

RVV65D-C3-3XR



6-port sector antenna, 2x 694–960 and 4x 1695–2690 MHz, 65° HPBW, 3x 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

General Specifications

Antenna Type	Sector
Band	Multiband
Grounding Type	RF connector inner conductor and body grounded to reflector and mounting bracket
Performance Note	Outdoor usage Wind loading figures are validated by wind tunnel measurements described in white paper WP-112534-EN
Radome Material	Fiberglass, UV resistant
Radiator Material	Low loss circuit board
Reflector Material	Aluminum
RF Connector Interface	4.3-10 Female
RF Connector Location	Bottom
RF Connector Quantity, high band	4
RF Connector Quantity, low band	2
RF Connector Quantity, total	6

Remote Electrical Tilt (RET) Information

RET Interface	8-pin DIN Female 8-pin DIN Male
RET Interface, quantity	1 female 1 male
Input Voltage	10–30 Vdc
Internal RET	High band (2) Low band (1)
Power Consumption, idle state, maximum	2 W
Power Consumption, normal conditions, maximum	13 W
Protocol	3GPP/AISG 2.0 (Single RET)

Dimensions

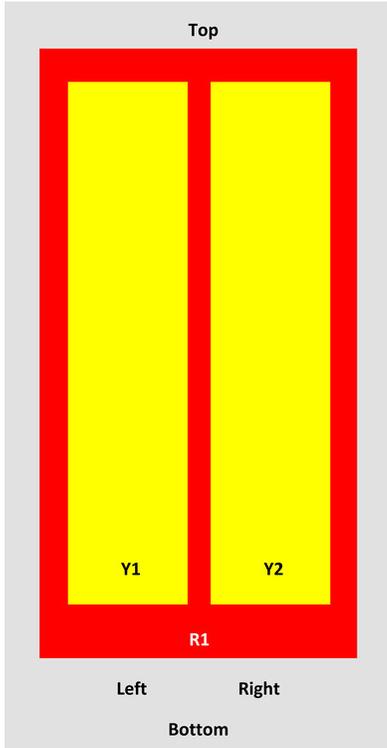
Width	301 mm 11.85 in
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Depth	180 mm 7.087 in
Length	2645 mm 104.134 in
Net Weight, without mounting kit	27.5 kg 60.627 lb

Array Layout

RVV65B-C3-3XR, RVV65D-C3-3XR



Array	Freq (MHz)	Conns	RET (SRET)	AISG RET UID
R1	694-960	1-2	1	ANXXXXXXXXXXXXX1
Y1	1695-2690	3-4	2	ANXXXXXXXXXXXXX2
Y2	1695-2690	5-6	3	ANXXXXXXXXXXXXX3

View from the front of the antenna
(Sizes of colored boxes are not true depictions of array sizes)

Electrical Specifications

Impedance	50 ohm
Operating Frequency Band	1695 – 2690 MHz 694 – 960 MHz
Polarization	±45°
Total Input Power, maximum	650 W @ 50 °C

Electrical Specifications

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Frequency Band, MHz	694-790	790-890	890-960	1695-1920	1920-2200	2300-2500	2500-2690
Gain, dBi	16.3	17	17	18.1	18.9	19.3	19.2
Beamwidth, Horizontal, degrees	71	70	67	62	60	62	65
Beamwidth, Vertical, degrees	8.1	7.4	6.8	5.6	5	4.3	4.1
Beam Tilt, degrees	0-10	0-10	0-10	2-12	2-12	2-12	2-12
USLS (First Lobe), dB	16	22	18	21	20	21	20
Front-to-Back Ratio at 180°, dB	29	33	31	29	34	33	31
Isolation, Cross Polarization, dB	28	28	28	28	28	28	28
Isolation, Inter-band, dB	30	30	30	30	30	30	30
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
PIM, 3rd Order, 2 x 20 W, dBc	-150	-150	-150	-150	-150	-150	-150
Input Power per Port at 50°C, maximum, watts	300	300	300	250	250	200	200

Electrical Specifications, BASTA

Frequency Band, MHz	694-790	790-890	890-960	1695-1920	1920-2200	2300-2500	2500-2690
Gain by all Beam Tilts, average, dBi	15.9	16.7	16.7	17.6	18.5	18.9	18.7
Gain by all Beam Tilts Tolerance, dB	±0.6	±0.2	±0.3	±0.8	±0.4	±0.4	±0.6
Gain by Beam Tilt, average, dBi	0° 15.8 5° 15.9 10° 15.9	0° 16.7 5° 16.8 10° 16.6	0° 16.9 5° 16.9 10° 16.4	2° 17.4 7° 17.7 12° 17.6	2° 18.4 7° 18.6 12° 18.4	2° 18.7 7° 19.0 12° 18.6	2° 18.5 7° 18.9 12° 18.4
Beamwidth, Horizontal Tolerance, degrees	±2.5	±1.6	±2.3	±4.2	±5	±6.3	±4.5
Beamwidth, Vertical Tolerance, degrees	±0.4	±0.4	±0.3	±0.4	±0.2	±0.2	±0.2
USLS, beampeak to 20° above beampeak, dB	14	15	15	14	15	15	15
Front-to-Back Total Power at 180° ± 30°, dB	23	25	23	25	25	27	26
CPR at Boresight, dB	21	21	21	18	17	18	20
CPR at Sector, dB	12	14	11	12	9	6	8

Mechanical Specifications

Wind Loading @ Velocity, frontal 433.0 N @ 150 km/h (97.3 lbf @ 150 km/h)

Wind Loading @ Velocity, lateral 367.0 N @ 150 km/h (82.5 lbf @ 150 km/h)

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Wind Loading @ Velocity, maximum	834.0 N @ 150 km/h (187.5 lbf @ 150 km/h)
Wind Loading @ Velocity, rear	439.0 N @ 150 km/h (98.7 lbf @ 150 km/h)
Wind Speed, maximum	241 km/h (150 mph)

Packaging and Weights

Width, packed	380 mm 14.961 in
Depth, packed	295 mm 11.614 in
Length, packed	2778 mm 109.37 in
Weight, gross	45.3 kg 99.869 lb

Regulatory Compliance/Certifications

Agency	Classification
CE	Compliant with the relevant CE product directives
CHINA-ROHS	Above maximum concentration value
ISO 9001:2015	Designed, manufactured and/or distributed under this quality management system
REACH-SVHC	Compliant as per SVHC revision on www.commscope.com/ProductCompliance
ROHS	Compliant/Exempted
UK-ROHS	Compliant/Exempted



Included Products

BSAMNT-3	-	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.
BSAMNT-M	-	Middle Downtilt Mounting Kit for Long Antennas for 2.4 - 4.5 in (60 - 115 mm) OD round members. Kit contains one scissor bracket set.

* Footnotes

Performance Note	Severe environmental conditions may degrade optimum performance
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