

RF EXPOSURE REPORT

FOR

Applicant	:	Rockford Corporation
Address	:	600 S. Rockford Drive Tempe AZ, 85281 U.S.A
Equipment under Test	:	BLE Mesh RGB Controller
Model No.	:	M30-S
Trade Mark	:	N/A
FCC ID	:	2AA7SM30SCXZJ
Manufacturer	:	Rayrun Technology Co., Ltd.
Address	:	3Floor East, G building, XingHui Industry Park, HuaNing W Road, Dalang, Longhua District, ShenZhen, Guangdong, China

Issued By: Dongguan Dongdian Testing Service Co., Ltd.

Add: No. 17, Zongbu Road 2, Songshan Lake Sci&Tech, Industry Park, Dongguan
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REPORT

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TEST REPORT DECLARE

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Standard Used: KDB447498 D01 General RF Exposure Guidance v06

We Declare:

The equipment described above is assessed by Dongguan Dongdian Testing Service Co., Ltd and in the configuration assessed the equipment complied with the standards specified above. The assessed results are contained in this report and Dongguan Dongdian Testing Service Co., Ltd is assumed of full responsibility for the accuracy and completeness of these assess.

After evaluation, our opinion is that the equipment In Accordance with above standard.

Report No:	DDT-R19052410-2E3		
Date of Receipt:	Jun. 11, 2019	Date of Test:	Jun. 11, 2019~ Jun. 24, 2019

Prepared By:

Ella Gong

Ella Gong/Engineer

Approved By:



Damon Hu/EMC Manager

Note: This report applies to above tested sample only. This report shall not be reproduced in parts without written approval of Dongguan Dongdian Testing Service Co., Ltd.

Revision history

Rev.	Revisions	Issue Date	Revised By
---	Initial issue	Jun. 24, 2019	

1. General information

1.1. Description of Equipment

EUT* Name	: BLE Mesh RGB Controller
Model Number	: M30-S
EUT function description	: Please reference user manual of this device
Power supply	: DC 12V
Radio Specification	: Bluetooth V4.0
Operation frequency	: 2402MHz-2480MHz
Modulation	: GFSK
Data rate	: 1Mbps
Antenna Type	: Integrated antenna, maximum PK gain: 3 dBi
Sample Type	: Series production

1.2. Assess laboratory

Dongguan Dongdian Testing Service Co., Ltd.

Add: No. 17, Zongbu Road 2, Songshan Lake Sci&Tech, Industry Park, Dongguan City,
Guangdong Province, China, 523808

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2. RF Exposure evaluation for FCC

According to 447498 D01 General RF Exposure Guidance v06

The 1-g and 10-g SAR test exclusion thresholds for 100 MHz to 6 GHz at test separation distances ≤ 50 mm are determined by:

$[(\text{max. power of channel, including tune-up tolerance, mW})/(\text{min. test separation distance, mm})] \cdot [\sqrt{f(\text{GHz})}] \leq 3.0$ for 1-g SAR and ≤ 7.5 for 10-g extremity SAR, where:

$f(\text{GHz})$ is the RF channel transmit frequency in GHz

Power and distance are rounded to the nearest mW and mm before calculation

The result is rounded to one decimal place for comparison

Worse case is as below: [2480 MHz, 3.37 dBm 2.17 mW) output power]

$(2.17/5) \cdot [\sqrt{2.402(\text{GHz})}] = 0.683 < 3.0$ for 1-g SAR

Then SAR evaluation is not required

END OF REPORT