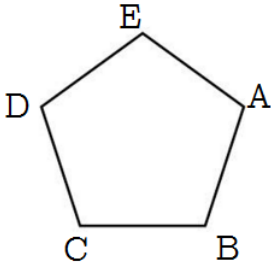


Congruence Unit Review: Practice Assessment

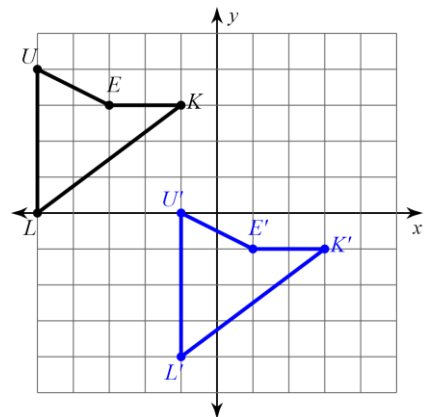
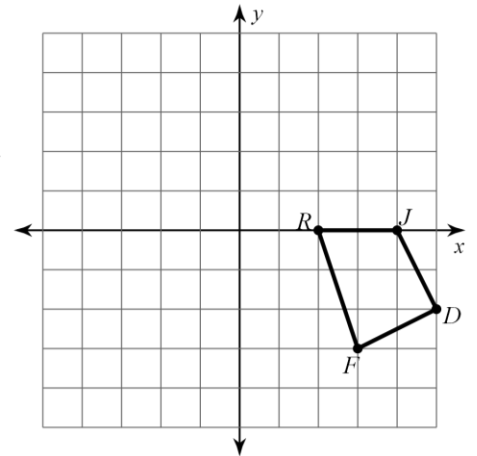
Congruence 1: Transformations:

1. Draw and label the figure after a reflection across the vertical line  $x=2$ .
2. Describe the term line segment in terms of points, lines, and planes.

3. How many degrees of clockwise rotation would it take for A to be carried onto D?

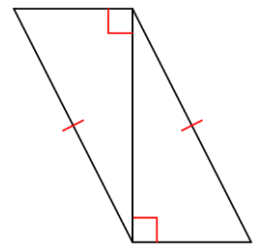
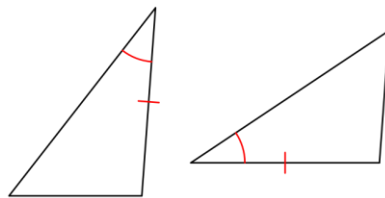


4. Use arrow notation to write a rule that will carry LUEK to L'U'E'K'.

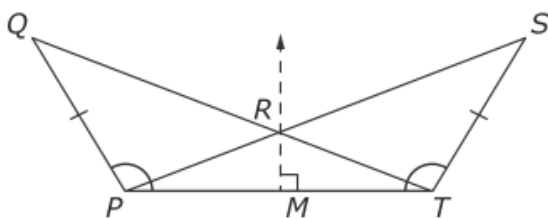


Congruence 2: Triangle Congruence

5. In each pair, are the triangles congruent? If so, what criteria is shown?

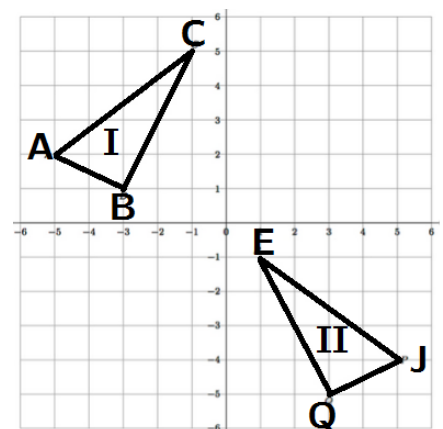


6. Which transformation(s) would show  $\triangle QTP \cong \triangle SPT$ ?



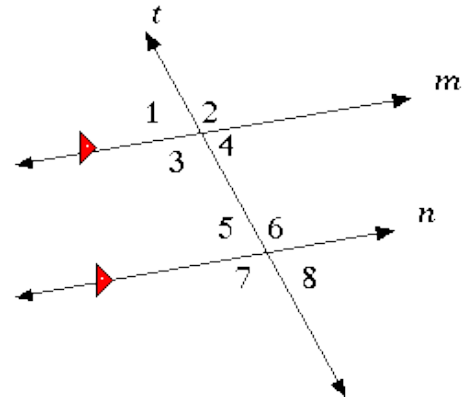
- horizontal translation along the length PR
- horizontal translation along the length of PT
- reflection over RM
- reflection over SP

7. Figure 1 goes through rigid transformations to become Figure 2. What segment is congruent to CA?



Congruence 3: Parallel Lines and Triangles

8. Name a pair of corresponding angles.
9. Name a pair of alternate interior angles.
10. If  $\angle 3 = 14x + 45$  and  $\angle 5 = 7x + 30$ , what is the value of  $x$ ?
11. Complete the proof.

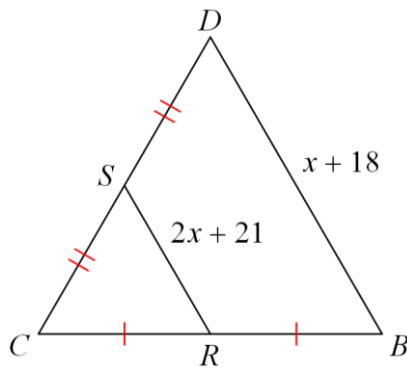


Given:  $m \parallel n$

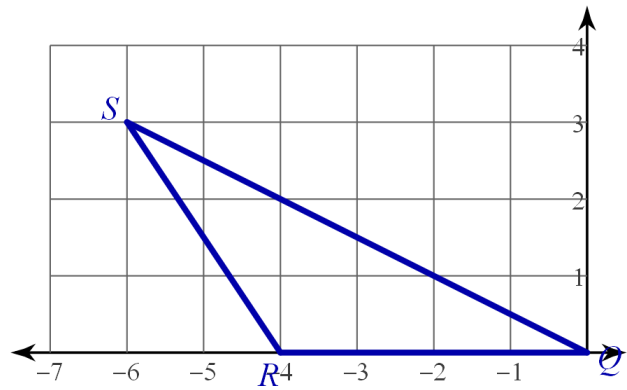
Prove:  $\angle 3 \cong \angle 6$

Statements	Reasons
1.	1. Given
2. $\angle 3 \cong \angle 7$	2.
3. $\angle 7 \cong \angle 6$	3.
4. $\angle 3 \cong \angle 6$	4.

12. Find the length of RS.



13. Find the coordinates of the centroid.



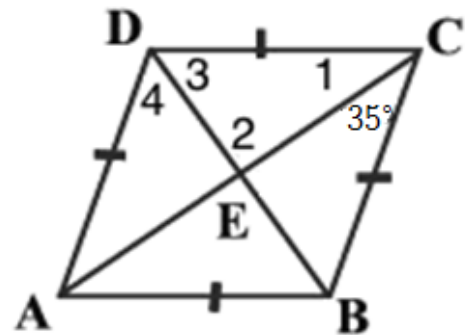
Congruence 4: Quadrilaterals

14. Consider rhombus DCBA with diagonals intersecting at E.

Find the angle measures

$\angle 1 =$        $\angle 2 =$        $\angle 3 =$

$\angle 4 =$        $\angle ABC =$



15. ABCD is a parallelogram. If  $BE = 11x - 15$ , and  $BD = 8x + 12$ , find the length of DE.

