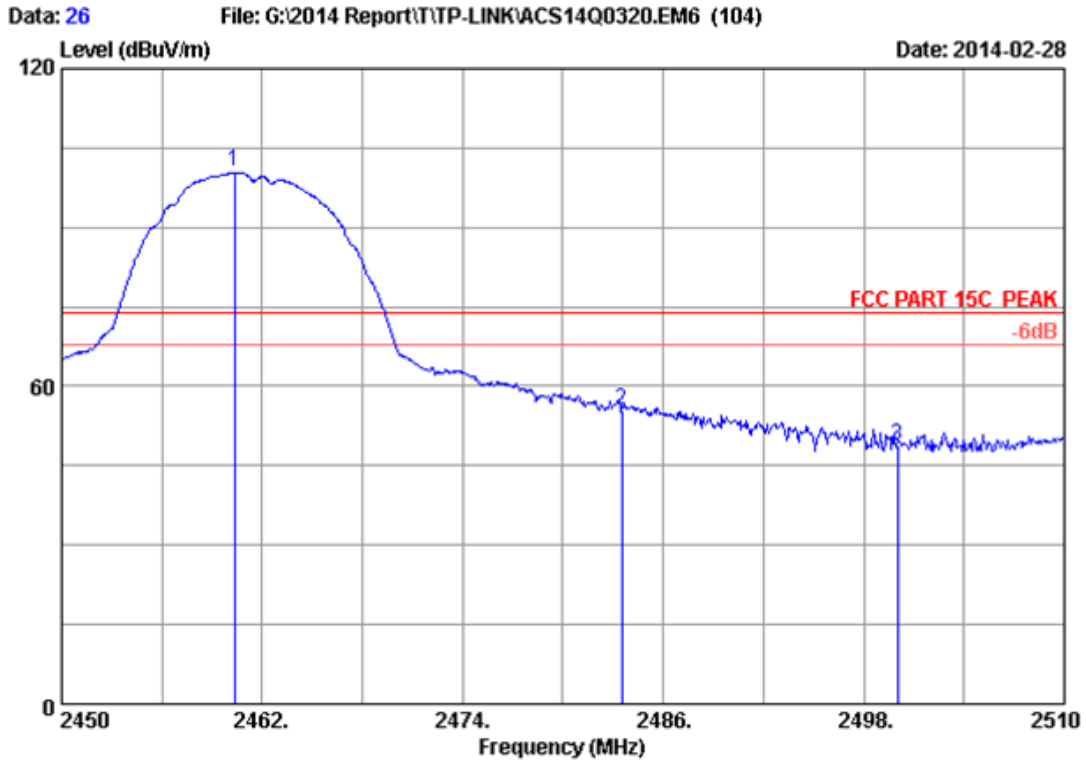


Site no. : 3m Chamber Data no. : 25  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11b CH11 2462MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2459.720	28.31	5.88	35.70	98.20	96.69	54.00	-42.69	Average
2	2483.500	28.36	5.92	35.70	38.68	37.26	54.00	16.74	Average
3	2500.000	28.40	5.94	35.70	36.24	34.88	54.00	19.12	Average

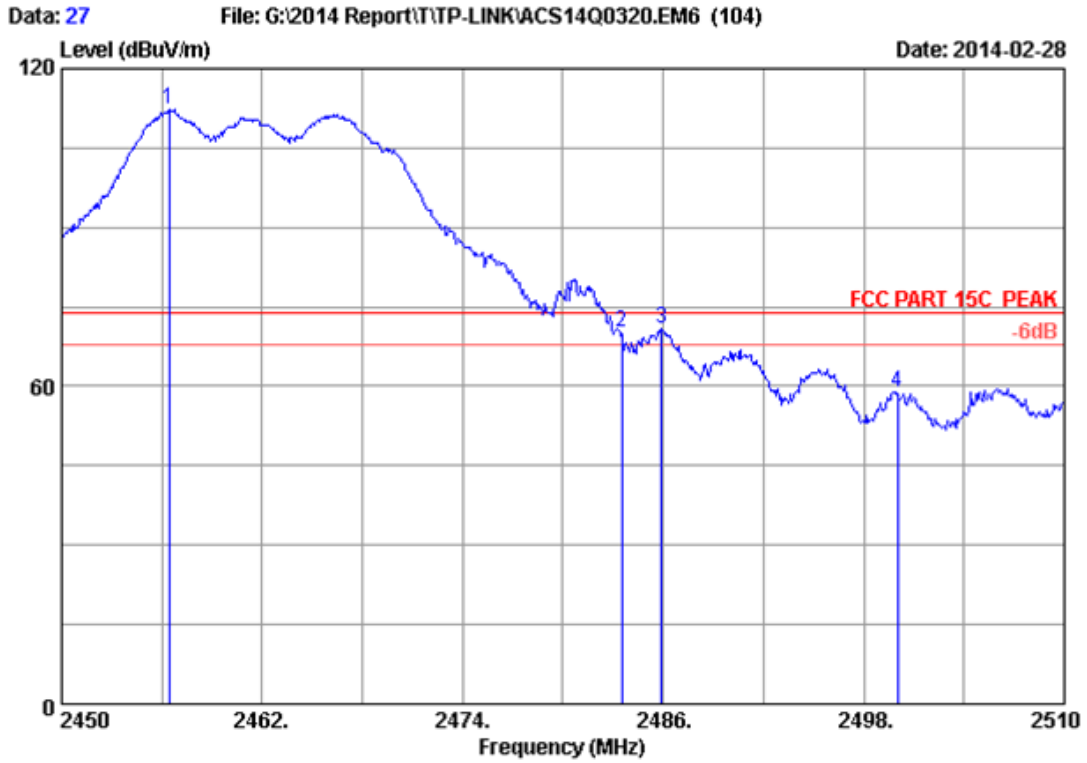
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading - Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 26  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11b CH11 2462MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2460.320	28.31	5.88	35.70	101.99	100.48	74.00	-26.48	Peak
2	2483.500	28.36	5.92	35.70	56.79	55.37	74.00	18.63	Peak
3	2500.000	28.40	5.94	35.70	50.32	48.96	74.00	25.04	Peak

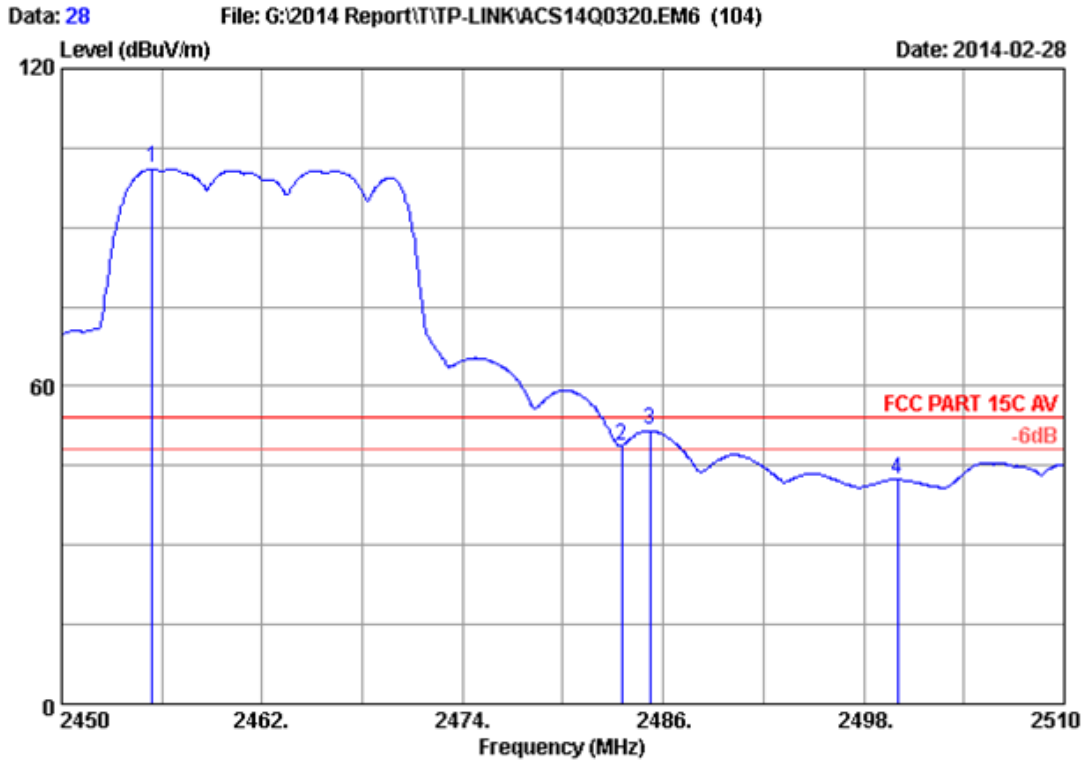
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading - Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 27  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : VERTICAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11g CH11 2462MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2456.420	28.30	5.88	35.70	113.94	112.42	74.00	-38.42	Peak
2	2483.500	28.36	5.92	35.70	71.57	70.15	74.00	3.85	Peak
3	2485.880	28.37	5.92	35.70	72.29	70.88	74.00	3.12	Peak
4	2500.000	28.40	5.94	35.70	60.19	58.83	74.00	15.17	Peak

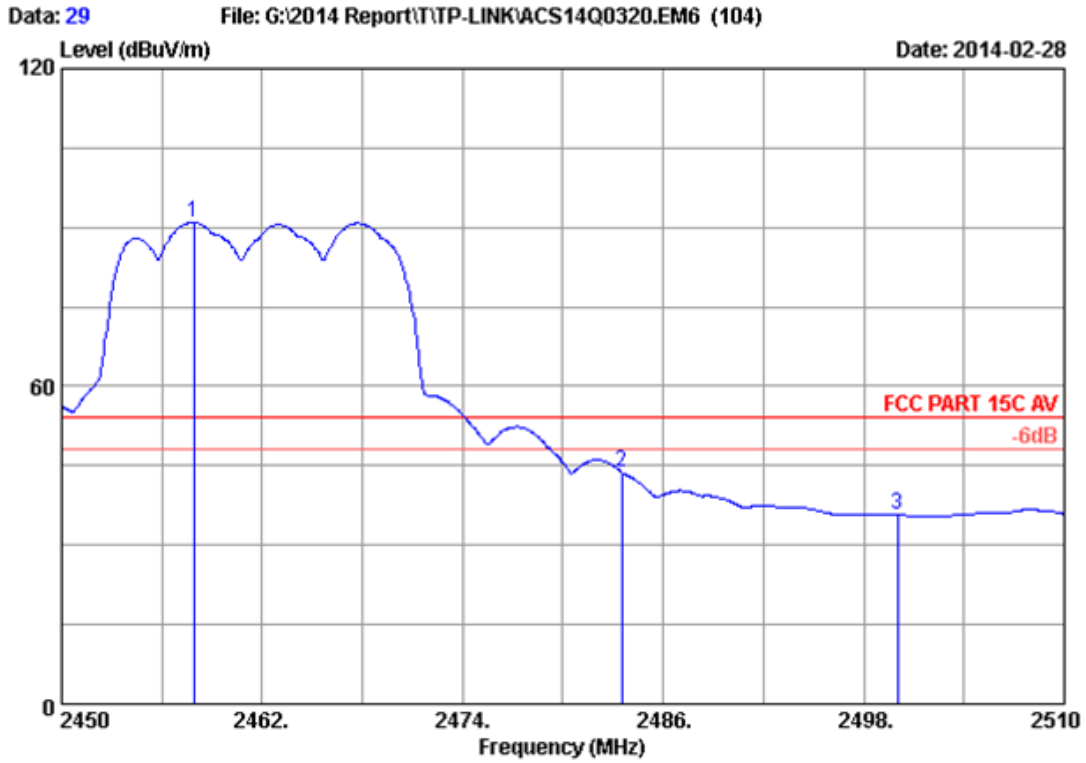
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading - Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 28  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : VERTICAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11g CH11 2462MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2455.400	28.30	5.88	35.70	102.74	101.22	54.00	-47.22	Average
2	2483.500	28.36	5.92	35.70	50.27	48.85	54.00	5.15	Average
3	2485.220	28.37	5.92	35.70	53.08	51.67	54.00	2.33	Average
4	2500.000	28.40	5.94	35.70	43.71	42.35	54.00	11.65	Average

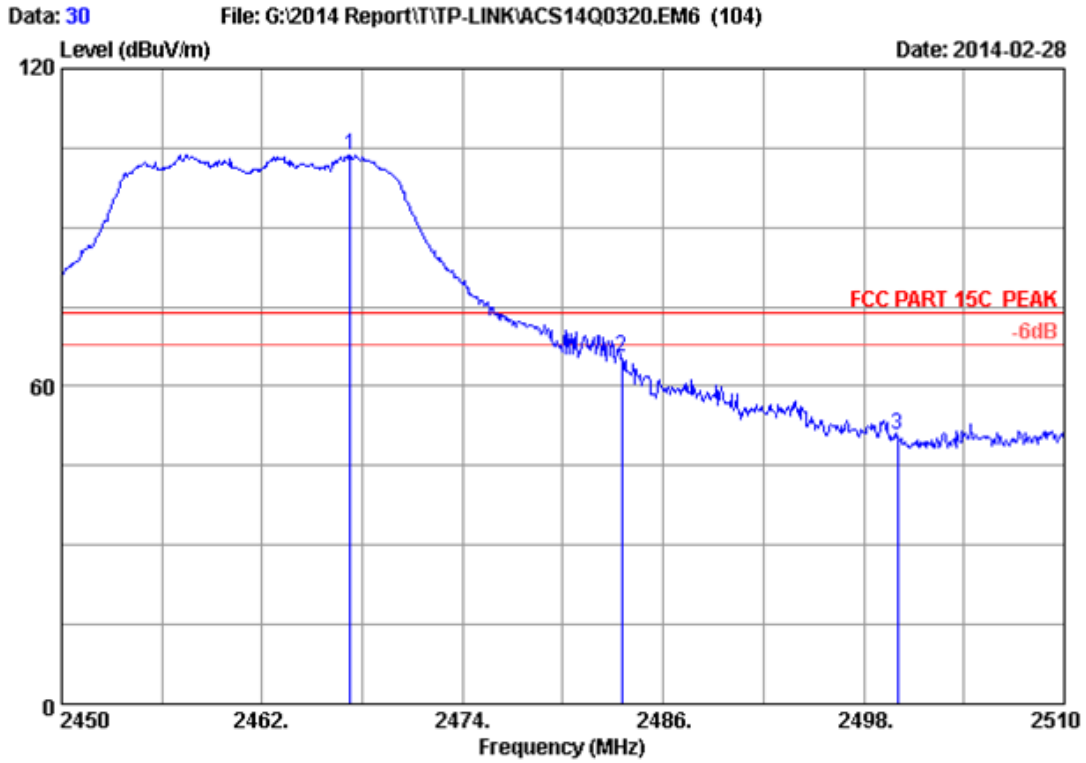
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading - Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 29  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11g CH11 2462MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2457.920	28.31	5.88	35.70	92.58	91.07	54.00	-37.07	Average
2	2483.500	28.36	5.92	35.70	45.20	43.78	54.00	10.22	Average
3	2500.000	28.40	5.94	35.70	37.03	35.67	54.00	18.33	Average

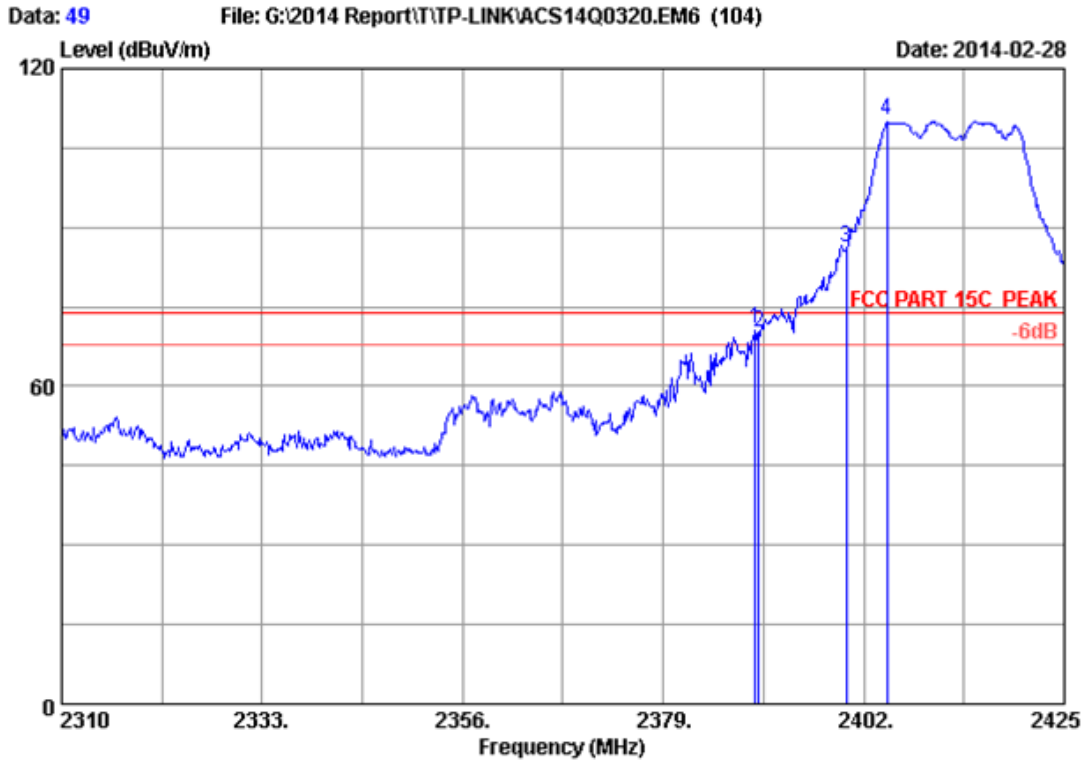
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading -Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 30  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11g CH11 2462MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2467.280	28.33	5.89	35.70	105.25	103.77	74.00	-29.77	Peak
2	2483.500	28.36	5.92	35.70	67.08	65.66	74.00	8.34	Peak
3	2500.000	28.40	5.94	35.70	52.28	50.92	74.00	23.08	Peak

