

Harish Bommakanti

☎ (510) 737-1976 | ✉ harish.bommakanti@utexas.edu | 🏠 harishbommakanti.github.io | 🔗 harishbommakanti | in harishbommakanti

Education

University of Texas at Austin

Austin, TX

Bachelor of Science in Computer Science, GPA: 3.84/4.0

May 2024

- **Relevant Coursework:** Operating Systems, Computer Architecture, Data Structures, Robot Learning, Probability and Statistics, Linear Algebra
- **Teaching Assistant:** Introduction to Python

Experience

Mythic Inc.

Austin, TX

Firmware Engineer Intern

May 2021 - Aug. 2021

- Integrated new features and bug fixes to the customer facing **Python API** and firmware facing **C API** used to interface with Mythic Intelligence Processing Unit (IPU) chips.
- Routinely **collaborated** with the AI Solutions and Hardware teams to resolve product specification issues.
- Operated under the **Agile Scrum** methodology and completed 200% of the Jira tickets assigned for the term.

UT Austin Robot Perception and Learning Lab

Austin, TX

Undergraduate Research Assistant

Oct. 2020 - Jun. 2021

- Tuned the PPO **reinforcement learning** algorithm in **Python** to demonstrate the usability of Robosuite, a robotics simulation framework.

NASA

Austin, TX

Software Intern

Mar. 2018 - Jul. 2018

- Aggregated precipitation data for 100s of Texas locations through National Weather Service REST endpoints with **JavaScript** to host on a Center for Space Research website.
- Automated a 10 minute data visualization process in mapping software to run in under 10 seconds in **Python**.

Projects

Y86-64 System Emulator

- Designed a simulator in **C** capable of executing assembly following Y86-64, a subset of the x86-64 architecture.
- Built a pipelined processor and a 2-level cache memory hierarchy to address realistic time and memory constraints.

Weather Prediction

- Developed a **Python** script to generate a 48 hour weather forecast given the past 120 hours of data.
- Applied **time series modeling** to form a temperature curve that accurately reflects past data.

Robotics Scouting App

- Authored a web application to automate data gathering at robotics events using **JavaScript, HTML/CSS, and Jekyll**.
- Enabled both offline and online data aggregation for 50+ teams per event.

Activities & Leadership

High School FRC Robotics Club

Austin, TX

Software Lead, Electrical Lead, Program Manager

Aug. 2016 - Jul. 2020

- Nominated for the 2018 and 2019 Dean's List Award for recognition of notable dedication and **teamwork**.
- Awarded the Creativity Award twice at the 2019 District and State Championships for recognition of innovative control systems.
- Selected as Division Quarterfinalists for the 2019 FRC World Championships.

Skills

Programming Languages

Python, Java, C, JavaScript, HTML/CSS

Developer Tools

Git, GitHub, Perforce, Swarm, VS Code, IntelliJ IDEA, Vim, TeX, LaTeX

Languages

Fluent in English, Conversational in Telugu

Work Eligibility

U.S. Citizen – Eligible to work without restrictions or sponsorship