

Today's objectives

- Learn HTML / CSS basics
- Code your profile page [like this](#)
- Put it online with [Github Pages](#)

Lecture Boilerplate

<https://github.com/lewagon/html-demo>

```
cd ~/code/$GITHUB_USERNAME
git clone git@github.com:lewagon/html-demo.git
cd html-demo
rm -rf .git
stt
```

Front-end languages

The languages your browser speaks

HTML



content
+ structure

CSS



style

JS



dynamism
+ usability

HTML



It's a **markup** language (= structure)

HTML

Your page has different contents

some text content..

some other content..

some third content..

HTML

HTML tags help you **identify** content

some text content..

h1

some other content..

h2

some third content..

p

HTML

Hence, **browser default styles** will apply

some text content..

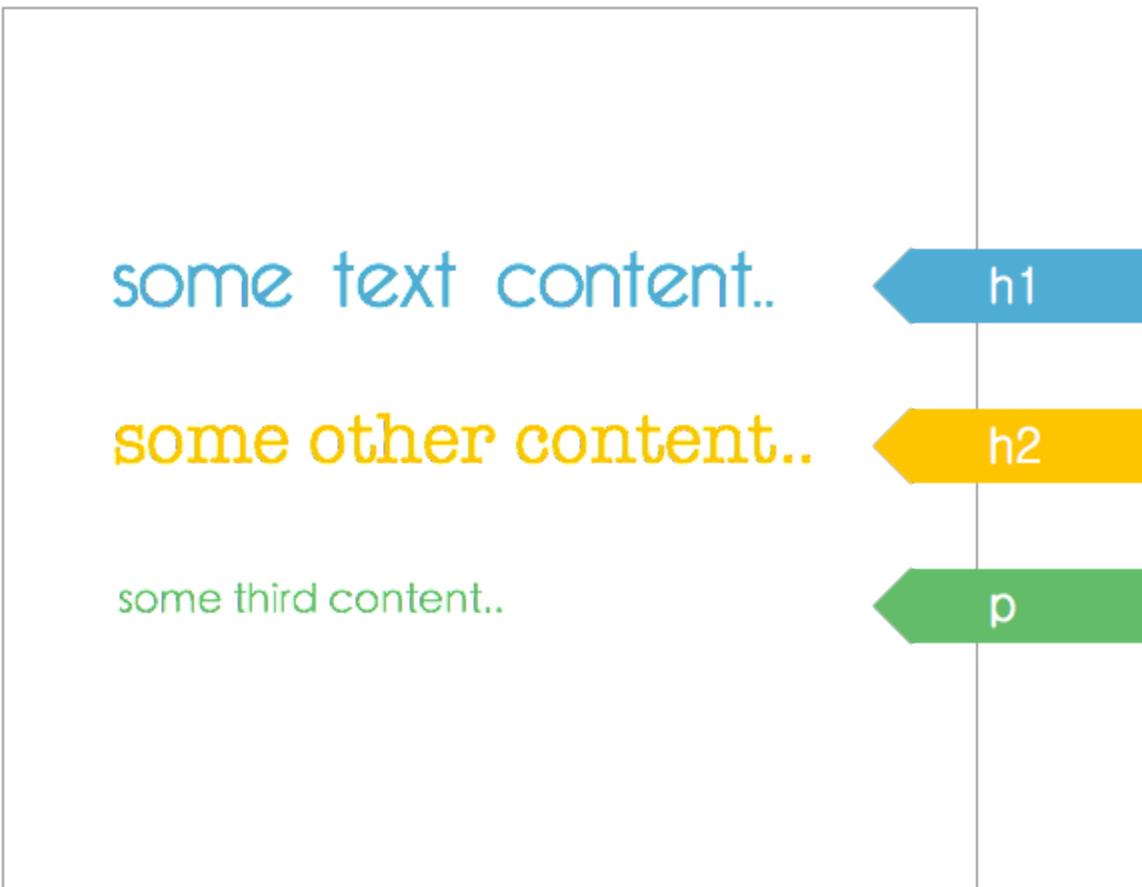
some other content..

some third content..



HTML

And you will also be able to apply **your own style rules** if you want



HTML Skeleton

```
<!DOCTYPE html>
```

```
<!-- end of file -->
```

HTML Skeleton

```
<!DOCTYPE html>
<html>

</html>
<!-- end of file -->
```

HTML Skeleton

```
<!DOCTYPE html>
<html>
  <head>

    <!-- Page's intelligence = meta tags -->

  </head>
  <body>

    <!-- Page's content = displayed on the page -->

  </body>
</html>
<!-- end of file -->
```

HTML Skeleton - head

```
<!DOCTYPE html>
<html>
  <head>
    <title>Page Title. Maximum length 60-70 characters</title>
    <meta name="description" content="Page description. No longer than 155 characters.">
    <meta charset="utf-8">
  </head>
  <body>

  </body>
</html>
<!-- end of file -->
```

HTML Skeleton - head & Google

```
<head>
  <!-- Google result text-->
  <title>Coding Bootcamp Le Wagon | Europe's Best Coding Bootcamp</title>
  <!-- Google result description-->
  <meta name="description" content="Le Wagon is Europe's best coding bootcamp for creative people & entrepreneurs. Learn to code in 9 weeks with our fullstack coding bootcamp.">
</head>
```

Coding Bootcamp Le Wagon | Europe's Best Coding Bootcamp

<https://www.lewagon.com/> ▾

Le Wagon is Europe's best coding bootcamp for creative people & entrepreneurs. Learn to code in 9 weeks with our fullstack coding bootcamp.

