**SRI RAMAKRISHNA MISSION VIDYALAYA COLLEGE OF ARTS AND SCIENCE (AUTONOMOUS) COIMBATORE – 641 020**

**For candidates admitted from academic year 2013-2014 onwards under New CBCS.**

Programme: B.Sc IT Course Title: JAVA Programming

Subject Code: Year: II Semester: III

5 Hours / week 5 Credits

**Unit I**

 Introduction to java- Introduction to Classes- Inheritance Concepts- Packages and Interfaces: Packages – Access protection Importing packages – interfaces. Exception Handling: Fundamentals – Exception types – Using Try and Catch – nested Try – statements – throw, throws, finally. (Page Number: 129-246)

**Unit II**

 Multithreaded programming: Thread model – Creating a thread, creating multiple threads – Using Alive0 and join 0 – synchronization – Inter threaded communication. String Handling: String constructors – string operations – character extraction – string comparison – searching – modification – string buffer. (Page Number: 273-297,347-376)

**Unit III**

 I/O: File – Stream classes – Byte streams – character streams – serialization – Networking: Basics – TCP/IP client sockets – met Address – URL – Datagram’s. (Page Number: 588-620)

**Unit IV**

 Applet: Basics – Architecture – Passing parameters to Applets – Skeleton – Simple Applet – Event handling: Event model –Event class –Event listener interface. (Page Number: 628-644)

**Unit V**

 Java Beans: - Advantages – Application building tools – Using Bean Developer kit (BDK) - JAR files – Developing simple Bean using the BDK. (Page Number: 886-898)

RMI: – A simple client/server application is using RMI – Sockets. (Page Number: 587-629)

**Text Book:**

1. Herbert Schildt, The Complete Reference -java 2, TATAMcGraw Hill, 2002, Fifth Edition

**Reference Books:**

1. Patrick Naughton, The JAVA Hand Book, TATAMcGraw Hill, 1997
2. Harley Haim, The internet computer reference, TATAMcGraw Hill,1998, Second Edition