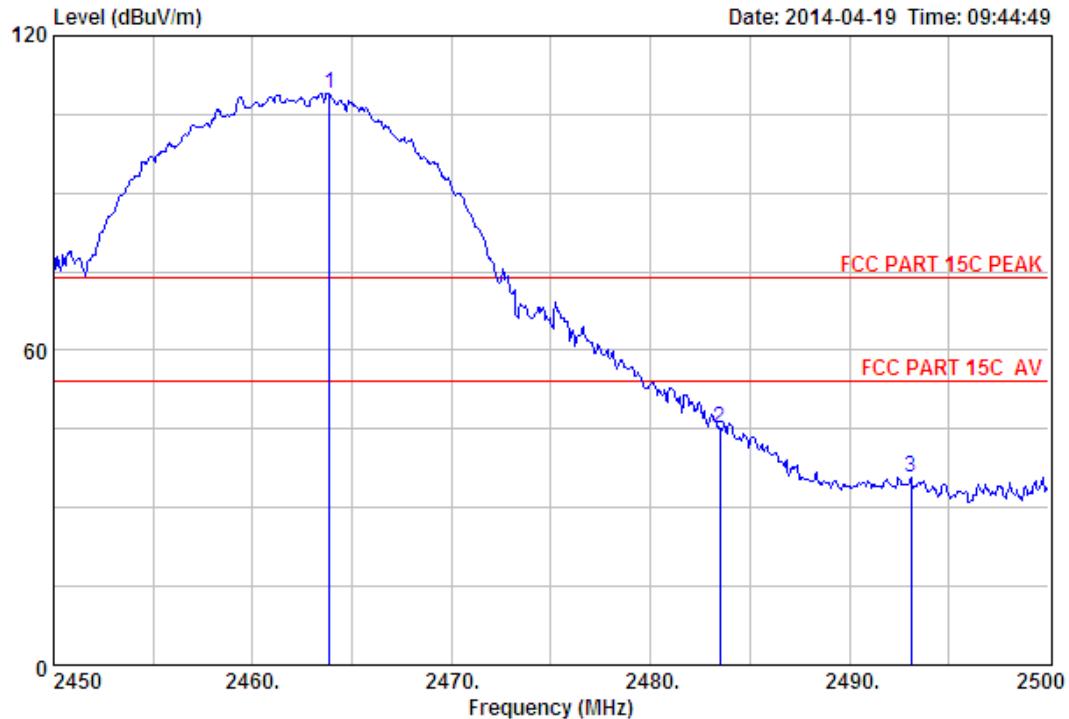
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 24
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH1 2412TX

Freq. (MHz)	Ant. Factor	Cable Loss	Amp Factor	Emission				
				Reading	Level	Limits	Margin	Remark
	(dB/m)	(dB)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)	
1 2337.57	27.73	6.56	34.23	41.18	41.24	74.00	32.76	Peak
2 2390.00	27.64	6.62	34.19	44.62	44.69	74.00	29.31	Peak
3 2413.62	27.60	6.64	34.15	110.32	110.41	74.00	-36.41	Peak

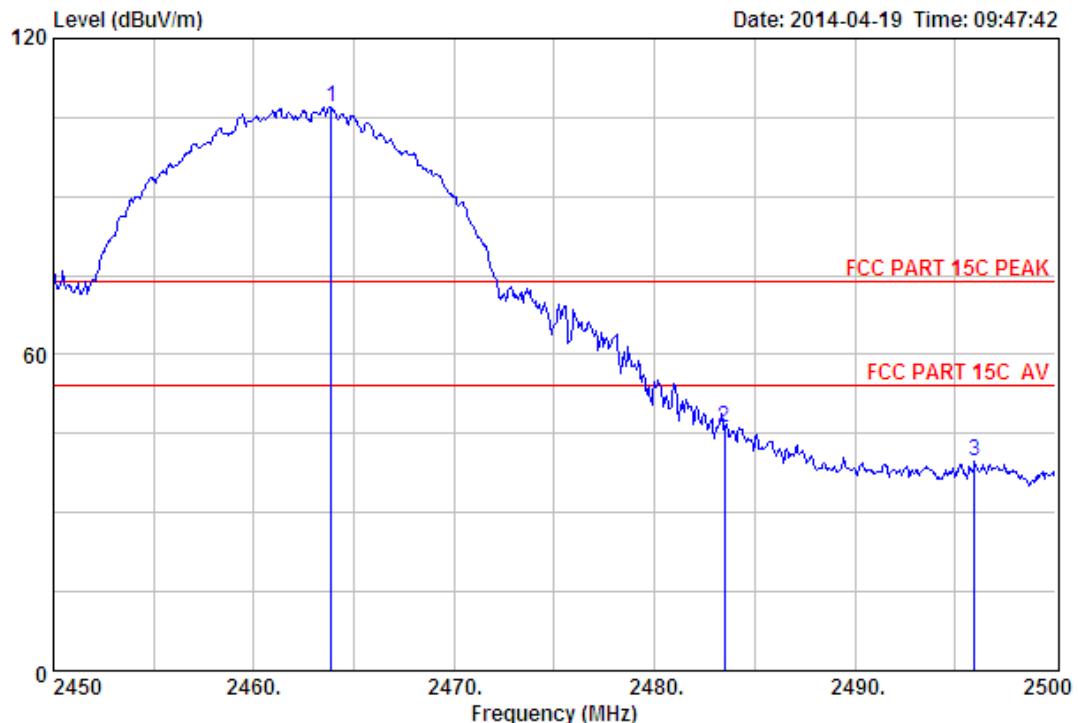
Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 29
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : HORIZONTAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH11 2462TX

Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	Amp Factor (dB)	Emission				Remark
				Reading (dBuV)	Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	
1 2463.85	27.58	6.69	34.06	108.81	109.02	74.00	-35.02	Peak
2 2483.50	27.58	6.71	34.03	44.78	45.04	74.00	28.96	Peak
3 2493.10	27.58	6.73	34.03	35.62	35.90	74.00	38.10	Peak

Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 30
 Dis. / Ant. : 3m ANT 1-18G Ant. pol. : VERTICAL
 Limit : FCC PART 15C PEAK
 Env. / Ins. : Temp:25.6';Humi:56%;Press:101.52kPa
 Engineer : Tony
 EUT : Air washer
 Power : AC 120V/60Hz
 M/N : Robert
 Test Mode : IEEE 802.11b CH11 2462TX

Freq. (MHz)	Ant. Factor	Cable Loss	Amp Factor	Emission				
				Reading	Level	Limits	Margin	Remark
	(dB/m)	(dB)	(dB)	(dBuV)	(dBuV/m)	(dBuV/m)	(dB)	
1	2463.85	27.58	6.69	34.06	106.61	106.82	74.00	-32.82 Peak
2	2483.50	27.58	6.71	34.03	45.78	46.04	74.00	27.96 Peak
3	2495.95	27.57	6.73	34.00	39.41	39.71	74.00	34.29 Peak

Remarks: 1. Emission Level= Antenna Factor + Cable Loss - Amp Factor + Reading.
 2. The emission levels that are 20dB below the official limit are not reported.

7 6dB Bandwidth Test

7.1 Limit

For direct sequence systems, the minimum 6dB bandwidth shall be at least 500kHz

7.2 Test Procedure

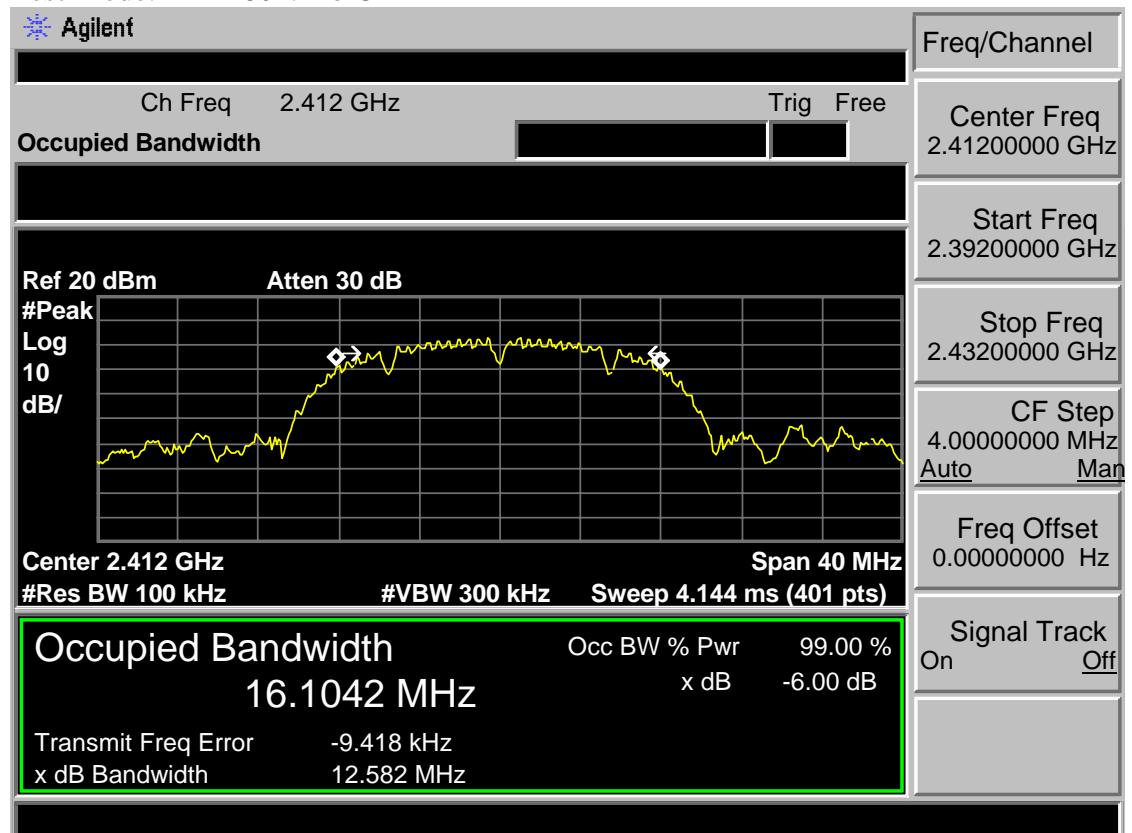
- 1, Connected the EUT's antenna port to spectrum analyzer device.
- 2, Follow the test procedure as described in KDB 558074
 - (1). Set resolution bandwidth (RBW) = 100 kHz.
 - (2). Set the video bandwidth (VBW) $\geq 3 \times$ RBW.
 - (3). Detector = Peak.
 - (4). Trace mode = max hold.
 - (5). Sweep = auto couple.
 - (6). Allow the trace to stabilize.
 - (7). Measure the maximum width of the emission that is constrained by the frequencies associated with the two outermost amplitude points (upper and lower) that are attenuated by 6 dB relative to the maximum level measured in the fundamental emission.