HTML Skeleton - head & Facebook

```
<head>
  <meta property="og:title" content="Le Wagon - The French innovative coding school">
  <meta property="og:image" content="facebook-card.jpg">
  <meta property="og:description" content="Le Wagon is the best French coding school for entrepreneurs. Checkout by yourself the projects of our students. You will be impressed.">
  <meta property="og:site_name" content="Le Wagon"/>
</head>
```



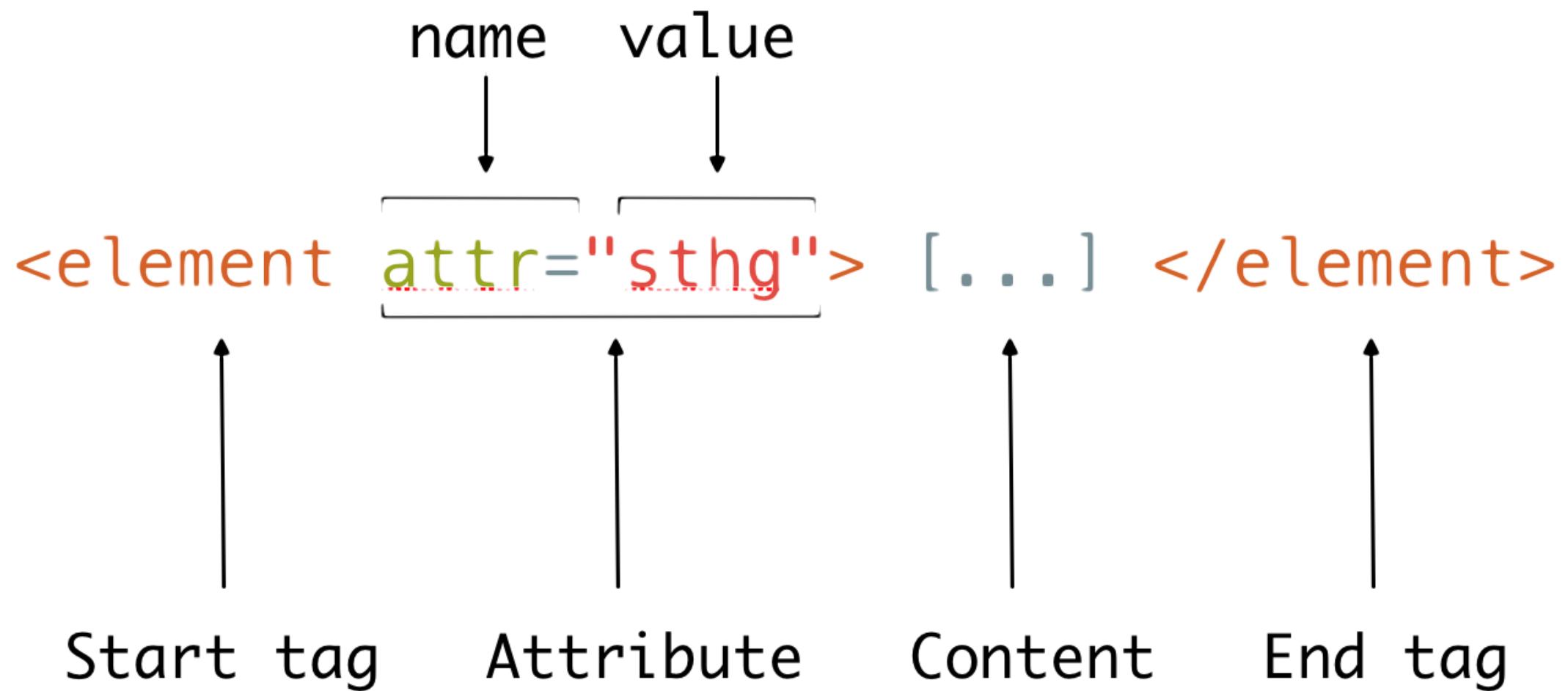
HTML Skeleton - head & Twitter

```
<head>
  <meta name="twitter:card" content="summary_large_image">
  <meta name="twitter:site" content="@Lewagonparis">
  <meta name="twitter:title" content="Le Wagon - The French innovative coding school">
  <meta name="twitter:description" content="Le Wagon is the best French coding school for entrepreneurs. Checkout by yourself the projects of our students. You will be impressed.">
  <meta name="twitter:creator" content="@Lewagonparis">
  <meta name="twitter:image:src" content="http://twitter-card.jpg">
</head>
```

HTML Skeleton - body

```
<!DOCTYPE html>
<html>
  <head>
    <meta charset="utf-8">
    <title>Hello world</title>
  </head>
  <body>
    <h1>Hello buddies!</h1>
  </body>
</html>
<!-- end of file -->
```

Basic syntax



Example

```
<a href="https://www.lewagon.com" target="_blank">  
  Le Wagon  
</a>
```

Result: [Le Wagon](https://www.lewagon.com)

Quizz

- What is the name of the tag?
- What is the content?
- What are the 2 attributes (name and value)?

Titles

```
<h1>[...]</h1>  <!-- Only one per page! SEO important -->  
  
<h2>[...]</h2>  
<h3>[...]</h3>  
<h4>[...]</h4>  
<h5>[...]</h5>  
<h6>[...]</h6>
```

Paragraphs

```
<p>
```

```
    Lorem ipsum dolor sit amet, consectetur adipisicing elit.  
    Veritatis laboriosam mollitia autem at ab omnis iure quis  
    asperiores inventore eos nam aut iusto officiis deserunt  
    nihil, sequi tempore impedit quae?
```

```
</p>
```

Emphasize

```
<p>
  You can emphasize <em>some words</em>,
  and even <strong>more if needed</strong>
</p>
```

Lists

```
<h2>Shopping List</h2>
<ul>
  <li>Milk</li>
  <li>Butter</li>
</ul>

<h2>World Cup 2018</h2>
<ol>
  <li>France</li>
  <li>Croatia</li>
  <li>Belgium</li>
  <li>England</li>
</ol>
```

Images

```

```

Forms

```
<form>
  <input type="email">
  <input type="password">
  <input type="submit" value="Log in">
</form>
```

Much more

- codeguide.co
- [MDN reference](#)

Let's add some HTML content to our profile page!

