## Solving Multi-Step Equations

$$-6(2x-3)-2=4(x-4)$$

Check

$$\frac{1}{4}(8x+12) = 3(x-4)+10$$

Check

3. 
$$4.5(2x-5) = 6(x-2)$$

Check

## Solving Equations With Fractions

$$\frac{x}{3} - 5 = 2$$

Check

$$\frac{-2x}{5} - 6 = 4$$

Check

3. 
$$\frac{x}{4} - 17 = 3x + 5$$

Check

#### Two Step Word Problems

1. Sarah went to the mall and bought a pair of pants and some tank tops. The pair of pants cost \$24.75 and each tank top cost \$5.95. If Sarah's total at the store was \$60.45, how many tank tops did she buy?

2. Jerry wants to figure out how many minutes his daughter spent talking on her cell phone last month. The cell phone service plan is \$50.00 and it is \$0.03 per minute. If the bill was \$72.50, how many minutes did his daughter spend talking on the phone?

# Consecutive Integers Word Problems

1. The ages of three brothers are three consecutive integers. If the sum of those integers is
78, write and solve an equation to find the ages of the three brothers.

2. The sum of three consecutive even integers is 198. What is the largest of those three integers?

#### Area and Perimeter Word Problems

1. Julie is trying to determine the dimensions of her rectangular window. She notices that the width is 7 less than 2 times the length. If the perimeter of the window is 64 inches, find the length and width of the window.

2. The length of a rectangular frame is 6 cm and the width is (x+4) cm. If the area of the frame is 90 cm<sup>2</sup>, find the width of the frame.

## Percent of Change and Relative Error

1. Rashawn bought a CD that cost \$18.99 and paid \$20.51, including sales tax. What was the percent of the sales tax? 2. The student population at the NGA was 329 students in 1982. The student population at the NGA in 2010 reached 420. Find the percent of change from 1982 to 2010 to the nearest percent. 3. The groundskeeper is replacing the turf on a football field. His measurements of the field are 130 yards by 60 yards. The actual measurements are 120 yards by 54 yards. What is the relative error in the measurement to the *nearest hundredth*?

# Ratio and Proportion

1. A car travels at a speed of 55 miles per hour. If the car travels for 3 hours, how far will the car expect to go?
2. Bill's Candy Shop sells 5 gumballs for \$1.05. U-Pick Candy Store sells 12 gumballs for \$2.28. Which candy has the "better buy" or the lower cost per gumball?
3. Jesse can type 63 words in 3 minutes. At this rate, how many words could he type in 10 minutes?
4. There are 357 seniors in Harris High School. The ratio of boys to girls is 7:10. How many boys are in the senior class?

### Converting Units of Measure

1. 12 m = \_\_\_\_ cm

2. 224 oz = \_\_\_\_\_lbs

3. Buster goes to Lowes to buy some chain. The chain cost \$1.79 per foot. If buster purchased 3 yards of chain, how much did he pay?

4. Steve ran a distance of 1.5 miles in 9 minutes. What is his speed in feet per second?