SYLLABUS
Clinically Oriented Human Gross Anatomy (ANAT 6181)

COURSE DESCRIPTION:
ANAT 6181 is a new graduate course at a certificate level designed to provide a broad appreciation for the structural organization of the human body and to relate the organization to regional and systems-related functions. There will be a strong emphasis on clinical implications and how disease and/or injury affect normal anatomical structure/function relationships. The syllabus is supplemented with additional educational material and assignments, which are appropriate for students enrolled in the graduate certificate in Anatomical and Translational Sciences. Students will be assigned online weekly clinical cases matching the topic of the lecture, as detailed in the listed lectures. Discussion of these cases will be monitored via an online discussion board in blackboard. In addition, students will prepare three clinical presentations on topics relevant to a specific lecture for each bloc. Students will also be provided with an online lab manual utilizing content from the department’s NetAnatomy website. These sessions will constitute the foundation for three practical exams taken on blackboard for each third course. Finally, lecture material is supplemented with cadaveric demonstrations in the Gross Anatomy Laboratory of the Medical School.

LEARNING OBJECTIVES:
1) Describe the structure and function of the musculoskeletal system in relation to its importance in the limbs, thorax, abdomen, and pelvis.
2) Describe the regional organization, structure, and function of the major organ systems in the thorax (Respiratory and Cardiovascular Systems), abdomen (Digestive System), and pelvis & perineum (Urinary and Reproductive Systems).
3) Describe the structural organization of the head and neck and the distribution and function of the various cranial nerves.
4) Identify major anatomical structures in the human body using radiographs, ultrasound, CT, MRI images.
5) Illustrate clinical correlates associated with the major systems of the human body.

CREDIT HOURS: 3

PREREQUISITE: Introductory Biology for Science or non-Science Majors. Enrollment in the Graduate Certificate in Anatomical and Translational Sciences or permission of the Director of the Graduate Certificate.

LECTURE CONTACT TIME/HOURS: two 1-hour 15-minute lectures per week.

LABORATORY SESSIONS: Weekly lab (1-hour 20 minutes) in the Gross Anatomy Lab (Ross Hall 218).

METHOD OF ASSESSMENT: There will be four types of assessments, as follows:
3 Written Exams (multiple choice and short answer), each comprising 16.7% of the total grade

3 Practical Exams (short answer online via blackboard), each comprising 10% of the total grade

3 Clinical Presentations (written presented in the form of a PowerPoint and to be submitted via blackboard; due week prior to each exam block), each comprising 5% of total grade

Online weekly blackboard discussion groups, comprising 5% of total grade

FACULTY:
1) Kirsten Brown, Ph.D. (Course Director, Lecturer, and Lab Instructor)
Assistant Professor, Department of Anatomy & Regenerative Biology

2) Raymond J. Walsh, Ph.D. (Lecturer, and Lab Instructor)
Professor, Department of Anatomy & Regenerative Biology

3) Jeffrey Rosenstein, Ph.D. (Lecturer and Lab Instructor)
Professor, Department of Anatomy & Regenerative Biology

4) Frank Slaby, Ph.D. (Lecturer and Lab Instructor)
Professor, Department of Anatomy & Regenerative Biology

5) Rosalyon Jurjus, M.D., Ph.D. (Lab Instructor)
Assistant Professor, Department of Anatomy & Regenerative Biology

REQUIRED TEXTS: It is NOT necessary to have the most recent edition of the required textbooks or of the atlases. A used copy of any book would also suffice.

Texts
1) “Clinically Oriented Anatomy” (7th ed.) by Moore, Dalley, and Agur, published by Lippincott Williams & Wilkins
2) Netter’s Clinical Anatomy (2nd ed.) by Hansen, published by Saunders Elsevier

Anatomy Atlas: You need only one. Popular ones include:
1) “Atlas of Human Anatomy”- authored by Frank Netter (available both without and with a CD, the latter quite expensive and not necessary), published by Saunders Elsevier
2) “Grant’s Atlas of Anatomy” - authored by Agur & Dalley, published by Lippincott Williams & Wilkins
Internet Resource:  www.NetAnatomy.com

READING LIST: None

CLASS POLICIES
Attendance policy: mandatory
Late work: accepted with permission, penalty may be incurred if unduly late as determined by instructor
Religious Holidays: will be accommodated if requested

[NOTE: for university policies on teaching, see http://www.gwu.edu/~academic/Teaching/main.htm ]

ACADEMIC INTEGRITY
I personally support the GW Code of Academic Integrity. It states: “Academic dishonesty is defined as cheating of any kind, including misrepresenting one's own work, taking credit for the work of others without crediting them and without appropriate authorization, and the fabrication of information.” For the remainder of the code, see: http://www.gwu.edu/~ntegrity/code.html

