ONTAP Administration and Data Protection Workshop (NA-ONTAP-DP WS)

This course provides a complete guide to managing and protecting data on NetApp® ONTAP® 9.14 clusters. You will learn essential administration tasks, gain hands-on experience with key tools, and explore advanced data protection techniques. This integrated approach ensures a robust understanding of both cluster management and data protection strategies.

Prerequisites

- ONTAP Cluster Fundamentals (web-based training [WBT] or instructor-led training [ILT])
- ONTAP NAS Fundamentals (WBT)
- ONTAP SAN Fundamentals (WBT)
- ONTAP Data Protection Fundamentals

Objectives

This course focuses on enabling you to do the following:

- Define ONTAP cluster components
- Describe the role of Storage VM (SVM)
- Configure and manage an ONTAP cluster
- Create and configure Storage VMs
- Create, manage, and protect NetApp FlexVol® volumes
- Implement storage efficiency features
- Manage ONTAP administrator access and user accounts
- Describe and distinguish ONTAP data protection features
- Administer ONTAP data protection features
- Configure NetApp SnapMirror® relationships
- Demonstrate Storage VM disaster recovery (SVM DR)
- Illustrate NDMP-enabled operations
- Integrate cloud-based data protection solutions

Course Outline

- **Module 1: NetApp ONTAP 9 clusters**
    - ONTAP deployment options
    - ONTAP clusters
    - Storage VMs
    - Software-defined storage

- **Module 2: Cluster setup**
  - Supported ONTAP cluster configurations
  - Setting up a cluster
  - Administration interfaces
  - ONTAP licenses
  - Policies and schedules
- **Module 3: Physical storage management**
  - Drives, RAID, and aggregates
  - Advanced Disk Partitioning
  - Flash Cache and Flash Pool features
  - FabricPool aggregates
- **Module 4: Logical storage management**
  - Flexible volumes
  - Moving storage resources
  - FlexGroup volumes
  - FlexCache volumes
- **Module 5: Storage efficiency**
  - Thin provisioning
  - Deduplication and compression
  - Flash efficiency
  - Volume and file clones
- **Module 6: Network management**
  - ONTAP network review
  - Network ports
  - Network traffic segregation
  - Logical network interfaces
  - Nondisruptive LIF configuration
  - Routing management
- **Module 7: NAS data access**
  - Use NAS protocols to access data
  - Use the NFS protocol to access data
  - Use the SMB protocol to access data
  - Use the S3 protocol to access data
- **Module 8: SAN data access**
  - Use SAN protocols to access data
  - Use the iSCSI protocol to access data
  - Use the FC protocol to access data
  - Use the NVMe protocol to access data
- **Module 9: Data protection**
  - Manage Snapshot copies
  - Restore data from a Snapshot copy
  - Back up and replicate data
  - Compliance

- **Module 10: ONTAP security**
  - Access control
  - Storage encryption
  - Ransomware protection
- **Module 11: ONTAP security**
  - Data collection, monitoring, and automation tools
  - Upgrading your cluster
  - Technical support
- **Module 12: SnapMirror fundamentals**
  - Introduction to SnapMirror
  - Configuring SnapMirror relationships
  - Guidelines for intercluster networking
  - Cluster and storage VM peering
- **Module 13: SnapMirror for disaster recovery and backup**
  - SnapMirror for FlexVol volumes
  - SnapMirror configuration considerations
  - SnapMirror for disaster recovery
  - SnapMirror for backup
  - Interaction between SnapMirror and other
  - ONTAP features
  - S3 SnapMirror
  - FabricPool
- **Module 14: SnapMirror synchronous for disaster recovery**
  - SnapMirror synchronous
  - Configuring SnapMirror synchronous for
  - disaster recovery
  - Additional SnapMirror synchronous
  - configuration
- **Module 15: SVM DR**
  - Introduction to SVM DR
  - SVM DR requirements and configuration
  - SVM data mobility
- **Module 16: ONTAP backup and archive solutions**
  - NDMP fundamentals
  - NDMP topologies
  - NDMP management
- **Module 17: Cloud-based data protection**
  - SnapMirror cloud
  - Cloud Volumes ONTAP
  - Data protection with NetApp BlueXP

- **Module 18: ONTAP business continuity solutions**
    - Consistency group management
    - Introduction to SnapMirror active sync
    - SnapMirror active sync configuration
    - Failover operations and failure scenarios
    - MetroCluster fundamentals

Who Should Attend

Administrator, architect, and operator.