APPENDIX 2: Data of EMI test

Conducted Emission

DATA OF CONDUCTED EMISSION TEST

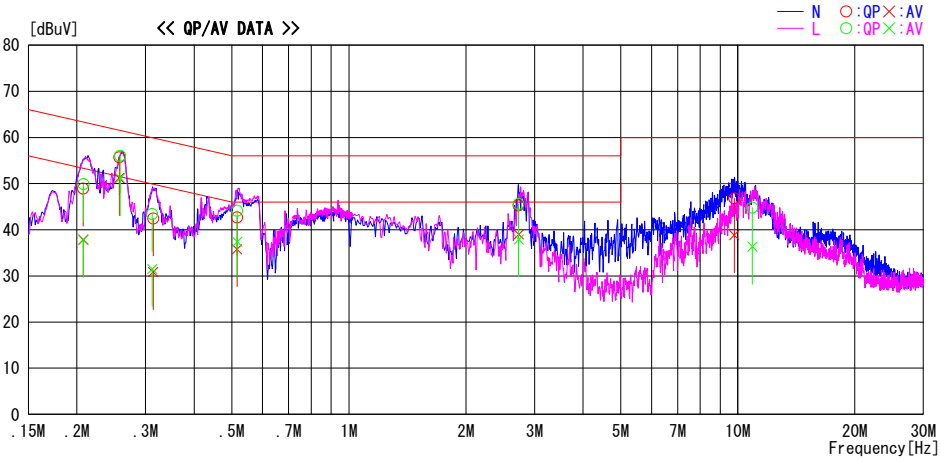
UL Japan, Inc. Head Office EMC Lab. No.4 Semi Anechoic Chamber
Date : 2010/12/23

Report No. : 31BE0221-HO-06

Temp./Humi. : 24deg.C / 35%RH
Engineer : Takumi Shimada

Mode / Remarks : Tx 11a 9Mbps 5220MHz

LIMIT : FCC15.207 QP
FCC15.207 AV



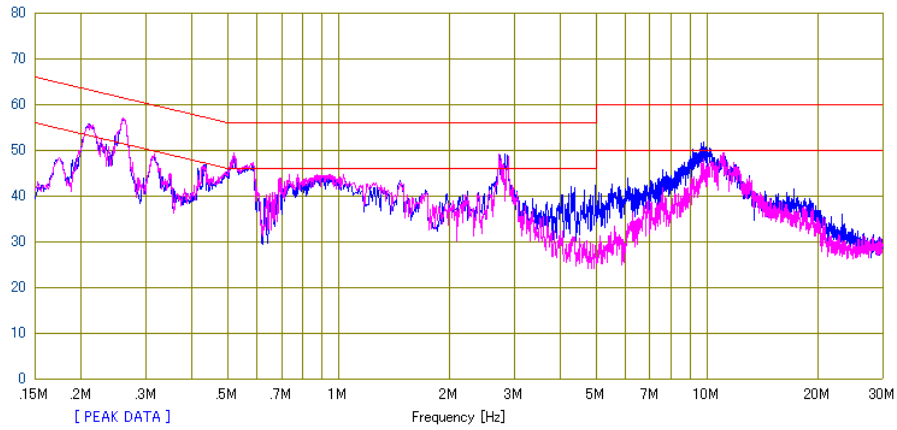
Frequency	Reading Level		Corr.	Results		Limit		Margin		Phase	Comment
	QP	AV	Factor	QP	AV	QP	AV	QP	AV		
[MHz]	[dBuV]	[dBuV]	[dB]	[dBuV]	[dBuV]	[dBuV]	[dBuV]	[dB]	[dB]		
0.20756	35.6	24.6	13.3	48.9	37.9	63.3	53.3	14.4	15.4	N	
0.25689	42.4	37.9	13.3	55.7	51.2	61.5	51.5	5.8	0.3	N	
0.31382	29.1	17.5	13.3	42.4	30.8	59.9	49.9	17.5	19.1	N	
0.51598	29.4	22.5	13.3	42.7	35.8	56.0	46.0	13.3	10.2	N	
2.73272	31.9	25.6	13.4	45.3	39.0	56.0	46.0	10.7	7.0	N	
9.79722	32.7	24.7	14.1	46.8	38.8	60.0	50.0	13.2	11.2	N	
0.20768	36.6	24.5	13.3	49.9	37.8	63.3	53.3	13.4	15.5	L	
0.25808	42.7	37.9	13.3	56.0	51.2	61.5	51.5	5.5	0.3	L	
0.31202	30.1	18.2	13.3	43.4	31.5	59.9	49.9	16.5	18.4	L	
0.51628	30.8	24.1	13.3	44.1	37.4	56.0	46.0	11.9	8.6	L	
2.73272	32.2	24.5	13.4	45.6	37.9	56.0	46.0	10.4	8.1	L	
10.89360	30.7	22.2	14.1	44.8	36.3	60.0	50.0	15.2	13.7	L	

CHART:WITH FACTOR,Peak hold data. CALCULATION:RESULT[dBuV]=READING[dBuV]+C.F[dB](LISN LOSS+CABLE LOSS)
Except for the above table : adequate margin data below the limits.

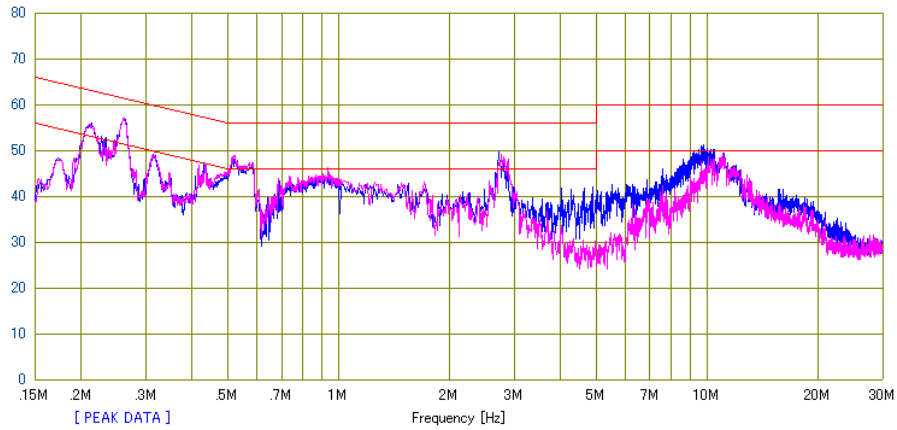
Conducted Emission

Test place	Head Office EMC Lab. No.4 Semi Anechoic Chamber
Report No.	31BE0221-HO-04
Date	12/23/2010
Temperature/ Humidity	24deg.C. / 35%RH
Engineer	Takumi Shimada
Mode	11a Tx

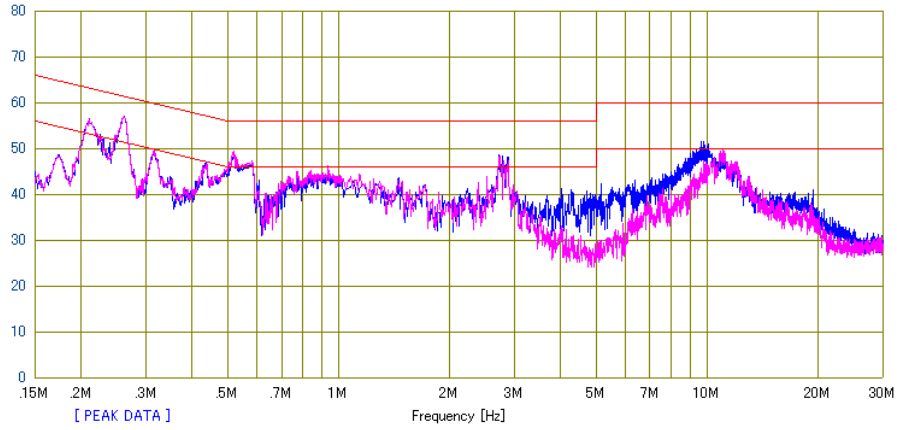
5180MHz



5220MHz



5240MHz



Y scale [dBuV] Chart — N — L

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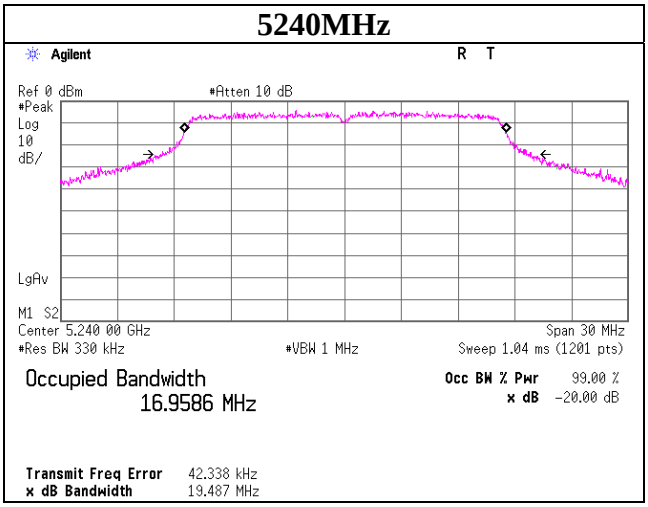
26dB Emission Bandwidth and 99% Occupied Bandwidth

Test place	Head Office EMC Lab. No.11 Measurement room
Report No.	31BE0221-HO-06
Date	12/07/2010
Temperature/ Humidity	21deg.C/ 38%RH
Engineer	Satofumi Matsuyama
Mode	11a Tx

Antenna	Frequency [MHz]	26dB Emission Bandwidth [MHz]	99% Occupied Bandwidth [MHz]	Limit [MHz]
A	5180	24.061	16.954	-
	5220	25.007	16.867	-
	5240	25.333	16.993	-
B	5180	27.252	16.963	-
	5220	24.841	17.075	-
	5240	26.306	17.057	-

