SKILL 9
SKILLS FOR LIFE

Full Stack Java

Development

"**Become a Full Stack Java developer**"

In Just 100 Hours

(App. 3-4 months)

Blended Approach

Instructor Led-Hands on - 80 Hours
Real Time Project - 20 Hours

Transform your future with our education

Scan QR code for more information about Skill9

SKILL9 Academy
SS Prime, AGB Layout,
Hesaraghatta Main Road, Bengaluru, 560090

info@skill9academy.com
☎ +91 7892542611 / +91 7975880810
☎ +91 8023414488 / +91 8025714488
www.skill9academy.com

Why take this course?

- **Designed for Graduates/Under Graduates or job seekers and professionals who wants to enhance their technical knowledge**
- **Studying/Studied GRADUATION**
- **Any Graduate/engineer who is interested in Coding Freshers/Graduates**
- **Non-programming engineers**

In addition Course helps you

- **Improve your logical thinking: Improve your problem-solving abilities**
- **Improve your searching skills: Understand how software applications work**
- **Find a nice and well-paid job; Improve your self-confidence**
- **100% JOB ASSISTANCE after completion of course to make your Profile reach to Hundreds of Recruiters in our network and with the company we have tie up**

Features

- **Real-Time Projects**
- **Hand's On Experience**
- **Mock Tests and Mock Interviews**
- **Daily Assignments and Seminars**

Scan QR code for more information about Skill9

SKILL9 Academy
SS Prime, AGB Layout,
Hesaraghatta Main Road, Bengaluru, 560090

info@skill9academy.com
📞 +91 7892542611 / +91 7975880810
☎ +91 8023414488 / +91 8025714488
www.skill9academy.com

Core Java   10 Hours

Section 1   (3 hrs)

- **Introduction to programming**
- Introduction to java
- JDK installation
- Keywords, Identifiers, variables
- Operators, Method/Functions
- Flow Control Statements
- Arrays, Strings
- Interactive programs in java using Scanner

Section 3   (3 hrs)

- Java Built-in packages and API
- Overview of java API
- Object class
- String, String Buffer and String Builder
- Exception Handling
- Threads and multithreading
- Wrapper Classes
- Data Structures
- JAVA COLLECTION FRAMEWORKS***
- File Handling, Serialization
- Encapsulation

Section 2   (4 hrs)

- **Object Oriented Programming System**
- Classes and Objects
- Object creation
- Reference variable
- Global and local variables
- Constructors
- Aggregation
- Composition
- Inheritance ***
- Method Overloading
- Method Overriding
- Abstract classes
- Interfaces
- Typecasting
- JVM architecture
- Polymorphism
- Abstraction
- Java packages
- Access Specifies

Subject Evaluation

J2EE - 1

4 Hours

JSP

Result Set

- How to handle the result set object
- How to process the result set object

SERVLET

- Introduction
- What is web browser?
- What is web resources?
- Types of web resources
- What is web server?
- Installing of apache tomcat web server

Web URL

- Web url structure.
- Query string.
- HTTP & HTTPS protocols.
- Key elements of HTTP request and HTTP response
- HTTP methods.
- Difference between GET and POST.

Closing of JDBC objects

- Why to close an object?
- How to close an object

About servlet

- Servlet introduction
- Creating the first servlet in web app
- Steps to create WAR file
- Build & Deployment process

Servlet Container

- About servlet containers & its advantages
- Request and response objects
- GetParameter() and getParameters() methods
- About XML
- About deployment descriptor(web.xml)

J2EE - 2

4 Hours

JSP

Introduction to JAVA EE

- What is computer ?
- What is an application?
- Types of application?
- What is standalone application?
- What is web application?
- What is network?
- What is internet?
- What is intranet?
- What is server?
- What is database?
- What is an api?
- What is J2ee?
- Types of api's
- JAVA EE 3-tier architecture
- JAVA EE 2-tier architecture.

