

FAIZAN SHAIKH

+1(857) 498-3670 ♦ Boston, MA

fzshaikh150@gmail.com ♦ [linkedin.com/in/shfaizan](https://www.linkedin.com/in/shfaizan) ♦ github.com/shfaizan

EDUCATION

Master in Software Engineering, Northeastern University
GPA: 3.75/4.0

September 2022 - Expected August 2024

Bachelor of Computer Science, Navrachana University
GPA: 3.60/4.0

July 2017 - May 2021

SKILLS

Programming Languages	Python, Java, C++, SQL, JavaScript
Frameworks and Libraries	Django, FastAPI, SpringBoot, Flask, Node JS, React, RabbitMQ, Kafka, Celery
Tools	Git, Docker, Jenkins, Nginx, Valgrind, SonarQube, Unix, Linux
Database	MongoDB, MySQL, PostgreSQL, Redis, Firebase, Cassandra, Elasticsearch
Cloud Technologies	AWS[SNS, Lambda, DynamoDB, EKS], Azure[Azure Function], GCP[Cloud Pub/Sub]

EXPERIENCE

Software Developer CO-OP
Siemens Healthineers

July 2023 - January 2024
Boston, MA

- Developed secure communication channels using **WebSockets** and **gRPC** in **Python** for real-time data exchange between patient-side and control-side systems, enabling seamless remote operation.
- Integrated monitoring & logging with **Prometheus** & **Grafana** to provide real-time insights and enhance system observability.
- Implemented **dynamic caching** strategies with **Redis**, reducing database load by **40%** and improving response times for frequently accessed data in Medical Imaging systems.
- Developed and deployed containerized applications using **AWS ECS** & **Kubernetes** for the control-side system, enabling efficient scaling & load balancing across multiple nodes, resulting in a **35%** improvement in system uptime.
- Achieved comprehensive code coverage of **90%** through robust unit testing with **pytest**, ensuring exceptional reliability and code quality across the codebase.

Software Developer
PirhoAlpha Research

January 2021 - July 2022
Mumbai, India

- Developed data ingestion pipelines using **Python**, **Kafka**, and **aioKafka** to stream over **10 million** sensor readings per day into **Elasticsearch** for real-time monitoring and analytics, increasing data processing efficiency by **40%**.
- Implemented **Celery** for asynchronous task queuing and scheduling heavy data processing jobs like report generation.
- Enhanced data visualization and user interface with **Plotly** and **Dash**, creating interactive, insightful dashboards for end-users.
- Configured an automatic **CI/CD** pipeline with **Jenkins** and improved testing and deployment efficiency.
- Utilized **consistent hashing** techniques for optimal data distribution and retrieval, enhancing system performance.
- Integrated **RESTful APIs** and **GraphQL** endpoints for dynamic content rendering and real-time updates.

Software Developer Intern
Xcitech

September 2019 - March 2020
Vadodara, India

- Achieved **10x** speedup in deep learning model via parallel processing with **AWS Kinesis**.
- Implemented an alert service using **Redis**, **FastAPI**, and **Twilio** to send mission-critical notifications instantly.
- Optimized data processing workflows using **aioKafka** and **asyncio**, enhancing the performance and scalability of the system.
- Automated deployment & scaling with **Terraform** & **Ansible** reduced manual tasks by **40%** for highly available infrastructure.

PROJECTS

ATRIS Led the development of Atris, a startup project, featuring a **FastAPI** and **MongoDB** backend for streamlined data management, reducing data retrieval time by **45%**. Orchestrated **Dockerized microservices** and established a secure **JWT-based** authentication system with **SAML** for versatile access control across various applications, improving security compliance by **30%**. Employed **dynamic caching** and **query optimizations** to enhance system performance and reliability, achieving a **40%** increase in data processing speed..

BlackBox Engineered a resilient marketplace for **pre-trained ML/DL models** with **Django** and **PostgreSQL**. Utilized **Google Cloud Platform**, leveraging **Cloud Run** and **Pub/Sub** for seamless event-driven processing. Employed advanced technologies like **YOLO**, **TensorFlow**, **CNN**, and **RNN** for high-performance AI models.