

COS 425 MOBILE DEVELOPMENT

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# INTRODUCTION

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## ABOUT THE COURSE

- ▶ Two Platforms / Three Ways
  - ▶ iOS - iPhone and iPad
  - ▶ Android - Mostly Phones
  - ▶ HTML5/CSS3/JavaScript
- ▶ Project Based (no exams)
  - ▶ One Presentation at the end
  - ▶ Lots of code!



## TO BE SUCCESSFUL

- ▶ Strong object-oriented programmer
- ▶ Ready to learn (at least one) new language
- ▶ Know...
  - ▶ Class, Instance, Superclass, Subclass
  - ▶ Method, Message
  - ▶ Instance Variable, Property

## I NEED A COMPUTER

- ▶ iOS assignments require a Macintosh with Xcode
  - ▶ The USM general lab Macs have Xcode
- ▶ Android assignments use Android Studio (cross platform)
  - ▶ Install from [developer.android.com](https://developer.android.com)
- ▶ Hybrid assignments require a text editor and JavaScript
  - ▶ You should be able to handle this one

## I NEED HELP!

- ▶ Email = `houser@maine.edu`
- ▶ Thousands of tutorials, Stack Overflow, Apple & Google
  - ▶ Use them, but write your own code  
(don't copy and paste)
- ▶ Don't forget your classmates

# SCHEDULE

- ▶ 1 - Introduction
- ▶ 2 - Android
- ▶ 3 - iOS
- ▶ 4 - Hybrid
- ▶ 5 - Data & Server Side
- ▶ 6 - Sensors & Hardware
- ▶ 7 - User Interface & Design



## SCHEDULE

- ▶ Wednesday's 5:35 - 8:05
  - ▶ 5:35 - 6:20
  - ▶ 6:30 - 7:10
  - ▶ 7:20 - 8:05
- ▶ Lecture, Demos, and Discussion
- ▶ Mostly demos & writing code





# SCHEDULE

- ▶ Snow and other nonsense
  - ▶ Keep up with project work
  - ▶ Keep up with reading and videos
  - ▶ Due dates do not change
- ▶ USM Alert: [usm.maine.edu/usmalert](https://usm.maine.edu/usmalert)
- ▶ Be safe first



## GRADES

Project 0	2 point
Projects 1 - 3	4 points each
Project 5 Presentation	6 points

## PROJECTS

- ▶ 0 - GitHub Basics
- ▶ 1 - Android Task List
- ▶ 2 - iOS Task List
- ▶ 3 - Hybrid Task List
- ▶ 5 - App of your own design and presentation  
(your choice of platform)



