



Humane Interface Design Enterprise

March 15, 2023



Get some pizza!
(or a salad)



Today's Agenda



1. Introduction to HIDE
2. Announcements
3. Team introductions & updates
4. Time to meet with teams and team leads



Some HIDE Background Info

- Student-run enterprise with a focus on CS
 - 10 projects, each with a sponsor (except Human Factors)
- ~70 students
 - From every grade level and an assortment of majors & backgrounds
- Expectations
 - Attend 2 weekly meetings
 - General body meeting and individual team meeting
 - Complete occasional assignments on Canvas
 - Dedicate a few hours/week to project work
 - Make significant contributions to your team

What does grading look like?



20% Attendance

30% Project Work (grade from team lead every 4 weeks)

40% Midterm & Final Assignments

10% Misc. Surveys & Project Updates

Assorted FAQ



- How do I join HIDE?
- Can I be in the enterprise without registering for the class?
- What's the average time commitment?
- How are the project teams formed?
- Do I need any prior coding experience?



Announcements & Upcoming Events

- Attendance on the iPad
 - Only for students currently in the course
- Mid-term report grades are done
 - Refer to the rubric if you're wondering where you got points off
 - Feel free to contact me with any concerns
- If you did not submit your mid-term report yet
 - You have until this Sunday at 11:59pm
 - You will lose 50% of the points but it's better than a zero
- ENT4950/60 Registration

Announcements & Upcoming Events Pt. 2



- Recruitment Feedback Quiz
- Winter Wonderhack is this weekend!
 - 36 hour hackathon in the campus library
 - There's still time to register
 - Free food/snacks during event, chance to win prizes
 - If you'd like to volunteer for setup or teardown, contact me or Patrick Philbin

CCLC Queue

Project Summary:

- A web application built into Canvas which will provide a question/answer queue for the CCLC

Technologies Used:

- Django (Python based web framework)
- HTML, CSS with Bootstrap

You might be interested in this project if:

- You want to learn more about building web apps especially frontend and backend software - specifically with Django



Done this Week:

- Worked on updating database through Django Crispy Forms
- Started forum page design displaying answered questions

Upcoming Work:

- Implement Canvas sessions
- Link forms in frontend to backend models
- Database functionality

Chem Store

Project Summary:

- A web application that keeps track of the inventory of chemicals on campus. Users can search for chemicals, log transfers, request chemicals, and more

Technologies Used:

- .NET 6 Razor Pages in Visual Studio
- SQL Server database, C# backend
- HTML, CSS, JavaScript

You might be interested in this project if:

- You want to learn more about .NET
- You want to learn about inventory management systems



Microsoft
.NET



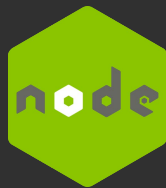
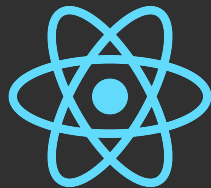
Done this Week:

- Started work on some validation issues preventing changes from saving

Upcoming Work:

- Importing/Exporting data to csv/xlsx
- Properly scoped authorization
 - Lab-level inventories

CS Department Scheduling App



Project Summary:

The CS department is in need of a new scheduling application. This application will keep track of class data (such as course ID, credits, and prerequisites), as well as faculty data (such as teaching history). It will also identify scheduling conflicts.

Technologies Used:

- **React, JavaScript & NodeJS**
- **cPanel & MySQL (hosted on cPanel)**
- **VSCode**
- **WSL (Ubuntu)**



You may be interested if:

- Want to be involved in a new app to be used the university
- Want to learn about these technologies
- You enjoy working with databases

Done this Week:

- Data insertion (boring sorry)

Upcoming Work:

- Building UI!



GDLS



Project Summary:

- Build a database of images for training neural networks for military vehicle classification.

Technologies Used:

- Python, ChromeDriver, Video Scraping, custom tools, object detection, duplicate filtering, Convolutional Neural networks.

