

Q1. Explain Class and Object with respect to Object-Oriented Programming.example

Classes are user-defined data types that act as the blueprint for individual objects, attributes and methods. Objects are instances of a class created with specifically defined data. a=1
print(type(a))

```
<class 'int'>
```

Q2. name the four pillar of oops

Abstraction.

Encapsulation.

Inheritance.

Polymorphism.

Q3. Explain why the **init()** function is used. example

The **init** function is called every time an object is created from a class. The **init** method lets the class initialize the object's attributes and serves no other purpose. It is only used within classes. class pwskills3 :

```
def __init__(self ,phone_number , email_id , student_id ):
    self.phone_number1 = phone_number
    self.email_id1 = email_id
    self.student_id1 = student_id

def return_student_deetials(self) :
    return self.student_id ,self.phone_number ,self.email_id
```

Q4. Why self is used in OOPs?

The self variable is used to represent the instance of the class which is often used in object-oriented programming.

Q5. What is inheritance? Give an example for each type of inheritance.

Inheritance is a process of obtaining properties and characteristics(variables and methods) of another class. In this hierarchical order, the class which inherits another class is called

In []: