

TECHNOLOGY



Certified Kubernetes Administrator

Course Introduction



Prerequisite

Here is the prerequisite for this course. Please ensure that the fundamentals of the prerequisite are clear.



Linux



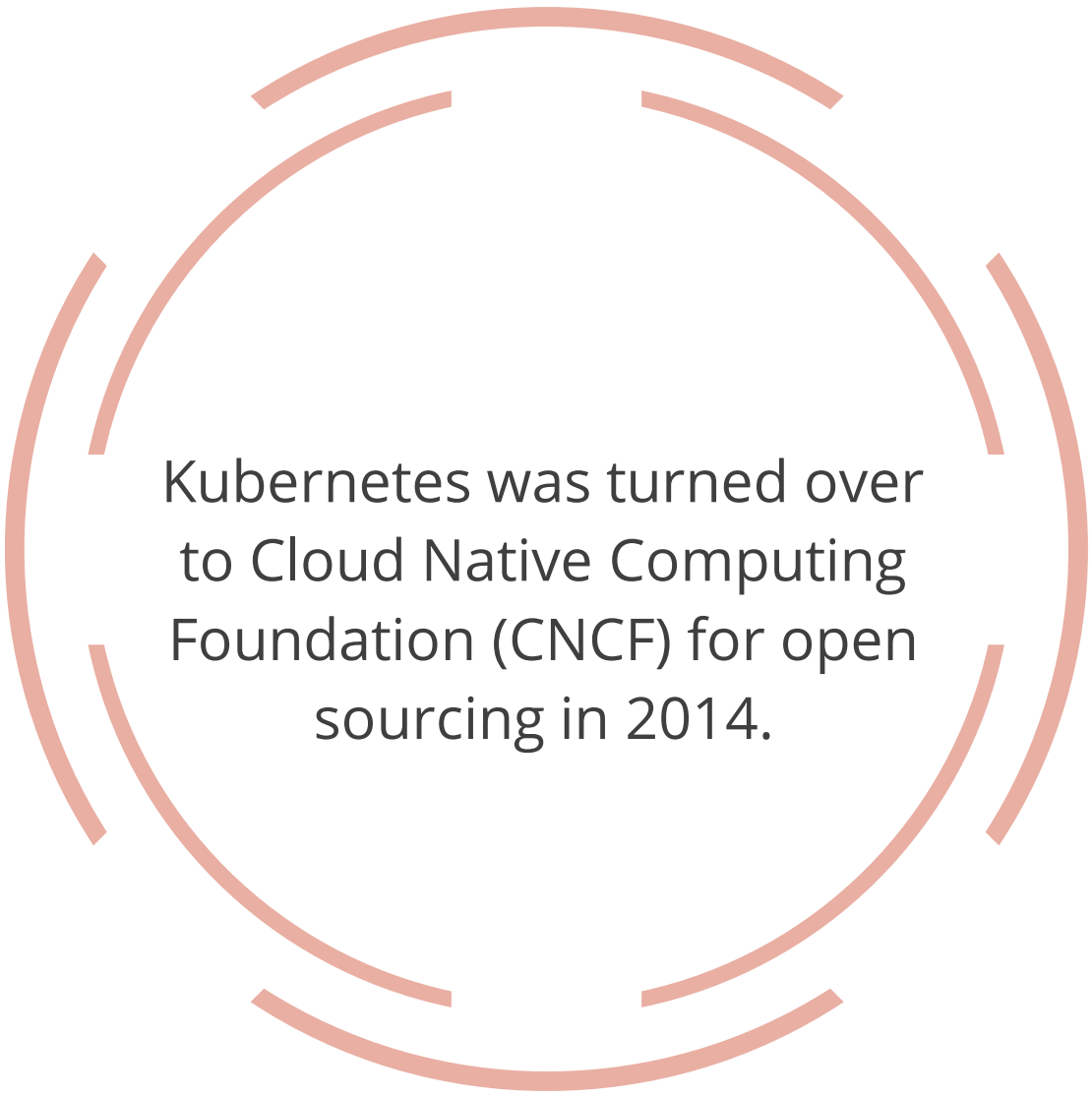
Introduction to Kubernetes

What Is Kubernetes?

