### Quarto Clean Theme

A Minimalistic Theme for Quarto + Typst + Touying

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# **Section Slide as Header Level 1**

### Slide Title as Header Level 2

#### Subtitle as Header Level 3

You can put any content here, including text, images, tables, code blocks, etc.

- first unorder list item
  - $\rightarrow$  A sub item
- 1. first ordered list item
  - i. A sub item

Next, we'll brief review some theme-specific components.

- ▶ Note that all of the standard Quarto + Typst features can be used with this theme
- Also, all the Touying features can be used by Typst native code

### Before You Go...

The clean theme does not depend on any languages. You can use it with any language supported by Quarto, including R, Python, Julia.

For this demo, I use R code to show the figures and tables usage in the slides.

#### Ordered & Unordered Lists

Here we have an unordered list.

- first item
  - → sub-item
- second item

And next we have an ordered one.

- 1. first item
  - i. sub-item
- 2. second item

#### Alerts & Cross-refs

### Special classes for emphasis

- .alert class for default emphasis, e.g. the second accent color.
- ▶ .fg class for custom color, e.g. with options='fill: rgb("#5D639E")'.
- bg class for custom background, e.g. with the default color.

To cross-reference, you have several options, for example:

- ► Beamer-like .button class provided by this theme, e.g. ► Appendix
- ▶ Sections are not numbered in Touying, you cannot use @sec- cross-references

#### Citations

Citations follow the standard Quarto format and be sourced from BibLaTeX, BibTeX, or CLS files. For example:

- Topic 1: Review of DID (Arkhangelsky and Imbens 2024)
- ► Topic 2: Goodman-Bacon (2021)

#### **Small Citations**

In many cases, you may want to use small citations, like

▶ Staggered DID (Callaway and Sant'Anna 2021; Sun and Abraham 2021; Borusyak, Jaravel, and Spiess 2024)

This .small-cite class is defined as a custom style custom style

#### Blocks

Quarto provides dedicated environments for theorems, lemmas, and so forth.

But in presentation format, it's arguably more effective just to use a Callout Block.

i Regression Specification

The main specification is as follows:

$$y_{it} = X_{it}\beta + \mu_i + \varepsilon_{it}$$

Multicolumn I: Text only

#### Column 1

Here is a long sentence that will wrap onto the next line as it hits the column width, and continue this way until it stops.

Some text that should be laid out below the code

#### Column 2

Some other text in another column.

A second paragraph.

Quarto's layout is more simple and flexible than Touying's native multicolumn support.

### Multicolumn II: Text and Figures



- First point
- Second point

For simple cases, you don't even need to specify the class for each column.

### Ad-hoc Styling

### Typst CSS

- Quarto supports Typst CSS for simple styling
- ► You can change colors, backgrounds, and opacity for span elements

# You can also change the font size and family for div elements.

### Vertical Spacing

- ► A helper shortcode {{< v DIST >}} is provided to add vertical spacing
- ► This is converted to a Typst code #v(DIST) internally.

This is a 2em vertical spaced from above.

### Custom Styling

As latex-environment quarto extenstion, you can define custom div and span elements.

```
format:
   clean-typst:
    include-in-header: "custom.typ"
    commands: [foo]
```

- ► You can define custom div and span elements as Typst functions in custom.typ
  - → environments in YAML is for block elements :::{.foo}\nbody\n:::
  - → commands in YAML is for inline elements []{.foo}
- [text]{.foo options="opts"} is converted to #foo(opts)[text] internally
- If you want to use self as an argument, you can use touying-fn-wrapper()

### brand.yml Support

```
brand:
  typography:
    base: Montserrat
    headings:
      family: Josefin Sans
      weight: semi-bold
    color:
      palette:
        green: "#009F8C"
        pink: "#B75C9D"
      primary: green
      secondary: pink
```

- ► This template supports brand.yml for typography and color settings
- ► See template-brand.qmd for the full example

# **Animations**

Touying's simple animations is available as {{< pause >}} and {{< meanwhile >}}

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#### **Animations in Lists**

Simple animations can be used in lists

First

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Simple animations can be used in lists

- ► First
- Second

#### **Incremental Class** (experimental)

As revealjs, you can use .incremental class

First

Touying's simple animations is available as {{< pause >}} and {{< meanwhile >}}

#### **Animations in Lists**

Simple animations can be used in lists

- ► First
- Second

#### **Incremental Class** (experimental)

As revealjs, you can use .incremental class

- ▶ First
- Second

Touying's complex animations is available as {.complex-anim repeat=4} environment.

