NITISHCHENNOJU

Skills

GPA: 3.61/4.0 (ASU)

Driven engineer skilled in several aspects of engineering operations. Consistently accomplishes projects under budget and ahead of schedule. Eager to learn and apply new skills. Interested in working on autonomous systems incorporating guidance, navigation, and control avionics systems.

Python, C++, JAVA, SolidWorks, Arduino, Shell Scripting, Circuit/PCB Design, PCB Design, Soldering, Excel/Google Sheets, Google Scripts, MatLab, HTML/CSS, MIPS Assembly

Experience

Arizona State University - *Computer Systems Engineering*   August 2019 - May 2021
➔ Clubs: Sun Devil Rocketry, Air Devils (AIAA DBF competition team), SEDS Rocketry Division
UC Irvine - *Computer Science and Engineering*   September 2021 - May 2023
➔ Projects: Rocket Project, UAV Forge (AUVSI SUAS competition team)

Data Propulsion Acquisition - *Fulton Undergraduate Research (ASU)*   October 2019 - *December 2020*
- Obtaining electric fixed-wing UAV performance data to verify/optimize aircraft design from a single flight
- Advanced Data Filtration: Analog + Software (Python/Java program) filters

IoT 5G Intern - *Open Networking Foundation (ONF)*   August 2019 - March 2021
- Evaluated IoT frameworks / communication platforms
- Develop mobile IoT robot application to demonstrate edge computing on Aether 5G

Aviation & Rocketry Club - *President/Founder (Cupertino High School)*   September 2017 - May 2019
- Founded and maintained a club to get students interested in the Aerospace industry
- Led 5 rocket launches (including 1 at a local airshow), grew club from 0 to 30 active members in 1 sem

Projects
(click for more projects)

Arduino UGV + Telemetry GUI - *Personal Research Project*
- Built Arduino based rover to run GPS waypoint missions with an accuracy of 1 meter and max driving speed of 10mph
- Capabilities include telemetry (1km range), PID + FF steering control, custom [python GUI](attitude and GPS)
- Controlled by dual arduino [custom flight controller programmed in C++](link)
- Testing platform for low cost UAV flight controller (<$30 of flight hardware currently) - UAV designed to be disposable

IoT Door Lock - *Personal IoT Project*
- Goal -> Limit things in my pocket when leaving my dorm while allowing for easier access to my room while being equally as secure
- controlled via app/smart home assistant/[fitbit app](link)/[custom webpage](link)

Dining Hall Selector (ASU) - *Useful Web-based Python Project*
- Goal -> make me lazy, and feed me the best food available at that time
- Algorithm which scrapes online menu to determine optimal dining hall by personal food interests
- Updates html [web page](link) and sends email at meal times

Achievements & Leadership

Eagle Scout: 124th Eagle in Troop 390
➔ [Eagle Project](link): Built 3 book-sharing boxes for the community with only donations (monetary and labor)
➔ Planned several trips (including a beach cleanup) and took part in over 200 hours of service

Navigation Lead - UAV Forge (UCI MAE Project)		*Ongoing*
Avionics Lead / Outreach Coordinator - Sun Devil Rocketry (ASU Student Org)		*Sophomore Year 2020-2021*
Electronics Lead - Air Devils (ASU Student Org)		*Sophomore Year 2020-2021*
President / Founder - Aviation and Rocketry Club (High School Club)		*Sept 2017 - May 2019*
Project Coordinator - FIRST Robotics FRC (High School team)		*Sept 2018 - Apr 2019*
Captain / Hardware Lead - FIRST Robotics FTC (High School team)		*Aug 2016 - Apr 2017*