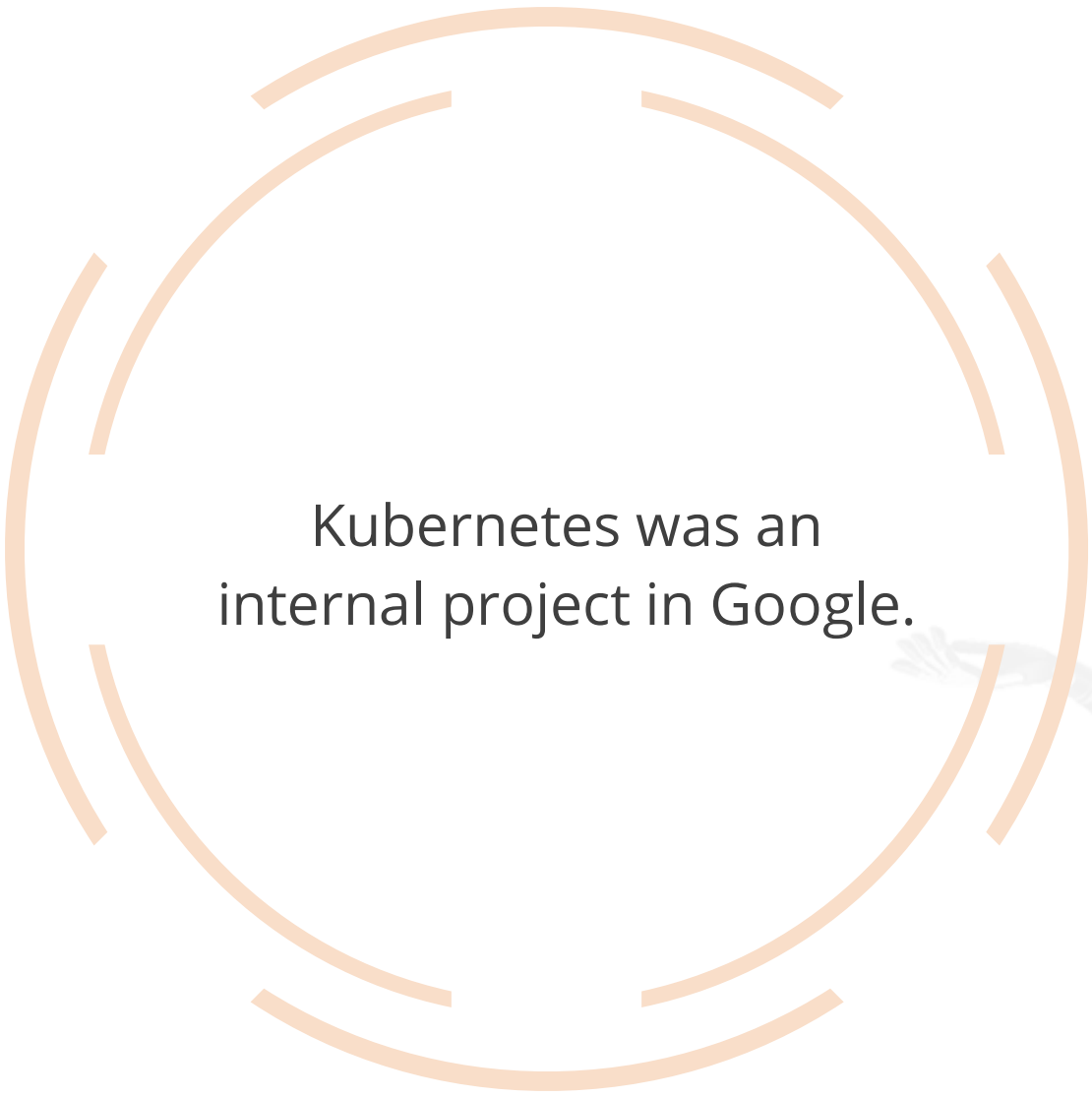
Kubernetes is a portable, extensible, and open-source platform for managing containerized workloads and services, and which facilitates declarative configuration and automation.