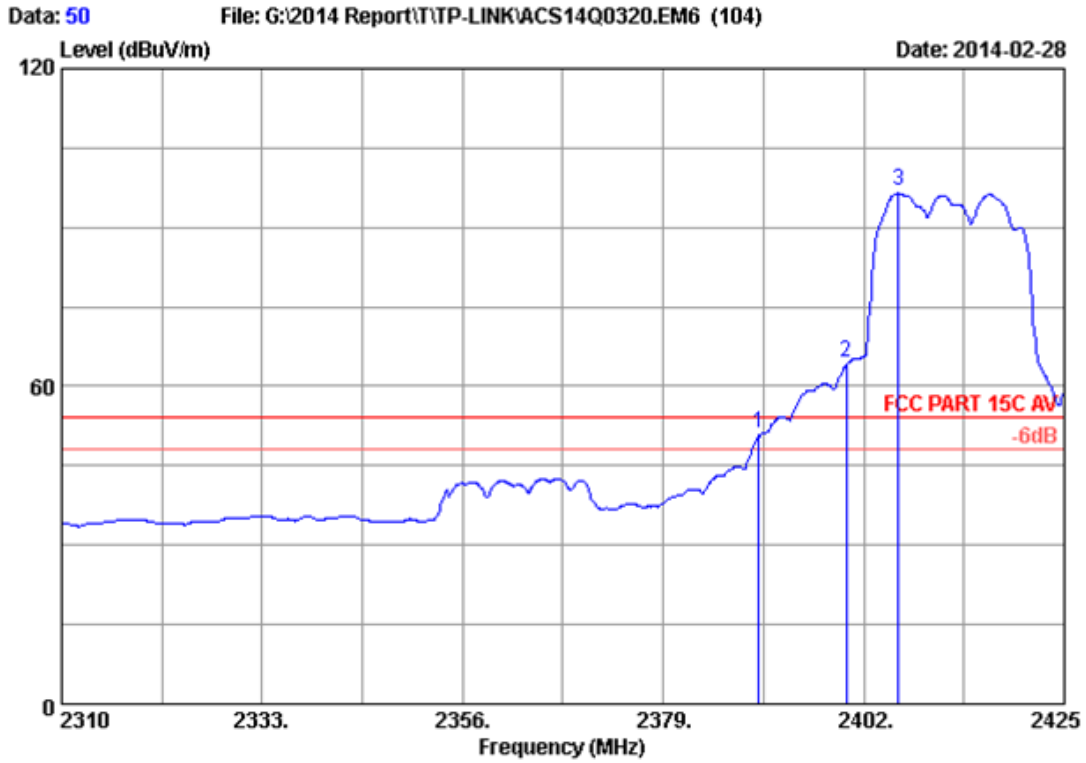
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading - Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 49  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : VERTICAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11g CH1 2412MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission			Margin (dB)	Remark
						Level (dBuV/m)	Limits (dBuV/m)			
1	2389.580	28.16	5.78	35.70	72.63	70.87	74.00	3.13	Peak	
2	2390.000	28.16	5.78	35.70	72.09	70.33	74.00	3.67	Peak	
3	2400.000	28.18	5.80	35.70	88.00	86.28	74.00	-12.28	Peak	
4	2404.645	28.19	5.80	35.70	112.02	110.31	74.00	-36.31	Peak	

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

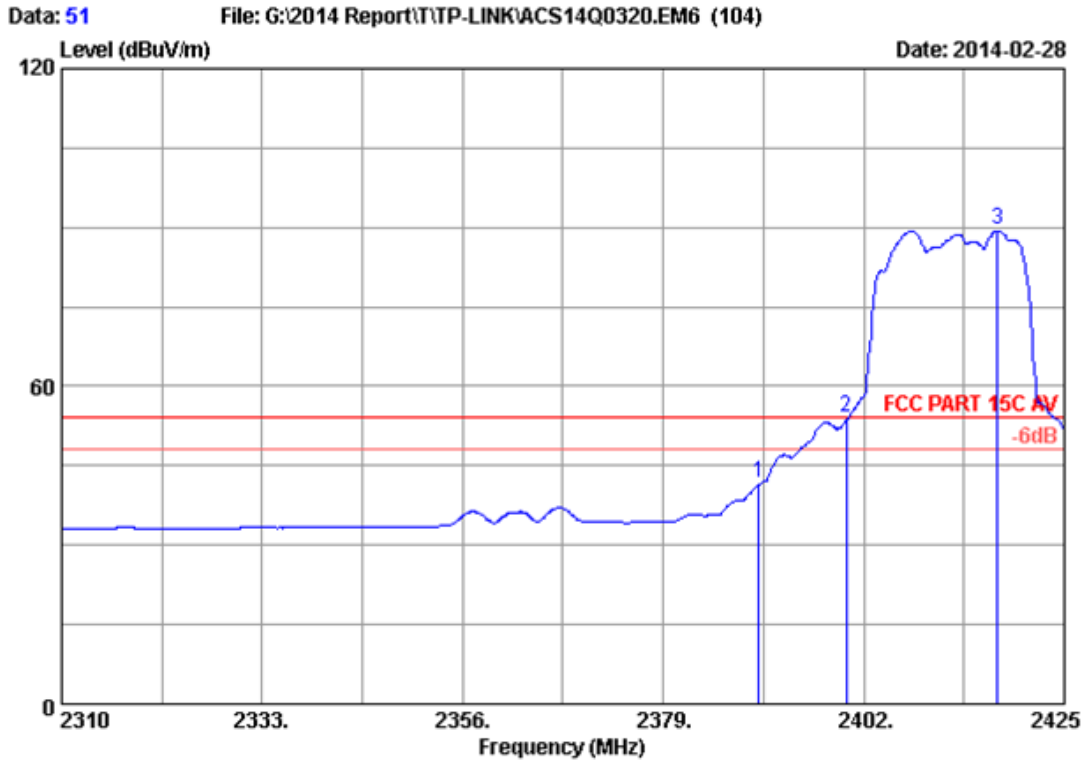


Site no. : 3m Chamber Data no. : 50  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : VERTICAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11g CH1 2412MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission			Remark
						Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	
1	2390.000	28.16	5.78	35.70	52.85	51.09	54.00	2.91	Average
2	2400.000	28.18	5.80	35.70	66.32	64.60	54.00	-10.60	Average
3	2406.025	28.19	5.81	35.70	98.50	96.80	54.00	-42.80	Average

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

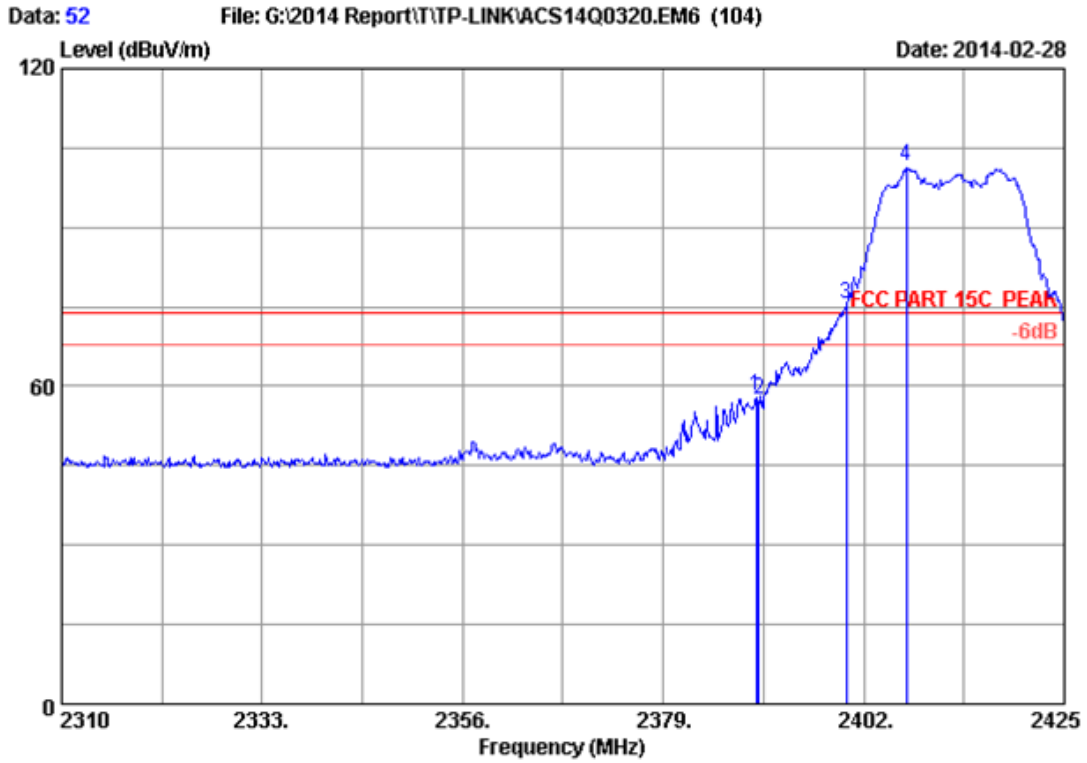




Site no. : 3m Chamber Data no. : 51  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11g CH1 2412MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission			Remark
						Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	
1	2390.000	28.16	5.78	35.70	43.68	41.92	54.00	12.08	Average
2	2400.000	28.18	5.80	35.70	55.80	54.08	54.00	-0.08	Average
3	2417.295	28.22	5.82	35.70	91.34	89.68	54.00	-35.68	Average

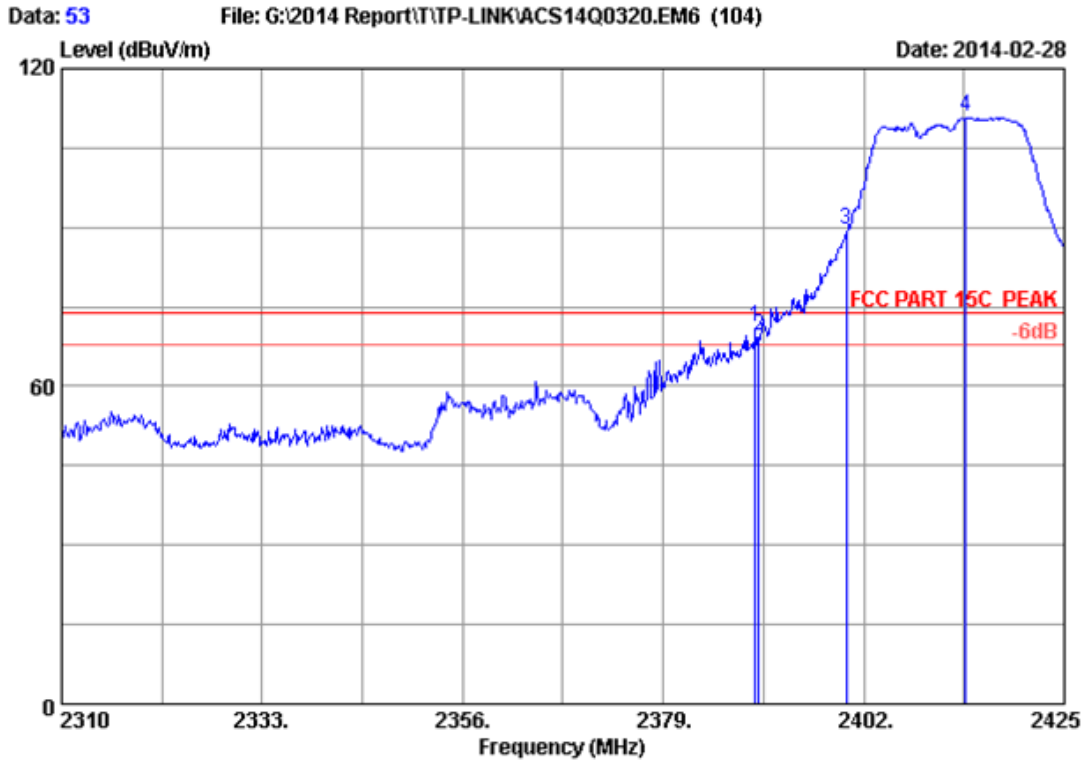
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading - Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 52  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11g CH1 2412MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission			Margin (dB)	Remark
						Level (dBuV/m)	Limits (dBuV/m)			
1	2389.695	28.16	5.78	35.70	60.00	58.24	74.00	15.76	Peak	
2	2390.000	28.16	5.78	35.70	59.31	57.55	74.00	16.45	Peak	
3	2400.000	28.18	5.80	35.70	77.24	75.52	74.00	-1.52	Peak	
4	2406.945	28.20	5.81	35.70	103.26	101.57	74.00	-27.57	Peak	

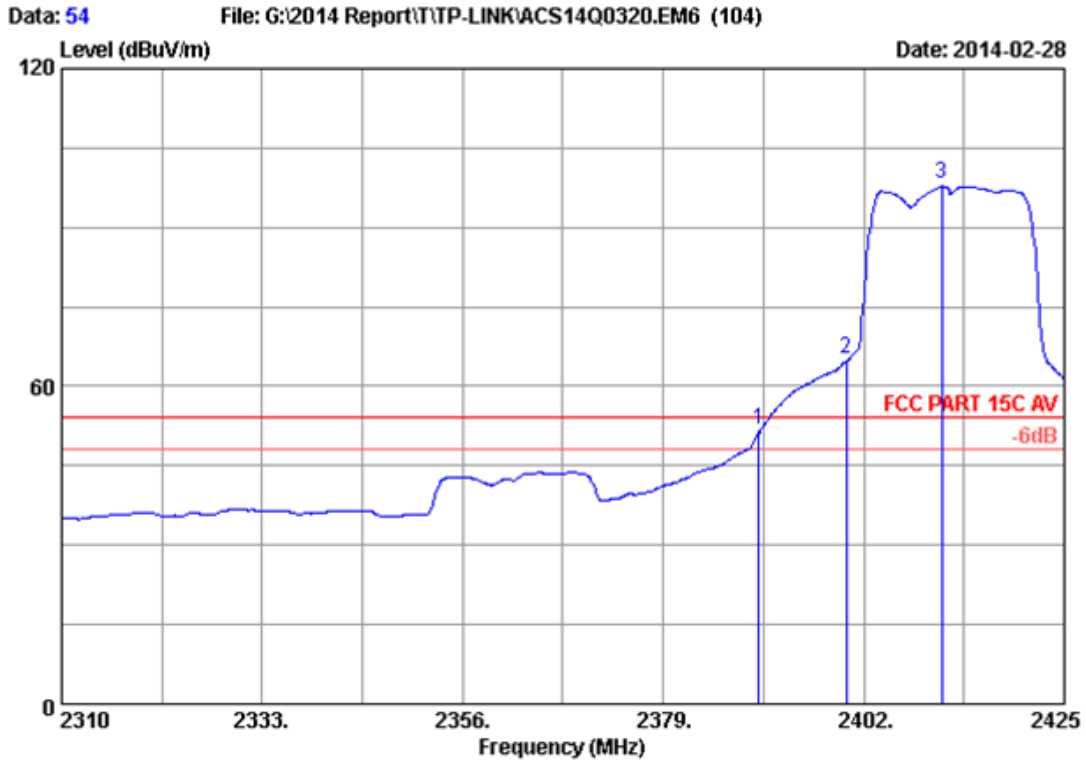
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading -Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 53  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : VERTICAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT20 CH1 2412MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission			Remark
						Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	
1	2389.580	28.16	5.78	35.70	73.10	71.34	74.00	2.66	Peak
2	2390.000	28.16	5.78	35.70	71.34	69.58	74.00	4.42	Peak
3	2400.000	28.18	5.80	35.70	91.20	89.48	74.00	-15.48	Peak
4	2413.730	28.21	5.82	35.70	112.81	111.14	74.00	-37.14	Peak

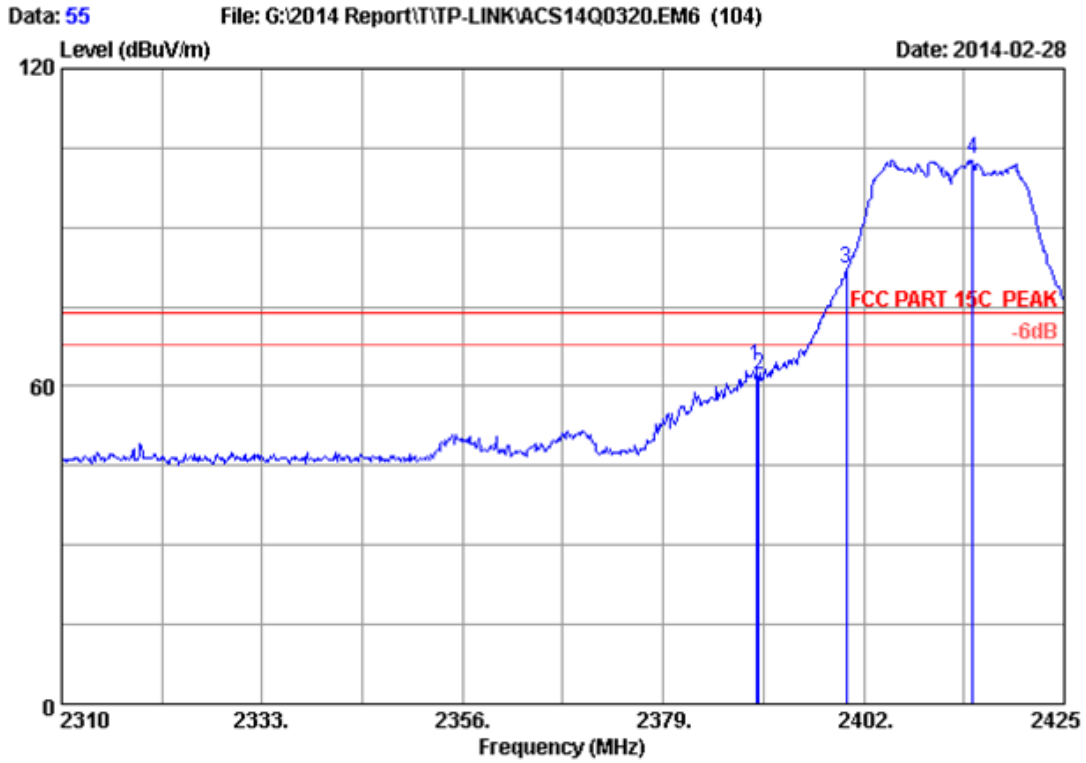
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading - Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 54  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : VERTICAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT20 CH1 2412MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2390.000	28.16	5.78	35.70	53.50	51.74	54.00	2.26	Average
2	2400.000	28.18	5.80	35.70	67.00	65.28	54.00	-11.28	Average
3	2410.970	28.20	5.81	35.70	99.80	98.11	54.00	-44.11	Average

