5G LTE TRANSIT ANTENNA

698-3800 MHz & 5700-5800 MHz

TLA4100, TLA4200



The TLA4100/4200 transit antenna is designed specifically for rail, light rail, bus applications and other similar demanding transit or stationary application. With a VSWR less that 2.5:1 covering 698-3800 MHz & 5700-5800 MHz, the TLA4100/4200 operate in all cellular bands globally plus the 2.5 & 5.5 GHz ISM bands. In addition, the TLA4200 incorporates an active GPS antenna for asset tracking and AVL applications. Designed utilising a high impart, UV stabilised Low Flame, Smale and Toxicity (FST) radome, the TLA4100/4200 is IP68 rated to fully protect against the ingress of dust & water.



Features:

- NF-F-16-101/102 (materials standard)
- EN50155 (vibration standard)
- EN50124-1 (electrical isolation standard)
- Functions with or without a ground plane*

Electrical

| Model Number | TLA4100 / 4200 | | | | |
|----------------------|----------------|-----------|-----------|-----------|-----------|
| Frequency MHz | 698-960 | 1710-2170 | 2300-2700 | 3400-3800 | 5700-5800 |
| Peak Gain dBi | 5 | 6 | 3 | 6 | 7 |
| Tuned Bandwidth | Full | | | | |
| VSWR | <2.5:1 | | | | |
| Nominal Impedance Ω | 50 | | | | |
| Vertical Beamwidth | 38° | 180° | 155° | 60° | 40° |
| Horizontal Beamwidth | Omni-direction | | | | |

Mechanical

| Model Number | TLA4100 / 4200 | | |
|---------------|--|--|--|
| Construction | NF-F-16-102 compliant injection moulded radome / cast aluminium alloy base | | |
| Area mm | 205 x 100 | | |
| Height mm | 90 including gasket | | |
| Termination | Antenna Port: Fixed N-female GPS Port: Fixed TNC-female (TLA4200) | | |
| Mounting Area | 4 x M6 screws (not included) | | |

GPS (TLA4200 only)

| Model Number | TLA4100 / 4200 | | |
|------------------------------------|--|--|--|
| Frequency MHz | 1575.42 | | |
| Operation Temperature °C | -40 to +85 | | |
| Storage Temperature °C | -40°C to +100 | | |
| System Gain dBi | 28 (including cable and filter losses) | | |
| Impedance Ohm | 50 | | |
| Polarization | RHCP | | |
| VSWR | 1.5:1 | | |
| Noise Figure dB | <1.8 max. | | |
| Power Input Vdc | +2.5 VDC to +12 VDC input, Auto Switching | | |
| Power Consumption mA | 11 to 13 (max) | | |
| Typical Isolation Between Ports dB | >36 for 698-960 MHz, >30 for 1710-2170 MHz, >38 for 2300-5800MHz | | |

^{*} Nominated gain & VSWR achieved using a 1m² ground plane