

# RAHUL NAGARAJAN

<https://rahulnagarajan.com>

Email: [additya.nagarajan@gmail.com](mailto:additya.nagarajan@gmail.com) Mobile: 909-940-2616

LinkedIn: [linkedin.com/in/rahulnn](https://www.linkedin.com/in/rahulnn) GitHub: [github.com/Rahul2K20](https://github.com/Rahul2K20)

## EXPERIENCE

---

SOFTWARE ENGINEER SEPT 2023 - PRESENT  
*People Tech Group Inc* *Redmond, WA*

- Designed and implemented a RAG-based chatbot that reduced information retrieval time through optimized token usage, chunking strategies, and semantic caching, supporting over 20 daily users across both structured and unstructured data sources.
- Built an agentic AI solution using AWS Bedrock Agents to automate multi-step business processes, reducing manual workflows by 90%.
- Created preprocessing utilities for DeepFaceLab that drastically reduced frame preparation time by filtering out non-relevant, redundant, and blurry frames, cutting the film production pipeline from 14 days to 3 days per sequence and enhancing output quality.

RESEARCH ASSISTANT DEC 2021 - MAY 2023  
*Cal Poly Pomona* *Pomona, CA*

- Optimized EEG model by applying feature engineering techniques and hyperparameter tuning improving model precision and overall classification accuracy by 10%.
- Reduced false positive authentication rate by half through advanced signal processing algorithms.
- Published research paper titled "EEG Signal-Based Authentication: A Performance Evaluation of Feature Extraction and Classification Techniques" in IEEE BigData 2023.

## EDUCATION

---

CALIFORNIA STATE POLYTECHNIC UNIVERSITY POMONA, CALIFORNIA  
*Master of Science, Computer Science* *August 2021 - May 2023*

- GPA: 4.0
- Relevant Coursework: Advanced Software Engineering, Natural Language Processing

## CERTIFICATIONS

---

2024 Microsoft Certified: Azure AI Engineer Associate

2024 AWS Certified Developer Associate

2024 AWS Certified Cloud Practitioner

## SKILLS & INTERESTS

---

**AI/ML:** RAG architectures, LLM orchestration, prompt engineering, vector databases (Pinecone, ChromaDB, OpenSearch), AWS Bedrock, HuggingFace, Ollama, Azure OpenAI, LangChain, LangGraph.

**Cloud:** AWS, Azure, Docker, CI/CD pipelines.

**Programming:** Python, SQL, FastAPI, Git.

**Data:** SQL, NoSQL (MongoDB, Redis), context management, token optimization, retrieval metrics.

**Interests:** Generative AI, multi-agent systems, open-source LLM deployment, software architecture, system design.