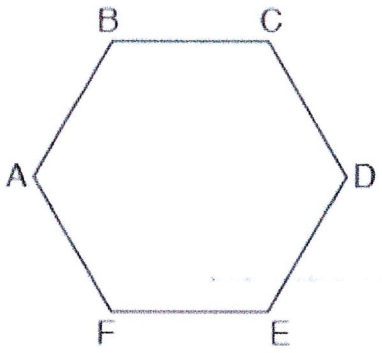
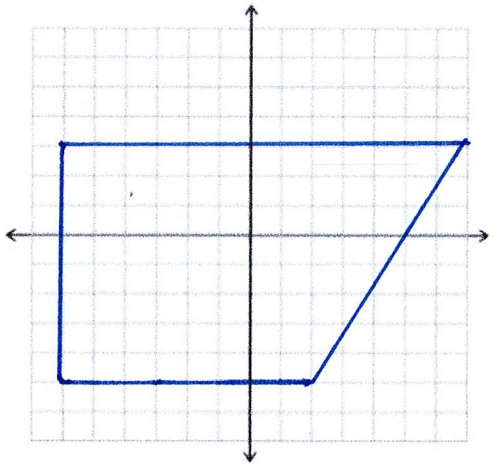
Name _____ TH #9

1. Name the angle of rotation that would map point D onto point B (**counterclockwise**!) _____



2. Find the area of the figure



3. _____Which of the following statements is true?

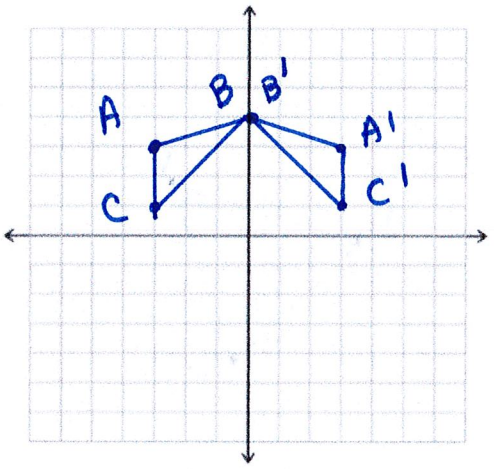
A. SSS; $\overline{AB}$ is taken to $\overline{A'B'}$, $\overline{AC}$ is taken to $\overline{B'C'}$, $\overline{BC}$ is taken to $\overline{A'C'}$

B. AAA; ∠A is taken to ∠A', ∠B is taken to ∠B', ∠C is taken to ∠C',

C. AAS; ∠A is taken to ∠A', ∠B is taken to ∠B', $\overline{BC}$ is taken to $\overline{B'C'}$

D. ASA; ∠A is taken to ∠A', ∠B is taken to ∠B' $\overline{BC}$ is taken to $\overline{B'C'}$

diagram for #3



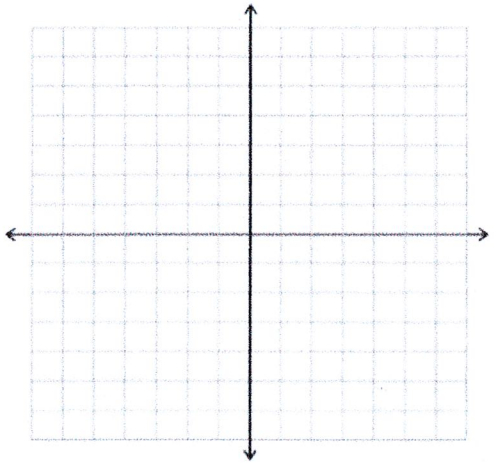
4. write the equation of a line parallel to the line y = $\frac{1}{4}$x – 1 passing through (24, 36)

hint: y=mx+b

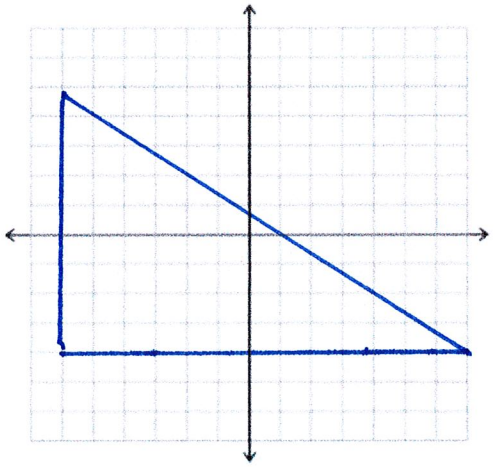
5. write the equation of a line perpendicular to the line y = $\frac{1}{4}$x – 1 passing through (24, 36)

y=mx+b

6. Find the perimeter of the triangle with the vertices: (-2, 2) (3, 2) (1, -3)



7. Find the circumcenter of the triangle

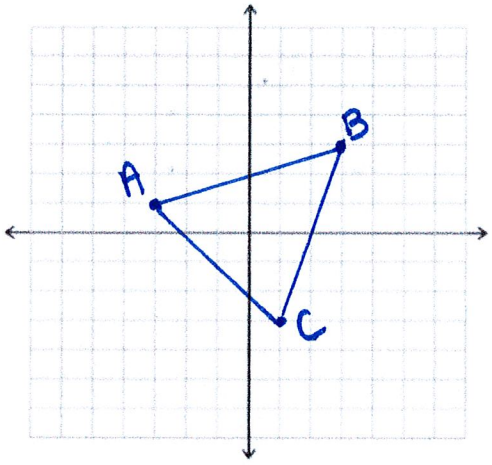


8. dilate ΔABC by a scale factor of 2 with center (0,0)

length of AB = _____

length of A'B'_____

∠A ≅ ∠ __

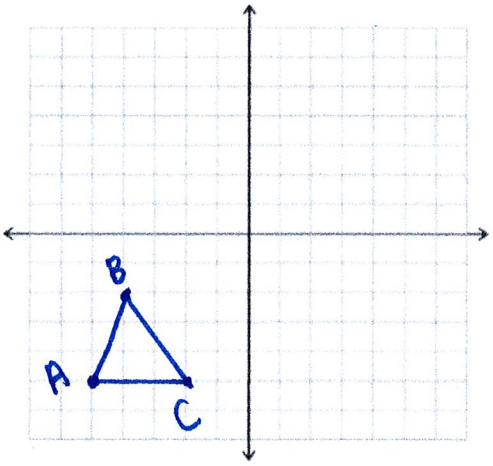


9. dilate ΔABC by a scale factor of 3 with center A.

AB = _____

length of A'B'_____

BC is parallel to _____



10. list the three undefined terms in geometry:

11. list the three isometries that preserve side length and angle measure: