



# HTML

Hypertext Markup Language



# HTML

## Fundamentals

- › What is HTML?
- › How to create HTML page

# HTML





# What is HTML?

**HTML**



**JAVASCRIPT**



**CSS**





# What is HTML?



**H**yper **T**ext **M**arkup **L**anguage

HTML is the standard **markup language** for Web pages.



# What is HTML?

<tag>

- HTML commands are called **tags**.
- Tags are written between angle brackets.  
*Example: <html> <b> <u> <p>*
- With exceptions, tags have beginnings and endings. End tags are indicated by the "/" sign.  
*Example: <b>Hello</b> <p>How are you</p>*
- Exceptions are <img>, <br> and <hr>.



# How to Create HTML Page

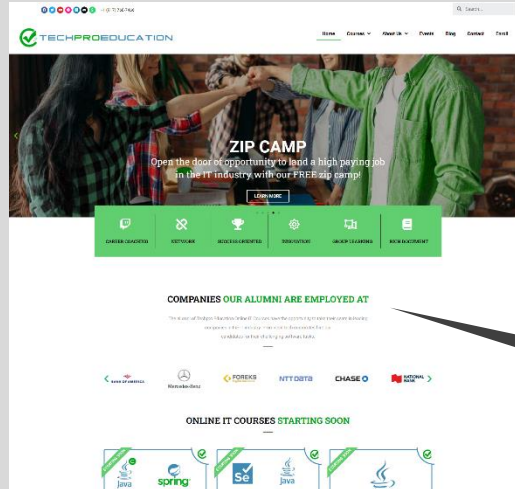
.html  
extension file

**<html>**

**<head>**

**</head>**

**<body>**



**</body>**

**</html>**

Everything is  
contained between  
**html** expressions

Preliminary  
information and  
settings about the  
page are located in  
the **head**.

Everything the visitor  
sees is in the **body**.



# How to Create HTML Page

# <title>

It is contained within the head tag and specifies the **text to be displayed** in the browser's **title bar**.



# How to Create HTML Page

## Basic code template of a web page

Tag

```
<html>
```

```
<head>
```

```
<title>My First Page</title>
```

```
</head>
```

```
<body>
```

```
    Hello, this is my first page.
```

```
</body>
```

```
</html>
```

Element

- Parent
- Child





# Basic Formatting Tags

## White Spaces

Browsers treat consecutive space characters in HTML codes as a single character. In addition, they do not treat the enter (going to the bottom line) character at all. In this way, developers can write their code in a more readable way.



# Basic Formatting Tags

`<p>`

paragraph

The `<p>` tag defines a paragraph.

**`<p>`** Lorem Ipsum is simply dummy text of the printing and typesetting industry. Lorem Ipsum has been the industry's standard dummy text ever since the 1500s, when an unknown printer took a galley of type and scrambled it to make a type specimen book **`</p>`**

`<br>`

break

The `<br>` tag inserts a single line break.

`<p>` Lorem Ipsum is simply dummy text of the printing and typesetting industry. **`<br>`** Lorem Ipsum has been the industry's standard dummy text ever since the 1500s, when an unknown printer took a galley of type and scrambled it to make a type specimen book `</p>`



# Basic Formatting Tags

**<hx>**

heading

**<h1>**

**<h2>**

**<h3>**

**<h4>**

**<h5>**

**<h6>**

HTML headings are titles or subtitles that you want to display on a webpage .

HTML headings are defined with the **<h1>** to **<h6>** tags.

**<h1>**Heading 1**</h1>**

**<h2>**Heading 2**</h2>**



# Use Of Head Tags

```
<h1>What is Lorem Ipsum?</h1>
```

```
<p>Lorem Ipsum is simply dummy text of the printing and typesetting industry.</p>
```

```
<h2>Where does it come from?</h2>
```

```
<p>Contrary to popular belief, Lorem Ipsum is not simply random text. It has roots in a piece of classical Latin literature from 45 BC, making it over 2000 years old.</p>
```

```
<h2>Why do we use it?</h2>
```

```
<p>It is a long established fact that a reader will be distracted by the readable content of a page when looking at its layout. </p>
```



# Formatting Tags

**<b>**

bold

Defines bold text.

