Python Bootcamp

Introduction to Python

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Python

- General purpose: build anything
- Open source! Free!
- Python packages, also for data science
  - Many applications and fields

Jupyter Notebooks

Variables and Types

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Variable

- Specific, case-sensitive name
- Call up value through variable name
- 1.79 m - 68.7 kg

```
height = 1.79
weight = 68.7
print(height)
```

```
1.79
```

Calculate BMI

```
height = 1.79
weight = 68.7
print(height)
```

```
1.79
```

$$BMI = \frac{weight}{height^2}$$

```
68.7 / 1.79 ** 2
```

```
1.79
```

```
weight / height ** 2
```

```
21.4413
```

```
bmi = weight / height ** 2
print(bmi)
```

```
21.4413
```

Reproducibility

```
height = 1.79
weight = 68.7
bmi = weight / height ** 2
print(bmi)
```

```
21.4413
```

Reproducibility

```
height = 1.79
weight = 74.2 # <-
bmi = weight / height ** 2
print(bmi)
```

```
23.1578
```

Python Types

- Different type = different behavior!

Python Types (2)

Let's practice!