

Reader's name: _____

Writer's name: _____

Prove that for any sets A and B , $A \subseteq B$ if and only if $\mathcal{P}(A) \subseteq \mathcal{P}(B)$.

1. Does the proof cover the “if” part (if $\mathcal{P}(A) \subseteq \mathcal{P}(B)$, then $A \subseteq B$)? _____
2. Does the proof cover the “only if” part (if $A \subseteq B$, then $\mathcal{P}(A) \subseteq \mathcal{P}(B)$)? _____
3. Identify the “if” part of the proof. (If it is missing, continue with the other part instead.)
What is the plan? Is it a direct proof, a contrapositive proof, or a proof by contradiction?
4. Is the beginning consistent with the plan of the proof? If not, what needs to be changed?
5. Is the proof entirely correct? If not, mark the errors or confusing places with #1, #2, #3, ...
Describe here what needs to be clarified or how the problems can be corrected.
6. Is the end consistent with the plan of the proof? If not, what needs to be changed?
7. Additional comments:

