FCC TEST REPORT
FOR
Matsunichi Communication Holdings R&D (Shenzhen) Co., Ltd.

E-BOOK
Model No.: EB602

Prepared for	:	Matsunichi Communication Holdings R&D (Shenzhen) Co., Ltd.
Address	:	43B/F, INTERNAL CHAMBER OF COMMERCE TOWER, FUHUA RD3 CBD, FUTIAN DISTRICT, SHENZHEN, CHINA Tel: (86) 755-88315408 Fax: (86) 755-88313194

Prepared By	:	Anbotek Compliance Laboratory Limited
Address	:	2F, Langfeng Building, Kefa Road North, Hi-tech Industrial Park, Nanshan District, Shenzhen 518057, China Tel: (86) 755-26014771 Fax: (86) 755-26014772

Report Number	:	201006724F
Date of Test	:	Jun. 13~23, 2010
Date of Report	:	Jun. 24, 2010

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TEST REPORT

Applicant	:	Matsunichi Communication Holdings R&D (Shenzhen) Co., Ltd.
Manufacturer	:	Goldland Electronics (Shenzhen) Co., Ltd.
EUT	:	E-BOOK
Model No.	:	EB602
Rating	:	DC 5V via AC/DC Adapter DC 3.7V via Battery
Trade Mark	:	Matsunichi

Measurement Procedure Used:

FCC Rules and Regulations Part 15 Subpart B 15.107&15.109-2007 & ANSI C63.4-2009

The device described above is tested by Anbotek Compliance Laboratory Limited To determine the maximum emission levels emanating from the device. The maximum emission levels are compared to the FCC Part 15 Subpart B Class B limits both radiated and conducted emissions. The measurement results are contained in this test report and Anbotek Compliance Laboratory Limited Is assumed full responsibility for the accuracy and completeness of these measurements. Also, this report shows that the Equipment Under Test (EUT) is to be technically compliant with the FCC requirements.

This report applies to above tested sample only. This report shall not be reproduced in part without written approval of Anbotek Compliance Laboratory Limited

Date of Test : Jun. 13~23, 2010

Prepared by : Wen Wang
(Engineer)

Reviewer : Cao. Xiang
(Project Manager)

Approved & Authorized Signer : Tom. Chen
(Manager)

1. GENERAL INFORMATION

1.1. Description of Device (EUT)

Description	:	E-BOOK
Model Number	:	EB602
Test Power Supply	:	AC 120V, 60Hz
AC/DC Adapter	:	DYS AC-DC ADAPTER MODEL: DYS06-050150S-1 INPUT: 100-240V~, 50/60Hz, 0.2A OUTPUT: 5.0V ⎓ 1.5A FCC, UL
Notebook PC	:	Manufacturer: IBM M/N: 2373 S/N: 99-OL5HH CE , FCC: DOC
Applicant	:	Matsunichi Communication Holdings R&D (Shenzhen) Co., Ltd.
Address	:	43B/F, INTERNAL CHAMBER OF COMMERCE TOWER, FUHUA RD3 CBD, FUTIAN DISTRICT, SHENZHEN, CHINA
Manufacturer	:	Goldland Electronics (Shenzhen) Co., Ltd.
Address	:	Matsunichi Hi-Tech Bld, South of Chuangjing Street, Lanzhu Road, Longgang Industrial Zone, Shenzhen, China
Date of Sample received	:	Jun. 13, 2010
Date of Test	:	Jun. 13~23, 2010

1.2. Description of Test Facility

The test facility is recognized, certified, or accredited by the following organizations:

CNAS - LAB Code: L3503
Anbotek Compliance Laboratory Limited., Laboratory has been assessed and in compliance with CNAS/CL01: 2006 accreditation criteria for testing laboratories (identical to ISO/IEC 17025:2005 General Requirements) for the Competence of Testing Laboratories.

FCC-Registration No.: 607248
Anbotek Compliance Laboratory Limited, EMC Laboratory has been registed and fully described in a report filed with the (FCC) Federal Communications Commission. The acceptance letter from the FCC is maintained in our files. Registration 607248, November 12, 2008.

IC-Registration No.: 8058A
Anbotek Compliance Laboratory Limited., EMC Laboratory has been registered and fully described in a report filed with the (IC) Industry Canada. The acceptance letter from the IC is maintained in our files. Registration 8058A, November 12, 2008.

Test Location
All Emissions tests were performed
Anbotek Compliance Laboratory Limited. at 2F, Langfeng Building, Kefa Road North, Hi-tech Industrial Park, Nanshan District, Shenzhen 518057, China

1.3. Measurement Uncertainty

Radiation Uncertainty	**:**	Ur = 4.3dB
Conduction Uncertainty	**:**	Uc = 2.7dB

2. POWER LINE CONDUCTED MEASUREMENT

2.1. Test Equipment

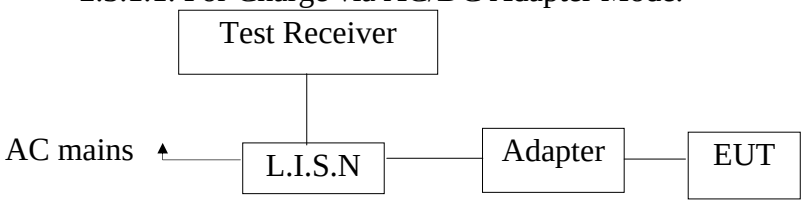
The following test equipments are used during the power line conducted measurement:

Item	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Cal. Interval
1.	EMI Receiver	Rohde & Schwarz	ESCI	100627	Nov. 12, 2009	1 Year
2.	Artificial Mains	Rohde & Schwarz	ENV216	10055	Nov. 12, 2009	1 Year
3.	RF Switching Unit	Compliance Direction	RSU-M2	38303	N/A	N/A
4.	EMI Test Software	R/S	N/A	N/A	N/A	N/A
5.	Coaxial cable	ANBOTEK	N/A	N/A	Nov. 05, 2009	1 Year

2.2. Block Diagram of Test Setup

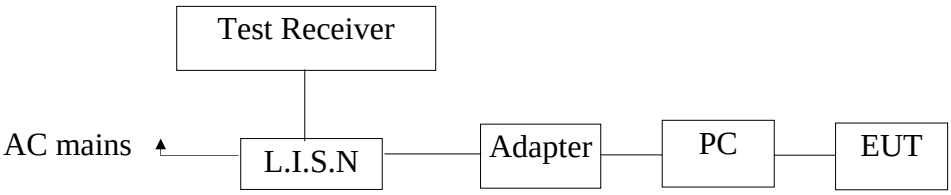
2.2.1. Block diagram of connection between the EUT and simulators

2.3.1.1. For Charge via AC/DC Adapter Mode.



(EUT: E-BOOK)

2.3.1.2. For Data Copy Mode.



(EUT: E-BOOK)

2.3. Power Line Conducted Emission Measurement Limits (FCC Part 15 Class B)

Frequency MHz	Limits dB(μV)	
	Quasi-peak Level	Average Level
0.15 ~ 0.50	66 ~ 56*	56 ~ 46*
0.50 ~ 5.00	56	46
5.00 ~ 30.00	60	50

Notes: 1. *Decreasing linearly with logarithm of frequency.
2. The lower limit shall apply at the transition frequencies.

