

## CALCULATION OF RF HAZARD LIMITS (MPE)

FOXCOT WIRELESS LTD

FCC ID: OJFLITENNA0LF0SP1

RF Hazard Distance

Calculation

Maximum antenna gain, per user manual: 10 dBi

mW/cm<sup>2</sup> from Table1:                      0.60                      = f/1500                      (f = 869 MHz)

Max RF Power P, dBm	TX Antenna G, dBi	MPE Safe Distance, cm
24.0	10.0	18.3

**Basis of Calculations:**

$E^2/3770 = S$ , mW/cm<sup>2</sup>

$E$ , V/m =  $(P_{\text{watts}} * G_{\text{gain}} * 30)^{.5} / d$ , meters

$d = ((P_{\text{watts}} * G * 30) / 3770 * S)^{.5}$

$P_{\text{watts}} * G_{\text{gain}} = 10^{(P_{\text{dBm}} - 30 + G_{\text{dBi}}) / 10}$

**NOTE: For mobile or fixed location transmitters, minimum separation distance is 20 cm, even if calculations indicate MPE distance is less**