FLS pH 800

Ryton body flat surface electrode

aliaxis

FLS PH 800

The FLS pH 800 electrodes line feature a robust Ryton body combined with a self-cleaning flat surface and a reliable Pt1000 to ensure accurate measurements of dirty liquids and aggressive solutions. A large coupling improves performance in the presence of suspended solids. The new 870 electrodes allow direct installation by means of the ¾" thread present in the body, in-line installation by means of the threads in the lower part of the electrode or immersion installation by means of the threads on the electrode end. Models are also available for specific installations: horizontal mounting (-HM), low conductivity samples (-LC), aggressive solutions (HF<2%), low pH values (-HF).

RYTON BODY FLAT SURFACE ELECTRODE

APPLICATIONS

- Processing and manufacturing industry
- Transformation of chemicals
- Water treatment processes
- Cooling processes
- Heating processes

MAIN CHARACTERISTICS

- Combined temperature sensor
- Flat surface electrodes
- Robust Ryton body
- Double-threaded body for in-line and immersion installations
- Double coupling technology
- HM option for horizontal mounting
- HF option for liquids containing hydrofluoric acid (max 2%)
- LC option for liquids with conductivity below 100 µS/cm

TECHNICAL DATA	
General information	**Operating range:** – Electrodes for pH: 0-14 pH (0-12.3 pH without Na+ error)
	Pipe size range: from DN15 a DN100 (da 0,5" a 4")
	Value at 0 mV of the new electrodes: 7.00 pH ±0,2 pH
	New electrode efficiency: > 97% at 25 °C (77 °F)
	Response time of new electrodes: – pH: < 6 s for 95% signal change
	Reference solution: – Type: double sealed coupling – Electrolyte: solidified gel 3.5 M KCl 0.1 M KCl for electrode model LC / solidified gel 3.5 M KCl – Secondary coupling: nylon filament – Wiring: Ag/AgCl
	Connection to the process: – NPT 3/4" threaded body for submersion or in-line installation
	Max operating pressure/temperature: – 6.7 bar at 75°C (100 psi at 170°F) – 5.7 bar at 81°C (85 psi at 180°F) – 3.3 bar at 100°C (50 psi at 212°F)
	Materials in contact with liquids: – Body: PPS (Ryton®) HDPE, pH glass, leaded glass – Reference coupling: Porous HDPE – Detection surface: glass membrane
Standards & Approvals	Manufactured under ISO 9001 Manufactured under ISO 14001 CE EAC

PRODUCT CODES

PH870CDTCXX

Ryton double junction flat surface pH electrode with Pt1000

Code	Characteristics	Applications/ Operative Range	Reference solution	Cable**	Connection	Installation	Weight (gr.)
PH870CDTC	Pt1000 included	pH 0-14*	KCl 3.5 M	Not required	5 m (16,5 ft.)	3/4" NPT	250
PH870CDTCHM	Pt1000 included	0-14 pH / horizontal mounting*	KCl 3.5 M	Not required	5 m (16,5 ft.)	3/4" NPT	250
PH870CDTCLC	Pt1000 included	0-14 pH /low conductivity (<100 µS)*	KCl 3.5 M	Not required	5 m (16,5 ft.)	3/4" NPT	250
PH870CDTCHF	Pt1000 included	0-14 pH / presence of hydrofluoric acid (max 2%)*	KCl 3.5 M	Not required	5 m (16,5 ft.)	3/4" NPT	250

*(0-12,3 pH without Na^+ error)
** (Sold separately)

TECHNICAL DRAWINGS

pH 870

1 Cable: 5 m (16.5 ft.)
2 Ryton body
3 Flat pH glass
4 Porous HDPE coupling
5 Temperature sensor inside the stem for pH
6 NPT ¾" threads
7 Seat for key