

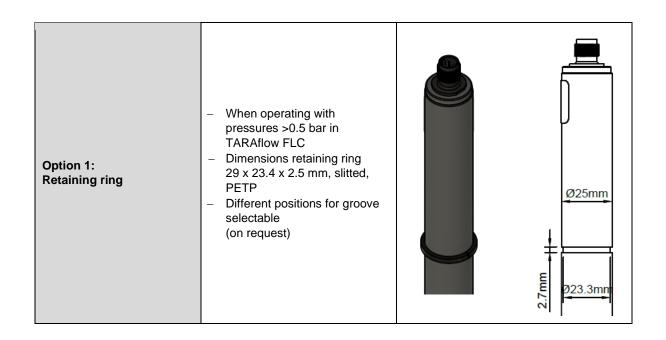
	TARAbase CD4.2				
indicator	Chlorine dioxide				
Application	Swimming pool water, drinking water, service water, process water The water must not contain any surfactants (tensides)!				
appropriate chlorine dioxide production methods	e. g.  - Acid/chlorite-method  - Chlorine/chlorite-method				
Measuring system	Membrane covered, amperometric 2-electrode system with electronic inside				
Electronic	Analog version:  - voltage output - not galvanically isolated electronics - analog internal data processing - output signal: analog (analog-out/analog)  Digital version:  - electronic is completely galvanically isolated - digital internal data processing - output signal: analog (analog-out/digital)  or digital (digital-out/digital)  mA-version:  - current output analog - not galvanically isolated electronics - output signal: analog (analog-out/analog)				
Information about the measuring range  Slope drift At repeatability conditions	The actual slope of a sensor can vary production-related between 65% and 150% of the nominal slope  Note: With a slope > 100% the measuring range is reduced accordingly. (Ex.: 150% slope → 67% of the specified measuring range)  approx. <-1% per month				
(25 °C, pH 7,2 in drinking water)  Working temperature	Measuring water temperature: 0 +45 °C (no ice crystals in measuring water)				
Temperature compensation	Ambient temperature: 0 +55 °C  Automatically, by an integrated temperature sensor Sudden temperature changes must be avoided				
Max. allowed working pressure	Operation without retaining ring:  - 0.5 bar  - no pressure impulses and/or vibrations  Operation with retaining ring in TARAflow FLC:  - 1.0 bar,  - no pressure impulses and/or vibrations  (see option 1)				



	TARAbase CD4.2					
Flow rate (Incoming flow velocity)	approx. 15-30L/h (15 – 30 cm/s) in TARAflow FLC, small flow rate dependence is given					
pH-range	pH 1 – pH 12 or the beginning of decomposition of chlorine dioxide at/over pH 12					
Run-in time	First start-up approx. 1 h					
Response time	T <sub>90</sub> : approx. 15 sec.					
Zero point adjustment	Not necessary					
calibration	At the device, by analytical determination					
interferences	Cl <sub>2</sub> : factor 0.35 O <sub>3</sub>					
Absence of the disinfectant	Max. 24 h					
Connection	mV version: 5-pole M12, plug-on flange Modbus version: 5-pole M12, plug-on flange 4-20 mA version: 2-pole terminal or 5-pole M12, plug-on flange					
max. length of sensor	analog < 30 m					
cable (depending on internal signal processing)	digital > 30 m are permissible Maximum cable length depends on application					
Protection type	5-pole M12 plug-on flange: IP68 2-pole terminal with mA-hood: IP65					
material	Semipermeable membrane, PVC-U, ABS					
Size	diameter: Length: mV version approx. 25 mm approx. 190 mm (analog signal processing) approx 205 mm (digital signal processing) approx. 205 mm 4-20 mA version approx. 220 mm (2-pole-terminal) approx. 190 mm (5-pole-M12)					
Transport	+5 +50 °C (Sensor, electrolyte, membrane cap)					



	TARAbase CD4.2
	Sensor: dry and without electrolyte no limit at +5 +40 °C
storage	Electrolyte: in original bottle protected from sunlight at +5 +35 °C min. 1 year or until specified EXP-Date
	Membrane cap: in original packing no limit at +5 +40 °C (used membrane caps can not be stored)
maintenance	Regularly control of the measuring signal, min. once a week The following specifications depend on the water quality: Change of the membrane cap: once a year (depending on the water quality) Change of the electrolyte: every 3 - 6 months
( €	EMC tested RoHS compliant





### **Technical Data**

#### 1. CD4.2 (analog output, analog internal signal processing)

	Measuring range	Resolution	Output Output resistance	Nominal slope	Voltage supply	Galvanic isolation required in the measuring device/controller *	Connection
	in ppm	in ppm		in mV/ppm			
CD4.2N-M12	0.0520.00	0.01	02000 mV	-100	±5 - ±15 VDC	No.	5-pole M12 plug-on flange Function of wires: PIN1: measuring signal
CD4.2H-M12	0.0052.000	0.001	1 kΩ	-1000	10 mA	yes	PIN2: +U PIN3: -U PIN4: signal GND PIN5: n. c.

