



Experience

Graduate Research Assistant

October 2024 – May 2025

- Leveraged large language models such as LLaMA 3.1, Mistral, Phi, and DeepSeek on the Snellius HPC cluster to generate personas and evaluate their persuasive capabilities in a convincer-skeptic setting using prompt engineering and fine-tuning while investigating how increased persuasiveness correlates with reinforcement of biases and sycophantic tendencies.

Software Engineer Intern, ASML – Veldhoven, Netherlands

April 2023 – October 2023

- Developed a Python-PostgreSQL based solution with API integration to automatically terminate long-running background algorithms and implemented a deadlock prevention mechanism for concurrent processes in the IPVD tool.

Cybersecurity Risk Associate, PWC SDC – Kolkata, India

May 2021 – September 2021

- Collaborated with cross-functional teams to enhance data security by streamlining user access provisioning and deprovisioning, reducing access-related risks, and ensuring compliance through risk assessments and SOX (Sarbanes-Oxley Act) testing.

Undergraduate Research Assistant

June 2019 – May 2020

- Developed a Multimodal Sentiment Analysis model of Human Speech using 2D- Convolutional Neural Network, published by IEEE Xplore (IRTM'22) and Springer (ICCTA'21) [[Article](#)][[Article](#)].

Education

TU Eindhoven

Eindhoven, Netherlands

MSc in Data Science and Artificial Intelligence

2022 - 2025

- Relevant Coursework:** Deep Learning, Machine Learning Engineering, Visual Analytics, Big Data Management, Philosophy and Ethics in AI, Decision making with AI, Knowledge Engineering, Survival Analysis

University of Engineering and Management

Kolkata, India

Bachelor of Technology in Computer Science and Engineering (GPA: 8.83/10.0)

2017 - 2021

- Relevant Coursework:** Data Structures and Algorithms, Machine Learning with Tensorflow, Deep Learning with Keras, Natural Language Processing, Operating systems

Projects

Google Gemini Developer Competition [[Link](#)]

June 2024 – August 2024

- Developed a platform that allows users to connect, share projects and research ideas with varied backgrounds. It uses Gemini LLM at the backend for content recommendation, selection and filtering.

Data Intelligence Challenge [[Github](#)]

March 2023 – May 2023

- Developed various Deep Reinforcement Learning agent models (DQN, DDQN, and Q-learning.) for pathfinding and autonomous navigation tasks that used a grid-based navigation system. Also designed custom environments and grid configurations.

IBM Hackathon [[Github](#)]

April 2020

- Received certificate of appreciation at national level in India for developing a multi-state classification model, for categorizing emotional polarity of tweets on COVID-19 pandemic using ANN that functioned in real-time.

Programming and Technical Skills

Languages: Python, C++, C, R, SQL, PySpark, HTML, CSS, Bash

Framework: Apache Spark, Keras, Tensorflow, Pytorch, Docker, Dash, Plotly., Transformers, Snellius HPC, Huggingface

Core Competencies: Deep Neural Networks, Transfer Learning, Large-Language-Models, Data Structures and Algo

Achievements and Activities

- Got accepted in Stanford Summer Session, Stanford University, California, USA in March 2018
- Best paper award for "[Sentiment Analysis of Human Speech using Convolutional Neural Network](#)" in UEMCOS'21
- Ranked 111th in state of WB in International Informatics Olympiad 2011 by Computer Literacy Foundation, New Delhi.
- Languages : English (Bilingual), Bengali (Native), Hindi (Native), Dutch (A1)