

LEARNING GARDEN MAKER WORKSHOP: INTRODUCTION TO HTML/CSS/Javascript AND GITHUB

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Today's agenda.

- 1. How does web publishing work?**
- 2. Produce a web page with code editor such **Visual Studio Code**.**
- 3. Free hosting of static website on **Github**.**
- 4. Mark up your web page structure in **HTML**.**
- 5. Style your web page in **CSS**.**
- 6. Provide interactive effects through **JS**.**

How does web publishing work?

Browser

Screen Display



Web Server

HTML/CSS/JS



Database Server

Data



A screenshot of a code editor window displaying an HTML document. The code includes doctype, head, meta charset, title, link, script, and body sections, along with a paragraph containing the text "Let's rock the browser, HTML5 style."

```
<!DOCTYPE html>
<html lang="en">
<head>
<meta charset="utf-8">
<title> A Tiny HTML Document </title>
<link href = "styles.css" rel="stylesheet">
<script src="scripts.js"></script>
</head>

<body>
<p>Let's rock the browser, HTML5 style.</p>
</body>
</html>
```

A screenshot of a MySQL Workbench interface showing a table named 'customers'. The table has columns: ID, PHONE, POPULARNAME, PREFERREDNAME, LATITUDE, and LONGITUDE. The data grid shows 25 rows of customer information with various IDs and names.

	ID	PHONE	POPULARNAME	PREFERREDNAME	LATITUDE	LONGITUDE
<input type="checkbox"/>	1194820	00994614	popular_name_00994614	preferred_name_00994614	23.789875	88.897985
<input type="checkbox"/>	1194821	00994615	popular_name_00994615	preferred_name_00994615	23.789875	88.897985
<input type="checkbox"/>	1194822	00994616	popular_name_00994616	preferred_name_00994616	23.789875	88.897985
<input type="checkbox"/>	1194823	00994617	popular_name_00994617	preferred_name_00994617	23.789875	88.897985
<input type="checkbox"/>	1194824	00994618	popular_name_00994618	preferred_name_00994618	23.789875	88.897985
<input type="checkbox"/>	1194825	00994619	popular_name_00994619	preferred_name_00994619	23.789875	88.897985
<input type="checkbox"/>	1194826	00994620	popular_name_00994620	preferred_name_00994620	23.789875	88.897985
<input type="checkbox"/>	1194827	00994621	popular_name_00994621	preferred_name_00994621	23.789875	88.897985
<input type="checkbox"/>	1194828	00994622	popular_name_00994622	preferred_name_00994622	23.789875	88.897985
<input type="checkbox"/>	1194829	00994623	popular_name_00994623	preferred_name_00994623	23.789875	88.897985
<input type="checkbox"/>	1194830	00994624	popular_name_00994624	preferred_name_00994624	23.789875	88.897985
<input type="checkbox"/>	1194831	00994625	popular_name_00994625	preferred_name_00994625	23.789875	88.897985

Static Website vs. Dynamic Website

Browser

Screen Display



Web Server

HTML/CSS/JS

Static Website



```
1 <!DOCTYPE html>
2 <html lang="en">
3   <head>
4     <meta charset="utf-8">
5     <title> A Tiny HTML Document </title>
6     <link href = "styles.css" rel="stylesheet">
7     <script src="scripts.js"></script>
8   </head>
9
10  <body>
11    <p>Let's rock the browser, HTML5 style.</p>
12  </body>
13  </html>
```

Browser

Screen Display

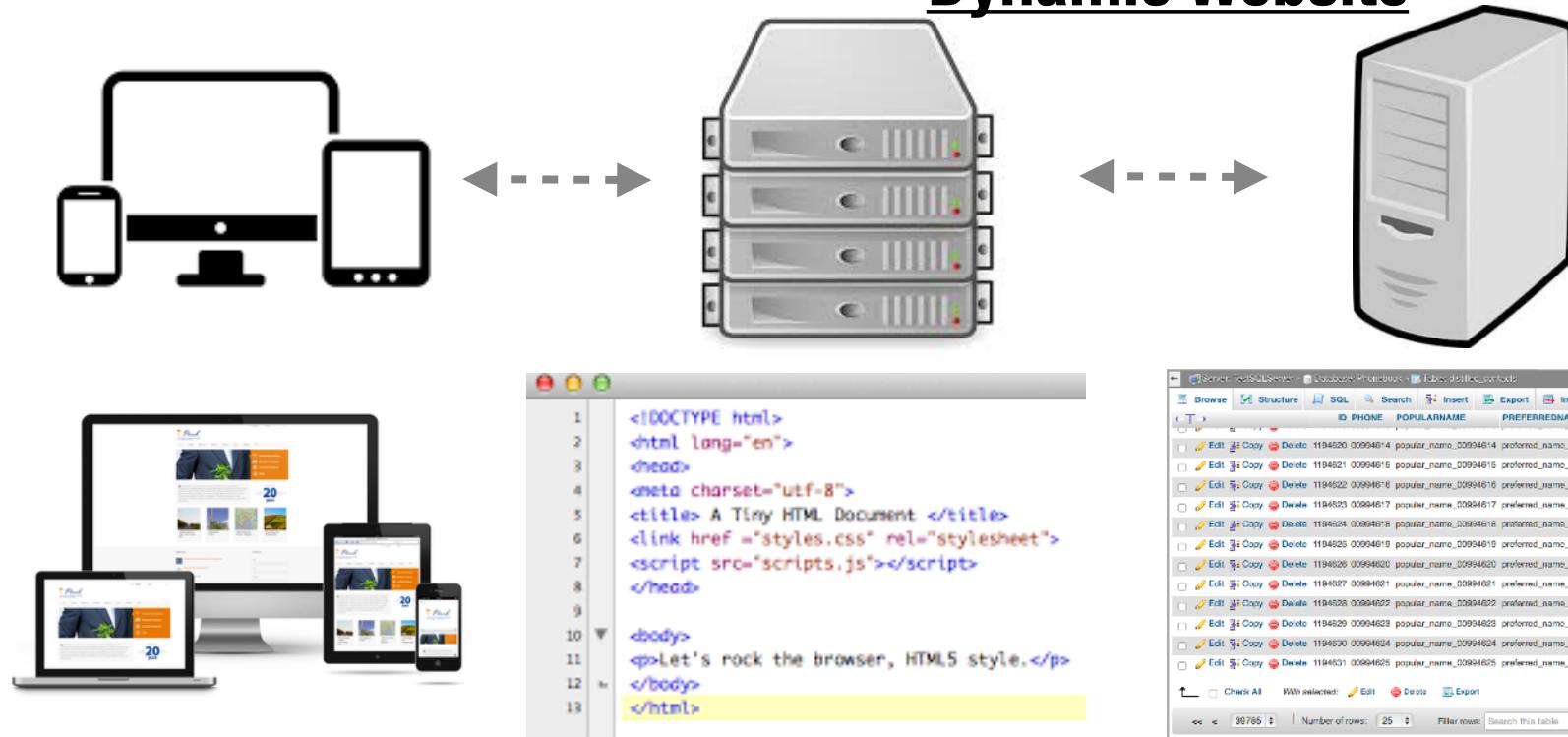
Web Server

HTML/CSS/JS

Database Server

Data

Dynamic Website



ID	PHONE	POPULARNAME	PREFERREDNAME	LATITUDE	LONGITUDE
1194820	00994614	popular_name_00994614	preferred_name_00994614	23.789875	88.897985
1194821	00994615	popular_name_00994615	preferred_name_00994615	23.789875	88.897985
1194822	00994616	popular_name_00994616	preferred_name_00994616	23.789875	88.897985
1194823	00994617	popular_name_00994617	preferred_name_00994617	23.789875	88.897985
1194824	00994618	popular_name_00994618	preferred_name_00994618	23.789875	88.897985
1194825	00994619	popular_name_00994619	preferred_name_00994619	23.789875	88.897985
1194826	00994620	popular_name_00994620	preferred_name_00994620	23.789875	88.897985
1194827	00994621	popular_name_00994621	preferred_name_00994621	23.789875	88.897985
1194828	00994622	popular_name_00994622	preferred_name_00994622	23.789875	88.897985
1194829	00994623	popular_name_00994623	preferred_name_00994623	23.789875	88.897985
1194830	00994624	popular_name_00994624	preferred_name_00994624	23.789875	88.897985
1194831	00994625	popular_name_00994625	preferred_name_00994625	23.789875	88.897985

Demo

**Browser (e.g. Chrome) translates HTML/
CSS/JS into web pages ordinary human
can understand.**

**We need a `code editor` to create
HTML/CSS/JS files.**

Version 1.47 is now available! Read about the new features and fixes from June.

Code editing. Redefined.

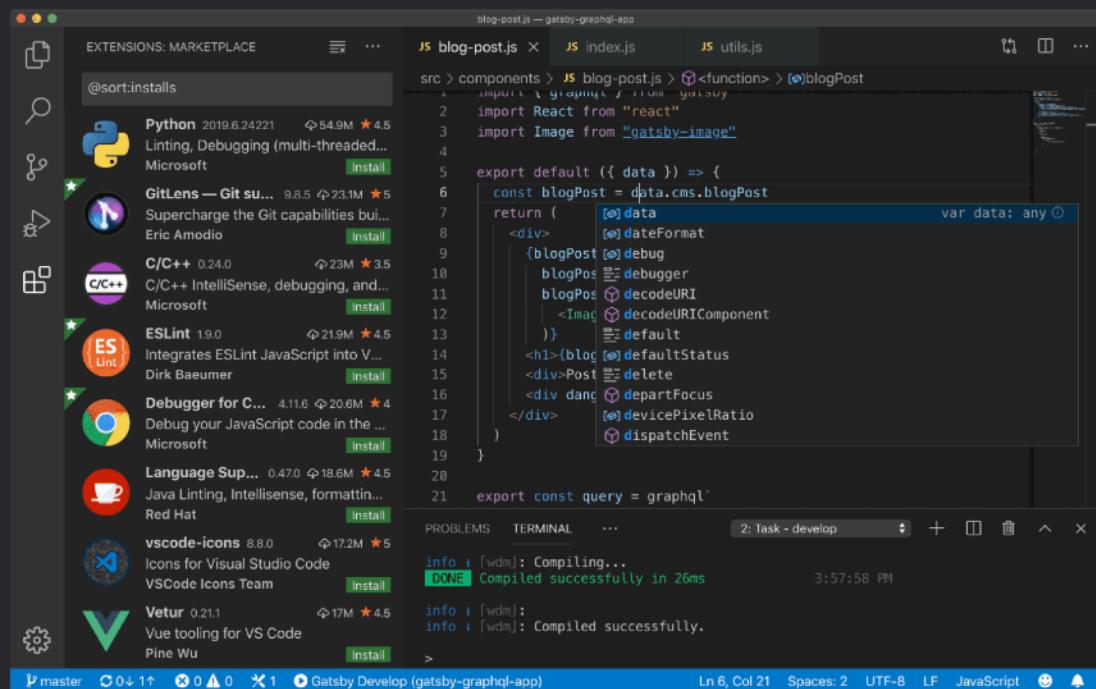
Free. Built on open source. Runs everywhere.

[Download for Mac](#)

Stable Build

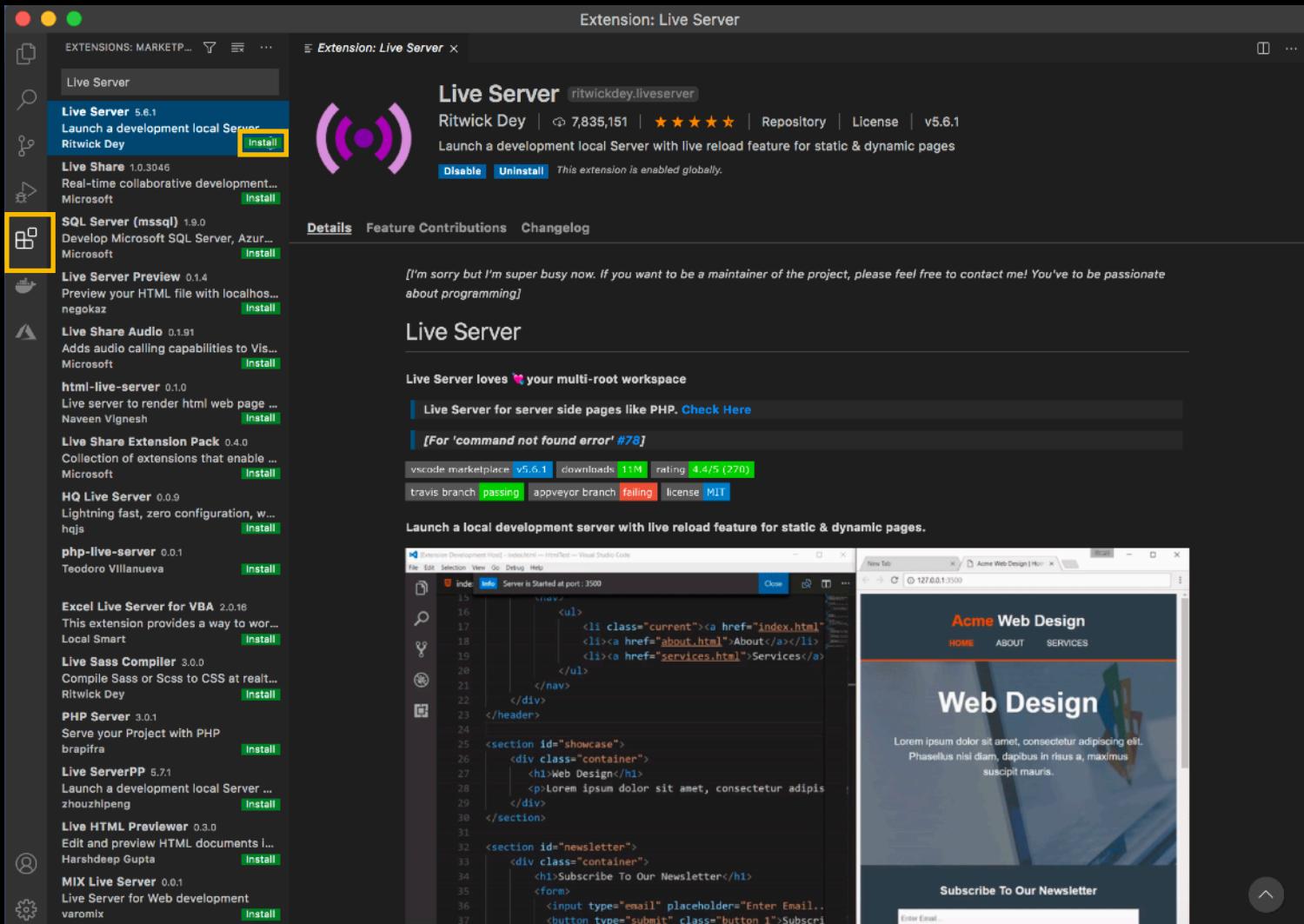
[Other platforms and Insiders Edition](#)

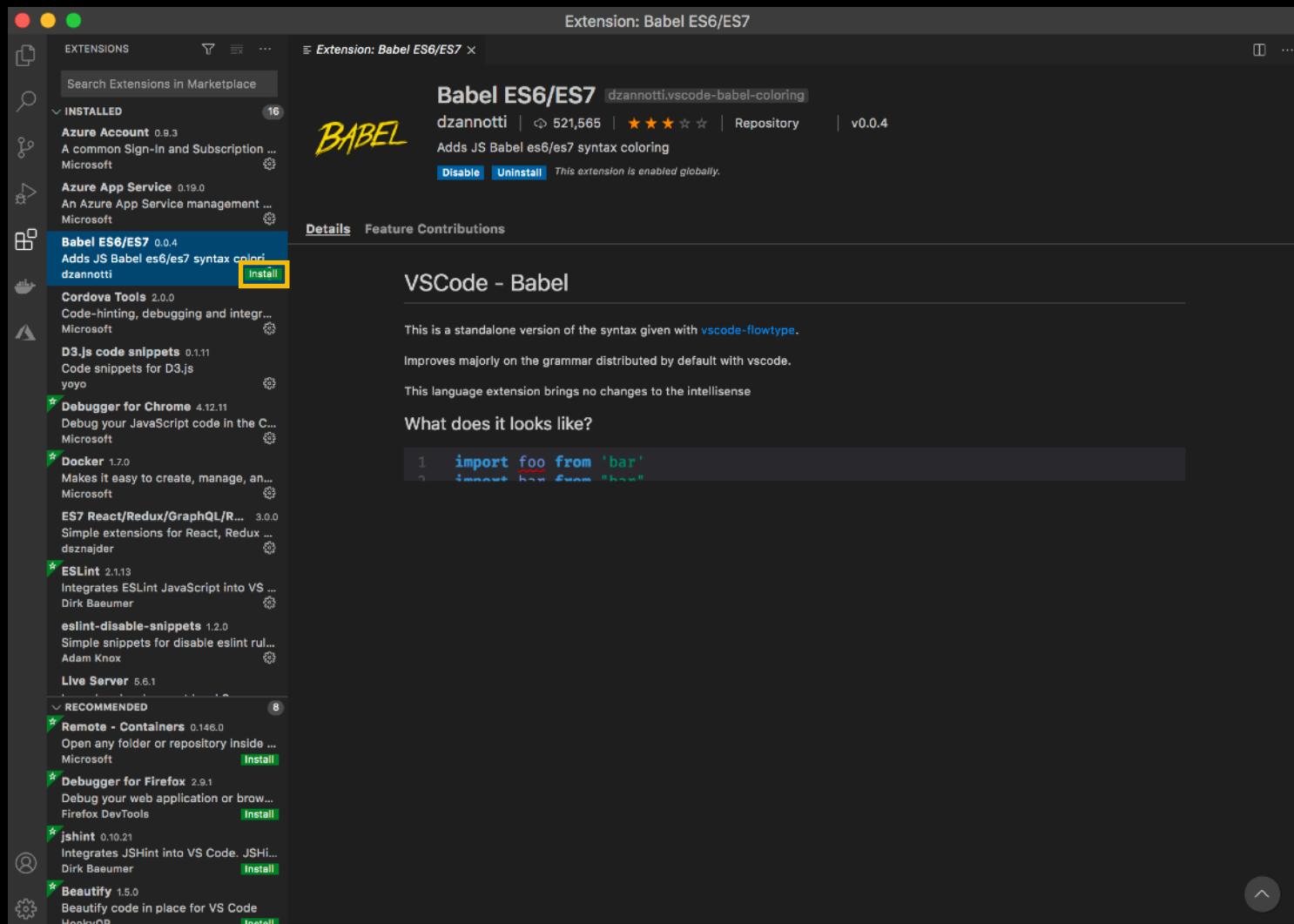
By using VS Code, you agree to its
[license](#) and [privacy statement](#).



