AIR OXYGEN MEASURING DEVICE

ISO
ALARM
AUTOOFF
HOLD
MIN MAX

WIDE RANGE OF APPLICATION

HIGHLIGHTS:

- Alarm detector with integrated horn
- Automatic compensation of ambient air via integrated barometer

ADDITIONAL FUNCTIONS GMH 3695:

- pressure connection

LOGG

SUITABLE SENSORS SEE PAGE 77

THE DEVICE IS ONLY INTENDED FOR CONTROL. IT IS NOT A REPLACEMENT FOR A MONITORING DEVICE SUBJECT TO AUTHORISATION!

GMH 3692

Art. no. 605919

Air oxygen measuring device w/o sensor

GMH 3695

Art. no. 605921

Air oxygen measuring device w/o sensor with data logger

Application:

Bio chemistry:
Oxygen monitoring in breeding chambers for cell cultures. Monitoring of fermenting process of fruits in fermentation plants etc.

Medicine:
Monitoring of oxygen concentration in respirators; checking of breathing, monitoring of oxygen concentration in incubators, oxygen tents etc.

Food technology:
Monitoring of residual oxygen in packages (e.g. coffee, tea, etc.).
Monitoring of oxygen content during production processes.

Air conditioning and ventilation technology:
Oxygen measurements, air quality monitoring, measuring of oxygen concentration in enclosed air conditioning systems, etc.

Sport:
Checking of oxygen content in compressed air bottles (diving, etc.).

Note:
not suited for „under water"-applications (rebreather, etc.)

Specifications:

Measuring ranges	
Oxygen concentration:	0.0 ... 100.0 % O_2 (gaseous) 0 ... 1100 hPa O_2
Temperature:	-5.0 ... +50.0 °C
Air pressure:	GMH 3692: 10 ... 1200 hPa GMH 3695: 300 ... 5000 hPa
Accuracy: (device) (at nominal temperature = 25 °C)	
Oxygen concentration:	±0.1 % ±1 digit
Temperature:	±0.1 °C ±1 digit
Air pressure:	±3 hPa or 0.1 % v. m.w. (whichever is higher)
Oxygen sensor:	for suitable sensores p.r.t. page 77 Observe permissible operating pressure of oxygen sensor e.g. GOEL 370/381: 500 ... 2000 hPa abs.
Sensor connection:	6-pin screened Mini-DIN-socket. GMH 3695: additional pressure ports
Display:	two 4 digit LCDs (12.4 mm or 7 mm high), as well as additional arrows.
Pushbuttons:	6 membrane keys for ON/OFF-switch, selection of meas. range, min- and max- value memory, hold-function, calibration etc.
Working temperature:	0 ... +50 °C
Relative humidity:	0 ... +95 % RH (non condensing)
Storage temperature:	-20 ... +70 °C
Interface:	serial interface, direct connection to RS232 or USB interface of a PC via electrically isolated interface converter GRS 3100 or GRS 3105 resp. USB 3100 N (p.r.t. accessories).
Power supply:	9 V battery as well as additional d.c. connector for external 10.5 ... 12 V direct voltage supply. (suitable power supply: GNG10/3000)
Battery life:	approx. 300 h
Housing:	Impact-resistant ABS plastic housing, membrane keyboard, transparent panel, integrated pop-up clip
Dimensions:	142 x 71 x 26 mm (H x W x D)
Weight:	approx. 160 g (incl. battery)
Scope of supply:	Device, battery, calibration protocol, manual

Additional functions:

Temperature compensation: automatic via temperature sensor, integrated in probe housing

Air pressure compensation: The O_2 concentration will be compensated according to the absolute atmospheric pressure set.

Calibration:
1-point calibration: extremely simple quick calibration in atmospheric air. (press button to compensate unit to 20.9 %).
2-/3-point calibration: first point at atmospheric air (20.9 %), second and third point 0 or 100 %.
Calibration interval: The device asks for a recalibration after a selectable time period (1 ... 365 days or inactive). GMH 3695: additional calibration history

Analog output (GMH 3695 only): 0 ... 1 V, freely scalable

Pressure nozzles (GMH 3695 only): for pressure compensation

Data logger (GMH 3695 only):
cyclic: 8000 data sets, adjustable cycle time: 1 s ... 60 min
manual: 1000 data sets, with measuring point input

Accessories and spare parts:

Suitable sensors p.r.t. next page

GKK 3000
Art. no. 601048
Case (275 x 229 x 83 mm) with punched lining suitable for GMH3xxx

USB 3100 N
Art. no. 601092
Interface converter, electrical isolated

GRS 3105
Art. no. 601099
Interface converter with 5 connection points, electrical isolated, for the connection of 5 devices to one PC (RS232).

GSOFT 3050
Art. no. 601336
Windows software for GMH 3000 and GMH 5000 handheld measuring devices with logger function

ST-R1
Art. no. 601066
Device protection bag with cut-out for probe connection