

LESSON
4-1 **Practice B**
Exponents

Write in exponential form.

1. $6 \cdot 6 \cdot 6 \cdot 6 \cdot 6 \cdot 6$

2. $7 \cdot 7 \cdot 7 \cdot 7$

3. $(-8) \cdot (-8) \cdot (-8) \cdot (-8)$

4. $5 \cdot 5 \cdot 5 \cdot b \cdot b \cdot b \cdot b$

Simplify.

5. 10^2

6. $(-6)^2$

7. 8^2

8. $(-7)^2$

9. $(-5)^3$

10. 12^2

11. $(-9)^2$

12. $(-4)^3$

13. 2^5

14. 5^4

15. $(-3)^4$

16. 6^3

Evaluate each expression for the given values of the variables.

17. $n^3 - 5$ for $n = 4$

18. $4x^2 + y^3$ for $x = 5$ and $y = -2$

19. $m^p + q^2$ for $m = 5$, $p = 2$, and $q = 4$

20. $a^4 + 2(b - c^2)$ for $a = 2$, $b = 4$, and $c = -1$

21. Write an expression for five times a number used as a factor three times.

22. Find the volume of a regular cube if the length of a side is 10 cm. (Hint: $V = l^3$.)
