



■ Report No.: DDT-R22070901-1E02

■ Issued Date: Jul. 28, 2022

RF EXPOSURE REPORT

FOR

Applicant	:	DONGGUAN MORITAKE INDUSTRIAL CO.,LTD
Address	:	Building B, no. 68, xixing third street, changping town, dongguan city, dongguan, China
Equipment under Test	:	Water Bottle with Wireless Speaker
Model No.	:	AI6005-BLK, AI6005-TL, AI6005-BUR, AI6005-NVY, AI9003-BLK, AI9003-TL, AI9003-BUR, AI9003-NVY, AI6005-XXX (X=A-Z)
Trade Mark	:	aiwa
FCC ID	:	2AWEN-AI6005
Manufacturer	:	DONGGUAN MORITAKE INDUSTRIAL CO.,LTD
Address	:	Building B, no. 68, xixing third street, changping town, dongguan city, dongguan, China

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

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

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REPORT

Table of Contents

Test report declares.....	3
1. General Information	5
1.1. Description of equipment	5
1.2. Assess laboratory.....	5
2. RF Exposure evaluation for FCC	5

Test Report Declare

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Trade mark	:	aiwa
Manufacturer	:	DONGGUAN MORITAKE INDUSTRIAL CO.,LTD
Address	:	Building B, no. 68, xixing third street, changping town, dongguan city, dongguan, China

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-R22070901-1E02		
Date of Receipt:	Jul. 11, 2022	Date of Test:	Jul. 11, 2022 ~ Jul. 28, 2022

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	Jul. 28, 2022	

1. General Information

1.1. Description of equipment

EUT* Name	: Water Bottle with Wireless Speaker
Model Number	: AI6005-BLK, AI6005-TL, AI6005-BUR, AI6005-NVY, AI9003-BLK, AI9003-TL, AI9003-BUR, AI9003-NVY, AI6005-XXX (X=A-Z)
Difference of models	: Above models are identical in schematic and structure, only the model number and color are different, therefore the test performed on the model AI6005-BLK.
EUT function description	: Please reference user manual of this device
Power Supply	: DC 5V from external AC Adapter : DC 3.7V 350mAH Lithium Ion Battery
Radio Specification	: Bluetooth V5.1
Operation Frequency	: 2402 MHz - 2480 MHz
Modulation	: GFSK, $\pi/4$ -DQPSK, 8DPSK
Data Rate	: 1 Mbps, 2 Mbps, 3 Mbps
Antenna Gain	: Maximum PK gain: -0.68 dBi
Sample Number	: S22070901-02

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.

Tel.: +86-0769-38826678, <http://www.dgddt.com>, Email: ddt@dgddt.com.

CNAS Accreditation No. L6451; A2LA Accreditation Number: 3870.01

FCC Designation Number: CN1182, Test Firm Registration Number: 540522

Innovation, Science and Economic Development Canada Site Registration Number: 10288A

Conformity Assessment Body identifier: CN0048

VCCI facility registration number: C-20087, T-20088, R-20123, G-20118

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 \leq 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

BT Manufacturing Tolerance

GFSK (Peak)			
Channel	Channel 0	Channel 39	Channel 78
Target (dBm)	-11.59	-10.68	-10.22
Tolerance \pm (dB)	1	1	1
$\pi/4$ DQPSK (Peak)			
Channel	Channel 0	Channel 39	Channel 78
Target (dBm)	-11.10	-10.22	-9.79
Tolerance \pm (dB)	1	1	1
8DPSK (Peak)			
Channel	Channel 0	Channel 39	Channel 78
Target (dBm)	-10.61	-9.73	-9.28
Tolerance \pm (dB)	1	1	1

Estimation Result

Worse case is as below: [2480 MHz, -8.28 dBm (0.15 mW) output power]

$$(0.15/5) \cdot [\sqrt{2.480(\text{GHz})}] = 0.05 < 3.0 \text{ for 1-g SAR}$$

Then SAR evaluation is not required.

END OF REPORT