





Unit 4 Review

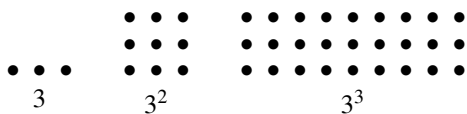
Name: _____

Date: _____

1. Which model best represents 6^2 ?

- A. 
- B. 
- C. 
- D. 

2. How many dots will there be at 3^5 ?



3. How is the product $2 \times 2 \times 2 \times 2 \times 2$ expressed in exponential notation?

- A. 2^5 B. 5^2 C. 2×5 D. 10^2

4. How is the product $3 \times 3 \times 3 \times 3$ expressed in exponential notation?

5. How is the product $2 \times 2 \times 3 \times 5 \times 5$ expressed in exponential notation?

6. How is the product $2 \times 2 \times 3 \times 3$ expressed in exponential notation?

7. How would 32 be written in exponential notation?

8. How would 125 be written in exponential notation?

9. $4^8 =$

10. $2^6 =$

11. Look at the expression.

$7z$

A. 7 times some number

B. 7 equals z

C. 7 z

D. 7 more than a number

How do you read the expression?

12. The expression $\frac{b}{6}$ means—

A. some number minue 6

B. some number times 6

C. some number divided by 6

D. 6 subtracted from some number

13. If $\blacktriangle + \blacktriangle + \blacktriangle = 3x$ and $\bullet + \bullet = 2$, then what would $\blacktriangle + \bullet$ equal?

14. Write an algebraic expression for the following situation:

“twenty-seven increased by y ”

15. If n represents a number, what is an algebraic expression for “a number increased by 57”?

16. Translate the verbal expression “four times the difference of n and three.”

17. Which one of these is the correct expression for “ p less than q ?”

A. $p < q$ B. $p - q$ C. $p > q$ D. $q - p$

18. Translate “five times the cube of the sum of t and u .”

19. Translate “four more than the difference of e squared and f .”

20. Which of the following is an expression?

- A. $3 \leq 2x - 5$ B. $3x + 4$
C. $8 = \frac{25}{y} + 3$ D. $\frac{x}{7} - 7 > 6$

21. Look at the expression.

$$8(r + 3)$$

What are the terms of the expression?

22. Look at the expression.

$$5(3 - 2)$$

What are the factors of the expression?

23. Look at the expression.

$$6y - 2$$

Which of these is the coefficient?

- A. y B. 6 C. $6y$ D. -2

24. Look at the expression.

$$-2 - 3$$

Which of the following describes the expression?

- A. the difference of two terms
B. the product of a constant and a variable
C. the product of two terms
D. the quotient of two terms

25. Look at the expression.

$$\frac{(d + 5)}{4}$$

Which of the following describes the expression?

- A. the difference of two terms
B. the quotient of a constant and a variable
C. the quotient of two terms
D. the sum of four terms

26. Look at the expression.

$$t(6 - 4)$$

Which of the following describes the expression?

- A. the product of three constants
B. the difference of a constant and a variable
C. the product of two terms
D. the sum of three terms

27. Which set of operators in the blanks would make the following statement true?

$$12 _ 2 _ 3 _ 4 = 18$$

- A. $\times, +, -$ B. $\div, \times, +$
C. $\div, +, \times$ D. $+, \times, -$

28. If *A* stands for “add”, *S* for “subtract”, *M* for “multiply”, and *D* for “divide”, which one of the following sequences represents the correct *order* of operations when evaluating $4 - (-5 + 6 \times 7) \div 8$?

- A. *MDAS* B. *AMAD*
C. *MADS* D. *AMDS*

29. Simplify: $\frac{2^3 + 188}{7^2}$

30. Simplify: $\frac{5 + 5 \cdot 5}{5}$

31. Evaluate $8 + 2(a + b) - 10 \div b + a^2$ for $a = 3$ and $b = 2$

32. If $x = 4$ and $y = 8$, what is $x^2 - y$?

33. In the equation, $\frac{1}{7} \times \frac{1}{8} = \frac{1}{8} \times \frac{1}{7}$, which property is demonstrated?

- A. Associative property
B. Commutative property
C. Distributive property
D. none of these

34. In the equation, $\frac{1}{7} \times (\frac{1}{8} \times \frac{3}{4}) = (\frac{1}{7} \times \frac{1}{8}) \times \frac{3}{4}$, which property is demonstrated?

- A. Associative property
B. Commutative property
C. Distributive property
D. none of these

35. Kate thought it would be helpful to rewrite $39 \times 43 + 39 \times 57$ as $39(43 + 57)$. What property was she using?

36. While doing homework, Marcus rewrote $27 \times 18 + 23 \times 89$ as $27(18 + 89)$.

Which of the following properties did Marcus use?

- A. Distributive property
- B. Commutative property
- C. Identity property
- D. Associative property

37. Look at the following.

$3b \quad -3m \quad -3 \quad \frac{m}{3}$

Which are like terms?