2.4. Configuration of EUT on Measurement

The following equipments are installed on Power Line Conducted Emission Measurement to meet the commission requirement and operating regulations in a manner which tends to maximize its emission characteristics in a normal application.

EUT	**:**	E-BOOK
Model Number	**:**	EB602
Applicant	**:**	Matsunichi Communication Holdings R&D (Shenzhen) Co., Ltd.

2.5. Operating Condition of EUT

2.5.1. Setup the EUT and simulator as shown as Section 2.2.
2.5.2. Turn on the power of all equipment.
2.5.3. Let the EUT work in test mode (Charge via AC/DC Adapter/Data Copy) and measure it.

2.6. Test Procedure

The EUT system is connected to the power mains through a line impedance stabilization network (L.I.S.N.). This provides a 50ohm coupling impedance for the EUT system. Please refer the block diagram of the test setup and photographs. Both sides of AC line are checked to find out the maximum conducted emission. In order to find the maximum emission levels, the relative positions of equipment and all of the interface cables shall be changed according to FCC ANSI C63.4-2009 on Conducted Emission Measurement.

The bandwidth of test receiver (ESCI) set at 9KHz.

The frequency range from 150KHz to 30MHz is checked.

The test result are reported on Section 2.7.

2.7. Power Line Conducted Emission Measurement Results

PASS.

The frequency range from 150KHz to 30 MHz is investigated.

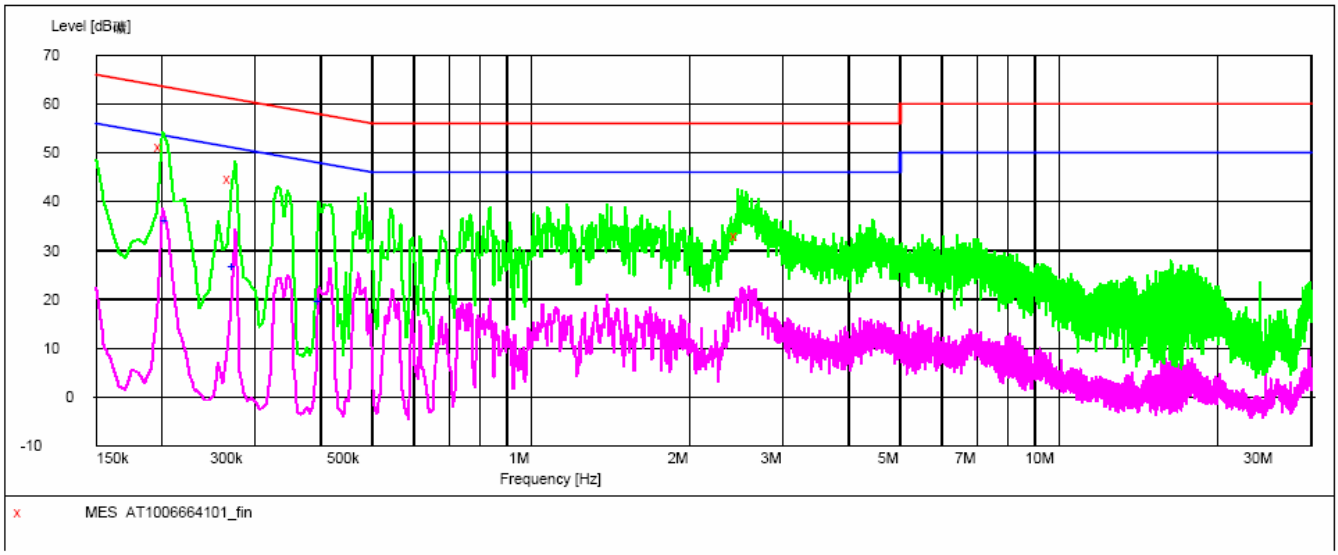
The test curves Please refer the following pages.

CONDUCTED EMISSION TEST DATA

EUT:	E-BOOK M/N: EB602
Operating Condition:	Charge via AC/DC Adapter
Test Site:	1# Shielded Room
Operator:	Well.Wang
Test Specification:	AC 120V/60Hz
Comment:	Live Line
Start of Test:	2010-6-17 3:20 Tem:25℃ Hum:50%

SCAN TABLE: "Voltage (9K-30M)FIN"

Short Description: 150K-30M Voltage



MEASUREMENT RESULT: "AT1006664101_fin"

6/17/2010 3:24PM

Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Detector	Line	PE
0.200000	51.30	10.7	64	12.3	QP	L1	GND
0.270000	44.60	10.3	61	16.5	QP	L1	GND
2.465000	33.00	9.8	56	23.0	QP	L1	GND

MEASUREMENT RESULT: "AT1006664101_fin2"

