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Intro to Artificial Intelligence

Problem 1:

Here we will analyze the towers of hanoi with respect the seven points discussed in class:

- 1. Yes, I do believe it's decomposable, as you can break it down into the distinct problem of simply moving discs from one tower to another, and ignore the fact that you need to get all of them over to a certain tower.
- 2. Yes, you can always undo the move by simply reversing your steps so far.
- 3. Yes, it is predictable, because we can see every possible state
- 4. There is an absolute solution, although there may be many 'relatively good' Absolute would be defined as the shortest number of derivations until you reach the solution.
- 5. I would consider it to be a path to a state, since we are concerned with the number of steps, as well as exactly which steps to take, to reach the solution state.
- 6. The role of knowledge here tells us about the properties of the current state of the problem.
- 7. This is most certainly solitary, since there is only one player, and you can base your next move based entirely upon the current state of the problem.