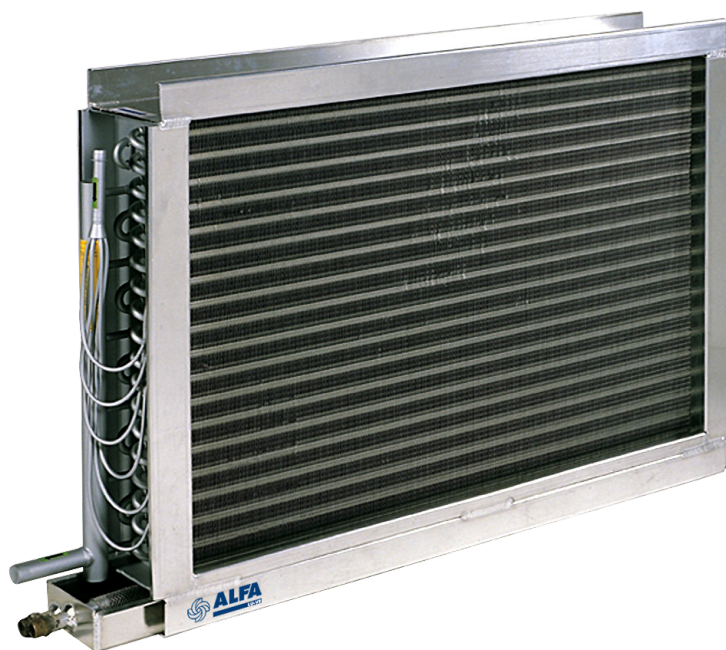


Fincoil L/J

Installation manual



- Installation
- Maintenance

1 Installation

1.1 General

The finned coils for water operation can be installed either vertically or horizontally, the tubes of the finned coil section in horizontal position. In the finned heat exchangers for steam operation the tubes of the finned coil section shall be in vertical position to avoid hydraulic shocks. If the finned coils for steam are horizontally installed, they shall be in diagonal position so that the condensing water freely flows out from the coil tubes and condensing water header.

The finned coils can be fastened from the frame around the coil block either by bolts or slide lists. The frames of the standard coils are not pre-perforated for bolts.

The finned heat exchangers for water operation are connected with their water inlet down to ensure good air venting, and the units for steam operation are connected with the inlet above to avoid hydraulic shocks. The finned coils are planned and dimensioned according to counter-flow principle, if nothing else specified. The plugs of the tube connections are not removed until the heat exchanger is connected into the pipework. Location of the tube connections is specified according to the air flow direction (left/right).

1.2 Air venting

Trouble-free operation of the water-circulated finned coils for water requires good air venting in the system. There is a plug on the top of the coils, which can be equipped with an air venting screw or an automatic air bleeder. The air venting screw and the automatic air bleeder are not included in the delivery.

When using the air venting screw, the coils shall be air vented at least once in the beginning of the heating season and always, if some air has got into the system. When using the automatic air bleeder, its function must be checked.

1.3 Danger of freezing

Freezing water may split the tubes, and the water flow can cause big damages. There is a danger of freezing, if the outside temperature is low or if the heat flow to the coil is reduced or totally stopped. Therefore, in the hot water system, you have to take care that the water temperature does not sink too much and that the water circulation operates smoothly. The finned coils with dimensioning temperature ± 0 °C or lower are equipped with a sleeve for the sensor of the freezing protection thermostat installed in the coil tube. The thermostat is not included in the delivery.

If the flow of hot water into the coil is remarkably reduced or totally ended, the fans shall be stopped and the fresh air opening closed.

You should also avoid using temperature higher than the dimensioning temperature of the water, because this may reduce the water flow so that the rest of the water does not circulate normally and freezes over.

To ensure trouble-free water circulation, the valves shall be open, good air venting both of coils and of tubes shall be done, and the circulation pump shall be operated although the heating is stopped at night. If the heating is off for a longer time and you don't want to keep the circulation pump operating, the coils shall be drained. There is a plug on the coil's lowest point for draining. Due to the capillarity, some water always remains in the coil tubing and shall be removed by compressed air. The coil and the tubing shall be drained off after the pressure test to avoid freezing.

2 Maintenance

2.1 Cleaning

In spite of eventual air filter on the unit there is still dust gathering on the coil. The dust sticks on the fins preventing normal air flow and reducing the heat transfer capacity.

Therefore the fins shall be cleaned now and then, e.g. by vacuum cleaner.

If the dust cannot be removed by vacuum cleaner, you can also use compressed air, steam or warm water sprayed on the fins and a soft brush. You have to be careful with the cleaning so that fins do not bend to prevent the air flow. All dust shall be removed before starting the fans.

2.2 Storing

In storage the units shall be protected from humidity, e.g. under a roof.



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