

# Dividing Decimals by Decimals

Grade 5 Math • Section 7.5

Name: \_\_\_\_\_

Date: \_\_\_\_\_

Score: \_\_\_\_\_ / 17

## Quick Review and Helpful Hints

**Steps:** (1) Move the decimal in the **divisor** to make it a whole number. (2) Move the decimal in the **dividend** the same number of places. (3) Divide normally.

**Lightbulb:**  $6.3 \div 0.9$ : move both decimals 1 place right  $\rightarrow 63 \div 9 = 7$ .

**Warning:** You must move the decimal the **same** number of places in both the divisor and the dividend.

**Example:** Find  $3.78 \div 0.6$ .

**Steps:** Move the decimal 1 place right in both:  $37.8 \div 6 = 6.3$ .

**Answer:** 6.3

## Practice Problems

Divide.

- |                            |                              |                              |
|----------------------------|------------------------------|------------------------------|
| 1. $4.5 \div 0.9 =$ _____  | 6. $12.6 \div 0.06 =$ _____  | 11. $15.5 \div 0.5 =$ _____  |
| 2. $7.2 \div 0.8 =$ _____  | 7. $0.48 \div 0.4 =$ _____   | 12. $2.88 \div 0.12 =$ _____ |
| 3. $3.6 \div 0.12 =$ _____ | 8. $9.36 \div 1.2 =$ _____   | 13. $4.86 \div 0.6 =$ _____  |
| 4. $8.1 \div 0.3 =$ _____  | 9. $6.25 \div 0.25 =$ _____  | 14. $10.5 \div 0.35 =$ _____ |
| 5. $5.04 \div 0.7 =$ _____ | 10. $0.72 \div 0.08 =$ _____ | 15. $0.96 \div 0.04 =$ _____ |

## Word Problems

16. A piece of wire is 8.4 meters long. It is cut into pieces each 0.6 meters long. How many pieces are there? \_\_\_\_\_

17. A car travels 14.4 miles using 0.8 gallons of gas. How many miles per gallon does it get? \_\_\_\_\_



## Answer Keys

- |        |         |
|--------|---------|
| 1. 5   | 10. 9   |
| 2. 9   | 11. 31  |
| 3. 30  | 12. 24  |
| 4. 27  | 13. 8.1 |
| 5. 7.2 | 14. 30  |
| 6. 210 | 15. 24  |
| 7. 1.2 | 16. 14  |
| 8. 7.8 | 17. 18  |
| 9. 25  |         |

### Step-by-Step Explanations

1. Start with the main idea. For dividing decimals by decimals, line up the decimal values and compute  $4.5 \div 0.9 = 5$ . Write the given information first, then choose the operation that matches the situation.
2. Keep the work tidy. For dividing decimals by decimals, line up the decimal values and compute  $7.2 \div 0.8 = 9$ . A quick estimate helps confirm that the final answer is reasonable.
3. Look at what the numbers mean. For dividing decimals by decimals, line up the decimal values and compute  $3.6 \div 0.12 = 30$ . The explanation should show both the computation and why that computation fits the problem.
4. Use the setup first. For dividing decimals by decimals, line up the decimal values and compute  $8.1 \div 0.3 = 27$ . Write the given information first, then choose the operation that matches the situation.
5. Check the size of the answer. For dividing decimals by decimals, line up the decimal values and compute  $5.04 \div 0.7 = 7.2$ . A quick estimate helps confirm that the final answer is reasonable.
6. Match the operation to the words. For dividing decimals by decimals, line up the decimal values and compute  $12.6 \div 0.06 = 210$ . The explanation should show both the computation and why that computation fits the problem.
7. Write the important values first. For dividing decimals by decimals, line up the decimal values and compute  $0.48 \div 0.4 = 1.2$ . Write the given information first, then choose the operation that matches the situation.
8. Follow the pattern carefully. For dividing decimals by decimals, line up the decimal values and compute  $9.36 \div 1.2 = 7.8$ . A quick estimate helps confirm that the final answer is reasonable.
9. Start with the main idea. For dividing decimals by decimals, line up the decimal values and compute  $6.25 \div 0.25 = 25$ . The explanation should show both

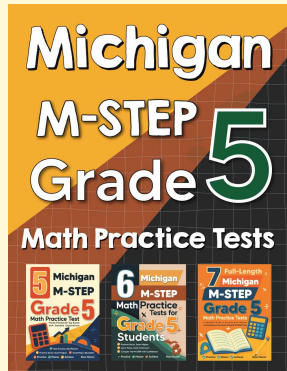
the computation and why that computation fits the problem.

10. Keep the work tidy. For dividing decimals by decimals, line up the decimal values and compute  $0.72 \div 0.08 = 9$ . Write the given information first, then choose the operation that matches the situation.
11. Look at what the numbers mean. For dividing decimals by decimals, line up the decimal values and compute  $15.5 \div 0.5 = 31$ . A quick estimate helps confirm that the final answer is reasonable.
12. Use the setup first. For dividing decimals by decimals, line up the decimal values and compute  $2.88 \div 0.12 = 24$ . The explanation should show both the computation and why that computation fits the problem.
13. Check the size of the answer. For dividing decimals by decimals, line up the decimal values and compute  $4.86 \div 0.6 = 8.1$ . Write the given information first, then choose the operation that matches the situation.
14. Match the operation to the words. For dividing decimals by decimals, line up the decimal values and compute  $10.5 \div 0.35 = 30$ . A quick estimate helps confirm that the final answer is reasonable.
15. Write the important values first. For dividing decimals by decimals, line up the decimal values and compute  $0.96 \div 0.04 = 24$ . The explanation should show both the computation and why that computation fits the problem.
16. Follow the pattern carefully. For dividing decimals by decimals, divide total length by piece length:  $8.4 \div 0.6 = 14$ . Write the given information first, then choose the operation that matches the situation.
17. Start with the main idea. For dividing decimals by decimals, miles per gallon is  $14.4 \div 0.8 = 18$ . A quick estimate helps confirm that the final answer is reasonable.



# Want Even More Practice?

Check Out Our Other Michigan M-STEP Test Books!



## Michigan M-STEP Grade 5 Math Preparation Bundle

18 full-length practice tests across three books  
(5 + 6 + 7)

No repeated questions—maximum practice value!



**18 Tests!**  
**3 Books**  
**One Bundle**

**Important:** All our test books contain **unique, completely different tests** from each other! Each book offers fresh practice questions—no repeats!

### 5 Practice Tests

- ✓ 5 complete practice tests with detailed explanations
- ✓ Perfect foundation for M-STEP test preparation
- ✓ Builds confidence and test-taking skills
- ✓ High-quality questions aligned with state standards

**Start your practice journey!**

### 6 Practice Tests

- ✓ 6 complete practice tests with detailed explanations
- ✓ **Unique tests**—different from the 5 tests book
- ✓ Perfect for more practice after mastering 5 tests
- ✓ Builds even more confidence and test-taking skills
- ✓ Same high-quality questions aligned with standards

**Take your practice to the next level!**

### 7 Practice Tests

- ✓ 7 complete practice tests for maximum preparation
- ✓ **Unique tests**—different from 5 and 6 tests books
- ✓ The most comprehensive practice for Grade 5
- ✓ Ideal for students aiming for top scores
- ✓ Extensive practice builds mastery and confidence

**Go all the way with comprehensive practice!**