The ReadME Project

PRESENTS

Using code as documentation to save time and share context

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M0nica/README.md 

I am passionate about making contributing to open-source more approachable, creating technology to elevate people, and building community. Currently, I'm a **Senior Software Engineer at Newsela** building educational technology.
In 2020, I was selected to be an inaugural **GitHub Star** based on my involvement in the tech community.

Code-based documentation can

- **Enhance traditional documentation** with templates that mirror decisions (i.e., preferred software, directory structure, naming conventions)
- **Reduce onboarding** time to:
  - set up a new machine
  - contribute to a new codebase

Maintain Configuration Files Remotely

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Where do remote files live?

Stored in the cloud, or a remote git repository (hosted on a site like GitHub) *instead* of on your local computer

How long would it take you to set up a new computer?

Days?

Hours?

Minutes?

I estimate at least a three day's worth of work (downloading things and waiting for them to download 😴) if I have to install everything manually. But I was able to set my computer up in hours (automatically) thanks to dotfiles.”

Zell Liew, Migrating to a new Mac

Remote configuration files make setting up lightning fast ⚡

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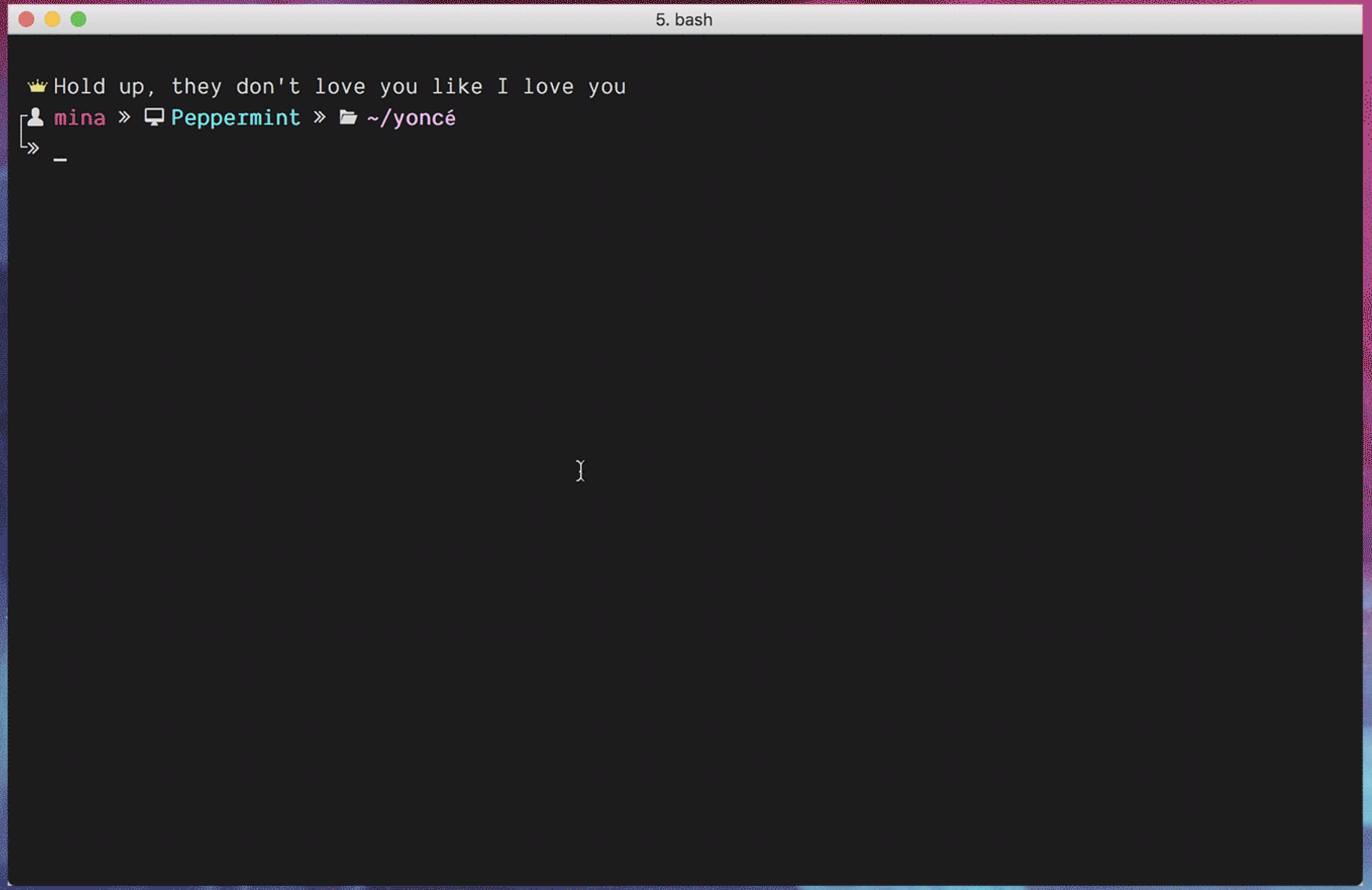
Dotfiles

