Test Report

Product Name	Notebook
Model No.	MS-1313, PR300
FCC ID.	I4L-MS6837D3

Applicant	MICRO-STAR INTL Co., LTD.
Address	No. 69, Li-De St., Jung-He City, Taipei Hsien, Taiwan, R.O.C.

Date of Receipt	Apr. 30, 2007
Issued Date	June 21, 2007
Report No.	075L021-RFUSP06V01

Test Report Certification

Issued Date: June 21, 2007
Report No.: 075L021-RFUSP06V01

Product Name	Notebook
Applicant	MICRO-STAR INTL Co., LTD.
Address	No. 69, Li-De St., Jung-He City, Taipei Hsien, Taiwan, R.O.C.
Manufacturer	MICRO-STAR INTL Co., LTD.
Model No.	MS-1313, PR300
FCC ID.	I4L-MS6837D3
Rated Voltage	AC 120V/60Hz
Working Voltage	DC 5V
Trade Name	MSI
Applicable Standard	FCC CFR Title 47 Part 15 Subpart C: 2006 ANSI C63.4: 2003
Test Result	Complied

NVLAP Lab Code: 200533-0

The Test Results relate only to the samples tested.
The test report shall not be reproduced except in full without the written approval of QuieTek Corporation.
This report must not be used to claim product endorsement by NVLAP any agency of the U.S. Government

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Tested By : Tom Hsieh
(Engineer / Tom Hsieh)

Approved By : Gene Chang
(President / Gene Chang)

CNLA 0914

TABLE OF CONTENTS

Description
Page

1. GENERAL INFORMATION 5
1.1. EUT Description 5
1.2. Operational Description 7
1.3. Tested System Details 8
1.4. Configuration of Tested System 8
1.5. EUT Exercise Software 9
1.6. Test Facility 10
2. CONDUCTED EMISSION 11
2.1. Test Equipment 11
2.2. Test Setup 11
2.3. Limits 12
2.4. Test Procedure 12
2.5. Uncertainty 12
2.6. Test Result of Conducted Emission 13
3. PEAK POWER OUTPUT 21
3.1. Test Equipment 21
3.2. Test Setup 21
3.3. Limit 21
3.4. Uncertainty 21
3.5. Test Result of Peak Power Output 22
4. RADIATED EMISSION 26
4.1. Test Equipment 26
4.2. Test Setup 27
4.3. Limits 27
4.4. Test Procedure 28
4.5. Uncertainty 28
4.6. Test Result of Radiated Emission 29
5. BAND EDGE 45
5.1. Test Equipment 45
5.2. Test Setup 45
5.3. Limit 46
5.4. Test Procedure 46
5.5. Uncertainty 46
5.6. Test Result of Band Edge 47
6. CHANNEL NUMBER 63
6.1. Test Equipment 63

6.2. Test Setup 63
6.3. Limit 63
6.4. Uncertainty 63
6.5. Test Result of Channel Number....64
7. CHANNEL SEPARATION....66
7.1. Test Equipment....66
7.2. Test Setup 66
7.3. Limit 66
7.4. Uncertainty 66
7.5. Test Result of Channel Separation....67
8. DWELL TIME....69
8.1. Test Equipment....69
8.2. Test Setup 69
8.3. Limit 69
8.4. Uncertainty 69
8.5. Test Result of Dwell Time....70
9. OCCUPIED BANDWIDTH....76
9.1. Test Equipment....76
9.2. Test Setup 76
9.3. Limits....76
9.4. Uncertainty 76
9.5. Test Result of Occupied Bandwidth....77
10. EMI REDUCTION METHOD DURING COMPLIANCE TESTING....83
Attachment 1: EUT Test Photographs
Attachment 2: EUT Detailed Photographs

1. GENERAL INFORMATION

1.1. EUT Description

Product Name	Notebook
Trade Name	MSI
FCC ID.	I4L-MS6837D3
Model No.	MS-1313, PR300
Frequency Range	2402 - 2480MHz
Channel Number	79
Type of Modulation	1Mbps (GFSK), 2Mbps (π /4 DQPSK), 3Mbps (8DPSK)
Antenna type	Connector / Printed
Channel Control	Auto
Antenna Gain	Refer to the table “Antenna List”
Power Adapter	MFR: LI SHIN, M/N: 0335A1965 Cable Out: Non-Shielded, 1.8m with one ferrite core bonded. Power Cord: Non-Shielded, 1.8m

Antenna List

No.	Manufacturer	Part No.	Peak Gain
1	YAGEO	S79-1800330-Y01	-0.85dBi for 2.4 GHz
2	MSI	MS-6837D (Printed Antenna)	-4.11dBi for 2.4GHz

Frequency of Each Channel:

Channel	Frequency	Channel	Frequency	Channel	Frequency	Channel	Frequency
Channel 00:	2402 MHz	Channel 20:	2422 MHz	Channel 40:	2442 MHz	Channel 60:	2462 MHz
Channel 01:	2403 MHz	Channel 21:	2423 MHz	Channel 41:	2443 MHz	Channel 61:	2463 MHz
Channel 02:	2404 MHz	Channel 22:	2424 MHz	Channel 42:	2444 MHz	Channel 62:	2464 MHz
Channel 03:	2405 MHz	Channel 23:	2425 MHz	Channel 43:	2445 MHz	Channel 63:	2465 MHz
Channel 04:	2406 MHz	Channel 24:	2426 MHz	Channel 44:	2446 MHz	Channel 64:	2466 MHz
Channel 05:	2407 MHz	Channel 25:	2427 MHz	Channel 45:	2447 MHz	Channel 65:	2467 MHz
Channel 06:	2408 MHz	Channel 26:	2428 MHz	Channel 46:	2448 MHz	Channel 66:	2468 MHz
Channel 07:	2409 MHz	Channel 27:	2429 MHz	Channel 47:	2449 MHz	Channel 67:	2469 MHz
Channel 08:	2410 MHz	Channel 28:	2430 MHz	Channel 48:	2450 MHz	Channel 68:	2470 MHz
Channel 09:	2411 MHz	Channel 29:	2431 MHz	Channel 49:	2451 MHz	Channel 69:	2471 MHz
Channel 10:	2412 MHz	Channel 30:	2432 MHz	Channel 50:	2452 MHz	Channel 70:	2472 MHz
Channel 11:	2413 MHz	Channel 31:	2433 MHz	Channel 51:	2453 MHz	Channel 71:	2473 MHz
Channel 12:	2414 MHz	Channel 32:	2434 MHz	Channel 52:	2454 MHz	Channel 72:	2474 MHz
Channel 13:	2415 MHz	Channel 33:	2435 MHz	Channel 53:	2455 MHz	Channel 73:	2475 MHz
Channel 14:	2416 MHz	Channel 34:	2436 MHz	Channel 54:	2456 MHz	Channel 74:	2476 MHz
Channel 15:	2417 MHz	Channel 35:	2437 MHz	Channel 55:	2457 MHz	Channel 75:	2477 MHz
Channel 16:	2418 MHz	Channel 36:	2438 MHz	Channel 56:	2458 MHz	Channel 76:	2478 MHz
Channel 17:	2419 MHz	Channel 37:	2439 MHz	Channel 57:	2459 MHz	Channel 77:	2479 MHz
Channel 18:	2420 MHz	Channel 38:	2440 MHz	Channel 58:	2460 MHz	Channel 78:	2480 MHz
Channel 19:	2421 MHz	Channel 39:	2441 MHz	Channel 59:	2461 MHz		

The system receivers have input bandwidths that match the hopping channel bandwidths of their corresponding transmitters and shift frequencies in synchronization with the transmitted signals

Frequency hopping spread spectrum systems are not required to employ all available hopping channels during each transmission. The transmitter is presented with a continuous data stream. In addition, a system employing short transmission bursts must comply with the definition of a frequency hopping system and must distribute its 79 channels and over the minimum number of hopping channels (75 channels).

The incorporation of intelligence within a frequency hopping spread spectrum system that permits the system to recognize other users within the spectrum band so that it individually and independently chooses and adapts its hopsets to avoid hopping on occupied channels is permitted. The coordination of frequency hopping systems in any other manner for the express purpose of avoiding the simultaneous occupancy of individual hopping frequencies by multiple transmitters is not permitted.

Note:

1. This device is a Notebook with a built-in 2.4GHz Bluetooth 2.0+EDR(Enhanced Data Rate) transceiver.
2. The EUT is including two models for different marketing requirement.
3. These tests were conducted on a sample for the purpose of demonstrating compliance of bluetooth transmitter with Part 15 Subpart C Paragraph 15.247 for spread spectrum devices.
4. Regarding to the operation frequency, the lowest, middle and highest frequency are selected to perform the test.
5. The radiation measurements are performed in X, Y, Z axis positioning. Only the worst case is shown in the report.

1.2. Operational Description

The EUT is an Notebook with a built-in 2.4GHz Bluetooth 2.0+EDR(Enhanced Data Rate) transceiver. The number of the channels is 79 in 2402-2480MHz. The device adapts the frequency hopping spread spectrum modulation. The antenna is connector-type and provides diversity function to improve the receiving function.

This device provides wireless technology that revolutionizes personal connectivity. It is the solution for the seamless integration of Bluetooth technology into personal computer enabling short-range wireless connections between desktop/laptop computers, Bluetooth-enabled peripherals, and portable handheld devices.

Test Mode	Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1
	Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1
	Mode 3: Transmitter -1Mbps(GFSK)- Antenna 2
	Mode 4: Transmitter -3Mbps(8DPSK)-Antenna 2

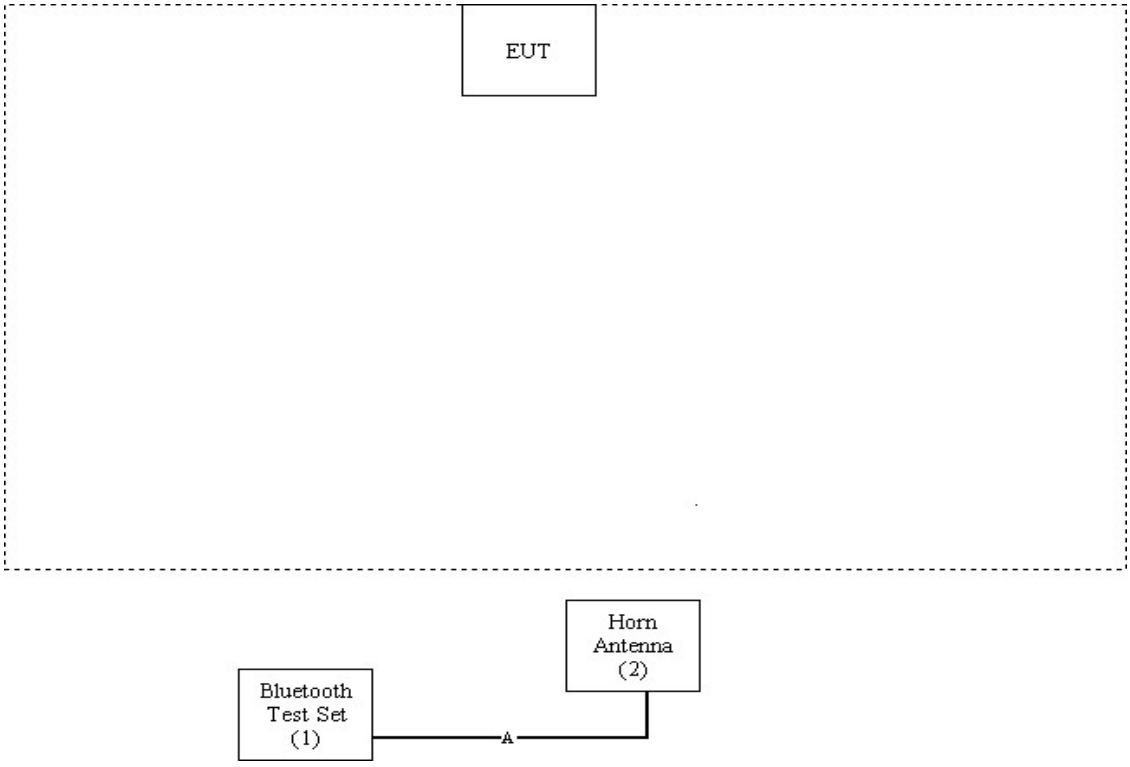
1.3. Tested System Details

The types for all equipment, plus descriptions of all cables used in the tested system (including inserted cards) are:

	Product	Manufacturer	Model No.	Serial No.	Power Cord
(1)	Bluetooth Test Set	Anritsu	MT8852B	6K00006092	Non-Shielded, 1.8m
(2)	Horn Antenna	Schwarzbeck	BBHA9120D	305	N/A

Signal Cable Type		Signal cable Description
A.	RF Cable	Shielded, 1.5m

1.4. Configuration of Tested System



1.5. EUT Exercise Software

1 Setup the EUT and simulators as shown on 1.4.

2 Turn on the power of all equipment.

3 Messages will be transmitted and received through EUT.

4 Test is based on the mandatory continuous transmitter.

5 Repeat the above procedure (3) to (4).

1.6. Test Facility

Ambient conditions in the laboratory:

Items	Required (IEC 68-1)	Actual
Temperature (°C)	15-35	20-35
Humidity (%RH)	25-75	30-65
Barometric pressure (mbar)	860-1060	950-1000

Site Description: File on
Federal Communications Commission
FCC Engineering Laboratory
7435 Oakland Mills Road
Columbia, MD 21046
Reference 31040/SIT1300F2

Accreditation on NVLAP
NVLAP Lab Code: 200533-0

Site Name: Quietek Corporation
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E-Mail : service@quietek.com

0914

FCC Accreditation Number: TW1014

2. Conducted Emission

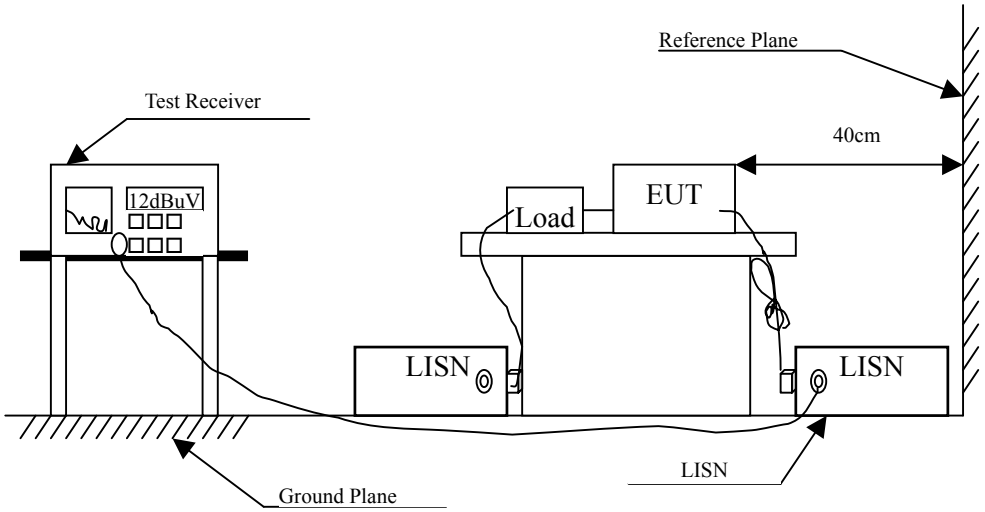
2.1. Test Equipment

The following test equipment are used during the conducted emission test:

Item	Instrument	Manufacturer	Type No./Serial No	Last Cal.	Remark
1	Test Receiver	R & S	ESCS 30/825442/17	May, 2007	
2	L.I.S.N.	R & S	ESH3-Z5/825016/6	May, 2007	EUT
3	L.I.S.N.	Kyoritsu	KNW-407/8-1420-3	May, 2007	Peripherals
4	Pulse Limiter	R & S	ESH3-Z2	May, 2007	
5	No.1 Shielded Room			N/A	

Note: All instruments are calibrated every one year.

2.2. Test Setup



2.3. Limits

FCC Part 15 Subpart C Paragraph 15.207 (dBuV) Limit		
Frequency MHz	Limits	
	QP	AV
0.15 - 0.50	66-56	56-46
0.50-5.0	56	46
5.0 - 30	60	50

Remarks: In the above table, the tighter limit applies at the band edges.

2.4. Test Procedure

The EUT and simulators are connected to the main power through a line impedance stabilization network (L.I.S.N.). This provides a 50 ohm /50uH coupling impedance for the measuring equipment. The peripheral devices are also connected to the main power through a LISN that provides a 50ohm /50uH coupling impedance with 50ohm termination. (Please refer to the block diagram of the test setup and photographs.)

Both sides of A.C. line are checked for maximum conducted interference. In order to find the maximum emission, the relative positions of equipment and all the interface cables must be changed according to ANSI C63.4: 2003 on conducted measurement.

Conducted emissions were invested over the frequency range from 0.15MHz to 30MHz using a receiver bandwidth of 9kHz.

