Practice with Deductive Reasoning

1. Given the Venn diagram and the statement *Joe is a Pow.* , which of the following statements **MUST** be true [Circle all that are true.]

   A. Joe is a Leb.
   B. Joe is a Wuff.
   C. If you are a Pow, then you are a Wuff.
   D. If you are a Wuff, then you are a Leb.
   E. If you are a Leb, then you are a Wuff.
   F. If Henry is not a Pow, then Henry is not a Wuff.
   G. If Lucy is not a Leb, then Lucy is not a Pow.

Given the information, determine if a valid conclusion can be made. If no valid conclusion can be made, write **no valid conclusion.**

2. Statement 1: If two angles form a linear pair, then they are supplementary.
   Statement 2: \( \angle A \) and \( \angle B \) form a linear pair.
   Conclusion:

3. Statement 1: If two angles form a linear pair, then they are supplementary.
   Statement 2: \( \angle A \) and \( \angle B \) are supplementary.
   Conclusion:

4. Statement 1: If two angles form a linear pair, then they are supplementary.
   Statement 2: If two angles are supplementary, then the sum of their measures is 180°.
   Conclusion:

5. Statement 1: If something is a Tupp, then it is a Yip.
   Statement 2: If something is a Yip, then it is a Quop.
   Conclusion:

6. Statement 1: If something is a Tupp, then it is a Yip.
   Statement 2: If something is a Tupp, then it is a Gopp.
   Conclusion: