Web Design

CSS Basic Introduction

Third Stage/Semester 1

Lecture

4

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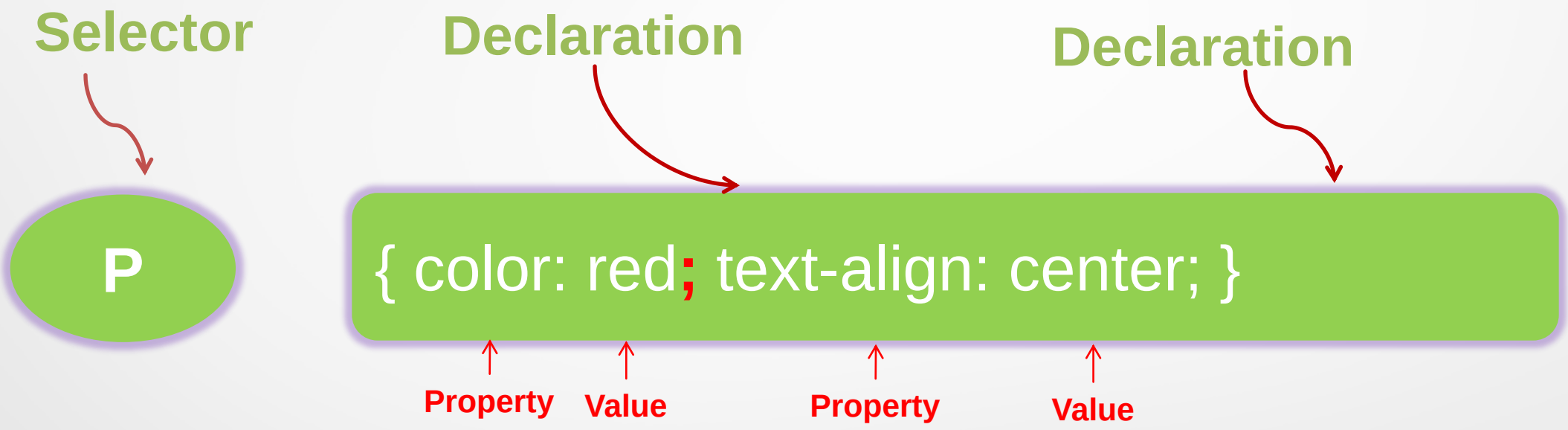
Outlines

- CSS Basic Introduction.
- CSS Selectors.
- Ways to apply CSS to HTML Document.
- Styling Links.
- Styling Lists.
- Styling Tables.
- CSS Box Model(Border, Margin Padding & Content).
- CSS Display & Float Properties.

