



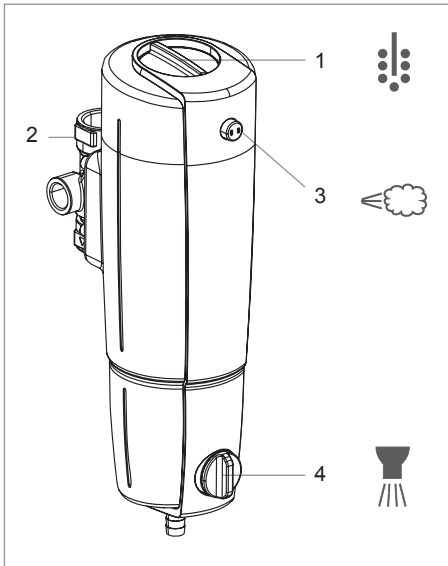
**Instructions for use
and installation
HF 3415**

Field of application

The heating system filter HF 3415 is designed to protect and extend the service life of heat generators, heating pumps, thermostatic valves and other valves in heating installations.

The combination of a backwashable heating system filter, a magnet separator and a deaerator makes sure that sludge in heating installations is filtered and flushed out and gases in the heating system water are eliminated via the vent.

Overview (with symbols)



- 1 Magnetic bar
- 2 Cross-type flange for heating systems
- 3 Vent
- 4 Backwashing

Installation

Use the cross-type flange designed for heating systems to mount the heating system filter. Follow the instructions for use and installation of the cross-type flange for heating systems.

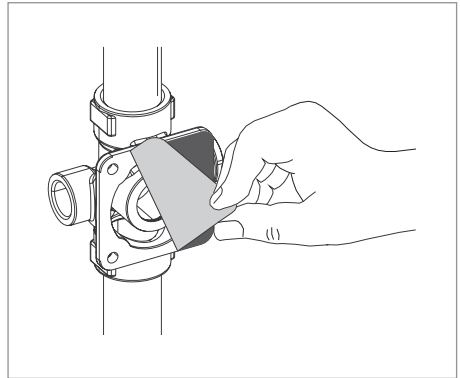
The pipe in which the filter is installed must be able to support the valve's weight. Install the heating system filter in the pipe with the

main axis in vertical position, so that developing gases can easily be released by buoyancy via the microbubble air separator. Observe the indicated dimensions.

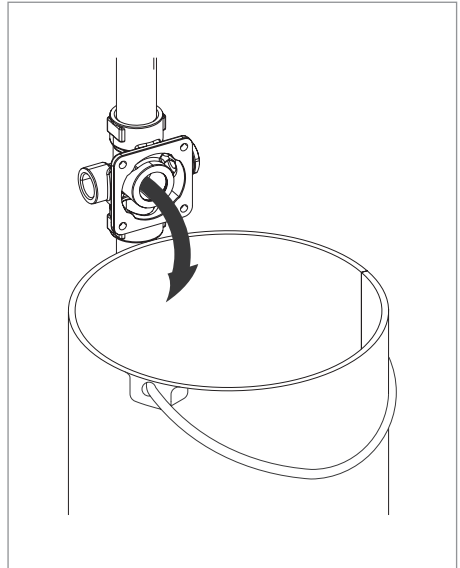
Observe the standards currently in force when connecting a potable water pipe to the flange.

The flange offers the possibility to connect the ConnectionCenter 3200 and the FillingCombi type BA or BA Plus (cf. page 8).

Do not remove the adhesive label on the flange until connecting the heating system filter.



Flush the pipes prior to installing the filter.

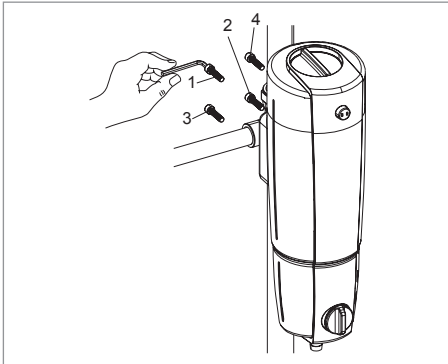


Install the heating system filter preferentially in the return pipe. However, it is also possible to mount in the supply line of the heating installation.

