#### Saving and Sharing your code with

# git & Github

What are they? | Common Workflows



# It might git confusing



# But...



# Don't Panic!



## Let's break it down:



# git config'd: Overview

- \* What are git and Github?
- \* What are they used for?
- Common commands
- Common workflows
- \* Practice



# git and Github are 2 different things



#### The command line tool

#### git

- \* A version control system
  - \* also referred to as a VCS
  - allows you to track the changes in your project
  - \* a project with history or versions that can be recalled
- \* Used in the command line

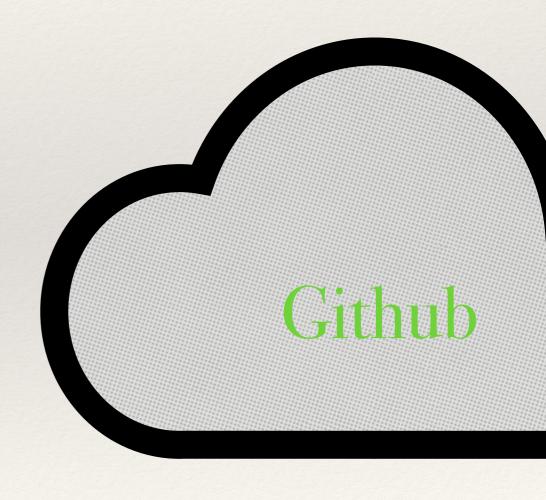




#### The online hosting service

#### Github

- Provides hosting and git version control online
  - allows collaboration with integrated version control
  - version control through graphical user interface
  - a bunch of other tools to help manage collaboration





## Still confused?

psst. That's totally normal.



# Key points

- \* git = manage version control locally (on your machine)
- Github = share and collaborate on code using version control remotely (on the web)



## With that in mind...



## Devs use both

Github remote git local



# git commit to memory

Commands you will eventually know by heart



#### Most Common Commands

- \* **git add** (ex. => git add .)
  - \* used to 'stage' or 'track' changes
- \* git commit -m (ex. => git commit -m 'adds tests')
  - \* used to save changes on 'staged' files
- \* git pull (ex. => git pull origin master)
  - \* get remote changes to local copy
- \* git push (ex. => git push origin feature\_branch)
  - \* get local changes to remote copy



#### More Common Commands

- \* git init
  - \* makes the current folder into a git repository (only needs to be run once)
- \* git status (super useful!)
  - logs the current status of a branch
- \* git log (also super useful!)
  - lists all commits ('saves')
- \* **git clone** (ex. => git clone <copied git repo url>)
  - creates a copy of the repo at the the url locally
- \* git checkout (ex. => git checkout master)
  - creates/moves between branches (the 'cd' of git)



#### Useful in class

- \* git config user.name
  - \* logs/sets the name associated with commits
- \* git config user.email
  - \* logs/sets email associated with commits
- \* git remote
  - \* logs/set/removes the remote address for a repo

