nested selectors

- Nested selectors define conditional style – in this case for elements of type X placed inside elements of type Y

ElementY ElementX

or

ul ol

- This selector defines the appearance of ordered lists nested anywhere inside unordered lists (link)

child selectors

- Child selectors define the appearance of elements of type X which are the direct children of parent element of type Y

ElementY>ElementX

or

li>ol

- This selector defines the appearance of ordered lists that are nested one deep inside a list item ([link])

layout with CSS

the box model

- In HTML, each element can be thought of as a two dimensional box
- At the "center" of the box is the element content
- The content is surrounded by three layers – padding, borders, and margins

dimensions

- The width and height properties of an element represent the dimensions of element content – padding, borders, and margins are excluded
- By default the width and height of an element are determined by its actual content
  - Inline elements occupy just the width and height of the enclosed content
  - Block elements occupy the height of the enclosed content, as well as the width of their parent element
- As content exceeds the width of its parent element, the content auto line-breaks – this is called the flow

explicit dimensions

- The width and height properties can be used to explicitly define the width and height of an element

- Explicitly setting width may be used to structure your text (link)

- The width and height properties accept values in any of the standard CSS measurement units

dimension limits

- The min-width property is used to set the smallest possible width an element can be
- The max-width property is used to set the widest possible width for an element

- The two properties may be combined to create visually appealing, yet fluid layouts, which still keep their structure beyond certain points

padding

- Padding is a layer of white-space around the content of an element
- Padding is surrounded by the border of an element
- Padding retains the background of an element

  padding: value; or **padding: top right bottom left;**

- Padding accepts values in any of the standard CSS measurement units (link)

border

- The border is the most external, explicitly defined part of an element

border: **border-width border-style border-color**;

border: **2px dashed black**;

- Omitting the border-width value infers a value of medium
- Omitting the border-color value infers a value of black

[margin](#)

- The margin is a transparent layer of white-space surrounding an element, it lays outside the border

- The margin has no color

    margin: value; or **margin: top right bottom left;**

- Margins from neighboring elements overlap, meaning that they are not additive, instead the largest margin will be displayed ([link](#))

horizontal centering with margins

- Setting the value of left and right margins to auto will horizontally center an element

margin: auto;

or

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

CSS classes

<div> and <span> elements

- The <div> element used to be the sectioning element before HTML5 – it is a block element

- The <span> element was an inline element used for styling, much like the font element before xHTML4.1 – it is an inline element

- In HTML5, <div> and <span> elements are non-semantic elements used for custom styling and layout

CSS classes

- <div> and <span> are only 2 elements – but they are used to style many pieces of a page in many different ways
- This is achieved with the use of the class attribute

<div class="bad"></div>

- and the class selector in CSS

.bad {background: #bada55;}

- Note that the class selector begins with a period (.)