

INFO5002: Intro to Python for Info Sys

Week 4

Python docs



Northeastern
University

Embed variables into strings

- We used the **concatenation** operator to build strings.
- We can make it more readable with **string interpolation** (know in python as **f-strings**).

```
first_name = "grace"  
last_name = "hopper"  
full_name = f"{first_name} {last_name}"
```

String special characters

Characters	Effect
\n	New line
\t	Add a tab
\r	Carriage return
\f	Form feed
\b	Backspace
\\	Backslash
\'	Single quote
\"	Double quote

String functions

- `.title()`: capitalises every word in a string.

```
x = "hello there"  
x = x.title()
```

- `.upper()`: capitalises every character in a string.

- `.lower()`: minimises every character in a string.

- `.split(separator?, maxsplit?)`: splits string along

separator, default " ", maxsplit number of times, default

infinity.

```
x = "today is Friday".split() x = "tomorrow".split("o")  
# ["today", "is", "Friday"] # ["t", "m", "rr", "w"]
```

Data type casting

You can convert data types to:

- Int with `int`

```
x = int(2.8)
x = int("3")
```

- Float with `float`

```
x = float(6)
x = float("8.2")
```

- String with `str`

```
x = str(1)
x = str("12.9")
```

- Tuple with `tuple`

```
x = tuple([1, 2, 3])
x = tuple("apple")
```

- Set with `set`

```
x = set([1, 2, 3])
x = set("apple")
```

Interfacing

- `print`: copy input string to user's terminal.

```
print("Hello there")
```

- `input`: ask user for input with optionally a prompt of input argument.

```
x = input()  
y = input("Age: ")
```

Documentation to find more!

- Python is a rich language with many built in features.
- To find all the build in functions you can look in the documentation: <https://docs.python.org/3/>.