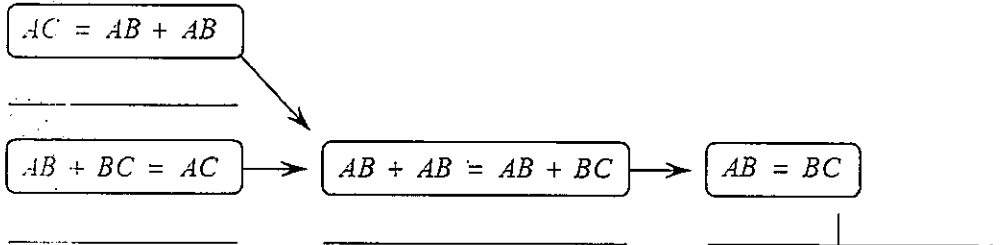
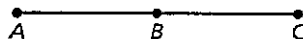


HW #2-9

1. Match each reason with the correct step in the flow chart.

Given $AC = AB + AB$

Prove $AB = BC$

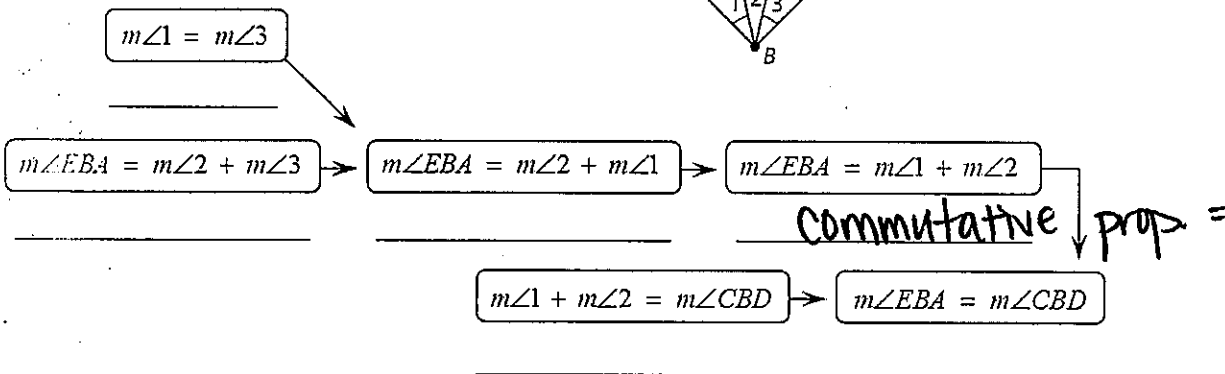
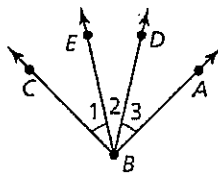


- A. Segment Addition Postulate (Post. 1.2) B. Given
C. Transitive Property of Equality D. Subtraction Property of Equality

2. Fill in the reasons in the flow chart.

Given $m\angle 1 = m\angle 3$

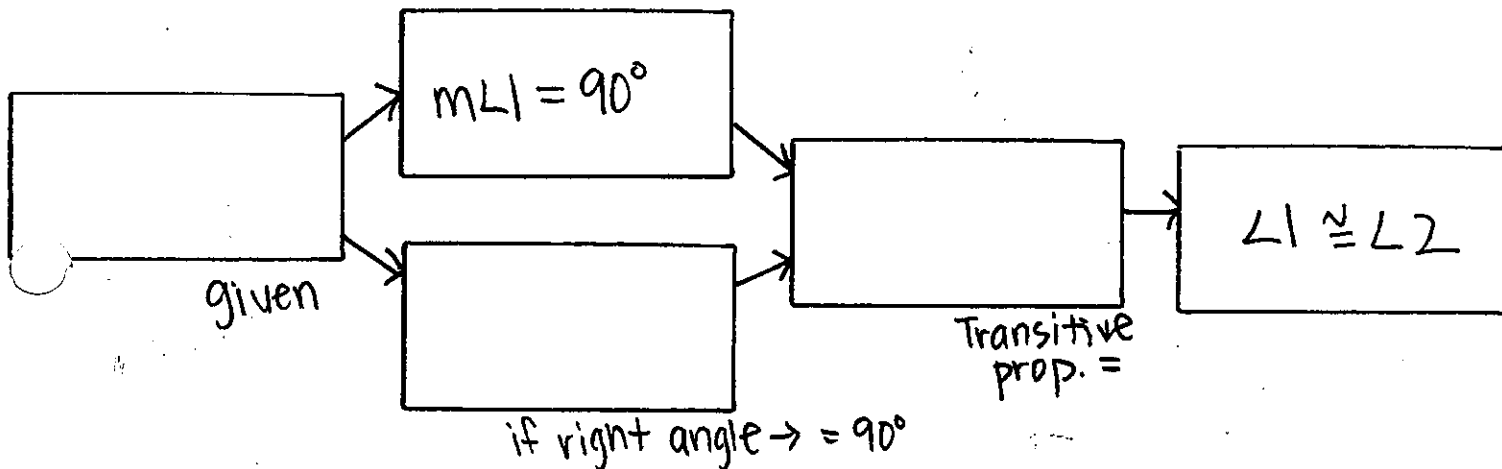
Prove $m\angle EBA = m\angle CBD$



3. Finish the flow chart proof. Make sure every statement is paired with a reason.

Given $\angle 1$ and $\angle 2$ are right angles.