7.3 Test Result

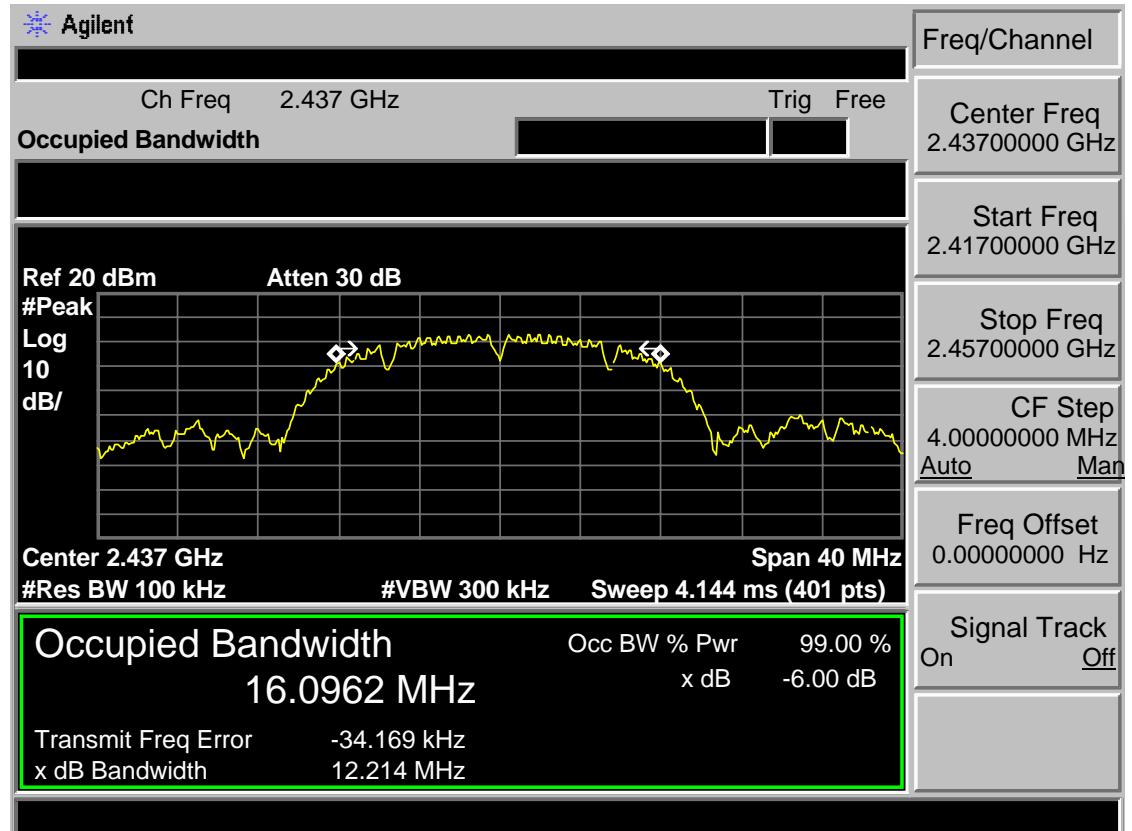
EUT: Air washer			
M/N: Robert			
Test date: April 18, 2014		Tested by: Tony.Tang	Test site: RF Site
Test Mode	CH	6dB bandwidth (MHz)	Limit (KHz)
IEEE 802.11b	CH1	12.582	>500
	CH6	12.214	>500
	CH11	12.567	>500
IEEE 802.11g	CH1	16.494	>500
	CH6	16.524	>500
	CH11	16.496	>500
Conclusion : PASS			

