

Python

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Introduction

Part II

Python

1 Basics

1.1 Variables

In python we have 5 data types: string, number, tuple, list, dictionary. String and number are simple data types and each can hold just one entity but the other three can hold many items inside themselves.

1.1.1 String and Number

```
# Defining a string  
stringvar = "Hello"
```

```
# Defining an integer
```

```
num = 5
```

```
# Defining a floating variable  
fltnum = 5.0
```

1.1.2 Tuple

1.1.3 List

1.1.4 Dictionary

1.2 Comments

Comments in python:

```
# Single line comment
```

```
"""
```

```
Multi
```

```
line
```

```
comment
```

```
"""
```

1.3 Naming Conventions

Python naming conventions:

- Class names start with an uppercase letter. All other identifiers start with a lowercase letter.
- Starting an identifier with a single leading underscore indicates that the identifier is private.
- Starting an identifier with two leading underscores indicates a strongly private identifier.
- If the identifier also ends with two trailing underscores, the identifier is a language-defined special name.

2 Control Flow

3 Loops

4 Data Structures

5 Function

6 OOP

Part III

numpy and scipy

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