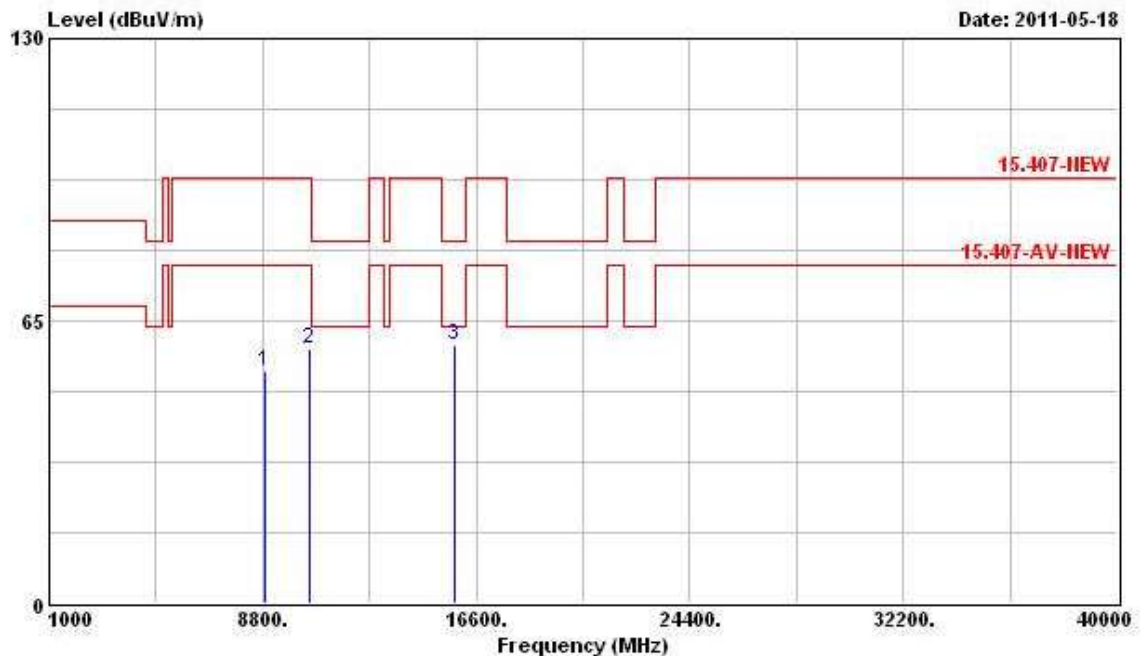
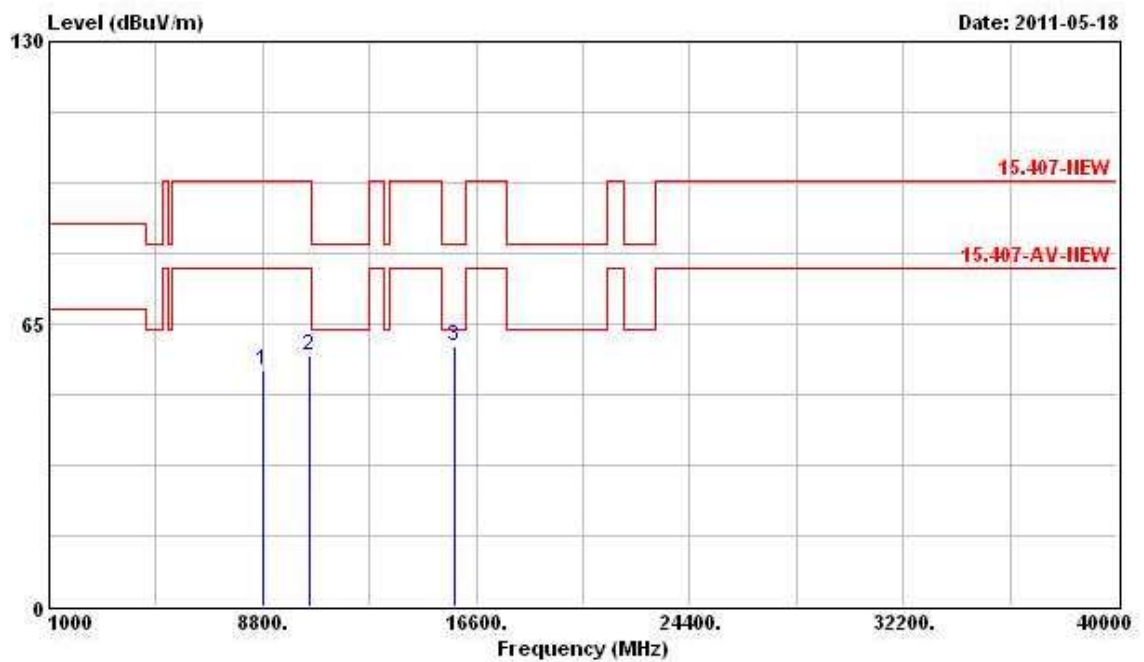


Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 52 (20MHz) MCS8 (Ant. A + Ant. B)

Horizontal

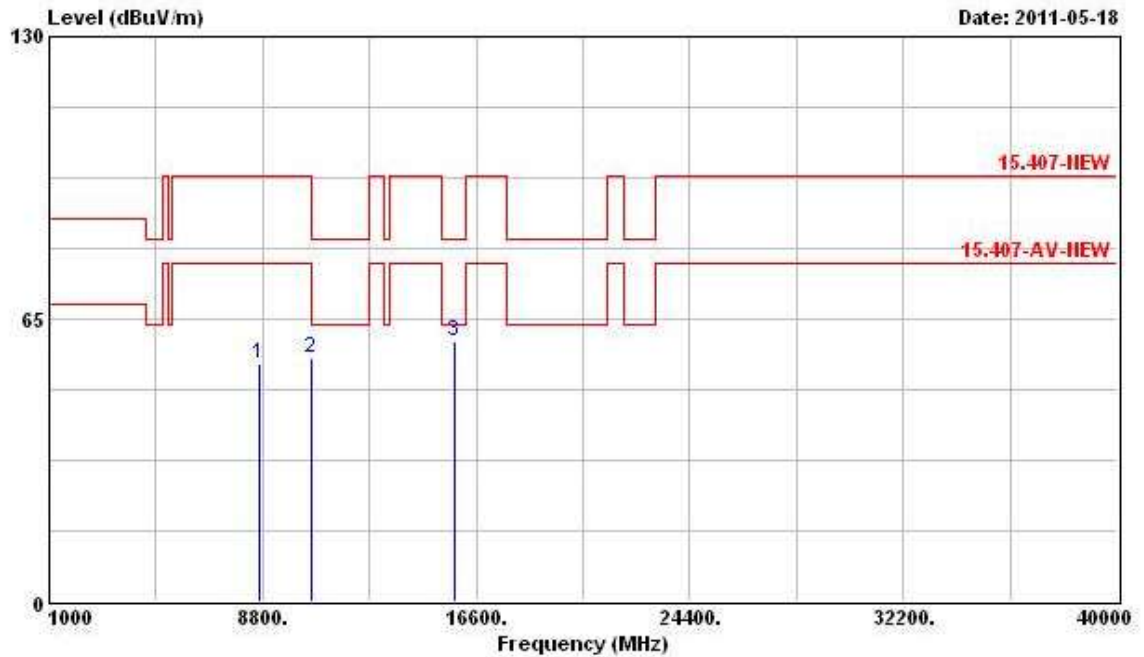
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8881.000	53.55	-44.29	97.84	41.81	38.51	6.41	33.18	Peak
2	10520.000	58.76	-39.08	97.84	45.21	39.49	6.95	32.89	Peak
3	15780.000	59.48	-4.06	63.54	46.08	38.06	7.92	32.57	PK

Vertical



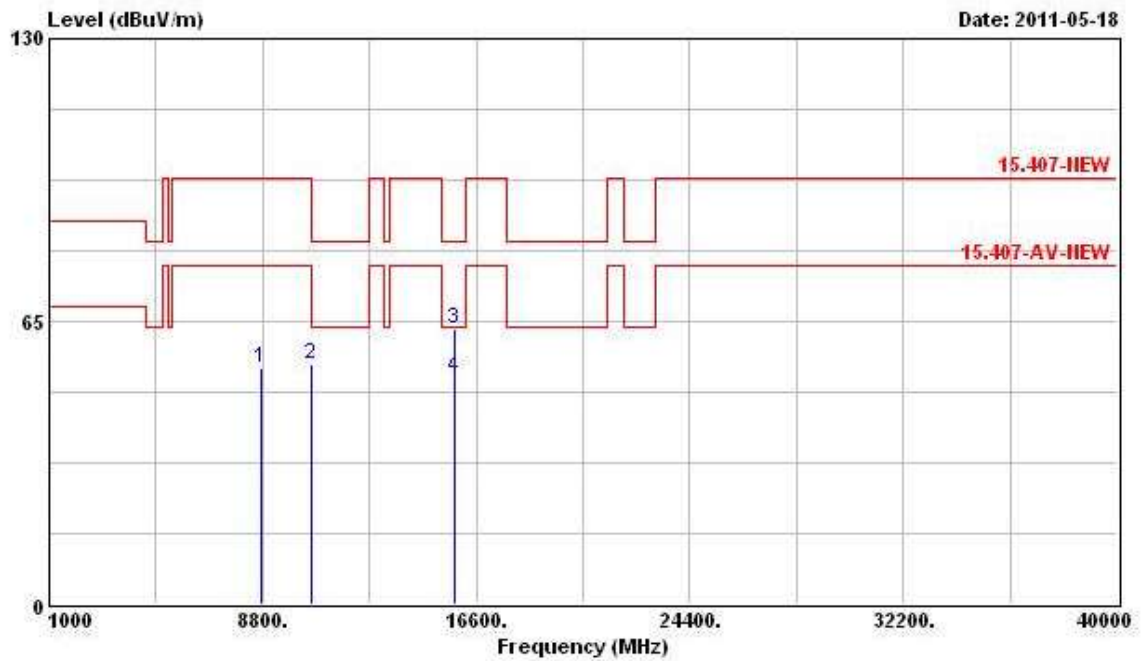
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8782.000	54.33	-43.51	97.84	42.64	38.43	6.41	33.14	Peak
2	10520.000	57.65	-40.19	97.84	44.10	39.49	6.95	32.89	Peak
3	15780.000	60.03	-3.51	63.54	46.63	38.06	7.92	32.57	PK

Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 56 (20MHz) MCS8 (Ant. A + Ant. B)

Horizontal

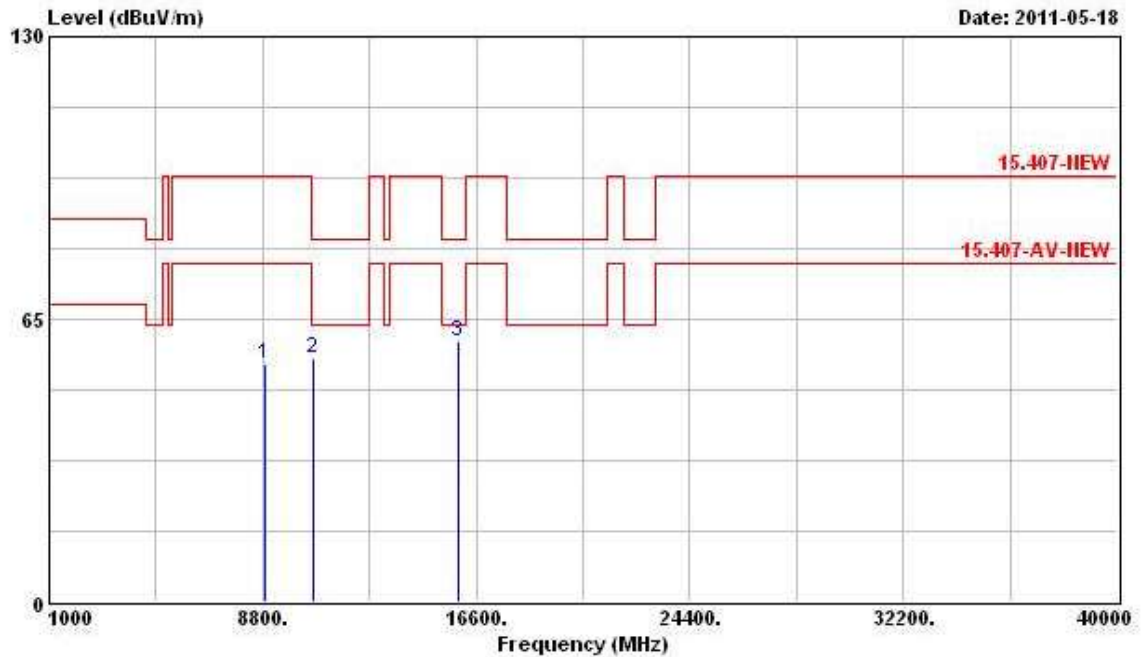
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1	8650.000	54.75	-43.09	97.84	43.11	38.32	6.42	33.10 Peak
2	10560.000	56.03	-41.81	97.84	42.45	39.47	6.97	32.86 Peak
3	15840.000	60.02	-3.52	63.54	46.75	37.95	7.91	32.59 PK

