

9.1 - 9.3 Transformations Quiz Review

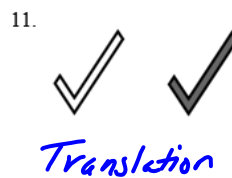
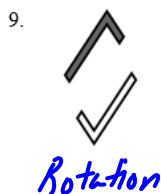
Name _____

Write the definitions of each term in your own words.

1. Transformation -
2. Translation -
3. Reflection -
4. Rotation -
5. Rigid Motion -
6. Isometry -
7. Pre-Image -
8. Image -

See 9.1-9.3 Notes for Definitions!

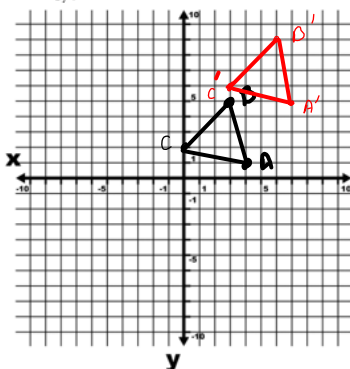
Name the transformation that maps the shaded check to the unshaded check.



Graph $\triangle ABC$ with points $A(4, 1)$, $B(3, 5)$, and $C(0, 2)$ then graph the image of $\triangle ABC$ with the given transformation.

12. $T_{\langle 3, 4 \rangle}$

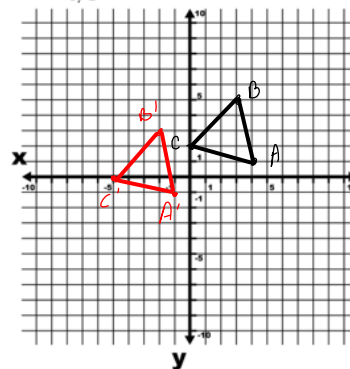
right 3, up 4



$A'(7, 5)$ $B'(6, 9)$ $C'(3, 6)$

13. $T_{\langle -5, -2 \rangle}$

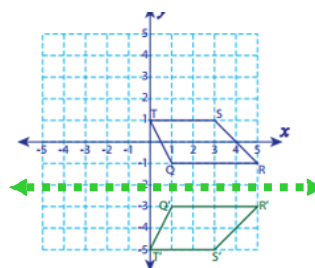
left 5, down 2



$A'(-1, -1)$ $B'(-2, 3)$ $C'(-5, 0)$

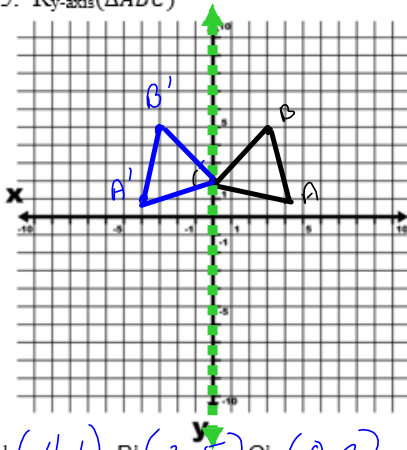
14. In the graph at the right, what is the line of reflection?

$y = -2$



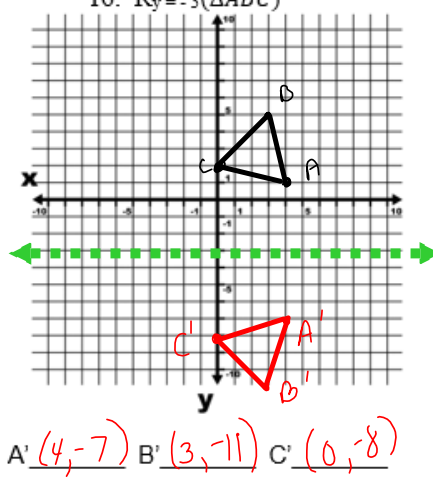
Graph $\triangle ABC$ with points $A(4, 1)$, $B(3, 5)$, and $C(0, 2)$ then graph the image of $\triangle ABC$ with the given transformation.

15. $R_{y\text{-axis}}(\triangle ABC)$



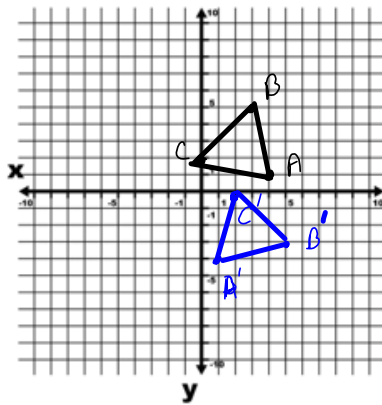
$A'(-4,1)$ $B'(-3,5)$ $C'(0,2)$

16. $R_{y=-3}(\triangle ABC)$



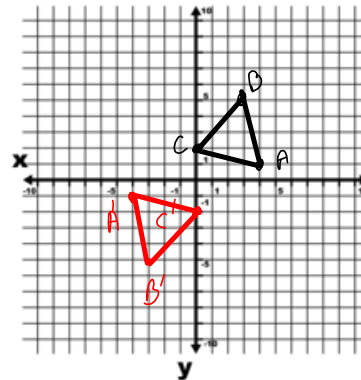
$A'(4,-7)$ $B'(3,-11)$ $C'(0,-8)$

17. $r(270^\circ, 0)(\triangle ABC)$ 3 quadr over - Flip coord.



$A'(1,-4)$ $B'(5,-3)$ $C'(2,0)$

18. $r(180^\circ, 0)(\triangle ABC)$ 2 quadr over



$A'(-4,-1)$ $B'(3,-5)$ $C'(0,-2)$

Do not flip coord.

State the coordinates of D' for the requested transformation. $D(3,2)$

19. $T\langle 3, 4 \rangle(D)$ $(6,6)$
right 3 up 4

20. $R_{y\text{-axis}}(D)$ $(-3,2)$

21. $r(90^\circ, 0)(D)$ $(-2, 3)$
equal

22. reflected across the x-axis $(3, -2)$

23. $A'B'C'$ is the image of ABC .
What rule describes this translation? $T\langle 11, -7 \rangle(\triangle ABC)$