configuration files, traditionally hidden 🤫


5. bash
Hold up, they don't love you like I love you
mina » Peppermint » ~/yoncé
»

Dotfiles

Configuration files that **may be hidden by default** 🤫

- .gitignore
- .gitattributes
- .bashrc
- .bash_profile
- .zshrc
- .bash_history
- .zsh_history

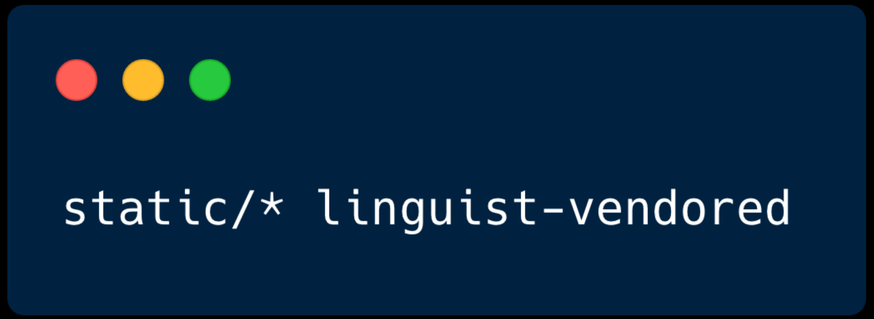
gitignore

Keep your secrets secret 🤫 and **avoid accidentally adding large files** to git 🐘

```
# Logs
logs
yarn-error.log

# Dependency directories
node_modules/

# dotenv environment variables file
.env

# generated Gatsby files
.cache/
public

# Mac files
.DS_Store
```

