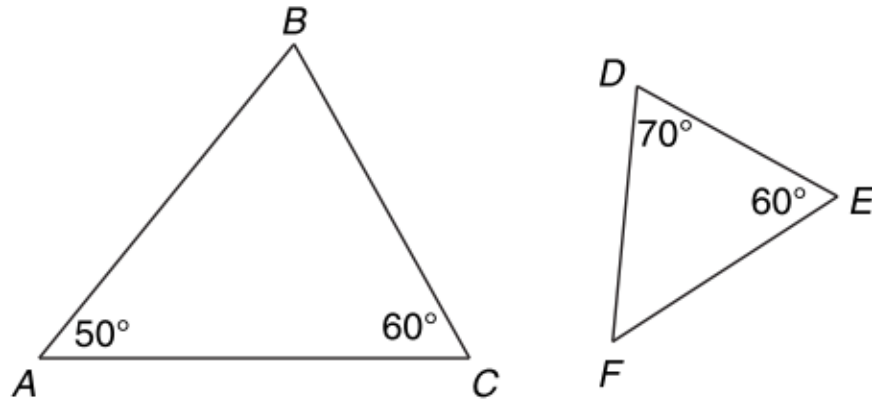


Similarity in Triangles

1. Are the following triangles similar?



$$\begin{aligned}\angle B &= 180^\circ - 50^\circ - 60^\circ \\ &= 70^\circ\end{aligned}$$

$$\begin{aligned}\angle F &= 180^\circ - 70^\circ - 60^\circ \\ &= 50^\circ\end{aligned}$$

$$\begin{aligned}\angle B &= 180^\circ - 50^\circ - 60^\circ \\ &= 70^\circ\end{aligned}$$

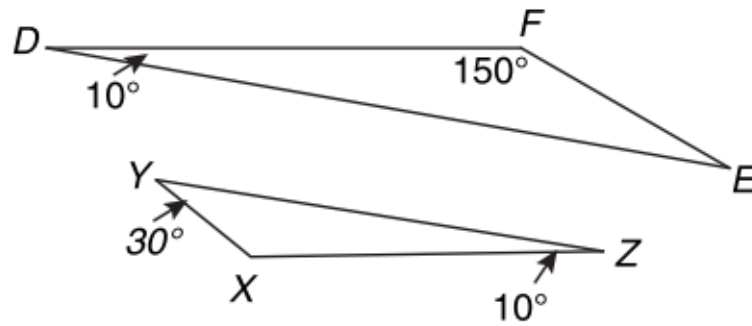
$\angle B$ corresponds to $\angle D$

$\angle C$ corresponds to $\angle E$

$\angle A$ corresponds to $\angle F$

Because all corresponding angle measures are the same, these triangles are similar.

2. Are the following triangles similar?



$$\begin{aligned}\angle E &= 180^\circ - 150^\circ - 10^\circ \\ &= 20^\circ\end{aligned}$$

Neither acute angle in triangle XYZ is 20° , so the triangles are **not** similar.