

Md Moshikul Azam

Engineering Leader · Senior Backend Engineer · DevOps Enthusiast

Dhaka, Bangladesh | azammoshiul8@gmail.com | +880 1631925038 | github.com/moshiulRootdevs | linkedin.com/in/moshiulazamm | Google Scholar

PROFESSIONAL SUMMARY

Senior backend engineer and engineering leader with 5+ years architecting scalable, event-driven systems that serve 500K+ concurrent users. Currently CTO at ROOTDEVs, owning technical strategy across 12+ enterprise products while remaining hands-on with distributed systems, real-time platforms, and AWS cloud infrastructure. Published researcher (32+ citations) in secure, decentralized systems, with a track record of building resilient services and mentoring high-performing teams.

TECHNICAL SKILLS

Languages	TypeScript, JavaScript, PHP, SQL
Backend	Node.js, Express.js, Laravel, REST APIs, WebSockets / Socket.IO, Webhooks, Live Streaming
Distributed Systems	Apache Kafka, RabbitMQ, Event-Driven Architecture, Message Queues, System Design, Scalability
Databases & Caching	MongoDB, MySQL, Redis, CouchDB
Cloud & DevOps	AWS (EC2, S3, CloudFront), Docker, Jenkins, Nginx, Linux, CI/CD
Observability	Prometheus, Grafana, Apache JMeter

PROFESSIONAL EXPERIENCE

ROOTDEVs — Dhaka, Bangladesh Feb 2024 – Present

Chief Technology Officer Apr 2025 – Present

- Own engineering strategy, system architecture, and the technical roadmap across 12+ enterprise products, partnering with stakeholders to align delivery with business goals.
- Architect scalable, fault-tolerant backend systems supporting 500K+ concurrent users in production.
- Lead and mentor cross-functional engineering teams, establishing engineering standards, delivery cadence, and code-quality practices.
- Direct AWS cloud infrastructure strategy spanning CI/CD, observability, and cost optimization.

Senior Software Engineer Aug 2024 – Mar 2025

- Owned server infrastructure and DevOps, hardening reliability, scalability, and security across production systems.
- Optimized AWS services (EC2, S3, CloudFront) and built CI/CD pipelines, streamlining deployments and reducing release friction.
- Led R&D on real-time communication, Redis caching, and high-concurrency systems, measurably reducing system latency.
- Supervised multiple concurrent projects and mentored engineers to consistent on-time delivery.

Software Engineer Feb 2024 – Aug 2024

- Engineered a high-performance, real-time quiz platform supporting 10,000+ concurrent players with live scoring and a distributed leaderboard.
- Built and maintained robust, scalable backend services across multiple applications.
- Deployed and operated production servers, optimizing performance and ensuring high availability.

IOTA Infotech Limited — Dhaka, Bangladesh Sep 2021 – Nov 2023

Software Engineer Nov 2022 – Nov 2023

- Led end-to-end design, development, and white-box testing of an HRM & payroll product (PHP, Laravel, MySQL), delivering a robust solution to a high quality bar.
- Built and optimized backend services behind Nginx on AWS for performance and reliability.

Associate Software Engineer Mar 2022 – Oct 2022

- Delivered high-impact products — including a ride-sharing app and a community app — within cross-functional teams.
- Designed and optimized REST APIs and admin panels; deployed backend systems to AWS EC2.

Software Engineer (Trainee) Sep 2021 – Feb 2022

- Developed web-based software solutions across the full SDLC using HTML, CSS, Bootstrap, jQuery, PHP, and MySQL.

KEY PROJECTS

Lighthouse Quiz **10,000+ concurrent users** Android & iOS

Real-time multiplayer quiz platform — designed the real-time communication layer, distributed leaderboard, and horizontally scalable services that keep gameplay synchronized at scale.

Node.js · Socket.IO · Redis · Kafka · MongoDB

StampEzee **SaaS loyalty platform** stampezee.com

SaaS loyalty platform letting businesses create digital stamp cards, automate rewards, run retention campaigns, and track engagement — built end-to-end with multi-tenant management, gamification, QR-based rewards, analytics dashboards, and engagement automation.

Node.js · MongoDB · AWS · Redis

HRM Platform [Enterprise HR suite](#)

Laravel · PHP · MySQL

End-to-end HRM covering attendance, leave, and payroll with role-based workflows and reporting; built advanced payroll, analytics, and AI-assisted capabilities.

SK Toy [Ecommerce platform](#)

sktoy.com.bd

Business and ecommerce platform — delivered backend APIs, business automation, and the database architecture underpinning catalog, ordering, and operations.

Node.js · MongoDB · AWS

EDUCATION

B.Sc. in Computer Science & Engineering — Southeast University

Jan 2017 – Jun 2021

Graduated with Distinction · CGPA 3.65 / 4.00 (3.97 in the final four semesters) · Merit scholarship up to 50%

Higher Secondary Certificate (HSC), Science — B.A.F. Shaheen College

2016

GPA 4.58 / 5.00

Secondary School Certificate (SSC), Science — Civil Aviation High School

2014

GPA 5.00 / 5.00

PUBLICATIONS

An Anonymity and Interaction Supported Complaint Platform based on Blockchain Technology for National and Social Welfare

IEEE — Int. Conference on Electronics, Communications and Information Technology (ICECIT), 2021 · DOI: 10.1109/ICECIT54077.2021.9641269

Secure Complaint Management System against Women Harassment at Workplace Using Blockchain Technology

International Journal of Electrical and Computer Engineering Systems (IJECEs), 2022 · DOI: 10.32985/ijece.13.3.6

Two peer-reviewed international papers · cited 32+ times in secure, decentralized systems.

CERTIFICATIONS & LANGUAGES

- **Blockchain: Hyperledger Fabric** — Udemy
- **CCNA** — Cisco Networking Academy
- **Cyber Security** — IBM
- **Computer Networking** — Google
- **Web Application Security** — Coursera
- **Laravel** — Bohubrihi
- **IELTS** — Overall Band 6.5