Lists

- Lists (or arrays) are useful when you want to order items or go through them one at a time
- You can mix different types within a Python list
- Append items on the end with append()
- Remove items with pop(index)
- Get an item by putting its index in square brackets: my_list[3]

```
my_list = [1, 'a', 4, 'hello', 'world', 6]
my_list.append('foo')
for item in my_list:
    print(item)
print('Item at index 3:', my_list[3])
\mathbf{I}
hello
world
foo
Item at index 3: hello
```

Range function

```
my_list = range(10)
print(list(my_list))
# [0, 1, 2, 3, 4, 5, 6, 7, 8, 9]

my_list2 = range(1,11)
print(list(my_list2))
# [1, 2, 3, 4, 5, 6, 7, 8, 9, 10]

my_list3 = range(0,26,5)
print(list(my_list3))
# [0, 5, 10, 15, 20, 25]
```

- To quickly create a list of consecutive numbers, you can use the range() function
- It takes a variable number of arguments
- range(10) generates a list from 0 to 9 (up to, not including 10)
- range(1,11) goes from 1 to 10
- range(0,26,5) goes from 0 to 25, at steps of 5
- range(start, finish+1, step)