

**Full Stack Java
Industrial
Training with
Industrial
Project
Development**



binarystacktechnologies.com

7666855175

Introduction to Frontend Development



- Introduction to Frontend Development
- Frontend Technologies
- What is Web Page and Web Server
- Introduction to HTML/HTML5
- Introduction to CSS
- Introduction to CSS Framework
 - Bootstrap
 - Material Design
- Introduction to JavaScript
- Introduction to TypeScript
- Introduction to JQuery
- Modern ES6 + Features
 - Promises, Async/Await



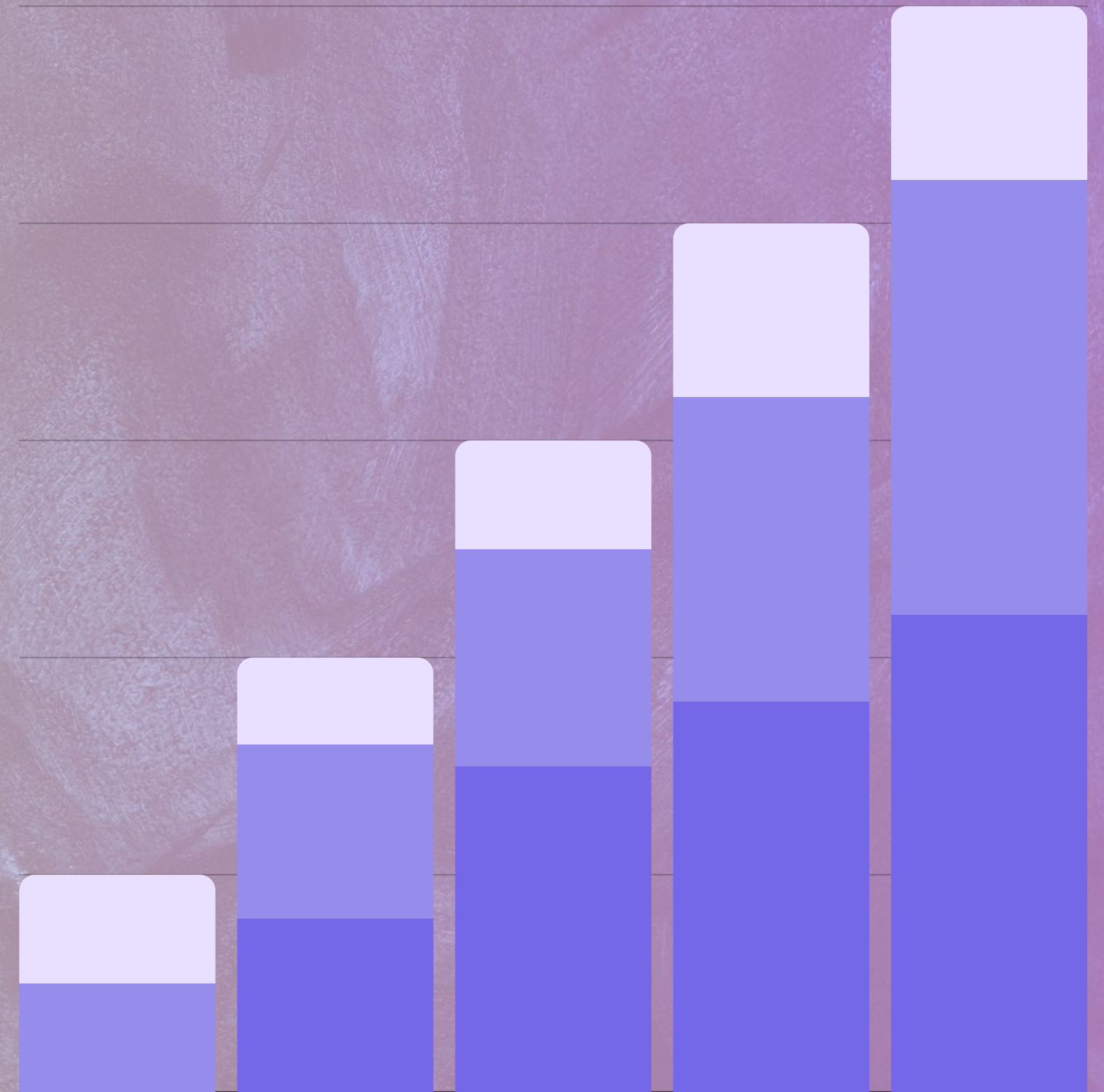
Introduction to Core Java



Introduction to Core Java