History



Kubernetes was turned over to Cloud Native Computing Foundation (CNCF) for open sourcing in 2014.



Kubernetes was an internal project in Google.

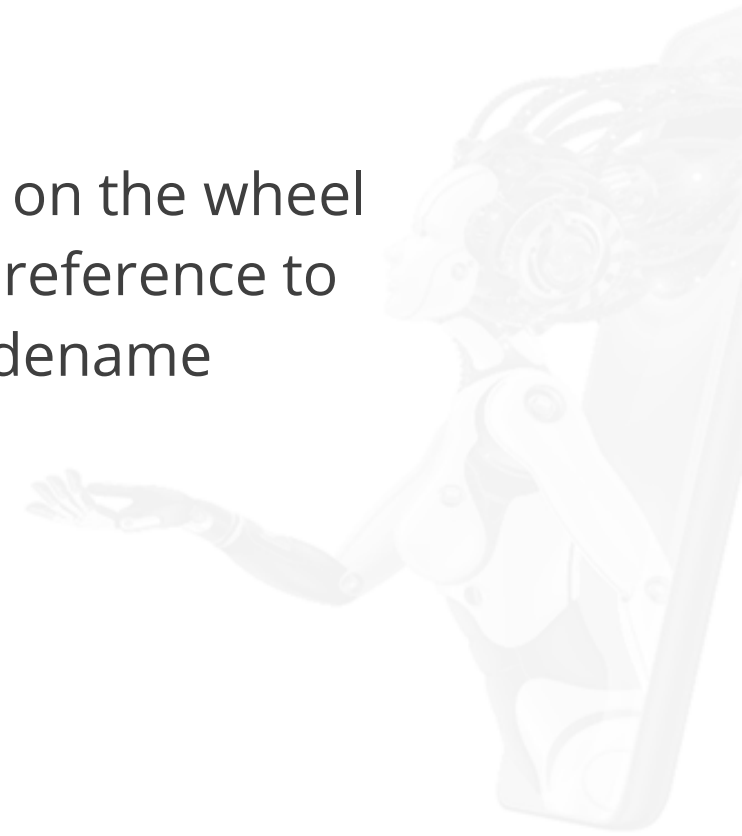
History

The original Borg project was written entirely in C++

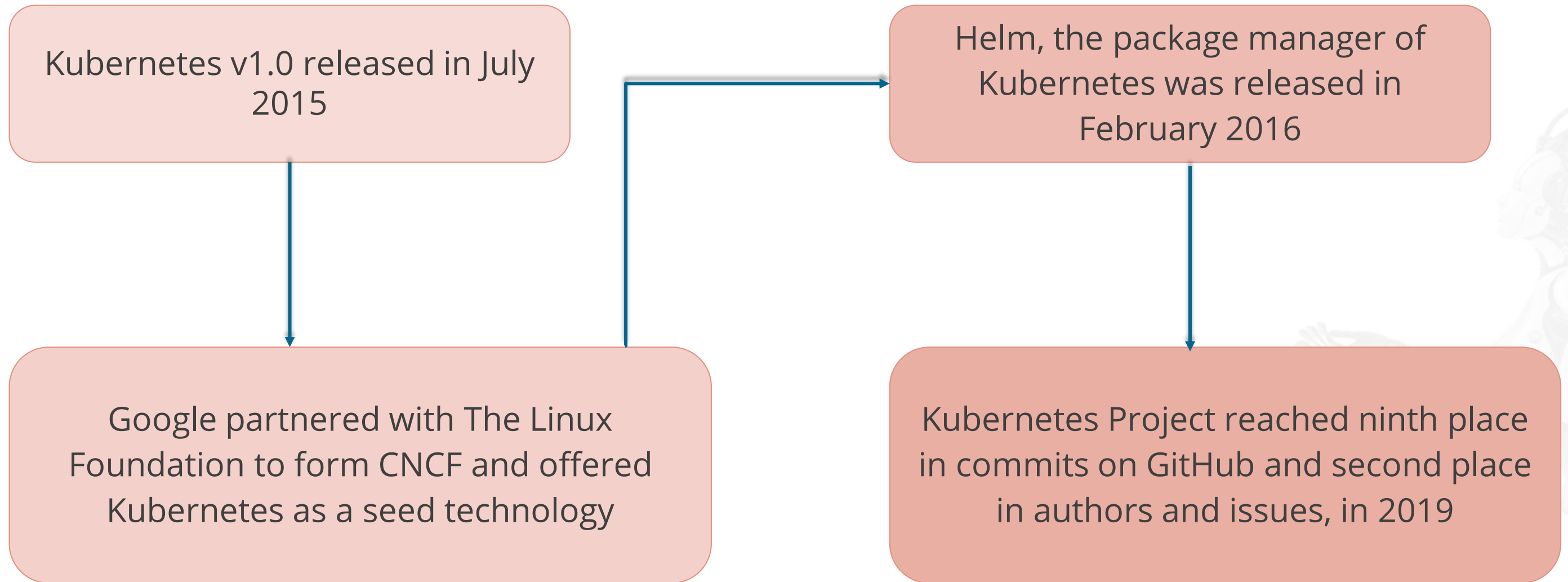
Original codename within Google was Project 7



