

TAPI DIPLOMA ENGINEERING COLLEGE ,SURAT [647]

COMPUTER ENGINEERING DEPARTMENT [07]

INDEX

TERM:01/02/2024 to 25/05/2024

SUBJECT CODE: 4340701

SUBJECT NAME: Advanced Object Oriented Programming

STUDENT NAME:

DIVISION:

BATCH:

ENROLLMENT NO:

SR. NO	DATE	NAME OF EXPERIMENT	PAGE NO.	1 (4)	3 (2)	4 (2)	5 (2)	TOTAL (10)	SIGN
1		(A) Install JDK, write a simple “Hello World” or similar java program, compilation, debugging, executing using java compiler and interpreter.							
		(B) Write a program in Java to find maximum of three numbers using conditional operator. (C) Write a program in Java to reverse the digits of a number using while loop							
2		(A) Write a program in Java to add two 3*3 matrices.							
		(B) Write a program in Java to generate first N prime numbers.							
3		(A) Write a program in Java which has a class Student having two instance variables enrollment No and name. Create 3 objects of Student class in main method and display student’s name. (B) Write a program in Java which has a class Rectangle having two instance variables height and weight. Initialize the class using constructor.							
		(C) Write a program in Java demonstrate the use of “this” keyword.							
		(D) Write a program in Java to demonstrate the use of “static” keyword.							
4		(A) Write a program in Java to demonstrate the use of "final" keyword.							
		(B) Write a program in Java which has a class Shape having 2 overloaded methods area(float radius) and area(float length, float width). Display the area of circle and rectangle using overloaded methods.							
		(C) Write a program in Java to demonstrate the constructor overloading.							
		(D) Write a java program to demonstrate use of “String” class methods							
5		(A) Write a program in Java to demonstrate single inheritance							
		(B) Write a program in Java to demonstrate multilevel inheritance							
		(C) Write a program in Java to demonstrate hierarchical inheritance.							
		(D) Write a program in Java to demonstrate method overriding.							
		(E) Write a program in Java which has a class Car having two instance variables topSpeed and name. Override toString() method in Car class. Create 3 instances of Car class and print the instances.							

6		(A) Write a program in Java to implement multiple inheritance using interfaces.							
		(B) Write a program in Java which has an abstract class Shape having three subclasses: Triangle, Rectangle, and Circle.							
		(C) Define method area() in the abstract class Shape and override area() method to calculate the area.							
		(D) Write a program in Java to demonstrate use of final Class.							
		(E) Write a program in Java to demonstrate use of package.							
7		(A) Write a program in Java to develop user defined exception for 'Divide by Zero' error.							
		(B) Write a program in Java to develop Banking Application in which user deposits the amount Rs 25000 and then start withdrawing of Rs 20000, Rs 4000 and it throws exception "Not Sufficient Fund" when user withdraws Rs. 2000 there after.							
8		(A) Write a program that executes two threads. One thread displays "Thread1" every 1000 milliseconds, and the other displays "Thread2" every 2000 milliseconds. Create the threads by extending the Thread class							
		(B) Write a program that executes two threads. One thread will print the even numbers and another thread will print odd numbers from 1 to 200.							
9		(A) Write a program in Java to perform read and write operations on a Text file.							
		(B) Write a program in Java to demonstrate use of List. 1) Create ArrayList and add weekdays (in string form) 2) Create LinkedList and add months (in string form) Display.							
10		(A) Write a program in Java to create a new HashSet, add colors(in string form) and iterate through all elements using for-each loop to display the collection.							
		(B) Write a Java program to create a new HashMap, add 5 students' data (enrolment no and name). retrieve and display the student's name from HashMap using enrolment no.							