ANIRUDH NANDURI

EDUCATION

Indian Institute of Technology, Kanpur

M.Tech. in Computer Science & Engineering - 9.0 GPA

Aug 2021-June 2023

Courses: • Data Structures and Algorithms • Database Management Systems • Operating Systems • Introduction to Machine Learning • Information Retrieval

National Institute of Technology, Warangal

B.Tech. in Computer Science & Engineering - 8.34 GPA

Aug 2016 - May 2020

WORK EXPERIENCE

Salesforce

Associate Member of Technical Staff

June 2020-July 2021

- Worked on developing static container scanning microservice application which scans around 20K container images and artifacts per day using Spring Boot, AWS, Kubernetes and open source tools.
- Developed scheduling features and automated security vulnerability report generation features to reduce manual effort.
- Added unit tests and participated team-level bi-weekly deployment and patching activities.

VISA

Software Engineer Intern

May 2019-July 2019

- Developed an application to validate servers after patching. Provided a user interface to configure the validation using http, ssh and shell commands.
- Integrated the application with the internal tools of VISA. Saved around 15 man-hours per month by automating the server validation.

PROJECTS

Representation Learning using Single cell Multiomics datasets

(May'22 - Present)

- Implemented Disentangled Multimodal VAE (DMVAE) and Total Variational Inference framework (TotalVI) to generate private latent representation of genes and protein on CITE seq dataset.
- Benchmarked the model and obtained 16% performance improvement on ARI metric of cell-type clustering compared to SOTA models.

Simple File System, Self Project

(June'22 - July'22)

- Developed a simple UNIX-like file system in user space which supports file management and directory management (create, delete, copy data).
- · Provided a command line interface to enter commands and manage the file system.

Document Retrieval Engine of English Corpora

(Feb'22 - March'22)

- Implemented SimpleBoolean, TF-IDF and BM25 based information retrieval system in python
- Retrieved top 20 relevant documents to a query from 8634 document corpus using the IR systems.
- Evaluated the IR systems on random queries and calculated the Mean Average Precision(MAP) metric.

SKILLS

- Programming Languages: C C++ JAVA Python SQL
- Libraries/Tools: Git Pandas Numpy Pytorch-Lightning Scanpy Docker Linux Machine Learning
- Cloud Platforms: Amazon Web Services (AWS)
- · Databases: MySQL

ACHIEVEMENTS

- Secured All India Rank 164 in GATE CS 2021, about 1.1 lakh candidates appeared for the examination
- Secured All India Rank 1413 in JEE Mains 2016, about 12 lakh candidates appeared for the examination
- Received PPO(Pre-Placement offer) after 3 months of software engineering internship at VISA.