4-channel transmitter Liquiline CM444R

Expandable multiparameter DIN-rail and cabinet device for all industries



More information and current pricing: www.endress.com/CM444R

Benefits:

Saves space, saves money:

Small footprint, 4 channels in one device, expandable at any time, 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.

Specs at a glance

- Input 1 to 4x Memosens digital input 2x 0/4 to 20mA Input optional 2 to 4x Digital input optional
- Output / communication 2 to 8x 0/4 to 20 mA current outputs, alarmrelay, 4x relay, ProfibusDP, Modbus RS485, Modbus TCP, Ethernet

Ingres protection Transmitter: IP20 Optional Display: IP66

Field of application: Liquiline CM444R is a digital multiparameter transmitter for process monitoring and control in all applications - even where mounting space is limited. You save time and money through fast and simple installation, operation and handling. The 4-channel controller can be extended to accommodate up to 8 sensors at any time to fit the needs of your process. Liquiline CM444R provides you with all the benefits of a best-in-class transmitter platform from clever simplicity to maximum process safety.

Features and specifications

pН

Measuring principle

Potentiometric

Application

Modular 4 wire controller

Multichannel: 1 to 4 digital channels for Memosens protocol

Multiparameter: pH, redox, ISFET, conductivity inductive and conductive,

dissolved oxygen, nitrate and turbidity

4 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

Design

2 to 4x Memosens input, 2 to 8x current output, Alarmrelay, 4x relay, SD card for software update and copy & paste of setup

Material

DIN rail housing: PC-FR Display seal: EPDM

pН

Dimension

 $220 \times 100 \times 97 \text{ mm}$ $8.66 \times 3.94 \times 3.82 \text{ inch}$

Process temperature

0 to 55 °C (32 to 130 °F)

Ingres protection

Transmitter: IP20 Optional Display: IP66

Input

1 to 4x Memosens digital input 2x 0/4 to 20mA Input optional 2 to 4x Digital input optional

Output / communication

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

Additional certifications

EAC, cCSAus

Oxygen

Measuring principle

Amperometric oxygen measurement

Application

Modular 4 wire controller

 $\label{eq:multichannel:1} \mbox{Multichannel: 1 to 4 digital channels for Memosens protocol}$

Multiparameter: pH, redox, ISFET, conductivity inductive and conductive,

dissolved oxygen, nitrate and turbidity

4 sensors connectable in any combination

Functionality modular extendable at any time

Plug and play for modules and sensors

Oxygen

Characteristic

Robust plastic housing All non-ex applications

Design

2 to 4x Memosens input, 2 to 8x current output, Alarmrelay, 4x relay, SD card for software update and copy & paste of setup

Material

DIN rail housing: PC-FR Display seal: EPDM

Dimension

220 x 100 x 97 mm 8.66 x 3.94 x 3.82 inch

Process temperature

0 to 55 °C (32 to 130 °F)

Input

1 to 4x Memosens digital input 2x 0/4 to 20mA Input optional 2 to 4x Digital input optional

Output / communication

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

Additional certifications

EAC, cCSAus

Conductivity

Measuring principle

Conductive

Conductivity

Application

Modular 4 wire controller

Multichannel: 1 to 4 digital channels for Memosens protocol

Multiparameter: pH, redox, ISFET, conductivity inductive and conductive,

dissolved oxygen, nitrate and turbidity

4 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

Design

2 to 4x Memosens input, 2 to 8x current output

Alarmrelay, 4x relay, SD card for software update and copy & paste of

setup

Material

DIN rail housing: PC-FR

Display seal: EPDM

Dimension

220 x 100 x 97 mm

8.66 x 3.94 x 3.82 inch

Process temperature

0 to 55 °C (32 to 130 °F)

