

T: Go ahead and do that. (Students erase a square.) What is the area of the shaded rectangle?

S: 9 square centimeters.

Repeat this process using the inch grid and inch tiles. If time allows, students can shade a shape for a partner, who then finds the area of the shape. Then, they can erase squares to create shapes with smaller areas. As students are ready, they can begin drawing shapes using squares rather than just erasing them.

Problem Set (10 minutes)

Inch and centimeter grid paper are required for some of these problems. Students should do their personal best to complete the Problem Set within the allotted 10 minutes. For some classes, it may be appropriate to modify the assignment by specifying which problems they work on first. Some problems do not specify a method for solving. Students should solve these problems using the RDW approach used for Application Problems.

Student Debrief (10 minutes)

Lesson Objective: Model tiling with centimeter and inch unit squares as a strategy to measure area.


The Student Debrief is intended to invite reflection and active processing of the total lesson experience.

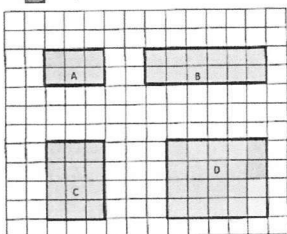
Invite students to review their solutions for the Problem Set. They should check work by comparing answers with a partner before going over answers as a class. Look for misconceptions or misunderstandings that can be addressed in the Debrief. Guide students in a conversation to debrief the Problem Set and process the lesson.

Any combination of the questions below may be used to lead the discussion.


- How are the rectangles in Problems 1(b) and 1(c) the same? How are they different?
- How are the rectangles in Problems 1(a) and 2(a) the same? How are they different?
- Which rectangle in Problem 2 has the largest area? How do you know?
- Compare the rectangles you made in Problem 4 with a partner's rectangles. How are they the same? How are they different?


Name Gina Date _____


1. Each  is 1 square unit. What is the area of each of the following shapes?




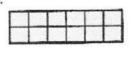
A: 6 square units
B: 12 square units
C: 12 square units
D: 20 square units

2. Each  is 1 square unit. What is the area of each of the following rectangles?

a.  6 square units

b.  9 square units

c.  16 square units

d.  12 square units

Exit Ticket (3 minutes)

After the Student Debrief, instruct students to complete the Exit Ticket. A review of their work will help with assessing students' understanding of the concepts that were presented in today's lesson and planning more effectively for future lessons. The questions may be read aloud to the students.

3. a. How would the rectangles in Problem 1 be different if they were composed of square inches?

The shapes in Problem 1 would be bigger if they were made of square inches. The number of squares would stay the same, but the size of the squares would change.

- b. Select one rectangle from Problem 1 and recreate it on square-inch and square-centimeter grid paper.

(See attached example)

4. Use a separate piece of square-centimeter grid paper. Draw four different rectangles that each has an area of 8 square centimeters.

(See attached example)

Examples of Problem 3(b) and Problem 4

