

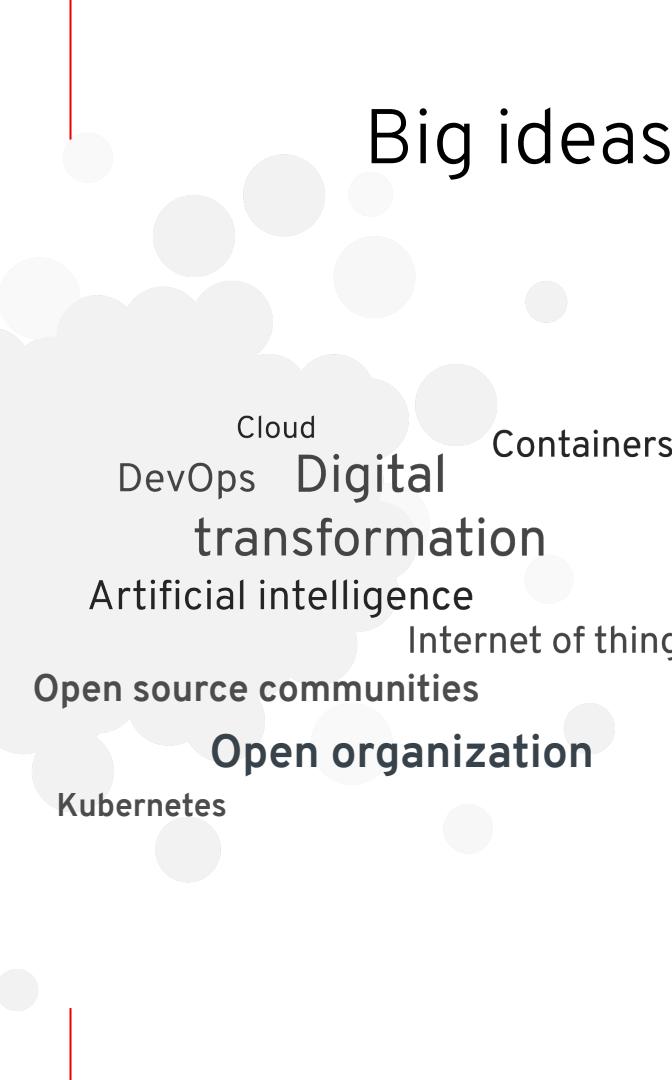


Red Hat OpenShift

The Kubernetes platform
for big ideas

Alfred Bach
Partner Enablement Manager

Big ideas drive business innovation



Cloud
DevOps **Digital transformation** Containers

Artificial intelligence
Internet of things

Open source communities

Open organization

Kubernetes

Business innovation is all around us.

Every organization in every geography and in every industry can innovate and create more customer value and differentiation with open source technologies and an open culture.

