

# Computer Science Principles

Github Orientation

# Create user account

- <https://github.com/>
- Choose “Unlimited public → free”
- Answer survey questions as you choose
- Skip introduction unless you want to try it
- Make sure to verify account from your email

# Download Desktop App

- <https://desktop.github.com/>
- It should detect which OS you're using, so download and install it.
- Once installed, launch application, not “shell” if using windows

# Initial App Setup

- Login using account you created at [github.com](https://github.com)
- Under “Configure git” just take defaults for now
- Under “Repositories” you should not have any – its ok!
- Click “dashboard” to get started

# Tutorial

- We will do our own work, so click on 'x' on Tutorial setup
- Right Click on "Tutorial" on left side under repositories, and "Remove" it

# Find Class Repository

- Go to [github.com](https://github.com) on web browser
- Skip any tutorials
- In search bar, search for “CSP\_Spring2017”
- Click on link once there

# Forking the Repository

- Click on “Fork” to copy Repository to your account
- Now should have “username”/CSP\_Spring2017 listed on web page

# Back to Github App

- Click “+” sign to add repository
- Click “Clone”
- Your username and forked repository should show up now
- At bottom, click “Clone CSP\_Spring2017”
- It will bring up a folder to place your files, either make your own or click “ok” to use what it suggests



# First Assignment

- Click on “Master” to view files
- Click on “new branch” icon to create a new working copy – name it “Assignment 1”
- Click “View Branch” to go to it.

# Modify Readme

- Open Windows folder where your repository lives.
- If on Windows, install “Notepad++” don’t install any extra software from install package, you don’t need it.
- If on Mac, download and install “Textmate”
- We will use these text editors for class

# Modify Readme

- Right click on Readme.md and open with editor
- Add your email address like I have mine.
- Save file, and go back to Github app.
- Click “changes” from top, and enter Summary and description of change, then Commit change.

# Move Readme.md to class

- The way to “commit” changes to the class is to do a “pull request”. This means you are asking the class to accept your changes.
- Click “pull request” in github app.
- Information should be already in from commit, you may add more text if needed
- Click “Send pull request”

# Back to github.com

- Go back to github.com, easiest might be to open “pull requests” icon from Application
- You should see main class repository, and be able to see “Pull requests” Note other student changes, and check them out, make comments, etc.
- Review is MANDATORY

# Final Step, Merging Changes

- For now, only instructor will merge changes
- Once merged, go back to github application and “sync”
- We will work to update “master” branch in application together
- Once your master is up to date, then click “settings wheel” and delete Assignment 1 branch, where there are TWO of them, one on your computer, and one on main class repository. Delete both!

# Why Source Control?

- Keep a history of work, where you can revert any bad code back to good code
- Keeps your work safe from being deleted
- Helps the team work **together** on the same code base, i.e. synchronized

# Who should use it?

- Everybody!
- Always save your work, whether programming or making presentations!
- It's just being smart and not careless. Who wants to do things over and over because of mistakes? Not me and hopefully not you!