Drivers

- Introduction.
- What is a JAR file?
- About driver class
- How to load the driver class into the program
- Types of Driver

JDBC

- Introduction
- Steps to work with JDBC
- JDBC pre-requirements
- Installing MYSQL,DB server
- FIRST JDBC program

Db url

- What is url?
- Structure of db url

Connection interface

- Driver Manager class
- About the get connection method
- Connection object

JDBC objects and methods

- Introduction
- Dynamic and static sql queries
- Statement and prepared statement objects
- ExecuteQuery() and executeUpdate() methods

J2EE - 3

4 Hours

JSP

Servlet Hierarchy

- Generic servlet
- HTTP Servlet
- Difference between Generic servlet and HTTP Servlet
- Servlet life cycle
- Single thread model servlets
- Servlet context and servlet config
- Redirect,Forward and Include

Cookies

- Introduction
- Steps to create a cookie in the servlet
- Types of cookies
- Life cycle of cookies
- Application of cookies

JSP

- Introduction
- How to create JSP
- Difference between Servlet and JSP

Attributes

- What is an attribute?
- Need of attributes
- Types of attributes

Session

- Introduction
- Steps to create a session in the webapp
- Types of session
- Life cycle of session
- Application of session

JSP Scripting Elements

- Scriptlet tag
- Expression tag
- Declaration tag

JSP implicit objects

- Request object
- Response object
- Config object
- Application object
- Session object

Jstl

- Introduction
- JSTL core tags
- JSTL function tags

Exception handling in JSP

- About isErrorPage and errorPage

Subject Evaluation

Hibernate

- Understand ORM and basics of Hibernate
- Understand and implement life cycle of Hibernate Persistence and Session Factory
- Implement Hibernate Mappings, Inheritance and Types
- Understand Hibernate Criteria and Query Language
- Exploring Hibernate Transactions, Filter and Performance
- Implement Hibernate Search and Validations
- Hibernate with NoSQL and Spring

Springs

- Introduction
- why spring
- Spring modulus
- Spring application
- Spring in eclipse

Hibernate

- MVC introduction
- multiple controllers
- model interface
- request Param annotation
- form tag library, text field
- form radio field, checkbox
- form drop-down list
- JDBC Template Example
- PreparedStatement
- ResultSetExtractor
- MVC CRUD Example
- spring MVC Validation

Spring IOC

- IOC container
- dependency injection
- constructor injection
- injection dependent object
- injection with collection
- constructor injection with map
- injection in inheritance been
- setter injection
- setter injection dependent object
- setter injection with collection
- setter injection with map
- injection versus setter injection
- factory method

Subject Evaluation

Database -1   8 Hours

Introduction (1 hr)

- What Is Database?
- What is Database Management System (DBMS)?
- What is Relational Model ?
- Introduction to RDBMS .
- Brief on E.F CODD .

Datatypes and Constraints (1 hr)

- What are Datatypes ?
- Types and Examples .
- How to use .
- What are Constraints?
- Types and Examples.
- How to use.

Statements in SQL (1 hr)

- Data Definition Language (DDL)
- Data Manipulation Language (DML)
- Transaction Control Language (TCL)
- Data Control Language (DCL)
- Data Query Language (DQL)

Software installation (1 hr)

- Installing and set up of software
- Working on Oracle 10g.

Operators (1 hr)

- Types and Examples

Data Query Language (DQL) (2 hrs)

- Select
- From
- Having
- Where
- Group By
- Order By

Functions in SQL (1 hr)

- Introduction on Pseudo Columns
- ROWID
- ROWNUM
  - Sum ()
  - Avg ()
- Working and Usage

SKILL9 Academy
SS Prime, AGB Layout,
Hesaraghatta Main Road, Bengaluru, 560090

info@skill9academy.com
+91 7892542611 / +91 7975880810
+91 8023414488 / +91 8025714488
www.skill9academy.com

Sub Query (1 hr)

- Introduction to Sub Query
- Working of Sub Query
- Query Writing and Execution
- Types of Sub Query
  - Single Row Sub Query
  - Multi Row Sub Query
- Nested Sub Query.

Pseudo Columns (1 hr)

- Single Row Functions
- Multi Row Functions
  - Max ()
  - Min ()
  - Count ()

JOINS (3 hrs)

- What Is Join?
- Types of Joins.
- Cartesian Join
- Inner Join
- Outer Join
- Self-Join
- Queries and Examples.

