Product Name : " VAPOUR COMPRESSION REFRIGERATION CYCLE "

Product Code : " R.A.C 11 "

Description :

VAPOUR COMPRESSION REFRIGERATION CYCLE:-

AIM:-

Evaporation and condensation

- Cyclic process on the p-h state diagram
- Calculation of the heat transfer rate at evaporator and condenser

- Determination of efficiency and coefficient of performance

INTRODUCTION:-

A simple refrigeration circuit is demonstrated with this clearly laid out experimental unit. The evaporation and condensation processes are easily observed through the glass components. The function of the expansion valve (in the form of a float valve) can be seen. The changes in the refrigerant state can also be followed by measuring pressures and temperatures. A special environmentally friendly refrigerant is used at low pressure.

TECHNICAL SPECIFICATION:-

A simple refrigeration circuit is demonstrated with this clearly laid out bench top unit. The evaporation and condensation processes are easily observed through the glass components. The function of the expansion valve (in the form of a float valve) can be seen. The changes in the refrigerant state can also be followed by measuring pressures and temperatures. A special environmentally friendly refrigerant is used at low pressure.

Specification

1. Refrigeration circuit with transparent evaporator and condenser.
2. Condenser and evaporator with coil.
3. Expansion valve in form of a float can be clearly seen in operation.
4. Low pressure pressostat.
5. Temperature display with measuring point display, power meter, manometer in refrigerant cycle, flow meter for hot water, cold water and refrigerant circuit.

1. Adjustable safety valve
2. Hermetic piston compressor

Measuring ranges
- temperature: -20...200°C
- pressure: -1...1.5bar
- flow rate (water)
- flow rate (refrigerant)