

Python Essentials (v.1.1) -- About the course curriculum

PCAP: Programming Essentials in Python (short form: Python Essentials) is a two-course series that covers all the basics of programming in Python, as well as general computer programming concepts and techniques, and the object-oriented approach.

The Python Essentials course series is divided into two parts:

Python Essentials 1 (PE1): BASICS, consisting of four modules;
Python Essentials 2 (PE2): INTERMEDIATE, consisting of four modules.

Each student has access to hands-on practice materials, labs, quizzes, and tests to learn how to utilize the skills and knowledge gained on the course and interact with some real-life programming tasks and situations.

Students who complete the course will be able to accomplish coding tasks related to the basics of programming in the Python language, and to understand the fundamental notions and techniques used in object-oriented programming.

Furthermore, they will be ready to attempt the following qualifications:

PCEP - Certified Entry-Level Python Programmer (after completing Python Essentials 1)
PCAP - Python Certified Associate Programmer (after completing Python Essentials 2)

from the OpenEDG Python Institute.

Entry-Level Certification: PCEP - Certified Entry-Level Python Programmer

Python Essentials 1 (PE1) is aligned with the PCEP - Certified Entry-Level Python Programmer certification.

PCEP - Certified Entry-Level Python Programmer certification is a professional credential that measures the test-taker's ability to accomplish coding tasks related to the essentials of programming in the Python language.

A test candidate should demonstrate sufficient knowledge of the universal concepts of computer programming, the syntax and semantics of the Python language as well as the skills in resolving typical implementation challenges with the help of the Python Standard Library.

PCEP - Certified Entry-Level Python Programmer certification shows that the individual is familiar with universal computer programming concepts like basic operators, numeral systems, Boolean logic, data types, containers, functions, conditions, loops, as well as Python programming language syntax, semantics, and the runtime environment.

PCEP - Certified Entry-Level Python Programmer certification is an interim step to the PCAP - Certified Associate in Python Programming certification and the starting point to launch a career in software development, Python programming, and related technologies.

Becoming PCEP certified will help the certificate holder stand out from other candidates and get their foot in the door.

Associate-Level Certification: PCAP - Python Certified Associate Programmer

Python Essentials 2 (PE2) is aligned with the PCAP - Python Certified Associate Programmer certification.

PCAP - Python Certified Associate Programmer certification is a professional credential that measures the test-taker's ability to accomplish coding tasks related to the more advanced aspects of programming in the Python language, including the fundamental notions and techniques used in object-oriented programming.

PCAP - Certified Associate in Python Programming certification shows that the individual is familiar with all the programming concepts covered by the PCEP - Certified Entry-Level Python Programmer certification, as well as with such concepts as modules and packages, string and string methods, list methods, exceptions, object-oriented programming, generators, lambdas, file processing, and working with selected Python STL modules.

Becoming PCAP certified ensures that the individual is fully acquainted with all the primary means provided by Python 3 to enable her/him to start her/his own studies, and to open a path to the developer's career.