6/17/2010 3:24PM

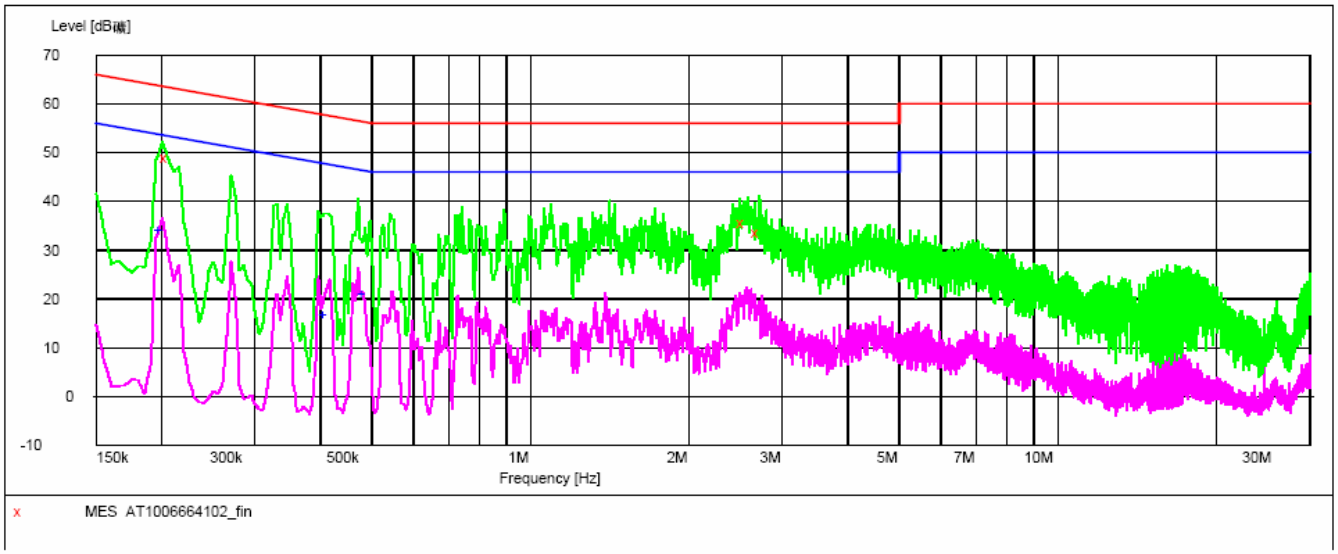
Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Detector	Line	PE
0.205000	36.00	10.7	53	17.4	AV	L1	GND
0.275000	26.60	10.7	51	24.4	AV	L1	GND
0.400000	19.70	10.1	48	28.2	AV	L1	GND

CONDUCTED EMISSION TEST DATA

EUT:	E-BOOK M/N: EB602
Operating Condition:	Charge via AC/DC Adapter
Test Site:	1# Shielded Room
Operator:	Well.Wang
Test Specification:	AC 120V/60Hz
Comment:	Neutral Line
Start of Test:	2010-6-17 3:25 Tem:25℃ Hum:50%

SCAN TABLE: "Voltage (9K-30M) FIN"

Short Description: 150K-30M Voltage



MEASUREMENT RESULT: "AT1006664102_fin"

6/17/2010 3:28PM

Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Detector	Line	PE
0.205000	48.90	10.7	63	14.5	QP	N	GND
2.545000	35.60	9.8	56	20.4	QP	N	GND
2.710000	33.60	9.8	56	22.4	QP	N	GND

MEASUREMENT RESULT: "AT1006664102_fin2"

6/17/2010 3:28PM

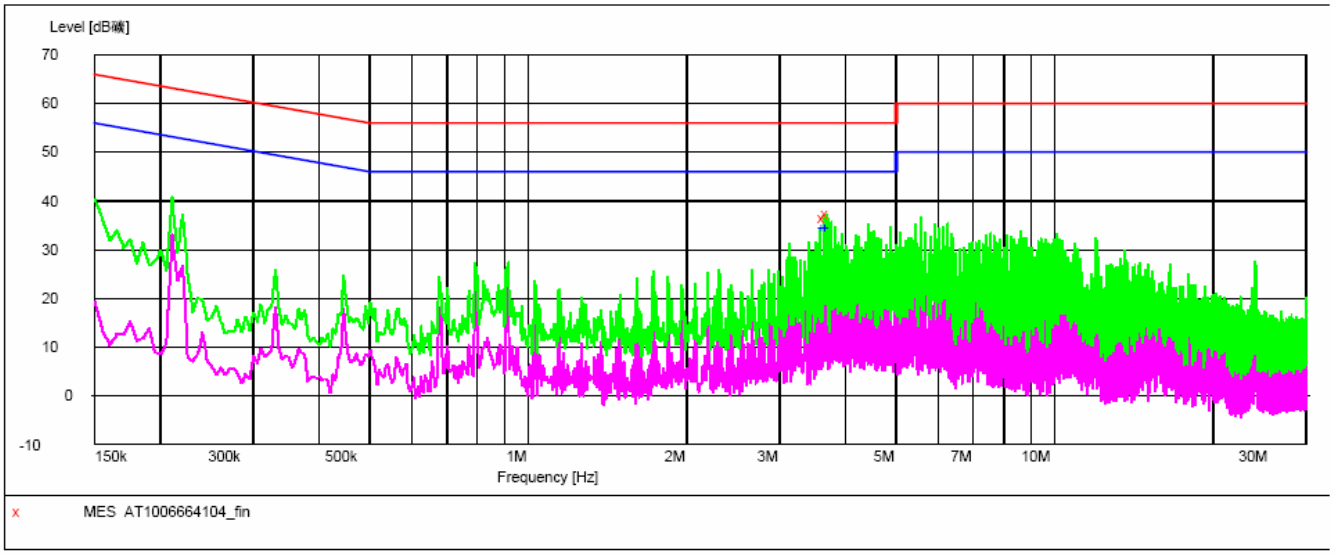
Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Detector	Line	PE
0.200000	34.00	10.7	54	19.6	AV	N	GND
0.410000	16.80	10.1	48	30.8	AV	N	GND
0.485000	20.90	10.0	46	25.4	AV	N	GND

CONDUCTED EMISSION TEST DATA

EUT:	E-BOOK M/N: EB602
Operating Condition:	Data Copy
Test Site:	1# Shielded Room
Operator:	Well.Wang
Test Specification:	AC 120V/60Hz
Comment:	Live Line
Start of Test:	2010-6-17 4:10 Tem:25℃ Hum:50%

SCAN TABLE: "Voltage (9K-30M) FIN"

Short Description: 150K-30M Voltage



MEASUREMENT RESULT: "AT1006664104_fin"

6/17/2010 4:13PM

Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Detector	Line	PE
3.660000	36.40	9.8	56	19.6	QP	L1	GND
3.720000	37.20	9.8	56	18.8	QP	L1	GND

MEASUREMENT RESULT: "AT1006664104_fin2"

