

30 mA Ground Fault (Earth Leakage) Modules



Clockwise from Left:
JG, LG, EG MCCBs Shown with
Ground Fault (Earth Leakage) Module

30 mA Ground Fault (Earth Leakage) Module

Product Description

Eaton offers three- and four-pole 30 mA ground fault (earth leakage) protection modules for Series G E-, J- and L-frame molded case circuit breakers (MCCBs). Separate UL listed and IEC rated devices are available for each frame.

The modules are bottom mounted and are available for each frame circuits up to:

- EG: 125 amperes
- JG: 150 (UL), 160 (IEC) or 250 amperes
- LG: 400, 600 (UL) or 630 (IEC) amperes

The module is completely self contained, including a current sensor, relay and power supply inside the device. Current pickup settings are selectable from 0.03 to 10 amperes for all devices, except for the UL listed module, for which settings are selectable from 0.03 to 30 amperes. Time delays are also selectable from Instantaneous to 1.0 second for pickup settings of 0.10 amperes and above. The current pickup setting of 0.03 amperes defaults to an Instantaneous time setting regardless of the time dial's position.

Two alarm contacts are included with each device, which can be wired externally for remote indication. Both of these are also indicated by an LED on the front of the device:

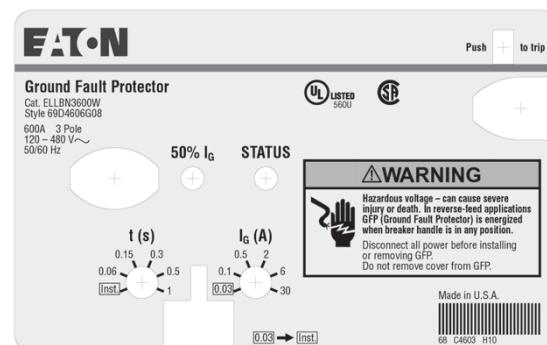
1. 50% pre-trip: alarms when the earth leakage current reaches 50% of the set pickup setting value.
2. 100% after trip: alarms when the breaker reaches the set pickup setting value and the breaker trips.

Contents

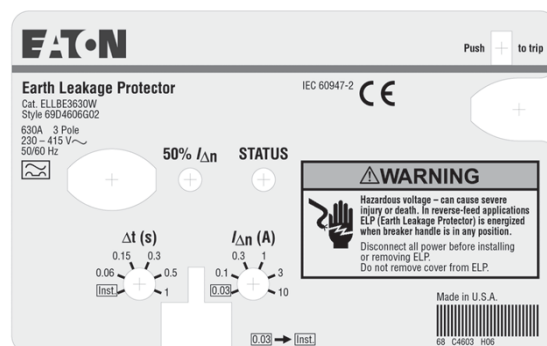
Description

Description	Page
EG-Frame (15–125 Amperes)	V4-T2-145
JG-Frame (63–250 Amperes)	V4-T2-159
LG-Frame (250–630 Amperes)	V4-T2-177
NG-Frame (320–1200 Amperes)	V4-T2-195
RG-Frame (800–2500 Amperes)	V4-T2-204
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30 mA Ground Fault (Earth Leakage) Module	
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Current Limiting Circuit Breaker Module	V4-T2-226
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UL-Rated LG-Frame Earth Leakage Module Faceplate



IEC-Rated LG-Frame Earth Leakage Module Faceplate



Product Selection

EG-Frame


**EG-Frame Ground Fault Modules,
UL-Rated (Bottom Mounted, 120–480 Vac,
50/60 Hz) ①**

Ampere Rating	Number of Poles	Catalog Number
125	3	ELEBN3125G
125	4	ELEBN4125G

**EG-Frame Earth Leakage Modules,
IEC-Rated (Bottom Mounted, 230–415 Vac,
50/60 Hz)**

Ampere Rating	Number of Poles	Catalog Number
125	3	ELEBE3125G
125	4	ELEBE4125G

JG-Frame


**JG-Frame Ground Fault Modules,
UL-Rated (Bottom Mounted, 120–480 Vac,
50/60 Hz)**

Ampere Rating	Number of Poles	Catalog Number
150	3	ELJBN3150W
150	4	ELJBN4150W
250	3	ELJBN3250W
250	4	ELJBN4250W

