

slide



move an item in any direction
without rotating it

Translations Worksheets

Name: _____

Date: _____

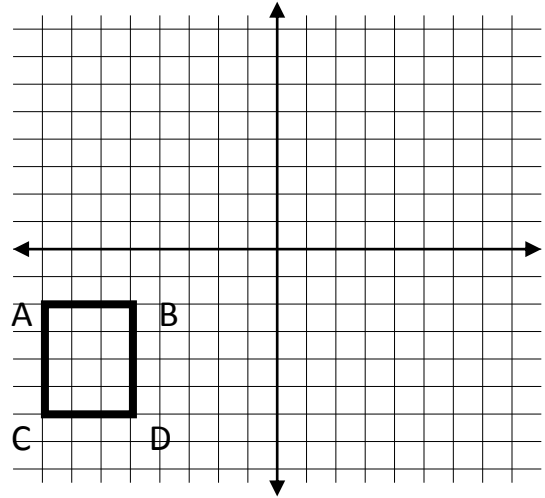
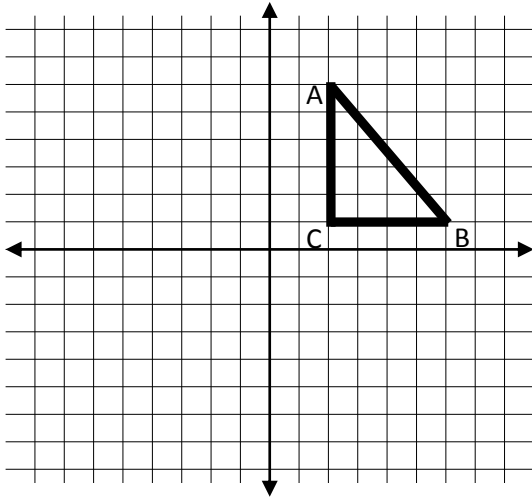
Period: _____

Sketch the image of the pre-image after the given translation. Label each vertex. Label image vertex as A', B', C' etc.

1. Slide 8 left and 5 down.

2. A(-8, -2) ; B(-5, -2) ; C(-8, -6) ;
D(-5, -6)

$$(x, y) \longrightarrow (x + 8, y + 10)$$



3. Graph and label the polygon determined by the coordinates below, then graph and label the image created by the transformation:

a)

P (4, 8) Q (2, 6)

R (2, 3) S (4, 5)

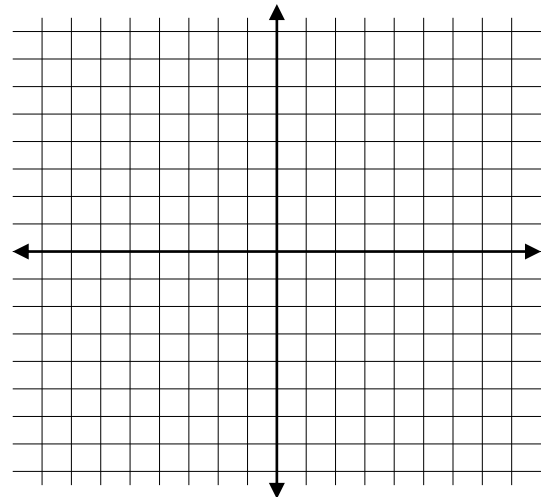
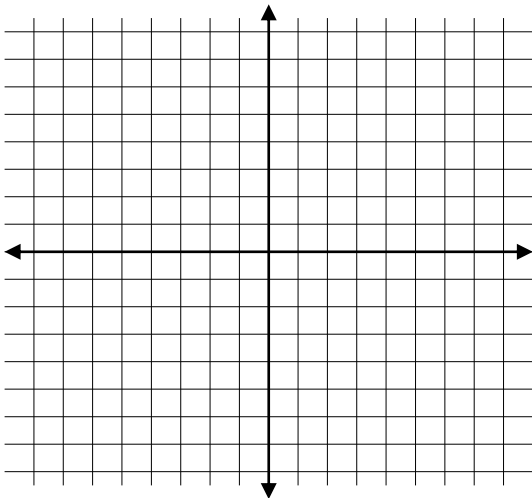
$$(x, y) \rightarrow (x + 4, y - 5)$$

b)

A (0, 0) B (-6, 0)

C (-6, 3)

$$(x, y) \rightarrow (x + 6, y + 3)$$



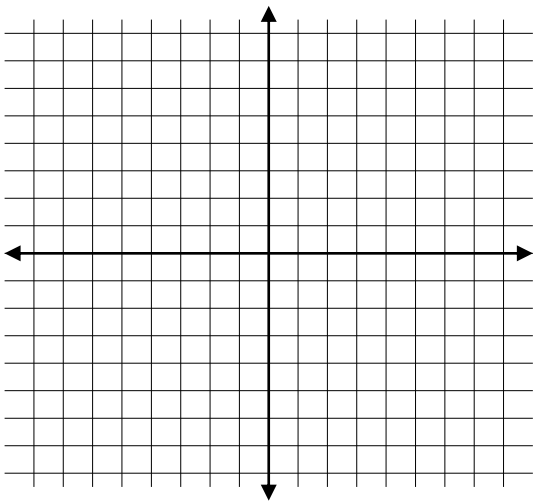
4. Graph and label the polygon determined by the coordinates below, then graph and label the image created by the transformation:

a)

P (5, 3) Q (7, 4)

R (7, 1)

$$(x, y) \rightarrow (x, y - 5)$$

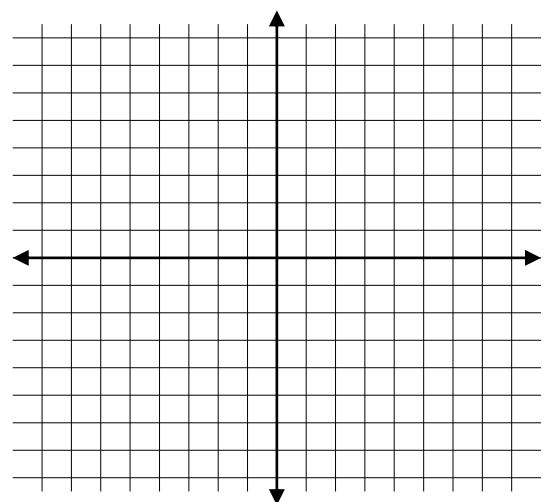


b)

A (-1, 1) B (1, 1)

C (1, -1) D (-1, -1)

$$(x, y) \rightarrow (x - 5, y)$$



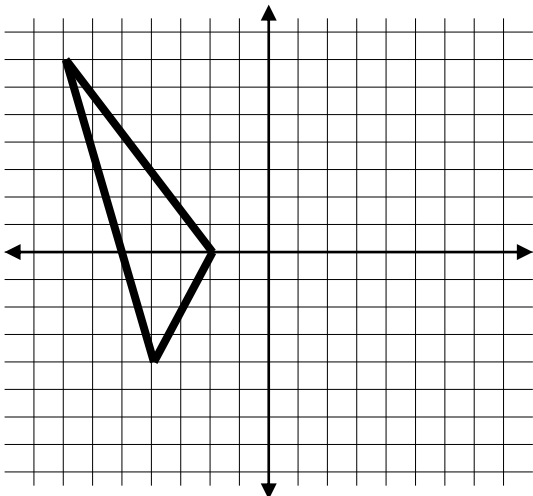
5. Describe the translation from the pre-image to the image.

a) Using words (left, right, up, down, etc.).

b) Using coordinate notation:

$$(x, y) \rightarrow (x \quad , y \quad)$$

Pre-image



Image