`<b>This text is bold.</b>`

**<em>**

emphasis

Defines emphasized text. The content inside is displayed in italic.

`<em>This text is emphasized.</em>`

**<u>**

underline

Defines misspelled words. The content inside is typically displayed with an underline.

`<p>This is some <u>mispeled</u> text.</p>`



# Nested Tags

**The rule to consider when using nested tags:** The tag that is opened first is closed last.

```
<p>  
  <b>Hello</b>  
  <u>World</u>  
</p>
```



```
<p>  
  <b>Hello  
    <u>World</u>  
  </b>  
</p>
```



```
<p>  
  <b>Hello</b>  
  <u>World</p>  
</u>
```

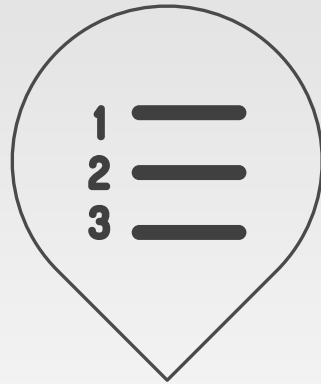


```
<p>  
  <i>Hello  
  <u>world </i>  
  </u>  
</p>
```

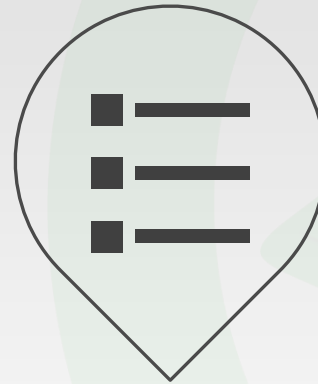




# List Tags



Ordered List



Unordered List



# List Tags

`<ol>`

Ordered list

Defines an ordered list. An ordered list can be numerical or alphabetical.

```
<ol></ol>
```

`<li>`

List item

Defines each list item.

```
<ol>
```

```
  <li>Family</li>
```

```
  <li>Home</li>
```

```
  <li>Work</li>
```

```
</ol>
```





# List Tags

`<ul>`

Unordered list

Defines an unordered list  
list .

```
<ul></ul>
```

`<li>`

List item

```
<ul>
```

```
  <li>Family</li>
```

```
  <li>Home</li>
```

```
  <li>Work</li>
```

```
</ul>
```



# List Tags

## How to create nested list

```
<ol>
  <li>Turkey
    <ul>
      <li>Istanbul</li>
      <li>Ankara</li>
      <li>Izmir</li>
    </ul>
  </li>
  <li>Germany
    <ul>
      <li>Berlin</li>
      <li>Hamburg</li>
    </ul>
  <li>
</ol>
```



# List Tags

## Changing List Type

```
<ol type="1 | A | a | I | i">  
  <li>Istanbul</li>  
  <li>Ankara</li>  
  <li>Izmir</li>  
</ol>
```

```
<ul type="disc | square | circle">  
  <li>Istanbul</li>  
  <li>Ankara</li>  
  <li>Izmir</li>  
</ul>
```

**attribute**

Expressions that are written inside the html tag and add additional features to the html tag



# List Tags

## Changing List Type

```
<ol type="a" start="3">  
  <li>Beşiktaş</li>  
  <li>Fenerbahçe</li>  
  <li>Galatasaray</li>  
</ol>
```



start="3"



# Link Tag

`<a>`

anchor

Used for creating link from a place to another place:

- From page to page,
- To a different site



# Link Tag

`<a>`

anchor

To create link in a page to another page

```
<a href="index.html"> Click</a>
```



index.html



# Link Tag

`<a>`

anchor

To create a link to another site

```
<a href="https://techproeducation.com/">Go to TechPro</a>
```

To open the link in a new tab

```
<a href="https://techproeducation.com/" target="_blank"> Go to TechPro </a>
```



# Adding Image

`<img>`

image

It is done by **<img>** tag. Jpg, png and svg files are recommended.

```

```





# Tables

HTML tables allow web developers to arrange data into rows and columns.

