

Oracle Training: Mastering Oracle Database Administration (ORADBA, 4 jours)

Description

The course Mastering Oracle Database Administration (Oracle Training) is a complete study of Oracle database administration. We learn all about Oracle installation, configuration, databases, tablespaces, control files, data files, log files and more. The course discusses Oracle troubleshooting and diagnostics, fault tolerance, security, partitioning, and flashback management. The training also includes a discussion on performance tuning through an introduction to the use of indexes and statistics in Oracle database operations.

Tarifs

- Tarification: \$3,750/person
- Rabais de 10% lorsque vous inscrivez 3 personnes.

Plan de cours

Oracle Architecture

The Database Instance and the Database
The Oracle Physical Architecture: Oracle, Cloud Control and More
Databases and Container Databases
About the Physical Layer: Data Files and Redo Log Files
The Structure of Physical Storage: Segments, Extents and Blocks
About the Logical Layer: Tablespaces
About the Control File
The Role of the pfile and the spfile
About Oracle Memory: The SGA and the PGA
About Processes: DBWn, CKPT, LGWR and More
Exploring the Data Modification Process from Request to Disc Write

Installing Oracle

Exploring Installation Options
Exploring the Response File and the DBCA
Configuring Preparing Oracle Linux for and Oracle installation
Creating Security Accounts and Groups
Setting Environment Variables
Running the Oracle Installation in Silent Mode

Creating the Database

Understanding the role of the Listener
Interacting with the Listener using lsnrctl
Setting Installation Options
Creating the Database in Silent Mode
Exploring the Artifacts Created by the Installation

Oracle Startup and Shutdown

Connecting for the First Time with SQL*Plus
Configuring SQL*Plus: Configuring History and the Prompt
Exploring the Oracle Startup-Shutdown Lifecycle: Start, Mount and Open
Exploring Startup Options
Exploring Shutdown Options
About Parameter Files and Server Parameter Files

About Modifying the System Run Time Configuration

Modifying the SPFILE: SPFILE, MEMORY or BOTH

Oracle Memory Management and the Shared Server Architecture

About Oracle Memory Management: Automatic Versus Manual

Revisiting the Data Modification Lifecycle: The Database Buffer Cache

Understanding the Role of the SGA and the PGA

Configuring Memory Thresholds

Understanding the Shared Server Architecture

Configuring the Shared Server Architecture

Configuring Dispatchers for Scalability

Mastering Control Files

How Control Files Are Used During Oracle Startup

About Control Files and The Default Oracle Tablespaces

About Control Files, Log Files and Data Files

Creating Additional Control Files

Viewing Alert and Log Data

Creating Control File Backups

Managing Tables and Tablespaces

Logical Data Structures Versus Physical Data Structures

Exploring Oracle Data Blocks

About Oracle Default Tablespaces

Getting Tablespace Information

Creating Tablespaces

Adding Files to and Dropping Files from Tablespaces

Creating Encrypted Tablespaces

About Asymmetric Encryption and Linux

Understanding the Role of the Oracle Wallet

Creating and Opening an Oracle Wallet

Creating a Key in the Wallet

Creating an Encrypted Tablespace

Creating an Encrypted Table

Creating and Managing Online Redo Log Files

Exploring the Log Archive Process

ARCHIVELOG VS NOARCHIVELOG

Revisiting the Data Modification Workflow

Understanding Failure Scenarios and the Critical Role of the Log Archive

Working with Log Files and Log File Groups

Working With Archive Redo Log Files

Protecting Against Failure with Archive Redo Log File Groups

Exploring Undo Tablespace Management

Configuring Flashback Operations

Troubleshooting Oracle

Options For Writing to and Viewing The Log Files and The Trace Files

Diagnosing the Reason for an Oracle Instance Startup Failure

Generating a pfile from a Running Instance

Starting Oracle By Specifying A pfile

Generating a spfile from a pfile

Oracle Security

About Oracle User Security Architecture

Creating and Managing Profiles

Exploring Administrative Privileges

Creating Users

Creating Roles and Assigning System Privileges

Assigning Object Privileges

Creating Default Roles

Understanding Schemas and Their Relationship to Users

Exploring Ownership Chains

Creating Tables

Creating Tables and Specifying Tablespaces

Adding Primary Keys and Foreign Keys

About Execution Plans

Exporting Execution Plans to The Trace File

Working With Stored Outlines

Managing Statistics

The Importance of Statistics

Viewing The Statistics

Updating Table Statistics

Creating Schedule Tasks to Update Statistics

Managing Indexes

Exploring Indexes and Their Use In Relational Databases

Oracle index types: Bitmap, B-Tree, Index Organized and More

Creating B-Tree Indexes

Creating Index Organized Tables

Viewing Index Information

The Benefits of Covering Indexes

Revisiting Execution Plans when Indexes are Present