

XXXXXPoI 698~960MHz/1710~2690MHz×4 65°/Dual-beam 33° 16.2/18.5dBi 2°~12°/2°~10°
 Integrated and replaceable RCU (Remote Control Unit) Antenna

Electrical specifications

Frequency Range (MHz)	R1-698~960			
	698~803	790-862	824~894	880~960
Polarization	±45°			
Gain at mid tilt (dBi)	15.4	15.7	16.1	16.5
Gain over all tilts (dBi)	15.2±0.5	15.5±0.6	15.9±0.5	16.3±0.5
Horizontal 3dB beamwidth (°)	70±5	66±5	63±5	60±5
Vertical 3dB beamwidth (°)	8.9±0.7	8.2±0.5	8±0.4	7.5±0.4
Front to back ratio (dB)	>25	>25	>25	>26
Total power, ±30°				
Cross polar ratio (dB) (at Boresight)	>17	>17	>18	>18
Electrical downtilt (°)	2~12			
Sidelobe suppression (dB) (First sidelobe above main beam)	>16	>16	>16	>16
VSWR	<1.5			
Isolation: intra-system (dB)	≥25			
Isolation: inter-system (dB)	≥25			
Intermodulation IM3 (2×43dBm carrier)	≤-150 dBc			
Impedance (Ω)	50			
Max. power per input (W) @50°C	400			
Lightning protection	DC Ground			

Electrical specifications

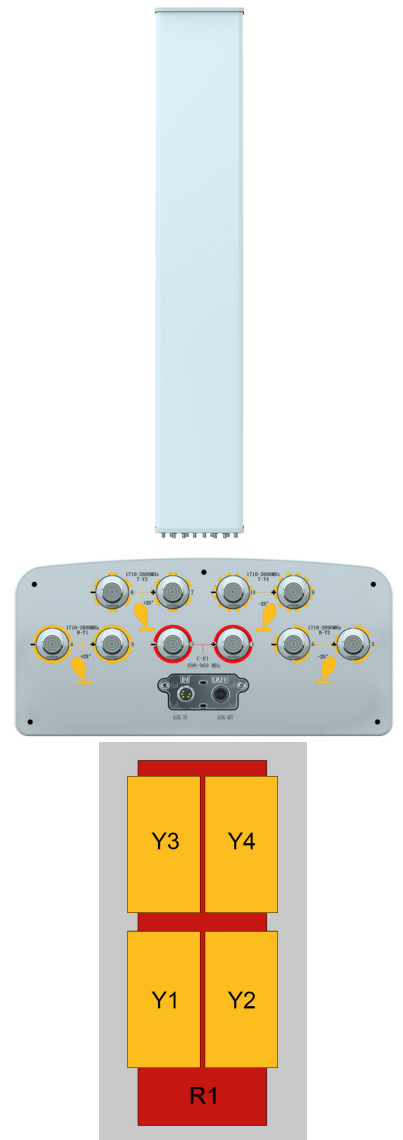
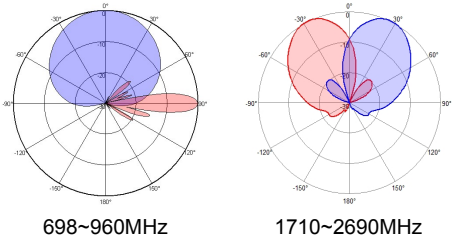
Frequency Range (MHz)	Y1/Y2,Y3/Y4: 1710~2690×4			
	1710~1990	1920~2200	2200~2490	2490~2690
Polarization	±45°			
Gain at mid tilt (dBi) (Bottom)	17.7	18.0	18.5	18.2
Gain over all tilts (dBi) (Bottom)	17.5±0.8	17.8±0.7	18.3±0.6	18.0±0.6
Gain at mid tilt (dBi) (Top)	17.3	17.6	18.1	17.8
Gain over all tilts (dBi) (Top)	17.1±0.8	17.4±0.7	17.9±0.6	17.6±0.6
Horizontal beam centers (°)	±27	±25	±23	±22
Horizontal 3dB beamwidth (°)	33±3	30±3	27±3	24±3
Vertical 3dB beamwidth (°)	7.5±0.5	6.5±0.4	5.8±0.5	5.2±0.4
Front to back ratio (dB)	>25	>26	>26	>25
Total power, ±30°				
Electrical downtilt (°)	2~10			
Sidelobe suppression (dB) (First sidelobe above main beam)	>16	>16	>16	>16
VSWR	<1.5			
Isolation: intra-system (dB)	≥25			
Isolation: beam to beam (dB)	>15			
Intermodulation IM3 (2×43dBm carrier)	≤-150 dBc			
Impedance (Ω)	50			
Max. power per input (W) @50°C	250			
Lightning protection	Dc Ground			

Mechanical specifications

Connector	10×4.3-10 Female
Connector position	Bottom
Height × width × depth (mm)	2780×355×165
Packing size (mm)	3165×460×260
Antenna weight (kg)	42
Installation kit weight (kg)	8.8
Packing weight (kg)	57.2
Wind load (N,at 150km/h) Frontal/Lateral/Rearside	1267/392/1416
Max. wind velocity (km/h)	250
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
Y3	TY00000.....Y3
Y4	TY00000.....Y4