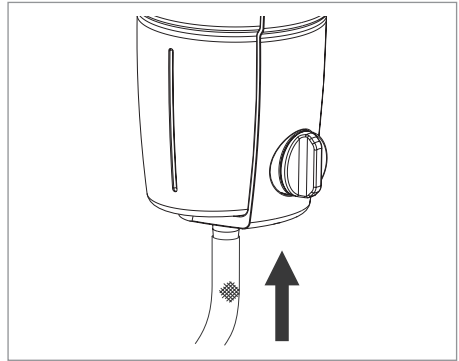
Heating systems benefit from the heating system filter as it offers better protection against dirt and sludge.

Fasten the heating system filter with the main axis in vertical position by means of hexagon socket screws and ensure that it is pressure-tight. Make sure that the seal is in correct position.

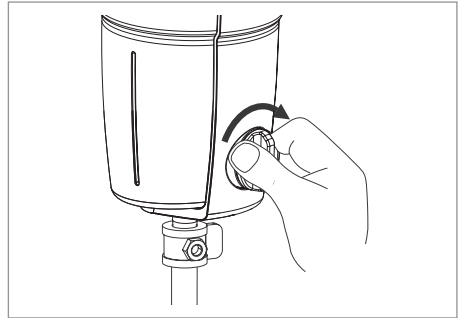
Fasten the hexagon socket screws crosswise to ensure pressure-tightness.



Connect a hose to the hose fitting (½").



Turn the ball valve clockwise by 90° to backwash the heating system filter.



Backwashing



Backwash the heating system filter at regular intervals depending on the amount of accumulated dirt and sludge.

Thus, dirt and sludge are flushed out of the heating system.

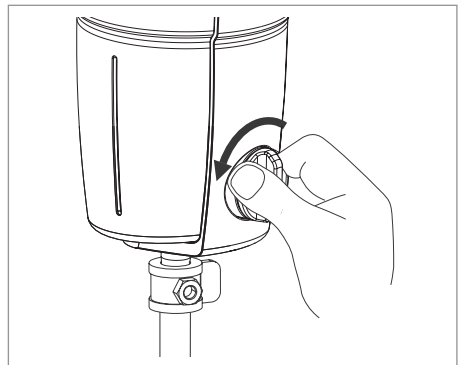
Connect a hose to the hose fitting of the heating system filter.

Caution: The drain pipe must be able to collect the discharged volume!

Note: When backwashing, the pressure of the heating installation has to remain stable. We recommend the FillingCombi type BA or BA Plus in accordance with the European standard EN 1717!

Caution: Danger of scalding due to hot water! Secure the hose with a hose clamp to make sure that it stays in correct position!

Turn the ball valve back by 90° when backwashing is completed.



Maintenance Magnetic bar

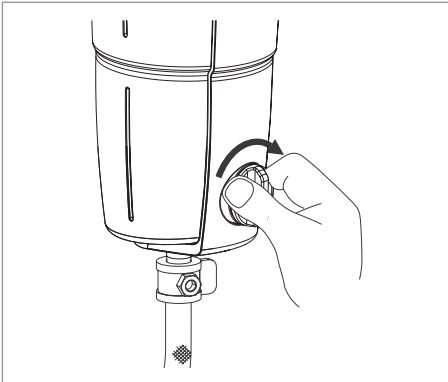


The magnetic separation prevents the deposition of metallic and magnetic sediments in heating installations.

