



CS50B Web Dev 2

Fall 2018 ~ Ethan Wilde

Week 6



Welcome

- **Course Outline**
- **Reading This Week**
- **Customizing Bootstrap CSS**
 - **Adding New CSS Rules + Classes**
 - **Overriding Existing Bootstrap CSS Rules**
 - **Looking Ahead: Bootstrap + Sass**
- **Preparing for the Midterm Project**

Course Outline

1 Responsive HTML5 + CSS3	10 WordPress: Intro to CMS
2 Introduction to Bootstrap	11 WordPress Posts
3 Page Elements + Components	12 WordPress Pages + Menus
4 Navigation	13 WordPress Plugins + Themes
5 Forms + Decoration	14 WordPress Bootstrap Theme
6 Customizing Bootstrap CSS	15 Intro to Sass: CSS Preprocess
7 Introduction to JavaScript	16 Customizing Bootstrap Sass
8 Bootstrap + JavaScript	17 Mastering Sass + Bootstrap
9 Midterm Review + Midterm	18 Final Exam (online)

Get all of the details in the complete syllabus on Canvas.

Reading This Week



by Carol Skelly

1. Simple CSS Overrides

<https://uxplanet.org/how-to-customize-bootstrap-b8078a011203>

Changing Bootstrap Styles

- **Adding New CSS Rules + Classes**
- **Overriding Existing Bootstrap CSS Rules**
- **Looking Ahead: Bootstrap + Sass**

Adding New CSS Rules

```
<ul class="list-group my-list">  
  <li class="list-group-item">Pictures</li>  
  <li class="list-group-item">Videos</li>  
</ul>
```

```
.my-list {  
  font-family: Impact;  
  font-size: 2em;  
}
```

*custom
class +
associated
CSS rule*

Changes One or Some List Groups

Interactive code example now on codepen.io

Overriding Existing Bootstrap CSS Rules

```
<ul class="list-group">  
  <li class="list-group-item">Pictures</li>  
  <li class="list-group-item">Videos</li>  
</ul>
```

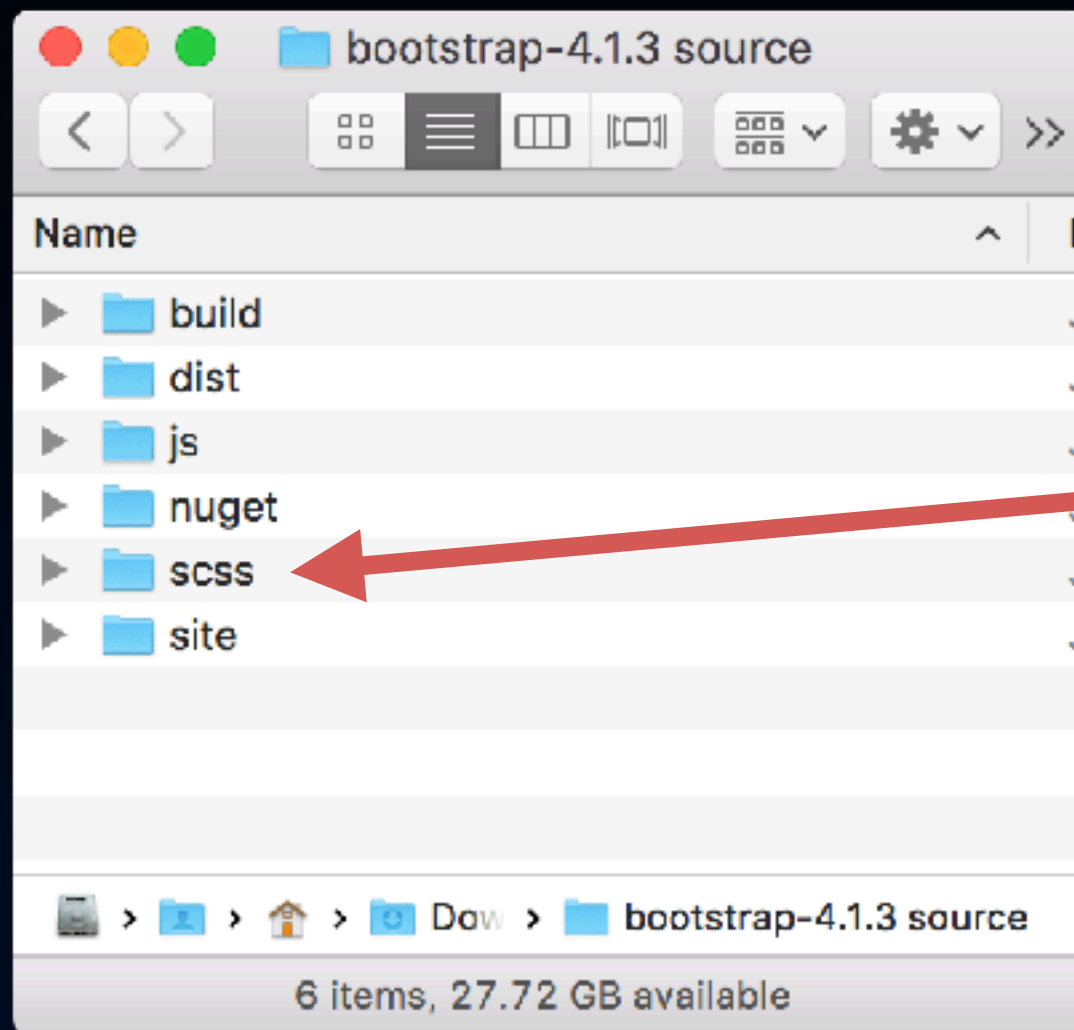
```
.list-group {  
  font-family: Impact;  
  font-size: 2em;  
}
```

