

10 Appendix A - General Product Information

Radiofrequency radiation exposure evaluation

This exposure evaluation is intended for **FCC ID: 2AJOATX2059A**

According to FCC CFR 47 part1 1.1310, As specified in Table 1B of 47 CFR 1.1310 – Limits for Maximum Permissible Exposure (MPE), Limits for General Population/Uncontrolled Exposure

Frequency range (MHz)	Electric field strength (V/m)	Magnetic field strength (A/m)	Power density (mW/cm ²)	Averaging time (minutes)
(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
300-1,500			f/1500	30
1,500-100,000			1.0	30

MPE calculation method:

$P_d = (P \cdot G) / (4 \cdot \pi \cdot R^2)$, where

P_d = power density in mW/cm²

P = output power to antenna in mW

G = gain of antenna in linear scale

$\pi = 3.1416$

R = calculation distance in cm

>> The limit of Power density 433.865MHz is $433.865/1500=0.29\text{mW/cm}^2$

>> The antenna gain is 0dBi (=1 in linear scale).

Manufacturer specified the separation distance is: 20cm

The max. power (calculated power + tune up tolerance) of EUT at 433.865MHz is: 0.007mW

>> The P_d calculated of 433.865MHz is 0.000001mW/cm^2

Which is smaller than the threshold of the limit.

Therefore, the device is exempt from stand-alone SAR test requirements.

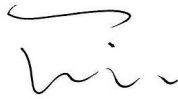
Power calculation (According to C63.10 chapter 9.5)

	433.865	MHz
Field Strength Measured (E)	73.32	dBμV/m
Measurement Distance (D)	3	m
Equivalent Isotropically Radiated Power (E.I.R.P in dBm)	-21.84	dBm
Equivalent Isotropically Radiated Power (E.I.R.P in mW)	0.007	mW

Remark: $\text{EIRP} = E + 20\log(D) - 104.7$

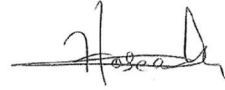
(EIRP is in dBm, E is in dBμV/m, D is in metres)

Reviewed by:



Eric LI
EMC Project Manager

Prepared by:



Hosea CHAN
EMC Project Engineer