O.N.	Country Name	Population
1	China	<b>1,439,323,776</b>
2	India	<b>1,380,004,385</b>
3	USA	<b>331,002,651</b>
4	Indonesia	<b>273,523,615</b>
5	Pakistan	<b>220,892,340</b>
6	Brazil	<b>212,559,417</b>



# Tables

`<tr>`

Table row

Used for creating **row**

`<td>`

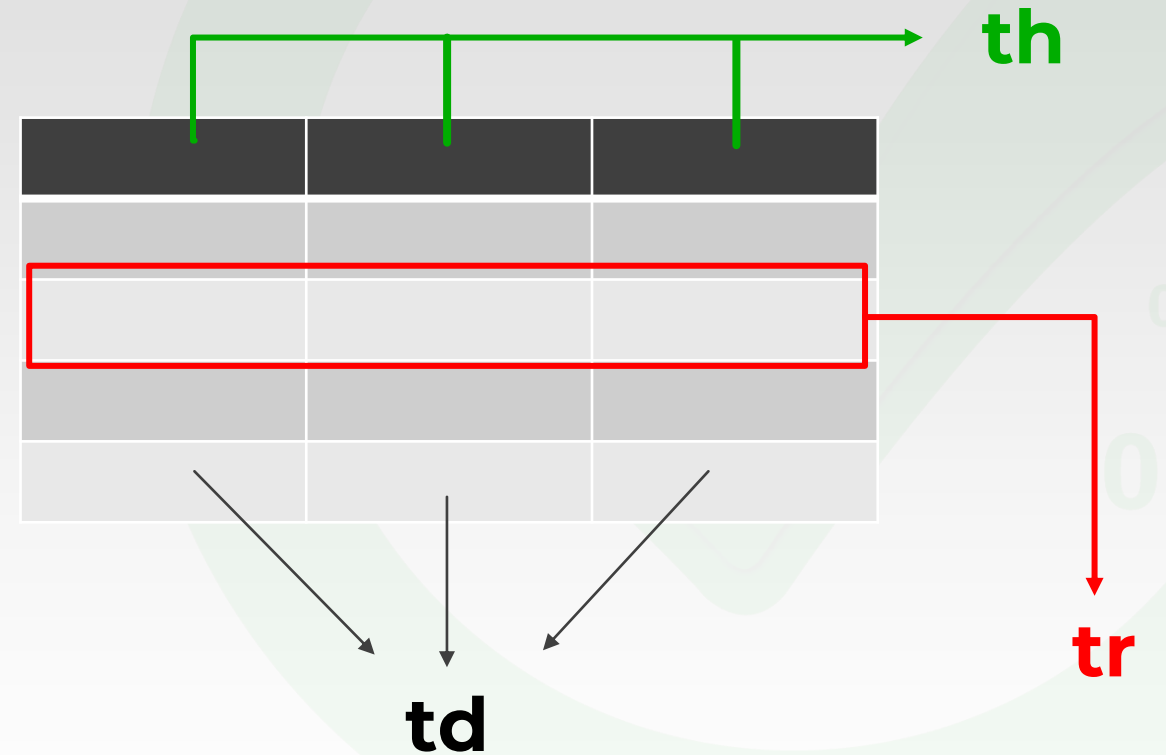
Table data

Used for creating **data cell**

`<th>`

Table head

Used for creating **header cell**





# Tables

```
<table>
  <tr>
    <th>O.N.</th>
    <th>Name</th>
  </tr>
  <tr>
    <td>1</td>
    <td>John Doe</td>
  </tr>
  <tr>
    <td>2</td>
    <td>Mark Twain</td>
  </tr>
</table>
```

O.N.	Name
1	John Doe
2	Mark Twain



**CSS**

Cascading Style Sheet



# What is Css?

## CSS

Cascading Style Sheet (CSS) is a markup language that determines the style properties of HTML elements. To add CSS, style attribute is added to the relevant tag. This is called an inline style.

```
<p style="color: red">Hello</p>
```

Property

Value



# Basic CSS properties

## font-size

Used for **resizing** the text

```
<a href="page1.html" style="font-size:20px">click</a>
```

## font-family

Used for changing the **font** for an element.

```
<div style="font-family:tahoma">Hello</div>
```

