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Determine the midpoint of the given line segment on each coordinate plane using the Midpoint Formula.
1.


Locate the midpoint of each line segment using construction tools and label it point $M$.
2.

For \#3, use the given endpoint $R$ and the midpoint $M$ of $\overline{R S}$ to find the coordinates of the other endpoint $S$.
3. $\mathrm{R}(8,0)$ and $\mathrm{M}(4,-5)$
4. Austin $(10,-7)$ and Dallas $(0,8)$ are plotted on a coordinate grid.

Podunk is $\frac{4}{5}$ the distance from Dallas to Austin.
What is the coordinate location of Podunk $\mathrm{P}(\quad, \quad)$ ?

5. Find the coordinates of point M that is $\frac{1}{4}$ the distance from R to T ?