20dB Emission Bandwidth

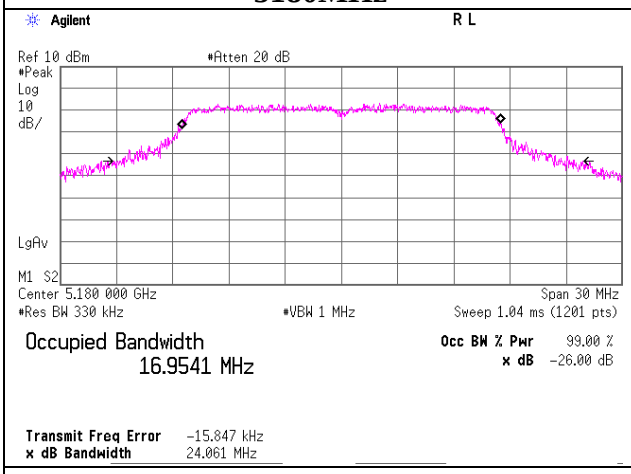
Antenna	Frequency [MHz]	20dB Bandwidth [MHz]
A	5240	19.487



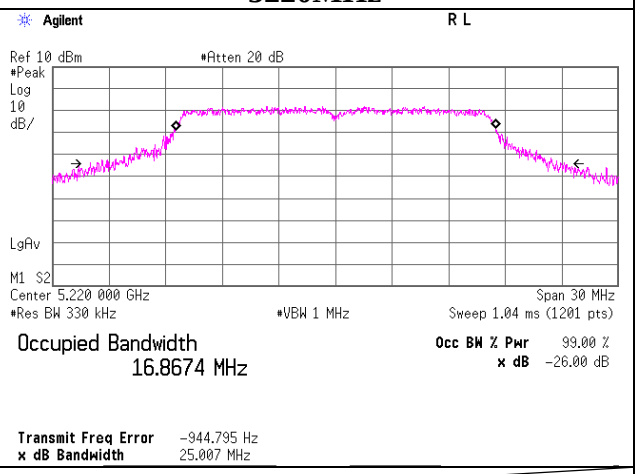
26dB Emission Bandwidth

11a Antenna A

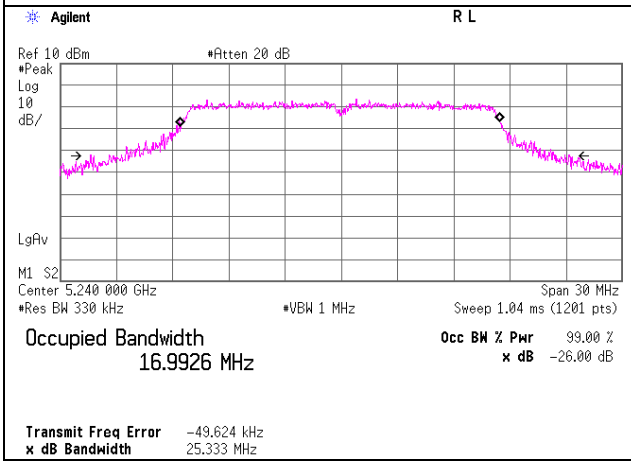
5180MHz



5220MHz



5240MHz



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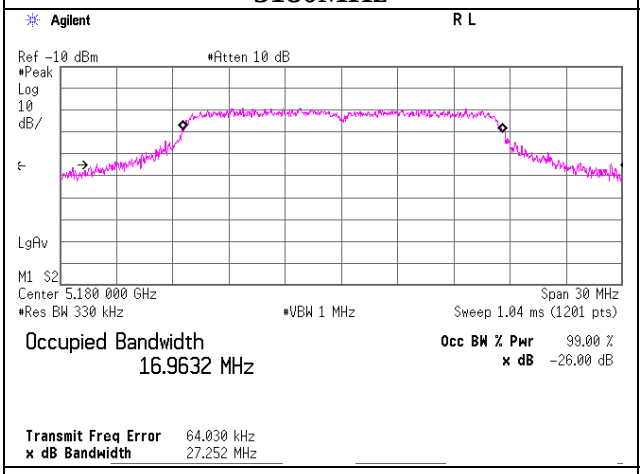
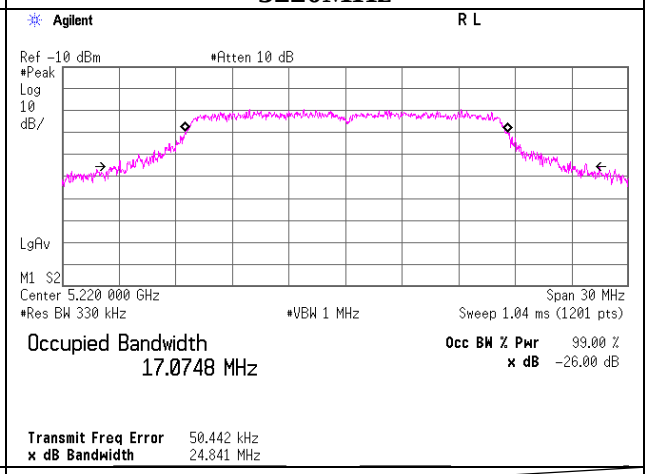
26dB Emission Bandwidth

11a Antenna B

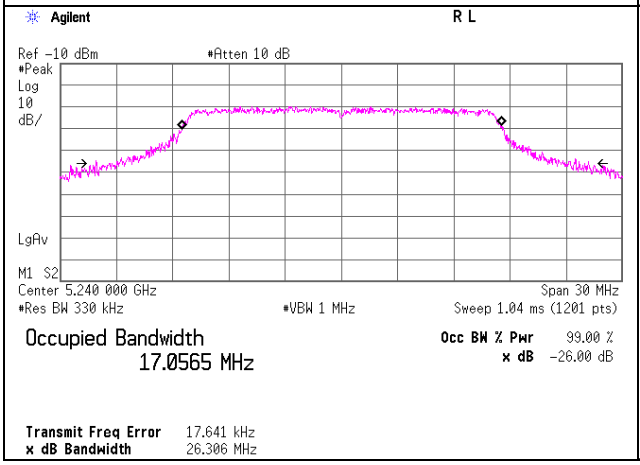
5180MHz



5220MHz



5240MHz



Maximum Peak Output Power

Test place	Head Office EMC Lab. No.11 Measurement room
Report No.	31BE0221-HO-06
Date	12/07/2010
Temperature/ Humidity	21deg.C/ 38%RH
Engineer	Satofumi Matsuyama
Mode	11a Tx

Antenna A

Freq. [MHz]	S/A Reading [dBm]	Cable Loss [dB]	Atten. Loss [dB]	Antenna Gain [dBi]	Result (Cond.) [dBm]	Result (e.i.r.p.) [dBm]	Limit (Cond.) [dBm]	Limit (e.i.r.p.) [dBm]	Margin (Cond.) [dB]	Margin (e.i.r.p.) [dB]
5180.0	3.30	1.36	10.12	2.14	14.78	16.92	16.98	-	2.20	-
5220.0	3.68	1.37	10.12	2.14	15.17	17.31	16.98	-	1.81	-
5240.0	3.27	1.37	10.12	2.14	14.76	16.90	16.98	-	2.22	-

Antenna B

Freq. [MHz]	S/A Reading [dBm]	Cable Loss [dB]	Atten. Loss [dB]	Antenna Gain [dBi]	Result (Cond.) [dBm]	Result (e.i.r.p.) [dBm]	Limit (Cond.) [dBm]	Limit (e.i.r.p.) [dBm]	Margin (Cond.) [dB]	Margin (e.i.r.p.) [dB]
5180.0	-19.42	1.36	10.12	2.14	-7.94	-5.80	16.98	-	24.92	-
5220.0	-20.02	1.37	10.12	2.14	-8.53	-6.39	16.98	-	25.51	-
5240.0	-19.36	1.37	10.12	2.14	-7.87	-5.73	16.98	-	24.85	-

Result(Cond.) = Reading + Cable Loss + Atten.Loss
Result(e.i.r.p.) = Reading + Cable Loss + Atten.Loss + Antenna Gain
15.407(a)(1) Limit(Cond.) = 16.98dBm(50mW) or 4 + 10log(26dB BW) dBm
15.407(a)(2) Limit(Cond.) = 23.97dBm(250mW) or 11 + 10log(26dB BW) dBm

Antenna A, 5220MHz

Data Rate [Mbps]	Reading [dBm]	Remark
6	3.55	
9	3.68	*
12	3.64	
18	3.62	
24	3.60	
36	2.06	
48	-0.13	
54	-0.95	

* Worst Rate
All comparison were carried out on same frequency and measurement factors.

