Developer Productivity, Choice, Control, & Consistency

Speed

↑

Portability

↓

Performance & Control

Cloud Functions
"Serverless" / Event Driven Apps

Cloud Foundry
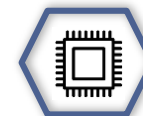*Open PaaS Environment*

Container
Maximum Portability

Virtual Server or VMware
Leverage Existing Images & Tools

Bare Metal
Maximum Performance & Control

Language/ Framework

.js .java liberty
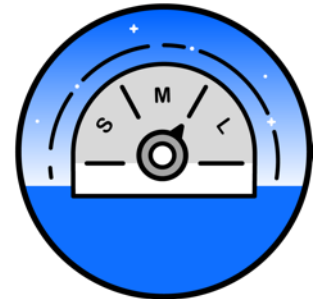
.py .php

.go

.rb ANGULARJS

express

spring

Intelligent Scheduling

Self-healing

Horizontal scaling

Service discovery & load balancing

Automated rollouts and rollbacks

Secret and configuration management

IBM Cloud
Kubernetes Service

A **managed Kubernetes service** providing an intuitive user experience with on-going cluster management. Built-in **security and isolation** to enable rapid delivery of apps, while leveraging IBM Cloud Services including Weather data, IoT, Analytics, or **AI capabilities with Watson**. Available in six IBM regions WW, including **20+ datacenters**.

https://www.ibm.com/cloud/container-service

Kubernetes Certified Service Provider
Kubernetes Technology Partner
Kubernetes Service Providers

certified
kubernetes
1.7

certified
kubernetes
1.8

certified
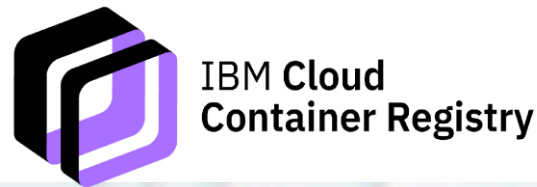kubernetes
1.9

certified
kubernetes
1.10

Datacenter Expansion - 6 IBM Cloud Regions, 20+ Datacenters

https://console.bluemix.net/docs/containers/cs_regions.html#regions-and-locations

Region	Location	City
AP North	hkg02, tok02, sng01	Hong Kong, Tokyo, Singapore
AP South	mel01, syd01, syd04	Melbourne, Sydney
EU Central	ams03, fra02, par01, mil01	Amsterdam, Frankfurt, Paris
UK South	lon02, lon04	London
US East	tor01, wdc06, wdc07, mon01	Toronto, Washington, DC, Montreal
US South	dal10, dal12, dal13, hou01, sao01	Dallas, Sao Paulo

IBM Cloud Container Registry

Product Definition

IBM managed stand-alone Docker image registry with integrated Vulnerability Advisor.
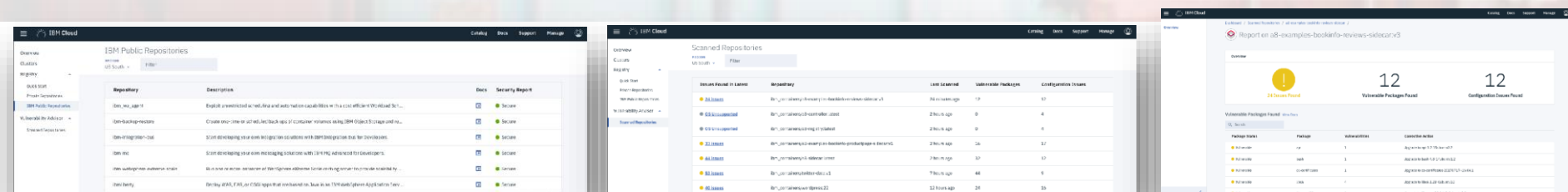
Value Proposition

IBM preferred image registry. Pre-integrated with our Kubernetes service. Secure with integration to IBM Identity and Access Manager. No need to configure and maintain storage for your images. Advanced capabilities such as vulnerability scanning, policy scanning, deployment policy enforcement, and integration to Docker Notary for image signing. The registry stores IBM curated content, open source, and customer provided images and Helm charts.

With our container service, users also have the option to deploy from an existing Docker registry (i.e., DockerHub, Quay, Artifactory, etc).

https://console.bluemix.net/docs/services/Registry/index.html

https://console.bluemix.net/docs/containers/va/va_index.html#va_index

Bring familiar tools to your Kubernetes clusters

Security

aqua

Twistlock
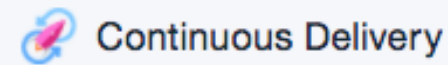
NeuVector

Aporeto

Orchestration

ContainerShip

cloudsoft

CI/CD Pipeline

Continuous Delivery

CODESHIP

Monitoring

COSCALE

DATADOG

influxdata

sematext

INSTANA

Sysdig

logdna

Red Hat OpenShift Cluster

IBM

Create a new cluster

Select a plan

Free

New to Kubernetes? Create a cluster with 1 worker node to explore the capabilities.

Free

Standard ✓

Ready for production? Create a fully customizable cluster with your choice of hardware isolation.

