

DATASHEET

AW3924-T0-F

Common Name- 4 Port, 11", C-Band, 65° Small Cell

3300-4200MHz 4 Fixed 13.3 65° Frequency Ports Tilt Gain Beamwidth

PRODUCT INFORMATION

This ultracompact form factor solution was developed for fixed wireless applications to cover the extended C-band 3300-4200MHz. The AW3924-T0-F provides small cell coverage for 4G and 5G private networks using the 3.5 GHz Citizens Broadband Radio Service (CBRS, n48) and C-band (n77, n78) spectrum. This four port small cell antenna offers a wide elevation beamwidth with a fixed electrical downtilt.

APPLICATION

Alpha Wireless small cell provides sector coverage whilst in an ultra-compact radome design. The wide-band antenna is designed to be installed in urban environment where low visual impact is required. There are a number of mounting options available making deployments on lamp posts, utility poles, walls and other vertical structures possible. The 4 port antenna supports 4X4 MIMO for improved data throughput with options for various fixed tilt settings.



STANDARD & CERTIFICATIONS

Certification BS EN ISO 9001:2015





FEATURES

- Wide Band antenna covering 3300-4200MHz
- Covering NR bands n48, n77 and n78.
- Compact design for Small Cell deployment Low visual impact
- Supports 4x4 MIMO for improved throughput
- Dual Cross polarization antenna +/- 45

The paramenters in this specification follow the definitions and recommendations per NGMN P-Basta, Release 9.6.

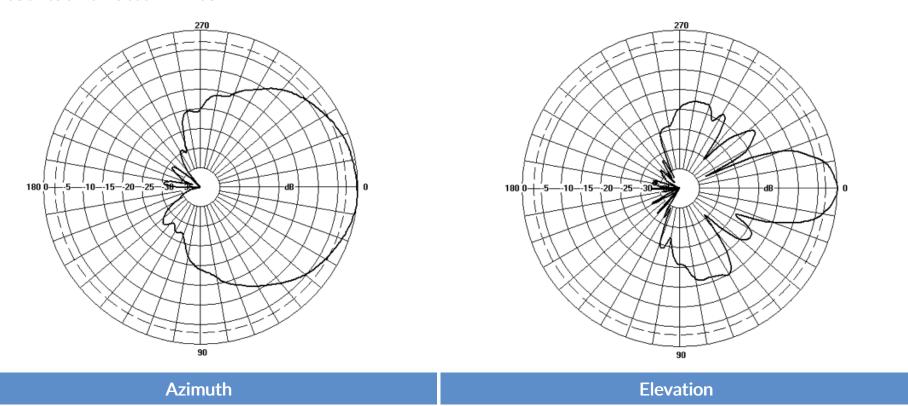




TECHNICAL SPECIFICATION

Electrical Spe	cifications			
Frequency Range		MHz	3300 - 3800	3800 - 4200
Polarisation		Degree	+/- 45° Slant Linear	
Gain	Basta	dBi	12.8±0.5	13.3±0.5
	Мах	dBi	13.3	13.8
Azimuth Beamwidth		Degree	65°	
Elevation Beamwidth		Degree	22°	20°
Electrical Downtilt		Degree	T0°	
Electrical Downtilt Deviation		Degree<	1°	
Impedance		Ohms	50	
VSWR		<	1.5	
Return Loss		dB>	14	
Isolation		dB>	25	
Front to Back Ratio: Copolarization +/-30°		dB>	25	
Cross-Polar Discrimination		dB>	16	
Maximum Effective Power Per Port		W	50	

