



FibeAir® 4800 PoE

All-outdoor Fast-Ethernet license exempt wireless radio with power over Ethernet solution

Introducing FibeAir 4800 PoE

The FibeAir 4800 product portfolio consists of high capacity, cost-effective wireless broadband solutions. FibeAir 4800 products deliver carrier-class TDM and Ethernet services over a single platform in the 2.4GHz and 4.9-5.8GHz bands at high capacity and long range.

The FibeAir 4800 Power over Ethernet (PoE) solution is a member of the FibeAir 4800 product family. It is the ideal solution for service providers and private networks requiring immediate deployment of Ethernet services at an affordable price.

Extremely simple to install and operate, the FibeAir 4800 PoE solution can be up and running in just minutes, eliminating the delays and high costs associated with leased line and fiber-based solutions.

Typical Applications

Broadband Access

FibeAir 4800 PoE enables service providers to meet the high capacity bandwidth requirements of customers such as small and medium enterprises, government offices, education facilities and more. With the FibeAir 4800 PoE solution, service providers can rapidly deploy broadband data last-mile services and realize almost immediate return on investment.

Metro WiFi Backhauling

FibeAir 4800 PoE is the ideal solution for backhauling WiFi traffic. The solution is capable of supporting large-scale metro WiFi installations, providing backhaul to WiFi access points and metro WiFi networks in crowded environments.

Remote Site Connectivity

FibeAir 4800 PoE meets the needs of private networks such as enterprises, campuses, municipalities and government institutions that want to establish high-speed broadband connectivity between offices quickly and affordably.

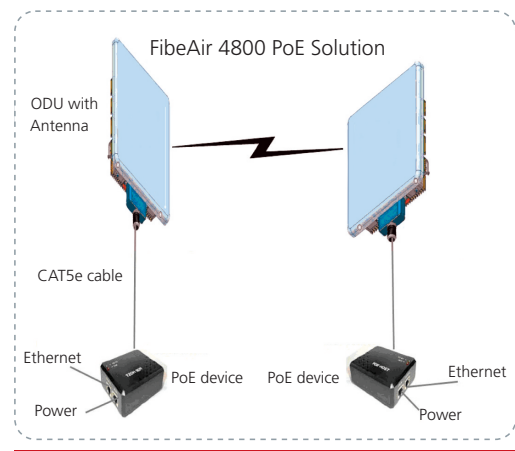
Surveillance

FibeAir 4800 PoE is capable of transmitting high resolution video signals over Ethernet from established points of presence back to the control site.

FibeAir 4800 PoE Architecture

The FibeAir 4800 PoE solution consists of an Outdoor Unit device (ODU) with integrated/ external antenna, and a Power over Ethernet (PoE) device on each side of the link.

The PoE device supplies power over the same CAT5e twisted-pair cable that carries the Ethernet traffic to the ODU.



Specifications FibeAir 4800 PoE

Configuration	
Architecture	Outdoor Unit (ODU) with PoE device
IDU to ODU Interface	Outdoor CAT5e cable
Radio	
Frequency Bands	2.400 – 2.4835 GHz, 4.940 – 4.990 GHz, 5.150 – 5.350 GHz, 5.470 – 5.725 GHz (supports DFS/TPC), 5.725 – 5.850 GHz
Data Rate	Configurable up to 48Mbps
Channel Bandwidth	5, 10, 20 MHz
Duplex Technique	TDD
Modulation	OFDM – BPSK/QPSK/16QAM/64QAM
Transmit Power	18dBm max
Received Dynamic Range	>60dB
Error Correction	FEC k=1/2, 2/3, 3/4
LAN Interface	
Type	10/100BaseT Interface with Auto-negotiation (IEEE 802.3)
Framing/Coding	IEEE 802.3/U
Line Impedance	100Ω
VLAN Support	Yes (Transparent)
Connector	RJ-45
Maximum Frame Size	1800 bytes