Creating value depends on your ability to deliver applications faster

Cloud-native
applications



AI & machine
learning



Analytics



Internet of
Things

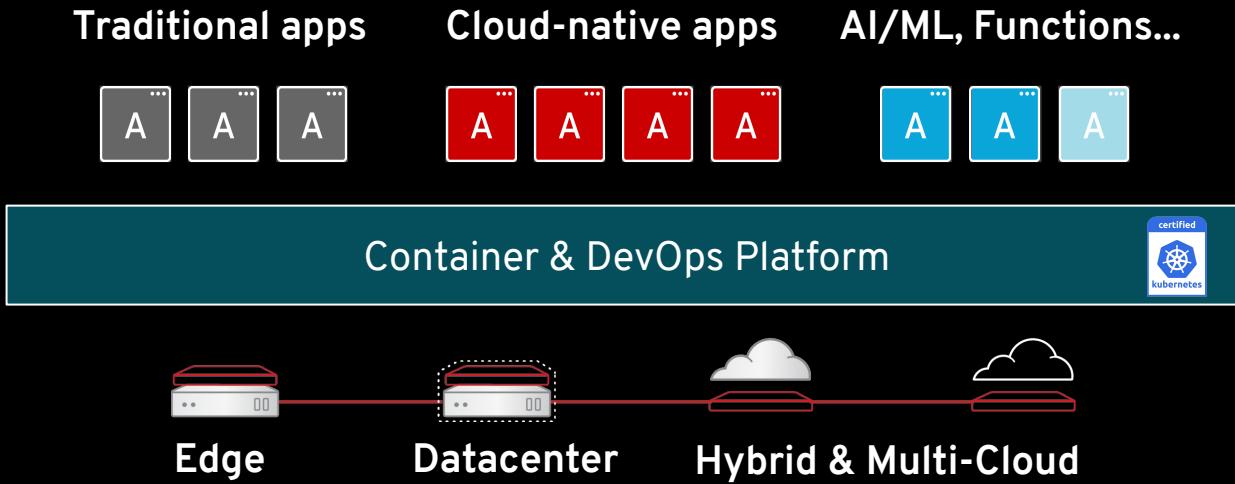


Innovation
culture



Containers, Kubernetes, and hybrid cloud are key ingredients.
OpenShift is the best platform to deliver container-based applications.

With OpenShift you can deliver all your applications in a whole new way



“”

We provide a 5-hour head start in treating sepsis. And in the hands of clinicians, 5 hours saves lives.

—
Dr. Edmund Jackson
VP & Chief Data
Scientist
HCA Healthcare



HCA Healthcare
Using data insights to save lives

More than 1,000 Red Hat OpenShift customers



MODERNIZE APPS



BBVA KOHLS



AMADEUS



Deutsche Bank

MULTI-CLOUD



MOBILE



BIG DATA | ANALYTICS

ExxonMobil



AI | ML

SMARTBOW

BMW GROUP



IOT



Why customers choose Red Hat OpenShift

The diagram consists of four main sections, each enclosed in a dashed border:

- Trusted enterprise Kubernetes**: Contains an icon of a server with a gear inside, representing a containerized environment.
- Cloud-like experience everywhere**: Contains the OpenShift logo (a red circular arrow) above two clouds, one containing a network icon and the other a shield icon.
- Empowering developers to innovate**: Contains icons for Spring (green leaf), Node.js (green hexagon with 'node'), Docker (yellow blob), a smartphone displaying various app icons, Kafka (blue hexagon with nodes), and Kubernetes (blue hexagon with 'K' and 'n').
- Open source innovation**: Contains icons for Helm (blue hexagon with steering wheel), OpenShift (blue sailboat), Rook (red flame), CoreOS (red lightning bolt), Ceph (blue hexagon with red 'd'), etcd (blue hexagon with gear), and Kubernetes (blue hexagon with white snowflake).

