

Roll.No.

20UBICT1002

SHRIMATHI DEVKUNVAR NANALAL BHATT VAISHNAV COLLEGE FOR WOMEN
(AUTONOMOUS)

(Affiliated to the University of Madras and Re-accredited with 'A+' Grade by NAAC)
Chromepet, Chennai - 600 044.

B.Com.ISM - END SEMESTER EXAMINATIONS - NOVEMBER 2025

SEMESTER - I

20UBICT1002 - Web Technology

Total Duration : 2 Hrs.30 Mins.

Total Marks : 60

Section B

Answer any **SIX** questions (6 × 5 = 30 Marks)

1. Explain the services provided by the TCP/IP protocol suite.
2. Write a JavaScript function to check whether a number is even, and invoke it from an HTML page.
3. Differentiate between the browser objects 'window' and 'document' with suitable examples.
4. Apply an external CSS stylesheet to style a navigation menu. Show the HTML link tag and a sample CSS rule.
5. List and describe the types of HTML lists with an example for each.
6. Consider the following JavaScript snippet. Predict the output and justify each step.
let x = '5';
let y = 2;
console.log(x + y);
console.log(+x + y);
console.log(x == 5, x === 5);
7. Create a simple HTML form to collect name and email, and show how to read the values using JavaScript when the form is submitted.
8. Justify the use of CSS classes and `span` with class for inline styling. Discuss specificity and maintainability.

Section C

Answer any **THREE** questions (3 × 10 = 30 Marks)

9. Design a flowchart and write an algorithm to compute net salary for an employee given basic pay, DA (as %), HRA (as %), and deductions. Discuss the importance of algorithmic steps and flowchart symbols

10. Develop a set of two linked HTML pages demonstrating tables, images, and hyperlinks. Include a fragment link and a table with header, body, and footer. Explain your design choices.
11. Evaluate different approaches to client-side form validation in JavaScript (inline event handlers, `addEventListener`, and constraint validation API). Provide code snippets and argue which approach is most maintainable for a medium-sized site.
12. Build a mini contact form that validates inputs and stores the user's name in a cookie to greet them on the next visit. Analyze potential security and privacy concerns.
13. Critically compare DHTML (HTML + CSS + JavaScript with layers/JSSS concepts) with a modern separation-of-concerns approach (semantic HTML + CSS + unobtrusive JS). Recommend a strategy for dynamic menus on an educational website and justify your choice.