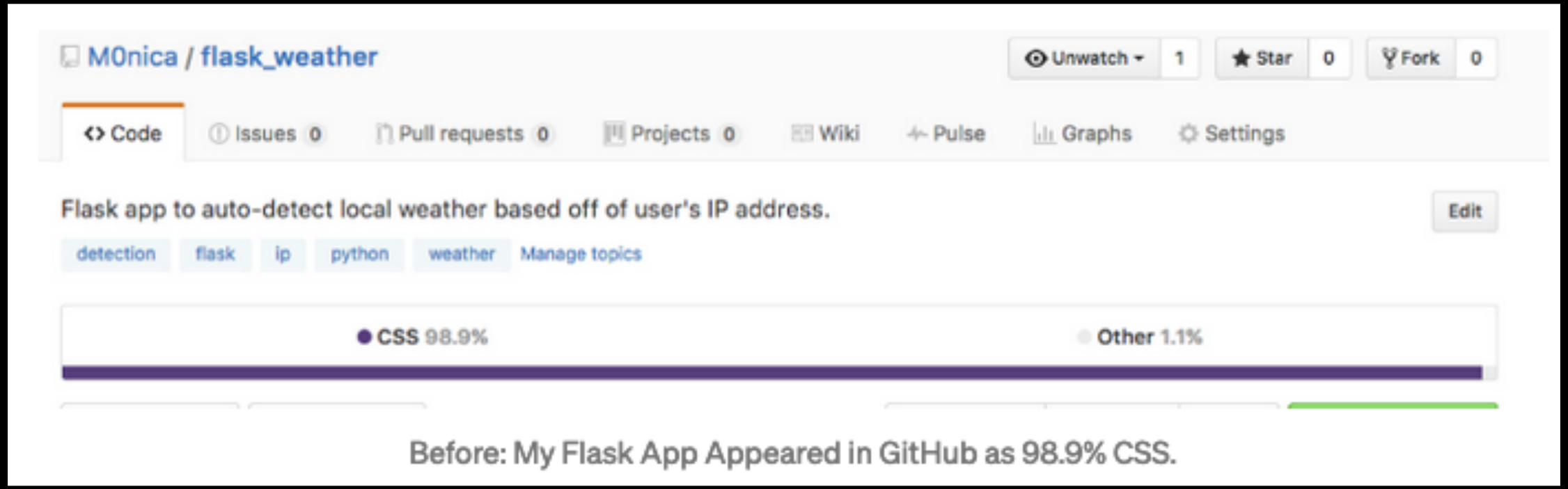
gitattributes

Define custom attributes for a git repository. Can be used to override the programming languages detected by GitHub's Linguist Library.



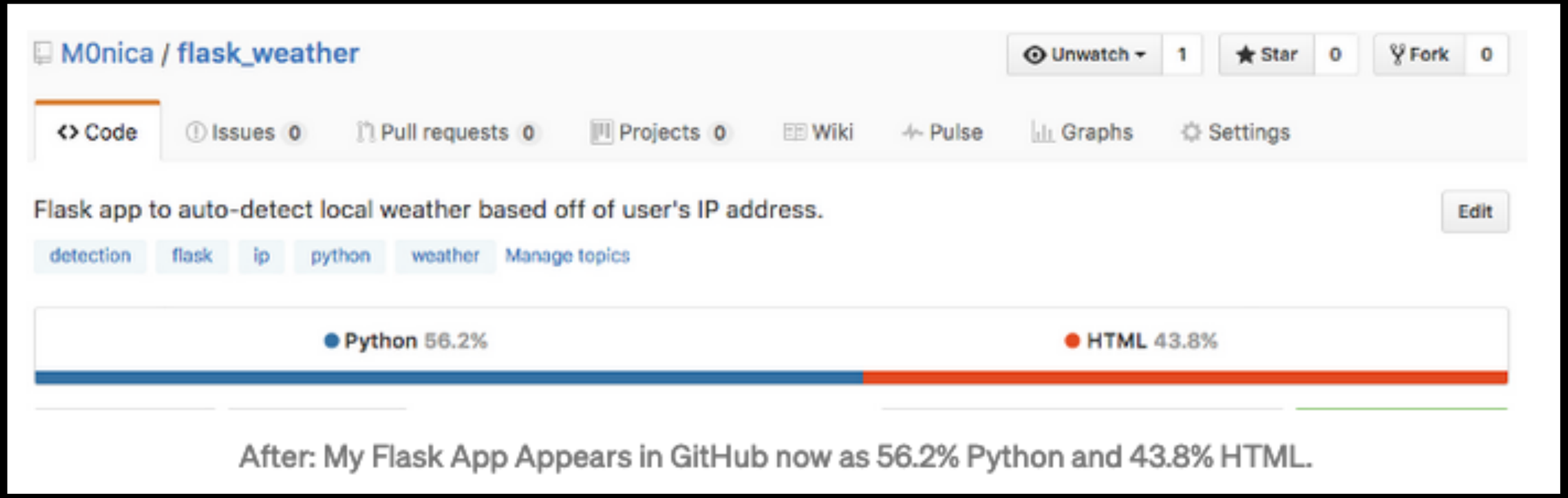
gitattributes

98.9% CSS & 1.1% other



gitattributes

98.9% CSS & 1.1% other. → 56.2% Python and 43.8% HTML



bash_history && zsh_history

Stores recent commands and power autocomplete 🪄

“

Brewfile: a Gemfile, but for Homebrew.”

Gabe Berke-Williams, Thoughtbot Blog

Install Apps via Homebrew

```
# Install Homebrew (if not installed)
echo "Installing Homebrew."
/bin/bash -c "$(curl -fsSL https://raw.githubusercontent.com/Homebrew/install/HEAD/install.sh)"


# Installs Casks
brew tap homebrew/cask

## Apps to iNSTALL
brew install firefox
brew install adobe-creative-cloud
brew install github
brew install slack
brew install spotify
brew install visual-studio-code
brew install zoom

# Remove outdated versions from the cellar.
brew cleanup
```

Automate File Creation for Standardization

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How long can you work on making a routine task more efficient before you're spending more time than you save?

