

HTML

OBJECTIVES

By the end of the session, students should be able to

- ❑ Define HTML tags, elements, attributes
- ❑ Write basic structure of html code

HTML Code

```
<!DOCTYPE html>
<html>
  <head>
    <title>MY First Page</title>
  </head>
  <body>
    <h1>My First Heading</h1>
    <p>My first paragraph.</p>
  </body>
</html>
```



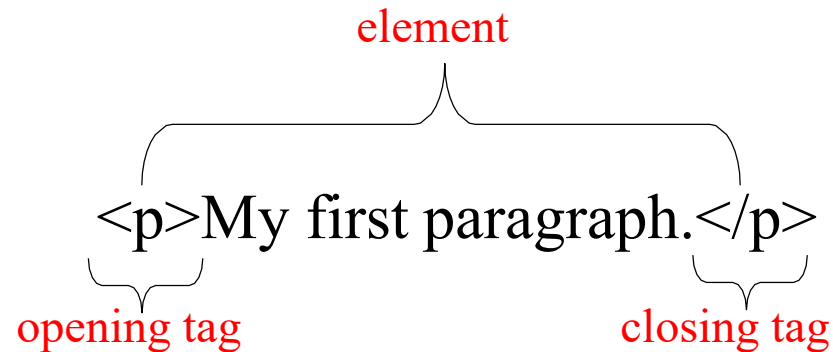
The <!DOCTYPE> Declaration

- ❑ represents the document type, and helps browsers to display web pages correctly.
- ❑ Appears only once at the top of the page.
- ❑ Not case sensitive

<!DOCTYPE html>

HTML

- ❑ Angle brackets and words between them are *tags* such as `<html>`, `<head>`, `</html>` and so on
- ❑ All the tags comes in pair, there are *opening tags* and *closing tags*
- ❑ *Closing tags* is always slightly different from the opening tag that it has forward slash after the first angled bracket as `</html>`
- ❑ A pair of tags and the content these include are known as *elements*



Basic Structure of HTML Document

- ❑ HTML document is divided into two parts
 - ❑ Head
 - ❑ Consist of *opening <head> tag, closing </head> tag and everything between them*
 - ❑ Often referred as the head of the page
 - ❑ Contains information about the webpage such as title, description of the page and keywords that search engine can use to index the page
 - ❑ Body
 - ❑ Consist of *opening <body> tag, closing </body> tag and everything between them*
 - ❑ Often referred as the body of the page
 - ❑ Contains information you actually see in the main browser window

Basic Structure of HTML Document

- ❑ The `<!DOCTYPE html>`
 - ❑ Specifies the Document Type Definition (DTD)
 - ❑ DTD is a separate file containing formal definition of the markup language's grammar such as supported elements and attributes
 - ❑ Browser checks the code of the document against the rule in the `<!DOCTYPE html>` declaration
 - ❑ Doesn't have closing tag

- ❑ The `<html>` element
 - ❑ Comes after `<!DOCTYPE html>` element
 - ❑ Specifies the basic structure of HTML web page
 - ❑ Have *closing* `</html>` tag

Basic Structure of HTML Document

❑ The <head> element

- ❑ Contains general information about the HTML document such as title, keywords and description
- ❑ Have closing *<head> tag*

❑ The <title> element

- ❑ Contains the title of HTML document
- ❑ Elements appear in the title bar of the web browser
- ❑ Also used by search engines for referring to the document
- ❑ Each *<head>* element should contain a *<title>* element

NOTE!!!

You should keep the title text relatively short and to the point because some browsers are not able to show titles longer than 256 characters

Basic Structure of HTML Document

- ❑ The <body> element
 - ❑ Body of the HTML document which contains the entire content that appears in the web browser.

How to create a simple HTML Document

- ❑ Open a notepad on windows or Notepad++ editor or TextEdit on Mac
- ❑ Write a simple HTML code as given below

```
<!DOCTYPE html>
```

```
<html>
```

```
  <head>
```

```
    <title>MY First Page</title>
```

```
  </head>
```

```
  <body>
```

```
    <h1>My First Heading</h1>
```

```
    <p>My first paragraph.</p>
```

```
  </body>
```

```
</html>
```

How to create a simple HTML Document

- ❑ Save the file with the **.html** extension and note the location of the your file
- ❑ Go to the location and double click on your html document

Adding Background Color the Web Page

- ❑ Open your HTML document in a notepad
- ❑ Add code in the body tag as shown below

Adding Background Color to the Web Page

❑ Add code in the body tag as shown below

```
<!DOCTYPE html>
```

```
<html>
```

```
  <head>
```

```
    <title>MY First Page</title>
```

```
  </head>
```

```
  <body bgcolor="green">
```

```
    <h1>My First Heading</h1>
```

```
    <p>My first paragraph.</p>
```

```
  </body>
```

```
</html>
```

Attributes

- ❑ Attributes are used to say something about the elements that carries them
- ❑ Always appear in the opening tag of the element
- ❑ made up of two parts
 - ❑ Name
 - ❑ Property of the element that you want to set
 - Eg. *bbgcolor* is the attribute here
 - ❑ Value
 - ❑ Is what you want the value of the property
 - ❑ Eg. *green* is the value

Note!!!

