

Mathematics

Representing Ratio

Lesson 1 of 4

Downloadable Resource

Miss Kidd-Rossiter



Try this

Antoni, Binh, Cala and Xavier are drawing rectangles.

The side lengths of my rectangles are in the ratio $5 : 2$.

Antoni

The side lengths of my rectangles are in the ratio $6 : 2$.

Binh

The shorter side of my rectangles are $\frac{1}{3}$ of the length of the longer sides.

Cala

The longer side of my rectangles are $2\frac{1}{3}$ times the length of the shorter sides.

Xavier

Draw an example rectangle for each student.

How could you compare the rectangles they have drawn?



Connect

The side lengths
of my rectangle
are in the ratio
 $5 : 2$.

Antoni

The side lengths
of my rectangle
are in the ratio
 $6 : 2$.

Binh



Connect

The side lengths of my rectangle are in the ratio 6 : 2.

Binh

The shorter side of my rectangle is $\frac{1}{3}$ of the length of the longer side.

Cala



Connect

The side lengths of my rectangle are in the ratio 6 : 2.

Binh

The longer side of my rectangle is $2\frac{1}{3}$ times the length of the shorter side.

Xavier



Independent task

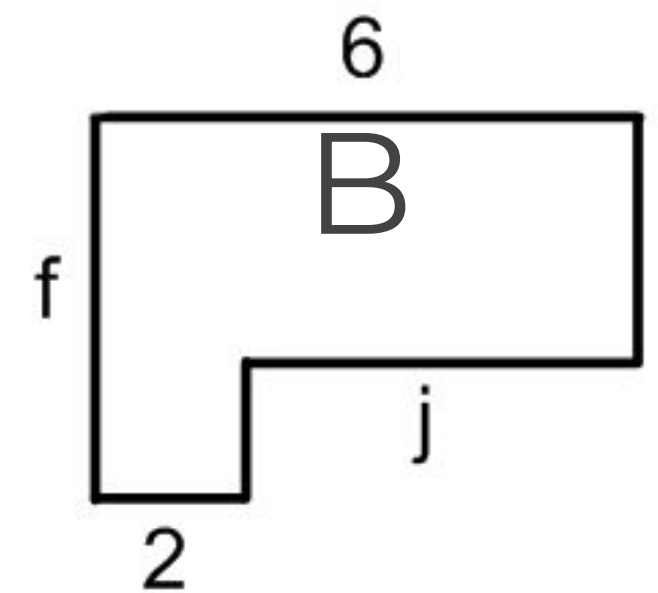
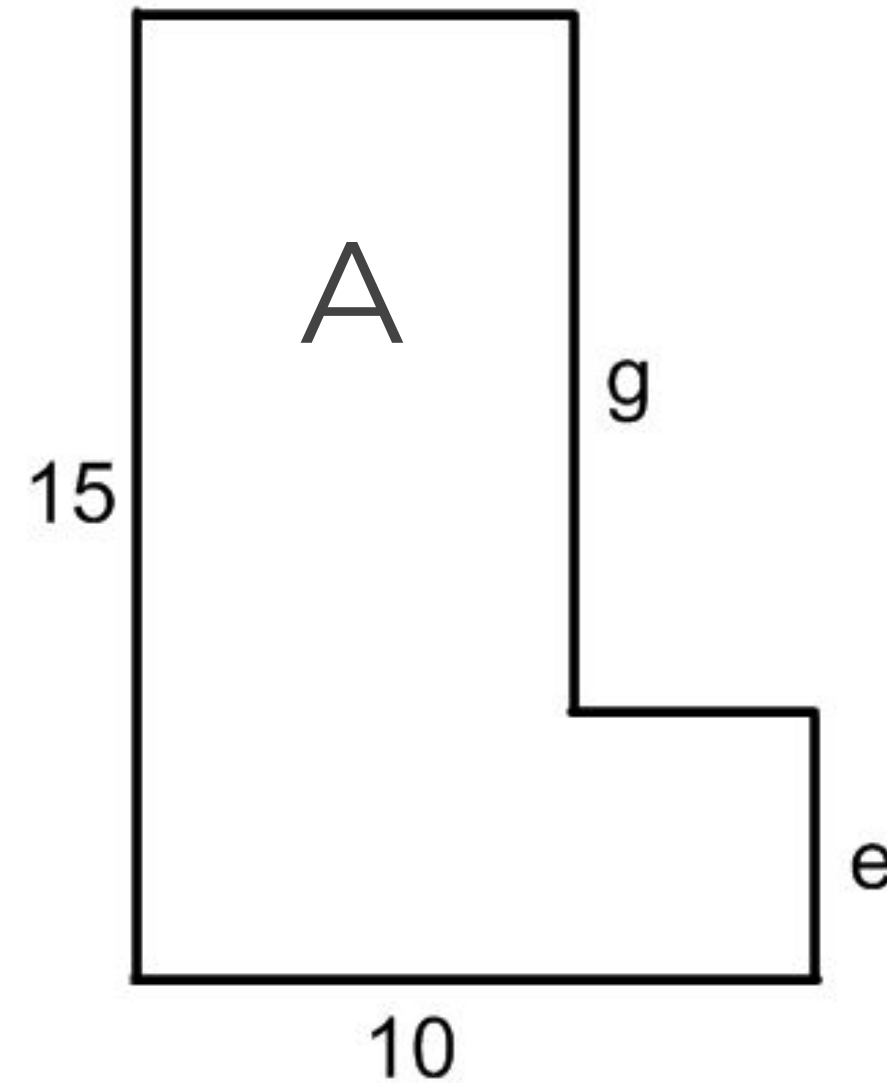
1. Side lengths of a triangle are in the ratio $3 : 5 : 2$. What fraction of the perimeter is the longest side?
2. Side lengths of a triangle are in the ratio $3 : 5 : 2$. What fraction of the longest side is the shortest side?
3. Side lengths of a triangle are in the ratio $3 : 5 : 2$. What fraction of the shortest side is the longest side?



Independent task

4. These side lengths of shape A and the side lengths of shape B are in the ratio 5 : 2.

Find the missing sides.



Independent task

5. Rectangles are drawn so that the ratio of their side lengths is 4 : 3. Copy and complete the table.

Longer side	Shorter side	Perimeter
8 m		
	15 m	
10 m		
		56 m



Explore

Yasmin and Zaki each draw a triangle with an angle of 30° .

Can they draw triangles that meet the following conditions so that their side lengths are in the same ratio, but are not identical?

1. They are both right angled triangles.
2. They have the same area.
3. They have the same perimeter.

