

HTML

Chapter # 0

HTML::

HTML stands for Hyper Text Markup Language.

It is standard standard language used to create and design web pages.

Key points:

- **Hyper Text:** Refers to link that connect web pages to one another.
- **Markup language:** Uses tags to define elements within a web page (e.g., headings, paragraphs, images).

Relation with CSS and J-S:

A great real-world analogy to understand the relationship between HTML, CSS and JavaScript is:

Car Analogy:

HTML: The basic structure of Car - eg: door, body etc

CSS: The paint, design, seat covers etc of the car. In simple beauty of car.

Java-Script: The engine system of car.

Installing VS-Code:

This part is well defined in the video so don't worry.

HTML

Chapter # 1

Syntax:-

The basic syntax or page structure of a HTML web page is given below:

HTML 5 doc

`<!DOCTYPE html>` → Specifies this is an

`<html>` → root of an HTML Page

`<head>` → Contains page metadata

`<title> My First web page </title>`

`</head>` → closing tag

`<body>` → The main part of web page


`<h1> welcome to my Website </h1>`


`<p> This is my first Paragraph </p>`


`</body>` → closing tag

`</html>` → closing tag.

A tag is like a container for either content or other HTML tags.


HTML
Document

\Rightarrow  \Rightarrow
web
browser


Rendered page

Imp points:

- Head and Body are the childs of HTML tag-
- Most of HTML elements have opening and closing tags with content between
- Some have opening but not closing tags
- Most of elements have contents ~~and~~ but some of them don't have it-
- We can either use .htm or .html extension

HTML element = Start tag + Content + End tag.

Case Sensitivity:

HTML is not case sensitive. It means
`<p>` = `<P>` or `<BoDy>` = `<body>`.

But it is recommended to use small alphabets.

Comments:

Comments are part of any programming language which is ignored by the compiler. For HTML we can say Browser.

`<!-- HTML Comment -->`

HTML

$\langle h_1 \rangle \dots \dots \dots \langle h_n \rangle$
 \downarrow \downarrow
 most important least important

< \h1 > closing

 $\Delta h \cdot b$

$\angle hbs$

Paragraph: The `<p>` `<\p>` tag used to define the basic paragraph in HTML.

<p>

I am a paragraph

</p>

Anchor tag:

The <a> tag used to define the anchor tag in HTML.

They are also called as hyper links.

Basic syntax:

 link Text

don't worry the well detailed lecture on anchor is waiting for you.

Bold tag:

The tag is used to Bold the text in HTML.

 Now I am Bold .

Italic tag:-

The tag `<i>` `</i>` is used to define the italic tag in HTML-

`<i>` I am Italic `</i>`

Underline tag:-

The `<u>` `</u>` tag is used to define the underline tag in HTML-

It is used to underline the text.

`<u>` I am text `</u>`

Horizontal ~~to~~ Rule line:-

The `<hr>` tag is used to insert a horizontal line (or horizontal rule) in your web page.

It is often used to separate sections of content.

Preformatted Text:

The ~~<pre>~~^{<pre>} tag is used to define the preformatted text.

`<pre>`

This is

a

pre

text how

are

you

`</pre>`

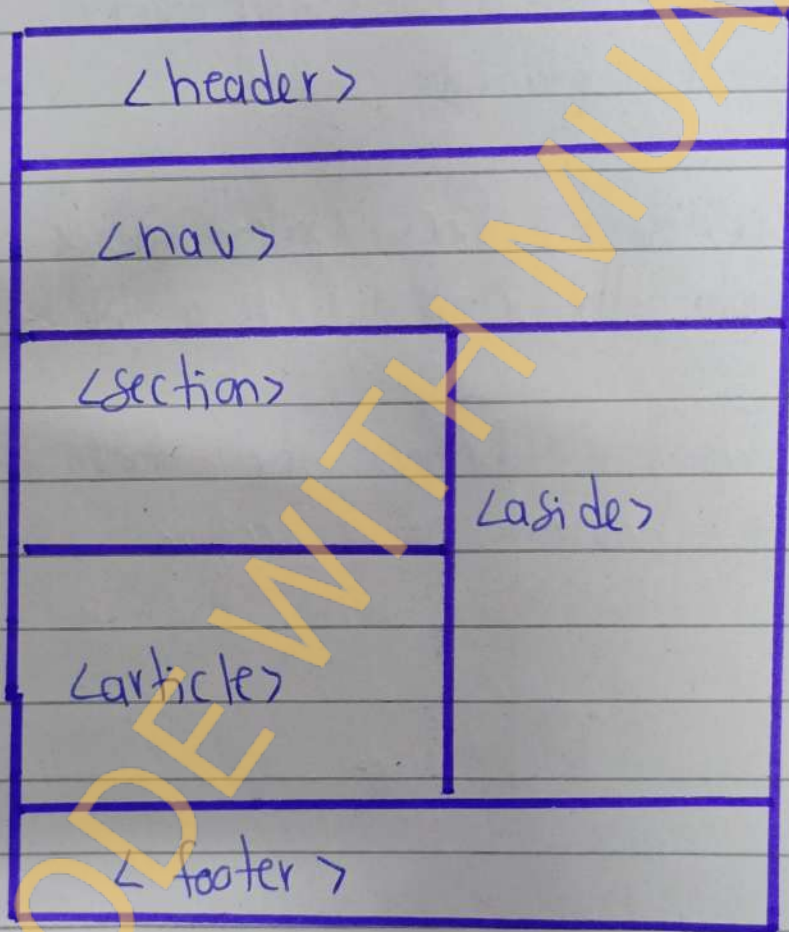
In simple words:

Display as written.

