

Classwork 4/29

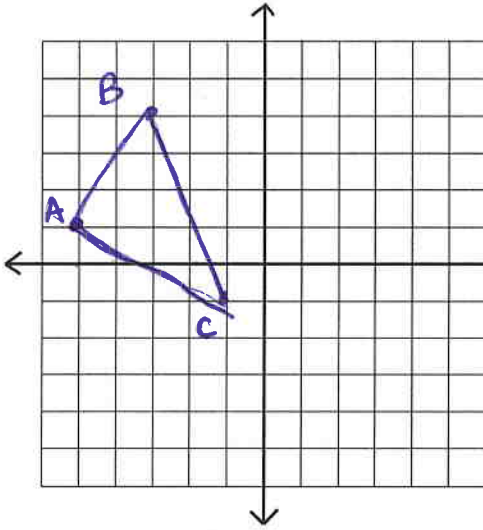
7.2 Practice Rotation Problems

Name: _____

Complete the ordered pair rule that transforms the original polygon.

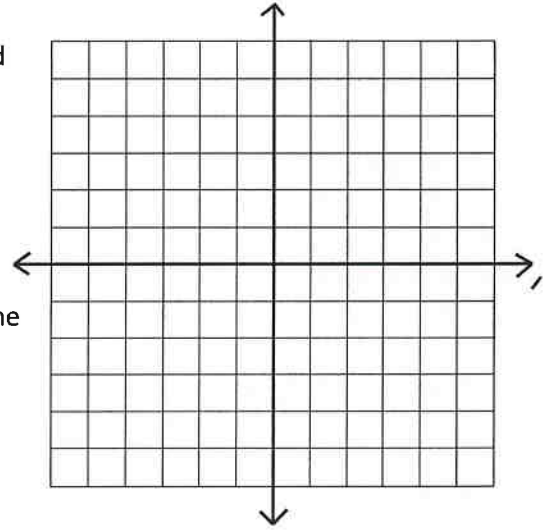
1. $(x, y) \rightarrow (\underline{\hspace{2cm}}, \underline{\hspace{2cm}})$

Rotate $\triangle ABC$:
 $A(-5, 1)$
 $B(-3, 4)$
 $C(-1, -1)$
 by 90° about the origin.



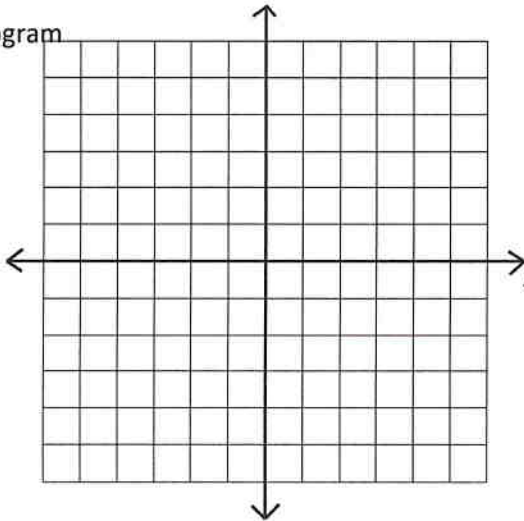
2. $(x, y) \rightarrow (\underline{\hspace{2cm}}, \underline{\hspace{2cm}})$

Rotate trapezoid $DEFG$:
 $D(-1, -1)$
 $E(3, 1)$
 $F(2, -2)$
 $G(0, -3)$
 by 180° about the origin.



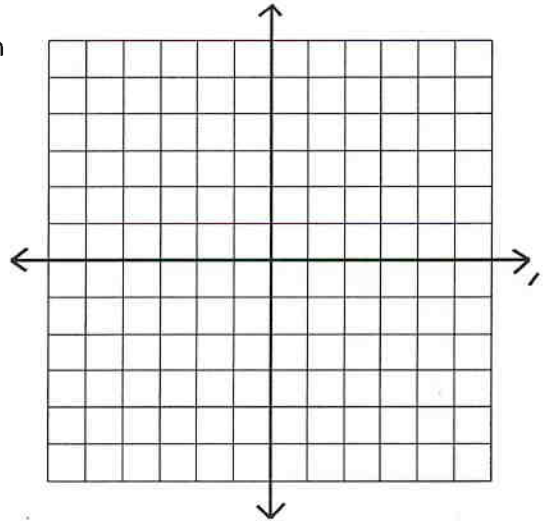
3. $(x, y) \rightarrow (\underline{\hspace{2cm}}, \underline{\hspace{2cm}})$

Rotate parallelogram $\square RSTU$:
 $R(-5, -5)$
 $S(-3, -4)$
 $T(-1, -1)$
 $U(-3, -2)$
 by 270° about the origin.



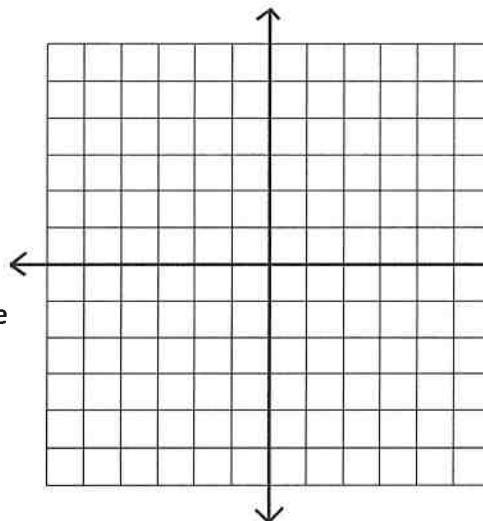
4. $(x, y) \rightarrow (\underline{\hspace{2cm}}, \underline{\hspace{2cm}})$

Rotate pentagon $\square JKLMN$:
 $J(-3, -3)$
 $K(-1, 1)$
 $L(0, 0)$
 $M(2, 1)$
 $N(2, -3)$
 by 90°



5. $(x, y) \rightarrow (\underline{\hspace{2cm}}, \underline{\hspace{2cm}})$

Rotate kite $KITE$
 $K(-4, 5)$
 $I(1, 1)$
 $T(1, -1)$
 $E(-1, -1)$
 by 180° about the origin.



6. $(x, y) \rightarrow (\underline{\hspace{2cm}}, \underline{\hspace{2cm}})$

Rotate triangle $\triangle RST$
 $R(0, 0)$
 $S(2, 4)$
 $T(5, 4)$
 by 270° about the origin, three times in a row.

