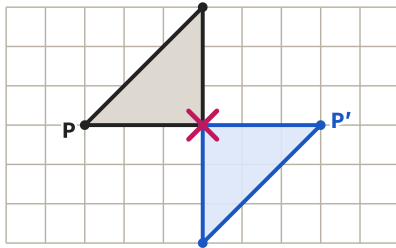


Rotating Shapes

ANSWERS

1

Rotate the shape 180° about the cross.



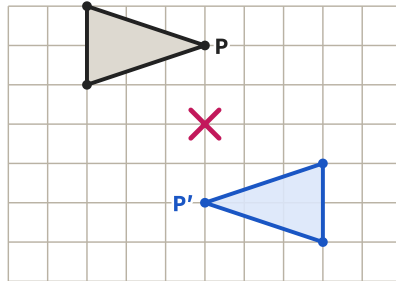
squares from the cross

P 3 up / down / (left) / right

P' 3 up / down / left / (right)

2

Rotate the shape 180° about the cross.



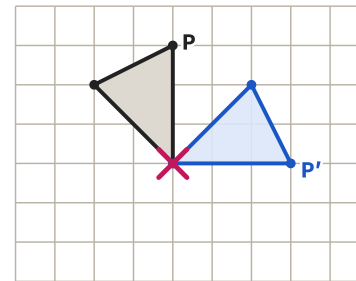
squares from the cross

P 2 (up) / down / left / right

P' 2 up / (down) / left / right

3

Rotate the shape 90° clockwise about the cross.



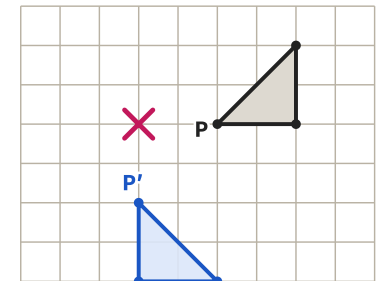
squares from the cross

P 3 (up) / down / left / right

P' 3 up / down / left / (right)

4

Rotate the shape 90° clockwise about the cross.



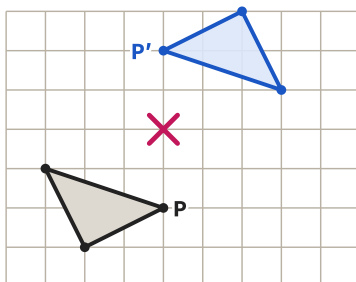
squares from the cross

P 2 up / down / left / (right)

P' 2 up / (down) / left / right

5

Rotate the shape 180° about the cross.



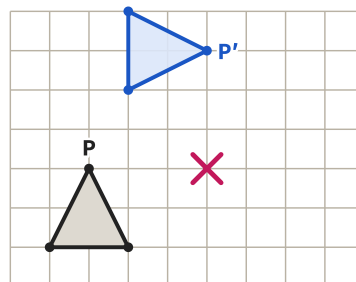
squares from the cross

P 2 up / (down) / left / right

P' 2 (up) / down / left / right

6

Rotate the shape 90° clockwise about the cross.



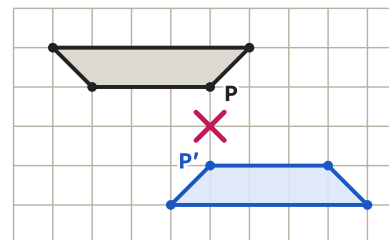
squares from the cross

P 3 up / down / (left) / right

P' 3 (up) / down / left / right

7

This is a boat. Rotate it 180° about the cross.