HTML

Chapter # 3

Page layout



`<header>` - Defines the header of the document or a section

<nav> - Defines a set of navigation links.

<section> - Defines a section in a document

<article> - Defines independent, self-contained content.

<aside> Defines content aside from the content (like a side bar)

<footer> Defines the footer for a document or a section.

Chapter # 4

Lists in HTML:

There are three types of lists in HTML.

- Ordered List
- Unordered list
- Description list.

• Ordered List:

The `` `` tags are used to define the ordered list.

eg:

`` → list item

` HTML `

` CSS `

` Java Script `

``

Output:

1. HTML

2. CSS

3. Java Script

• Unordered list:

The `ul` `` tags are used to define the unordered lists.

It is also called as bulleted list.

```
<ul>
```

```
<li> Apple </li>
```

```
<li> Banana </li>
```

```
<li> Mango </li>
```

```
</ul>
```

output:

- Apple
- Banana
- Mango

• Description list:

The `dl` `</dl>` tags are used to define the description list in the HTML.

Note:-

`<dl>` — description list.

`<dt>` — description term

`<dd>` — description details-

`<dl>`

`<dt>` HTML `</dt>`

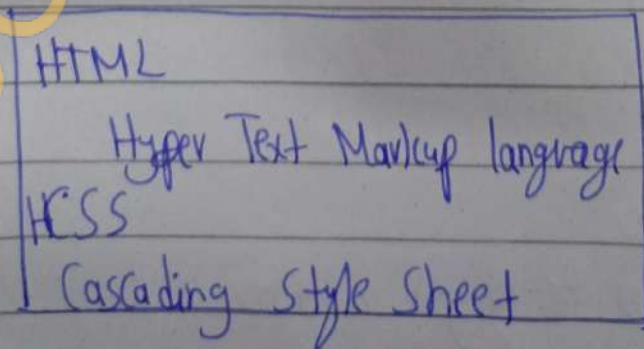
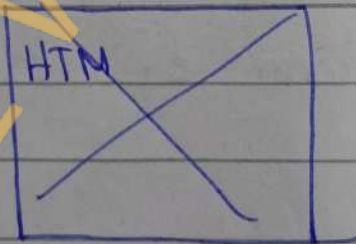
`<dd>` Hyper Text Markup Language `</dd>`

`<dt>` CSS `</dt>`

`<dd>` Cascading Style Sheet `</dd>`

`<dl>`

Output:-



Chapter # 5

~~Table~~

Table + Form

Table

In HTML `<table>` and `</table>` tags are used to define the table.

It is used to create a table which can show the data in the form of row and columns.

Syntax

```
<table>
```

```
<tr>
```

```
<th> Heading 1 </th>
```

```
<th> Heading 2 </th>
```

```
<tr>
```



```
<tr>
<td> Data 1 </td>
<td> Data 2 </td> </tr>
</table>
```

Here:

<tr> = table row
<th> = table header (bold, centered by default)
<td> = table data cell

Result:

Heading 1	Heading 2
Data 1	Data 2

Form: The `<form>` `</form>` tags are used to define the form in HTML.

```
<form>
<!-- Element of the form -->
</form>
```

There are different kind of
user inputs in forms.

This topic is well defined
in video- **# 5**

Chapter # 6

Media in HTML

Video:

The `<video>` and `</video>` tags are used to play or add video in HTML.

`<video src=""> </video>`
↓

to play video add controls here.

`<video src="" controls> </video>`
↓

With this some basic controls will add in the video.

Some are given below:

autoplay
muted
loop

poster
Thumbnail

Audio:-

The `<audio>` `</audio>` tags are used to define the audio in HTML.

Basic syntax:-

`<audio src="" > </audio>`
↓

Same concept of controls as in video.

Image:-

The `` tag is used to define the image in HTML webpage.

Syntax:-

``
↓

if image is not shown then this word is used to show.

Chapter # 7

anchor tag

Anchor tag is not a complex concept but it is a very important concept in HTML -

basic-syntax:

```
<a href="URL">Link Text</a>
```

We can use

Image

Button

Text

as anchor tag -

advance-syntax:

```
<a href="URL" target="_value">  
link text </a>
```

Common target values:

- **self** (default) open link in same tab/window

- **blank** open link in a new tab/window

- **parent** opens the link in the parent frame

- **top** opens the link in the full body of the window - breaking out of all frames

Chapter # 8

<SEO>

SEO stands for Search Engine Optimization

In HTML SEO refers to writing your code and content in a way that helps search engines like Google to understand and rank your website higher in search results

Why SEO is Important:

Because it helps people to find your website when they search for something related to your content.