

RRV42H-6533D-R8

16-port sector antenna, 4x 694–960 and 8x 1695–2690 MHz 65° HPBW and 4x 1695–2400 MHz 2x 33° HPBW, 8x RET.



- All Internal RET actuators are connected in “Cascaded SRET” configuration

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
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	12
RF Connector Quantity, low band	4
RF Connector Quantity, total	16

Remote Electrical Tilt (RET) Information, General

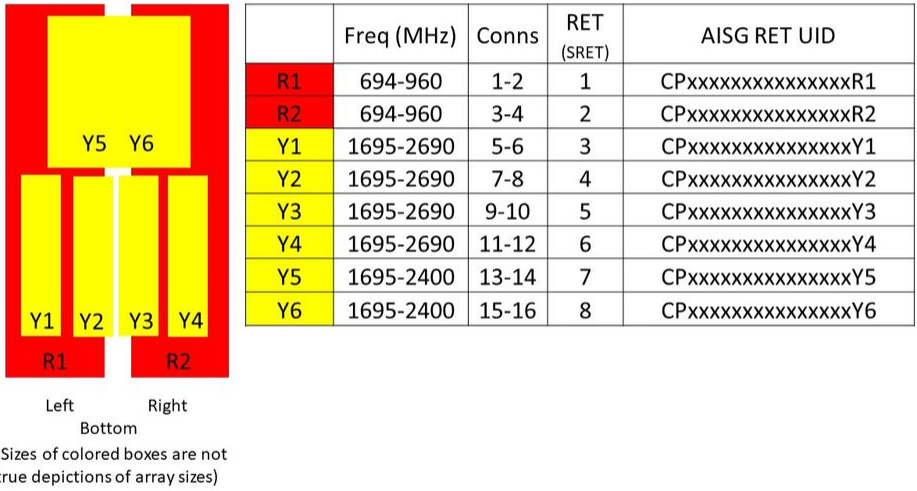
RET Hardware	CommRET v2
RET Interface	8-pin DIN Female 8-pin DIN Male
RET Interface, quantity	2 female 2 male

Dimensions

Width	498 mm 19.606 in
Length	2688 mm 105.827 in
Depth	197 mm 7.756 in

Array Layout

RRV42H-6533D-R8



Port Configuration

RRV42H-6533D-R8



Electrical Specifications

Impedance	50 ohm
Operating Frequency Band	1695 – 2400 MHz 1695 – 2690 MHz 694 – 960 MHz
Polarization	±45°
Total Input Power, maximum	900 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 RET	High band (6) Low band (2)

RRV42H-6533D-R8

Electrical Specifications

	R1-R2	R1-R2	Y1-Y4	Y1-Y4	Y1-Y4	Y5-Y6	Y5-Y6	Y5-Y6
Frequency Band, MHz	694–790	790–960	1695–1920	1920–2180	2300–2690	1695–1880	1920–2180	2300–2400
Gain, dBi	15.9	16.6	16.5	17.8	18.4	17.9	19.4	19.3
Beam Centers, Horizontal, degrees						±27	±27	±27
Beamwidth, Horizontal, degrees	70	62	68	62	58	32	31	30
Beamwidth, Vertical, degrees	9	7.7	7.4	6.5	5.5	7.4	6.5	5.7
Beam Tilt, degrees	2–12	2–12	2–12	2–12	2–12	2–12	2–12	2–12
USLS (First Lobe), dB	19	19	18	19	24	19	21	22
Front-to-Back Ratio at 180°, dB	31	30	33	32	31	32	36	32
Isolation, Cross Polarization, dB	28	28	25	25	25	25	25	25
Isolation, Inter-band, dB	28	28	28	28	28	28	28	28
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
PIM, 3rd Order, 2 x 20 W, dBc	-150	-150	-150	-150	-150	-150	-150	-150
Input Power per Port at 50° C, maximum, watts	300	300	200	200	200	200	200	200

