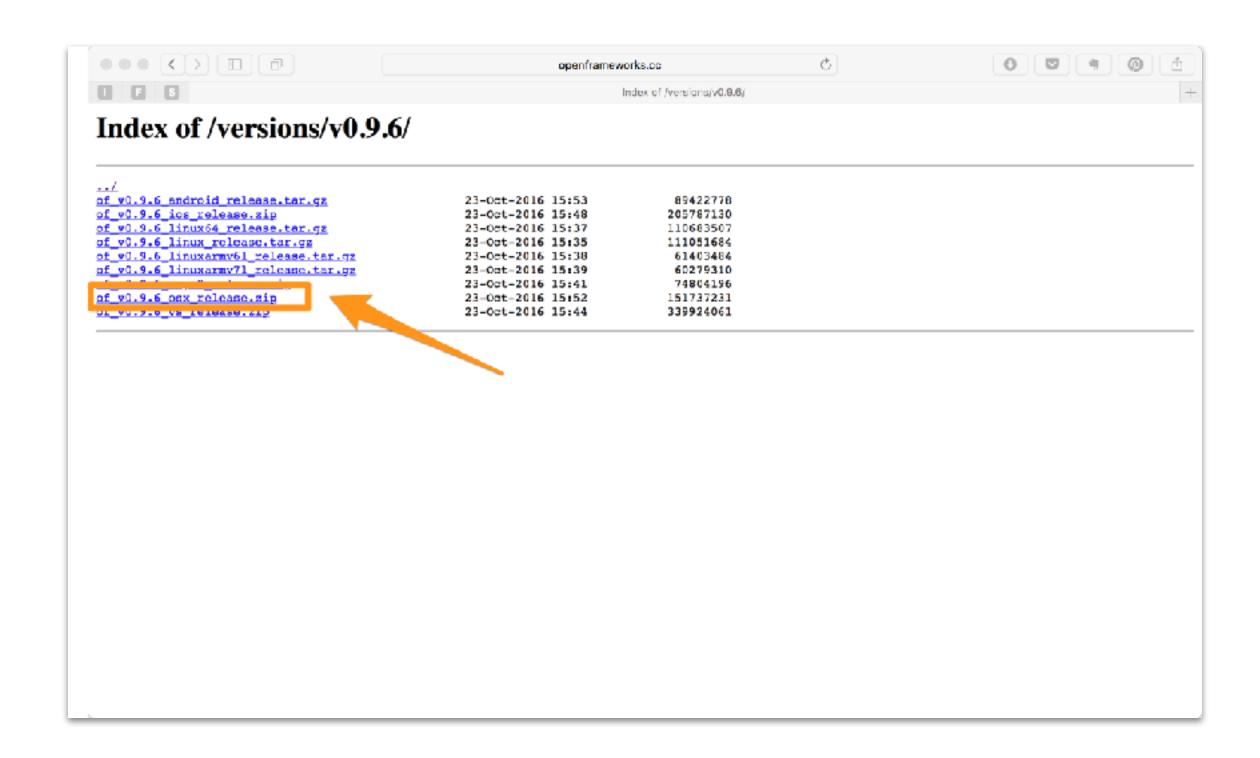
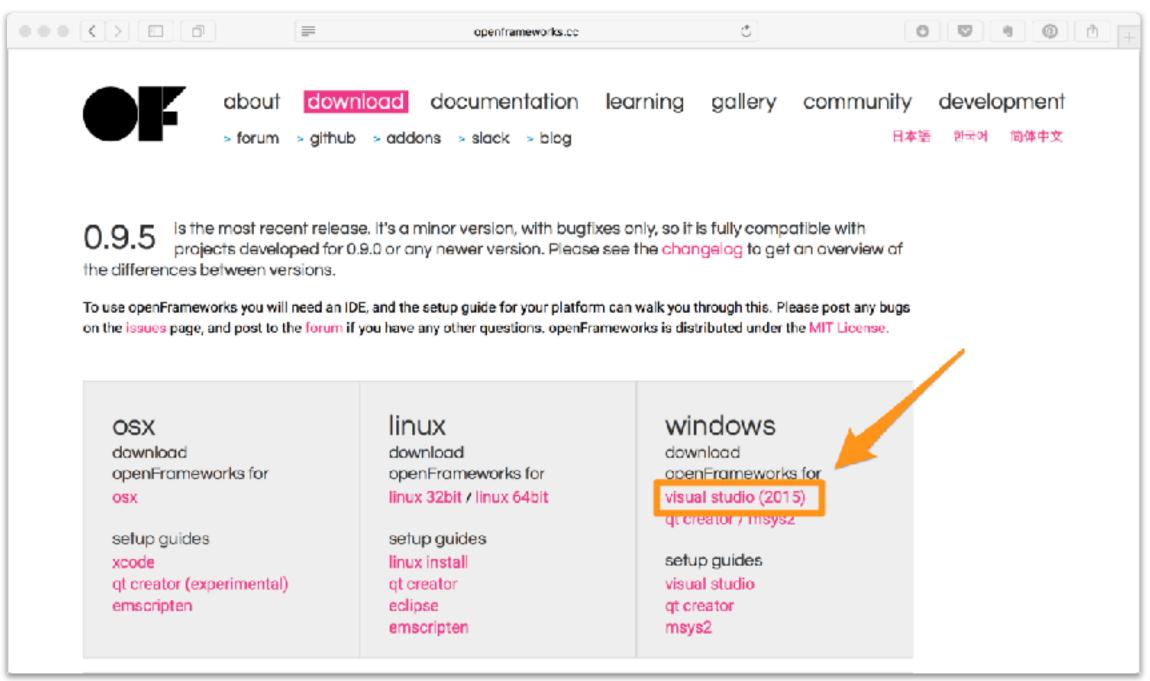
# Your First openFrameworks Application

CC Lab 2016 openFrameworks Week 2



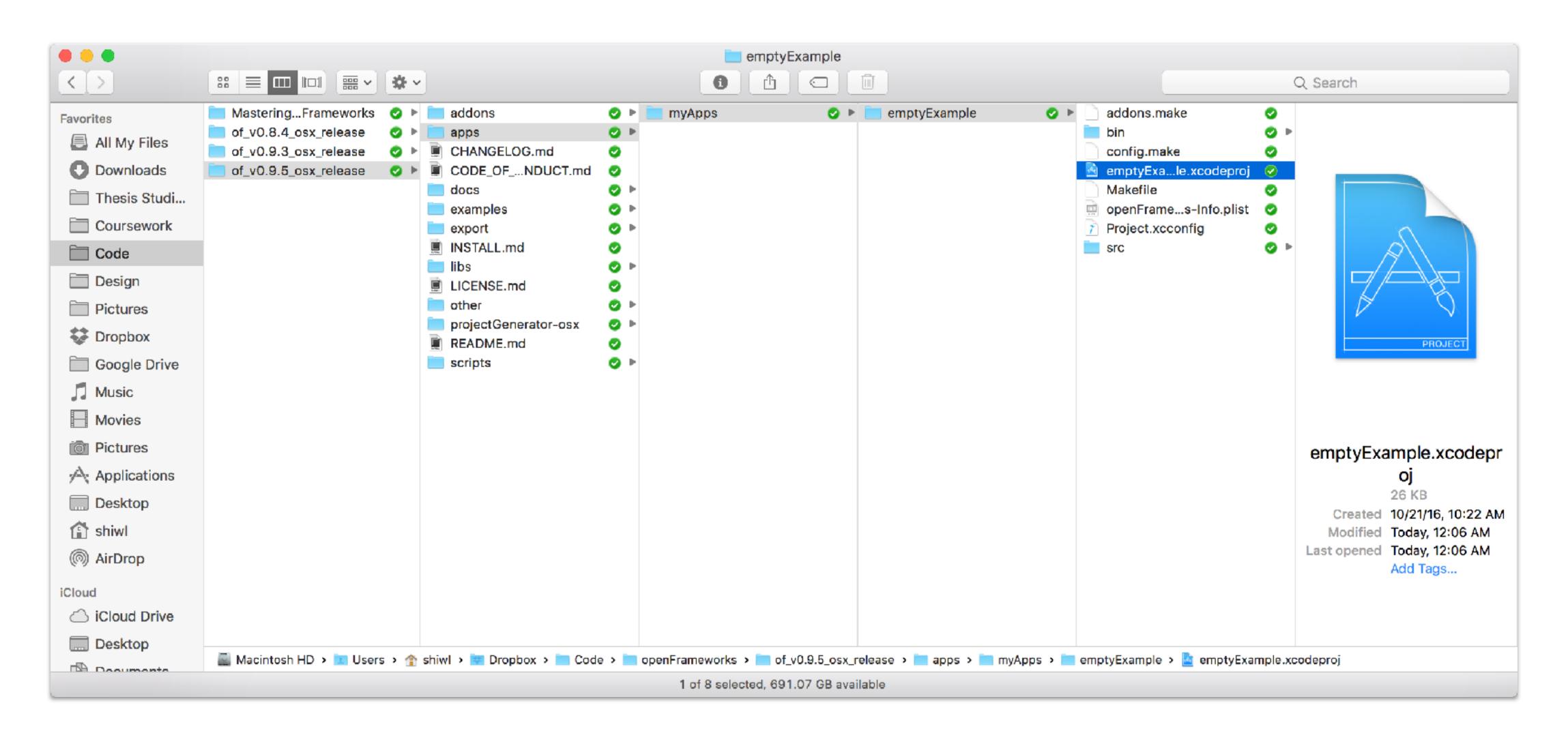


#### Mac

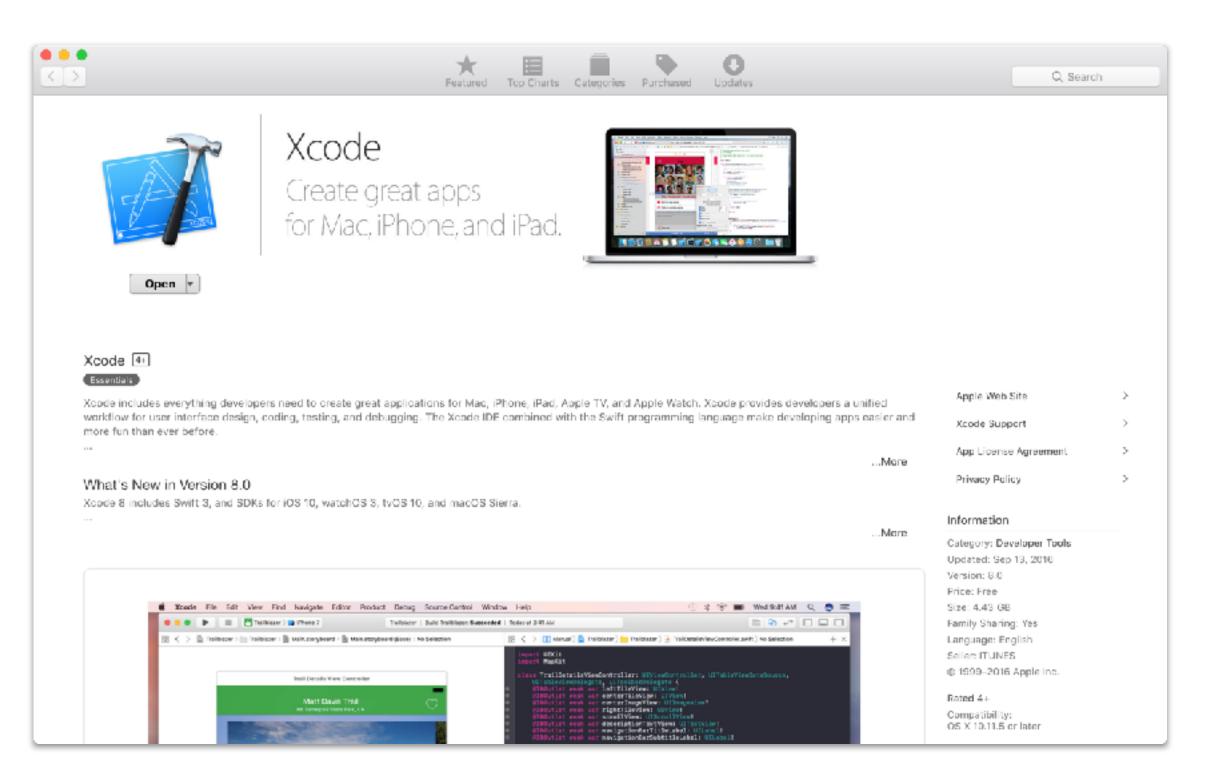
Download openFrameworks 0.9.6 from <a href="http://openframeworks.cc/versions/v0.9.6/">http://openframeworks.cc/versions/v0.9.6/</a>

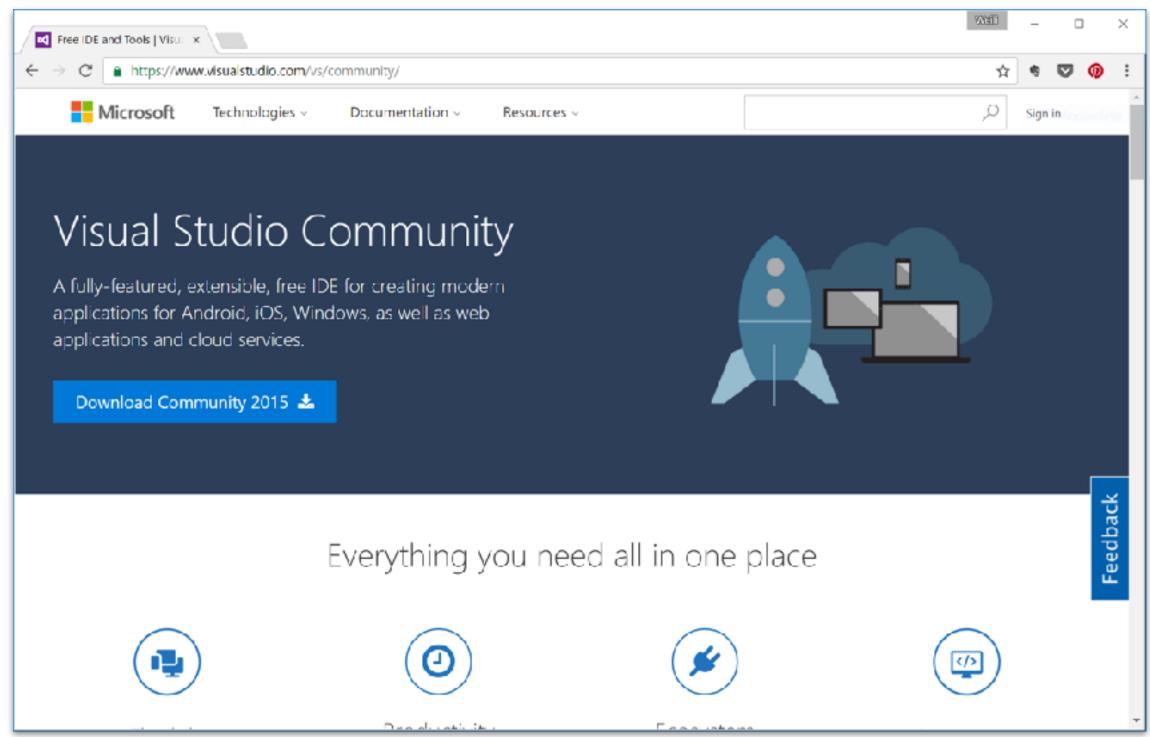
#### Windows

Download openFrameworks 0.9.5 from <a href="http://openframeworks.cc/download/">http://openframeworks.cc/download/</a>



