**M.S. Exercise Science - Sports Sciences**  
**Department of Nutrition, Food and Exercise Sciences**  
**The Florida State University**  
**College of Human Sciences**

**Purpose:** To train graduate students with an interest in strength and conditioning, human/athletic performance and athletic training/sports medicine.

**Format:** Thesis or non-thesis option. Combination of didactic instruction, laboratory experiences and supervised practica.

**MS Thesis Research Option:** Projects oriented toward some aspect of strength and conditioning, human/athletic performance or athletic training/sports medicine are available for those interested in the thesis option.

**Practica Option:** Hands-on experience working under experienced strength and conditioning professionals.

**Certification:** Curriculum exceeds the recommended competencies as a Certified Strength and Conditioning Specialist as per the National Strength and Conditioning Association.

**Credit Hours:** 35 to 44+ credit hours over five semesters. Year 1: fall, spring, summer. Year 2: fall, spring.

**Admission Requirements:**  
(1) A Bachelor’s Degree in a related area and earned GPA of 3.0.  
(2) Three letters of recommendation.  
(3) Background and supporting courses in nutrition, chemistry, physiology, research/statistics, anatomy, and exercise physiology, or will treat these deficiencies, rectifying them prior to studying related advanced courses.  
(4) GRE scores of 150 on the Quantitative Reasoning section and 150 on the Verbal Reasoning section for a competitive application.  
(5) An interview is requested prior to admission.

**Courses Include:**  
- Strength Program Development for Competitive Athletes and Sport  
- Cardiovascular Program Development for Competitive Athletes and Sport  
- Sports Fitness Testing and Evaluation for Competitive Athletes and Sport  
- Professional Practices for the Sports Scientist  
- Sports Sciences Practicum  
- Advanced Exercise Physiology  
- Nutrition and Exercise Performance  
- Research Design and Methods  
- Statistics  
- Seminar  
- Elective(s)

**For more information:**  
*Christina Beck*  
Assistant Graduate Coordinator  
Dept. of Nutrition, Food and Exercise Sciences  
436 Sandels Building  
Florida State University  
Tallahassee, FL 32306  
Email: cbeck2@fsu.edu

*Mark J. Kasper, EdD,* Teaching Faculty  
Director, Sports Sciences Graduate Major  
416 Sandels Building  
Email: mkasper@fsu.edu

*Phone: (850) 644-4800 Fax: (850) 645-5000*  
*http://www.chs.fsu.edu/nfes_grad*
Sports Sciences Major of the Master’s of Science Degree in Exercise Science
Required Sports Sciences Courses (non-thesis option)

PET 5389. Strength Program Development for Competitive Athletes and Sport (3 hrs)
The scientific basis and development of sports related fitness. Emphasis on muscle strength, endurance, speed, power, agility, and flexibility in competitive athletes. Various styles of programming and the methods used to elicit specific adaptations will be emphasized. This course meets specific guidelines and competencies for strength and conditioning professionals.

PET 5653. Cardiovascular Program Development for Competitive Athletes and Sport (3 hrs)
A concentrated study of the assessment, evaluation and design of cardiovascular program development for the competitive athlete including those with selected medical conditions or concerns. This course meets specific guidelines and competencies for strength and conditioning professionals.

PET 5751. Sports Fitness Testing and Evaluation for Competitive Athletes and Sport (3 hrs)
Development of knowledge, skills, and abilities in selecting, administering, and evaluating sports related fitness tests for competitive athletes. This course meets specific guidelines and competencies for strength and conditioning professionals.

Seminar (1 hr x 3 terms = 3 hrs)
Statistics (3-4 hrs)
Research Methods (3-4 hrs)

PET 5412. Professional Practices for the Sports Scientist (3 hrs)
Fundamentals of sports sciences organizational, administrative, and management practices. Topics include facility organization, risk management, professional ethics, budgeting, staffing, personal advancement, and career development. This course meets specific guidelines and competencies for strength and conditioning professionals.

PET 5945. Sports Sciences Practicum (3 hrs). Taken 4 terms
Supervised practical experiences in a sports science setting. Emphasis on developing skills and abilities of a strength and conditioning specialist through practical application of knowledge from previous or current course work while learning new related principles or concepts. May be repeated to a maximum of fifteen (15) semester hours.

APK 5111c. Advanced Exercise Physiology (3 hrs)
Physiological effects of acute and chronic physical exercise.

PET 5367. Nutrition and Exercise Performance (3 hrs)
Immediate and long term effects of nutrition on exercise performance. Effects of acute and chronic exercise on nutrient requirements.
THE FLORIDA STATE UNIVERSITY
COLLEGE OF HUMAN SCIENCES
DEPARTMENT OF NUTRITION, FOOD AND EXERCISE SCIENCES
M.S. DEGREE IN EXERCISE SCIENCE WITH SPECIALIZATION IN SPORTS SCIENCES
(SPORTSCIMS and SPORTSCIMT)

The master's degree in sports sciences includes both thesis and non-thesis options. It is expected that the student will either show evidence of having had experiences in anatomy, physiology, chemistry, nutrition, and exercise physiology or will treat these as deficiencies, rectifying them prior to studying related advanced courses. Students are required to earn three (3) hours prior to graduation by attendance in at least one summer term in the Department or the College of Human Sciences.

