

### Introduction

Across industries, businesses are integrating automation into their practices using different techniques, philosophies, and approaches – and experiencing varying degrees of success.

### What does automation look like in your enterprise?



### We're interested in automation, but we're not sure where to start.

#### What works

Enthusiasm and interest are key to starting your automation journey, and you have a chance to do it right the first time.

### Where you might need help

It can be a daunting challenge to create a common automation platform, corporate dialogue, and standard practices that can be quickly learned, adopted, and scaled to the organization.



### DevOps teams are information gatherers and champions of automation.

#### What works

DevOps specialists are highly knowledgeable and enthusiastic about organization-wide automation.

### Where you might need help

DevOps teams may lack business or executive support, organizational cooperation, or influence to make impactful changes.



### Automation is driven by certain IT teams or business groups.

### What works

Automation-driven teams achieve localized success that accelerate processes and reduces risk.

### Where you might need help

Team success doesn't extend to other parts of the organization, even though automation would provide significant benefits.



### Nearly every team in our organization has adopted automation practices.

### What works

Your organization has embraced the philosophy behind automation and is experiencing improvements in efficiency and innovation as a result.

### Where you might need help

Each group has customized processes and scripts that don't work beyond their own scope, creating cross-organizational incompatibility and complicating DevOps integration efforts.

### The path to automation starts here

Enterprise-wide automation, with well-defined tooling and streamlined processes, enables innovation and provides clarity to all parts of the organization. 91% of organizations say infrastructure scalability and agility is critical to support their IT strategies, but getting an entire organization to support automation can be complex.

While IT and business leaders know that enterprise-wide automation is the solution, many are unsure how to get there.



### Common assumptions:

There are areas that would benefit most from automation, including infrastructure-as-code, network automation, security automation, and systems compliance.

IT organizations benefit from having a source of truth—a repository where teams can refer back to successful automation code, tools, and processes as they expand their efforts.

Self-service capabilities through IT service management play an important role, including automated service catalogs, ticketing systems, and asset life cycles.

A centralized orchestration platform that ties automation systems together is the key to long-term success.



### Organizational needs:

Clarity on how to integrate multiple, disjointed solutions.

An approach to define or refine the organization's automation readiness.

Identification of gaps in the current environment.



### A successful automation strategy requires enterprise-wide focus on:

**Adoption** across the enterprise, from vision to execution, with an emphasis on simplicity and shared knowledge.

**Accountability** with all members of the organization taking responsibility for their individual goals.

**Governance** through prescriptive processes that accomplish automation goals and produce repeatable results.

**Security** with a simplified pipeline that reduces the risk of hacking or overriding automation, repeatable and reusable data and compliance practices, and a proactive approach to the resolution of vulnerabilities.

Standards that provide a foundation but also allow the extensibility needed to achieve organizational and team goals.

The path to organization-wide automation adoption leads to transformation and innovation. And that path starts with the first step, where you discover the possibilities and generate value for your enterprise.

<sup>1</sup> Red Hat Consulting, "Red Hat Services Program: Automation Adoption," 2019, www.redhat.com/en/resources/services-program-automation-adoption-brochure.

# Step 1: Navigate to quickwin opportunities

The first step in your automation journey shouldn't be long or complex. You know your business, and you probably already have an idea of where to start. The goal of the navigate effort is to find a single process or area to establish a successful, foundational use case that delivers value across the business.

Be ready to identify true organizational needs and embrace cross-team collaboration. This business focus and collaborative problem-solving approach will help to close gaps and produce measurable outcomes faster.

### Quickly find your first step

Navigation is about asking the right questions to thoroughly understand why each step in this process is needed.



Get all stakeholders together to determine time-consuming processes that represent automation opportunities.

- Identify who gets pulled in and what they do to complete the process.
- · Determine any unnecessary steps.



Identify what systems are already in place to enable automation and what is needed to scale your solution.



