

Document Generated: 12/18/2025

Learning Style: Virtual Classroom

Technology:

Difficulty: Beginner

Course Duration: 2 Days

Python Programming: Introduction (LO-94010)



About this course:

Python® has been around for a considerable length of time and it's as yet one of the most popular and versatile languages for programming out there. Regardless of whether you have been creating programming for quite a long time or you're new to programming, Python is a great language addition to your range of abilities. With this course, you become familiar with the basics of programming in Python, and you'll create applications to show your grip on the language.

The normal compensation for a Python Developer is \$115,222 annually.

Course Objectives:

- Perform and declare tasks on simple data types, including numbers, strings, and dates.
- Design Python and build up a basic application.
- Manage directories and files with code.
- Explain and use classes, functions, and modules.
- Compose conditional statements and loops.
- Perform and Declare tasks on data structures, including ranges, lists, dictionaries, tuples, and sets.
- Manage exceptions.

Audience:

This course is intended for individuals who need to gain proficiency with the Python programming language in anticipation of utilizing Python to create desktop and web applications.

Prerequisites:

It is suggested, yet not compulsory, that you have an experience of a half year programming in an object-oriented language. Regardless of whether you don't, this course can be valuable to the people who are fresh to programming.

Course Outline:

Lesson 1: Setting Up Python and Developing a Simple Application

Topic A: Set Up the Development Environment

Topic B: Write Python Statements

Topic C: Create a Python Application

Topic D: Prevent Errors

Lesson 2: Processing Simple Data Types

Topic A: Process Strings and Integers

Topic B: Process Decimals, Floats, and Mixed Number Types

Lesson 3: Processing Data Structures

Topic A: Process Ordered Data Structures

Topic B: Process Unordered Data Structures

Lesson 4: Writing Conditional Statements and Loops in Python

Topic A: Write a Conditional Statement

Topic B: Write a Loop

Lesson 5: Structuring Code for Reuse

Topic A: Define and Call a Function

Topic B: Define and Instantiate a Class

Topic C: Import and Use a Module

Lesson 6: Writing Code to Process Files and Directories

Topic A: Write to a Text File

Topic B: Read from a Text File

Topic C: Get the Contents of a Directory

Topic D: Manage Files and Directories

Lesson 7: Dealing with Exceptions

Topic A: Handle Exceptions

Topic B: Raise Exceptions

Appendix A: Major Differences Between Python 2 and 3

Appendix B: Python Style Guide