

WHERE JAVASCRIPT?

JavaScript in <head> or <body>

You can place any number of scripts in an HTML document.

Scripts can be placed in the `<body>`, or in the `<head>` section of an HTML page, or in both.

JavaScript in <head>

In this example, a JavaScript `function` is placed in the `<head>` section of an HTML page.

The function is invoked (called) when a button is clicked:

```
JavaProgram_01_JSWhereTo > < jswhereTo_head.html > html > head > script > HeadTagCall
1  <!DOCTYPE html>
2  <html lang="en">
3  <head>
4      <meta charset="UTF-8">
5      <meta name="viewport" content="width=device-width, initial-scale=1.0">
6      <title>JS WHERE TO - HEAD TAG</title>
7      <script>
8          function HeadTagCall(){
9              document.getElementById("pbtn1").innerHTML = "Hi!.. I have been called from Head Tag";
10         }
11     </script>
12 </head>
13 <body>
14     <button id="btn1" onclick="HeadTagCall()">Click Me!..</button>
15     <p id="pbtn1"></p>
16 </body>
17 </html>
```

JavaScript in <body>

In this example, a JavaScript `function` is placed in the `<body>` section of an HTML page.

The function is invoked (called) when a button is clicked:

Placing scripts at the bottom of the `<body>` element improves the display speed, because script interpretation slows down the display.

```
JavaProgram_01_JSWhereTo > < jswhereTo_body.html > html > body > script > HeadTagCall
1  <!DOCTYPE html>
2  <html lang="en">
3  <head>
4      <meta charset="UTF-8">
5      <meta name="viewport" content="width=device-width, initial-scale=1.0">
6      <title>JS WHERE TO - BODY TAG</title>
7  </head>
8  <body>
9      <button id="btn1" onclick="HeadTagCall()">Click Me!..</button>
10     <p id="pbtn1"></p>
11     <script>
12         function HeadTagCall(){
13             document.getElementById("pbtn1").innerHTML = "Hi!.. I have been called from Body Tag";
14         }
15     </script>
16 </body>
17 </html>
```

External JavaScript

Scripts can also be placed in external files:

External file: myScript.js

```
function myFunction() {  
  document.getElementById("demo").innerHTML = "Paragraph changed.";  
}
```

External scripts are practical when the same code is used in many different web pages.

JavaScript files have the file extension **.js**.

To use an external script, put the name of the script file in the **src** (source) attribute of a **<script>** tag:

Example

```
<script src="myScript.js"></script>
```

[Try it Yourself »](#)

You can place an external script reference in **<head>** or **<body>** as you like.

The script will behave as if it was located exactly where the **<script>** tag is located.

External scripts cannot contain **<script>** tags.

External JavaScript Advantages

Placing scripts in external files has some advantages:

- It separates HTML and code
- It makes HTML and JavaScript easier to read and maintain
- Cached JavaScript files can speed up page loads

To add several script files to one page - use several script tags:

Example

```
<script src="myScript1.js"></script>  
<script src="myScript2.js"></script>
```

```
<!DOCTYPE html>  
<html lang="en">  
<head>  
  <meta charset="UTF-8">  
  <meta name="viewport" content="width=device-width, initial-scale=1.0">  
  <title>JS WHERE TO - EXTERNAL LINK</title>  
  <script src="../../JavaProgram_01_JSWhereTo/jswhereTo.js"></script>  
</head>  
<body>  
  <button id="btn1" onclick="HeadTagCall()">Click Me!..</button>  
  <p id="pbtn1"></p>  
</body>  
</html>
```

```
JS jswhereTo.js × <> jswhereTo_externalLink.html  
JavaProgram_01_JSWhereTo > JS jswhereTo.js > HeadTagCall  
1 function HeadTagCall() {  
2   document.getElementById("pbtn1").innerHTML = "Hi!.. I am External Tag!..";  
3 }
```