Trusted enterprise Kubernetes



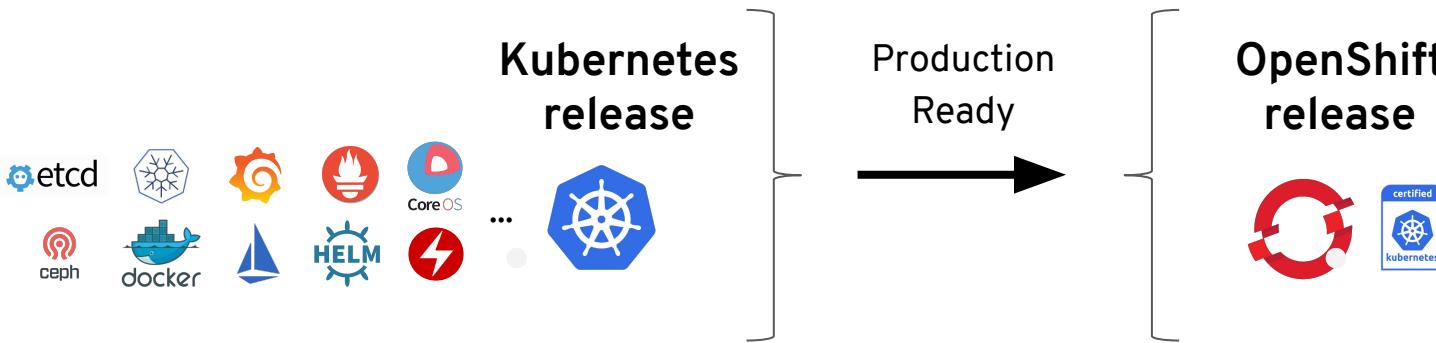
Red Hat
OpenShift

Trusted host, content,
platform

Full-stack automated
installation

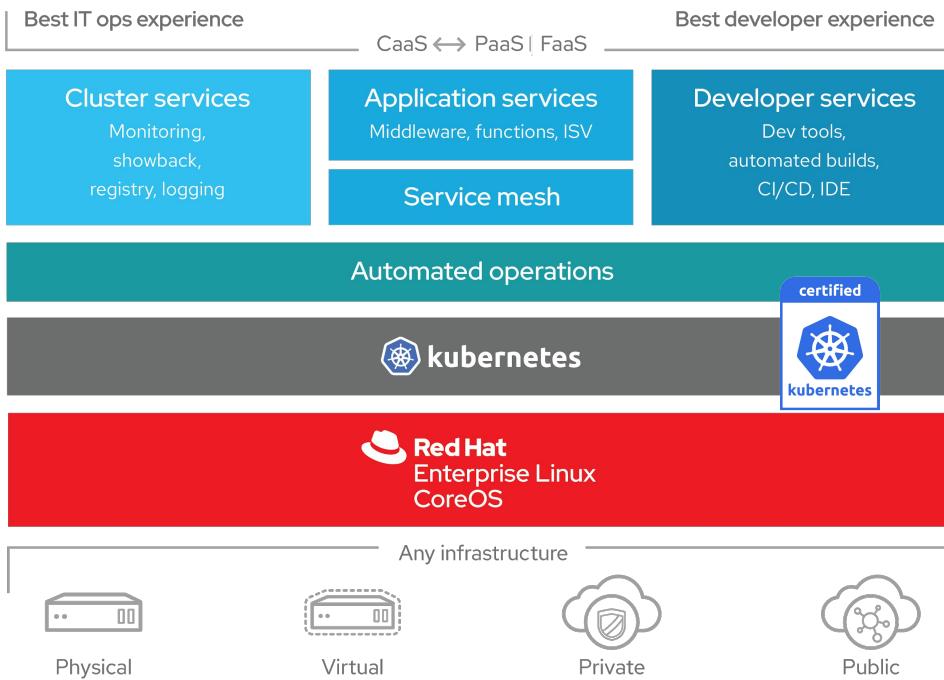
Seamless updates

OpenShift is trusted enterprise Kubernetes



- Hundreds of defect and performance fixes
- 200+ validated integrations
- Certified container ecosystem
- 9-year enterprise life-cycle management
- Red Hat is a leading Kubernetes contributor since day 1

OpenShift 4 - A smarter Kubernetes platform



Automated, full-stack installation from the container host to application services

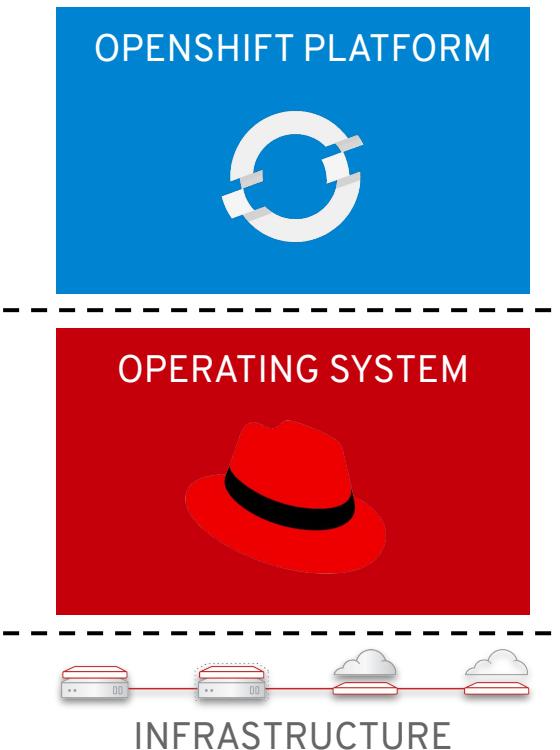
Seamless Kubernetes deployment to any cloud or on-premises environment

