

EDUCATION

New York University

Bachelors of Science in Computer Science – Final Year

Brooklyn, NY

Aug. 2021 – Present

Basis Independent Silicon Valley

High School Diploma

San Jose, CA

Aug. 2016 – Jul. 2020

EXPERIENCE

NYU Holodeck (Corelink)

Academic Researcher

Brooklyn, NY

February 2021 – Present

Framework Design: Helped design a major portion of the project - plugin interaction within the network.

Client Development: Developed and unified Corelink clients (Python, C++, Bash, Browser, and others)

CI/CD: Developed documentation, testing, and linting pipelines for the project in Gitlab.

Mentorship: Onboarded and managed 20+ people to the service. Created informational documentation and tutorials.

Audio Video Conferencing: Created an audio/video service in C++ that interfaces with the Corelink network.

Amazon

Software Development Engineering Intern

Seattle, WA

May 2022 – August 2022

Data Aggregation Service: Created a project to visualize data within team's service. Created a typescript React frontend and an API with AWS CDK, Java Lambda Functions, API Gateway, and internal Amazon Services

Dark Forest

Graphics Intern

San Jose, CA

December 2021 – February 2022

Shader Development: Implemented a typescript plugin that allows for custom shaders in the Dark Forest game.

Hewlett Packard Enterprise (Aruba Networks)

Cloud Intern

Santa Clara, CA

June 2019 – August 2019

Estimating Bandwidth: Estimated bandwidth using Auto ARIMA and other time series ML algorithms.

Unit Testing: Acted as QA tester for team, increasing test coverage throughout the service

PROJECTS

Synesthesia Visualizer: Create a visualizer that mimics the experience of Auditory Visual Synthesis, with audio analysis libraries (e.g. librosa) and through the use of pitch recognition algorithms (e.g. Yin) and frequency spectral analysis. Utilizes pure serverless aws infrastructure (autoscaling ec2 cluster) and WebGL for Virtual Reality.

Delivery Service: Created a web crawling service to send a notification when there is a delivery slot available for Whole Foods, Costco, or Safeway. Used AWS SNS, serverless infrastructure with ECS and Lambda Functions, and selenium with headless chrome instances in docker containers.

Personal Website: Created a website that does real time 3d rendering in pure client side javascript with reactive interactable elements in a fun and playful environment. Also purely serverless and scalable with API Gateway and other interactions with fun lambda functions and other AWS elements.

IP Monitor: Used the QT Framework and built a KDE widget to monitor public and private IP Addresses.

Electronic Trombone: Engineer a midi controller in the form of a trombone using Arduino to apply standard instrument knowledge to electronic applications with capacitive sensing and pid controllers.

PROGRAMMING SKILLS

Languages: Python, Javascript/Node, C++, C, Rust, Java, (e)Lisp, HTML/CSS, Solidity, Shell Scripting, \LaTeX

Technologies: AWS, Linux, Emacs, Docker/Kubernetes, ReactJS, Jupyter Notebooks, NGINX, ...

CERTIFICATIONS

AWS Solutions Architect

September 2021

AWS Cloud Practitioner

August 2021

Stanford Machine Learning by Andrew Ng

July 2020

AWS Fundamentals Specialization

June 2020