FCC CERTIFICATION On Behalf of Eastern Times Technology Co., Ltd.

2.4G Wireless Optical Mouse Model No.: DS-2293

FCC ID: TUVDS-2293N

Prepared for

Address

: Eastern Times Technology Co., Ltd.

Building D, Nan An Industry Park, Youganpu Village Fenggang Town, Dongguan City, Guangdong, China

Prepared by Address

ACCURATE TECHNOLOGY CO. LTD

: F1, Bldg. A, Changyuan New Material Port, Keyuan Rd.

Science & Industry Park, Nanshan, Shenzhen, Guangdong

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Report Number : ATE20112572
Date of Test : December 1-7, 2011
Date of Report : December 7, 2011

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APPENDIX I (TEST CURVES) (28 pages)

Test Report Certification

Applicant : Eastern Times Technology Co., Ltd.Manufacturer : Eastern Times Technology Co., Ltd.

EUT Description : 2.4G Wireless Optical Mouse

(A) MODEL NO.: DS-2293

(B) SERIAL NO.: N/A

(C) POWER SUPPLY: DC 1.5V ("AAA" batteries $1 \times$)

Measurement Procedure Used:

FCC Rules and Regulations Part 15 Subpart C Section 15.249: 2008 ANSI C63.4: 2003

The device described above is tested by ACCURATE TECHNOLOGY CO. LTD to determine the maximum emission levels emanating from the device. The maximum emission levels are compared to the FCC Part 15 Subpart C Section15.249 limits. The measurement results are contained in this test report and ACCURATE TECHNOLOGY CO. LTD 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 ACCURATE TECHNOLOGY CO. LTD.

Date of Test :	December 1-7, 2011
Prepared by :	Apple Lu
	(Engineer)
Approved & Authorized Signer :	Lemb
	(Manager)

1. GENERAL INFORMATION

1.1.Description of Device (EUT)

EUT : 2.4G Wireless Optical Mouse

Model Number : DS-2293

Power Supply : DC 1.5V ("AAA" batteries $1 \times$)

Operate Frequency : 2408.000-2474.000MHz

Applicant : Eastern Times Technology Co., Ltd.

Address : Building D, Nan An Industry Park, Youganpu Village

Fenggang Town, Dongguan City, Guangdong, China

Manufacturer : Eastern Times Technology Co., Ltd.

Address : Building D, Nan An Industry Park, Youganpu Village

Fenggang Town, Dongguan City, Guangdong, China

Date of sample received: December 1, 2011

Date of Test : December 1-7, 2011

1.2.Description of Test Facility

EMC Lab : Accredited by TUV Rheinland Shenzhen

Listed by FCC

The Registration Number is 752051

Listed by Industry Canada

The Registration Number is 5077A-2

Accredited by China National Accreditation Committee

for Laboratories

The Certificate Registration Number is L3193

Name of Firm : ACCURATE TECHNOLOGY CO. LTD

Site Location : F1, Bldg. A, Changyuan New Material Port, Keyuan Rd.

Science & Industry Park, Nanshan, Shenzhen, Guangdong

P.R. China

1.3. Measurement Uncertainty

Conducted Emission Expanded Uncertainty = 2.23dB, k=2

Radiated emission expanded uncertainty = 3.08dB, k=2 (9kHz-30MHz)

,

Radiated emission expanded uncertainty = 4.42dB, k=2

(30MHz-1000MHz)

Radiated emission expanded uncertainty = 4.06dB, k=2

(Above 1GHz)

2. MEASURING DEVICE AND TEST EQUIPMENT

Table 1: List of Test and Measurement Equipment

Kind of equipment	Manufacturer	Type	S/N	Calibrated until
EMI Test Receiver	Rohde&Schwarz	ESCS30	100307	Jan. 15, 2012
EMI Test Receiver	Rohde&Schwarz	ESPI3	101526/003	Jan. 15, 2012
Spectrum Analyzer	Agilent	E7405A	MY45115511	Jan. 15, 2012
Pre-Amplifier	Rohde&Schwarz	CBLU118354 0-01	3791	Jan. 15, 2012
Loop Antenna	Schwarzbeck	FMZB1516	1516131	Jan. 15, 2012
Bilog Antenna	Schwarzbeck	VULB9163	9163-323	Jan. 15, 2012
Horn Antenna	Schwarzbeck	BBHA9120D	9120D-655	Jan. 15, 2012
Horn Antenna	Schwarzbeck	BBHA9170	9170-359	Jan. 15, 2012
LISN	Rohde&Schwarz	ESH3-Z5	100305	Jan. 15, 2012
LISN	Schwarzbeck	NSLK8126	8126431	Jan. 15, 2012

3. SUMMARY OF TEST RESULTS

FCC Rules	Description of Test	Result
Section 15.207	Conducted Emission	N/A
Section 15.249(a)	Fundamental and Harmonics Radiated Emission	Compliant
Section 15.249(d)	Spurious Radiated Emission	Compliant
Section 15.249(d)	Band Edge	Compliant
Section 15.203	Antenna Requirement	Compliant

Remark: "N/A" means "Not applicable".

4. FUNDAMENTAL AND HARMONICS RADIATED EMISSION FOR SECTION 15.249(A)

4.1.Block Diagram of Test Setup

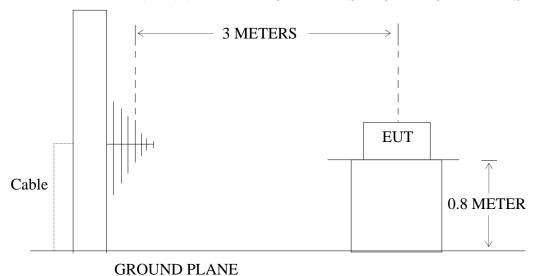
4.1.1.Block diagram of connection between the EUT and simulators

EUT

(EUT: 2.4G Wireless Optical Mouse)

4.1.2.Semi-Anechoic Chamber Test Setup Diagram

ANTENNA ELEVATION VARIES FROM 1 TO 4 METERS



OTTO OTTO TELLT

(EUT: 2.4G Wireless Optical Mouse)

4.2. The Emission Limit

4.2.1.For intentional radiators, According to section 15.249(a), Operation within the frequency band of 2.4 to 2.4835GHz, The fundamental field strength shall not exceed 94 dB μ V/m and the harmonics shall not exceed 54 dB μ V/m.

Fundamental	Field Strength of Fundamental	Field Strength of harmonics
Frequency	(millivolts/meter)	(microvolts/meter)
902-928MHz	50	500
2400-2483.5MHz	50	500
5725-5875MHz	50	500
24.0-24.25GHz	250	2500

4.2.2.According to section 15.249(e), as shown in section 15.35(b), the peak field strength of any emission shall not exceed the maximum permitted average limits specified above by more than 20 dB under any condition of modulation.

4.3. Configuration of EUT on Measurement

The following equipment 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.