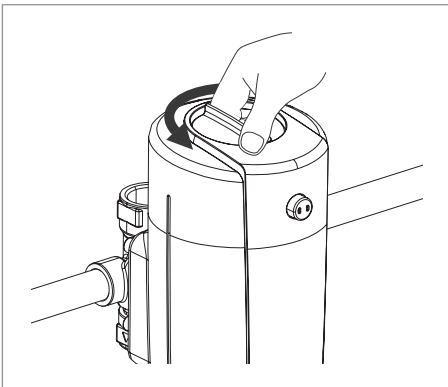
The heating system filter is able to remove and flush out these metallic and magnetic sediments.

Caution: Clean the magnetic separator during the backwash process only!

Start backwashing by turning the ball valve clockwise by 90°.

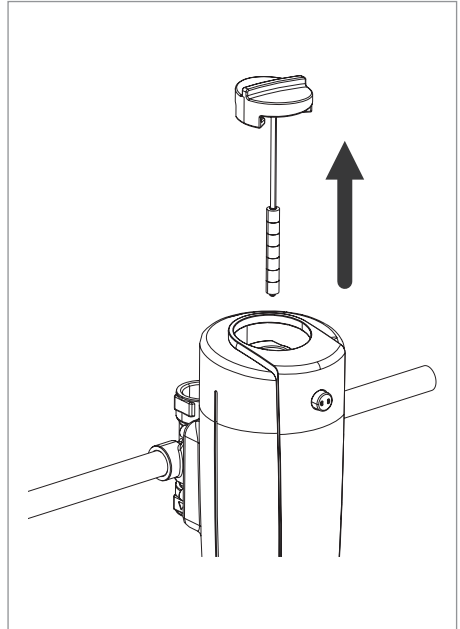


Turn the knob of the magnetic separator anticlockwise by 90°.

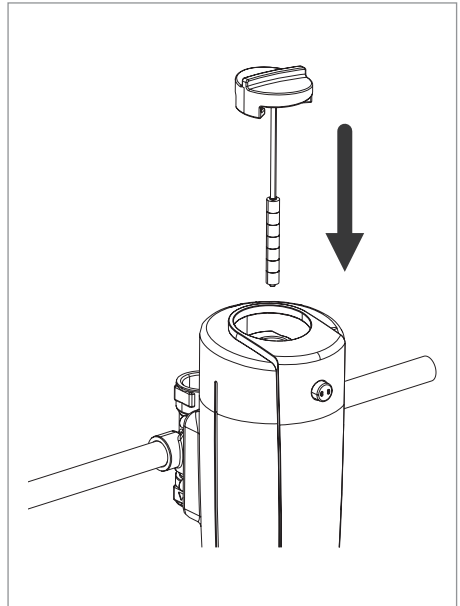


Remove the magnetic bar from the filter.

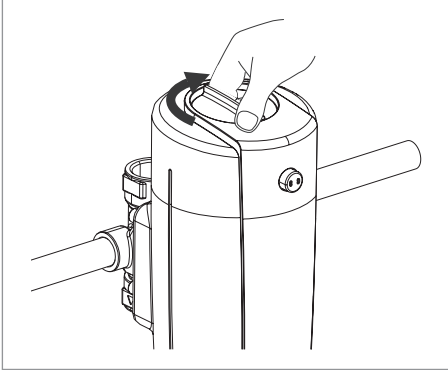
The metallic and magnetic sediments are eliminated and flushed out in one operation.



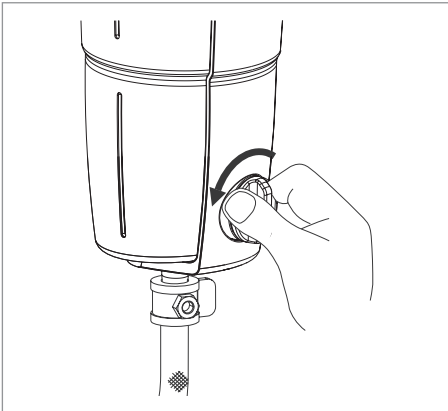
Put the magnetic bar back in the filter.



