Progress Report: Restaurant Management Game

**Objectives to meet for working demo:**

1. accurate pathfinding algorithm

2. basic game functions completed

3. game is functional manually

**Progress:**

1. Pathfinding algorithm is efficient, taking both cost of movement into account, as well as using a heuristic algorithm (manhattan) to find shortest path faster.
2. So far, has created a “god” employee type that is manually controlled by the player. Employee type can perform all actions for all employee types. These include: cook at stove, move food to counter, take food from counter, serve food to table, take empty plates to dishwasher. The employee can only perform these tasks when near the specified objects, and when the specified objects meet the required conditions (stove has food on it, counter has food on it, table has customer, etc.) If employee is close to multiple objects, first action taken is based on order. Needs way for employee to face a specific direction if for example the employee is next to two stoves and wants to cook on a specific one.
3. Customers are manually generated, but automatically sit at chairs. Employee works perfectly fine manually.

**Next Steps:**

1. Cost of movement is currently not important in game. Can add features in game to make cost of movement affect pathfinding
2. Employee needs to perform actions on specific objects if multiple objects are in its presence
3. Automatically generate customers at random time intervals. Have customers leave if they stay too long. Start dividing employee types. Make employees act differently depending on their type.