Status Update: Phase 1

Team: Sun Emojis
Members: Jake Mingolla, Melissa Blotner, Reema Al-Marzoog, Eliza Schreibman

Work completed:

- Working breadboard with all hardware components communicating with one another (e.g. screen displays filler text, UV sensor sends UV reading to Bean)
    - Eliza took the lead on this, but we all contributed to getting the breadboard to work. Eliza figured out how to use the multiplexer. Reema and Eliza figured out how to use the UV sensors. Melissa and Jake figured out how to display information on the screen
- Fritzing: breadboard, schematic, and PCB design
    - Mostly Eliza with some help from everyone else.
- iOS planning
    - Reema and Melissa
- UI brainstorming
    - Jake
- Figured out how to display information to the screen using U8GLib
    - Jake and Melissa

Working as expected:
Everything is working as expected, however it's possible we may have some issues with the multiplexer on the PCB because we're using a different part with the same form factor.

Plan of attack for phase 2:

- Jake will work on displaying the UV information to the screen through the Bean sketch
- Melissa and Reema will begin writing the iOS app, sending UV information to the app from the Bean and processing the information
- We will also work on our countdown module
- Eliza will work on the coding component for the hardware on the Bean sketch

Struggles:
The main struggle was with finding a small multiplexer both to buy and in fritzing (so that the PCB would have a place to solder the actual piece).

Directions:

- To use the breadboard, just put a battery in the bean. You can also open a serial terminal to see debugging output and the UV information.
- If you're using a Bean that doesn't already have the sketch loaded onto it, load the sketch to the Bean.
- To test it, expose the breadboard to different levels of sunlight and notice changes in the UV values measured. The screen should also be displaying sample information.

- You will need to download the U8GLib in order to use the screen.