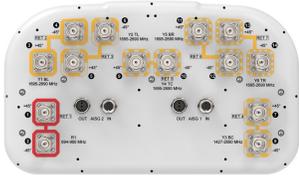


RZV5-65D-R7



14-port sector antenna, 2x 694–960, 2x 1427–2690 and 10x 1695–2690 MHz, 65° HPBW, 7x RET

- All Internal RET actuators are connected in "Cascaded SRET" configuration
- Uses the 4.3-10 connector which is 40 percent smaller than the 7-16 DIN connector
- Supports re-configurable antenna sharing capability enabling control of the internal RET system using up to two separate RET compatible OEM radios
- Antenna shape optimized for wind load reduction

General Specifications

| | |
|---|--|
| Antenna Type | Sector |
| Band | Multiband |
| Color | Light Gray (RAL 7035) |
| Grounding Type | RF connector inner conductor and body grounded to reflector and mounting bracket |
| Performance Note | Outdoor usage |
| Radome Material | Fiberglass, UV resistant |
| Reflector Material | Aluminum |
| RF Connector Interface | 4.3-10 Female |
| RF Connector Location | Bottom |
| RF Connector Quantity, high band | 12 |
| RF Connector Quantity, mid band | 0 |
| RF Connector Quantity, low band | 2 |
| RF Connector Quantity, total | 14 |

Remote Electrical Tilt (RET) Information

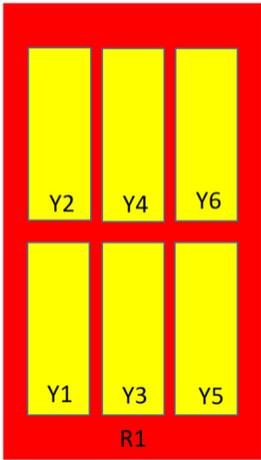
| | |
|---|-----------------------------------|
| RET Hardware | CommRET v2 |
| RET Interface | 8-pin DIN Female 8-pin DIN Male |
| RET Interface, quantity | 2 female 2 male |
| Input Voltage | 10–30 Vdc |
| Internal RET | High band (6) Low band (1) |
| Power Consumption, active state, maximum | 8 W |
| Power Consumption, idle state, maximum | 1 W |
| Protocol | 3GPP/AISG 2.0 (Single RET) |

RZV5-65D-R7

Dimensions

| | |
|---|----------------------|
| Width | 395 mm 15.551 in |
| Depth | 228 mm 8.976 in |
| Length | 2688 mm 105.827 in |
| Net Weight, without mounting kit | 38.7 kg 85.319 lb |

Array Layout

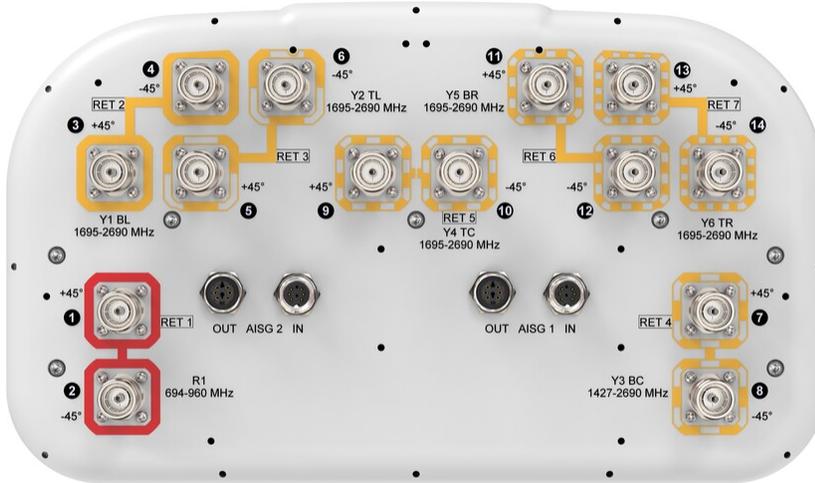


| Array | Freq (MHz) | Conns | RET (SRET) | AISG RET UID |
|-------|------------|-------|------------|------------------|
| R1 | 694-960 | 1-2 | 1 | CPxxxxxxxxxxxxR1 |
| Y1 | 1695-2690 | 3-4 | 2 | CPxxxxxxxxxxxxY1 |
| Y2 | 1695-2690 | 5-6 | 3 | CPxxxxxxxxxxxxY2 |
| Y3 | 1427-2690 | 7-8 | 4 | CPxxxxxxxxxxxxY3 |
| Y4 | 1695-2690 | 9-10 | 5 | CPxxxxxxxxxxxxY4 |
| Y5 | 1695-2690 | 11-12 | 6 | CPxxxxxxxxxxxxY5 |
| Y6 | 1695-2690 | 13-14 | 7 | CPxxxxxxxxxxxxY6 |