**JG-Frame Earth Leakage Modules,
IEC-Rated (Bottom Mounted, 230–415 Vac,
50/60 Hz)**

Ampere Rating	Number of Poles	Catalog Number
160	3	ELJBE3160W
160	4	ELJBE4160W
250	3	ELJBE3250W
250	4	ELJBE4250W

Note

① Shunt trip and undervoltage release cannot be used in an EG breaker connected to an earth leakage module.

LG-Frame


**LG-Frame Ground Fault Modules,
UL-Rated (Bottom Mounted, 120–480 Vac,
50/60 Hz)**

Ampere Rating	Number of Poles	Catalog Number
400	3	ELLBN3400W
400	4	ELLBN4400W
600	3	ELLBN3600W
600	4	ELLBN4600W

**LG-Frame Earth Leakage Modules,
IEC-Rated (Bottom Mounted, 230–415 Vac,
50/60 Hz)**

Ampere Rating	Number of Poles	Catalog Number
400	3	ELLBE3400W
400	4	ELLBE4400W
630	3	ELLBE3630W
630	4	ELLBE4630W

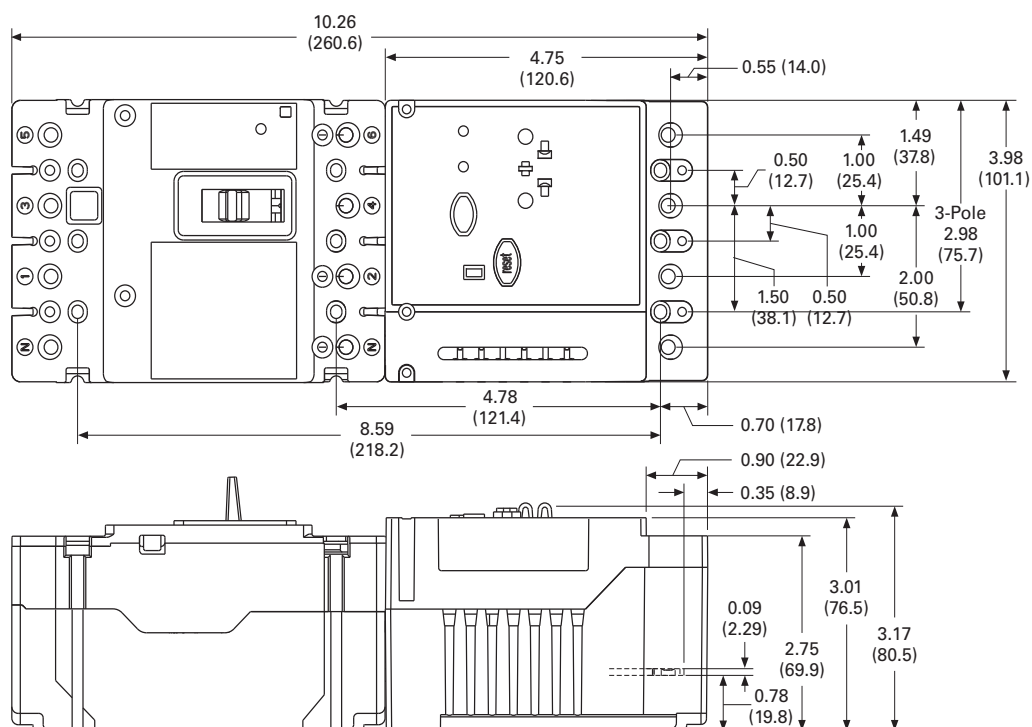
Dimensions

Approximate Dimensions in Inches (mm)

