HTML NOTES

Practical Implementation:
https://github.com/shwetathikekar/HTML

What is HTML? (Hyper Text Markup Language)

HTML is the language of the web. We can say markup language which is used to create websites. We use HTML tags to define the structure of a website. With the understanding of tags we can build websites.
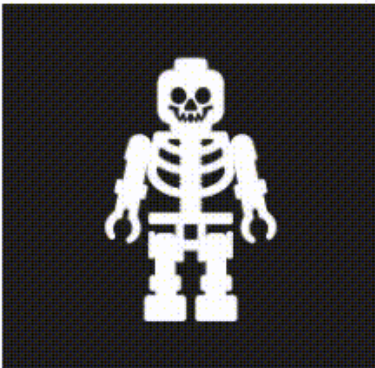
Why do we need CSS and JavaScript?

HTML: Page Structure or we can say just define the layout of page

CSS: Used to add styling to that structure which we create in HTML.

JavaScript: Simply we can saye make our website responsive. For e.g what happens when we hover on a text, to hide and to show elements so on and so forth.

HTML
structure

CSS
presentation/appearance

JavaScript
dynamism/action

Basic body of HTML
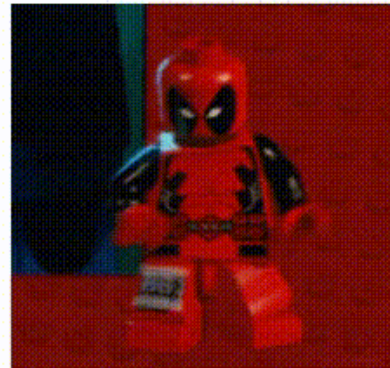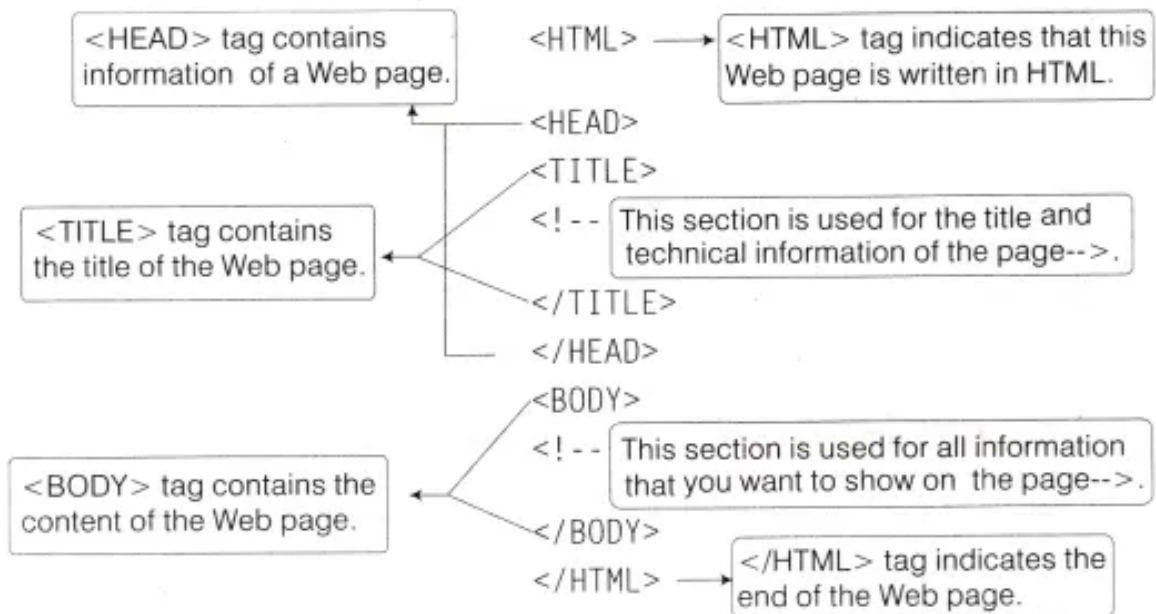
```
<!doctype html>
<html>
  <head>
      <title>Document Title</title>
      <link rel= "stylesheet" type= "text/css" href= "styles.css">
      <script>Scripts of the page if any</script>
      <style>Document Title</style>
  </head>

  <body>
      Document Body contains all the content of the page.
      <script>Scripts can also be added at the end of all the content in body tag</script>
  </body>
</html>
```

<HEAD> tag contains information of a Web page.

<HTML> ⟶ <HTML> tag indicates that this Web page is written in HTML.

<HEAD>

<TITLE>

<!-- This section is used for the title and technical information of the page-->.

<TITLE> tag contains the title of the Web page.

