Divide Decimals Using an Algorithm

Divide with decimals by making the divisor a whole number first.

Name _____ **Date** _____

Tonight's spark

A coach has 18.9 liters of sports drink. Each cooler holds 6.3 liters. How many coolers can she fill?

Make a guess first: more than 5 coolers, or fewer?

Before the slide	After the slide
6.3 divisor	63 divisor
18.9 dividend	189 dividend

Our class model: slide both points the same way

Try it

Work it out on paper. Write one answer on each line.

1 **What is 8.4 ÷ 2?**

A. 4.2 **B.** 42 **C.** 0.42 **D.** 6.4

My answer _____

2 **To make the divisor in 5.2 ÷ 0.4 a whole number, what should you do?**

A. Move only the divisor's point 1 place to the right

B. Move both decimal points 1 place to the right

C. Move both decimal points 1 place to the left

D. Move both decimal points 2 places to the right

My answer _____

3 **Which problem has the same answer as 4.5 ÷ 0.9?**

A. 4.5 ÷ 9 **B.** 45 ÷ 0.9 **C.** 45 ÷ 9 **D.** 0.45 ÷ 9

My answer _____

4 **What is 6.4 ÷ 1.6?**

A. 40 **B.** 0.4 **C.** 10 **D.** 4

My answer _____

5 **What is 12.6 ÷ 0.6?**

A. 2.1 **B.** 21 **C.** 210 **D.** 20

My answer _____

6 **A rope is 7.2 meters long. It is cut into pieces that are each 0.9 meters long. How many pieces are there?**

A. 8 **B.** 80 **C.** 0.8 **D.** 6.3

My answer _____

Talk about it

Did both numbers get the same change? What happens to the answer if only one changes?

Home mission

Ask: how many 6.3s fit in 18.9? Slide both points one place right. Can your student say how many 63s fit in 189?

If we get stuck, ask

- How many places do we move the point to make the divisor a whole number?
- Did we move the point the same way in both numbers?
- Let's multiply our answer by the divisor. Do we get the original number?

Do it on a screen

Scan or type the link. Same lesson, with hints.

eduwonderlab.com/lessons/2-7/homework.html

How did it feel? (optional)

Tricky Getting there Got it