Autoscaling of cloud resources

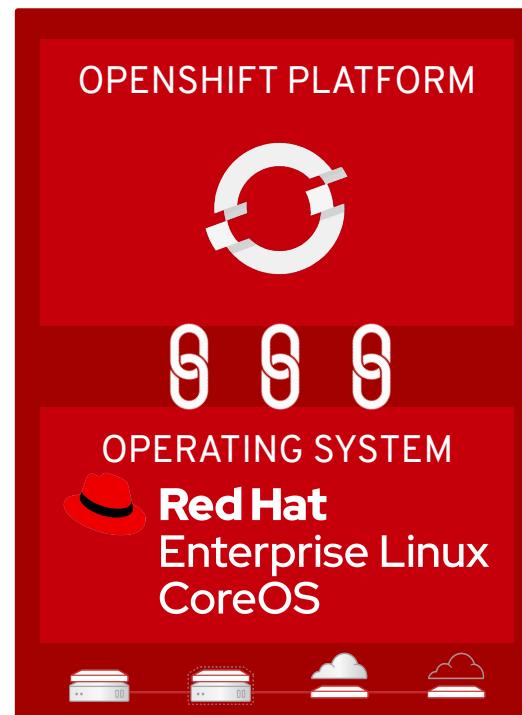
One-click updates for platform, services, and applications

Full-stack automated install

OPENSHIFT 3 & 4



OPENSHIFT 4 (only)



Over the Air (OTA) Updates

- OpenShift retrieves the list of available updates
- Admin selects the target version
- OpenShift is updated over the air
- Auto-update support

The screenshot shows the 'Cluster Settings' page in the Red Hat OpenShift web interface. The left sidebar has a 'Administration' section with 'Cluster Settings' selected. The main content area is titled 'Cluster Settings' and shows the 'Overview' tab is active. It displays the following information:

CHANNEL	UPDATE STATUS	CURRENT VERSION
fast	4.1.0-0.2	4.0.0-0.2

Below this, it shows the 'CLUSTER ID' as 784ce289-02aa-4d32-8796-cd4a0619499c, the 'CURRENT PAYLOAD' as a redacted URL, and the 'CLUSTER AUTOSCALER' status with a 'Create Autoscaler' button. A blue 'Update' button is located at the bottom right.

“”

We can localize clusters in different markets if we need to and therefore serve our customers on a worldwide scale.

Dr. Alexander Lenk
Lead Architect Connected
Vehicle, Digital Backend,
Big Data, Blockchain
BMW Group

BMW
Connected Drive



A cloud-like experience, everywhere



Operator Framework

Operator Hub &
ISV ecosystem

Multicloud
management

A consistent container application platform

FROM YOUR DATACENTER TO THE CLOUD



Automated
operations



Multi-tenant



Secure by
default



Network
traffic control



Over-the-air
updates



Monitoring
& chargeback



Pluggable
architecture



Bare metal, VMware vSphere, Red Hat Virtualization, Red Hat OpenStack Platform,
Amazon Web Services, Microsoft Azure, Google, IBM Cloud