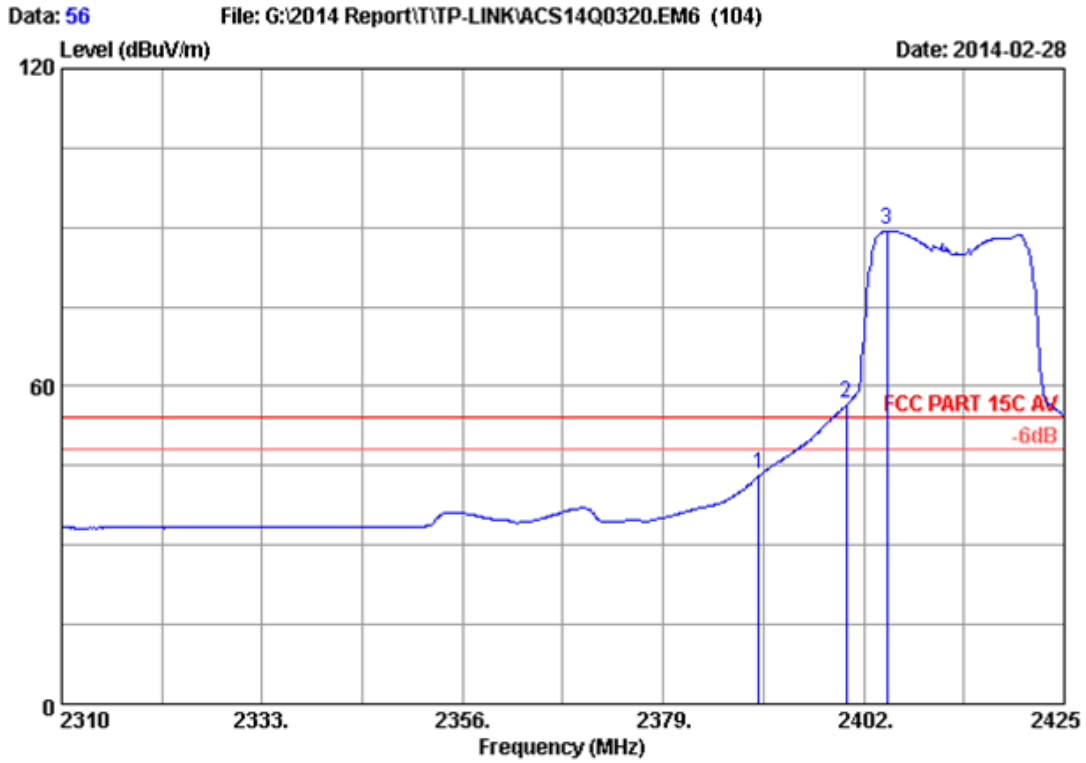
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading -Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 55  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT20 CH1 2412MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission			Remark
						Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	
1	2389.695	28.16	5.78	35.70	65.55	63.79	74.00	10.21	Peak
2	2390.000	28.16	5.78	35.70	63.80	62.04	74.00	11.96	Peak
3	2400.000	28.18	5.80	35.70	84.08	82.36	74.00	-8.36	Peak
4	2414.535	28.21	5.82	35.70	104.71	103.04	74.00	-29.04	Peak

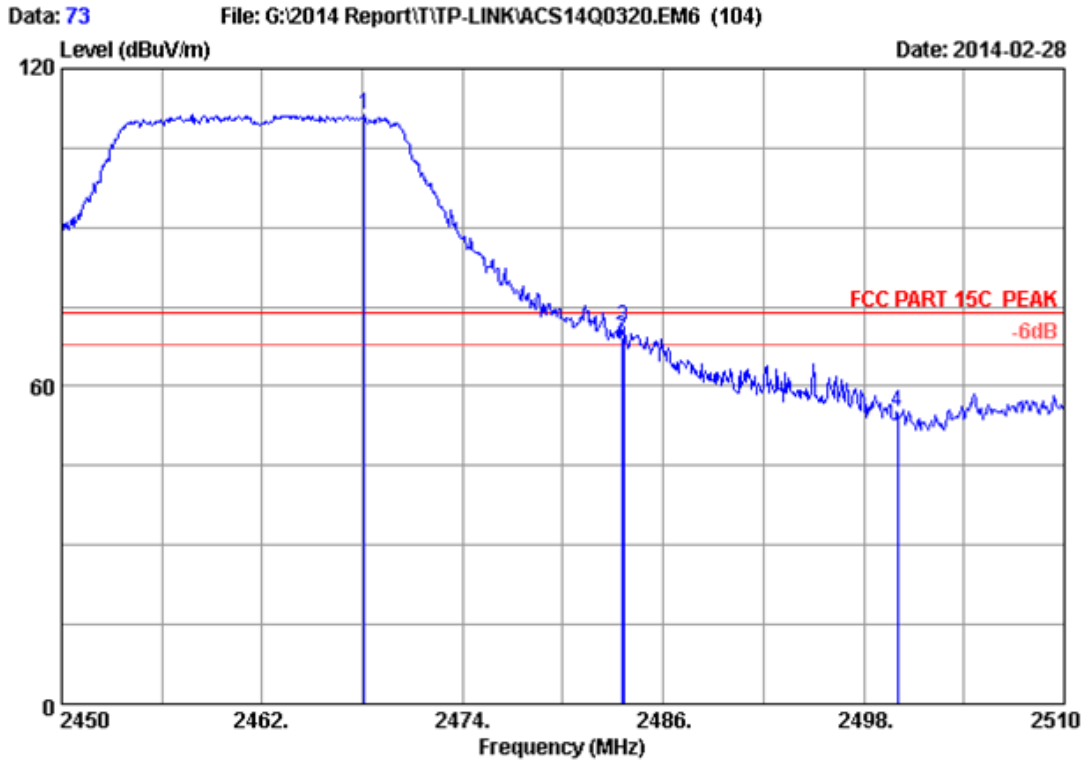
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading -Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 56  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT20 CH1 2412MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission			Remark
						Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	
1	2390.000	28.16	5.78	35.70	45.29	43.53	54.00	10.47	Average
2	2400.000	28.18	5.80	35.70	58.70	56.98	54.00	-2.98	Average
3	2404.645	28.19	5.80	35.70	91.33	89.62	54.00	-35.62	Average

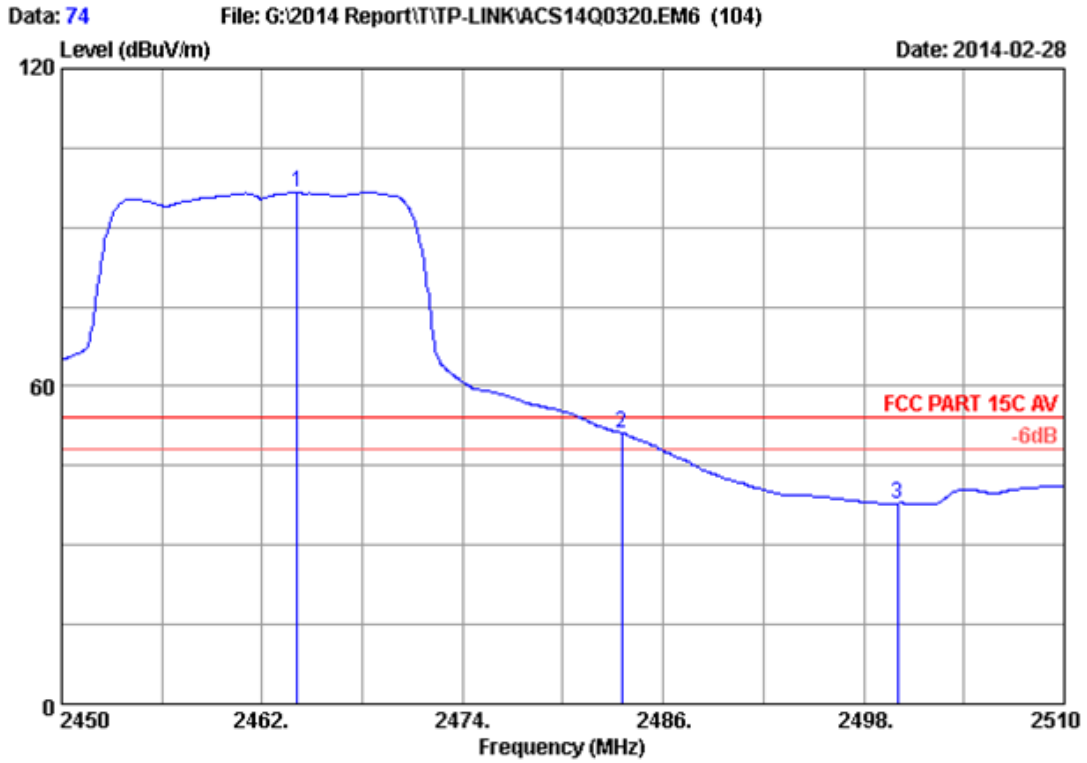
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading -Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 73  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : VERTICAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT20 CH11 2462MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2468.120	28.33	5.90	35.70	112.78	111.31	74.00	-37.31	Peak
2	2483.500	28.36	5.92	35.70	70.58	69.16	74.00	4.84	Peak
3	2483.600	28.36	5.92	35.70	72.64	71.22	74.00	2.78	Peak
4	2500.000	28.40	5.94	35.70	56.63	55.27	74.00	18.73	Peak

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

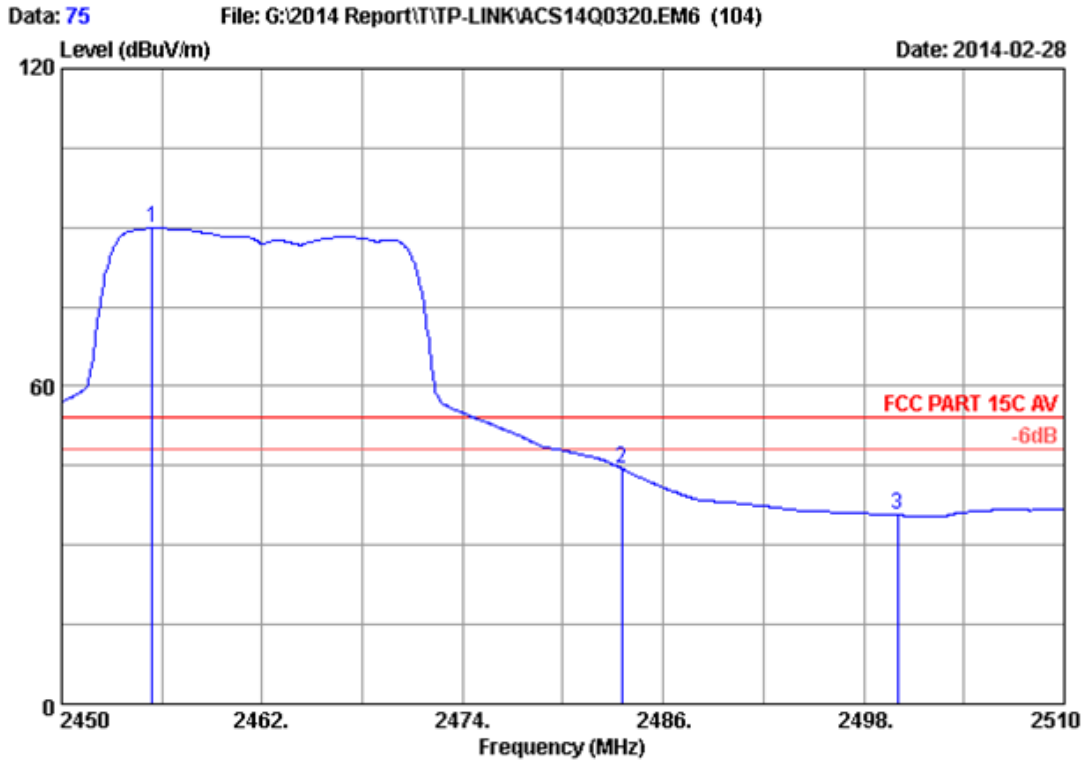


Site no. : 3m Chamber Data no. : 74  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : VERTICAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT20 CH11 2462MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2464.100	28.32	5.89	35.70	98.19	96.70	54.00	-42.70	Average
2	2483.500	28.36	5.92	35.70	52.55	51.13	54.00	2.87	Average
3	2500.000	28.40	5.94	35.70	39.24	37.88	54.00	16.12	Average

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

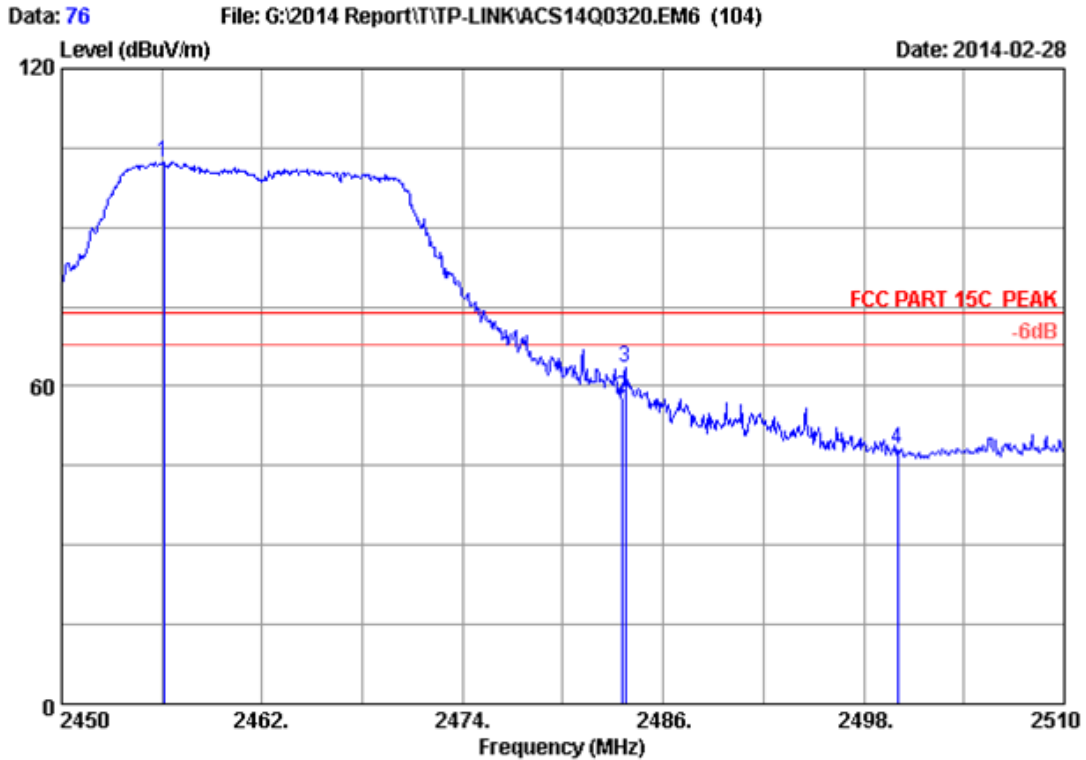




Site no. : 3m Chamber Data no. : 75  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT20 CH11 2462MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2455.400	28.30	5.88	35.70	91.53	90.01	54.00	-36.01	Average
2	2483.500	28.36	5.92	35.70	45.98	44.56	54.00	9.44	Average
3	2500.000	28.40	5.94	35.70	37.01	35.65	54.00	18.35	Average

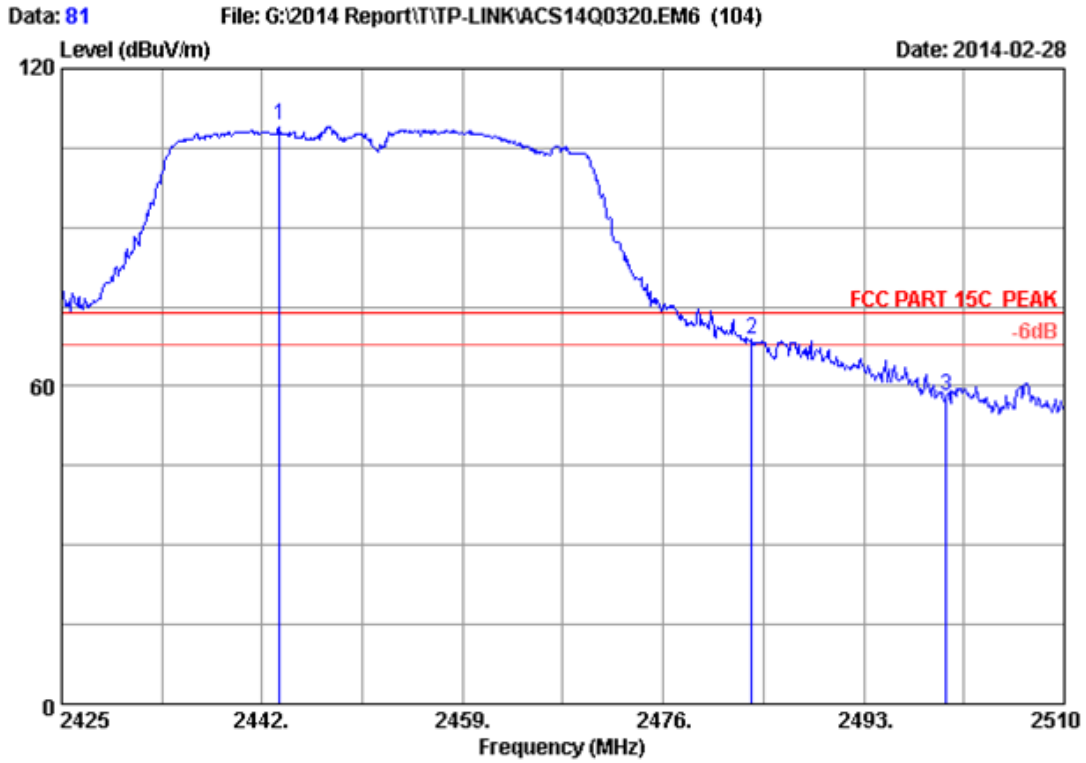
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading - Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 76  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT20 CH11 2462MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2456.120	28.30	5.88	35.70	103.94	102.42	74.00	-28.42	Peak
2	2483.500	28.36	5.92	35.70	59.40	57.98	74.00	16.02	Peak
3	2483.720	28.36	5.92	35.70	64.99	63.57	74.00	10.43	Peak
4	2500.000	28.40	5.94	35.70	49.40	48.04	74.00	25.96	Peak

