LETTER HOME
Exploring Multiplication and Division

Dear Family Member:

During this unit your child will solve multiplication and division problems that come from real-world situations and connect to other areas of mathematics. For example, after reading a recipe, your child will use multiplication and a graph to figure out how many lemons are needed to make six pitchers of lemonade. Students will use division to determine how many cupcakes each person at a birthday party will get. These and other real-world problems help them see multiplication and division as part of their everyday lives.

You can provide additional support at home.

Make Lemonade. You and your child can make lemonade, following this recipe or one of your own. Ask your child what you would need to do to double or triple the recipe.

Homemade Lemonade

Ingredients
Juice from 8 lemons
2 quarts of cold water
2 cups sugar

Instructions
1. Combine all ingredients in a large (2-quart) pitcher.
2. Stir well to dissolve the sugar completely.
3. Pour over ice cubes.

Makes one 2-quart pitcher.

Cost Chart. Tell your child the cost of one small item. For example, the cost of one small toy is 50¢. Ask them how much 4 or 10 would cost. Ask your child to make a table showing the cost of various numbers of the item.

Math Facts and Mental Math

This unit continues the systematic review and assessment of the multiplication facts.

Multiplication Facts. Students review the square number to increase fluency and learn to apply multiplication strategies to larger numbers.

You can help your child review these facts using the flash cards that are sent home or by making a set of flash cards from index cards or scrap paper. Study facts in small groups each night. As your child goes through the flash cards, put the cards in three stacks: Facts I Know Quickly, Facts I Can Figure Out, and Facts I Need to Learn.
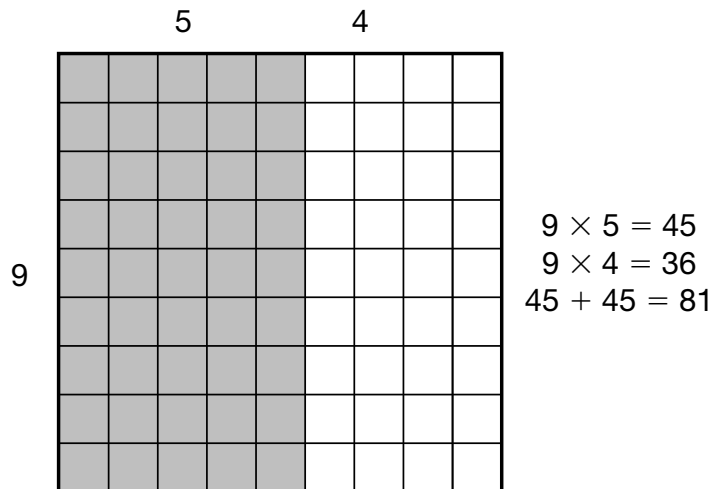
For Facts I Need to Learn, work on strategies for figuring them out. Good strategies include:

Skip counting. To solve 5×5, skip count: 5, 10, 15, 20, 25

Doubling. To solve 6×6, solve $3 \times 6 = 18$ and $18 + 18 = 36$ so $6 \times 6 = 36$

$$6 \times 3 = 18$$
$$6 \times 3 = 18$$
$$18 + 18 = 36$$
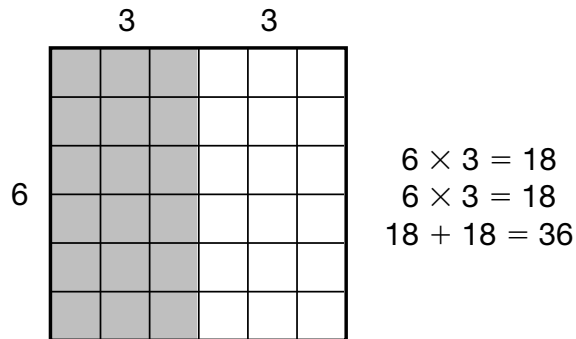
Reasoning from known facts. To solve 9×9, solve $9 \times 5 + 9 \times 4 = 81$.

$$9 \times 5 = 45$$
$$9 \times 4 = 36$$
$$45 + 45 = 81$$

For Facts I Can Figure Out, use the flash cards to practice the facts for fluency.

For Facts I Know Quickly, help your child use mental math strategies to multiply 10s and 100s:

$60 \times 600 = 36000$, $40 \times 40 = 1600$, $3 \times 300 = 900$

Thank you for taking the time to talk with your child about what he or she is doing in math.

Sincerely,