Pushpesh Gokul Pant

Email: succhuuu@gmail.com
Portfolio: pushpesh.me
Mobile: +91 8755017299
Github: github.com/xPushpeshx

Education

- **Shri Mata Vaishno Devi University** — Katra, India
  Bachelor of Technology - Computer Science; GPA: 7.44 — *July 2020 - July 2024*
  Courses: *Operating Systems, Data Structures, Analysis Of Algorithms, Artificial Intelligence, Machine Learning, Computer Network and Security, Database Management systems, Nature Inspired Algorithms*

Skills Summary

- **Languages**: Python, Bash, C++, JavaScript, SQL, JAVA
- **Frameworks**: Scikit, NLTK, SpaCy, TensorFlow, Keras, Django, FastAPI, Pytorch, OpenCV
- **Tools**: Kubernetes, Docker, GIT, PostgreSQL, MySQL, SQLite
- **Platforms**: Linux, Windows, AWS, GCP, Azure
- **Soft Skills**: Leadership, Teamwork, Cooperation, Problem-Solving, Adaptability, Critical Thinking, Time Management

Experience

- **SMVDU Research Project** — On site
  Intern Programmer — *FEB 2023 - PRESENT*
  - **Development**: Developed and implemented image classification and segmentation models using various machine learning techniques and frameworks, improving accuracy and efficiency.
  - **Collaboration**: Collaborated with a team of researchers to design novel algorithms for image processing and analysis, contributing to research projects.
  - **Evaluation**: Conducted extensive experimentation and evaluation of models, optimizing performance and achieving state-of-the-art results..
  - **Documentation**: Documented code, methodologies, and experimental results to ensure reproducibility and facilitate knowledge sharing within the team.
  - **Technologies used**: Tensorflow, Pytorch, Sklearn, OpenCV, matplotlib, tensorboard, pandas.

Projects

- **Flare Removal (Computer Vision, Image Segmentation)**: Implementation of Google's Research on the removal of flare, improvement and comparison with different methodologies, created API, dockerized it for further use, also used gradio for a showcase in hugging face spaces. Tech: Pytorch, sklearn, Fastapi, matplotlib, Docker, Gradio.
- **Food Classification using Vision Transformer (Transformers, Deep Learning, Computer Vision)**: Recreated and implemented Vision Transformer Research Paper to classify different types of images into food classes, comparison with other classification models. Tech: PyTorch, sklearn, matplotlib.
- **Lead Gecko (Web Development)**: created a web app for small vendors where they can keep track of their orders, perform CRUD operations, and can do the same through API of it, a personalized dashboard for every user. Tech: Django, Rest API, Google Auth, Sqlite3 .
- **Face Detection (Computer Vision, GUI)**: Face detection on group photo to mark attendance at once and update it to Excel file using User Interface, choosing best algorithms for face detection and face identification. Tech: Python, Dlib, OpenCV, tkinter .

Publications

- **Journal: based on a novel method for classification**: manuscript is currently submitted for publication

Honors and Awards

- Presented my project at 25th National Conference on e-Governance, November 2022
- Global Rank-27, Codechef Cook-Off 2021 Division 3, December 2021

Open Source Contribution

- **GSSOC-23** — Remote
  Contributed to Python and ML open source projects along with other fellow developers — *MAY 2023 - AUG 2023*
- **Python - Argentina** — Remote
  Developed and created Question and Answer Format for Students and Learners for their learning program.