Kazi Amit Hasan

Kingston, Ontario, Canada

→ +1 343 989 6004 kaziamithasan89@gmail.com https://linkedin.com/in/kazi-amit-hasan/ github.com/AmitHasanShuvo https://amithasanshuvo.github.io/

Education

Queen's University

Doctor of Philosophy (PhD) in Computing

Queen's University

Master's of Science (research-based) in Computing

Rajshahi University of Engineering & Technology (RUET)

Bachelor of Science in Computer Science & Engineering (CSE)

May 2023 – Present Kingston, ON, Canada

Sept. 2022 - May 2023

Kingston, ON, Canada **Jan. 2016 – Jan. 2021**

Rajshahi, Bangladesh

Thesis

Title: Prediction of Clinical Risk Factors of Diabetes Using Multiple Machine Learning Techniques Resolving Class Imbalance Supervisor: Barshon Sen and Md. Al Mehedi Hasan

Relevant Coursework

 Advanced topics in DevOps and release engineering • Evolutionary Optimization and Learning • Algorithms Analysis

• Database Management

• Artificial Intelligence

Cryptography

• Data Mining

 Neural Network and Fuzzy system

Experience

Queen's University

Graduate Teaching Assistant

• CISC 372/CISC/CMPE 351: Advanced Data Analytics

Advanced Chemical Industries (ACI Limited)

Machine Learning Engineer

Feb. 2021 – Present Dhaka, Bangladesh

Kingston, Canada

Jan. 2023 - March, 2023

- [Analytics] Developed a Social Media Analytics tool that can measure different perspectives of the audience towards a post which can improve a brand quality.
- [Analytics] Developed a customer segmentation system based on recency, frequency and monitory value features to help the business to focus on different segments of customers.
- [Recommendation System] Developed a recommendation system for ACI retail business to push customers from one segment to another segment based on their purchased history.
- [Analytics] Created a baseline to identify of emerging doctors by analyzing and creating features of their FourP data to assist the field force to take the right steps based on the analytics.
- [Analytics with AI] Developed a dashboard by analyzing the behavior patterns of different customers based on their credit history by using ML.
- [Analytics with AI] Developed a dashboard that provides deep insights about product performance based on different parameters. Enriched the project by using ML methods to provide forecast, predictability.
- [Analytics & AI] Developed a sales tracking report which shows various insights from data. Business leaders can observe daily, weekly, monthly, yearly trend of sales. Also, they can monitor the sales against the target. We implemented the trend analysis using fb prophet and the dashboard was created using PowerBI.
- Assisting Field Force to Take Right Steps from AI and BI Based Analysis.
- Assisting Businesses to Take Right Decision through Insights From Different Businesses Data
- Maintaining and generating insights using Power BI

Kaggle Competition Expert (x4)

May 2020 – Present

Dhaka, Bangladesh

- Competition Expert: Ranked 1190th out of 149,258 experts.
- Notebook Expert: Ranked 262th out of 138,005 experts.
- Datasets Expert: Ranked 124th out of 24,475 experts.
- Discussion Expert: Ranked 283th out of 159,970 experts.

Selected Publications

- Kazi Amit Hasan, Marcos Macedo, Yuan Tian, Bram Adams, Ding Steven, H., H. "Understanding the Time to First Response In GitHub Pull Requests." In 20th International Conference on Mining Software Repositories (MSR 2023).
- Ahamed, Md Atik, Kazi Amit Hasan, Khan Fashee Monowar, Nowfel Mashnoor, and Md Ali Hossain. "ECG heartbeat classification using ensemble of efficient machine learning approaches on imbalanced datasets." In 2020 2nd International Conference on Advanced Information and Communication Technology (ICAICT), pp. 140-145. IEEE, 2020.
- Hasan, Kazi Amit, and Md Al Mehedi Hasan. "Prediction of clinical risk factors of diabetes using multiple machine learning techniques resolving class imbalance." In 2020 23rd International Conference on Computer and Information Technology (ICCIT), pp. 1-6. IEEE, 2020.

Open Source Contribution

Data Inspector August 2021

• Data Inspector brings a total of 15 essential exploratory data analysis, data cleaning automations to make a dataset understandable. This is a perfect tool to get started with you data. (Link)

PR-Stats January 2023

• PR-stats is an open-source python library that brings different functions to bring stats about pull requests. (Link)

PR-Accelerator May 2023

• PR-Accelerator is a set of tools that reports analytics and information regarding pull requests (PRs) and points out the delays in first response. This tool was presented in our paper titled Understanding the Time to First Response In GitHub Pull Requests published at the MSR 2023 conference. (Link)

