



# Rabindra Mahavidyalaya

Established in 1971

Affiliated to University of Burdwan

## DEPARTMENT OF Mathematics and Statistics

30-HOURS ADD-ON COURSE IN RABINDRAMAHAVIDYALAYA SESSION 2024-2025

### Module I-BASIC DETAILS OF THE ADD- ON COURSE:

SL.NO	TITLE	CONTENT
1.	Course Title	<b>ADD-ON COURSE ( Web Technology of computer)</b>
2.	Context	This course is designed to enhance your skills in computer science, covering topics such as programming, data analysis Web development, and more. Whether you're a beginner or looking to advance your knowledge, this course is tailored to diverse learning needs.
3.	Course Objectives	The main objectives of this course are to: Another webpages with well-structure HTML and correct CSS layout/staying patterns. Personalize web pages using text formatting, graphics, audio, and video elements. Create a webpage from start to finish by planning, designing, and implementing everything themselves.
4.	Programme highlights and Unique Features	<ul style="list-style-type: none"><li>● HTML is a fundamental building block of the World Wide Web. It is incredibly popular for creating web pages. The main features of HTML are user –friendly, platform-indepdent, game, development semantic element, media support, SEO-search engine optimisation, and case insensitive.</li><li>● Cascading style sheets (css) is a stylesheet language used to describe the presentation of a document written in HTML or XML(including XML dialects such as, SVG, Math ML or XHTML).Css describes how elements should be rendered on screen, on paper, in speech, or on</li></ul>

		other media.
5.	Career prospect	<p><b>HTML/CSS developer:</b> Create, update, test, and refine websites and applications using HTML and CSS.</p> <p><b>Front-end developer:</b> Create the user interface and experience of a website or web application using HTML, CSS, and JavaScript.</p> <p><b>HTML coder:</b> Build website layouts using HTML, templates, and wireframes.</p> <p><b>SEO specialist:</b> Program in HTML, CSS, and JavaScript to make a website more accessible and understandable.</p> <p><b>Interface developer:</b> Work for website design firms or advertising and digital marketing agencies.</p> <p><b>Performance analyst:</b> Work in web development or software development.</p> <p><b>Interactive designer:</b> Work in web development or software development.</p>
6.	Faculty Requirements	Internal–Department of computer and invited Guest Lecture form University/College.
7.	Pedagogy	Lecture on Theory and Practical.
8.	Course Fee	NIL
9.	Intake Capacity	
10.	Contact Hours	Minimum 30 hours
11.	Course Duration	One Class (Theory): 1 Hour Laboratory: 2 Hours Final Assessment on the Last day
12.	Course content	
13.	Course outcome	<p>A <b>Course Outcome (CO)</b> in an <b>Add-on Course</b> refers to the specific skills, knowledge, and competencies that students are expected to acquire upon successfully completing the course. These outcomes are usually designed to enhance employability, bridge skill gaps, or provide industry-relevant expertise.</p> <ul style="list-style-type: none"> <li>● Enhanced Knowledge</li> <li>● Skill Development</li> <li>● Knowledge skill of web development</li> <li>● Industrial training skill development</li> </ul>
14.	Learning Resources	<ol style="list-style-type: none"> <li>1. Software &amp; Tools for Practical Learning.</li> <li>2. Online Courses &amp; Tutorials.</li> </ol>

		<p>3. Books &amp; E-books.</p> <p>4. Real-World Applications &amp; Industry Use Cases.</p>
15.	Lesson Plan	<ul style="list-style-type: none"> <li>● HTML is a fundamental building block of the World Wide Web. It is incredibly popular for creating web pages. The main features of HTML are user –friendly, platform-independed, game, development semantic element, media support, SEO-search engine optimisation, and case insensitive.</li> <li>● Cascading style sheets (css) is a stylesheet language used to describe the presentation of a document written in HTML or XML(including XML dialects such as, SVG, Math ML or XHTML).Css describes how elements should be rendered on screen, on paper, in speech, or on other media.</li> </ul>
16.	Assessment process	<ul style="list-style-type: none"> <li>❖ Assignments &amp; Homework .</li> <li>❖ Quizzes &amp; MCQs</li> <li>❖ Practical Labs &amp; Web technology Projects.</li> <li>❖ Final Examination.</li> </ul>
17.	Students' Feedback	To be taken via Google Form after the end of the course.
18.	Course Coordinator	Coordinator: <b>Dr. Sadananda Chatterjee, Assistant Professor in Statistics.</b>
19.	General Rules and Regulations	
20.	List of members	<p>Course Designer &amp; Teacher:</p> <p><b>Prof. Ritwika Ghosh.</b></p> <p><b>Prof.. Avik Panja.</b></p> <p><b>Dr. Sadananda Chatterjee.</b></p> <p><b>Prof. Rajkumar Kabi</b></p> <p><b>Dr. Shuvojit Mondal</b></p>

