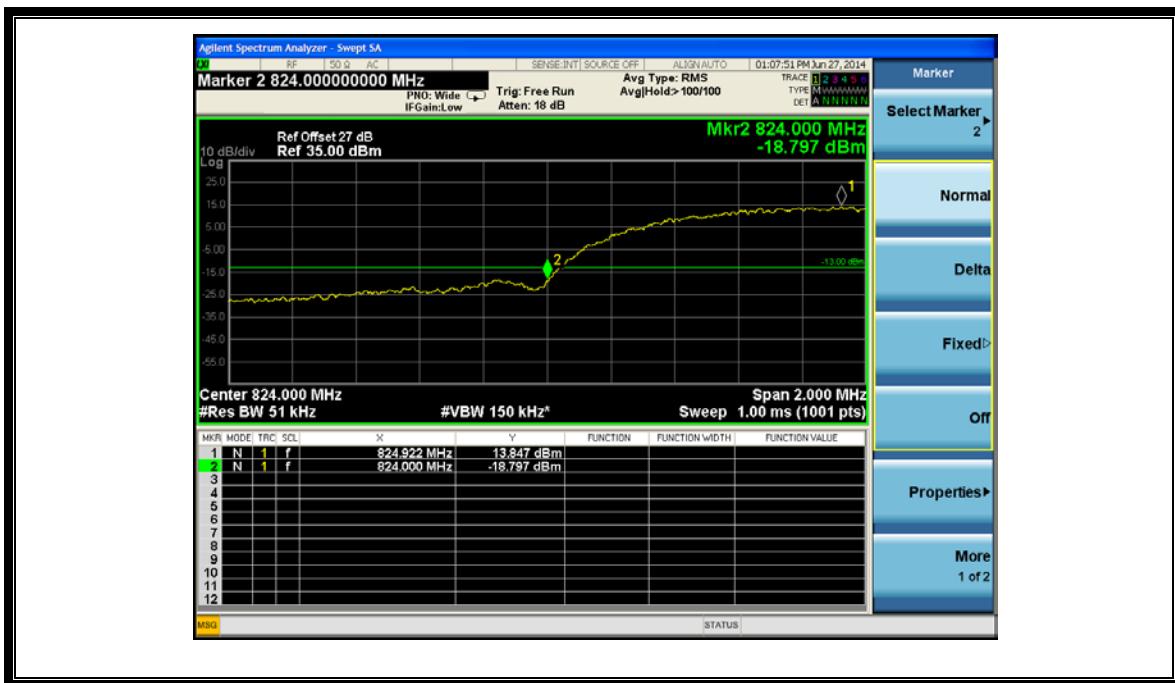




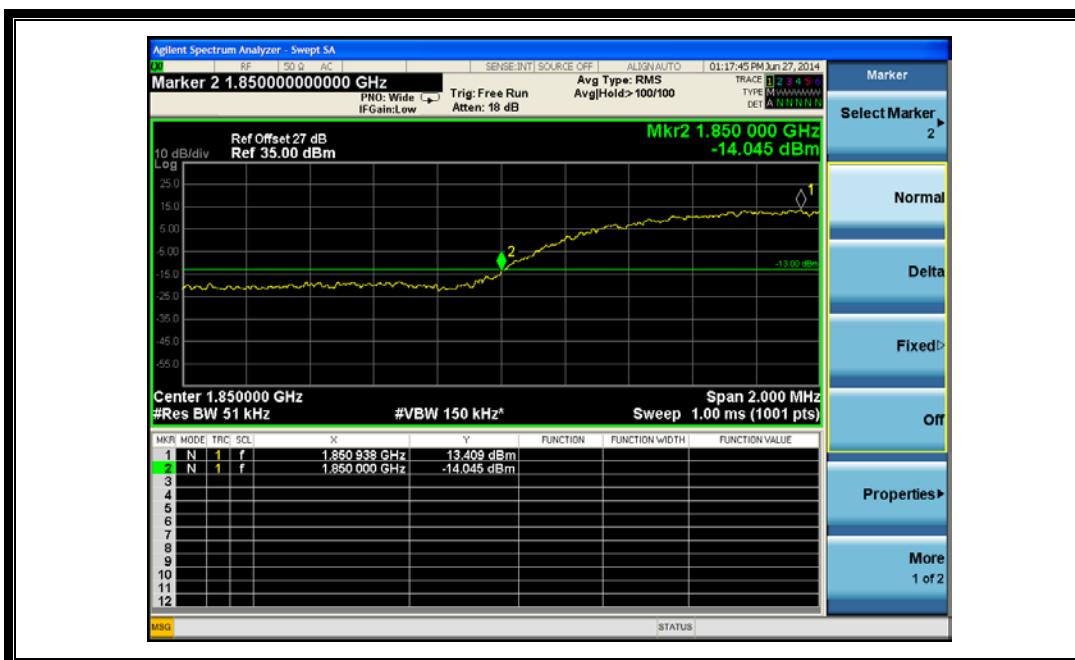
(Plot L: WCDMA 1900 Channel = 9538)



(Plot M: HSDPA 850 Channel = 4132)



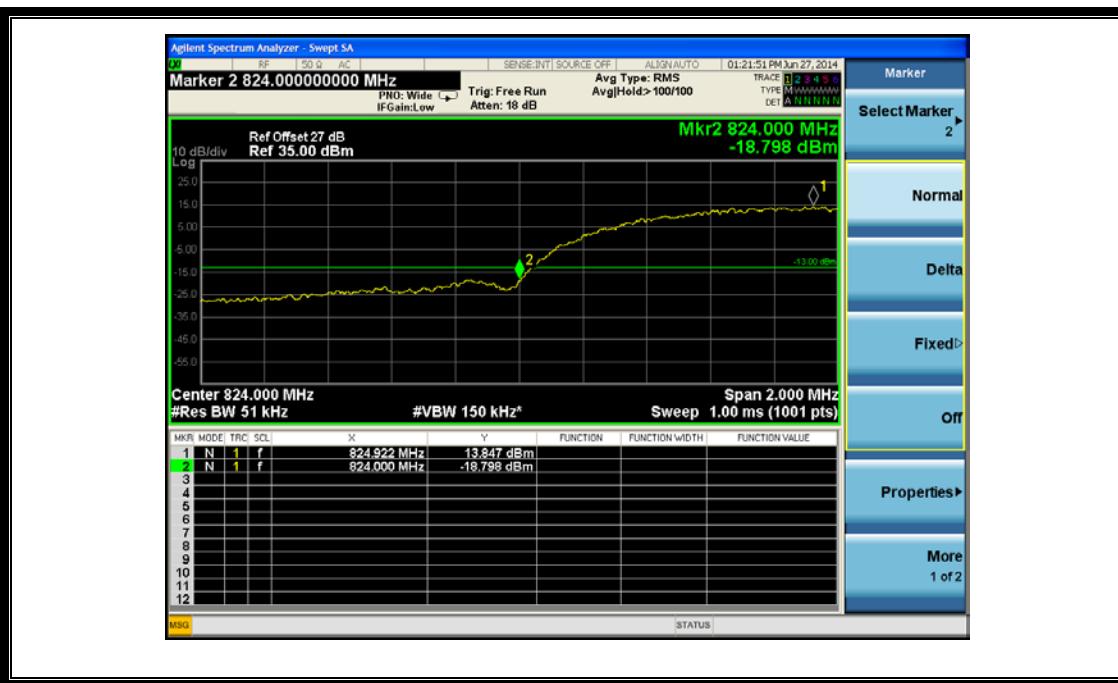
(Plot N: HSDPA850 Channel = 4233)



(Plot O: HSDPA 1900 Channel = 9262)



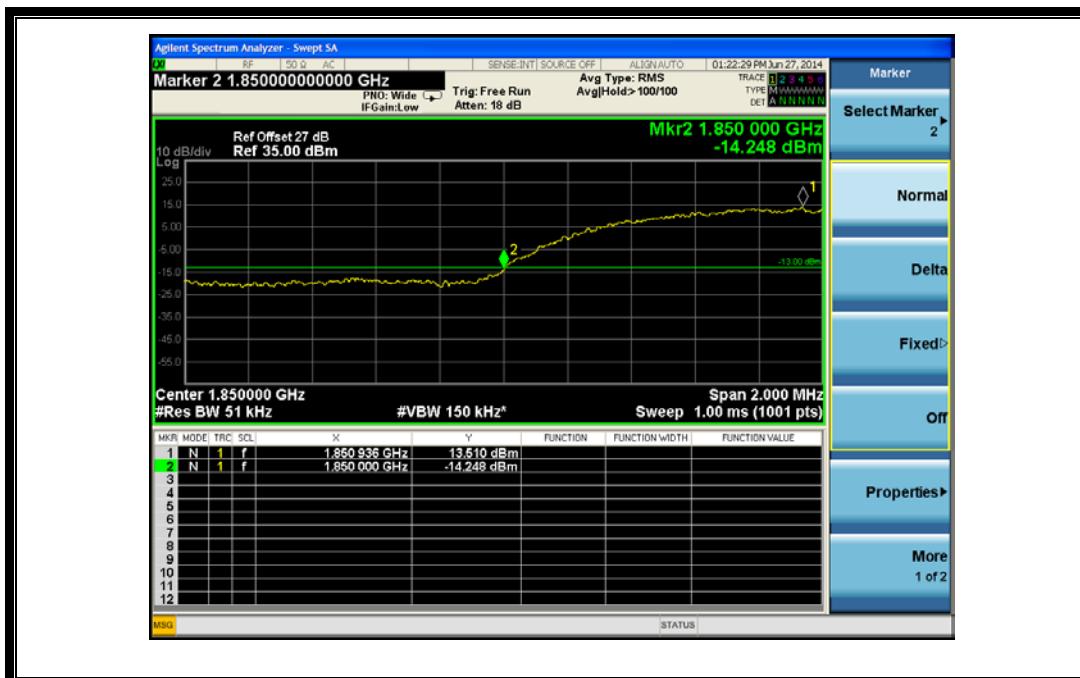
(Plot P: HSDPA 1900 Channel = 9538)



(Plot Q: HSUPA 850 Channel = 4132)



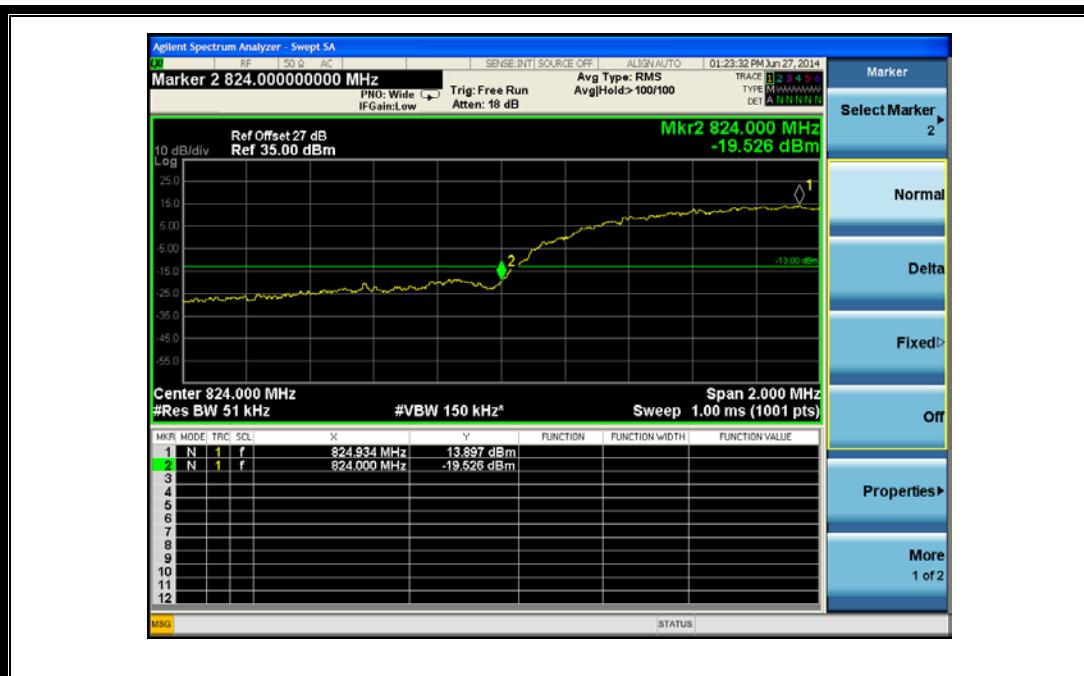
(Plot R: HSUPA850 Channel = 4233)



(Plot S: HSUPA 1900 Channel = 9262)



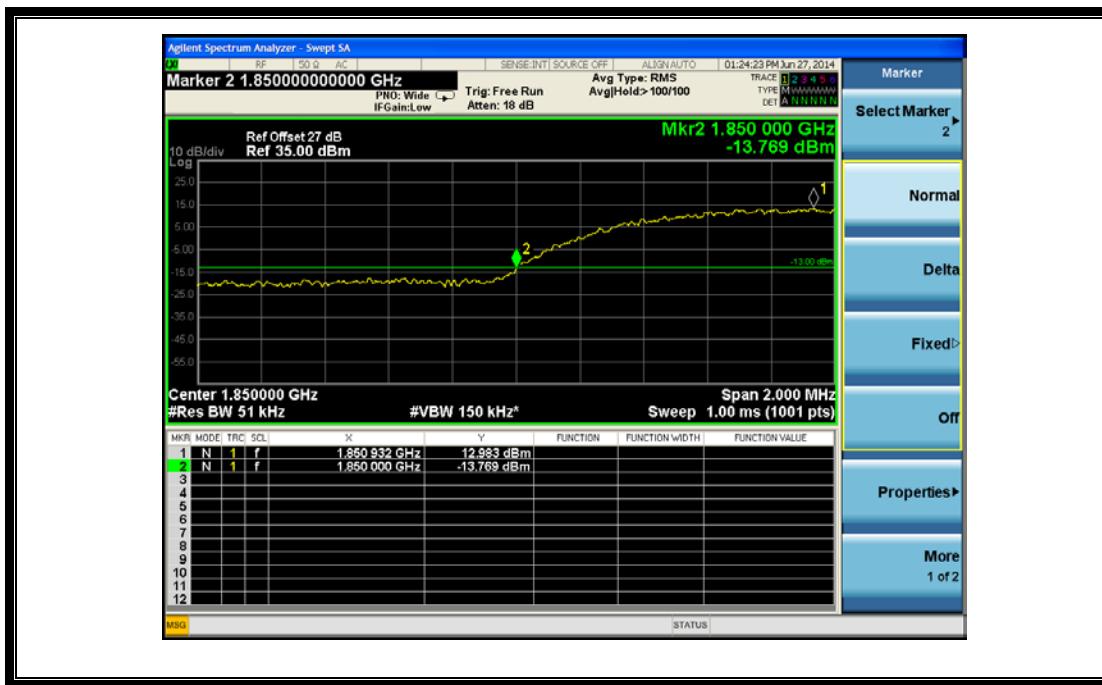
(Plot T: HSUPA 1900 Channel = 9538)



(Plot U: HSPA+ 850 Channel = 4132)



(Plot V: HSPA+ 850 Channel = 4233)



(Plot W: HSPA+ 1900 Channel = 9262)



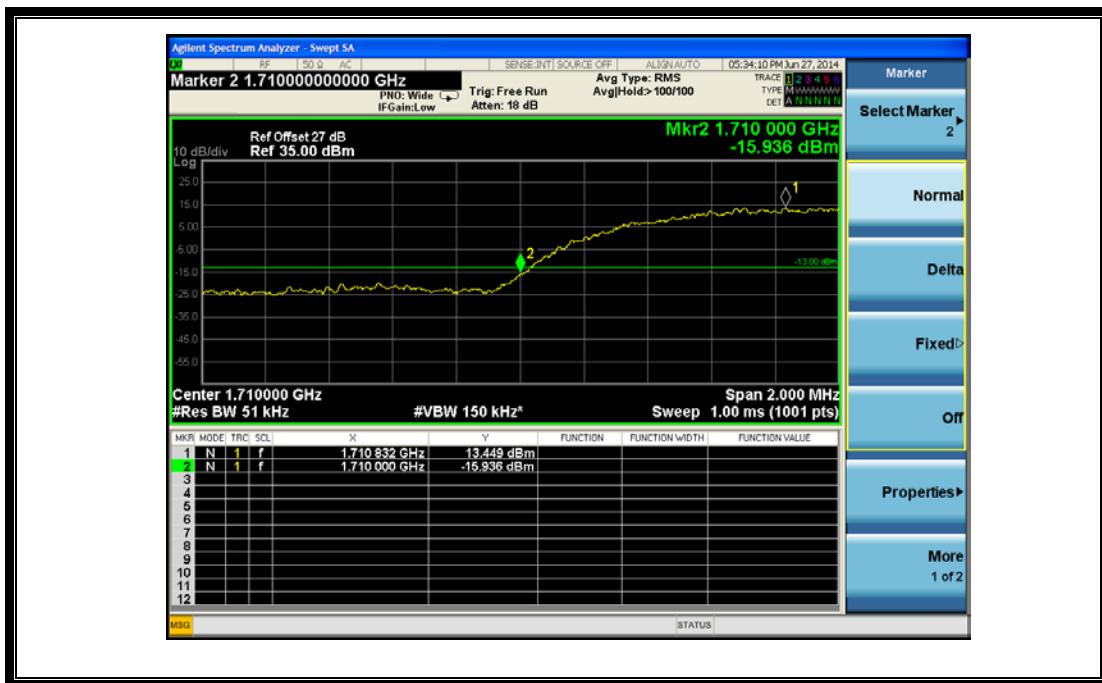
(Plot X: HSPA+ 1900 Channel = 9538)



(Plot Y: WCDMA 1700 Channel = 1312)



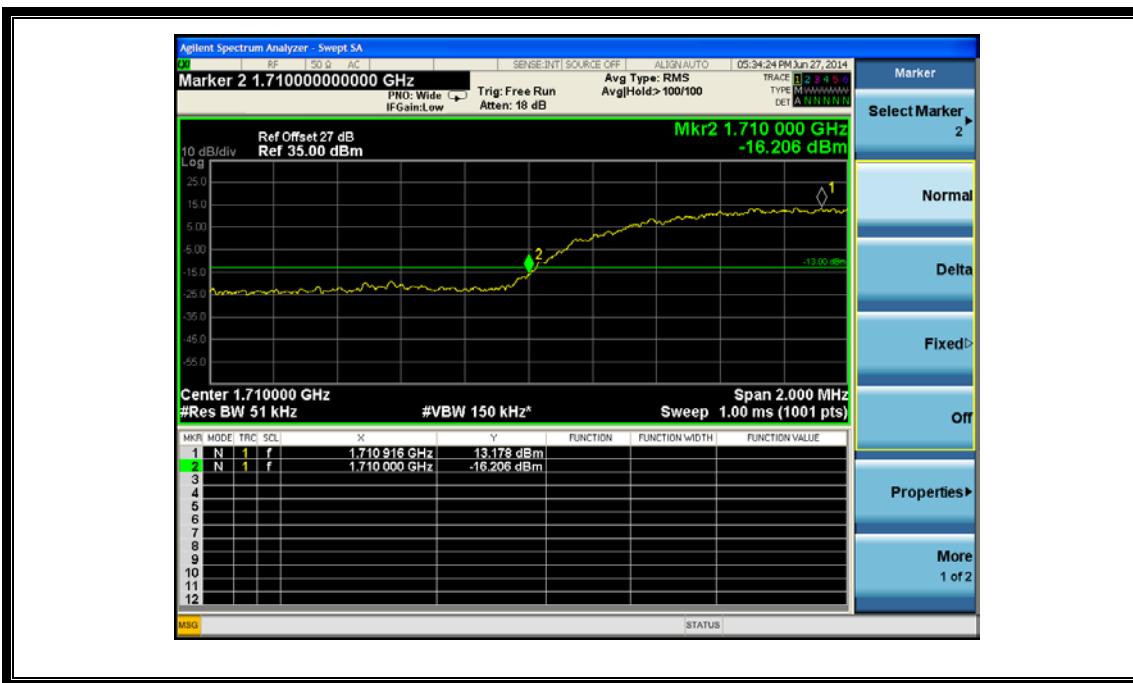
(Plot Z: WCDMA 1700 Channel = 1513)



(Plot A1:HSDPA 1700 Channel = 1312)



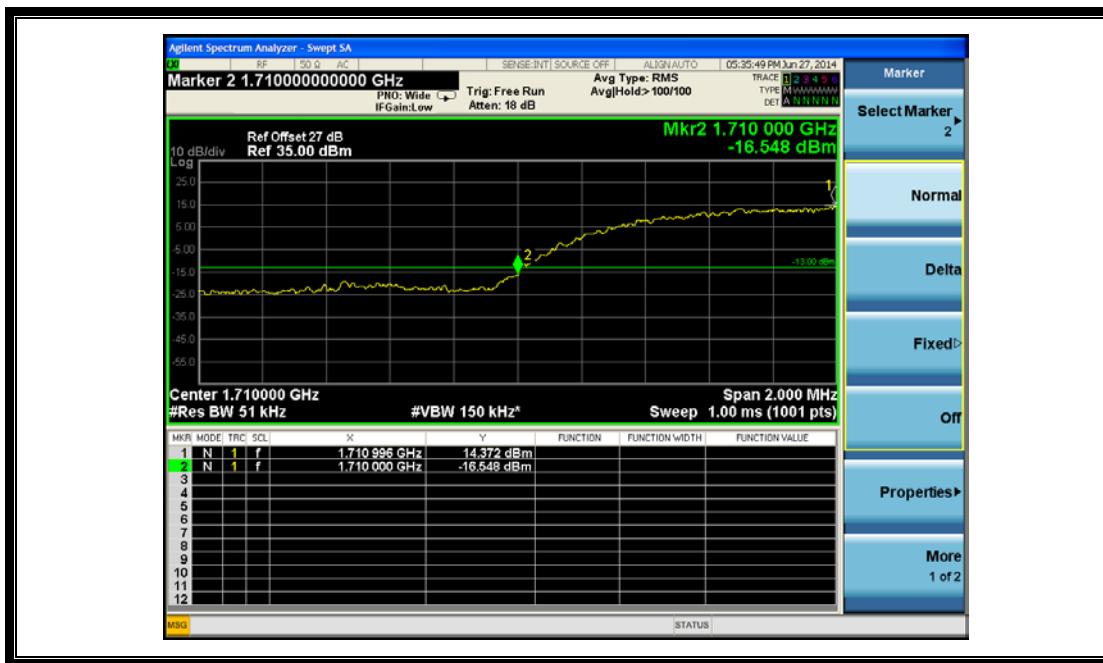
(Plot B1: HSDPA 1700 Channel = 1513)



(Plot C1: HSUPA 1700 Channel = 1312)



(Plot D1: HSUPA1700 Channel = 1513)



(Plot E1: HSPA+ 1700 Channel = 1312)



(Plot F1:HSPA+ 1700 Channel = 1513)

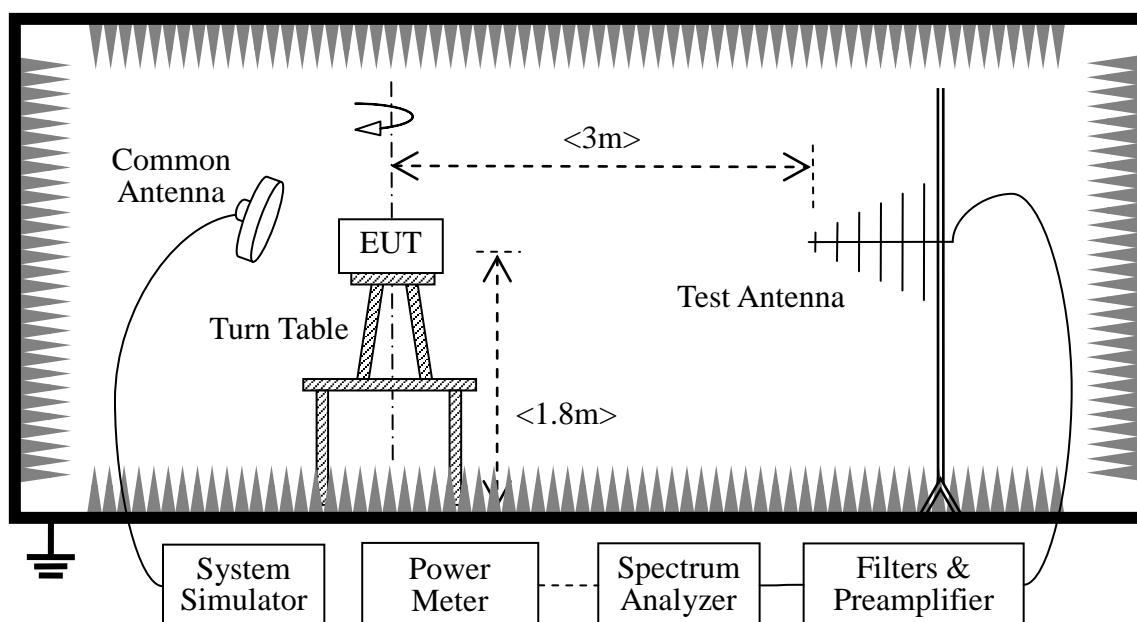
## 2.7 Transmitter Radiated Power (EIRP/ERP)

### 2.7.1 Requirement

According to FCC section 22.913, the Effective Radiated Power (ERP) of mobile transmitters and auxiliary test transmitters must not exceed 7Watts, and FCC section 24.232, the broadband PCS mobile station is limited to 2 Watts e.i.r.p. peak power. FCC section 27.50, AWS 1700 test transmitters must not exceed 1Watts

### 2.7.2 Test Description

#### 1. Test Setup:



The EUT, which is powered by the Battery charged with the AC Adapter, is located in a 3m Full-Anechoic Chamber; the cable loss, air loss and so on of the site as factors are pre-calibrated using the "Substitution" method, and calculated to correct the reading.

A call is established between the EUT and the SS via a Common Antenna. The EUT is commanded by the SS to operate at the maximum and minimum output power (i.e. GSM850MHz band Power Control Level (PCL) = 5/19 and Power Class = 4, GSM1900MHz band Power Control Level (PCL) = 0/15 and Power Class = 1), and only the test result of the maximum output power was recorded.

- GSM Maximum RF output power: GSM 850 33.24dBm, GSM 1900 29.69dBm, EGPRS 850 30.23dBm, EGPRS 26.56 dBm, WCDMA 850 24.23dBm, WCDMA 1900 23.68dBm, WCDMA1700 23.80dBm Please refer to section 2.1.3 of this report.

- Step size (dB): 3dB
- Minimum RF power: GSM 850 3.1dBm, GSM 1900 0.3dBm, EGPRS 850 3.1dBm, EGPRS 1900



0.21dBm ,WCDMA 850 0.39dBm ,WCDMA 1900 0.5dBm WCDMA 1700 0.5dBm.

The Test Antenna is a Bi-Log one (used for 30MHz to 1GHz) or a Horn one (used for above 3GHz), and it's located at the same height as the EUT. The Filters consists of Notch Filters and High Pass Filter.

## 2. Equipments List:

Description	Manufacturer	Model	Serial No.	Cal. Date	Cal. Due
System Simulator	Agilent	E5515C	GB43130131	2014.02.26	2015.02.25
Spectrum Analyzer	Agilent	E7405A	US44210471	2014.02.26	2015.02.25
Full-Anechoic Chamber	Albatross	9m*6m*6m	(n.a.)	2014.02.26	2015.02.25
Test Antenna - Bi-Log	Schwarzbeck	VULB 9163	9163-274	2014.02.26	2015.02.25
Test Antenna - Horn	Schwarzbeck	BBHA 9120C	9120C-384	2014.02.26	2015.02.25
Test Antenna - Horn	Schwarzbeck	UG -596A/U	A0902607	2014.02.26	2015.02.25
Substitution Antenna	Schwarzbeck	BBHA 9120C	9120C-384	2014.02.26	2015.02.25
Pre-AMPs	lucix	S10M100L3802	S020180L3203	2014.02.26	2015.02.25
Notch Filter	COM-MW	ZBSF-C836.5-25-X	NA	2014.02.26	2015.02.25
Notch Filter	COM-MW	ZBSF-C1747.5-75-X2	NA	2014.02.26	2015.02.25
Notch Filter	COM-MW	ZBSF-C1880-60-X2	NA	2014.02.26	2015.02.25

### 2.7.3 Test Result

The Turn Table is actuated to turn from 0° to 360°, and both horizontal and vertical polarizations of the Test Antenna are used to find the maximum radiated power. The lowest, middle and highest channels are tested.

The substitution corrections are obtained as described below:

$$A_{SUBST} = P_{SUBST\_TX} - P_{SUBST\_RX} - L_{SUBST\_CABLES} + G_{SUBST\_TX\_ANT}$$

$$A_{TOT} = L_{CABLES} + A_{SUBST}$$

Where  $A_{SUBST}$  is the final substitution correction including receive antenna gain.

$P_{SUBST\_TX}$  is signal generator level,

$P_{SUBST\_RX}$  is receiver level,

$L_{SUBST\_CABLES}$  is cable losses including TX cable,

$G_{SUBST\_TX\_ANT}$  is substitution antenna gain.

$A_{TOT}$  is total correction factor including cable loss and substitution correction

During the test, the data of  $A_{TOT}$  was added in the Test Spectrum Analyze, so Spectrum Analyze reading is the final values which contain the data of  $A_{TOT}$ .



## 1. GSM Model Test Verdict:

Band	Channel	Frequency (MHz)	PCL	Measured ERP			Limit		Verdict
				dBm	W	Refer to Plot	dBm	W	
GSM 850MHz	128	824.20	5	30.19	1.045	Plot A	38.5	7	PASS
	190	836.60	5	31.39	1.377				PASS
	251	848.80	5	31.87	1.538				PASS
GPRS 850MHz	128	824.20	5	23.25	0.211	Plot B <sup>Note 1</sup>	38.5	7	PASS
	190	836.60	5	25.33	0.341				PASS
	251	848.80	5	25.77	0.378				PASS
EGPRS 850MHz	128	824.20	5	23.28	0.213	Plot C <sup>Note 1</sup>	38.5	7	PASS
	190	836.60	5	25.41	0.348				PASS
	251	848.80	5	25.75	0.376				PASS
Band	Channel	Frequency (MHz)	PCL	Measured EIRP			Limit		Verdict
				dBm	W	Refer to Plot	dBm	W	
GSM 1900MHz	512	1850.2	0	30.34	1.081	Plot D	33	2	PASS
	661	1880.0	0	29.72	0.938				PASS
	810	1909.8	0	29.9	0.977				PASS
GPRS 1900MHz	512	1850.2	0	24.21	0.264	Plot E <sup>Note 1</sup>	33	2	PASS
	661	1880.0	0	22.82	0.191				PASS
	810	1909.8	0	23.23	0.210				PASS
EGPRS 1900MHz	512	1850.2	0	24.39	0.275	Plot F <sup>Note 1</sup>	33	2	PASS
	661	1880.0	0	23.34	0.216				PASS
	810	1909.8	0	23.28	0.213				PASS

Note 1: For the GPRS and EGPRS model, all the slots were tested and just the worst data was record in this report.

