General Assembly

FUNCTIONS IN PYTHON

Key Terms and Definitions

» **Function:** A reusable process that takes some kind of input, performs logic using those inputs, and returns the output of that logic. Functions are extremely powerful tools, and they open a vast world of possibilities. They are the building blocks for all large, complex programs and processes.

» **Arguments:** Details that are passed into a function to change the output.

» **Keyword Arguments:** Arguments that are specified in the function definition, such as variable assignments. Keyword arguments must always come after normal arguments when being passed into a function. These are optional when running a function, as the function's definition has a default value.

» **Nested Functions:** Functions that are called within other functions.

Guiding Questions

1. When might you want to recreate a function that is already built into Python?
2. What are some examples of arguments passed to a function that should have default values (keyword arguments)?

Additional Resources

1. [Codecademy: Learn Python](#)

   » See Section 4, "Functions" (particularly Function Syntax).

2. DataCamp:

   » [Intro to Python for Data Science](#)

     • See Section 3, "Functions and Packages."

   » [Python Data Science Toolbox (Part 1)](#)

   » Section 1, "Writing Your Own Functions."

   » Section 2, "Default Arguments, Variable-Length Arguments, and Scope."