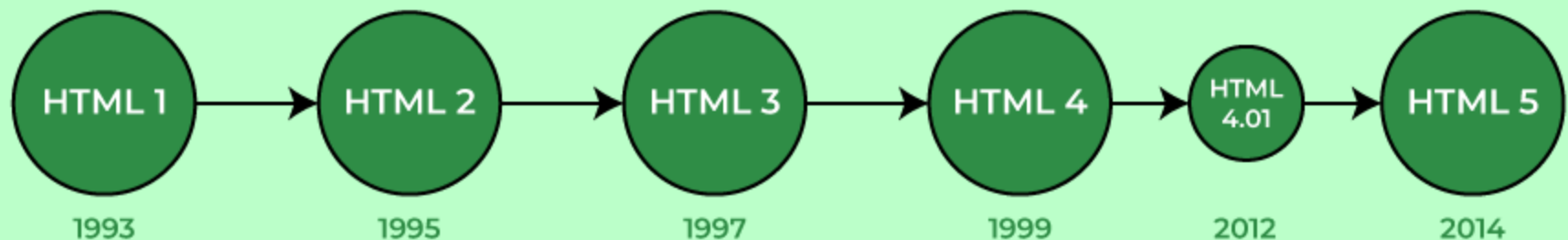


# Introduction to HTML

**HTML** stands for HyperText Markup Language. It is used to design web pages using a markup language. HTML is the combination of Hypertext and Markup language. Hypertext defines the link between web pages. A markup language is used to define the text document within the tag which defines the structure of web pages. This language is used to annotate (make notes for the computer) text so that a machine can understand it and manipulate text accordingly. Most markup languages (e.g. HTML) are human-readable. The language uses tags to define what manipulation has to be done on the text.

HTML is a markup language used by the browser to manipulate text, images, and other content, in order to display it in the required format. HTML was created by Tim Berners-Lee in 1991. The first-ever version of HTML was HTML 1.0, but the first standard version was HTML 2.0, published in 1995.

## HTML Released Year



## **Features of HTML:**

- It is easy to learn and easy to use.
- It is platform-independent.
- Images, videos, and audio can be added to a web page.
- Hypertext can be added to the text.
- It is a markup language.

## **Advantages:**

- HTML is used to build websites.
- It is supported by all browsers.
- It can be integrated with other languages like CSS, JavaScript, etc.

## **Disadvantages:**

- HTML can only create static web pages. For dynamic web pages, other languages have to be used.
- A large amount of code has to be written to create a simple web page.
- The security feature is not good.

# Tags vs Elements vs Attributes in HTML

**HTML Tags:** HTML Tags are building blocks of HTML Page. Tags are the starting and ending parts of an HTML element. They begin with < symbol and end with > symbol. Whatever written inside < and > are called tags.

## Syntax

Opening tag: <TagName>

Closing tag: </TagName>

## Example:

```
<b>    </b>
```

**HTML elements:** Elements enclose the contents in between the tags. HTML Elements are components of the web page. They consist of some kind of structure or expression. It generally consists of a start tag, content and an end tag.

## Example:

```
<b>This is the content.</b>
```

**HTML Attributes:** It is used to define the character of an HTML element. It always placed in the opening tag of an element. It generally provides additional styling (attribute) to the element.

## Example:

```
<p align="center">This is paragraph.</p>
```

# Examples of HTML Tags

Tag	Description
html	Defines the root of the HTML Document
head	All the metadata for the HTML document, and CSS are defined in the Head tag
body	It defines the body of an HTML document. All Contents of HTML content is contained in the body tag.
p	It represents paragraphs in HTML Document.
div	It helps the user to create div or blocks for their HTML Element.
table	It helps the user to create a table for the HTML Page.
img	It is an example of a single HTML Tag. It helps the user to insert images on the HTML page.
br	Another Example of a single HTML Tag. It helps the user insert line breaks on the HTML page.

# Examples of HTML Elements

`<p> This is an HTML Element </p>`

## Empty HTML Elements

`<hr/>`

`<br/>`

## Nested HTML Elements

`<!DOCTYPE html>`

`<html>`

`<head>`

`<title>Nested Elements Example</title>`

`</head>`

`<body>`

`<h1>This is <i>italic</i> heading</h1>`

`<p>This is <u>underlined</u> paragraph</p>`

`</body>`

`</html>`

## **TML Tags**

HTML tags are used to hold the HTML element.

HTML tag starts with < and ends with >

HTML tags are almost like keywords where every single tag has unique meaning.

## **HTML Elements**

HTML element holds the content.

Whatever written within a HTML tag are HTML elements.

HTML elements specifies the general content.

## **HTML Attributes**

HTML attributes are used to describe the characteristic of an HTML element in detail.

HTML attributes are found only in the starting tag.

HTML attributes specify various additional properties to the existing HTML element.

# Conclusions

- HTML Tags are building blocks of HTML Page.
- HTML Elements are components that are used in HTML Page.
- HTML Tags usually exist in pairs consisting of a starting and an ending tag. However, some tags do not have a closing tag.
- HTML Elements contain a starting tag, content, and an ending tag. If there is no content in an HTML Element, it is called an Empty HTML Element.
- HTML Elements can be nested. There can be an HTML element with another HTML Element as its content.