File structure of openFrameworks



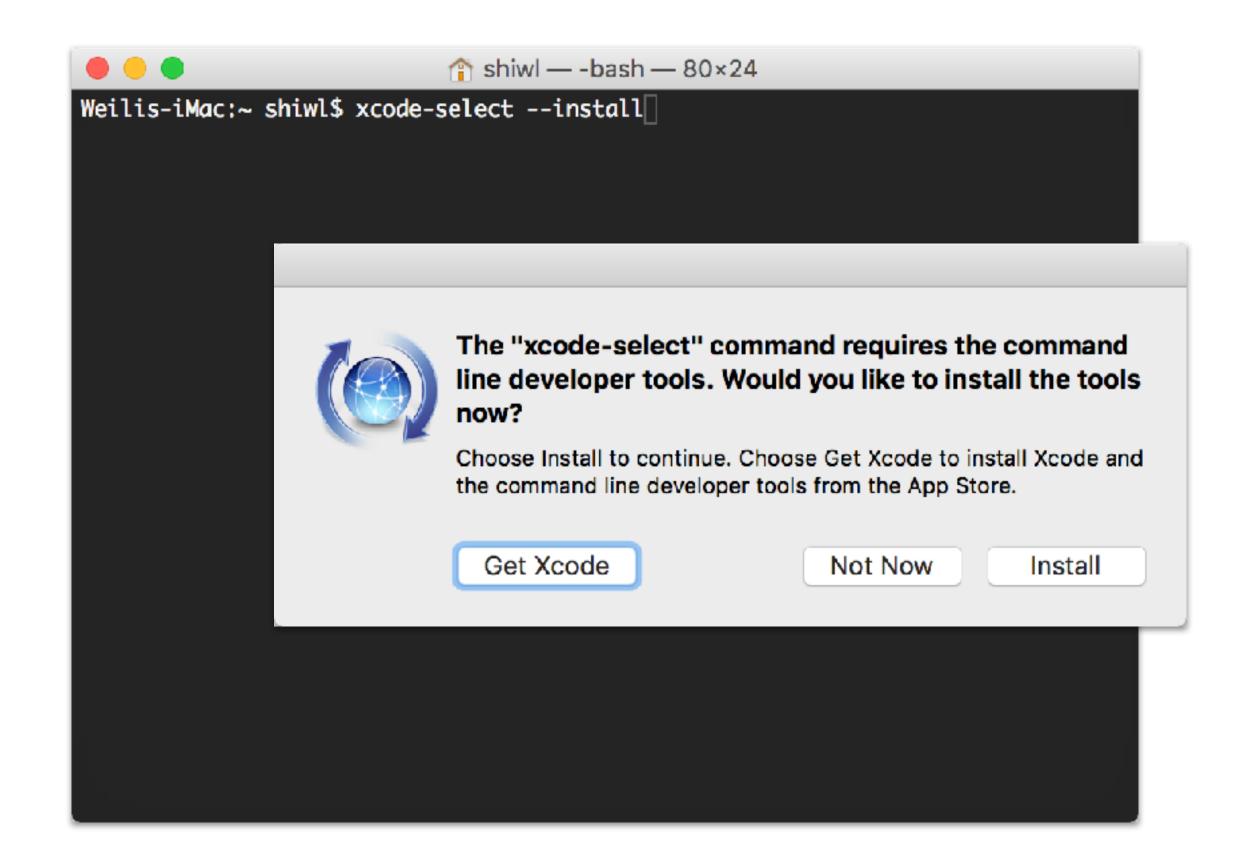


## Mac

Install Xcode 8.0 via Mac App Store.

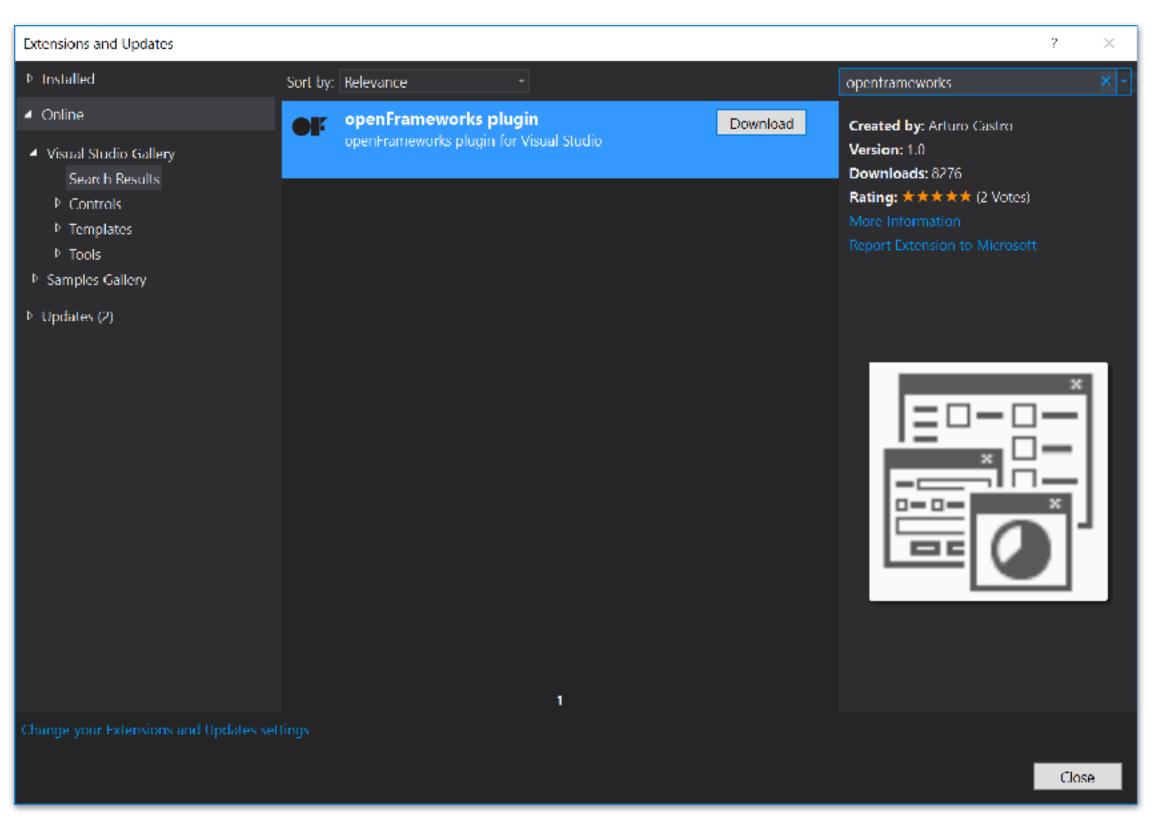
#### Windows

Download **Visual Studio Community 2015** from <a href="https://www.visualstudio.com/vs/community/">https://www.visualstudio.com/vs/community/</a> and install it.



