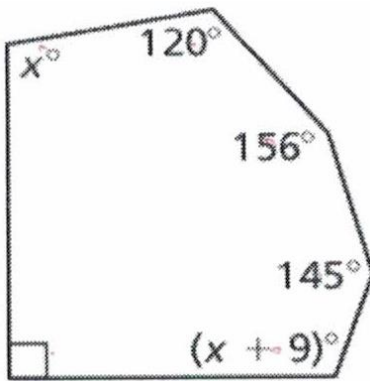


- 1.) Given a pentadecagon, find;
 - a.) the sum of the interior angles;
 - b.) the sum of the exterior angles;
 - c.) the measure of each interior angle if the polygon is regular.

- 2.) You are given two regular polygons, a pentagon and a heptagon. If one exterior angle is chosen from each, which of these regular polygons has the larger exterior angle? How much larger is the angle? Briefly explain and show your work!

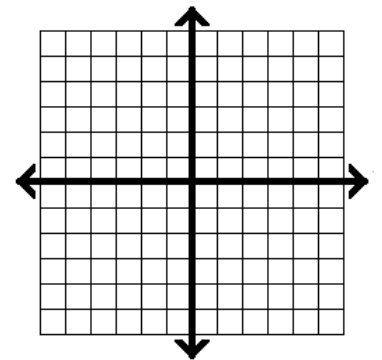
- 3.) A decagon has three angles with measures of 54° and two other angles with measures of 125° . Find the measure of any one of the remaining angles if they are all congruent to each other.

- 4.) Find the value of x in the diagram below.



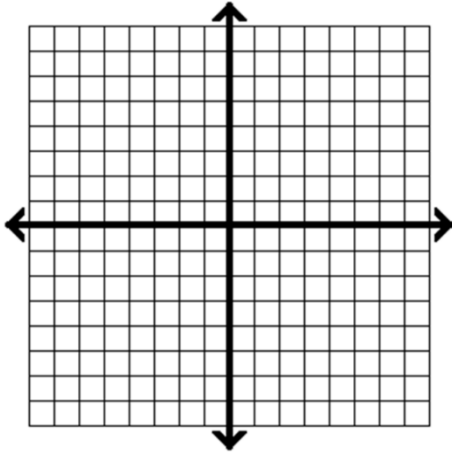
- 5.) Three vertices of $\square JKLM$ are $J(-2,-1)$, $K(0,2)$, and $L(4,3)$.

- a.) Find the coordinates of the fourth vertex M .
- b.) Find the coordinates of the intersection of the diagonals of $\square JKLM$.

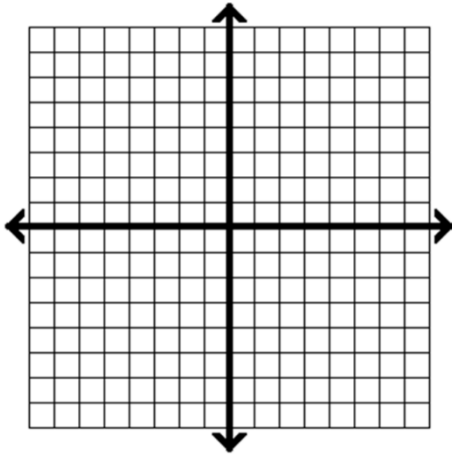


Find the most descriptive name for each quadrilateral below. You must show your work and explain!

6.) Quadrilateral $ABCD$ with vertices: $A(-4,1)$ $B(0,4)$ $C(4,0)$ $D(-4,-6)$.



7.) Quadrilateral $EFGH$ with vertices: $E(-4,1)$ $F(-5,6)$ $G(0,5)$ $H(1,0)$.



8.) Quadrilateral $NPRS$ with vertices: $N(-4,0)$ $P(-2,3)$ $R(4,-2)$ $S(2,-5)$.

