The OxyGuard CO2 Probe



The OxyGuard CO2 probe is a reliable and easy to use probe that measures the free dissolved CO2 directly and is not affected by carbonates or other dissolved substances.

Principle of operation

The probe measures the carbon dioxide content of the water directly by detecting the carbon dioxide partial pressure in the water. It is important to note that it is NOT based on a pH measurement - it does NOT detect any change in pH that carbon dioxide causes. Neither does it withdraw a sample for analysis - it detects the free dissolved CO2 - the carbon dioxide partial pressure - in the water.

The probe's range is 0-50 mg/l. Before use the probe is calibrated using mixtures of water and calibration chemicals in a special calibration beaker with stirrer. The calibration accessories - beaker with stirrer, chemicals etc., are ordered separately.

Please note the CO2 probe only can be used together with OxyGuard equipment.



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Specification

Size: Probe: 40 mm dia. x 140 mm. Cable length 7 m.

Calibration beaker 65 mm dia. x 260 mm.

Weight: Probe with cable 600g. Calibration accessories 1.0 kg.

Supply: 5 V DC

Range: 0 - 50 mg/l dissolved carbon dioxide. Operating conditions: 3-35°C

Accuracy: Depends on calibration. Practical accuracy up to +/- 1 mg/l.

Response time: Typically 5 minutes at 20°C depending on flow velocity past the probe.

In still water up to 15 minutes.

Flow requirements: The instrument does not consume carbon dioxide for its measurement, but a

certain flow is necessary to ensure that the sensing element of the probe is in equilibrium with the surrounding water and to avoid "spot" measurements.

Output: 0 - 1 V (nonlinear)

Ordering Information:

G10PS: OxyGuard CO2 Dissolved CO2 Probe - with 7m cable.

G10CAL: Calibration accessories; Beaker with stirrer & magnet, 75 g pH conditioner,

dosing spoon, 100 ml calibration solution, dosing syringe, adjustment screwdriver, battery pack, charger 100 - 240 V AC. These calibration accessories can be used

for more than one CO2 OxyGuard Probe.

G10CS: 100 ml calibration solution.

G10CC: 75 g pH conditioner for calibration.

G10REPS: CO2 Probe exchange (About every 3 years the probe needs to be changed).



G10PS The OxyGuard CO2 Probe GB 2020 05 Data subject to change without notice