



FCC TEST REPORT

REPORT NO.: RF930615L08

MODEL NO.: WMP54GS

RECEIVED: June 02, 2004

TESTED: June 02 ~ June 16, 2004

APPLICANT: Cisco-Linksys, LLC

ADDRESS: 121 Theory Drive, Irvine, CA 92612, U.S.A.

ISSUED BY: Advance Data Technology Corporation

LAB LOCATION: No. 19, Hwa Ya 2nd Rd., Kueishan, Taoyuan,
Taiwan, R.O.C.

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1 CERTIFICATION

PRODUCT : Wireless-G PCI Adapter with SpeedBooster
BRAND NAME : Linksys
MODEL NO. : WMP54GS
APPLICANT : Cisco-Linksys, LLC
TESTED : June 02 ~ June 16, 2004
TEST ITEM : Engineering Sample
STANDARDS : FCC Part 15, Subpart C. (15.247)
ANSI C63.4-2001

The above equipment has been tested by **Advance Data Technology Corporation**, and found compliance with the requirement of the above standards. The test record, data evaluation & Equipment Under Test (EUT) configurations represented herein are true and accurate accounts of the measurements of the sample's EMC characteristics under the conditions specified in this report.

PREPARED BY: Windy Chou , **DATE:** June 22, 2004
Windy Chou

APPROVED BY: Cody Chang , **DATE:** June 22, 2004
Cody Chang /
Supervisor

2 SUMMARY OF TEST RESULTS

The EUT has been tested according to the following specifications:

APPLIED STANDARD: FCC Part 15, Subpart C			
Standard Section	Test Type and Limit	Result	REMARK
15.207	AC Power Conducted Emission	PASS	Meet the requirement of limit Minimum passing margin is -17.16dB at 0.236 MHz
15.247(a)(2)	Spectrum Bandwidth of a Direct Sequence Spread Spectrum System Limit: min. 500kHz	PASS	Meet the requirement of limit
15.247(b)	Maximum Peak Output Power Limit: max. 30dBm	PASS	Meet the requirement of limit
15.247(c)	Transmitter Radiated Emissions Limit: Table 15.209	PASS	Meet the requirement of limit Minimum passing margin is -1.29dB at 4924.00MHz
15.247(d)	Power Spectral Density Limit: max. 8dBm	PASS	Meet the requirement of limit
15.247(c)	Band Edge Measurement Limit: 20 dB less than the peak value of fundamental frequency	PASS	Meet the requirement of limit

NOTE: The information of measurement uncertainty is available upon the customer's request.

3 GENERAL INFORMATION

3.1 GENERAL DESCRIPTION OF EUT

PRODUCT	Wireless-G PCI Adapter with SpeedBooster
MODEL NO.	WMP54GS
POWER SUPPLY	3.3Vdc from host equipment
MODULATION TYPE	BPSK, QPSK, CCK, 16QAM, 64QAM
RADIO TECHNOLOGY	DSSS, OFDM
TRANSFER RATE	802.11b: 11/5.5/2/1Mbps 802.11g: 54/48/36/24/18/12/9/6Mbps
FREQUENCY RANGE	2412MHz ~ 2462MHz
NUMBER OF CHANNEL	11
OUTPUT POWER	14.85dBm
ANTENNA TYPE	Dipole antenna with 7dBi gain and 5dBi with extended case
DATA CABLE	NA
I/O PORTS	NA
ASSOCIATED DEVICES	NA

NOTE:

1. The EUT operates in the 2.4GHz frequency spectrum with throughput of up to 54Mbps.
2. The EUT complies with IEEE 802.11g draft standards and backwards compatible with IEEE 802.11b products.
3. The above EUT information was declared by manufacturer and for more detailed features description, please refer to the manufacturer's specifications or User's Manual.

3.2 DESCRIPTION OF TEST MODES

Eleven channels are provided to this EUT.

Channel	Frequency	Channel	Frequency
1	2412 MHz	7	2442 MHz
2	2417 MHz	8	2447 MHz
3	2422 MHz	9	2452 MHz
4	2427 MHz	10	2457 MHz
5	2432 MHz	11	2462 MHz
6	2437 MHz		

NOTE:

1. Below 1GHz, the channel 1, 6, and 11 were pre-tested in chamber. The channel 11, the worst case, was chosen for final test.
2. Above 1GHz, the channel 1, 6, and 11 were tested individually.
3. From our experience and technical viewpoint, we have chosen data rates 11Mbps for CCK technique and 6Mbps for OFDM technique, as the worst cases for the test among other data rates.
4. For radiated emission test, there are two test modes presented in the following section: The test mode A is for the antenna with 7dBi attached to EUT and test mode B is for the antenna separated from EUT (with antenna stand).
5. For conducted emission test, the test mode A and test mode B, were pre-tested in chamber. The test mode A, the worst case, was chosen for final test.
6. There are two test results presented in the following sections: The test result A is for CCK technique and the test result B is for OFDM technique.

3.3 GENERAL DESCRIPTION OF APPLIED STANDARDS

The EUT is a Wireless-G PCI Adapter with SpeedBooster. According to the specifications of the manufacturer, it must comply with the requirements of the following standards:

FCC Part 15, Subpart C. (15.247)
ANSI C63.4:2001

All test items have been performed and recorded as per the above standards.

NOTE: The EUT is also considered as a kind of computer peripheral, because the connection to computer is necessary for typical use. It has been verified to comply with the requirements of FCC Part 15, Subpart B, Class B (DoC). The test report has been issued separately.



3.4 DESCRIPTION OF SUPPORT UNITS

The EUT has been tested as an independent unit together with other necessary accessories or support units. The following support units or accessories were used to form a representative test configuration during the tests.

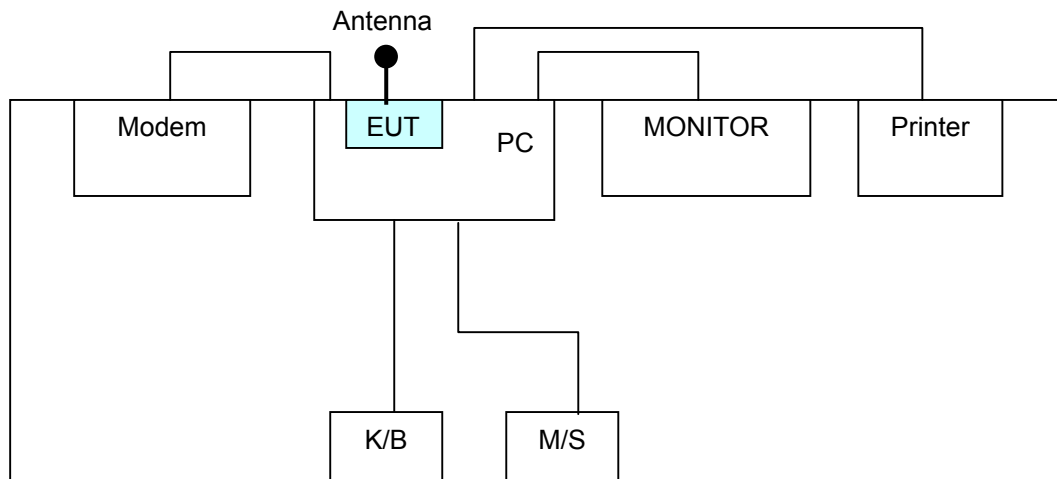
NO.	PRODUCT	BRAND	MODEL NO.	SERIAL NO.	FCC ID
1	PC	COMPAQ	D220M	SGH3330B9G	FCC DoC Approved
2	MONITOR	ADI	CM100	240058T00100067	FCC DoC Approved
3	KEYBOARD	DELL	SK-8110	MY-05N456-71619-3C1-1802	FCC DoC Approved
4	MOUSE	HP	M-S69	N/A	INZ211443
5	PRINTER	EPSON	LQ-300+	DCGY054146	FCC DoC Approved
6	MODEM	ACEEX	1414V/3	0401008260	IFAXDM1414