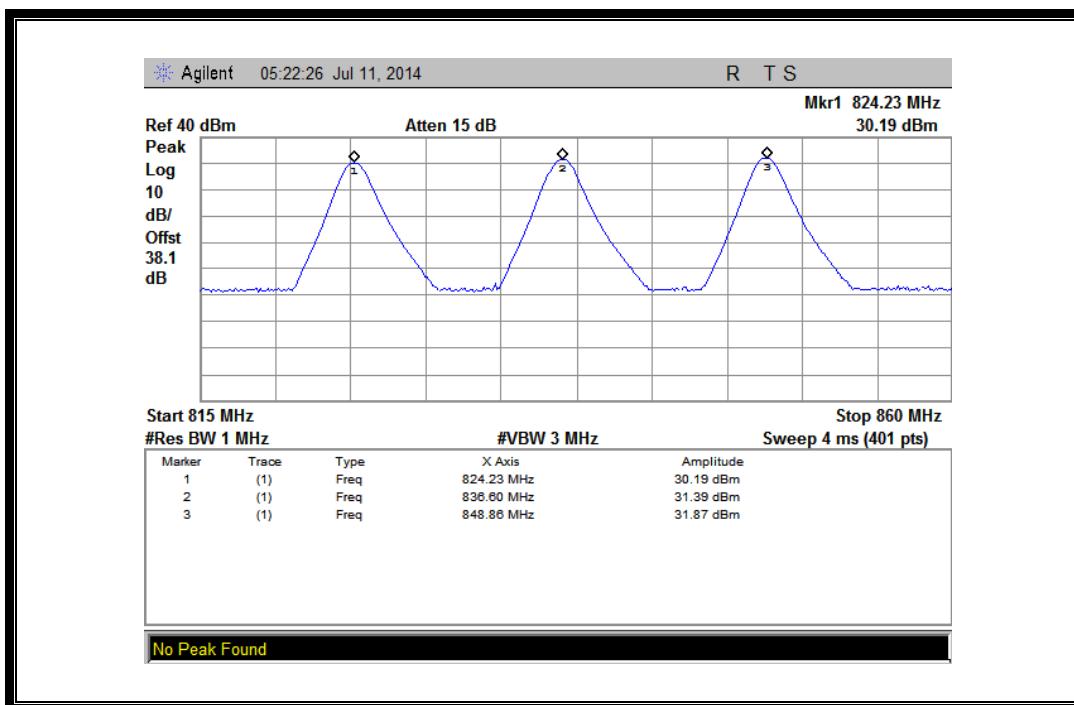
## 2. WCDMA Model Test Verdict:

Band	Channel	Frequency (MHz)	Measured ERP			Limit		Verdict
			dBm	W	Refer to Plot	dBm	W	
WCDMA 850MHz	4132	826.4	23.18	0.208	Plot G	38.5	7	PASS
	4175	835	23.44	0.221				PASS
	4233	846.6	24.11	0.258				PASS
HSDPA 850MHz	4132	826.4	24.11	0.258	Plot H	38.5	7	PASS
	4175	835	23.76	0.238				PASS
	4233	846.6	24.28	0.268				PASS
HSUPA 850MHz	4132	826.4	23.04	0.201	Plot I	38.5	7	PASS
	4175	835	23.84	0.242				PASS
	4233	846.6	24.09	0.256				PASS
HSPA+ 850MHz	4132	826.4	23.84	0.242	Plot J	38.5	7	PASS
	4175	835	23.74	0.237				PASS
	4233	846.6	24.28	0.268				PASS

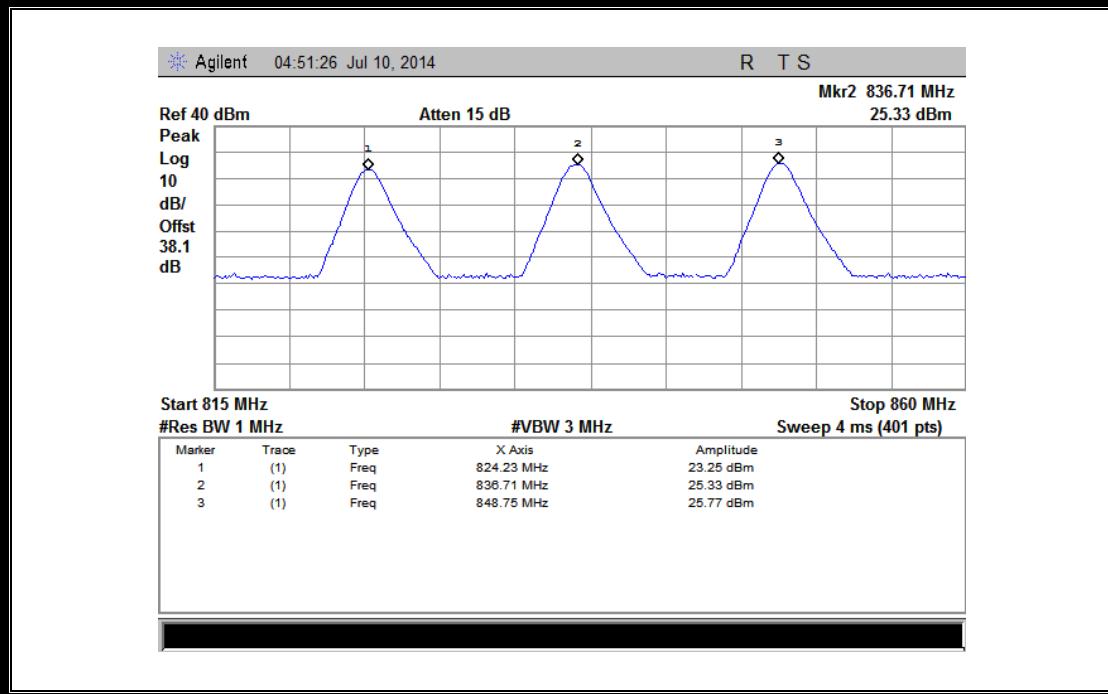
Band	Channel	Frequency (MHz)	Measured EIRP			Limit		Verdict
			dBm	W		dBm	W	
WCDMA 1900MHz	9262	1852.4	24.79	0.301	Plot K	33	2	PASS
	9400	1880	23.88	0.244				PASS
	9538	1907.6	24.3	0.269				PASS
HSDPA 1900MHz	9262	1852.4	24.7	0.295	Plot L	33	2	PASS
	9400	1880	23.88	0.244				PASS
	9538	1907.6	24.24	0.265				PASS
HSUPA 1900MHz	9262	1852.4	24.7	0.295	Plot M	33	2	PASS
	9400	1880	23.77	0.238				PASS
	9538	1907.6	24.26	0.267				PASS
HSPA+ 1900MHz	9262	1852.4	24.78	0.301	Plot N	33	2	PASS
	9400	1880	23.68	0.233				PASS
	9538	1907.6	24.28	0.268				PASS

Band	Channel	Frequency (MHz)	Measured EIRP			Limit		Verdict	
			dBm	W		dBm	W		
WCDMA 1700MHz	1312	1712.4	26.87	0.486		Plot O	30	1	PASS
	1412	1732.4	26.5	0.447					PASS
	1513	1752.6	25.72	0.373					PASS
HSDPA 1700MHz	1312	1712.4	26.86	0.485		Plot P	30	1	PASS
	1412	1732.4	25.93	0.392					PASS
	1513	1752.6	25.65	0.367					PASS
HSUPA 1700MHz	1312	1712.4	27.1	0.513		Plot Q	30	1	PASS
	1412	1732.4	26.98	0.499					PASS
	1513	1752.6	26.03	0.401					PASS
HSPA+ 1700MHz	1312	1712.4	27.03	0.505		Plot R	30	1	PASS
	1412	1732.4	26.93	0.493					PASS
	1513	1752.6	25.91	0.310					PASS

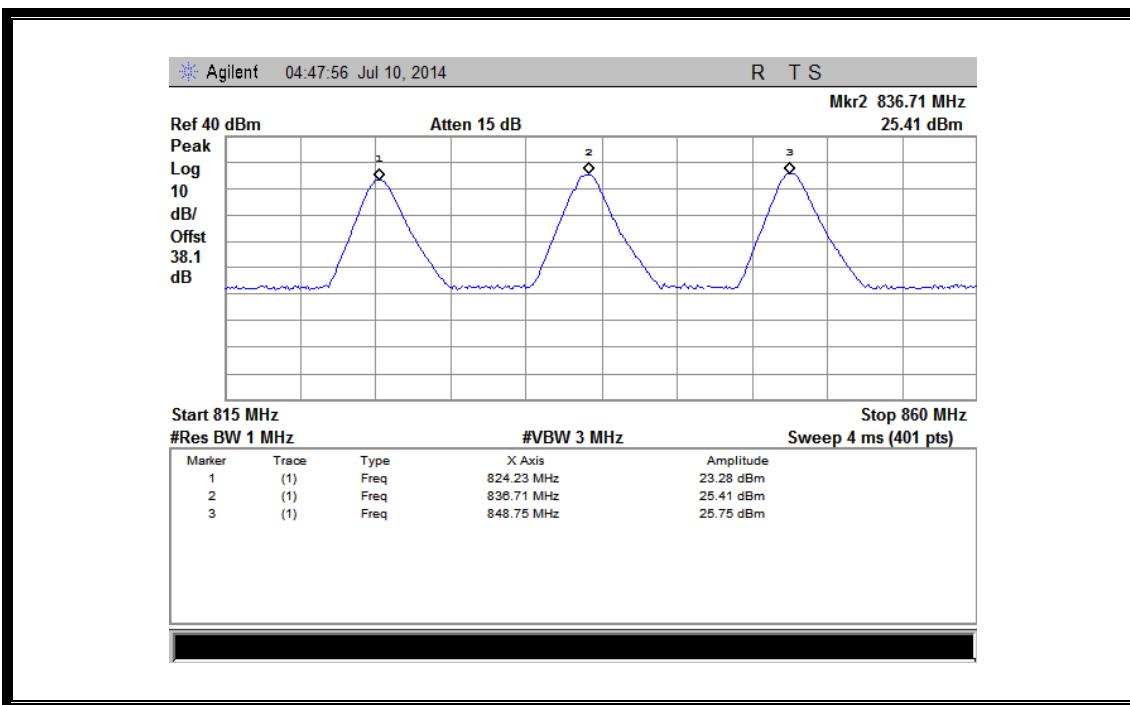
### 3. Test Plots:



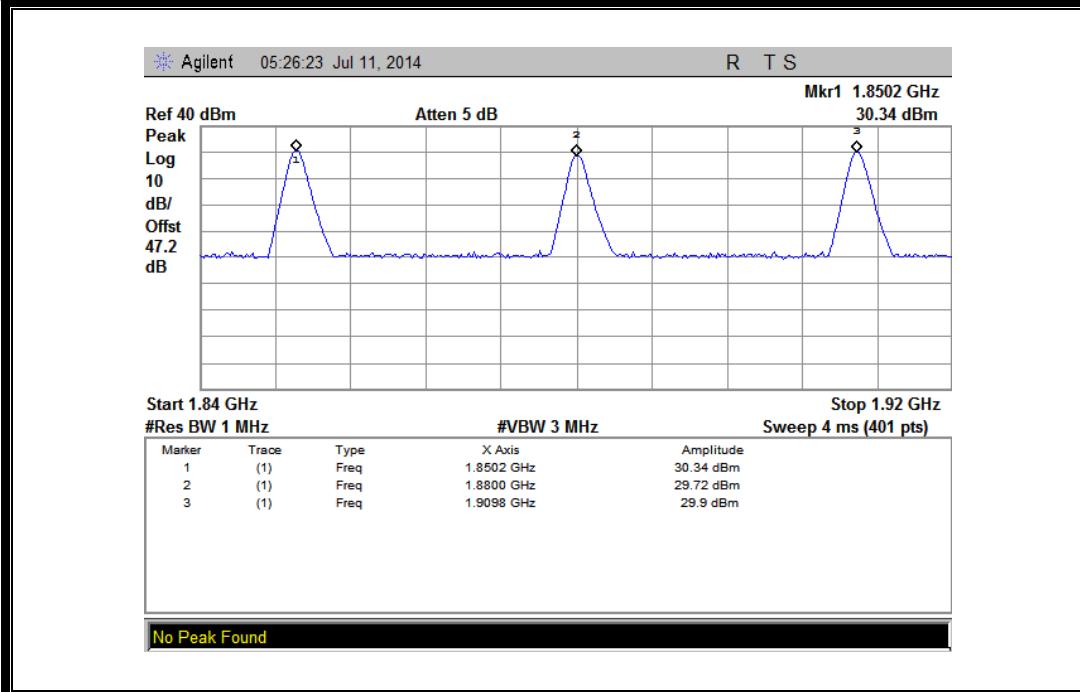
(Plot A: GSM 850MHz Channel = 128, 190, 251)



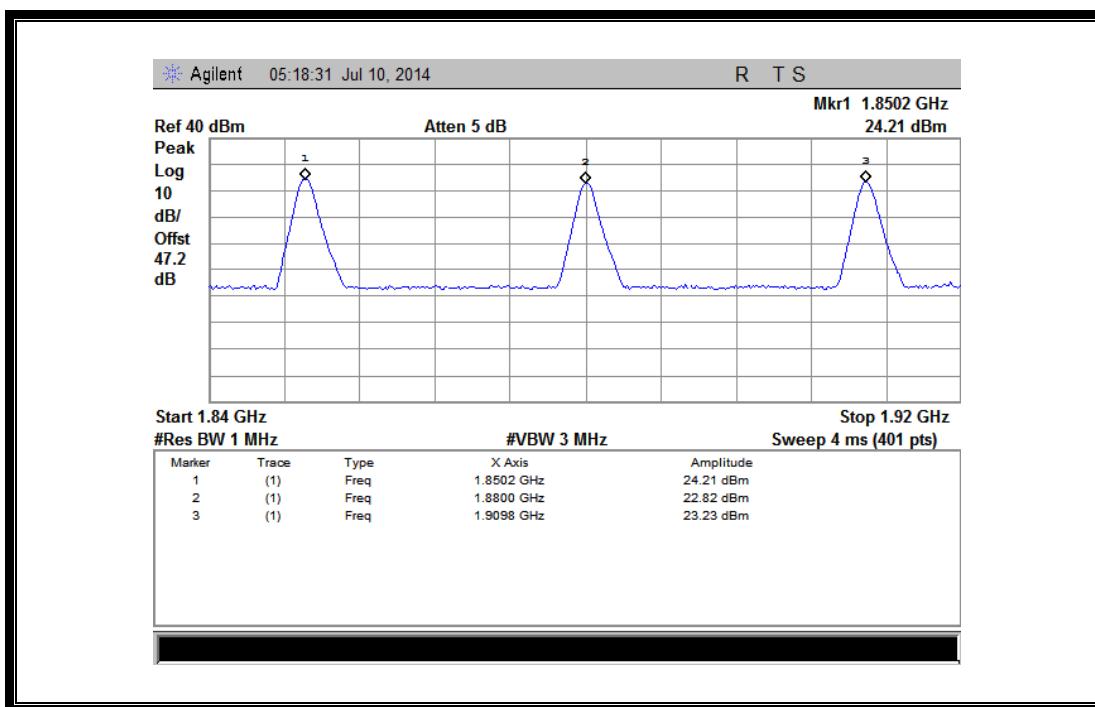
(Plot B: GPRS 850MHz Channel = 128, 190, 251)



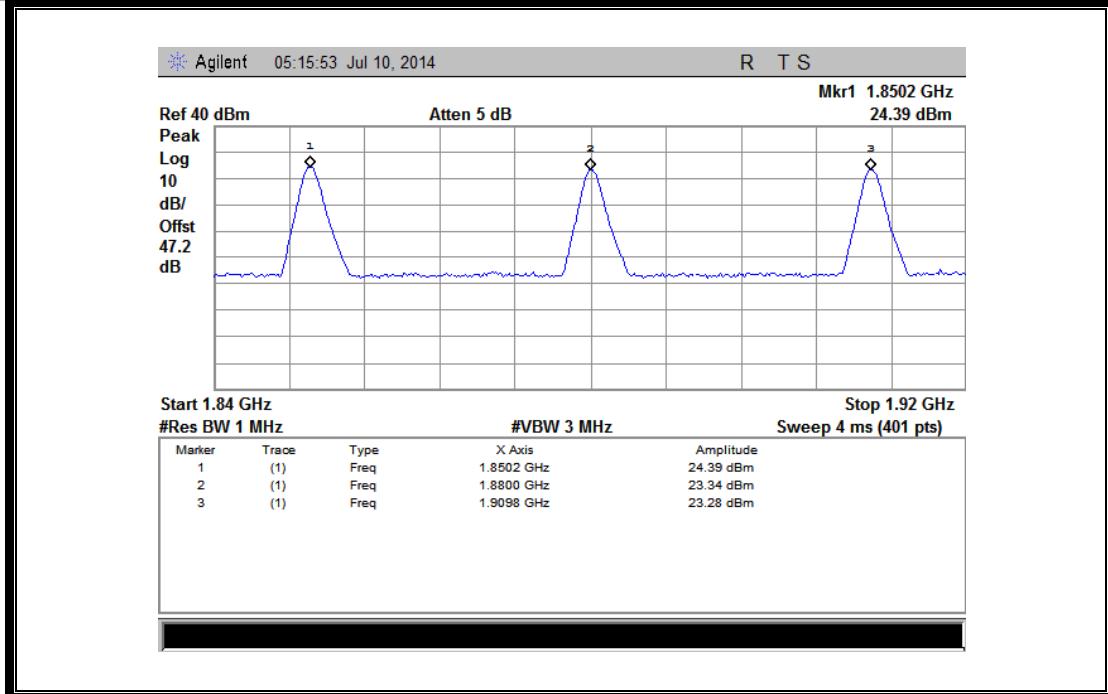
(Plot C: EGPRS 850MHz Channel = 128, 190, 251)



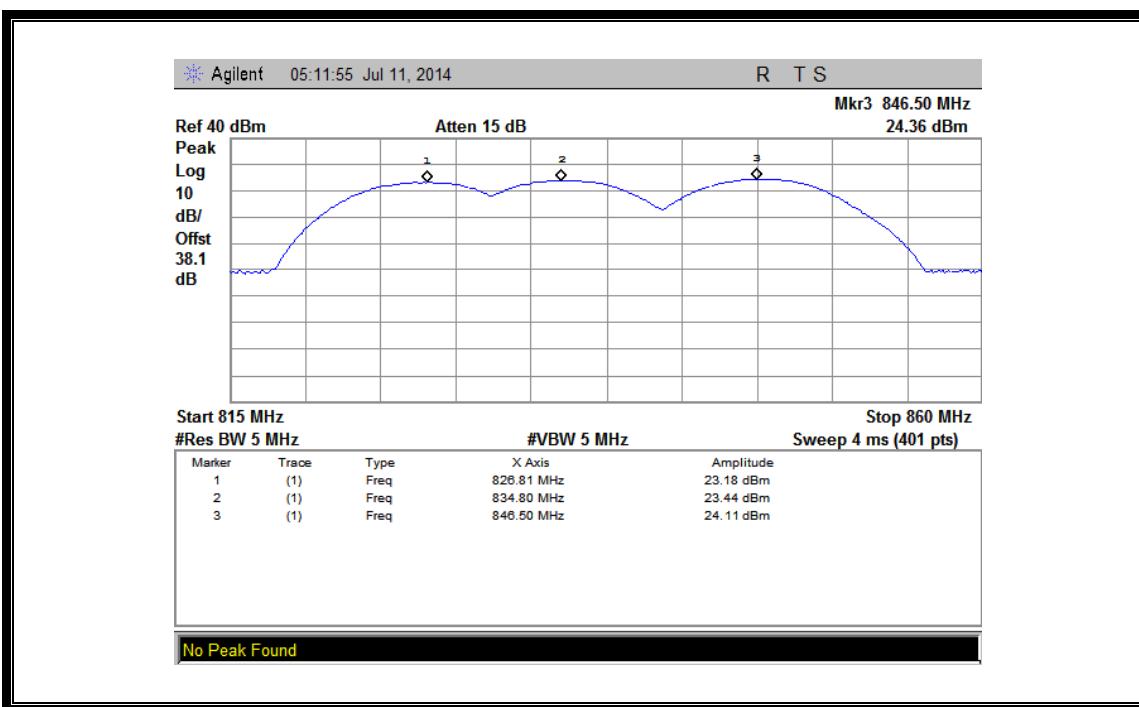
(Plot D: GSM 1900MHz Channel = 512, 661, 810)



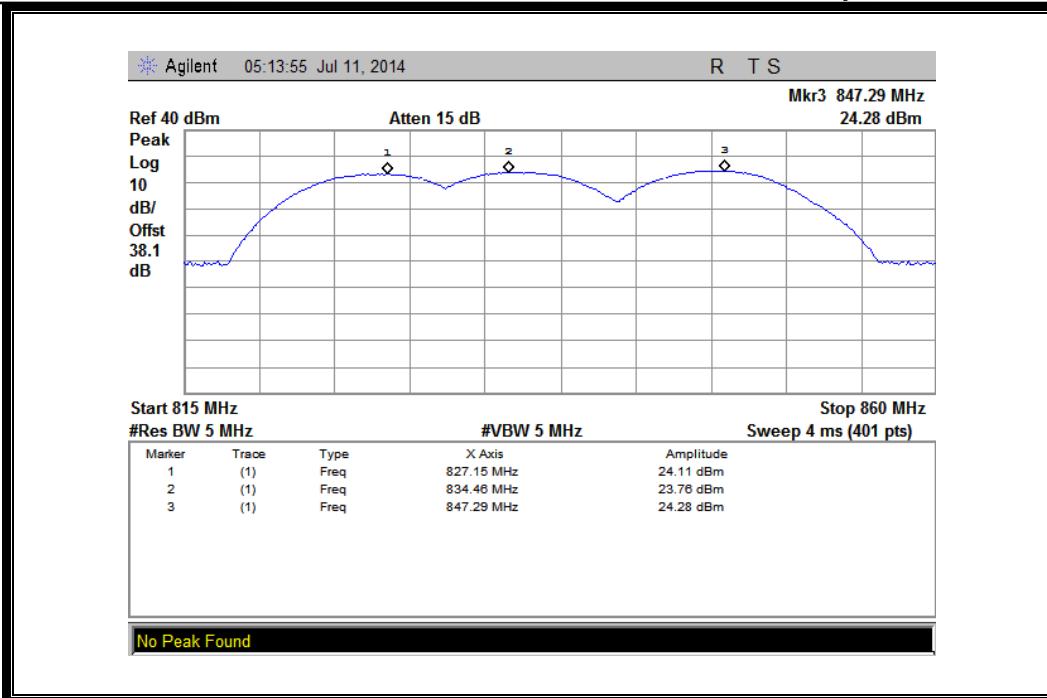
(Plot E: GPRS 1900MHz Channel = 512, 661, 810)



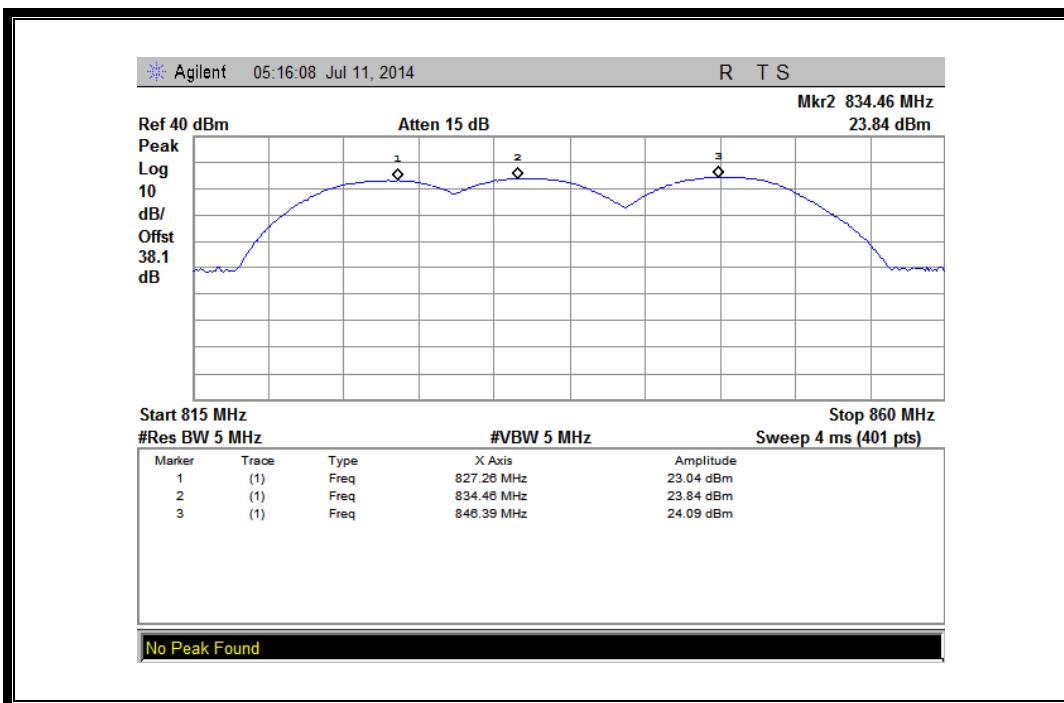
(Plot F: EGPRS 1900MHz Channel = 512, 661, 810)



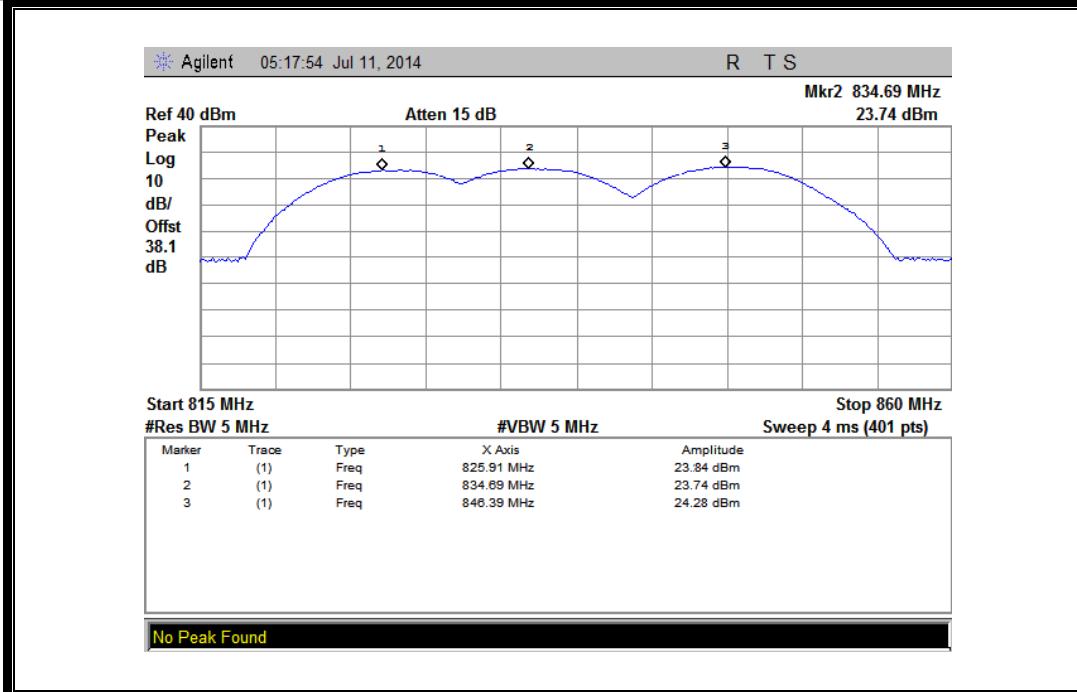
(Plot G: WCDMA 850 MHz Channel = 4132, 4175, 4233)



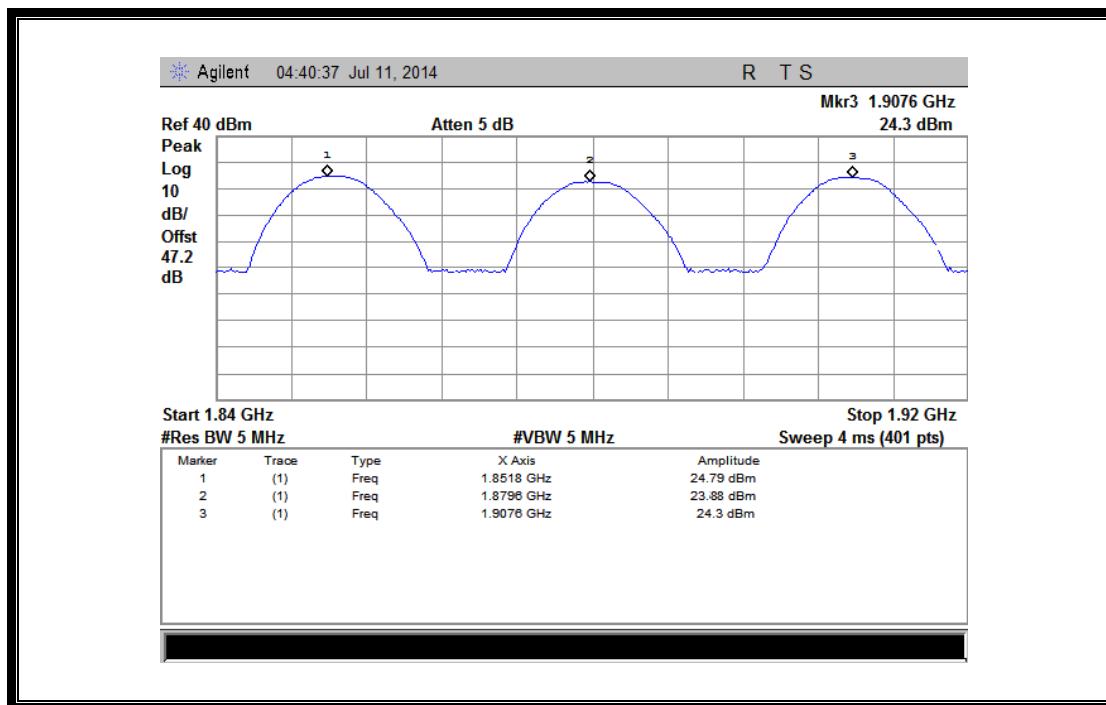
(Plot H: HSDPA 850 MHz Channel = 4132, 4175, 4233)



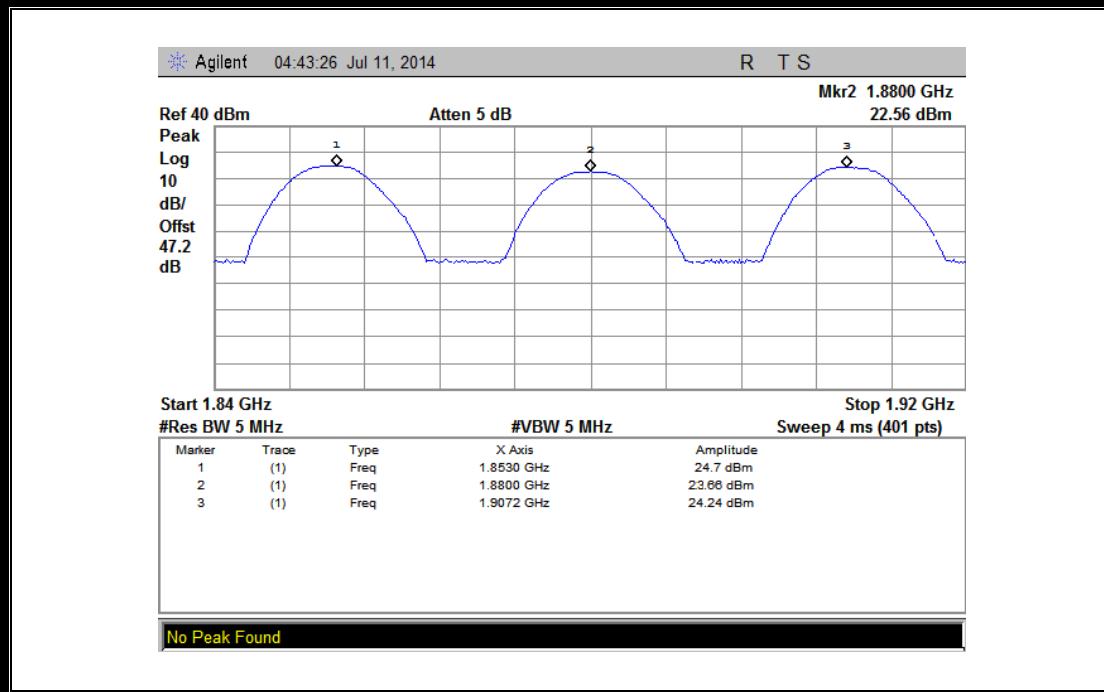
(Plot I: HSUPA 850 MHz Channel = 4132, 4175, 4233)



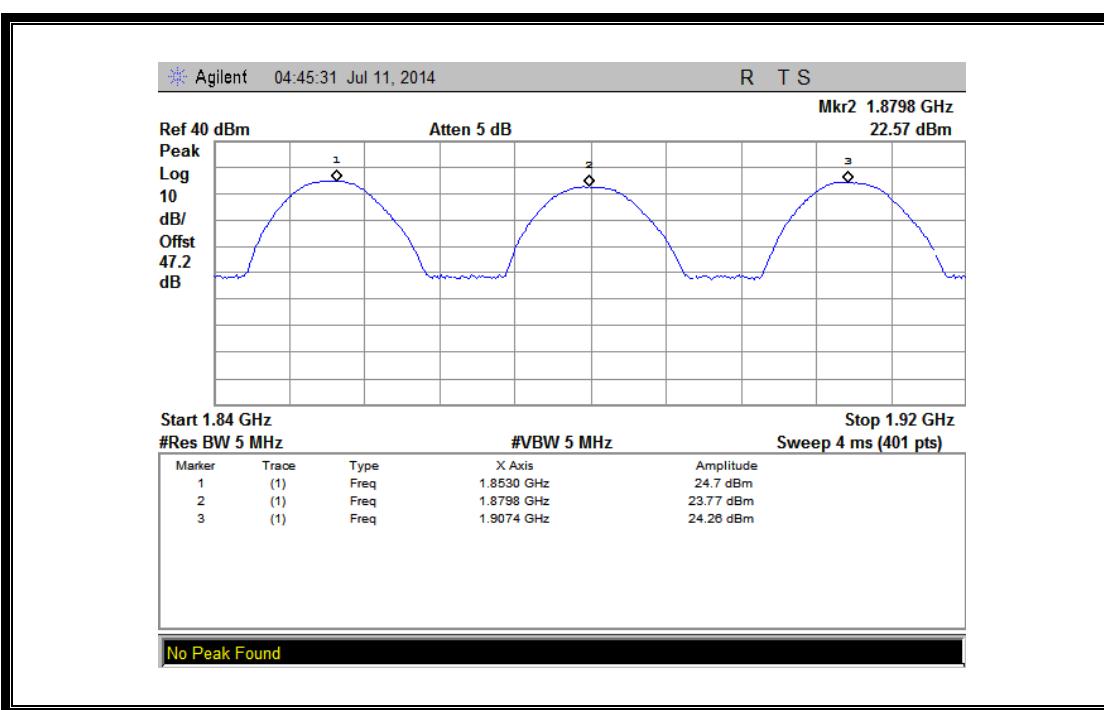
(Plot J: HSPA+ 850 MHz Channel = 4132, 4175, 4233)



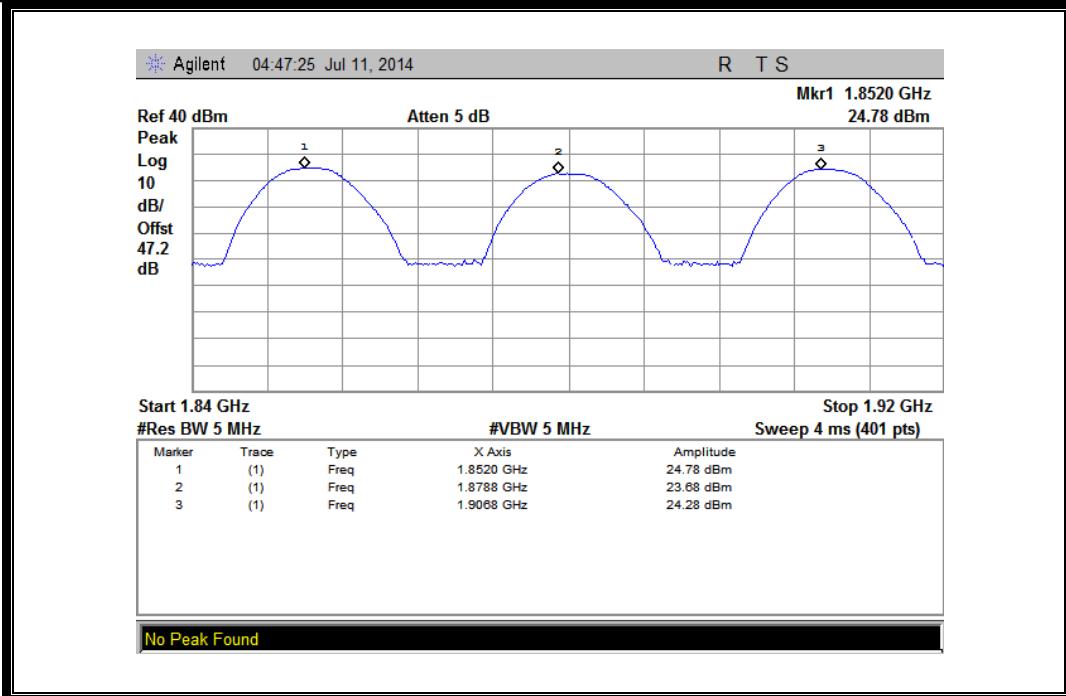
(Plot K: WCDMA 1900 MHz Channel = 9262, 9400, 9538)



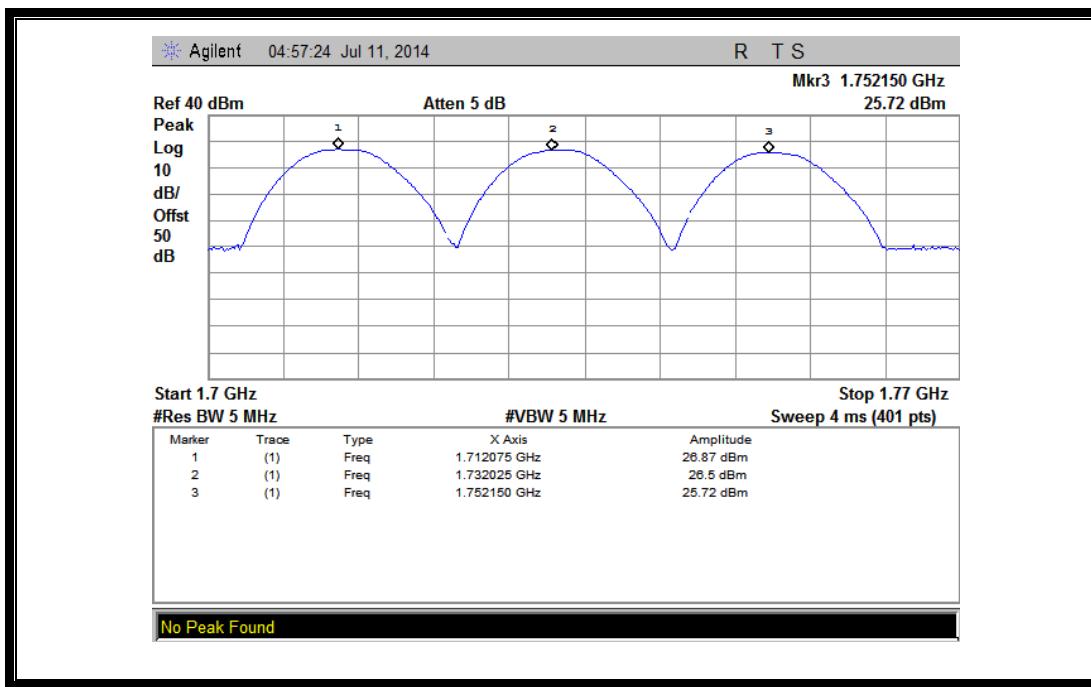
(Plot L: HSDPA1900 MHz Channel = 9262, 9400, 9538)