<https://code.visualstudio.com/>

Adding plugins.





Free hosting of static website on Github.

1. Sign-up for a **Github** account (the free account)
2. Install **Github Desktop** and create a new repository
(You can treat the repository as a folder) by
creating a new folder associated with it.



Built for developers

GitHub is a development platform inspired by the way you work. From **open source to business**, you can host and review code, manage projects, and build software alongside 50 million developers.

<https://github.com>

Username

my_account_name

Email

bernard@cuhk.edu.hk

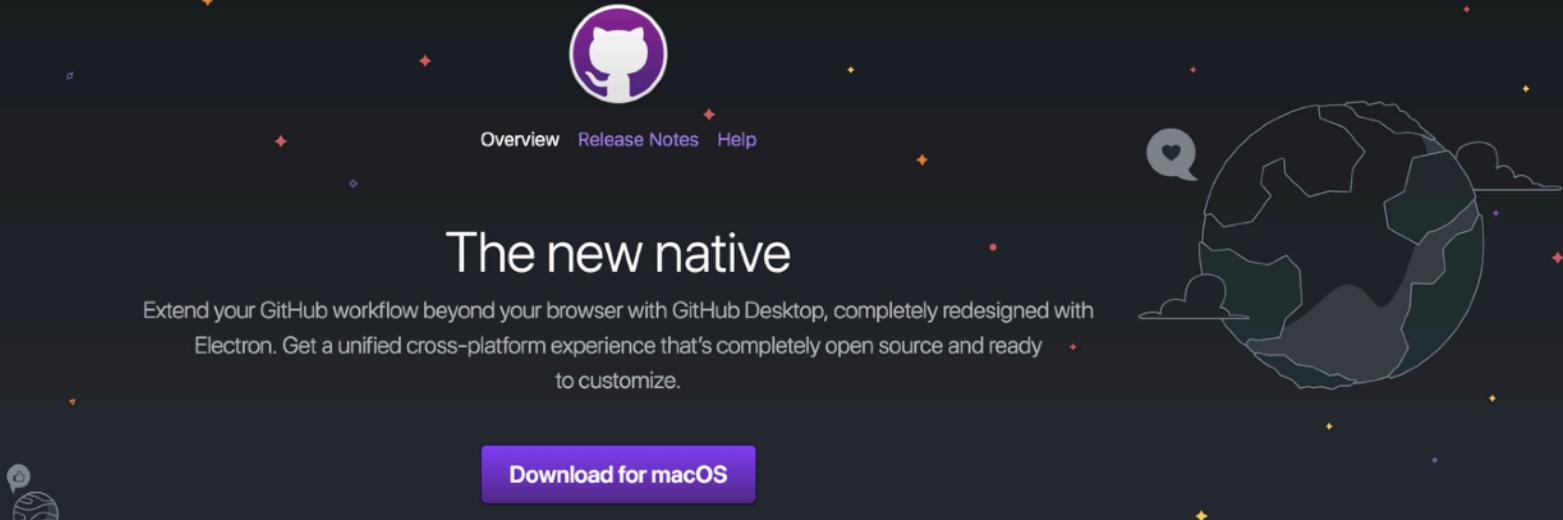
Password

Make sure it's at least 15 characters OR at least 8 characters including a number and a lowercase letter. [Learn more](#).

Sign up for GitHub

By clicking "Sign up for GitHub", you agree to our [Terms of Service](#) and [Privacy Statement](#). We'll occasionally send you account related emails.





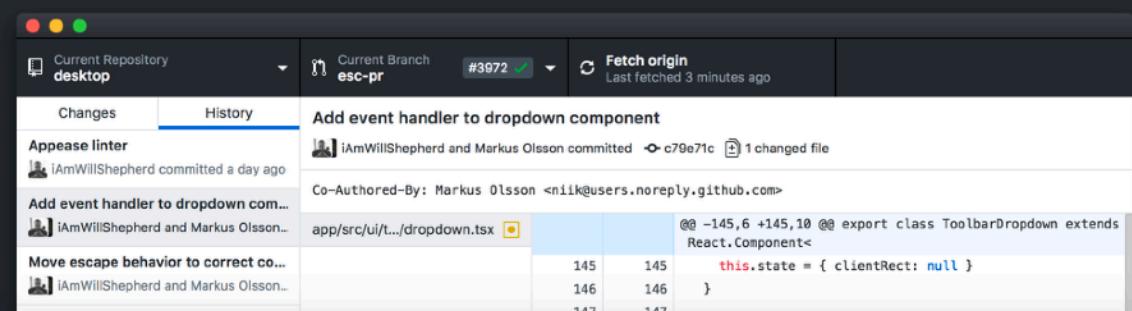
The new native

Extend your GitHub workflow beyond your browser with GitHub Desktop, completely redesigned with Electron. Get a unified cross-platform experience that's completely open source and ready to customize.

Download for macOS

Download for Windows

By downloading, you agree to the [Open Source Applications Terms](#).



A screenshot of the GitHub Desktop application window. The window title is "desktop". The top bar shows "Current Repository" set to "desktop", "Current Branch" set to "esc-pr", and "Fetch origin" with a status of "Last fetched 3 minutes ago". The main pane displays a pull request titled "Add event handler to dropdown component". The commit message is from "iAmWillShepherd and Markus Olsson committed a day ago" and includes "Co-Authored-By: Markus Olsson <nnik@users.noreply.github.com>". The code diff shows changes in "app/src/ui/t.../dropdown.tsx". The commit hash is "c79e71c". The code snippet shows:

```
@@ -145,6 +145,10 @@ export class ToolbarDropdown extends React.Component<
    this.state = { clientRect: null }
  }
}
```

<https://desktop.github.com/>

Current Repository
ybsuen.github.io

Current Branch
master

Fetch origin
Last fetched 11 hours ago

Filter

Add ▾ **Create New Repository...**

Clone Repository...
Create New Repository...
Add Existing Repository...

No local changes

There are no uncommitted changes in this repository. Here are some friendly suggestions for what to do next.



Open the repository in your external editor
Select your editor in Preferences

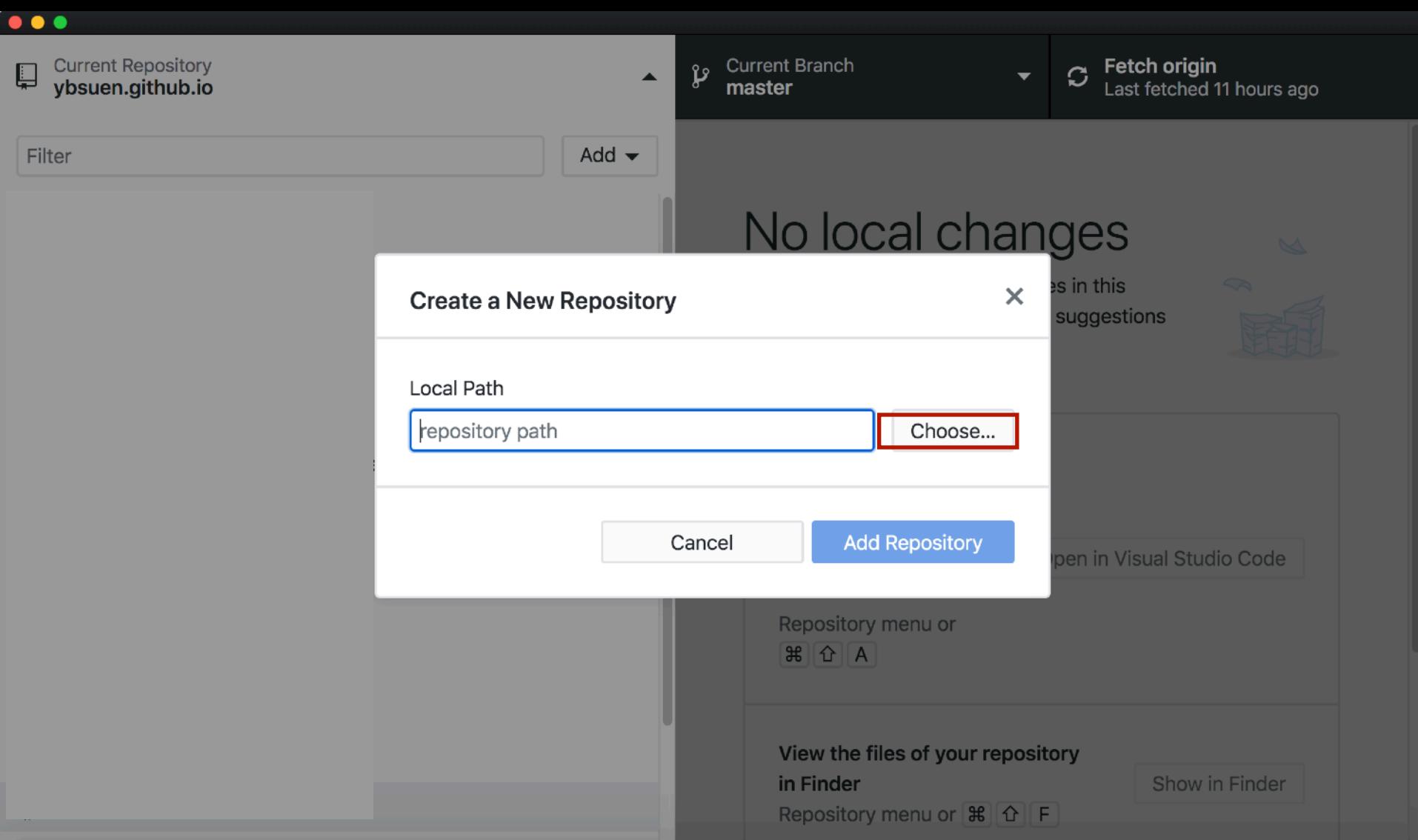
Open in Visual Studio Code

Repository menu or ⌘ ⌘ A

View the files of your repository in Finder

Show in Finder

Repository menu or ⌘ ⌘ F





Create a New Repository

Name

my_account_name.github.io

Description

Set up git hub web repository for website publishing

Local Path

/Users/yssuen/Documents

Choose...