NO.	SIGNAL CABLE DESCRIPTION OF THE ABOVE SUPPORT UNITS
1	NA
2	1.8m shielded cable without core
3	2.0m shielded cable without core
4	1.8m shielded cable without core
5	1.2m shielded cable without core
6	1.2m shielded cable without core

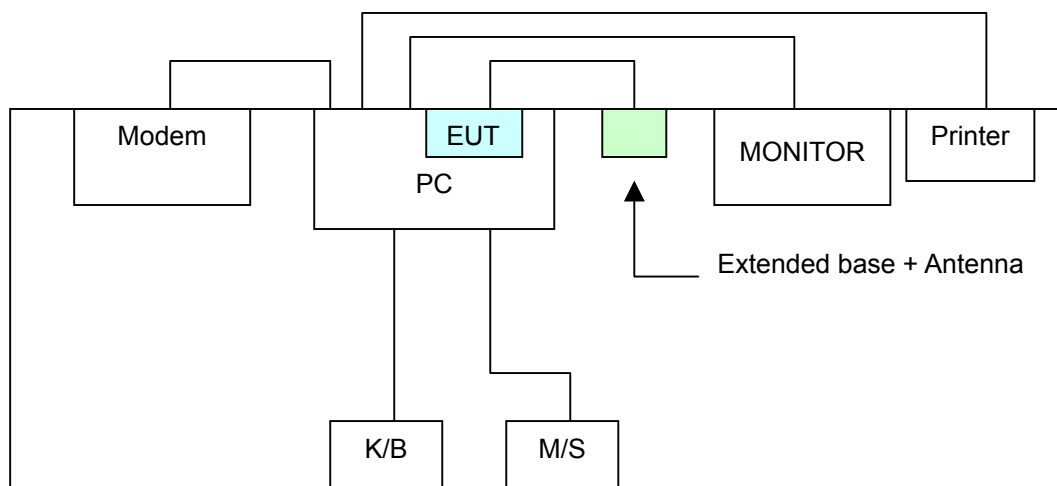
NOTE: All power cords of the above support units are non shielded (1.8m).

3.5 CONFIGURATION OF SYSTEM UNDER TEST

Test mode A



Test mode B



4 TEST TYPES AND RESULTS

4.1 CONDUCTED EMISSION MEASUREMENT

4.1.1 LIMITS OF CONDUCTED EMISSION MEASUREMENT

FREQUENCY OF EMISSION (MHz)	CONDUCTED LIMIT (dB μ V)	
	Quasi-peak	Average
0.15-0.5	66 to 56	56 to 46
0.5-5	56	46
5-30	60	50

- NOTE:**
1. The lower limit shall apply at the transition frequencies.
 2. The limit decreases in line with the logarithm of the frequency in the range of 0.15 to 0.50 MHz.
 3. All emanations from a class A/B digital device or system, including any network of conductors and apparatus connected thereto, shall not exceed the level of field strengths specified above.

4.1.2 TEST INSTRUMENTS

DESCRIPTION & MANUFACTURER	MODEL NO.	SERIAL NO.	CALIBRATED UNTIL
Test Receiver ROHDE & SCHWARZ	ESCS30	100288	Dec. 11, 2004
RF signal cable Woken	5D-FB	Cable-HyC02-01	Mar. 07, 2005
LISN ROHDE & SCHWARZ	ESH2-Z5	100100	Mar. 10, 2005
LISN ROHDE & SCHWARZ	ESH3-Z5	100311	Mar. 04, 2005
Software ADT	ADT_Cond_V3	NA	NA

- NOTE:**
1. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.
 2. The test was performed in HwaYa Shielded Room 2.
 3. The VCCI Site Registration No. is C-2047.



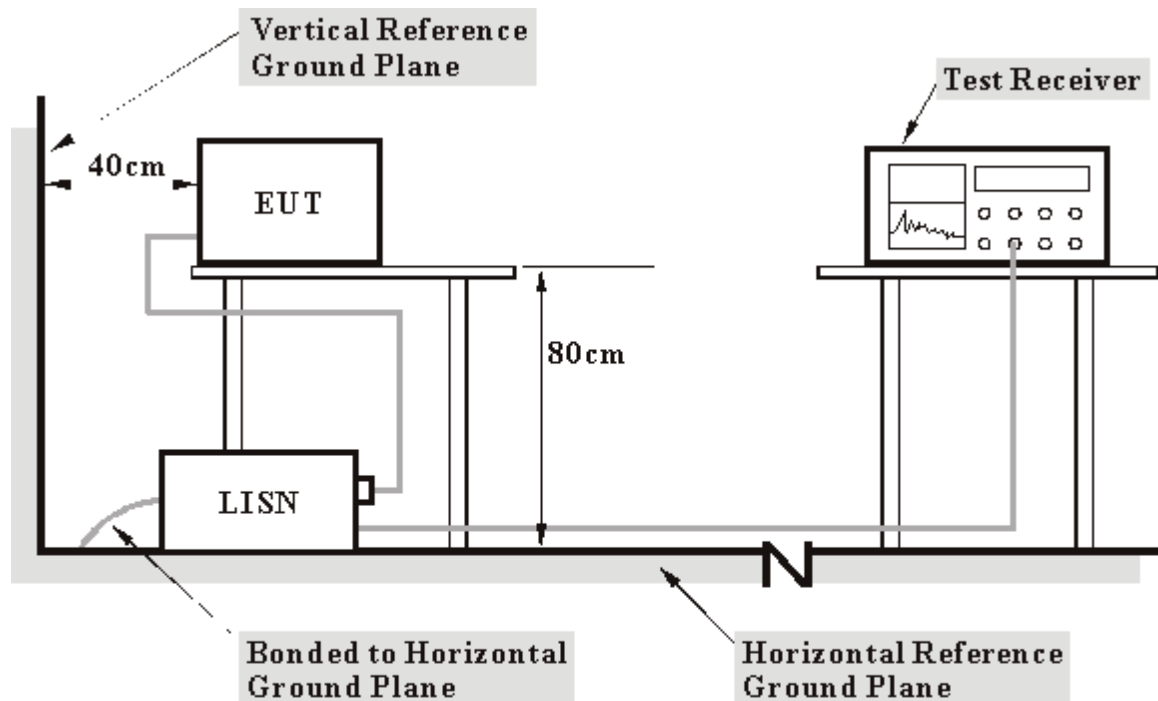
4.1.3 TEST PROCEDURES

- a. The EUT was placed 0.4 meters from the conducting wall of the shielded room with EUT being connected to the power mains through a line impedance stabilization network (LISN). Other support units were connected to the power mains through another LISN. The two LISNs provide 50 ohm/ 50uH of coupling impedance for the measuring instrument.
- b. Both lines of the power mains connected to the EUT were checked for maximum conducted interference.
- c. The frequency range from 150 kHz to 30 MHz was searched. Emission levels (Limit -20dB) was not recorded.

4.1.4 DEVIATION FROM TEST STANDARD

No deviation

4.1.5 TEST SETUP



- Note:** 1. Support units were connected to second LISN.
2. Both of LISNs (AMN) 80 cm from EUT and at the least 80 cm from other units and other metal planes support units.

For the actual test configuration, please refer to the related item – Photographs of the Test Configuration.



