

Section Overview



Percent of Change

Lesson 6-6

Why? Both discounts and markups are examples of percents of change.

$$\text{percent of change} = \frac{\text{amount of change}}{\text{original amount}}$$

92 is **increased** to 280.

$$\text{percent of increase} = \frac{188}{92}$$

$$\approx 2.043$$

$$\approx 204.3\%$$

$$280 - 92 = 188$$

75 is **decreased** to 35.

$$\text{percent of decrease} = \frac{40}{75}$$

$$\approx 0.533$$

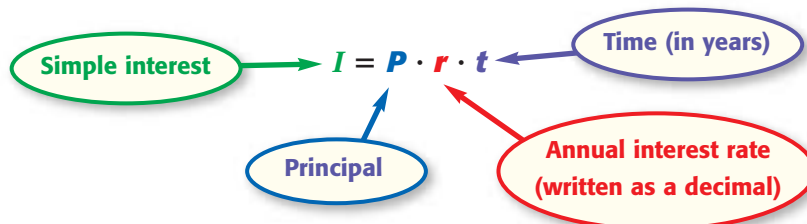
$$\approx 53.3\%$$

$$75 - 35 = 40$$

Simple Interest

Lesson 6-7

Why? Simple interest can be charged when you borrow money or paid when you loan or invest money.



Find the interest rate if the simple interest earned on \$800 for 2 years is \$96.

$$I = P \cdot r \cdot t$$

$$96 = 800 \cdot r \cdot 2$$

$$\frac{96}{1,600} = \frac{1,600}{1,600} \cdot r$$

$$0.06 = r$$

6% = r The interest rate is 6%.

Find the simple interest if \$400 is invested for 18 months at 3.5%.

$$I = P \cdot r \cdot t$$

$$I = 400 \cdot 0.035 \cdot 1.5$$

$$I = \$21.00$$

The simple interest is \$21.00.

Change the **rate** from a percent to a **decimal** and the **time** from months to **years**.