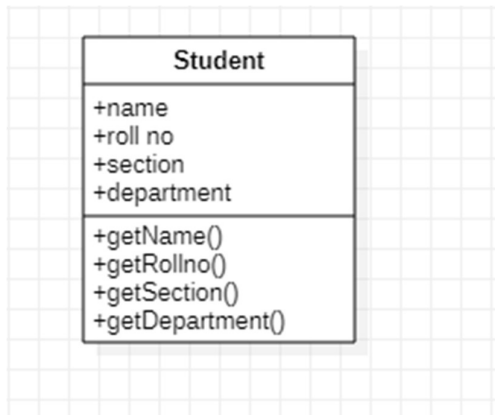


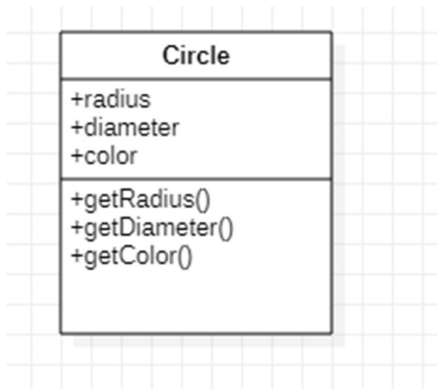
Lab 01: Introduction to Object Oriented Programming

Question No: 01

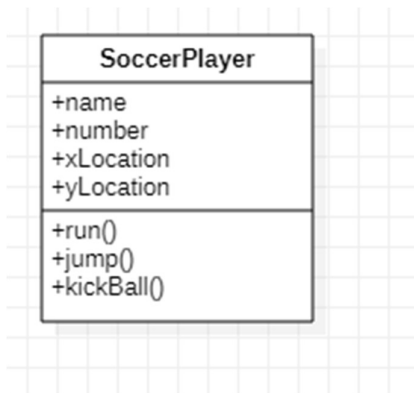
(a) Class Student

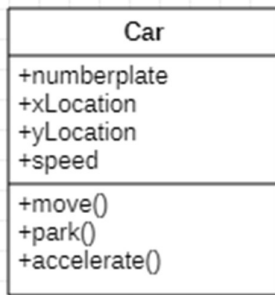
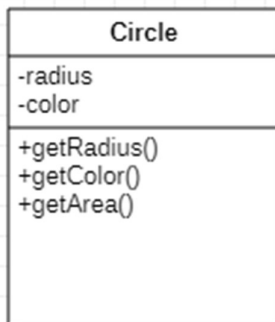
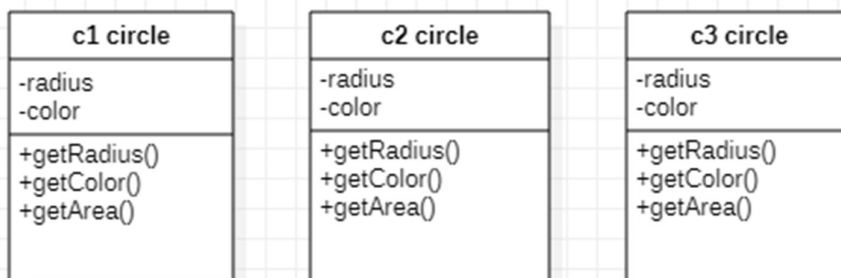


