

HTML and CSS

HTML

Hypertext Markup Language (HTML) is the primary language of the web. All web pages are written in HTML. HTML was developed in 1991 by Tim Berners-Lee. When it was designed, HTML was envisioned as a document format for researchers to exchange documents. Today, HTML has been repurposed to build all sorts of content on the Internet, including dynamic web applications.

A HTML document is a raw text document that contains tags like `<p></p>`. Tags tells the browser how to display the element, and what kind of element it is.

Some common tags:

- `<h1></h1>` through `<h6></h6>`: Header elements. `<h1></h1>` is the largest header, and `<h6></h6>` is the smallest header.
- `<p></p>`: Returns the node's first child in the tree, or null if the node is childless.
- ``: Strongly emphasized text, usually rendered as bold.
- ``: Emphasized text, usually rendered as italics.
- ``: Unordered (bullet) list.
- ``: Ordered (numbered) list.
- ``: List item, used within an enclosing list element.
- ``: Anchor (hyperlink) element. The link target is specified by the `href` attribute.
- `<div></div>`: Block enclosing element.
- ``: Inline enclosing element.
- `<form action="" method=""></form>`: Form element.
- `<input type=""></input>`: Form input element. The type can be one of text, password, radio, checkbox, or submit.

There are also other tags that allow you to embed other resources:

- ``: Embeds an image.
- `<script src=""></script>`: Embeds or links JavaScript code. This tag can contain inline code, or it can specify a URL of a linked script by the with the `src` element.
- `<style></style>`: Embeds CSS code. This should be used in the `<head>` portion of the document.

Most browsers ship with a tool that allows you to analyze the structure of a HTML document. In Chrome and Firefox, you can access the tool by right-clicking on the page and clicking Inspect Element. This displays a pane containing the parsed HTML source. You can then hover your mouse over elements in the source to see the corresponding rendered elements in the page.

There are a number of different versions of HTML, which differ in the elements that are allowed, and in their structure. This web page uses HTML 5. The standard document structure of a HTML 5 document is shown below.

```
<!DOCTYPE html>
<html lang="en">
<head>
<meta charset="utf-8" />
  <title>Hello world!</title>
</head>
<body>
  <h1>Hi</h1>
  <p>Hello world!</p>
</body>
</html>
```

The title of the page goes in the `<title>` element. The displayed content of the page goes within the `<body>` section. Most of the elements discussed above go within the `<body>` section, with the exception of the `<style>` and `<link>` elements, which should go in the `<head>` section.