

BUYER BEWARE REVIEW

PHASE 1

Write each ratio as a fraction in simplest form.

1. 54:9 $\frac{54}{9} = \frac{6}{1}$

2. 21 to 91 $\frac{21}{91} = \frac{3}{13}$

1. $\frac{6}{1}$

2. $\frac{3}{13}$

Find each unit rate. Round to the nearest hundredth if necessary.

3. 325 meters in 28 seconds $\frac{325}{28} = 11.607 \approx 11.61$

4. 128 pounds of dog food for 16 dogs $\frac{128}{16} = 8$

3. 11.61 m/s

4. 8 lbs per dog

5. **BEST BUY** The costs of different sizes of bottled sport drink are shown. Which bottle costs the least per ounce? (Find unit price)

Size	8 oz	16 oz	24 oz	32 oz
Price	\$0.89	\$1.09	\$1.89	\$2.39

.1112 .068 .0787 .0746

Determine whether each pair of ratios forms a proportion.

1. $\frac{12}{14}$ and $\frac{24}{28}$

2. $\frac{1}{4}$ and $\frac{5}{20}$

3. $\frac{5}{6}$ and $\frac{20}{36}$

4. $\frac{\$18}{30 \text{ lb}}$ and $\frac{\$6}{10 \text{ lb}}$

1. Yes

2. Yes

3. No

4. Yes

Solve each proportion.

5. $\frac{25}{n} = \frac{40}{8}$

6. $\frac{z}{10} = \frac{15}{75}$

7. $\frac{8}{5} = \frac{12}{c}$

1. Estimate 25% of 803 by using fractions.

$.25 \times 803 = 200.75$

2. Estimate 60% of 29 by using 10%.

$.60 \times 29 = 17.4$

5. 5

6. 2

7. 7.5

1. 200.75

2. 17.4

PHASE 3

Write an equation for each problem. Then solve. Round to the nearest tenth if necessary.

5. 19 is what percent of 53? $\frac{19}{53} = \frac{x}{100}$

5. 35.8%

6. 37% of what number is 955? $\frac{955}{x} = \frac{37}{100}$

6. 2581.1

7. Find 72% of 303. $.72 \times 303$

7. 218.2

8. What percent of 15 is 39? $\frac{39}{15} = \frac{x}{100}$

8. 260%

PHASE 3

1. **SWIMMING** The table shows the number of members of the swim team who competed at the swim meet. Each competed in only one event. Make a circle graph of the data.

Swim Team Member Participation

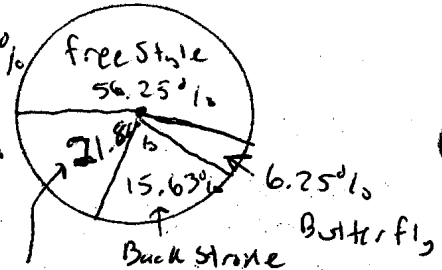
Swim Team Member Participation	
Event	Number
Freestyle	18
Breaststroke	7
Backstroke	5
Butterfly	2

$\frac{18}{32} = 56.25\%$

$\frac{7}{32} = 21.86\%$

$\frac{5}{32} = 15.625\%$

$\frac{2}{32} = 6.25\%$



Find the total cost or sale price to the nearest cent.

16. \$39 shirt; 7.5% sales tax $.075 \times 39 = 2.925 \rightarrow 2.93$

16. \$41.93

17. \$9.25 book; 20% discount $39 + 2.93 = 41.93$

17. \$7.40

$9.25 \times .2 = 1.85$ $9.25 - 1.85 = 7.40$

18. \$2,000 stereo; 30% discount $.3 \times 2000 = 600$ $2,000 - 600 = 1400$

18. \$1400

19. \$18.60 meal; $6\frac{1}{4}\%$ sales tax $.0625 \times 18.60 = 1.1625 = 1.16$

19. \$19.76

20. **DISCOUNT** The regular price of ice skates is \$86.49 and the sale price is \$64.87. Find the percent of discount to the nearest whole percent. $86.49 - 64.87 = 21.62$

20. 25%

$21.62 \div 86.49 = .2499 \rightarrow .25 \rightarrow 25\%$

PHASE 1-2

Choose the correct term or phrase to complete each sentence.

- The part of a quantity, when compared to the whole, is the (denominator, numerator) of a percent proportion. 1. _____
- A proportion is an equation stating that two ratios are (equivalent, of different units). 2. _____
- Two ratios that have the same value are called (scale factors, equivalent ratios). 3. _____
- The (dimensions, scale) of a map is 1 inch = 50 miles. 4. _____
- A rate that is simplified so that it has a denominator (divisible by 10, of 1 unit) is called a unit rate. 5. _____
- To determine whether two ratios form a proportion, you can find their (cross products, unit rates). 6. _____
- A rate is a (scale factor, ratio) that compares two quantities with different kinds of units. 7. _____
- If you are asked to find what percent of 30 is 6, the (part, base) is 30. 8. _____