



### 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 isotropic

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	(mW)
Antenna gain(typical):	8	(dBi)
Maximum antenna gain:	6.31	(numeric)
Prediction distance:	20	(cm)
Cable loss:	4	(dB)
Prediction frequency:	902	(MHz)
MPE limit for uncontrolled exposure at prediction frequency:	0.60	(mW/cm^2)
Power density at prediction frequency:	0.50	(mW/cm^2)
Power density at prediction frequency:	5.00	(W/m^2)
Margin of Compliance:	0.80	(dB)