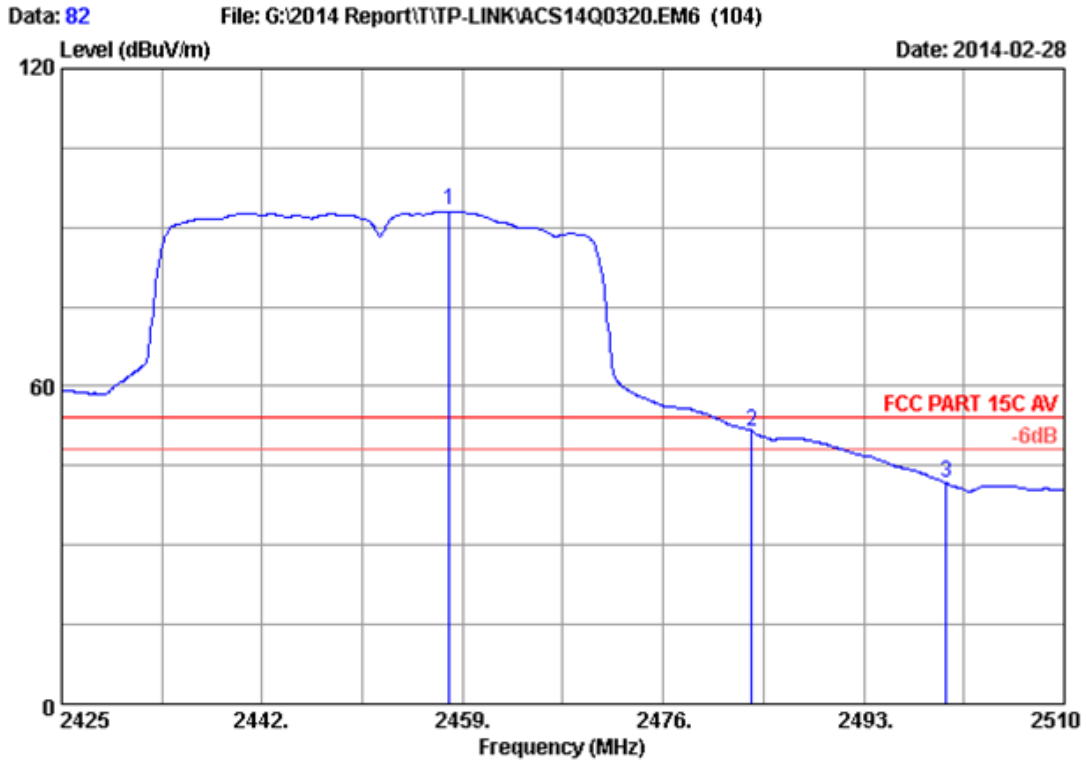
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading - Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 81  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : VERTICAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT40 CH7 2452MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2443.445	28.28	5.86	35.70	110.87	109.31	74.00	-35.31	Peak
2	2483.500	28.36	5.92	35.70	70.25	68.83	74.00	5.17	Peak
3	2500.000	28.40	5.94	35.70	59.43	58.07	74.00	15.93	Peak

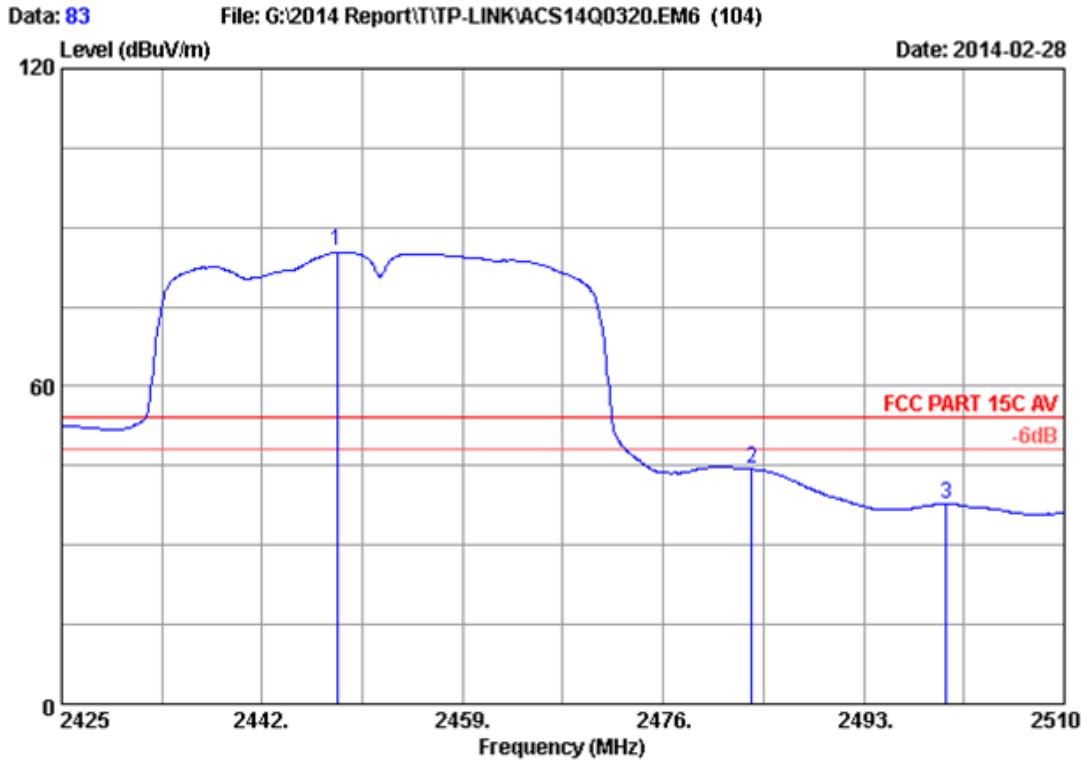
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading -Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 82  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : VERTICAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT40 CH7 2452MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2457.895	28.31	5.88	35.70	94.72	93.21	54.00	-39.21	Average
2	2483.500	28.36	5.92	35.70	53.03	51.61	54.00	2.39	Average
3	2500.000	28.40	5.94	35.70	43.12	41.76	54.00	12.24	Average

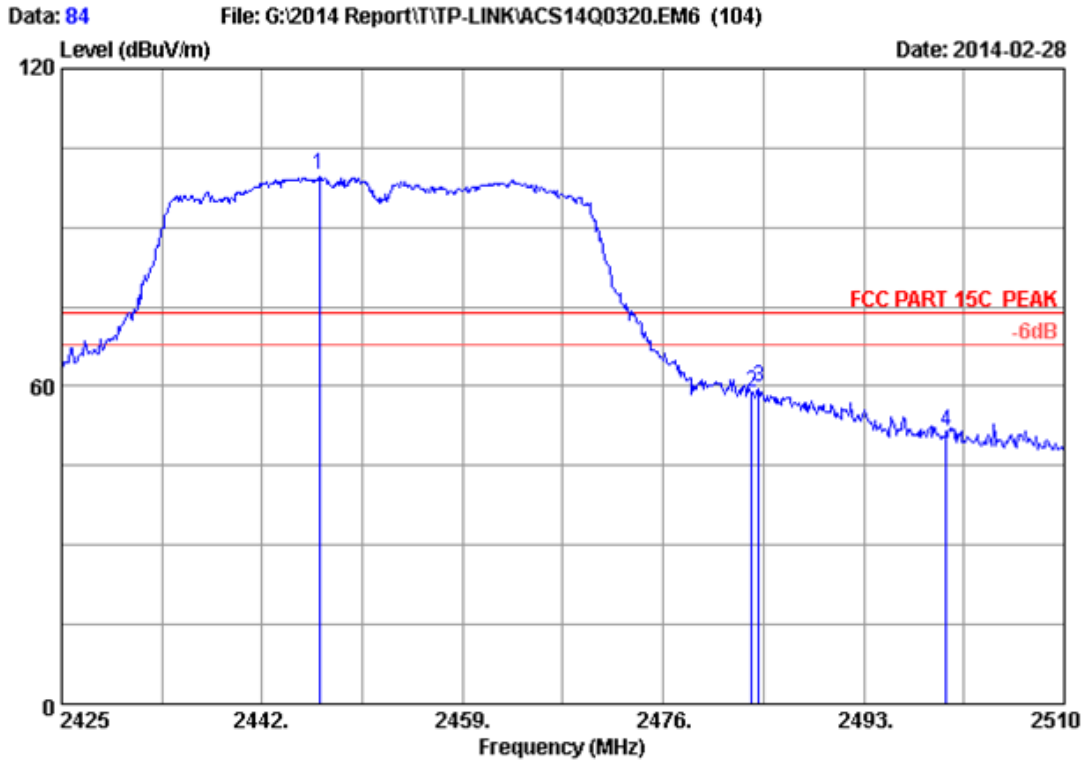
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading - Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 83  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT40 CH7 2452MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2448.375	28.29	5.87	35.70	86.96	85.42	54.00	-31.42	Average
2	2483.500	28.36	5.92	35.70	45.84	44.42	54.00	9.58	Average
3	2500.000	28.40	5.94	35.70	39.06	37.70	54.00	16.30	Average

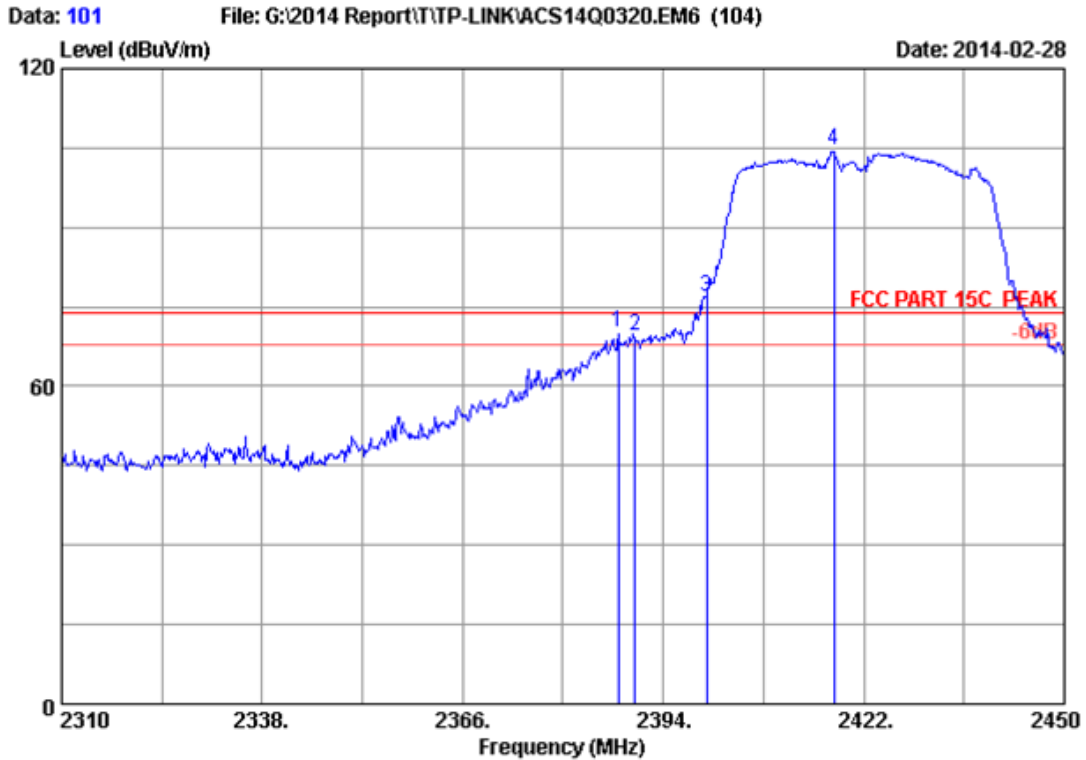
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading - Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 84  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT40 CH7 2452MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission			Margin (dB)	Remark
						Level (dBuV/m)	Limits (dBuV/m)			
1	2446.845	28.28	5.87	35.70	101.53	99.98	74.00	-25.98	Peak	
2	2483.500	28.36	5.92	35.70	60.26	58.84	74.00	15.16	Peak	
3	2484.075	28.36	5.92	35.70	61.10	59.68	74.00	14.32	Peak	
4	2500.000	28.40	5.94	35.70	52.80	51.44	74.00	22.56	Peak	

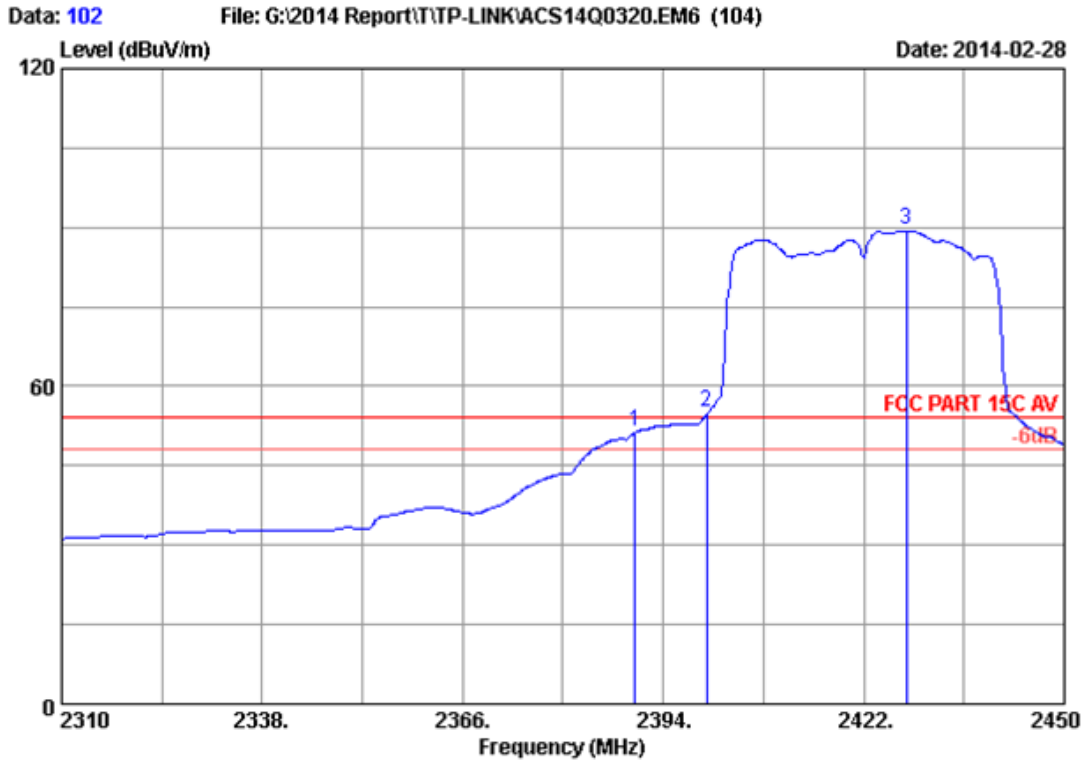
Remarks: 1. Emission Level= Antenna Factor + Cable Loss + Reading - Amp Factor  
 2. The emission levels that are 20dB below the official limit are not reported.



Site no. : 3m Chamber Data no. : 101  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : VERTICAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT40 CH1 2422MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission			Remark
						Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	
1	2387.700	28.15	5.78	35.70	71.96	70.19	74.00	3.81	Peak
2	2390.000	28.16	5.78	35.70	71.39	69.63	74.00	4.37	Peak
3	2400.000	28.18	5.80	35.70	78.69	76.97	74.00	-2.97	Peak
4	2417.800	28.22	5.82	35.70	106.31	104.65	74.00	-30.65	Peak

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

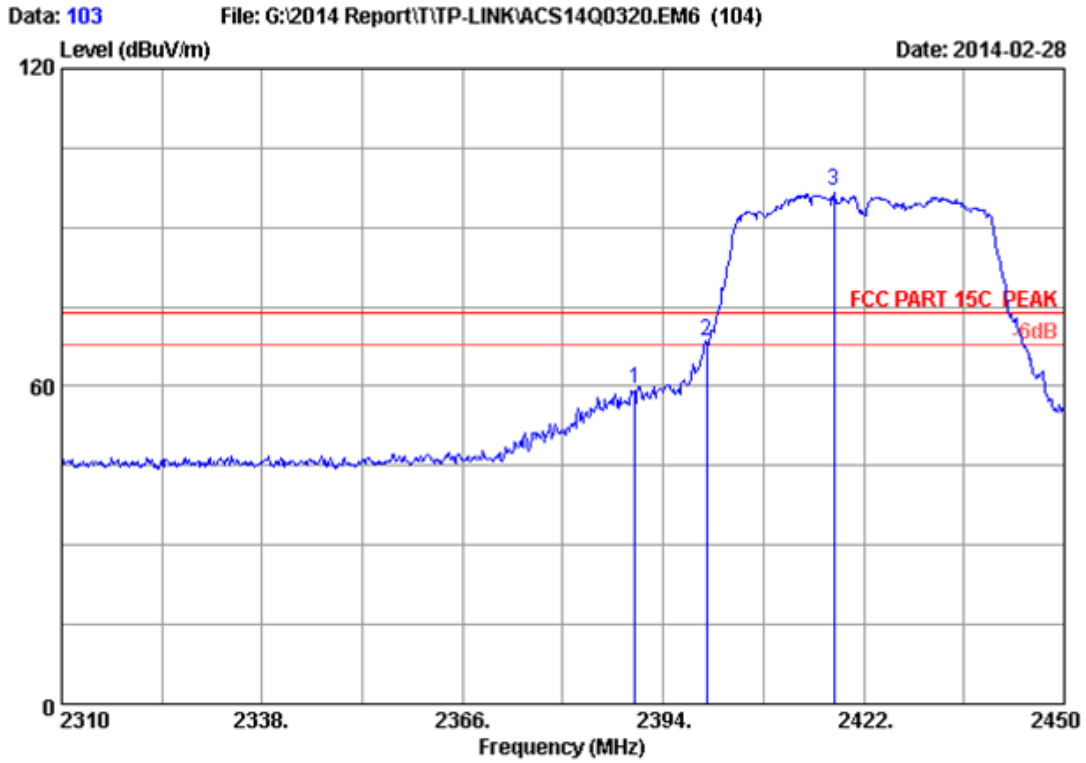


Site no. : 3m Chamber Data no. : 102  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : VERTICAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT40 CH1 2422MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2390.000	28.16	5.78	35.70	53.29	51.53	54.00	2.47	Average
2	2400.000	28.18	5.80	35.70	56.84	55.12	54.00	-1.12	Average
3	2428.020	28.24	5.84	35.70	91.31	89.69	54.00	-35.69	Average

