

Check-In Proportional Reasoning**Outcome N-5 Solve problems that involve ratios, rates, and proportional reasoning**

1) Circle the letter if the pairs of ratios are equivalent.

a) 3:4 and 6:8

b) 2:5 and 22:25

c) 3 to 5 and 3:5

d) 4:15 and 2:10

2) Make an equivalent ratio by finding the missing value.

a) 2 to 7 = 4 to y

b) x:10 = 6:30

c) $\frac{3}{8} = \underline{\quad}$ to 72

d) $\frac{9}{x} = \frac{3}{4}$

3) Determine the unit rate for each of the following:

a) It takes three hours to travel 240 km

b) Ten copies cost \$1.20

c) Six classes have 168 students

d) The plant grew 108 mm in nine days

4) Solve each proportion statement:

a) $\frac{x}{120} = \frac{30}{40}$

b) $\frac{9}{r} = \frac{99}{44}$

c) $\frac{64}{8} = \frac{y}{2}$

d) $\frac{5}{16} = \frac{40}{x}$

- 5) For each of the following
- set up a proportion statement
 - define the variable you are using
 - determine the value of the variable
 - write a concluding sentence (with correct units)

a) Five t-shirts cost \$62.50. How much will 15 t-shirts cost?

b) The ratios of boys to girls at a music concert was 3 to 5. If there were 140 girls at the concert, how many boys were there?

c) Three cups of flour are needed to make 48 cookies. How many cookies will 5 cups of flour make?

Progress for Outcome N5:

