Name _____ Date _____ Period _____

Lesson 5-4 · Apply Day

Reinforce Understanding

Composite Figures

I can find the area of a composite figure by decomposing it into basic shapes, including a regular polygon split into triangles, and adding or subtracting the areas.

Worked model

A banner starts as a rectangle 18 in. by 12 in. A triangle with base 8 in. and height 6 in. is cut out of one end. Find the area left.

1. Find the area of the whole rectangle. 18 × 12 = 216
2. Find the area of the piece that was removed. ½ × 8 × 6 = 24
3. The piece is gone, so subtract. 216 − 24 = 192

Answer: The banner covers 192 square inches (192 in^2).

Practice

Complete each exercise. Show the reasoning that supports your answer.

1. (Lesson 5.4) A composite figure has rectangles 5×3 and 2×3. Find the total area.

Complete each step, then write the final answer.

1. First rectangle: 5 × 3 = ___.
2. Second rectangle: 2 × 3 = ___.
3. Add both areas: ___.

Answer: _____

2. (Lesson 5.4) A composite figure has rectangles 6×5 and 5×5. Find the total area.

Complete each step, then write the final answer.

1. First rectangle: 6 × 5 = ___.
2. Second rectangle: 5 × 5 = ___.
3. Add both areas: ___.

Answer: _____

3. (Lesson 5.4) A composite figure has rectangles 7×7 and 3×7. Find the total area.

Complete each step, then write the final answer.

1. First rectangle: 7 × 7 = ___.
2. Second rectangle: 3 × 7 = ___.
3. Add both areas: ___.

Answer: _____