Psychology G4490  
Inheritance  
Spring 2011  
Frances A. Champagne  
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PSYC G4490 Inheritance (seminar)  
4 pts F Champagne F 10:10-12:00PM Room 405 Schermerhorn Hall  
INSTRUCTOR PERMISSION REQUIRED PRIOR TO REGISTRATION

Please be advised that if you do not obtain permission to register from the instructor prior to registering you will not be permitted to take this course. Requests for permission should be made by email and it is recommended that you make this request in advance of the registration period.

Prerequisite: Basic knowledge of biology and neuroscience recommended. Instructor permission required.

Explores the concept of inheritance and the mechanisms through which inheritance is mediated. Will focus on the generational transmission of physiology and behavior, but will also consider the inheritance of culture and language.


Weekly Schedule & Readings

Jan-21-11 Introduction & Overview

Jan-28-11 Historical Perspectives/Overview of Genetics

*Jablonka & Lamb* Chapters 1 & 2


Feb-04-11 Behavior Genetics Journal Presentations


Feb-11-11  **Induced Variation in Genes**

*Jablonka & Lamb* Chapter 3


Feb-18-11  **Lamarckian Concepts of Inheritance**

Chapter from Lamarck's *Philosophie Zoologique*

Feb-25-11  **Historical Perspectives/Overview of Epigenetics**

*Jablonka & Lamb* Chapter 4


Mar-04-11  **Epigenetics and Behavior Journal Presentations**


Mar-11-11  **MIDTERM EXAM**

Mar-18-11  **SPRING BREAK**

Mar-25-11  **Behavioral Systems of Inheritance and Social Learning**

*Jablonka and Lamb* Chapter 5


Apr-01-11  **NO CLASS**

Apr-08-11  **Social Learning Journal Presentations**

Course requirements

Each week, students will attend a two-hour seminar. Class time will be devoted to the presentation and discussion of book chapters and journal articles. The readings are intended to provide background knowledge on the relevant topics, to cover current research on those topics, and to serve as a stimulus for discussion. Students will also present journal articles relevant to specified topics within the course. Journal articles will be selected by the students with approval by the instructor. Evaluation of participation is based on class attendance and engagement in class discussions. Evaluation of presentations is based on ratings of the preparedness, clarity, and organization of student seminars.

The students take a written midterm exam (March 11, 2011) with short-answer essay questions covering the material in the textbook, the papers and the class discussions. During the second half of the semester, the students write a term paper due on April 22, 2011. The 8-10 page paper should take the form of a critical review paper that addresses a specific question related to the topics of the seminar.

Grading is allocated as follows:

<table>
<thead>
<tr>
<th>Grade</th>
<th>Percentage</th>
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<tbody>
<tr>
<td>Midterm exam</td>
<td>20%</td>
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<tr>
<td>Term paper</td>
<td>30%</td>
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<tr>
<td>Participation and Presentations</td>
<td>50%</td>
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