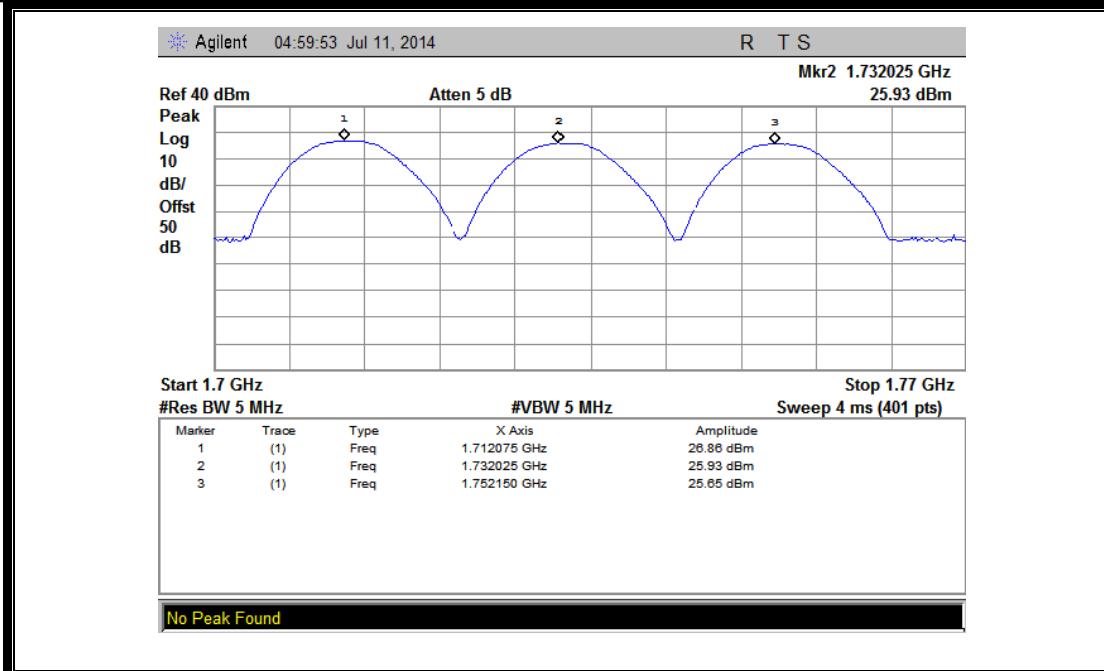
(Plot M: HSUPA1900 MHz Channel = 9262, 9400, 9538)



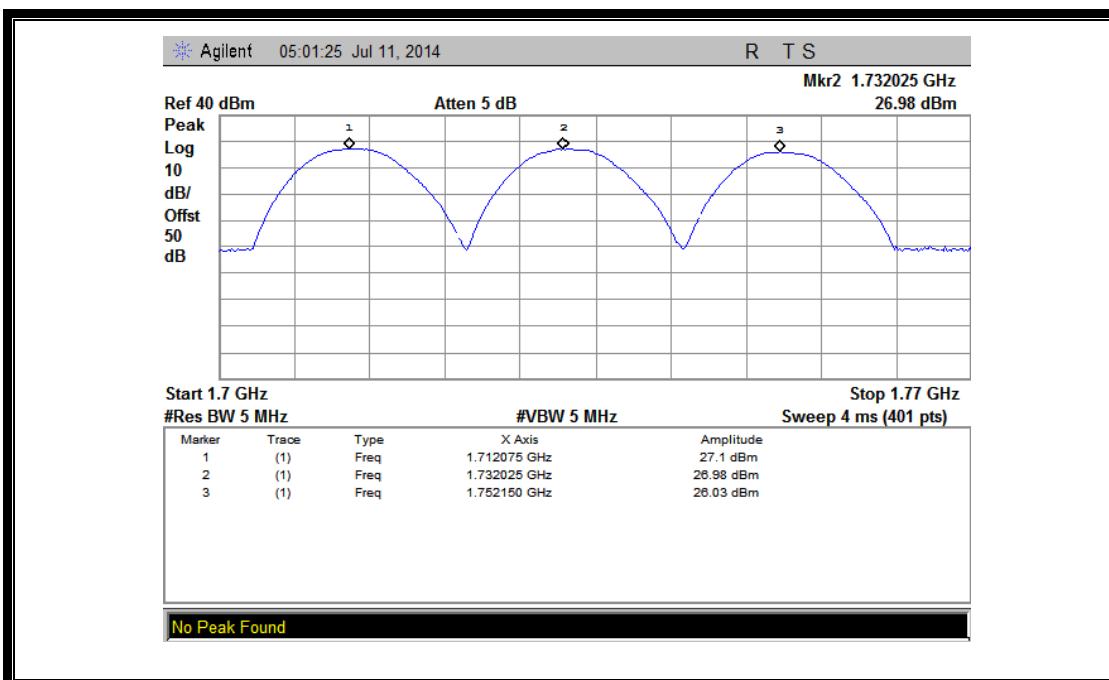
(Plot N: HSPA+1900 MHz Channel = 9262, 9400, 9538)



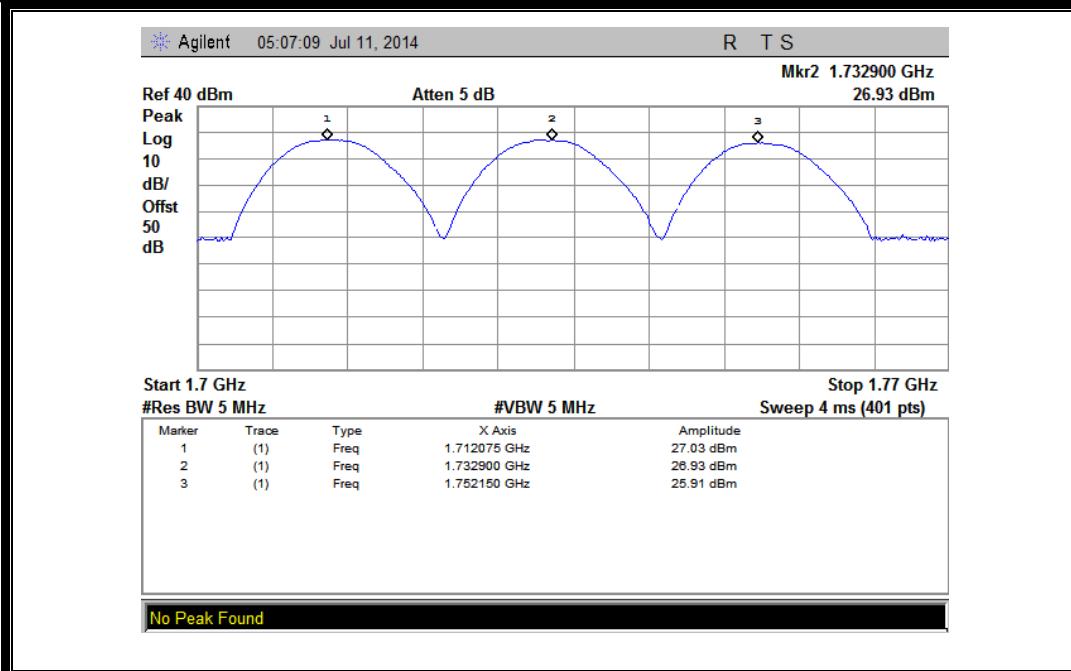
(Plot O: WCDMA 1700MHz Channel = 1312, 1412, 1513)



(Plot P: HSDPA 1700MHz Channel = 1312, 1412, 1513)



(Plot Q: HSUPA 1700MHz Channel = 1312, 1412, 1513)



(Plot R: HSPA+ 1700MHz Channel = 1312, 1412, 1513)

## 2.8 Radiated Out of Band Emissions

### 2.8.1 Requirement

According to FCC section 22.917(a) and section 24.238(a), 27.53(g) the power of any emission outside of the authorized operating frequency ranges must be attenuated below the transmitting power (P) by a factor of at least  $43+10\log(P)$  dB. This calculated to be -13dBm.

The spurious emission with frequency band 1900 according to FCC section 2.1057.

### 2.8.2 Test Description

See section 2.7.2 of this report.

Equipment List:

Description	Manufacturer	Model	Serial No.	Cal. Date	Cal. Due
System Simulator	Agilent	E5515C	GB43130131	2014.02.26	2015.02.25
Spectrum Analyzer	Agilent	E7405A	US44210471	2014.02.26	2015.02.25
Full-Anechoic Chamber	Albatross	9m*6m*6m	(n.a.)	2014.02.26	2015.02.25
Test Antenna - Bi-Log	Schwarzbeck	VULB 9163	9163-274	2014.02.26	2015.02.25
Test Antenna - Horn	Schwarzbeck	BBHA 9120C	9120C-384	2014.02.26	2015.02.25
Test Antenna - Horn	Schwarzbeck	UG -596A/U	A0902607	2014.02.26	2015.02.25
Substitution Antenna	Schwarzbeck	BBHA 9120C	9120C-384	2014.02.26	2015.02.25
Pre-AMPs	lucix	S10M100L3802	S020180L3203	2014.02.26	2015.02.25
Notch Filter	COM-MW	ZBSF-C836.5-25-X	NA	2014.02.26	2015.02.25
Notch Filter	COM-MW	ZBSF-C1747.5-75-X2	NA	2014.02.26	2015.02.25
Notch Filter	COM-MW	ZBSF-C1880-60-X2	NA	2014.02.26	2015.02.25

**Note:** when doing measurements above 1GHz, the EUT has been within the 3dB cone width of the horn antenna during horizontal antenna.

### 2.8.3 Test Result

The measurement frequency range is from 30MHz to the 10th harmonic of the fundamental frequency. The Turn Table is actuated to turn from 0° to 360°, and both horizontal and vertical polarizations of the Test Antenna are used to find the maximum radiated power. The lowest, middle and highest channels are tested to verify the out of band emissions.



## 1. Test Verdict:

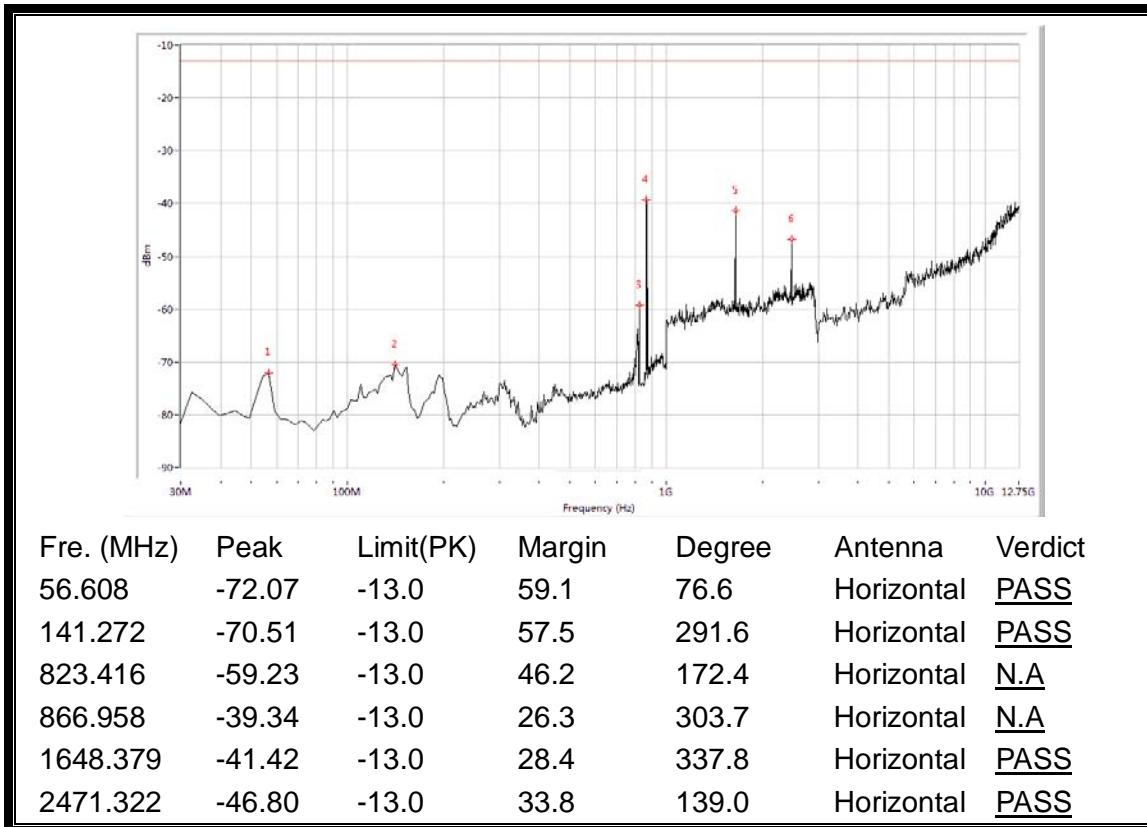
Band	Channel	Frequency (MHz)	Measured Max. Spurious Emission (dBm)		Refer to Plot	Limit (dBm)	Verdict
			Test Antenna Horizontal	Test Antenna Vertical			
GSM 850MHz	128	824.2	< -25	< -25	Plot A.1/A.2	-13	PASS
	190	836.6	< -25	< -25	Plot A.3/A.4		PASS
	251	848.8	< -25	< -25	Plot A.5/A.6		PASS
GSM 1900MHz	512	1850.2	< -25	< -25	Plot B.1/B.2	-13	PASS
	661	1880.0	< -25	< -25	Plot B.3/B.4		PASS
	810	1909.8	< -25	< -25	Plot B.5/B.6		PASS
EDGE 850MHz	128	824.2	< -25	< -25	Plot C.1/C.2	-13	PASS
	190	836.6	< -25	< -25	Plot C.3/C.4		PASS
	251	848.8	< -25	< -25	Plot C.5/C.6		PASS
EDGE 1900MHz	512	1850.2	< -25	< -25	Plot D.1/D.2	-13	PASS
	661	1880.0	< -25	< -25	Plot D.3/D.4		PASS
	810	1909.8	< -25	< -25	Plot D.5/D.6		PASS
WCDMA 850MHz	4132	826.4	< -25	< -25	Plot E.1/E.2	-13	PASS
	4175	835	< -25	< -25	Plot E.3/E.4		PASS
	4233	846.6	< -25	< -25	Plot E.5/E.6		PASS
WCDMA 1900MHz	9262	1852.4	< -25	< -25	Plot F.1/F.2	-13	PASS
	9400	1880	< -25	< -25	Plot F.3/F.4		PASS
	9538	1907.6	< -25	< -25	Plot F.5/F.6		PASS
HSDPA 850MHz	4132	826.4	< -25	< -25	Plot G.1/G.2	-13	PASS
	4175	835	< -25	< -25	Plot G.3/G.4		PASS
	4233	846.6	< -25	< -25	Plot G.5/G.6		PASS
HSDPA 1900MHz	9262	1852.4	< -25	< -25	Plot H.1/H.2	-13	PASS
	9400	1880	< -25	< -25	Plot H.3/H.4		PASS
	9538	1907.6	< -25	< -25	Plot H.5/H.6		PASS
HSUPA 850MHz	4132	826.4	< -25	< -25	Plot I.1/I.2	-13	PASS
	4175	835	< -25	< -25	Plot I.3/I.4		PASS
	4233	846.6	< -25	< -25	Plot I.5/I.6		PASS
HSUPA 1900MHz	9262	1852.4	< -25	< -25	Plot J.1/J.2	-13	PASS
	9400	1880	< -25	< -25	Plot J.3/J.4		PASS
	9538	1907.6	< -25	< -25	Plot J.5/J.6		PASS
HSPA+ 850MHz	4132	826.4	< -25	< -25	Plot K.1/K.2	-13	PASS
	4175	835	< -25	< -25	Plot K.3/K.4		PASS
	4233	846.6	< -25	< -25	Plot K.5/K.6		PASS
HSPA+ 1900MHz	9662	1852.4	< -25	< -25	Plot L.1/L.2	-13	PASS
	9800	1880	< -25	< -25	Plot L.3/L.4		PASS
	9938	1907.6	< -25	< -25	Plot L.5/L.6		PASS

Band	Channel	Frequency (MHz)	Measured Max. Spurious Emission (dBm)		Refer to Plot	Limit (dBm)	Verdict
			Test Antenna Horizontal	Test Antenna Vertical			
WCDMA 1700MHz	1312	1712.4	< -25	< -25	Plot M.1/M.2	-13	PASS
	1412	1732.4	< -25	< -25	Plot M.3/M.4		PASS
	1513	1752.6	< -25	< -25	Plot M.5/M.6		PASS
HSDPA 1700MHz	1312	1712.4	< -25	< -25	Plot N.1/N.2	-13	PASS
	1412	1732.4	< -25	< -25	Plot N.3/N.4		PASS
	1513	1752.6	< -25	< -25	Plot N.5/N.6		PASS
HSUPA 1700MHz	1312	1712.4	< -25	< -25	Plot O.1/O.2	-13	PASS
	1412	1732.4	< -25	< -25	Plot O.3/O.4		PASS
	1513	1752.6	< -25	< -25	Plot O.5/O.6		PASS
HSPA+ 1700MHz	1312	1712.4	< -25	< -25	Plot P.1/P.2	-13	PASS
	1412	1732.4	< -25	< -25	Plot P.3/P.4		PASS
	1513	1752.6	< -25	< -25	Plot P.5/P.6		PASS

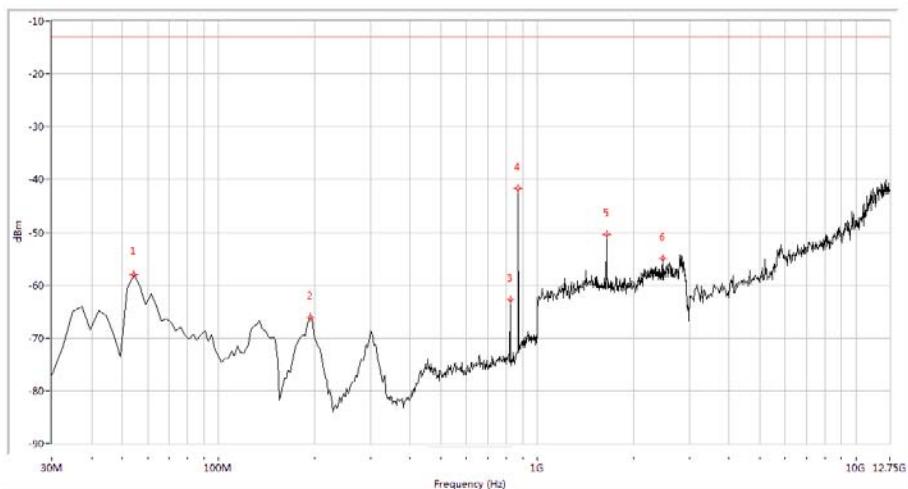
## 2. Test Plots for the Whole Measurement Frequency Range:

Note1: the power of the EUT transmitting frequency should be ignored.

Note2: All Spurious Emission tests were performed in X, Y, Z axis direction. And only the worst axis test condition was recorded in this test report.

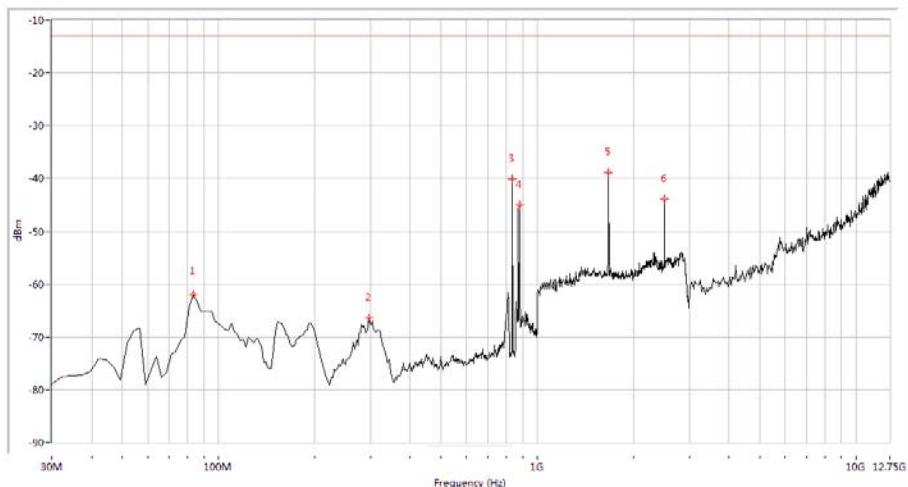


(Plot A.1: GSM 850MHz Channel = 128, Test Antenna Horizontal)



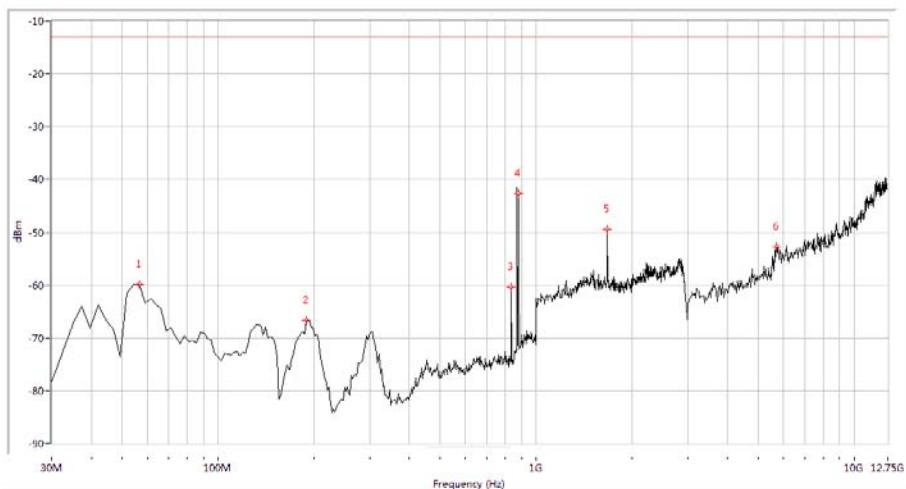
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	<u>Verdict</u>
54.190	-58.06	-13.0	45.1	157.2	Vertical	<u>PASS</u>
194.489	-66.01	-13.0	53.0	263.8	Vertical	<u>PASS</u>
823.416	-62.83	-13.0	49.8	44.9	Vertical	<u>N.A</u>
871.796	-41.62	-13.0	28.6	91.7	Vertical	<u>N.A</u>
1648.379	-50.43	-13.0	37.4	322.5	Vertical	<u>PASS</u>
2471.322	-54.96	-13.0	42.0	14.6	Vertical	<u>PASS</u>

(Plot A.2: GSM 850MHz Channel = 128, Test Antenna Vertical)



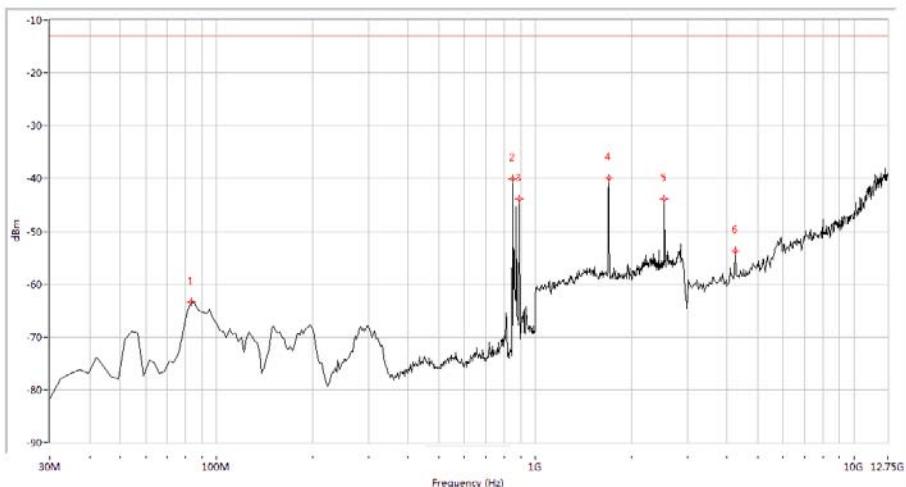
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	<u>Verdict</u>
83.217	-61.98	-13.0	49.0	114.1	Horizontal	<u>PASS</u>
296.085	-66.40	-13.0	53.4	310.1	Horizontal	<u>PASS</u>
835.511	-40.09	-13.0	27.1	184.1	Horizontal	<u>N.A</u>
879.052	-44.94	-13.0	31.9	1.9	Horizontal	<u>N.A</u>
1673.317	-38.89	-13.0	25.9	334.8	Horizontal	<u>PASS</u>
2506.234	-43.83	-13.0	30.8	161.3	Horizontal	<u>PASS</u>

(Plot A.3: GSM 850MHz Channel = 190, Test Antenna Horizontal)



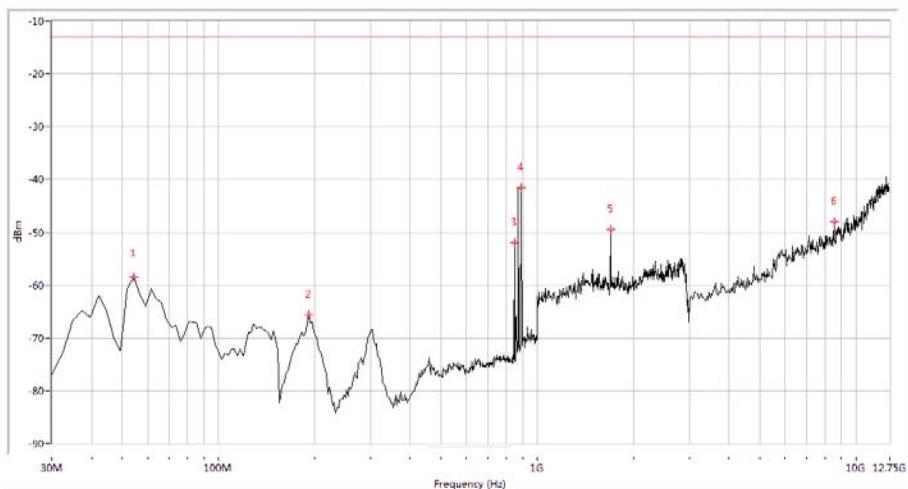
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-59.84	-13.0	46.8	28.7	Vertical	<u>PASS</u>
189.651	-66.75	-13.0	53.7	155.2	Vertical	<u>PASS</u>
835.511	-60.32	-13.0	47.3	254.9	Vertical	<u>N.A</u>
879.052	-42.66	-13.0	29.7	192.6	Vertical	<u>N.A</u>
1673.317	-49.38	-13.0	36.4	0.0	Vertical	<u>PASS</u>
5698.878	-52.74	-13.0	39.7	33.8	Vertical	<u>PASS</u>

(Plot A.4: GSM 850MHz Channel = 190, Test Antenna Vertical)



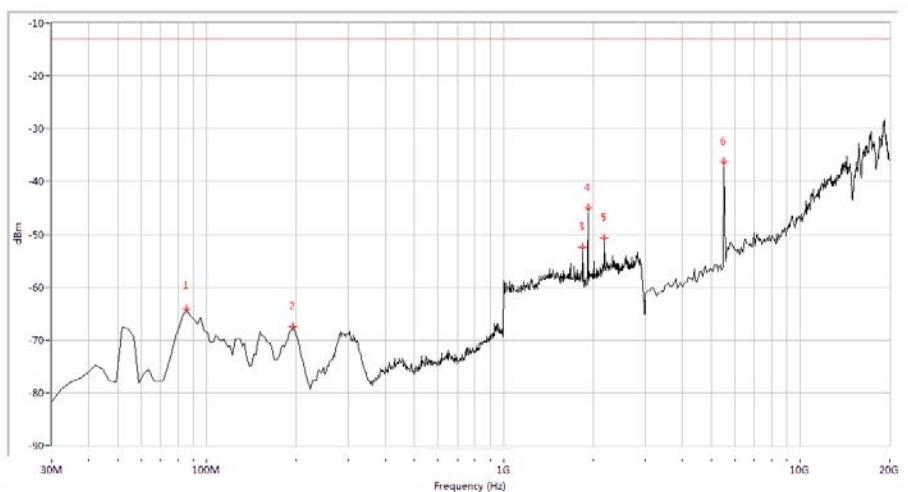
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
83.217	-63.40	-13.0	50.4	74.0	Horizontal	<u>PASS</u>
847.606	-40.09	-13.0	27.1	158.5	Horizontal	<u>N.A</u>
891.147	-43.98	-13.0	31.0	303.3	Horizontal	<u>N.A</u>
1698.254	-40.00	-13.0	27.0	360.0	Horizontal	<u>PASS</u>
2541.147	-43.88	-13.0	30.9	159.8	Horizontal	<u>PASS</u>
4240.025	-53.71	-13.0	40.7	174.5	Horizontal	<u>PASS</u>

(Plot A.5: GSM 850MHz Channel = 251, Test Antenna Horizontal)



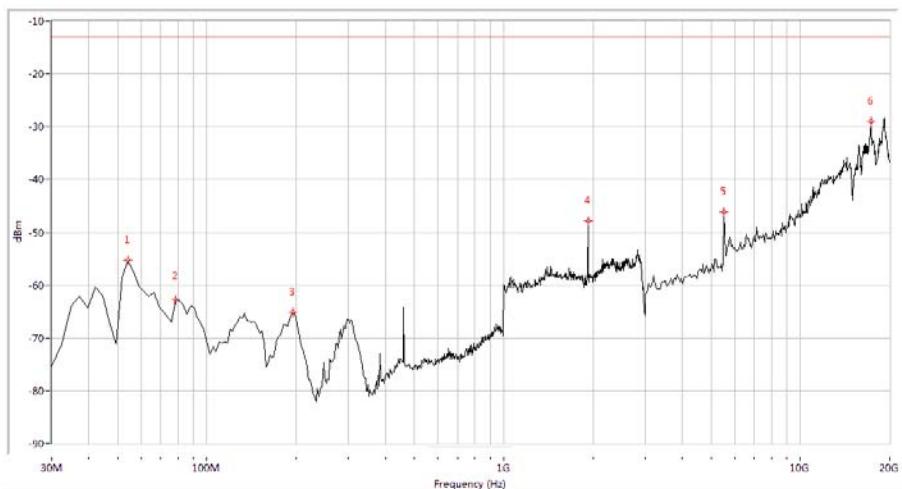
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-58.44	-13.0	45.4	172.6	Vertical	<u>PASS</u>
192.070	-65.67	-13.0	52.7	264.3	Vertical	<u>PASS</u>
847.606	-51.92	-13.0	38.9	77.9	Vertical	<u>N.A</u>
891.147	-41.58	-13.0	28.6	124.5	Vertical	<u>N.A</u>
1698.254	-49.39	-13.0	36.4	33.8	Vertical	<u>PASS</u>
8543.641	-48.09	-13.0	35.1	147.2	Vertical	<u>PASS</u>

(Plot A.6: GSM 850MHz Channel = 251, Test Antenna Vertical)



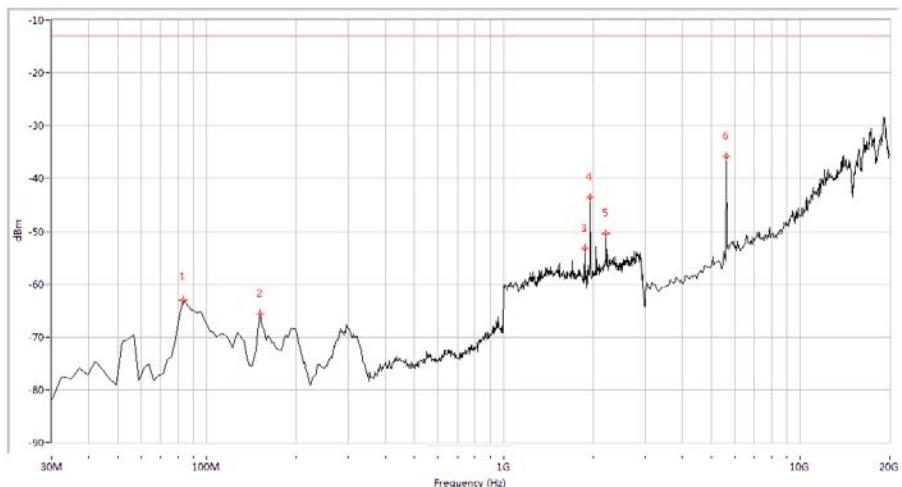
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
85.636	-64.19	-13.0	51.2	68.0	Horizontal	<u>PASS</u>
194.489	-67.52	-13.0	54.5	38.1	Horizontal	<u>PASS</u>
1847.880	-52.49	-13.0	39.5	159.8	Horizontal	<u>N.A</u>
1927.681	-45.05	-13.0	32.0	2.1	Horizontal	<u>N.A</u>
2187.032	-50.72	-13.0	37.7	87.8	Horizontal	<u>PASS</u>
5543.641	-36.31	-13.0	23.3	265.9	Horizontal	<u>PASS</u>

(Plot B.1: GSM 1900MHz Channel = 512, Test Antenna Horizontal)



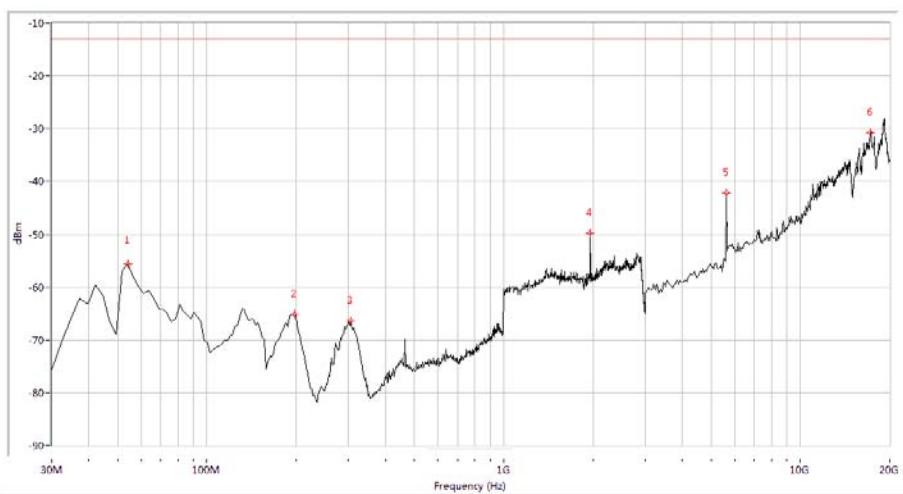
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-55.34	-13.0	42.3	49.3	Vertical	<u>PASS</u>
78.379	-62.76	-13.0	49.8	37.7	Vertical	<u>PASS</u>
194.489	-65.16	-13.0	52.2	335.0	Vertical	<u>PASS</u>
1927.681	-47.79	-13.0	34.8	239.5	Vertical	N.A
5543.641	-46.19	-13.0	33.2	-0.0	Vertical	<u>PASS</u>
17286.783	-29.02	-13.0	16.0	66.7	Vertical	<u>PASS</u>

(Plot B.2: GSM 1900MHz Channel = 512, Test Antenna Vertical)