4.3.1. 2.4G Wireless Optical Mouse (EUT)

Model Number : DS-2293 Serial Number : N/A

Manufacturer : Eastern Times Technology Co., Ltd.

4.4. Operating Condition of EUT

- 4.4.1. Setup the EUT and simulator as shown as Section 4.1.
- 4.4.2. Turn on the power of all equipment.
- 4.4.3. Let the EUT work in TX modes measure it. The transmit frequency are 2408.000 2474.000 MHz MHz. We are select 2408.000MHz, 2440.000MHz, 2474.000MHz TX frequency to transmit.

4.5.Test Procedure

The EUT and its simulators are placed on a turntable, which is 0.8 meter high above ground. The turntable 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 an 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 (calibrated bi-log 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: 2003 on radiated emission measurement. The EUT was tested in 3 orthogonal planes.

The bandwidth of test receiver is set at 120kHz in 30-1000MHz, and set at 1MHz in above 1000MHz.

The frequency range from 30MHz to 25000MHz is checked.

4.6. The Field Strength of Radiation Emission Measurement Results **PASS.**

Date of Test:December 6, 2011Temperature:25°CEUT:2.4G Wireless Optical MouseHumidity:50%Model No.:DS-2293Power Supply:DC 1.5VTest Mode:TX 2408.000MHzTest Engineer:Pei

Fundamental Radiated Emissions

Frequency	equency Reading(dBµV/m)		Factor(dB)	Result(dBµV/m)		Limit(dBµV/m)		Margin(dB)		Polarization
(MHz)	AV	PEAK	Corr.	AV	PEAK	AV	PEAK	AV	PEAK	
2408.000	101.17	106.41	-7.44	92.73	98.97	94.00	114.00	-1.27	-16.03	Vertical
2408.000	90.96	95.86	-7.44	83.52	88.42	94.00	114.00	-10.48	-25.58	Horizontal

Harmonics Radiated Emissions

Frequency	Reading(dBμV/m)	Factor(dB)	Result(dBµV/m)		Limit(dBµV/m)		Margin(dB)		Polarization
(MHz)	AV	PEAK	Corr.	AV	PEAK	AV	PEAK	AV	PEAK	
4816.000	45.52	49.22	-0.23	45.29	48.99	54.00	74.00	-8.71	-25.01	Vertical
4816.000	43.21	47.41	-0.23	42.98	47.18	54.00	74.00	-11.02	-26.82	Horizontal

Note:

- 1. Emissions attenuated more than 20 dB below the permissible value are not reported.
- 2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

Result = Reading + Corrected Factor

Where Corrected Factor = Antenna Factor + Cable Loss + High Pass Filter Loss - Amplifier Gain

Date of Test:	December 6, 2011	Temperature:	25°C
EUT:	2.4G Wireless Optical Mouse	Humidity:	50%
Model No.:	DS-2293	Power Supply:	DC 1.5V
Test Mode:	TX 2440.000MHz	Test Engineer:	Pei

Fundamental Radiated Emissions

Frequency (MHz)	Reading(dBμV/m	Factor(dB) Corr.	Result(d	BμV/m)	Limit(dBµV/m)) Margin(dB)		Polarization
(IVIIIZ)	AV	PEAK	Con.	AV	PEAK	AV	PEAK	AV	PEAK	
2440.000	91.32	95.69	-7.36	83.96	88.33	94.00	114.00	-10.04	-25.67	Vertical
2440.000	90.93	95.92	-7.36	83.57	88.56	94.00	114.00	-10.43	-25.44	Horizontal

Harmonics Radiated Emissions

Frequency (MHz)	Reading(dBμV/m	Factor(dB) Corr.	, , , , , , , , , , , , , , , , , , , ,		Limit(dBµV/m)		Margin(dB)		Polarization
(WITIZ)	AV	PEAK	Con.	AV	PEAK	AV	PEAK	AV	PEAK	
4880.000	46.73	50.41	0.13	46.86	50.54	54.00	74.00	-7.14	-23.46	Vertical
4880.000	45.83	49.79	0.13	45.96	49.92	54.00	74.00	-8.04	-24.08	Horizontal

Note:

- 1. Emissions attenuated more than 20 dB below the permissible value are not reported.
- 2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

 $Result = Reading + Corrected \ Factor$

Where Corrected Factor = Antenna Factor + Cable Loss + High Pass Filter Loss - Amplifier Gain

Date of Test:	December 6, 2011	Temperature:	25°C
EUT:	2.4G Wireless Optical Mouse	Humidity:	50%
Model No.:	DS-2293	Power Supply:	DC 1.5V
Test Mode:	TX 2474.000MHz	Test Engineer:	Pei

Fundamental Radiated Emissions

Frequency (MHz)	Reading(dBμV/m	Factor(dB) Corr.	Result(dBµV/m)		Limit(dBµV/m)		Margin(dB)		Polarization
(11112)	AV	PEAK	Con.	AV	PEAK	AV	PEAK	AV	PEAK	
2474.000	90.88	95.71	-7.37	83.51	88.34	94.00	114.00	-10.49	-25.66	Vertical
2474.000	91.93	96.24	-7.37	84.56	88.87	94.00	114.00	-9.44	-25.13	Horizontal

Harmonics Radiated Emissions

Frequency (MHz)	Reading(dBμV/m	Factor(dB) Corr.	Result(dBµV/m)		Limit(dBµV/m)		Margin(dB)		Polarization
(WHIZ)	AV	PEAK	Con.	AV	PEAK	AV	PEAK	AV	PEAK	
4948.000	48.65	49.45	0.46	49.11	49.91	54.00	74.00	-4.89	-24.09	Vertical
4948.000	49.45	49.55	0.46	49.91	50.01	54.00	74.00	-4.09	-23.99	Horizontal

Note:

- 1. Emissions attenuated more than 20 dB below the permissible value are not reported.
- 2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

Result = Reading + Corrected Factor

Where Corrected Factor = Antenna Factor + Cable Loss + High Pass Filter Loss - Amplifier Gain

5. SPURIOUS RADIATED EMISSION FOR SECTION 15.249(D)

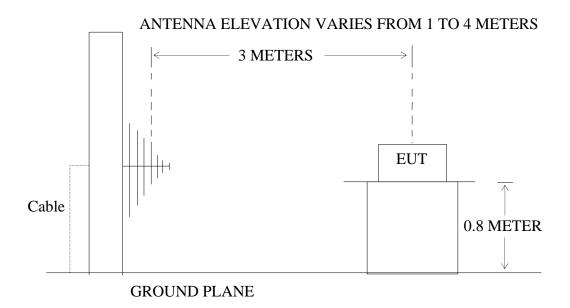
5.1.Block Diagram of Test Setup

5.1.1.Block diagram of connection between the EUT and simulators

EUT

(EUT: 2.4G Wireless Optical Mouse)

5.1.2.Semi-Anechoic Chamber Test Setup Diagram



(EUT: 2.4G Wireless Optical Mouse)

5.2. The Emission Limit For Section 15.249(d)

5.2.1.Emission radiated outside of the specified frequency bands, except for harmonics, shall be comply with the general radiated emission limits in Section 15.209.

