

Lesson 7 Homework Practice

Equivalent Expressions

Simplify each expression.

1. $(7 + x) + 7x$

2. $5 \cdot (4 \cdot x)$

3. $15y + (x + 9y)$

4. $(6x + 21) + 14$

5. $3x + 2 + 11x$

6. $(x + 13y) + 8y$

7. $(12y + 2x) + 4y$

8. $8 \cdot (x \cdot 4)$

9. $3(5x)$

10. $3x + (7x + 10)$

11. $5x + (2 + x)$

12. $4 \cdot x \cdot 10$

13. $(x \cdot 12) \cdot 3$

14. $14x + 9y + 6x$

15. $5x + (24 + 14x)$

ALGEBRA For Exercises 16 through 21, translate each verbal expression into an algebraic expression. Then, simplify the expression.

16. The sum of three and a number is added to twenty-four.

17. The product of six and a number is multiplied by nine.

18. The sum of 10 times a number and fifteen is added to eleven times the same number.

19. Two sets of the sum of a number and eight are added to five times the same number.

20. Three sets of a sum of a number and four are added to the sum of seven times the same number and thirteen.

21. Five friends went to a baseball game. Three of the friends each bought a ticket for x dollars and a soda for \$6.00. The other two friends each bought only tickets. Write and simplify an expression that represents the amount of money spent.