FCC TEST REPORT
FOR
Shenzhen Paoluy Silicone Technology Co., Ltd.

Dongle
Model No.: BL-WKB107

Prepared for	:	Shenzhen Paoluy Silicone Technology Co., Ltd.
Address	:	No.31, furong road, gushu village, xixiang town, bao'an district, shenzhen Tel: (86) 755-33819221 Fax: (86) 755-33676866

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Report Number	:	201003688F-1
Date of Test	:	Mar. 16~25, 2010
Date of Report	:	Mar. 26, 2010

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TEST REPORT

Applicant	:	Shenzhen Paoluy Silicone Technology Co., Ltd.
Manufacturer	:	Shenzhen Paoluy Silicone Technology Co., Ltd.
EUT	:	Dongle
		(A) MODEL NO. : BL-WKB107
		(B) SERIAL NO. : N/A
		(C) POWER SUPPLY: DC 5V via USB Port
		(D) TRADE MARK: N/A

Measurement Procedure Used:

FCC Rules and Regulations Part 15 Subpart B 15.107&15.109-2007 & ANSI C63.4-2003

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 : Mar. 16~25, 2010

Prepared by : _____
(Engineer)

Reviewer : _____
(Project Manager)

Approved & Authorized Signer : _____
(Manager)

1. GENERAL INFORMATION

1.1. Description of Device (EUT)

Description	:	Dongle
Model Number	:	BL-WKB107
Test Power Supply	:	AC 120V, 60Hz
Antenna Gain	:	0dBi
Notebook PC	:	Manufacturer: IBM M/N: 2373 S/N: 99-OL5HH CE , FCC: DOC
Applicant	:	Shenzhen Paoluy Silicone Technology Co., Ltd.
Address	:	No.31, furong road, gushu village, xixiang town, bao'an district, shenzhen
Manufacturer	:	Shenzhen Paoluy Silicone Technology Co., Ltd.
Address	:	No.31, furong road, gushu village, xixiang town, bao'an district, shenzhen
Date of Sample received	:	Mar. 15, 2010
Date of Test	:	Mar. 16~25, 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 = ± 4.26dB
Conduction Uncertainty	**:**	Uc = ± 2.66dB

2. POWER LINE CONDUCTED MEASUREMENT

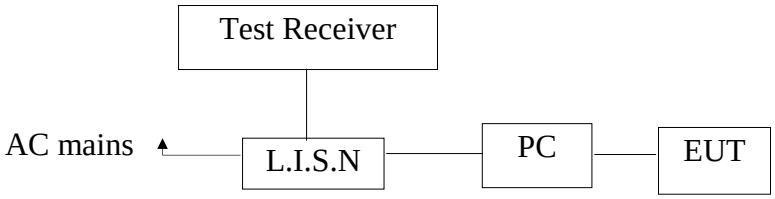
2.1. Test Equipment

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 Test Receiver	Rohde & Schwarz	ESPI	1101604	Jun. 21, 2009	1 Year
2.	Spectrum Analyzer	Agilent	E7405A	MY45114970	Jun. 21, 2009	1 Year
3.	Artificial Mains	Rohde & Schwarz	ENV216	100055	Jun. 21, 2009	1 Year
4.	CE Variac	QUANLI	TDGC2-5	N/A	N/A	N/A
5.	Coaxial cable	Anbotek	RG214-N-3	11066	Jun. 21, 2009	1 Year
6.	EMI Test Software	SHURPLE	N/A	N/A	N/A	N/A

2.2. Block Diagram of Test Setup

2.2.1. Block diagram of connection between the EUT and simulators



(EUT: Dongle)

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	**:**	Dongle
Model Number	**:**	BL-WKB107
Applicant	**:**	Shenzhen Paoluy Silicone Technology 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 (Connect to PC) 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 C63.4-2003 on Conducted Emission Measurement.

The bandwidth of test receiver (E7405A) 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.

