Name _____ Date _____ Class _____

LESSON 7-1

Practice C

Integer Exponents

Simplify.

1. 4^{-2} _____
2. 6^{0} _____
3. -6^{-2} _____
4. $(-1)^{-5}$ _____
5. $(-3)^{-2}$ _____
6. 5^{-3} _____
7. -7^{-3} _____
8. $(-4)^{-5}$ _____
9. $(-9)^{0}$ _____

Evaluate each expression for the given value(s) of the variable(s).

10. $x^{-4}y^{3}$ for $x = 2$ and $y = 3$

11. $5r^{-3}s^{-6}$ for $r = 3$ and $s = 1$

12. $(3 - m)^{-4}$ for $m = 6$

13. $-2a^{-1}b^{-3}$ for $a = 2$ and $b = 3$

Simplify.

16. x^{-3} _____
17. z^{0} _____
18. t^{-9} _____
19. $3n^{-2}$ _____
20. $\frac{2}{3}x^{-4}$ _____
21. $-a^{-2}$ _____

Name _____ Date _____ Class _____

22. $10r^{-3}s^{4}$ _____

23. $\frac{b^{3}}{c^{-2}d^{3}}$ _____

24. $\frac{5x^{-2}y^{-3}}{z^{0}}$ _____

25. $\frac{p^{-9}q^{-4}}{r^{2}s^{-3}}$ _____

26. $\frac{a^{0}b^{-2}}{c^{-3}d}$ _____

27. $\frac{g^{3}h^{-2}}{k^{-1}j^{-5}}$ _____

28. A micrometer is an instrument that can measure the thickness of an object very accurately. One micrometer is accurate to within 10^{-4} inches. Evaluate this expression. _____

29. An object is being measured by a micrometer. It has a thickness of 6^{-3} inches. Evaluate this expression. _____