

R.N.G. PATEL INSTITUTE OF TECHNOLOGY-RNGPIT
(An Autonomous Institute U/s UGC Act 1956)

B.Tech. SEMESTER-III, SEMESTER END EXAMINATION – WINTER 2025

SUBJECT CODE: 1IT305

DATE: 26-12-2025

SUBJECT NAME: WEB TECHNOLOGIES

TIME: 11:00 AM to 01:30 PM

TOTAL MARKS: 70

Instructions

1. It is **compulsory** for students to write **Enrolment No. /Seat No.** on the question paper.
2. Write answers of **Section A** and **Section B** in **separate answer books**.
3. Attempt all questions from both **Section A** and **Section B**.
4. Each section carries **35 marks**, with a total of **70 marks** for the examination.
5. The figures to the right of each question indicate full marks, make suitable assumptions with justification.
6. BL - Cognitive Level (As per Revised Bloom's Taxonomy) (R-Remember, U-Understanding, A –Application, N –Analyze, E – Evaluate, C -Create), CO - Course Outcomes.

SECTION A

				Marks	BL	CO
Q.1	(a)	Describe Internal JavaScript with a suitable example.	03	R	1	
	(b)	Write a JavaScript code to display a message when a user hovers over a specific image on a webpage.	04	A	1	
Q.2	(a)	Define server-side programming and explain how it differs from client-side programming.	03	R	2	
	(b)	Explain the use of if, else if, and switch statements in PHP with syntax and examples.	04	U	2	
	(c)	Develop a PHP script that allows users to upload an image file and display it on the same page after successful upload.	07	A	2	
OR						
Q.2	(a)	Write the syntax and purpose of any three date/time functions in PHP.	03	R	2	
	(b)	Explain the use of a for loop in PHP with respect to creating a multiplication table.	04	U	2	
	(c)	Write a PHP program that takes two numbers as input and demonstrates addition, subtraction, multiplication, and division using arithmetic operators.	07	A	2	
Q.3	(a)	Explain the importance of connecting PHP with databases.	03	U	3	
	(b)	Write a PHP script to create and retrieve a cookie value	04	A	3	

(c) Discuss in detail different techniques for session management in PHP with suitable examples. **07 U 3**

OR

Q.3 (a) What are CRUD operations? Give the full form of CRUD **03 U 3**

(b) Write a PHP code snippet to handle database connection errors using exceptions. **04 A 3**

(c) Explain any two advantages and two disadvantages of using Cookies and Sessions. Write the difference between Cookies and Sessions. **07 U 3**

SECTION B

		Marks	BL	CO
Q.4 (a)	Describe Laravel? Mention its key features.	03	R	4

(b) Explain how error and exception handling is performed in Laravel. **04 U 4**

Q.5 (a) Define XML and state its importance in web technologies. **03 R 5**

(b) Differentiate between DTD and XML Schema. **04 U 5**

(c) Write an XML document and show how DTD or Schema validation ensures the document's correctness. **07 U 5**

OR

Q.5 (a) What is a DTD? Why is it used? **03 R 5**

(b) Explain how XML can be used for data sharing between web applications. **04 U 5**

(c) Write an example XML and XSLT document to transform the XML data into a formatted HTML output. **07 U 5**

Q.6 (a) What is a RESTful API? List the common HTTP methods used in REST architecture. **03 R 6**

(b) Explain the basic architecture of a web service with a neat labeled diagram. **04 U 6**

(c) Demonstrate how SOA can be implemented using PHP web services with an example. **07 A 6**

OR

Q.6 (a) Define a web service and mention its key characteristics. **03 R 6**

(b) Explain the client-server interaction model in web services. **04 U 6**

(c) Write a PHP code snippet to create a simple RESTful API for managing student data (GET and POST operations). **07 A 6**
