What is HTML

A Quick Review

What is HTML?

HyperText Markup Language

History
1991: August 6, 1991 share scientific papers (Tim Berners-Lee)
1994: World Wide Web (W3) Consortium formed (web standardization)
1997: HTML 4
2000: XHTML
2014: HTML 5
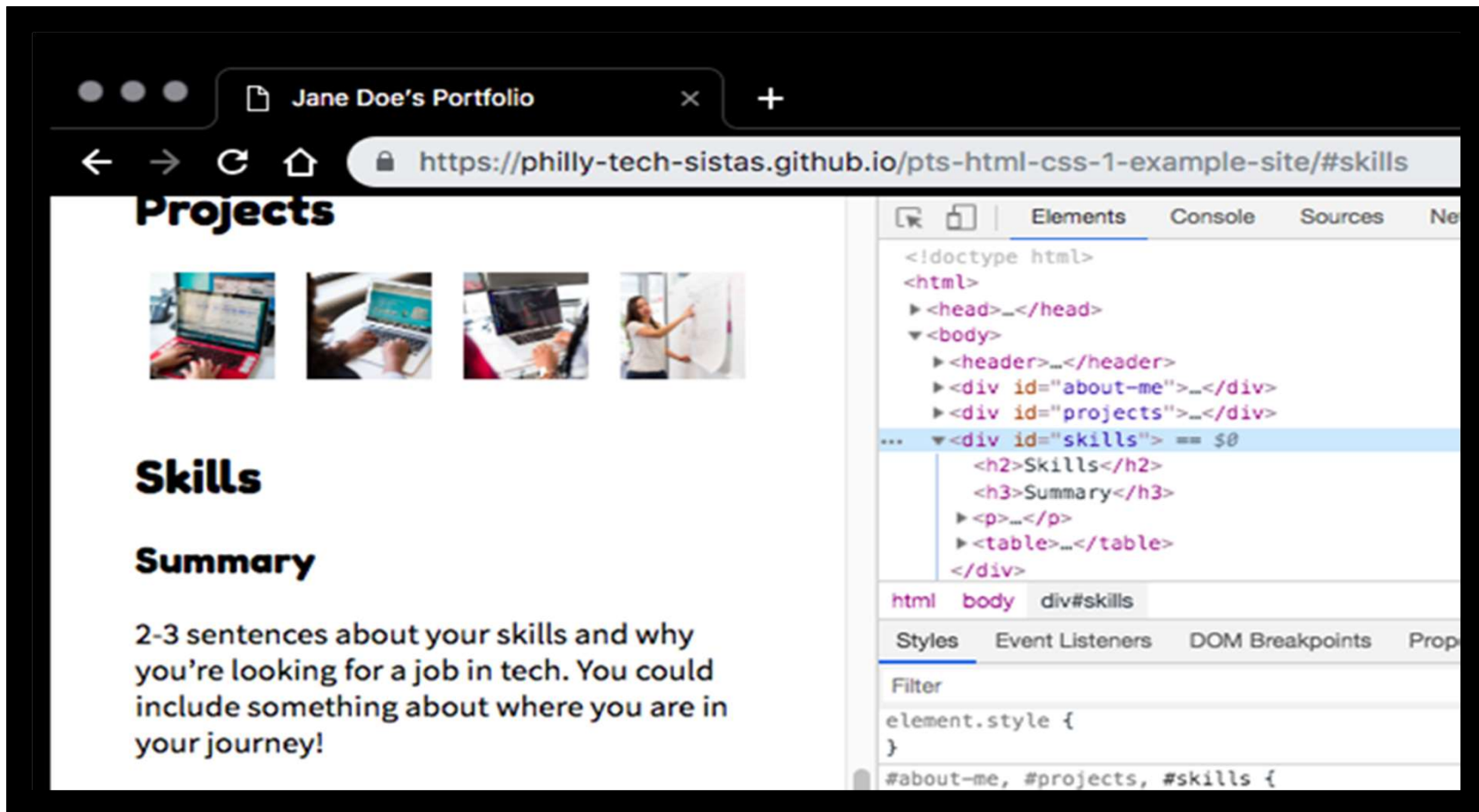**?:** What's next for HTML 6

