# Oracle Database 12c: ASM Administration

**Duration:** 2 Days

**What you will learn**

This Oracle Database 12c: ASM Administration training teaches you about Oracle ASM architecture. Expert Oracle University instructors will help you develop a deeper understanding of both standard ASM and Flex ASM applications.

Learn To:

Administer ASM files, directories, templates, and disk groups.

Manage and administer Oracle Cloud File System and its components.

Configure and manage advanced CloudFS features like ACFS Auditing and Encryption, ACFS Replication and High Availability NFS.

Benefits to You

Ensure fast, reliable, secure and easy to manage performance. Optimize database workloads, lower IT costs and deliver a higher quality of service by enabling consolidation onto database clouds by learning about the Oracle Database 12c Grid Infrastructure, specifically Oracle ASM.

Live Virtual Class Format

A Live Virtual Class (LVC) is exclusively for registered students; unregistered individuals may not view an LVC at any time. Registered students must view the class from the country listed in the registration form. Unauthorized recording, copying, or transmission of LVC content may not be made.

**Audience**

Administrator

Database Administrators

**Related Training**

*Required Prerequisites*

Working knowledge of Oracle Database 11g: Release 2 on Linux Operating System

*Suggested Prerequisites*

Oracle Database 12c: RAC Administration Ed 1.1

Working knowledge of Oracle Clusterware, ASM & RAC on Linux

**Course Objectives**

Describe the components of ASM

Explain and apply Automatic Storage Management (ASM) initialization parameters

Manage ASM instances and associated processes

Monitor ASM using the V$ASM dynamic performance views

Understand Flex ASM architecture and components

Understand ASM Deployment Alternatives

Install and configure Flex ASM

Manage Flex ASM

Employ ASM space management techniques

Create and delete Automatic Storage Management (ASM) disk groups

Set the attributes of an existing ASM disk group

Perform ongoing maintenance tasks on ASM disk groups

Explain key performance and scalability considerations for ASM disk groups

Describe the Automatic Storage Management (ASM) architecture

Use different client tools to access ASM files

Describe the format of a fully qualified ASM file name

**Course Topics**

**Oracle ASM Overview**
Overview of ASM
ASM Placement in Storage Stack
ASM Cluster Configuration for Oracle RAC
ASM System Privileges
ASM OS Groups and Role Separation
ASM Components
Software
Configure disks as ASM candidate disks

**Oracle ASM Instance Administration**
ASM Instance Administration
Instance Parameters
ASM_DISKGROUPS
Adjusting ASM Instance Parameters in SPFILEs
Instance Startup and Shutdown
Relevant V$Views

**Flex ASM**
Flex ASM Architecture
Background and Overview
ASM Deployment Alternatives
Configuring Flex ASM
Managing Flex ASM
Relocating an ASM Client

**Administering ASM Disk Groups**
ASM Disk Group Overview
Disk Group Attributes
Compatibility Attributes
Disk Group Management
Disk Group Metadata
Viewing Connected Clients
Disk Group Rebalance
ASM Fast Mirror Resync

**Administering ASM Files, Directories, and Templates**
Interaction Between Database Instances and ASM
Accessing ASM Files
Fully Qualified ASM File Names
ASM File Creation
View ASM Aliases, Files, and Directories
ASM Directories Overview
Managing ASM Directories
Managing Alias File Names

**Administering Oracle Cloud File System**
Oracle Cloud File System Components
Overview of Oracle ACFS
Oracle ASM Dynamic Volume Manager
High Availability NFS (HANFS) Overview
Oracle ACFS Integration with Oracle ASM
Oracle ACFS Administration
Clusterware Resources and ACFS Administration
ACFS and Dismount or Shutdown Operations