

Adithya Nair

AI & Data Science Student | Machine Learning, LLMs & High Performance Computing

📍 Bengaluru, India ✉ adithyanair.dev@gmail.com 🔗 [nairadithya](#) 🌐 [nairadithya](#)

Education

Amrita Vishwa Vidyapeetham, B. Tech. in AI & Data Science – Bengaluru, India Aug 2023 – present
• CGPA: 8.65

Projects

Mentat - High Performance HTTP server written in OCAML Dec 2025 – Mar 2026
• Wrote a multithreaded HTTP server using OCAML 5 semantics and Eio
• Applied optimization strategies such as a thread/request and using a reader/writer fiber model
• Achieved a throughput of 180,000+ requests per second on a consumer laptop.

Rover Control Plane June 2025 – Jan 2026
Built for Team Odyssey, The Rover Team in Amrita Bengaluru
• Designed end-to-end control framework for Team Odyssey with systemd services and udev rules for automated system management and static port mappings
• Implemented real-time camera streaming using WebSocket with MJPEG fallback for robust video transmission
• Developed full-stack control dashboard with frontend interface and ROS message conversion backend to operate the rover

Prameya Feb 2026 – Mar 2026
A bookmark manager and reader app
• Implemented an offline-first system with a sync engine interface with IndexedDB and PostgreSQL
• Created a parsing system to convert ad-ridden and bloated web pages into clean readable HTML
• Deployed the application on Docker to be self-hostable and scalable

Community Activities

Co-Founder, [ATLAS](#), Systems Programming Club Oct 2025 – present
• Cofounded a systems programming club in Amrita
• Ran technical events focused on topics surrounding ML Systems, Databases, Dev Tooling and Data Pipelines
• Built a community of over 300 members

Technical Events Lead, Dastaan - Fest of Amrita Bengaluru Apr 2025 – Nov 2025
• Organized and executed 8 technical workshops/competitions on ML agents, cloud infrastructure, and software performance for 200+ participants
• Coordinated with 15+ industry professionals
• Led a team of 13 volunteers to execute technical events

Skills

Languages: Python, TypeScript, JavaScript, Rust, OCAML

Skills: Machine Learning, Deep Learning, DBMS, Functional Programming, Natural Language Processing, Linux, Networking