DO156
Red Hat OpenShift Virtualization Administration I: Operating Virtual Machines

Create and manage virtual machines by using the Red Hat OpenShift Virtualization operator.

Red Hat OpenShift Virtualization Administration I: Operating Virtual Machines teaches the essential skills required to create and manage virtual machines (VMs) on OpenShift by using the Red Hat OpenShift Virtualization operator.

Course content summary

- Describe the underlying Kubernetes architecture that supports OpenShift and how to access and identify key OpenShift cluster services by using both the web console and command-line utilities.
- Deploy the OpenShift Virtualization operator and examine the configuration options for the operator.
- Create, manage, and monitor virtual machines in Red Hat OpenShift Virtualization.
- Use comprehensive and flexible networking for virtual machines within an OpenShift environment.
- Configure and manage persistent storage for virtual machines, protect VM data through snapshots, export and import virtual machine images, and efficiently create virtual machine golden images by using cloning within a Red Hat OpenShift Virtualization environment.

Audience for this course

- **Virtual Machine Administrators** who are looking to virtualize workloads from traditional Hypervisors to OpenShift Virtualization.
- **Platform Engineers, Cloud Administrators**, and **System Administrators** who are interested in supporting virtualized workloads, either independently from or in the same OpenShift cluster as containerized workloads.

Prerequisites for this course

- This course requires no previous experience with containers, Kubernetes, and OpenShift, however, learners are encouraged to attend, before taking DO156, Containers, Kubernetes and Red Hat OpenShift Technical Overview (DO080).
- Although Linux skills are not required for managing OpenShift clusters and OpenShift Virtualization, operating individual Linux VMs requires Linux system administration skills that the Red Hat System Administration I (RH124) and Red Hat System Administration II (RH134) courses provide.
- Learners are encouraged to attend Red Hat OpenShift Virtualization Technical Overview (DO016), before taking DO156.

Outline for this course

- **Introduction to Kubernetes and OpenShift**
  Describe the underlying Kubernetes architecture that supports OpenShift and how to access and identify key OpenShift cluster services by using both the web console and command-line utilities.

- **Introduction to Red Hat OpenShift Virtualization**
  Deploy the OpenShift Virtualization operator and examine the configuration options for the operator.

- **Creating, Managing, and Monitoring Virtual Machines in Red Hat OpenShift Virtualization**
  Create, manage, and monitor virtual machines in Red Hat OpenShift Virtualization.

- **Managing Virtual Machine Networking in Red Hat OpenShift Virtualization**
  Use comprehensive and flexible networking for virtual machines within an OpenShift environment.

- **Managing Storage for Virtual Machines in Red Hat OpenShift Virtualization**
  Configure and manage persistent storage for virtual machines, protect VM data through snapshots, export and import virtual machine images, and efficiently create golden images for virtual machines by using cloning within a Red Hat OpenShift Virtualization environment

Impact on the individual

IT professionals will learn to deploy and manage virtualized workloads on OpenShift.