

JAHH-65C-R3B



8-port sector antenna, 2x 698–803, 2x 824–894 and 4x 1695–2360 MHz, 65° HPBW, 3x RET and low bands have diplexers. Internal SBT's on first LB(Port 1) and first HB(Port 5)

- Internal SBT on low and high band allow remote RET control from the radio over the RF jumper cable
- One RET for 700MHz, one RET for 850MHz, and one RET for both high bands to ensure same tilt level for 4x Rx or 4x MIMO
- Internal filter on low band and interleaved dipole technology providing for attractive, low wind load mechanical package
- Separate RS-485 RET input/output for low and high band
- Supports re-configurable antenna sharing capability enabling control of the internal RET system using up to two separate RET compatible OEM radios

General Specifications

Antenna Type	Sector
Band	Multiband
Color	Light gray
Effective Projective Area (EPA), frontal	0.4 m ² 4.306 ft ²
Effective Projective Area (EPA), lateral	0.34 m ² 3.66 ft ²
Grounding Type	RF connector 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	4
RF Connector Quantity, total	8

Remote Electrical Tilt (RET) Information, General

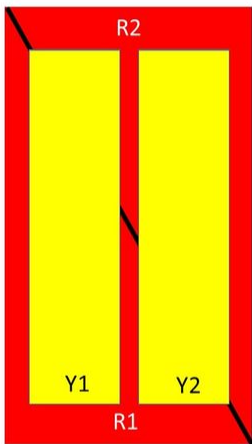
RET Hardware	CommRET v2
RET Interface	8-pin DIN Female 8-pin DIN Male
RET Interface, quantity	2 female 2 male

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Dimensions

Width	350 mm 13.78 in
Length	2438 mm 95.984 in
Depth	208 mm 8.189 in

Array Layout



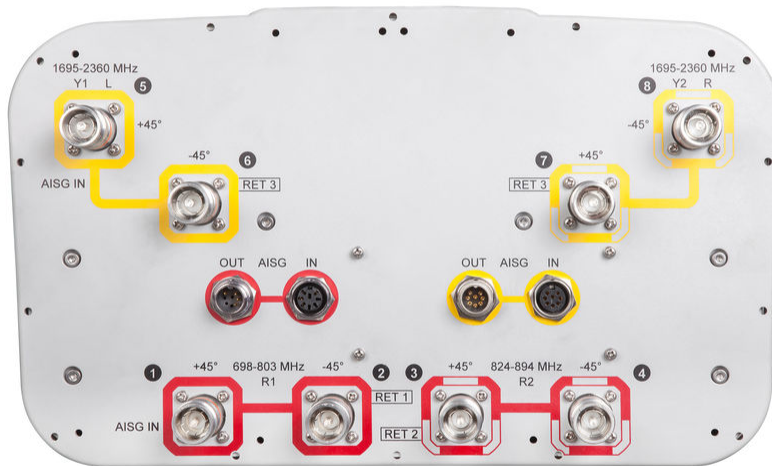
Array	Freq (MHz)	Conns	RET (SRET)	AISG RET UID
R1	698-803	1-2	1	CPxxxxxxxxxxxxxxxxR1
R2	824-894	3-4	2	CPxxxxxxxxxxxxxxxxR2
Y1	1695-2360	5-6	3	CPxxxxxxxxxxxxxxxxY1
Y2	1695-2360	7-8		

Left
Bottom
Right

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

Port Configuration

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Electrical Specifications

Impedance	50 ohm
Operating Frequency Band	1695 – 2360 MHz 698 – 803 MHz 824 – 894 MHz
Polarization	±45°
Total Input Power, maximum	800 W @ 50 °C

Remote Electrical Tilt (RET) Information, Electrical

Protocol	3GPP/AISG 2.0 (Single RET)
Power Consumption, idle state, maximum	1 W
Power Consumption, normal conditions, maximum	8 W
Input Voltage	10–30 Vdc
Internal Bias Tee	Port 1 Port 5

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Internal RET

High band (1) | Low band (2)

Electrical Specifications

Frequency Band, MHz	698–803	824–894	1695–1880	1850–1990	1920–2200	2300–2360
Gain, dBi	15.5	16.2	18.2	18.6	18.7	18.7
Beamwidth, Horizontal, degrees	67	64	62	60	61	64
Beamwidth, Vertical, degrees	9.8	8.4	5.7	5.3	5	4.5
Beam Tilt, degrees	0–11	0–11	2–12	2–12	2–12	2–12
USLS (First Lobe), dB	23	22	20	20	21	20
Front-to-Back Ratio at 180°, dB	30	30	29	35	38	39
Isolation, Cross Polarization, dB	25	25	25	25	25	25
Isolation, Inter-band, dB	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
PIM, 3rd Order, 2 x 20 W, dBc	-153	-153	-153	-153	-153	-153
Input Power per Port at 50° C, maximum, watts	200	200	250	250	250	200

Electrical Specifications, BASTA

Frequency Band, MHz	698–803	824–894	1695–1880	1850–1990	1920–2200	2300–2360
Gain by all Beam Tilts, average, dBi	15.2	16	17.5	18.2	18.3	18.3
Gain by all Beam Tilts Tolerance, dB	±0.3	±0.4	±0.7	±0.5	±0.5	±0.7
Gain by Beam Tilt, average, dBi	0° 15.2 5° 15.2 11° 15.2	0° 15.8 5° 16.0 11° 16.0	2° 17.2 7° 17.6 12° 17.5	2° 17.8 7° 18.4 12° 18.3	2° 17.8 7° 18.5 12° 18.4	2° 17.8 7° 18.4 12° 18.2
Beamwidth, Horizontal Tolerance, degrees	±1.1	±1.6	±3.9	±3	±3	±4.6
Beamwidth, Vertical Tolerance, degrees	±0.5	±0.4	±0.3	±0.2	±0.3	±0.2
USLS, beampeak to 20° above beampeak, dB	18	17	16	16	16	15
Front-to-Back Total Power at 180° ± 30°, dB	25	23	25	31	29	30
CPR at Boresight, dB	23	22	20	23	22	19
CPR at Sector, dB	12	13	10	13	11	8

Mechanical Specifications

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Wind Loading at Velocity, frontal	425.0 N @ 150 km/h 95.5 lbf @ 150 km/h
Wind Loading at Velocity, lateral	361.0 N @ 150 km/h 81.2 lbf @ 150 km/h
Wind Loading at Velocity, maximum	202.3 lbf @ 150 km/h 900.0 N @ 150 km/h
Wind Speed, maximum	241 km/h 149.75 mph

Packaging and Weights

Width, packed	456 mm 17.953 in
Depth, packed	357 mm 14.055 in
Length, packed	2585 mm 101.772 in
Net Weight, without mounting kit	36.1 kg 79.587 lb
Weight, gross	51.1 kg 112.656 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
REACH-SVHC	Compliant as per SVHC revision on www.commscope.com/ProductCompliance
ROHS	Compliant



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.

* Footnotes

Performance Note Severe environmental conditions may degrade optimum performance