



DEBMALYA SUR

Software Developer,
Machine Learning
Enthusiast, Mathematician.

ACADEMIC HISTORY

Government College of Engineering &
Ceramic Technology, Kolkata
— B.Tech honors in Computer Science &
Engineering
Aug 2018 - MAY 2022
9.83 CGPA till 4th semester

CORE STRENGTHS

- Language: Python, C
- Web: Flask, Bootstrap, Streamlit
- Database: SQL, SQLite, Firebase
- Machine Learning: Numpy, Pandas, Matplotlib, Seaborn
- Strong Communication Skills

CONTACT DETAILS:

Email: surdebmalya2001@gmail.com
GitHub: [@surdebmalya](https://github.com/surdebmalya)
Portfolio: <https://surdebmalya.github.io/>
LinkedIn: [@debmalya-sur](https://www.linkedin.com/in/debmalya-sur)
Blog: <https://surdebmalya.hashnode.dev/>

ACHIEVEMENT:

- GATE AIR 2492 on 3rd Year.
- Secure 127th rank in SEAMO, 2017 from South East Asia region.

PROJECTS

• Full Scale Web Application

A. BAUD NEWS

WEB VIEW

- It's a user-specific News Web Application
- Build front-end with bootstrap and Flask
- Back-end logics are written in Python
- Used REST-APIs
- Used SMTP Server to sent verification mails

B. FRIENDSHIP METER

GITHUB | WEB VIEW

- It's a Web Game Application to measure the strength of friendship
- Front-end is made with bootstrap and Flask
- Back-end logics are written in Python
- Used REST-API to store generated result images

• Desktop Application Designing

A. STUDENTS' REGISTRATION SYSTEM

GITHUB | YOUTUBE VIDEO

- It's a Desktop Application to register a student into a local database
- Build front-end with Tkinter
- Back-end logics are written in Python
- Used SQLite3 for local database management
- Registration Cards can also be generated using this application

B. COVID-19 DESKTOP APPLICATION

GITHUB | YOUTUBE VIDEO

- This desktop application was made to keep a track on COVID-19 cases
- I made front-end with the help of Tkinter
- Python is used to write back-end logics
- I did Web Scrapping to get data

• Machine Learning

A. BREAST CANCER DETECTION

GITHUB | WEB VIEW

- This is a classification problem
- Got 96.49% accuracy by Random Forest Classification
- Made usable web application using streamlit

B. MRI & ALZHEIMERS CROSS SECTION ANALYSIS

GITHUB

- This is a machine learning Regression problem
- Got 0.145833 mean absolute error by XGBRegressor

• Deep Learning

CAT OR DOG RECOGNIZER

GITHUB | WEB VIEW | YOUTUBE VIDEO

- This is a classification problem to classify cat and dog
- Made an sequential convolutional neural network (CNN)
- Made usable web application using streamlit

• Discord Bot

HEART OF BOT

- It generates random images of user given size, transfers it into sketch
- It detects all edges of a picture, turns an image into black & white
- It translates sentences, gives top 5 news, generates QR code
- This is an invite able discord bot, named "Heart of Bot#0949"

• Contributes in Framework

AKDSFRAMEWORK

GITHUB

- Contributes on Queue and Graph data structure