

Part No. X9001748-W3DRMB

External Wi-Fi Dual Band Antenna

2400 – 2480 MHz / 5150 – 5850 MHz

Supports: Gateways, M2M applications, IoT Gateways, Routers, Access point, Agriculture, Smart Home, Bluetooth, Zigbee



External EU W3 / LTE Antenna

Low Band: 2400 - 2485 MHz
High Band: 5150 - 5850 MHz

KEY BENEFITS

Quicker Time-to-Market

Standard part means fewer design changes with, simple implementation

Easy Assembly using RP-SMA or SMA

Best in Class Performance

External antennas are designed to maintain high efficiency in a variety of device configurations

Great Flexibility

Standard connector to makes easy set-up

RoHS Compliant

Products are the latest RoHS version compliant.

APPLICATIONS

- Gateways
- Telematics
- Smart metering
- Home automation
- Smart city
- Structural health monitoring
- Predictive maintenance

Ethertronics series of External antennas deliver on the key needs of device designers for higher functionality and performance in access point, with wide range of frequency options.

X9001748 is an IP67 black antenna, which offers protection against dust tight and water. This antenna provides a high gain suited for Wi-Fi applications.

The antenna can be mounted easily to the device via an RP- SMA.

Electrical Specifications

Typical Characteristics in Free Space

Frequency (MHz)	2400 – 2485	5150 – 5850
Return Loss	< -9.00 dB	<-7.33 dB
Peak Gain	3.2 dBi	3.6 dBi
Average Efficiency	71 %	68 %
Polarization	Linear	
Feed Point Impedance	50 ohm	

Mechanical Specifications & Ordering Part Number

Ordering Part Number	X9001748-W3DRMB
Dimensions (mm)	180.00 ± 2.00 height 12.98 ± 0.20 diameter
Connector Type	RP-SMA
Weight (grams)	24
Color	Black
Operating Temperature (°C)	- 40 to +120
Radome Material	TPEE
IP Rating	IP67

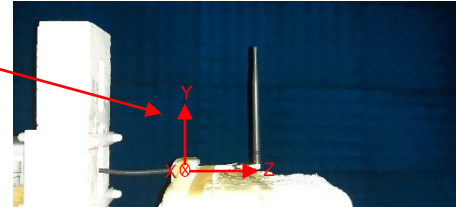
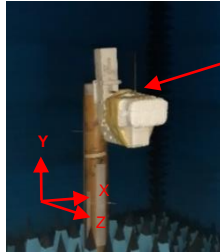


Wi-Fi Dual Band External antenna specifications
Ethertronics produces a wide variety of standard and custom antennas to meet user needs

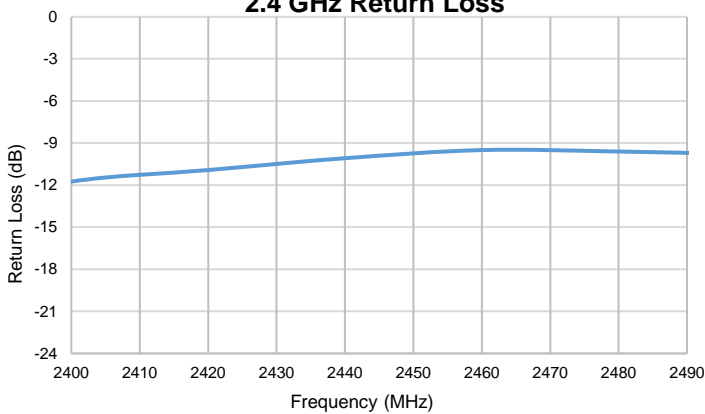
Return Loss, Efficiency and Peak Gain Plots

