

- Inductive, non-electrode measurement
- Self-optimizing controller
- Maintenance-free and chemicalresistant measuring probe
- Menu-driven user interface
- No measuring errors due to surface effects and polarization
- Adjustable mode of operation:
 - Concentration control
 - CIP phase separation
- Precise, fast temperature sensor
- Digital display of conductivity and temperature
- Two adjustable set points
- USB import function for settings and product data
- USB export function for operating data
- Fault signal output
- Pre-metering output (selectable)
- Time-controlled pre-metering for initial charge
- Adjustable pre-metering time delay
- Metering time limit
- 0/4 20 mA current output for conductivity and temperature
- Compatible with P3-products

The inductive conductivity measuring and control unit **LMI 03** is especially designed for permanent concentration measurement and control of alkaline or acidic cleaning and disinfecting solutions.

The **LMI 03** is designed as a wall-mounted unit. The measuring operates to the electrodeless measuring principle. The conductivity probe is combined with a temperature sensor (NTC).

The temperature compensation for **alkaline** products (1.9 %/K) or **acid** detergents (1.25 %/K) is selectable. Front side function keys with a digital display guarantee a simple and reliable operator guidance.

The self-optimizing controller integrated in the LMI 03 keeps the detergent concentration on a constant and precise level.



Conductivity Measuring and Control Unit LMI 03



Technical Data:

Housing: plastic housing for wall mounting

Dimensions: 271 x 190 x 90 mm (w * h * d)

Safety type: IP 65 according to German DIN 40050

Measurement range: 0 - 500 mS/cm

Conductivity indication: digital, LC-display with colored backlight Temperature indication: digital, LC-display with colored backlight

Temperature compensation: 0 – 100 °C, automatically with temperature sensor NTC

2 possible temperature compensation factors:

acid (1.25 %/K) and

caustic (1.9 %/K) (ex-works settings)

Pre-metering: 0 - 9999 s, adjustable in steps of 1 s Pre-metering time delay: 0 - 9999 s, adjustable in steps of 1 s Metering time limitation: 10 - 9999 s, adjustable in steps of 1 s

Switch outputs: 1 floating change-over contact for SP 1, load capacity 8 A/230 V AC

1 floating change-over contact for SP 2, load capacity 4 A/230 V AC 1 floating change-over contact for fault message signal, load capacity

4 A/230 V AC

1 floating change-over contact for pre-metering (additionally configurable),

load capacity 4 A/230 V AC

Current output: 0/4 - 20 mA corresponding to 0 - 100 % of the set measuring range

max. electric burden resistor 400 Ω

Inputs: 1 floating make contact for pre-metering start

1 floating break contact for metering lock

1 empty signal input for empty signal monitoring by means of reed contact

Mains power supply: 230 V - 240 V AC

115 V - 120 V AC

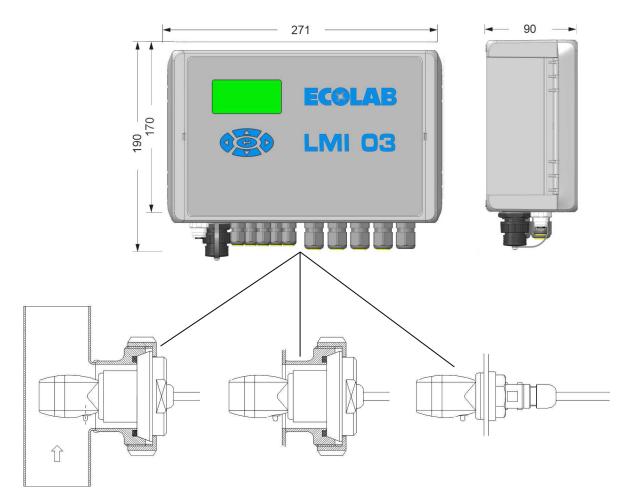
24 V AC

Mains frequency: 50 Hz - 60 Hz

Ambient temperature: $0 - 50 \,^{\circ}\text{C}$ Weight: approx. 3 kg



Dimensions:



Inline-conductivity probe for pipes

Material No. 287621 (PP) / 287604 (PEEK)

Flow fitting with weld-on end Material No. 287507

Conductivity probe for tank wall installation

Material No. 287621 (PP) / 287604 (PEEK)

Tank welding fitting Material No. 287505

Conductivity probe for tank wall installation

(21 mm bore-diameter required) Material No. 287413 (PP)

Ordering data:

Article Material No.

Conductivity measuring and control unit LMI 03 Version 115 V / 230 V AC or 24 V DC

Scope of delivery:1 LMI 03, 3 Wire bridges, 1 short operating manual

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