

Applicant: PointRed Technologies Inc.
 1283 Old Mountain View Alviso Road
 Suite B
 Sunnyvale, CA 94089

FCC ID: QDU-MCRD-BASE-2R5

The following antennas are recommended by the manufacturer for use with this MMDS base station:

Base Station:

Til-Tek 10 dBi omni TA-2550

Maxrad 7 dBi omni MFB25007

RadioWaves 90 deg sector, 13 dBi SEC-25H-90 for horizontal and SEC-25V-90 for vertical polarization

RF Hazard Distance Calculation

MPE Calculati

mW/cm2 from Table1:

1.00

Max RF Power P, dBm	TX Antenna G, dBi	MPE Safe Distance, cm	Antenna Type
25.1	13.0	22.7	90 deg sector
25.1	10.0	16.0	omni
25.1	7.0	11.4	omni

Basis of Calculations:

$$E^2/3770 = S, \text{ mW/cm}^2$$

$$E, \text{ V/m} = (\text{Pwatts} * \text{Ggain} * 30)^{.5} / d, \text{ meters}$$

$$d = ((\text{Pwatts} * \text{G} * 30) / 3770 * S)^{0.5}$$

$$\text{Pwatts} * \text{Ggain} = 10^{(\text{PdBm} - 30 + \text{GdBi}) / 10}$$

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