The screenshot shows a web browser window with the title bar "My profile". The address bar displays "file:///Users/boris/Desktop/my-profile/index.html". The main content area of the browser shows a profile page for "Boris". The page includes a heading "Hello, I'm Boris 😎", a small portrait photo of a man with dark hair and a beard, a bio about loving Github, UX/UI Design, web-development, motorbikes, and launching Le Wagon, a link to "Discover Le Wagon", sections for "UX/UI Design" and "Frontend Development" each with a small icon, and a section for "Motorbikes" with a small icon. At the bottom, there is a "Follow me" section with three social media links: GitHub, Twitter, and LinkedIn.

Hello, I'm Boris 😎



I love Github, UX/UI Design, web-development and motorbikes 🏍️ . I launched Le Wagon to teach code to entrepreneurs and creative people around the world 🌎 .

[Discover Le Wagon](#)

UX/UI Design 

I am passionate about **UX/UI Design**.

Frontend Development 

I am passionate about **Frontend Development**.

Motorbikes 

I am passionate about **Motorbikes**.

Follow me

-  [GitHub](#)
-  [Twitter](#)
-  [LinkedIn](#)

CSS



Web without CSS ?

- Cut the `<head>` on medium.com with Chrome dev tool.
- This is how a website looks like without CSS 😬

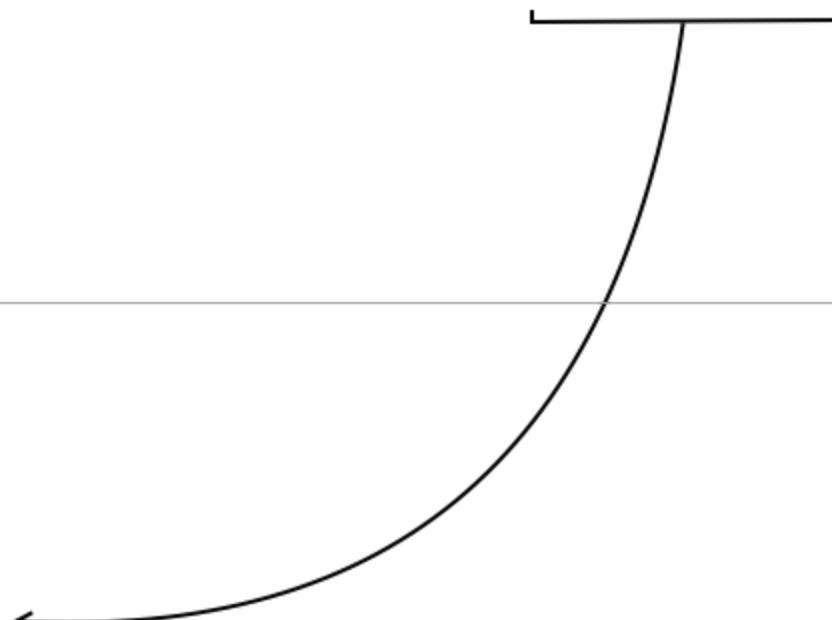
Linking stylesheet to HTML page

📄 index.html

```
1 <head>
2   <link rel="stylesheet" href="style.css">
3 </head>
4 <body>
5   <h1>Hello</h1>
6 </body>
```

📄 style.css

```
1 h1 {
2   color: red;
3 }
```



CSS syntax

```
1 selector {  
2   property: value;  
3   property: value;  
4   property: value;  
5 }
```

selection of one or more elements of the page..

..on which we define style rules

CSS vocabulary

```
1 selector {  
2   property: value;  
3   property: value;  
4   property: value;  
5 }
```

CSS selector

style rules

style properties

The diagram illustrates the structure of a CSS rule. It starts with a **CSS selector** (line 1). This is followed by a brace (line 5) which encloses a group of **style rules** (lines 2-4). Within these rules, individual **style properties** are listed.

Example



we select
all **<h2>** of the page

```
1 h2 {  
2   color: red;  
3   font-size: 20px;  
4   font-family: arial;  
5 }
```

Colors

```
color: #FF530D;  
color: rgb(255, 83, 13);  
color: rgba(255, 83, 13, 1.0);
```

Colors - Tips

```
body {  
  color: rgb(10, 10, 10);  
}
```

- **RGB** stands for Red Green Blue
- each value is between 0 and 255
- for same values of R, G and B, you are on the grey scale



Text vs Background

```
1 body {  
2   color: orange;  
3   background-color: yellow;  
4 }
```

text color

background color

The diagram illustrates the relationship between CSS properties and their visual outcomes. It features a code block with four numbered lines. An arrow points from the label "text color" to the "color" property in line 2. Another arrow points from the label "background color" to the "background-color" property in line 3.

Background image

```
1 body {  
2   color: orange;  
3   background-image: url("background.jpg");  
4 }
```

background-image



Font - family

```
1 body {  
2   font-family: Times, serif;  
3 }
```

A
B
C

```
1 body {  
2   font-family: Arial, sans-serif;  
3 }
```

A
B
C

```
1 body {  
2   font-family: Courier, monospace;  
3 }
```

A
B
C

Fonts - size and spacing

```
1 body {  
2   letter-spacing: 10px;  
3 }
```

```
1 body {  
2   font-size: 30px;  
3 }
```

```
1 body {  
2   line-height: 1.6;  
3 }
```

A b c
letter-spacing

font-size
A b c

line-height
A b c

Fonts - decoration

```
1 p {  
2   text-decoration: underline;  
3 }
```

Abc

```
1 a {  
2   text-decoration: none;  
3 }
```

sign up
↓
sign up

Fonts - alignment

```
1 p {  
2   text-align: center;  
3 }
```

This is a centered paragraph aligned with text-align

```
1 p {  
2   text-align: justify;  
3 }
```

This is a justified paragraph aligned with text-align

Fonts - weight

```
1 body {  
2   font-weight: 100;  
3   // from 100 to 900.  
4 }
```

Light text

```
1 body {  
2   font-weight: bold;  
3 }
```

Bold text

Fonts - Google fonts

Make your shopping on [Google fonts](#).

- Open-Sans  `<body>`
- Raleway, Montserrat, Varela Round, etc...  `<h1>` , `<h2>` , `<h3>`

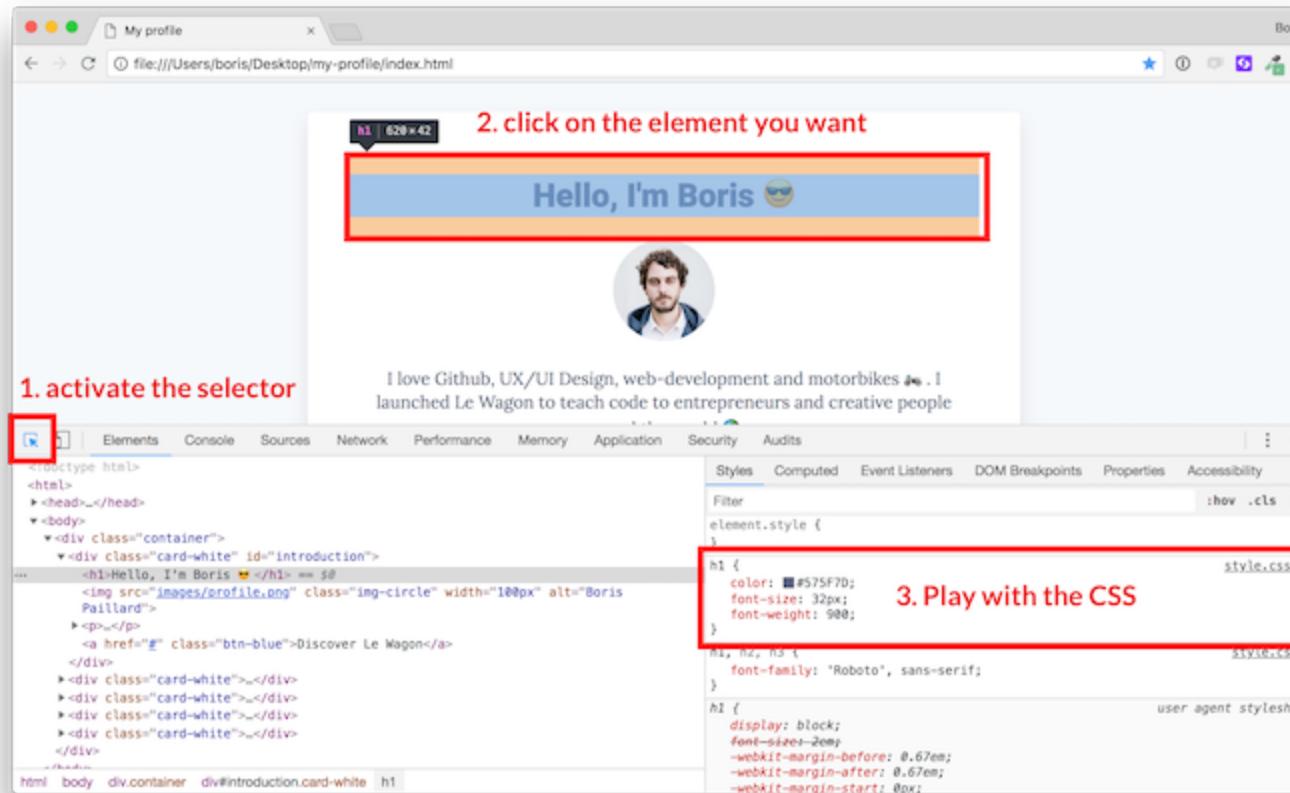
Fonts - Font Awesome

Font Awesome is a font of icons, really useful!

```
<!-- cdn link to paste in your <head> -->
<link rel="stylesheet" href="https://use.fontawesome.com/releases/v5.0.10/css/all.css">
```

Small tips

Use the inspector, then copy the `css` in Sublime.



Live-code

Let's design our fonts and colors using [Google fonts](#).

My profile X Boris

file:///Users/boris/Desktop/my-profile/index.html

Hello, I'm Boris 😎



I love Github, UX/UI Design, web-development and motorbikes 🛵 . I launched Le Wagon to teach code to entrepreneurs and creative people around the world 🌎 .

[Discover Le Wagon](#)

[UX/UI Design](#) 🔧

I am passionate about **UX/UI Design**.

[Frontend Development](#) 💻

I am passionate about **Frontend Development**.

[Motorbikes](#) 🛵

I am passionate about **Motorbikes**.

[Follow me](#)

- 🔍
- 🐦
- 📺

Div and box model

Real life...

The screenshot shows the Airbnb website interface for a search in Paris, France. The top navigation bar includes the Airbnb logo, a search bar with "Paris" and "Anytime" selected, and a guest count of "2 guests". Below the search bar are tabs for "FOR YOU", "HOMES" (which is underlined), "EXPERIENCES", and "PLACES". Further down are filters for "Room type", "Price range", "Instant Book", and "More filters". A note says "Enter dates to see full pricing. Additional fees apply. Taxes may be added after login." The main content area displays six listing cards with images, prices, descriptions, and reviews. To the right is a map of the Paris region showing major roads and surrounding towns like Argenteuil, Saint-Denis, and Bobigny.

Paris, France – Airbnb

https://www.airbnb.co.uk/s/Paris--France/

Guest

Paris Anytime 2 guests

Become a Host Help Sign Up Log In

FOR YOU HOMES EXPERIENCES PLACES

Room type Price range Instant Book More filters

Enter dates to see full pricing. Additional fees apply. Taxes may be added after login.

