

20765 Provisioning SQL Databases

Class Length: 5 Days

Overview

Are you looking for hands-on experience provisioning a SQL Server database? This course from New Horizons will equip you with the skills you need to level up in your data career.

In the Provisioning SQL Databases course, you will learn how to configure and manage SQL Server databases both on-premises and in SQL Azure.

Prerequisites

- 20761 Querying Data with Transact SQL

Prerequisite Comments

We want you to get the most value possible out of your SQL Server training. To maximize your time taking this course, you should have some experience with database design and working knowledge of Transact-SQL and relational databases. Basic understanding of the Microsoft Windows operating system and its core functionality will also set you up for success.

If you don't feel you meet these prerequisites, we recommend that you complete 20761 Querying Data with Transact SQL before taking this course.

Target Audience

If your primary job involves administering and maintaining SQL Server databases, this course is perfect for you. You'll also benefit from this course if you develop applications that deliver content from SQL Server databases.

Course Objectives

After finishing this course, you'll understand the key steps involved in provisioning SQL Server databases. You'll be able to configure, upgrade and manage SQL Server with confidence.

This course empowers you to:

- Provision a database server
- Upgrade SQL Server
- Configure SQL Server
- Manage shared databases and files
- Set up, migrate and manage databases in the cloud

Course Outline

1 - SQL Server Components

Navigate the SQL Server Platform

Learn About the SQL Server Architecture

Get to Know SQL Server Services and Configuration Options

2 - Installing SQL Server 2016

Describe Key Considerations for Installing SQL Server
Get Exposed to TempDB files
Install SQL Server 2016
Automate the Installation Process
Lab: Installing SQL Server

3 - Upgrading SQL Server to SQL Server 2017

Understand Upgrade Requirements
Upgrade SQL Server Services
Migrate SQL Server Data and Applications
Perform a Side-by-Side Upgrade: Migrate SQL Server Data and Applications
Lab : Upgrading SQL Server

4 - Working with Databases

Learn How Data Storage Works with SQL Server
Manage Storage for System and User Databases
Move and Copy Database Files
Configure Buffer Pool Extensions
Lab : Managing Database Storage

5 - Performing Database Maintenance

Understand and Check Database Integrity
Maintain Indexes
Automate Routine Database Maintenance
Lab: Performing Database Maintenance

6 - Database Storage Options

Get Familiar with SMB Fileshare
Analyze SQL Server Storage Performance
Configure SQL Server Storage in Microsoft Azure
Work with Stretch Databases
Lab: Implementing Stretch Database

7 - Planning to Deploy SQL Server on Microsoft Azure

Learn About SQL Server Virtual Machines in Azure
Gain Exposure to Azure Storage
Navigate Azure SQL Authentication, Auditing and Compliance
Deploy an Azure SQL Database
Lab: Plan and Deploy an Azure SQL Database

8 - Migrating Databases to Azure SQL Database

Practice Using Database Migration Testing Tools
Resolve Migration Compatibility Issues
Migrate a SQL Server Database to Azure SQL Database
Lab: Migrating SQL Server Databases to Azure

9 - Deploying SQL Server on a Microsoft Azure Virtual Machine

Deploy SQL Server on an Azure VM
Move On-Premises Data Using the Deploy Database to an Azure VM Wizard
Lab: Deploying SQL Server on an Azure Virtual Machine

10 - Managing databases in the Cloud

Manage Azure SQL Database Security
Configure Azure Storage
Implement Azure Automation
Lab: Managing Databases in the Cloud
