

SCI 365U (CRN 63261) WS 356U (CRN 64308) Science of Women's Bodies

Instructor: Janice Montgomery, MS

Time Schedule: Tu/Th 12:00-1:50pm

Office hours: Tuesday/Thursday before/after class in classroom and by appointment.

Messages: D2L mail or jmontgom@pdx.edu

COURSE DESCRIPTION

The female human body is studied from a multidisciplinary perspective including anatomy, physiology, genetics, cell biology, endocrinology and human development, as well as biochemistry. Current social, cultural and political topics related to the science and policy of women's health are also discussed.

GENERAL OBJECTIVE

Students will gain an introductory level understanding of basic science content in a variety of disciplines using the female body as a focus point and have an opportunity to apply that knowledge as they explore related controversial issues.

SPECIFIC OBJECTIVES

Students successfully completing this course will:

1. Be able to identify the biochemical origins of hormones and other chemical messengers and their physiological actions in the body.
2. Be able to locate the major endocrine glands and identify the hormones they secrete during the different stages of the normal female life cycle.
3. Be able to describe the process of cell division as it applies to gamete production.
4. Be familiar with the role of sex chromosomes in determining gender and the expression of genetic abnormalities related to gender.
5. Have a basic understanding of the development of the female reproductive system and the anatomy and physiology of the ovaries, uterus and breast as related to both normal and abnormal conditions.
6. Have an understanding of the impact of changing hormone levels on normal body functioning and the pharmacological manipulation of hormones in the treatment of infertility and precocious puberty.
7. Have experience using science knowledge in evaluating and understanding controversial women's health issues.

COURSE MATERIALS

1. REQUIRED text: Woman – An Intimate Geography: Angier, N., Houghton Mifflin, 1999.
2. On RESERVE – PSU library for this course:
Concepts of Anatomy and Physiology (5th ed.): VanDeGraaff, K and Fox, I. McGraw Hill, 1999.
Principles of Anatomy and Physiology (10th ed.): Tortora, G and Grabowski, S. John Wiley, 2003.

EVALUATION

1. FINAL GRADE: The total points earned during the course will be converted to a percentage score and final grades will be assigned based on a modified standard curve. PARTICIPATION: Three Group Audience Evaluations are required. Three points will be subtracted for each Evaluation not completed.
60 Class Attendance/Participation: 3 points/class, 1.5 points/half class.
140 Weekly exams (20 points each) 7 highest scores out of the 9 exams given.
100 Group project
100 Individual project
400 Total points
2. ATTENDANCE POINTS: When a student misses class due to illness or family emergency, an email jmontgom@pdx.edu from the student is required for an excused absence so that attendance points are not lost. It is the responsibility of the student to notify the instructor as soon as possible. Written documentation must be provided for more than three excused absences.
3. WEEKLY EXAMS: Exams are given at the beginning of class (the first 20 minutes), every TUESDAY. See Schedule. Questions are objective in nature (short answer, fill-in, true/false, multiple choice) and cover only the material presented in class since the last exam. The TWO lowest exam scores will be dropped. **NO MAKE-UP EXAMS.**
4. GROUP/INDIVIDUAL PROJECTS: Written guidelines will be provided/reviewed in class. See course schedule for presentation dates. **Five points/day will be taken off for Group Project study guide materials not emailed on time and 5 points/week will be taken off for late Individual Projects. Group members will be expected to present their project, on time, as scheduled, even in the event that a group member is absent.** Refer to Group/Individual Project Guidelines for details.

EXPECTATIONS FOR CLASSROOM ENVIRONMENT

1. Please turn cell phones to SILENT OR OFF.
2. NO laptop use when class is in session unless there is a documented need.
3. Do not bring children or guests to class.
4. Please respect the sensitive nature of the course material in all classroom communications.