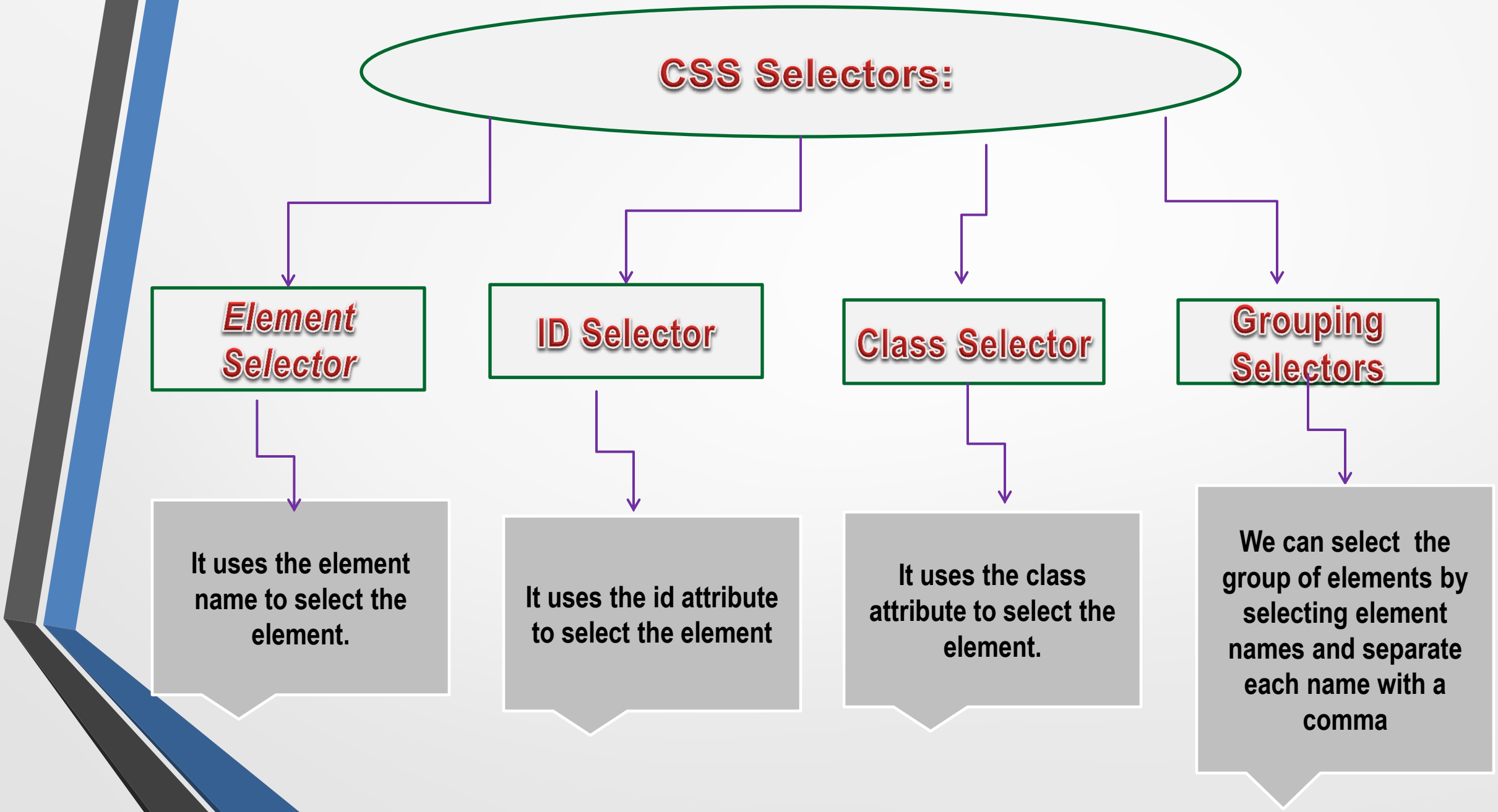
Cascading Style Sheets (CSS)

- **CSS** stands for **C**ascading **S**tyle **S**heets.
- **CSS** is a stylesheet language that styles (formats) the presentation of an HTML document.

CSS Syntax



- **Selector** points to element that you want to style.
- **Declaration** includes a property name and a value to style the selected element.


CSS Selectors:
Element Selector
ID Selector
Class Selector
Grouping Selectors
It uses the element name to select the element.
It uses the id attribute to select the element
It uses the class attribute to select the element.
We can select the group of elements by selecting element names and separate each name with a comma

Element Selector

- The element selector selects elements depend on the element name.
- **Example1: Element selector**

```
<head>
        <style>        p {
                                text-align: center;
                                color: blue; }
        </style>
</head > <body>
    <p>First paragraph is affected by CSS style.</p>
    <p >Second paragraph is also affected by CSS style.</p>
</body>
```

ID Selector

- The id selector uses # and the value of id attribute to select a specific elements.
- **Example2: ID selector**

```
<head>
        <style>        #FirstP {
                                text-align: center;
                                color: blue; }
        </style>
</head > <body>
    <p id="FirstP">First paragraph is affected by CSS style.</p>
    <p >Second paragraph is not affected by CSS style.</p>
</body>
```

