

MAYANK DARUKA

✉ mayankdaruka@utexas.edu 🌐 mayankdaruka.github.io ☎ (346) 368-4085 📍 Sugar Land, TX 77498

EDUCATION

The University of Texas at Austin

May 2023

Bachelor of Science in Computer Science and Mathematics

GPA: 3.97

Relevant Coursework: Data Structures, Computer Architecture, Operating Systems, Competitive Programming, Linear Algebra, Multivariable Calculus, Discrete Mathematics, Differential Equations

EXPERIENCE

Dive Chat, *Software Development Intern*, Austin, TX

May 2020 - Aug. 2020

- Built mobile interface of channel-based messaging application for college students with React Native, Redux, NodeJS, and Google Cloud
- Constructed Firebase data security rules, modified codebase to improve query speeds by 35% through caching/database optimizations
- Implemented heavy backend for group chat and event handling, real-time messaging, asset bundling, and conversation encryption
- Mobile application received around 5000 downloads within the first week of product launch

Big and Mini, *Full-Stack Software Engineer*, Austin, TX

June 2020 - Aug. 2020

- Developed an online video-calling platform using Jitsi to facilitate interaction between the youth and older generations to mitigate social isolation and loneliness amongst older adults
- Built a web client dashboard with NextJS and HTML/CSS and implemented backend functionality with AWS
- Created automated email reminder systems for over 2400 users in 13 countries using NodeJS functions deployed to AWS Lambda
- Constructed an API in Java to automatically match users based on available times, interests, and preferences from DynamoDB

ACTIVITIES

UT IEEE Computer Society, *Software Developer & Member*

Sept. 2020 - Current

- Built UT Ticket Exchange, a centralized web platform for UT affiliates to buy/sell tickets for sporting events
- Leveraged the MEAN Stack (MongoDB, ExpressJS, Angular, NodeJS) to develop front-end and back-end of application
- Worked with 15 students in an Agile environment to develop under a microservices architecture model

Texas Convergent, *Build Team Technical Lead*

Feb. 2020 - May 2020

- Developed a budgeting product that handles user finances and tracks item returns with React Native and Parse REST API
- Presented tech prototype and pitched the product to over 200 company recruiters, engineers, and school alumni

PROJECTS

Laundry Line (iOS and Android Application)

- Developed a mobile application using React Native and Firebase that solves laundry-related issues in UT dormitories
- Extensive UI/UX that displays real-time statuses of laundry machines and allows for individualized texting amongst students on each floor

Red Meter (Natural Language Processing)

- Built webpage with Flask that uses NLP to provide accurate insights on the outcome of the 2020 Election
- Performed feature extraction on real-time tweets about Trump and Biden using several Python libraries (NumPy, Pandas etc.)
- Trained a Keras model with 1.6 million tweets and Word2Vec embeddings in Tensorflow to detect polarity in texts
- Achieved 79% accuracy in predicting text sentiments using a trained Recurrent Neural Network model

Kinetic Keys (Computer Real-Time Vision)

- Created interface with ReactJS that uses a webcam to detect English alphabet letters in human poses to spell out words
- Incorporated a Tensorflow ML model that was trained with 5000+ images to recognize 9 unique human poses
- Showcased product and presented demo to company recruiters/engineers at Texas Convergent Side Project Expo 2020

SKILLS & OTHERS

PROGRAMMING LANGUAGES: Java, Python, C/C++, JavaScript, HTML/CSS, Octave, TypeScript

FRAMEWORKS/TOOLS: ReactJS, NodeJS, Angular, Flask, React Native, Flutter, Tensorflow, Keras, Firebase, MongoDB, AWS

INTERESTS: Cricket, Tennis, Traveling, Movies, Music

WORK AUTHORIZATION: Eligible to work in the US with no restrictions