

Name: \_\_\_\_\_

**Unit 2: Introduction to Algebra  
Review Worksheet**

Evaluate each expression to find the missing values in the table.

1.

a	$a + 18$
10	
12	
14	

2.

y	$y \div 6$
18	
30	
42	

3.

n	$n \div 5 + 7$
20	
30	
40	

4. A van can seat 6 people. How many people can ride in 2, 4, 5, and 6 vans? Make a table. Create an expression for the table.

5. A rectangle is 5 units wide. How many square units does the rectangle cover if it is 10, 11, 12, or 13 units long? Make a table. Create an expression for the table.

Write an expression for the missing value in each table.

6.

<b>Packages</b>	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>	<b>p</b>
<b>Rolls</b>	<b>8</b>	<b>16</b>	<b>24</b>	<b>32</b>	

7.

<b>Students</b>	<b>5</b>	<b>10</b>	<b>15</b>	<b>20</b>	<b>s</b>
<b>Groups</b>	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>	

8.

<b>Position</b>	<b>1</b>	<b>2</b>	<b>3</b>	<b>4</b>	<b>5</b>	<b>n</b>
<b>Value of Term</b>	<b>4</b>	<b>7</b>	<b>10</b>	<b>13</b>	<b>16</b>	

9. There are more reptile species than amphibian species. There are 3,100 living species of amphibians. Write an expression to show how many more reptile species there are than amphibian species.

Write each phrase as a numerical or algebraic expression.

10. 26 more than  $n$

11.  $g$  multiplied by 4

12. the quotient of 180 and 15

Write two phrases for each expression.

13.  $(14)(16)$

14.  $n \div 8$

15.  $p + 11$

16.  $s - 6$

Determine whether the given value of the variable is a solution.

17.  $5d = 70$  for  $d = 12$

18.  $29 = 76 - n$  for  $n = 46$

19.  $108 \div a = 12$  for  $a = 9$

20.  $15 + m = 27$  for  $m = 12$

Solve each equation. Show the steps. Check your work.

21.  $a + 7 = 25$

22.  $121 = 11d$

23.  $3 = t - 8$

24.  $6 = \frac{k}{6}$

25. Air typically has about 4,000 bacteria per cubic meter. If your room is 30 cubic meters, about how many bacteria would there be in the air in your room?

CHALLENGE:

26. A vacation tour costs \$450. Additional outings cost \$25 each. Create a table to show the cost to go on the tour with 1, 2, 3, and  $x$  additional outings. Write an expression for the cost of  $x$  outings. Use the expression to find out how much it would cost to go on 7 outings.