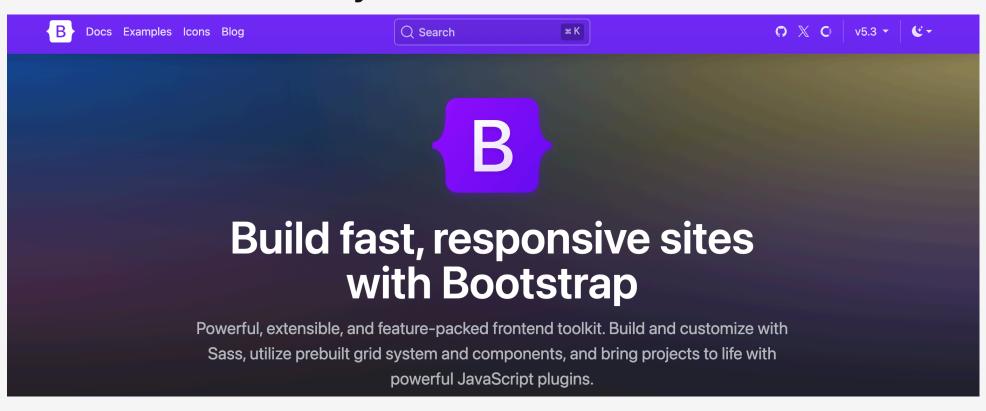
Customization and branding



Bootstrap

Quarto uses the popular **Bootstrap** library for HTML structure and CSS styles.



Bootstrap

You can use **Bootstrap components and classes** for special styling

```
[Here's a button](thing.pdf){.btn .btn-primary role="button"}
[Here's another button](thing.pdf){.btn .btn-warning role="button"}
```

 \downarrow

Here's a button

Here's another button

Bootswatch themes

Quarto includes 25 themes from **Bootswatch**:

- default
- cerulean
- cosmo
- cyborg
- darkly
- flatly
- journal
- litera
- lumen

- lux
- materia
- minty
- morph
- pulse
- quartz
- sandstone
- simplex
- sketchy

- slate
- solar
- spacelab
- superhero
- united
- vapor
- yeti
- zephyr

Changing themes

Specify the custom theme under theme in the YAML settings:

```
_quarto.yml

1 format:
2 html:
3 theme:
4 - zephyr
```

Your turn

- 1. Go to **bootswatch.com** and explore the different themes there (use the top navigation bar).
- 2. Preview your site, then try changing different Bootswatch themes in _quarto.yml.



Theme options

Sometimes we want to change theme settings though Many common basic options: https://quarto.org/docs/output-formats/html-themes.html#basic-options

Total control with CSS

Crash course in CSS

HTML elements can have IDs and classes

HTML elements can be nested inside each other

You can target HTML elements with different degrees of specificity:

- All <h3> headings
- H3 headings with the class neato
- <a> links that are inside a div with the id quartosidebar

Browser inpsector

Explore and edit any HTML and CSS right from your browser.

Sass: CSS, but fancier

variables rules that use variables

Combining CSS and themes

asdf

Your turn

Create a SCSS file and make a bunch of rules



CSS is a little inconvenient

- Doesn't play well across HTML outputs HTML, slides, and dashboards all use slighlty different underlying HTML
- No easy way to reuse the colors and typography from your CSS customizations in R and Python plots or in PDF documents
- Hard to share consistent, resusable themes with others in your organization (or with the world)

Style guides

Organizations and projects generally have style guides for consistency

Urban Institute

This course! See the colophon



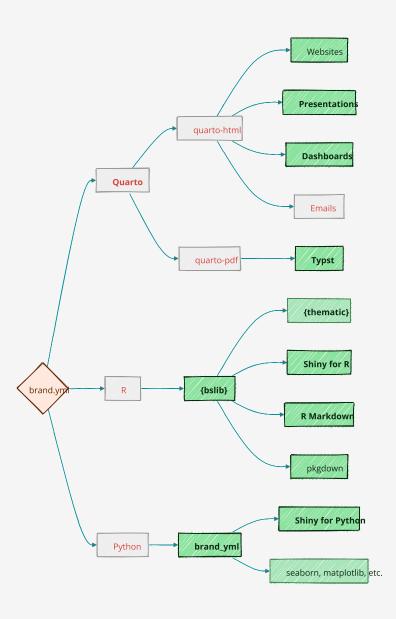
Unified branding with a simple YAML file

Create reports, apps, dashboards, plots and more that match your company's brand guidelines with a single _brand.yml file.

Branding can be frustrating But brand.yml makes it easier

- Define branding in a single _brand.yml file.
- 2. Apply that branding across almost all Quarto formats.

brand.yml also works with Shiny!



brand.yml elements

- meta: Identifying information, name of the company, URLs, etc.
- Logo: Files or links to the brand's logos.
- color: Colors in the brand's color palette.
- typography: Fonts for different elements.
- defaults: Additional context-specific settings.

brand.yml structure

```
_brand.yml
 1 meta:
     name: World Happiness Report
    link:
       home: https://www.worldhappiness.report/
   logo:
     images:
       icon:
         path: images/whr_logo.png
         alt: World Happiness Report icon.
10
11
     small: images/whr_logo.png
12
13 color:
14
     palette:
15
       dark-purple: "#93358c"
       light-purple: "#f8f6fb"
16
       teal: "#04afaf"
17
18
       dark-blue: "#086992"
```

How to apply brand.yml to Quarto

- 1. Define branding in _brand.yml.
- 2. Save in the root directory of your Quarto project.

Quarto will detect the presence of _brand.yml and automatically apply the brand to all documents of the supported formats in the project.

If your brand file has a different name or lives in a subdirectory, use the brand key.

```
my-document.qmd

1 ---
2 title: "World Happiness Report"
3 subtitle: "Happiness Trends and Contributing Factors (2011-2024)"
4 format: html
5 brand: org_theme.yml
6 ---
```

Disable brand.yml

To turn off brand.yml for a document, use brand: false.

```
my-document.qmd

1 ---
2 title: "World Happiness Report"
3 subtitle: "Happiness Trends and Contributing Factors (2011-2024)"
4 format: html
5 brand: false
6 ---
```

brand shortcode

Access some brand.yml values with a shortcode.

```
my_document.qmd

1 {{< brand color primary >}}
```

Your turn

05:00

What about plots?

Theme helpers

The quarto packages contain theme helpers that apply branding to plots.

R Python

```
1 library(quarto)
2
3 my_theme <- theme_brand_ggplot2("_brand.yml")</pre>
```

R: https://quarto-dev.github.io/quarto-r/articles/theme-helpers.html
Python: https://github.com/quarto-dev/quarto-python?tab=readme-ov-file#theme-helpers

Your turn

05:00

brand.yml packages

Access and apply specific brand elements.

R

Python

```
1 library(brand.yml)
2
3 brand <- read_brand_yml("_brand.yml")
4
5 brand$color$primary</pre>
```



What's next?

Course outline

- V Intro to Quarto
- Creating basic websites
- Advanced website features
- Value
 Publishing
- Customization and branding
- Interactivity

