

Patrick Selamy

New York, NY | (210) 704-7370 | pselamy@gmail.com | selamy.dev | linkedin.com/in/patrickselamy | github.com/pselamy

Staff Backend Engineer / Distributed Systems, Platform Infrastructure, and Production AI

Summary

Staff backend engineer focused on distributed systems, platform infrastructure, production APIs, data workflows, and reliable cloud services. Former Meta and Google engineer with experience across high-scale product systems, regulated backend platforms, developer tooling, and AI-agent infrastructure. Strongest implementation depth is Python and Java, with TypeScript-capable delivery, AWS/cloud platform experience, and practical production ownership from design through deployment, observability, debugging, and iteration.

Selected Backend, Infrastructure & AI Platform Portfolio

Distributed Backend Systems, APIs & Cloud Infrastructure

- Built backend, cloud, healthcare, and regulated systems across Google, Meta, Citi, ClearDATA, and Lumeris, emphasizing reliable APIs, access controls, data workflows, and maintainable platform services.
- At Meta Marketplace, expanded third-party partner APIs and shipped-listing workflows for partner and seller-facing commerce systems.
- Shipped an ML-assisted listing flow that removed manual item-weight entry for shipped listings; evaluated predictions against user-entered weights and carrier actuals, met the launch threshold near 80% accuracy, and lifted new-listing creation about 8%.

Production AI, Agent Infrastructure & Operational Reliability

- In Google Cloud Office of the CTO, built Gemini-based software-engineering agents, SWE-bench evaluation harnesses, planning-vs-execution metrics, and vector-search benchmarks.
- Designed multi-step agent orchestration with stateful task decomposition, retries, failure recovery, tool routing, scheduling, credential boundaries, and CI-backed verification for production workflows.
- Instrumented agent and platform systems with traces, metrics, logs, latency/error tracking, and operational gates so production behavior is visible and failures are recoverable.

Experience

Meta, Software Engineer

New York, NY | 2025 to 2026

- Expanded Facebook Marketplace third-party partner APIs and shipped-listing workflows for partner and seller-facing commerce.
- Shipped an ML-assisted listing flow that removed manual item-weight entry for shipped listings; predictions were evaluated against user-entered weights and carrier actuals, met the launch threshold near 80% accuracy, and lifted new-listing creation about 8%.

Google, Software Engineer

Pittsburgh / Austin / Remote / Atlanta | 2018 to 2025

- Worked across Google Shopping (Engineering Productivity), Google Play, Google Cloud Office of the CTO, and Internal Identity and Access Management.
- In Google Cloud Office of the CTO, built early agentic-coding systems: a Gemini-based software-engineering agent, SWE-bench eval harnesses, and planning-vs-execution metrics that guided funding and staffing; benchmarked vector-search frameworks at scale (ScaNN, FAISS, pgvector) to position GCP's AI competitively.
- In Google Play, helped build [Play Games Leagues](#) from the ground up on a five-engineer team and designed a configurable fuzzer for third-party Play APIs.
- Built Insider Risk systems for internal security, enterprise identity, and trust-sensitive access.

Earlier, Backend / Platform / Healthcare Engineering

Citi, Lumeris, ClearDATA, and others

- Built backend, platform, cloud, and healthcare systems in Python and Java across APIs, data workflows, and regulated environments.

Selected Systems & Public Work

- [Public agent-skills](#): reusable agent procedures, authoring patterns, and an MCP-vs-skills framework.
- [Operating Agent Fleets](#): an evidence-backed field guide for durable agent systems and bounded authority.
- [polymarket-insider-tracker](#): a Python tool that flags suspicious wallet activity on Polymarket prediction markets.
- AI instructor and speaker: led an [Ayiti AI](#) bootcamp session on MCP, AI-assisted coding, and deployment, and [addressed lawmakers on AI policy](#) at the NHAEON National Leadership Summit.

Technical Skills

Languages:	Python, Java, Kotlin, JavaScript/TypeScript, Hack, PHP, Bash, SQL
AI / Agent Systems:	AI agents, skills/playbooks, MCP-style tools, tool calling, evals, agent harnesses, autonomous coding loops, context engineering, RAG, model routing, secure tool execution, state management
Product & Systems:	API design, backend platforms, distributed systems, workflow orchestration, product metrics, experimentation, launch analysis, developer infrastructure
Security & Enterprise:	internal IAM, auth boundaries, insider-risk systems, credential brokering, trust-sensitive workflows, privacy/security review gates
Infrastructure:	Kubernetes, OpenTofu/Terraform, Argo CD, Docker, Linux, GitHub Actions, Actions Runner Controller, CI/CD, observability, multi-cloud
Data & Cloud:	PostgreSQL, Redis, Kafka, InfluxDB, Google Cloud, AWS