7.4 Test Data

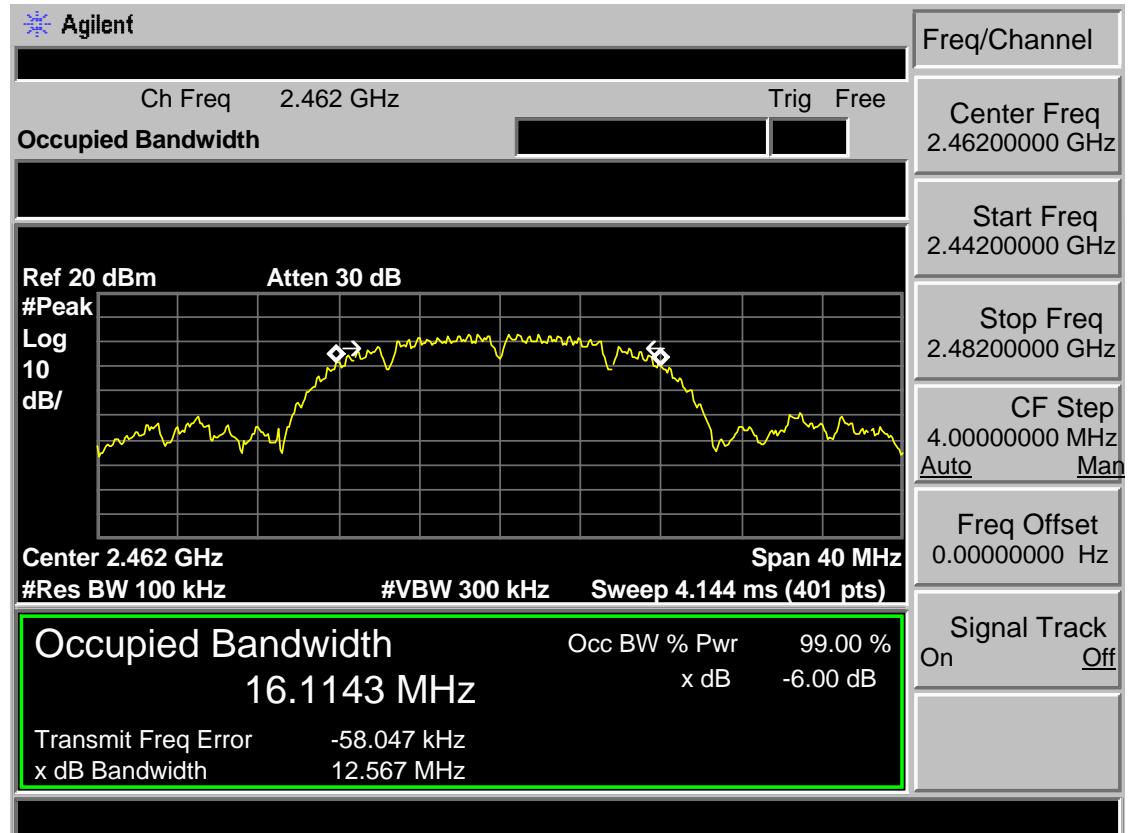
Test Mode: IEEE 802.11b CH1 TX 2412MHz



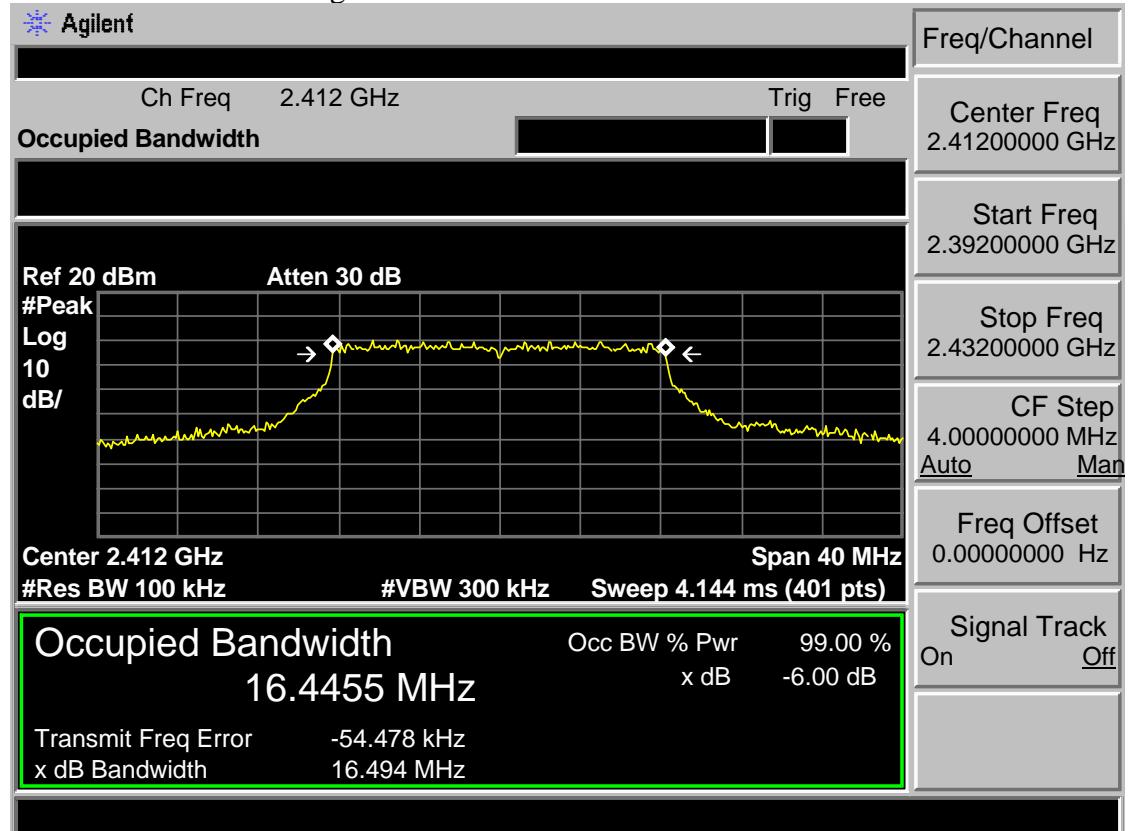
Test Mode: IEEE 802.11b CH6 TX 2437MHz



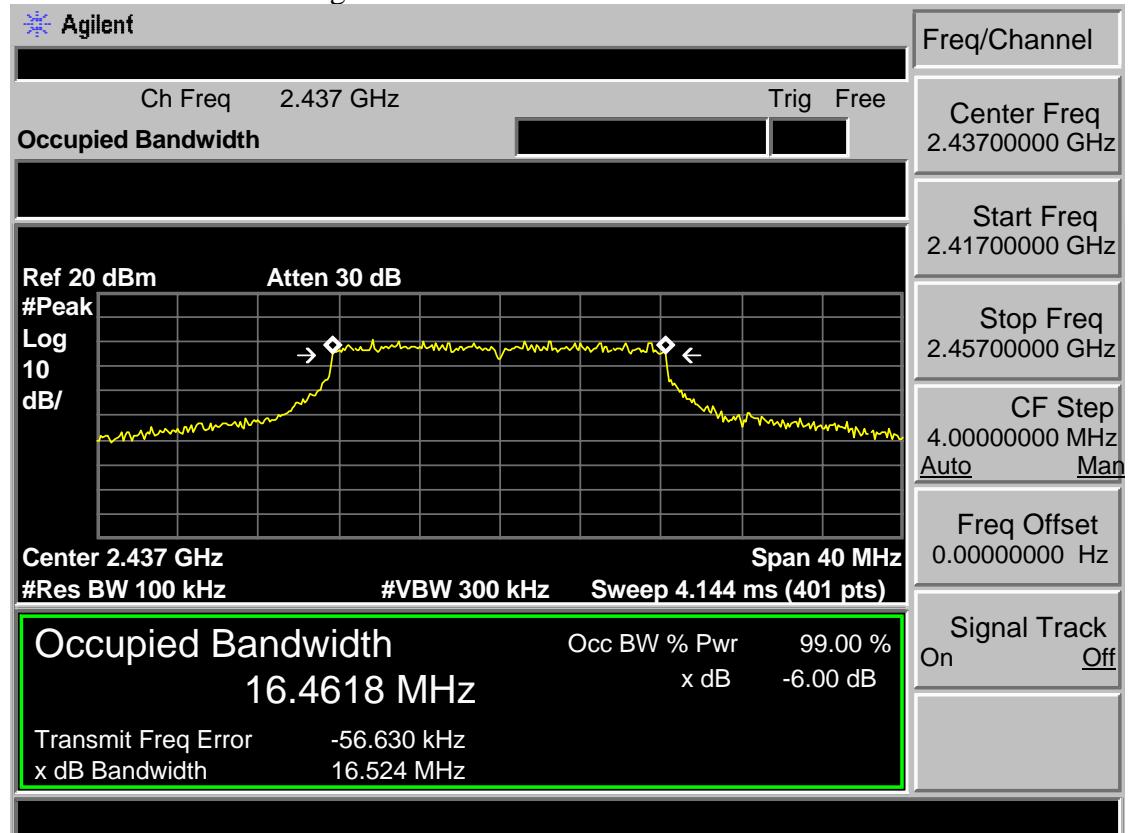
Test Mode: IEEE 802.11b CH11 TX 2462MHz



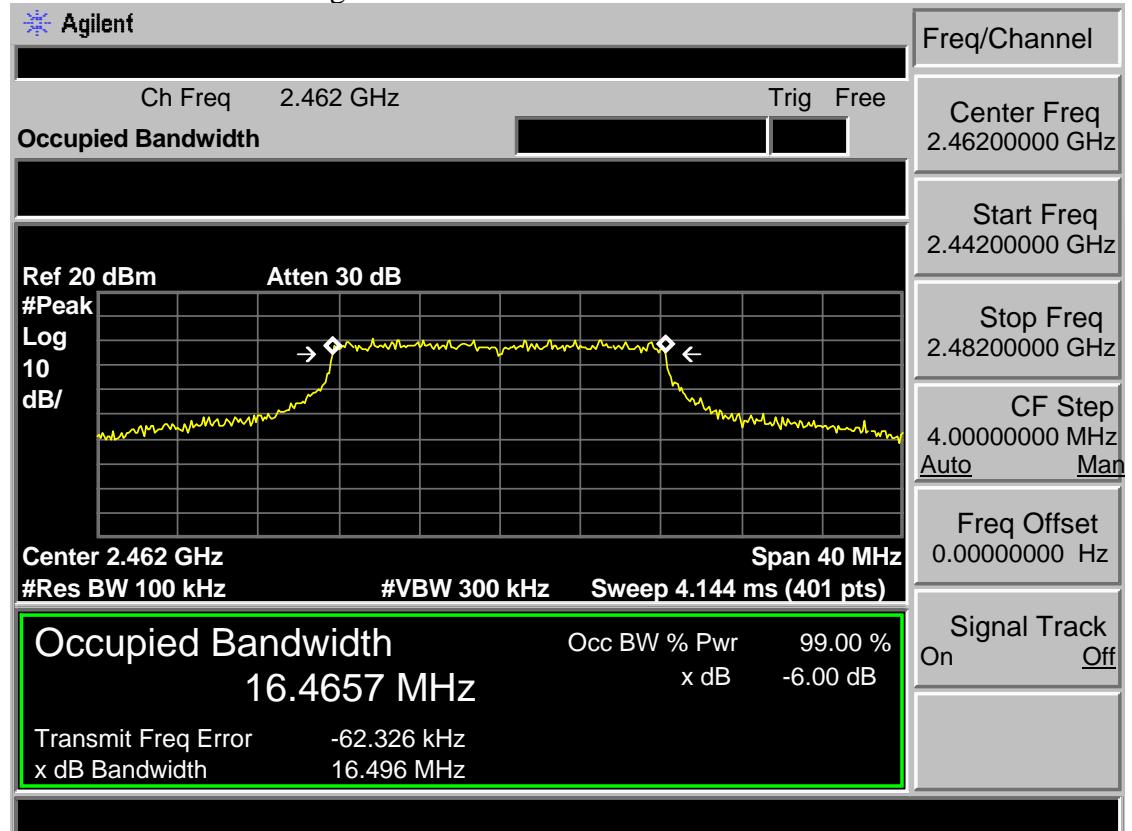
Test Mode: IEEE 802.11g CH1 TX 2412MHz



Test Mode: IEEE 802.11g CH6 TX 2437MHz



Test Mode: IEEE 802.11g CH11 TX 2462MHz



8 OUTPUT POWER TEST

8.1 Limit

For systems using digital modulation in the 2400—2483.5MHz, The Peak output Power shall not exceed 1W(30dBm)

8.2 Test Procedure

8.3 Test Procedure

- 1, Connected the EUT's antenna port to spectrum analyzer device.
- 2, Follow the test procedure as described in KDB 558074
 - (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.

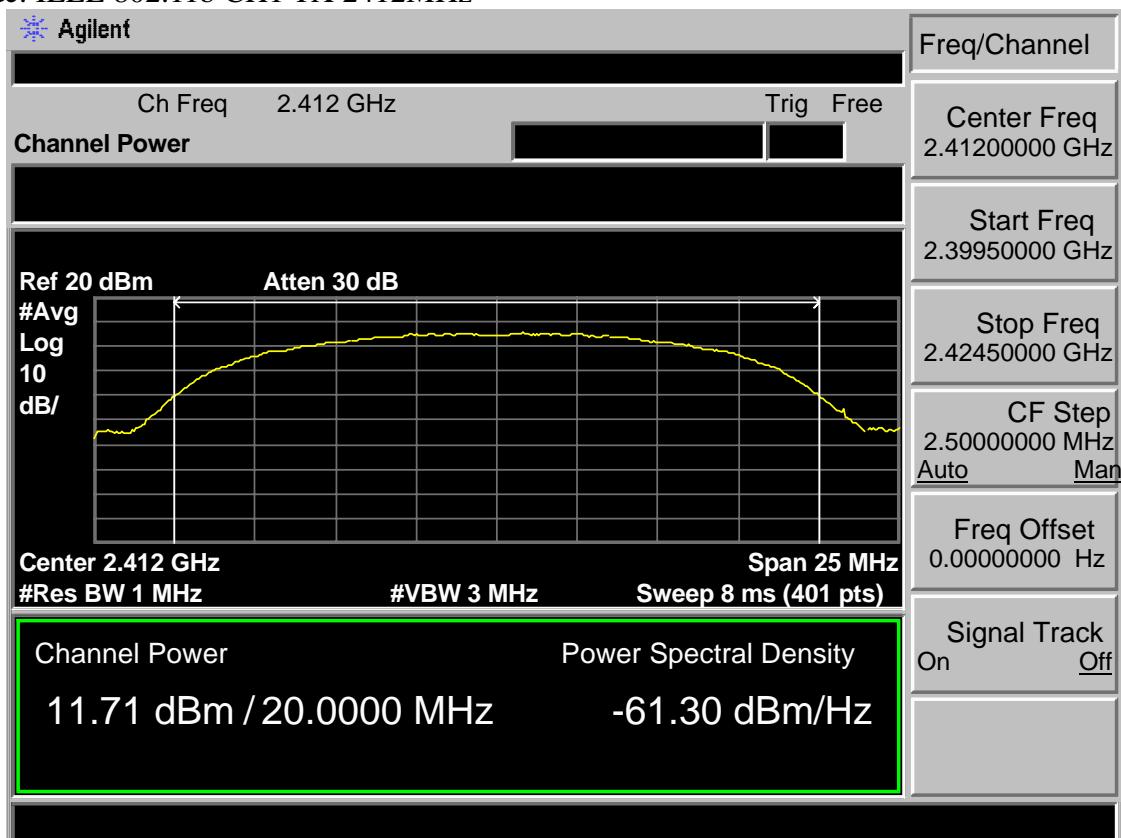
Note: The cable loss and attenuator loss were offset into measure device as an amplitude offset.

8.4 Test Result

EUT: Air washer			
M/N:Robert			
Test date: April 18,2014	Test site: 3m Chamber	Tested by: Tony Tang	
Pass			
Test Mode	CH	Peak output Power (dBm)	Limit (dBm)
IEEE 802.11b	CH1	11.71	30
	CH6	12.03	30
	CH11	12.48	30
IEEE 802.11g	CH1	7.27	30
	CH6	8.12	30
	CH11	8.21	30
Conclusion : PASS			

