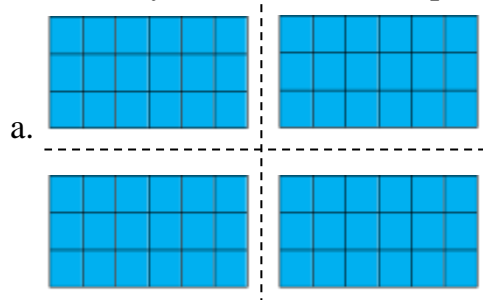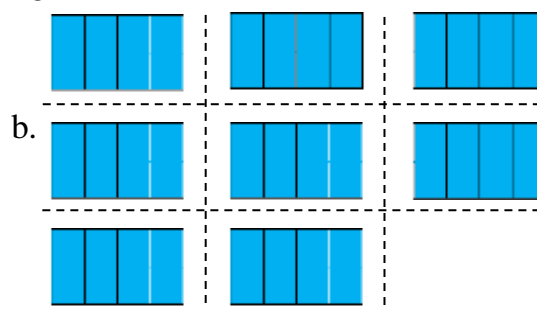# 4.OA.B.4 Factors of Whole Numbers

4.OA.B.4 Find all factor pairs for a whole number in the range 1-100

1. Draw arrays to show the multiplication equations given below.
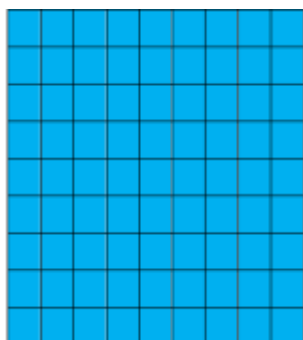
a.

b.

Solution:

Solution:

2. Write the number that the array shows. Find 3 ways to break apart the array and write the factors.

Solution:

3. Write two ways to make a multiplication sentence having two numbers so that the product of the two numbers is equal to the number given below.

   a. 12
   b. 28
   c. 30
   d. 36
   e. 40
   f. 42
   g. 45

Solution:
a.
b.
c.
d.
e.
f.
g.

4. Which multiplication sentence is not correct?

   A. $32 = 2 \times 2 \times 6$ C. $27 = 3 \times 3 \times 3$
   B. $44 = 4 \times 11$ D. $46 = 2 \times 23$
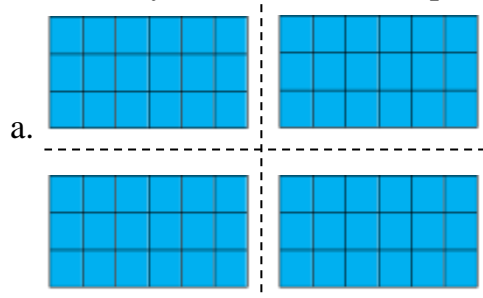
   Solution:

4.OA.B.4 Factors of Whole Numbers
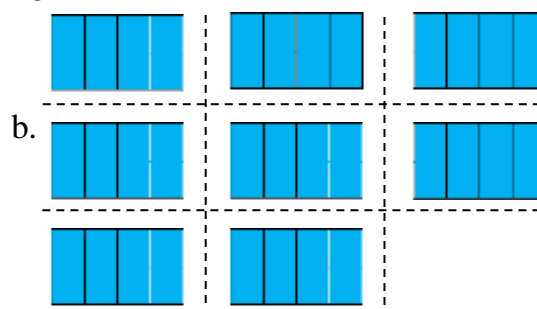
4.OA.B.4 Find all factor pairs for a whole number in the range 1-100

1. Draw arrays to show the multiplication equations given below.
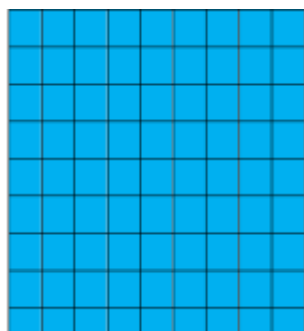
   a.

   b.

   Solution:
   All four represent $3 \times 6 = 18$ each
   Total $= 3 \times 6 \times 4 = 72$

   Solution:
   All eight represent $2 \times 4 = 8$ each
   Total $= 2 \times 4 \times 8 = 64$

2. Write the number that the array shows. Find 3 ways to break apart the array and write the factors.

   Solution:

   81: 1×81; 3×27; 9×9

   Factors: 1, 3, 9, 27, 81

3. Write two ways to make a multiplication sentence having two numbers so that the product of the two numbers is equal to the number given below.

   a. 12
   b. 28
   c. 30
   d. 36
   e. 40
   f. 42
   g. 45

   Solution:
   a. 2×6; 4×3
   b. 2×14; 4×7
   c. 2×15; 3×10
   d. 6×6; 4×9
   e. 4×10; 5×8
   f. 7×6; 2×21
   g. 3×15; 5×9

4. Which multiplication sentence is not correct?
   A. $32 = 2 \times 2 \times 6$ C. $27 = 3 \times 3 \times 3$
   B. $44 = 4 \times 11$ D. $46 = 2 \times 23$

   Solution: A