4.1.6 EUT OPERATING CONDITIONS

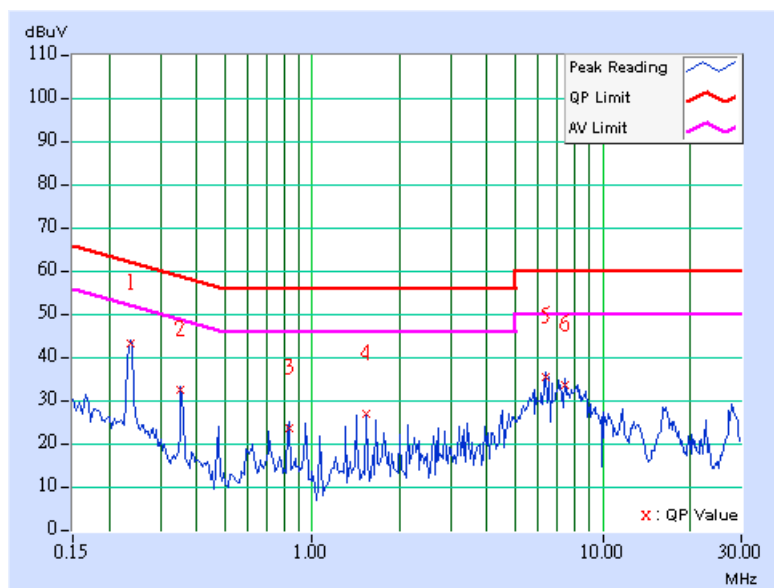
- a. Connected the EUT to a computer system placed on a testing table.
- b. The computer system ran a test program (provided by manufacturer) to enable EUT under transmission/receiving condition continuously at specific channel frequency.
- c. The computer system sent "H" messages to its screen.
- d. The computer system sent "H" messages to modem.
- e. The computer system sent "H" messages to printer, and the printer printed them on paper.
- f. Steps c ~ e were repeated.

4.1.7 TEST RESULTS

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	1	6dB BANDWIDTH	9 kHz
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	PHASE	Line (L)
ENVIRONMENTAL CONDITIONS	24 deg. C, 64% RH, 991 hPa	TESTED BY: Leo Hung	

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value		Emission Level		Limit		Margin	
			[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.236	0.10	43.03	-	43.13	-	62.24	52.24	-19.11	-
2	0.353	0.11	32.06	-	32.17	-	58.89	48.89	-26.72	-
3	0.830	0.21	23.22	-	23.43	-	56.00	46.00	-32.57	-
4	1.539	0.26	26.68	-	26.94	-	56.00	46.00	-29.06	-
5	6.340	0.41	34.96	-	35.37	-	60.00	50.00	-24.63	-
6	7.461	0.45	33.18	-	33.63	-	60.00	50.00	-26.37	-

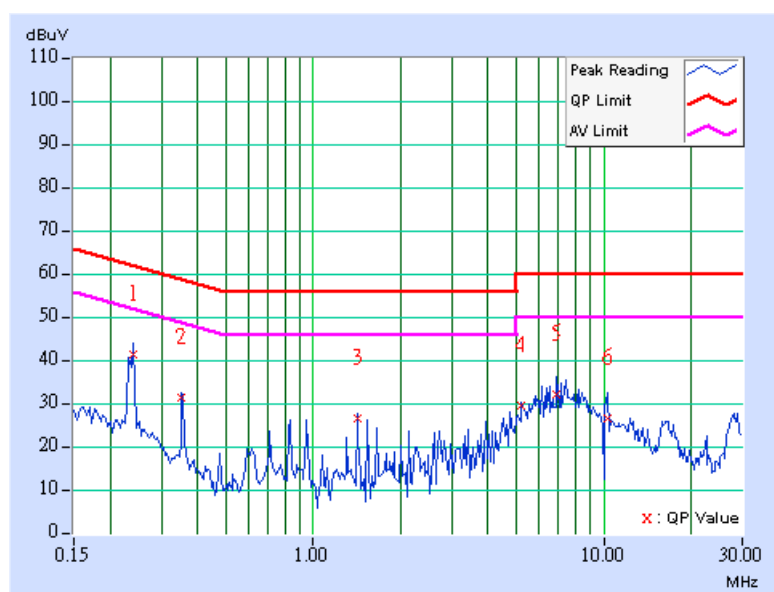
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
 2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
 3. The emission levels of other frequencies were very low against the limit.
 4. Margin value = Emission level - Limit value
 5. Correction factor = Insertion loss + Cable loss
 6. Emission Level = Correction Factor + Reading Value.



EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	1	6dB BANDWIDTH	9 kHz
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	PHASE	Neutral (N)
ENVIRONMENTAL CONDITIONS	24 deg. C, 64% RH, 991 hPa	TESTED BY: Leo Hung	

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value		Emission Level		Limit		Margin	
			[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.240	0.10	40.90	-	41.00	-	62.10	52.10	-21.10	-
2	0.353	0.11	30.99	-	31.10	-	58.89	48.89	-27.79	-
3	1.422	0.24	26.04	-	26.28	-	56.00	46.00	-29.72	-
4	5.223	0.35	29.17	-	29.52	-	60.00	50.00	-30.48	-
5	6.902	0.42	31.91	-	32.33	-	60.00	50.00	-27.67	-
6	10.301	0.49	26.09	-	26.58	-	60.00	50.00	-33.42	-

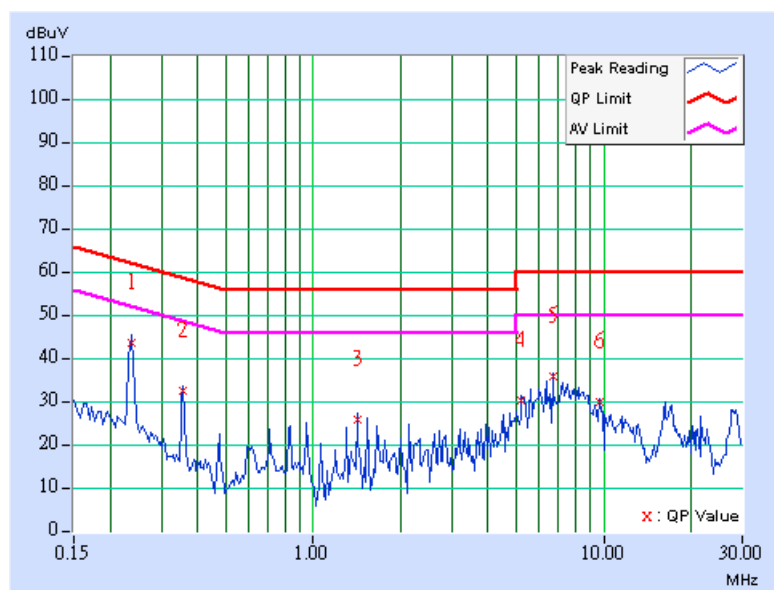
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
 2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
 3. The emission levels of other frequencies were very low against the limit.
 4. Margin value = Emission level - Limit value
 5. Correction factor = Insertion loss + Cable loss
 6. Emission Level = Correction Factor + Reading Value.



EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	6	6dB BANDWIDTH	9 kHz
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	PHASE	Line (L)
ENVIRONMENTAL CONDITIONS	24 deg. C, 64% RH, 991 hPa	TESTED BY: Leo Hung	

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value		Emission Level		Limit		Margin	
			[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.236	0.10	43.01	-	43.11	-	62.24	52.24	-19.13	-
2	0.357	0.11	32.25	-	32.36	-	58.80	48.80	-26.44	-
3	1.422	0.25	25.50	-	25.75	-	56.00	46.00	-30.25	-
4	5.223	0.37	29.72	-	30.09	-	60.00	50.00	-29.91	-
5	6.715	0.43	35.49	-	35.92	-	60.00	50.00	-24.08	-
6	9.707	0.52	29.33	-	29.85	-	60.00	50.00	-30.15	-

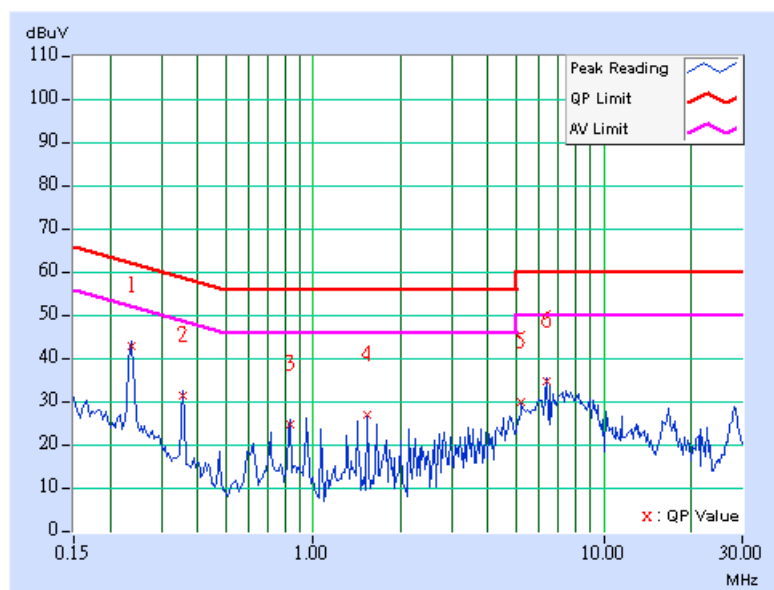
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
 2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
 3. The emission levels of other frequencies were very low against the limit.
 4. Margin value = Emission level - Limit value
 5. Correction factor = Insertion loss + Cable loss
 6. Emission Level = Correction Factor + Reading Value.



EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	6	6dB BANDWIDTH	9 kHz
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	PHASE	Neutral (N)
ENVIRONMENTAL CONDITIONS	24 deg. C, 64% RH, 991 hPa	TESTED BY: Leo Hung	

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value		Emission Level		Limit		Margin	
			[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.236	0.10	42.61	-	42.71	-	62.24	52.24	-19.53	-
2	0.357	0.11	31.26	-	31.37	-	58.80	48.80	-27.43	-
3	0.830	0.20	24.29	-	24.49	-	56.00	46.00	-31.51	-
4	1.539	0.25	26.46	-	26.71	-	56.00	46.00	-29.29	-
5	5.223	0.35	29.57	-	29.92	-	60.00	50.00	-30.08	-
6	6.340	0.40	34.44	-	34.84	-	60.00	50.00	-25.16	-

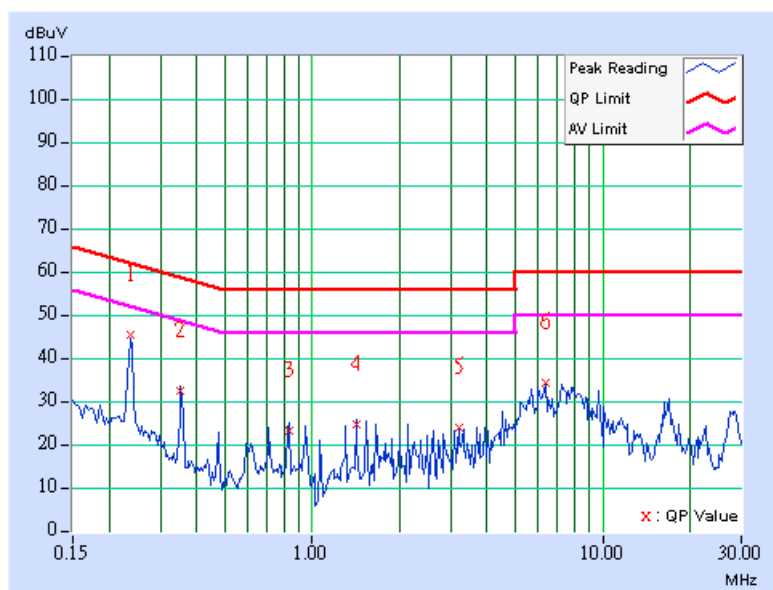
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
 2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
 3. The emission levels of other frequencies were very low against the limit.
 4. Margin value = Emission level - Limit value
 5. Correction factor = Insertion loss + Cable loss
 6. Emission Level = Correction Factor + Reading Value.



EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	11	6dB BANDWIDTH	9 kHz
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	PHASE	Line (L)
ENVIRONMENTAL CONDITIONS	24 deg. C, 64% RH, 991 hPa	TESTED BY: Leo Hung	

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value		Emission Level		Limit		Margin	
			[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.236	0.10	44.98	-	45.08	-	62.24	52.24	-17.16	-
2	0.353	0.11	32.10	-	32.21	-	58.89	48.89	-26.68	-
3	0.830	0.21	23.10	-	23.31	-	56.00	46.00	-32.69	-
4	1.418	0.25	24.58	-	24.83	-	56.00	46.00	-31.17	-
5	3.195	0.29	23.50	-	23.79	-	56.00	46.00	-32.21	-
6	6.344	0.41	34.06	-	34.47	-	60.00	50.00	-25.53	-

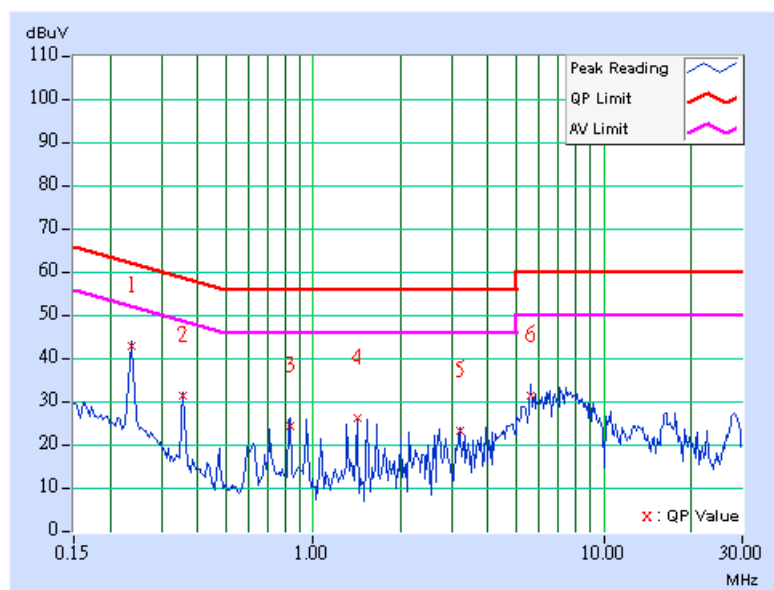
REMARKS: 1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
 2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
 3. The emission levels of other frequencies were very low against the limit.
 4. Margin value = Emission level - Limit value
 5. Correction factor = Insertion loss + Cable loss
 6. Emission Level = Correction Factor + Reading Value.



EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	11	6dB BANDWIDTH	9 kHz
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	PHASE	Netural (N)
ENVIRONMENTAL CONDITIONS	24 deg. C, 64% RH, 991 hPa	TESTED BY: Leo Hung	

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value		Emission Level		Limit		Margin	
			[dB (uV)]		[dB (uV)]		[dB (uV)]		(dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.236	0.10	42.63	-	42.73	-	62.24	52.24	-19.51	-
2	0.357	0.11	30.98	-	31.09	-	58.80	48.80	-27.71	-
3	0.830	0.20	24.23	-	24.43	-	56.00	46.00	-31.57	-
4	1.422	0.24	26.07	-	26.31	-	56.00	46.00	-29.69	-
5	3.195	0.28	23.05	-	23.33	-	56.00	46.00	-32.67	-
6	5.598	0.37	30.97	-	31.34	-	60.00	50.00	-28.66	-

- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
 2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
 3. The emission levels of other frequencies were very low against the limit.
 4. Margin value = Emission level - Limit value
 5. Correction factor = Insertion loss + Cable loss
 6. Emission Level = Correction Factor + Reading Value.





4.2 RADIATED EMISSION MEASUREMENT

4.2.1 LIMITS OF RADIATED EMISSION MEASUREMENT

Emissions radiated outside of the specified bands, shall be according to the general radiated limits in 15.209 as following:

Frequencies (MHz)	Field strength (microvolts/meter)	Measurement distance (meters)
0.009-0.490	2400/F(kHz)	300
0.490-1.705	24000/F(kHz)	30
1.705-30.0	30	30
30-88	100	3
88-216	150	3
216-960	200	3
Above 960	500	3

NOTE:

1. The lower limit shall apply at the transition frequencies.
2. Emission level (dBuV/m) = 20 log Emission level (uV/m).
3. As shown in 15.35(b), for frequencies above 1000MHz, the field strength limits are based on average detector, however, the peak field strength of any emission shall not exceed the maximum permitted average limits, specified above by more than 20dB under any condition of modulation.

4.2.2 TEST INSTRUMENTS

DESCRIPTION & MANUFACTURER	MODEL NO.	SERIAL NO.	CALIBRATED UNTIL
Test Receiver ROHDE & SCHWARZ	ESI7	100033	Jun, 08, 2005
Spectrum Analyzer ROHDE & SCHWARZ	FSP40	100040	Dec. 15, 2004
BILOG Antenna SCHWARZBECK	VULB9168	9168-153	Feb. 03, 2005
HORN Antenna SCHWARZBECK	9120D	9120D-408	Feb. 03, 2005
HORN Antenna SCHWARZBECK	BBHA 9170	BBHA 9170243	Feb. 23, 2005
Preamplifier Agilent	8447D	2944A10633	Jan. 15, 2005
Preamplifier Agilent	8449B	3008A01964	Jan. 27, 2005
RF signal cable HUBER+SUHNNER	SUCOFLEX 104	218183/4	Mar. 05, 2005
RF signal cable HUBER+SUHNNER	SUCOFLEX 104	218195/4	Mar. 05, 2005
Software ADT.	ADT_Radiated_V5.14	NA	NA
Antenna Tower inn-co GmbH	MA 4000	013303	NA
Antenna Tower Controller inn-co GmbH	CO2000	017303	NA
Turn Table ADT.	TT100.	TT93021703	NA
Turn Table Controller ADT.	SC100.	SC93021703	NA

- NOTE:**
1. The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.
 2. The test was performed in HwaYa Chamber 2.
 3. The horn antenna and HP preamplifier (model: 8449B) are used only for the measurement of emission frequency above 1GHz if tested.
 4. The IC Site Registration No. is IC4924-3.



4.2.3 TEST PROCEDURES

- a. The EUT was placed on the top of a rotating table 0.8 meters above the ground at a 3 meter semi-anechoic chamber. The table was rotated 360 degrees to determine the position of the highest radiation.
- b. The EUT was set 3 meters away from the interference-receiving antenna, which was mounted on the top of a variable-height antenna tower.
- c. The antenna is a broadband antenna, and its height is varied from one meter to four meters above the ground to determine the maximum value of the field strength. Both horizontal and vertical polarizations of the antenna are set to make the measurement.
- d. For each suspected emission, the EUT was arranged to its worst case and then the antenna was tuned to heights from 1 meter to 4 meters and the rotatable table was turned from 0 degrees to 360 degrees to find the maximum reading.
- e. The test-receiver system was set to Peak Detect Function and Specified Bandwidth with Maximum Hold Mode.
- f. If the emission level of the EUT in peak mode was 10 dB lower than the limit specified, then testing could be stopped and the peak values of the EUT would be reported. Otherwise the emissions that did not have 10 dB margin would be re-tested one by one using peak, quasi-peak or average method as specified and then reported in a data sheet.

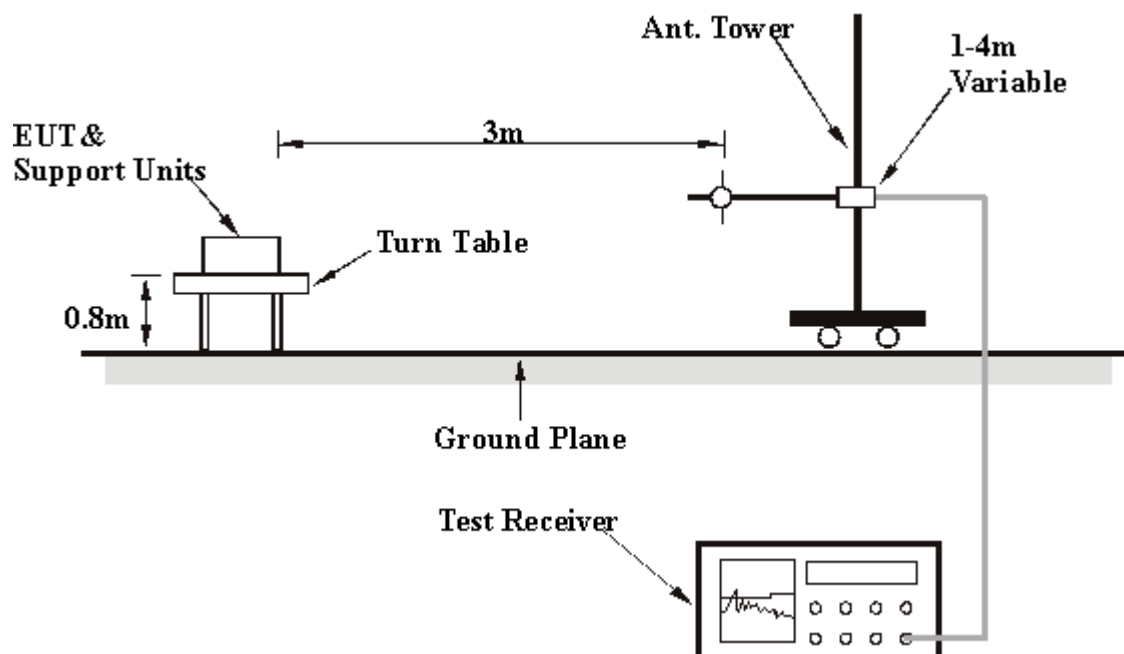
NOTE:

1. The resolution bandwidth and video bandwidth of test receiver/spectrum analyzer is 120kHz for Peak detection (PK) and Quasi-peak detection (QP) at frequency below 1GHz.
2. The resolution bandwidth and video bandwidth of test receiver/spectrum analyzer is 1 MHz for Peak detection at frequency above 1GHz.
3. The resolution bandwidth of test receiver/spectrum analyzer is 1 MHz and the video bandwidth is 10 Hz for Average detection (AV) at frequency above 1GHz.

4.2.4 DEVIATION FROM TEST STANDARD

No deviation

4.2.5 TEST SETUP



For the actual test configuration, please refer to the related item – Photographs of the Test Configuration.

