TRANSFORMATIONS QUIZ #1 REVIEW W/S

1. Graph $\triangle ABC$ with vertices A(2, 4), B(0, -2), and C (-3, 1). Graph and find the coordinates of $\triangle A'B'C'$ using the translation rule (x, y) \rightarrow (x + 2, y - 1)



- 2. Point Y(-2, 3) is translated six units to the right and nine units down, what are the coordinates of Point Y'?
- 3. Quadrilateral ABCD has vertices A(-1, 4), B(-3, 2), C(-2, -1), and D(1, -2). Use the translation rule $(x, y) \rightarrow (x + 2, y 3)$ to graph quadrilateral A'B'C'D'. (Be sure to label each of the new points with the correct letter)



4-7: Use the graph below.

 ΔPSV is translated one unit left and three units down.



8. Use arrow notation to write a rule that describes the translation.



9: Quadrilateral BGRW is reflected over the x - axis. Draw and label the image of Quadrilateral B'G'R'W'.



9. What are the coordinates of W'? W'(______) 10: Δ GIL is reflected over the y – axis. Draw and label the image of Δ G'I'L'.



10. What are the coordinates of I'?

11: Draw the line of reflection that caused SALP to reflect onto S'A'L'P'.



12: ΔDMP is reflected over the given line. Draw and label the image of $\Delta D'M'P'$.



12. What are the coordinates of P'?

P' (_____, ____)

- 13-16: Use the graph below
- 13. What are the coordinates of A (3, -2) under a 90° **counterclockwise** rotation about the origin?

A'(,)

14. What are the coordinates of B (-4, -5) under a 180° **counterclockwise** rotation about the origin?

```
B'( , )
```

15. What are the coordinates of C (6, 1) under a 90° **clockwise** rotation about the origin?



16. What are the coordinates of D (-4, 1) under a 270° **counterclockwise** rotation about the origin?



- 17. What is a reflection?
- 18. What is a translation?
- 19. What is a rotation?
- 20. What is a transformation?