FUSION

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2 DOOR LOCK MANAGER DATASHEET

Part No. 04-153

The **2 Door Lock Manager** has a small footprint and is designed to be mounted on the secure side of the door. It controls 1 or 2 doors and supports up to **4 Card Readers** and **2 Electric Locks/Strikes**. It combines a power supply and door controller in a single panel.

It performs the following functions:

- Breaks out the power and data supplied down a standard CAT5e/6 cable from a Borer Midspan Bridge.
- Monitors door status settings (Door Open, Lock Status and Request to Exit button).
- Manages the power supplied to operate electric door locks and strikes.

Power over CAT5e/6 Cable technology powers equipment where it is inconvenient, expensive or not possible to provide a mains power outlet to the door. It provides electrical power and data to devices, such as card readers and electric door locks, over standard CAT5e/6 cable.

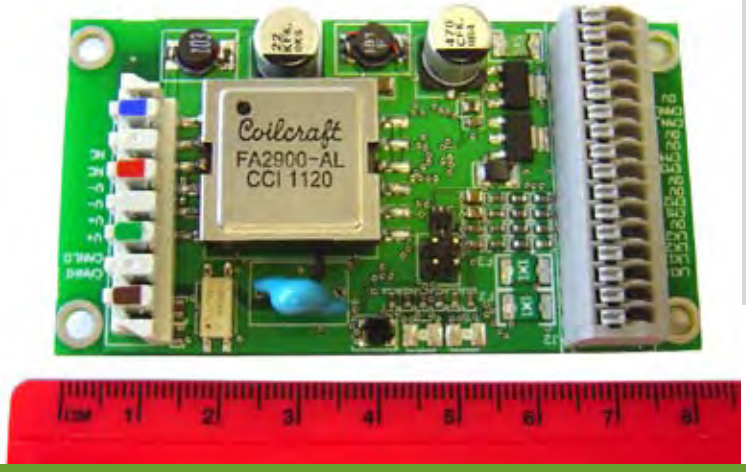
This solution requires 2 components as follows:

- **A Midspan Bridge** at the source that injects power into a standard CAT5e/6 cable system without affecting the data.
- **A Standard/Two Door Lock Manager** at the destination that splits power and data for delivery to local devices.

The power management chipset employed (IEEE 802.3 PoE plus standard), is designed for Power over Ethernet applications, providing protection against short circuit, polarity reversal and the accidental connection of PoE non-compliant equipment.

New!

Size: 82 x 45 x 19 mm



Features

Delivers Data and Power to control 2 Doors including electric locks over a single 300 metre (1000ft) run of CAT5e/6 cable.

Operating Modes Supported Include:

- 2 door control each with IN and OUT card readers and 2 electric locks;
- Single door control with IN and OUT card readers, electric lock and audible alarm or alarm circuit shunt output;
- Airlock/Interlock/Mantrap control sequencing 2 doors and only permitting one at a time to be opened;
- Locker/Cabinet control enabling 1 card reader to selectively control access to many doors.

Optional Local 12V Power Supply if the applications power demands exceed PoE current limits.

Quick Press Fit Terminal Connectors for a speedy install.

4 Digital Inputs each with 4 state monitoring and an optical tamper.

2 Solid State 12V DC Powered Outputs, selectable for fail safe and fail secure operation and able to deliver enough energy to power an electric door release.

Reprogrammable Firmware with Software Updates delivered over the LAN allows for the access control infrastructure to be updated and new technologies to be added.

Benefits

Enhances Security preventing door access by tampering with the card access reader head.

Safeguards the Electrical Equipment connected to the circuit by only supplying power following device identification and evaluation.

Protects the CAT5e/6 Cable by monitoring the energy delivered providing a 48V current limited power source.

Reduces Equipment Cost by eliminating the requirement for local main outlets, power supply and battery at every door.

Reduces Installation Cost by eliminating the local mains wiring, which in most countries, for legal or insurance reasons, has to be installed by a qualified and/or licensed electrician.

Reduces Energy Consumption by as much as 80% using intelligent power management.

Tel: +44 (0) 118 979 1137 UK Tel: (0) 845 155 9623 Fax: +44 (0) 118 977 3526 Email: info@borer.co.uk
Borer Data Systems Ltd, Crown House, Toutley Road, Wokingham, Berkshire, RG41 1QN
Web: www.borer.co.uk Registered in England No. 1207085

borer DATA SYSTEMS LIMITED

Technical

Installation:	For access control applications, the 2 Door Lock Manager is located on the secure side of the door.
Dimensions/Weight:	82 x 45 x 19 mm / 45g
Environmental Humidity Range: **Operating Temperature**	Interior / 10% to 80% non-condensing -20 to 60 C (-4 to 140 F)
CAN Network/Network Connection:	1 channel CAN, ISO 11898 standard for serial data communications
Transmission Network Data Rate:	CSMA-CA (Carrier Sense Multiple Access with Collision Avoidance) 125kbps
Cable Type/Power/Delivery:	Point to Point connection using CAT5e/6 Cable Max 24 Watts, 48 Volt, Max. 300 meters (1000ft) cable length
Diagnostic Indicators:	CAN TX, CAN RX, CAN Fault
Sensor Inputs:	4 digital inputs and with four state monitoring and an optical tamper
Lock Outputs:	Two 12 Volt DC, Current Limited (Variable under Program Control)
Alarm Reporting:	Door Ajar, Door Forced, Tamper, Egress Made (Handle or Push to Exit Switch)

How it works

Installation:	The 2 Door Lock Manager (LM) when used with an electric lock or a magnetic lock is mounted on the secure side of the door. The REX, door open monitor and lock power supply are connected to the LM and a separate power/data cable connects the LM to the IN and/or OUT readers. A CAT5e/6 cable connects the LM to one of the 8 ports on the Midspan Bridge.
Commissioning:	Following installation, power is applied to the LM by plugging the CAT5e/6 cable into the Midspan Bridge. Once powered, the LM and associated card readers automatically connect and log on to the server. The user will then, via software, create a logical association between the LM and its reader heads.
Operation:	Communications between the central server, the LM and its associated readers are conducted over the LAN and CAN networks using an encrypted data link. An access request at a card reader is referred to the server and once the server verifies the request, the card reader instruct the LM to unlock the door, thereby providing a uniquely secure (*card to database server*) solution, which is resistant to unauthorized access by either tampering with reader heads or injecting data into the signal wires.