4.2.6 EUT OPERATING CONDITIONS

Same as 4.1.6

4.2.7 TEST RESULTS

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	11	TEST MODE	A
INPUT POWER (SYSTEM)	120 Vac, 60Hz	FREQUENCY RANGE	Below 1000 MHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 65% RH, 991 hPa	DETECTOR FUNCTION	Quasi-Peak
TESTED BY: Match Tsui			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	35.83	32.93 QP	40.00	-7.07	1.75 H	169	17.80	15.12
2	74.71	25.83 QP	40.00	-14.17	1.25 H	247	14.02	11.81
3	142.75	28.18 QP	43.50	-15.32	1.75 H	61	13.98	14.20
4	214.67	31.65 QP	43.50	-11.85	1.25 H	280	19.83	11.82
5	259.38	33.16 QP	46.00	-12.84	1.00 H	259	19.58	13.58
6	549.02	29.87 QP	46.00	-16.13	1.25 H	118	10.08	19.79
7	564.57	29.84 QP	46.00	-16.16	1.25 H	118	9.61	20.23
8	813.39	34.21 QP	46.00	-11.79	1.75 H	202	10.31	23.90
9	848.38	30.77 QP	46.00	-15.23	1.50 H	58	6.54	24.23
10	891.14	30.70 QP	46.00	-15.30	1.75 H	358	5.64	25.06

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	31.94	30.85 QP	40.00	-9.15	1.25 V	136	16.35	14.50
2	70.82	32.46 QP	40.00	-7.54	1.00 V	58	19.69	12.77
3	99.98	32.33 QP	43.50	-11.17	1.25 V	25	21.19	11.14
4	226.33	30.90 QP	46.00	-15.10	1.00 V	286	18.53	12.37
5	253.55	30.05 QP	46.00	-15.95	1.50 V	160	16.57	13.48
6	321.58	31.38 QP	46.00	-14.62	1.50 V	298	16.12	15.26
7	339.08	31.87 QP	46.00	-14.13	1.25 V	310	16.24	15.63
8	813.39	41.55 QP	46.00	-4.45	1.50 V	346	17.65	23.90
9	848.38	40.24 QP	46.00	-5.76	1.25 V	334	16.00	24.23
10	881.42	36.58 QP	46.00	-9.42	1.25 V	337	11.71	24.87
11	916.41	40.44 QP	46.00	-5.56	1.25 V	343	15.01	25.43
12	924.19	37.65 QP	46.00	-8.35	1.25 V	349	12.13	25.52

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
 2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
 3. The other emission levels were very low against the limit.
 4. Margin value = Emission level – Limit value.

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	11	TEST MODE	B
INPUT POWER (SYSTEM)	120 Vac, 60Hz	FREQUENCY RANGE	Below 1000 MHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 65% RH, 991 hPa	DETECTOR FUNCTION	Quasi-Peak
TESTED BY: Match Tsui			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	31.94	27.91 QP	40.00	-12.09	1.00 H	160	13.41	14.50
2	94.15	31.13 QP	43.50	-12.37	2.00 H	286	20.34	10.78
3	111.64	34.68 QP	43.50	-8.82	1.50 H	235	22.54	12.14
4	146.63	33.64 QP	43.50	-9.86	2.00 H	247	19.32	14.32
5	214.67	32.86 QP	43.50	-10.64	1.25 H	301	21.04	11.82
6	226.33	34.88 QP	46.00	-11.12	1.25 H	334	22.52	12.37
7	300.20	29.34 QP	46.00	-16.66	1.75 H	115	14.53	14.81
8	368.24	34.74 QP	46.00	-11.26	1.00 H	76	18.48	16.26
9	665.65	31.74 QP	46.00	-14.26	1.25 H	199	9.62	22.12
10	745.35	31.25 QP	46.00	-14.75	1.75 H	298	7.68	23.57
11	799.78	32.36 QP	46.00	-13.64	1.00 H	196	8.59	23.77
12	813.39	31.76 QP	46.00	-14.24	2.00 H	304	7.86	23.90

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	31.94	32.16 QP	40.00	-7.84	1.50 V	238	17.66	14.50
2	66.93	34.17 QP	40.00	-5.83	1.75 V	67	20.90	13.27
3	156.35	31.62 QP	43.50	-11.88	1.00 V	1	17.00	14.62
4	222.44	27.36 QP	46.00	-18.64	1.50 V	343	15.25	12.11
5	271.04	27.59 QP	46.00	-18.41	1.75 V	277	13.49	14.10
6	339.08	30.97 QP	46.00	-15.03	1.25 V	331	15.34	15.63
7	368.24	32.05 QP	46.00	-13.95	1.00 V	220	15.79	16.26
8	630.66	31.71 QP	46.00	-14.29	1.50 V	112	10.04	21.67
9	813.39	41.64 QP	46.00	-4.36	1.50 V	343	17.74	23.90
10	828.94	38.38 QP	46.00	-7.62	1.50 V	349	14.34	24.05
11	848.38	40.30 QP	46.00	-5.70	1.25 V	337	16.07	24.23
12	881.42	36.37 QP	46.00	-9.63	1.25 V	331	11.49	24.87
13	891.14	38.21 QP	46.00	-7.79	1.25 V	328	13.15	25.06
14	916.41	39.54 QP	46.00	-6.46	1.25 V	328	14.11	25.43

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.



4.2.8 TEST RESULTS (A)

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	1	TEST MODE	A
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	FREQUENCY RANGE	1~25 GHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 64% RH, 991 hPa	DETECTOR FUNCTION	Peak (PK) Average (AV)
TESTED BY: Match Tsui			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	2390.00	43.97 PK	74.00	-30.03	1.33 H	228	12.21	31.76
1	2390.00	36.25 AV	54.00	-17.75	1.33 H	228	4.49	31.76
2	*2412.00	101.12 PK			1.33 H	228	69.26	31.86
2	*2412.00	93.40 AV			1.33 H	228	61.54	31.86

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1608.00	49.12 PK	74.00	-24.88	1.40 V	193	20.45	28.68
1	1608.00	45.92 AV	54.00	-8.08	1.40 V	193	17.25	28.68
2	2390.00	54.75 PK	74.00	-19.25	1.00 V	202	23.22	31.53
2	2390.00	48.35 AV	54.00	-5.65	1.00 V	202	16.82	31.53
3	*2412.00	111.90 PK			1.00 V	202	80.28	31.62
3	*2412.00	105.50 AV			1.00 V	202	73.88	31.62
4	3216.00	51.58 PK	74.00	-22.42	1.42 V	140	18.03	33.55
4	3216.00	44.36 AV	54.00	-9.64	1.42 V	140	10.81	33.55
5	4824.00	50.78 PK	74.00	-23.22	1.00 V	208	13.07	37.71
5	4824.00	42.39 AV	54.00	-11.61	1.00 V	208	4.68	37.71

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. “ * ” : Fundamental frequency

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	6	TEST MODE	A
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	FREQUENCY RANGE	1~25 GHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 64% RH, 991 hPa	DETECTOR FUNCTION	Peak(PK) Average (AV)
TESTED BY: Match Tsui			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1624.00	46.99 PK	74.00	-27.01	1.22 H	360	18.30	28.69
1	1624.00	43.42 AV	54.00	-10.58	1.22 H	360	14.73	28.69
2	*2437.00	104.51 PK			1.43 H	186	72.74	31.76
2	*2437.00	97.76 AV			1.43 H	186	65.99	31.76

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1624.00	54.81 PK	74.00	-19.19	1.00 V	181	26.12	28.69
1	1624.00	52.61 AV	54.00	-1.39	1.00 V	181	23.92	28.69
2	*2437.00	116.91 PK			1.00 V	197	85.14	31.76
2	*2437.00	109.66 AV			1.00 V	197	77.89	31.76
3	3248.00	50.64 PK	74.00	-23.36	1.15 V	114	17.03	33.61
3	3248.00	43.81 AV	54.00	-10.19	1.15 V	114	10.20	33.61