<table>
<thead>
<tr>
<th>CORE</th>
<th>CREDIT HOURS</th>
</tr>
</thead>
<tbody>
<tr>
<td>HUN 5802 Research Design and Methodology (F)</td>
<td>2</td>
</tr>
<tr>
<td>HUN 5802L Research Design and Methodology Laboratory (F)</td>
<td>1</td>
</tr>
<tr>
<td>Or</td>
<td></td>
</tr>
<tr>
<td>CHD 5915 Research Methods (Sp)</td>
<td>4</td>
</tr>
<tr>
<td>HUN/FOS/PET 6930 Seminar (taken as S/U)</td>
<td>1</td>
</tr>
<tr>
<td>PET 5930 Seminar</td>
<td>1</td>
</tr>
<tr>
<td>PET 5930 Seminar</td>
<td>1</td>
</tr>
<tr>
<td>APK 5111c Advanced Exercise Physiology (F)</td>
<td>3</td>
</tr>
<tr>
<td>PET 5367 Nutrition and Exercise Performance (F)</td>
<td>3</td>
</tr>
<tr>
<td>PET 5389 Strength Program Development (F)</td>
<td>3</td>
</tr>
<tr>
<td>PET 5751 Sports Testing (Sp)</td>
<td>3</td>
</tr>
<tr>
<td>PET 5412 Professional Practices (Su)</td>
<td>3</td>
</tr>
<tr>
<td>PET 5653 CV Program Development (Su)</td>
<td>3</td>
</tr>
</tbody>
</table>

ONE OF THE FOLLOWING STATISTIC COURSES:

- EDF 5400 Basic Descriptive Statistics
- STA 5126 Introduction to Applied Statistics
- FAD 5700 Applied Research in CHS (F)

APPROVED ELECTIVES - AT LEAST ONE COURSE:

- PET 5077 Physical Dimensions of Aging (Sp)
- PET 6317 Skeletal Muscle Structure and Function (F)
- PET 6365 Exercise and the Cardiorespiratory System (Sp)
- PET 6368 Metabolic Aspects of Exercise (F)
- PET 6386 Environmental Aspects of Exercise (Sp)
- PET 6387 Endocrinology (Sp)
- PET 6931 Exercise and Disease (F)
- PET 6931 Special Topics
- PET 5216 Sport Psychology (Sp)
- PET 5553 Cardiorespiratory Evaluation (Sp)
- HUN 5906 Directed Individual Study

*THESIS OPTION:

- HUN 5906 Directed Individual Study
- HUN 5971 Thesis
- HUN 8976 Thesis Defense

*NON-THESIS OPTION:

- PET 5945 Sports Sciences Practicum (F, Sp, F, Sp; 4 x 3 hrs each)
- HUN 8966r Comprehensive Examination

* Thesis option requires 35 total credit hours.
+ Non-Thesis option requires 41 total credit hours.

<table>
<thead>
<tr>
<th>Fall 1&lt;sup&gt;st&lt;/sup&gt; Year (10 hrs)</th>
<th>Spring 1&lt;sup&gt;st&lt;/sup&gt; Year (10-11 hrs)</th>
<th>Summer (6 hrs)</th>
</tr>
</thead>
<tbody>
<tr>
<td>PET 5389. Strength Program Development (3 hrs)</td>
<td>PET 5751. Sports Testing (3 hrs)</td>
<td>PET 5412. Professional Practices (3 hrs)</td>
</tr>
<tr>
<td>APK 5111c. Advanced Exercise Physiology (3 hrs)</td>
<td>Approved Elective (3 or 4 hrs)</td>
<td>PET 5653. CV Develop (3 hrs)</td>
</tr>
<tr>
<td>PET 5945. SS Practicum I (3 hrs)</td>
<td>PET 5945. SS Practicum II (3 hrs)</td>
<td></td>
</tr>
<tr>
<td>PET 6930. Seminar (1 hr. S/U)</td>
<td>PET 5930. Seminar (1 hr)</td>
<td></td>
</tr>
<tr>
<td>Fall 2&lt;sup&gt;nd&lt;/sup&gt; Year (11 hrs)</td>
<td>Spring 2&lt;sup&gt;nd&lt;/sup&gt; Yr (7 hrs)</td>
<td></td>
</tr>
<tr>
<td>FAD 5700. Applied Research (Stats) (4 hrs)</td>
<td>CHD 5915. Research Methods (4 hrs)</td>
<td></td>
</tr>
<tr>
<td>PET 5367. Nutrition &amp; Exercise Performance (3 hrs)</td>
<td>PET 5945. SS Practicum IV (3 hrs)</td>
<td></td>
</tr>
<tr>
<td>PET 5945. SS Practicum III (3 hrs)</td>
<td>HUN 8966. MS Comp Exam (0 hrs. P/F)</td>
<td></td>
</tr>
<tr>
<td>PET 5930. Seminar (1 hr)</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>