

Refrigerant Fails to Circulate

1. Symptoms seen in refrigerating cycle
 - **LO** pressure side (1) pressure is vacuum and, **HI** pressure side (2) is low pressure.
 - LO** pressure side (1) : Vacuum
 - HI** pressure side (2) : 0.49 to 0.59 MPa
(5 to 6 kgf/cm², 71.2 to 85.3 psi)
2. Probable cause
 - Refrigerant flow obstructed by moisture or dirt in the refrigerating cycle freezing or sticking on the expansion valve orifice.
3. Solution

Allow to stand for same time and then resume operation to decide whether the plugging is due to moisture or dirt.

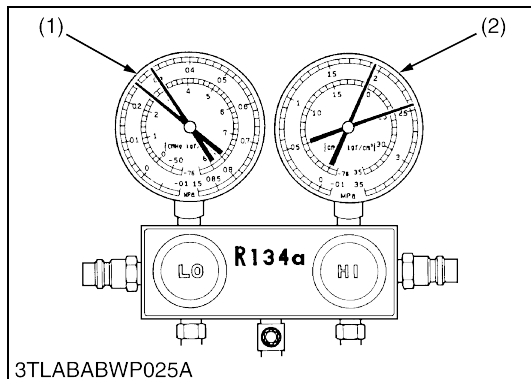
 - If caused by moisture, correct by referring to instructions in previous.
 - If caused by dirt, remove the expansion valve and blow out the dirt with compressed air.
 - If unable to remove the dirt, replace the expansion valve.

Replace the receiver. Evacuate and charge in proper amount of new refrigerant. (Refer to “(3) Charging the Refrigerant” in this section.)

 - If caused by gas leakage in heat sensitizing tube, replace the expansion valve.

(1) **LO** Pressure Side(2) **HI** Pressure Side

W1017346



Expansion Valve Opens Too Far or Improper Installation of Heat Sensitizing Tube

1. Symptoms seen in refrigerating cycle
 - Both **LO** and **HI** pressure side (1), (2) pressures too high.
 - LO** pressure side (1) : 0.29 to 0.39 MPa
(3 to 4 kgf/cm², 42.7 to 56.9 psi)
 - HI** pressure side (2) : 1.96 to 2.45 MPa
(20 to 25 kgf/cm², 284.5 to 355.6 psi)
 - Frost or heavy dew on low pressure side piping.
2. Probable cause
 - Expansion valve trouble or heat sensitizing tube improperly installed.
 - Flow adjustment not properly done.
3. Solution
 - Check installed condition of heat sensitizing tube.
 - If installation of heat sensitizing tube is correct, replace the expansion valve.

(1) **LO** Pressure Side(2) **HI** Pressure Side

W1017612