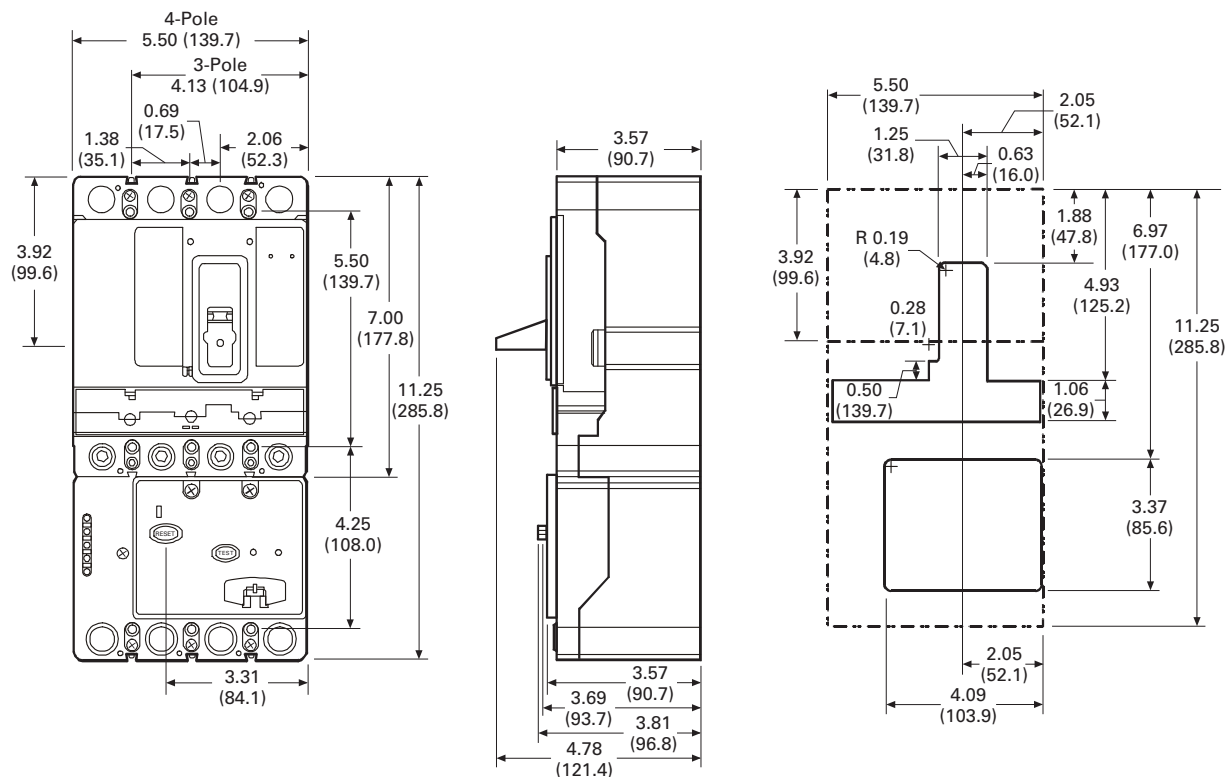
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Assembled Breaker and Earth Leakage Module

Frame	Height	Width	Depth
Three-Pole			
EG	10.25 (260.3)	3.00 (76.2)	2.98 (75.8)
JG	11.25 (285.8)	4.13 (104.9)	3.57 (90.7)
LG	15.38 (390.7)	5.48 (139.2)	4.06 (103.1)
Four-Pole			
EG	10.25 (260.3)	4.00 (101.6)	2.98 (75.8)
JG	11.25 (285.8)	5.50 (139.7)	3.57 (90.7)
LG	15.38 (390.7)	7.23 (183.6)	4.06 (103.1)

EG-Frame With Earth Leakage Module

JG-Frame With Earth Leakage Module



LG-Frame With Earth Leakage Module

