

Team Name: sdmay21-09

Team Members: Noah Berthusen, Evan McKinney, Jacob Vaughn, Jesse Knight, Matthew Campbell, Cristian George

Report Period: Oct 12-Oct 18

Summary of Progress in this Period

Week of Oct 12 - That parts that we ordered arrived at the ETG and were picked up by Jesse. Jesse constructed the EM antenna and held onto the rest of the hardware. Dr. Geiger responded to our request for access to an oscilloscope in his lab, he cannot give us access due to current restrictions with COVID and lack of on-campus staff in his lab. We spoke with Tyagi and were approved to lower project requirements to a standard that can be measured using the DSOs available in the TLA. Met Friday of this week in the TLA to observe the data from our development board. We ran into issues using the vendor provider IDE and have decided to use the arduinoIDE instead. Jesse was able to downclock the processor to an acceptable frequency after meeting and we successfully configured GPIO communication.

Pending Issues

We are not sure how to seamlessly capture data from the oscilloscope in a manner that will allow for fast data generation. The software team cannot begin training and developing models until they have at least some basic dataset available to them.

Plans for Upcoming Reporting Period

Create an automated data capture script which controls the DSO. Begin basic ML modeling once data becomes available to the SW team. Inquire with ETG as to what our options would be regarding overnight data capture experiments.
