**Lab 1**

1-You have asked to develop an application for a company X.

The company has only one chief executive officer (CEO) . The

application store been some information a bout the CEO like: name,

age and address. You need to find a clean and concise

implementation of the CEO class in the application .

2-You have been hired to develop an application for a car shop. The owner of the car shop wants an easy to navigate interface with the ability to document all the types of vehicles that he fixes in his shop. On a daily basis, through his and his employers hands pass around dozen different types of vehicles. You need to find a clean and concise way to insert all those types of cars into your database.

3- In this problem, you need to implement a factory ToyFactory that can create a toy duck and a toy car object using either the ToyDuck or ToyCar function constructor.

A ToyDuck object should have the following properties:

color

price

A ToyCar object should have the following properties:

color

price

name

4- In this challenge, you have to implement a configuration that uses the singleton pattern. You are given a class ConfigureVals. Define it as follows:

It should have a constructor that defines the properties xpoint, ypoint, and shape.

The constructor should initialize xpoint, ypoint, and shape to 0, 0 ,null if the values for these properties are not passed to the constructor.

Make sure that only a single instance of the class can be made by defining the function getConfiguration.