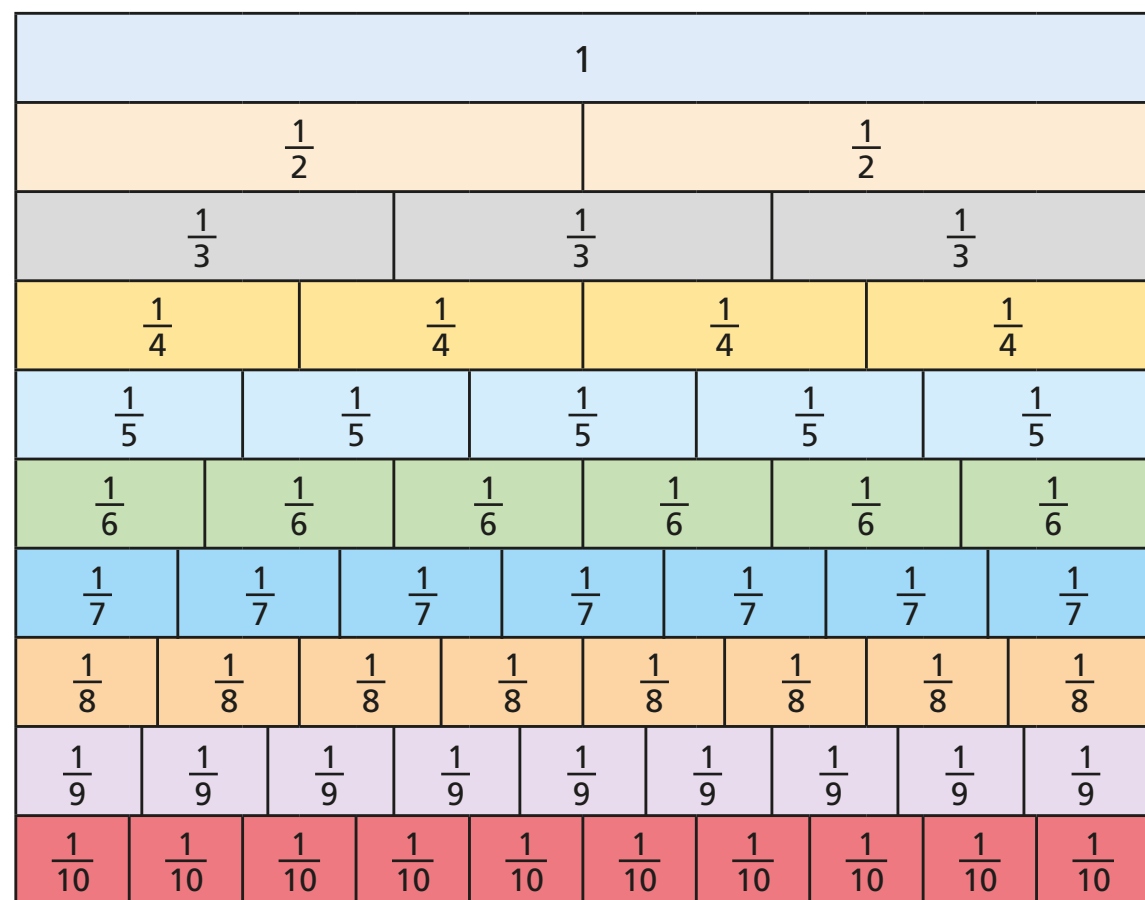


Simplify fractions

1



Use the fraction wall to write each fraction in its simplest form.

a) $\frac{4}{6} = \boxed{}$

c) $\frac{6}{8} = \boxed{}$

b) $\frac{8}{10} = \boxed{}$

d) $\frac{4}{8} = \boxed{}$

2

a) Use a fraction wall to explain why $\frac{7}{10}$ does not simplify.

b) Find three more fractions on the fraction wall that cannot be simplified.

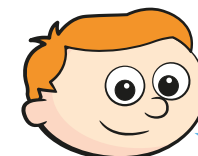
3

Mo, Eva and Ron are trying to simplify $\frac{5}{20}$



Mo

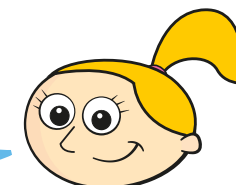
I can't simplify this because one number is odd and the other is even.



Ron

I can simplify any fraction.

I can't simplify this because only one number can be halved.



Eva

Do you fully agree, partly agree or completely disagree with each person?

Talk to a partner.

- 4 a) Draw lines on the bar model to show that $\frac{9}{12}$ is equal to $\frac{3}{4}$

- b) Complete each bar model and calculation.

= $\frac{3}{9}$

= $\frac{5}{15}$

- 5 Simplify the fractions.

a) $\frac{4}{12} = $ <div style="border: 1px solid black; width: 20px; height: 20px; display: inline-block;"></div>	b) $\frac{8}{12} = $ <div style="border: 1px solid black; width: 20px; height: 20px; display: inline-block;"></div>	c) $\frac{40}{120} = $ <div style="border: 1px solid black; width: 20px; height: 20px; display: inline-block;"></div>	d) $\frac{12}{4} = $ <div style="border: 1px solid black; width: 20px; height: 20px; display: inline-block;"></div>
$\frac{4}{16} = $ <div style="border: 1px solid black; width: 20px; height: 20px; display: inline-block;"></div>	$\frac{8}{16} = $ <div style="border: 1px solid black; width: 20px; height: 20px; display: inline-block;"></div>	$\frac{40}{160} = $ <div style="border: 1px solid black; width: 20px; height: 20px; display: inline-block;"></div>	$\frac{120}{4} = $ <div style="border: 1px solid black; width: 20px; height: 20px; display: inline-block;"></div>
$\frac{4}{20} = $ <div style="border: 1px solid black; width: 20px; height: 20px; display: inline-block;"></div>	$\frac{8}{20} = $ <div style="border: 1px solid black; width: 20px; height: 20px; display: inline-block;"></div>	$\frac{40}{200} = $ <div style="border: 1px solid black; width: 20px; height: 20px; display: inline-block;"></div>	$\frac{12}{400} = $ <div style="border: 1px solid black; width: 20px; height: 20px; display: inline-block;"></div>

Describe and explain any patterns that you noticed.



- 6 Write 3 fractions that simplify to $\frac{3}{5}$

- 7 Teddy and Dora are both simplifying $\frac{30}{42}$

Teddy

$$\frac{30}{42} = \frac{15}{21} = \frac{5}{7}$$

Dora

$$\frac{30}{42} = \frac{5}{7}$$

- a) How do you think Dora was able to simplify the fraction in one step?
- b) Simplify these fractions in one step.

$\frac{24}{30} =$

$\frac{16}{20} =$

$\frac{56}{64} =$

$\frac{99}{121} =$

- 8 is a prime number. is a multiple of 10

The fraction can be simplified.

What could each number be? Explain your reasoning.