Management	
Protocol	SNMP based
Network Management	PolyView (UNIX / WIN) or SNMPC based
Upgrade Capabilities	Local and remote 'over the air' software upgrade
Mechanics	
ODU Dimensions (with 1 ft flat integrated antenna)	30.5cm(H) x 30.5cm(W) x 5.8cm(D) Weight: 1.5kg/3.3lb
ODU Dimensions (with no integrated antenna)	24.5cm(H) x 13.5cm(W) x 4.0cm(D) Weight: 1.0kg/2.2lb
PoE device Dimensions	3.2cm(H) x 9cm(W) x 7.5cm(D), Weight: 0.16kg/0.35lb
Power and Mounting	
Power Feeding	110/220VAC, 50/60Hz
Power Consumption	<10W (ODU + PoE device)
Mounting	Pole and Wall
Environmental	
Outdoor Unit Enclosure	All weather cases
ODU Operating Temperatures	-35°C - 60°C
PoE device Operating Temperatures	0°C - 40°C
Humidity Outdoor unit	Up to 100% non-condensing

Antennas	2.400-2.4835 GHz	4.940-4.990 GHz	5.150-5.350 GHz	5.470-5.725 GHz	5.725-5.850 GHz
1ft Integrated Antenna					
Gain	16dBi	21dBi	22dBi	22dBi	22dBi
Beam Width	20°	9°	9°	9°	9°
Polarization	Linear	Linear	Linear	Linear	Linear
2ft External Antenna					
Gain	24dBi	27dBi	28dBi	28dBi	28dBi
Beam Width	8°	4.5°	4.5°	4.5°	4.5°
Polarization	Linear	Linear	Linear	Linear	Linear
* Higher gain antennas are available as well					
Regulation	2.400-2.4835 GHz	4.940-4.990 GHz	5.250-5.350 GHz	5.470-5.725 GHz	5.725-5.850 GHz
Radio					
FCC: 47CFR	Part 15, Subpart C	Part 90	Part 15, Subpart E		Part 15, Subparts C&B
IC	RSS-210		RSS-210		RSS-210
ETSI	EN 300 328			EN 300 216 V1.2.1	N 300 440 V1.3.1
Dynamic	supported	supported	supported	EN 301 893 V1.2.2	supported
Frequency Selection and Transmission Power Control (DFS/TPC)					
Safety					
TUV	60950, According to UL 60950				
CAN-USA	C22.2 No.60950				
EMC					
FCC	CFR Part15, Subpart B				
CAN-ETSI	EN 301 489-1				
Environmental					
ETSI	IEC 60721-3-4 Class 4M5, IP67				

Optional Outdoor Power over Ethernet (OPoE) Device

A specially designed Outdoor Power over Ethernet (OPoE) device can be separately ordered for use in harsh environmental conditions. In addition to the standard PoE functionality, the OPoE device offers a full outdoor solution with over current protection, over voltage protection and lightning protection.

Mechanics		Environmental	
Outdoor PoE device	24.5cm(H) x 13.5cm(W) x 4.0cm(D)	Outdoor PoE Enclosure	All weather cases
Dimensions	Weight: 1.3kg/0.6lb	Outdoor PoE Operating Temperatures	-25°C - 65°C
		Humidity Outdoor PoE	Up to 100% non-condensing



Outdoor PoE device



Corporate Headquarters
Ceragon Networks Ltd.
 Tel Aviv, Israel
 Tel: +972-3-645-5733
 Fax: +972-3-645-5499
 info@ceragon.com

Ceragon Networks, Inc.
New Jersey, USA
 Tel: +1-201-845-6955
 Fax: +1-201-845-5665
 Toll free: 1-877-FIBEAIR
 infous@ceragon.com

Ceragon Networks
(UK) Limited
 Redditch, UK
 Tel: +44-(0)-1527-591900
 Fax: +44-(0)-1527-591903
 infoeuro@ceragon.com

Ceragon Networks,
S.A. de C.V
 Mexico D.F, Mexico
 Tel: +52-55-5663-2914
 Fax: +52-55-5663-2841
 info@ceragon.com

Ceragon Networks (HK) Ltd.
Singapore RO
 Singapore
 Tel: +65-6339-3110
 Fax: +65-6339-1310
 infoapac@ceragon.com