Peak Power Spectral Density

Test place	Head Office EMC Lab. No.11 Measurement room
Report No.	31BE0221-HO-06
Date	12/07/2010
Temperature/ Humidity	21deg.C/ 38%RH
Engineer	Satofumi Matsuyama
Mode	11a Tx

Antenna A

Freq. [MHz]	Reading [dBm]	Cable Loss [dB]	Atten. Loss [dB]	ENBW [dB]	Result [dBm]	Limit [dBm]	Margin [dB]
5180.0	-7.55	1.36	10.12	0.20	3.73	4.00	0.27
5220.0	-7.53	1.37	10.12	0.20	3.77	4.00	0.24
5240.0	-7.45	1.37	10.12	0.20	3.85	4.00	0.16

Antenna B

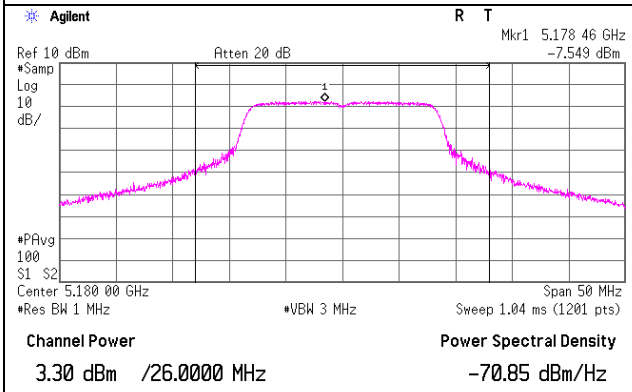
Freq. [MHz]	Reading [dBm]	Cable Loss [dB]	Atten. Loss [dB]	ENBW [dB]	Result [dBm]	Limit [dBm]	Margin [dB]
5180.0	-30.37	1.36	10.12	0.20	-19.09	4.00	23.09
5220.0	-30.95	1.37	10.12	0.20	-19.66	4.00	23.66
5240.0	-30.15	1.37	10.12	0.20	-18.86	4.00	22.86

Result = Reading + Cable Loss + Attenuator - ENBW
*ENBW: Equivalent Noise Band Width

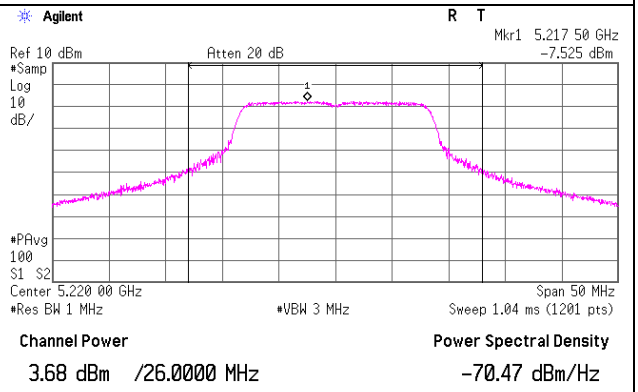
Maximum Peak Output Power & Peak Power Spectral Density

11a Antenna A

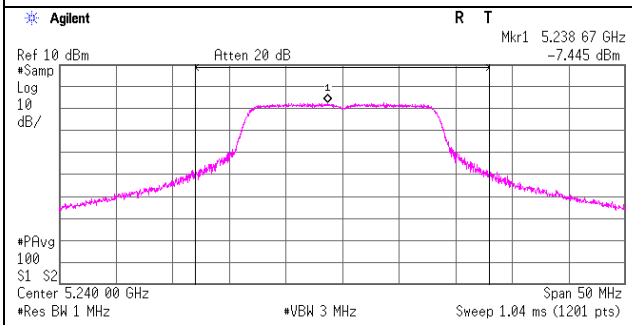
5180MHz



5220MHz



5240MHz



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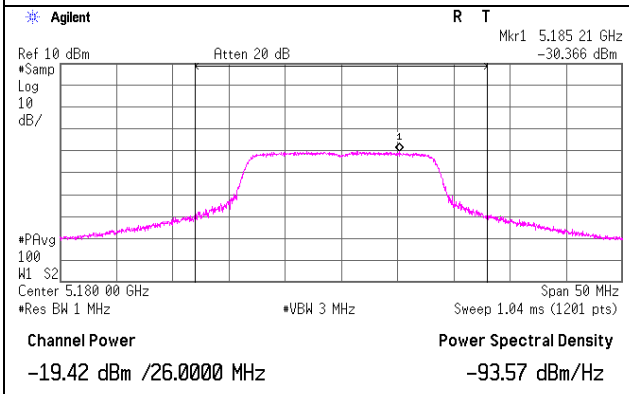
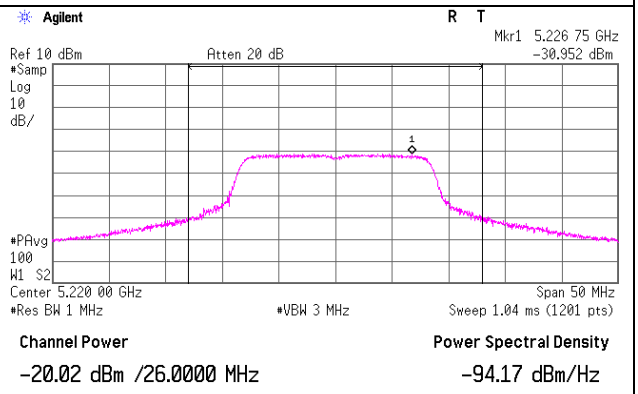
Maximum Peak Output Power & Peak Power Spectral Density

11a Antenna B

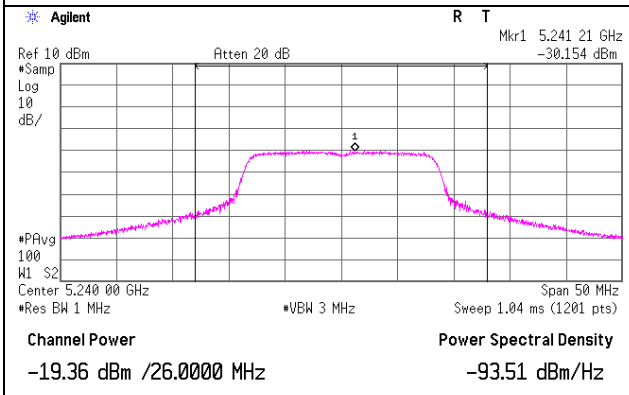
5180MHz



5220MHz



5240MHz



Radiated Spurious Emission

Report No.	31BE0221-HO-06	
Test place	Head Office EMC Lab.	
Semi Anechoic Chamber	No.1 and No.2	No.2
Date	03/18/2011	03/20/2011
Temperature/ Humidity	20 deg.C./ 23% RH	20 deg.C./ 28% RH
Engineer	Takayuki Shimada (1-40GHz)	Hiroshi Kukita (30-1000MHz)
Mode	11a Tx 5180MHz	

Polarity	Frequency [MHz]	Detector	Reading [dBuV]	Ant.Fac. [dB/m]	Loss [dB]	Gain [dB]	Result [dBuV/m]	Limit [dBuV/m]	Margin [dB]	Inside or Outside of Restricted Bands	Remark
Hori	39.850	QP	26.0	15.4	6.9	28.7	19.6	40.0	20.4	Outside	
Hori	191.998	QP	34.5	16.6	8.1	28.0	31.2	43.5	12.3	Outside	
Hori	239.998	QP	39.6	17.2	8.4	27.8	37.4	46.0	8.6	Outside	
Hori	375.004	QP	40.2	16.7	9.2	28.2	37.9	46.0	8.1	Outside	
Hori	500.002	QP	29.6	18.0	9.8	28.9	28.5	46.0	17.5	Outside	
Hori	600.001	QP	33.4	19.3	10.2	28.7	34.2	46.0	11.8	Outside	
Hori	5147.750	PK	54.6	31.8	4.0	31.3	59.1	73.9	14.8	Inside	
Hori	5150.000	PK	57.2	31.8	4.0	31.3	61.7	68.2	6.5	Bandedge	
Hori	10360.000	PK	49.3	39.1	-2.0	31.6	54.8	68.2	13.4	Outside	
Hori	15540.000	PK	44.7	39.0	-0.8	30.6	52.3	73.9	21.6	Inside	NS
Hori	36260.000	PK	45.3	40.1	1.5	24.3	62.6	68.2	5.6	Outside	NS
Hori	5147.750	AV	34.0	31.8	4.0	31.3	38.5	53.9	15.4	Inside	
Hori	5150.000	AV	35.8	31.8	4.0	31.3	40.3	53.9	13.6	Bandedge	
Hori	15540.000	AV	30.9	39.0	-0.8	30.6	38.5	53.9	15.4	Inside	NS
Vert	39.530	QP	36.7	15.5	6.9	28.7	30.4	40.0	9.6	Outside	
Vert	191.995	QP	30.0	16.6	8.1	28.0	26.7	43.5	16.8	Outside	
Vert	239.992	QP	34.6	17.2	8.4	27.8	32.4	46.0	13.6	Outside	
Vert	375.000	QP	39.5	16.7	9.2	28.2	37.2	46.0	8.8	Outside	
Vert	499.999	QP	33.3	18.0	9.8	28.9	32.2	46.0	13.8	Outside	
Vert	600.002	QP	40.2	19.3	10.2	28.7	41.0	46.0	5.0	Outside	
Vert	5147.750	PK	60.3	31.8	4.0	31.3	64.8	73.9	9.1	Inside	
Vert	5150.000	PK	61.6	31.8	4.0	31.3	66.1	68.2	2.1	Bandedge	
Vert	10360.000	PK	52.1	39.1	-2.0	31.6	57.6	68.2	10.6	Outside	
Vert	15540.000	PK	44.5	39.0	-0.8	30.6	52.1	73.9	21.8	Inside	NS
Vert	36260.000	PK	45.1	40.1	1.5	24.3	62.4	68.2	5.8	Outside	NS
Vert	5147.750	AV	37.6	31.8	4.0	31.3	42.1	53.9	11.8	Inside	
Vert	5150.000	AV	39.7	31.8	4.0	31.3	44.2	53.9	9.7	Bandedge	
Vert	15540.000	AV	30.9	39.0	-0.8	30.6	38.5	53.9	15.4	Inside	NS

Result = Reading + Ant Factor + Loss (Cable+Attenuator+Filter-Distance factor(above 10GHz)) - Gain(Amprifier)

*Other frequency noises omitted in this report were not seen or have enough margin (more than 20dB).

*The 10th harmonic was not seen so the result was its base noise level.

