D.K.M.COLLEGE FOR WOMEN (AUTONOMOUS),VELLORE-1.

SEMESTER V

PROGRAMMING IN JAVA

UNIT I

PORTIONS: - Object Oriented Concepts – Introduction to Java – Data Types – Variables - Arrays – Operators – Control Structure – Console I/O – Scanner Classes and Methods – Print( ) – Println( ) and Printf( ).

SECTION-A 2 Marks

1. What is Java? (or) Define Java Language.
2. Define JVM.
3. Expansion of OOPL and OOPs.
4. Define Tokens.
5. What is Keyword?
6. What is Identifier/Variable and its Syntax?
7. What is Literals?
8. Define Datatype. Explain two Datatype?
9. What is Arrays?
10. Define Switch Statement.
11. Define Print( ),Printf( ),Println( ).
12. Specify general format of Ternary Operator?
13. List out Unary Operator.
14. Define Encapsulation.
15. Define Continue and Break.
16. Define Byte Code?
17. Why Java is Important to Internet?
18. What is Literal?

SECTION-B 5 Marks

1. Difference between Applications and Applet.
2. Basic concepts of OOPs.

3. Describe briefly about Operators.
4. Discuss about Array with example.
5. Write a Program to print sum of n natural no's.

SECTION-C 10 Marks

1. Features of Java.
2. Explain about if Statement.
3. Describe about Looping Statement.
4. Explain about Scanner Class.
5. Describe various datatypes available in Java.
6. Explain the General Structure of Java Program.
7. Explain new Operators with example.
8. Describe in detail about Break and Continue Statements?
9. Discuss about Java tokens.

Unit II

PORTIONS: - Classes – Objects – Constructor – Overloading Methods – Access Control – Static Data Members and Methods – fixed Methods – String Class – Inheritance – Overriding Methods – Using Super – Abstract Class – Introduction to Java API Packages.

SECTION-A 2 Marks

1. What is the use of finalize( ) method?
2. Mention the use of "Super" Keyword?
3. What is Constructor?
4. Distinguish between "Private" and "Public" access Modifier in Java.
5. Mention any two built in Java Package names.
6. Define Super Class.
7. What do you mean by Inheritance?
8. Define Class.
9. Define Access Specifier.
10. Define Method Overloading.
11. Specify the use of Capacity( ) Method?

12. Write a short note on abstract class.
13. How to create a object to a class?
14. What is recursion?
15. What is an object? Give example.
16. What are Overload Constructor?

SECTION-B 5 Marks

1. Explain the concept of Constructors with an example.
2. Discuss about the working of Method Overloading Concept.
3. Describe briefly about the importance (or) fundamental of Java Utilities.
4. Discuss about the features of String Buffer Class with example.
5. Describe the general (or) fundamental format of a class and its parts.
6. Explain the importance of Abstract class with an example?
7. Explain the purpose of any five String Method with example.
8. Explain any 5 string buffer method available in Java?
9. Explain about Method Overriding?
10. Write short notes on Access Control (or) Define Access Protection in Package.
11. How to declare a method?
12. Explain in detail about controlling access to member in a class?
13. Explain in detail about Super Class and Sub Class.

SECTION-C 10 Marks

1. Describe the concepts of Inheritance mechanism with example.
2. Describe the concept of method Overriding with example program.
3. Describe Java utilities.
4. Explain about any five String class.
5. What is method Overloading? Write a program to implement method by overloading?
6. What is class? How does it accomplish data hiding?
7. Explain in Java API Packaes.

Unit III

PORTIONS: - Packages – Access Protection - Importing Packages – Interfaces – Exception Handling – Throw and Throws – Multithreading Thread – Synchronization – Messaging - Runnable Interface – Inter Thread Communication.

SECTION-A 2 Marks

1. What is meant packages in java? (or) How to create a package?
2. Define the term-multi threading.
3. What is an Exception?
4. Define the term-Deadlock?
5. What is thread?
6. Write the general form of defining an interface.
7. How to import a Package?
8. Explain java thread model.
9. Define Package.
10. How to import a Package?
11. Define Runnable Interface.

