The Beauty and Joy of Computing

Lecture #10
Social Implications of Computing

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CS10 CHOSEN AS UC ONLINE PILOT!

CS10 has been chosen as one of 30 courses (all across 10 UC campuses) to receive Pilot funding for online instruction! We’ll have 1080p time-indexed videos, “instructor does the class” videos, and mini-quizzes throughout.

onlineeducation.universityofcalifornia.edu
Overview

- **META**: This course is **NOT** just about programming!
  - Lecs + Reading: Big ideas
  - Labs: Programming
  - Disc: Distillation

- **META**: plug **CS195 Social Implications of Computers**

- **Computers in Education**
  - Most important use?
  - Judah Schwartz’ continuum
  - RSA Animate “Changing Education Paradigms”
  - UC Online Pilot
“Multiple choice tests have changed what counts as knowledge in schools. Open-ended questions were the norm 30 years ago. The kind of knowledge you can report on multiple-choice tests is unimportant in the big scheme of things, and what’s really important is not what you already know, but how you can take what you already know and apply it something you’ve never seen before. Multiple choice tests make that hard. Teaching follows tests! The folks who invented Standardized Testing didn’t foresee how it would affect what knowledge means! (unintended consequence)” – Brian Harvey
Computers in Education (open?)

Tools
- Word Processor
- Browser
- Programming language

Microworlds
- Interactive geometry
- Physics simulation
- Databases (e.g., atlas)

Courseware
- Arithmetic drill
- Computer-assisted instruction
- Computer-managed instruction

Myphysicslab demo
ASSIST movie
RSA Animate: Changing Education Paradigms

Sir Ken Robinson: Changing Paradigms

Every country on Earth, at the moment, is reforming public education.

There are two reasons for it.