

COMPANY

# CASE STUDY

## Overcoming Jenkins Scalability Challenges with Avyka and Harness

### Background

The client, a leading financial services company, had relied on Jenkins as its DevOps orchestration platform for eight years. While Jenkins initially met their needs, the platform struggled to keep up as the company's application development efforts scaled.

As DevOps demands grew, maintaining Jenkins became increasingly resource-intensive, costly, and operationally unsustainable. The organization needed a modern, scalable solution to improve governance, streamline operations, and reduce infrastructure costs.

After evaluating alternatives, the company selected Harness for its cost-efficiency, automation capabilities, and ease of governance. Avyka partnered with the client to ensure a structured migration, optimizing their DevOps workflows while minimizing disruption.

### Understanding the Challenges

As the company's development efforts scaled, managing Jenkins became increasingly complex and unsustainable. Key challenges included:

#### OBJECTIVES

##### ✓ Cumbersome Maintenance Work

Keeping Jenkins, its plugins, and the underlying OS up to date required dedicated resources, turning platform upkeep into a full-time operational burden.

##### ✓ Expensive and Impractical Scaling

Jenkins' high resource consumption forced the company to continually increase AWS compute capacity to maintain stability, leading to escalating cloud costs.

##### ✓ Unsustainable Operations

Years of unstructured pipeline development resulted in a disorganized Jenkins environment with inconsistent implementation practices and minimal governance. Managing the platform relied on tribal knowledge rather than standardized processes, making administration inefficient.

To maintain agility and cost-effectiveness, the company needed a scalable, well-governed DevOps platform that would eliminate these inefficiencies while improving developer productivity.

### Engineering the Solution with Avyka and Harness

Avyka partnered with the client to execute a structured, four-phase migration approach that minimized disruptions while optimizing workflows.

#### SOLUTION

Avyka's methodology included:

##### Assess

Conducted a comprehensive analysis of existing Jenkins pipelines, dependencies, and integrations to define a migration strategy and success criteria.

##### Pilot

Migrated a small, low-risk pipeline to Harness, validated its functionality, and gathered stakeholder feedback.

##### Migrate

Transitioned all Jenkins pipelines to Harness in phases, optimizing workflows and leveraging Harness-native automation capabilities.

##### Optimize

Fine-tuned platform performance, strengthened governance, implemented cost controls, and fully decommissioned Jenkins.

By following this structured approach, Avyka ensured a seamless migration, reducing operational complexity while enabling scalability, automation, and cost efficiency.

### VALUE DELIVERED

After migrating to Harness, the company achieved significant improvements in several key areas:



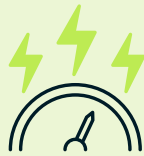
#### Lower Total Cost of Ownership (TCO)

Despite being open-source, Jenkins' high maintenance and scaling costs—particularly labor and AWS resources—surpassed the investment in Harness.



#### Improved Consistency

Harness templates and the Internal Development Portal (IDP) standardized pipeline development, improving consistency and control.



#### Increased Team Efficiency

Migration reduced maintenance overhead, enhancing visibility and boosting sprint velocity by 15%.

### Key Takeaways

By migrating from Jenkins to Harness, the company successfully overcame scalability and governance challenges, delivering:

- ✓ A cost-effective DevOps platform with lower operational overhead.
- ✓ Enhanced consistency and transparency across pipelines.
- ✓ A more efficient development process, with improved sprint velocity and less time spent on maintenance.

### ABOUT AVYKA

Avyka is a dedicated system integrator specializing in harnessing the full potential of Harness to revolutionize cloud infrastructure and enhance DevSecOps practices. Our mission is to drive business agility, foster innovation, and ensure seamless integration across every stage of your software delivery lifecycle.