

Education

MTech, Computer Science and Engineering , IIT Goa	CGPA : 8.56/10	2022 – Present
BTech, Computer Science and Engineering , Hemvati Nandan Bahuguna Central University	CGPA : 7.12/10	2018 – 2022

Experience

INTERNSHALA | DATA SCIENCE TRAINING

(Nov 2021 – Dec 2021)

- Completed Data Science training covering various topics, including machine learning, statistical analysis, and data manipulation.
- Demonstrated practical application of acquired skills by developing a predictive model using the sklearn library to forecast customer subscriptions to insurance policies. [\[Github\]](#)

Volunteer in Drone Bootcamp | Centre for Drone Applications(IIT Goa)

(Sept 2023)

- Organised workshops, talks, and live hands-on coding sessions that helped participants understand the basics of Machine and Deep learning applications, followed by a Live Drone Flying session.
- Demonstrated the classification task of flower set using Deep learning and Machine learning concepts in Google Colab.

M.Tech Thesis

Thesis Topic: 3D Cell-Segmentation using Deep learning approach.

Supervisor(s): Dr. Clint P. George, Dr. Shitala Prasad, and Dr. Sreenath Balakrishnan, IIT Goa.

Developed a novel 3D cell segmentation model utilizing deep learning techniques, addressing volumetric data analysis challenges. Submitted the work at the WACV 2024 conference and received positive reviews for further enhancements.

Projects

Machine Learning:- Handwritten Alphabet Classifier using Naive Bayes [\[Github\]](#)

(Oct 2022 – Nov 2022)

[Supervisor – Dr. Satyanath Bhat]

- Built a Bayes classifier to identify the handwritten digits.
- The classifier is built from scratch without using any machine learning library but only using the concepts of probability and statistics.
- Programmed in Python, using Numpy and Pandas modules.

Application Development: Android application for online voting

(Oct 2022 – Dec 2022)

[Supervisor – Dr. Sharad Sinha]

- Divided project into several different activities for handling specific tasks.
- Made use of Google Sheets to store the information of registered voters, candidates, and active elections.
- Used Google Apps Script to automate fetching the data from Google Sheets.

Deep Learning:- Cell Segmentation using U-Net [\[Github\]](#)

(April 2023)

[Supervisor – Dr. Shitala Prasad]

- Evaluated and enhanced the benchmark model for segmentation U-Net. Led the project and divided work among 2 people; one performed the programming part, and the other did the theoretical work.
- Used tensorflow, tqdm, skimage, and other libraries to build the model.
- Given an image of a cell as input, it generates the corresponding mask of it.

Skills

Programming Skills:	C, C++, Python
Software Skills:	Blender, VSCode, Android Studio, Latex, Git, Github, Google Apps Script, TinkerCAD, FileZilla
Other Skills:	High-Performance Computing (HPC), Linux, Collaborative projects, Java, HTML5, CSS, JavaScript
Relevant Coursework	Advanced Data Structures using C++, Theoretical Computer Science, Foundations of Machine Learning, Deep Learning for Computer Vision, Probability and Statistics, Fundamentals of Computing Systems Design and Randomized Algorithms

Achievements

- Secured 13th rank in 2023ACM/IEEE TinyML Design Contest at ICCAD. [\[Results\]](#) (2023)
- Secured AIR 2619 in GATE 2022 (CSE). (2022)
- Secured AIR 3933 in GATE 2021 (CSE). (2021)
- Secured 3rd position in 3D modeling event METADZ, organized by IEEE Student Branch, ASIET, Kerala. (2020)
- Qualified JEE Mains, Bihar Combined Entrance Competitive Examination (2018)

Extracurriculars & Hobbies

- Speaker and Volunteer, Bootcamp on "Fundamentals of Allied Technologies for Drones" organized by Centre for Drone Applications (IIT Goa), funded by MeitY. (13th Sept 2023 - 18th Sept 2023)
- Coding as a hobby, 2 Star on Leetcode.
- Volunteer, Formal Methods Update meeting 2023, IIT Goa. (29th Jun 2023 - 1st July 2023)
- Have a keen interest in the stock market, Investing in NSE and BSE listed companies.
- Reading about interesting events on Wikipedia, reading development-related news.