Installation and Operation Instructions

SOLAR THERMOSTATIC VALVE STV 1







1 - Application

STV1 Solar Thermostatic Valve is designed as a protection against storage cylinder overheating in thermosiphon solar systems (convection circulation). In case the opening temperature is exceeded, the valve closes the heat carrier inlet from a solar collector into the twin-wall hot water tank. This way the solar system is shut off, preventing water overheating in the tank.

2 - Function Description

STV1 Solar Thermostatic Valve is equipped with a thermostatic element that interrupts the flow of heat carrier between a collector and DHW tank if the temperature at collector outlet exceeds the valve closing temperature (95 °C or 115 °C). This way the DHW tank is protected against overheating. Temperature at the collector outlet rises to the stagnation temperature. When the sun hides behind clouds or the sunshine intensity drops due to the afternoon inclination angle, temperature at the collector outlet drops and the thermostatic valve re-opens the collector outlet.

3 - Installation and Maintenance

Install the Solar Thermostatic Valve in compliance with the following instructions:

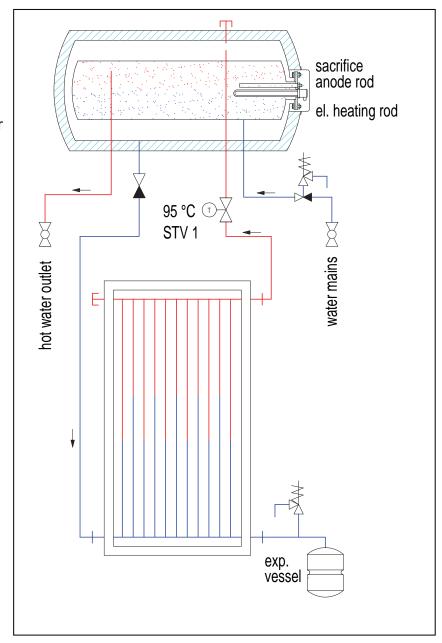
The valve may be installed in any position.

Install the valve into the outlet pipe from solar collectors before the inlet sleeve into the twin-wall hot water tank. The arrow on the valve body shows the direction of the heat carrier flow.

The valve works independently, requiring no energy supply and no maintenance.

4 - Connection Diagram

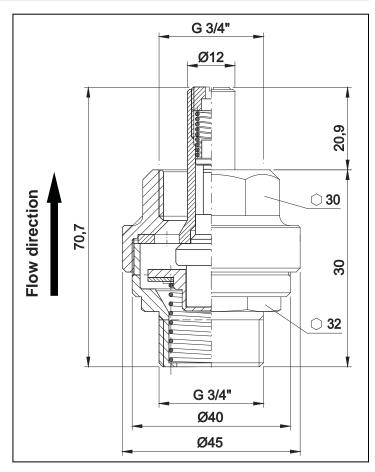
see Fig. on the right



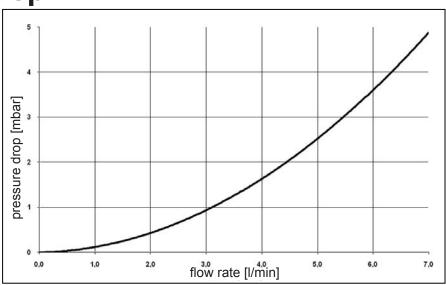
5 - Basic Technical Data

		STV 1-95	STV 1-115
DN	-	20	
PN	-	6	
Connection sizes	G"	¾" inner/inner	
Weight	kg	0.21	
K _{vs}	m³/h	3.3	
Max. working pressure	bar	6	
Max. working temperature - collector side	°C	200 °C continuous, 300 °C max. 24 h	
Max. working temperature - tank side	°C	120	
Closing temperature	°C	95 +0/-5	115 +0/-5

6 - Construction Dimensions



7 - Pressure Drop



WARRANTY CERTIFICATE

SOLAR THERMOSTATIC VALVE STV 1

Seller:	Date of purchase:

WARRANTY CONDITIONS

- 1. The Seller grants the Buyer a Guarantee period of 24 months from the date of purchase.
- 2. The product will be installed and commissioned by a competent company or a person trained by the manufacturer.
- 3. When claiming warranty, this Warranty Certificate must be submitted together with the purchase receipt.
- 4. The warranty is valid only when the technical conditions set by the Manufacturer, installation manual and instructions in the documentation and on the product itself are maintained.
- 5. The warranty does not cover defects caused by external conditions or improper working conditions, defects caused by usual wear and tear, further when the product is not used in compliance with its purpose and when the defect was caused by mechanical damage to the product, improper handling, tampering by a third person, improper installation, improper stocking, natural disaster etc.

COMMISSIONING

ristaller
Date:
Rubber stamp print and signature of the technician:

11/2011



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