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NICOLÁS HERNÁNDEZ

Full legal name: Nicolás Mateo Hernández Rojas

PROFESSIONAL SUMMARY

Senior Backend Engineer and Feature Architect with 6+ years designing, building, and owning production backend services. I lead technical design and delivery for a regulated mental health platform, working across teams of 4 to 8 engineers and partnering directly with Product on scope and sequencing. Mentoring engineers and raising the team's review and architecture standards is a core part of how I work.

My work centers on service and API design, relational data modeling, and event-driven architecture, with correctness and observability built in rather than added later. I also build the tooling and automated workflows my team uses to work alongside AI coding agents.

AI ENGINEERING EXPERIENCE

- Build internal tooling and automated workflows on top of multiple agent CLIs (Claude Code, OpenAI / Codex) to standardize how the team delegates work and verifies the results.
- Run automated review flows: an agent-driven first pass on GitHub pull requests, checked against versioned agent convention files that keep architecture cohesive across AI-heavy projects, with human review before merge.
- Integrate agentic capabilities into product platforms using AWS Bedrock and AgentCore to automate operational and data processing workflows.
- Optimize token budgets, per-task model selection, and context management to keep agent workflows predictable in cost and reliable in output.
- Maintain custom subagents, reusable skills, and machine-executable specifications so recurring work runs consistently and can be verified automatically.

EXPERIENCE

Keel Mind, Canada (Remote) | *Feature Architect*

March 2024 - PRESENT

- Lead technical design and delivery across backend, web, mobile, and QA teams of 4 to 8 engineers.
- Design and maintain Node.js / TypeScript services (NestJS, Fastify) in Docker for a mental health platform that has delivered 200k+ sessions to 85k+ clients and continues to scale.
- Own PostgreSQL modeling for core domains: schema design, migrations, indexing, and query tuning for session, reporting, and analytics workloads.
- Build event-driven processing on AWS with Lambda, SQS, and S3 to power the notifications system and keep recording, transcription, and post-session analysis off the request path.
- Instrument services with structured logging and metrics in Elasticsearch and Kibana, plus the dashboards and alerts the team uses to diagnose production issues.
- Engineer ML-driven data pipelines and integrate third-party AI services, tuning prompts, token usage, latency, and cost.
- Partner with Product to define scope, evaluate tradeoffs, and sequence delivery.
- Raise quality through architecture reviews, code reviews, documentation, and mentoring.

Keel Mind, Canada (Remote) | *Senior Software Engineer*

June 2022 - March 2024

- Built backend services and administrative tooling in TypeScript and Node.js, backed by PostgreSQL schemas, migrations, and queries.
- Designed REST and GraphQL APIs for web and mobile clients serving first responder, Indigenous, academic, and education care programs.
- Built payment, calendar, and distributed scheduling integrations, handling asynchronous processing, webhook retries, and idempotency.
- Deployed and operated services on AWS (Lambda, S3, RDS) with automated tests and CI checks gating releases.
- Mentored engineers through code reviews, technical guidance, and knowledge sharing.

Compras Compartidas, Colombia | *Senior Software Developer*

September 2020 - June 2022

- Owned the public REST API used by 50 to 200 partner stores each month, including its data contracts and PostgreSQL model.
- Built backend services, integrations, and operational tooling in Node.js and Python.
- Instrumented customer funnels with Google Analytics and used the results to guide technical and product decisions with business stakeholders.
- Designed core architecture and features for mobile and web applications in Flutter and React.

Meniu, Colombia | *Full Stack Developer*

June 2019 - October 2020

- Built and deployed backend services and APIs for a platform used daily by 200+ restaurants across Colombia's main cities, where partners ran 10% to 40% of their daily sales through the product.
- Designed and implemented the cloud infrastructure for a growing startup environment.
- Delivered mobile and web interfaces for daily order and customer management.
- Worked with SQL and NoSQL databases, Docker, and CI/CD pipelines to improve reliability and deployment consistency.

EDUCATION

Universidad de los Andes, Colombia | Bachelor of Science in Systems and Computing Engineering

JANUARY 2015 - DECEMBER 2019

Universidad de los Andes, Colombia | Bachelor of Science in Industrial Engineering

JULY 2014 - DECEMBER 2019

SKILLS

Backend: TypeScript, Node.js, NestJS, Fastify, Python, REST API Design, GraphQL, Webhooks, Microservices, Event-Driven Architecture, Notification Systems, Asynchronous Processing

Data: PostgreSQL, Relational Data Modeling, SQL, Migrations, Query Optimization, MongoDB, Redis, ETL Pipelines

Cloud & DevOps: AWS (Lambda, SQS, S3, RDS, API Gateway, Fargate), Docker, CI/CD, Distributed Systems, Cloud Architecture

Observability: Elasticsearch, Kibana, Structured Logging, Metrics & Dashboards, Alerting, Google Analytics

AI Engineering: Claude Code, OpenAI / Codex CLI, Agentic Development Workflows, Automated AI-Assisted Code Review, AWS Bedrock, AgentCore, LLM API Integration, Context Management, Token and Model Usage Optimization

Practices: System Design, Automated Testing, Code Review, Technical Documentation, Agile / Scrum, Mentoring, Feature Ownership

Languages: English (Advanced, Professional Proficiency), Spanish (Native)