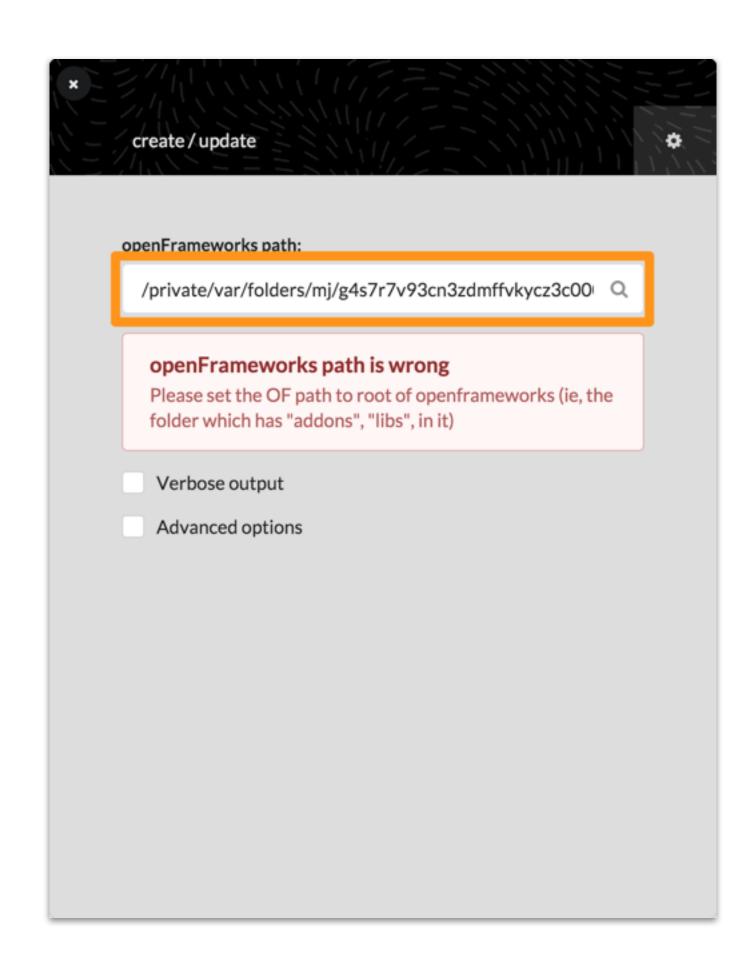
#### Mac

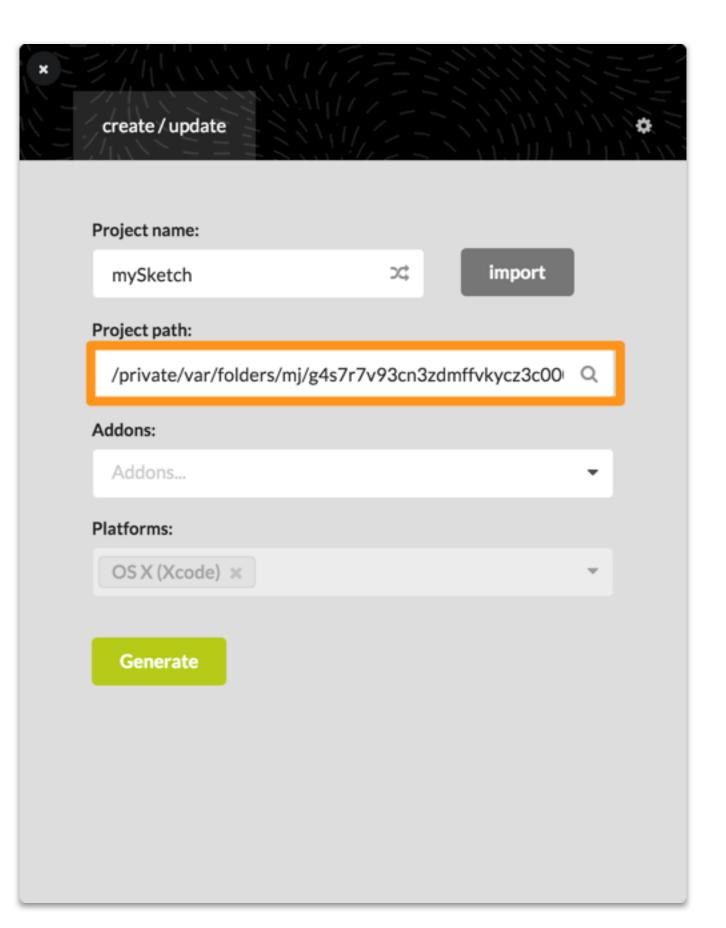
Install **command line tools** of Xcode using the following command in Terminal: xcode-select --install

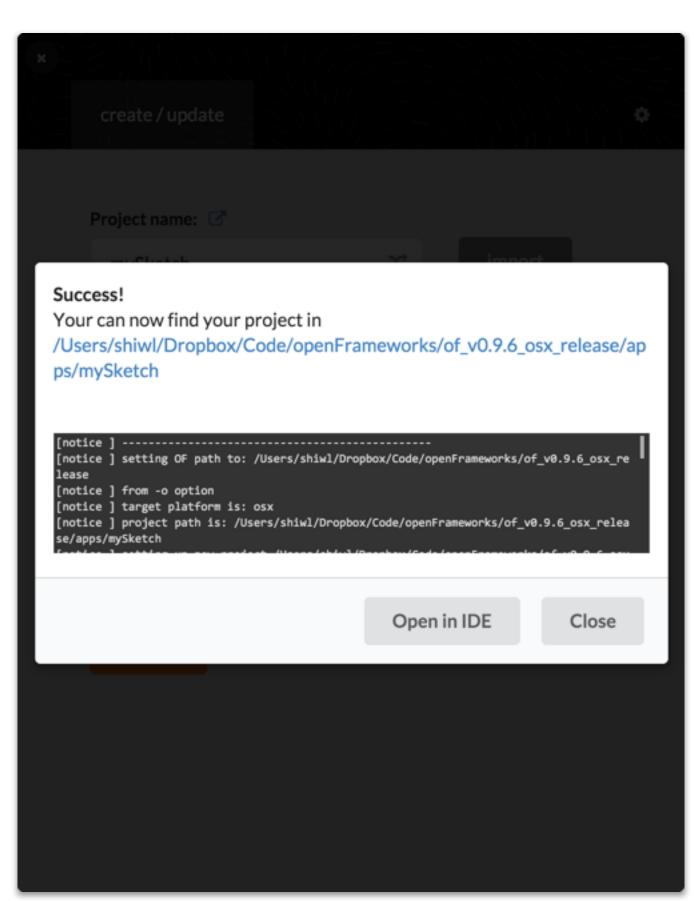


#### Windows

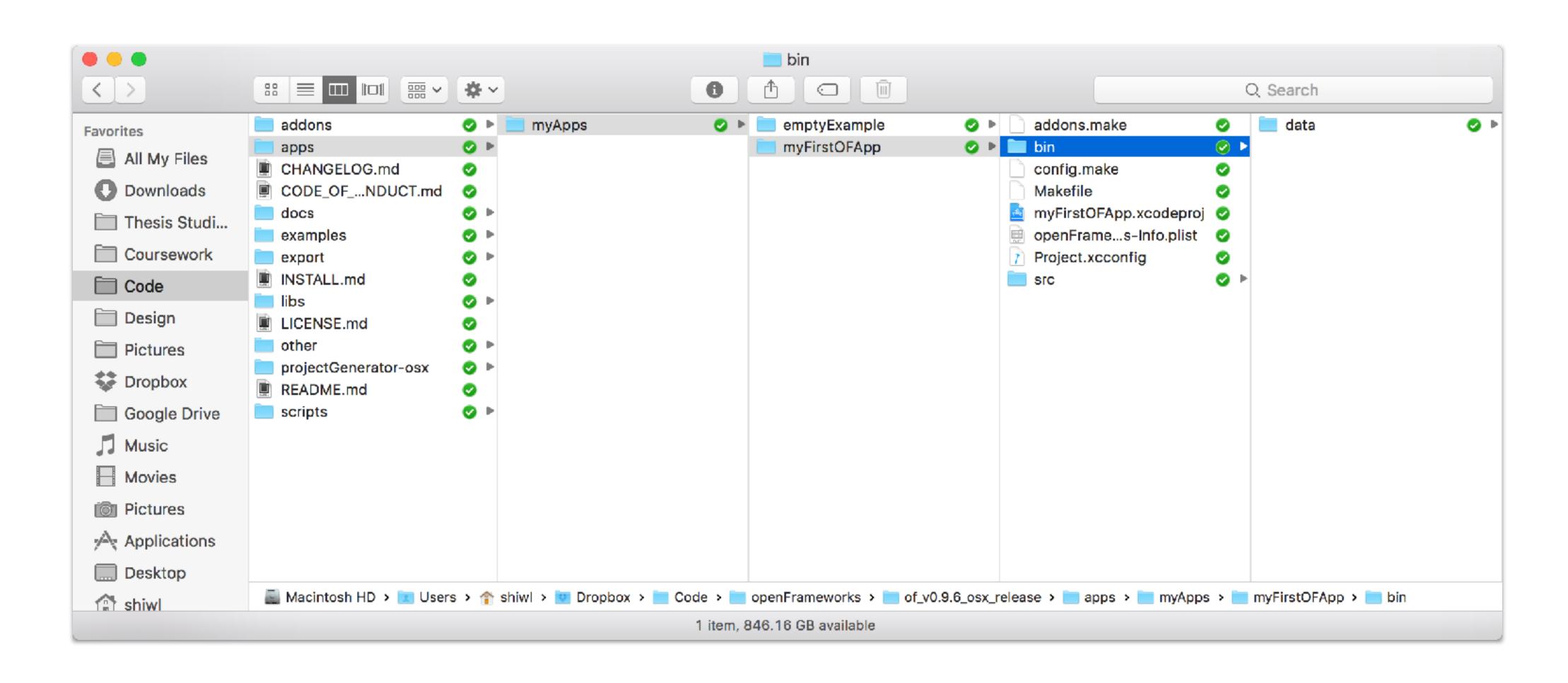
- 1. Download and install K-Lite Codec Pack Version 12.1.0 Full April 18th 2016.
- 2. In Visual Studio, go to Tools > Extensions and Updates. Select online and search for openFrameworks and install the plugin.



