

Developer Hub Pilot

What we'll discuss today

- What is IDP platform engineering?
- Introduction to Red Hat and Backstage
- What is project Janus and how will it help me?
- Expert pilot with Red Hat Services
- Next Steps
- Q&A

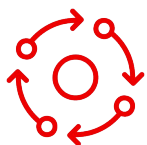
What is IDP

What is IDP Platform Engineering?

Description: *"An Internal Developer Platform (IDP) is built by a platform team to build golden paths and enable developer self-service. An IDP consists of many different techs and tools, glued together in a way that lowers cognitive load on developers without abstracting away context and underlying technologies. Following best practices, platform teams treat their platform as a product and build it based on user research, maintain and continuously improve it."*

Benefits: IDP is layered on top of the existing tooling in an enterprise that will allow faster adoption of new technologies such as OpenShift and result in increased productivity and satisfaction.

Relevant Teams: IDPs are not only for developers. They also reach Operations, Security, PM and QA



Operations

- Accounts for governance and standardization
- Handles logistics for automating deployment tasks



Security

- Ensuring best practices are followed (vulnerability scanning, pen testing, etc)
- Visibility into security posture of applications



Project Managers (PM)

- Project management tool consistency & organization
- Improved planning by defining a clear set of steps & dependencies



Quality Assurance (QA)

- Automated testing integrated into Golden Path
- Visibility into testing process to help identify problems

Pillars of an Internal Development Platform (IDP)

All four pillars must be designed for to achieve excellence.

Onboarding



This includes all the task that a developer needs to do to get his/her team, application, component on the platform.

This is the first impression that a developer gets of the platform, usually a leading indicator of the rest of the experience.

Code Time



This includes setting up the coding workstation and the inner loop

A quick workstation setup and fast and reliable inner loop both improve the developer productivity

Build Time



This is basically the ci/cd process that promotes code to production

A reliable and comprehensive ci/cd process is one of the most important factors in team productivity and application reliability.

Run Time



This includes the creation of the infrastructure to run the app and all of the post-production processes (monitoring, incident management)

A self-serviceable and observable infrastructure is what team need to be fully autonomous.

Red Hat & Backstage

Where is Red Hat Investing?



Upstream

Backstage Core



Charts



Midstream

Best practices

Custom actions



Plugins



Charts

Sample Golden Path Templates

Showcase Application



Downstream

Enterprise support (coming soon)

Red Hat Developer Hub & Red Hat Plug-ins for Backstage

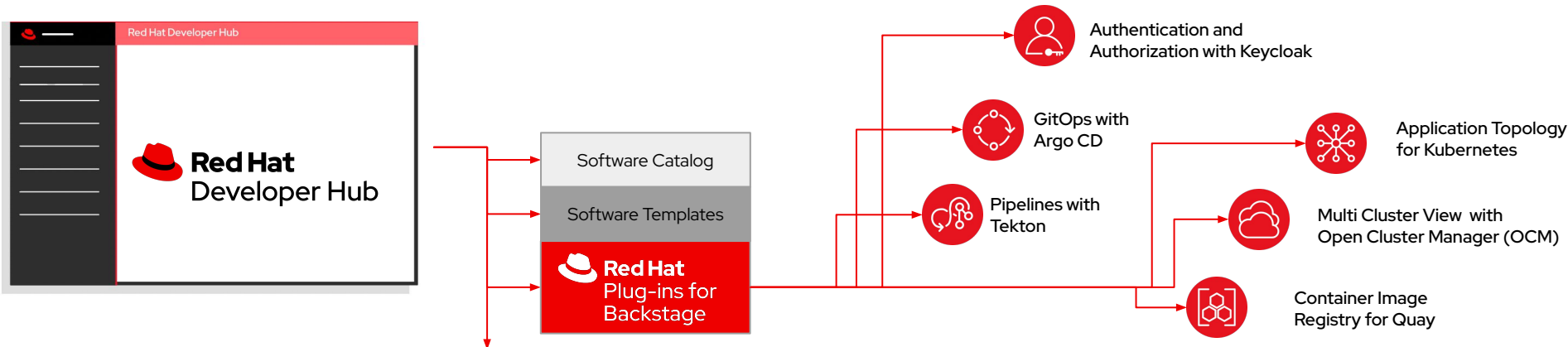
Empowering engineering to deliver business value faster.

Single pane of glass to increase engineering productivity.

Self-service with guardrails for cloud-native development.

Best practices with GitOps and automation.

Real-time view of application and infrastructure health and security.



Integrates with industry standards and technologies through a broad ecosystem.