From £28 · Studio sur cour, calme, proche T...
Entire condominium - 1 bed
★★★★★ 3

From £28 · Studio rdc à Paris centre Proche...
Entire flat - 1 bed
1 review

From £37 · Cosy studio for couples ❤ Vie...
Entire flat - 1 bed
★★★★★ 3

From £50 · Eiffel Tower-tiny studio 14m2
Entire flat - 1 bed
1 review

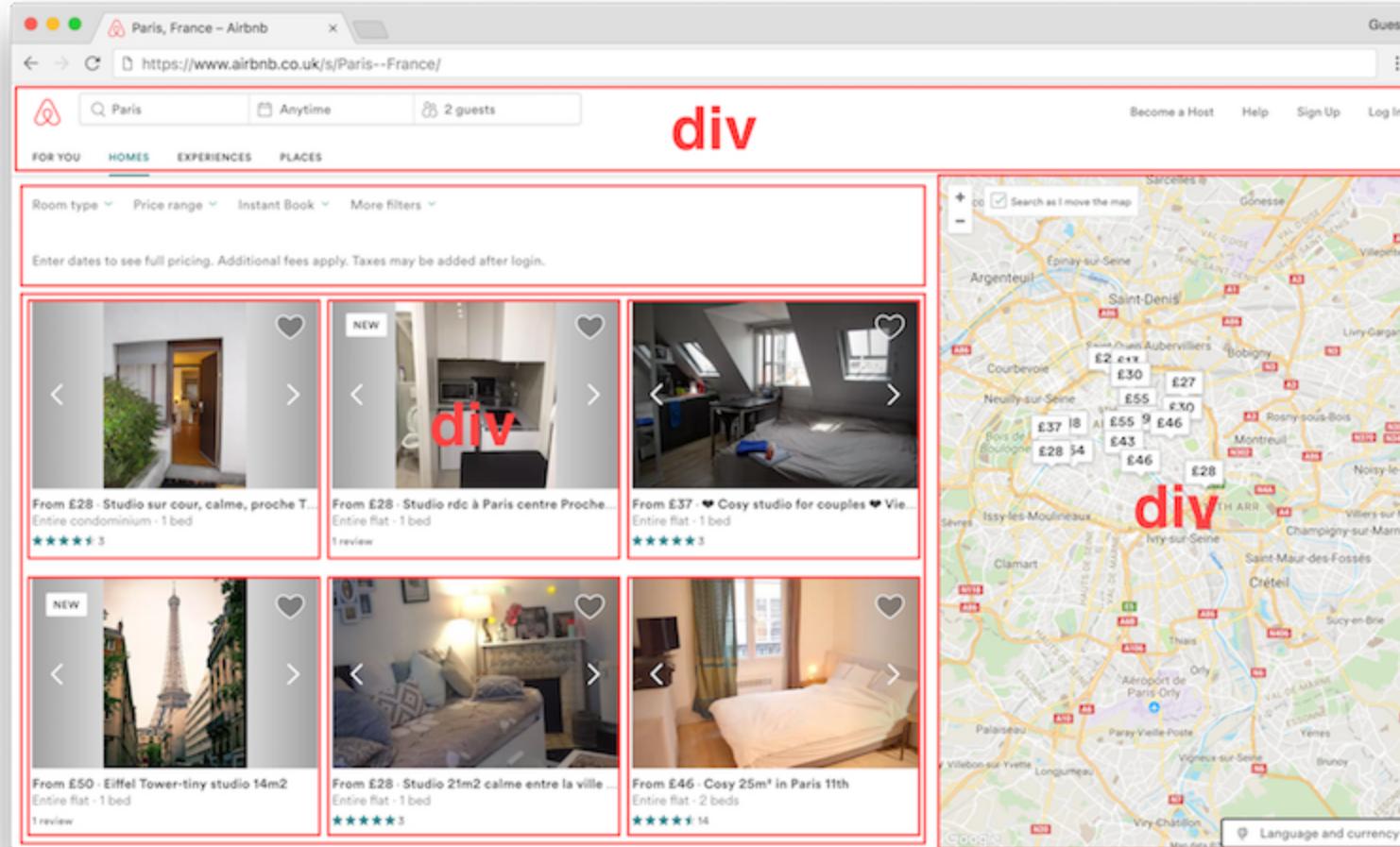
From £28 · Studio 21m2 calme entre la ville ...
Entire flat - 1 bed
★★★★★ 3