Automated container operations

FULLY AUTOMATED DAY-1 AND DAY-2 OPERATIONS

INSTALL

DEPLOY

HARDEN

OPERATE

AUTOMATED OPERATIONS

Infra provisioning

Full-stack deployment

Secure defaults

Multicloud aware

Embedded OS

On-premises and cloud

Network isolation

Monitoring and alerts

Unified experience

Audit and logs

Full-stack patch & upgrade

Signing and policies

Zero-downtime upgrades

Vulnerability scanning

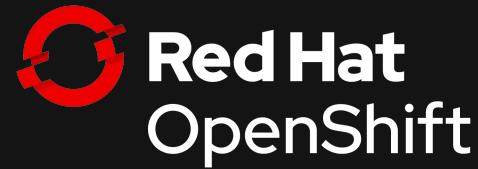
Kubernetes-native day 2 management



 A white icon showing four arrows pointing outwards from a central point, forming a cross shape.	Flexible app architectures	 A white icon containing mathematical symbols: a pi symbol, a square root of x+y, the number 42, a circle with a dot, the equation e=mc², infinity, and a percent sign.	No reinvention of core concepts
 A white icon showing a sequence of three boxes: a top box with a square arrow, a middle box with a checkmark, and a bottom box with a square arrow.	Uniform deploy and debug	 A white icon showing two overlapping circles, one solid and one dashed, representing a hybrid model.	Truly hybrid

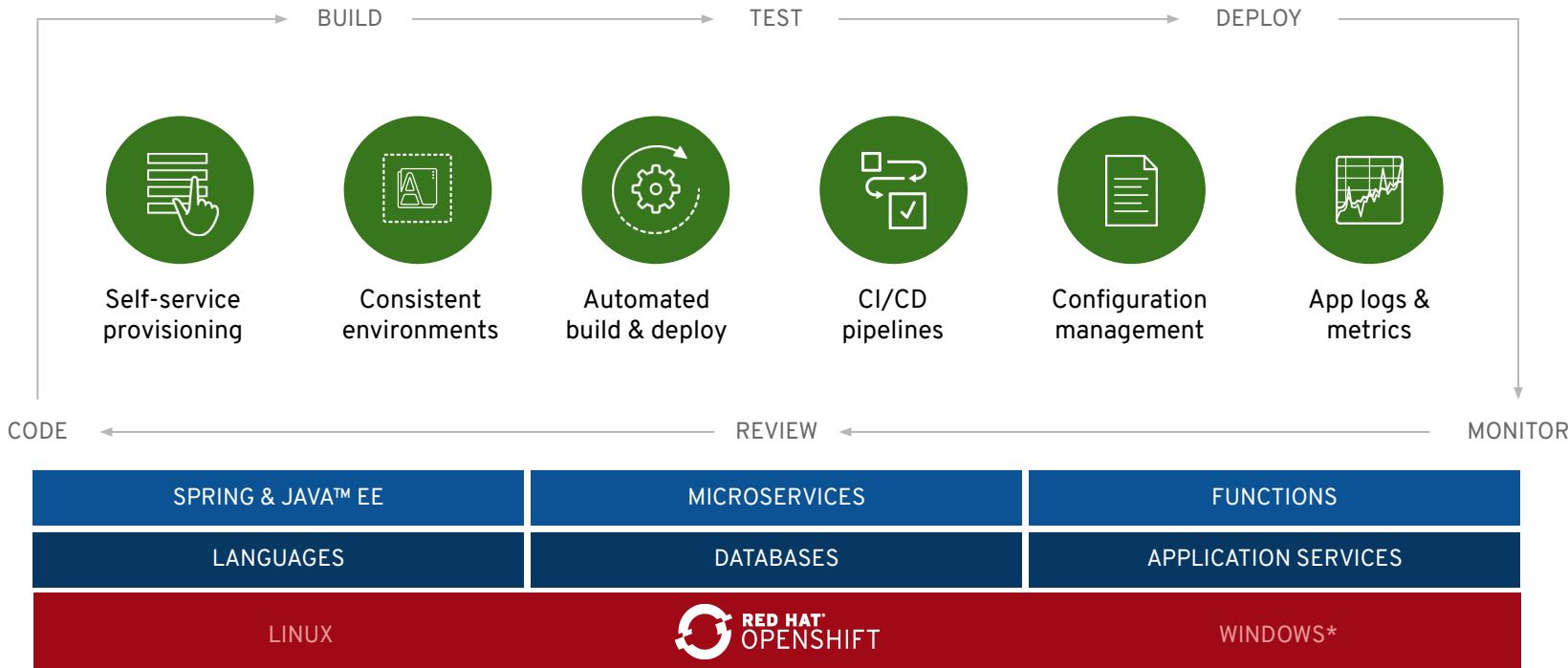
Operators codify operational knowledge and workflows to automate life-cycle management of containerized applications with Kubernetes