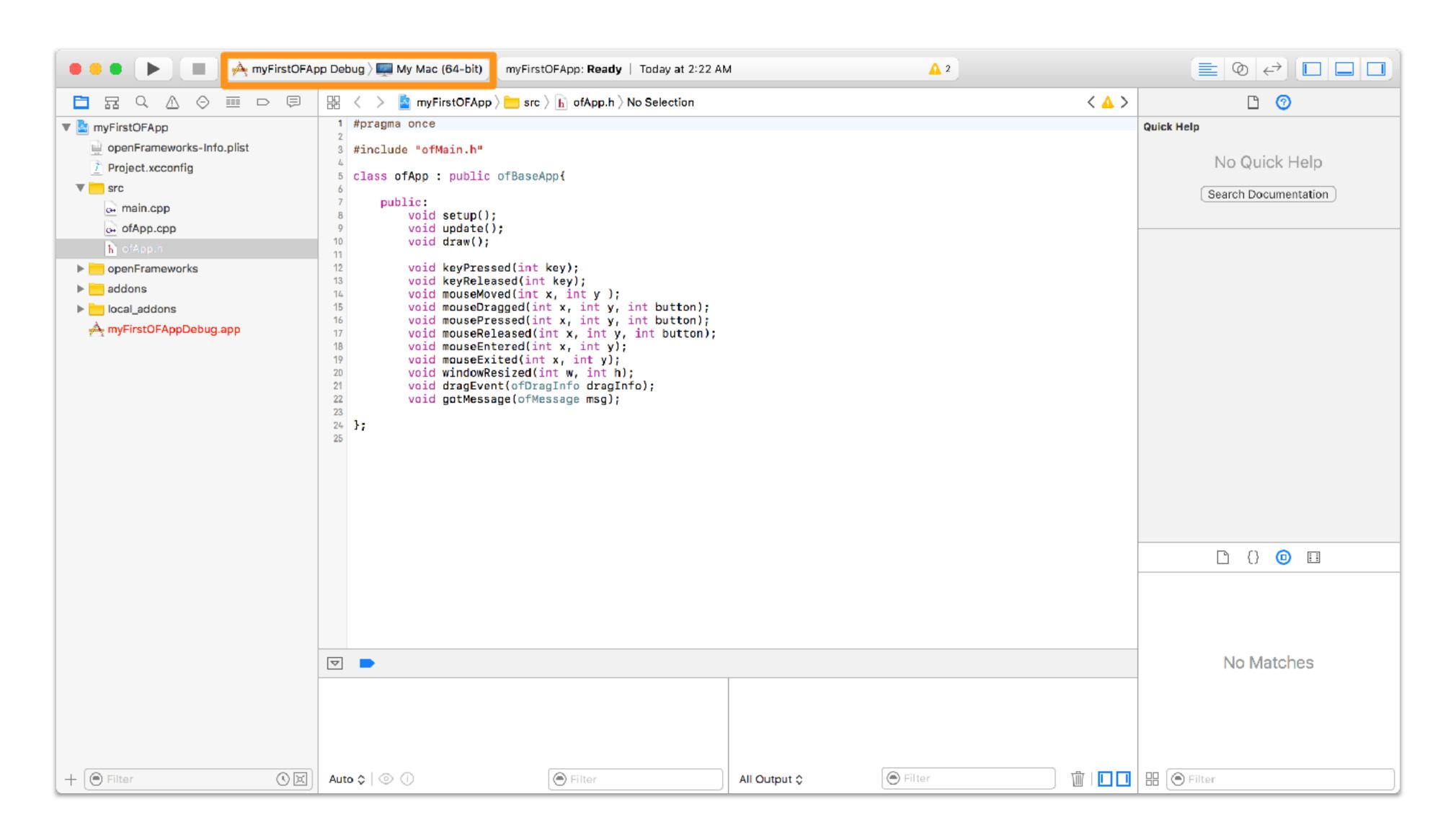




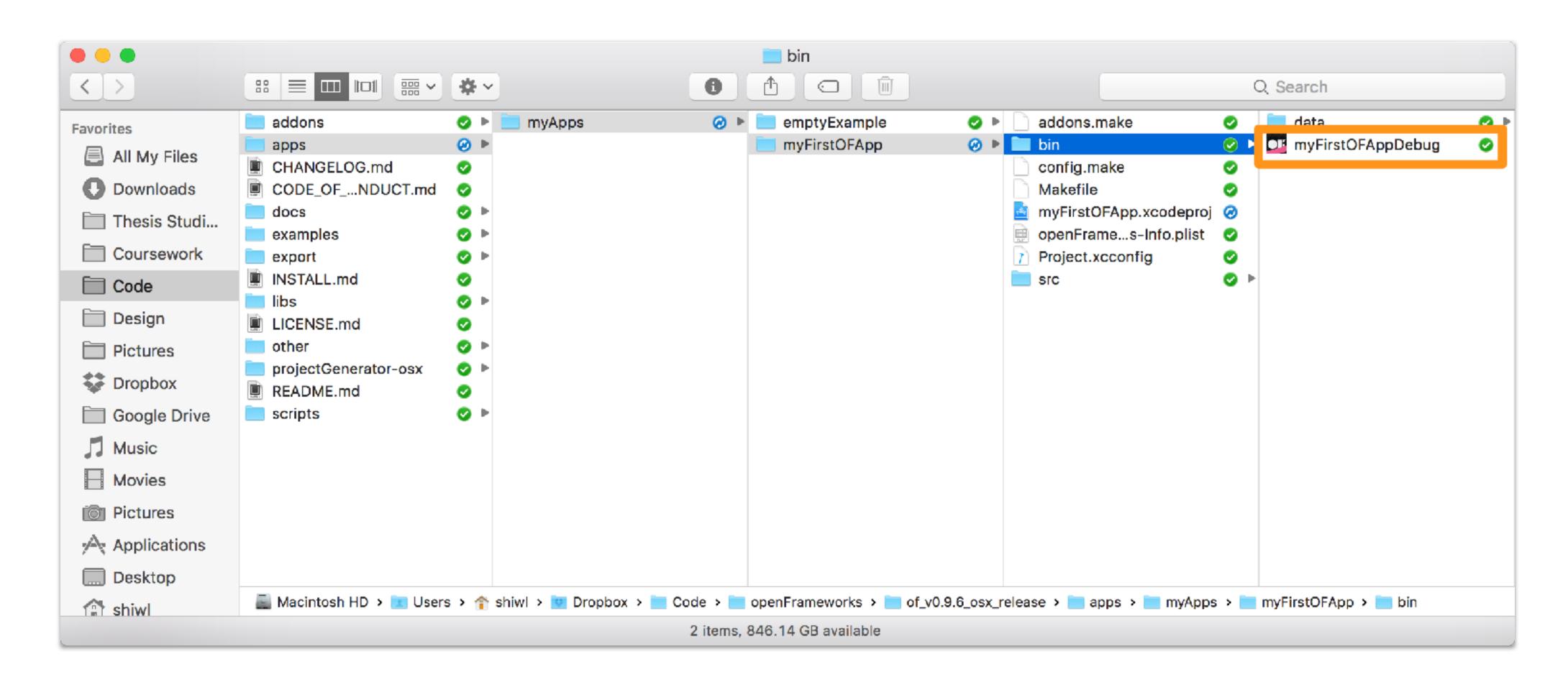
Use projectGenerator to create your first oF app!