You might be interested in this team if:

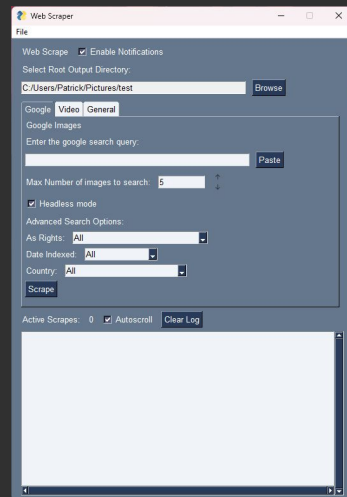
- You have an interest in learning about military vehicles/personnel
- You want exposure to image processing, web scraping, or NN technology
- You like data analysis or statistics

Done this Week:

- **150,000 New Personal images scraped**

Upcoming Work:

- YOLO Based Filtering
- Cron Job for Google Scrape
- GUI Updates Based On Feedback from sponsor
- More Graphs and Stats



GVSC: Command Simulator RTS



Project Summary:

- A simple real-time strategy game (RTS) with separate different HUD options to test the effectiveness of VR HUD's design and user ergonomics.

Technologies Used:

- Unreal Engine With Blueprints
- HTC Vive VR Display
- SteamVR

You might be interested in this project if you :

- Want to work with VR
- Interested in working with unreal engine

Done this Week:

- Bug Fixes

Upcoming Work:

- Complete project
- Finish VR HUDs
- Add more depth to the simulation
 - More building options

LB: Little Brothers

Project Summary:

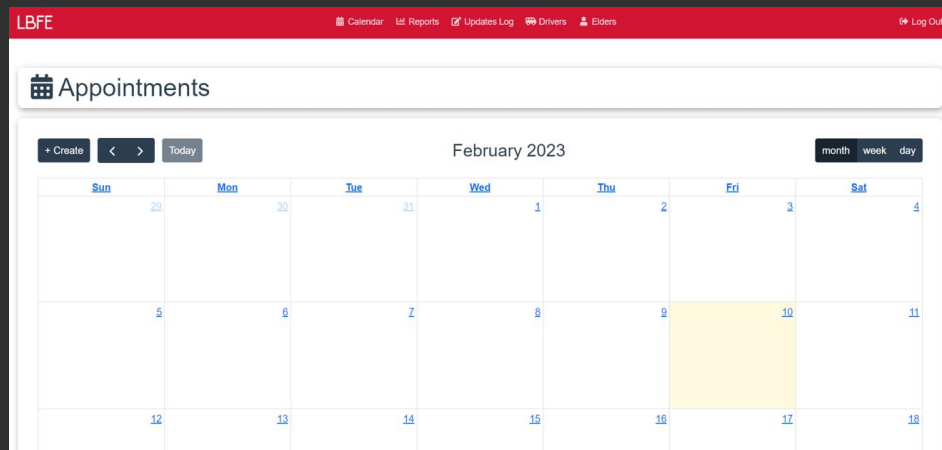
- The LBFE (Little Brothers Friends of the Elderly) Driver Scheduling Application is a web application designed to streamline the medical transportation services that LBFE offers free-of-charge to elderly Houghton and Keweenaw Counties residents age 60+.

Technologies Used:

- HTML, CSS (with Bootstrap)
- JavaScript (with Vue.js framework)
- ExpressJS
- MS SQL Server
- Microsoft's MSAL implementation of OAuth 2.0 Authorization Code Flow with postman

You might be interested in this project if:

- You're interested in frontend, backend, database, (full-stack) development



Done this Week:

- Met with clients to present timeline and prototype pages
- Continued work on admin pages

Upcoming Work:

- Finish integrating MSAL into project
- Develop comprehensive test suite
- Finish up some small features then deploy to LBFE server

Human Factors



Project Summary:

- Team of UX/UI designers working on various projects (CCLC Queue, Little Brothers, Blizzard Baja, FSAE)

Technologies Used:

- Figma
- HF methods

You might be interested in this team if:

- You are an HF major!
- You enjoy user interface design
- Do not prefer coding

Done this Week:

- **Reached out to all the subteams to shadow. Getting ideas for projects.**

Upcoming Work:

- Assist HIDE teams with UI
- Assist other enterprises with UX/UI

SLS Website



Project Summary:

- MTU's Sound and Lighting Services has an employee website for keeping track of upcoming events and supply stock. This project focuses on updating that website and adding new features

Technologies:

- HTML & CSS
- PHP
- cPanel

You might like this project if:

- You enjoy front end dev
- Working with databases

Done this Week:

- Fixed bugs:
 - Rental showing incorrect statements
- Progress on all tasks
- Meeting with sponsor

