

APXVAA4L24_43-U-NA20

12-Ports, X-Pol, Panel Antenna, 2.4m, 2x 617-894/4x 1695-2690 MHz 65deg, Integrated RET

FEATURES / BENEFITS

- MIMO 4x4 in low-band and mid-band x2 (L/CL & CR/R)
- Integrated and fieldreplaceable RET
- ACU model number: x3 ACU-A20-SR, ACU HW 05
- Compliant with AISG V2.0 and 3GPP
- AISG jumper cable included
- Mechanical down tilt kit included

**Technical features****ELECTRICAL SPECIFICATIONS**

Electrical Specification Header		Low Band Arrays (617-894 MHz) Ports 1-4		
Frequency Band	MHz	617-698	698-806	806-894
Gain	dBi	15.7	15.9	16.0
Azimuth Beamwidth 3dB	Deg	70+/-3	68+/-3	65+/-4
Elevation Beamwidth 3dB	Deg	9.9+/-7	8.6+/-7	7.6+/-3
Cross-Pol at Boresight	dB	22	21	21
F/B at 180 Copolar	dB	28	28	28
Electrical Downtilt	Deg	2 to 12	2 to 12	2 to 12
First Upper Side Lobe	dB	15	15	16
VSWR	-	1.5:1	1.5:1	1.5:1
Return Loss	dB	-14	-14	-14
Cross Polar Isolation	dB	25	25	25
3rd Order PIM 2 x 43dBm	dBc	-153	-153	-153
Maximum CW Power per Port	Watt	400	400	400
Gain Over All Tilts	dBi	15.1 +/-6	15.2+/-7	15.4+/-6
Cross-Pol over Sector	dB	10	7	5
F/B at +/-30° Total Power	dB	19	20	20
Upper Side Lobe Peak to +20	dB	15	15	16

ELECTRICAL SPECIFICATIONS

Electrical Specification Header		High Band Arrays (1695-2690 MHz) Ports 5-12				
Frequency Band	MHz	1695-1880	1850-1990	1920-2200	2200-2500	2500-2690
Gain	dBi	17.9	18.6	19.8	19.2	19.1
Azimuth Beamwidth 3dB	Deg	67+/-7	65+/-9	61+/-10	59+/-6	58+/-8
Elevation Beamwidth 3dB	Deg	5.6+/-0.5	5.3+/-0.4	4.8+/-0.6	4.5+/-0.3	4.4+/-0.4
Cross-Pol at Boresight	dB	23	21	20	20	19
F/B at 180 Copolar	dB	32	32	32	31	30
Electrical Downtilt	Deg	2 to 12	2 to 12	2 to 12	2 to 12	2 to 12
First Upper Sidelobe	dB	15	15	16	17	17
VSWR	-	1.5:1	1.5:1	1.5:1	1.5:1	1.5:1
Return Loss	dB	-14	-14	-14	-14	-14
Cross Polar Isolation	dB	25	25	25	25	25
3rd Order PIM 2 x 43dBm	dBc	-153	-153	-153	-153	-153
Maximum CW Power per Port	Watt	250	250	250	250	250
Gain Over All Tilts	dBi	16.9+/-1	17.8+/-0.8	18.8+/-1	18.1 +/-1.1	17.7+/-1.4
Cross-Pol over Sector	dB	5	6	6	2	1
F/B at +/-30° Total Power	dB	25	25	26	23	23
Upper Side Lobe Peak to +20	dB	14	15	14	13	11

ELECTRICAL SPECIFICATIONS

Impedance	Ohm	50
Polarization	Deg	+/- 45

MECHANICAL SPECIFICATIONS

Dimensions - H x W x D	mm (in)	2436 x 609 x 215 (95.9 x 24 x 8.5)
Weight (Antenna Only)	kg (lb)	65 (143.3)
Weight (Mounting Hardware only)	kg (lb)	11.5 (25.3)
Packing size- HxWxD	mm (in)	2565 x 735 x 390 (101 x 29 x 15.4)
Shipping Weight	kg (lb)	86.7 (191.1)
Connector type		12 x 4.3-10 female at bottom + 6 AISG connectors (3 male, 3 female)
Radome Material / Color		Fiber Glass / Light Grey RAL7035