## text-align

Used for specifying the horizontal alignment of text in an element.  
Values: left, right, center, justify

```
<div style="text-align:center">Welcome to Our Site</div>
```



# Basic CSS properties

## color

Used for changing the color.  
Values: ( red, green, yellow ...), hexadecimal system (#12AF45), rgb, rgba

```
<p style="color:#1255FA">Hello</p>
```

## background-color

Used for changing the background color.  
Values are same with color.

```
<p style="background-color:#1255FA">Hello</p>
```



# Style tag (internal)

```
<html>
<head>
  <style>
    p{
      color: red;
      text-align: center;
    }
  </style>
</head>
<body>
  <p>Hello</p>
</body>
</html>
```

- **<style>** tag is used for declaring a style for a whole page.
- **<style>** tag is used inside the **<head>** tag.





# Selectors



1

To select all html elements, we use '\*'.

```
* {  
  text-align: center;  
  color: blue;  
}
```



# Selectors



2

To select a specific html element, the name of element is used as selector.

```
h1 {  
  text-align: right;  
  font-weight: 300;  
}
```



# Selectors



3

The *.class* selector selects elements with a specific class attribute.

## HTML

```
<p class="center">  
  Hello  
</p>
```

## CSS

```
. center {  
  text-align: center;  
  color: blue;  
}
```



# Selectors



4

To select more specific elements, you can select specific class in a specific tag.

## HTML

```
<p class="center ">  
  Hello  
</p>
```

## CSS

```
p.center {  
  text-align: center;  
  color: blue;  
}
```



# Text Styles

## text-decoration

Used for adding lines to text.

Values: underline, overline, line-through, none

```
a{  
    text-decoration: none;  
}
```

## font-weight

Used for setting the weight (or boldness) of the font.

Values: 100 – 900, bold, bolder, lighter

```
font-weight : 500;
```



# Text Styles

list-style-type

Specifies the type of list-item marker in a list.  
Values: disc, square, circle, **none** ...

```
list-style-type: disc;
```



# Text Styles

a: link

Specifies unvisited links.

```
a:link{color: #000000 }
```

a:visited

Specifies the link the user has visited.

```
a:visited{color: #000000 }
```

a:hover

Specifies the link when the user hover over it.

```
a:hover{color: #000000 }
```

***hover*** can  
be used on  
all links.



# Display

The **display** property specifies the display behavior of an element.

Values: inline, block and inline-block ...

inline

Displays an element as an inline element. Any height and width properties will have no effect.

block

Displays an element as a block element. It starts on a new line, and takes up the whole width.

inline-block

Displays an element as an inline-level block container. The element itself is formatted as an inline element, but you can apply height and width values

none

The element is completely removed





# CSS Basic Properties

width

The **width** property sets the width of an element.

height

The **height** property sets the height of an element.



