

LESSON

2

Proportional Relationships**Problem Solving: Identifying and Writing Proportions**

Write the correct answer.

- Jeremy earns \$234 for 36 hours of work. Miguel earns \$288 for 40 hours of work. Are the pay rates of these two people proportional? Explain.

- Marnie bought two picture frames. One is 5 inches by 8 inches. The other is 15 inches by 24 inches. Are the ratios of length to width proportional for these frames? Explain.

- The ratio of adults to children at a picnic is 4 to 5. The total number of people at the picnic is between 20 and 30. Write an equivalent ratio to find how many adults and children are at the picnic.

- A recipe for fruit punch calls for 2 cups of pineapple juice for every 3 cups of orange juice. Write an equivalent ratio to find how many cups of pineapple juice should be used with 12 cups of orange juice.

Choose the letter for the best answer.

- A clothing store stocks 5 blouses for every 3 pairs of pants. Which ratio is proportional for the number of pairs of pants to blouses?
A 15:9 C 12:20
B 3:8 D 18:25
- To make lemonade, you can mix 4 teaspoons of lemonade powder with 16 ounces of water. What is the ratio of powder to water?
F 4:32 H 24:64
G 32:8 J 32:128
- The town library is open 4 days per week. Suppose you use the ratio of days open to days in a week to find the number of days open in 5 weeks. What proportion could you write?
A $\frac{4}{7} = \frac{20}{25}$ C $\frac{4}{7} = \frac{20}{28}$
B $\frac{7}{4} = \frac{21}{12}$ D $\frac{4}{7} = \frac{20}{35}$
- At a factory, the ratio of defective parts to total number of parts is 3:200. Which is an equivalent ratio?
F 6:1000
H 30:1000
G 150:10,000
J 1,000:10,000