

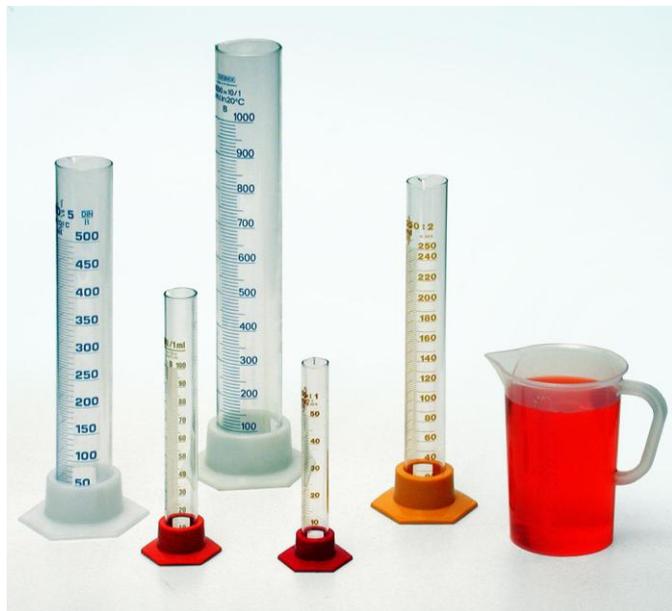
Common properties of bodies

Volume

Determining the volume of liquids

Object of the experiment

1. Determining the volume of a liquid by means of different graduated cylinders

Setup**Apparatus**

1 Measuring cylinder, with plastic base, 100 ml	665 754
1 Measuring cylinder, with plastic base, 250 ml	665 755
1 Measuring cylinder, with plastic base, 500 ml	665 756
1 Measuring cylinder, with plastic base, 1000 ml	665 757
1 Measuring beaker, PP, 2000 ml	604 212
1 Colouring, red, 10 g	309 42

Carrying out the experiment

- Pour 1000 ml of water into the plastic beaker, and add colouring.
- Pour different volumes of coloured water into the graduated cylinders one after another.
- In each case, read the volume of water from the graduated cylinders.
- Draw the students' attention to the liquid's curvature at the edge, which is due to adhesive forces, and give hints for exact reading of the volume of liquid.

Evaluation

The volume of a liquid can be determined by means of a graduated cylinder.

Due to adhesive forces that act between the liquid and the glass wall, not the edge of the liquid, but the centre of the liquid's surface is relevant for reading the volume. It is therefore advantageous to always look at the scale with a view parallel to the liquid's surface.