

# Fluoride Monitoring System

## Reagent-less monitoring of Fluoride



The **ProMinent® D1C Fluoride Monitoring System** is designed for reagentless measurement of residual fluoride in potable and process waters.

The **DULCOMETER® D1C** fluoride meter carries out potentiometric metering with the aid of an ion-selective electrode (ISE) and a reference electrode.

This panel-mounted complete measuring station is adjusted to the special requirements in municipal and industrial applications. As a plug & play module, it can easily and quickly be installed and commissioned.

### Features & Benefits

- Reagentless measurement of fluoride
- Complete component system
- ProMinent D1C & Sensor Technology
- Output signal to chart recorder
- Fluoride sensor measurement range to 10 PPM
- Low pH dependency of fluoride measurement.
- Rapid response and short run-in time of fluoride electrode.
- Simple calibration with DT2B Test Kit.

### Applications

- Potable water treatment
- Bottled water

### Ordering Information

- Panel Mounted Fluoride Monitoring System (P/N: 7744836)
- Stand Base (P/N: 7744837)
- NEMA 4X Enclosure (P/N: 7744711) *\*pictured*
- Heater (P/N: 7744722)
- Sun shield (P/N: 7744723)

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## Components of the Monitoring System

### Signal channel controller D1C

- Electrical supply 230V 50/60 Hz or 115V 50/60 Hz
- Analog output 4-20 mA for measured value
- Alarm relay and two limit relays

### Sensors, measurement transducers and in-line probe housings

- Fluoride sensor type FLEP 010 SE (P/N: 1028279)
- Reference electrode type REFP-SE (P/N: 1018458)
- Temperature sensor type Pt 1000 SE for automatic temperature compensation (P/N: 1002856)
- Measurement transducer 4-20 mA FV1 for fluoride sensor (P/N: 1028280)
- In-line sensor housing DLG IV

### PVC piping with

- Rotameter & Flow Switch
- Sample tap
- Isolation valve on inlet side

## Technical Data

- Measurement range: 0.05 to 10 ppm fluoride
- pH Operating Range: 5.5 to 9.5 pH
- Temperature Range: 34° to 95° F
- Max. Operating Pressure: 101.5 psi (Note: The maximum admissible operating pressure for the monitoring system is 14.5 psi, determined by the in-line sensor housing.)
- Sample Water Flow Rate: 12-16 GPH

## Related Products

### Photometer

Microprocessor-controlled Photometer DT1, DT2B, DT3 and DT4 serve to calibrate amperometric and fluoride measuring systems by comparison measurement. They are pre-assigned to defined verification procedures and include various measurement parameters. With little investment of time, accurate and reproducible results can be achieved.



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