

Lesson 2.5 Multiplying Decimals p.86-88

Concept review:

- **Place Value**

KEY IDEA

Multiplying Decimals by Whole

Numbers:

1. Multiply as you would w/ whole #'s.
2. Count the total number of decimal places in the decimal factor.
3. The product has the same number of decimal places.

Examples 1-

Multiplying Decimals w/ Whole #'s

1. Estimate and then multiply.
2. Count decimal places in decimal factor.
3. Move total # of decimal places (right to left) in product.

Example 2-

Use Mental Math

1. Method 1: Multiply by multiple of 10
2. Method 2: Mental math - multiplying by the power of 10 (*hint: # of zero = # of spaces decimal moves to the right*)

On Your Own: p.86, #1-5

KEY IDEA

Multiplying Decimals by Decimals:

Example 3- Multiplying Decimals

1. Multiply/ Count the total number of decimal places in the decimal factors.
2. The product has the same number of decimal places (move pt. right to left)

On Your Own: p.87, #6-9

Example 4-

Evaluating and Expression

(*hint: Order of Operations!*)

What is the value of $2.44(4.5-3.175)=?$

Example 5-

Real-Life Application

You buy 2.75 lbs of tomatoes. You hand the cashier a \$10 bill. How much change will you receive?

- Tomatoes - \$1.89 lb.
- Grapes - \$1.99 lb.
- Bananas - \$0.49 lb.

Step 1: Find the cost of the tomatoes. Multiply 1.89 by 2.75
Step 2: Subtract the result from Step 1 from \$10.00