Seat No.: _____   Enrolment No._____

GUJARAT TECHNOLOGICAL UNIVERSITY
BE - SEMESTER–VI(NEW) EXAMINATION – WINTER 2022

Subject Code:2160707   **Date:14-12-2022**
Subject Name:Advanced Java
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)	Discuss the difference between the Socket and ServerSocket class.	03
	(b)	Explain different stages of JSP Page Life Cycle.	04
	(c)	List different types of JDBC drivers and explain difference between Type-1 and Type 4 Driver with Code Snippet.	07
Q.2	(a)	Explain Request and Response object in Servlet.	03
	(b)	List the JSTL core tags and explain any two with example.	04
	(c)	Write a client-server program using UDP where the client sends 10 numbers and server responds with the numbers in sorted order.	07
		OR	
	(c)	Write a Servlet that takes two numbers as an input and display Multiplication of that no's. Also write web.xml description for the servlet.	07
Q.3	(a)	What is filter? List Different filter interfaces.	03
	(b)	List the JSTL core tags and explain any two with example.	04
	(c)	Explain the use of the PreparedStatement object of the JDBC with an appropriate example.	07
		OR	
Q.3	(a)	Differentiate between doGet() & doPost() methods.	03
	(b)	What is Request Dispatcher? What is the difference between Request dispatcher's forward() and include() method?	04
	(c)	Consider Bank table with attributes AccountNo, CustomerName, Balance, Phone and Address. Write a database application which allows insertion, updation and deletion of records in Bank table. Print values of all customers whose balance is greater than 20,000.	07
Q.4	(a)	List the JSF facelets tags and explain any two.	03
	(b)	Discuss CallableStatement with example	04
	(c)	What is OR mapping? Give an example of Hibernate XML mapping file.	07
		OR	
Q.4	(a)	Explain ResultSetMetaData with suitable program.	03
	(b)	Explain JSF life cycle phases.	04
	(c)	Explain various Session tracking mechanisms in servlet with example.	07
Q.5	(a)	What do you mean by MVC architecture? Explain its role in modern applications with its advantages	03

| | **(b)** | Discuss JSP Exception Handling | **04** |
| | **(c)** | What is ResultSet interface. Write various method for ResultSet interface. Write a code to update record using this interface. | **07** |

OR

Q.5	**(a)**	List the JSF validation tags and explain any two.	**03**
	(b)	Explain following tags in JSTL with example : (i) Core (ii)XML	**04**
	(c)	Explain architecture of Hibernate	**07**

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