## **THOMAS SPORER**

tsporer.github.io

<u>LinkedIn</u> <u>GitHub</u>

### **PROFESSIONAL EXPERIENCE**

**Arbella Insurance Group** 

Quincy, MA

Developer I Aug 2024 - Present

- Designed and optimized complex SQL scripts to debug and maintain 100 million record insurance policy databases
- Automated database debugging routines and form/coverage configuration through Python scripting
- Adapted to a vendor's updated XML/XSD format by quickly learning and applying Informatica PowerCenter tools
- Collaborated with Database Administrators and Technical Operations teams to periodically restore lost data
- Created and configured SQL-based business rules, logic, and table associations for form and coverage configurations

The Verse Berkeley, CA

Software Development Intern

May 2023 - Aug 2023

- Created immersive virtual experiences using Unreal Engine focused on promoting mental health within the WalkXR team, which consists of experts working together to create immersive experiences through a cross-media platform
- Built interactive functions, white boxed environments, and realistic material textures using Unreal Engine for the early-stage design, prototyping, and development of WalkXR virtual experiences
- Collaborated with other contributors on a large Unreal Engine 5 project codebase using Azure DevOps and Git
- Delivered weekly progress updates to the team and company founders through dynamic presentations in Miro, an online whiteboard platform, facilitating real-time collaboration and visualization of project developments

#### **PROJECTS**

<u>DiscoBaby</u> (TypeScript, AWS DynamoDB, Svelte, TailwindCSS, Vercel, Deezer API) [password: jollygood]

Dec 2023 - Present

- A web app that enables users to pick a song and send a challenge to their friends to guess the chosen song
- Developed TypeScript functions to load song data from Deezer API and store it in an AWS DynamoDB database
- Designed and implemented an intuitive UI with Svelte, Flowbite, and TailwindCSS for styling
- Reviewed code of other contributors and followed standard code review procedures using Git and GitHub

# DuckBob (C#, Unity3D, Audacity)

Aug 2022 - Present

- Programmed and designed art and audio assets for a 2D side-scroller available on web player
- Utilized C# scripting for custom game physics and Unity3D for game development

Custom Search Engine Interface (Flask, HTML, CSS, Python, SQL, Bash)

Apr 2023 - May 2023

- Engineered a scalable search engine similar to Google using Python and exposed it through a REST API
- Implemented information retrieval concepts such as text analysis (tf-idf), link analysis (PageRank), and parallel data processing with MapReduce for efficient document indexing and search result ranking
- Designed and implemented a responsive UI using HTML, CSS, and Flask framework

### **EDUCATION**

## University of Michigan, College of Engineering

Ann Arbor, MI

Bachelor of Science in Computer Science

Aug 2020 - May 2024

Relevant Coursework: Artificial Intelligence, Computer Vision, Cryptography, Data Structures and Algorithms,
Computer Science Theory, Computer Architecture, Modern Web Systems, Linear Algebra, Discrete Mathematics,
Programming Paradigms, Probability and Statistics

## **SKILLS**

Languages: Python, C++, SQL, JavaScript, C, C#, HTML, CSS, C, Swift, Scheme

Frameworks/Technologies: Git, GitLab, Excel, VSCode, AWS DynamoDB/EC2, React, Svelte, Unreal Engine, PowerCenter