

FCC TEST REPORT

FCC ID: 2BF6A-L009

Report No. : SSP24010138-1E

Prepared For : guangzhoutuoyakejiyouxiangongsi

Product Name : LED Light for Wall Sconces

Model Name : L009

Test Standard : FCC Part 15 Subpart B

Date of Issue : 2024-04-28

Prepared By : Shenzhen CCUT Quality Technology Co., Ltd.

Shenzhen CCUT Quality Technology Co., Ltd.

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This test report is limited to the above client company and the product model only. It may not be duplicated without prior permitted by Shenzhen CCUT Quality Technology Co., Ltd.

Test Report Basic Information

Applicant.....: guangzhoutuoyakejiyouxiangongsi
Address of Applicant.....: tianhequtianhelu518hao1829fang Guangdongshengguangzhoushi China

Manufacturer.....: guangzhoutuoyakejiyouxiangongsi
Address of Manufacturer.....: tianhequtianhelu518hao1829fang Guangdongshengguangzhoushi China

Product Name.....: LED Light for Wall Sconces
Brand Name.....: BIMEAN
Main Model.....: L009
Series Models.....: See section 1.1 (Page 5)

Test Standard.....: FCC Part 15 Subpart B
Date of Test: 2024-01-23
Test Result.....: PASS

Tested Engineer: Colin Chen (Colin Chen)
Project Manager.....: Lieber Ouyang (Lieber Ouyang)
Authorized Signatory.....: Lahm Peng (Lahm Peng)



Note : This test report is limited to the above client company and the product model only. It may not be duplicated without prior permitted by Shenzhen CCUT Quality Technology Co., Ltd.. All test data presented in this test report is only applicable to presented test sample.

CONTENTS

1. General Information.....	5
1.1 Product Information	5
1.2 Test Setup Information.....	5
1.3 Compliance Standards.....	6
1.4 Test Facilities.....	6
1.5 List of Test and Measurement Instruments	6
1.6 Measurement Uncertainty.....	6
2. Summary of Test Results.....	7
3. Conducted Emissions	8
3.1 Standard and Limit.....	8
3.2 Test Procedure.....	8
3.3 Test Data and Results.....	8
4. Radiated Disturbance.....	9
4.1 Standard and Limit.....	9
4.2 Test Procedure.....	9
4.3 Test Data and Results.....	9

Revision History

Revision	Issue Date	Description	Revised By
V1.0	2024-04-28	Initial Release	Lahm Peng

1. General Information

1.1 Product Information

Product Name:	LED Light for Wall Sconces
Trade Name:	BIMEAN
Main Model:	L009
Series Models:	L009-W-AA-2P, 9-B-AA-2P, L002-B-NEW, L004-B-USB, L002-B-USB
Class of Equipment:	Class B
Highest Internal Frequency:	<108MHz
Battery:	Lamp: DC 4.5V by AA*3 Remote Control: DC 3V
Note 1: The test data is gathered from a production sample, provided by the manufacturer.	
Note 2: The color of appearance and model name of series models listed are different from the main model, but the circuit and the electronic construction are the same, declared by the manufacturer.	

1.2 Test Setup Information

List of Test Modes			
Test Mode	Description	Remark	
TM1	Working	-	
List and Details of Auxiliary Cable			
Description	Length (cm)	Shielded/Unshielded	With/Without Ferrite
-	-	-	-
-	-	-	-
-	-	-	-
List and Details of Auxiliary Equipment			
Description	Manufacturer	Model	Serial Number
-	-	-	-
-	-	-	-
-	-	-	-
The equipment under test (EUT) was configured to measure its highest possible emission and immunity level. The test modes were adapted according to the operation manual for use.			

1.3 Compliance Standards

Compliance Standards	
FCC Part 15 Subpart B	FEDERAL COMMUNICATIONS COMMISSION, RADIO FREQUENCY DEVICES, Unintentional Radiators
All measurements contained in this report were conducted with all above standards	
According to standards for test methodology	
FCC Part 15 Subpart B	FEDERAL COMMUNICATIONS COMMISSION, RADIO FREQUENCY DEVICES, Unintentional Radiators
ANSI C63.4-2014	American National Standard for Methods of Measurement of Radio-Noise Emissions from Low-Voltage Electrical and Electronic Equipment in the range of 9 kHz to 40 GHz.
Maintenance of compliance is the responsibility of the manufacturer or applicant. Any modification of the product, which result is lowering the emission, should be checked to ensure compliance has been maintained.	

