## **CodeWithHarry**



# Why OOPs In Python?

- Like many other programming languages, Python also supports object-oriented paradigm.
- OOPs helps the developers to write reusable code.
- With the help of OOPs, we can easily maintain and modify the existing code.

## Let's first discuss what Python is?

Python is an interpreted (code is executed line by line) high-level programming language with dynamic semantics, which means, like other languages, we don't have to specify the data type of variable we are declaring.

### What Is Object-Oriented Programming(OOP)?

- It is evident from the name that Object-Oriented programming is something related to objects. Yes, the entire concept of OPP is based on **objects**. One of the popular methods to solve any query is by creating an object.
- OOP helps us to model real-world objects as software objects.
- With the help of OOP, we can model the relationships between real-world entities in programming.
- This is mostly used for code reusability.

#### What is Class?

Classes are like **templates** that are used to create **objects**. It is like a *Blueprint* where the actual designing of an object takes place. The

1 of 3 9/11/2022, 10:35 PM

Copy

"Class" keyword is used to create the class. We can have multiple objects in a class. The class contains all the attributes of Object. For example, dairy milk is a subproduct of Cadbury here, dairy milk is like an object of class Cadbury. Cadbury company has all the ingredients, materials, etc., require to make dairy milk irrespective of the quantity.

How to create a class in Python:

```
class ClassName :
    //code inside the class
Example:
    class Cadbury:
        pass
```

#### What are Objects?

Syntax:

Objects are the instance of the class. Whatever we want to do, we do it with the help of objects. Objects have attributes and behavior. Let's take an example of a boy; here, height and weight are the attributes. Behavior means the way of talking, walking, etc., which are methods in the class. Objects contain methods which are function in simple words. Methods mean creating a function in class. Now, let's see how objects are created in Python:

```
class Cadbury:
    //instance attribute
    def __init__(self,name,price):
        self.price = price
        self.name = name

    def display(self):
        print(self.price,self.name)

obj1 = Cadbury("DairyMilk",100) //obj1 is the object of the Cadbury class
obj1.display();
```

2 of 3 9/11/2022, 10:35 PM

So, this is the rough idea about the OOP in python. In further tutorials, we will be discussing every concept of OPP in detail. We will be covering encapsulation, polymorphism, Static method, dunder method, Decorators, and a lot more.

Thank you for being with me throughout the tutorial. I hope you enjoyed it. If you haven't checked out the whole playlist yet, move on to codewithharry.com or my YouTube channel to access it. You will surely enjoy them all. Looking forward to seeing you all next time. Till then, keep coding.

**Previous** 

Next











3 of 3 9/11/2022, 10:35 PM