

Software Implementation and Testing Document

For

Group 4

Version 1.1

Authors:

Joshua Glynn

John Alton

Moinul Islam

Giovanni Giannone

Michael Maytin

1. Programming Languages (5 points)

The programming language we used in this project is still Xaml and C# using the .net Maui framework. We decided on this because of our combined knowledge in this coding language

2. Platforms, APIs, Databases, and other technologies used (5 points)

List all the platforms, APIs, Databases, and any other technologies you use in your project and where you use them (in what components of your project).

The project is being built on the .Net Maui framework. We are not using any APIs currently for the project and the only API that could be necessary is the Nutrition API but this will be implemented in the final stage when we set up the Nutritional Database. Originally we did want to add fitness APIs but decided to go with a different approach that better suited the .Net Maui code. In terms of Databases, we are using SQLite as our main database to store user information which is then stored locally in the Users appdata on their device. This allows users to have all their information saved when they want to use the device the application is stored on

3. Execution-based Functional Testing (10 points)

To test the code for the functional elements we built the program in a windows environment and tested different features such as User registration and Login (success), Tracking the workout and logging this (Success), Nutrition Tracking (Success, but does not save after exiting). We have not yet worked on the Medium and Low level priorities such as visualization and such.

4. Execution-based Non-Functional Testing (10 points)

We have been testing the application, just using the windows machine to run it. So far it has been running well with no Hiccups in the overall code. Everything has worked and not led to any breaks or failures when navigating between Views and also when clicking buttons.

5. Non-Execution-based Testing (10 points)

Currently to review code, we are coming together as a group weekly to look at each commit and see what each commit does and test each commit before pushing onto main to ensure no breaks in the code. To further develop certain bits of code, we do walkthroughs of each member and determine what could be better coding-wise.