



## Features

- Up to 100-day battery life
- 360° diffusion gas detection
- Optional four-channel pump module
- Internal 3G/4G wireless works in 100+ countries
- Optional Iridium global satellite module
- Call for help using the SOS latch
- Works seamlessly with Blackline Live cloud-hosted software
- Communicates all data to the Blackline Safety Cloud — no need to collect data from the field
- Blackline Live automates configuration changes, plus firmware updates automatically
- Leverages the same plug-and-play gas sensor cartridges as G7
- Blackline Analytics automates compliance reporting
- Internal GPS and beacon location technology
- Manage G7 EXO area monitors in Blackline Live alongside G7 personal monitors

# G7 EXO

## MOVE YOUR AREA MONITORING PROGRAM INTO THE CLOUD

Until now, conventional area monitors have suffered short battery life, limited configurability and complicated or inadequate connectivity while also being challenging to configure into a seamless network.

G7 EXO is intelligence and versatility wrapped into one game-changing solution. Inside rugged aluminum casing, EXO boasts industry-leading battery life of over 100 days and features a large, full-color display for easy visibility in any condition.

4G cellular connectivity is built-in, with the option to add a satellite module. All you have to do is turn G7 EXO on and it goes to work streaming environmental data to the Blackline Safety Cloud. Advanced analytics capabilities summarize data so you can address safety hazards or facility risks before they become a problem.

Unlike mesh networks, EXO does not require any network configuration — at all. Since each G7 EXO connect directly to the cloud, there's no need for smartphones, Wi-Fi or radio links to connect personnel and area monitors to a central network. This also means there is no limit to the number of devices that can connect to one another on a network.

Area monitoring has never been more straightforward or considerate of your needs.

# SPECIFICATIONS

## Gas cartridge features

High Gas Alert, Low Gas Warning  
Under limit, Over limit  
Time-weighted average (TWA)  
Short-term exposure limit (STEL)  
High gas alert, Low gas alert  
Bump test and calibration notification  
Bump test and calibration failure

## Safety features

**SOS latch:** Pull latch to trigger SOS alert  
**Low-battery:** Configurable threshold  
**Connection lost:** Configurable threshold  
**Two-way voice calls:** Receive voice calls from monitoring personnel  
**Text messages:** Send and receive messages with monitoring personnel

## Convenience features

**Set-up Wizard**  
**Connection lost alarm:** Configurable time period  
**Siren volume setting:** Three levels available  
**Text messaging:** Custom messages and 10 pre-configured  
**Maintenance code:** Configurable 4 digits  
**Push to Talk Communication**

## User interface

**Display:** 4.4 inch diagonal, 480 by 640 pixel, eight-color active matrix liquid crystal display  
**Menu system:** driven by three-button keypad  
**Power button:** On/off  
**SOS latch:** Send SOS alert  
**Multi-language support:** (EN, FR, ES, DE, IT, NL, PT)

## User notification

**Green connectivity light:** Blinking (powered), continuous (connected)  
**360° visible yellow and red lights**  
**Yellow light:** pending and warning alarms  
**Red light:** Red alerts  
**Blue LiveResponse light:** Confirmation that a monitoring team has acknowledged the alert  
**Siren sound:** High-volume alarm siren. Optional siren accessory available through interface ports.

## Four-channel pump module\*\*\*

**Optional module:** Yes  
**Number of pump channels:** 4  
**Sampling period per channel:** Adjustable  
**Tubing length per channel:** Up to 100 ft (30 m)

## Interface ports

Intrinsically safe, configurable external signal ports designed to integrate with external alarms and electrical systems.

## Power & battery

**Rechargeable battery capacity:** 144 Ah (LiFePO<sub>4</sub>)  
**Battery life in diffusion mode:**  
100 days at 20°C (68°F), LEL-IR, H<sub>2</sub>S, CO and O<sub>2</sub> config.  
**Battery life in pump mode:**  
30 days at 20°C (68°F)  
**Charge time:** 8-12 hrs  
**Charge temp.:** 0°C to 45°C (32°F to 113°F)

## IS trickle charge port

Can be used to hard-wire an IS power supply to run EXO indefinitely.

