

Perimeter Area and Volume – Revision Notes

Perimeter is a length – one dimension – units are cm. metres feet etc..

You find perimeters by adding lengths together – no multiplying.

Area is length^2 – two dimensions – units are cm.² metres² feet² etc..

You find areas by multiplying two lengths together.

Volume is length^3 – three dimensions – units are cm.³ metres³ feet³

You find volumes by multiplying three lengths together.

Formulae

Property	Calculate	Dimensions	Typical Units
Perimeter Rectangle	$2 \times (\text{length} + \text{width})$	length	metres
Area Rectangle	$\text{length} \times \text{width}$	length^2	square metres
Area Parallelogram	$\text{base} \times \text{height}$	length^2	square metres
Area Triangle	$\frac{1}{2} \text{ base} \times \text{height}$	length^2	square metres
Area Trapezium	$\frac{1}{2} (a + b) \times \text{height}$ or average sides $\times$ height	length^2	square metres
Circumference Circle	$\pi \times \text{diameter}$ $2 \times \pi \times \text{radius}$	length	metres
Area Circle	$\pi \times \text{radius}^2$	length^2	square metres
Volume cuboid	$\text{length} \times \text{width} \times \text{height}$	length^3	cubic metres
Volume prism (eg cylinder)	$\text{area base} \times \text{length}$	length^3	cubic metres

The value of pi is approximately 3.14 or $\frac{22}{7}$



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