2.5. Uncertainty

± 2.26 dB

2.6. Test Result of Conducted Emission

Product : Notebook
Test Item : Conducted Emission Test
Power Line : Line 1
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV	dB	dBuV
LINE 1					
Quasi-Peak					
0.220	0.202	41.020	41.222	-22.778	64.000
0.355	0.214	35.020	35.234	-24.909	60.143
0.513	0.216	35.670	35.886	-20.114	56.000
0.650	0.222	40.430	40.652	-15.348	56.000
0.718	0.229	33.480	33.709	-22.291	56.000
0.938	0.232	36.170	36.402	-19.598	56.000
Average					
0.220	0.202	34.890	35.092	-18.908	54.000
0.355	0.214	33.110	33.324	-16.819	50.143
0.513	0.216	35.060	35.276	-10.724	46.000
0.650	0.222	34.650	34.872	-11.128	46.000
0.718	0.229	32.330	32.559	-13.441	46.000
0.938	0.232	32.110	32.342	-13.658	46.000

Note:

1. All Reading Levels are Quasi-Peak and average value.
2. " " means the worst emission level.
3. Measurement Level = Reading Level + Correct Factor

Product : Notebook
Test Item : Conducted Emission Test
Power Line : Line 2
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV	dB	dBuV
LINE 2					
Quasi-Peak					
0.224	0.202	38.060	38.262	-25.624	63.886
0.289	0.207	38.070	38.277	-23.752	62.029
0.357	0.214	33.990	34.204	-25.882	60.086
0.517	0.216	30.890	31.106	-24.894	56.000
0.647	0.218	38.710	38.928	-17.072	56.000
0.869	0.231	33.800	34.031	-21.969	56.000
Average					
0.224	0.202	31.590	31.792	-22.094	53.886
0.289	0.207	34.700	34.907	-17.122	52.029
0.357	0.214	33.040	33.254	-16.832	50.086
0.517	0.216	29.140	29.356	-16.644	46.000
0.647	0.218	31.620	31.838	-14.162	46.000
0.869	0.231	24.200	24.431	-21.569	46.000

Note:

1. All Reading Levels are Quasi-Peak and average value.
2. " " means the worst emission level.
3. Measurement Level = Reading Level + Correct Factor

Product : Notebook
Test Item : Conducted Emission Test
Power Line : Line 1
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV	dB	dBuV
LINE 1					
Quasi-Peak					
0.220	0.202	40.770	40.972	-23.028	64.000
0.355	0.214	35.940	36.154	-23.989	60.143
0.513	0.216	35.790	36.006	-19.994	56.000
0.648	0.221	40.790	41.011	-14.989	56.000
0.715	0.229	33.560	33.789	-22.211	56.000
0.938	0.232	36.210	36.442	-19.558	56.000
Average					
0.220	0.202	33.610	33.812	-20.188	54.000
0.355	0.214	34.670	34.884	-15.259	50.143
0.513	0.216	34.960	35.176	-10.824	46.000
0.648	0.221	35.160	35.381	-10.619	46.000
0.715	0.229	32.330	32.559	-13.441	46.000
0.938	0.232	32.040	32.272	-13.728	46.000

Note:

1. All Reading Levels are Quasi-Peak and average value.
2. " " means the worst emission level.
3. Measurement Level = Reading Level + Correct Factor

Product : Notebook
Test Item : Conducted Emission Test
Power Line : Line 2
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV	dB	dBuV
LINE 2					
Quasi-Peak					
0.240	0.203	34.430	34.633	-28.796	63.429
0.290	0.207	38.370	38.577	-23.423	62.000
0.360	0.214	33.750	33.964	-26.036	60.000
0.512	0.216	31.520	31.736	-24.264	56.000
0.577	0.217	35.070	35.287	-20.713	56.000
0.650	0.218	38.190	38.408	-17.592	56.000
Average					
0.240	0.203	17.720	17.923	-35.506	53.429
0.290	0.207	35.160	35.367	-16.633	52.000
0.360	0.214	33.230	33.444	-16.556	50.000
0.512	0.216	29.570	29.786	-16.214	46.000
0.577	0.217	25.020	25.237	-20.763	46.000
0.650	0.218	32.880	33.098	-12.902	46.000

Note:

1. All Reading Levels are Quasi-Peak and average value.
2. " " means the worst emission level.
3. Measurement Level = Reading Level + Correct Factor

Product : Notebook
Test Item : Conducted Emission Test
Power Line : Line 1
Test Mode : Mode 3: Transmitter -1Mbps(GFSK)- Antenna 2 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV	dB	dBuV
LINE 1					
Quasi-Peak					
0.240	0.203	39.130	39.333	-24.096	63.429
0.355	0.214	37.010	37.224	-22.919	60.143
0.520	0.216	36.760	36.976	-19.024	56.000
0.645	0.220	38.310	38.530	-17.470	56.000
0.872	0.231	40.800	41.031	-14.969	56.000
0.940	0.232	36.620	36.852	-19.148	56.000
Average					
0.240	0.203	28.560	28.763	-24.666	53.429
0.355	0.214	36.780	36.994	-13.149	50.143
0.520	0.216	36.290	36.506	-9.494	46.000
0.645	0.220	34.650	34.870	-11.130	46.000
0.872	0.231	30.210	30.441	-15.559	46.000
0.940	0.232	32.040	32.272	-13.728	46.000

Note:

1. All Reading Levels are Quasi-Peak and average value.
2. " " means the worst emission level.
3. Measurement Level = Reading Level + Correct Factor

Product : Notebook
Test Item : Conducted Emission Test
Power Line : Line 2
Test Mode : Mode 3: Transmitter -1Mbps(GFSK)- Antenna 2 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV	dB	dBuV
LINE 2					
Quasi-Peak					
0.233	0.203	36.470	36.673	-26.956	63.629
0.288	0.207	37.520	37.727	-24.330	62.057
0.358	0.214	33.100	33.314	-26.743	60.057
0.518	0.216	33.610	33.826	-22.174	56.000
0.581	0.217	37.120	37.337	-18.663	56.000
0.641	0.218	34.180	34.398	-21.602	56.000
Average					
0.233	0.203	29.730	29.933	-23.696	53.629
0.288	0.207	33.860	34.067	-17.990	52.057
0.358	0.214	31.440	31.654	-18.403	50.057
0.518	0.216	32.410	32.626	-13.374	46.000
0.581	0.217	30.740	30.957	-15.043	46.000
0.641	0.218	26.870	27.088	-18.912	46.000

Note:

1. All Reading Levels are Quasi-Peak and average value.
2. " " means the worst emission level.
3. Measurement Level = Reading Level + Correct Factor

Product : Notebook
Test Item : Conducted Emission Test
Power Line : Line 1
Test Mode : Mode 4: Transmitter -3Mbps(8DPSK)-Antenna 2 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV	dB	dBuV
LINE 1					
Quasi-Peak					
0.228	0.203	33.240	33.443	-30.328	63.771
0.291	0.214	39.260	39.474	-22.497	61.971
0.353	0.214	34.870	35.084	-25.116	60.200
0.516	0.216	30.810	31.026	-24.974	56.000
0.643	0.220	35.670	35.890	-20.110	56.000
0.938	0.232	32.950	33.182	-22.818	56.000
Average					
0.228	0.203	32.980	33.183	-20.588	53.771
0.291	0.214	36.470	36.684	-15.287	51.971
0.353	0.214	34.290	34.504	-15.696	50.200
0.516	0.216	27.600	27.816	-18.184	46.000
0.643	0.220	30.990	31.210	-14.790	46.000
0.938	0.232	26.960	27.192	-18.808	46.000

Note:

1. All Reading Levels are Quasi-Peak and average value.
2. " " means the worst emission level.
3. Measurement Level = Reading Level + Correct Factor

Product : Notebook
Test Item : Conducted Emission Test
Power Line : Line 2
Test Mode : Mode 4: Transmitter -3Mbps(8DPSK)-Antenna 2 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV	dB	dBuV
LINE 2					
Quasi-Peak					
0.236	0.203	37.490	37.693	-25.850	63.543
0.291	0.208	39.400	39.608	-22.363	61.971
0.354	0.214	34.910	35.124	-25.047	60.171
0.521	0.216	34.100	34.316	-21.684	56.000
0.641	0.218	34.420	34.638	-21.362	56.000
0.871	0.231	36.440	36.671	-19.329	56.000
Average					
0.236	0.203	27.070	27.273	-26.270	53.543
0.291	0.208	36.650	36.858	-15.113	51.971
0.354	0.214	34.510	34.724	-15.447	50.171
0.521	0.216	33.260	33.476	-12.524	46.000
0.641	0.218	27.350	27.568	-18.432	46.000
0.871	0.231	25.310	25.541	-20.459	46.000

Note:

1. All Reading Levels are Quasi-Peak and average value.
2. " " means the worst emission level.
3. Measurement Level = Reading Level + Correct Factor

3. Peak Power Output

3.1. Test Equipment

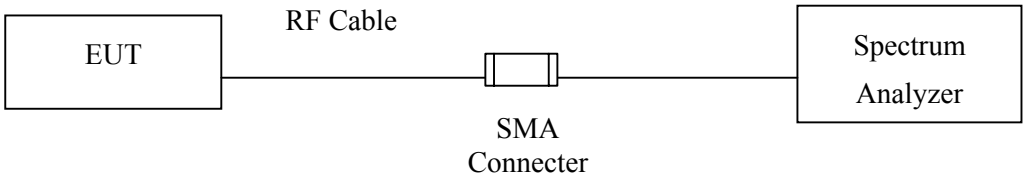
The following test equipments are used during the radiated emission tests:

	Equipment	Manufacturer	Model No./Serial No.	Last Cal.
X	Spectrum Analyzer	R & S	FSP40 / 100170	Nov, 2007

Note: 1. All equipments are calibrated every one year.

2. The test instruments marked by "X" are used to measure the final test results.

3.2. Test Setup



3.3. Limit

The maximum peak power shall be less 1Watt.

3.4. Uncertainty

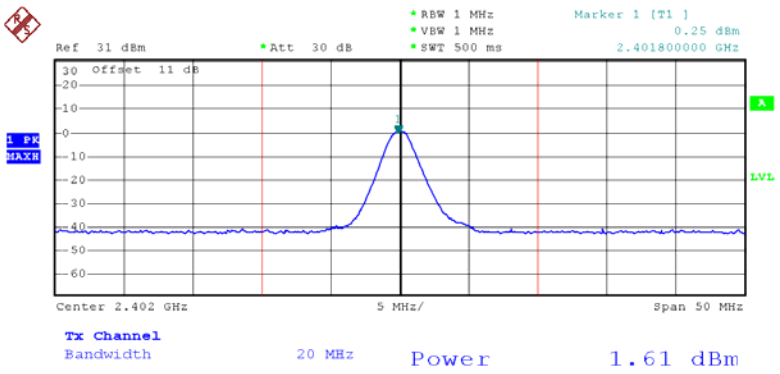
± 1.27 dB

3.5. Test Result of Peak Power Output

Product : Notebook
Test Item : Peak Power Output
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1

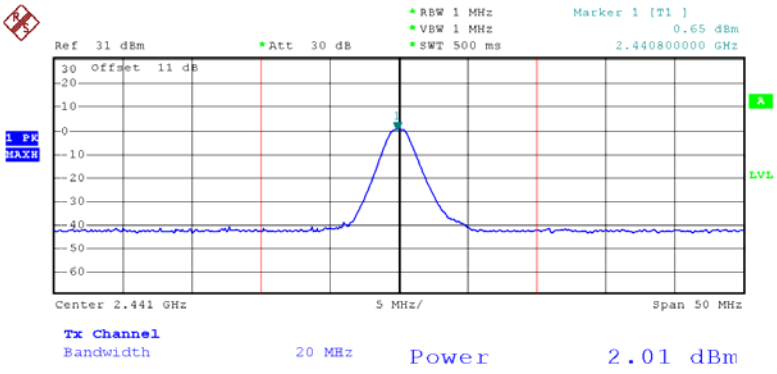
Channel No.	Frequency (MHz)	Measurement	Required Limit	Result
Channel 00	2402.00	1.61dBm	1 Watt= 30 dBm	Pass
Channel 39	2441.00	2.01dBm	1 Watt= 30 dBm	Pass
Channel 78	2480.00	2.46dBm	1 Watt= 30 dBm	Pass

Channel 00



PN1
Date: 7.MAY.2007 11:05:09

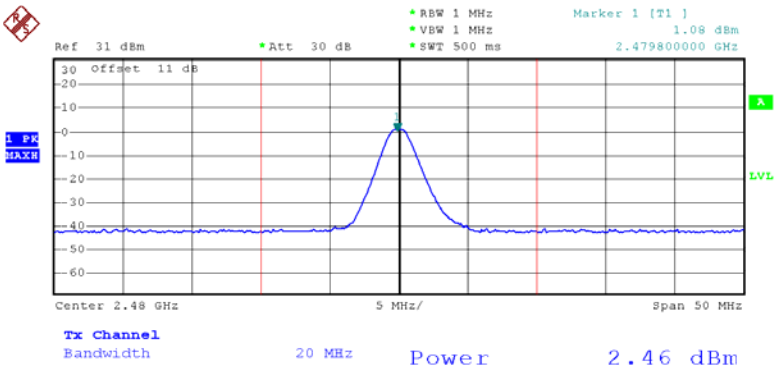
Channel 39



PN1

Date: 7.MAY.2007 11:05:50

Channel 78



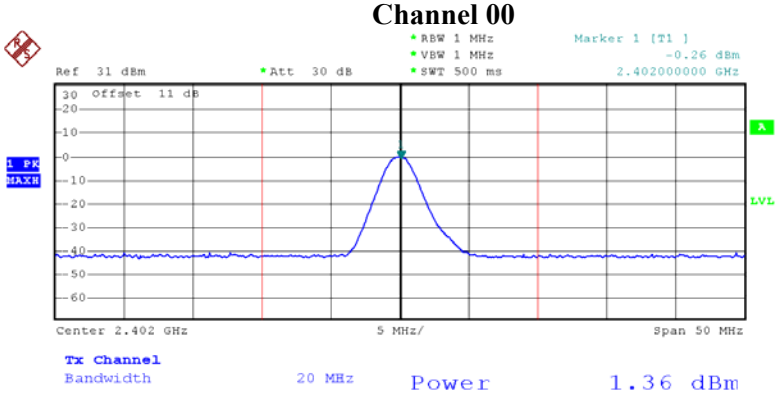
PN1

Date: 7.MAY.2007 11:06:39

Product : Notebook
Test Item : Peak Power Output
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1

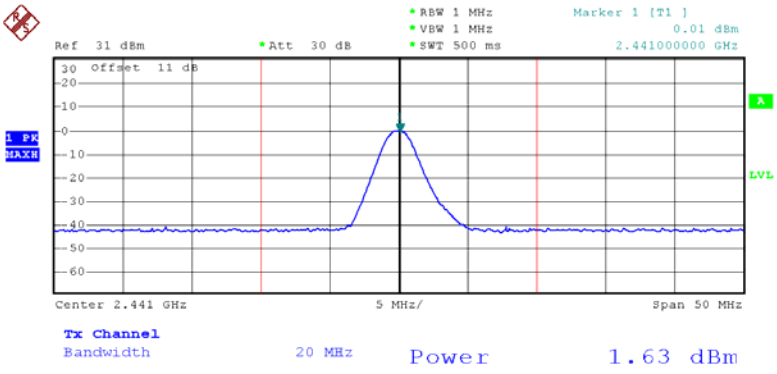
Channel No.	Frequency (MHz)	Measurement	Required Limit	Result
Channel 00	2402.00	1.36dBm	1 Watt= 30 dBm	Pass
Channel 39	2441.00	1.63dBm	1 Watt= 30 dBm	Pass
Channel 78	2480.00	1.88dBm	1 Watt= 30 dBm	Pass

Channel 00



PN1
Date: 7.MAY.2007 11:08:49

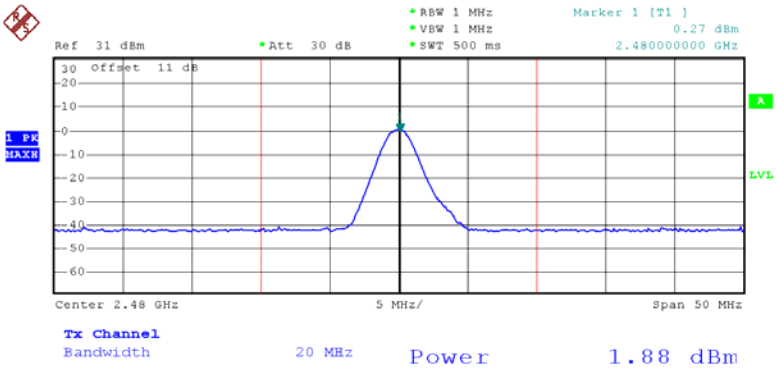
Channel 39



PN1

Date: 7.MAY.2007 11:09:37

Channel 78



PN1

Date: 7.MAY.2007 11:10:28

4. Radiated Emission

4.1. Test Equipment

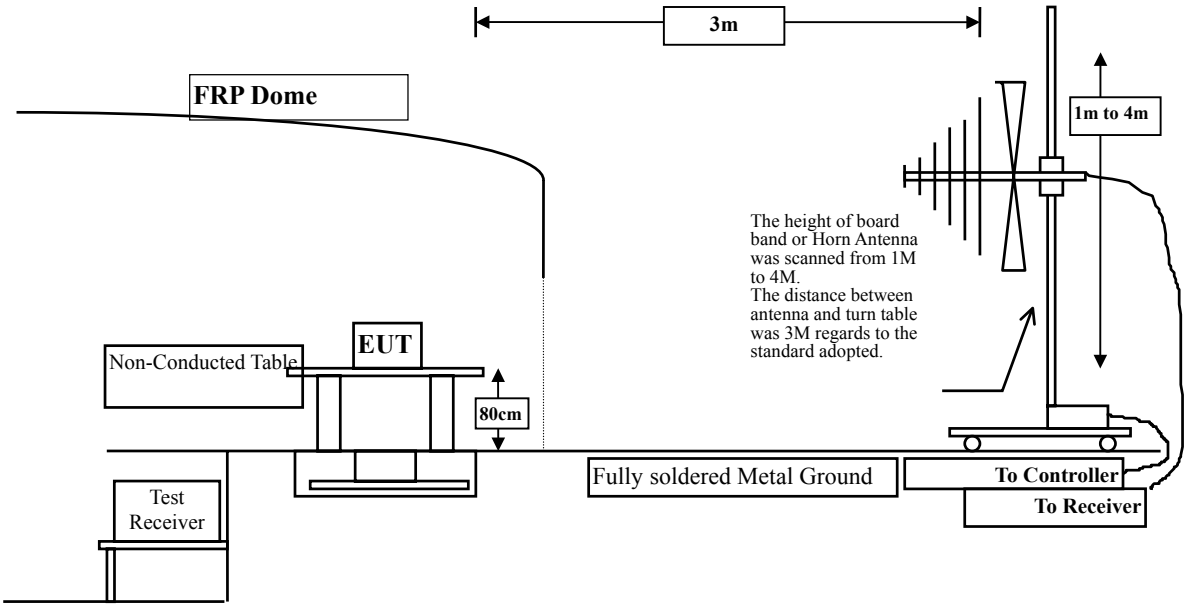
The following test equipments are used during the radiated emission test:

Test Site	Equipment	Manufacturer	Model No./Serial No.	Last Cal.
☐Site # 1	Test Receiver	R & S	ESVS 10 / 834468/003	May, 2007
	Spectrum Analyzer	Advantest	R3162/ 00803480	May, 2007
	Pre-Amplifier	Advantest	BB525C/ 3307A01812	May, 2007
	Bilog Antenna	SCHAFFNER	CBL6112B / 2697	Sep., 2006
☐Site # 2	Test Receiver	R & S	ESCS 30 / 836858 / 022	May, 2007
	Spectrum Analyzer	Advantest	R3162 / 100803466	May, 2007
	Pre-Amplifier	Advantest	BB525C/3307A01814	May, 2007
	Bilog Antenna	SCHAFFNER	CBL6112B / 2705	May, 2007
	Horn Antenna	ETS	3115 / 0005-6160	Sep., 2006
	Pre-Amplifier	QTK	QTK-AMP-01/ 0001	May, 2007
☒Site # 3	Test Receiver	R & S	ESI 26 / 838786 / 004	May, 2007
	Spectrum Analyzer	HP	E4407B / US39440758	May, 2007
	Bilog Antenna	SCHAFFNER	CBL6112B / 2697	May, 2007
	Horn Antenna	Schwarzbeck	BBHA9120D / 305, 306	July, 2006
	Horn Antenna	Schwarzbeck	BBHA9170 / 208, 209	July, 2006
	Pre-Amplifier	QTK	QTK-AMP-01 / 0001	July, 2006
	Pre-Amplifier	QTK	QTK-AMP-03 / 0003	May, 2007
	Pre-Amplifier	HP	8449B / 3008A01123	July, 2006

Note: 1. All equipments are calibrated every one year.

2. The test instruments marked by "X" are used to measure the final test results.

4.2. Test Setup



4.3. Limits

➢ **General Radiated Emission Limits**

Emissions radiated outside of the specified frequency bands, except for harmonics, shall be attenuated by at least 20dB below the level of the fundamental or to the general radiated emission limits in paragraph 15.209, whichever is the lesser attenuation.

FCC Part 15 Subpart C Paragraph 15.209 Limits		
Frequency MHz	uV/m @3m	dBuV/m@3m
30-88	100	40
88-216	150	43.5
216-960	200	46
Above 960	500	54

Remarks: 1. RF Voltage (dBuV) = 20 log RF Voltage (uV)

2. In the Above Table, the tighter limit applies at the band edges.

3. Distance refers to the distance in meters between the measuring instrument antenna and the closed point of any part of the device or system.

4.4. Test Procedure

The EUT and its simulators are placed on a turn table which is 0.8 meter above ground. The turn table can rotate 360 degrees to determine the position of the maximum emission level.
The EUT was positioned such that the distance from antenna to the EUT was 3 meters.
The antenna can move up and down between 1 meter and 4 meters to find out the maximum emission level.
Both horizontal and vertical polarization of the antenna are set on measurement. In order to find the maximum emission, all of the interface cables must be manipulated according to ANSI C63.4: 2003 on radiated measurement.
The additional latch filter below 1GHz was used to measure the level of harmonics radiated emission during field dtrength of harmonics measurement.
The bandwidth below 1GHz setting on the field strength meter is 120 kHz, above 1GHz are 1 MHz.
The frequency range from 30MHz to 10th harminics is checked.

4.5. Uncertainty

± 3.9 dB above 1GHz
± 3.8 dB below 1GHz

4.6. Test Result of Radiated Emission

Product : Notebook
Test Item : Harmonic Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1(2402MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal					
Peak Detector:					
4804.000	3.663	43.200	46.863	-27.107	74.000
7206.000	9.357	41.500	50.856	-23.114	74.000
9608.000	11.842	38.600	50.442	-23.528	74.000
Average					
Detector:					
--					
Vertical					
Peak Detector:					
4804.000	3.663	48.500	52.163	-21.807	74.000
7206.000	9.357	43.200	52.556	-21.414	74.000
9608.000	11.842	38.100	49.942	-24.028	74.000
Average					
Detector:					
--					

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. Receiver setting (Peak Detector) : RBW:1MHz; VBW:1MHz; Span:100MHz。
3. Receiver setting (AVG Detector) : RBW:1MHz; VBW:3KHz; Span:20MHz。
4. Emission Level = Reading Level + Correct Factor.
5. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Harmonic Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1(2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal Peak Detector:					
4882.000	3.921	45.100	49.021	-24.949	74.000
7323.000	9.657	42.000	51.657	-22.313	74.000
9764.000	11.798	37.400	49.198	-24.772	74.000
Average Detector:					
--					
Vertical Peak Detector:					
4882.000	3.921	48.300	52.221	-21.749	74.000
7323.000	9.657	43.500	53.157	-20.813	74.000
9764.000	11.798	36.500	48.298	-25.672	74.000
Average Detector:					
--					

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. Receiver setting (Peak Detector) : RBW:1MHz; VBW:1MHz; Span:100MHz。
3. Receiver setting (AVG Detector) : RBW:1MHz; VBW:3KHz; Span:20MHz。
4. Emission Level = Reading Level + Correct Factor.
5. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Harmonic Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1(2480MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal Peak Detector:					
4960.000	4.197	44.600	48.796	-25.174	74.000
7440.000	9.951	43.100	53.051	-20.919	74.000
9920.000	11.856	36.900	48.756	-25.214	74.000
Average Detector:					
--					
Vertical Peak Detector:					
4960.000	4.197	48.900	53.096	-20.874	74.000
7440.000	9.951	43.100	53.051	-20.919	74.000
9920.000	11.856	36.200	48.056	-25.914	74.000
Average Detector:					
--					

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. Receiver setting (Peak Detector) : RBW:1MHz; VBW:1MHz; Span:100MHz。
3. Receiver setting (AVG Detector) : RBW:1MHz; VBW:3KHz; Span:20MHz。
4. Emission Level = Reading Level + Correct Factor.
5. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Harmonic Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1 (2402MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal					
Peak Detector:					
4804.000	3.663	43.200	46.863	-27.107	74.000
7206.000	9.357	36.800	46.156	-27.814	74.000
9608.000	11.842	35.200	47.042	-26.928	74.000
Average Detector:					
--					
Vertical					
Peak Detector:					
4804.000	3.663	43.200	46.863	-27.107	74.000
7206.000	9.357	40.300	49.656	-24.314	74.000
9608.000	11.842	37.100	48.942	-25.028	74.000
Average Detector:					
--					

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. Receiver setting (Peak Detector) : RBW:1MHz; VBW:1MHz; Span:100MHz。
3. Receiver setting (AVG Detector) : RBW:1MHz; VBW:3KHz; Span:20MHz。
4. Emission Level = Reading Level + Correct Factor.
5. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Harmonic Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal Peak Detector:					
4882.000	3.921	42.100	46.021	-27.949	74.000
7323.000	9.657	39.300	48.957	-25.013	74.000
9764.000	11.798	36.500	48.298	-25.672	74.000
Average Detector:					
--					
Vertical Peak Detector:					
4882.000	3.921	42.100	46.021	-27.949	74.000
7323.000	9.657	37.900	47.557	-26.413	74.000
9764.000	11.798	36.500	48.298	-25.672	74.000
Average Detector:					
--					

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. Receiver setting (Peak Detector) : RBW:1MHz; VBW:1MHz; Span:100MHz。
3. Receiver setting (AVG Detector) : RBW:1MHz; VBW:3KHz; Span:20MHz。
4. Emission Level = Reading Level + Correct Factor.
5. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Harmonic Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1 (2480MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal Peak Detector:					
4960.000	4.197	43.590	47.786	-26.184	74.000
7440.000	9.951	39.300	49.251	-24.719	74.000
9920.000	11.856	37.900	49.756	-24.214	74.000
Average Detector:					
--					
Vertical Peak Detector:					
4960.000	4.197	42.800	46.996	-26.974	74.000
7440.000	9.951	38.600	48.551	-25.419	74.000
9920.000	11.856	39.960	51.816	-22.154	74.000
Average Detector:					
--					

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. Receiver setting (Peak Detector) : RBW:1MHz; VBW:1MHz; Span:100MHz。
3. Receiver setting (AVG Detector) : RBW:1MHz; VBW:3KHz; Span:20MHz。
4. Emission Level = Reading Level + Correct Factor.
5. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Harmonic Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 3: Transmitter -1Mbps(GFSK)- Antenna 2 (2402MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal					
Peak Detector:					
4804.000	3.663	46.900	50.563	-23.407	74.000
7206.000	9.357	34.200	43.556	-30.414	74.000
9608.000	11.842	33.800	45.642	-28.328	74.000
Average Detector:					
--					
Vertical					
Peak Detector:					
4804.000	3.663	48.200	51.863	-22.107	74.000
7206.000	9.357	33.580	42.936	-31.034	74.000
9608.000	11.842	33.800	45.642	-28.328	74.000
Average Detector:					
--					

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. Receiver setting (Peak Detector) : RBW:1MHz; VBW:1MHz; Span:100MHz。
3. Receiver setting (AVG Detector) : RBW:1MHz; VBW:3KHz; Span:20MHz。
4. Emission Level = Reading Level + Correct Factor.
5. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Harmonic Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 3: Transmitter -1Mbps(GFSK)- Antenna 2 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal Peak Detector:					
4882.000	3.921	46.500	50.421	-23.549	74.000
7323.000	9.657	33.600	43.257	-30.713	74.000
9764.000	11.798	35.200	46.998	-26.972	74.000
Average Detector:					
--					
Vertical Peak Detector:					
4882.000	3.921	46.900	50.821	-23.149	74.000
7323.000	9.657	36.600	46.257	-27.713	74.000
9764.000	11.798	35.400	47.198	-26.772	74.000
Average Detector:					
--					

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. Receiver setting (Peak Detector) : RBW:1MHz; VBW:1MHz; Span:100MHz。
3. Receiver setting (AVG Detector) : RBW:1MHz; VBW:3KHz; Span:20MHz。
4. Emission Level = Reading Level + Correct Factor.
5. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Harmonic Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 3: Transmitter -1Mbps(GFSK)- Antenna 2 (2480MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal Peak Detector:					
4960.000	4.197	49.100	53.296	-20.674	74.000
7440.000	9.951	39.900	49.851	-24.119	74.000
9920.000	11.856	39.100	50.956	-23.014	74.000
Average Detector:					
--					
Vertical Peak Detector:					
4960.000	4.197	48.100	52.296	-21.674	74.000
7440.000	9.951	39.200	49.151	-24.819	74.000
9920.000	11.856	39.100	50.956	-23.014	74.000
Average Detector:					
--					

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. Receiver setting (Peak Detector) : RBW:1MHz; VBW:1MHz; Span:100MHz。
3. Receiver setting (AVG Detector) : RBW:1MHz; VBW:3KHz; Span:20MHz。
4. Emission Level = Reading Level + Correct Factor.
5. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Harmonic Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 4: Transmitter -3Mbps(8DPSK)-Antenna 2 (2402MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal					
Peak Detector:					
4804.000	3.663	42.900	46.563	-27.407	74.000
7206.000	9.357	38.900	48.256	-25.714	74.000
9608.000	11.842	38.400	50.242	-23.728	74.000
Average Detector:					
--					
Vertical					
Peak Detector:					
4804.000	3.663	46.500	50.163	-23.807	74.000
7206.000	9.357	37.400	46.756	-27.214	74.000
9608.000	11.842	39.100	50.942	-23.028	74.000
Average Detector:					
--					

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. Receiver setting (Peak Detector) : RBW:1MHz; VBW:1MHz; Span:100MHz。
3. Receiver setting (AVG Detector) : RBW:1MHz; VBW:3KHz; Span:20MHz。
4. Emission Level = Reading Level + Correct Factor.
5. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Harmonic Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 4: Transmitter -3Mbps(8DPSK)-Antenna 2 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal Peak Detector:					
4882.000	3.921	43.200	47.121	-26.849	74.000
7323.000	9.657	39.500	49.157	-24.813	74.000
9764.000	11.798	36.200	47.998	-25.972	74.000
Average Detector:					
--					
Vertical Peak Detector:					
4882.000	3.921	46.800	50.721	-23.249	74.000
7323.000	9.657	36.900	46.557	-27.413	74.000
9764.000	11.798	38.200	49.998	-23.972	74.000
Average Detector:					
--					

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. Receiver setting (Peak Detector) : RBW:1MHz; VBW:1MHz; Span:100MHz。
3. Receiver setting (AVG Detector) : RBW:1MHz; VBW:3KHz; Span:20MHz。
4. Emission Level = Reading Level + Correct Factor.
5. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Harmonic Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 4: Transmitter -3Mbps(8DPSK)-Antenna 2 (2480MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal Peak Detector:					
4960.000	4.197	44.800	48.996	-24.974	74.000
7440.000	9.951	38.900	48.851	-25.119	74.000
9920.000	11.856	39.900	51.756	-22.214	74.000
Average Detector:					
--					
Vertical Peak Detector:					
4960.000	4.197	46.300	50.496	-23.474	74.000
7440.000	9.951	38.500	48.451	-25.519	74.000
9920.000	11.856	38.500	50.356	-23.614	74.000
Average Detector:					
--					

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. Receiver setting (Peak Detector) : RBW:1MHz; VBW:1MHz; Span:100MHz。
3. Receiver setting (AVG Detector) : RBW:1MHz; VBW:3KHz; Span:20MHz。
4. Emission Level = Reading Level + Correct Factor.
5. The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : General Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1(2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal					
240.300	11.996	11.250	23.246	-22.754	46.000
262.100	14.538	15.350	29.888	-16.112	46.000
345.300	14.663	10.300	24.963	-21.037	46.000
592.300	20.061	14.300	34.361	-11.639	46.000
600.300	20.046	12.340	32.386	-13.614	46.000
643.100	20.921	14.200	35.121	-10.879	46.000
Vertical					
214.300	10.667	13.220	23.887	-19.613	43.500
371.300	16.645	15.300	31.945	-14.055	46.000
415.600	19.615	13.360	32.975	-13.025	46.000
473.600	18.377	15.400	33.777	-12.223	46.000
500.100	18.381	11.900	30.281	-15.719	46.000
759.300	22.929	14.530	37.459	-8.541	46.000

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. " " means the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The radiated emissions below 1GHz of the lowest, middle, highest frequency are pretested. Only the worst case is shown on the report.

Product : Notebook
Test Item : General Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal					
170.300	10.176	11.800	21.976	-21.524	43.500
214.200	9.334	14.100	23.434	-20.066	43.500
272.300	13.301	16.330	29.631	-16.369	46.000
386.300	15.750	14.320	30.070	-15.930	46.000
500.100	18.307	12.330	30.637	-15.363	46.000
760.300	22.053	14.200	36.253	-9.747	46.000
Vertical					
170.300	9.759	12.900	22.659	-20.841	43.500
200.300	9.662	10.200	19.863	-23.637	43.500
236.300	11.814	5.300	17.114	-28.886	46.000
506.300	18.614	11.300	29.914	-16.086	46.000
760.300	23.026	9.300	32.325	-13.675	46.000
815.300	21.660	1.800	23.459	-22.541	46.000

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. " " means the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The radiated emissions below 1GHz of the lowest, middle, highest frequency are pretested. Only the worst case is shown on the report.

Product : Notebook
Test Item : General Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 3: Transmitter -1Mbps(GFSK)- Antenna 2 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal					
170.300	10.176	9.300	19.476	-24.024	43.500
224.000	10.280	10.600	20.880	-25.120	46.000
236.300	11.514	12.300	23.814	-22.186	46.000
415.300	17.595	11.360	28.955	-17.045	46.000
440.000	17.562	13.900	31.462	-14.538	46.000
670.000	20.634	13.330	33.964	-12.036	46.000
Vertical					
201.300	9.758	10.800	20.558	-22.942	43.500
257.300	14.190	14.200	28.390	-17.610	46.000
270.100	14.022	16.300	30.322	-15.678	46.000
415.300	19.614	13.540	33.154	-12.846	46.000
471.300	18.442	17.300	35.742	-10.258	46.000
541.300	20.326	16.700	37.027	-8.973	46.000

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. " " means the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The radiated emissions below 1GHz of the lowest, middle, highest frequency are pretested. Only the worst case is shown on the report.

