THE CULTURAL POLITICS OF PROGRESS: TECHNOLOGIES, SOCIETIES, & CULTURES

COURSE DESCRIPTION:

Technology histories are too often narratives of how Western knowledge and skills have progressed towards increasingly perfect understandings and uses of nature. Yet, technologies do not evolve autonomously or deterministically. Instead, they are products of the cultural and political systems within which they develop, so developments in them can only be explained within those contexts. Conversely, the ways in which societies perceive and manipulate nature are important indicators of their value and belief systems.

This course will analyze historical developments in many technologies in order to explore the relationships between these developments and their cultural and political contexts. Particular cases will focus on the popular dissemination of new developments, industrialization, and the recent shift from optimism to concern about the exploitation of resources. We will examine standardization’s roles both in increasing productivity and in regulating labor. We will also explore the role of progress discourse and technocratic ideologies as they relate to attitudes about class, gender, and race.

REQUIRED READINGS:

The following titles are available in the Auraria Bookstore. Other required readings are on electronic reserve or online through Auraria Library. See listings on pages 3 and 4.


SEMINAR REQUIREMENTS (For details, see below):

(1) Class attendance and participation, including preparing questions for discussion.

(2) An analytical research paper and class presentation.

(3) Observation of History Department style and plagiarism guidelines, as well as the CLAS policies included in this syllabus.
**COURSE OUTLINE:**

“S&C” refers to Smith & Clancey. Numbers refer to chapters in Pacey and in S&C.

<table>
<thead>
<tr>
<th>Topic</th>
<th>Date</th>
<th>Readings</th>
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<tbody>
<tr>
<td>2. What is Technology? What is Progress?</td>
<td>August 24</td>
<td>S&amp;C 1; Morton; Staudenmaier; Lipartito</td>
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<td>3. Globalization, circa 700 CE—ever &amp; anon</td>
<td>August 31</td>
<td>S&amp;C 2,3; Carney; Pacey 1-7</td>
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<td>4. When Did We Get Modern?</td>
<td>Sept. 14</td>
<td>S&amp;C 4-9; Pacey 8-11</td>
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<td>5. 1st Term Project Roundtable</td>
<td>Sept. 21</td>
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<td>6. Noble Tinkering</td>
<td>Sept. 28</td>
<td>S&amp;C 10, 12; Takahashi</td>
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<td>7. Information Ages—18th &amp; 20th Centuries Proposals with thesis statement &amp; outline due.</td>
<td>October 5</td>
<td>McCray; Darnton; S&amp;C 13</td>
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<td>8. 2nd Term Project Roundtable</td>
<td>October 12</td>
<td></td>
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<td>9. Gendered &amp; Racial Interactions with Technologies</td>
<td>October 19</td>
<td>Cowan; Fouché; Slaton; Shackleford</td>
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<tr>
<td>10. Presentations (paper due 1 week later)</td>
<td>October 26</td>
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<td>11. Presentations (paper due 1 week later)</td>
<td>Nov. 2</td>
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<td>12. Optimistic Narratives</td>
<td>Nov. 9</td>
<td>Turner; Del Sesto</td>
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<td>13. Pessimistic Narratives</td>
<td>Nov. 16</td>
<td>S&amp;C 11; Carson; Marx</td>
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<tr>
<td>14. Balancing Pessimism &amp; Optimism</td>
<td>Nov. 30</td>
<td>Stine; Biofuel news articles</td>
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- *Term projects due (1st & 2nd versions) Dec. 7, 6:00 p.m.*
READINGS ON ELECTRONIC RESERVE:


READINGS ONLINE (some are also available in hard copy in the library)


• Biofuel News Articles for Class #14. (from LexisNexis Academic).
  - “Craig’s Twist: Biofuels from Algae.” *The Economist* (July 18, 2009).
  - “Survival Hinges on Biofuels, Say Airline Execs.” *New Straits Times* (Malaysia) (June 10, 2009).
  - “Big Oil Brings ‘Credibility’ to US Biofuels.” *Platts Oilgram News* (June 8, 2009).
  - “PGA: Biofuel Move ‘Insanity.’” *Countryman* (Western Australia) (June 4, 2009).

**TERM PROJECT**

The term project will be an analytical paper that applies a set of questions to a single topic, such as a particular technology or category of technologies, a particular period of time or region. The theoretical methods employed in the essays in chapter 1 of the Smith & Clancey anthology may be used as models.

Other options include comparisons across time, region, technology, or other category. Why have different attitudes towards specific technologies or technologies in general existed at different times and/or places? This option requires a comparative
approach. As a general rule, look through the index for Technology and Culture to begin projects.

