Computational Thinking Lab

Peer-Led Team Learning (PLTL): Computing Concepts

Spring 2020

What is PLTL

- Active, cooperative learning in small groups
- Facilitated by instructor & peer leaders
- Students helping/learning from one another
- Beneficial to both students and leaders

Intro slides to PLTL courtesy of S. Horowitz, University of Wisconsin, WES-CS project.

Why PLTL?

Cone of Learning (Edgar Dale)

Typical CTL Session

• Simulate executing code:
  – Trace or act out lines of code, method calls…

• Write Code
  – Pair programming

• Exam review sessions
  – Jeopardy game using prior exam questions

• Practice solving spatial/logic puzzles
  – KenKen, toothpick puzzles, river crossing, …

Goal

Students help one another learn strategies for solving problems using programming.

Have fun doing it!

The CTL Pledge

• Try to enjoy the material (keep open mind)

• Attend and prepare for every class meeting

• Be an active learner

• Ask questions and volunteer answers

• Help others to learn material
  – General concepts, strategy, programming idioms
  – Do not share details of CSE 231 project implementations (no work on projects in the CTL)

Expectations of Students

• Actively participate (6 pts)
  – Volunteer answers, ask questions
  – Refrain from email, texting, phone calls, social networking, …
  – Be on time, stay until dismissed

• Come prepared (4 pts)
  – View assigned video & reading
  – Complete the CSE 231 Pre Lab assignment by 5:00 pm on the day of your CSE 291 (CTL) class meeting (at least 75%)

• Monitor points on D2L; notify instructor of errors within a week of posting
Grading - Spring

Total possible points:
(15 weeks – 1 ‘grace’ week) x 10 = 140 pts

- 90% 4.0
- 80% 3.0
- 70% 2.0
- 60% 1.0
- <60% 0.0

Extra credit: Compensate for up to 10 missed points (1 class meeting) by coming to the Saturday review session for the final exam.

Being Present is Key!

**MISSED MEETINGS CANNOT BE “MADE UP” EVEN IF EXCUSED!!**

To maximize your points if you must miss a class:
- Notify instructor to attend the other section, if possible.
- One ‘grace’ class and one extra credit opportunity – use the ‘grace’ class wisely!
- Complete the CSE231 pre lab on time to earn up to 4 pts even if you cannot attend class.

CSE 231 tips

- Read the book
- Watch the videos
- Read the *entire* project specifications (multiple times!) and *follow them*
- Practice taking the exams

Lifetime tips

- Being able to follow instructions is a necessary life-time skill.
  – Did you do something to earn a sweet treat today?
Lifetime tips

• Being able to follow instructions is a necessary life-time skill.
  – Did you do something to earn a sweet treat today?

• But exercise good judgment: ask if instructions do not make sense/seem wrong.
  – What was ranked #1 best job in America?