

Psychology 450/550 Hormones and Behavior 4 credits CRN 16572/16573

Fall 2015 /220 HED / MW 12:00-13:20

Instructor: Theodore Bell tbell1@uoregon.edu

Office Hours: 10-11 Monday, Wednesday LISB 123 and by appointment

GTF: Benjamin Nelson bwn@uoregon.edu

Overview and Format

Course Description: This course covers the complex relationships between the brain, endocrine systems, and behavior, including developmental effects of hormones on the brain, puberty, sexuality, aggression, and stress.

Course Objectives:

1 This course will give students a thorough overview of basic endocrinology, through learning to identify major hormones and hormone systems and comparing these systems in both humans and non-human animals

2 This course will also focus on a critical examination of the reciprocal interactions of hormone systems and behavior through a detailed investigation of the function and behavioral relevance of these systems using peer-reviewed research. Popular misconceptions and distortions will also be addressed.

3 This course will support the furtherance of scientific academic writing skills through research and major writing assignments.

Teaching Philosophy: A teacher is part coach, part actor, part bandit (lifting from anywhere that will help), and part student (still always learning). A student is open to new ideas, diligent in effort to master new things, eager to surpass him/herself, is an active partner in the process, and part cowboy (always willing to get back up on the horse that bucked them off).

Ground rules for discussions: We will be discussing a wide range of topics and ideas, some of which may be frustrating, controversial, or politically charged. It is extremely important to me that we maintain a respectful environment while promoting a diversity of opinions and ideas. Participants should feel free to offer up their ideas, and should expect that those ideas be the focus of any critical analysis rather than the person discussing them. In other words, ideas are fair game for criticism, but personalizing attacks will not be tolerated.

Text and Readings: *An Introduction to Behavioral Endocrinology*, 4th ed. Randy Nelson. Additional readings will be posted on Canvas.

Additional readings (will be posted on Canvas), Note: we may add one or two additional articles to this list depending on time and interest.

Week 2: Hampson, E., & Rovet, J. F. (2015). Spatial function in adolescents and young adults with congenital adrenal hyperplasia: Clinical phenotype and implications for the androgen hypothesis. *Psychoneuroendocrinology*, 54, 60-70.

Week 3: van der Meij, L., Almela, M., Buunk, A. P., Fawcett, T. W., & Salvador, A. (2012). Men with elevated testosterone levels show more affiliative behaviours during interactions with women. *Proceedings of the Royal Society: Biological Sciences*, 279(1726), 202-208.

Week 6: Boksem, M. A., Mehta, P. H., Van den Bergh, B., van Son, V., Trautmann, S. T., Roelofs, K., ... & Sanfey, A. G. (2013). Testosterone Inhibits Trust but Promotes Reciprocity. *Psychological Science*, 24(11), 2306-2314.

Week 9: Zoccola, P. M., & Dickerson, S. S. (2015). Extending the recovery window: Effects of trait rumination on subsequent evening cortisol following a laboratory performance stressor. *Psychoneuroendocrinology*, 58, 67-78.

Grades:

- Midterm I 20%
- Midterm II 20%
- Final Exam 25%
- Quizzes 12.5
- Research Paper and Rough Draft 12.5% (2.5% + 10%)
- Class participation (undergraduates Psy 450 only...assessed through participation in discussion and micro-quizzes during class, *attendance will be taken*) 10%
- ***Class Presentation (graduate students psy 550 only)*** 10%
- Extra-credit (optional) up to 4% (up to two "Follow-up" assignments can be completed (see below))

Grading Scheme:

The final grade assigned for the course should reflect the student's overall performance in the course, as described by the following guidelines: A excellent work, complete mastery of course material, B good work, grasps most of the important concepts, C average work, grasps many but not all aspects of course material, D poor work, insufficient understanding of material, F failing

Grades will be assigned based on your total percentage points in the course:

GRADE	PERCENTAGE	GRADE	PERCENTAGE
A+	99-100%	C	72-77%
A	92-98%	C-	70-71%
A-	90-91%	D+	68-69%
B+	88-89%	D	62-67%
B	82-87%	D-	60-61%
B-	80-81%	F	59% and Below
C+	78-79%		

Exams & Quizzes:

Two Midterms

Final: cumulative

A total of 7 weekly quizzes posted Fridays

Assignments:

Term Paper

Psy 550 additional requirements: in class presentation

EXTRA-CREDIT "Follow-up" assignments.

From time to time, interesting issues will arise from class discussion meriting further exploration. I will note these in class, and post opportunities for Follow-up assignments (generally a short piece of research) on Canvas for those students wishing to earn extra-credit. Full instruction for these assignments will also be posted on Canvas

Academic Misconduct:

Plagiarism will result in a zero on any assignment.

Cheating on any exam, or assignment will result in a failing grade in class.

All academic misconduct and suspected misconduct will be reported to the Office of Student Conduct, this is mandatory and not at the discretion of the instructor

Students with Disabilities: If you have a documented disability and anticipate needing accommodations in this course, please make arrangements to meet with me. Also, please request that the Accessible Education Center (164 Oregon Hall, <http://aec.uoregon.edu/contact.html>) send me a letter verifying your disability. The phone number for AEC is 346-1155 and the email address is uoaec@uoregon.edu

Students for Whom English is Not Their Native Language: Foreign language dictionaries are permitted during exams. If you find that you do need additional time to complete the first exam, please let me know, and we will make arrangements ahead of time for all future exams.

Course Outline: Subject to Minor Changes

Week 1

M 9/28 Class Overview and Syllabus Ch 1

W 9/30 Techniques in Behavioral Neuroendocrinology Ch 1-2

Week 2

M 10/5 Endocrine Syst. Ch 2-3

W 10/7 Sex Determination/Differentiation Ch 3 + article

Week 3

M 10/12 Sex Differences Ch 4

W 10/14 Male Reproductive Behavior Ch 5 + article

Week 4

M 10/19 Female Reproductive Behavior Ch 6

W 10/21 Midterm I

Week 5

M 10/26 Parental Behavior Ch 7

W 10/28 Social Behavior Ch 8

Week 6

M 11/2 Aggression
 W 11/4 Learning and Memory

Ch 8
 Ch 12+ article

Week 7

M 11/9 Stress
 W 11/11 Stress

Ch 11

Week 8

M 11/16 Homeostasis and Behavior
 W 11/19 Midterm II

Ch 9

Week 9

M 11/23 Biological Rhythms
 W 11/25 Homeostasis and Behavior

Ch 10+ article
 Ch 9

Week 10 (Final Paper Due)

M 11/30 Affective Disorders
 W 12/2 Class Presentations 550/EXAM REVIEW

Ch 13

Finals Week

THURSDAY 12/10 EXAM @ 10:15 AM

Assignment Calendar

Midterm I 10/21

Midterm II 11/19

Weekly quizzes Posted Fridays Week 1, 2, 3, 5, 6, 7, 10 (drop lowest quiz)

550 Presentation topics due

WEEK 3

Term paper topics due:

WEEK 3

Term paper topics finalized

WEEK 4

Term paper draft for peer editing

WEEK 8 MONDAY

Peer edits due back

WEEK 8 WEDNESDAY

Final term paper due

Week 10