



# AFX

## Agricultural storage cooler

### General information & application

The Helpman AFX air cooler series has been specifically designed for the refrigerated storage of agricultural produce. These coolers are characterised by an optimised capacity/air volume ratio and a relatively low profile. All models have been optimised for air temperatures around 0 °C and a small temperature difference to avoid product dehydration.

Evaporating temp.	+5 to -10 °C
Refrigerants	all H(C)FC, brine, CO <sub>2</sub>
Capacities (SC2)	7 up to 29 kW
Air volume	5,100 up to 22,400 m <sup>3</sup> /h

### Standard configuration

- Finned coil
  - 2 coil block modules
  - 6 tube rows deep
  - Cu tubing ø 1/2"
  - Tube pitch 38 x 38 mm square
  - Aluminium fins
  - Fin spacings 7 mm.
- 3-8 Fans, blowing through the coil. Diameters Ø 305 mm or Ø 356 mm. Enclosed design spray-tight fan motors, protection class IP55. Motors are equipped with a thermal safety device in the windings, connected to separate terminals in the box.
- Fans with elevated external pressure to ensure optimised air distribution.
- Corrosion resistant casing material: Aluminium/Senzimir, white epoxy coated (RAL 9003).
- Hinged (module 1) or easily removable (module 2) end covers.
- Easily removable drip tray, horizontal drain(s) G 1" ext.
- Refrigerant distribution optimised to refrigerant applied.



AFX

- Refrigerant connections on right hand side (fan side view).
- Fitted with schröder valve on the suction connection for testing purposes.
- Sufficient room for fitting the expansion valve inside.
- Suitable for dry expansion or pumped system.
- Stickers indicate fan direction and refrigerant in/out.
- Delivery in mounting position. AFX models module 1 in wooden crate, module 2 mounted on wooden beams. Installation can take place with use of a forklift.

### Test

Design pressure 33 bar, higher design pressures on request. Each heat exchanger is leak tested with dry air and finally supplied with a nitrogen pre-charge. Brine coolers are tested at 6 bar.

**Options**

- Defrost systems
  - Hot gas coil in driptray (G1)
  - Electric defrost (E1, E4)

Electric defrost for air coolers with pumped refrigerant circulation or in glycol execution on special request only.

- Driptray insulation
  - Armaflex (or alike) 10 mm (I 1)
  - Styropore 10 mm + cladding (I 2)
  - Foamglass 25 mm + cladding (I 3)
  - Purane + polyester cladding (I 4)

I1, I2 & I4 driptray insulation not in combination with electric defrost. Foamglass (I3) possible for use with electric defrost.

- Refrigerant connections (L / R) (fan side view)



- Isolating switch, mounted (ISM)

- Secondary refrigerant
  - All models available for brine application.
  - Standard connections Cu soldering, other connections (thread/flange) on request.

- Special fan motors
  - Alternative electrical supplies

- Built in heater coil sections

- Stainless steel 304/316 casing

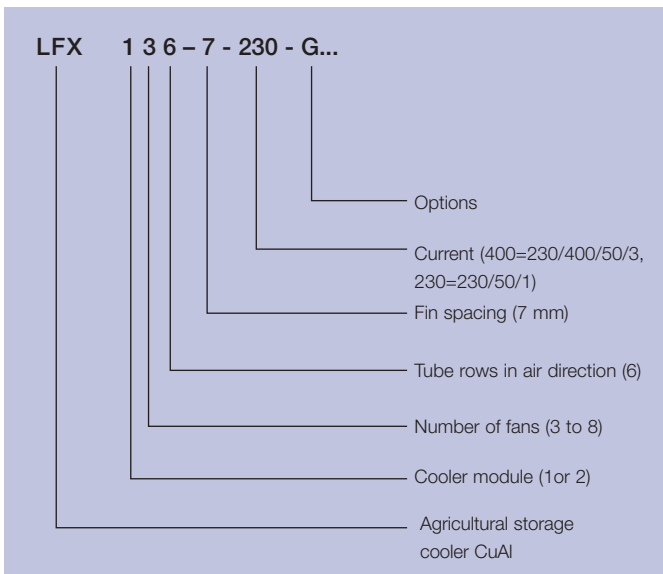
**Air cooler selection & dimensions**

Air cooler selection and RCPL pricing is to be performed with "HelpmanSelect" Air Heat Exchanger selection software. Selection output includes all relevant technical data and dimensional drawings.



*Please contact our sales organisation for full technical documentation.*

**Code description**



**Benefits**

- Application based air cooler design to secure product quality.
- Elevated external fan pressure to ensure optimised air distribution.
- All models optimised for air temperatures around 0 °C and a small temperature difference to avoid product dehydration.
- Advanced product selection software available.
- Heavy duty coil & casing materials, resulting in a long operational product life.
- Reliable performance, Eurovent certified.
- Easy-install.
- Energy efficient.
- Low total cost of ownership.
- Two-year product guarantee.

ERC00173EN 0802

Alfa Laval reserves the right to change specification without prior notification.

**How to contact Alfa Laval**  
Up-to-date Alfa Laval contact details for all countries are always available on our website at [www.alfalaval.com](http://www.alfalaval.com)



**Packaging - Processing**  
**Bid on Equipment**  
1-847-683-7720  
[www.bid-on-equipment.com](http://www.bid-on-equipment.com)