Machine Learning Competition Ranks

- First Runner Up in (Top 0.5%) in Robi Datathon 2.0.
- Ranked 28th out of 2132 participants (Top 1.3%) in Of Genomes And Genetics: HackerEarth Machine Learning Challenge.
- Ranked 20th out of 2796 participants (Top 0.7%) in Fast, Furious and Insured: HackerEarth Machine Learning Challenge.
- Ranked 35th out of 2124 participants (Top 1.6%) in A Fine Windy Day: HackerEarth Machine Learning challenge.
- Ranked 125th out of 3958 participants (Top 3.1%) in HackerEarth Machine Learning Challenge: Exhibit A(rt).
- Ranked 145th out of 5000++ teams (Top 2%) in HackerEarth Machine Learning challenge: Adopt a buddy in HackerEarth.
- Ranked 88th out of 3,314 teams (Top 3%) and achieved first ever Solo Silver Medalin SIIM-ISIC Melanoma Classification in Kaggle. (Kaggle Competition)
- Ranked 91th out of 541 teams (Top 17%) and achieved first ever Solo Bronze Medal in Google Landmark Retrieval 2020. (Kaggle Competition)
- Secured 32th position (Top 6%) out of 487 participants in HackerEarth's Machine Learning Challenge: Slashing prices for the biggest sale day.
- Secured 86th position (Top 1.4 %) out of 5800++ participants in HackerEarth Deep Learning challenge: Identify the dance form.
- Passed the Linkedin assessment on "Machine Learning".

Selected Projects

Risk Factors Analysis of Musculoskeletal Pain in Clinical Practice

January 2021

• Analyzed the risk factors of Musculoskeletal Pain and tried to find out some interesting patterns among the symptoms.

Association Rule mining and Statistical Logistic Regression were used to get the insights of the tabular data and to find out the risks factors. (Link)

Analysis and Prediction of the Impacts of COVID-19 on Bangladesh

November 2020

• Analyzed the impacts of COVID-19 on Bangladesh by using country wise COVID dataset. The prediction part is implemented by analyzing the time series data COVID confirmed, death, recovered cases. This project includes different data visualizations and using of fbprophet algorithm. (Link)

Sentiments Analysis of Twitter Data

October 2020

• A project which fetches real-time data from Twitter using credentials and analyzes the sentiments and generates a visual that represents the sentiments of a specific word/tweets (text data). Users can submit a word and sample numbers, the UI will show the sentiment visuals using textblob. (Link)

Machine Learning Projects

October 2020

- This repository contains all my implemented Machine Learning projects. All my learning from different Coursera ML courses and internet are reflected here. This repository contains different projects on various types of tabular, image datasets. (Link)
- Solved different types of classification, regression, time series problems.

Technical SKills

Languages: Python, C++, HTML/CSS, SQL

Applications: Jupyter Notebook, PowerBI, Overleaf, GitHub, MATLAB, CodeBlocks, Google Docs, Sheets, Drive, MS Excel

Operating System: macOS, Linux, Windows, , GitHub

Awards

- Awarded Rajshahi board Scholarship for excellency in Higher Secondary Certificate (HSC) examination in TalentPool Grade-Full Tuition Fee waiver in Bachelor with around 550\$ Stipend for the period of 2016 to 2020.
- Secured the position of 13th in Rajshahi Board in Higher Secondary Certificate (HSC), examination, 2015
- Rajshahi board Scholarship excellency in Junior School Certificate (JSC) examination in General Grade-Full Tuition Fee waiver in Bachelor with around 71\$ Stipend for the period of 2012 to 2013.
- Honored prize at "BUET EEE Day Inter-University Project Show 2017" in the Junior category.

Administrative Experience

- RUET Career Forum, RUET (RCF)
 * Organized the 5th RCF Career Fair, 2019 as Convener.
 - * General Secretary (August 2019 August 2021)
 - * Former Student Coordinator (December 2018 August 2019)

- Class Representative (CR), CSE'15, RUET)

 * Managed 120 students and respective teachers directly.
 - * Managed several departmental programs directly.

- * Active Member, IEEE Bangladesh Section (August 2019 Ongoing)
- * Active Member, IEEE Computer Society (August 2019 Ongoing)
- * Active Member, IEEE Signal Processing Society (August 2019 Ongoing)

RUET Debating Club (RUET DC)

* Former Executive Member (February 2017 - February 2018)

Contest and Participations

- * Axiata Digital Labs AI Hackathon, 2021: ranked 46th out of 90 teams
- * Dhaka AI, 2020
- * Technovation, 2018
- * IUT 9th ICT Fest, 2017
- * Mecceleration, 2017
- * SS12 Project Competition and Maker Fair, 2017
- 40 hours training on Advanced Mobile Game Development, 2017
- 40 hours training on Mobile Game Graphics Design, 2017
- * Power and Energy Hackathon 2017

Languages

Bangla, English

References

Barshon Sen

Assistant Professor,

Department of Computer Science & Engineering,

Rajshahi University of Engineering & Technology (RUET)

Email: barshon.sen@cse.ruet.ac.bd

Yuan Tian

Assitant Professor,

School of Computing,

Queen's University

Email: y.tian@queensu.ca