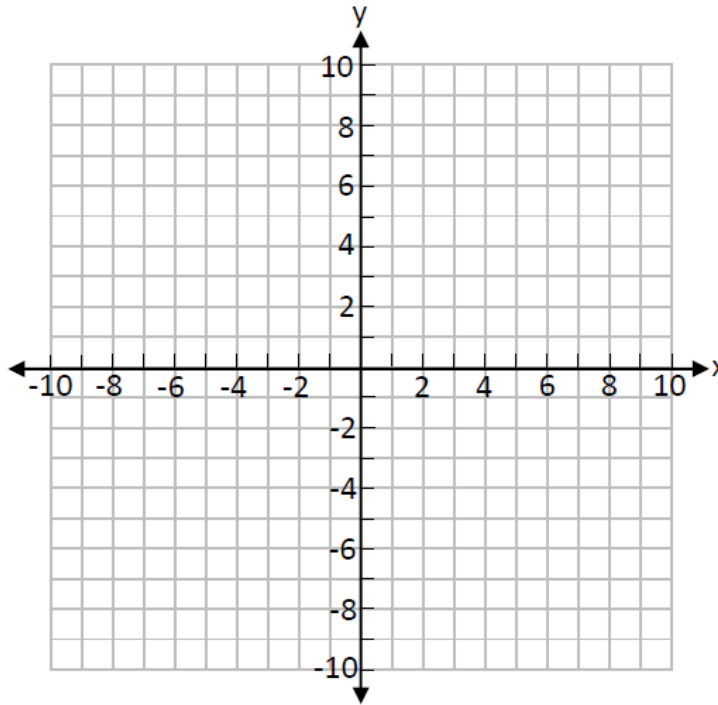


1. Graph and connect these points: (2, 2) (3, 4) (5, 2) (5, 4).



2. Graph the image on the same coordinate plane by applying a scale factor of 2.

What is the Algebraic Rule for this transformation? \_\_\_\_\_

How do the preimage and image compare?      What are the coordinate pairs of the image?

3. Graph the image on the same coordinate plane by applying a scale factor of 1/2.

What is the Algebraic Rule for this transformation? \_\_\_\_\_

How do the preimage and image compare?      What are the coordinate pairs of the image?

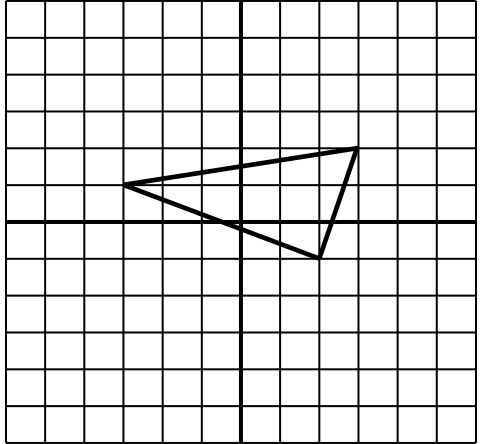
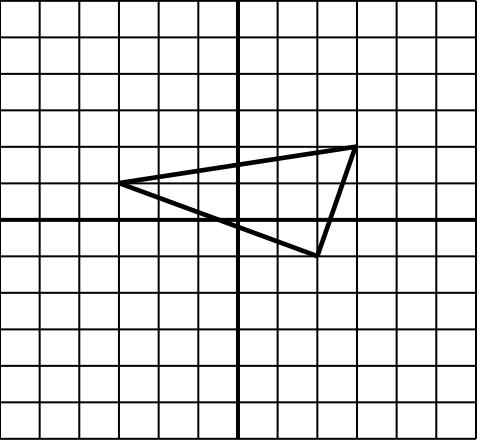
4. What happens when you apply a scale factor greater than 1 to a set of coordinates?

5. What happens when you apply a scale factor less than 1 to a set of coordinates?

6. What happens when you apply a scale factor of 1 to a set of coordinates?

## Unit 1 Day 4 CW (2)

For each problem, graph the image points, and describe the transformation that occurred. Specify if the transformation is an enlargement or reduction and by what scale factor. Then, examine the coordinates to create an Algebraic Rule.

<p>1) The coordinates of ABC are <math>A(2, -1)</math>, <math>B(3, 2)</math> and <math>C(-3, 1)</math>. The coordinates of <math>A'B'C'</math> are <math>A'(1, -1/2)</math>, <math>B'(3/2, 1)</math>, and <math>C'(-3/2, 1/2)</math>.</p> <p>Transformation:</p> <p>Algebraic Rule:</p>	
<p>2) The coordinates of ABC are <math>A(2, -1)</math>, <math>B(3, 2)</math> and <math>C(-3, 1)</math>. The coordinates of <math>A'B'C'</math> are <math>A'(4, -2)</math>, <math>B'(6, 4)</math>, and <math>C'(-6, 2)</math>.</p> <p>Transformation:</p> <p>Algebraic Rule:</p>	
<p>3) The coordinates of ABC are <math>A(2, -1)</math>, <math>B(3, 2)</math> and <math>C(-3, 1)</math>. The coordinates of <math>A'B'C'</math> are <math>A'(3, -3/2)</math>, <math>B'(9/2, 3)</math>, and <math>C'(-9/2, 3/2)</math>.</p> <p>Transformation:</p> <p>Algebraic Rule:</p>	