Oracle Database: Deploy, Patch and Upgrade Workshop Ed 1

You'll learn how to create a container database and provision pluggable databases.

Learn To

This Oracle Database: Deploy, Patch and Upgrade Workshop gives you detailed information to help you install Oracle Database software. Expert Oracle instructors will teach you how to create a container database and provision pluggable databases. In this course, you will be introduced to Oracle Database Cloud Service.

Learn To:

- Install Oracle Grid Infrastructure for a Standalone Server.
- Use Oracle Restart to manage components.
- Upgrade an existing Oracle Database.
- Create a container database and provision pluggable databases.
- Gain an understanding of the Oracle Database Cloud Service.

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.

Gain Hands-On Experience

Get practical experience installing the Oracle Grid Infrastructure software and Oracle Database software by using Oracle Universal Installer. Expert Oracle instructors will teach you how to stop and start Oracle Restart using SRVCTL to manage components.

Prerequisites

Audience

- Data Warehouse Administrator
- Database Administrator
- Database Designer
- Support Engineer
- Technical Administrator

Course Objectives

- Install Oracle Grid Infrastructure for a Standalone Server
- Configure ASMLIB and create ASM disk groups
- Apply the latest patch set updates to the Grid Infrastructure software
- Install Oracle Database software
- Use Oracle Restart to manage components
- Prepare the Linux operating system for Oracle software installation
- Upgrade Oracle Database
- Create a container database
- Install Oracle Grid Infrastructure for an Independent Server
- Create an Oracle Database using DBCA
- Install the latest patch set updates to the Oracle database software

Course Topics

Oracle Database Overview

- Oracle Database Introduction

- Oracle Database Architecture Overview
- Oracle Database Instance Configurations
- Oracle Database Memory Structures
- Process Structures
- Database Storage Architecture
- Logical and Physical Database Structures
- Container and Pluggable Database Overview

Installing Oracle Grid Infrastructure for a Standalone Server

- Overview of Oracle Grid Infrastructure for a Standalone Server
- System Requirements for Oracle Grid Infrastructure
- Configuring Storage for Oracle Automatic Storage Management (ASM)
- Installing Oracle Grid Infrastructure for a Standalone Server
- Upgrading Oracle Grid Infrastructure for a Standalone Server

Installing Oracle Database Software

- Planning Your Installation
- System Requirements for Oracle Database
- Preparing the Operating System
- Using 4 KB Sector Disks
- Setting Environment Variables
- Checking the System Requirements
- Using the Oracle Universal Installer (OUI)
- Performing a Silent Mode Installation

Creating an Oracle Database by Using DBCA

- Planning the Database Storage Structure
- Choosing non-CDB or CDB
- Types of Databases (based on workload)

- Choosing the Appropriate Character Set
- Understanding How Character Sets are Used
- Setting the NLS_LANG Initialization Parameter
- Using the Database Configuration Assistant (DBCA)

Using Oracle Restart

- Oracle Restart Overview
- Oracle Restart Process startup
- Controlling Oracle Restart
- Choosing the Correct SRVCTL Utility
- Oracle Restart Configuration
- Using the SRVCTL Utility
- Obtaining Help for the SRVCTL Utility
- Starting Components by Using the SRVCTL Utility

Introduction to Upgrading to Oracle Database

- Upgrade Methods
- Data Migration Methods
- Supported Releases for Direct Upgrade
- Overview of Upgrade Process
- Performing a Rolling Upgrade
- Upgrading a CBD

Preparing to Upgrade to Oracle Database

- Developing a Test Plan
- Performance Testing
- Requirements for Databases Using Oracle Label Security or Oracle Database Vault
- Requirement for Databases Using Oracle Warehouse Builder
- Using the Pre-Upgrade Information Tool

- Backing Up the Database
- Installing the Oracle Database Software
- Preparing the New Oracle Home

Upgrading to Oracle Database

- Upgrading by Using the Database Upgrade Assistant (DBUA)
- Manually Upgrading to Oracle Database
- Migrating a non-CDB to a CDB

Performing Post-Upgrade Tasks

- Migrating to Unified Auditing
- Performing Post-Upgrade Tasks Following a Manual Upgrade

Migrating Data by Using Oracle Data Pump

- Data Pump Overview
- Migrating by Using Data Pump
- Importing by Using a Network Link