Web Page Structure

```html
<!DOCTYPE html>
<html>
<head>
  <meta name="description" content="about web development" />
  <meta name="keywords" content="html, coding, intro" />
  <link href="style.css" />
  <title>Title of the page</title>
</head>
<body> The page content here. </body>
</html>
```

Inspect Element

As you can see, all websites have the same structure …

Basic Tags

Standard Format
Open Tag: <TAG>
Closing Tag: </TAG>

Headers (h1-h6): <h1>My Header</h1>

Paragraphs: <p>My Para</p>

Span: Use me to format text

Lists (ul, ol):

Pasta

Macaroni

Div: <div><p>I hold</p><p>a lot of other tags</p></div>

Image:

Links: Amazon Link

Link Types

- **Main link declaration types:**
  Link to an external page. (absolute)
  Link to an external page. (relative)
- **Anchor links:** Links within the page
  Link to a section on the page.

Link Attributes
<a **href**="website.html" **target**="_blank">Opens in another tab.
<a **href**="mailto:email@youremail.com">E-mail us!
<a **name**="header1">Header
<a **href**="#header1">Go to Header

Group Exercise: Introduce Yourself

First, we'll demo. Then, you'll sign up and create your HTML in groups.

1. Go to online IDE either https://app.bsd.education/ or https://jsfiddle.net/
   - Create an account for yourself
   - Create a new sandbox / project

2. Click in the HTML
   - Create a professional portfolio webpage
   - Your name in H1 Tags
   - About yourself in P tags
   - Add Image & link
   - Save the page

```
<body>
<h1>Jane White</h1>
<img src=https://m.media-amazon.com/images/I/81OEjjAyVXL._AC_UL480_FMwebp_QL65_.jpg />
<p>I am a programmer of over 15 years. For more about me, go to <a
href=http://phillytechsistas.com>PhillyTechSistas</a>
</body>
```

Attributes

Attributes give more information about your element.

```
<img src="img/img.jpg" alt="Woman at laptop">
```

Required Attributes:

- src   (on IMG tag)

- href (on A tag)

Optional (but heavily suggested)

- *Unique Identifier -* id="unique-id-1"

- *Name -* name="username"

- *Alternative Text -* alt

VOCABULARY: TEXT \ CONTAINER ELEMENTS

Non-Semantic: Container or structural elements that hold other elements (organization or formatting-focused)

- div
- body
- span

Semantic: Text elements (typically), but are also elements that explain the website

- footer
- header
- nav
- section

```
<header>
<nav>
<ul>
<li> <a href="#about">About</a> </li>
<li> <a href="#projects">Projects</a> </li>
</ul>
</nav>
</header>
```

VOCABULARY: BLOCK \ INLINE ELEMENTS

More Vocabulary ....

Block: elements on their own line

- ○ headings,
- ○ paragraphs,
- ○ lists

Inline: side by side elements
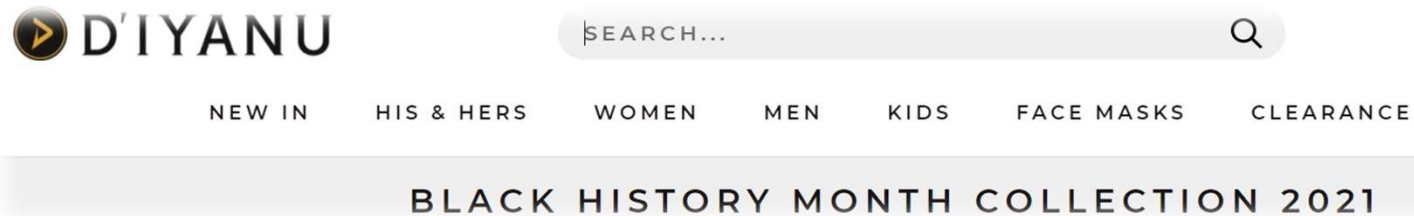
- ○ links

Block:
<p>I appear on my own line**<p>**

Inline:
<p>I am a paragraph. I am a ****link**** embedded in this paragraph. <p>

<BREAK />

HEADER AND NAV ELEMENTS

Used to organize website links

D'IYANU

SEARCH...

