

Sai Krishna Reddy Daka

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Versatile software engineer with experience in full-stack development, AI/ML integration—including LLM-based solutions—and scalable backend systems. Skilled in building intelligent, end-to-end applications using modern web frameworks, cloud-native technologies, and data-driven design. Passionate about writing clean, maintainable code and delivering high-impact, production-ready software.

Education

Arizona State University	Tempe, Arizona, USA
Computer Science, M.S. (GPA: 4.0 GPA)	Expected Dec 2025
<ul style="list-style-type: none">Coursework in Data Mining, Data Processing, Cloud Computing, Machine Learning, Data Visualization, Software Engineering & TestingNew American University Scholarship Awardee (Merit-Based Scholarship)	

Experience

Arizona State University	Tempe, Arizona, USA
Graduate Teaching Assistant	Aug 2024 – Dec 2025
<ul style="list-style-type: none">Graded assignments and evaluated student deliverables for 380+ students in CSE 565 (Software Verification, Validation, and Testing) and CSE 566 (Software Project, Process, and Quality Management) courses, ensuring precision and adherence to academic integrity standards.Supported faculty by managing course logistics, resolving 80+ student queries, and delivering timely feedback on software engineering methodologies, testing strategies, and quality assurance practices.	
Tata Consultancy Services (TCS)	Chennai, India
Software Development Engineer Intern	Feb 2023 – Apr 2023
<ul style="list-style-type: none">Developed a scalable internal framework to handle high volumes of asynchronous requests from microservices by batching, storing them in PostgreSQL, and forwarding to a target component—reducing processing latency by 40% and improving system reliability.Optimized PostgreSQL database queries and REST API endpoints, significantly reducing average response time by 60% and enabling the system to handle 3x more concurrent requests without any performance degradation or service downtime.Implemented comprehensive automated test scripts using Python’s PyTest framework, achieving 94% code coverage and reducing QA testing time by 15+ hours per week while proactively identifying critical bugs before production.	

Projects

Edge-Cloud AI-Powered Face Recognition System using AWS Greengrass, Lambda & ECR	Mar 2025 – May 2025
<ul style="list-style-type: none">Designed and deployed a real-time face recognition system using MTCNN on AWS IoT Greengrass and FaceNet model on AWS Lambda, achieving 98.7% accuracy; containerized models with Docker and deployed via Amazon ECR.Established a secure, event-driven messaging pipeline using MQTT and TLS, with intelligent edge-side filtering to discard “No-Face” frames, reducing cloud workload by 40% and cutting Lambda invocation costs by 35%.	
Real-Time AI-Powered Face Recognition System with Custom Event-Driven Autoscaling on AWS	Jan 2025 – Mar 2025
<ul style="list-style-type: none">Engineered a decoupled, event-driven face recognition system on AWS (S3, SQS, EC2) using MTCNN for face detection and a PyTorch-based FaceNet model for face recognition, achieving 98.7% accuracy and supporting 100+ concurrent requests.Devised a custom autoscaling controller that adjusted EC2 provisioning based on SQS queue depth, scaling to 15 EC2 nodes, reducing idle time by 94%, and completing 100-request workloads in 96 seconds with a 2.5x throughput boost over static provisioning.	
Multi-Modal Retrieval-Augmented Generation (RAG) System with LLM for Advanced Analysis	Aug 2024 – Nov 2024
<ul style="list-style-type: none">Built a multi-modal RAG system where users upload research paper PDFs via a web interface; files are securely stored in Amazon S3, with metadata indexed in Amazon DynamoDB to enable fast, structured retrieval of document content (text, tables, images).Integrated the LLaMA-3.2-90B-Vision-Instruct model for image captioning and semantic answering, and applied FAISS for vector-based indexing, enabling real-time multi-modal query responses with 96% accuracy and reducing research effort by 87%.	

Technical Skills

- Programming Languages:** Java, Python, JavaScript, TypeScript, C#, C, C++, SQL, PHP
- Cloud & DevOps:** AWS (Lambda, S3, EC2, Greengrass, IoT Core, SQS, ECS, ECR), Docker, Git, CI/CD pipelines
- AI/ML & LLM Tools:** PyTorch, TensorFlow, Scikit-learn, Hugging Face Transformers, OpenAI API, LoRA Fine-Tuning, LLaMA, Gemma
- Web Frameworks & API Development:** ReactJS, HTML, CSS, Tailwind CSS, Bootstrap, Django, Flask, REST API
- Database Technologies:** PostgreSQL, MySQL, Oracle SQL, MongoDB, SQLite, DynamoDB
- Software Engineering Practices & Tools:** Agile (Scrum, Kanban), SDLC, Jira, Unit Testing (JUnit, PyTest), Selenium, Test Automation

Certifications

Microsoft – Career Essentials in Generative AI by Microsoft and LinkedIn, 2024 | **Oracle** – Oracle Cloud Infrastructure AI Certified Foundations Associate, 2024 | **Oracle** – Oracle Cloud Data Management Certified Foundations Associate, 2024 | **Forage** – Goldman Sachs Software Engineering Job Simulation, 2024