Product : Notebook
Test Item : General Radiated Emission
Test Site : No.3 OATS
Test Mode : Mode 4: Transmitter -3Mbps(8DPSK)-Antenna 2 (2441MHz)

Frequency	Correct Factor	Reading Level	Measurement Level	Margin	Limit
MHz	dB	dBuV	dBuV/m	dB	dBuV/m
Horizontal					
170.600	10.167	11.340	21.507	-21.993	43.500
214.300	9.334	12.700	22.034	-21.466	43.500
243.300	12.281	14.500	26.781	-19.219	46.000
386.300	15.750	13.540	29.290	-16.710	46.000
473.600	18.650	16.300	34.950	-11.050	46.000
760.000	21.958	6.800	28.757	-17.243	46.000
Vertical					
190.100	9.536	14.300	23.835	-19.665	43.500
228.300	11.133	17.300	28.432	-17.568	46.000
270.100	14.022	18.300	32.322	-13.678	46.000
300.000	13.720	14.200	27.920	-18.080	46.000
440.000	18.923	11.200	30.123	-15.877	46.000
500.100	18.381	12.900	31.281	-14.719	46.000

Note:

1. All Readings below 1GHz are Quasi-Peak, above are performed with peak and/or average measurements as necessary.
2. " " means the worst emission level.
3. Measurement Level = Reading Level + Correct Factor.
4. The radiated emissions below 1GHz of the lowest, middle, highest frequency are pretested. Only the worst case is shown on the report.

5. Band Edge

5.1. Test Equipment

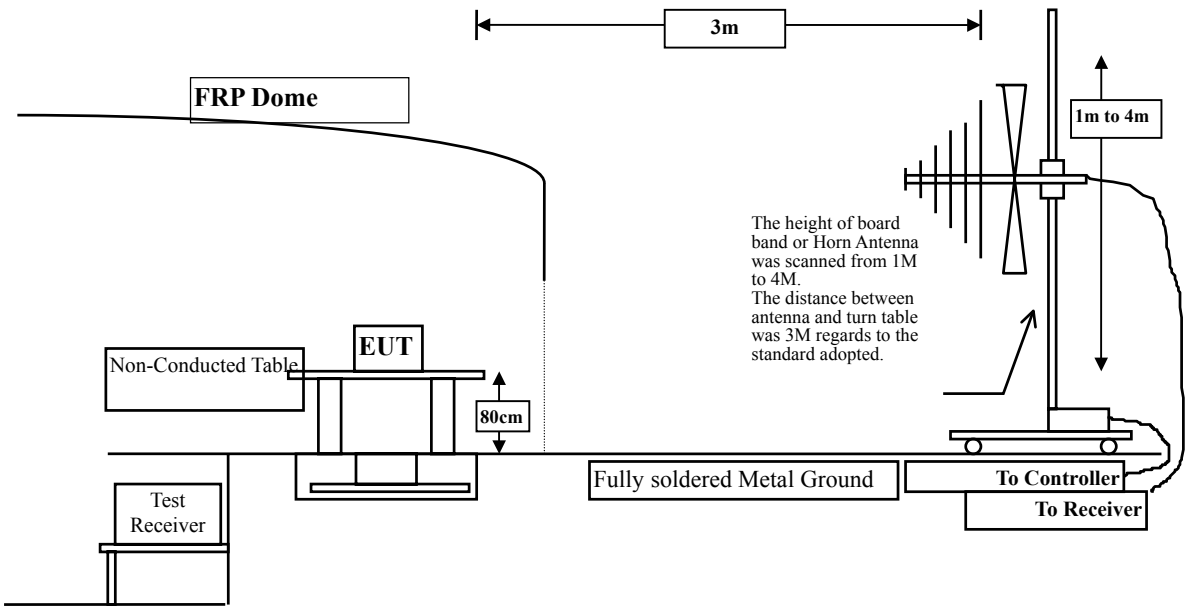
The following test equipments are used during the band edge tests:

	Equipment	Manufacturer	Model No./Serial No.	Last Cal.
X	Test Receiver	R & S	ESI 26 / 838786 / 004	May, 2007
X	Spectrum Analyzer	HP	E4407B / US39440758	May, 2007
X	Bilog Antenna	SCHAFFNER	CBL6112B / 2697	May, 2007
X	Horn Antenna	Schwarzbeck	BBHA9120D / 305, 306	July, 2006
X	Horn Antenna	Schwarzbeck	BBHA9170 / 208, 209	July, 2006
X	Pre-Amplifier	QTK	QTK-AMP-01 / 0001	July, 2006
X	Pre-Amplifier	QTK	QTK-AMP-03 / 0003	May, 2007
X	Pre-Amplifier	HP	8449B / 3008A01123	July, 2006
Test Site		Site 3		

Note: 1. All equipments are calibrated every one year.
2. The test instruments marked by "X" are used to measure the final test results.

5.2. Test Setup

RF Radiated Measurement:



5.3. Limit

In any 100 kHz bandwidth outside the frequency band in which the spread spectrum intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 20 dB below that in the 100 kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement. Attenuation below the general limits specified in Section 15.209(a) is not required. In addition, radiated emissions which fall in the restricted bands, as defined in Section 15.205(a), must also comply with the radiated emission limits specified in Section 15.209(a) (see Section 15.205(c)).

5.4. Test Procedure

The EUT and its simulators are placed on a turn table which is 0.8 meter above ground. The turn table can rotate 360 degrees to determine the position of the maximum emission level. The EUT was positioned such that the distance from antenna to the EUT was 3 meters.
The antenna can move up and down between 1 meter and 4 meters to find out the maximum emission level.
Both horizontal and vertical polarization of the antenna are set on measurement. In order to find the maximum emission, all of the interface cables must be manipulated according to ANSI C63.4:2003 on radiated measurement.
The bandwidth below 1GHz setting on the field strength meter is 120 kHz, above 1GHz are 1 MHz.

5.5. Uncertainty

± 3.9 dB above 1GHz
± 3.8 dB below 1GHz

5.6. Test Result of Band Edge

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1(2402MHz)

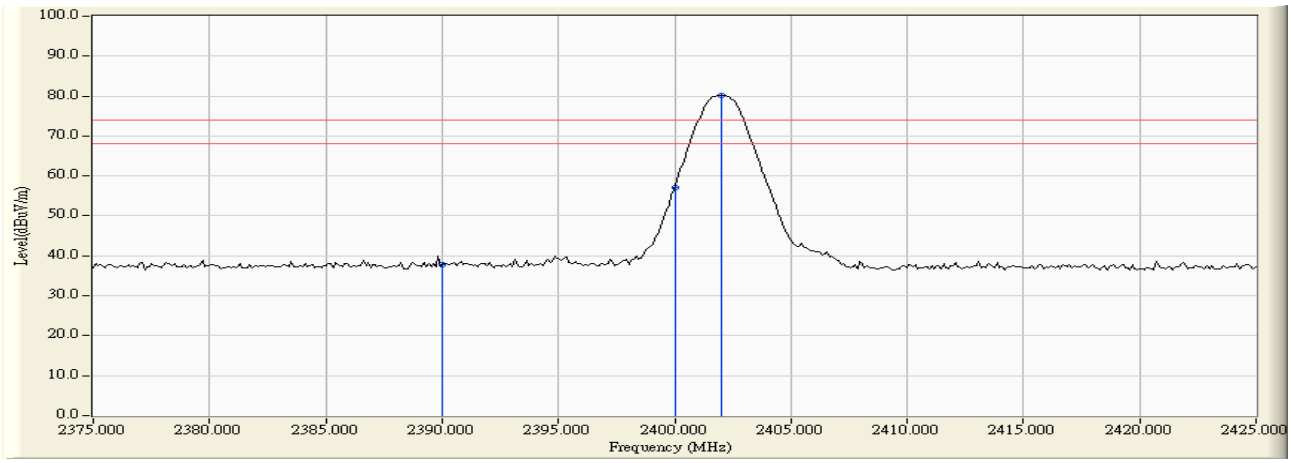
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
00	<2400	>20	Pass

RF Radiated Measurement (Horizontal):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
00 (Peak)	2390.000	-2.378	40.084	37.707	74.00	54.00	Pass
00 (Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 00: (Horizontal) (Peak)



Note:
RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1(2402MHz)

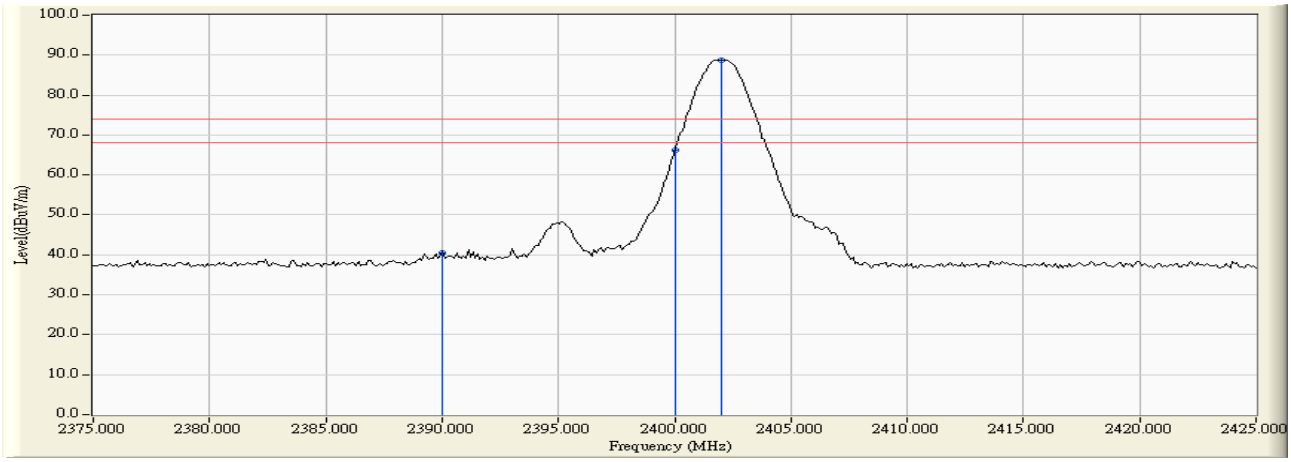
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
00	<2400	>20	Pass

RF Radiated Measurement (Vertical):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
00 (Peak)	2390.000	-2.378	42.974	40.597	74.00	54.00	Pass
00(Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 00: (Vertical) (Peak)



Note:
RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1(2480MHz)

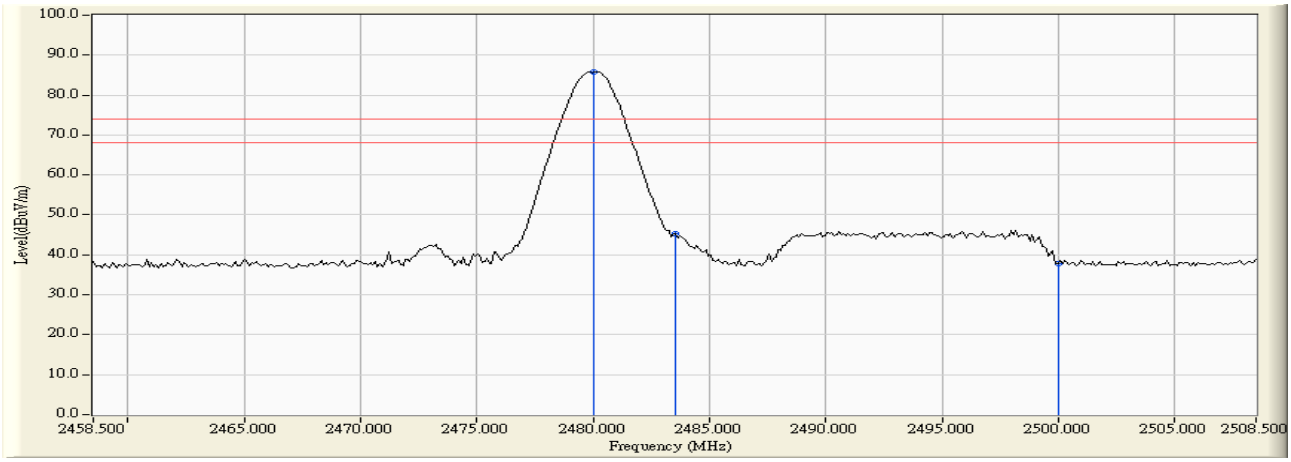
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
78	>2483.5	>20	Pass

RF Radiated Measurement (Horizontal):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
78(Peak)	2483.500	-1.937	47.298	45.361	74.00	54.00	Pass
78(Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 78: (Horizontal) (Peak)



Note:
RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1(2480MHz)

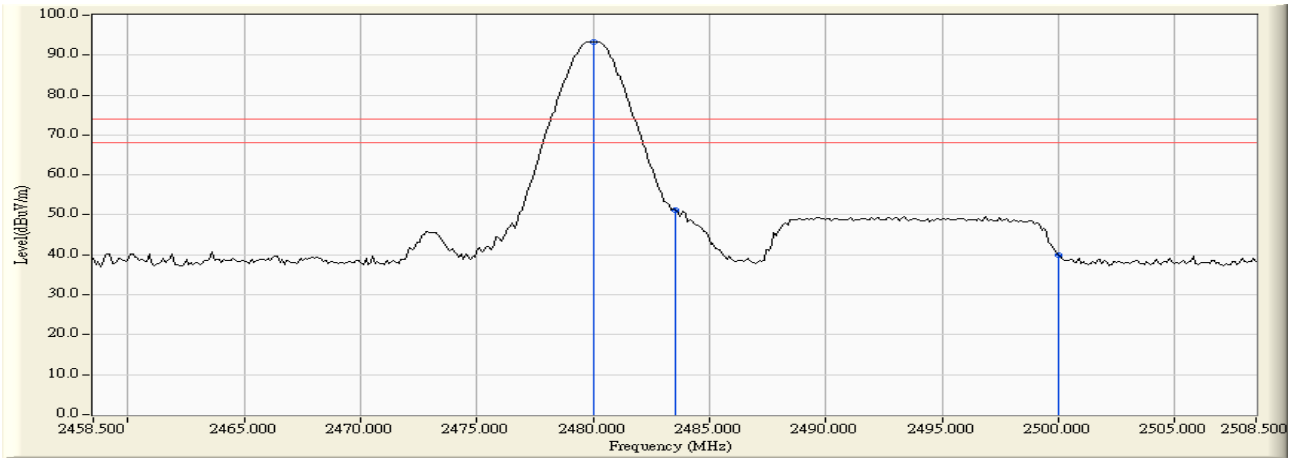
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
78	>2483.5	>20	Pass

RF Radiated Measurement (Vertical):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
78(Peak)	2483.500	-1.937	53.151	51.214	74.00	54.00	Pass
78(Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 78: (Vertical) (Peak)



Note:

RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Note: The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1(2402MHz)

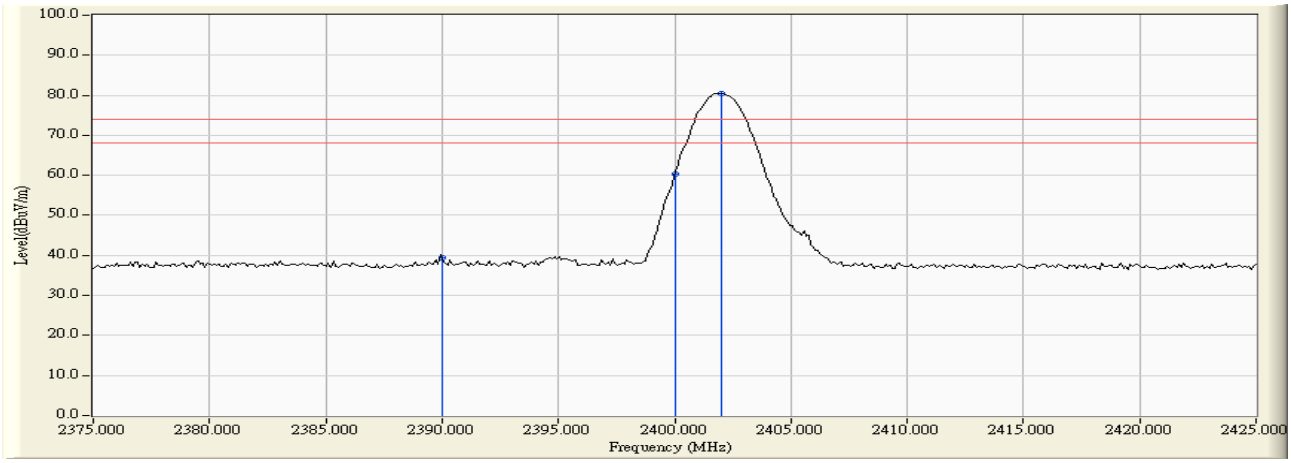
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
00	<2400	>20	Pass

RF Radiated Measurement (Horizontal):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
00 (Peak)	2390.000	-2.378	41.851	39.474	74.00	54.00	Pass
00 (Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 00: (Horizontal) (Peak)



Note:

RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1(2402MHz)

