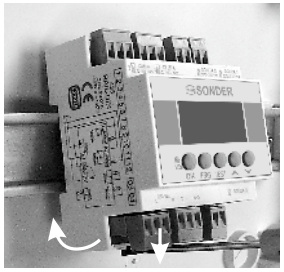
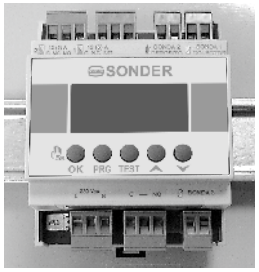
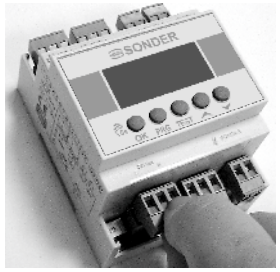
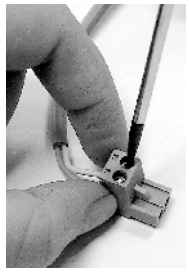
Legionelus 70 Raíl Code: 26.178

Thermostat with high temperature cycle programmer

Installation Instructions

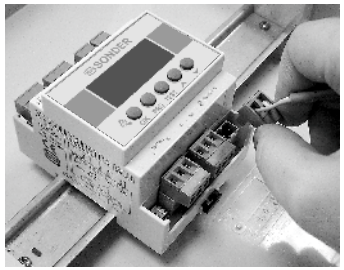
Installation

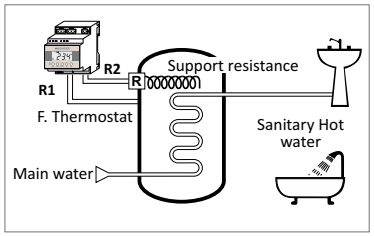
ASSEMBLY NOTE

Before making any electrical connections, ensure that the control is disconnected from the power supply.

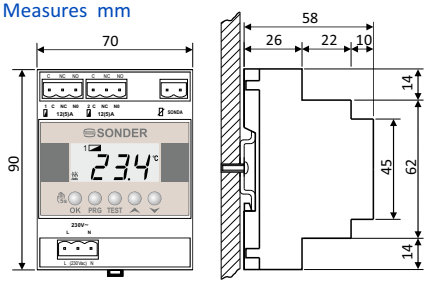
Any manipulation of the control is to be performed only by qualified personnel.



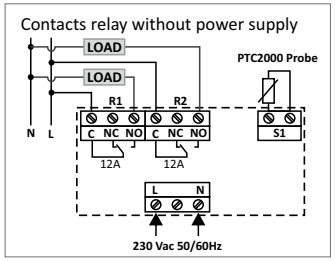
Exemple of aplication



Measures mm



Electrical Drawing



Box IP55

Guarantee Conditions

This appliance has a three-years guarantee limited to replacement of defective parts. Transports not included.

We will not accept any responsibility for damage caused to the appliance by poor handling.

The guarantee does not include:

Appliances with a damaged, effaced or altered series number.

Appliances which have not been connected or used following the instructions that accompany it.

Appliances which have been altered without the prior consent of the manufacturer.

Appliances damaged by blows of liquid spills or gaseous emissions.

For the rest of general conditions visit our web.

VERY IMPORTANT:

Before opening the box, to access the connection, make sure the voltage switch.

This controller is not a safety device, or can be used as such, it is the responsibility incorporate adequate protection to every type of installation (**homologated**) installer.

The probe cable must be as far away as possible from other electrical conductors. If need lengthen, it is to be done by welding and shrink to keep reading value and isolate from moisture.

Independent control device mounting, and connection via fixed pipeline.

Reserved the right of modify without prior notice.

Sonder Regulación, S.A.

Avda. La Llana, 93

08191 RUBÍ

(Barcelona) Spain

www.sonder.es

Cód: 5161V1 - ING - NOV21

Legionelus 70 Raíl Code: 26.178

Thermostat with high temperature cycle programmer

Use Instructions

Description

The Legionelus 70 has two functions: Thermostat and High temperature cycles for hygiene.

1 - The thermostat function is defined by the set point temperature and the **diF** parameter. Connect the relay 1 when the temperature of probe 1 is below the set point minus the value of **diF** and disconnect the relay when it reaches the set point temperature plus the value of **diF**.

2 - The Hygiene function is carried out by means of a high temperature cycle that activates relays 1 and 2 until it reaches the temperature marked in **HAL**, and stops them when it reaches it. The internal clock allows you to define the start of the cycle, the temperature to be reached, how often the cycle has to repeat and its duration.

When the device is connected to the mains supply for the first time, it indicates "---", "LG" "---" and then alternates **SET** and temperature. You have to enter programming to configure the internal clock (**Hor**, **Min** and **dAY**). This data is only erased from the memory when the power is off for two weeks in a row or a reset is made.

Hygiene function can be performed in manual mode or in automatic mode (**Mod** parameter).