From £46 · Cosy 25m² in Paris 11th
Entire flat - 2 beds
★★★★★ 14

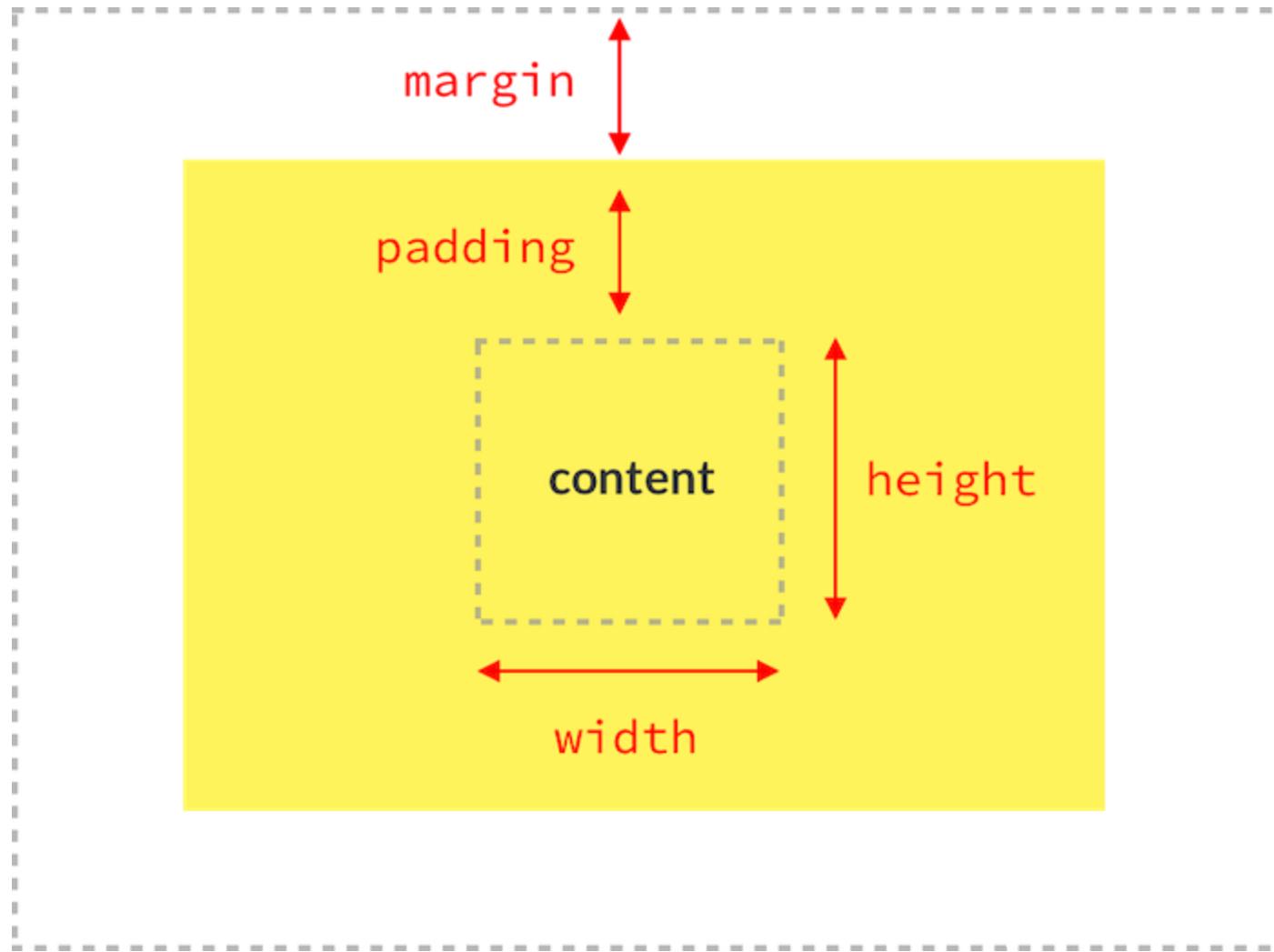
Search as I move the map

Language and currency

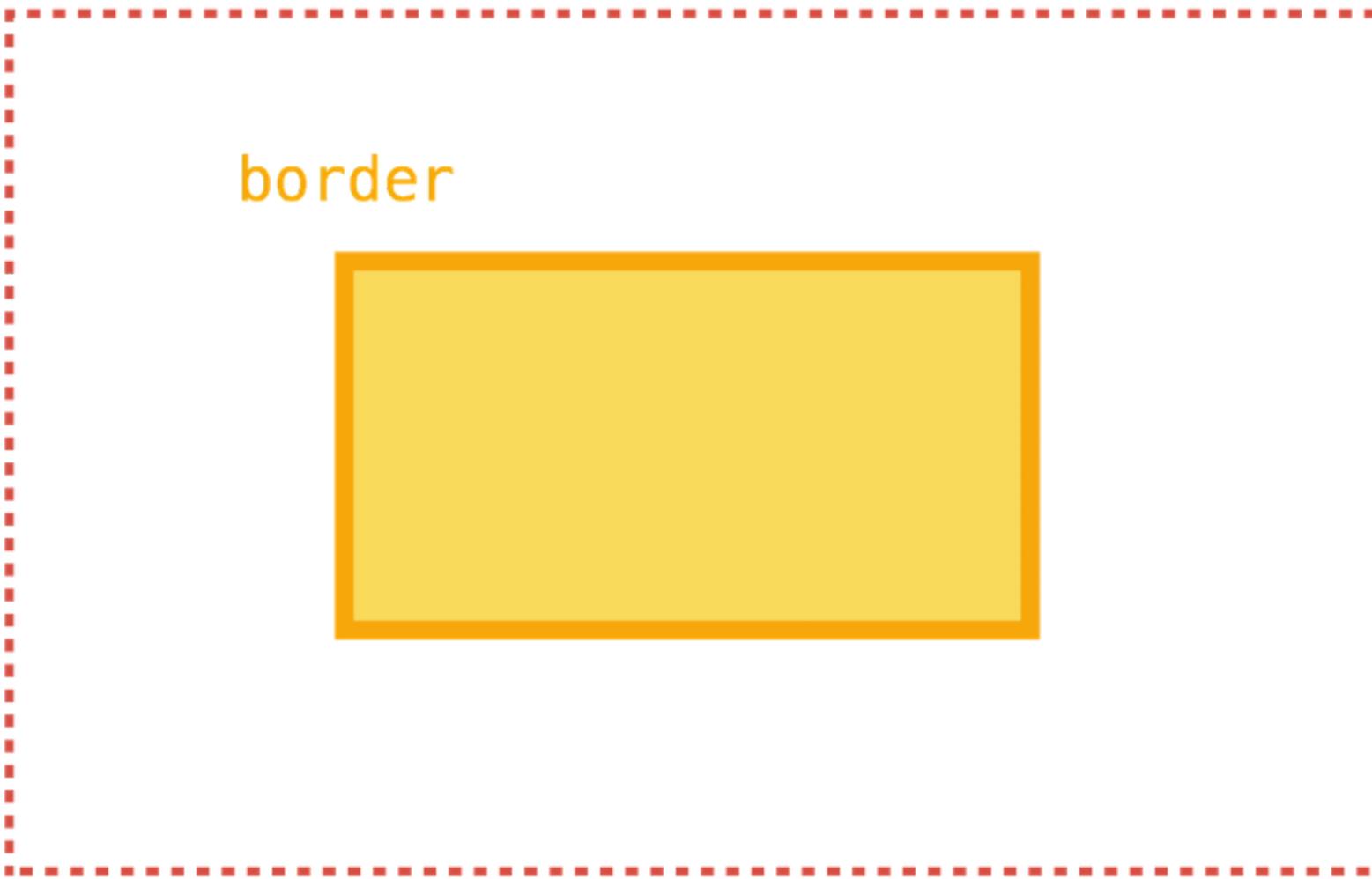
... is made of <div>



Box model



Box model - border



Borders

```
div {  
  border: 1px solid red;  
}  
/* or */  
div {  
  border-top: 1px solid red;  
  border-right: 2px dotted black;  
  border-bottom: 1px dashed green;  
  border-left: 2px dotted black;  
}
```