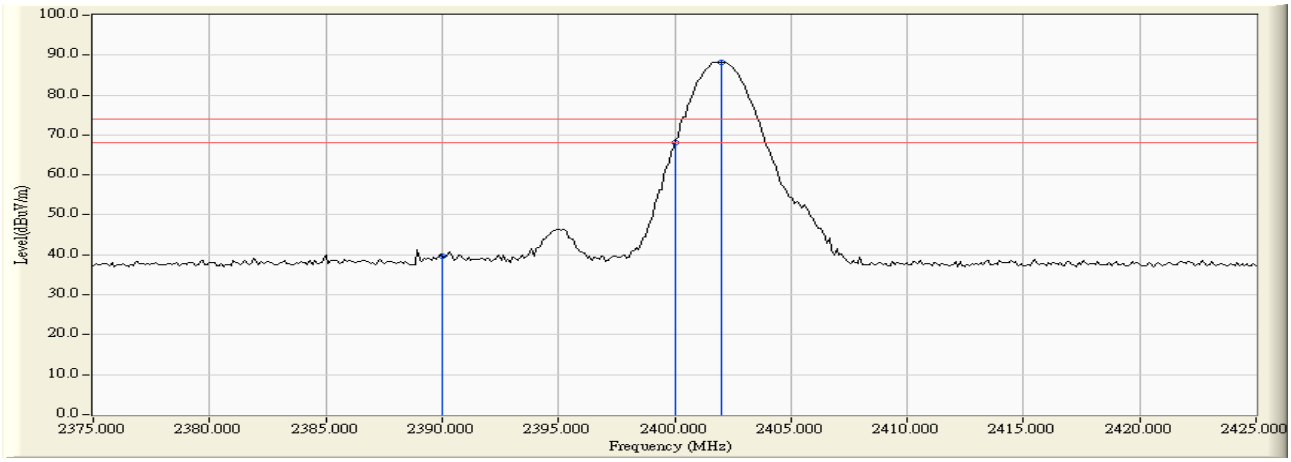
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
00	<2400	>20	Pass

RF Radiated Measurement (Vertical):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
00 (Peak)	2390.000	-2.378	41.965	39.588	74.00	54.00	Pass
00(Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 00: (Vertical) (Peak)



Note:
RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1(2480MHz)

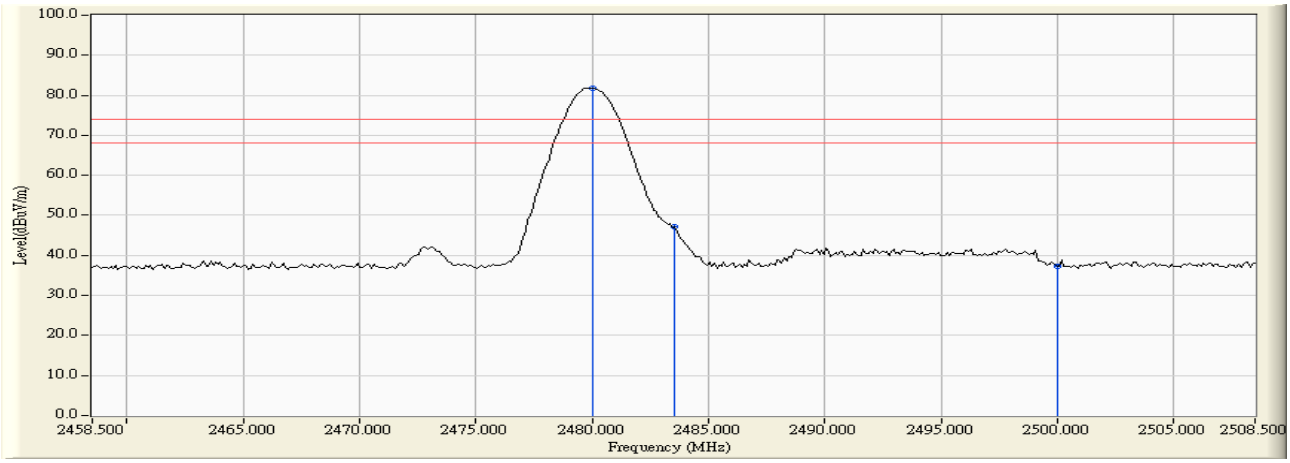
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
78	>2483.5	>20	Pass

RF Radiated Measurement (Horizontal):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
78(Peak)	2483.500	-1.937	49.021	47.084	74.00	54.00	Pass
78(Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 78: (Horizontal) (Peak)



Note:

RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1(2480MHz)

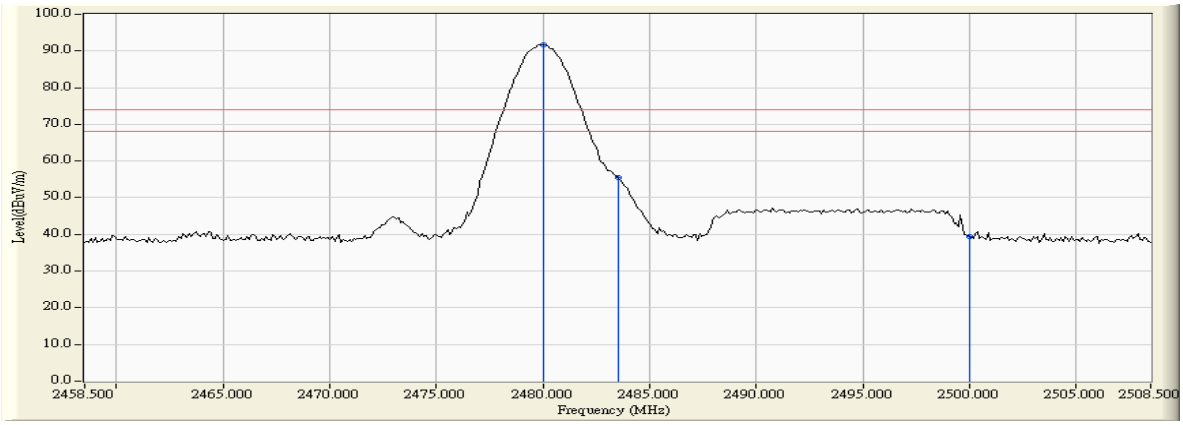
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
78	>2483.5	>20	Pass

RF Radiated Measurement (Vertical):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
78(Peak)	2483.500	-1.937	57.534	55.597	74.00	54.00	Pass
78(Average)	2483.500	-1.937	47.530	45.593	74.00	54.00	Pass

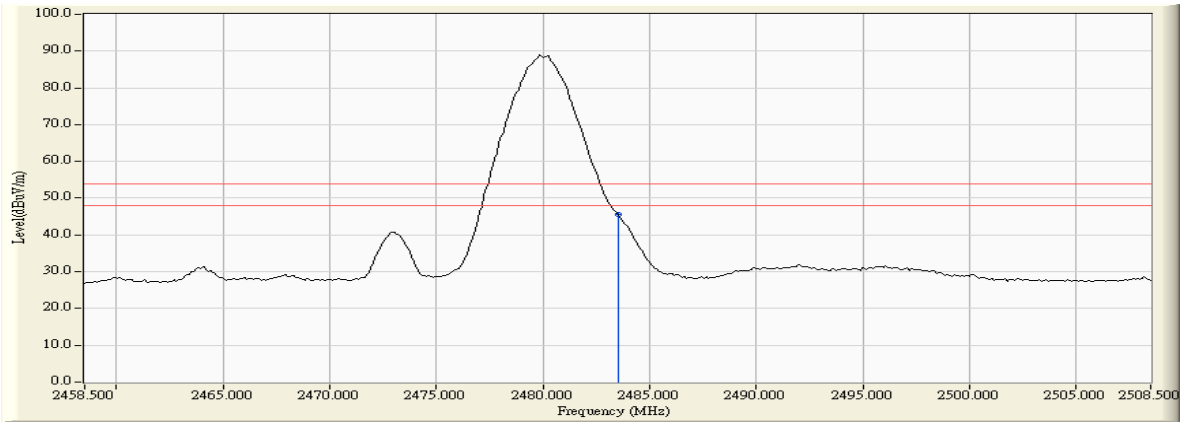
Figure Channel 78: (Vertical) (Peak)



Note:

RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Figure Channel 78: (Vertical) (Average)



Note:

RBW=1MHz, VBW=3KHz, Sweep Time=500ms.

Note: The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 3: Transmitter -1Mbps(GFSK)- Antenna 2 (2402MHz)

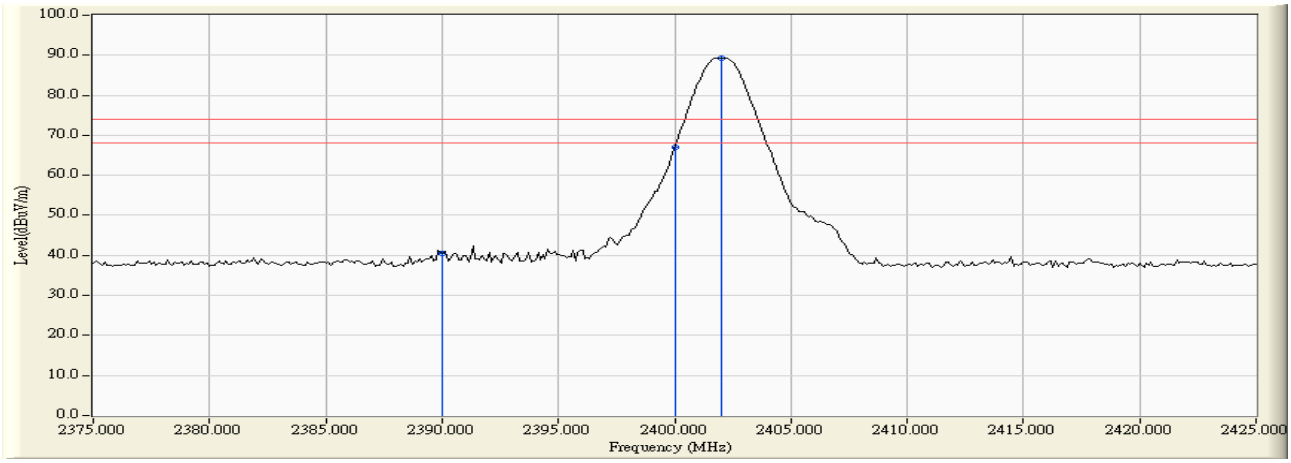
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
00	<2400	>20	Pass

RF Radiated Measurement (Horizontal):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
00 (Peak)	2390.000	-2.378	42.920	40.543	74.00	54.00	Pass
00 (Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 00: (Horizontal) (Peak)



Note:
RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 3: Transmitter -1Mbps(GFSK)- Antenna 2 (2402MHz)

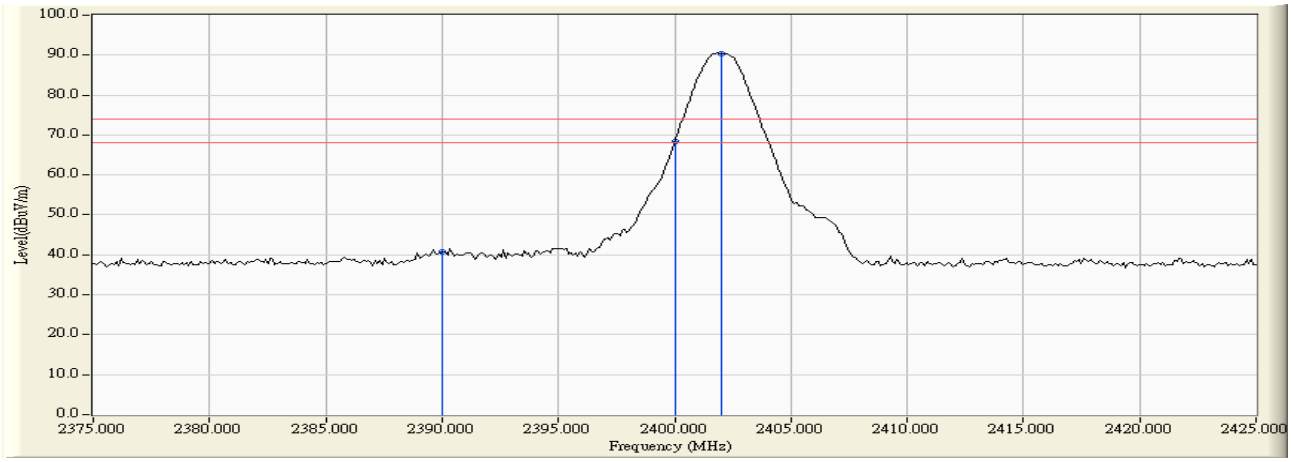
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
00	<2400	>20	Pass

RF Radiated Measurement (Vertical):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
00 (Peak)	2390.000	-2.378	43.117	40.740	74.00	54.00	Pass
00(Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 00: (Vertical) (Peak)



Note:
RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 3: Transmitter -1Mbps(GFSK)- Antenna 2 (2480MHz)

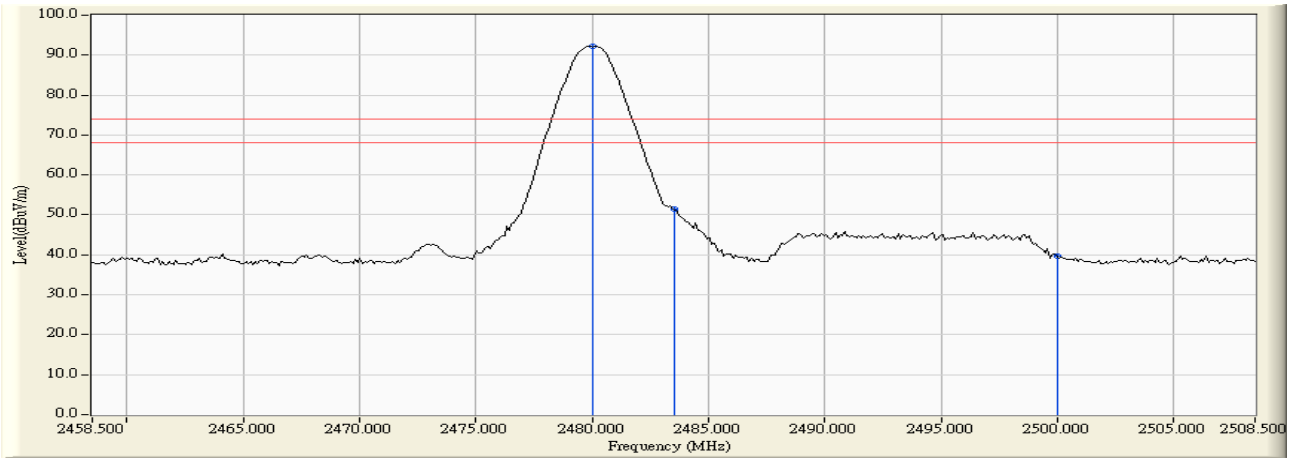
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
78	>2483.5	>20	Pass

RF Radiated Measurement (Horizontal):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
78(Peak)	2483.500	-1.937	53.280	51.343	74.00	54.00	Pass
78(Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 78: (Horizontal) (Peak)



Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 3: Transmitter -1Mbps(GFSK)- Antenna 2 (2480MHz)

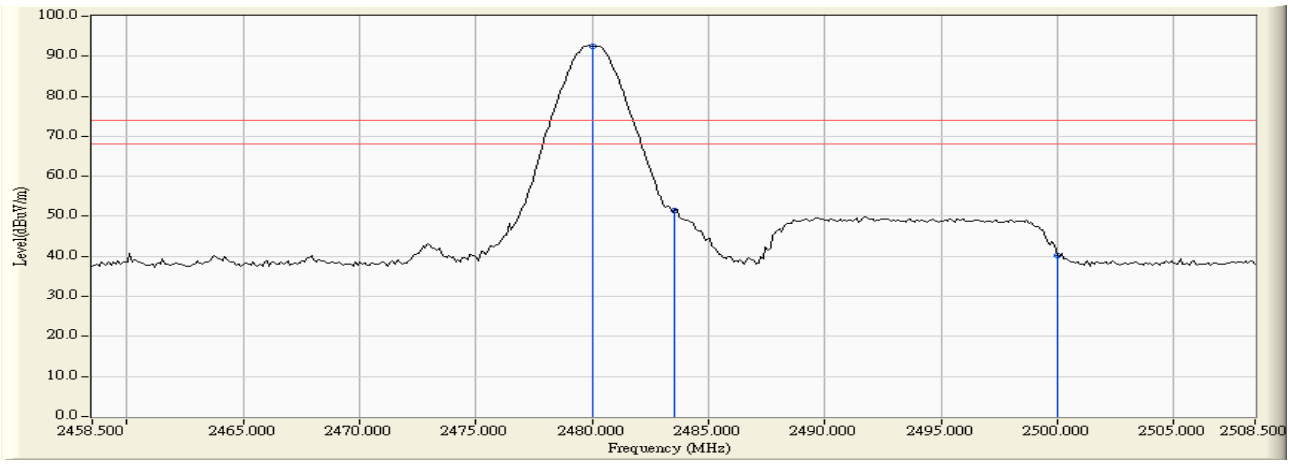
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
78	>2483.5	>20	Pass

RF Radiated Measurement (Vertical):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
78(Peak)	2483.500	-1.937	53.373	51.436	74.00	54.00	Pass
78(Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 78: (Vertical) (Peak)



Note:
RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Note: The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 4: Transmitter -3Mbps(8DPSK)-Antenna 2 (2402MHz)

