Enrichment 4: *Prototyping for the Final Project* (10 Points)

Your Name Olivia Li

Graphical Prototype (5 points)

Include a drawing here that illustrates what the start screen (instructions) of your minigame will look like.

Include a drawing here that illustrates what the end screen (game over) of your minigame will look like.





Start Screen

End Screen

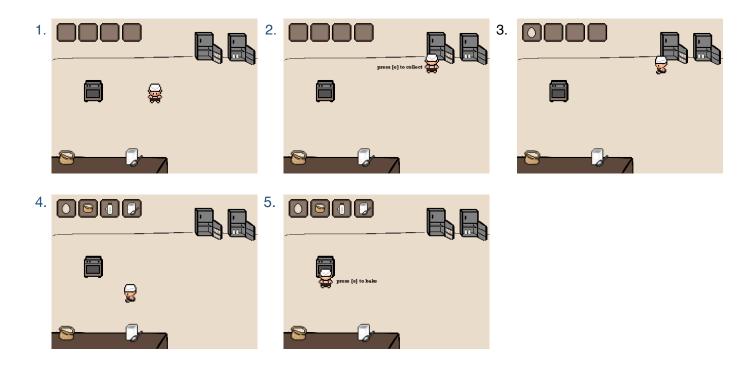
Include a series of drawings here that illustrate what happens throughout the duration of your minigame. You must include a minimum of 4 additional drawings below, and across your drawings, the following must be clearly indicated:

- What the objective of the game is
- What happens as the user controls the game play, e.g., moving a character
- How the user interacts with the game to control what happens on the screen, e.g., through mouse or keyboard button presses
- How what is drawn on the screen changes throughout the game, based on user interaction

In addition, for each drawing you include below, provide a 2-3 sentence description of

what is happening in the frame. (For example, is the user interacting with the sketch via a mouse click, and if so, what happens when that click occurs?)

- 1. The game starts with an empty inventory. The player uses the arrow keys to move up, down, left, and right. The sprite sheet being used changes based on the direction the player is facing.
- 2. The objective is to collect the ingredients to bake a cake. When the player is in the range of an ingredient, text pops up next to the sprite, telling the player they can press 'E' to pick up the item. In this frame, the player is facing the fridge and is about to press 'E' to collect an egg.
- 3. After the player presses 'E' in the range of a specific item, that item is added to the next empty inventory slot. The player can only add unique items to their inventory, so trying to collect an item that is already in their inventory should not do anything.
- 4. The player has already collected all four necessary ingredients in this frame. Another step could be added here to require the player to mix the ingredients before baking.
- 5. The final step is to walk in front of the oven and press 'E' to bake the cake. If the player runs out of time or tries to bake without all the ingredients, the lose screen will pop up, giving the player the option to exit or play again.



Technical Prototype (5 points)

Create a technical prototype of your minigame idea. Your prototype should be written as Processing code, using the minigame_template included with the final project. Your

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technical prototype must include the following:

- A start screen/instructions that are rendered at the start of the game
- A way to start the game, following the start screen (e.g., a button click, or a certain amount of time elapsed, etc.)
- A simple implementation of the game play that includes the required user interaction (mouse or keyboard)
- A simple implementation of the objective of the game being met (e.g., a character reaching a certain position)
- An end screen that is drawn when the objective is met
- The sketch must run without errors, and it must go through the complete sequence
 of activities: display a start screen, progress to the game play, manage user
 interaction, end with an objective met, and display an end screen/game over

This is a prototype, which means it does not need to be a fully completed version of your minigame. The purpose here is to create a scaffold with the essential components, so you can use that as a first draft of your minigame before the final submission.

Include a Processing sketch in your submission. You must use and complete the template provided. The sketch must include any required assets and run without errors for credit.