## Size & weight

**Size:** 385 mm x 188 mm x 220 mm (15.1" x 7.4" x 8.7")  
**Weight:** 12.25kg/27 lbs  
**Material:** Rugged housing built from cast aluminum, plastic and rubberized bumpers

## Cellular wireless radio

**Wireless coverage:** 100 countries, 200 wireless carriers  
**North America:** 3G/4G radio; 3G UMTS bands 2 and 5; 4G bands 2, 4 and 5  
**International:** 2G/4G radio; 2G GSM bands E-GSM and PCS; 4G bands 3, 7 and 20  
**Asia Pacific:** 3G/4G radio; 3G UMTS band 1; 4G bands 3, 8 and 28  
**Antenna:** Internal

## Satellite module

**User-upgradeable add-on:** User-upgradeable satellite module allows EXO to connect to the Iridium satellite network for remote areas outside of cellular connectivity.  
**Network:** Iridium, global coverage  
**Radio:** 1621 MHz, 2 Watts  
**Antenna:** Internal

## Wireless updates

**Device configuration changes:** Yes  
**Device firmware upgrade OTA:** Yes

## Location technology

**Multi-constellation:** GPS/QZSS, Galileo, Beidou  
**Receiver type:** 72-channel  
**Assisted-GNSS:** Yes  
**GNSS Accuracy:** 5m (16feet), CEP 50%, 24 hours static

## Environmental

**Storage temp.:** -40°C to 60°C (-40°F to 140°F)  
**Operating temp.:** -20°C to 50°C (-4°F to 122°F)  
**Ingress protection:** Designed to meet IP65

## Approvals

RoHS, CE, RCM  
**Canada & USA:** Class I Division 1 Group A,B,C,D T3; Class I Zone 0 AEx ia IIC T3; Ex ia IIC T3 Ga  
**IECEX:** Ex ia IIC T3 Ga  
**ATEX:** Ex ia IIC T3 Ga

**LEL:** CSA C22.2 No.152; ISA 12.13.01

**FCC ID:** W77EXO

**IC:** 8255A-EXO

**Contains:** FCC ID: XPY1EIQ24NN, Q639603N

**IC:** 8585A-1EIQ24NN, 4629A-9603N

## Blackline Live web application

Cloud-hosted safety monitoring web application is highly customizable for every customer requirement. Includes live map, employee address book, user roles, alert management, device configurations, alert setups and reporting.

## Accessories

IS solar panel, IS trickle charger, low tripod and tall survey tripod, universal mount, carrying case

## Warranty

Three-year hardware warranty  
Extended warranty available

## Gas sensors

Gas	Sensor type	Sensor model	Range	Resolution
Ammonia (NH <sub>3</sub> )	Electrochemical	Citytech, Sensoric NH3 3E 100 SE	0-100 ppm	0.1 ppm
High-range ammonia (NH <sub>3</sub> )	Electrochemical	Sensoric NH3 E3 500 SE	0-500 ppm	1 ppm
Carbon monoxide (CO)	Electrochemical	Citytech, 4CF+	0-500 ppm	1 ppm
High-range carbon monoxide (CO)	Electrochemical	Citytech 4CM	0-2000 ppm	5 ppm
Hydrogen resistant carbon monoxide (CO-H)	Electrochemical	Citytech 2CF3	0-500 ppm	1 ppm
Carbon dioxide (CO <sub>2</sub> )	NDIR	Gas Sensing Solutions, ExplorIR-M	0-50,000 ppm	50 ppm
Chlorine (Cl <sub>2</sub> )	Electrochemical	Citytech, Sensoric Cl2 3E 50	0-20 ppm	0.1 ppm
Chlorine dioxide (ClO <sub>2</sub> )	Electrochemical	Sensoric ClO2 3E 1 O	0-2 ppm	0.01 ppm
Carbon monoxide + hydrogen sulfide (COSH)	Electrochemical	Citytech, 4COSH Dual Gas CO/H <sub>2</sub> S Sensor	0-500 ppm CO, 0-100 ppm H <sub>2</sub> S	1 ppm CO, 0.1 ppm H <sub>2</sub> S
Hydrogen cyanide (HCN)	Electrochemical	Sensoric HCN 3E 30 F	0-30 ppm	0.1 ppm
Hydrogen sulfide (H <sub>2</sub> S)	Electrochemical	City Technology, 4HS+ Hydrogen Sulfide CiTiceL	0-100 ppm	0.1 ppm
High-range hydrogen sulfide (H <sub>2</sub> S)	Electrochemical	City Technology, 4HS+ Hydrogen Sulfide CiTiceL	0-500 ppm	0.5 ppm
LEL-MPS (LEL-M)	Molecular property spectrometer	NevadaNano LEL-MPS	0-100% LEL	0.1% LEL
Nitrogen dioxide (NO <sub>2</sub> )	Electrochemical	City Technology, 4ND	0-50 ppm	0.1 ppm
Oxygen (O <sub>2</sub> )	Pumped electrochemical	City Technology, 4OxLL Longlife Oxygen CiTiceL	0-25% vol	0.1% vol
Photoionization (PID) ppm	PID	Ion Science, MiniPID 2	0-4,000 ppm	Dynamic resolution**
Sulfur dioxide (SO <sub>2</sub> )	Electrochemical	City Technology, 4S Rev. 2 Sulfur Dioxide CiTiceL	0-100 ppm	0.1 ppm