Turn the magnetic bar clockwise by 90° to fasten it.



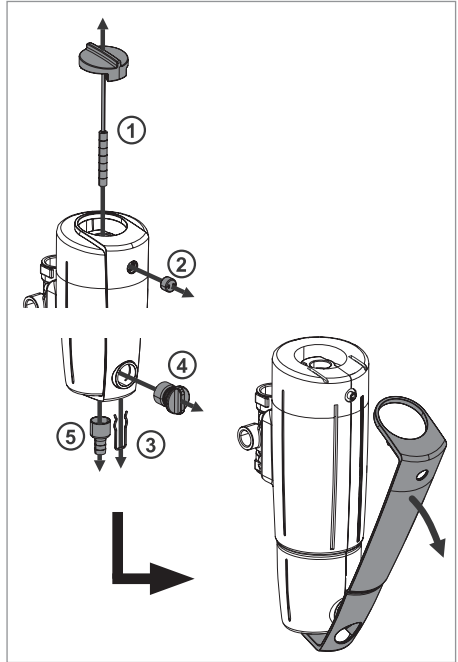
Turn the ball valve anticlockwise by 90° to complete the backwash procedure.



Caution: Depressurize the heating system filter prior to opening.

Note: We recommend to mount servicing stop valves upstream and downstream of the filter.

Prior to dismantling the clip of the heating system filter, remove the magnetic bar (1), the vent cover (2), the clamp of the backwash knob (3), the backwash knob (4) and the hose fitting (5).



Service / Exchange Vent

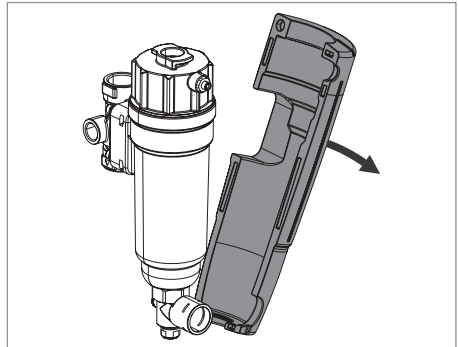
Caution: Prior to servicing the vent, service the magnetic bar („Maintenance Magnetic bar“)!

The heating installation's vent works automatically and should be verified if necessary.

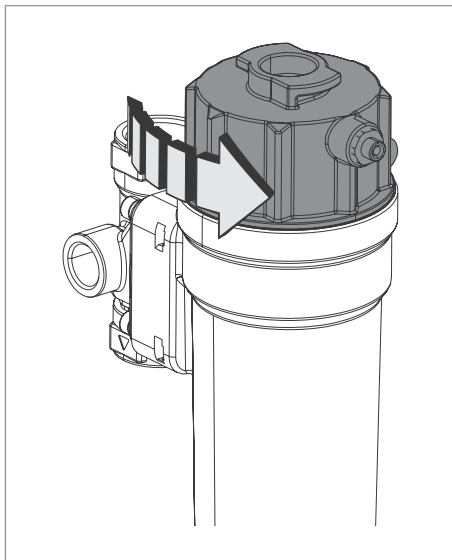
Dirt may affect the vent's function. Clean or replace the vent.

Proceed as follows:

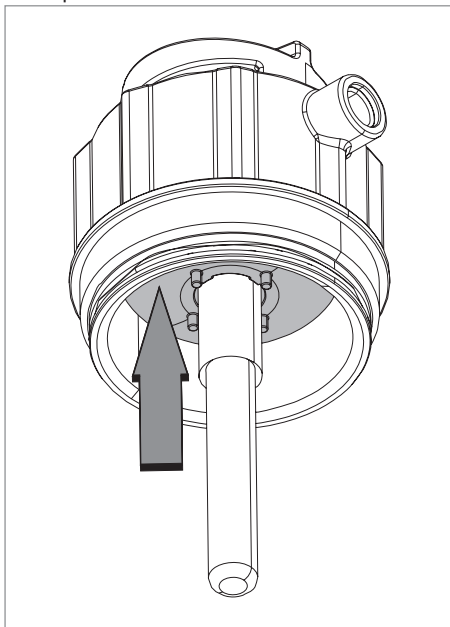
Remove both insulating covers from the heating system filter.



