# Rudra Patel

Chicago, IL | U.S. Citizen | rudrappatel@lewisu.edu | (224) 607-9378 | LinkedIn | GitHub | Portfolio

### EDUCATION

Lewis University | GPA: 3.9/4.0 | Presidential Scholarship, Dean's List (2023-2025)

Romeoville, IL

B.S. Computer Science, Artificial Intelligence Concentration

Expected May 2026

- Planned: M.S. Computer Science, Artificial Intelligence (2026-2027)
- Relevant Coursework: Data Structures & Algorithms, Software Engineering, Database Systems, Object-Oriented Programming, Artificial Intelligence, Machine Learning

#### EXPERIENCE

#### Full-Stack Software Engineer

May 1, 2025 – July 31, 2025

Braceville, IL

Hometown Liquor

- Engineered an e-commerce platform for 750+ products, using React, Tailwind, and Firebase, with mobile-first responsive design and real-time inventory validation
- Optimized database performance, leading to a 30% cost reduction, by implementing a pagination system that limits Firebase reads to 25 products per page while maintaining <200ms search performance with Algolia
- $\bullet$  Enhanced user experience with a search-first UX design and cost-optimized loading, resulting in a 40% improvement in product discovery
- Developed a complete order management system using **SendGrid** email automation for order confirmations and real-time inventory tracking with automated stock alerts

## Projects

Property Pulse | React, TypeScript, Spring Boot, Scikit-learn, PostgreSQL, GCP

July 2025 - Present

- Built AI-powered real estate investment platform helping users evaluate properties and make data-driven investment decisions using React/TypeScript, Spring Boot, PostgreSQL, and ML integration
- Implemented Spring Security, JWT Authentication and role-based access control across 8+ REST endpoints for property CRUD operations, and market data retrieval
- Engineered multi-service architecture supporting **microservices deployment**, with **ML pipeline integration** for investment scoring, price prediction, and automated market trend analysis
- Created responsive mobile-first interface ensuring optimal user experience across mobile, tablet, and desktop platforms

QuizMaster | React, JavaScript, Node.js, Tailwind CSS, GCP, Cloud Firestore, Aqile

July 2025 - Present

- Led a team of 4 in architectural refactoring of 7000+ line React application, reducing load times from 886ms to 147ms through systematic refactoring and performance optimization
- Implemented unified design system and state management, reducing complexity by 33% while creating reusable component libraries that accelerated feature development
- Built a service layer architecture, migrating business logic from 40+ components, establishing separation of concerns and improving application maintenance

MasterChef Claude | React, Claude API, Tailwind CSS, Firebase, Docker, AWS

Apr. 2025 - May 2025

- Built AI-powered recipe platform using Claude API, React, Node.js, delivering custom recipes within 5s of ingredient submission with Firebase authentication and data persistence
- Engineered **comprehensive input validation** with **3-layer** error handling using regex patterns and providing real-time user feedback
- Simplified deployment with Docker containerization, reducing deployment time by 80% through automated CI/CD pipeline on AWS

#### TECHNICAL SKILLS

Languages: Python, Java, JavaScript/TypeScript, HTML/CSS, SQL

Frontend: React, Tailwind CSS, Responsive Design, Mobile-First Development Backend: Spring Boot, Node.js, Express.js, REST APIs, Microservices Architecture Databases: PostgreSQL, MySQL, Firebase, MongoDB, Database Schema Design Cloud & DevOps: AWS, GCP, Azure, Docker, GitHub Actions, CI/CD pipelines

Tools: Maven, JWT Authentication, Agile development, Git, Figma