GEORGE MASON UNIVERSITY
School of Recreation, Health and Tourism
Fall 2010
PHED 300 Kinesiology (Section 003)

DAY/TIME:	T-R 9:00 AM-10:15 AM	**LOCATION:**	ATEP Lab- OB 318
INSTRUCTOR:	Shruti Ambegaonkar	**EMAIL ADDRESS:**	sambegao@gmu.edu
OFFICE LOCATION:	OB 228 A	**PHONE NUMBER:**	TBA
OFFICE HOURS:	T/Th: 12 PM– 1 PM *Other times by appointment.*	**FAX NUMBER:**	703-993-2025
DEPT. WEBSITE:	rht.gmu.edu	**CLASS WEBSITE:**	courses.gmu.edu

PRE/CO-REQUISITES
Pre-requisite: BIOL 124
Co-requisite: BIOL 125

COURSE DESCRIPTION
Increase students knowledge and exposure to the structural and functional components of human anatomy including musculoskeletal origins, insertions, actions and innervations. On a live model, students will locate and identify anatomical landmarks, surface markings and soft tissue structures by palpation. Functional movements in various sport activities will be investigated to classify and identify musculature necessary to create the motions. Emphasis will be places on normal walking and running gait, posture, throwing, kicking and jumping.

COURSE OBJECTIVES
At the completion of this course students should be able to:
1. Identify terminology related to biomechanics.
2. Describe linear, angular, and other forms of motion used in sports.
3. Describe types of mechanical loads that act on the human body
4. Describe the effects of mechanical loads on bones.
5. Describe human skeletal articulations in relation to their movement capabilities.
6. Describe the relationship of the musculotendinous unit to muscle function.
7. Identify muscle function in producing upper and lower extremity movements.
8. Identify muscle function in producing movements of the spine.
9. Describe kinematic and kinetic variables of human movement.
10. Describe the stability of a body in relation to mechanical factors.
11. Identify anatomical landmarks, surface markings, and various soft tissue structures by palpating a live model.

REQUIRED READINGS
1) Floyd, R.T. (2008). Manual of Structural Kinesiology, 17th edition. McGraw Hill.
2) Biel, A. (2006). Trail Guide to the Body, 3rd Edition. Books of Discovery.

COURSE OVERVIEW

This course will be taught in the Athletic Training Clinical Simulation Laboratory and will include lecture and laboratory instruction.

Attendance

Students are expected to be on time, attend all class meetings and be prepared for in class assignments and projects. If you are late to class you will not be permitted to make up any activities or assessments missed. Excused absences include the following: illness (must bring a receipt or note from a doctor), family death, athletic/academic event, and others at the discretion of the instructor. For known upcoming absences, students must contact the instructor at least one week in advance to the missed class to make up work. In the case of illness or some other unforeseen absence, the student must contact the instructor via e-mail or telephone before the class meeting begins. At the next attended class meeting the student will discuss material that is to be completed. The student will have one week from the time of the next attended class to complete any make up work. It is the student's obligation to pursue any make-up work.

Class Participation

If you do not attend class, you cannot complete activities. Just being present in class does not mean you are an active and engaged participant in activities taking place that day. Be an active participant in all activities.

Note: You can only make up an in-class activity if you have pre-approved absence or proof of illness.

Dress

During the laboratory section of the course, students will be asked to wear appropriate clothing to expose various body parts for the purposes of practicing the application of various palpation skills. Tank tops and sports bras/bathing suit tops will be required when topics focus on the upper body. Shorts will be required will be required when topics focus on the lower body.

EVALUATION

Examinations

A total of 6 examinations will be administered. The format of these examinations may be multiple choice, true/false, short answer, matching, fill in the blank, and/or essay type questions. Examinations will come in two forms (15 quizzes, 3 in class written examinations, 3 laboratory palpation examinations). You are to bring a Scantron sheet to each written examination and quiz. If you do not have a Scantron sheet you will not be permitted to take the assessment.

-**Quizzes:** Each of the quizzes will test material covered in the previous class or in the assigned reading for the upcoming class. Refer to the course calendar for exact dates and reading that will be required for the quizzes.

-**Written Examinations:** Written examinations may cover material in the required textbooks, class notes, and activities completed during class sessions.

-**Palpation Examinations:** Palpation examinations may cover all structural anatomy instructed during class and from the required reading. The final palpation examination will be cumulative and cover all course material.