Start small—choose a single use case to automate and keep scope constrained to establish initial value. You might start with:

### Security automation:

- Vulnerabilities
- Data loss prevention
- Patching
- Hardening
- Compliance

### An accelerated and simplified network:

- Scheduled outages
- · Reusable workflows
- On-demand scaling without human involvement

### Automated hybrid cloud environments:

- Self-service and ordering methods
- Infrastructure deployments

# Streamlined development and deployment practices:

- Code integration and build process
- · Testing feedback
- Deployment across the development pipeline



### Don't forget:

The importance of properly documenting the automation use cases. Start building your source of truth and learning center to empower your team so they can stay up to date with your automation capabilities.



Create a centralized automation repository.



Build an internal community of practice (CoP).<sup>2</sup>



Invest in curriculum and certification programs such as the Red Hat<sup>®</sup> Learning Subscription.<sup>3</sup>

### See the impact of automation

"SoftBank faced the challenge of efficiently managing operations in complicated IT environments. By automating IT operations dependent on individual skills and reducing manual operations, Red Hat Ansible Tower has helped SoftBank improve organizational productivity and quality of services as well as reduce maintenance time."

Mochizuki Hirokazu

President and Representative Director, Red Hat K.K.<sup>4</sup>

### Read the press release >

Once you have discovered your automation opportunities, it's time to take the next step: **Build a foundational** use case that results in significant improvement and generates excitement.

- 2 Bentley, Walter. "Communities of Practice: Straight from the Open Source." Red Hat blog, April 2019, servicesblog.redhat.com/2019/04/15/communities-of-practice-straight-from-the-open-source/.
- 3 Red Hat website, "Red Hat Learning Subscription," 2019, www.redhat.com/en/services/training/learning-subscription.
- 4 Red Hat press release. "SoftBank Selects Red Hat Ansible Tower to Improve Efficiency and Reduce Deployment Times," 28 Aug. 2019, www.redhat.com/en/about/press-releases/softbank-selects-red-hat-ansible-tower-improve-efficiency-and-reduce-deployment-times.

# Step 2: Build a foundation that gets noticed

Step two takes your ideas and turns them into action. Based on your discovery findings, you'll automate an initial set of workflows to provide meaningful impact for the business and IT. This minimum viable product (MVP) implementation is not your average proof of concept. It will deliver a big win for both your automation strategy and your organization.

### Your foundational use case:

Produces meaningful results that help alleviate burdensome processes, redundancy, inconsistency, or timeconsuming, manual tasks. Generates a quick win for the company that frees up time to allow staff to work on more important projects, which includes time to further automate systems and processes. Automates a widely used process or set of processes that can be easily automated in a short time frame at minimum risk but still provide measurable benefits.

Provides iterative processes and communications so that you can avoid obstacles and provide visibility into the automation process.

### Quick tip:

You might want to avoid complex or business-critical processes when first starting. While these might produce a significant benefit, you may meet obstacles if you are not backed by demonstrable success first.



### Don't forget:





### Did You Know?



Aim for production. Make your foundational use case work in the real world and show your teams that they can feel secure knowing that their automation solution is working for them.



Improve the potential for adoption by automating a process that is both useful and highly visible.

Automation that is managed by a select team using Red Hat Ansible® Automation Platform and used by the rest of the organization helps you move toward a standardized set of tools with built-in accountability.

"Red Hat Consulting provided a powerful mix of expertise, best-practice guidance, and mentoring to help us design a defined DevOps process, with regular reviews to help us continue maturing our approach."

- Jufri Fan, Head IT Solution Architect, BTPN5

### Make the case for your foundational use case

See how one insurance company achieved **99% service uptime, reduced time to market** from months to weeks, and improved issue resolution with Red Hat.<sup>6</sup>

Read the case study >

With a significant win on your path toward enterprise-wide automation, it's time to build on your momentum. You can now expand on what you've learned and integrate automation into additional operational and business support systems.