6/17/2010 4:13PM

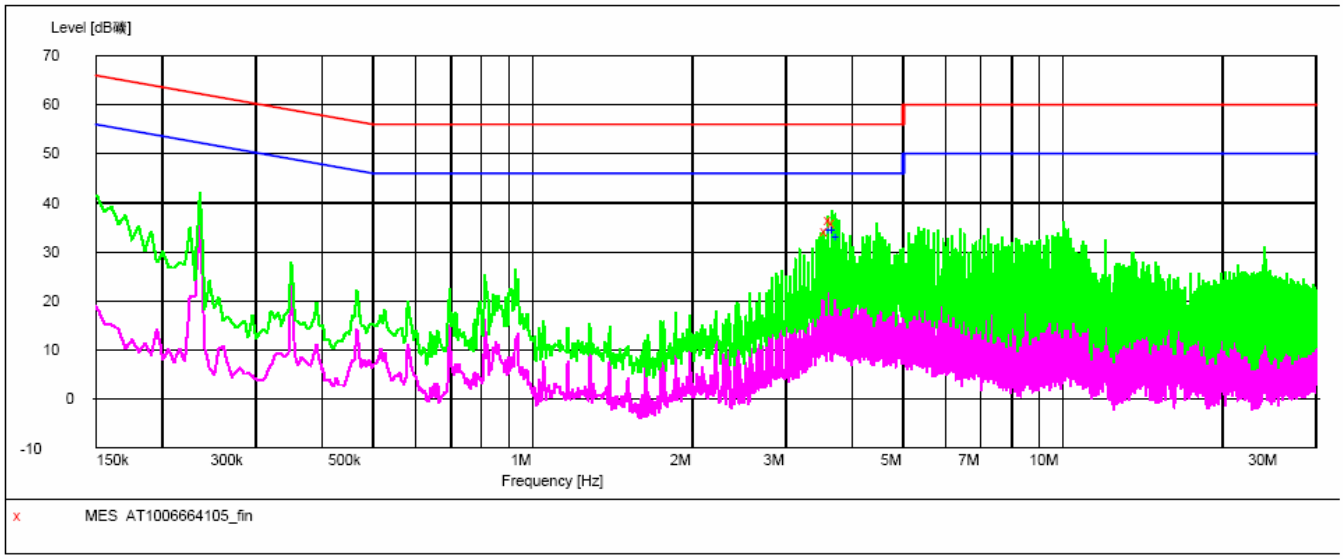
Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Detector	Line	PE
3.660000	34.60	9.8	46	11.4	AV	L1	GND
3.720000	34.60	9.8	46	11.4	AV	L1	GND

CONDUCTED EMISSION TEST DATA

EUT:	E-BOOK M/N: EB602
Operating Condition:	Data Copy
Test Site:	1# Shielded Room
Operator:	Well.Wang
Test Specification:	AC 120V/60Hz
Comment:	Neutral Line
Start of Test:	2010-6-17 4:13 Tem:25℃ Hum:50%

SCAN TABLE: "Voltage (9K-30M)FIN"

Short Description: 150K-30M Voltage



MEASUREMENT RESULT: "AT1006664105_fin"

6/17/2010 4:16PM

Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Detector	Line	PE
3.600000	34.20	9.8	56	21.8	QP	N	GND
3.660000	36.40	9.8	56	19.6	QP	N	GND
3.720000	35.80	9.8	56	20.2	QP	N	GND

MEASUREMENT RESULT: "AT1006664105_fin2"

6/17/2010 4:16PM

Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Detector	Line	PE
3.660000	34.50	9.8	46	11.5	AV	N	GND
3.720000	34.40	9.8	46	11.6	AV	N	GND
3.780000	33.00	9.8	46	13.0	AV	N	GND

3. RADIATED EMISSION MEASUREMENT

3.1. Test Equipment

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

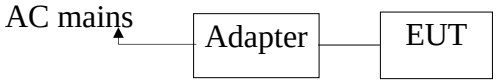
3.1.1. For Anechoic Chamber

Item	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Cal. Interval
1.	EMI Test Receiver	SHURPLE	ESPI	101604	Nov. 12, 2009	1 Year
2.	Bilog Antenna	Schwarzbeck	VULB9163	100015	Nov. 12, 2009	1 Year
3.	Pre-amplifier	Compliance Direction	PAP-0203	22008	Nov. 12, 2009	1 Year
4.	EMI Test Software	SHURPLE	N/A	N/A	N/A	N/A
5.	Coaxial cable	ANBOTEK	N/A	N/A	N/A	N/A

3.2. Block Diagram of Test Setup

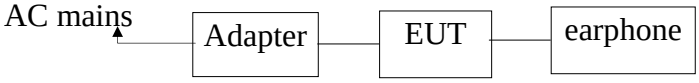
3.2.1. Block diagram of connection between the EUT and simulators

3.2.1.1. For ON Mode.



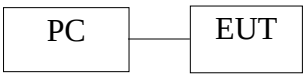
(EUT: E-BOOK)

3.2.1.2. For Music Play Mode.



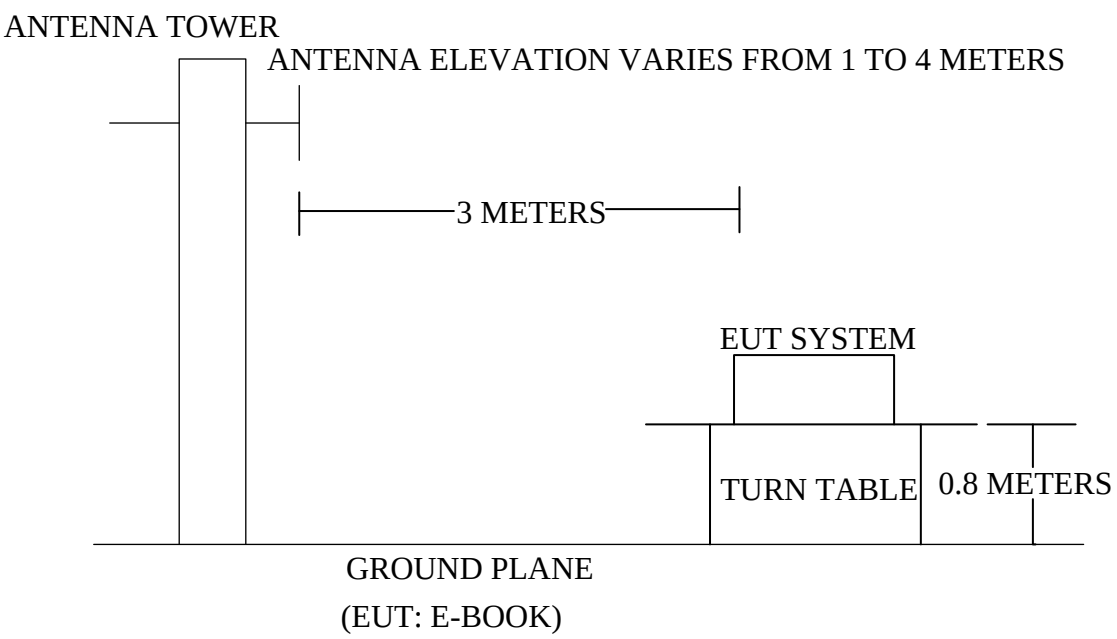
(EUT: E-BOOK)

3.2.1.3. For Data Copy Mode.



(EUT: E-BOOK)

3.2.2. Anechoic Chamber Test Setup Diagram



(EUT: E-BOOK)

3.3. Radiated Emission Limit (Subpart B Class B)

FREQUENCY MHz	DISTANCE Meters	FIELD STRENGTHS LIMIT	
		μV/m	dB(μV)/m
30~88	3	100	40.0
88~216	3	150	43.5
216~960	3	200	46.0
960~1000	3	500	54.0

Remark： (1) Emission level (dB)μV = 20 log Emission level μV/m

(2) The smaller limit shall apply at the cross point between two frequency bands.

