Mahesh Chaudhary

Software Developer

📞 (+977) 9809574797 | ✉ maheshchaudhary2057@gmail.com | 🐙 initxmahesh | 🔗 initxmahesh

Education

Tribhuvan University, Institute of Engineering, Eastern Regional Campus — Dharan
B.E in Electronics, Communication and Information Engineering — 05/2021 - 05/2025

Experience

Software Engineering Fellowship — TEJ Centre — Present
- Focused on full-stack development, system design, and collaborative real-world project building.

Beta Microsoft Learn Student Ambassador — Microsoft — 11/2023 - 05/2025
- Mentored aspiring students, conducted interactive sessions, and contributed to the growth of the local tech community.

President — EXCESS — 04/2024 - 05/2025
- Served in multiple leadership roles for 3 years, including President, Vice President and Executive Member, contributing to long-term organizational growth and continuity.
- Led major technical events and collaborated with various tech societies to deliver technical trainings, student-led projects, and skill-building programs across software and hardware domains.

University Lead — CS50xNepal — 05/2024 - 05/2025
- Mentored 60+ students in AI/ML guiding them through hands-on learning, project support and real-world applications.
- Conducted and mentored at X-Hack 3.0, a national-level CS50 AI Inspired hackathon guiding 100+ participants in developing AI-driven solutions.
- Organized multiple mini-hackathons, technical workshops, and the CS50x Hackathon, driving student engagement, problem-solving, and project execution.

Github Field Day Nepal 2024 — National Tech UnConference
- Engaged with tech leaders to discuss technical challenges, shared best practices, promote inclusivity, foster collaboration, and support sustainable student-led tech initiatives.

Major Projects

Wireless-Based Human Activity Recognition
- Developed a WiFi-based Human Activity Recognition system using Channel State Information (CSI) with deep learning models (CNN, BiLSTM) to classify activities (standing, walking, jumping).
- Collected a custom dataset using ESP32 for CSI data acquisition.
- Designed a real-time dashboard to visualize activity recognition results.

Detection of Deepfakes: A Comparative Study Using ConvSwin Transformers and Fourier Transform Analysis
- Developed an advanced deepfake detection model integrating Convolutional Swin Transformer (ConvSwinT) for feature extraction and autoencoder-based latent representation learning.
- Implemented Fourier Transform-based analysis, leveraging high-frequency component extraction and Support Vector Classification (SVC) for deepfake identification.

Achievements

Full Stack Open — University of Helsinki — Certificate
- Completed a comprehensive full-stack web development course covering React, Node.js, Express, PostgreSQL, and modern web practices.
- Applied skills through hands-on projects, demonstrating practical proficiency in building scalable web applications.

Skills

Programming Languages: 🐍 Python, C++, JavaScript,
Tools and Frameworks: ReactJS, NodeJS, Microsoft Azure, Python, Docker, PostgreSQL, Git & Github, LaTeX
Languages: Nepali (native), English (proficient)