



Packet Power[®] Environmental Monitor



Product Specification

Introduction

The **Packet Power Environmental Monitor (EM)** offers precise and cost-effective temperature and humidity monitoring. Wireless communication between EM devices makes installation easy.

Overview

The Packet Power EM provides wireless temperature and humidity tracking capabilities in a small, easily installed device. It can gather temperature data from up to seven monitoring points and humidity at one point per EM device. Multiple Packet Power EM devices can be used within a facility.

The Packet Power EM leverages the full capabilities of Packet Power's wireless data collection infrastructure. The Packet Power EM instantly begins sharing information across the wireless network with other EM devices and any Packet Power Smart Power Cables installed in the facility. Information from all monitoring points is then made available for use in local software applications or Packet Power's cloud-based Energy Analysis Service.

Key features

- High precision measurement ($\pm 1^\circ \text{C}$ and 1% relative humidity)
- Map temperature reading to facility layout diagrams
- Generate alerts if temperature becomes too high or too low
- Track hundreds of monitoring points per facility in single or multiple facilities
- Access information in real time via web portals and facility maps
- Detailed, easily customized reports show long-term trends

Configuration Options

The Packet Power EM can be used in any combination of the following configurations:

- Single Rack: temperature sensors at the top, middle and bottom of both the front and back
- 2-Rack: three temperature sensors in the front of each of 2 adjacent racks
- 6-Rack: one temperature sensor in each of 6 adjacent racks
- One humidity sensor can be included within each EM device

Operating Environment

Indoor use only. Powered by two AA batteries or a 110–250V AC adapter. Each EM device will link to other nearby Packet Power monitoring devices over distances of 50 to 200+ feet per node.



Summary

- Captures seven temperature and one relative humidity readings per unit in near real time.
- Leverages the Packet Power Data Grid wireless network for easy deployment
- Scales to hundreds of monitoring points and multiple facilities
- Enables real-time facility heat maps
- Fully integrates with Packet Power's Smart Power Cables and software offerings

Overall Solution Components

- Optional Smart Power Cables record detailed power usage in real time (A, V, W, VA, kWh and frequency)
- Fail-safe design ensures continuous power flow
- Wireless design for easy data gathering

Smart Power Cables



- Self-configuring wireless mesh network of monitoring devices
- Ethernet Gateway gathers data from hundreds of power cables or EM devices
- System requires just one Ethernet port and IP address
- Energy usage data is transmitted to analysis service

Wireless Data Network



- Complete Energy Analysis System offers cloud-based reporting and analysis applications, secure data storage and fast, simple installation
- Access data via reports, web portals or XML
- Can also provide data via SNMP to an existing local monitoring application.

Monitoring and Analysis

