Intern Interview Tasks

### How do you determine if a string is a palindrome?

* Given a list l1 = [1, ‘a’, ‘b’, 2]. Reverse the list.

Intern Assessment Tasks

## **Python Task 1:**

## Title: ORM

Duration: 3 days.

Description:

Create a parent class CSV\_Saver.

Create a child class inheriting the parent class (CSV\_Saver).

Create a CSV file with headings as class attributes.

Create a CRUD Operation to perform in the CSV file.

The CRUD function should be available in the parent class (CSV\_Saver) and the child class must implement it.

Use class method and static method for the CRUD operation.

**Notes: The Parent class should be generic**

**Python Task 1.1:**

Duration: 5 days

Description

Create a Postgres Database and perform CRUD application on the database from Command Line.

Use Authentication System using Jwt Token

Task 1.2:

Explore different python libraries. Eg: requests, pandas, Pillow, Selenium, Beautiful Soup

**Python Task 2:**

Duration: 1 week

Description:

Create own django project for basic learning purpose

**Python Task 3:**

Final Project: E-commerce or any other project using django framework

Duration: 1 month

Description:

Create a Software Requirements Specification (SRS) document for the project.

Create a ER diagram/Class Diagram

Setup the project using CookieCutter.

https://cookiecutter-django.readthedocs.io/en/latest/developing-locally.html

Functional Requirements.

CRUD operation

Authentication and Authorization

Email Service

Pagination, Search and Filters should be done.

Template integration should be done using Javascript and jQuery, CSS3, Bootstrap.

Ajax Scripts should be available for asynchronous tasks.

Optional: Notification Service

# **Python Task 4:**

Duration: 2 days.

Ice Cream Vendor Terminal Based Program

Description

Prepare a Ice Cream Menu and save to CSV

Display Menu. (Flavors, Scoops and Cones)

Input:

Choose Flavors

Choose number of Scoops

Choose Types of Cones

Output:

Calculate total Price. (Billing) and display in a tabular format

Option to continue for additional ice cream.