LineGard ®
GFCI Sensing Module
PGFM Series

• Power and fault status indicators

• Double insulated user interface

• Industrial design for rough service

• Chemical and UV resistant enclosure

• Trip level: 5mA +/– 1mA Class A UL 943

• Current sensing coil accepts 2 - 4 (8 ga) wires
  (i.e. Single and split phase)

• Sensing module operates at 120VAC or
  240VAC, single phase

• Available in automatic or manual reset
  configurations*

Product Description:

The LineGard® GFCI Sensing Module is a ground fault or equipment leakage sensing device designed and manufactured by North Shore Safety, a leader in innovated safety products. The PGFM operates in tandem with an approved Airpax LEL Series, UL 489 listed circuit breaker, with shunt trip and auxiliary switch.

The combined assembly is listed as a Class A UL 943 rated device. The sensing module is available in models to operate at supply voltages of 120 VAC or 240VAC and can monitor single and split phase circuits.
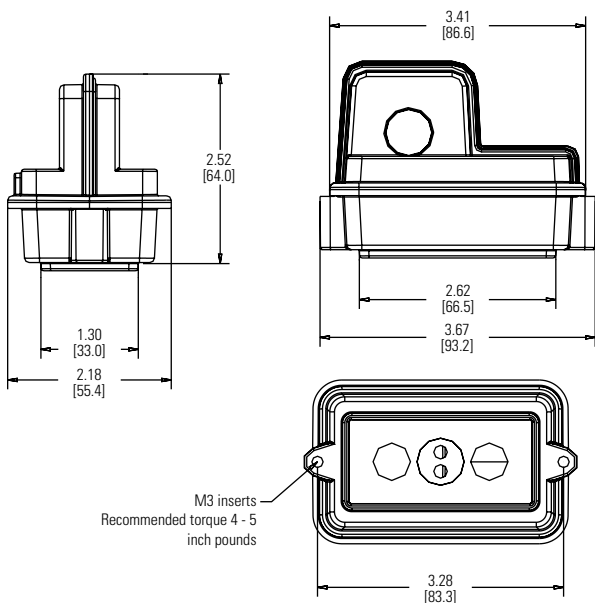
These devices meet the requirements of OSHA 29 CFR1926.404 (b)(1)(ii) and OSHA 29 CFR 1926.405 (a)(2)(ii)(G) and are backed by a 2 year manufacturer's warranty.
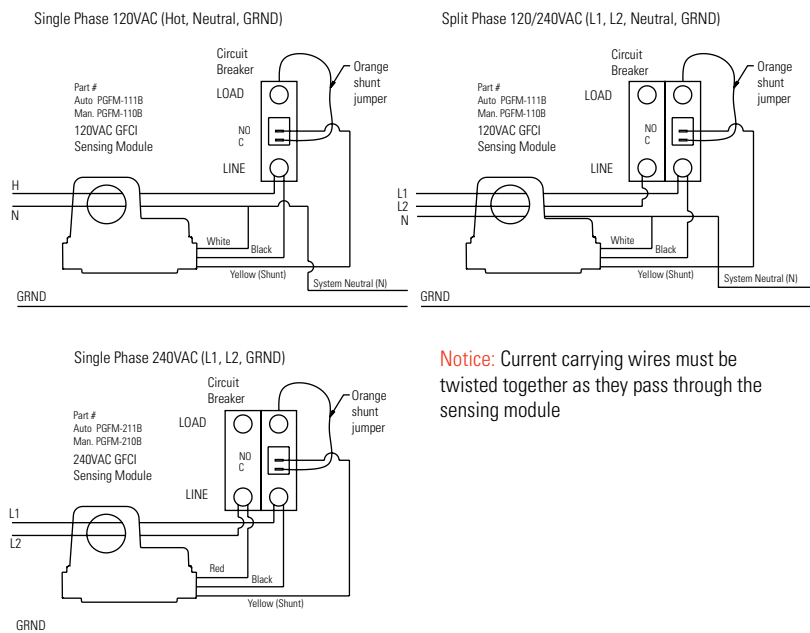
Specifications:

Type:	UL 943 Class A
Operating voltage:	120VAC or 240VAC
Sensing coil voltage:	600VAC maximum
Sensing module current:	10mA draw
Module response time:	6-8mS
Trip time, combined assembly:	25mS
Trip level, Class A:	5mA +/– 1mA (UL 943)
Operating frequency:	50/60 Hz
Operating temperature:	−35°C to 66°C
Let-go voltage:	60% of supply voltage
Reset type:	Automatic or manual[1]
Switch interface:	Double insulated
Interrupting capacity:	As per Airpax circuit breaker UL 489 approval