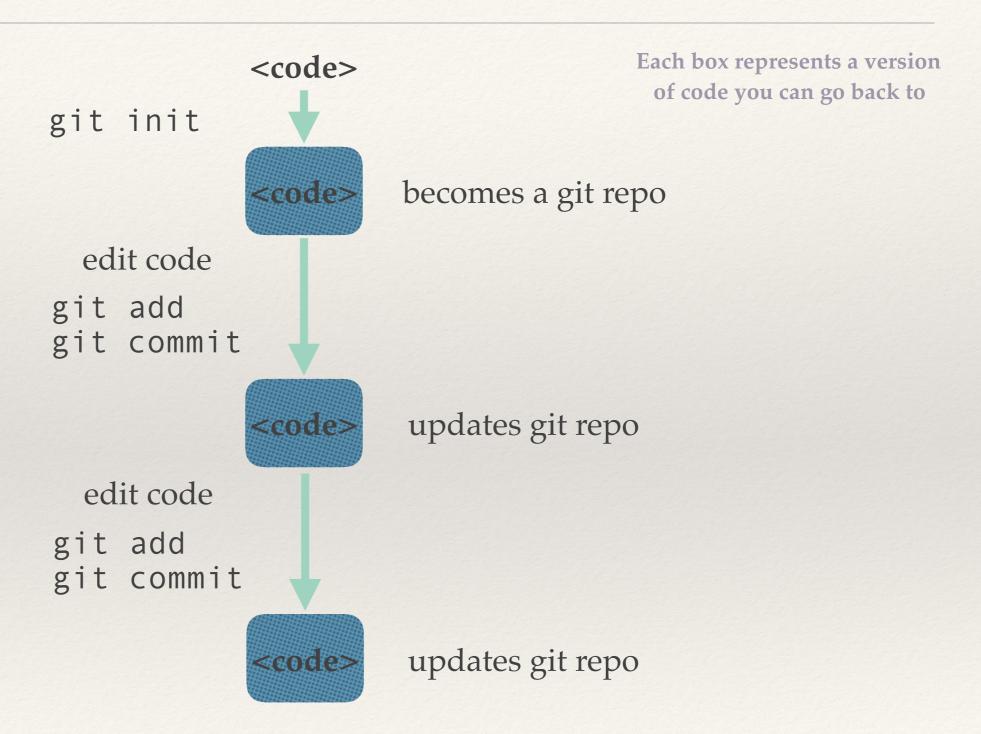


# git push

Let's look at git workflows in practice

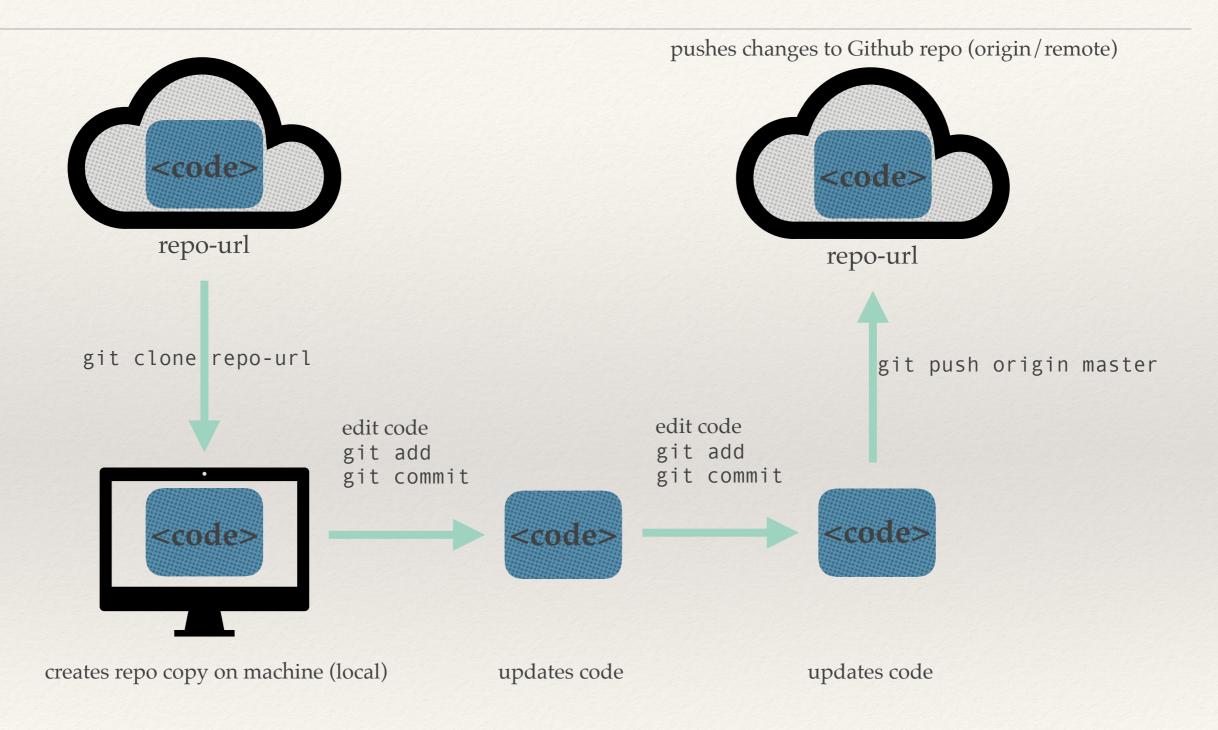


# A simple local workflow





# A common mixed workflow





# Let's practice!