Class Selector

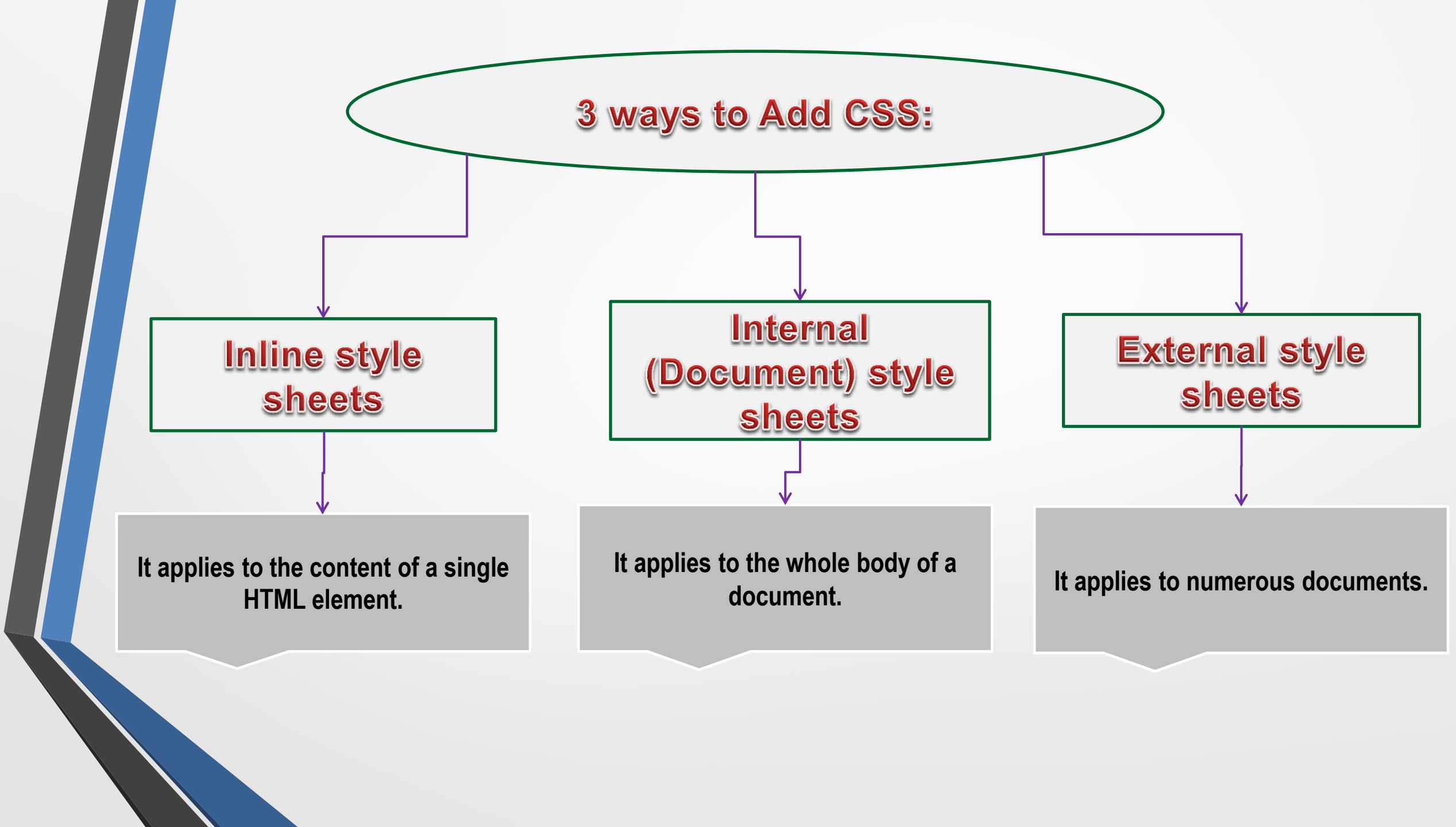
- The class selector uses dot and the value of class attribute to select the elements.
- **Example3: Class selector**

```
<head>
        <style>        .mobile {
                                color: blue;
                               }
        </style>
</head > <body>
    <ul class="mobile">      <li>Iphone</li>      <li>HTC</li>
                             <li>Nokia</li>       <li>Samsung</li>
</ul></body>
```

Grouping Selectors

- The grouping selector uses the group of element names to select the elements.
- **Example4: Grouping selector**

```
<head>
        <style>     h1,p {
                        text-align: center;
                        color: blue; }
        </style>
</head > <body>
    <h1> Both h1 and p are affected by CSS style.</h1>
    <p> Both h1 and p are affected by CSS style.</p>
</body>
```


3 ways to Add CSS:
Inline style sheets
Internal (Document) style sheets
External style sheets
It applies to the content of a single HTML element.
It applies to the whole body of a document.
It applies to numerous documents.

