FCC Test Report
(TR-1006-013-02)

Applicant	:	GameTech International, Inc.
Address	:	8850 Double Diamond Blvd,Reno NV 89521, USA
Manufacturer	:	Pronology Services Inc.
Address	:	2nd Industrial Zone Lou Village,Gongming, GuangMing, ShenZhen,GuangDong,China
Product Name	:	Explorer Player Unit
Trademark	:	none
Model(s)	:	EXPL-10-01
Standard(s)	:	FCC Part 15 Subpart E
Test Result	:	Pass
Date of Test	:	Jun 23, 2010 to Jul 21, 2010
Report issued Dated	:	Jul 21, 2010

Note:
This test report covers 802.11 a test mode only and refer to additional test report for 802.11 b/g measurements (report no.:1006-013-02).

The report shall not be reproduced except in full, without the written approval of the TDK EMC Center.

The results in this report apply only to the sample(s) tested.   The production units are required to conform to the initial sample as received when the units are placed in the market.
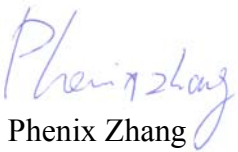
Responsible Engineer	:	Approved by	:
Phenix Zhang		Technical manager	CHAN king-chui
Date	: 2010.07.21	Date	: 2010.07.21

TDK South China EMC Center
SAE Technologies Development (Dongguan) Co., Ltd. Changan Branch

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1. Description of the Test Site

1.1 Test Site Location:

Laboratory	:	TDK South China EMC Center
		SAE Technologies Development (Dongguan) Co.,
		Ltd. Changan Branch
Address	:	Zhenan Hi-tech Industrial Park, Dongguang City,
		Guangdong Province, China
Phone no.	:	(86)-769-8564-4678
Fax no.	:	(86)-769-8564-4499
Email	:	emc@cn.tdk.com

1.2 Site Registration

VCCI (September, 2008)	:	Reg. No. R-2205, C-2392
FCC site registration (July, 2008)	:	Reg. No. 732901
IC registration	:	Reg. No. 7993
EMCC (September, 2008)	:	Reg. No. NAR/tl-060330

1.3 Test Scope
EMC and RF testing according to national / international standards

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2. Description of the Tested Samples

2.1 Customer Information

Customer	:	GameTech International, Inc.
Address	:	8850 Double Diamond Blvd,Reno NV 89521, USA
Phone no.	:	(775) 850-6073
Fax no.	:	

2.2 Identification of EUT

Trademark	:	none
Model(s) No.	:	EXPL-10-01
Serial No.	:	None

2.3 Spec of EUT

Description of Antenna	:	fixed omnidirectional antenna, 2.5dBi gain @ 2.5GHz, 3.5dBi gain @ 5.0GHz. The two antennas being capable of reception and transmission at both 2.4 and 5 GHz. The two antennas provide 'diversity' for the RF signal path.
Battery Description	:	Voltage: 7.4V 6000mAh Manufacturer: GameTech International Inc. Model: EXPL-BATT-01
Operation Frequency	:	2412 MHz, 2437MHz, 2462 MHz, 5180MHz
Number of Channels	:	4
Type of Modulation	:	DSSS for IEEE 802.11b ; OFDM for IEEE 802.11g OFDM for IEEE 802.11a
Data Rate	:	IEEE 802.11b: 11/5.5/2/1Mbps IEEE 802.11g: 54/48/36/24/18/12/9/6Mbps IEEE 802.11a: 54/48/36/24/18/12/9/6Mbps

2.4 Test Standards List

FCC Part 15 (2009)
American national standard for methods of measurement of radio noise emissions from low-voltage electrical and electronic equipment in the range of 9KHz to 40GHz.

3. Test Specifications

3.1 Standard(s) Used

FCC Rules	Description Of Test	Result
15.203/15.247(a)	Antenna Requirement	Pass
15.407(b)(6)/15.207	Conducted Emission	N/A
15.407(a)(1)	RF Output Power in 5.15-5.25GHz	Pass
15.407(a)(5)	Peak Power Spectral Density	Pass
15.407(a)(6)	Peak Excursion	Pass
15.407(b)(1)	Undesirable Emissions in 5.15-5.25GHz	Pass
15.407(b)(6)/15.209	Radiated Emissions	Pass
15.407(b)(7)/15.205	Undesirable Emissions	Pass
15.407(g)	Frequency Stability	Pass

3.2 Test Mode

The EUT has been tested under operating condition.
Software used to control the EUT for staying in continuous transmitting and receiving mode is programmed.
IEEE 802.11a: Channel 36(5180MHz) with 54Mbps data rate (worst case) are chosen for the final testing.
In pretesting, we compared the output of two antennas, and find out the worst case which is the antenna 1 working.

3.3 Deviations from the Test Specification

N/A

This product does not operate/transmit during charging process in professional charging tower.

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4. Test Result

4.1 Antenna Requirement

4.1.1 Standard Applicable

Section 15.203:

An intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device. The use of a permanently attached antenna or of an antenna that uses a unique coupling to the intentional radiator shall be considered sufficient to comply with the provisions of this Section. The manufacturer may design the unit so that a broken antenna can be replaced by the user, but the use of a standard antenna jack or electrical connector is prohibited.

Section 15.407(a)(1):

If transmitting antennas of directional gain greater than 6 dBi are used, both the maximum conducted output power and the peak power spectral density shall be reduced by the amount in dB that the directional gain of the antenna exceeds 6 dBi.

4.1.2 Antenna Connected Construction

The antenna connector is designed with permanent attachment and no consideration of replacement.

Transmitter antenna of directional gain is 2.5dBi @ 2.5GHz and 3.5dBi @ 5.0GHz.

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4.2 Conducted Emission (mains)

4.2.1 Test Summary

Test Room	:	Shielded Room
Power Source	:	AC 120V / 60Hz
Standards:	:	FCC Part15 B : 2008
EUT Type	:	Table Top
EUT configuration	:	EUT's highest possible emission level

4.2.2 Block diagram of test setup
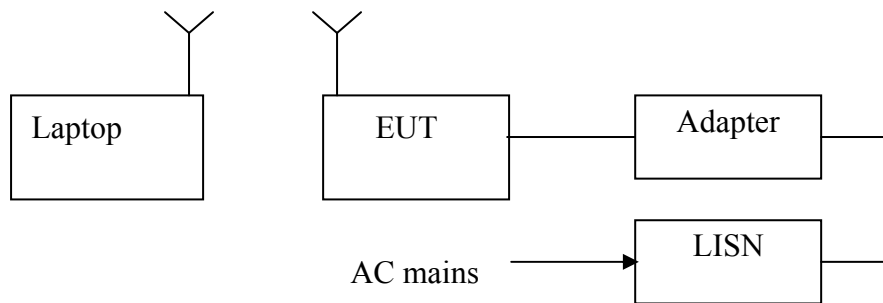
4.2.3 Measurement method

The EUT along with its peripherals were placed on a 1.0m (W) x 1.5m(L) and 0.8m in height wooden table and the EUT was adjusted to maintain a 0.4m space from a vertical reference plane. The EUT was connected to power mains through a Artificial Mains Network(AMN), which provided 50 ohm coupling impedance for measuring instrument and the chassis ground was bounded to the horizontal ground plane of shielded room.

The excess power cable between the EUT and the AMN was bundled. All connecting cables of EUT and peripherals were moved to find the maximum emission.

4.2.4. Result

N/A

This product does not operate/transmit during charging process in professional charging tower.

4.3 RF Output Power in 5.15-5.25GHz

4.3.1 Applicable Standard

For the band 5.15-5.25 GHz, the maximum conducted output power over the frequency band of operation shall not exceed the lesser of 50 mW or 4 dBm + 10log B, where B is the 26dB emission bandwidth in MHz.

