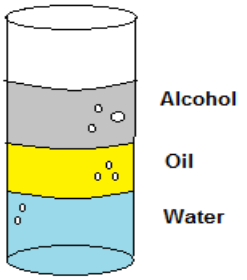
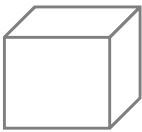


# Density

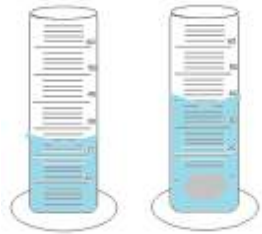
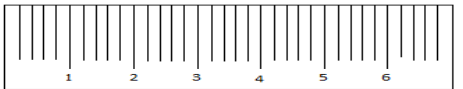


$$D = \frac{m}{V}$$

# Volume

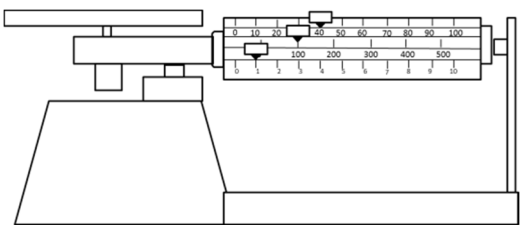


$$V = l \times w \times h$$



final volume - initial volume

# Mass



Mass, Volume & Density Foldable

Directions:

Fold on the solid lines and cut on the dotted lines.

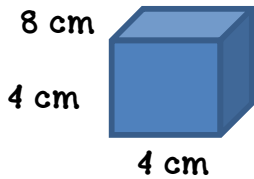
Glue this side of the foldable to your notebook.

$$\text{Density} = \frac{\text{Mass}}{\text{Volume}}$$

A box has a volume of 10 cm<sup>3</sup> and a mass of 25 g. What is the density of the box?

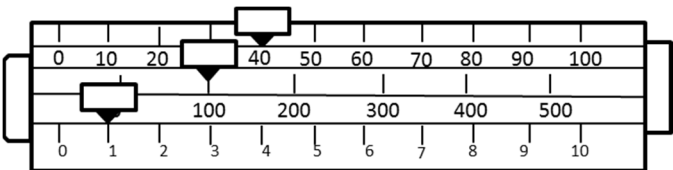
$$\text{Volume} = \text{length} \times \text{width} \times \text{height}$$

What is the volume of the figure?



$$\text{Volume} = \frac{\text{Mass}}{\text{Density}}$$

A block has a mass of 18g and a density of 12g/cm<sup>3</sup>. What is the volume?



What is the mass displayed in grams?

$$\text{Mass} = \text{Volume} \times \text{Density}$$

The density of iron is 7.86g/cm<sup>3</sup>. If I have a container of iron fillings with a volume of 10 cm<sup>3</sup>, what is the mass of the iron?

# Density

Density is (def.) \_\_\_\_\_

Density is measured in (units): \_\_\_\_\_

Buoyancy (*circle one*)

- If an object has a density (greater than/less than) the fluid its in then it will sink.
- If an object has a density (greater than/less than) the fluid its in then it will float.

# Volume

Volume is (def.) \_\_\_\_\_

The volume of liquids and irregular objects are measured using (tool): \_\_\_\_\_

Liquid volume is measured in (units): \_\_\_\_\_

The volume of solid objects is measured in (units): \_\_\_\_\_

*\*A milliliter (mL) is the same volume as one cubic centimeter (1 cm<sup>3</sup>)*

# Mass

Mass is (def.) \_\_\_\_\_

Mass is measured by using (tool): \_\_\_\_\_

Mass is measured in (units): \_\_\_\_\_

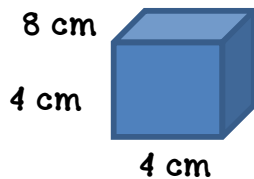
$$\text{Density} = \frac{\text{Mass}}{\text{Volume}}$$

A box has a volume of 10 cm<sup>3</sup> and a mass of 25 g. What is the density of the box?

$$25 / 10 = 2.5 \text{ g} / \text{cm}^3$$

$$\text{Volume} = \text{length} \times \text{width} \times \text{height}$$

What is the volume of the figure?

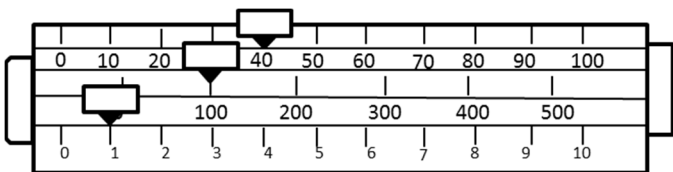


$$8 \text{ cm} \times 4 \text{ cm} \times 4 \text{ cm} = 128 \text{ cm}^3$$

$$\text{Volume} = \frac{\text{Mass}}{\text{Density}}$$

A block has a mass of 18g and a density of 12g/cm<sup>3</sup>. What is the volume?

$$18 \text{ g} / 12 \text{ g/cm}^3 = 1.5 \text{ cm}^3$$



What is the mass displayed in grams?

141 g

$$\text{Mass} = \text{Volume} \times \text{Density}$$

The density of iron is 7.86g/cm<sup>3</sup>. If I have a container of iron fillings with a volume of 10 cm<sup>3</sup>, what is the mass of the iron?

$$7.86 \text{ g/cm}^3 \times 10 \text{ cm}^3 = 78.6 \text{ g}$$

# Density

Density is (def.) The amount of matter in a given space or volume

Density is measured in

(units): g/mL or g/cm<sup>3</sup>

Buoyancy (*circle one*)

- If an object has a density (greater than/less than) the fluid its in then it will sink.
- If an object has a density (greater than/less than) the fluid its in then it will float.

Volume is (def.) The amount of space an object takes up

The volume of liquids and

irregular objects are measured using (tool): Graduated cylinder

Liquid volume is measured in

(units): Liters (L) or milliliters (mL)

The volume of solid objects is

measured in (units): \_\_\_\_\_

cubic centimeters cm<sup>3</sup>

\*A milliliter (mL) is the same volume as one cubic centimeter (1 cm<sup>3</sup>)

# Volume

Mass is (def.) The amount of matter in an object

Mass is measured by using

(tool): Triple beam balance or electronic balance

Mass is measured in (units):

grams (g) kilograms (kg)

# Mass