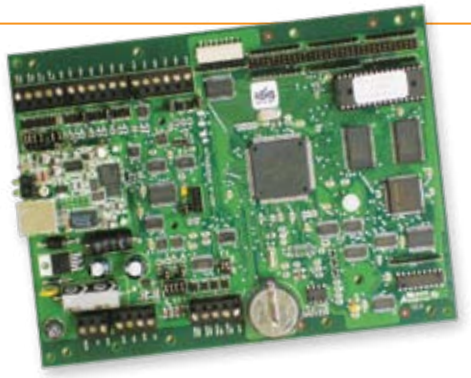
RS2 Technologies

a family of access management

HARDWARE SOLUTIONS

RS2 Technologies has developed an integrated family of access management hardware that can be configured to meet a wide variety of applications. It is built around our workhorse EP Series of System Control Processors, which are 32-bit microcontroller-based units that are scalable from 6 MB to 12 MB, making them a cost-effective solution for very small to very large systems. A variety of input/output modules, communications packages, options, and stand-alone systems provides almost unparalleled flexibility for system configuration.



The RS2 System Control Processor is the heart of every RS2 access management system.

System Control Processors

The EP Series of System Control Processors is the heart of the RS2 access management system. Each model stores its own database as well as all schedule information, including unlock/relock times, access times and holiday information. The SCP also supports precision card access, elevator access control, extended door unlock/allowed open timing (ADA required), and includes a full range of anti-passback capabilities.

RS2 PROCESSORS INCLUDE A VARIETY OF FEATURES:

- Communication options include serial, dial-up, or TCP/IP
- Memory configurations from 6 MB to 12 MB
- Support for up to 64 reader/input/output I/O panels
- Card capacity from 197,000 to 395,000 cards
- RS-485 2-wire ports
- "If.../Then..." type macro capability
- Flash firmware capability for easy field upgrades
- Support for up to 8 different card formats/technologies
- PIV-II, CAC, and TWIC card compatible.
- UL 294 recognized, CE (RoHS) compliant
- FCC Part 15 Class A, HSPD-12/FIPS 201
- AES 256-bit NIST Certified Encryption
- TTL compatible LED
- Onboard lithium battery for RAM backup and tamper/power failure status monitoring

EP SERIES SYSTEM CONTROL PROCESSORS ARE AVAILABLE IN THESE CONFIGURATIONS:

The EP Series includes the EP-1501, EP-1502 and EP-2500. All three are based on a 32-bit micro-controller and support multi-grouped holidays, precision access and multiple time zones.

EP-1501
Intelligent single-door PoE (Power over Ethernet) controller with dual reader ports which support separate IN/OUT readers (8 types). It is available in a standard 6MB memory configuration and includes one door contact, REX input, door strike relay, and programmable output relay.

EP-1502
Available in a standard 6 MB memory configuration, which will hold up to 197,000 cards and store 50,000 events. It supports up to 128 access levels per card and will support two doors. When combined with interface panels, it will support up to 64 readers, 512 input points or 512 output relays.

EP-2500
Available in a standard 12 MB memory configuration, which will hold up to 395,000 cards and store 50,000 events. It has two RS-485 ports and supports redundant host communications. It supports up to 8 active card formats (including OSDP) as well as card, PIN, and biometric access verification.

Stand-Alone Systems, Wireless/IP Locksets, Peripherals & Enclosures
In addition to its family of System Control Processors, RS2 offers a variety of peripherals, enclosures, accessories, wireless/IP locksets, and stand-alone "out of the box" systems, including its First Step[SM] PLUS System, NExT Step[SM] System, and Step Up[SM] System. Product descriptions can be found on the back side of this sheet.

