



# FCC TEST REPORT

**REPORT NO.:** RF950808L08

**MODEL NO.:** WUSB300N

**RECEIVED:** Aug. 16, 2006

**TESTED:** Aug. 16 ~ Sep. 13, 2006

**ISSUED:** Sep. 19, 2006

**APPLICANT:** Cisco-Linksys LLC

**ADDRESS:** 121 Theory Drive Irvine, CA 92617 (USA)

**ISSUED BY:** Advance Data Technology Corporation

**LAB ADDRESS:** 47 14<sup>th</sup> Lin, Chiapau Tsun, Linko, Taipei, Taiwan, R.O.C.

**TEST LOCATION:** No. 19, Hwa Ya 2<sup>nd</sup> Rd., Kueishan, Taoyuan, Taiwan, R.O.C.

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# 1. CERTIFICATION

**PRODUCT:** Wireless-N USB Network Adapter  
**MODEL:** WUSB300N  
**BRAND:** Linksys  
**APPLICANT:** Cisco-Linksys LLC  
**TESTED:** Aug. 16 ~ Sep. 13, 2006  
**TEST SAMPLE:** ENGINEERING SAMPLE  
**STANDARDS:** FCC Part 15, Subpart C (Section 15.247),  
ANSI C63.4-2003

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** : Rennie Wang , **DATE:** Sep. 19, 2006  
Rennie Wang

**TECHNICAL ACCEPTANCE** : Long Chen , **DATE:** Sep. 19, 2006  
Responsible for RF Long Chen

**APPROVED BY** : Gary Chang , **DATE:** Sep. 19, 2006  
Gary Chang / Supervisor

## 2. SUMMARY OF TEST RESULTS

The EUT has been tested according to the following specifications:

<b>APPLIED STANDARD: FCC Part 15, Subpart C</b>			
<b>STANDARD SECTION</b>	<b>TEST TYPE AND LIMIT</b>	<b>RESULT</b>	<b>REMARK</b>
15.207	AC Power Conducted Emission	PASS	Meet the requirement of limit. Minimum passing margin is -11.01dB at 0.150MHz.
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(d)	Transmitter Radiated Emissions Limit: Table 15.209	PASS	Meet the requirement of limit. Minimum passing margin is -1.13dB at 4824.00MHz.
15.247(e)	Power Spectral Density Limit: max. 8dBm	PASS	Meet the requirement of limit.
15.247(d)	Band Edge Measurement Limit: 20dB less than the peak value of fundamental frequency	PASS	Meet the requirement of limit.

### 2.1 MEASUREMENT UNCERTAINTY

Where relevant, the following measurement uncertainty levels have been estimated for tests performed on the EUT as specified in CISPR 16-4:

<b>MEASUREMENT</b>	<b>FREQUENCY</b>	<b>UNCERTAINTY</b>
Conducted emissions	9kHz ~ 30MHz	2.44dB
Radiated emissions	30MHz ~ 200MHz	3.62 dB
	200MHz ~1000MHz	3.64 dB
	1GHz ~ 18GHz	2.26 dB
	18GHz ~ 40GHz	1.94 dB

This uncertainty represents an expanded uncertainty expressed at approximately the 95% confidence level using a coverage factor of  $k = 2$ .

### 3. GENERAL INFORMATION

#### 3.1 GENERAL DESCRIPTION OF EUT

<b>PRODUCT</b>	Wireless-N USB Network Adapter
<b>MODEL NO.</b>	WUSB300N
<b>FCC ID</b>	Q87-WUSB300N
<b>POWER SUPPLY</b>	5.0Vdc from host equipment 5.0Vdc from host equipment via USB cable 5.0Vdc from host equipment via cradle
<b>MODULATION TYPE</b>	CCK, DQPSK, DBPSK for DSSS 64QAM, 16QAM, QPSK, BPSK for OFDM
<b>MODULATION TECHNOLOGY</b>	DSSS, OFDM
<b>TRANSFER RATE</b>	802.11b: 11/ 5.5/ 2/ 1Mbps 802.11g: 54/ 48/ 36/ 24/ 18/ 12/ 9/ 6Mbps Draft 802.11n (20MHz): 144.444/ 130.000/ 115.556/ 86.667/ 57.778/ 43.333/ 28.889/ 14.444/ 72.2/ 65.0/ 57.8/ 43.3/ 28.9/ 21.7/ 14.4/ 7.2Mbps Draft 802.11n (40MHz): 300/ 270/ 240/ 180/ 120/ 90/ 60/ 30/ 150/ 135/ 120/ 90/ 60/ 45/ 30/ 15Mbps
<b>FREQUENCY RANGE</b>	2412MHz ~ 2462MHz
<b>NUMBER OF CHANNEL</b>	11 for 802.11b, 802.11g, draft 802.11n (20MHz) 7 for draft 802.11n (40MHz), 802.11b (CB mode)
<b>MAXIMUM OUTPUT POWER</b>	45.345mW
<b>ANTENNA TYPE</b>	Dipole antenna with 2.8dBi gain
<b>DATA CABLE</b>	0.28m non-shielded USB cable without core 1.80m non-shielded cable for cradle
<b>I/O PORTS</b>	NA

**NOTE:**

1. The EUT incorporates a MIMO function with 802.11b, 802.11g, draft 802.11n. Physically, the card provides two completed transmitters and two receivers.
2. The EUT is 2 \* 2 spatial MIMO (2Tx & 2Rx) without beam forming function that only operate dual chain configuration (both chain 0 and chain 1 transceivers are operational).
3. When the EUT operating in 802.11b, 802.11g, the software operation, which is defined by manufacturer, only set dual Tx.
4. When the EUT operating in 802.11b with "Channel Binding function", the software operation, which is defined by manufacturer, only set dual Tx.
5. When the EUT operating in draft 802.11n, the software operation, which is defined by manufacturer, only set 0 ~ 15 of "MCS" (MCS: Modulation and Coding Schemes) for dual Tx.
6. The EUT complies with draft 802.11n standards and backwards compatible with 802.11b, 802.11g products.
7. The EUT operates in the 2.4GHz frequency spectrum with throughput of up to 300Mbps.
8. 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 for 802.11b, 802.11g, draft 802.11n (20MHz):

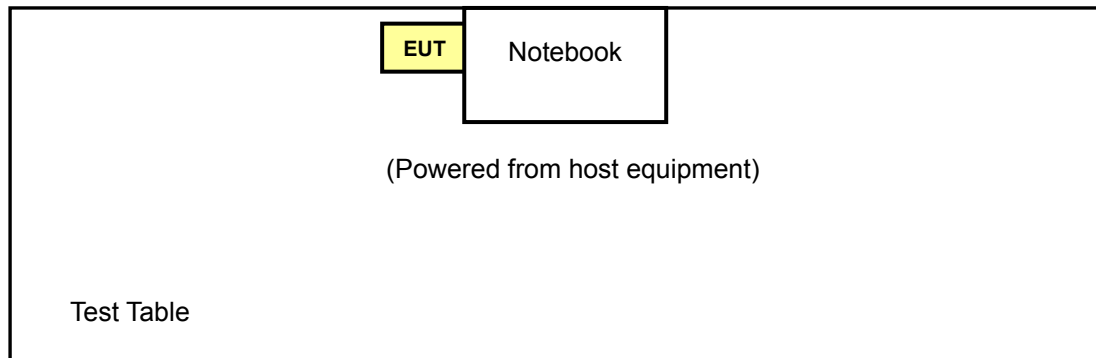
CHANNEL	FREQUENCY	CHANNEL	FREQUENCY
1	2412MHz	7	2442MHz
2	2417MHz	8	2447MHz
3	2422MHz	9	2452MHz
4	2427MHz	10	2457MHz
5	2432MHz	11	2462MHz
6	2437MHz		

Seven channels are provided for 802.11 b (CB mode) and draft 802.11n (40MHz):

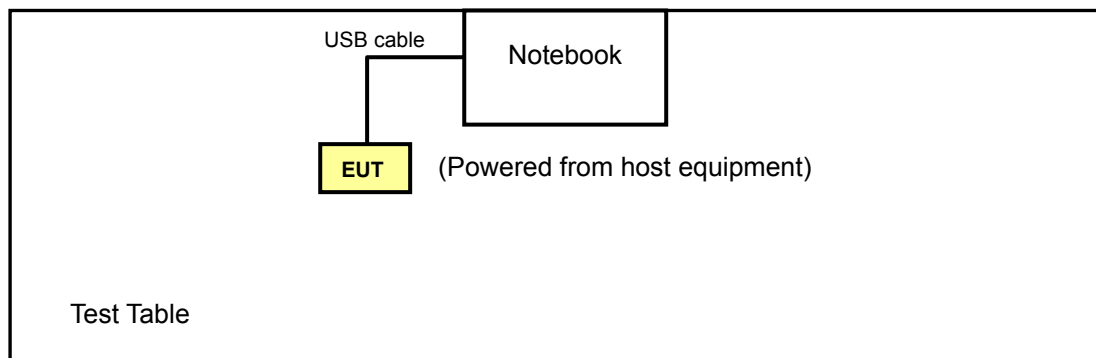
CHANNEL	FREQUENCY	CHANNEL	FREQUENCY
1	2422MHz	5	2442MHz
2	2427MHz	6	2447MHz
3	2432MHz	7	2452MHz
4	2437MHz		

### 3.2.1 CONFIGURATION OF SYSTEM UNDER TEST

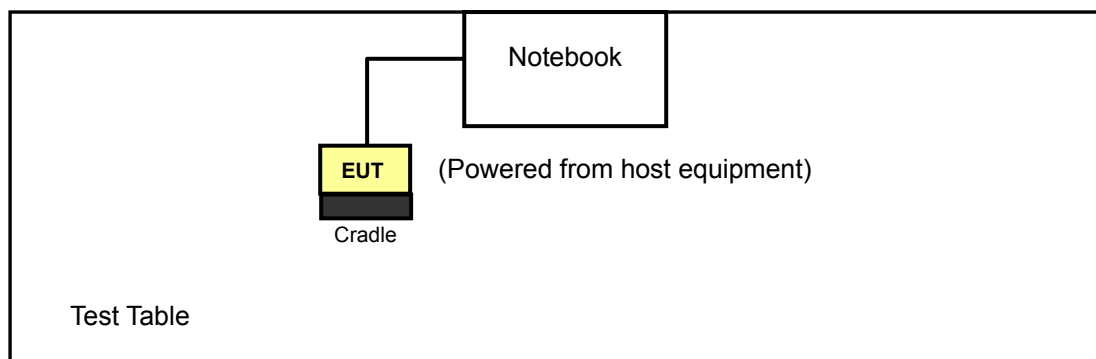
#### Test mode A



#### Test mode B



#### Test mode C





### 3.2.2 TEST MODE APPLICABILITY AND TESTED CHANNEL DETAIL

EUT CONFIGURE MODE	APPLICABLE TO				DESCRIPTION
	PLC	RE < 1G	RE ≥ 1G	APCM	
A	NOTE 1	√	√	√	Powered from host equipment
B	NOTE 1	√	NOTE 2	NOTE 2	Powered from host equipment via USB cable
C	√	√	NOTE 2	NOTE 2	Powered from host equipment via Cradle

Where **PLC**: Power Line Conducted Emission      **RE < 1G**: Radiated Emission below 1GHz  
**RE ≥ 1G**: Radiated Emission above 1GHz      **APCM**: Antenna Port Conducted Measurement

**NOTE 1**: No effect.

**NOTE 2**: After pre-testing each mode, the worst case, test mode A had been presented in the following sections.

#### **POWER LINE CONDUCTED EMISSION TEST:**

- Pre-Scan has been conducted to determine the worst-case mode from all possible combinations between available modulations, data rates and antenna ports (if EUT with antenna diversity architecture).
- Following channel(s) was (were) selected for the final test as listed below.

EUT CONFIGURE MODE	MODE	AVAILABLE CHANNEL	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	DATA RATE (Mbps)	TX CONDITION
C	802.11g	1 to 11	1, 6, 11	OFDM	BPSK	6.0	Dual
C	Draft 802.11n (20MHz)	1 to 11	1, 6, 11	OFDM	BPSK	7.2	Dual
C	Draft 802.11n (40MHz)	1 to 7	1, 4, 7	OFDM	BPSK	15.0	Dual
C	802.11b (CB Mode)	1 to 7	1, 4, 7	DSSS	DBPSK	1.0	Dual



**RADIATED EMISSION TEST (BELOW 1 GHz):**

- Pre-Scan has been conducted to determine the worst-case mode from all possible combinations between available modulations, data rates and antenna ports (if EUT with antenna diversity architecture).
- Following channel(s) was (were) selected for the final test as listed below.

EUT CONFIGURE MODE	MODE	AVAILABLE CHANNEL	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	DATA RATE (Mbps)	TX CONDITION
A, B, C	802.11g	1 to 11	1	OFDM	BPSK	6.0	Dual
A, B, C	Draft 802.11n (20MHz)	1 to 11	1	OFDM	BPSK	7.2	Dual
A, B, C	Draft 802.11n (40MHz)	1 to 7	1	OFDM	BPSK	15.0	Dual
A, B, C	802.11b (CB Mode)	1 to 7	1	DSSS	DBPSK	1.0	Dual

**RADIATED EMISSION TEST (ABOVE 1 GHz):**

- Pre-Scan has been conducted to determine the worst-case mode from all possible combinations between available modulations, data rates and antenna ports (if EUT with antenna diversity architecture).
- Following channel(s) was (were) selected for the final test as listed below.

EUT CONFIGURE MODE	MODE	AVAILABLE CHANNEL	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	DATA RATE (Mbps)	TX CONDITION
A	802.11b	1 to 11	1, 6, 11	DSSS	DBPSK	1.0	Dual
A	802.11g	1 to 11	1, 6, 11	OFDM	BPSK	6.0	Dual
A	Draft 802.11n (20MHz)	1 to 11	1, 6, 11	OFDM	BPSK	7.2	Dual
A	Draft 802.11n (40MHz)	1 to 7	1, 4, 7	OFDM	BPSK	15.0	Dual
A	802.11b (CB Mode)	1 to 7	1, 4, 7	DSSS	DBPSK	1.0	Dual



**BANDEDGE MEASUREMENT:**

- Pre-Scan has been conducted to determine the worst-case mode from all possible combinations between available modulations, data rates and antenna ports (if EUT with antenna diversity architecture).
- Following channel(s) was (were) selected for the final test as listed below.

EUT CONFIGURE MODE	MODE	AVAILABLE CHANNEL	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	DATA RATE (Mbps)	TX CONDITION
A	802.11b	1 to 11	1, 11	DSSS	DBPSK	1.0	Dual
A	802.11g	1 to 11	1, 11	OFDM	BPSK	6.0	Dual
A	Draft 802.11n (20MHz)	1 to 11	1, 11	OFDM	BPSK	7.2	Dual
A	Draft 802.11n (40MHz)	1 to 7	1, 7	OFDM	BPSK	15.0	Dual
A	802.11b (CB Mode)	1 to 7	1, 7	DSSS	DBPSK	1.0	Dual

**ANTENNA PORT CONDUCTED MEASUREMENT:**

- Pre-Scan has been conducted to determine the worst-case mode from all possible combinations between available modulations, data rates and antenna ports (if EUT with antenna diversity architecture).
- Following channel(s) was (were) selected for the final test as listed below.

EUT CONFIGURE MODE	MODE	AVAILABLE CHANNEL	TESTED CHANNEL	MODULATION TECHNOLOGY	MODULATION TYPE	DATA RATE (Mbps)	TX CONDITION
A	802.11b	1 to 11	1, 6, 11	DSSS	DBPSK	1.0	Dual
A	802.11g	1 to 11	1, 6, 11	OFDM	BPSK	6.0	Dual
A	Draft 802.11n (20MHz)	1 to 11	1, 6, 11	OFDM	BPSK	7.2	Dual
A	Draft 802.11n (40MHz)	1 to 7	1, 4, 7	OFDM	BPSK	15.0	Dual
A	802.11b (CB Mode)	1 to 7	1, 4, 7	DSSS	DBPSK	1.0	Dual



### 3.3 GENERAL DESCRIPTION OF APPLIED STANDARDS

The EUT is a RF product. 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 C63.4-2003**

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	NOTEBOOK	HP	nx6215	CND5390CMP	FCC DoC Approved

NO.	SIGNAL CABLE DESCRIPTION OF THE ABOVE SUPPORT UNITS
1	NA

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



## 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 $\mu$ 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	Nov. 02, 2006
RF signal cable Woken	5D-FB	Cable-HYCO3-01	Jan. 06, 2007
LISN ROHDE & SCHWARZ	ESH2-Z5	100100	Jan. 09, 2007
LISN ROHDE & SCHWARZ	ESH3-Z5	100311	Jan. 22, 2007
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.

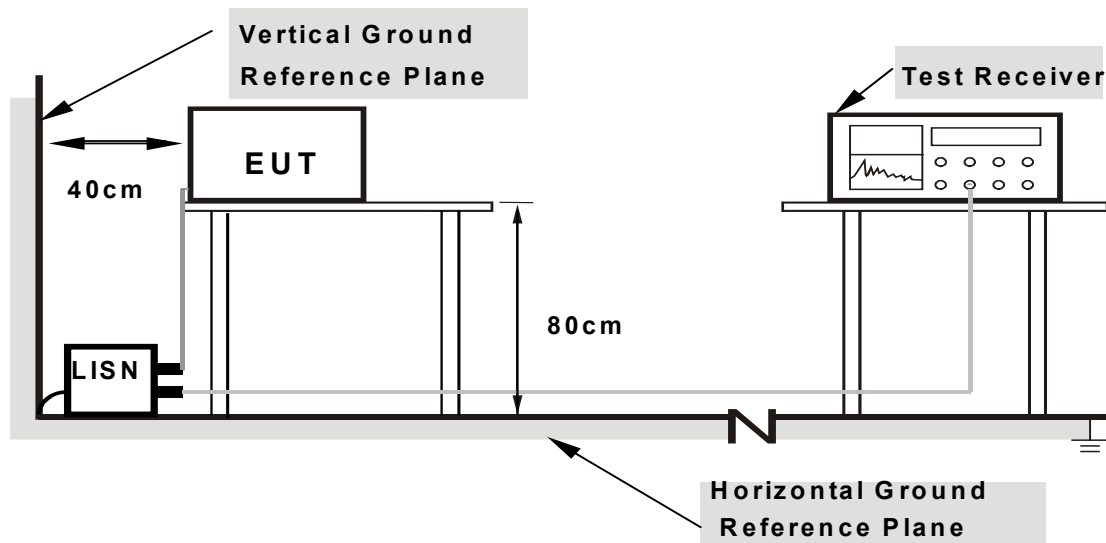
#### 4.1.3 TEST PROCEDURES

- 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 150kHz to 30MHz was searched. Emission levels under (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) are 80 cm from EUT and at least 80 from other units and other metal planes

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 notebook and placed on a testing table.
- b. The notebook ran a test program (provided by manufacturer) to enable EUT under transmission/receiving condition continuously at specific channel frequency.

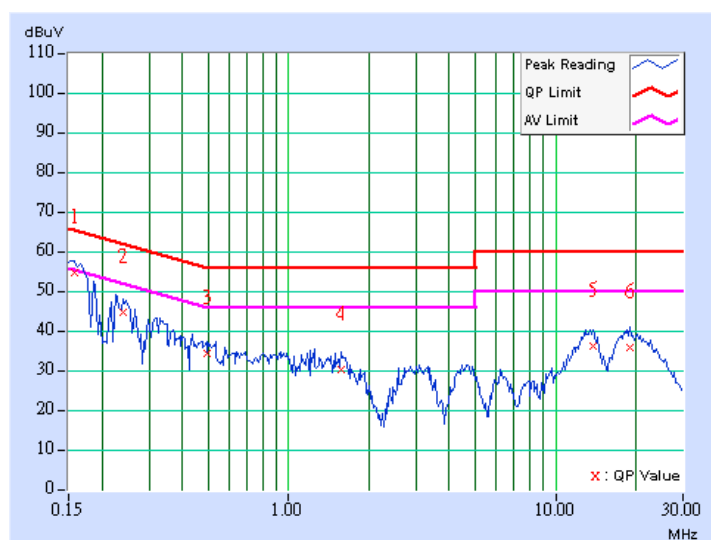
#### 4.1.7 TEST RESULTS

##### CONDUCTED WORST-CASE DATA: 802.11g OFDM MODULATION: DUAL TX

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	PHASE	Line 1
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	6.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
			1	0.158	0.10	54.19	-	54.29	-	65.58
2	0.240	0.10	44.36	-	44.46	-	62.10	52.10	-17.64	-
3	0.494	0.10	33.77	-	33.87	-	56.10	46.10	-22.23	-
4	1.578	0.16	29.96	-	30.12	-	56.00	46.00	-25.88	-
5	13.754	0.56	35.57	-	36.13	-	60.00	50.00	-23.87	-
6	18.941	0.57	35.25	-	35.82	-	60.00	50.00	-24.18	-

- 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.

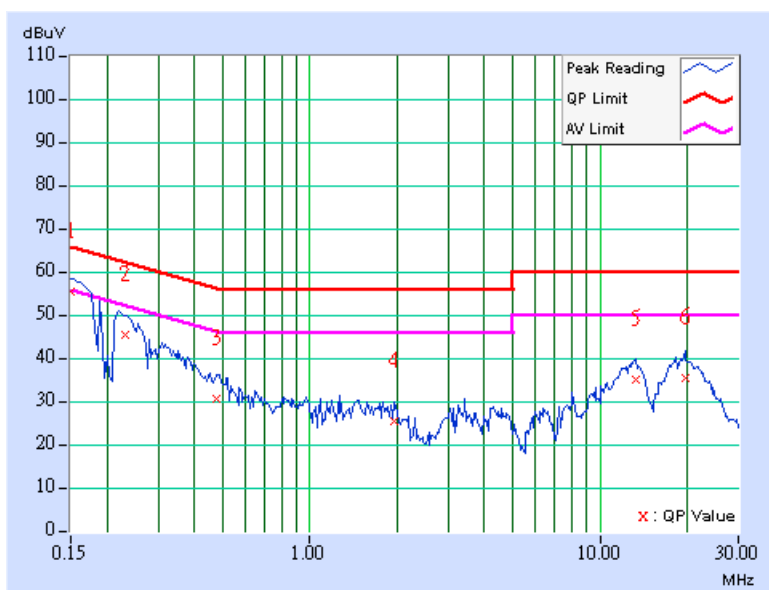




EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	PHASE	Line 2
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	6.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.150	0.10	54.89	-	54.99	-	66.00	56.00	-11.01	-
2	0.230	0.10	44.98	-	45.08	-	62.43	52.43	-17.35	-
3	0.474	0.11	30.11	-	30.22	-	56.44	46.44	-26.22	-
4	1.965	0.20	24.97	-	25.17	-	56.00	46.00	-30.83	-
5	13.273	0.57	34.53	-	35.10	-	60.00	50.00	-24.90	-
6	19.633	0.57	35.08	-	35.65	-	60.00	50.00	-24.35	-

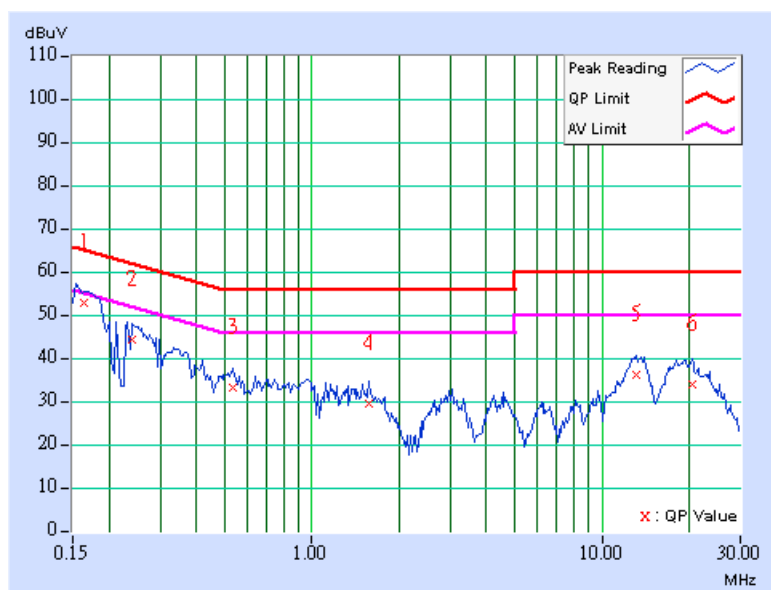
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 6	PHASE	Line 1
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	6.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.164	0.10	52.35	-	52.45	-	65.25	55.25	-12.80	-
2	0.240	0.10	43.79	-	43.89	-	62.10	52.10	-18.21	-
3	0.533	0.10	32.77	-	32.87	-	56.00	46.00	-23.13	-
4	1.574	0.16	28.99	-	29.15	-	56.00	46.00	-26.85	-
5	13.160	0.53	35.62	-	36.15	-	60.00	50.00	-23.85	-
6	20.391	0.59	33.33	-	33.92	-	60.00	50.00	-26.08	-

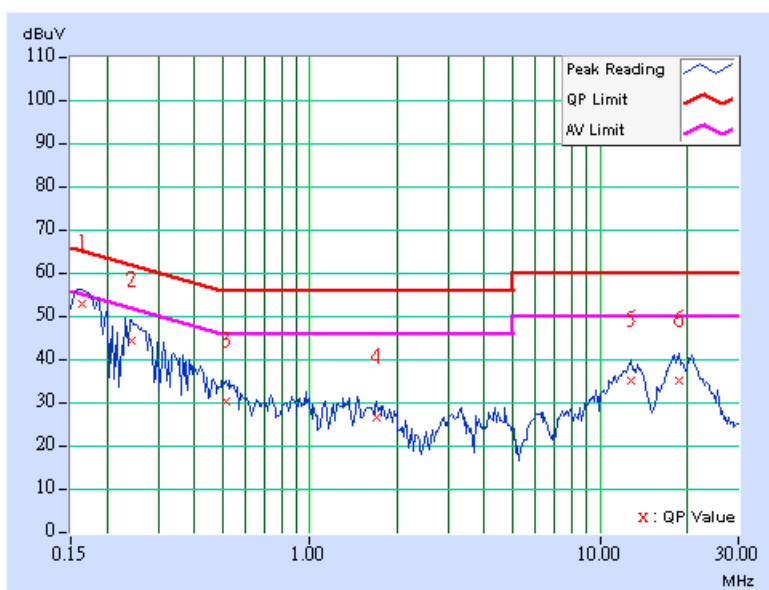
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 6	PHASE	Line 2
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	6.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
			1	0.163	0.10	52.53	-	52.63	-	65.31
2	0.244	0.10	43.82	-	43.92	-	61.97	51.97	-18.05	-
3	0.517	0.12	29.86	-	29.98	-	56.00	46.00	-26.02	-
4	1.707	0.20	26.19	-	26.39	-	56.00	46.00	-29.61	-
5	12.852	0.56	34.47	-	35.03	-	60.00	50.00	-24.97	-
6	18.695	0.58	34.79	-	35.37	-	60.00	50.00	-24.63	-

