**INFO 202  Social Aspects Info Tech**  credit: 3 hours.

Explores the way in which information technologies have and are transforming society and how these affect a range of social, political and economic issues from the individual to societal levels. Same as IS 202 and MACS 202. Prerequisite: Sophomore standing.

This course satisfies the General Education Criteria for a:
Social & Beh Sci - Soc Sci

<table>
<thead>
<tr>
<th>CRN</th>
<th>Type</th>
<th>Section</th>
<th>Time</th>
<th>Days</th>
<th>Location</th>
<th>Instructor</th>
</tr>
</thead>
<tbody>
<tr>
<td>53922</td>
<td>Discussion/Recitation</td>
<td>AD1</td>
<td>02:00 PM - 02:50 PM</td>
<td>R</td>
<td>316S - Mumford Hall</td>
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<td>53923</td>
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<td>03:00 PM - 03:50 PM</td>
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<td>1032 - Foreign Languages Building</td>
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<td>53924</td>
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<td>AD3</td>
<td>04:00 PM - 04:50 PM</td>
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<td>53925</td>
<td>Discussion/Recitation</td>
<td>AD4</td>
<td>09:00 AM - 09:50 AM</td>
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<td>1048 - Foreign Languages Building</td>
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<td>53926</td>
<td>Discussion/Recitation</td>
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<td>10:00 AM - 10:50 AM</td>
<td>F</td>
<td>1126 - Foreign Languages Building</td>
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<tr>
<td>53927</td>
<td>Discussion/Recitation</td>
<td>AD6</td>
<td>11:00 AM - 11:50 AM</td>
<td>F</td>
<td>241 - Armory</td>
<td>Samuel, N</td>
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<tr>
<td>53921</td>
<td>Lecture</td>
<td>AL1</td>
<td>10:00 AM - 10:50 AM</td>
<td>MW</td>
<td>126 - Grad Sch of Lib &amp; Info Science</td>
<td>Kendall, L</td>
</tr>
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</table>
INFO 303  Writing Across Media  credit: 3 hours.
The ability to communicate effectively in multiple types of media is a crucial part of literacy in our society. In this course, students will explore the intersections of various media: print, film, images, sound, etc. Students will consider the ways in which writing--as an object and as a practice--is shaped by multimodal interactions. Also integrates practical activities with broader theoretical issues in order to provide effective strategies for designing multimedia presentations, projects, and texts that integrate photography, video, and sound. Same as WRIT 303.
This course satisfies the General Education Criteria for a:
Advanced Composition

<table>
<thead>
<tr>
<th>CRN</th>
<th>Type</th>
<th>Section</th>
<th>Time</th>
<th>Days</th>
<th>Location</th>
<th>Instructor</th>
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<tr>
<td>54368</td>
<td>Lecture</td>
<td>A</td>
<td>09:30 AM - 10:45 AM</td>
<td>TR</td>
<td>9 - Gregory Hall</td>
<td>Middleton, L</td>
</tr>
</tbody>
</table>

Advanced Composition course.
Registration in this course is restricted to Informatics minors, students enrolled in one of the majors in the College of Media, or students majoring in English, Rhetoric, or Creative Writing, until April 14 at 12 pm.

| 54367| Lecture  | B       | 11:00 AM - 12:15 PM| TR   | 9 - Gregory Hall | Groundwater, E |

Advanced Composition course.
Registration in this course is restricted to Informatics minors, students enrolled in one of the majors in the College of Media, or students majoring in English, Rhetoric, or Creative Writing, until April 14 at 12 pm.

| 56170| Lecture  | C       | 12:30 PM - 01:45 PM| TR   | 9 - Gregory Hall | Harris, H     |

Advanced Composition course.
Registration in this course is restricted to Informatics minors, students enrolled in one of the majors in the College of Media, or students majoring in English, Rhetoric, or Creative Writing, until April 14 at 12 pm.

| 54369| Lecture  | D       | 02:00 PM - 03:15 PM| TR   | 9 - Gregory Hall | West, A      |

Advanced Composition course.
Registration in this course is restricted to Informatics minors, students enrolled in one of the majors in the College of Media, or students majoring in English, Rhetoric, or Creative Writing, until April 14 at 12 pm.

INFO 326  New Media, Culture & Society  credit: 3 hours.
Same as MACS 326. See MACS 326.