Typical performance measured in Free Space

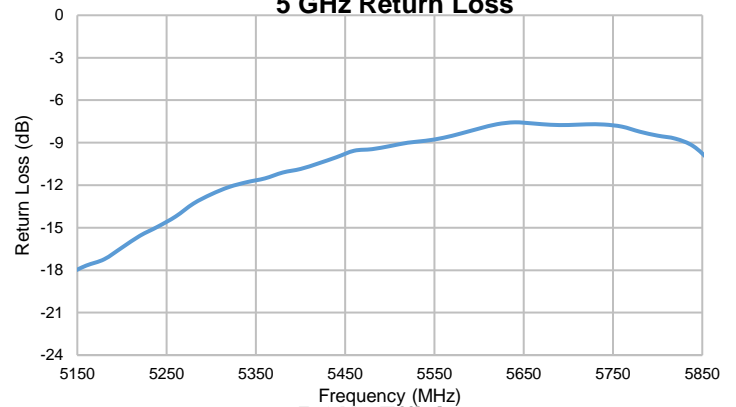
X9001748-W3DRMB



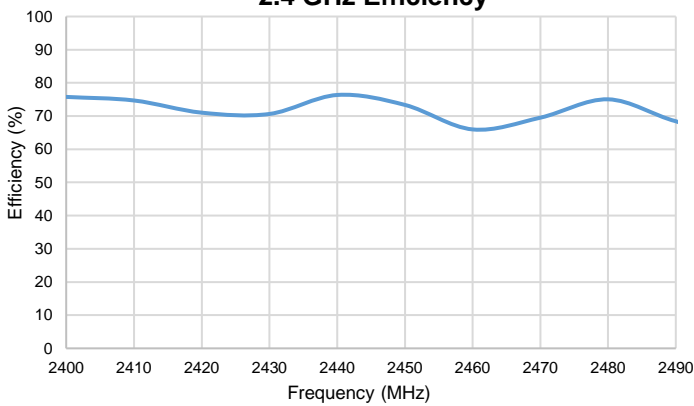
2.4 GHz Return Loss



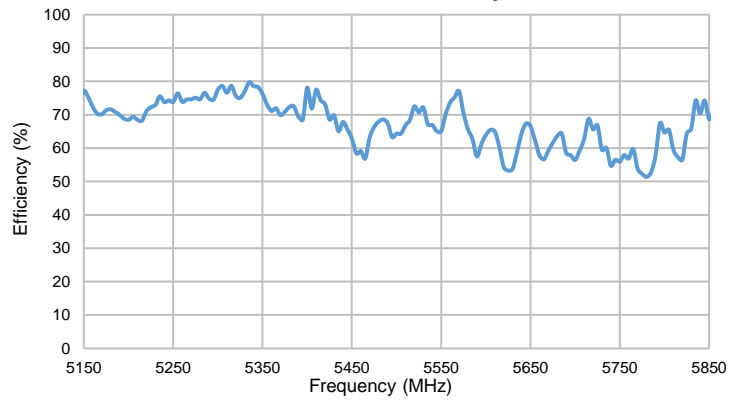
5 GHz Return Loss



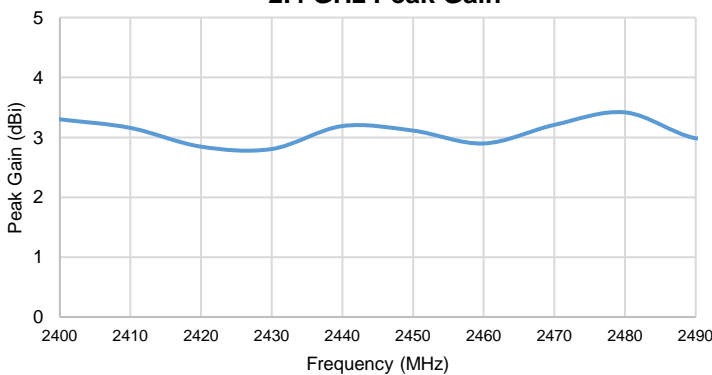
2.4 GHz Efficiency



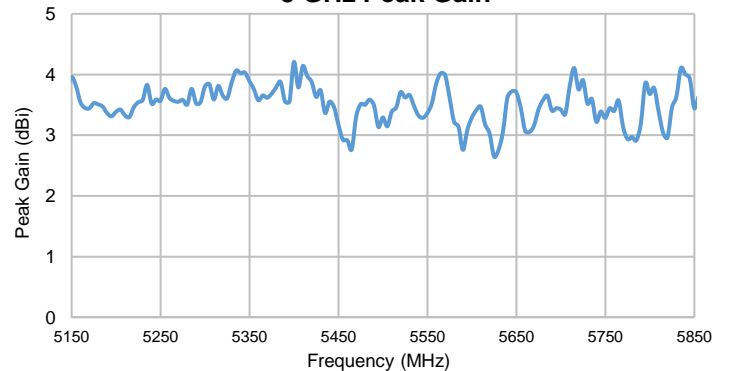