Based on Backstage, an open source platform for building developer portals.



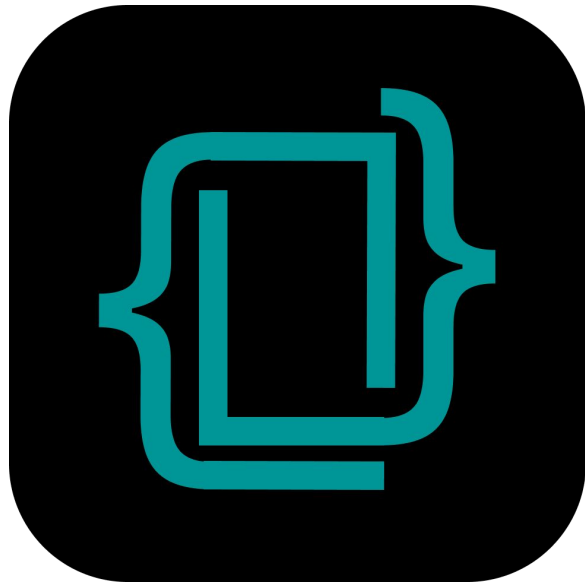
Consistent developer experience across environments.





Project Janus

4 Workstreams

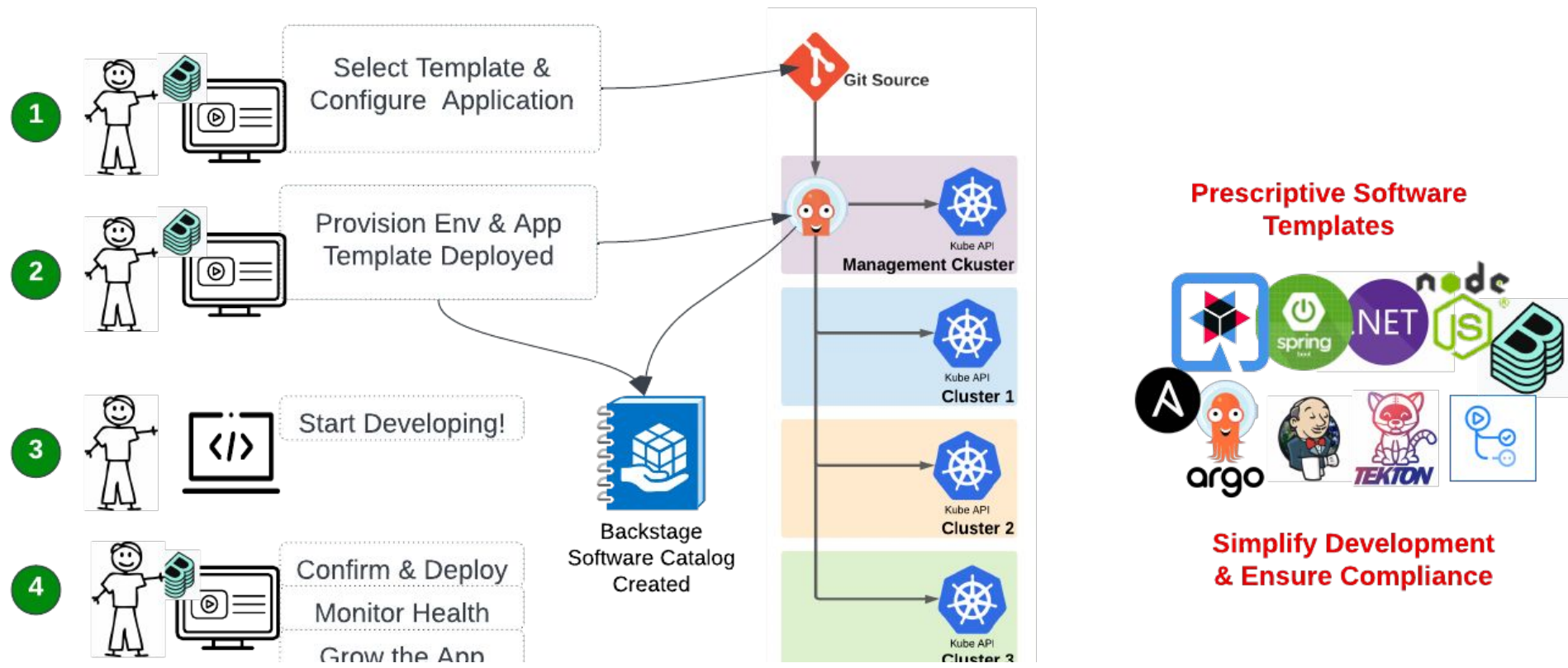


<https://github.com/janus-idp>

- Deployment targets & installation methods
- Developing & enhancing plugins
- Golden paths & templates
- Improving Backstage platform