The seven spokes on the wheel of the logo are a reference to Project 7 codename



Kubernetes Timeline



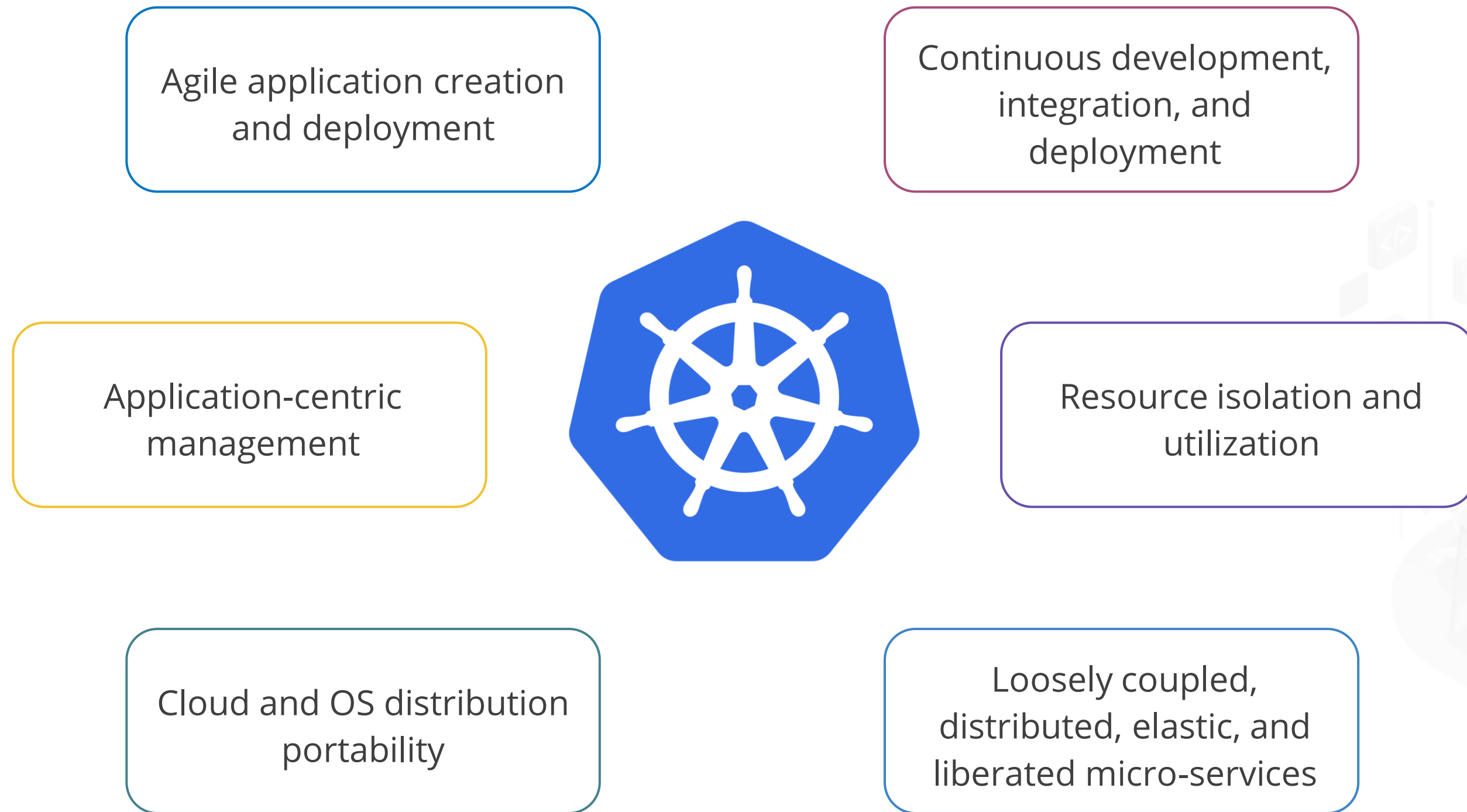
Kubernetes Practice

Kubernetes provides a framework for running distributed systems strongly.

Containers help to bundle and run applications. Manage Containers in order to avoid downtime.



