

# **Insulation Monitoring device for Industrial applications** ID SERIES, TYPES: ID-03 / ID-03.T



交流、直流、儲能、電動汽車、船舶牽引

- Designed to be used in demanding industrial environments up to 7200 VAC
- Functionality verification has included frequency converter applications
- Measures the insulation resistance and capacitance of AC/DC networks
- Detects also symmetrical insulation faults
- Suitable for different application fields, for example
- AC drive installations
- AC installations in demanding environments
- Service and training facilities
- DC networks
- Electric vehicle DC charging stations
- Marine and traction (ID-03.T)

#### Power supply specifications

| Nominal Input voltage | 110-240 VAC, 110-300 VDC<br>(Schurter 0001.2503 (T800mA)) |
|-----------------------|---|
| Nominal input current | 0.04 A at 230 VAC   |
| Line frequency        | 48 ~ 62 Hz  |

## Measurement specification

| Maximum input voltage        | 690 VAC / 800 VDC                                     |
|------------------------------|---|
| Resistance measurement range | $20k~\Omega5M\Omega$ with better than $15\%$ accuracy |
| System frequency             | DC, 10Hz - 500Hz                                      |
| Measuring impedance          | 220kOhm   |
| Test voltage                 | 30Vp max  |

## Alarm contact with settable limit (potential free changeover)

5A at 250VAC Alarm contact

#### Other functions

| Other functions                        |  |
|--|--|
| RS-485 serial connection               |  |
| Modbus/TCP interface for recontrolling | emote monitoring and                           |
|  | 420 mA, with current loop<br>transmitter CT-03 |

High voltage couplers HVC-16AC, HVC-40AC and HVC-72AC enables insulation level monitoring of industrial isolated (IT) networks with voltages up to 1600 VAC, 4000 VAC or 7200VAC

Continuous

Suitable also for frequency converter solutions

Compatible also with 3 phase IT networks

Self-testing automatic Self-testing immediate With TEST button

#### Standards

| Measurements | IEC 61557-8:2014   |
|--------------|--|
| Safety       | IEC 61010-1:2010 (3 rd Edition),<br>IEC 60664-1 and IEC 60664-3  |
| EMC          | IEC 61326-2-4, CISPR 11 /<br>EN55011, IEC61000-4-2,<br>IEC61000-4-3, IEC61000-4-4,<br>IEC61000-4-5, IEC61000-4-6,<br>IEC61000-4-11 |
|              |  |

## Marine General

| Dimension (W x L x D) | ID-03 106 x 110 x 62 mm<br>CT-03 36 x 110 x 62 mm |
|-----------------------|---|
| Case Material         | Plastic   |
| Mounting interface    | DIN rail clamp or screw mounting                  |





ID-03.T is able to withstand even more demanding conditions:

- Minimum temperature -25°C
- Vibration
- Harsh humidity stress
- Maximum input voltage 400 VAC / 400 VDC
- Resistance measurement range 1...900k  $\Omega$
- Maximum system leakage capacitance 300uF

Possible installation locations include railway and marine applications.

ID-03 is available also without enclosure (ID-03.L) for device manufacturers.

All our insulation monitoring devices can be monitored remotely over the Internet, independently of distance and location.