Starting from $0.08 hourly

Learn more about the differences between Free and Standard clusters in our docs.
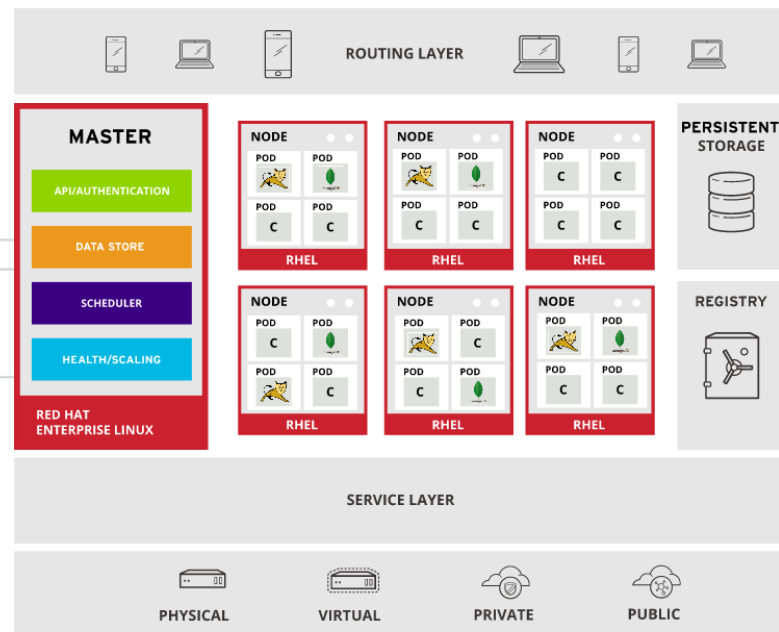
Cluster type and version ⓘ
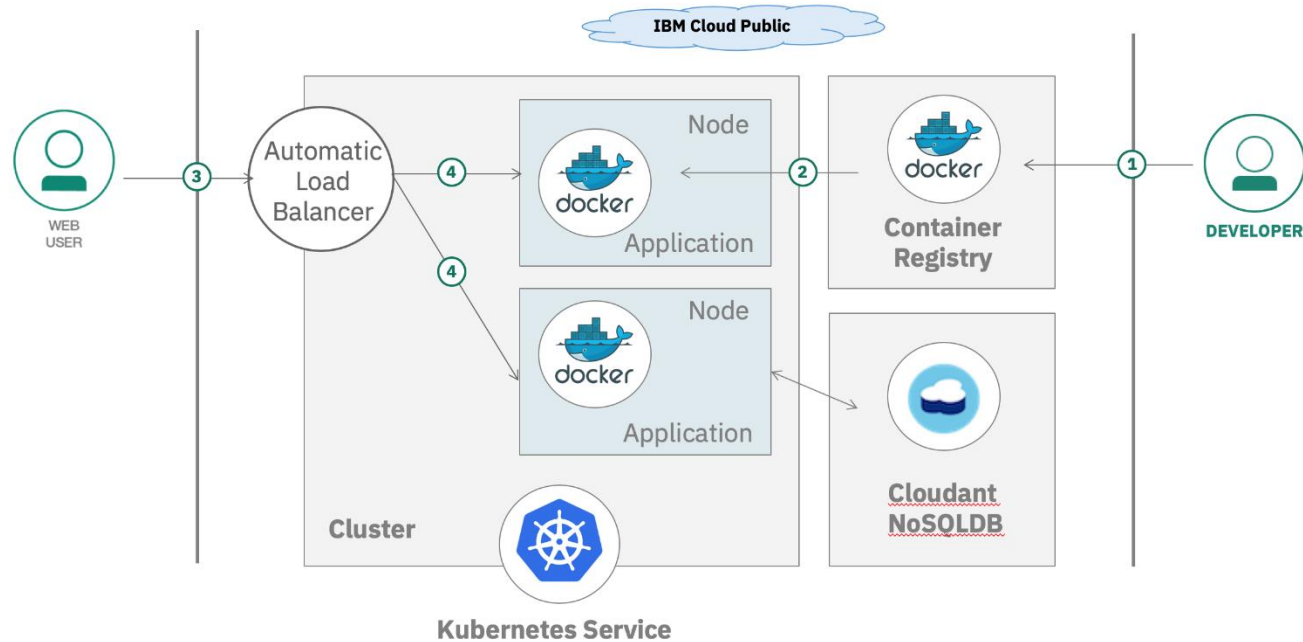
Kubernetes

1.13.8 (Stable, Default)

OpenShift ✓

3.11.129 (Latest, Stable, Default)

DEVELOPER

SCM (Git)

CI/CD

EXISTING AUTOMATION TOOLSETS

OPERATIONS

ROUTING LAYER

MASTER

API/AUTHENTICATION

DATA STORE

SCHEDULER

HEALTH/SCALING

RED HAT ENTERPRISE LINUX

NODE — POD POD POD POD — RHEL

NODE — POD POD POD POD — RHEL

NODE — POD POD POD POD — RHEL

NODE — POD POD POD POD — RHEL

NODE — POD POD POD POD — RHEL

NODE — POD POD POD POD — RHEL

PERSISTENT STORAGE

REGISTRY

SERVICE LAYER

PHYSICAL   VIRTUAL   PRIVATE   PUBLIC

IKS 實作

Configure a custom Kubernetes cluster

IaasPaas Workshop - IKS.pdf

THANK YOU

Jack Wu
scwu@tw.ibm.com

IBM.