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

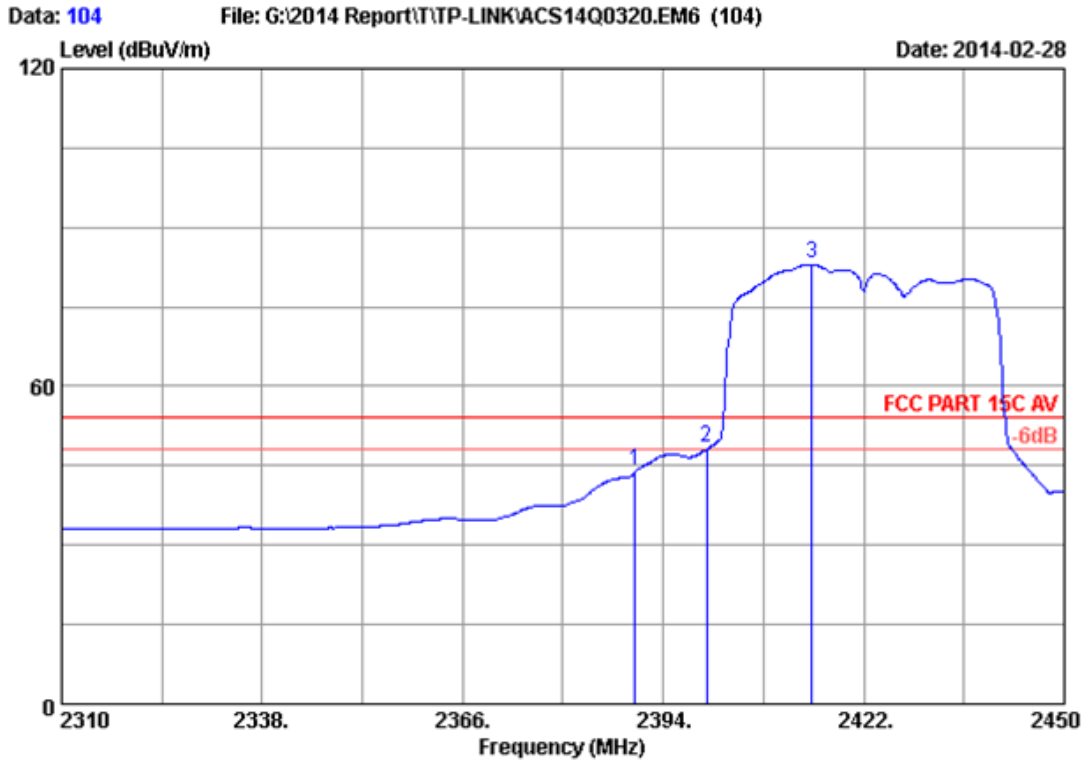




Site no. : 3m Chamber Data no. : 103  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C PEAK  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT40 CH1 2422MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2390.000	28.16	5.78	35.70	61.18	59.42	74.00	14.58	Peak
2	2400.000	28.18	5.80	35.70	70.25	68.53	74.00	5.47	Peak
3	2417.800	28.22	5.82	35.70	98.61	96.95	74.00	-22.95	Peak

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



Site no. : 3m Chamber Data no. : 104  
 Dis. / Ant. : 3m 2013 3115 (4580) Ant. pol. : HORIZONTAL  
 Limit : FCC PART 15C AV  
 Env. / Ins. : 24°C/56% Engineer : Leo-Li  
 EUT : 150Mbps Wireless N ADSL2+ Modem Router  
 Power Rating : DC 9V From Adapter input AC 120V/60Hz  
 Test Mode : IEEE802.11nHT40 CH1 2422MHz Tx  
 M/N : TD-W8151N

No.	Freq. (MHz)	Ant. Factor (dB/m)	Cable Loss (dB)	AMP factor (dB)	Reading (dBuV)	Emission Level (dBuV/m)	Limits (dBuV/m)	Margin (dB)	Remark
1	2390.000	28.16	5.78	35.70	45.78	44.02	54.00	9.98	Average
2	2400.000	28.18	5.80	35.70	50.24	48.52	54.00	5.48	Average
3	2414.720	28.21	5.82	35.70	84.93	83.26	54.00	-29.26	Average

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

## 7. 6dB Bandwidth Test

### 7.1. Test Equipment

Item	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Cal. Interval
8.	Spectrum Analyzer	Agilent	N9030A	MY51380221	Oct.31, 13	1 Year
1.	Amp	HP	8449B	3008A08495	May.08, 13	1 Year
2.	Antenna	EMCO	3115	9510-4580	May.08, 13	1 Year
3.	HF Cable	Hubersuhner	Sucoflex104	-	May.08, 13	1 Year

### 8.1. Limit

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

### 8.2. Test Procedure

The transmitter output was connected to a spectrum analyzer, The bandwidth of the fundamental frequency was measured by spectrum analyzer with 300KHz RBW and 1MHz VBW. The 6dB bandwidth is defined as the total spectrum the power of which is higher than peak power minus 6dB.

### 8.3. Test Results

EUT: 150Mbps Wireless N ADSL2+ Modem Router		
M/N: TD-W8151N		
Test date: 2014-03-05	Pressure: 101.2±1.0 kpa	Humidity: 51.7±3.0%
Tested by: Kevin_Hu	Test site: RF Site	Temperature: 21.6±0.6°C

Cable loss: 1 dB		Attenuator loss: 20 dB	
Test Mode	CH	-6dB bandwidth ( MHz )	Limit (KHz)
11b	CH1	10.18	>500
	CH6	10.18	>500
	CH11	10.19	>500
11g	CH1	16.65	>500
	CH6	16.65	>500
	CH11	16.55	>500
11n HT20	CH1	17.54	>500
	CH6	17.59	>500
	CH11	17.58	>500
11n HT40	CH1	36.61	>500
	CH4	36.69	>500
	CH7	36.64	>500

Conclusion : PASS

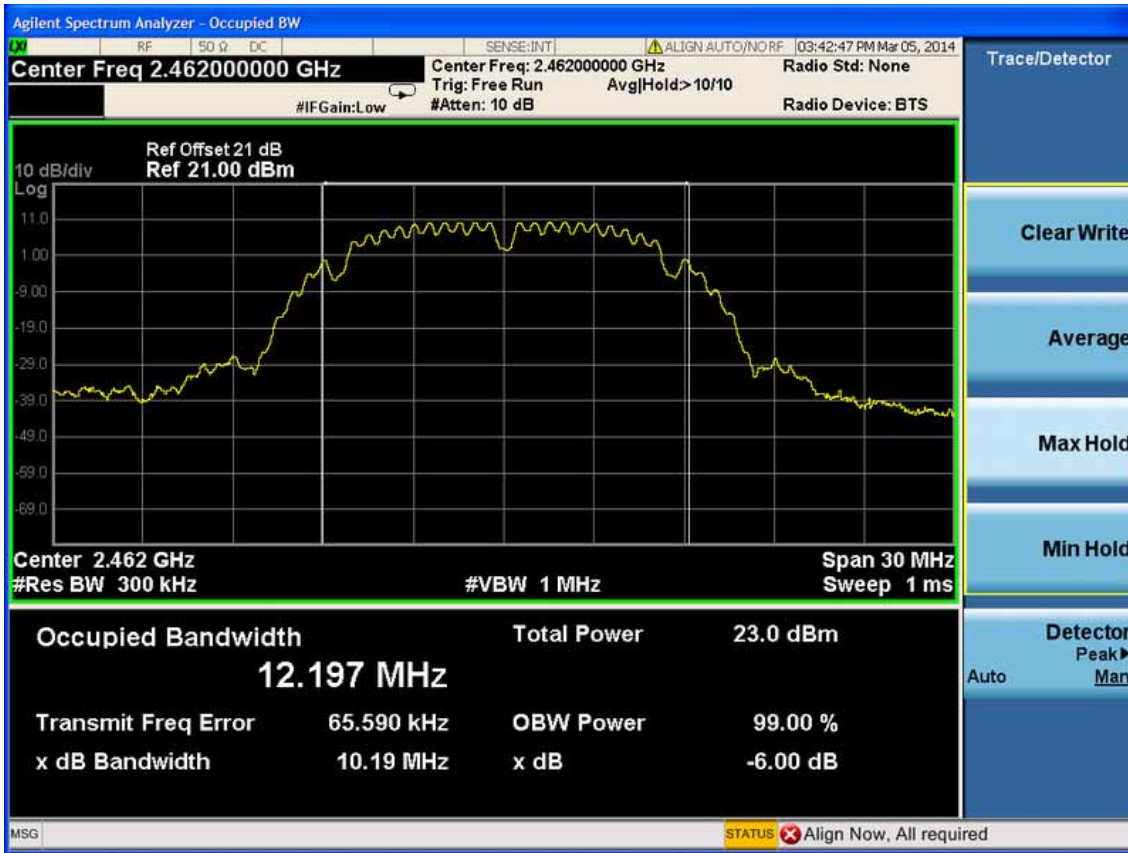
Test Mode: IEEE 802.11b TX  
 Test CH1: 2412MHz