(3) Distance is the distance in meters between the measuring instrument, antenna and the closest point of any part of the device or system.

3.4. EUT Configuration on Measurement

The following equipments are installed on Radiated Emission Measurement to meet the commission requirements and operating regulations in a manner which tends to maximize its emission characteristics in normal application.

EUT	:	E-BOOK
Model Number	:	EB602
Applicant	:	Matsunichi Communication Holdings R&D (Shenzhen) Co., Ltd.

3.5. Operating Condition of EUT

3.5.1. Setup the EUT as shown in Section 3.2.

3.5.2. Let the EUT work in test mode (ON/ Music Play/ Data Copy) and measure it.

3.6. Test Procedure

EUT and its simulators are placed on a turn table, which is 0.8 meter high above ground. The turn table can rotate 360 degrees to determine the position of the maximum emission level. EUT is set 3.0 meters away from the receiving antenna, which is mounted on a antenna tower. The antenna can be moved up and down between 1.0 meter and 4 meters to find out the maximum emission level. Broadband antenna (Trilog Broadband Antenna) is used as receiving antenna. Both horizontal and vertical polarizations of the antenna are set on measurement. In order to find the maximum emission levels, all of the interface cables must be manipulated according to ANSI C63.4-2009 on radiated emission measurement.

The bandwidth of the EMI test receiver (ESPI) is set at 120kHz.

The frequency range from 30MHz to 1000MHz is checked.

The test mode (ON/ Music Play/ Data Copy) is tested in chamber and all the test results are listed in Section 3.7.

3.7. Radiated Emission Measurement Results

PASS.

The test curves Please refer the following pages.

Remarks: All measurements were carried out in peak mode. As long as the values stay under the limit line 6dB, No QP measurement are carried out.

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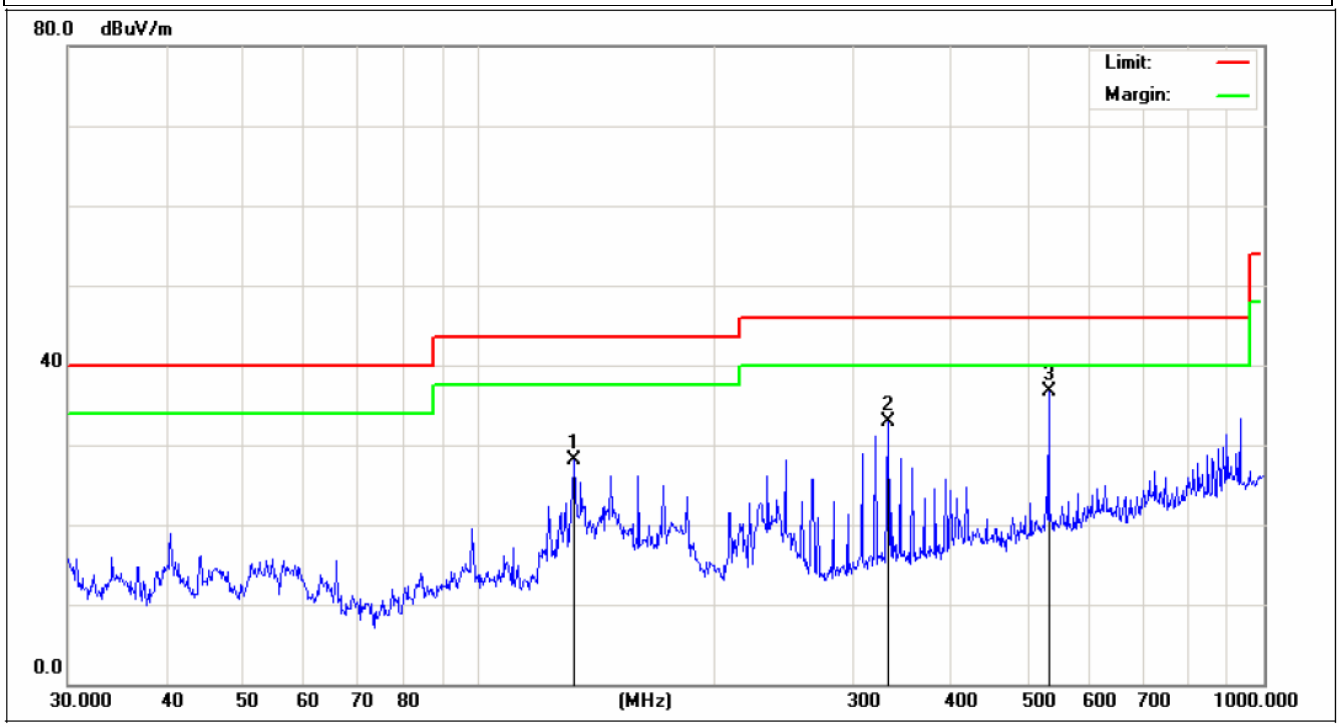
Job No.:	**AT1006664F**	**Polarziation:**	**Horizontal**
Standard:	**(RE)FCC Part 15_class B_3m**	**Power Source:**	**AC 120V/60Hz**
Test item:	**Radiation Test**	**Date:**	**2010/06/17**
Temp.(C)/Hum.(%RH):	**24.3(C)/55%RH**	**Time:**	**16:40:33**
EUT:	**E-BOOK**	**Test By:**	**Well.Wang**
Model:	**EB602**	**Distance:**	**3m**
Note:	**ON Mode**		



No.	Frequency	Reading	Correct	Result	Limit	Over Limit	Remark
	(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	
1	132.2206	54.64	-26.63	28.01	43.50	-15.49	peak
2	332.5187	53.18	-20.18	33.00	46.00	-13.00	peak
3	531.9635	52.18	-15.43	36.75	46.00	-9.25	peak

