

Physics Demonstration Experiments

Magnet Board Thermodynamics

01154.02

The demonstration board with support stand finds application in all fields of physics. Experimentation on the board has the following advantages in the range of thermodynamics:

- Quantity of liquids and convection currents in liquids can easily be seen in glass vessels placed in front of the single-color background
- Observations are supported by use of colored marking arrows and points
- Description of the experiments and explanatory sketches and tables can be made directly on the board
- Individual positioning and simple movement of the holders
- Secure positioning through strong magnets

Special holders and equipment allow a secure, simple and clear method of experimentation on the demonstration board.

The distance of the experimental equipment to the board are correlative and optimised for the specified application.

This HANDBOOK can be purchased separately. It contains the experiments listed below. Please ask for a complete equipment list. Ref No 23703

Handbook • Magnet Board Thermodynamics
No. 01154.02 • 15 described Experiments

1 Thermal expansion

- 1.1 (12913)**
Volume expansion of water
- 1.2 (12914)**
Preparing a thermometer scale
- 1.3 (12915)**
Linear expansion of solid bodies
- 1.4 (12916)**
Volume expansion of gases at constant pressure
- 1.5 (12917)**
Pressure elevation on heating gases at constant volume

2 Heat transport

- 2.1 (12918)**
Heat flux in liquids and gases
- 2.2 (12919)**
Heat conduction in solid bodies
- 2.3 (12920)**
Heat conduction in water
- 2.4 (12921)**
Absorption of thermal radiation
- 2.5 (12922)**
Utilisation of radiated energy with a solar collector
- 2.6 (12923)**
Utilisation of radiated energy with a solar cell



Volume expansion of gases at constant pressure (1.4)

3 Gas laws with the Glass Jacket System

- 3.1 (12924)**
Gay-Lussac's law
- 3.1 (12925)**
Charles' law
- 3.3 (12926)**
Boyle and Mariotte's law
- 3.4 (12927)**
Molar volume and universal gas constant
Determination of the relative molar mass