Logols Learning

WEEKEND WEB DEVELOPMENT BOOT CAMP

TRAINING: CSS

What is CSS?

- ▶ HTML provides the definition of the page
- CSS provides the styling for the page
- ▶ It's best to keep these separate
- Cascading Style Sheets
- ▶ If multiple styles applied, styles will override based on the hierarchy

Inline Styling

- Can style inside an element using the style attribute
- This overrides all other styling
- Style Attribute is a global attribute
- Can be used on any html element
- style="[Style Name1]: [Value]; [Style Name2]: [Value];"

Example:

```
<img src="/images/logo.gif" style="height:100px;
width:100px;" alt="logo" />
```

In Page Styling

- It's best to separate your elements from the style
- You can also style in the page
- Use style element within the head element
- Surround styles in a comment

```
Example:
<head>
<style>
<!—
.logo {
    height:100px;
    width:100px;
}
-->
</style>
</head>
...
<img src="/images/logo.gif"
class="logo" alt="logo" />
```

Linking a CSS File

- ▶ It's best to style outside of the html file altogether in a .css file
- To link use the link element inside the head
 - ► Attributes:
 - ▶ rel stylesheet
 - ▶ href location of css file
 - ▶ type text/css

Example:

```
<head>
  link rel="stylesheet" href="/styles/site.css" type="text/css" />
  </head>
```

Selectors

- Used to select elements for styling
- ▶ Sample below

Name	Syntax	Example
ID	#[Element ID]	#PersonTable
Class	.[Class Name]	.highlightTable
All Elements	*	*
Element	[Element]	р
Element in Element	[Element] [Element]	div p
Multiple Elements	[Element], [Element]	div, p
Element direct child	[Element] > [Element]	div > p

Comments

Comments should be surrounded by /* */

```
Single line Example:

/* this is a comment*/

Multiple Line Example:

/*

This is also
a comment

*/
```

Colors

- Uses: font, background, border
 - color: red;
 - background-color: red;
 - border-color: red;
- ► Multiple ways to specify colors:
 - ▶ Color Name
 - ▶ RGB
 - ▶ Hex

Example:

color: red;

color: #00ff00;

color: rgb(0,0,255);

Text

- color Example: color: red;
- text-align Example: text-align: center;
- text-decoration Example: text-decoration: underline;
- text-transform Example: text-transform: lowercase;
- letter-spacing Example: letter-spacing: 5px;
- text-indentation Example: text-indent: 25px;
- ▶ line-height Example: line-height: 1;
- word-spacing Example: word-spacing: 10px;
- text-shadow Example: 5px 5px red;
- Direction Example: direction: rtl;

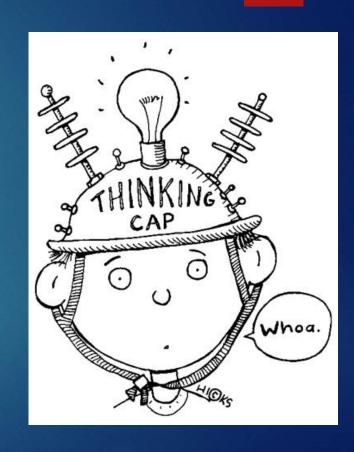


EXAMPLE

LINKING, SELECTORS, COLORS, TEXT, COMMENTS

ASSESSMENT

LINKING, SELECTORS, COLORS, TEXT, COMMENTS

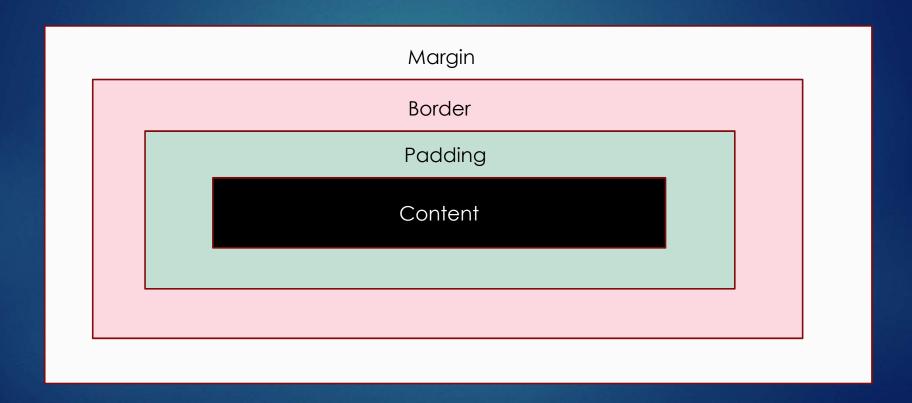


Assignment

- ▶ Style the Status Report Interface.
- Center the header text using an id selector.
- Modify the paragraph text to be dark grey using a class selector.
- Modify the table header to be light grey using the element selector.