4.3.2 Block diagram of test setup
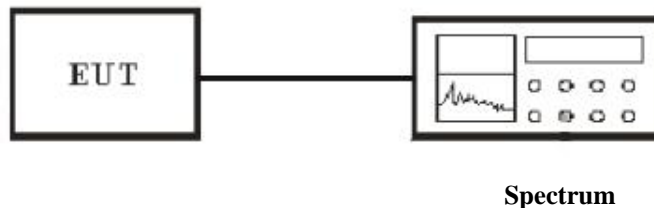
Spectrum

Connection method: The shield cable was connected with EUT and Spectrum which have 50Ω Z_C. The connector of EUT side is original by manufacturer. The connector of Spectrum side is N type.

4.3.3 Measurement method

1. Check the calibration of the measuring instrument using either an internal calibrator or a known signal from an external generator.
2. Position the EUT as shown in above figure without connection to measurement instrument. Turn on the EUT and connect its antenna terminal to measurement instrument via a low loss cable. Then set it to any one measured frequency within its operating range and make sure the instrument is operated in its linear range.
3. Use the following spectrum analyzer settings:

   Measurement mode: Channel Power

   Center Frequency = 5180MHz

   Channel Power Span = 45MHz

   Integ. Bandwidth = 30MHz

   Sweep = auto

   Detector function = peak
4. Hold on 30s, find out the max value on the screen of Spectrum.
5. Repeat above procedures until all frequencies measured were complete.

4.3.4. Result

Temperature ( ) : 22~23	EUT: Explorer Player Unit
Humidity (%RH): 50~54	M/N: EXPL-10-01
Barometric Pressure (mbar): 950~1000	Operation Condition: Tx Mode
Test data: Jun 24, 2010	Test engineer: Phenix

802.11a mode:

Channel No.	Frequency (MHz)	Output Power (dBm)	Limit 1	Limit 2	Margin (dB)
CH 36	5180	6.04	50mW(17dBm)	16.8dBm	10.76

Note:

The 26dB emission bandwidth is 19.1MHz, so 10logB= 12.8dBm.

26dB emission bandwidth plot:

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4.4 Peak Power Spectral Density

4.4.1 Applicable Standard

The peak power spectral density is measured as a conducted emission by direct connection of a calibrated test instrument to the equipment under test.　If the device cannot be connected directly, alternative techniques acceptable to the Commission may be used. Measurements are made over a bandwidth of 1 MHz or the 26 dB emission bandwidth of the device, whichever is less.　A resolution bandwidth less than the measurement bandwidth can be used, provided that the measured power is integrated to show total power over the measurement bandwidth.　If the resolution bandwidth is approximately equal to the measurement bandwidth, and much less than the emission bandwidth of the equipment under test, the measured results shall be corrected to account for any difference between the resolution bandwidth of the test instrument and its actual noise bandwidth.

4.4.2 Block diagram of test setup
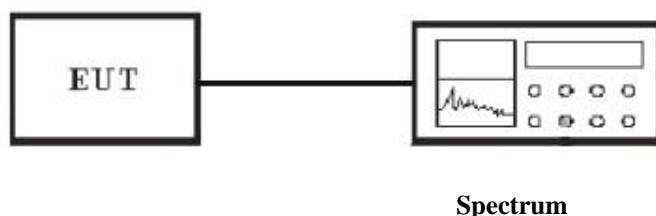
Spectrum

Connection method: The shield cable was connected with EUT and Spectrum which have 50Ω Z_C. The connector of EUT side is original by manufacturer. The connector of Spectrum side is N type.

4.4.3 Measurement method

1. The transmitter output was connected to the spectrum analyzer through a shielded cable.

2. Set the spectrum analyzer as RBW=1 MHz, VBW=3 MHz, Span=40 MHz, Sweep=100ms.

3. Set Detector to Peak, Trace to Max Hold.

4. Allow the trace to stabilize. Use the marker-to-peak function to set the marker to the peak of the emission.

5. Set the peak point to center, and use the channel power measurement function.

   Settings:

   Measurement mode: Channel Power

   Integ. Bandwidth = 1MHz

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Sweep = auto

Detector function = peak

6. Hold on 30s, find out the max value on the screen of Spectrum.

4.4.4. Result

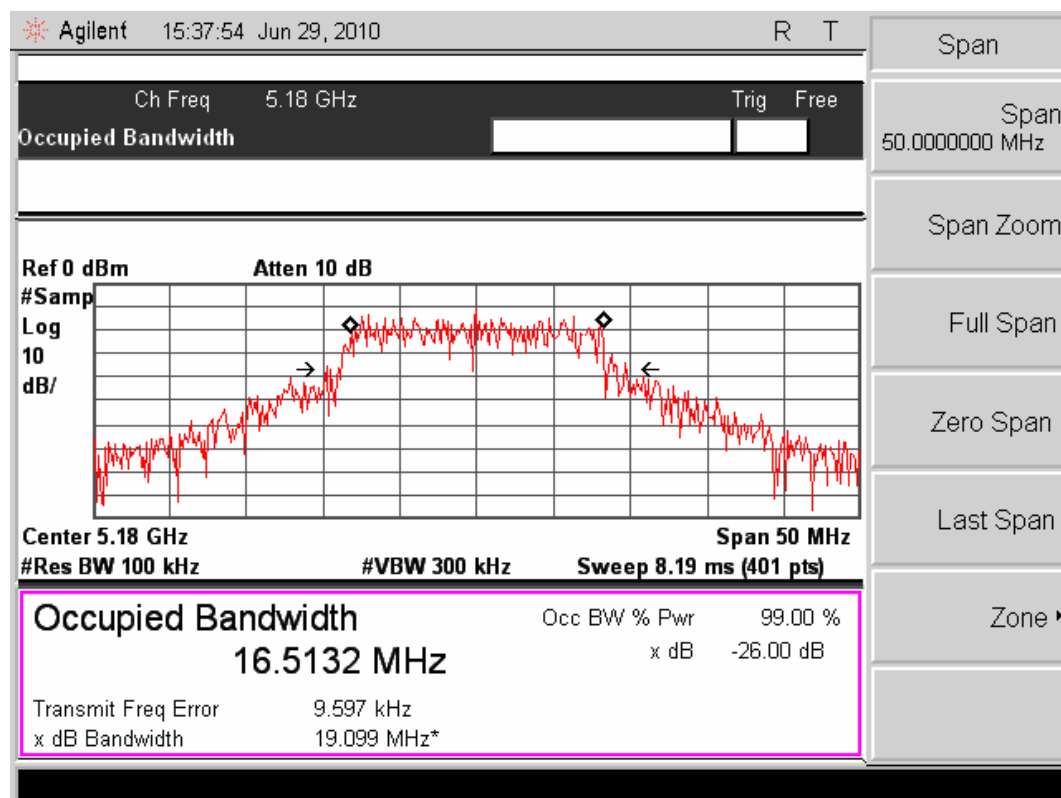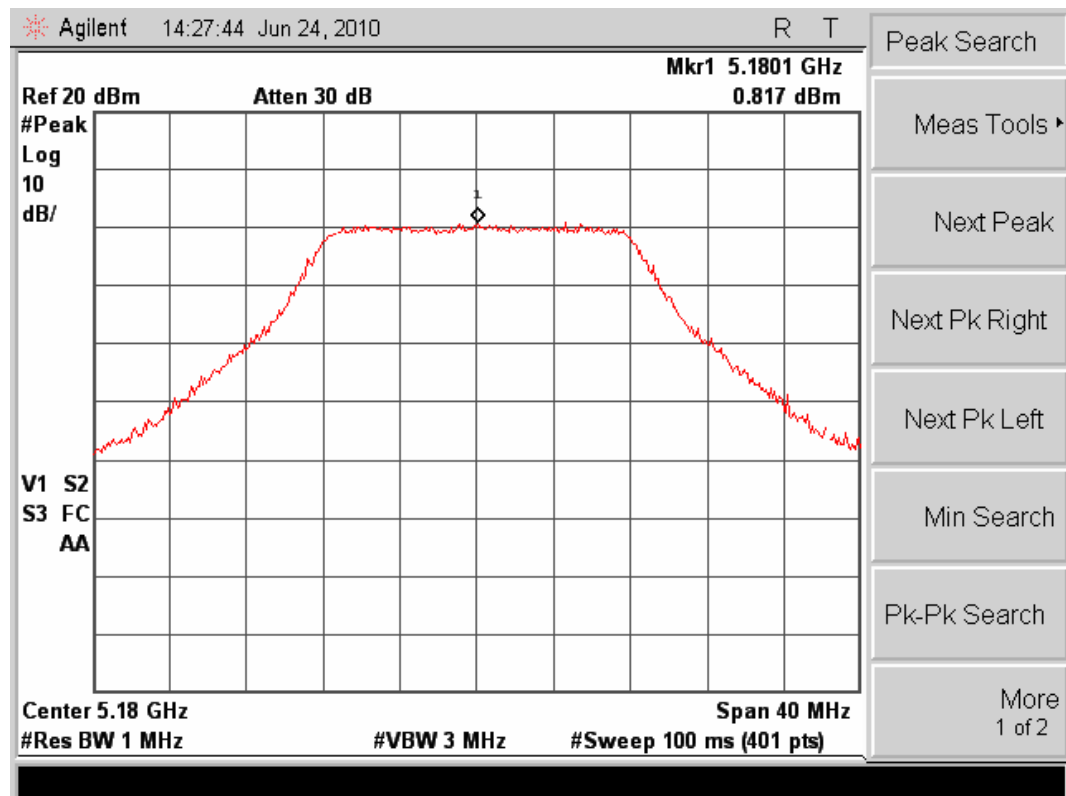| Temperature ( ) : 22~23	EUT: Explorer Player Unit
Humidity (%RH): 50~54	M/N: EXPL-10-01
Barometric Pressure (mbar): 950~1000	Operation Condition: Tx Mode
Test data: Jun 24, 2010	Test engineer: Phenix