CE RoHS compliant

Technologies
www.rs2tech.com

Stand-Alone Systems

RS2's First Step[SM] PLUS System is designed to address the needs of users who want an easy-to-install, cost-effective solution for simple door control. The First Step[SM] PLUS System combines the versatile, cost-effective EP Series of controllers with Access It![®] Lite.NET[TM] software. Expandability for two card readers and associated door hardware is provided through the MR-52 dual-reader interface module.

Our NExT Step[SM] System network appliance provides users with an economical and reliable two-reader (expandable up to 64 readers) access control solution that requires no computer or software installation. Users simply assign it an IP address and they're up and running. NExT Step[SM] can be accessed from any supported web browser, computer, or mobile device. It is built with solid state Authentic Mercury[TM] hardware, has no moving parts, and is highly secure. All the software is completely pre-installed. It does not require operating system updates.

Our Step Up[SM] System is a reliable, easy-to-install hardware retrofit offering a simple board swap of boards currently installed in legacy systems. The Step Up[SM] System is based on the reliable M5 Bridge from Mercury Security, which allows users to perform a simple board swap of every board currently installed in legacy enclosures with a comparable Step Up[SM] replacement.

Wireless/IP Locksets

Wireless/IP locksets lower costs by reducing installation labor, simplifying project management, and leveraging existing infrastructure. RS2 partners with ASSA ABLOY and IR Schlage by combining our Access It![®] access control software with wireless/IP and PoE locks from these manufacturers.

Peripherals and Enclosures

MR-50, MR-51E and MR-52 Input/Output Modules

The MR-50 will interface one card reader, one general-purpose input monitor point, two control relays, and associated door hardware. The MR-52 will interface two card readers, four general-purpose input monitor points, four control relays, and associated door hardware. The MR-51E is a network-ready and PoE-enabled I/O module that will interface one card reader or a set of paired card readers and associated door hardware (for a single door) and one generalpurpose control relay. It can be powered locally (from a DC power supply) or via a PoE-enabled Ethernet switch. When not connected to an SCP, the units are capable of locally processing access requests based on facility code verification.

MR-16OUT and MR-16IN Interface Modules

The **MR-16OUT** will interface 16 output control relays to an access management system through an SCP. Relay operation may be initiated by direct operator commands, by time schedules, or by event-based procedures.

The **MR-16IN** will interface 16 general-purpose input monitor points and two control relays to an access management system through an SCP. The MR-16IN can be used in elevator applications that require floor select capability. Both the **MR-16OUT** and **MR-16IN** will operate on 12-24 VDC.

RS2 I/O Modules are designed to interface with a variety of card readers, general purpose input monitor points, and output control relays.

Multiplexers

The **MUX-8** is an eight-port RS-485 multiplexer that takes an RS-485 or RS-232 input and multiplexes eight 2-wire RS-485 communication channels, providing numerous installation configuration options.

Enclosures and Options

RS2 **NCL**[SM] Series enclosures are rugged , NEMA approved, vented, 18-gauge steel enclosures, available in the following models:

- **NCL**[SM]: 18"(H) x 15"(W) x 4"(D) enclosure can accommodate up to three full-size boards or five mid-size boards.
- **NCL-12**[SM]: 24"(H) x 18"(W) x 4.5"(D) direct wire ready enclosure. (UL-approved NCL-12UL[SM] is also available.)
- **NCL-8-SPW**[SM]: 36"(H) x 24"(W) x 5"(D) SPW (Semi Pre-Wired) enclosure.
- **NCL-12-WMS**[SM]: 36"(H) x 24"(W) x 5"(D) with 1" x 3" wire management system.
- **NCL-SBE**[SM]: A single board enclosure (SBE) configured to hold any hardware boards.

All RS2 **NCL**[SM] enclosures include a dedicated tamper switch, cabinet security lock, hardware cabinet legend, and assorted knockouts and keyway locks.

Options for the **NCL**[SM] line include an adapter plate, linear and switching power supplies, and a battery backup. Power supplies include battery charger and power fail detection.

Microsoft Partner

RS2 Technologies
www.rs2tech.com