



Name \_\_\_\_\_

## Mental Math: Using Compatible Numbers and Compensation



It's easier to add and subtract mentally using compatible numbers.

Find  $51 + 17 + 19$ .

Look for compatible numbers.

Add these numbers first.

$$\begin{array}{r} 51 + 17 + 19 = 20 + 17 \\ = 37 \end{array}$$

Sometimes it's easier to use compensation. Change one number to make it easier to add or subtract. Then adjust the other number.

$$\begin{array}{r} 28 \text{ add 2} \quad 30 \\ + 13 \text{ subtract 2 to adjust} \quad + 11 \\ \hline 41 \end{array}$$

$$\begin{array}{r} 28 \text{ add 2} \quad 30 \\ - 13 \text{ add 2 to adjust} \quad - 15 \\ \hline 15 \end{array}$$

Use mental math to find each sum or difference.

1.  $68 + 56 =$  \_\_\_\_\_

2.  $24 + 17 =$  \_\_\_\_\_

3.  $75 - 29 =$  \_\_\_\_\_

4.  $62 - 47 =$  \_\_\_\_\_

5.  $40 + 48 =$  \_\_\_\_\_

6.  $56 - 18 =$  \_\_\_\_\_

7.  $62 + 47 + 8 =$  \_\_\_\_\_

8.  $31 + 63 + 18 =$  \_\_\_\_\_

9.  $16 + 44 + 9 =$  \_\_\_\_\_

9a.  $38 + 11 + 22 =$  \_\_\_\_\_

10.  $7 + 10 + 23 =$  \_\_\_\_\_

10a.  $25 + 18 + 15 =$  \_\_\_\_\_

11.  $18 + 37 + 23 =$  \_\_\_\_\_

11a.  $32 + 58 + 5 =$  \_\_\_\_\_

12.  $9 + 64 + 40 =$  \_\_\_\_\_

12a.  $61 + 17 + 28 =$  \_\_\_\_\_