Empowering developers to innovate



Service mesh
Serverless
Red Hat CodeReady
Workspaces &
developer tooling

OpenShift enables developer productivity



* coming soon



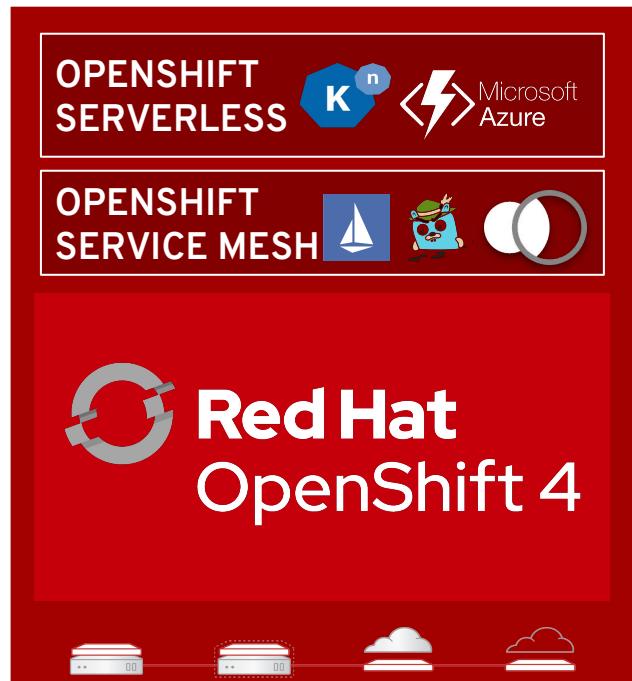
Building next-gen applications

OpenShift Service Mesh

- Integrated Service Mesh for enhanced security and network segmentation of microservices applications. Combines Istio, Kiali (UI), and Jaeger (Tracing) projects.

OpenShift Serverless

- Integrated serverless, enabling scale-to-zero FaaS services and event sources - built on the Knative framework.
- Support for Azure Functions
- Integrated with Camel-k for rich set of initial event sources: HTTP, Kafka, AMQP



Enabling greater developer productivity

CodeReady Workspaces

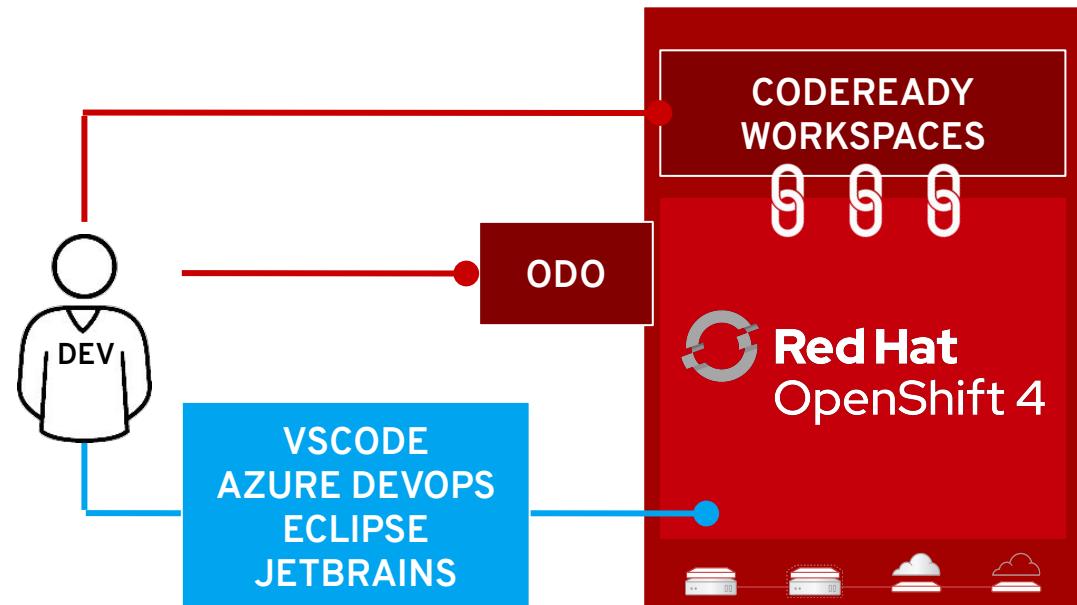
Web-Based IDE (Eclipse Che),
Collaborative Development,
integrated with CI/CD.

