

# Akhil Bejjanki

Pleasanton, California | 510-807-1095 | akhilbejjanki30@gmail.com | U.S. Citizen

## Education

**Georgia Institute of Technology | Atlanta, GA**

Graduation: May 2028

Bachelor of Science in Computer Engineering, GPA 4.0/4.0

## Skills

**Programming:** Java, Python, C++, HTML, CSS, SQL, Git

**Embedded/Hardware Development:** RaspberryPi, Arduino, AutoDesk Fusion, Onshape, Rust

**Frameworks/Databases:** React, MongoDB, Typescript, Node.js, Spring

## Experience

**RoboCup | Atlanta, Georgia**

August 2025 – Present

**Robotics Engineer**

- Developed firmware in Rust for autonomous robots, implementing motor control, sensors, and hardware communication via I<sup>2</sup>C
- Programmed an RTIC-based cooling system in Rust that reads thermistor data via ADC, drives an N-MOSFET for PWM fan control, and integrates fail-safe logic to prevent overheating and ensure system reliability
- Implementing multi-agent AI frameworks to support autonomous decision-making, coordination, and strategy across robots

**Hydra | Pleasanton, California**

May 2025 – August 2025

**Web-Dev Intern**

- Collaborated with developers to design and implement website features connecting open-source contributors with companies
- Incorporated advanced layout design and developed the website while gaining hands-on experience with how AI influences business models and long-term market strategies

**lkey studios | Berlin, Germany**

August 2023 – July 2024

**Software Intern**

- Developed and launched a fully functional website that sustained 50+ monthly users, writing code to enhance navigation and improve the user interface
- Built and integrated multilingual support, improving accessibility for diverse audiences
- Enhanced features for an online shop using React, contributing to frontend development and responsive design

## Projects

**Smart Path AI | Big Data Big Impact @ Georgia Tech**

August 2025 – Present

**Machine Learning and UX Developer**

- Developed GraphRAG-powered AI tools that dynamically adjust question difficulty and concept sequencing to optimize learning
- Implemented MongoDB into a full-stack adaptive learning platform to store and retrieve user data, enabling personalized quizzes based on performance and confidence scores
- Built a responsive React user interface supporting file uploads and interactive learning modules, improving data flow between the frontend and backend

**RaspberryPi Robot**

January 2024 – July 2024

**Designer**

- Independently designed and built a Raspberry Pi-powered robot from scratch, integrating sensors, motors, and custom code to detect and respond to nearby objects.
- Conducted hardware research, assembled and programmed all system components, and tested prototype for consistent autonomous behavior.

**Material Sorter**

April 2024 – May 2024

**Engineer and Programmer**

- Designed and programmed an automated device that sorted 15 recycled-material marbles into three bins with 100% accuracy
- Modeled and 3D-printed custom input mechanism using AutoCAD, streamlining sorting and ensuring single-marble precision
- Delivered a professional presentation and live demonstration of device to CEOs, showcasing design and real-world functionality

## Leadership

**AVHS Engineers | Programming Captain**

August 2022 – May 2025

- Led team to states by designing, building, and programming three unique competition robots featuring pneumatics, catapults, and custom drivetrains
- Guided programming in C++ for autonomous and driver-control systems while mentoring new members in coding through developing hands-on tutorials for robotics fundamentals.