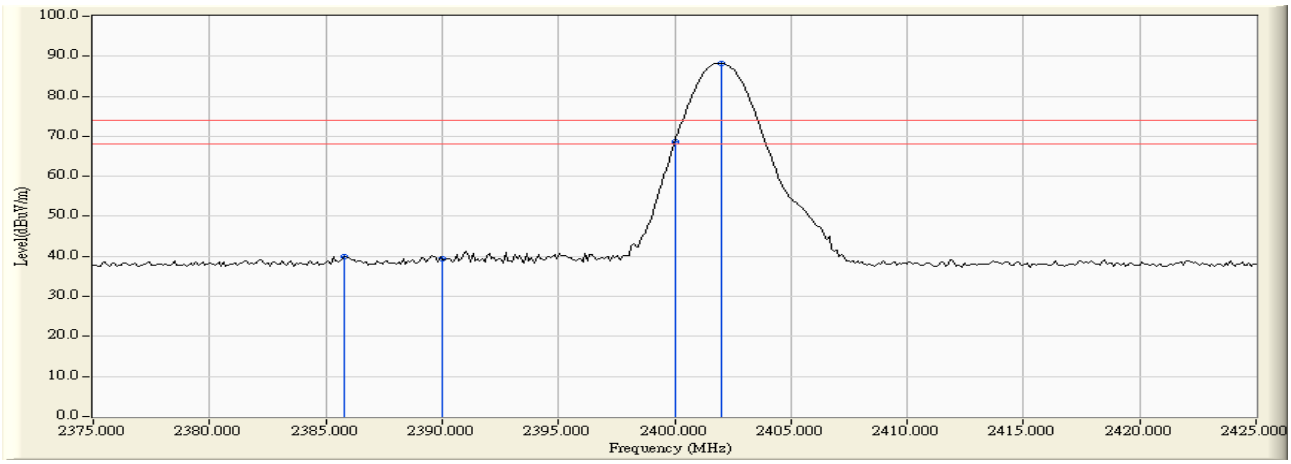
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
00	<2400	>20	Pass

RF Radiated Measurement (Horizontal):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
00 (Peak)	2385.822	-2.398	42.286	39.888	74.00	54.00	Pass
00 (Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 00: (Horizontal) (Peak)



Note:
RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 4: Transmitter -3Mbps(8DPSK)-Antenna 2 (2402MHz)

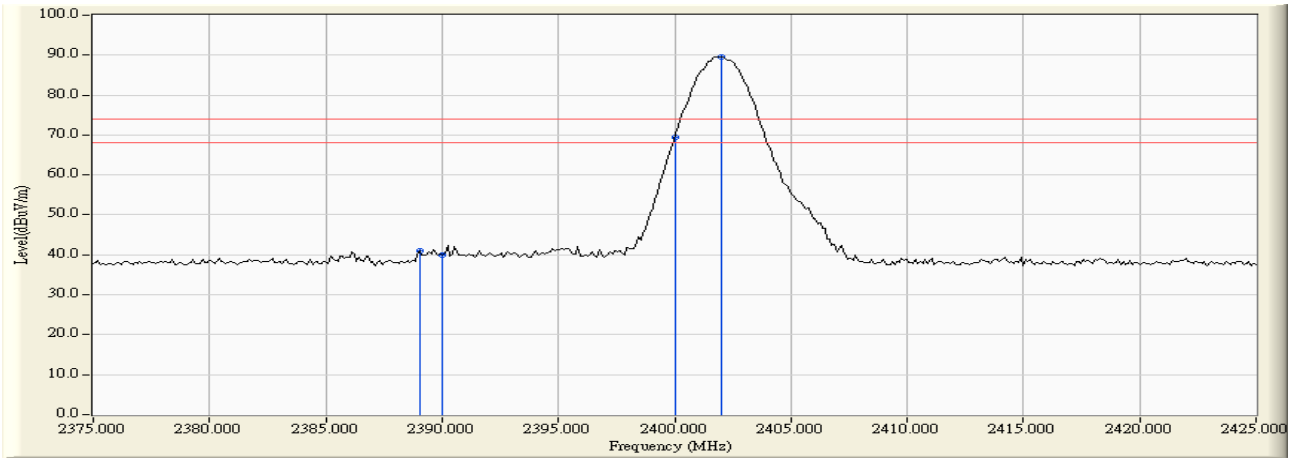
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
00	<2400	>20	Pass

RF Radiated Measurement (Vertical):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
00 (Peak)	2389.028	-2.382	43.472	41.090	74.00	54.00	Pass
00(Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 00: (Vertical) (Peak)



Note:
RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 4: Transmitter -3Mbps(8DPSK)-Antenna 2 (2480MHz)

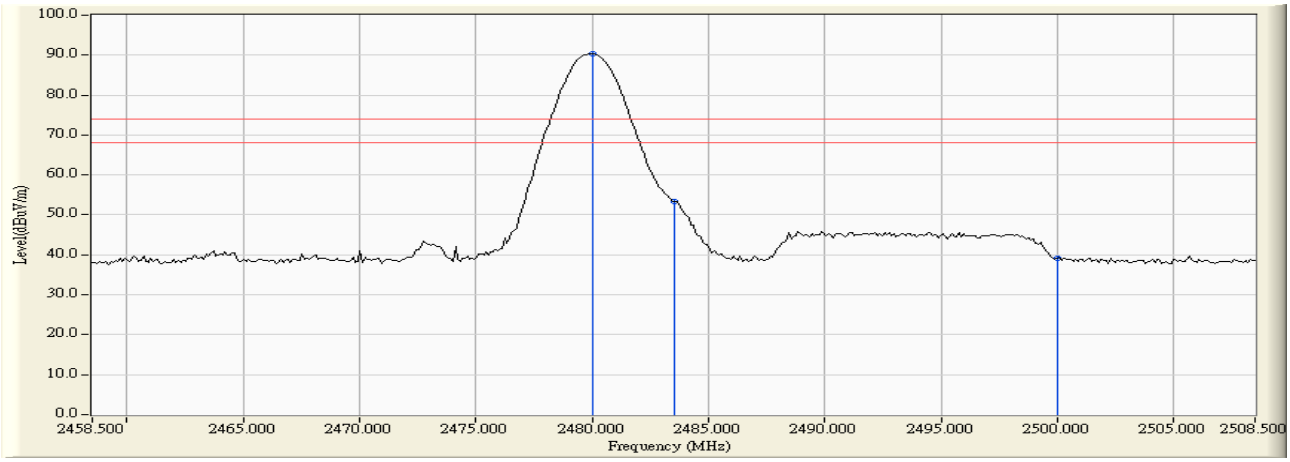
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
78	>2483.5	>20	Pass

RF Radiated Measurement (Horizontal):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
78(Peak)	2483.500	-1.937	55.310	53.373	74.00	54.00	Pass
78(Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 78: (Horizontal) (Peak)



Note:
RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Product : Notebook
Test Item : Band Edge
Test Site : No.3 OATS
Test Mode : Mode 4: Transmitter -3Mbps(8DPSK)-Antenna 2 (2480MHz)

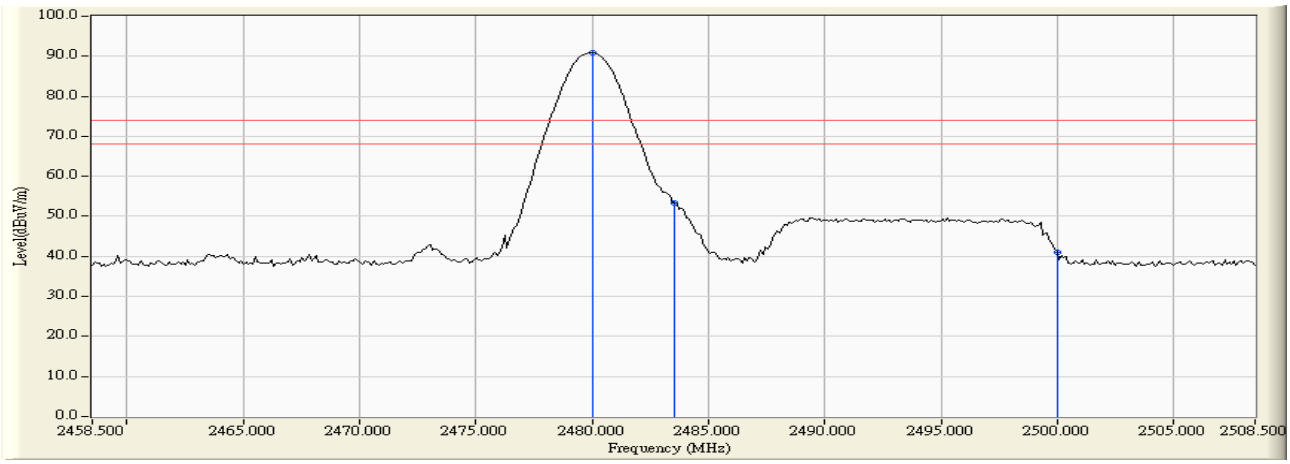
RF Radiated Measurement:

Channel No.	Frequency (MHz)	Required Limit (dBc)	Result
78	>2483.5	>20	Pass

RF Radiated Measurement (Vertical):

Channel	Frequency (MHz)	Correct Factor (dB)	Reading Level (dBuV)	Emission Level (dBuV/m)	Peak Limit (dBuV/m)	Average Limit (dBuV/m)	Result
78(Peak)	2483.500	-1.937	55.250	53.313	74.00	54.00	Pass
78(Average)	--	--	--	--	74.00	54.00	Pass

Figure Channel 78: (Vertical) (Peak)



Note:
RBW=1MHz, VBW=1MHz, Sweep Time=500ms.

Note: The average measurement was not performed when the peak measured data under the limit of average detection. If the readings given are average, peak measurement should also be supplied.

6. Channel Number

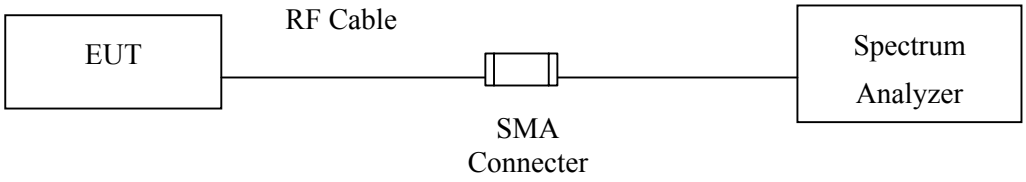
6.1. Test Equipment

The following test equipments are used during the radiated emission tests:

	Equipment	Manufacturer	Model No./Serial No.	Last Cal.
X	Spectrum Analyzer	R & S	FSP40 / 100170	Nov, 2007

Note: 1. All equipments are calibrated every one year.
2. The test instruments marked by "X" are used to measure the final test results.

6.2. Test Setup



6.3. Limit

Frequency hopping systems operating in the 2400-2483.5 MHz bands shall use at least 75 hopping frequencies.

6.4. Uncertainty

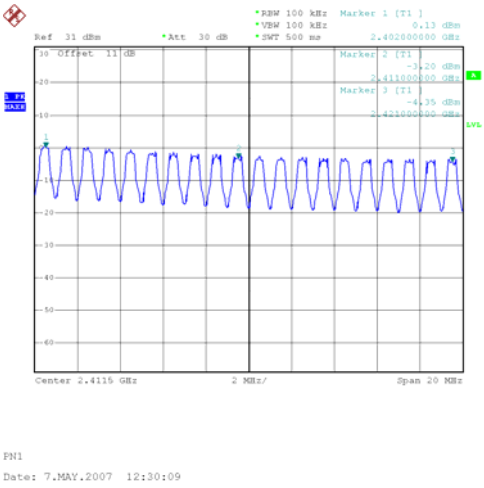
N/A

6.5. Test Result of Channel Number

Product : Notebook
Test Item : Channel Number
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1

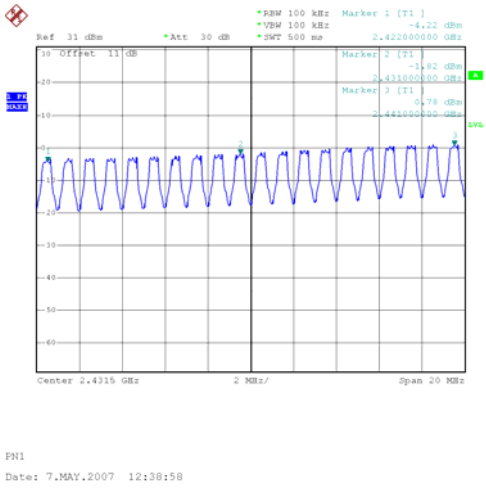
Frequency Range (MHz)	Measurement (Hopping Channel)	Required Limit (Hopping Channel)	Result
2402 ~ 2480	79	>75	Pass

2402-2421MHz



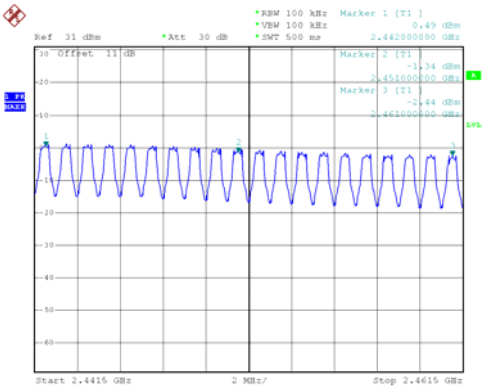
PN1
Date: 7.MAY.2007 12:30:09

2422-2441MHz



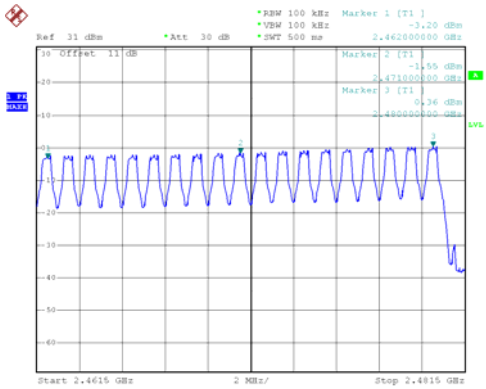
PN1
Date: 7.MAY.2007 12:38:58

2442-2461MHz



PN1
Date: 7.MAY.2007 12:44:52

2462-2480MHz

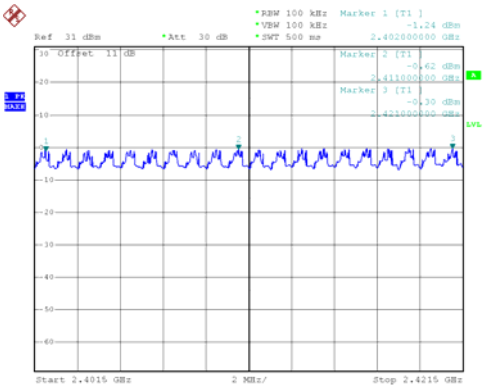


PN1
Date: 7.MAY.2007 12:50:28

Product : Notebook
Test Item : Channel Number
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1

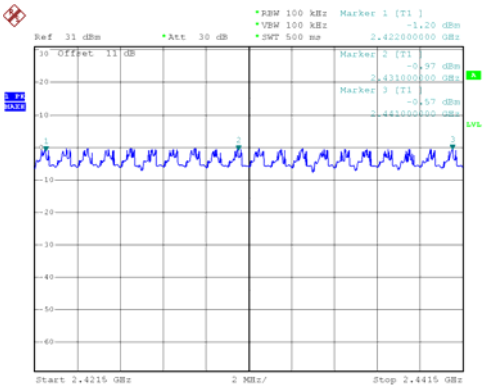
Frequency Range (MHz)	Measurement (Hopping Channel)	Required Limit (Hopping Channel)	Result
2402 ~ 2480	79	>75	Pass

2402-2421MHz



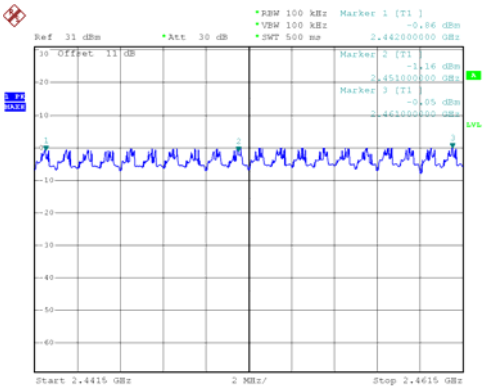
PN1
Date: 8.MAY.2007 16:21:43

2422-2441MHz



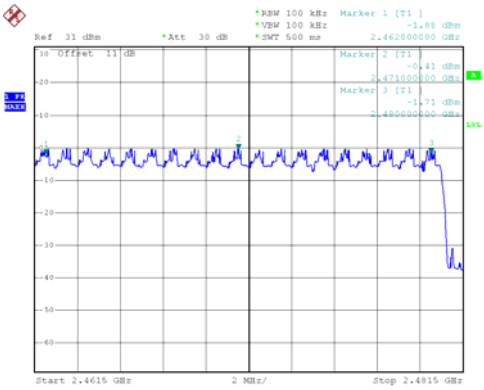
PN1
Date: 8.MAY.2007 16:27:01

2442-2461MHz



PN1
Date: 8.MAY.2007 16:31:59

2462-2480MHz



PN1
Date: 8.MAY.2007 16:37:06

7. Channel Separation

7.1. Test Equipment

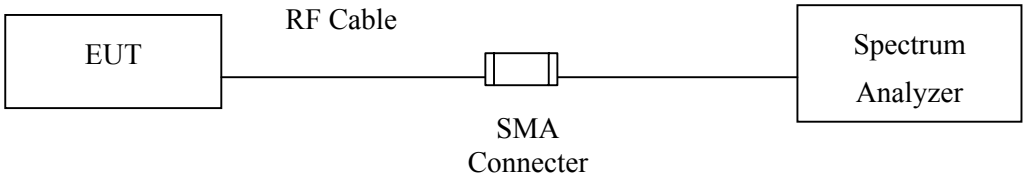
The following test equipments are used during the radiated emission tests:

	Equipment	Manufacturer	Model No./Serial No.	Last Cal.
X	Spectrum Analyzer	R & S	FSP40 / 100170	Nov, 2007

Note: 1. All equipments are calibrated every one year.

