

## Practice 2-9 Solving One-Step Inequalities by Adding or Subtracting

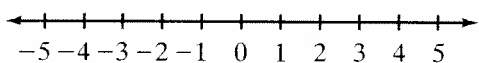
Practice

Write an inequality for each sentence. Then solve the inequality.

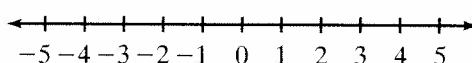
- Six less than  $n$  is less than  $-4$ .  
\_\_\_\_\_
- The sum of a number  $k$  and five is greater than or equal to two.  
\_\_\_\_\_
- Nine more than a number  $b$  is greater than negative three.  
\_\_\_\_\_
- You must be at least 48 inches tall to ride an amusement park ride, and your little sister is 39 inches tall. How many inches  $i$  must she grow before she may ride the ride?  
\_\_\_\_\_
- You need no more than 3,000 calories in a day. You consumed 840 calories at breakfast and 1,150 calories at lunch. How many calories  $c$  can you eat for dinner?  
\_\_\_\_\_

Solve each inequality. Graph the solutions.

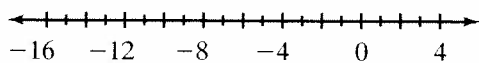
6.  $7 + x \geq 9$  \_\_\_\_\_



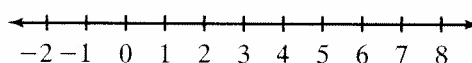
7.  $-5 \leq x - 6$  \_\_\_\_\_



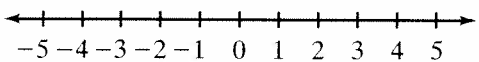
8.  $0 \geq x + 12$  \_\_\_\_\_



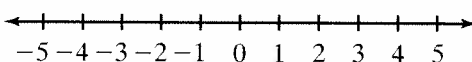
9.  $x - 15 \leq -8$  \_\_\_\_\_



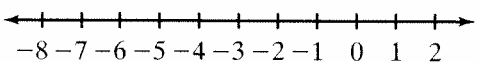
10.  $13 + x \geq 13$  \_\_\_\_\_



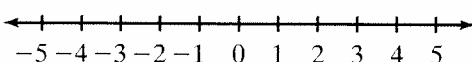
11.  $x - 8 > -5$  \_\_\_\_\_



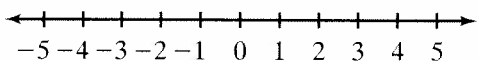
12.  $4 + x < -2$  \_\_\_\_\_



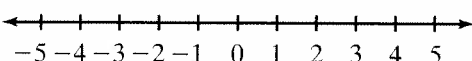
13.  $x - 9 > -11$  \_\_\_\_\_



14.  $x - 6 \leq -1$  \_\_\_\_\_



15.  $-4 + x < -4$  \_\_\_\_\_



## 2-9 • Guided Problem Solving

**GPS** Student Page 108, Exercise 10

**Budgeting** You are saving to buy a bicycle that will cost at least \$120. Your parents give you \$45 toward the bicycle. How much money will you have to save?

### Read and Understand

1. How much money will the bicycle cost? \_\_\_\_\_
2. How much money did your parents give you? \_\_\_\_\_
3. What are you asked to find? \_\_\_\_\_

### Plan and Solve

4. Use the sentence “The amount of money my parents gave me plus  $m$ , the amount of money I will have to save, is at least \$120” to write an inequality to represent the situation. \_\_\_\_\_
5. What number must you subtract from each side of the inequality to solve for  $m$ ? \_\_\_\_\_
6. Solve the inequality for  $m$ . \_\_\_\_\_
7. How much money will you have to save to buy the bicycle? \_\_\_\_\_

### Look Back and Check

8. Subtract from \$120 from the amount of money stated in your answer to Question 7. \_\_\_\_\_  
The result should be equal to the amount of money your parents gave you.

### Solve Another Problem

9. Shana is saving money to buy a CD player that will cost at least \$65. She has \$27. How much money will she have to save? \_\_\_\_\_