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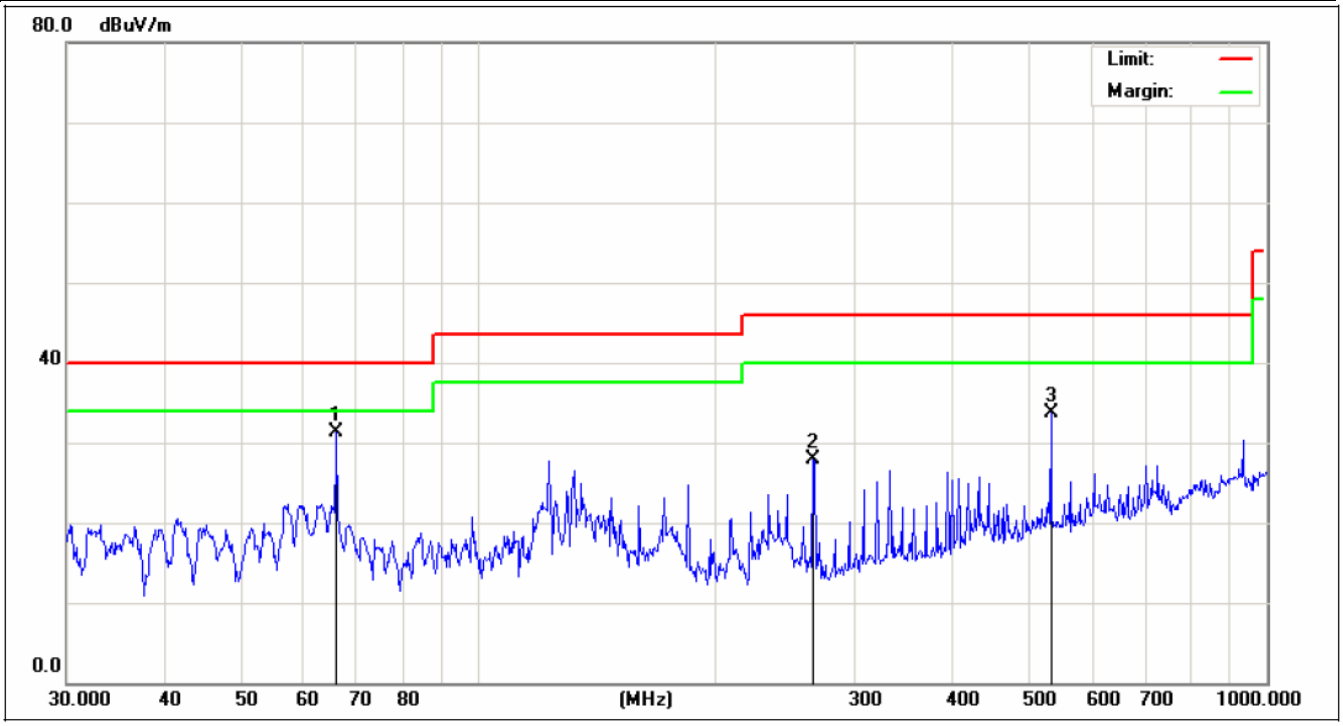
Job No.:	**AT1006664F**	**Polarziation:**	**Vertical**
Standard:	**(RE)FCC Part 15_class B_3m**	**Power Source:**	**AC 120V/60Hz**
Test item:	**Radiation Test**	**Date:**	**2010/06/17**
Temp.(C)/Hum.(%RH):	**24.3(C)/55%RH**	**Time:**	**16:43:49**
EUT:	**E-BOOK**	**Test By:**	**Well.Wang**
Model:	**EB602**	**Distance:**	**3m**
Note:	**ON Mode**		



No.	Frequency	Reading	Correct	Result	Limit	Over Limit	Remark
	(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	
1	66.0342	57.01	-25.75	31.26	40.00	-8.74	peak
2	265.6757	50.14	-22.27	27.87	46.00	-18.13	peak
3	531.9635	49.13	-15.43	33.70	46.00	-12.30	peak

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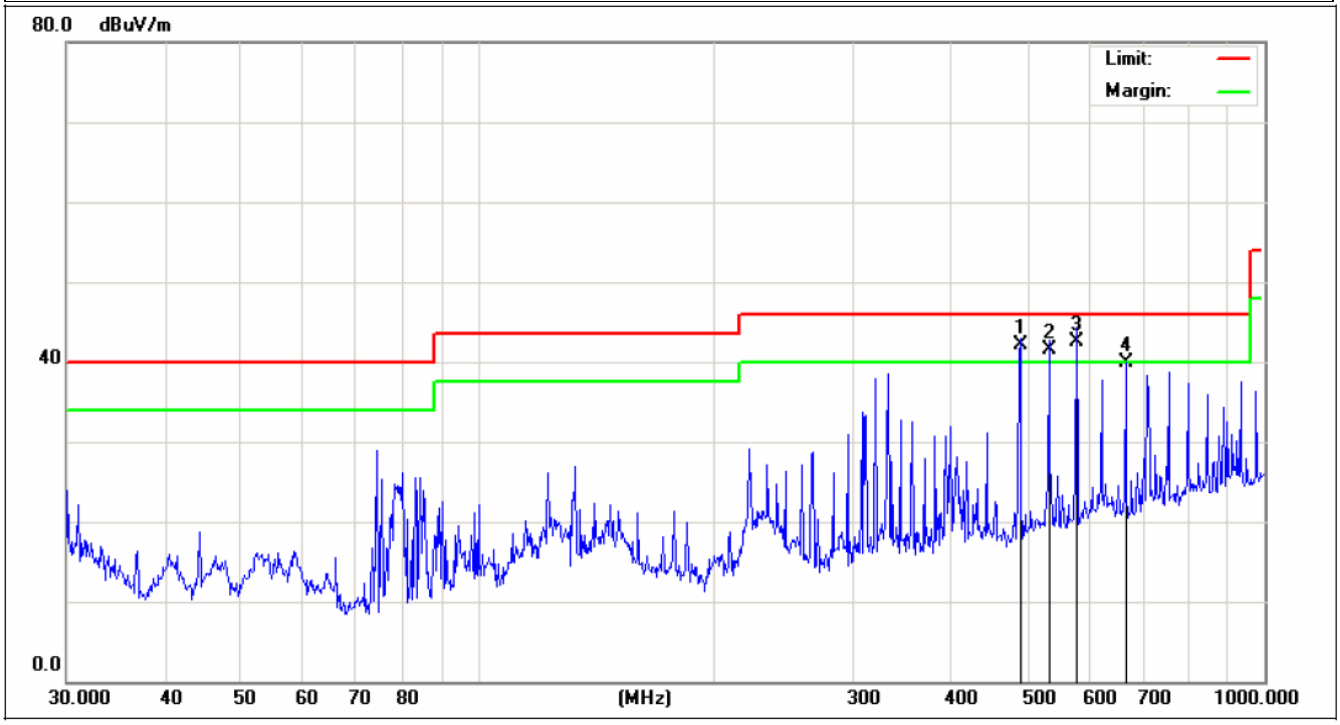
Job No.:	**AT1006664F**	**Polarziation:**	**Horizontal**
Standard:	**(RE)FCC Part 15_class B_3m**	**Power Source:**	**AC 120V/60Hz**
Test item:	**Radiation Test**	**Date:**	**2010/06/17**
Temp.(C)/Hum.(%RH):	**24.3(C)/55%RH**	**Time:**	**16:48:20**
EUT:	**E-BOOK**	**Test By:**	**Well.Wang**
Model:	**EB602**	**Distance:**	**3m**
Note:	**MUSIC PLAY Mode**		



