

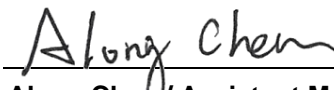
# FCC RF Exposure Report

**FCC ID** : 2AAS9-MI10  
**Equipment** : Wi-Fi 6 AX6600 Tri-Radio Indoor Mesh Router  
**Model No.** : MI10  
**Brand Name** : PRISM  
**Applicant** : Browan Communications Incorporation.  
**Address** : No.15-1, Zhonghua Rd., Hsinchu Industrial Park, Hukou Hsinchu Hsien Taiwan 303  
**Standard** : 47 CFR FCC Part 2.1091  
**Received Date** : Dec. 30, 2021  
**Tested Date** : Jan. 29 ~ Feb. 14, 2022

We, International Certification Corporation, would like to declare that the tested sample has been evaluated and in compliance with the requirement of the above standards. The test results contained in this report refer exclusively to the product. It shall not be reproduced except in full without the written approval of our laboratory.

Reviewed by:

Approved by:

  
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Along Chen / Assistant Manager

  
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Gary Chang / Manager

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## Release Record

Report No.	Version	Description	Issued Date
FA1D3002-01	Rev. 01	Initial issue	Mar. 04, 2022

## 1 MPE EVALUATION OF MOBILE DEVICES

### 1.1 LIMITS FOR GENERAL POPULATION/UNCONTROLLED EXPOSURE

Frequency Range (MHz)	Power Density (mW /cm <sup>2</sup> )	Averaging Time (minutes)
300~1500	F/1500	30
1500~100000	1.0	30

### 1.2 MPE EVALUATION FORMULA

$$Pd = \frac{Pt}{4 * Pi * R^2}$$

Where

Pd= Power density in mW/cm<sup>2</sup>

Pt= EIRP in mW

Pi= 3.1416

R= Measurement distance

### 1.3 DEVIATION FROM TEST STANDARD AND MEASUREMENT PROCEDURE

None

### 1.4 MEASUREMENT UNCERTAINTY

The measurement uncertainties given below are based on a 95% confidence level (based on a coverage factor (k=2)).

Parameters	Uncertainty
Conducted power	±0.808 dB

Declaration of Conformity:
The test results with all measurement uncertainty excluded are presented in accordance with the regulation limits or requirements declared by manufacturers.
Comments and Explanations:
The declared of product specification for EUT presented in the report are provided by the manufacturer, and the manufacturer takes all the responsibilities for the accuracy of product specification.

## 1.5 MPE EVALUATION RESULTS

Frequency Range (MHz)	Maximum Conducted Power (dBm)	Rated Power (dBm)	Antenna Gain (dBi)	Distance (cm)	Power Density (mW/cm <sup>2</sup> )	Limit (mW/cm <sup>2</sup> )	Ratio*	Pass / Fail
<b>Non-beamforming mode</b>								
2412~2462 <sup>Note1</sup>	29.71	30	4.48	28	0.285	1	0.285	Pass
5180~5240 <sup>Note1</sup>	16.14	16.5	6.6	28	0.021	1	0.021	Pass
5745~5825 <sup>Note1</sup>	29.89	30	5.92	28	0.397	1	0.397	Pass
5250~5350	17.43	17.5	5.46	28	0.020	1	0.020	Pass
5470~5725	23.09	23.5	6.58	28	0.103	1	0.103	Pass
<b>Beamforming mode</b>								
2412~2462 <sup>Note1</sup>	25.31	25.5	6.75	28	0.170	1	0.170	Pass
5180~5240 <sup>Note1</sup>	13.13	13.5	8.39	28	0.016	1	0.016	Pass
5745~5825 <sup>Note1</sup>	23.67	24	11.33	28	0.346	1	0.346	Pass
5250~5350	14.37	14.5	7.96	28	0.018	1	0.018	Pass
5470~5725	17.07	17.5	11.87	28	0.088	1	0.088	Pass

Ratio\* = Power density / Limit.

**Note:**

1. Test results of these frequency bands are leveraged from original MPE report, report no. FA1D3002.

2.

For 2412-2462 MHz:

Directional gain =  $10 \times \log((10^{4.48/20} + 10^{2.94/20})^2 / 2) = 6.75$  dBi.

For 5150~5250MHz:

Directional gain =  $10 \times \log((10^{3.95/20} + 10^{6.6/20})^2 / 2) = 8.39$  dBi.

For 5725~5850MHz:

Directional gain =  $10 \times \log((10^{5.3/20} + 10^{5.92/20} + 10^{4.72/20} + 10^{5.25/20})^2 / 4) = 11.33$  dBi.

For 5250~5350:

Directional gain =  $10 \times \log((10^{4.4/20} + 10^{5.46/20})^2 / 2) = 7.96$  dBi.

For 5470~5725:

Directional gain =  $10 \times \log((10^{5.36/20} + 10^{6.58/20} + 10^{5.11/20} + 10^{6.25/20})^2 / 4) = 11.87$  dBi.

## 1.6 MPE EVALUATION OF SIMULTANEOUS TRANSMISSION

### *Non-beamforming mode*

Mode	Max Ratio of Each Mode
2.4GHz Radio 1	0.285
5GHz Radio 2	0.021
5GHz Radio 3	0.397
Sum	0.703
Limit	1
Pass / Fail	Pass

### *Beamforming mode*

Mode	Max Ratio of Each Mode
2.4GHz Radio 1	0.170
5GHz Radio 2	0.018
5GHz Radio 3	0.346
Sum	0.534
Limit	1
Pass / Fail	Pass

## 2 TEST LABORATORY INFORMATION

Established in 2012, ICC provides foremost EMC & RF Testing and advisory consultation services by our skilled engineers and technicians. Our services employ a wide variety of advanced edge test equipment and one of the widest certification extents in the business.

International Certification Corporation (EMC and Wireless Communication Laboratory), it is our definitive objective is to institute long term, trust-based associations with our clients. The expectation we set up with our clients is based on outstanding service, practical expertise and devotion to a certified value structure. Our passion is to grant our clients with best EMC / RF services by oriented knowledgeable and accommodating staff.

Our Test sites are located at Linkou District and Kwei Shan District. Location map can be found on our website <http://www.icertifi.com.tw>.

### **Linkou**

Tel: 886-2-2601-1640

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District, New Taipei City, Taiwan  
(R.O.C.)

### **Kwei Shan**

Tel: 886-3-271-8666

No.3-1, Lane 6, Wen San 3rd  
St., Kwei Shan Dist., Tao Yuan  
City 33381, Taiwan (R.O.C.)  
No.2-1, Lane 6, Wen San 3rd  
St., Kwei Shan Dist., Tao Yuan  
City 33381, Taiwan (R.O.C.)

### **Kwei Shan Site II**

Tel: 886-3-271-8640

No.14-1, Lane 19, Wen San 3rd  
St., Kwei Shan Dist., Tao Yuan  
City 333, Taiwan (R.O.C.)

If you have any suggestion, please feel free to contact us as below information.

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