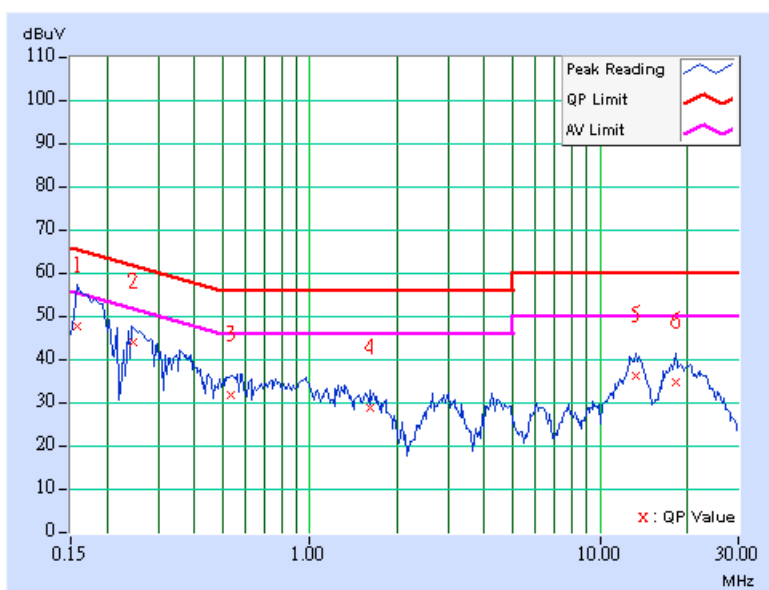
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 11	PHASE	Line 1
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	6.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
			1	0.158	0.10	47.09	-	47.19	-	65.58
2	0.248	0.10	43.46	-	43.56	-	61.84	51.84	-18.28	-
3	0.533	0.10	31.14	-	31.24	-	56.00	46.00	-24.76	-
4	1.621	0.16	28.43	-	28.59	-	56.00	46.00	-27.41	-
5	13.234	0.53	35.67	-	36.20	-	60.00	50.00	-23.80	-
6	18.367	0.58	34.15	-	34.73	-	60.00	50.00	-25.27	-

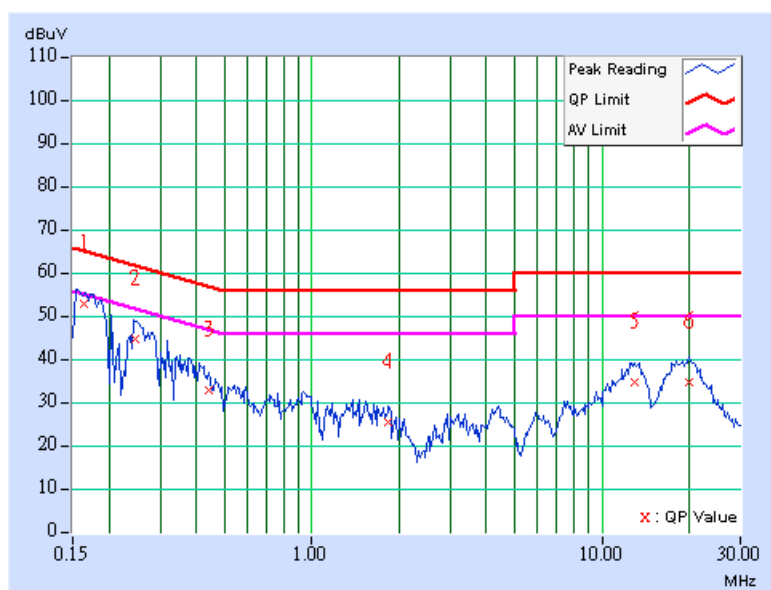
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 11	PHASE	Line 2
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	6.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
			1	0.164	0.10	52.35	-	52.45	-	65.25
2	0.248	0.10	44.17	-	44.27	-	61.84	51.84	-17.57	-
3	0.443	0.11	32.44	-	32.55	-	57.01	47.01	-24.46	-
4	1.840	0.20	24.87	-	25.07	-	56.00	46.00	-30.93	-
5	12.965	0.56	34.34	-	34.90	-	60.00	50.00	-25.10	-
6	19.977	0.56	34.26	-	34.82	-	60.00	50.00	-25.18	-

- 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.

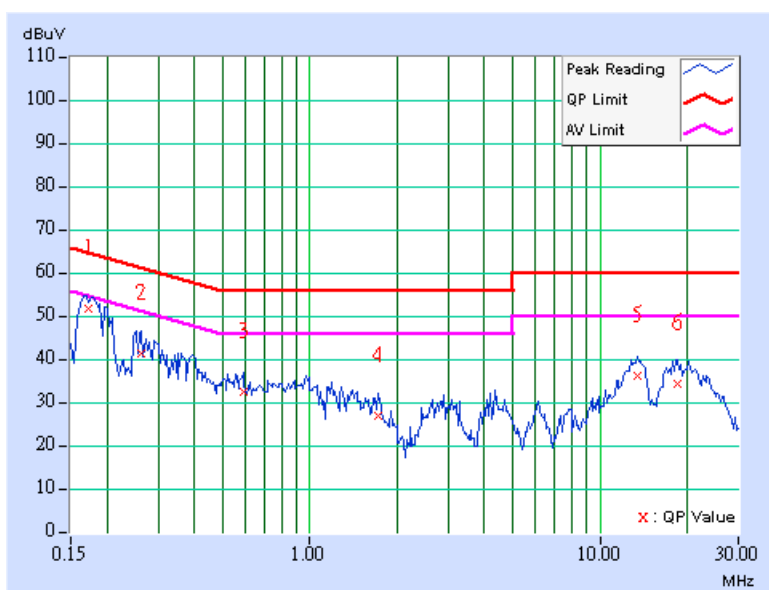


### DRAFT 802.11n (20MHz) OFDM MODULATION: DUAL TX

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	PHASE	Line 1
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	7.2Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
			1	0.173	0.10	51.16	-	51.26	-	64.80
2	0.263	0.10	40.83	-	40.93	-	61.33	51.33	-20.40	-
3	0.591	0.10	31.85	-	31.95	-	56.00	46.00	-24.05	-
4	1.727	0.17	26.55	-	26.72	-	56.00	46.00	-29.28	-
5	13.414	0.54	35.75	-	36.29	-	60.00	50.00	-23.71	-
6	18.516	0.58	33.97	-	34.55	-	60.00	50.00	-25.45	-

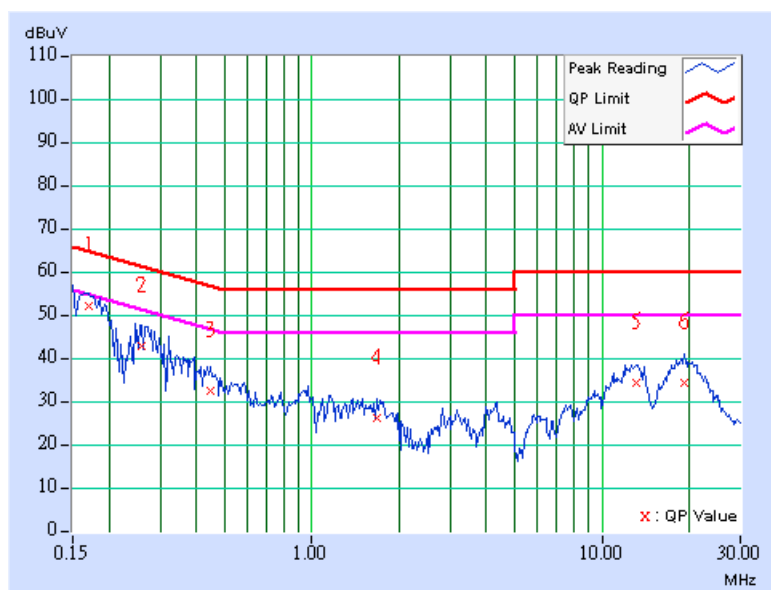
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	PHASE	Line 2
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	7.2Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.170	0.10	51.77	-	51.87	-	64.98	54.98	-13.11	-
2	0.259	0.10	42.49	-	42.59	-	61.45	51.45	-18.86	-
3	0.447	0.11	32.02	-	32.13	-	56.93	46.93	-24.81	-
4	1.684	0.20	25.73	-	25.93	-	56.00	46.00	-30.07	-
5	13.102	0.57	34.05	-	34.62	-	60.00	50.00	-25.38	-
6	19.125	0.57	34.05	-	34.62	-	60.00	50.00	-25.38	-

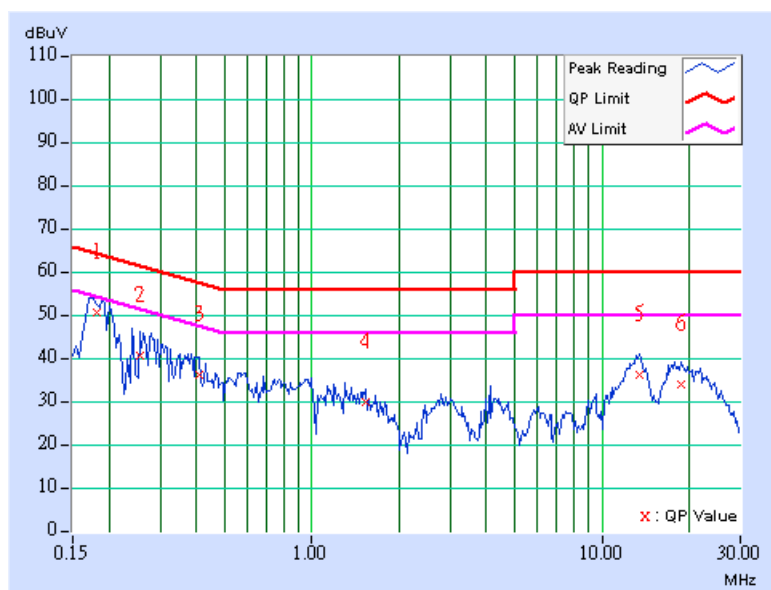
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 6	PHASE	Line 1
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	7.2Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.181	0.10	49.98	-	50.08	-	64.44	54.44	-14.36	-
2	0.255	0.10	40.26	-	40.36	-	61.58	51.58	-21.22	-
3	0.408	0.10	35.68	-	35.78	-	57.69	47.69	-21.91	-
4	1.531	0.15	29.26	-	29.41	-	56.00	46.00	-26.59	-
5	13.395	0.54	35.77	-	36.31	-	60.00	50.00	-23.69	-
6	18.730	0.58	33.46	-	34.04	-	60.00	50.00	-25.96	-

- 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.

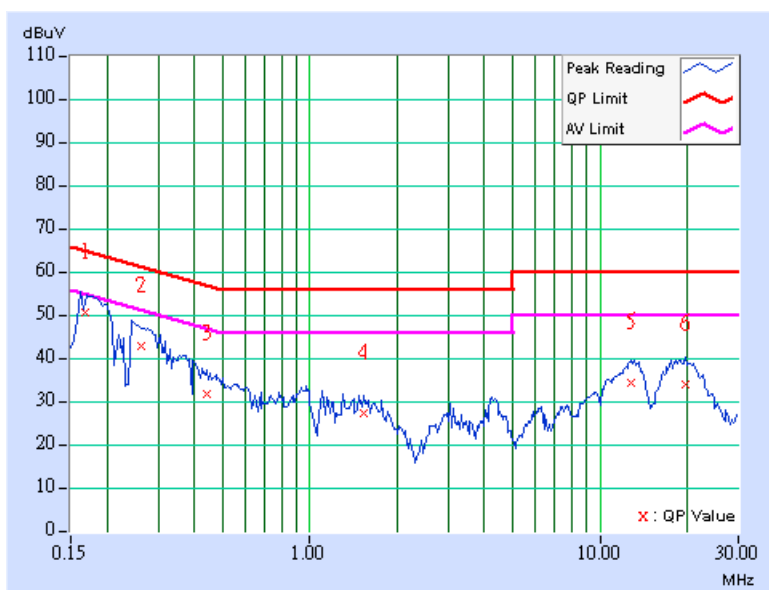




EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 6	PHASE	Line 2
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	7.2Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.169	0.10	50.10	-	50.20	-	65.03	55.03	-14.83	-
2	0.263	0.10	42.33	-	42.43	-	61.32	51.32	-18.89	-
3	0.439	0.11	31.44	-	31.55	-	57.08	47.08	-25.53	-
4	1.543	0.20	26.74	-	26.94	-	56.00	46.00	-29.06	-
5	12.762	0.55	33.96	-	34.51	-	60.00	50.00	-25.49	-
6	19.828	0.56	33.64	-	34.20	-	60.00	50.00	-25.80	-

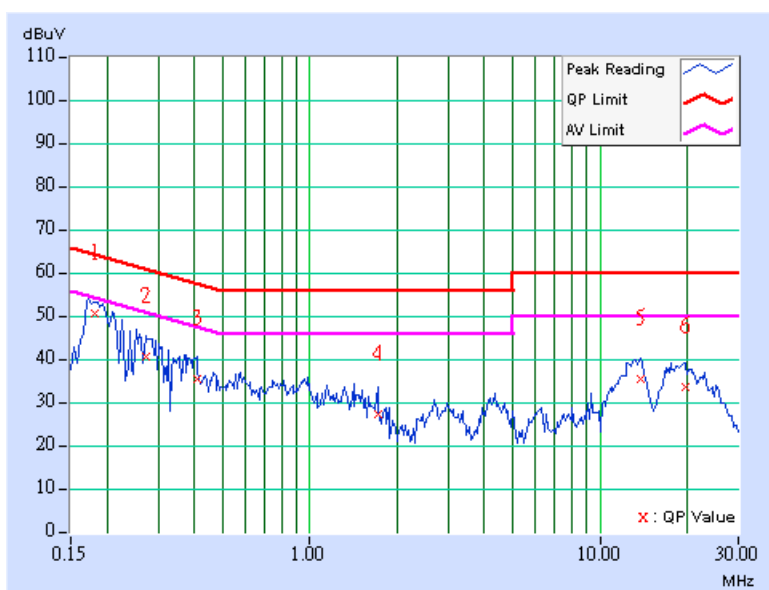
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 11	PHASE	Line 1
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	7.2Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
			1	0.181	0.10	50.06	-	50.16	-	64.44
2	0.271	0.10	40.35	-	40.45	-	61.08	51.08	-20.63	-
3	0.408	0.10	34.89	-	34.99	-	57.69	47.69	-22.70	-
4	1.711	0.17	26.83	-	27.00	-	56.00	46.00	-29.00	-
5	13.820	0.57	35.08	-	35.65	-	60.00	50.00	-24.35	-
6	19.609	0.57	33.07	-	33.64	-	60.00	50.00	-26.36	-

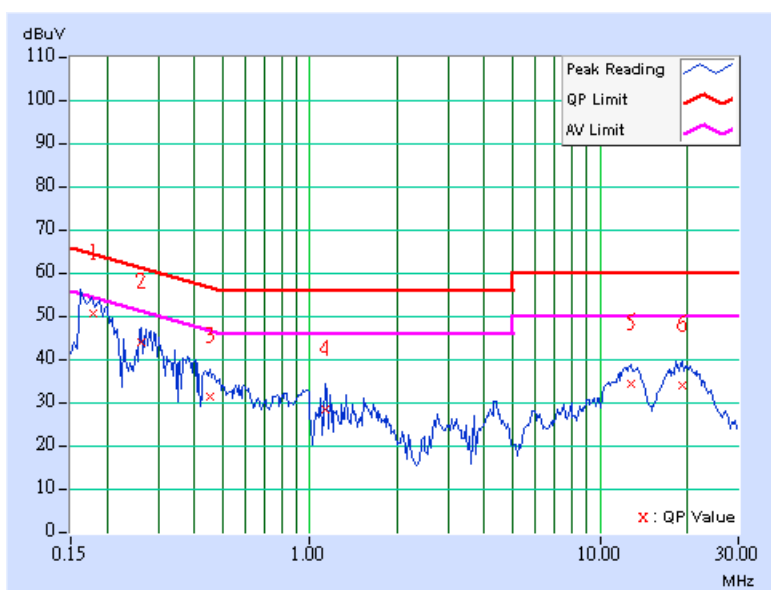
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 11	PHASE	Line 2
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	7.2Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
			1	0.178	0.10	50.27	-	50.37	-	64.57
2	0.263	0.10	43.34	-	43.44	-	61.33	51.33	-17.89	-
3	0.455	0.11	30.76	-	30.87	-	56.79	46.79	-25.92	-
4	1.137	0.20	27.98	-	28.18	-	56.00	46.00	-27.82	-
5	12.742	0.55	33.84	-	34.39	-	60.00	50.00	-25.61	-
6	19.168	0.57	33.59	-	34.16	-	60.00	50.00	-25.84	-

- 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.

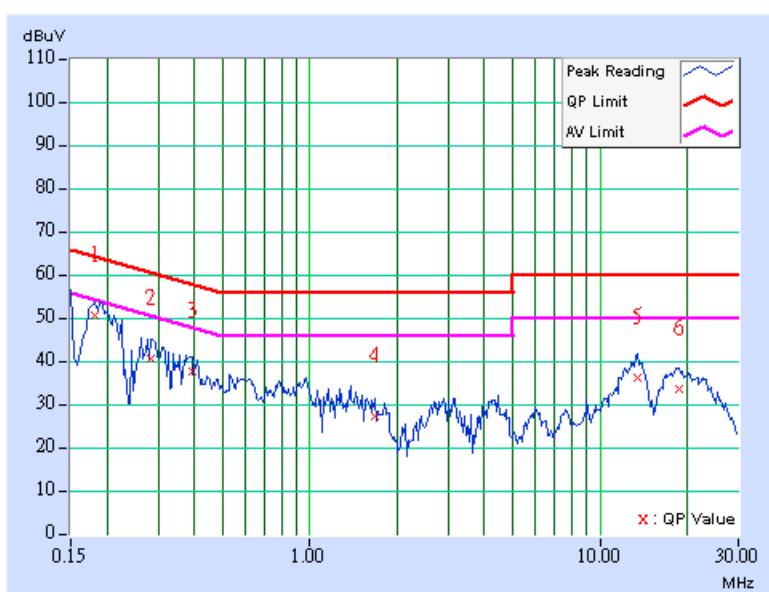


### DRAFT 802.11n (40MHz) OFDM MODULATION: DUAL TX

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	PHASE	Line 1
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	15.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.181	0.10	50.26	-	50.36	-	64.43	54.43	-14.07	-
2	0.283	0.10	40.07	-	40.17	-	60.73	50.73	-20.56	-
3	0.392	0.10	37.08	-	37.18	-	58.02	48.02	-20.84	-
4	1.688	0.17	26.99	-	27.16	-	56.00	46.00	-28.84	-
5	13.438	0.55	35.79	-	36.34	-	60.00	50.00	-23.66	-
6	18.781	0.58	33.23	-	33.81	-	60.00	50.00	-26.19	-

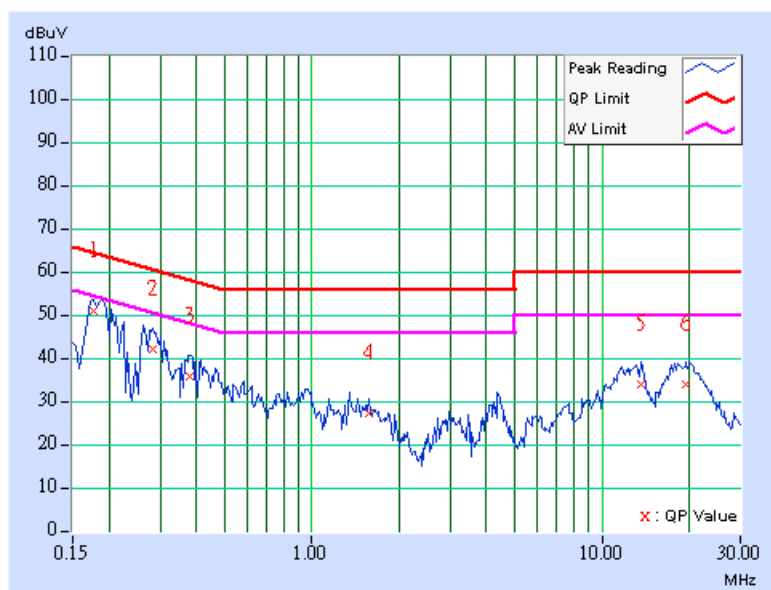
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	PHASE	Line 2
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	15.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.177	0.10	50.45	-	50.55	-	64.61	54.61	-14.06	-
2	0.283	0.10	41.76	-	41.86	-	60.73	50.73	-18.87	-
3	0.380	0.10	35.43	-	35.53	-	58.27	48.27	-22.74	-
4	1.574	0.20	26.92	-	27.12	-	56.00	46.00	-28.88	-
5	13.578	0.58	33.63	-	34.21	-	60.00	50.00	-25.79	-
6	19.570	0.57	33.52	-	34.09	-	60.00	50.00	-25.91	-

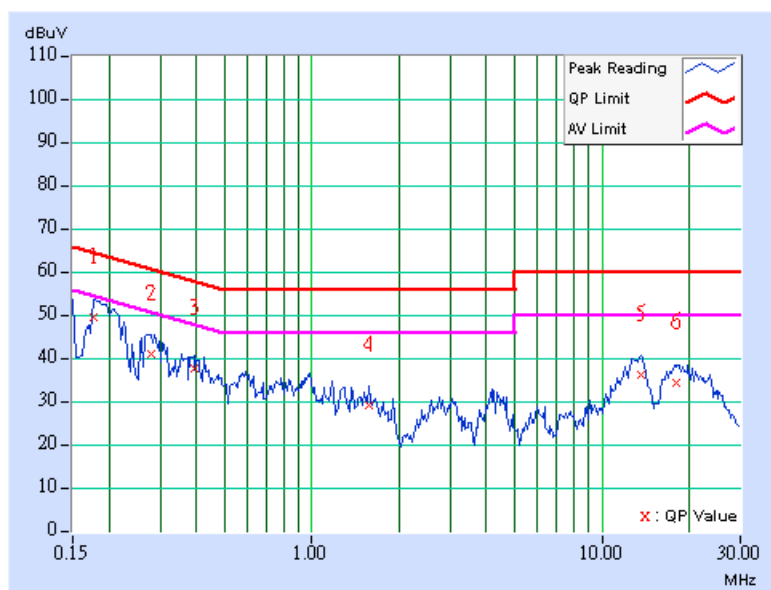
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 4	PHASE	Line 1
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	15.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.177	0.10	49.04	-	49.14	-	64.61	54.61	-15.47	-
2	0.279	0.10	40.43	-	40.53	-	60.85	50.85	-20.32	-
3	0.392	0.10	37.20	-	37.30	-	58.02	48.02	-20.72	-
4	1.582	0.16	28.77	-	28.93	-	56.00	46.00	-27.07	-
5	13.637	0.56	35.57	-	36.13	-	60.00	50.00	-23.87	-
6	18.145	0.59	33.74	-	34.33	-	60.00	50.00	-25.67	-

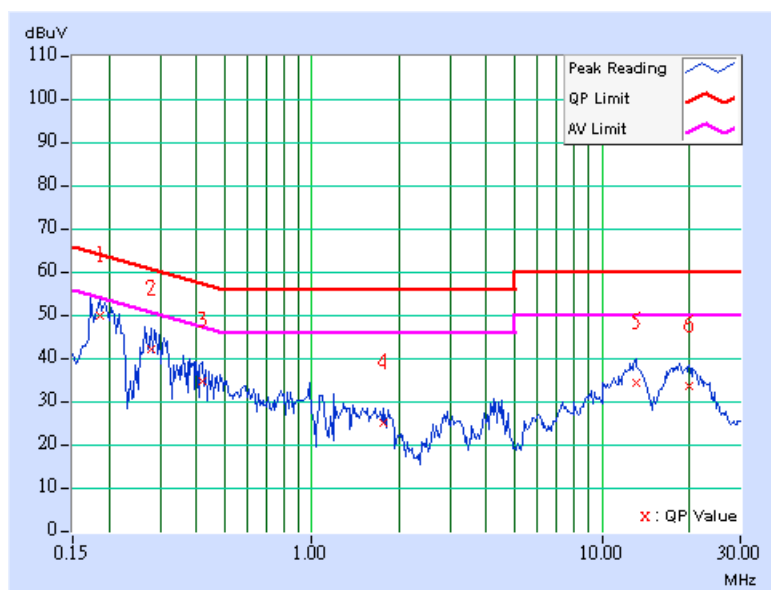
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 4	PHASE	Line 2
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	15.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.185	0.10	49.50	-	49.60	-	64.25	54.25	-14.65	-
2	0.279	0.10	41.55	-	41.65	-	60.85	50.85	-19.20	-
3	0.420	0.10	34.40	-	34.50	-	57.46	47.46	-22.95	-
4	1.766	0.20	24.51	-	24.71	-	56.00	46.00	-31.29	-
5	13.078	0.56	33.75	-	34.31	-	60.00	50.00	-25.69	-
6	19.949	0.56	33.06	-	33.62	-	60.00	50.00	-26.38	-

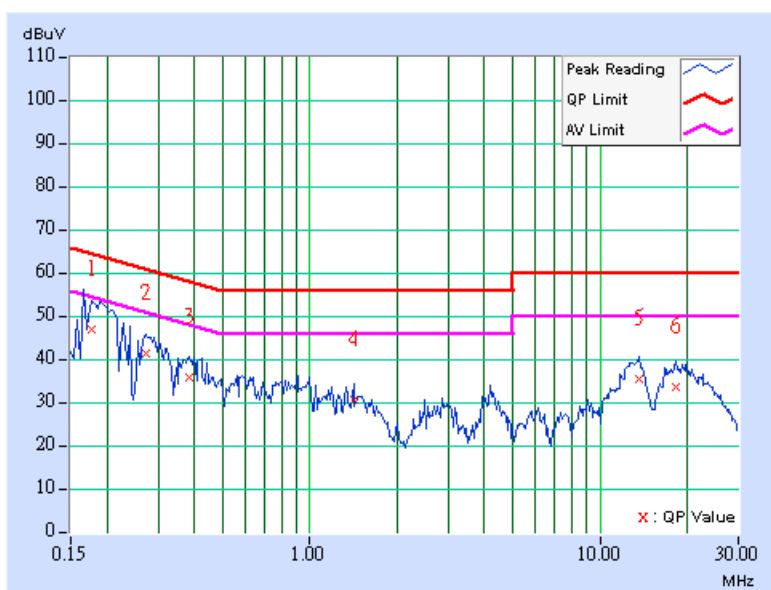
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 7	PHASE	Line 1
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	15.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
			1	0.177	0.10	46.44	-	46.54	-	64.62
2	0.271	0.10	41.08	-	41.18	-	61.08	51.08	-19.90	-
3	0.384	0.10	35.17	-	35.27	-	58.18	48.18	-22.91	-
4	1.418	0.14	30.20	-	30.34	-	56.00	46.00	-25.66	-
5	13.719	0.56	35.01	-	35.57	-	60.00	50.00	-24.43	-
6	18.172	0.59	33.22	-	33.81	-	60.00	50.00	-26.19	-

- 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.