Benefits of Kubernetes



Skills Acquired

Cluster Architecture

Workloads and Services

Load Balancing and Scheduling

Storage Handling

Configuration and Security

Troubleshooting Clusters

Azure Kubernetes Service

CKA and Its Importance

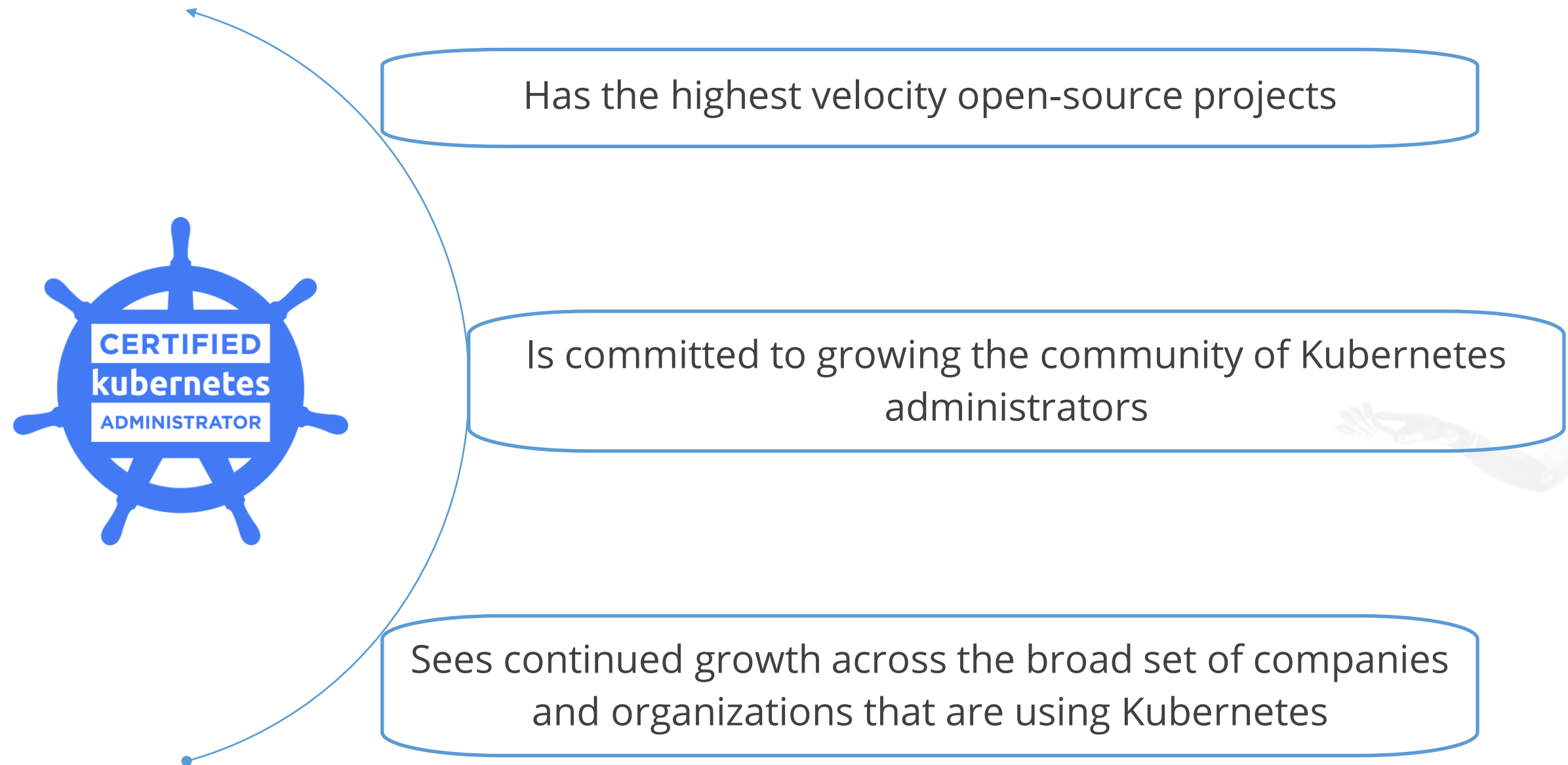


Certified Kubernetes Administrator

In collaboration with The Linux Foundation, the Cloud Native Computing Foundation (CNCF) created The Certified Kubernetes Administrator (CKA) to help develop the Kubernetes ecosystem.



Why CKA



Certification

Certification is a key step in the process. Certified administrators can quickly establish their credibility and value in the job market.