Upcoming Work:

- Continuing work on our priority list
 - Making a new page for event management
 - Multiple miscellaneous small improvements to the website

TCEV

Project Summary:

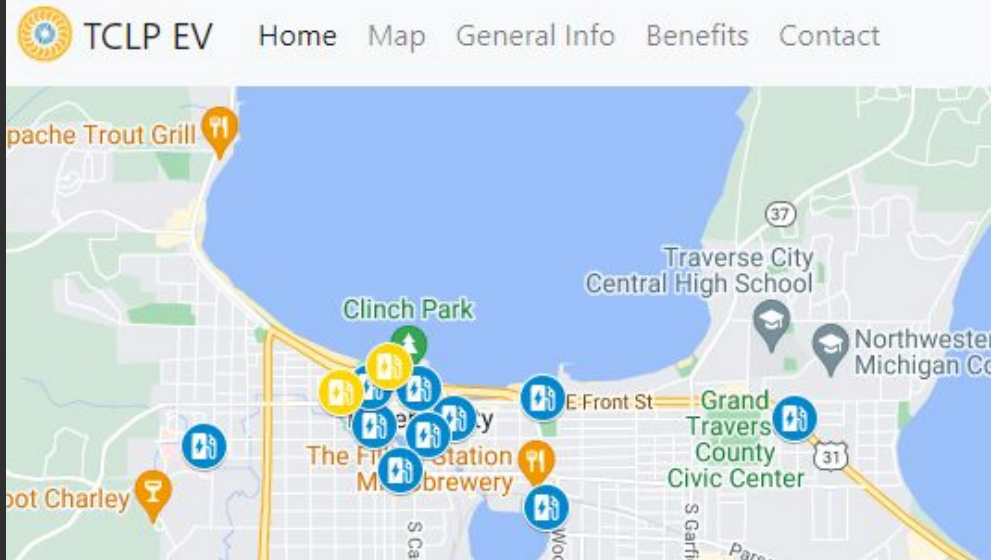
- We are creating a website for Traverse City's new network of electric vehicle infrastructure. It displays EV info & resources, alongside a map of charging stations.

Technologies:

- Wordpress (due to constraints on the Sponsor's hosting service)

You might like this project if:

- You have a burning passion for an EV website made in Wordpress, but we are not looking for new members at this time



Done this Week:

- Set up meeting with human factors
- Made progress on Wordpress site pages

Upcoming Work:

- Meeting with human factors to talk design
- Finding an alternative (free) map API

YooPapers



Project Summary:

- YooPapers is an mobile app + website for assisting in the serving of court papers throughout the U.P.

You May Be Interested If:

- You want to work on React mobile & web applications
- You want to work in backend development using SQL

Upcoming Work:

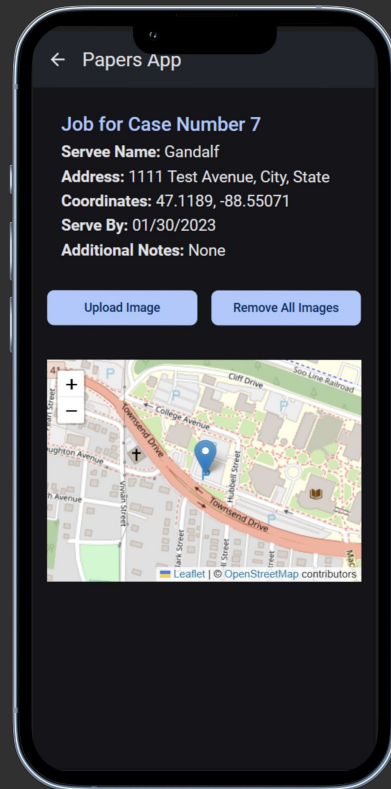
- Further development of app & web
- Integrate database into app & web using Django

Expected Technologies:

- JavaScript
- HTML5 + CSS
- Leaflet API
- SQL
- React
- Python + Django
- AWS

Done This Week:

- Further app development & app design rework
- Leaflet pin designs
- Finding and pinning users geolocation



MEET WITH YOUR SUBTEAMS

- CCLC Queue
- Chem Store
- CS Department Scheduler
- GDLS
- GVSC
- Little Brothers
- Human Factors
- SLS Website
- TCEV
- YooPapers

Questions about HIDE in general can be directed to me!

