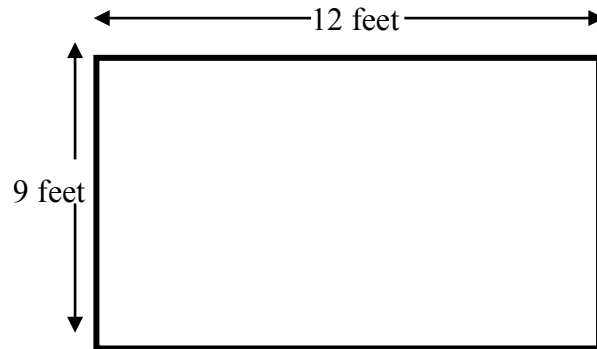


RA1

Look at this diagram of Linda's bedroom floor.



How many *one foot square tiles* are needed to tile the floor?

Show your work.

RA2

Look at the equation below.

$$3 \text{ feet} \times 4 \text{ feet} = 12 \text{ square feet}$$

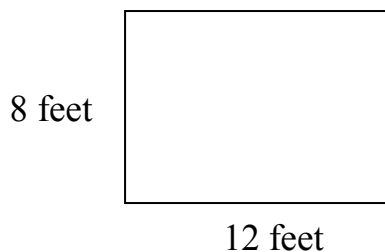
Circle the story problem below that matches this equation.
Explain your choice.

A. The bulletin board is 3 feet wide and 4 feet long. How much paper is needed to cover the bulletin board?

B. The bulletin board is 3 feet wide and 4 feet long. How much trim is needed to go around the outside of the bulletin board?

RA3

Below is a diagram of Sam's floor.



Sam is going to cover his floor with tiles. Each tile measures 1 foot by 1 foot.

Circle the equation below that Sam can use to find the correct number of tiles needed to cover his floor.

Explain your choice.

- A. $12 + 8 = 20$
- B. $12 - 8 = 4$
- C. $12 \times 8 = 96$
- D. $12 \div 8 = 1 \frac{1}{2}$
- E. $12 + 8 + 12 + 8 = 40$

RA4

Linda is covering her kitchen floor with tiles. Each tile covers 1 square foot.

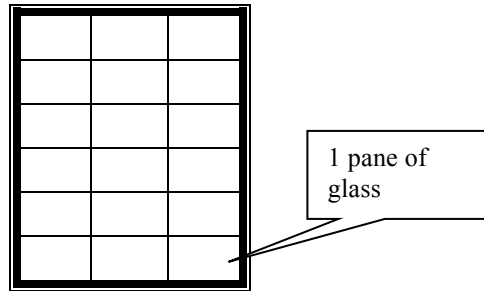
Linda's kitchen floor measures 12 feet by 7 feet.

How many tiles are needed to cover the floor?

Show your work.

RA5

The Smith's have 3 windows on the front side of their house like the picture below. Each window contains many panes of glass.

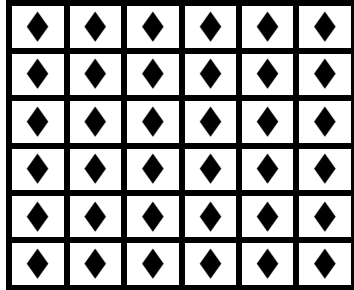


How many panes of glass are there in the 3 windows on the front of the Smith's house?

Show your work.

