

RF EXPOSURE STATEMENT

RF Exposure Calculations:

$$\text{Because } S = \frac{PG}{4\pi R^2}$$

$$\begin{aligned}\text{So } R &= \sqrt{PG/4\pi S} \\ &= \sqrt{[(1.845 \times 10^{-5}) \times 0.89]/(4\pi \times 0.24)} \\ &= \sqrt{(1.64205 \times 10^{-5})/3.015928947} \\ &= 2.333364766 \times 10^{-3} \cong 1 \text{ cm}\end{aligned}$$

Where $S = 0.24 \text{ mW/cm}^2$ (27MHz)

$P = 1.845 \times 10^{-5} \text{ mW}$ (peak power)

$G = \text{Log}^{-1} (-0.5/10) = 0.89$