Santiago Flores Larrondo

s.flores.l@outlook.com | +52 (55) 4353 3431| LinkedIn | GitHub

Full Stack Software Engineer at Mexico's Central Bank, building high-scale financial systems. Expertise in architecting scalable backend APIs, optimizing data pipelines, designing and implementing modern user experiences.

Professional Experience

Software Engineer | Banxico (Mexico's Central Bank)

March 2025 – June 2026 | Mexico City, MX

Building internal and external platforms supporting research, credit operations, and controlled data access.

- Scaled filtering to support 1,000+ concurrent records/request in financial data access platform
- Contributed to building RESTful APIs and database layers designed for fault tolerance and 99.9% uptime SLA
- Implemented automated reporting pipelines using SQL views, improving data accuracy by 40% and eliminating manual workflows
- Diagnosed and resolved critical production issues across application code, ETL pipelines, and database layers
- Collaborated with senior leadership on technology roadmap for modernizing internal systems

Tech: Java, Spring Boot, SQL, Pentaho, Vaadin, React, Material UI, Python, Oracle, MySql

Co-Founder & Software Engineer | Guza & Larrondo Solutions

January 2025 – Present | Mexico City, MX (Remote)

- Co-founded technology consulting studio building custom software solutions for consultants, medical professionals, and independent artists
- Architected, implemented and deployed 3+ production sites
- Conducted client discovery interviews, translated requirements into proposals, designed and implemented UX

Tech: React, TypeScript, JavaScript, Node.js, PostgreSQL, Material UI, Claude Agentic Workflows

DevOps Intern | Nasdaq

September – December 2024 | Mexico City, MX

- Reduced ticket resolution time by 20% through systematic root-cause analysis of JVM performance issues
- Automated deployment and maintenance processes; reduced execution time from 3 hours to seconds
- Developed technical onboarding documentation for new team members

Tech: Java, JVM, Python, Unix/Shell, Calypso

Education

Master of Science in Information Systems (MSIS) | **University of Washington** | Seattle, WA

Summer 2026 – Summer 2027 | Coursework: Distributed Systems, Cloud Computing, Data Engineering, Machine Learning

Bachelor of Science in Computer Engineering | **Instituto Tecnológico Autónomo de México (ITAM)** | Mexico City, MX

Fall 2020 – Spring 2024 | Graduated with Honors | 75% Academic Excellence Scholarship | Multiple Top GPA Awards

Projects

Polyrhytmia: AI-Powered Musical Beat Generation (2024-2025)

Developed 3 progressive deep learning models (stacked LSTM); integrated MIDI synthesis and real-time audio rendering; validated through Turing-style evaluation with musicians.

Tech: Python, TensorFlow, LSTM, MIDI, Audio Processing

Scalable NoSQL ETL Pipeline: Movie Database Analytics (2023)

Built ETL pipeline ingesting TMDB API (500K+ records) into MongoDB, Cassandra, and Neo4j; containerized with Docker; achieved 40% query time reduction

Tech: Python, MongoDB, Cassandra, Neo4j, Docker

Technical Skills

Backend: Python, Java, C #, Spring Boot, Node.js, RESTful APIs, ORM
Frontend: JavaScript, React, TypeScript, Material UI, Responsive Design
Database: PostgreSQL, MongoDB, Cassandra, Neo4j, Oracle, MySQL, SQL
Cloud & DevOps: Docker, SVN, Git, Azure, CI/CD
Data & ML: pandas, NumPy, ETL, TensorFlow, LSTM