WiFi Mesh Mining Antenna – Dual Band 2.4/5.8ghz Horizontal Polarity Omni-directional

PART NUMBER

NWT-ANT-2458-4H

PRODUCT DESCRIPTION

Our dual-band, horizontally polarized omnidirectional wifi antenna provides the perfect balance between gain and vertical coverage. The wide vertical beamwidth allows it to reach great depths in open pit mining and similarly challenged topologies. The rugged design and build quality were created with heavy machinery in mind. These antennas are purpose built for industrial networks.

PRODUCT OVERVIEW

- Single model for both 2.4 GHz and 5 GHz reduces stocking SKUs for spare inventory by 50%
- Wide vertical beamwidth, ideal in topology with broad variations in elevation
- Low VSWR, and stable gain across entire working frequency range
- Optimal pattern plots across entire working frequency range, which ensures excellent RF coverage in all directions

ELECTRICAL SPECIFICATIONS

Frequency Band	2400-2500 MHz	5100-5900 MHz
Gain (Average)	3.5 dBi	4 dBi
Polarization	Horizontal	Horizontal
H-Plane 3dB Beamwidth	360°	360°
E-Plane 3dB Beamwidth (Avg)	50°/63°	50°/62°
Azimuth Plane Ripple	3 dB	5 dB
VSWR	<1.5typ / <2.0 max	< 1.5typ / <2.0 max
Return Loss (typical)	-13.9 dB	-13.9 dB
Max Input Power per Port	30W	
Impedance	50 Ohms	

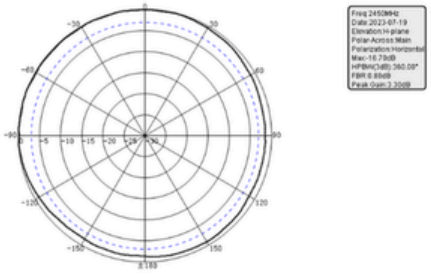
MECHANICAL CHARACTERISTICS

Antenna Size	50mm x 300mm / 2” x 11.8”
Mounting Type	Pipe Mount (U bolt or Hose Clamp)
Mounting Mast size	30mm - 65mm / 1.18” - 2.55”
Antenna Color	Gray or customized
Connectors	N Female
Ice-load	25mm
Weight	0. 85kg / 1.87 lbs (U bolt) ; 0.54kg / 1.19 lbs (hose clamp)
Packaging	Carton
Single Unit	Retail Box: 110mm x 110mmx 400mm / 4.33” x 4.33” x 15.7”
20 Units	Carton Box: 420mm x 570mm x 470mm / 16.54” x 22.44” x 18.5”

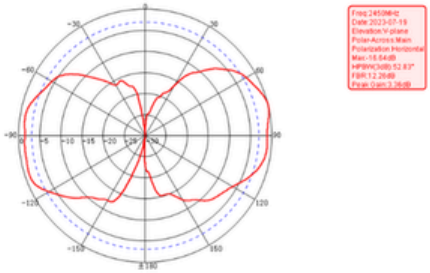
ENVIRONMENT

Waterproof level	IP66
Operating Temp Range	-40°C To +60°C / -40°F To 140°F
Salt Fog Exposure	120 hour
Wind Velocity Survival Rating	100 mph / 160km/h
Wind Velocity Operational	100 mph / 160km/h

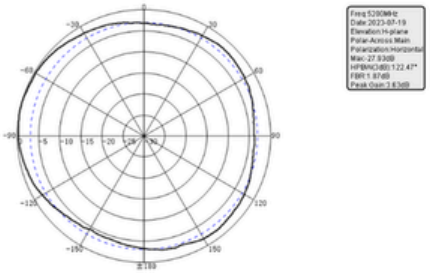
Pattern Plots



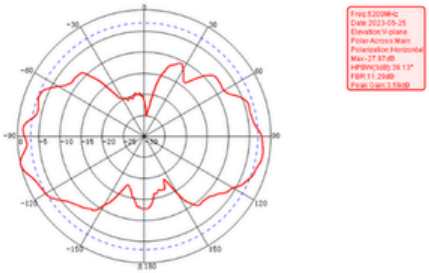
Hplane - **2450Mhz**



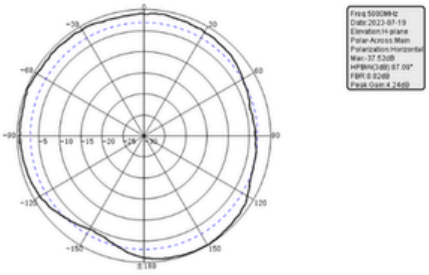
Eplane - **2450Mhz**



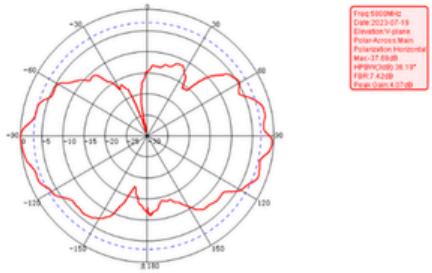
Hplane - **5200Mhz**



Eplane -**5200Mhz**



Hplane - **5800Mhz**



Eplane - **5800Mhz**