# 22412

## 23124

# 3 Hours / 70 Marks

Seat No.				

- Instructions (1) All Questions are Compulsory.
  - (2) Answer each next main Question on a new page.
  - (3) Illustrate your answers with neat sketches wherever necessary.
  - (4) Figures to the right indicate full marks.
  - (5) Assume suitable data, if necessary.
  - (6) Mobile Phone, Pager and any other Electronic Communication devices are not permissible in Examination Hall.

Marks

#### 1. Attempt any FIVE of the following:

10

- a) Enlist any two logical operators and two bitwise operators.
- b) Define constructor.
- c) Write down the syntax of array declaration, initialization.
- d) List out different ways to access package from another package.
- e) Differentiate between starting thread with run() method and start() method.
- State the classes that can an applet extend.
- g) Give syntax to open a file using Inputstream class.

22412 [2]

2.		Attempt any THREE of the following:	12
	a)	Write a program to display ASCII value of a number 9.	
	b)	Write a program to sort the elements of an array in ascending order.	
	c)	Define Thread. Draw life cycle of Thread.	
	d)	Write a program to read a file and then count number of words.	
3.		Attempt any THREE of the following:	12
	a)	Write a program which displays functioning of ATM machine, (Hint: Withdraw, Deposit, Check Balance and Exit)	
	b)	Differentiate between method overloading and method overriding.	
	c)	Explain applet life cycle in detail.	
	d)	Differentiate between Byte Stream Class and Character Stream Class. (Any four points)	
4.		Attempt any THREE of the following:	12
	a)	Explain implicit and explicit type conversion with example in detail.	
	b)	Write a program to show the use of copy constructor.	
	c)	Write a program to show the Hierarchical inheritance.	
	d)	Explain any four font methods with example.	
	e)	Write a program to append content of one file into another file.	

Marks

22412	[3]	
		Marks
5.	Attempt any TWO of the following:	12
a)	Explain vector with the help of example. Explain any 3 of vector class.	3 methods

- b) Develop and Interest Interface which contains Simple Interest and Compound Interest methods and static final field of rate 25%. Write a class to implement those methods.
- c) Write a program that throws an exception called "NoMatchException" when a string is not equal to "India".

## 6. Attempt any TWO of the following:

- a) Write a program to print the sum, difference and product of two complex numbers by creating a class named "Complex" with separate methods for each operation whose real and imaginary parts are entered by user.
- b) i) Explain Errors and its types in detail.
  - ii) Explain thread methods to set and get priority.
- c) Write a program to draw a chessboard in Java Applet.