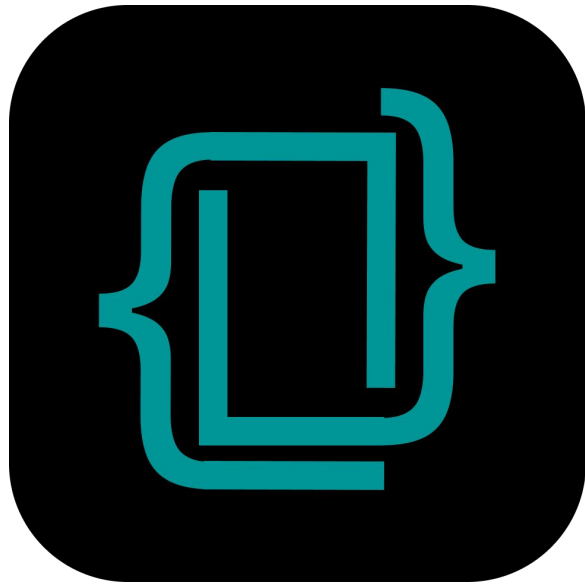
Golden Path Use Case

We've defined the ideal template to help your teams onboard



Project Janus

Community plugins



Available NOW in Janus!

- 3scale
- Keycloak
- Multi cluster plugin
- OCI Image Registry
 - Quay
 - JFrog Artifactory
 - ACR
- Tekton
- Topology

Plugins available today [here](#)

Upcoming Plugins

- OpenShift Learning Paths
- Web Terminal (OpenShift Console)
- DORA metrics - Pelorus
- OCI image registry plugins
 - ECR
 - GCR
 - Nexus
- Parodos - Workflow engine
- Kiali
- Sarif Viewer (Security analysis)
- Moodle (LMS)
- RBAC
- ACS

Expected Benefits

The fundamental advantages and value of contributing back to an open source project

- Save time and money by leveraging open source software
- Added security and support for defect resolution from community contributions
- Community backing feature enhancements and troubleshooting
- Get your Internal Development Platform project started more quickly by leveraging open source
- Attract talent by gaining acknowledgement for your organization's engineering capabilities

IDP Pilot Implementation with Red Hat Services

Accelerate Time to Value with Expert Implementation

Red Hat Services is deeply connected to open source communities and emerging technology, thus enabling organizations to build a tailored IDP that adheres to organizational governance



- Building an IDP is extremely complex
- Red Hat Services has experience and proven architectures to build a tailored IDP
- Avoid common pitfalls
- Accelerate time to value
- Adheres to organizational governance models and developer ecosystem

IDP Pilot Services – Overview

Mission

Red Hat Services will engage with your **customer development teams** to assist with their Backstage implementation and enhance their Cloud Native Development capabilities.

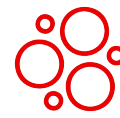
Objectives

Platform Design & Deployment



- Architecture Review
- IaC Deployment of Backstage/Janus
- Tooling Integration
 - SSO, CI/CD, Vault

Plugins



- Install and Configure OOTB Plugins
- Design Component Dashboard
- Design Standardized Tech Documentation

Golden Path



- Template Creation per Archetype
- Onboarding Workflow

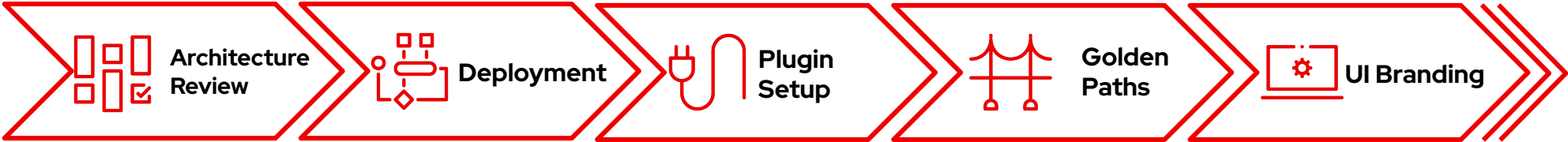
Teams Onboarded



- Streamlined Backstage Onboarding
- Build out Backstage Catalog

Typical Timeline and Resource Scenario

Curious about what your journey will look like? Let's take a closer look



Role	Number	Weeks	Hours/week	Total hours
Program Manager	1	6	12	72
Application Architect	1	6	15	90
Application Senior Consultant	1	6	40	240
Application Consultant	1	6	40	240



