

HI 8710

Panel Mounted pH Analog Controller

with Self-diagnostic Test

**Backlit LCD****Auto-diagnostic tests for pH electrode and instrument status****Operational mode LED indicators****Fail Safe function—the alarm relay is activated at power down****Transparent splash-proof cover****Inputs allowed:**

- 1) BNC Connector
- 2) Direct wire connection with amplified probe (supports HI 1006 series probes)
- 3) 4-20 mA from a transmitter

SPECIFICATIONS**HI 8710**

Range	-2.00 to 16.00 pH
Resolution	0.01 pH
Accuracy (@20°C/68°F)	±0.02 pH (0 to 100 °C) ±0.05 pH (-20 to 0 °C) ±0.5% (input from transmitter)
Input	High impedance 10 ¹² Ohm; Reference and Matching pin inputs are available 4-20 mA
Power Output	±5 Vcc; 150 mA max load for amplified electrodes
Calibration	Offset: ±2 pH with OFFSET trimmer; Slope: 80 to 110% with SLOPE trimmer
Temperature Compensation	fixed or automatic with Pt100, from -20 to 100°C (-4 to 212°F)
Recorder Output	0-20 mA or 4-20 mA (isolated)
Setpoint Relay	1, isolated, 2 A, Max 240 V, resistive load, 1000000 strokes (not fuse protected)
Setpoint Range	-2.00 to 16.00 pH
Alarm Relay	1, isolated, 2 A, Max 240 V, resistive load, 1000000 strokes (not fuse protected)
ΔAlarm Range	0.2 to 3.00 pH
Consent Relay	1, isolated, 2 A, Max 240 V, resistive load, 1000000 strokes (not fuse protected)
Dosing Control	OFF/AUTO/ON with selection switch
Over Dosing Control	Adjustable, from 5 min to 60 min with knob or Disable by wire strap - on rear panel
Backlight	Continuous ON
Power Supply	115 Vac ±10% or 230 Vac ±10%; 50/60 Hz
Enclosure	Black anodized aluminium body; front panel with flame retardant ABS; transparent splash-proof front cover
Environment	-10 to 50°C (14 to 122°F); RH max 95% non-condensing
Panel Cutout	141 x 69 mm (5.6 x 2.7")
Weight	1 kg (2.2 lb.)

ORDERING INFORMATION

The **HI 8710** is supplied complete with mounting brackets and instructions.

SOLUTIONS

- HI 7004/1L** pH 4.01 buffer solution, 1 L
HI 7007/1L pH 7.01 buffer solution, 1 L
HI 7010/1L pH 10.01 buffer solution, 1 L

ACCESSORIES

- HI 8427** pH / ORP electrode simulator
HI 931001 pH / ORP electrode simulator with display

ACCESSORIES

- HI 8614-01** pH transmitter
HI 8614L-01 pH transmitter with display

Reliable pH Control

The HI 8710 is a panel mounted pH Controller with self diagnostic and test. The user can set: the setpoint for acid or alkaline dosage, the tolerance of the setpoint before an Alarm is activated, the Dosage mode: Automatic, Continuous On or OFF and the Over dosage control by setting the Overtime dosage knob

When used in conjunction with the HI 8720 ORP controller, the ODCD* function will ensure that the ORP dosage will start only when the pH level is correct.

The controller is also provided with a unique self-diagnostic test to check the pH electrode and instrument status.

"Over time dosage" function with selection knob and jumper for disable on the rear panel. If the dosing relay remains continuously activated for more than selected dosing time the alarm relay is activated, the alarm LED is blinking and the dosing relay is deactivated.

"Automatic/OFF/Manual" dosing selection switch and LED on the front panel.

In Automatic mode all the relays are controlled based on the measurement set point and alarm values. In OFF mode the dosing and alarm relays are always deactivated. The dosing LED is OFF (as relay status) and the ALARM LED is in accordance with the instrument setpoint, input reading and ΔALARM.

In ON (Manual) mode the dosing relay is always ON, the alarm relay is still enabled. If an alarm occurs the dosing relay is not deactivated. If the over dosage time expires during Manual mode, the alarm relay remains activated

The front panel is protected behind a transparent splash-proof cover.

* ORP Dosing Consent Device

- Broader pH range
- Extended temperature compensation range: -0 to 100°C
- Supports potential matching pin connection
- Both 4-20 and 0-20 mA output
- ±5V outputs for amplified electrodes