

RF EXPOSURE REPORT

Report No.: DDT-B21052007-1E19

Applicant	:	Sublue Underwater AI Co.,Ltd.
Address	:	NO1,QUANZHOU ROAD,ZHONGGUANCUN SCIENCE AND TECH.PARK , BINHAI TIANJIN CHN
Equipment under Test	:	Paddleboard Power Conversion Kit Controller
Model No.	:	PAE001-01
Trade Mark	:	WhiteShark
FCC ID	:	2ASEE-PAE001-01
Manufacturer	:	Sublue Underwater AI Co.,Ltd.
Address	:	NO1,QUANZHOU ROAD,ZHONGGUANCUN SCIENCE AND TECH.PARK , BINHAI TIANJIN CHN

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

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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 Tianjin 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 Tianjin 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-B21052007-1E19		
Date of Receipt:	May 20, 2021	Date of Test:	Dec. 15, 2021 ~ Dec. 15, 2021

Prepared By:

Sunny Zhang

Sunny Zhang/Engineer

Approved By:

Aaron Zhang

Aaron Zhang/EMC Manager

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

The report must not be used by the client to claim product certification, approval, or endorsement by NVLAP, NIST, or any agency of the U.S. Government.

Revision history

Rev.	Revisions	Issue Date	Revised By
---	Initial issue	Dec. 15, 2021	

1. General information

1.1. Description of Equipment

EUT* Name	: Paddleboard Power Conversion Kit Controller
Model Number	: PAE001-01
EUT function description	: Please reference user manual of this device
Power supply	: DC 5V from USB : DC 3.7V by Polymer Li-ion built-in battery
Radio Specification	: Bluetooth V5.0
Operation frequency	: 2402 MHz-2480 MHz
Modulation	: GFSK
Data rate	: 1Mbps, 2Mbps
Antenna Type	: PCB antenna, maximum PK gain: -1.40 dBi
Sample Number	: N/A

1.2. Assess laboratory

Tianjin Dongdian Testing Service Co., Ltd.

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NVLAP (National Voluntary Laboratory Accreditation Program) CODE: 500036-0

CNAS (China National Accreditation Service for Conformity Assessment) CODE: L13402

FCC Designation Number: CN5004; FCC Test Firm Registration Number: 368676

ISED (Innovation, Science and Economic Development Canada) Company Number: 27768

Conformity Assessment Body Identifier: CN0125

VCCI Facility Registration Number: C-20089, T-20093, R-20125, G-20122

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:

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

$f(\text{GHz})$ 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

Manufacturing Tolerance

GFSK 1 M (Peak)			
Channel	Channel 0	Channel 19	Channel 39
Target (dBm)	0	0	0
Tolerance ±(dB)	1	1	1

GFSK 2 M (Peak)			
Channel	Channel 0	Channel 19	Channel 39
Target (dBm)	0	0	0
Tolerance ±(dB)	1	1	1

Estimtion Result

Worse case is as below: [2480MHz, 1.0 dBm, 1.26 mW) output power]

$(1.26/5) \cdot [\sqrt{2.480(\text{GHz})}] = 0.397 < 3.0$ for 1-g SAR

Then SAR evaluation is not required

END OF REPORT