

## Warm-Up (answer all)

Fill in the blanks.

- (a) 100% of 765 workers is 765 workers  
 (b) 200% of 48 letters is 96 letters  
 (c) 300% of 7 videos is 21 videos

Fill in the blanks.

- (a) 50% of 1050 homes is 525 homes  
 (b) 10% of 370 printers is 37 printers  
 (c) 1% of \$8 sales is \$0.08

$$\frac{1}{100} \quad \frac{100}{100} \quad 0.0800$$

★  $\frac{32}{56}$  is what percent?

$$\frac{32}{56} = \frac{x}{100}$$

$$\frac{3200}{56} = \frac{56x}{56}$$

$$x = 57.1\%$$

Check HW

6.1 # 47

0.005

0.5%

6.2 # 14

$46\frac{2}{3}\%$

$$\begin{array}{r} 46 \\ \times 3 \\ \hline 138 \\ + 2 \\ \hline 140 \end{array}$$

$\frac{140}{3}\%$

$$\frac{\frac{140}{3}}{100}$$

~~$\frac{140}{3} \cdot \frac{1}{100}$~~

$\frac{7}{15}$

Dec → Fraction  
use place value

Fraction → Dec  
 $\frac{3}{7}$  long division

% → decimal  
move decimal left 2

% → fraction  
 $\frac{\#}{100} R$

Fraction	Decimal	Percent
54. $\frac{3}{8}$	<u>0.375</u>	37.5%
55. $\frac{1}{8}$	<u>0.125</u>	12.5%
56. $\frac{5}{8}$	0.625	<u>62.5%</u>
57. $\frac{2}{3}$	<u>0.<math>\overline{66}</math></u>	<u>66.<math>\overline{6}</math>%</u>
58. $\frac{5}{6}$	<u>0.833</u>	<u>83.3%</u>
59. $\frac{3}{50}$	<u>0.06</u>	<u>6%</u>

80. An apple grower's cooperative has 250 members. If 100 of the growers use a certain insecticide, find the portion that do *not* use the insecticide.



$$\frac{3}{50} = \frac{x}{100}$$

## 6.3 Using the Percent Proportion

Percent Proportion is

$$\frac{\text{part}}{\text{whole}} = \frac{\text{Percent}}{100} \text{ always } 100!$$

Ex 1 Using the Percent Proportion

a) part = 12, percent = 25, find the whole

$$\frac{12}{x} = \frac{25}{100} \cdot \frac{1}{4} \quad x = 48$$

b) part = 30, whole = 50, find the percent

$$\frac{30}{50} \cdot 2 = \frac{x}{100} \quad x = 60$$

Ex 2/3/4 Identifying the pieces

Which are the whole, part and percentage in each

a) 32% of the 900 men were retired

part: unknown      percent: 32%  
whole: 900

$$\frac{32}{100} \times \frac{900}{1}$$

b) \$150 is 25 percent of what number?

part: \$150      percent: 25%  
whole: unknown

$$\frac{150}{x} = \frac{25}{100}$$

c) What percent of the 350 women will go?

part: unknown      percent: unknown  
whole: 350

$$\frac{x}{350} = \frac{y}{100}$$

d) 85% of 700 is what number?

part: unknown      percent 85%  
whole: 700