

Data sheet

PFD2-E12

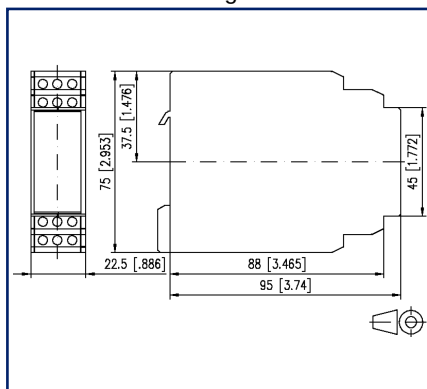
Page 1/5

P/N
110292032215
EAN 4250184118176
2026/09/23
Version: I

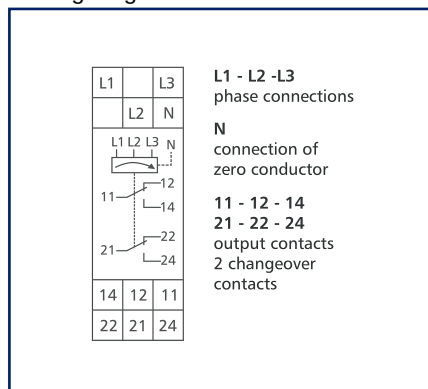
Illustrations



Dimensional drawing



Wiring diagram



See enlarged drawings at the end of document

Product specification

The monitoring relay monitors the correct phase sequence L1-L2-L3 (direction of rotation to the right) and complete failures of individual phase voltages. The phase voltages to be monitored are connected to the terminals L1-L2-L3, the terminals 11, 14 or 21, 24 of the relay output contacts are connected ahead of the field coil of the motor relay. If the phase sequence is correct, the output relay is activated (green LED is on). In case of total failure of a phase, the output relay returns to its neutral position (green LED is off). A special supply voltage is not required for the monitoring relay. Only connect the device to N if the three phases to be monitored are connected to N over an electric circuit (e.g. temperature monitoring or similar).

Data sheet

PFD2-E12

Page 2/5

P/N
110292032215
EAN 4250184118176
2026/09/23
Version: I

Technical Data

Supply	
Operating voltage	400 V AC -15% ... +10%
Frequency range	50 Hz
Power consumption (max.)	20 mA
Inputs	
Response delay	5 s
Outputs	
Contacts	2 changeover contacts
Contact material	AgNi
Switching voltage (max.)	250 V AC
Continuous Current	6 A
Switch-off delay	230 V~ 6 A AC1, 230 V~ 3 A AC3, 230 V~ 0,12 A, 60 V~ 0,6 A, 24 V~ 4 A, 12 V~ 6 A DC1
Switching frequency	1200 switching cycles/h
Mechanical life	1x10 ⁷ switching cycles
Electrical life	1x10 ⁵ switching cycles
Indicator	green LED
Housing	
Dimensions	
Dimension (W x H x D)	22.5 mm x 75 mm x 95 mm
Dimension (W x H x D)	0.886 in. x 2.953 in. x 3.74 in.
Weight	120 g
Mounting style	Standard rail TH35
Mounting position	any
Apposition	without distance
Connection type	Screw type terminal blocks
Terminal blocks	
Wire cross section solid	0.2 mm ² - 2.5 mm ² / AWG 22-12
Wire cross section multi	0.25 mm ² - 2.5 mm ² / AWG 22-12
Wire cross section with wire ferrule	0.25 mm ² - 2.5 mm ² / AWG 22-12
Screw torque (max.)	0.5 Nm
Stripping length (min.)	8 mm

Data sheet PFD2-E12

Page 3/5

P/N
110292032215
EAN 4250184118176
2026/09/23
Version: I

Technical Data

Material

Material - Housing	Polyamid 6.6 V0
Color	gray
Material - Terminal block	Polyamid 6.6 V0
Material - Covers	Polyamid 6.6 V0

Protection category according to IEC 60529

Protection category - housing (acc. to IEC 60529)	IP40
Protection category - terminal blocks (acc. to IEC 60529)	IP20

Climatic Data

Operating

Temperature - Operating °C	0 °C - 55 °C
Temperature - Operating °F	32 °F - 131 °F
Relative humidity	max. 85 % non-condensing

Storage

Temperature - Storage °C	-20 °C - 70 °C
Temperature - Storage °F	-4 °F - 158 °F

Power loss

Power loss (typical) coil	800 mW
Power loss (typical) Contact rate	700 mW

Classifications

ETIM 7.0	EC001441
ETIM 8.0	EC001441
ETIM 9.0	EC001441
ETIM 10.0	EC001441

Application note

This product is a standard product of METZ CONNECT. METZ CONNECT is not aware of the specific intended use of the goods by the Customer or any customers of the Customer. The Customer guarantees that it has fully and sufficiently tested the use of the goods and any product modifications, product changes or product enhancements with regard to the specific intended use in accordance with the state of the art or in any other way.

