

Assignment 1

1. Agents

In order to prevent infections from E. Coli, ensuring that the food reaches a minimum internal temperature of 160° F. A precept that could be implemented to ensure that food is free of E. Coli would be to monitor the temperature of the soup as it is being prepared.

Precept	Action
Food reaches 160° F.	Food is ready to serve!
Food does not reach 160° F.	Do not serve!

Source: <https://www.foodsafety.gov/poisoning/causes/bacteriaviruses/ecoli/index.html>

2. Problem 3.6b from the text

Initial State: There are two 3 foot crates that can be moved by the monkey (3ft tall), who cannot currently reach the bananas on the ceiling (8ft in height).

Goal State/Test: The Monkey can reach the tasty bananas.

Successor: $\text{RESULT}(\text{Starting Stack}, \text{Add}(\text{Crate}) / \text{Remove}(\text{Crate})) = \text{Crate Stack}$

Cost Function: The number of bananas the monkey can reach (initially 0). We could also define cost by how long it takes the monkey to get the bananas. It depends on what we are optimizing for, bananas or speed.

Single Programmer Affidavit

I the undersigned promise that the attached assignment is my own work. While I was free to discuss ideas with others, the work contained is my own. I recognize that should this not be the case, I will be subject to penalties as outlined in the course syllabus.

Tom Paulus (Feb. 1, 2018)