



Information Technology

Querying Data with Transact-SQL

Course Introduction

This training course is designed to provide participants with the fundamental concepts related to Transact-SQL. This will cover topics such as introduction to SQL Server, the versions of SQL Server, including cloud versions, how to connect to SQL Server using SQL Server Management Studio, writing SELECT queries, grouping and aggregating data, and programming with T-SQL.

Target Audience

- Cloud Computing Engineer
- Computer Network Specialist
- Computer Support Specialist
- Database Administrator
- Information Technology Analyst
- Information Technology Leadership
- Information Security Specialist
- Software/Application Developer
- Web Developer
- Technology sales consultant

Learning Objectives

- Gain a comprehensive understanding of the key capabilities and components of SQL Server.
- Learn T-SQL, sets, and predicate logic.
- Write a single table and multi-table SELECT statement.
- Write SELECT statements with filtering and sorting.
- Understand how SQL Server uses data types.

- Write DML statements, queries that use built-in functions, queries that aggregate data and subqueries.
- Create and implement views and table-valued functions.
- Use set operators to combine query results.
- Write queries that use window ranking, offset, and aggregate functions.
- Transform data by implementing pivot, unpivot, rollup and cube.
- Create and implement stored procedures.
- Add programming constructs such as variables, conditions, and loops to T-SQL code.

Course Outline

- **Day 01**

- Module 1: Introduction to Microsoft SQL Server**

- Module 2: Introduction to T-SQL Querying
 - Module 3: Writing SELECT Queries
 - Module 4: Querying Multiple Tables

- **Day 02**

- Module 5: Sorting and Filtering Data**

- Module 6: Working with SQL Server Data Types
 - Module 7: Using DML to Modify Data
 - Module 8: Using Built-In Functions

- **Day 03**

- Module 9: Grouping and Aggregating Data**

- Module 10: Using Subqueries
 - Module 11: Using Table Expressions
 - Module 12: Using Set Operators

- **Day 04**

- Module 13: Using Windows Ranking, Offset, and Aggregate Functions**

- Module 14: Pivoting and Grouping Sets
 - Module 15: Executing Stored Procedures

- **Day 05**

Module 16: Programming with T-SQL

- Module 17: Implementing Error Handling
- Module 18: Implementing Transactions

Confirmed Sessions

FROM	TO	DURATION	FEES	LOCATION
June 30, 2025	July 4, 2025	5 days	4250.00 \$	UAE - Dubai
July 21, 2025	July 25, 2025	5 days	4950.00 \$	Spain - Madrid
Oct. 6, 2025	Oct. 10, 2025	5 days	4250.00 \$	UAE - Abu Dhabi