Radiation Emission Measurement Limits According to Section 15.209

			
		Limit	
Frequency (MHz)	Field Strength of Quasi-peak Value (microvolts/m)	Field Strength of Quasi-peak Value (dBµV/m)	The final measurement in band 9-90kHz, 110-490kHz and above 1000MHz is
30 - 88	100	40	performed with Average detector.
88 - 216	150	43.5	Except those frequency bands mention above, the
216 - 960	200	46	final measurement for frequencies below
Above 960	500	54	1000MHz is performed with Quasi Peak detector.

5.3.EUT Configuration on Measurement

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

5.3.1. 2.4G Wireless Optical Mouse (EUT)

Model Number : DS-2293 Serial Number : N/A

Manufacturer : Eastern Times Technology Co., Ltd.

5.4. Operating Condition of EUT

- 5.4.1. Setup the EUT and simulator as shown as Section 5.1.
- 5.4.2.Turn on the power of all equipment.
- 5.4.3. Let the EUT work in TX modes measure it. The transmit frequency are 2408.000 2474.000 MHz MHz. We are select 2408.000MHz, 2440.000MHz, 2474.000MHz TX frequency to transmit.

5.5.Test Procedure

The EUT and its simulators are placed on a turntable, which is 0.8 meter high above ground. The turntable 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 an 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 (calibrated bilog 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: 2003 on radiated emission measurement. The EUT was tested in 3 orthogonal planes.

The bandwidth of test receiver is set at 120kHz in 30-1000MHz, and set at 1MHz in above 1000MHz.

The frequency range from 30MHz to 25000MHz is checked.

The final measurement in band 9-90kHz, 110-490kHz and above 1000MHz is performed with Average detector. Except those frequency bands mention above, the final measurement for frequencies below 1000MHz is performed with Quasi Peak detector.

5.6. The Emission Measurement Result

PASS.

Date of Test:	December 6, 2011	Temperature:	25°C
EUT:	2.4G Wireless Optical Mouse	Humidity:	50%
Model No.:	DS-2293	Power Supply:	DC 1.5V
Test Mode:	TX 2408.000MHz	Test Engineer:	Pei

Frequency	Reading	Factor(dB)	Result	Limit	Margin	Polarization
(MHz)	(dBµV/m)	Corr.	(dBµV/m)	(dBµV/m)	(dB)	
	QP		QP	QP	QP	
-	-	-	-	-	-	Vertical
-	-	-	-	-	-	Horizontal

Note:

- 1. Emissions attenuated more than 20 dB below the permissible value are not reported.
- 2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

Result = Reading + Corrected Factor

Where Corrected Factor = Antenna Factor + Cable Loss + High Pass Filter Loss - Amplifier Gain

Date of Test:	December 6, 2011	Temperature:	25°C
EUT:	2.4G Wireless Optical Mouse	Humidity:	50%
Model No.:	DS-2293	Power Supply:	DC 1.5V
Test Mode:	TX 2440.000MHz	Test Engineer:	Pei

Frequency	Reading	Factor(dB)	Result	Limit	Margin	Polarization
(MHz)	(dBµV/m)	Corr.	(dBµV/m)	(dBµV/m)	(dB)	
	QP		QP	QP	QP	
-	-	-	-	-	-	Vertical
-	-	-	-	-	-	Horizontal

Note:

- 1. Emissions attenuated more than 20 dB below the permissible value are not reported.
- 2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

Result = Reading + Corrected Factor

Where Corrected Factor = Antenna Factor + Cable Loss + High Pass Filter Loss - Amplifier Gain

Date of Test:	December 6, 2011	Temperature:	25°C
EUT:	2.4G Wireless Optical Mouse	Humidity:	50%
Model No.:	DS-2293	Power Supply:	DC 1.5V
Test Mode:	TX 2474.000MHz	Test Engineer:	Pei

Frequency	Reading	Factor(dB)	Result	Limit	Margin	Polarization
(MHz)	(dBµV/m)	Corr.	(dBµV/m)	(dBµV/m)	(dB)	
	QP		QP	QP	QP	
-	-	-	-	-	-	Vertical
-	-	-	-	-	-	Horizontal

Note:

- 1. Emissions attenuated more than 20 dB below the permissible value are not reported.
- 2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

Result = Reading + Corrected Factor

Where Corrected Factor = Antenna Factor + Cable Loss + High Pass Filter Loss - Amplifier Gain

6. BAND EDGES

6.1.The Requirement

6.1.1.Band Edge from 2400MHz to 2483.5MHz. Emission radiated outside of the specified frequency bands, except for harmonics, shall be attenuated by at least 50 dB below the level of the fundamental or to the general radiated emission limits in Section 15.209, whichever is the lesser attenuation.

6.2.EUT Configuration on Measurement

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

6.2.1. 2.4G Wireless Optical Mouse (EUT)

Model Number : DS-2293 Serial Number : N/A

Manufacturer : Eastern Times Technology Co., Ltd.

6.3. Operating Condition of EUT

- 6.3.1. Setup the EUT and simulator as shown as Section 4.1.
- 6.3.2. Turn on the power of all equipment.
- 6.3.3. Let the EUT work in TX modes measure it. The transmit frequency are 2408.000-2474.000MHz MHz. We are select 2408.000MHz, 2474.000MHz TX frequency to transmit.

6.4. Test Procedure

- 1. The EUT is placed on a turntable, which is 0.8m above the ground plane and worked at highest radiated power.
- 2. The turntable was rotated for 360 degrees to determine the position of maximum emission level.
- 3. EUT is set 3m away from the receiving antenna, which is varied from 1m to 4m to find out the highest emission.
- 4. Set the spectrum analyzer in the following setting in order to capture the lower and upper band-edges of the emission:

RBW=1MHz, VBW=1MHz

6.5. The Measurement Result

Pass.