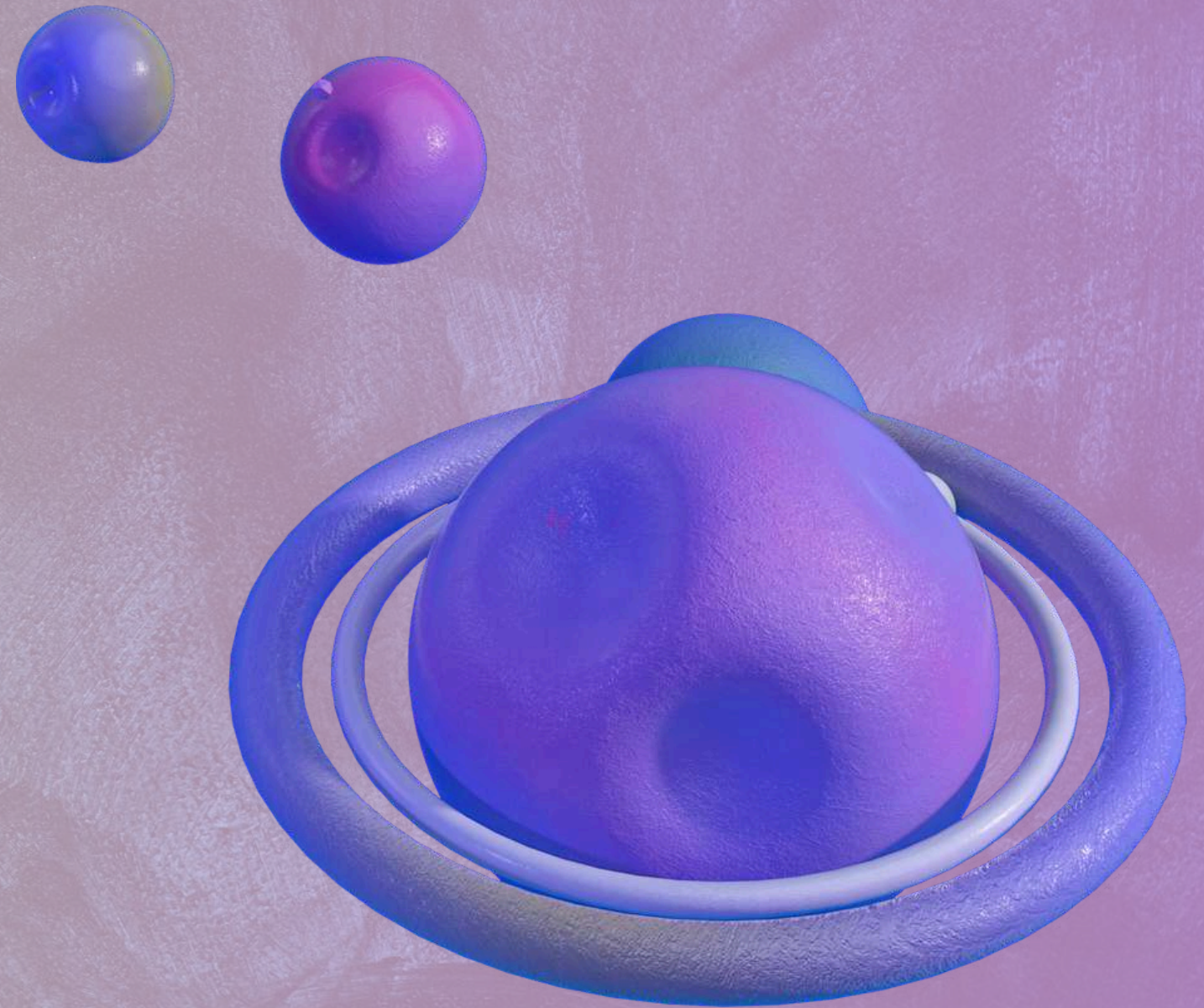
- Overview of Java
- Introduction to Java
- Data Types in Java
- Operators in Java
- Control Statements in Java
- JVM Architecture Overview
- Input and Output
- Arrays in Java
- Strings in Java
- Classes and Objects
- Inheritance & Polymorphism
- Inner Classes – Relationship between Objects
- Abstract Classes & Interfaces
- Exception Handling
- Multithreading
- JVM
- File Handling
- Introduction to Collections Framework
 - List, Set, Map, Properties
- Java Memory Management
- Lambda Expressions
- Functional Interfaces
- Defaults & Static Methods
- Wrapper Classes

