

XXXXXXPol 698~960MHz×2/1695~2690MHz×4 65°/65° 11.4/14.8dBi 2°~12°/2°~12° Integrated and replaceable RCU (Remote Control Unit) Antenna

Electrical Specifications			
Frequency range (MHz)	R1/R2 -698~960		
	698~803	824~894	880~960
Polarization	±45°		
Gain at mid tilt (dBi)	10.7	11.1	11.4
Gain over all tilts (dBi)	10.5±0.7	10.9±0.6	11.2±0.5
Horizontal 3dB beamwidth (°)	67±7	66±6	62±5
Vertical 3dB beamwidth (°)	26±2	23±2	22±2
Front to back ratio (dB)	>20	>21	>21
Total power, ±30°			
Cross polar ratio (dB) (at Boresight)	>18	>18	>18
Electrical downtilt (°)	2~12		
Sidelobe suppression (dB) (First sidelobe above main beam)	>14	>14	>14
VSWR	<1.5		
Isolation: intra-system (dB)	≥23		
Isolation: inter-system (dB)	≥23		
Intermodulation IM3 (2×43dBm carrier)	≤-150 dBc		
Impedance (Ω)	50		
Max. power per input (W) @50°C	200		
Lightning protection	Dc Ground		

Electrical Specifications				
Frequency Range (MHz)	Y1/Y2/Y3/Y4-1695~2690			
	1695~1990	1920~2200	2200~2490	2490~2690
Polarization	±45°			
Gain at mid tilt (dBi)	13.2	13.7	14.5	14.8
Gain over all tilts (dBi)	13.0±0.7	13.6±0.5	14.3±0.5	14.6±0.5
Horizontal 3dB beamwidth (°)	67±6	66±7	63±6	60±5
Vertical 3dB beamwidth (°)	13.5±1.2	12.0±1.0	10.6±0.5	9.6±0.7
Front to back ratio (dB)	>24	>24	>25	>25
Total power, ±30°				
Cross polar ratio (dB) (at Boresight)	>18	>18	>18	>18
Electrical downtilt (°)	2~12			
Sidelobe suppression (dB) (First sidelobe above main beam)	>15	>15	>15	>15
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	200			
Lightning protection	Dc Ground			

Values calculated according to NGMN BASTA v12.0 requirements.

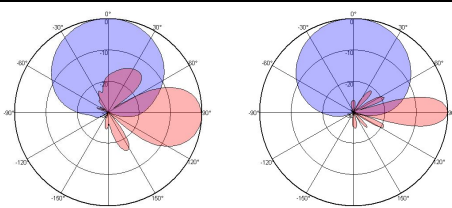
Mechanical Specifications

Connector	12×7/16DIN Female
Connector position	Bottom
Height × width × depth (mm)	800×469×198
Packing size (mm)	1070×535×250
Antenna weight (kg)	16.5
Installation kit weight (kg)	5.7
Packing weight (kg)	24.5
Wind load (N,at 150km/h) Frontal/Lateral/Rear	220/65/280
Max. wind velocity (km/h)	250
Radome material	Fiberglass, UV resistant
Radome color	Gray
Mechanical tilt (°)	0-15
Operating temperature (°C)	-40~70
Mounting hardware (mm)	Φ50~Φ115

Integrated RET Properties

RET model	TRCU-TM20P2V03
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)	-40~70
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



698~960MHz

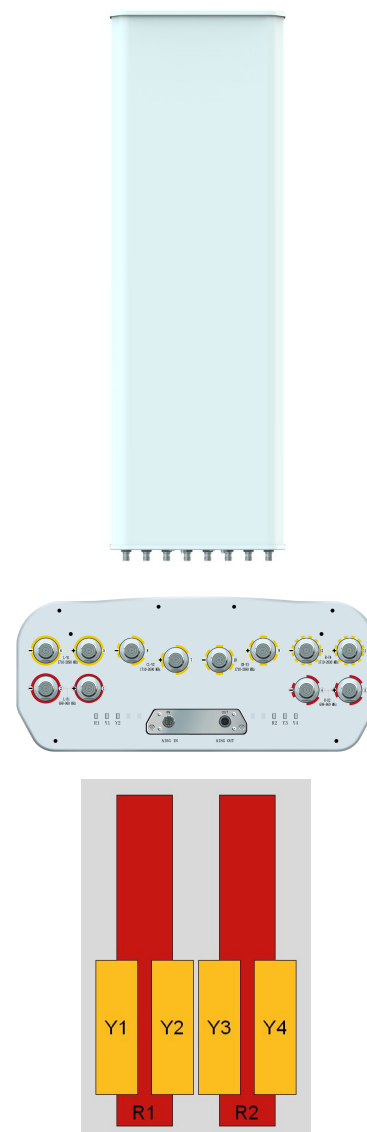
1695~2690MHz

Additional Information:

Radiator material: Aluminum and low loss circuit board
Reflector material: Aluminum

Compliance

- 1, Quality assurance system and environmental management system: ISO9001, ISO14001, ISO45001.
- 2, Environmentally relevant standards: CE, RoHS, REACH, WEEE.



Ant Array	RET Unique ID
R1	TY00000.....R1
R2	TY00000.....R2
Y1	TY00000.....Y1
Y2	TY00000.....Y2
Y3	TY00000.....Y3
Y4	TY00000.....Y4