8.5 Test Data

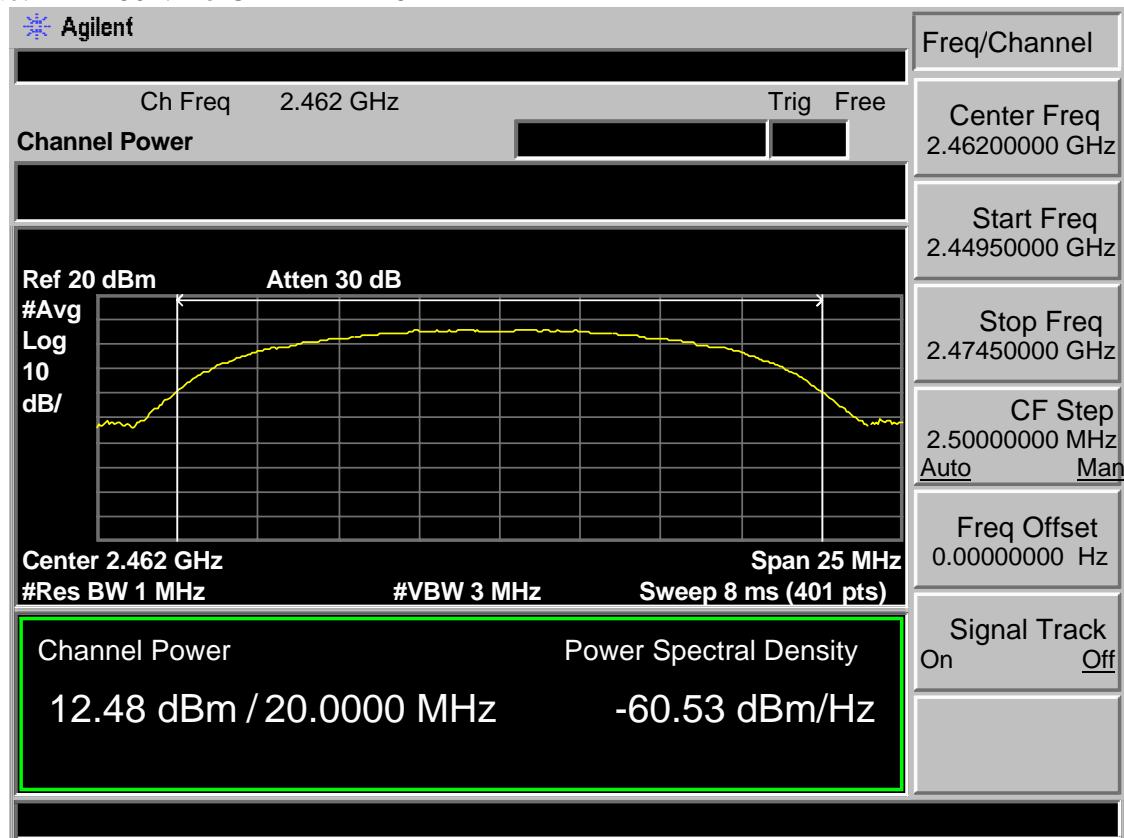
Test Mode: IEEE 802.11b CH1 TX 2412MHz



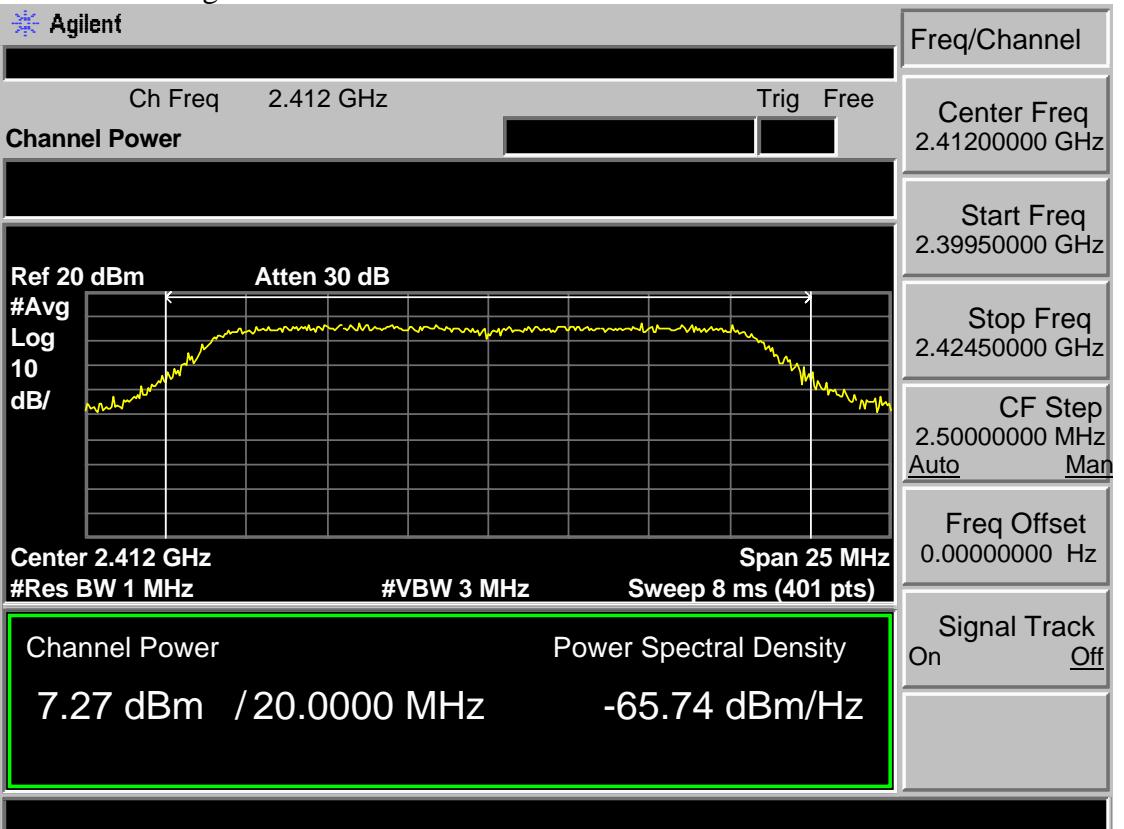
Test Mode: IEEE 802.11b CH6 TX 2437MHz



Test Mode: IEEE 802.11b CH11 TX 2462MHz



Test Mode: IEEE 802.11g CH1 TX 2412MHz



Test Mode: IEEE 802.11g CH6 TX 2437MHz



Test Mode: IEEE 802.11g CH11 TX 2462MHz



9 POWER SPECTRAL DENSITY TEST

9.1 Limit

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

9.2 Test Procedure

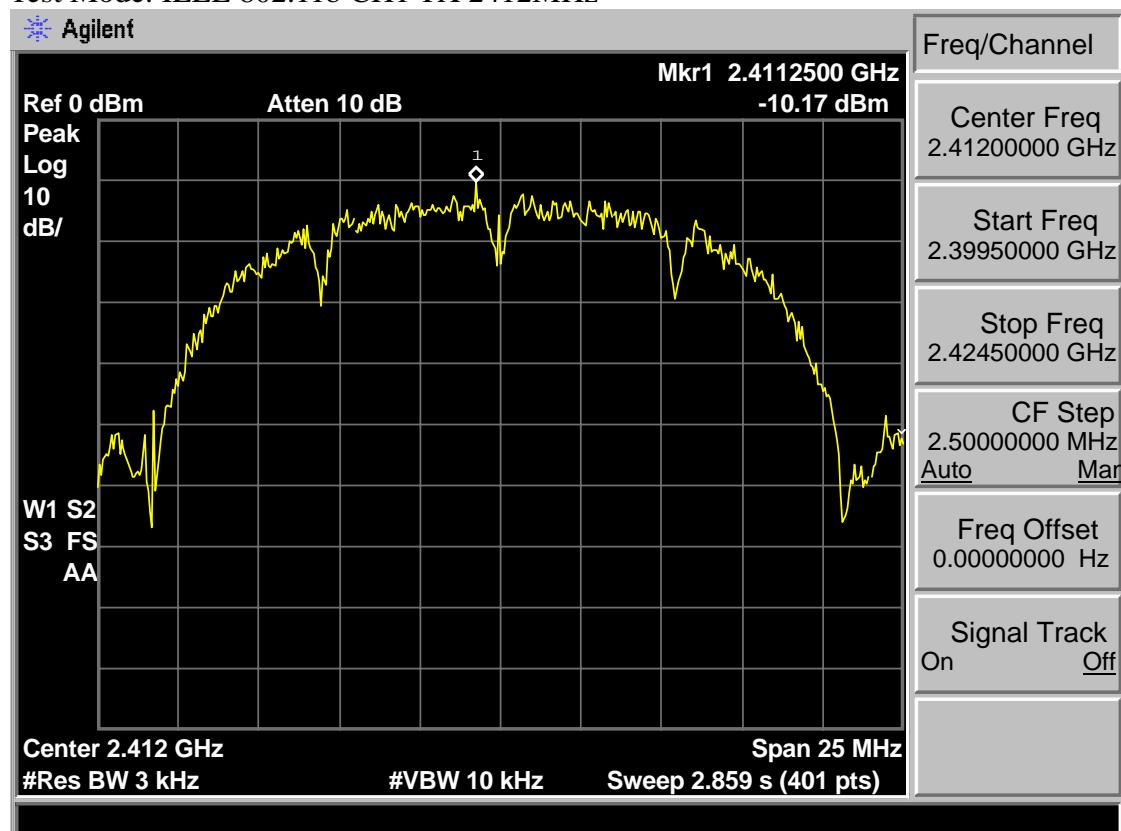
- 1, Connected the EUT's antenna port to spectrum analyzer device.
- 2, Follow the test procedure as described in KDB 558074
 - (1). Set analyzer center frequency to DTS channel center frequency.
 - (2). Set the span to 1.5 times the DTS bandwidth.
 - (3). Set the RBW to: $3 \text{ kHz} \leqslant \text{RBW} \leqslant 100 \text{ kHz}$.
 - (4). Set the VBW $\geqslant 3 \text{ RBW}$.
 - (5). Detector = peak.
 - (6). Sweep time = auto couple.
 - (7). Trace mode = max hold.
 - (8). Allow trace to fully stabilize.
 - (9). Use the peak marker function to determine the maximum amplitude level.
 - (10). If measured value exceeds limit, reduce RBW (no less than 3 kHz) and repeat.

9.3 Test Result

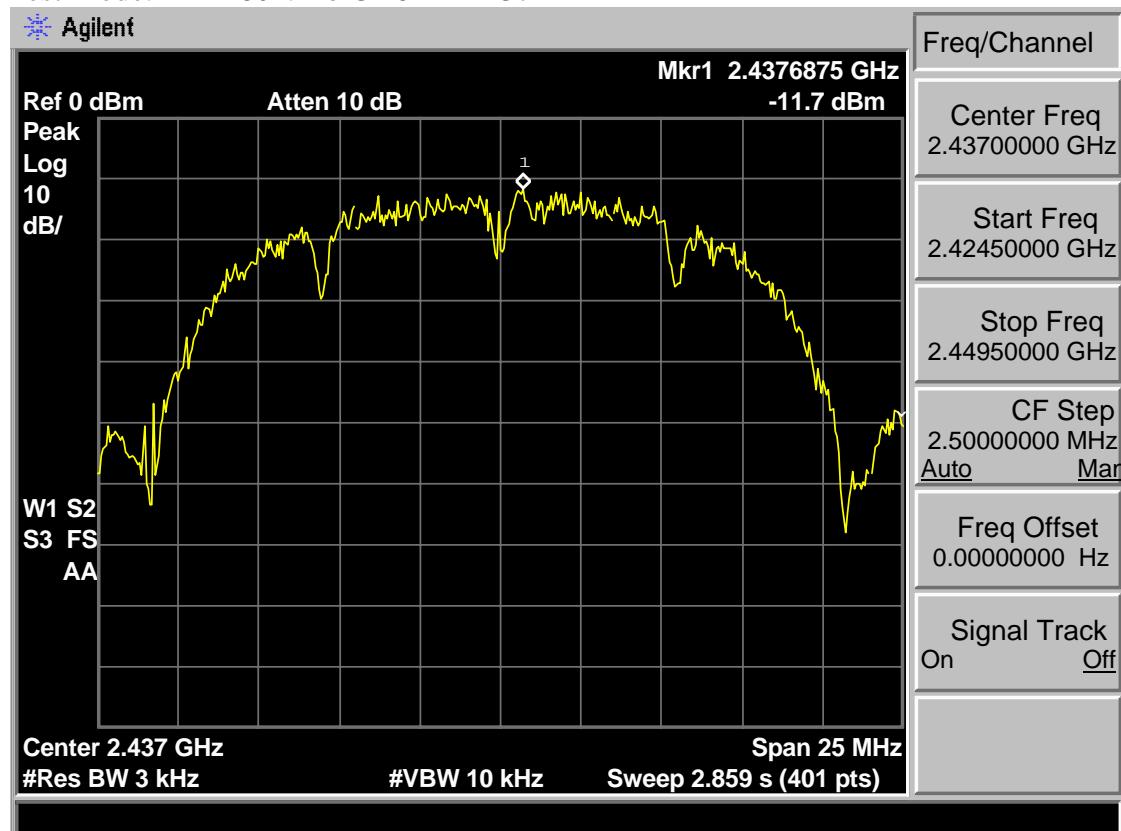
EUT: Air washer			
M/N: Robert			
Test date: April 18, 2014	Test site: 3m Chamber		Tested by: Tony Tang
Pass			
Test Mode	CH	Power density (dBm/3kHz)	Limit (dBm/3kHz)
IEEE 802.11b	CH1	-10.17	8
	CH6	-11.70	8
	CH11	-10.55	8
IEEE 802.11g	CH1	-13.42	8
	CH6	-12.62	8
	CH11	-13.21	8
Conclusion : PASS			