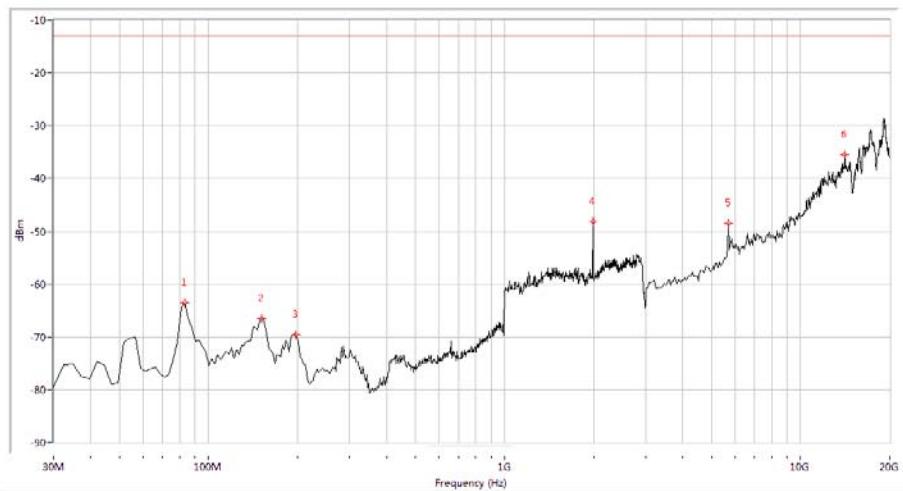
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
83.217	-63.08	-13.0	50.1	86.3	Horizontal	<u>PASS</u>
150.948	-65.60	-13.0	52.6	265.1	Horizontal	<u>PASS</u>
1877.805	-53.28	-13.0	40.3	124.3	Horizontal	N.A
1957.606	-43.64	-13.0	30.6	47.1	Horizontal	N.A
2216.958	-50.37	-13.0	37.4	110.4	Horizontal	<u>PASS</u>
5628.429	-35.82	-13.0	22.8	249.0	Horizontal	<u>PASS</u>

(Plot B.3: GSM 1900MHz Channel = 661, Test Antenna Horizontal)



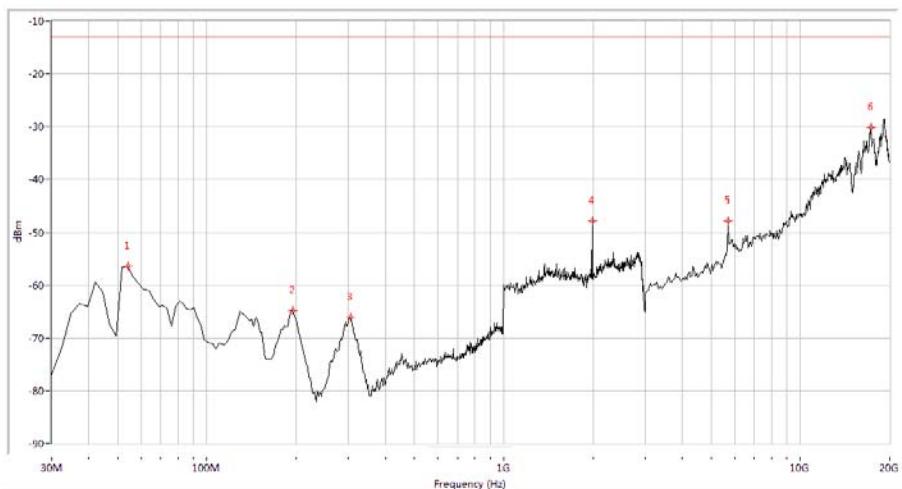
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-55.68	-13.0	42.7	4.4	Vertical	<u>PASS</u>
196.908	-65.15	-13.0	52.2	341.0	Vertical	<u>PASS</u>
305.761	-66.32	-13.0	53.3	108.1	Vertical	<u>PASS</u>
1957.606	-49.73	-13.0	36.7	213.6	Vertical	N.A
5628.429	-42.13	-13.0	29.1	125.2	Vertical	<u>PASS</u>
17201.995	-30.75	-13.0	17.8	40.8	Vertical	<u>PASS</u>

(Plot B.4: GSM 1900MHz Channel = 661, Test Antenna Vertical)



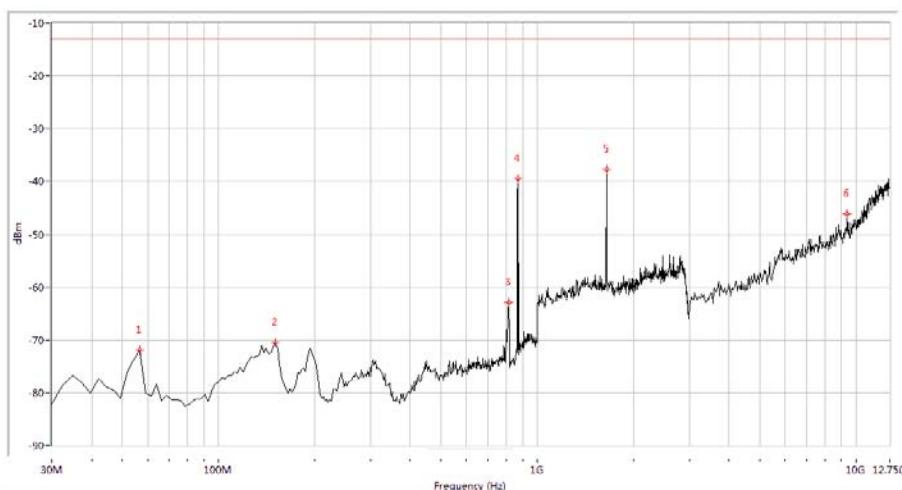
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
83.217	-63.48	-13.0	50.5	75.2	Horizontal	<u>PASS</u>
150.948	-66.61	-13.0	53.6	301.9	Horizontal	<u>PASS</u>
196.908	-69.61	-13.0	56.6	323.1	Horizontal	<u>PASS</u>
1987.531	-48.11	-13.0	35.1	303.8	Horizontal	N.A
5713.217	-48.47	-13.0	35.5	40.6	Horizontal	<u>PASS</u>
14107.232	-35.56	-13.0	22.6	351.8	Horizontal	<u>PASS</u>

(Plot B.5: GSM 1900MHz Channel = 810, Test Antenna Horizontal)



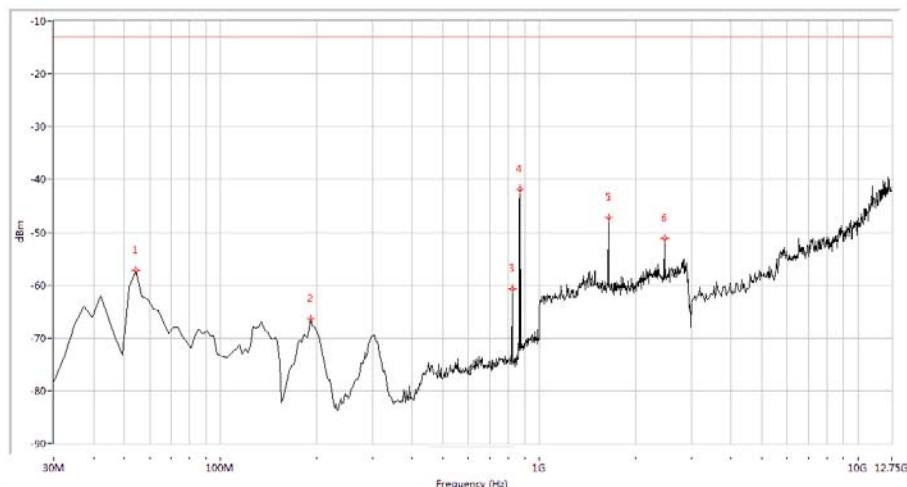
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-56.45	-13.0	43.5	346.6	Vertical	<u>PASS</u>
194.489	-64.79	-13.0	51.8	319.9	Vertical	<u>PASS</u>
305.761	-66.03	-13.0	53.0	73.7	Vertical	<u>PASS</u>
1987.531	-47.85	-13.0	34.8	136.8	Vertical	N.A
5713.217	-47.83	-13.0	34.8	43.2	Vertical	<u>PASS</u>
17286.783	-30.14	-13.0	17.1	85.6	Vertical	<u>PASS</u>

(PlotB.6: GSM 1900MHz Channel = 810, Test Antenna Vertical)



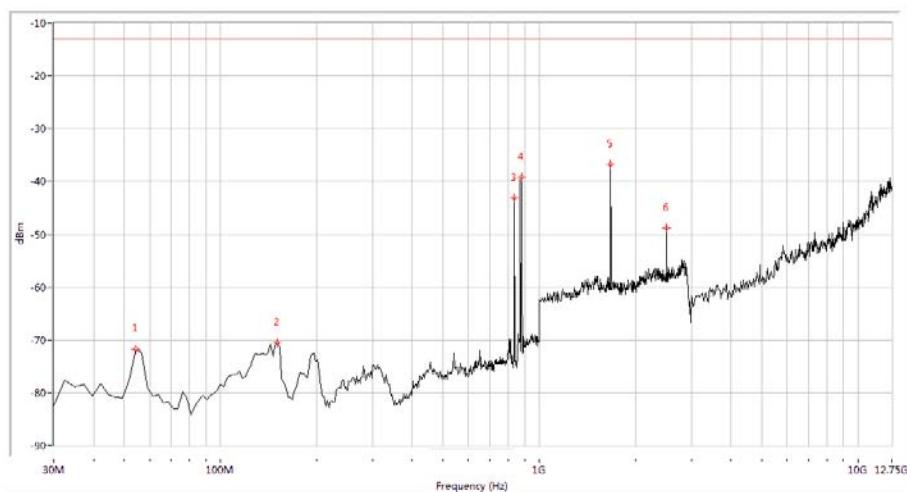
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-71.96	-13.0	59.0	65.4	Horizontal	<u>PASS</u>
150.948	-70.45	-13.0	57.4	158.7	Horizontal	<u>PASS</u>
813.741	-62.86	-13.0	49.9	325.6	Horizontal	N.A
871.796	-39.51	-13.0	26.5	294.5	Horizontal	N.A
1648.379	-37.70	-13.0	24.7	118.4	Horizontal	<u>PASS</u>
9394.638	-46.10	-13.0	33.1	67.8	Horizontal	<u>PASS</u>

(Plot C.1: EGPRS 850MHz Channel = 128, Test Antenna Horizontal)



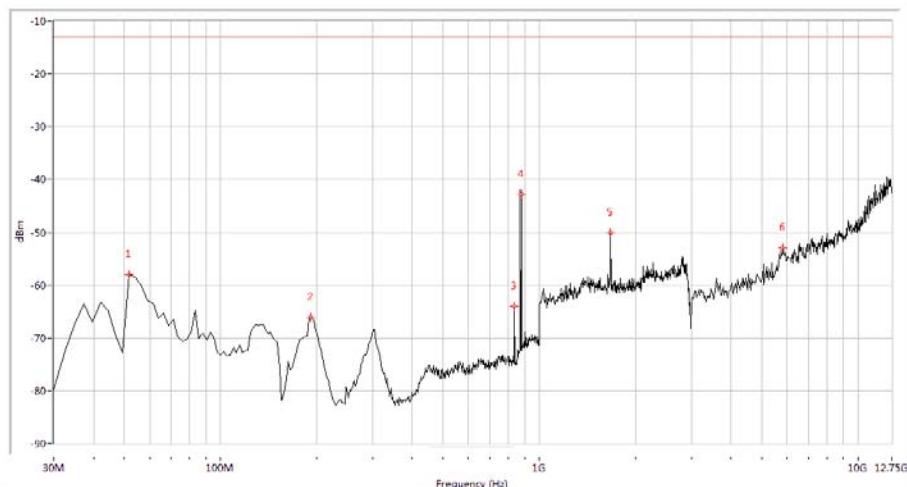
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-57.19	-13.0	44.2	35.2	Vertical	<u>PASS</u>
192.070	-66.44	-13.0	53.4	174.8	Vertical	<u>PASS</u>
823.416	-60.70	-13.0	47.7	325.9	Vertical	<u>N.A</u>
871.796	-41.86	-13.0	28.9	117.6	Vertical	<u>N.A</u>
1648.379	-47.16	-13.0	34.2	88.5	Vertical	<u>PASS</u>
2471.322	-51.25	-13.0	38.3	157.6	Vertical	<u>PASS</u>

(Plot C.2: EGPRS 850MHz Channel = 128, Test Antenna Vertical)



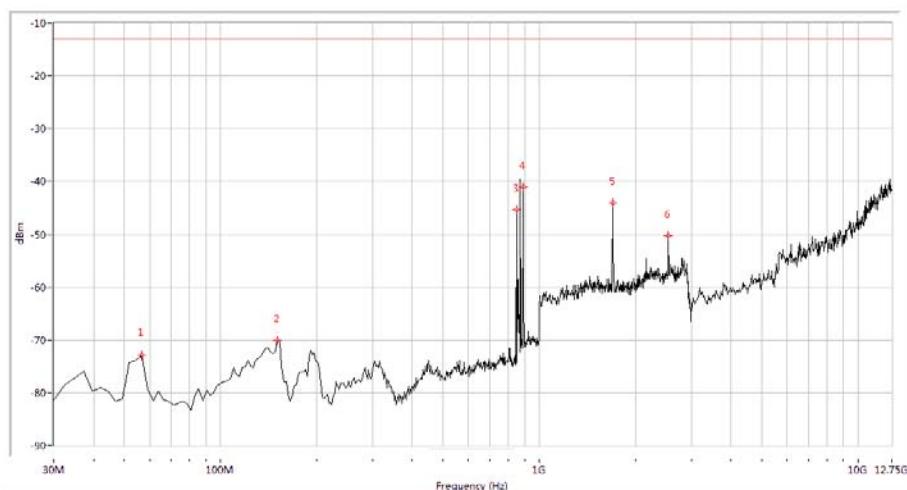
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-71.75	-13.0	58.7	337.2	Horizontal	<u>PASS</u>
150.948	-70.59	-13.0	57.6	168.5	Horizontal	<u>PASS</u>
835.511	-43.10	-13.0	30.1	65.4	Horizontal	<u>N.A</u>
879.052	-39.17	-13.0	26.2	272.8	Horizontal	<u>N.A</u>
1673.317	-36.73	-13.0	23.7	91.4	Horizontal	<u>PASS</u>
2506.234	-48.85	-13.0	35.9	63.9	Horizontal	<u>PASS</u>

(Plot C.3: EGPRS 850MHz Channel = 190, Test Antenna Horizontal)



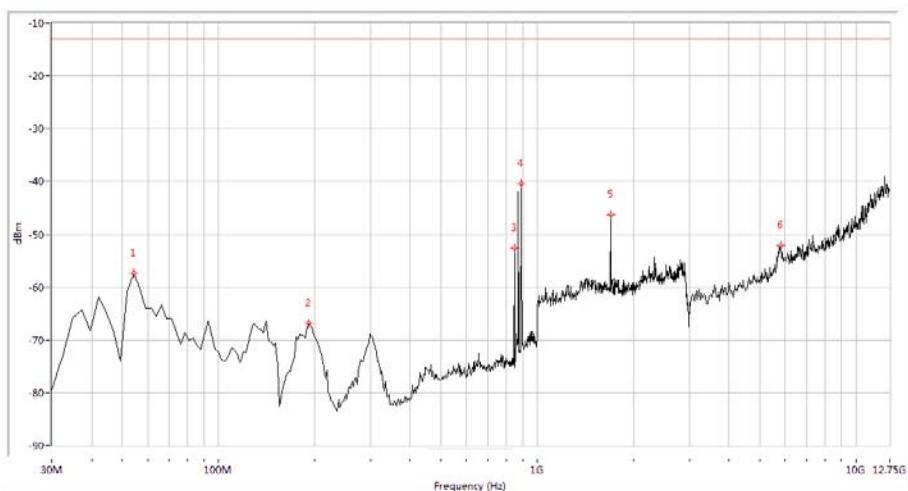
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
51.771	-57.93	-13.0	44.9	143.2	Vertical	<u>PASS</u>
192.070	-66.09	-13.0	53.1	277.5	Vertical	<u>PASS</u>
835.511	-63.97	-13.0	51.0	94.6	Vertical	<u>N.A</u>
879.052	-42.74	-13.0	29.7	155.7	Vertical	<u>N.A</u>
1673.317	-50.11	-13.0	37.1	263.4	Vertical	<u>PASS</u>
5820.449	-52.97	-13.0	40.0	118.1	Vertical	<u>PASS</u>

(Plot C.4: EGPRS 850MHz Channel = 190, Test Antenna Vertical)



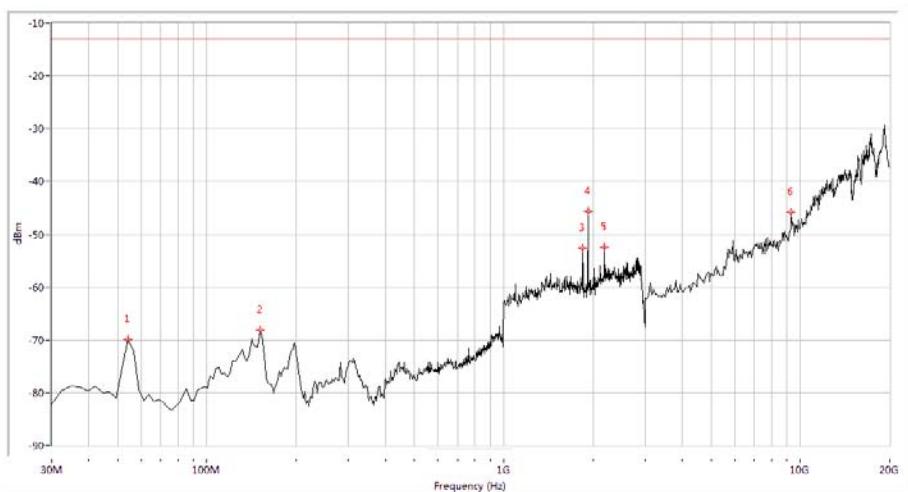
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.85	-13.0	59.8	133.4	Horizontal	<u>PASS</u>
150.948	-70.05	-13.0	57.0	248.7	Horizontal	<u>PASS</u>
847.606	-45.25	-13.0	32.3	66.8	Horizontal	<u>N.A</u>
891.147	-41.07	-13.0	28.1	158.2	Horizontal	<u>N.A</u>
1698.254	-44.09	-13.0	31.1	261.5	Horizontal	<u>PASS</u>
2541.147	-50.28	-13.0	37.3	0.0	Horizontal	<u>PASS</u>

(Plot C.5: EGPRS 850MHz Channel = 251, Test Antenna Horizontal)



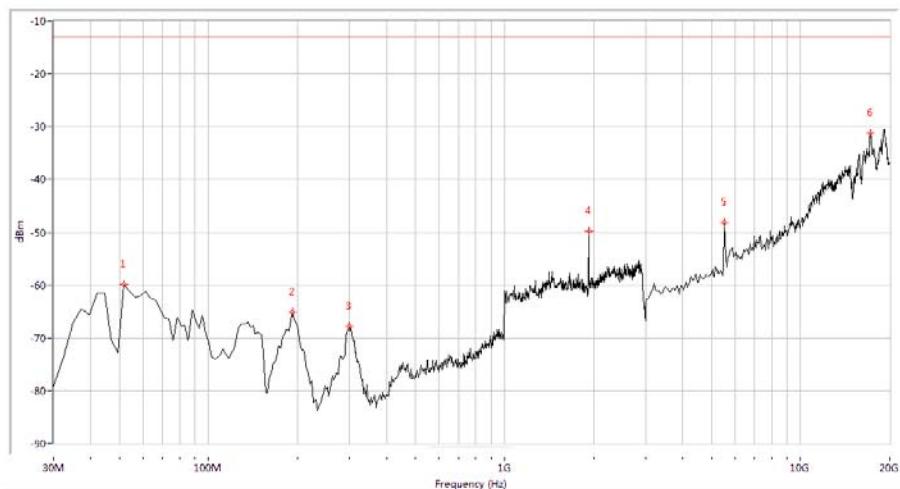
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-57.34	-13.0	44.3	128.5	Vertical	<u>PASS</u>
192.070	-66.83	-13.0	53.8	69.3	Vertical	<u>PASS</u>
847.606	-52.64	-13.0	39.6	177.6	Vertical	<u>N.A</u>
891.147	-40.42	-13.0	27.4	254.2	Vertical	<u>N.A</u>
1698.254	-46.27	-13.0	33.3	311.8	Vertical	<u>PASS</u>
5820.449	-52.16	-13.0	39.2	45.9	Vertical	<u>PASS</u>

(Plot C.6: EGPRS 850MHz Channel = 251, Test Antenna Vertical)



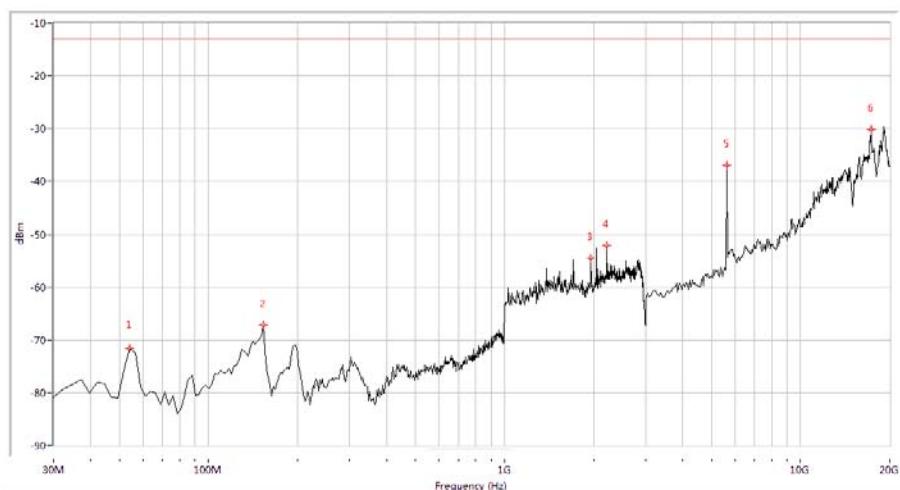
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-69.83	-13.0	56.8	127.5	Horizontal	<u>PASS</u>
150.948	-68.07	-13.0	55.1	33.8	Horizontal	<u>PASS</u>
1847.880	-52.68	-13.0	39.7	246.8	Horizontal	<u>N.A</u>
1927.681	-45.59	-13.0	32.6	159.4	Horizontal	<u>N.A</u>
2187.032	-52.53	-13.0	39.5	66.7	Horizontal	<u>PASS</u>
9316.708	-45.82	-13.0	32.8	169.4	Horizontal	<u>PASS</u>

(Plot D.1: EGPRS 1900MHz Channel = 512, Test Antenna Horizontal)



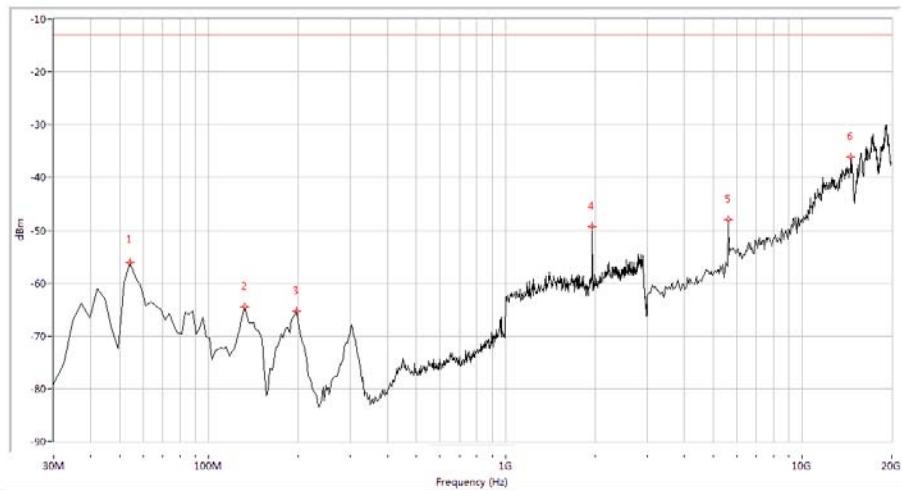
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
51.771	-59.94	-13.0	46.9	22.5	Vertical	<u>PASS</u>
192.070	-65.18	-13.0	52.2	157.6	Vertical	<u>PASS</u>
298.504	-67.80	-13.0	54.8	218.4	Vertical	<u>PASS</u>
1927.681	-49.72	-13.0	36.7	99.7	Vertical	N.A
5543.641	-48.20	-13.0	35.2	217.6	Vertical	<u>PASS</u>
17201.995	-31.19	-13.0	18.2	336.1	Vertical	<u>PASS</u>

(Plot D.2: EGPRS 1900MHz Channel = 512, Test Antenna Vertical)



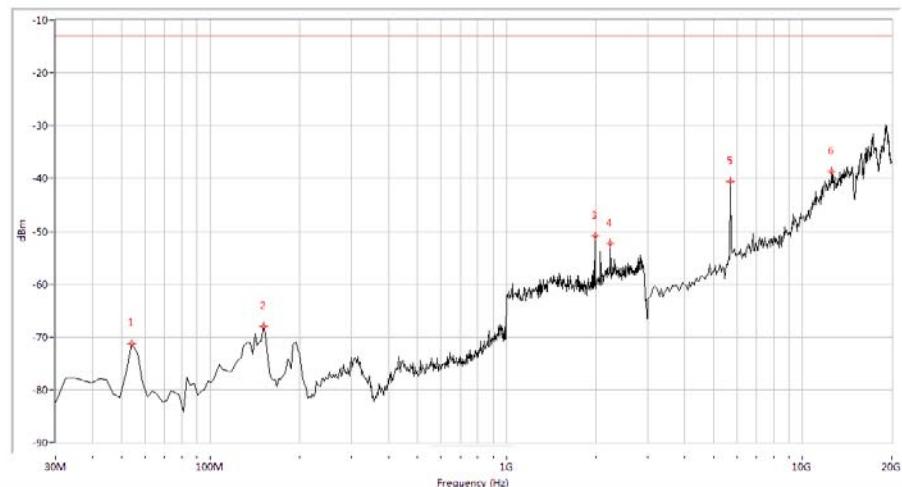
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-71.56	-13.0	58.6	145.8	Horizontal	<u>PASS</u>
153.367	-67.18	-13.0	54.2	221.6	Horizontal	<u>PASS</u>
1957.606	-54.48	-13.0	41.5	37.9	Horizontal	N.A
2216.958	-52.11	-13.0	39.1	164.2	Horizontal	<u>PASS</u>
5628.429	-36.89	-13.0	23.9	157.1	Horizontal	<u>PASS</u>
17329.177	-30.17	-13.0	17.2	66.3	Horizontal	<u>PASS</u>

(Plot D.3: EGPRS 1900MHz Channel = 661, Test Antenna Horizontal)



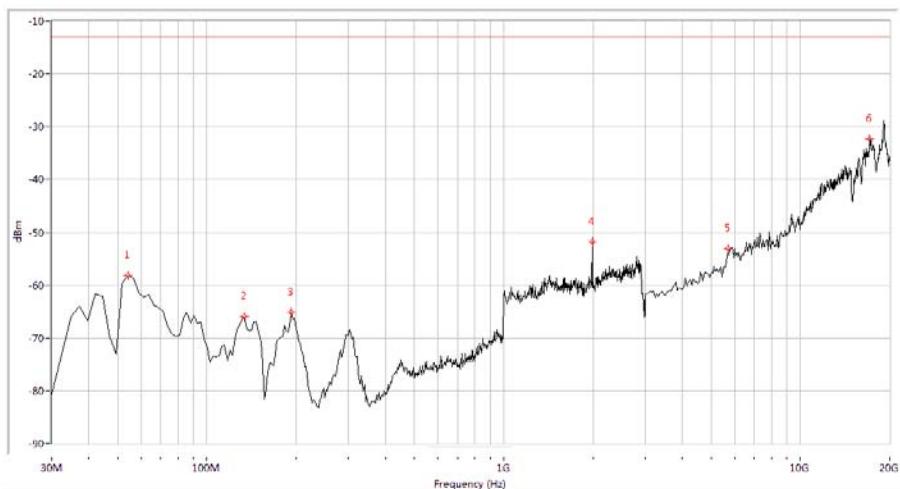
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-56.12	-13.0	43.1	337.4	Vertical	<u>PASS</u>
131.596	-64.53	-13.0	51.5	129.5	Vertical	<u>PASS</u>
196.908	-65.25	-13.0	52.3	66.4	Vertical	<u>PASS</u>
1957.606	-49.26	-13.0	36.3	172.8	Vertical	N.A
5628.429	-48.10	-13.0	35.1	47.3	Vertical	<u>PASS</u>
14573.566	-36.12	-13.0	23.1	318.2	Vertical	<u>PASS</u>

(Plot D.4: EGPRS 1900MHz Channel = 661, Test Antenna Vertical)



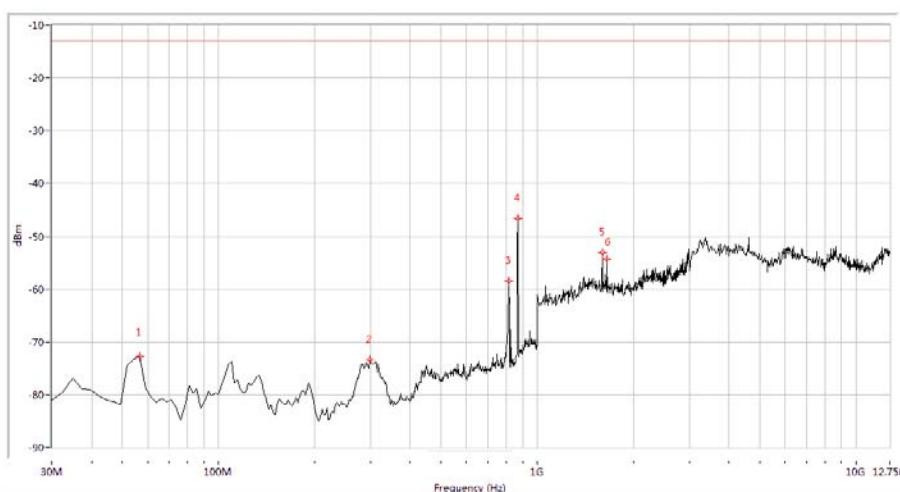
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-71.27	-13.0	58.3	127.4	Horizontal	<u>PASS</u>
150.948	-67.90	-13.0	54.9	39.6	Horizontal	<u>PASS</u>
1987.531	-50.88	-13.0	37.9	177.5	Horizontal	N.A
2246.883	-52.31	-13.0	39.3	214.7	Horizontal	<u>PASS</u>
5713.217	-40.60	-13.0	27.6	79.2	Horizontal	<u>PASS</u>
12538.653	-38.72	-13.0	25.7	153.4	Horizontal	<u>PASS</u>

(Plot D.5: EGPRS 1900MHz Channel = 810, Test Antenna Horizontal)



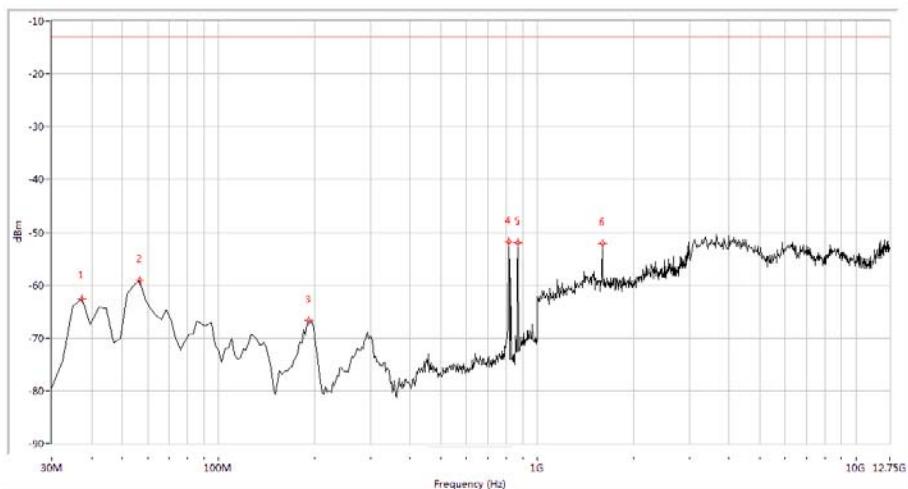
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-58.22	-13.0	45.2	263.5	Vertical	<u>PASS</u>
134.015	-65.84	-13.0	52.8	314.7	Vertical	<u>PASS</u>
192.070	-65.10	-13.0	52.1	66.9	Vertical	<u>PASS</u>
1987.531	-51.88	-13.0	38.9	152.4	Vertical	N.A
5713.217	-53.01	-13.0	40.0	324.3	Vertical	<u>PASS</u>
17159.601	-32.29	-13.0	19.3	171.4	Vertical	<u>PASS</u>

(Plot D.6: EGPRS 1900MHz Channel = 810, Test Antenna Vertical)



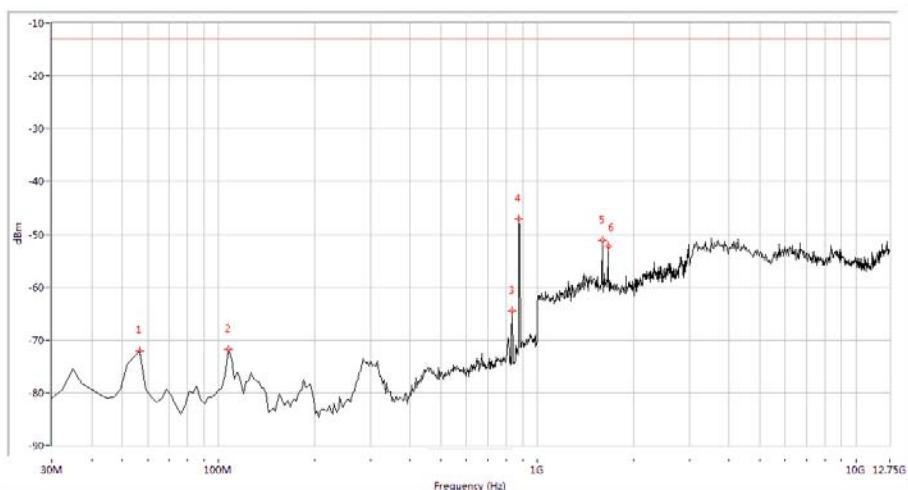
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.72	-13.0	59.7	207.1	Horizontal	<u>PASS</u>
298.504	-73.36	-13.0	60.4	126.0	Horizontal	<u>PASS</u>
816.160	-58.46	-13.0	45.5	263.3	Horizontal	N.A
869.377	-46.52	-13.0	33.5	213.9	Horizontal	N.A
1598.504	-53.13	-13.0	40.1	157.5	Horizontal	<u>PASS</u>
1653.367	-54.42	-13.0	41.4	209.6	Horizontal	<u>PASS</u>

(Plot E.1: WCDMA 850MHz Channel = 4132, Test Antenna Horizontal)



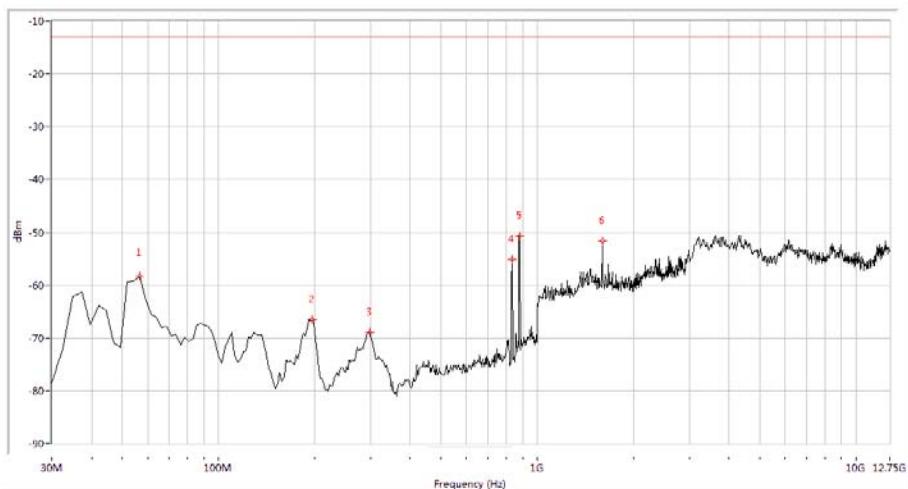
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-62.53	-13.0	49.5	352.8	Vertical	<u>PASS</u>
56.608	-59.13	-13.0	46.1	201.0	Vertical	<u>PASS</u>
192.070	-66.72	-13.0	53.7	194.5	Vertical	<u>PASS</u>
816.160	-51.89	-13.0	38.9	16.5	Vertical	<u>N.A</u>
869.377	-51.93	-13.0	38.9	24.3	Vertical	<u>N.A</u>
1598.504	-52.10	-13.0	39.1	3.5	Vertical	<u>PASS</u>

