Perci Wolday

469-360-6158 | perciwolday2@gmail.com | linkedin.com/in/PerciWolday | github.com/PerciWolday | Portfolio

Education

Alma College | Alma, MI — April 2027
Bachelor of Science in Computer Engineering — *GPA: 3.9*

Relevant Coursework: Data Structures and Algorithms, Optimization with Python, Object Programming with Java, Algorithmic Techniques, Computational Engineering, Machine Learning, Cybersecurity Fundamentals, Electrical Circuits

Engagement: Co-founder for Girls Who Code | Global Affairs Instructor at Shiv Nadar School, India | Policy Research

Technical Skills

Python, Java, JavaScript, TypeScript, C | React, Tailwind CSS, HTML, CSS
Node.js, Spring Boot, Flask, SQL, Firebase, REST APIs | Git, GitHub, Render | GPT APIs, Slack API

Experience

Engineering & Project Management Intern | Kadeya — Aug 2025 – May 2026

- Prototyped an automated cleaning and drying system for vending machines, reducing maintenance time by 60%.
- Developed IoT system using Python to process sensor data, detect movement, and send updates to backend servers
- Boosted prototype reliability and delivery speed, reducing costs 15% through optimized component sourcing.
- Aligned hardware and software teams and cleared blockers early to keep development on schedule.

Computer Science Researcher | AI-Driven Motion Planning Under Uncertainty — May 2025- Oct 2025

- Built a motion planning framework with Kalman prediction and MPC, for human-aware robot navigation.
- Optimized control algorithms using NumPy to cut acceleration variance 28% and sustain path efficiency by 93%.
- Collaborated with cross-university students to evaluate robot legibility and trust in human-shared spaces.

Machine Learning Policy Researcher | OsGood Center — Jun 2025 – Aug 2025

- Developed Python scripts to calculate fairness metrics on ML models, evaluating bias across 5+ datasets.
- Assisted technical research on ML policy frameworks and cybersecurity, to help agencies audit AI compliance.
- Attended congressional hearings, think tanks, and conferences to track developments in technology and policy.

Technical Lead | Girls Who Code — Oct 2024 – Present

- Founded GWC chapter, grew it to 15+ members and leading weekly algorithm, OOP, and code review workshops.
- Guided members through 5+ team projects, including a Generative AI initiative where members built 3+ Python-based chatbots using GPT APIs, collectively writing 2,000+ lines of code.

Computer Science Instructor| Independent Mentorship Program — Jun 2024 – Jul 2025

- Mentored 10+ high school students in Ethiopia in object-oriented programming, data structures, and algorithms through pair programming and a 6-week coding bootcamp achieving 100% completion rate.
- Designed and deployed 15+ interactive Python and Java learning modules with quizzes, code reviews, and GitHub workflows that improved test performance by 40% and reduced support needs by 60%.

Projects

Voting System for Remote Elections | *Java, JavaScript, HTML/CSS, Bootstrap, JSP* — Jan 2025

- Engineered a secure OTP-based voting platform using Spring MVC for routing, Hibernate for persistence, and JSP for a dynamic UI, enhancing election transparency through one-time password authentication.
- Integrated real-time dashboards and candidate registration workflows, and validated security through JMeter.

Library Management System | *Java, Spring MVC, MySQL, Apache Maven* — Nov 2024

- Optimized database queries with indexing and multithreading, resulting in faster response times during testing.
- Built real-time due date notifications and item tracking to reduce overdue errors and improve user engagement.