

ZIROX Electronic Unit E2000

Properties

The electronic unit E2000 is a comfortable device for the use of ZIROX oxygen probes. The signals of ZIROX probes are recorded with the E2000, processed according to the NERNST equation to the oxygen concentration (normally in vol%) and generated via standard interfaces.

The electronic unit E2000 supplies the probe with reference air via internal pump. Additionally, the E2000 realizes the power supply and the heater control for heated ZIROX probes.

Furthermore, the probes are monitored by the E2000 with cyclical measurements of the cell resistance. An error message is signalized if necessary.

The user can program two limit values (output via relay).

If requested, the E2000 can be delivered with automatic calibration function.

In incomplete burned gases (reducing conditions), more values can be calculated (air factor λ , dew point, H₂O/H₂-ratio, CO₂/CO-ratio, c(CO₂) and c(H₂O) at water-gas-equilibrium). *Precondition:* known fuel gas composition, e.g. C/H-ratio.

Features

- Signal processing and display of ZIROX probes measuring values
- Calibration and monitoring function for ZIROX® probes
- Measuring value output via standard interfaces
- Process monitoring via standard interfaces
- Customized solutions
- Automatic calibration function (optional)



ZIROX® Electronic Unit E2000

Sensoren und Elektronik GmbH



Technical Data

Signal input.....	Cell und thermal voltage ZIROX probes
Range	0...20.64 vol% O ₂ (up to 100 Vol.-% on request)
Accuracy.....	Rel. error < 5 %
Reference gas supply.....	Via internal pump (flow monitored)
Display.....	LCD dot-matrix
Keypad	6 membrane keys (ESC; Enter; 4 keys with indication)
Digital interface.....	RS232
Output.....	2 potential-free current outputs 0/4...20 mA, adjustable (alternatively: voltage output 0...5/10 V) 2 programmable limit values (relay output) Alarm signalling (relay output)
Power supply	110-230 V, 50-60 Hz
Dimensions.....	300 × 300 × 120 mm ³
Weight	Approx. 4 kg
Protection degree	IP65
Operating temperature	0...50 °C, 0...95 % rel. humidity
Storage temperature	-20... - 60° C, 0...95 % rel. humidity

