



SEBA Checker-2

Versatile water quality measurement in surface water

- Mobile, compact field laboratory for measuring water quality parameters (e.g. oxygen, pH, conductivity, redox potential, turbidity) in surface waters
- Spiral cable with stainless steel coupling for SEBA multi-parameter probes of the MPS-D3/D8/K16
- 3-line backlit LCD
- Integrated logger for manual and / or automatic storage of measured values (optional)



Connecting the MPS



Application in river



Mobile water quality measurement

Quality Measurements with SEBA Checker-2

The SEBA Multi-parameter system Checker-2 has been developed as a mobile field laboratory especially for determination of water quality parameters in surface water.

The Checker-2 has an extremely compact design, easy operation with fast and precise acquisition of various water quality parameters. The current measured values are clearly displayed.

Optionally, the instrument can be equipped with an integrated data logger with a storage capacity of up to 1,120,000 values for an automatic or manual data recording.



MPS-D3 MPS-D8 MPS-K16

Data Logger

Full data logger functionality (optional) is possible for the automatic storage of up to 1,120,000 measured values. Instant logs can be obtained manually at the push of a button, suitable for quick assimilation of water quality profiles.

Read-out and setting of measuring frequency via RS 232-interface with SEBA-HDA or laptop.

Software

Operating software:	SEBAConfig (Windows)
Data readout:	Interfacekabel RS 232 - USB, BlueCon (Bluetooth), RS 232
Evaluation software:	DEMASvis
Archiving Software:	DEMASdb

Multiparameter Sensor

Double plug-in, maintenance-friendly high-quality-steel probe (MPS-D3, MPS-D8) or single plug-in plastic probe MPS-K16 for connection to Checker-2 or KLL-Q-2. Individually configurable with various sensors (e.g. pH, O₂, conductivity etc.) For a detailed description of possible configurations refer to our Water Quality Monitoring brochure.

Parameters:

- Water level
- Temperature
- Conductivity
 - total dissolved solids(TDS)
 - salinity
 - water density
- Oxygen
 - Oxygen saturation
- pH-value
- Redox (ORP)
- Ammonia
- Nitrate
- Chloride
- Ammonium
- Sodium
- Calcium
- Fluoride
- Potassium
- Chlorophyll a
- Cyanobacteria
- RhodamineWT
- Turbidity
 - total suspended solids(TSS)



Technical data Checker-2

Sensor:	Multiparameter probe Type MPS-D3
	Multiparameter probe Type MPS-D8
	Multiparameter probe Type MPS-K16
Measurement transducer:	
Housing:	Material: Shock-resistant plastic
	Dimension: Ø 130 mm, Length: 150 mm
	Protection class: IP65
	Keyboard: 3 multifunction buttons
	Display: 3-line LCD (liquid crystal display) with backlight
	Cable: 2 m spiral cable made of PU with 5 pins. Circular connectors (RS 485) for Checker-2 and stainless steel coupling for MPS-D3/8/K16
Logger (Option):	Controller: 16 Bit Flash controller with integrated WatchDog RTC-IC Real-Time Clock
	Memory capacity: 16 MB (= 1,120,000 readings)
	Save interval: Manually or cycle-controlled by 2 min - 99 hours
	Channels: max. 32
	Measurement routines: Single value, average value, event clock, Delta mode
Communications Interface:	RS 232
Operation:	Interfacekabel (USB/RS232), Bluetooth (Option)
Outputs:	RS 485 (SHWP)
Power supply:	4 x 2V lead-acid batteries, rechargeable
Connection:	Spiral cable with stainless-steel coupling for MPS-D3/D8/K16
Operating temperature:	-40 °C - 65 °C

Technical data Sensors

Parameter:	Measuring ranges:
Pressure	0...200 mWs Temperature: -5...50 °C
Temperature	-5...50 °C Pressure: 0...500 mWs
Conductivity	0...200 mS Temperature: -5...50 °C Pressure: 0...500 mWs
Total dissolved solids	0...200.000 mg/l Temperature: -5...50 °C Pressure: 0...500 mWs
Salinity	0...70 Temperature: -5...50 °C Pressure: 0...500 mWs
Density	988...1060 g/l Temperature: -5...50 °C Pressure: 0...500 mWs
Oxygen (amperometric)	0-40 mg/l Temperature: 0...50 °C Pressure: 0...100 mWs
Oxygen (optical)	0-25 mg/l Temperature: 0...50 °C Pressure: 0...100 mWs
Oxygen saturation	0...400 % saturation Temperature: 0...50 °C Pressure: 0...100 mWs
pH	0...14 Temperature: 0...50 °C Pressure: 0...200 mWs
Redox	-1200 mV...1200 mV Temperature: 0...50 °C Pressure: 0...200 mWs
Ammonia	0,01...17000 mg/l Temperature: 0...50 °C Pressure: 0...5 mWs
Nitrate	0.4...60000 mg/l Temperature: 0...40 °C Pressure: 0...200 mWs

Parameter:	Measuring ranges:
Chloride	1...35000 mg/l Temperature: 0...50 °C Pressure: 0...200 mWs
Ammonium	0.2...18000 mg/l Temperature: 0...40 °C Pressure: 0...10 mWs
Natrium	0.2...20000 mg/l Temperature: 0...50 °C Pressure: 0...60 mWs
Calcium	0.5...40000 mg/l Temperature: 0...40 °C Pressure: 0...10 mWs
Fluoride	0.2...20000 mg/l Temperature: 0...40 °C Pressure: 0...10 mWs
Potassium	0.4...39000 mg/l Temperature: 0...40 °C Pressure: 0...10 mWs
Chlorophyll a (optical)	0.03...500 µg/l Chl a Temperature: -2...50 °C Pressure: 0...600 mWs
Cyanobacteria (optical)	150...2000000 cells/ml Temperature: -2...50 °C Pressure: 0...600 mWs
Rhodamine WT (optical)	0.04...1000 ppb RWT Temperatur: -2...50 °C Pressure: 0...600 mWs
Turbidity (optical)	0...1000 NTU Temperature: 0...50 °C Pressure: 0...100 bar with wiper 0...200 bar without wiper
Total suspended solids	approx. 5 fold measuring range turbidity mg/l Temperatur: 0...50 °C Pressure: 0...100 bar with wiper 0...200 bar without wiper

For further information on Multiparameter Sensors please see separate brochure on Water Quality Monitoring.

The right is reserved to change or amend the foregoing technical specification without prior notice.

Contact:

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