Distance factor: 10GHz-26.5GHz 20log(3.0m/1.0m)= 9.5dB
26.5GHz-40GHz 20log(3.0m/0.5m)=15.6dB

Radiated Spurious Emission

Report No.	31BE0221-HO-06	
Test place	Head Office EMC Lab.	
Semi Anechoic Chamber	No.1 and No.2	No.2
Date	03/18/2011	03/20/2011
Temperature/ Humidity	20 deg.C./ 23% RH	20 deg.C./ 28% RH
Engineer	Takayuki Shimada (1-40GHz)	Hiroshi Kukita (30-1000MHz)
Mode	11a Tx 5220MHz	

Polarity	Frequency [MHz]	Detector	Reading [dBuV]	Ant.Fac. [dB/m]	Loss [dB]	Gain [dB]	Result [dBuV/m]	Limit [dBuV/m]	Margin [dB]	Inside or Outside of Restricted Bands	Remark
Hori	39.870	QP	26.9	15.4	6.9	28.7	20.5	40.0	19.5	Outside	
Hori	191.998	QP	35.0	16.6	8.1	28.0	31.7	43.5	11.8	Outside	
Hori	239.996	QP	39.6	17.2	8.4	27.8	37.4	46.0	8.6	Outside	
Hori	374.999	QP	40.8	16.7	9.2	28.2	38.5	46.0	7.5	Outside	
Hori	500.001	QP	28.7	18.0	9.8	28.9	27.6	46.0	18.4	Outside	
Hori	599.997	QP	33.7	19.3	10.2	28.7	34.5	46.0	11.5	Outside	
Hori	10440.000	PK	47.9	39.2	-2.0	31.6	53.5	68.2	14.7	Outside	
Hori	15660.000	PK	44.2	38.7	-0.8	30.7	51.4	73.9	22.5	Inside	NS
Hori	36540.000	PK	45.3	39.8	1.6	24.2	62.5	68.2	5.7	Outside	NS
Hori	15660.000	AV	30.7	38.7	-0.8	30.7	37.9	53.9	16.0	Inside	NS
Vert	39.510	QP	36.4	15.5	6.9	28.7	30.1	40.0	9.9	Outside	
Vert	191.998	QP	30.8	16.6	8.1	28.0	27.5	43.5	16.0	Outside	
Vert	239.993	QP	34.1	17.2	8.4	27.8	31.9	46.0	14.1	Outside	
Vert	375.001	QP	38.7	16.7	9.2	28.2	36.4	46.0	9.6	Outside	
Vert	500.002	QP	33.3	18.0	9.8	28.9	32.2	46.0	13.8	Outside	
Vert	600.003	QP	39.2	19.3	10.2	28.7	40.0	46.0	6.0	Outside	
Vert	10440.000	PK	54.0	39.2	-2.0	31.6	59.6	68.2	8.6	Outside	
Vert	15660.000	PK	44.4	38.7	-0.8	30.7	51.6	73.9	22.3	Inside	NS
Vert	36540.000	PK	45.8	39.8	1.6	24.2	63.0	68.2	5.2	Outside	NS
Vert	15660.000	AV	30.7	38.7	-0.8	30.7	37.9	53.9	16.0	Inside	NS

Result = Reading + Ant Factor + Loss (Cable+Attenuator+Filter-Distance factor(above 10GHz)) - Gain(Amprifier)

*Other frequency noises omitted in this report were not seen or have enough margin (more than 20dB).

*The 10th harmonic was not seen so the result was its base noise level.

Distance factor: 10GHz-26.5GHz 20log(3.0m/1.0m)= 9.5dB
26.5GHz-40GHz 20log(3.0m/0.5m)=15.6dB

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Radiated Spurious Emission

Report No.	31BE0221-HO-06	
Test place	Head Office EMC Lab.	
Semi Anechoic Chamber	No.1 and No.2	No.2
Date	03/18/2011	03/20/2011
Temperature/ Humidity	20 deg.C./ 23% RH	22 deg.C./ 30% RH
Engineer	Takayuki Shimada (1-40GHz)	Hiroshi Kukita (30-1000MHz)
Mode	11a Tx 5240MHz	

Polarity	Frequency [MHz]	Detector	Reading [dBuV]	Ant.Fac. [dB/m]	Loss [dB]	Gain [dB]	Result [dBuV/m]	Limit [dBuV/m]	Margin [dB]	Inside or Outside of Restricted Bands	Remark
Hori	39.875	QP	27.0	15.4	6.9	28.7	20.6	40.0	19.4	Outside	
Hori	191.997	QP	34.4	16.6	8.1	28.0	31.1	43.5	12.4	Outside	
Hori	239.998	QP	38.9	17.2	8.4	27.8	36.7	46.0	9.3	Outside	
Hori	375.003	QP	41.8	16.7	9.2	28.2	39.5	46.0	6.5	Outside	
Hori	500.005	QP	29.7	18.0	9.8	28.9	28.6	46.0	17.4	Outside	
Hori	599.999	QP	34.6	19.3	10.2	28.7	35.4	46.0	10.6	Outside	
Hori	10480.000	PK	47.0	39.2	-2.0	31.5	52.7	68.2	15.5	Outside	
Hori	15720.000	PK	44.3	38.5	-0.8	30.7	51.3	73.9	22.6	Inside	NS
Hori	36680.000	PK	45.5	39.7	1.6	24.2	62.6	68.2	5.6	Outside	NS
Hori	15720.000	AV	30.4	38.5	-0.8	30.7	37.4	53.9	16.5	Inside	NS
Vert	39.522	QP	36.8	15.5	6.9	28.7	30.5	40.0	9.5	Outside	
Vert	191.997	QP	30.5	16.6	8.1	28.0	27.2	43.5	16.3	Outside	
Vert	239.995	QP	34.4	17.2	8.4	27.8	32.2	46.0	13.8	Outside	
Vert	375.002	QP	39.1	16.7	9.2	28.2	36.8	46.0	9.2	Outside	
Vert	500.008	QP	33.3	18.0	9.8	28.9	32.2	46.0	13.8	Outside	
Vert	600.001	QP	39.9	19.3	10.2	28.7	40.7	46.0	5.3	Outside	
Vert	10480.000	PK	49.4	39.2	-2.0	31.5	55.1	68.2	13.1	Outside	
Vert	15720.000	PK	44.4	38.5	-0.8	30.7	51.4	73.9	22.5	Inside	NS
Vert	36680.000	PK	45.4	39.7	1.6	24.2	62.5	68.2	5.7	Outside	NS
Vert	15720.000	AV	30.4	38.5	-0.8	30.7	37.4	53.9	16.5	Inside	NS

Result = Reading + Ant Factor + Loss (Cable+Attenuator+Filter-Distance factor(above 10GHz)) - Gain(Amprifier)

*Other frequency noises omitted in this report were not seen or have enough margin (more than 20dB).

*The 10th harmonic was not seen so the result was its base noise level.

Distance factor: 10GHz-26.5GHz 20log(3.0m/1.0m)= 9.5dB
26.5GHz-40GHz 20log(3.0m/0.5m)=15.6dB

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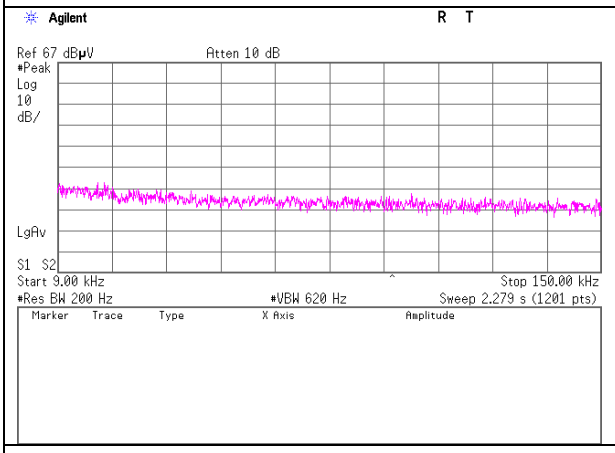
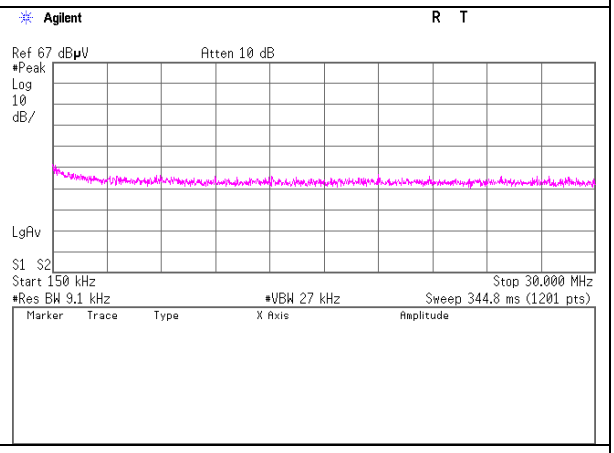
Conducted Spurious Emission

