Rudraneel Dutta

www.rudraneeldutta.com | its.rudraneel@gmail.com | linkedin.com/in/its-rudraneel | github.com/rudyoactiv

TECHNICAL SKILLS

Languages: JavaScript, Python, SQL, Java, C, C++, HTML, CSS

Frameworks: React, Node.js, Express.js, Three.js, Django

Databases: MongoDB, MySQL, Firebase

EDUCATION

Kalinga Institute of Industrial Technology

2021 - 2025

Bachelor of Technology in Computer Science and Engineering

EXPERIENCE

Intern Tata Elxsi, Bengaluru

Jun. 2024 - Sep. 2024

• Developed an application to automatically label training data for self-driving cars.

- Implemented object detection using Python, OpenCV and YOLOv7.
- Used generative AI with Llama 3.1 for automatic preliminary test case generation to identify vulnerabilities in smart automobiles.

Intern

May 2023 – *Jun.* 2023

National Institute of Electronics & Information Technology, Kohima

- Examined multiple cases of cybercrime and analyzed large datasets using Cellebrite UFED.
- Developed algorithms for automatic data retrieval on a prominent overseas assignment.
- Optimized queries to improve database access times by 20%.

PROJECTS

TypeScribe: Text to Handwriting | Python, Django, Tkinter, TensorFlow

Dec. 2024

- Built an Open-Source tool to generate natural handwritten documents from text using a Recurrent Neural Network (RNN).
- Made a desktop application that runs locally and allows full customization of documents.
- Awarded 60+ stars on GitHub after release. (rudraneeldutta.com/typescribe)

Kraft3D: Online 3D Printing Store | *MongoDB, Express.js, React, Node.js*

Jun. 2024

- Launched India's most affordable e-commerce platform for 3D printed products.
- 250+ orders delivered successfully within the first 4 months.
- Used React and Node.js, with MongoDB for database operations, Firebase for authentication and Stripe to ensure secure user transactions. (rudraneeldutta.com/Kraft3D)

AI Medical Companion | HTML, CSS, Flask, TensorFlow, OpenCV, Google Gemini

Mar. 2024

- Built a web application to diagnose medical conditions like breast cancer, Covid-19, heart diseases and diabetes with pre-trained models.
- Integrated an AI chatbot using Google Gemini for personalized contextual advice.
- Used Docker for containerization and deployed live on Render. (rudraneeldutta.com/diagnosis)

CERTIFICATIONS

IBM Full Stack Software Developer Professional Certificate AWS Academy: Introduction to Cloud

Coursera, Issued May 2024 AWS Academy, Issued Mar. 2024

PUBLICATIONS

Dutta, R., Mohanty, S. (2024). Enhancing exam preparation through topic modelling and key topic identification. *Journal on Artificial Intelligence*, 6(1), 177-192. https://doi.org/10.32604/jai.2024.050706