Y4 Fractions Decimals

KS2 Y4 Maths · Follows the national curriculum

Name _____ Class _____ Date _____

1. Worked example

Use a diagram to show that 1/2 = 2/4 = 4/8.

Step 1 · Shade half of a bar

1 of 2 equal parts

Step 2 · Split each half into 2

Now 2 of 4 parts are shaded

Step 3 · Split each quarter into 2

Now 4 of 8 parts are shaded

Answer: 1/2 = 2/4 = 4/8

Check: The shaded length never changed, only the number of pieces ✓

2. Now try one with the steps

Find the missing number: 3/4 = ☐/8

Step 1 · How did 4 become 8?

Step 2 · Do the same to the numerator

Answer:

3. Practice

Have a go at each one. There is space underneath to work it out.

1. Fill the gap: 1/2 = ☐/4

2. Fill the gap: 1/2 = ☐/10

3. Fill the gap: 1/4 = ☐/8

4. Fill the gap: 3/4 = ☐/8

5. Fill the gap: 1/3 = ☐/6

6. Fill the gap: 2/3 = ☐/9

7. Fill the gap: 1/5 = 2/☐

8. Write the next two fractions in the family: 1/4, 2/8, 3/12, __, __

9. Fill the gap: 3/5 = ☐/20

10. Fill the gap: 4/8 = 1/☐

11. Fill the gap: 6/10 = ☐/5

12. Which is not equal to 1/2: 3/6, 5/10, 4/9, 6/12?

13. Nia ate 2/8 of a pizza. Ali ate 1/4 of an identical pizza. Who ate more?

14. Fill the gap: 3/4 = 9/☐

4. Before you hand it in

1/2 = 2/3 because you add 1 to the top and the bottom.
Multiply (or divide) the numerator and denominator by the same number: 1/2 = 2/4. Check with a diagram: 2/3 is more than half.

3/4 = 6/4.
Whatever you do to the numerator, do to the denominator: 3/4 = 6/8.

Thinking 4/8 is bigger than 1/2 because 4 and 8 are bigger numbers.

Draw them. 4/8 and 1/2 shade the same amount: they are equivalent.

Drawing parts of different sizes when showing eighths.

Equivalent fractions only work with equal parts. Split each part into the same number of equal pieces.