**Python** is a widely used [general-purpose](http://en.wikipedia.org/wiki/General-purpose_programming_language), [high-level programming language](http://en.wikipedia.org/wiki/High-level_programming_language). Its design philosophy emphasizes code [readability](http://en.wikipedia.org/wiki/Readability), and its syntax allows programmers to express concepts in fewer [lines of code](http://en.wikipedia.org/wiki/Lines_of_code) than would be possible in languages such as [C++](http://en.wikipedia.org/wiki/C%2B%2B) or [Java](http://en.wikipedia.org/wiki/Java_%28programming_language%29). The language provides constructs intended to enable clear programs on both a small and large scale.

Python supports multiple [programming paradigms](http://en.wikipedia.org/wiki/Programming_paradigm), including [object-oriented](http://en.wikipedia.org/wiki/Object-oriented_programming), [imperative](http://en.wikipedia.org/wiki/Imperative_programming) and [functional programming](http://en.wikipedia.org/wiki/Functional_programming) or [procedural](http://en.wikipedia.org/wiki/Procedural_programming) styles. It features a [dynamic type](http://en.wikipedia.org/wiki/Dynamic_type) system and automatic [memory management](http://en.wikipedia.org/wiki/Memory_management) and has a large and comprehensive [standard library](http://en.wikipedia.org/wiki/Standard_library).

Python interpreters are available for installation on many operating systems, allowing Python code execution on a majority of systems. Using third-party tools, such as [Py2exe](http://en.wikipedia.org/wiki/Py2exe) or Pyinstaller Python code can be packaged into stand-alone executable programs for some of the most popular operating systems, allowing for the distribution of Python-based software for use on those environments without requiring the installation of a Python interpreter.

[CPython](http://en.wikipedia.org/wiki/CPython), the [reference implementation](http://en.wikipedia.org/wiki/Reference_implementation) of Python, is [free and open-source software](http://en.wikipedia.org/wiki/Free_and_open-source_software) and has a community-based development model, as do nearly all of its alternative implementations. CPython is managed by the non-profit [Python Software Foundation](http://en.wikipedia.org/wiki/Python_Software_Foundation).