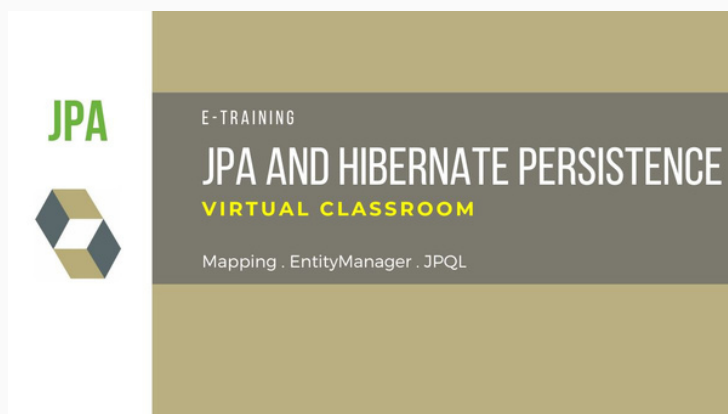


Module : JPA and Hibernate persistence

Want to master JPA and Hibernate? This training teaches you how to use the JPA standard and the Hibernate ORM in your web applications. You will be able to install the JPA persistence API and the Hibernate ORM, create entity managers, implement mapping and perform JPQL and HQL queries.

Prerequisites : Java SE programming, Java Database connectivity.



Ways to take this course: Online Instructor Led
Online self-paced
Video On Demand

Video conference tool : ZOOM

Duration : 21 H (3 days)

Architectures and integration

ORM and client/server application
ORM and web application
ORM in Distributed Architecture
Hibernate Spring Integration
Other

Advanced Topics

Transactions
Exceptions
Cache management
Lazy-Loading
Inheritance mapping
Association mapping

OUTLINE

Introduction

JDBC concepts
ORM: Object Relational Mapping
JPA, Hibernate: history
When to use JPA, Hibernate?
Hibernate and the JPA specification
Competitors: EclipseLink, iBatis
Hibernate Versions

Persistence with JPA

JPA Specification
JPA Architecture
Persistence Provider
EntityManagerFactory
EntityManager, persistence.xml
Persistence operations
CRUD on entities
@ManyToOne, @ManyToMany
Eager, Lazy
Fetching

Persistence with Hibernate

Architecture
Install, configure, IDE
Database connection
Objects: Session, Session Factory
Objects: Transaction, Query
Creating, adding and deleting objects
Hibernate Session
Mappings

JPQL and HQL

Java Persistence Query language
Structure of requests
Scalar functions
Aggregate Functions
Between, And, Like, Order
Named queries, subqueries
Eager, Lazy