

VINEETH HARISH

333290 Georgia Tech Station, Atlanta, GA 30332-1400 | +1-706-330-4049 | vharish6@gatech.edu

Rising Junior at Georgia Institute of Technology looking for SWE or Hardware Design Internships for Spring or Summer 2021.

Education

Bachelor of Science : Electrical Engineering

May 2022

Georgia Institute of Technology - Atlanta, Georgia

- **Major in Electrical Engineering** with focus in Electronic and Optoelectronic Devices
- **Minor in Computer Science** with focus in Artificial Intelligence and Machine Learning
- Awarded Stamps President's Scholarship (Full Ride)

Experience

Engineering Support Intern

Jun 2020 - Aug 2020

Honeywell - Richardson, Texas

- Developed an interface for hundreds of engineers to analyze wafers in **C#** after being tested with a prober. The software graphically displays a color-coded map of the wafer where the substrate is mapped according to its perspective bin.

Undergraduate Researcher

Jan 2020 - Current

3D Systems Packaging Research Center - Atlanta, Georgia

- Designing efficiencies for flexible silicon/glass substrates to be used in 6G applications
- **Class 100 and 1000 Clean Room certified**
- Gained expert knowledge in **substrate fabrication processes** including e-less and electro plating, photolithography, etching, and plasma treatments

Co-Founder and CTO

Dec 2019 - Current

ClairFlow - Atlanta, Georgia

- Developing technologies for carbon dioxide sequestering, monitoring, and filtering for indoor spaces that reduce HVAC energy costs, improve indoor air quality, and retain high levels of cognition.
- Developed a feedback control system to regulate air through piping as well as developing a sensor network to monitoring changing properties in the system.
- Created libraries in **C++** for various sensors to be integrated with an Arduino.

Peer Instructor at Hive Makerspace

Sep 2018 - Current

Georgia Institute of Technology - Atlanta, Georgia

- Instructed students on skills such as **surface mount soldering**, use of **electronics test bench equipment**, and operation of **3D printers, laser cutters, and plasma cutters**.
- Helped resolve problems such as circuit issues and provided knowledgeable advice to students working on projects.
- Gained strong experience working with **Oscilloscopes, Function Generators, Multi-Meters, and Optical Microscopes**

Contractor/Intern

Aug 2017 - May 2018

Spatial Microsystems - Auburn, Alabama

- Populated and **fabricated PCBs** for GWOC, a smart lamp post to be used in parks that efficiently allocates power, measures precipitation, and provides park reminders.

Independent Projects

Vision Processing and Data Structures/Algorithms

FIRST Robotics/CS 1332

- Created algorithms for vision processing using National Instruments vision suite in **Java**
- Created and wrote implementations for various data structures and algorithms in **Java**

Light Synthesizer

- Developed a light synthesizer that encodes analog signals from a photo diode as RGB values and displays them on an array of LEDs.
- **PCB Designed** in Traxmaker 2000 and programmed in **C** using Atmel Studio

Swerve Cam

Hack GT 6 (Hackathon)

- Developed an IMU controlled camera mount that allows a user to swivel a camera by moving their head
- Tasks included programming an Arduino Nano in **C** for wireless communication as well as **Laser Cutting** and **3D Printing** designed parts

Simple Computer for Robotics and Pacman

ECE 2031 (Digital Design Lab) / ECE 2035 (Programming HW/SW Systems)

- Developed a simple computer in **VHDL** with a basic **Assembly** instruction set for use on a **Cyclone FPGA Board** to be used on a robot.
- Created an RPG Game in **C++** using a hash table backend in **C** on a mbed microcontroller for final project

Meme Scraper and Stock Wizard

- Developed a Meme Scraper in **Python** that analyzes meme trends using **Jupyter Notebook, MySQL**, and reddit scraping from r/DankMemes
- Developing a stock wizard in **Python** that does sentiment analysis on stock perceptions on posts in r/WallStreetBets

Skills

Hardware Skills:

- PCB Design and Fabrication
- Clean Room Certification (Class 100/1000)
- HAM Radio Technician
- Fusion 360 and Machining
- MATLAB (DSP Suite)

Software Skills:

- C/C++/C#
- Python
- Java
- MIPS Assembly
- VHDL