Test CH6: 2437MHz

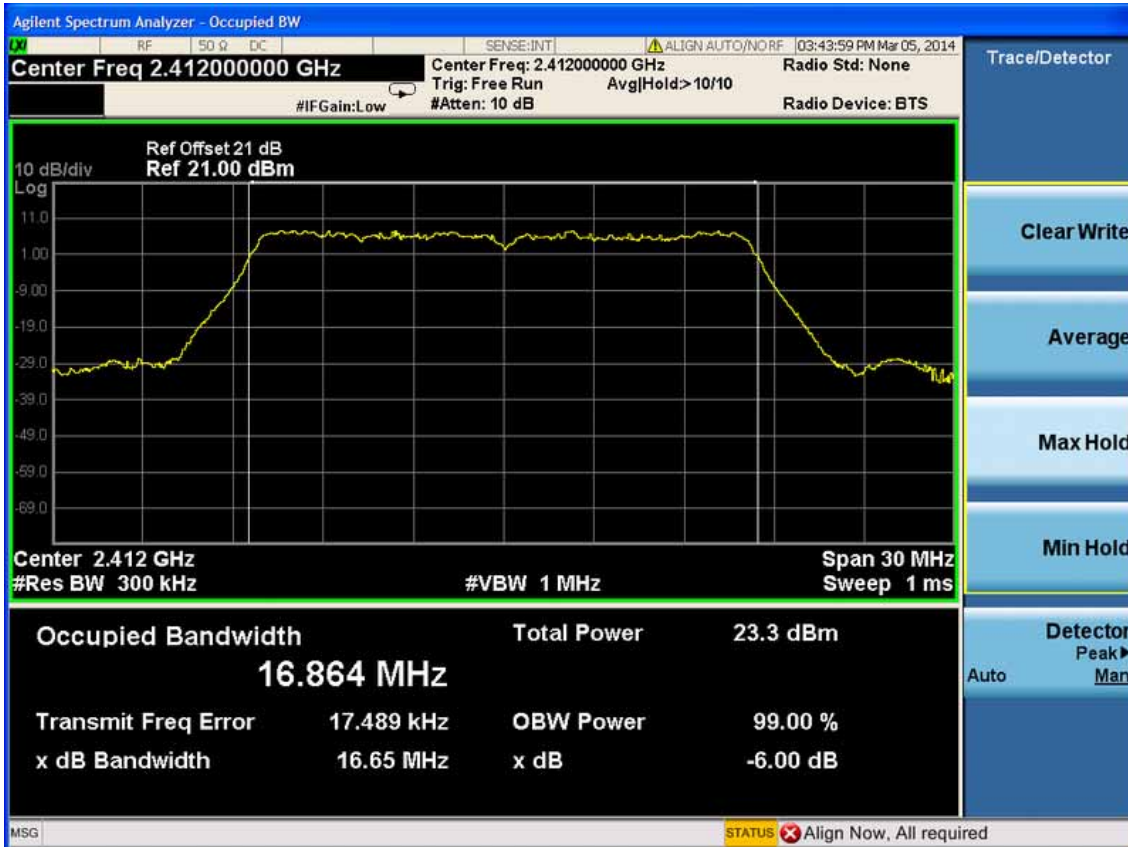


Test CH11: 2462MHz

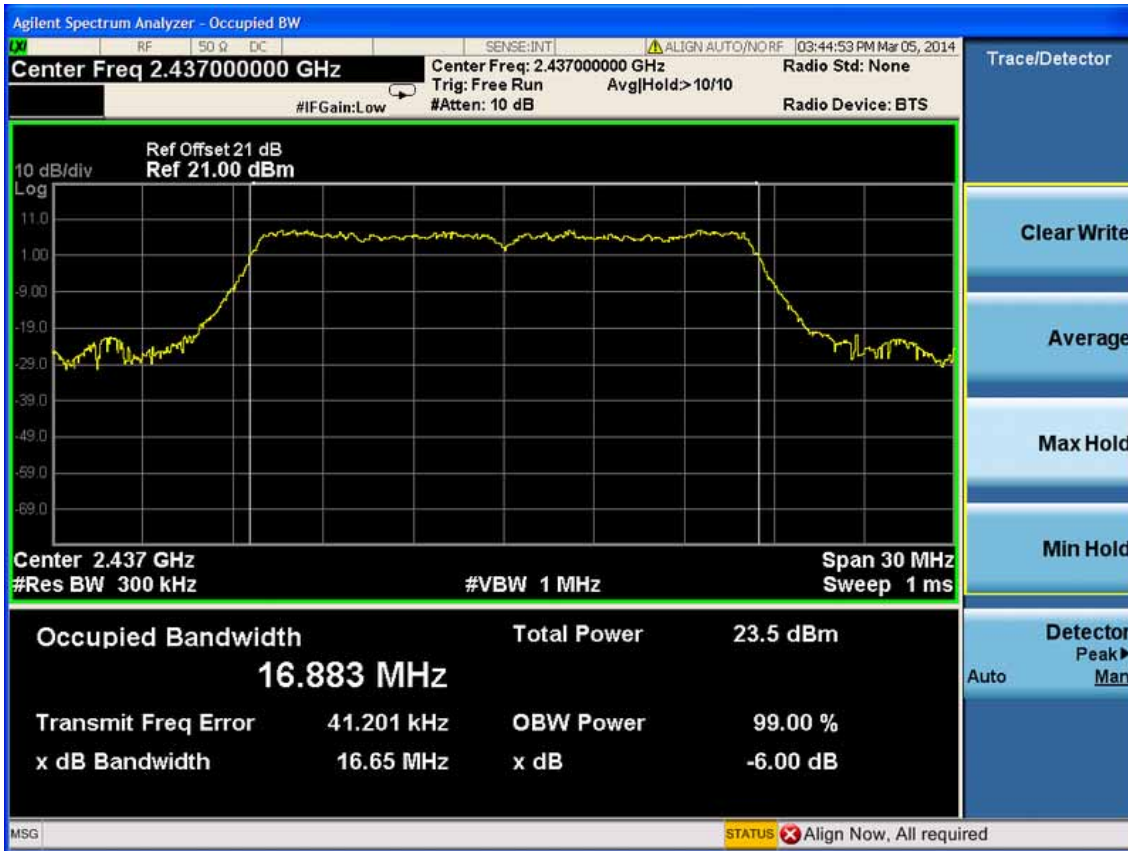


Test Mode: IEEE 802.11g TX

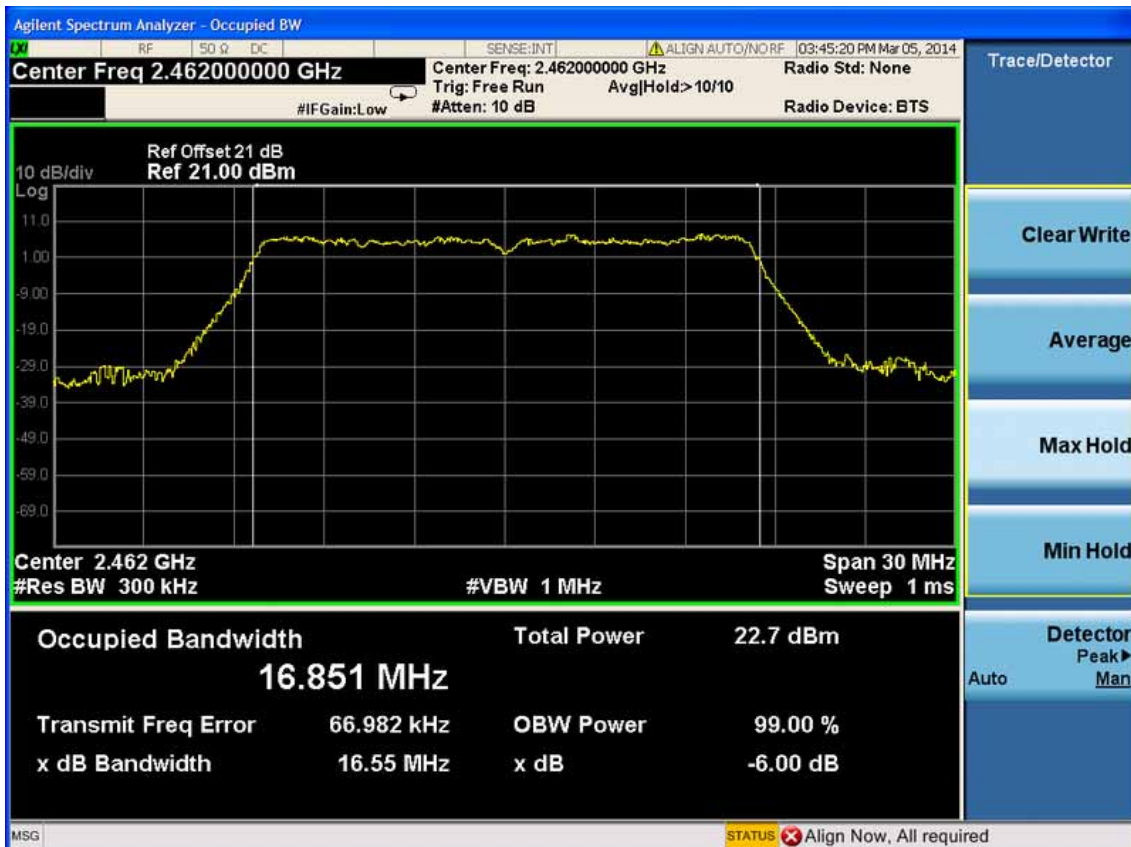
Test CH1: 2412MHz



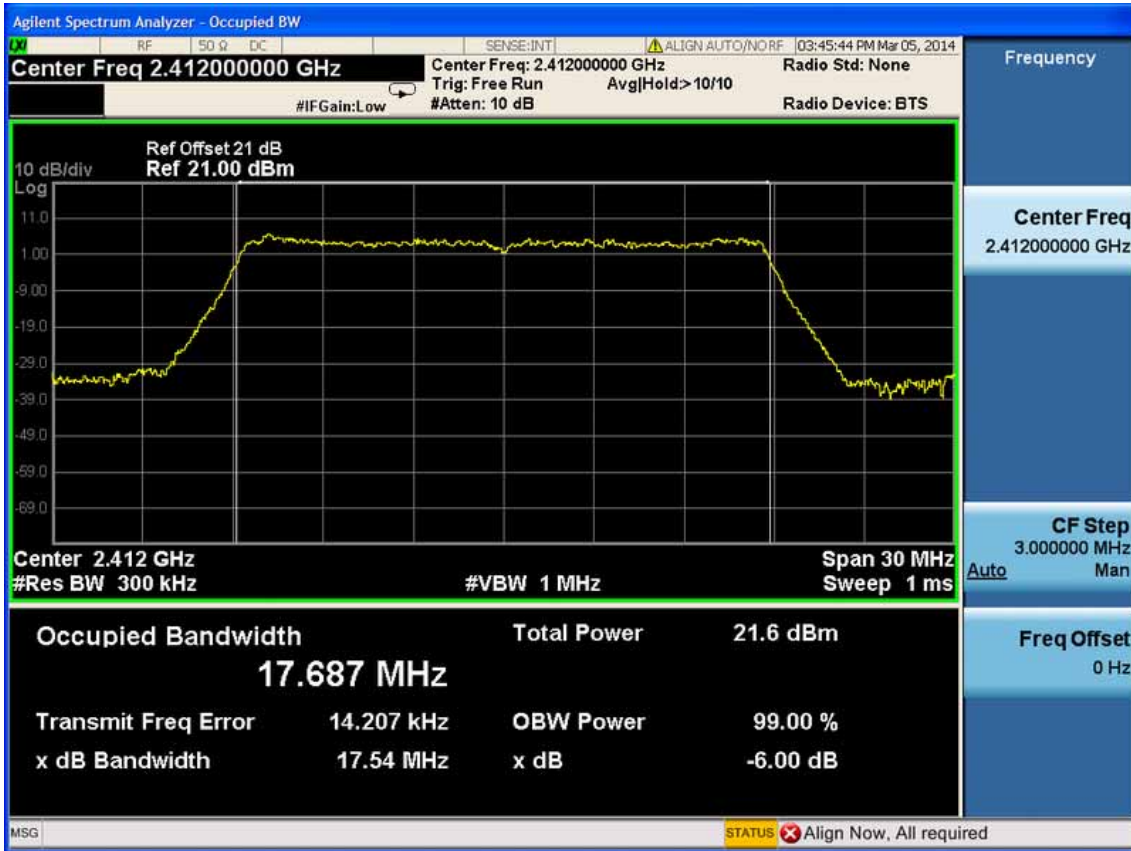
Test CH6: 2437MHz



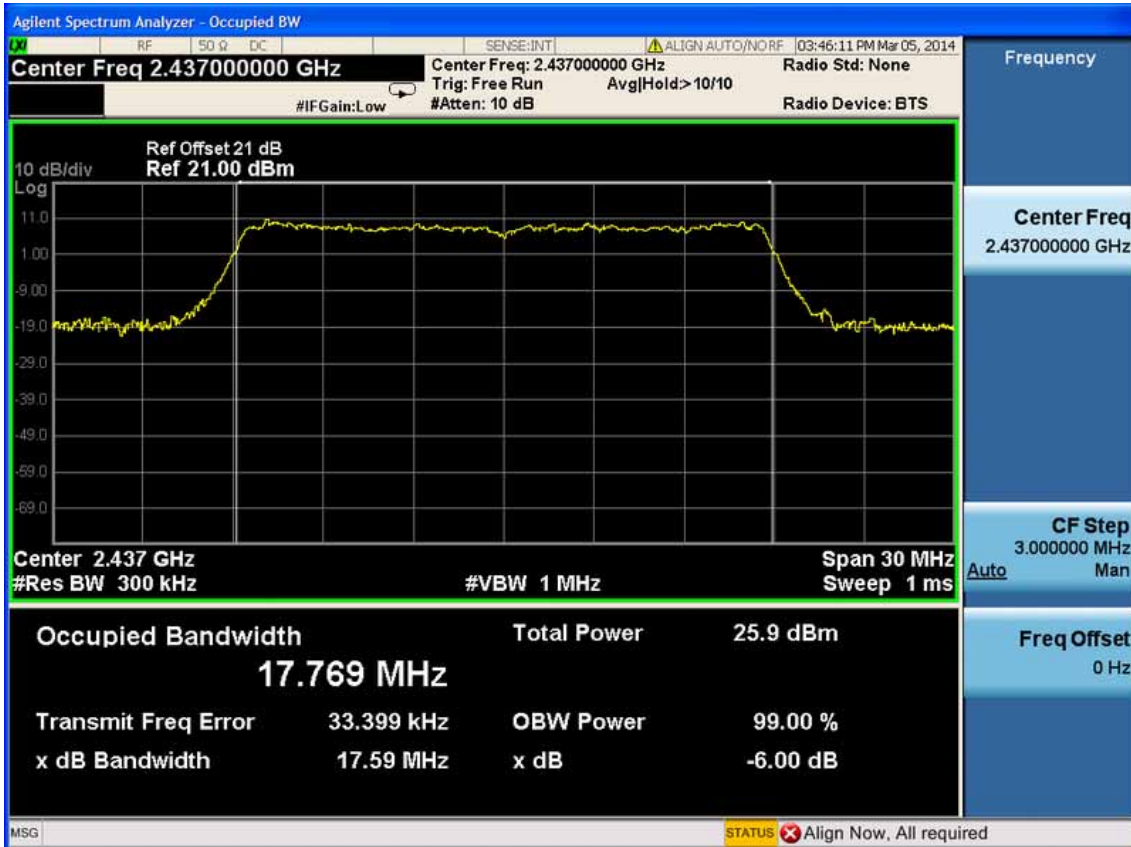
Test CH11: 2462MHz



Test Mode: IEEE 802.11n HT20 TX  
 Test CH1: 2412MHz



Test CH6: 2437MHz



Test CH11: 2462MHz



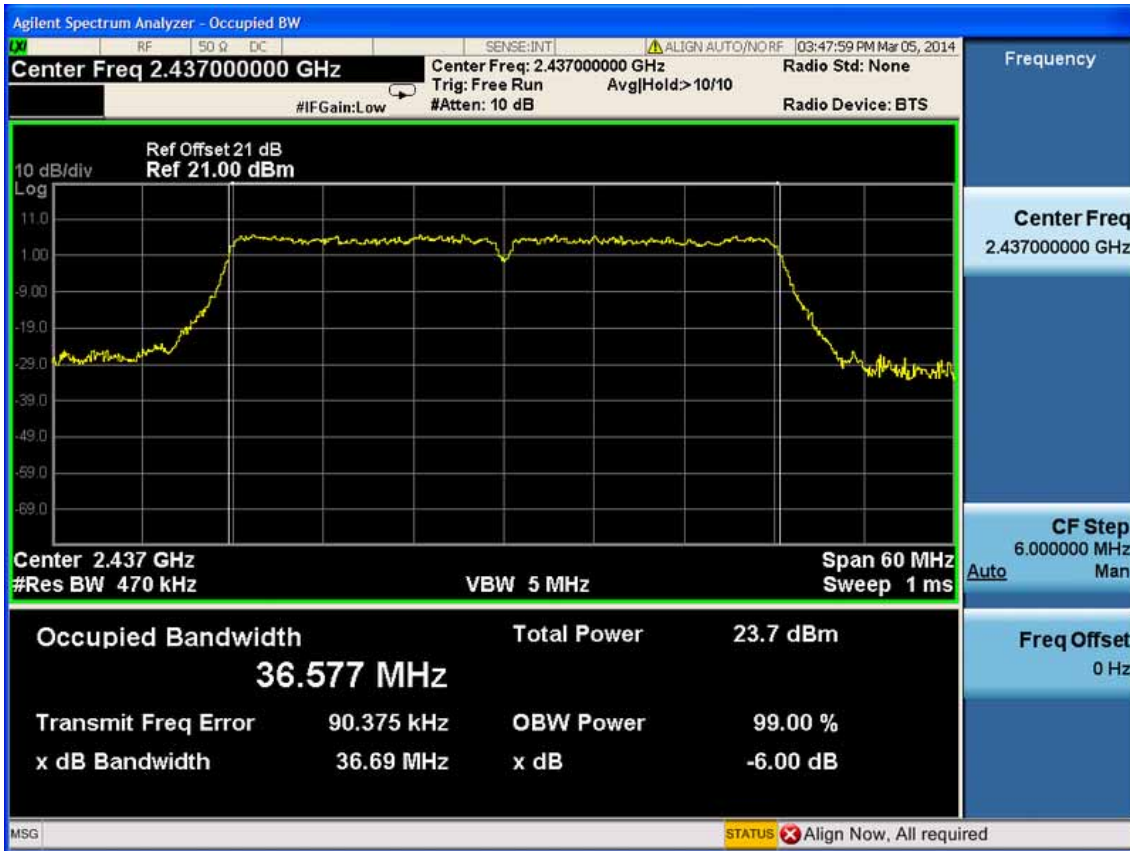
Test Mode: IEEE 802.11n HT40 TX

Test CH1: 2422MHz

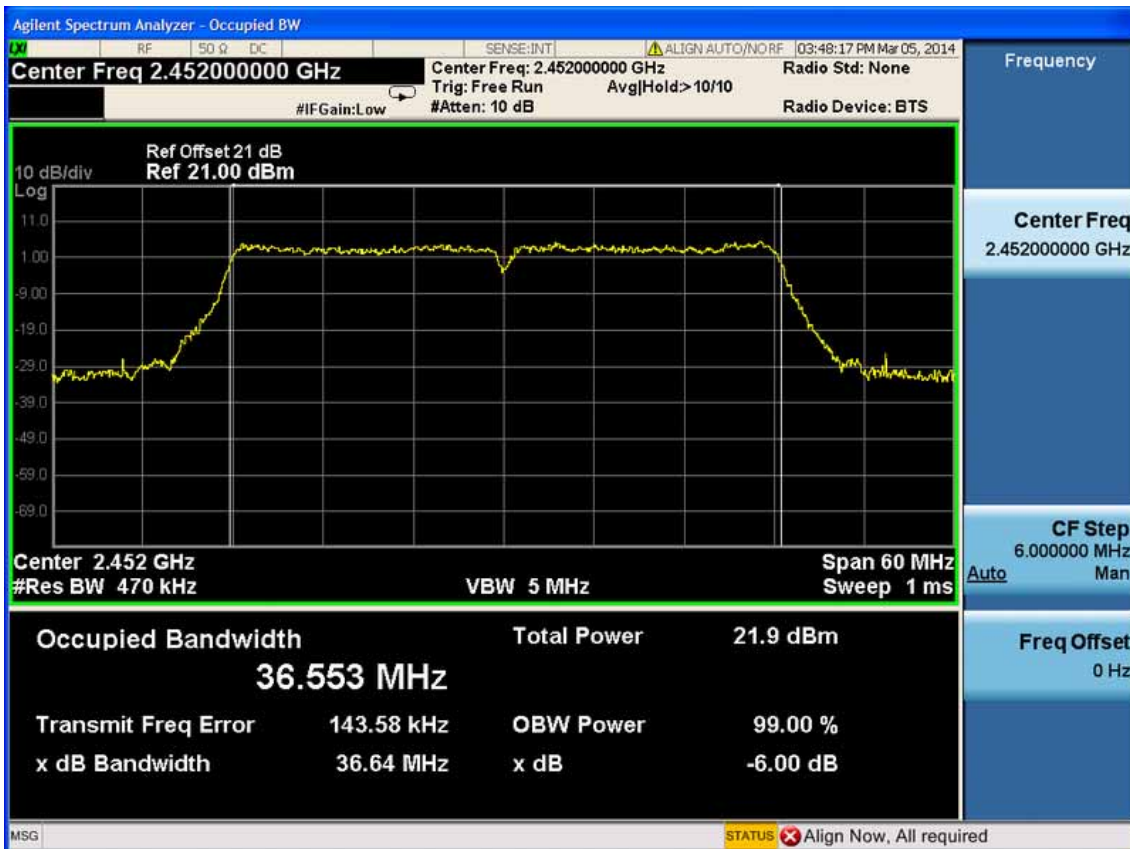




Test CH4: 2437MHz



Test CH7: 2452MHz



## 9. OUTPUT POWER TEST

### 9.1. Test Equipment

Item	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Cal. Interval
1.	Spectrum Analyzer	Agilent	N9030A	MY51380221	Oct.31, 13	1Year
2.	Spectrum	Agilent	N9030A	MY51380221	Oct.31, 13	1Year
3.	Power meter	Anritsu	ML2487A	6K00002472	May.08, 13	1Year
4.	Power sensor	Anritsu	MA2491A	0033005	May.08, 13	1Year
5.	Attenuator(20dB)	Agilent	8491B	MY39262165	May.08, 13	1 Year
6.	RF Cable	Hubersuhner	SUCOFLEX102	28620/2	May.08, 13	1 Year

### 9.2. Limit (FCC Part 15C 15.247 b(3))

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

### 9.3. Test Procedure

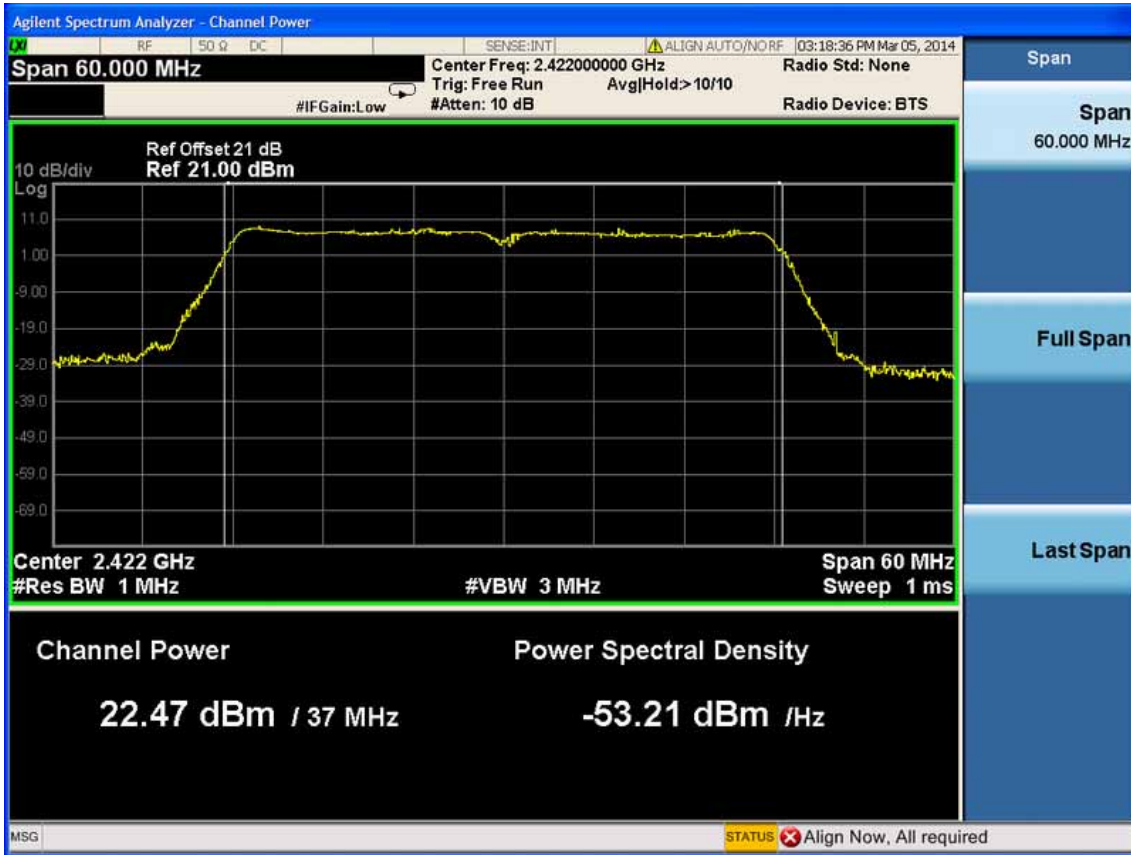
- 1, Connected the EUT's antenna port to measure device by 26dB attenuator.
- 2, For IEEE 802.11b/g and IEEE802.11n HT20 mode, use a PK power meter which's bandwidth is 20MHz and above 26dB bandwidth of signal to measure out each test modes' PK output power.
- 3, For IEEE802.11n HT40 mode, because the signal's bandwidth is about 40MHz and above 20MHz bandwidth of power sensor ML2491A. So used the test method per KDB558074.
  - 1) Set the RBW=1MHz and VBW =3MHz
  - 2) Set the span to a value that is 5-30% greater than EBW
  - 3) Detector = peak
  - 4) Sweep time = auto couple
  - 5) Trace Mode = max hold
  - 6) allow trace to fully stabilize
  - 7) use the spectrum analyzer's integrated band power measurement function with band limits set equal to the EBW band edges.

