

20-port sector antenna, 4x 694–960 , 4x 1427–2690, 4x 1695-2180, 4x 2490-2690 and 4x 1695-2690MHz, 65° HPBW, 10x RET

 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

Grounding TypeRF connector inner conductor and body grounded to reflector and mounting

bracket

Performance NoteOutdoor usageRF Connector Interface4.3-10 Female

RF Connector Location Bottom

RF Connector Quantity, mid band 16
RF Connector Quantity, low band 4
RF Connector Quantity, total 20

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 Low band (2) | Mid band (8)

Power Consumption, active state, maximum 8 WPower Consumption, idle state, maximum 1 W

Protocol 3GPP/AISG 2.0

Dimensions

 Width
 498 mm | 19.606 in

 Depth
 197 mm | 7.756 in

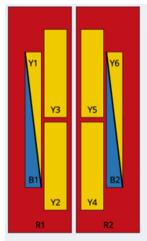
 Length
 2258 mm | 88.898 in

 Net Weight, antenna only
 41.4 kg | 91.271 lb

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Array Layout



Array ID	Frequency (MHz)	RF Connector	RET (SRET)	AISG No.	AISG RET UID
R1	694-960	1 - 2	1	AISG1	CPxxxxxxxxxxxxxxxxxxXR1
R2	694-960	3 - 4	2	AISG1	CPxxxxxxxxxxxxxxxxxxxxxxxX2
B1	1695-2180	5-6	3	AISG1	CPxxxxxxxxxxxxxxxxB1
B2	1695-2180	7 - 8	4	AISG1	CPxxxxxxxxxxxxxxB2
Y1	2490-2690	9 - 10	5	AISG1	CPxxxxxxxxxxxxxxxxxXY1
Y2	1427-2690	11 - 12	6	AISG1	CPxxxxxxxxxxxxxxxY2
Y3	1695-2690	13 - 14	7	AISG1	CPxxxxxxxxxxxxxxxxXY3
Y4	1427-2690	15 - 16	8	AISG1	CPxxxxxxxxxxxxxxxx4
Y5	1695-2690	17 - 18	9	AISG1	CPxxxxxxxxxxxxxxxxY5
Y6	2490-2690	19 - 20	10	AISG1	CPxxxxxxxxxxxxxxY6

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

Port Configuration



Electrical Specifications

Impedance 50 ohm

Operating Frequency Band 1427 – 2690 MHz | 1695 – 2180 MHz | 1695 – 2690 MHz | 2490 – 2690

MHz | 694 - 960 MHz

Polarization ±45°

Total Input Power, maximum 900 W @ 50 °C

Electrical Specifications

COMMSCOPE®

	R1,R2	R1,R2	R1,R2	B1,B2	B1,B2	Y1,Y6	Y2,Y4
Frequency Band, MHz	698-806	790-894	890-960	1695-1995	1920-2180	2490-2690	1427-1518
RF Port	1-4	1-4	1-4	5-8	5-8	9,10,19,20	11,12,15,16
Gain at Mid Tilt, dBi	15.2	15.8	15.7	17.4	18.2	18.3	14.8
Beamwidth, Horizontal, degrees	72	64	66	69	65	57	72
Beamwidth, Vertical, degrees	9.8	8.6	7.8	5.6	5	4.2	10.4
Beam Tilt, degrees	2-12	2-12	2-12	2-12	2-12	2-12	2-12
USLS (First Lobe), dB	18	17	17	17	17	17	15
Front-to-Back Ratio at 180°, dB	31	31	31	32	30	32	33
Front-to-Back Total Power at 180° ± 30°, dB	21	21	21	27	26	27	23
Isolation, Cross Polarization, dB	26	26	26	25	25	25	25
Isolation, Inter-band, dB	26	26	26	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
PIM, 3rd Order, 2 x 20 W, dBc	-153	-153	-153	-153	-153	-153	-153
Input Power per Port at 50°C, maximum, watts	300	300	300	250	250	200	250
Electrical Specificati	ons, BAS	5TA					
Frequency Band, MHz	698-806	790-894	890-960	1695-1995	1920-2180	2490-2690	1427-1518
Gain by all Beam Tilts, average, dBi	15.1	15.6	15.6	17.3	18	17.9	14.8
Gain by all Beam Tilts Tolerance, dB	±0.5	±0.5	±0.5	±0.7	±0.4	±0.5	±0.4
Beamwidth, Horizontal Tolerance, degrees	±7	±6	±9	±4	±6	±3	±10
Beamwidth, Vertical Tolerance, degrees	±0.6	±0.8	±0.5	±0.4	±0.3	±0.3	±0.9
USLS, beampeak to 20° above beampeak, dB				15	15	14	14
CPR at Boresight, dB	21	21	18	20	21	19	17
CPR at Sector, dB	10	6	7	8	7	2	8
Electrical Specificati	ons						

