

COMP 110-003

Introduction to Programming

Introductions

January 10, 2013



Photo credit: Sam Kittner '85

Haohan Li
TR 11:00 – 12:15, SN 011
Spring 2013



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Today

- Course syllabus
 - Course objectives
 - General info
 - Schedule, assignments, grading
 - Miscellaneous



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COMP 110

- Who shall take this class?
 - Preparing to use computers to solve problems and to develop softwares
- If you know nothing about computer
 - COMP 101 may be better
- If you've taken an AP course, or know programming
 - COMP 401 may be better
 - *Talk to me after class*



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Prerequisites

- Prerequisites
 - No specific courses
 - Basic computer skills
 - Sending emails, browsing websites, installing softwares
 - Basic mathematics
 - Elementary algebra, such as solving a simple equation
 - No programming experiences required
 - It is OK that you have some experiences but remember that others don't



Course Objectives

- You will learn the basics of JAVA programming
- More importantly, **algorithmic thinking**
 - An algorithm is just a sequence of instructions used to solve a problem
 - *Programming is understanding. (Kristen Nygaard)*
 - Programming is abstraction.
 - You will learn how to describe a problem and its solution abstractly and precisely.
 - That can be applied to any programming language (Java, C++, Python, Matlab, etc.)



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Instructor

- Haohan Li
 - Currently a Ph.D. candidate in the 5th year
 - Undergrad: Shanghai Jiao Tong University
 - Research area: real-time systems
 - Computer systems that interact with physical world and provide prompt responses
 - Personal page: <http://www.cs.unc.edu/~lihaohan/>
 - Google my name and you will find it



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General info

- Meeting Place
 - SN 011
- Meeting Time
 - Tue/Thr, 11:00am - 12:15pm
- Course Webpage
 - <http://www.cs.unc.edu/Courses/comp110-003-s13/>
 - You should bookmark it, though it is on my webpage



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General info

- Office hour:
 - Tuesday, 1:00 – 2:00, Wednesday, 10:00 – 11:00 ?
 - Tuesday, 10:00 – 11:00, Wednesday, 10:00 – 11:00 ?
 - Tuesday, 1:00 – 2:00, Wednesday, 2:00 – 3:00 ?
- Instructor office: FB 132, Fred Brooks Building
- Instructor email: lihaohan@cs.unc.edu
 - Put “COMP 110” in the subject line



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Weekly Schedule

- Lectures:
 - All Tuesdays and some Thursdays
 - Review previous material
 - Questions
 - Present new material
 - In-class exercises
 - work in groups
 - Lecture notes will be posted online after class
 - The notes posted before class may not be the final version



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Weekly Schedule

- Lab-times:
 - Some Thursdays
 - Extra programming practice
 - Homework help
 - Answer questions from lecture
- Each group should always have a laptop and a textbook
 - About laptops
 - I recommend that you bring one

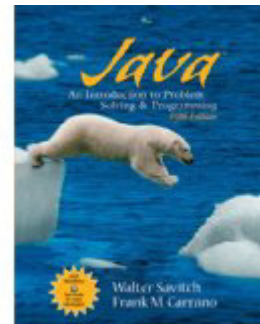
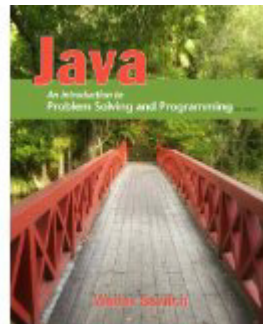


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Textbook

- Textbook is **required**
 - *Java: An Introduction to Problem Solving and Programming* (6th Edition), by Walter Savitch.
 - ISBN: 978-0132162708.
 - You can use the Kindle edition, or the 5th edition instead.



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Software

- Java and Eclipse
 - You will find the installation instructions on the course website in this weekend



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Grading

- Assignments: 60%
 - Including 3% due-date extension points
- Mid-term exam: 10%
- Final exam: 25%
- Class participation: 5%



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Grading Scale

- A: 93 - 100; A- : 90 - 92.99;
- B+: 87 - 89.99; B: 83 - 86.99; B- : 80 - 82.99;
- C+: 77 - 79.99; C: 73 - 76.99; C- : 70 - 72.99;
- D+: 65 - 69.99; D: 60 - 65.99;
- F: 0 - 59.99.



