Lesson 15 Problem Set

1. Solve. Draw a rectangular fraction model to explain your thinking. Then, write a multiplication sentence. The first one is done for you.

   a. \(\frac{2}{3} \text{ of } \frac{3}{5}\)
   
   \[
   \frac{2}{3} \times \frac{3}{5} = \frac{6}{15} = \frac{2}{5}
   \]

   b. \(\frac{3}{4} \text{ of } \frac{4}{5}\)

   c. \(\frac{2}{5} \text{ of } \frac{2}{3}\)

   d. \(\frac{4}{5} \times \frac{2}{3}\)

   e. \(\frac{3}{4} \times \frac{2}{3}\)

2. Multiply. Draw a rectangular fraction model if it helps you, or use the method in the example.

   Example: \(\frac{6}{7} \times \frac{5}{8} = \frac{3 \times 5}{7 \times 4} = \frac{15}{28}\)

   a. \(\frac{3}{4} \times \frac{5}{6}\)

   b. \(\frac{4}{5} \times \frac{5}{8}\)
Lesson 15: Multiply non-unit fractions by non-unit fractions.

3. Phillip’s family traveled \(\frac{3}{10}\) of the distance to his grandmother’s house on Saturday. They traveled \(\frac{4}{7}\) of the remaining distance on Sunday. What fraction of the total distance to his grandmother’s house was traveled on Sunday?

4. Santino bought a \(\frac{3}{4}\)-pound bag of chocolate chips. He used \(\frac{2}{3}\) of the bag while baking. How many pounds of chocolate chips did he use while baking?

5. Farmer Dave harvested his corn. He stored \(\frac{5}{9}\) of his corn in one large silo and \(\frac{2}{4}\) of the remaining corn in a small silo. The rest was taken to market to be sold.
   a. What fraction of the corn was stored in the small silo?
   
   b. If he harvested 18 tons of corn, how many tons did he take to market?