No.	Frequency	Reading	Correct	Result	Limit	Over Limit	Remark
	(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	
1	487.6819	58.84	-16.66	42.18	46.00	-3.82	QP
2	532.0125	56.93	-15.43	41.50	46.00	-4.50	QP
3	576.3453	56.87	-14.29	42.58	46.00	-3.42	QP
4	665.8034	52.76	-12.85	39.91	46.00	-6.09	peak

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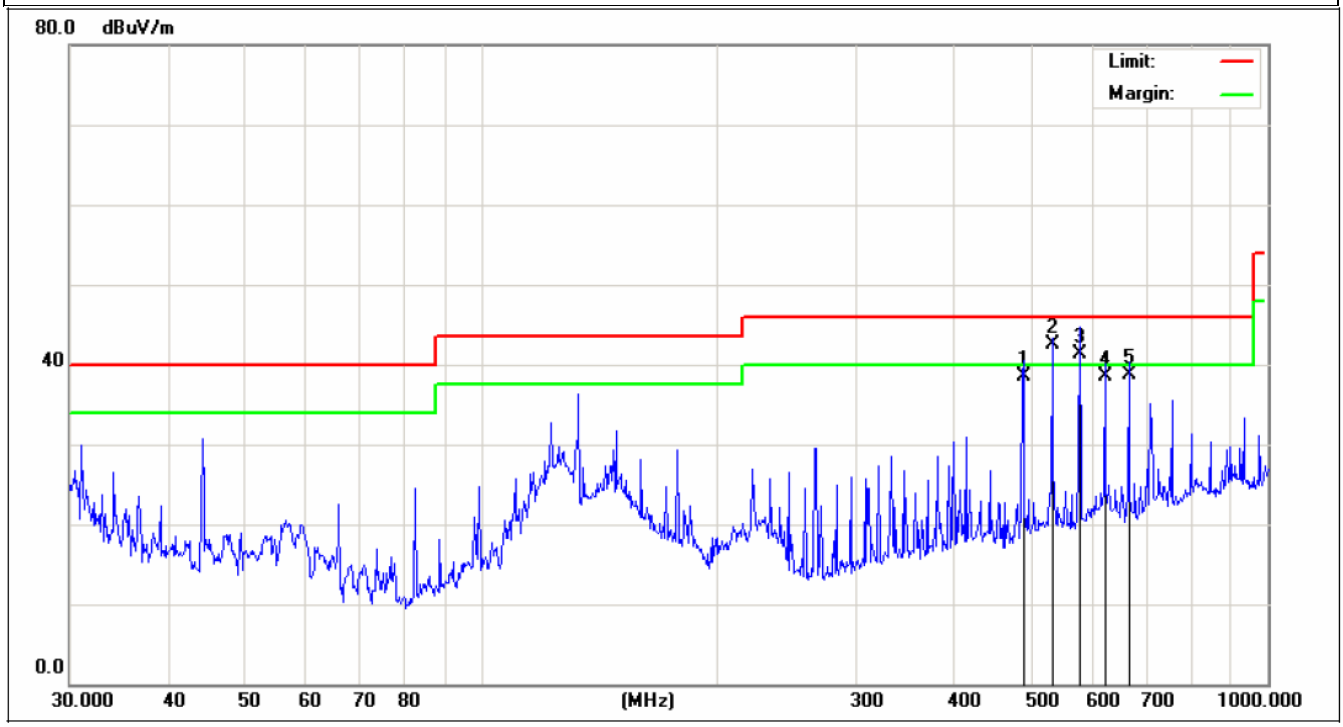
Job No.:	**AT1006664F**	**Polarziation:**	**Vertical**
Standard:	**(RE)FCC Part 15_class B_3m**	**Power Source:**	**AC 120V/60Hz**
Test item:	**Radiation Test**	**Date:**	**2010/06/17**
Temp.(C)/Hum.(%RH):	**24.3(C)/55%RH**	**Time:**	**16:52:10**
EUT:	**E-BOOK**	**Test By:**	**Well.Wang**
Model:	**EB602**	**Distance:**	**3m**
Note:	**MUSIC PLAY Mode**		



No.	Frequency	Reading	Correct	Result	Limit	Over Limit	Remark
	(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	
1	489.0269	55.03	-16.62	38.41	46.00	-7.59	QP
2	532.0205	58.01	-15.43	42.58	46.00	-3.42	QP
3	576.3543	55.61	-14.29	41.32	46.00	-4.68	QP
4	620.7096	51.98	-13.41	38.57	46.00	-7.43	QP
5	665.8035	51.52	-12.85	38.67	46.00	-7.33	QP

