

JAVA PROGRAMMING COURSE

CURRICULUM JAVA PROGRAMMING



Author: Ubaldo Acosta





JAVA PROGRAMMING COURSE

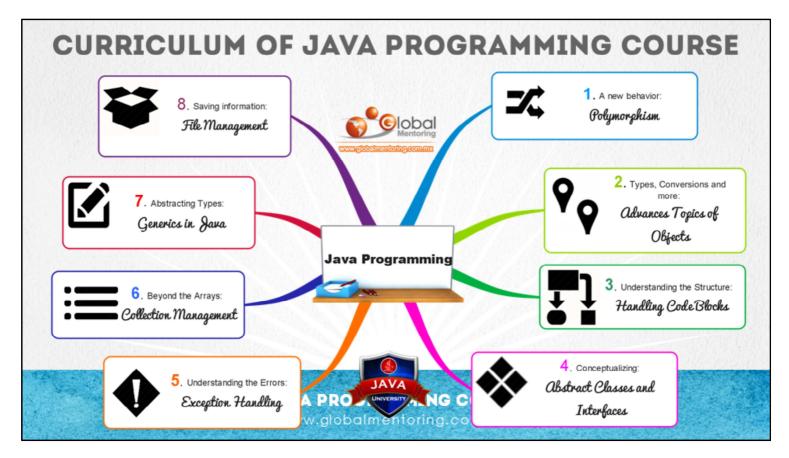
www.globalmentoring.com.mx

Hello, I hope you're ready to begin.

Let's review the general agenda of the JAVA PROGRAMMING COURSE.

Are you ready? Let's go!





Let's review the general content of the Java programming course:

A new behavior.- Polymorphism: In this section we will study the characteristics of polymorphism. What is polymorphism? Where will we use it? and its relation to object-oriented programming in java. Likewise, we will see the use of the reserved words this and super to understand in detail how the polymorphism works in java, and in turn the use of these reserved words in Java. We will create a project to put this concept into practice.

Types, Conversions and more.- Advanced Topics of Objects: In this section we will review the concept of instance of, the conversions of types in Java, we will study the class Object, and several of its methods such as the toString, equals and hashcode methods and we will see what each of them is for, among several more concepts. We will create several exercises to put these concepts into practice.

Understanding the Structure.- <u>Handling Code Blocks:</u> We will review the different existing code blocks in Java, such as initialization blocks and static code blocks. We will show the syntax of each one, as well as create several exercises to put these concepts into practice. We will also study the scope of variables in Java. The scopes in Java are: public, protected, default and private. We will see several practical examples to make clear each of these words reserved in Java.

Conceptualizing.- Abstract Classes and Intefaces: In this section we will analyze the subject of abstract classes in Java. We will understand how to apply this concept to our class design that require to apply this concept, likewise we will see the syntax and the restrictions that apply in the case of using abstract classes in Java. In turn, we will study the topic of interfaces, which is complementary to the subject of abstract classes. We will also make a comparison between abstract classes and interfaces, and when it is convenient to use one or another solution according to the class design problem that we face. We will create several exercises to understand each concept in a very concise way.

Understanding the Errors.- Exception Handling: In this section we will define the concepts for handling exceptions in Java. We will study the types of exceptions that exist in Java and how to handle each of them. We will see the syntax associated with exception handling, from how to throw an exception, how to catch and process it, and in general how to handle the whole exception topic in Java. We will create several exercises to put these concepts into practice.

Beyond the Arrays.- Collection Management: We will review the API of collections in Java, we will study the bases of this API, since it is quite broad, nevertheless with the bases that you will have once you have studied the subject, you will be able to apply any kind of the Collections API. We will analyze the most common types, which are the interfaces of Set, List and Map, as well as some concrete classes of the Collections API, such as ArrayList or HashMap. We will develop several exercises to put these concepts into practice.

Abstracting Types.- Generics in Java: We will study the concept of generic types in java, also known as generics. We will see how to define a class to handle the generic types, as well as the generic types that we can use. We will also review how to convert collections to generic types and thus generate code less prone to errors. We will create several exercises to put these concepts into practice.

Saving information.- File Management: We will learn how to handle java files, as well as the writing and reading process to them. We will conclude with an exercise to put these concepts into practice.

This is the general agenda of the JAVA PROGRAMMING COURSE. These are just some of the many more topics we will learn throughout this course. So if you're ready, let's start immediately.



ONLINE COURSE

JAVA PROGRAMMING

Author: Ubaldo Acosta





JAVA PROGRAMMING COURSE

www.globalmentoring.com.mx

At Global Mentoring, we promote the passion for Java Technology. We invite you to visit our website where you will find Java Online courses from Basic, Intermediate and Advanced Levels, and thus become an expert Java programmer.

Here we present our online courses:

- Java Fundamentals
- Java Programming
- Java with JDBC
- HTML, CSS and JavaScript
- Servlets and JSP's

- Struts Framework
- Hibernate Framework & JPA
- Spring Framework
- JavaServer Faces
- Java EE (EJB, JPA and Web Services)

www.globalmentoring.com.mx