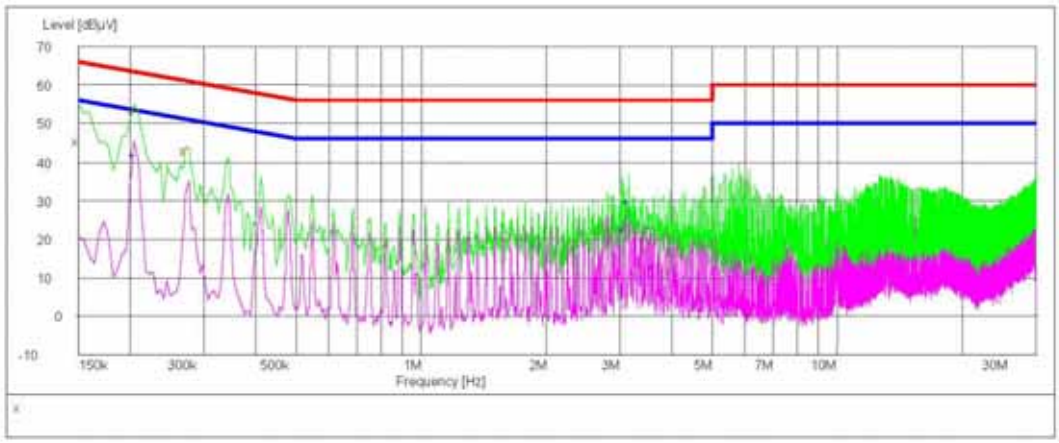
Anbotek Compliance Laboratory Limited

Voltage Mains FCC PART 15 CLASS B

EUT: Dongle M/N:BL-WKB107
Manufacturer: Shenzhen Paoluy Silicone Technology Co., Ltd.
Operating Condition: ON
Test Site: 1# Shielding Room
Operator: Jacky
Test Specification: AC 120V, 60Hz
Comment: L
Start of Test: 3/22/2010 / 4:53:03PM

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

Short Description: 150K-30M Voltage



MEASUREMENT RESULT: "AT1003628103_fin"

3/22/2010 4:55PM

Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Detector	Line	PE
0.150000	45.60	11.5	66	20.4	QP	L1	GND
0.204000	53.50	10.7	63	9.9	QP	L1	GND
0.271500	43.20	10.4	61	17.9	QP	L1	GND

MEASUREMENT RESULT: "AT1003628103_fin2"

3/22/2010 4:55PM

Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Detector	Line	PE
0.204000	42.20	10.7	53	11.2	AV	L1	GND
3.088500	22.70	9.8	46	23.3	AV	L1	GND
3.142500	29.90	9.8	46	16.1	AV	L1	GND

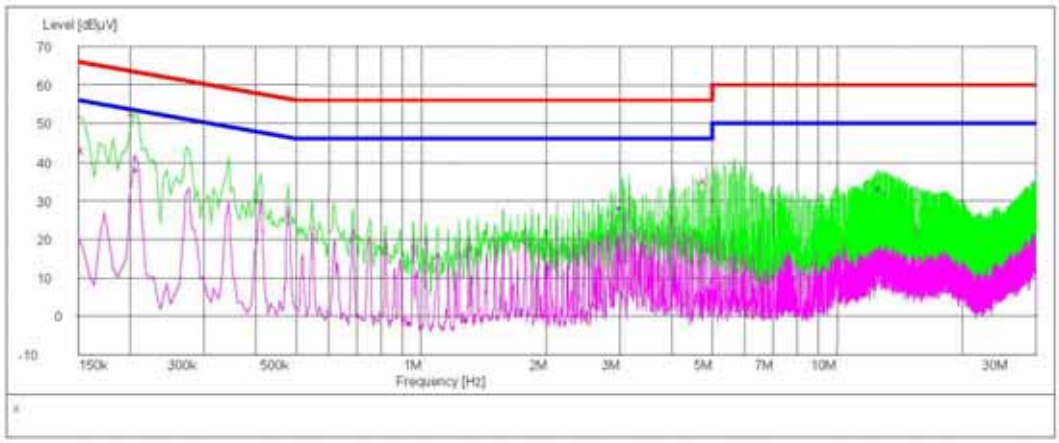
Anbotek Compliance Laboratory Limited

Voltage Mains FCC PART 15 CLASS B

EUT: Dongle M/N:BL-WKB107
Manufacturer: Shenzhen Paoluy Silicone Technology Co., Ltd.
Operating Condition: ON
Test Site: 1# Shielding Room
Operator: Jacky
Test Specification: AC 120V, 60Hz
Comment: N
Start of Test: 3/22/2010 / 4:56:08PM

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

Short Description: 150K-30M Voltage



MEASUREMENT RESULT: "AT1003628104_fin"

3/22/2010 4:58PM

Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Detector	Line	PE
0.154500	43.30	11.3	66	22.5	QP	N	GND
0.204000	53.10	10.7	63	10.3	QP	N	GND
4.848000	35.50	9.8	56	20.5	QP	N	GND

MEASUREMENT RESULT: "AT1003628104_fin2"

3/22/2010 4:58PM

Frequency MHz	Level dBµV	Transd dB	Limit dBµV	Margin dB	Detector	Line	PE
0.208500	38.00	10.6	53	15.3	AV	N	GND
3.039000	28.30	9.8	46	17.7	AV	N	GND
12.705000	33.30	10.7	50	16.7	AV	N	GND

3. RADIATED EMISSION MEASUREMENT

3.1. Test Equipment

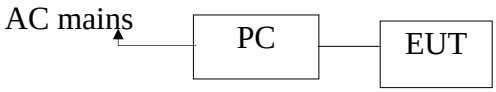
The following test equipments are used during the radiated emission measurement:

