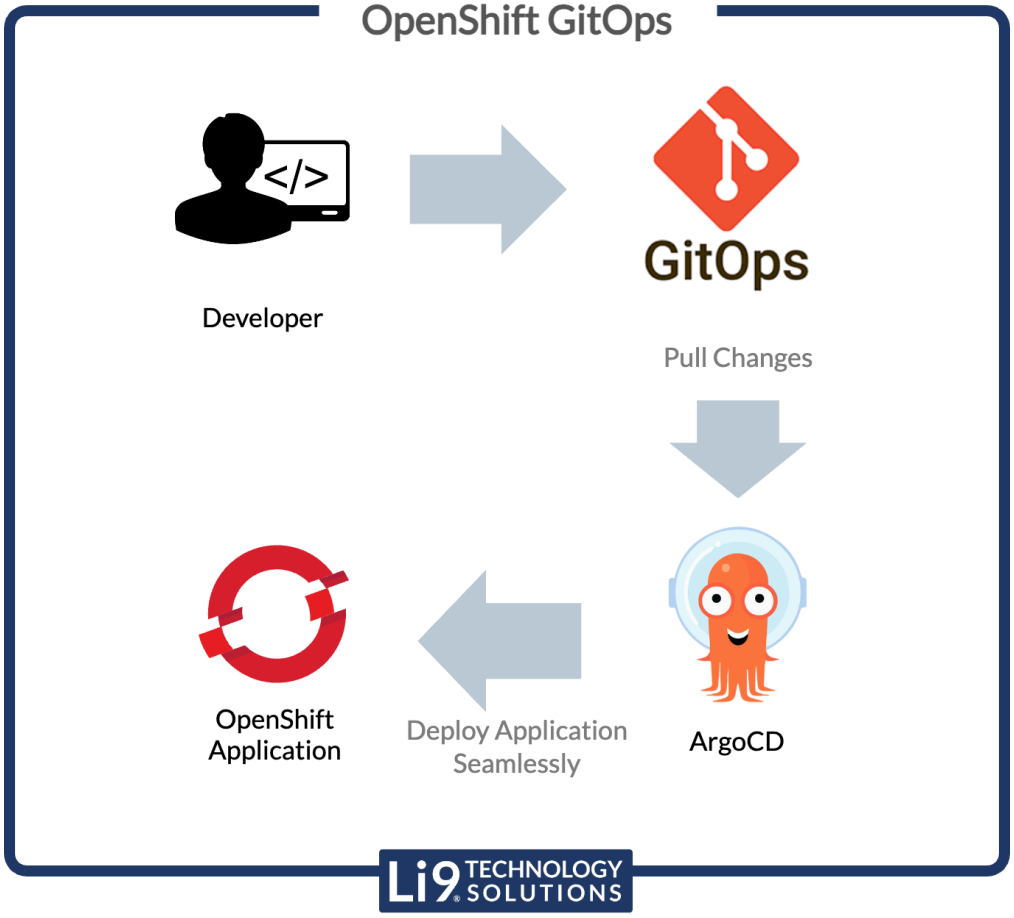
Introduction

Li9 designs and implements an OpenShift GitOps architecture unique to each customer's security, process, and platform requirements while leveraging best practices and OpenShift GitOps features that provide customers with the full value of the OpenShift Container Platform. This service is designed to lay the groundwork for a full-scale production environment tailored to your specific needs across private or public cloud deployments.

Timeline: 2 weeks



OpenShift GitOps **seamlessly integrates** with your existing development workflows. Empower developers with the f**amiliar tools** and Git-based processes they already use, **minimizing disruption and maximizing efficiency.**

OpenShift GitOps offers **proactive control and enhanced visibility**. Review changes proactively, catch configuration drift before it causes issues, and maintain a complete audit trail through Git history.

Following the initial discovery workshop, a comprehensive SOW will be developed collaboratively with the customer. This SOW will detail the specific deliverables for this Solution Brief.

Objectives

- Deploy a core OpenShift GitOps architecture built upon proven best practices.
- Implement GitOps workflows for streamlined application and infrastructure change delivery.
- Integrate with your existing Identity and Access Management (IAM) solution for seamless user management.
- Deliver documentation outlining the solution architecture, components, processes, and future expansion pathways.

Scope

- **OpenShift GitOps Deployment:** Setting up the essential GitOps environment within your existing OpenShift cluster.
- **Identity Integration:** Connect with your IAM system to enable Single Sign-On (SSO) for the OpenShift environment.
- **GitOps for Applications:** Implement a GitOps workflow for a showcase application deployment using Helm charts.
- **GitOps for Infrastructure:** Implement a GitOps workflow to deliver a showcase infrastructure configuration item, ensuring standardization across your OpenShift cluster.
- **Knowledge Transfer:** Document the solution architecture, components, and processes employed.

Deliverables

- A functional OpenShift GitOps environment.
- Integration with your IAM solution.
- A deployed showcase application via a GitOps workflow.
- A showcase OpenShift cluster configuration item delivered via GitOps.
- Documentation of the solution.

Project Phases

- **Assessment and Planning:** Collaborate with customer project participants to understand specific requirements and expectations. This will inform the final Statement of Work (SOW).

- **Environment Setup:** Deploy the OpenShift GitOps environment and establish IAM integration.
- **GitOps Workflow Development:** Implement GitOps workflows for a showcase application and infrastructure change delivery.
- **Documentation:** Create documentation encompassing the solution's design and processes.
- **Knowledge Transfer:** Conduct sessions to ensure your team is familiar with the GitOps architecture and best practices.

Platform and Subscription Pricing:

Li9 can work closely with customers to make platform recommendations based on the solution requirements and can provide any necessary Red Hat Software through traditional subscriptions or through Private Offers on AWS, Azure, or GCP.

Next Steps

Contact Li9 Technology Solutions today! We invite you to schedule a consultation with Li9 to discuss your goals and explore how an OpenShift GitOps Architecture can transform your IT operations.

About Li9

Li9 are experts in automation and application modernization and have proven their ability to leverage best practices combined with customer requirements to allow customers to achieve business and technology goals.

Red Hat has designated Li9 as a Red Hat Partner who is an industry expert in digital transformation. Li9 has demonstrated their ability to help envision, shape, and execute digital transformation roadmaps for customers of all sizes and complexities.

Additional Services

Li9 can provide additional services to expand this solution, including:

1. **High Availability and Disaster Recovery:** Design and implement robust HA and DR mechanisms.
2. **Security Hardening:** Apply security best practices and integrate with security tools.
3. **Observability and Monitoring:** Establish logging, monitoring, and alerting.
4. **CI/CD Pipeline Integration:** Build CI/CD pipelines feeding into GitOps workflows.
5. **Policy Enforcement:** Implement governance and compliance using tools like Open Policy Agent.
6. **Secrets Management:** Integrate secure secrets management solutions.
7. **Cost Optimization:** Analyze usage patterns and recommend cost-saving strategies.
8. **Multi-Cluster Management:** Set up a control plane for managing multiple OpenShift clusters.
9. **Advanced Application Delivery:** Support complex use cases like canary deployments and blue/green updates.
10. **Ongoing Support and Optimization:** Provide maintenance, monitoring, and troubleshooting.