

Developing Object-Oriented Programs in Java

Description

This intermediate course uses an example-based approach to provide an overview of the object-oriented paradigm and to illustrate the evolutionary development approach supported by Java™. At the end of this course you will be familiar with the core components and packages of the Java™ Standard Edition and you will be able to apply object-oriented programming principles with Java™, Java™ syntax and semantics. You will have a clear understanding of advanced Java™ topics and Java new features.

Audience

This course is designed for developers, software and system architects and project managers involved with the development of Java™ applications.

Prerequisites

Experience in the following areas is required: Some prior programming experience in a procedural or object-oriented language.

Outline

Java SE Language Fundamentals

- Primitive Data Types
- Interfaces

- Classes and Methods
- Inheritance
- Core Class Library
- Collections and Streams
- Exception Handling
- Type Casting

New language Features

- Generics
- Compile-time type safety.
- Collections Framework (JSR 14).
- Enhanced Iterators (JSR 201)
- Autoboxing/Unboxing
- Typesafe Enums
- Vararg
- Static Import
- Metadata (Annotations)