9.4 Test Data

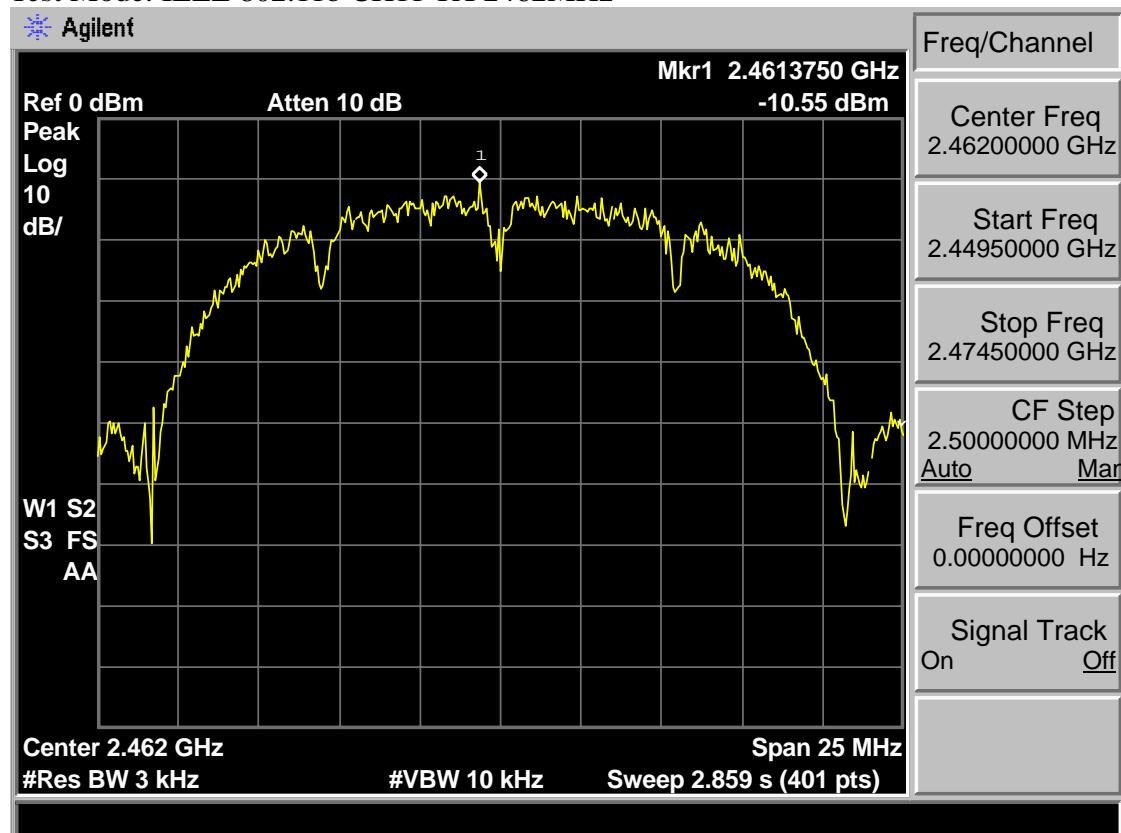
Test Mode: IEEE 802.11b CH1 TX 2412MHz



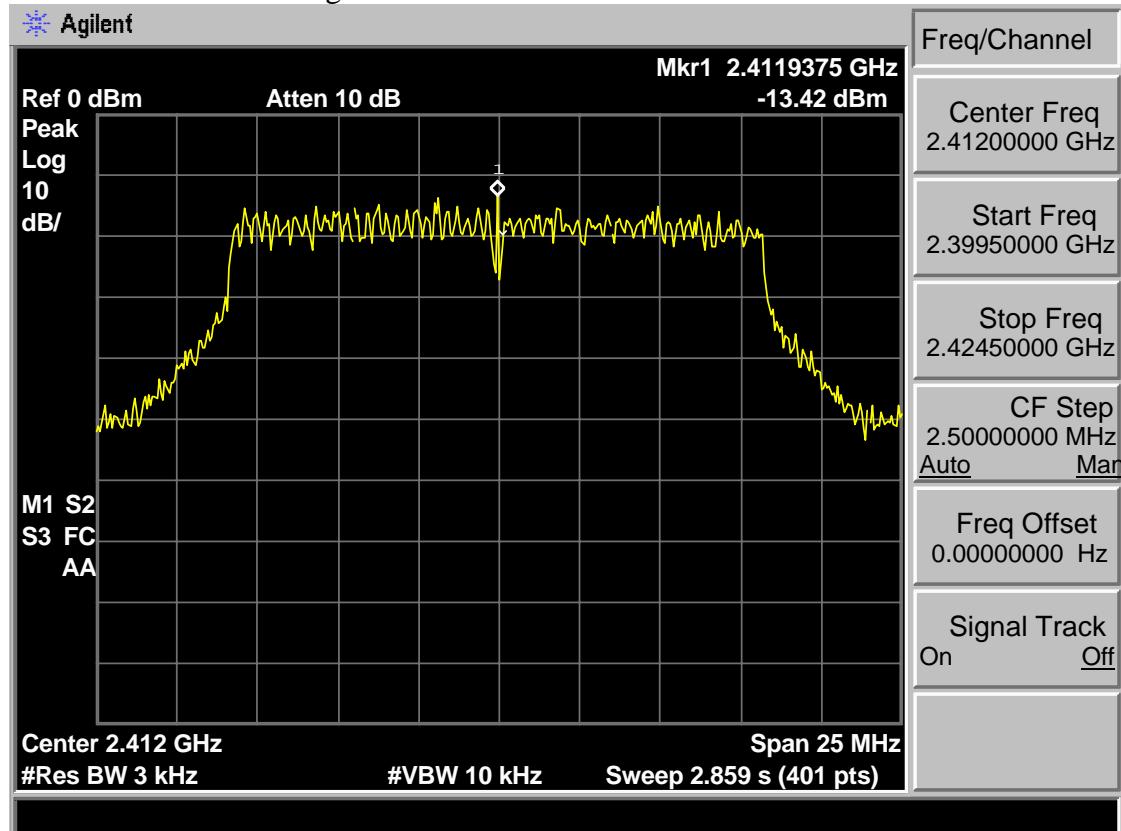
Test Mode: IEEE 802.11b CH6 TX 2437MHz



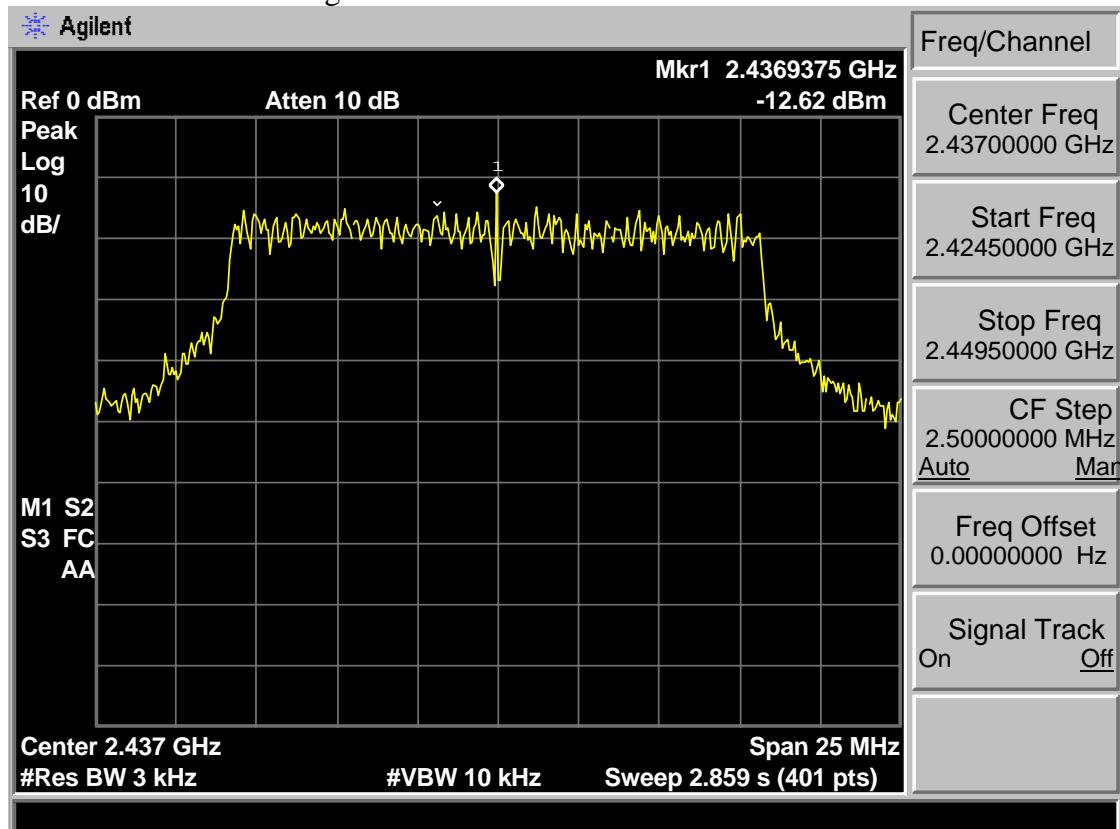
Test Mode: IEEE 802.11b CH11 TX 2462MHz



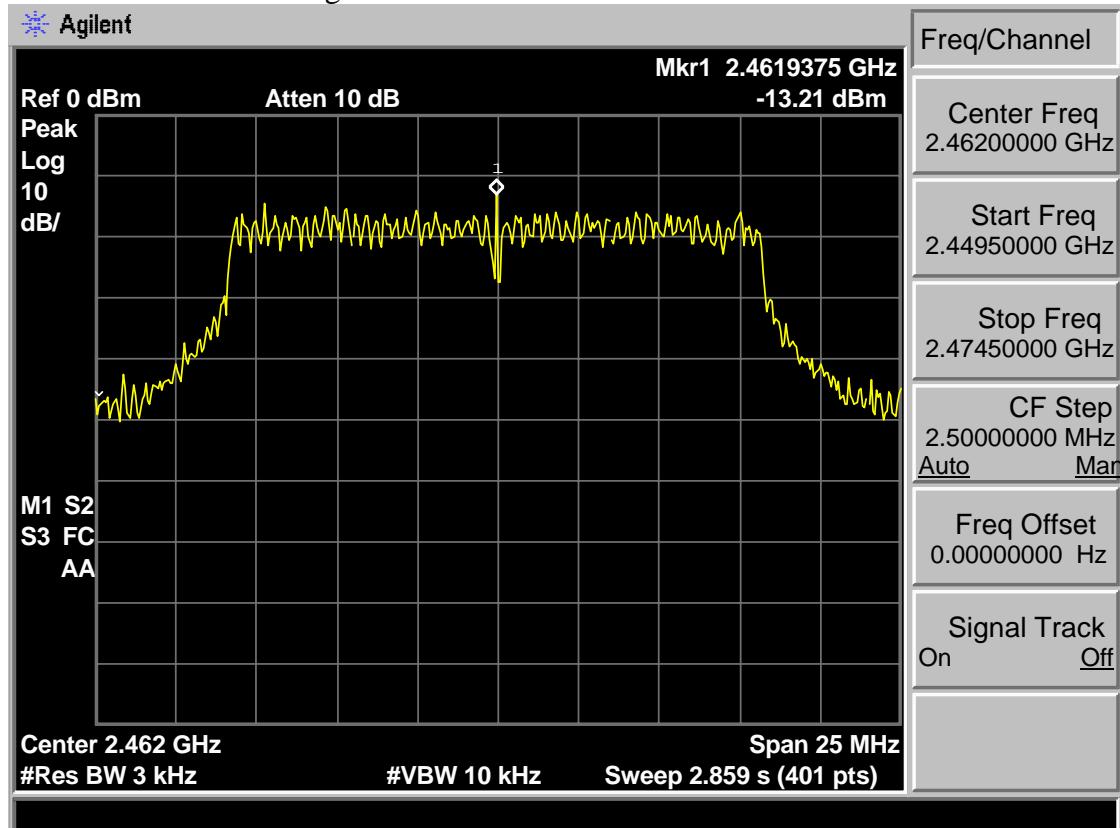
Test Mode: IEEE 802.11g CH1 TX 2412MHz



Test Mode: IEEE 802.11g CH6 TX 2437MHz



Test Mode: IEEE 802.11g CH11 TX 2462MHz



10 ANTENNA REQUIREMENTS

10.1 Limit

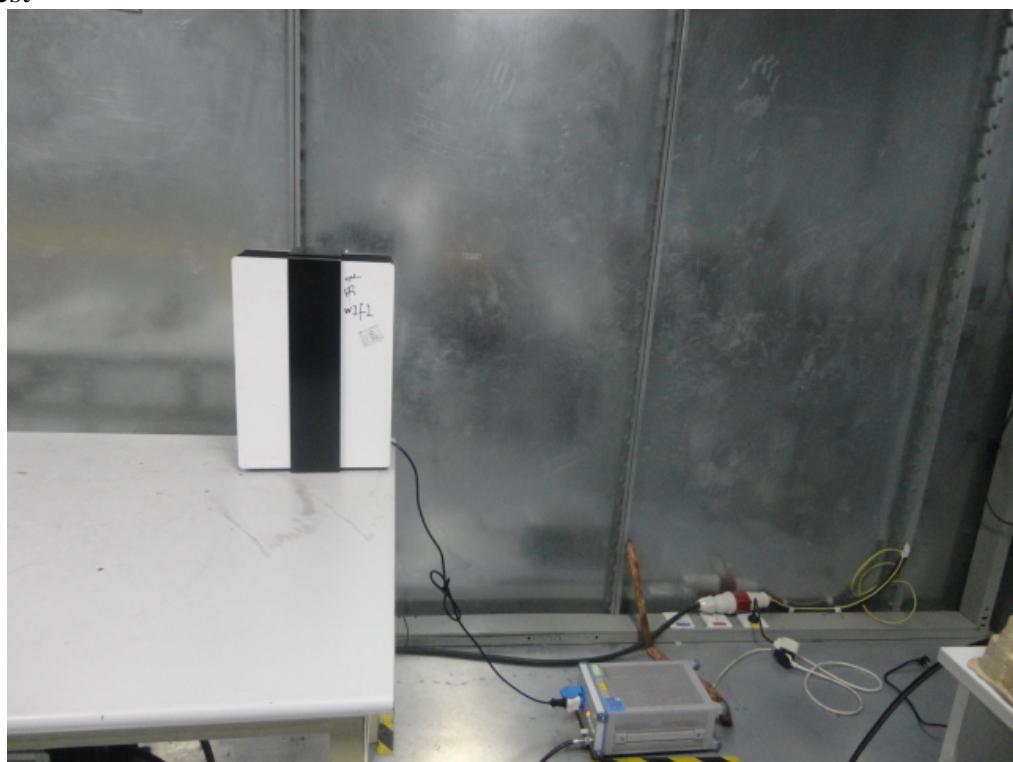
For intentional device, according to FCC 47 CFR Section 15.203, an intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device. And according to FCC 47 CFR Section 15.247 (b), if transmitting antennas of directional gain greater than 6dBi are used, the power shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6dBi.

