

Practice A

For use with pages 125–129

Tell whether the given value of the variable is a solution of the equation.

1. $5 + x + 3 = 14$; $x = 7$

2. $4x + 9x + 1 = 27$; $x = 2$

3. $4(x + 7) = 16$; $x = -3$

4. $18 - 2(x - 3) = 26$; $x = 1$

Solve the equation. Check your solution.

5. $3x + 8 + x = 28$

6. $9x + 7 - 2x = 14$

7. $17 + 3x - 11 = 0$

8. $12x - 1 - 10x = 23$

9. $3(6 - x) = 27$

10. $-2(x + 7) = 16$

11. $-40 = 4(x - 10)$

12. $20 = -5(x + 7)$

13. $-6(2x + 3) = 42$

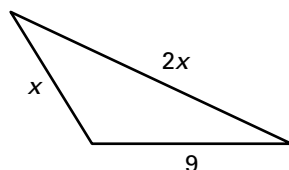
14. $2(11 - 4x) = 38$

15. $14x - 6 - 11x = 21$

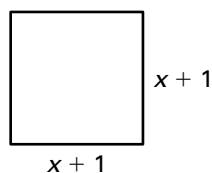
16. $8 + 5x - 6 = 37$

Find the value of x for the given triangle, rectangle, or square.

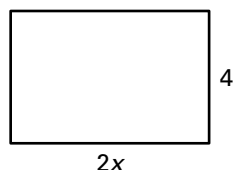
17. Perimeter = 30 units



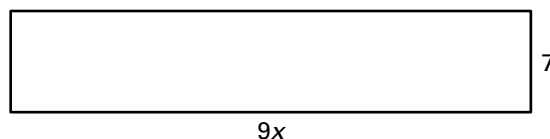
18. Perimeter = 24 units



19. Perimeter = 20 units



20. Perimeter = 50 units

**21.** The perimeter of a rectangular picture frame is 30 inches. The length of the frame is three less than twice the width. What are the dimensions of the frame?**22.** You spend \$91 shopping for new clothes. You spend \$24 for a pair of jeans and \$35 for a pair of shoes. You also buy 4 shirts that each cost d dollars. How much is each shirt?**23.** You spend \$55 shopping for birthday gifts. You buy one of your friends a gift certificate for \$15, and your other friend a pair of shorts for \$16. You also buy your older brother 2 compact discs that each cost d dollars. How much is each compact disc?