

Name _____

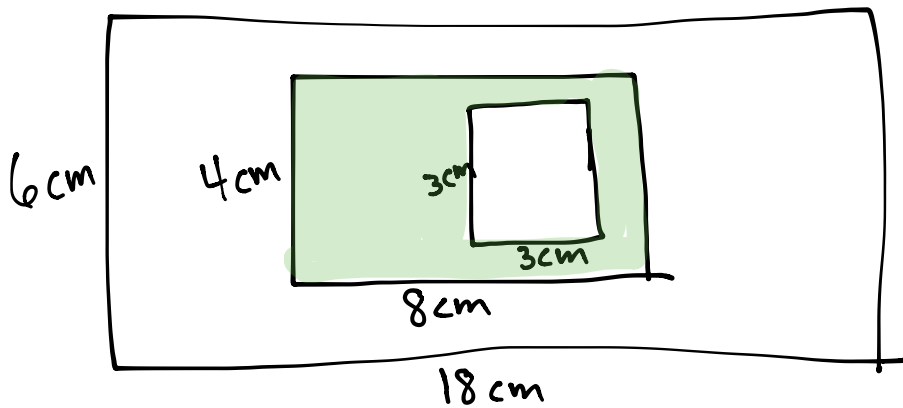
Date _____

For homework, complete the top portion of each page. This will become an answer key for you to refer to when completing the bottom portion as a mini-personal white board activity during the summer.

Use a ruler and protractor to create and shade a figure according to the directions. Then, find the area of the unshaded part of the figure.

1. Draw a rectangle that is 18 cm long and 6 cm wide. Inside the rectangle, draw a smaller rectangle that is 8 cm long and 4 cm wide. Inside the smaller rectangle, draw a square that has a side length of 3 cm. Shade in the smaller rectangle, but leave the square unshaded. Find the area of the unshaded space.

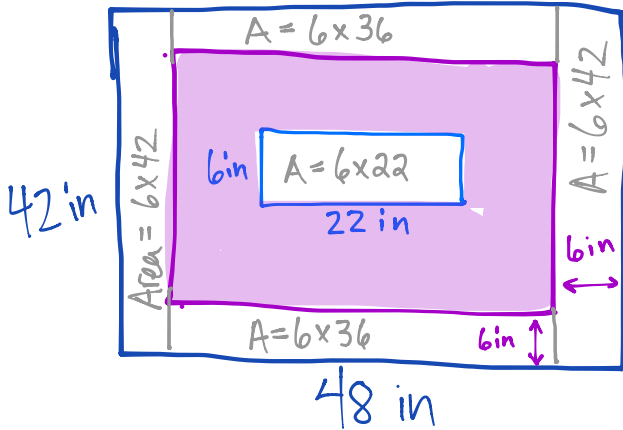
DRAWING IS NOT TO SCALE.



$$\begin{aligned} & (4 \times 8) - (3 \times 3) \\ &= 32 - 9 \\ &= 23 \text{ cm}^2 \end{aligned}$$

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1. Draw a rectangle that is 18 cm long and 6 cm wide. Inside the rectangle, draw a smaller rectangle that is 8 cm long and 4 cm wide. Inside the smaller rectangle, draw a square that has a side length of 3 cm. Shade in the smaller rectangle, but leave the square unshaded. Find the area of the unshaded space.

2. Emanuel's science project display board is 42 inches long and 48 inches wide. He put a 6-inch border around the edge inside the board and placed a title in the center of the board that is 22 inches long and 6 inches wide. How many square inches of open space does Emanuel have left on his board?



$$\begin{aligned}
 & (42 \times 48) - [(6 \times 42) + (6 \times 42) + (6 \times 36) + (6 \times 36) + (6 \times 22)] \\
 &= 2016 - [252 + 252 + 216 + 216 + 132] \\
 &= 2016 - 1068 \\
 &= 948 \text{ in}^2
 \end{aligned}$$

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Challenge: Replace the given dimensions with different measurements, and solve again.