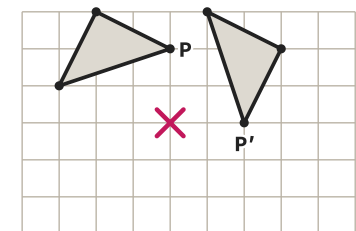
squares from the cross

P 1 (up) / down / left / right

P' 1 up / (down) / left / right

8

The shape turns about the cross. Is it a half turn or a quarter turn?



squares from the cross

P 2 (up) / down / left / right

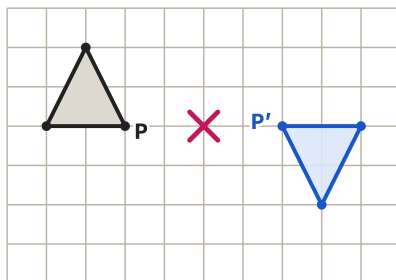
P' 2 up / down / left / (right)

half turn / (quarter turn)

9



Rotate the shape 180° about the cross.



squares from the cross

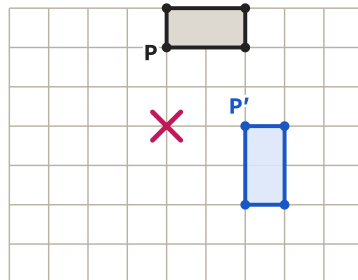
P 2 up / down / left / right

P' 2 up / down / left / right

10



Rotate the shape 90° clockwise about the cross.



squares from the cross

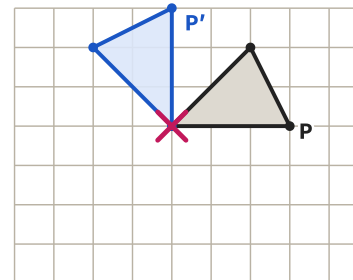
P 2 up / down / left / right

P' 2 up / down / left / right

11



Rotate the shape 90° anticlockwise about the cross.



squares from the cross

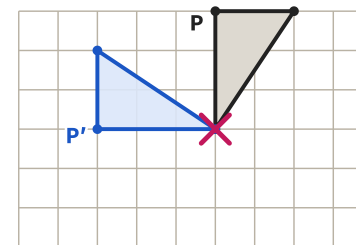
P 3 up / down / left / right

P' 3 up / down / left / right

12



A fan blade turns 90° anticlockwise about the cross. Draw the blade after the turn.



squares from the cross

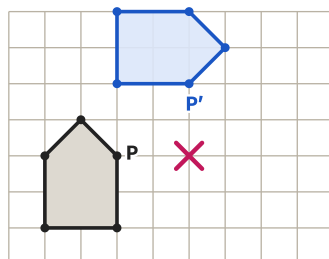
P 3 up / down / left / right

P' 3 up / down / left / right

13



This is a house.
Rotate it 90° clockwise about the cross.



squares from the cross

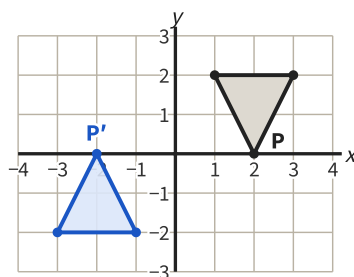
P 2 left

P' 2 up

14



Rotate the shape 180° about (0, 0).



squares from (0, 0)

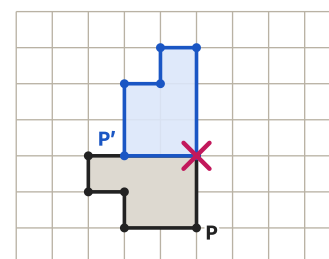
P 2 right

P' 2 left

15



In a game, this piece turns 90° clockwise about the cross.
Draw it after the turn.



squares from the cross

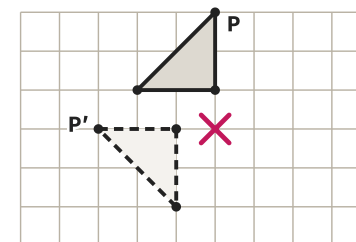
P 2 down

P' 2 left

16



Mia rotates the shape 90° clockwise about the cross. She draws the dashed shape. What went wrong?



P' should be 3 squares

to the right of the cross.

Mia turned it anticlockwise.