

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 antenna input terminal: 25.45 (dBm) EIRP

Maximum peak output power at antenna input terminal: 350.751874 (mW)

Antenna gain(typical): 0 (dBi)

Maximum antenna gain: 1 (numeric)

Prediction distance: 20 (cm)

Prediction frequency: 902.8 (MHz)

MPE limit for uncontrolled exposure at prediction frequency: 0.601866667 (mW/cm<sup>2</sup>)

Power density at prediction frequency: 0.069780 (mW/cm<sup>2</sup>)

Maximum allowable antenna gain: 9.357701467 (dBi)

Margin of Compliance: 9.357701467

The source based time averaged output power of this device is  $0.186/2 = 0.093$  watts.  
This is based on 50% duty cycle as described in the operational description.  
This is less than the  $1000/f(\text{GHz})^{0.5}$  threshold of section 4)c) of KDB 447498 for hand  
operated devices.