AC current monitoring in 1-phase mains

E1IU500mAAC01

Monitoring relays - ENYA series

Undercurrent monitoring

1 change over contact

Width 17.5 mm

Installation design



Technical data

AC current monitoring in 1-phase mains with adjustable threshold and fixed hysteresis.

UNDER Undercurrent monitoring

2. Time ranges

Adjustment range

Tripping delay (Delay):

Green LED ON/OFF: indication of supply voltage Yellow LED ON/OFF: indication of output relay

4. Mechanical design

Self-extinguishing plastic housing, IP rating IP40 Mounted on DIN-rail TS 35 according to EN 50022

Mounting position: any

Shockproof terminal connection according to VBG 4 (PZ1 required),

IP rating IP20

Tightening torque: max. 1Nm

Terminal capacity:

1 x 0.5 to 2.5mm² with/without multicore cable end

1 x 4mm² without multicore cable end

2 x 0.5 to 1.5mm² with/without multicore cable end

2 x 2.5mm2 flexible without multicore cable end

5. Input circuit

Supply voltage: 230V AC Terminals: Li-N

-15% to +15% of Un Tolerance: Rated voltage: 5VA (0.8W) Rated frequency: AC 48 to 63Hz Duration of operation: 100%

500ms Reset time: Wave form: Sinus Hold-up time:

>20% of rated voltage Drop-out voltage: Overvoltage category: III (according to IEC 60664-1)

Rated surge voltage:

6. Output circuit

1 potential free change over contact Rated voltage: 250V AC

Switching capacity: 1250VA (5A / 250V) 5A fast acting Fusing: Mechanical life: 20 x 106 operations Electrical life: 2 x 10⁵ operations at 1000VA resistive load

Switching frequency: max. 60/min at 100VA resistive load

max. 6/min at 1000VA resistive load (according to IEC 947-5-1)

Overvoltage category: III. (according to IEC 60664-1)

Rated surge voltage:

7. Measuring circuit

Measuring variable: AC sinus, 48 to 63Hz 500mAAC

Measuring input: Terminals: Li, Lk

Overload capacity: 2.2A (ex 1.6A - distance > 5mm)

Starting current: 12.6A 1s 3s 6.3A

Input resistance: $100m\Omega$ Switching threshold Is: see table ordering information or

printing on the unit see table ordering information or Hysteresis H:

printing on the unit

III (according to IEC 60664-1) Overvoltage category:

Rated surge voltage:

8. Accuracy

≤5% of nominal value Base accuracy: Adjustment accuracy: ±5% of nominal value ≤2% of nominal value Repetition accuracy: Voltage influence:

Temperature influence: ≤0.1% / °C

9. Ambient conditions

Ambient conditions: -25 to +55°C (according to IEC 68-1) -25 to +70°C Storage temperatur:

-25 to +70°C Transport temperature: Relative humidity: 15% to 85%

(according to IEC 721-3-3 class 3K3)

Pollution degree: 2, if built-in 3 (according to IEC 664-1)

Vibration resistance: 10 to 55 Hz 0.35mm (according to IEC 68-2-6)

Shock resistance: 15g 11ms

(according to IEC 68-2-27)

10. Weight

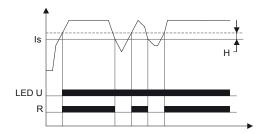
Single packing:

Package of 10pcs: 660g per package

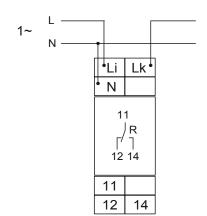
Functions

Undercurrent monitoring (UNDER)

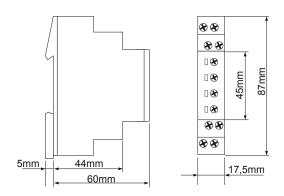
When the measured current falls below the value adjusted at the Minregulator, the output relay R switches into off-position (yellow LED not illuminated). When the measured current exceeds the value adjusted at the Min-regulator plus the hysteresis, the output relay R switches into on-position again (yellow LED illuminated),



Connections



Dimensions



Ordering information

Types	Rated voltage U _N	Functions	Switching threshold U _s	Delay	Hysteresis	Part. No.
E1IU500mAAC01	230V	U	Max - Min 10% to 110% of I _N	-	fixed 10%	1340204

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Subject to alterations and errors