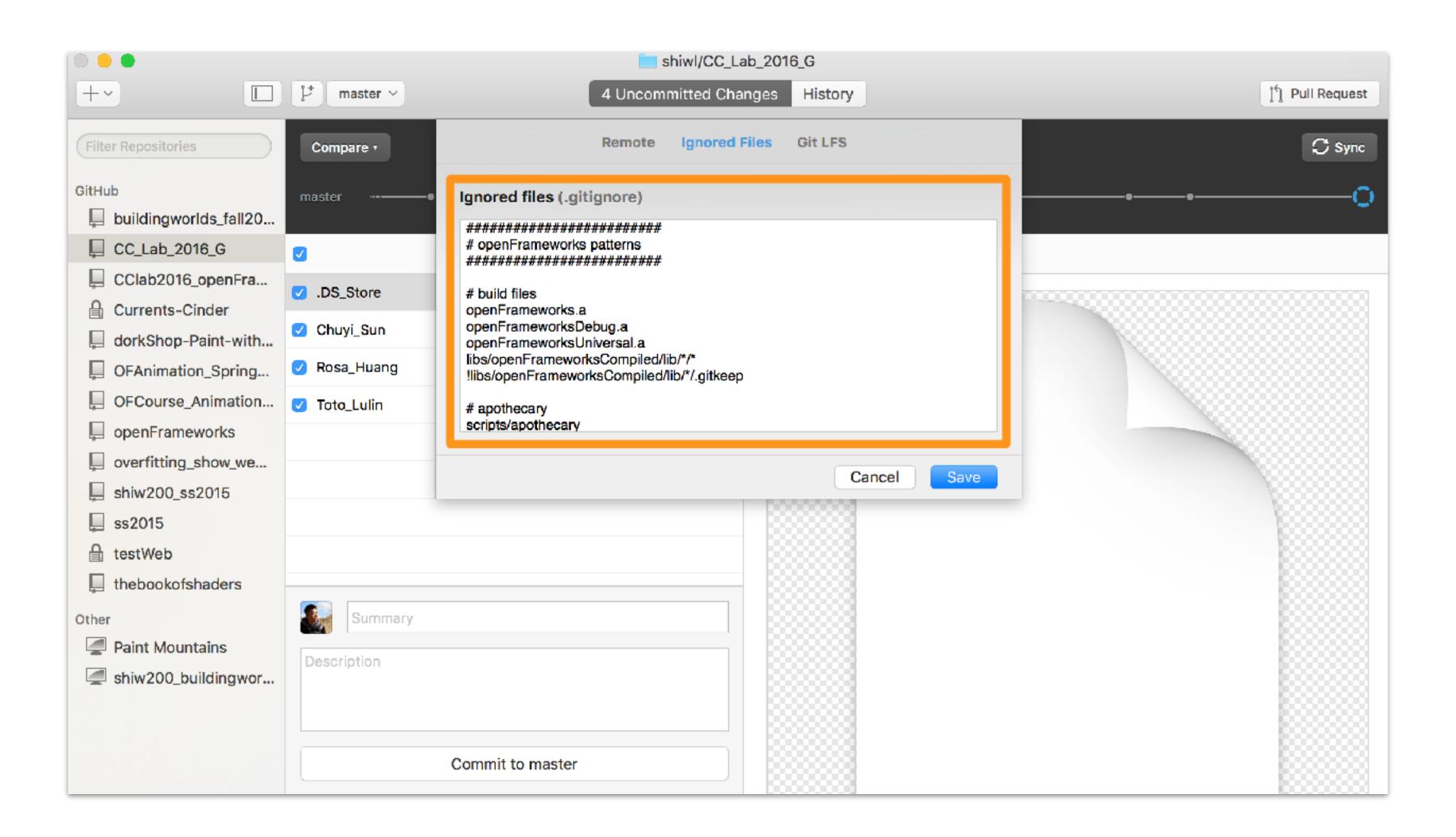
File structure of your oF app



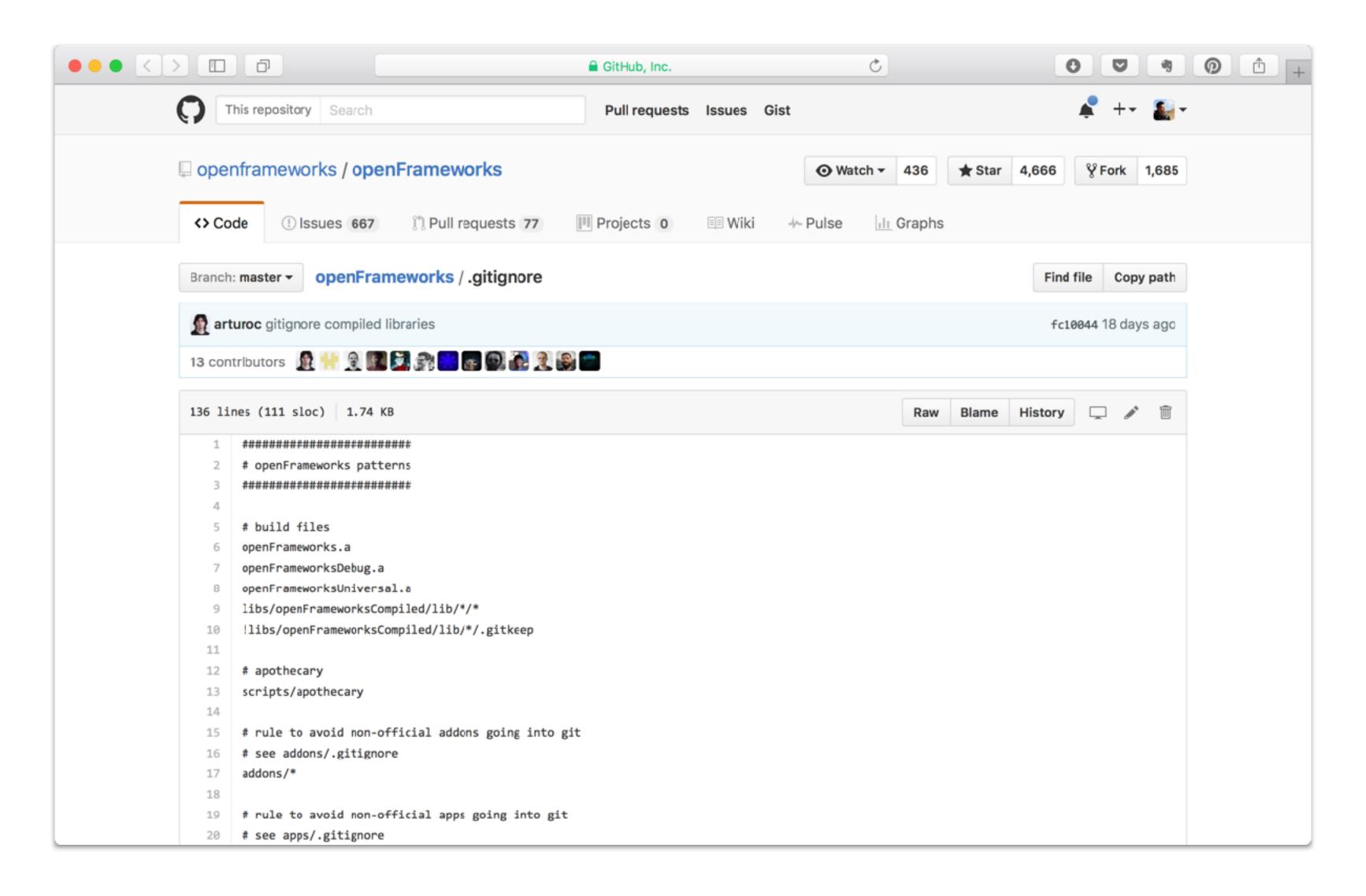
Build and run your first oF app!



