

Prediction of MPE limit at a given distance

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:30.0 (dBm)Maximum peak output power at antenna input terminal:1000.0 (mW)Antenna gain(maximum):42.5 (dBi)Maximum antenna gain:17782.8 (numeric)

 Time Averaging:
 100 (%)

 Prediction distance:
 1200 (cm)

Prediction frequency: 5800 (MHz)

MPE limit for uncontrolled exposure at prediction frequency: 1.000 (mW/cm^2)

Power density at prediction frequency: 0.983 (mW/cm^2)

This equates to: 9.83 W/m^2