Electrical Specifications, BASTA

	694–790	790–960	1695–1920	1920–2180	2300–2690	1695–1880	1920–2180	2300–2400
Frequency Band, MHz	694–790	790–960	1695–1920	1920–2180	2300–2690	1695–1880	1920–2180	2300–2400
Gain by all Beam Tilts, average, dBi	15.6	16.2	16.1	17.3	18	17.2	18.7	18.7
Gain by all Beam Tilts Tolerance, dB	±0.4	±0.4	±0.7	±0.8	±0.5	±1.3	±0.8	±1.3
Gain by Beam Tilt, average, dBi	2° 15.6 7° 15.7 12° 15.5	2° 16.1 7° 16.4 12° 16.1	2° 16.0 7° 16.2 12° 16.1	2° 17.1 7° 17.5 12° 17.2	2° 17.9 7° 18.2 12° 17.8	2° 17.2 7° 17.5 12° 17.1	2° 18.7 7° 19.1 12° 18.7	2° 18.9 7° 19.1 12° 18.6
Beamwidth, Horizontal Tolerance, degrees	±5.3	±4.6	±5.9	±5.3	±4.5	±2.2	±1.5	±1
Beamwidth, Vertical Tolerance, degrees	±0.5	±0.7	±0.6	±0.5	±0.4	±0.4	±0.5	±0.2
USLS, beampeak to 20° above beampeak, dB	17	17	16	18	17	16	17	14
Front-to-Back Total Power at 180° ± 30°, dB	21	22	26	26	26	27	30	29
CPR at Boresight, dB	19	20	19	21	20	17	19	15
CPR at Sector, dB	11	9	7	7	7			
CPR at 10 dB Horizontal						4	8	11

RRV42H-6533D-R8

Beamwidth, dB

Mechanical Specifications

Wind Loading at Velocity, frontal	1,070.0 N @ 150 km/h 240.5 lbf @ 150 km/h
Wind Loading at Velocity, lateral	375.0 N @ 150 km/h 84.3 lbf @ 150 km/h
Wind Loading at Velocity, maximum	1385.0 N @ 150 km/h 311.4 lbf @ 150 km/h
Wind Speed, maximum	241 km/h 149.75 mph

Packaging and Weights

Width, packed	608 mm 23.937 in
Depth, packed	352 mm 13.858 in
Length, packed	2880 mm 113.386 in
Net Weight, without mounting kit	53.6 kg 118.168 lb
Weight, gross	70 kg 154.323 lb

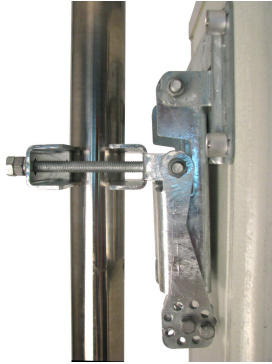
Included Products

- 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.
- BSAMNT-M4 — 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

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.

General Specifications

Application	Outdoor
Color	Silver

Dimensions

Compatible Diameter, maximum	114.3 mm 4.5 in
Compatible Diameter, minimum	61 mm 2.402 in

Material Specifications

Material Type	Galvanized steel
----------------------	------------------

Packaging and Weights

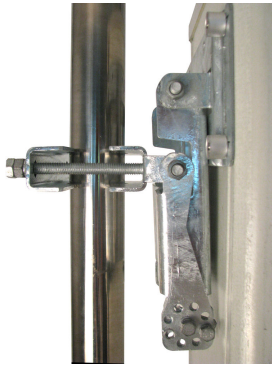
Included	Brackets Hardware
Packaging quantity	1

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



BSAMNT-M4



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.

General Specifications

Application	Outdoor
Color	Silver

Dimensions

Compatible Diameter, maximum	114.3 mm 4.5 in
Compatible Diameter, minimum	61 mm 2.402 in

Material Specifications

Material Type	Galvanized steel
----------------------	------------------

Packaging and Weights

Included	Brackets Hardware
Packaging quantity	1

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

