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## Introduction

* + What is SQL
  + Why learn SQL
  + What is Database & Types
  + SQL Commands
  + Setup Your Environment

## Query Data (SELECT)

* + SELECT
  + FROM
  + WHERE
  + ORDER BY
  + GROUP BY
  + HAVING
  + DISTINCT
  + TOP
  + Query Order & Execution

## Data Definition (DDL)

* + CREATE
  + ALTER
  + DROP

## Data Manipulation (DML)

* + INSERT
  + UPDATE
  + DELETE

## Filtering Data

* + Comparison Operators
  + Logical Operators
  + BETWEEN
  + IN
  + LIKE

## Combining Data

* + JOINS
  + SET Operators

## Row-Level Functions

* + String Functions
  + Numeric Functions
  + Date & Time Functions
  + Null Functions
  + Case Statement

## Aggregation & Analytical Functions

* + Aggregate Functions
  + Window Basics
  + Window Aggregate Functions
  + Window Ranking Functions
  + Window Value Functions

## Advanced SQL Techniques

* + Subqueries
  + CTE (Common Table Expressions)
  + Views
  + CTAS Table & Temp Tables
  + Stored Procedure
  + Triggers

## Performance Optimization

* + Indexes
  + Partitions
  + Performance Tips

## AI & SQL

* + Generate SQL Code
  + Explain SQL Code
  + Understand & Learn SQL Concepts
  + Styling Code & Comments
  + Create Code Documentation
  + Explaining Error Messages
  + Find Bugs & Fixing Errors
  + Translating Queries between Different Databases
  + Generating Sample Data
  + Optimizing Performance

## SQL Projects

* + Data Warehousing Project
  + Exploratory Data Analysis (EDA) project
  + Advanced Data Analytics Project