perspecta™

DevCloud framework

Pluggable reference implementation to jumpstart development

IT organizations are charged with modernizing infrastructure, migrating to cloud, and developing and implementing software and solutions quickly, efficiently and securely—starting with industry best practices and adapting to what works efficiently in the organization. And while the benefits of DevSecOps are obvious, realizing these benefits can be daunting—especially when you don't know where to start. Imagine being able to deploy an entire computing environment with your choice of reference applications and best practice workflows.

Perspecta's DevCloud can get you there. Our mature, proven and robust framework can jumpstart development projects with industry best practices built in. No more needing to stay on top of the latest tools or determining whether one tool works with the other. The pluggable DevSecOps reference implementation brings together

the industry's leading and latest tool set into an accessible and centralized digital space, while ensuring relevance and interoperability. Additionally, DevCloud re-factors complex code of common IT aspects—management, operations, support and infrastructure—so the individual project can uniquely focus on its primary business functionality, and leave undifferentiated heavy lifting to us. On top of that, DevCloud is designed to fit any environment.

How does it work?

Our framework utilizes compute resources from different sources (on premise, Infrastructure as a Service (IaaS), Platform as a Service (PaaS), etc) to provide sufficient compute power with elasticity and durability using Kubernetes container technology and layering pre-integrated DevSecOps functionality out of the box. It leverages existing investments, best-of-breed tooling

and provides a scalable and flexible pathway forward as requirements and standards evolve.

Functionality overview

- Centralized development management
  - Integrated project development and support management tools (JIRA, RallyDev, ALM, etc.)
  - Document sharing and corporate knowledge management (Confluence, SharePoint, etc.)
  - User and team management (AD, LDAP, etc.)
- Centralized build/test/deploy orchestration for continuous integration and continuous delivery pipeline (Jenkins, Bamboo, etc.)
- Centralized repository management for binary repository (Nexus, Artifactory, etc.), as well as source code management repository (Git, Team Foundation, etc.)
- Supports integrated enterprise code viewing tools (FishEye, ReviewBoard, etc.) as well as code reviewing tools (Crucible Barkeep, etc.)
- Centralized operational functionality integrated into all deployed VMs
  - Dashboard monitoring and alerting: performance, availability, capacity, efficiency (PACE, etc.)
  - Patching services
  - Log collection and retention
  - Security – periodic scanning, antivirus, network
- Supports project templates
  - Different technology projects (Java,

LAMP, MEAN,…)
  - Different solutions space (big data, mobile, warehouse, OLAP, BI/DMD)
- Rapid personnel start up time
  - New developers and system administrators are centrally added and assigned to project teams
  - Email groups are automatically managed
  - Instantiate projects using templates, streamlining delivery processes and eliminating errors
- Integrates the service-oriented architecture (SOA) into the project template
  - Technology services
  - Access enterprise data
- Versioned workstation setup to execution environment (for dev, test, demo, prod) infrastructure code
  - Installation of all required components
  - Create execution VMs with the selected providers (AWS, Azure, Docker, Kubernetes, etc.)

Perspecta's DevCloud framework is a proven methodology. Real-world instances of the system provide lessons learned and an opportunity to continually evolve and improve the DevCloud platform with new features and enterprise-level functionality so our customers can rest assured that they are getting the very best.

Learn more at perspecta.com/cloud.