802.11a mode Plot:
Channel 36

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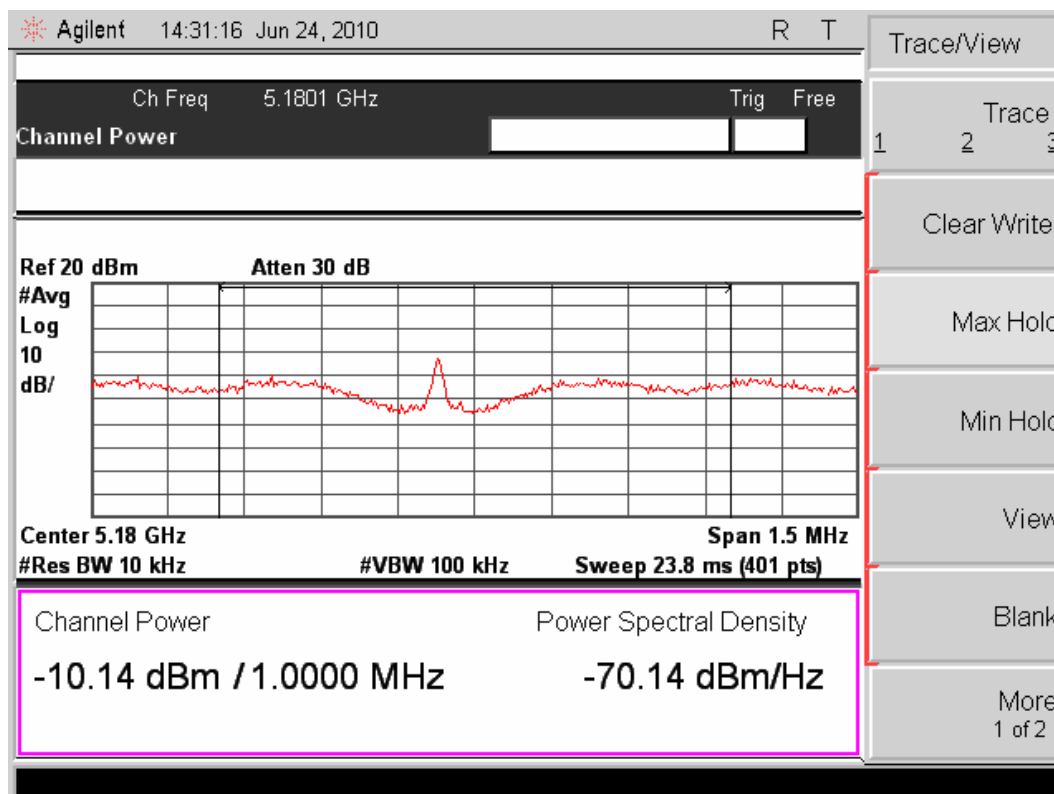
4.5 Peak Excursion

4.5.1 Applicable Standard

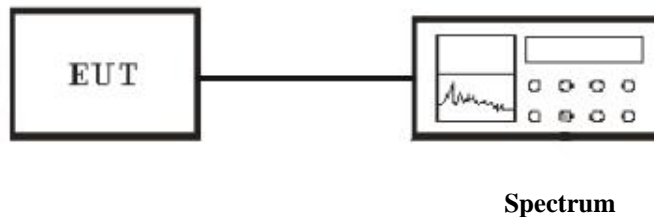The ratio of the peak excursion of the modulation envelope (measured using a peak hold function) to the maximum conducted output power (measured as specified above) shall not exceed 13 dB across any 1 MHz bandwidth or the emission bandwidth whichever is less.

4.5.2 Block diagram of test setup

Spectrum

Connection method: The shield cable was connected with EUT and Spectrum which have 50Ω Z_C. The connector of EUT side is original by manufacturer. The connector of Spectrum side is N type.

4.5.3 Measurement method

1. The transmitter output was connected to the spectrum analyzer through a shielded cable.

2. Set the spectrum analyzer as RBW=1 MHz, VBW=3 MHz, Span=25MHz, Sweep=auto.

3. Set Detector to Peak, Trace 1 to Max Hold and Sweep Time is auto.

4. Mark the peak frequency.

5. Put on the trace 2, set detector on sample mode and set trace to average 100 mode.

6. Hold on 100s, and mark the peak frequency.

7. Calculate the two peak points value.

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4.5.4. Result
   PASS

Temperature ( ) : 22~23	EUT: Explorer Player Unit
Humidity (%RH): 50~54	M/N: EXPL-10-01
Barometric Pressure (mbar): 950~1000	Operation Condition: Tx Mode
Test data: Jun 25, 2010	Test engineer: Phenix

802.11a mode:

Channel No.	Frequency (MHz)	Limits (dB)	Result of Calculation
CH 36	5180	13	9.61

802.11b mode Plot:
Channel LOW

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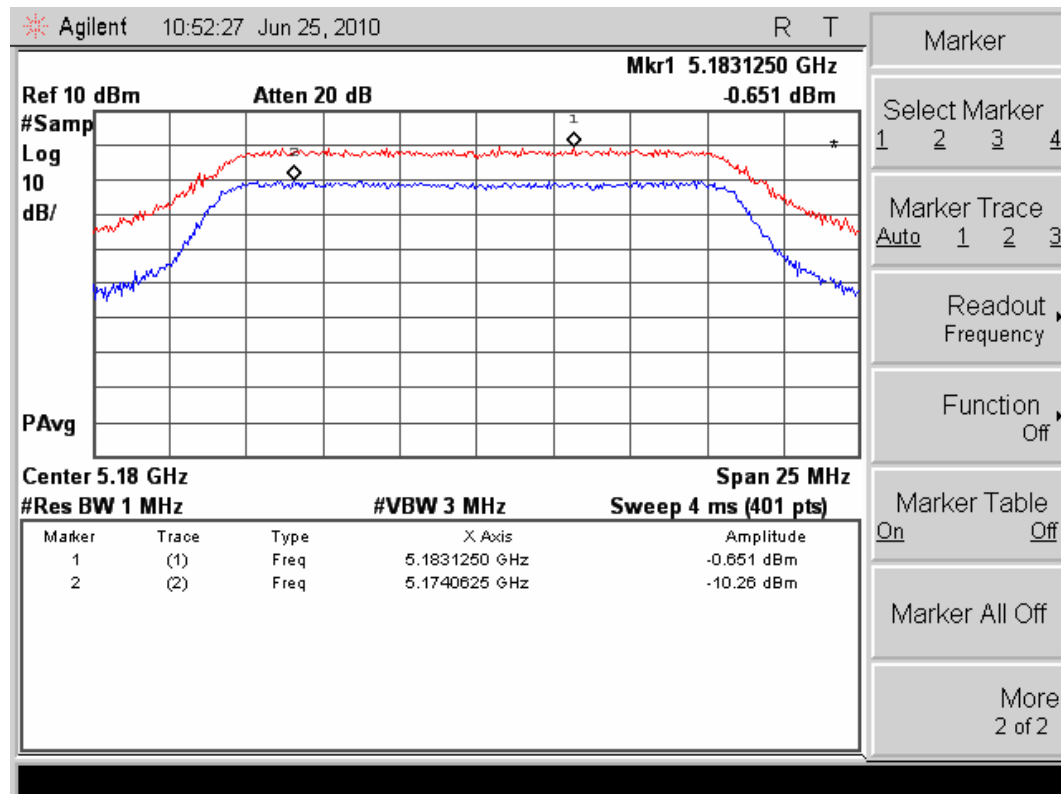
4.6 Undesirable Emissions in 5.15-5.25GHz

4.6.1 Applicable Standard

For transmitters operating in the 5.15-5.25 GHz band: all emissions outside of the 5.15-5.35 GHz band shall not exceed an EIRP of -27 dBm/MHz.

Limit Calculation:

Limit: EIRP = -27dBm/MHz = 0.000002W

Gain at 5GHz = 3.5dBi = 2.24 (numeric)
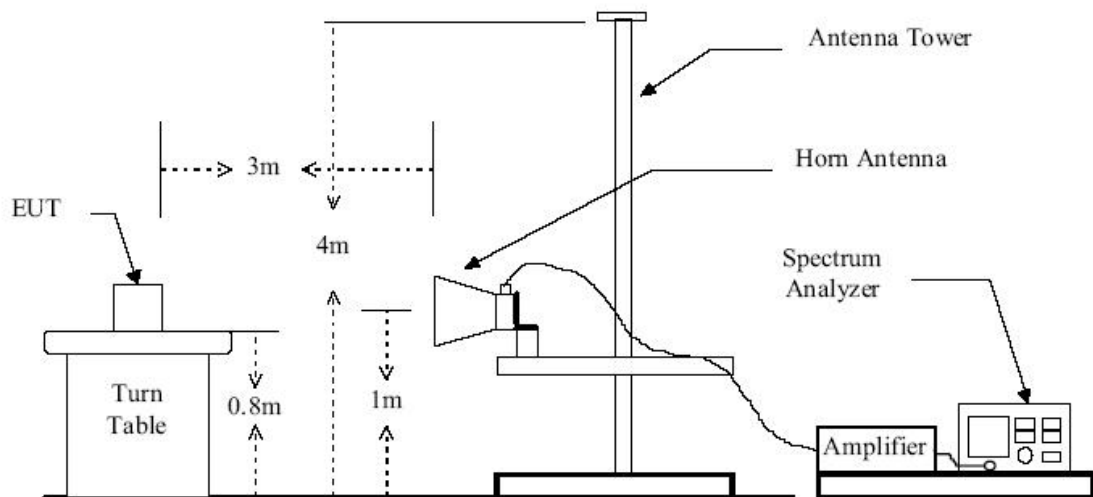
d = 3 meter

Power density formula:

$$\text{Power} = \frac{(Ed)^2}{30 \times G}$$

$$E = \frac{\sqrt{P \times 30G}}{d} = \frac{\sqrt{0.000002 \times 30 \times 2.24}}{3}$$

E = 0.003864 V = 71.7 dBuV/m @ 3m

4.6.2 Block diagram of test setup

Frequencies measured above 1 GHz configuration

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4.6.3 Measurement method

1. Configure the EUT according to ANSI C63.4.

2. The EUT was placed on the top of the turntable 0.8 meter above ground.

3. The phase center of the receiving antenna mounted on the top of a height-variable antenna tower was placed 3 meters far away from the turntable.

4. Power on the EUT and all the supporting units.

5. The turntable was rotated by 360 degrees to determine the position of the highest radiation.

6. The height of the broadband receiving antenna was varied between one meter and four meters above ground to find the maximum emission field strength of both horizontal and vertical polarization.

7. For each suspected emission, the antenna tower was scanned (from 1 M to 4 M) and then the turntable was rotated (from 0 degree to 360 degrees) to find the maximum reading.

8. Set the test-receiver system to Peak or CISPR quasi-peak Detect Function with specified bandwidth under Maximum Hold Mode.

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4.6.4. Result

PASS

2010-06-29 15:52:00

RADIATED EMISSION

Date : 2010-06-28 16:36:16

Trade Name	:	GameTech
Model Name	:	EXPL-10-01
Product Name	:	Explorer Player Unit
Test Condition	:	TX 802.11a CH36

Document No.	:	
Power Supply	:	Internal battery
Temp/Humi	:	27/55RH%
Operator	:	Phenix

Memo   :
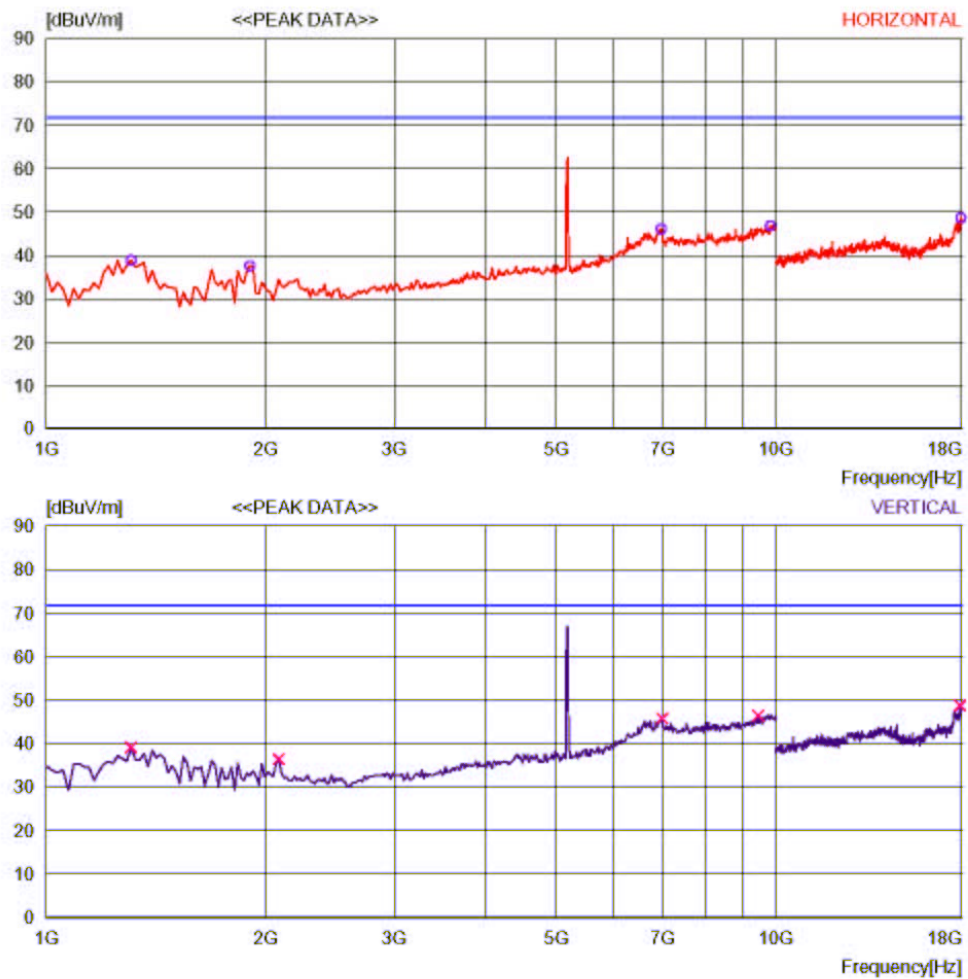
LIMIT : FCC 15.407(b)(1) Undesirable Emissions Limit