(Plot E.2: WCDMA 850MHz Channel = 4132, Test Antenna Vertical)



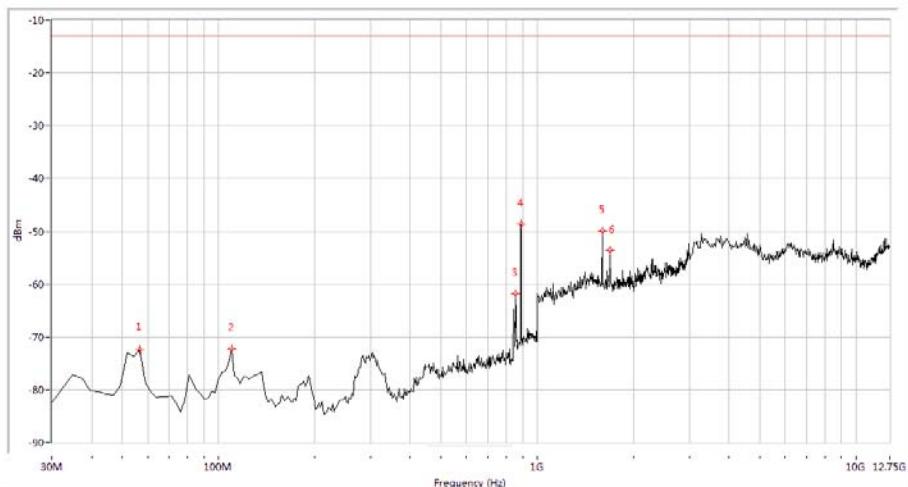
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.11	-13.0	59.1	118.1	Horizontal	<u>PASS</u>
107.406	-71.82	-13.0	58.8	8.8	Horizontal	<u>PASS</u>
835.511	-64.56	-13.0	51.6	13.1	Horizontal	<u>N.A</u>
876.633	-47.07	-13.0	34.1	268.7	Horizontal	<u>N.A</u>
1598.504	-51.14	-13.0	38.1	199.0	Horizontal	<u>PASS</u>
1668.329	-52.29	-13.0	39.3	357.8	Horizontal	<u>PASS</u>

(Plot E.3: WCDMA 850MHz Channel = 4175, Test Antenna Horizontal)



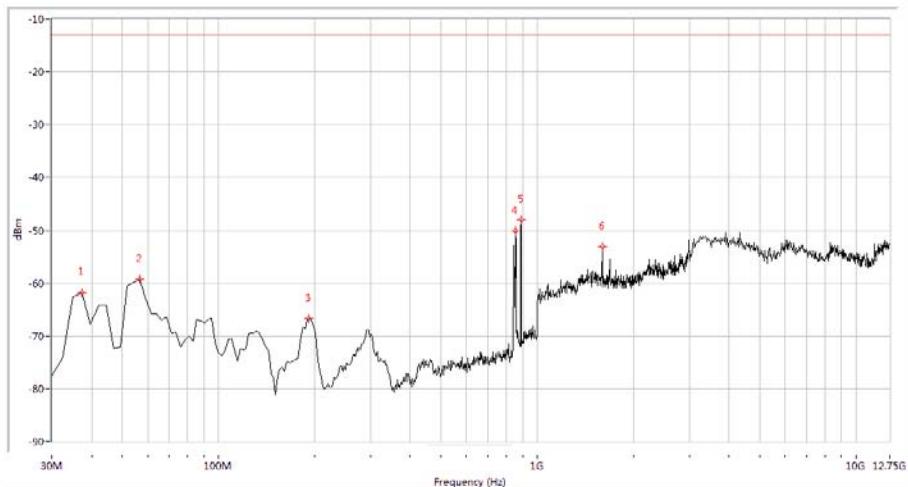
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-58.30	-13.0	45.3	207.8	Vertical	<u>PASS</u>
196.908	-66.60	-13.0	53.6	360.0	Vertical	<u>PASS</u>
298.504	-68.95	-13.0	55.9	160.9	Vertical	<u>PASS</u>
835.511	-55.13	-13.0	42.1	151.2	Vertical	<u>N.A</u>
879.052	-50.66	-13.0	37.7	167.5	Vertical	<u>N.A</u>
1598.504	-51.59	-13.0	38.6	270.6	Vertical	<u>PASS</u>

(Plot E.4: WCDMA 850MHz Channel = 4175, Test Antenna Vertical)



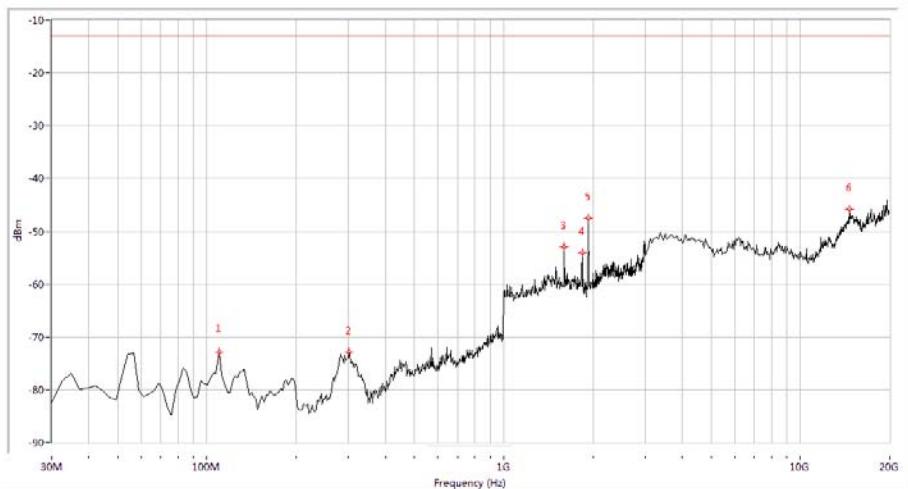
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.49	-13.0	59.5	189.1	Horizontal	<u>PASS</u>
109.825	-72.31	-13.0	59.3	16.8	Horizontal	<u>PASS</u>
854.863	-61.76	-13.0	48.8	284.8	Horizontal	<u>N.A</u>
891.147	-48.62	-13.0	35.6	157.2	Horizontal	<u>N.A</u>
1598.504	-49.94	-13.0	36.9	178.6	Horizontal	<u>PASS</u>
1688.279	-53.57	-13.0	40.6	3.4	Horizontal	<u>PASS</u>

(Plot E.5: WCDMA 850MHz Channel = 4233, Test Antenna Horizontal)



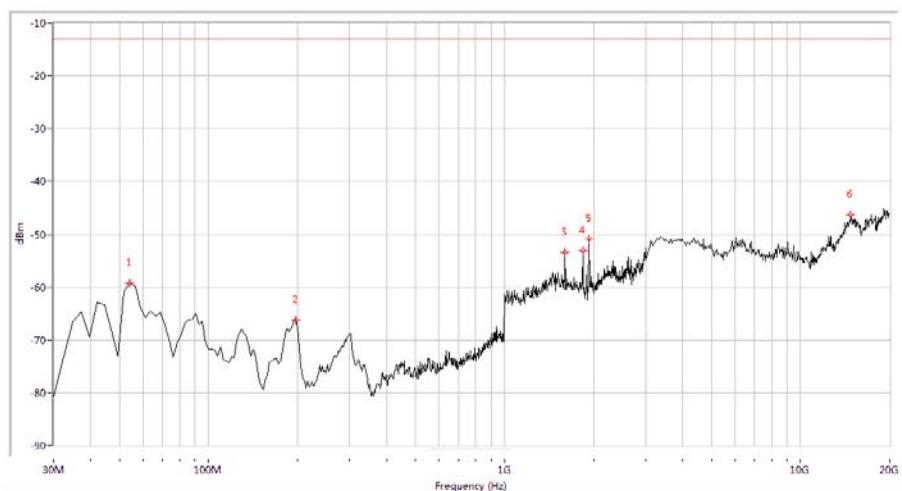
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-61.86	-13.0	48.9	169.4	Vertical	<u>PASS</u>
56.608	-59.32	-13.0	46.3	263.8	Vertical	<u>PASS</u>
192.070	-66.68	-13.0	53.7	152.0	Vertical	<u>PASS</u>
854.863	-50.02	-13.0	37.0	0.8	Vertical	N.A
891.147	-47.99	-13.0	35.0	21.4	Vertical	N.A
1598.504	-53.14	-13.0	40.1	86.4	Vertical	<u>PASS</u>

(Plot E.6: WCDMA 850MHz Channel = 4233, Test Antenna Vertical)



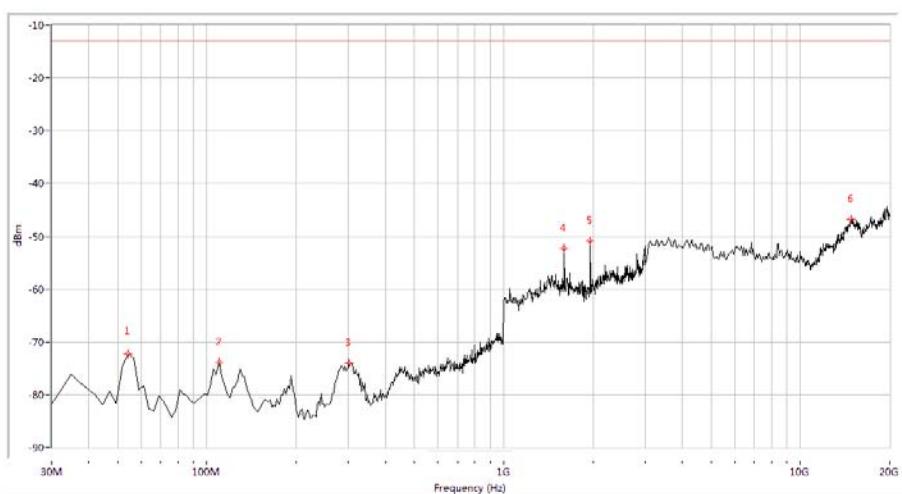
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
109.825	-72.87	-13.0	59.9	167.5	Horizontal	<u>PASS</u>
300.923	-72.94	-13.0	59.9	65.8	Horizontal	<u>PASS</u>
1598.504	-52.96	-13.0	40.0	256.8	Horizontal	<u>PASS</u>
1837.905	-54.03	-13.0	41.0	139.4	Horizontal	N.A
1932.668	-47.53	-13.0	34.5	54.6	Horizontal	N.A
14658.354	-45.79	-13.0	32.8	28.2	Horizontal	<u>PASS</u>

(Plot F.1: WCDMA 1900MHz Channel = 9262, Test Antenna Horizontal)



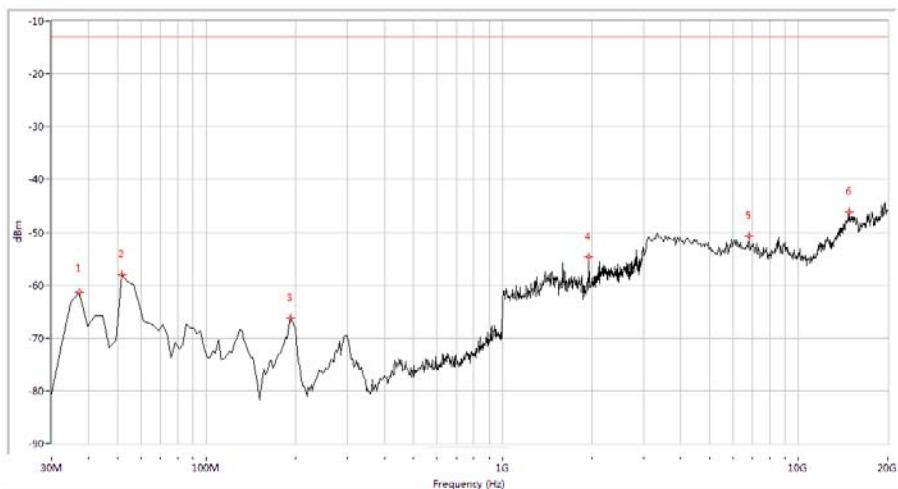
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-59.25	-13.0	46.2	63.8	Vertical	<u>PASS</u>
196.908	-66.21	-13.0	53.2	48.5	Vertical	<u>PASS</u>
1598.504	-53.37	-13.0	40.4	195.4	Vertical	<u>PASS</u>
1837.905	-53.15	-13.0	40.2	246.7	Vertical	N.A
1927.681	-50.90	-13.0	37.9	0.0	Vertical	N.A
14785.536	-46.21	-13.0	33.2	10.9	Vertical	<u>PASS</u>

(Plot F.2: WCDMA 1900MHz Channel = 9262, Test Antenna Vertical)



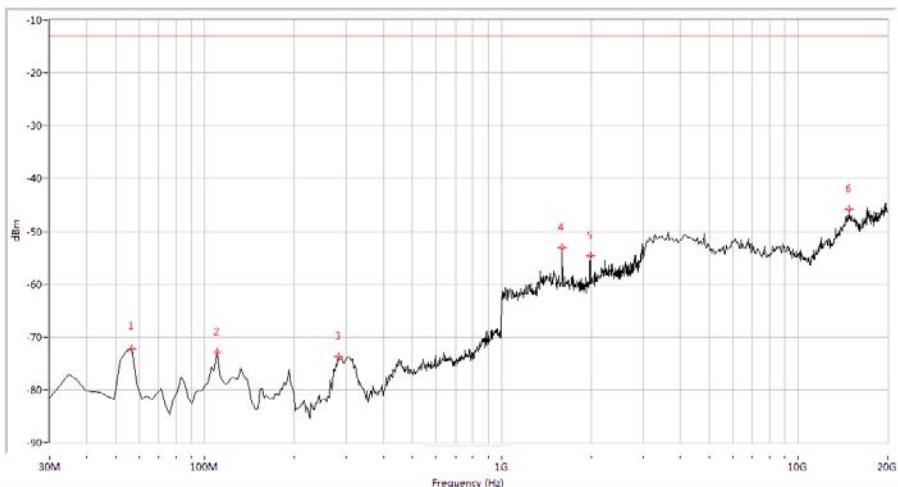
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-72.21	-13.0	59.2	266.2	Horizontal	<u>PASS</u>
109.825	-73.90	-13.0	60.9	15.7	Horizontal	<u>PASS</u>
300.923	-74.02	-13.0	61.0	190.1	Horizontal	<u>PASS</u>
1598.504	-52.26	-13.0	39.3	288.9	Horizontal	<u>PASS</u>
1957.606	-50.89	-13.0	37.9	256.9	Horizontal	N.A
14870.324	-46.78	-13.0	33.8	288.9	Horizontal	<u>PASS</u>

(Plot F.3: WCDMA 1900MHz Channel = 9400, Test Antenna Horizontal)



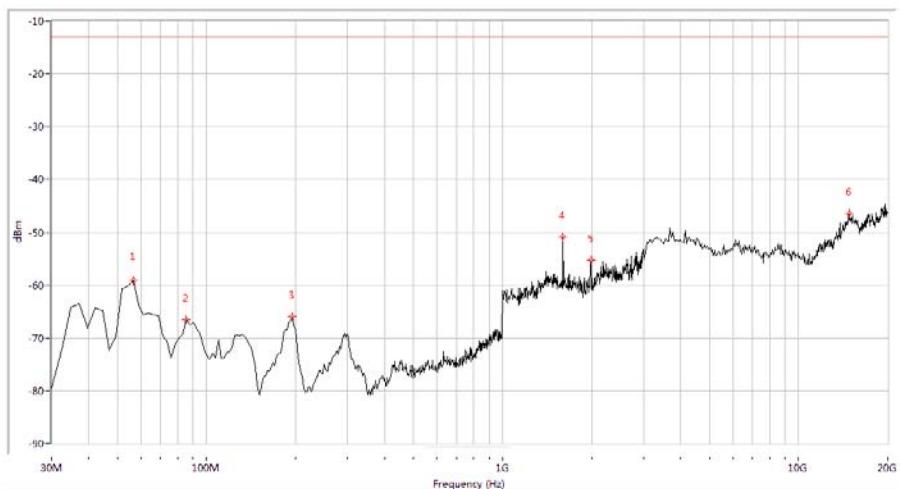
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-61.29	-13.0	48.3	199.4	Vertical	<u>PASS</u>
51.771	-58.00	-13.0	45.0	341.7	Vertical	<u>PASS</u>
192.070	-66.28	-13.0	53.3	166.1	Vertical	<u>PASS</u>
1957.606	-54.67	-13.0	41.7	75.7	Vertical	N.A
6815.461	-50.71	-13.0	37.7	71.9	Vertical	<u>PASS</u>
14827.930	-46.12	-13.0	33.1	355.6	Vertical	<u>PASS</u>

(Plot F.4: WCDMA 1900MHz Channel = 9400, Test Antenna Vertical)



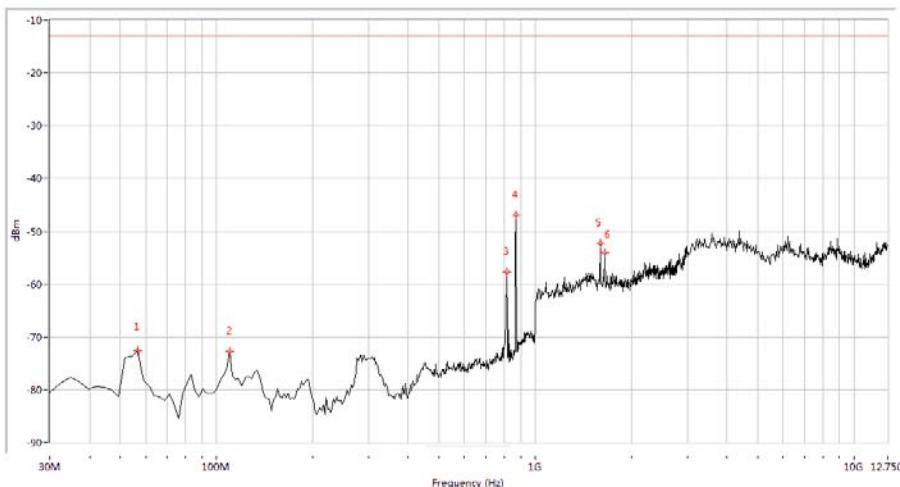
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.32	-13.0	59.3	69.4	Horizontal	<u>PASS</u>
109.825	-72.91	-13.0	59.9	153.4	Horizontal	<u>PASS</u>
281.571	-73.71	-13.0	60.7	52.8	Horizontal	<u>PASS</u>
1598.504	-53.03	-13.0	40.0	305.7	Horizontal	<u>PASS</u>
1987.531	-54.70	-13.0	41.7	268.9	Horizontal	N.A
14827.930	-45.78	-13.0	32.8	196.4	Horizontal	<u>PASS</u>

(Plot F.5: WCDMA 1900MHz Channel = 9538, Test Antenna Horizontal)



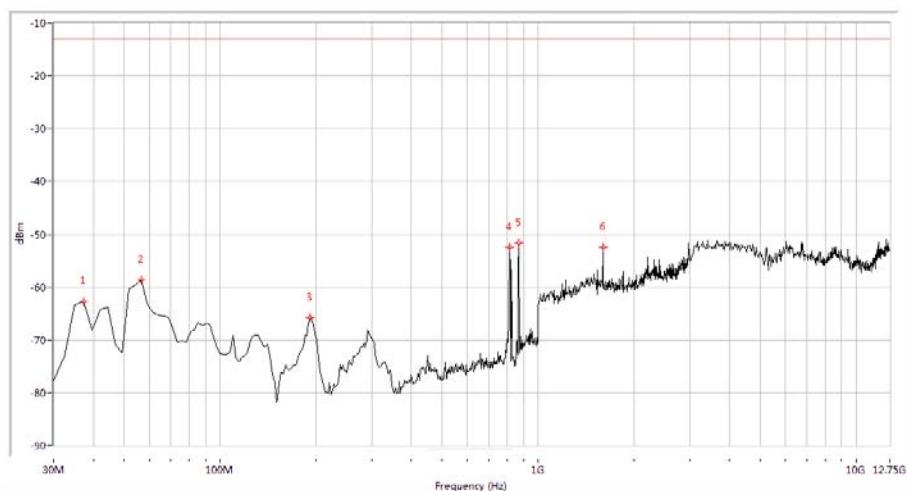
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-59.09	-13.0	46.1	132.4	Vertical	<u>PASS</u>
85.636	-66.54	-13.0	53.5	70.0	Vertical	<u>PASS</u>
194.489	-65.95	-13.0	52.9	123.7	Vertical	<u>PASS</u>
1598.504	-50.80	-13.0	37.8	0.5	Vertical	<u>PASS</u>
1987.531	-55.31	-13.0	42.3	146.5	Vertical	<u>N.A</u>
14827.930	-46.41	-13.0	33.4	16.1	Vertical	<u>PASS</u>

(Plot F.6: WCDMA 1900MHz Channel = 9538, Test Antenna Vertical)



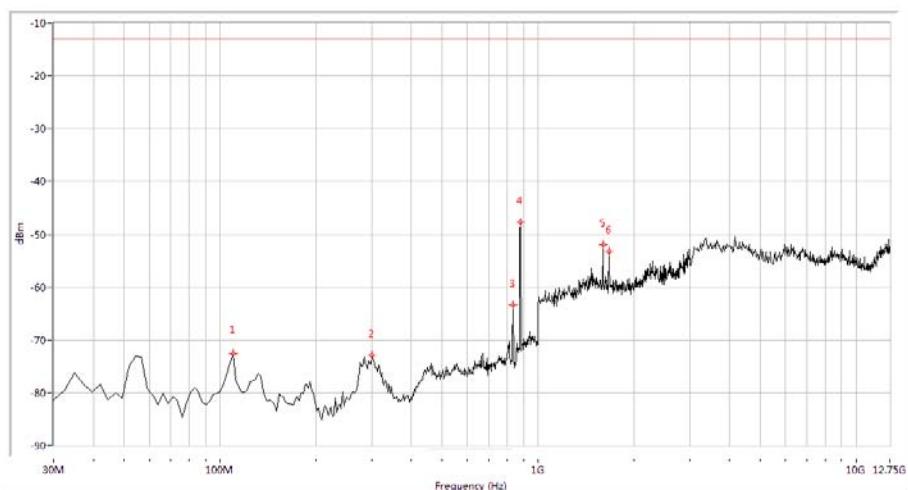
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.53	-13.0	59.5	72.3	Horizontal	<u>PASS</u>
109.825	-72.67	-13.0	59.7	-0.0	Horizontal	<u>PASS</u>
813.741	-57.74	-13.0	44.7	354.3	Horizontal	<u>N.A</u>
869.377	-46.87	-13.0	33.9	257.6	Horizontal	<u>N.A</u>
1598.504	-52.22	-13.0	39.2	195.3	Horizontal	<u>PASS</u>
1653.367	-54.06	-13.0	41.1	274.5	Horizontal	<u>PASS</u>

(Plot G.1: HSDPA 850MHz Channel = 4132, Test Antenna Horizontal)



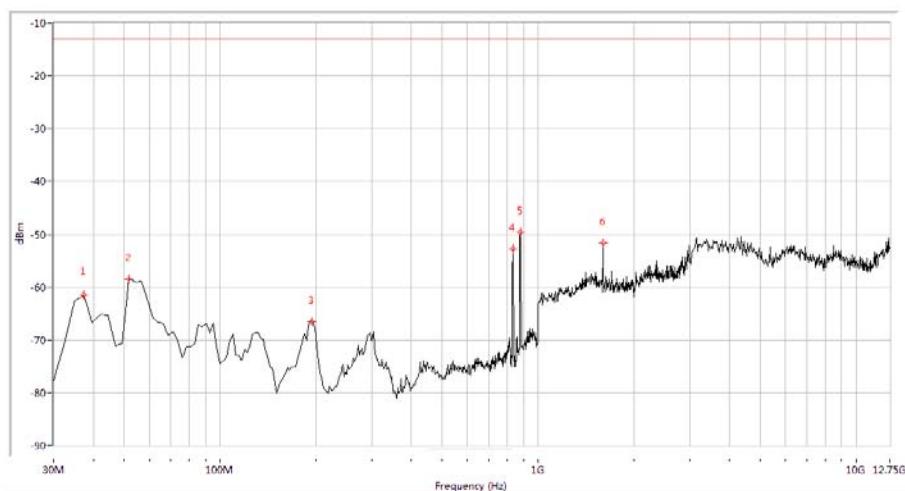
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-62.82	-13.0	49.8	36.4	Vertical	<u>PASS</u>
56.608	-58.59	-13.0	45.6	52.8	Vertical	<u>PASS</u>
192.070	-65.84	-13.0	52.8	164.2	Vertical	<u>PASS</u>
816.160	-52.45	-13.0	39.5	269.9	Vertical	<u>N.A</u>
871.796	-51.59	-13.0	38.6	0.2	Vertical	<u>N.A</u>
1598.504	-52.39	-13.0	39.4	248.6	Vertical	<u>PASS</u>

(Plot G.2: HSDPA 850MHz Channel = 4132, Test Antenna Vertical)



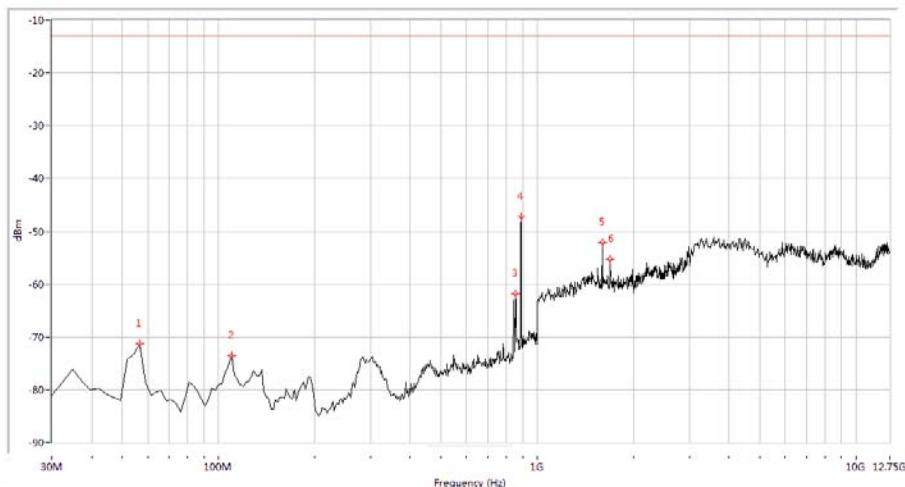
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
109.825	-72.52	-13.0	59.5	187.5	Horizontal	<u>PASS</u>
300.923	-72.87	-13.0	59.9	21.1	Horizontal	<u>PASS</u>
835.511	-63.34	-13.0	50.3	263.1	Horizontal	<u>N.A</u>
879.052	-47.72	-13.0	34.7	86.9	Horizontal	<u>N.A</u>
1598.504	-51.99	-13.0	39.0	195.6	Horizontal	<u>PASS</u>
1668.329	-53.21	-13.0	40.2	195.6	Horizontal	<u>PASS</u>

(Plot G.3: HSDPA 850MHz Channel = 4175, Test Antenna Horizontal)



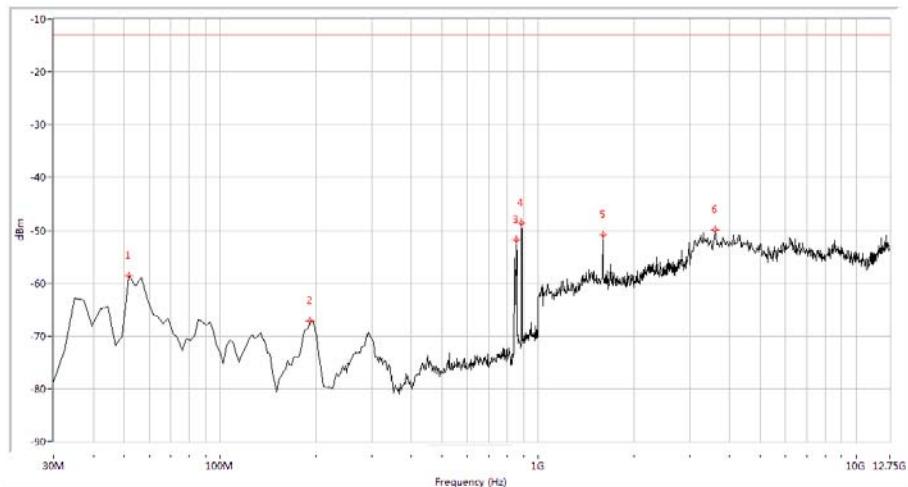
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-61.42	-13.0	48.4	107.2	Vertical	<u>PASS</u>
51.771	-58.51	-13.0	45.5	46.9	Vertical	<u>PASS</u>
194.489	-66.62	-13.0	53.6	194.9	Vertical	<u>PASS</u>
835.511	-52.71	-13.0	39.7	102.0	Vertical	<u>N.A</u>
879.052	-49.61	-13.0	36.6	138.6	Vertical	<u>N.A</u>
1598.504	-51.68	-13.0	38.7	334.8	Vertical	<u>PASS</u>

(Plot G.4: HSDPA 850MHz Channel = 4175, Test Antenna Vertical)



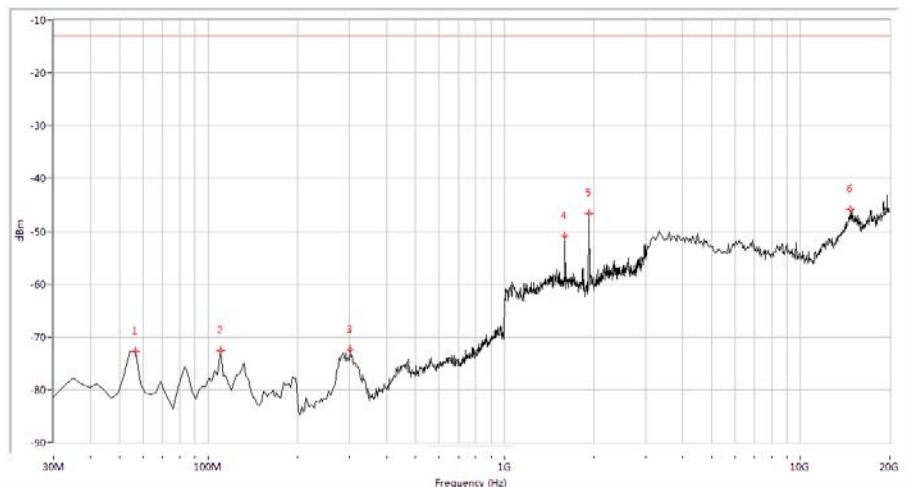
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-71.25	-13.0	58.2	210.7	Horizontal	<u>PASS</u>
109.825	-73.45	-13.0	60.4	263.2	Horizontal	<u>PASS</u>
854.863	-61.77	-13.0	48.8	256.9	Horizontal	<u>N.A</u>
891.147	-47.17	-13.0	34.2	263.6	Horizontal	<u>N.A</u>
1598.504	-52.11	-13.0	39.1	219.3	Horizontal	<u>PASS</u>
1693.267	-55.29	-13.0	42.3	17.7	Horizontal	<u>PASS</u>

(Plot G.5: HSDPA 850MHz Channel = 4233, Test Antenna Horizontal)



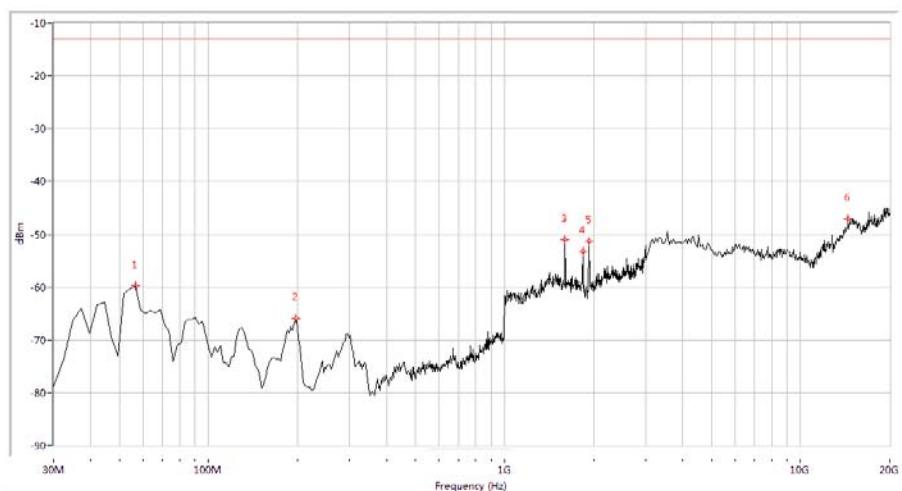
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
51.771	-58.71	-13.0	45.7	169.4	Vertical	<u>PASS</u>
192.070	-67.14	-13.0	54.1	65.4	Vertical	<u>PASS</u>
854.863	-51.90	-13.0	38.9	89.2	Vertical	<u>N.A</u>
888.728	-48.72	-13.0	35.7	136.8	Vertical	<u>N.A</u>
1598.504	-50.85	-13.0	37.8	91.1	Vertical	<u>PASS</u>
3607.855	-49.92	-13.0	36.9	0.0	Vertical	<u>PASS</u>

(Plot G.6: HSDPA 850MHz Channel = 4233, Test Antenna Vertical)



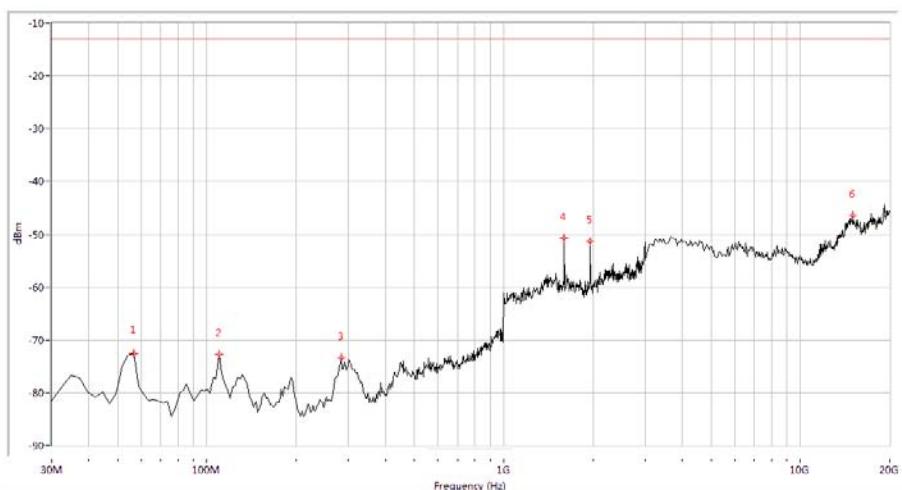
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.80	-13.0	59.8	63.4	Horizontal	<u>PASS</u>
109.825	-72.50	-13.0	59.5	195.8	Horizontal	<u>PASS</u>
300.923	-72.48	-13.0	59.5	264.7	Horizontal	<u>PASS</u>
1598.504	-50.91	-13.0	37.9	23.5	Horizontal	<u>PASS</u>
1932.668	-46.58	-13.0	33.6	269.5	Horizontal	<u>N.A</u>
14743.142	-45.72	-13.0	32.7	86.4	Horizontal	<u>PASS</u>

(Plot H.1: HSDPA 1900 MHz Channel = 9262, Test Antenna Horizontal)