- 5 Red Hat case study. "BTPN launches innovative banking services faster with Red Hat," April 2018, www.redhat.com/en/resources/btpn-customer-case-study.
- 6 Red Hat case study. "Helvetia achieves 99.9% uptime for insurance services with Red Hat," 2019, www.redhat.com/en/resources/helvetia-case-study.

# Step 3: Integrate your initial success

In this step, you'll focus on what you've already produced, and you'll bring that success to additional teams across your organization. Standardized automation workflows across operational or business support systems will quickly accelerate you on your path toward enterprise-wide automation.

# Look for opportunities to integrate your existing automation framework into other areas:

### Build self-service tools for IT service management.

 Use Red Hat management solutions to orchestrate automation use across the company.

### Increase scope by adding new application automation capabilities on top of existing frameworks:

- Extend automation to load balancing, firewall application profiles, and other networking systems to achieve larger goals of end-to-end application deployments.
- Iterate on existing processes to continue to achieve increased oversight, orchestration, collaboration, security, and practices centered around automation.

### Make every iteration a new MVP.

- Work in small, implementable increments that deliver value quickly.
- Continue to improve upon what you've already created.
- Regularly evaluate how far you've come, so your team can see how little steps add up to big achievements.

### Build your source of truth.

- Document your work and iterate on your practices so that others can learn from your successes. Make sure to document:
  - · Process transformation.
  - Standardization.
  - · Workflow automation.
- Build a data model, storage architecture, configuration management database (CMDB), or system tracking database.
  - Track code, scripts, and changes.
  - Implement standardized processes for automation framework development.



### Don't forget:

Make sure the teams involved in change management stay engaged and involved as part of the process.



Changes to automation are changes to processes, tools, and workflows.



Automation is internal product delivery and should be treated as such.

### Explore the platform that powers success

See how Red Hat Ansible Automation Platform helps you automate across the enterprise.

### Read more >

By the end of step three, you're well on your way toward enterprise-wide automation. Now it's time to accelerate adoption, and you will have the foundation and confidence to lead your own way forward.

# Step 4: Accelerate automation adoption

With a well-defined source of truth and proven automation processes and tools simplifying work across the enterprise every day, you're ready to accelerate automation. Starting with your core automation team, you'll establish your CoP (sometimes referred to as a center of excellence), which is a cross-organizational group of experts who take on the challenge of engaging other teams within your organization that need help with automation.



Using a train-the-trainer approach, teams achieve automation success and form CoPs that guide other teams in the organization through the process. Each new team starts with a foundational use case of their own. This practice improves the perception of automation across the organization by involving teams across the business, IT, and operations to deliver automation wins in every area.

### Your automation CoP is...

...a core team of cross-functional automation champions, including your automation subject-matter expert (SME), IT architects, business and IT SMEs, and developers.

### Empowered by...

...standard practices and a common language that helps the greater organization create, share, and use automation.

### Taking on the challenge of...

....engaging with other teams within your organization that need help with automation, providing training, CoPs, and hands-on help so others can learn from your success.



### Don't forget:

Automation is both a culture and a practice.



Showcase your successes to start moving teams toward the idea and acceptance of automation across the enterprise.



Allow automation to become your corporate language – through acceleration, everyone will learn how to speak it.



When you stay focused on innovation, you'll see your enterprise transform.

### Get involved

Learn how you can become part of a growing community of open source and automation culture.<sup>7</sup>

### Read more >

It may feel like the acceleration step is the destination, but the true secret to transformation lies in the last step.

Once you have an enterprise that has embraced both the culture and practice of automation, then it's time to optimize and grow.

7 "Enterprise automation checklist in a DevOps world." Red Hat, Accessed 25 Oct. 2019, www.redhat.com/en/resources/enterprise-automation-checklist.

# Step 5: Optimize and grow toward an automation-first enterprise

By this point, you've built substantial momentum and achieved significant automation successes throughout your enterprise. Moreover, you have created a culture of automation. But like all technologies, change is inevitable. As your company introduces new solutions and internal tools, you will want to adopt an automation-first approach.