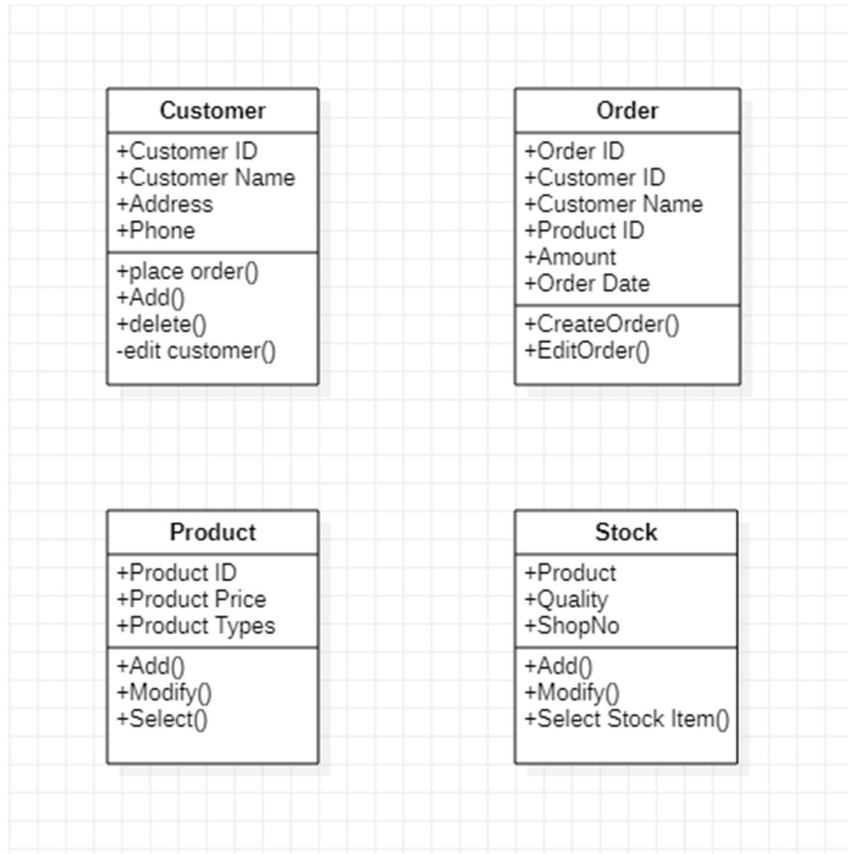
(b) Class Circle



(c) Class Soccer Player



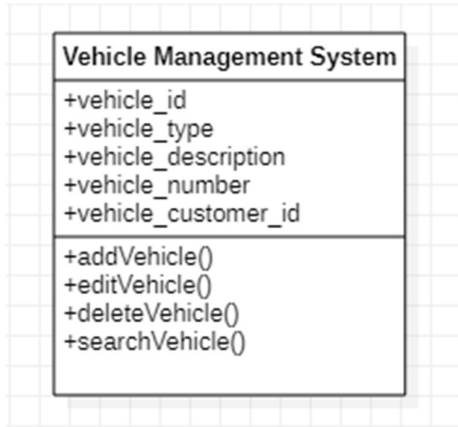
(d) Class Car**Question No: 02****Class Definition:****Instances:**

Question No: 03

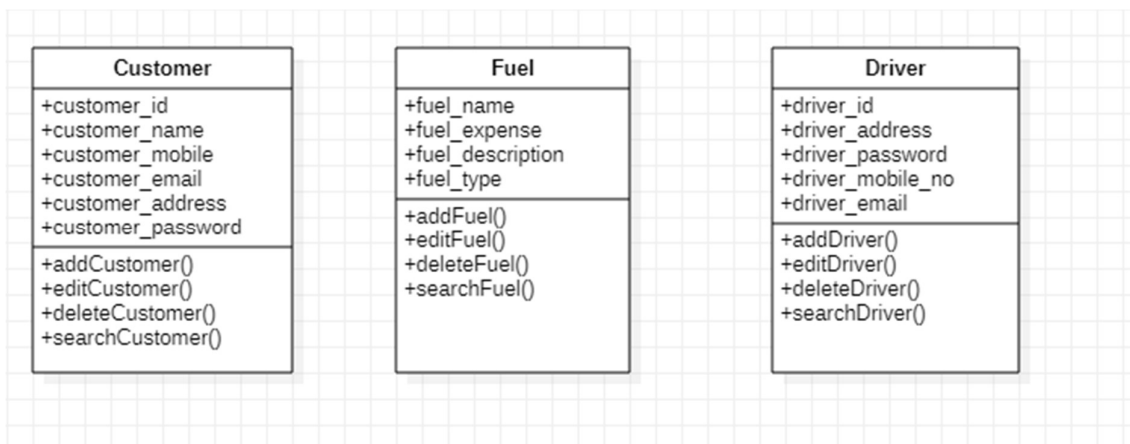
Question No: 05

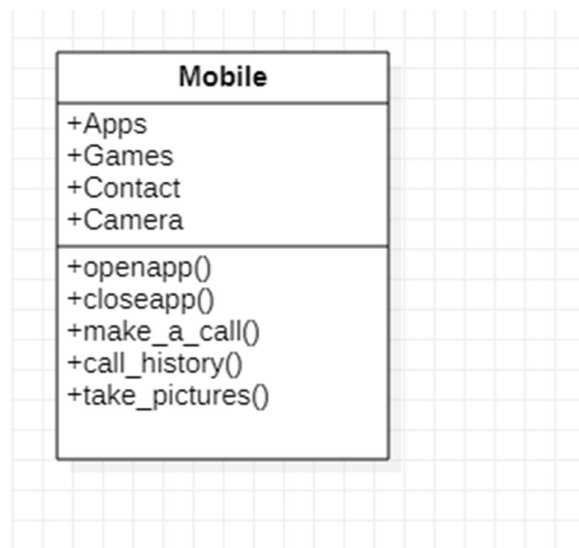
Vehicle Management System:

Class: Vehicle Management System



Inheritance: Customer, Fuel and Driver



Question No: 06**Question No: 07****a) Class:**

Class creates a user-defined data structure, which holds its own data members and member functions, which can be accessed and used by creating an instance of that class. A class is like a blueprint for an object.

Example:

Fruit, Car Showroom etc

b) Object:

An object is a collection of data (variables) and methods (functions) that act on those data.

Example:

A fruit is a class then its attributes will be orange, banana etc, its method will be basket, weight, pickup date.

c) Instances:

An instance is a concrete occurrence of any object, existing usually during the runtime of a computer program.

d) Associations and its types:

An association is a using relationship between two or more objects in which the objects have their own life time and there is no owner.

e) Access Modifiers and its uses:

Access modifiers (or access specifiers) are keywords in object-oriented languages that set the accessibility of classes, methods, and other members. Access modifiers are a specific part of programming language syntax used to facilitate the encapsulation of components.