Congruent Triangles

Pre-Assessment

Circle the letter of the best answer.

1. $\triangle UVW$ and $\triangle XYZ$ are congruent triangles. Which statement is known to be true?

   a. $\angle U \cong \angle V$

   b. $\angle W \cong \angle X$

   c. $\angle V \cong \angle X$

   d. $\angle V \cong \angle Y$

2. $\triangle ABC$ and $\triangle DEF$ are congruent triangles. Which statement is known to be true?

   a. $\overline{AB} \cong \overline{BC}$

   b. $\overline{AB} \cong \overline{EF}$

   c. $\overline{AC} \cong \overline{DF}$

   d. $\overline{AB} \cong \overline{DF}$

3. A triangle congruent to $\triangle ABC$ is to be constructed. Only three components are measured. Which three components, if constructed in the order listed, will always create a congruent triangle?

   a. side-side-angle

   b. angle-angle-angle

   c. angle-side-angle

   d. Only the three side lengths can be used to create a congruent triangle.

4. Which set of equivalent measures does not indicate that two triangles must be congruent?

   a. angle-angle-angle

   b. angle-side-angle

   c. side-angle-side

   d. angle-angle-side

5. For $\triangle ABC$ and $\triangle DEF$, the following is given: $\angle A \cong \angle D$, $\angle B \cong \angle E$, $\angle C \cong \angle F$. By which triangle congruence statement can it be concluded that the triangles are congruent?

   a. SSS

   b. SAS

   c. ASA

   d. It cannot be determined if the triangles are congruent.