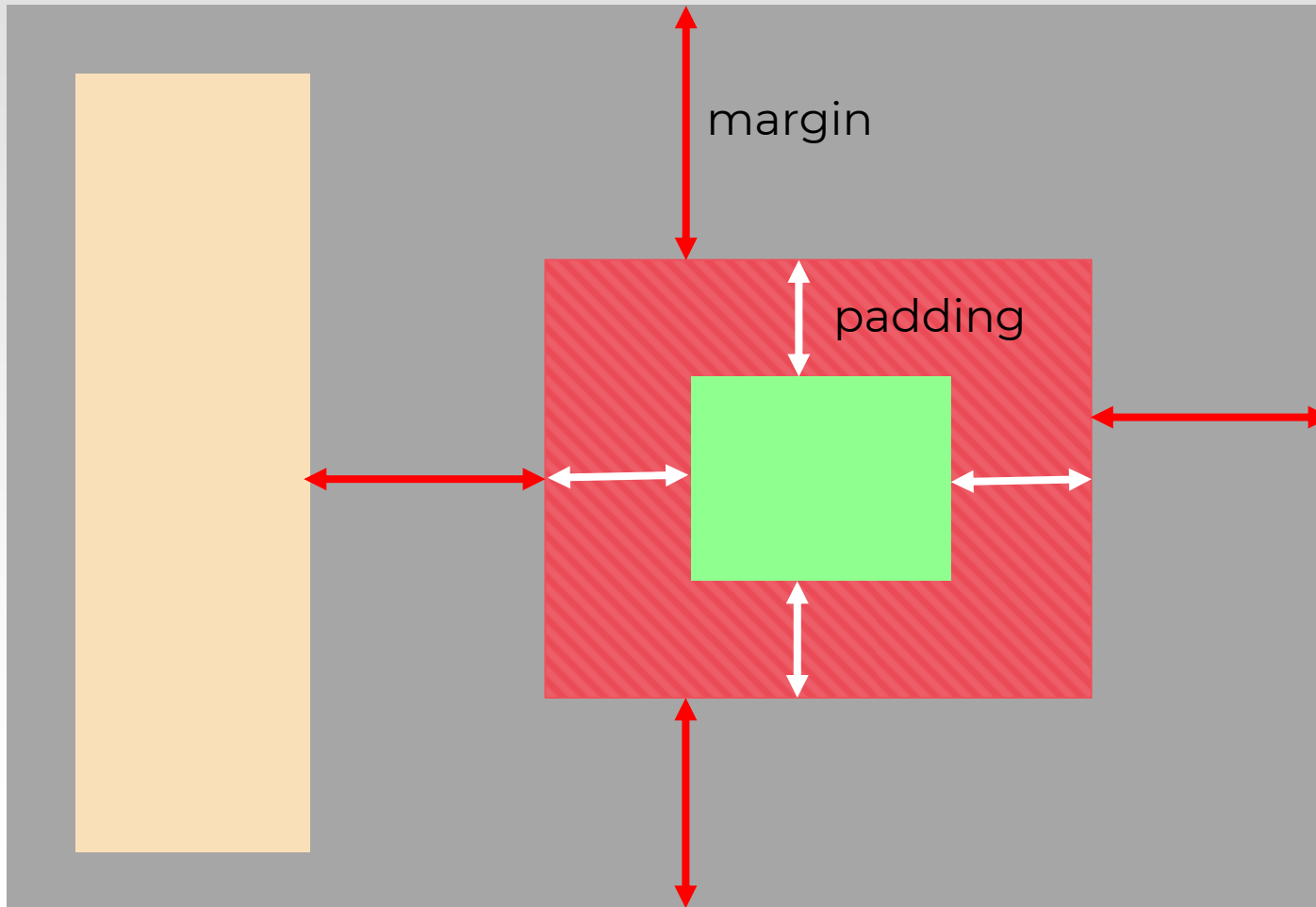
For width and height, %, **px**, **vw**, **vh** can be used.

Width and height are not used for inline elements.

Do not use width and height, if it is not necessary.