Vertical



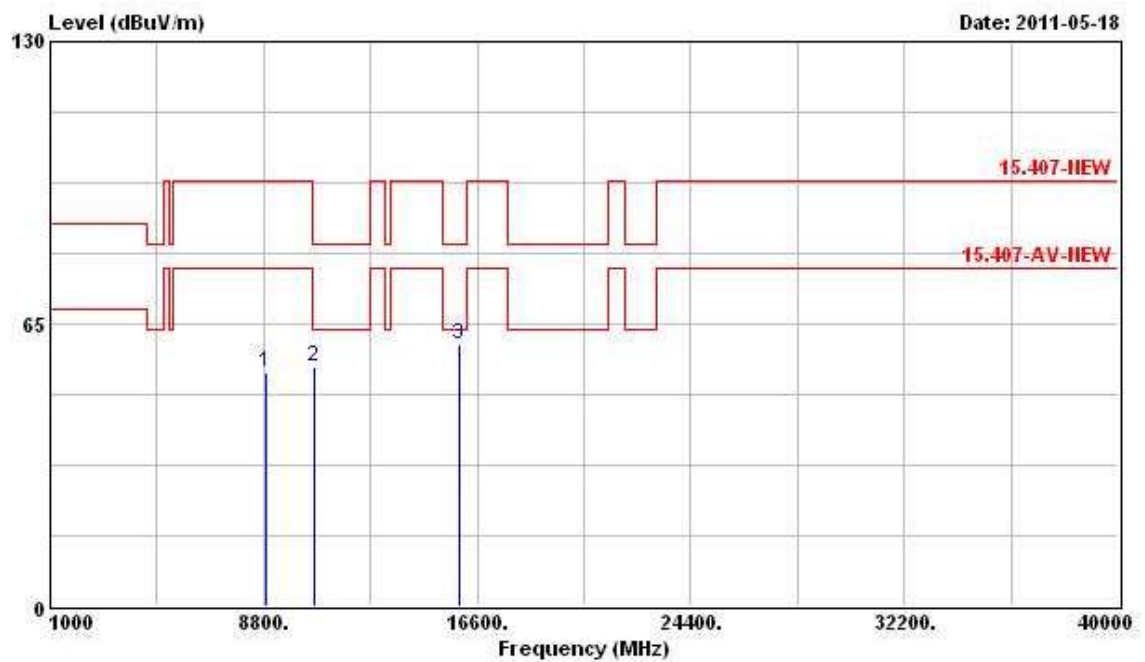
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8749.000	54.28	-43.56	97.84	42.60	38.40	6.41	33.14	Peak
2	10560.000	55.03	-42.81	97.84	41.45	39.47	6.97	32.86	Peak
3	15840.000	63.36	-20.18	83.54	50.09	37.95	7.91	32.59	Peak
4	15840.000	52.33	-11.21	63.54	39.06	37.95	7.91	32.59	Average

Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 64 (20MHz) MCS8 (Ant. A + Ant. B)

Horizontal

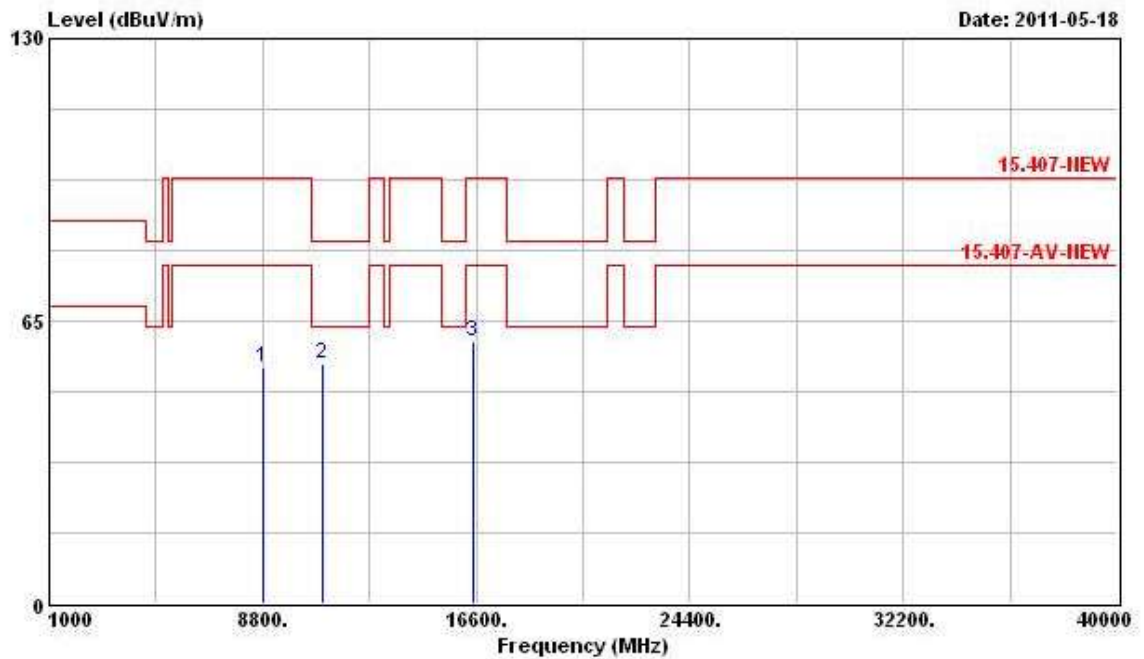
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8914.000	54.61	-43.23	97.84	42.86	38.53	6.41	33.19	Peak
2	10640.000	55.94	-7.60	63.54	42.33	39.42	7.01	32.82	PK
3	15960.000	59.93	-3.61	63.54	46.90	37.76	7.91	32.64	PK

Vertical



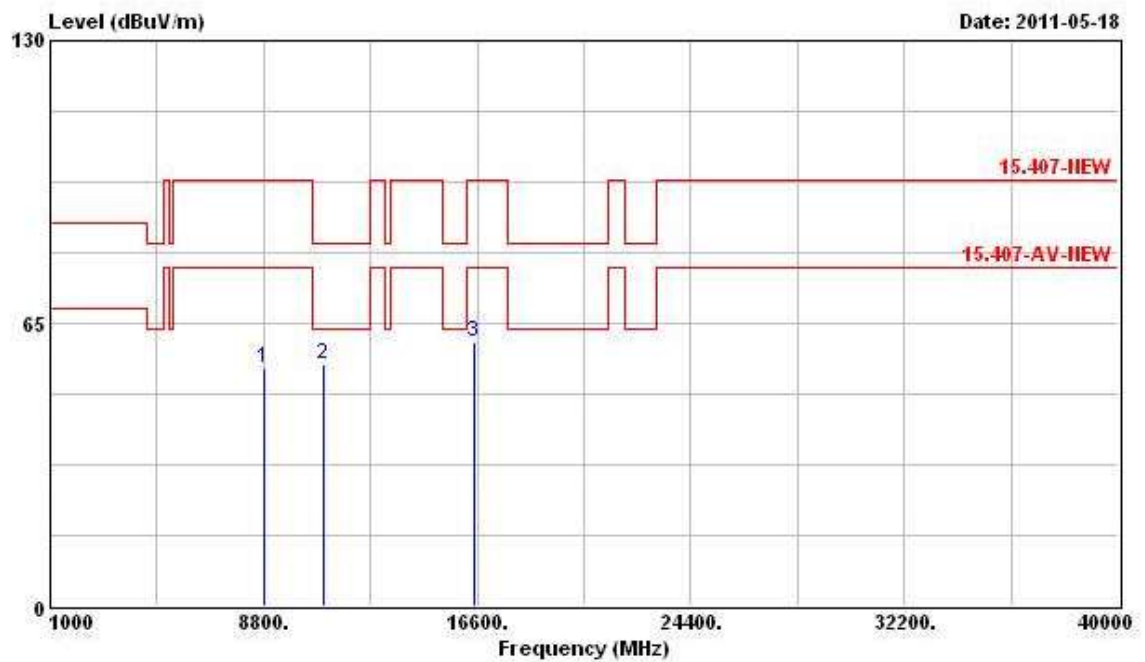
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8881.000	54.05	-43.79	97.84	42.31	38.51	6.41	33.18	Peak
2	10640.000	55.18	-8.36	63.54	41.57	39.42	7.01	32.82	PK
3	15960.000	60.24	-3.30	63.54	47.21	37.76	7.91	32.64	PK

Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 100 (20MHz) MCS8 (Ant. A + Ant. B)

Horizontal

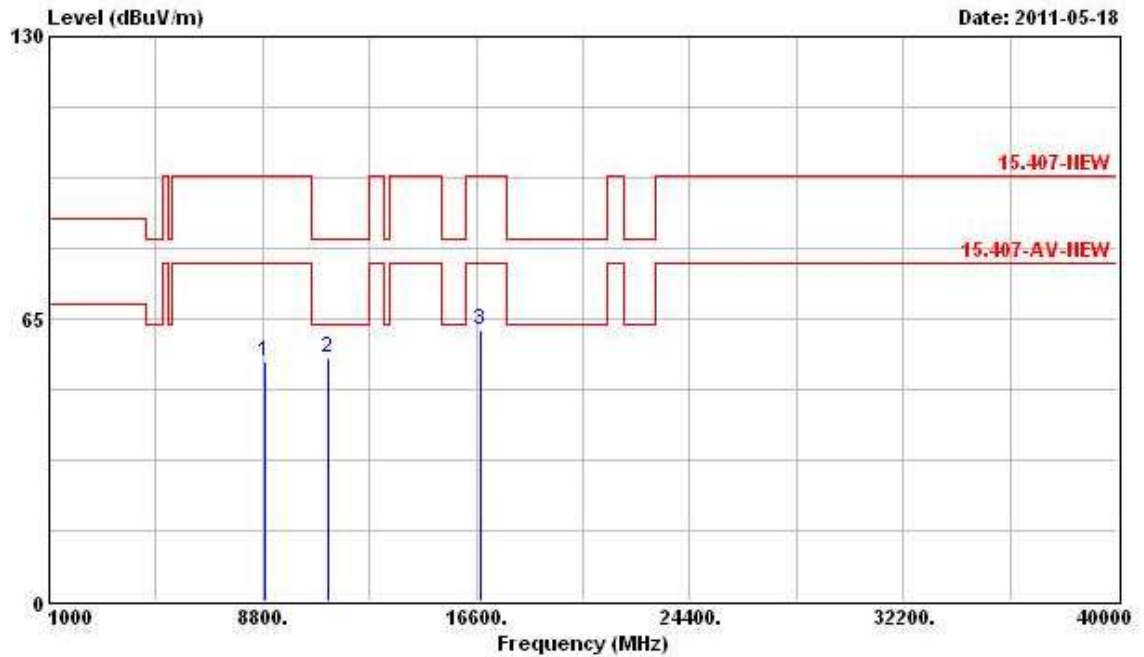
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8793.000	54.33	-43.51	97.84	42.65	38.43	6.41	33.15	Peak
2	11000.000	55.34	-8.20	63.54	41.55	39.20	7.21	32.62	PK
3	16500.000	60.45	-37.39	97.84	46.35	38.50	7.86	32.26	Peak

Vertical



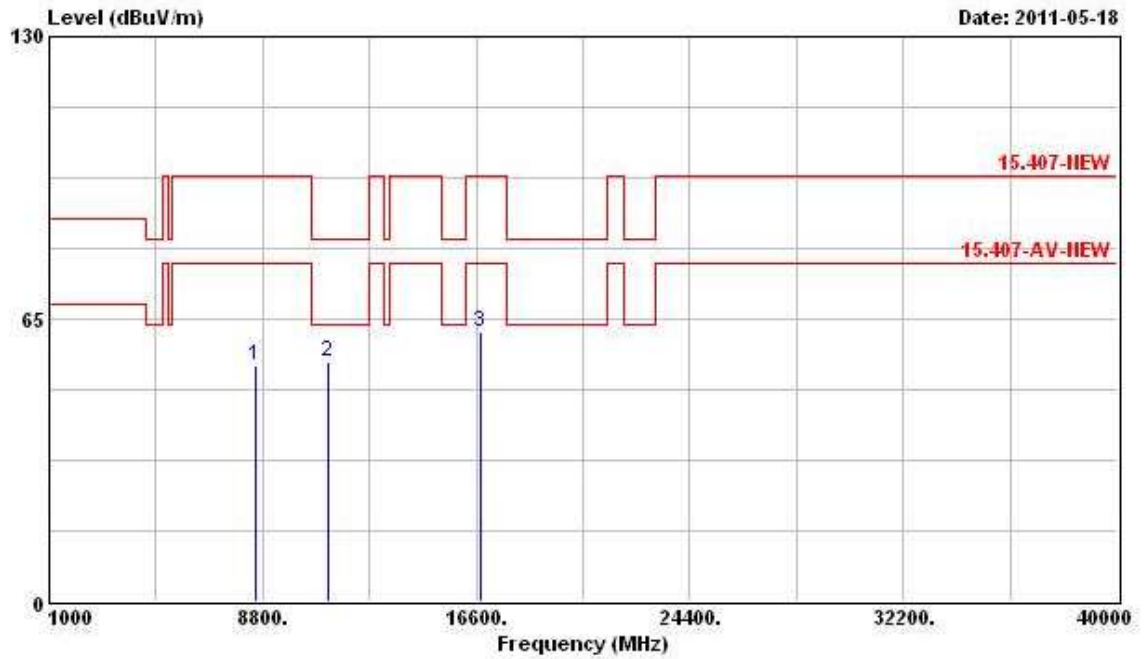
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8782.000	54.60	-43.24	97.84	42.91	38.43	6.41	33.14	Peak
2	11000.000	55.55	-7.99	63.54	41.76	39.20	7.21	32.62	PK
3	16500.000	60.89	-36.95	97.84	46.79	38.50	7.86	32.26	Peak

Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 116 (20MHz) MCS8 (Ant. A + Ant. B)

Horizontal

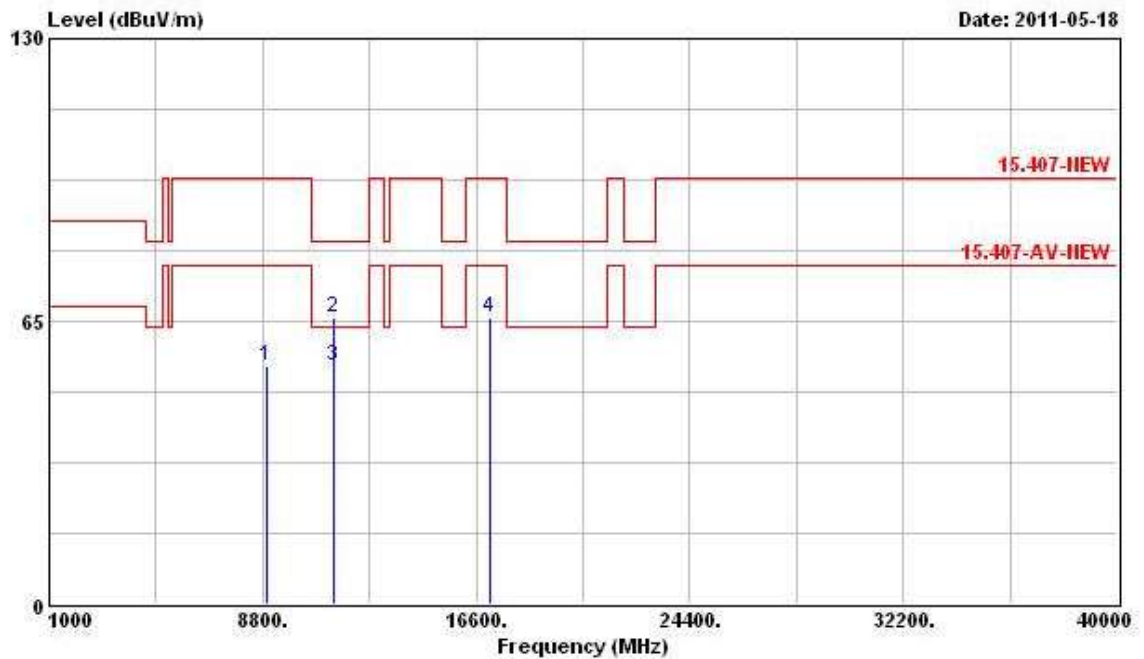
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8870.000	55.25	-42.59	97.84	43.53	38.49	6.41	33.18	Peak
2	11160.000	55.87	-7.67	63.54	41.79	39.43	7.26	32.61	PK
3	16740.000	62.25	-35.59	97.84	46.20	39.85	8.16	31.96	Peak

Vertical



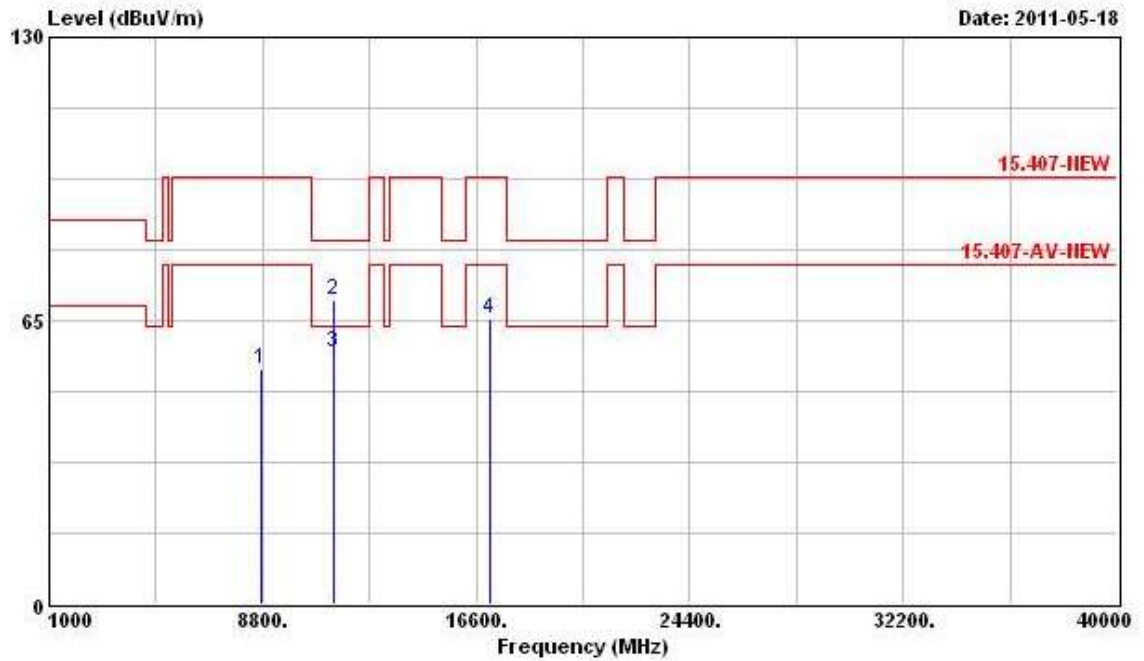
	Freq	Level	Over	Limit	ReadAntenna	Cable	Preamp	
	MHz	dBuV/m	Limit	Line	Level	Loss	Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1	8573.000	54.12	-43.72	97.84	42.52	38.25	6.42	33.08 Peak
2	11160.000	55.08	-8.46	63.54	41.00	39.43	7.26	32.61 PK
3	16740.000	61.89	-35.95	97.84	45.84	39.85	8.16	31.96 Peak

Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 140 (20MHz) MCS8 (Ant. A + Ant. B)

Horizontal

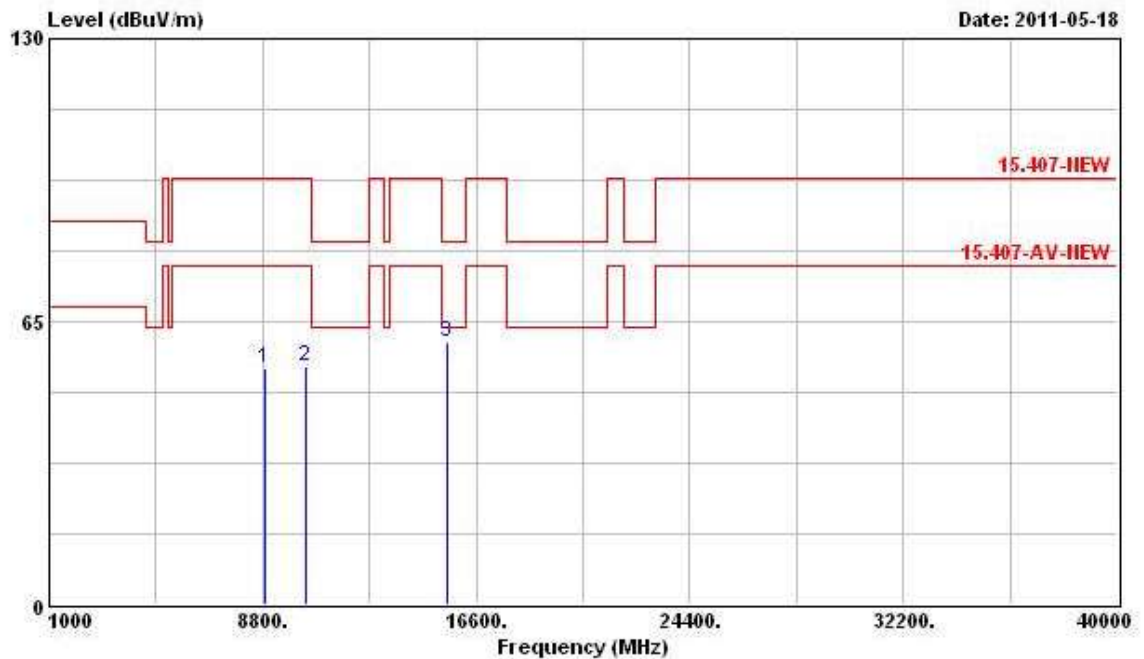
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8940.000	54.82	-43.02	97.84	43.06	38.55	6.40	33.19	Peak
2	11400.000	65.80	-17.74	83.54	51.32	39.76	7.31	32.59	Peak
3	11400.000	54.76	-8.78	63.54	40.28	39.76	7.31	32.59	Average
4	17100.000	65.98	-31.86	97.84	46.95	42.24	8.44	31.66	Peak

Vertical



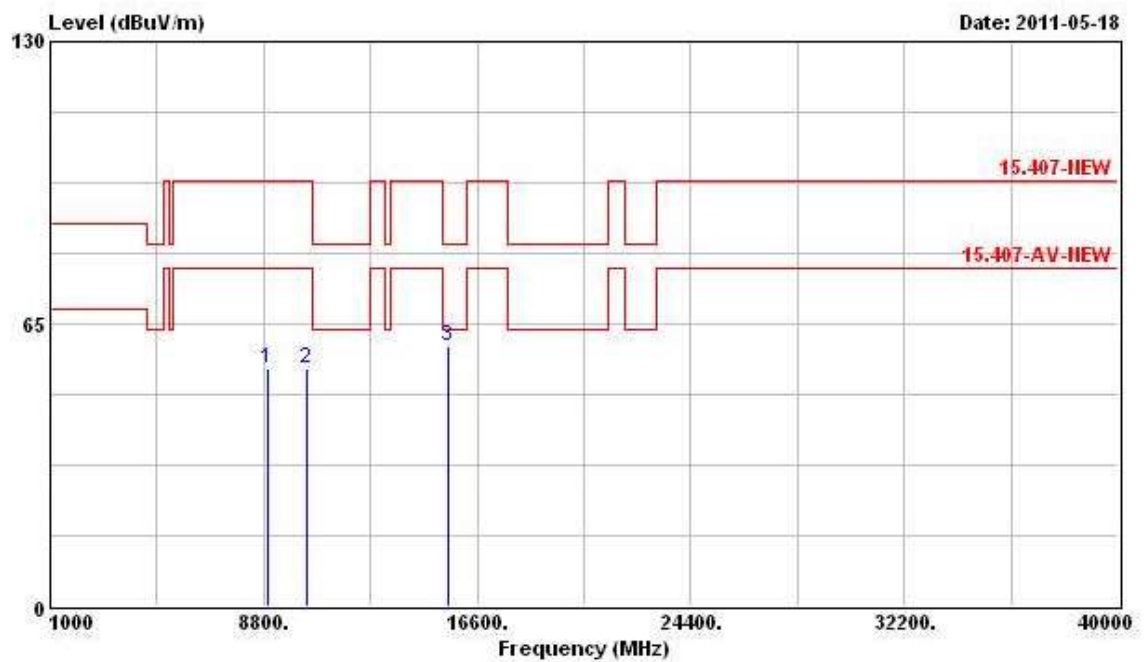
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8746.000	53.86	-43.98	97.84	42.18	38.40	6.41	33.14	Peak
2	11400.000	69.50	-14.04	83.54	55.02	39.76	7.31	32.59	Peak
3	11400.000	57.65	-5.89	63.54	43.17	39.76	7.31	32.59	Average
4	17100.000	65.46	-32.38	97.84	46.43	42.24	8.44	31.66	Peak

Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 38 (40MHz) MCS8 (Ant. A + Ant. B)

Horizontal

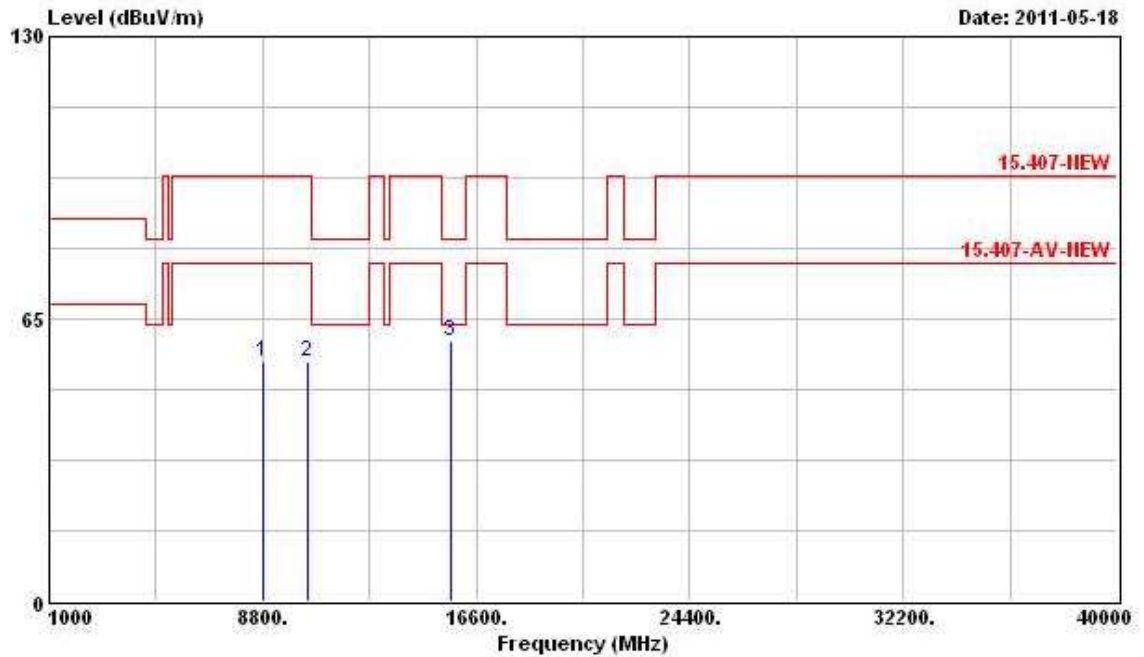
	Freq	Level	Over	Limit	ReadAntenna	Cable	Preamp	
	MHz	dBuV/m	Limit	Line	Level	Loss	Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1	8881.000	54.15	-43.69	97.84	42.41	38.51	6.41	33.18 Peak
2	10380.000	54.84	-43.00	97.84	41.36	39.55	6.93	33.00 Peak
3 @	15570.000	60.43	-3.11	63.54	46.60	38.39	7.92	32.48 PK