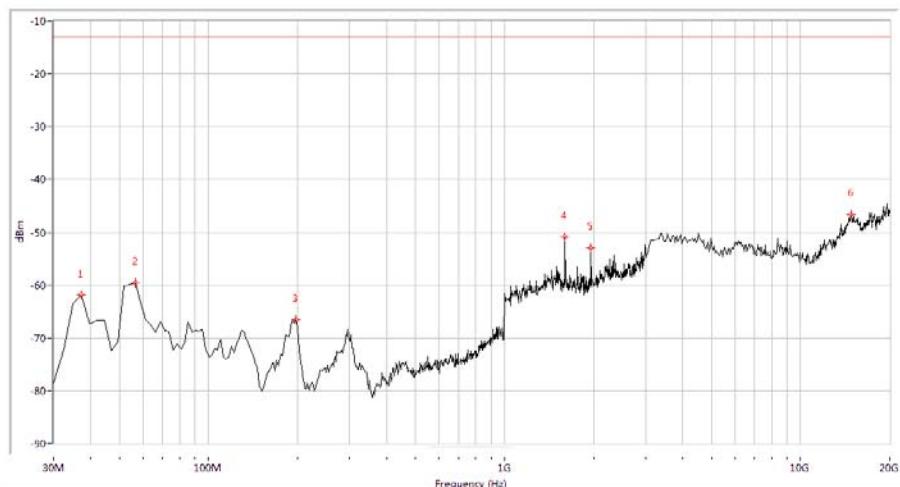
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-59.68	-13.0	46.7	94.8	Vertical	<u>PASS</u>
196.908	-65.93	-13.0	52.9	197.9	Vertical	<u>PASS</u>
1598.504	-50.98	-13.0	38.0	326.7	Vertical	<u>PASS</u>
1837.905	-53.32	-13.0	40.3	152.8	Vertical	N.A
1932.668	-51.30	-13.0	38.3	247.1	Vertical	N.A
14488.778	-47.01	-13.0	34.0	0.5	Vertical	<u>PASS</u>

(Plot H.2: HSDPA 1900 MHz Channel = 9262, Test Antenna Vertical)



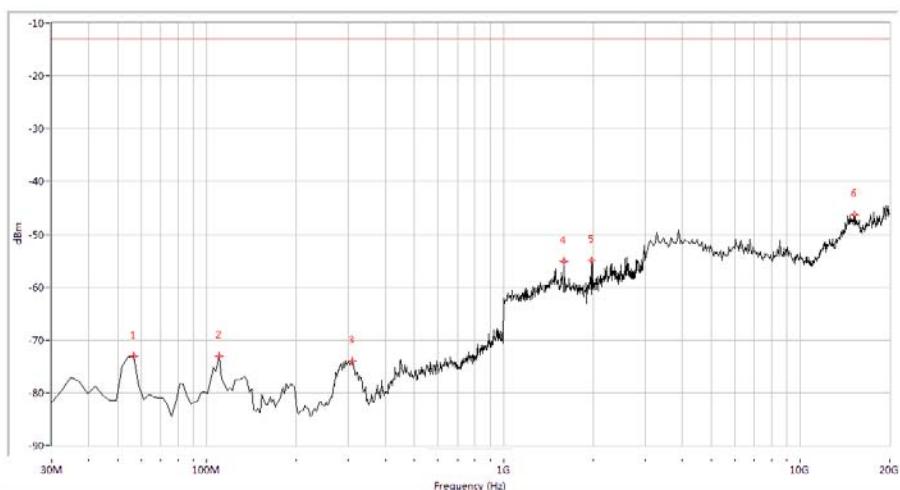
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.58	-13.0	59.6	345.8	Horizontal	<u>PASS</u>
109.825	-72.75	-13.0	59.7	95.6	Horizontal	<u>PASS</u>
283.990	-73.36	-13.0	60.4	264.5	Horizontal	<u>PASS</u>
1598.504	-50.68	-13.0	37.7	158.3	Horizontal	<u>PASS</u>
1957.606	-51.42	-13.0	38.4	67.4	Horizontal	N.A
15039.900	-46.45	-13.0	33.5	57.6	Horizontal	<u>PASS</u>

(Plot H.3: HSDPA 1900 MHz Channel = 9400, Test Antenna Horizontal)



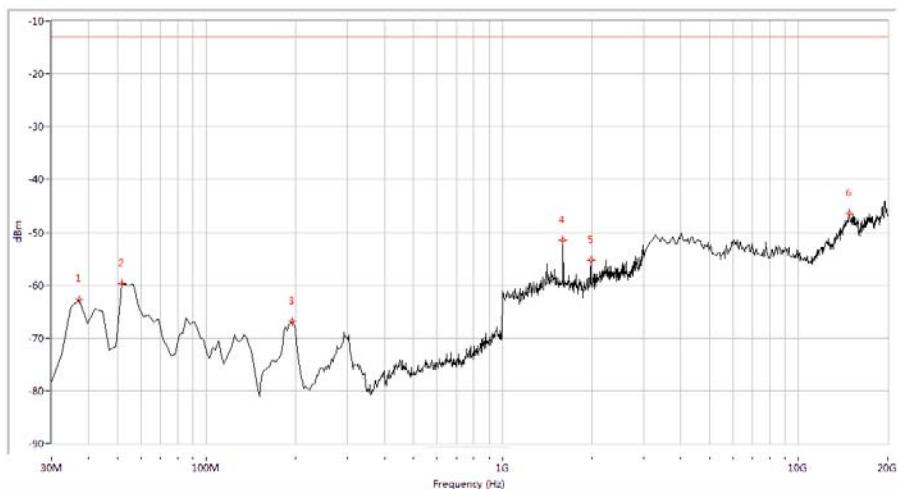
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-61.76	-13.0	48.8	91.4	Vertical	<u>PASS</u>
56.608	-59.64	-13.0	46.6	-0.0	Vertical	<u>PASS</u>
196.908	-66.51	-13.0	53.5	191.5	Vertical	<u>PASS</u>
1598.504	-50.95	-13.0	37.9	360.0	Vertical	<u>PASS</u>
1957.606	-53.00	-13.0	40.0	202.2	Vertical	<u>N.A</u>
14827.930	-46.64	-13.0	33.6	306.0	Vertical	<u>PASS</u>

(Plot H.4: HSDPA 1900 MHz Channel = 9400, Test Antenna Vertical)



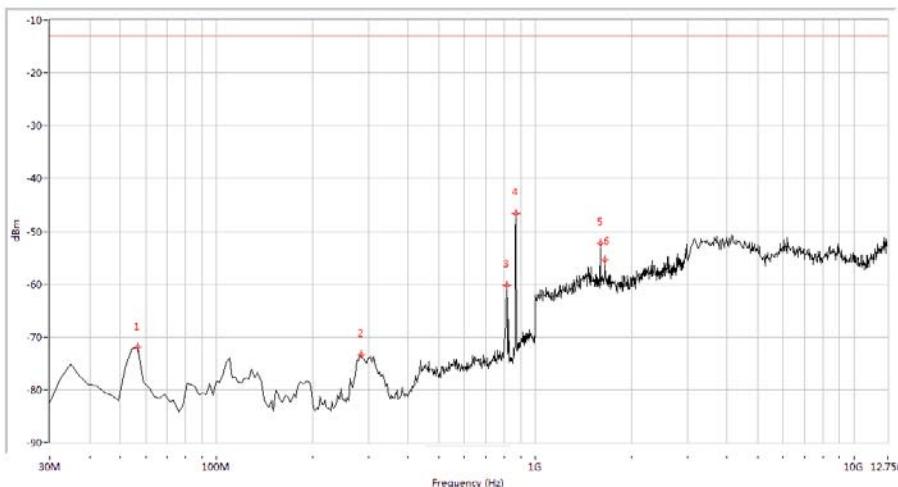
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-73.03	-13.0	60.0	342.1	Horizontal	<u>PASS</u>
109.825	-73.13	-13.0	60.1	268.4	Horizontal	<u>PASS</u>
308.180	-73.98	-13.0	61.0	173.4	Horizontal	<u>PASS</u>
1598.504	-55.14	-13.0	42.1	52.8	Horizontal	<u>PASS</u>
1982.544	-55.04	-13.0	42.0	95.6	Horizontal	<u>N.A</u>
15209.476	-46.31	-13.0	33.3	111.0	Horizontal	<u>PASS</u>

(Plot H.5: HSDPA 1900 MHz Channel = 9538, Test Antenna Horizontal)



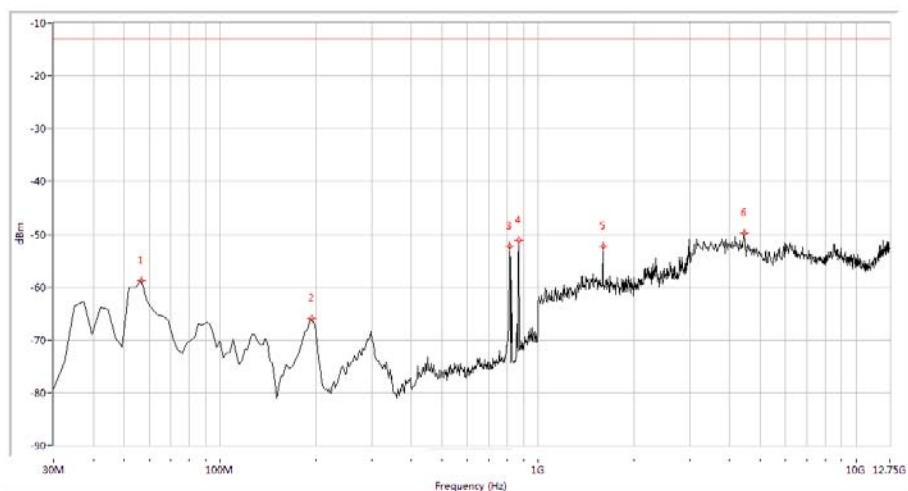
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-62.78	-13.0	49.8	4.2	Vertical	<u>PASS</u>
51.771	-59.79	-13.0	46.8	38.6	Vertical	<u>PASS</u>
194.489	-66.94	-13.0	53.9	258.5	Vertical	<u>PASS</u>
1598.504	-51.54	-13.0	38.5	359.8	Vertical	<u>PASS</u>
1987.531	-55.31	-13.0	42.3	235.3	Vertical	<u>N.A</u>
14827.930	-46.38	-13.0	33.4	250.5	Vertical	<u>PASS</u>

(Plot H.6: HSDPA 1900 MHz Channel = 9538, Test Antenna Vertical)



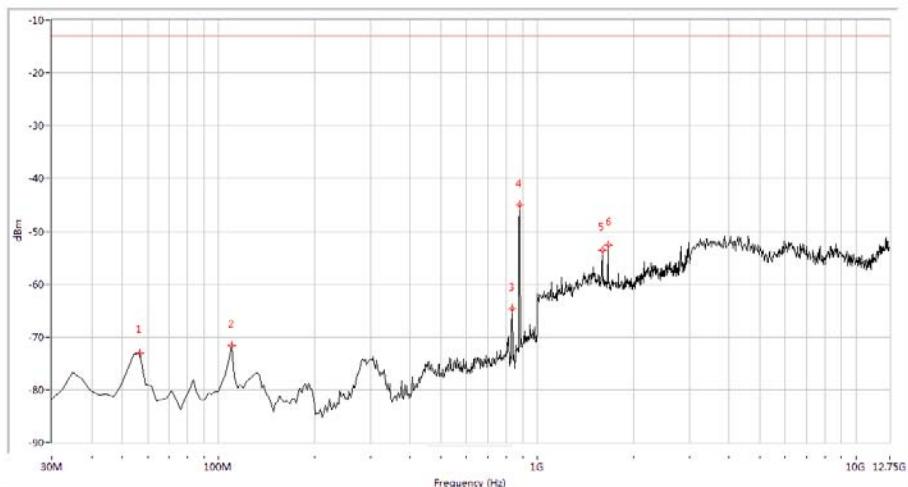
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-71.95	-13.0	59.0	196.8	Horizontal	<u>PASS</u>
283.990	-73.43	-13.0	60.4	29.5	Horizontal	<u>PASS</u>
813.741	-60.24	-13.0	47.2	269.2	Horizontal	<u>N.A</u>
869.377	-46.54	-13.0	33.5	73.1	Horizontal	<u>N.A</u>
1598.504	-52.29	-13.0	39.3	36.5	Horizontal	<u>PASS</u>
1653.367	-55.40	-13.0	42.4	48.4	Horizontal	<u>PASS</u>

(Plot I.1: HSUPA 850MHz Channel = 4132, Test Antenna Horizontal)



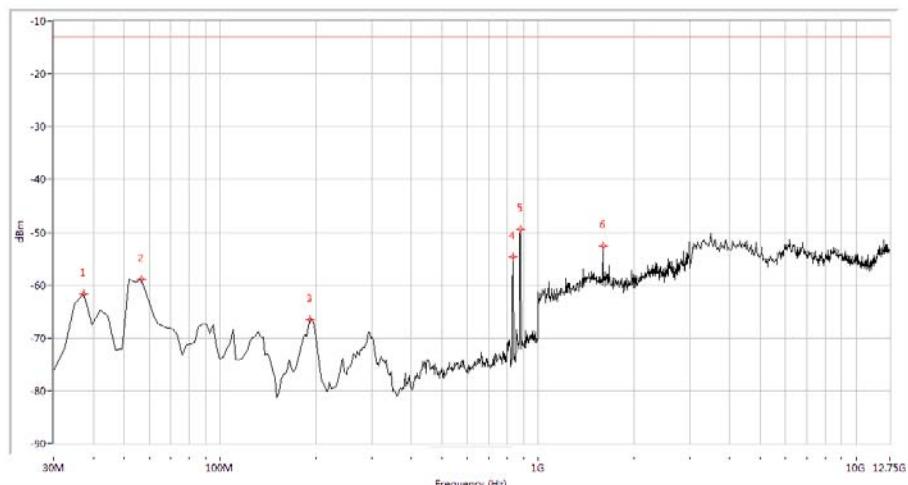
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-58.83	-13.0	45.8	321.5	Vertical	<u>PASS</u>
194.489	-65.89	-13.0	52.9	164.7	Vertical	<u>PASS</u>
816.160	-52.34	-13.0	39.3	30.4	Vertical	<u>N.A</u>
869.377	-51.12	-13.0	38.1	125.4	Vertical	<u>N.A</u>
1598.504	-52.32	-13.0	39.3	97.6	Vertical	<u>PASS</u>
4458.853	-49.74	-13.0	36.7	20.0	Vertical	<u>PASS</u>

(Plot I.2: HSUPA 850 MHz Channel = 4132, Test Antenna Vertical)



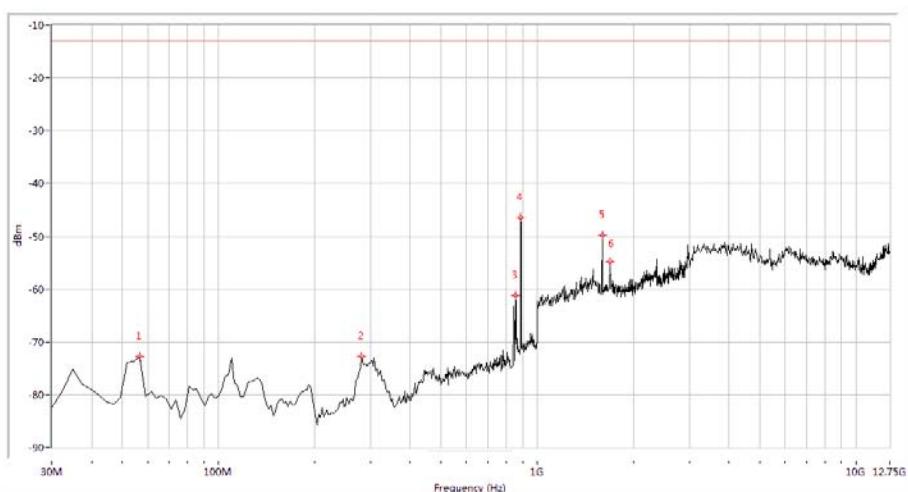
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-73.08	-13.0	60.1	197.7	Horizontal	<u>PASS</u>
109.825	-71.68	-13.0	58.7	269.0	Horizontal	<u>PASS</u>
833.092	-64.70	-13.0	51.7	253.9	Horizontal	<u>N.A</u>
879.052	-45.08	-13.0	32.1	3.0	Horizontal	<u>N.A</u>
1598.504	-53.51	-13.0	40.5	222.1	Horizontal	<u>PASS</u>
1668.329	-52.60	-13.0	39.6	216.8	Horizontal	<u>PASS</u>

(Plot I.3: HSUPA 850MHz Channel = 4175, Test Antenna Horizontal)



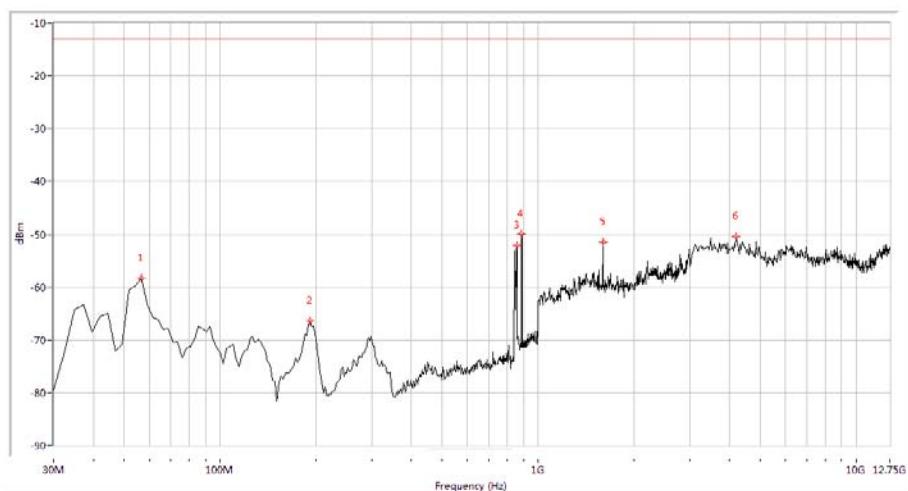
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-61.60	-13.0	48.6	318.4	Vertical	<u>PASS</u>
56.608	-58.98	-13.0	46.0	96.7	Vertical	<u>PASS</u>
192.070	-66.51	-13.0	53.5	182.0	Vertical	<u>PASS</u>
833.092	-54.68	-13.0	41.7	24.7	Vertical	N.A
879.052	-49.43	-13.0	36.4	95.6	Vertical	N.A
1598.504	-52.58	-13.0	39.6	121.0	Vertical	<u>PASS</u>

(Plot I.4: HSUPA 850MHz Channel = 4175, Test Antenna Vertical)



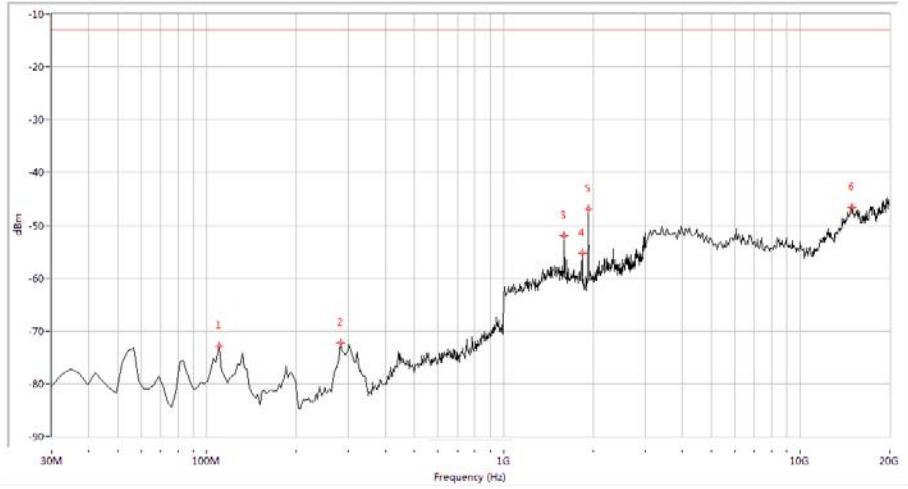
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.81	-13.0	59.8	2.7	Horizontal	<u>PASS</u>
281.571	-72.71	-13.0	59.7	105.1	Horizontal	<u>PASS</u>
854.863	-61.10	-13.0	48.1	278.5	Horizontal	N.A
888.728	-46.50	-13.0	33.5	164.4	Horizontal	N.A
1598.504	-49.78	-13.0	36.8	198.5	Horizontal	<u>PASS</u>
1688.279	-54.90	-13.0	41.9	266.6	Horizontal	<u>PASS</u>

(Plot I.5: HSUPA 850MHz Channel = 4233, Test Antenna Horizontal)



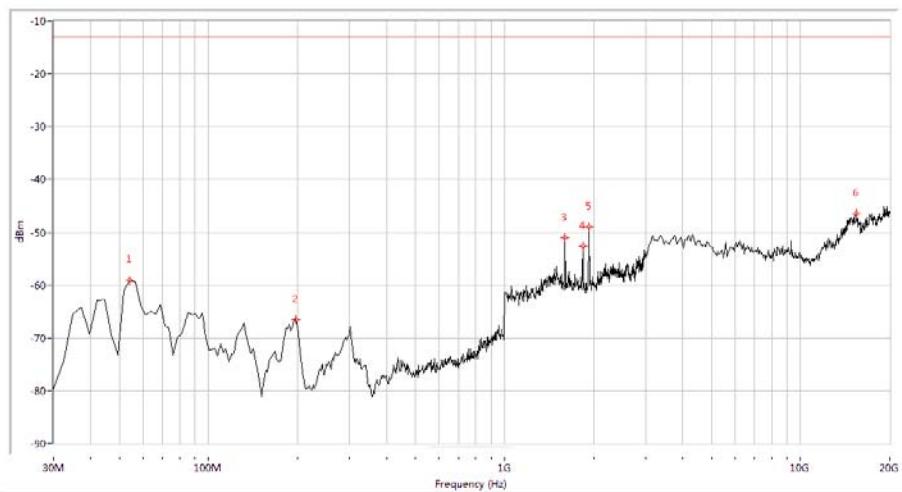
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-58.29	-13.0	45.3	69.5	Vertical	<u>PASS</u>
192.070	-66.46	-13.0	53.5	168.5	Vertical	<u>PASS</u>
857.282	-52.19	-13.0	39.2	52.3	Vertical	<u>N.A</u>
888.728	-50.00	-13.0	37.0	169.9	Vertical	<u>N.A</u>
1598.504	-51.43	-13.0	38.4	0.0	Vertical	<u>PASS</u>
4191.397	-50.46	-13.0	37.5	360.0	Vertical	<u>PASS</u>

(Plot I.6: HSUPA 850MHz Channel = 4233, Test Antenna Vertical)



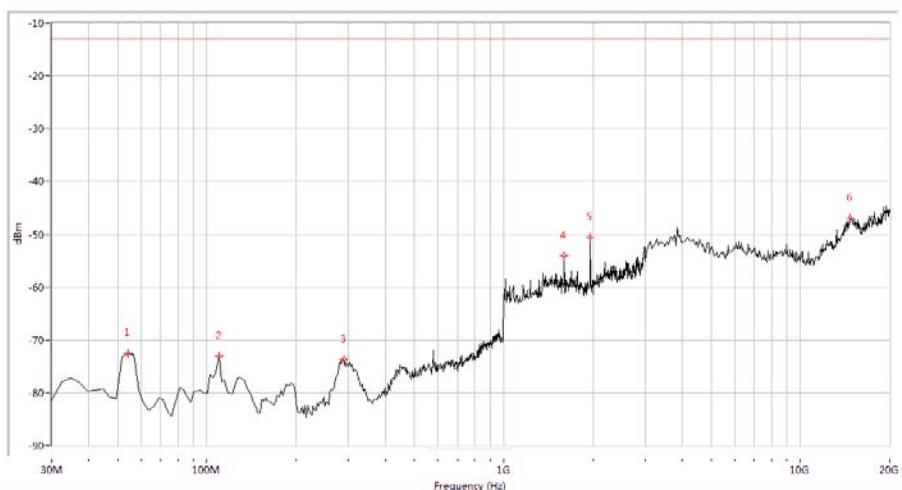
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
109.825	-72.96	-13.0	60.0	95.7	Horizontal	<u>PASS</u>
281.571	-72.20	-13.0	59.2	48.3	Horizontal	<u>PASS</u>
1598.504	-52.03	-13.0	39.0	164.8	Horizontal	<u>PASS</u>
1837.905	-55.27	-13.0	42.3	105.6	Horizontal	<u>N.A</u>
1932.668	-46.84	-13.0	33.8	42.9	Horizontal	<u>N.A</u>
14955.112	-46.55	-13.0	33.5	254.3	Horizontal	<u>PASS</u>

(Plot J.1: HSUPA 1900 MHz Channel = 9262, Test Antenna Horizontal)



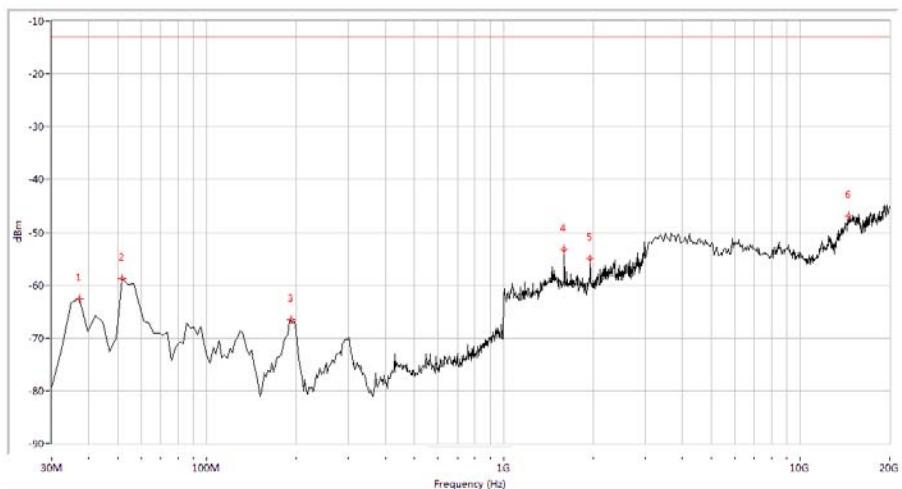
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-59.19	-13.0	46.2	349.7	Vertical	<u>PASS</u>
196.908	-66.61	-13.0	53.6	152.8	Vertical	<u>PASS</u>
1598.504	-51.07	-13.0	38.1	84.2	Vertical	<u>PASS</u>
1837.905	-52.56	-13.0	39.6	63.9	Vertical	N.A
1932.668	-49.02	-13.0	36.0	94.2	Vertical	N.A
15421.446	-46.41	-13.0	33.4	147.5	Vertical	<u>PASS</u>

(Plot J.2: HSUPA 1900 MHz Channel = 9262, Test Antenna Vertical)



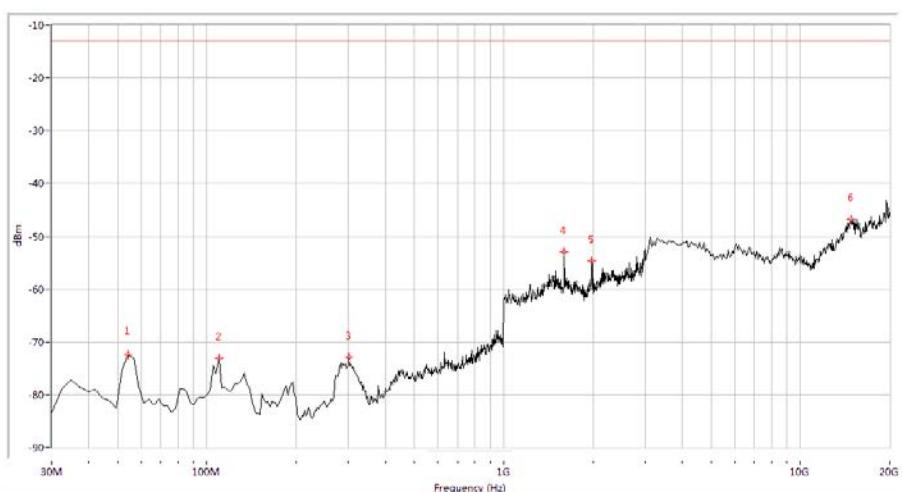
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-72.59	-13.0	59.6	346.5	Horizontal	<u>PASS</u>
109.825	-73.04	-13.0	60.0	258.7	Horizontal	<u>PASS</u>
288.828	-73.71	-13.0	60.7	95.8	Horizontal	<u>PASS</u>
1598.504	-54.02	-13.0	41.0	156.4	Horizontal	<u>PASS</u>
1957.606	-50.62	-13.0	37.6	263.5	Horizontal	N.A
14700.748	-46.89	-13.0	33.9	185.3	Horizontal	<u>PASS</u>

(Plot J.3: HSUPA 1900 MHz Channel = 9400, Test Antenna Horizontal)



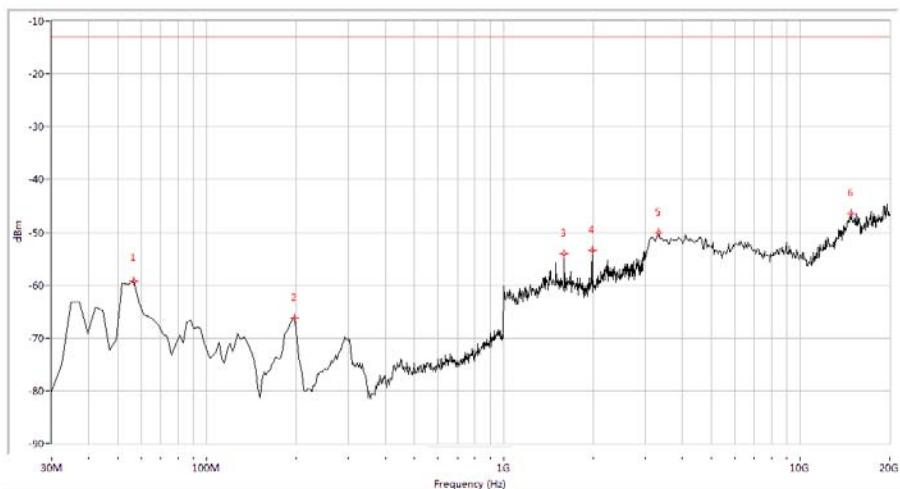
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-62.52	-13.0	49.5	269.5	Vertical	<u>PASS</u>
51.771	-58.74	-13.0	45.7	33.8	Vertical	<u>PASS</u>
192.070	-66.58	-13.0	53.6	215.7	Vertical	<u>PASS</u>
1598.504	-53.24	-13.0	40.2	3.9	Vertical	<u>PASS</u>
1957.606	-54.97	-13.0	42.0	-0.0	Vertical	<u>N.A</u>
14531.172	-46.86	-13.0	33.9	326.8	Vertical	<u>PASS</u>

(Plot J.4: HSUPA 1900 MHz Channel = 9400, Test Antenna Vertical)



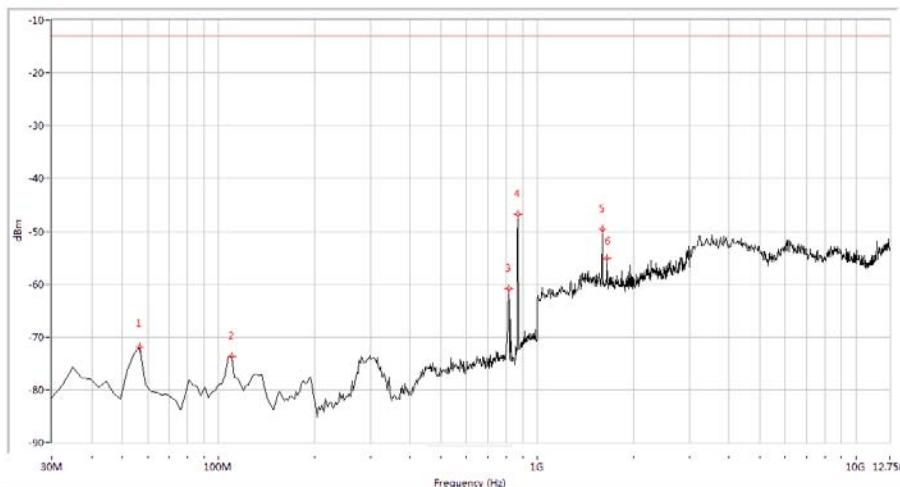
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-72.47	-13.0	59.5	325.9	Horizontal	<u>PASS</u>
109.825	-72.98	-13.0	60.0	45.5	Horizontal	<u>PASS</u>
300.923	-72.82	-13.0	59.8	264.7	Horizontal	<u>PASS</u>
1598.504	-52.92	-13.0	39.9	152.5	Horizontal	<u>PASS</u>
1982.544	-54.70	-13.0	41.7	35.9	Horizontal	<u>N.A</u>
14827.930	-46.74	-13.0	33.7	68.7	Horizontal	<u>PASS</u>

(Plot J.5: HSUPA 1900 MHz Channel = 9538, Test Antenna Horizontal)



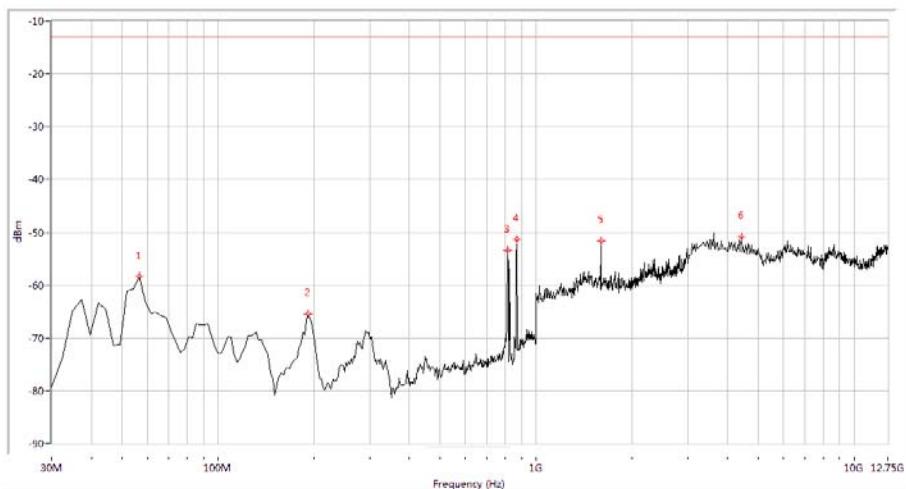
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-59.20	-13.0	46.2	233.4	Vertical	<u>PASS</u>
196.908	-66.20	-13.0	53.2	32.9	Vertical	<u>PASS</u>
1598.504	-53.99	-13.0	41.0	212.8	Vertical	<u>PASS</u>
1987.531	-53.46	-13.0	40.5	82.6	Vertical	N.A
3339.152	-50.06	-13.0	37.1	220.8	Vertical	<u>PASS</u>
14827.930	-46.37	-13.0	33.4	350.9	Vertical	<u>PASS</u>

(Plot J.6: HSUPA 1900 MHz Channel = 9538, Test Antenna Vertical)