TDK South China EMC Center
SAE Technologies Development (Dongguan) Co., Ltd. Changan Branch

2010-06-29 15:52:00

RADIATED EMISSION

Date : 2010-06-28 16:36:16

Trade Name	:	GameTech	Document No.	:	
Model Name	:	EXPL-10-01	Power Supply	:	Internal battery
Product Name	:	Explorer Player Unit	Temp/Humi	:	27/55RH%
Test Condition	:	TX 802.11a CH36	Operator	:	Phenix

Memo :

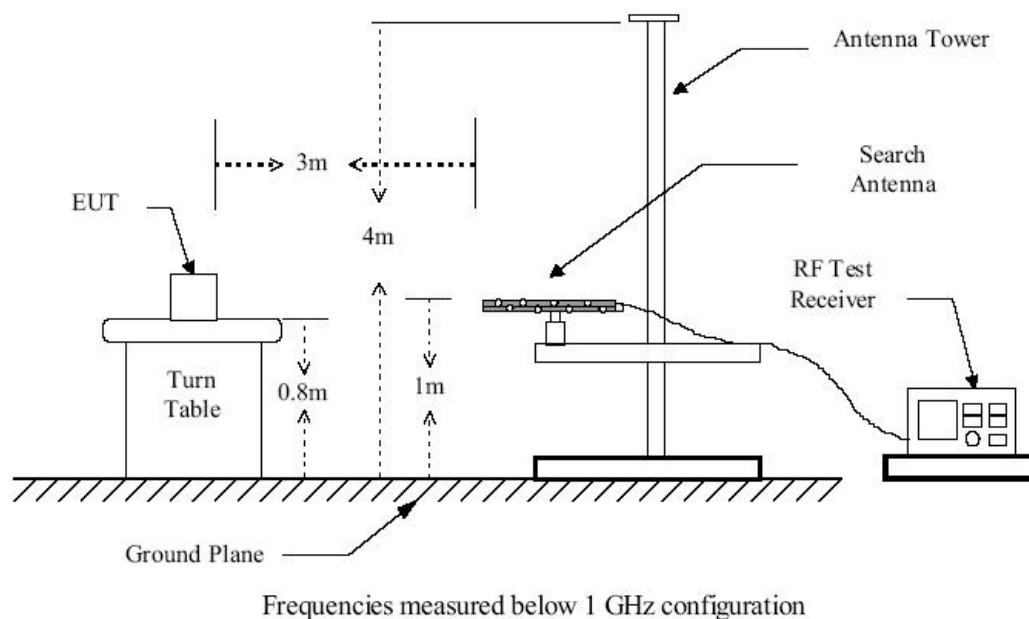LIMIT : FCC 15.407(b)(1) Undesirable Emissions Limit

No.	FREQ [MHz]	READING PEAK [dBuV]	ANT FACTOR [dB]	LOSS [dB]	GAIN [dB]	RESULT [dBuV/m]	LIMIT [dBuV/m]	MARGIN [dB]	ANTENNA [cm]	TABLE [DEG]
----- Horizontal ------										
1	1306.614	46.7	28.6	4.0	40.4	38.9	71.7	32.8	200	164
2	1901.806	42.5	29.9	4.9	39.7	37.6	71.7	34.1	100	178
3	6969.959	34.9	40.9	9.6	39.3	46.1	71.7	25.6	200	349
4	9837.704	32.4	42.4	11.6	39.5	46.9	71.7	24.8	400	25
5	17951.890	24.0	49.3	15.6	40.2	48.7	71.7	23.0	400	139
----- Vertical ------										
6	1306.614	46.9	28.6	4.0	40.4	39.1	71.7	32.6	100	81
7	2082.168	40.1	30.8	5.1	39.6	36.4	71.7	35.3	100	176
8	6987.996	34.4	41.0	9.6	39.2	45.8	71.7	25.9	100	221
9	9458.945	32.5	42.2	11.5	39.7	46.5	71.7	25.2	300	224
10	17903.790	24.6	48.8	15.6	40.2	48.8	71.7	22.9	100	254

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4.7 Radiated Emissions

4.7.1 Applicable Standard

15.407(b) (6) Unwanted emissions below 1 GHz must comply with the general field strength limits set forth in Section 15.209.   Further, any U-NII devices using an AC power line are required to comply also with the conducted limits set forth in Section 15.207.

4.7.2 Block diagram of test setup

Frequencies measured below 1 GHz configuration

4.7.3 Measurement method

1. Configure the EUT according to ANSI C63.4.

2. The EUT was placed on the top of the turntable 0.8 meter above ground.

3. The phase center of the receiving antenna mounted on the top of a height-variable antenna tower was placed 3 meters far away from the turntable.

4. Power on the EUT and all the supporting units.

5. The turntable was rotated by 360 degrees to determine the position of the highest radiation.

6. The height of the broadband receiving antenna was varied between one meter and four meters above ground to find the maximum emission field strength of both horizontal and vertical polarization.

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7. For each suspected emission, the antenna tower was scanned (from 1 M to 4 M) and then the turntable was rotated (from 0 degree to 360 degrees) to find the maximum reading.

8. Set the test-receiver system to Peak or CISPR quasi-peak Detect Function with specified bandwidth under Maximum Hold Mode.
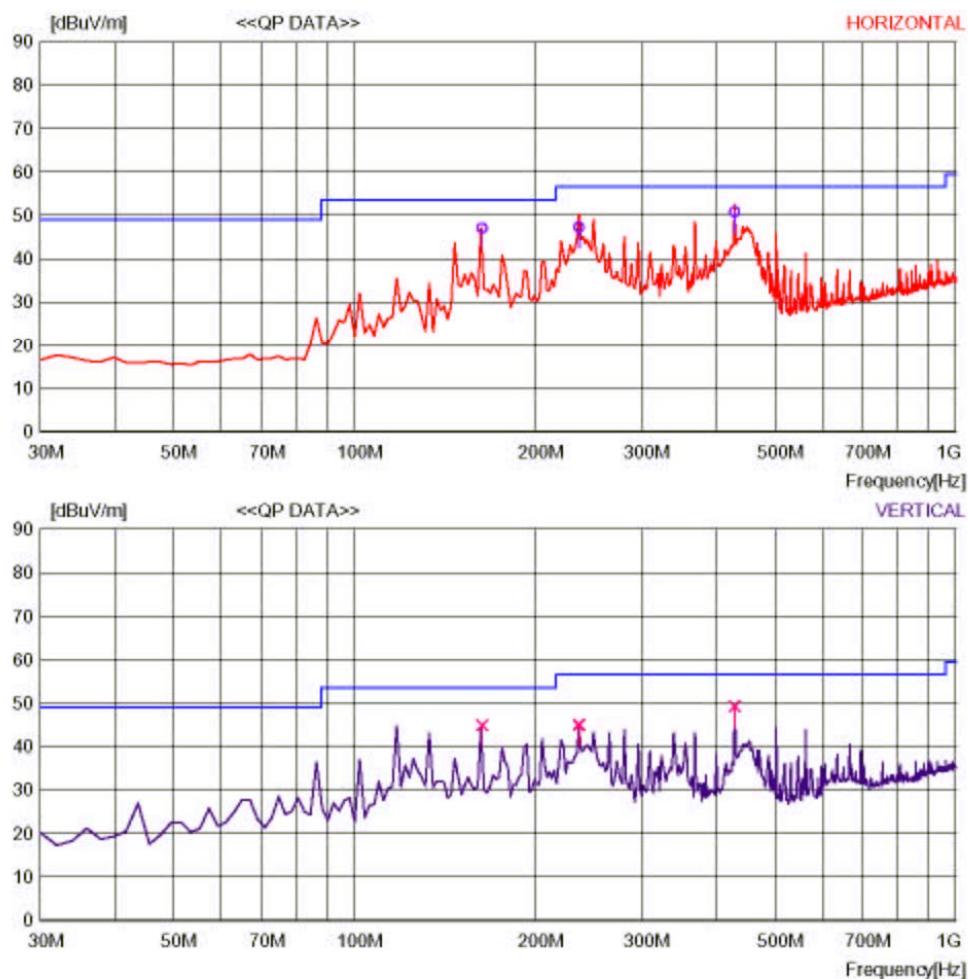
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4.7.4. Result

