CMPT 120
Intro to CS & Programming I
Before we begin…

Instructor: Jérémie Lumbroso
TAs: Bhavesh Gupta, Dan Lin, Zhensong Qiandd

`http://www.sfu.ca/~jlumbros/Courses/CMPT120/`

SFU, Burnaby campus — Spring 2014

Contact

Best way (for course questions):

cmpt-120-help@sfu.ca

Or else:

- Instructor: Jérémie Lumbroso `<jeremie.lumbroso@sfu.ca>`
- TAs:
  - Bhavesh Gupta `<bgupta@sfu.ca>`,
  - Dan Lin `<lindanl@sfu.ca>`,
  - Zhensong Qian `<zqian@sfu.ca>`.

Remarks:

- Always include CMPT 120 at the beginning of your subject line.
- Office hours to be determined later.

Main Class Topics

Intro to Computer Science …

- give you an appreciation that computers are not just about Internet, YouTube (cat videos), Word, Excel and games!
- give you an understanding of how computers work

… & Programming

- programming? what can it do? what can it help **you** do?
- what is Python? how to program in Python?
- what are algorithms and how can they help problem solve?
- what are variables, functions, control structures?
- what are data structures, input types, etc.?

Useful Textbooks

For complete beginners:

* *CMPT 120 Study Guide* by Greg Baker

   http://www.cs.sfu.ca/CourseCentral/120/ggbaker/guide/

* *Think Python: How to Think Like a Computer Scientist* by Allen B. Downey

   http://www.greenteapress.com/thinkpython/

If you are at ease with your computers:

* *Learning Python The Hard Way* by Zed A. Shaw

   http://learnpythonthehardway.org/

If you have a good familiarity with programming:

* *Dive Into Python* by Mark Pilgrim   [also in Italian, French, Spanish, Chinese, Korean]

   http://www.diveintopython.net/
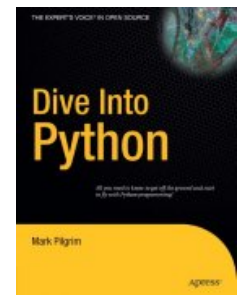
Course Grading

- 65% supervised points
  - Quiz 1 (Feb. 5) and Quiz II (Mar. 5)   ~ 10%
  - Midterm (Mar. 21)   ~ 15%
  - Final exam (Apr. 14)   ~ 40%

- 40% unsupervised points
  - Labs and course active participation   ~ 8.5%
  - Assignments and projects   ~ 23%
  - Bonus points   ~ 2%
  - AEP (Academic Enhancement Program) ~ 1.5%

Note 1: subsection weight is approximate and subject to change.
Note 2: any eventual change will be to the benefit of students.

Philosophy and Aim

- Teaching style
  - passionate about this stuff!
  - give students many opportunities to do well
  - encourage participation
  - always respect students and consider them as adults

- BigGoals®
  - you will have an idea of what is "Computer Science"
  - give you basic programming skills useful in today's life

Academic Honesty Policy

- Official SFU policy

  http://www.sfu.ca/policies/gazette/student/s10-01.html

- Cheating = loss of time (yours, ours) and money (yours)
  - Cooperation allowed on all non-supervised assignments: just make submission copy and specify names of all participants
  - Don't copy: just tell us whose grade you want (with their agreement)!

PLEASE LET'S NOT WASTE OUR TIME!

- Goal of course is to learn programming (an increasingly essential skill, in all situations not just CompSci), not to get good grade

Some Symbols

- = student participation (iClickers, reflexion…)

- = expand general knowledge (not test stuff!)

- = difficult topic

iClickers

- Register your iClicker
  - go to www.iclicker.com
  - enter last name, first name, student ID (beginning of email, **not** student number, i.e., mine is `jlumbros`) then click "Submit"

- How will the iClicker be used
  - to solicit feedback (too slow? too fast? another example?)
  - to ask questions on the course
  - to determine attendance record

- iClicker votes will count towards "course participation" (**but not during this first week!**)

Class Demography

What is your major?

- **A** Computer Science

- **B** Math or Statistics

- **C** Physics or Chemistry

- **D** Business or Engineering

- **E** Other

Class Demography

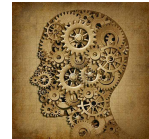What is your computer background?

A   I know how to turn a computer on

B   I mainly browse Internet and use a word processor (Word, …)

C   I am very familiar with my computer but no programming

D   I can program a bit, or have done so in the past

E   I am pretty good at programming

Class Demography

What best describes your expectations?

A I am here to get credits / because it's required

B I want to try out programming, it may be my future career

C I want to program professionally – I intend it to be my career

D Not B or C, but I think programming can be useful for me

E I keep hearing about "coding" and I am curious about the hype

Paper Survey

And because not everybody has an iClicker today, and multiple choice can only say so much, please take some paper and answer the following questions:

- Why did you choose this course?
- What is your experience with computers?
- What are you expecting from this course?
- Who do you think is responsible for your learning, and why?
- How would you describe programming?
- Favorite TV show?

Then **if you want to**, write name and email, bring the paper over and you may leave.

See you on Wednesday!