



Temperature Regulators

Models OB-30 and OB-31

These instructions should be used by experienced personnel!

PRODUCT DESCRIPTION

Model shown on the picture: OB-30

Armstrong Bronze Direct Acting Temperature Regulator.
For Steam, Water and Non-Corrosive Liquids.

OB-30: for Heating Applications.

OB-31: for Cooling Applications.

Optional:

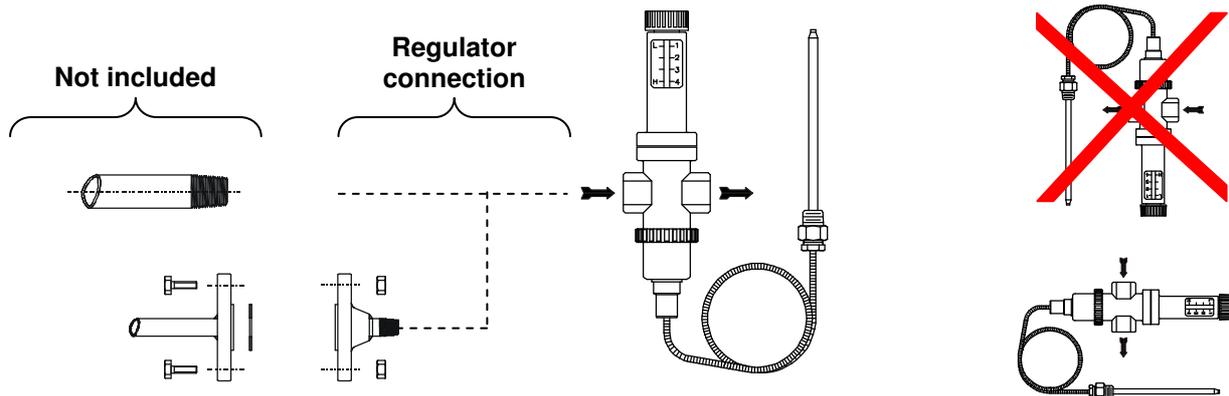
- Thermal Well for sensor's protection

For detailed material specifications, approximate dimensions and weight, see Armstrong literature or consult your local Representative.



INSTALLATION

Model shown on the drawing: OB-31

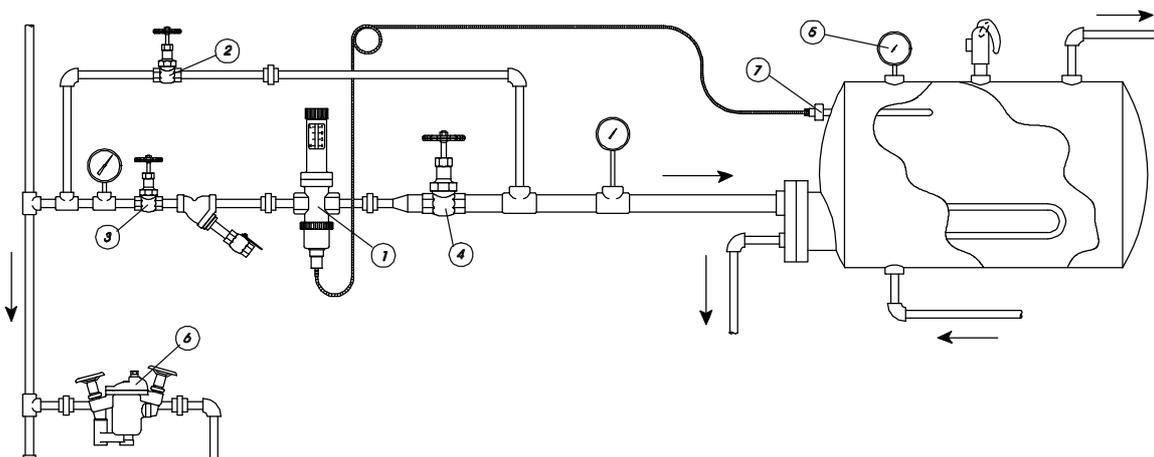


START-UP, ADJUSTMENT AND SHUT-DOWN PROCEDURE

For detailed hookups and adapted start-up and shut-down procedures, see Armstrong literature or consult your local Representative.