Vertical



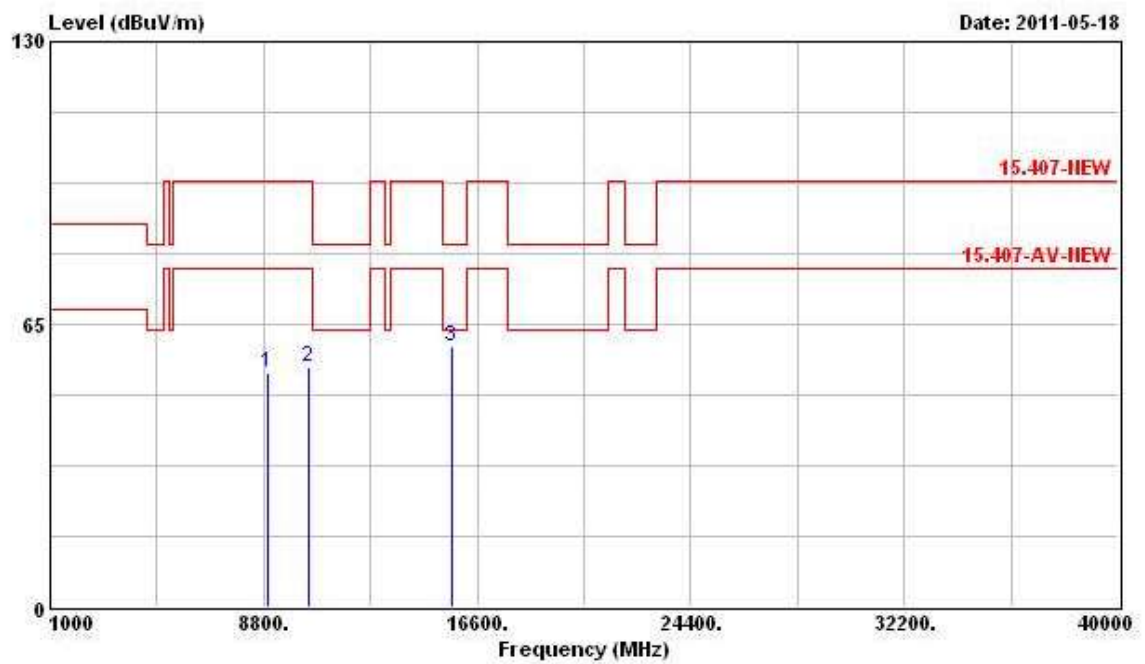
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8958.000	54.74	-43.10	97.84	42.98	38.56	6.40	33.20	Peak
2	10380.000	54.70	-43.14	97.84	41.22	39.55	6.93	33.00	Peak
3	15570.000	59.97	-3.57	63.54	46.14	38.39	7.92	32.48	PK

Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 46 (40MHz) MCS8 (Ant. A + Ant. B)

Horizontal

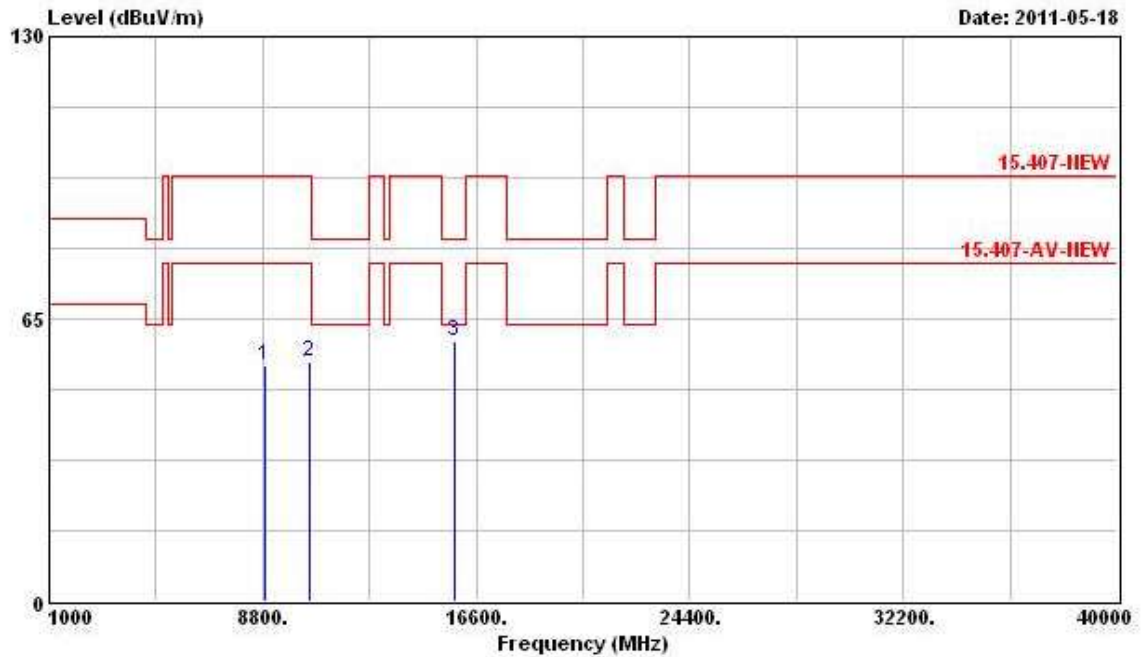
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8782.000	55.09	-42.75	97.84	43.40	38.43	6.41	33.14	Peak
2	10460.000	54.99	-42.85	97.84	41.46	39.52	6.94	32.93	Peak
3	15690.000	59.78	-3.76	63.54	46.20	38.20	7.92	32.53	PK

Vertical



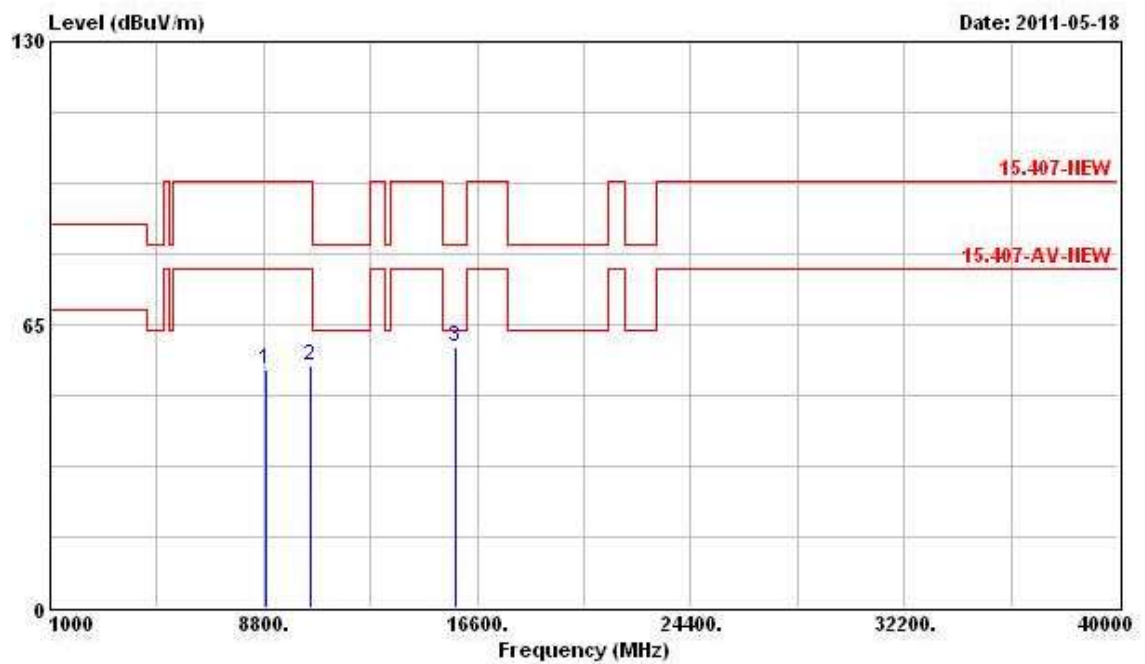
	Freq	Level	Over	Limit	ReadAntenna	Cable	Preamp	
	MHz	dBuV/m	Limit	Line	Level	Loss	Factor	Remark
			dB	dBuV/m	dBuV	dB	dB	
1	8947.000	54.03	-43.81	97.84	42.28	38.55	6.40	33.20 Peak
2	10460.000	55.37	-42.47	97.84	41.84	39.52	6.94	32.93 Peak
3	15690.000	59.75	-3.79	63.54	46.17	38.20	7.92	32.53 PK

Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 54 (40MHz) MCS8 (Ant. A + Ant. B)

Horizontal

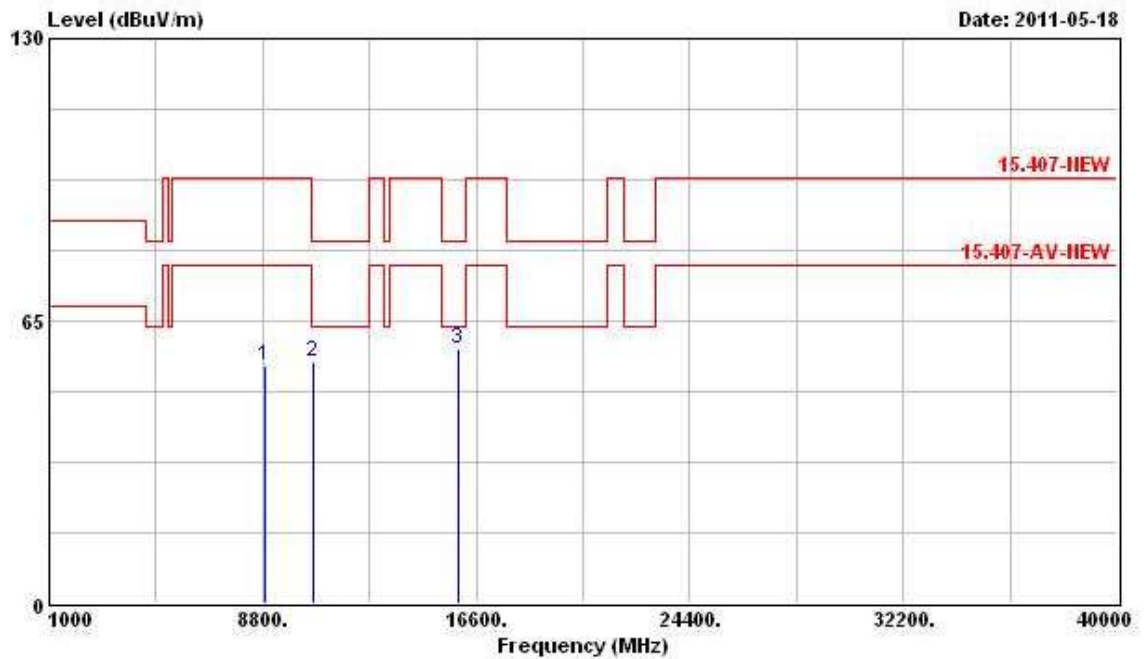
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8900.000	54.51	-43.33	97.84	42.77	38.52	6.41	33.19	Peak
2	10540.000	55.05	-42.79	97.84	41.48	39.48	6.97	32.88	Peak
3	15810.000	59.72	-3.82	63.54	46.38	38.00	7.92	32.58	PK

Vertical



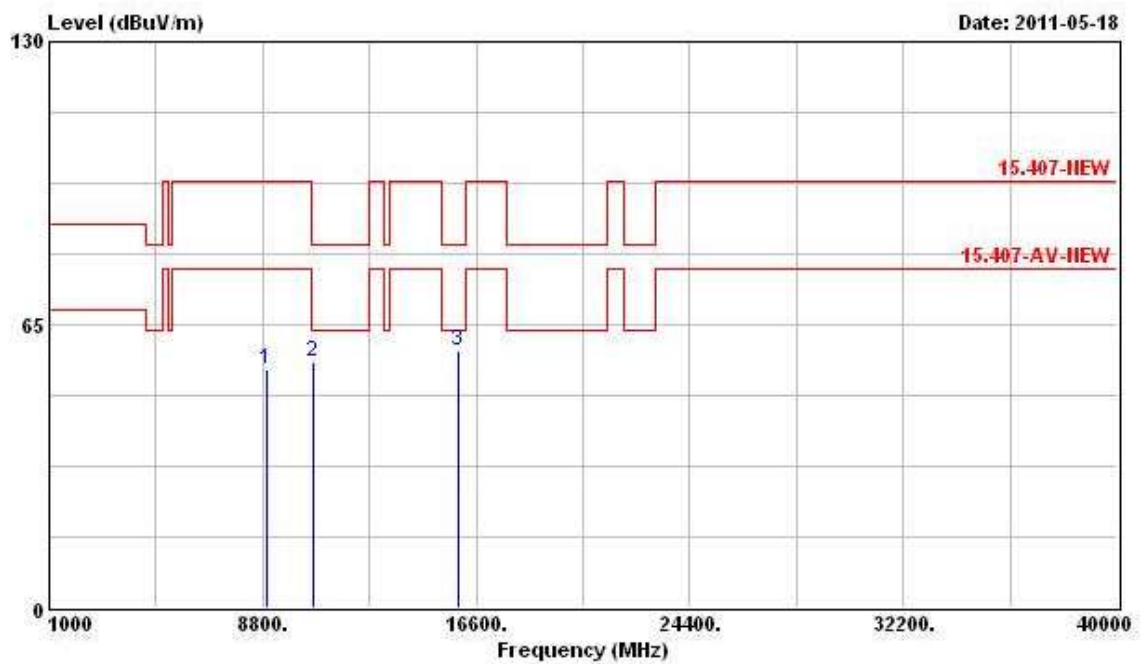
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8910.000	54.67	-43.17	97.84	42.93	38.52	6.41	33.19	Peak
2	10540.000	55.57	-42.27	97.84	42.00	39.48	6.97	32.88	Peak
3 @	15810.000	59.67	-3.87	63.54	46.33	38.00	7.92	32.58	PK

Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 62 (40MHz) MCS8 (Ant. A + Ant. B)

Horizontal

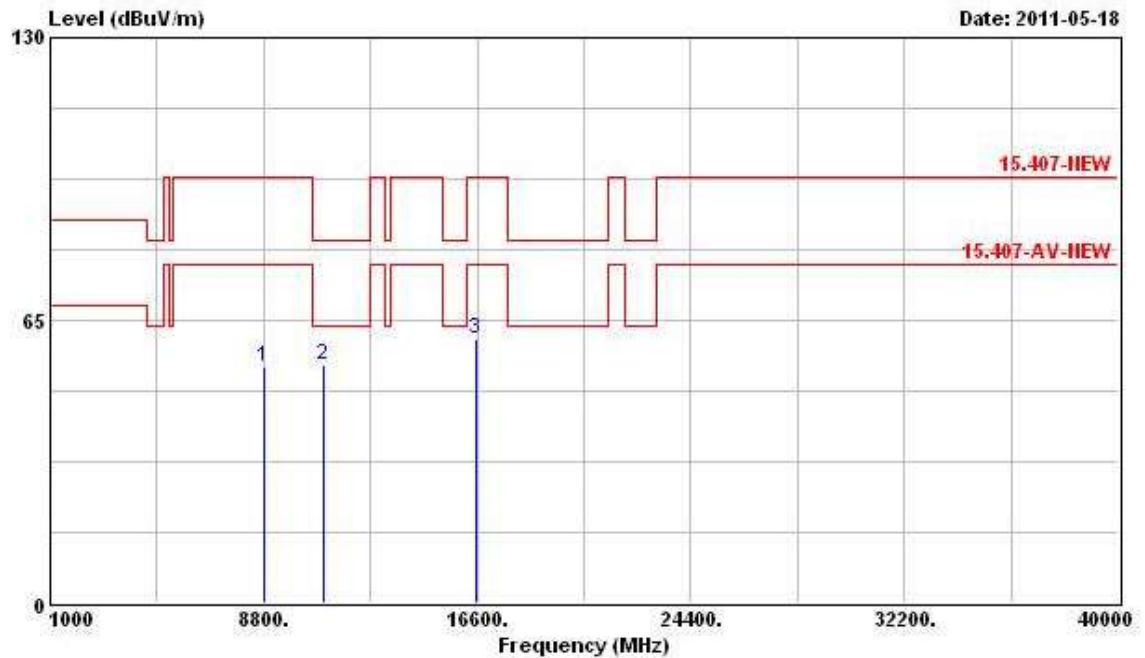
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8860.000	54.60	-43.24	97.84	42.88	38.48	6.41	33.17	Peak
2	10620.000	55.47	-8.07	63.54	41.86	39.43	7.01	32.83	PK
3	15930.000	58.45	-5.09	63.54	45.35	37.81	7.91	32.62	PK

Vertical



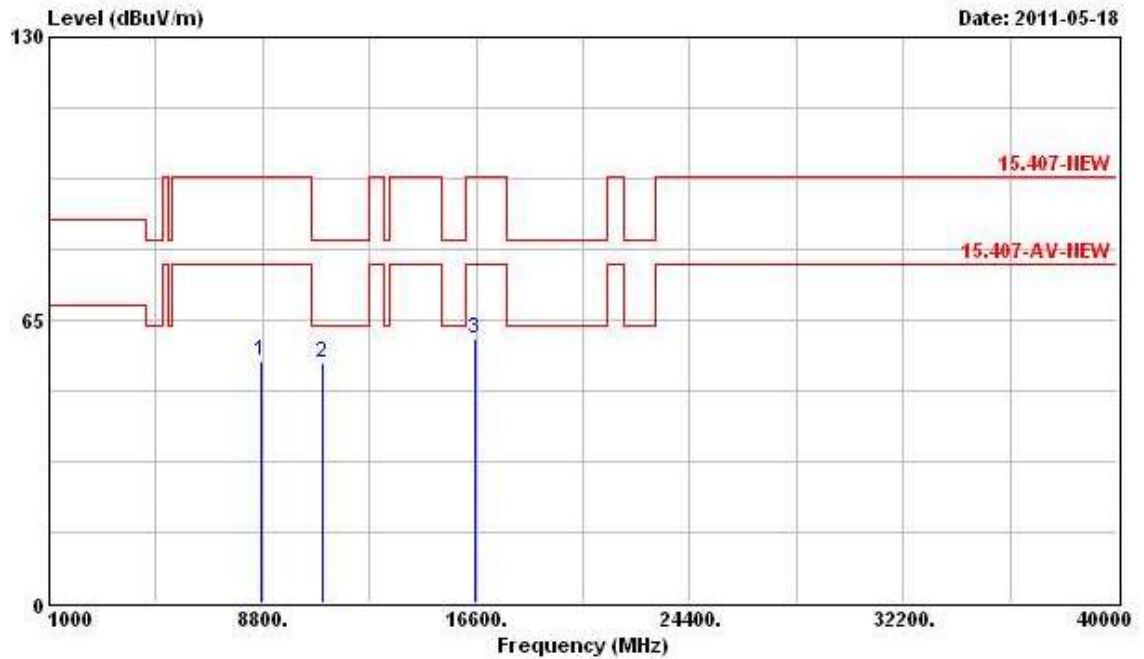
	Freq	Level	Over	Limit	ReadAntenna	Cable	Preamp	
	MHz	dBuV/m	Limit	Line	Level	Loss	Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1	8940.000	54.75	-43.09	97.84	42.99	38.55	6.40	33.19 Peak
2	10620.000	56.51	-7.03	63.54	42.90	39.43	7.01	32.83 PK
3 @	15930.000	59.04	-4.50	63.54	45.94	37.81	7.91	32.62 PK

Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 102 (40MHz) MCS8 (Ant. A + Ant. B)

Horizontal

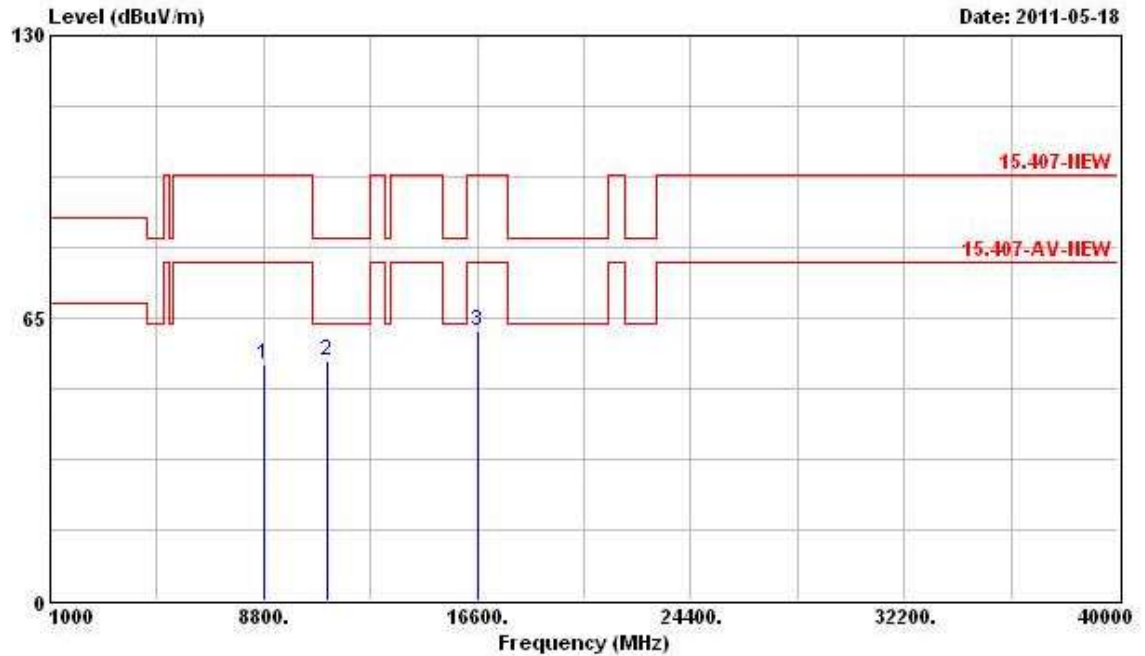
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8780.000	54.38	-43.46	97.84	42.69	38.43	6.41	33.14	Peak
2	11020.000	54.73	-8.81	63.54	40.90	39.22	7.22	32.62	PK
3	16530.000	60.65	-37.19	97.84	46.28	38.69	7.90	32.23	Peak

Vertical



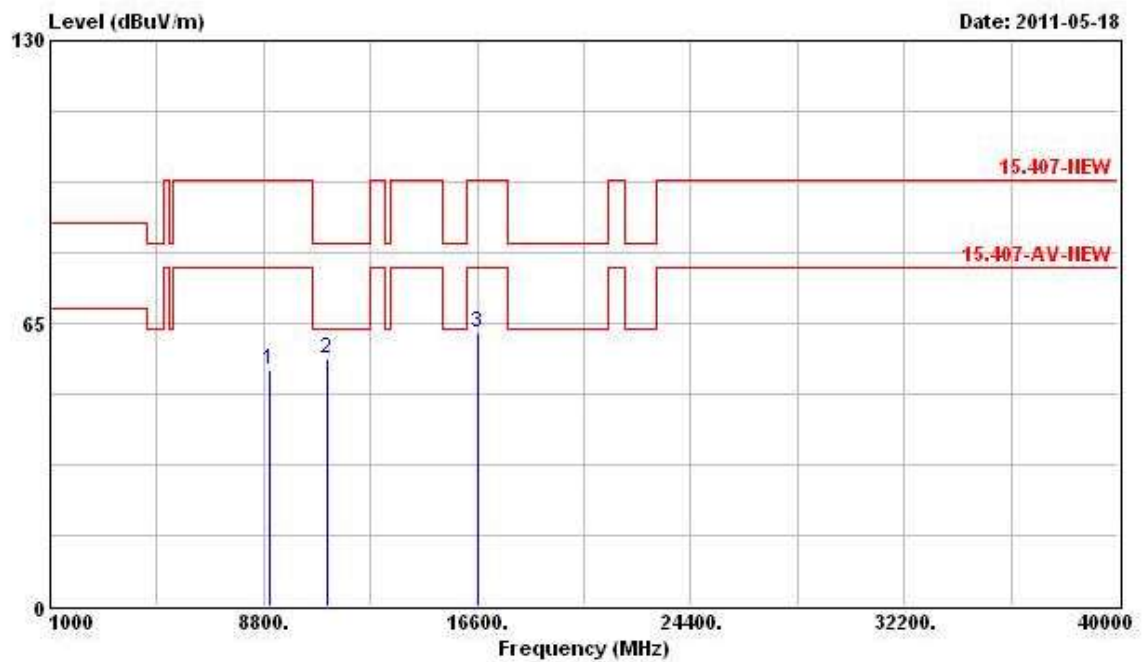
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1	8750.000	55.55	-42.29	97.84	43.87	38.40	6.41	33.14 Peak
2	11020.000	54.97	-8.57	63.54	41.14	39.22	7.22	32.62 PK
3	16530.000	60.68	-37.16	97.84	46.31	38.69	7.90	32.23 Peak

Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 110 (40MHz) MCS8 (Ant. A + Ant. B)

Horizontal

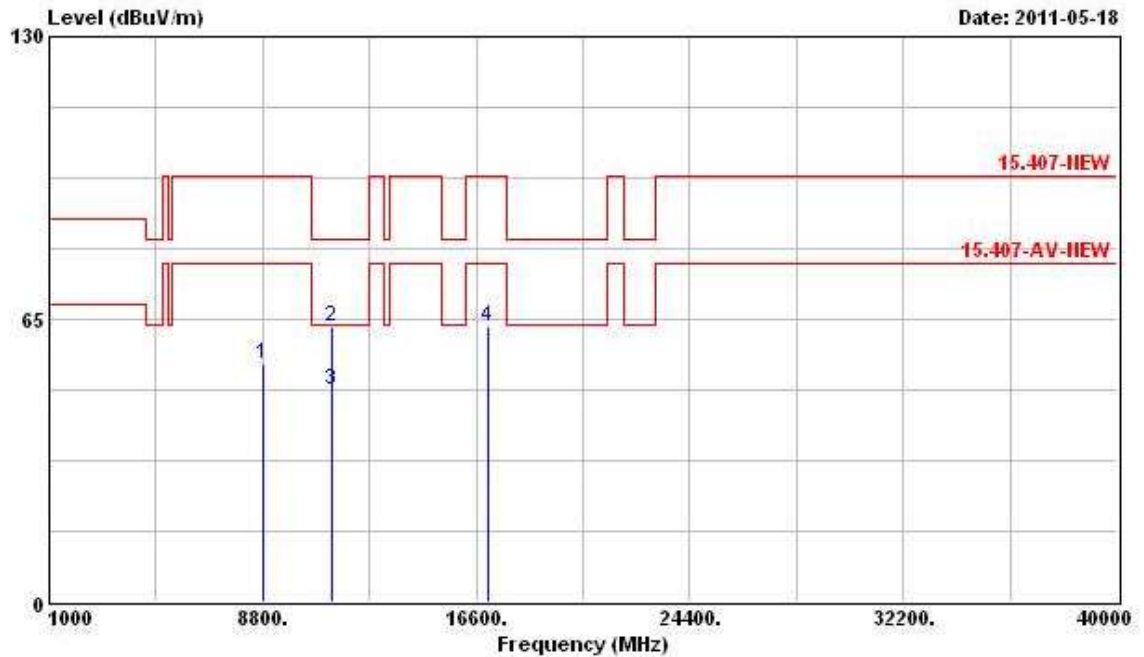
	Freq	Level	Over	Limit	ReadAntenna	Cable	Preamp	
	MHz	dBuV/m	Limit	Line	Level	Loss	Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1	8780.000	54.20	-43.64	97.84	42.51	38.43	6.41	33.14 Peak
2	11100.000	55.08	-8.46	63.54	41.11	39.34	7.24	32.61 PK
3	16650.000	62.02	-35.82	97.84	46.68	39.37	8.03	32.06 Peak

Vertical



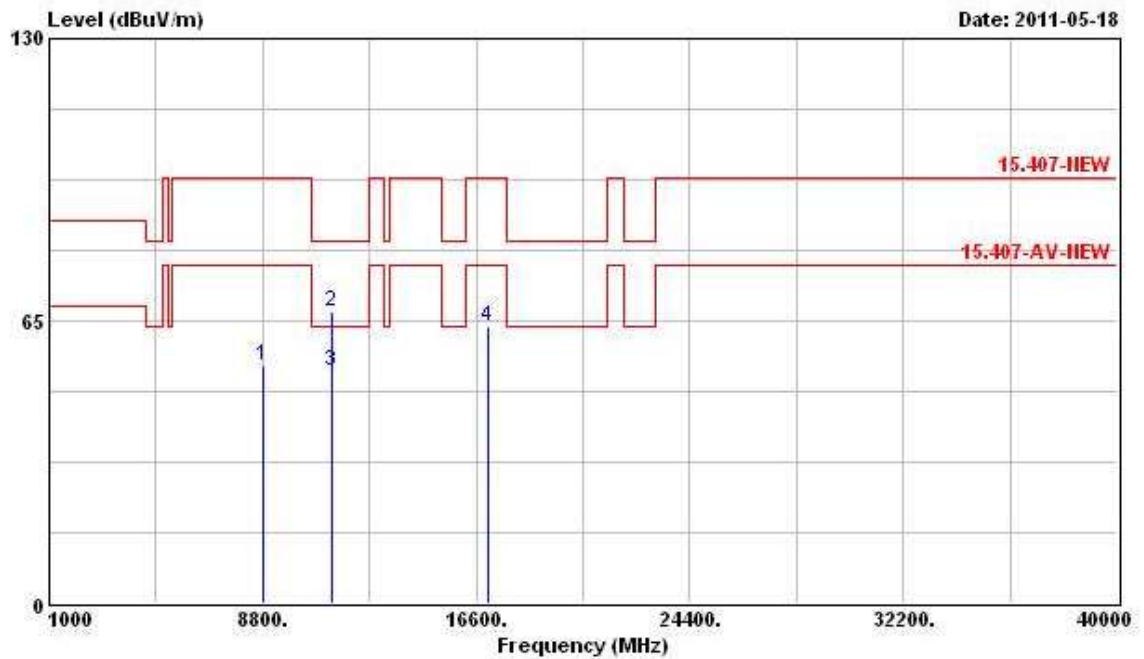
	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8990.000	54.47	-43.37	97.84	42.69	38.59	6.40	33.21	Peak
2	11100.000	56.83	-6.71	63.54	42.86	39.34	7.24	32.61	PK
3	16650.000	62.73	-35.11	97.84	47.39	39.37	8.03	32.06	Peak

Final Test Date	May 18, 2011	Test Site No.	03CH03-HY
Temperature	23°C	Humidity	55%
Test Engineer	Streak	Configuration	802.11n Ch. 134 (40MHz) MCS8 (Ant. A + Ant. B)

Horizontal

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8798.000	54.92	-42.92	97.84	43.22	38.44	6.41	33.15	Peak
2	11340.000	63.20	-20.34	83.54	48.83	39.67	7.29	32.59	Peak
3	11340.000	48.84	-14.70	63.54	34.47	39.67	7.29	32.59	Average
4	17010.000	63.46	-34.38	97.84	45.22	41.46	8.42	31.64	Peak

Vertical



	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	8798.000	54.72	-43.12	97.84	43.02	38.44	6.41	33.15	Peak
2	11340.000	67.31	-16.23	83.54	52.94	39.67	7.29	32.59	Peak
3	11340.000	53.58	-9.96	63.54	39.21	39.67	7.29	32.59	Average
4	17010.000	63.89	-33.95	97.84	45.65	41.46	8.42	31.64	Peak

Note:

The amplitude of spurious emissions that are attenuated by more than 20dB below the permissible value has no need to be reported.

Emission level (dBuV/m) = 20 log Emission level (uV/m).

Corrected Reading: Antenna Factor + Cable Loss + Read Level - Preamp Factor = Level.

The limits above 5GHz shall be extrapolated to the specified distance using an extrapolation factor of 20 dB/decade from 3m to 1m.

Distance extrapolation factor = 20 log (specific distance [3m] / test distance [1m]) (dB);

Limit line = specific limits (dBuV) + distance extrapolation factor [9.54 dB].

3.7 Band Edge and Fundamental Emissions Measurement

3.7.1 Limit

For transmitters operating in the 5.15-5.35 GHz band: all emissions outside of the 5.15-5.35 GHz band shall not exceed an EIRP of -27 dBm/MHz (68.3dBuV/m at 3m). For transmitters operating in the 5.47-5.725 GHz band: all emissions outside of the 5.47-5.725 GHz band shall not exceed an EIRP of -27 dBm/MHz (68.3dBuV/m at 3m). In addition, In case the emission fall within the restricted band specified on 15.205(a), then the 15.209(a) limit in the table below has to be followed.

Frequencies (MHz)	Field Strength (micorvolts/meter)	Measurement Distance (meters)
0.009~0.490	2400/F(KHz)	300
0.490~1.705	24000/F(KHz)	30
1.705~30.0	30	30
30~88	100	3
88~216	150	3
216~960	200	3
Above 960	500	3

3.7.2 Measuring Instruments and Setting

Please refer to section 4 of equipments list in this report. The following table is the setting of the spectrum analyzer.

Spectrum Parameter	Setting
Attenuation	Auto
Span Frequency	100 MHz
RB / VB (Emission in restricted band)	1MHz / 1MHz for Peak, 1MHz / 10Hz for Average
RB / VB (Emission in non-restricted band)	1MHz / 1MHz for Peak

3.7.3 Test Procedures

1. The test procedure is the same as section 3.6.3; only the frequency range investigated is limited to 100MHz around band edges.
2. In case the emission is fail due to the used RB/VB is too wide, marker-delta method of FCC Public Notice DA00-705 will be followed.

3.7.4 Test Setup Layout

This test setup layout is the same as that shown in section 3.6.4.

3.7.5 Test Deviation

There is no deviation with the original standard.

3.7.6 EUT Operation during Test

The EUT was programmed to be in continuously transmitting mode.

3.7.7 Test Result of Band Edge and Fundamental Emissions

For Single Chain:

Final Test Date	May 13, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11a Ch. 36, 40, 48 (Ant. A)

Channel 36

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1 @	5149.000	81.59	-1.95	83.54	41.75	34.45	5.39	0.00	Peak
2 @	5175.500	122.15			82.28	34.48	5.39	0.00	Peak
1 @	5150.000	62.50	-1.04	63.54	22.66	34.45	5.39	0.00	Average
2 @	5172.700	110.81			70.96	34.47	5.39	0.00	Average

The item 2 is fundamental emissions.

Channel 40

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5085.000	72.18	-11.36	83.54	32.40	34.38	5.39	0.00	Peak
2 @	5197.000	121.70			81.82	34.50	5.38	0.00	Peak
3	5351.000	71.81	-11.73	83.54	31.79	34.65	5.37	0.00	Peak
1 @	5150.000	58.22	-5.32	63.54	18.38	34.45	5.39	0.00	Average
2 @	5197.000	110.98			71.10	34.50	5.38	0.00	Average
3	5431.000	57.91	-5.63	63.54	17.82	34.73	5.36	0.00	Average

The item 2 is fundamental emissions.

Channel 48

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5101.800	72.10	-11.44	83.54	32.31	34.40	5.39	0.00	Peak
2 @	5241.300	120.92			81.01	34.53	5.38	0.00	Peak
3	5379.300	71.71	-11.83	83.54	31.66	34.68	5.37	0.00	Peak
1 @	5107.800	58.11	-5.43	63.54	18.30	34.42	5.39	0.00	Average
2 @	5237.700	110.26			70.35	34.53	5.38	0.00	Average
3	5398.500	57.80	-5.74	63.54	17.74	34.70	5.36	0.00	Average

The item 2 is fundamental emissions.

Final Test Date	May 13, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11a Ch. 52, 56, 64 (Ant. A)

Channel 52

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5130.900	72.03	-11.51	83.54	32.21	34.43	5.39	0.00	Peak
2 @	5266.200	122.70			82.75	34.57	5.38	0.00	Peak
3	5393.400	72.05	-11.49	83.54	32.00	34.68	5.36	0.00	Peak
1 @	5107.800	58.14	-5.40	63.54	18.33	34.42	5.39	0.00	Average
2 @	5262.900	111.78			71.83	34.57	5.38	0.00	Average
3	5398.200	57.83	-5.71	63.54	17.77	34.70	5.36	0.00	Average

The item 2 is fundamental emissions.

Channel 56

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5124.900	72.61	-10.93	83.54	32.79	34.43	5.39	0.00	Peak
2 @	5278.500	123.55			83.59	34.58	5.38	0.00	Peak
3	5391.300	71.95	-11.59	83.54	31.90	34.68	5.36	0.00	Peak
1 @	5105.400	58.19	-5.35	63.54	18.40	34.40	5.39	0.00	Average
2 @	5278.200	112.54			72.58	34.58	5.38	0.00	Average
3	5397.300	57.94	-5.60	63.54	17.88	34.70	5.36	0.00	Average

The item 2 is fundamental emissions.

Channel 64

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1 @	5323.000	111.46			71.47	34.62	5.37	0.00	Average
2 @	5350.000	62.31	-1.23	63.54	22.29	34.65	5.37	0.00	Average
1 @	5324.300	121.99			82.00	34.62	5.37	0.00	Peak
2 @	5351.400	82.02	-1.52	83.54	42.00	34.65	5.37	0.00	Peak

The item 1 is fundamental emissions.

Final Test Date	May 13, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11a Ch. 100, 116, 140 (Ant. A)

Channel 100

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1	5459.920	73.31	-10.23	83.54	33.20	34.75	5.36	0.00 Peak
2 ☺	5495.760	120.41			80.27	34.78	5.36	0.00 Peak
1 ☺	5459.280	58.53	-5.01	63.54	18.42	34.75	5.36	0.00 Average
2 ☺	5496.720	108.98			68.82	34.80	5.36	0.00 Average

The item 2 is fundamental emissions.

Channel 116

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1	5430.000	71.93	-11.61	83.54	31.84	34.73	5.36	0.00 Peak
2 ☺	5585.840	118.33			78.24	34.80	5.29	0.00 Peak
3	5739.120	72.55	-25.29	97.84	32.54	34.80	5.21	0.00 Peak
1 ☺	5435.760	57.96	-5.58	63.54	17.87	34.73	5.36	0.00 Average
2 ☺	5573.040	107.71			67.60	34.80	5.31	0.00 Average
3	5735.280	58.22	-19.62	77.84	18.19	34.80	5.23	0.00 Average

The item 2 is fundamental emissions.

Channel 140

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1 ☺	5704.820	119.40			79.37	34.80	5.23	0.00 Peak
2	5725.460	85.79	-12.05	97.84	45.76	34.80	5.23	0.00 Peak
1 ☺	5702.180	108.82			68.79	34.80	5.23	0.00 Average
2	5725.000	63.40	-14.44	77.84	23.37	34.80	5.23	0.00 Average

The item 1 is fundamental emissions.

Final Test Date	May 14, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11n MCS0 (Ant. A) Ch. 36, 40, 48 (20MHz)

Channel 36

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1 @	5146.200	80.35	-3.19	83.54	40.51	34.45	5.39	0.00	Peak
2 @	5175.500	120.30			80.43	34.48	5.39	0.00	Peak
1 @	5150.000	62.41	-1.13	63.54	22.57	34.45	5.39	0.00	Average
2 @	5174.600	109.41			69.54	34.48	5.39	0.00	Average

The item 2 is fundamental emissions.