11a Tx 5180MHz Antenna A

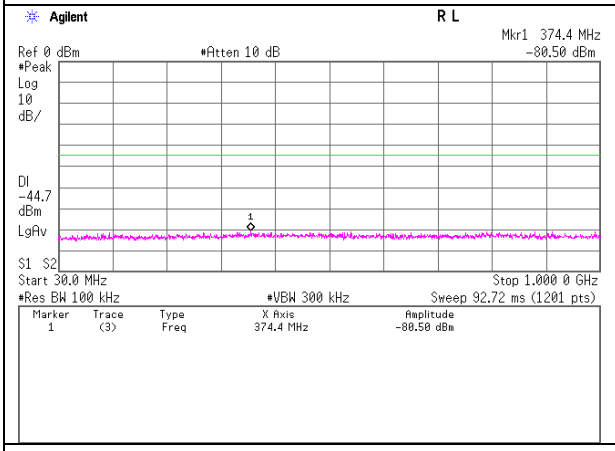
9kHz-150kHz



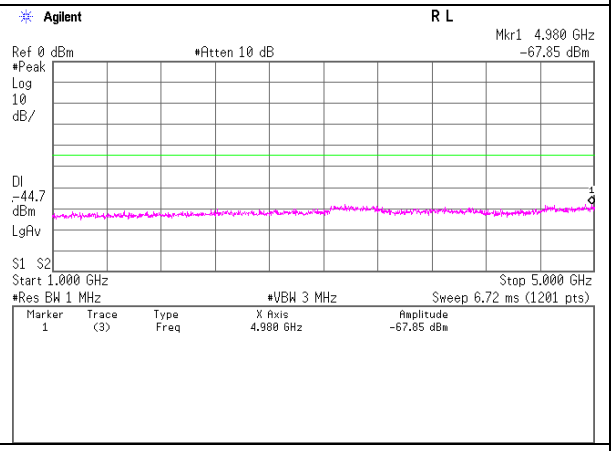
150kHz-30MHz



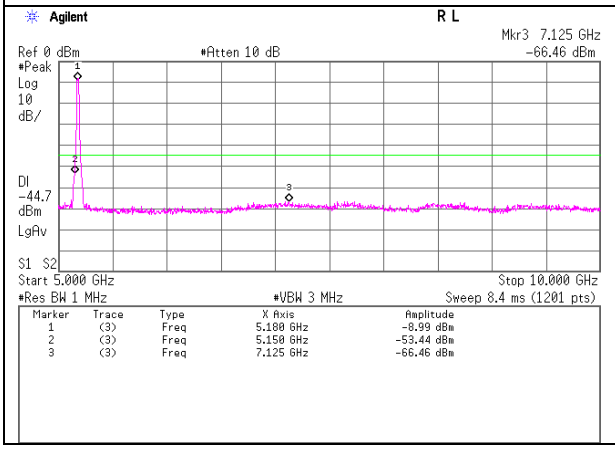
30MHz-1GHz



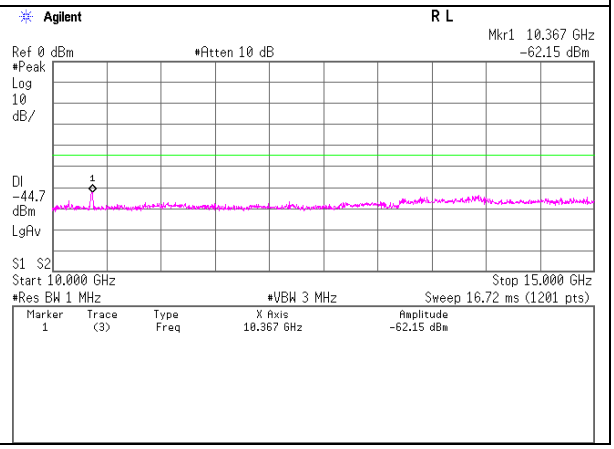
1GHz-5GHz



5GHz-10GHz



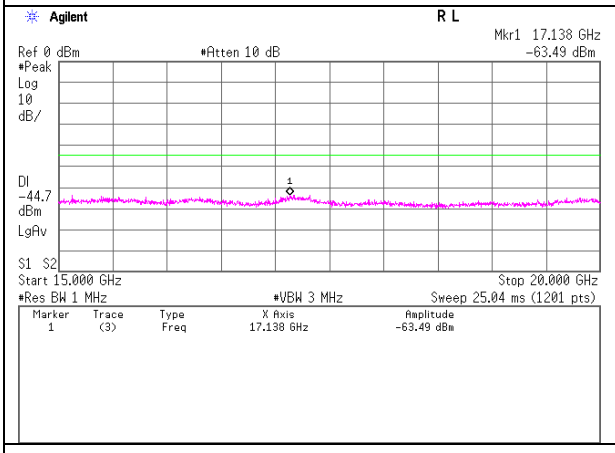
10GHz-15GHz



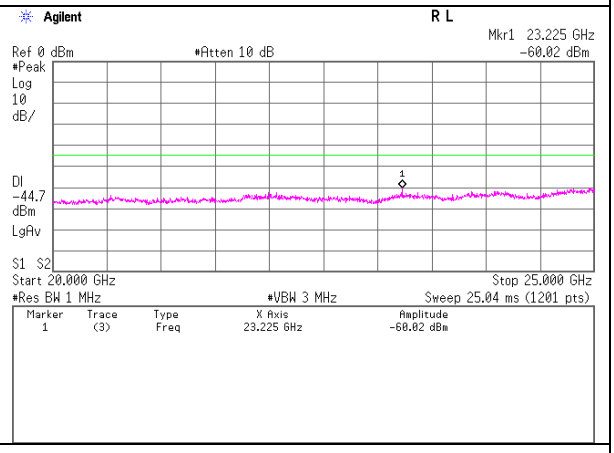
Conducted Spurious Emission

11a Tx 5180MHz Antenna A

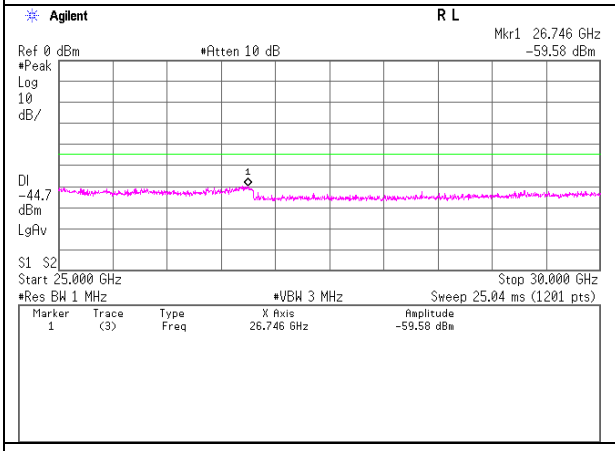
15GHz-20GHz



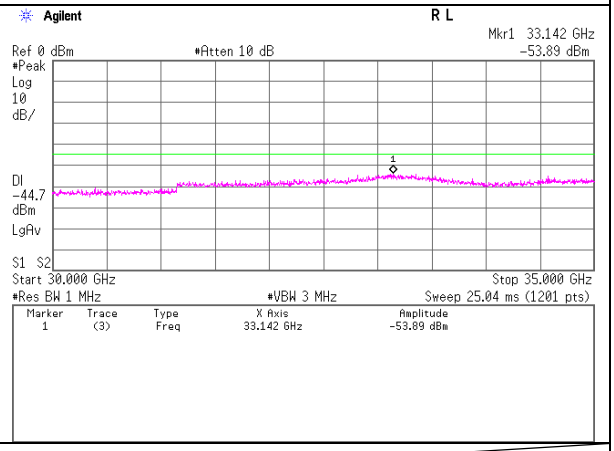
20GHz-25GHz



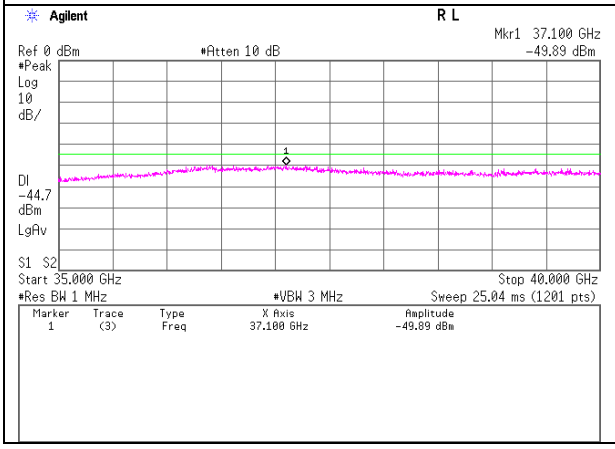
25GHz-30GHz



30GHz-35GHz



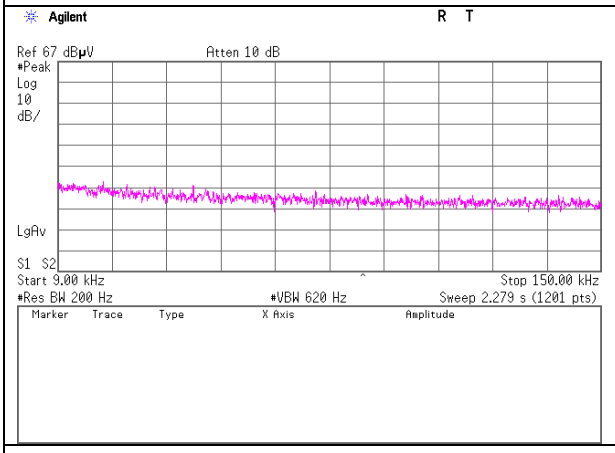
