

PG-DBDA (Sep 2022 Batch)

Date : 17/11/2022

Time : 2:30 PM to 5:00 PM

Note:

1.You need to create ONE TEXT FILE containing answers.

2.FILENAME should be with <PRNNo_FirstNameLastName>.txt ONLY (follow Strictly)

Number of Questions : 4 (10 marks each)

Q1 : Write a Java program to create a new array list, add some elements (string) and print out the collection by using for-each loop. (10 Marks)

Q2 : Develop a class BankAccount having following data members : (10 Marks)

int accno

double balance

Write appropriate constructors to initialize data members

Define the following functions :

withdraw : balance will reduce

deposit : balance will increase

show : display accno and balance

If user tries to withdraw more than the balance, use exception handling code. Demonstrate the concept of exception handling in main() function.

Q3 : Write a program to create a class named shape. In this class we have three sub classes circle, triangle and square, each class has two member function named draw () and erase (). Create these using Runtime Polymorphism concepts. (10 Marks)

Q4 : Constructor chaining (10 Marks)

1. Create a class named **GrandParent** with following
 - Fields
 - (a) **grandFatherName** : grandFatherName field is a String that holds grandfather name
 - (b) **grandMotherName** : grandMotherName field is a String that holds grandmother name
 - Constructor
 - (a) The constructor should accept the grandFatherName and grandMotherName as arguments
 - (b) Print grandparent names inside the constructor.
2. Create a subclass of a GrandParent class named **Parent** with following
 - Fields
 - (a) **fatherName** : fatherName field is a String that holds father name.
 - (b) **MotherName** : motherName field is a String that holds mother name.
 - **Two Constructors**
 - (a) First constructor should
 1. Accept fatherName, motherName, grandFatherName and grandMotherName as arguments.
 2. Pass the grandFatherName and grandMotherName to second constructor(check point (b) below).
 3. Print fatherName and motherName inside the constructor.
 - (b) Second constructor should
 1. accept the grandFatherName and grandMotherName as arguments.
 2. Pass these arguments to GrandParents superclass constructor.
3. Create a subclass of Parent named **Child** with main method that will create an object of Child class, passing fatherName, motherName, grandFatherName and grandMotherName.