Value should be always be put in double quotation marks, and is separated from the name by “=” sign

Adding Background Image to the Web Page

❑ Add code in the body tag as shown below

```
<!DOCTYPE html>
```

```
<html>
```

```
  <head>
```

```
    <title>MY First Page</title>
```

```
  </head>
```

```
  <body background="bgimage.jpg">
```

```
    <h1>My First Heading</h1>
```

```
    <p>My first paragraph.</p>
```

```
  </body>
```

```
</html>
```

Formatting TEXT on the Web

❑ Add code in the body tag as shown below

```
<!DOCTYPE html>
```

```
<html>
```

```
  <head>
```

```
    <title>MY First Page</title>
```

```
  </head>
```

```
  <body bgcolor="green" background="bgimage.jpg">
```

```
    <h1>My First Heading</h1>
```

```
    <p><b>My first paragraph.</b></p>
```

```
  </body>
```

```
</html>
```

Text formatting elements

- ☐ Heading
- ☐ Horizontal rule
- ☐ Paragraph
- ☐ Line break
- ☐ Preformatted text
- ☐ HTML formatting elements
- ☐ HTML comment
- ☐ Character entities
- ☐ HTML Quotation

HTML Headings

- ❑ Defines the format & structure a document
- ❑ Used to highlight important topics in the document
- ❑ Provides six heading tags: `<h1>`, `<h2>`, `<h3>` `<h4>`, `<h5>`, `<h6>` tags
- ❑ Tags are in pair with an opening and closing tag
- ❑ Text within these text are displayed differently depending on the heading number
- ❑ Headings get their own line by starting from a new line
- ❑ *Note:*
*Do not use heading for making text **BOLD** or **BIG***

HTML Horizontal Rules

- ☐ To separate content paragraph or sections on a web page
- ☐ Creates a horizontal rule/line on a web page
- ☐ Uses `<hr>` tag
- ☐ Web browser starts a horizontal rule from a new line and any text that follows this tag is also followed in a new line

HTML Paragraph

- ❑ Create a paragraph on web page using `<p>` tag
- ❑ Tags are in pair as opening `<p>` and closing `</p>` tag
- ❑ Breaking the page into paragraphs provides an easy way of formatting the text.

HTML Line break

- ❑ `
` elements defines a line break
- ❑ Used when you want a line break or new line without creating a paragraph.
- ❑ Most of the browser allows you to use multiple to push text down several lines

Notes:

*Avoid using `
` element to position text*

HTML Preformatted text

- ❑ Used when you want your text to follow exact format of what is written in a HTML document
- ❑ `<pre>` tag defines preformatted text
- ❑ Any text between opening and closing tag preserves the format of the source document
- ❑ Used to display tabular data without the use of table & to represent computer source code
- ❑ Use spaces instead of tab

HTML Formatting element

Defines special element for defining text with special meaning

Formatting elements were designed to display special **types of text**:

- ☐ Bold text
- ☐ Important text
- ☐ Italic text
- ☐ Emphasized text
- ☐ Marked text
- ☐ Small text
- ☐ Deleted text
- ☐ Inserted text
- ☐ Subscripts
- ☐ Superscripts

Bold & Strong Formatting

- ❑ `` element defines **bold text** without any importance
- ❑ `` element defines **strong text**, with added semantic "strong" importance.

Italic & Emphasized Formatting

- ❑ `<i>` element defines **italic text** without any importance
- ❑ `` element defines **emphasized** text, with added semantic importance.

Small & Marked Formatting

- ❑ `<small>` element defines text small
- ❑ `<mark>` element defines marked or highlighted text

Deleted & Inserted Formatting

- ❑ `` element defines deleted(removed) text
- ❑ `<ins>` element defines inserted(added) text

Subscript & Superscript Formatting

- ❑ `<sub>` element defines subscript text
- ❑ `<sup>` element defines superscript text

E.g. `₂3`

2_3

`²3`

2^3

HTML Comments

- ☐ add comments using following syntax
- ☐ `<!--Type your comment here-->`
- ☐ Comments are not displayed by the web browser
- ☐ Helps to document your HTML
- ☐ You add reminder and notification
- ☐ Great for debugging, more lines can be commented out at a time

Character Entities

- ☐ Some character are reserved in HTML eg. “<”, “>” etc
- ☐ We cannot use them as a regular character
- ☐ If you want to display in your browser, they must be replaced with character entities
- ☐ Character entity has three parts
 - ☐ Ampersand &
 - ☐ An entity name or #
 - ☐ A semicolon (;)

Commonly used Character Entities:

Entity Name	Description	Result
 	Non-breaking space	
<	Less than	<
>	Greater than	>
&	Ampersand	&
"	Quotation mark	"
¡	Inverted exclamation mark	!

HTML Quotation

- ❑ `<blockquote>` element is used for long and multiline quote
- ❑ `<q>` is used for shorter quotations on the web page

Thank you