TESTING AND ENVIRONMENTAL

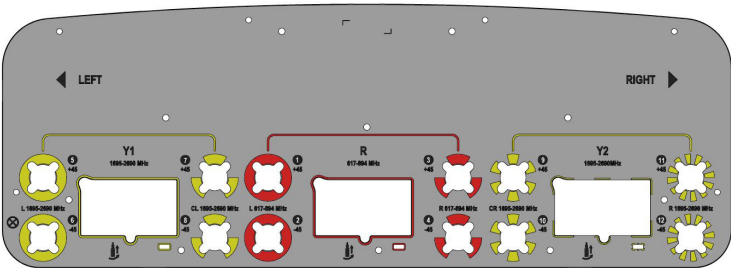
Temperature Range	°C (°F)	-40 to 60 (-40 to 140)
Lightning protection		Direct Ground
Survival/Rated Wind Velocity	km/h	240 (150)
Wind Load @Rated Wind Front	N	1428
Wind Load @Rated Wind Side	N	434
Wind Load @Rated Wind Rear	N	1544

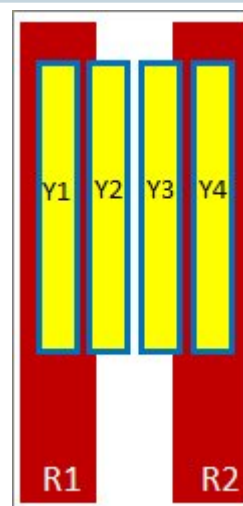
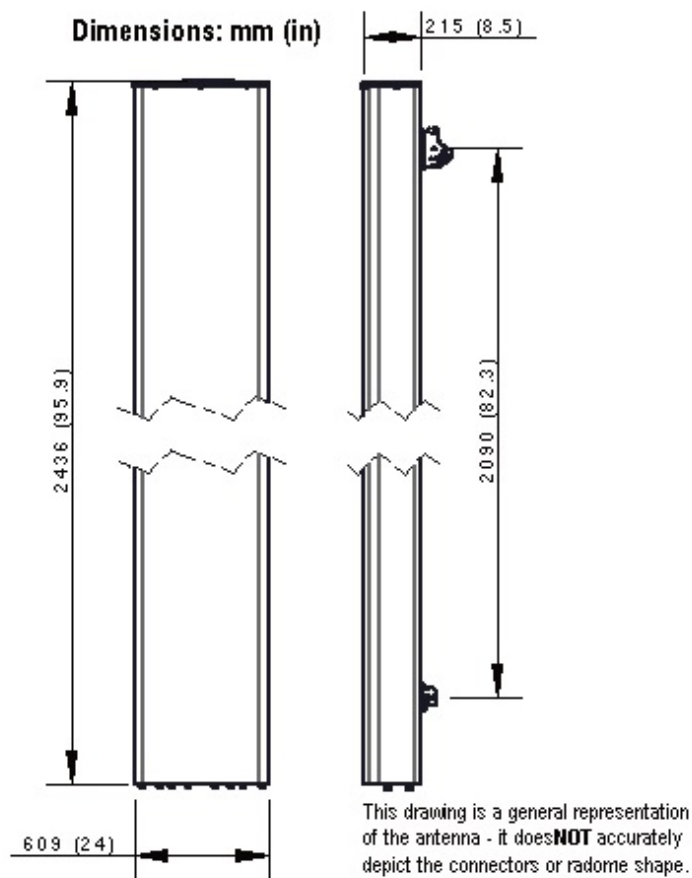
ORDERING INFORMATION

Order No.	Configuration	Mounting Hardware	Mounting pipe Diameter	Shipping Weight
APXVAA4L24_43-U-NA20	ACU-A20-SR Field Replace RET included (3)	APM40-5E Beam tilt kit (included)	60-120mm	86.7 Kg

Port	Array	Frequency	RET	AISG RET UID
1	R1	617-894	R1	RFxxxxxxxxxx-2R1
2		617-894		
3	R2	617-894		
4		617-894		
5	Y1	1695-2690	Y1	RFxxxxxxxxxx-2Y1
6		1695-2690		
7	Y2	1695-2690		
8		1695-2690		
9	Y3	1695-2690	Y2	RFxxxxxxxxxx-2Y2
10		1695-2690		
11	Y4	1695-2690		
12		1695-2690		

RET Information		
Frequency	617-894	1695-2690
Model	ACU-A20-SR	ACU-A20-SR
Location	Semi-internal	Semi-Internal
Field Replaceable	Yes	Yes
Quantity	1	2
RET ID	R1	Y1 & Y2





External Document Links
[APM40_Series_Installation_Instructions](#)
[CAxxx-7 Series](#)
[Manual Overdrive Instructions](#)

Notes

- All electrical parameters are compliant with BASTA NGMN 11.1 requirements.
- A one-meter AISG cable CA010-7 comes in the box, and for additional cable information please click ""External Document Links"".
- For additional mounting information please click ""External Document Links"".
- **Radiating patterns:** [Request pattern files](#)