Inline style sheets

- It applies a unique style for a single element in the page so this may lead to inconsistencies. For example similar elements maybe formatted differently.
- It mixes the content and presentation of the document.
- It can be defined within the style attribute inside an HTML element.
- **Example5: Inline Style Sheet**
- <h1 style=" text-align: center; color: red;“ >This is a heading.</h1>

Internal(Document) style sheets

- It applies to one single page which has a unique style throughout the website.
- It allows for a clean separation of content and presentation.
- It can be defined within the <style> element, inside the <head> section of an HTML page.
- **Example6**: **Internal Style Sheet**

```
<head>      <style>      p {
                              text-align: center;
                              color: blue; }
</style> </head > <body>

<p>First paragraph is affected by internal CSS style.</p>

<p >Second paragraph is also affected by internal CSS style.</p>  </body>
```

External style sheets

- It can be applied to many pages so we can change the style of an entire website by changing just one file.
- It can be defined in an external **CSS** file.
- **Example7: External Style Sheet** , 1- CSS file, which will simply look something like

```
<link rel="stylesheet" type="text/css" href="mystyle.css">
```

- The **style** attribute is used to change background color, text colors, text fonts, text sizes and text alignment.

External style Example: 1- **CSS file**, which will simply look something like

```
p {
    color: blue;
    text-align: center; }
```

If this file is saved as “style.css" then it can be linked to in the HTML like this: 2-**HTML file** which looks like this.

```
<head>
    <link href="style.css" rel="stylesheet" type="text/css" >
</head >
<body>
    <p> The paragraph is affected by external CSS style. </p>
</body>
```

Styling Links

- **A:link:**

  Defines the style for normal links.

- **A:active:**

  Defines the style for active links.

  A link becomes active once you click on it.

- **A:hover:**

  Defines the style for hovered links. A link is hovered when the mouse moves over it.

Styling Links

- The **text-decoration** property adds and removes the underlines from links. e.x1:

  text-decoration: underline ; text-decoration: none;

- The **background-color** property specifies the background color for links.

  ex2: background-color: blue;

Example8: Link style

```
<style>
        a:link {
            text-decoration: none;
          }

        a:hover {
            text-decoration: underline;
            }
        a:active {
            background-color:blue;
             }
</style>
<body>
    <p>Click the following link:</p>
     <a href="CSS_Lecture.html" alt="CSS_Lecture" > Css Lecture</a>
</body>
```

Styling Lists

- The **list-style-type** property specifies the type of list item marker. it's values are **circle**, **square**, **upper-roman** and **lower-alpha**. Ex: **list-style-type: square;**
- The **list-style-image** specifies an image as the list item marker. Ex: **list-style-image: url('sqpurple.jpg');**

Example9: List style

```
<style>
        ul  {
            list-style-image: url('img01.jpg');
           }
 </style>
 <body>
        <ul>
           <li>Flower 1</li>
           <li>Flower 2</li>
           <li>Flower 3</li>
        </ul>
 </body>
```

Styling Tables

- The **border** property specifies table borders .
- The **padding** property is used to control the space between the border and content in a table.

Example10: Table style

```
<style>
        table, td, th {
                        border: 1px solid green;
                      }

        th {
            background-color: green;
            color: white;
          }
       td {
            padding: 15px;
          }
</style>
```

CSS Box Model(Border, Margin Padding & Content)

- The **CSS box Model** is usually used when talking about design and layout.
- The **Margin** is the area outside of the element. It never has color, it is always transparent .
- The **Border** extends around the element.
- The **padding** exists around the content and inherits the background color of the content area.
- The **Content** is surrounded by padding.

