

| Antenna Type      | Manufacturer | Model Number | Mid-band Gain (dBi) |
|-------------------|--------------|--------------|---------------------|
| 1 Foot Flat Panel | Gabriel      | DFPD1-52     | 23.5                |
|                   | Andrew       | FPA5250D12-N | 23.6                |
| 2 Foot Flat Panel | Gabriel      | DFPD2-52     | 28                  |
|                   | Andrew       | FPA5250D24-N | 28.2                |
| 2 Foot Parabolic  | Gabriel      | SSP2-52B     | 28.5                |
|                   | Gabriel      | SSD2-52A     | 28.4                |
|                   | Gabriel      | HSSP2-52     | 28.1                |
|                   | Radio Waves  | SP2-5.2      | 28.3                |
|                   | Radio Waves  | SPD2-5.2     | 28.1                |
|                   | Andrew       | P2F-52       | 29.4                |
|                   | Andrew       | PX2F-52      | 29.4                |
| 3 Foot Parabolic  | Radio Waves  | SP3-5.2      | 31.4                |
|                   | Radio Waves  | SPD3-5.2     | 31.1                |
|                   | Andrew       | P3F-52       | 33.4                |
|                   | Andrew       | PX3F-52      | 33.4                |
| 4 Foot Parabolic  | Gabriel      | SSP4-52A     | 34.2                |
|                   | Gabriel      | SSD4-52      | 34.1                |
|                   | Gabriel      | HSSP4-52     | 33.9                |
|                   | Radio Waves  | SP4-5.2      | 34.6                |
|                   | Radio Waves  | SPD4-5.2     | 34.4                |
| 6 Foot Parabolic  | Gabriel      | SSP6-52A     | 37.5                |
|                   | Gabriel      | SSD6-52      | 37.4                |
|                   | Gabriel      | HSSP6-52     | 37.2                |
|                   | Radio Waves  | SP6-5.2      | 37.7                |
|                   | Radio Waves  | SPD6-5.2     | 37.5                |
| 8 Foot Parabolic  | Gabriel      | SSP8-52      | 39.8                |
|                   | Gabriel      | SSD8-52      | 39.7                |
|                   | Gabriel      | HSSP8-52     | 39.6                |

| Feeder Loss Type | Manufacturer | Model Number | Loss/100' | Notes                        |
|------------------|--------------|--------------|-----------|------------------------------|
| 1/2" foam coax   | Andrew       | LDF 4-50     | 6.6 dB    | add ~0.25 dB per connector   |
| 5/8" foam coax   | Andrew       | LDF 4.5-50   | 4.7 dB    | add ~0.25 dB per connector   |
| Waveguide        | Andrew       | EW-52        | 1.2 dB    | does not include transitions |

**Formula for determining maximum output power setting for 5.25-5.35 GHz U-NII (LE-LAN) Transmitters (@ EIRP=30dBm):**

Max Tx (dBm) is the lesser of 23dBm and  $30 - G + FL$

where: G = Antenna Gain

FL = Feeder Loss including connectors

**Note:**

All Western Multiplex radios require professional installation.

Antennas with gain less than 23.5 dBi are not allowed

Antennas of other make may be used with the HZB-U53-45 device, but must be of the same type, dimensions and gain as those listed