ANTENNAS | XPOL-2

XPOL-2
698 - 2700 MHZ HIGH GAIN CROSS POLARISED LTE MIMO ANTENNA

Product Overview

The antenna provides an innovative solution for 4G / 3G and 2G networks including Wi-Fi. It is a unique wall- or pole-mountable, dual polarised, full LTE band antenna. Incorporating two separately fed ultra wideband elements in a single housing, the antenna is equipped to provide client-side MiMo and diversity support for the networks of today and tomorrow. This is a cost effective solution for enhancing signal reception and throughput. The XPOL-2 antenna increases signal reliability, ensures higher data throughput for users and provides a stable, high quality connection. This improves subscriber user experience and secures client retention. It is ideal for any application using the GSM network (LTE/HSPA/3G/EDGE/GPRS).

Features

• High gain directional antenna
• Broadband covering multiple operational frequencies
• Wall or pole mountable
• Lightweight
• Waterproof
• Two cross polarized antennas in one enclosure

Application areas

• Urban and rural areas
• Poor data signal reception (indoor or outdoor)
• Slow data transmission connection areas
• Unstable connection
• Increase system transmission reliability
• LTE fringe areas (close to an LTE area, but just out of reach)
• Network operator flexibility - as the antennas is wideband, a new antenna is not needed per network operator - works on most networks
• Regulatory
**Frequency bands**

The XPOL-2 is a wide-band antenna that works from 698 - 2700 MHz

![Antenna Performance Plots](Antenna Performance Plots)

**Voltage Standing Wave Ratio (VSWR)**

VSWR is a measure of how efficiently radio-frequency power is transmitted from a power source, through a transmission line, into a load. In an ideal system, 100% of the energy is transmitted which corresponds to a VSWR of 1:1. The XPOL-2 delivers superior performance across all bands with a VSWR of 2.5:1 or better.

**Gain in dB**

Gain@698 - 960 MHz: 8 dB
Gain@1710 - 2170 MHz: 6.5 dB
Gain@2300 - 2400 MHz: 7 dB
Gain@2500 - 2700 MHz: 9 dB

*Antenna gain measured with polarisation aligned standard antenna*
Radiation Patterns

Azimuth:

Elevation:

Regulatory Compliance:
RoHS 2011/65/EU Compliant | ISO 9001:2008

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XPOL-2
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Product Specifications may change without prior notice
Revised: September 2015
Electrical Specifications

Frequency Bands:
- 698 - 960 MHz
- 1710 - 2170 MHz
- 2300 - 2400 MHz
- 2500 - 2700 MHz

Gain (Max):
- 9 dBi

VSWR: < 2.5:1

Feed Power Handling: 10 W

Input Impedance: 50 Ohm (nominal)

Polarisation: 0° and 90°

Port to Port Isolation: >15dB

MIMO decorrelation: < 0.3

Cable loss:
- 0.35dB/m @ 900 MHz
- 0.53dB/m @ 2000 MHz
- 0.6dB/m @ 2500 MHz

DC Short: Yes

Environmental Specifications

Wind Survival: <120km/h

Temperature Range (Operating): -40°C to +70°C

Environmental Conditions: Outdoor/Indoor

Operating Relative Humidity: Up to 98%

Storage Humidity: 5% to 95% - non condensing

Storage Temperature: -40°C to +70°C

Mechanical Specifications

Product Dimensions (L x W x D):
- 255 mm x 250 mm x 80 mm
- 290 mm x 267 mm x 98 mm

Weight:
- 1.55 kg

Packaged Weight: 1.98 kg

Radome Material: ABS (Halogen Free)

Radome Colour: Pantone - Cool Gray (1C) RAL 7047

Product Box Contents

Antenna: A-XPOL-0002-V2

Mounting Bracket: 1 x Z-shaped mounting bracket suitable for wall or pole mount

Cable Length: 5m

Cable Type: Black twin siamese HDF 195

Connector: 2X SMA (M)Gold plated

The cables and connectors are factory mounted to the antenna

Certification Approvals and Standards

Flammability rating: UL 94-V0

EN 13823

Water Ingress Protection Ratio/Standard: IP 65 (NEMA 4X)

Impact resistance: IK 08

Salt Spray: MIL-STD 810F/ASTM B117

Product Safety: Complies with UL, CE, EN, CSA and IEC standards

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For more detailed information and availability in your region, visit our web site: www.poynting.tech

Ordering Information

Commercial name: XPOL-2
Order Product Code: A-XPOL-0002-V2
EAN number: 6009693810051

Additional Accessories Available

Extension Cables: Up to 10m HDF 195
Various connectors available
Installation poles and brackets available

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