Srija Uprety

Machine Learning **Computer Vision** https://srijauprety76.com



Trinity International College Kathmandu, Nepal Computer Science and Information Technology 2018 - 2023

The Times International College Kathmandu, Nepal 2015 - 2017**Physical Science**

Paragon Public School Kathmandu, Nepal

2015

2022 - 2023

SKILLS

Python

Machine Learning

Deep Learning

Computer Vision

Docker

EXPERIENCE

EDUCATION

Bottle Technology Jhamsikhel, Lalitpur Machine Learning Engineer 2022-2023 (8 months)

- Used yolov7 for object detection and implemented it on Jetson Nano.
- Performed Line segmentation for detecting license plate characters using Horizontal Projection Profile.
- Implemented image preprocessing techniques like otsu binarization, Niblack algorithm, Morphological processing.
- Deployed applications on Docker.

Fusemachines AI Fellowship Kathmandu, Nepal Microdegree

I was selected as one of the 100 participants from a pool of thousands of applicants to join a prestigious year-long Al fellowship program. This program focused on providing comprehensive training and education in cutting-edge Al technologies such as Machine Learning, Deep Learning, and Computer Vision.

- · Machine Learning
- · Deep Learning
- Computer Vision

REFERENCES

Sushant Chalise

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Abhishek Dewan

Program Coordinator abhishek.dewan@trinitycollege.edu.np

Sangam Khanal

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Research

Evaluation of hybrid models to estimate forecasting accuracy of daily global solar radiation: A case study of parbat, Nepal

This research aims to contribute to the understanding and application of solar energy forecasting. The
findings have the potential to inform decision-making processes related to solar energy utilization, particularly in regions like Nepal, where harnessing solar energy effectively can play a significant role in meeting
the growing energy demands sustainably. Three stand-alone models ARIMA, ANN and LSTM and two
hybrid models ARIMA-ANN and ARIMA-LSTM were used for daily global solar radiation forecasting.

PROJECTS

Growing Neural Cellular Automata

Tools used: Python, Tensorflow, Gradio

A system that enables the generation of intricate structures in three dimensions, as well as simulating the
development of multicellular structures starting from a single cell. The project highlights two significant
contributions, namely, an expansion of Neural Cellular Automata to 3D voxels and the development of a
cellular automation technique for producing voxel structures with different levels of complexity.

Time Series Analysis

Tools used: Python, Jupyter Notebook, Keras, Sklearn, TensorFlow

• The major objective of this project was to enhance the deep learning models (by hyper parameter optimization) that could potentially perform well in prediction problems like value of stocks. Models like ARIMA and LSTM is used to simulate the predictions of stocks with longitudional data.

Image to text converter

Tools used: Python, Tesseract, Django

• The objective of this project is to develop a tool that enables the conversion of images into editable text. By combining these technologies, we strive to provide a user-friendly solution for effortlessly transcribing information from images into editable text format.