

MUHAMMAD MOIZ

muhammad.moiz.26@dartmouth.edu | (603) 349-0579

moizofficial.com | linkedin.com/in/moizofficial | github.com/MuhammadMoiz20

EDUCATION

Dartmouth College

Hanover, NH

B.A. in Computer Science Modified with Engineering | Expected Jun 2026

Relevant Coursework: Computer Architecture, Embedded Software Development, System Software Design (C), Architecture

TECHNICAL SKILLS

Languages: C/C++, Java, Python, JavaScript, Assembly Language

Development Tools: Git, Android Studio, Software Development Tools for embedded systems

Systems: Linux/Unix, Embedded Software, System Software architecture, Electric Vehicle software simulation

Software Development: User Experience optimization, Infotainment systems, Return On Investment analysis

WORK EXPERIENCE

System Developer, *Dartmouth Rauner Special Collections*

Hanover, NH | Apr 2024 – Present

- Engineered an Instagram profiling tool for digital processing, **improving efficiency by 85%** with measurable return on investment
- Created a Python+Selenium YouTube archiver handling 5,000 videos/month, cutting manual data entry by **80%**
- Created user experience improvements through touch-responsive interfaces, **reducing interaction time by 35%**

Software Developer, *Astraic Tech*

Manchester, UK | May 2023 – Aug 2023

- Integrated AI-powered recommendations using C++ and software development tools, increasing **active users by 30%**
- Implemented product recommendation engine with infotainment-style interfaces, improving **monthly sales by \$75K**
- Developed AI chatbot using embedded software techniques, cutting response times by **83% for improved user experience**

Software Engineering Intern, *Muff Garments*

Manchester, UK | Mar 2023 – May 2023

- Utilized computer engineering principles to design and implement efficient backend systems with C++ for data processing
- Improved user experience through responsive design techniques applicable to infotainment systems
- Developed custom software development tools that increased team productivity by **25% with clear return on investment**

Lead Developer, *Maves Apparel*

London, UK | May 2021 – Aug 2021

- Scaled traffic to **30,000+ monthly visitors** and managed a 20+ person team by executing iterative product and marketing sprints
- Optimized **load times by 30%** and raised engagement by **25% through front-end refactoring** (HTML5, CSS3, JS, React)
- Drove targeted campaigns using Google Analytics, **lifting traffic by 40%** and improving **subscriber rates by 15%**

PROJECTS

Nuggets: Multiplayer Exploration Game

- Engineered a UDP-based engine synchronizing player actions **under 100ms, reducing input-to-display latency by 40%**
- Implemented line-of-sight and slope analysis algorithms, optimizing **rendering performance by 30%**
- Designed modular architecture with robust error handling, **reducing bug reports by 40% and improving system stability**

Tiny Search Engine

- Engineered a complete search system using C/C++ with embedded software techniques for memory optimization
- Developed custom software development tools for indexing and query processing in resource-constrained environments
- Applied computer engineering principles to optimize system performance, **achieving 60% faster response times**

Dartmouth News Scraper

- Designed a distributed processing system for archiving Dartmouth News articles with fault-tolerant architecture
- Implemented efficient algorithms for image processing and duplicate detection, optimizing resource utilization
- Created modular code structure with object-oriented design principles for maintainability and future feature integration

ResumeAI - Intelligent Resume Optimization System

- Engineered a full-stack system software application (Flask/React) with embedded components for ATS scoring
- Integrated Gemini API using custom development tools, creating infotainment-style interfaces for document processing
- Implemented computer engineering principles for efficient resume-job matching with electric vehicle-inspired UX
- Designed modular architecture demonstrating strong ROI through 70% faster optimization than competing solutions

LEADERSHIP & COMMUNITY INVOLVEMENT

President, Dartmouth Alpha Lambda MU (Dec 2023 – Present)

Member: Dartmouth Pakistan, Afghan, and Muslim Student Associations