35GHz-40GHz



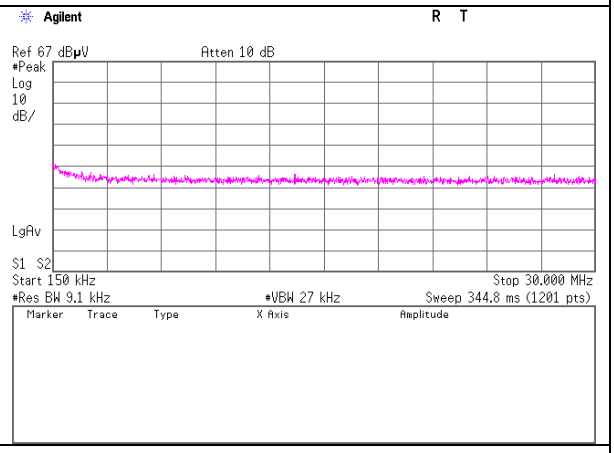
Conducted Spurious Emission

11a Tx 5220MHz Antenna A

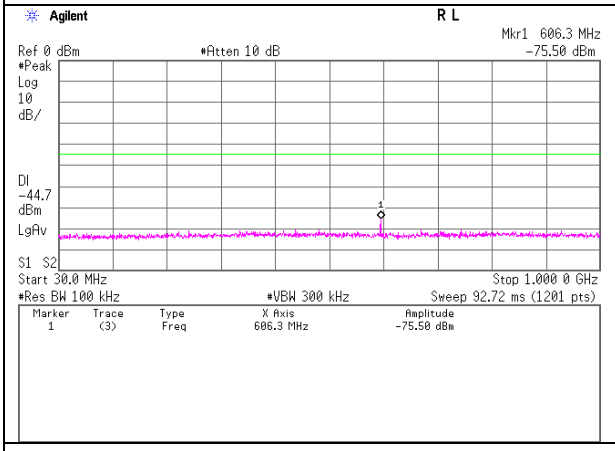
9kHz-150kHz



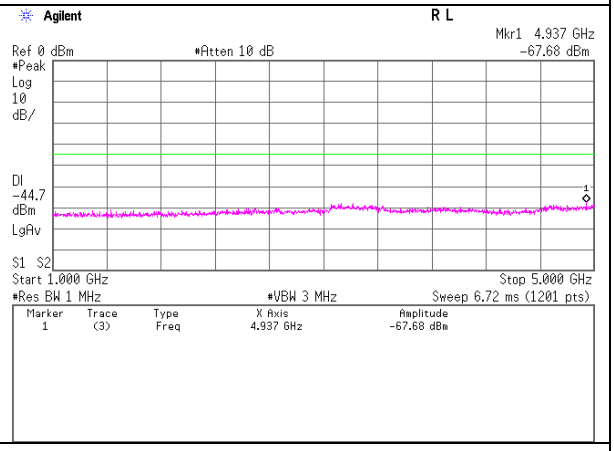
150kHz-30MHz



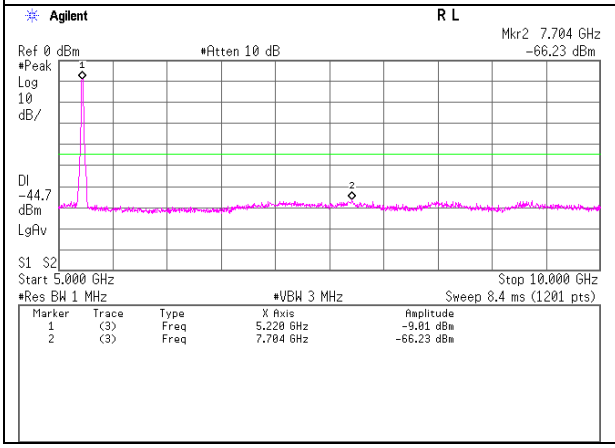
30MHz-1GHz



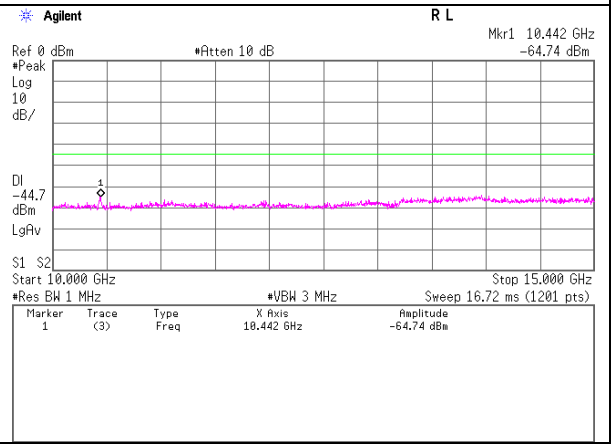
1GHz-5GHz



5GHz-10GHz



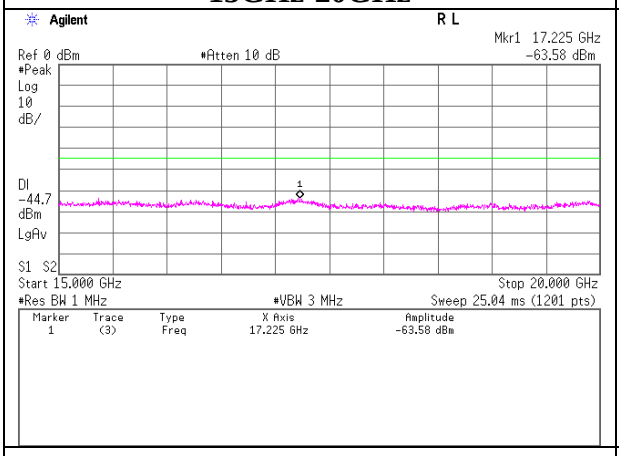
10GHz-15GHz



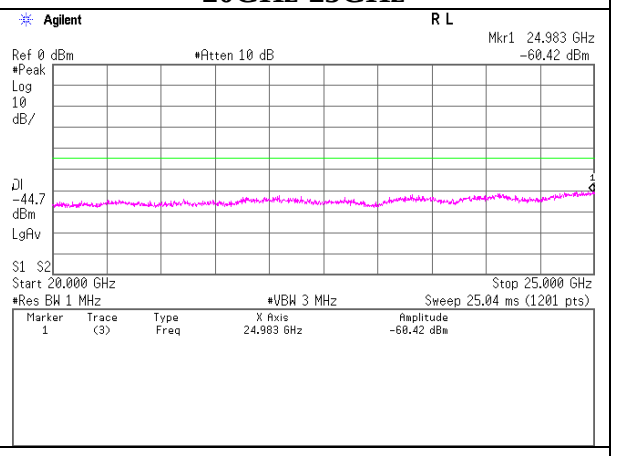
Conducted Spurious Emission

11a Tx 5220MHz Antenna A

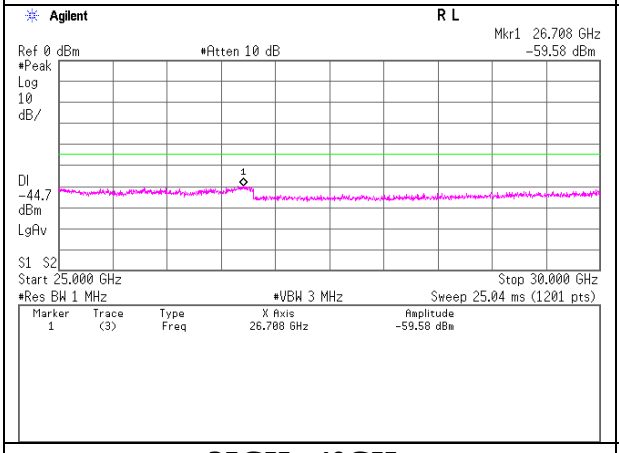
15GHz-20GHz



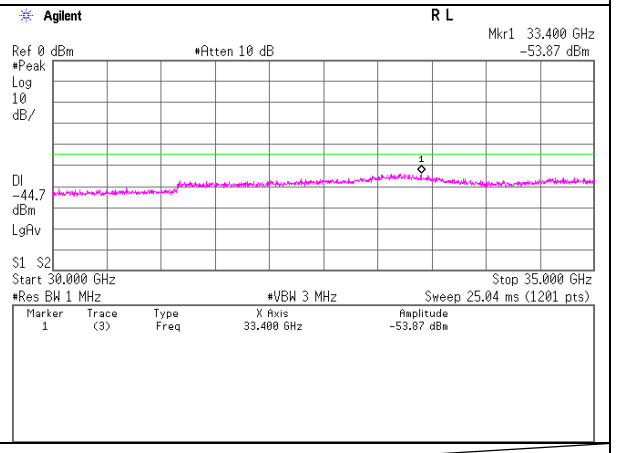
20GHz-25GHz