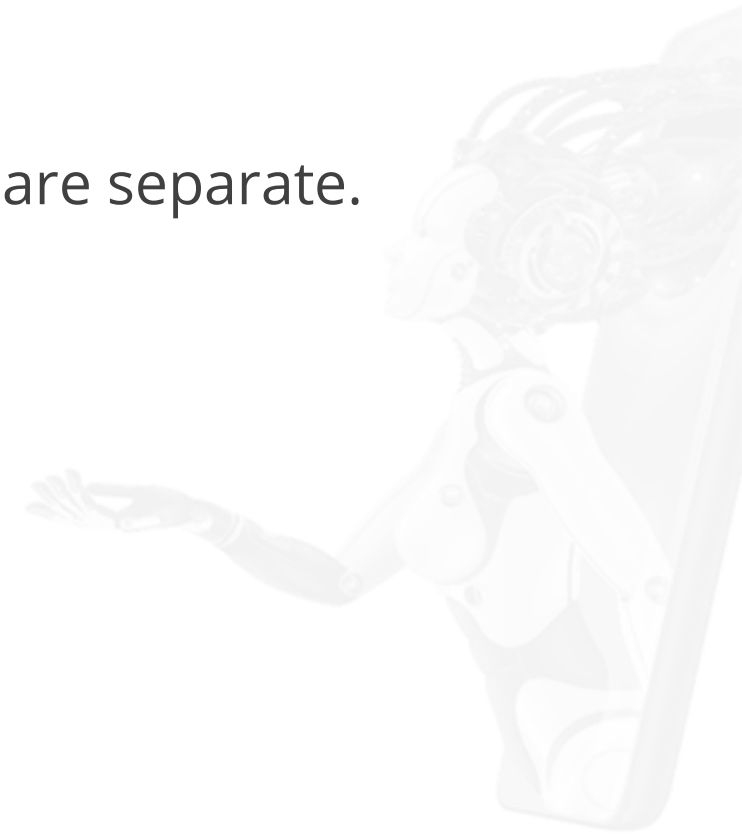
Overview of CKA Program

After completing the certification program offered by the Cloud Native Computing Foundation, users can demonstrate their competence in a hands-on and command-line environment.

The CKA program and the Kubernetes Certified Service Provider (KCSP) program are separate.



CKA doesn't need KCSP



CNCF

