

Antonio Vargas Ortiz

+57 310 668 87 91 • antoniocvargaso@gmail.com • antoniocvargaso.dev • Bogotá DC, Colombia

Master's degree in Software Engineering from the International University of La Rioja to enhance the strategic impact of developing innovative solutions. Senior Systems Engineer with over 12 years of experience developing distributed and strategic solutions. Specialized in Java, Python, AWS, and web technologies, with knowledge in Go, SQL and NoSQL databases, JavaScript, TypeScript, Angular, React, CI/CD, Docker, and Jenkins. Experience leading multidisciplinary teams in sectors such as finance, retail, and healthcare, with a focus on digital transformation and fraud prevention. Technical skills applied to the design, implementation, and optimization of technology projects. Skills in analytical capacity, leadership, problem-solving, and initiative.

SKILLS

Technical Leadership

Software Architecture

Cloud Computing

Backend Development

Technology Integration

DevOps & CI/CD Systems

Systems

Java, Python, Go, Angular, React, JavaScript, Sprint boot, AWS, Azure, SQL, NoSQL, Git, Scrum

Languages

Native Spanish

Intermediate English (B1)

PROFESSIONAL EXPERIENCE

klanik Colombia

Bogotá, Colombia

Lead FullStack Java Developer

10/2025 - Currently

Design and develop solutions for the client Amadeus, on their gateway solution for integration with different airlines using **Java 21**, implemented with **Docker** and **Kubernetes** as a distribution system, using **Quarkus** as a communication system, **unit test**, and **hexagonal architecture**.

- **Led the design and development of integration solutions for the Amadeus gateway**, enabling efficient communication with various global airlines through an architecture based on **Java 21 and Quarkus**.
- **Designed the system architecture following the Hexagonal pattern (Ports & Adapters)**, ensuring total decoupling between business logic and external integrations, which simplified maintenance and scalability.
- **Optimized service distribution and resilience using Docker and Kubernetes**, guaranteeing an elastic infrastructure capable of handling high volumes of transactional requests from the aviation industry.
- **Reduced technical debt and production errors by implementing a comprehensive Unit Testing strategy**, ensuring code coverage exceeding [X]% across critical integration workflows.
- **Implemented high-performance communication strategies with Quarkus**, leveraging native compilation capabilities to minimize response times and resource consumption in distributed cloud environments.

Certero Soluciones digitales
Software Architect (Freelance)

Bogotá, Colombia
04/2025 - 10/2025

Design and develop the cloud-agnostic electronic invoicing **solution architecture with hexagonal architecture**, using **Java 21, Spring Boot with webflux, Docker and Kubernetes**, implementing queues in **RabbitMQ**, on distributed systems, complying with DIAN regulations.

- **Led the design and deployment of a cloud-agnostic electronic invoicing architecture** using Java 21 and Spring Webflux within a distributed systems framework, ensuring 100% compliance with DIAN's technical regulations.
- **Designed the asynchronous messaging and system resilience strategy using RabbitMQ**, implementing design patterns that enabled the decoupling of critical services and efficient management of transaction bursts during peak fiscal reporting periods.
- **Optimized solution scalability and availability through Docker and Kubernetes orchestration**, ensuring portability across cloud providers and eliminating infrastructure vendor lock-in risks for the company.
- **Reduced electronic document processing times from minutes to milliseconds** by implementing non-blocking reactive programming and data flow optimization strategies for digital signature validations.
- **Implemented the continuous integration and continuous deployment (CI/CD) lifecycle** for reactive microservices, integrating automated testing and controlled deployments within high-complexity technical environments.

Logika evolución empresarial
Chief Technology Officer (CTO)

Bogotá, Colombia
12/2024 - 04/2025

Define and execute technology strategies aligned with the company's objectives, focusing on the adoption of emerging technologies and delivering value. My responsibilities include designing cloud software architectures (primarily Microsoft Azure), ensuring the scalability and maintainability of solutions under Clean Architecture and SOLID principles. Additionally, I ensure business continuity through alert tracking and incident resolution, and optimize development workflows by managing CI/CD pipelines with GitHub Actions. I oversee the development team and review implementations to maintain high standards of technical quality and efficient delivery to production.