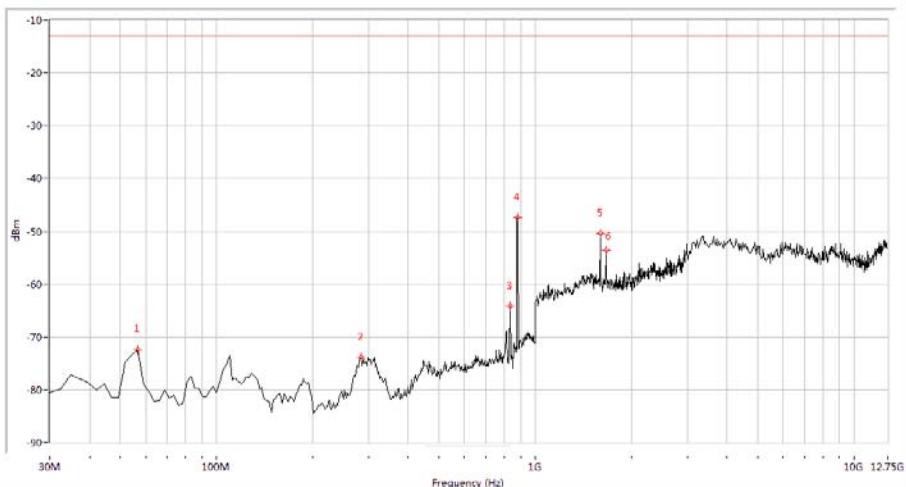
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-71.92	-13.0	58.9	-0.0	Horizontal	<u>PASS</u>
109.825	-73.66	-13.0	60.7	301.9	Horizontal	<u>PASS</u>
816.160	-60.84	-13.0	47.8	259.9	Horizontal	N.A
869.377	-46.80	-13.0	33.8	60.0	Horizontal	N.A
1598.504	-49.63	-13.0	36.6	164.7	Horizontal	<u>PASS</u>
1653.367	-55.13	-13.0	42.1	320.9	Horizontal	<u>PASS</u>

(Plot K.1: HSPA+ 850MHz Channel = 4132, Test Antenna Horizontal)



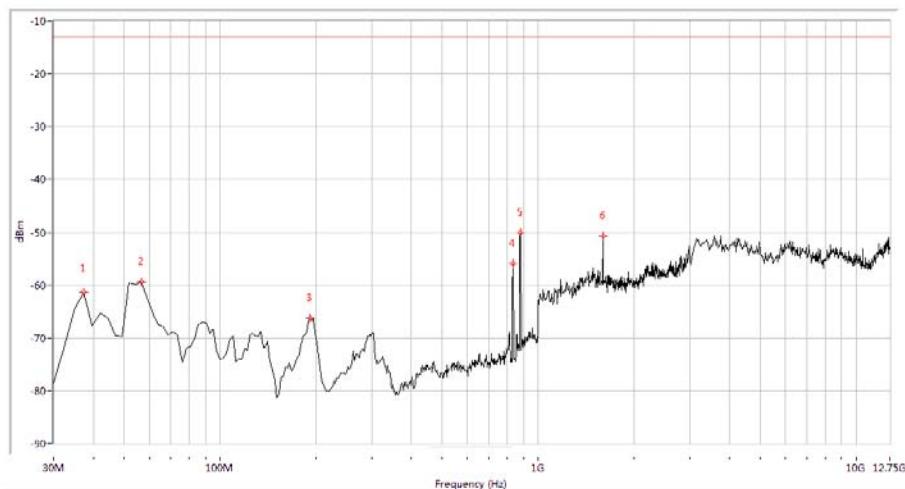
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-58.26	-13.0	45.3	321.5	Vertical	<u>PASS</u>
192.070	-65.42	-13.0	52.4	15.2	Vertical	<u>PASS</u>
816.160	-53.35	-13.0	40.4	69.7	Vertical	<u>N.A</u>
871.796	-51.32	-13.0	38.3	184.3	Vertical	<u>N.A</u>
1598.504	-51.70	-13.0	38.7	33.2	Vertical	<u>PASS</u>
4434.539	-50.92	-13.0	37.9	121.4	Vertical	<u>PASS</u>

(Plot K.2: HSPA+ 850 MHz Channel = 4132, Test Antenna Vertical)



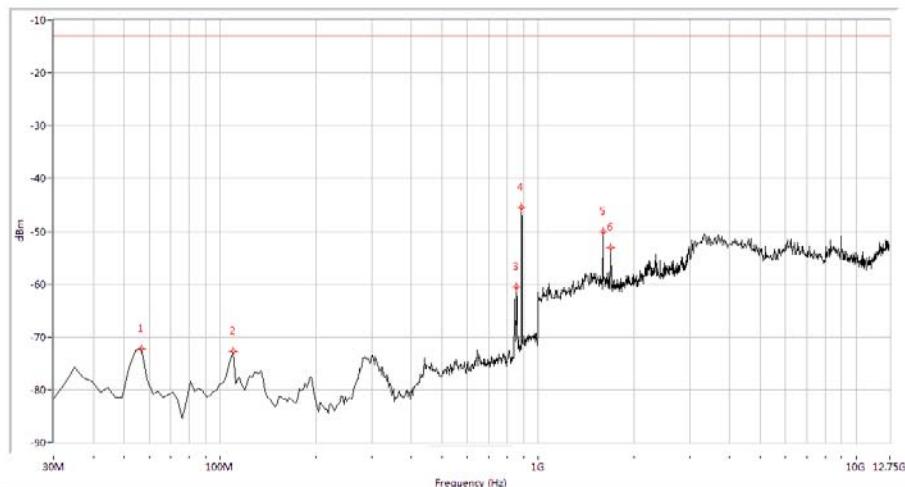
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.35	-13.0	59.3	180.8	Horizontal	<u>PASS</u>
283.990	-73.85	-13.0	60.8	141.2	Horizontal	<u>PASS</u>
835.511	-64.18	-13.0	51.2	270.9	Horizontal	<u>N.A</u>
879.052	-47.39	-13.0	34.4	127.0	Horizontal	<u>N.A</u>
1598.504	-50.33	-13.0	37.3	194.3	Horizontal	<u>PASS</u>
1668.329	-53.57	-13.0	40.6	336.7	Horizontal	<u>PASS</u>

(Plot K.3: HSPA+ 850MHz Channel = 4175, Test Antenna Horizontal)



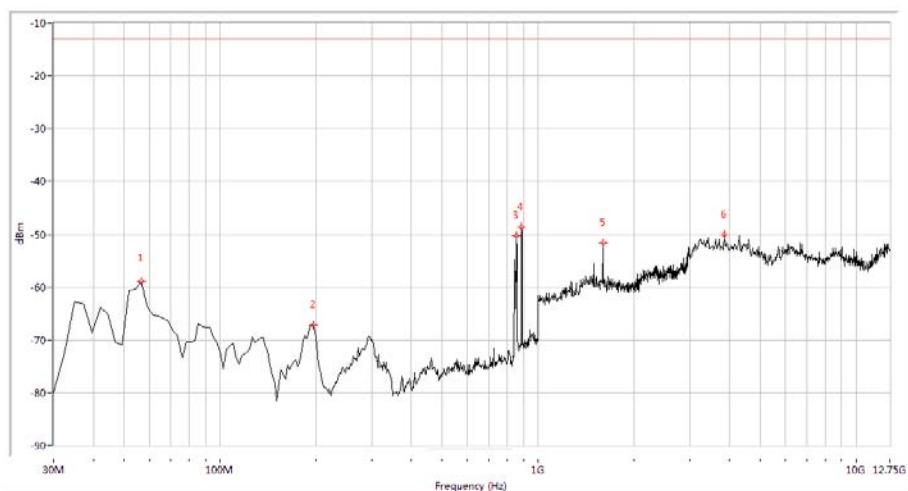
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-61.32	-13.0	48.3	32.6	Vertical	<u>PASS</u>
56.608	-59.37	-13.0	46.4	164.8	Vertical	<u>PASS</u>
192.070	-66.21	-13.0	53.2	251.8	Vertical	<u>PASS</u>
835.511	-55.88	-13.0	42.9	360.0	Vertical	<u>N.A</u>
879.052	-50.13	-13.0	37.1	318.7	Vertical	<u>N.A</u>
1598.504	-50.72	-13.0	37.7	261.8	Vertical	<u>PASS</u>

(Plot K.4: HSPA+ 850MHz Channel = 4175, Test Antenna Vertical)



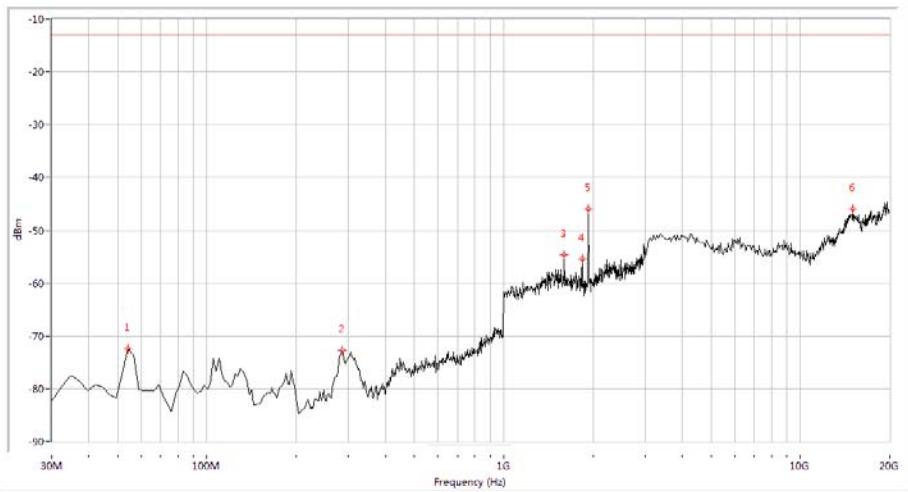
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.29	-13.0	59.3	317.2	Horizontal	<u>PASS</u>
109.825	-72.67	-13.0	59.7	25.4	Horizontal	<u>PASS</u>
854.863	-60.50	-13.0	47.5	264.4	Horizontal	<u>N.A</u>
888.728	-45.50	-13.0	32.5	16.2	Horizontal	<u>N.A</u>
1598.504	-50.11	-13.0	37.1	181.9	Horizontal	<u>PASS</u>
1693.267	-53.09	-13.0	40.1	249.9	Horizontal	<u>PASS</u>

(Plot K.5: HSPA+ 850MHz Channel = 4233, Test Antenna Horizontal)



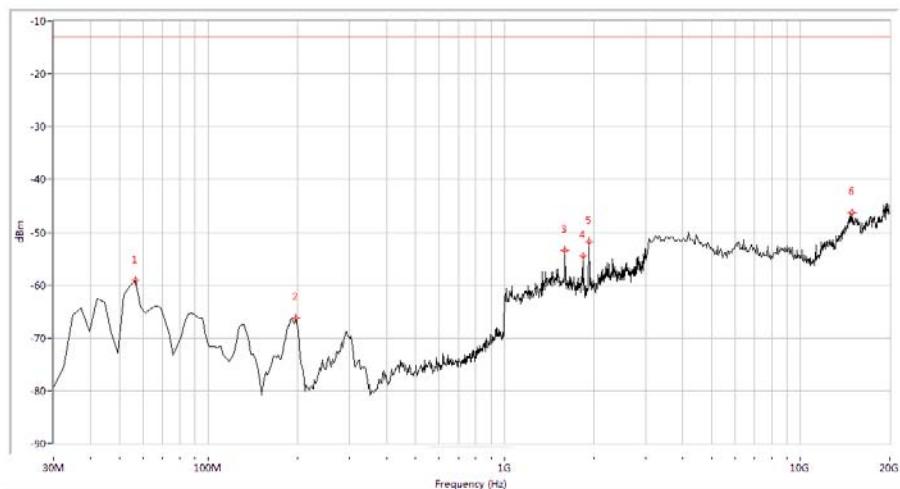
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-58.88	-13.0	45.9	69.4	Vertical	<u>PASS</u>
196.908	-67.22	-13.0	54.2	165.7	Vertical	<u>PASS</u>
854.863	-50.25	-13.0	37.3	84.5	Vertical	<u>N.A</u>
888.728	-48.70	-13.0	35.7	264.3	Vertical	<u>N.A</u>
1598.504	-51.72	-13.0	38.7	63.9	Vertical	<u>PASS</u>
3850.998	-50.01	-13.0	37.0	19.0	Vertical	<u>PASS</u>

(Plot K.6: HSPA+ 850MHz Channel = 4233, Test Antenna Vertical)



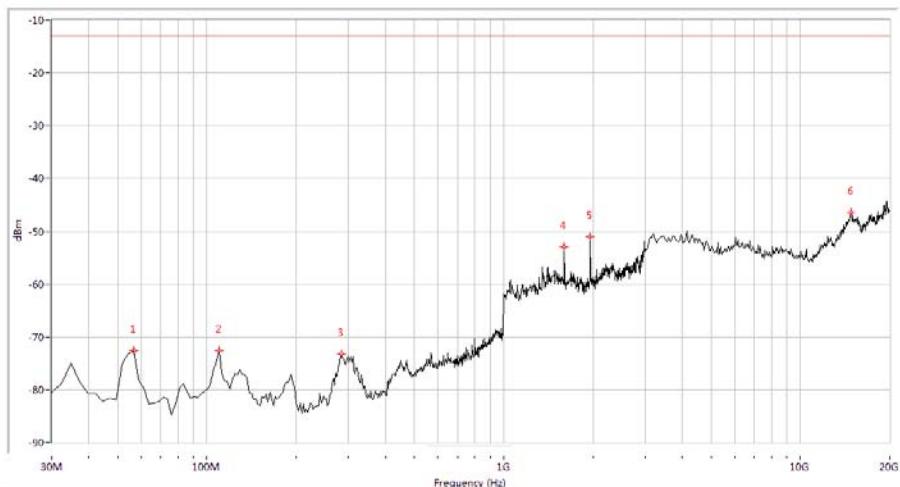
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-72.41	-13.0	59.4	64.5	Horizontal	<u>PASS</u>
286.409	-72.75	-13.0	59.7	256.8	Horizontal	<u>PASS</u>
1598.504	-54.66	-13.0	41.7	175.3	Horizontal	<u>PASS</u>
1837.905	-55.49	-13.0	42.5	94.1	Horizontal	<u>N.A</u>
1932.668	-46.01	-13.0	33.0	0.0	Horizontal	<u>N.A</u>
14997.506	-45.90	-13.0	32.9	71.2	Horizontal	<u>PASS</u>

(Plot L.1: HSPA+ 1900 MHz Channel = 9262, Test Antenna Horizontal)



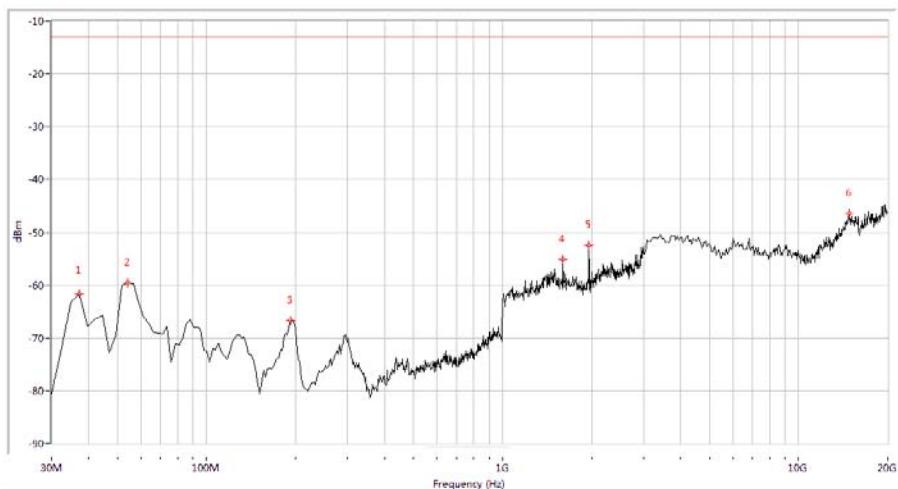
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-59.08	-13.0	46.1	345.2	Vertical	<u>PASS</u>
196.908	-66.27	-13.0	53.3	0.8	Vertical	<u>PASS</u>
1598.504	-53.48	-13.0	40.5	123.4	Vertical	<u>PASS</u>
1837.905	-54.50	-13.0	41.5	24.5	Vertical	<u>N.A</u>
1932.668	-51.83	-13.0	38.8	47.6	Vertical	<u>N.A</u>
14912.718	-46.23	-13.0	33.2	247.3	Vertical	<u>PASS</u>

(Plot L.2: HSPA+ 1900 MHz Channel = 9262, Test Antenna Vertical)



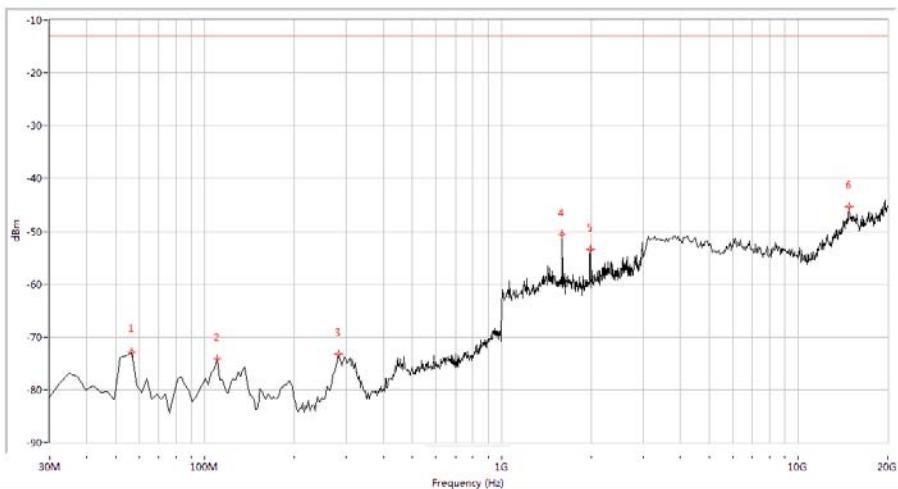
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.58	-13.0	59.6	234.9	Horizontal	<u>PASS</u>
109.825	-72.55	-13.0	59.5	-0.0	Horizontal	<u>PASS</u>
283.990	-73.16	-13.0	60.2	293.0	Horizontal	<u>PASS</u>
1598.504	-52.85	-13.0	39.9	306.8	Horizontal	<u>PASS</u>
1957.606	-51.10	-13.0	38.1	4.9	Horizontal	<u>N.A</u>
14827.930	-46.36	-13.0	33.4	164.6	Horizontal	<u>PASS</u>

(Plot L.3: HSPA+ 1900 MHz Channel = 9400, Test Antenna Horizontal)



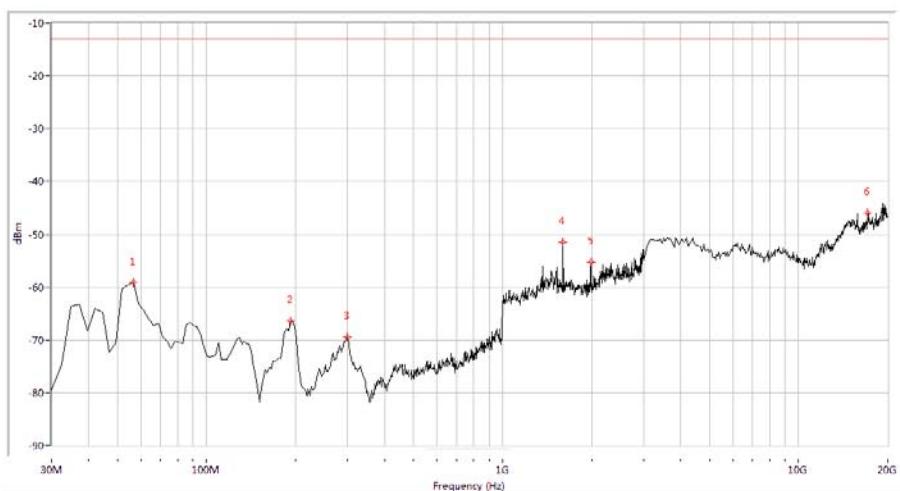
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-61.62	-13.0	48.6	271.8	Vertical	<u>PASS</u>
54.190	-59.54	-13.0	46.5	41.0	Vertical	<u>PASS</u>
192.070	-66.66	-13.0	53.7	213.0	Vertical	<u>PASS</u>
1598.504	-55.19	-13.0	42.2	116.6	Vertical	<u>PASS</u>
1957.606	-52.41	-13.0	39.4	255.6	Vertical	<u>N.A</u>
14827.930	-46.49	-13.0	33.5	271.6	Vertical	<u>PASS</u>

(Plot L.4: HSPA+ 1900 MHz Channel = 9400, Test Antenna Vertical)



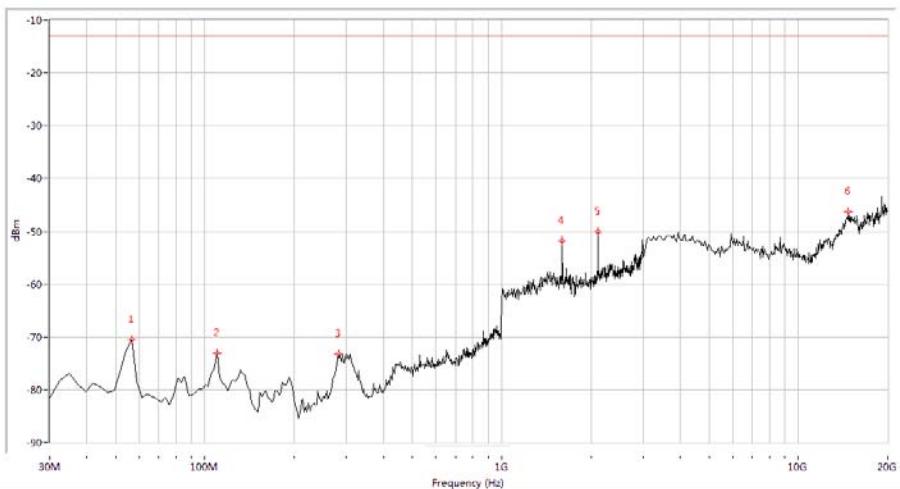
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.91	-13.0	59.9	64.7	Horizontal	<u>PASS</u>
109.825	-74.22	-13.0	61.2	51.6	Horizontal	<u>PASS</u>
281.571	-73.20	-13.0	60.2	169.5	Horizontal	<u>PASS</u>
1598.504	-50.49	-13.0	37.5	354.8	Horizontal	<u>PASS</u>
1987.531	-53.47	-13.0	40.5	208.7	Horizontal	<u>N.A</u>
14827.930	-45.26	-13.0	32.3	69.4	Horizontal	<u>PASS</u>

(Plot L.5: HSPA+ 1900 MHz Channel = 9538, Test Antenna Horizontal)



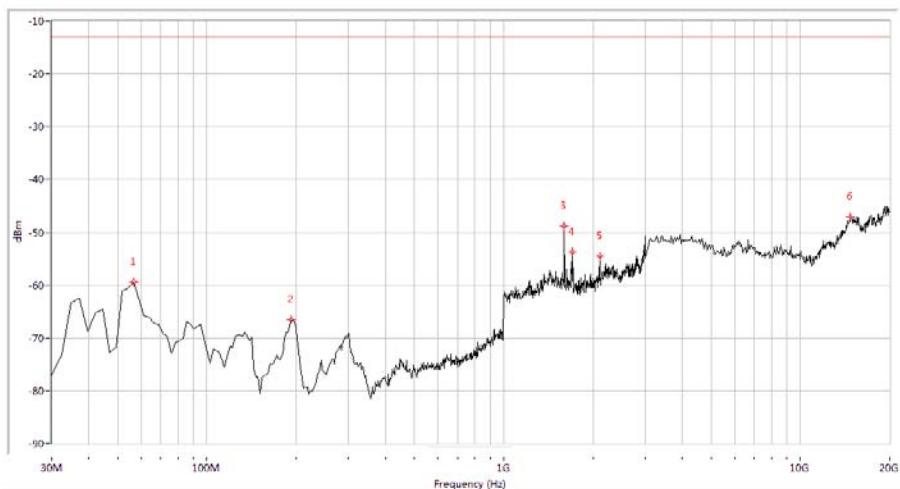
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-59.04	-13.0	46.0	269.8	Vertical	<u>PASS</u>
192.070	-66.44	-13.0	53.4	35.4	Vertical	<u>PASS</u>
298.504	-69.46	-13.0	56.5	326.1	Vertical	<u>PASS</u>
1598.504	-51.51	-13.0	38.5	266.9	Vertical	<u>PASS</u>
1987.531	-55.30	-13.0	42.3	359.5	Vertical	<u>N.A</u>
17159.601	-45.92	-13.0	32.9	153.3	Vertical	<u>PASS</u>

(Plot L.6: HSPA+ 1900 MHz Channel = 9538, Test Antenna Vertical)



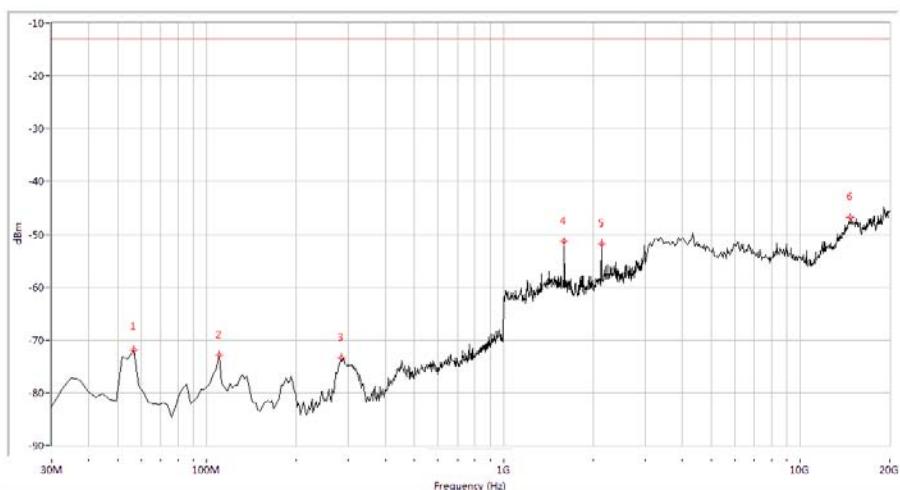
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-70.51	-13.0	57.5	325.9	Horizontal	<u>PASS</u>
109.825	-73.08	-13.0	60.1	157.4	Horizontal	<u>PASS</u>
281.571	-73.26	-13.0	60.3	111.0	Horizontal	<u>PASS</u>
1598.504	-51.86	-13.0	38.9	86.5	Horizontal	<u>PASS</u>
2112.219	-50.13	-13.0	37.1	35.9	Horizontal	<u>N.A</u>
14785.536	-46.30	-13.0	33.3	17.4	Horizontal	<u>PASS</u>

(Plot M.1: WCDMA 1700MHz Channel = 1312, Test Antenna Horizontal)



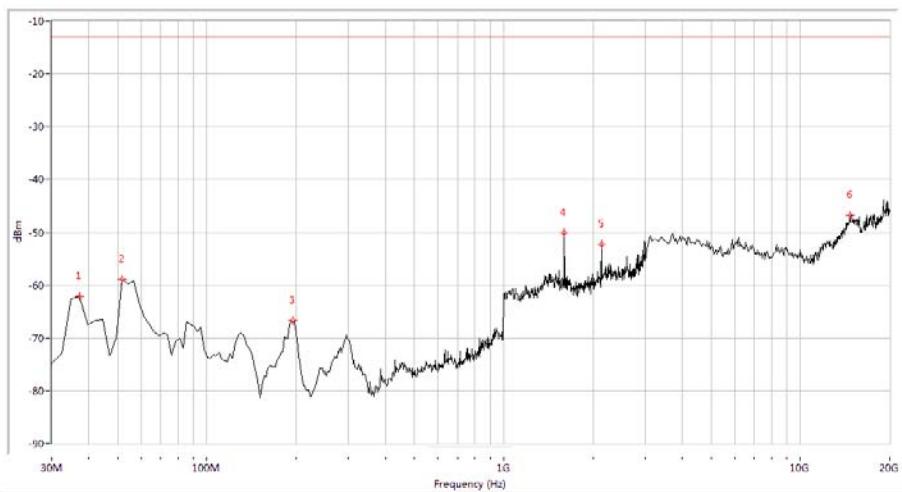
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-59.39	-13.0	46.4	28.4	Vertical	<u>PASS</u>
192.070	-66.62	-13.0	53.6	305.6	Vertical	<u>PASS</u>
1598.504	-48.78	-13.0	35.8	97.5	Vertical	<u>PASS</u>
1708.229	-53.80	-13.0	40.8	145.7	Vertical	<u>N.A</u>
2107.232	-54.54	-13.0	41.5	238.4	Vertical	<u>N.A</u>
14785.536	-47.09	-13.0	34.1	315.6	Vertical	<u>PASS</u>

(Plot M.2: WCDMA 1700MHz Channel = 1312, Test Antenna Vertical)



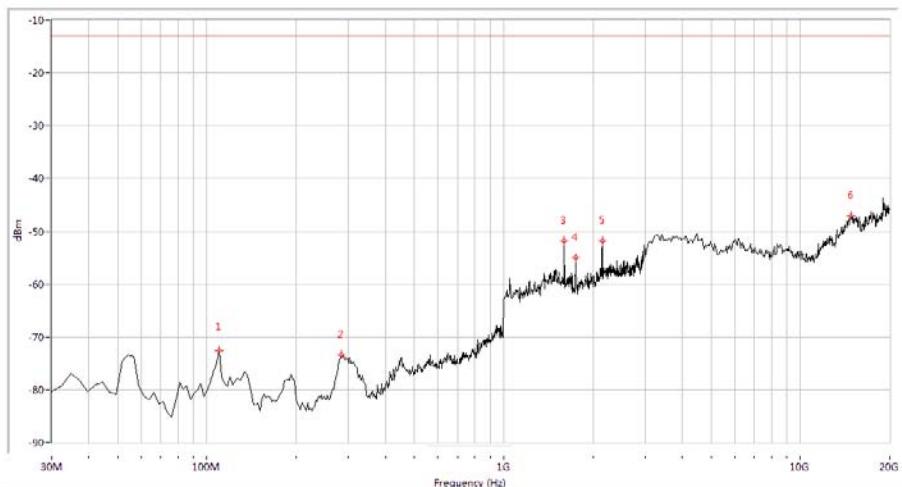
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.01	-13.0	59.0	64.8	Horizontal	<u>PASS</u>
109.825	-72.89	-13.0	59.9	196.4	Horizontal	<u>PASS</u>
283.990	-73.34	-13.0	60.3	265.4	Horizontal	<u>PASS</u>
1598.504	-51.27	-13.0	38.3	10.7	Horizontal	<u>PASS</u>
2137.157	-51.76	-13.0	38.8	264.8	Horizontal	<u>N.A</u>
14743.142	-46.77	-13.0	33.8	116.4	Horizontal	<u>PASS</u>

(Plot M.3: WCDMA 1700MHz Channel = 1412, Test Antenna Horizontal)



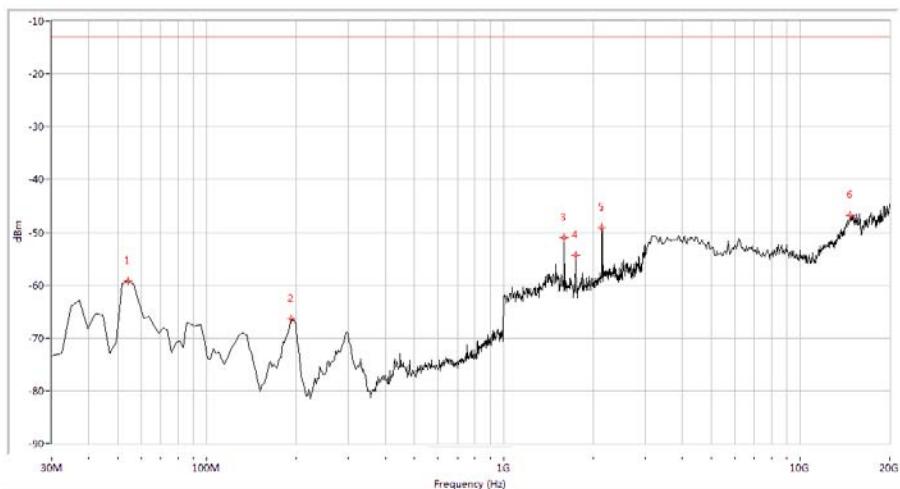
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-62.10	-13.0	49.1	349.5	Vertical	<u>PASS</u>
51.771	-58.87	-13.0	45.9	156.4	Vertical	<u>PASS</u>
194.489	-66.78	-13.0	53.8	0.2	Vertical	<u>PASS</u>
1598.504	-50.14	-13.0	37.1	85.1	Vertical	<u>PASS</u>
2137.157	-52.37	-13.0	39.4	39.5	Vertical	<u>N.A</u>
14785.536	-46.72	-13.0	33.7	56.4	Vertical	<u>PASS</u>

(Plot M.4: WCDMA 1700MHz Channel = 1412, Test Antenna Vertical)



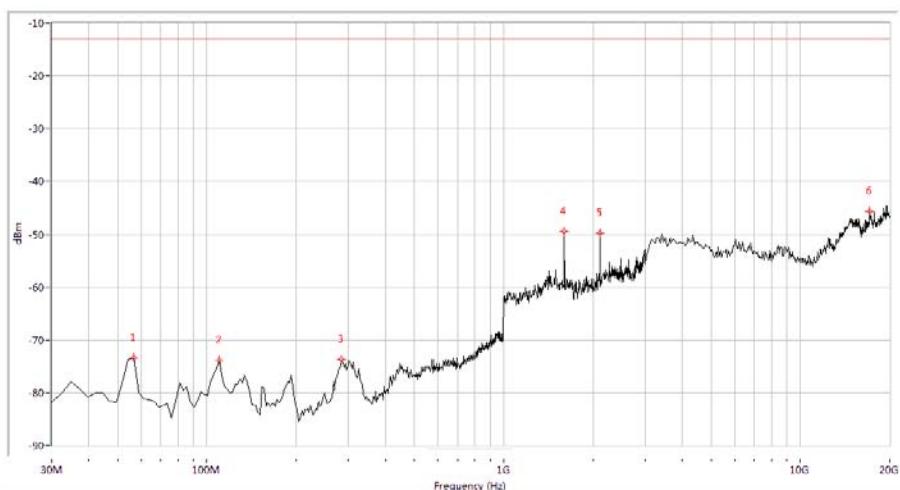
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
109.825	-72.61	-13.0	59.6	64.5	Horizontal	<u>PASS</u>
283.990	-73.31	-13.0	60.3	159.7	Horizontal	<u>PASS</u>
1598.504	-51.82	-13.0	38.8	84.3	Horizontal	<u>PASS</u>
1748.130	-55.00	-13.0	42.0	318.6	Horizontal	<u>N.A</u>
2152.120	-51.90	-13.0	38.9	264.5	Horizontal	<u>N.A</u>
14870.324	-47.09	-13.0	34.1	259.7	Horizontal	<u>PASS</u>

(Plot M.5: WCDMA 1700MHz Channel = 1513, Test Antenna Horizontal)



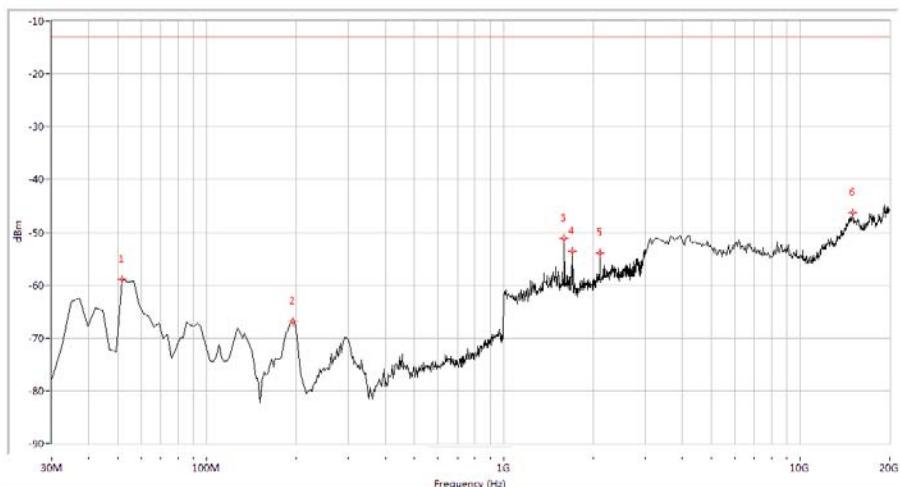
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-59.21	-13.0	46.2	46.5	Vertical	<u>PASS</u>
192.070	-66.42	-13.0	53.4	163.9	Vertical	<u>PASS</u>
1598.504	-51.10	-13.0	38.1	84.6	Vertical	<u>PASS</u>
1748.130	-54.39	-13.0	41.4	68.1	Vertical	<u>N.A</u>
2147.132	-49.08	-13.0	36.1	146.5	Vertical	<u>N.A</u>
14743.142	-46.74	-13.0	33.7	43.9	Vertical	<u>PASS</u>