Completed Project Outcomes

How your organization will benefit from adopting Janus and working with Red Hat Services



Organizational Outcomes



Motivated & Productive Developers



Streamlined Onboarding



Consistent Approach and Tooling



Reduced Time to Market



Cost Savings



Increase Compliance



Application Outcomes

- Self-Service Provisioning
- Auditing and Reporting
- Improved Application Stability
- Improved Security
- Standardized CI/CD Process



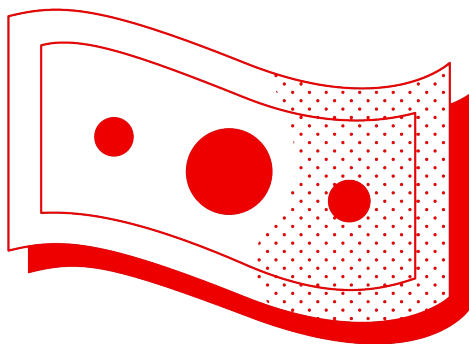
Developer Outcomes

- Improved Efficiency
- Improved Collaboration
- Iterate Rapidly
- Improved User Experience
- Streamlined Access

Customer Success Story

Red Hat worked with a financial services company to build an IDP to simplify application development

Financial Services Company



Reduced
application
onboarding time
from **2 weeks** → **10
minutes**

Challenge

The current onboarding of users, applications and infrastructure as a service is slow and inefficient.

Solution

Engage Red Hat Services to build an IDP in order to simplify the application development experience for faster innovation.

Why Red Hat

The customer sought an open source solution that would consolidate their opinionated DevOps workflows and continuous delivery approaches

Results

- Reduced application onboarding time from 2 weeks to 10 minutes
- Average time to release went from 51 days down to 12.5 days
- Better compliance with organizational governance models
- Gained expert knowledge and guidance by engaging Red Hat Services

Success Story Onboarding Outcomes

This customer saw both time and cost savings by working with Red Hat Services



Onboarding to a Cloud Platform (private)

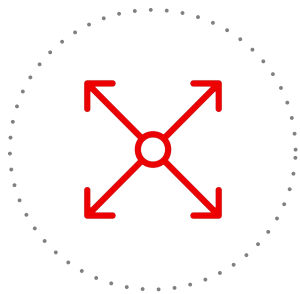
Average time to onboard

14 days



Onboarding with IDP

10 minutes



First release with IDP

Average time to release

51 days



First release with IDP

12.5 days

Time Savings Breakdown

With hands-on mentorship from Red Hat Services, the customer realized 95% or more time savings in each category

	Current Effort (Hours)	IDP Effect (Hours)	Time Savings (%)
Configure Project	16	0.2	98.7%
Request App Code	40	0.1	99.7%
Obtain Environments	48	0.2	99.5%
Request Load Balancer	40	0.2	99.5%
Obtain and Configure DB	80	4	95%
Configure Deployment	40	1	97.5%
Establish Logging and Metrics	8	0	100%

Next Steps

Red Hat Services discovery session

A one-day, no-cost
session for vision
and approach

Request more info →



Inputs

Representatives from lines of
business, Infrastructure,
Operations, Security, and
Application Development

Red Hat architect and subject
matter expert

Customer business drivers,
challenges, and technical use cases

Activities

Discussion guided by
Red Hat Architect

Review organizational readiness for
internal developer platform

Collaborative planning for realizing
business value with Red Hat
Services

Outcomes

A shared vision for your internal
developer platform

Tailored proposal for your
journey with Red Hat

High-level recommendations

Questions?

Janus community

Want to learn more?



www.github.com/janus-idp



janus-idp.slack.com - [Invite](#) to our community Slack workspace



<https://groups.google.com/g/janus-idp-community>



Join our bi weekly community calls! [Community calendar](#)



Community site: <https://janus-idp.io>

Showcase application: <https://showcase.janus-idp.io/>

Thank you

Red Hat is the world's leading provider of enterprise open source software solutions. Award-winning support, training, and consulting services make Red Hat a trusted adviser to the Fortune 500.



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One Sliders

Red Hat Services: Developer Hub Pilot

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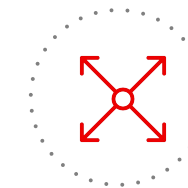
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First release with IDP



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Outcomes

- Motivated & Productive Developers
- Streamlined Onboarding
- Consistent Approach and Tooling
- Increase Compliance
- Reduce Time to Market
- Self-Service Provisioning
- Improved User Experience