*new CSS
rule to
override
existing
Bootstrap CSS*

Changes EVERY List Group!

Interactive code example now on codepen.io

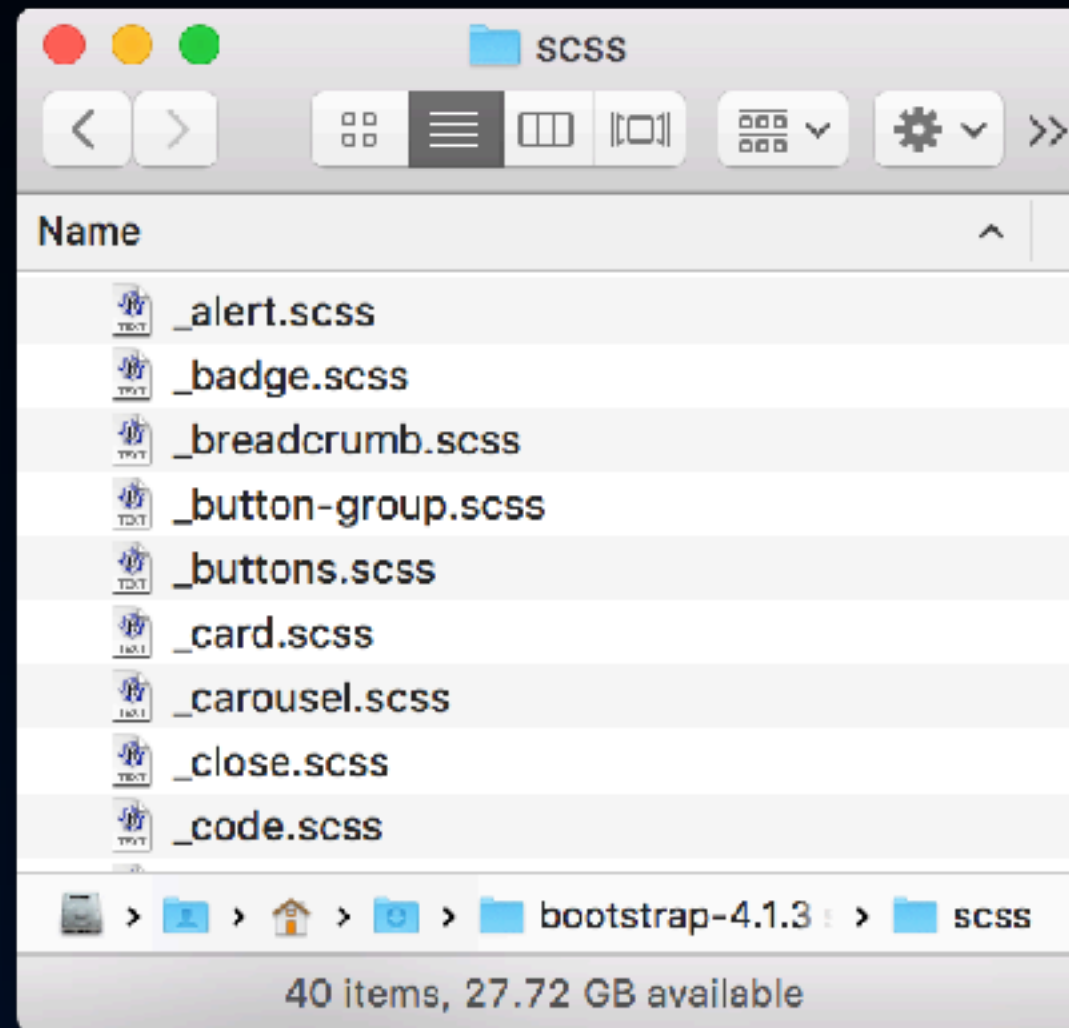
Looking Ahead: Bootstrap 4 + Sass