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. “ * ” : Fundamental frequency

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	11	TEST MODE	A
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	FREQUENCY RANGE	1~25 GHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 64% RH, 991 hPa	DETECTOR FUNCTION	Peak(PK) Average (AV)
TESTED BY: Match Tsui			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	*2462.00	102.30 PK			1.26 H	68	70.39	31.91
1	*2462.00	95.47 AV			1.26 H	68	63.56	31.91
2	2483.50	45.22 PK	74.00	-28.78	1.26 H	68	13.19	32.03

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	*2462.00	112.43 PK			1.00 V	194	80.52	31.91
1	*2462.00	105.22 AV			1.00 V	194	73.31	31.91
2	2483.50	57.35 PK	74.00	-16.65	1.00 V	194	25.32	32.03
2	2483.50	50.14 AV	54.00	-3.86	1.00 V	194	18.11	32.03
3	4924.00	42.27 PK	74.00	-31.73	1.00 V	190	4.36	37.91
3	4924.00	42.27 AV	54.00	-1.29	1.00 V	190	14.80	37.91

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. “ * ” : Fundamental frequency

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	1	TEST MODE	B
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	FREQUENCY RANGE	1~25 GHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 60% RH, 991 hPa	DETECTOR FUNCTION	Peak (PK) Average (AV)
TESTED BY: Long Chen			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1608.00	42.93 PK	74.00	-31.07	1.00 H	258	14.26	28.68
2	2390.00	35.22 PK	74.00	-38.78	1.64 H	103	3.69	31.53
3	*2412.00	91.21 PK			1.64 H	103	59.59	31.62
3	*2412.00	83.80 AV			1.64 H	103	52.18	31.62

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1608.00	45.47 PK	74.00	-28.53	1.40 V	178	16.80	28.68
2	2390.00	52.96 PK	74.00	-21.04	1.08 V	102	21.43	31.53
2	2390.00	45.25 AV	54.00	-8.75	1.08 V	102	13.72	31.53
3	*2412.00	108.95 PK			1.00 V	102	77.33	31.62
3	*2412.00	101.24 AV			1.00 V	102	69.62	31.62
4	3216.00	46.35 PK	74.00	-27.65	1.64 V	128	12.80	33.55

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. “ * ” : Fundamental frequency

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	6	TEST MODE	B
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	FREQUENCY RANGE	1~25 GHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 60% RH, 991 hPa	DETECTOR FUNCTION	Peak(PK) Average (AV)
TESTED BY: Long Chen			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1624.00	44.09 PK	74.00	-29.91	1.00 H	128	15.40	28.69
2	*2437.00	94.16 PK			1.62 H	104	62.40	31.76
2	*2437.00	86.71 AV			1.62 H	104	54.95	31.76

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1624.00	46.82 PK	74.00	-27.18	1.00 V	176	18.13	28.69
2	*2437.00	114.49 PK			1.00 V	101	82.73	31.76
2	*2437.00	106.99 AV			1.00 V	101	75.23	31.76
3	3248.00	46.15 PK	74.00	-27.85	1.80 V	45	12.54	33.61
4	4874.00	49.28 PK	74.00	-24.72	1.61 V	100	11.47	37.81

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. “ * ” : Fundamental frequency

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	11	TEST MODE	B
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	FREQUENCY RANGE	1~25 GHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 60% RH, 991 hPa	DETECTOR FUNCTION	Peak(PK) Average (AV)
TESTED BY: Long Chen			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1641.00	41.18 PK	74.00	-32.82	1.00 H	226	12.48	28.70
2	*2462.00	91.21 PK			1.60 H	100	59.30	31.91
2	*2462.00	83.26 AV			1.60 H	100	51.35	31.91
3	2483.50	31.62 PK	74.00	-42.38	1.60 H	100	-0.41	32.03

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1641.00	42.27 PK	74.00	-31.73	1.00 V	211	13.57	28.70
2	*2462.00	108.58 PK			1.00 V	103	76.67	31.91
2	*2462.00	101.12 AV			1.00 V	103	69.21	31.91
3	2483.50	48.99 PK	74.00	-25.01	1.00 V	103	16.96	32.03
4	3282.00	46.18 PK	74.00	-27.82	1.52 V	201	12.52	33.67

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. “ * ” : Fundamental frequency

4.2.9 TEST RESULTS (B)

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	1	TEST MODE	A
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	FREQUENCY RANGE	1~25 GHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 64% RH, 991 hPa	DETECTOR FUNCTION	Peak (PK) Average (AV)
TESTED BY: Match Tsui			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1608.00	44.92 PK	74.00	-29.08	1.24 H	192	16.25	28.68
1	1608.00	40.89 AV	54.00	-13.11	1.24 H	192	12.22	28.68
2	2390.00	46.94 PK	74.00	-27.06	1.35 H	226	15.41	31.53
2	2390.00	39.51 AV	54.00	-14.49	1.35 H	226	7.98	31.53
3	*2412.00	97.18 PK			1.35 H	226	65.56	31.62
3	*2412.00	89.75 AV			1.35 H	226	58.13	31.62
4	3216.00	48.97 PK	74.00	-25.03	1.35 H	204	15.42	33.55
4	3216.00	41.14 AV	54.00	-12.86	1.35 H	204	7.59	33.55

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1608.00	45.80 PK	74.00	-28.20	1.02 V	188	17.13	28.68
1	1608.00	45.11 AV	54.00	-8.89	1.02 V	188	16.44	28.68
2	2390.00	58.70 PK	74.00	-15.30	1.00 V	194	27.17	31.53
2	2390.00	51.36 AV	54.00	-2.64	1.00 V	194	19.83	31.53
3	*2412.00	108.94 PK			1.00 V	194	77.32	31.62
3	*2412.00	101.60 AV			1.00 V	194	69.98	31.62
4	3216.00	51.27 PK	74.00	-22.73	1.67 V	197	17.72	33.55
4	3216.00	45.86 AV	54.00	-8.14	1.67 V	197	12.31	33.55

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. “ * ” : Fundamental frequency



EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	6	TEST MODE	A
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	FREQUENCY RANGE	1~25 GHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 64% RH, 991 hPa	DETECTOR FUNCTION	Peak(PK) Average (AV)
TESTED BY: Match Tsui			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1624.00	44.96 PK	74.00	-29.04	1.35 H	124	16.27	28.69
1	1624.00	44.29 AV	54.00	-9.71	1.35 H	124	15.60	28.69
2	*2437.00	101.26 PK			1.48 H	195	69.49	31.76
2	*2437.00	93.74 AV			1.48 H	195	61.97	31.76
3	3248.00	50.77 PK	74.00	-23.23	1.36 H	202	17.16	33.61
3	3248.00	43.50 AV	54.00	-10.50	1.36 H	202	9.89	33.61
4	4874.00	40.98 PK	74.00	-33.02	1.00 H	240	3.18	37.81
4	4874.00	39.85 AV	54.00	-14.42	1.00 H	240	1.78	37.81

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1624.00	52.01 PK	74.00	-21.99	1.37 V	181	23.32	28.69
1	1624.00	51.31 AV	54.00	-2.69	1.37 V	181	22.62	28.69
2	*2437.00	114.81 PK			1.00 V	189	83.04	31.76
2	*2437.00	106.97 AV			1.00 V	189	75.20	31.76
3	3248.00	52.38 PK	74.00	-21.62	1.42 V	205	18.77	33.61
3	3248.00	46.78 AV	54.00	-7.22	1.42 V	205	13.17	33.61
4	4874.00	54.52 PK	74.00	-19.48	1.02 V	193	16.72	37.81
4	4874.00	49.60 AV	54.00	-4.40	1.02 V	193	11.80	37.81