Initialize this repository with a README

Git Ignore

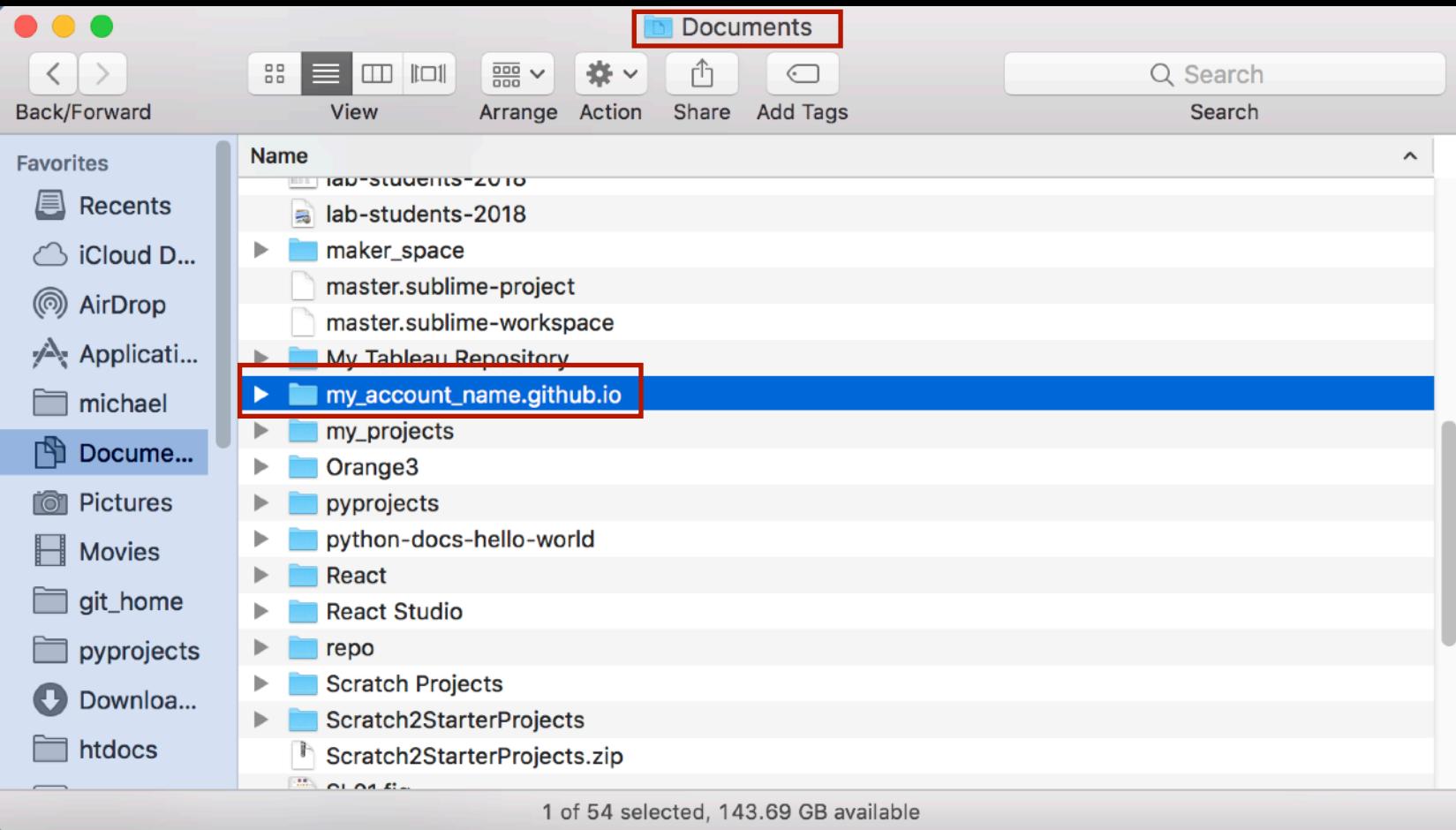
None

License

None

Cancel

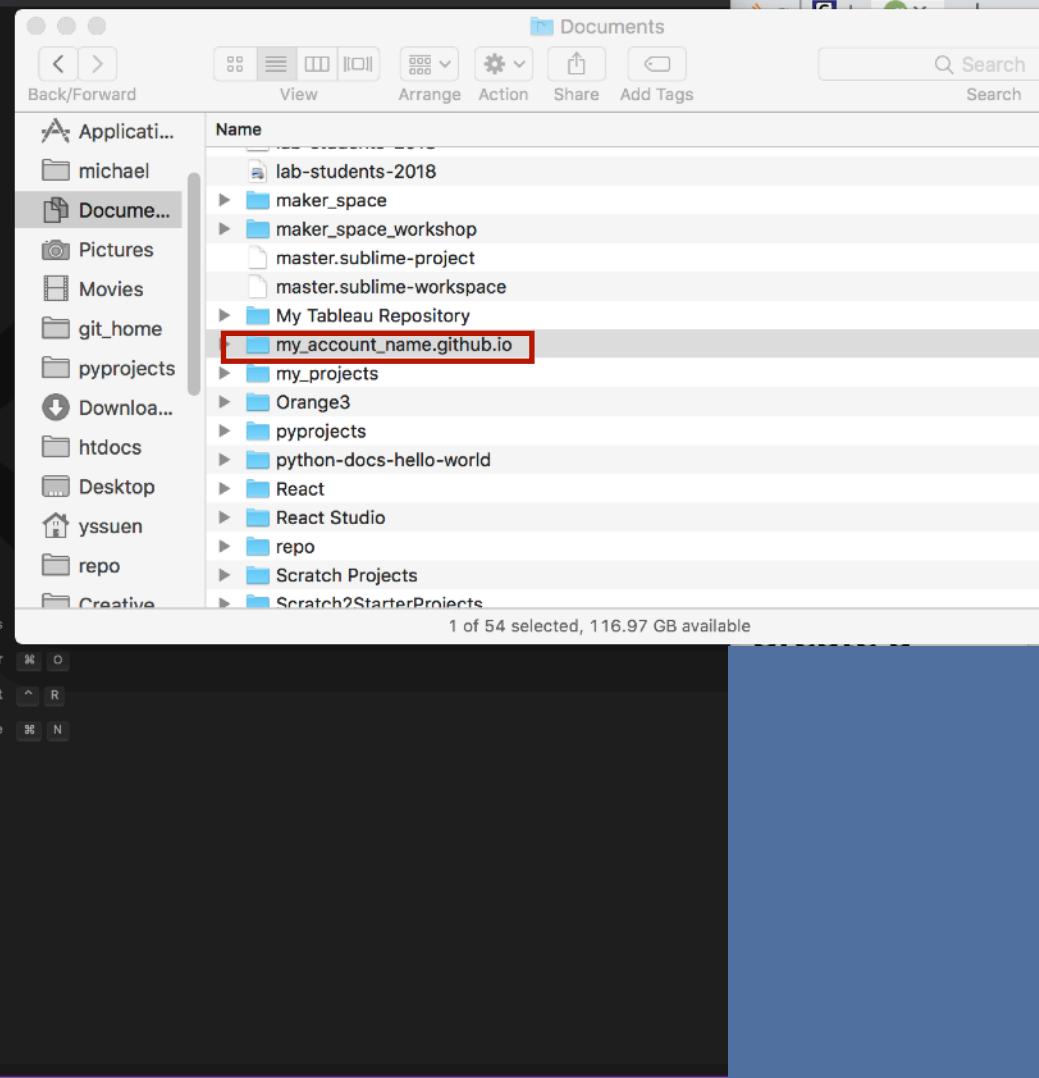
Create Repository

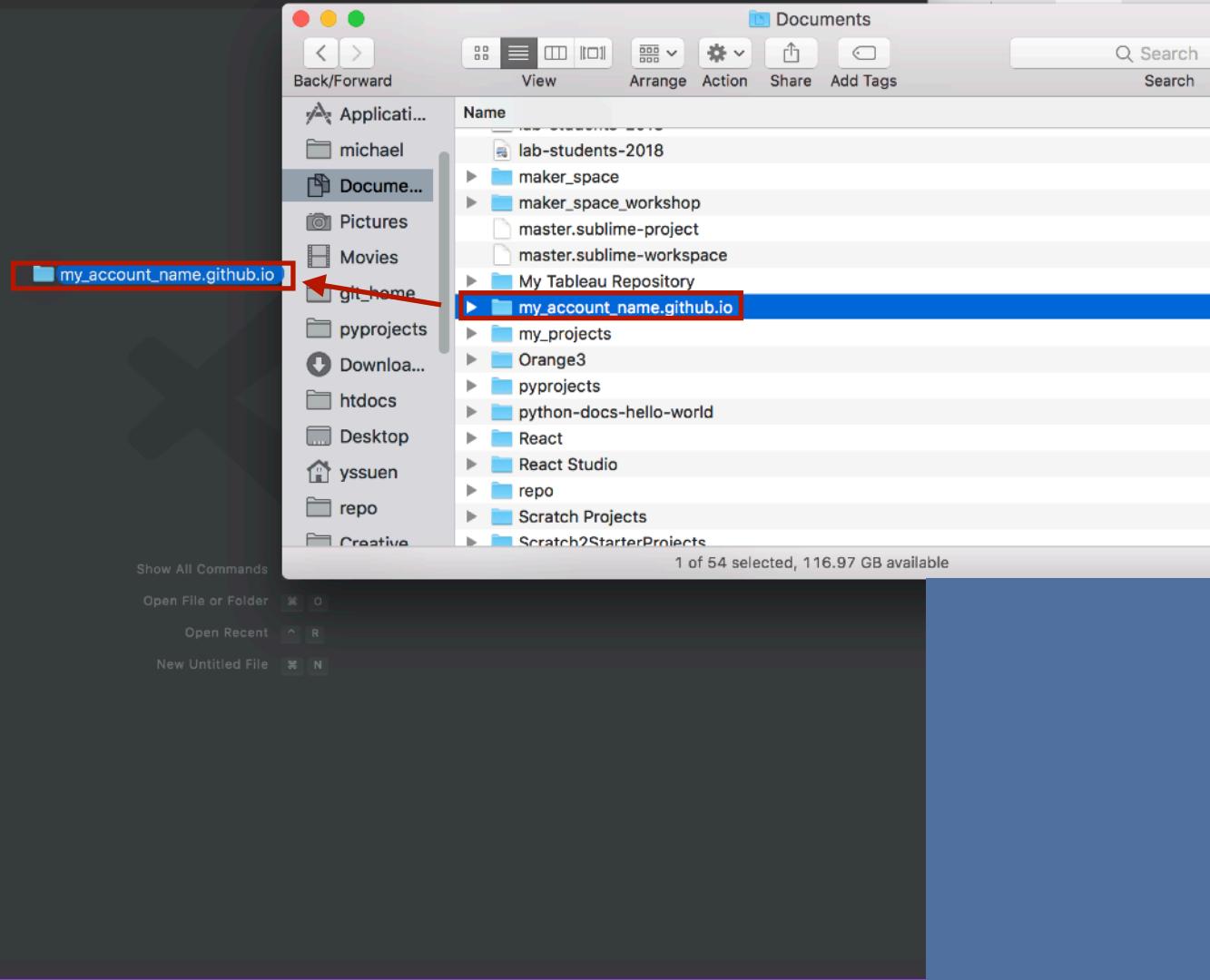


tm2.html

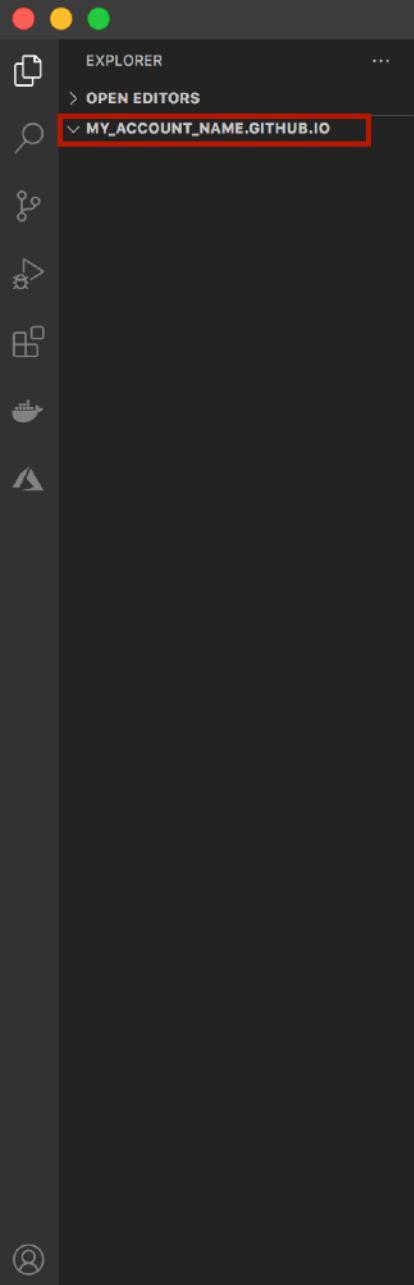


tm1.html





my_account_name.github.io



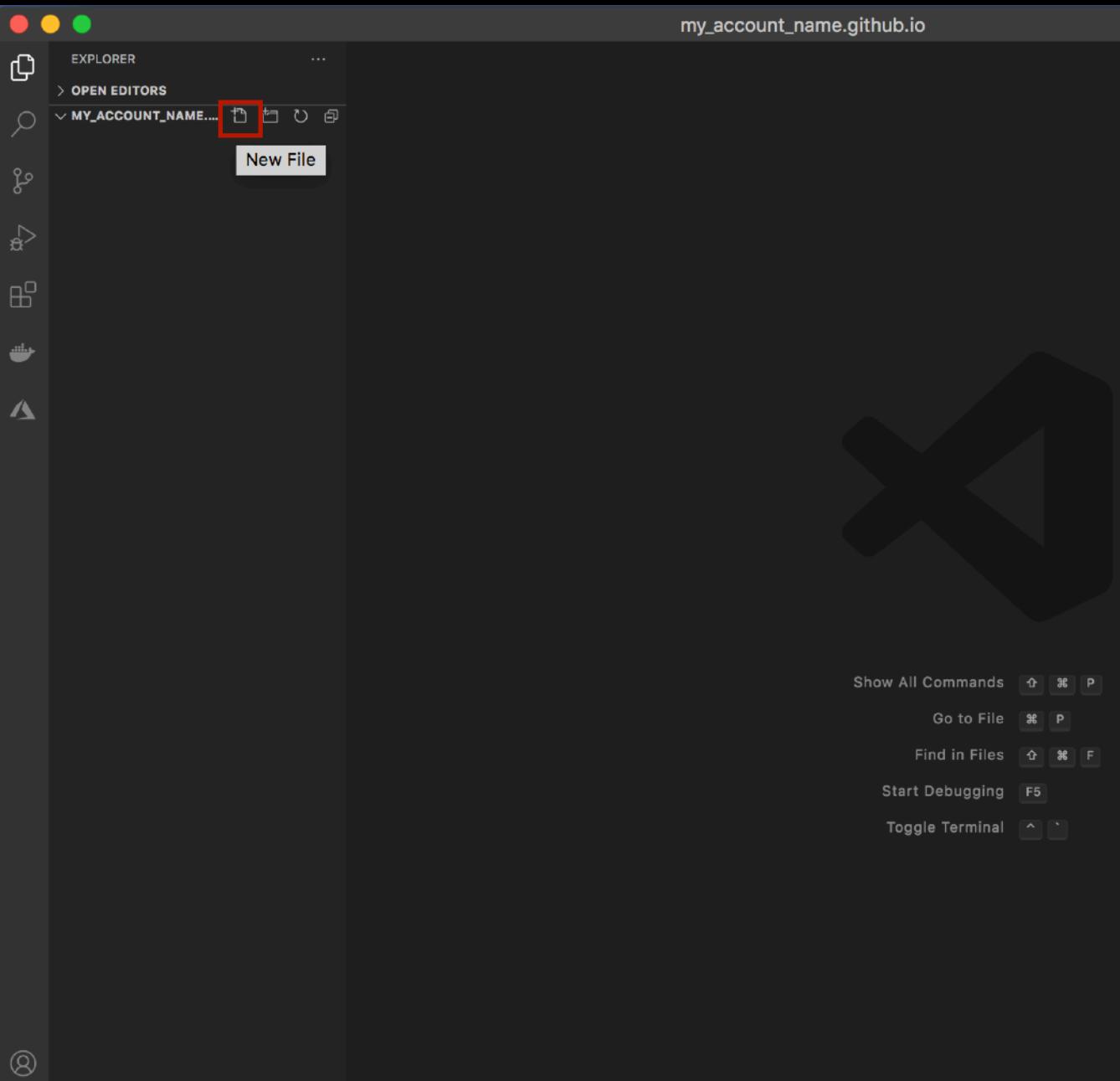
Show All Commands ⌘ ⌘ P

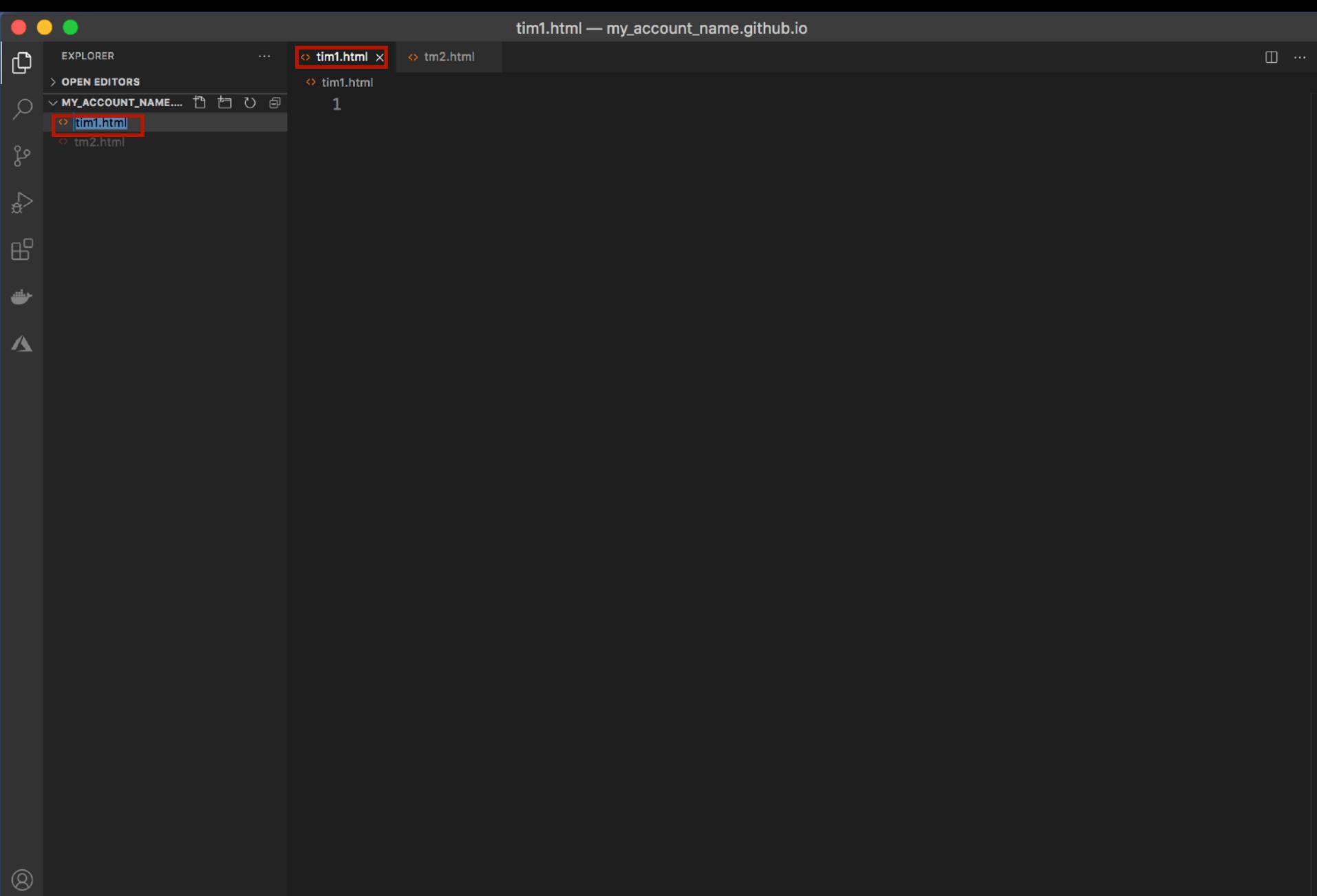
Go to File ⌘ P

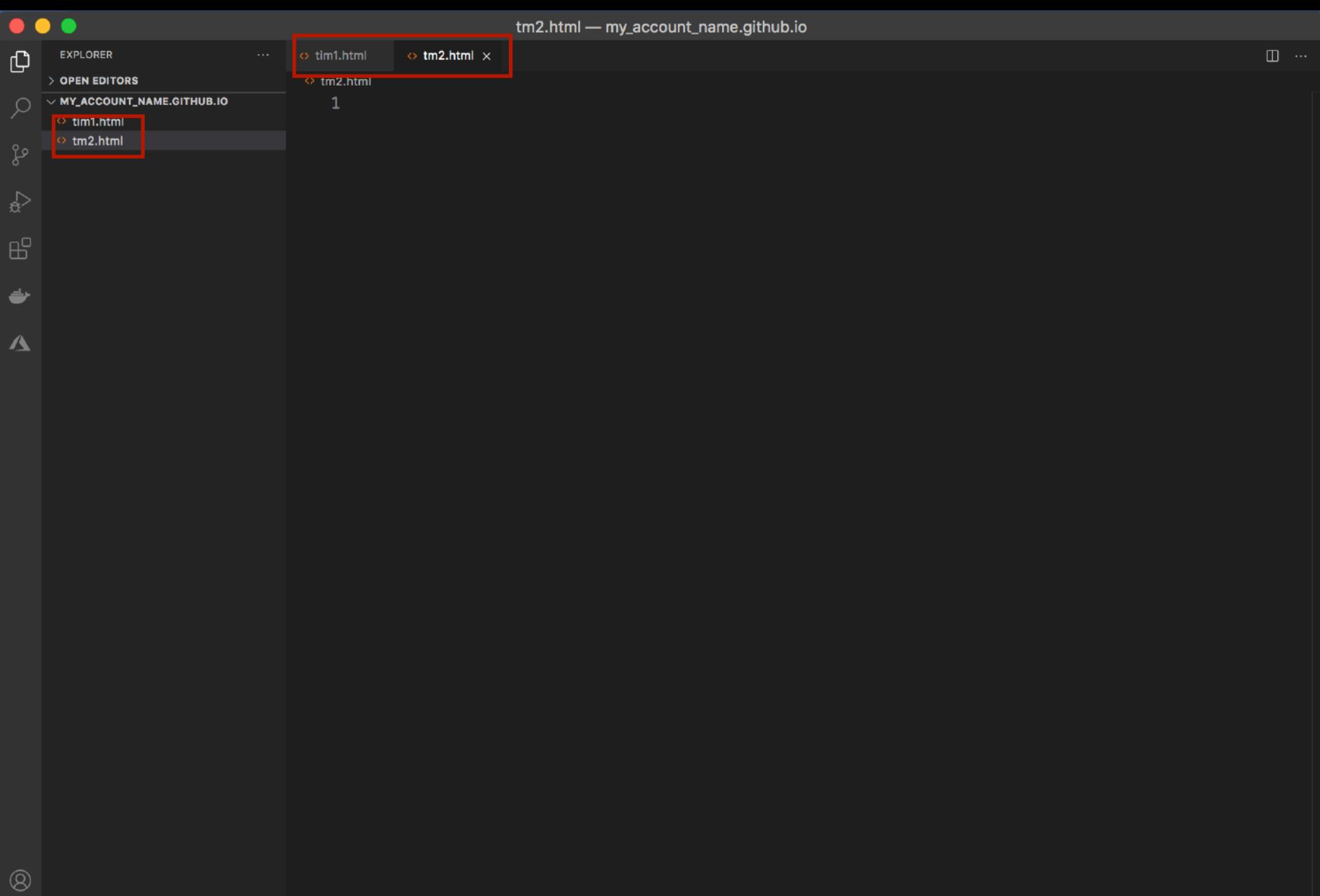
Find in Files ⌘ ⌘ F

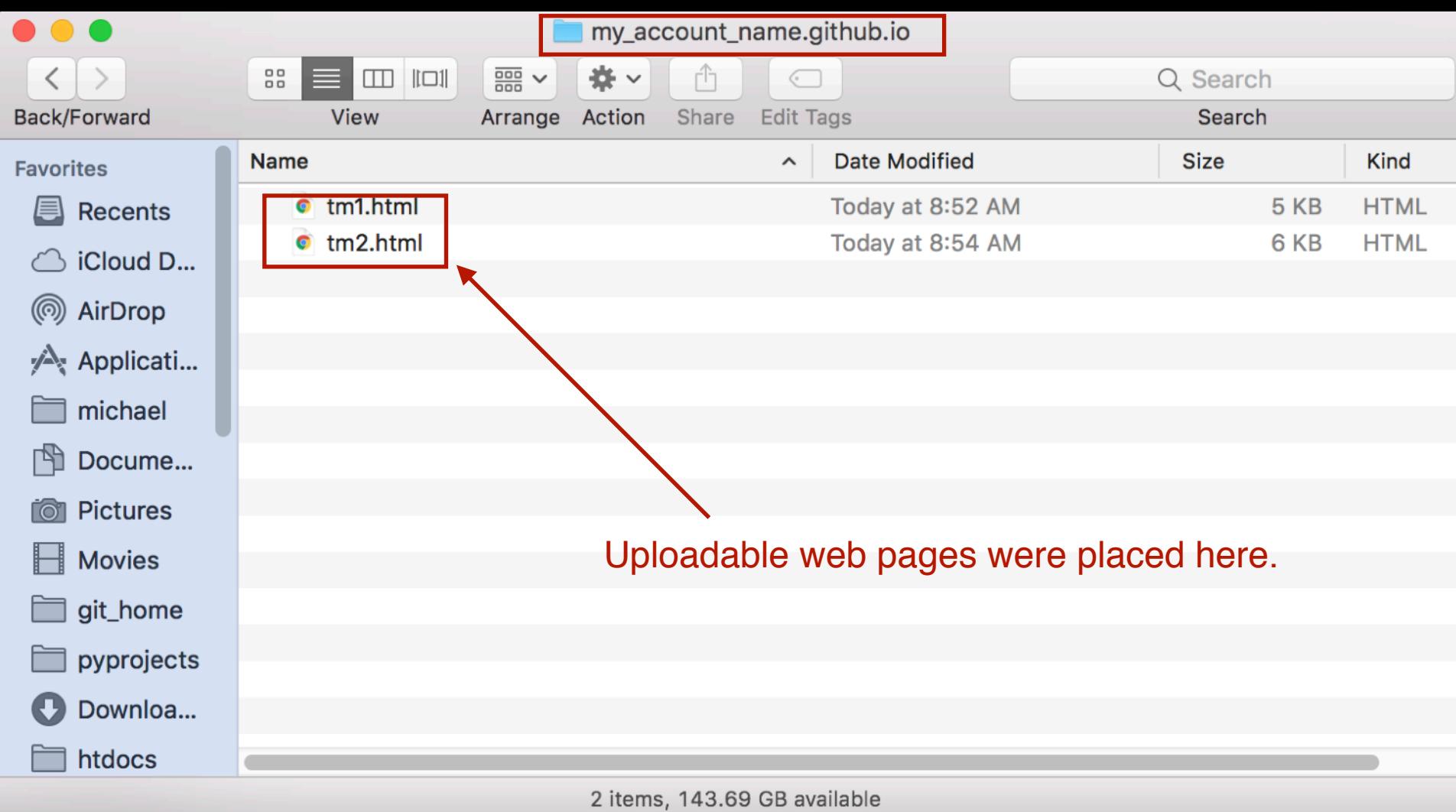
Start Debugging F5

Toggle Terminal ⌘ `









Current Repository
my_account_name.github.io

Current Branch
master

Publish repository
Publish this repository to GitHub

Changes 2

History

tm1.html

@@ -0,0 +1,111 @@

1
2
3
4
5
6
7
8
9
10
11
12
13
14

tm1.html

tm2.html

Summary (required)

Description

Commit to master

Committed just now

Initial commit

Undo

Current Repository my_account_name.github.io

Current Branch master

Publish repository Publish this repository to GitHub

Changes 2

History

tm1.html

2 changed files

tm1.html

tm2.html

SL Prepare repository for displaying ML and NLP demo.

Prepare repository for displaying ML and NLP demo.

Enter the topic and description, then press the “Commit to Master” button.

Commit to master

Committed a minute ago

Initial commit

Undo

1
2
3
4
5
6
7
8
9
10
11
12
13
14

@@ -0,0 +1,111 @@

Current Repository
my_account_name.github.io

Current Branch
master

Publish repository
Publish this repository to GitHub

Changes History

0 changed files

SL Summary (required)

Description

Commit to master

Committed just now
Prepare repository for displaying ML and NLP demo.

Undo

No local changes

There are no uncommitted changes in this repository. Here are some friendly suggestions for what to do next.

Publish your repository to GitHub

This repository is currently only available on your local machine. By publishing it on GitHub you can share it, and collaborate with others.

Always available in the toolbar for local repositories or ⌘ P

Press the “Publish repository” button to upload.

Open the repository

Current Repository my_account_name.github.io

Current Branch master

Publish repository Publish this repository to GitHub

Changes History

0 changes

SL Summary (required)

Description

Commit to master

Committed just now Prepare repository for displaying ML and NLP demo.

Undo

Open the repository

Publish Repository

Keep this code private

Uncheck the keep this code private button.

Cancel Publish Repository

for local repositories or ⌘ P

Current Repository my_account_name.github.io

Current Branch master

Publish repository Publish this repository to GitHub

Changes History

0 changes

SL Summary (required)

Description

Commit to master

Committed just now Prepare repository for displaying ML and NLP demo.

Undo

Open the repository

Publish Repository

GitHub.com GitHub Enterprise Server

