

Geometry DAY 1.7
Classwork - Dilations

Name: _____
 Date: _____

Find the coordinates of the vertices of each figure after it has been dilated by the given scale factor about the origin.

$$K = \frac{\text{Image}}{\text{PreImage}}$$

1. dilation of 0.5

D(3, -4), V(2, 1), C(4, -1)

$D'(\frac{3}{2}, -2)$ $V'(1, \frac{1}{2})$ $C'(2, -\frac{1}{2})$

Describe the dilation about the origin.

2. dilation of 5

K(0, 1), J(1, 1), I(1, -1)

$K'(0, 5)$ $J'(5, 5)$ $I'(5, -5)$

3. X(-1, 0), G(0, 1), W(1, -1) \rightarrow Dilation of 4
 to $X'(-4, 0)$, $G'(0, 4)$, $W'(4, -4)$

$$D_{0,4}(x,y) \rightarrow (4x, 4y)$$

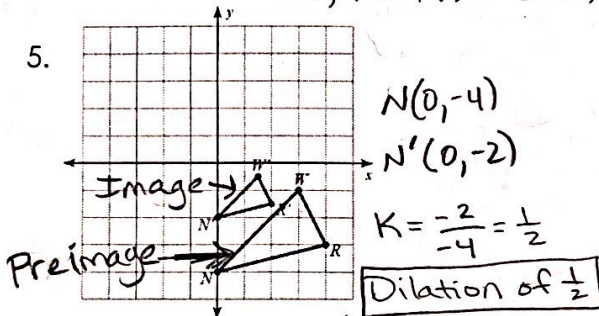
4. P(-5, 1), Q(-5, 2), R(-3, 3), S(-4, 1)

to $P'(-2.5, 0.5)$, $Q'(-2.5, 1)$, $R'(-1.5, 1.5)$, $S'(-2, 0.5)$

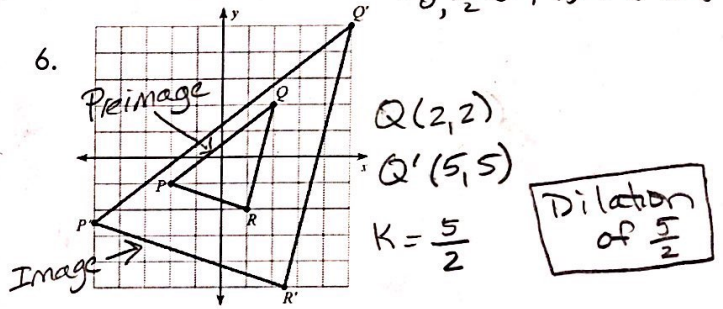
Dilation of $\frac{1}{2}$

$$D_{0,\frac{1}{2}}(x,y) \rightarrow (\frac{1}{2}x, \frac{1}{2}y)$$

5.

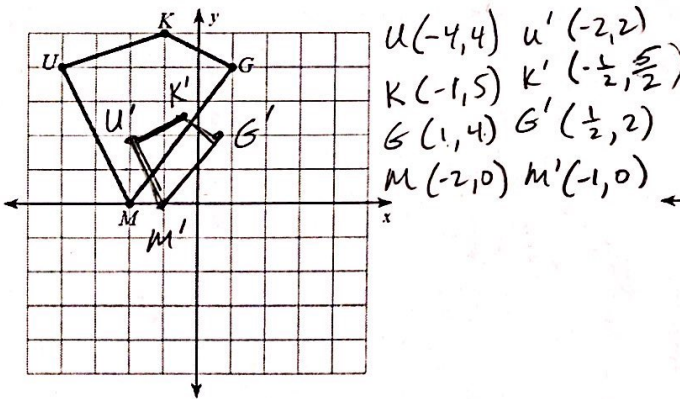


6.

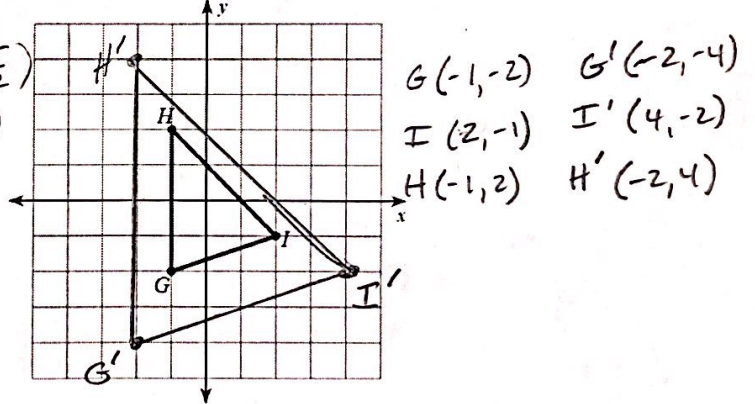


Find the vertices after the given dilation about the origin and graph.

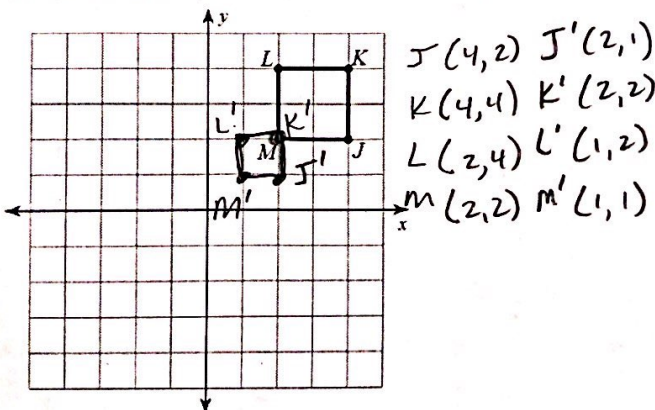
7. dilation of 0.5



8. dilation of 2



9. dilation of $\frac{1}{2}$



10. dilation of 2

