GENESIS INTERNATIONAL, INC.
SHERLOCK™
PAC 7000 (CO$_2$) & (NH$_3$) SENSOR

CO2 PART NUMBER 87-0163
NH3 PART NUMBER 87-0161

Small and robust, ergonomic and intuitive, economic and powerful – the Pac 7000 is tailor-made for personal monitoring at the workplace. This innovative singlegas detector is equipped with a wide range of functions and is suitable for many different applications in day-to-day industrial settings. The detector is an impressive instrument, offering a high level of reliability and rapid warning against harmful concentrations of CO, H2S, O2, NH3, CL2, SO2, PH3, NO2, HCN and CO2.

TECHNICAL DATA

DIMENSIONS   2.5HW x 3.3W x 1.0D (64 x 84 x 25) Inches (mm)

WEIGHT   3.8 oz. (120 g)

AMBIENT CONDITIONS TEMPERATURE
-20 – 120 °F (-30 – 50 °C)

PRESSURE   700 – 1300 hPa

HUMIDITY   10 – 90 % r. h.

INGRESS PROTECTION   IP65

DISPLAY   Display Language-free LCD concentration display, continuous indication of concentration, indication of concentration during alarm, peak concentration, TWA- and STEL- concentration, operating time, notice and warning functions

OPERATING TIME   2 years (typical at 25 °C)

BATTERY LIFE   (typical at 25 °C, 24 hours per day, 1 minute alarm per day)
CO, H2S, others   > 5,500 hours
O2   > 2,700 hours

AUDIBLE ALARM   Two-Tone-Alarm, typical > 90 dB(A), at a distance of 30 cm

VISUAL ALARM   Two high-intensity LED's

TACTILE ALARM   Powerful internal vibration

DATA LOGGER   Storage of concentration and events with date and time

PAC 7000 AT A GLANCE
• Gas inflow from top and front
• Unlimited instrument life
• Easy sensor replacement
• Simple display (language independent)
• Continuous concentration display
• Dual visual alarms
• Audible alarm
• Vibration alarm
• Two adjustable concentration alarm thresholds
• Adjustable TWA alarm
• Adjustable STEL alarm
• Display of peak, TWA, STEL concentrations on demand
• Battery pre- and main alarm
• Adjustable operating time with pre- and main alarm
• Adjustable bump test interval
• Adjustable bump test mode
• Password-protected menu for fresh air & span calibration
• IR interface for PC link
• Individual instrument configuration
• Easily replaceable battery
• Datalogger standard

APPROVALS
CE-Sign   (89/336/EEC, 94/9/EC)
ATEX   I 1 G EEx ia IIC, T4
   I M 1 EEx ia I, T4
UL   Class I, II Div 1, Group A, B, C, D, E, F, G, Temp. Code T4
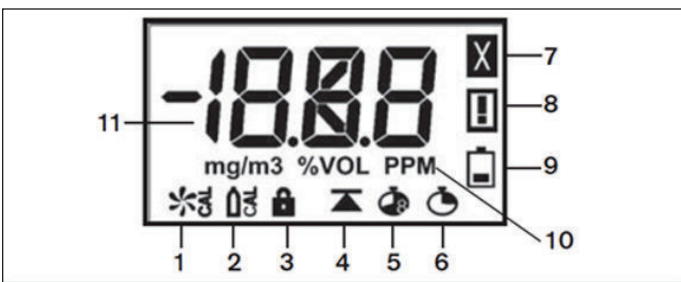cUL   Class I, II Div 1, Group A, B, C, D, E, F, G, Temp. Code T4
IECEx   EEx ia IIC, T4
MSHA   Permissable Gas Monitor

PAC 7000 NH3   05-02-12

1	Alarm LED	6	Gas Opening
2	Horn	7	Screw
3	Concentration Display	8	Clip
4	[OK] Key On/Off/Alarm Acknowledge	9	Label
5	[+] Key Off/Bump Test	10	IR Interface

1	Fresh Air Calibration Icon	7	Error Icon
2	Span Calibration Icon	8	Bump Test Icon
3	Password Icon	9	Low Battery Icon
4	Peak Concentration Icon	10	Selected measuring unit
5	TWA Icon	11	Concentration display
6	STEL Icon		

SMALL AND RUGGED

With its handy, pocket-sized design, Pac 7000 is tailor-made for personal monitoring in daily work activities. The rubber over molded case provides great protection from drops and jolts and is resistant to corrosive chemicals. Pac 7000 is dust proof and water resistant, meeting the requirements of IP 65. The unit is very resistant to interference from radio signals and other electronic noise. A strong, tough, stainless steel crocodile clip allows the instrument to be fastened securely anywhere. The clip can be rotated to the best position for user comfort. The dual alarm LED's are positioned on opposite corners of the instrument for assured visibility. Battery and sensor replacement are easy and ensure a long instrument life.

DATA LOGGER

Dräger Pac 7000 features a data logger which stores all concentrations and events along with their respective dates and times at intervals selected by the user. If a one-minute interval is set, the data logger has a capacity of five days. The stored data can be downloaded via a PC and Dräger GasVision®, PacVision® or Dräger CCVision software and viewed using Microsoft® EXCEL® software or Dräger GasVision® software.

NEW SENSOR TECHNOLOGY

Pac 7000 boasts the latest in sensor technology, combining smaller size with high performance. Response time is very fast due to the short diffusion paths and the extremely quick electrochemical reaction times of these new sensors. The sensor is mounted in the unit so gas can enter from both the top and the front of the monitor. This positioning minimizes the possibility of the gas inlet being accidentally covered.

DISPLAY

The concentration is displayed continuously in large, easy to read numbers. The display uses no written text (language independent), showing all information in the form of large numerals or symbols. During an alarm, or on the push of a button, the display is backlit for better readability. Distinct icons are used to give status information and provide details on instrument functions. In addition, the peak concentration, time weighted average concentration (8-hour TWA value) and short-term exposure limit (15-minute STEL) for the measurement period are readily accessed.

ALARM/WARNING FUNCTIONS

Along with the strong internal vibrating alarm, attention getting visual and audible alarms are triggered if the user adjustable alarm thresholds are exceeded. A two-tone audible alarm is used to maximize notification. The Pac 7000 features adjustable TWA and STEL alarms as well. A warning is also given near the end of the battery life or in the event of an error

BUMP TEST MODE

Personnel safety is always first priority. Their safety depends on measurement and warning equipment functioning properly. Bump Testing (or Verification of Calibration) is the recommended and often mandated method for regular testing of gas detection instruments.

Pac 7000 is equipped with an optional bump test mode, which can be user activated by a PC. If a bump test is required at a user selected interval, a notice icon appears on the screen. The unit must pass the bump test using a known gas concentration before it can be used. If the unit fails the bump test, the display indicates this fact. The result of the bump test is saved in the instrument's memory and can be downloaded later to a PC for central documentation. The Bump Test Station is available for fast, easy performance of the bump test.

CALIBRATION AND CONFIGURATION

The bump test mode, fresh air calibration and span calibration can be accessed via the keypad. Access to fresh air and span calibration can be password-protected. The instrument is equipped with an IR interface and can be linked to a PC via the connecting cradle or E-Cal system. Dräger PacVision or CCVision® software installed on the PC enables automated documentation of instrument configuration, testing and calibration as well as download of any stored data. This allows you to manage the maintenance and logistics functions of your gas monitoring fleet. In addition, a timer can be set (in days) to prompt a calibration interval, inspection interval or set the instrument operating time.