Name _____

Variables and Expressions

A **variable** is a letter or symbol. It represents an unknown amount that can change.

You can represent mathematical expressions with words and symbols.

Operation	+	−	×	÷
Word expression	the sum of 9 and 3	the difference between 9 and 3	the product of 9 and 3	9 divided by 3
Algebraic expression	$9 + 3$	$9 - 3$	3×9	$9 \div 3$
Other ways of saying the word expression	3 added to 9 3 more than 9	3 subtracted from 9 3 less than 9	9 multiplied by 3 3 times 9	9 separated into 3 equal parts

Complete the numerical expression for each of the following word expressions.

1. the sum of 12 and 8

   12 ____ 8

2. the difference between 20 and 6

   20 ____ 6

3. the quotient of 32 and 16

   32 ____ 16

4. 7 less than 21

   21 ____ 7

5. 2 more than 10

   10 ____ 2

6. 84 divided by 4

   84 ____ 4

Circle the letter of the correct word expression for each algebraic expression.

7. $5 \times (15 - 13)$ a. 5 times 13 subtracted from 15   b. 5 times 15 minus 13

8. 4×9 a. 4 more than 9   b. 4 times 9

9. $11 + 8 - 2$ a. 11 more than 8 minus 2   b. 11 minus 8 plus 2

10. $(45 + 3) \times 2$ a. the product of 2 and 45 plus 3   b. 45 more than 3 times 2

11. $36 \div 6$ a. 36 less 6   b. 6 equal parts of 36

12. $8 + 2 - 5$ a. 5 less than 8 + 2   b. 8 + 2 subtracted from 5