Date of Test:	December 6, 2011	Temperature:	25°C
EUT:	2.4G Wireless Optical Mouse	Humidity:	50%
Model No.:	DS-2293	Power Supply:	DC 1.5V
Test Mode:	TX 2408.000MHz	Test Engineer:	Pei

Frequency	Reading(dBμV/m)	Factor(dB)	Result(dBµV/m) Limit(dBµV/m)		BμV/m)	Margi	in(dB)	Polarization	
(MHz)	AV	PEAK	Corr.	AV	PEAK	AV	PEAK	AV	PEAK	
-	_	_	-	-	_	_	_	-	_	Vertical
_	_	-	-	-	-	_	-	-	-	Horizontal

Note:

- 1. Emissions attenuated more than 20 dB below the permissible value are not reported.
- 2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

Result = Reading + Corrected Factor

Where Corrected Factor = Antenna Factor + Cable Loss + High Pass Filter Loss - Amplifier Gain

Date of Test:	December 6, 2011	Temperature:	25°C
EUT:	2.4G Wireless Optical Mouse	Humidity:	50%
Model No.:	DS-2293	Power Supply:	DC 1.5V
Test Mode:	TX 2474.000MHz	Test Engineer:	Pei

Frequency	Reading(dBμV/m)	Factor(dB)	Result(dBµV/m)		$B\mu V/m$ Limit($dB\mu V/m$		Limit(dBµV/m) Margin(dB)		in(dB)	Polarization
(MHz)	AV	PEAK	Corr.	AV	PEAK	AV	PEAK	AV	PEAK		
-	_	-	-	-	-	-	-	-	-	Vertical	
-	_	-	-	-	_	_	-	-	-	Horizontal	

Note:

- 1. Emissions attenuated more than 20 dB below the permissible value are not reported.
- 2. The field strength is calculated by adding the antenna factor, high pass filter loss(if used) and cable loss, and subtracting the amplifier gain(if any)from the measured reading. The basic equation calculation is as follows:

Result = Reading + Corrected Factor

Where Corrected Factor = Antenna Factor + Cable Loss + High Pass Filter Loss - Amplifier Gain

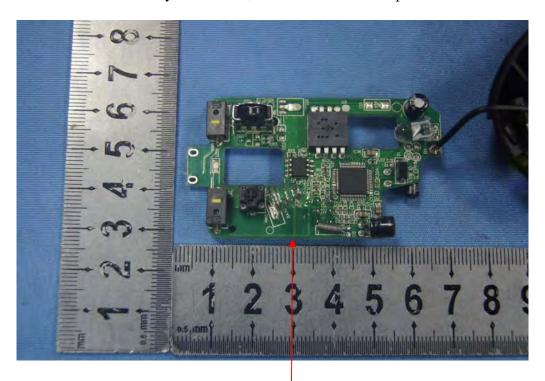
7. ANTENNA REQUIREMENT

7.1.The Requirement

7.1.1.According to 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.

7.2. Antenna Construction

The antenna is PCB Layout antenna, no consideration of replacement.



Antenna

APPENDIX I (Test Curves)



F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Job No.: Bob #678 Standard: FCC Class B 3M Radiated

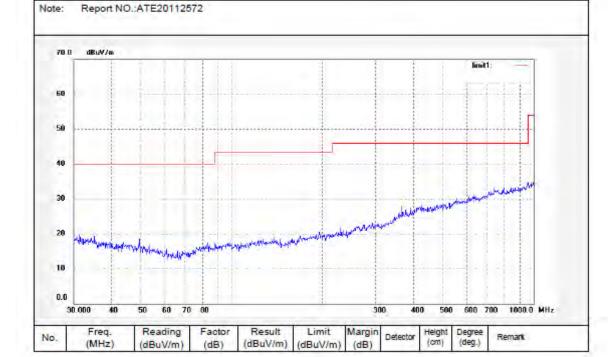
Test item: Radiation Test
Temp.(C)/Hum.(%) 24 C / 48 %
EUT: 2.4G Wireless Optical Mouse

Mode: TX 2408 Model: DS-2293

Manufacturer: Eastern Times

Polarization: Horizontal Power Source: DC1.5V Date: 2011/12/06 Time: 20:31:57

Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Standard: FCC Class B 3M Radiated Test item: Radiation Test

Temp.(C)/Hum.(%) 24 C / 48 % EUT: 2.4G Wireless Optical Mouse

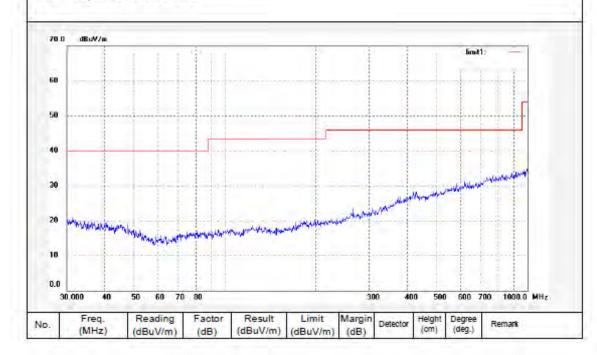
Mode: TX 2408 Model: DS-2293

Manufacturer: Eastern Times

Note: Report NO.:ATE20112572

Polarization: Vertical Power Source: DC1.5V Date: 2011/12/08 Time: 20:32:30

Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park, Nanshan Shenzhen, P.R. China

Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Job No.: Bob #673

Standard: FCC Class B 3M Radiated Test item: Radiation Test

Temp.(C)/Hum.(%) 24 C / 48 % EUT: 2.4G Wireless Optical Mouse

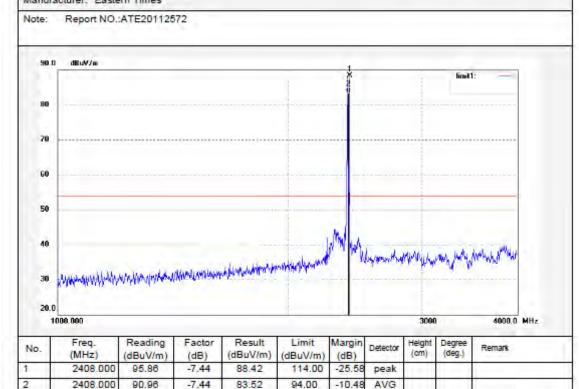
Mode: TX 2408

Model: Manufacturer: Eastern Times

DS-2293

Polarization: Horizontal Power Source: DC1.5V Date: 2011/12/06 Time: 20:17:14

Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park, Nanshan Shenzhen, P.R. China

Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Standard: FCC Class B 3M Radiated