What has happened when you clicked the build button?



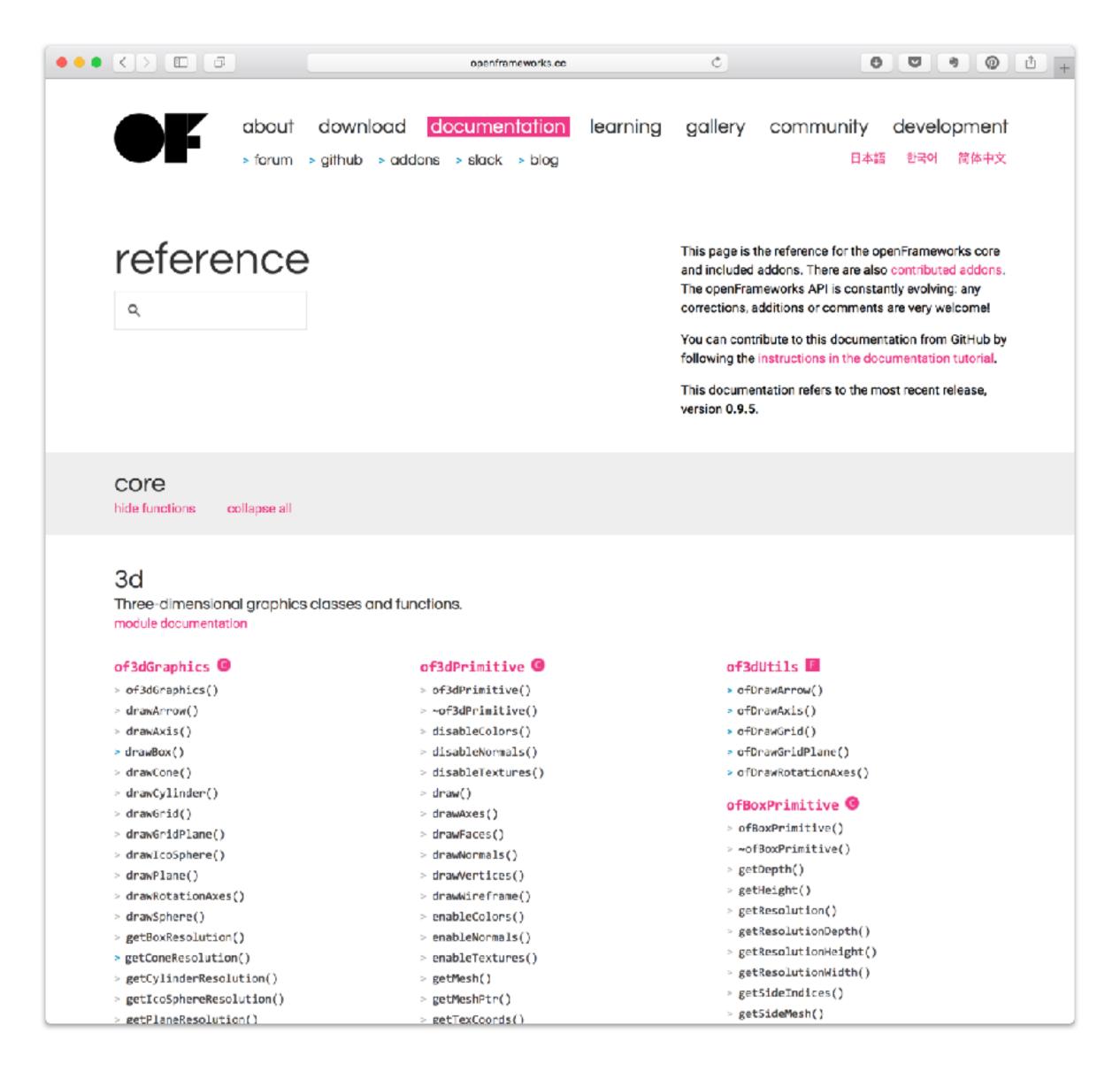
Use .gitignore to avoid tracking unneeded files with git



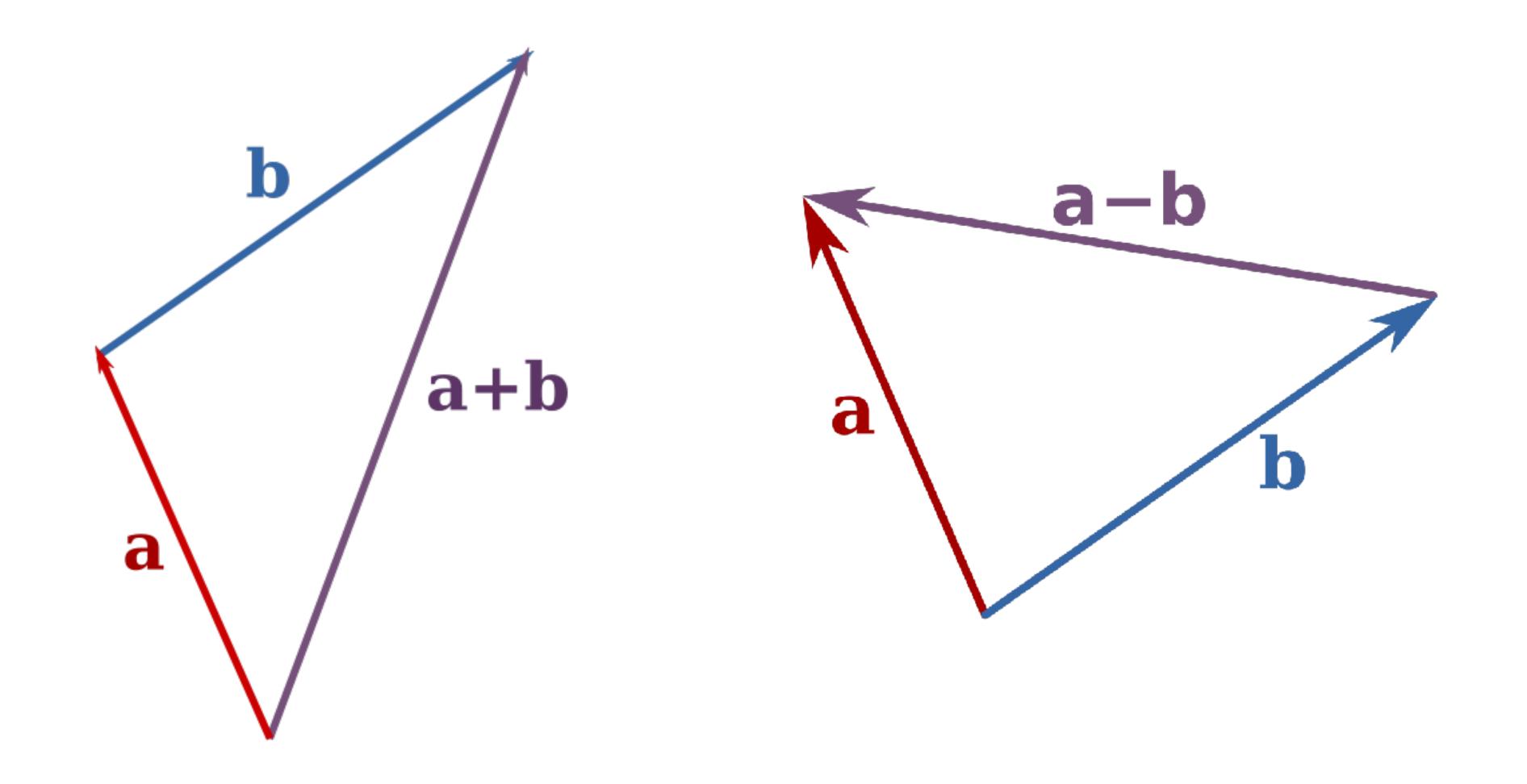
The easiest way to get related .gitignore file is from oF github repo at <a href="https://github.com/openframeworks/openFrameworks/blob/master/.gitignore">https://github.com/openframeworks/openFrameworks/blob/master/.gitignore</a>