Name my_account_name.github.io

Description

Keep this code private

Uncheck the keep this code private button and press “Publish Repository” to share.

Cancel Publish Repository

for local repositories or **⌘ P**

Publish repository



Search or jump to...

Pull requests Issues Marketplace Explore



Bernard Y S Suen

ybsuen

Life-long learner with a passion for interdisciplinary learning in advancing digital humanities.

Edit profile

58 followers · 0 following · 1 star

Chinese University of Hong Kong

Overview

Repositories 18

Projects

Packages

Find a repository...

Type: All

Language: All

New

my_account_name.github.io

HTML Updated 17 seconds ago

Star

ybsuen.github.io

Personal Website

Jupyter Notebook 6 MIT License Updated 2 days ago

Star



Learning-Garden

Learning Garden Repo

HTML Updated 10 days ago

Star



maker_space

Demo for CUHK Maker Space Workshop

Star



What does HTML stand for?

(H)yper (T)ext (M)arkup (L)anguage

(M)arkup is a collection of “tags”.

NOUN

HTML

<html>, <head>, <title>, <meta>, <style>, <script>, <body>, <header>, <footer>, <nav>, <main>, <section>, <aside>, <p>,
, <a>, , , , <table>, <div>, <form>

Elements
has
attributes

(e.g. color, background-color, position, font-family, font-size, font-style, display, width, margin, border, padding)

First hands-on exercise:

<https://www.wikihow.com/Create-a-Simple-Web-Page-with-HTML> (Part 1 to Part 5)

**Part
1**

Adding a Head to Your HTML

```
<!DOCTYPE html>
<html>
<head>
<title>wikihow</title>
</head>
```

Part
2

Adding a Body and Text to Your HTML

```
<!DOCTYPE html>
<html>
<head>
<title>wikihow</title>
</head>
<body>
<h1>How to create a webpage</h1>
<p> It's easy and fun</p>
```

Part
3

Adding Additional Elements to Your HTML

```
<!DOCTYPE html>
<html>
<head>
<title>wikihow</title>
</head>
<body>
<h1>How to create a webpage</h1>
<p> It's easy and fun</p>

```

Part
3

Adding Additional Elements to Your HTML

```
<!DOCTYPE html>
<html>
<head>
<title>wikihow</title>
</head>
<body>
<h1>How to create a webpage</h1>
<p> It's easy and fun</p>

<a href="https://www.facebook.com">Facebook</a>
<br>
```

Part
4

Customizing Colors

```
<!DOCTYPE html>
<html>
<head>
<title>wikihow</title>
</head>
<body style="background-color:lavender;">
<h1>How to create a webpage</h1>
<p> It's easy and fun</p>

<a href="https://www.facebook.com">Facebook</a>
<br>
```

**Part
5**

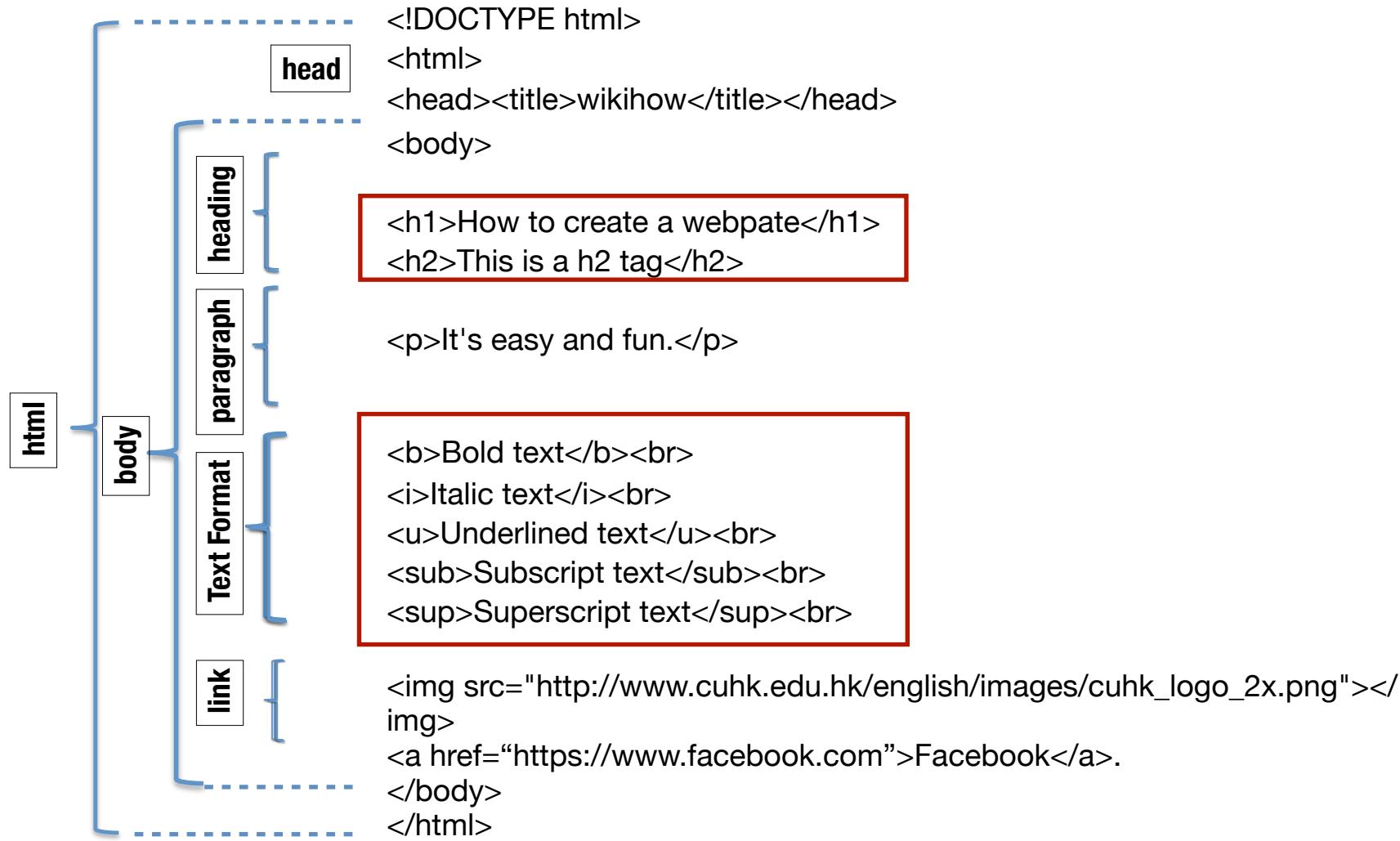
Closing Your HTML Document

```
<!DOCTYPE html>
<html>
<head>
<title>wikihow</title>
</head>
<body style="background-color:lavender;">
<h1>How to create a webpage</h1>
<p> It's easy and fun</p>

<a href="https://www.facebook.com">Facebook</a>
<br>
</body>
</html>
```

Congratulation. You created your first html page.
(example1.html). Now it's time to upload it to your
remote Github account space.

Headings and HTML Formatting Elements



Browser View

How to create a webpate

This is a h2 tag

It's easy and fun.