In **automatic mode** the high temperature cycles are defined by the parameters **Hoi**, **Mii**, **dAi**, **rEP**, **dEt** and **HAL**. Pressing OK can perform a high temperature cycle in manual mode without affecting the next cycle programmed in automatic mode.

In **manual mode**, the **Hoi**, **Mii**, **dAi** parameters are annulled, so whenever you want to perform a high temperature cycle you have to force it by pressing the key OK.

Enter in menu of parameters programming

1 - Press **PRG** during the time defined in the parameter **tPP** (of factory 5 seconds) & "**Hor**" appear in the screen, whenever **PIN** sets "**0**" otherwise enter the value to access the parameter programming.

2 - Press ▲ or ▼ to select the parameter you want to change.

3 - Pressing OK their current value will appear blinking.

4 - While value is blinking, press ▲ or ▼ to change the desired value. Press OK to store it in memory. The designation of the parameter being programmed reappears.

5 - Press ▲ ▼ to scroll forward to the next parameter. Repeat number 3 and 4.

6 - Press **PRG** to exit the parameters **LG** & "---" appears and then the current temperature detected by the sensor. After 1 minute without pressing any key, the thermostat leaves programming of parameters.

Parameters...Description	Factory settings	Scale
- ... Setpoint temperature	40	10 to 95°C
Hor... Internal clock hour	0	0 to 23 H
Min... Internal clock minute	0	0 to 59 min
dAY... Internal clock day of week	1	1 to 7
Hoi... Start hour of the cycle	2	0 to 23 H
Mii... Start minute of the cycle	0	0 to 59 min
dAi... Start day of week of the cycle	1	1 to 7
rEP... Nr of days between cycles	7	1 to 25
dEt... Cycle duration at temp. elevated	5	5 to 120 min
HAL... Cycle temperature	70	50 to 90°C
Mod... Operating mode	AuT	AuT / Man
diF... Temperature differential (Hysteresis)	1.0	0.3 to 9.0°C
HSE... High set point	95	10 to 95
LSE... Low set point	10	10 to 95
doF... Minimum time for off	0	0 to 15
CAL... Sensor calibration	0.0	-9.0 to 9.0
tPP... Time to access to prog. parameters	5	3 to 40 sec.
PIN... Parameter acces code	0(deactivated)	0 to 99

Setpoint temperature for the thermostat function

1 - The display will show the temperature detected by the sensor. Press ▲ or ▼ and the set point temperature value appears blinking.

2 - To change the set point press ▲ ▼ while blinking, to increase or decrease the desired temperature. The temperature is memorized after 3 seconds of not playing the keys.

On screen display

ELG **Error during the high temperature cycle:** if after 5 hours the desired temperature for High temperature cycle is not reached (parameter **HAL**), the display will flash **ELG** and the device will exit the Cycle, this message will only disappear if in the next cycle the temperature is reached (**HAL**).

Relay display: fixed symbol on the screen indicates that the relay is running. Blinking indicates that the relay is waiting for the time of the **doF** parameter to activate.

High Temperature Cycle: fixed icon of second relay, indicates that the appliance has started the high temperature cycle (determined in the parameters **HAL** and **dEt**).

MAn **Manual Mode:** Means that the operation of the high temperature cycle is in manual mode and is displayed alternating with the temperature detected by the probe. In this mode the parameters **Hoi**, **Mii**, **dAi** and **rEP** are annulled.

MAF **Forced Manual Cycle:** Press the **OK** button for 5 seconds to enter the forced high temperature cycle. If the appliance is operating in automatic mode, this action does not interfere with the programming of the next high temperature cycle.
To exit, press the **OK** button for 5 seconds, release the button and press the **OK** button again for 5 seconds.

ES "**ES**" Probe Error: Probe is disconnected or its wires are cut.

AL "**AL**" The room temperature is beyond the limits marked by the **HSE** & **LSE** parameters. the screen shows in alternating mode **AL** & temperature detected by the probe

Reset settings to factory defaults

- Disconnect the control power and reconnect, wait until see on the screen the temperature reading.
- Press **OK** until see on the display "---" (approx. 40 seconds).
- The settings return to the factory settings if you has the password disabled ("**-0-**").

Technical specifications

Power supply: ..... **230Vac +10%, -15% 50/60Hz.**

Breaking power (potentials free contacts): ..... **12(5)A 250V~.**

Probe (cables without polarity): ..... **PTC2000 IP65, -40°C to +140°C.**

Temperature scale for the thermostat function: ..... **+10°C to +95°C.**

Temperature scale for the cycle function: ..... **+50°C to +90°C.**

Maximum cable section to connect: ..... **1,5mm².**

Resolution: ..... **0,1°C.**

Environment: ..... Tmin. **0°C**, Tmax. **45°C**, %H.R. **20 ... 85%.**

Storage temperature: ..... **maximum 50°C.**

Protection degree: ..... **IP20.**

Pollution degree: ..... **2.**

Action type according EN 60730: ..... **1.B.**