

COMPANY
CASESTUDY

Optimizing DevOps Governance & Security: Migrating from CloudBees to Harness with Avyka

Background

The client, a leading technology company, relied on CloudBees as its primary DevOps orchestration platform due to its alignment with the team’s deep Jenkins expertise. CloudBees initially provided a familiar and scalable solution; however, several platform limitations emerged as the organization sought to enhance governance, security, and operational efficiency.

To overcome these challenges, the company needed a modern DevOps platform that would streamline governance, simplify security integration, and reduce operational bottlenecks. After evaluating alternatives, the company selected Harness for its robust governance framework, sustainability features, and automation capabilities. Avyka partnered with the client to ensure a seamless migration, optimizing their DevOps workflows while maintaining governance and security best practices.

Understanding the Challenges

As the company matured its DevOps approach and implemented stricter governance and security policies, several limitations within CloudBees became apparent:

OBJECTIVES

- ✔ **Limited Role-Based Access Control (RBAC)**

CloudBees lacked fine-grained access controls, making it challenging to enforce least-privilege access. As a result, routine tasks—such as promoting artifacts from development to QA—required excessive escalations and ticketing, slowing down engineering workflows.
- ✔ **Complex Upgrade Process**

Upgrading CloudBees Core posed a risk of introducing breaking changes, requiring extensive pre-update testing. This transformed routine platform maintenance into a time-consuming, release-like process.
- ✔ **Fragmented Security Framework**

CloudBees did not offer native security scanning, forcing the team to integrate multiple third-party tools for vulnerability detection in code, images, and dependencies. This increased complexity and operational costs.

To address these challenges, the company sought a more scalable and governance-friendly DevOps solution to reduce manual overhead while maintaining security and compliance.

Engineering the Solution with Avyka and Harness

Using Avyka’s structured Jenkins migration framework, the team executed a seamless transition while implementing key governance and efficiency enhancements:

SOLUTION

Leveraged Avyka’s Jenkins Migration Process to migrate existing CloudBees pipelines onto the Harness platform with minimal disruption.

Comprehensive RBAC Configuration

Established a hierarchical role-based access control (RBAC) structure, ensuring permissions aligned with organizational roles while reducing dependency on manual escalations.

Governance Workflow Automation

Integrated approval stages within Harness pipelines, enabling automated notifications and requiring stakeholder authorization for key deployment steps, eliminating reliance on manual support requests.

Templatized CI/CD Pipelines

Standardized and templatized repeatable workflows, enhancing developer efficiency and enforcing governance without adding unnecessary approval bottlenecks.

Native Security Integration

Implemented a shift-left security approach using Harness Security Test Orchestration (STO), consolidating security scanning within the CI/CD process and eliminating the need for multiple third-party security tools.

VALUE DELIVERED

Over four months, the company transitioned from a manual, support-heavy DevOps model to a fully automated, governance-driven approach. By leveraging Harness and Avyka’s expertise, the organization achieved:



65% Reduction in DevOps Support Tickets

Engineers gained self-service capabilities, significantly reducing requests for job executions and artifact promotions.



Retirement of Three Enterprise Security Tools

Consolidated security scanning with Harness Security Test Orchestration (STO), eliminating redundant third-party tools and reducing costs.



35% Faster Approval Times

Automated approval gates streamlined governance, reducing time-to-resolution (TTR) compared to manual support requests.

Key Takeaways

By migrating from CloudBees to Harness, the company successfully enhanced its DevOps governance, security, and automation without compromising efficiency. Avyka’s expertise in DevOps modernization enabled the client to:

- ✔ Implement a scalable, governance-friendly DevOps framework.
- ✔ Reduce reliance on manual escalations and support requests.
- ✔ Strengthen security posture while optimizing costs.

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.