



MIZ Mini industrial meter

EN Instructions for use

Scope of delivery

Please check that the contents of the packing box are complete before starting the installation and start-up procedure.

- 1 MIZ device
- 1 Instructions for use

If the contents are incomplete or damaged, please contact your supplier.

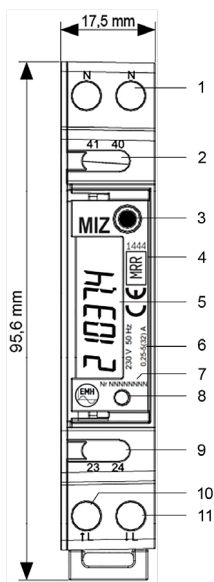
Store, use and transport the device in such a way that it is protected against moisture, dirt and damage.

Important information

These instructions list all the different device versions. Some of the features described herein may not be applicable to your particular device.

Housing, display and control elements

Front view



- 1 - Neutral conductor
- 2 - S0 output
- 3 - Call-up button
- 4 - Conformity and certification marking
- 5 - Display
- 6 - Voltage, frequency, current
- 7 - Serial number
- 8 - Test LED
- 9 - M-Bus interface
- 10 - Power input
- 11 - Power output

Target audience

These instructions are intended for technicians who are responsible for the installation, connection and servicing of the devices. The device may only be installed and started up by qualified electricians in accordance with the generally accepted technology standards and, where applicable, the definitive regulations governing the erection of communication equipment and terminal devices.

Intended use

The meter is intended to be used solely for the measurement of electrical energy indoors, and it must not be operated outside the specified technical data (see meter labelling).

Maintenance and warranty instructions

The device requires zero maintenance. It is not permitted to make any repairs in the event of any damage (e.g. due to transport or storage).

If the device is opened, the warranty and the Declaration of Conformity will be rendered null and void. The same applies where a defect is caused by external factors (e.g. lightning, water, fire, extreme temperatures and weather conditions), or by improper or careless use or handling.

Care and disposal information



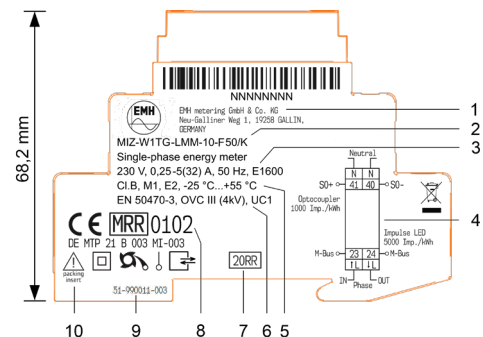
! DANGER!

Risk of fatal injury in case of contact with live parts!

Before the housing of the meter is cleaned, all conductors that the meter is connected to must be de-energised.

Use a dry cloth to clean the device housing. Do not use any chemical cleaning agents!

Side view



- 1 - Manufacturer's address
- 2 - Type designation and type code
- 3 - Voltage, current, frequency, circuit number
- 4 - Connection diagram
- 5 - Accuracy class, temperature class as per EN 60721-3-3
- 6 - Product standard, overvoltage category (rated peak withstand voltage), utilisation category
- 7 - Year of construction
- 8 - Conformity and certification marking
- 9 - Hardware version
- 10 - Safety and application information

The following table names the components and how they are to be treated at the end of their life cycle.

Components	Waste collection and disposal
Printed circuit boards	Electronic waste: Dispose of such waste in accordance with the local regulations.
LEDs, LC display	Hazardous waste: Dispose of such waste in accordance with the local regulations.
Metal parts	Recyclable material: Sort such material and send it for recycling.
Plastic parts	Send sorted plastic parts to a recycling plant (regranulation) or, where applicable, to a waste incineration plant (thermal energy generation).

Basic safety instructions

Adhere to the following basic safety instructions:

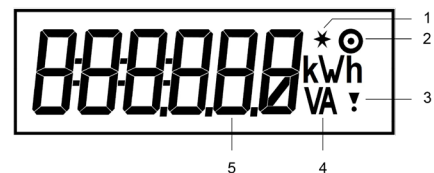
- Observe the customary local occupational health and safety regulations for electrical installations.
- Choose a conductor cross-section according to the maximum current load.
- Attach ferrules to flexible wires.

The following equipment features are possible:

	"Gold"	"Premium"
Current	0.25 – 5(32) A	0.25 – 5(32) A
Type code	MIZ-W1TG-K00-10-F50/K	MIZ-W1TG-LMM-10-F50/K
Instantaneous values	Yes	Yes
M-Bus interface	No	Yes
Call-up button	No	Yes
Display lighting	No	Yes

Display

The display is a liquid crystal display (LCD).



- 1 - Star symbol: Flashes with the exclamation mark in test mode
- 2 - Circle symbol: Flashes if communication takes place via the M-Bus interface
- 3 - Exclamation mark: Flashes if energy direction is negative (return lock, installation monitoring)
- 4 - Units: Unit of the value displayed in the value area
- 5 - Value range: Display of tab contents

Display elements

	Display test	All display elements flash for 6 s after start-up
	Firmware version	Appears for 5 s
	Firmware checksum	Appears for 5 s

Technical data

Voltage; current	230 V; 0.25 - 5(32) A
Accuracy class	B
Utilisation category	UC 1
Overvoltage category	OVC III (as per EN 62052-31)
Rated peak withstand voltage	4 kV (as per EN 62052-31)
Product standard	EN 50470-3
Frequency	50 Hz
Outputs S0 output	Max. 27 V DC, 27 mA (passive), pulse length 50 ms
M-Bus interface (optional)	As per DIN EN 13757-2, -3 (300...9600 Baud)
Auxiliary power	< 0.4 W
Temperature range	Defined operating range: -25 °C...+55 °C Limit range for storage and transport: -40 °C...+70 °C
Humidity	Maximum 95%, non-condensing, as per EN 62052-11, EN 50470-1 and EN 60068-2-30
Protection class	II
Degree of protection	Housing, connections: IP20
Installation environment	The device may only be used in installation environments with a degree of protection of IP51 (or higher). This ensures protection against penetration by dust and water as specified by the relevant standards (EN 50470-1, EN 62052-31).
Fire properties	As per EN 62052-11
Environmental conditions	Mechanical: M1 according to the Measuring Instruments Directive (2014/32/EU) Electromagnetic: E2 according to the Measuring Instruments Directive (2014/32/EU) Intended operating location: Interior as per EN 50470-1
Weight	Approx. 65 g

Alternating display	Value	Description	Duration
	FF0000	Error status	Appears for 60 s when an error has occurred
	210374	Energy value	Appears for 10 s (for only 2 s when an error has occurred)
	P00000W	Instantaneous power	Each value appears for 2 s
	U23000V	Instantaneous voltage	
	I100540A	Instantaneous current	
	F500Hz	Mains frequency	
	PF1000	Power factor	
	A1123	Primary M-Bus address	
	A21234	Secondary M-Bus address: MSW (most significant word) = 4 highest-value characters	
	A25678	LSW (least significant word) = 4 lowest-value characters	
	b2400	M-Bus baud rate	
	UE-101	Firmware version	
	88888888	Display test	
	G0tE5t	Start test mode (call list in standard mode)	
	ESCAPE	End test mode (call list in test mode)	