(Sizes of colored boxes are not true depictions of array sizes)

Port Configuration

RZV5-65D-R7



Electrical Specifications

| | |
|-----------------------------------|---|
| Impedance | 50 ohm |
| Operating Frequency Band | 1427 – 2690 MHz 1695 – 2690 MHz 694 – 960 MHz |
| Polarization | ±45° |
| Total Input Power, maximum | 1,000 W @ 50 °C |

Electrical Specifications

| Frequency Band, MHz | 694–790 | 790–890 | 890–960 | 1695–1920 | 1920–2200 | 2300–2500 | 2500–2690 | 1427–1518 | 1695–2690 |
|--|---------|---------|---------|-----------|-----------|-----------|-----------|-----------|-----------|
| Gain, dBi | 16.4 | 17 | 17 | 16.8 | 17.7 | 17.9 | 17.8 | 15 | 17.6 |
| Beamwidth, Horizontal, degrees | 66 | 63 | 63 | 69 | 63 | 61 | 62 | 70 | 59 |
| Beamwidth, Vertical, degrees | 9 | 8 | 7.4 | 7.2 | 6.5 | 5.8 | 5.5 | 9.6 | 6.9 |
| Beam Tilt, degrees | 2–12 | 2–12 | 2–12 | 2–12 | 2–12 | 2–12 | 2–12 | 2–12 | 2–12 |
| USLS (First Lobe), dB | 22 | 24 | 24 | 17 | 18 | 18 | 18 | 20 | 15 |
| Front-to-Back Ratio at 180°, dB | 41 | 35 | 33 | 34 | 37 | 35 | 32 | 32 | 39 |
| Isolation, Cross | 27 | 27 | 27 | 27 | 27 | 27 | 27 | 25 | 25 |

RZV5-65D-R7

Polarization, dB

| | | | | | | | | | |
|--|----------|----------|----------|----------|----------|----------|----------|----------|----------|
| Isolation, Inter-band, dB | 28 | 28 | 28 | 25 | 25 | 25 | 25 | 25 | 25 |
| VSWR Return loss, dB | 1.5 14.0 | 1.5 14.0 | 1.5 14.0 | 1.5 14.0 | 1.5 14.0 | 1.5 14.0 | 1.5 14.0 | 1.5 14.0 | 1.5 14.0 |
| PIM, 3rd Order, 2 x 20 W, dBc | -153 | -153 | -153 | -153 | -153 | -153 | -153 | -153 | -153 |
| Input Power per Port at 50° C, maximum, watts | 250 | 250 | 250 | 200 | 200 | 200 | 200 | 250 | 200 |

Mechanical Specifications

| | |
|---|---|
| Wind Loading @ Velocity, frontal | 430.0 N @ 150 km/h (96.7 lbf @ 150 km/h) |
| Wind Loading @ Velocity, lateral | 390.0 N @ 150 km/h (87.7 lbf @ 150 km/h) |
| Wind Loading @ Velocity, maximum | 864.0 N @ 150 km/h (194.2 lbf @ 150 km/h) |
| Wind Loading @ Velocity, rear | 492.0 N @ 150 km/h (110.6 lbf @ 150 km/h) |
| Wind Speed, maximum | 241 km/h (150 mph) |

Packaging and Weights

| | |
|-----------------------|----------------------|
| Width, packed | 505 mm 19.882 in |
| Depth, packed | 386 mm 15.197 in |
| Length, packed | 2831 mm 111.457 in |
| Weight, gross | 58.9 kg 129.852 lb |

Regulatory Compliance/Certifications

| Agency | Classification |
|---------------|--|
| CHINA-ROHS | Below maximum concentration value |
| ISO 9001:2015 | Designed, manufactured and/or distributed under this quality management system |
| ROHS | Compliant |
| UK-ROHS | Compliant |



Included Products

| | | |
|----------|---|--|
| BSAMNT-4 | – | Wide Profile Antenna Downtilt Mounting Kit for 2.4 - 4.5 in (60 - 115 mm) OD round members. Kit contains one scissor top bracket set and one bottom bracket set. |
|----------|---|--|

* Footnotes

| | |
|-------------------------|---|
| Performance Note | Severe environmental conditions may degrade optimum performance |
|-------------------------|---|

RZV5-65D-R7

