### 🟣 Module 2: CSS Basics

### 📘 Chapter 1: What Is CSS?

#### 🧠 Concept:

CSS stands for **Cascading Style Sheets**. It’s what makes websites look nice and beautiful. While HTML structures the content, CSS handles the appearance — colors, spacing, fonts, and layout.

Imagine HTML as the skeleton of your website, and CSS as the clothes and makeup that give it personality.

There are 3 ways to apply CSS:

* **Inline** – directly on an element
* **Internal** – inside a <style> tag in your HTML
* **External** – in a separate .css file (best practice!)

#### 💡 Example:

<!DOCTYPE html>  
<html>  
 <head>  
 <style>  
 h1 {  
 color: blue;  
 font-size: 36px;  
 }  
 </style>  
 </head>  
 <body>  
 <h1>Hello, Stylish World!</h1>  
 </body>  
</html>

#### 🧪 Mini Challenge:

**Task**:

* Create a heading and color it green.

**Expected Output:**

<!DOCTYPE html>  
<html>  
 <head>  
 <style>  
 h1 {  
 color: green;  
 }  
 </style>  
 </head>  
 <body>  
 <h1>Green is Great</h1>  
 </body>  
</html>

### 📘 Chapter 2: CSS Selectors and Properties

#### 🧠 Concept:

A **selector** targets HTML elements (like p, h1, or .class). A **property** is what you want to change (like color, font-size, margin). A **value** is what you want to set it to.

Basic Syntax:

selector {  
 property: value;  
}

#### 💡 Example:

<style>  
 p {  
 color: darkred;  
 font-size: 18px;  
 }  
</style>

#### 🧪 Mini Challenge:

**Task**:

* Make your paragraphs blue and slightly larger.

**Expected Output:**

<!DOCTYPE html>  
<html>  
 <head>  
 <style>  
 p {  
 color: blue;  
 font-size: 20px;  
 }  
 </style>  
 </head>  
 <body>  
 <p>This paragraph is now blue and big!</p>  
 </body>  
</html>

### 📘 Chapter 3: Classes and IDs

#### 🧠 Concept:

* A **class** lets you style multiple elements the same way.
* An **ID** is unique and should be used only once per page.

Classes use a dot (.) and IDs use a hash (#).

#### 💡 Example:

<style>  
 .highlight {  
 color: orange;  
 }  
 #main-title {  
 font-size: 40px;  
 }  
</style>

#### 🧪 Mini Challenge:

**Task**:

* Add a class to a paragraph and an ID to a heading.

**Expected Output:**

<!DOCTYPE html>  
<html>  
 <head>  
 <style>  
 .intro {  
 color: darkgreen;  
 }  
 #top {  
 font-size: 36px;  
 color: purple;  
 }  
 </style>  
 </head>  
 <body>  
 <h1 id="top">Welcome!</h1>  
 <p class="intro">This is an introductory paragraph with a custom style.</p>  
 </body>  
</html>

### 📘 Chapter 4: Background Colors

#### 🧠 Concept:

The background-color property allows you to change the background color of elements like the body, div, p, etc. It enhances readability and creates visual hierarchy.

#### 💡 Example:

<style>  
 body {  
 background-color: #f0f0f0;  
 }  
</style>

#### 🧪 Mini Challenge:

**Task**:

* Change the background color of your page to a soft blue.

**Expected Output:**

<!DOCTYPE html>  
<html>  
 <head>  
 <style>  
 body {  
 background-color: #e0f7fa;  
 }  
 </style>  
 </head>  
 <body>  
 <h1>My Cool Background</h1>  
 </body>  
</html>

### 📘 Chapter 5: Borders

#### 🧠 Concept:

The border property allows you to wrap an element with a line. You can customize its width, color, and style (solid, dashed, dotted).

#### 💡 Example:

<style>  
 h2 {  
 border: 2px solid black;  
 }  
</style>

#### 🧪 Mini Challenge:

**Task**:

* Add a solid navy border around a heading.

**Expected Output:**

<!DOCTYPE html>  
<html>  
 <head>  
 <style>  
 h2 {  
 border: 2px solid navy;  
 }  
 </style>  
 </head>  
 <body>  
 <h2>Bordered Heading</h2>  
 </body>  
</html>

### 📘 Chapter 6: Text Styles

#### 🧠 Concept:

Text styling includes properties like:

* text-align: left, center, right
* font-family: Arial, Georgia, etc.
* color: changes text color

These styles help control the look and feel of your content.

#### 💡 Example:

<style>  
 h2 {  
 text-align: center;  
 font-family: Georgia;  
 color: darkblue;  
 }  
</style>

#### 🧪 Mini Challenge:

**Task**:

* Style a heading with center alignment, a different font, and a new text color.

**Expected Output:**

<!DOCTYPE html>  
<html>  
 <head>  
 <style>  
 h2 {  
 text-align: center;  
 font-family: Georgia;  
 color: darkblue;  
 }  
 </style>  
 </head>  
 <body>  
 <h2>Styled Text</h2>  
 </body>  
</html>

### **✅ Project 2: Build a Stylish Info Card**

### **🧩 Challenge:**

### Create a centered info card with a light background, border, and styled text. This will help you combine background color, text styling, borders, and alignment — all in one place!

### **🛠️ Requirements:**

### A card section with a background and border

### Heading and paragraph centered and styled

### Use of class selectors for styling

### **✅ Example Output:**

### <!DOCTYPE html>

### <html>

### <head>

### <style>

### body {

### background-color: #f3f4f6;

### font-family: Verdana;

### display: flex;

### justify-content: center;

### align-items: center;

### height: 100vh;

### margin: 0;

### }

### .card {

### background-color: white;

### border: 2px solid #ccc;

### padding: 20px;

### border-radius: 8px;

### width: 300px;

### text-align: center;

### }

### .card h2 {

### color: #333;

### }

### .card p {

### color: #666;

### font-size: 16px;

### }

### </style>

### <title>Info Card</title>

### </head>

### <body>

### <div class="card">

### <h2>Alex Smith</h2>

### <p>Web Developer | Lifelong Learner</p>

### </div>

### </body>

### </html>