

Kabyik Kayal

📍 Kolkata, West Bengal, India | 📩 mail@kabyik.dev | 🌐 Kabyik.dev | 💬 Kabyik-kayal | 🎙️ Kabyik-Kayal

Experience

GenAI Sales Intern

Second Brain Labs

(Remote) Bengaluru, IN
July 2024 – Sep 2024

- Executed targeted marketing campaigns using GenAI chatbots.
- Resulted in a 32% increase in qualified leads.

Projects

UnArxiv

[Github ↗](#)

- Locally finetuned Qwen 2.5 3B-Instruct on Intel Arc A750 (8GB) GPU to simplify Arxiv Paper Abstracts.
- Performed Data Distillation of 908 Technical Paper Abstracts using Kimi K2 with Groq API.
- Built a streamlined pipeline for the training dataset preparation from collecting abstracts to distillation and merging.
- Used Parameter Efficient Finetuning by applying LoRA Adapters with Rank 2.

Supa Voice Cloner

[Github ↗](#) — [Live ↗](#)

- Developed a multilingual voice cloning app using cutting-edge XTTS v2 for natural, emotion-rich speaker adaptation in 8+ languages with as minimum as 3 secs of voice sample.
- Designed an intuitive, fast UI for real-time speech generation, with support for custom voice uploads and regional dubbing.
- Deployed on Hugging Face Spaces for instant access with GPU acceleration, ensuring scale and global accessibility.
- Integrated post-processing pipeline with audio normalization and download links.

Anime Recommender System

[Github ↗](#) — [Live ↗](#)

- Trained a Tensorflow Keras Model with a mean squared error of 0.089 incorporating live experiment tracking with CometML for Recommending Animes with a Hybrid System of both User-based and Content-based filtering.
- Data versioning with DVC and GCP Bucket was performed to ensure 0% data loss.
- Built a Flask app with an attractive UI with HTML, CSS and JavaScript. Then Docker Containerized the app and deployed to Google Kubernetes Engine ensuring 100% uptime and scalability.
- Built a Jenkins Pipeline to automate the complete process from data ingestion to deployment on cloud saving more than 70% of time and manual effort.

Holy Cow – AI Image Style Transfer App

[Github ↗](#) — [Live ↗](#)

- Developed a Generative AI web application performing style transfer and face replacement on user-uploaded images using the Google Gemini Nano Banana model.
- Built a robust backend using Flask to handle API requests and integrated Pillow for efficient image processing and pipeline management.
- Deployed as a responsive WebApp on Render.

Technical Skills

Languages: Python, SQL, GO

AI/ML: Scikit-learn, Pandas, MLflow, PyTorch, TensorFlow, LangChain, HuggingFace, Transformers

MLOps: Git, DVC, Docker, ZenML, Jenkins, GCP, AWS, Circle CI, Prometheus, Grafana, Kubernetes, FastAPI

Data Visualization: Power BI, Tableau, Matplotlib, Plotly, Excel

Education

Indian Institute of Technology Madras (IITM)

Jun 2024 – Present

BS in Data Science and Applications

- Currently Pursuing Diploma in Programming
- **Coursework:** DBMS, DSA, App Dev, Python, Statistics, Mathematics