For the benefit of companies offering training, CNCF has open-sourced the curriculum around which the CKA exam has been developed.



For more information, please contact
trainingpartners@cncf.io



Exam Details

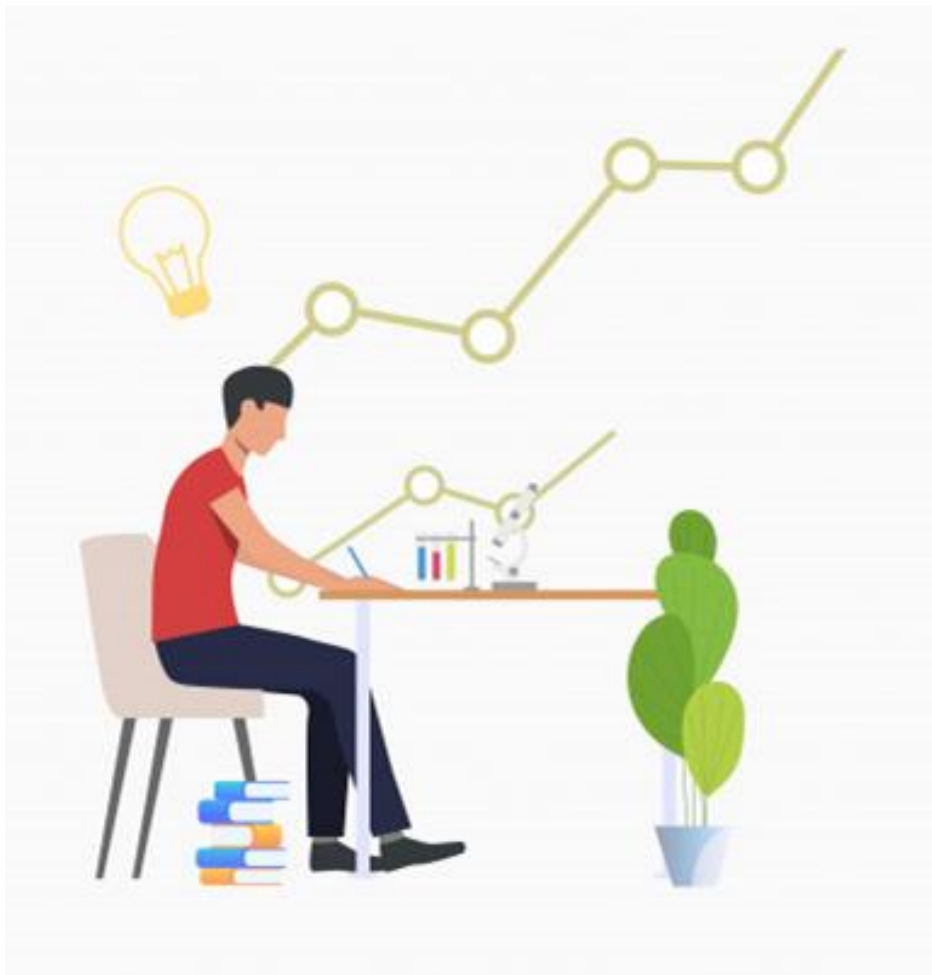
The focus of the certification program is on the skills required to be a successful Kubernetes Administrator in the industry. General domain includes:

Domain/Concept	Percentage Coverage in the CKA Exam
Cluster Architecture, Installation, and Configuration	25%
Workloads and Scheduling	25%
Services and Networking	20%
Storage	20%
Troubleshooting	30%



Cost

The cost involved is \$300 and includes one free retake.
Quarterly exam updates are planned to match Kubernetes releases.



Check out with the CNCF regularly to get up-to-date information on the certification examination.

TECHNOLOGY

Learning Path

Course Outline

01

Course Introduction

02

Core Concepts

03

Clusters

04

Workloads

05

Scheduling



Course Outline

06

Services, Load Balancing, and Networking

07

Storage

08

Azure Kubernetes Service

09

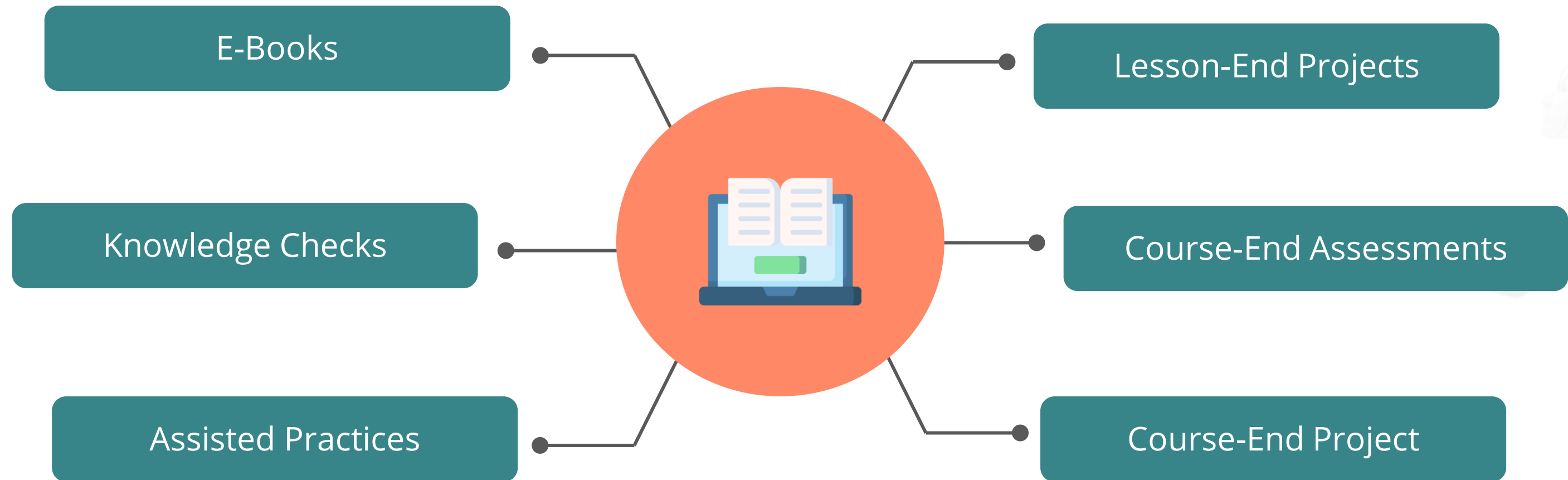
Troubleshooting and Case Studies



Course Components

Course Components

Simplilearn's comprehensive learning platform will provide you an in-depth understanding of the key concepts with the help of the following course components:



Course Completion Criteria

Complete 85% of Online
Self Learning or attend
one complete batch of
Live Virtual Classes



Complete Course-end
assessment

simplilearn

Get Certified. Get Ahead.