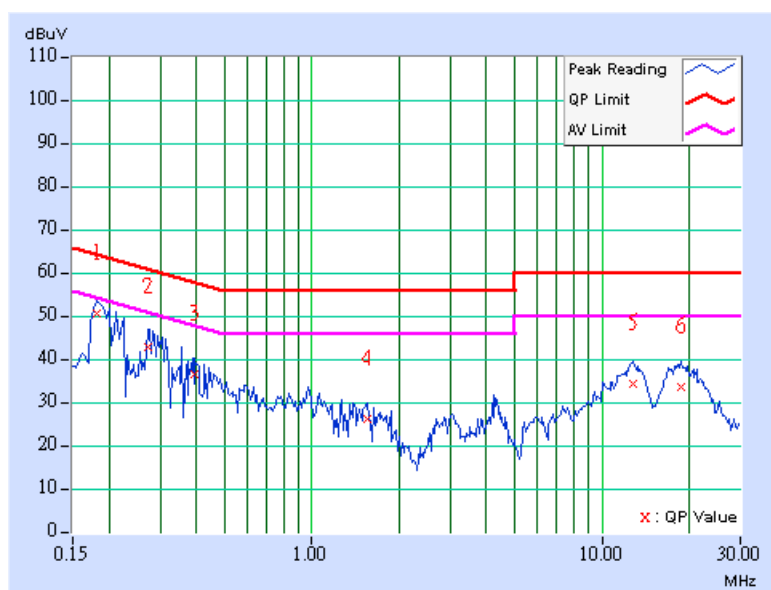




EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 7	PHASE	Line 2
MODULATION TYPE	BPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	15.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
			1	0.181	0.10	50.08	-	50.18	-	64.43
2	0.271	0.10	42.54	-	42.64	-	61.08	51.08	-18.44	-
3	0.396	0.10	35.93	-	36.03	-	57.93	47.93	-21.90	-
4	1.547	0.20	25.61	-	25.81	-	56.00	46.00	-30.19	-
5	12.867	0.56	33.73	-	34.29	-	60.00	50.00	-25.71	-
6	18.805	0.58	33.11	-	33.69	-	60.00	50.00	-26.31	-

- 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.

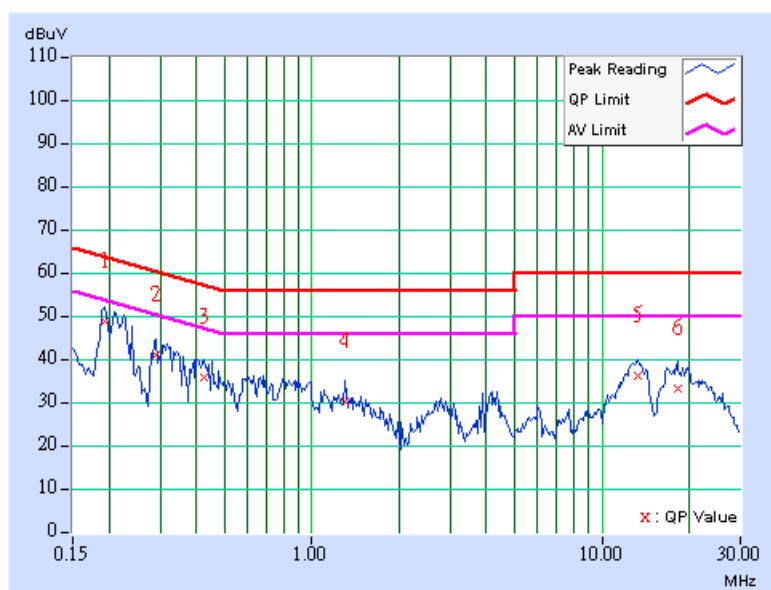


### 802.11b (CB mode) DSSS MODULATION: DUAL TX

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	PHASE	Line 1
MODULATION TYPE	DBPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	1.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.193	0.10	48.45	-	48.55	-	63.91	53.91	-15.36	-
2	0.291	0.10	40.49	-	40.59	-	60.51	50.51	-19.92	-
3	0.423	0.10	35.44	-	35.54	-	57.38	47.38	-21.84	-
4	1.305	0.13	29.71	-	29.84	-	56.00	46.00	-26.16	-
5	13.367	0.54	35.53	-	36.07	-	60.00	50.00	-23.93	-
6	18.184	0.59	32.93	-	33.52	-	60.00	50.00	-26.48	-

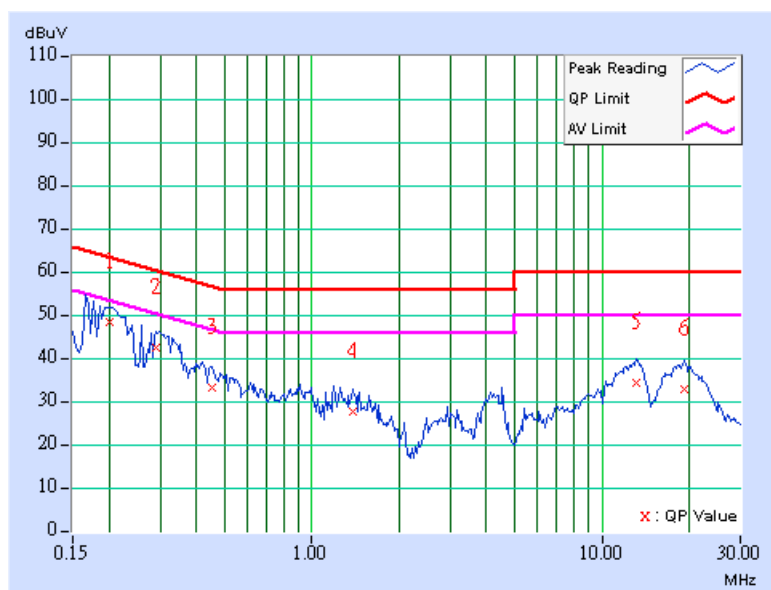
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	PHASE	Line 2
MODULATION TYPE	DBPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	1.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.201	0.10	48.07	-	48.17	-	63.55	53.55	-15.38	-
2	0.291	0.10	41.85	-	41.95	-	60.51	50.51	-18.56	-
3	0.451	0.11	32.79	-	32.90	-	56.86	46.86	-23.96	-
4	1.383	0.20	27.03	-	27.23	-	56.00	46.00	-28.77	-
5	13.137	0.57	33.90	-	34.47	-	60.00	50.00	-25.53	-
6	19.160	0.57	32.39	-	32.96	-	60.00	50.00	-27.04	-

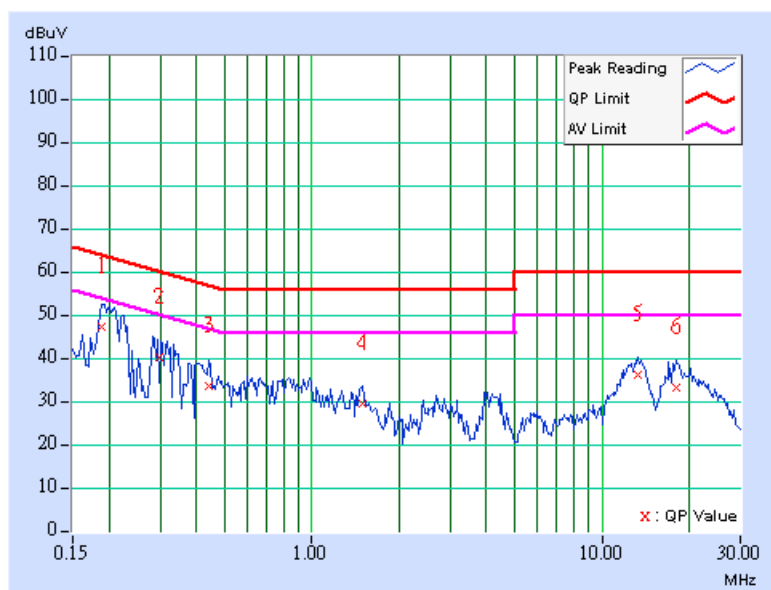
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 4	PHASE	Line 1
MODULATION TYPE	DBPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	1.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.189	0.10	46.70	-	46.80	-	64.08	54.08	-17.28	-
2	0.298	0.10	39.72	-	39.82	-	60.30	50.30	-20.48	-
3	0.439	0.10	33.22	-	33.32	-	57.08	47.08	-23.76	-
4	1.500	0.15	29.00	-	29.15	-	56.00	46.00	-26.85	-
5	13.262	0.54	35.66	-	36.20	-	60.00	50.00	-23.80	-
6	18.129	0.59	32.83	-	33.42	-	60.00	50.00	-26.58	-

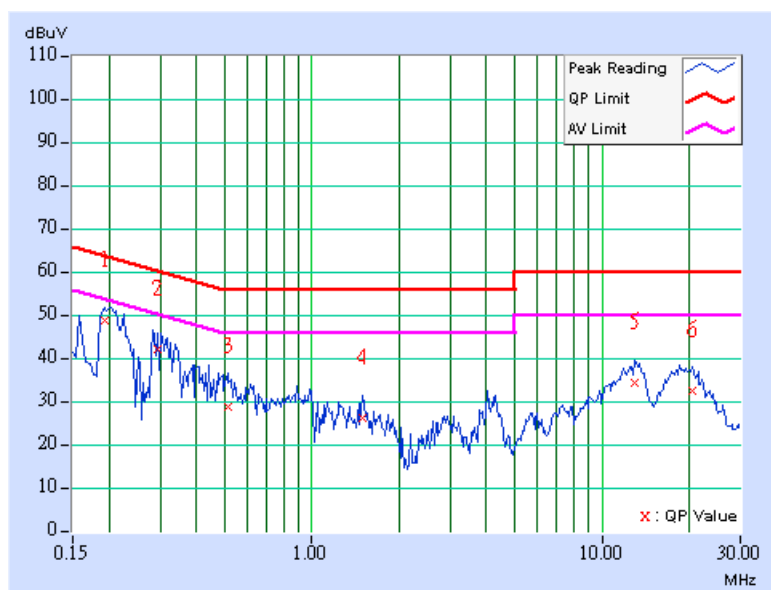
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 4	PHASE	Line 2
MODULATION TYPE	DBPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	1.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.193	0.10	48.33	-	48.43	-	63.91	53.91	-15.48	-
2	0.296	0.10	41.75	-	41.85	-	60.37	50.37	-18.52	-
3	0.513	0.12	28.23	-	28.35	-	56.00	46.00	-27.65	-
4	1.496	0.20	25.89	-	26.09	-	56.00	46.00	-29.91	-
5	12.938	0.56	33.85	-	34.41	-	60.00	50.00	-25.59	-
6	20.488	0.59	32.15	-	32.74	-	60.00	50.00	-27.26	-

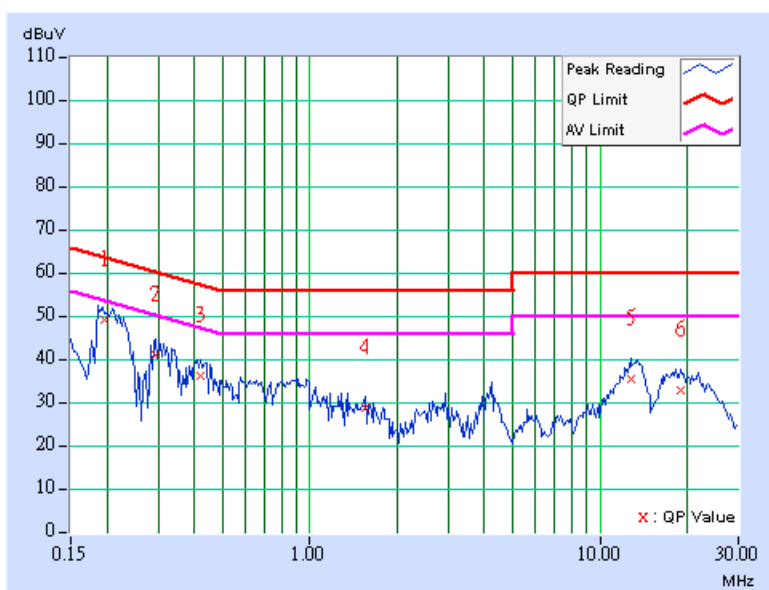
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 7	PHASE	Line 1
MODULATION TYPE	DBPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	1.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.197	0.10	48.86	-	48.96	-	63.75	53.75	-14.79	-
2	0.295	0.10	40.69	-	40.79	-	60.40	50.40	-19.61	-
3	0.420	0.10	35.65	-	35.75	-	57.46	47.46	-21.71	-
4	1.563	0.16	28.39	-	28.55	-	56.00	46.00	-27.45	-
5	12.785	0.51	34.92	-	35.43	-	60.00	50.00	-24.57	-
6	19.094	0.57	32.36	-	32.93	-	60.00	50.00	-27.07	-

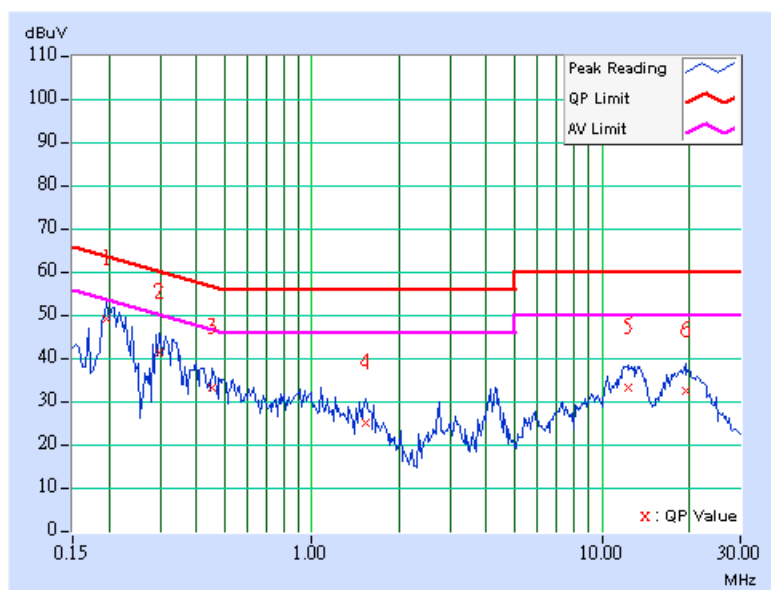
- REMARKS:**
1. Q.P. and AV. are abbreviations of quasi-peak and average individually.
  2. "-": The Quasi-peak reading value also meets average limit and measurement with the average detector is unnecessary.
  3. The emission levels of other frequencies were very low against the limit.
  4. Margin value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



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 7	PHASE	Line 2
MODULATION TYPE	DBPSK	6dB BANDWIDTH	9 kHz
TRANSFER RATE	1.0Mbps	INPUT POWER (SYSTEM)	120Vac, 60 Hz
ENVIRONMENTAL CONDITIONS	20deg. C, 60%RH, 991hPa	TESTED BY	Match Tsui

No	Freq. [MHz]	Corr. Factor (dB)	Reading Value [dB (uV)]		Emission Level [dB (uV)]		Limit [dB (uV)]		Margin (dB)	
			Q.P.	AV.	Q.P.	AV.	Q.P.	AV.	Q.P.	AV.
1	0.197	0.10	48.64	-	48.74	-	63.74	53.74	-15.00	-
2	0.298	0.10	40.96	-	41.06	-	60.29	50.29	-19.23	-
3	0.451	0.11	32.69	-	32.80	-	56.86	46.86	-24.06	-
4	1.543	0.20	24.79	-	24.99	-	56.00	46.00	-31.01	-
5	12.320	0.54	32.78	-	33.32	-	60.00	50.00	-26.68	-
6	19.359	0.57	32.07	-	32.64	-	60.00	50.00	-27.36	-

- 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	838496/016	Jan. 01, 2007
Spectrum Analyzer ROHDE & SCHWARZ	FSP40	100041	Dec. 04, 2006
BILOG Antenna SCHWARZBECK	VULB9168	9168-155	Jan. 15, 2007
HORN Antenna SCHWARZBECK	BBHA 9120D	9120D-404	Jan. 01, 2007
HORN Antenna SCHWARZBECK	BBHA 9170	BBHA9170242	Jan. 19, 2007
Preamplifier Agilent	8449B	3008A01960	Nov. 09, 2006
RF signal cable HUBER+SUHNNER	SUCOFLEX 104	219268/4	Dec. 20, 2006
RF signal cable HUBER+SUHNNER	SUCOFLEX 104	230129/4	Dec. 20, 2006
Software ADT.	ADT_Radiated_V5.14	NA	NA
Antenna Tower inn-co GmbH	MA 4000	010303	NA
Antenna Tower Controller inn-co GmbH	CO2000	019303	NA
Turn Table ADT.	TT100.	TT93021704	NA
Turn Table Controller ADT.	SC100.	SC93021704	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 3.
  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 IC4924-4.

#### 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 meters 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 lower than the limit specified, then testing could be stopped and the peak values of the EUT would be reported. Otherwise the emissions would be re-tested one by one using peak, quasi-peak or average method as specified and then reported in a data sheet.

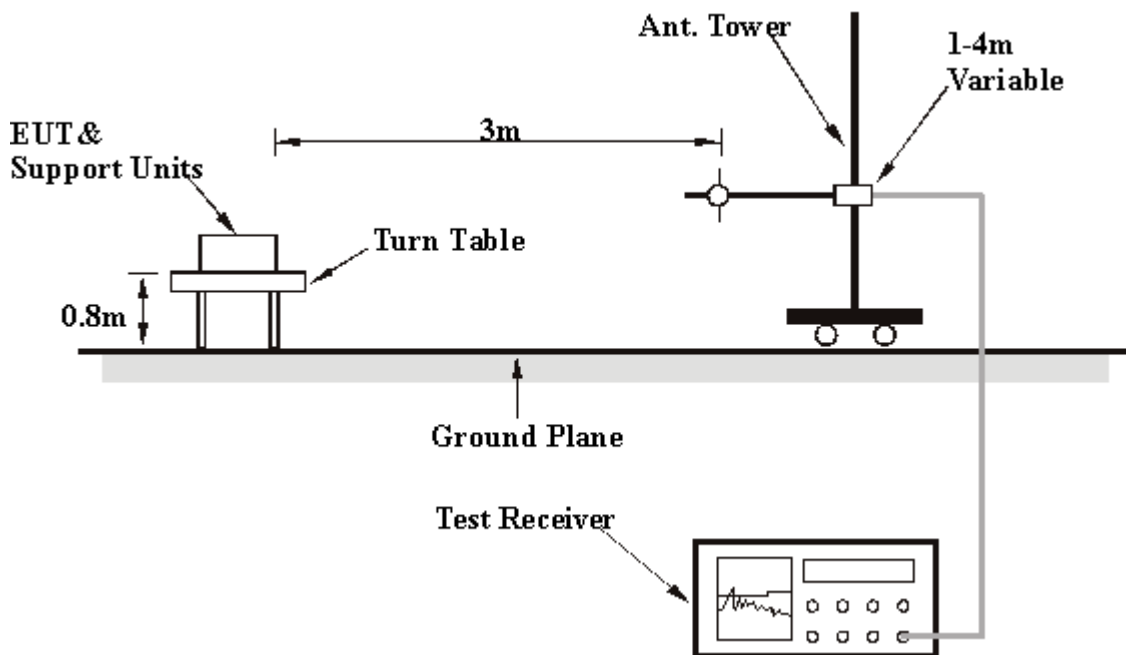
**NOTE:**

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 of test receiver/spectrum analyzer is 1 MHz and video bandwidth is 3MHz for Peak detection at frequency above 1GHz
3. The resolution bandwidth of test receiver/spectrum analyzer is 1MHz and the video bandwidth is 10Hz 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

### BELOW 1GHz WORST-CASE DATA TEST MODE A (POWERED FROM HOST EQUIPMENT) 802.11g OFDM MODULATION: DUAL TX

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	Below 1000MHz
MODULATION TYPE	BPSK for 802.11g	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	6.0Mbps	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	26deg. C, 61%RH, 991hPa	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	234.11	36.84 QP	46.00	-9.16	1.25 H	13	24.94	11.91
2	383.79	34.07 QP	46.00	-11.93	1.00 H	169	16.82	17.25
3	480.98	36.31 QP	46.00	-9.69	1.00 H	67	16.84	19.47
4	527.64	36.45 QP	46.00	-9.55	1.25 H	142	15.92	20.53
5	805.61	39.32 QP	46.00	-6.68	1.00 H	139	13.14	26.18
6	961.12	37.55 QP	54.00	-16.45	1.00 H	25	8.01	29.55

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	234.11	31.05 QP	46.00	-14.95	1.00 V	298	19.15	11.91
2	480.98	37.70 QP	46.00	-8.30	1.00 V	310	18.23	19.47
3	527.64	33.52 QP	46.00	-12.48	1.00 V	268	12.99	20.53
4	803.67	42.08 QP	46.00	-3.92	1.00 V	307	15.93	26.15
5	898.92	32.40 QP	46.00	-13.60	1.50 V	43	4.96	27.43
6	961.12	37.15 QP	54.00	-16.85	1.00 V	313	7.61	29.55

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB/m)
  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.

**DRAFT 802.11n (20MHz) OFDM MODULATION: DUAL TX**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	Below 1000MHz
MODULATION TYPE	BPSK for draft 802.11n (20MHz)	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	7.2Mbps	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	26deg. C, 61%RH, 991hPa	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	234.11	37.51 QP	46.00	-8.49	2.00 H	31	25.57	11.95
2	288.54	34.13 QP	46.00	-11.87	2.00 H	37	19.07	15.06
3	383.79	36.14 QP	46.00	-9.86	2.00 H	52	18.74	17.40
4	440.16	35.41 QP	46.00	-10.59	2.00 H	61	16.65	18.75
5	479.04	44.32 QP	46.00	-1.68	2.00 H	25	24.72	19.60
6	492.65	35.10 QP	46.00	-10.90	2.00 H	61	15.20	19.90
7	652.04	34.80 QP	46.00	-11.20	2.00 H	37	11.73	23.07
8	797.84	39.46 QP	46.00	-6.54	2.00 H	61	13.48	25.99
9	879.48	43.83 QP	46.00	-2.17	1.00 H	85	16.92	26.91
10	951.40	42.31 QP	46.00	-3.69	2.00 H	67	12.92	29.39

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	479.04	39.75 QP	46.00	-6.25	1.00 V	295	20.15	19.60
2	492.65	37.49 QP	46.00	-8.51	1.00 V	139	17.59	19.90
3	527.64	35.75 QP	46.00	-10.25	1.00 V	145	15.07	20.67
4	652.04	37.15 QP	46.00	-8.85	1.00 V	157	14.07	23.07
5	657.88	35.12 QP	46.00	-10.88	1.00 V	139	11.91	23.20
6	801.72	34.64 QP	46.00	-11.36	1.00 V	325	8.62	26.02
7	879.48	42.74 QP	46.00	-3.26	1.00 V	145	15.83	26.91
8	947.52	42.98 QP	46.00	-3.02	1.00 V	157	13.68	29.30

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB/m)
  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.

**DRAFT 802.11n (40MHz) OFDM MODULATION: DUAL TX**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	Below 1000MHz
MODULATION TYPE	BPSK for draft 802.11n (40MHz)	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	15.0Mbps	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	26deg. C, 61%RH, 991hPa	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	234.11	37.88 QP	46.00	-8.12	1.00 H	67	25.94	11.95
2	383.79	36.34 QP	46.00	-9.66	2.00 H	43	18.94	17.40
3	440.16	36.17 QP	46.00	-9.83	1.00 H	28	17.42	18.75
4	479.04	43.73 QP	46.00	-2.27	2.00 H	58	24.13	19.60
5	492.65	36.27 QP	46.00	-9.73	2.00 H	46	16.37	19.90
6	797.84	41.18 QP	46.00	-4.82	1.00 H	28	15.19	25.99
7	879.48	42.91 QP	46.00	-3.09	1.00 H	16	15.99	26.91
8	953.35	40.96 QP	46.00	-5.04	1.00 H	28	11.61	29.34

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	479.04	39.98 QP	46.00	-6.02	1.00 V	349	20.38	19.60
2	492.65	37.50 QP	46.00	-8.50	1.00 V	31	17.60	19.90
3	527.64	35.43 QP	46.00	-10.57	1.00 V	199	14.76	20.67
4	652.04	36.36 QP	46.00	-9.64	1.00 V	358	13.29	23.07
5	657.88	34.29 QP	46.00	-11.71	1.00 V	31	11.08	23.20
6	803.67	34.72 QP	46.00	-11.28	1.00 V	349	8.67	26.05
7	879.48	42.59 QP	46.00	-3.41	1.00 V	199	15.68	26.91
8	953.35	42.70 QP	46.00	-3.30	1.00 V	118	13.36	29.34

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB/m)
  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.



**802.11b (CB mode) DSSS MODULATION: DUAL TX**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	Below 1000MHz
MODULATION TYPE	DBPSK for 802.11b (CB mode)	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	1.0Mbps	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	26deg. C, 61%RH, 991hPa	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	234.11	37.93 QP	46.00	-8.07	1.00 H	328	25.98	11.95
2	383.79	36.04 QP	46.00	-9.96	1.00 H	58	18.64	17.40
3	440.16	36.01 QP	46.00	-9.99	2.00 H	79	17.25	18.75
4	479.04	44.11 QP	46.00	-1.89	2.50 H	10	24.51	19.60
5	492.65	36.91 QP	46.00	-9.09	2.00 H	73	17.01	19.90
6	797.84	40.14 QP	46.00	-5.86	2.00 H	79	14.16	25.99
7	879.48	41.33 QP	46.00	-4.67	2.00 H	4	14.41	26.91
8	951.40	41.30 QP	46.00	-4.70	2.00 H	250	11.91	29.39

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	479.04	39.97 QP	46.00	-6.03	1.00 V	25	20.37	19.60
2	492.65	37.57 QP	46.00	-8.43	1.00 V	199	17.67	19.90
3	527.64	35.75 QP	46.00	-10.25	1.00 V	163	15.07	20.67
4	650.10	37.55 QP	46.00	-8.45	1.00 V	22	14.52	23.03
5	657.88	34.24 QP	46.00	-11.76	1.00 V	199	11.04	23.20
6	803.67	34.65 QP	46.00	-11.35	1.00 V	25	8.60	26.05
7	879.48	42.75 QP	46.00	-3.25	1.00 V	163	15.83	26.91
8	947.52	41.53 QP	46.00	-4.47	1.00 V	175	12.23	29.30

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB/m)
  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.



