## **ATR - ATHLETIC TRAINING**

### ATR 6000 Seminar in Athletic Training (1 Unit)

This course is designed to introduce the athletic training student to the athletic training program and the resources available during their 1st and 2nd year experience. During this course students will be exposed to the resources in the PLNU library as well as professional development tools (Myers Briggs/Strengths Quest.) Selected topics pertinent to the field of athletic training and applicable to all levels of the athletic training major are presented. Course includes student presentations, guest speakers, faculty speakers, and topics that are not covered in other courses in the curriculum.

# ATR 6005 Research Methods and Statistical Techniques for Clinical Decision Making in Medicine (3 Units)

This course will explore the variety in research design and statistics commonly used in clinical research, further developing student analytical skills needed to support professional evidence-based practice in healthcare. Students will evaluate the merit and relevance of published research to the practice of medicine from the perspective of experimental methodology and design. This course also provides an overview of statistics including descriptive and inferential statistics and one-way ANOVA. Students should have a basic understanding of conducting library and Internet information searches prior to taking this course. Students will select a topic of interest in the field, conduct a review of the literature, define a research question, and prepare and present a report to their peers. Students will complete Collaborative Institutional Training Initiative (CITI training).

### ATR 6007 Research Project Seminar (1 Unit)

In this course, students begin their research projects and make a formal written presentation. This proposal should contain project idea or problem statement, review of literature, and a description of how the project will be conducted. This is a directed study under the supervision of faculty.

### ATR 6008 Research Seminar II (1 Unit)

This is the second in the sequence of two research seminar courses. Students will collect data, perform data analysis, and write the results, and discussion sections for their athletic training research projects. Students will revise and refine their final capstone project, develop a presentation, and present their findings. This is directed study under the supervision of a faculty research mentor.

### ATR 6010 Therapeutic Interventions (3 Units)

The purpose of this course is to provide a foundation of therapeutic exercise principles and techniques. The scope is inclusive of approaches applicable to common sports medicine problems. Emphasis will be on clinical decision making to design, implement, and assess a comprehensive rehabilitation plan. Students will be exposed to contemporary and traditional rehabilitation approaches for a variety of conditions. Competency in design, implementation, and assessment of plans of care, while exposing students to a wide variety of therapeutic exercises will be stressed in an integrated laboratory experience.

Corequisite(s): ATR 6010L

### ATR 6010L Therapeutic Interventions Laboratory (1 Unit)

This lab provides laboratory time for the practice of exercise techniques and treatment. Students will develop problem-solving skills required in the modification of treatments while treating athletic injury using a case study based approach.

Pre or Corequisite(s): ATR 6010

### ATR 6011 Advanced Functional Movement Interventions (3 Units)

This course and integrated laboratory provides an in-depth study of the musculoskeletal and mechanical aspects of anatomical structures as related to human movement and function. This course will apply physics concepts, tissue responses and adaptations, and human movement concepts in preparation for rehabilitation techniques (such as joint mobilizations), exercise prescription, and for evaluation and recognition of injury. Joint mobilizations will be taught, along with the theory behind and rationale for joint mobilization. Movement of individual joints, kinetic chain and whole body motion will be analyzed. Clinical evaluation of movement (sport and general), posture, and gait will be introduced. Students will be able to evaluate and treat a variety of disorders through the analysis and application of musculoskeletal mechanics, applied neurology, articular function, biomechanical principles within movement, and material/biomechanical properties of biological tissues.

### ATR 6015 Therapeutic Agents (2 Units)

This course is designed to introduce students to the contemporary usage and basic foundation of therapeutic modalities, transmission of energy, infrared, and mechanical therapy. Through lecture, discussion, and laboratory experience, an evidence based approach of musculoskeletal rehabilitation involving therapeutic modalities will be examined.

#### ATR 6015L Therapeutic Agents Laboratory (1 Unit)

This course is designed to allow students to apply and integrate their didactic knowledge during a laboratory setting. Students will learn to apply all of the therapeutic agents learned in class to patients in clinical settings.

### ATR 6020 Pharmacology for Allied Health Care Professionals (2 Units)

In-depth study of the pathophysiology and pharmacologic treatment of major illnesses, injuries, and diseases observed in clinical settings. This course is designed for professional phase Athletic Training students.

### ATR 6050 Psychology of Sport, Injury and Rehabilitation (2 Units)

This course addresses a variety of integrated psychosocial topics involving the patient, the health care professional, and response to injury. Topics include motivation, self confidence, personality traits, emotional response to injury, interpersonal and cross-cultural communication. This course is designed for professional phase Athletic Training students.

### ATR 6065 Leadership and Management in Athletic Training (3 Units)

This course focuses on management, administration, leadership, and professional responsibilities associated with providing health care in an athletic training room, health care facility, and related venues that provide health care to athletes and others involved in physical activities. Topics include athletic training room design, budget, organization, and administration of pre-participation physical exams, components of a medical record, regulations, insurance, personnel management.

# ATR 6085 General Medical Conditions and Medical Terminology (3 Units)

This course addresses general medical disorders and conditions pertaining to sports medicine and inquiries into the latest research of related issues. Topics include etiology, pathology, assessment, and risks associated with common diseases, impairments, and physical disabilities within the athletic population.

