Digital chlorine dioxide sensor
Memosens CCS50D

Memosens sensor for water, process water and utilities in all industries

Benefits:

- The right sensor version for every application: From trace measurement up to chlorine dioxide concentrations of 200 mg/l.
- Fast response time provides accurate process view and enables prompt reaction to process changes as well as efficient process control.
- Increased process safety: precise and long-term stable measurement ensures consistent process monitoring and allows for lowest disinfectant concentration.
- Flexible installation: sensor can be installed in the CCA151 and CCA250 flow assemblies or in immersion assemblies. Measurement virtually flow independent at flow velocities above 5 l/h (CCA151), 30 l/h (CCA250) or above 15 cm/s (immersion).
- More process up-time thanks to fast sensor exchange: precalibrate the sensor in your lab and then swap it into your process with plug & play.
- Connection to the Liquiline multiparameter transmitter allows easy combination with other relevant parameters of liquid analysis.

Specs at a glance

- **Measurement range** Trace: 0 to 5 mg/l ClO2 Standard: 0 to 20 mg/l ClO2 High: 0 to 200 mg/l ClO2
- **Process temperature** 0 to 55 °C, non-freezing (32 to 130 °F)
- **Process pressure** Max. 2 bar abs (Max. 29 psi abs)

Field of application: Memosens CCS50D is a robust, low maintenance sensor for chlorine dioxide measurement. It provides stable and fast measured values in drinking water, process water and utilities. The sensor can be used to ensure efficient disinfection for highest water quality and safety, to avoid overdosing of chlorine dioxide or to ensure the absence of ClO₂ in beverage plants and reverse osmosis. Memosens
CCS50D is not the latest Memosens generation. More information on the new Memosens CCS50E sensor [here](#).

### Features and specifications

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<td><strong>Measuring principle</strong></td>
<td>Chlorine dioxide</td>
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<td><strong>Application</strong></td>
<td>Adequate disinfection in drinking water, preventing of pathogen formation in cooling water systems, water used to wash pre-packaged vegetables, ensures the absence of chlorine dioxide in beverage systems</td>
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<td><strong>Characteristic</strong></td>
<td>Amperometric measurement of dissolved chlorine dioxide</td>
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</table>
| **Measurement range** | Trace: 0 to 5 mg/l ClO2  
Standard: 0 to 20 mg/l ClO2  
High: 0 to 200 mg/l ClO2 |
| **Measuring principle** | Closed, membrane covered measuring cell  
Reduction of chlor dioxide (ClO2) to chloride at the cathode with appr. 120mV |
| **Design** | Closed amperometric 2-electrode measuring cell with PVDF membrane |
| **Material** | Sensor shaft: POM  
Membrane: PVDF  
Membrane cap: PVDF |
| **Dimension** | Diameter: 25 mm (0.98 inch)  
Length: 161 mm (6.34 inch) |
**Process temperature**  
0 to 55 °C, non-freezing  
(32 to 130 °F)

**Process pressure**  
Max. 2 bar abs  
(Max. 29 psi abs)

**Temperature sensor**  
10k NTC integrated (Memosens)

**Connection**  
Inductive, digital connection head with Memosens

More information [www.endress.com/CCS50D](http://www.endress.com/CCS50D)