At subslide 1, we can

use for reserving space,

use for not reserving space,

call #only multiple times **X** for choosing one of the alternatives. But only works in a native Typst code.

Touying's complex animations is available as {.complex-anim repeat=4} environment.

At subslide 2, we can

use {.uncover} environment for reserving space,

use {.only} environment for not reserving space,

use #alternatives function 
for choosing one of the alternatives. But only works in a native Typst code.

Touying's complex animations is available as {.complex-anim repeat=4} environment.

At subslide 3, we can

use {.uncover} environment for reserving space,

use {.only} environment for not reserving space,

use #alternatives function 
for choosing one of the alternatives. But only works in a native Typst code.

Touying's complex animations is available as {.complex-anim repeat=4} environment.

At subslide 4, we can

use {.uncover} environment for reserving space,

use {.only} environment for not reserving space,

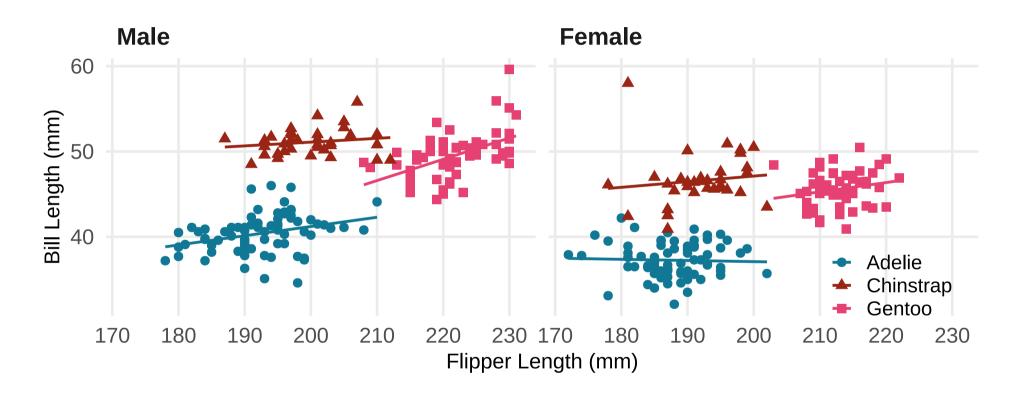
use #alternatives function 
for choosing one of the alternatives. But only works in a native Typst code.

#### Other Features

- ► All the animation functions can be used in Typst Math code ► Appendix
- handout: true in YAML header is available for handout mode (without animations)

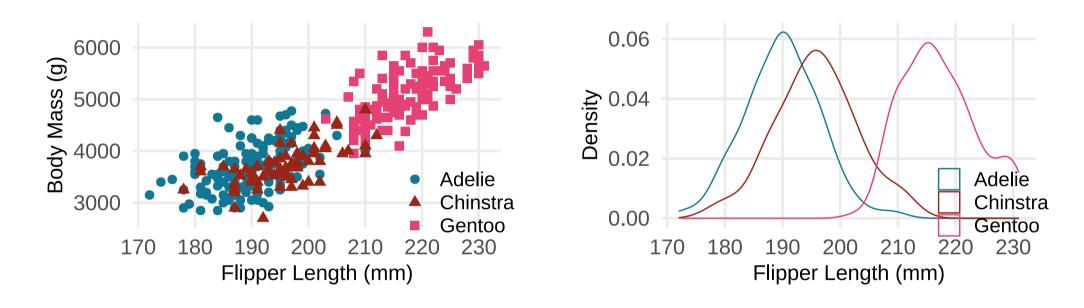
# Figures & Tables

# Figures



This is a facet\_wrap example with penguins dataset.

# Figures



This is an example of layout-ncol: 2 for two figures.

