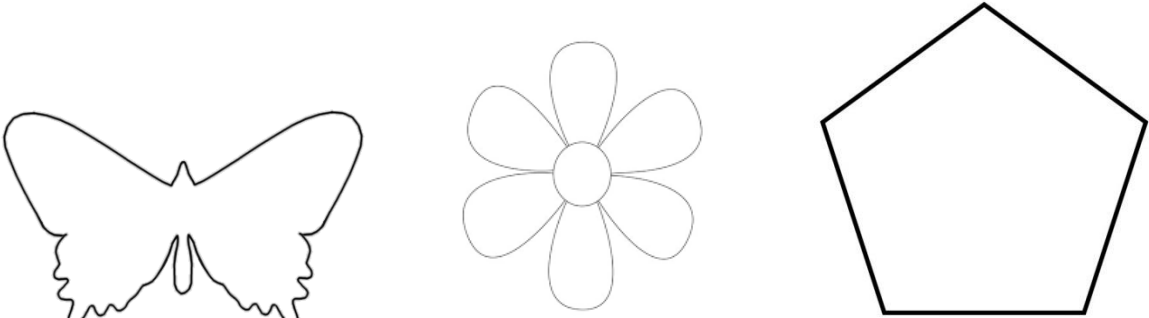



CSS: Describe the effects of dilations, translations, rotations, and reflections on two-dimensional figures using coordinates.

Name: _____ Date: _____ Per.: _____

LT Pre Test

Directions: Show what you know about the following topic by completing the problems below. Make sure to show all work.

1. Define two-dimensional.	2. Define the following words. Rotations – Reflections – Translations – Dilations –
3. What are coordinates?	
4. Identify and draw in the line(s) of symmetry in the pictures below. 	
5. Using the scale factor of 2 draw an enlargement of the shape below. Use a ruler to draw this exact. 	

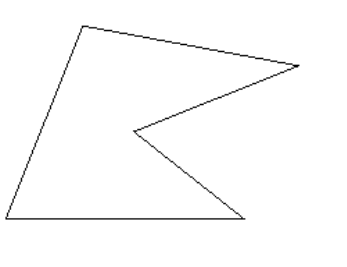
(4.G.3)

(7.G.1)

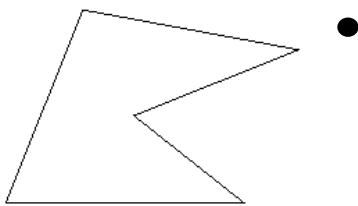
CSS: Describe the effects of dilations, translations, rotations, and reflections on two-dimensional figures using coordinates.

6. What happens to the side lengths and angles of the polygon below when the following transformation is applied to it? Reproduce the shape to show your thinking.

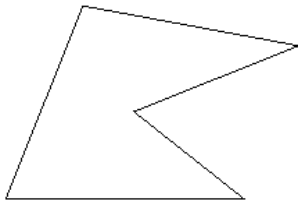
a. The polygon is reflected vertically across the line of symmetry below.



b. The polygon is rotated 180° clockwise about the point.

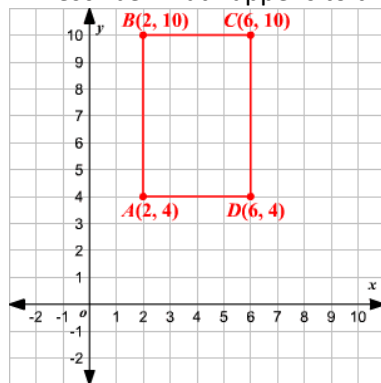


c. The polygon is translated 2 cm down and 1 cm to the right.



(8.G.1)

7. Describe what happens to the coordinates of the polygon when the following transformations occur.



a. The polygon is dilated by a factor of $1/2$.

b. The polygon is rotate about the origin 90° counter clockwise.

c. The polygon is translated by $(4, -2)$

d. The polygon is reflected about the y-axis.

(8.G.3)