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. “ * ” : Fundamental frequency

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	11	TEST MODE	A
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	FREQUENCY RANGE	1~25 GHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 64% RH, 991 hPa	DETECTOR FUNCTION	Peak(PK) Average (AV)
TESTED BY: Match Tsui			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1642.00	47.79 PK	74.00	-26.21	1.29 H	192	19.09	28.70
1	1642.00	44.46 AV	54.00	-9.54	1.29 H	192	15.76	28.70
2	*2462.00	99.54 PK			1.31 H	227	67.43	31.91
2	*2462.00	91.80 AV			1.31 H	227	59.89	31.91
3	2483.50	47.25 PK	74.00	-26.75	1.31 H	227	15.22	32.03
3	2483.50	39.51 AV	54.00	-14.49	1.31 H	227	7.48	32.03
4	3282.00	48.10 PK	74.00	-25.90	1.33 H	199	14.43	33.67
4	3282.00	39.39 AV	54.00	-14.07	1.33 H	199	6.26	33.67

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M

No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1642.00	51.64 PK	74.00	-22.36	1.38 V	202	22.94	28.70
1	1642.00	49.39 AV	54.00	-4.61	1.38 V	202	20.69	28.70
2	*2462.00	112.13 PK			1.00 V	197	80.22	31.91
2	*2462.00	103.00 AV			1.00 V	197	71.09	31.91
3	2483.50	58.84 PK	74.00	-15.16	1.00 V	197	26.81	32.03
3	2483.50	51.51 AV	54.00	-2.49	1.00 V	197	19.48	32.03
4	3282.00	49.18 PK	74.00	-24.82	1.36 V	117	15.51	33.67
4	3282.00	42.34 AV	54.00	-11.66	1.36 V	117	8.67	33.67

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. “ * ” : Fundamental frequency

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	1	TEST MODE	B
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	FREQUENCY RANGE	1~25 GHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 60% RH, 991 hPa	DETECTOR FUNCTION	Peak (PK) Average (AV)
TESTED BY: Long Chen			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1608.00	44.00 PK	74.00	-30.00	1.29 H	218	15.33	28.68
2	2390.00	39.74 PK	74.00	-34.26	1.16 H	213	8.21	31.53
3	*2412.00	91.17 PK			1.16 H	213	59.55	31.62
3	*2412.00	82.90 AV			1.16 H	213	51.28	31.62

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1608.00	45.28 PK	74.00	-28.72	1.76 V	345	16.60	28.68
2	2390.00	55.54 PK	74.00	-18.46	1.00 V	102	24.01	31.53
2	2390.00	47.74 AV	54.00	-6.26	1.00 V	102	16.21	31.53
3	*2412.00	106.97 PK			1.00 V	102	75.35	31.62
3	*2412.00	99.17 AV			1.00 V	102	67.55	31.62
4	3216.00	47.77 PK	74.00	-26.23	1.76 V	338	14.22	33.55

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. “ * ” : Fundamental frequency

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	6	TEST MODE	B
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	FREQUENCY RANGE	1~25 GHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 60% RH, 991 hPa	DETECTOR FUNCTION	Peak(PK) Average (AV)
TESTED BY: Long Chen			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1624.00	45.21 PK	74.00	-28.79	1.00 H	216	16.52	28.69
2	*2437.00	96.86 PK			1.16 H	213	65.10	31.76
2	*2437.00	88.58 AV			1.16 H	213	56.82	31.76
3	4874.00	44.28 PK	74.00	-29.72	1.00 H	216	6.47	37.81

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1624.00	48.25 PK	74.00	-25.75	1.75 V	330	19.56	28.69
2	*2437.00	112.59 PK			1.00 V	108	80.83	31.76
2	*2437.00	102.64 AV			1.00 V	108	70.88	31.76
3	3248.00	48.58 PK	74.00	-25.42	1.00 V	358	14.97	33.61
4	4874.00	48.36 PK	74.00	-25.64	1.33 V	148	10.55	37.81

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. “ * ” : Fundamental frequency

EUT	Wireless-G PCI Adapter with SpeedBooster	MODEL	WMP54GS
CHANNEL	11	TEST MODE	B
INPUT POWER (SYSTEM)	120 Vac, 60 Hz	FREQUENCY RANGE	1~25 GHz
ENVIRONMENTAL CONDITIONS	25 deg. C, 60% RH, 991 hPa	DETECTOR FUNCTION	Peak(PK) Average (AV)
TESTED BY: Long Chen			

ANTENNA POLARITY & TEST DISTANCE: HORIZONTAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1641.00	44.28 PK	74.00	-29.72	1.25 H	229	15.58	28.70
2	*2462.00	90.53 PK			1.13 H	211	58.62	31.91
2	*2462.00	82.61 AV			1.13 H	211	50.70	31.91
3	2483.50	40.05 PK	74.00	-33.95	1.13 H	211	8.02	32.03

ANTENNA POLARITY & TEST DISTANCE: VERTICAL AT 3 M								
No.	Freq. (MHz)	Emission Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Antenna Height (m)	Table Angle (Degree)	Raw Value (dBuV)	Correction Factor (dB/m)
1	1608.00	47.58 PK	74.00	-26.42	1.42 V	136	18.90	28.68
2	*2462.00	108.50 PK			1.00 V	110	75.59	31.91
2	*2462.00	97.23 AV			1.00 V	110	65.32	31.91
3	2483.50	57.02 PK	74.00	-16.98	1.00 V	110	24.99	32.03
3	2483.50	46.75 AV	54.00	-7.25	1.00 V	110	14.72	32.03
4	3282.00	47.92 PK	74.00	-26.08	1.33 V	148	14.25	33.67

REMARKS:

1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB)
2. Correction Factor(dB/m) = Antenna Factor (dB/m) + Cable Factor (dB)
3. The other emission levels were very low against the limit.
4. Margin value = Emission level – Limit value.
5. “ * ” : Fundamental frequency

4.3 6dB BANDWIDTH MEASUREMENT

4.3.1 LIMITS OF 6dB BANDWIDTH MEASUREMENT

The minimum of 6dB Bandwidth Measurement is 0.5MHz.

4.3.2 TEST INSTRUMENTS

Description & Manufacturer	Model No.	Serial No.	Calibrated Until
SPECTRUM ANALYZER	FSEK30	100049	Aug. 12, 2004

NOTE:

The calibration interval of the above test instruments is 12 months and the calibrations are traceable to NML/ROC and NIST/USA.

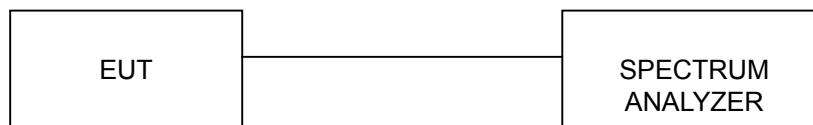
4.3.3 TEST PROCEDURE

The transmitter output was connected to the spectrum analyzer through an attenuator. The bandwidth of the fundamental frequency was measured by spectrum analyzer with 100kHz RBW and 100kHz VBW. The 6dB bandwidth is defined as the total spectrum the power of which is higher than peak power minus 6dB.

4.3.4 DEVIATION FROM TEST STANDARD

No deviation

4.3.5 TEST SETUP



For the actual test configuration, please refer to the related Item – Photographs of the Test Configuration.

4.3.6 EUT OPERATING CONDITIONS

The software provided by client to enable the EUT under transmission condition continuously at lowest, middle and highest channel frequencies individually.