### Tables

	Male				Female			
	Bill	Bill	Flipper	Body	Bill	Bill	Flipper	Body
	Length	Depth	Length	Mass	Length	Depth	Length	Mass
	(mm)	(mm)	(mm)	(g)	(mm)	(mm)	(mm)	(g)
Adelie	40.39	19.07	192.4	4043	37.26	17.62	187.8	3369
Gentoo	49.47	15.72	221.5	5485	45.56	14.24	212.7	4680
Chinstrap 51.09		19.25	199.9	3939	46.57	17.59	191.7	3527

► You can easily create Typst tables by tinytable

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- You can highlight by tinytable::style\_tt()!

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- ► You can easily create Typst tables by tinytable
- You can highlight by tinytable::style\_tt()!
- ▶ Read the GitHub Issue and see theme\_slides() for the table without captions

# Regression Table

	Bill	Length (m	ım)	Body Mass (g)				
	(1)	(2)	(3)	(4)	(5)	(6)		
Chinstrap	10.042**	10.010**	10.037**	32.426	26.924	27.229		
	(0.432)	(0.341)	(0.340)	(67.512)	(46.483)	(46.587)		
Gentoo	8.713**	8.698**	8.693**	1375.354**	1377.858**	1377.813**		
	(0.360)	(0.287)	(0.286)	(56.148)	(39.104)	(39.163)		
Male		3.694**	3.694**		667.555**	667.560**		
		(0.255)	(0.254)		(34.704)	(34.755)		
Year			0.324*			3.629		
			(0.156)			(21.428)		
Observations	342	333	333	342	333	333		

<sup>+</sup> p < 0.1, \* p < 0.05, \*\* p < 0.01

modelsummary is a super useful for regression tables (tinytable is used internally)

### Last Words

#### Installation

quarto install extension kazuyanagimoto/quarto-clean-typst

#### Limitations

Background colors and images are not supported

### **Appendix**

You can use {{< appendix >}} to start an appendix section. Slide numbering will be freezed. (Next Slides)

# **Appendix**

# Touying Math Animations

```
Touying equation with pause:

$
f(x) &= pause x^2 + 2x + 1 \
    &= pause (x + 1)^2 \
$
Touying equation is very simple.
```

Touying equation with pause:

$$f(x) =$$

Touying equation is very simple.



# Touying Math Animations

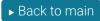
```
Touying equation with pause:

$ f(x) \&= pause x^2 + 2x + 1 \setminus \&= pause (x + 1)^2 \setminus \&= Touying equation is very simple.
```

Touying equation with pause:

$$f(x) = x^2 + 2x + 1$$
$$=$$

Touying equation is very simple.



# Touying Math Animations

```
Touying equation with pause:

$
f(x) &= pause x^2 + 2x + 1 \
    &= pause (x + 1)^2 \
$
Touying equation is very simple.
```

Touying equation with pause:

$$f(x) = x^2 + 2x + 1$$
$$= (x+1)^2$$

Touying equation is very simple.



### References

- Arkhangelsky, Dmitry, and Guido Imbens. 2024. "Causal Models for Longitudinal and Panel Data: A Survey". June 25, 2024. https://doi.org/10.48550/arXiv.2311.15458
- Borusyak, Kirill, Xavier Jaravel, and Jann Spiess. 2024. "Revisiting Event-Study Designs: Robust and Efficient Estimation". The Review of Economic Studies, February, rdae7. https://doi.org/10.1093/restud/rdae007
- Callaway, Brantly, and Pedro H.C. Sant'Anna. 2021. "Difference-in-Differences with Multiple Time Periods". Journal of Econometrics 225 (2): 200–230. https://doi.org/10.1016/j.jeconom.2020.12.001
- Goodman-Bacon, Andrew. 2021. "Difference-in-Differences with Variation in Treatment Timing". Journal of Econometrics, Themed Issue: Treatment Effect 1, 225 (2): 254–77. https://doi.org/10.1016/j.jeconom.2021.03.014

### References

Sun, Liyang, and Sarah Abraham. 2021. "Estimating Dynamic Treatment Effects in Event Studies with Heterogeneous Treatment Effects". Journal of Econometrics 225 (2): 175–99. https://doi.org/10.1016/j.jeconom.2020.09.006