Name _____ Date _____

1. The team organizes soccer balls into 2 rows of 5. The coach adds 3 rows of 5 soccer balls. Complete the equations to describe the total array.





Lesson 9:

 Find related multiplication facts by adding and subtracting equal groups in array models.

- 4. Matthew organizes his baseball cards in 4 rows of 3.
 - a. Draw an array that represents Matthew's cards using an x to show each card.

- b. Solve the equation to find Matthew's total number of cards. 4 × 3 = _____
- 5. Matthew adds 2 more rows. Use circles to show his new cards on the array in Problem 4(a).
 - a. Write and solve a multiplication equation to represent the circles you added to the array.

_____×3 = _____

b. Add the totals from the equations in Problems 4(b) and 5(a) to find Matthew's total cards.

_____+ ____ = 18

c. Write the multiplication equation that shows Matthew's total number of cards.

_____×____=18



Lesson 9:

: Find related multiplication facts by adding and subtracting equal groups in array models.





Lesson 10:

10: Model the distributive property with arrays to decompose units as a strategy to multiply.

- 3. Ruby makes a photo album. One page is shown below. Ruby puts 3 photos in each row.
 - a. Fill in the equations on the right. Use them to help you draw arrays that show the photos on the top and bottom parts of the page.



b. Ruby calculates the total number of photos as shown below. Use the array you drew to help explain Ruby's calculation.