## Module II: SYLLABUS STRUCTURE OF THE ADD-ON COURSE:

UNIT	UNIT TITLE	HOURS
UNIT -1	HTML	10
UNIT-2	CSS+JAVASRIPT	5
UNIT-3	Computer Laboratory practical monitoring	10
UNIT-4	Statistics	5
<b>Total</b>		<b>30</b>

## Module III: DETAILED SYLLABUS OF THE ADD-ON COURSE

### UNIT-1

#### HTML Basics

HTML:Introduction, Basic Structure of HTML, Head Section and Elements of Head Section,Formatting Tags: Bold, Italic, Underline, Strikethrough, Div, Pre Tag Anchor links and Named Anchors Image Tag, Paragraphs, Comments, Tables: Attributes – (Border, Cellpadding, Cell spacing , height , width), TR, TH, TD, Rowspan, Colspan Lists : Ordered List , Unordered List , Definition List, Forms,Form Elements, Input types, Input Attributes, Text Input Text Area, Dropdown, Radio buttons , Check boxes, Submit and Reset Buttons Frames: Frameset, nested Frames. HTML 5 Introduction, HTML5 New Elements: Section, Nav, Article, Aside, Audio Tag, Video Tag, HTML5 Form Validations: Require Attribute, Pattern Attribute, Autofocus Attribute, email, number type, date type , Range type, HTML embed multimedia, HTML Layout, HTML Iframe.

### UNIT-2

CSS:Introduction to CSS, Types of CSS, CSS Selectors : Universal Selector ,ID selector, Tag Selector, Class Selector, Sub Selector, Attribute Selector, Group Selector, CSS Properties: Back Ground properties, Block Properties, Box properties, List properties, Border Properties, Positioning Properties, CSS Lists CSS Tables, CSS Menu Design CSS Image Gallery, CSS Framework: Web Site Development using W3.CSS Framework, W3.CSS Intro, W3.CSS Colors, W3.CSS Containers, W3.CSS Panels, W3.CSSBorders, W3.CSS Fonts, W3.CSS Text, W3.CSS Tables, W3.CSS List, W3.CSSImages, W3.CSS Grid.

#### JavaScript and Angular Js:

Introduction to Client Side Scripting Language, Variables in Java Script, Operators in JS, Conditions Statements, JS Popup Boxes, JS Events, Basic Form Validations in JavaScript. Introduction to Angular JS: Expressions, Modules and Directives.

Web hosting Basics, Documents Interchange Standards, Components of Web Publishing, Document management, Web Page Design Considerations and Principles, Search and Meta Search Engines, WWW, Browser, HTTP, Publishing Tools.

### **UNIT-3**

#### **Computer Laboratory practical monitoring :Basics of Web Design Using**

**Html, CSS, Java Script Lab.** Practical Assignment: Building a Personal Portfolio Website Objective: The objective of this practical assignment is to apply the concepts learned in the course "Basics of Web Design Using HTML, CSS, and JavaScript" to create a personal portfolio website. The portfolio website will showcase your skills, projects, and accomplishments, and demonstrate your understanding of web design principles, responsive design, and JavaScript interactivity. Requirements: Your personal portfolio website should meet the following criteria:

1. Home Page: Create an attractive and informative home page that introduces yourself and includes a brief summary of your background, skills, and interests.
2. About Me Page: Design an "About Me" page that provides more detailed information about your education, work experience, and personal interests.
3. Projects Page: Showcase your projects with descriptions and images. Use a grid or card layout to present the projects neatly.
4. Contact Page: Include a contact form or your contact information (email, phone number, LinkedIn profile, etc.) to allow visitors to reach out to you.
5. Responsive Design: Ensure that your website is responsive and displays correctly on various devices, including desktops, tablets, and mobile phones.
6. Navigation: Implement a navigation bar or menu that allows visitors to easily navigate between different pages of your website.
7. CSS Styling: Apply CSS styles to enhance the overall appearance of your website, including fonts, colors, backgrounds, and layout.
8. JavaScript Interactivity: Incorporate JavaScript to add interactive elements to your website, such as a responsive navigation menu, image sliders, or a contact form validation.
9. External Resources: Utilize external resources, such as Google Fonts or Font Awesome icons, to enhance the design and functionality of your website.
10. Code Organization: Organize your HTML, CSS, and JavaScript code into separate files and link them appropriately in your web pages.

11. Valid HTML and CSS: Ensure that your HTML and CSS code is valid, following W3C standards.

#### **UNIT-4:**

**Statistics:** Statistics is real field application science which deals with collection analysis and interpretation. It is also called science of data.