*source
style rules
written in
CSS pre-processor
language Sass*

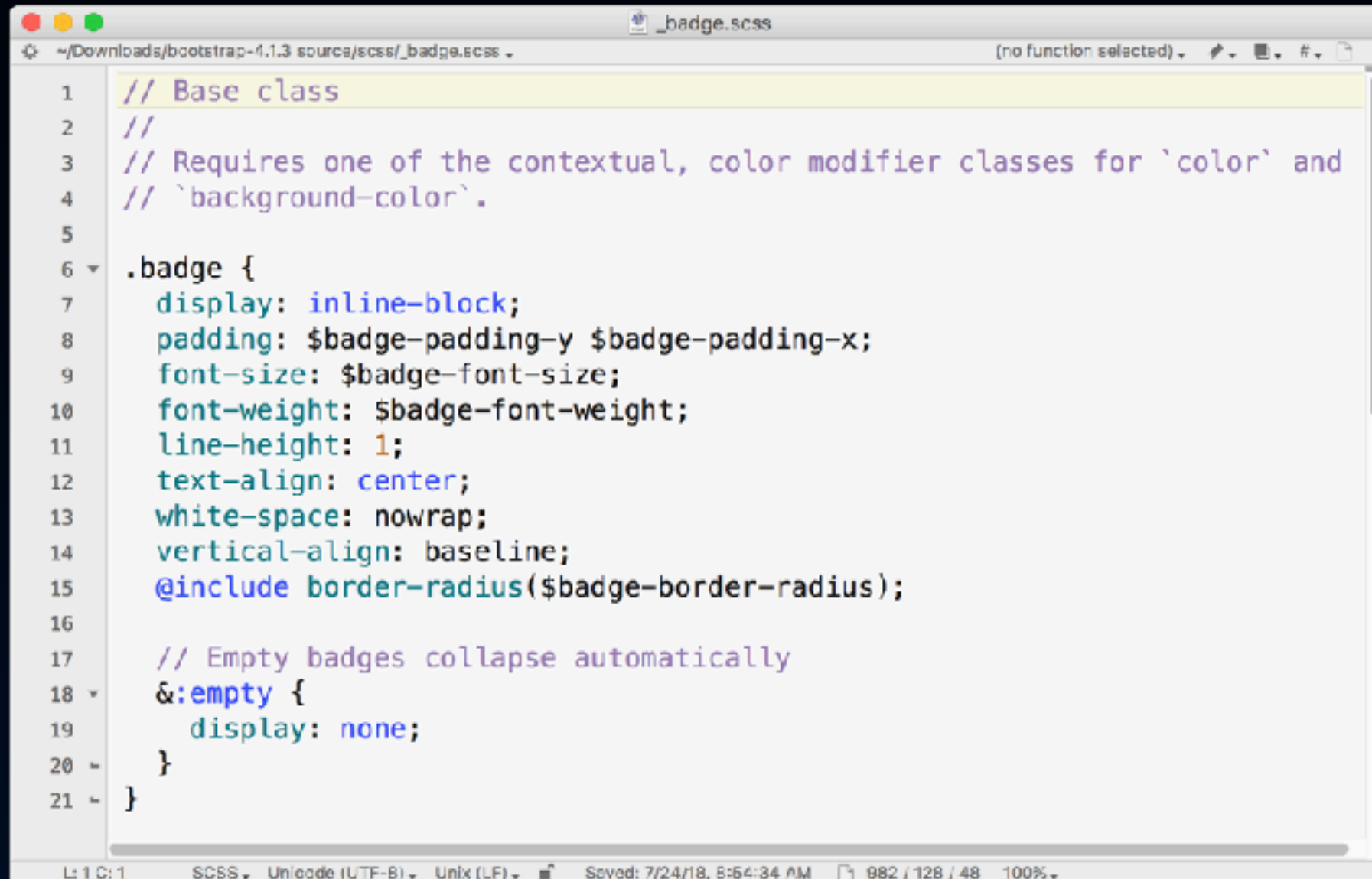
***Bootstrap 4 source code at
<https://getbootstrap.com/docs/4.1/getting-started/download/>***