1.4 Test Facilities

Shenzhen CCUT Quality Technology Co., Ltd. 1F, Building 35, Changxing Technology Industrial Park, Yutang Street, Guangming District, Shenzhen, Guangdong, China
All measurement facilities used to collect the measurement data are located at 1F, Building 35, Changxing Technology Industrial Park, Yutang Street, Guangming District, Shenzhen, Guangdong, China.
CNAS Registration No.: L18863

1.5 List of Test and Measurement Instruments

Description	Manufacturer	Model	Serial Number	Cal. Date	Due. Date
AMN	ROHDE&SCHWARZ	ENV216	101097	2023-10-21	2024-10-20
EMI Test Receiver	ROHDE&SCHWARZ	ESPI	100242	2023-07-31	2024-07-30
EMI Test Receiver	ROHDE&SCHWARZ	ESPI	100154	2023-07-31	2024-07-30
Spectrum Analyzer	KEYSIGHT	N9020A	MY48030972	2023-07-31	2024-07-30
Amplifier	SCHWARZBECK	BBV 9743B	00251	2023-07-31	2024-07-30
Amplifier	Agilent	8449B	3008A01520	2023-07-31	2024-07-30
Broadband Antenna	SCHWARZBECK	VULB 9168	01320	2023-08-07	2024-08-06
Horn Antenna	SCHWARZBECK	BBHA 9120D	02553	2023-08-07	2024-08-06

1.6 Measurement Uncertainty

Parameter	Conditions	Uncertainty
Conducted Disturbance	9kHz ~30MHz	±1.64 dB
Radiated Disturbance	30MHz ~ 1GHz	±3.32 dB
Radiated Disturbance	1GHz ~ 6GHz	±3.38 dB

2. Summary of Test Results

FCC Rule	Description of Test Items	Result
FCC Part 15.107	Conducted Emissions	N/A
FCC Part 15.109	Radiated Emissions	Passed
Passed: The EUT complies with the essential requirements in the standard Failed: The EUT does not comply with the essential requirements in the standard N/A: Not applicable		

3. Conducted Emissions

3.1 Standard and Limit

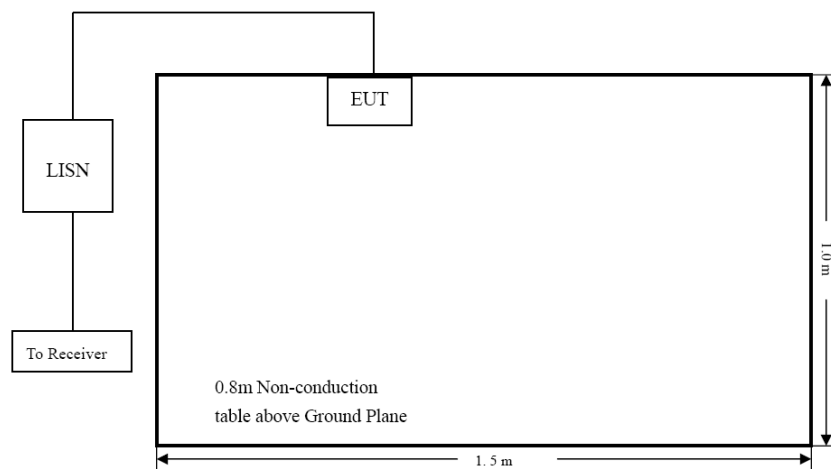
According to the rule FCC Part 15.107, Conducted limit, the limit for a class A and class B device as below:

Frequency of Emission (MHz)	Class A (dBuV)		Class B (dBuV)	
	Quasi-peak	Average	Quasi-peak	Average
0.15-0.5	79	66	66 to 56	56 to 46
0.5-5	73	60	56	46
5-30	73	60	60	50

Note 1: Decreases with the logarithm of the frequency in the range 0.15 MHz to 0.5 MHz
Note 2: The lower limit applies at the band edges

3.2 Test Procedure

Test is conducting under the description of ANSI C63.4-2014 American National Standard for Methods of Measurement of Radio Noise Emissions from Low-Voltage Electrical and Electronic Equipment in the Range of 9 kHz to 40 GHz.



Test Setup Block Diagram

3.3 Test Data and Results

Because the product power is supply through DC 4.5V by AA*3 battery, so not applicable.