<table>
<thead>
<tr>
<th>CRN</th>
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<td>57671</td>
<td>Lecture</td>
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<td>TR</td>
<td>147 - Armory</td>
<td>Paredes, V</td>
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</table>

INFO 390  Special Topics  credit: 1 TO 3 hours.
Explores a variety of informatics topics. Topics and prerequisites vary by section; see current Class Schedule for details. May be repeated up to 6 hours if topics vary.
<table>
<thead>
<tr>
<th>CRN</th>
<th>Type</th>
<th>Section</th>
<th>Time</th>
<th>Days</th>
<th>Location</th>
<th>Instructor</th>
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<tbody>
<tr>
<td>61757</td>
<td>Lecture-Discussion</td>
<td>CC</td>
<td>10:00 AM - 11:20 AM</td>
<td>MW</td>
<td>29 - Psychology Building</td>
<td>Duffy, D</td>
</tr>
</tbody>
</table>

Credit Hours: 3 hours
Computers and Culture
Restricted to students with Sophomore, Junior, or Senior class standing.
Open to sophomores, juniors and seniors. Meets with IS 390CC. Description: Explores cultural ideas about computers, including hopes and fears about the effects of computers on our lives. Will analyze images of computers in fiction and movies. The course will also examine hackers, online subcultures, and other computer-related subcultures, and the integration of computers into various cultural practices.

INFO 399 **Individual Study** credit: 0 TO 3 hours.
Individual study in a subject related to informatics not covered in normal course offerings. Approved for Letter and S/U grading. May be repeated in separate terms to a maximum of 6 hours. Prerequisite: Consent of instructor.

<table>
<thead>
<tr>
<th>CRN</th>
<th>Type</th>
<th>Section</th>
<th>Time</th>
<th>Days</th>
<th>Location</th>
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<tr>
<td>52906</td>
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<td></td>
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</tr>
</tbody>
</table>

Departmental Approval Required

INFO 490 **Special Topics** credit: 1 to 4 hours.
Topics of current interest. 1 to 4 undergraduate hours. 1 to 4 graduate hours. May be repeated if topics vary. Prerequisite: Consent of instructor. Other prerequisites as specified for each topic offering. See Class Schedule.

<table>
<thead>
<tr>
<th>CRN</th>
<th>Type</th>
<th>Section</th>
<th>Time</th>
<th>Days</th>
<th>Location</th>
<th>Instructor</th>
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<tr>
<td>65245</td>
<td>Laboratory</td>
<td>A</td>
<td>04:00 PM - 05:50 PM</td>
<td>W</td>
<td>ARR - Art-East Annex, Studio 2</td>
<td>Linder, S</td>
</tr>
<tr>
<td></td>
<td>Lecture</td>
<td>A</td>
<td>03:00 PM - 03:50 PM</td>
<td>W</td>
<td>ARR - Art-East Annex, Studio 2</td>
<td>Linder, S</td>
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</table>

Credit Hours: 3 hours
Makerspace
Restricted to Undergrad - Urbana-Champaign.
This course is an exploration of the history, function, and meaning of community-oriented makerspaces. It includes both classroom and studio sessions. Studio assignments will incorporate learning about open source software for graphic and 3D design and methods for rapid prototyping and production. Students will be introduced to a variety of materials and tools including paper, plastics, wood, fabric, and small-board electronics as well as digital embroidery machines, electronic textiles, 3D printers and scanners, electronic cutters, and a laser engraver. Section A includes an emphasis on iteration and self-directed learning through making. Students will complete and present an independent project at the end of the course that combines multiple tool areas. Must also register for lab. The class will meet in the CU Fab Lab in Art Annex II. This section is for undergraduate students only. Graduate students should register for CRN 68913.

<table>
<thead>
<tr>
<th>CRN</th>
<th>Type</th>
<th>Section</th>
<th>Time</th>
<th>Days</th>
<th>Location</th>
<th>Instructor</th>
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<tr>
<td>68913</td>
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<td>ARR - Art-East Annex, Studio 2</td>
<td>Linder, S</td>
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<td></td>
<td>Lecture</td>
<td>AG</td>
<td>03:00 PM - 03:50 PM</td>
<td>W</td>
<td>ARR - Art-East Annex, Studio 2</td>
<td>Linder, S</td>
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</table>

Credit Hours: 4 hours
Makerspace
Not intended for Undergrad - Urbana-Champaign.
This course is an exploration of the history, function, and meaning of community-oriented makerspaces. It includes both classroom and studio sessions. Studio assignments will incorporate learning about open source software for graphic and 3D design and methods for rapid prototyping and production. Students will be introduced to a variety of materials and tools including paper, plastics, wood, fabric, and small-board electronics as well as digital embroidery machines, electronic textiles, 3D printers and scanners, electronic cutters, and a laser engraver. Section A includes an emphasis on iteration and self-directed learning through making. Students will complete and present an independent project at the end of the course that combines multiple tool areas. Must also register for lab. The class will meet in the CU Fab Lab in Art Annex II. This section is for graduate students only. Undergraduate students should register for CRN 65245.