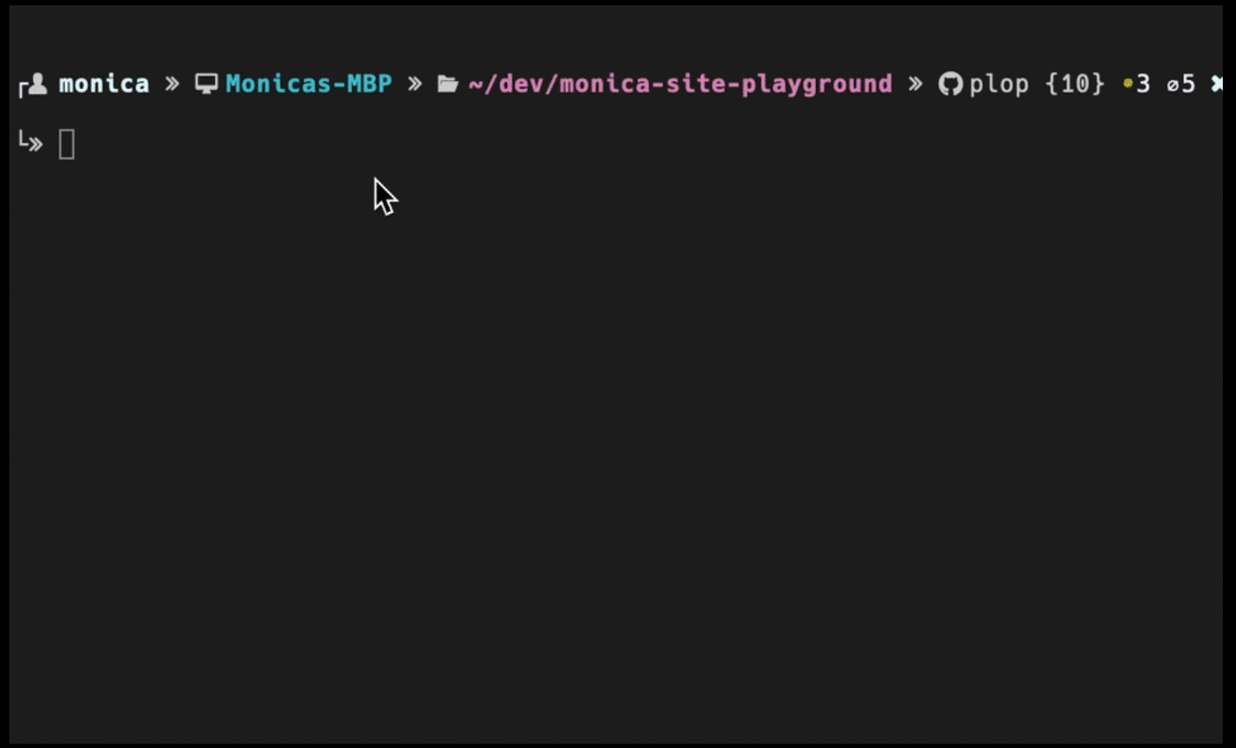
How often do you do the task? Daily? Weekly?

How much time do you shave off? Seconds? Minutes?

Scaffolding saves time

- **Reduces the need to reference or copy/paste** boilerplate code
- **Automate the consistent, implementation** of design patterns and best practices
- **Reduces time to generate** new projects, components and features