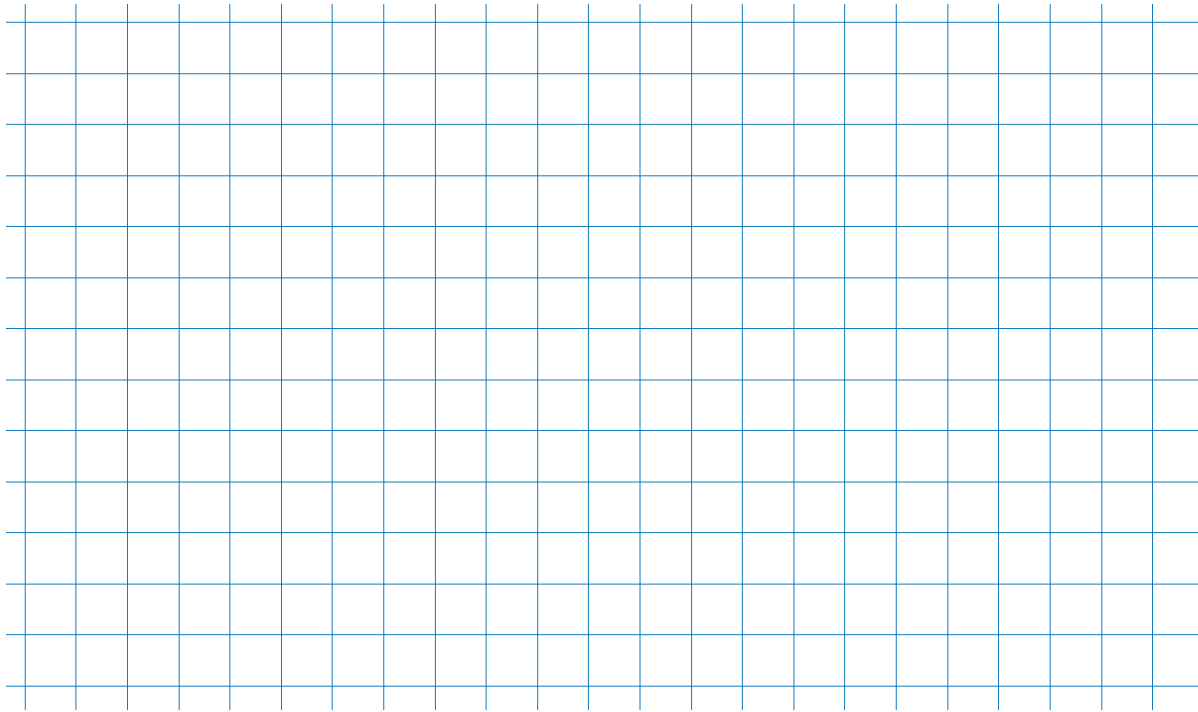
RA6

Here is a rectangle made with tiles.



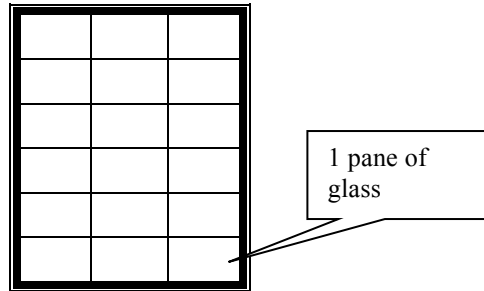
 Represents 1 tile

On the grid paper draw a rectangle that has the same number of tiles, but has different dimensions.



RA10

The Smith's have windows on the front side of their house like the picture below. Each window contains many panes of glass.



How many panes of glass are there in the 1 window?

Show your work.

RA12

Bob is putting a fence around his dog's pen. He knows that the area of the dog pen is 24 square yards. One side of the pen is 4 yards.

How long is the other side of the dog pen?

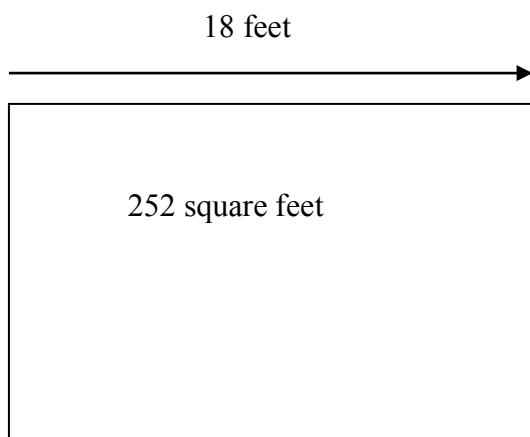
Show your work.

RA13

Linda is going to fence in her garden. The area of the garden is 252 square feet. One side of the garden is 18 feet long. She has 70 feet of fencing.

Does she have enough fencing to go around the garden?

Explain your thinking.



RA14

Marc is going to fence in his garden. The area of the garden is 168 square feet. One side of the garden is 12 feet long. What is the length of the other side of the garden?

Circle the equation below that will help Linda find the length of the other side of the garden.

Explain your choice.