(Plot M.6: WCDMA 1700MHz Channel = 1513, Test Antenna Vertical)



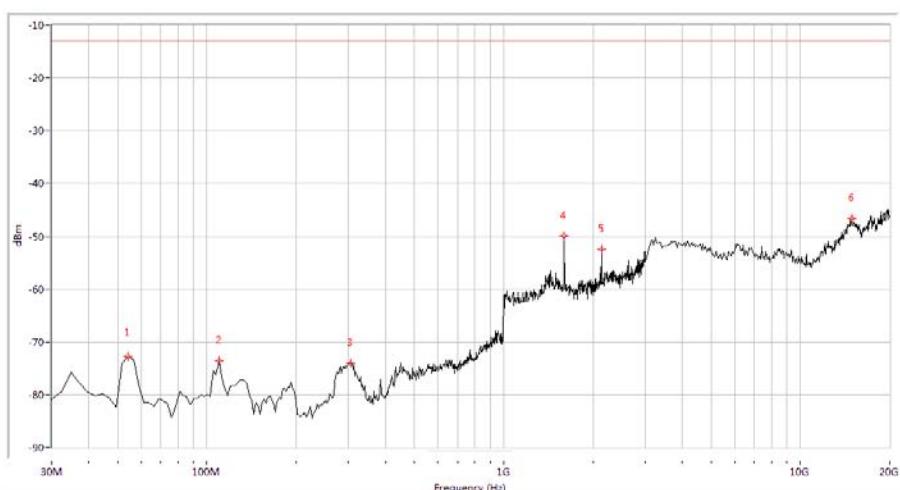
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-73.38	-13.0	60.4	69.4	Horizontal	<u>PASS</u>
109.825	-73.91	-13.0	60.9	212.7	Horizontal	<u>PASS</u>
283.990	-73.67	-13.0	60.7	20.8	Horizontal	<u>PASS</u>
1598.504	-49.48	-13.0	36.5	197.6	Horizontal	<u>PASS</u>
2112.219	-49.78	-13.0	36.8	6.4	Horizontal	<u>N.A</u>
17117.207	-45.61	-13.0	32.6	12.7	Horizontal	<u>PASS</u>

(Plot N.1: HSDPA 1700MHz Channel = 1312, Test Antenna Horizontal)



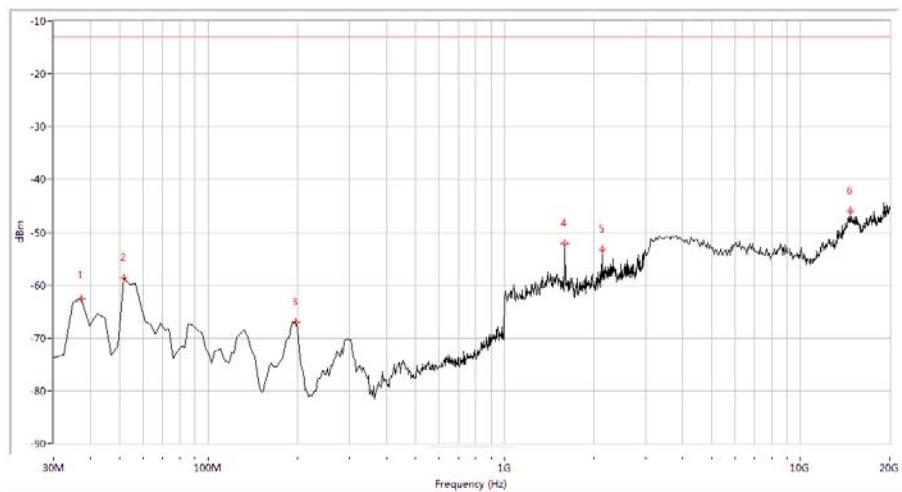
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
51.771	-58.95	-13.0	45.9	349.5	Vertical	<u>PASS</u>
194.489	-66.94	-13.0	53.9	0.8	Vertical	<u>PASS</u>
1598.504	-51.23	-13.0	38.2	263.8	Vertical	<u>PASS</u>
1708.229	-53.55	-13.0	40.6	22.4	Vertical	<u>N.A</u>
2112.219	-53.96	-13.0	41.0	149.5	Vertical	<u>N.A</u>
15039.900	-46.36	-13.0	33.4	1.8	Vertical	<u>PASS</u>

(Plot N.2: HSDPA 1700MHz Channel = 1312, Test Antenna Vertical)



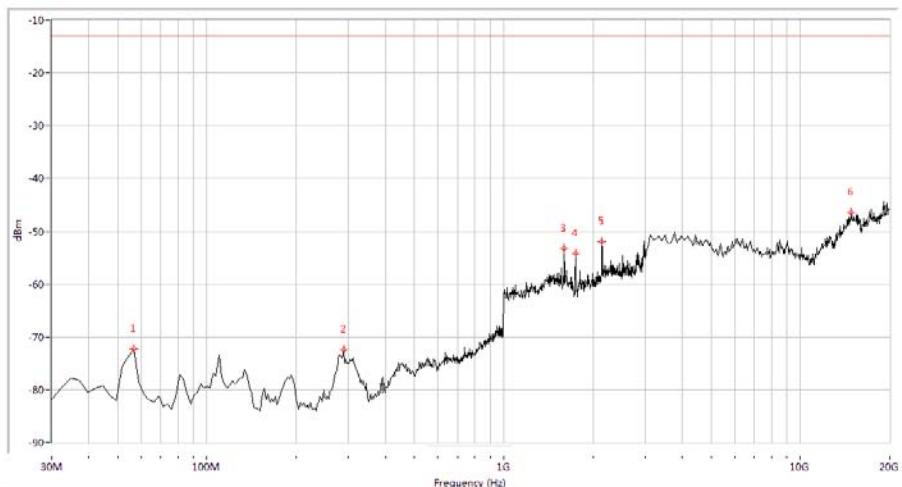
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-72.78	-13.0	59.8	64.9	Horizontal	<u>PASS</u>
109.825	-73.54	-13.0	60.5	156.3	Horizontal	<u>PASS</u>
305.761	-73.99	-13.0	61.0	35.7	Horizontal	<u>PASS</u>
1598.504	-49.85	-13.0	36.9	222.5	Horizontal	<u>PASS</u>
2137.157	-52.38	-13.0	39.4	4.9	Horizontal	<u>N.A</u>
14912.718	-46.61	-13.0	33.6	15.3	Horizontal	<u>PASS</u>

(Plot N.3: HSDPA 1700MHz Channel = 1412, Test Antenna Horizontal)



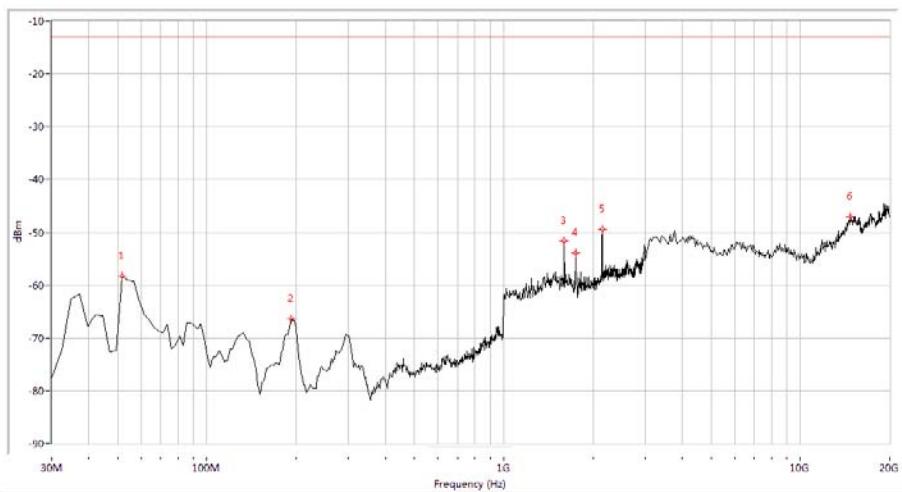
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-62.63	-13.0	49.6	94.7	Vertical	<u>PASS</u>
51.771	-58.66	-13.0	45.7	65.1	Vertical	<u>PASS</u>
196.908	-66.95	-13.0	54.0	254.9	Vertical	<u>PASS</u>
1598.504	-52.09	-13.0	39.1	131.3	Vertical	<u>PASS</u>
2137.157	-53.29	-13.0	40.3	194.7	Vertical	<u>N.A</u>
14743.142	-45.98	-13.0	33.0	0.1	Vertical	<u>PASS</u>

(Plot N.4: HSDAP 1700MHz Channel = 1412, Test Antenna Vertical)



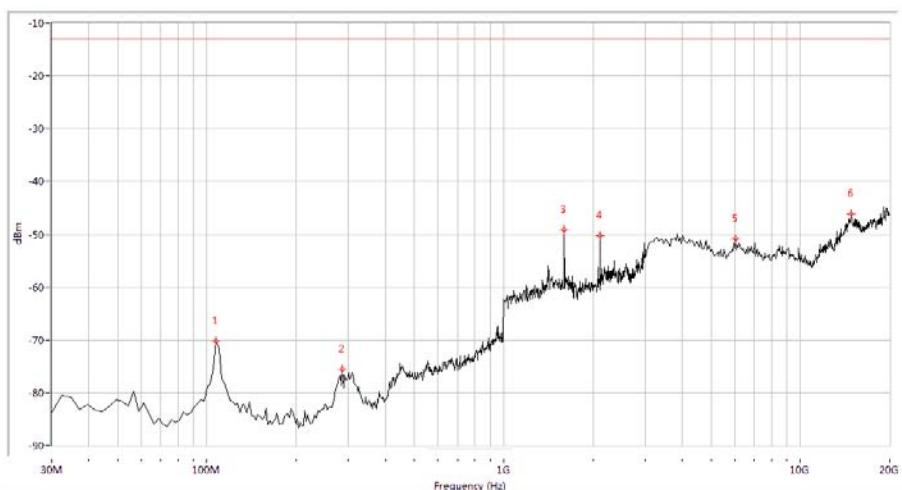
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.32	-13.0	59.3	321.5	Horizontal	<u>PASS</u>
288.828	-72.44	-13.0	59.4	167.4	Horizontal	<u>PASS</u>
1598.504	-53.17	-13.0	40.2	52.8	Horizontal	<u>PASS</u>
1748.130	-54.12	-13.0	41.1	64.7	Horizontal	<u>N.A</u>
2147.132	-51.98	-13.0	39.0	1.5	Horizontal	<u>N.A</u>
14870.324	-46.46	-13.0	33.5	217.4	Horizontal	<u>PASS</u>

(Plot N.5: HSDPA 1700MHz Channel = 1513, Test Antenna Horizontal)



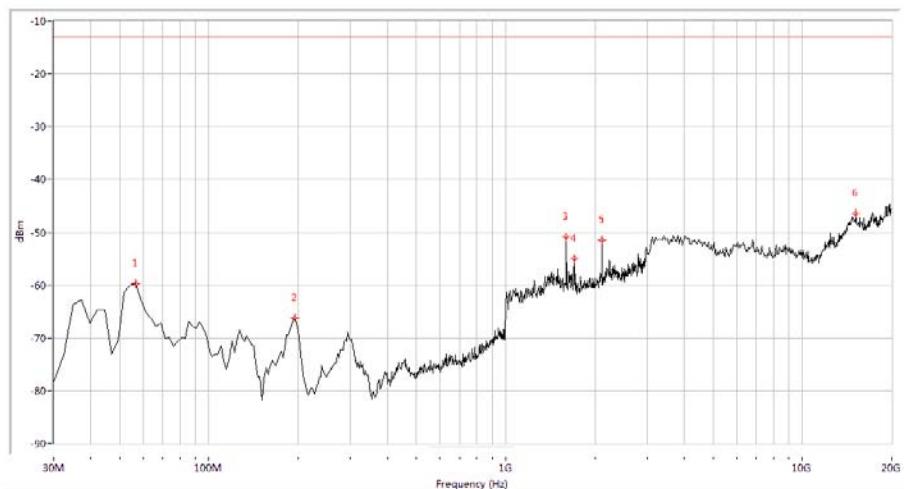
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
51.771	-58.36	-13.0	45.4	349.7	Vertical	<u>PASS</u>
192.070	-66.32	-13.0	53.3	65.6	Vertical	<u>PASS</u>
1598.504	-51.67	-13.0	38.7	284.7	Vertical	<u>PASS</u>
1748.130	-53.92	-13.0	40.9	305.4	Vertical	<u>N.A</u>
2152.120	-49.47	-13.0	36.5	319.7	Vertical	<u>N.A</u>
14785.536	-47.04	-13.0	34.0	265.6	Vertical	<u>PASS</u>

(Plot N.6: HSDPA 1700MHz Channel = 1513, Test Antenna Vertical)



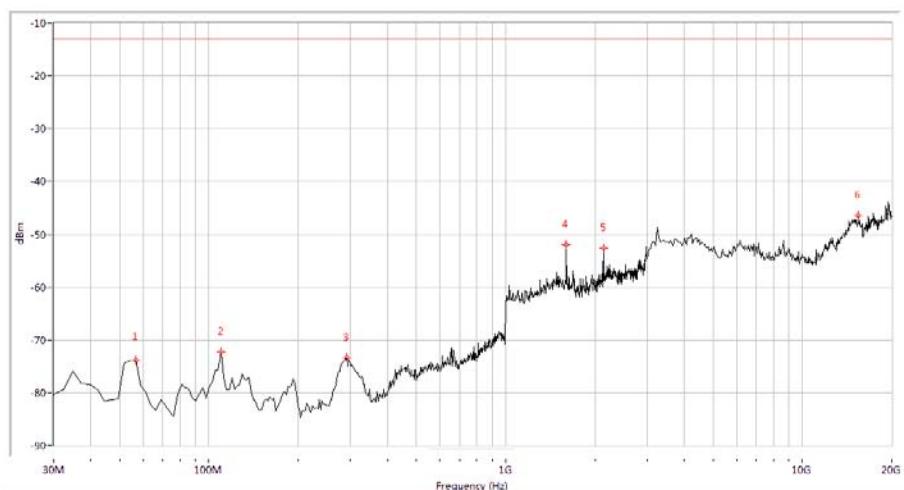
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
107.406	-70.14	-13.0	57.1	269.4	Horizontal	<u>PASS</u>
286.409	-75.55	-13.0	62.5	0.2	Horizontal	<u>PASS</u>
1598.504	-49.11	-13.0	36.1	360.0	Horizontal	<u>PASS</u>
2112.219	-50.27	-13.0	37.3	251.7	Horizontal	<u>N.A</u>
6052.369	-50.92	-13.0	37.9	29.4	Horizontal	<u>PASS</u>
14870.324	-46.14	-13.0	33.1	10.2	Horizontal	<u>PASS</u>

(Plot O.1: HSUPA 1700MHz Channel = 1312, Test Antenna Horizontal)



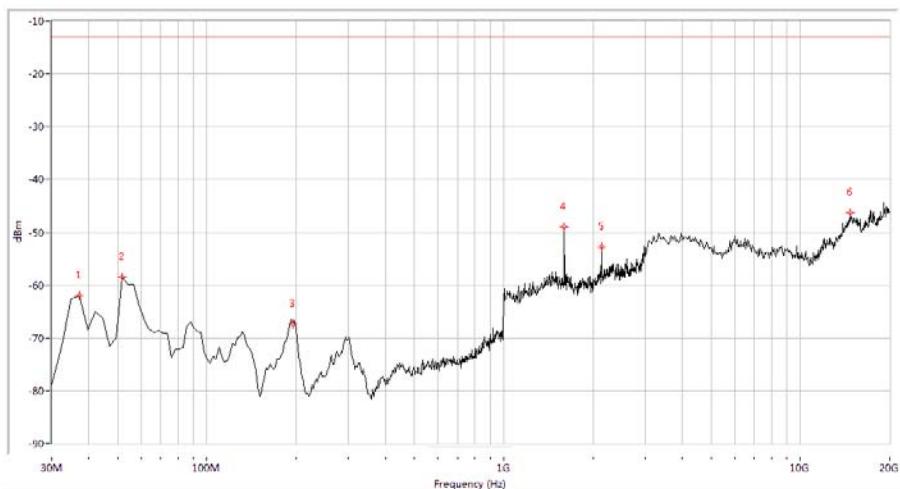
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-59.81	-13.0	46.8	69.4	Vertical	<u>PASS</u>
194.489	-66.30	-13.0	53.3	96.1	Vertical	<u>PASS</u>
1598.504	-50.89	-13.0	37.9	123.5	Vertical	<u>PASS</u>
1708.229	-55.01	-13.0	42.0	0.7	Vertical	<u>N.A</u>
2112.219	-51.58	-13.0	38.6	1.6	Vertical	<u>N.A</u>
15167.082	-46.48	-13.0	33.5	196.1	Vertical	<u>PASS</u>

(Plot O.2: HSUPA 1700MHz Channel = 1312, Test Antenna Vertical)



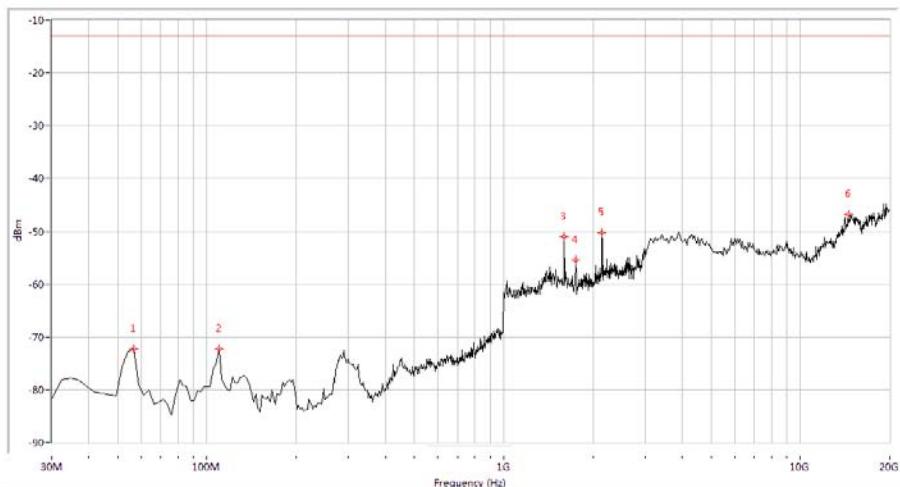
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-73.77	-13.0	60.8	168.4	Horizontal	<u>PASS</u>
109.825	-72.31	-13.0	59.3	95.4	Horizontal	<u>PASS</u>
291.247	-73.36	-13.0	60.4	65.8	Horizontal	<u>PASS</u>
1598.504	-52.02	-13.0	39.0	132.5	Horizontal	<u>PASS</u>
2137.157	-52.68	-13.0	39.7	118.4	Horizontal	<u>N.A</u>
15421.446	-46.43	-13.0	33.4	90.4	Horizontal	<u>PASS</u>

(Plot O.3: HSUPA 1700MHz Channel = 1412, Test Antenna Horizontal)



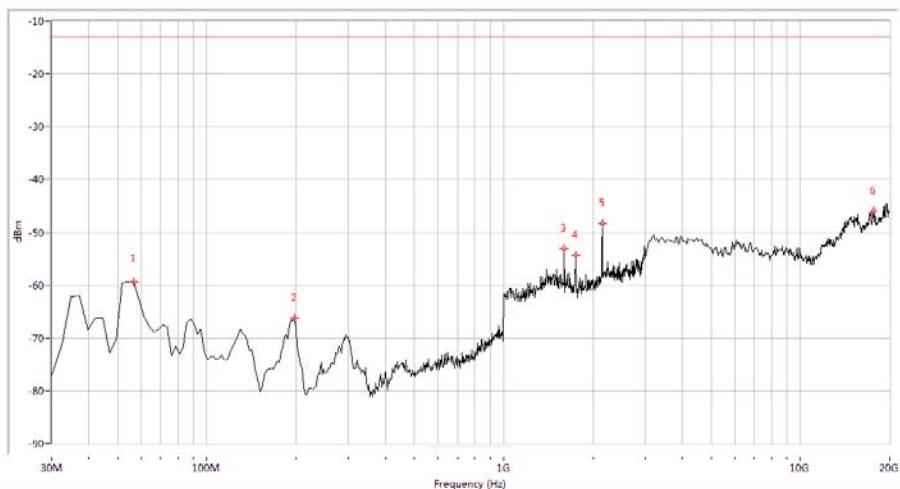
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-61.89	-13.0	48.9	360.0	Vertical	<u>PASS</u>
51.771	-58.41	-13.0	45.4	0.7	Vertical	<u>PASS</u>
194.489	-67.37	-13.0	54.4	58.6	Vertical	<u>PASS</u>
1598.504	-48.97	-13.0	36.0	97.4	Vertical	<u>PASS</u>
2137.157	-52.77	-13.0	39.8	60.0	Vertical	<u>N.A</u>
14785.536	-46.24	-13.0	33.2	0.9	Vertical	<u>PASS</u>

(Plot O.4: HSUPA 1700MHz Channel =1412, Test Antenna Vertical)



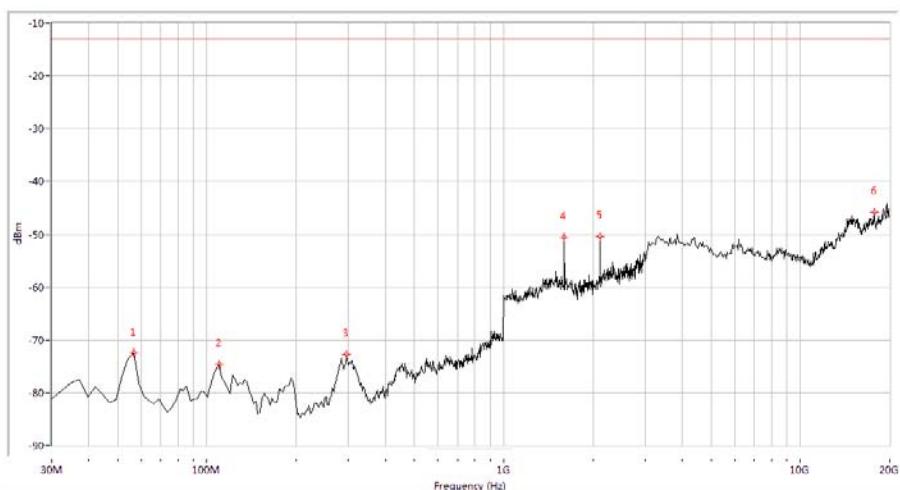
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.32	-13.0	59.3	349.7	Horizontal	<u>PASS</u>
109.825	-72.19	-13.0	59.2	106.8	Horizontal	<u>PASS</u>
1598.504	-51.01	-13.0	38.0	219.7	Horizontal	<u>PASS</u>
1748.130	-55.46	-13.0	42.5	0.0	Horizontal	<u>N.A</u>
2147.132	-50.30	-13.0	37.3	9.7	Horizontal	<u>N.A</u>
14531.172	-46.81	-13.0	33.8	16.8	Horizontal	<u>PASS</u>

(Plot O.5: HSUPA 1700MHz Channel = 1513, Test Antenna Horizontal)



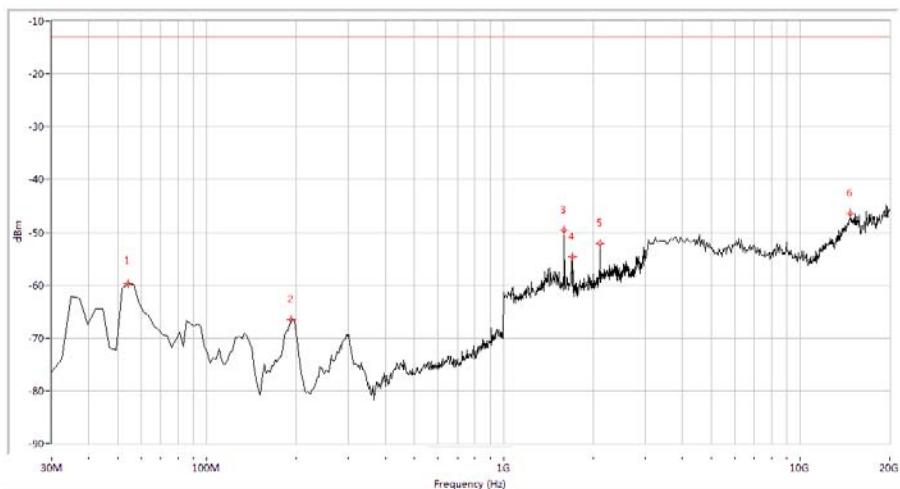
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-59.41	-13.0	46.4	94.3	Vertical	<u>PASS</u>
196.908	-66.30	-13.0	53.3	162.8	Vertical	<u>PASS</u>
1598.504	-53.07	-13.0	40.1	252.4	Vertical	<u>PASS</u>
1748.130	-54.42	-13.0	41.4	87.6	Vertical	<u>N.A</u>
2152.120	-48.40	-13.0	35.4	4.3	Vertical	<u>N.A</u>
17625.935	-46.03	-13.0	33.0	62.8	Vertical	<u>PASS</u>

(Plot O.6: HSUPA 1700MHz Channel = 1513, Test Antenna Vertical)



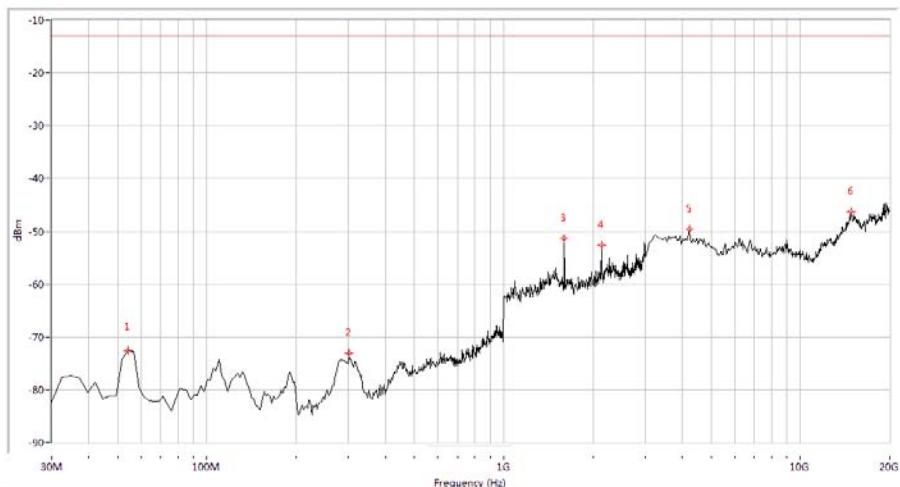
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-72.43	-13.0	59.4	349.5	Horizontal	<u>PASS</u>
109.825	-74.66	-13.0	61.7	25.1	Horizontal	<u>PASS</u>
296.085	-72.78	-13.0	59.8	97.6	Horizontal	<u>PASS</u>
1598.504	-50.60	-13.0	37.6	22.2	Horizontal	<u>PASS</u>
2112.219	-50.33	-13.0	37.3	3.5	Horizontal	<u>N.A</u>
17753.117	-45.88	-13.0	32.9	225.1	Horizontal	<u>PASS</u>

(Plot P.1: HSPA+ 1700 MHz Channel = 1312, Test Antenna Horizontal)



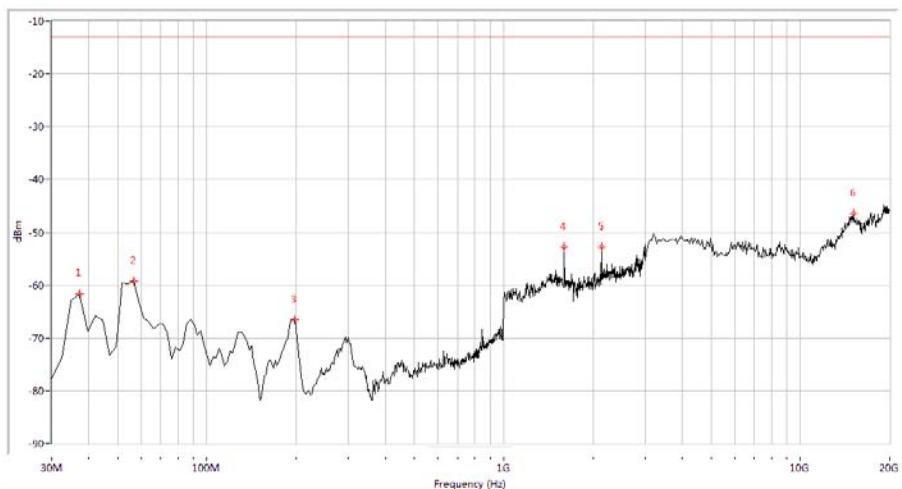
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-59.80	-13.0	46.8	319.5	Vertical	<u>PASS</u>
192.070	-66.61	-13.0	53.6	75.4	Vertical	<u>PASS</u>
1598.504	-49.57	-13.0	36.6	269.8	Vertical	<u>PASS</u>
1708.229	-54.66	-13.0	41.7	333.5	Vertical	<u>N.A</u>
2112.219	-52.08	-13.0	39.1	39.5	Vertical	<u>N.A</u>
14785.536	-46.46	-13.0	33.5	7.4	Vertical	<u>PASS</u>

(Plot P.2: HSPA+ 1700 MHz Channel = 1312, Test Antenna Vertical)



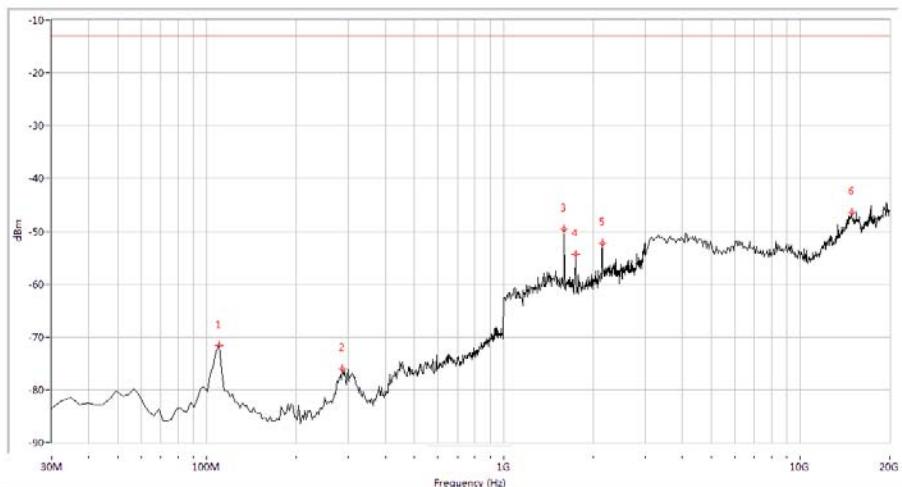
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
54.190	-72.53	-13.0	59.5	63.5	Horizontal	<u>PASS</u>
300.923	-73.11	-13.0	60.1	95.4	Horizontal	<u>PASS</u>
1598.504	-51.32	-13.0	38.3	159.9	Horizontal	<u>PASS</u>
2137.157	-52.65	-13.0	39.7	65.7	Horizontal	<u>N.A</u>
4229.426	-49.67	-13.0	36.7	3.5	Horizontal	<u>PASS</u>
14827.930	-46.28	-13.0	33.3	5.4	Horizontal	<u>PASS</u>

(Plot P.3: HSPA+ 1700 MHz Channel = 1412, Test Antenna Horizontal)



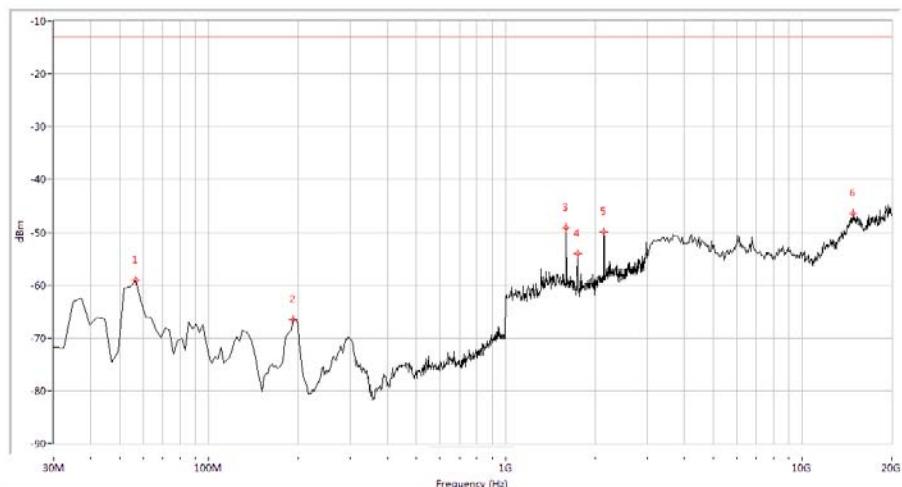
Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
37.257	-61.66	-13.0	48.7	45.5	Vertical	<u>PASS</u>
56.608	-59.30	-13.0	46.3	5.7	Vertical	<u>PASS</u>
196.908	-66.55	-13.0	53.6	163.9	Vertical	<u>PASS</u>
1598.504	-52.78	-13.0	39.8	65.1	Vertical	<u>PASS</u>
2137.157	-52.79	-13.0	39.8	345.5	Vertical	<u>N.A</u>
15124.688	-46.48	-13.0	33.5	55.7	Vertical	<u>PASS</u>

(Plot P.4: HSPA+ 1700 MHz Channel = 1412, Test Antenna Vertical)



Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
109.825	-71.68	-13.0	58.7	264.7	Horizontal	<u>PASS</u>
286.409	-75.99	-13.0	63.0	18.4	Horizontal	<u>PASS</u>
1598.504	-49.60	-13.0	36.6	137.2	Horizontal	<u>PASS</u>
1748.130	-54.34	-13.0	41.3	299.8	Horizontal	<u>N.A</u>
2152.120	-52.25	-13.0	39.3	64.7	Horizontal	<u>N.A</u>
14912.718	-46.49	-13.0	33.5	198.4	Horizontal	<u>PASS</u>

(Plot P.5: HSPA+ 1700 MHz Channel = 1513, Test Antenna Horizontal)



Fre. (MHz)	Peak	Limit(PK)	Margin	Degree	Antenna	Verdict
56.608	-59.06	-13.0	46.1	49.6	Vertical	<u>PASS</u>
192.070	-66.56	-13.0	53.6	54.8	Vertical	<u>PASS</u>
1598.504	-49.14	-13.0	36.1	10.1	Vertical	<u>PASS</u>
1748.130	-53.97	-13.0	41.0	208.5	Vertical	<u>N.A</u>
2147.132	-49.84	-13.0	36.8	249.6	Vertical	<u>N.A</u>
14870.324	-46.42	-13.0	33.4	354.8	Vertical	<u>PASS</u>

(Plot P.6: HSPA+ 1700 MHz Channel = 1513, Test Antenna Vertical)

\*\* END OF REPORT \*\*