OpenShift ODO

Advanced developer CLI

OpenShift Plugins

Integration plugins - VScode, Azure DevOps, Eclipse IDE, JetBrains





Lufthansa Technik

The Kubernetes platform for your business

“The moment we have an idea, we can start building the product.”

Tobias Mohr, Head of Technology and Infrastructure, Lufthansa Technik

MULTIPLE CONSUMPTION MODELS



Red Hat
OpenShift
Dedicated



Red Hat



Microsoft

Azure
Red Hat
OpenShift



Red Hat



Red Hat
OpenShift
on IBM
Cloud



Red Hat
OpenShift
Container Platform

Managed service
offering on AWS or
GCP*

Joint engineering,
operation, and
integrated support by
Microsoft and Red Hat

Joint engineering and
integrated support by IBM
and Red Hat

Freedom to install
on-premises or in the
cloud to address your
hybrid deployments

MANAGED CLOUD SERVICES

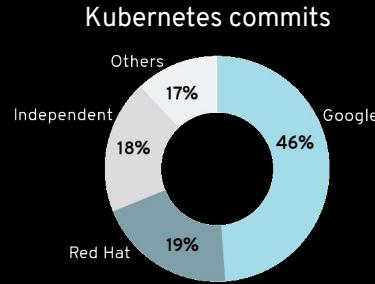
SELF-MANAGED

*Coming Soon

Why is Red Hat the best choice?

THE 4 C's

CODE



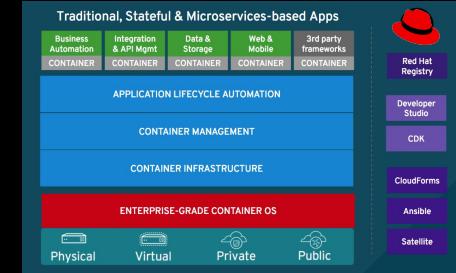
CUSTOMERS



CLOUD



COMPREHENSIVE



Red Hat is a leading Kubernetes developer & contributor with Google¹.

We make container development easy, reliable, & more secure.

1,000+ customers²

We have years of experience running OpenShift Online & OpenShift Dedicated services.

We have strong partnerships with cloud providers, ISVs, & CCSPs.

We have an extensive container catalog of certified partner images.

Our comprehensive portfolio of container products and services includes developer tools, security, application services, storage, & management.

Source: [1] Stackalytics, [Contribution by Companies](#). (Release: All, Project type: Kubernetes, Module: kubernetes, Metric: Commits)

Retrieved: March 2, 2018. [2] [More Than 1,000 Enterprises Across the Globe Adopt Red Hat OpenShift Container Platform to Power Business Applications](#)



Thank You



linkedin.com/company/red-hat



youtube.com/user/RedHatVideos



facebook.com/redhatinc



twitter.com/RedHat

We start again 15:20