Dear Kristian,

This report is to provide an update on the progress of the [EZ Tracker](https://github.com/YamiYukiSenpai/EZTracker) project to date. Its main focus is on the integration of the formerly independent hardware and software components into one cohesive unit.

**Overall Progress**

As indicated in the previous report, we needed to complete sensor accuracy, final enclosure, Wi-Fi direct, and final Android application tweaking. We are proud to announce that we have hit majority of these milestones, which puts us very close to completion. The only task remaining is to solve Wi-Fi direct. The last week has been a decent sprint, and fortunately we have not run into any major roadblocks. We were able to test a standalone product where a user was able to carry around, tracks steps, and send data to the Firebase database, which is in turn was manipulated by the completed Android application.

**Challenges and Opportunities**

In the end, the project enclosure needed a total of four revisions. The first two were scrapped in terms of minute measurement discrepancies. The third version of the enclosure worked well, but due to our battery solution shorting, that revision needed to be scrapped and our backup plan needed to be put into effect. This version involved the battery pack being modular to the device as opposed to being directly part of it. Thanks to the first three versions, the [final revision](https://github.com/YamiYukiSenpai/EZTracker/blob/master/Case%20Files/Pi2CaseRev4_clean.pdf) of the case was more precise.

Connecting the phone to the device through Wi-Fi direct was unfortunately not successful. Connecting to the login page using a static IP via Wi-Fi direct does not work as initially intended. However, the device can establish a standard internet connection and send the desired values to our Firebase database. Continual effort will be put into refining our sensors and Wi-Fi direct to ensure a seamless user experience. If a Wi-Fi direct connection cannot be established by the end of this week, the Pi’s Ethernet port will be used to access the login interface.

**Financial Status**

This week our team needed to make two small purchases. With the shorting of our previous battery solution, it was required to find another portable battery pack that is able to power our device. Along with that, we also needed to obtain a short micro USB cable to run from the battery pack to the power port on the development platform. Both purchases will be reflected in our [budget sheet](https://github.com/YamiYukiSenpai/EZTracker/blob/master/Documentation/EZ_Parts_Budget.xlsx) located on our repository.

Sincerely,

EZ Tracker Team