

Company: Tarana Wireless

MPE Evaluation of: AA2-CN65AFP

To: FCC CFR 47 Chapter 1 Subpart §1.1310

Report No.: TARA25-MPE

MPE/RF EXPOSURE TEST REPORT



MPE/RF EXPOSURE TEST REPORT



MPE Evaluation of: Tarana Wireless AA2-CN65AFP
to

To: FCC CFR 47 Chapter 1 Subpart §1.1310

Test Report Serial No.: TARA25 - Absolute Air 2 FCC IC 5GHz

This report supersedes: NONE

Applicant: Tarana Wireless
2953 Bunker Hill Lane
Santa Clara, California 95054
USA

Product Function: Tarana Wireless fixed Multi-link
backhaul radio product

Issue Date: 6th December 2016

This Test Report is Issued Under the Authority of:

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1. MAXIMUM PERMISSABLE EXPOSURE

Calculations for Maximum Permissible Exposure Levels

$$\text{Power Density} = P_d (\text{mW/cm}^2) = \text{EIRP} / (4 * \pi * d^2)$$

$$\text{EIRP} = P * G$$

P = Peak output power (mW)

G = Antenna numeric gain (numeric)

d = Separation distance (cm)

$$\text{Numeric Gain} = 10 ^ (G (\text{dBi}) / 10)$$

Because the EUT belongs to the Occupational/Controlled Exposure the limit of power density is 5.0 mW/cm^2

These calculations represent worst case in terms of the exposure levels.

Freq. Band (MHz)	Ant Gain (dBi)	Numeric Gain (numeric)	Peak Output Power (dBm)	Peak Output Power (mW)	Calculated Safe Distance @ 5 mW/cm^2	Calculated Power Density @ 20cm (mW/cm^2)	Minimum Separation Distance (cm)
5150.0 - 5250.0	14.00	25.12	29.98	995.41	19.95	4.97	20.00
5725.0 - 5850.0	14.00	25.12	29.96	990.43	19.95	4.95	20.00

Assessment for simultaneous operation:

Freq. Band (MHz)	Ant Gain (dBi)	Numeric Gain (numeric)	Peak Output Power (dBm)	Peak Output Power (mW)	Calculated Safe Distance @ 5 mW/cm^2	Calculated Power Density @ 20cm (mW/cm^2)	Minimum Separation Distance (cm)
5150.0 - 5250.0	14.00	25.12	29.98	995.41	19.95	4.97	20.00
5725.0 - 5850.0	14.00	25.12	29.96	990.43	19.95	4.95	20.00
-							
EIRP TOTAL (mW/EIRP) : 49892.0					28.2	9.92	29.0

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Specification
Maximum Permissible Exposure Limits

FCC §1.1310 Limit = $5\text{mW} / \text{cm}^2$ from 1.310 Table 1
Because the EUT belongs to the Occupational/Controlled Exposure the limit of power density is $5.0\text{ mW}/\text{cm}^2$

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