

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: 18.40 (dBm)

Maximum peak output power at antenna input terminal: 69.18309709 (mW)

Antenna gain(typical): 1 (dBi)

Maximum antenna gain: 1.258925412 (numeric)

Time Averaging: 4 (%)

Prediction distance: 20 (cm)

Prediction frequency: 1924 (MHz)

MPE limit for uncontrolled exposure at prediction frequency: 1 (mW/cm^2)

Power density at prediction frequency: 0.000693 (mW/cm^2)

Margin of compliance: -31.6 (dB)

This equates to 0.006930908 W/m^2