A. $12 \times 168 = ?$

B. $12 \div 168 = ?$

C. $168 + 12 = ?$

D. $168 \div 12 = ?$

RA15

Mary is cutting a piece of paper to make a poster. The length of the paper is 34 inches and the width of the paper is 21 inches.

How many square inches in area is the paper?

Show your work.

RA16

Tamika made a rectangle using some tiles like the one shown below.



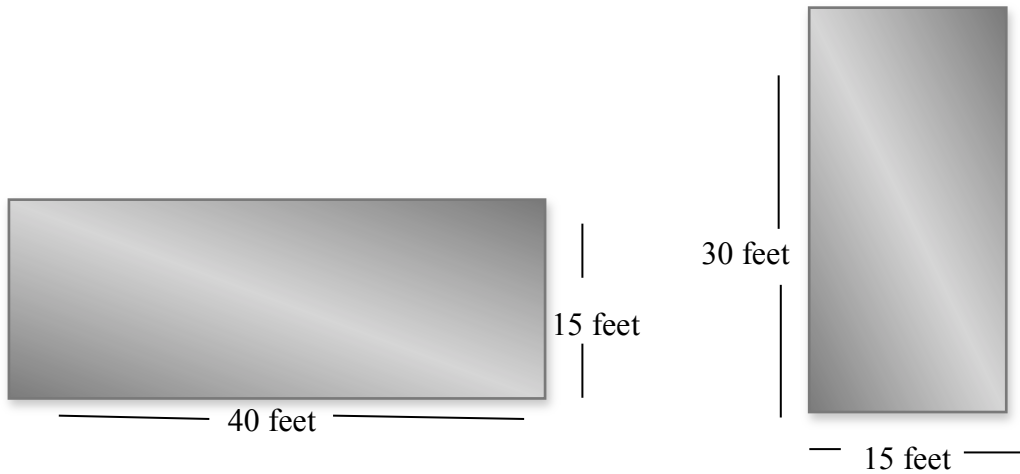
Her rectangle has 6 rows and there are 5 tiles in each row.

How many total tiles did Tamika use to make her rectangle?

Show your work.

RA17

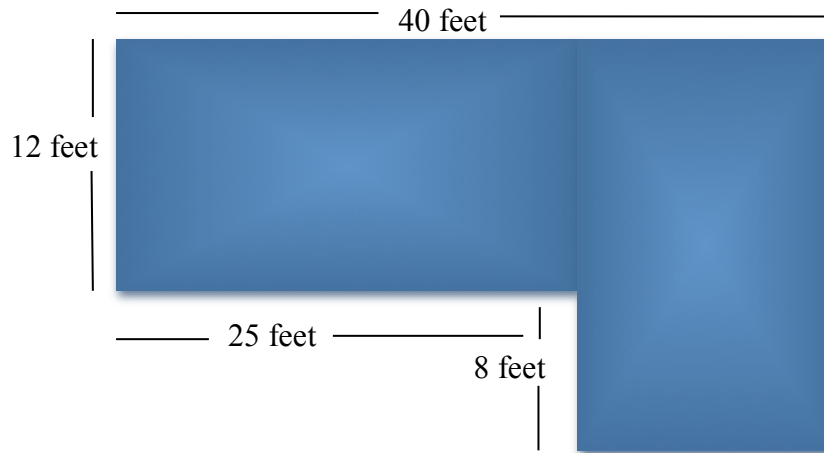
Tomiki put Figures A and B together to make a new shape.



What is the area of the new shape? Show your work.

RA18

A family is carpeting a room with the shape and dimensions pictured below.