3.1.1. For Anechoic Chamber

Item	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Cal. Interval
1.	Trilog Broadband Antenna	SCHWARZBECK	VULB9163	345	Mar. 21, 2010	1 Year
2.	Spectrum Analyzer	Agilent	E7405A	MY45114970	Jun. 21, 2009	1 Year
3.	EMI Test Receiver	Rohde & Schwarz	ESPI	1101604	Jun. 21, 2009	1 Year
4.	EMI Test Software	Shurple	N/A	N/A	N/A	N/A
5.	Coaxial cable	Anbotek	RG214-N-8	11065	Jun. 21, 2009	1 Year
6.	PC	N/A	486DX2	N/A	N/A	N/A

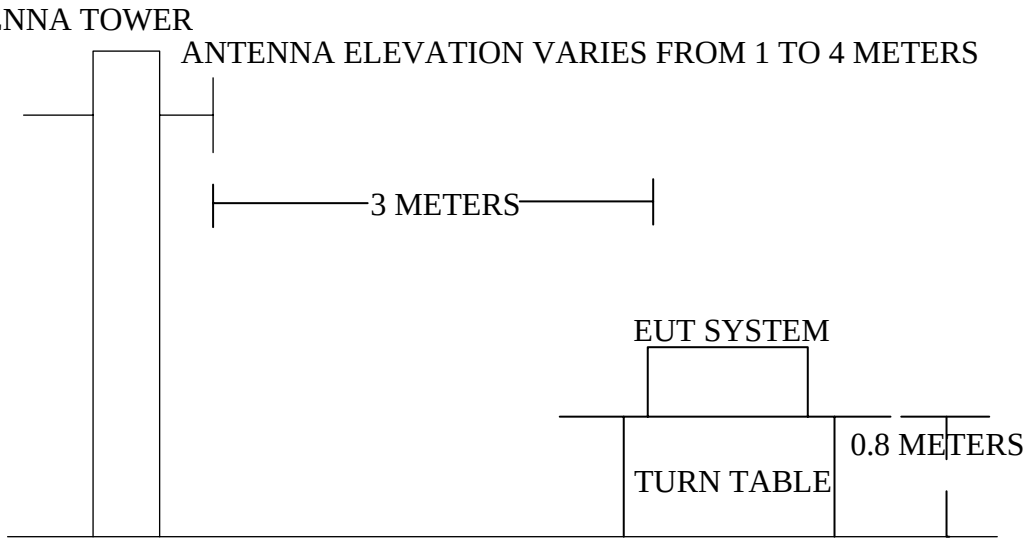
3.2. Block Diagram of Test Setup

3.2.1. Block diagram of connection between the EUT and simulators



(EUT: Dongle)

3.2.2. Anechoic Chamber Test Setup Diagram



(EUT: Dongle)

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 : Dongle
Model Number : BL-WKB107
Applicant : Shenzhen Paoluy Silicone Technology 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 (Connect to PC) 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 C63.4-2003 on radiated emission measurement.

The bandwidth of the EMI test receiver (E7405A) is set at 120kHz.

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

The test mode (Connect to PC) 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.

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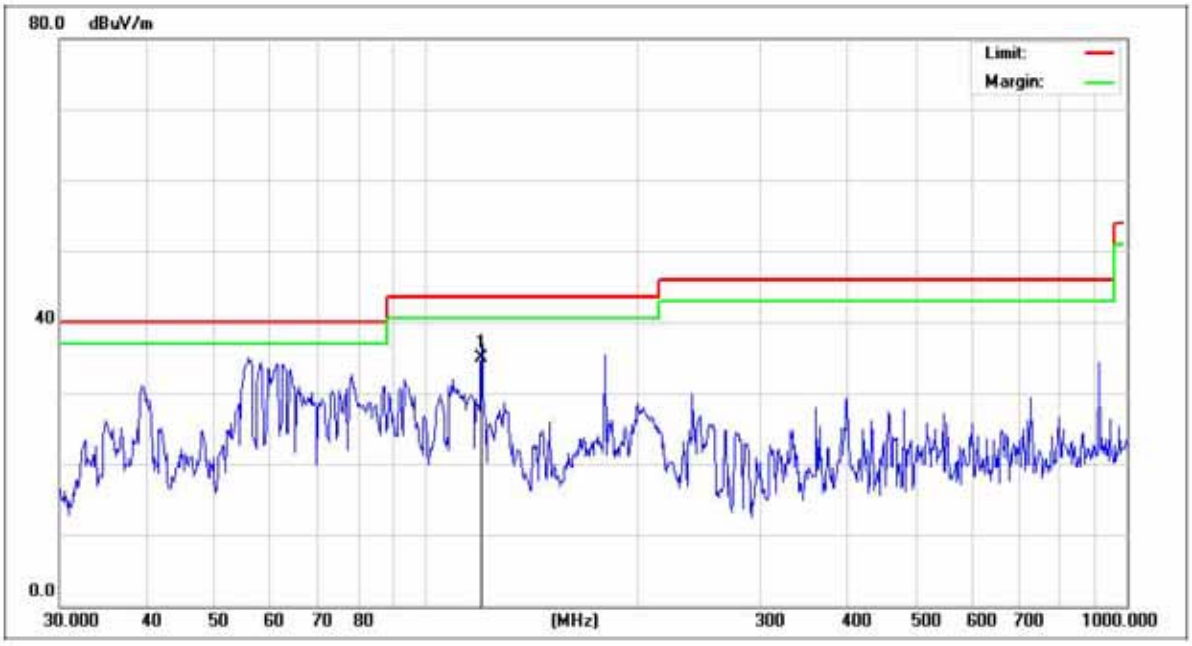
Job No.:	AT1003628F	Polarziation:	Horizontal
Standard:	(RE)FCC PART 15 class B 3m	Power Source:	AC 120V, 60Hz
Test item:	Radiation Test	Date:	10/03/22/
Temp.(C)/Hum.(%RH):	25.5(C)/42%RH	Time:	11/04/20
EUT:	Dongle	Test By:	Jacky
Model:	BL-WKB107	Distance:	3m