<table>
<thead>
<tr>
<th>CRN</th>
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<th>Makerspace</th>
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<tr>
<td>68131</td>
<td>Laboratory</td>
<td>3</td>
<td></td>
<td>Restricted to Undergrad - Urbana-Champaign. This course is an exploration of the history, function, and meaning of community-oriented makerspaces. It includes both classroom and studio sessions. Studio assignments will incorporate learning about open source software for graphic and 3D design and methods for rapid prototyping and production. Students will be introduced to a variety of materials and tools including paper, plastics, wood, fabric, and small-board electronics as well as digital embroidery machines, electronic textiles, 3D printers and scanners, electronic cutters, and a laser engraver. Section B will include an emphasis on community engagement in makerspaces. Students in this section will evaluate makerspace curricula for classrooms and libraries and will have the opportunity to conduct a workshop with our community partners. Must also register for lab. The class will meet in the CU Fab Lab in Art Annex II. This section is for Undergraduates only. Graduate students should register for CRN 68914.</td>
</tr>
<tr>
<td>68914</td>
<td>Laboratory</td>
<td>4</td>
<td></td>
<td>Not intended for Undergrad - Urbana-Champaign. This course is an exploration of the history, function, and meaning of community-oriented makerspaces. It includes both classroom and studio sessions. Studio assignments will incorporate learning about open source software for graphic and 3D design and methods for rapid prototyping and production. Students will be introduced to a variety of materials and tools including paper, plastics, wood, fabric, and small-board electronics as well as digital embroidery machines, electronic textiles, 3D printers and scanners, electronic cutters, and a laser engraver. Section B will include an emphasis on community engagement in makerspaces. Students in this section will evaluate makerspace curricula for classrooms and libraries and will have the opportunity to conduct a workshop with our community partners. Must also register for lab. The class will meet in the CU Fab Lab in Art Annex II. This section is for Graduate students only. Undergraduate students should register for CRN 68131.</td>
</tr>
<tr>
<td>65396</td>
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<td>Not intended for students with Freshman class standing. INFO 490 JP: Designing and Programming Text Based Games and Simulations. In this course, you will be introduced to the &quot;design work&quot; of game authoring, and will apply these theoretical ideas to specific programming practices and skills. You will become proficient in Inform 7, a programming language and design system for interactive fiction (IF), and text-based computer games and simulations. By the end of the semester you will have developed a game or literary work of IF, and made a substantive contribution to a team-written, historical simulation project, dramatically recreating a key moment in Illinois history. This class meets with CWL 461 JP. No prior programming knowledge is required for students to be successful in the course. Students will be expected to bring a laptop to class.</td>
</tr>
</tbody>
</table>
| 65222| Online                           | 3       |            | Bruns, R

Credit Hours: 3 hours

Design & Prog Text Based Games
Not intended for students with Freshman class standing.

INFO 490 JP: Designing and Programming Text Based Games and Simulations. In this course, you will be introduced to the “design work” of game authoring, and will apply these theoretical ideas to specific programming practices and skills. You will become proficient in Inform 7, a programming language and design system for interactive fiction (IF), and text-based computer games and simulations. By the end of the semester you will have developed a game or literary work of IF, and made a substantive contribution to a team-written, historical simulation project, dramatically recreating a key moment in Illinois history. This class meets with CWL 461 JP. No prior programming knowledge is required for students to be successful in the course. Students will be expected to bring a laptop to class.
Foundations of Data Science
Not intended for students with Freshman class standing.
Foundations of Data Science This class is an asynchronous, online course. Students MUST register by August 30 at 4 pm.
Registration in this course after that point will not be permitted. This course will build a practical foundation for data science by teaching students basic tools and techniques that can scale to large computational systems and massive data sets. Students will first learn how to work at a Unix command prompt before learning about source code control software like git and the github site. Next, the Python programming language will be covered, with a focus on specific aspects of the language and associated Python modules that are relevant for Data Science. Python will be introduced and used primarily via the IPython (or Jupyter) Notebooks, and will cover the Numpy, Scipy, MatPlotlib, Pandas, Seaborn, and scikit_learn Python modules. These capabilities will be demonstrated through simple data science tasks such as obtaining data, cleaning data, visualizing data, and basic data analysis. Students must have access to a fairly modern computer, ideally that supports hardware virtualization, on which they can install software. This class is open to sophomores, juniors, seniors and graduate students in any discipline. This class meets with STAT 430 RB (CRN 66998) and IS 490 RB (68792).