## HTML DOCUMENTS STRUCTURE

Html used predefined tags and attributes to tell the browser how to display content, means in which format, style, font size, and images to display. Html is a case insensitive language. **Case insensitive** means there is no difference in upper case and lower case (capital and small letters) both treated as the same, for r example 'D' and 'd' both are the same here.

There are generally two types of tags in HTML:

**Paired Tags:** These tags come in pairs. That is they have both opening(< >) and closing(</ >) tags.

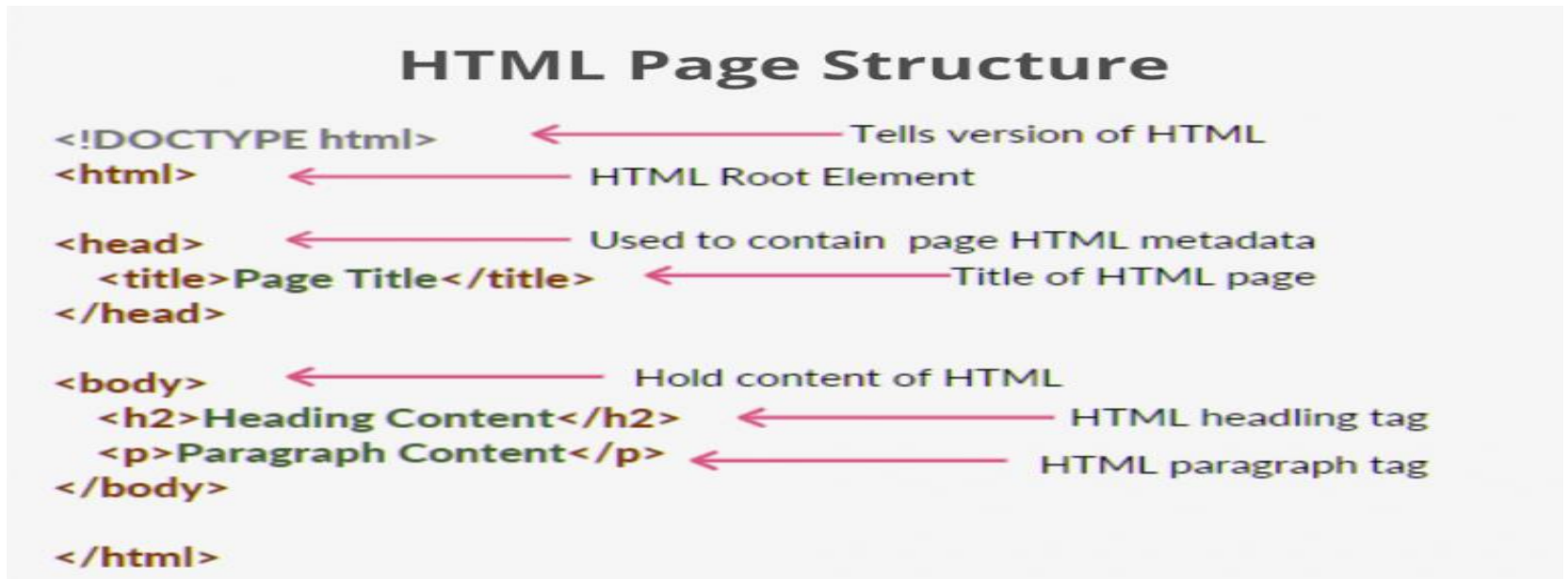
**Empty Tags:** These tags do not require to be closed.

Below is an example of a (<b>) tag in HTML, which tells the browser to bold the text inside it.



# HTML Document Structure Tags

The basic structure of an HTML page is laid out below. It contains the essential building-block elements (i.e. doctype declaration, HTML, head, title, and body elements) upon which all web pages are created.



## Structure of an HTML Document

An HTML Document is mainly divided into two parts:

**HEAD:** This contains the information about the HTML document. For Example, the Title of the page, version of HTML, Meta Data, etc.

**BODY:** This contains everything you want to display on the Web Page.

<!DOCTYPE html>: This is the document type declaration (not technically a tag). It declares a document as being an HTML document Or This is a declaration to show the document type; it helps the web browser to display the webpage correctly The doctype declaration is not case-sensitive.

<html>: This is called the HTML root element. All other elements are contained within it. This shows the start and end of the HTML file. It's a biggest and main element in complete html language, all the tags , elements and attributes enclosed in it or we can say wrap init , which is used to structure a web page. <html> tag is parent tag of <head> and <body> tag , other tags enclosed within <head > and <body>.

<head>: The head tag contains the “behind the scenes” elements for a webpage. Elements within the head aren't visible on the front-end of a webpage. This gives information about the file.

<title>: This defines the title of the webpage, to be displayed on the tab of a web browser.

<body>: The body tag is used to enclose all the visible content of a webpage or A body tag is used to enclose all the data which a web page has from texts to links. In other words, the body content is what the browser will show on the front-end.

All the content that you see rendered in the browser is contained within this element. Following tags and elements used in the body.

- 1 . <h1> ,<h2> ,<h3> to <h6>
2. <p>
3. <div> and <span>
4. <b>, <i> and <u>
5. <li>,<ul>and<ol>.
6. <img> , <audio> , <video> and<iframe>
7. <table> <th> , <thead>and<tr>.
8. <form>
9. <label> and <input> others.....

<p>: This defines a paragraph.

## Example:

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

# HTML File Save

Filename.html