Name _____ Date _____ Class _____

SECTION 5A

# Ready to Go On? Skills Intervention

## *5-3 Identifying and Writing Proportions*

**Vocabulary**
proportion
equivalent ratio

For two ratios to be in **proportion,** the ratios must be equal. The equation $\frac{6}{8} = \frac{18}{24}$ is a proportion because both ratios can be simplified to the same fraction, $\frac{3}{4}$. They are **equivalent ratios.**

### Comparing Ratios in Simplest Form

Determine if the ratios are proportional by writing them in simplest form and comparing them.

$\frac{14}{28}, \frac{3}{6}$

What is the GCF of 14 and 28? _____ Simplify. $\frac{14}{28} =$ _____

What is the GCF of 3 and 6? _____ Simplify. $\frac{3}{6} =$ _____

Are $\frac{14}{28}$ and $\frac{3}{6}$ proportional? _____

Explain how you know. _____

### Comparing Ratios Using a Common Denominator

Determine if the ratio of raisins to peanuts for 6 servings and for 8 servings are proportional by finding a common denominator.

| Servings | Peanuts | Raisins |
|---|---|---|
| 6 | 3 | 4 |
| 8 | 6 | 8 |

Write the ratios as fractions.

Rewrite the ratios with a common denominator.

| | 6 servings | 8 servings |
|---|---|---|
| $\frac{\text{raisins}}{\text{peanuts}}$ | $\frac{4}{3}$ | |
| Use a common denominator. | | |

Are the fractions proportional? _____

Explain how you know.

_____

### Finding Equivalent Ratios and Writing Proportions

Find an equivalent ratio, and then write the proportion.

$\frac{9}{12}$

$\frac{9 \cdot 15}{12 \cdot 15} =$ _____ Multiply the numerator and denominator by any number, like 15.

$\frac{9}{12} =$ _____ Write the proportion.