Test item: Radiation Test Temp.(C)/Hum.(%) 24 C / 48 %

EUT: 2.4G Wireless Optical Mouse

TX 2408 Mode: Model: DS-2293

Manufacturer: Eastern Times

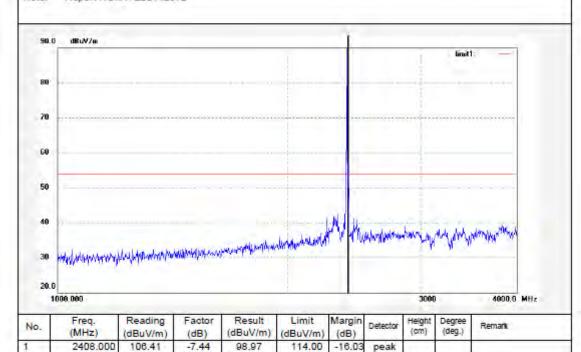
Note: Report NO.:ATE20112572

Polarization: Vertical Power Source: DC1.5V Date: 2011/12/06

Engineer Signature: Bob

Distance: 3m

Time: 20:15:15



94.00

-1.27

AVG

2

2408.000

101.17

-7.44

92.73



F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Job No.: Bob #866

Standard: FCC Class B 3M Radiated

Test item: Radiation Test

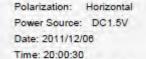
Temp.(C)/Hum.(%) 24 C / 48 %

EUT: 2.4G Wireless Optical Mouse

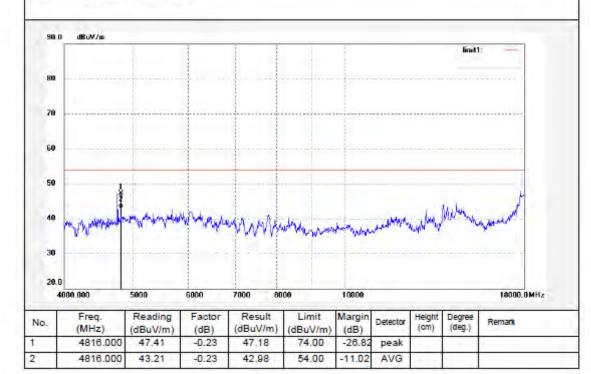
Model: TX 2408 Model: DS-2293

Manufacturer: Eastern Times

Note: Report NO.:ATE20112572



Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park, Nanshan Shenzhen, P.R.China

Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Job No.: Bob #667

Standard: FCC Class B 3M Radiated

Test item: Radiation Test

Temp.(C)/Hum.(%) 24 C / 48 %

EUT: 2.4G Wireless Optical Mouse

TX 2408 Mode: Model: DS-2293

Manufacturer: Eastern Times

4816.000

4816.000

2

49.22

45.52

-0.23

-0.23

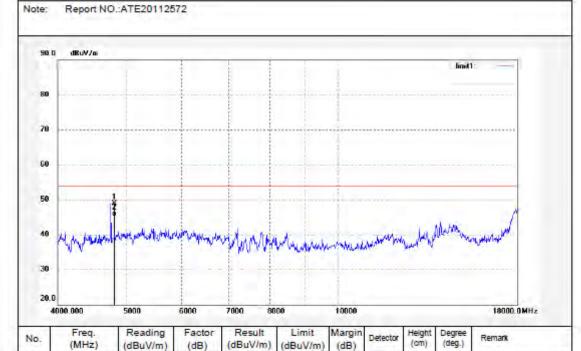
48.99

45.29

Polarization: Vertical Power Source: DC1.5V Date: 2011/12/06 Time: 20:03:26

Engineer Signature: Bob

Distance: 3m



74.00

54.00

-25.0

-8.71

peak

AVG



F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Tel:+86-0755-26503290 Fax:+86-0755-26503396 Science & Industry Park, Nanshan Shenzhen, P.R. China

Site: 966 chamber Tel:+86-0755-26503290

Job No.: Bob #684 Standard: FCC Class B 3M Radiated Test item: Radiation Test

Temp.(C)/Hum.(%) 25 C / 50 %

EUT: 2.4G Wireless Optical Mouse

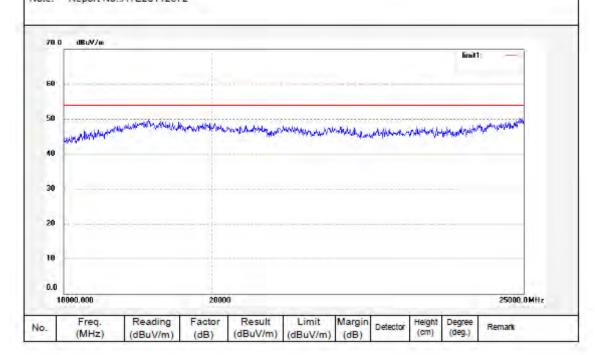
Mode: TX 2408 Model: DS-2293 Manufacturer: Eastern Times

Polarization: Horizontal Power Source: DC1.5V Date: 2011/12/06 Time: 20:40:21

Engineer Signature: Bob

Distance: 3m

Note: Report No.:ATE20112572





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park, Nanshan Shenzhen, P.R. China

Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Standard: FCC Class B 3M Radiated Test item: Radiation Test Temp.(C)/Hum.(%) 25 C / 50 %

EUT: 2.4G Wireless Optical Mouse

Mode: TX 2408 Model: DS-2293

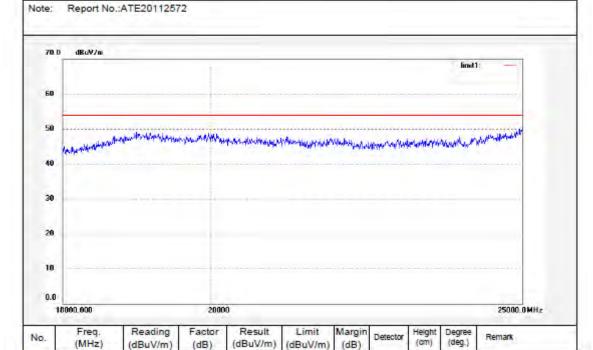
Manufacturer: Eastern Times

Time: 20:42:32 Engineer Signature: Bob

Date: 2011/12/06

Polarization: Vertical

Power Source: DC1.5V





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Standard: FCC Class B 3M Radiated
Test item: Radiation Test

Temp.(C)/Hum.(%) 24 C / 48 % EUT: 2.4G Wireless Optical Mouse

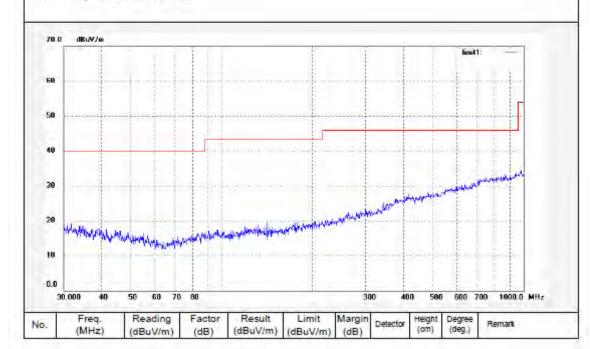
Model: TX 2440 Model: DS-2293

Manufacturer: Eastern Times

Note: Report NO.:ATE20112572

Polarization: Horizontal Power Source: DC1.5V Date: 2011/12/06 Time: 20:33:10

Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Standard: FCC Class B 3M Radiated
Test item: Radiation Test

Temp.(C)/Hum.(%) 24 C / 48 % EUT: 2.4G Wireless Optical Mouse

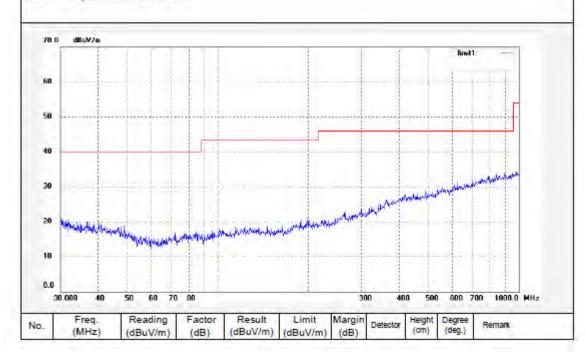
Mode: TX 2440 Model: DS-2293 Manufacturer: Eastern Times Power Source: DC1.5V Date: 2011/12/08 Time: 20:33:39

