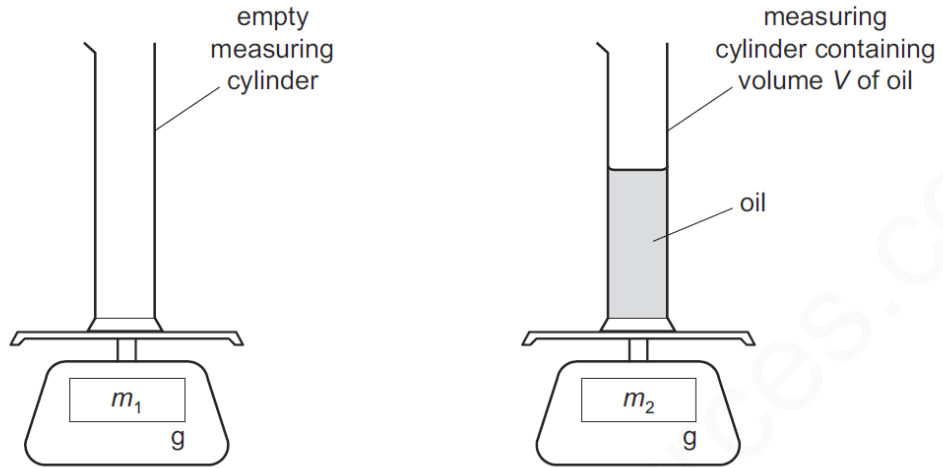


MEASURING DENSITY-SET-4

1 A student uses a measuring cylinder and a balance to find the density of oil. The diagram shows the arrangement used.



Which calculation gives the density of the oil?

- A** $\frac{V}{m_2}$ **B** $\frac{V}{(m_2 - m_1)}$ **C** $\frac{m_2}{V}$ **D** $\frac{(m_2 - m_1)}{V}$

2 The diagrams show an empty container, and the same container filled with liquid.

The empty container has a mass of 120 g. When filled with the liquid, the total mass of the container and the liquid is 600 g.



empty container
120 g



container filled with liquid
600 g

The volume of liquid in the container is 600 cm³.

What is the density of the liquid?

- A** 0.020 g/cm³ **B** 0.80 g/cm³ **C** 1.0 g/cm³ **D** 1.2 g/cm³

3 A liquid has a volume of 0.040 m³ and a mass of 30 000 g.

What is the density of the liquid?

- A** 0.075 kg/m³ **B** 7.5 kg/m³ **C** 750 kg/m³ **D** 7500 kg/m³

4

The diagram shows four blocks of different metals. Each block has a mass of 12 g.

Which metal has the largest density?