Introduction to Advanced Java



- Introduction to Advanced java
- Introduction to Databases
- Types of Databases
- Introduction to JDBC
- Connection
- Introduction to JDBC Architecture
- CRUD Operations
- Connection Pooling
- Steps to Create JDBC Application
- Introduction to Servlets
- What is Web Applications
- Web Application Architecture
- Client & Server Architecture
- HTTP Protocols
- What is Servlet
- Servlet API
- Servlet Life Cycle
- Steps to Create Servlet
- Deployment Descriptor
- Servlet Interface
- Generic Servlet Class
- Session Tracking in Servlets
- Servlet vs JSP
- JSP Life Cycle
- JSP Scripting Elements
- MVC Architecture Introduction
- Form Development
- Mini Project Development

Introduction to Spring & Spring Boot



- Introduction to Spring
- Architecture of Spring
- Inversion of Control (IoC)
- Dependency Injection
- Bean Configuration
- Spring Beans Lifecycle & Scopes
- Spring Annotations
- Spring Expression Language (SpEL)
- Aspect Oriented Programming
- Types of Advice in AOP
- Creating Aspects in Spring
- Spring JDBC, ORM, Data JPA
- Transaction Management in Spring
- Introduction to Spring MVC

Introduction to Spring

- Handling Forms in Spring MVC
- Spring MVC Annotations
- Exception Handling in Spring MVC
- Introduction to Spring Security
- Authentication & Authorization
- Spring Security Configuration
- Building RESTful Web Service
- Handling HTTP methods in REST
- Exception Handling in REST
- Spring HATEOAS
- Spring Testing with JUnit & Mockito
- Spring TestContext Framework
- Mocking in Spring Test
- Integration Testing in Spring

- Introduction to Spring Boot
- Architecture & Annotation
- Creating a Spring Boot Project
- Spring Boot Application Structure
- Application Properties & YAML Conf
- Spring Boot Auto-Configuration
- Customizing Spring Boot Config
- Spring Boot Profiles
- Building REST APIs with Spring Boot
- Data Validation & Exception Handling
- Spring Boot DevTools
- Spring Data JPA with Spring Boot
- DataBase Initialization in Sp. Boot
- CRUD Operations in Sp. Boot
- Security in Sp. Boot
- Customizing Security in Sp. Boot
- JWT Authentication & OAuth2
- API Gateway in Sp. Boot
- Inter-Service Communication
- Distributed Configuration
- Monitoring & Tracing with Sp. Boot
- Testing in Sp. Boot
- Integraion Testing in Sp. Boot
- Spring Boot Actuator
- Customizing Actuator Endpoints
- Packing Spring Boot Application
- Deploying Spring Boot Application



Introduction to Hibernet and Microservices

Introduction to Hibernate

- Introduction to Hibernate
- Hibernate Architecture
- Hibernate ORM Concept
- Hibernate Configuration
- Hibernate Annotations
- Mapping Entities with Annotations
- Hibernate XML Mapping
- Session Management in Hibernate
- Transaction Management
- CRUD Operation with Hibernate
- Query Language Basics
- Criteria API for Querying
- Native SQL Queries
- Native SQL Queries
- Relationship in Hibernate
- Caching in Hibernate
- Hibernate Interceptor & Event Listeners
- Batch Processing in Hibernate
- Performance Tuning & Optimization
- Integration Hibernate with Spring
- Error Handling in Hibernate
- Exception Management in Hibernate
- Hibernate Mapping File vs Annotation
- Advanced Hibernate Features
- Hibernate with JPA

- Introduction to Microservices
- Microservices Architecture
- Benefits & Challenges of Microservices
- Service Decomposition & Boundaries
- Communication Patterns
- API Gateway & Management
- Service Discovery & Registration
- Configuration Management
- Inter-Service Communication
- Circuit Breaker Pattern
- Distributed Tracing
- Centralized Logging
- Security in Microservices
- Data Management & Consistency in Microservices
- Event-Driven Microservices
- Fault Tolerance and Resilience
- Scaling Microservices
- Testing Microservices
 - Unit, Integration, End-to-End
- Microservices with Spring Boot

Full Stack Java Industrial Project Development and Deployment



**Thank
you very
much!**

