



MRU-10

Indeks: WMPLMRU10

Earth Resistance Meter



Description

MRU-10 is a simple meter that allows you to measure grounding by the use of the technical method and to measure grounding resistance by the use of the 2-pole method. The instrument is easy to handle, resistive to interference, and highly accurate. MRU-10 is a basic device that allows checking the quality of the grounding system on the basis of the received measurement result. Its ergonomic shape, durable and firm housing, as well as big and clear display make this instrument ideal to use both in the field and most working environments. The device is simple to operate and intuitive. It is the best choice for electrical installations contractors, technicians, and professionals dealing with grounding measurements.

Technical Specification

It allows to:

- measure earthing resistance using auxiliary electrodes,
- measurement of resistance of auxiliary electrodes R_S and R_H ,
- measurement of interference voltage,
- measurement in the presence of interference voltage in the power network with frequency 50 Hz and 60 Hz,
- selection of maximum measuring voltage (25 V and 50 V),
- indication of battery state.

Measurement of interference voltage U_N (RMS)

Range	Resolution	Accuracy
0...100 V	1 V	$\pm(10\% \text{ m.v.} + 1 \text{ digit})$

Measurement of earthing resistance (method 3-pole)

measurement range to IEC 61557-5:2007: 0,53 Ω ...9999 Ω (for 50 V)

Range	Resolution	Accuracy
0,00...19,99 Ω	0,01 Ω	$\pm(3\% \text{ m.v.} + 3 \text{ digits})$
20,0...199,9 Ω	0,1 Ω	
200...1999 Ω	1 Ω	$\pm 5\% \text{ m.v.}$
2000...9999 Ω	1 Ω	$\pm 8\% \text{ m.v.}$

- measurement current: under short circuit $>20 \text{ mA}$,
- voltage on open terminals: selectable 25 V AC or 50 V AC,
- frequency of measurement current: 125 Hz (for networks 50 Hz) or 150 Hz (for 60 Hz),
- selection of measuring frequency in settings.

Measurement of earthing resistance (method 2-pole)

Range	Resolution	Accuracy

Range	Resolution	Accuracy
0,01...19,99 Ω	0,01 Ω	$\pm(3\% \text{ m.v.} + 3 \text{ digits})$
20,0...199,9 Ω	0,1 Ω	
200,0...1999 Ω	1 Ω	$\pm 5\% \text{ m.v.}$
2000...9999 Ω	1 Ω	$\pm 8\% \text{ m.v.}$

Measurement of earthing resistance (method 2-pole) R_H and R_S

Range	Resolution	Accuracy
0...999 Ω	1 Ω	$\pm 8\% \text{ m.v.}$
1,00...9,99 k Ω	0,01 Ω	
10,0...19,9 k Ω	0,1 Ω	

Electric security:

- type of insulation: double, according to EN 61010-1 and IEC 61557,
- measurement category: **CAT IV 150 V** acc. to EN 61010-1,
- protection class acc. to EN 60529: IP67.

Rated operational conditions:

- operation temperature: $-10...+50^{\circ}\text{C}$,
- storage temperature: $-20...+60^{\circ}\text{C}$,
- humidity: 20...90%.

Other technical data:

- LCD display: segment, backlit,
- dimensions: 221 x 102 x 62 mm,
- number of measurements (RE3P) carried out of set of batteries:
> 3000

