

1. Introduction

- a. Our project will focus on a fitness app for gamers and generally anyone who is not comfortable going to the gym but would like to build a routine.
 - i. The unique factor of the app would be beginner friendly exercises that anyone could do at home with little to no gym equipment. The experience would tailor to gamers by having minigames in between workouts.
 - ii. Description of the salient characteristics of the application/tool
 - 1. Many people look to start working out but for one reason or another it is hard for them to dive right in and stick to it. We look to further ease the obstacle by making a simpler and interactive fitness mobile app.
 - 2. The app will contain motivational quotes during the workout as well as a gamer themed user interface. Another elemental feature to add into our app is strategically placed minigames that will motivate the user during breaks thus keeping engagement levels high.
 - 3. The implication of the tools integrated into our app are that the user would have the time and want to make the effort to work out while at the same time be okay with games as a form of a reward system (in order to keep going with the workout). Anyone that is looking for a reason to work out and may find it hard to stay consistent can be affected by the app. Some potential problems with such an application could be that some users may find it overwhelming or not have fun with games as a form of a mental reward system in place. The bias would be that people that enjoy “gacha” games may get the most out of it while users that do not enjoy games may consider it a distraction from the routine.
 - iii. Other important contextual issues especially any external constraints placed on the application/tool would be that the service would be offered as mobile applications only. The mobile application does not track movement so users can just play the minigames due to addiction towards it without working out.
 - iv. Outlined schedule
 - 1. Build a framework for the application, start with a layout using slides representing button functionality Research game mechanics and simple ui designs. Add in the amount of exercise. Add in time tracker to mark time of workout.

2. In terms of planning, we are looking at small but addicting mechanics in mobile games to incorporate into the application and simple ui designs for the user experience using the scrum planning method while also incorporating very accessible functionalities to the application such as:

- instructions for app

- simple ui design for

- time of work out

- options bar

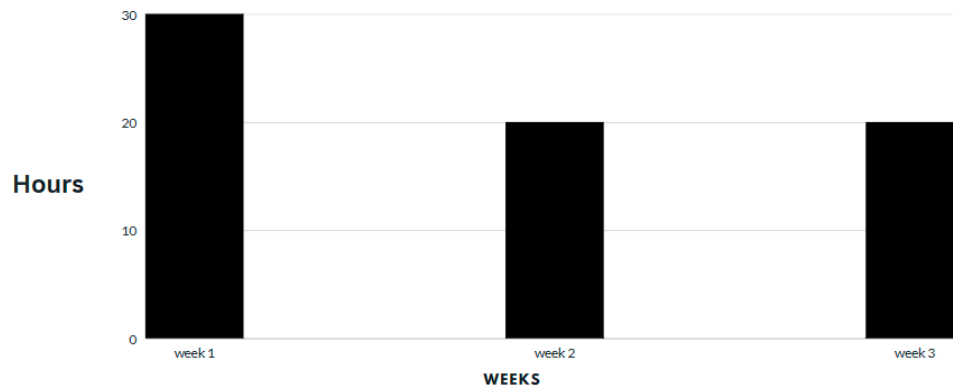
- set break periods after each workout is fully completed in between sets.

- Start and finish buttons (for workout)
 - Implementation of a button to mark completion. (All workouts are at users own pace)
 - Variation of minigames that will also include motivational quotes.
 - Simple 8-bit animated sprites side scrolling, top down.

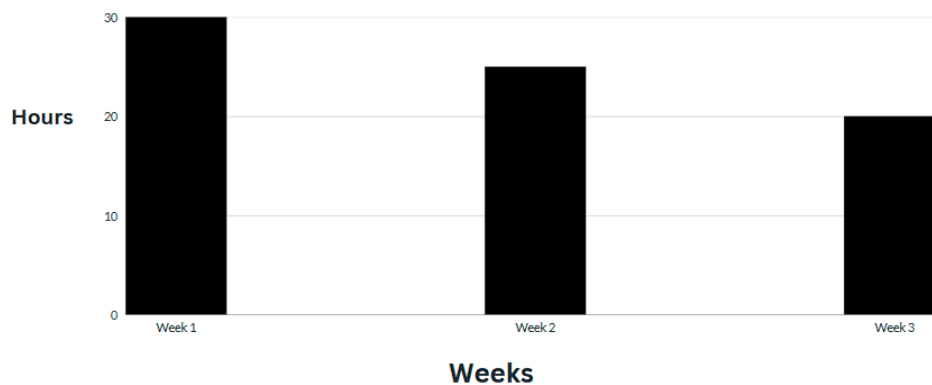
3. Sprint 3 weeks

- a. Burndown chart sprint 1 and 2

SPRINT 1



SPRINT 2



4. Allocation of the backlog to the Sprints

Sprint 1

Week 1 - Work on the mobile app framework borders box placements home screen options toolbar.

Week 2 - Add in the work out option without and with minimal equipment.

Week 3 - Start on sprite design for minigame.

Sprint 2

Week 1 - options bar with functionality.

Week 2 - time tracking feature for the various workouts and workout instructions.

Week 3 – Complete mini game interactivity while implementing it During the users breaks.

- b. As a, gamer, I want to care about my health more so I can keep doing what I enjoy, though I find it hard to go to the gym consistently or work out at home, I lose focus and never make it a routine.
 - c. The implementation of addictive gaming strategies of sprite animation and game mechanics the fitness app will mentally reward the user to keep going and never give up.
 - 5. We are a team of 4 and will be splitting the work with 2 group members working the back end and 2 the front end. We have experience in python java, and will investigate frameworks such as react native, on top of that look into CSS designs.
- b. Motivation for selecting this project
 - v. As we are a team of individuals that have experience with both gaming and want to improve health, fitness is crucial not just for the body but mental health as well.
 - vi. This would be useful in our careers as we get older fitness is important and so is mental health aside from the experience gained from building software and new insight from team members being introduced combining technology with a more ease of access fitness app creates longevity in one's career.