

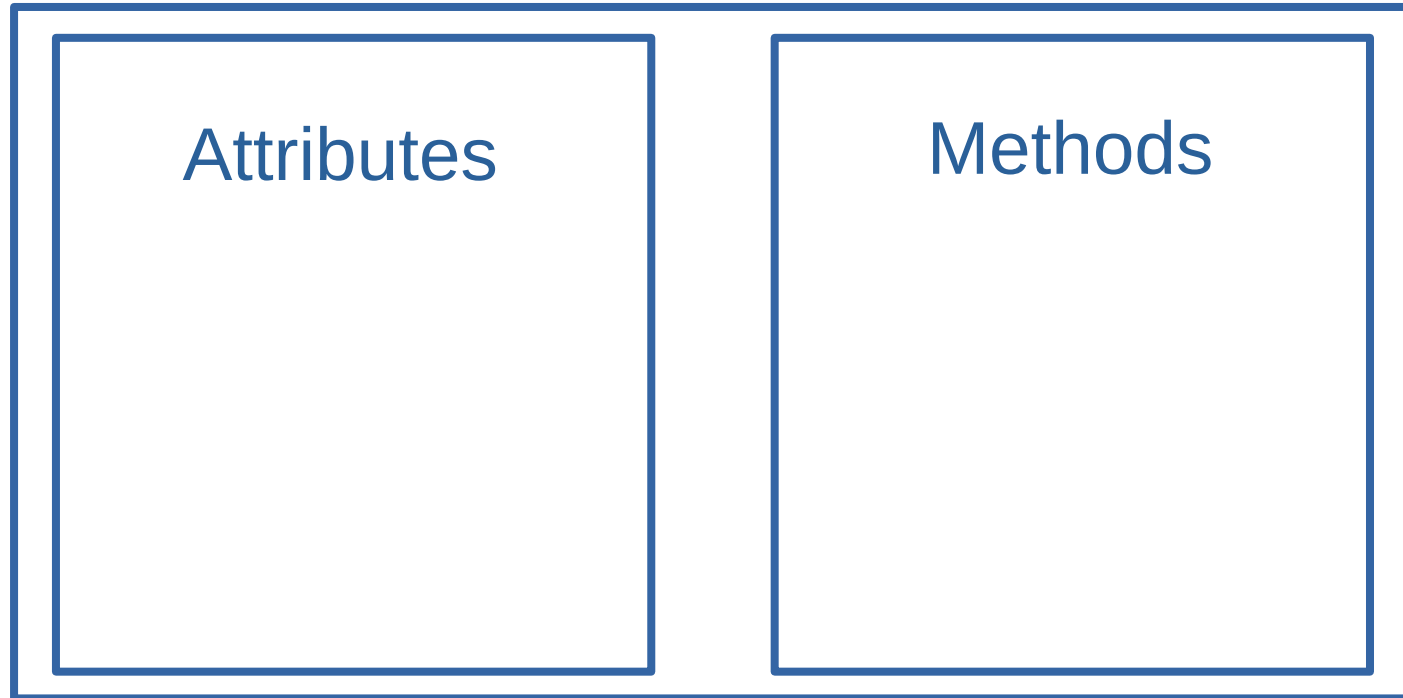


Day 6

Classes & Object-Oriented Programming

What is an Object?

Objects are collections of attributes and methods





What is an Object?

Objects are quickly copied and created

Blueprints are *classes*

Set features for them

Helpful when you need similar behavior

All strings behave like strings, all lists like lists, etc.



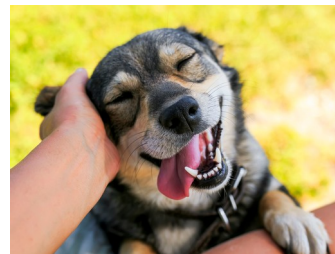
Object Oriented Programming

- Approach to programming where data and operations on this data bundled into **classes** and accessed via **objects/instances**

Classes and Objects



Class Dog



Dog instances

Classes and Objects

Class: str



“potatoes”



“spam”



“dog”

String instances



Attributes and Methods

- **Attribute:** data held by the object, it's characteristics that combined make up its 'state'
- **Method:** any procedure defined within an object

```
somestr = 'baa'
```

```
somestr.upper() # upper is a method of the str class
```



Defining a class

```
class nameOfClass (SuperClass) :  
    __init__  
    attributes  
    methods
```




Let's try it!

```
class Person:
    def __init__(self, name, age):
        self.name = name
        self.age = age
```

→ Person.py