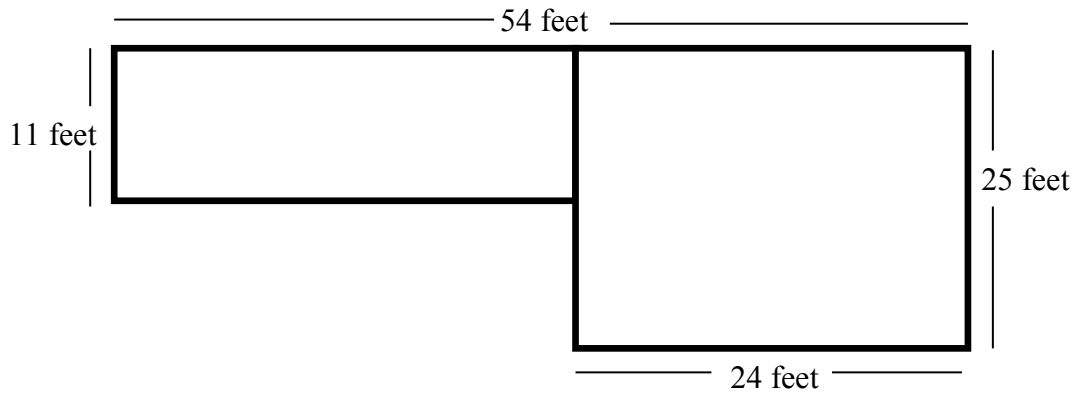


How many square feet of carpet will they need to cover the floor?

Show your work.

RA19

Look at this figure.



What is the area of the figure?

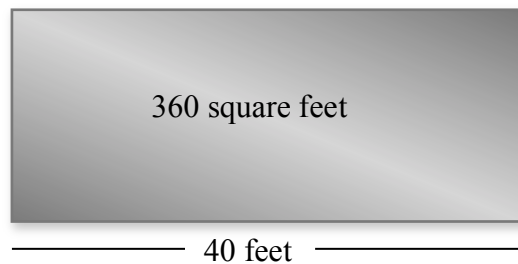
Show your work.

RA20

The following formulas are used to find the area and perimeter of rectangles.

$$\text{Area} = \text{length} \times \text{width} \qquad \text{Perimeter} = 2 \times \text{length} + 2 \times \text{width}$$

Show how you would use these formulas in order to find the missing dimension on this rectangle and the perimeter of the rectangle. Show your work.



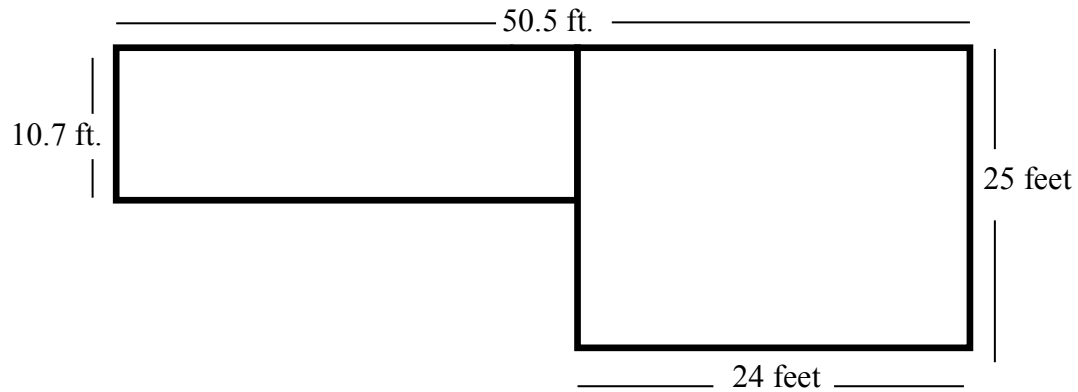
RA21

Autavia is painting her bedroom walls. Her room is 15 feet long and 10 feet wide. Her ceiling is 8 feet high.

If a can of paint typically covers 300 square feet, how many cans of paint does she need to buy? Show your work.

RA22

Look at this figure.



A) Write an equation that can be used to find the area of this figure.

B) What is the area of the figure? Show your work.

RA23 (Pilot)

Paint stores recommend that you use the following formula to calculate the area of walls to be painted to assure that you have enough paint.

Area to use when buying paint = width of walls x height of walls x 1.5

They say multiplying the area of a wall by 1.5 accounts for irregularities in walls or the surfaces of the walls.

The following are the dimensions of the walls of a living room that will be painted.

	Dimensions
Wall 1	12 feet long x 8 feet tall
Wall 2	18 $\frac{1}{4}$ feet long x 8 feet tall
Wall 3	12 feet long x 8 feet tall
Wall 4	18 $\frac{1}{4}$ feet long x 8 feet tall

What is the area to be considered when buying paint for this room?

Show your work.