

Bi-Weekly Status Report #1

Summary:

We are currently in the design stage of our product. We are in the process of designing the high level architecture of our product, as well as completing the required training to work in the workshop on our product. The unexpected amount of hardware work has taken us by surprise, but we have outlined our approach to the problem in a following section of this report. Hours reported in the period are lower than desirable due to having to wait to meet with client for the first time.

Individual Contributions:

Samuel Sklar

- Summary: Watched videos from the previous team's project page describing how far they got on it. Paid particular attention to the hardware aspects and what improvements need to be made as well as getting a rough idea for the sizing of the item cubbies. Brainstormed ideas for how to detect items within the checkout boxes and ways to identify what items are actually inside.
- Hours Worked for the Week: 8 Hours
- Total Cumulative Hours: 8 Hours

Michael Momot

- Summary: Started looking at the previous projects to assess how close they got to done. Focusing on their backend software. Trying to get a high-level understanding of the implementation. Identifying the software languages that I'm going to need to learn.
- Hours Worked for the Week: 8 Hours
- Total Cumulative Hours: 8 Hours

Seth Jones

- Summary: Has begun looking over past projects in order to determine how much can be reused and to learn more about the project. Has also had discussions with engineers in industry as well as graduate students on what some good approaches to the overall problem could look like.
- Hours Worked for the Week: 8hrs
- Total Cumulative Hours: 8hrs

Thomas Smith

- Summary: Has begun work on drafting the high level architecture of the software related to the product. In addition, has begun research into what framework will best suit different aspects of the product.
- Hours Worked for the Week: 8hrs
- Total Cumulative Hours: 8hrs

Kailin Zheng

- Summary: Started looking at the previous projects and analysing which necessary hardware part our team should use. Also started to research about technical support or requirement.
- Hours Worked for the Week: 8hrs
- Total Cumulative Hours: 8hrs

Shubham chauhan

- Summary: Started looking for related to the project from the previous semesters and analysing the previous teams progress for the current project. Started researching about the front end of the project and the necessary skills required to help in the development of the user interface for a good experience. How a user interface works with the hardware to provide the minimal output to function.
- Hours Worked for the Week: 8
- Total Cumulative Hours: 8

Pending Issues:

Due to the combination of team members with primarily software backgrounds and a product with multiple hardware focused requirements, we will have to adjust and work through a solution to meeting those requirements. In addition, we all need to take a machine safety class prior so that we can work in the workshop where our project will be stored.

Creating and maintaining a consistent meeting schedule is also something that needs to be resolved, as well as what platform will be used to accommodate such meetings.

Plans:

Our plans/goals for the next two weeks are the following. First, we are going to resolve our meeting time and place. This will be done by determining the frequency of meetings (we are currently considering two to three times a week), as well as having

these meetings over voice chat on Discord. One of our meetings we will have in person, at a place yet to be determined.

For our next goal, we plan to have the two members with the most hardware background(the two studying Computer Engineering) focus on investigating the steps that need to be taken to fulfill the hardware requirements. This will be done by having them research the appropriate material that was suggested to us by our client, and then determining the plausibility and amount of work required for us to fulfill the hardware requirements of our product.

Training for the workshop is also planned to be completed by the end of the next reporting period. Due to the training class only being 45min, we will attempt to have the entire team take the class together, and if not, have as many of us as possible take it in one sitting. This will enable us to work on our product in the desired setting requested by our customer.

Material provided by prior teams is planned to be reviewed and used to determine a path forward for different aspects of the product. Seeing as there is 4 separate teams documentation to sift through of varying quality, this will take some effort from each member of the team.

ROLES

Circuit Board Lead - Samuel

Hardware Design Lead - Kailin

Integration Engineer - Seth

Interface Lead - Shubham

Server/Database Engineer - Michael

Meeting Scribe/Architect/Developer -Thomas