# 08-671 Java for Application Programmers

# Syllabus for Fall 2015

Version of August 27, 2015

#### Instructors

- Jeffrey Eppinger, Professor of the Practice
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# Course Description

• This course provides an intensive exploration of computer programming in the Java Language for Masters students who have had some prior, but perhaps limited, programming experience in Java or in some other programming language.

# Prerequisites

- You must have some previous experience writing computer programs.
- You must provide your own laptop computer to do the work for this course.

#### Course Text:

- You may choose any text or texts that covers the topics listed, below. Such books are commonly available. In the past students have used *Sam's Teach Yourself Java in 21 Days*, and *Head First Java*.
- Also, information on all these topics can readily be found on the Internet. We will provide links during lectures, when necessary.

### Class Meetings:

- Lectures are on Tuesday and Thursdays from 12:00pm to 1:20pm in Baker Hall Room A51 (Giant Eagle Auditorium)
- Recitations on Fridays from 1:30pm to 2:50pm in Doherty Hall Room A302.

#### Homework Assignments

• Seven homework assignments are planned – approximately one per week – most of which will be due on Monday nights.

### Exams & Quizzes

- Quizzes will be given during some recitation sessions.
- October 15, 2015 There will be a written exam during the last class of the minisemester. To provide extra space, some students will be assigned other rooms in which to take this exam.
- Final Exam There will be a 3-hour final exam. The registrar will schedule this exam during the week of October 19, 2015. This exam will be a programming problem, which will be completed on the students' laptops, during the exam. The exact date, time, and location will be announced in class as soon as the registrar releases the exam schedule.

## Late Homework Policy

- Homework may be turned in after the deadline, subject to the following penalty:
  - o Homework #1: 5% penalty per day (or fraction thereof)
  - Homework #2: 10% penalty per day
  - o Homework #3: 15% penalty per day
  - o Homework #4: 20% penalty per day
  - o Homework #5: 25% penalty per day
  - o Homework #6: 30% penalty per day
  - Homework #7: 35% penalty per day

### **Grade Computation**

- The expected computation of students grades will be:
  - o Homework: 30% 40% (easy homework assignments weighted less)
  - In-class Quizzes: 0% 5%
  - Written Exam: 20 25%
  - Final Exam: 30 40%

#### Course Website

- As with many other CMU courses, we will use the "Blackboard" server to host our course website. It's accessible via https://blackboard.andrew.cmu.edu.
- Posted on the course website will be:
  - o contact information for the course staff.
  - o the schedule for Teaching Assistants' Office Hours,
  - o copies of the lecture materials,
  - o links to videos of the course lectures (but please come to class), and
  - o homework specifications.

# The lecture schedule (subject to change) is:

- 1. September 1<sup>st</sup> Introduction, HelloWorld, Static Programming
- September 3<sup>rd</sup> Primitive Types
- 3. September 8<sup>th</sup> Java Classes
- 4. September  $10^{th}$  Reference Types
- September 15<sup>th</sup> Loops & Arrays
  September 17<sup>th</sup> Lists, Sorting, Interfaces
- 7. September 22<sup>nd</sup> Maps
- 8. September 24<sup>th</sup> File I/O & Network I/O
- 9. September 29<sup>th</sup> Swing Interfaces
- 10. October 1<sup>st</sup> Swing Actions
- 11. October 6<sup>th</sup> Threads 12. October 8<sup>th</sup> Exceptions
- 13. October 13<sup>th</sup> Function Programming