Channel 40

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5146.200	71.56	-11.98	83.54	31.72	34.45	5.39	0.00	Peak
2 @	5196.600	120.73			80.85	34.50	5.38	0.00	Peak
3	5367.300	70.60	-12.94	83.54	30.56	34.67	5.37	0.00	Peak
1	5149.800	57.84	-5.70	63.54	18.00	34.45	5.39	0.00	Average
2 @	5196.600	110.01			70.13	34.50	5.38	0.00	Average
3	5389.800	57.36	-6.18	63.54	17.31	34.68	5.36	0.00	Average

The item 2 is fundamental emissions.

Channel 48

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5127.300	70.79	-12.75	83.54	30.97	34.43	5.39	0.00	Peak
2 @	5243.400	120.50			80.57	34.55	5.38	0.00	Peak
3	5396.100	70.85	-12.69	83.54	30.79	34.70	5.36	0.00	Peak
1	5114.100	57.28	-6.26	63.54	17.47	34.42	5.39	0.00	Average
2 @	5242.500	109.52			69.59	34.55	5.38	0.00	Average
3	5391.000	56.97	-6.57	63.54	16.92	34.68	5.36	0.00	Average

The item 2 is fundamental emissions.

Final Test Date	May 14, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11n MCS0 (Ant. A) Ch. 52, 56, 64 (20MHz)

Channel 52

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5148.600	70.73	-12.81	83.54	30.89	34.45	5.39	0.00	Peak
2 ☺	5264.100	121.82			81.87	34.57	5.38	0.00	Peak
3	5355.300	71.01	-12.53	83.54	30.99	34.65	5.37	0.00	Peak
1	5107.800	57.51	-6.03	63.54	17.70	34.42	5.39	0.00	Average
2 ☺	5254.500	111.33			71.40	34.55	5.38	0.00	Average
3	5389.800	56.98	-6.56	63.54	16.93	34.68	5.36	0.00	Average

The item 2 is fundamental emissions.

Channel 56

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5129.400	70.80	-12.74	83.54	30.98	34.43	5.39	0.00	Peak
2 ☺	5273.400	122.47			82.53	34.57	5.38	0.00	Peak
3	5394.900	70.07	-13.47	83.54	30.01	34.70	5.36	0.00	Peak
1	5124.600	57.41	-6.13	63.54	17.59	34.43	5.39	0.00	Average
2 ☺	5274.600	111.94			72.00	34.57	5.38	0.00	Average
3	5398.500	57.05	-6.49	63.54	16.99	34.70	5.36	0.00	Average

The item 2 is fundamental emissions.

Channel 64

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1 ☺	5323.090	121.68			81.69	34.62	5.37	0.00	Peak
2 ☺	5351.930	82.00	-1.54	83.54	41.98	34.65	5.37	0.00	Peak
1 ☺	5322.810	111.03			71.04	34.62	5.37	0.00	Average
2 ☺	5350.180	61.76	-1.78	63.54	21.74	34.65	5.37	0.00	Average

The item 1 is fundamental emissions.

Final Test Date	May 14, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11n MCS0 (Ant. A) Ch. 100, 116, 140 (20MHz)

Channel 100

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5459.600	73.24	-10.30	83.54	33.13	34.75	5.36	0.00	Peak
2 @	5495.760	119.68			79.54	34.78	5.36	0.00	Peak
1 @	5459.920	58.10	-5.44	63.54	17.99	34.75	5.36	0.00	Average
2 @	5496.800	109.26			69.10	34.80	5.36	0.00	Average

The item 2 is fundamental emissions.

Channel 116

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5453.680	71.74	-11.80	83.54	31.63	34.75	5.36	0.00	Peak
2 @	5576.560	118.07			77.96	34.80	5.31	0.00	Peak
3	5725.000	69.14	-28.70	97.84	29.11	34.80	5.23	0.00	Peak
1	5432.240	57.42	-6.12	63.54	17.33	34.73	5.36	0.00	Average
2 @	5574.320	107.60			67.49	34.80	5.31	0.00	Average
3	5725.000	57.01	-20.83	77.84	16.98	34.80	5.23	0.00	Average

The item 2 is fundamental emissions.

Channel 140

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1 @	5702.600	119.24			79.21	34.80	5.23	0.00	Peak
2	5725.000	83.10	-14.74	97.84	43.07	34.80	5.23	0.00	Peak
1 @	5702.900	108.39			68.36	34.80	5.23	0.00	Average
2	5725.000	64.79	-13.05	77.84	24.76	34.80	5.23	0.00	Average

The item 1 is fundamental emissions.

Final Test Date	May 14, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11n MCS0 (Ant. A) Ch. 38, 46, 54 (40MHz)

Channel 38

	Freq	Level	Over Limit	Limit Line	Read Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5147.800	77.86	-5.68	83.54	38.02	34.45	5.39	0.00	Peak
2 @	5179.500	113.60			73.73	34.48	5.39	0.00	Peak
1 @	5150.000	61.72	-1.82	63.54	21.88	34.45	5.39	0.00	Average
2 @	5179.000	102.62			62.75	34.48	5.39	0.00	Average

The item 2 is fundamental emissions.

Channel 46

	Freq	Level	Over Limit	Limit Line	Read Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5148.750	72.00	-11.54	83.54	32.16	34.45	5.39	0.00	Peak
2 @	5226.750	120.78			80.86	34.53	5.38	0.00	Peak
3	5352.500	70.32	-13.22	83.54	30.30	34.65	5.37	0.00	Peak
1 @	5150.000	58.68	-4.86	63.54	18.84	34.45	5.39	0.00	Average
2 @	5225.750	109.40			69.48	34.53	5.38	0.00	Average
3	5350.750	56.93	-6.61	63.54	16.91	34.65	5.37	0.00	Average

The item 2 is fundamental emissions.

Channel 54

	Freq	Level	Over Limit	Limit Line	Read Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5117.700	70.63	-12.91	83.54	30.82	34.42	5.39	0.00	Peak
2 @	5272.500	121.14			81.20	34.57	5.38	0.00	Peak
3	5350.000	71.70	-11.84	83.54	31.68	34.65	5.37	0.00	Peak
1	5105.400	57.49	-6.05	63.54	17.70	34.40	5.39	0.00	Average
2 @	5272.500	109.51			69.57	34.57	5.38	0.00	Average
3 @	5351.400	58.00	-5.54	63.54	17.98	34.65	5.37	0.00	Average

The item 2 is fundamental emissions.

Final Test Date	May 14, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11n MCS0 (Ant. A) Ch. 62, 102 (40MHz)

Channel 62

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1 @	5298.200	114.85			74.87	34.60	5.38	0.00	Peak
2 @	5350.200	76.31	-7.23	83.54	36.29	34.65	5.37	0.00	Peak
1 @	5299.000	103.84			63.86	34.60	5.38	0.00	Average
2 @	5350.300	62.17	-1.37	63.54	22.15	34.65	5.37	0.00	Average

The item 1 is fundamental emissions.

Channel 102

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1 @	5458.200	79.53	-4.01	83.54	39.42	34.75	5.36	0.00	Peak
2 @	5498.300	117.61			77.45	34.80	5.36	0.00	Peak
1 @	5460.000	62.10	-1.44	63.54	21.99	34.75	5.36	0.00	Average
2 @	5498.700	106.29			66.13	34.80	5.36	0.00	Average

The item 2 is fundamental emissions.

Final Test Date	May 14, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11n MCS0 (Ant. A) Ch. 110, 134 (40MHz)

Channel 110

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1	5458.900	70.57	-12.97	83.54	30.46	34.75	5.36	0.00 Peak
2 B	5538.100	116.47			76.33	34.80	5.34	0.00 Peak
3	5737.300	70.56	-27.28	97.84	30.53	34.80	5.23	0.00 Peak
1	5457.700	57.31	-6.23	63.54	17.20	34.75	5.36	0.00 Average
2 B	5538.100	105.42			65.28	34.80	5.34	0.00 Average
3	5735.800	57.25	-20.59	77.84	17.22	34.80	5.23	0.00 Average

The item 2 is fundamental emissions.

Channel 134

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1 B	5679.000	118.10			78.05	34.80	5.25	0.00 Peak
2	5725.900	75.61	-22.23	97.84	35.58	34.80	5.23	0.00 Peak
1 B	5673.800	106.52			66.47	34.80	5.25	0.00 Average
2	5726.200	61.19	-16.65	77.84	21.16	34.80	5.23	0.00 Average

The item 1 is fundamental emissions.

For Two Chain:

Final Test Date	May 14, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11n MCS8 (Ant. A+Ant.B) Ch. 36, 40, 48 (20MHz)

Channel 36

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5149.800	72.86	-10.68	83.54	33.02	34.45	5.39	0.00	Peak
2 B	5184.600	119.71			79.84	34.48	5.39	0.00	Peak
1 B	5150.000	59.33	-4.21	63.54	19.49	34.45	5.39	0.00	Average
2 B	5183.500	106.75			66.88	34.48	5.39	0.00	Average

The item 2 is fundamental emissions.

Channel 40

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5148.600	70.18	-13.36	83.54	30.34	34.45	5.39	0.00	Peak
2 B	5204.100	120.92			81.04	34.50	5.38	0.00	Peak
3	5388.600	70.62	-12.92	83.54	30.57	34.68	5.36	0.00	Peak
1	5108.100	57.21	-6.33	63.54	17.40	34.42	5.39	0.00	Average
2 B	5203.800	108.14			68.26	34.50	5.38	0.00	Average
3	5398.500	56.85	-6.69	63.54	16.79	34.70	5.36	0.00	Average

The item 2 is fundamental emissions.

Channel 48

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5119.800	70.91	-12.63	83.54	31.10	34.42	5.39	0.00	Peak
2 B	5235.000	120.59			80.68	34.53	5.38	0.00	Peak
3	5392.200	70.43	-13.11	83.54	30.38	34.68	5.36	0.00	Peak
1	5106.900	57.26	-6.28	63.54	17.45	34.42	5.39	0.00	Average
2 B	5237.700	107.26			67.35	34.53	5.38	0.00	Average
3	5397.000	56.96	-6.58	63.54	16.90	34.70	5.36	0.00	Average

The item 2 is fundamental emissions.

Final Test Date	May 14, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11n MCS8 (Ant. A+Ant.B) Ch. 52, 56, 64 (20MHz)

Channel 52

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5105.400	71.16	-12.38	83.54	31.37	34.40	5.39	0.00	Peak
2 @	5255.400	125.87			85.94	34.55	5.38	0.00	Peak
3	5376.900	70.84	-12.70	83.54	30.80	34.67	5.37	0.00	Peak
1	5130.600	57.59	-5.95	63.54	17.77	34.43	5.39	0.00	Average
2 @	5263.800	112.90			72.95	34.57	5.38	0.00	Average
3	5398.500	57.11	-6.43	63.54	17.05	34.70	5.36	0.00	Average

The item 2 is fundamental emissions.

Channel 56

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5135.700	71.34	-12.20	83.54	31.52	34.43	5.39	0.00	Peak
2 @	5284.500	126.04			86.08	34.58	5.38	0.00	Peak
3	5393.400	70.76	-12.78	83.54	30.71	34.68	5.36	0.00	Peak
1	5131.800	57.65	-5.89	63.54	17.83	34.43	5.39	0.00	Average
2 @	5284.200	113.14			73.18	34.58	5.38	0.00	Average
3	5353.800	57.02	-6.52	63.54	17.00	34.65	5.37	0.00	Average

The item 2 is fundamental emissions.

Channel 64

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1 @	5324.490	124.75			84.76	34.62	5.37	0.00	Peak
2 @	5350.000	78.76	-4.78	83.54	38.74	34.65	5.37	0.00	Peak
1 @	5323.580	111.73			71.74	34.62	5.37	0.00	Average
2 @	5350.000	62.17	-1.37	63.54	22.15	34.65	5.37	0.00	Average

The item 1 is fundamental emissions.

Final Test Date	May 14, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11n MCS8 (Ant. A+Ant.B) Ch. 100, 116, 140 (20MHz)

Channel 100

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5458.400	76.98	-6.56	83.54	36.87	34.75	5.36	0.00	Peak
2 B	5504.480	125.05			84.89	34.80	5.36	0.00	Peak
1 B	5460.000	62.07	-1.47	63.54	21.96	34.75	5.36	0.00	Average
2 B	5496.160	111.89			71.75	34.78	5.36	0.00	Average

The item 2 is fundamental emissions.

Channel 116

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5430.640	71.04	-12.50	83.54	30.95	34.73	5.36	0.00	Peak
2 B	5584.240	123.83			83.74	34.80	5.29	0.00	Peak
3	5732.720	70.15	-27.69	97.84	30.12	34.80	5.23	0.00	Peak
1	5434.800	57.39	-6.15	63.54	17.30	34.73	5.36	0.00	Average
2 B	5583.280	110.86			70.77	34.80	5.29	0.00	Average
3	5745.840	57.36	-20.48	77.84	17.35	34.80	5.21	0.00	Average

The item 2 is fundamental emissions.

Channel 140

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamp Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1 B	5695.880	124.54			84.49	34.80	5.25	0.00	Peak
2	5725.160	90.93	-6.91	97.84	50.90	34.80	5.23	0.00	Peak
1 B	5695.940	111.70			71.65	34.80	5.25	0.00	Average
2 B	5725.000	74.91	-2.93	77.84	34.88	34.80	5.23	0.00	Average

The item 1 is fundamental emissions.

Final Test Date	May 14, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11n MCS8 (Ant. A+Ant.B) Ch. 38, 46, 54 (40MHz)

Channel 38

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1 @	5149.900	78.29	-5.25	83.54	38.45	34.45	5.39	0.00 Peak
2 @	5185.100	116.43			76.56	34.48	5.39	0.00 Peak
1 @	5150.000	62.42	-1.12	63.54	22.58	34.45	5.39	0.00 Average
2 @	5179.100	101.86			61.99	34.48	5.39	0.00 Average

The item 2 is fundamental emissions.

