## 1-9 Algebra: Area Formulas

## MAIN IDEA

- Find the areas of rectangles and squares.


## BUILD YoUR VocABULARY (pages 2-3)

The area of a figure is the number of $\square$ needed to cover a $\square$ A formula is an $\square$ that shows a
$\square$ among certain quantities.

## EXAMPLE Find the Area of a Rectangle

## Key Concept

Area of a Rectangle
The area $A$ of a rectangle is the product of the length $\ell$ and width $w$.
(1) Find the area of a rectangle with length 15 feet and width 10 feet.


The area is $\square$ square feet.

## Check Your Progress

Find the area of a rectangle with length 9 meters and width 13 meters.

## EXAMPLE Find the Area of a Square

2 Find the area of a square with side length 7 inches.
$A=s^{2}$
Area of a square
$A=\square$
Replace $s$ with $\qquad$
$A=\square \quad$ Multiply.

The area is $\square$ square inches.

Check Your Progress
Find the area of a square with side length 11 inches.

## EXAMPL:

## FOLDABLES

## ORGANIZE IT

Write the formula for the area of a rectangle on the Lesson 1-8 tab. Then draw a diagram to describe area.


3 SPORTS The outdoor Olympic swimming pool in Volos, Greece, measures 50 meters long and 25 meters wide. What is the area of the pool?

The length is 50 meters, and the width is 25 meters.
$A=\ell w \quad$ Area of a rectangle
$A=\square$ $\square$ and $w$ with $\square$
$\square$ Multiply.

The area of the pool is $\square$

## Check Your Progress

GARDENS Bill's garden is 18 feet long and 12 feet wide. What is the area of his garden?