Bold text

Italic text

Underlined text

Subscript text

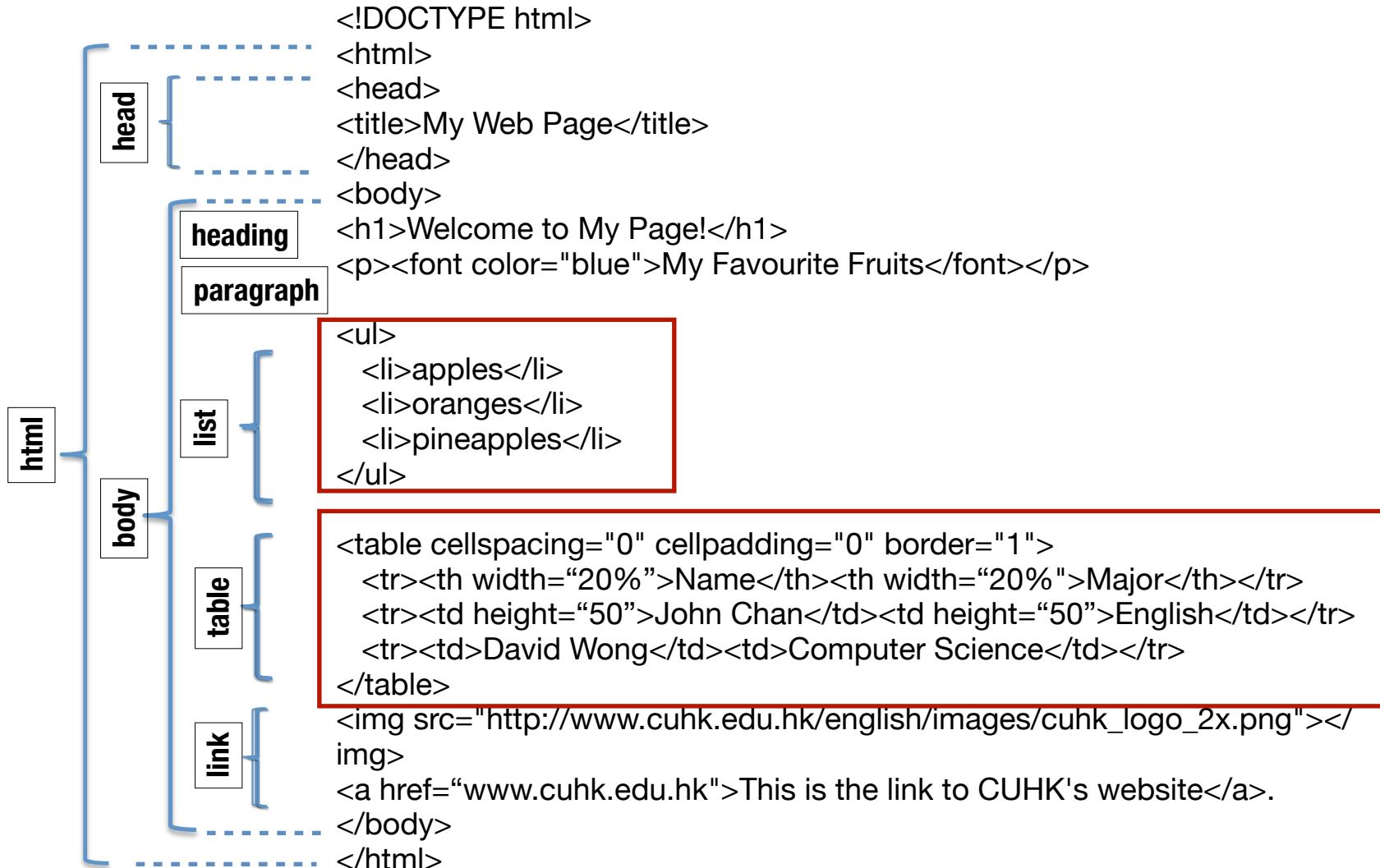
Superscript text



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[Facebook](#)

Lists and Tables



Browser View

Welcome to My Page!

My Favourite Fruits

- apples
- oranges
- pineapples

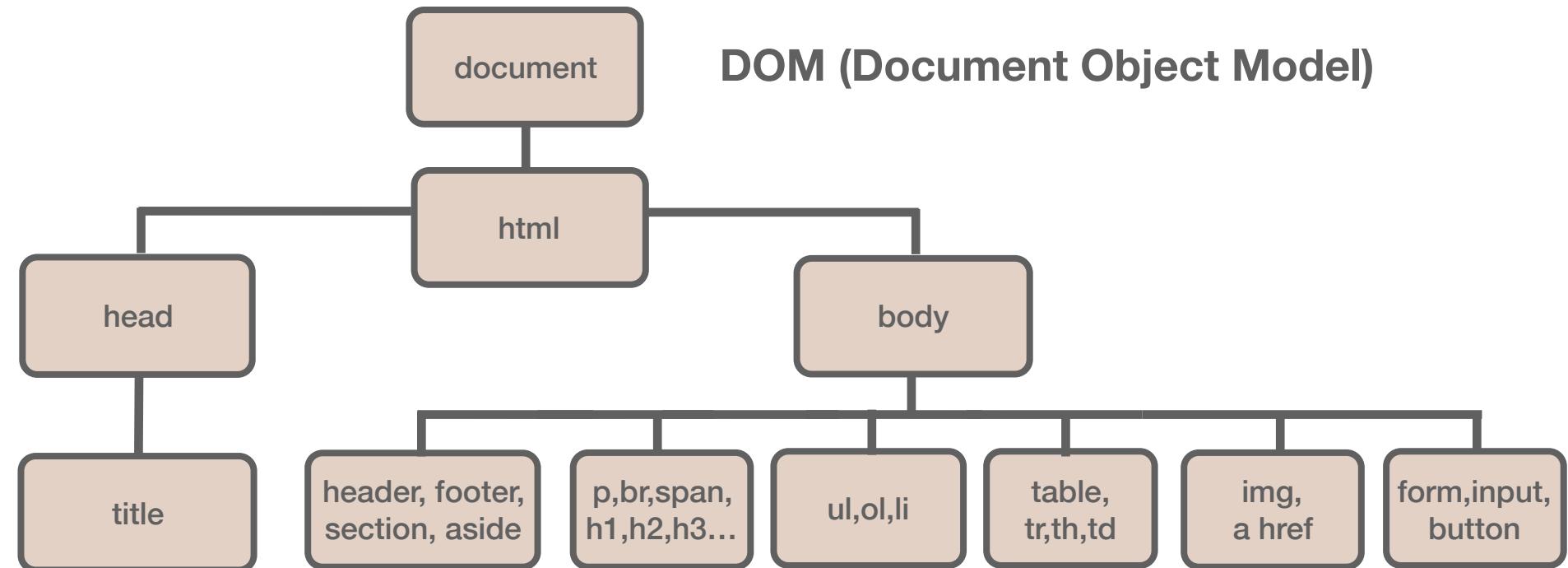
Name	Major
John Chan	English
David Wong	Computer Science



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[This is the link to CUHK's website.](#)

DOM (Document Object Model)



Decomposition

Break a problem down into smaller parts.

The **Grammar** of HTML Elements

- Start with **<>** tag (e.g. **<p>**).
- End with **</>** tag (e.g. **</p>**).
- Element content is everything.
between the start and end tags.
- Some elements have empty content
and no end tag (e.g. **
**).
- Most elements have attributes.

What does CSS stand for?

(C)ascading (S)tyle (S)heet

CSS Demonstration:

https://www.w3schools.com/css/css_intro.asp

CSS Demo - One HTML Page - Multiple Styles!

Here we will show one HTML page displayed with four different stylesheets. Click on the "Stylesheet 1", "Stylesheet 2", "Stylesheet 3", "Stylesheet 4" links below to see the different styles:

The screenshot shows a web page with the following structure:

- Header:** A green header bar containing the text "Welcome to My Homepage" in white and "Use the menu to select different Stylesheets" in a smaller font.
- Sidebar:** A vertical sidebar on the left side with a light gray background. It contains a list of links:
 - Stylesheet 1** (highlighted in green)
 - Stylesheet 2
 - Stylesheet 3
 - Stylesheet 4
 - No Stylesheet
- Main Content:** The main content area has a white background. It features large, bold, black text that reads "Same Page Different Stylesheets". Below this, there is explanatory text in black:

This is a demonstration of how different stylesheets can change the layout of your HTML page. You can change the layout of this page by selecting different stylesheets in the menu, or by selecting one of the following links:

[Stylesheet1](#), [Stylesheet2](#), [Stylesheet3](#),

Browser View

Welcome to My Page!

My name is Bob.

I hope you like it here.

This is my paragraph.

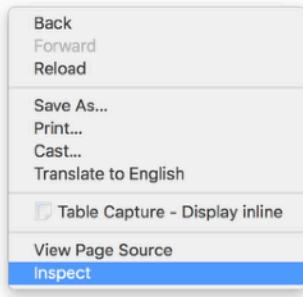
Whales are majestic creatures.



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[This is the link to CUHK's website.](#)

[Bold text](#) [Italic text](#) [Underlined text](#) [Subscript text](#) [Superscript text](#)



← Use right mouse click to trigger pop-up window

Browser View

Welcome to My Page!

My name is Bob.

I hope you like it here.

This is my paragraph.

Whales are majestic creatures.



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[Bold text](#) [Italic text](#) [Underlined text](#) [Subscript text](#) [Superscript text](#)

[This is the link to CUHK's website.](#)

The screenshot shows the Chrome DevTools interface with the 'Elements' tab selected. The left panel displays the HTML structure:

```
<!doctype html>
...<html> == $0
▶ <head>...
▶ <body>...
</html>
```

The right panel shows the 'Styles' tab of the element inspector for the `html` element. The computed styles include:

```
element.style {
}
html { user agent stylesheet
    display: block;
}
```

A specific element in the page is highlighted with a dashed box, and its style properties are shown in the bottom right of the inspector:

margin	-
border	-
padding	-
1679 x 351.500	
-	
-	

Browser View

Welcome to My Page!

My name is Bob.

I hope you like it here.

This is my paragraph.

Whales are majestic creatures.



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This is the link to CUHK's website.

Bold text Italic text Underlined text Subscript text Superscript text

Screenshot of a browser developer tools interface showing the Element tab and the Styles panel.

The Element tab displays the HTML structure:

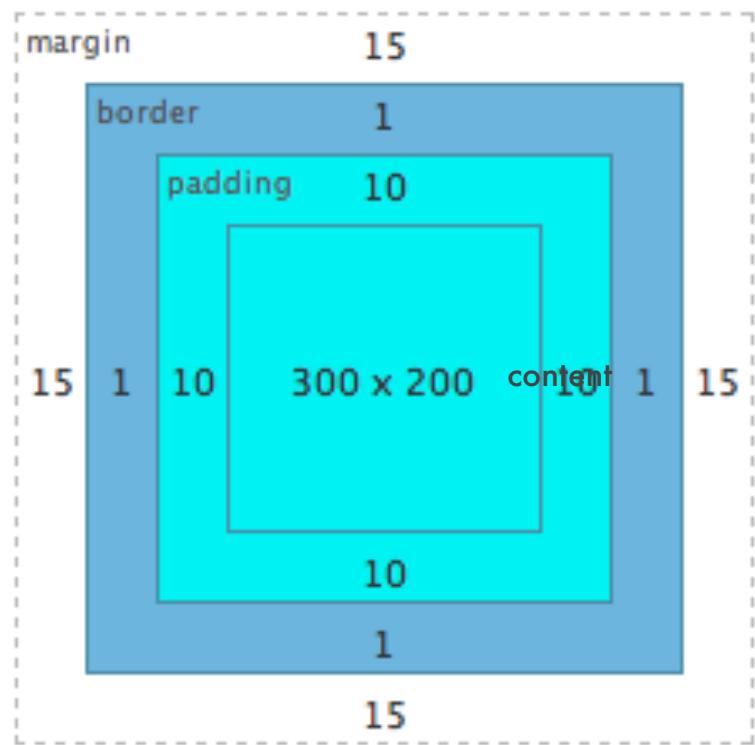
```
<!doctype html>
<html>
  <head>
    <title>My Web Page</title>
  </head>
  <body>
    <h1 style="background-color: #CA4D4C; color: #fefdff; ">Welcome to My Page!</h1>
    <h2 style="border-style: solid; border-width: 1px;">My name is Bob.</h2> == $0
    <h3>I hope you like it here.</h3>
    <p>This is my paragraph.</p>
    ><p>...</p>
    <b>Bold text</b>
    <i>Italic text</i>
  </body>
</html>
```

The Styles panel shows the CSS rules applied to the page:

```
element.style {
  border-style: solid;
  border-width: 1px;
}

h2 {
  user agent stylesheet
  display: block;
  font-size: 1.5em;
  -webkit-margin-before: 0.83em;
  -webkit-margin-after: 0.83em;
  -webkit-margin-start: 0px;
  -webkit-margin-end: 0px;
  font-weight: bold;
}
```

The Box Model



Third hands-on exercise:

<https://www.w3.org/Style/Examples/011/firstcss.en.html>

STEP I: WRITING THE HTML

For this tutorial, I suggest you use only the very simplest of tools. E.g., Notepad (under Windows),TextEdit (on the Mac) or KEdit (under KDE) will do fine. Once you understand the principles, you may want to switch to more advanced tools, or even to commercial programs, such as Style Master, Dreamweaver or GoLive. But for your very first CSS style sheet, it is good not to be distracted by too many advanced features.

Don't use a wordprocessor, such as Microsoft Word or OpenOffice. They typically make files that a Web browser cannot read. For HTML and CSS, we want simple, plain text files.

Step I is to open your text editor (Notepad,TextEdit, KEdit, or whatever is your favorite), start with an empty window and type the following:

```
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01//EN">
<html>
<head>
  <title>My first styled page</title>
</head>
```

Local links

1.The HTML

2.Adding color

3.Adding fonts

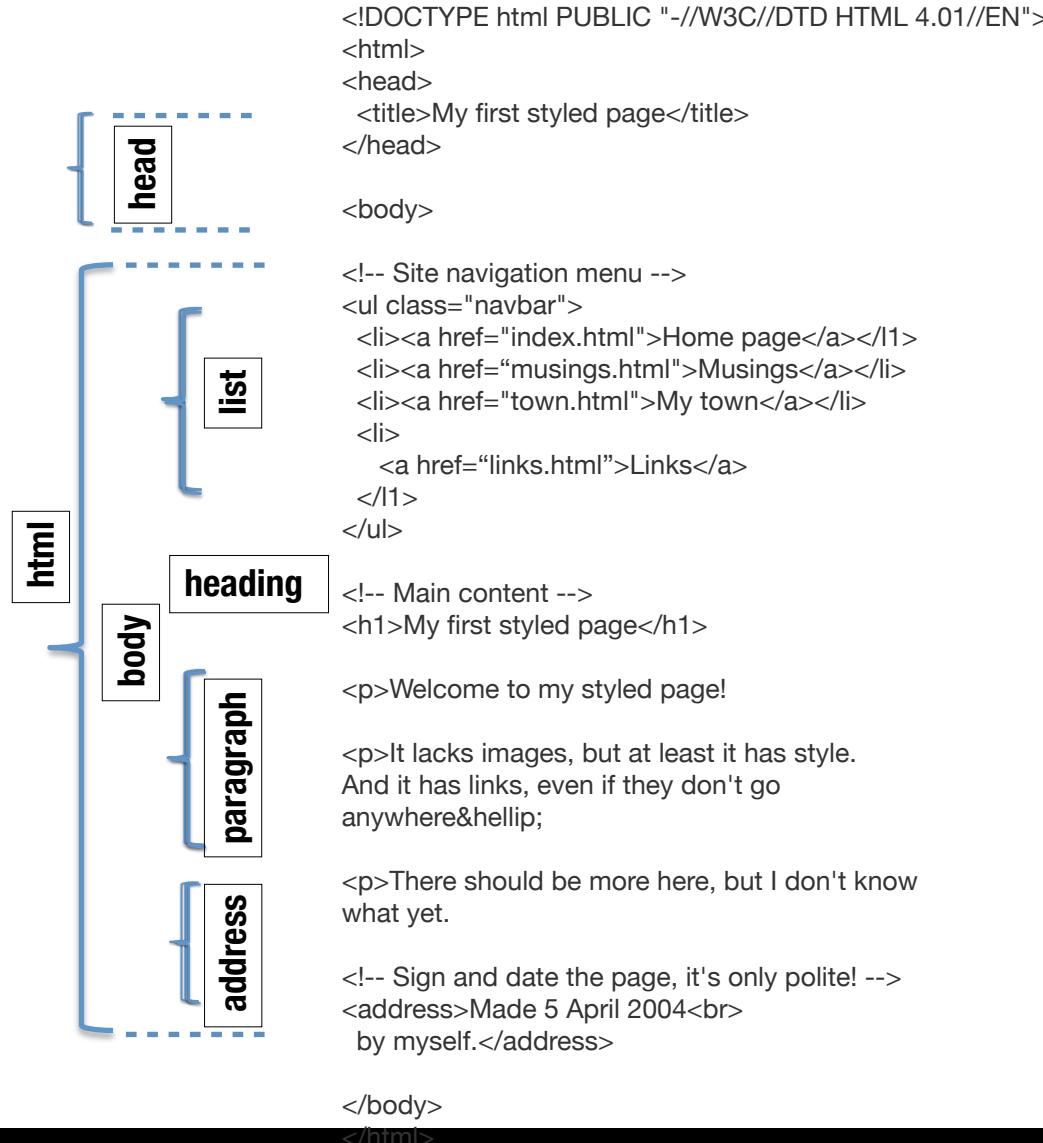
4.A navigation bar

5. Styling links

6. Horizontal line

7. External CSS

Further reading



```
<body>
<!-- Site navigation menu -->
<ul class="navbar">
  <li><a href="index.html">Home page</a>
  <li><a href="musings.html">Musings</a>
  <li><a href="town.html">My town</a>
  <li><a href="links.html">Links</a>
</ul>
<!-- Main content -->
<h1 style="
  border-style: solid;
  border-width: 7px;
  padding: 20px;
  text-align: center;
  color: black;
  width: 50%;">
  >My first styled page</h1>
<p>Welcome to my styled page!
<p>It lacks images, but at least it has style.
And it has links, even if they don't go
anywhere&hellip;
<p>There should be more here, but I don't know
what yet.
<!-- Sign and date the page, it's only polite! -->
<address>Made 5 April 2004<br>
  by myself.</address>
</body>
</html>
```

In-line style definition

- [Home page](#)
- [Musings](#)
- [My town](#)
- [Links](#)

My first styled page

Welcome to my styled page!

