Technical information

Tender specification:

Automatically operating check valves for the direct connection to the circulation pump. Facility for emergency opening of the valve with the help of a screwdriver, for instance for gravity operation.

Valve body made of brass. Valve disc made of temperature resistant plastic. Stainless steel spring.

Technical data:

Max. Operating temperature: 120 °C
Max. operating pressure: 10 bar
Opening pressure: about 20 mbar

Application:

Pipework with circulation pump, such as hot water central heating systems with circulation pump.

Bivalent heating or hot water preparation systems.

Hot water preparation or storage using separate boilers.

Temperature up to 120 °C.

When installing the check valves, the opening pressure of about 20 mbar must be observed.

Function:

Oventrop check valves automatically prevent unwanted gravity circulation in the pipework.

The automatic check valve which closes immediately after loss of pressure of the circulation pump, can be opened manually for deaeration of the system or in the event of a breakdown, such as failure of the pump. The now available gravity circulation normally suffices to prevent freezing of the system.

The check valve item no. 10703.. features an automatically working airvent. Air accumulations that may develop between the check valve and the pump in case of failure of the latter, may escape via the airvent. The circulation pump remains filled with water so that dry running is impossible.

Body made of brass, valve disc made of temperature-resistant plastic, stainless steel spring.

Three different models are available:

- Connection to the pump female thread/connection to the pipework male thread (types SVE)
- Flanged connection to the pump/connection to the pipework male thread (type SVA)
- Flanged connection to the pump/connection to the pipework female thread (type SVI)

Advantages:

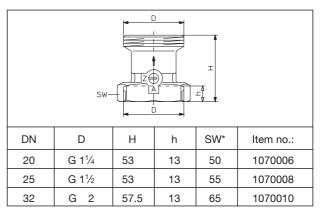
Oventrop check valves can be directly connected to the circulation pump. As a result, additional sealing points (and potential leak sources) are eliminated and a lower overall length of the coupled components is achieved.

The direct connection to a pump valve or pump ball valve is possible.

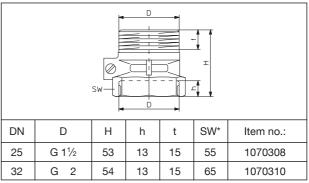
Installation either horizontally or vertically. (item no. 10703.. vertically only)

Note:

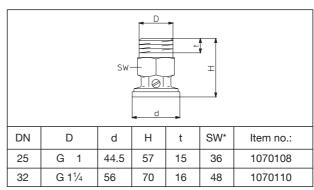
When the circulation pump is switched off, a low gravity circulation depending on the circulation pressure is still possible within the heating system as the check valve is not tight sealing.



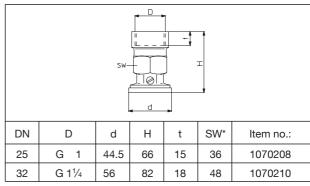
Dimensions type SVE



Dimensions type SVE with automatic deaeration

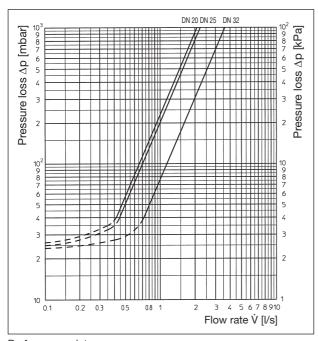


Dimensions type SVA

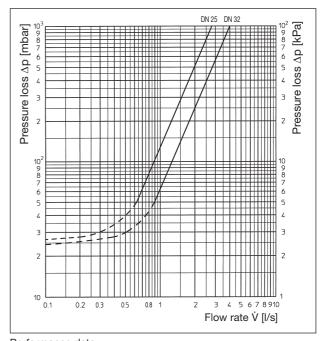


Dimensions type SVI

*SW = Spanner size



Performance data
Check valves 1070006/08/10 and 1070308/10



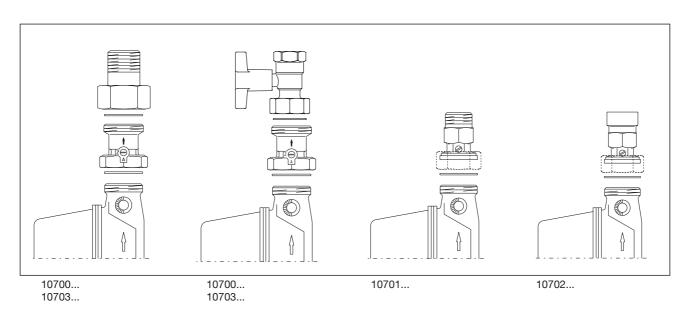
Performance data
Check valves 1070108 /10 and 1070208/10

| | | 10700/03 | | 10701/02 | |
|----|------|----------|------|----------|------|
| DN | di | k_V | Zeta | k_V | Zeta |
| 20 | 21.6 | 7.5 | 6 | - | - |
| 25 | 27.2 | 8 | 13 | 10.1 | 8.6 |
| 32 | 35.9 | 13 | 15 | 14.5 | 12.6 |

kv and Zeta values

Zeta values related to the inner pipe diameter according to DIN 2440.

 k_V values in m³/h with Δp 1 bar.



Installation examples

Subject to technical modifications without notice.

Product range 6 ti 20-EN/10/MW Edition 2017