solid



dashed



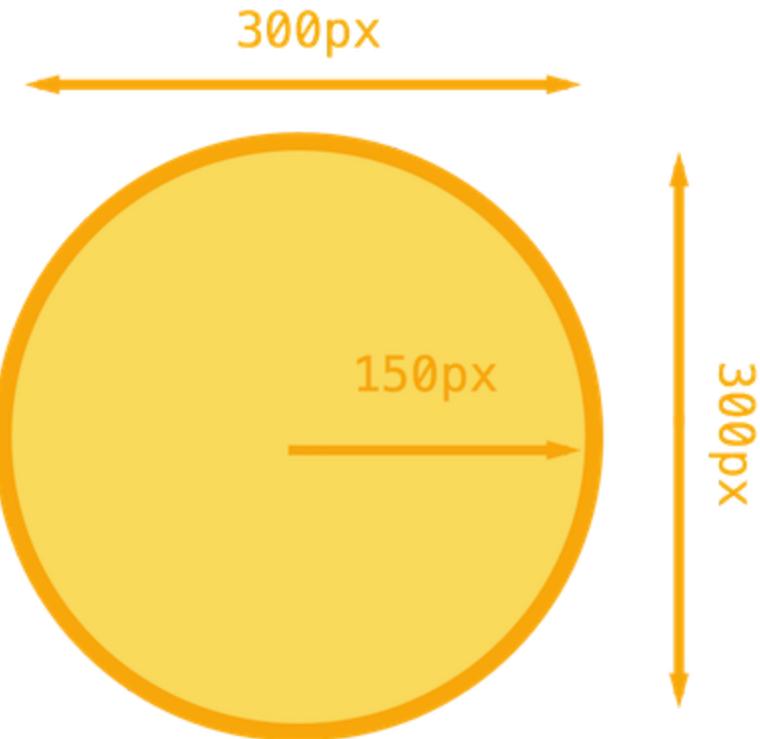
dotted

Border radius



`border-radius: 5px;`

Border radius



```
width: 300px;  
height: 300px;  
border-radius: 150px;
```

Box shadow



box-shadow: 2px 2px 3px blue;

Units

```
/* Absolute */
p {
  width: 50px;
}

/* Relative to parent */
p {
  width: 50%;
}

/* Relative to font size */
p {
  width: 2em;
}
```

Div design tips

```
background: white;          /* White background */  
padding: 30px;             /* Internal space */  
border-radius: 4px;         /* Small radius */  
box-shadow: 0 10px 30px rgba(0,0,0,.1); /* Light shadow */
```

Div centering technique

```
width: 300px;          /* Set the width */  
margin: 0 auto;        /* Set automatic margins on right/left */
```

Live-code

Let's add some div in our HTML and play with the box model with Chrome Dev tool.

id and class

How do you style only the logo?

HTML

```
1 
2
3 <ul>
4   <li></li>
5   <li></li>
6   <li></li>
7   <li></li>
8 </ul>
```

CSS

```
1 img {
2   width: 40px;
3 }
```



Name your tag with `id`

HTML

```
1 
2
3 <ul>
4   <li></li>
5   <li></li>
6   <li></li>
7   <li></li>
8 </ul>
```

CSS

```
1 #logo {
2   width: 40px;
3 }
```



How do you style your staff pictures?

```
1 
2
3 <ul>
4   <li></li>
5   <li></li>
6   <li></li>
7   <li></li>
8 </ul>
```

Name your tags with `class`

HTML

```
1 
2
3 <ul>
4     <li></li>
5     <li></li>
6     <li></li>
7     <li></li>
8 </ul>
```

CSS

```
1 .img-circle {
2     border-radius: 50%;
3 }
```



id or class?

HTML

```
1 
2
3 <ul>
4   <li></li>
5   <li></li>
6   <li></li>
7   <li></li>
8 </ul>
```

unique



re-usable



Combine (1)

HTML 1



CSS

```
1 .img-circle {  
2   border-radius: 50%;  
3 }
```

Combine (2)

HTML 1



CSS

```
1 .img-circle {  
2   border-radius: 50%;  
3 }  
4  
5 .shadowed {  
6   box-shadow: 5px 5px 3px black;  
7 }
```

Combine (3)

HTML 1

```
1 .img-circle {  
2   border-radius: 10px;  
3 }  
4  
5 .shadowed {  
6   box-shadow: 5px 5px 3px black;  
7 }  
8  
9 #leader {  
10  border: 5px solid red;  
11 }
```



Class naming - quizz

Which one is **more explicit** (tells what it does)?

- `.btn-red` or `.btn-signup` ?
- `.background-blue` or `.background-home` ?
- `.img-user` or `.img-circle` ?

Change your mindset => think graphical

Class naming - convention

```
.component-shape
/* Examples */
.text-center
.text-justify
.btn-red
.btn-green
.btn-big
.list-inline
.form-horizontal
.img-rounded
.img-circle
```

Selectors Summary

Element Selector

```
<!-- index.html -->
[...]
<body>
  <h1>Hello World</h1>
</body>
```

combined with

```
/* style.css */
h1 {color: red;font-weight: bold;}
```

makes the `h1` elements red and bold.

Class Selector

```
<!-- index.html -->
[...]
<body>
  <p>This paragraph is not justified</p>
  <p class="text-justify">This one is</p>
  <p class="text-justify">This one also</p>
</body>
```

combined with

```
/* style.css */
.text-justify {
  text-align: justify;
}
```

will make only the second and third paragraphs justified.

Id Selector

```
<!-- index.html -->
<body>
  <div id="banner">
    <h1>Le Wagon</h1>
    <p>We bring tech skills to creative people</p>
  </div>
</body>
```

combined with

```
/* style.css */
#banner {
  background-image: url("example.jpg");
  background-size: cover;
}
```

will put an image background on the **unique** div with `id="banner"` .