5 GHz Efficiency



2.4 GHz Peak Gain



5 GHz Peak Gain





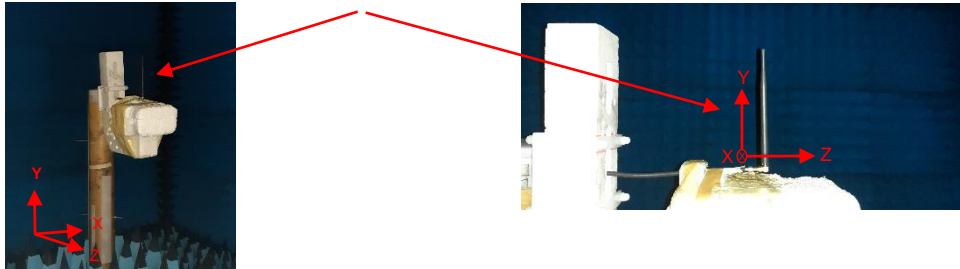
Wi-Fi Dual Band External antenna specifications

Ethertronics produces a wide variety of standard and custom antennas to meet user needs

Radiation Patterns Plots

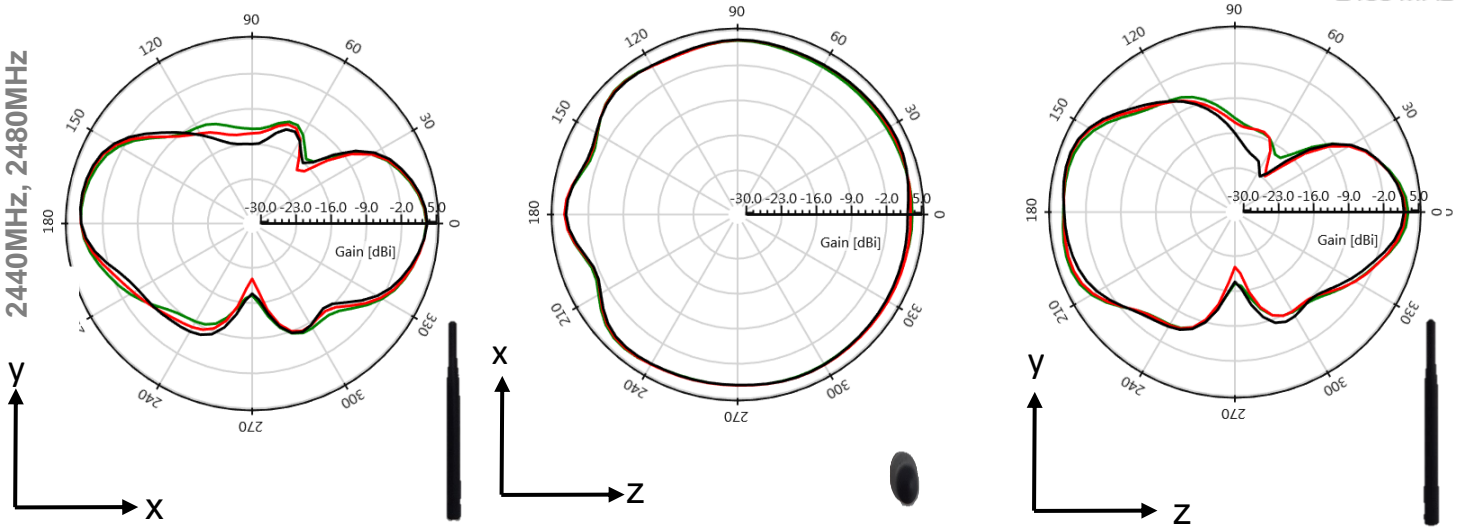
Typical performance measured in Free Space