Downstream demand is necessary to set the temperature regulator.

The installation shown below is for steam applications. For water or other liquids, the steam trap (6) should not be installed.



- Close the isolation valves (3 & 4) and open the by-pass valve (2) to blow-down inlet piping. After having blown the system down, close the by-pass valve (2);
- **OB-30 on steam application:** Make sure steam trap (6) is operating properly;
- Completely open the inlet valve (3) and partially open the outlet valve (4);
- Turn the adjusting handle of the Temperature Regulator (1) clockwise until the desired temperature is reached on the thermometer (5). The temperature will decrease if the handle is turned counterclockwise;
- Completely open the outlet valve (4) and adjust temperature if necessary. The temperature regulating system should now operate normally;
- To shut the system down, close the inlet valve (3) first, then the outlet valve (4).

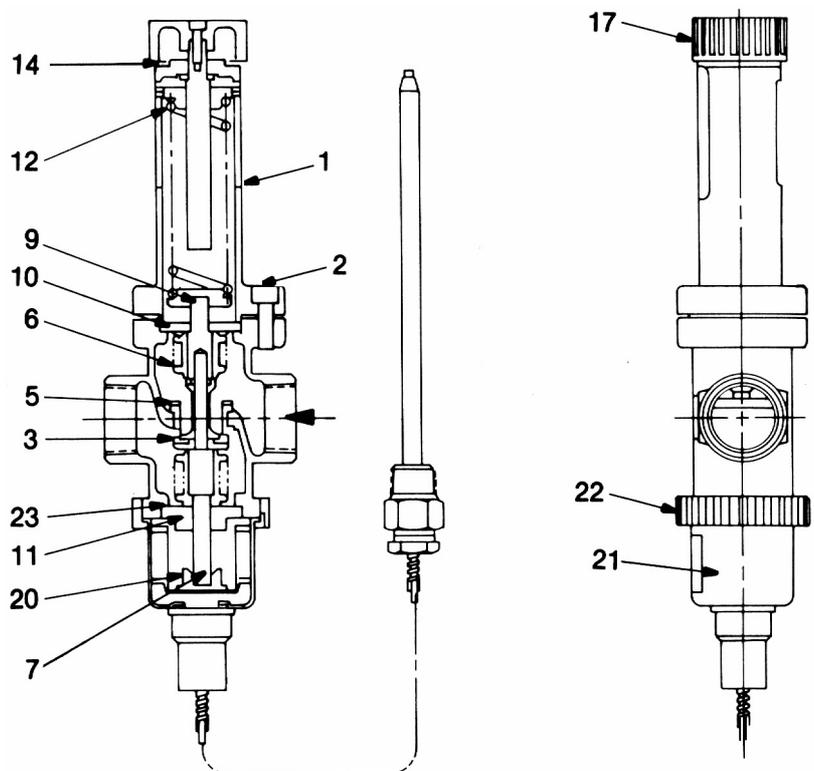
MAINTENANCE

For troubleshooting, testing methods, frequency of maintenance and detailed spare parts list, see Armstrong literature or consult your local Representative.



**EQUIPMENT UNDER PRESSURE
OPERATING TEMPERATURE >100 °C
MAKE SURE TEMPERATURE REGULATOR IS COLD BEFORE HANDLING**

Model shown on the drawing: OB-30



I. Disassembly Procedure:

- Turn the handle (17) counterclockwise in order to free the regulating spring (12);
- Unscrew the union nut (22) and remove the sensor (21) from valve body. Make sure the thermal bellows receiver (20) is not lost;
- Unscrew bolts (2) and remove spring chamber (1). Make sure that spring plate (14) and regulating spring (12) are not lost;
- Remove guides (10 & 11);
- Unscrew nuts (9) located at the top of the spindle (7). All inner parts, excluding valve seat (5) can be removed;
- Unscrew valve seat (5). Clean or replace internal parts for which it is necessary;
- Assemble in opposite order. Replace gaskets if necessary (make sure to tighten guide (11) on the bottom of the body with the spring chamber (1) removed).