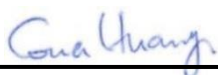


RF EXPOSURE EVALUATION REPORT

FCC ID : S9GR670
Equipment : R670 Access Point
Brand Name : RUCKUS
Model Name : R670
Applicant : Ruckus Wireless, LLC
350 W. Java Dr., Sunnyvale CA 94089 USA
Manufacturer : Ruckus Wireless, LLC
350 W. Java Dr., Sunnyvale CA 94089 USA
Standard : 47 CFR Part 2.1091

We, SPORTON INTERNATIONAL INC has been evaluated this product in accordance with 47 CFR Part2.1091 and it complies with applicable limit.

Sporton Lab is accredited to ISO 17025 by Taiwan Accreditation Foundation (TAF code: 1190) and the FCC designation No. TW1190 under the FCC 2.948(e) by Mutual Recognition Agreement (MRA) in FCC evaluation. The results in this report apply exclusively to the tested model / sample. Without written approval of SPORTON INTERNATIONAL INC. Laboratory, the test report shall not be reproduced except in full.



Approved by: Cona Huang / Deputy Manager



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Table of Contents

1. DESCRIPTION OF EQUIPMENT UNDER TEST (EUT)	4
2. MAXIMUM RF AVERAGE OUTPUT POWER AMONG PRODUCTION UNITS	5
3. RF EXPOSURE LIMIT INTRODUCTION	5
4. RADIO FREQUENCY RADIATION EXPOSURE EVALUATION	6
4.1. Standalone Power Density Calculation	6
4.2. Collocated Power Density Calculation.....	6



History of this test report

Report No.	Version	Description	Issued Date
FA240104006-02	Rev. 01	Initial issue of report	Nov. 19, 2024

**1. Description of Equipment Under Test (EUT)**

Product Feature & Specification	
EUT Type	R670 Access Point
Brand Name	RUCKUS
Model Name	R670
FCC ID	S9GR670
Wireless Technology and Frequency Range	WLAN 2.4 GHz Band: 2400 MHz ~ 2483.5 MHz WLAN 5.2 GHz Band: 5150 MHz ~ 5250 MHz WLAN 5.3 GHz Band: 5250 MHz ~ 5350 MHz WLAN 5.6 GHz Band: 5470 MHz ~ 5725 MHz WLAN 5.8 GHz Band: 5725 MHz ~ 5850 MHz WLAN 6E: 5925MHz~6425MHz, 6425MHz~6525MHz, 6525MHz~6875MHz, 6875 MHz~7125 MHz Bluetooth: 2400 MHz ~ 2483.5 MHz Zigbee: 2400 MHz ~ 2483.5 MHz
Mode	WLAN:802.11a/b/g/n/ac/ax/be HT20/HT40/VHT20/VHT40/VHT80/VHT160/HE20/HE40/HE80/HE160/EHT20/EHT40/EHT80/EHT160/EHT320 Bluetooth LE Zigbee: BPSK

Reviewed by: Jason Wang**Report Producer: Daisy Peng**

2. Maximum RF average output power among production units

Mode		Maximum Average power(dBm)
WLAN	WLAN2.4GHz Band_2TX	26.0
	WLAN5GHz Band_2TX	26.0
	WLAN5GHz Band_4TX	29.0
	WLAN6GHz Band_2TX	26.5
Bluetooth		21.0
Zigbee		19.5

3. RF Exposure Limit Introduction

According to ANSI/IEEE C95.1-1992, the criteria listed in Table 1 shall be used to evaluate the environmental impact of human exposure to radio frequency (RF) radiation as specified in §1.1310.

Frequency range (MHz)	Electric field strength (V/m)	Magnetic field strength (A/m)	Power density (mW/cm ²)	Averaging time (minutes)
(A) Limits for Occupational/Controlled Exposures				
0.3-3.0	614	1.63	*(100)	6
3.0-30	1842/f	4.89/f	*(900/f ²)	6
30-300	61.4	0.163	1.0	6
300-1500			f/300	6
1500-100,000			5	6
(B) Limits for General Population/Uncontrolled Exposure				
0.3-1.34	614	1.63	*(100)	30
1.34-30	824/f	2.19/f	*(180/f ²)	30
30-300	27.5	0.073	0.2	30
300-1500			f/1500	30
1500-100,000			1.0	30

The MPE was calculated at 20 cm to show compliance with the power density limit.

The following formula was used to calculate the Power Density:

$$S = \frac{PG}{4\pi R^2}$$

Where:

S = Power Density

P = Output Power at Antenna Terminals

G = Gain of Transmit Antenna (linear gain)

R = Distance from Transmitting Antenna

4. Radio Frequency Radiation Exposure Evaluation

4.1. Standalone Power Density Calculation

Band	Antenna Gain (dBi)	Maximum Power (dBm)	Maximum EIRP (dBm)	Maximum EIRP (W)	Average EIRP (mW)	Power Density at 20cm (mW/cm ²)	Limit (mW/cm ²)	Power Density / Limit
WLAN2.4GHz Band_2TX	2.1	26.0	28.1	0.65	645.65	0.129	1.000	0.129
WLAN5GHz Band_2TX	4.4	26.0	30.4	1.10	1096.48	0.218	1.000	0.218
WLAN5GHz Band_4TX	4.4	29.0	33.4	2.19	2187.76	0.435	1.000	0.435
WLAN6GHz Band_2TX	4.4	26.5	30.9	1.23	1230.27	0.245	1.000	0.245
Bluetooth	2.5	21.0	23.5	0.22	223.87	0.045	1.000	0.045
Zigbee	2.5	19.5	22.0	0.16	158.49	0.032	1.000	0.032

4.2. Collocated Power Density Calculation

Bluetooth Power Density / Limit	WLAN5GHz 2TX Power Density / Limit	Σ (Power Density / Limit) of Bluetooth + WLAN5GHz 2TX
0.045	0.218	0.263

Bluetooth Power Density / Limit	WLAN6GHz 2TX Power Density / Limit	Σ (Power Density / Limit) of Bluetooth + WLAN6GHz 2TX
0.045	0.245	0.290

WLAN5GHz 2TX Power Density / Limit	WLAN6GHz 2TX Power Density / Limit	Σ (Power Density / Limit) of WLAN5GHz 2TX + WLAN5GHz 2TX
0.218	0.245	0.463

Bluetooth Power Density / Limit	WLAN5GHz 4TX Power Density / Limit	Σ (Power Density / Limit) of Bluetooth + WLAN5GHz 4TX
0.045	0.435	0.480

Note:

- Σ (Power Density / Limit): This is a summation of [(power density for each transmitter/antenna included in the simultaneous transmission)/ (corresponding MPE limit)], for Bluetooth+ WLAN5GHz 2TX, Bluetooth + WLAN6GHz 2TX, WLAN5GHz 2TX+ WLAN6GHz 2TX, Bluetooth + WLAN5GHz 4TX.
- Considering the WWAN module collocation with the WLAN and Bluetooth transmitter of the EIRP performance listed in the table above, the aggregated (power density /limit) is smaller than 1, and MPE of 2 collocated transmitters is compliant

Conclusion:

According to 47 CFR §2.1091, the RF exposure analysis concludes that the RF Exposure is FCC compliant.