



# Ethernet Communications Board

SENTINEL®

Itron, Inc. announces the under-the-glass SENTINEL Ethernet Communications Board, giving Ethernet/IP access to meters virtually anywhere.

- » Retrieve billing data
- » Download meter data
- » Program meters
- » Retrieve diagnostic data
- » Create HHF billing data files
- » Retrieve SiteScan Diagnostic Snapshots™
- » Reconfigure meters
- » Update meter register firmware

## FEATURES

### Email Home On Event™

- » Trigger email with up to 20 different events that cover diagnostics, security logon failure, errors and meter activities
- » Power up
- » Loss of phase
- » Voltage quality event
- » Low battery
- » Reverse power flow

### Web Pages Hosted in the Meter

- » One standard Web page with six views
- » Using Microsoft Internet Explorer or Netscape
- » Four optional advanced Web pages

### Web Page Developer's Kit

- » Utilities can now develop their own Web pages
- » Allows utilities to customize the look and feel of their Web pages

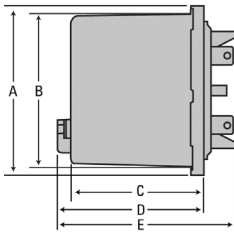
### Reference Information

- » SENTINEL Meter Technical Reference Guide
- » SENTINEL Meter Overview Brochure
- » SENTINEL Meter Specification Sheet
- » Electricity Price Bulletin
- » SENTINEL Fixed RF Network Order Specification Form

## Software support for SENTINEL Ethernet features

	PC-PRO+® Advanced	PC-PRO+ Views	MV-90	Shop-Pro™
Static IP address	x	x	x	x
Dynamic IP address	x	x	x	x
No encryption	x	x	x	x
128, 192 or 256 bit encryption communication	x	x		x
Programs SENTINEL meter	x			x

## Polycarbonate Dimensions



## SPECIFICATIONS

### Dimensions

Polycarbonate				
A	B	C	D	E
6.95"	6.31"	5.46"	6.00"	7.30"
17.65 cm	16.03 cm	13.87 cm	15.24 cm	18.54 cm

### Shipping Weights

Polycarbonate		
	Pounds	Kilograms
4 Meter Cartons	20.2 lbs.	9.2 kg
1 Socket Base	7.5 lbs.	3.4 kg

### Specifications

Power Requirements	Voltage Rating: -20% to +10% of nominal voltage (1 or 3 phase) Operating Range: 45 to 65 Hz	Operating Voltage: ±20% Frequency: 50-60 Hz	
Load Profile/ TOU Battery	Voltage: 3.6 V nominal Carryover: 12 years minimum	Operating Range: 3.4 V- 3.8 V Shelf Life: 25 years min.	
Time	Line Sync: Power line frequency		
Operating Environment	Temperature: -40° to +85°C Humidity: 0% to 95% non-condensing		
Transient / Surge Suppression	ANSI C37.90.1-1989 FCC Part 15, Class B ANSI C62.41-1991		
Accuracy	ANSI C12.20: 1997 for class 0.2 meters		
Characteristic Data	Starting Current:		
		0.005 amps (Class 20)	
		0.050 amps (Class 200)	
		0.080 amps (Class 320)	
Burden Data	Voltage	Watts	VA
	120	1.3	2.2
	240	1.6	3.1
	277	1.7	3.4
	480	2.4	5.2

## ETHERNET BOARD FAQs

### Questions

**Q** Is the Ethernet Meter available?

**A** Yes.

**Q** Is this board external or internal?

**A** Internal.

**Q** Is the Ethernet board compatible with existing KYZ output Supplemental I/O Boards?

**A** Yes, 1KYZ, 1KY outputs; 2KYZ, 1KY outputs; 4KYZ, 1KY outputs.

**Q** Do I need special software to view Web pages?

**A** No. Use Internet Explorer or Netscape.

**Q** Which SENTINEL version is the Ethernet Communications board available for?

**A** Firmware 5.0 meters.

**Q** What is the standard length for the RJ-45 cable?

**A** 6 feet.

**Q** How many email addresses are available for Email Home On Event?

**A** One.

**Q** Can I retrieve billing data via Ethernet?

**A** Yes, with MV-90, EnergyAudit™ or PC-PRO+® Advanced software with HHF files.

**Q** What data can be viewed by a browser?

**A** Web pages hosted in meter.

**Q** What meter types support internal Ethernet card?

**A** Socket-base, A-base or Switchboard configurations.

**Q** What type of network can the meter communicate on?

**A** Fiber, BPL, WAN/LAN and Motorola® Canopy network.

**Q** Will the meter have a MAC address assigned to it?

**A** Yes. The MAC address will be printed on the nameplate of the meter.

**Q** Are features like multi-drop available for the Ethernet option?

**A** No. Each meter requires its own IP address.

**Q** If I don't order a meter with Ethernet, can I choose to add this option at a later date?

**A** Yes. Meter must be firmware 5.0. An Ethernet kit is being developed.



At Itron, we're dedicated to delivering end-to-end smart grid and smart distribution solutions to electric, gas and water utilities around the globe. Our company is the world's leading provider of smart metering, data collection and utility software systems, with over 8,000 utilities worldwide relying on our technology to optimize the delivery and use of energy and water.

To realize your smarter energy and water future, start here: [www.itron.com](http://www.itron.com)

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