# Padding & Margin

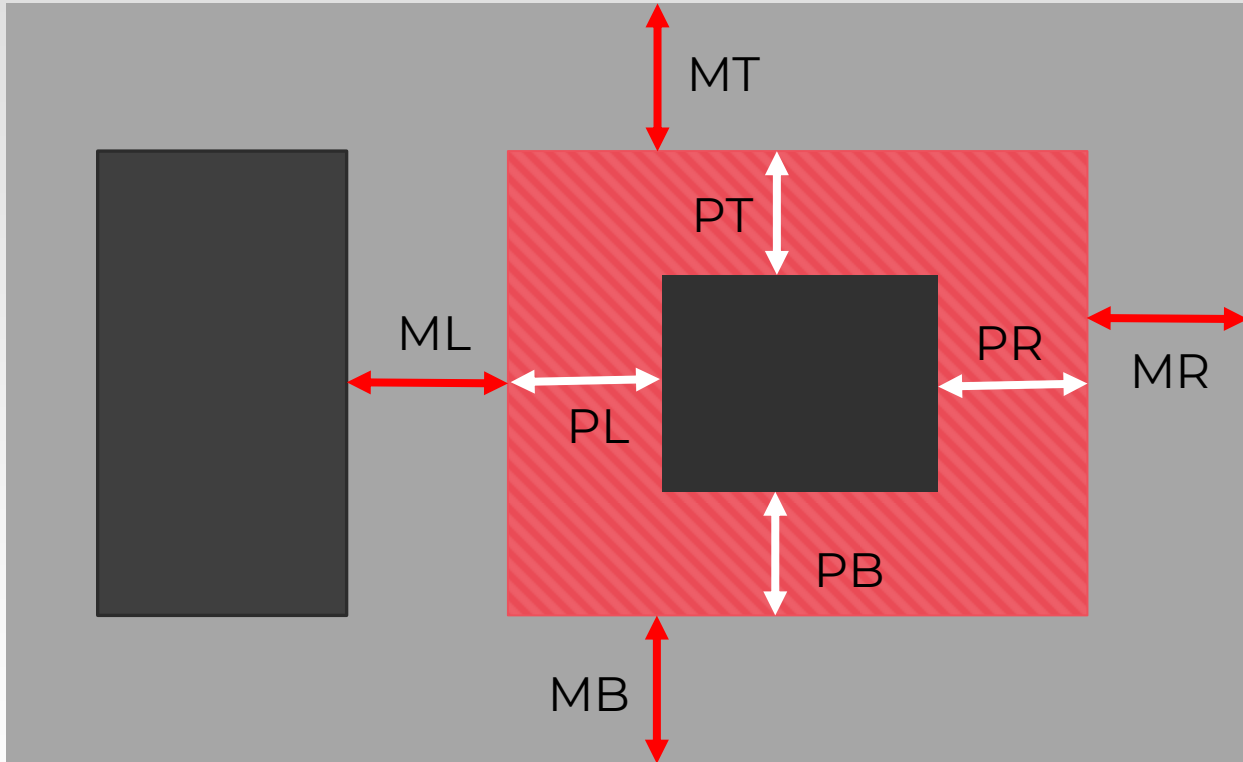


```
<div>
  <div></div>
  <div class="box">
    <div>
    </div>
  </div>
</div>
```

```
.box{
  padding: 50px;
  margin: 90px;
}
```



# Padding & Margin



Margin and padding values can be defined separately.

```
margin-top: 10px;  
padding-left: 20px;
```

can be defined as **upper right lower left**

```
margin: 5px 3px 7px 8px;  
padding: 64px 80px 192px 0;
```

can also be defined as **vertical horizontal**

```
margin: 5px 3px;  
padding: 64px 80px;
```

Only horizontal padding and margin can be applied to inline elements.



# Horizontal alignment

To position a block element horizontally within another block element

```
<div>
  <div>Hello</div>
</div>
```

Hello

Align left

```
margin-left:0;
margin-right: auto;
```

Align right

```
margin-left: auto;
margin-right:0;
```

Centering

```
margin-left:auto;
margin-right:auto;

/*or*/
margin:80px auto;
```



# Selectors ...



5

To select elements within an element, selectors can be written with spaces in between.

```
<nav class="navbar">
  <ul>
    <li><a href="home.html">Homepage</a></li>
    <li><a href="products.html">Products</a></li>
    <li><a href="about.html">About Us</a></li>
    <p><a href="index.html">Index</p>

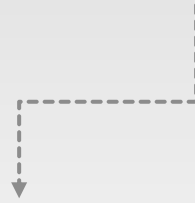
  </ul>
</nav>
```

```
.navbar ul p{
  font-weight: 900;
  color: red;
}
```



# Borders

border: width type color;



dotted, dashed, solid, double, groove, ridge, inset, outset, none

```
border: 3px solid red;
```

```
border: 3px dashed blue;
```

```
border: 5px dotted gray;
```



# Borders

Border can be given to 4 sides of the elements or only the desired side can be given.

