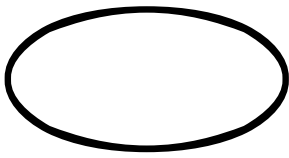


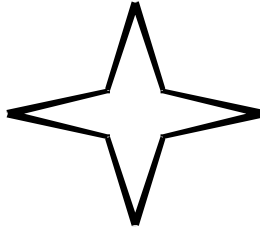
Worksheet 2015-8ER-00001(1)

(1) Draw at least TWO lines of symmetry in on each figure, if possible:

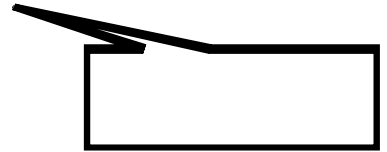
(a)



(b)



(c)



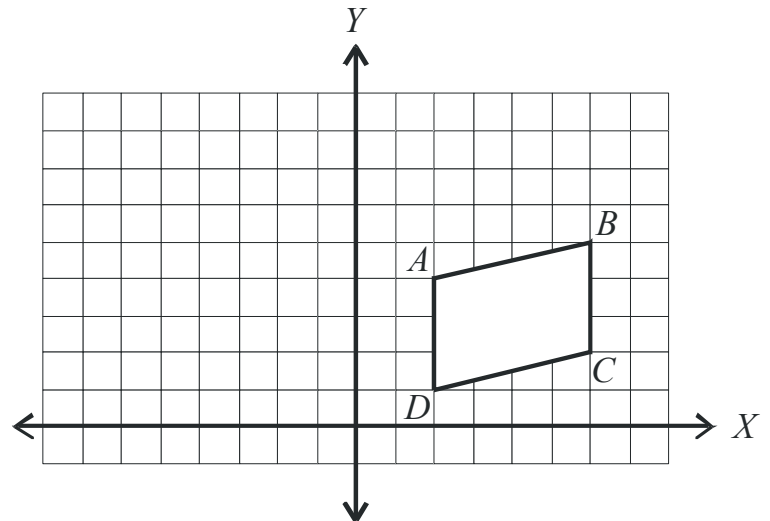
(2) Use quad paper or graph paper and draw the following on the same Cartesian plane:

(a) $A(5 ; 1)$ and A' where A' is the reflection of A in the x -axis.

(b) $B(-3 ; 2)$ and B' , where B' is the reflection of B in the y -axis.

(c) $C(0 ; 4)$ and C' , where C' is a translation of C of three units upwards and 2 units to the left.

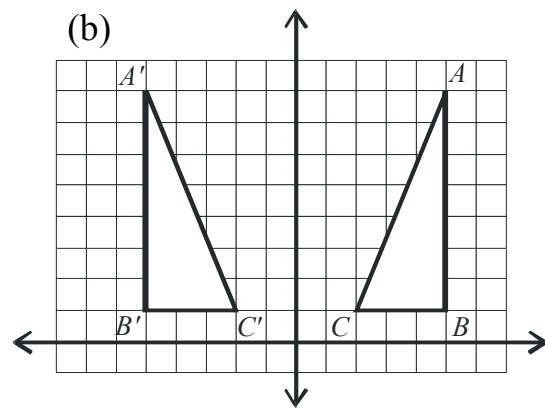
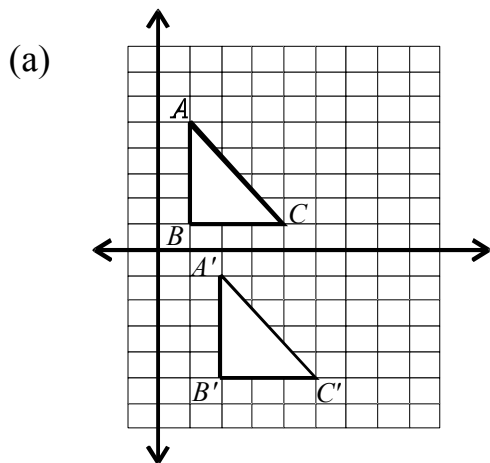
(3) (a) Write the coordinates of B , C and D if $A(2 ; 4)$.



(b) Draw $A'B'C'D'$ as a reflection of $ABCD$ in the y -axis.

(c) Write the coordinates of A' , B' , C' and D' .

(4) Describe the transformation of $\Delta ABC \rightarrow \Delta A'B'C'$ as a single transformation, in each of the following sketches:

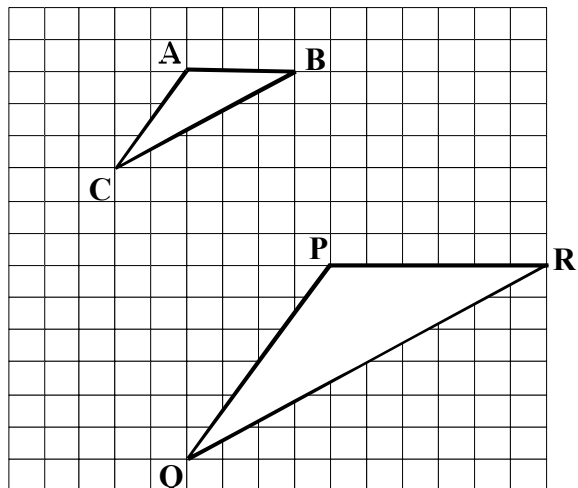


(5) Scale $\rightarrow 1 : 250\,000$

Use the given scale and calculate the true distance between Kansa at A and Bongolethu at B.



(6)



Consider the diagram and answer the following questions:

(a) Is ΔABC a translation of ΔPQR with 6 units upwards and units to the left? Motivate!

(b) Is $\Delta PRQ \rightarrow \Delta ABC$ a reduction or an enlargement? Also write the factor of reduction / enlargement.