2. The test instruments mark by "X" are used to measure the final test results.

7.2. Test Setup



7.3. Limit

Frequency hopping systems shall have hopping channel carrier frequencies separated by a minimum of 25 kHz or the 20 dB bandwidth of the hopping channel, whichever is greater.

7.4. Uncertainty

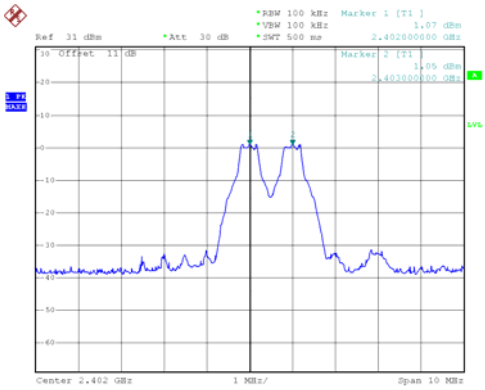
± 150Hz

7.5. Test Result of Channel Separation

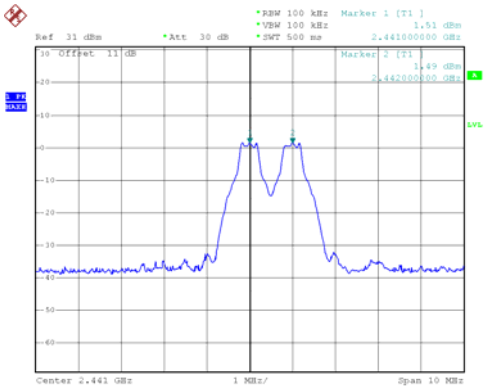
Product : Notebook
Test Item : Channel Separation
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1

Frequency (MHz)	Measurement Level (MHz)	Required Limit	Result
2402	1.00	>25 kHz or 2/3 * 20 dB BW	Pass
2441	1.00	>25 kHz or 2/3 * 20 dB BW	Pass
2480	1.00	>25 kHz or 2/3 * 20 dB BW	Pass

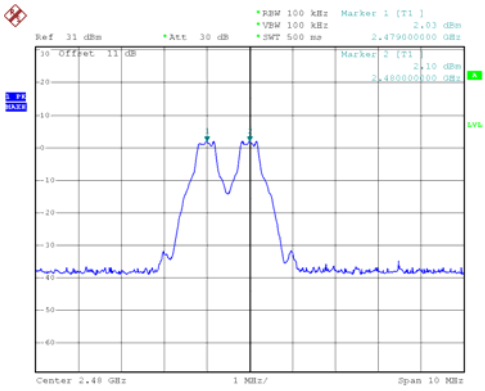
Channel 00 2402MHz



Channel 39 2441MHz



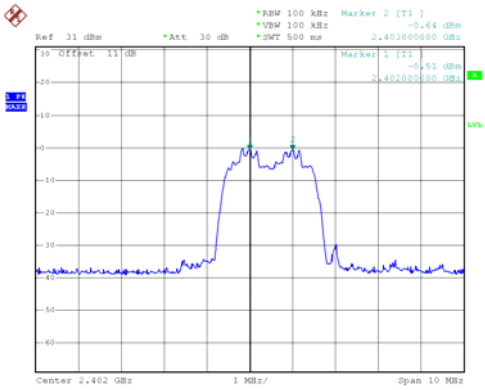
Channel 78 2480 MHz



Product : Notebook
Test Item : Channel Separation
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1

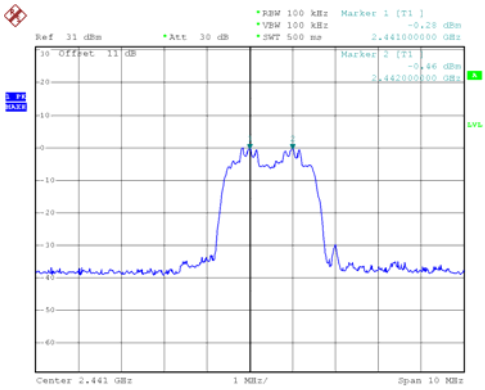
Frequency (MHz)	Measurement Level (MHz)	Required Limit	Result
2402	1.00	>25 kHz or 2/3 * 20 dB BW	Pass
2441	1.00	>25 kHz or 2/3 * 20 dB BW	Pass
2480	1.00	>25 kHz or 2/3 * 20 dB BW	Pass

Channel 00 2402MHz



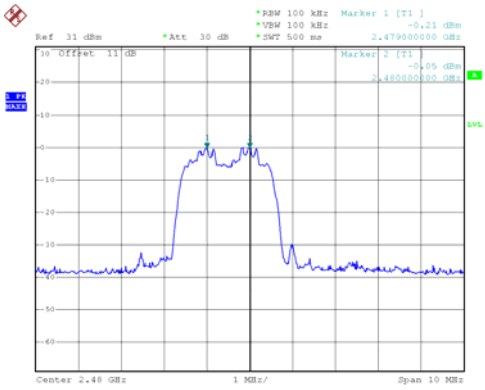
PN1
Date: 7.MAY.2007 11:38:35

Channel 39 2441MHz



PN1
Date: 7.MAY.2007 11:39:39

Channel 78 2480 MHz



PN1
Date: 7.MAY.2007 11:40:51

8. Dwell Time

8.1. Test Equipment

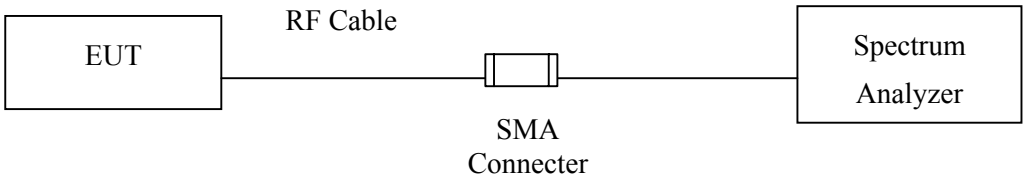
The following test equipments are used during the radiated emission tests:

	Equipment	Manufacturer	Model No./Serial No.	Last Cal.
X	Spectrum Analyzer	Agilent	E4407B / US39440758	May, 2007

Note: 1. All equipments are calibrated every one year.

2. The test instruments marked by "X" are used to measure the final test results.

8.2. Test Setup



8.3. Limit

The dwell time shall be the average time of occupancy on any frequency shall not be greater than 0.4 seconds within a 30 second period.

8.4. Uncertainty

± 25msec

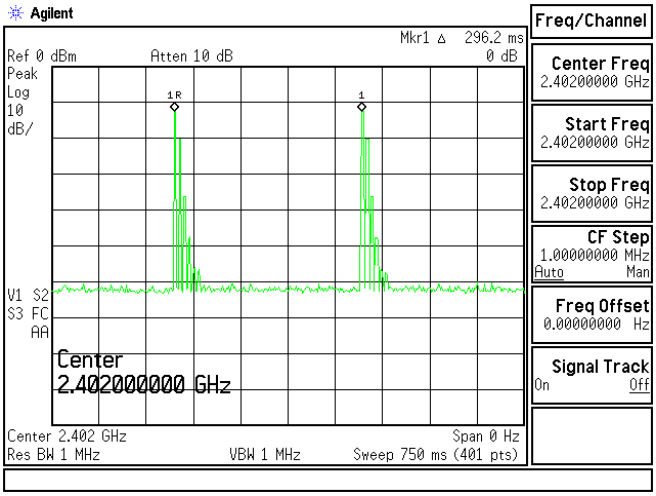
8.5. Test Result of Dwell Time

Product : Notebook
Test Item : Dwell Time
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1(Channel 00,39,78 –DH5)

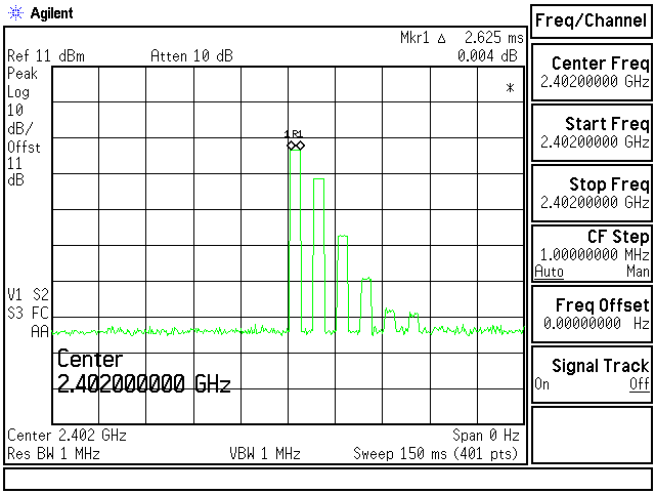
Channel No.	Frequency (MHz)	Time Interval between hops (ms)	Transmission Time (us)	Dwell Time (ms)	Limit (ms)	Result
00	2402	296.2	2625	280	400	Pass
39	2441	296.2	3000	320	400	Pass
78	2480	296.2	2750	293	400	Pass

Note: Dwell Time = 79 * 400 / Time Interval Between Hops * Transmission Time / 1000

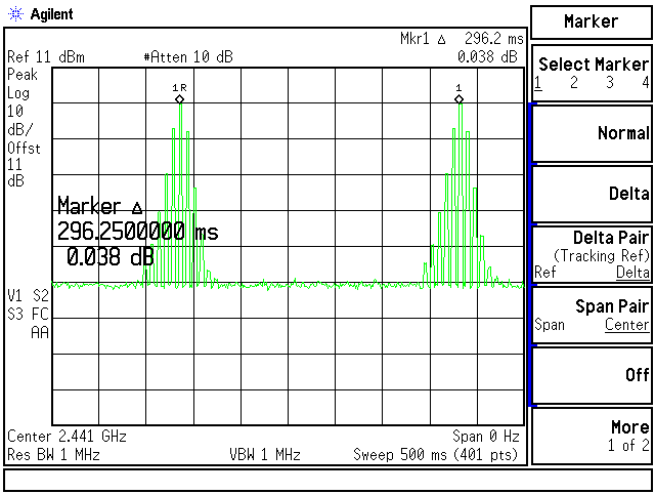
CH00 Time Interval between hops



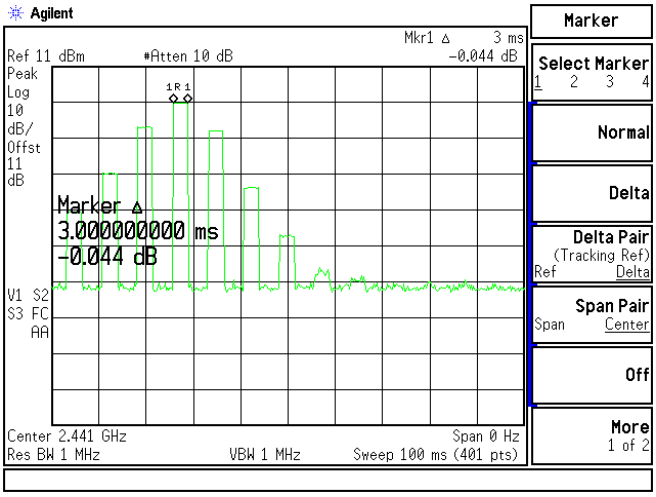
CH 00 Transmission Time



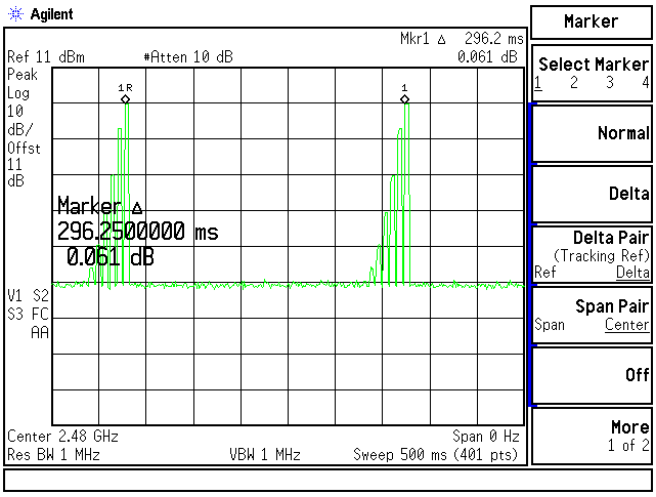
CH39 Time Interval between hops



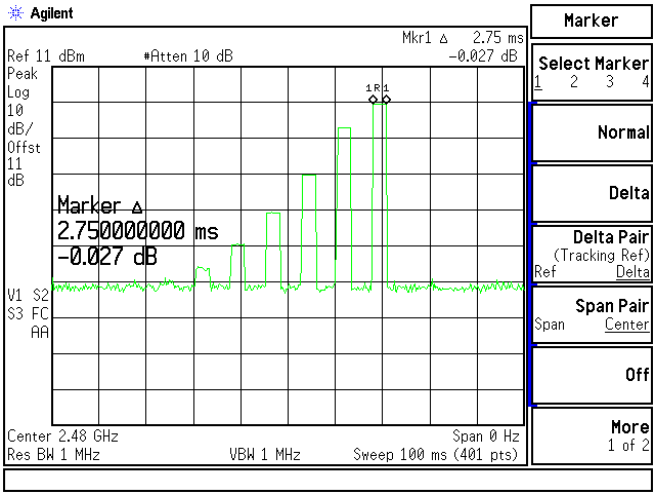
CH39 Transmission Time



CH 78 Time Interval between hops



CH 78 Transmission Time



Note:

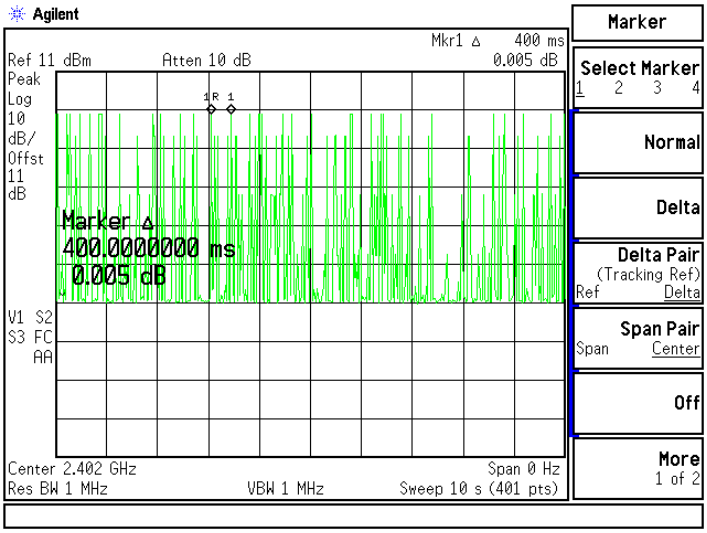
The dwell times of the packet type of DH1, DH3, and DH5 are tested. Only the worst case is shown on the report.