It lacks images, but at least it has style. And it has links, even if they don't go anywhere...

There should be more here, but I don't know what yet.

*Made 5 April 2004
by myself.*

```
<head><title>Example 3</title>
<style type="text/css">
border-style: solid;
border-width: 7px;
padding: 20px;
text-align: center;
color: black;
width: 50%;</style>
</head>
<body>
<!-- Site navigation menu --&gt;
&lt;ul class="navbar"&gt;
&lt;li&gt;&lt;a href="index.html"&gt;Home page&lt;/a&gt;
&lt;li&gt;&lt;a href="musings.html"&gt;Musings&lt;/a&gt;
&lt;li&gt;&lt;a href="town.html"&gt;My town&lt;/a&gt;
&lt;li&gt;&lt;a href="links.html"&gt;Links&lt;/a&gt;
&lt;/ul&gt;
<!-- Main content --&gt;
&lt;h1&gt;My first styled page&lt;/h1&gt;
&lt;p&gt;Welcome to my styled page!
&lt;p&gt;It lacks images, but at least it has style.
And it has links, even if they don't go anywhere&amp;hellip;
&lt;p&gt;There should be more here, but I don't know what yet.
&lt!-- Sign and date the page, it's only polite! --&gt;
&lt;address&gt;Made 5 April 2004&lt;br&gt;by myself.&lt;/address&gt;
&lt;/body&gt;
&lt;/html&gt;</pre>
```

Internal style-sheet definition

Put the Internal Style Definition into an External File

```
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01//EN">
<html>
<head>
  <title>My first styled page</title>
  <link rel="stylesheet" type="text/css" href="style.css">
</head>
<body>
  <!-- Site navigation menu -->
  <ul class="navbar">
    <li><a href="index.html">Home page</a>
    <li><a href="musings.html">Musings</a>
    <li><a href="town.html">My town</a>
    <li><a href="links.html">Links</a>
  </ul>
  <!-- Main content -->
  <h1>My first styled page</h1>
  <p>Welcome to my styled page!
  <p>It lacks images, but at least it has style.
  And it has links, even if they don't go
  anywhere&hellip;
  <p>There should be more here, but I don't know what yet.
  <!-- Sign and date the page, it's only polite! -->
  <address>Made 5 April 2004<br> by myself.</address>
</body>
</html>
```

External style definition

3 Ways of Style Definition + Cascading Rule

- **Inline style definition (Highest priority)**
- **Internal style definition (Middle priority)**
- **External style definition (Lowest priority)**
- **Style defined last has priority over style defined earlier**

STEP I: WRITING THE HTML

For this tutorial, I suggest you use only the very simplest of tools. E.g., Notepad (under Windows),TextEdit (on the Mac) or KEdit (under KDE) will do fine. Once you understand the principles, you may want to switch to more advanced tools, or even to commercial programs, such as Style Master, Dreamweaver or GoLive. But for your very first CSS style sheet, it is good not to be distracted by too many advanced features.

Don't use a wordprocessor, such as Microsoft Word or OpenOffice. They typically make files that a Web browser cannot read. For HTML and CSS, we want simple, plain text files.

Step I is to open your text editor (Notepad,TextEdit, KEdit, or whatever is your favorite), start with an empty window and type the following:

```
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01//EN">
<html>
<head>
  <title>My first styled page</title>
</head>
```

Local links

1.The HTML

2.Adding color

3.Adding fonts

4.A navigation bar

5. Styling links

6. Horizontal line

7. External CSS

Further reading

Local links

1.The HTML

2.Adding color

3.Adding fonts

4.A navigation bar

5. Styling links

6. Horizontal line

7. External CSS

Further reading

```
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01//EN">
<html>
<head>
  <title>My first styled page</title>
</head>

<body>

  <!-- Site navigation menu -->
  <ul class="navbar">
    <li><a href="index.html">Home page</a>
    <li><a href="musings.html">Musings</a>
    <li><a href="town.html">My town</a>
    <li><a href="links.html">Links</a>
  </ul>

  <!-- Main content -->
  <h1>My first styled page</h1>

  <p>Welcome to my styled page!

  <p>It lacks images, but at least it has style.
  And it has links, even if they don't go
  anywhere&hellip;

  <p>There should be more here, but I don't know
  what yet.

  <!-- Sign and date the page, it's only polite! -->
  <address>Made 5 April 2004<br>
    by myself.</address>

</body>
</html>
```

STEP 2: ADDING SOME COLORS

You probably see some black text on a white background, but it depends on how the browser is configured. So one easy thing we can do to make the page more stylish is to add some colors. (Leave the browser open, we will use it again later.)

We will start with a style sheet embedded inside the HTML file. Later, we will put the HTML and the CSS in separate files. Separate files is good, since it makes it easier to use the same style sheet for multiple HTML files: you only have to write the style sheet once. But for this step, we just keep everything in one file.

We need to add a `<style>` element to the HTML file. The style sheet will be inside that element. So go back to the editor window and add the following five lines in the head part of the HTML file. The lines to add are shown in red.

```
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01//EN">
<html>
<head>
  <title>My first styled page</title>
  <style type="text/css">
    body {
      color: purple;
      background-color: #d8da3d }
  </style>
</head>

<body>
[etc.]
```

Local links

[1.The HTML](#)

[2.Adding color](#)

[3.Adding fonts](#)

[4.A navigation bar](#)

[5.Styling links](#)

[6.Horizontal line](#)

[7.External CSS](#)

[Further reading](#)

- [Home page](#)
- [Musings](#)
- [My town](#)
- [Links](#)

My first styled page

Welcome to my styled page!

It lacks images, but at least it has style. And it has links, even if they don't go anywhere...

There should be more here, but I don't know what yet.

*Made 5 April 2004
by myself.*

STEP 3: ADDING FONTS

Another thing that is easy to do is to make some distinction in the fonts for the various elements of the page. So let's set the text in the "Georgia" font, except for the h1 heading, which we'll give "Helvetica."

On the Web, you can never be sure what fonts your readers have on their computers, so we add some alternatives as well: if Georgia is not available, Times New Roman or Times are also fine, and if all else fails, the browser may use any other font with [serifs](#). If Helvetica is absent, Geneva, Arial and SunSans-Regular are quite similar in shape, and if none of these work, the browser can choose any other font that is serif-less.

In the text editor add the following lines:

```
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01//EN">
<html>
<head>
  <title>My first styled page</title>
  <style type="text/css">
    body {
      font-family: Georgia, "Times New Roman",
                  Times, serif;
      color: purple;
      background-color: #d8da3d }
    h1 {
      font-family: Helvetica, Geneva, Arial,
                  SunSans-Regular, sans-serif }
  </style>
</head>

<body>
[etc.]
```

Local links

1. The HTML
 2. Adding color
 3. Adding fonts
 4. A navigation bar
 5. Styling links
 6. Horizontal line
 7. External CSS
- Further reading

- [Home page](#)
- [Musings](#)
- [My town](#)
- [Links](#)

My first styled page

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There should be more here, but I don't know what yet.

*Made 5 April 2004
by myself.*

Local links

1.The HTML

2.Adding color

3.Adding fonts

4.A navigation bar

5.Styling links

6.Horizontal line

7.External CSS

Further reading

STEP 4: ADDING A NAVIGATION BAR

The list at the top of the HTML page is meant to become a navigation menu. Many Web sites have some sort of menu along the top or on the side of the page and this page should have one as well. We will put it on the left side, because that is a little more interesting than at the top...

The menu is already in the HTML page. It is the `` list at the top. The links in it don't work, since our "Web site" so far consists of only one page, but that doesn't matter now. On a real Web site, there should not be any broken links, of course.

So we need to move the list to the left and move the rest of the text a little to the right, to make room for it. The CSS properties we use for that are 'padding-left' (to move the body text) and 'position', 'left' and 'top' (to move the menu).

There are other ways to do it. If you look for "column" or "layout" on the [Learning CSS](#) page, you will find several ready-to-run templates. But this one is OK for our purposes.

In the editor window, add the following lines to the HTML file:

```
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01//EN">
<html>
<head>
<title>My first styled page</title>
<style type="text/css">
body {
    padding-left: 11em;
    font-family: Georgia, "Times New Roman",
        Times, serif;
    color: purple;
    background-color: #d8da3d }
ul.navbar {
    position: absolute;
    top: 2em;
    left: 1em;
    width: 9em }
```

```
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01//EN">
<html>
<head>
<title>My first styled page</title>
<style type="text/css">
body {
    color: purple;
    background-color: #d8da3d }
ul.navbar {
    position: absolute;
    top: 2em;
    left: 1em;
    width: 9em }
h1 {
    font-family: Helvetica, Geneva, Arial,
    SunSans-Regular, sans-serif }
</style>
</head>
<body>
<!-- Site navigation menu --&gt;
&lt;ul class="navbar"&gt;
    &lt;li&gt;&lt;a href="index.html"&gt;Home page&lt;/a&gt;
    &lt;li&gt;&lt;a href="musings.html"&gt;Musings&lt;/a&gt;
    &lt;li&gt;&lt;a href="town.html"&gt;My town&lt;/a&gt;
    &lt;li&gt;&lt;a href="links.html"&gt;Links&lt;/a&gt;
&lt;/ul&gt;
<!-- Main content --&gt;
:
:</pre>
```

Code View - Step 4 (Add navbar)

- [Home page](#)
- [Musings](#)
- [My town](#)
- [Links](#)

My first styled page

Welcome to my styled page!

It lacks images, but at least it has style. And it has links, even if they don't go anywhere...

There should be more here, but I don't know what yet.

*Made 5 April 2004
by myself.*

STEP 5: STYLING THE LINKS

```
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01//EN">
<html>
<head>
<title>My first styled page</title>
<style type="text/css">
body {
  padding-left: 1em;
  font-family: Georgia, "Times New Roman",
    Times, serif;
  color: purple;
  background-color: #d8da3d }
ul.navbar {
  list-style-type: none;
  padding: 0;
  margin: 0;
  position: absolute;
  top: 2em;
  left: 1em;
  width: 9em }
h1 {
  font-family: Helvetica, Geneva, Arial,
    SunSans-Regular, sans-serif }
ul.navbar li {
  background: white;
  margin: 0.5em 0;
  padding: 0.3em;
  border-right: 1em solid black }
ul.navbar a {
  text-decoration: none }
a:link {
  color: blue }
a:visited {
  color: purple }
</style>
```

1.The HTML

2.Adding color

3.Adding fonts

4.A navigation bar

5. Styling links

6. Horizontal line

7.External CSS

Further reading

Home page

My first styled page

Musings

Welcome to my styled page!

My town

It lacks images, but at least it has style. And it has links, even if they don't go anywhere...

Links

There should be more here, but I don't know what yet.

*Made 5 April 2004
by myself.*

Local links

1.The HTML

2.Adding color

3.Adding fonts

4.A navigation bar

5.Styling links

6.Horizontal line

7.External CSS

Further reading

STEP 6: ADDING A HORIZONTAL LINE

The final addition to the style sheet is a horizontal rule to separate the text from the signature at the bottom. We will use 'border-top' to add a dotted line above the <address> element:

```
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01//EN">
  h1 {
    font-family: Helvetica, Geneva, Arial,
    SunSans-Regular, sans-serif }
  ul.navbar li {
    background: white;
    margin: 0.5em 0;
    padding: 0.3em;
    border-right: 1em solid black }
  ul.navbar a {
    text-decoration: none }
  a:link {
    color: blue }
  a:visited {
    color: purple }
  address {
    margin-top: 1em;
    padding-top: 1em;
    border-top: thin dotted }
</style>
</head>

<body>
[etc.]
```

Home page

Musings

My town

Links

My first styled page

Welcome to my styled page!

It lacks images, but at least it has style. And it has links, even if they don't go anywhere...

There should be more here, but I don't know what yet.

*Made 5 April 2004
by myself.*

STEP 7: PUTTING THE STYLE SHEET IN A SEPARATE FILE

We now have an HTML file with an embedded style sheet. But if our site grows we probably want many pages to share the same style. There is a better method than copying the style sheet into every page: if we put the style sheet in a separate file, all pages can point to it.

To make a style sheet file, we need to create another empty text file. You can choose "New" from the File menu in the editor, to create an empty window. (If you are usingTextEdit, don't forget to make it plain text again, using the Format menu.)

Then cut and paste everything that is inside the `<style>` element from the HTML file into the new window. Don't copy the `<style>` and `</style>` themselves. They belong to HTML, not to CSS. In the new editor window, you should now have the complete style sheet:

```
<!DOCTYPE html PUBLIC "-//W3C//DTD HTML 4.01//EN">
<html>
<head>
  <title>My first styled page</title>
  <link rel="stylesheet" href="mystyle.css">
</head>

<body>
[etc.]
```

Local links

[1.The HTML](#)

[2.Adding color](#)

[3.Adding fonts](#)

[4.A navigation bar](#)

[5.Styling links](#)

[6.Horizontal line](#)

[7.External CSS](#)

[Further reading](#)

Base
Selector

ADJECTIVE

CSS

Declaration

Declaration

body

{ color:purple; font-size:12px; }

Property

Value

Property

Value

Pattern

Discover similarities between things.

