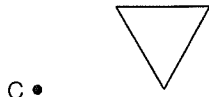


9-5 Skills Practice

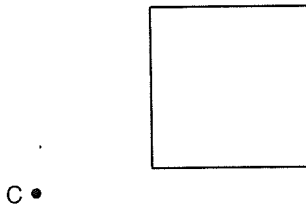
Dilations

Draw the dilation image of each figure with center C and the given scale factor.

1. $r = 2$



2. $r = \frac{1}{4}$



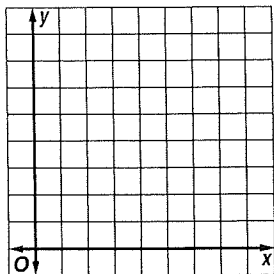
Find the measure of the dilation image $\overline{M'N'}$ or of the preimage \overline{MN} using the given scale factor.

3. $MN = 3, r = 3$

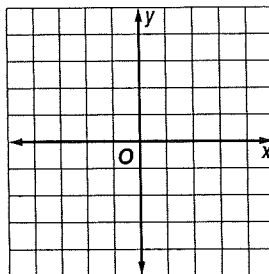
4. $M'N' = 7, r = 21$

COORDINATE GEOMETRY Find the image of each polygon, given the vertices, after a dilation centered at the origin with a scale factor of 2. Then graph a dilation centered at the origin with a scale factor of $\frac{1}{2}$.

5. $J(2, 4), K(4, 4), P(3, 2)$



6. $D(-2, 0), G(0, 2), F(2, -2)$



Determine the scale factor for each dilation with center C . Determine whether the dilation is an *enlargement*, *reduction*, or *congruence transformation*. The dashed figure is the dilation image.