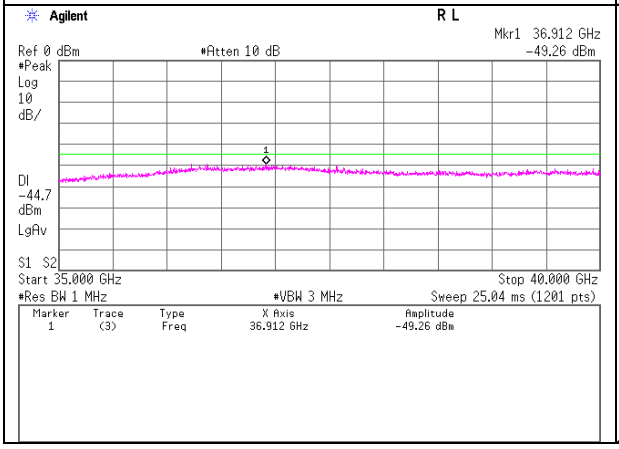
25GHz-30GHz



30GHz-35GHz



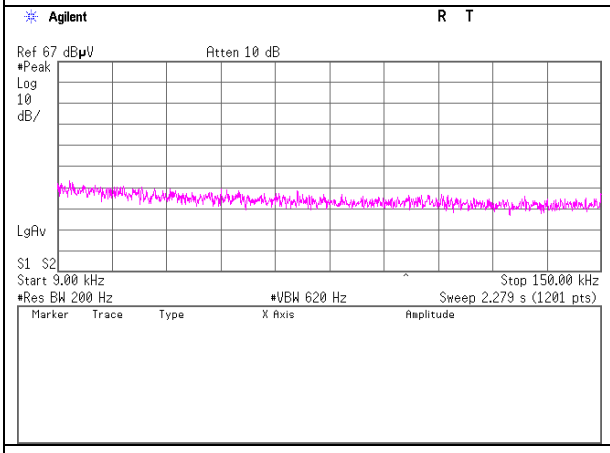
35GHz-40GHz



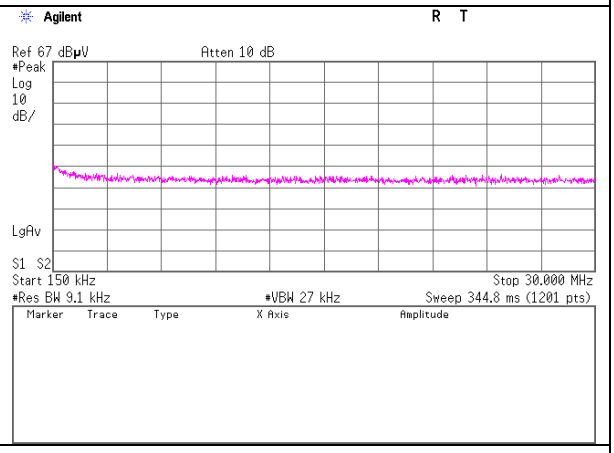
Conducted Spurious Emission

11a Tx 5240MHz Antenna A

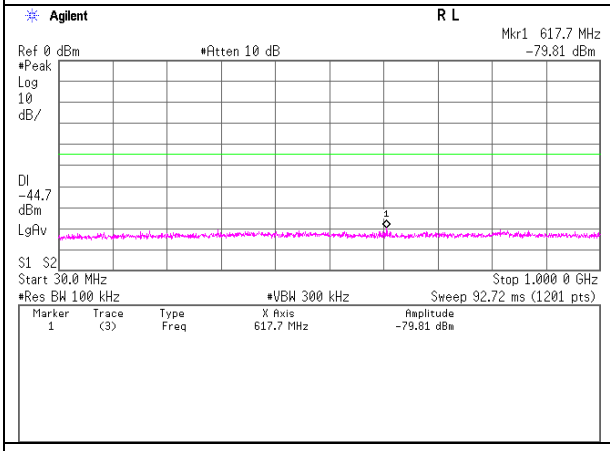
9kHz-150kHz



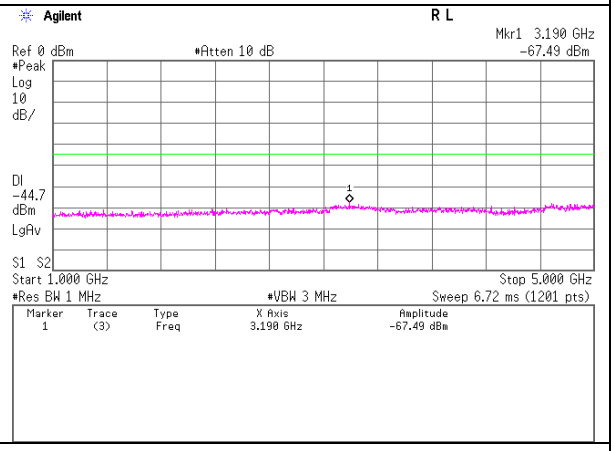
150kHz-30MHz



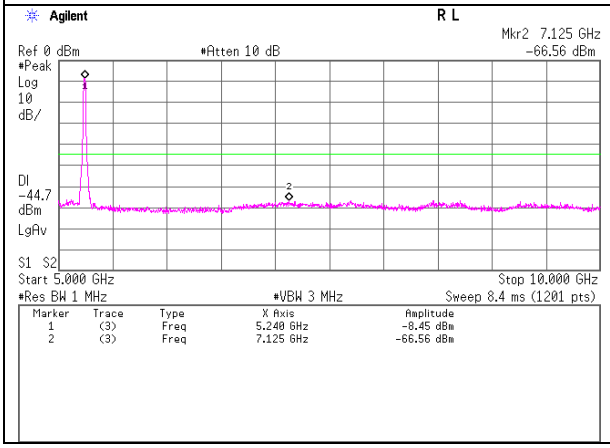
30MHz-1GHz



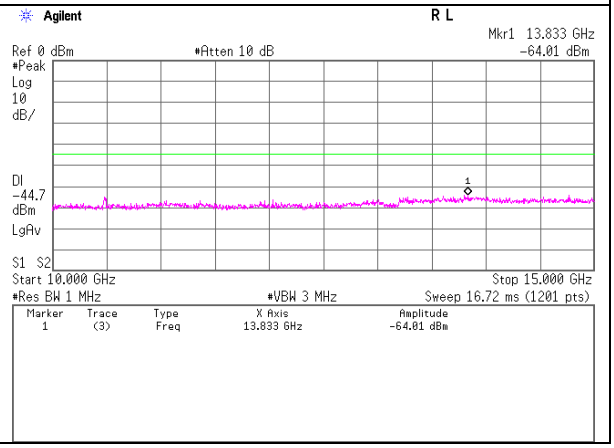
1GHz-5GHz



5GHz-10GHz



10GHz-15GHz



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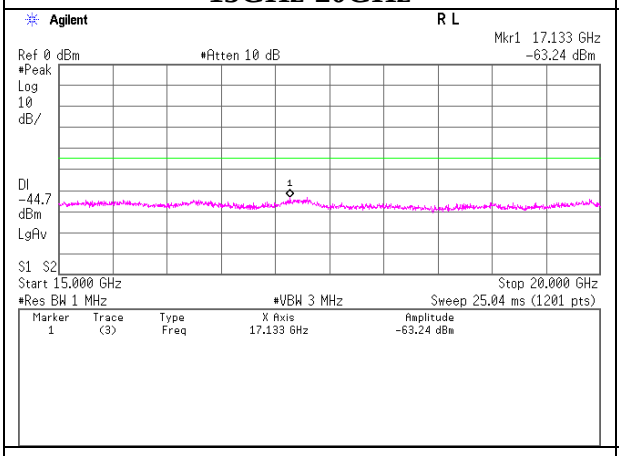
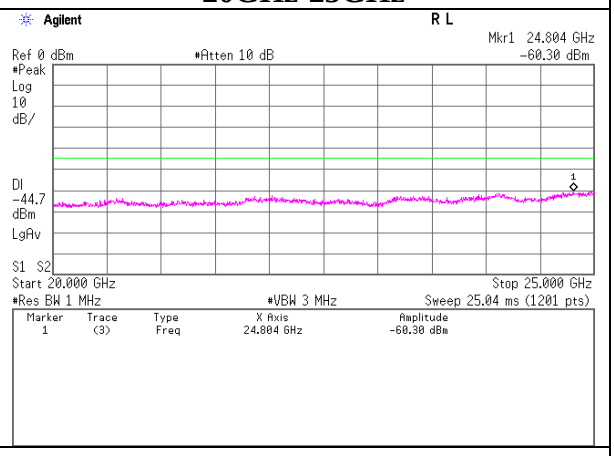
Conducted Spurious Emission

11a Tx 5240MHz Antenna A

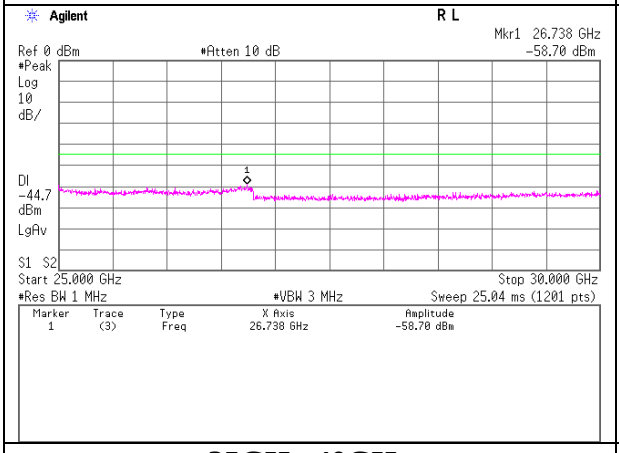
15GHz-20GHz



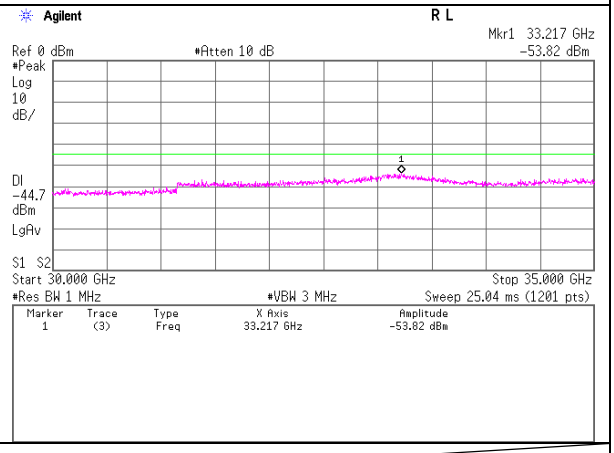
20GHz-25GHz



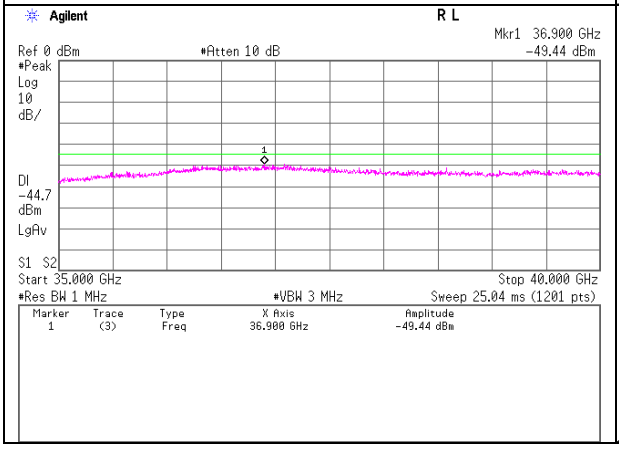
25GHz-30GHz



30GHz-35GHz



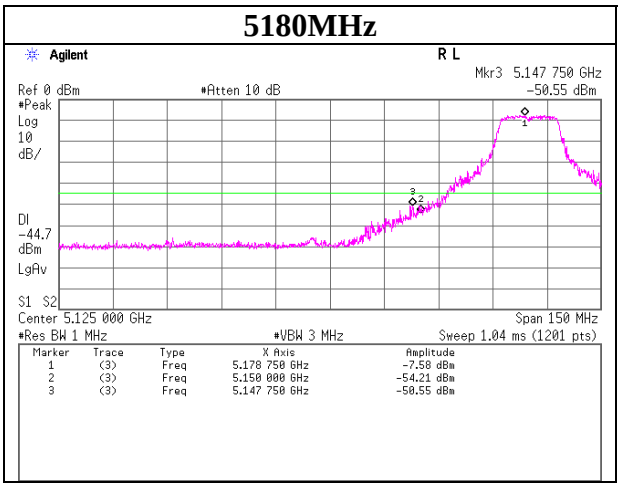
35GHz-40GHz



Conducted emission Band Edge compliance

11a Antenna A

5180MHz



Peak Excursion Ratio

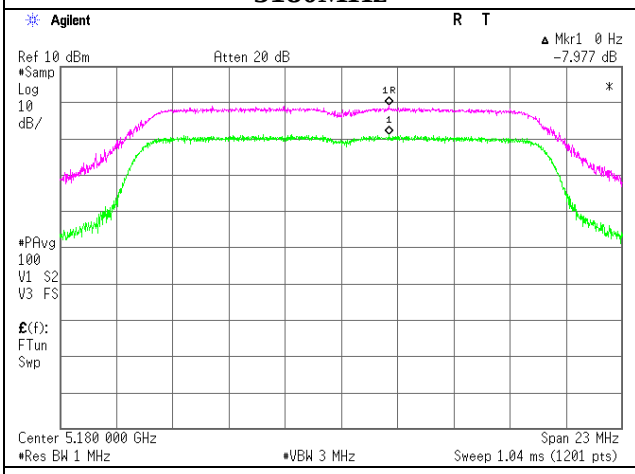
Test place	Head Office EMC Lab. No.11 Measurement room
Report No.	31BE0221-HO-06
Date	12/07/2010
Temperature/ Humidity	21deg.C/ 38%RH
Engineer	Satofumi Matsuyama
Mode	11a Tx

Antenna	Frequency [MHz]	Peak Power Excursion [dB]	Limit [dB]
A	5180	7.98	13.00
	5220	9.24	13.00
	5240	9.50	13.00

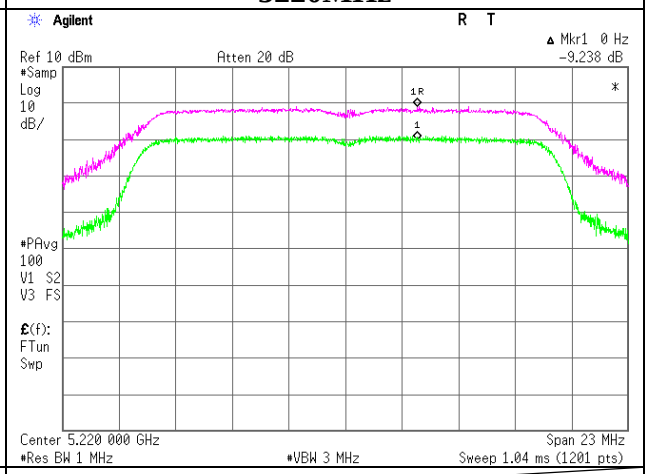
Peak Excursion Ratio

11a Antenna A

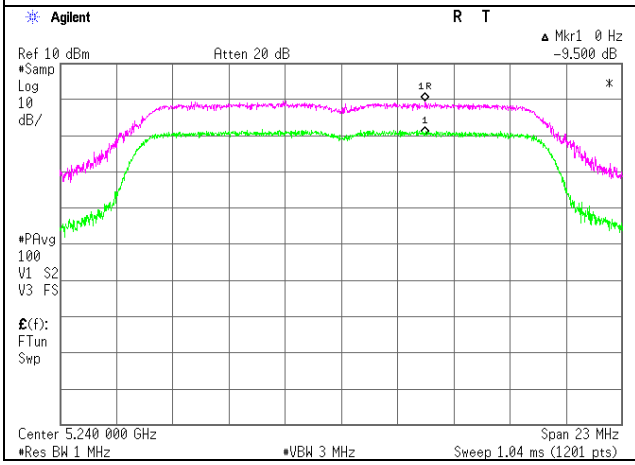
5180MHz



5220MHz



5240MHz



APPENDIX 3:Test instruments

EMI test equipment (1/2)

Control No.	Instrument	Manufacturer	Model No	Serial No	Test Item	Calibration Date * Interval(month)
MAEC-01	Semi Anechoic Chamber(NSA)	TDK	Semi Anechoic Chamber 10m	DA-06881	RE	2010/07/02 * 12
MOS-01	Digital Humidity Indicator	N.T	NT-1800	MOS01	RE	2011/02/23 * 12
MJM-01	Measure	KDS	ES19-55	-	RE	-
MHA-05	Horn Antenna 1-18GHz	Schwarzbeck	BBHA9120D	253	RE	2010/06/29 * 12
MPA-01	Pre Amplifier	Agilent	8449B	3008A01671	RE	2011/02/24 * 12
MAEC-02	Semi Anechoic Chamber(NSA)	TDK	Semi Anechoic Chamber 3m	DA-06902	RE	2010/09/01 * 12
MOS-22	Thermo-Hygrometer	Custom	CTH-201	0003	RE	2011/02/23 * 12
MJM-05	Measure	PROMART	SEN1955	-	RE	-
COTS-MEMI	EMI measurement program	TSJ	TEPTO-DV	-	RE/CE	-
MSA-09	Spectrum Analyzer	Advantest	R3273	95090115	RE	2010/11/18 * 12
MHA-06	Horn Antenna 1-18GHz	Schwarzbeck	BBHA9120D	254	RE	2011/01/16 * 12
MPA-10	Pre Amplifier	Agilent	8449B	3008A02142	RE	2010/09/30 * 12
MHA-02	Horn Antenna 18-26.5GHz	EMCO	3160-09	1265	RE	2011/01/16 * 12
MCC-18	Microwave Cable 1G-26.5GHz	Suhner	SUCOFLEX 104	148048-143(1m) / 292410(5m)	RE	2010/09/30 * 12
MCC-76	Microwave Cable 1G-26.5GHz	Suhner	SUCOFLEX104	278967/4	RE	2010/12/03 * 12
MHF-17	High Pass Filter 3.5-18.0GHz	TOKIMEC	TF323DCA	7001	RE	2010/09/21 * 12
MHF-21	High Pass Filter 7-20GHz	TOKIMEC	TF37NCCA	601	RE	2011/01/06 * 12
MSA-10	Spectrum Analyzer	Agilent	E4448A	MY46180655	RE	2011/02/15 * 12
MCC-55	Microwave Cable	Suhner	SUCOFLEX101	2874(1m) / 2877(5m)	RE	2011/03/03 * 12
MPA-03	Microwave System Power Amplifier	Agilent	83050A	3950M00205	RE	2010/06/11 * 12
MHA-16	Horn Antenna 15-40GHz	Schwarzbeck	BBHA9170	BBHA9170306	RE	2010/05/07 * 12

EMI test equipment (2/2)

Control No.	Instrument	Manufacturer	Model No	Serial No	Test Item	Calibration Date * Interval(month)
MSA-03	Spectrum Analyzer	Agilent	E4448A	MY44020357	AT	2010/11/30 * 12
MCC-115	Microwave Cable 1G-26.5GHz	Suhner	SUCOFLEX104	290211/4	AT	2010/08/05 * 12
MAT-23	Attenuator(10dB) 1-18GHz	Orient Microwave	BX10-0476-00	-	AT	2010/03/01 * 12
MAT-19	Attenuator(6dB)(above1GHz)	HIROSE ELECTRIC CO.,LTD.	AT-106	-	AT	2010/01/25 * 12
MOS-04	Digital Humidity Indicator	N.T	NT-1800	MOS04	AT	2010/02/09 * 12
MAEC-04	Semi Anechoic Chamber(NSA)	TDK	Semi Anechoic Chamber 3m	DA-10005	CE	2010/02/02 * 12
MOS-15	Thermo-Hygrometer	Custom	CTH-180	-	CE	2010/02/09 * 12
MJM-07	Measure	PROMART	SEN1955	-	CE	-
MSA-05	Spectrum Analyzer	Advantest	R3273	160400285	CE	2010/11/18 * 12
MTR-07	Test Receiver	Rohde & Schwarz	ESCI	100635	CE	2010/10/27 * 12
MLS-06	LISN(AMN)	Schwarzbeck	NSLK8127	8127363	CE(EUT)	2010/02/04 * 12
MLS-07	LISN(AMN)	Schwarzbeck	NSLK8127	8127364	CE(AE)	2010/02/05 * 12
MTA-31	Terminator	TME	CT-01	-	CE	2010/01/20 * 12
MAT-67	Attenuator(13dB)	JFW Industries, Inc.	50FP-013H2 N	-	CE	2010/02/04 * 12
MCC-113	Coaxial cable	Fujikura/Suhner/TSJ	5D-2W(10m)/SFM141(5m)/421-010(1m)/sucoform141-PE(1m)/RFM-E121(Switcher)	-/04178	CE	2010/07/21 * 12

The expiration date of the calibration is the end of the expired month.
All equipment is calibrated with traceable calibrations. Each calibration is traceable to the national or international standards.

As for some calibrations performed after the tested dates, those test equipment have been controlled by means of an unbroken chains of calibrations.

Test Item: CE: Conducted Emission
RE: Radiated Emission
AT: Antenna Terminal Conducted test