

HS 2.2 universal controller

HS 2.2 is a universal controller is made for pressure, differential pressure, temperature or humidity control.

Input 0...10 Vdc correspond 0...100 %. Display is possible to scale with following units Pa, kPa, °C, bar, m/s, lux, CO2 and CO.

Actuator types are thermic actuator, 3-point actuator or 0...10 V control signal.



Model types	Model	Description
	HS 2.2	Universal controller
Technical Data	Power supply	24Vac/dc (20...28V) , <1VA NOTE! If using DC-voltage only 0..10V outputs are operational
	Inputs	1 x Analog 0...10 V, 10 kOhm
	Outputs	1 x Potential free. Keyboard locked if DI=GND
		1 x 0..10 Vdc, 2 mA
		1 x 0/10 Vdc, balance error.
		1 x 24 Vac Triacs, 1A max. (3-point / thermic)
	Display	LCD Display
	Buttons	4 touch sensitive buttons
	Wiring Terminals	1.5 mm ²
	Operating conditions	0..95% rH non-condensing Temperature 0..50 °C
Protection Class	IP20	
Standards	2004/108/EY(EMC) EN61000-6-3: 2001 (Emission) EN61000-6-2: 2001 (Immunity)	
Mounting	By the screws on the wall or on the flush mounting box	
Housing	ABS Plastics	
Dimensions	87W x 86H x 32D mm	

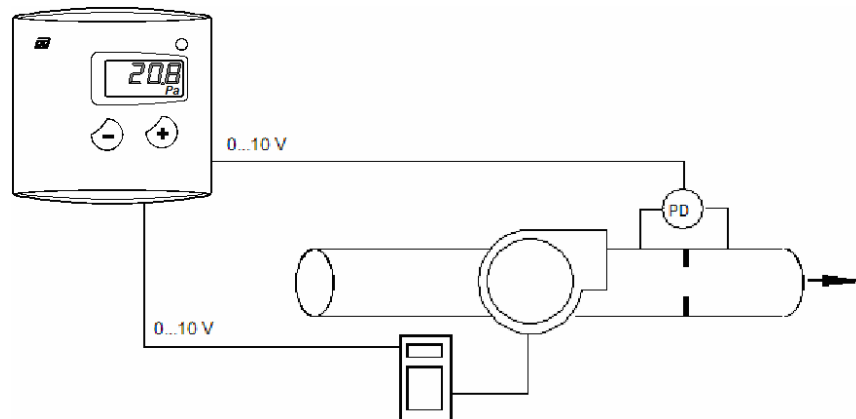
Produal Oy

Keltakalliontie 18
48770 Kotka
FINLAND
www.produal.com

Tel: +358-5-230 9200
Fax: +358-5-230 9210
info@produal.fi

WORKING DIAGRAM

Actuator types are thermic actuator, 3-point actuator or 0...10 V control signal. The Picture below presents normal HS 2.2 working environment.

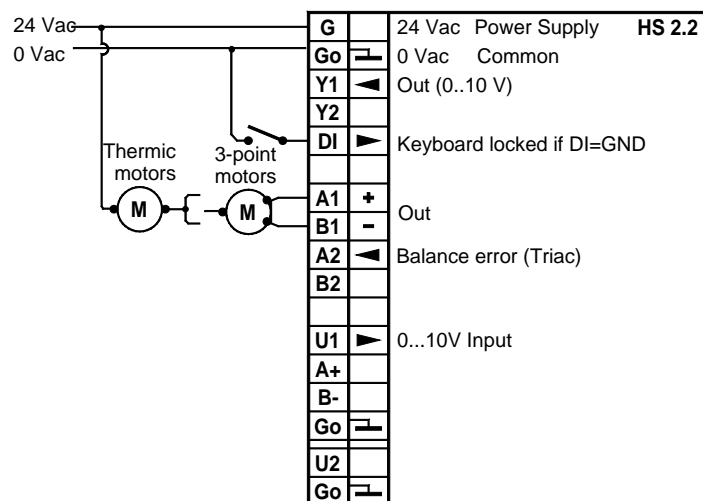


UNITS

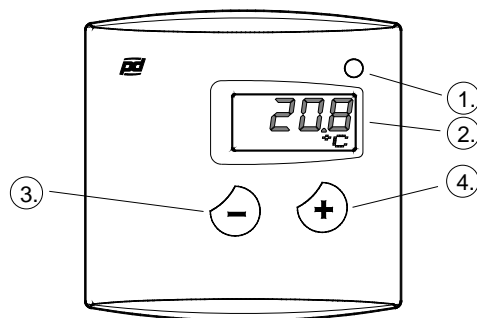
Input signal 0...10V is possible to scale in different units. Default unit is a percent [%], but can be scaled to following units; Pa, kPa, °C, bar, m/s, lux, CO₂ and CO.

WIRING TERMINALS

The electrical installation, device connection and commissioning can only be carried out by qualified professionals and according to the local wiring regulations!



USER MODE

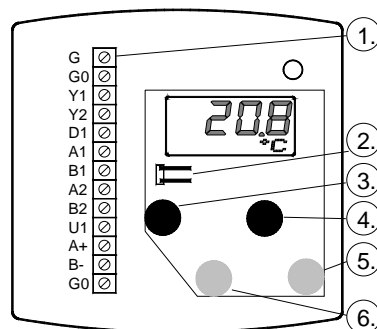


HS 2.2 display indicates room temperature. There are four (4) touch sensitive buttons in the controller.

1. Status LED
 - Green = normal
 - Red = Balance error
2. LCD display
3. Setpoint adjustment
4. Setpoint adjustment

PROGRAMMING MODE

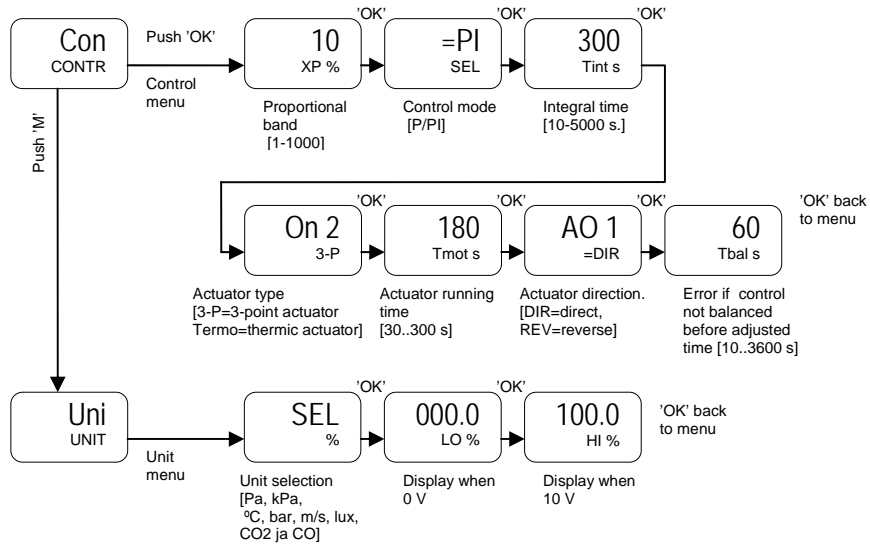
Pull the configuring mode jumper to get into programming mode:



1. Wiring terminals.
2. Configuration mode jumper.
 - Set = User mode
 - Removed = Programming mode
3. Setpoint adjustment
4. Setpoint adjustment
5. 'OK'-button (under cover).
6. 'M'-button (under cover)

MENU

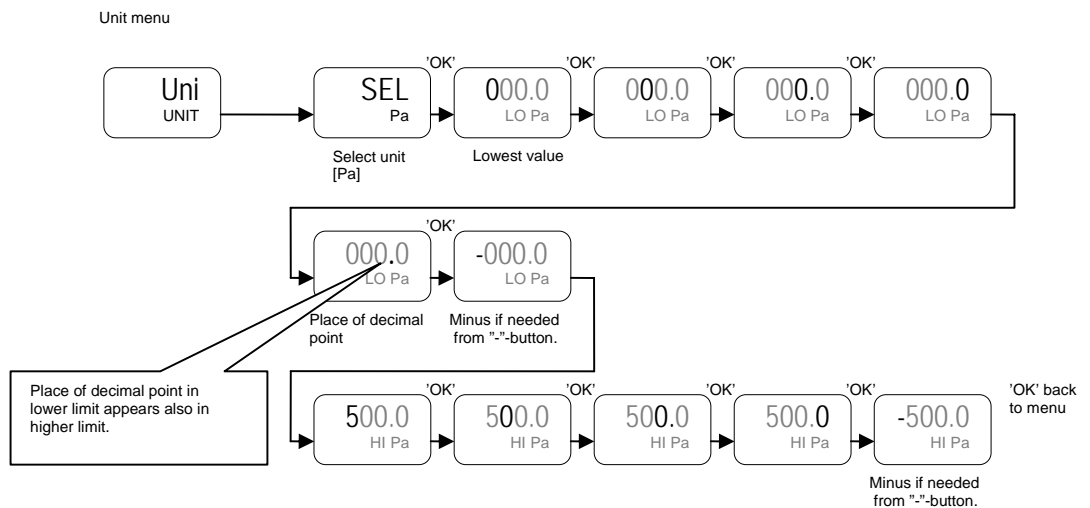
Push **M**-button to proceed in the menu. **M**-button goes forward and **OK**-button backward.
Change values by \oplus or \ominus -buttons. Parameters will be saved at the end.



Exit menu by waiting for 1 min.

UNITS SELECTION

Internal measuring range of the controller is 1000 and single step one. Minimum and maximum of measuring range is adjustable by the user [-9999..9999]. Note! Single step is different if measuring range is scaled.
For example implementing differential pressure transmitter (Produal PEL 2000) with HS 2.2. The measuring range is 0...500 Pa.



Selected unit appears as follows:

