

## 8-channel transmitter Liquiline CM448R

Flexible multiparameter DIN-rail and cabinet device for all industries



More information and current pricing:

[www.endress.com/CM448R](http://www.endress.com/CM448R)

### Benefits:

- **Saves space, saves money:**  
Small footprint, 8 channels in one device, saves space in cabinets – perfect for skids.
- **High-speed installation:**  
No cut-out in cabinet door, one-click DIN-rail mounting, minimized wiring.
- **Simple and safe commissioning:**  
Saving configuration on SD card enables fast set-up on duplicate installations.
- **Easy to operate and service:**  
Intuitive user interface, hot plug & play with pre-calibrated Memosens sensors, universal components fit all parameters.
- **Process control from a distance:**  
Integrated web server that allows the operator to remotely view diagnostic data, perform configurations, or access device parameters in any web browser - even via Smartphone.
- **Higher availability, lower costs:**  
Heartbeat Technology enables status-oriented maintenance and easy verification of the entire measuring point and helps to carry out optimization measures.
- **Drive connectivity:** **Liquiline Edge Module CYY7** transfers process data to Netilion, independently of the fieldbus. This allows remote overview and the use of IIoT services. It's available in new products or as upgrade to installed Liquiline platforms.

### Specs at a glance

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**Input** 1...8x Memosens digital input 2x 0/4..20mA Input optional  
2..4x Digital input optional

- **Output / communication** 2...8x 0/4...20 mA current outputs  
alarmrelay 4x relay ProfibusDP Modbus RS485 Modbus TCP  
Ethernet
- **Ingress protection** IP20 transmitter IP66 optional Display

**Field of application:** Liquiline CM448R allows you to connect up to 8 Memosens sensors of your choice from over 12 measurement parameters. With its compact design, it fits into any cabinet - and even offers inputs, outputs, controllers, and math modules, e.g. for control of sensor cleaning. The transmitter belongs to the Liquiline platform with standardized system integration, operation, and spare parts. Heartbeat Technology helps you find the ideal balance between measurement point availability and maintenance costs.

## Features and specifications

### pH

#### Measuring principle

Potentiometric

#### Application

Modular 4 wire controller

Multichannel:1-8 digital channels for Memosens protocol

Multiparameter: pH, redox, ISFET, conductivity inductive and conductive, dissolved oxygen, nitrate and turbidity

8 sensors connectable in any combination

Functionality modular extendable at any time

Plug and play for modules and sensors

#### Characteristic

Robust plastic housing

All non-ex applications

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pH	<b>Design</b> 8x Memosens input 2...8x current output alarmrelay 2x relay SD card for software update and copy & paste of setup
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	<b>Material</b> Polycarbonate
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	<b>Dimension</b> 220 (8.66) x 100 (3.94) x 98 (3.86) mm (inch)
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	<b>Process temperature</b> -20...55°C / 0...130°F
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	<b>Ingress protection</b> IP20 transmitter IP66 optional Display
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	<b>Input</b> 1...8x Memosens digital input 2x 0/4..20mA Input optional 2..4x Digital input optional
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	<b>Output / communication</b> 2...8x 0/4...20 mA current outputs alarmrelay 4x relay ProfibusDP Modbus RS485 Modbus TCP Ethernet
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## ORP / Redox

	<b>Measuring principle</b> Sensor ORP / Redox
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## ORP / Redox

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Plug and play for modules and sensors

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### **Characteristic**

Robust plastic housing

All non-ex applications

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### **Design**

8x Memosens input

2...8x current output

alarmrelay

2x relay

SD card for software update and copy & paste of setup

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### **Material**

Polycarbonate

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### **Dimension**

220 (8.66) x 100 (3.94) x 98 (3.86) mm (inch)

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### **Process temperature**

-20...55°C / 0...130°F

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### **Ingress protection**

IP20 transmitter

IP66 optional Display

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### **Input**

1...8x Memosens digital input

2x 0/4..20mA Input optional

2..4x Digital input optional

**ORP / Redox****Output / communication**

2...8x 0/4...20 mA current outputs  
alarmrelay  
4x relay  
ProfibusDP  
Modbus RS485  
Modbus TCP  
Ethernet

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**Conductivity****Measuring principle**

Conductive

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**Material**

Polycarbonate

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**Conductivity****Dimension**

220 (8.66) x 100 (3.94) x 98 (3.86) mm (inch)

**Process temperature**

-20...55°C / 0...130°F

**Ingress protection**

IP20 transmitter

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1...8x Memosens digital input

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**Output / communication**

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**Oxygen****Measuring principle**

Amperometric oxygen measurement

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**Oxygen****Characteristic**

Robust plastic housing  
All non-ex applications

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**Material**

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**Disinfection****Measuring principle**

Total chlorine

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## Disinfection

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### Design

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### Input

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**Disinfection****Output / communication**

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**Turbidity****Measuring principle**

Single beam scattered light

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**Material**

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**Turbidity****Dimension**

220 (8.66) x 100 (3.94) x 98 (3.86) mm (inch)

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IP66 optional Display

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**Output / communication**

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**Sludge Level****Measuring principle**

Ultrasonic sensor

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**Sludge Level****Characteristic**

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