Ingres protection

Transmitter: IP20

Optional Display: IP66

Input

1 to 4x Memosens digital input

2x 0/4 to 20mA Input optional

2 to 4x Digital input optional

Conductivity

Output / communication

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

Additional certifications

EAC, cCSAus

Disinfection

Measuring principle

Total chlorine

Application

Modular 4 wire controller

Multichannel: 1 to 4 digital channels for Memosens protocol Multiparameter: pH, redox, ISFET, conductivity inductive and conductive, dissolved oxygen, nitrate and turbidity

4 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

Design

2 to 4x Memosens input, 2 to 8x current output, Alarmrelay, 4x relay, SD card for software update and copy & paste of setup

Material

DIN rail housing: PC-FR Display seal: EPDM

Dimension

220 x 100 x 97 mm 8.66 x 3.94 x 3.82 inch

Disinfection

Process temperature

0 to 55 °C (32 to 130 °F)

Input

1 to 4x Memosens digital input 2x 0/4 to 20mA Input optional 2 to 4x Digital input optional

Output / communication

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

Additional certifications

EAC, cCSAus

Sludge Level

Measuring principle

Ultrasonic sensor

Application

Modular 4 wire controller

Multichannel: 1 to 4 digital channels for Memosens protocol Multiparameter: pH, redox, ISFET, conductivity inductive and conductive, dissolved oxygen, nitrate and turbidity

4 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

Design

2 to 4x Memosens input, 2 to 8x current output, Alarmrelay, 4x relay, SD card for software update and copy & paste of setup

Sludge Level

Material

DIN rail housing: PC-FR Display seal: EPDM

Dimension

 $220 \times 100 \times 97 \text{ mm}$ $8.66 \times 3.94 \times 3.82 \text{ inch}$

Process temperature

0 to 55 °C (32 to 130 °F)

Ingres protection

Transmitter: IP20 Optional Display: IP66

Input

1 to 4x Memosens digital input 2x 0/4 to 20mA Input optional 2 to 4x Digital input optional

Output / communication

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

Additional certifications

EAC, cCSAus

Turbidity

Measuring principle

Single beam scattered light

Turbidity

Application

Modular 4 wire controller

Multichannel: 1 to 4 digital channels for Memosens protocol

Multiparameter: pH, redox, ISFET, conductivity inductive and conductive,

dissolved oxygen, nitrate and turbidity

4 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

Design

2 to 4x Memosens input, 2 to 8x current output,

Alarmrelay, 4x relay, SD card for software update and copy & paste of setup

Material

DIN rail housing: PC-FR

Display seal: EPDM

Dimension

220 x 100 x 97 mm

8.66 x 3.94 x 3.82 inch

Process temperature

0 to 55 °C (32 to 130 °F)

Ingres protection

Transmitter: IP20

Optional Display: IP66

Input

1 to 4x Memosens digital input

2x 0/4 to 20mA Input optional

2 to 4x Digital input optional

Turbidity

Output / communication

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

Additional certifications

EAC, cCSAus

ORP / Redox

Measuring principle

Sensor ORP / Redox

Application

Modular 4 wire controller

Multichannel: 1 to 4 digital channels for Memosens protocol Multiparameter: pH, redox, ISFET, conductivity inductive and conductive, dissolved oxygen, nitrate and turbidity

4 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

Design

2 to 4x Memosens input, 2 to 8x current output Alarmrelay, 4x relay, SD card for software update and copy & paste of setup

Material

DIN rail housing: PC-FR Display seal: EPDM

Dimension

 $220 \times 100 \times 97 \text{ mm}$ $8.66 \times 3.94 \times 3.82 \text{ inch}$

ORP / Redox

Process temperature

0 to 55 °C (32 to 130 °F)

Ingres protection

Transmitter: IP20 Optional Display: IP66

Input

1 to 4x Memosens digital input 2x 0/4 to 20mA Input optional 2 to 4x Digital input optional

Output / communication

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

Additional certifications

EAC, cCSAus

More information www.endress.com/CM444R

