Starter

1. Find

   a. $^{7}/_{12} + 1^{3}/_{7}$

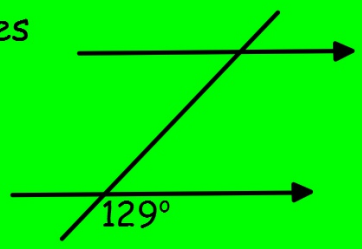
   b. $2^{1}/_{3} \times 4^{2}/_{7}$

2. Solve

   a. $5(2x + 1) = 3(x + 4)$

   b. $6 - 3(3x + 1) + 2(x - 4) = 0$

3. Fill in the missing angles



4. Two shops offer a discount on the same model of TV:

   Shop A offers 15% off the original price of £750

   Shop B offers 20% off the original price of £820

   Which shop offers the better deal?

Starter

1. Express the following numbers in scientific notation

   a. 0.0068 b. 156000 c. 0.00003009

2. Find

   a. $2\frac{3}{4} - 1\frac{1}{5}$ b. $5\frac{2}{5} \div 1\frac{3}{10}$

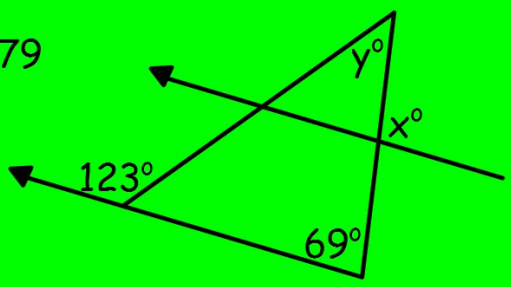
3. Jackie played a computer game three times and scored a total of 130 points. Her second score was 9 better than her first score, and her third score was 5 less than her first score.
   What did she score in each game?

4. Katy bought a bike for £90 and then sold it one year later for £50. Express her loss as a percentage of the original price.

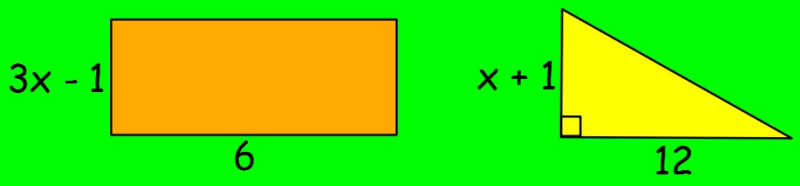
Starter

1. Round the following to 3 s.f.
   a. 675907 b. 0.0060879

2. Find angles x° and y°



3. The area of the rectangle is equal to the area of the triangle.
   Find x.



4. The Smiths bought their family home for £250,000.
   The house then appreciated in value by 3% each year.
   How much was it worth two years later?

Starter

1. Express the following in number form
   a. 3.6×10^{-4} b. 1.087×10^{5}

2. Solve
   a. $10(x + 3) - 5(x - 4) = 20$ b. $2p(2p - 3) - 4(p^2 - 1) = 0$

3. The Ocean Princess cruise liner left Antigua and sailed to Barbados on a bearing of 210°.
   What bearing should it then take to return to Antigua?

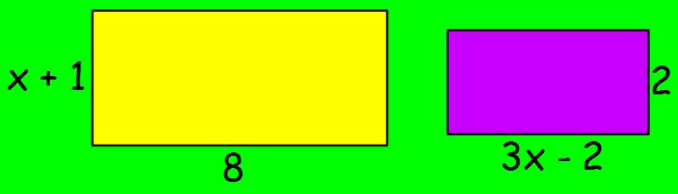
4. Liam invested £300 in an account which offered 4% interest p.a.
   a. Calculate how much money was in Liam's account 3 years later.
   b. How much compound interest had Liam earned?

Starter

1. Calculate
   a. 7.25 x 200 b. 864 ÷ 4000

2. Hazel is making mortar by mixing sand and cement in the ratio 7:2.
   She has 77 kg of sand and 24 kg of cement.
   What is the maximum amount of mortar she can make?

3. The area of the yellow rectangle is **twice** the area of the purple rectangle.
   Find x.



4. Eilidh scored $^{19}/_{25}$ in her English test and $^{24}/_{30}$ in her Maths test.
   In which subject did she score highest?