Polarization: Vertical

Engineer Signature: Bob

Distance: 3m

Note: Report NO.:ATE20112572





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Standard: FCC Class B 3M Radiated
Test item: Radiation Test

Temp.(C)/Hum.(%) 24 C / 48 % EUT: 2.4G Wireless Optical Mouse

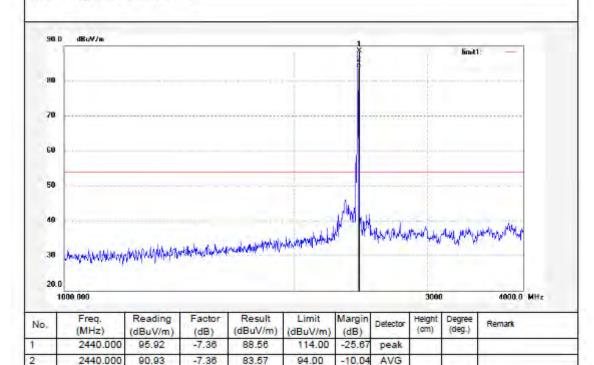
Mode: TX 2440 Model: DS-2293

Manufacturer: Eastern Times

Note: Report NO.:ATE20112572

Polarization: Horizontal Power Source: DC1.5V Date: 2011/12/08 Time: 20:19:38

Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Standard: FCC Class B 3M Radiated
Test item: Radiation Test

Temp.(C)/Hum.(%) 24 C / 48 % EUT: 2.4G Wireless Optical Mouse

Model: TX 2440 Model: DS-2293

Manufacturer: Eastern Times

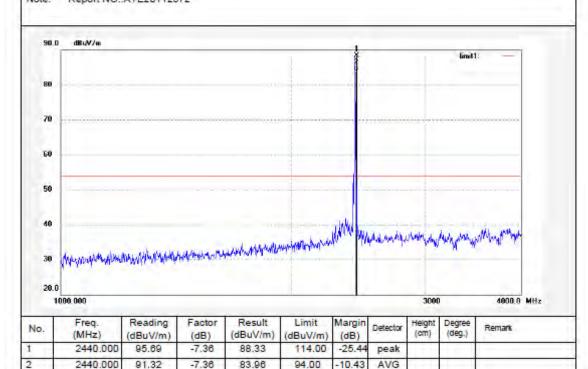
Note: Report NO.:ATE20112572

Polarization: Vertical Power Source: DC1.5V Date: 2011/12/06

Engineer Signature: Bob

Distance: 3m

Time: 20:21:47





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Standard: FCC Class B 3M Radiated

Test item: Radiation Test Temp.(C)/Hum.(%) 24 C / 48 %

EUT: 2.4G Wireless Optical Mouse

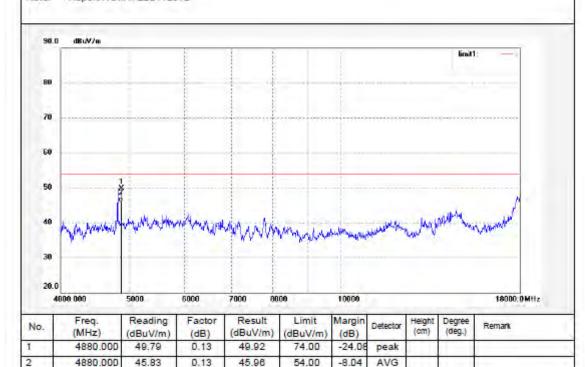
Mode: TX 2440 Model: DS-2293

Manufacturer: Eastern Times

Note: Report NO.:ATE20112572

Polarization: Horizontal Power Source: DC1.5V Date: 2011/12/06 Time: 20:06:51

Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

No.: Bob #668

Standard: FCC Class B 3M Radiated

Test item: Radiation Test Temp.(C)/Hum.(%) 24 C / 48 %

EUT: 2.4G Wireless Optical Mouse

Mode: TX 2440 Model: DS-2293

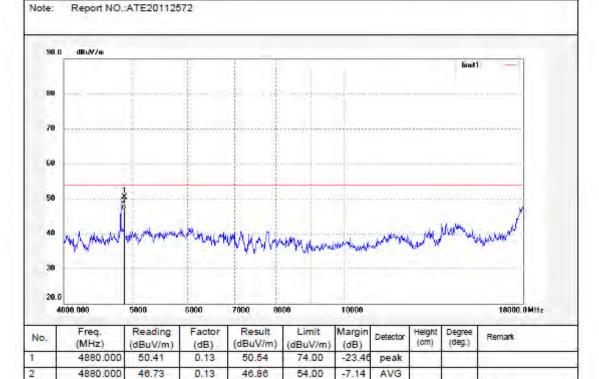
Manufacturer: Eastern Times

del: DS-2293

Polarization: Vertical Power Source: DC1.5V Date: 2011/12/06

Time: 20:04:58

Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Job No.: Bob #687
Standard: FCC Class B 3M Radiated
Test item: Radiation Test
Temp.(C)/Hum.(%) 25 C / 50 %

EUT: 2.4G Wireless Optical Mouse

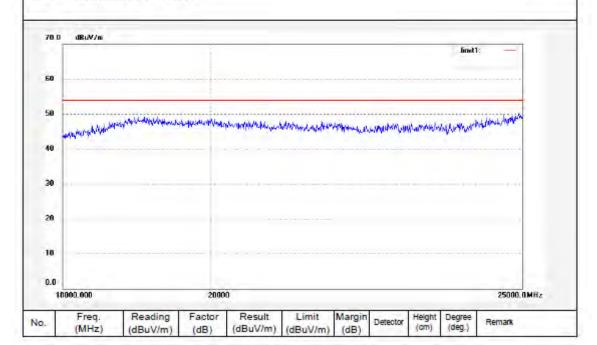
Mode: TX 2440 Model: DS-2293

Manufacturer: Eastern Times

Note: Report No.:ATE20112572

Polarization: Horizontal Power Source: DC1.5V Date: 2011/12/06 Time: 20:49:26

Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Standard: FCC Class B 3M Radiated
Test item: Radiation Test

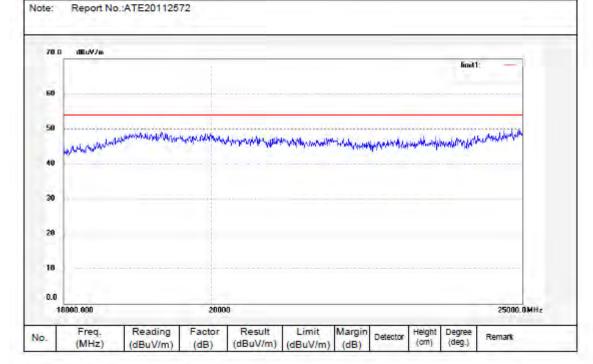
Temp.(C)/Hum.(%) 25 C / 50 % EUT: 2.4G Wireless Optical Mouse

Mode: TX 2440 Model: DS-2293

Manufacturer: Eastern Times

Polarization: Vertical Power Source: DC1.5V Date: 2011/12/06 Time: 20:45:17

Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Job No.: Bob #882 Standard: FCC Class B 3M Radiated Test item: Radiation Test Temp.(C)/Hum.(%) 24 C / 48 %

EUT: 2.4G Wireless Optical Mouse Mode: TX 2474

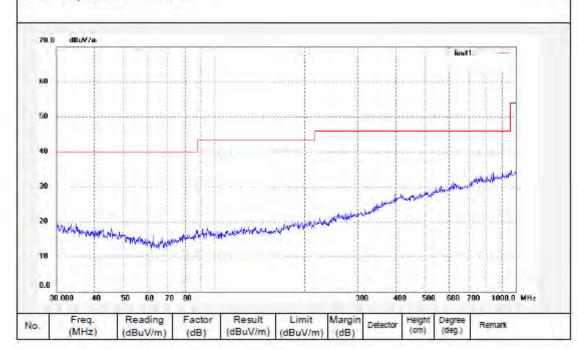
Model: DS-2293
Manufacturer: Eastern Times

Polarization: Horizontal Power Source: DC1.5V Date: 2011/12/06 Time: 20:34:15

Engineer Signature: Bob

Distance: 3m

Note: Report NO.:ATE20112572





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Polarization: Vertical

Power Source: DC1.5V

Engineer Signature: Bob

Date: 2011/12/08 Time: 20:35:26

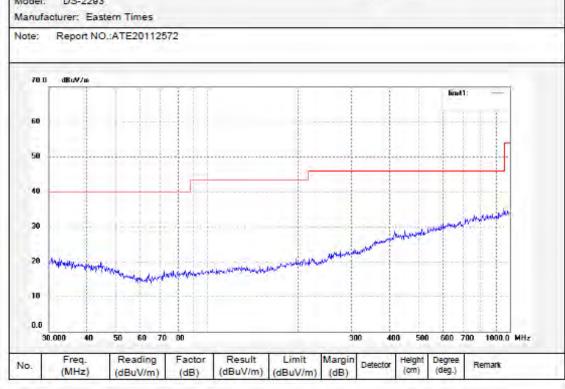
Distance: 3m

Standard: FCC Class B 3M Radiated Test item: Radiation Test

Temp.(C)/Hum.(%) 24 C / 48 %

EUT: 2.4G Wireless Optical Mouse

Mode: TX 2474 Model: DS-2293





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

ob No.: Bob #677

Standard: FCC Class B 3M Radiated

Test item: Radiation Test

Temp.(C)/Hum.(%) 24 C / 48 % EUT: 2.4G Wireless Optical Mouse

Mode: TX 2474

Model: DS-2293 Manufacturer: Eastern Times

Note: Report NO.:ATE20112572

Polarization: Horizontal Power Source: DC1:5V Date: 2011/12/08

Time: 20:25:17

Engineer Signature: Bob

Distance: 3m

dBuV/m find1: 60 50 40 20.0 1000.000 3000 4000.0 MHz Freq. Reading Factor Result Limit Margin Height Degree No. Detector (cm) (deg.) (MHz) (dBuV/m) (dB) (dBuV/m) (dBuV/m) (dB) 2474.000 114.00 -25.13 96.24 -7.37 88 87 peak 2 2474.000 -7.37 84.56 91.93 94.00 -9.44 AVG



F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China

Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Job No.: Bob #676

Standard: FCC Class B 3M Radiated

Test item: Radiation Test

Temp.(C)/Hum.(%) 24 C / 48 %

2.4G Wireless Optical Mouse

Mode: TX 2474 Model: DS-2293

Manufacturer: Eastern Times

Note: Report NO.:ATE20112572

Polarization: Vertical Power Source: DC1.5V Date: 2011/12/06

Time: 20:23:36

Engineer Signature: Bob Distance: 3m

dBuN/m

70		
60		
50		
40	manufacture per per per per per per per per per p	
30	Association of the Contract of the Association of t	
20.0		
		MHz

No.	Freq. (MHz)	Reading (dBuV/m)	Factor (dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Degree (deg.)	Remark
1	2474.000	95.71	-7,37	88.34	114.00	-25.66	peak			
2	2474.000	90.88	-7.37	83,51	74.00	-10.49	AVG			



F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Tel:+86-0755-26503290 Science & Industry Park, Nanshan Shenzhen, P.R. China

Site: 966 chamber Fax:+86-0755-26503396

Standard: FCC Class B 3M Radiated

Test item: Radiation Test Temp.(C)/Hum.(%) 24 C / 48 %

EUT: 2.4G Wireless Optical Mouse

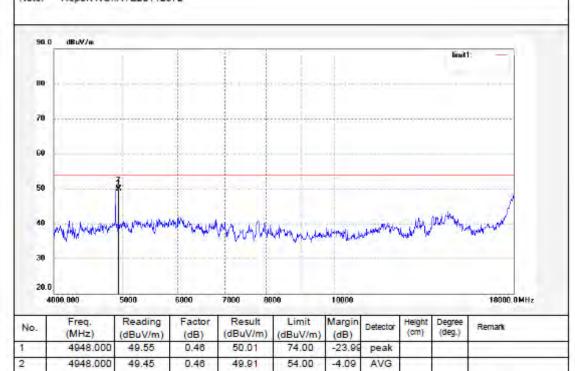
TX 2474 Mode: Model: DS-2293

Manufacturer: Eastern Times

Report NO.:ATE20112572

Polarization: Horizontal Power Source: DC1.5V Date: 2011/12/06 Time: 20:08:37

Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P,R,China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Job No.: Bob #871 Standard: FCC Class B 3M Radiated

Test item: Radiation Test
Temp.(C)/Hum.(%) 24 C / 48 %

EUT: 2.4G Wireless Optical Mouse

Mode: TX 2474 Model: DS-2293 Manufacturer: Eastern Times

ote: Report NO.:ATE20112572

Polarization: Vertical Power Source: DC1.5V

Date: 2011/12/06 Time: 20:10:35

Engineer Signature: Bob

Distance: 3m

98.0 dBuW/m 80 60 50 30 20.0 10000 4000.000 5000 6000 18000.0MHz Margin Freq. Reading Result Factor Limit Height (cm) (deg.) Detector No. Remark (MHz) (dBuV/m) (dB) (dBuV/m) (dBuV/m) (dB) 4948.000 49.45 0.46 49.91 74.00 -24.08 peak 1 4948.000 48.65 0.46 49.11 54.00 4.89 2 AVG