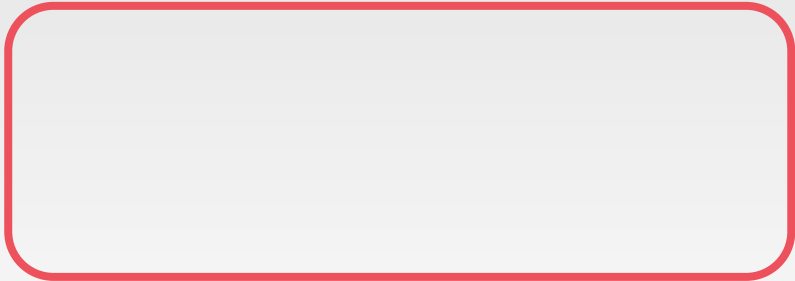
```
border-left | border-right | border-bottom | border-top
```

```
border-top: 3px solid red;
```



# Borders

**"border-radius"** property allows you to add rounded corners to elements!



```
div{  
  border:2px solid red;  
  border-radius: 8px;  
}
```



```
div{  
  background-color:red;  
  border-radius: 8px;  
}
```





# Background image

background-image

Set a background-image for the element

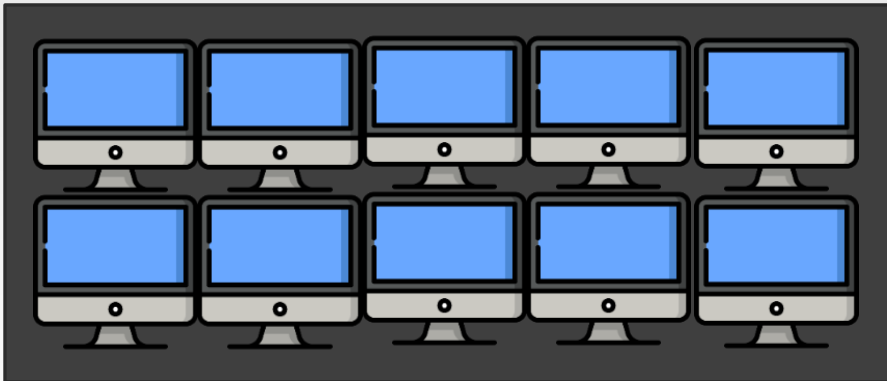
```
div{  
  background-image: url("img/bg.png");  
}
```



# Background image

background-repeat

The background image is repeated both vertically and horizontally. This is default.



**Repeat:** default

**No-repeat:** The image will only be shown once

**Repeat-x:** The background image is repeated only horizontally

**Repeat-y:** The background image is repeated only vertically



# Background image

## background-position

The **background-position** property sets the starting position of a background image. For horizontal left, right, center; for vertical top, bottom, center statements can be used.

```
div{  
  background-image: url('img/bg.png');  
  background-repeat: no-repeat;  
  background-position: center bottom;  
}
```

horizontal

vertical





# Background image

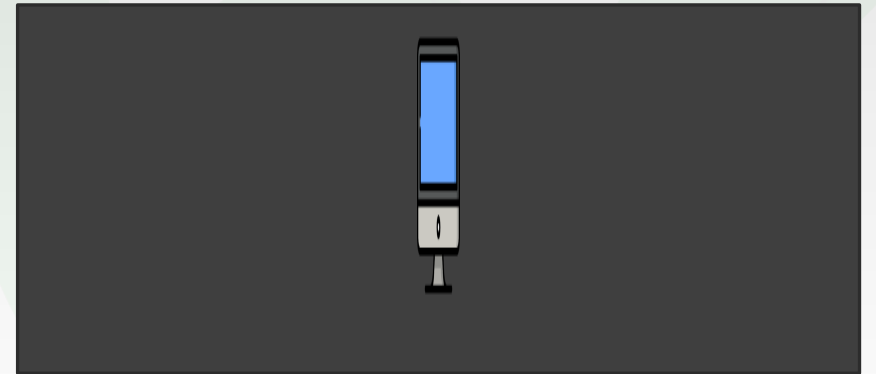
## background-size

The **background-size** property specifies the **size** of the background images. A certain value can be given for the size, or one of the values of **cover** or **contain** can be given.

```
div{  
  background-image: url('img/bg.png');  
  background-repeat: no-repeat;  
  background-position: center bottom;  
  background-size: 10px 80px;  
}
```

Width

Hight





# Background image



```
background-size:contain;
```

Places the photo inside the browser so that the entire image is visible.



```
background-size:cover;
```

Enlarges the photo to fill the entire browser, cropping the image if necessary.