X9001748-W3DRMB



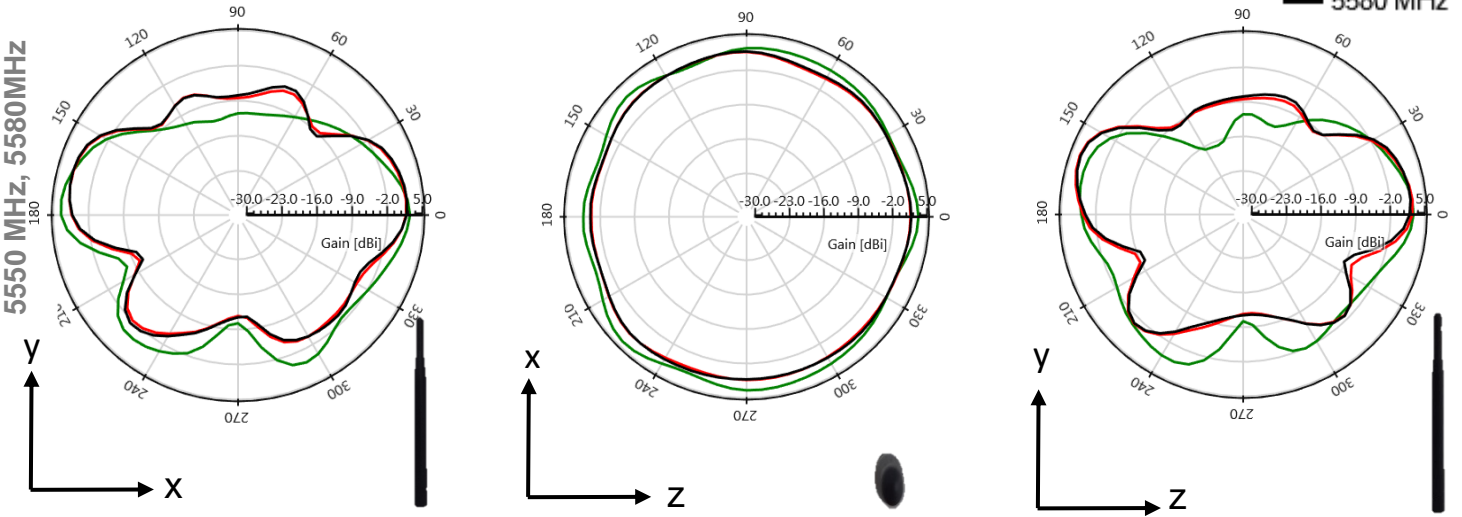
— 2400 MHz
— 2440 MHz
— 2480 MHz

Measured at 2400 MHz, 2440 MHz, 2480 MHz



— 5150 MHz
— 5550 MHz
— 5580 MHz

Measured at 5150 MHz, 5550 MHz, 5580 MHz





EU W3 / LTE External antenna specifications

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Mechanical Specifications

Typical antenna dimensions in mm

Part Number	A (mm)	B (mm)	Connector	Color
X9001748-W3DRMB	180.00 ± 2.00	12.98 ± 0.20	RP-SMA	Black
X9001748-W3DSMB	180.00 ± 2.00	12.98 ± 0.20	SMA	Black
X9001748-W3DRMW	180.00 ± 2.00	12.98 ± 0.20	RP-SMA	White
X9001748-W3DRMW	180.00 ± 2.00	12.98 ± 0.20	SMA	White