Additionally, you will want to keep current with industry trends and update your automation practices to use the latest technologies and practices. Thanks to automation, your teams will reclaim the time and energy needed to rapidly launch, combine, and enhance workflows and orchestrations to meet changing requirements. You can even build CoPs that are dedicated to the continual optimization and growth of automation practices in your organization.

### How to build a CoP

### Get it started:

- Bring people together in person so they can share ideas and make actionable plans.
- Develop clear time lines and establish concrete goals.
- Set success criteria that define what success looks like for your CoP.
- Document your content and create artifacts to inform other teams.

### **Encourage participation:**

- Share an open invitation through emails, team calls, mobile apps, meeting invites, etc.
- Use your CoP as an avenue for mentoring and internal enablement.
- Invite a leader in the organization to speak at your launch meeting to attract individuals and get people excited about participation.

### Grow your community:

- Get all levels of management to endorse your CoP.
- Be persistent, creative, patient, and resilient.
- Explore successful, open CoP groups.<sup>8</sup>
- Encourage product, operational, and business teams to explore automation technology like Red Hat Ansible Automation Platform

### See what success can look like

Insurance group, Generali Switzerland, meets increasing customer and sales rep demands with automated data integration and application development and delivery.

"Red Hat Ansible will save us time by scripting more tasks, such as deploying middleware components in production."9

Christian Nicoll, Director of Platform Engineering and Operations, Generali Switzerland

Read the case study >

- 8 Github website. "Red Hat Communities of Practice," Accessed 24 Oct. 2019, github.com/redhat-cop.
- 9 Red Hat case study. "Insurance group supports customer focus with data integration," 2019, www.redhat.com/en/resources/generali-case-study.

# It's time to take the first step

### IT optimization is about balancing modernization and budget.

Enterprise automation is attractive for its ability to provide accelerated outcomes, with consistent and repeatable processes that support the evolution of a DevOps culture. No matter where your organization is on the path to automation, adopting it on a large scale is complex. Businesses need a sustainable automation strategy that uses new approaches to process and collaboration to build a modern IT organization.

### The Red Hat Consulting difference

Working with Red Hat engineering and support organizations, Red Hat Consulting brings advanced automation skills directly to your organization to help you produce roadmaps, position and align teams, streamline processes, and make enterprise systems and applications work together.

### Red Hat Consulting technical expertise is:

### Straight from the source.

· Red Hat Consulting teams communicate directly with Red Hat support and product development organizations. Our consultants bring unparalleled expertise, as they are also active contributors to the upstream open source communities behind Red Hat technologies.

#### Diverse.

 Our comprehensive understanding of the technology market helps us assist you in finding the most efficient path to enterprise-wide automation. Our guidance is based on a holistic understanding of building enterprise systems that blend your systems with industry-leading products.

#### Mentor-based.

 Our philosophy starts with the concept of "being open." We give you the information and skills you need to move to Red Hat solutions in a safe and efficient manner so that you can empower yourself and actively train others in your organization for ongoing success.

#### Real-world.

 We know that technology changes quickly, so we offer training and certifications that give you and your teams role-based knowledge and hands-on training so you understand both foundational and emerging open source technologies. You will also build the real-world skills you need to transform your enterprise.

Red Hat Consulting can put you on the path to enterprise-wide automation - no matter where you're starting.

### Sign up for a discovery session

### Learn more about Red Hat Services Journey: Automation Adoption



### **About Red Hat**

Red Hat is the world's leading provider of enterprise open source software solutions, using a community-powered approach to deliver reliable and high-performing Linux, hybrid cloud, container, and Kubernetes technologies. Red Hat helps customers integrate new and existing IT applications, develop cloud-native applications, standardize on our industryleading operating system, and automate, secure, and manage complex environments. Award-winning support, training, and consulting services make Red Hat a trusted adviser to the Fortune 500. As a strategic partner to cloud providers, system integrators, application vendors, customers, and open source communities, Red Hat can help organizations prepare for the digital future.



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