Swimming Pool Photometer

General

The operation results of control systems in water treatment decisively depend on the quality of the sensors signal. That's why sensors calibration is of central importance.
Local maintenance instructions stipulate regular checks of the measuring values (in some cases even several times per day). Especially in the case of systems with several measuring points it is crucial to provide for a simple and fast operation of the manual comparison measurement.
Our photometer meets these requirements and offers additionally a high measuring accuracy and a robust construction.

Functional description

Depending on the water parameter to be determined the water sample is mixed with the corresponding reagent so that the color intensity or turbidity of the sample varies according to the concentration. The light system in the measuring shaft determines the light absorption in the sample. The photometer calculates the concentration using the light absorption and indicates it on the LCD display.
The measuring reagents are available as tablets or in some cases also as drops. It is recommended to rather use tablets as the storage life of liquid reagents amounts to maximum 1 year, at temperatures higher than 10 °C even clearly shorter.

Note:
In the case of a high water hardness or salt content in the water the measurement might be affected resulting from turbidity of the water. By using DPD1-HighCalc tablets this can be avoided thus ensuring a precise measurement (see accessories).

Scope of delivery

The photometer is available in a plastic suitcase. including:

1 9 V block battery
3 Measuring cuvette with screw cap
1 Plastic mixing rod
1 Single-use syringe 5ml
1 Cleaning brush
Reagent tablets for 50 measurements each
1 Instruction manual

Order number 238 00 003

Dimension

Swimming Pool Photometer

Technical data

Measuring methods:

- free, combined, total chlorine
  - 0...1 mg/l ±0.05 mg/l
  - 1...2 mg/l ±0.10 mg/l
  - 2...3 mg/l ±0.20 mg/l
  - 3...4 mg/l ±0.30 mg/l
  - 4...6 mg/l ±0.40 mg/l
- chlorine dioxide
  - 0.1...11 mg/l ±6%
- pH value
  - pH 6.5...pH 8.4 ±0.1pH
- isocyanuric acid
  - 2...160 mg/l ±10 mg/l
- acid capacity $K_{S4,3}$
  - 0.1...4.0 mmol/l ±5%

Power supply:
9V block battery; service life approx. 600 tests

Auto-OFF:
Automatic switch-off of the unit,
approx. 5 minutes after last key pressure

Display:
3-digit LCD display

Housing material:
ABS

Ambient conditions:
4...40°C; 30...90% relative air humidity
(not condensing)

Dimensions (HxWxD):
67x185x118mm (only unit)
86x340x275mm (incl. suitcase)

Weight:
400 g (only unit); 1,000 g (incl. suitcase)

Spare parts/ Reagents

	Part No.
3 spare cuvettes with cap	35690
Plastic mixing rod	35691
Cover for battery shaft	35692

Reagents

DPD1 (free chlorine)	
Tabletts, 500 pieces	35693
Tabletts, 100 pieces	35694
Drops, (buffer + reagent) for approx. 70 measurements	35695
DPD1 High Calcium (free chlorine with high water hardness or high salt content)	
Tabletts, 500 pieces	35696
Tabletts, 100 pieces	35697
DPD3 (total chlorine)	
Tabletts, 500 pieces	35698
Tabletts, 100 pieces	35699
Drops,for approx. 70 measurements	35700
Phenol red (pH value)	
Tabletts, 500 pieces	35701
Tabletts, 100 pieces	35702
Drops,for approx. 70 measurements	35703
Isocyanuric acid	
Tabletts, 250 pieces	35704
Tabletts, 100 pieces	35705
Alka-M ($K_{S4,3}$-value)	
Tabletts, 250 pieces	35706
Tabletts, 100 pieces	35707