BIOS 486: ANIMAL BEHAVIOR AND NEUROETHOLOGY
FALL 2015
Tu, Th 2:00 - 4:20
Room 4068 SELE

COURSE PRE-REQUISITES: EITHER BIOLOGY OF THE BRAIN BioS 286 OR PHYSIOLOGICAL PSYCHOLOGY PSCH 262

COORDINATOR:
Dr. Thomas Park
Biological Sciences 3055 SEL
312-413-3020
tpark@uic.edu

OTHER INSTRUCTORS: Dr. John Leonard (leonard@uic.edu); Dr. Chieh Chang (chiehc@uic.edu)

TEACHING ASSISTANT: Brigitte Browe (bbrowe2@uic.edu)

OFFICE HOURS: Arranged with the instructors at a mutually agreed upon time.

SUGGESTED READINGS: Assigned on Blackboard, see announcements
Additional Supplementary Books Available in 4068 SEL: “Animal Behavior” by John Alcock,
Nerve cells and Animal Behavior by Peter Simmons, and David Young
Book on reserve at Daley Library: “Bird Sense” by Tim Birkhead

SUGGESTED Web sites: ebird.org; allaboutbirds.org

GOALS AND OBJECTIVES: To deepen student’s hands on experience of the neural basis of behavior in a variety of animals.

ATTENDANCE:
Attendance is expected at all scheduled meetings;
Students are able to drop a course without penalty through Friday of the ninth week of the semester. Late drops are subject to the College of LAS rules and students should consult with the College advisor (996-3366).

GRADING: Each student’s final grade will be computed from total points obtained from:
1 Birdsong Quiz completion
3 lab reports
1 article presentation
1 essay final exam
SYLLABUS:

Wk. 1 Park
Aug 25 Overview: Lab Naked mole rats (sedation)
Aug 27

Wk. 2 Leonard
Sep 1 Birds Field Lab
Sep 3 Lab Naked Mole Rats (sedation 2)

Wk. 3 Park
Sep 8 Local field trip UIC to Arrigo Park
Sep 10 Visit Primate Facility for Lab

Wk. 4 Park
Sep 15 Lab Naked Mole Rats (pain)
Sep 17

Wk. 5 Park
Sep 22 Lab Naked Mole Rats (pain)
Sep 24

Wk. 6 Park
Sep 29 Lab Naked Mole Rats (pain 2)
Oct 1

Wk. 7 Leonard
Oct 6 Birds Field Lab
Oct 8 Local Field Trip UIC to Arrigo Park
Oct 10 Bus Field Trip to Montrose Point

Wk. 8 Leonard
Oct 13 Long-distance migration
Oct 15 Neural circuit mechanism of aggression in Drosophila

Wk. 9 Chang
Oct 20 Neural circuit mechanism of aggression in Drosophila
Oct 22 Comer Undergraduate Neuroscience Seminar

Wk. 10 Chang
Oct 27, 29 Neutral circuit mechanism of aggression in mice; Birdsong learning

Wk. 11 Chang
Nov 3 Male mating behavior in the nematode worm C. elegans
Nov 5 C. elegans lab

Wk. 12 Chang
Nov 10 Odorant-mediated navigation behavior in C. elegans
Nov 12 C. elegans lab
<table>
<thead>
<tr>
<th>Wk. 13 Chang/Leonard</th>
<th>Nov 17 Chang/Leonard</th>
<th>Charlie Rose: The Brain series on Aggression (then short intro to Sandhill cranes)</th>
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<tr>
<td>Nov 19 Leonard</td>
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<td>Jasper-Pulaski IN, cranes field trip</td>
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**Wk. 14**  
Nov 24 Student Presentations  
Nov 26 **THANKSGIVING HOLIDAY**

**Wk. 15**  
Dec 1 Student Presentations  
Dec 3 Final Essay