

SAIHARSHITH KARUNEEGAR RAMESH

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EDUCATION

MASTER OF COMPUTER SCIENCE

UNIVERSITY OF ILLINOIS URBANA-CHAMPAIGN

Dec 2023

Illinois, USA

B.ENG IN COMPUTER SCIENCE

ANNA UNIVERSITY ; CGPA : 9.54/10.0

May 2021

Chennai, India

EXPERIENCE

SOFTWARE ENGINEER @ FRESHWORKS

BACK-END | JAVA | MySQL | SPRING BOOT | REST API

July 2021 – April 2022

Chennai, India

- Upgraded the build tool (**Gradle**) used in the product, reducing the build time to **8 minutes** from >13 minutes.
- Reduced the network traffic overload of the Freshmarketer product by **>40%** by changing the product's **monolith** background server to multiple layers of **microservices**.
- Reduced the processing time of the sign-up requests by **30%** by making the sign-up callback an **asynchronous** process.
- Improved the email deliverability of the product by disabling the outgoing email services of new users with low spam scores, reducing the overall spam score percentage of the product by **50%**.
- Introduced a separate email domain for free and paid customers by checking the version of the product that the customer has purchased.

SOFTWARE ENGINEER INTERN @ FRESHWORKS

BACK-END | JAVA | MySQL | SPRING BOOT | REST API

Feb 2021 – June 2021

Chennai, India

- Developed a **Staging Stack system** for Freshmarketer's test engineers where they can update and release the usage of different test stacks.
- Developed de-duplication algorithms to ensure appropriate email-deliverability metrics with the help of **Redis Cache**.
- Collaborated with the Freshsales product team and added a **new landing page feature** in the customer timeline within **2 days**, meeting the customer's deadline.

PERSONAL PROJECTS / PUBLICATIONS

THE DISEASE PREDICTOR

PYTHON | JAVA | ANDROID DEVELOPMENT

- Built an android application that predicts different types of external diseases on eyes, skin, mouth and nails with an image input using **Convolutional Neural Networks** with **89%** accuracy. Created the dataset from scratch by web scraping.
- Won the **Most Feasible Project Award** in a 36-hour hackathon conducted by ACM, SVCE.
- github.com/harshith2000/The-Disease-Predictor

APPLICATION OF RANDOM FORESTS FOR AIR QUALITY ESTIMATION IN INDIA BY ADOPTING TERRAIN FEATURES

PYTHON | PANDAS | JUPITER NOTEBOOK

- Built a Regression model which predicts the **Air Quality Index (AQI)** of any Indian city using it's terrain features with **81%** accuracy.
- ieeexplore.ieee.org/document/9315252

FARMER'S BOOK

BACK-END | MySQL | REST API

- Built a **Web Application for farmers** through which they can trade crops, post their problems and get solutions from fellow farmers.
- Developed backend system using MySQL and connected to the Frontend using REST API.

TECHNICAL SKILLS

Languages

C++, Python, Java, SQL

Tools & Frameworks

Git, MySQL, Spring Boot, AWS, Linux

LEADERSHIPS

VICE PRESIDENT @ KNOW-I (AI) RESEARCH CLUB

June 2020 – Apr 2021

- Organized various technical events like Coding Competitions, Paper Presentations, and Ideathons.
- Conducted seminars where I got the opportunity to teach the fundamentals of ML and DL to my juniors.

JOINT SECRETARY @ THE ASSOCIATION OF COMPUTER ENGINEERS

Aug 2019 – May 2020

- Organized numerous technical and non-technical events including Workshops, Seminars, and Project Presentations.
- Organized two national-level technical symposiums, and a 24-hour hackathon.