# Let's add some code to your oF app to make it more interesting!

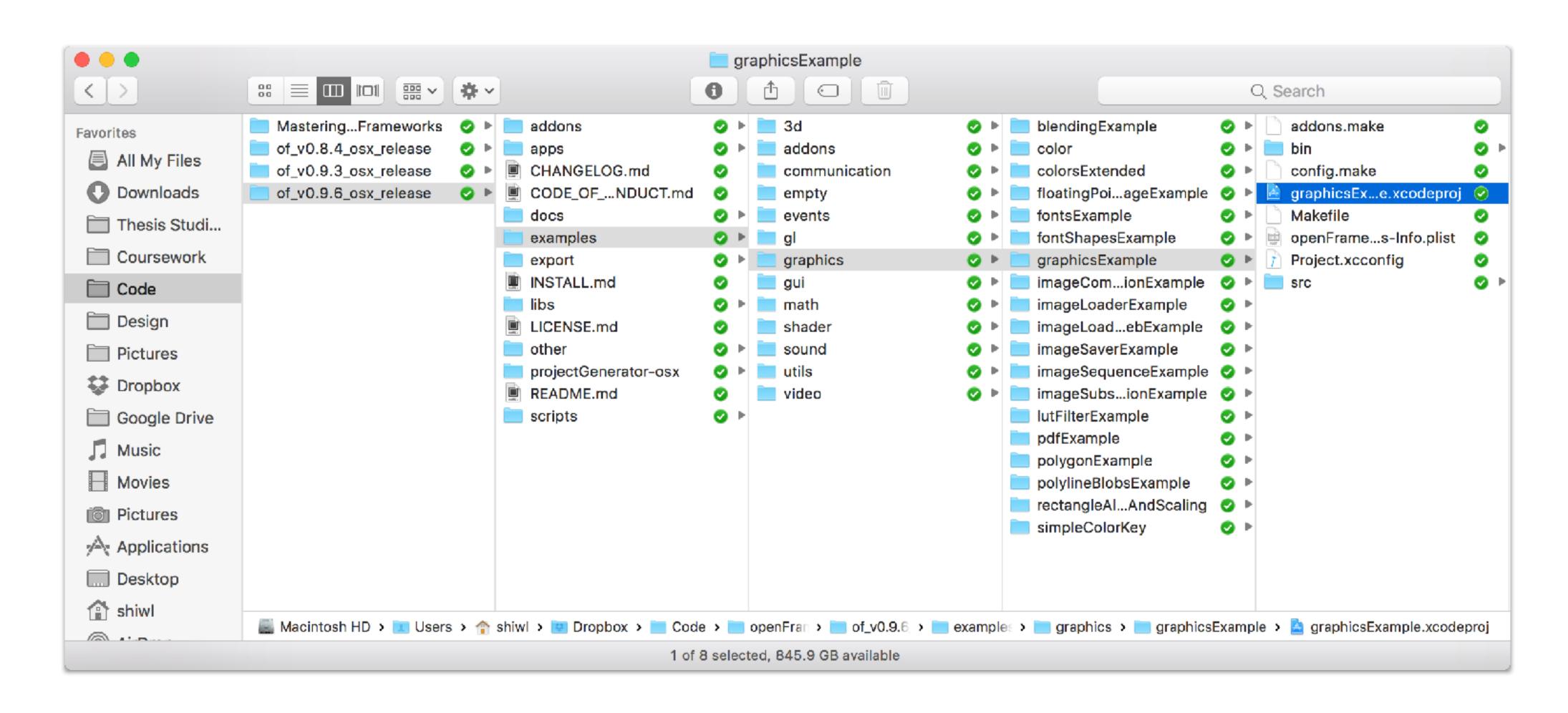
- STEP 0: draw static circle
- STEP 1: declaring variables and constants
- STEP 2: initialize variables
- STEP 3: apply a force to the circle when mouse pressed
- STEP 4: update physics in every frame
- STEP 5: draw updated circle in every frame
- · STEP 6: bring back our circle when it is off stage



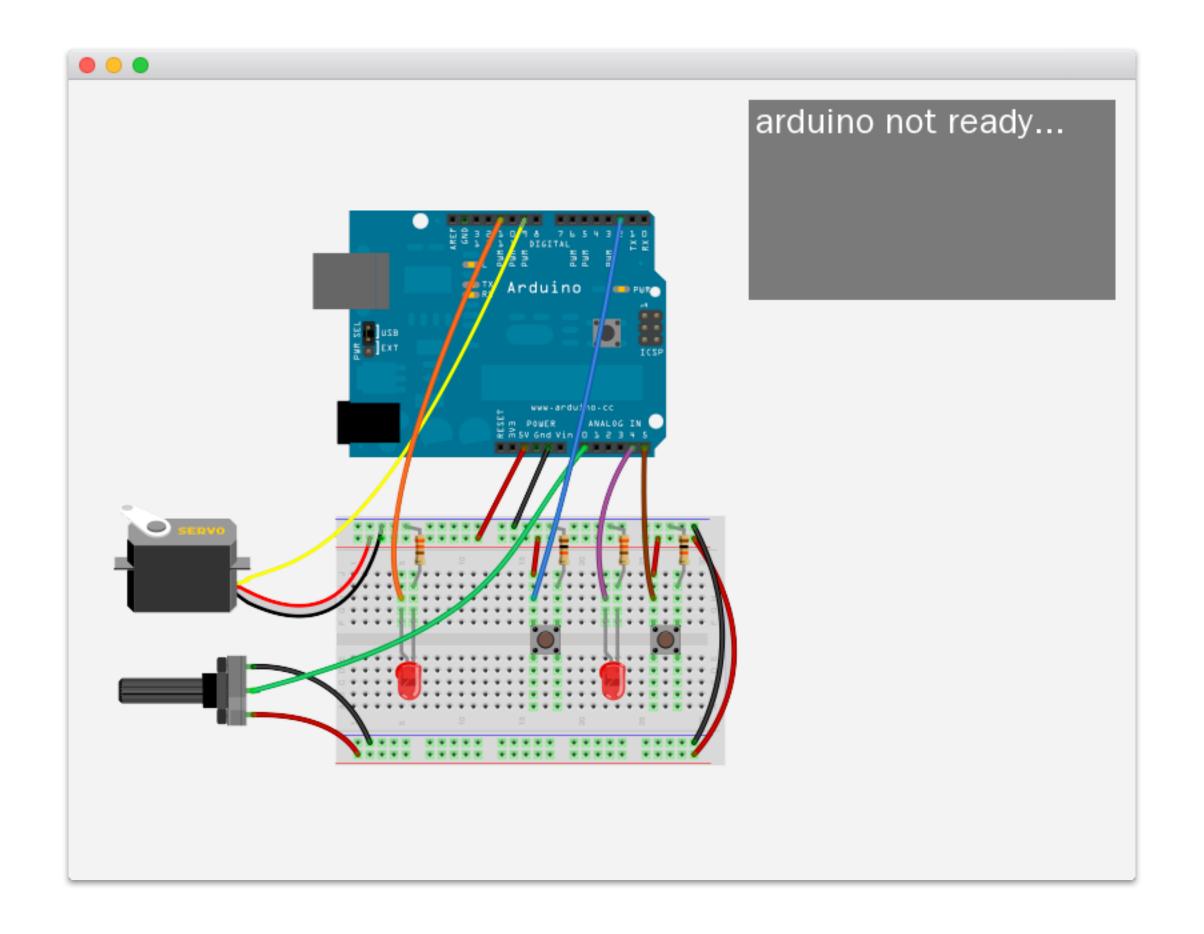
Always go to <a href="http://openframeworks.cc/documentation/">http://openframeworks.cc/documentation/</a> for reference!



Hmm, vector math...



**Explore the examples** 



Bonus: firmataExample!

### Homework

- · Creating your simple openFrameworks program, it should be
  - · Interactive (mouse click, key press, physical button, etc.)
  - Use 8 or more different openFrameworks functionalities (oF\*\*\*)
  - Draw graphics
  - Print out stuff either on screen or in console
- Push your code to Github and do a screen recording