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

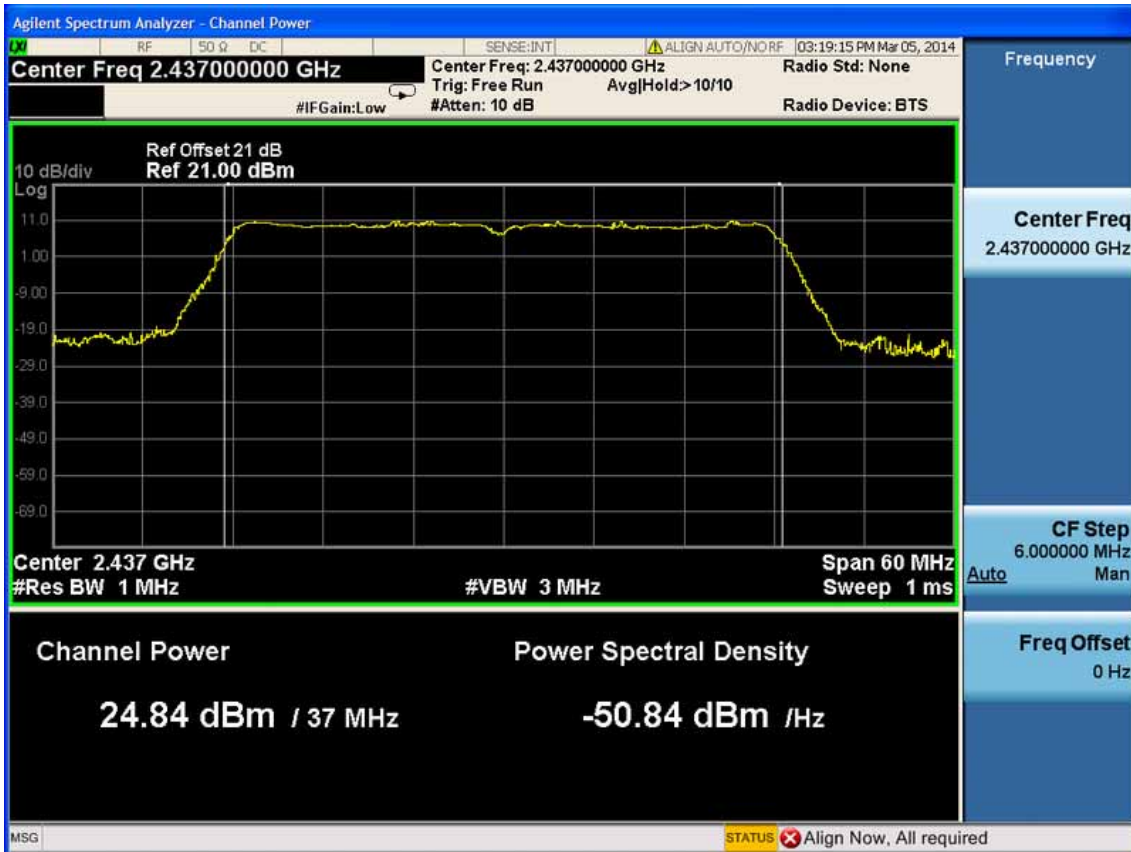
**9.4. Test Results**

EUT: 150Mbps Wireless N ADSL2+ Modem Router			
M/N: TD-W8151N			
Test date: 2014-03-05		Pressure: 101.3±1.0 kpa	Humidity: 49.4±3.0%
Tested by: Kevin_Hu		Test site: RF site	Temperature:20.9±0.6 °C
Cable loss: 1 dB		Attenuator loss: 20 dB	
Test Mode	CH	Peak output Power (dBm)	Limit (dBm)
11b	CH1	23.30	30
	CH6	23.72	30
	CH11	23.34	30
11g	CH1	24.40	30
	CH6	25.43	30
	CH11	24.40	30
11n HT20	CH1	22.65	30
	CH6	26.70	30
	CH11	21.37	30
11n HT40	CH1	22.47	30
	CH4	24.84	30
	CH7	22.98	30
Conclusion: PASS			

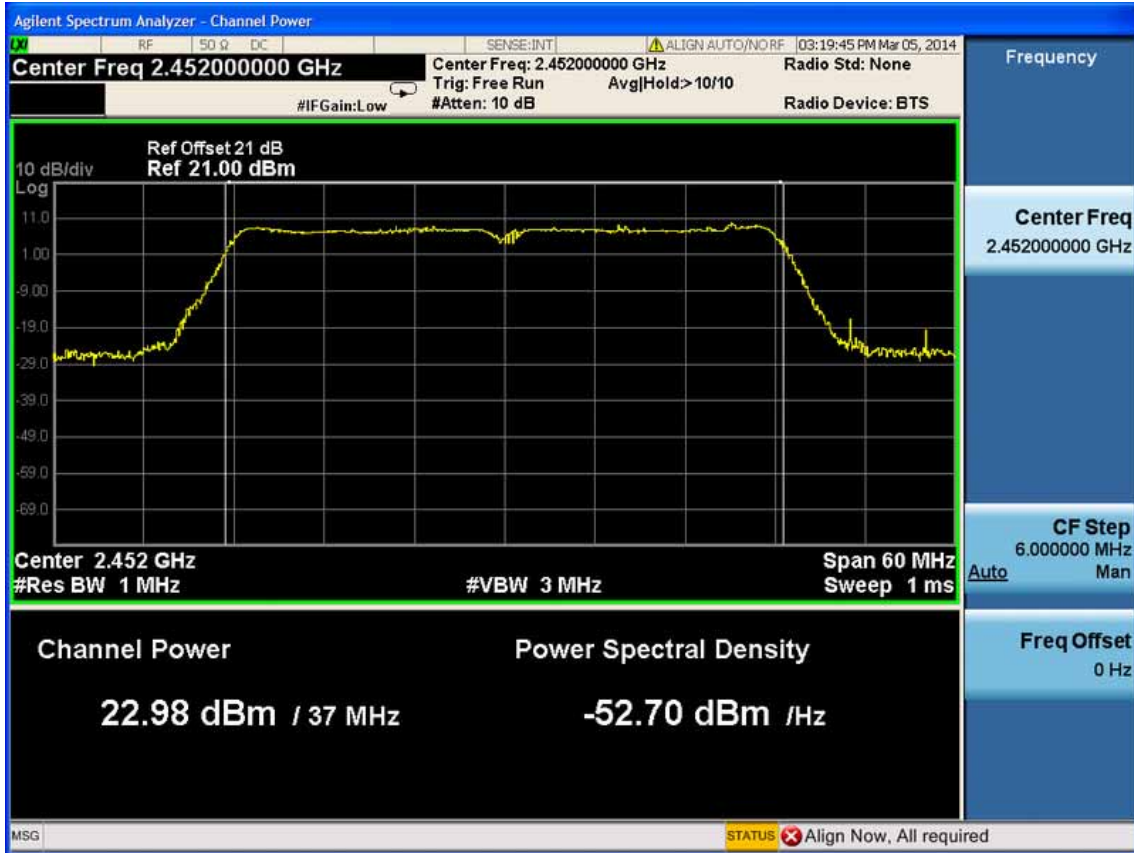
Test Mode: IEEE 802.11n HT40  
 Test CH1: 2422MHz



Test CH4: 2437MHz



Test CH7: 2452MHz



## 10. POWER SPECTRAL DENSITY TEST

### 10.1. Test Equipment

Item	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Cal. Interval
1.	Spectrum Analyzer	Agilent	N9030A	MY51380221	Oct.31, 13	1 Year
2.	Amp	HP	8449B	3008A08495	May.08, 13	1 Year
3.	Antenna	EMCO	3115	9607-4580	Aug.28, 13	1 Year
4.	HF Cable	Hubersuhne	Sucoflex104	-	May.08, 13	1 Year

### 10.2. 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.

### 10.3. Test Procedure

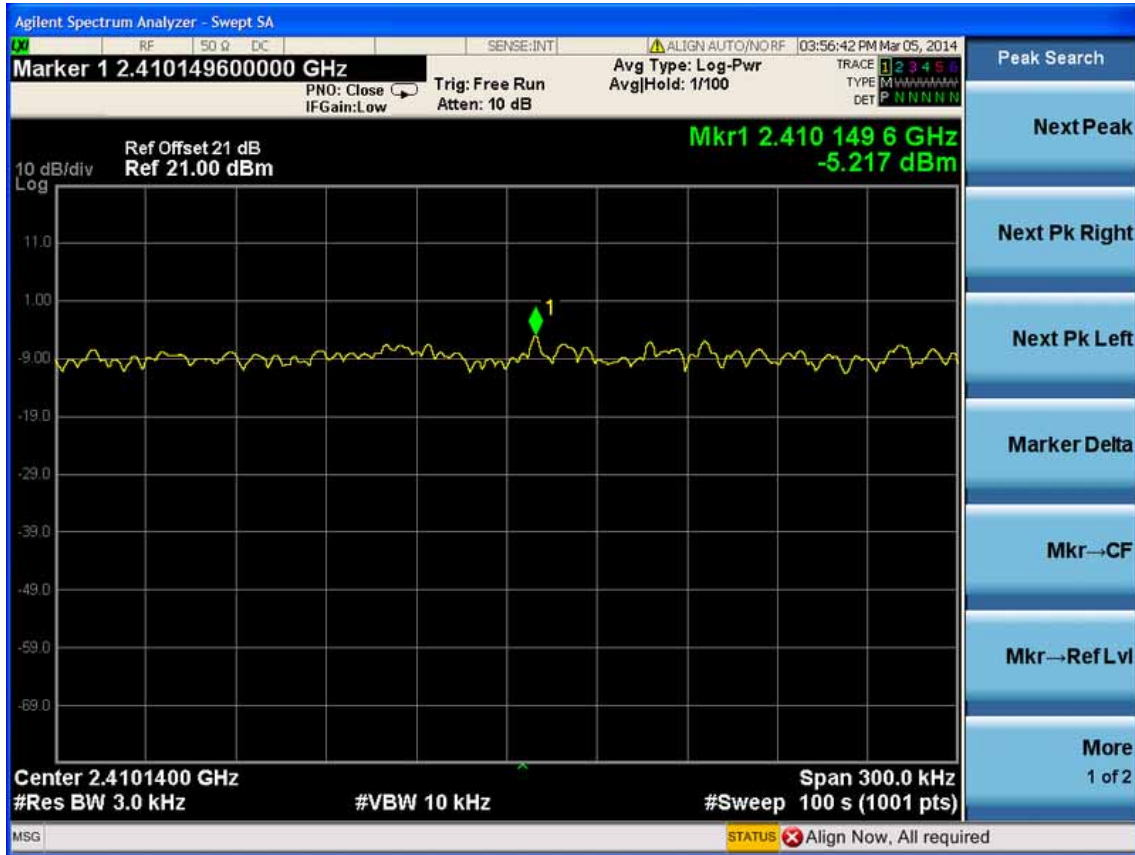
1. Connected the EUT's antenna port to spectrum analyzer device by 20dB attenuator.
2. Set the test frequency as center frequency, Set RBW=3KHz, VBW=10KHz, Span large enough capture the entire frequency, Read out maximum peak level frequency
3. Set the frequency read from produce 2 as center frequency, then set the span=300KHz, Sweep time=Span/RBW, Then Max hold, read out each mode and each chain's Power density.

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

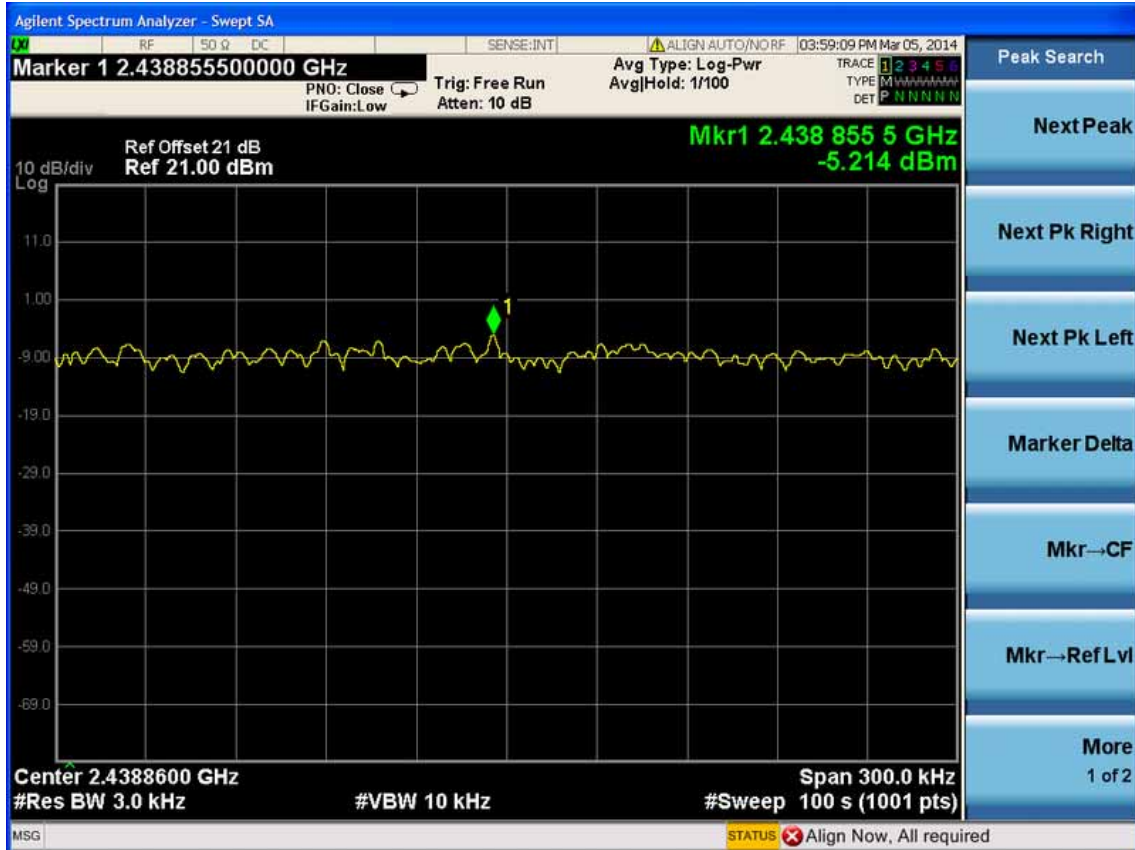
10.4.Test Results

EUT: 150Mbps Wireless N ADSL2+ Modem Router			
M/N: TD-W8151N			
Test date: 2014-03-05		Pressure: 101.3±1.0 kpa	Humidity: 49.4±3.0%
Tested by: Leo-Li		Test site: RF site	Temperature:20.9±0.6 °C
Cable loss: 1 dB		Attenuator loss: 20 dB	
Test Mode	CH	Power density ( dBm/3KHz )	Limit ( dBm/3KHz )
		ANT0	
11b	CH1	-5.217	8
	CH6	-5.214	8
	CH11	-5.502	8
11g	CH1	-8.934	8
	CH6	-6.893	8
	CH11	-10.734	8
11n HT20	CH1	-12.383	8
	CH6	-7.964	8
	CH11	-12.651	8
11n HT40	CH1	-14.533	8
	CH4	-12.852	8
	CH7	-13.494	8
Conclusion: PASS			