SUPPORT FOR STUDENTS OUTSIDE THE CLASSROOM

DISABILITY SUPPORT SERVICES (DSS)
Any student who may need an accommodation based on the potential impact of a disability should contact the Disability Support Services office at 202-994-8250 in the Marvin Center, Suite 242, to establish eligibility and to coordinate reasonable accommodations. For additional information please refer to:  http://gwired.gwu.edu/dss/

UNIVERSITY COUNSELING CENTER (UCC) 202-994-5300
The University Counseling Center (UCC) offers 24/7 assistance and referral to address students' personal, social, career, and study skills problems. Services for students include:
- crisis and emergency mental health consultations
- confidential assessment, counseling services (individual and small group), and referrals

http://gwired.gwu.edu/counsel/CounselingServices/AcademicSupportServices

SECURITY
In the case of an emergency, if at all possible, the class should shelter in place. If the building that the class is in is affected, follow the evacuation procedures for the building. After evacuation, seek shelter at a predetermined rendezvous location.

LECTURE TOPICS:

1. Imaging Techniques; Lymphatic System; Anatomical Terms
2. Musculoskeletal System; Spine, Spinal Cord and Spinal Nerves; Lab #1: Tissue Types and Spinal Cord
3. Lower Limb I- Walking Gait and the Roles of Gluteal and Thigh Muscles (Clinical Correlation: Hip Injuries)
4. Lower Limb II- Knee Joint; Lab #2- Lower Limb (Clinical Correlation: Knee Injuries)
5. Lower Limb III- Bones & Major Joints of the Foot (Clinical Correlation: Ankle Injuries)
6. Lower Limb IV- The Roles of Leg Muscles in the Walking Gait; Lab #3- Lower Limb (Clinical Correlation: Fibular Nerve Injury)
7. Upper Limb I- Shoulder (Clinical Correlations: Shoulder Dislocations)
8. Upper Limb II- Axilla and Arm; Lab #4- Upper Limb (Clinical Correlation: Humeral Fractures)
9. Upper Limb III- Forearm (Clinical Correlation: Radial Nerve Injuries)
10. Upper Limb IV- Hand; Lab #5- Upper Limb (Clinical Correlation: Median and Ulnar Nerve Injuries)
   WRITTEN EXAM I
   PRACTICAL EXAM I
   CLINICAL POWERPOINT I DUE WEEK BEFORE EXAM I

11. Head & Neck I- Neck; Lab #6- Head & Neck (Clinical Correlation: Cranial Nerve Tests, Pulses)
12. Head & Neck II- Head & Eyes (Clinical Correlation: Cranial Nerve Tests, Bell’s Palsy)
13. Head & Neck III- Ears & Nose; Lab #7- Head & Neck (Clinical Correlation: Cranial Nerve Tests, Sinusitis)
14. Thorax I- Thoracic Wall & Diaphragm (Clinical Correlation: Rib Fractures)
15. Thorax II- Lungs & Pleurae; Lab #8- Thorax (Clinical Correlation: Pneumothorax)
16. Thorax III- Heart & Cardiac Cycle (Clinical Correlation: Myocardial Infarction)
17. Thorax IV- Mediastinum; Lab #9- Thorax (Clinical Correlation: Aortic Arch Aneurysm)
18. Head & Neck IV- Throat (Clinical Correlation: Cranial Nerve Tests, TMJ Disorder)
19. Head & Neck- Larynx; Lab #10- Head & Neck (Clinical Correlation: Thyrocricotomy)
   WRITTEN EXAM II
   PRACTICAL EXAM II
   CLINICAL POWERPOINT III DUE WEEK BEFORE EXAM II

20. Abdomen I- Abdominal Walls; Lab #11- Abdomen (Clinical Correlation: Inguinal Hernias)
21. Abdomen II- Peritoneum & Blood Supply to the Abdomen (Clinical Correlation: Portal Hypertension)
22. Pelvis and Perineum I- Pelvis and Pelvic Walls; Lab #12- Abdomen and Pelvis (Clinical Correlation: Pelvic Floor Disorders)
23. Pelvis and Perineum II- Pelvic Organs (Clinical Correlation: Ectopic Pregnancy, Prostate Cancer)
24. Pelvis and Perineum III- Neurovasculature; Lab #13- Abdomen and Pelvis (Clinical Correlation: Abdominal Aortic Aneurysm)
25. Abdomen III- Abdominal Organs I (Clinical Correlation: Peptic Ulcers)
26. Abdomen IV- Abdominal Organs II; Lab #14- Abdomen and Pelvis (Clinical Correlation: Cirrhosis)
   WRITTEN EXAM III
   PRACTICAL EXAM III
   CLINICAL POWERPOINT III DUE WEEK BEFORE EXAM III