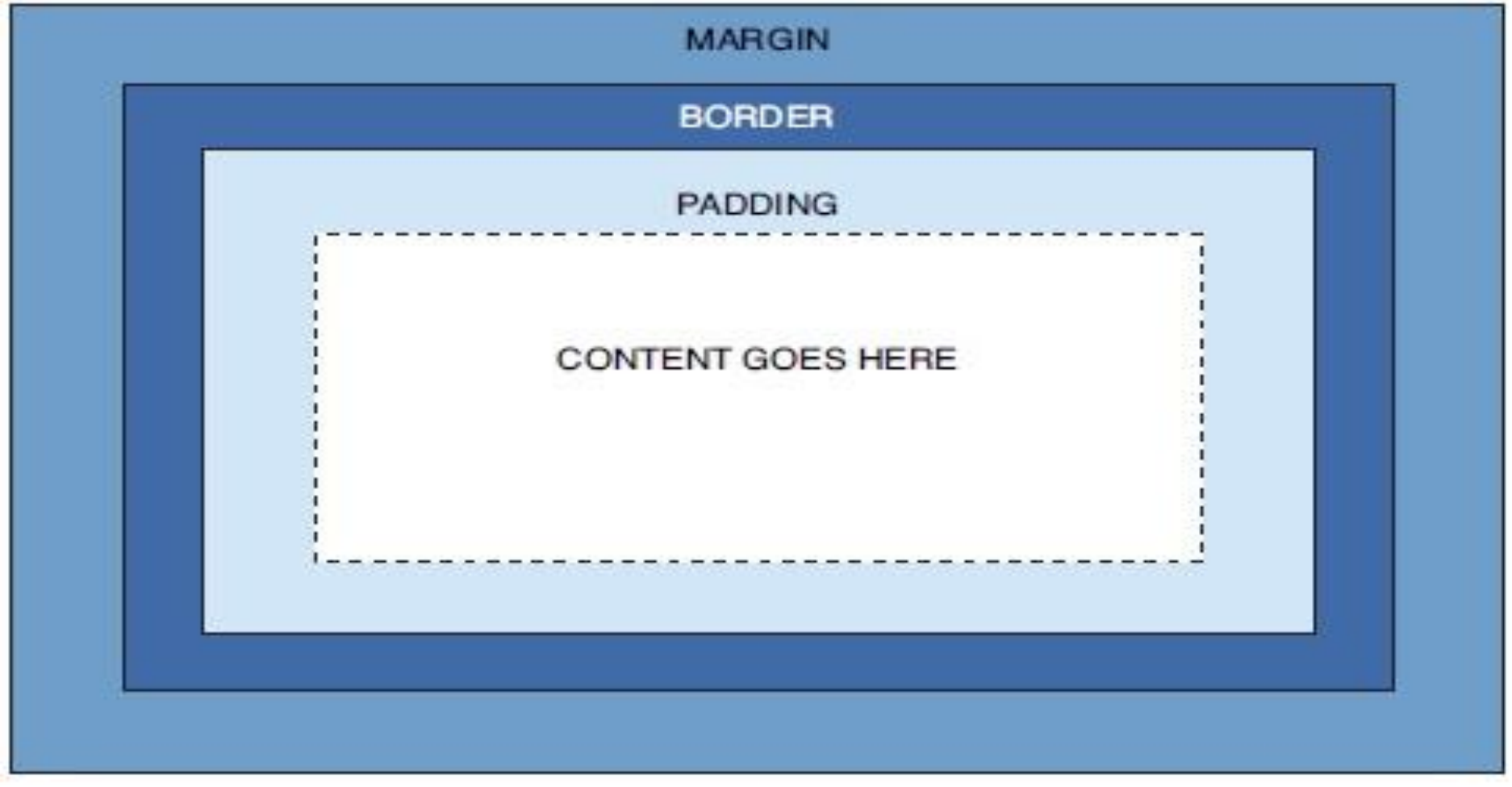


Figure1:CSS Box Model

Margin & Padding

- We can specify different margins & padding for different sides of an element.

Margin example:

```
p{
    margin-top: 100px;
    margin-right : 100px;
    margin-bottom : 150px;
    margin-left: 50px;
}
```

Padding example:

```
p {
    padding-top: 25px;
    padding-right: 50px;
    padding-bottom: 25px;
    padding-left: 50px;
}
```

Example11: Margin & padding

```
<head>
        <style>
                p {
                        padding: 25px;     // all four padding sides are 25px.
                        border: 25px solid blue;
                         width: 300px;
                         height: 300px;
                       margin: 25px; ;     // all four margin sides are 25px.
                    }
        </style>
</head>
<body>
          <p>Google .com.</p>
</body>
```

Display & Float

- The **Display** property uses to change how the element is displayed. Ex: **Display: inline;**

- **Example12: Display & Float**

```
<style>
        li{
            Display: inline;
        }
    </style>
<body>
    <ul>
        <li> <a href="#HTML" >HTML</li>
        <li> <a href="# CSS " >CSS</li>
        <li> <a href="# JAVAScript " >JAVAScript</li>
    </ul>
</body>
```

Float

- The **Float** property allows elements to be moved around in the design such that other elements wrap around them.
- The **Clear** property specifies which side(s) of floating elements are not allowed. **It's values are: Clear: left**, **Clear: right**, **Clear: Both.**
- **Example13: Float**

```
<style>
        img{
            Float: right;
        }
</style><body>
 <p><img scr="Css3.jpg"  height="70">
hhhhhhhhhhhhhhhhhhhhhhhhh
hhhhhhhhhhhhhhhhhhhhhhhhh
hhhhhhhhhhhhhhhhhhhhhhhhh</p> </body>
```