

Prediction of MPE limit at a given distance

ERM5

Equation from page 18 of OET Bulletin 65, Edition 97-01

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

where: S = power density

P = power input to the antenna

G = power gain of the antenna in the direction of interest relative to an isotropic radiator

R = distance to the center of radiation of the antenna

Maximum peak output power at device output terminal:	<u>21.39</u>	(dBm)
Cable and Jumper loss	<u>0.0</u>	(dB)
Maximum peak output power at antenna input terminal:	<u>21.39</u>	(dBm)
Maximum peak output power at antenna input terminal:	<u>137.7209469</u>	(mW)
Single Antenna gain(typical):	<u>12</u>	(dBi)
Number of Antennae	<u>1</u>	
Total Antenna gain(typical):	<u>12</u>	(dBi)
Maximum antenna gain:	<u>15.84893192</u>	(numeric)
Prediction distance:	<u>20</u>	(cm)
Prediction frequency:	<u>5775</u>	(MHz)
MPE limit for uncontrolled exposure at prediction frequency:	<u>1</u>	(mW/cm ²)
Power density at prediction frequency:	<u>0.434240</u>	(mW/cm ²)
	<u>4.342403</u>	(W/m ²)
Maximum allowable antenna gain:	<u>15.62269855</u>	(dBi)
Margin of Compliance:	<u>3.622698554</u>	dB

