

## List of formulas

Area,  $A$ , of triangle, base  $b$ , height  $h$ . 
$$A = \frac{1}{2}bh$$

Area,  $A$ , of circle of radius  $r$ . 
$$A = \pi r^2$$

Circumference,  $C$ , of circle of radius  $r$ . 
$$C = 2\pi r$$

Curved surface area,  $A$ , of cylinder of radius  $r$ , height  $h$ . 
$$A = 2\pi rh$$

Curved surface area,  $A$ , of cone of radius  $r$ , sloping edge  $l$ . 
$$A = \pi rl$$

Surface area,  $A$ , of sphere of radius  $r$ . 
$$A = 4\pi r^2$$

Volume,  $V$ , of prism, cross-sectional area  $A$ , length  $l$ . 
$$V = Al$$

Volume,  $V$ , of pyramid, base area  $A$ , height  $h$ . 
$$V = \frac{1}{3}Ah$$

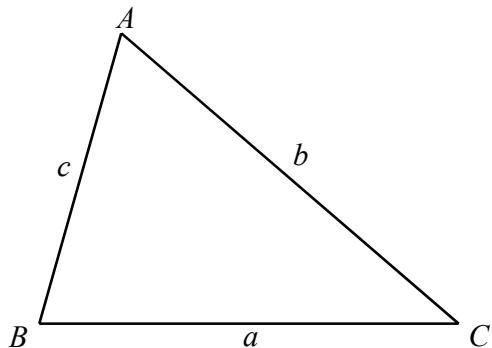
Volume,  $V$ , of cylinder of radius  $r$ , height  $h$ . 
$$V = \pi r^2 h$$

Volume,  $V$ , of cone of radius  $r$ , height  $h$ . 
$$V = \frac{1}{3}\pi r^2 h$$

Volume,  $V$ , of sphere of radius  $r$ . 
$$V = \frac{4}{3}\pi r^3$$

For the equation 
$$ax^2 + bx + c = 0$$
, where  $a \neq 0$ , 
$$x = \frac{-b \pm \sqrt{b^2 - 4ac}}{2a}$$

For the triangle shown,



$$\frac{a}{\sin A} = \frac{b}{\sin B} = \frac{c}{\sin C}$$

$$a^2 = b^2 + c^2 - 2bc \cos A$$

$$\text{Area} = \frac{1}{2}ab \sin C$$