- **I led** the definition and implementation of the migration strategy for a business-critical monolithic service to a distributed microservices architecture, initially consisting of five distinct services, using Azure API Management as a unified delivery gateway.
- **I designed** the integration strategy for artificial intelligence agents in core business processes, with the aim of optimizing operational efficiency and automating key tasks.
- **I reduced** request latency from over 30 seconds to under 3 seconds by implementing application performance improvement strategies at the database, request, and code levels.
- **I implemented** the continuous development and deployment lifecycle, with Github Actions and Microsoft Azure for Java 21 and React projects using Docker.

Valid sucursal Colombia
Development Technical Leader

Bogotá, Colombia
07/2023 - 12/2024

Lead the development and operation of technical products, ensuring their quality and efficiency throughout their lifecycle. My role included managing CI/CD with Jenkins and GIT, technical oversight of

development teams, and reviewing pull requests. I was also responsible for the architecture of cloud solutions on AWS, applying Clean Architecture and SOLID principles, and collaborated with management to align technical decisions with the company's financial and strategic objectives.

- **I closed** technical debt at the HU level with a 10% saving on the initially estimated time, after a delay of more than 8 months in delivery.
- **I increased the average** service TPS performance from 10 to 15.
- **I led** the migration of client solutions from Java 8 to Java 17.
- **I led** the sanitization of products, reducing technical debt from 3rd party library vulnerabilities to 0%.
- **I lead** the migration of ECS technology on AWS from EC2 to FARGATE.
- **I designed and planned** a strategy for centralized use of AWS Cognito authentication tokens to reduce monthly billing costs.

D-local Colombia SAS
Senior Software Developer II

Bogotá, Colombia
07/2021 - 06/2023

As a Senior Software Developer II at D-local Colombia, I focused on the design and development of RESTful microservices using Python (FastAPI, Flask), Go, and Java (Spring Boot) in high-availability cloud environments on AWS. I was responsible for ensuring software quality, security, and proper operation in production through monitoring with tools such as New Relic and Kibana. Additionally, I contributed to the implementation of CI/CD solutions with GitHub, Jenkins, and CloudFormation, ensuring that the solutions complied with Clean Architecture and SOLID principles.

- **I reduced** API response time by 50% by optimizing the architecture and implementing caching.
- **I automated** the deployment process using Jenkins, reducing time to market by 30%.
- **I implemented** a complete testing strategy, including unit, integration, and end-to-end tests, improving software quality.
- **I migrated** an AWS Lambda application to an ECS service, applying SOLID principles, with shared memory cache integration, Redis, and Dynamo as the database, improving response time from 2-3 seconds to less than 1.5 seconds at the 98th percentile.
- **I integrated** with the Microsoft Dynamics 365 fraud protection service, using secure retry techniques and circuit breaker.

Colegios de Colombia SAS
Desarrollador full stack Senior

Bogotá, Colombia
11/2020 - 07/2021

As a Senior Full Stack Developer at Colegios de Colombia, I was responsible for the design and development of a technology platform for enrollment management and academic processes. My work included full-stack development with Java 8 and Angular 9, and the use of serverless services on AWS such as Lambda, API Gateway, and Cognito for authentication. I also managed the company's AWS infrastructure and oversaw the quality of services from external technology providers, actively participating in requirements engineering.

- **Designed and developed** application for payments and enrollment management with integration to an online, decentralized payment gateway.
- **I integrated** the solution's login through Cognito and GCP for delegated session control, allowing login with the corporate Google user.
- **I contributed** to the optimization of cloud resources, resulting in a 5% reduction in the company's monthly AWS billing.
- **I gathered** functional and non-functional requirements for the design and development of the enrollment and schedule control application.

Dispapeles SAS
Analista de sistemas Senior

Bogotá, Colombia
05/2017 - 11/2020

As a Senior Systems Analyst at Dispapeles, I specialized in the design and development of web portals for accounts payable and receivable solutions in the area of electronic invoicing. I worked with cloud architecture on AWS, integrating services such as SNS, SQS, RDS, and SES, and ensuring compliance with ISO 27001 and ISO 9000 standards. In addition to bug fixes and system operations, I led and mentored teams of junior developers, improving customer confidence and response times.

- **I developed** a system for receiving electronic invoices via email or mail server, integrating into a dynamic workflow that simulates the accounts payable processes of all our clients, aligned with ISO 27001 on AWS cloud architecture.

