sdmay23-17: CySecAgri: Cybersecurity for IoT-enabled Precision Agriculture

Week 6 Report

October 29 - November 4

Team Members

Tom Ruminski — IoT Devices

David Wolfe — IoT Devices

Rian Lamarque — AWS Infrastructure

Elijah Hanson — AWS Infrastructure

Syed Al-Hussain — Flutter Application
Joe Hunter — Flutter Application

Summary of Progress this Report

We were able to get our data from our mock basestation all the way through AWS and into our mobile application.

Pending Issues

We are still waiting for our sensors to come in, our database may have to changed to a relational database, and our mobile application need to set up our REST api properly.

Plans for Upcoming Reporting Period

Create a security plan for our system, create an relational database in AWS, and setup our REST api.

Individual Contributions

Team Member	Contribution	Weekly Hours	Total Hours
Tom Ruminski	Did more reading in LoRaWAN best practices and learned more about the purchased sensors. Also did research into OTAA for LoRaWAN and Node-Gateway authentication.	5	
David Wolfe	Began brainstorming attack vectors for our application and possible mitigations we can implement. Also supported front end in getting ready for the demo.	4	
Rian Lamarque	Helped finish up initial prototype and make sure AWS infrastructure was available Need to look more into possible storage options for our data.	10	0
Elijah Hanson	Created Lambda function and Rest API get request function to receive requests from the app and send data back.	9	0

Syed Al-Hussain	Created Amplify application connected to dynamodb and started testing on authentication.	7	0
Joe Hunter	Connected AWS to the Flutter application via Rest Api protocol.	12	

Gitlab Activity Summary

Nothing to report.