RISE Science Honors Seminar
COURSE SYLLABUS
Fall 2011

Meeting Time: Tuesdays and Thursdays 9:00-10:15 am, HSC 326

Instructor: Jane Liu; Contact: jliu3@drew.edu, ext. 3303, HSC 212

RISE Fellows (http://www.drew.edu/rise/)
Arny Demain  Jon Kettenring  Jim Miller
ademain@drew.edu  jkettenr@drew.edu  jmiller@drew.edu
ext. 3937, HSC 330  ext. 3829, HSC 322  ext. 3369, HSC 333

Ron Doll  Jim McKenna  Barbara Petrack
rdoll@drew.edu  jmckenna@drew.edu  bpetrack@drew.edu
ext. 3168, HSC 332  ext. 3709, HSC 318  ext 3567, HSC 329

Vince Gullo  Bimal Dasmahapatra  Ken Thomas
vgullo@drew.edu  bimaldas@aol.com  kthomas@drew.edu
ext. 3904, HSC 331  

COURSE OBJECTIVES:
• Be able to participate in a discussion that tackles current issues in science
• Be able to find, read and summarize primary scientific literature
• Be able to think critically about current issues in science
• Be able to communicate information about a scientific problem in both oral and written form

COURSE SCHEDULE (schedule to change):

<table>
<thead>
<tr>
<th>Weeks of:</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aug 30 – Sept 15</td>
<td>An overview of the research activities of the RISE fellows. Students will be assigned a RISE advisor at the end of this three-week period. Initial meeting with RISE advisors.</td>
</tr>
<tr>
<td>Sept 20 – Sept 22</td>
<td>On conducting scientific literature research. Begin work on projects.</td>
</tr>
<tr>
<td>Sept 27 – Nov 1</td>
<td>Student led class discussions.</td>
</tr>
<tr>
<td>Nov 3</td>
<td>Peer review of project drafts.</td>
</tr>
<tr>
<td>Nov 8 – Dec 1</td>
<td>Student project final presentations.</td>
</tr>
</tbody>
</table>
Course Assignments and Expectations:

1. **Semester-Long Project:** You are responsible for completing a semester-long project under the direction of your RISE advisor. (RISE advisors will be assigned after the RISE fellows have each given an overview of their research areas. You will be able to indicate which research areas are of most interest to you before your advisor is assigned.) It is expected that you will meet with your advisor outside of class at least once a week to discuss your progress on your project. Depending on your interests and on the interests of your advisor, projects may include exploring primary research literature, analyzing data sets, developing experimental models and/or conducting lab experiments. The semester-long project will culminate with a written paper and a class presentation. The purpose of the project is for you to engage deeply with a current scientific problem and/or issue over the course of the semester and to effectively communicate what you have learned in written and oral form.

2. **Student-Led Class Discussion:** With the help of your RISE advisor, you are responsible for leading a class discussion on a reading relevant to your semester-long project. As the student discussion leader, you will give the class an assignment to complete in advance of class; this assignment will certainly include reading but could also include other activities (i.e. a list of questions to prepare.) The purpose of this assignment is for you to introduce the class to some of the ideas that you are grappling with in your project. You will be expected to help the class think critically and scientifically about the issues involved.

3. **Response Papers:** You are responsible for writing a brief (1-2 pages) response paper following certain class presentations. The topic for the response paper will be given at the end of each class period and the response papers will be due the following class period. The purpose of the response papers is to encourage you to reflect on the class discussions.

4. **Class Participation:** You are responsible for coming prepared both to class and to meetings with your RISE advisor. Both in class and in meetings with your RISE advisor, you are expected to contribute with questions, comments, and observations. An active discussion requires the participation of everyone present, so clearly one of the purposes of this requirement is to ensure productive class and advisor meetings. Another purpose of required class participation is to enable you to develop your abilities to think critically and communicate effectively.
Important Dates:

- **Sept 14** Submit names of RISE advisors whom you would like to work with.
- **Sept 27** Student-led discussions begin. You will be assigned to lead the class discussion sometime between September 27\textsuperscript{th} and Oct 27\textsuperscript{th}.
- **Sept 29** Project proposal due.
- **Oct 13** Annotated bibliography for project paper due.
- **Nov 1** Project paper rough draft due for peer review.
- **Nov 15** Final project presentations begin. You will be assigned a date to present sometime between November 15\textsuperscript{th} and December 1\textsuperscript{st}.
- **Nov 17** Project paper draft due to Prof. Liu.
- **Dec 1** Last day of class. Project final paper due.

**Grading:** Your final grade will be based on the following:

<table>
<thead>
<tr>
<th>Component</th>
<th>Weight</th>
</tr>
</thead>
<tbody>
<tr>
<td>Class Participation</td>
<td>20%</td>
</tr>
<tr>
<td>Project Paper</td>
<td>35%</td>
</tr>
<tr>
<td>Response Papers</td>
<td>10%</td>
</tr>
<tr>
<td>Leading a Class Discussion</td>
<td>10%</td>
</tr>
<tr>
<td>Project Presentation</td>
<td>15%</td>
</tr>
<tr>
<td>Participation with RISE advisor</td>
<td>10%</td>
</tr>
</tbody>
</table>

**Attendance Policy:** Participation in class discussions is an essential part of this course, and your attendance at every class is required.

**Academic Honesty:** All students are expected to abide by the Drew University Standards of Academic Integrity. (See: [https://uknow.drew.edu/confluence/display/Handbook/Academic+Integrity+Policy](https://uknow.drew.edu/confluence/display/Handbook/Academic+Integrity+Policy)).

Cases of plagiarism, whether deliberate or unintentional, will be referred to the Academic Integrity Committee. Please ask if you have any questions regarding the appropriate use and citation of sources.

**Academic Accommodations:** Academic Accommodations: Should you require academic accommodations, you must file a request with the Office of Disability Services (BC 119, extension 3327). It is your responsibility to self-identify with the Office of Disability Services and to provide faculty with the appropriate documentation from that office at least one week prior to any request for specific course accommodations. There are no retroactive accommodations.