



RF Exposure Report

FCC ID: 2AXKN-INDIO2

Applicant: Generation-S Private Limited

Address: 3 Ang Mo Kio ST 62 #06-08 Singapore 569139

Manufacturer: Generation-S Private Limited

Address: 3 Ang Mo Kio ST 62 #06-08 Singapore 569139

Product: FENDER INDIO2 BLUETOOTH SPEAKER

Brand: Fender

Test Model(s): INDIO2

Series Model(s): N/A

Test Date: Dec. 21, 2021~Jan. 07, 2022

Issued Date: Feb. 26, 2022

Issued By: Hwa-Hsing (Dongguan) Testing Co., Ltd.

Address: No.101, Bld N1, Yuyuan 2Rd, Yuyuan Industrial Park, HuangJiang Town, Dongguan, China

Test Firm Registration No.: 915896

Standards: 47 CFR FCC Part 15, Subpart C (Section 15.247)
ANSI C63.10:2013

The above equipment has been tested by **Hwa-Hsing (Dongguan) Testing Co., Ltd.**, and found compliance with the requirement of the above standards. The test record, data evaluation & Equipment Under Test (EUT) configurations represented herein are true and accurate accounts of the measurements of the sample's EMC characteristics under the conditions specified in this report.

Prepared by :

Candy Zhang/ Report Engineer

Reviewed by :

Tank tan/ Project Engineer

Approved by :

Harry Li/ Technical Director

This report is for your exclusive use. Any copying or replication of this report to or for any other person or entity, or use of our name or trademark, is permitted only with our prior written permission. This report sets forth our findings solely with respect to the test samples identified herein. The results set forth in this report are not indicative or representative of the quality or characteristics of the lot from which a test sample was taken or any similar or identical product unless specifically and expressly noted. Our report includes all of the tests requested by you and the results thereof based upon the information that you provided to us. You have 60 days from date of issuance of this report to notify us of any material error or omission caused by our negligence, provided, however, that such notice shall be in writing and shall specifically address the issue you wish to raise. A failure to raise such issue within the prescribed time shall constitute your unqualified acceptance of the completeness of this report, the tests conducted and the correctness of the report contents. Unless specifically mentioned, the uncertainty of measurement has been explicitly taken into account to declare the compliance or non-compliance to the specification. The report must not be used by the client to claim product certification, approval, or endorsement by A2LA or any agency of the federal government. The report must not be used by the client to claim product certification, approval, or endorsement by TAF or any government agencies.



Table of contents

Release control record	3
1 General Information	4
1.1 General Description of EUT	4
2 Evaluation of SAR Testing Exclusion	5
3 Evaluation Result	6
Appendix – Information on the Testing Laboratories.....	7



Release control record

Issue No.	Reason for change	Date issued
210906EL03-SE-US-01	Original Release	Feb. 26, 2022



1 General Information

1.1 General Description of EUT

Product	FENDER INDIO2 BLUETOOTH SPEAKER
Brand	Fender
Test Model(s)	INDIO2
Series Model(s)	N/A
Status of EUT	Engineering Prototype
Power Supply Rating	Input: DC15V 2.8A, 42W from Adaptor; or 7.2V d.c. 5500mAh from Battery; or 7.2V d.c. 6000mAh from Battery; Output: 5V 1A
Modulation Type	GFSK, $\pi/4$ DQPSK, 8DPSK
Transfer Rate	1/2/3Mbps
Operating Frequency	2402 ~ 2480MHz
Number of Channel	79
Output Power (AVG)	2.36dBm
Antenna Type	PCB Antenna
Antenna Gain	2.45dBi
Antenna Connector	N/A
Accessory Device	N/A
Cable Supplied	Aux-in Cable: Detachable, Unshielded, 1.0m, no core.

Note:

1. Please refer to the EUT photo document (Reference No.: :210906EL03-1&-2) for detailed product photo.
2. The above EUT information is declared by manufacturer and for more detailed features description, please refer to the manufacturer's specifications or User's Manual.
3. Battery and Adaptor for the EUT:

ID	Trade Mark(s)	Model No.	Rating	Cable
Battery 1	N/A	C129J2-2	7.2V d.c.5500mAh	N/A
Battery 2	N/A	C129J2-3	7.2V d.c. 6000mAh	N/A
Adaptor		S050FM1500280	DC 15V 2.8A, 42.0W	Detachable, Unshielded, 1.5m



2 Evaluation of SAR Testing Exclusion

Following FCC KDB 447498 D01 "General SAR test exclusion guidance"

The corresponding SAR Exclusion Threshold condition, listed below:

- 1) 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

The test exclusions are applicable only when the minimum test separation distance is ≤ 50 mm and for transmission frequencies between 100 MHz and 6 GHz. When the minimum test separation distance is < 5 mm, a distance of 5 mm is applied to determine SAR test exclusion.

- 2) At 100 MHz to 6 GHz and for test separation distances > 50 mm, the SAR test exclusion threshold is determined according to the following:

- a) [Threshold at 50 mm in step 1) + (test separation distance - 50 mm) · (f(MHz)/150)] mW, at 100MHz to 1500 MHz
- b) [Threshold at 50 mm in step 1) + (test separation distance - 50 mm) · 10] mW at > 1500 MHz and ≤ 6 GHz

- 3) At frequencies below 100 MHz, the following may be considered for SAR test exclusion.

