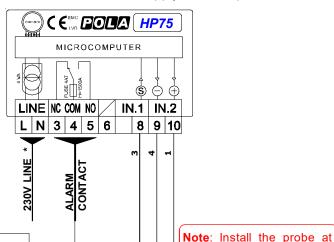
#### INSTALLATION

#### How to connect the line

Connect 230V power line on terminals L-N. Protect supply with adequate fuse.



#### **Alarm contact:**

- **3-4** are open for intervention alarm or for black-out
- **4-5** are closed for intervention alarm or for black-out



### Connection with CO2E probe

To connect the **CO2E** probe and the **HP75** module use three-wire cable 0,5 mm2 section. Max length = 100mt

**Note**: Accuracy of time base is 1%. During the black-out, timing is kept in stand-by. (i.e. in case of 1 hour black out, on next days the recording interval will be 24+1 hours).

\* Also available with 12V power supply.

When using our **HBAT+BA** power kit the unit can stand about 10 hours black-out.

# Warning:

Remove the probe before any washing is done.

Make sure to protect the connector that remains in the environment.

#### CO2E sensor cleaning:

Use a soft fabric impregnated only with water.

Do not put much pressure of the external filter as it could be damaged.

As it company policy to continually improve the products the Manufacturers reserve the right to make any modifications thereto without prior notice. They cannot be held liable for any damage due to malfunction.



the same height as the head

of the animals (make sure

does not come in touch with

them) in order to have an

accurate reading of the

GND CO2 4 3

C<sub>0</sub>2E

probe plug

0 / 10.000ppm CO2

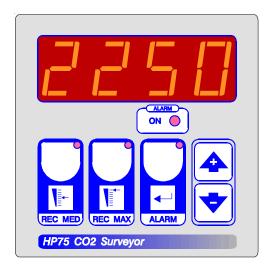
V+

breathed CO2.

# **HP75**

C02 Surveyor

Handbook



**HP75** keeps control on the CO2 ambient value and records the min/max daily value up to 99 days cycle (and hourly values of the last 60 hours).

Afterwards the oldest daily and hourly records are automatically deleted by the new ones. A CO2 alarm value can be set so an output contact is activated.

#### **HOW TO SET THE MAX CO2 LEVEL**



Press **ALARM** (key lamp flashes):

This message will be displayed instead of the °C Set Maximum C02 (ppm).

Press + or - to modify. Press **ALARM** to confirm.

The MAX CO2 value alarm intervention is signalled by the blinking of the **ALARM** led (which keeps on blinking during all the alarm delay time).





#### VIEW MEDIUM/MAXIMUM CO2 DAILY/HOURLY VALUE





Press either the **REC MED** or the **REC MAX** key (key lamp flashes).

Either the average or the maximum CO2 value as recorded in the last 24 hours will be displayed.



Press the - key to select and display one of the previous

days records (max 99). The following message will be displayed.

Press REC MED to display the average CO2 value of the selected day.

Press REC MAX to display the max CO2 value of the selected day.

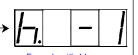


Press the - key to select and display one of the previous hours records (max 60).

The following message will be displayed.

Press **REC MED** to display the average CO2 value of the selected hour.

Press REC MAX to display the max CO2 value of the selected hour.



#### Note:

Daily recordings are stored up to 99 days.

Hourly recordings are stored up to 60 hours;

afterwards the oldest record is automatically deleted by the new one.

# HOW TO ERASE CYCLE RECORDINGS (NEW CYCLE START-UP)



To erase memory keep + key for longer than 3 sec.

Before cleaning the memory a **CLEA** message will be displayed.

#### HOW TO DISPLAY THE DAY OF CYCLE



Press the - key to display the current day (d=) and the current hour (h=) of cycle. (on firts day d = 0).

## **COST PROGRAMMING** (System constants)



These settings refer to the operation mode of the system and must be made on initial startup. Press - / + at the same time for at least one second: the message C.O.S.t. will be displayed.

Press than repeatedly ALARM until the message regarding the chosen variable is displayed (see table below): value of variable and message will be displayed.

Press + or - to set a new value and then press **ALARM** to confirm.

The next system constant will then appear.

You can press ALARM for at least 2 seconds to exit and return to the Run Mode.

Mess.	Value	Meaning	Note
t.ALA	15"	Seconds alarm delay time	*1
Ad.Co	0%	CO2 sensor adjustment (- / + 50%)	
tYPE	=3	Sensor type	*2

\*1) Alarm led is blinking during all the delay alarm time.

\*2) 1= 0...2.000ppm (resolution= 10ppm)

**2**= 0...5.000ppm (resolution= 20ppm)

**3**= 0...10.000ppm (resolution= 50ppm).

#### **MANUAL MODE**



In some start-up conditions may be useful to work in "hand" mode.

Power off the processor, push + key and keep it pressed giving power on:

**HAnd** message will be displayed (release now + key).

Press + (1 is displayed) and press ALARM to activate relay.

You can press **ALARM** key for at least two seconds to escape and return to the Run Mode.

# PRESET PROGRAMS (Bootstrap)



This processor is already programmed with the following (variable) settings. To return to these settings at any time you may:

Power off the processor, press **ALARM** key and keep it pressed giving power on: boot message will be displayed (release now ALARM key).

CO2.A = 3000

**COST** value are shown in **COST** paragraph.