



Control panel for gas and fire monitoring

Gasmaster

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Gasmaster is the flexible and simple-to-use solution wherever you need a self-contained control panel to monitor gas or fire hazards.

It combines extensive features and outstanding performance to suit all applications. Gasmaster provides the information you need at a glance via the comprehensive display, and all adjustments can be performed using the buttons on the front panel. Gasmaster can operate 'stand-alone' or interface with any alarm devices and control systems using a selection of outputs.

In short, Gasmaster is the flexible control panel you can trust.

Simple and convenient

Gasmaster has been designed for easy operation. **All gas levels are displayed simultaneously** to enable full system status checks at a glance.

All functions from day-to-day operation to re-calibration can be carried out from the front panel, so routine testing can be performed in a moment.

Gasmaster PC software enables re-configuration and event log upload in an instant.

Installation and maintenance is also extremely simple. Ample space is provided for cable glands and termination of wiring. **Gasmaster warns when calibration is due**, and all inputs and outputs can be quickly tested using a simple button press.

Safe and reliable

There are **two levels of alarm per channel** as well as common alarm and fault relays, which can be configured to suit site requirements. An **integral 85dB multi-tone sounder** is fitted as standard.

Relays can operate in 'fail-safe' mode, and all coils are actively monitored so Gasmaster can warn if a relay fails.

Battery back-up is provided as standard to ensure continued protection even if the power fails.

Alarms and faults are recorded in an 'event log' which can be accessed regularly to assess risks on site.

Flexible input and output options

Gasmaster can monitor and control virtually any combination of gas or fire detectors, and offers an array of outputs as standard to enable simple integration with any control equipment with minimum wiring.

Gasmaster provides **relays, drives for audible/visual alarms, 4-20mA or 1-5V outputs and RS-485 Modbus communications** for comprehensive monitoring and control.

For convenience, Gasmaster has a **remote inhibit** and **remote reset** facility to enable control from any point on your site.

Level 1 alarms can be set to operate 'silently' so that ventilation fans can be controlled without raising alarms.

Adaptable to your needs

The **LCD display can be set to read in many languages**, and provides detailed descriptions of alarms and detector locations as well as system status.

Gasmaster is available in two versions to address the needs of virtually any application:

Gasmaster 1: for one gas detector, fire zone or Environmental Sampling Unit (contact Crowcon for details)

Gasmaster 4: for one to four gas detectors, fire zones or Environmental Sampling Units (contact Crowcon for details)

Gasmaster 4

Ultra-bright alarm indicator bar

System status LED's

Alpha-numeric scrolling display which shows comprehensive system information

Large clear display which shows all gas levels simultaneously

Switches for all system operation and maintenance functions

AC/DC power options plus internal battery back-up.

Relays for low and high alarm for each channel, plus common alarm and fault

4-20mA or 1-5V outputs per channel

Event logging¹

RS-485 Modbus communications



Industry-standard gas detectors



Remote inhibit and reset switches



Dedicated audible/visual alarm drives



Up to 20 fire/heat detectors per zone



Sampling Device control for Crowcon's Environmental Sampling Unit

Gasmaster Accessories



Accessory Enclosure allows connection of mV Bridge type flammable gas detectors.



Auxiliary Power Unit provides extended back-up in the event of mains power failure.

¹ Event log access requires optional Communications Kit



Gasmaster 1

Gasmaster 4

Size	288h x 278w x 110d (mm)	288h x 278w x 110d (mm)
Weight	4.5Kg	4.5Kg
Enclosure material	Back-box: steel Front cover: fire-retardant ABS plastic	Back-box: steel Front cover: fire-retardant ABS plastic
Ingress protection	IP54, IP66 optional	IP54, IP66 optional
Power	90-264Vac 50-60Hz or 20-30Vdc, 65W max.	90-264Vac 50-60Hz or 20-30Vdc, 65W max
Battery back-up	1.2Ah batteries fitted internally	1.2Ah batteries fitted internally
Operating temperature	-10°C to +50°C (14 to 122°F)	-10°C to +50°C (14 to 122°F)
Humidity	0 to 95% RH non-condensing	0 to 95% RH non-condensing
Inputs: Gas	One 2 or 3 wire 4-20mA gas detector (sink or source). Adaptor for mV bridge type detectors available.	One to four 2 or 3 wire 4-20mA gas detectors (sink or source). Adaptor for mV bridge type detectors available.
Fire	One loop of up to 20 conventional smoke/heat detectors or manual call points, or one flame detector (4-20mA or digital contact signal)	One to four loops of up to 20 conventional smoke/heat detectors or manual call points, or one to four flame detectors (4-20mA or digital contact signal)
Environmental Sampling Unit	For use with one Crowcon ESU sampling device	For use with one to four Crowcon ESU sampling devices
Remote inhibit	Via normally open contact	Via normally open contact
Remote reset	Via normally open contact	Via normally open contact
Outputs: Relays DPCO contacts rated 250Vac 8A (non-inductive load). Relays can be set as energised or de-energised, latching or non-latching, latching acceptable	Low alarm. High alarm. Fault. Alarm relays can be set for rising or falling alarms. Hysteresis can be adjusted on low alarms	Low alarm and High alarm per channel plus Common Low, High and Fault. Alarm relays can be set for rising or falling alarms. Hysteresis can be adjusted on low alarms
Audible/visual alarm drive	24Vdc 650mA max. drive (typically 2 devices max.)	24Vdc 650mA max. drive (typically 2 devices max.)
Analogue	4-20mA (current source, max. loop resistance 700Ω) or 1-5Vdc (min. load 50 KΩ)	4-20mA for each channel (current source, max. loop resistance 700Ω) or 1-5Vdc (min. load 50 KΩ)
Digital communications	RS-485 Modbus RTU for monitoring and control via DCS/SCADA/PLC systems	RS-485 Modbus RTU for monitoring and control via DCS/SCADA/PLC systems.
Communications port ¹	For PC configuration and event log upload	For PC configuration and event log upload
Event logging ¹	Time-stamped log of up to 300 alarm, fault or system intervention activities	Time-stamped log of up to 300 alarm, fault or system intervention activities
Panel indication	LCD back-lit display shows gas level (in ppb, ppm, % volume or % lel units), and scrolling alpha-numeric status indication. LED's for Alarm, Fault, Power and Warning. Integral 85dB sounder	LCD back-lit display shows gas level (in ppb, ppm, % volume or % lel units) for all channels, and scrolling alpha-numeric status indication. LED's for Alarm, Fault, Power and Warning. Integral 85dB sounder
Approvals	EN 50270 (EMC) EN 61010-1 (Low voltage directive) Marine Equipment Directive (96/98/EC) for oxygen monitoring	EN 50270 (EMC) EN 61010-1 (Low voltage directive) Marine Equipment Directive (96/98/EC) for oxygen monitoring

¹Event log access requires optional Communications Kit and communications port