

GAURANG RAO

<https://linkedin.com/in/gaurangrrao> ◇ <https://gaupeng.xyz>

+91 9004245501 ◇ gaurang.r.rao@gmail.com

Bangalore - 560017, Karnataka, India

EDUCATION

PES University

August 2017 - July 2021

Bachelor of Technology in Computer Science and Engineering

GPA: 8.86/10

Recipient of Prof. CNR Rao Merit Scholarship - awarded to **top 20%** of students in the stream.

Relevant Courses: Cloud Computing, Advanced Algorithms, Topics in Deep Learning, System Modeling and Simulation, Algorithms for Information Retrieval

EXPERIENCE

Amadeus Software Labs

Bangalore, India

Software Development Engineer

August 2021 - Present

- Streamlining procedures in the Travel Documents team to maintain and deliver travel receipts.
- Developing code on a C++ backend to support new evolutions corresponding to travel documents while aiming to increase efficiency of delivery.

Amadeus Software Labs

Bangalore, India

Software Development Engineer Intern

January 2021 - May 2021

- Designed and delivered the pipeline to generate the One Order Receipt - a key concept in the One Order process that aims to replace air tickets, EMDs and multiple reservation documents with a single document.
- Accorded with the sole opportunity to work with the Air Travel Document team and the Document Layout team to devise functionality to capture, retrieve and deliver existing traveller information from a different backend, built fully in C++.
- Produced a layout for the One Order Receipt using I-net Crystal-Clear to map data on the layout side.

Avadhuta Technologies

Bangalore, India

Software Development Engineer Intern

June 2019 - August 2019

- Created a mobile application, released on the Google Play Store as myPatrol+ (renamed to iVisit for Patrolling).
- Worked in a startup environment to deliver a mobile application to integrate client relayed data by writing and refactoring code in TypeScript.
- Utilized the Angular framework together with Ionic SDK to develop the web application to be compiled into Android and iOS compatible mobile applications.

PUBLICATIONS

Venkat S., Richa, **Rao G.**, Das B. (2021) LIARx: A Partial Fact Fake News Dataset With Label Distribution Approach For Fake News Detection. Published in Advances in Intelligent Systems and Computing (ISSN: 2194-5357). Presented at Innovations in Computational Intelligence and Computer Vision - 2021 (acceptance rate: 13.75%) and won **best paper in the Data and Algorithms track**.

ROLE OF RESPONSIBILITY

Teaching Assistant

PES University

UE18CS343: Topics in Deep Learning

January 2021 - May 2021

- Teaching Assistant for Prof. Srinivas K S, for the subject of Topics in Deep Learning, and was part of a team that created study material, slide decks and question banks for over 120 students.

Mentor

PES University

UE17CS302: Introduction to Operating Systems

October 2019 - December 2019

- Mentored a **group of five** classmates under the guidance of Prof. Rahul Nagpal to help them understand complex concepts related to the Operating Systems, such as segmentation, paging, linking and file systems by conducting regular teaching sessions, while also creating quizzes, question banks and reference notes.

KEY PROJECTS

Local Search Engine

August 2020 - December 2020

UE17CS412: Algorithms for Information Retrieval

PES University

- Engineered a local offline search engine in a four member team, built in Python.
- Designed and showcased the Rocchio algorithm that boosted article scores by **upto 18%**, and the text pre-processing functionality for queries.

CouchSmash: A Game in Lua and LÖVE

March 2020 - June 2020

github.com/Gaupeng/CouchSmash

- Formulated and programmed a Breakout-based game out of self interest, written in Lua and using the game engine LÖVE.
- Published the game as an executable allowing friends and family to test and play the game.

MiniPy3: A Mini Python3 Compiler

January 2020 - May 2020

UE17CS351: Compiler Design

PES University

- Lead of a three member team that developed a Python3 compiler, mainly in C++.
- Designed and implemented the functionality for the Symbol Table, Intermediate Code Generation, and the Assembler, along with test cases.
- Architected code to print the Abstract Syntax Tree in a clean, readable format.

Scalable Database-as-a-Service

January 2020 - May 2020

UE17CS352: Cloud Computing

PES University

- Presented and developed a Database-as-a-Service in a four member team to realise a ride sharing application.
- Application was hosted using Docker and AWS, constructed in Python using Flask. Database utilized was PostgreSQL, while scalability was achieved using RabbitMQ and Apache ZooKeeper.
- Devised and documented several APIs to create, update, and delete data from the database while ensuring **100% uptime** and hundreds of concurrent read/write operations.

SKILLS

Programming Languages: C/C++, Python, TypeScript, Lua.

Technologies: Git, Angular, Flask, MySQL, PostgreSQL, Docker, RabbitMQ, AWS, Keras, Unity

EXTRA-CURRICULAR

Content and Editorial Director

January 2020 - Present

Why Waste?

whywaste.io

- In charge of formulating and editing blog posts, captions and content for social media for Why Waste?, a nonprofit organization that promotes and raises awareness on water sustaining activities.