Java Developer Course Syllabus

Modules	Topics
1. Introduction to Java Programming	Java Features and Comparison with C/C++ JDK/JRE Installation and Environment Setup First Java Program: Command Prompt & Eclipse JDK Directory Structure
2. Data Types and Operators	Primitive and Non-Primitive Data Types Variables and Naming Conventions Literals: Numeric, Character, and String Arrays and Array Manipulation Operators: Arithmetic, Relational, Logical, and Conditional Control Flow Statements: if-else, switch-case, loops Type Conversion and Casting
3. Object-Oriented Programming in Java	Classes, Objects, and Methods Abstraction and Encapsulation Inheritance and Polymorphism Interfaces and Abstract Classes Memory Management in Java
4. Packages in Java	Package Declaration and Import Statement Resolving Name Clashes with Packages
5. Miscellaneous Concepts	Variable Types and Memory Allocation Var-Args and toString() Method
6. Static Concepts in Java	Static Variables, Methods, and Blocks Static Imports and Inheritance Concepts
7. Constructors	Properties and Types of Constructors Constructor Chaining and Implementation Rules Constructors in Enumerated Data Types and Abstract Classes
8. Exception Handling	Exception Types and Keywords Custom Exceptions and Assertions
9. Strings in Java	String Memory Management and Immutability String Operations and Manipulation StringBuilder and StringBuffer
10. Collection Framework	Set, List, and Map Interfaces Queue Interface and Utility Classes Sorting Collections and Overriding Methods