

## Input/output module - IOA REL 120V DI/1.0A/EX - 2910157

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VIP field termination assemblies (FTA) with input/output accessories (IOA) provide universal channel configuration for applications seeking to evolve from a traditional fixed I/O approach. Digital relay input, fused with blown fuse indication, active circuit indication, 120 V AC.

### Your advantages

- ✓ Active relay coil indication
- ✓ Two-stage progressive release allowing for voltage checks with field-powered devices
- ✓ Channel for marking accessories
- ✓ Replaceable TE5-style fusing
- ✓ Integrated keying reduces possible user error during replacement
- ✓ 120 V internal marshalling option for connected field device



### Key Commercial Data

|                                      |   |
|--------------------------------------|---|
| Packing unit                         | 1 pc  |
| GTIN                                 | <br>4 055626 447704 |
| GTIN                                 | 4055626447704   |
| Weight per Piece (excluding packing) | 40.000 g  |
| Custom tariff number                 | 85364900  |
| Country of origin                    | United States   |

### Technical data

#### Dimensions

|        |         |
|--------|---------|
| Width  | 10.3 mm |
| Height | 64.2 mm |
| Depth  | 72.9 mm |

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## Technical data

### Ambient conditions

|   |                               |
|---|-------------------------------|
| Ambient temperature (operation)         | -40 °C ... 70 °C              |
| Ambient temperature (storage/transport) | -40 °C ... 70 °C              |
| Permissible humidity (operation)        | 0 % ... 95 % (non-condensing) |

### Coil side

|   |                  |
|---|------------------|
| Nominal input voltage $U_N$               | 120 V AC         |
| Input voltage range in reference to $U_N$ | 0.9 ... 1.1      |
| Typical input current at $U_N$            | 3 mA             |
| Typical response time                     | 5 ms             |
| Typical release time                      | 4 ms             |
| Protective circuit                        | Bridge rectifier |
| Operating voltage display                 | Yellow LED       |

### Contact side

|                                       |                         |
|---------------------------------------|-------------------------|
| Contact type                          | 1 N/O contact           |
| Type of switch contact                | Single contact          |
| Contact material                      | AgSnO, hard gold-plated |
| Maximum switching voltage             | 24 V DC                 |
| Min. switching current                | 1 mA (at 24 V)          |
| Maximum inrush current                | 50 mA                   |
| Limiting continuous current           | 50 mA                   |
| Interrupting rating (ohmic load) max. | 1.2 W (at 24 V DC)      |

### Connection data

|                   |                  |
|-------------------|------------------|
| Connection name   | Control circuits |
| Connection method | Pin strip        |

### General

|                         |                           |
|-------------------------|---------------------------|
| Operating mode          | 100% operating factor     |
| Degree of protection    | IP20                      |
| Mechanical service life | $2 \times 10^7$ cycles    |
| Mounting position       | any                       |
| Assembly instructions   | Plugs into VIP/...BASE... |

### Standards and Regulations

|  |                            |
|--|----------------------------|
| Standards/regulations                  | IEC 60664                  |
|  | DIN EN 50178               |
| Flammability rating according to UL 94 | V0                         |
| Conformance                            | ANSI/ISA 60079-0; 60079-15 |
|  | ANSI/IEC 60529             |

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## Technical data

### Standards and Regulations

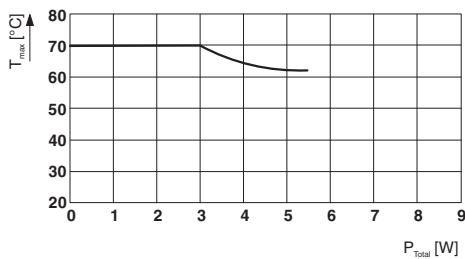
|                 |  |
|-----------------|--|
|                 | FM 3600; 3611; 3810  |
| ATEX            | Sira 17ATEX4293X; II 3G Ex nA nC IIC T4 Gc   |
| IECEX           | IECEX SIR 17.0078X; Ex nA nC IIC T4 Gc   |
| UL, USA/Canada  | Class I, Div. 2, Groups A, B, C, D T4<br>Class I, Zone 2, IIC T4   |
| CSA, USA/Canada | Non-incendive: Class I, Div. 2, Groups A, B, C, D T4<br>Class I, Zone 2, AEx nA nC IIC T4 Gc<br>Connection to Class I, II, III, Div. 2, Groups A, B, C, D, E, F, G<br>Non-incendive: Class I, Div. 2, Groups A, B, C, D T4<br>Ex nA nC IIC T4 Gc<br>Connection to Class I, II, and III, Zone 2, Groups A, B, C, D, E, F, G |

### Environmental Product Compliance

|            |   |
|------------|---|
| China RoHS | Environmentally Friendly Use Period = 50  |
|            | For details about hazardous substances go to tab "Downloads", Category "Manufacturer's declaration" |

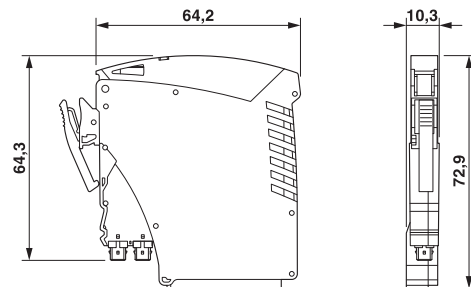
## Drawings

Diagram

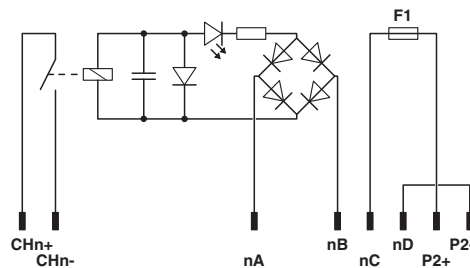


Derating curve

Dimensional drawing



Circuit diagram



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### Classifications

#### eCl@ss

|            |          |
|------------|----------|
| eCl@ss 5.0 | 27371601 |
| eCl@ss 5.1 | 27371601 |
| eCl@ss 6.0 | 27371601 |
| eCl@ss 7.0 | 27141152 |
| eCl@ss 8.0 | 27371601 |
| eCl@ss 9.0 | 27371601 |

#### ETIM

|          |          |
|----------|----------|
| ETIM 2.0 | EC001437 |
| ETIM 3.0 | EC001437 |
| ETIM 4.0 | EC001437 |
| ETIM 5.0 | EC001437 |
| ETIM 6.0 | EC001437 |
| ETIM 7.0 | EC001437 |