SECTION-B 5 Marks

1. Describe the features of Interface with example.
2. Explain the method of creating and using threads.
3. Discuss about the syntax of try catch block with example.
4. Describe the features of Multithreading with an example.
5. How do you add a class of an interface to a package with example?
6. Explain the concept of Exceptional handling Mechanism in java.
7. Describe the usage of try and catch statement.
8. Discuss on synchronization and messaging.
9. Create a program for Exceptional Handling with example for divide by zero.

SECTION-C 10 Marks

1. Discuss about the features of Exceptional Handling Mechanism with example.
2. Discuss about the method of defining and accussing Package in java.

3. Define Package with example.
4. Write short notes on creating Packages.
5. Explain in detail about life cycle of a thread.
6. Describe about thread Syncronization.
7. Write a program in java to count the number of vowels in a string.
8. What is inter thread communication. How is it implemented in java?
9. Write notes on nested try, throw, throws and finally.
10. Discuss on any five methods defined by list interface.
11. Explain the life cycle of thread.
12. How to manage error in java programming?
13. What is a Package? Explain.

Unit IV

PORTIONS: - GUI Components – Simple GUI based I/O using JOption Panel – Jlabel Jtext – Overview of Swing Components – JButton – JCheckbox – JRadioButton – JPanel - JComboBox – Jlist – Jmenus with Jframes Introduction to Event Introduction to Event Handling – GUI Event Types – Listener Interfaces – Mouse Event Handling – Key Event Handling - Adapter Classes – Layout Managers – Flow Layout – Border Layout – Grid –JtextArea – Introduction to Applet.

SECTION-A 2 Marks

1. What do you mean by a dead state of an Applet?
2. Define AWT.
3. Define controls.
4. Explain any two mouse events.
5. Explain any two type of State buttons.
6. Define GUI components and list any two GUI components.
7. What is the fuse of Jlist?

SECTION-B 5 Marks

1. Explain briefly about the method of creating Menus.
2. Discuss briefly about the Swing components and its features.

3. Describe briefly about the features of layout managers.
4. Discuss the features of any 5 AWT controls.
5. Write a java Applet that receives 3 numeric values as input from the user and then display the largest of the three on the screen.
6. What are the various types of control in AWT? Discuss.
7. Explain the fundamental of Applet.
8. Explain in detail the Swing components.
9. Create a program to use Jcheckbox tool.
10. Explain about flow layout? Give example.
11. Write about menus with frames.
12. How event handling works in java.

SECTION-C 10 Marks

1. Write short notes on Jlabel, Jtext field, JButton, Jcheckbox, Jtext area.
2. Explain the method of creation of execution of Applet in detail.
3. Describe the features of various AWT control in detail.
4. Discuss on event handling by AWT components.
5. Write short notes on border layout.
6. Write short notes on Jslides.
7. Explain in briefly about mouse event handling.
8. Describe Applet with example.
9. Describe any five aol components with example.
10. What is Layout manager? Describe various Layouts implemented in java.
11. Explain various event handling mechanism with example.
12. Discuss on JButton.
13. Explain the flow layout.
14. Explain Key Event Class.
15. Discuss on Menus.
16. Explain the lif.
17. Explain Applet life cycle.

UNIT V

PORTIONS: - Graphics and Java 2D – Graphics Contexts and Graphics Objects – Color And Font Control – Graphics Class - Drawing Lines, Rectangles – Using Menus with Frames - File and Stream.

SECTION-A 2 Marks

1. What is a stream?
2. Distinguish between Byte stream and Character Stream Classes.
3. Distinguish between Input stream and Output stream classes.
4. What is the use of an input stream?
5. Define file.
6. What is graphic contexts?
7. What is font metrics?
8. Define Graphic context and Graphics object.
9. State the method and description to drawling and oval.

SECTION-B 5 Marks

1. Discuss Stream class available in java.
2. Describe about Output Stream classes.
3. Explain file input stream.
4. Write about Input Stream classes.
5. Describe string Buffer input Stream.
6. Write five colour constants and their RGB values.
7. Write short notes on Drawing line, Drawing Rectangle, Drawing Ovals.

SECTION-C 10 Marks

1. Explain the concept of Input Stream classes in Java in detail.
2. What are file stream used in java?
3. Explain in detail of the swing components.
4. Explain in detail about font control.
5. Discuss on Drawing Rectangles.
6. Discuss on any five method in the Input stream class.