



## RGU-100B

RGU-100B, Residual current monitoring relay, type B

Code: P11961.

- > Protocol: Modbus/RTU
- > Módulos: 3
- > Pre-alarm relay: Yes
- > Communications: RS-485
- > N° relays: 1
- > I $\Delta$ n (A): 0,03 ... 3 A
- > Power supply (Vac): 230 Vac
- > Delay: 0,1 ... 5 s, INS, SEL
- > Mounting: DIN rail

### Description

The residual current current intensity monitoring and protection relay (IEC 62020), compatible with the **WGB** series, for type B loads (IEC 60755).

High-performance relay with the following main features and functions:

- Electronic relay with relay output.
- Measures in alternating, continuous or mixed current (Type B according to IEC 60755).
- It measures and displays the current intensity through the connection to the **WGB**-series residual current transformer.
- Fully programmable with display showing instantaneous leakage current in real time on a high-contrast backlight display (display turns red when the relay trips).
- Integrated RS-485 (Modbus) communications.
- Pre-alarm relay.
- Event log.
- Remote control input.

### Application

Residual current protection or monitoring of single-phase or three-phase electrical loads in alternating current with continuous components, with frequencies up to 2 kHz, such as:

- Variable speed drives.
- UPS
- Photovoltaic Installations.
- Electric Vehicle Charging.
- Active Filters.



## RGU-100B

Type-B earth leakage monitoring and protection relay

Code: P11961.

### Specifications

#### AC power supply

Installation category	CAT III 300 V
Consumption	7.5 VA
Frequency	50 ... 60 Hz
Nominal voltage	230 V~ (± 15 %)

#### Mechanical characteristics

Size (mm) width x height x depth	52.5 x 118 x 74 (mm)
Screw type	Flat
Envelope	Self-extinguishing V0 plastic
Torque setting	≤ 0.4 Nm, M2.5
Cable gauge at power supply terminals	2,5 mm <sup>2</sup>
Cable gauge at input and output terminals	2,5 mm <sup>2</sup>
Weight (kg)	0,188

#### Environmental characteristics

Protection class	IP 30, IP 40 (Vorderseite)
Relative humidity (without condensation)	5 ... 95 %
Storage temperature	-20 ... +70 °C
Working temperature	-10 ... +50 °C

#### Communications

Data bits	8
Parity	without, even, odd
Protocol	Modbus RTU
Speed	4800-9600-19200-38400-57600-115200 bps
Stop bits	1-2

#### Digital inputs

Input impedance	2 kΩ
Input/output insulation	5.3 kV
Type	Potential-free contact

#### Standards

Electrical safety, Maximum height (m)	2000
Standards	IEC 60947-2-M, Measurement conditions for type B waveforms specified in IEC 60755, UNE-EN 60068-2-1, UNE-EN60068-2-2, UNE-EN 60068-2-78



## RGU-100B

Type-B earth leakage monitoring and protection relay

Code: P11961.

### User interface

LED	2
Keyboard	3 keys
Display type	LCD (negative)

### Digital relay outputs

Quantity	1
Maximum current	6 A
Maximum open contact voltage	230 V ~
Electrical life	60 x 10 <sup>3</sup> (250 V ~ / 5A)
Mechanical life	10 x 10 <sup>6</sup>
Maximum switching capacity	1500 VA

### Digital transistor outputs

Type	Optocoupled
Maximum current	0.1 A
Maximum voltage	230 V ~

### Differential protection

Type	Type B
Sensitivity (I $\Delta$ n), A	0,03 ... 3
Delay time (t $\Delta$ )	INS - [S]-0.1-0.2-0.3-0.4-0.5-0.8-1-3-5 s
Transformer	External, WGB series (not included)

### RGU-100B

Residual current relay, type B

CODE	TYPE	I $\Delta$ n (A)	N° relays	Pre-alarm relay	Módulos	Mounting	Delay	Communications	Protocol	Power supply
P11961.	RGU-100B	0,03 ... 3 A	1	Yes	3	DIN rail	0,1 ... 10 s, INS, SEL	RS-485	Modbus/RTU	230 Vac

Associated with WGB-type residual current transformers

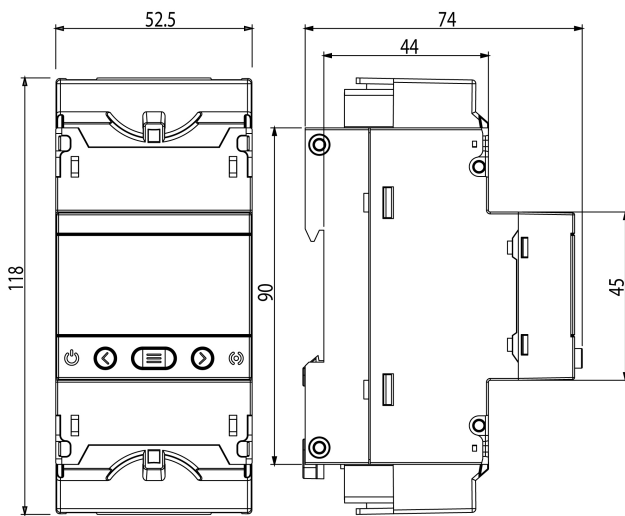


# RGU-100B

Type-B earth leakage monitoring and protection relay

Code: P11961.

## Dimensions



## Connections