Note:



No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	120.0036	65.15	-29.89	35.26	43.50	-8.24	QP

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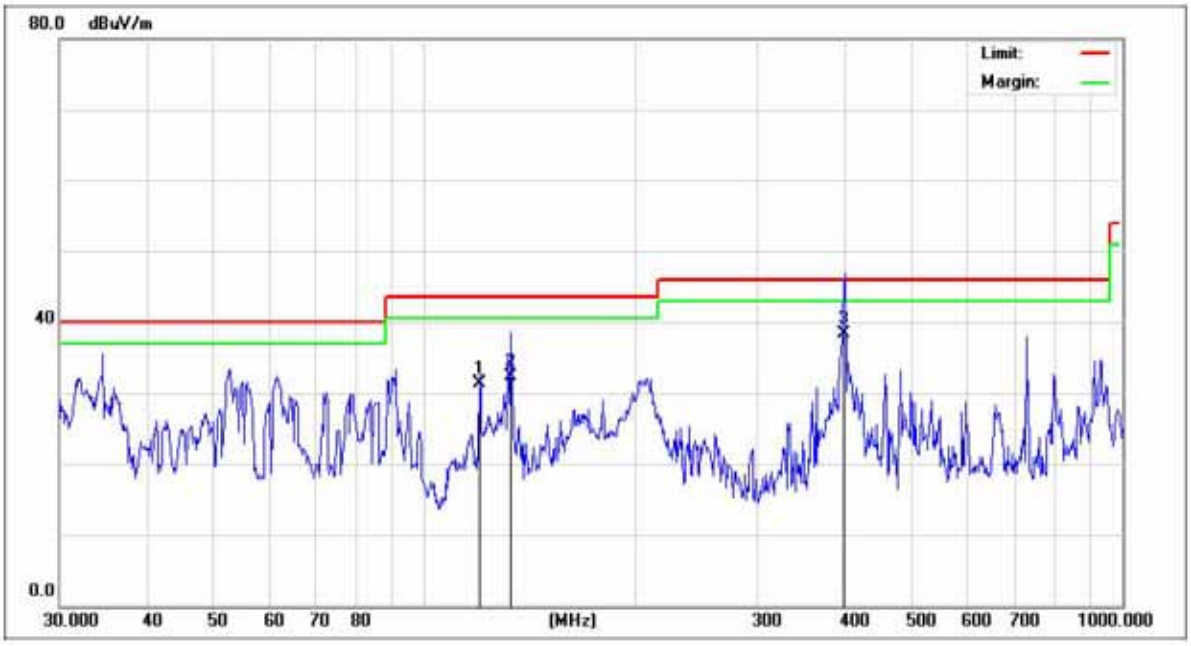
Job No.:	AT1003628F	Polarziation:	Vertical
Standard:	(RE)FCC PART 15 class B 3m	Power Source:	AC 120V, 60Hz
Test item:	Radiation Test	Date:	10/03/22/
Temp.(C)/Hum.(%RH):	25.5(C)/42%RH	Time:	10/57/30
EUT:	Dongle	Test By:	Jacky
Model:	BL-WKB107	Distance:	3m

Note:



No.	Frequency (MHz)	Reading (dBuV/m)	Correct Factor(dB)	Result (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Remark
1	120.0011	61.11	-29.89	31.22	43.50	-12.28	QP
2	133.1511	63.88	-31.60	32.28	43.50	-11.22	QP
3	398.1719	63.34	-25.06	38.28	46.00	-7.72	QP