CS 4375 - Operating Systems Concepts

To obtain the syllabus online

- Join course's microsoft team using code 35qfvuf
- Open the class notebook.
- Click on "Course Info" tab, then select Syllabus

Teaching Team

<table>
<thead>
<tr>
<th></th>
<th>Instructor</th>
<th>TA</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Eric Freudenthal</td>
<td>Natasha Rovelli</td>
</tr>
</tbody>
</table>

| When/how to meet         | Immediately following Lecture | Coaching sessions |

| To schedule an appointment | Via calendly | Email:nrovelli@miners.utep.edu |

Administrivia

- Prerequisite: C or better in CS 3432 - Computer Organization
  - Administration will eventually un-enroll students who don't satisfy prerequisite requirements

Attendance

- Lectures: Mandatory, but not enforced
  - In-class quizzes only offered in-person
  - Lecture notes in one-note
- Remote/delayed attendance
  - Strongly discouraged, but sometimes life intervenes.
  - On teams' "Lecture" channel, and recorded (if I remember and systems work)
  - Not officially supported or provided.
- Some sessions may be remote
  - Will be announced in the Teams' "general" channel.
  - Students can attend those sessions remotely or from the classroom.
- Attendance at scheduled coaching sessions is mandatory.
  - Bring your laptop
  - Some learning and assessment activities are in-person only (sorry)
  - Ok to miss no more than 3 sessions without permission from the instructor.
- Students can request permission to attend remotely for extended periods via teams from the instructor
  - Via teams channel

Texts

- Required
Available free online at http://pages.cs.wisc.edu/~remzi/OSTEP/.

Hardcover ($36), softcover ($24), and electronic ($10) copies are also available from the same link.

Supplementary
- Larry Peterson & Bruce Davie's Computer Networks: A Systems Approach
- Prior years: Tannenbaum’s “Modern Operating Systems.”
  - The 4th edition is current.
  - The 2nd or 3rd editions are very similar (and adequate for this course). In June 2015, Amazon was selling the 2nd edition at $0.88.
- Michael Kerrisk’s The Linux Programming Interface (No Starch Press)
- Nick Parlante’s, Pointers and Memory (pdf download)

Mandatory Coaching Sessions
- Students are required to attend a coaching session as scheduled.
- The mechanism for scheduling coaching sessions will be discussed during class.

Grading
- Primarily: fraction of course learning outcomes observed in assessment instruments & labs during coaching sessions
  - Course-specific technical skills (enumerated among course learning outcomes)
  - Non-course-specific skills such as
    - MP: Mature programming: program structure & function of components should be easily discernable by other mature programmers (e.g. the instructional team). This primarily includes naming, modularity, use of whitespace, and comments.
    - TM: Mature time management: e.g. meeting deadlines
    - WC: Written communication.
    - TL: Appropriate use of technical language and notation
    - Prep: Preparedness for meetings: Primarily whether students are prepared to describe topics that they need to discuss at the beginning of a coaching session.

Schedule:
- Quizzes will be frequent and generally unannounced.

Lab projects
- Intention:
  - Lab projects are creative works intended to provide an opportunity for students to practice and explore the application of tools and concepts presented in class within the context of programming assignments.
- Collaboration
  - Collaboration and use of external resources on lab projects is highly encouraged.
- Grading
  - Skills associated with labs are assessed on quizzes and tests, and during coaching sessions (see coaching sessions).
    - Lab correctness is not directly graded.
    - No credit will be awarded for skills not understood well enough to be applied to a different similar problem.
  - Schedule
    - Labs will have announced progress benchmark and completion schedules.
    - No direct penalty will be imposed for falling behind unless a student requests one.
    - Students who fall far behind rarely earn passing grades.
- Respect, Professionalism
  - Intolerance/bigotry/sexism/ableism is unacceptable. All must respect other’s significant choices and orientations.
To err is human. Forgiveness is divine.

○ It’s really (better than) ok to admit confusion, or even that you ‘spaced out’ for a moment.

○ Collaboration
  ○ Individuals determine who/how/when/where they will collaborate (except during assessment activities)

○ Grading
  ○ This course teaches specific skills.
  ○ You have the right to have them assessed in a (reasonable) sequence and manner that suits your needs.
    ○ Clerically efficient: quizzes
    ○ Expensive: assessing lab skills, Socratic discussion.
    ○ When needed: alternative means.
    ○ Corollary: time is limited. Very little time for assessment will be available during the last two weeks of class

○ Academic Honesty
  ○ By default, collaboration and use of 3rd party resources is not permitted when preparing solutions to problems posed during in-class tests, quizzes and 1-on-1 coaching sessions.
  ○ Students are strongly encouraged to collaborate and utilize any available resource when preparing solutions to lab assignments. See section on lab projects (above) for details.
  ○ Students are expected to conduct themselves in a professional and courteous manner, as prescribed by the Standards of Conduct: [http://hoop.utep.edu/Student_Affairs_Chapter_One-HOP.htm](http://hoop.utep.edu/Student_Affairs_Chapter_One-HOP.htm)
  ○ It is dishonest to claim others' creative work as their own. It's not cheating to describe your projects as collaborative. It is dishonest to present other's creative work as your own.

○ Problematic behavior (including but not limited to suspicion of academic dishonesty)
  ○ Must be reported to the student conduct office.
  ○ Should their investigation extends beyond semester end, a temporary "incomplete" grade will be issued.
    ○ This is specified by university policy and strictly enforced (not my choice).

○ Disabilities and Accommodations
  ○ Rules: If you have a disability and need classroom accommodations, please contact The Center for Accommodations and Support Services (CASS) at 747-5148, or by email to cass@utep.edu, or visit their office located in UTEP Union East, Room 106. For additional information, please visit the CASS website at [www.sa.utep.edu/cass](http://www.sa.utep.edu/cass).
  ○ My commitment to universal access. Let me know if some aspect of this course doesn't work for you. Hopefully we can figure out an adjustment that benefits both you and others.