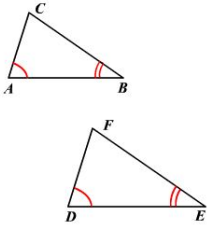
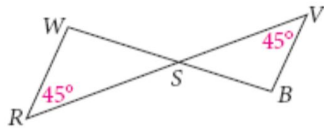


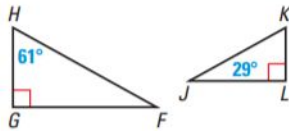
<p>Angle-Angle Similarity</p>	<p>If two angles of one triangle are congruent to two angles of another triangle, then the triangles are similar.</p>	
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1. Determine whether the triangles are similar. If so, write a similarity statement. Explain your reasoning.

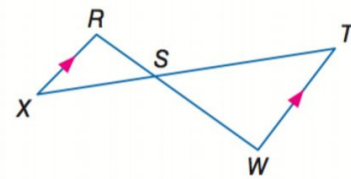
a.

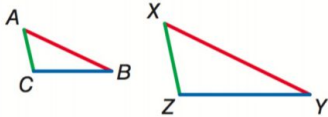


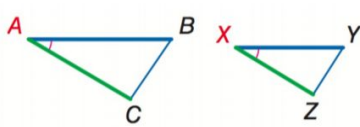
b.



c.

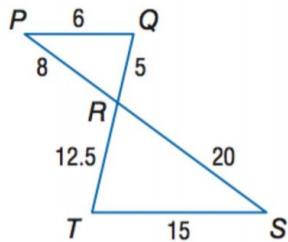


<p>Side-Side-Side Similarity</p>	<p>If the corresponding side lengths of two triangles are proportional, then the triangles are similar.</p>	 <p>If <math>\frac{AB}{XY} = \frac{BC}{YZ} = \frac{CA}{ZX}</math>, then <math>\triangle ABC \sim \triangle XYZ</math>.</p>
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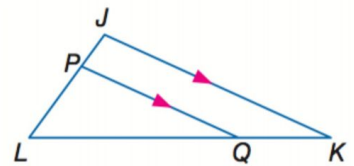
<p>Side-Angle-Side Similarity</p>	<p>If the lengths of two sides of one triangle are proportional to the lengths of two corresponding sides of another triangle and the included angles are congruent then the triangles are similar.</p>	 <p>If <math>\angle A \cong \angle X</math> and <math>\frac{AB}{XY} = \frac{AC}{XZ}</math>, then <math>\triangle ABC \sim \triangle XYZ</math>.</p>
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2. Determine whether the triangles are similar. If so, write a similarity statement. Explain your reasoning.

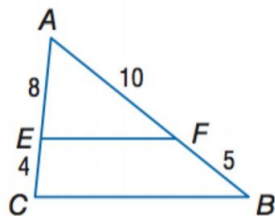
a.



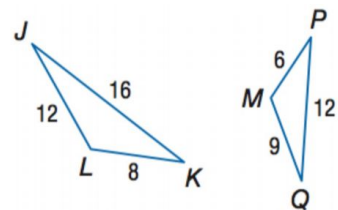
c.



b.



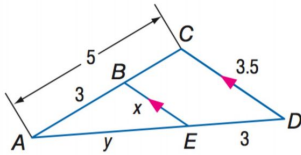
d.



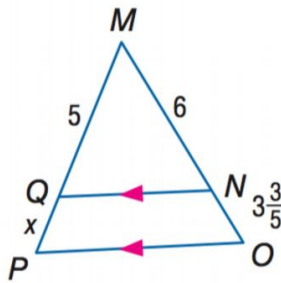
Geometry CP  
7.3 Similar Triangles

3. The following triangles are similar:

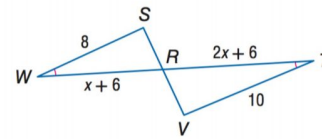
a. Find  $BE$  and  $AD$



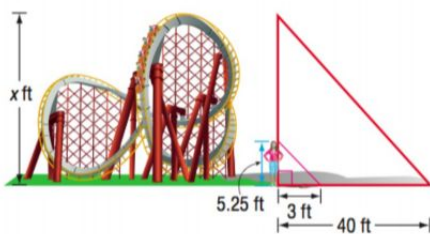
b. Find  $QP$  and  $MP$



c. Find  $WR$  and  $RT$



4. Hallie is estimate the height of the superman roller coaster in Mitchellville, Maryland. She is 5 feet 3 inches tall and her shadow is 3 feet long. If the length of the shadow of the roller coaster is 40 feet, how tall is the roller coaster?



5. Adam is standing next to the Palmetto Building in Columbia, South Carolina. He is 6 feet tall and the length of his shadow is 9 feet. If the length of the shadow of the building is 322.5 feet, how tall is the building?

