Team Name: sddec21-09
Team Members: Ryan Lanciloti, Ben Pierre, Chinar Kaul, Alyssa Marshall, Jared Hermon, Abdelaziz Hassan
Report Period: March 30th- April 12th

Summary of Progress in this Period

The antenna design team began calculations to determine the values of wavelength for various sizes of the antenna. ESP team has continued to flush out the data harvesting portion of the project, including espressif code and python harvesting, additionally we have worked with ETG to get a public facing connection. The backend team has added to the API and implemented the basic skeleton for tensorflow model training. We also have basic communication between the app and backend server API.

Pending Issues

In its current state UART communication causes the ESP32 to block up. There are workarounds implemented, however we must resolve this eventually.

Plans for Upcoming Reporting Period

ESP team needs to fully implement the front end to back end link, specifically on getting data from the esp to the PI. We will do testing with the ESP32 to determine the best sub-carriers out of the 64 sub-carriers that show us the most relevant information for our application. The antenna team will finish the calculations for wavelength values and any additional calculations needed for various lengths of the antenna. The backend team will develop the RSSI Tensorflow model and begin testing the model with a dataset.
