



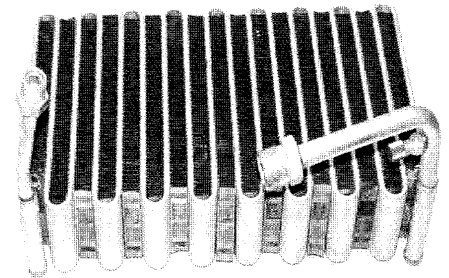
Evaporator

General points

The evaporator is used for heat exchange between the surrounding air and the refrigerant in the air conditioning system.

How it works

The refrigerant, which is under high pressure, is injected into the evaporator via the expansion or throttle valve. The refrigerant expands. The evaporation cooling produced during this process is dissipated to the environment via the large evaporator surface and guided into the vehicle interior by the blower flow.



Effects of failure

A faulty evaporator shows the following symptoms:

- Poor cooling performance
- Failure of the air conditioning system
- Poor blower performance

Reasons for failure of the evaporator can be:

- Evaporator pipes blocked
- A leak in the evaporator (at connection points, caused by damage)
- Evaporator soiled (problem with the air duct)

Troubleshooting

The following test steps should be taken into account during troubleshooting:

- Check the evaporator for soiling
- Check the evaporator for damage
- Check the connection lines for a correct fit
- Leak test
- Pressure measurement with the compressor switched



- on and the engine running
- Temperature measurement at the inlet and outlet lines