220-4N

COMMANDER Omni Fiberglass Antenna, 155-163, 7.4dBi, N Female

Please visit us on the internet at http://www.commandertech.com

Product Description

Commander VHF base Station Antennas incorporate the design features of 9 MHz broadband capability, improved lightning protection and true omnidirectional gain in excess of 5 dBd Note: Below 150 MHz, rated gain is 4.8 dBd due to length constraints. Side mounting hardware is available for the 220 to achieve special radiation patterns.

220 Series

C'UMMANDER

TECHNOLOGIES

Features/Benefits

Fiberglass construction protects radiating elements in corrosive environments. DC grounded - affords lightning protectior Copper radiating elements minimize possibility of intermod generation

Frequency Band	25-299.9 MHz
Horizontal Pattern	Omni Directional
Antenna Type	Fiberglass Omni
Electrical Down Tilt Option	Fixed
Gain, dBi (dBd)	7.4 (5.3)
Frequency Range, MHz	155-163
Connector Type	N Female
Connector Location	Bottom
Mounting Type	Fixed
Electrical Down Tilt, deg	0
Orientation	Upright
Mounting Hardware	46 Clamp Set
Rated Wind Speed, km/h (mph)	160 (100)
Gain (Omni), dBi (dBd)	7.39 (5.25)
VSWR	< 1.6 : 1
Vertical Beamwidth, deg	18
Polarization	Vertical
Maximum Power Input, W	500
Lightning Protection	Direct Ground
3rd Order IMP @ 2 x 43 dBm, dBc	-130
Impedance, Ohms	50
Overall Length, m (ft)	6.16 (20.2)
Element Housing Length, m (ft)	5.46 (17.9)
Mounting Pipe Diameter, m (in)	0.07 (2.75)
Support Pipe Length, m (ft)	0.66 (2.17)
Weight, kg (lb)	11 (24)
Radiating Element Material	Copper
Element Housing Material	Fiberglass
Support Pipe Material	Aluminum Alloy
Max Wind Loading Area m ² (ft ²)	0.217 (2.34)
Survival Wind Speed, km/h (mph)	200 (125)
Bend Mom @ Rated Wind 1" Below Top of Mt Pipe, N m (ft lbf)	1102 (813)
Wind Load - Side @ Rated Wind, N (lbf)	400 (90)
Shipping Weight, kg (lb)	25.9 (57)
Packing Dimensions, HxWxD mm (in)	6710 x 100 x 100 (264.17 X 3.94 X 3.94)
Packing Dimensions, HxWxD, m (ft)	6.71 x 0.1 x 0.1 (22 x 0.33 x 0.33)
Shipping Dimensions of Accessory, HxWxD, m (ft)	Packed with Antenna
Shipping Mode	Common Carrier
Notes	

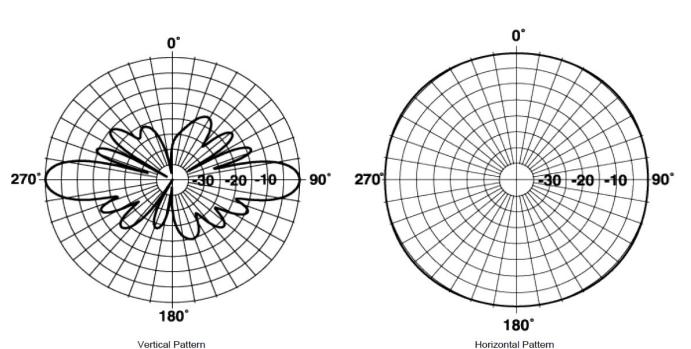
COMMANDER Model 220-4N	REV: 1.0	Print Date:	1/5/2012

220-4N

COMMANDER Omni Fiberglass Antenna, 155-163, 7.4dBi, N Female

Please visit us on the internet at http://www.commandertech.com

Other Documentation



COMMANDER

TECHNOLOGIES

COMMANDER Model 220-4N	REV: 1.0	Print Date:	1/5/2012	