



Java™

Core Java & Advanced Java

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About Training Basket

At Training Basket, we take pride in ourselves for maintaining our position in the technology-training ecosystem as the top quality-training provider in "Specialized Technologies" and thus being able to get the best placement package available for our students in blue chip companies. Training Basket not only teaches the students, but also undertake corporate workshops and conduct seminars in various engineering colleges. We conduct programmes to promote the build-up of adequate and industry ready IT professionals for development and distribution of knowledge and grasp out to the larger association through continuation, at the state, national and international levels.

Training Basket team works at delivering the best technical training and facilities. We provoke new knowledge by alluring in cutting-edge research and to bolster students and expert expansion by offering IT industry high demand training programs.

In addition, global technology leaders like Red Hat and Times of India (TSW) have chosen Training Basket as their Master Certified Training partner to deliver their authentic, certified training, to enterprises and IT professionals across India.

About Java

Java is an object-oriented programming language developed by James Gosling and colleagues at Sun Microsystems in the early 1990s in an effort to create a new language that would allow developers to write platform independent code. JAVA is platform independent because it is having it's own JVM so that it can run on Microsoft Windows, Linux, Solaris OS, and Mac OS.

Core Java

Core Java is mainly used to design application software for both desktop and server environments. Core Java is the most basic and the purest form of Java which set the foundation for other editions of the programming language. Core Java" is Sun's term, used to refer to Java SE, the standard edition and a set of related technologies, like the Java VM, CORBA, etc.

Advanced Java

Advanced java is the next level of java programming. It is two tier architecture i.e client and server advance java programming covers the swings, socket, awt, thread concept as well as collection object and classes. Advance java is used for web based application, enterprise application, web, networking, data base handling etc.

Training Basket trainers have in depth experience in teaching both Core and Advanced Java in live Classroom, Online and Corporate Scenarios.



Core Java

Course Duration : 60 Hours

Introduction to Java

- Features of Java
- Java Virtual Machine
- C, C++ & Java: A comparison
- Platforms of Java & Versions
- First Java Program

Data Types & Identifiers

- 8 Data types in java, complete overview.
- Types of variables Operators & statements
- Reading input from java.util.Scanner class
- Displaying output with System.out.print()
- Displaying formatted output with String format()

Classes & objects

- OOps concepts
- Creating an object
- Initializing an instance variable
- Access modified
- Constructors & its types

Methods in Java

- Method prototype, static keyword
- Static methods
- Mutators & Accessors
- Passing parameters in methods (primitives & Objects)

Relationship B/W objects

- Relating objects using references
- Inner classes

Encapsulation, Inheritance & Polymorphism

- Concept of inheritance
- The keyword 'super and final';
- Abstract classes
- Interface
- Packages



Abstract Classes & Interfaces

- Abstract Method & Classes
- Interface
- Multiple Inheritance using Interfaces
- Abstract Classes vs. Interfaces

ARRAYS

- Why java arrays are different from the array of C and C++
- How array can be created in java
- How is array iterated in java
- The zigzag array
- How array can be used in software development.

Strings

- Creating Strings
- String class methods
- String comparison
- Immutability of strings
- Spring 3 Architecture
- Introduction to Inversion Of Control
- String buffer & string Builder
- Creating string builder object
- String builder class methods
- String builder class

Packages

- Concept of Packages
- Need to packages
- How to create packages using compiler
- How to use packages
- Concept of JAR file
- How to create the JAR file

Exception handling

- Errors in java program
- Concepts of exceptions
- Keywords: throw, throws,
- Multiple exceptions

Wrapper Classes

- Number Class



Character Class

- Byte, Short, Integer, Long, Float, Double, Boolean Classes
- Math Classes

Multi Threading

- What is a Java thread
- Need of thread in Java
- The constructor and methods of Thread class
- Life cycle of Java thread
- Writing Thread using Thread Class and Runnable Interface
- Daemon and Non-Daemon threads
- Synchronization in java
- Thread collaboration
- Writing a real life application using multi-threads

Concurrency

- Creating Atomic variables
- Using Read-Write Locks
- Thread-safe collections
- Concurrent synchronizers (Semaphore and others)
- Executors and ThreadPools to concurrently schedule tasks
- Parallelism and the Fork-Join framework
- Streams & Files
- Creating a File
- Reading & Writing data from a File
- Zipping & Unzipping File
- Serialization/de-serialization of Objects

File I/O with NIO 2

- The Path interface
- The Files class
- Directory and File operations
- Managing file system attributes
- Reading, writing, and creating files
- Watching for file system changes



Advanced Java

Course Duration : 90 Hours

NETWORKING

- Develop code to set up the network connection Understand TCP/IP
- Use Server Socket and Socket classes to implement TCP/IP clients and servers
- Understand UDP
- Use Datagram Socket and Datagram Packet classes to implement UDP based clients and servers
- RMI (Remote Method Invocation)
- JNDI (Java Naming Directory Interface)

GENERICCS

- Generic classes
- Generic Interfaces
- Generic Methods

COLLECTION FRAMEWORK

- Introduction of Collection Framework
- Need of Collection
- Collection API (the classes and interfaces)
- The methods of Collection interface
- List Interface (the Array List, Vector, Linked List, and Stack classes)
- The Iterator, List Iterator, and Enumeration interfaces
- Set Interface (the HashSet, LinkedHashSet classes)
- Map Interface (the Hashtable, HashMap, LinkedHashMap, classes)
- The Comparable and Comparator interfaces
- The TreeMap and TreeSet classes
- How Collection Framework is used in industry (the real Project Development)
- Writing an application using Collection API and JDBC

