

# Project Milestone 2

## Project Features List

- Simple Animations:
  - The main player and some obstacles will have basic animations to make the game more fluid.
- Leaderboard:
  - Will list the high scores of players in an easy to read list.
- One Continuous Level:
  - The user will run until they die and the score will be calculated based upon how far they ran.
- Score Display:
  - As the user runs, the leaderboard will be displayed to see if the player is nearing a new PR.
- Leaderboard Display While Playing
  - The top 5-10 players will be displayed at the top right of the screen so that players know what scores they need to beat.
- The up and down arrows will be used to control the jumps of the Runner
  - The runner will be moving forward perpetually and the up and down arrows will control the runners jumps. The runner will have to dodge obstacles that will constantly be getting in their way.
- Multiple Obstacles:
  - There will be multiple designs for the obstacles that the runner encounters. We are considering making obstacles look like rocks, bushes and maybe trees.
- Title Screen:
  - Click a button to play the game or see the leaderboard.
  - Introduces the player to the game and how to play.
- User Account:
  - Allows the user to create an account so that their score can be logged.

## Requirements

### Functional:

- 1) Leaderboard displays the top 5-10 scores and will be located in the top right corner of the screen. Will occupy less than a eighth of the play screen.
- 2) Object detection will be precise to one pixel. If any pixels of the player model collide with an obstacle, the game will take the score and stop.

- 3) Score calculation will be based on time in game without hitting an obstacle.
- 4) The user will be able to sign into their account from the homepage within 5 seconds.

Non-Functional:

- 1) Easy to play and understand for all age groups.
- 2) The home page load time should be less than 4 seconds.
- 3) Clean and simple design that is intuitive to use.
- 4) Leaderboards accurately displays the highest scores.

## Project Plan

Project plan follows a Kanban style and our team will be using Github to make the template. The plan can be seen on the project repository here:

[https://github.com/mitchellphelps/CSCI\\_3308\\_Project/projects/1](https://github.com/mitchellphelps/CSCI_3308_Project/projects/1)