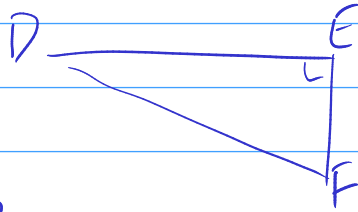
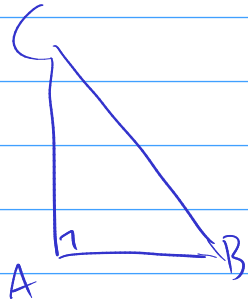
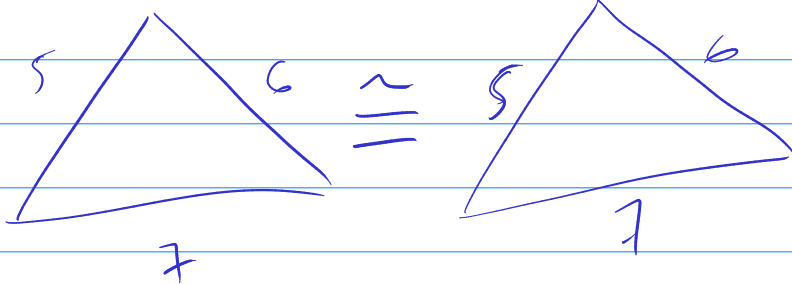


# Triangles

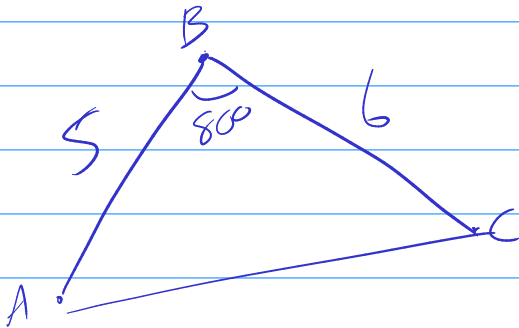
Congruent triangles : two triangles are the same, just moved around/rotated



