

Wenqi He

Email: hewenqi96@gmail.com
LinkedIn & GitHub: galmungral

EDUCATION

University of Illinois Urbana-Champaign

Master of Computer Science
Dec. 2023 | Urbana, IL, US

Georgia Institute of Technology

Bachelor of Science in Computer Science
Minor in Physics
Dec. 2019 | Atlanta, GA, US

PROJECTS

A GPU-accelerated vector graphics renderer
A simple software raytracer
A simple software rasterizer
A basic raster map tile renderer
A canvas-based user interface framework
A stack-oriented esoteric language
A server-side interactive React renderer
A frontend framework with a module bundler

COURSEWORK

Graphics & Physics

Interactive Computer Graphics
Scientific Visualization
Computational Photography
Parallel Programming
Numerical Analysis
Partial Differential Equations
Differential Geometry
General Relativity

Language & Communication

Compiler Construction
Programming Languages
Natural Language Processing
Computer Networking
Distributed Algorithms
Relational Databases
Information Retrieval
Information Security

EXPERIENCE

National Center for Supercomputing Applications

Graduate Research Assistant, Visual Analytics
Aug. 2022 - Present | Urbana, IL, US

- Developed software for scientific researchers, with a focus on biomedical and geospatial data visualization.
- Responsible for the full-stack development and deployment of the BiteMap application for the INHS-MEL.
- Created interactive cartographic visualizations using OpenLayers, GeoJSON and public census data.
- Participated in the maintenance of PhyloDiver, an interactive tool for visualizing tumor phylogenies.

Gllue Software

Frontend Engineer, Applicant Tracking System (ATS)
Nov. 2020 - Nov. 2021 | Shanghai, China

- Collaborated with multiple teams to build web applications, WeChat mini-programs, services and libraries.
- Participated in the maintenance of the drag-and-drop user interface builder that powers the ATS system.
- Responsible for the front-end integration of a new Single Sign-On system for multiple products.

Étude LLC

Software Engineer, Founding Team
Aug. 2019 - Aug. 2020 | Atlanta, GA, US

- Developed several features of a desktop PDF reader, including table of contents parsing and text highlighting.

SKILLS

Languages

TypeScript, JavaScript, C, C++, GLSL, WebAssembly, Rust, SQL, Python, Java, PHP, HTML, SVG, CSS, Sass, LESS, OCaml, Haskell, Common Lisp, MATLAB, Mathematica

Frameworks & Libraries

Angular, React, Node.js, Next.js, NumPy, SciPy, PyTorch

Development Tools

Bash, Git, Vim, Visual Studio Code, LLVM, Make, esbuild, Babel, Rollup, webpack, Vite, Tailwind CSS, TypeDoc, Cypress, Puppeteer, Jest, ESLint, Prettier, GitHub Actions, GitLab CI, Docker, Kubernetes