Anbotek Compliance Laboratory Limited
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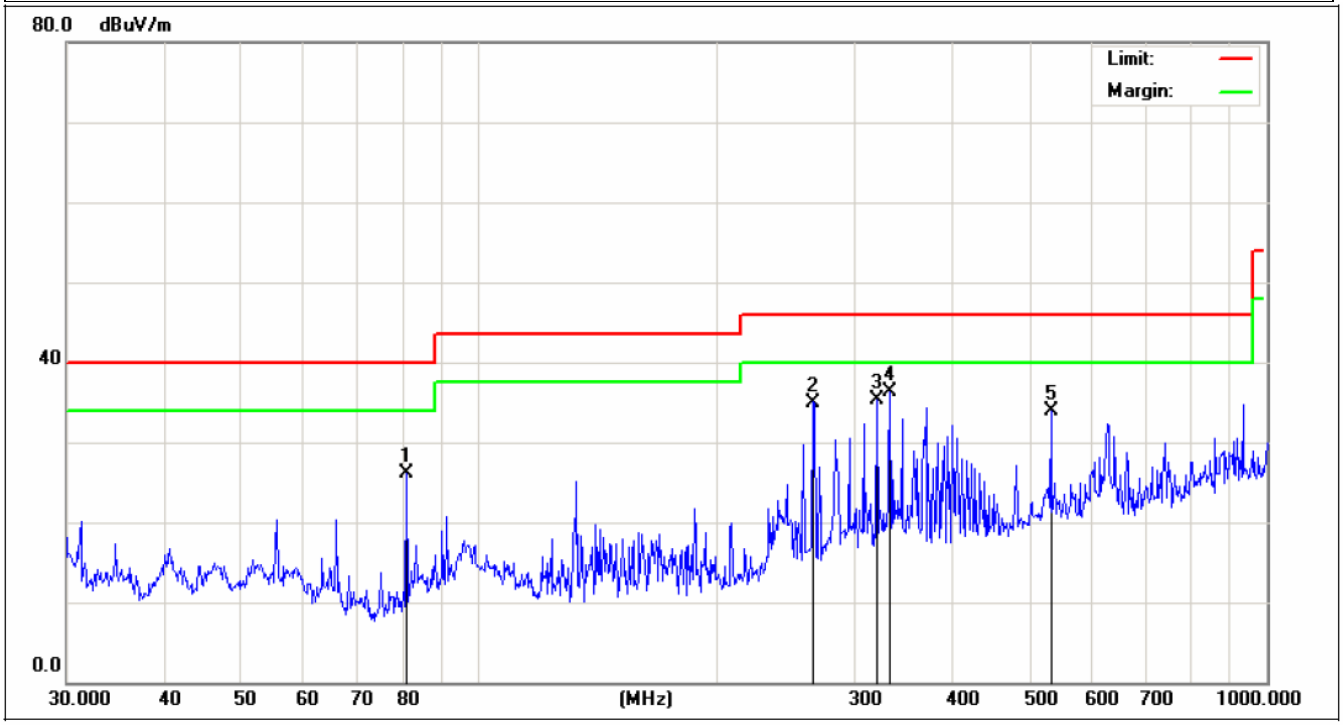
Job No.:	**AT1006664F**	**Polarziation:**	**Horizontal**
Standard:	**(RE)FCC Part 15_class B_3m**	**Power Source:**	**AC 120V/60Hz**
Test item:	**Radiation Test**	**Date:**	**2010/06/17**
Temp.(C)/Hum.(%RH):	**24.3(C)/55%RH**	**Time:**	**16:56:09**
EUT:	**E-BOOK**	**Test By:**	**Well.Wang**
Model:	**EB602**	**Distance:**	**3m**
Note:	**DATA COPY Mode**		



No.	Frequency	Reading	Correct	Result	Limit	Over Limit	Remark
	(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	
1	80.9275	53.08	-27.04	26.04	40.00	-13.96	peak
2	265.6757	57.27	-22.27	35.00	46.00	-11.00	peak
3	319.9370	56.08	-20.76	35.32	46.00	-10.68	peak
4	332.5187	56.44	-20.18	36.26	46.00	-9.74	peak
5	531.9635	49.37	-15.43	33.94	46.00	-12.06	peak

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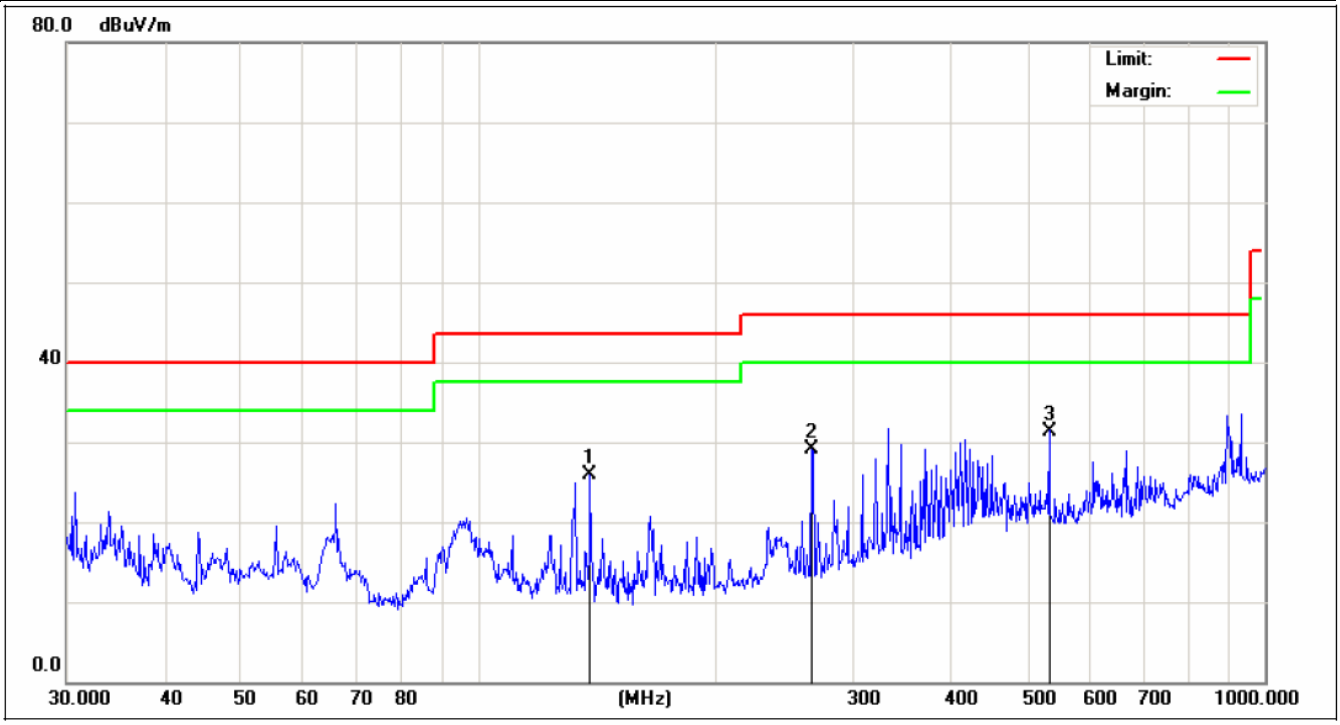
Job No.:	**AT1006664F**	**Polarziation:**	**Vertical**
Standard:	**(RE)FCC Part 15_class B_3m**	**Power Source:**	**AC 120V/60Hz**
Test item:	**Radiation Test**	**Date:**	**2010/06/17**
Temp.(C)/Hum.(%RH):	**24.3(C)/55%RH**	**Time:**	**16:59:41**
EUT:	**E-BOOK**	**Test By:**	**Well.Wang**
Model:	**EB602**	**Distance:**	**3m**
Note:	**DATA COPY Mode**		



No.	Frequency	Reading	Correct	Result	Limit	Over Limit	Remark
	(MHz)	(dBuV/m)	dB/m	(dBuV/m)	(dBuV/m)	(dB)	
1	138.8735	53.05	-27.07	25.98	43.50	-17.52	peak
2	265.6757	51.28	-22.27	29.01	46.00	-16.99	peak
3	531.9635	46.83	-15.43	31.40	46.00	-14.60	peak