#### **Module III: LEARNING RESOURCES OF ADD-ON COURSE:**

1. "HTML, CSS, and JavaScript All in One: Covering HTML5, CSS3, and ES6" by Julie C. Meloni and Jennifer Kyrnin Publisher: BPB Publications
2. "Learning Web Design: A Beginner's Guide to HTML, CSS, JavaScript, and Web Graphics" by Jennifer Niederst Robbins Publisher: O'Reilly Media.
3. "HTML and CSS: Design and Build Websites" by Jon Duckett Publisher: Wiley India Pvt. Ltd.
4. "JavaScript and JQuery: Interactive Front-End Web Development" by Jon Duckett Publisher: Wiley India Pvt. Ltd.
5. "Web Design with HTML, CSS, JavaScript and jQuery Set" by Jon Duckett Publisher: Wiley India Pvt. Ltd.
6. "Head First HTML and CSS: A Learner's Guide to Creating Standards-Based Web Pages" by Elisabeth Robson and Eric Freeman Publisher: O'Reilly Media
7. "A Smarter Way to Learn HTML & CSS: Learn it faster. Remember it longer." by Mark Myers Publisher: CreateSpace Independent Publishing Platform
8. "Web Development and Design Foundations with HTML5" by Terry Felke-Morris Publisher: Pearson Education India.

#### **Module IV: LESSON PLAN :**

● **Offline classes:**

<b>Day</b>	<b>Class time(1<sup>st</sup> half)</b> (9:30am-10:30am)	<b>Class time(2<sup>nd</sup> half)</b> (3:30pm-4:30pm)

<b>Monday</b>	HTML( Theory)	<b>HTML(Practical)</b>
<b>Tuesday</b>	CSS (Theory)	CSS (Practical)
<b>Wednesday</b>	HTML + CSS(Theory)	HTML + CSS(Practical)
<b>Thursday</b>	CSS+JAVASCRIPT (Theory)	(Practical)
<b>Friday</b>	HTML+CSS(Theory)	<b>(Practical)</b>
<b>Saturday</b>	HTML+ CSS+JAVASCRIPT (Theory)	

**SUGGESTED READING:**1. "HTML, CSS, and JavaScript All in One: Covering HTML5, CSS3, and ES6" by Julie C. Meloni and Jennifer Kyrnin Publisher: BPB Publications.

2. "Learning Web Design: A Beginner's Guide to HTML, CSS, JavaScript, and Web Graphics" by Jennifer Niederst Robbins Publisher: O'Reilly Media.

3. "HTML and CSS: Design and Build Websites" by Jon Duckett Publisher: Wiley India Pvt. Ltd.

4. "JavaScript and JQuery: Interactive Front-End Web Development" by Jon Duckett Publisher: Wiley India Pvt. Ltd.

5. "Web Design with HTML, CSS, JavaScript and jQuery Set" by Jon Duckett Publisher: Wiley India Pvt. Ltd.

6. "Head First HTML and CSS: A Learner's Guide to Creating Standards-Based Web Pages" by Elisabeth Robson and Eric Freeman Publisher: O'Reilly Media.

7. "A Smarter Way to Learn HTML & CSS: Learn it faster. Remember it longer." by Mark Myers Publisher: CreateSpace Independent Publishing Platform.

8. "Web Development and Design Foundations with HTML5" by Terry Felke-Morris Publisher: Pearson Education India.

**Total Marks of the Evaluation process would be–50**

### **Module V: TABLE FOR QUALIFICATION:**

#### **Examination pattern:**

Assignment [Total marks: 20]

Course-end Assessments (Written Test)[Total Marks:20] and viva [Total Marks:5]

Attendance[Total Marks:5]

### **Module VI: TABLE FOR QUALIFICATION**

TOTAL SCORE(OUT OF 50)	GRADE
45-50	O-OUTSTANDING
40-44	E- EXCELLENT
35-39	A – VERY GOOD

<b>30-34</b>	<b>B - GOOD</b>
<b>25-29</b>	<b>C - FAIR</b>
<b>BELOW 25</b>	<b>F - FAILED</b>

**Module VII: GENERAL RULES AND REGULATION:**

- 1.** Students must attend and appear for all the Module-End Assessment/Assignments. If any student fails to submit any of the Module-End Assignments or to Attend any of the Module end Assessment examinations, the particular student would NOT BE ELIGIBLE FOR CERTIFICATE.
- 2.** Students must attend and appear for the Course- End Assessment Examination, the particular student would NOT BE ELIGIBLE FOR CIRTIFICATE.
- 3.** Students must attend for the Course-End Written Examination. If any student fails to attend the course-End Examination, the particular student would NOT BE ELIGIBLE FOR CERTIFICATE.
- 4.** Total Marks of Course Evaluation will be 50 Marks.
- 5.** Minimum 50% Marks has to be Scored to receive any Certificate. There will be only ONE Attempt allowed for each of the Module-End Assessments/Assessment.
- 6.** There will be NO PROVISION for Backlog Clearance.
- 7.** General Rules and Regulation of the college must be followed without any exception.
- 8.** This course will be heavily discussion-based so attendance and participation are expected at every class. **Minimum 75% attendance is required to receive the certificate of the Course.**

**Signature of Add –On Course Coordinator**

**Signature of IQAC Coordinator**

**Principal**