10.2 Result

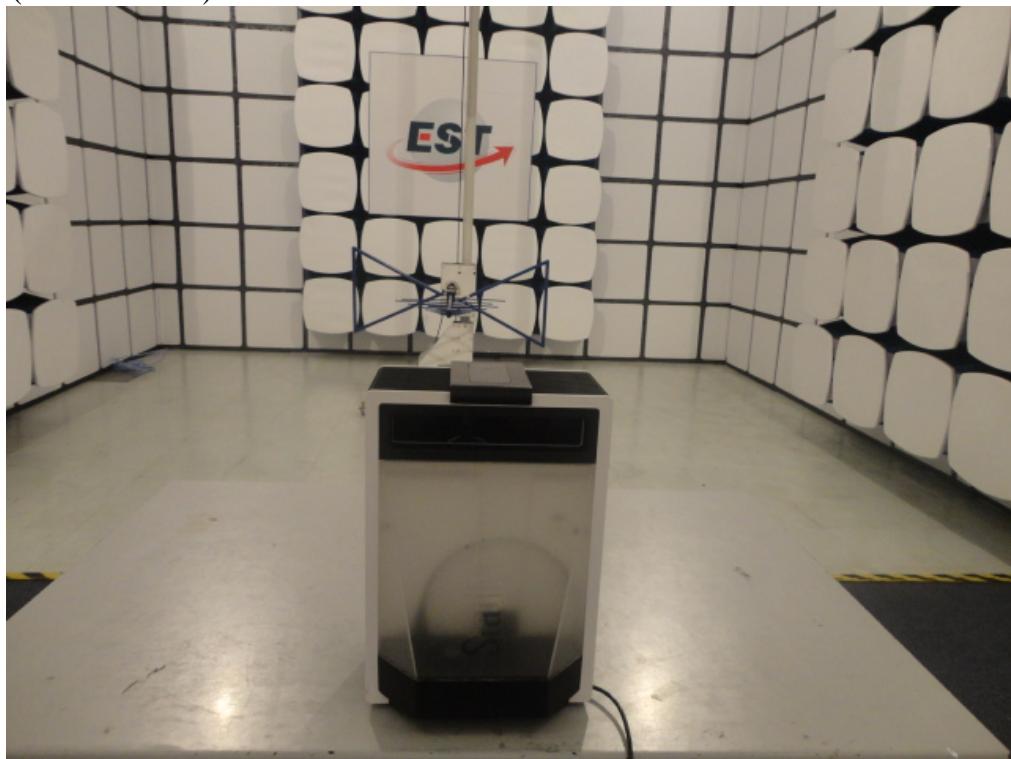
The antennas used for this product are integral Patch Antenna and that no antenna other than that furnished by the responsible party shall be used with the device, the maximum peak gain of the transmit antenna is only 2 dBi.

11 TEST SETUP PHOTO

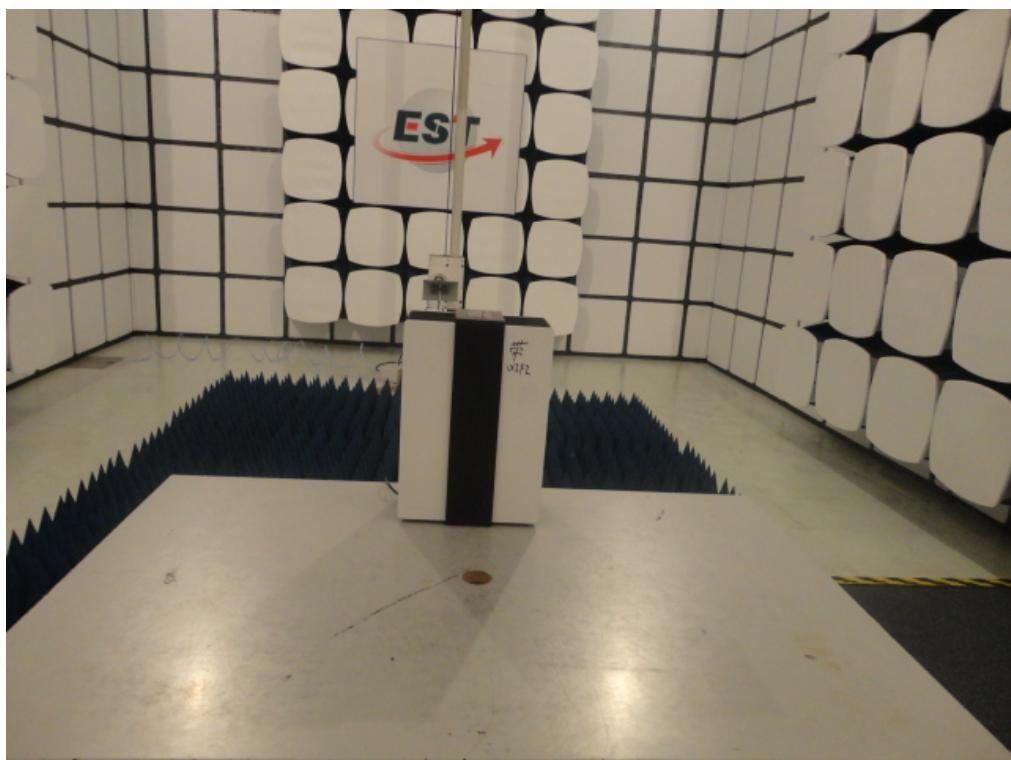
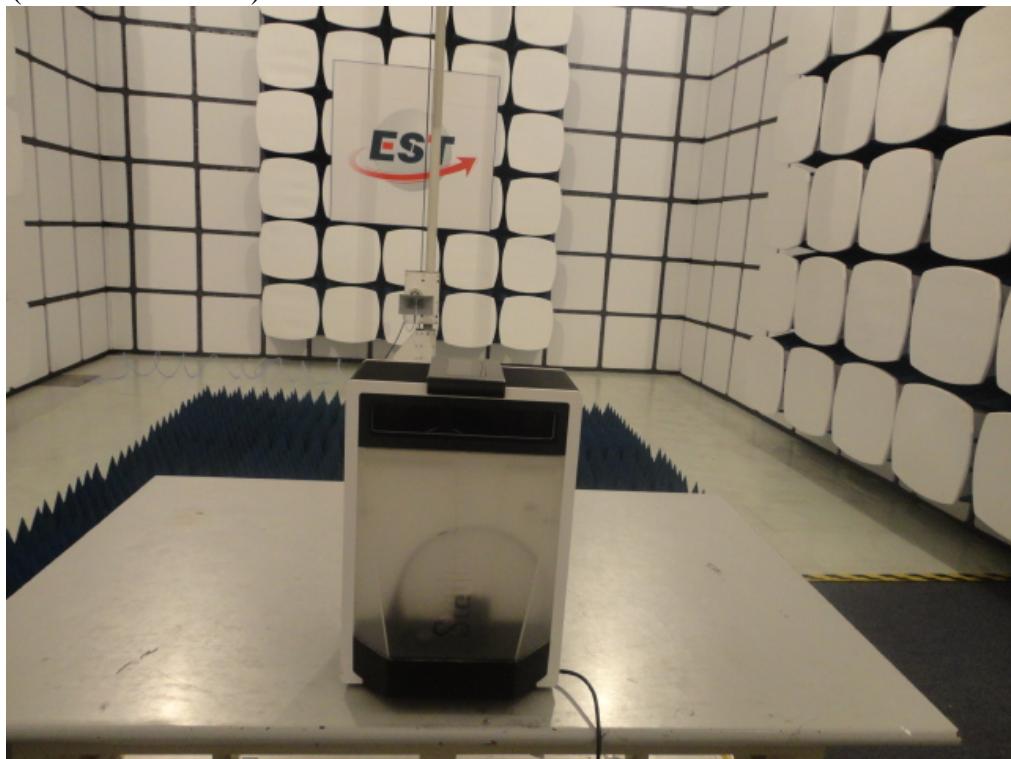
Conducted Test



Radiated Test (30-1000 MHz)



Radiated Test (1000-25000 MHz)



12 PHOTOS OF EUT

External Photos

M/N: Robert

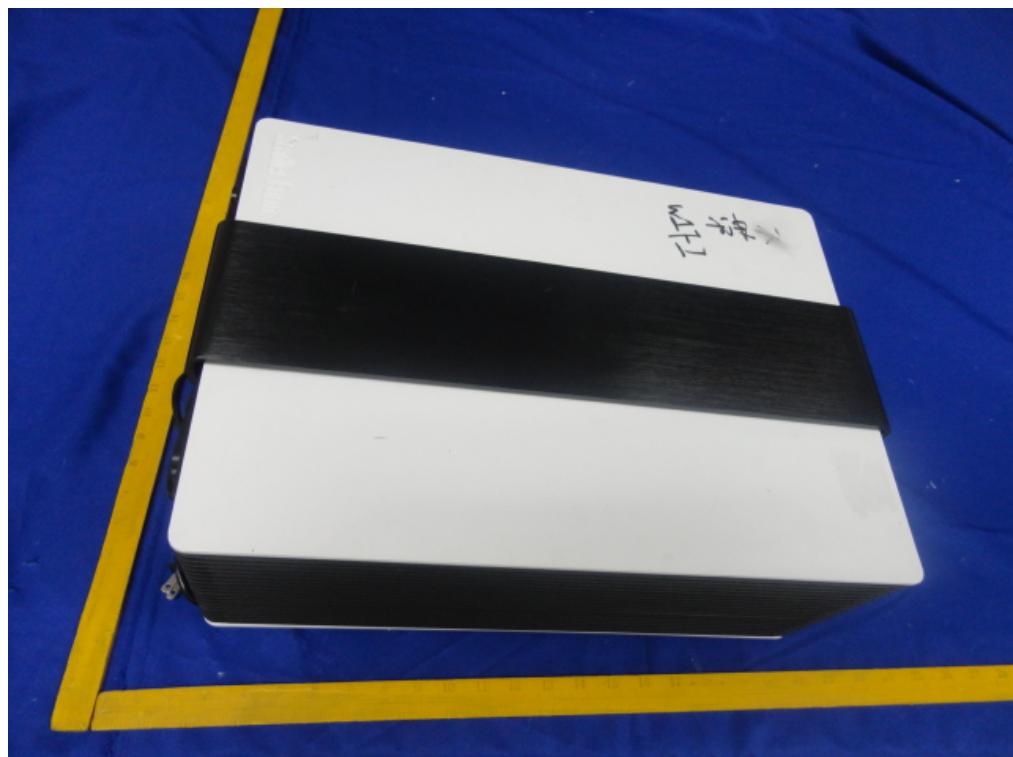
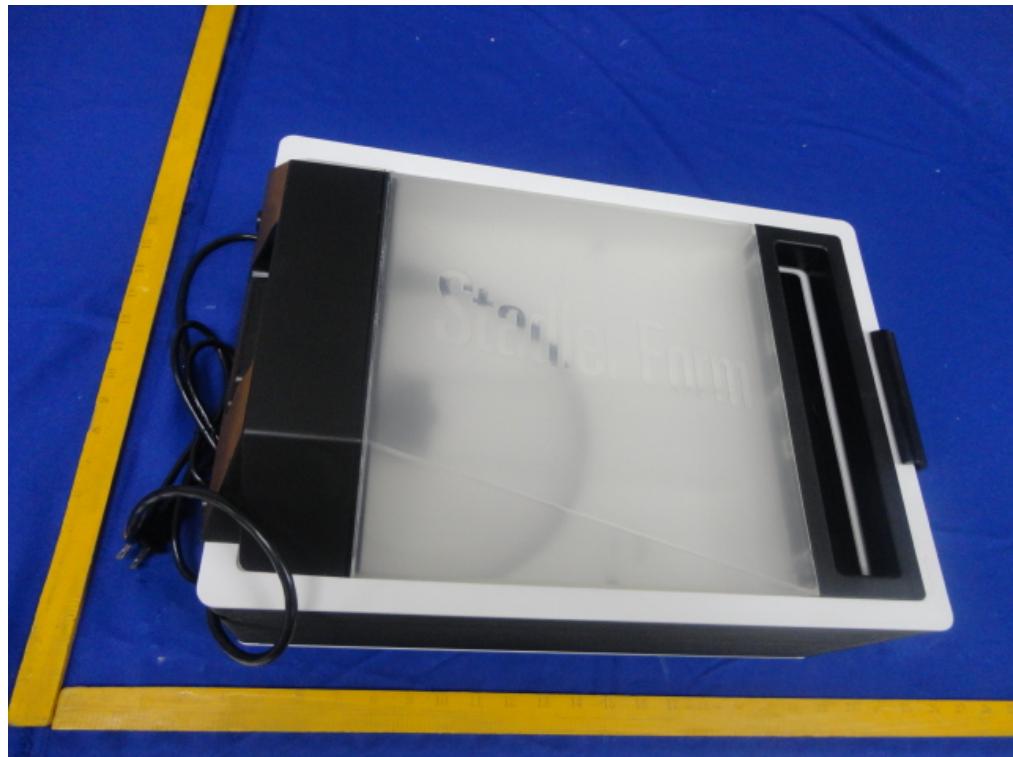


External Photos

M/N: Robert

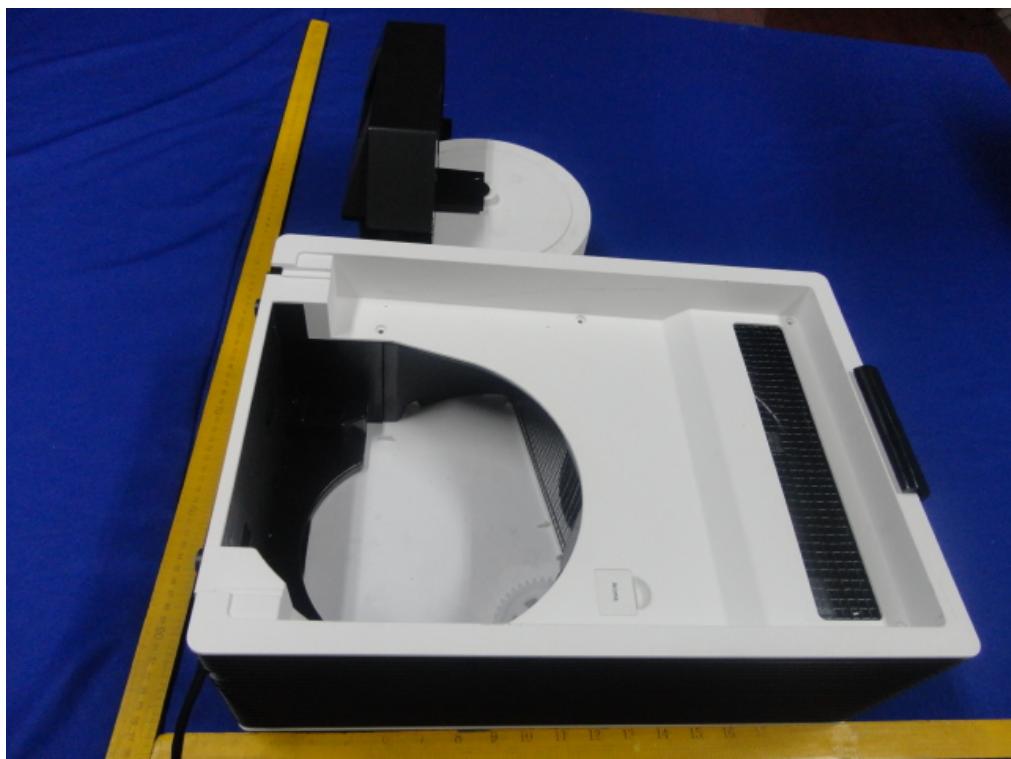
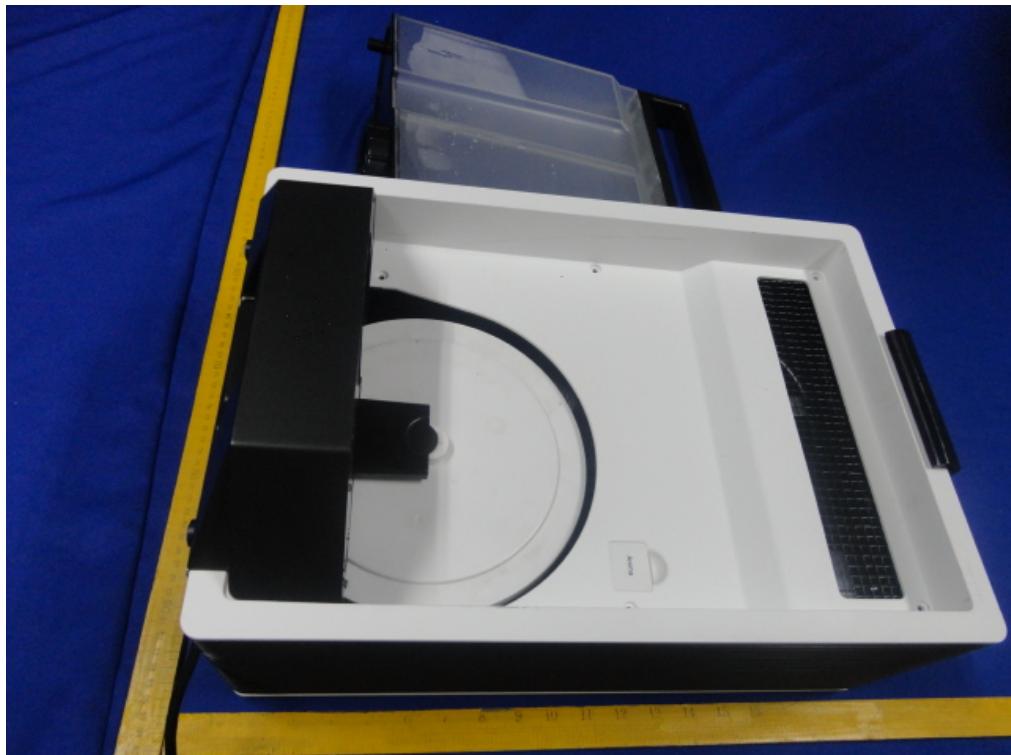


External Photos
M/N: Robert

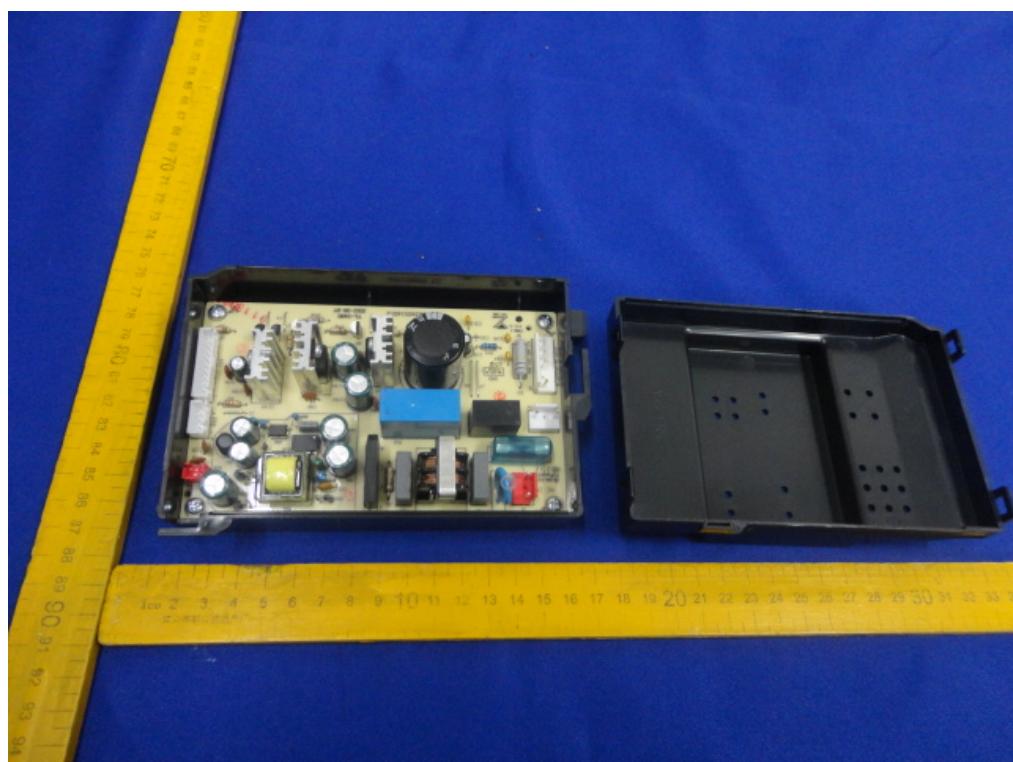
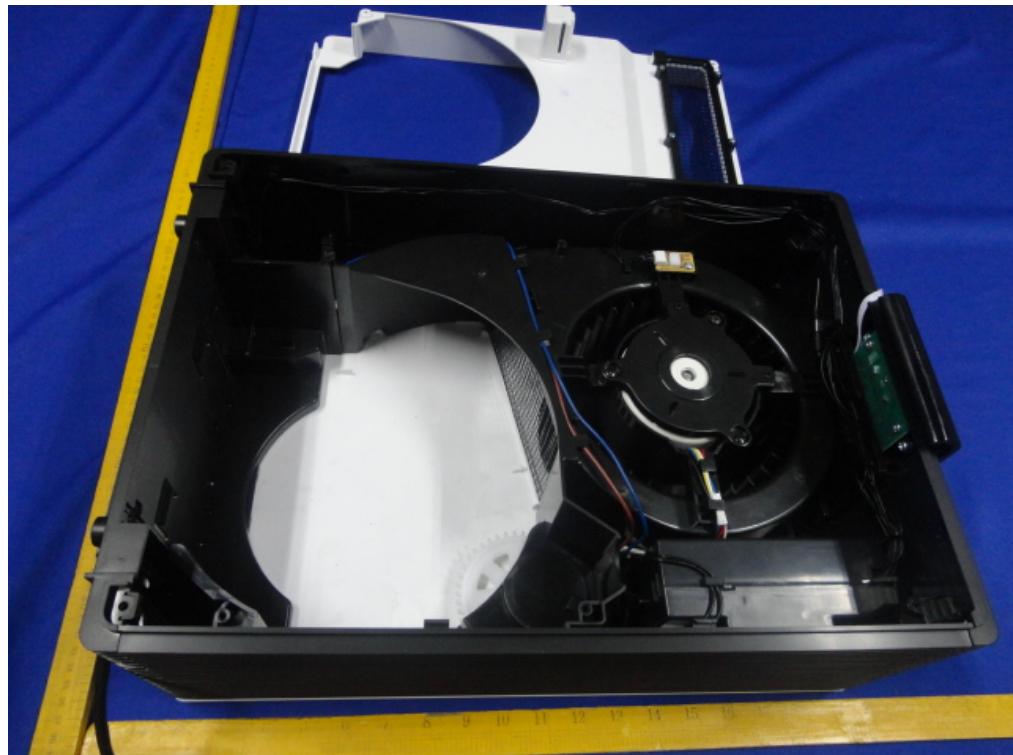