Box Model



CSS Length Unit of Measures

Absolute Lengths

- px (pixels 1px = 1/96th of 1in)
- cm (centimeters 1cm = 37.8px)
- \blacktriangleright mm (millimeters 1mm = 3.78px)
- \blacktriangleright in (inches 1 in = 96px = 2.54cm)
- pt (points 1pt = 1/72 of 1 in)
- pc (picas 1pc = 12pt)

Relative Lengths

- em (font-size of element)
- rem (font-size of root)
- % (parent element)
- vw (1% width of viewport)
- vh (1% height of viewport)

*viewport – visible area of a web page



EXAMPLE

BOX MODEL

Display

- Options:
 - ▶ inline
 - ▶ block
 - ▶ flex
 - ▶ inline-block
 - ▶ infline-flex
 - ▶ table
 - none
 - ▶ etc...

- Display:none vs. Visibility
- Display Examples:

 https://css tricks.com/almanac/prop
 erties/d/display/
- Flexbox Examples:
 https://css-
 tricks.com/snippets/css/a-guide-to-flexbox/

Position

- ▶ Options:
 - ▶ static
 - ▶ relative
 - ▶ fixed
 - ▶ absolute
- ► Examples: http://learnlayout.com/position.html

Float

- ▶ float
 - none
 - ▶ left
 - ▶ right
 - ▶ initial
 - ▶ inherit
- clear
 - ▶ Same +both
- Example: https://css-tricks.com/all-about-floats/

- overflow
 - visible
 - ▶ hidden
 - ▶ scroll
 - auto
 - ▶ initial
 - ▶ Inherit
- Example: https://css-tricks.com/almanac/properties/
 /o/overflow/



EXAMPLE

DISPLAY, POSITION, FLOAT



EXAMPLE

FLEXBOX - HTTPS://FLEXBOXFROGGY.COM/

Assignment

- Style the report so the image is to the right of the data table using floats.
- Then do it using flexbox



Pseudo-Class

- Allow to set style of element in certain states.
- Examples of Pseudo-Classes:
 - ▶ a:active
 - ▶ a:hover
 - ▶ a:link
 - ▶ a:visited

- ▶ input:checked
- ▶ input:disabled
- ▶ input:enabled
- ▶ input:focus
- ▶ input:invalid
- ▶ input:valid

Where is my style?

- Importance
 - Add !important to the end of a property
 - Wins over all other rules (not recommended)
- Specificity
 - Measured using 4 values
 - ▶ Thousands inside style element or style attribute
 - ▶ Hundreds one for each ID selector
 - ▶ Tens one for each class selector, attribute selector, or pseudo-class
 - ▶ Ones one for each element selector or pseudo-element
- Source Order
 - ▶ Later rule wins if everything else is the same

Page Layouts

- ▶ Options:
 - **▶** Tables
 - ▶ Float
 - ► CSS Framework
 - ▶ Flexbox
 - CSS Grid

- ► Example:

 https://www.codementor.io/code

 https://www.codementor.io/code

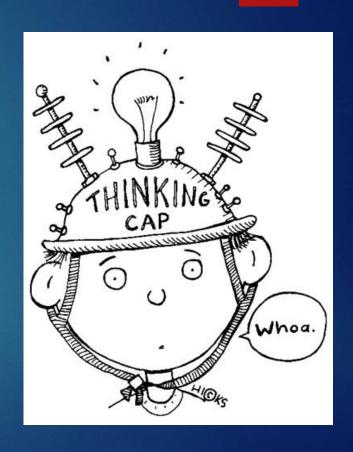
 mentorteam/4-different-html-css-layout-techniques-to-create-a-site-85i9t1x34
- Bootstrap Templates:https://www.w3schools.com/bootstrap-templates.asp
- Scroll Template:
 https://www.w3schools.com/bootstrap/bootstrap theme company.
 asp

Responsive

- ▶ Designing to work on any monitor size or device
- Use a Grid System Bootstrap / CSS Grid
- ▶ Use Media Queries
- ▶ Use Vector Graphics or Alternate Images
- Use a Framework like Bootstrap

ASSESSMENT

BOX MODEL, DISPLAY, POSITION, FLOAT, RESPONSIVE



Assignment

- Center everything under the header using flexbox;
- Play around with width, margins, and padding to change the looks.



QUICK REVIEW

CSS



Not really a sign you'd want to see whilst driving through an eerily quiet neighbourhood...

Additional Resources

- ▶ JSFiddle
 - ▶ https://jsfiddle.net/
- ▶ free Code Camp
 - ▶ https://www.freecodecamp.org/
- ▶ Can I Use
 - ▶ https://caniuse.com/