**Color Game Criteria Document**

**Programming 12**

**General Required Features:**

1. Comment your main tab with your name, date, and description of the project
2. Name variables and functions with clear, logical names.
3. Use comments and proper indentation throughout your code.
4. Use the Mode Framework: Your project should be organized using the Mode Framework, and include modes for an intro screen, the game itself, and a game over screen.
5. Use at least one custom font.
6. You do NOT need to include sound effects or music.

**Intro Screen Required Features**

1. Display the title of the game in text
2. Display an animated gif frame-by-frame. This animation should be unique - it should not have appeared in a project from a previous course.
3. Clicking the mouse in this mode changes the mode to Game

**Game Required Features**

1. Create two arrays: one that stores a set of color words (Strings) and another that stores a matching set of color values (color).
2. Display a puzzle that consists of a randomly chosen word from the words array that has a fill color that is randomly chosen from your colors arrays. If the color matches the word, the puzzle is true. If the color does not match the word, the puzzle is false.
3. Keep track of the time that has passed since the puzzle has been shown, perhaps counting the number of frames.
4. Display the time limit in a visual way. For example, do not print the number of frames, but represent the timer with shapes such as a bar that fills up, an arc that traces out, or the size of the puzzle itself.
5. Designate a region of the screen for answering the puzzle. There should be a “true” button and a “false” button.
6. If the person correctly answers the puzzle by clicking the button, generate a new puzzle and restart the timer. Increase their score by one.
7. If the person incorrectly answers the puzzle or the timer exceeds the time limit, change the mode to game over.
8. Make it so that there is a 50% chance of the puzzle be a matching puzzle.

**Game Over Required Features**

1. Inform the player that they have lost in some visual way (text, visual, etc.)
2. Display the score from their latest attempt and their high score, which is their best score since running the sketch.
3. Clicking the mouse should reset the score (but not the high score), the puzzle, and any other variables needed to have the game start again, and then change mode to the intro screen.