Channel 46

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1	5144.750	74.41	-9.13	83.54	34.57	34.45	5.39	0.00 Peak
2 @	5224.750	120.44			80.52	34.53	5.38	0.00 Peak
3	5355.500	69.87	-13.67	83.54	29.85	34.65	5.37	0.00 Peak
1	5148.500	57.76	-5.78	63.54	17.92	34.45	5.39	0.00 Average
2 @	5238.750	106.28			66.37	34.53	5.38	0.00 Average
3	5352.500	56.78	-6.76	63.54	16.76	34.65	5.37	0.00 Average

The item 2 is fundamental emissions.

Channel 54

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1	5145.000	75.18	-8.36	83.54	35.34	34.45	5.39	0.00 Peak
2 @	5265.000	125.58			85.63	34.57	5.38	0.00 Peak
3	5350.000	76.10	-7.44	83.54	36.08	34.65	5.37	0.00 Peak
1 @	5146.500	58.09	-5.45	63.54	18.25	34.45	5.39	0.00 Average
2 @	5265.300	110.67			70.72	34.57	5.38	0.00 Average
3 @	5350.500	59.60	-3.94	63.54	19.58	34.65	5.37	0.00 Average

The item 2 is fundamental emissions.

Final Test Date	May 14, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11n MCS8 (Ant. A+Ant.B) Ch. 62, 102 (40MHz)

Channel 62

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1 @	5305.000	118.25			78.27	34.60	5.38	0.00 Peak
2	5351.000	76.32	-7.22	83.54	36.30	34.65	5.37	0.00 Peak
1 @	5320.600	104.12			64.13	34.62	5.37	0.00 Average
2 @	5350.000	62.44	-1.10	63.54	22.42	34.65	5.37	0.00 Average

The item 1 is fundamental emissions.

Channel 102

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB
1 @	5459.400	79.35	-4.19	83.54	39.24	34.75	5.36	0.00 Peak
2 @	5505.100	119.54			79.40	34.80	5.34	0.00 Peak
1 @	5460.000	62.25	-1.29	63.54	22.14	34.75	5.36	0.00 Average
2 @	5499.000	105.25			65.09	34.80	5.36	0.00 Average

The item 2 is fundamental emissions.

Final Test Date	May 14, 2011	Test Site No.	03CH03-HY
Temperature	27°C	Humidity	62%
Test Engineer	Streak	Configuration	802.11n MCS8 (Ant. A+Ant.B) Ch. 110, 134 (40MHz)

Channel 110

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1	5458.900	74.86	-8.68	83.54	34.75	34.75	5.36	0.00	Peak
2 @	5545.000	122.27			82.16	34.80	5.31	0.00	Peak
3	5736.100	70.89	-26.95	97.84	30.86	34.80	5.23	0.00	Peak
1 @	5460.000	58.96	-4.58	63.54	18.85	34.75	5.36	0.00	Average
2 @	5539.000	108.14			68.00	34.80	5.34	0.00	Average
3	5725.000	57.46	-20.38	77.84	17.43	34.80	5.23	0.00	Average

The item 2 is fundamental emissions.

Channel 134

	Freq	Level	Over Limit	Limit Line	ReadAntenna Level	Antenna Factor	Cable Loss	Preamplifier Factor	Remark
	MHz	dBuV/m	dB	dBuV/m	dBuV	dB/m	dB	dB	
1 @	5665.100	122.94			82.89	34.80	5.25	0.00	Peak
2	5726.200	86.25	-11.59	97.84	46.22	34.80	5.23	0.00	Peak
1 @	5674.200	108.42			68.37	34.80	5.25	0.00	Average
2	5725.000	65.79	-12.05	77.84	25.76	34.80	5.23	0.00	Average

The item 1 is fundamental emissions.

3.8 Frequency Stability Measurement

3.8.1 Limit

Manufacturers of U-NII devices are responsible for ensuring frequency stability such that an emissions is maintained within the band of operation under all conditions of normal operation as specified in the user's manual or ± 20 ppm (IEEE 802.11a specification).

3.8.2 Measuring Instruments and Setting

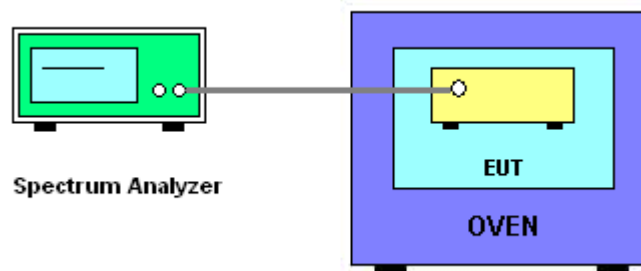
Please refer to section 4 of equipments list in this report. The following table is the setting of the spectrum analyzer.

Spectrum Parameter	Setting
Attenuation	Auto
Span Frequency	Entire absence of modulation emissions bandwidth
RB	10 kHz
VB	10 kHz
Sweep Time	Auto

3.8.3 Test Procedures

1. The transmitter output (antenna port) was connected to the spectrum analyzer.
2. EUT have transmitted absence of modulation signal and fixed channelize.
3. Set the spectrum analyzer span to view the entire absence of modulation emissions bandwidth.
4. Set RBW = 10 kHz, VBW = 10 kHz with peak detector and maxhold settings.
5. f_c is declaring of channel frequency. Then the frequency error formula is $(f_c - f)/f_c \times 10^6$ ppm and the limit is less than ± 20 ppm (IEEE 802.11a specification).
6. The test extreme voltage is to change the primary supply voltage from 85 to 115 percent of the nominal value
7. Extreme temperature rule is $-30^\circ\text{C} \sim 50^\circ\text{C}$.

3.8.4 Test Setup Layout



3.8.5 Test Deviation

There is no deviation with the original standard.

3.8.6 EUT Operation during Test

The EUT was programmed to be in continuously un-modulation transmitting mode.

3.8.7 Test Result of Frequency Stability**Voltage vs. Frequency Stability**

Voltage	Measurement Frequency (MHz)
(V)	IEEE 802.11a/n (20MHz)
	5280 MHz
126.5	5279.997600
110	5279.980200
93.5	5279.964600
Max. Deviation (MHz)	0.035400
Max. Deviation (ppm)	6.70

Temperature vs. Frequency Stability

Temperature	Measurement Frequency (MHz)
(°C)	IEEE 802.11a/n (20MHz)
	5280 MHz
-20	5280.011400
-10	5280.010800
0	5279.999400
10	5279.988000
20	5279.970600
30	5279.962800
40	5279.959800
50	5279.963400
Max. Deviation (MHz)	0.040200
Max. Deviation (ppm)	7.61

3.9 Antenna Requirements

3.9.1 Limit

Except for special regulations, the Low-power Radio-frequency Devices must not be equipped with any jacket for installing an antenna with extension cable. 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. The manufacturer may design the unit so that the user can replace a broken antenna, but the use of a standard antenna jack or electrical connector is prohibited.

3.9.2 Antenna Connector Construction

Please refer to section 2.3 in this test report; antenna connector complied with the requirements.

4 LIST OF MEASURING EQUIPMENTS

Instrument	Manufacturer	Model No.	Serial No.	Characteristics	Calibration Date	Remark
Spectrum Analyzer	R&S	FSU26.5	100015	20Hz ~ 26.5GHz	Jan. 06, 2011	Conducted (TH01-HY)
DC Power Source	G.W.	GPC-6030D	C671845	DC 1V ~ 60V	Apr. 15, 2011	Conducted (TH01-HY)
Temp. and Humidity Chamber	Giant Force	GTH-225-20-S	MAB0103-001	N/A	Oct. 22, 2010	Conducted (TH01-HY)
RF CABLE-1m	Jye Bao	RG142	CB034-1m	20MHz ~ 7GHz	Dec. 02, 2010	Conducted (TH01-HY)
RF CABLE-2m	Jye Bao	RG142	CB035-2m	20MHz ~ 1GHz	Dec. 02, 2010	Conducted (TH01-HY)
Signal Generator	R&S	SMR40	100116	10MHz ~ 40GHz	Mar. 29, 2011	Conducted (TH01-HY)
Power Sensor	Anritsu	MA2411B	0917017	300MHz~40GHz	Jan. 06, 2011	Conducted (TH01-HY)
Power Meter	Anritsu	ML2495A	0949003	300MHz~40GHz	Jan. 06, 2011	Conducted (TH01-HY)

Note: Calibration Interval of instruments listed above is one year.

Instrument	Manufacturer	Model No.	Serial No.	Characteristics	Calibration Date	Remark
AC Power Source	HPC	HPA-500W	HPA-9100024	AC 0 ~ 300V	Jul. 26, 2010*	Conducted (TH01-HY)

Note: Calibration Interval of instruments listed above is two year.

Instrument	Manufacturer	Model No.	Serial No.	Characteristics	Calibration Date	Remark
3m Semi Anechoic Chamber	SIDT FRANKONIA	SAC-3M	03CH03-HY	30 MHz - 1 GHz 3m	Jun. 18, 2010	Radiation (03CH03-HY)
Amplifier	SCHAFFNER	COA9231A	18667	9 kHz - 2 GHz	Jan. 25, 2011	Radiation (03CH03-HY)
Amplifier	Agilent	8449B	3008A02120	1 GHz - 26.5 GHz	Aug. 02, 2010	Radiation (03CH03-HY)
Spectrum Analyzer	R&S	FSP40	100004	9 kHz - 40 GHz	Nov. 17, 2010	Radiation (03CH03-HY)
Bilog Antenna	SCHAFFNER	CBL 6112D	22237	30 MHz – 1 GHz	Oct. 16, 2010	Radiation (03CH03-HY)
Horn Antenna	EMCO	3115	6741	1GHz ~ 18GHz	May 19, 2011	Radiation (03CH03-HY)
Horn Antenna	SCHWARZBECK	BBHA9170	BBHA9170154	15 GHz - 40 GHz	Jan.13, 2011	Radiation (03CH03-HY)
RF Cable-R03m	Jye Bao	RG142	CB021	30 MHz - 1 GHz	Jan. 18, 2011	Radiation (03CH03-HY)
RF Cable-HIGH	SUHNER	SUCOFLEX 106	03CH03-HY	1 GHz - 40 GHz	Jan. 18, 2011	Radiation (03CH03-HY)
Turn Table	HD	DS 420	420/650/00	0 – 360 degree	N/A	Radiation (03CH03-HY)
Antenna Mast	HD	MA 240	240/560/00	1 m - 4 m	N/A	Radiation (03CH03-HY)

Note: Calibration Interval of instruments listed above is one year.

Instrument	Manufacturer	Model No.	Serial No.	Characteristics	Calibration Date	Remark
Loop Antenna	R&S	HFH2-Z2	860004/001	9 kHz - 30 MHz	Jul. 29, 2010*	Radiation (03CH03-HY)

Note: Calibration Interval of instruments listed above is two year.

5 TEST LOCATION

SHIJR	ADD : 6Fl., No. 106, Sec. 1, Shintai 5th Rd., Shijr City, Taipei, Taiwan 221, R.O.C. TEL : 886-2-2696-2468 FAX : 886-2-2696-2255
HWA YA	ADD : No. 52, Hwa Ya 1st Rd., Kwei-Shan Hsiang, Tao Yuan Hsien, Taiwan, R.O.C. TEL : 886-3-327-3456 FAX : 886-3-318-0055
LINKOU	ADD : No. 30-2, Dingfu Tsuen, Linkou Shiang, Taipei, Taiwan 244, R.O.C TEL : 886-2-2601-1640 FAX : 886-2-2601-1695
DUNGHU	ADD : No. 3, Lane 238, Kangle St., Neihu Chiu, Taipei, Taiwan 114, R.O.C. TEL : 886-2-2631-4739 FAX : 886-2-2631-9740
JUNGHE	ADD : 7Fl., No. 758, Jungjeng Rd., Junghe City, Taipei, Taiwan 235, R.O.C. TEL : 886-2-8227-2020 FAX : 886-2-8227-2626
NEIHU	ADD : 4Fl., No. 339, Hsin Hu 2 nd Rd., Taipei 114, Taiwan, R.O.C. TEL : 886-2-2794-8886 FAX : 886-2-2794-9777
JHUBEI	ADD : No.8, Lane 728, Bo-ai St., Jhubei City, HsinChu County 302, Taiwan, R.O.C. TEL : 886-3-656-9065 FAX : 886-3-656-9085

6 TAF CERTIFICATE OF ACCREDITATION


財團法人全國認證基金會
Taiwan Accreditation Foundation

Certificate No. : L1190-110111

Certificate of Accreditation

This is to certify that

Sporton International Inc.
EMC & Wireless Communications Laboratory
No.52, Hwa Ya 1st Rd., Hwa Ya Technology Park, Kwei-Shan Hsiang, Tao Yuan Hsien,
Taiwan, R.O.C.

is accredited in respect of laboratory

Accreditation Criteria	: ISO/IEC 17025:2005
Accreditation Number	: 1190
Originally Accredited	: December 15, 2003
Effective Period	: January 10, 2010 to January 09, 2013
Accredited Scope	: Testing Field, see described in the Appendix
Specific Accreditation Program	: Accreditation Program for Designated Testing Laboratory for Commodities Inspection Accreditation Program for Telecommunication Equipment Testing Laboratory Accreditation Program for BSMI Mutual Recognition Arrangement with Foreign Authorities


Jay-San Chen
President, Taiwan Accreditation Foundation
Date : January 11, 2011

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