

# Anthony James Padavano

STAFF+ SOFTWARE ENGINEER (AGENT INFRASTRUCTURE & STATE)

New York City | 561-602-7300 | padavano.anthony@gmail.com

## LINKS

[Portfolio](#) · [GitHub](#) · [agentic-titan](#) · [ORGANVM System](#)

## PROFILE

Independent systems architect and software engineer building production-grade infrastructure for autonomous AI orchestration and resilient state management. Creator and sole architect of a 103-repository ecosystem across 8 GitHub organizations governed by automated validation, 94 CI/CD pipelines, and 2,349+ tests. Specialist in architecting secure, multi-tenant execution environments and durable execution patterns for long-running, multi-step agentic workflows. Expert in "solo production at institutional scale," utilizing an "AI-conductor" methodology to maintain technical integrity while building the scannable "Storefront" layers for connected agent intelligence. Full-Stack Developer (Meta). 18 years professional experience. LGBTQ+.

## TECHNICAL SKILLS

Distributed Systems · Agentic State Management · Cloud Native (GCP/AWS) · Python · Go · Rust · Docker · Kubernetes · CLI Tooling · GitHub Actions · CI/CD · Zod · pytest · Vitest · Claude Agent SDK · YAML/JSON Schema · React 18 · pnpm Monorepos · GCP / Terraform · WebSocket · Redis · Nginx · D3.js · p5.js

## SELECTED PROJECTS

### agentic-titan — Multi-Agent Orchestration & State Framework

TypeScript framework for orchestrating complex, multi-step engineering tasks across autonomous agents. Includes 18 development phases and 1,276 tests. Engineered for high-reliability tool invocation, task decomposition, and durable state management across failure boundaries.

### ORGANVM Eight-Organ System — 103-Repository Autonomous Infrastructure

A unified technical corpus encompassing 21K code files and 3.6K tests. Governed by a formal promotion state machine and automated dependency validation (43 edges). Features 128 GitHub Actions workflows built on 18 reusable templates. A live demonstration of how institutional-scale autonomous infrastructure can be managed by a solo practitioner.

### agent--claude-smith — Claude Agent SDK Reliability Layer

Advanced agent implementation built on Claude Agent SDK. Features session persistence, self-correction hooks, and structured tool invocation designed to ground AI agency in real-world infrastructure and stateful workflows.

### Application Pipeline — Systems Analysis & Workflow Suite

Python-based CLI suite for pipeline orchestration: 8-dimension scoring rubric and YAML-driven state machine. Automates intake, research, and synthesis tasks, translating deep technical evidence into scannable storefront materials for agentic evaluation.

### Portfolio — Performance-Grade Documentation Site

Astro 5 site governed by a CI/CD "quality ratchet" that enforces strict validation and testing standards. Represents the scannable "Storefront" for 42 published essays (~142K words) documenting the frontier of AI orchestration.

## EXPERIENCE

### Independent Software Engineer & Infrastructure Architect

2020 — Present

- Agentic State Management:** Designed a 103-repository system governed by a formal promotion state machine and automated validation; treating state persistence and recovery as a core architectural primitive.
- Infrastructure Reliability:** Built a corpus of 2,349+ tests across 94 active repositories, ensuring technical integrity in complex, multi-tenant developer tooling and agentic systems.
- AI-Native Automation:** Developed multi-agent frameworks using the Claude Agent SDK featuring structured tool invocation and self-correction protocols for autonomous engineering.
- Governance at Scale:** Orchestrated 128 GitHub Actions workflows built on 18 reusable templates to maintain production reliability and minimize state-friction across 8 independent organizations.

### Instructor — Composition, Writing & Complex Systems

2015 — Present

*Miami Dade College, Keiser University, Nova Southeastern, FAU, Young Harris, Tarrant County, Broward, Palm Beach State*

- 100+ courses across 8 institutions; 2,000+ students. Translating complex technical and architectural concepts into accessible documentation and mentoring junior developers in technical rigor.

### Digital Marketing Manager & Narrative Strategist

2023 — 2024

*Miami Dade College Foundation (nonprofit)*

- Architected foundation website overhaul and campaign design, utilizing data analysis to drive a 32% increase in donor engagement through technical execution.

### Multimedia Specialist

2011 — 2020

*AJP Media Arts — clients incl. Boca Ballet Theatre, Forward Funding, Arts in Boca*

- Produced high-volume visual and narrative campaigns; generated 17.5M+ views through technical and creative production.

## EDUCATION

**M.F.A. Creative Writing**, Florida Atlantic University

2015 — 2018

**B.A. English Literature**, CUNY College of Staten Island

2010 — 2014

**CERTIFICATIONS** Full-Stack Developer, Meta (2024) · UX Design, Google (2023) · Digital Marketing, Google (2023) · Project Management, Google (2023)