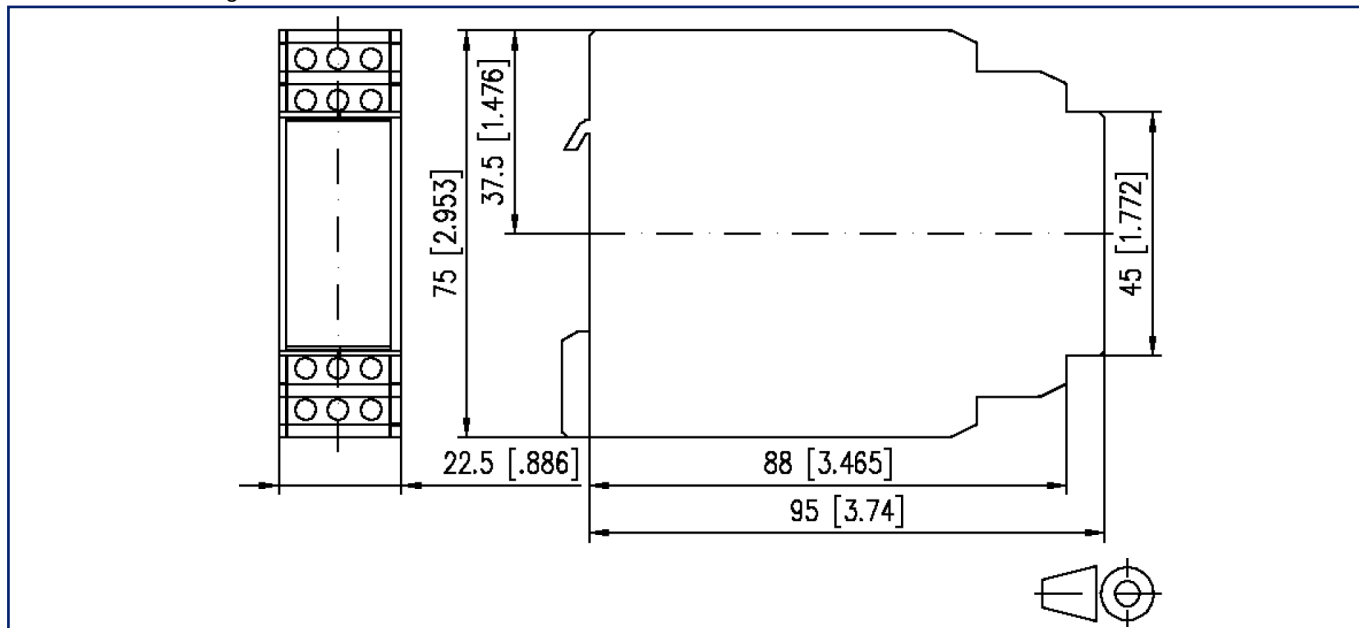
Data sheet
PFD2-E12

Page 4/5

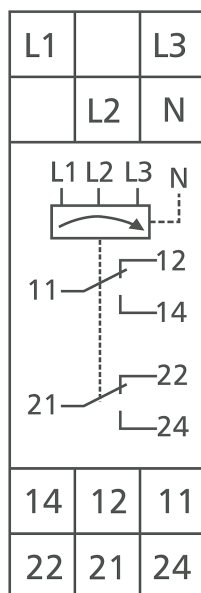
P/N
110292032215
EAN **4250184118176**
2026/09/23
Version: I

Illustrations

Dimensional drawing



Wiring diagram



L1 - L2 - L3
phase connections

N
connection of
zero conductor

11 - 12 - 14
21 - 22 - 24
output contacts
2 changeover
contacts



Illustrations

Function diagram