Note: 1. Manual configuration should be specified if automatic start-up after power restoration of circuit power creates an unsafe condition.
2. As per UL 943 requirements, portable devices may require breaking of neutral during ground fault detection. Please contact the factory.
3. Please contact Airpax for optional ELCI, UL 1053 compliant devices.
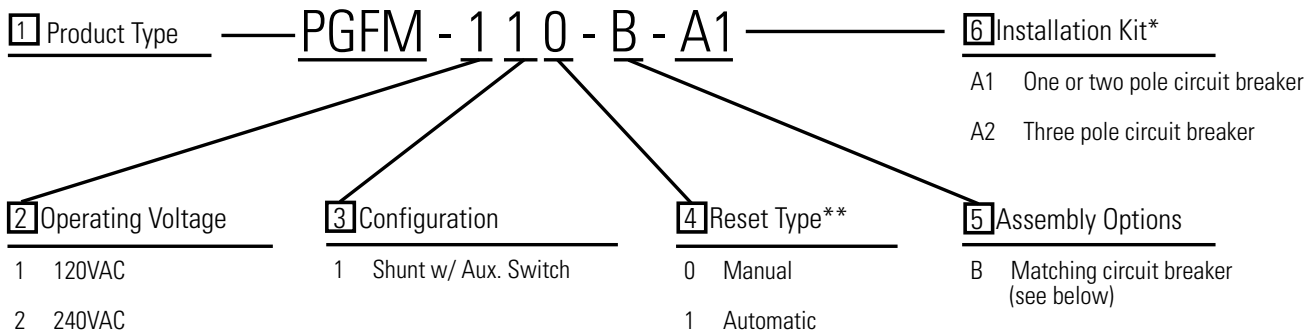
Sensing Module Dimensions:

3.41 [86.6]

2.52 [64.0]

1.30 [33.0]

2.18 [55.4]

2.62 [66.5]

3.67 [93.2]

M3 inserts
Recommended torque 4 - 5 inch pounds

3.28 [83.3]

Circuit Schematic (examples):

Single Phase 120VAC (Hot, Neutral, GRND)

Part #
Auto PGFM-111B
Man. PGFM-110B
120VAC GFCI Sensing Module

Circuit Breaker
LOAD
NO C
LINE
Orange shunt jumper

H
N
White   Black
Yellow (Shunt)   System Neutral (N)
GRND

Split Phase 120/240VAC (L1, L2, Neutral, GRND)

Part #
Auto PGFM-111B
Man. PGFM-110B
120VAC GFCI Sensing Module

Circuit Breaker
LOAD
NO C
LINE
Orange shunt jumper

L1
L2
N
White   Black
Yellow (Shunt)   System Neutral (N)
GRND

Single Phase 240VAC (L1, L2, GRND)

Part #
Auto PGFM-211B
Man. PGFM-210B
240VAC GFCI Sensing Module

Circuit Breaker
LOAD
NO C
LINE
Orange shunt jumper

L1
L2
Red   Black
Yellow (Shunt)
GRND

Notice: Current carrying wires must be twisted together as they pass through the sensing module

ORDERING EXAMPLE:

1 Product Type —— PGFM - 1 1 0 - B - A1 —— 6 Installation Kit*

A1   One or two pole circuit breaker

A2   Three pole circuit breaker

2 Operating Voltage
1   120VAC
2   240VAC

3 Configuration
1   Shunt w/ Aux. Switch

4 Reset Type**
0   Manual
1   Automatic

5 Assembly Options
B   Matching circuit breaker (see below)

*Note: Installation kits are for mounting the module and connecting to the tandem circuit breaker.
A1 - Kit # 057-000-0001 = panel seal gasket, module mounting screws, instructions and jumper with two 90° quick connectors
A2 - Kit # 057-000-0002 = panel seal gasket, module mounting screws, instructions and jumper with one 90° quick connector and one straight quick connector

**Note: Manual configuration should be specified if automatic power-up, after power restoration of circuit power, could create an unsafe condition.

To determine a matching circuit breaker for use in tandem with the LineGard® Sensing Module, please contact us directly or your local Airpax Representative for assistance with the appropriate identifying part number.