

Rate It Right

Find the amount for one unit.

GRADE 6 • NY-6.RP.3.b

NY-6.RP.3.b "Solve unit rate problems."

NAME _____

DATE _____

THE BIG IDEA

To find a unit rate, divide the total amount by the number of units. The result tells you the amount for 1 unit, so include the unit label in your answer.

WORKED EXAMPLE

A jogger travels 44 kilometers in 4 hours. What is the jogger's speed in kilometers per hour?

1. Write the rate as 44 kilometers / 4 hours.
2. Divide: $44 / 4 = 11$.
3. Use the unit label kilometers per hour.

Answer: 11 kilometers per hour

PRACTICE 6 problems

- 1** Thirty pencils are packed equally into 6 boxes. How many pencils are in 1 box?

ANSWER _____

- 2** A set of 3 notebooks costs \$18. What is the cost of 1 notebook?

ANSWER _____

- 3** A printer makes 56 pages in 8 minutes. At this rate, how many pages does it print per minute?

ANSWER _____

- 4** A recipe uses $\frac{3}{5}$ cup of yogurt to make 2 smoothies. How many cups of yogurt are used per smoothie?

ANSWER _____

- 5** Fifteen dollars buys 5 pounds of oranges. What is the cost per pound?

ANSWER _____

- 6** A car uses 3 gallons of gas to travel 72 miles. What is the car's mileage in miles per gallon?

ANSWER _____

APPLY IT Show your work

- 1** A music app uses 45 MB of data to download 5 songs at the same quality. How many MB does it use per song? How many MB will it use to download 8 songs?

WORK SPACE

ANSWER _____

- 2** A bike-share pass costs \$21 for 3 hours. The cost stays the same per hour. What does a 7-hour pass cost?

WORK SPACE

ANSWER _____

CHALLENGE One step up

Snack Stand A sells 18 bottles of water for \$12. Snack Stand B sells 24 bottles of water for \$18. Which stand has the lower price per bottle? Explain by finding both unit prices and telling how much lower the better price is per bottle.

WORK SPACE AND ANSWER

PART 1 • PRACTICE

#	PROBLEM	ANSWER
1	Thirty pencils are packed equally into 6 boxes. How many pencils are in 1 box?	5 pencils per box
2	A set of 3 notebooks costs \$18. What is the cost of 1 notebook?	\$6 per notebook
3	A printer makes 56 pages in 8 minutes. At this rate, how many pages does it print per minute?	7 pages per minute
4	A recipe uses $\frac{3}{5}$ cup of yogurt to make 2 smoothies. How many cups of yogurt are used per smoothie?	$\frac{3}{10}$ cup per smoothie
5	Fifteen dollars buys 5 pounds of oranges. What is the cost per pound?	\$3 per pound
6	A car uses 3 gallons of gas to travel 72 miles. What is the car's mileage in miles per gallon?	24 miles per gallon

PART 2 • APPLY IT

- 9 MB per song; 72 MB for 8 songs** Divide 45 by 5 to find 9 MB per song. Multiply 9 by 8 to find 72 MB.
- \$49** Divide \$21 by 3 to get \$7 per hour. Multiply \$7 by 7 hours.

CHALLENGE

Stand A has the lower price. Stand A: $\$12 / 18 = \$2/3$ per bottle. Stand B: $\$18 / 24 = \$3/4$ per bottle. Stand A is $\$1/12$ less per bottle.

Accept equivalent fraction or decimal forms when exact, including $\frac{3}{10}$ cup as 0.3 cup. Require a unit label for each unit-rate answer.