Tharunya Sundar

New York | (607) 663-4584 | tsundar@binghamton.edu | linkedin | github | portfolio

EDUCATION

Binghamton University, SUNY, Thomas J. Watson College of Engineering and Applied Science

New York, USA

Master of Science in Computer Science

December 2025

Cumulative GPA: 3.437/4.00

SASTRA University

Tamil Nadu, India

Bachelor of Science in Information and Communication Technology

August 2024

PROFESSIONAL EXPERIENCE

Haven AI - Wellness App, PM Accelerator

Remote - Florida, USA

May 2025 - Present

Software Engineer Intern

Spearheaded development of Haven AI, a cross-platform React Native mobile app that delivers proactive behavioral support to help users quit vaping, targeting 40% user download rate within the first 3 months post-launch

Delivered a functional MVP in under 8 weeks, integrating Firebase Authentication, dynamic chat interface and custom

components to simulate GPT-4o-powered messaging, with trigger logging, reflections, and gamified progress tracking

CRAFT Lab Project Assistant - AI Benchmarking Research Binghamton, NY

February 2025 - May 2025

- Curated and structured JSON dataset 1,856 GMAT questions across Verbal, Quant, and Data Insights sections, incorporating multiple modalities (text, math, tables) for use in large-scale LLM evaluation
- Executed Tree-of-Thought prompting pipelines to benchmark GPT-40, Claude-3, and Gemini on reasoning breakdowns; observed up to 33% accuracy improvement and enabled step-wise analysis of model failures for NeurIPS 2025 paper

Tamil Nadu, India

AI Project Intern

August 2022 – December 2022

- Created a real-time face mask detection system using YOLOv5, and optimized it with MobileNetV2 for lightweight, edge-friendly inference
- Hosted the application on Streamlit Cloud, enabling scalable, live demos with real-time OpenCV-based input capture

Patient CRM Dashboard

April 2025

- Architected a full-stack, cloud-hosted CRM dashboard using Next.js, React, Node.j, and Cloudflare workers to streamline patient intake workflows for healthcare front-desk staff
- Implemented CSV upload, inline data editing, and real-time validation with secure REST API sync, robust input checks, schema enforcement, and actionable error feedback using Material UI and Intercom

ChatApp

April 2025

- Developed a real-time chat application with user authentication, presence tracking, and persistent message storage, enabling seamless one-on-one and group messaging.
- Engineered a fault-tolerant backend using Redis pub/sub for message broadcasting and Nginx load balancing to ensure high availability across distributed server instances.

Library Management System

November 2024

- Wrote comprehensive unit tests using Mocha and Chai, covering API logic, edge cases, and data validation.
- Utilized in-memory MongoDB instances to ensure fast, isolated testing environments and maintain test reliability across CRUD operations and schema checks.

PUBLICATIONS AND ACHIEVEMENTS

NeurIPS 2025 (Under Review)

May 2025

Are LLMs Ready for English Standardized Tests? A Benchmarking and Elicitation Perspective

CodeFest Hackathon, [Winner] conducted by ColorStackBU

September 2024

• Developed a real-time campus event discovery platform with the best UI design, implementing secure authentication using JavaScript, HTML, and CSS

LEADERSHIP EXPERIENCE

Binghamton University, International Student and Scholars Services (ISSS), Leadership Volunteer

August 2024

Assisted 60+ new international students, Led four campus tours, provided detailed insights on key services like health counseling, academic buildings, departments, and addressed student questions on academic life at Binghamton University

TECHNICAL SKILLS

Languages: Python, C/C++, JavaScript, TypeScript, React, MySQL, MongoDB, HTML5, CSS3, TailwindCSS

Frameworks & Libraries: React.js, Next.js, Node.js, Express.js, FastAPI, Socket.io, TailwindCSS, Material UI, Streamlit, TensorFlow, Keras, Scikit-learn, OpenCV, yolov5, Pandas, NumPy, Matplotlib, Zustand, Zod, Mocha, Chai

Databases: MongoDB, MongoDB Atlas, NoSQL, SQL

Tools & Platforms: Firebase, Expo SDK, Git, Intercom CRM, REST API, JWT, Nginx, Cloudflare Workers, VS Code, Slack, CI/CD (GitHub Actions, Vercel, Render, Netlify, EAS)

Certifications: Advanced Learning Algorithms, The Complete JavaScript Course from Zero to Hero