MSQ4-2 - MOC 20762 - DEVELOPING SQL DATABASES

Categoria: **SQL Server 2017 e 2016**

INFORMAZIONI SUL CORSO

Durata:	Categoria:	Qualifica Istruttore:	Dedicato a:	Produttore:
5 Giorni	SQL Server 2017 e 2016	Microsoft Certified Trainer	Sviluppatore	Microsoft

OBIETTIVI

Implementare un server di database
Aggiornare SQL Server
Configurare SQL Server
Gestire database e file (condivisi)
Implementare, migrare e gestire i database nel cloud

PREREQUISITI

Conoscenza di base del sistema operativo Microsoft Windows e delle sue funzionalità principali.
Conoscenza operativa di Transact-SQL.
Conoscenza operativa dei database relazionali.
Esperienza operativa nella progettazione del database

CONTENUTI

Module 1: SQL Server 2016 Components
Introduction to the SQL Server Platform
Overview of SQL Server Architecture
SQL Server Services and Configuration Options

Lab : Discussion: SQL Server versions
When we do use a separate installation of SQL Server and when would use a separate instance?
Which version of SQL Server is most suitable in your organization?
After completing this module, you will be able to:
Describe SQL Server components and versions.
Describe SQL Server architecture and resource usage.
Describe SQL Server services and how you manage the configuration of those services.

Module 2: Installing SQL Server 2016
Considerations for SQL Installing Server
TempDB Files
Installing SQL Server 2016
Automating Installation

Lab : Installing SQL Server
Assess the available resources

Install an instance of SQL Server
Perform post installation checks
Automating Installation
After completing this module, you will be able to:
Describe the considerations when installing SQL Server.
Describe TempDB files.
Install SQL Server 2016.
Automate a SQL Server installation.

Module 3: Upgrading SQL Server to SQL Server 2016
Upgrade Requirements
Upgrade SQL Server Services
Migrating SQL Server Data and Applications

Lab : Upgrading SQL Server
Create the Application Logins
Restore Database Backups
Orphaned Users and Database Compatibility Level
After completing this module, you will be able to:
Describe the upgrade requirements for SQL Server.
Upgrade SQL Server.
Migrate SQL Server data and applications.

Module 4: Working with Databases
Introduction to Data Storage with SQL Server
Managing Storage for System Databases
Managing Storage for User Databases
Moving and Copying Database Files
Side-by-Side Upgrade: Migrating SQL Server Data and Applications
Buffer Pool Extension

Lab : Managing Database Storage
Configuring tempdb Storage
Creating Databases
Attaching a Database
Enable Buffer Pool Extension
After completing this module, you will be able to:
Describe Data Storage with SQL Server.
Manage Storage for System Databases.
Manage Storage for User Databases.
Move and Copy Database Files.
Describe the Side-by-Side Upgrade: Migrating SQL Server Data and Applications process.
Describe and use Buffer Pool Extensions.

Module 5: Performing Database Maintenance
Ensuring Database Integrity
Maintaining Indexes
Automating Routine Database Maintenance

Lab : Performing Database Maintenance
Use DBCC CHECKDB to Verify Database Integrity
Rebuild Indexes
Create a Database Maintenance Plan

After completing this module, you will be able to:
Ensure Database Integrity.
Maintain Indexes.
Automate Routine Database Maintenance.

Module 6: Database Storage Options
SQL Server storage Performance
SMB Fileshare
SQL Server Storage in Microsoft Azure
Stretch Databases

Lab : Implementing Stretch Database
Run Stretch Database Advisor
Implement Stretch Database
After completing this module, you will be able to:
Describe SQL Server Storage Performance.
Describe SMB Fileshare.
Explain SQL Server Storage in Microsoft Azure.
Describe Stretch Database.

Module 7: Planning to Deploy SQL Server on Microsoft Azure
SQL Server Virtual Machines in Azure
Azure Storage
Azure SQL Authentication
Deploying an Azure SQL Database

Lab : Plan and Deploy an Azure SQL Database
Plan an Azure SQL Database, Networking, performance tiers, security
Provision an Azure SQL Database
Connect to an Azure SQL Database
After completing this module, you will be able to:
Describe SQL Server Virtual Machines in Azure.
Describe Azure Storage.
Explain Azure SQL Authentication, auditing and compliance.
Deploy an Azure SQL Database.

Module 8: Migrating Databases to Azure SQL Database
Database Migration Testing Tools
Database Migration Compatibility Issues
Migrating a SQL Server Database to Azure SQL Database

Lab : Migrating SQL Server Databases to Azure
Perform Migration Testing
Migrate a SQL Server Database to Azure SQL Database
Test a Migrated Database

Module 9: Deploying SQL Server on a Microsoft Azure Virtual Machine
Deploying SQL Server on an Azure VM
The Deploy Database to a Microsoft Azure VM Wizard

Lab : Deploying SQL Server on an Azure Virtual Machine
Provision an Azure VM

Use the Deploy Database to Azure VM Wizard

Module 10: Managing databases in the Cloud
Managing Azure SQL Database Security
Configure Azure storage
Azure Automation

Lab : Managing Databases in the Cloud
Configure Azure Security
Automate Azure Deployment

INFO

Materiale didattico: Materiale didattico in formato digitale
Costo materiale didattico: incluso nel prezzo del corso a Calendario
Natura del corso: Operativo (previsti lab su PC)