BACHELOR OF TECHNOLOGY (CBCS - 2023)
B. Tech. Sem-II Computer Science & Engineering AI & ML : SUMMER : 2025
SUBJECT: OBJECT ORIENTED PROGRAMMING

Day : Tuesday | Time : 10:00 AM-01:00 PM
Date : 03/06/2025 | **S-27704-2025** | Max. Marks : 60

N.B.
1) All questions are **COMPULSORY**.
2) Figures to the **RIGHT** indicate **FULL** marks.
3) Assume suitable data **WHEREVER** necessary.
4) Draw neat diagrams **WHEREVER** necessary.

Q.1 Define following terms: **(10)**
- i) Objects
- ii) Class
- iii) Encapsulation
- iv) Abstraction
- v) Message passing

OR

Q.1 Differentiate between Procedural and Object-Oriented programming and write the features of Java. **(10)**

Q.2 Write a program that shows the use of default, parameterized and copy constructor. **(10)**

OR

Q.2 State any five differences between method overloading and method overriding. Write a suitable program for both concepts. **(10)**

Q.3 Explain the methods of String and String Buffer Class. **(10)**

OR

Q.3 Explain how arrays are created in Java? How array elements are accessed? **(10)**

Q.4 How does Java incorporate the concept of polymorphism? Give one example. **(10)**

OR

Q.4 Explain the concept of inheritance and its types with suitable examples? **(10)**

Q.5 Draw and explain the Thread lifecycle. **(10)**

OR

Q.5 What are the different ways to handle exceptions? **(10)**

Q.6 Explain life cycle of an applet. **(10)**

OR

Q.6 What are the swing components? Explain in detail. **(10)**

*****

030625-m-003-mumbai