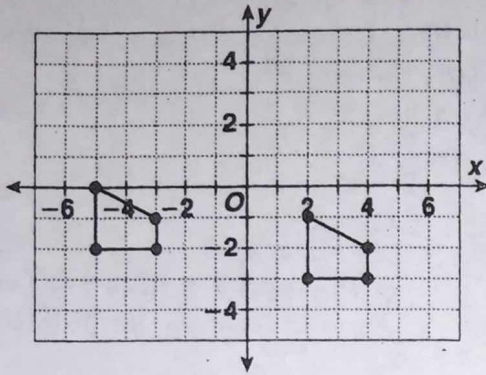


W/2 #5

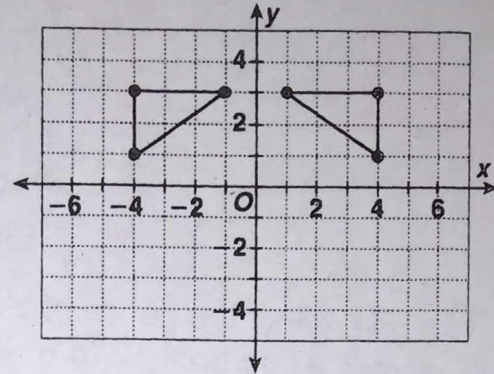
Identify the transformation. Choose the letter of the best answer.

1.



- A translation
- B reflection
- C rotation

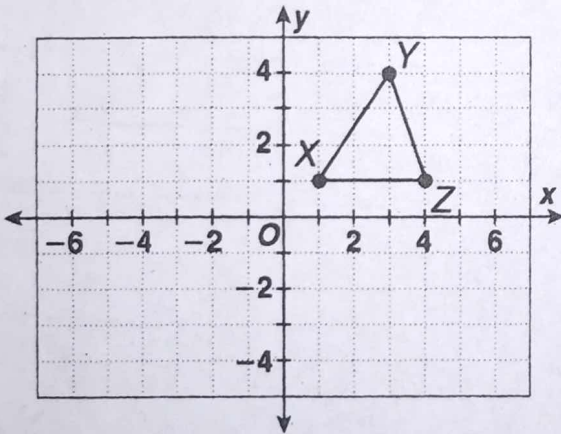
2.



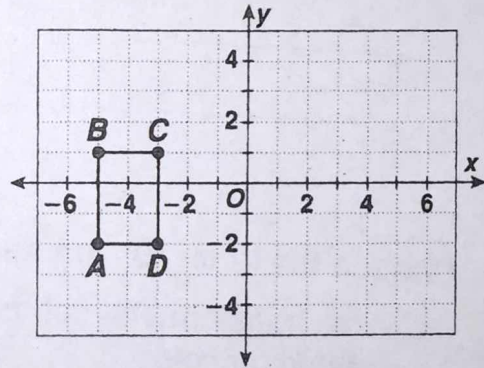
- A translation
- B reflection
- C rotation

Graph each translation.

3. 2 units to the left and 4 units down

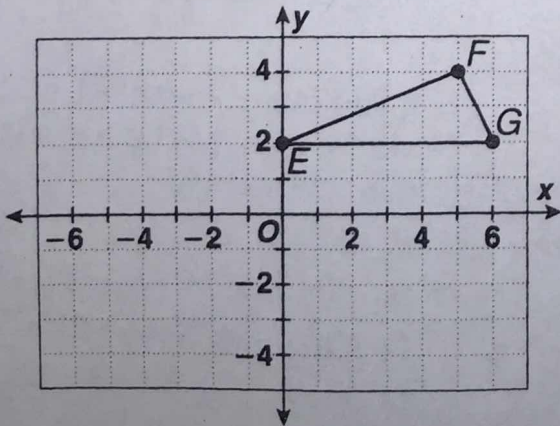


4. 3 units to the right and 2 units up

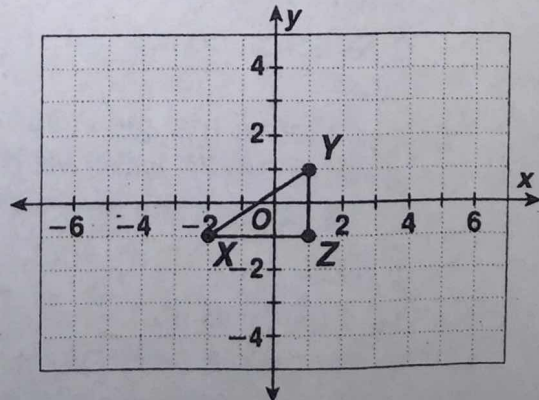


Follow the directions to graph each transformation.

5. Reflect $\triangle EFG$ across the x -axis.



6. Rotate $\triangle XYZ$ 180° about the vertex X .



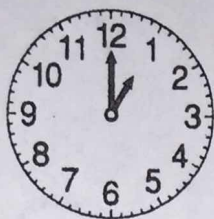
LESSON

8-10

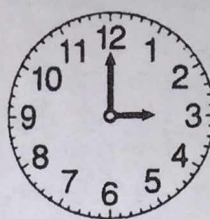
Problem Solving

Translations, Reflections, and Rotations

Write the correct answer.



Clock 1



Clock 2

1. If you reflect the hands of clock 1 across a line from 12 to 6, what time will it show?

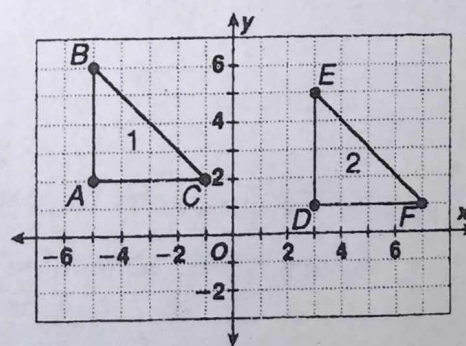
3. The hands on clock 1 show 7:00 after a transformation of one hand. What was the transformation?

2. If you rotate the hour hand on clock 2 by 90° clockwise, what time will it be?

4. The hands on clock 2 show 9:00 after a transformation. Name 2 different transformations that could produce this change.

Choose the letter for the best answer.

5. What transformation of triangle 1 created triangle 2?
- A translation 3 units right and 1 unit down
- B translation 8 units right and 1 unit down
- C rotation of 180° about the origin
- D reflection across the y -axis



6. If you rotate triangle 2 90° clockwise about vertex D , what will be the coordinates of the new triangle?
- ~~F $D'(3, 1), E'(7, 1), F'(3, -3)$~~
- ~~G $D'(3, 1), E'(3, -3), F'(7, 1)$~~
- ~~H $D'(3, 1), E'(-4, 1), F'(-3, 3)$~~
- ~~J $D'(3, 1), E'(-3, 3), F'(-7, 1)$~~

7. If you reflect triangle 1 across the x -axis, what will be the coordinates of the new triangle?
- A $A'(5, 2), B'(5, 6), C'(1, 2)$
- B $A'(-5, 0), B'(-5, -4), C'(-1, 0)$
- C $A'(5, -2), B'(5, -6), C'(1, -2)$
- D $A'(-5, -2), B'(-5, -6), C'(-1, -2)$