<sup>\*</sup> for further information see brochure 'Technical information // galvanic isolation' (in the download area of our website www.reiss-gmbh.com)
(Subject to technical changes!)



# 2. CD4.2 (analog output, digital internal signal processing) analog-out / digital

	Measuring range	Resolution in ppm	Output Output resistance	Nominal slope in mV/ppm	Power supply	Galvanic isolation required in the measuring device/controller *	Connection
CD4.2H-An-M12	0.0052.000	0.001	analog 02 V (max2.5 V)	-1000			5-pole M12 plug-on flange
CD4.2N-An-M12	0.0520.00	0.01	1 kΩ	-100	9-30 VDC		Function of wires: PIN1: measuring signal
CD4.2H-Ap-M12	0.0052.000	0.001	analog 0+2 V (max. +2.5 V)	+1000	approx. 7-30 mA	no	PIN2: +U PIN3: power GND
CD4.2N-Ap-M12	0.0520.00	0.01	1 kΩ	+100			PIN4: signal GND PIN5: n. c.

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#### 3. CD4.2 (digital output, digital internal signal processing)

	Measuring range	Resolution in ppm	Output Output resistance	Power supply	Galvanic isolation required in the measuring device/controller *	Connection
CD4.2H-M0c	0.005 2.000	0.001	Modbus RTU	9-30 VDC	no	5-pole M12 plug-on flange Function of wires: PIN1: reserved
CD4.2N-M0c	0.05 20.00	0.01	There are no terminating resistors in the sensor.	approx. 7-30 mA		PIN2: +U PIN3: power GND PIN4: RS485B PIN5: RS485A

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#### 4. CD4.2 4-20 mA (analog output, analog internal signal processing)

#### 4.1 Electrical connection: 2 pole terminal clamp

	Measuring range	Resolution	Output Output resistance	Nominal slope	Voltage supply	Galvanic isolation required in the measuring device/controller *	Connection
	in ppm	in ppm		in mA/ppm			
CD4.2MA0.5	0.0050.500	0.001		32.0		yes	2-pole terminal (2 x 1 mm²)  Recommended: Round cable Ø 4 mm 2 x 0.34 mm²
CD4.2MA2	0.0052.000	0.001		8.0			
CD4.2MA5	0.055.00	0.01	420 mA uncalibrated	3.2	1230 VDC R <sub>L</sub> 50ΩR <sub>L</sub> 900Ω		
CD4.2MA10	0.0510.00	0.01		1.6			
CD4.2MA20	0.0520.00	0.01		0.8			

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#### 4.2 Electrical connection: 5 pole M12 plug-on flange

	Measuring range	Resolution	Output Output resistance	Nominal slope	Voltage supply	Galvanic isolation required in the measuring device/controller *	Connection
	in ppm	in ppm		in mA/ppm			
CD4.2MA0.5-M12	0.0050.500	0.001		32.0	1230 VDC R <sub>L</sub> 50ΩR <sub>L</sub> 900Ω	yes	
CD4.2MA2-M12	0.0052.000	0.001		8.0			5-pole M12 plug-on flange  Function of wires: PIN1: n. c. PIN2: +U PIN3: -U PIN4: n c. PIN5: n. c.
CD4.2MA5-M12	0.055.00	0.01	420 mA uncalibrated	3.2			
CD4.2MA10-M12	0.0510.00	0.01		1.6			
CD4.2MA20-M12	0.0520.00	0.01		0.8			

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## **Spare Parts**

Туре	Membrane cap	Electrolyte	emery	O-ring
For all CD4.2	M20.2	ECD4 ● ECD7/W, 100 ml	S1	14 x 1.8 NBR
	Art. no. 11011.1	Art. no. 11030	Art. no. 11908	Art. no. 11806

(Subject to technical changes!)

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