4. Radiated Disturbance

4.1 Standard and Limit

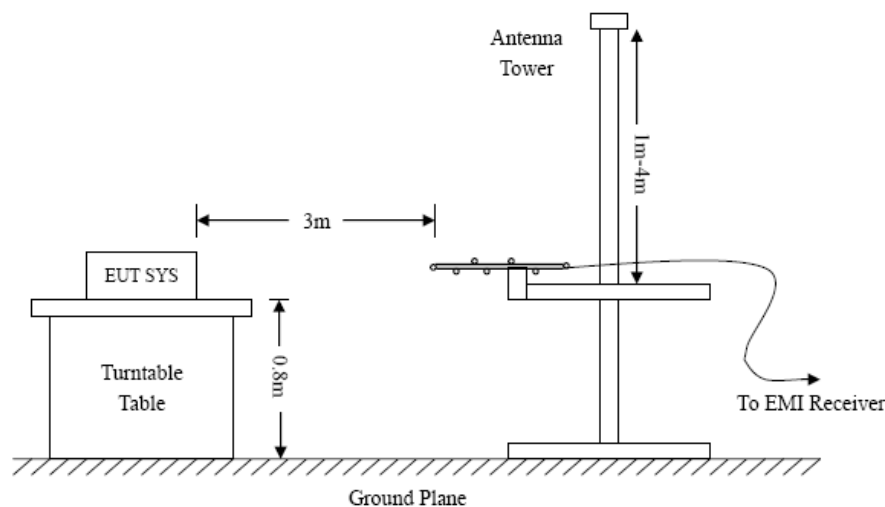
According to the rule FCC Part 15.109, Radiated emission limit for a class A and class B device as below:

Frequency of Emission (MHz)	Class A (3m)	Class B (3m)
	Quasi-peak (dBuV/m)	Quasi-peak (dBuV/m)
30-88	50	40
88-216	54.0	43.5
216-960	57.0	46
Above 960	60	54

Note: The more stringent limit applies at transition frequencies.

4.2 Test Procedure

Test is conducting under the description of ANSI C63.4-2014 American National Standard for Methods of Measurement of Radio Noise Emissions from Low-Voltage Electrical and Electronic Equipment in the Range of 9 kHz to 40 GHz.



Test Setup Block Diagram

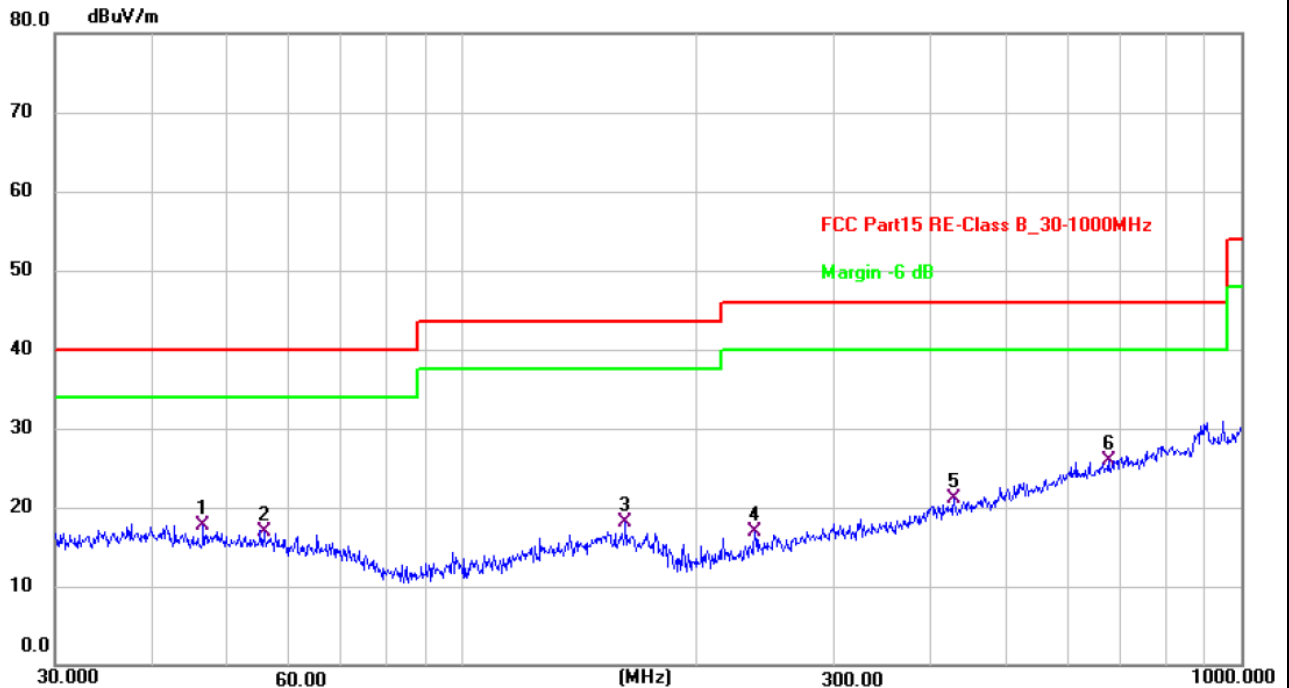
4.3 Test Data and Results

Based on all tested data, the EUT complied with the FCC Part 15.109 standard limit for a Class B device, and with the worst case as below:

Remark: Level = Reading + Factor; Margin = Level - Limit

Test Plots and Data of Radiated Emissions

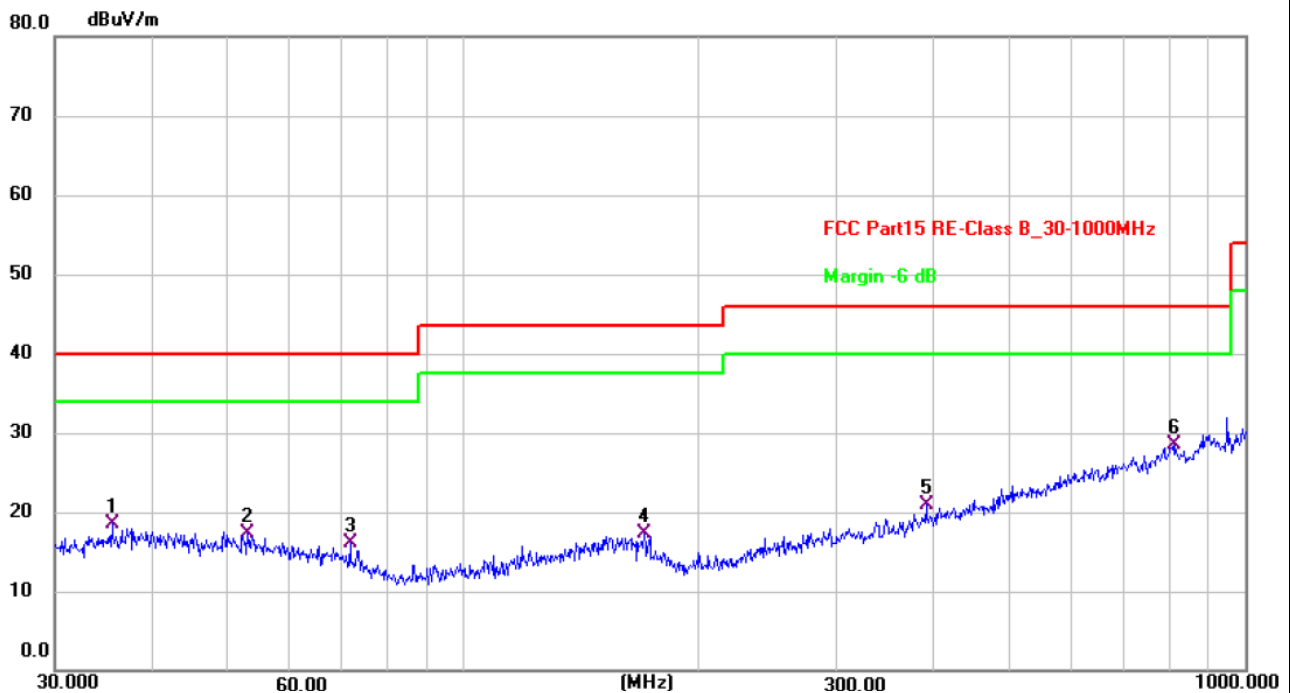
Tested Model:	L009
Tested Mode:	TM1
Test Voltage:	DC 4.5V
Test Antenna Polarization:	Horizontal
Remark:	



No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	46.5030	26.90	-9.13	17.77	40.00	-22.23	QP	100	329	P	
2	55.6094	26.26	-9.33	16.93	40.00	-23.07	QP	100	7	P	
3	162.0414	27.28	-9.10	18.18	43.50	-25.32	QP	100	288	P	
4	237.4760	26.89	-10.08	16.81	46.00	-29.19	QP	100	249	P	
5	428.0193	26.64	-5.52	21.12	46.00	-24.88	QP	100	206	P	
6 *	675.2080	25.77	0.07	25.84	46.00	-20.16	QP	100	164	P	

Test Plots and Data of Radiated Emissions

Tested Model:	L009
Tested Mode:	TM1
Test Voltage:	DC 4.5V
Test Antenna Polarization:	Vertical
Remark:	



No.	Frequency (MHz)	Reading (dBuV)	Factor (dB/m)	Level (dBuV/m)	Limit (dBuV/m)	Margin (dB)	Detector	Height (cm)	Azimuth (deg.)	P/F	Remark
1	35.4993	27.22	-8.64	18.58	40.00	-21.42	QP	100	72	P	
2	52.9453	26.44	-9.04	17.40	40.00	-22.60	QP	100	182	P	
3	71.5806	27.49	-11.31	16.18	40.00	-23.82	QP	100	173	P	
4	170.1948	26.90	-9.61	17.29	43.50	-26.21	QP	100	51	P	
5	390.7226	27.19	-6.23	20.96	46.00	-25.04	QP	100	233	P	
6 *	813.1115	26.22	2.22	28.44	46.00	-17.56	QP	100	272	P	