</TITLE>

</HEAD>

<BODY>

<!-- This section is used for all information that you want to show on the page-->.

<BODY> tag contains the content of the Web page.

</BODY>

</HTML> ⟶ </HTML> tag indicates the end of the Web page.

- Head and Body tags are children of HTML Tag.
- Most of the element have opening and closing tag with content in between opening and closing tags
- Some HTML tags have no content. There are called empty element eg.
- We can use either .htm or .html extension[most common]
- You can use inspect element or view page source option from chrome to look into a website's HTML code.

HTML Element = Start Tag + Content + End Tag

Comment in HTML: <!--Comments→

HTML is not Case Sensitive: <H1> and <h1> tags are same

HTML Elements

[Combinations of tag and contents]

<body>
----- Contents----
</body>

HTML Attributes

Used to add more information corresponding to the HTML tag.

Example:

GOOGLE

We can either use single or double quotes in attributes.

Heading tags:

Used to mark heading in HTML. <h1> --<h6> headings are available. Used only for heading

Paragraph Tag:

Used to add paragraph <p> </p>

Anchor Tag:

Used to add links to an existing content of the HTML.

Example:

GOOGLE

[redirect to website]

Img tag:

Img tag is used to add images

Example:

<img src="image.jpg"> [url of image]

Bold, Italic and Underline:

Tags:

BOLD

<i>italic</i>

<u>underline</u>

br and hr:

br : Break the line

hr : Create horizontal line

Big and Small tag:

Used to make the text a bit larger and a bit smaller

Subscript and superscript:

<sub>Add subscript in HTML</sub>

<sup>Add superscript in HTML</sup>

Pre tag:

HTML always ignores extra space and newlines. In order to display a piece of text as its. That's why we used pre tag

<!-- Render as its -->

<pre>

This is written

Using pre

Tag

</pre>

Creating Page Layout

When we use the right tag in the right place, it results in a better page layout, better indexing by search engines and better user experience.

We use the following tag to get the job done.

Website Layout:

<header> [Contain nav Tag]
<main>
<footer>

Inside the main tag we insert the following tags:

<main> The main opening tag

<section> A page section

<article> A self contained content

<aside> Content aside from the content (e.g Ads)

<main> The main closing tag

Creating a page like this is not necessary but it creates a readable and structural layout.Also they are useful for SEO

GOOGLE
[Open the google site in same page]

<a href="https://google.com"
target="_blank">GOOGLE
[Open the google site in another page (also work _main)]

We can put any content inside an anchor tag(images, heading etc are all allowed)

If the page is inside a directory, we need to make sure that we link to the correct page.

We can add links to images like this:
<img src="image.jpg" width="100px">

[height set automatically(aspect ratio)]

Div tag:
   Div tag is often used as a container for other elements div is a block level element. [Always takes full width]

Span tag:

Span is an inline container [Take as much width as necessary]

Lists: List are used to display content which represents list

Unordered List:

Used to list unordered items

Ordered List:

Used to list ordered items

Tables:

The <table> tag is used to define tables in HTML. It is used to format and display tabular data.

<tr> tag : used to display table row

<td> tag: used to display table data

<th> tag: used to place table data for displaying table headers.

We can define as many table rows as we want.

To add a caption to a table, we used **<caption>** inside the table.

\<thead\> tag: used to wrap table head (tr and th)
\<tbody\> tag: used to wrap the table body(tr and td)

Colspan attribute

This attribute is used to create cells spanning multiple columns

E.g \<th colspan="3"\>amount\</th\>

rowspan attribute

This attribute is used to create cells spanning multiple rows.

E.g \<td rowspan="3"\>$100\</td\>

HTML forms

HTML form is used to collect input from the user form tag for the same.

\<form\>
    --Element of the form--
\</form\>

There are different form elements for different kind of user input (practical:)

NOTE: You don't have to remember all the tags, you will automatically memories them with practise

Embedding Video:
    <Video> tag is used to play video in HTML

We will focus only on the HTML standpoint of SEO. We will not be looking into keyword building and content optimization aspect of SEO

Type of SEO
- On Page SEO
- Off page SEO

HTML SEO
    HTML developer can implement SEO using the following techniques:
- Set the title very and to the point
- Set the meta description
- Set a nice URL slugs
- Set the meta keywords tag [Not recommended]
- Set the meta author tag

- Set the favicon
- Compress images and other media/resources
- Remove unused HTML/CSS/JS files + Compress them.
- Add alt attribute to the images.

Video References

▶ HTML Tutorial For Beginners In Hindi (W…

▶ HTML Tutorial - How to Make a Super Si…

▶ HTML Crash Course For Absolute Beginners