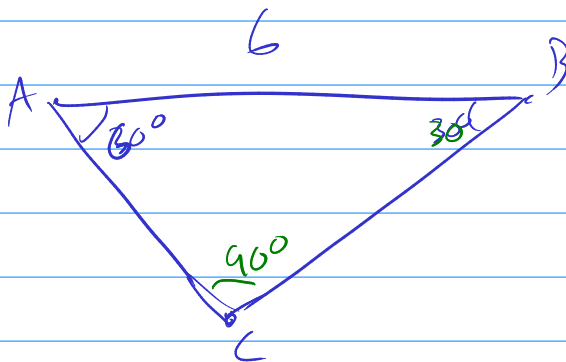
$$\triangle ABC \cong \triangle DEF$$



SSS

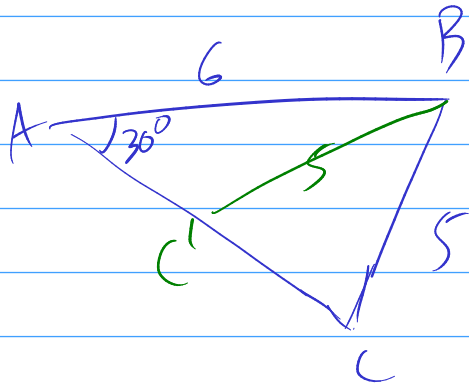


SAS



ASA

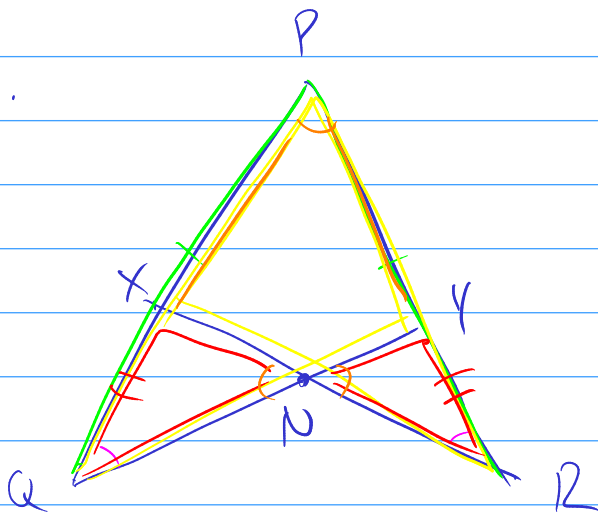
AAS



SSA

~~not  
congruency~~

Ex.



show  $QY = RX$

By ASA

$$\triangle PQY \cong \triangle PRX$$

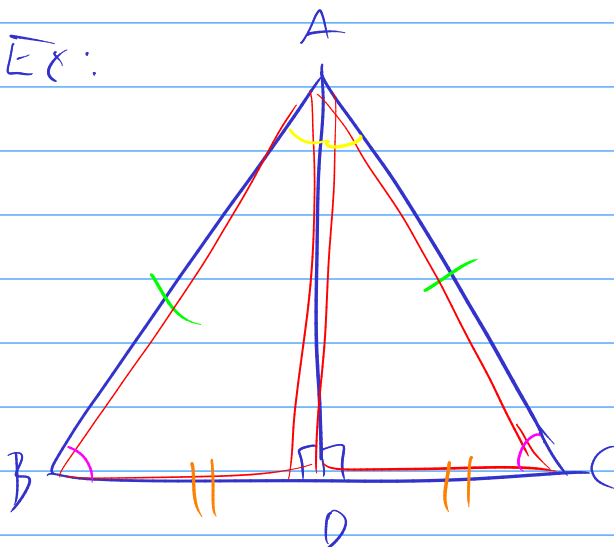
$$PQ = PR$$

$$\angle QY = \angle RX$$

$$PY = PX$$

show  $NX = NY$

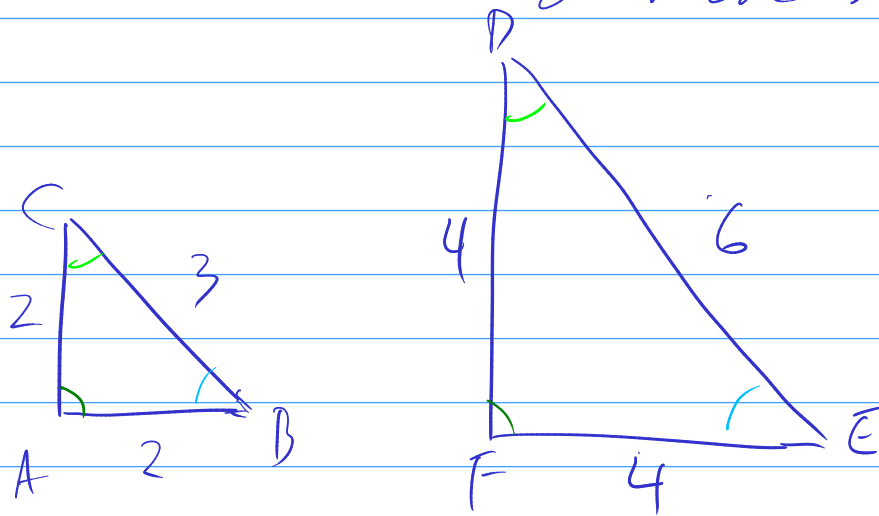
Ex:



$$\triangle QNX \cong \triangle RNY$$

$$\triangle ABC \cong \triangle ACD$$

Similar Triangles : one triangle is the other one but scaled up/down



$$\triangle ABC \sim \triangle FED$$

$$2 = \frac{FE}{AB} = \frac{ED}{BC} = \frac{DF}{CA}$$

SSS  
SAS  
AA