# MD ASHIK KHAN

(+91)7063633773 · aasshhik98@gmail.com · ashik.khan@kgpian.iitkgp.ac.in LinkedIn · GitHub· Twitter · LeetCode

#### ACADEMIC DETAILS

• Indian Institute of Technology, Kharagpur

Master of Technology in Computer Science and Engineering

Supervisor: Dr. Abir Das

• Bangladesh Army University of Science and Technology, Saidpur

Bachelor of Science in Computer Science and Engineering

• Rajuk Uttara Model College

Higher Secondary Certificate

Feb 2015 July 2019 CGPA: 3.35/4.00

Aug 2021 Present

CGPA: 8.41/10.00

June 2012 April 2014

GPA: 5.00/5.00

### TECHNICAL STRENGTHS

Computer Languages

C/C++, Python, PHP, JavaScript, SQL

Tools & Libraries **Development Environment**  PyTorch, MMAction, OpenCV, Pandas, NumPy, Laravel, React JS

Windows, Linux, Visual Studio Code, PvCharm, Jupyter Notebook

#### RELEVANT COURSEWORK

Machine Learning · Information Retrieval · Artificial Intelligence · Complex Network · Data Analytics · Scalable Data Mining · Database Management Systems · Algorithm Design and Analysis · Operating Systems

#### **PROJECTS**

#### A Large-scale Study of Representation Learning and the Benchmarking in Video Action Recognition 2022

IIT Kharaqpur

Supervised By Dr. Abir Das

- · Comparative study of Representation Learning with video action recognition by performing three types of experiments: Full-fine-tuning, Linear Evaluation, and Few-Shot Learning.
- · Benchmarking 14 target video datasets across selected 2D,3D & Transformer based video recognition models, pre-trained on two large-scale datasets.
- · Generated Construction Action Recognition dataset for learning and evaluating construction action is the first of its kind.
- · Tools/Technology: Python, PyTorch, MMaction2, PyAV, FFmpeg, Bash Scripting
- · Document Link: Report

# **Evidence Retrieval for Fact Verification**

2022 Supervised By Dr. Somak Aditya

IIT Kharaqpur

- · Evidence Retrieval for Fact Verification project focuses on collecting the related evidence based on a claim or fact using classical IR methods.
- · This project carries a different approach to Evidence Retrieval with creation of collated data and measures the related evidence using tf-idf score and cosine similarity.
- Tools/Technology: Python, NLTK, Beautiful Soup
- · Source Code: Github

# Context Specific Quote Recommendation from Historical Text

2022

IIT Kharagpur

Supervised By Dr. Bivas Mitra

· Development of a context-based quote recommendation system using the Hugging Face DistilBERT model followed by dataset preparation and annotations from Quotation POTUS and encoding to feed in the model.

- · Full-finetuned the model for learning and evaluating the quoted phrases, which obtained an improved performance over the prior Perceptron Model.
- · Tools/Technology: Python, PyTorch, Hugging Face.

· Source Code: Colab

#### Online File Editor with Multi-Client Collaborator

2022

IIT Kharagpur

Supervised by Dr. Animesh Mukherjee

- · Implemented file transfer protocol on top of TCP socket to transfer files from client to server.
- · Designed an online text editor system with online collaborative features with roles and permissions which administrates multiple clients simultaneously.
- · Tools/Technology: C, Socket Programming
- · Source Code: Github

#### Web Crawling and Extraction of COVID-19 News

2022

IIT Kharagpur

Supervised by Dr. Pawan Goyal

- · Developed a console-based application for query-based data extraction from more than 100 Wikipedia pages.
- · Implemented Lex/Yacc compiler to create grammar using the syntax of HTML file of news downloaded from Worldometer & Wikipedia COVID-19 Timeline.
- · Detected Country-wise top closest COVID-19 responded countries according to Jaccard similarity of extracted news and created Word Cloud.
- · Tools/Technology: Python, PLY, Regular Expression
- · Source Code: Github

#### WORKING EXPERIENCE & TEACHING

# • Teaching Assistant at IIT Kharagpur

Design & Analysis of Algorithms

Autumn 2022

Responsibilities included: Conducting tutorials & lectures, mentoring a group of students during lab, and evaluating assignments.

#### • Hovata Technologies

#### Assistant Programmer

March 2020 - August 2022

Responsibilities included: Working on ERP and e-commerce projects in Laravel, implementing RestAPI with Lumen Micro Framework, testing and deploying, and building UI components with React JS.

#### • MerinaSoft

# Junior Software Developer

September 2019 - February 2020

Responsibilities included: Developing inventory management projects based on Laravel, developing several android applications for customer requirements, and working on Project Management, client requirement Analysis, and UI Design activities.

#### **ACHIEVEMENTS**

- Awarded ICCR Scholarship to pursue M.Tech at IIT KGP under Bangladesh Scholarship Scheme, 2021-22
- Finalist at BAUST-IEEE idea contest 2018 ,BAUST
- Honorable Mention at Inter-University Programming Contest 2016, IUBAT, Dhaka
- Secured Board Talent Rank 35th in SSC Examination, 2012, Dhaka Board