Feel free to explore alternatives and to suggest various subjects for your papers. Narratives that do not address analytical problems will not be acceptable. Keep in mind that the regional focus of your project will determine to what fields you can apply degree credit for the course. Written proposals with thesis statement and outline are due by October 5 as a safeguard to avoid your spending valuable time on unmanageable subjects.

Whatever the topic, a good analysis asks stimulating questions of the evidence and seeks out additional evidence when the questions exceed the scope of the evidence at hand.

The term paper should be about thirty pages long, typed and double spaced, and following departmental guidelines. A full and clean paper will be due the week after your presentation to the class. It will be graded, as will the final paper. When turning in the final paper, include the first version. Please do not use plastic covers for your papers.

GRADING AND ADMINISTRATIVE DETAILS:

(1) Grade evaluations will include class participation and deportment as well as attendance and punctuality. Tardiness or leaving early by more than five minutes will also be noted as they substantially disrupt the class as a whole. All readings are due according to the dates on the course outline. Assignments must be turned in to me personally and on time in order to guarantee full credit. Otherwise I will reduce grades by a full letter, that is, for instance, from A- to B-. Maintain at least two electronic copies of all work.

Evidence that you have thought about the assignments and class discussions will provide a major criterion for grading. Show in your papers and in-class contributions that the readings and discussions have made a difference in your understandings of history and technologies. Apply thoughtful analysis to the questions the course raises. Be prepared to ask and answer questions during each class.

See the attached “Guidelines for Assessing Assignments.” These are the criteria by which I will evaluate your work.

(2) Class Discussions:

Asking questions: At least two students per class will sign up to initiate discussions by raising two or three questions based on the readings for that day. This is not to be a formal presentation; it will be evaluated according to how effectively it encourages discussion of the readings. As a general rule, neither asking for comparisons of the past with the present nor asking for predictions of the future will lead to fruitful discussions. On the other hand, asking for comparisons between time periods or regions or technologies can be
quite fruitful. Design questions so that everyone will be able to answer them from class readings or discussions. We are seeking analyses and explanations, connections, not summaries; you may point out or critique logic, evidence, and arguments. Of course, anyone can ask questions at any time, and the class will appreciate all thoughtful questions and ideas.

As with any adult learning situation, cooperation and participation are prerequisites. Students must absorb and process the reading material before class and, therefore, be able to contribute to the collective experience of discussions. Optimal class participation contributes thoughtfully and pertinent to the class discussions; students should gauge the frequency of their contributions according to that guideline.

Out of consideration for your colleagues, please turn off cell phones before class begins, and do not bring meals into the classroom.

(3) The History Department’s plagiarism policy:

The History Department assumes that all work is your own. Any words of ideas that you take from another source, including lectures or outside assistance, need to be acknowledged or cited. Not doing this is considered plagiarism. Plagiarism includes absence of attribution when quoting sources; rewording another person’s ideas and implying they are your own; utilizing the argument or structure of a text without citation; attempting to conceal the degree to which a source has been used; obtaining work from a website and submitting it as your own; and submitting the work of another student, with or without that student’s permission. Plagiarists may face failure of the specific assignment, failure of the entire course, and referral for University discipline, which may result in suspension or expulsion. As these rules merely reflect common sense and ethics, ignorance cannot mitigate the plagiarist’s culpability. For further clarification of the issue, see the University’s Academic Honor Code (<http://thunder1.cudenver.edu/clas/AcademicIntegrity.htm>) or the American Historical Association’s Statement on Standards of Professional Conduct (<http://www.historians.org/PUBS/Free/ProfessionalStandards.cfm>).

(4) The proportions for grading are as follows:

- In-class discussions and prepared questions on readings 35%
- Oral presentations of project 10%
- First version of research analysis paper 20%
- Final version of research analysis paper 35%

(6) In addition to announcements made and written handouts distributed in class, I will likely contact you between classes on occasion, which I will do through individual and group email messages. One of the requirements for this course is that you maintain a UCD email address, check it regularly for messages, be sure it is working, and let me know if
you change your email address. You are responsible for any messages, including assignments and schedule changes, that I send to you via email or post on Blackboard.

OFFICE HOURS

Mondays and Tuesdays, 4:00 - 5:00, in Room KC 554 and by appointment. I am also available by telephone (303/556-4497) and e-mail <pamela.laird@ucdenver.edu>.

I strongly urge everyone to make at least one appointment with me to discuss term projects on an individual basis. Individualized discussions can be especially beneficial for framing analytical questions and directing research strategies. I will be glad to discuss other matters, as well.