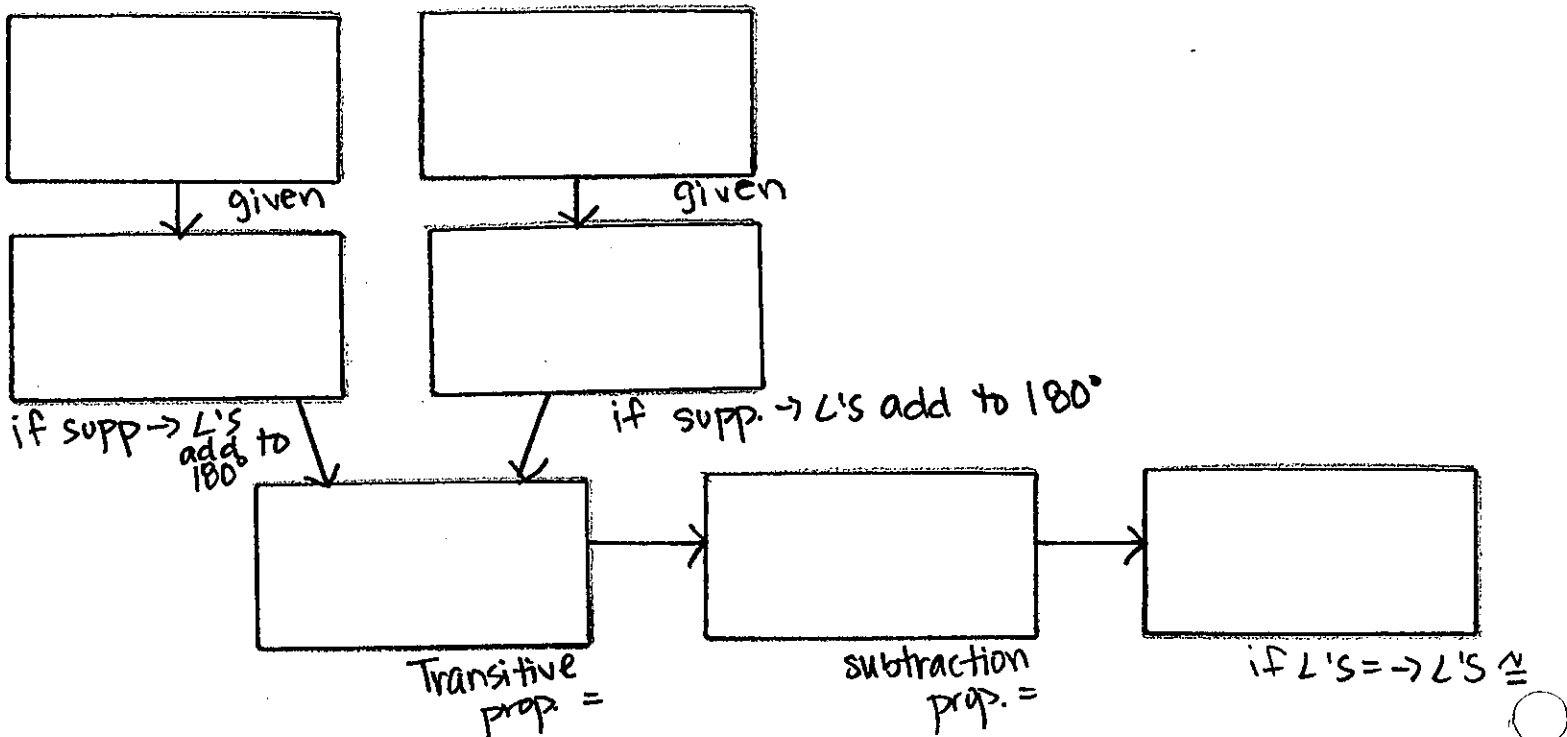
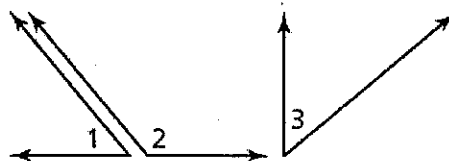
Prove $\angle 1 \cong \angle 2$



4. Finish the flow chart proof. Make sure every statement is paired with a reason.

Given $\angle 1$ and $\angle 2$ are supplementary.
 $\angle 3$ and $\angle 2$ are supplementary.

Prove $\angle 1 \cong \angle 3$



5. Finish the flow chart proof. Make sure every statement is paired with a reason.

Given $\overline{AB} \perp \overline{BC}$, $\overline{DC} \perp \overline{BC}$

Prove $\angle B \cong \angle C$