- I led development teams for portals, 4 different portals, a team of 4 to 9 junior developers. Achieved recovery of client confidence in response times and improvement in web portal performance.
- I supported as a consultant for a strategic client in the design and development of their own accounts payable solution, with company authorization.

Millenium BPO

Bogotá, Colombia

Ingeniero Desarrollador Java Senior

05/2016 - 05/2017

As a Senior Java Developer at Millenium BPO, I focused on the design and development of web applications using Java. My work focused on frameworks such as GWT and JSF 2, and build tools like Maven and Ant, always adhering to ITIL best practice principles to ensure software quality and efficiency.

- I recovered the account with a strategic client for the company, optimizing response times regarding new requests and bugs.
- I designed and developed the response module for PQRS (Petitions, Complaints, Claims, Suggestions) through notification email reading.
- I optimized the proprietary solution for quality control and auditing, reducing bugs by 70% and decreasing response latency by 60%.

Softtek Renovation

Bogotá, Colombia

Ingeniero Consultor Java

05/2015 - 05/2016

As a Consulting Engineer at Softtek Renovation, I specialized in developing web applications with Java, using frameworks such as RichFaces, JSF 2, and PrimeFaces. My responsibilities included code optimization, data model design, and the application of ITIL standards to ensure the efficiency and quality of the solutions.

- I developed HUs (User Stories) requested by the client, on time and in optimal form.
- I delivered the prenatal follow-up process to the client.
- I designed end-to-end test cases.

DB System

Bogotá, Colombia

Ingeniero Consultor Java

10/2014 - 04/2015

As a Java Consulting Engineer at DB System, I developed web applications using Java, JSF 2, and PrimeFaces, with SQL Server as the database. My responsibilities included code optimization and data model design, applying ITIL standards and working under the Scrum methodology.

- I optimized client processes with Oracle functions.
- I delivered a module for authorization of land for mining exploitation.
- I developed an internal solution for managing worked hours.

Coljuegos EICE

Bogotá, Colombia

Desarrollador Java

08/2013 - 10/2014

As a Java Developer at Coljuegos EICE, I developed web applications using Java. My responsibilities included code optimization, data model design, and implementation of ITIL standards, working with SQL Server, JSF 2, and PrimeFaces.

- I **developed** the SIITO application for online generation of reports on electronic gaming machine (MET) registrations.
- I **received** the SIICOL application as a BPM tool for business management.
- I **supported** the implementation of ISO 27001 and ISO 9000 certifications.

IngSoft Colombia

Desarrollador Java

Montería, Colombia

12/2012 - 07/2013

As a Developer at IngSoft Colombia, I developed custom applications using a variety of technologies, including Java, Python (Django), and C++. My responsibilities also included requirements engineering, which allowed me to participate in eliciting and analyzing client needs for the design of data models and databases.

- I **developed** software for managing customer lodging.
- I **optimized** automotive fleet oil change processes, increasing satisfaction of the user receiving the services.

Agroinsumos la Central SAS

Desarrollador Java

Montería, Colombia

12/2009 - 10/2011

As a Developer at Agroinsumos la Central, I was responsible for the design and development of an application for inventory management and invoicing. I used technologies such as Java 5, PostgreSQL, and JPA, in addition to implementing tests with JUnit and generating reports with JasperReports.

- **Designed** and developed the application for invoice generation and inventory management, thus allowing migration from a manual process to a semi-automated and digital process.

EDUCACIÓN

Universidad internacional de la Rioja

University Master's Degree in Software Engineering

La Rioja, España

In progress

Universidad Piloto de Colombia

Diploma in Project Management

Bogotá, Colombia

2015

Universidad de Córdoba

Systems Engineer

Montería, Colombia

2006 - 2013

COURSES AND CERTIFICATIONS

UDEMY

Spring Boot Web desde 0

Virtual

2024

UDEMY

AWS CloudFormation - Infraestructura como código

Virtual

2024

UDEMY

Guía Completa JUnit y Mockito incluye Spring Boot Test

Virtual

2023

UDEMY

Virtual

Aprende a diseñar una API RESTFul

2022

UDEMY

Git, un enfoque práctico

Virtual

2022

UDEMY

DevOps con docker, Jenkis, Kubernetes, git, gitflow CI y CD

Virtual

2022

UDEMY

AWS Básico

Virtual

2021

UDEMY

GIT y GITHub

Virtual

2021

REFERENCES AVAILABLE UPON REQUEST