2010-06-30 09:10:19

RADIATED EMISSION

Date : 2010-06-26 10:39:09

Trade Name	: GameTech	Document No.	:	
Model Name	: EXPL-10-01	Power Supply	:	Internal Battery
Product Name	: Explorer Player Unit	Temp/Humi	:	25 Deg/55% RH
Test Condition	: TX mode	Operator	:	Phenix Zhang

Memo :

LIMIT : FCC Part15 Subpart.B Class A (3m)

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2010-06-30 09:10:19

RADIATED EMISSION

Date : 2010-06-26 10:39:09

Trade Name	:	GameTech	Document No.	:	
Model Name	:	EXPL-10-01	Power Supply	:	Internal Battery
Product Name	:	Explorer Player Unit	Temp/Humi	:	25 Deg/55% RH
Test Condition	:	TX mode	Operator	:	Phenix Zhang

Memo   :

LIMIT : FCC Part15 Subpart.B Class A (3m)

No.	FREQ [MHz]	READING QP [dBuV]	ANT FACTOR [dB]	LOSS [dB]	GAIN [dB]	RESULT QP [dBuV/m]	LIMIT [dBuV/m]	MARGIN [dB]	ANTENNA [cm]	TABLE [deg]
----- Horizontal ------										
1	162.974	59.0	12.0	7.7	31.6	47.1	53.5	6.4	190	142
2	236.052	58.6	12.2	8.1	31.6	47.3	56.5	9.2	100	208
3	428.497	56.3	16.9	9.1	31.5	50.8	56.5	5.7	200	180
----- Vertical ------										
4	162.972	56.8	12.0	7.7	31.6	44.9	53.5	8.6	101	278
5	236.052	56.3	12.2	8.1	31.6	45.0	56.5	11.5	199	80
6	428.497	54.8	16.9	9.1	31.5	49.3	56.5	7.2	199	117

Note:
The QP data shown above are not spurious emission from WiFi module circuit.   It is from other unintentional radiators.
We have disabled the RF module and re-tested the radiated emission for the same frequency range.   We found that the emissions were with the same spectrum and the levels were within around 2 dB of variation when compared with the one with RF module enabled.

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4.8 Undesirable Emissions

4.8.1 Applicable Standard

   15.407(b)(7) The provisions of Section 15.205 of this part apply to intentional radiators operating under this section..

4.8.2 Block diagram of test setup
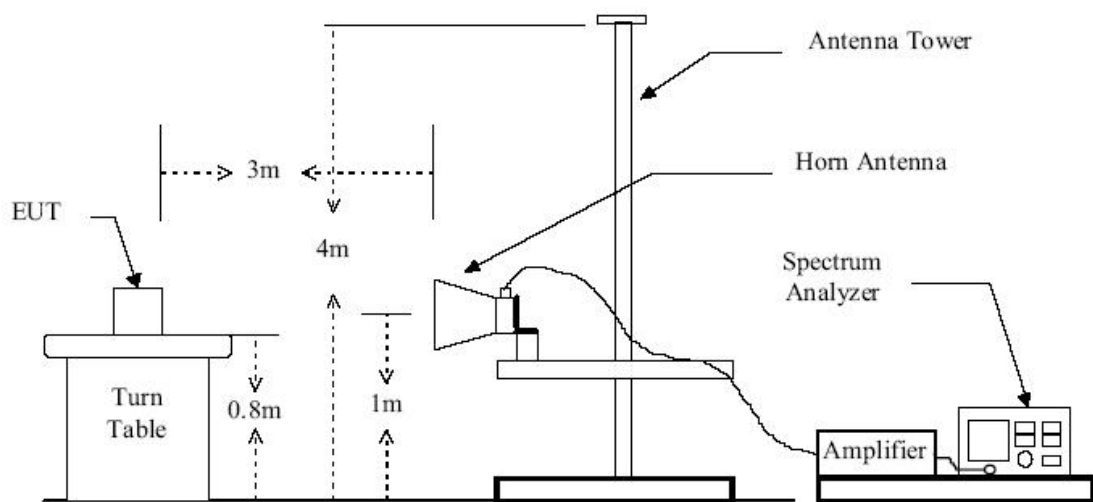
Frequencies measured above 1 GHz configuration

4.8.3 Measurement method

1. Configure the EUT according to ANSI C63.4.

2. The EUT was placed on the top of the turntable 0.8 meter above ground.

3. The phase center of the receiving antenna mounted on the top of a height-variable antenna tower was placed 3 meters far away from the turntable.

4. Power on the EUT and all the supporting units.

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5. The turntable was rotated by 360 degrees to determine the position of the highest radiation.

6. The height of the broadband receiving antenna was varied between one meter and four meters above ground to find the maximum emission field strength of both horizontal and vertical polarization.

7. For each suspected emission, the antenna tower was scanned (from 1 M to 4 M) and then the turntable was rotated (from 0 degree to 360 degrees) to find the maximum reading.

8. Set the test-receiver system to Peak or CISPR quasi-peak Detect Function with specified bandwidth under Maximum Hold Mode.

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4.8.4. Result
PASS

2010-06-28 16:36:29

RADIATED EMISSION

Date : 2010-06-28 16:36:16

Trade Name	:	GameTech	Document No.	:	
Model Name	:	EXPL-10-01	Power Supply	:	Internal battery
Product Name	:	Explorer Player Unit	Temp/Humi	:	27/55RH%
Test Condition	:	TX 802.11a CH36	Operator	:	Phenix

Memo   :

LIMIT : FCC Part15 C transmitter spurious above1G(average)

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2010-06-28 16:36:29

RADIATED EMISSION

Date : 2010-06-28 16:36:16

Trade Name	: GameTech	Document No.	:	
Model Name	: EXPL-10-01	Power Supply	:	Internal battery
Product Name	: Explorer Player Unit	Temp/Humi	:	27/55RH%
Test Condition	: TX 802.11a CH36	Operator	:	Phenix

