

## WORK EXPERIENCE

Software Development Engineer

### Amazon

Aug 2021 - Present      Chennai, India

- Automated the FireTV business reporting and disbursement pipeline
- Built a multi-dimensional customization system to allow ecosystem scalability
- Enabled touch interface for FireTV Auto

Software Development Engineer Intern

### Amazon

Jan 2021 - July 2021      Chennai, India

- Implemented a system to allow seamless programs onboarding into the FireTV ecosystem
- Developed an OTA software update publishing system that can target specific programs and device types

Software Development Engineer Intern

### Madbee Inc

May 2019 - May 2019      Chennai, India

- Built responsive websites using React and Flask
- Automated manual tasks using Python to save almost 20 hours/week of development effort
- Set up CI/CD pipelines in Azure DevOps

## EDUCATION

Master of Science in Computer Science

### Stony Brook University

Aug 2022 - Aug 2024      New York, USA

- TA for CSE 303: Theory of Computation

Bachelor of Technology in Computer Science

### Amrita School of Engineering

June 2017 - June 2021      Coimbatore, India

- GPA: 9.3/10 with Academic Distinction
- Member of CSI, ACM and IEEE organizations

## PROJECTS

### Faculty Dashboard

- Stack: React, NodeJS, MySQL, Heroku, GitHub pages
- A web application that allows faculty to manage their course plan, timetable, leaves, and announcements

### Voice-based Transport Enquiry System

- Stack: React, NodeJS, OracleDB, Heroku
- A web application to book bus tickets with support for voice commands and text-to-speech

### Malicious Webpage Detection

- Stack: Python, Scikit, BeautifulSoup
- A machine-learning model that automatically extracts parameters from a webpage and classifies it based on the maliciousness

### COVID-19 Tracker Dashboard

- Stack: Flask, HTML/CSS, Pythonanywhere
- A web application that hosts the statistics of COVID-19 with support for state and district-level granularity

### Image Detection and Text Translation

- Stack: Python, Tensorflow, OpenCV
- A deep-learning pipeline that detects text in images and translates it to other languages, complete with a web interface and API support

### License Plate Detection

- Stack: Python, Scikit, OpenCV
- A deep-learning model that extracts license plate numbers from a real-time video feed

### Social Outreach Program

- Stack: Java, JSP, MySQL, GitHub pages
- A web application for the social outreach program of the University

## **PUBLICATIONS**

---

### **Toxic Comment Classification using Transformers**

- Classifying comments from discussion forums based on toxicity using NLP-based transformers architecture
- Research Paper presented and published at the IEOM International Conference 2021

## **ACCOMPLISHMENTS**

---

### **Competitive Programming**

- **ICPC:** National Rank 500 and 200 of 10K+ in the years 2019 and 2020
- **CodeChef:** Global Best Rating 1900
- **HackerRank:** Global Rating 1654 and 5 Gold medals in various programming tracks
- **Computer Society of India CP competition:** National Rank 100/4K+ participants

### **Machine Learning**

- **Kaggle:** Global Best Rank 200 out of over 5 million users with 1 silver and 4 bronze medals
- **MachineHack:** National Rank 50/14K in the 2020 MachineHack competition

### **Cybersecurity**

- **CTFTime:** National Team Rank 100 for over two years by participating in over 10 CTF security competitions every year.

### **Hackathons**

- **Hashcode:** Global Rank Top 1K/30K+ teams for 4 consecutive years in Hashcode conducted by Google
- **IIIT-H Megathon:** Ranked 6/80+ teams by building a multiplayer game using Unity and C#
- **Honeywell Hackathon:** Ranked 4/100+ teams by building a machine-learning model that estimates warehouse pick-up times

## **TECHNICAL SKILLS**

---

### **Programming Languages**

- Python, Java, C++, Javascript, Ruby

### **Web Frameworks**

- React, NodeJS, Flask, Spring

### **Cloud services and Platforms**

- AWS, Azure, GCP, Heroku

### **Database services and Platforms**

- MySQL, DynamoDB, MongoDB, Cassandra

## **CERTIFICATIONS**

---

- **Machine Learning** Certification from Stanford University through Coursera
- **Deep Learning** Specialization Certification from Deeplearning.ai
- **Hackerrank** certifications on Advanced Problem Solving, Python, Java, React, JS and RestAPIs

## **EXTRACURRICULAR**

---

- **Hosted** AI Adept that involves teams solving a complex machine learning problem with a small dataset at Anokha TechFest 2020
- **Hosted** Figure 'em all competition that involves individuals solving problems from various domains of CS at Anokha TechFest 2020
- **Contributor** at GitHub with contributions to multiple open-source projects
- **Volunteered** at the University's chapter of the National Service Scheme from 2017-2020