

GUJARAT TECHNOLOGICAL UNIVERSITY

BE- SEMESTER-VI EXAMINATION – WINTER 2025

Subject Code: 3160707

Date: 25-11-2025

Subject Name: Advanced Java Programming

Time: 02:30 PM TO 05:00 PM

Total Marks: 70

Instructions:

1. Attempt all questions.
2. Make suitable assumptions wherever necessary.
3. Figures to the right indicate full marks.
4. Simple and non-programmable scientific calculators are allowed.

| | | MARKS |
|-----------|--|-------|
| Q.1 | (a) Describe the concept of JDBC. | 03 |
| | (b) Write a Web application using servlet to find whether entered number is Prime or not. | 04 |
| | (c) List the different types of JDBC drivers and explain type3 driver with its advantages and disadvantages. | 07 |
| Q.2 | (a) What are the components of URL? Describe the use of URL class with an example. | 03 |
| | (b) Explain CallableStatement with example. | 04 |
| | (c) Write a client server program using TCP where client sends two numbers and server responds with the sum of them. | 07 |
| OR | | |
| | (c) Write a client server program using TCP where client send number and server respond reverse of given number. | 07 |
| Q.3 | (a) What is session? List the different ways to manage the session. | 03 |
| | (b) Discuss servlet life cycle methods. | 04 |
| | (c) Explain use of ServletConfig and ServletContext object with example. | 07 |
| OR | | |
| Q.3 | (a) How MVC architecture is better than conventional approach? | 03 |
| | (b) List and Explain various stages of JSP life cycle. | 04 |
| | (c) Write a Web application using servlet to find the sum of all the digits of an input integer. | 07 |
| Q.4 | (a) Define the init() method of a servlet. | 03 |
| | (b) Write a servlet to display the name and age of a person received as parameters. | 04 |
| | (c) List out JSP Action Tags and explain it. | 07 |
| OR | | |
| Q.4 | (a) How the GET method different from the POST method? | 03 |
| | (b) What is filter? List out the application of the filter. | 04 |
| | (c) Write a Web Application using JSP to get an integer N (where N>0) and display all the prime number up to N. | 07 |
| Q.5 | (a) Discuss JSP Exception Handling. | 03 |
| | (b) List out JSF HTML tags and explain any two. | 04 |
| | (c) Draw the Hibernate Architecture diagram and explain each part in brief. | 07 |

OR

- Q.5** (a) Explain any three Spring form tags with example. **03**
(b) What is JSF? List and explain its features. **04**
(c) Explain the steps to develop the Hibernate web application. **07**