NEW IN   HIS & HERS   WOMEN   MEN   KIDS   FACE MASKS   CLEARANCE

BLACK HISTORY MONTH COLLECTION 2021

<HEADER> - Site Information
<NAV> -   Site Navigation

```
<header>
<h1>Title of your site</h1>
<nav>
<ul>
<li> <a href="#about">About</a> </li>
<li> <a href="#projects">Projects</a> </li>
</ul>
</nav>
</header>
```
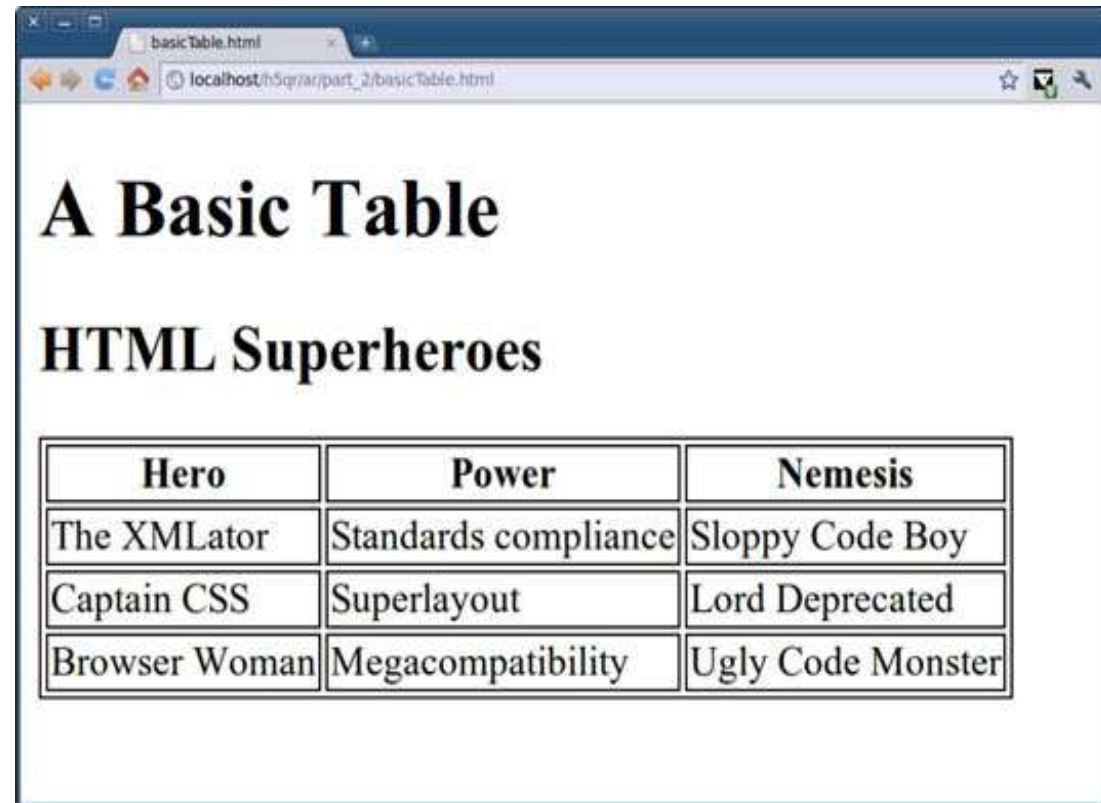
Group Exercise: Update your portfolio

1. Put the content you created within a div tag
   - Give div tag an id attribute
2. Create another section, My tech focus
   - Create another div tag with an id
   - Add an h1
   - Add content within p tags
3. Create a header tag
   - Add a header tag at top
   - Add nav links to the two sections
   - Create anchor links in both sections
4. Bonus: Add a Contact me section
   - Add a link using an href:mailto link

```
<header>
<nav>
</nav>
</header>
<div id="aboutme">
<h1><a name="aboutjane">Jane
White</a></h1>
<img src=https://m.media-
amazon.com/images/I/81OEjjAyVXL._AC_UL4
80_FMwebp_QL65_.jpg />
<p>I am a programmer of over 15
years. For more about me, go to
<a
href=http://phillytechsistas.com>
PhillyTechSistas</a>
</div>
<div id="newsection">
</div>
```

