# Welcome to Telco Cloud Part 3: Container Deployment

**NWV_143d | On-Demand | 5G Core |**
**Course Duration:** 1 hour

Telecom operators are on the cusp of a multitude of network and business transformation choices. This course (part of multi-part series) provides a high-level view of containers, container runtimes, container images and their applicability to network functions and telco clouds. This course outlines the key benefits of adopting and deploying telco network functions in containers vs VMs, Cloud-native Network Functions (CNFs) and applications, and container lifecycle management. It also introduces Kubernetes for container orchestration in telco clouds.

## Intended Audience

This course is designed for a broad audience of personnel working in the telecom industry.

## Objectives

After completing this course, the learner will be able to:

- Identify the need for containers to deploy cloud-native applications in telecom networks
- Sketch container framework and identify roles of the container runtime
- Explain the Open Container Initiative (OCI) to unify container images
- Explain the container lifecycle management
- Describe the need for container orchestration and the role of Kubernetes

## Course Prerequisites

Welcome to Telco Cloud Part 2: Cloud-Native Apps

## Outline

1. Containers: What and Why?
1.1 Containers for telco network functions
1.2 Benefits of containers for telco clouds
1.3 Role of containers in Telco Cloud-Native NFs
1.4 Container deployment options in Telco clouds

2. Container Framework
2.1 Container Host and container runtime
2.2 Open container initiative and standardization
2.3 Container runtime options

3. Container Management in Telco Clouds
3.1 Container lifecycle management
3.2 Container adoption and management challenges
3.3 Role of container orchestrators

Putting it all together

Final assessment