
EE/CprE/SE 491

Iowa State A.I. Schedule Companion

Weekly Report #8

Wednesday, March 27 – Tuesday, April 2, 2024

Group number: ssdec24-08

Client: Koby Fowler

Faculty Advisor: Abraham Aldaco

Team Members:

Koby Fowler - Overall Application Leader

Chandrashekar Tirunagiri - Frontend Design Leader

Raghuram Guddati - Backend Design Leader

Jacob Paustian - Artificial Intelligence Research Leader

Christian Deam - Meeting Manager

Anna Huggins - Team Manager/Communicator

Weekly Summary

Another quiet week as semester exhaustion begins to take hold. As we prepare for our lightning talk next week, small progress is being made on all fronts. Until all of us meet together in class, communication remains minimal.

Past Week Accomplishments

Task(s) - Koby Fowler

Home Page Fixes, MUI Research - Chandrashekar Tirunagiri

- Fixed some bugs in the home screen
- Tested the application in the backend but faced issues
- Did some research on MUI components to be used.

Fixed TerraForm scripts - Raghuram Guddati

- Fixed and modified the terraform scripts for our backend Postgre tables.
- Did some research on AWS and more about Terraform.

LangChain Research - Jacob Paustian

- Researched a small amount of LangChain's Agent system. I was under the impression agent's were a tool used to optimize training data sets. This was not the case.
- Agents are Langchain's way of having an LLM interact with an external API. This is something I needed to figure out down the line eventually as our tools fundamentally need the LLM to perform specific tasks for our user.

Lightning Talk 5 and SQL Tables - Christian Deam

- Lightning Talk 5
- I created a new branch and added SQL tables to it (I forgot to do that when I initially made it)

User Info Page & Team Website Update - Anna Huggins

- Team Website Update
 - Updated the team's website to include all reports (through Report 7) and the most recent version of our design document (through Part 3.)
Figure 1.1: Updated team website with reports.
- User Info Page
 - Successfully added the collapsable drawer
 - Added a Select menu to allow users to select their major
 - Currently only added Engineering majors for ease of development, but I will be adding all majors later this week

Weekly Reports

Month 1 - January 23rd - February 27th

Report 1

Report 2

Report 3

Report 4

Month 2 - February 28th - April 2nd

Report 5

Report 6

Report 7

Report 8

- I discovered I could add sub-headers within Select menus, so I will be working on adding those in, such that majors can be sub-divided by college
- I am still working on adding other prompts and layout guides for the page

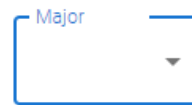
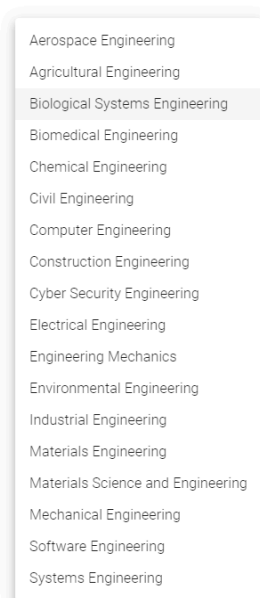


Figure 1.3: Majors Select Menu Bar.

Figure 1.2: Expanded Majors Select Menu Bar.

Individual Contribution Tracker

Name	Individual Contributions	Hours this Week	Hours Cumulative
Raghuram Guddati	- Wrote Terraform scripts for our backend - Learnt a little about our infrastructure and about AWS.	2.0	29.5
Christian Deam	- Lightning Talk 5 - New branch for SQL code push	2	22.0
Jake Paustian	- Small research done into Langchain's Agents - Couldn't dedicate much time to the class. Nothing here is particularly time-sensitive, which means lately, this class has been a very low priority.	1	32.0
Anna Huggins	- Worked on the User Info page - Updated Team Website to include weekly reports and most recent Design Document (up to Part 3) - User Info page development - Design Doc Part 4	4.0	32.0
Chandrashekar Tirunagiri	- Fixed a few bugs and tested the code in backend.	3.0	30.0
Koby Fowler	-	2.0	46.0

Pending Issues

Issue #2 - Integration of Authentication System

- **Koby Fowler**
 - Status: Open (1/5) [IMPORTANT]
 - Get a Mock User Run going ASAP (allow a user to generate a schedule, and that schedule will be saved to their account)
 - Status: Pending (3/5)
 - Revolves around the seamless integration of the new authentication system with the front end.

- While authentication ideas have been explored, further work is needed to ensure a smooth implementation and user experience. Additionally, addressing potential challenges or compatibility issues during the AWS account migration remains an ongoing concern. It is crucial to thoroughly assess and resolve these pending issues to guarantee the successful continuation of the project.
- Status: Pending (3/26)
 - Still awaiting mock user testing.
- Status: Pending (4/2)

Plans for the Upcoming Week

Koby Fowler

-

Chandrashekar Tirunagiri

- Coordinate with Anna and make more frontend features.
- Fixing some bugs in the code
- Testing it in the backend

Raghuram Guddati

- I plan to start working on how the server and frontend can talk to each other.
- I also plan to begin testing and running our mock applications soon.

Jacob Paustian

- Me and Koby have had like seven different times these last two weeks we were going to meet, and one of us always ends up being too busy. So, we hope to find a time to meet and design the backend's infrastructure.

Christian Deam

- We are presenting next week, so we need to coordinate with that, and I need to make it first
- Do more for backend

Anna Huggins

- Complete the User Info Page
 - Add all majors
 - Duplicate Select menu item and add options for additional user information criteria
 - Add text prompts before Select menu boxes
- Meet with Chan to discuss frontend plans
 - Specifically, changes made to the Homepage
 - Overall site design
- Update the Senior Design website with the most recent design document and team information