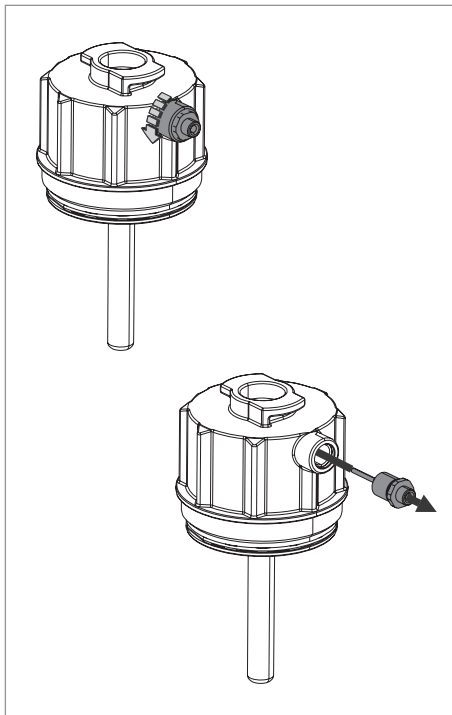
Remove the whole upper part of the device by turning anticlockwise.



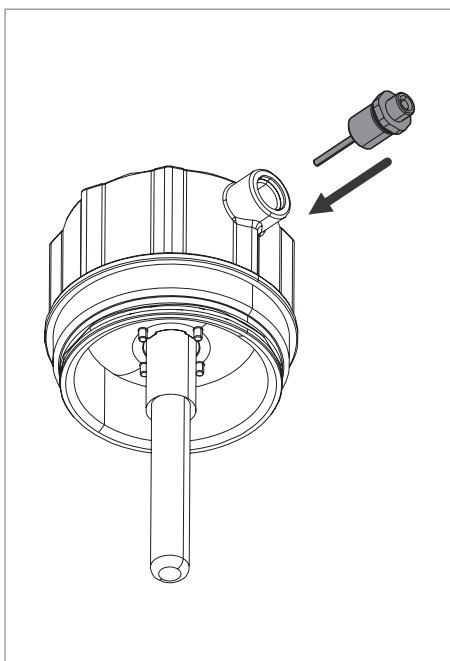
Prior to mounting the new air vent, press the float upwards.



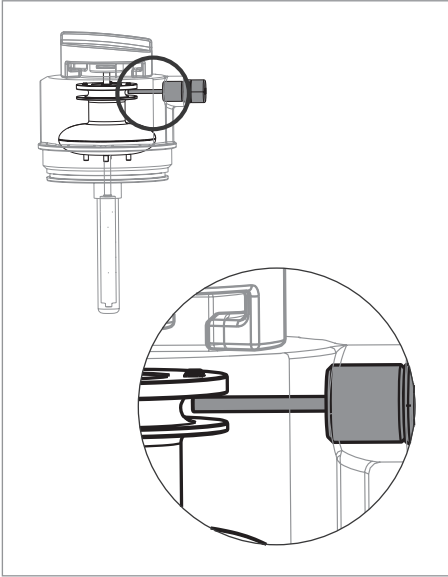
Remove the air vent.



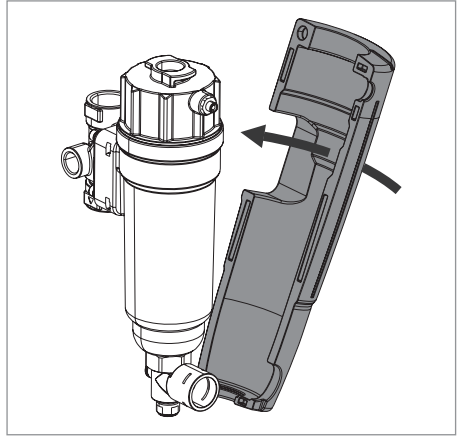
Fit the vent in the upper part of the device.



