

XXXPol 617~894MHz/1427~2690MHz×2 65°/65° 16.4/17.8dBi 2°~12°/2°~12° Integrated and replaceable RCU (Remote Control Unit) Antenna

Electrical specifications

| Frequency Range (MHz) | R1-617~894 | | |
|---|------------|----------|----------|
| | 617~698 | 698~806 | 806~894 |
| Polarization | ±45° | | |
| Gain at mid tilt (dBi) | 15.1 | 15.7 | 16.4 |
| Gain over all tilts (dBi) | 14.9±0.5 | 15.5±0.5 | 16.2±0.5 |
| Horizontal 3dB beamwidth (°) | 69±6 | 68±5 | 66±4 |
| Vertical 3dB beamwidth (°) | 9.7±1.3 | 8.5±1.0 | 7.6±0.7 |
| Front to back ratio (dB) Total power, ±30° | >22 | >25 | >26 |
| Cross polar ratio (dB) (at Boresight) | >17 | >17 | >17 |
| Electrical downtilt (°) | 2~12 | | |
| Sidelobe suppression (dB) (First sidelobe above main beam) | >16 | >15 | >15 |
| VSWR | <1.5 | | |
| Isolation: intra-system (dB) | ≥25 | | |
| Isolation: inter-system (dB) | ≥28 | | |
| Intermodulation IM3 (2×43dBm carrier) | ≤-153 dBc | | |
| Impedance (Ω) | 50 | | |
| Max. power per input (W) @50°C | 400 | | |
| Lightning protection | Dc Ground | | |

Electrical specifications

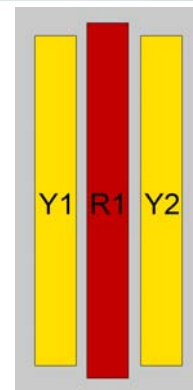
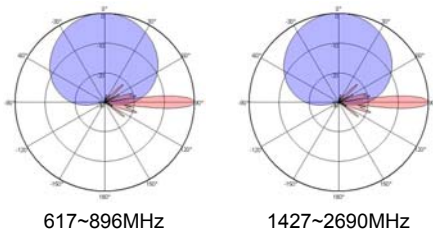
| Frequency Range (MHz) | Y1/Y2-1427~2690 | | | | |
|---|-----------------|-----------|-----------|-----------|-----------|
| | 1427~1518 | 1710~1990 | 1920~2200 | 2200~2490 | 2490~2690 |
| Polarization | ±45° | | | | |
| Gain at mid tilt (dBi) | 15.6 | 17.0 | 17.6 | 17.8 | 17.6 |
| Gain over all tilts (dBi) | 15.4±0.5 | 16.9±0.5 | 17.4±0.5 | 17.6±0.5 | 17.4±0.5 |
| Horizontal 3dB beamwidth (°) | 69±6 | 65±5 | 62±4 | 57±5 | 59±5 |
| Vertical 3dB beamwidth (°) | 8.8±0.7 | 7.3±0.6 | 6.2±0.5 | 5.7±0.5 | 5.1±0.5 |
| Front to back ratio (dB) Total power, ±30° | >24 | >26 | >26 | >26 | >25 |
| Cross polar ratio (dB) (at Boresight) | >51 | >15 | >15 | >15 | >15 |
| Electrical downtilt (°) | 2~12 | | | | |
| Sidelobe suppression (dB) (First sidelobe above main beam) | >16 | >15 | >15 | >15 | >15 |
| VSWR | <1.5 | | | | |
| Isolation: intra-system (dB) | ≥25 | | | | |
| Isolation: inter-system (dB) | ≥28 | | | | |
| Intermodulation IM3 (2×43dBm carrier) | ≤-153 dBc | | | | |
| Impedance (Ω) | 50 | | | | |
| Max. power per input (W) @50°C | 200 | | | | |
| Lightning protection | Dc Ground | | | | |

Mechanical specifications

| | |
|--|-----------------|
| Connector | 6×4.3-10-Female |
| Connector position | Bottom |
| Height × width × depth (mm) | 2680×355×165 |
| Packing size (mm) | 3065×460×260 |
| Antenna weight (kg) | 29.5 |
| Installation kit weight (kg) | 5.4 |
| Packing weight (kg) | 40 |
| Wind load (N,at 150km/h) Frontal/Lateral/Rearside | 1209/375/1352 |
| Max. wind velocity (km/h) | 216 |
| Radome material | Fiberglass |
| Radome color | Gray |
| Mechanical tilt (°) | 0~8 |
| Operating temperature (°C) | -50~65 |
| Mounting hardware (mm) | Φ50~Φ115 |


Integrated RET properties

| | |
|------------------------------|--|
| RET model | TRCU-TQ10P2V01 |
| RET type | Integrated (Replaceable) |
| RET protocol | AISG 2.0/3GPP |
| Power supply(V) | 10-30 DC |
| Power consumption(W) | ≤0.6 (Idle, 12V), ≤6 (In motion, 12V) |
| Adjustment time (Full Range) | < 4Mins |
| Adjustment cycles | > 50,000 |
| Temperature range (°C) | -40~65 |
| Lightning protection | 3KA(8/20μs) @ Pin5 & Pin3; 5KA(8/20μs) @ Pin1 / Pin6 & Pin7 |
| Connectors | 2×8 Pin circle connector according to IEC 60130-9 and AISG. Daisy chain in: Male, Daisy chain out: Female Pin1: 12V; Pin3: RS485B; Pin5: RS485A; Pin6: 10-30V; Pin7: GND; Pin2 & Pin4 & Pin8: N/C |


Antenna pattern sample for reference


| Ant Array | RET Unique ID |
|-----------|----------------|
| R1 | TY00000.....R1 |
| Y1 | TY00000.....Y1 |
| Y2 | TY00000.....Y2 |