- a) The threshold at the corresponding test separation distance at 100 MHz in step 2) is multiplied by $[1 + \log(100/f(\text{MHz}))]$ for test separation distances > 50 mm and < 200 mm.
- b) The threshold determined by the equation in a) for 50 mm and 100 MHz is multiplied by $\frac{1}{2}$ for test separation distances ≤ 50 mm.
- c) SAR measurement procedures are not established below 100 MHz. When SAR test exclusion cannot be applied, a KDB inquiry is required to determine SAR evaluation requirements for any test results to be acceptable.

Smallest distance from the antenna and radiating structures or outer surface of the device

The minimum test separation distance is determined by the smallest distance from the antenna and radiating structures or outer surface of the device, according to the host form factor, exposure conditions and platform requirements, to any part of the body or extremity of a user or bystander.



3 Evaluation Result

The tuned conducted Average Power (declared by client)

Mode	Frequency (MHz)	Target Power (dBm)	Tolerance (dBm)	Lower Tolerance (dBm)	Upper Tolerance (dBm)
BR/EDR	2402-2480	2	+2 -2	0	4

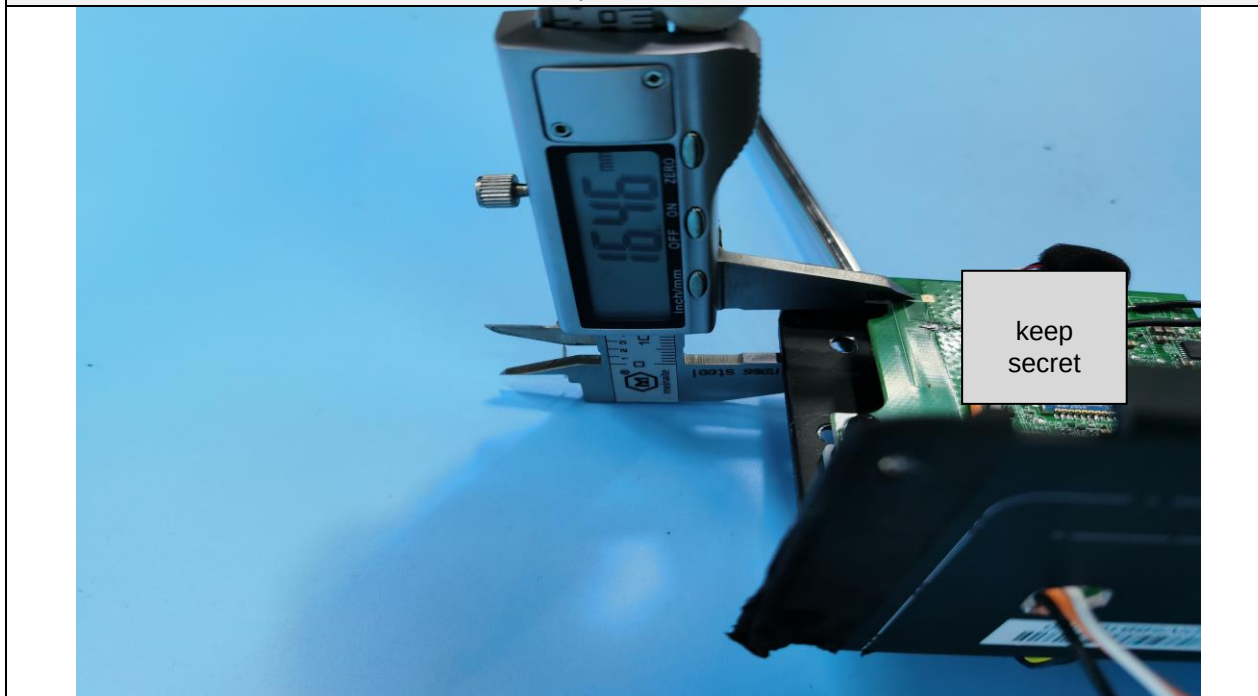
The measured conducted Average Power and EIRP

Mode	Frequency (MHz)	Maximum Averaged Power (dBm)
BR/EDR	2402-2480	2.36

SAR Test Exclusion Thresholds

Frequency (MHz)	Maximum source-based time averaged conducted output power (dBm)	Minimum separation distance (mm)	Result of Eq. 1	Limit for 1-g SAR	Limit for 10-g extremity SAR	Verdict
2480	4	16.5	0.240	3.0	7.5	Exempt

Minimum separation distance(mm) : From the edge of the antenna inside the product to the closest shell that the product can touch.





Appendix – Information on the Testing Laboratories

We, [Hwa-Hsing \(Dongguan\) Co., Ltd.](#), A global provider of TESTING and CERTIFICATION services for consumer products, electronic products and wireless information technology products. Adhering to the core values “HONEST and TRUSTWORTHY, OBJECTIVE and IMPARTIALITY, RIGOROUS and AFFICIENT”, commitment to provide professional, perfect and efficient comprehensive ONE-STOP solution of TESTING and CERTIFICATION services for Manufacturers, Buyers, Traders, Brands, Retailers. Assist client to better manage risk, protect their brands, reduce costs and cut time to over 150 markets in global. Our laboratories are FCC recognized accredited test firms and accredited and approved according to ISO/IEC 17025.

If you have any comments, please feel free to contact us at the following:

Lab Address: [No.101, Bld N1, Yuyuan 2Rd, Yuyuan Industrial Park, HuangJiang Town, Dongguan, China](#)

Contact Tel: [0769-83078199](tel:0769-83078199)

Email: Customerservice.dg@hwa-hsing.com

Web Site: www.hwa-hsing.com

--- END ---