Memo :
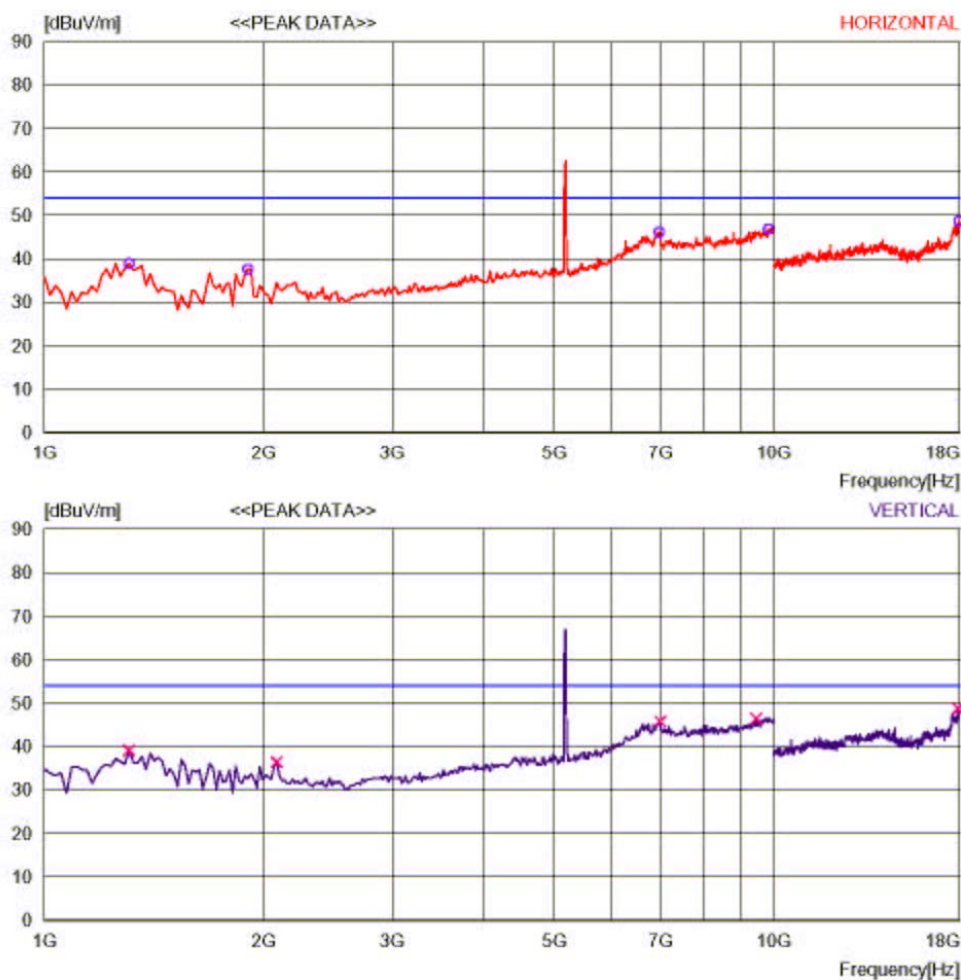
LIMIT : FCC Part15 C transmitter spurious above1G(average)

No.	FREQ [MHz]	READING PEAK [dBuV]	ANT FACTOR [dB]	LOSS [dB]	GAIN [dB]	RESULT [dBuV/m]	LIMIT [dBuV/m]	MARGIN [dB]	ANTENNA [cm]	TABLE [DEG]
----- Horizontal ------										
1	1306.614	46.7	28.6	4.0	40.4	38.9	54	15.1	200	164
2	1901.806	42.5	29.9	4.9	39.7	37.6	54	16.4	100	178
3	6969.959	34.9	40.9	9.6	39.3	46.1	54	7.9	200	349
4	9837.704	32.4	42.4	11.6	39.5	46.9	54	7.1	400	25
5	17951.890	24.0	49.3	15.6	40.2	48.7	54	5.3	400	139
----- Vertical ------										
6	1306.614	46.9	28.6	4.0	40.4	39.1	54	14.9	100	81
7	2082.168	40.1	30.8	5.1	39.6	36.4	54	17.6	100	176
8	6987.996	34.4	41.0	9.6	39.2	45.8	54	8.2	100	221
9	9458.945	32.5	42.2	11.5	39.7	46.5	54	7.5	300	224
10	17903.790	24.6	48.8	15.6	40.2	48.8	54	5.2	100	254

No further spurious emissions found between 18GHz and 40GHz.

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4.9 Frequency Stability

4.9.1 Applicable Standard

15.407(g) Manufacturers of U-NII devices are responsible for ensuring frequency stability such that an emission is maintained within the band of operation under all conditions of normal operation as specified in the user's manual.

4.9.2 Measurement method

1. Set EUT work on the TX mode and put it in temperature chamber. Set the temperature of chamber at 0

2. The transmitter output was connected to the spectrum analyzer through a shielded cable.

3. Set the spectrum analyzer as RBW=100 kHz, VBW=300 kHz, Span=40MHz, Sweep=auto.

4. Set Detector to Peak, Trace to Max Hold.

5. Mark the peak frequency and -26dB point (lower and higher frequency)

6. Set the temperature of chamber at 10 to 50 ,step is 10 . Repeat step 1 to 5.

4.9.3 Result

Temp ( )	Highest Voltage (8.4V)		Normal Voltage (7.4V)		Lowest Voltage (6.0V)	
	Low Frequency (MHz)	High Frequency (MHz)	Low Frequency (MHz)	High Frequency (MHz)	Low Frequency (MHz)	High Frequency (MHz)
0	5169.6	5190.2	5169.7	5190.2	5169.5	5191.3
10	5169.3	5189.7	5169.1	5189.5	5168.9	5189.2
20	5169.5	5191.1	5169.4	5190.8	5169.1	5190.5
30	5170.0	5190.6	5170.2	5190.4	5170.0	5190.7
40	5170.1	5190.7	5170.4	5190.9	5170.2	5191.1
50	5169.5	5190.4	5169.7	5190.1	5169.9	5190.5

The emission band in accordance to 15.407(b)(1) limit: For transmitters operating in the 5.15-5.25GHz band.

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5. FCC ID Label

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions :(1)this device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.
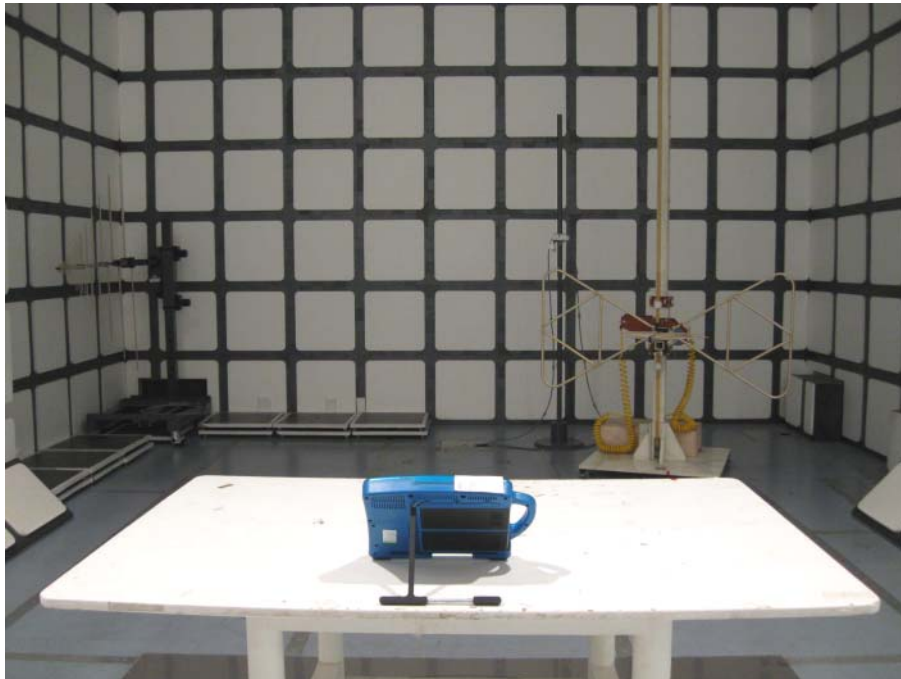
Mark Location:

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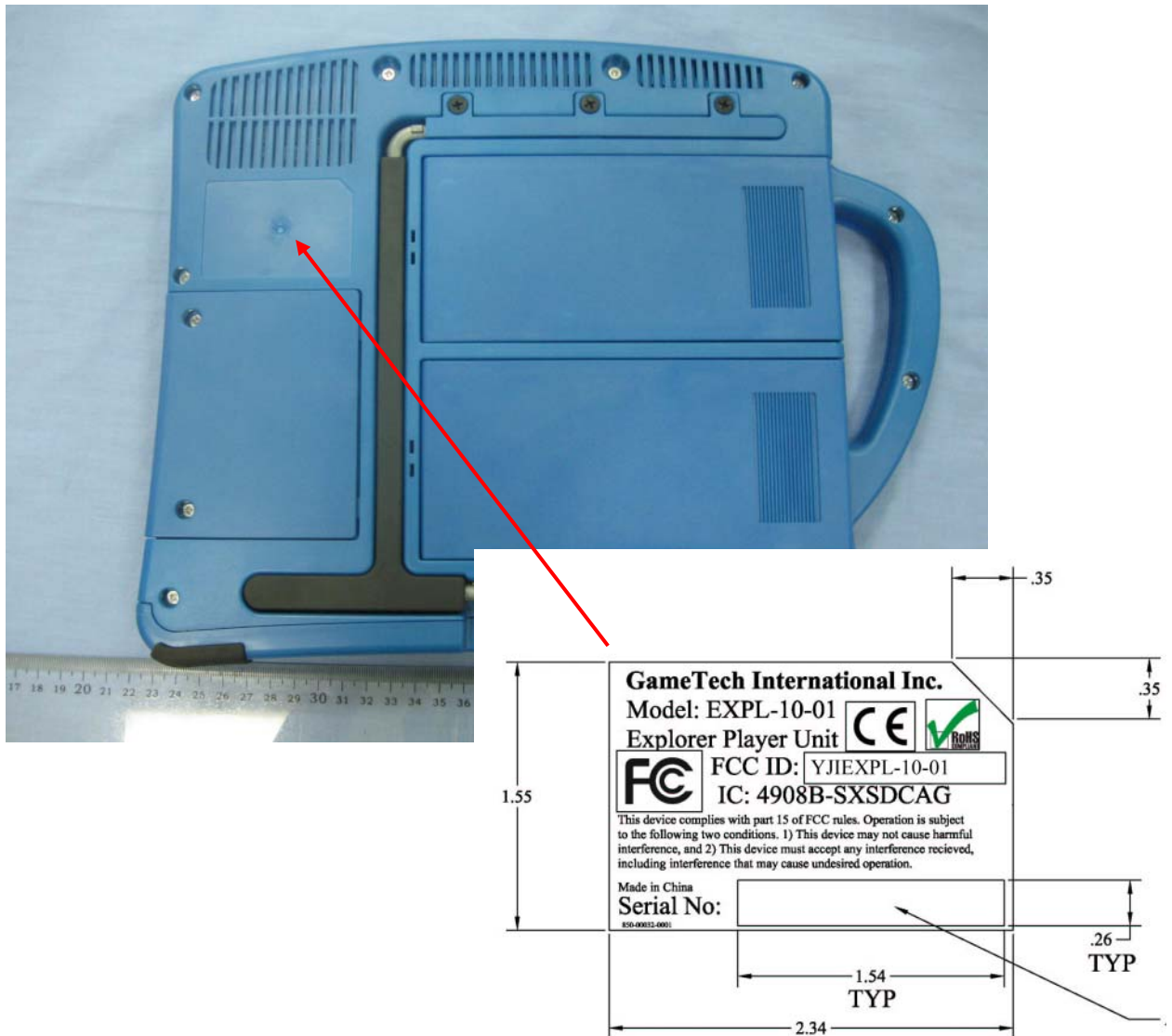
6. Test Setup

6.1 Photographs of the Test Configuration

6.1.1 Radiated emission

Below 1GHz:

Above 1GHz:

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6.2 Photographs of the EUT

Enclosure of EUT

Enclosure of EUT

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Photo of batteries

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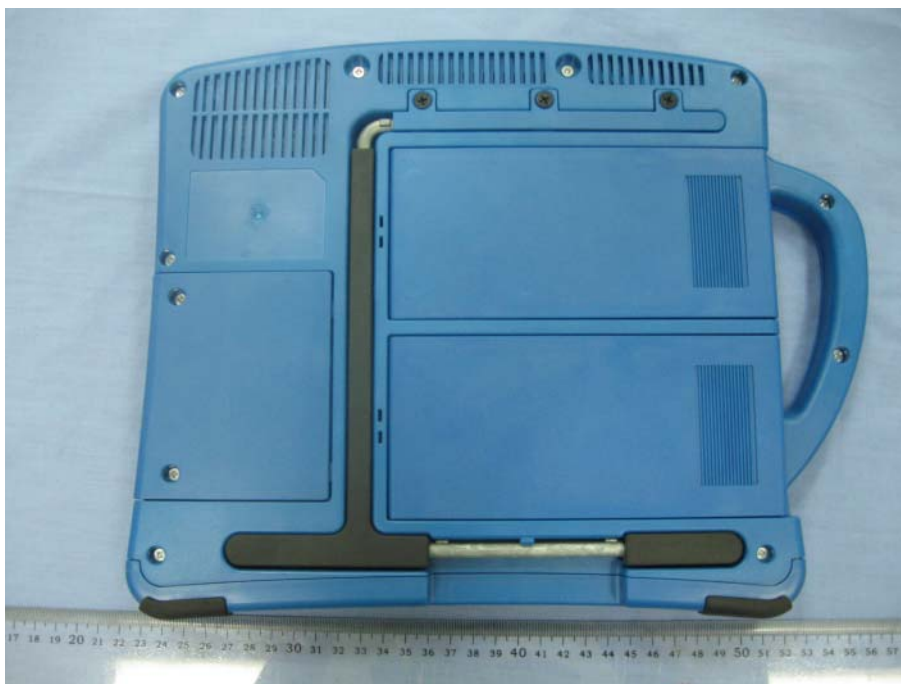
7. Equipment List

No.	Equipment	Manufacturer	Model	Serial No.	Calibration Date
1	Precision Biconical Antenna	TDK Co.	PBA-2030	090500	2009-09-18
2	Precision Log Periodic Antenna	TDK Co.	PLP-3003	061001	2009-09-18
3	Hybrid Log Periodic Antenna	TDK	HLP-3003C	130174	2009-09-18
4	Horn antenna	TDK	HRN-0118	130186	2010-04-07
5	Attenuator 6 dB	Agilent	8491B	MY39260147	2009-09-18
6	Preamplifier	TDK Sonoma	310	242803	2010-04-07
7	Preamplifier	ELENA	EAU-3718 GXA	A070701	2010-04-07
8	EMI Receiver	Rohde & Schwarz	ESIB26	100234	2010-04-07
9	EMI Receiver	Rohde & Schwarz	ESCS30	100350	2010-04-07
10	Spectrum Analyzer	Agilent	E4403B	MY44210199	2010-04-07
11	Spectrum Analyzer	Agilent	E4408B	MY44210575	2010-04-07
12	Art. Mains Network	EMCO	3816/2	00044921	2010-04-07
13	Transient Limiter(10 dB)	Agilent	11947A	3107A03736	2010-04-07
14	Personal Computer	HP	DX2000MT	MXD4250FZM	N/A
15	Personal Computer	HP	DX2000MT	MXD4130B2N	N/A
16	Semi-Anechoic Chamber	TDK Co.	N/A	N/A	2010-04-07
17	Shielded Room	TDK Co.	N/A	N/A	N/A
18	Loop Antenna	EMCO	6502	9107-2440	2010-04-07
19	Temperature Chamber	Espec	LU-213	2010081029	2010-04-07

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8. Test Uncertainty

Test	Range	Confidence Level	Calculated Uncertainty
Radiated emission(3m)	30-1000MHz	95%	4.3dB
Conducted emission	0.15-30MHz	95%	3.3dB

9. Appendix

9.1 Confirmation of Compliance within the Limits

9.1.1 Method of calculating measurement result

Radiated Emission

For example the point of 1306.614MHz, vertical, Page 18.

	Reading	+	Antenna factor	+	Cable loss	-	Gain	=	Result
Example	46.9	+	28.6	+	4.0	-	40.4	=	39.1

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