**Final Project Proposal**

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Self-improvement and enforcing positive habits in life can be boring, tedious, easy to forget, and overall just not that fun. So, I want to try and fix this huge problem of life in a measly 15 hours! Okay, may not be realistic but I think it’s a good project idea nonetheless. For this final project I wanted to create a simple habit tracker, something that is both useful and maybe even with a bit of fun thrown into the mix.

To answer the first W of the infamous Five W’s questions: *Who* is this project meant for? Well simply anybody who is interested in tracking their own personal progress of habits and self-improvement. Although as that may be the intention, due to the time restraint of 15 hours on this project I have no plans of incorporating a GUI element to the project; so, this project will be more useful to those who are comfortable working with a CLI styled application. Even with those limitations I hope to make it as visually appealing as I can, and easy to use.

Now the harder W to answer: *Why* use this app instead of the other ones out there? (Just a simple search of the word “habit” on the Google Play store turns up several results). Well one of the main things I am planning on doing is having the habits last for a total of 66 days, which seems to be the average for habit formation according to some studies and articles I have found\*. Another thing I planning on implementing is some fun user interaction, for example: funny example habits, good positive inspirational quotes, and whatever else I can think of to lighten the mood on doing these habits.

And now for the technical W question: *how?* (Wait that’s not a W, well let’s move on anyways). I am planning of having each habit stored as a Boolean array of 66 values set to false by default, and changing the value to true once completed. Each of those arrays will be written and stored in their own file. Now in order to sort through all that data in the files, I will use a map with strings as its arguments to know which file contains which data; also, a map will allow quick and efficient sorting through the files. A list of possible issues I suspect to run into:

1. May have issues with reading and writing the array data from the files
2. Issues with knowing which days to mark as complete, I am not entirely sure how I will store the date alongside the habit
3. Using arrays to store the habits may be tedious, so I may look into another data structure here

Okay enough with the W’s, I think this project will be a fun one to work on, along with being both useful to myself and others. A large reason I am moving on with this project is that I am used to writing software for my own use, but not for others to use. I think (well hope is more accurate) that some people out there may actually find this useful, especially if I eventually add a GUI to the project. *Wiedersehen!* (I had to sneak in one more W word)