

Microsoft SQL Server 2005 Administration

This 4-day workshop walks administrators through the process of learning how to administer SQL Server 2005. In this workshop, participants will learn how to install SQL Server 2005; use the SQL Server 2005 client tools to administer databases and create database applications; administer the database engine; use SQL Server Integration Services (SSIS) to import, export, and transform data; use SQL Server Replication to synchronize data between databases; use SQL Server Reporting Services (SSRS) to create dynamic database reports; perform intelligent and complex queries using SQL Server Full-Text Search (SSFTS); use SQL Server Notification Services (SSNS) to push data updates to subscribing users; and use SQL Server Service Broker to establish asynchronous communications between database applications. We discuss several new programmability features available in SQL Server 2005 including integration of the database engine and the .NET Common Language Runtime (CLR). By the end of this hands-on workshop participants will know how to configure SQL Server to make data highly available and to protect data against disasters.

Who Should Attend

This workshop is designed for database administrators who need to gain knowledge of administering SQL Server 2005, one of the top three enterprise databases in the industry, by completing real-world exercises. System architects and managers should also attend to become familiar with the technologies and tools included with SQL Server 2005 and how SQL Server 2005 can be implemented in applications of all sizes.

Workshop Objectives:

- ▶ Become familiar with the features, functionality, and capacities of SQL Server 2005.
- ▶ Install and configure a default instance and a named instance of SQL Server 2005.
- ▶ Take a tour of the SQL Server Management Studio and the Business Intelligence Development Studio.
- ▶ Monitor and tune performance of indexes, queries, and database operations.
- ▶ Create databases, stored procedures, and other database items.
- ▶ Secure SQL Server 2005 against malicious attacks and unauthorized use.
- ▶ Automate administrative tasks.
- ▶ Plan for and implement a disaster recovery plan.
- ▶ Configure SQL Server 2005 for high availability.
- ▶ Extend SQL Server 2005 using CLR objects.
- ▶ Import, export, and transform data using SQL Server 2005 Integration Services.
- ▶ Implement SQL Server 2005 Notification Services and SQL Server 2005 Replication.

Introduction to Microsoft T-SQL

Writing SQL Queries

In this 3-day workshop you will understand how to write SQL Server 2005 queries efficiently and accurately. You will learn how to write queries using build basic queries using Transact-SQL, the language of SQL Server. Then, you'll learn how to build effective views, stored procedures, triggers, and user-defined functions, using Transact-SQL. You'll learn about the new enhancements to the Transact-SQL programming language including improved support for error handling and hierarchical queries, and programmers can now use .NET languages to build database objects. This class includes many hands-on exercises to internalize the concepts.

SQL Server 2005 includes a rich set of tools that go beyond the basics of querying and manipulating data. The final two modules are important for developers to go beyond simply writing queries as they will require stored procedures at some point.

Who Should Attend

The workshop material is aimed for those who require a knowledge in writing queries against an SQL Server relational database.

Workshop Objectives:

- ▶ Understand basic database design principles and how to implement them in SQL Server.
- ▶ How to create complex inner and outer joins, summary queries, and subqueries that do more of the database processing for you so that your applications can do less?
- ▶ What the different data types are and how to handle the common problems you run into with various types of data?
- ▶ How to take advantage of powerful backend database features like views, scripts, stored procedures, and triggers?
- ▶ Understand the differences between view, stored procedures, triggers, and user-defined functions.
- ▶ Utilize SQL Server transactions to insure data integrity.
- ▶ The basics of database design and implementation using SQL DDL statements or the new Management Studio.