Evaluation type	Number	Points each	Total points
Class participation	25	2	50
Quizzes	15	10	150
Written exams	3	50	150
Palpation exams	3	50	150
		TOTAL POINTS	**500**

Grading Scale

The student's final letter grade will be earned based on the following scale:

A: 465 – 500 pts. (93%)
A-: 450 – 464 pts. (90%)
B+: 435 – 449 pts. (87%)
B: 415 – 434 pts. (83%)
B-: 400 – 414 pts. (80%)
C+: 385 – 399 pts. (77%)
C: 365 – 384 pts. (73%)
C-: 350 – 364 pts. (70%)
D: 315 – 349 pts. (63%)
F: < 315

- All students are held to the standards of the George Mason University Honor Code [See http://www.gmu.edu/catalog/apolicies/#Anchor12]
- University policy states that all sound emitting devices shall be turned off during class unless otherwise authorized by the professor
- Students with disabilities who seek accommodations in a course must be registered with the Disability Resource Center (DRC) and inform the instructor , in writing, at the beginning of the semester [See www.gmu.edu/student/drc]
- For additional School of Recreation, Health, and Tourism information, please visit the website at http://rht.gmu.edu

PHED 300 TENTATIVE COURSE SCHEDULE *Faculty reserves the right to alter the schedule.*

CLASS	DATE	DAY	TENTATIVE TOPIC	READING ASSIGNMENT	QUIZ
1	8/31	T	Introduction to course and the Study of Kinesiology (Review)		
2	9/2	R	Anatomical direction terminology, Body regions, Planes, Axes	**F:**pg1-8; **TG:**pg 30-31	
3	9/7	T	Skeletal system, Bone type/features/markings	**F:**pg 9-14; **TG:** pg 40 -42	Y
4	9/9	R	Joint types/Joint movement/motion/terminology	**F:**pg 15-26; **TG:**pg 32-39	
5	9/14	T	Joint types/Joint movement/motion/terminology		
6	9/16	R	Muscle names, contractions, roles	**F:**pg 35-47 **TG:**pg 43-45	Y
7	9/21	T	Neuromuscular system, dermatome/myotome	**F:**pg 47-60 **TG:**pg 50	Y
8	9/23	R	Basic Biomechanics: Levers/Wheels/Axles/Friction/balance/loading/ Laws of motion	**F:**pg 69-84	Y
9	9/28	***T***	***Test Review***		Y
10	9/30	***R***	***WRITTEN EXAMINATION #1***		
11	10/5	T	Shoulder girdle	**LECTURE-F:**pg 87-102	
12	10/7	R	Intro to palpations	**LAB- TG:**pg 54-108	Y
	10/11	**T**	**COLUMBUS DAY RECESS – NO CLASS ON 10/12**		
13	10/14	R	Shoulder joint	**LECTURE-F:**pg 109-133	
14	10/19	T	Shoulder joint: Palpation Lab	**TG:**pg 12-27	Y
15	10/21	R	Elbow: Radioulnar joint	**LECTURE-F:**pg 141-160	
16	10/26	T	Wrist and Hand	**LECTURE-F:**pg 167-199	Y
17	10/28	R	Elbow, Wrist and Hand: Palpation Lab	**LAB- TG:**pg 116-125, 135-153, 166-168 **LAB- TG:**pg 116-119, 124, 126-139, 154-172	Y

18	11/2	T	***Test Review***		Y
19	11/4	R	***WRITTEN EXAM#2 & PALPATION EXAM #1***		
20/21	11/9 11/11	T R	Trunk & Spinal Column: Lecture Trunk & Spinal Column: Palpation Lab	LECTURE-F:pg 327-354 LAB- TG:pg 173-271	Y
22/23	11/16 11/18	T R	Pelvis and Hip Joint: Lecture Pelvis and Hip Joint: Palpation Lab	LECTURE-F:pg 227-264 LAB- TG:pg 274-298, 309-312, 318-319, 322-336	Y
24	11/23	T	Knee: Lecture	LECTURE-F:pg 271-285 LAB- TG:pg 299-308, 313-316, 318-321, 338-347, 360-361, 382-387	Y
	11/24-11/28		THANKSGIVING RECESS		
25/26	11/30 12/2	T R	Lower Leg, Ankle and foot: Lecture Knee, Leg, Ankle & Foot: Palpation Lab	LECTURE-F:pg 291-321 LAB- TG:pg 333-341, 348-359 ,362, 370-381, 388-394	Y
27	12/7	T	**Test Review**		Y
28	12/9	R	***WRITTEN EXAM#3 & PALPATION EXAM #2***		
29	12/16	R at 7:30 AM	***COMPREHENSIVE PALPATION EXAM #3***		

12/14-12/21 – EXAM WEEK