

Document Generated: 11/26/2025

Learning Style: On Demand

Technology:

Difficulty: Beginner

**Course Duration: 5 Hours** 

# **Ruby Fundamentals**



## About this course:

The Ruby: Fundamentals is a programming language course which provides hands on experience to the candidates on the fundamental components of the Ruby programming language. The course provides a lab intensive, hands-on programming environment, and helps the candidates to explore object-oriented

aspects of Ruby and best practices for developing robust applications with Ruby.

This fundamental course provides a great learning experience for beginner programmers to understand the basics of Ruby programming language. The course enables the students to write a simple code in Ruby and develop the concepts that ultimately help in creating real-world applications using Ruby programming language.

# **Course Objective:**

- · Learn the syntax of Ruby programming language
- Understand and implement arrays, hashes and regular expressions
- Learn IO and exceptions
- Understand modules
- Describe Common Gateway Interface (CGI)
- Develop and implement network programming

#### Audience:

- Individuals experienced with other programming languages such as C++, Java and Perl
- Ruby on Rails developers
- QA engineers

## **Prerequisite:**

- The course requires the students to have sound knowledge of working with Java.
- The students should be able to understand and demonstrate object oriented programming with Java 7 SE and Java 8.

#### **Course Outline:**

### **Chapter 01 - Getting Started**

- Topic A: History and Installation Part 1
- History and Installation Part 2
- History and Installation Part 3
- Topic B: Conventions and Best Practices Part 1
- Conventions and Best Practices Part 2
- Conventions and Best Practices Part 3

#### **Chapter 02 - Classes and Methods**

- Topic A: Classes Part 1
- Classes Part 2
- Classes Part 3
- Topic B: Methods Part 1
- Methods Part 2

- Methods Part 3
- Topic C: Object Oriented Programming Part 1
- Object Oriented Programming Part 2
- Object Oriented Programming Part 3

#### **Chapter 03 - Variables and Data Structures**

- Topic A: Variables Part 1
- Variables Part 2
- Variables Part 3
- Topic B: Arrays and Structs Part 1
- Arrays and Structs Part 2
- Arrays and Structs Part 3
- Topic C: Hashes Part 1
- Hashes Part 2
- Hashes Part 3

## **Chapter 04 - Loops and Enumerable Methods**

- Topic A: Loops Part 1
- Loops Part 2
- Loops Part 3
- Topic B: Map, Inject, and Permutation Part 1
- Map, Inject, and Permutation Part 2
- Map, Inject, and Permutation Part 3

### **Chapter 05 - Finishing Touches**

- Topic A: File Operations Part 1
- File Operations Part 2
- File Operations Part 3
- Topic B: Input and Output Part 1
- Input and Output Part 2
- Input and Output Part 3
- Topic C: RubyGems Part 1
- RubyGems Part 2
- RubyGems Part 3