



Geopal GP-ELK



Geopal GP-ELK
Detector for
electrochemical sensor

Geopal GP-ELK is a stand-alone detector, a new generation of gas detectors with electrochemical sensors.

The detector continuously monitors the specific level of toxic and harmful gases.

In the GP-ELK the sensor signal is converted to a 4-20 mA output signal adjusted to the current measurement range and compatible with external control equipment, DDC/PLC control systems, automation systems, etc.

The analog signal from the detector is linear over the range.

Optionally, the Geopal GP-ELK is available in a version equipped with relays for low alarm, high alarm and fault.

On delivery the detector will be calibrated as agreed upon and no further service is required except for regular test with a test gas.

Examples of gasses and proposal of detection ranges:

H ₂ O ₂	Hydrogen peroxide	0-5 ppm
H ₂ S	Hydrogen sulphide	0-20 ppm
HCL	Hydrochloric acid	0-20 ppm
C ₂ H ₄	Ethylene	0-10 ppm
CH ₂ O	Formaldehyde	0-10 ppm
C ₂ H ₄ O	Ethylene oxide	0-5 ppm
Cl ₂	Chlorine	0-5 ppm
CO	Carbon Monoxide	0-300 ppm
NH ₃	Ammonia	0-200 ppm
NO _x	Nitrogen oxides	0-20 ppm
O ₃	Ozone	0-5 ppm
PH ₃	Phosphine	0-5 ppm
O ₂	Oxygen	0-30 Vol.-%

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DIC444QMS



DBI reg.no. 233.301



SP14ATEX7159

Technical Data

GP-ELK

Supply voltage	10 to 32 V AC/DC
Power consumption	6 W max.
Response time T90	< 60 seconds, depending on gas type
Repeatability	+/- 2 %
Long-term stability	< 5 % FS/12 months
Self-diagnostics	Continuous
Detector with analog signal	2 wire 4-20 mA, max. load 600 Ω
Detector with analog output and relay outputs	4-20mA / (2mA fault), 1-5V / (0,5V fault), 2-10V / (1V fault), 0-5V, 0-10V
Fault relays	2 relays outputs for alarm 1 and alarm 2 1 relays output for fault Signal contact 30V/1A
Material housing	Polycarbonate, black
IP rating	IP 65 DIN 60529
Weight	0,3 kg
Dimensions	150 x 80 x 60 mm
Max. operating conditions	Temperature -20 °C to +50 °C Humidity 0 %RH to 100 %RH non-condensing Pressure 1013 mbar \pm 10%
Detector with built in heater (<i>option</i>)	Temperature -40 °C to + 55 °C
Storage	Temperature -25 °C to +50 °C Humidity 0 %RH to 95 %RH
Approvals (<i>Directives and Standards</i>)	Electromagnetic Compatibility Directive (EMC) 2014/30/EU Low Voltage Directive 2014/35/EC EN 60 204-1; EN 61 010-1; EN 61 326-1 (2013); EN 61 000-6-2 (2005); EN 61 000-6-3 (2012); EN 50 270 (2015)
Quality	ISO 9001:2015