Base
Selector

ADJECTIVE

CSS

Declaration

Declaration

body

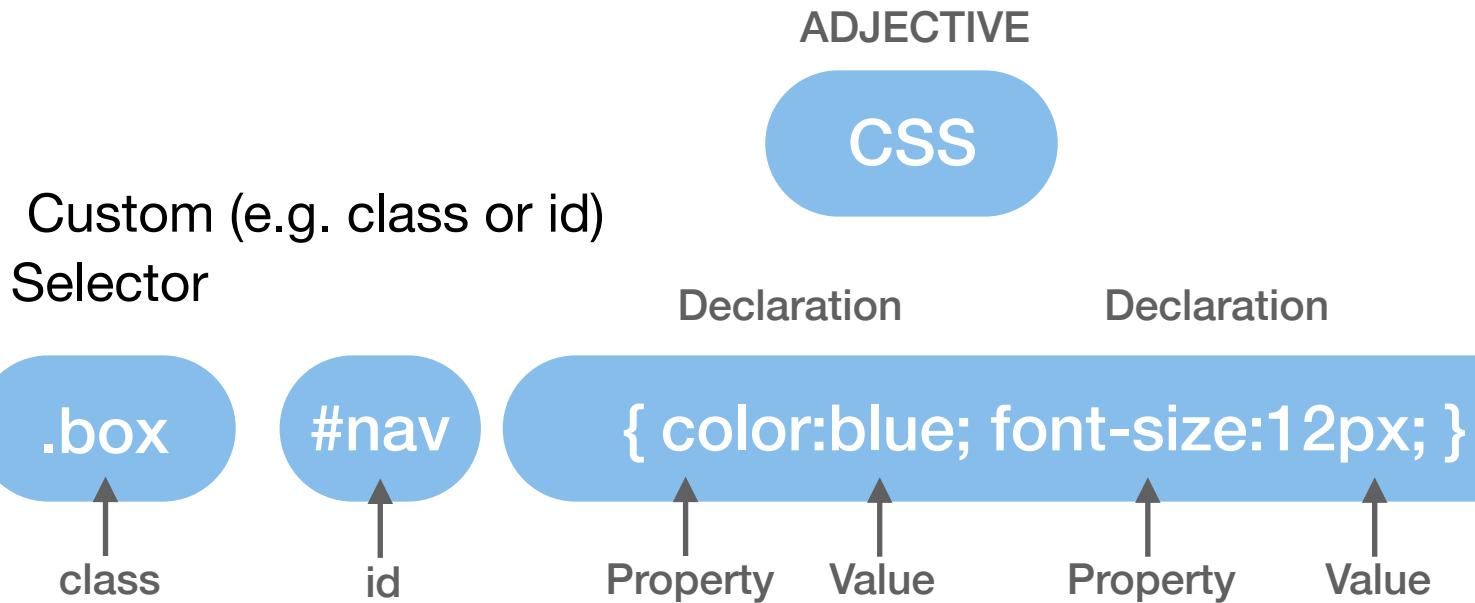
{ color:purple; font-size:12px; }

Property

Value

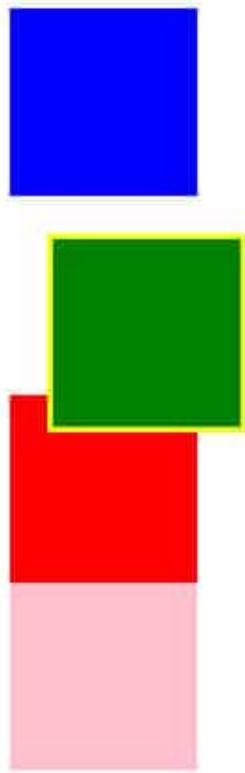
Property

Value



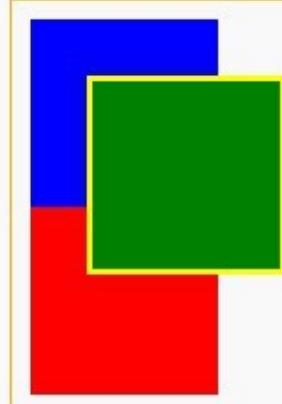
4 Ways of Positioning Display Box

- **Static** - default position of a box following the normal document flow (not affected by top, left, right, bottom pos.)
- **Fixed** - it always stay on the same location as defined by the positions (top and left or bottom or right) even the page is scrolled. Unlike absolute, its parent is the viewport.
- **Relative** - relative when used with top and left position pair or bottom and right position pair will allow the object box to be moved to a new location relative to its current position (not container).
- **Absolute** - take the positioning out of the document flow and place it at a location (top and left position) as defined in relationship to its containing (or parent) element (context). The container/parent should be set to relative.



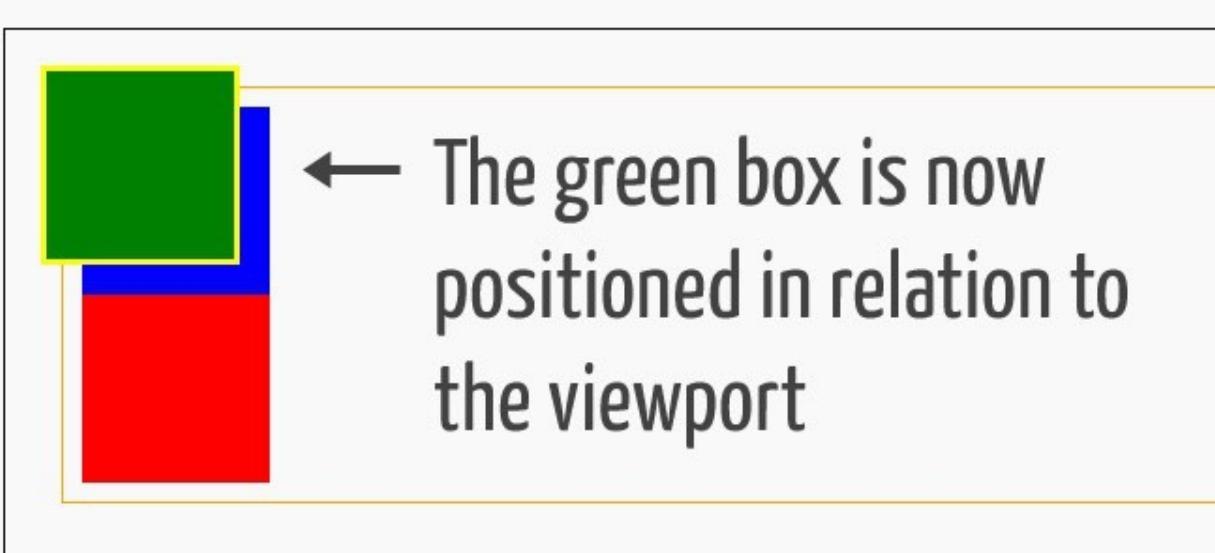
The second box is set to “position: relative” and is offset using top and left values.

Source: CSS Positioning: A Comprehensive Look
(<http://blog.teamtreehouse.com/css-positioning>)

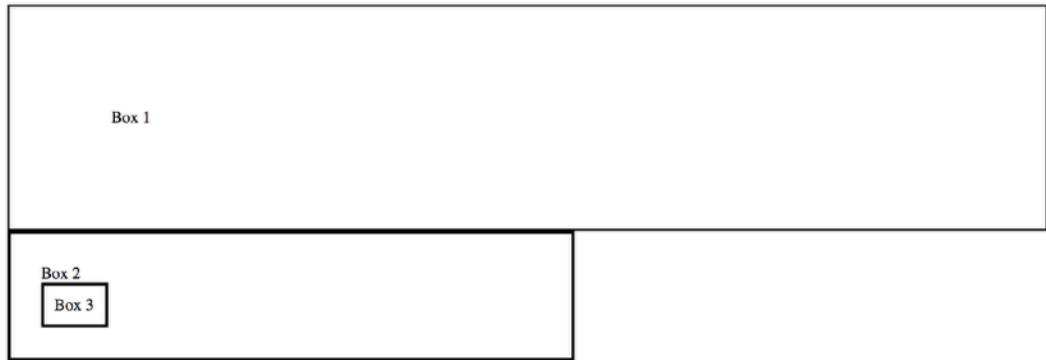


The second box is set to “position: absolute” and is offset in relation to the “.container” element

Source: CSS Positioning: A Comprehensive Look
(<http://blog.teamtreehouse.com/css-positioning>)



Source: CSS Positioning: A Comprehensive Look
(<http://blog.teamtreehouse.com/css-positioning>)



A Simple Example

The Grammar of CSS

- Styles define how to display HTML elements
- Each style description is made up of a Selector and Declaration
- Selector defines which HTML element should be used for display and the declaration defines how
- Each declaration contains properties and values
- There are base and custom selectors (ID and CLASS are custom selectors)
- Style definition can be placed inline, in the head section or in an external file (e.g. style.css)

VERB

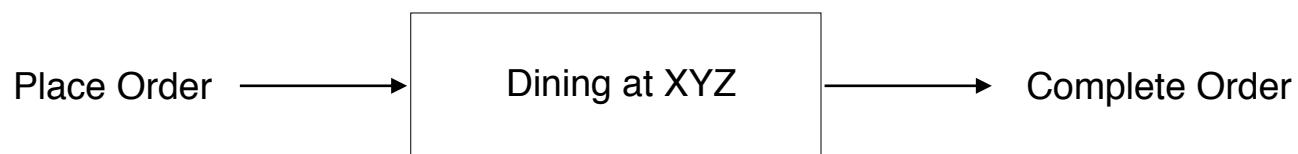
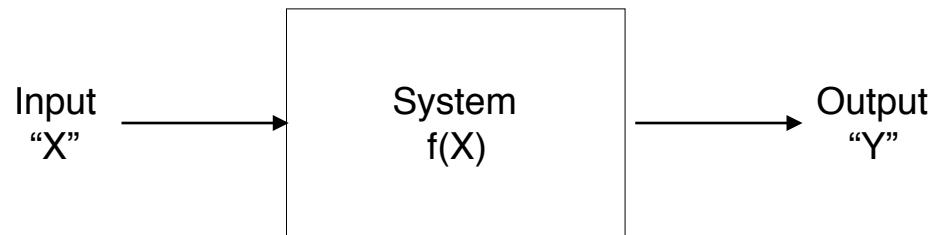
JS

JavaScript = act on a HTML tag, CSS property or respond to an event triggered by user action

What is JavaScript?

**Similar to other programming languages,
JavaScript provides us with the capabilities to
build system and transform data.**

$$Y = f(X)$$



Example: Cell manipulation in Excel with some cells controlling inputs while others outputs.

**JavaScript provides us with the capabilities
to build system and transform data.**

Learning JavaScript with Google Blockly:
[https://blockly-demo.appspot.com/static/demos/
code/index.html](https://blockly-demo.appspot.com/static/demos/code/index.html)

Blocks JavaScript Python PHP Lua Dart XML ✖️ ➔

Logic
Loops
Math
Text
Lists
Colour
Variables
Functions

From Google Blockly to JavaScript, Python, PHP, etc.

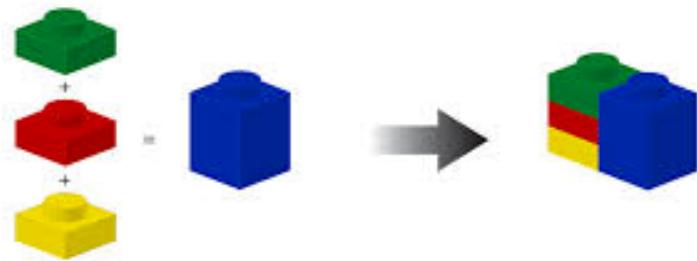
The diagram illustrates the process of translating code blocks into executable code. It features a central circle labeled "Google Blockly". An arrow points from the left towards the circle, labeled "Input 輸入 Blocks". Another arrow points away from the circle to the right, labeled "Output 輸出 Codes". To the right of the output arrow, there are three small circular icons with symbols: a dot, a plus sign, and a minus sign. Below the main area, there is a horizontal bar with a grey rectangular button.

```
graph LR; Input[Input 輸入 Blocks] --> Blockly((Google Blockly)); Blockly --> Output[Output 輸出 Codes];
```

**All programming languages rely on similar
data and operation patterns to function.**

The Blocks reflect common patterns.

**The blocks are like lego set
for building more advanced
system and complex product
from simple and basic
elements.**



**First hands-on exercise on JavaScript:
<https://www.javascript.com/try>**

Data Types in JavaScript

Declaring a variable and its data type:

- **String** - e.g. **var str_var = “This is a string.”;**
- **Numeric** - e.g. **var num_var = 3.2;**
- **Boolean** - e.g. **var bol_var = true;**

Basic Input/Output Commands

- **Entering a variable** - e.g. `var x = prompt("Enter x value");`
- **Displaying a variable** - e.g. `alert("x = " + x_var);`

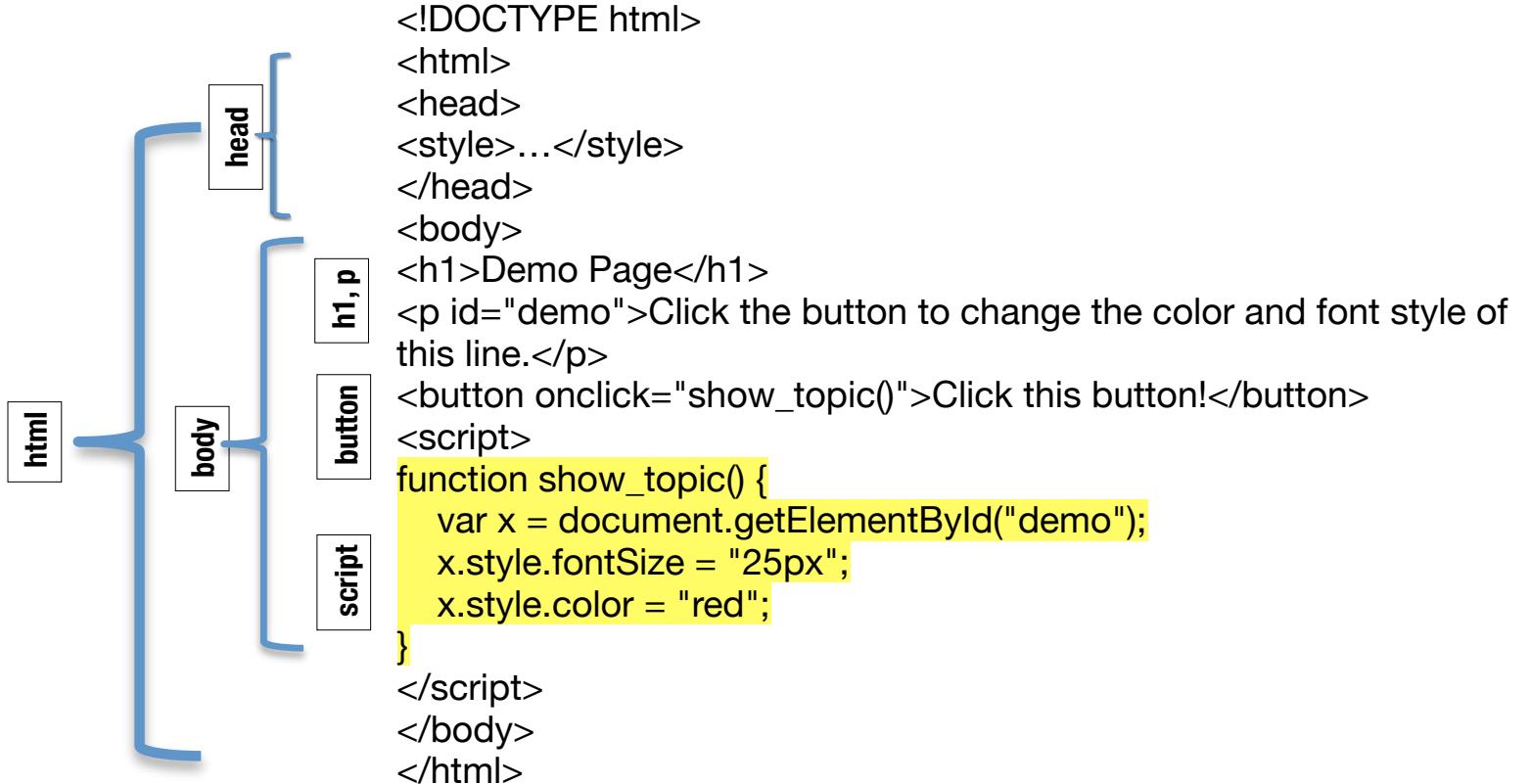
JavaScript Functions that Transform Input into Output