# ATR 6087 Evidence-Based Orthopedic Assessment of the Lower Extremity (3 Units)

This course addresses evaluation techniques and care for musculoskeletal injuries to the lower extremities for graduate-level athletic training students. The student must integrate knowledge of anatomical structures, physiology principles, and evaluative techniques to provide a basis for evidence based critical decision-making in an injury management environment.

# ATR 6087L Evidence-Based Orthopedic Assessment of the Lower Extremity Laboratory (1 Unit)

This course is designed to provide students with a comprehensive hands on approach to injury evaluation and assessment of lower extremity pathologies. During this lab students will learn and begin to develop a systematic approach to injury evaluation. Students will learn special testing and injury evaluation techniques.

Pre or Corequisite(s): ATR 6087

## ATR 6088 Evidence-Based Orthopedic Assessment of the Spine and Upper Extremities (3 Units)

This course addresses evaluation techniques and care for musculoskeletal injuries to the upper extremities and spine for graduate-level athletic training students. The student must integrate knowledge of anatomical structures, physiology principles, and evaluative techniques to provide a basis for decision-making using the current evidence in an injury management environment.

Concurrent: ATR 6088L

## ATR 6088L Evidence-Based Orthopedic Assessment of the Spine and Upper Extremities Laboratory (1 Unit)

This course is designed to provide students with a comprehensive hands on approach to injury evaluation and assessment of upper extremity and spinal pathologies. During this lab students will learn and begin to develop a systematic approach to injury evaluation. Students will learn special testing and injury evaluation techniques.

Corequisite(s): ATR 6088

### ATR 6090 Clinical Internship I (3 Units)

This course is the first of five required athletic training clinical education courses. Athletic training students will be evaluated on clinical integration proficiency of knowledge, skills, and abilities including: general health and fitness assessment; environmental conditions assessment; recognition of emergencies and acute injury care; and professional communication and documentation strategies. Additionally, students will be expected to build upon their acquired knowledge to actively engage in facilitated integration of skills and abilities covered in the curriculum. Students will be assigned to clinical education experiences under the direct supervision of a preceptor. Students will explore evidence-based practice and reflect upon their clinical experiences to facilitate critical thinking and clinical decision making skills development. Students must complete a minimum of 200 and a maximum of 500 clinical hours.

### ATR 6091 Clinical Internship II (3 Units)

This course is the second of five required athletic training clinical education courses. Athletic training students will be evaluated on clinical integration proficiency of knowledge, skills, and abilities including: taping, wrapping, bracing, protective equipment fitting; clinical assessment, diagnosis and therapeutic intervention of the lower extremity and spine; and professional communication and documentation strategies. Additionally, students will be expected to build upon their acquired knowledge to actively engage in facilitated integration of skills and abilities covered in the curriculum. Students will be assigned to clinical education experiences under the direct supervision of a preceptor. Students will explore evidence-based practice and reflect upon their clinical experiences to facilitate critical thinking and clinical decision making skills development.

Prerequisite(s): ATR 6090

#### ATR 6092 Clinical Preceptorship (3 Units)

This course is the third of five clinical education courses. During this course and clinical rotation students will be expected to build upon their knowledge of general medical conditions as well as be exposed to the different allied health professions (Surgery, Orthopedics, General Medicine and Physical Therapy). Students will be assigned to clinical education experiences under the direct supervision of a preceptor. Students will explore evidence-based practice and reflect upon their clinical experiences to facilitate critical thinking and clinical decision making skills.

Pre or Corequisite(s): ATR 6091

#### ATR 6093 Clinical Practicum I (3 Units)

This course is the fourth of five required athletic training clinical education courses. Athletic training students will be evaluated on clinical integration proficiency of knowledge, skills, and abilities including: clinical assessment, diagnosis and therapeutic intervention of the upper extremity, head, neck, thorax and patients with common illnesses; psychosocial motivational strategies; recognition and referral of mental health disorders; and professional communication and documentation strategies. Additionally, students will be expected to build upon their acquired knowledge to actively engage in facilitated integration of skills and abilities covered in the curriculum. Students will be assigned to clinical education experiences under the direct supervision of a preceptor. Students will explore evidence-based practice and reflect upon their clinical experiences to facilitate critical thinking and clinical decision making skills development.

Pre or Corequisite(s): ATR 6092

### ATR 6094 Clinical Practicum II (3 Units)

This course is the fifth of five athletic training clinical experience courses. Athletic training students will be evaluated on clinical integration proficiencies taught the previous semester including: comprehensive therapeutic intervention, clinical examination, and diagnosis of musculoskeletal injury; common illnesses and conditions; psychosocial strategies and referral; professional communication and documentation strategies. Additionally, students will be expected to build upon their acquired knowledge and practice those skills and techniques previously covered in the curriculum. Students will be assigned to clinical education experiences under the direct supervision of a preceptor. Students will explore evidence-based practice and reflect upon their clinical experiences to facilitate critical thinking and clinical decision making skills development. Students must complete 200 clinical hours.

Pre or Corequisite(s): ATR 6093

### ATR 6099 Athletic Training Capstone (2 Units)

This course will focus on athletic training practice acts and registration, professional responsibility, continuing education, governing bodies, scope of practice, community awareness, and preparation for the Board of Certification (BOC) exam. Topics include resume and cover letter building, interviewing techniques, transitioning from being a student to becoming a professional, networking and effective strategies for taking the BOC exam.