Bisrat Berhanu Negus

Portfolio

EDUCATION

Addis Ababa University

06/2021 - 07/2026 | Addis Ababa, Ethiopia

B.A. in Electrical and Computer Engineering

- One of the **Top 10** Universities in Africa.
- CGPA: 3.8/4
- Relevant Courses: Software Engineering, Relational Databases, Object oriented programming, Data structure and Algorithms, Computer Network and Security, Computer Architecture and Organization.

Africa To Silicon Valley | A2SV - Backed by Google 🛭

11/2023 - 11/2024 | Addis Ababa, Ethiopia

Competitive Programming and Coding Academy

- · A2SV placed 60+ students at top-tech companies such as Google, Bloomberg, Databricks, Amazon, LinkedIn, and Square in the last four years.
- Graduated from A2SV with a strong foundation in data structures and algorithms (Solved 900+ problems on LeetCode ☑ and Codeforces ☑) and hands on experience on backend development.

PROFESSIONAL EXPERIENCE

Computer Vision Intern

09/2024 – present | Addis Ababa, Ethiopia

Ethiopian Artificial Intelligence 🖸

- Developed and deployed an enhanced line detection OCR model for Ge'ez script, improving speed and reducing processing errors.
- Spent over **50 hours** annotating data, which optimized system efficiency by **33%** for processing a 30 page document dataset.

Machine Learning Internship

08/2024 - 11/2024 | Addis Ababa, Ethiopia

iCog Labs ☑

- Implemented a <u>Neural Generative Coding framework</u> 🗷 as an alternative to backpropagation in neural network training, achieving comparable results across more than 5 evaluation metrics.
- Worked on recreating a ChatGPT-like model using this neural coding framework, observing performance similar to backpropagation methods.

PROJECTS

Mella Developer Monetization

06/2024 - 08/2024

 Designed and implemented a full-stack product with a team of 5 using PostgreSQL, Express.js, React, and Node.js to streamline monetization and payment acceptance, integrating a payment gateway and a user-friendly interface, potentially halving transaction times.

A Domain Expert Model 🛮

02/2024 - 04/2024

- Tasked with creating a domain expert model to provide more accurate, specialized responses in a specific domain.
- Fine-tuned a large language model using Amazon SageMaker on a domain-specific dataset, improving model performance upto 25%.

SKILLS

Web Development

• React, Go, Java, Node, MongoDB, PostgreSQL, MySQL, RESTful APIs, SQL, NoSQL, System Design, CI/CD, Git, GitHub, Integration Testing, Clean Architecture.

Machine Learning

• Python, Matplotlib, NumPy, Neural Networks, Computer Vision, Supervised Learning, Unsupervised Learning.

Micro Controllers and Embedded Systems

 C, C++, Assembly, LTSpice, Proteus, Matlab, Embedded Workbench, Raspberry Pi, Arduino, Microcontroller Programming, Sensor Integration.

CERTIFICATES

Python for Everybody

Google IT support

ACHIEVEMENTS

Certificate of Outstanding Performance on the National University Entrance Examination

•Among the top **0.01**% performers on the 2012 E.C. National Entrance Exam, achieving a score of **647** out of 700.