



# **RF EXPOSURE REPORT**

**Report Number :** 11385475-E3V1

**Applicant :** SRAM LLC.  
1000 W Fulton Market, 4th Floor  
Chicago, IL. 60607, U.S.A

**Model :** 0824

**FCC ID :** C90-KILO2

**IC ID :** 10161A-KILO2

**EUT Description :** Quarq Kilo Bicycle Power Meter

**Test Standard(s) :** FCC Part 1 Subpart I  
FCC Part 2 Subpart J

**Date of Issue:**  
**9/11/2016**

**Prepared by:**  
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NVLAP LAB CODE 200065-0

Revision History

<u>Rev.</u>	<u>Issue Date</u>	<u>Revisions</u>	<u>Revised By</u>
V1	08/25/16	Initial Issue	
V2	09/11/16	Updated Section 6.1 & removed 6.2 (IC RSS-102)	D. Corona

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# 1. ATTESTATION OF TEST RESULTS

**COMPANY NAME:** SRAM LLC  
**EUT DESCRIPTION:** Quarq Kilo Bicycle Power Meter  
**MODEL:** 0824  
**SERIAL NUMBER:** AFS61570  
**DATE TESTED:** APRIL 5 - 6, 2016

APPLICABLE STANDARDS	
STANDARD	TEST RESULTS
FCC PART 1 SUBPART I & PART 2 SUBPART J	Pass

UL Verification Services Inc. calculated the RF Exposure of the above equipment in accordance with the requirements set forth in the above standards, using test results reported in the test report documents referenced below and/or documentation furnished by the applicant. All indications of Pass/Fail in this report are opinions expressed by UL Verification Services Inc. based on interpretations of these calculations. The results show that the equipment is capable of demonstrating compliance with the requirements as documented in this report.

**Note:** The results documented in this report apply only to the tested sample, under the conditions and modes of operation as described herein. This document may not be altered or revised in any way unless done so by UL Verification Services Inc. and all revisions are duly noted in the revisions section. Any alteration of this document not carried out by UL Verification Services Inc. will constitute fraud and shall nullify the document. This report must not be used by the client to claim product certification, approval, or endorsement by NVLAP, NIST, any agency of the Federal Government, or any agency of any government.

Approved & Released For  
UL Verification Services Inc. By:



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## 2. TEST METHODOLOGY

All calculations were made in accordance with FCC KDB 447498.

## 3. REFERENCES

Output power, Duty cycle and Antenna gain data is excerpted from the applicable test reports or client declarations.

## 4. FACILITIES AND ACCREDITATION

The test sites and measurement facilities used to collect data are located at 47173 and 47266 Benicia Street, Fremont, California, USA

UL Verification Services Inc. is accredited by NVLAP, Laboratory Code 200065-0.

## 5. Device under test

The EUT is a Bicycle Power Meter with ANT+ & BLE.

The minimum user separation distance is unspecified but for the purposes of the SAR exclusion calculations was assumed to be 0mm

BLE

The maximum output power is 2.802dBm (Max Power per Theory of Operation)

The antenna gain is 3 dBi peak.

## 6. STANDALONE SAR TEST EXCLUSION CONSIDERATIONS

### 6.1. FCC

SAR test exclusion in accordance with KDB 447498.

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:

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

This test exclusion is applicable only when the minimum test separation distance is  $\leq 50$  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.

#### SAR Exclusion Calculation Table for Portable Devices (separation distance $< 50$ mm)

Tx	Frequency (MHz)	Avg Output power		Separation distances (mm)	Calculated Threshold
		dBm	mW		
BLE	2480	3.00	2	5	0.6

Conclusion:

The computed values are  $< 3$ ; therefore, the device qualifies for Standalone SAR test exclusion.

**END OF REPORT**