Descendant Selectors

```
<!-- index.html -->
<body>
  <div id="banner">
    <h1>Le Wagon</h1>
    <p>We bring tech skills to creative people</p>
  </div>
</body>
```

combined with

```
/* style.css */
#banner h1 {
  color: white;
}
```

h1 children of the element `id="banner"` will be white.

Direct Children

```
<!-- index.html -->
<body>
  <ul id="navigation">
    <li><a href="#">Home</a></li>
    <li><a href="#">Team</a></li>
    <li><a href="#">Contact</a></li>
  </ul>
</body>
```

combined with

```
/* style.css */
#navigation > li > a {
  color: blue;
}
```

a direct children of li direct children of id="navigation" will be blue.

Grouping

```
/* style.css */
h1, h2, h3 {
    font-weight: bold;
}
```

is a shortcut syntax for

```
/* style.css */
h1 {
    font-weight: bold;
}
h2 {
    font-weight: bold;
}
[...]
```

Pseudo Classes

```
/* style.css */  
a {  
    color: red;  
    text-decoration: none;  
}  
  
a:hover {  
    text-decoration: underline;  
}
```

will make links underlined when the mouse hovers over them.

See [other pseudo classes](#)

Quizz #1

```
<!-- index.html -->
<body>
  <p class="text-red">
    Lorem ipsum dolor sit amet, consectetur adipisicing elit.
  </p>
</body>
```

combined with

```
/* style.css */
p {
  color: black;
}
.text-red {
  color: red;
}
```

Quizz #2

```
<!-- index.html -->
<body>
  <p id="bio" class="text-red">
    Lorem ipsum dolor sit amet, consectetur adipisicing elit.
  </p>
</body>
```

combined with

```
/* style.css */
.text-red {
  color: red;
}
#bio {
  color: green;
}
```

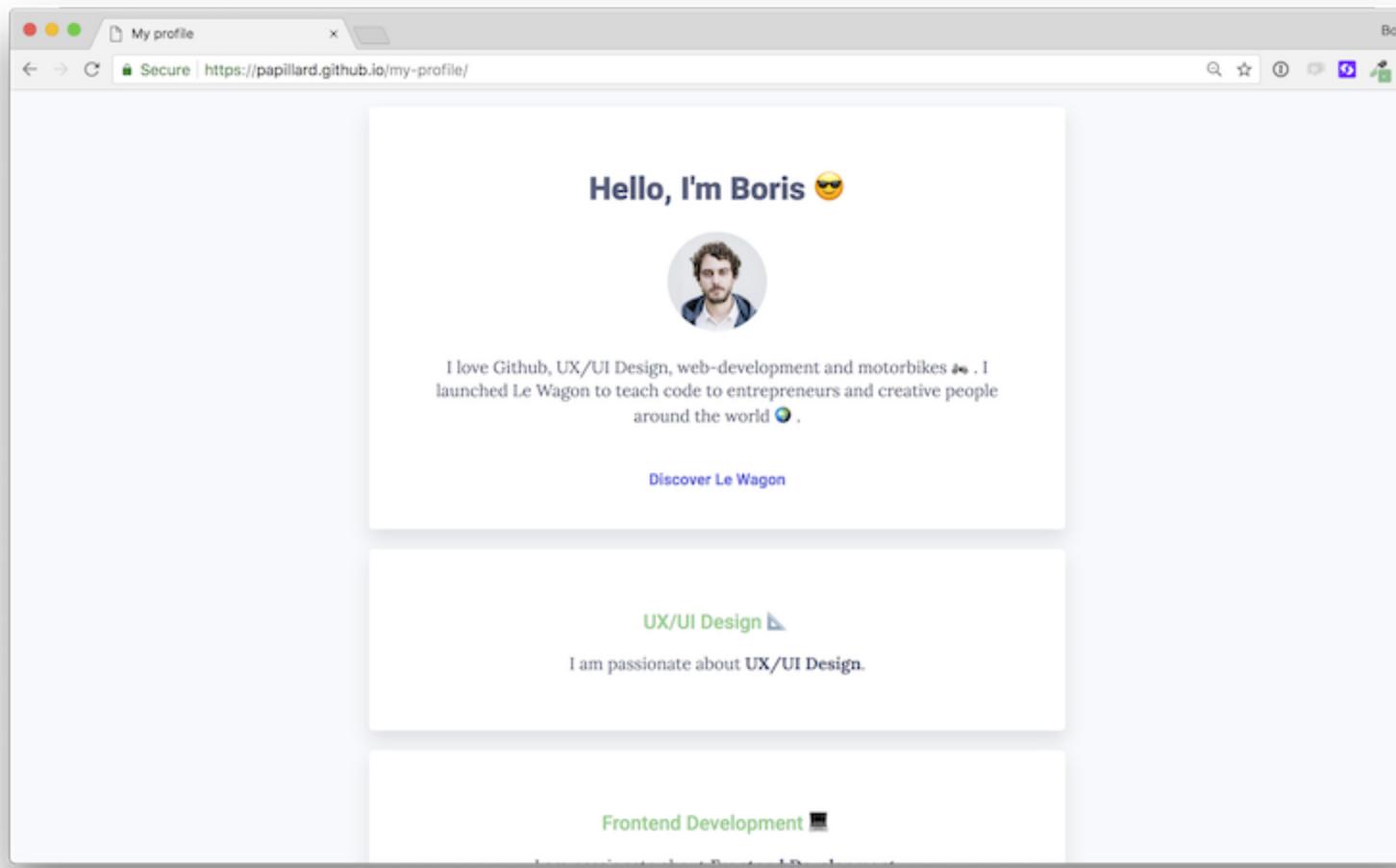
Specificity of Selectors

```
p {                      /* least specific */  
  color: black;  
}  
.text-red {             /*           ↓           */  
  color: red;  
}  
#bio {                  /* most specific */  
  color: green;  
}
```

Check out the [specificity calculator](#)

Live-code

Let's finish our live-code and get this **final result!**



Let's build your profile!