

PowerLogic™ ION7400 firmware version 4.6.0

Firmware version 4.6.0 (V004.006.000) for the PowerLogic™ ION7400 includes new features and changes that enhance the functionality and security of your meter.

We recommend upgrading your device to this firmware version.

Release date: April 2025

Download link: [ION7400 series firmware release download page](#)

In this document

What's new	1
BACnet	1
Increased data recorder linking capacity	2
Password complexity enforcement	2
Additional values over Modbus	2
DLMS improvements	3
Before upgrading	3
Firmware upgrade procedure	3
More information and resources	3

What's new

This section lists what's new in firmware version 4.6.0.

BACnet

After upgrading to firmware version 4.6.0, your device can communicate using BACnet. Your device conforms to ANSI/ASHRAE 135 (Version 1, Revision 16) with a BACnet Smart Sensor (B-SS) device profile.

BACnet (Building Automation and Control Network) is an open communication protocol used to automate and control building systems. The American Society of Heating, Refrigerating and Air-Conditioning Engineers (ASHRAE) maintains the BACnet standard. Your device can act as a BACnet/IP server, making specific values available to your building automation system. BACnet/IP is an Ethernet-based BACnet network type that uses UDP/IP packets.

For more information on how to configure BACnet, see the PowerLogic™ ION7400 series User Manual on www.se.com.

For more information on the BACnet Options Module, see *ION Reference*, available on www.se.com.

Increased data recorder linking capacity

Data recorders can now have up to 50 linked sources, a significant increase from the previous limit of 16. This expansion allows for more comprehensive data collection and analysis, providing additional flexibility and insights for monitoring your power system.

NOTE:

- Data recorders with pre-trigger recording or post-trigger recording turned on have a limit of 16 linked sources.
- The number of Data Recorder modules that can have *Insert Outage Records* turned on is limited depending on your feature set:
 - Advanced and Standard: 19
 - Essential: 10

For more information on the Data Recorder Module, see *ION Reference*, available on www.se.com.

Password complexity enforcement

Firmware version 4.6.0 introduces the ability to enforce password complexity and length requirements according to:

- NERC CIP-007-5
- IEEE 1686-2013

For more information on how to set up password complexity enforcement, see the PowerLogic™ ION7400 series User Manual on www.se.com.

Additional values over Modbus

The following values can now be read over Modbus:

- The device Unix time.

An unsigned 32-bit integer representing how many seconds have elapsed since 00:00:00 UTC on January 1, 1970 (excluding leap seconds).

- The device commercial reference using Modbus function code 43 (Read Device Identification). The device commercial reference is stored in the ProductCode object (0x01) returned by function code 43.

NOTE: The device commercial reference is only available over Modbus on devices shipped with firmware version 4.6.0 or later. Devices upgraded to firmware version 4.6.0 will not have the device commercial reference available over Modbus.

For more information on the values available over Modbus, see your device Modbus map, available in the device firmware package.

DLMS improvements

Reduced response time when using DLMS for log retrieval.

For more information on DLMS, see the PowerLogic™ ION7400 series User Manual on www.se.com.

Before upgrading

Before upgrading to this firmware version:

- Back up all meter data.
- Install ION Setup v3.2.25037.01 or higher.

For details on what to back up in your meter and how to get the latest ION Setup, see "Meter firmware upgrade prerequisites" in the PowerLogic™ ION7400 series User Manual.

Firmware upgrade procedure

For details on how to upgrade the meter firmware, see the PowerLogic™ ION7400 series User Manual on www.se.com.

More information and resources

Visit www.se.com to download:

- The firmware upgrade files.
- The latest template and webpage files.
- The BACnet and ION Technology Technical Note.
- The BACnet Protocol Implementation Conformance Statement for your device.
- The latest user manual, technical datasheets, and installation guides.