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Y2,Y4

Y2,Y4

1695-1995 1920-2300 2300-2500 2490-2690

Y2,Y4

Y2,Y4

Frequency Band, MHz

RF Port	11,12,15,16	11,12,15,16	11,12,15,16	11,12,15,16
Gain at Mid Tilt, dBi	16.6	17.3	18	18.2
Beamwidth, Horizontal, degrees	65	61	56	54
Beamwidth, Vertical, degrees	8.3	7.4	6.4	6
Beam Tilt, degrees	2-12	2-12	2-12	2-12
USLS (First Lobe), dB	17	18	18	18
Front-to-Back Ratio at 180°, dB	33	33	32	32
Front-to-Back Total Power at 180° ± 30°, dB	30	29	28	28
Isolation, Cross Polarization, dB	25	25	25	25
Isolation, Inter-band, dB	25	25	25	25
VSWR Return loss, dB	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
Input Power per Port at 50°C, maximum, watts	250	250	200	200

Electrical Specifications, BASTA

Frequency Band, MHz	1695-1995	1920-2300	2300-2500	2490-2690
Gain by all Beam Tilts, average, dBi	16.5	17.2	17.8	18
Gain by all Beam Tilts Tolerance, dB	±0.8	±0.5	±0.5	±0.4
Beamwidth, Horizontal Tolerance, degrees	±7	±4	±4	±3
Beamwidth, Vertical Tolerance, degrees	±0.8	±0.7	±0.3	±0.3
USLS, beampeak to 20° above beampeak, dB	14	16	15	14
CPR at Boresight, dB	22	22	22	20
CPR at Sector, dB	8	5	5	3

Electrical Specifications

	Y3,Y5	Y3,Y5	Y3,Y5	Y3,Y5
Frequency Band, MHz	1695-1995	1920-2300	2300-2500	2490-2690
RF Port	13,14,17,18	13,14,17,18	13,14,17,18	13,14,17,18
Gain at Mid Tilt, dBi	16.5	17.4	17.8	18

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Beamwidth, Horizontal, degrees	65	58	56	57
Beamwidth, Vertical, degrees	8.6	7.6	6.6	6.3
Beam Tilt, degrees	2-12	2-12	2-12	2-12
USLS (First Lobe), dB	16	16	16	19
Front-to-Back Ratio at 180°, dB	33	33	33	33
Front-to-Back Total Power at 180° ± 30°, dB	30	30	30	29
Isolation, Cross Polarization, dB	25	25	25	25
Isolation, Inter-band, dB	25	25	25	25
VSWR Return loss, dB	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
Input Power per Port at 50°C, maximum, watts	250	250	200	200

Electrical Specifications, BASTA

Frequency Band, MHz	1695-1995	1920-2300	2300-2500	2490-2690
Gain by all Beam Tilts, average, dBi	16.4	17.3	17.6	17.9
Gain by all Beam Tilts Tolerance, dB	±0.7	±0.5	±0.3	±0.4
Beamwidth, Horizontal Tolerance, degrees	±7	±5	±5	±4
Beamwidth, Vertical Tolerance, degrees	±0.7	±0.6	±0.3	±0.3
USLS, beampeak to 20° above beampeak, dB	16	16	16	17
CPR at Boresight, dB	21	23	21	20
CPR at Sector, dB	10	8	7	5

Mechanical Specifications

Wind Loading @ Velocity, frontal	768.0 N @ 150 km/h (172.7 lbf @ 150 km/h)
Wind Loading @ Velocity, lateral	201.0 N @ 150 km/h (45.2 lbf @ 150 km/h)
Wind Loading @ Velocity, maximum	1,020.0 N @ 150 km/h (229.3 lbf @ 150 km/h)
Wind Loading @ Velocity, rear	528.0 N @ 150 km/h (118.7 lbf @ 150 km/h)
Wind Speed, maximum	241 km/h (150 mph)

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Packaging and Weights

 Width, packed
 565 mm | 22.244 in

 Depth, packed
 309 mm | 12.165 in

 Length, packed
 2445 mm | 96.26 in

 Weight, gross
 52.6 kg | 115.963 lb

Regulatory Compliance/Certifications

Agency Classification

CHINA-ROHS Above maximum concentration value

ISO 9001:2015 Designed, manufactured and/or distributed under this quality management system

ROHS Compliant/Exempted UK-ROHS Compliant/Exempted



Included Products

BSAMNT-2F – Mounting bracket for cylindrical pipe installations (60-115mm pipe diameter) for fix mechanical tilt applications.

* Footnotes

Performance Note Severe environmental conditions may degrade optimum performance



BSAMNT-2F



Mounting bracket for cylindrical pipe installations (60-115mm pipe diameter) for fix mechanical tilt applications.

Product Classification

Product Type Fixed tilt mounting kit

General Specifications

ApplicationOutdoorColorSilver

Dimensions

Compatible Diameter, maximum115 mm | 4.528 inCompatible Diameter, minimum60 mm | 2.362 inWeight, net3.8 kg | 8.378 lb

Material Specifications

Material Type Galvanized steel

Packaging and Weights

Included Brackets | Hardware

Packaging quantity

Weight, gross 4 kg | 8.818 lb

Regulatory Compliance/Certifications

Agency	Classification
CE	Compliant with the relevant CE product directives
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
UK-ROHS	Compliant