Co- Related Sub Query (1 hr)

- Working and Examples

Data Definition Language (DDL) (2 hrs)

- Create
- Rename
- Alter
- Truncate
- Drop

Database - 3

4 Hours

Transaction Control Language (TCL) (1 hr)

- Commit
- Save point
- Rollback

Data Control Language (DCL) (1 hr)

- Grant
- Revoke

Normalization (1 hr)

- Introduction to Normalization
- Types of Normal Forms
- Examples.

E R Diagrams (1 hr)

- Introduction to ERD
- Examples.

Subject Evaluation

HTML   9 Hours

HTML Basics   (1 hr)

- Introduction to HTML
- Web Architecture
- Document Structure

Setting Up Your Environment (1 hr)

- Visual Studio Code Installation and Extensions

Essential HTML (1 hr) Components

- HTML Tags
- HTML Comments
- HTML Elements
- Self-Closing Tags
- Text Elements
- Text Formatting

Creating Forms and Lists   (2 hrs)

- HTML Forms
- Lists in HTML

Working with Media and Graphics   (1 hr)

- Images and Attributes
- Video and Audio Integration
- Scalable Vector Graphics (SVG)

Layout and Document Structure   (1 hr)

- Inline vs. Block Elements
- HTML Tables
- Semantic HTML
- Embedding Content with iFrames

Special HTML Features (1 hr)

- Marquee Tag
- The <span> Element

Practical Application (1 hr)

- Resume Project
- Form Validation

Subject Evaluation

SKILL9 Academy
SS Prime, AGB Layout,
Hesaraghatta Main Road, Bengaluru, 560090

info@skill9academy.com
📞 +91 7892542611 / +91 7975880810
☎ +91 8023414488 / +91 8025714488
www.skill9academy.com

Basics of CSS   (1 hr)

- Introduction to CSS

Working with CSS Styles (2 hrs)

- Inline, Internal, and External CSS
- Managing Color Properties in CSS
- Text Styling and Font Management

Working with CSS Styles (1 hr)

- CSS Selectors and the Concept of Inheritance
- Class and ID Selectors in CSS

Layout and Design Techniques   (2 hrs)

- The CSS Box Model
- CSS Sizing Units
- Styling Images and Backgrounds
- Advanced Layouts with Flexbox and Grid

Advanced CSS Styling (2 hrs)

- Positioning Elements in CSS
- Mastering Colors and Backgrounds, including Gradients
- Transitions and Animations in CSS
- Transformations in CSS
- Creating Box Shadows with CSS

Subject Evaluation

Scan QR code for more information about Skill9

Javascript 5 Hours

Introduction to JavaScript (1 hr)

- What is JavaScript?
- JavaScript in Web Development

JavaScript Statements & variables

- Expressions and Statements
- Semicolons in JavaScript

JavaScript Syntax

- Variables and Constants
- Comments
- Case Sensitivity

let, const, and var

- Using let
- Constants with const
- Legacy var Keyword

Arithmetic in JavaScript

- Mathematical Operators
- Operator Precedence

Data Types in JavaScript

- Primitive Data Types
- Objects and Reference Types

JavaScript Functions (1 hr)

- Declaring Functions
- Function Parameters and Arguments
- Return Statements

JavaScript Objects (1 hr)

- Creating Objects
- Object Properties and Methods
- Object Constructors

JavaScript Events & Array Methods & Comparison

- Event Listeners
- Handling User Interactions
- Working with Arrays
- Array Iteration Methods
- Equality and Inequality
- Strict vs. Loose Comparison

SKILL9 Academy
SS Prime, AGB Layout,
Hesaraghatta Main Road, Bengaluru, 560090

info@skill9academy.com
📞 **+91 7892542611 / +91 7975880810**
☎ **+91 8023414488 / +91 8025714488**
www.skill9academy.com

Loops & Hoisting in JavaScript   (1 hr)

- for, while, and do...while Loops
- Loop Control Statements
- Variable and Function Hoisting

Classes & this Keyword in JavaScript

- ES6 Class Syntax
- Context and Scope
- Using 'this' in Functions

ES6 Features   (1 hr)

- Arrow Functions
- Template Literals
- Destructuring

Async/Await

- Handling Asynchronous Code
- Promises and Async/Await

DOM Methods

- Selecting DOM Elements
- Modifying the DOM

Subject Evaluation