

<b>Devi Ahilya University, Indore, India Institute of Engineering &amp; Technology</b>				<b>III Year B.E. (Electronics &amp; Instrumentation Engg.)</b>			
<b>Subject Code &amp; Name</b>	<b>Instructions Hours per Week</b>			<b>Credits</b>			
<b>EIR5L3 Software Workshop</b>	<b>L</b>	<b>T</b>	<b>P</b>	<b>L</b>	<b>T</b>	<b>P</b>	<b>Total</b>
<b>Only Practical examination will be held</b>	-	-	2	-	-	2	2

**Learning Objective:** To familiarize students about Java based application programs

**Prerequisites (if any):** basics of Java programming

### COURSE CONTENTS

#### UNIT-I

Introduction to Object Oriented Programming, Java based application programs related to topics such as conditional statements, iteration statements with a focus on problems related to electronics and telecommunication.

#### UNIT-II

Introduction to string handling, Arrays, Java based application programs related to these topics with a focus on problems related to electronics and telecommunication.

#### UNIT-III

Introduction to Inheritance and Polymorphism, Java based application programs related to these topics with a focus on problems related to electronics and telecommunication.

#### UNIT-IV

Exception handling and Multi-threading, Java based application programs related to these topics with a focus on problems related to electronics and telecommunication.

#### UNIT-V

Java I/O, Applets and Event Handling, creating GUIs in AWT windows, Java based application programs related to these topics with a focus on problems related to electronics and telecommunication.

### **Learning Outcomes:**

Upon completing the course, Student would be able to:

- Write Java based application programs
- Learn to apply the concepts relating to various topics

### **BOOKS RECOMMENDED:**

- [1] Herbert Schildt, Java The complete reference, McGraw Hill Education private limited, 2013.
- [2] Anita Seth, B.L.Juneja, Java One Step Ahead, Oxford University press, 2017.
- [3] Timothy, Budd, Object Oriented Programming, 3/E Pearson Education, 2002.
- [4] Cay S.Horstmann, Core Java, vol-1,8/E, Pearson Education, 2008.