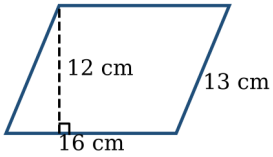
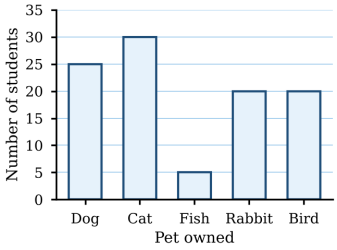
Day 169 **B Tier 10-a-day**

1 Here is a parallelogram.
Work out the area of the parallelogram.
The diagram is not drawn accurately.



2 The bar chart shows some information.
(a) Write down the mode.
(b) What fraction of the total is Cat? Give your answer in its simplest form.



3 Leah is n years old.
Leah's sister is 6 years older.
Leah's father is 5 times as old as Leah.
(a) Write an expression, in terms of n, for the age of Leah's sister.
(b) Write an expression, in terms of n, for the sum of the ages of all three people. Give your answer in its simplest form.

4 Find the (a) highest common factor (HCF), (b) lowest common multiple (LCM) of 12 and 14.

5 A rectangle has length (4x + 3) m and width (3x + 1) m.
The perimeter of the rectangle is 92 m.
(a) Work out the value of x.
(b) Work out the area of the rectangle.

Day 169	B Tier 10-a-day
6 y is directly proportional to x. When x = 12, y = 72. Find the value of x when y = 120.	
7 In a sale, the price of a sofa is reduced by 50%. (Calculator) Two weeks later it is reduced by a further 25% of the new price. The final price is £37.50. Work out the original price of the sofa.	
8 The circumference of a circle is 89 m. (Calculator) Work out the diameter of the circle. Give your answer correct to 1 decimal place.	
9 The four angles of a quadrilateral are x°, (x + 23)°, 2x° and (2x + 7)°. Work out the size of the largest angle.	
10 A cyclist travels at 60 km/h for 1.5 hours and then at 72 km/h for 2.5 hours. Work out its average speed for the whole journey.	