

Shehjad Khan

shjdkhn.xyz | github.com/khanshehjad
shehjadrakhan@gmail.com | 226.988.8182

EXPERIENCE

ACRYLIC ROBOTICS (NEXT CANADA & FRONT ROW VENTURES) | FOUNDING SOFTWARE ENGINEER - DEEP LEARNING

April 2021 – Now | Montreal, QC

- Sourcing and adapting convolutional neural networks using TensorFlow and OpenCV for feature detection and extraction of relevant attributes from live video data and digital paintings from Photoshop/Illustrator.
- Developing automated processes to generate machine G-code with team of mechatronics and robotics engineers.

KPMG LIGHTHOUSE | SOFTWARE ENGINEER INTERN - FULL STACK & MACHINE LEARNING TEAM

Jan 2020 – Apr 2020 | Toronto, ON

- Architected React + Node.js web app deployed through Docker with Mongo Atlas on GCP for data pipelining to provide key phrase, named entity, and sentiment analytics for phone calls.
- Built financial news article topic modelling pipeline leveraging LDA unsupervised classification through sklearn, nltk and gensim to forecast risk and provide market insights, classifying over 92% of article topics correctly.

GOLDMAN SACHS | SOFTWARE ENGINEERING FELLOW - ENGINEERING ESSENTIALS PROGRAM

Jun 2020 – Aug 2020 | New York City, NY

- Designed and developed system of stock visualization application using Node for REST APIs and React for UI.

PROJECTS

ETH GLOBAL | HACKATHON ORGANIZER, INTERNATIONAL LOGISTICS

- Revamped dashboards using React + Redux and refactored API endpoints in Node.js for over 6200 hackathon applicants and 1200 attendee/sponsor/judge registrations.

SENSE JAR | BACKEND ENGINEER, PERSONAL PROJECT

- Building ML backend using spaCy NLP and TensorFlow for React app that identifies bias in news articles and generates similar articles from different viewpoints for politically-balanced news feeds.

COVIDBIT | COMPUTER VISION ENGINEER, HACK THE NORTH 2021

- Created real-time 'virus spread' Fitbit that tracks physical interactions at the micro-scale and then visualizes the frequency of encounters with location tracking using D3.js & Firebase. Implemented facial recognition algorithm with OpenCV/dlib + YOLOv3 that detects individuals in live video from a glasses-mounted Raspberry Pi camera.

TENSORFLOW LITE | OPEN SOURCE SOFTWARE CONTRIBUTOR, NLP EXAMPLES

- Built task examples for BERT QnA, BERT Text Classification, and Smart Reply using the TensorFlow Lite Task Library in Python for usage in Android (Java)/iOS (Swift) Apps, enabling on-device machine learning inference.

EDUCATION

UNIVERSITY OF WATERLOO

BS IN HONORS MATHEMATICS WITH COMPUTER SCIENCE OPTION

Dean's Honours List | Cumulative GPA: 3.9 / 4.0 | Expected April 2024 | Waterloo, ON

SKILLS

Languages

Python • JavaScript • Go • Java • C/C++ • SQL

Full Stack

React • Node.js • Django • Flask • MongoDB

ML & Data

TensorFlow • PyTorch • Scikit-Learn • Keras • Pandas • NumPy

Cloud & CI

AWS • GCP • Docker • Kubernetes • Git • CircleCI • Jenkins

COURSEWORK

Algorithms & Data Structures

Machine Learning

Object Oriented Software Development

Neural Networks & Deep Learning

Natural Language Processing

Probability & Statistics

Linear Algebra

Calculus