

Summary

Highly skilled Data Scientist with a focus on bioinformatics, machine learning, and predictive modeling. Expert in deep learning, computer vision, and natural language processing (NLP) for solving complex problems. Experienced in applying advanced techniques for medical image segmentation, predictive modeling, and data-driven insights. Proven ability to deliver high-accuracy models and optimize performance through analytical rigor and innovation. Strong collaborator with a passion for using data to drive impactful solutions.

Work Experience

DATA SCIENCE INTERN – COGNIFYZ TECHNOLOGY –(2024-PRESENT) Sep 2024 - Oct 2024

- Engaged in various data-driven projects, applying machine learning techniques to extract insights.
- Collaborated with teams to analyze data and implement solutions that enhance business performance.

Brain Tumor Segmentation Project – Personal Project

Oct 2023 – May 2024

- Developed and implemented a U-Net-based deep learning framework for segmenting brain tumors from multimodal MRI scans.
- Achieved high segmentation accuracy by leveraging advanced preprocessing and augmentation techniques.
- Utilized TensorFlow and Keras for model development, optimizing performance through extensive hyperparameter tuning.

Retinal Vessel Segmentation Project – Personal Project

March 2023 – July 2024

- Designed a U-Net architecture to segment retinal vessels from fundus images effectively.
- Focused on preprocessing techniques such as image resizing, normalization, and contrast enhancement to improve model performance.
- Conducted experiments with various learning rates and optimizers to achieve optimal accuracy.

Skills

- | | |
|---|--|
| <ul style="list-style-type: none">Machine LearningPython (Pandas, NumPy, SciPy, Matplotlib)Deep LearningComputer VisionData Visualization | <ul style="list-style-type: none">NLPPredictive ModelingStatistical AnalysisData AnalysisImage Processing & Segmentation |
|---|--|

Projects

BRAIN TUMOUR SEGMENTATION AND PREDICTION –INEURON Oct 2023- May 2024

- Developing a deep learning model to accurately segment and predict brain tumors from medical images.
- Utilizing advanced techniques in medical imaging for enhanced diagnostic capabilities.
- Used U-Net for the segmentation and planning to use Ensemble Methods for prediction.

RETINAL VESSEL SEGMENTATION – PERSONAL PROJECT March 2023 – July 2024

- A deep learning project aimed at segmenting retinal vessels using U-Net architecture.
- Achieved a high accuracy score.

FAKE NEWS PREDICTION– PERSONAL PROJECT PERSONAL PROJECT

March 2024

- Developed an NLP model to detect fake news utilizing machine learning algorithms.
- Achieved high accuracy by analyzing large datasets of news articles.
- Applied regression and machine learning to produce a final model with an accuracy of 88% and lift of 34%

CERVICAL CANCER PREDICTION – PERSONAL PROJECT

May 2024

- Implemented predictive modeling techniques to assess the risk of cervical cancer.

BREAST CANCER PREDICTION– PERSONAL PROJECT

February 2024

- Developed a machine learning model for early diagnosis based on clinical data.
- Applied advanced machine learning techniques to enhance business insights and performance.
- Collaborated across teams to extract meaningful insights and deliver actionable outcomes from data-driven analysis.

Education

BACHELORS (HONS) IN BIOTECHNOLOGY – University of Kashmir – Srinagar, Jammu & Kashmir

June 2022-June 2026

Majors: Biotechnology, Biological Data Analytics, Bioinformatics, Bacteriology

Average CGPA- 7.5

ACADEMIC QUALIFICATIONS

- **10th Grade (JKBOSE):** 81%
- **12th Grade (JKBOSE):** 91%
- **College CGPA:** 7.5

Certifications

- IBM- Introduction to Cloud Computing
- IBM- What is Data Science
- IBM- Introduction to Web Development with HTML, CSS, JavaScript
- IBM - Tools for Data Science