INFO 500  Orientation Seminar  credit: 1 hours.
A broad introduction to faculty research in each Informatics Area. Consists of weekly presentations by Informatics faculty highlighting their recent research, practice, and related concepts. Approved for S/U grading only. May be repeated in separate terms to a maximum of 2 hours. Prerequisite: Graduate standing in any field.

<table>
<thead>
<tr>
<th>CRN</th>
<th>Type</th>
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<th>Time</th>
<th>Days</th>
<th>Location</th>
<th>Instructor</th>
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<tbody>
<tr>
<td>59152</td>
<td>Lecture-Discussion</td>
<td>A</td>
<td>04:00 PM - 04:50 PM</td>
<td>R</td>
<td>ARR - Nat Center for Suprcomp Appl</td>
<td>Turk, M</td>
</tr>
</tbody>
</table>

This class will meet in NCSA room 3100.

INFO 510  Research Practicum  credit: 4 hours.
A one semester directed research project supervised by a member of the informatics faculty in the student's area of specialization or closely related area. These are intended to be practical research, not just literature surveys, and must have a definite output such as a paper or demonstration project. The research should be relevant to the thesis work or preparatory work to support the thesis. Informatics students must take two semesters, usually each semester should be under a different Informatics faculty member, but with the concurrence of their advising committee both may be taken under a single faculty member. Approved for S/U grading only. May be repeated in separate terms to a maximum of 8 hours. Prerequisite: Graduate standing in any Informatics.

<table>
<thead>
<tr>
<th>CRN</th>
<th>Type</th>
<th>Section</th>
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<th>Days</th>
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<tr>
<td>62421</td>
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</table>

Departmental Approval Required

INFO 590  Advanced Special Topics  credit: 1 TO 4 hours.
Subject offerings of new and developing areas of knowledge in Informatics, intended to augment existing curriculum. See Class Schedule for specific topics and prerequisites. 1 to 4 graduate hours. No professional credit. May be repeated if topics vary. Prerequisite: Graduate Student Standing.

<table>
<thead>
<tr>
<th>CRN</th>
<th>Type</th>
<th>Section</th>
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<th>Days</th>
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<tbody>
<tr>
<td>65405</td>
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<td>LC</td>
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<td>W</td>
<td>37 - Education Building</td>
<td>Lane, H</td>
</tr>
</tbody>
</table>

Credit Hours: 4 hours
Engaging & Educational Tech
Restricted to Graduate - Urbana-Champaign.
Engaging Educational Technologies: This course will focus on recent advances using advanced technologies to promote and sustain learning, both in formal and informal settings. Possible topics covered include digital games, immersive environments, mobile devices, affective computing, pedagogical agents, and intelligent tutoring systems. Relevant evidence-based principles and theories of learning with technology will also be covered (such as Mayer's principles of multi-media learning, engagement, and preparation for future learning). Students in the class will be expected to design and implement a course project (either alone or in teams) that can involve the creation of a novel educational technology (e.g., a mobile app) or in the use of an existing technology in a novel way. No technical skills (e.g., programming) are required for this course. This section will be held in room 16 of the Education building. This class meets with EPSY 590 HC (64434).

INFO 597  Individual Study  credit: 2 TO 4 hours.
Individual study in a subject related to informatics not covered in normal course offerings. May be repeated in same term for a maximum of 8 hours or separate terms for a maximum of 16 hours if topics vary. Prerequisite: Consent of instructor.

<table>
<thead>
<tr>
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<th>Section</th>
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<th>Days</th>
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</tbody>
</table>

Departmental Approval Required

INFO 599  Thesis Research  credit: 0 TO 16 hours.
Research for Ph.D. thesis. May be repeated in separate terms. Prerequisite: Instructor approval required.

<table>
<thead>
<tr>
<th>CRN</th>
<th>Type</th>
<th>Section</th>
<th>Time</th>
<th>Days</th>
<th>Location</th>
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Departmental Approval Required