TABLES

```
<table>
<caption>Table Title</caption>
<tr>
<th>Column header 1</th>
<th>Column header 2</th>
</tr>
<tr>
 <td>Data 1</td>
 <td>Data 2</td>
</tr>
</table>
```

COMMENTS

```
<!-- HTML Comment! -->
<!--
<ul>
<li>Order</li>
<li>Doesn't</li>
<li>Matter</li> </ul>
-->
Hint: Select code you want to "comment out" and click ⌘
+ / (Mac) or CTRL + / (PC).
```

Can I Do This?

YES! You Can!!!

- Since the pandemic, 55% of non-technicals are considering re-training
  https://www.theguardian.com/careers/2020/dec/14/tech-careers-for-women-what-are-the-main-roles-and-how-do-you-retrain
- By hiring non-technical people, Etsy increased female engineers by 30%
  https://www.wired.com/story/dangers-keeping-women-out-of-tech/
- Programs focused on women sends a strong message to technical staff.
  https://www.wired.com/story/how-to-buck-the-brogrammer-culture-and-get-women-into-stem/

Take Home Exercises

1. Finish your portfolio
2. Download portfolio
3. Modify Template
4. Complete Attributes
5. Bonus: Create Table

Exercise: Update your portfolio

1. Put the content you created within a div tag
   ○ Give div tag an id attribute
2. Create another section, My tech focus
   ○ Create another div tag with an id
   ○ Add an h1
   ○ Add content within p tags
3. Create a header tag
   ○ Add a header tag at top
   ○ Add nav links to the two sections
   ○ Create anchor links in both sections
4. Add a Contact me section
   ○ Add a link using an href:mailto link

```
<header>
<nav>
</nav>
</header>
<div id="aboutme">
<h1><a name="aboutjane">Jane
White</a></h1>
<img src=https://m.media-
amazon.com/images/I/81OEjjAyVXL._AC_UL4
80_FMwebp_QL65_.jpg />
<p>I am a programmer of over 15
years. For more about me, go to
<a
href=http://phillytechsistas.com>
PhillyTechSistas</a>
</div>
<div id="newsection">
</div>
```

Exercise: Check Your Code

Review your HTML

1. Make certain ALL images, headers, links and div tags have IDs, Names and alt attributes

```
<header>
<nav>
</nav>
</header>
<div id="aboutme">
<h1><a name="aboutjane">Jane
White</a></h1>
<img src=myimage.jpg />
<p>I am a programmer of over 15
years. For more about me, go to
<a
href=http://phillytechsistas.com>
PhillyTechSistas</a>
</div>
<div id="newsection">
</div>
```

Exercise: Create a calendar

1. Create a new project called calendar

2. Inside that calendar.html, create a 7-day calendar using your weekly google or outlook or personal calendar as an example using the table tags

```html
<table style="width:100%">
  <tr>
    <th>Mon</th>
    <th>Tue</th>
    <th>Wed</th>
  </tr>
  <tr>
    <td>Mon@12: Go Running</td>
    <td>Tue@1: Go Walking</td>
    <td>Wed@2: Nap</td>
  </tr>
</table>
```

Bonus: Update calendar

1. Update calendar.html:
    1. Create a navigation header, under the <head></head> tag at the top of the start of the body tag.
    2. Add comments explaining who created the calendar

```html
<body><header><!-- My header →
<nav>
<ul>
<li><a href=index.html>Home</a>
<li><a href=calendar.html>Gcal</a>
</ul>
</nav>
</header>
<table style="width:100%">
  <tr>
    <th>Mon</th>
    <th>Tue</th>
    <th>Wed</th>
  </tr>
  <tr>
    <td>Mon@12: Go Running</td>
    <td>Tue@1: Go Walking</td>
    <td>Wed@2: Nap</td>
  </tr>
</table>
```