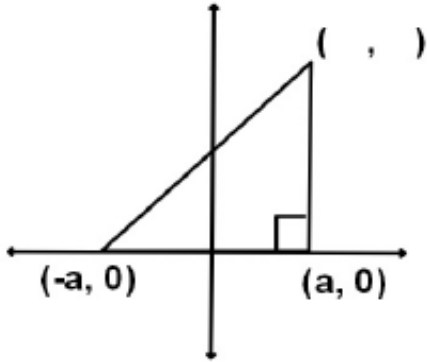
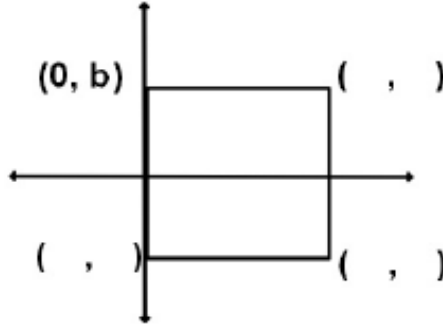


#1-3: fill in the missing coordinates, without introducing new letters.

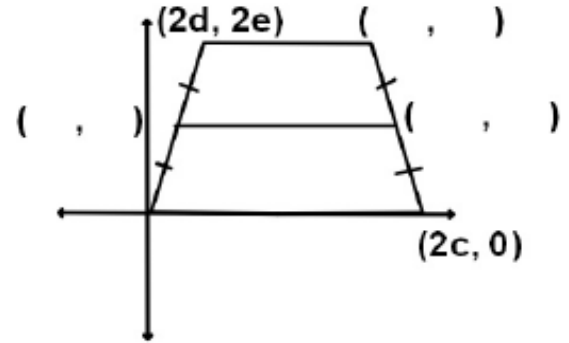
1. isosceles right triangle



2. square



3. isosceles trapezoid

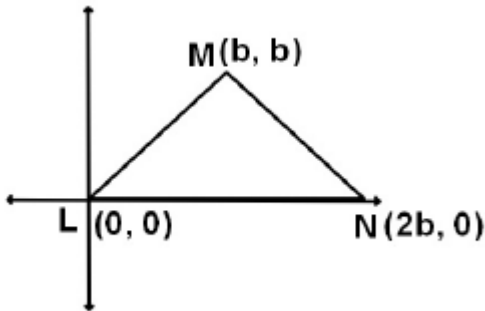


#4-6: write coordinate proofs. Show your work! Work must be neat and organized.

4. Prove that $\triangle LMN$ is an isosceles right triangle.

Given: $\triangle LMN$

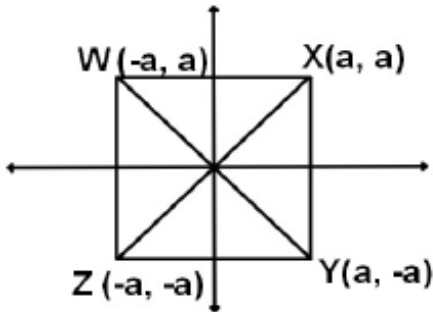
Prove: $\overline{LM} \cong \overline{NM}$, $\angle M$ is a right angle



5. Prove that the diagonals of a square are congruent.

Given: square WXYZ

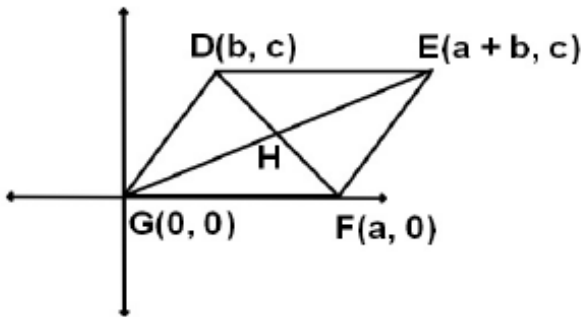
Prove: $\overline{WY} \cong \overline{XZ}$



6. Prove that the diagonals of a parallelogram bisect each other.

Given: parallelogram DEFG

Prove: H is the same midpoint for \overline{DF} and \overline{EG}



7. Graph $\triangle CAT$, with C (-1, 6), A (5, 4), and T (3, -6). Find the midpoint M for \overline{CA} and midpoint N for \overline{CT} . Show that \overline{MN} is parallel to \overline{AT} .

