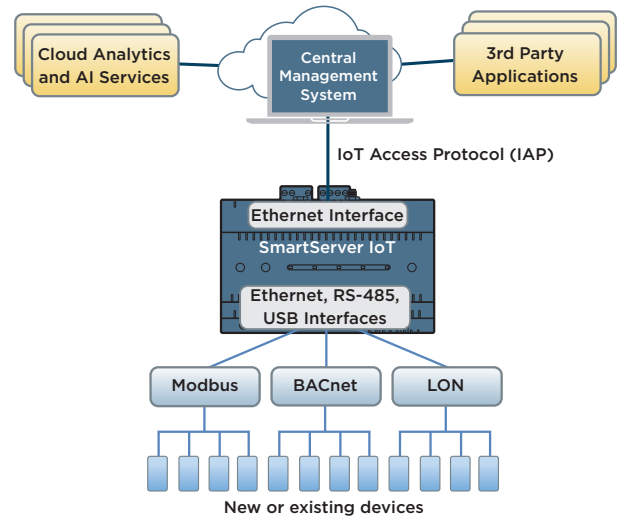


SmartServer™ IoT Edge Server



SmartServer IoT delivers device data via IoT Access Protocol

Product Description

The SmartServer™ IoT is an extensible, and open multi-protocol IoT gateway for industrial, building automation, energy management, commercial and lighting applications. It provides out-of-the-box access to industrial devices using field protocols including LON®, BACnet and Modbus. The SmartServer IoT provides management, monitoring and control services of smart devices, enabling the intelligent use of data. It may be used as a standalone server or integrated with another control system and is capable of both local and remote control. Built-in drivers provide connectivity for industry-standard protocols and custom driver support extends its flexibility.

IoT Access Protocol

SmartServer IoT features the Echelon IoT Access Protocol™ (IAP) API that unlocks the value of data within existing automation and control networks as well as new industrial IoT networks. This API provides open interfaces via IoT-standard MQTT and REST protocols. Using the API, developers can create local or remote applications and web pages that provision, manage, monitor and control field devices using LON, BACnet, and Modbus protocols. The API also provides access to essential shared services provided by the SmartServer IoT including scheduling, logging and alarming.

Features and Benefits

- Enables OEMs and system integrators to **embrace** existing industrial devices, and **extend** new and legacy systems, to **enhance** efficiency and ROI
- Interfaces for Industrial IoT device protocols including LON, BACnet, Modbus and M-Bus
- Modern MQTT and REST web-services interfaces based on IoT Access Protocol (IAP™)
- Built-in device management with local services for scheduling, logging and alarming
- Access to local and cloud-hosted LumInsight® Central Management System
- Multi-channel support with optional local I/O expansion
- Programmable customer applications and extensible drivers
- Compatible with IzoT® Net and LNS Installation Tools

Project:

Date:

Detail:

Product Specifications

Hardware and electrical specifications

Processor:	800 MHz ARM Cortex A9
Operating system:	Linux
Security:	TLS with AES 128-bit encryption
Clock:	Internal, real time
Built-in memory:	2 GB DDR3L SDRAM 8 GB eMMC flash memory
Memory expansion:	Micro SD card slot
Device support:	Up to 1,000 PL devices, 2,000 total devices; 100,000 datapoints
Input voltage:	10.5-30VDC or 12-30VAC, 50/60Hz
Temperature range:	-40°C to +70°C
Surge protection:	EN 61000-4-5:2006, +/- 4KV
Mounting:	DIN 43880 8TE
Shock:	100g or 1000m/s ²
Vibration:	6g or 59m/s ²

Wired interfaces

Gigabit Ethernet:	2 RJ-45 jacks for WAN and LAN, including LON IP-70 and IP-852, Modbus TCP, and BACnet/IP
RS-485:	2 4-pin terminal blocks for Modbus RTU, BACnet MS/TP and other RS-485 communication

Type A USB 2.0:	4 ports for local IoT network and I/O interfaces
Micro-B USB:	1 console port
USB OTG:	1 flash memory port

Wireless interfaces (optional)

IEEE 802.11 b/g/n:	2.4GHz Wi-Fi supporting smart phone setup
Bluetooth 3:	2.4GHz for local wireless I/O
IEEE 802.15.4:	Control-M, 902-928 MHz RF power +24 dBm (250mW); range up to 2 miles (3.2km) line-of-sight

External interface support

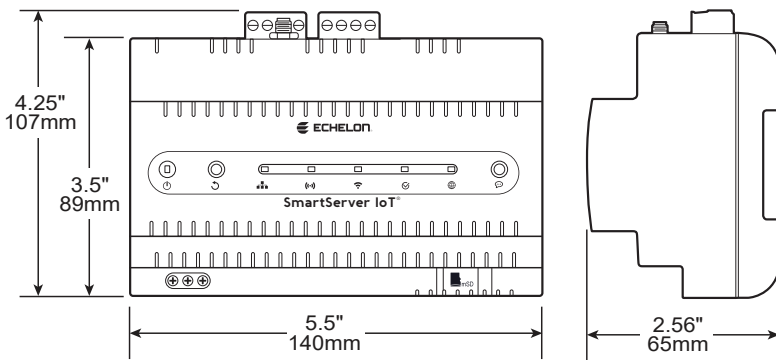
Supports up to 8 optional external interfaces, sold separately:

- 75060R-30 U60 TP-1250 DIN USB Network Interface
- 75060R-40 U60 FT DIN USB Network Interface
- 75070R-70 U70 PL DIN USB Network Interface
- 41700-100 IOX I/O Expander
- 41700-110 IOX I/O Expander with Metering Input

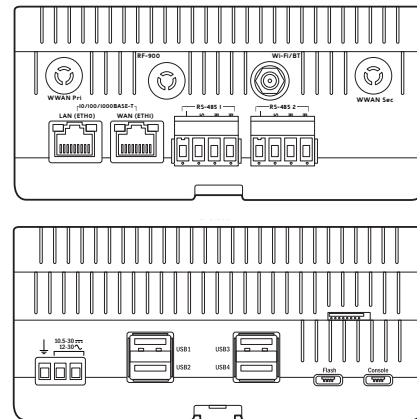
Safety, compliance and warranty

Agency approvals:	FCC, CE, IC, and CCC
EMC:	FCC Part 15 Class B, EN55022 Class B, EN55024, CISPR 24 Class B, CISPR 32 Class B, VCCI Class B
Warranty:	1 year limited warranty

Dimensions, Mounting and Connections



SmartServer IoT is designed for DIN-rail mounting



Top: Ethernet jacks, RS-485 terminals and coax antenna connector
Bottom: Power input terminals, USB ports, flash memory, and console interfaces

Model #	Product Name	Product Description
72201R-240	SmartServer IoT Pro	IoT platform with USB expansion, supports up to 300 devices
72201R-248	SmartServer IoT Pro Wi-Fi	IoT platform with Wi-Fi, Bluetooth, USB and RS-485 expansion, supports up to 300 devices
72201R-249	SmartServer IoT Pro RF-900	IoT platform with RF-900 radio for Control-M 802.15.4 lighting controls, supports up to 300 devices
72210-BAC	SmartServer IoT BACnet Key	Unlocks BACnet/IP and BACnet MS/TP support for a SmartServer IoT
72220-XXXX	SmartServer IoT Device Capacity Key	Unlocks additional device support for a SmartServer IoT (XXXX=500, 750, 1000, or 2000)
72230-XXXX	SmartServer IoT API Key	Unlocks API access for a SmartServer IoT (XXXX=300, 500, 750, 1000, or 2000)

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