Looking Ahead: Bootstrap 4 Sass Style Files



***Bootstrap 4 source code at
<https://getbootstrap.com/docs/4.1/getting-started/download/>***

Looking Ahead: Bootstrap 4 Sass Style Files



```
1 // Base class
2 //
3 // Requires one of the contextual, color modifier classes for `color` and
4 // `background-color`.
5
6 .badge {
7   display: inline-block;
8   padding: $badge-padding-y $badge-padding-x;
9   font-size: $badge-font-size;
10  font-weight: $badge-font-weight;
11  line-height: 1;
12  text-align: center;
13  white-space: nowrap;
14  vertical-align: baseline;
15  @include border-radius($badge-border-radius);
16
17  // Empty badges collapse automatically
18  &:empty {
19    display: none;
20  }
21 }
```

The screenshot shows a code editor window titled "_badge.scss" with the following content:

```
1 // Base class
2 //
3 // Requires one of the contextual, color modifier classes for `color` and
4 // `background-color`.
5
6 .badge {
7   display: inline-block;
8   padding: $badge-padding-y $badge-padding-x;
9   font-size: $badge-font-size;
10  font-weight: $badge-font-weight;
11  line-height: 1;
12  text-align: center;
13  white-space: nowrap;
14  vertical-align: baseline;
15  @include border-radius($badge-border-radius);
16
17  // Empty badges collapse automatically
18  &:empty {
19    display: none;
20  }
21 }
```

The editor's status bar at the bottom indicates: "L: 1 C: 1 SCSS Unicode (UTF-8) Unix (LF) Saved: 7/24/18, 5:54:34 AM 982 / 128 / 48 100%".

*Sass is an extension of the CSS language.
Above is shown the Sass rule for **.badge***

What is Sass?

Sass is a CSS pre-processor, meaning that it extends the CSS language...

adding features that allow variables, mixins, functions and many other techniques...

allowing you to make CSS that is more maintainable, themeable and extendable.

Sass project site at <https://sass-lang.com/>

Preparing for the Midterm Project

**“An interactive
and responsive catalog.”**

What is the Midterm Project?

Preparing for the Midterm Project

Using Bootstrap 4.1

7 responsive pages

External CSS

Organized filesystem

**Content: self-authored or
with permission + attribution**

What is the Midterm Project?

Preparing for the Midterm Project

Creating a Navigable Prototype of Your Midterm Project

Week 6: Add custom CSS overrides to a copy of your second draft prototype of your midterm project.

Be ready to...

Share preview access URL with everyone in Week 7.

This Week's Assignment

What to Do Next

- **Reading**
 - Read: Part 1 of “How to Customize Bootstrap 4” by Carol Skelly
 - ***Part 1. Simple CSS Overrides***
 - Want to look ahead?
 - Read the rest of this article for a preview of Sass.
- **Homework**
 - **Assignment 6: Restyling Bootstrap**
 - **Quiz 1**
 - **Discussion 3: Interaction Design**
 - Complete Assignment 6 using your Cloud9 workspace.
- **Canvas Site**
 - All materials available there
 - <https://canvas.santarosa.edu/courses/32995>