Health Sciences--Exercise Physiology (HSEP)

HSEP 6080. Exercise Electrocardiography. 3 Hours.
An introduction of the 12-lead electrocardiogram as it relates to graded exercise testing, training, and functional evaluation. The course is designed particularly to assist the clinical exercise physiologist in developing the skills required for quickly identifying electrocardiographic patterns at rest and during exercise.

HSEP 6160. Exercise Psychology. 3 Hours.
Prerequisites: Admission into the graduate program or permission of the instructor. This course will review the relation of physical activity and physical fitness to stress and mental health, and explanatory models of exercise patterns.

HSEP 7120. Environmental and Occupational Physiology. 3 Hours.
Prerequisites: Admission into the graduate program or permission of the instructor. The analysis of human performance and functional capacity in various environmental and occupational settings. Topics will include, but are not limited to, tissue disorders, human physical capabilities and limitations, pre-employment testing, work-site analysis and the prevention of illness and injury.

HSEP 7170. Advanced Exercise Testing & Prescription for Special Populations. 3 Hours.
Prerequisite: Admission into the graduate program or permission of the instructor. The student will examine the recommended exercise testing and prescription methodology for the apparently healthy, athletic and those with various diseases and disabilities. Emphasis is placed upon the physiological responses and adaptations of individuals based on gender, ethnicity, and age to cardiovascular and resistance training. Research surrounding the role of exercise in women's health will be reviewed. Special emphasis will be placed upon the endocrine, immune, cardiopulmonary, reproductive, neurological and musculoskeletal system.

HSEP 7990. Directed Study in Exercise Physiology. 1-3 Hours.
Prerequisites: Admitted to the masters' degree program in Exercise Physiology and consent of instructor. Specialized study in Exercise Physiology under the direction of a Health Science graduate faculty member.