Aaron Wang

(908)-386-6002 | awang27@nd.edu | linkedin.com/in/aaron-r-wang | aaronrwang.github.io

EDUCATION

University of Notre Dame | Notre Dame, IN

(Expected) May 2027

B.S. Computer Science | Applied Computational Mathematics and Statistics

GPA: 3.95

CS Course work: Data Structures, Logic Design, Systems Programming, Discrete Math, Theory of Computing*, Computer Architecture*, and Programming Paradigms*

Math Coursework: Linear Algebra, Calculus I-III, Probability, Statistical Methods* and Differential Equations*

(* current)

EXPERIENCE

University of Notre Dame | Research Intern | Web3DB

February 2025 - Current

- Analyzed and researched relational databases, specifically PostgreSQL and MySQL, to design and implement
 efficient indexing within the Web3DB Project
- Utilized Docker and Apache Spark for scalable testing across multiple worker nodes

University of Notre Dame | Teacher's Assistant | Discrete Math & Data Structures

September 2024 – Current

- Hosted weekly office hours to clarify concepts and supplement lectures, resulting in improved student understanding
- Created and graded problem sets with detailed feedback for 80+ students weekly to enhance their problem-solving skills and course performance

iGoStem Academy | Teacher

(Summer) June 2022 – August 2023

- Taught a class of ~15 kids STEM-related activities, including solving a Rubik's cube, animation, and engineering, leading to increased engagement and understanding of STEM concepts
- Developed lesson plans for children who could not yet read or write, resulting in improved comprehension and participation in class activities

PERSONAL PROJECTS

Bible Journal App | GitHub

Flutter, Supabase, PostgreSQL, RESTful APIs

- Developing a cross-platform mobile app with Flutter to enhance Bible study, reflection, and prayer journaling
- Implementing seamless data retrieval and storage using Supabase, PostgreSQL and RESTful APIs

TangoBot | GitHub

Next.js, TypeScript, MongoDB, Python

- Worked with a partner to deploy a dynamic website using Next.js, showcasing solutions for every Tango game
- Designed and implemented an automated web scraper to extract content from the Daily Tango game, solve it, and upload the data to a MongoDB database

Go-Stop | GitHub

Node.js, Express.js, Socket.io, React

- Developed a Full Stack WebApp to play the traditional Korean Go-Stop card game with friends and strangers
- Programmed a game in JavaScript, leveraging object-oriented programming principles and creating an engaging user interface with React

LEADERSHIP AND ACTIVITIES

CS For Good | Notre Dame, IN | GitHub

September 2024 - Current

- Designed and implemented a Turtle web app using a lexer, parser, and interpreter to execute movement, control flow, and drawing commands
- Created an interactive learning tool to teach elementary students coding fundamentals, making programming concepts more accessible and engaging

Delbarton Peer Tutor | Morristown, NJ

September 2021 – May 2023

Peer Leader / Tutor

- Co-ordinated appointments for school of 600+ students and 30+ tutors
- Tutored 20+ peers over 2 years in Algebra, Geometry, and Calculus

HONORS

Notre Dame Dean's List

Fall 2023, 2024 and Spring 2024

USACO Silver Division

2022

Bausch & Lomb Honorary Science Award

2022

TECHNICAL AND LANGUAGE SKILLS

Technical: Python, JS/TS, Java, C, C++, React, Node.js, Next.js, SQL, MongoDB, Flutter, Docker

Languages: English, Mandarin (conversational)