DATABASE CONNECTIVITY (THE JDBC)

- Concepts of JDBC
- Need of JDBC
- Types of JDBC Drivers
- Type1: Jdbc-Odbc Bridge Driver
- Type2: Native API Driver
- Type3: Middleware layer Driver
- Type4: Pure Java Driver
- Difference between the JDBC drivers
- Connecting with Databases (MS Access, My Sql, and Oracle)
- Executing query in database
- Other miscellaneous topics in JDBC



Graphics Programming Using

- AWT
- Swing
- Applets

Localization

- Advantages of localization
- Defining locale
- Read and set locale using the Locale object
- Resource bundles
- Format messages, dates and numbers

SERVLETS AND JSP

- Introduction of Servlet
- Difference between CGI, PHP, ASP, and Servlet
- Lifecycle (callback) Methods Of Servlet
- Servlet Implementation & Configuration
- ServletRequest and ServletResponse Interface and their method
- ServletConfig and ServletContext Interface and their method
- Introduction of Web server i.e. Apache Tomcat, Oracle Weblogic
- Introduction to IDE (Integrated Development Environment) like: Eclipse, NetBeans
- The JSP (Java Server Pages)
- The concept of Java Beans
- Using Java Beans with the JSP.

STRUTS 2.X

- Introduction of MVC Design Pattern
- Introduction of Struts2
- Struts2.x Architecture
- Introduction of Component of Struts 2 like: Action, Results & Interceptors
- Heart of Struts2.x i.e. Interceptor
- Working of Param Interceptor
- Working of model Driven Interceptor
- Working of I18N(Internationalization) Interceptor
- Working of execAndWait Interceptor
- Working of exception Interceptor
- Working of Validation Interceptor
- Object Graph Navigation Language(OGNL)
- Struts 2 Dynamic Method Invocation
- Struts 2 Tags
- Struts 2 UI Tags
- Struts 2 Control Tags
- Struts 2 Tile Introduction
- Integrating Struts2 and Hibernate



SPRING 3.X

- Spring 3.x Overview
- Spring 3 Architecture
- Introduction to Inversion Of Control
- Dependency Injection
- Constructor Injection
- Setter Injection
- Factory Method Creation
- Introduction to Aspect Oriented Programming (AOP)
- Auto wiring
- JDBC templates
- Introduction of Spring MVC
- Architecture of Spring MVC
- Developing application through Spring MVC

HIBERNATE 3.X

- Introduction of Hibernate Framework
- Introduction of Session Factory & Session Interface
- Data Base Persistence Using Hibernate
- Is-A Mapping
- Has-A Mapping
- HQL in hibernate



Q: Why should I choose Training Basket over other training providers?

Ans. Training Basket provides a unique amalgamation of quality, convenience, flexibility and cost. Training Basket has some of the best trainers in the industry. Our trainers excel not just in depth and width of knowledge, but also in their patience and ability to explain difficult concepts in simple terms.

Training Basket has made serious investments with long-term vision for ensuring good environmental factor for studies by first buying their own suites in the prestigious iThum Towers in NOIDA, Sec-62. This lets us configure our labs and classroom suited best to our student's comfort and focused studies.

Q: What is the criterion for availing the Training Basket job assistance program?

Ans: All Training Basket students who have successfully completed their training in any of our courses are directly eligible for placement assistance.

Q: Which are the companies that Training Basket has placed students in the past?

Ans: We have exclusive tie ups with MNC's like Ericsson, Cisco, Cognizant, Tech Mahindra, MEON, Bingo, Genpact etc.

Q: Do I need a prior industry experience in getting an interview opportunity?

Ans: There is no need to have prior opportunity for getting an interview call. The successful completion of any industry level technology training at Training Basket is like an industry experience. This training makes you confident to clear interviews and we also conduct in-house mock interviews on our online assessment platform where we assess our student's skills by testing their code online or industry specific assessment before sending them for interviews.

Q: How does Training Basket assist in placement?

Ans: You will be guided on creating an attractive template based resume. You will get opportunity to attend free personality development program and mock interviews conducted by our SME's to boost your confidence for real interviews. Plus you will be given our level assessment platform where we assess our student's skills by testing their code online or industry specific assessment.

Q: If I don't clear in first attempt, will I get another chance?

Ans: Yes, for sure. Your resume will be active on our job portal and will be visible to all our associates and clients. Training Basket will continue to send your resume to future job requirements matching your profile till you land a job.

Q: Does Training Basket Guarantee job through it's job assistance program ?

Ans: Training Basket does not guarantee job placement but it will continue to assist you on best efforts basis to place you in it's affiliated companies' network.

COMPANIES WHERE OUR STUDENTS ARE PLACED

**Tech
Mahindra**



Source Soft Solutions
We only believe in the best

Chi Networks™

ADS-eVER

MEON
DELIVERING GREAT SURFACES

BioMax™



Bingo
Change • Innovate • Lead

Dimensions
Five Dimensions Infotech

WTS Webtech Solutions

HCL

IBM

Infosys

accenture

HUAWEI

**Reliance
Jio Infocomm**

pinga™ solutions

DATA BRIDGE
MARKET RESEARCH

CoreIP
Technology Pvt Ltd

iSOURCE

**network
solutions**



Shailers
Solutions...for your need



SAMSUNG

indiatech
Solutions