Test Mode: IEEE 802.11b TX  
Test CH1: 2412MHz



Test CH6: 2437MHz





Test CH11: 2462MHz

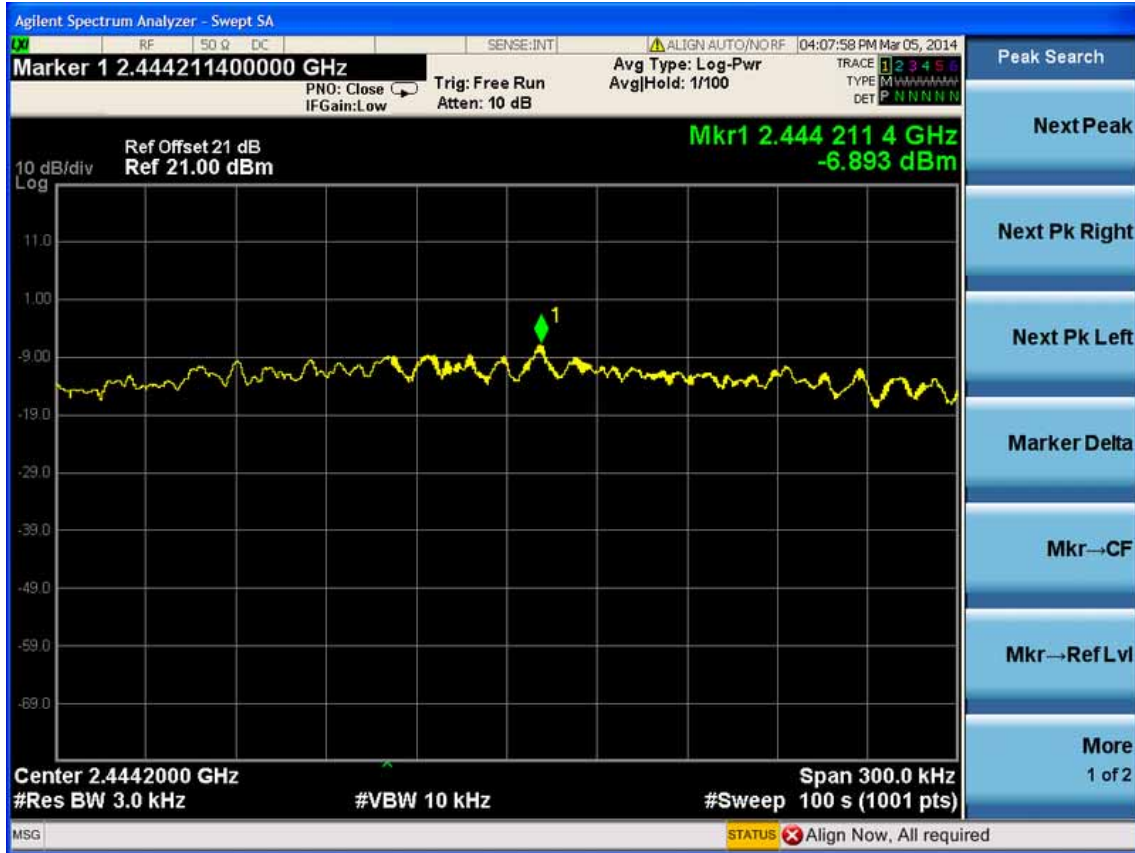


Test Mode: IEEE 802.11g TX

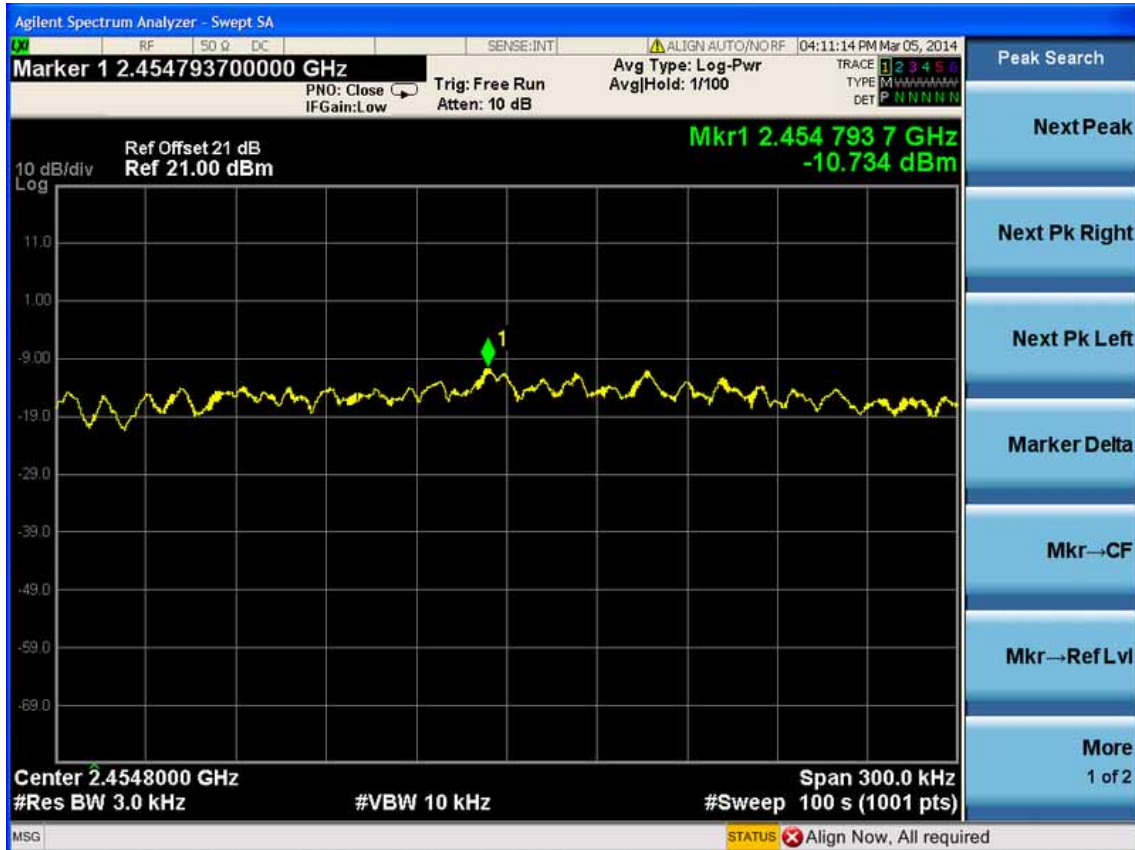
Test CH1: 2412MHz



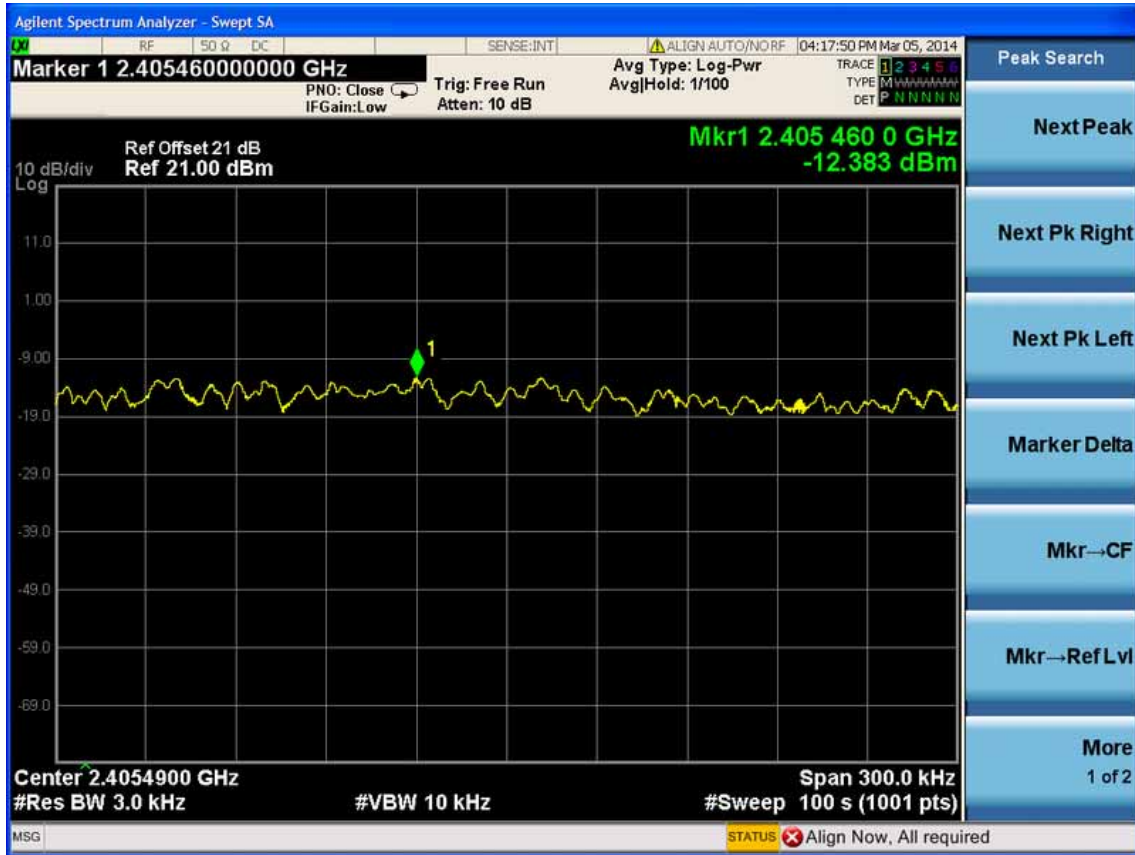
Test CH6: 2437MHz



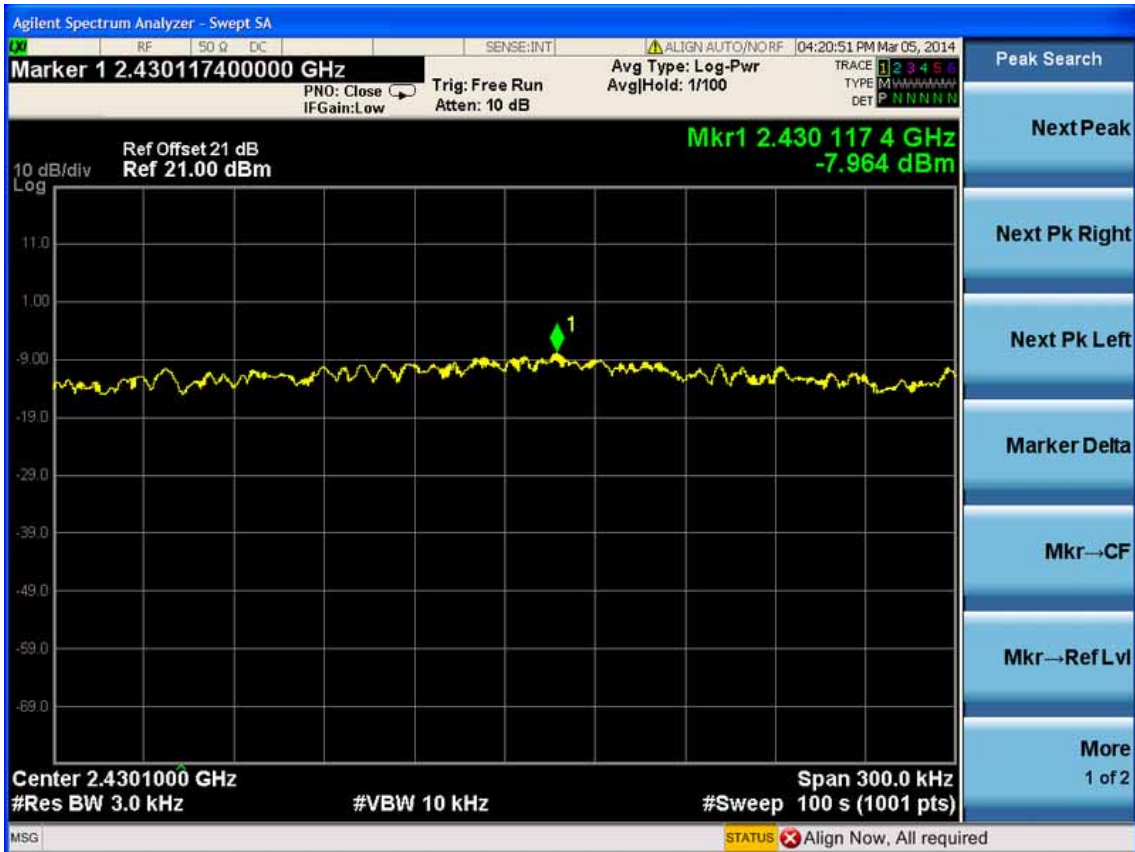
Test CH11: 2462MHz



Test Mode: IEEE 802.11n HT20 TX  
 Test CH1: 2412MHz



Test CH6: 2437MHz

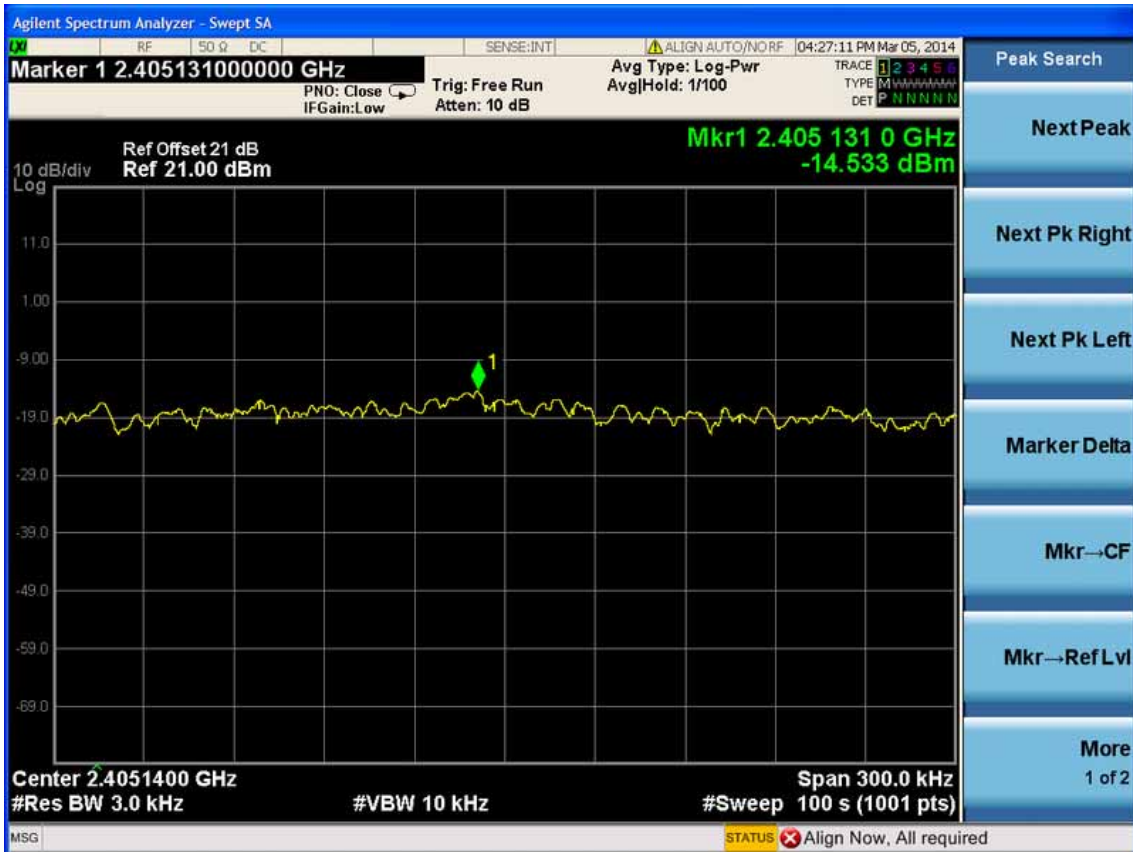


Test CH11: 2462MHz

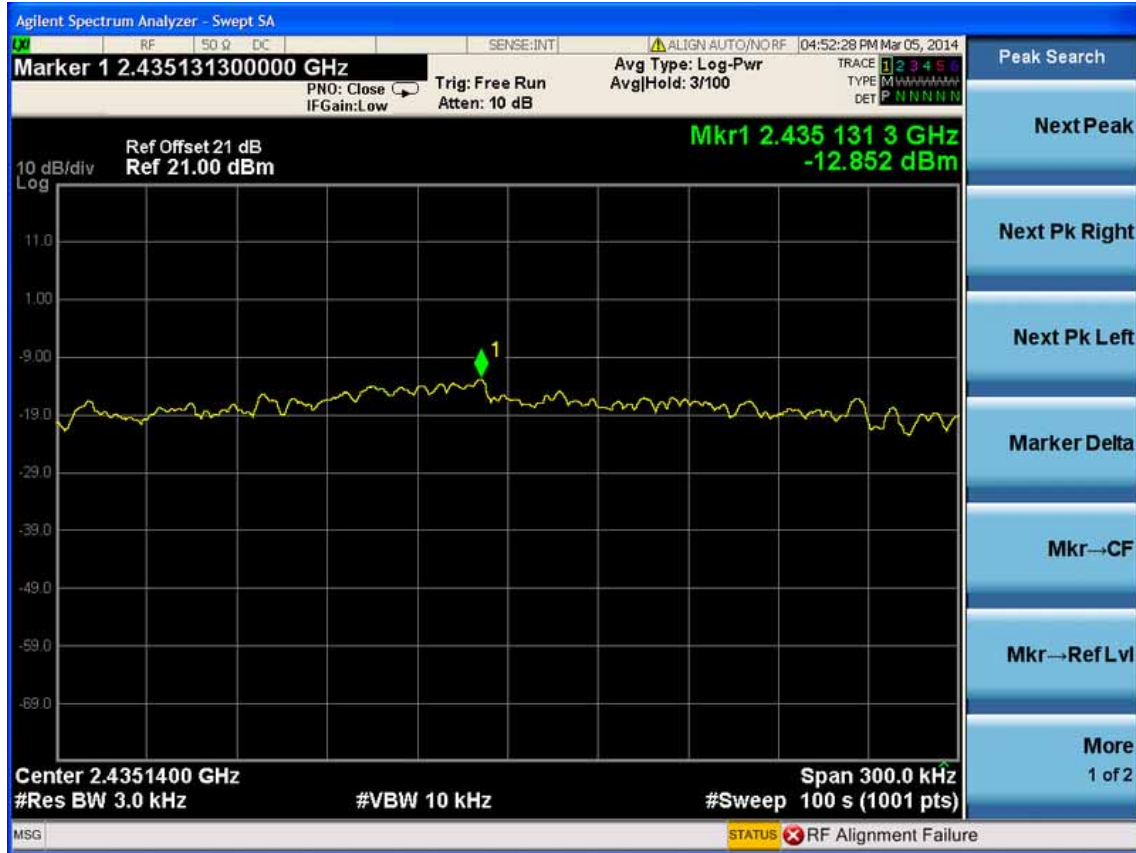


Test Mode: IEEE 802.11n HT40 TX

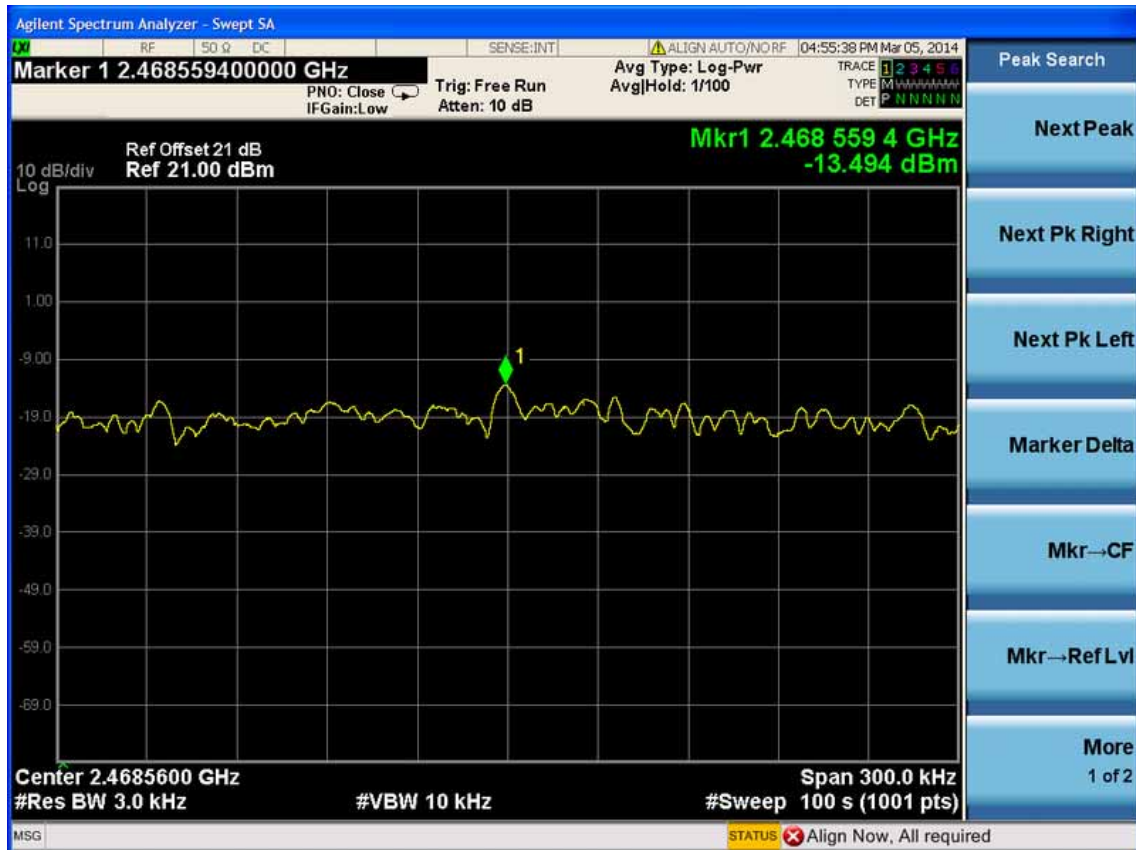
Test CH1: 2422MHz



Test CH4: 2437MHz



Test CH7: 2452MHz



## 11.MPE ESTIMATION

### 11.1.Limit for General Population/ Uncontrolled Exposures

Frequency	Power density (mW/ cm <sup>2</sup> )	Averaging time(minutes)
300MHz----1.5GHz	F/1500	30
1.5GHz---100GHz	1.0	30

Frequency(MHz)	Power density (mW/ cm <sup>2</sup> )	Averaging time(minutes)
2412	1	30
2437	1	30
2462	1	30

Note: F= Frequency in MHz Estimation Result

EUT: 150Mbps Wireless N ADSL2+ Modem Router		
M/N: TD-W8151N		
Test date: 2014-03-07	Pressure: 101.2±1.0 kpa	Humidity: 48.4±3.0%
Tested by: Kevin_Hu	Test site: RF site	Temperature:20.7±0.6 °C

Cable loss: 1 dB		Attenuator loss: 20 dB				Antenna Gain: 5dBi	
Test Mode	CH	Frequency (MHz)	Peak Output Power (dBm)	Output Power (mW)	Antenna Gain (dBi)	Antenna Gain (Linear)	MPE
11b	CH1	2412	23.30	213.80	5.0	3.16	0.1346
	CH6	2437	23.72	235.50	5.0	3.16	0.1482
	CH11	2462	23.34	215.77	5.0	3.16	0.1358
11g	CH1	2412	24.40	275.42	5.0	3.16	0.1734
	CH6	2437	25.43	349.14	5.0	3.16	0.2198
	CH11	2462	24.40	275.42	5.0	3.16	0.1734
11n HT20	CH1	2412	22.65	184.08	5.0	3.16	0.1159
	CH6	2437	26.70	467.74	5.0	3.16	0.2944
	CH11	2462	21.37	137.09	5.0	3.16	0.0863
11n HT40	CH1	2422	22.47	176.60	5.0	3.16	0.1112
	CH4	2437	24.84	304.79	5.0	3.16	0.1918
	CH7	2452	22.98	198.61	5.0	3.16	0.1250

Note: MPE=PG/4 π R<sup>2</sup> (R:20cm)

## **12. ANTENNA REQUIREMENT**

### **12.1. STANDARD APPLICABLE**

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.

### **12.2. ANTENNA CONNECTED CONSTRUCTION**

The antennas used for this product are Dipole antenna 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 5dBi.

### **13.DEVIATION TO TEST SPECIFICATIONS**

[ NONE ]