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Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Job No.: Bob #688 Standard: FCC Class B 3M Radiated Test item: Radiation Test Temp.(C)/Hum.(%) 25 C / 50 % 2.4G Wireless Optical Mouse EUT:

Mode: Model: DS-2293

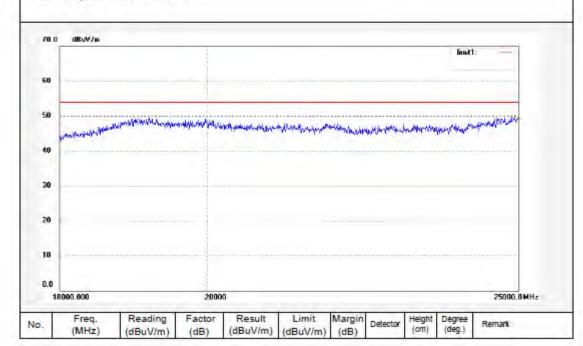
TX 2474

Manufacturer: Eastern Times

Note: Report No.:ATE20112572

Polarization: Horizontal Power Source: DC1.5V Date: 2011/12/06 Time: 20:52:36

Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Job No.: Bob #889 Standard: FCC Class B 3M Radiated

Test item: Radiation Test

Temp.(C)/Hum.(%) 25 C / 50 % EUT: 2.4G Wireless Optical Mouse

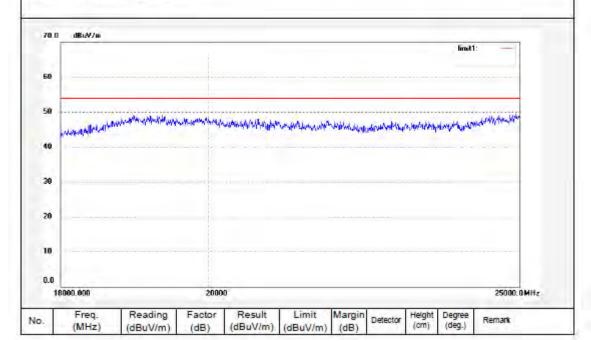
Mode: TX 2474 Model: DS-2293

Manufacturer: Eastern Times

Note: Report No.:ATE20112572

Polarization: Vertical Power Source: DC1.5V Date: 2011/12/08 Time: 20:58:26

Engineer Signature: Bob





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park,Nanshan Shenzhen,P.R.China Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

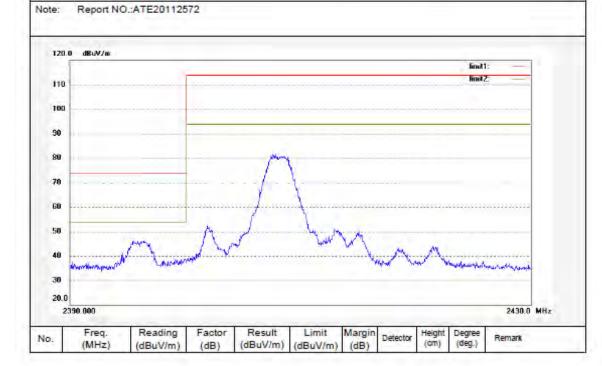
Job No.: Bob #689
Standard: FCC Part 15 PEAK 2.4G
Test item: Radiation Test
Temp.(C)/Hum.(%) 24 C / 48 %
EUT: 2.4G Wireless Optical Mouse

Mode: TX 2408 Model: DS-2293

Manufacturer: Eastern Times

Polarization: Horizontal Power Source: DC1.5V

Date: 11/12/08/ Time: 8/48/58 Engineer Signature: Distance: 3m





F1,Bldg,A,Changyuan New Material Port Keyuan Rd,

Site: 966 chamber Tel:+86-0755-26503290

Fax:+86-0755-26503396 Science & Industry Park, Nanshan Shenzhen, P.R.China Polarization: Vertical Job No.: Bob #690 Standard: FCC Part 15 PEAK 2.4G Power Source: DC1.5V Test item: Radiation Test Date: 11/12/08/ Temp.(C)/Hum.(%) 24 C / 48 % Time: 8/51/13 EUT: 2.4G Wireless Optical Mouse Engineer Signature: TX 2408 Distance: 3m Mode: Model: DS-2293 Manufacturer: Eastern Times Report NO.:ATE20112572 120.0 dBuW/m limit 2 110 100 90 GØ 2390.000 2430.0 MHz Reading Margin Result Freq. Factor Limit

(dBuV/m)

(dBuV/m)

No.

(MHz)

(dBuV/m)

(dB)

Height (cm)

Detector

(dB)

Degree (deg.)

Remark



Model: DS-2293

ACCURATE TECHNOLOGY CO., LTD.

F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park, Nanshan Shenzhen, P.R. China

Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

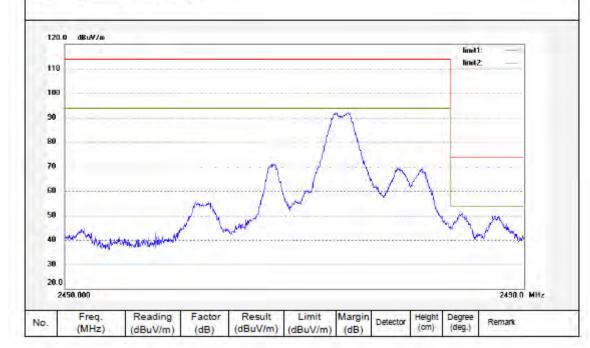
Job No.: Bob #691 Standard: FCC Part 15 PEAK 2.4G Test item: Radiation Test Temp.(C)/Hum.(%) 24 C / 48 % EUT: 2.4G Wireless Optical Mouse Mode: TX 2474

Polarization: Horizontal Power Source: DC1.5V Date: 11/12/08/

Time: 8/52/34 Engineer Signature: Distance: 3m

Manufacturer: Eastern Times

Note: Report NO.:ATE20112572





F1,Bldg,A,Changyuan New Material Port Keyuan Rd, Science & Industry Park, Nanshan Shenzhen, P.R.China

Site: 966 chamber Tel:+86-0755-26503290 Fax:+86-0755-26503396

Polarization: Vertical Standard: FCC Part 15 PEAK 2.4G Power Source: DC1.5V Test item: Radiation Test Date: 11/12/08/ Temp.(C)/Hum.(%) 24 C / 48 % Time: 8/53/33 EUT: 2.4G Wireless Optical Mouse Engineer Signature: TX 2474 Mode: Distance: 3m Model: DS-2293 Manufacturer: Eastern Times Report NO.:ATE20112572 120.0 dBuV/m 110 90 70 58 30 20.0 2450.000 2490.0 MHz Degree (deg.) Freq. Reading Factor Result Limit Margin Height Detector

(dB)

(dBuV/m)

(dBuV/m)

(dB)

(cm)

(dBuV/m)

No.

(MHz)

Remark