**TEST MODE B (POWERED FROM HOST EQUIPMENT VIA USB CABLE)**

**802.11g OFDM MODULATION: DUAL TX**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	Below 1000MHz
MODULATION TYPE	BPSK for 802.11g	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	6.0Mbps	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	26deg. C, 61%RH, 991hPa	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	133.03	33.92 QP	43.50	-9.58	2.50 H	19	21.39	12.53
2	191.34	34.18 QP	43.50	-9.32	1.00 H	319	22.76	11.41
3	234.11	35.04 QP	46.00	-10.96	1.50 H	13	23.09	11.95
4	288.54	35.67 QP	46.00	-10.33	2.00 H	304	20.61	15.06
5	479.04	40.62 QP	46.00	-5.38	2.00 H	49	21.02	19.60
6	492.65	35.63 QP	46.00	-10.37	2.00 H	58	15.73	19.90
7	803.67	41.81 QP	46.00	-4.19	2.00 H	49	15.76	26.05
8	879.48	43.09 QP	46.00	-2.91	2.00 H	100	16.18	26.91
9	945.57	42.34 QP	46.00	-3.66	1.50 H	13	13.13	29.21

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	480.98	36.49 QP	46.00	-9.51	1.00 V	325	16.84	19.64
2	492.65	35.81 QP	46.00	-10.19	1.00 V	286	15.91	19.90
3	652.04	35.13 QP	46.00	-10.87	2.00 V	145	12.05	23.07
4	797.84	37.27 QP	46.00	-8.73	1.00 V	112	11.28	25.99
5	879.48	43.85 QP	46.00	-2.15	1.50 V	160	16.93	26.91
6	947.52	43.70 QP	46.00	-2.30	1.00 V	160	14.40	29.30

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB/m)
  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.



**DRAFT 802.11n (20MHz) OFDM MODULATION: DUAL TX**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	Below 1000MHz
MODULATION TYPE	BPSK for draft 802.11n (20MHz)	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	7.2Mbps	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	26deg. C, 61%RH, 991hPa	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	133.03	33.65 QP	43.50	-9.85	2.00 H	31	21.13	12.53
2	191.34	33.84 QP	43.50	-9.66	1.00 H	94	22.43	11.41
3	234.11	34.76 QP	46.00	-11.24	1.00 H	16	22.82	11.95
4	288.54	36.08 QP	46.00	-9.92	1.50 H	127	21.02	15.06
5	300.20	37.01 QP	46.00	-8.99	1.00 H	16	21.39	15.62
6	432.38	34.04 QP	46.00	-11.96	1.00 H	16	15.44	18.59
7	479.04	40.92 QP	46.00	-5.08	2.00 H	64	21.32	19.60
8	492.65	37.46 QP	46.00	-8.54	2.00 H	1	17.56	19.90
9	797.84	42.17 QP	46.00	-3.83	2.00 H	358	16.18	25.99
10	879.48	44.16 QP	46.00	-1.84	1.00 H	64	17.24	26.91
11	951.40	42.59 QP	46.00	-3.41	1.50 H	61	13.21	29.39

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	479.04	36.48 QP	46.00	-9.52	1.00 V	301	16.88	19.60
2	492.65	35.60 QP	46.00	-10.40	1.00 V	127	15.70	19.90
3	657.88	34.12 QP	46.00	-11.88	1.00 V	127	10.91	23.20
4	803.67	36.97 QP	46.00	-9.03	1.00 V	301	10.92	26.05
5	879.48	44.12 QP	46.00	-1.88	1.00 V	136	17.21	26.91
6	951.40	42.42 QP	46.00	-3.58	1.00 V	145	13.04	29.39

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB/m)
  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.

**DRAFT 802.11n (40MHz) OFDM MODULATION: DUAL TX**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	Below 1000MHz
MODULATION TYPE	BPSK for draft 802.11n (40MHz)	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	15.0Mbps	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	26deg. C, 61%RH, 991hPa	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	133.03	34.37 QP	43.50	-9.13	1.50 H	67	21.85	12.53
2	191.34	34.75 QP	43.50	-8.75	2.00 H	85	23.34	11.41
3	234.11	35.19 QP	46.00	-10.81	1.00 H	91	23.24	11.95
4	288.54	35.60 QP	46.00	-10.40	1.00 H	67	20.54	15.06
5	383.79	34.44 QP	46.00	-11.56	2.00 H	67	17.04	17.40
6	480.98	40.91 QP	46.00	-5.09	1.50 H	337	21.27	19.64
7	492.65	37.64 QP	46.00	-8.36	2.00 H	22	17.73	19.90
8	657.88	34.93 QP	46.00	-11.07	2.00 H	22	11.72	23.20
9	803.67	43.25 QP	46.00	-2.75	2.50 H	16	17.21	26.05
10	879.48	43.73 QP	46.00	-2.27	2.50 H	91	16.81	26.91
11	953.35	41.00 QP	46.00	-5.00	2.50 H	19	11.66	29.34

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	490.70	37.37 QP	46.00	-8.63	1.00 V	355	17.51	19.86
2	492.65	37.48 QP	46.00	-8.52	1.00 V	112	17.58	19.90
3	652.04	35.57 QP	46.00	-10.43	1.50 V	187	12.50	23.07
4	797.84	37.12 QP	46.00	-8.88	1.00 V	151	11.13	25.99
5	879.48	43.33 QP	46.00	-2.67	1.00 V	136	16.41	26.91
6	951.40	42.57 QP	46.00	-3.43	1.00 V	121	13.19	29.39

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB/m)
  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.

**802.11b (CB mode) DSSS MODULATION: DUAL TX**

EUT TEST CONDITION		MEASUREMENT DETAIL	
<b>CHANNEL</b>	Channel 1	<b>FREQUENCY RANGE</b>	Below 1000MHz
<b>MODULATION TYPE</b>	DBPSK for 802.11b (CB mode)	<b>INPUT POWER (SYSTEM)</b>	120Vac, 60 Hz
<b>TRANSFER RATE</b>	1.0Mbps	<b>DETECTOR FUNCTION</b>	Quasi-Peak
<b>ENVIRONMENTAL CONDITIONS</b>	26deg. C, 61%RH, 991hPa	<b>TESTED BY</b>	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	133.03	33.77 QP	43.50	-9.73	2.00 H	49	21.24	12.53
2	191.34	34.12 QP	43.50	-9.38	2.00 H	115	22.71	11.41
3	234.11	34.62 QP	46.00	-11.38	1.00 H	85	22.68	11.95
4	288.54	35.61 QP	46.00	-10.39	2.00 H	334	20.55	15.06
5	480.98	40.87 QP	46.00	-5.13	2.50 H	22	21.23	19.64
6	492.65	36.95 QP	46.00	-9.05	2.50 H	40	17.05	19.90
7	797.84	42.85 QP	46.00	-3.15	2.00 H	64	16.86	25.99
8	879.48	43.88 QP	46.00	-2.12	2.00 H	46	16.97	26.91
9	953.35	43.51 QP	46.00	-2.49	2.00 H	64	14.17	29.34

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	488.76	37.73 QP	46.00	-8.27	1.50 V	169	17.91	19.81
2	492.65	37.71 QP	46.00	-8.29	1.50 V	163	17.81	19.90
3	652.04	35.43 QP	46.00	-10.57	1.00 V	166	12.36	23.07
4	657.88	34.26 QP	46.00	-11.74	1.50 V	163	11.06	23.20
5	803.67	38.17 QP	46.00	-7.83	1.00 V	301	12.12	26.05
6	904.75	42.78 QP	46.00	-3.22	1.00 V	166	15.48	27.30
7	947.52	42.49 QP	46.00	-3.51	1.00 V	151	13.19	29.30

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB/m)
  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.



**TEST MODE C (POWERED FROM HOST EQUIPMENT VIA CRADLE)**

**802.11g OFDM MODULATION: DUAL TX**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	Below 1000MHz
MODULATION TYPE	BPSK for 802.11g	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	6.0Mbps	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	26deg. C, 61%RH, 991hPa	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	234.11	36.80 QP	46.00	-9.20	1.00 H	7	24.85	11.95
2	288.54	41.41 QP	46.00	-4.59	1.00 H	7	26.35	15.06
3	383.79	36.05 QP	46.00	-9.95	2.00 H	136	18.65	17.40
4	479.04	36.99 QP	46.00	-9.01	2.50 H	73	17.39	19.60
5	803.67	38.43 QP	46.00	-7.57	2.50 H	73	12.39	26.05
6	879.48	41.93 QP	46.00	-4.07	1.00 H	7	15.02	26.91
7	947.52	42.40 QP	46.00	-3.60	1.00 H	10	13.10	29.30

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	288.54	37.35 QP	46.00	-8.65	1.00 V	319	22.29	15.06
2	479.04	38.70 QP	46.00	-7.30	1.00 V	130	19.11	19.60
3	492.65	35.60 QP	46.00	-10.40	1.00 V	157	15.70	19.90
4	805.61	37.50 QP	46.00	-8.50	1.00 V	115	11.43	26.07
5	879.48	44.60 QP	46.00	-1.40	1.00 V	157	17.68	26.91
6	908.64	38.70 QP	46.00	-7.30	1.00 V	157	11.22	27.48
7	953.35	42.90 QP	46.00	-3.10	1.00 V	136	13.56	29.34

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB/m)
  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.



**DRAFT 802.11n (20MHz) OFDM MODULATION: DUAL TX**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	Below 1000MHz
MODULATION TYPE	BPSK for draft 802.11n (20MHz)	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	7.2Mbps	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	26deg. C, 61%RH, 991hPa	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	234.11	36.30 QP	46.00	-9.70	1.00 H	187	24.36	11.95
2	288.54	41.53 QP	46.00	-4.47	2.00 H	49	26.47	15.06
3	383.79	35.93 QP	46.00	-10.07	2.00 H	133	18.53	17.40
4	479.04	36.44 QP	46.00	-9.56	2.00 H	151	16.84	19.60
5	797.84	39.96 QP	46.00	-6.04	2.00 H	49	13.98	25.99
6	879.48	42.95 QP	46.00	-3.05	1.00 H	217	16.04	26.91
7	953.35	42.64 QP	46.00	-3.36	2.00 H	49	13.29	29.34

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	288.54	38.33 QP	46.00	-7.67	1.50 V	343	23.27	15.06
2	479.04	38.19 QP	46.00	-7.81	1.00 V	145	18.60	19.60
3	492.65	35.21 QP	46.00	-10.79	1.00 V	169	15.31	19.90
4	795.89	37.66 QP	46.00	-8.34	1.00 V	136	11.68	25.98
5	879.48	42.33 QP	46.00	-3.67	1.00 V	127	15.42	26.91
6	908.64	35.52 QP	46.00	-10.48	1.00 V	169	8.04	27.48
7	953.35	42.85 QP	46.00	-3.15	1.00 V	127	13.51	29.34

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB/m)
  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.



**DRAFT 802.11n (40MHz) OFDM MODULATION: DUAL TX**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	Below 1000MHz
MODULATION TYPE	BPSK for draft 802.11n (40MHz)	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	15.0Mbps	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	26deg. C, 61%RH, 991hPa	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	234.11	37.22 QP	46.00	-8.78	1.00 H	331	25.28	11.95
2	288.54	41.22 QP	46.00	-4.78	1.50 H	16	26.16	15.06
3	383.79	36.42 QP	46.00	-9.58	2.00 H	109	19.02	17.40
4	480.98	37.12 QP	46.00	-8.88	2.00 H	148	17.48	19.64
5	803.67	38.71 QP	46.00	-7.29	2.00 H	115	12.67	26.05
6	879.48	42.71 QP	46.00	-3.29	2.00 H	55	15.80	26.91
7	953.35	42.45 QP	46.00	-3.55	2.00 H	79	13.11	29.34

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	288.54	37.85 QP	46.00	-8.15	1.00 V	340	22.79	15.06
2	383.79	33.66 QP	46.00	-12.34	1.50 V	295	16.26	17.40
3	479.04	38.06 QP	46.00	-7.94	1.00 V	148	18.46	19.60
4	803.67	37.44 QP	46.00	-8.56	1.00 V	148	11.40	26.05
5	879.48	42.94 QP	46.00	-3.06	1.00 V	175	16.03	26.91
6	953.35	42.85 QP	46.00	-3.15	1.00 V	109	13.51	29.34

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB/m)
  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.

**802.11b (CB mode) DSSS MODULATION: DUAL TX**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	Below 1000MHz
MODULATION TYPE	DBPSK for 802.11b (CB mode)	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	1.0Mbps	DETECTOR FUNCTION	Quasi-Peak
ENVIRONMENTAL CONDITIONS	26deg. C, 61%RH, 991hPa	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	234.11	37.85 QP	46.00	-8.15	1.00 H	313	25.90	11.95
2	288.54	41.33 QP	46.00	-4.67	2.50 H	61	26.27	15.06
3	383.79	36.14 QP	46.00	-9.86	2.00 H	148	18.74	17.40
4	479.04	36.33 QP	46.00	-9.67	2.00 H	142	16.73	19.60
5	803.67	39.00 QP	46.00	-7.00	2.00 H	142	12.95	26.05
6	953.35	43.81 QP	46.00	-2.19	1.00 H	52	14.46	29.34

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	162.18	33.50 QP	43.50	-10.00	1.00 V	169	20.23	13.27
2	288.54	38.26 QP	46.00	-7.74	1.00 V	298	23.20	15.06
3	479.04	37.42 QP	46.00	-8.58	1.00 V	136	17.82	19.60
4	492.65	35.03 QP	46.00	-10.97	1.00 V	169	15.13	19.90
5	795.89	37.44 QP	46.00	-8.56	1.00 V	124	11.46	25.98
6	953.35	43.83 QP	46.00	-2.17	1.00 V	130	14.48	29.34

- REMARKS:**
1. Emission level(dBuV/m)=Raw Value(dBuV) + Correction Factor(dB/m)
  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.



**TEST MODE A (POWERED FROM HOST EQUIPMENT)  
802.11b DSSS MODULATION: DUAL TX**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	DBPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	1.0Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	2386.00	48.13 PK	74.00	-25.87	1.12 H	285	16.04	32.09
2	2386.00	38.05 AV	54.00	-15.95	1.12 H	285	5.96	32.09
3	*2412.00	93.62 PK			1.46 H	265	61.44	32.18
4	*2412.00	90.19 AV			1.46 H	265	58.01	32.18
5	4824.00	50.80 PK	74.00	-23.20	1.18 H	201	12.17	38.63
6	4824.00	43.65 AV	54.00	-10.35	1.18 H	201	5.02	38.63
7	7236.00	55.20 PK	74.00	-18.80	1.14 H	321	9.91	45.29
8	7236.00	43.28 AV	54.00	-10.72	1.14 H	321	-2.01	45.29

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	2386.00	59.29 PK	74.00	-14.71	1.16 V	278	27.20	32.09
2	2386.00	49.23 AV	54.00	-4.77	1.16 V	278	17.14	32.09
3	*2412.00	104.79 PK			1.16 V	278	72.61	32.18
4	*2412.00	101.24 AV			1.16 V	278	69.06	32.18
5	4824.00	56.64 PK	74.00	-17.36	1.08 V	16	18.01	38.63
6	4824.00	52.87 AV	54.00	-1.13	1.08 V	16	14.24	38.63
7	7236.00	58.88 PK	74.00	-15.12	1.00 V	12	13.59	45.29
8	7236.00	51.93 AV	54.00	-2.07	1.00 V	12	6.64	45.29

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 6	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	DBPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	1.0Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	*2437.00	94.25 PK			1.44 H	263	61.98	32.27
2	*2437.00	90.84 AV			1.44 H	263	58.57	32.27
3	4874.00	50.97 PK	74.00	-23.03	1.15 H	234	12.20	38.77
4	4874.00	43.86 AV	54.00	-10.14	1.15 H	234	5.09	38.77
5	7311.00	55.67 PK	74.00	-18.33	1.13 H	322	10.18	45.49
6	7311.00	43.75 AV	54.00	-10.25	1.13 H	322	-1.74	45.49

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	*2437.00	105.32 PK			1.15 V	279	73.05	32.27
2	*2437.00	101.85 AV			1.15 V	279	69.58	32.27
3	4874.00	56.26 PK	74.00	-17.74	1.43 V	110	17.49	38.77
4	4874.00	52.75 AV	54.00	-1.25	1.43 V	110	13.98	38.77
5	7311.00	60.35 PK	74.00	-13.65	1.00 V	10	14.86	45.49
6	7311.00	52.74 AV	54.00	-1.26	1.00 V	10	7.25	45.49

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 11	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	DBPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	1.0Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	93.75 PK			1.44 H	261	61.39	32.36
2	*2462.00	90.32 AV			1.44 H	261	57.96	32.36
3	2483.50	49.25 PK	74.00	-24.75	1.44 H	261	16.81	32.44
4	2483.50	39.11 AV	54.00	-14.89	1.44 H	261	6.67	32.44
5	4924.00	50.95 PK	74.00	-23.05	1.16 H	217	12.05	38.90
6	4924.00	43.82 AV	54.00	-10.18	1.16 H	217	4.92	38.90
7	7386.00	55.68 PK	74.00	-18.32	1.10 H	298	9.99	45.69
8	7386.00	43.82 AV	54.00	-10.18	1.10 H	298	-1.87	45.69

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	104.82 PK			1.15 V	279	72.46	32.36
2	*2462.00	101.34 AV			1.15 V	279	68.98	32.36
3	2483.50	59.92 PK	74.00	-14.08	1.15 V	279	27.48	32.44
4	2483.50	49.87 AV	54.00	-4.13	1.15 V	279	17.43	32.44
5	4924.00	53.79 PK	74.00	-20.21	1.07 V	19	14.89	38.90
6	4924.00	50.12 AV	54.00	-3.88	1.07 V	19	11.22	38.90
7	7386.00	59.29 PK	74.00	-14.71	1.07 V	2	13.59	45.69
8	7386.00	51.62 AV	54.00	-2.37	1.07 V	2	5.93	45.69

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.



### 802.11g OFDM MODULATION: DUAL TX

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	6.0Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	52.76 PK	74.00	-21.24	1.39 H	316	20.66	32.10
2	2390.00	40.03 AV	54.00	-13.97	1.39 H	316	7.93	32.10
3	*2412.00	97.29 PK			1.39 H	316	65.11	32.18
4	*2412.00	87.37 AV			1.39 H	316	55.19	32.18
5	4824.00	49.51 PK	74.00	-24.49	1.03 H	218	10.88	38.63
6	4824.00	36.90 AV	54.00	-17.10	1.03 H	218	-1.73	38.63
7	7236.00	53.37 PK	74.00	-20.63	1.01 H	19	8.08	45.29
8	7236.00	41.50 AV	54.00	-12.50	1.01 H	19	-3.79	45.29

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	2390.00	62.91 PK	74.00	-11.09	1.31 V	86	30.81	32.10
2	2390.00	50.19 AV	54.00	-3.81	1.31 V	86	18.09	32.10
3	*2412.00	107.90 PK			1.20 V	213	75.72	32.18
4	*2412.00	97.43 AV			1.20 V	213	65.25	32.18
5	4824.00	55.75 PK	74.00	-18.25	1.25 V	16	17.12	38.63
6	4824.00	42.08 AV	54.00	-11.92	1.25 V	16	3.45	38.63
7	7236.00	62.53 PK	74.00	-11.47	1.00 V	15	17.24	45.29
8	7236.00	48.91 AV	54.00	-5.09	1.00 V	15	3.62	45.29

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.



EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 6	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	6.0Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	*2437.00	97.34 PK			1.36 H	320	65.07	32.27
2	*2437.00	87.45 AV			1.36 H	320	55.18	32.27
3	4874.00	49.85 PK	74.00	-24.15	1.09 H	248	11.08	38.77
4	4874.00	37.22 AV	54.00	-16.78	1.09 H	248	-1.55	38.77
5	7311.00	53.48 PK	74.00	-20.52	1.08 H	27	7.99	45.49
6	7311.00	41.65 AV	54.00	-12.35	1.08 H	27	-3.84	45.49

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	*2437.00	107.87 PK			1.18 V	209	75.60	32.27
2	*2437.00	97.30 AV			1.18 V	209	65.03	32.27
3	4874.00	55.96 PK	74.00	-18.04	1.21 V	25	17.19	38.77
4	4874.00	42.31 AV	54.00	-11.69	1.21 V	25	3.54	38.77
5	7311.00	61.89 PK	74.00	-12.11	1.00 V	1	16.40	45.49
6	7311.00	48.90 AV	54.00	-5.10	1.00 V	1	3.41	45.49

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 11	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	6.0Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	97.14 PK			1.35 H	319	64.78	32.36
2	*2462.00	87.21 AV			1.35 H	319	54.85	32.36
3	2483.50	52.63 PK	74.00	-21.37	1.35 H	319	20.19	32.44
4	2483.50	39.85 AV	54.00	-14.15	1.35 H	319	7.41	32.44
5	4924.00	49.27 PK	74.00	-24.73	1.05 H	211	10.37	38.90
6	4924.00	36.71 AV	54.00	-17.29	1.05 H	211	-2.19	38.90
7	7386.00	53.56 PK	74.00	-20.44	1.05 H	27	7.87	45.69
8	7386.00	41.78 AV	54.00	-12.22	1.05 H	27	-3.91	45.69

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	107.80 PK			1.22 V	210	75.44	32.36
2	*2462.00	97.31 AV			1.22 V	210	64.95	32.36
3	2483.50	63.07 PK	74.00	-10.93	1.40 V	28	30.63	32.44
4	2483.50	50.24 AV	54.00	-3.76	1.40 V	28	17.80	32.44
5	4924.00	55.89 PK	74.00	-18.11	1.20 V	34	16.99	38.90
6	4924.00	42.26 AV	54.00	-11.74	1.20 V	34	3.36	38.90
7	7386.00	62.89 PK	74.00	-11.11	1.02 V	84	17.20	45.69
8	7386.00	49.18 AV	54.00	-4.82	1.02 V	84	3.49	45.69

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.



**DRAFT 802.11n (20MHz) OFDM MODULATION: DUAL TX:**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	7.2Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	54.62 PK	74.00	-19.38	1.36 H	315	22.52	32.10
2	2390.00	41.85 AV	54.00	-12.15	1.36 H	315	9.75	32.10
3	*2412.00	97.52 PK			1.36 H	315	65.34	32.18
4	*2412.00	87.61 AV			1.36 H	315	55.43	32.18
5	4824.00	49.75 PK	74.00	-24.25	1.05 H	214	11.12	38.63
6	4824.00	37.14 AV	54.00	-16.86	1.05 H	214	-1.49	38.63
7	7236.00	53.12 PK	74.00	-20.88	1.08 H	266	7.83	45.29
8	7236.00	41.34 AV	54.00	-12.66	1.08 H	266	-3.95	45.29

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	2390.00	65.97 PK	74.00	-8.03	1.20 V	358	33.87	32.10
2	2390.00	50.81 AV	54.00	-3.19	1.20 V	358	18.71	32.10
3	*2412.00	107.94 PK			1.20 V	358	75.76	32.18
4	*2412.00	97.65 AV			1.20 V	358	65.47	32.18
5	4824.00	55.32 PK	74.00	-18.68	1.08 V	211	16.69	38.63
6	4824.00	41.69 AV	54.00	-12.31	1.08 V	211	3.06	38.63
7	7236.00	62.21 PK	74.00	-11.79	1.05 V	74	16.92	45.29
8	7236.00	48.57 AV	54.00	-5.43	1.05 V	74	3.28	45.29

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 6	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	7.2Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	*2437.00	97.25 PK			1.34 H	317	64.98	32.27
2	*2437.00	87.36 AV			1.34 H	317	55.09	32.27
3	4874.00	49.71 PK	74.00	-24.29	1.11 H	252	10.94	38.77
4	4874.00	37.06 AV	54.00	-16.94	1.11 H	252	-1.71	38.77
5	7311.00	53.65 PK	74.00	-20.35	1.05 H	34	8.16	45.49
6	7311.00	41.81 AV	54.00	-12.19	1.05 H	34	-3.68	45.49

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	*2437.00	107.65 PK			1.21 V	356	75.38	32.27
2	*2437.00	97.14 AV			1.21 V	356	64.87	32.27
3	4874.00	56.24 PK	74.00	-17.76	1.16 V	34	17.47	38.77
4	4874.00	42.65 AV	54.00	-11.35	1.16 V	34	3.88	38.77
5	7311.00	61.95 PK	74.00	-12.05	1.01 V	2	16.46	45.49
6	7311.00	49.08 AV	54.00	-4.92	1.01 V	2	3.59	45.49

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 11	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	7.2Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	97.21 PK			1.33 H	320	64.85	32.36
2	*2462.00	87.32 AV			1.33 H	320	54.96	32.36
3	2484.00	54.81 PK	74.00	-19.19	1.33 H	320	22.37	32.44
4	2484.00	41.96 AV	54.00	-12.04	1.33 H	320	9.52	32.44
5	4924.00	49.65 PK	74.00	-24.35	1.01 H	278	10.75	38.90
6	4924.00	37.14 AV	54.00	-16.86	1.01 H	278	-1.76	38.90
7	7386.00	53.78 PK	74.00	-20.22	1.01 H	38	8.09	45.69
8	7386.00	42.04 AV	54.00	-11.96	1.01 H	38	-3.65	45.69

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	107.62 PK			1.20 V	211	75.26	32.36
2	*2462.00	97.14 AV			1.20 V	211	64.78	32.36
3	2484.00	63.49 PK	74.00	-10.51	1.15 V	207	31.05	32.44
4	2484.00	50.31 AV	54.00	-3.69	1.15 V	207	17.87	32.44
5	4924.00	55.94 PK	74.00	-18.06	1.18 V	44	17.04	38.90
6	4924.00	42.37 AV	54.00	-11.63	1.18 V	44	3.47	38.90
7	7386.00	62.95 PK	74.00	-11.05	1.05 V	73	17.26	45.69
8	7386.00	49.23 AV	54.00	-4.77	1.05 V	73	3.54	45.69

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.





**DRAFT 802.11n (40MHz) OFDM MODULATION: DUAL TX:**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	15.0Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	53.31 PK	74.00	-20.69	1.12 H	351	22.16	31.15
2	2390.00	38.65 AV	54.00	-15.35	1.12 H	351	7.50	31.15
3	*2422.00	95.42 PK			1.12 H	351	64.19	31.23
4	*2422.00	85.19 AV			1.12 H	351	53.96	31.23
5	4844.00	49.21 PK	74.00	-24.79	1.07 H	189	13.79	35.42
6	4844.00	36.66 AV	54.00	-17.34	1.07 H	189	1.24	35.42
7	7266.00	52.14 PK	74.00	-21.86	1.06 H	259	11.93	40.21
8	7266.00	40.36 AV	54.00	-13.64	1.06 H	259	0.15	40.21

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	2390.00	65.55 PK	74.00	-8.45	1.53 V	88	33.45	32.10
2	2390.00	50.80 AV	54.00	-3.20	1.53 V	88	18.70	32.10
3	*2422.00	105.29 PK			1.20 V	212	73.07	32.22
4	*2422.00	96.02 AV			1.20 V	212	63.80	32.22
5	4844.00	50.77 PK	74.00	-23.23	1.10 V	28	12.09	38.68
6	4844.00	39.36 AV	54.00	-14.64	1.10 V	28	0.68	38.68
7	7266.00	60.17 PK	74.00	-13.83	1.04 V	21	14.80	45.37
8	7266.00	46.45 AV	54.00	-7.55	1.04 V	21	1.08	45.37

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 4	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	15.0Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	*2437.00	95.48 PK			1.10 H	350	63.21	32.27
2	*2437.00	85.24 AV			1.10 H	350	52.97	32.27
3	4874.00	49.87 PK	74.00	-24.13	1.09 H	20	11.10	38.77
4	4874.00	37.24 AV	54.00	-16.76	1.09 H	20	-1.53	38.77
5	7311.00	52.56 PK	74.00	-21.44	1.01 H	267	7.07	45.49
6	7311.00	40.82 AV	54.00	-13.18	1.01 H	267	-4.67	45.49

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	*2437.00	105.33 PK			1.21 V	215	73.06	32.27
2	*2437.00	96.11 AV			1.21 V	215	63.84	32.27
3	4874.00	50.95 PK	74.00	-23.05	1.09 V	20	12.18	38.77
4	4874.00	39.58 AV	54.00	-14.42	1.09 V	20	0.81	38.77
5	7311.00	60.25 PK	74.00	-13.75	1.07 V	34	14.76	45.49
6	7311.00	46.53 AV	54.00	-7.47	1.07 V	34	1.04	45.49

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 7	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	BPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	15.0Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	*2452.00	95.36 PK			1.11 H	354	63.03	32.33
2	*2452.00	85.06 AV			1.11 H	354	52.73	32.33
3	2483.50	53.46 PK	74.00	-20.54	1.11 H	354	21.02	32.44
4	2483.50	38.79 AV	54.00	-15.21	1.11 H	354	6.35	32.44
5	4904.00	50.23 PK	74.00	-23.77	1.05 H	193	11.38	38.85
6	4904.00	37.78 AV	54.00	-16.22	1.05 H	193	-1.07	38.85
7	7356.00	52.65 PK	74.00	-21.35	1.02 H	267	7.04	45.61
8	7356.00	40.89 AV	54.00	-13.11	1.02 H	267	-4.72	45.61

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	*2452.00	105.33 PK			1.19 V	211	73.00	32.33
2	*2452.00	96.11 AV			1.19 V	211	63.78	32.33
3	2483.50	62.11 PK	74.00	-11.89	1.14 V	338	29.67	32.44
4	2483.50	50.85 AV	54.00	-3.15	1.14 V	338	18.41	32.44
5	4904.00	50.68 PK	74.00	-23.32	1.11 V	42	11.83	38.85
6	4904.00	39.25 AV	54.00	-14.75	1.11 V	42	0.40	38.85
7	7356.00	60.25 PK	74.00	-13.75	1.01 V	34	14.64	45.61
8	7356.00	46.53 AV	54.00	-7.47	1.01 V	34	0.92	45.61

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.



**802.11b (CB mode) DSSS MODULATION: DUAL TX:**

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 1	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	DBPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	1.0Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	50.24 PK	74.00	-23.76	1.22 H	132	18.14	32.10
1	2390.00	41.20 AV	54.00	-12.80	1.22 H	132	9.10	32.10
2	*2432.00	97.03 PK			1.22 H	132	64.77	32.26
2	*2432.00	93.88 AV			1.22 H	132	61.62	32.26
3	4864.00	45.56 PK	74.00	-28.44	1.41 H	265	6.82	38.74
3	4864.00	42.28 AV	54.00	-11.72	1.41 H	265	3.54	38.74
4	7296.00	49.87 PK	74.00	-24.13	1.03 H	14	4.42	45.45
4	7296.00	42.91 AV	54.00	-11.09	1.03 H	14	-2.54	45.45

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	2390.00	60.41 PK	74.00	-13.59	1.50 V	91	28.31	32.10
2	2390.00	51.37 AV	54.00	-2.63	1.50 V	91	19.27	32.10
3	*2432.00	107.17 PK			1.50 V	91	74.91	32.26
4	*2432.00	104.04 AV			1.50 V	91	71.78	32.26
5	4864.00	55.43 PK	74.00	-18.57	1.47 V	261	16.69	38.74
6	4864.00	52.14 AV	54.00	-1.86	1.47 V	261	13.40	38.74
7	7296.00	59.75 PK	74.00	-14.25	1.07 V	6	14.30	45.45
8	7296.00	52.77 AV	54.00	-1.23	1.07 V	6	7.32	45.45

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 4	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	DBPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	1.0Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	*2447.00	97.14 PK			1.21 H	130	64.83	32.31
1	*2447.00	93.99 AV			1.21 H	130	61.68	32.31
2	4894.00	46.68 PK	74.00	-27.32	1.38 H	259	7.86	38.82
2	4894.00	43.41 AV	54.00	-10.59	1.38 H	259	4.59	38.82
3	7341.00	50.14 PK	74.00	-23.86	1.05 H	26	4.57	45.57
3	7341.00	43.20 AV	54.00	-10.80	1.05 H	26	-2.37	45.57

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	*2447.00	107.15 PK			1.49 V	90	74.84	32.31
1	*2447.00	104.03 AV			1.49 V	90	71.72	32.31
2	4894.00	54.86 PK	74.00	-19.14	1.17 V	266	16.04	38.82
2	4894.00	50.51 AV	54.00	-3.49	1.17 V	266	11.69	38.82
3	7341.00	60.59 PK	74.00	-13.41	1.00 V	3	15.02	45.57
3	7341.00	52.86 AV	54.00	-1.14	1.00 V	3	7.29	45.57

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.

EUT TEST CONDITION		MEASUREMENT DETAIL	
CHANNEL	Channel 7	FREQUENCY RANGE	1 ~ 25GHz
MODULATION TYPE	DBPSK	INPUT POWER (SYSTEM)	120Vac, 60 Hz
TRANSFER RATE	1.0Mbps	DETECTOR FUNCTION	Peak(PK) Average (AV)
ENVIRONMENTAL CONDITIONS	25deg. C, 65%RH, 991hPa	TESTED BY	Brad Wu

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	*2442.00	97.12 PK			1.21 H	130	64.83	32.29
1	*2442.00	94.00 AV			1.21 H	130	61.71	32.29
2	2483.50	51.11 PK	74.00	-22.89	1.21 H	130	18.67	32.44
2	2483.50	41.75 AV	54.00	-12.25	1.21 H	130	9.31	32.44
3	4884.00	45.98 PK	74.00	-28.02	1.35 H	272	7.18	38.80
3	4884.00	42.71 AV	54.00	-11.29	1.35 H	272	3.91	38.80
4	7326.00	50.27 PK	74.00	-23.73	1.05 H	26	4.74	45.53
4	7326.00	43.35 AV	54.00	-10.65	1.05 H	26	-2.18	45.53

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	*2442.00	107.00 PK			1.48 V	90	74.71	32.29
1	*2442.00	103.81 AV			1.48 V	90	71.52	32.29
2	2483.50	61.25 PK	74.00	-12.75	1.47 V	92	28.81	32.44
2	2483.50	51.82 AV	54.00	-2.18	1.47 V	92	19.38	32.44
3	4884.00	54.12 PK	74.00	-19.88	1.33 V	262	15.32	38.80
3	4884.00	50.38 AV	54.00	-3.62	1.33 V	262	11.58	38.80
4	7326.00	59.53 PK	74.00	-14.47	1.00 V	5	14.00	45.53
4	7326.00	52.55 AV	54.00	-1.45	1.00 V	5	7.02	45.53

- REMARKS:**
1. Emission level (dBuV/m) = Raw Value (dBuV) + Correction Factor (dB/m).
  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. The limit value is defined as per 15.247.
  6. “ \* “: Fundamental frequency.



### 4.3 6dB BANDWIDTH MEASUREMENT

#### 4.3.1 LIMITS OF 6dB BANDWIDTH MEASUREMENT

The minimum of 6dB Bandwidth Measurement is 0.5 MHz.

#### 4.3.2 TEST INSTRUMENTS

DESCRIPTION & MANUFACTURER	MODEL NO.	SERIAL NO.	CALIBRATED UNTIL
SPECTRUM ANALYZER	FSP40	100040	Jun. 07, 2007

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

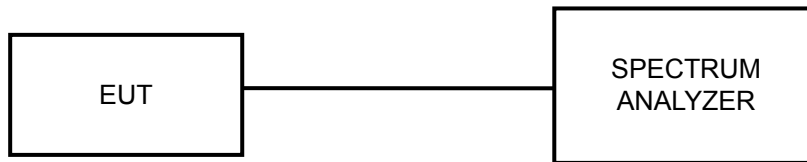
#### 4.3.3 TEST PROCEDURE

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



#### 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.



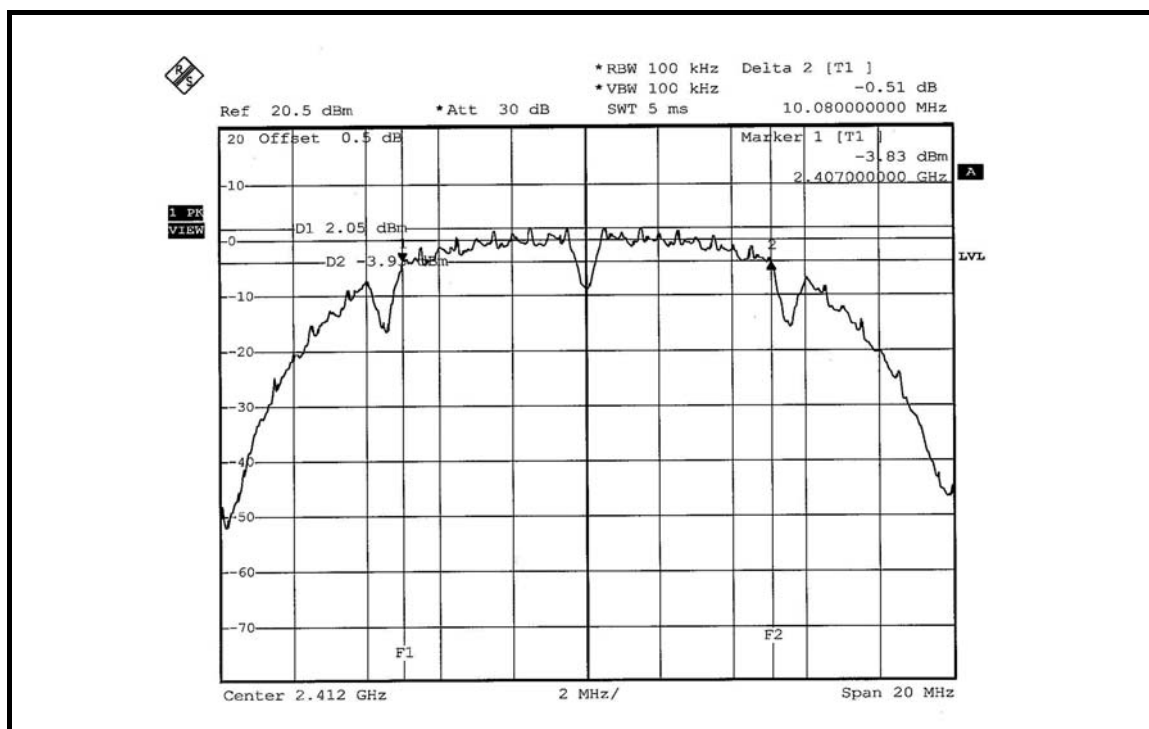
### 4.3.7 TEST RESULTS

#### 802.11b DSSS MODULATION: DUAL TX

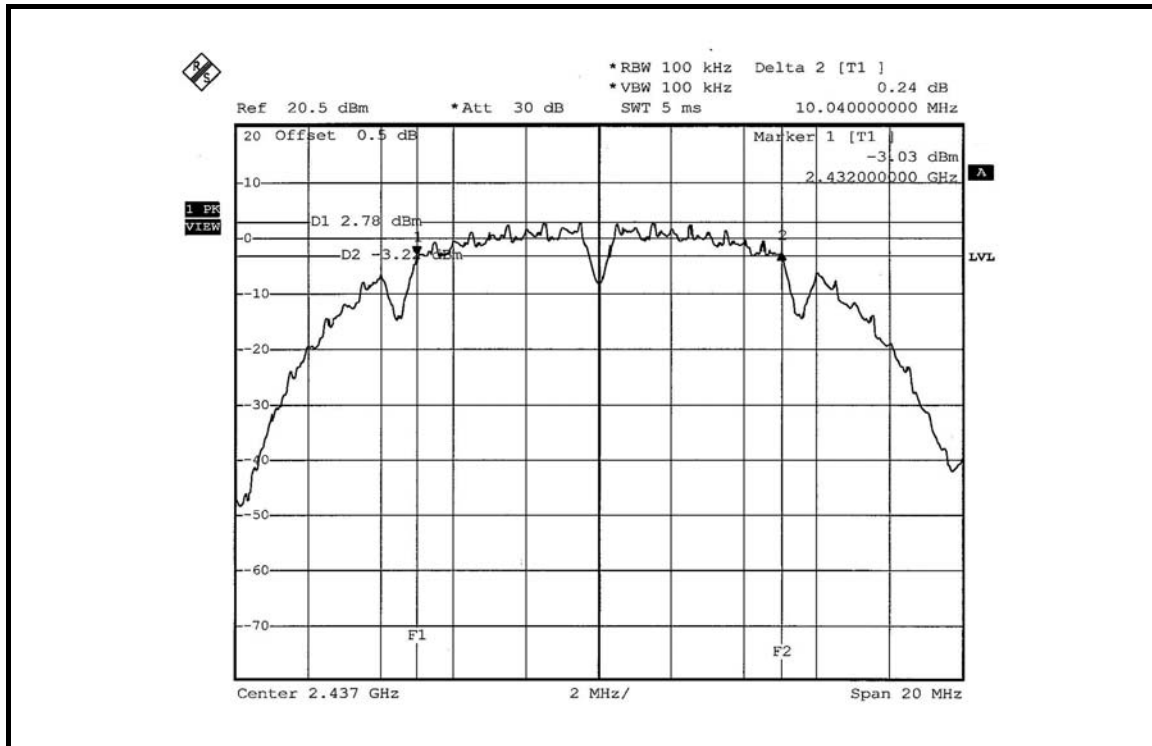
<b>MODULATION TYPE</b>	DBPSK	<b>TRANSFER RATE</b>	1.0Mbps
<b>INPUT POWER (SYSTEM)</b>	120Vac, 60 Hz	<b>ENVIRONMENTAL CONDITIONS</b>	26deg.C, 70%RH, 991hPa
<b>TESTED BY</b>	Long Chen		

CHANNEL	CHANNEL FREQUENCY (MHz)	6dB BANDWIDTH (MHz)		MINIMUM LIMIT (MHz)	PASS / FAIL
		CHAIN 0	CHAIN 1		
1	2412	10.08	10.04	0.5	PASS
6	2437	10.04	10.08	0.5	PASS
11	2462	10.04	10.00	0.5	PASS

