

Study Guide

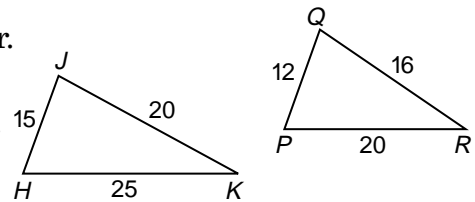
Identifying Similar Triangles

There are three ways to determine whether two triangles are similar.

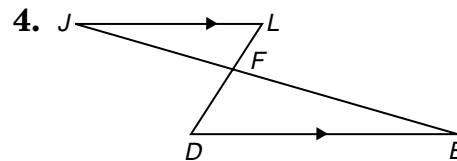
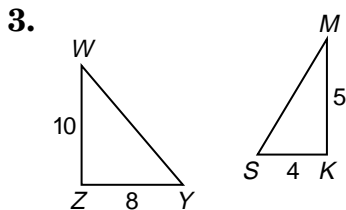
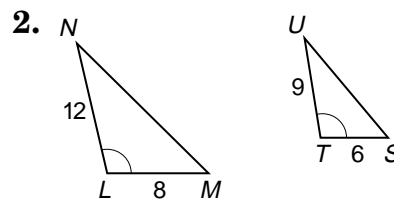
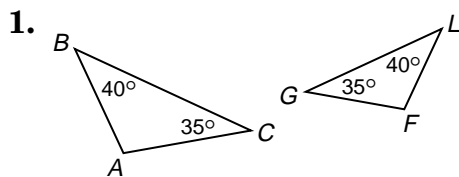
- Show that two angles of one triangle are congruent to two angles of the other triangle. (AA Similarity)
- Show that the measures of the corresponding sides of the triangles are proportional. (SSS Similarity)
- Show that the measure of two sides of a triangle are proportional to the measures of the corresponding sides of the other triangle and that the included angles are congruent. (SAS Similarity)

Example: Determine whether the triangles are similar. Explain your answer.

Since $\frac{15}{12} = \frac{25}{20} = \frac{20}{16}$, the triangles are similar by SSS Similarity.

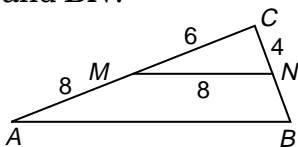


Determine whether each pair of triangles is similar. Give a reason for your answer.



Identify the similar triangles in each figure. Explain why they are similar and find the missing measures.

5. If $\overline{MN} \parallel \overline{AB}$, find AB , BC , and BN .



6. If $MNPQ$ is a parallelogram, find RN , RP , and SP .

