

3 Phase Electric Meter

ENPM350SER -Serial | ENPM350IP - Internet Protocol



Efficiently simple and cost effective



Features

- 3 energy and power sub-meter
- Din Rail mounting
- Measures comprehensive range of energy and power parameters
- mV CT input
- 5 year warranty
- UL, CE, C-Tick accredited

Communications Options

IP Ethernet

- Modbus TCP over Ethernet
- 3 scalable Pulse Inputs to measure other Utilities, Gas, Water etc
- Web Pages show all main Energy Parameters

Modbus RTU

- Modbus RTU serial communications over RS 485

3 Phase Electric Meter

ENPM 350



Don't let the simple looks of the ENPM 350 fool you, this is a powerful, feature rich multifunction meter. The Rail 350's 'Right First Time' setup includes the Auto-rotation functionality for CTs which may be installed incorrectly. This effort to minimize and correct any installation issues, married to the 5 year warranty and extensive data sets available via the communication ports makes this the perfect system to work with Entuit platforms for sub metering applications.

Standard Communications are either RS485 Modbus or IP communications, MODBUS TCP and other TCP/IP protocols including HTTP, FTP, TFTP, SNMP. These protocols make this the ideal meter to interface directly with Entuit IoT IOT Platforms. The web pages on the IP enabled Rail 350 allows the user to view important instantaneous values and access the setup pages should the need arise to change any of the parameters.

Options

- **MODBUS RTU serial**
- **MODBUS TCP ethernet**

Technical Specifications Rail 350

Multi-Parameter available via Display & MODBUS TCP/IP

	All Phases	Sum
Volts, L-N & L-L	●	
Amps	●	
Power Factor	●	●
Import kWh, kvarh		●
kW	●	●
Frequency		
Hours run (on load)		●
Export kWh, kvarh		●
Inductive and capacitive kvarh		●
Peak Volts, L-N	●	
Peak Amps	●	
Neutral Amps		●
kW, kVA & kvar	●	●
kW, kVA & kvar Demand		●
Peak kW, kVA, & kvar Demand		●
Average Volt & Peak	●	
Amp Demand & Peak	●	

True RMS measurement of Volts & Amps – and true Power Measurement – to the 30th harmonic at 50Hz (>25th@60Hz).

SAFETY
Conforms to EN 61010-1 Overvoltage Category III Accreditation UL, CUL, RCM/C-Tick, CB, CE

INPUTS

System	3 Phase 3 or 4 Wire Unbalanced Load	
Voltage	480/277V 110/63V	
Current	0.333V CT's	
Measurement Range	Voltage	20% to 120%
	Current	0.2% to 120%
Frequency Range	Fundamental	45 to 65Hz

AUXILIARY SUPPLY

Option 110V 50/60Hz at 5W max

ACCURACY

kWh	Class 1 per EN 62053-21 & BS 8431 ANSI C12.20 Class 0.5
kvarh	Class 2 per EN 62053-23 & BS 8431
kW & kVA	Class 0.25 IEC 60688
kvar	Class 0.5 IEC 60688
Amps & Volts	Class 0.1 IEC 60688
PF	±0.2°
Neutral Current	Class 0.5 IEC 6068

PULSE OUTPUTS

Function	1 pulse per unit of energy
Scaling	Configurable
Pulse duration	0.1 second default (other durations configurable)
Type	N/O volt free contact. Optically isolated.
Contacts	100mA ac/dc max; 70Vdc/33Vac max ; 5W maximum load
Isolation	3.5kV 50Hz 1 minute

GENERAL

Operating	-10°C - 55°C, (14°F - 131°F)
Storage	-25°C - 70°C, (-13°F - 158°F)
Humidity	<75% non-condensing
Environment	IP20

MECHANICAL

Terminals	Rising cage. 4mm ² (12AWG) cable max
Enclosure	DIN 43880, 6 modules wide
Material	Noryl® with fire protection to UL94-V-O. Self extinguishing.
Dimensions	106x90x58mm (4.2"x3.5"x2.3")
Weight	~ 150 gms (0.33lbs)

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