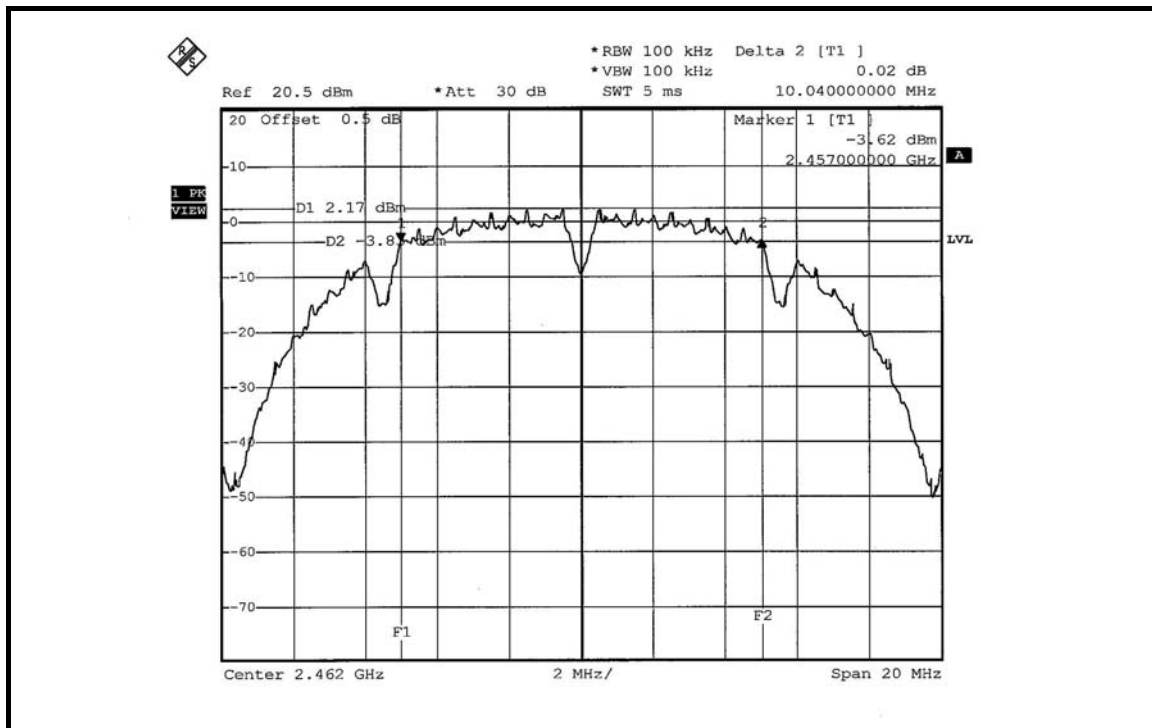
#### FOR CHAIN 0: CH 1



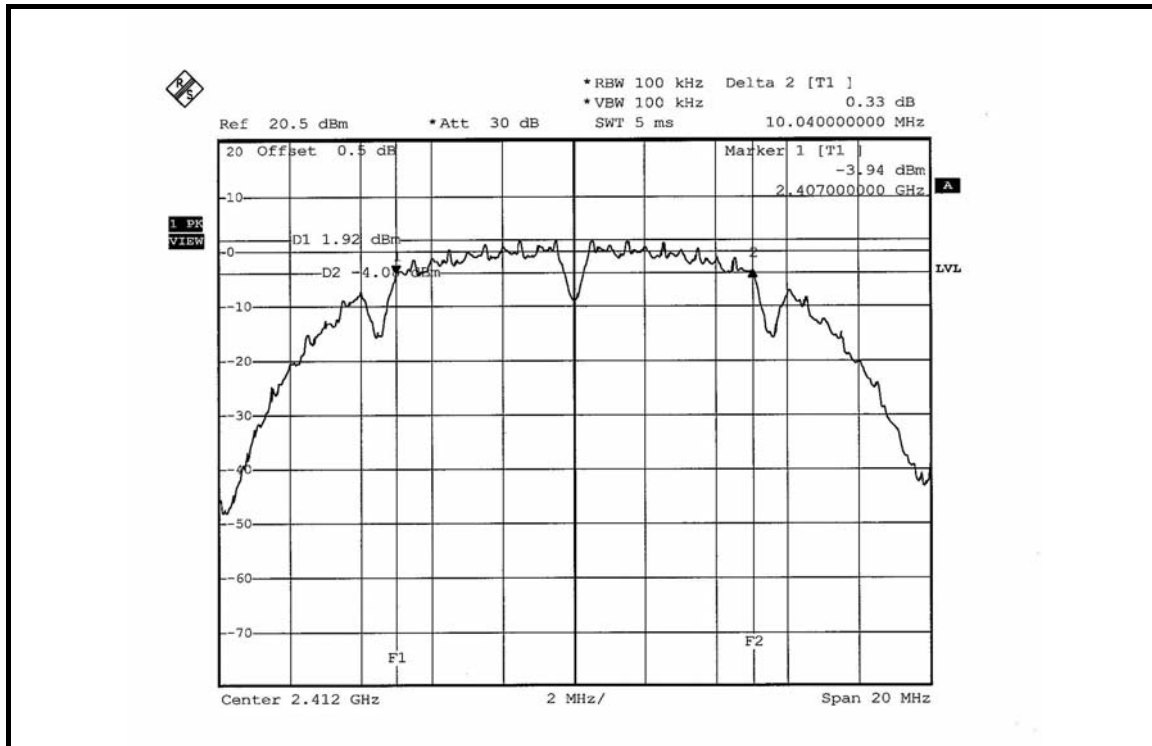
CH 6



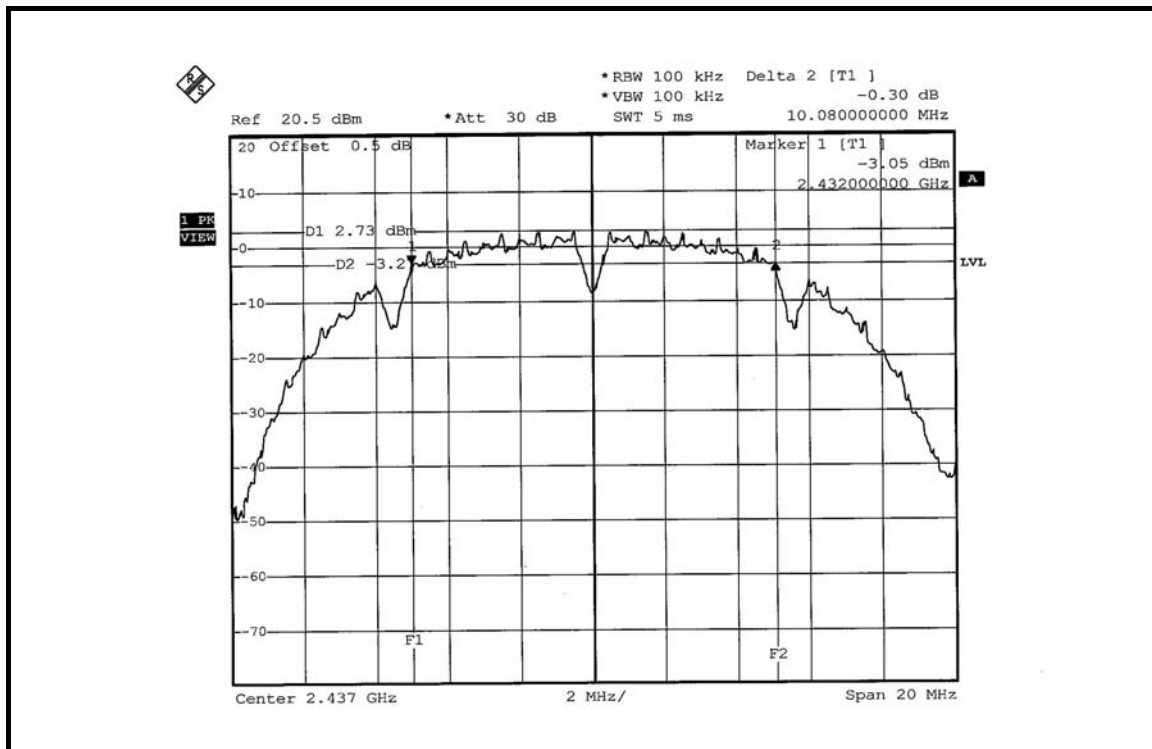
CH 11



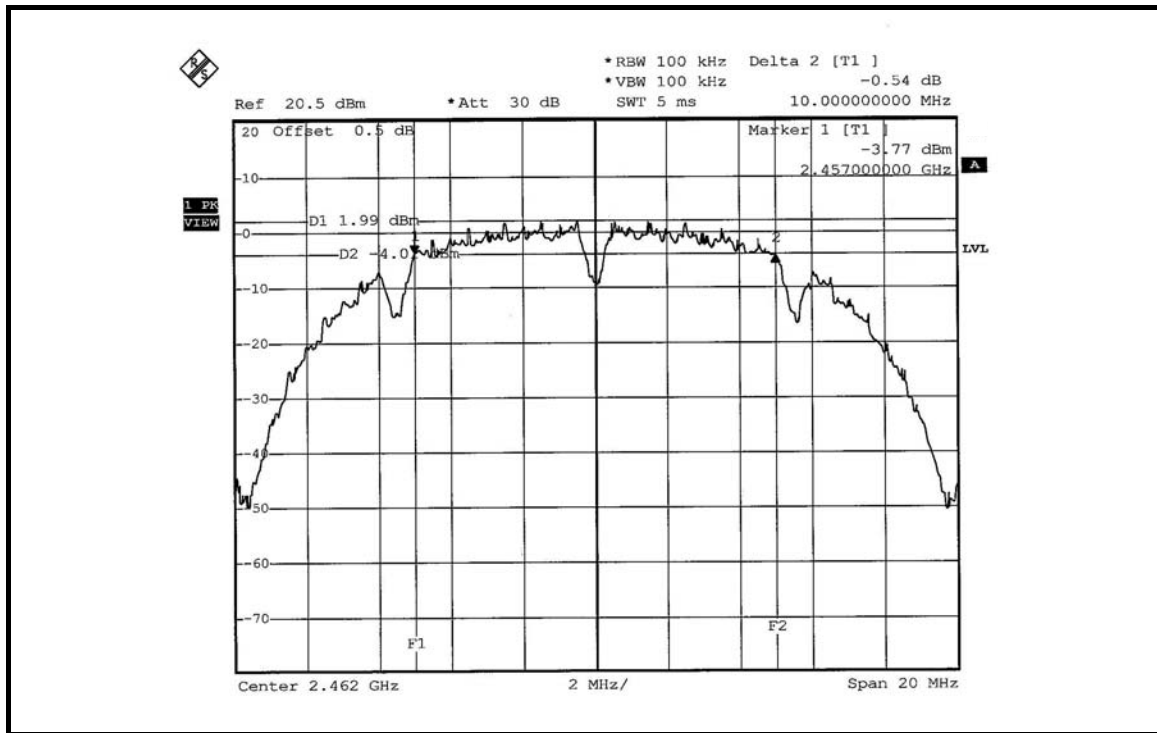
FOR CHAIN 1: CH 1



CH 6



CH 11

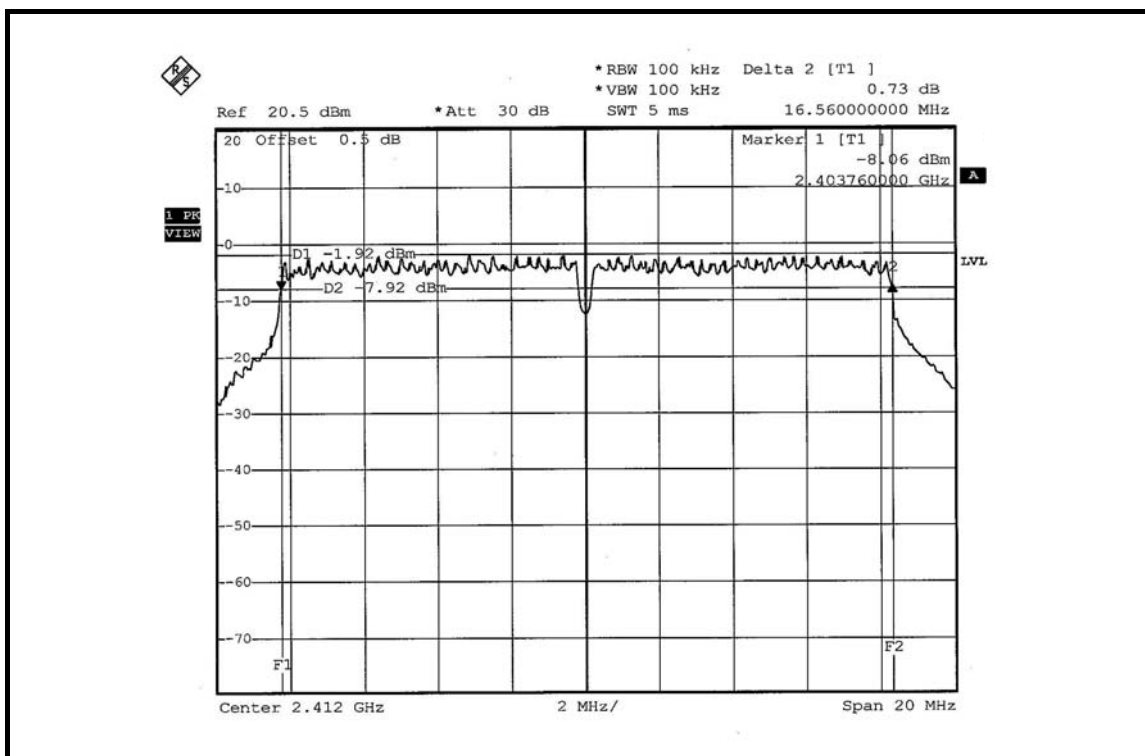


### 802.11g OFDM MODULATION: DUAL TX

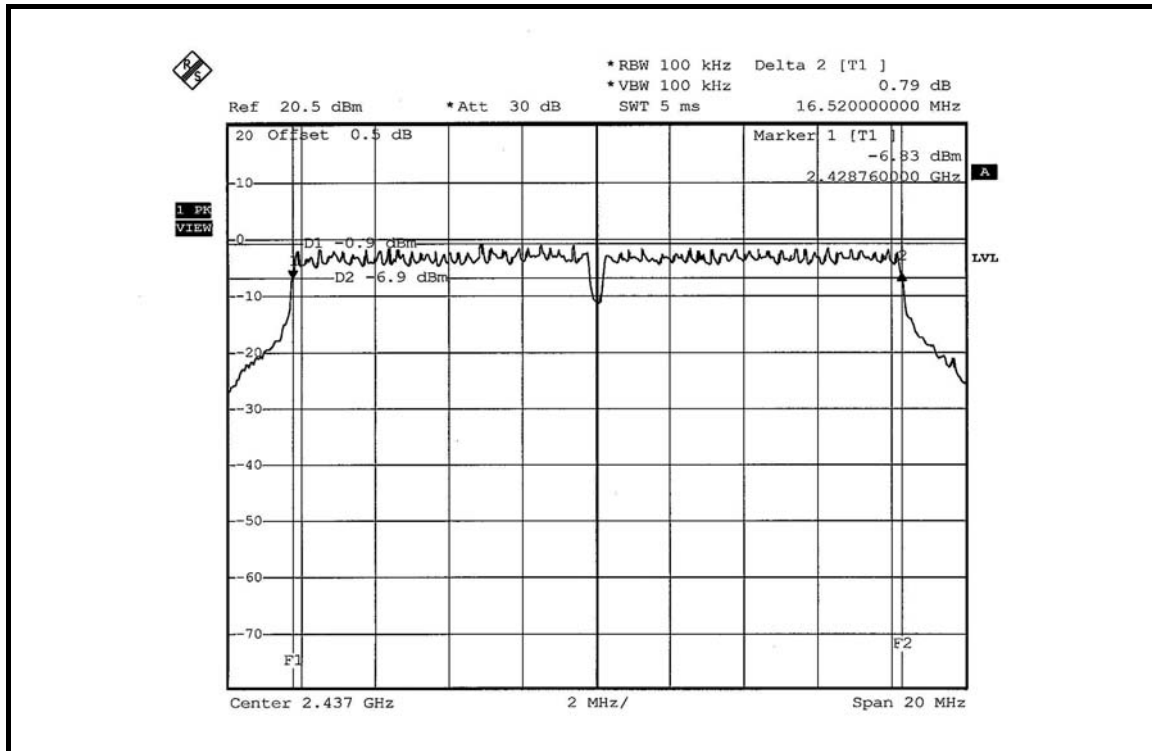
<b>MODULATION TYPE</b>	BPSK	<b>TRANSFER RATE</b>	6.0Mbps
<b>INPUT POWER (SYSTEM)</b>	120Vac, 60 Hz	<b>ENVIRONMENTAL CONDITIONS</b>	26deg.C, 70%RH, 991hPa
<b>TESTED BY</b>	Long Chen		

CHANNEL	CHANNEL FREQUENCY (MHz)	6dB BANDWIDTH (MHz)		MINIMUM LIMIT (MHz)	PASS / FAIL
		CHAIN 0	CHAIN 1		
1	2412	16.56	16.56	0.5	PASS
6	2437	16.52	16.56	0.5	PASS
11	2462	16.56	16.52	0.5	PASS

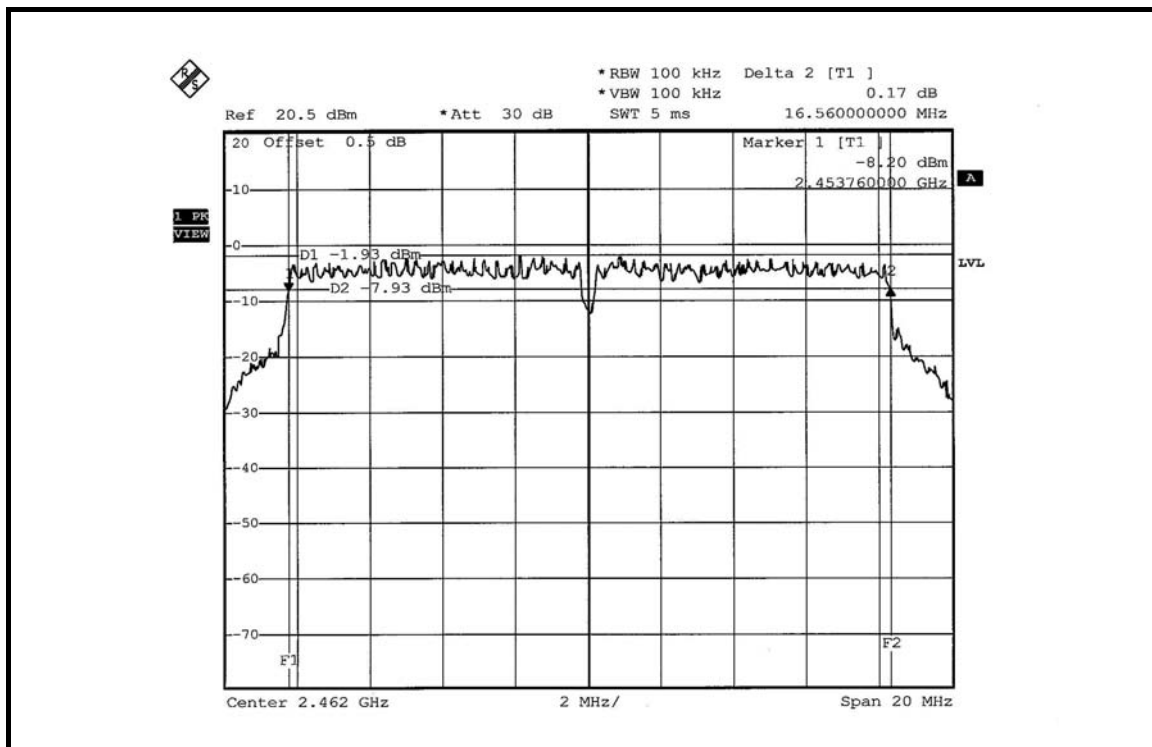
### FOR CHAIN 0: CH 1



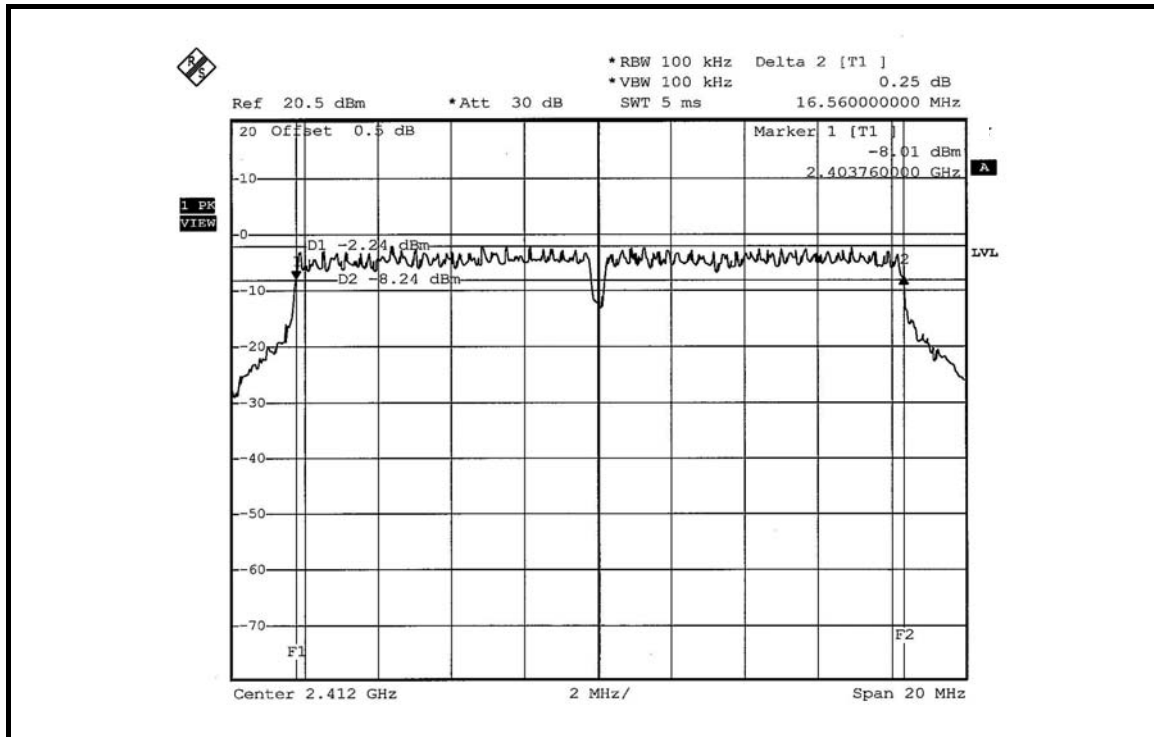
CH 6



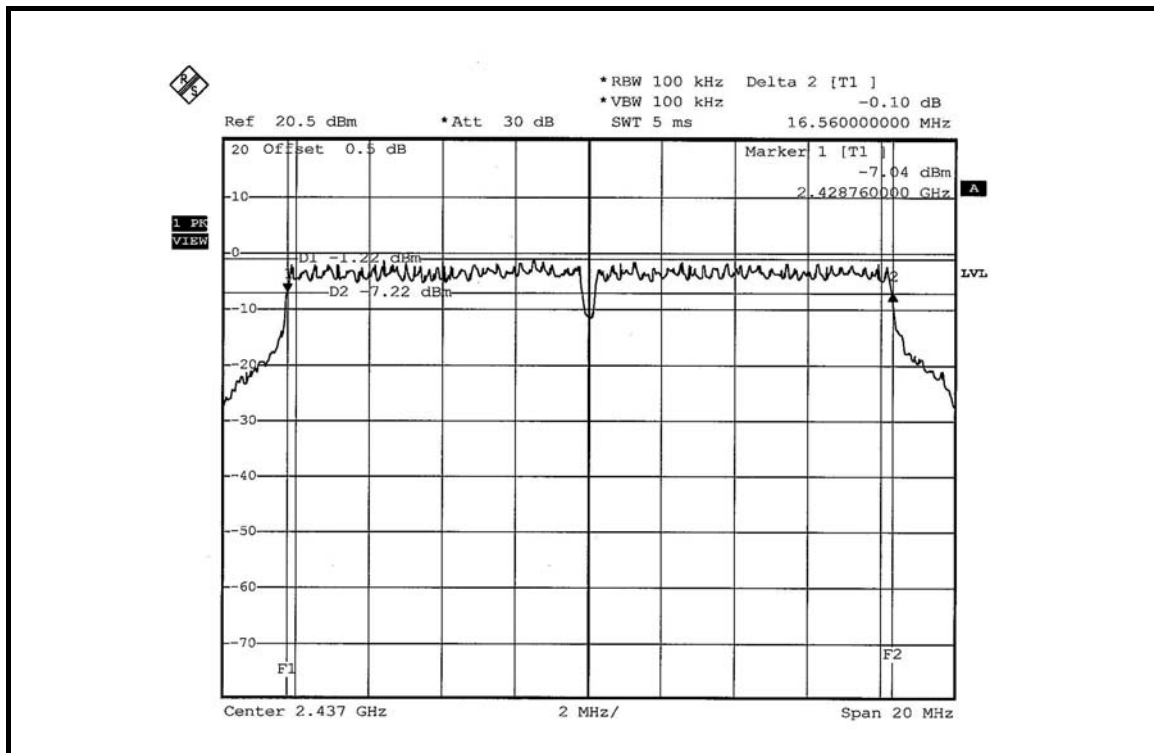
CH 11



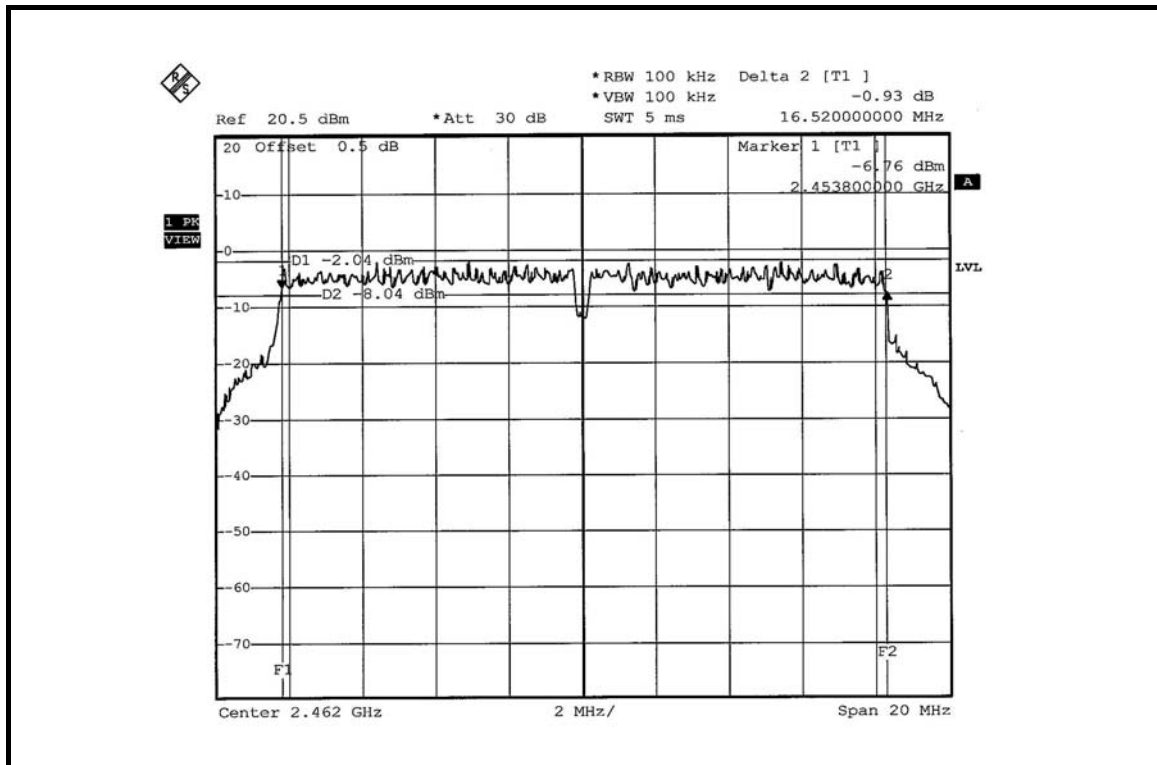
FOR CHAIN 1: CH 1



CH 6



CH 11



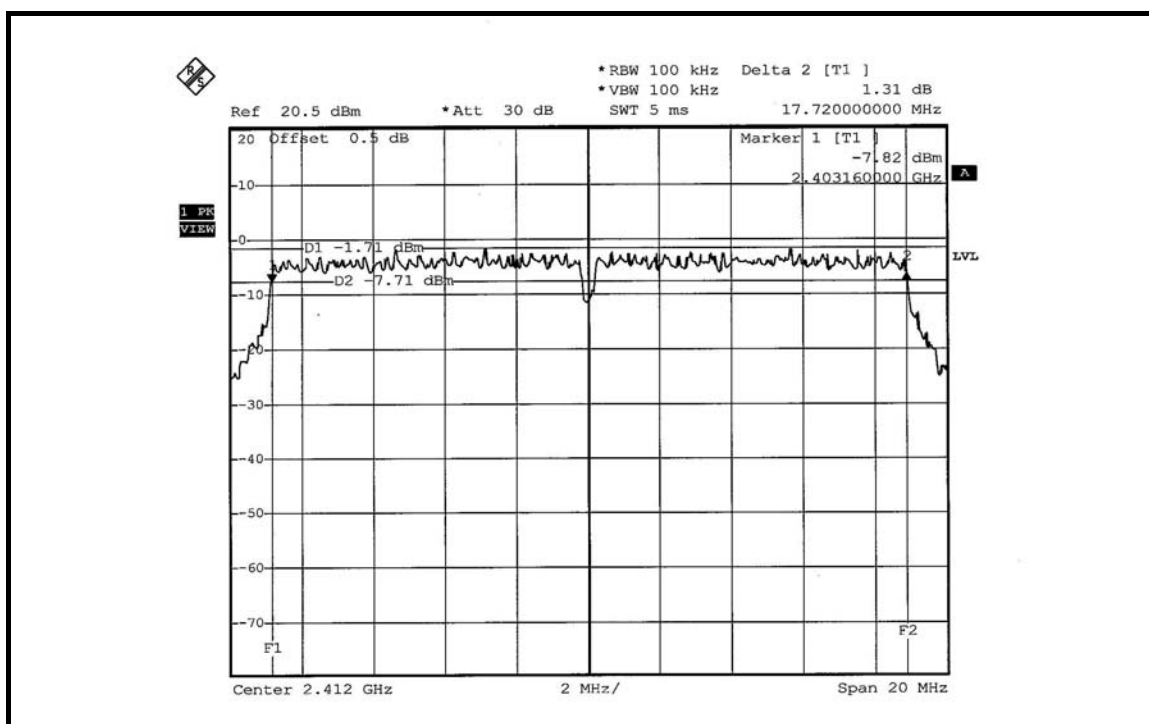


**DRAFT 802.11n (20MHz) OFDM MODULATION: DUAL TX:**

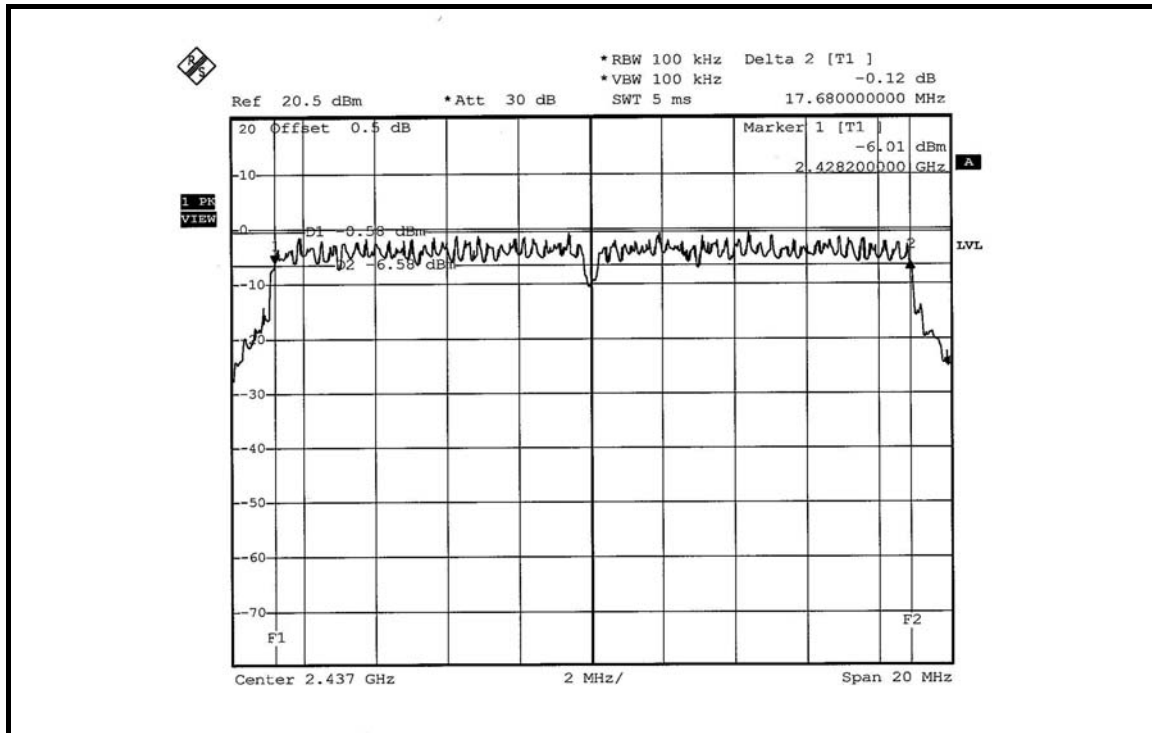
<b>MODULATION TYPE</b>	BPSK	<b>TRANSFER RATE</b>	7.2Mbps
<b>INPUT POWER (SYSTEM)</b>	120Vac, 60 Hz	<b>ENVIRONMENTAL CONDITIONS</b>	26deg.C, 70%RH, 991hPa
<b>TESTED BY</b>	Long Chen		

CHANNEL	CHANNEL FREQUENCY (MHz)	6dB BANDWIDTH (MHz)		MINIMUM LIMIT (MHz)	PASS / FAIL
		CHAIN 0	CHAIN 1		
1	2412	17.72	17.80	0.5	PASS
6	2437	17.68	17.68	0.5	PASS
11	2462	17.72	17.72	0.5	PASS