UCD & College of Liberal Arts & Sciences Policies:

• Incomplete grades (IW or IF) are NOT granted for low academic performance. To be eligible for an Incomplete grade, students MUST (1) successfully complete a minimum of 75% of the course, (2) have special circumstances beyond their control that preclude them from attending class and completing graded assignments, and (3) make arrangements to complete missing assignments with the original instructor. Verification of special circumstances is required. Completion of a CLAS Course Completion Agreement is strongly suggested. The CLAS Course Completion Agreement is available from the CLAS Advising Office, NC 2024.

• If you are a student in the military with the potential of being called to military service and/or training during the course of the semester, you are encouraged to contact the College of Liberal Arts & Sciences Associate Dean or Advising Office immediately.

• The University of Colorado at Denver and Health Sciences Center is committed to providing reasonable accommodation and access to programs and services to persons with disabilities. Students with disabilities who want academic accommodations must register with Disability Resources and Services (DRS), 177 Arts Building, 303-556-3450, TTY 303-556-4766, FAX 303-556-2074. I will be happy to provide approved accommodations, once you provide me with a copy of DRS’s letter.

• Students are responsible for knowing and abiding by the UCD Student Code of Conduct. You may download this document at http://thunder1.cudenver.edu/studentorgs/stud/studentlife/studentcodeofconduct.html
## Guidelines for Assessing Assignments

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<th>Exemplary</th>
<th>Competent</th>
<th>Inadequate</th>
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<tbody>
<tr>
<td><strong>Content</strong></td>
<td>Identifies and develops main themes with depth and completeness, strong support, and adequate detail. <strong>Employs themes, ideas, and principles from course readings &amp; discussions.</strong></td>
<td>Identifies and develops main themes in a vague way, or not as deeply as they might be. Supporting evidence and analyses are lacking in detail or they are unclear. Little use of course ideas or materials.</td>
<td>Identifies and develops main themes poorly or not at all. Analysis is missing, as is supporting evidence. No use or poor use of course ideas or other materials.</td>
</tr>
<tr>
<td><strong>Research</strong></td>
<td>Solid and imaginative exploration and use of appropriate primary sources, scholarly articles and monographs. Sources build on each other, open new avenues of thought, and establish argument with originality.</td>
<td>Secondary sources only, or inappropriate use of primary sources. Unimaginative but adequate exploration and use of materials.</td>
<td>Too little evidence of any kind to address analytical questions with originality and depth. Heavy reliance on a single source or fragmentary use of secondary sources. Note that any evidence of plagiarism will result in a failing grade.</td>
</tr>
<tr>
<td><strong>Analysis</strong></td>
<td>Uses evidence to argue a point. Asks interesting and novel questions of the evidence. Considers context, contingency, actors’ roles and purposes, and significance of findings. Adds value to evidence. Applies concepts from course. Seeks explanation.</td>
<td>Narrative with some consideration of context and other explanatory factors. Crude or simple application of course ideas, methods, or materials.</td>
<td>Simply accumulates evidence within a narrative that lacks contextualization and other explanatory factors. No use of course ideas, methods, or materials.</td>
</tr>
<tr>
<td><strong>Organization</strong></td>
<td>Organization is unified, apt, and coherent. The order and structure of the paper, paragraphs, and sentences are compelling and move the reader along. Transitions are purposeful and clear.</td>
<td>Writing’s logical order and structure is inappropriate and does not advance the paper’s goals. Paragraphs, sentences, and/or transitions are sometimes effective but sometimes not.</td>
<td>Lacks clear structure and logical flow. Paragraphs and sentences may be convoluted and difficult to understand, or they may be choppy. Transitions are abrupt and unclear.</td>
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The following policies pertain to all students and are strictly adhered to by the College of Liberal Arts and Sciences (CLAS).

- Every student MUST check and verify their schedule prior to the published drop/add deadlines. Failure to verify a schedule is not sufficient reason to justify a late add or drop later in the semester. It is the student’s responsibility to make sure that their schedule is correct prior to the appropriate deadlines.
- CLAS students must use their email.ucdenver.edu email address. Email is the official method of communication for all University of Colorado Denver business. All email correspondence will take place using your UCDHSC email address. Go to http://www.ucdenver.edu/student-services/resources/registrar/students/policies/Pages/EmailPolicy.aspx to activate your email address.
- Students are NOT automatically added to a course off a wait list after wait lists are dropped. If a student is told by a faculty member that they will be added off the wait list, it is the responsibility of the student to complete the proper paperwork to add a course.
- Students are not automatically notified if they are added to a class from a wait-list. Again, it is the responsibility of the student to verify their schedule prior to any official dates to drop or add courses.
- Students must complete and submit a drop/add form to make any schedule changes. Students are not automatically dropped from a class if they never attended, stopped attending or do not make tuition payments.
- Late adds will be approved only when circumstances surrounding the late add are beyond the student’s control and can be documented independently. This will require a petition and documentation from the student. Please note that the signature of a faculty member on an add form does not guarantee that a late add petition will be approved. Petitions are available in NC 4011.
- Late drops will be approved only when circumstances surrounding the late drop have arisen after the published drop deadlines, are beyond the student’s control, and can be documented independently. This will require a petition and documentation from the student. Pre-existing circumstances (circumstances that existed prior to the published drop deadlines) regarding illness, work, family, or other confounding issues will not be considered adequate reason to drop or withdraw from courses after the published University and/or College drop deadlines. Please note that the signature of a faculty member does not guarantee that a late drop petition will be approved. Petitions are available in NC 4011.
- Undergraduate students wishing to graduate in fall of 2009 must meet with their academic advisor by census date to obtain a graduation application. This application must be completed and submitted by 5 PM on September 2, 2009. You can obtain an application ONLY after meeting with your academic advisor. There are no exceptions to this policy or date.
- Graduate students wishing to graduate in fall semester 2009 must complete their Intent to Graduate form and have a Request for Admissions to Candidacy on file with the CLAS Dean’s office no later than 5 PM, September 2, 2009.
- Students are responsible for completing financial arrangements with financial aid, family, scholarships, etc. to pay their tuition. Students will be responsible for all tuition and fees for courses they do not officially drop using proper drop/add procedures and forms. Students who drop after the published drop/add period will not be eligible for a refund of the COF hours tuition.

Important Dates

- **August 17, 2009**: First day of Class
- **August 23, 2009**: Last day to add a class or be added to a wait list for a class using the
SMART system.

- **August 24, 2009**: LAST DAY TO DROP WITHOUT DROP CHARGE – THIS INCLUDES SECTION CHANGES.

- **August 24, 2009**: Wait Lists are dropped. Any student who was not added to a course automatically from the wait list by this date and time MUST complete a schedule adjustment form to be added to the class. Students are NOT automatically added to the class from the wait list after this date and time. If your name is not on the official student roster, you are not registered for the course.

- **August 25-September 2, 2009**: Students are responsible for verifying an accurate fall 2009 course schedule via the SMART registration system. Students are NOT notified of their wait-list status by the university. All students must check their scheduled prior to September 2, 2009 for accuracy.

- **August 25, 2009**: First day instructor may approve request to add a student to a full course with a Schedule Adjustment Form.

- **September 2, 2009**: Census date.

- **September 2, 2009 at 5 PM**: Last day to add structured courses without a written petition for a late add. **This is an absolute deadline and is treated as such.** This deadline does not apply to independent study, internships, project hours, thesis hours, dissertation hours, and late-starting modular courses.

- **September 2, 2009 at 5 PM**: Last day to drop a fall 2009 course or completely with draw from all fall 2009 courses with a tuition adjustment **minus the drop charge** and no transcript notation – this includes section changes. Drops after this date will appear on your transcript. **This is an absolute deadline and is treated as such.**

- **September 2, 2009 at 5 PM**: Last day to request pass/fail or no credit option for a course.

- **September 2, 2009 at 5 PM**: Last day for a graduate student to register for a Candidate for Degree.

- **September 2, 2009 at 5 PM**: Last day for a Ph.D. student to petition for a reduction in hours.

- **September 2, 2009 at 5 PM**: Last day to apply for fall 2009 graduation. You must make an appointment and see your academic advisor before this date to apply for graduation if you are an undergraduate; you must complete the intent to graduate and candidate for degree form if you are a graduate student.

- **September 7, 2009**: Labor Day (campus closed/ no classes)

- **October 26, 2009 at 5 PM**: Last day for non CLAS students to drop or withdraw from all classes without a petition and special approval from the student’s academic Dean. **This is treated as an absolute deadline.**

- **November 9, 2009 at 5 PM**: Last day for CLAS students to drop or withdraw from all classes with signatures from the faculty and Dean. **This is treated as an absolute deadline.**

- After **November 9, 2009** all schedule changes require a full petition. Petitions are available in NC 4011.

- **November 26, 2009**: Thanksgiving Day Holiday (campus closed)

- **No schedule changes will be granted once finals week has started.** There are NO exceptions to this policy.