Basic Structure of a JavaScript Function

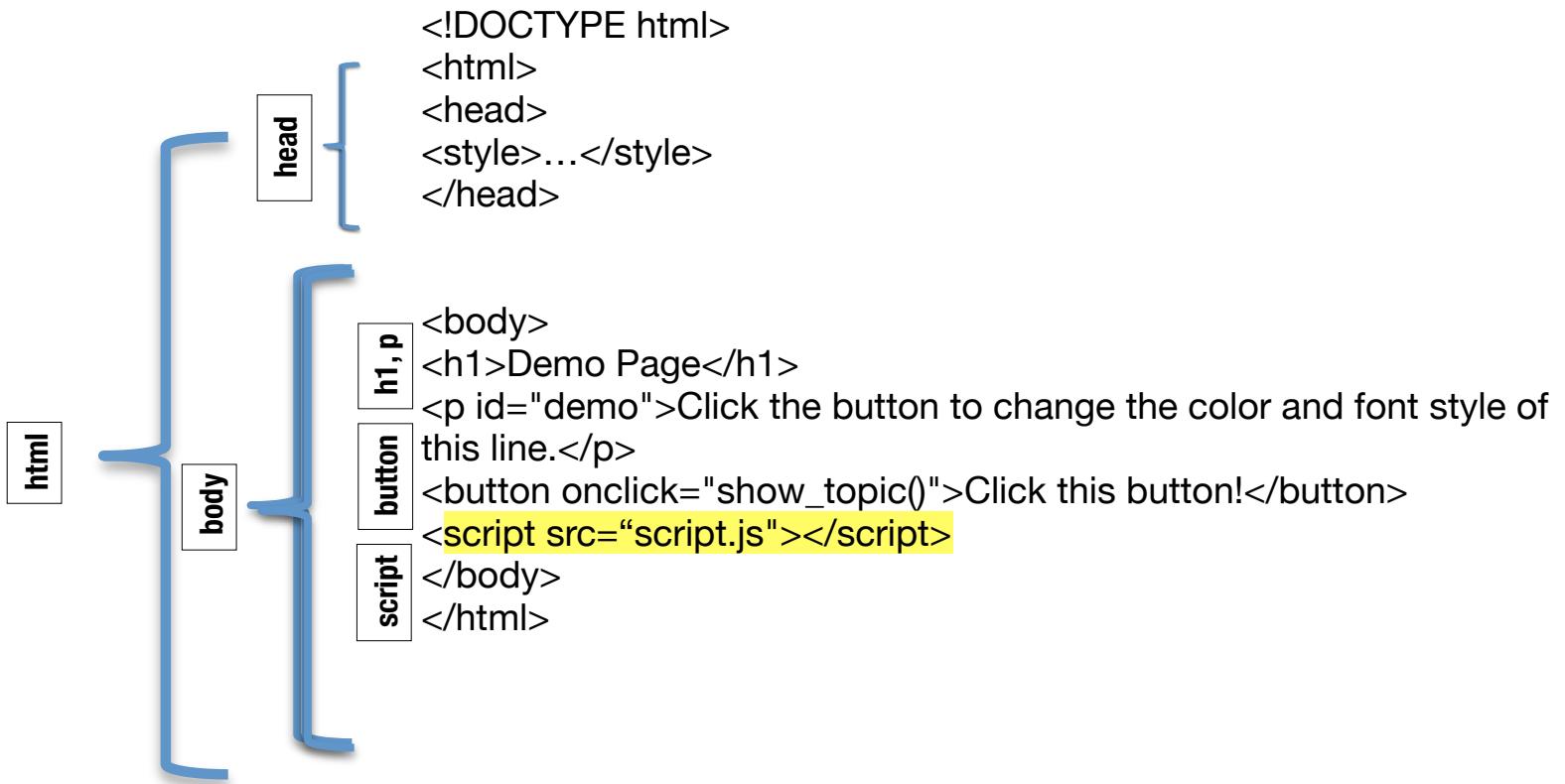
```
<script>
    function function_name(parameter1, parameter 2...) {
        Embed data type variables, input/output commands and
        logical and mathematical operators in the function to
        compute and return values.

    }
</script>
```

optional parameters



**Similar to CSS, JS can be placed in
an External File**



JavaScript Operations and Commands that Can Enrich the Transformation Process

Basic Logical and Mathematical Operations

- `==` equal (comparing string and boolean)
- `!=` not equal (comparing string and boolean)
- `=` equal (comparing numerical values)
- `>=` greater than or equal to (comparing numerical values)
- `<=` smaller or equal to (comparing numerical values)
- `+, -, *, /, %, &&, ||, !` (addition, subtraction, multiplication, division, modular, and, or, not)

Basic Structure of JavaScript Functions In a HTML File

```
<!DOCTYPE html>
<html><head>
<style>...</style>
</head>
<body>
  :
  <button onclick="get_values()">Click here</button>
<script>
  function addition(a, b) {
    a = parseInt(a); b = parseInt(b);
    c = a + b;
    return c;
  }
  function get_values() {
    var a = prompt("Enter first number:");
    var b = prompt("Enter second number:");
    var z = addition(a,b), alert("The answer is:" + z);
  }
</script>
</body>
</html>
```

Basic Logical and Mathematical Operations

if (condition) {action} else {action}

Examples:

- `if (boolean_var == true) {alert("That is correct");} else {alert("That is incorrect");}`
- `if (string_var != "David") {alert("Not Peter");}`
- `if (num_var >= 8) {alert("The number is greater than or equal to eight.");} else {alert("The number is smaller than eight.");}`

```
<body>
<form name='guessForm'>
    <label>Guess a number between 0 and 20: </label>
    <input name = 'guessValue' class='inputField'>
    <input type='button' class='button' value='submit answer' onclick='guessInteger()'>
</form>

<script>
function guessInteger() {
    guess = document.forms['guessForm']['guessValue'].value;
    if (guess == '') {
        document.getElementById('demo').innerHTML = 'Empty!';
    } else {
        guess_int = parseInt(guess);
    }
    if (guess_int == 20) {
        document.getElementById('demo').innerHTML = "Right!";
    } else {
        document.getElementById('demo').innerHTML = "Wrong!";
    }
    return;
}
</script>
</body>
```

The Grammar of JavaScript

- JavaScript is a programming language that can be used to write functions placed inside html or an external file.
- JavaScript can be placed between the `<script>` and `</script>` tags before the end of the `</body>` tag or link to an external file through the script src link.
- JavaScript codes can be understood as a collection of functions that respond to events triggered by internal browser activities and external user interactions.
- JavaScript can be used to manipulate HTML elements and CSS styles.

Screen Layout (Composition)

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About Courses Meetings Blogs

Section 1

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Section 1

Article 1

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Article 2

Vestibulum ullamcorper nisl elit, non semper nunc viverra eu.

User Name:

Password:

Submit

Event	Month	Day	Venue
Lesson 5	Oct	5th	Online
Lesson 6	Oct	12th	Online
Lesson 7	Oct	19th	Online
Lesson 8	Oct	26th	Online

Section 1

Article 1

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User Name:

Password:

Event	Month	Day	Venue
Lesson 5	Oct	5th	Online
Lesson 6	Oct	12th	Online
Lesson 7	Oct	19th	Online
Lesson 8	Oct	26th	Online

Article 2

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Section 1

Article 1

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Article 2

Vestibulum ullamcorper nisl elit non semper nunc viverra eu

User Name:

Password:

Event	Month	Day	Venue
Lesson 5	Oct	5th	Online
Lesson 6	Oct	12th	Online
Lesson 7	Oct	19th	Online
Lesson 8	Oct	26th	Online

```
<div id='main'>
  <div class='section'>
    <h1><center>Section 1</center></h1>
    <br>
    <h2>Article 1</h2>
    
```

User Name:	<input type="text"/>
Password:	<input type="password"/>
<input type="button" value="Send"/>	

Day	Venue
	Online
	Online
	Online
	Online

Article 2

About Courses Meetings

127.0.0.1:5502 says
username cannot be blank!

OK

Section 1

Article 1

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Event	Month	Day	Venue
Lesson 5	Oct	5th	Online
Lesson 6	Oct	12th	Online
Lesson 7	Oct	19th	Online
Lesson 8	Oct	26th	Online

Article 2

About Courses Meetings

127.0.0.1:5502 says
password cannot be blank!

OK

Section 1

Article 1

```
<script>
    document.getElementById('submitBtn').addEventListener('click', sayHello);
    function sayHello() {
        var username = document.forms[0].username.value;
        var password = document.forms[0].pwd.value;
        if (username == '') {alert('username cannot be blank!');}
        if (password == '') {alert('password cannot be blank!');}
        if (username !== '' && password !== '') {
            alert("Hello " + username + "! Your password is " + password + '.');
            var answer = "Hello " + username + "! Your password is " + password + '.';
            document.getElementById('answer').innerHTML = answer;
        }
    }
</script>
```

User Name:

Password:

Send

Day	Venue
1	Online
2	Online
3	Online
4	Online

About Courses Meetings

127.0.0.1:5502 says

Hello Bernard! Your password is password.

OK

```
<form id='login'>
  <div class='form-group'>
    <label>
      User Name:
    </label>
    <input type='text' name='username'>
  </div>
  <div class='form-group'>
    <label>
      Password:
    </label>
    <input type='password' name='pwd'>
  </div>
  <button id='submitBtn' type='button'>Send</button>
</form>
```

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ut commodo lacus fringilla. Duis et diam placerat,
egestas erat.

User Name:

Password:

Send

1



Event	Month	Day	Venue
Lesson 5	Oct	5th	Online
Lesson 6	Oct	12th	Online
Lesson 7	Oct	19th	Online
Lesson 8	Oct	26th	Online

```
<script>
  document.getElementById('submitBtn').addEventListener('click', sayHello);
  function sayHello() {
    var username = document.forms[0].username.value;
    var password = document.forms[0].pwd.value;
    alert("Hello " + username + "! Your password is " + password + '.');
  }
</script>
```

Article 2

About Courses Meetings

127.0.0.1:5502 says
Hello Bernard! Your password is password.

```
<form id='login'>
  <div class='form-group'>
    <label>
      User Name:
    </label>
    <input type='text' name='username'>
  </div>
  <div class='form-group'>
    <label>
      Password:
    </label>
    <input type='password' name='pwd'>
  </div>
  <button id='submitBtn' type='button'>Send</button>
</form>
```

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eget, placerat lectus. Aenean pharetra dolor sed odio vehicula,
ut commodo lacus fringilla. Duis et diam placerat,
egestas erat.

OK



User Name:

Password:

Send

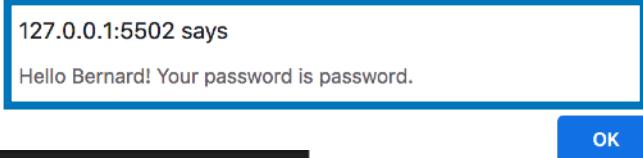


Event	Month	Day	Venue
Lesson 5	Oct	5th	Online
Lesson 6	Oct	12th	Online
Lesson 7	Oct	19th	Online
Lesson 8	Oct	26th	Online

```
<script>
  document.getElementById('submitBtn').addEventListener('click', sayHello);

  function sayHello() {
    var username = document.forms[0].username.value;
    var password = document.forms[0].pwd.value;
    alert("Hello " + username + "! Your password is " + password + '.');
  }
</script>
```

Article 2



```
<form id='login'>
  <div class='form-group'>
    <label>
      User Name:
    </label>
    <input type='text' name='username'>
  </div>
  <div class='form-group'>
    <label>
      Password:
    </label>
    <input type='password' name='pwd'>
  </div>
  <button id='submitBtn' type='button'>Send</button>
</form>
```

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ut commodo lacus fringilla. Duis et diam placerat,
egestas erat.

User Name:
Bernard
Password:

<input type="button" value="Send"/>



Event	Month	Day	Venue
Lesson 5	Oct	5th	Online
Lesson 6	Oct	12th	Online
Lesson 7	Oct	19th	Online
Lesson 8	Oct	26th	Online

```
<script>
  document.getElementById('submitBtn').addEventListener('click', sayHello);
  function sayHello() {
    var username = document.forms[0].username.value;
    var password = document.forms[0].pwd.value;
    alert("Hello " + username + "! Your password is " + password + ".");
  }
</script>
```

Article 2

**Output without popup:
innerHTML**

```
<form id='login'>
  <div class='form-group'>
    <label>
      User Name:
    </label>
    <input type='text' name='username'>
  </div>
  <div class='form-group'>
    <label>
      Password:
    </label>
    <input type='password' name='pwd'>
  </div>
  <button id='submitBtn' type='button'>Send</button>
</form>
<div id='answer'></div>
```

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bibendum velit felis in libero. Nullam feugiat metus. In quis
mollis venenatis. Mauris mollis erat molestie,
egestas, placerat lectus. Aenean pharetra dolor sed
ut commodo lacus fringilla. Duis et diam place
egestas erat.

Article 2



User Name:
Bernard

Password:

Send

Hello Bernard! Your password is
password.



Event	Month	Day	Venue
Lesson 5	Oct	5th	Online
Lesson 6	Oct	12th	Online

```
<script>
  document.getElementById('submitBtn').addEventListener('click', sayHello);
  function sayHello() {
    var username = document.forms[0].username.value;
    var password = document.forms[0].pwd.value;
    alert("Hello " + username + "! Your password is " + password + '.');
    var answer = "Hello " + username + "! Your password is " + password + '.';
    document.getElementById('answer').innerHTML = answer;
  }
</script>
```

RESPONSIVE DESIGN

**RESPONSIVE DESIGN = VIEW PORT + MEDIA QUERY + MAX/MIN
WIDTH SETTING**

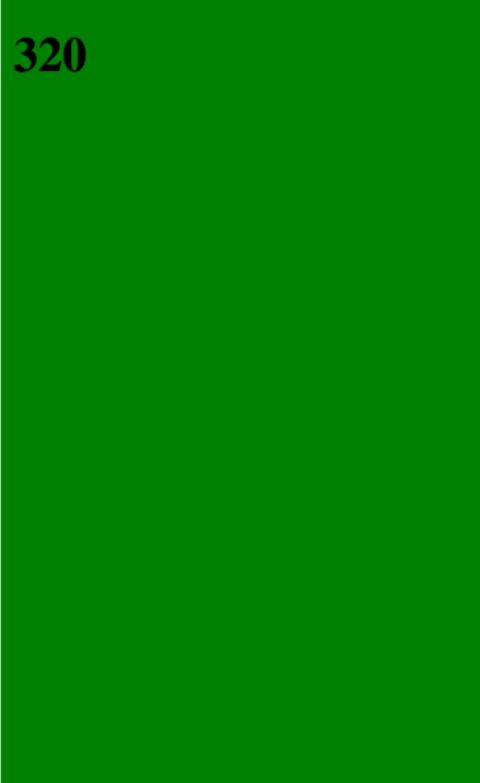
EXAMPLE

Higher than 960

960

768

550



320

VIEW PORT

```
<meta name="viewport" content="width=device-width, initial-scale=1.0, user-scalable=0">
```

mq_demo.css

```
body {  
    background-color: grey;  
}  
  
@media screen and (max-width: 960px) {  
    body {  
        background-color: red;  
    }  
}  
  
@media screen and (max-width: 768px) {  
    body {  
        background-color: orange;  
    }  
}  
  
@media screen and (max-width: 550px) {  
    body {  
        background-color: yellow;  
    }  
}  
  
@media screen and (max-width: 320px) {  
    body {  
        background-color: green;  
    }  
}
```

MEDIA QUERY + MAX/MIN WIDTH SETTING

```
<!DOCTYPE html>
```

```
<html>
```

```
<head>
```

```
<meta charset="utf-8">
```

```
<meta name="viewport" content="width=device-width, initial-scale=1.0, user-scalable=0">
```

```
<title>Workshop</title>
```

```
<link href="mq_demo.css" rel="stylesheet" type="text/css">
```

```
<script src="https://ajax.googleapis.com/ajax/libs/jquery/1.12.4/jquery.min.js"></script>
```

```
<script>
```

```
\$(document).ready(function() {
```

```
    \$(window).resize(function() {
```

```
        if (\$(window).width() >= 960) {
```

```
            \$(".showview").html('<h1>Higher than 960</h1>');
```

```
        }
```

```
        if (\$(window).width() < 960) {
```

```
            \$(".showview").html('<h1>960</h1>');
```

```
        }
```

```
        if (\$(window).width() < 768) {
```

```
            \$(".showview").html('<h1>768</h1>');
```

```
        }
```

```
        if (\$(window).width() < 550) {
```

```
            \$(".showview").html('<h1>550</h1>');
```

```
        }
```

```
        if (\$(window).width() < 320) {
```

```
            \$(".showview").html('<h1>320</h1>');
```

```
        }
```

```
});
```

media_query_demo.html

VIEW PORT

```
$document.ready(function() {
    $window.resize(function() {
        if ($window.width() >= 960) {
            $(".showview").html('<h1>Higher than 960</h1>');
        }
        if ($window.width() < 960) {
            $(".showview").html('<h1>960</h1>');
        }
        if ($window.width() < 768) {
            $(".showview").html('<h1>768</h1>');
        }
        if ($window.width() < 550) {
            $(".showview").html('<h1>550</h1>');
        }
        if ($window.width() < 320) {
            $(".showview").html('<h1>320</h1>');
        }
    });
});
```

</script>

</head>

<body>

 <div class="showview">

 </div>

 </body>

</html>

Responsive ▾

472

x

388

100% ▾

Online ▾

About Courses Meetings Blogs

Section 1

Article 1

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Phasellus eu ligula
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Elements

Console

Sources

Network

Performance

Memory

Application

Security

Lighthouse

```
<!DOCTYPE html>
<html lang="en">
  <head>...</head>
```

html body div.container div.wrapper div#main div.section

Styles

Computed

Event Listeners



Filter

:hov .cls +

element.style {

```
@media (max-width:600px) {  
    #main, #sidebar {  
        width:100%;  
        float:none;  
    }  
}
```

Thank you for your time!