

E100 Electronic Motor Overload Relay

Basic Motor Control and Protection

Features and Benefits

- 5:1 wide current adjustment range to cover a variety of motor applications in a single device
- Trip class 10 and 20 (selectable) to cover a wide range of motor applications
- 48% footprint reduction using pass-thru solution
- Agency recognized certification strategy across portfolio
- Accurate and repeatable settings to help minimize commissioning time
- Higher efficiency and low heat dissipation versus traditional eutectic or bimetal relays
- Pass-thru minimizes number of power terminal connections
- Built-in thermal memory and phase loss detection helps protect your motor investment

***The next generation of
Allen-Bradley basic-tier
electronic overload relays***



Overview

The new Allen-Bradley™ E100™ Electronic Motor Overload Relay can help customers better protect their motors and avoid unplanned downtime due to motor failure. As the next generation of Allen-Bradley basic-tier electronic overload relays for our scalable solution portfolio, it more accurately measures a motor's current load, models its temperature and can de-energize the motor to help minimize potential equipment damage due to overheating.

The E100 overload relay is part of the Rockwell Automation integrated motor control system. It can mount directly to bulletin 500 NEMA contactors and 100-C IEC contactors up to 100 A. The E100 basic model has two user-adjustable trip class settings of 10 and 20.

Optional accessories and expansion modules can extend the functionality of the E100 overload relays, enhancing motor overload protection while maintaining a cost-effective solution.

Additional Capabilities with Accessories:

- Jam & Ground Fault Protection
- Electronic Remote Reset
- Status Indication Display
- Anti-Tamper Shielding

The E100 is part of a comprehensive motor protection relay portfolio to provide you with a scalable solution for your motor protection needs. In addition to the E100, AB.com has additional information on the bulletins E200™ and E300™ electronic overload relay solutions as well.

Catalog Numbers





Current Range [A]	Mounting Style	Catalog Number
0.1 - 0.5	IEC Direct Mount	193-1EEAB
0.2 - 1	IEC Direct Mount	193-1EEBB
1 - 5	IEC Direct Mount	193-1EECB
3.2 - 16	IEC Direct Mount	193-1EEDB
5.4 - 27	IEC Direct Mount	193-1EEEB
5.4 - 27	IEC Direct Mount	193-1EEED
11 - 55	IEC Direct Mount	193-1EEFD
20 - 100	IEC Direct Mount	193-1EEGE
0.1 - 0.5	IEC Direct Mount	193-1EFAB
0.2 - 1	IEC Direct Mount	193-1EFBB
1 - 5	IEC Direct Mount	193-1EFGB
3.2 - 16	IEC Direct Mount	193-1EFDB
5.4 - 27	IEC Direct Mount	193-1EFEB
5.4 - 27	IEC Direct Mount	193-1EFED
11 - 55	IEC Direct Mount	193-1EFFD
20 - 100	IEC Direct Mount	193-1EFGE
0.1 - 0.5	NEMA Direct Mount	592-1EFAT
0.2 - 1.0	NEMA Direct Mount	592-1EFBT
1.0 - 5.0	NEMA Direct Mount	592-1EFCT
3.2 - 16	NEMA Direct Mount	592-1EFD
0.2 - 1.0	NEMA Direct Mount	592-1EFBC
1.0 - 5.0	NEMA Direct Mount	592-1EFCC
3.2 - 16	NEMA Direct Mount	592-1EFD
5.4 - 27	NEMA Direct Mount	592-1EFEC
11 - 55	NEMA Direct Mount	592-1EFFC
20 - 100	NEMA Direct Mount	592-1EFGD

For additional details on accessories and specifications please see technical data on ab.com:
[E100 Technical Data](#)
[E100 User Manual](#)

Current Range [A]	Mounting Style	Catalog Number
30 - 150	External CT Configurations	193-1EFHZ
40 - 200	External CT Configurations	193-1EFJZ
60 - 300	External CT Configurations	193-1EFKZ
100 - 500	External CT Configurations	193-1EFLZ
120 - 600	External CT Configurations	193-1EFMZ
160 - 800	External CT Configurations	193-1EFNZ
80 - 400	External CT Configurations	193-1EFWZ
1 - 5	Pass - Thru	193-1EECP
3.2 - 16	Pass - Thru	193-1EEDP
5.4 - 27	Pass - Thru	193-1EEEP
11 - 55	Pass - Thru	193-1EEFP
20 - 100	Pass - Thru	193-1EEGP
1 - 5	Pass - Thru	193-1EFCP
3.2 - 16	Pass - Thru	193-1EFD
5.4 - 27	Pass - Thru	193-1EFEP
11 - 55	Pass - Thru	193-1EFFP
20 - 100	Pass - Thru	193-1EFGP

Accessories

Accessory	Catalog Number
Base Unit Anti-Tamper Shield	193-1BC8
Universal Protection Module	193-1EGJ
Protection Accessory Anti-Tamper Shield	193-1EMC
240V AC Remote Reset Solenoid	193-1EMRA
120V AC Remote Reset Solenoid	193-1EMRD
24V DC Remote Reset Solenoid	193-1EMRZ
DIN Rail/Panel Adapter Frame B	193-1EPB
DIN Rail/Panel Adapter Frame D	193-1EPD
DIN Rail/Panel Adapter Frame E	193-1EPE
External Reset Adapter	193-1ERA
ERID Adapter	193-1ERR
Remote indication Display with Reset	193-ERID
Remote Indication Display - No Reset	193-1ERIDN
Accessory Panel/DIN Mounting Kit	193-1EIKIT1
Accessory Install Kit & Spare TBs	193-1EIKIT2

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