Product : Notebook
Test Item : Dwell Time
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1(Channel 00,39,78 –DH5)

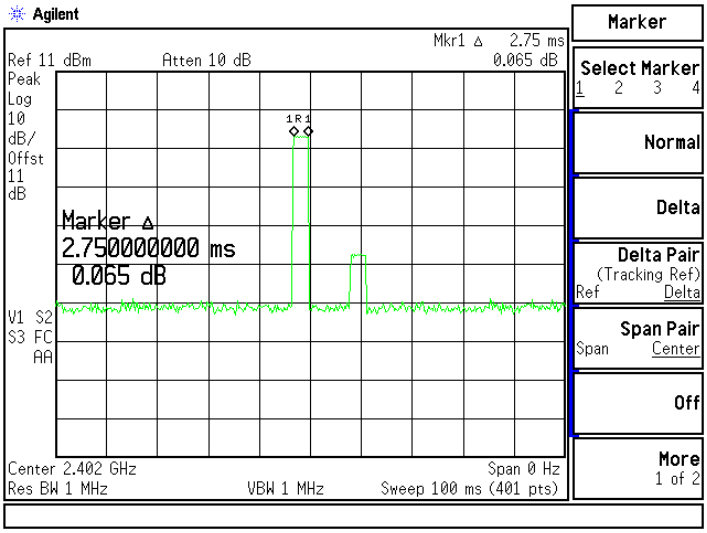
Channel No.	Frequency (MHz)	Time Interval between hops (ms)	Transmission Time (us)	Dwell Time (ms)	Limit (ms)	Result
00	2402	400	2750	217	400	Pass
39	2441	600	2750	145	400	Pass
78	2480	775	3000	122	400	Pass

Note: Dwell Time = 79 * 400 / Time Interval Between Hops * Transmission Time / 1000

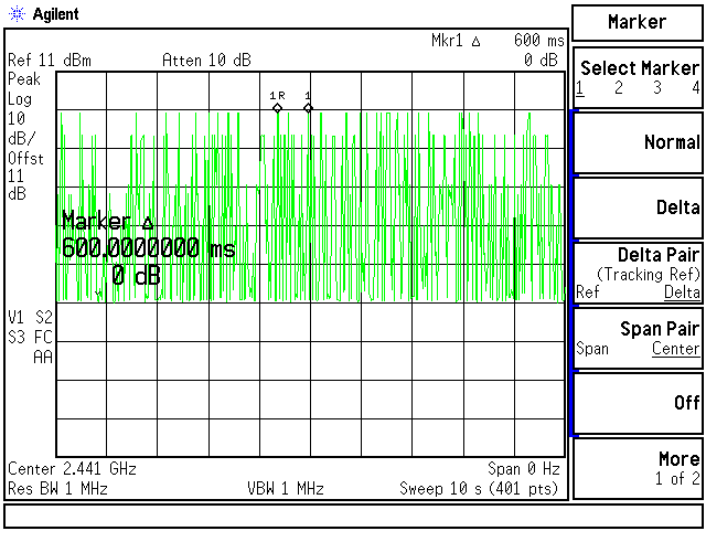
CH 00 Time Interval between hops



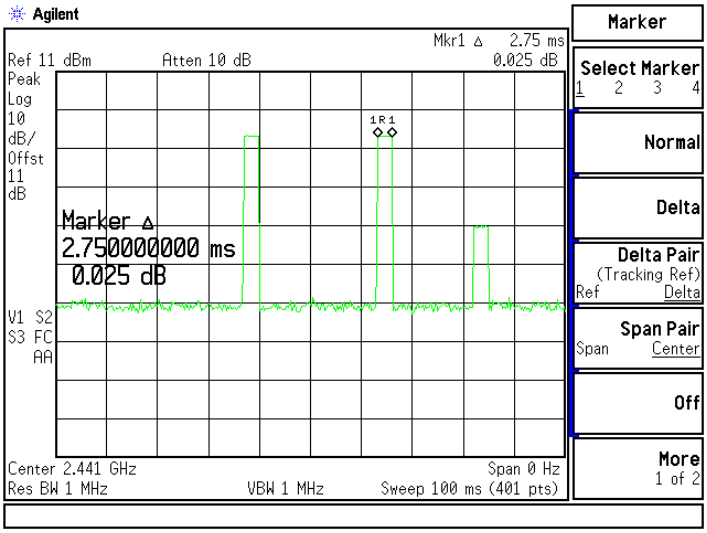
CH 00 Transmission Time



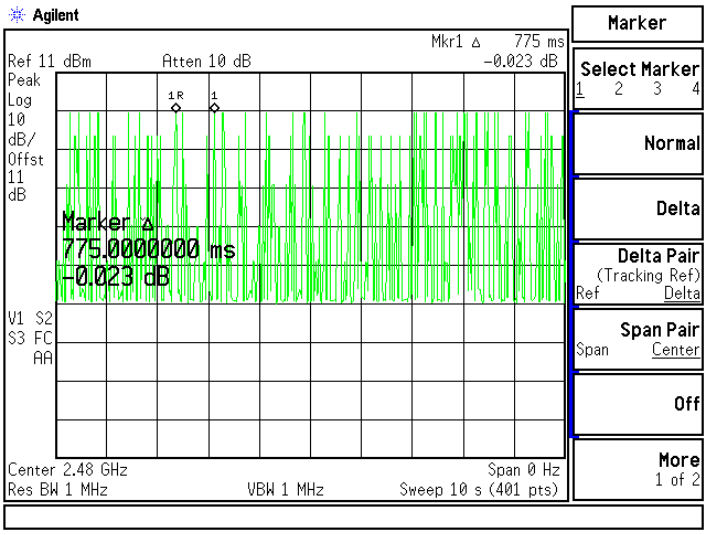
CH 39 Time Interval between hops



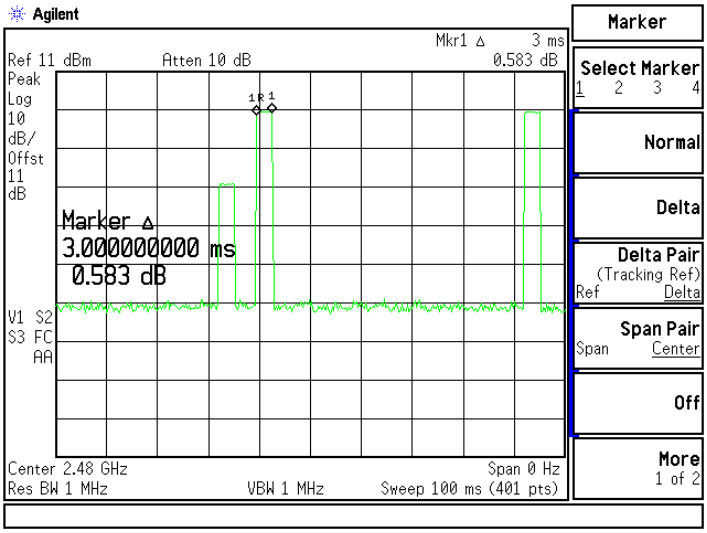
CH 39 Transmission Time



CH 78 Time Interval between hops



CH 78 Transmission Time



Note:

The dwell times of the packet type of DH1, DH3, and DH5 are tested. Only the worst case is shown on the report.

9. Occupied Bandwidth

9.1. Test Equipment

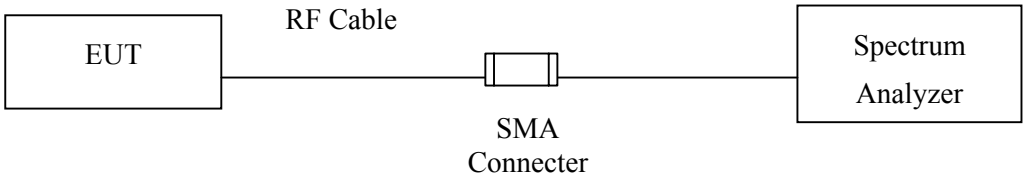
The following test equipments are used during the radiated emission tests:

	Equipment	Manufacturer	Model No./Serial No.	Last Cal.
X	Spectrum Analyzer	R & S	FSP40 / 100170	Nov, 2007

Note: 1. All equipments are calibrated every one year.

2. The test instruments marked by "X" are used to measure the final test results.

9.2. Test Setup



9.3. Limits

N/A

9.4. Uncertainty

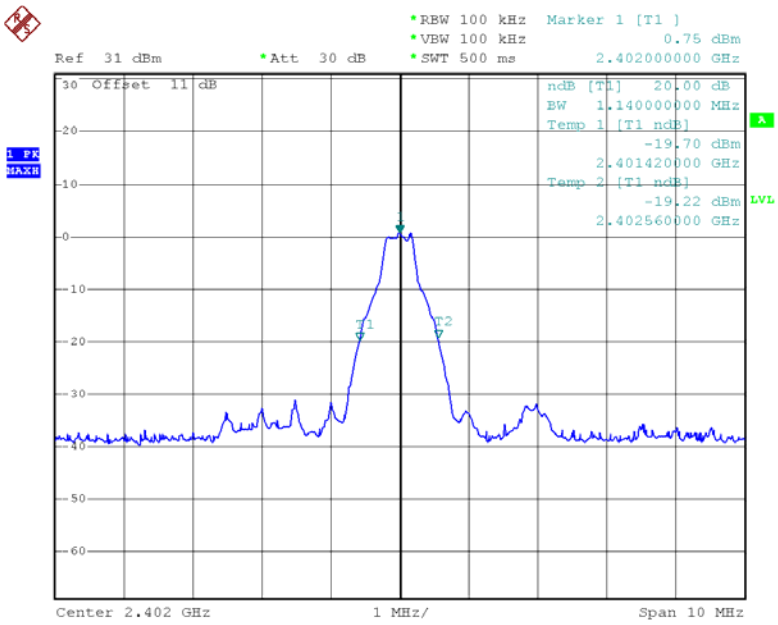
± 150Hz

9.5. Test Result of Occupied Bandwidth

Product : Notebook
Test Item : Occupied Bandwidth Data
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1(2402MHz)

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
00	2402	1140	--	NA

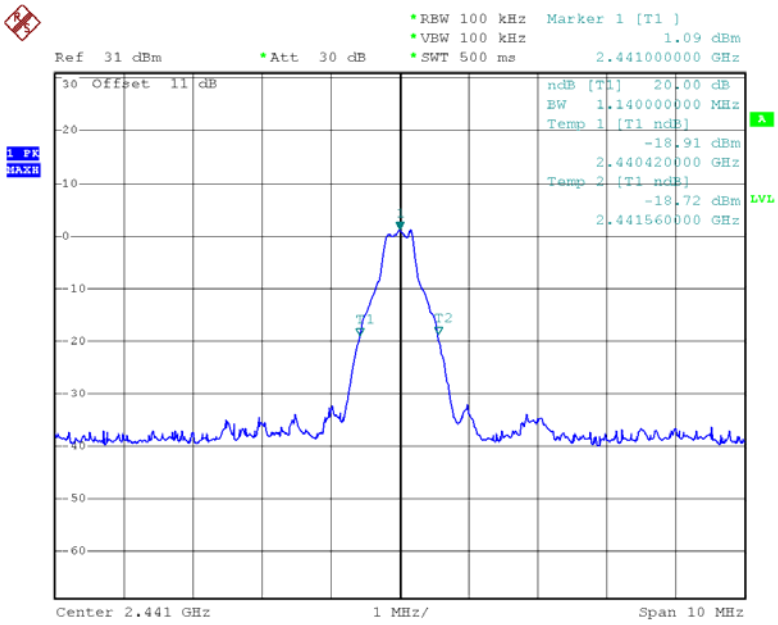
Figure Channel 00:



Product : Notebook
Test Item : Occupied Bandwidth Data
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1(2441MHz)

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
39	2441	1140	--	NA

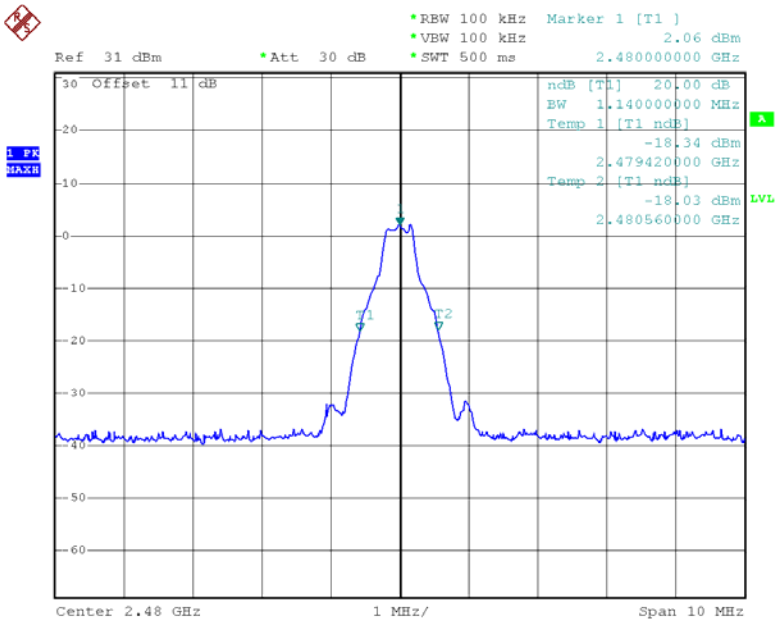
Figure Channel 39:



Product : Notebook
Test Item : Occupied Bandwidth Data
Test Site : No.3 OATS
Test Mode : Mode 1: Transmitter -1Mbps(GFSK)- Antenna 1(2480MHz)

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
78	2480	1140	--	NA

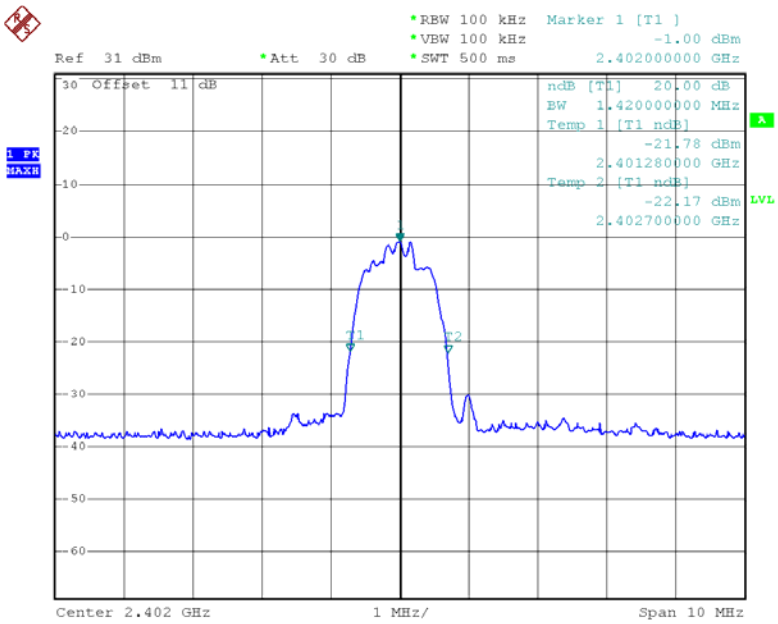
Figure Channel 78:



Product : Notebook
Test Item : Occupied Bandwidth Data
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1 (2402MHz)

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
00	2402	1420	--	NA

Figure Channel 00:

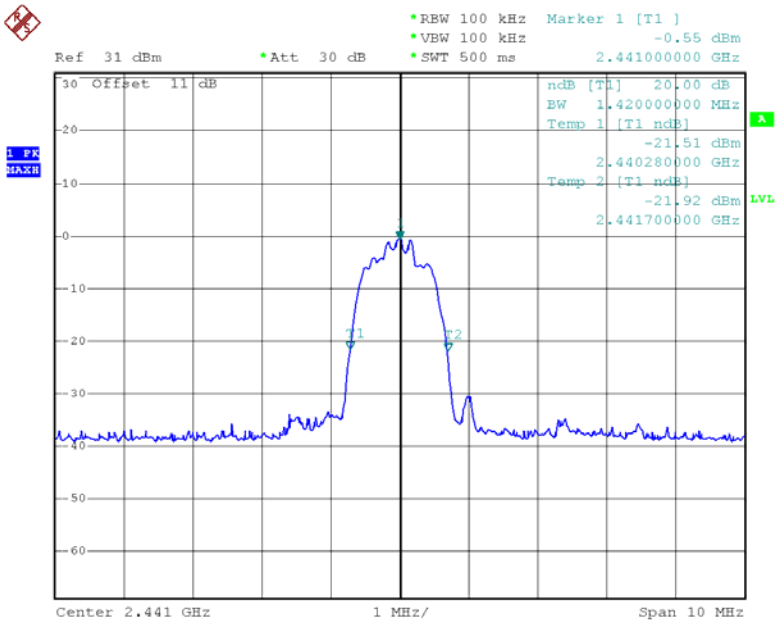


PN1
Date: 7.MAY.2007 11:18:46

Product : Notebook
Test Item : Occupied Bandwidth Data
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1 (2441MHz)

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
39	2441	1420	--	NA

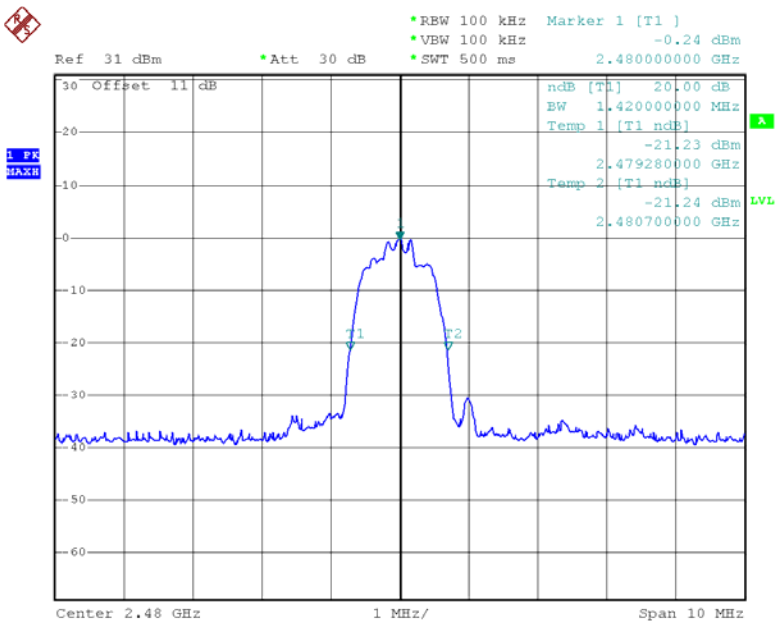
Figure Channel 39:



Product : Notebook
Test Item : Occupied Bandwidth Data
Test Site : No.3 OATS
Test Mode : Mode 2: Transmitter -3Mbps(8DPSK)-Antenna 1 (2480MHz)

Channel No.	Frequency (MHz)	Measurement Level (kHz)	Required Limit (kHz)	Result
78	2480	1420	--	NA

Figure Channel 78:



10. EMI Reduction Method During Compliance Testing

No modification was made during testing.