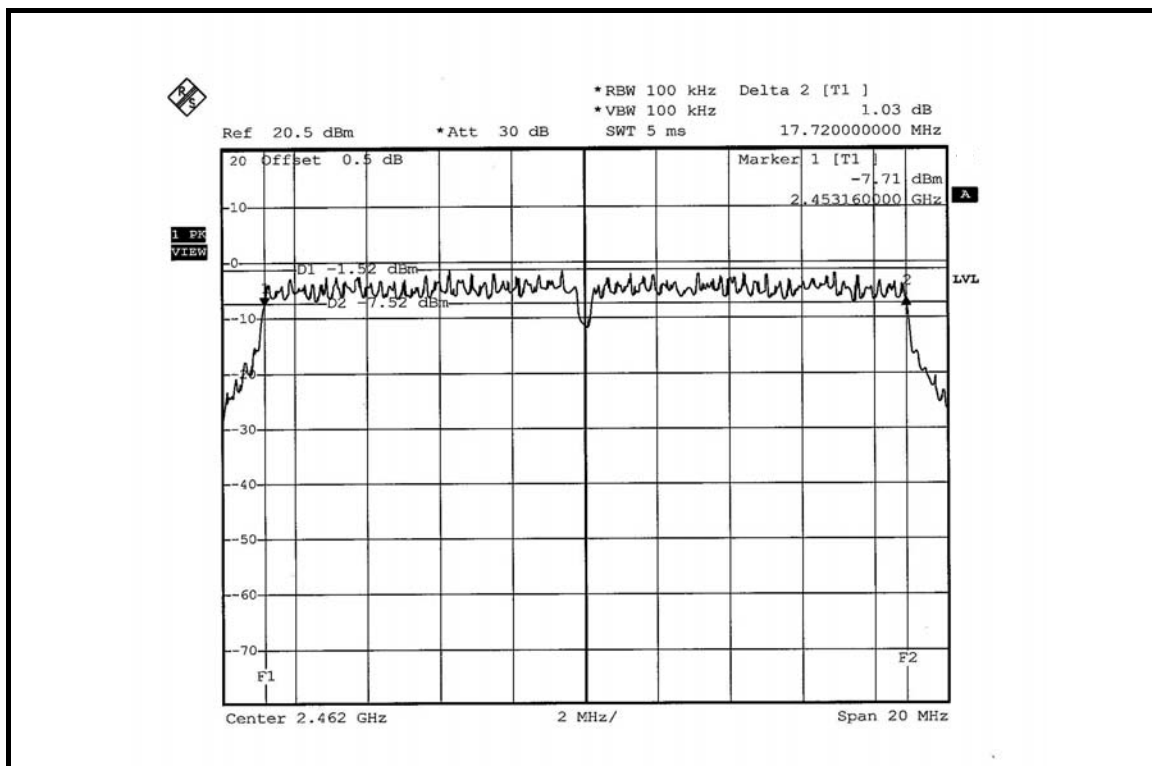
**FOR CHAIN 0: CH 1**

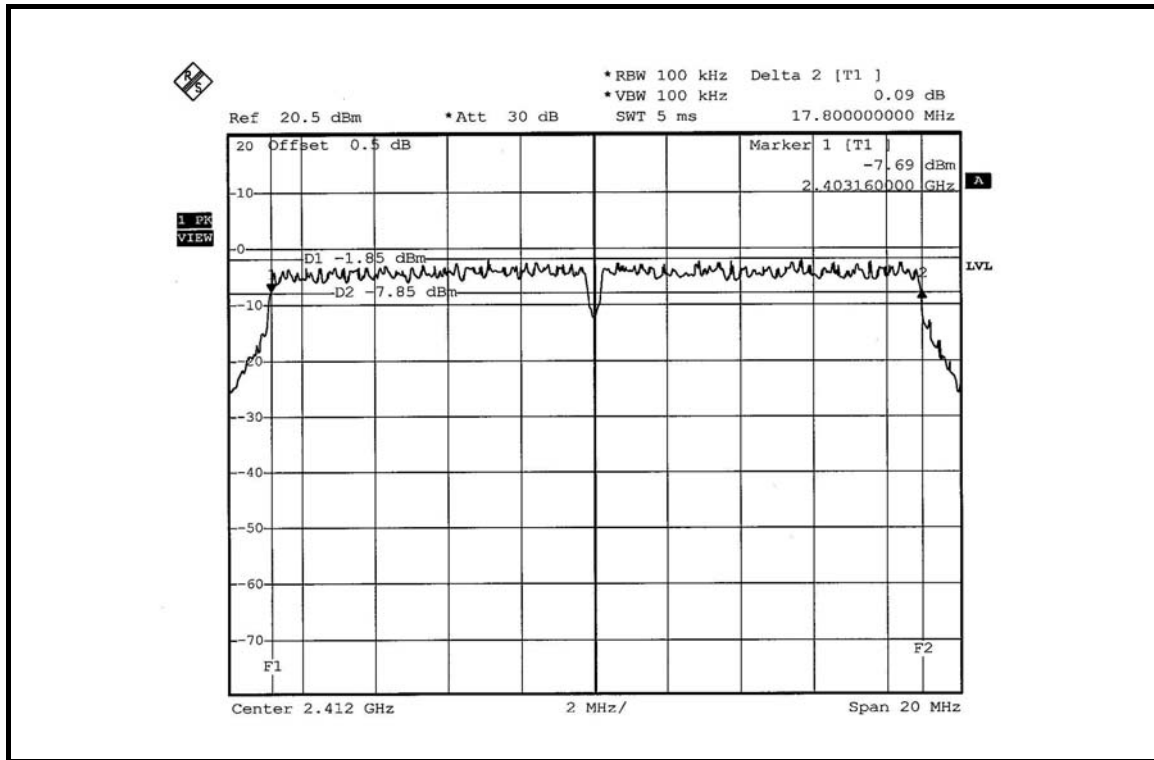
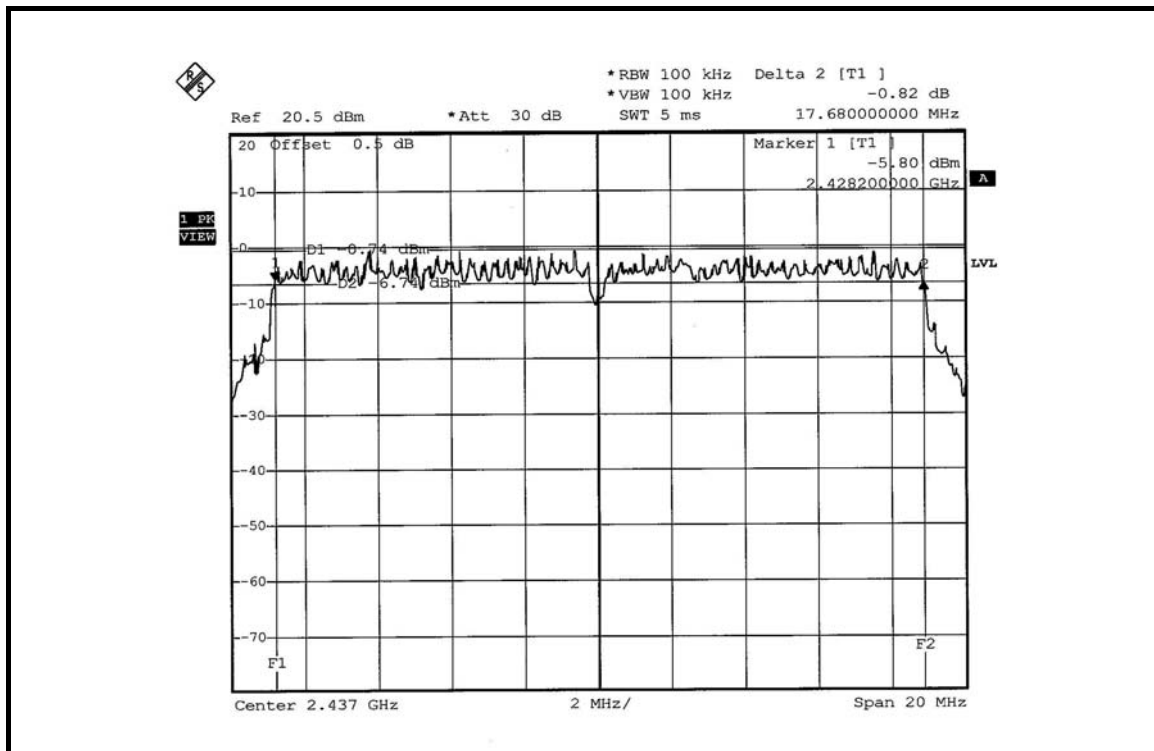


CH 6

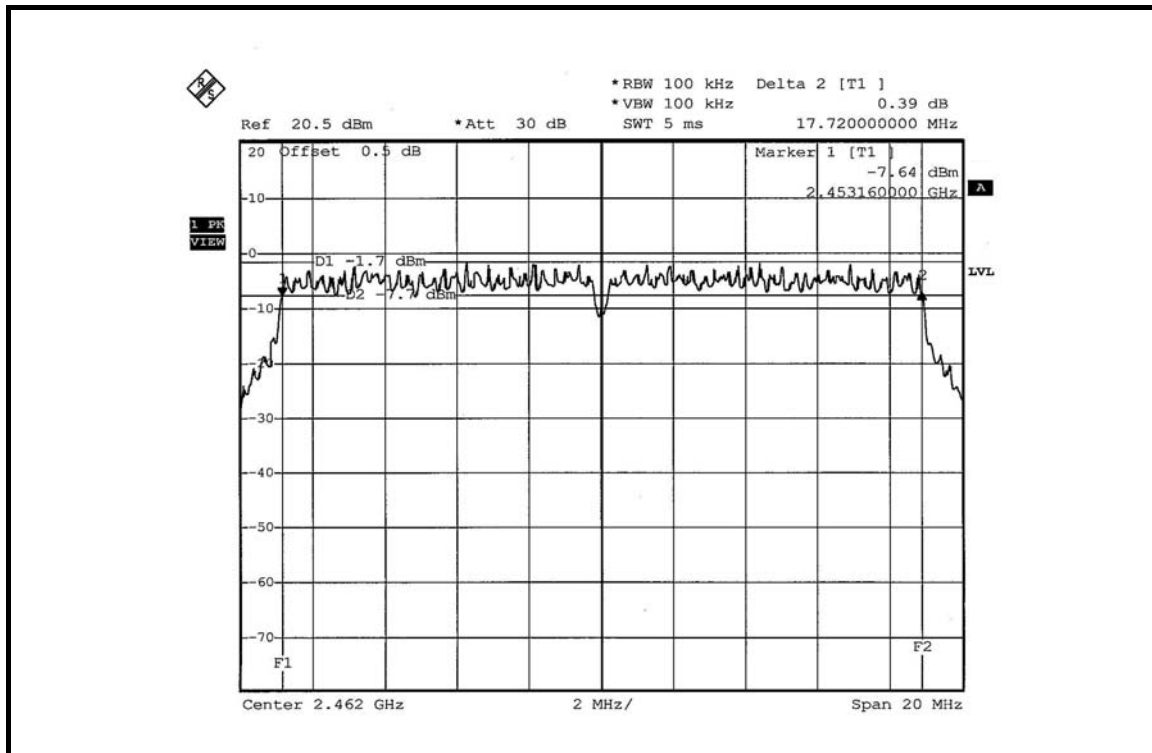


CH 11



**FOR CHAIN 1: CH 1**

**CH 6**


CH 11



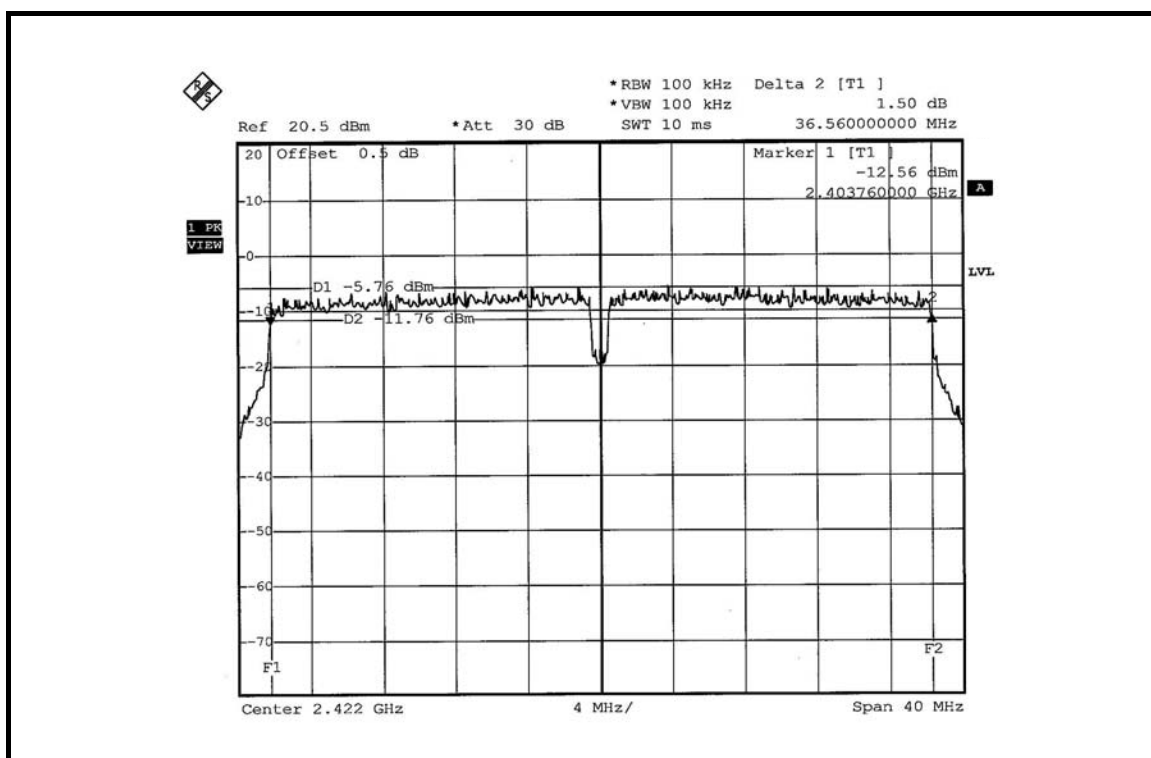


**DRAFT 802.11n (40MHz) OFDM MODULATION: DUAL TX:**

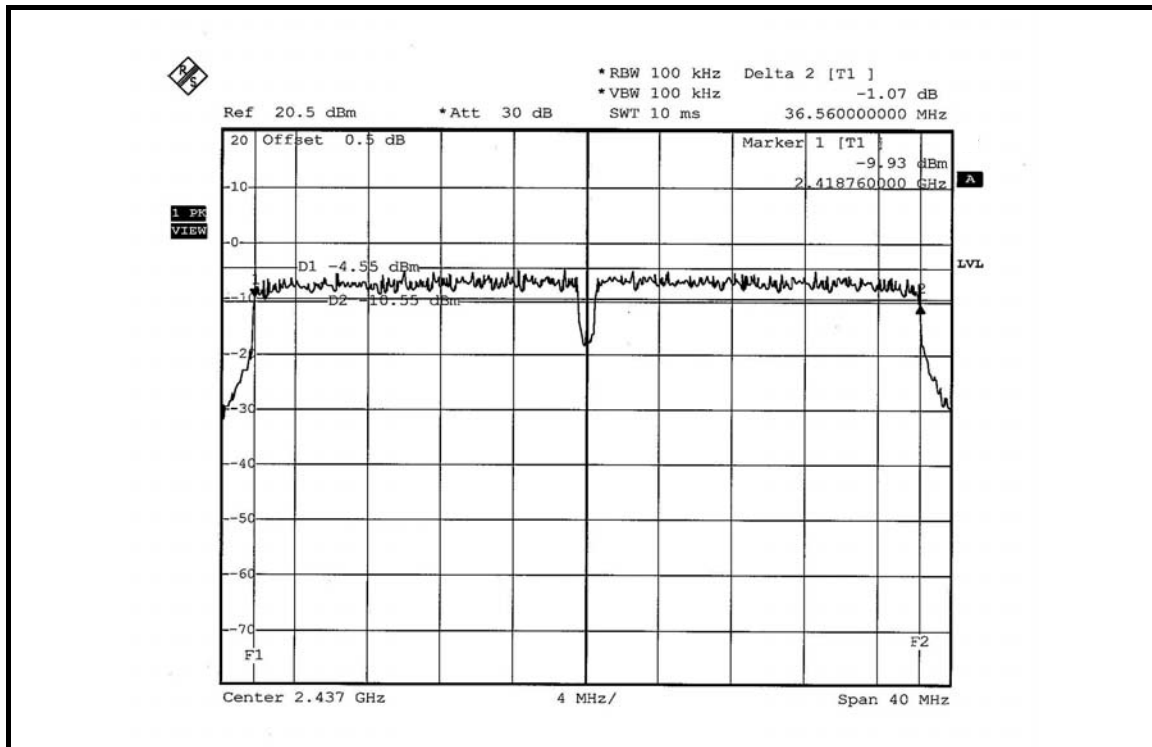
<b>MODULATION TYPE</b>	BPSK	<b>TRANSFER RATE</b>	15.0Mbps
<b>INPUT POWER (SYSTEM)</b>	120Vac, 60 Hz	<b>ENVIRONMENTAL CONDITIONS</b>	26deg.C, 70%RH, 991hPa
<b>TESTED BY</b>	Long Chen		

CHANNEL	CHANNEL FREQUENCY (MHz)	6dB BANDWIDTH (MHz)		MINIMUM LIMIT (MHz)	PASS / FAIL
		CHAIN 0	CHAIN 1		
1	2422	36.56	36.64	0.5	PASS
4	2437	36.56	36.56	0.5	PASS
7	2452	36.48	36.40	0.5	PASS