## GRADES

A	18-20 points
B	16-18 points
C	12-16 points
D	10-12 points

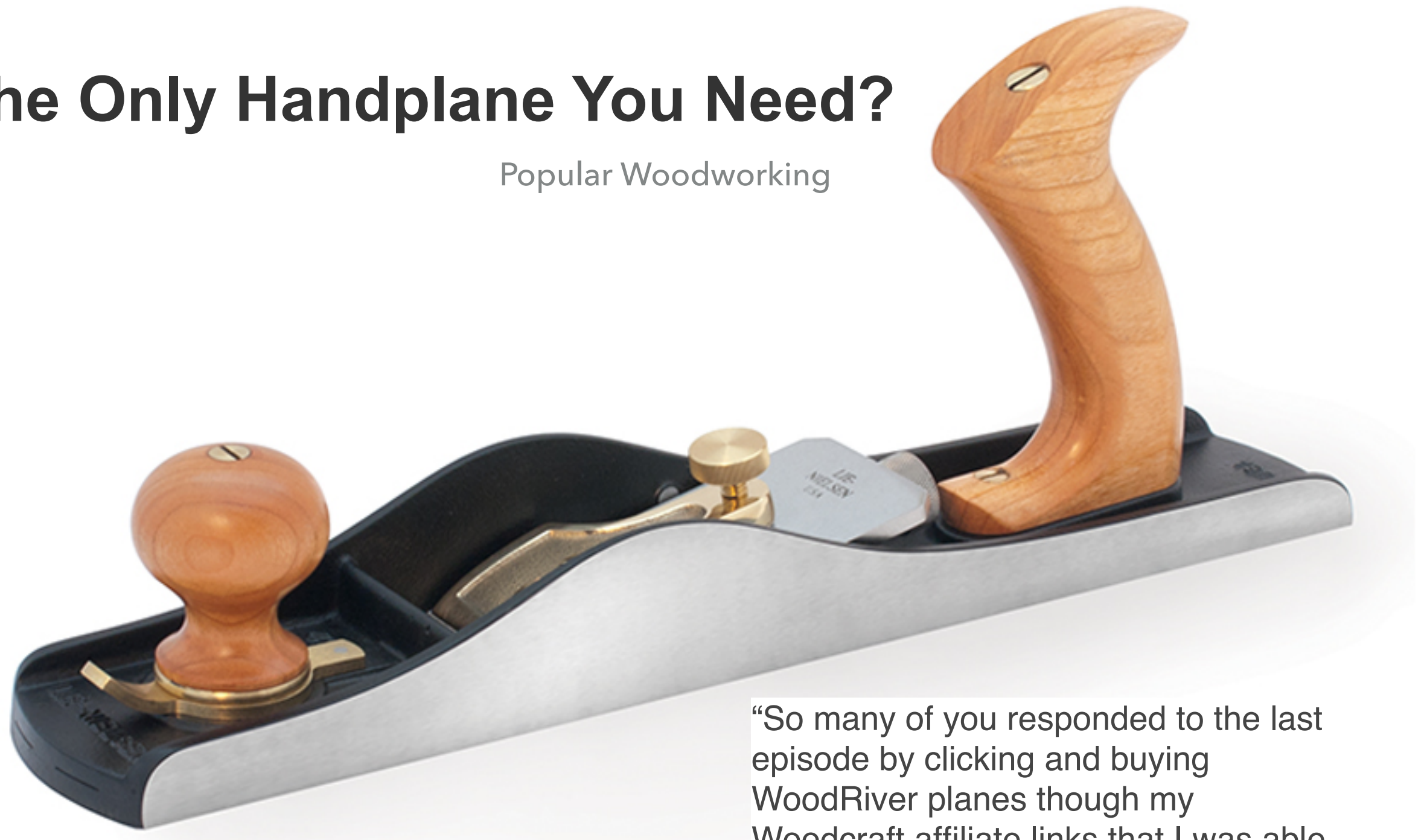
## QUESTIONS ABOUT THE COURSE?

- ▶ Two Platforms / Three Ways
  - ▶ iOS - iPhone and iPad
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# The Only Handplane You Need?

Popular Woodworking



“So many of you responded to the last episode by clicking and buying WoodRiver planes though my Woodcraft affiliate links that I was able to purchase this new Lie Nielsen...”



## USE YOUR TOOLS

- ▶ Don't fight the frameworks
- ▶ Use frameworks / libraries / components
- ▶ Use the features the tools provide, don't avoid them
- ▶ Focus on user experience
- ▶ "Small things matter"
- ▶ Clean Code matters

## PROJECT 0 – GITHUB BASICS

- ▶ Two Parts
  1. Clone and fix mistakes
  2. Fork repo and make a PR
- ▶ Create a GitHub account first
- ▶ Everything will be “submitted” via GitHub for the entire course.



## PROJECT 0 – GITHUB BASICS

### ► Part 1- Fixing Mistakes

1. "Accept" the assignment
2. Clone the repo to your system
3. Create a branch
4. Correct mistakes (code) & Document
5. Commit and push back to GitHub
6. Create Pull Request (PR)
7. Merge PR back into "master" branch



## PROJECT 0 – GITHUB BASICS

- ▶ Part 2 - Your Winter Break
  1. Tell me your username ([form](#))
  2. Fork the `cos425-group` repo
  3. Create a branch w/username
  4. Add section with your story
  5. Commit
  6. Create Pull Request (PR)



## PROJECT 0 – GITHUB BASICS