Internal Photos

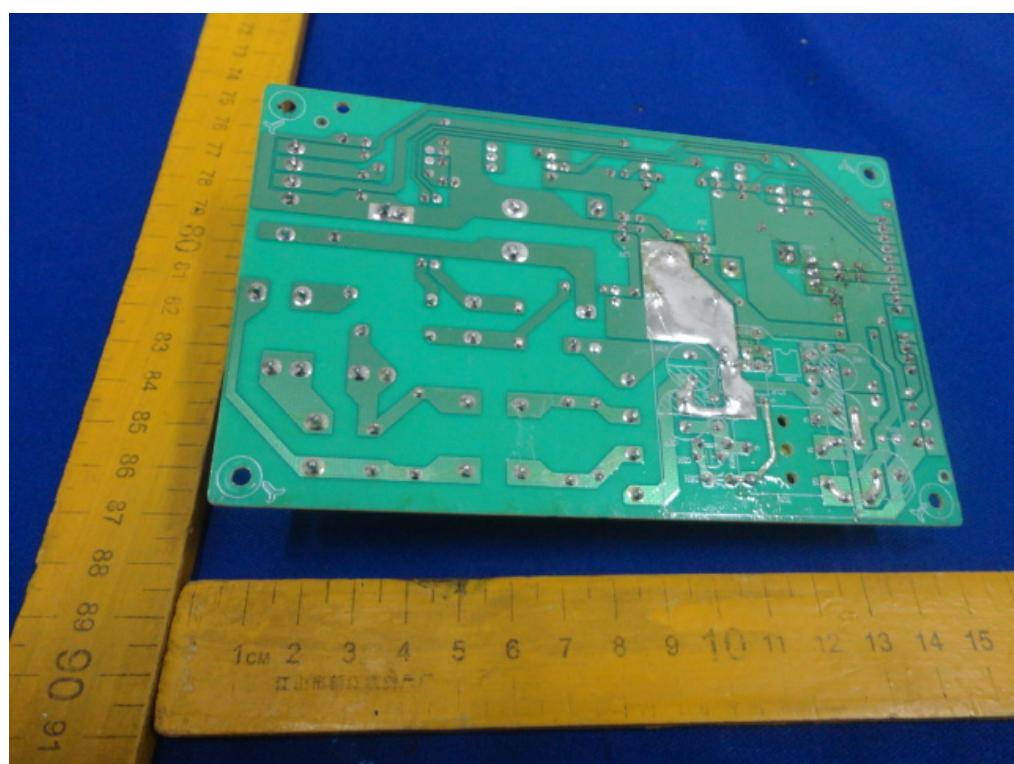
M/N: Robert



Internal Photos
M/N: Robert

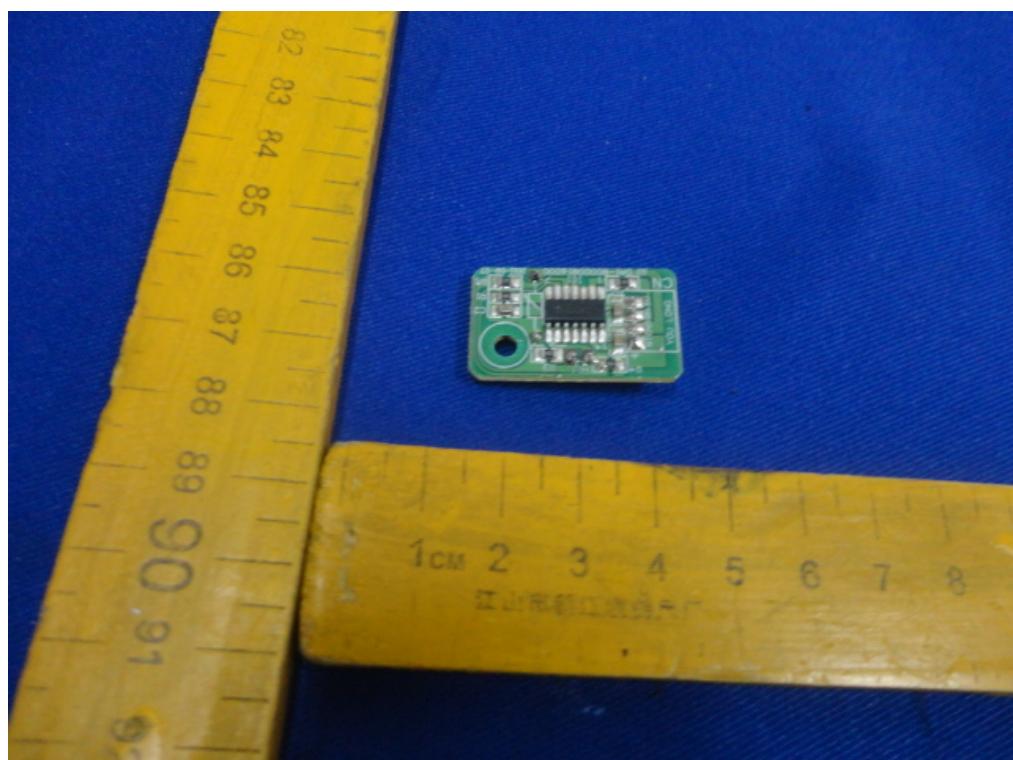


Internal Photos
M/N: Robert



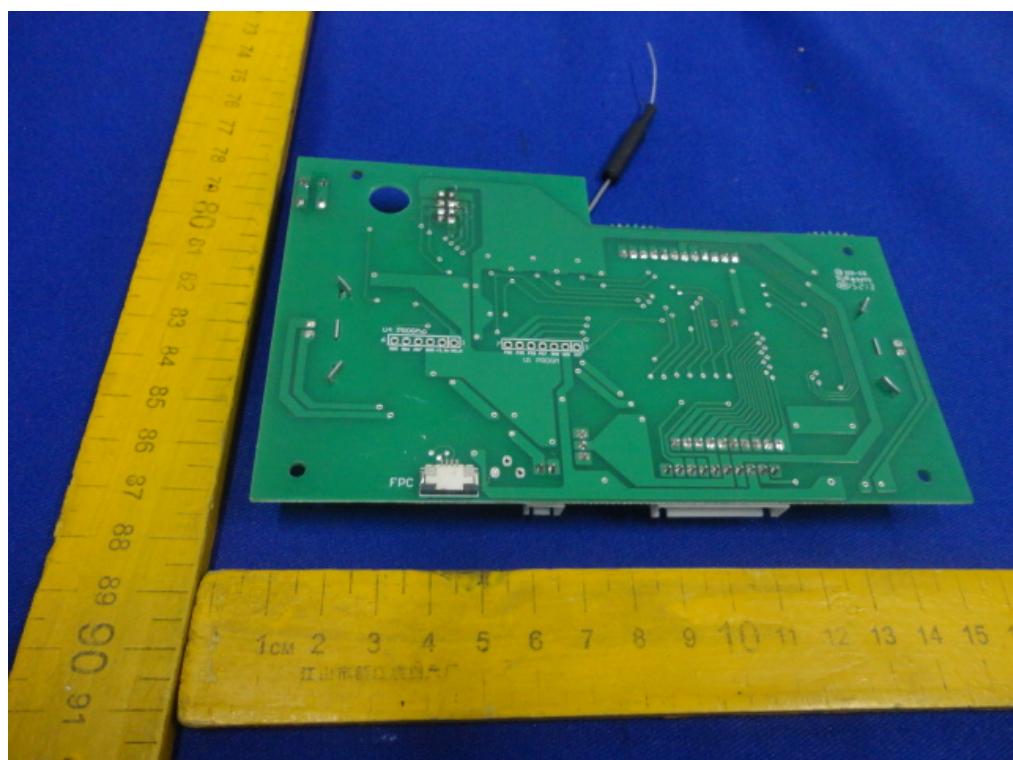
Internal Photos

M/N: Robert



Internal Photos

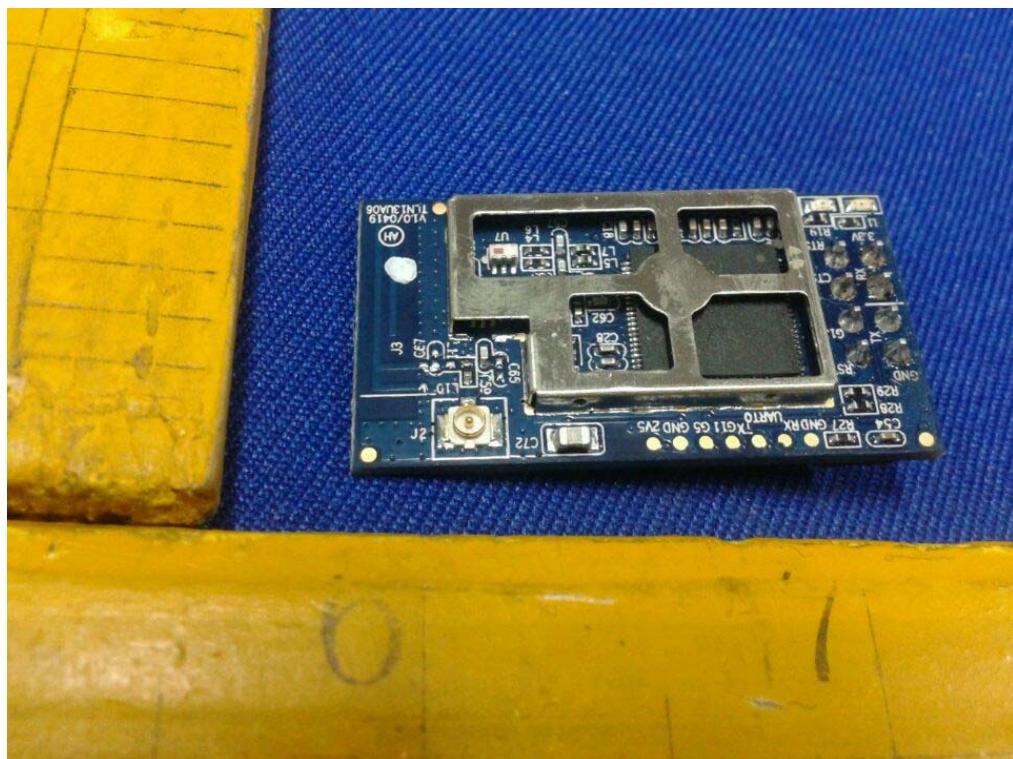
M/N: Robert



Internal Photos
M/N: Robert



Antenna



Internal Photos
M/N: Robert