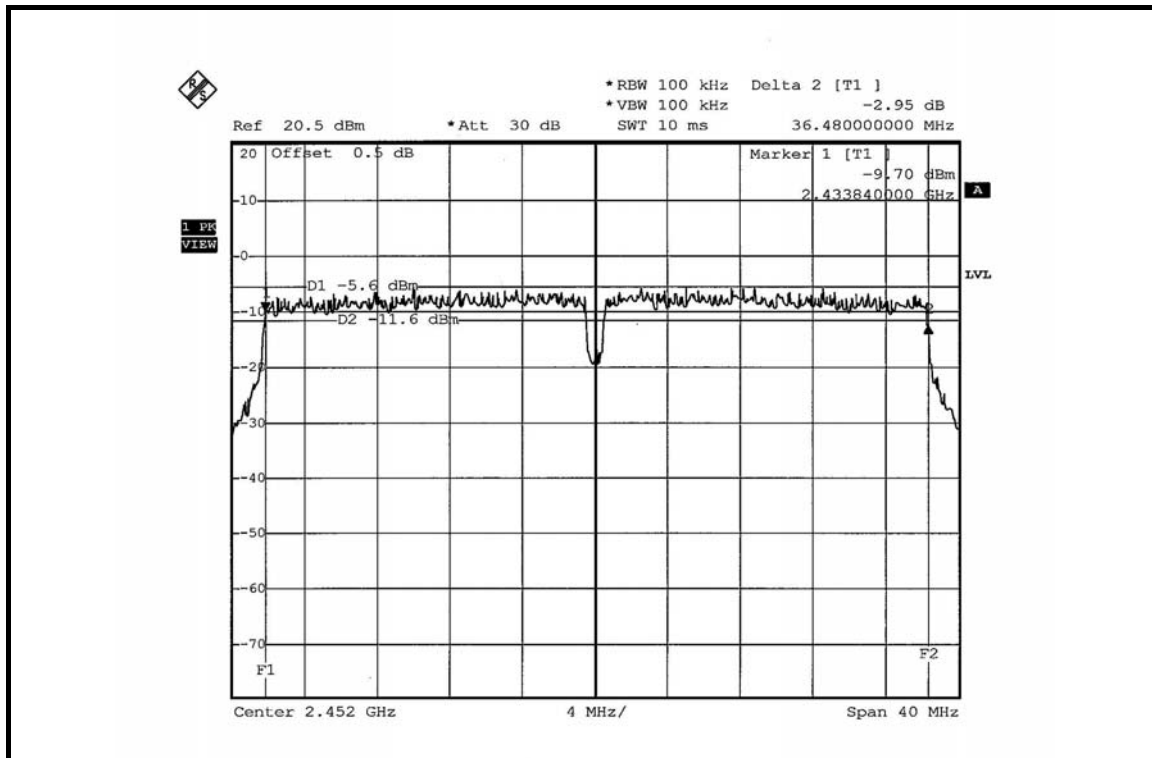
**FOR CHAIN 0: CH 1**



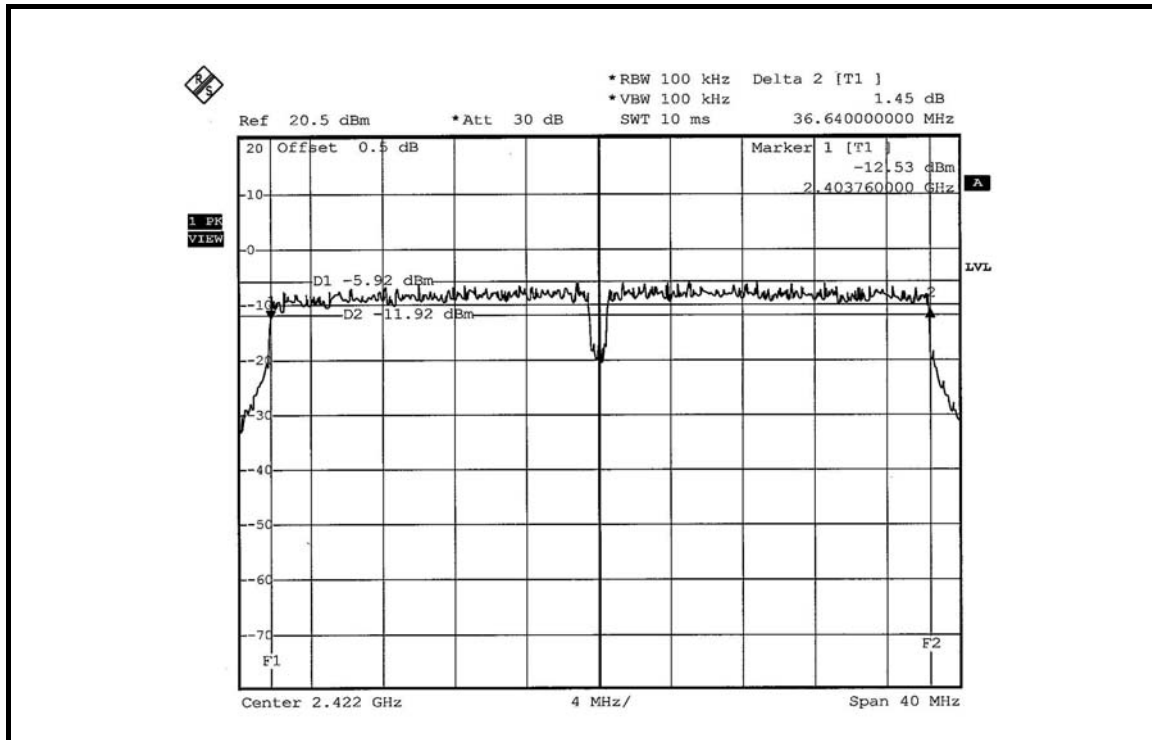
CH 4



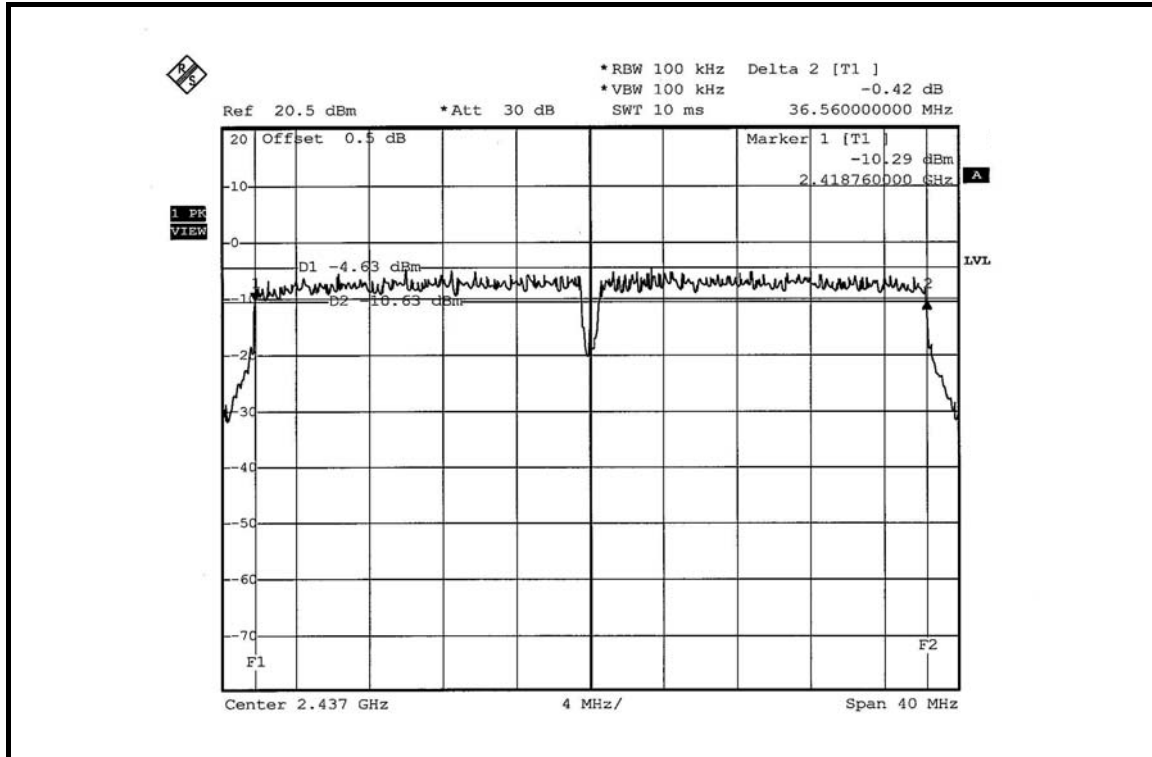
CH 7



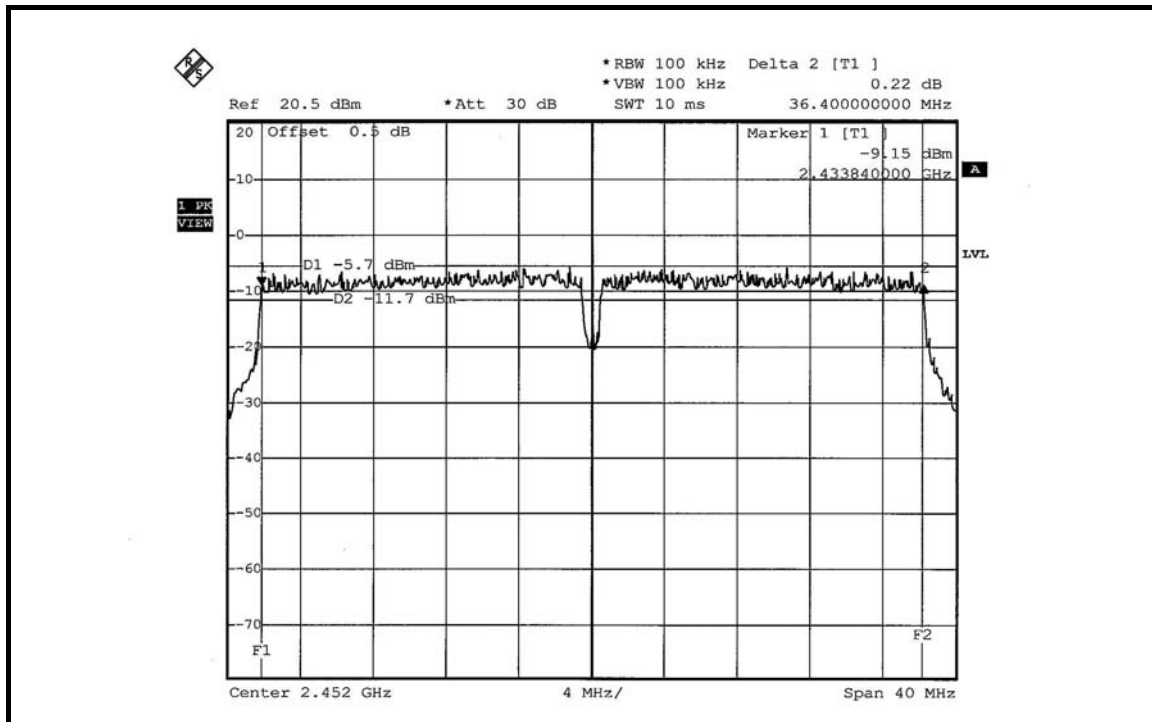
FOR CHAIN 1: CH 1



CH 4



CH 7



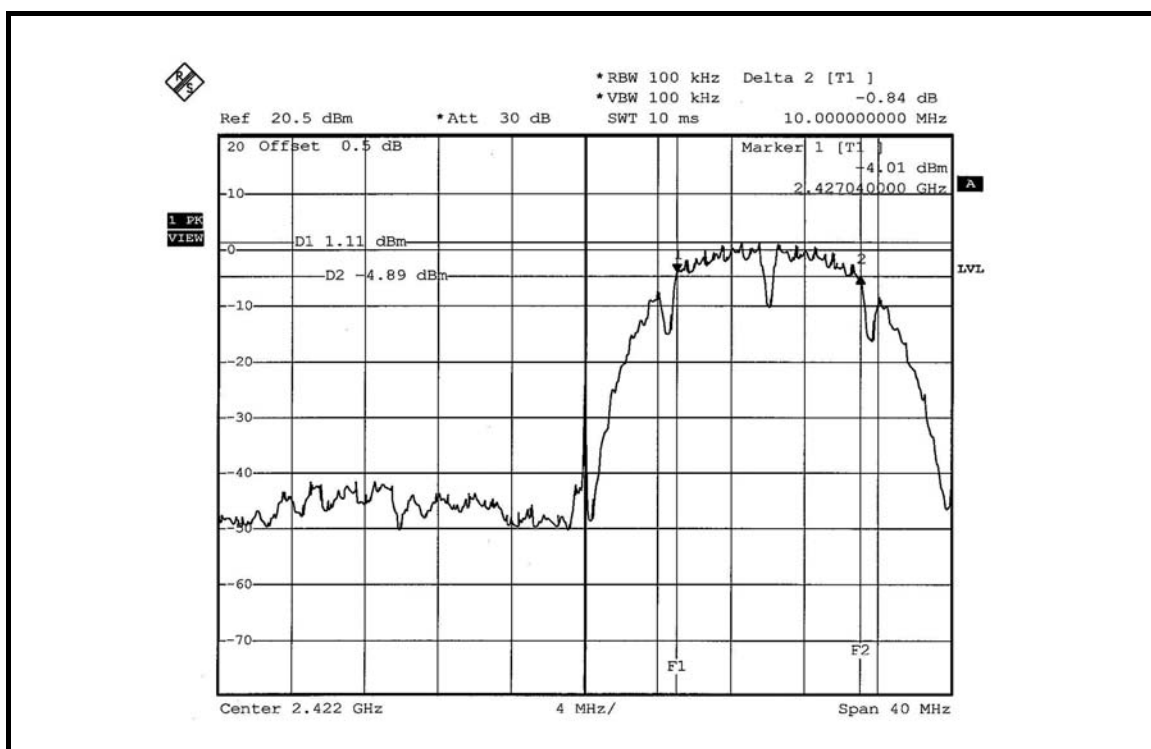


**802.11b (CB mode) DSSS MODULATION: DUAL TX:**

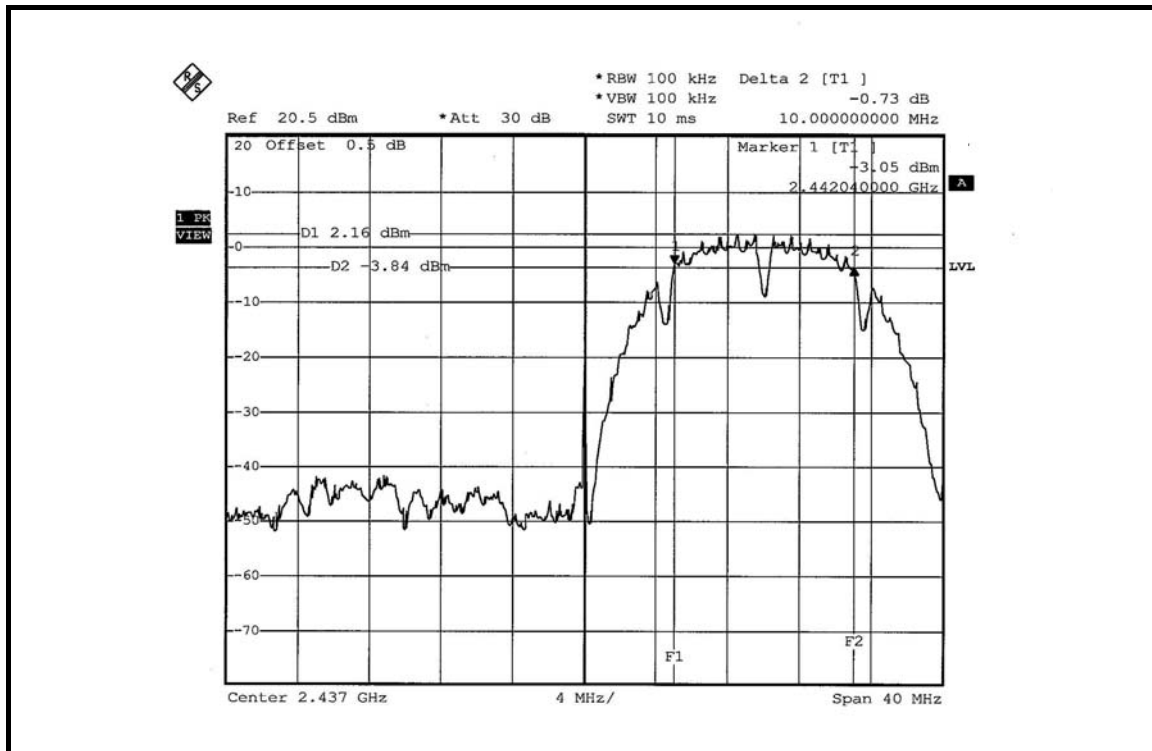
<b>MODULATION TYPE</b>	DBPSK	<b>TRANSFER RATE</b>	1.0Mbps
<b>INPUT POWER (SYSTEM)</b>	120Vac, 60 Hz	<b>ENVIRONMENTAL CONDITIONS</b>	26deg.C, 70%RH, 991hPa
<b>TESTED BY</b>	Long Chen		

CHANNEL	CHANNEL FREQUENCY (MHz)	6dB BANDWIDTH (MHz)		MINIMUM LIMIT (MHz)	PASS / FAIL
		CHAIN 0	CHAIN 1		
1	2422	10.00	10.00	0.5	PASS
4	2437	10.00	10.00	0.5	PASS
7	2452	9.92	10.00	0.5	PASS

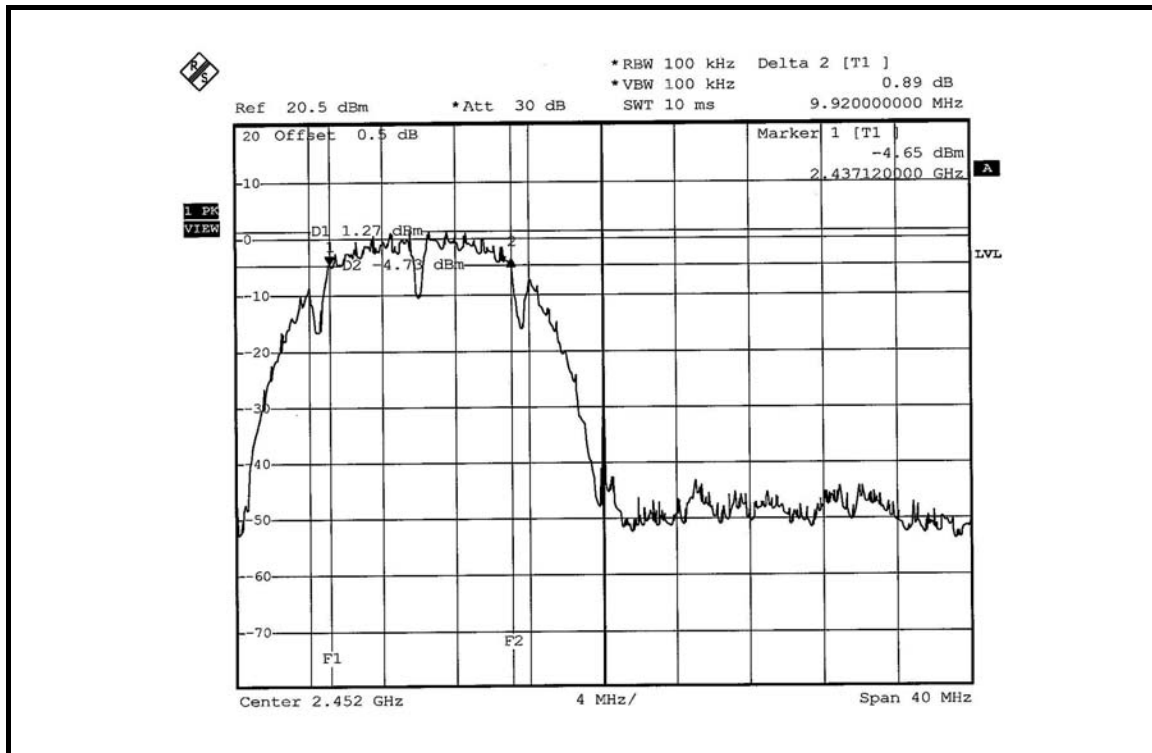
**FOR CHAIN 0: CH 1**



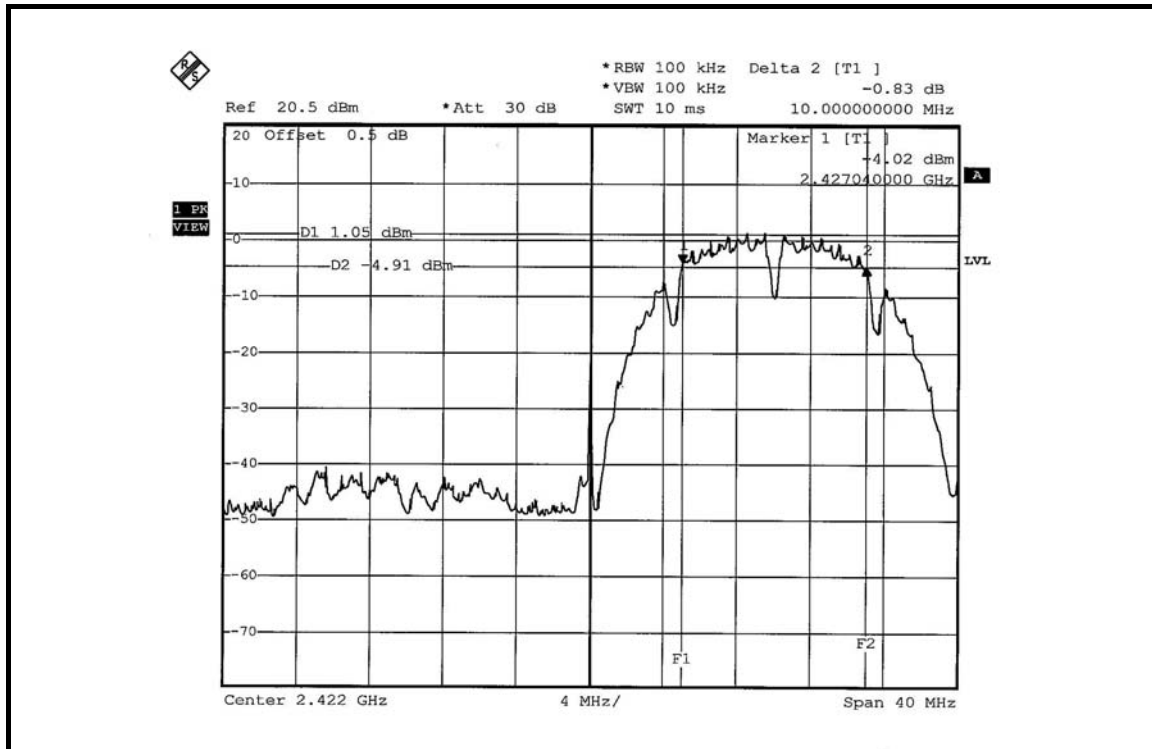
CH 4



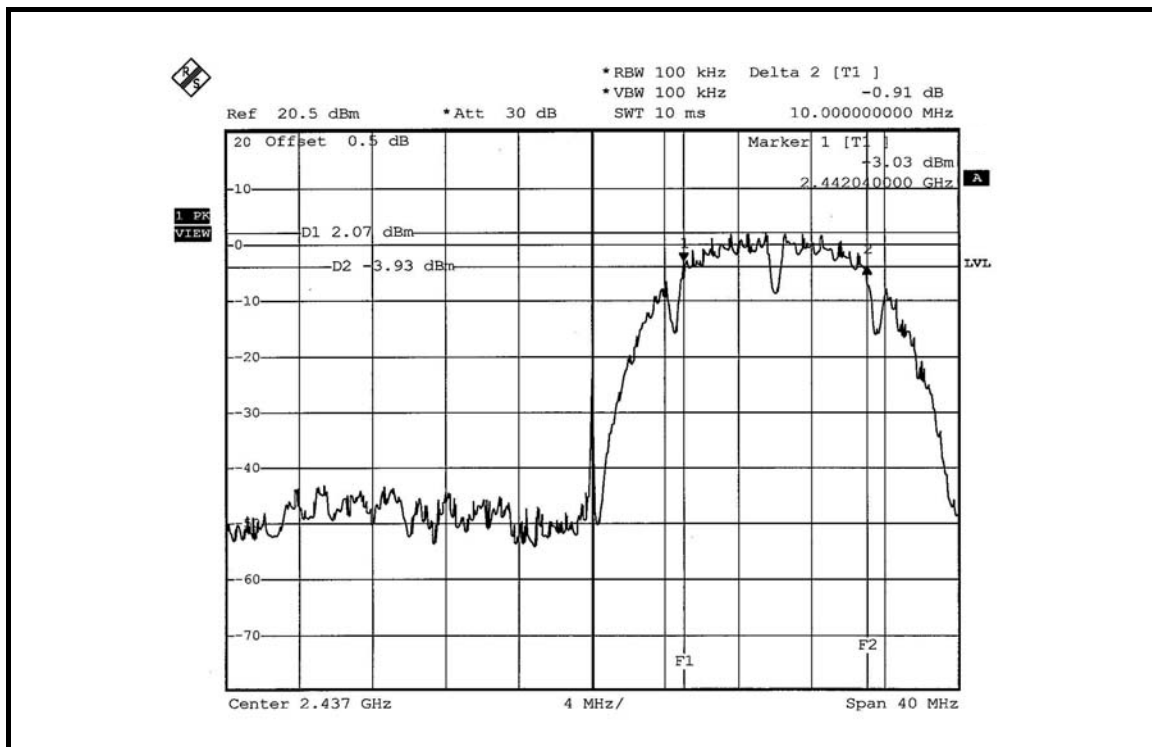
CH 7



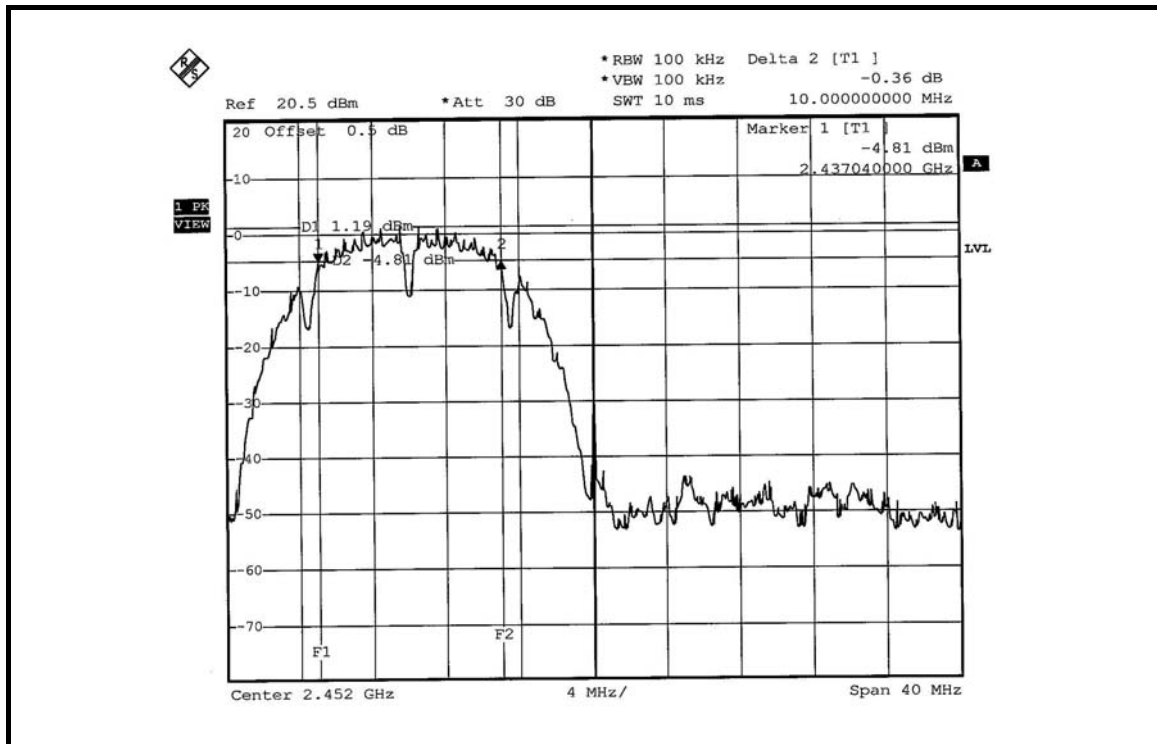
FOR CHAIN 1: CH 1



CH 4



CH 7





#### 4.4 MAXIMUM PEAK OUTPUT POWER

##### 4.4.1 LIMITS OF MAXIMUM PEAK OUTPUT POWER MEASUREMENT

The Maximum Peak Output Power Measurement is 30dBm.

##### 4.4.2 INSTRUMENTS

DESCRIPTION & MANUFACTURER	MODEL NO.	SERIAL NO.	CALIBRATED UNTIL
R&S SPECTRUM ANALYZER	FSP40	100040	Jun. 07, 2007
AGILENT SIGNAL GENERATOR	E8257C	MY43320668	Dec. 07, 2006
DIGITAL RT OSCILLOSCOPE	TDS1012	C037299	Nov. 28, 2006
NARDA DETECTOR	4503A	FSCM99899	NA

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

##### 4.4.3 TEST PROCEDURES

1. A detector was used on the output port of the EUT. An oscilloscope was used to read the response of the detector.
2. Replaced the EUT by the signal generator. The center frequency of the S.G was adjusted to the center frequency of the measured channel.
3. Adjusted the power to have the same reading on oscilloscope. Record the power level.

##### 4.4.4 DEVIATION FROM TEST STANDARD

No deviation

#### 4.4.5 TEST SETUP



#### 4.4.6 EUT OPERATING CONDITIONS

Same as Item 4.3.6



#### 4.4.7 TEST RESULTS

##### 802.11b DSSS MODULATION: DUAL TX

<b>MODULATION TYPE</b>	DBPSK	<b>TRANSFER RATE</b>	1.0Mbps
<b>INPUT POWER (SYSTEM)</b>	120Vac, 60 Hz	<b>ENVIRONMENTAL CONDITIONS</b>	26deg.C, 70%RH, 991hPa
<b>TESTED BY</b>	Long Chen		

CHAN.	CHANNEL FREQUENCY (MHz)	PEAK POWER OUTPUT (mW)		PEAK POWER OUTPUT (dBm)		TOTAL PEAK POWER (mW)	TOTAL PEAK POWER (dBm)	PEAK POWER LIMIT (dBm)	PASS / FAIL
		CHAIN 0	CHAIN 1	CHAIN 0	CHAIN 1				
1	2412	22.646	22.439	13.55	13.51	45.085	16.54	30	PASS
6	2437	22.491	22.439	13.52	13.51	44.930	16.53	30	PASS
11	2462	22.751	22.594	13.57	13.54	45.345	16.57	30	PASS

##### 802.11g OFDM MODULATION: DUAL TX

<b>MODULATION TYPE</b>	BPSK	<b>TRANSFER RATE</b>	6.0Mbps
<b>INPUT POWER (SYSTEM)</b>	120Vac, 60 Hz	<b>ENVIRONMENTAL CONDITIONS</b>	26deg.C, 70%RH, 991hPa
<b>TESTED BY</b>	Long Chen		

CHAN.	CHANNEL FREQUENCY (MHz)	PEAK POWER OUTPUT (mW)		PEAK POWER OUTPUT (dBm)		TOTAL PEAK POWER (mW)	TOTAL PEAK POWER (dBm)	PEAK POWER LIMIT (dBm)	PASS / FAIL
		CHAIN 0	CHAIN 1	CHAIN 0	CHAIN 1				
1	2412	22.751	22.542	13.57	13.53	45.293	16.56	30	PASS
6	2437	22.646	22.542	13.55	13.53	45.188	16.55	30	PASS
11	2462	22.699	22.594	13.56	13.54	45.293	16.56	30	PASS



**DRAFT 802.11n (20MHz) OFDM MODULATION: DUAL TX:**

<b>MODULATION TYPE</b>	BPSK	<b>TRANSFER RATE</b>	7.2Mbps
<b>INPUT POWER (SYSTEM)</b>	120Vac, 60 Hz	<b>ENVIRONMENTAL CONDITIONS</b>	26deg.C, 70%RH, 991hPa
<b>TESTED BY</b>	Long Chen		

CHANNEL	CHANNEL FREQUENCY (MHz)	PEAK POWER OUTPUT (mW)		PEAK POWER OUTPUT (dBm)		TOTAL PEAK POWER (mW)	TOTAL PEAK POWER (dBm)	PEAK POWER LIMIT (dBm)	PASS / FAIL
		CHAIN 0	CHAIN 1	CHAIN 0	CHAIN 1				
1	2412	22.646	22.439	13.55	13.51	45.085	16.54	30	PASS
6	2437	22.646	22.491	13.55	13.52	45.137	16.55	30	PASS
11	2462	22.646	22.542	13.55	13.53	45.189	16.55	30	PASS

**DRAFT 802.11n (40MHz) OFDM MODULATION: DUAL TX:**

<b>MODULATION TYPE</b>	BPSK	<b>TRANSFER RATE</b>	15.0Mbps
<b>INPUT POWER (SYSTEM)</b>	120Vac, 60 Hz	<b>ENVIRONMENTAL CONDITIONS</b>	26deg.C, 70%RH, 991hPa
<b>TESTED BY</b>	Long Chen		

CHANNEL	CHANNEL FREQUENCY (MHz)	PEAK POWER OUTPUT (mW)		PEAK POWER OUTPUT (dBm)		TOTAL PEAK POWER (mW)	TOTAL PEAK POWER (dBm)	PEAK POWER LIMIT (dBm)	PASS / FAIL
		CHAIN 0	CHAIN 1	CHAIN 0	CHAIN 1				
1	2422	22.646	22.387	13.55	13.50	45.033	16.54	30	PASS
4	2437	22.542	22.439	13.53	13.51	44.981	16.53	30	PASS
7	2452	22.542	22.387	13.53	13.50	44.929	16.53	30	PASS





**802.11b (CB mode) DSSS MODULATION: DUAL TX:**

<b>MODULATION TYPE</b>	BPSK	<b>TRANSFER RATE</b>	15.0Mbps
<b>INPUT POWER (SYSTEM)</b>	120Vac, 60 Hz	<b>ENVIRONMENTAL CONDITIONS</b>	26deg.C, 70%RH, 991hPa
<b>TESTED BY</b>	Long Chen		

CHANNEL	CHANNEL FREQUENCY (MHz)	PEAK POWER OUTPUT (mW)		PEAK POWER OUTPUT (dBm)		TOTAL PEAK POWER (mW)	TOTAL PEAK POWER (dBm)	PEAK POWER LIMIT (dBm)	PASS / FAIL
		CHAIN 0	CHAIN 1	CHAIN 0	CHAIN 1				
1	2422	18.030	17.783	12.56	12.50	35.813	15.54	30	PASS
4	2437	18.113	17.947	12.58	12.54	36.060	15.57	30	PASS
7	2452	17.947	17.865	12.54	12.52	35.812	15.54	30	PASS



## 4.5 POWER SPECTRAL DENSITY MEASUREMENT

### 4.5.1 LIMITS OF POWER SPECTRAL DENSITY MEASUREMENT

The Maximum of Power Spectral Density Measurement is 8dBm.

### 4.5.2 TEST INSTRUMENTS

DESCRIPTION & MANUFACTURER	MODEL NO.	SERIAL NO.	CALIBRATED UNTIL
R&S SPECTRUM ANALYZER	FSP40	100040	Jun. 07, 2007

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

### 4.5.3 TEST PROCEDURE

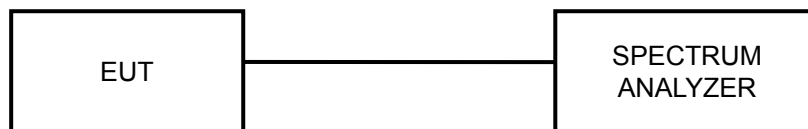
The transmitter output was connected to the spectrum analyzer through an attenuator, the bandwidth of the fundamental frequency was measured with the spectrum analyzer using 3kHz RBW and 30kHz VBW, set sweep time = span/3kHz. The power spectral density was measured and recorded.

The sweep time is allowed to be longer than span/3kHz for a full response of the mixer in the spectrum analyzer.

### 4.5.4 DEVIATION FROM TEST STANDARD

No deviation

#### 4.5.5 TEST SETUP



#### 4.5.6 EUT OPERATING CONDITION

Same as Item 4.3.6

### 4.5.7 TEST RESULTS

#### 802.11b DSSS MODULATION: DUAL TX

<b>MODULATION TYPE</b>	DBPSK	<b>TRANSFER RATE</b>	1.0Mbps
<b>INPUT POWER (SYSTEM)</b>	120Vac, 60 Hz	<b>ENVIRONMENTAL CONDITIONS</b>	26deg.C, 70%RH, 991hPa
<b>TESTED BY</b>	Long Chen		

CHANNEL	CHANNEL FREQUENCY (MHz)	RF POWER LEVEL IN 3kHz BW (mW)		RF POWER LEVEL IN 3kHz BW (dBm)		TOTAL POWER DENSITY (mW)	TOTAL POWER DENSITY (dBm)	MAX. LIMIT (dBm)	PASS / FAIL
		CHAIN 0	CHAIN 1	CHAIN 0	CHAIN 1				
1	2412	0.037	0.036	-14.32	-14.43	0.073	-11.36	8	PASS
6	2437	0.037	0.035	-14.37	-14.61	0.072	-11.48	8	PASS
11	2462	0.036	0.033	-14.40	-14.83	0.069	-11.60	8	PASS

#### FOR CHAIN 0: CH 1