CLI to Generate Starter Files for New Features



PlopJS

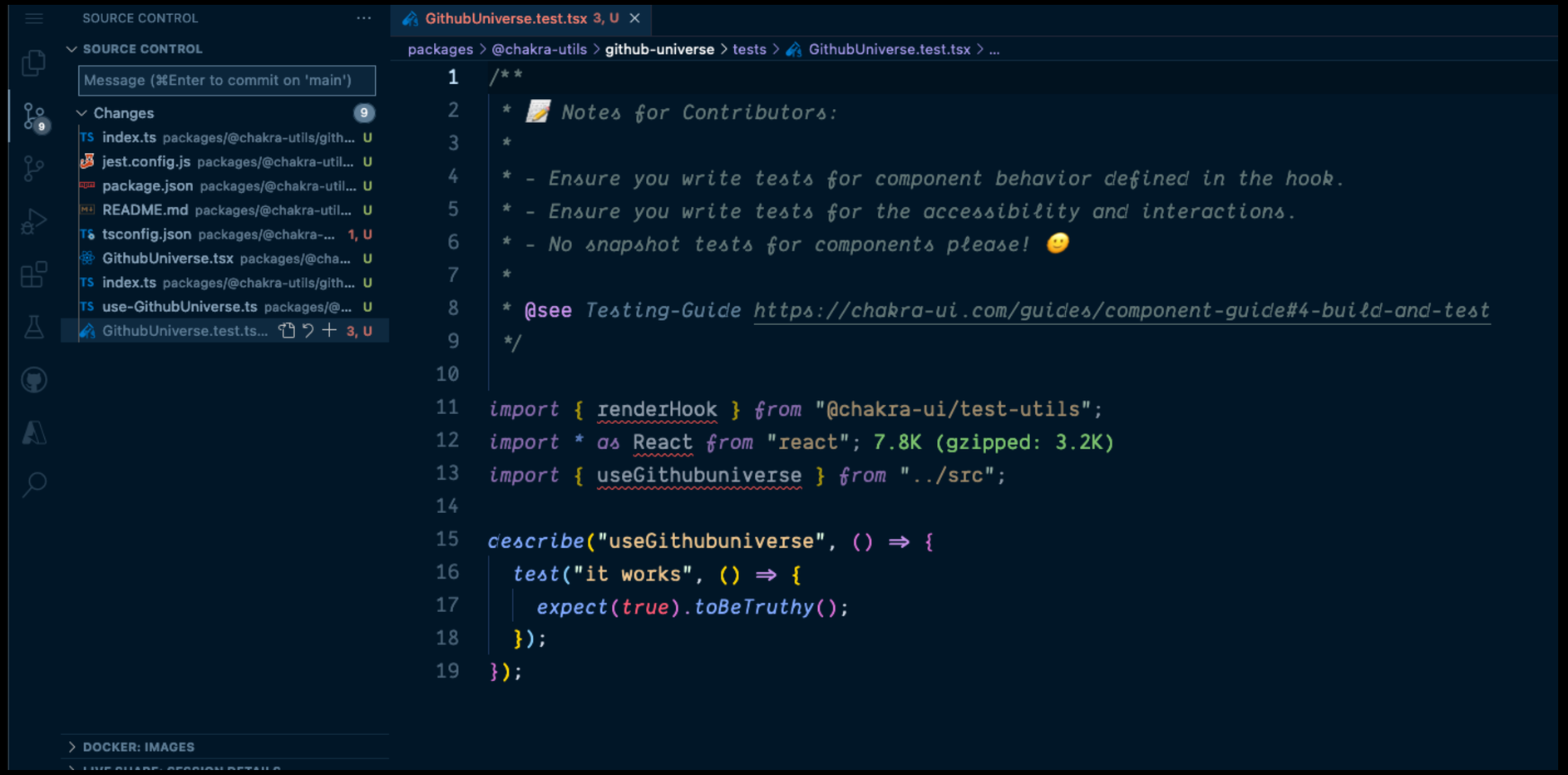
Handlebars + InquirerJS

Scaffolding helps answer common questions

- Where should **translations for this component live**?
- What's our **preferred testing approach**?
- What **files does this type of feature typically need**? Does it need **its own README**?
- Should I use **camelCase**? **snake_case**? **kebab-case**? **PascalCase**? **UPPERCASE_SNAKE_CASE**?

Using Plop in Chakra-UI

Using Plop in Chakra-UI



Scaffolding works alongside traditional documentation

Generated starter files

Can answer **where**, **what** and **how** regarding code conventions

Traditional written documentation

Can provide more context on the ***why*** behind certain conventions

Documenting within a project

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Proximity of Documentation to Code

documentation that lives in close proximity to the relevant code helps keep maintaining documentation top of mind as the software evolves.

Documentation within Codebase

- In-line comments to **explain the why** in conjunction with **meaningful variables and refactoring code** for understanding
- Type declarations **for languages that are not strongly typed**
- Using **TODO/FIXME or other verbiage that can be automatically parsed from AST via custom or third-party plugins** like Todo Tree or TODO Highlight

Thank you!

Learn more at **github.com/readme/guides/code-as-documentation**

 **indigitalcolor**

 **M0nica**