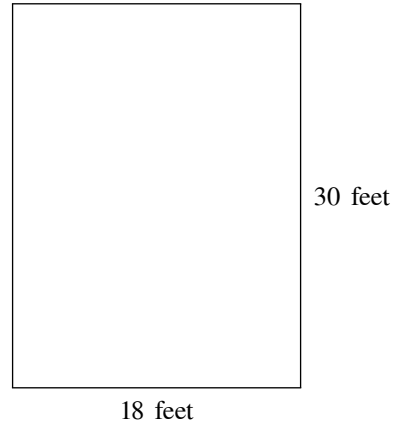
- A. $3b$ and $\frac{m}{3}$
- B. $3b$ and -3
- C. $-3m$ and $\frac{m}{3}$
- D. -3 and $-3m$

38. Look at the pairs of terms.

- A. $-3x^2$ $3x^2$
- B. 3 1.7
- C. 6 c
- D. $4b$ $3b$

Which of the pairs are unlike terms?

39. Each evening, Takumi walked around a park.



Takumi used this number sentence to find the perimeter of the park:

$$2(30 + 18) = p$$

Which of the following number sentences could also be used to find the perimeter of the park?

- A. $2(30) + 2(18) = p$
- B. $2(30 + 18) + 2(30 + 18) = p$
- C. $2 + 30 + 2 + 18 = p$
- D. $\frac{30}{2} + \frac{18}{2} = p$

40. Complete: $3a + 6 = 6 + ?$

41. Complete: $2c + (3c - 4) = \square - 4$

42. This expression shows a sum:

$$4y + 12w$$

Which of the following is an equivalent expression, written as a product?

43. The expression $V(5 + 4)$ is the same as _____.

A. $20V$

B. $5V + 4V$

C. $5V - 4V$

D. $9 \cdot 2$

44. The expression $3 \times (L + W)$ is the same as _____.

A. $3LW$

B. $3L + 3W$

C. $\frac{LW}{3}$

D. $L + 3W$

Unit 4 Review 2/11/2018

1. Answer: D Objective: 6.EE.1	15. Answer: $n + 57$ Objective: 6.EE.2A
2. Answer: 243 Objective: 6.EE.1	16. Answer: $4(n - 3)$ Objective: 6.EE.2A
3. Answer: A Objective: 6.EE.1	17. Answer: D Objective: 6.EE.2A
4. Answer: 3^4 Objective: 6.EE.1	18. Answer: $5(t + u)^3$ Objective: 6.EE.2A
5. Answer: $2^2 \times 3 \times 5^2$ Objective: 6.EE.1	19. Answer: $(e^2 - f) + 4$ Objective: 6.EE.2A
6. Answer: $2^2 \times 3^2$ Objective: 6.EE.1	20. Answer: B Objective: 6.EE.2B
7. Answer: 2^5 Objective: 6.EE.1	21. Answer: 8 and $(r + 3)$ Objective: 6.EE.2B
8. Answer: 5^3 Objective: 6.EE.1	22. Answer: 5 and $(3 - 2)$ Objective: 6.EE.2B
9. Answer: $4 \times 4 \times 4 \times 4 \times 4 \times 4 \times 4 \times 4$ Objective: 6.EE.1	23. Answer: B Objective: 6.EE.2B
10. Answer: $2 \times 2 \times 2 \times 2 \times 2 \times 2$ Objective: 6.EE.1	24. Answer: A Objective: 6.EE.2B
11. Answer: A and C only Objective: 6.EE.2A	25. Answer: C Objective: 6.EE.2B
12. Answer: C Objective: 6.EE.2A	26. Answer: C Objective: 6.EE.2B
13. Answer: $x + 1$ Objective: 6.EE.2A	27. Answer: C Objective: 6.EE.2C
14. Answer: $27 + y$ Objective: 6.EE.2A	

28.
Answer: C
Objective: 6.EE.2C

29.
Answer: 4
Objective: 6.EE.2C

30.
Answer: 6
Objective: 6.EE.2C

31.
Answer: 22
Objective: 6.EE.2C

32.
Answer: 8
Objective: 6.EE.2C

33.
Answer: B
Objective: 6.EE.3

34.
Answer: A
Objective: 6.EE.3

35.
Answer: Distributive property
Objective: 6.EE.3

36.
Answer: A
Objective: 6.EE.3

37.
Answer: C
Objective: 6.EE.4

38.
Answer: C
Objective: 6.EE.4

39.
Answer: A
Objective: 6.EE.4

40.
Answer: $3a$
Objective: 6.EE.4

41.
Answer: $5c$
Objective: 6.EE.4

42.
Answer: $4(y + 3w)$
Objective: 6.EE.4

43.
Answer: B
Objective: 6.EE.4

44.
Answer: B
Objective: 6.EE.4