

## Oracle11g PL/SQL Programming

Length: 3 Days

Audience: Programmers and Database Administrators responsible for the development or maintenance of application systems which access an Oracle database.

Prerequisites: Oracle11g SQL & SQL\*Plus and knowledge of a procedural language (e.g., COBOL, C).

Overview: The course provides a comprehensive introduction to PL/SQL, Oracle's procedural language extension to SQL. PL/SQL is used to write stored procedures, packages, and database triggers. PL/SQL will be of particular interest to individuals developing applications in a client-server or multi-tier environment.

Topics discussed include:

### Overview of PL/SQL

#### Variables and Constants

- Identifiers
- Datatypes
- Variables
- Associative Arrays
- Expressions

#### PL/SQL Executable Statements

- Control Structures
- Conditional Statements
- Loops

#### Embedding SQL Within PL/SQL

- Implicit Cursors
- Explicit Cursors
- Parameterized Cursors
- Transaction Processing
- Cursor Variables

#### PL/SQL in the SQL\*Plus Environment

#### Handling Exceptions

- Predefined Exceptions
- User-Defined Exceptions
- RAISE Statement
- Propagation of Exceptions

## PL/SQL Built-in Functions

### Subprograms

- Procedures
- Functions
- Parameter Modes
- RETURN Statement
- Overloading
- Recursion

### PL/SQL on the Server

- Stored Procedures
- Stored Functions
- Subprogram Inlining
- Introduction to Database Triggers

### Using Predefined Packages