Representative Pattern Files



For radiation pattern files, please login at www.alphawireless.com

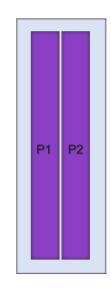


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TECHNICAL SPECIFICATION

Mechanical Specifications		
Dimensions	mm (in)	285 (11.2) x 280 (11) x 85 (3.3) - (LxWxD)
Packing Size (LxWxD)	mm (in)	425 (16.7) x 350 (13.4) x 210 (7.5)
Net Weight (antenna)	kg (lb)	3.05 (6.7)
Shipping Weight	kg (lb)	4.2 (11.1)
Connector Type (Female)	-	4.3-10
Connector Quantity	-	4
Connector Position	-	Bottom
Windload Frontal (at Rated Wind Speed: 150km/h)	N (lbf)	105 (24)
Windload Lateral (at Rated Wind Speed: 150km/h)	N (lbf)	34 (8)
Survival Wind Speed	km/h (mph)	200 (125)
Radome Material	-	ASA
Radome Colour	RAL	7035
Product Compliance Environmental	-	RoHS
Lightning Protection	-	DC Grounded
Cold Temperature Survival	°C (°F)	-40 (-40)
Hot Temperature Survival	°C (°F)	70 (158)

Array Layout and RET Information



Array	Frequency MHz	Ports
P1	3300 - 4200	1 - 2
P2	3300 - 4200	3 - 4

Note: Coloured box sizes do not represent antenna sizes.

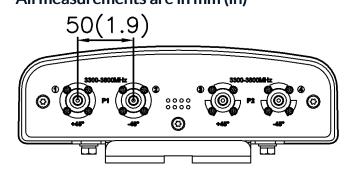


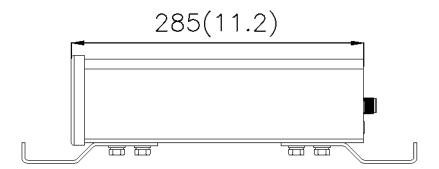


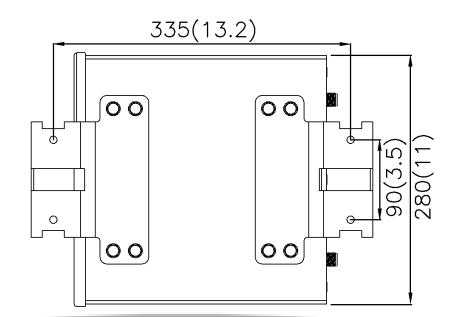
TECHNICAL SPECIFICATION

Mechanical Illustration

All measurements are in mm (in)













TECHNICAL SPECIFICATION

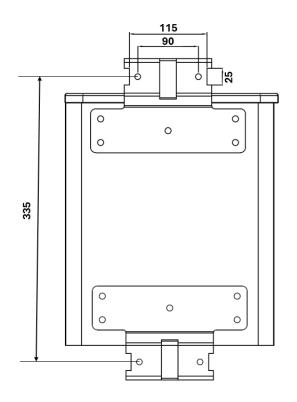
Mounting Bracket Kit

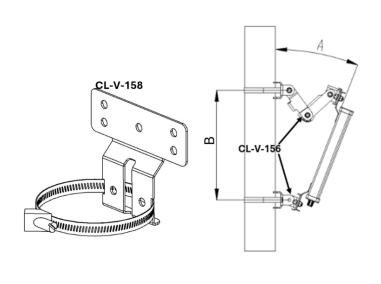
CL-V-158 (Mounting Kit included with Antenna)

Tilt function of -18° to 0° is available when used in conjunction with the CL-V-156 Scissor Bracket (Optional Extra).

- Bracket spacing of 335mm @ B (Image below).
- Mounting of the bracket to the pole must be completed while the bracket is set to 0°.

Note: Tilt should be checked with Inclinometer for accuracy.





Mounting Kit Tilt Range	Mounting Kit Material	Mounting Kit Pole Diameter
n/a	Stainless Steel	50mm-115mm (2" to 4.5")

Ordering Info

Order Code - Antenna	Description
AW3924-T0-F	Zero Degrees Fixed Tilt with 4.3/10 Connectors
Description	Order Code - Antenna
AW1012-2-FM-FM	RF Jumper Cable, connector types 4.3-10 (m) / 4.3-10 (m), length 2 metres (6'6")
AW1012-2-FM-NM	RF Jumper Cable, connector types 4.3-10 (m) / N-Type (m), length 2 metres (6'6")
AW1014-2-FM-TM	RF Jumper Cable, connector types 4.3-10 (m) / Nex10 (m), length 2 metres (6'6")

Enquiries

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