Automatic reliability

Eaton's ATC-300+ is a comprehensive, multi-function, microprocessor-based automatic transfer switch (ATS) controller. It is a compact, self-contained, panel-mounted device that protects critical electrical loads against loss of power.

Designed with the user in mind

The ATC-300+ is equipped with a two-line LCD display and includes a high-contrast green background that displays all monitored parameters and program set points as well as enables users to view messages and access help prompts in easy-to-read formats.

Using the integrated keypad buttons and local menu, users can display a variety of electrical system values or program the controller.

Industry-standard communication protocol

The ATC-300+ is communication capable via Modbus® RTU (remote terminal unit). This industry-standard protocol provides serial communications with Eaton or third-party platforms, such as a building management systems, power management systems or Eaton's Power Xpert® architecture. ❶

Remote control inputs

- Source 2 inhibit/shed—disconnect load from emergency power
- Manual retransfer—initiate load retransfer from emergency to normal power
- Go to source 2—initiate a load transfer from normal to emergency power
- Lockout—overcurrent device (trip open) disables automatic operation
- Monitor mode—disable automatic transfer control

Output relays (Form C)

- Pre-transfer
- General alarm
- Engine-generator start

Features and benefits

- Real-time monitoring of the normal (source 1) and emergency (source 2) power sources
- Self-acting automatic transfer of the electrical load between power sources
- Industry-standard communication—serial (RS-485/Modbus RTU) and Ethernet (via optional module)
- Remote management of single or multiple ATSs with a human-machine interface (HMI) and Eaton's Remote Annunciator Controller (RAC) (optional module)
- Engine start/shutdown signaling (Form C contacts) provides means to comply with NEC® 695.14(F) and NEC 700.10(D)(3)
- Single- or three-phase voltage and frequency sensing
- Programmable set points
- LED mimic screen with source available and source connected indication
- Two-line, 16-character LCD
- Passcode protection
- UL® 1008 / CSA® 22.2-178 compliant
- Pushbutton for loaded/unloaded engine-generator test
- Programmable plant exerciser
- Open transition (time delayed or in-phase monitoring)
- Utility generator and dual utility configurations
- Detailed and time-stamped event log and history
- Diagnostics and troubleshooting with pre-/post-event data capture
- Phase rotation sensing
- Voltage imbalance sensing

❶ Reference the ATC-300+ Modbus Communications Guide (document number IB140004EN) and the ATC Controller and Remote Annunciator Design Guide (document number DG140004EN) for more information.

Powering Business Worldwide

Strategic asset management

In addition to facilitating the automatic transfer of power during loss of utility, the ATC-300+ integrates into Eaton's Power Xpert architecture, where meters, gateways and monitoring devices collaborate to create a unified, centralized view of the end-to-end power and facility infrastructure.

Power Xpert complements any ATS solution by keeping a constant pulse on system health through its monitoring capabilities and provides the ability to manage your power system as a strategic asset.

The system is capable of delivering a comprehensive view across the network—often from any PC with an internet browser. Power Xpert can also provide a complete log of events, a feature that is invaluable when debugging a power anomaly.

With access to accurate, real-time information from the ATC-300+, the Power Xpert architecture can transform your power system into an integrated, agile system and an easily managed entity that performs better and costs less.

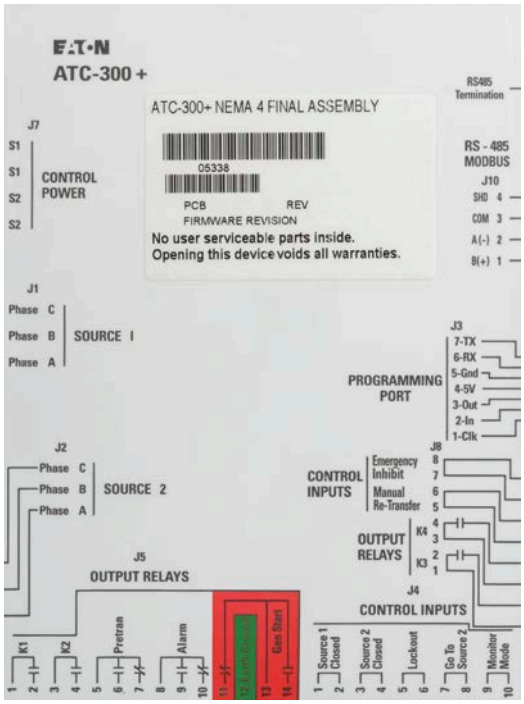
Remote monitor and control

Eaton's RAC easily interfaces with the ATC-300+ and provides users with the ability to remotely monitor and control multiple ATSs from a single intuitive HMI via a robust touchscreen.

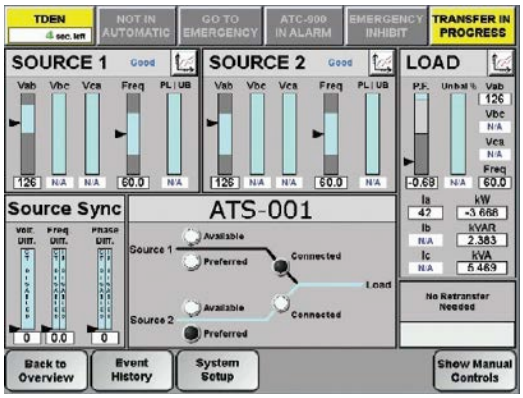
ATC-300+ selection

Description	Specification
Control voltage	65–145 Vac
Nominal voltage	120–600 Vac
Voltage sensing	Source 1 and Source 2
Voltage range	0–790 Vac rms
Voltage accuracy	±1% of nominal voltage
Nominal frequency	50 or 60 Hz
Frequency sensing	Source 1 and Source 2
Frequency range	40–70 Hz
Frequency accuracy	±0.3 Hz
Operating temperature range	–20 to +70 °C (–4 to +158 °F)
Storage temperature range	–30 to +85 °C (–22 to +185 °F)
Operating relative humidity	Up to 95% (noncondensing)
Dimensions in inches (mm) height x width x depth	8.50 (215.9) x 6.50 (165.1) x 2.84 (72.1)

Note: Specifications are subject to change without notice and represent the maximum capabilities of the product with all options installed. This is not a complete feature list. Features and functionality may vary depending on selected options, firmware version and product model. Please refer to O&M Manual for detailed specifications.



ATC-300+ (rear view)



RAC with HMI touchscreen

Eaton
1000 Eaton Boulevard
Cleveland, OH 44122
United States
Eaton.com

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