

Name: _____

6.5 Ratios for Distance, Rate, and Time

Step One: Study the Example

$$\text{DISTANCE} = \text{RATE} \times \text{TIME}$$

Example: Keanu rides his bike 12 miles per hour. How far does he ride in 2 hours?

$$\text{distance} = 12 \text{ mph} \times 2 \text{ hours}$$

Step Two: Find the rate and the time for the following:

1. How far will a seal travel if it is swimming at a speed of 8 miles per hour to for 6.5 minutes?

Rate:

Time:

2. A dragonfly traveled at a rate of 35 miles per hour for 2.5 hours. What distance did the dragonfly travel?

Rate:

Time:

3. A cyclist travels at a rate of 1.8 kilometers per minute. How far will the cyclist travel in 48 minutes?

Rate:

Time:

4. Kim drives 9 miles in 12 minutes. How far can she go in 20 minutes?

Rate:

Time:

Step Three: Mixing it Up

In each of the problems below, you know two of three things. You will answer two of the three questions.

<p>1. A race car travels 1,212 kilometers in 4 hours. What is the car's rate of speed?</p> <p>Rate:</p> <p>Time:</p> <p>Distance:</p>	<p>2. Mark cycled 25 miles at a rate of 10 miles per hours. How long did it take Mark to cycle 25 miles?</p> <p>Rate:</p> <p>Time:</p> <p>Distance:</p>
<p>3. A machine produces 16 toys per hours. How many hours does it take the machine to make 176 toys?</p> <p>Rate:</p> <p>Time:</p> <p>Number of toys:</p>	<p>4. How long will it take a jet airliner to travel 310 kilometers at a speed of 930 kilometers per hour?</p> <p>Rate:</p> <p>Time:</p> <p>Distance:</p>

Step Four: Find the answers

Solve the problems above

Use the formula $r = d \times t$

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<p>3. A machine produces 16 toys per hours. How many hours does it take the machine to make 176 toys?</p>	<p>4. How long will it take a jet airliner to travel 310 kilometers at a speed of 930 kilometers per hour?</p>

