Python Notes

**Python2 vs Python3**

**References**

Python Web site: <https://www.python.org/>

Documentation: <https://docs.python.org/3/>

The Python Language Reference: https://docs.python.org/3/reference/index.html

The Python Standard Library: <https://docs.python.org/3/library/index.html>

The Python Tutorial: https://docs.python.org/3/tutorial/

**Interactive Python**

Aka repl (Read-Eval-Print Loop)

Python3 to start

Ctrl-D or exit() to exit

**Python Types**

Numbers

Integers

Not limited to 64 or 128 bit values

Floating point

Strings

No char type

str

Support for Unicode

Lists

Tuples

Dictionaries

Sets

Files

Immutable vs Mutable

Strings, numbers, and sets are immutable

All types are classes

**Lists**

Analogous to arrays or vectors

Sequence type: https: //docs.python.org/3/library/stdtypes.html#sequence-types-list-tuple-range

Variable size

Indexing

Slicing

<https://www.w3schools.com/python/python_lists.asp>

List comprehension

**Tuples**

<https://www.w3schools.com/python/python_tuples.asp>

**Dictionaries**

<https://www.w3schools.com/python/python_dictionaries.asp>

**Sets**

<https://www.w3schools.com/python/python_sets.asp>

**File I/O**

<https://www.w3schools.com/python/python_file_handling.asp>