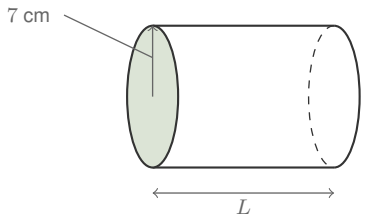
Write the formula forwards, put the numbers in, and solve. Use the π key unless a question says otherwise. Give answers to one decimal place where they are not exact.

1 A prism has volume 84 cm^3 and length 7 cm. Find the area of its cross-section.

(2)

(2 marks)

2 A cylinder has volume 1540 cm^3 and radius 7 cm. Find its length. Take $\pi = \frac{22}{7}$.



(a) Write the formula with the numbers in (2)

(b) Simplify the right-hand side (1)

(c) Solve for L (1)

(4 marks)

3 A cylindrical tin has volume 500 cm^3 and height 10 cm. Find its radius.

(a) Write the formula with the numbers in (1)

(b) Divide by 10, then by π (2)

(c) Take the square root (1)

(4 marks)

4 A triangular prism has volume 360 cm^3. Its cross-section is a triangle with base 12 cm.

(a) The prism is 10 cm long. Find the area of the cross-section (1)

(b) **Find the perpendicular height of the triangle.** (3)

(4 marks)