Variables and Expressions Assignment

Write an algebraic expression for each verbal expression.

1. One-fourth the cube of $x$
2. The ratio between $m$ and $v$
3. The product of $w$ and $h$
4. Six more than two times a number
5. Three times the quantity eight plus $x$
6. Nine divided by $x$
7. $n$ plus five squared
8. Four divide by a number

Find each value.

9. $15^3$
10. $3^5$
11. $10^4$
12. $7^2$

Write a verbal expression for each algebraic expression.

13. $27 - 2x$
14. $3x^2 + 4$
15. $15y$
16. $3x^2 - 2x$
17. $5^4$
18. $6x - 2$
19. $2x + 16$
20. $4 \div n$
Variables and Expressions Assignment

**ANSWER |** Write an algebraic expression for each verbal expression.

1. One-fourth the cube of $x$  
   \[ \frac{1}{4} x^3 \]
2. The ratio between $m$ and $v$  
   \[ \frac{m}{v} \]
3. The product of $w$ and $h$  
   \[ w \cdot h \]
4. Six more than two times a number  
   \[ 6 + 2x \]
5. Three times the quantity eight plus $x$  
   \[ 3(8 + x) \]
6. Nine divided by $x$  
   \[ \frac{9}{x} \]
7. $n$ plus five squared  
   \[ n + 5^2 \]
8. Four divide by a number  
   \[ \frac{4}{x} \]

**Find each value.**

9. $15^3 = 15 \cdot 15 \cdot 15 = 3375$
10. $3^5 = 3 \cdot 3 \cdot 3 \cdot 3 \cdot 3 = 243$
11. $10^4 = 10 \cdot 10 \cdot 10 \cdot 10 = 10000$
12. $7^2 = 7 \cdot 7 = 49$

**Write a verbal expression for each algebraic expression.**

13. $27 - 2x$  
   = the difference of twenty seven and twice a number $x$
14. $3x^2 + 4$  
   = three times $x$ squared plus four
15. $15y$  
   = fifteen times $y$
16. $3x^2 - 2x$  
   = three times $x$ squared minus twice a number $x$
17. $5^4$  
   = five to the fourth power
18. $6x - 2$  
   = six times $x$ minus two
19. $2x + 16$  
   = twice a number $x$ plus sixteen
20. $4 \div n$  
   = four divided by $n$