Evaluating Expressions

Apply the substitutions and evaluate.

1.
$$7x - 4$$
: $x = 9$

2.
$$3d + (5 - d)$$
; $d = 4$

1.
$$7x - 4$$
; $x = 9$ **2.** $3d + (5 - d)$; $d = 4$ **3.** $8 + 2g - g \div 2$; $g = 6$

For **7–10**, evaluate each expression for 2, 6, and 8.

5.
$$x + 12$$
 , ,

7.
$$x^2 - x$$
 , ,

8. Evaluate the expression for the values of *h*.

| h | 6 | 18 | 24 | 42 | 54 |
|--------------------|---|----|----|----|----|
| $(h-6) + h \div 6$ | | | | | |

9. The table shows how much Tia charges for pet sitting. Write an expression to show how much Tia will earn for sitting two dogs for a day and two cats per hour. Then solve for sitting two dogs for the day and one cat for 6 hours.

| Number of Pets | Per Day | Per Hour |
|-----------------|---------|----------|
| One dog | \$20 | \$7 |
| Two dogs | \$25 | \$9 |
| One or two cats | \$15 | \$6 |

10. Writing to Explain Tia wrote 20 + 7x to find how much she earned for one pet sitting job and 15x for another job. Explain the difference between the expressions.

11. Evaluate the expression 6 + 8f for f = 4.

- **A** 8
- **B** 18
- **C** 38
- **D** 56