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Assignments

- You will have about 8-9 lab assignments, and 4-5 program assignments
 - Labs will be discussed on Thursday lab-times
 - Some labs will build on previous labs
 - **Not** all labs will be graded
 - Programs are very time-consuming
 - They weight the highest amount of credit!
- Reading assignments and written homework as well
 - Finish reading assignments before class
 - Written homework weights only a small amount of credit



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Assignment submission

- Submit assignments through Sakai
 - Subject - COMP110 Program# your full name
- Naming code scheme
 - Name your jar files for submission as follows:
 - lastname_program#.jar
 - Example: li_program1.jar
- You will have these instructions in every assignment descriptions



Late Policy

- An assignment is on time only if it is received at or before 11:59 PM on the due date.
 - You will receive **half** of the credit if the assignment is received no more than 24 hours late
 - After 24 hours, you will receive no credit
- Example
 - Due date: Jan 10; Your deserved credit: 90.
 - If received on 11:59 PM, Jan 10: You get **90** points;
 - If received on 00:01 AM, Jan 11: You get **45** points;
 - If received on 00:01 AM, Jan 12: You get **0** points!



Due Date Extensions

- You have **3** opportunities to extend the due date by one more day
 - You can use them at any time and in any combination
 - You must declare the due-date extension **before** or **on** the due date
 - Unused opportunities are each worth 1 points on the **final grade**



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Due Date Extensions

- Examples:
 - Due date: Jan 10; Your deserved credit: 90; You declared **one** due-date extension:
 - If received before 11:59 PM, Jan 10: You get **90** points;
 - If received before 11:59 PM, Jan 11: You get **90** points;
 - If received before 11:59 PM, Jan 12: You get **45** points;
 - If received after 0:00 AM, Jan 13: You get **0** points!
 - However, your final grade will be subtracted by **1** point!



Due Date Extensions

- You must declare the due-date extension before submitting the assignment
 - You can include the comment in the submission, or send me an email
 - Otherwise your late submission will be penalized
 - You can also choose to use the opportunity in the end of the semester
 - If you still have extensions left and you have late submissions



Exams

- Mid-Term
 - To take a make-up mid-term, you must be in case of emergencies. I will ask for supporting documents.
- Final (*Saturday May 4, 12:00 PM*)
 - To take the exam at a different time, you must get permission from your Dean and bring me the blue slip you get from the Dean.
- I do not give *incomplete*



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Class Participation

- Attendance is mandatory for all lectures
 - Don't make a habit of arriving late, or leaving in the midst of class;
 - No talking, sleeping, reading newspapers, eating, etc. in class;
 - Keep cellphones, pagers, etc. off;
 - Don't use your laptop to browse the web.



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Working on Assignments

- Before you open Eclipse and start coding:
 - read the assignment
 - think about what the assignment is asking for
 - review lectures and examples on the topic
 - write (on paper) your plan for completing the assignment (i.e., your algorithm)



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Backup Your Work!

- Save a file when you finish editing it
 - It's better to save it when you finish a part
 - However, if it's working and you want to add some function, you should make a copy of the working version
- Use laptops to protect the codes from power outage
- Use USB drives, AFS or Dropbox to protect the codes from laptop outage
 - <http://help.unc.edu/subject/data-storage/afs/>
 - <https://www.dropbox.com/>



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Need help?

- For help on general computer problems
- Also, for free software
 - <http://help.unc.edu>
 - 919-962-HELP



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Collaborating

- Do not cheat!
- Do not share code!
 - You are encouraged to work together for better understanding of the course material and assignment requirements. But do the actual coding by yourself.
- Get familiar with the Honor Code
 - <http://studentconduct.unc.edu/students>
 - <http://www.cs.unc.edu/Admin/Courses/HonorCode.html>



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Struggling with Assignment

- **Start early!**
- Struggle with your assignment first before asking for help
- You are allowed to let others help you finding bugs. However, you must fix them yourself.
- It is easy to cheat but it is also easy to detect plagiarism. Keep safe by writing your own codes



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Assignment for This Week

- Check Sakai for Homework 0
 - Homework 0 is due Jan. 13, Sun.
- Read Chapter 1.1 & 1.2
- Read Syllabus



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