It is necessary to press the float upwards to put the air vent lever in correct position in the float's groove.

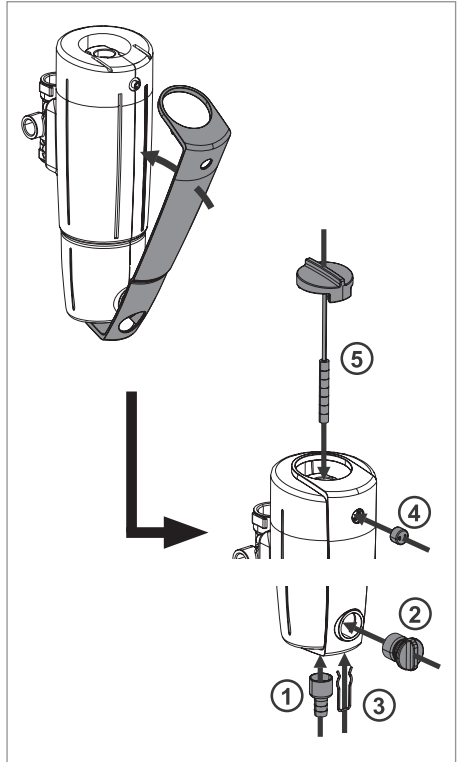
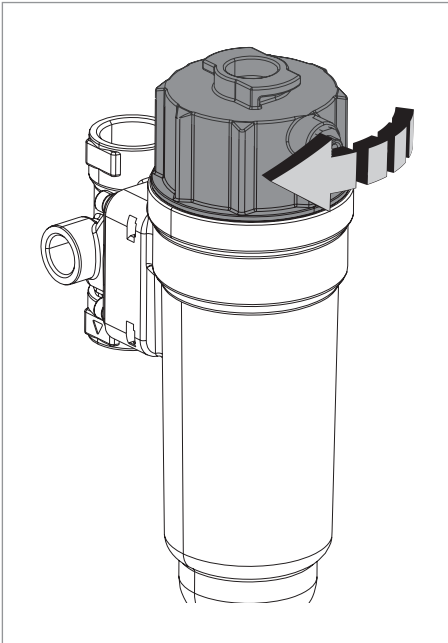


Put both insulating covers back into position.



Fasten the clip of the heating system filter and then mount the hose fitting (1), the backwash knob (2), the clamp of the backwash knob (3), the cover of the air vent (4) and the magnetic bar (5).

Re-assemble the upper part of the device by screwing clockwise into place.



Technical specifications

Operating temperature:	10°C - 110°C
Fluid:	Heating system water
Minimum pressure for backwashing:	1.5 bar
Mounting position:	Main axis: vertical
Flow rate	
DN 20 - DN 32:	2.0 m ³ /h at Δp 0.1 bar
Kvs-value:	8.5

Accessories

Cross-type flange:	
DN 20	3415.20.000
DN 25	3415.25.000
DN 32	3415.32.000
ConnectionCenter 3200	3200.15.010
FillingCombi BA Plus	6628.20.005
FillingCombi BA	6628.20.000

Spare parts

Vent	3415.00.900
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Only qualified installers are authorized to install and service the device. Observe the maintenance instructions! Do not clean synthetic parts with solvent-based detergents. Protect the filter against frost. When submitted to hard shocks, the synthetic part concerned shall be exchanged (even when damages are not visible). Avoid strong water hammers, caused for instance by downstream solenoid valves (danger of burst). The packaging serves as protection during transport. Should it be severely damaged, do not install the device!