Subham Sarkar

kingsubham27@gmail.com | **Mobile No: +917001363491**

EDUCATION

Haldia Institute of Technology **August 2014 - June2018**
Bachelor of Technology, Computer Science and Technology **CGPA 8.73**

BSF Sr. Secondary Residential School(CBSE) **April 2012 - June2014**
Higher Secondary, *Bio-Science* **Percentage : 89.80 %**

Good Shepherd School , Bagdogra(ICSE) **March 2011- March 2012**
Percentage : 85.14 %

PROFESSIONAL SUMMARY

I am an aspiring Data Scientist/ML Engineer. I am a result focused software developer currently working at Cognizant with experience in developing robust code for high-volume businesses. Presently , working on collaborating Machine Learning with Digital Marketing in deciding relevance with respect to offer integration , template content selection etc. Interested in devising solutions for challenging tasks, learning and applying new technologies and tools. An enthusiastic team player with a can-do attitude and a strong user focus.
Also during my internship as ML-Intern with AITS ,I worked closely with the team on their open-source project- "DNNCompiler" which is an alternative to Tensorflow but for low form-factor devices(micro-controllers) like Raspberry Pi etc. trying to bring the power of Deep Learning to the micro-controllers.

SKILLS AND COMPETENCIES

Technical: Python, Machine Learning, Deep Learning, NLP, Computer Vision, Flask, Jinja Templating, SOAP UI, Big Data, Statistical Modelling, TensorFlow, Keras, Pandas, NumPy, Seaborn, Matplotlib, MySQL, Oracle 11g, Adobe Campaign, Java(J2EE, JSP, Servlets) , Microsoft Office Suite.

BUSINESS EXPERIENCE

Programmer Analyst-Cognizant Technology Solutions, Kolkata, India **July 2018-Present**

- Experience in developing and testing fully automated campaigns in **Adobe Campaign** using Javascript and SOAP calls
- Experience in optimising the campaigns .
- Experience in developing data export and import workflows in Adobe Campaign.
- Designing Data Schema, Input Forms, Navigation Hierarchies, WebApps etc. in Adobe Campaign.
- Defining typology(business) rules to execute unwanted or duplicate target audience.
- Finally, deployment in Production.
- **Blogs** : Machine Learning in Digital Marketing (**Churn Prediction**)

Machine Learning Engineer Intern , AI-Technology and Systems(AITS) **July 2019-Sep 2019**

- Contributed to an open source project "DNNCompiler" which is an alternative to Tensorflow but for low form-factor devices(micro-controllers) like Raspberry Pi etc.
- Every small smart device has a micro controller fitted into it. We are trying to bring the power of Deep Learning to the micro-controllers using the "DNNCompiler".
- Here is a small video to demonstrate how to use DeepC Compiler: https://www.youtube.com/watch?v=oUnob-dCJwmE

PROJECTS

Image Captioning using Attention Mechanism *(Deep Learning, Flask, HTML,VGG-16,LSTM,Attention , Python)*

- **Caption generation** is a challenging artificial intelligence problem where a textual description must be generated for a given photograph

- Extension of classic **Encoder-Decoder** models and usage of **Attention Mechanism**.
- API'fied the setup using Flask.
- Medium : https://medium.com/@kingsubham27/image-captioning-using-attention-mechanism-f3d7fc96eb0e
- Github: https://github.com/SubhamIO/Image-Captioning-using-Attention-Mechanism-Local-Attention-and-Global-Attention-

On the Plague Trail ML Challenge*(Machine Learning, Random Forest, XGBoost, MultiOutputRegressor, Python)*

- To develop a machine learning algorithm for predicting the total number of people infected by 7 different pathogens.
- This is a **Multi-Output Regression** Problem where we need to predict 7 output columns.
- Significance of this study is to study the causes of plague and ways to minimise it using Machine Learning .
- **LeaderBoard Score achieved : 88.19** and **HackerEarth Rank achieved : 69**
- **Medium :** https://medium.com/@kingsubham27/hacker-earth-challenge-on-the-plague-trail-a7794e22f458
- Github: https://github.com/SubhamIO/HackerEarth-Challenge-On-the-Plague-Trail

Predicting House Prices using classical Machine Learning and Deep Learning Techniques. *(Machine Learning, Deep Learning, Python)*

- With **79** explanatory variables describing (almost) every aspect of residential homes in Ames, Iowa, this competition challenges you to predict the final price of each home.
- This is a **Regression Problem** and the metric used is Root Mean Squared Error(**RMSE**)
- Medium : https://medium.com/analytics-vidhya/predicting-house-prices-using-classical-machine-learning-and-deep-learning-techniques-ad4e55945e2d
- Github: https://github.com/SubhamIO/House-Price-Prediction

BLOGS

- **Image Captioning using Attention Mechanism:** https://medium.com/@kingsubham27/image-captioning-using-attention-mechanism-f3d7fc96eb0e
- **Calibration Techniques and it's importance in Machine Learning :** https://medium.com/@kingsubham27/calibration-techniques-and-its-importance-in-machine-learning-71bec997b661
- **Automatic Face Recognition:** https://medium.com/ai-techsystems/auto-face-recognition- e8ee177fd04f
- **Build and Deploy ML Models using AWS and Flask :** https://medium.com/analytics-vidhya/build-and-deploy-an-machine-learning-model-using-aws-and-apis-1d22eadb2b83
- **On the Plague Trail ML Challenge:** https://medium.com/@kingsubham27/hacker-earth-challenge-on-the-plague-trail-a7794e22f458
- **Predicting House Prices using Classical ML and Depp Learning Techniques :**https://medium.com/analytics-vidhya/predicting-house-prices-using-classical-machine-learning-and-deep-learning-techniques-ad4e55945e2d

CERTIFICATION

- **End to End Machine Learning with Tensorflow on GCP :** https://www.coursera.org/account/accomplishments/certific ate/NZPQCRANJKS6
- **Machine Intelligence in EDA/CAD :** https://www.udemy.com/certificate/UC- QBCK8ZFY/?utm_campaign=email&utm_source=sendgrid.com &utm_medium=email
- **AutoML in Google Cloud Platform:** https://google.qwiklabs.com/public_profiles/4d35fdd 1-018c-4d74-827a-01499c588a61
- **Adobe Certified Expert - Adobe Campaign Classic Developer :** https://www.youracclaim.com/badges/3fa21260-1109-4b74- baf1-ecdb9e08da3e/linked_in_profile

SOCIAL PROFILES

- **Github** : https:// github.com/SubhamIO
- **LinkedIn** : https://www.linkedin.com/in/subham-sarkar-4224aa147
- **Website** : https://bit.ly/2UmQbOh
- **Medium** : https://medium.com/@kingsubham27
- **Quora** : https://www.quora.com/profile/Subham-Sarkar-90