TENTATIVE SCHEDULE

Week 1	Apr 1	(Tues)	Topics: Course Overview, Hormone Basics, Endocrine Glands Assignment: Read CH 10 - Print CH 10 Study Guide before class Thursday
		(Thurs)	Topics: CH 10 "A Brief History of Hormones". Review Project guidelines Assignments: Read assigned Group Project chapter before next Tuesday and complete the FRONT SIDE of the Group Project Worksheet before class
Week 2	Apr 8	(Tues)	Topics: CH 10 "A Brief History of Hormones" (continued) <u>DUE</u> : (beginning of class) FRONT SIDE of Group Project Worksheet Groups will meet in the classroom the 2 nd hour to complete the BACK SIDE
		(Thurs)	CH 10 "A Brief History of Hormones" (continued), CH 10 Exam review Assignments: Print Precocious Puberty Study Guide before class Tuesday
Week 3	Apr 15	(Tues)	<u>Exam 1</u> Topics: Precocious puberty: cause, diagnosis, treatment issues
		(Thurs)	Topics: Precocious puberty (continued), Precocious puberty Exam review REMINDER: CH 1 Group – Email Study Guide before midnight Saturday Assignments: Read CH 1 - Print CH 1 Study Guide before class Tuesday
Week 4	Apr 22	(Tues)	<u>Exam 2</u> Group 1 Project presentation.
		(Thurs)	Topics: Oocyte, oogenesis, meiosis/mitosis, egg donor protocol CH 1 Exam review and Individual Project presentations DUE REMINDER: CH 2 Group – Email Study Guide before midnight Saturday Assignments: Read CH 2 - Print CH 2 Study Guide before class Tuesday
Week 5	Apr 29	(Tues)	<u>Exam 3</u> CH 2 Group Project presentation.
		(Thurs)	Topics: Sex chromosomes, fetal development of reproductive system, AIS CH 2 Exam review and Individual Project presentations DUE REMINDER: CH 5/6 Group – Email Study Guide before midnight Saturday Assignments: Read CH 5/6 - Print CH 5/6 Study Guide before class Tuesday
Week 6	May 6	(Tues)	<u>Exam 4</u> CH 5/6 Group Project presentation.
		(Thurs)	Topics: Uterine cycle, fibroids, hysterectomy CH 5/6 Exam review and Individual Project presentations DUE REMINDER: CH 9 Group – Email Study Guide before midnight Saturday Assignments: Read CH 9 - Print CH 9 Study Guide before class Tuesday
Week 7	May 13	(Tues)	<u>Exam 5</u> CH 9 Group Project presentation.
		(Thurs)	Topics: Ovarian cycle, puberty, menstrual synchrony. CH 9 Exam review and Individual Project presentations DUE REMINDER: CH 7/8 Group – Email Study Guide before midnight Saturday Assignments: Read CH 7/8 - Print CH 7/8 Study Guide before class Tuesday
Week 8	May 20	(Tues)	<u>Exam 6</u> CH 7/8 Group Project presentation.
		(Thurs)	Topics: Breast anatomy, physiology, lactation, breast milk CH 7/8 Exam review and Individual Project presentations DUE REMINDER: CH 12/13 Group - Email Study Guide before midnight Saturday Assignments: Read CH 12/13 - Print Study Guide before class Tuesday
Week 9	May 27	(Tues)	<u>Exam 7</u> CH 12/13 Group Project presentation
		(Thurs)	Topics: Menopause CH 12/13 Exam review and Individual Project presentations DUE REMINDER: CH 14 Group - Email Study Guide before midnight Saturday CH 17 Group - Email Study Guide before midnight Saturday Assignments: Read CH 14 - Print CH 14 Study Guide before class Tuesday Read CH 17 - Print CH 17 Study Guide before class Thursday
Week 10	Jun 3	(Tues)	<u>Exam 8</u> CH 14 Group/Individual Project presentations - CH 14 Exam review
		(Thurs)	Topics: Testosterone CH 17 Group/Individual Project presentations - CH 17 Exam review Topics: Biochemistry of love
Week 11	FINALS WEEK		<u>Exam 9</u> (Over CH 14 and CH 17) Thursday, June 12, 10:15am-12:05pm 6/13/2013 ALL LATE WORK TO BE HANDED IN OR EMAILED BY 12noon