



CONCURRENT ENROLLMENT



UVU Course Number: PES 2400

High School Course Number: 6180

UVU Course Name: Introduction to Athletic Training

High School Course Title:

Sports Medicine/Exercise Science

Instructor Name: Mr. Ross

Room: I 12

Phone: 801-221-9720 ext. 3539 Training room or 3540 class room

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COURSE DESCRIPTION

This is a Concurrent Enrollment course, offering both high school credit through Timpview High School and college credit through Utah Valley University. The purpose of this course is to introduce general concepts of Athletic Training and facilitate recognition, treatment, prevention and rehabilitation of trauma associated with athletic participation.

COURSE PREREQUISITES & CO REQUISITES

Health, 6000; Junior, Senior, or Permission of Instructor

TEXTBOOKS AND INSTRUCTIONAL MATERIALS

Textbook: *Principles of Athletic Training – Arnheim/Prentice*

COURSE OBJECTIVES & LEARNING OUTCOMES

This course will be directed in a manner consistent with the idea of a “team concept” working together to ensure an optimal environment for sports participants. While this class does not have Athletic Training students, it does have those who will be directly working many members of the athletic “team.” Concepts and ideas will be presented in a way that will educate and inform future coaches.

Objectives of Class:

1. Explain the risk factors associated with physical activity.
 2. Identify and explain the risk factors associated with common congenital and acquired abnormalities, disabilities, and diseases.
 3. Identify and explain the recommended or required components of a pre-participation examination based on appropriate authorities’ rules, guidelines, and/or recommendations.
 4. Describe the basic concepts and practice of wellness screening.
 5. Describe the general principles of health maintenance and personal hygiene, including skin care, dental hygiene, sanitation, immunizations, avoidance of infectious and contagious diseases, diet, rest, exercise, and weight control.
 6. Explain the principles of effective heat loss and heat illness prevention programs. Principles include, but are not limited to, knowledge of the body’s thermoregulatory mechanisms, acclimation and conditioning, fluid and electrolyte replacement requirements, proper practice and competition attire, and weight loss.
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7. Explain the accepted guidelines, recommendations, and policy and position statements of applicable governing agencies related to activity during extreme weather conditions.
 8. Interpret data obtained from a wet bulb globe temperature (WBGT) or other similar device that measures heat and humidity to determine the scheduling, type, and duration of activity.
 9. Explain the components and purpose of periodization within a physical conditioning program
 10. Identify and explain the various types of flexibility, strength training, and cardiovascular conditioning programs. This should include the expected effects (the body's anatomical and physiological adaptation), safety precautions, hazards, and contraindications of each.
 11. Explain the basic principles associated with the use of protective equipment, including standards for the design, construction, fit, maintenance and reconditioning of protective equipment; and rules and regulations established by the associations that govern the use of protective equipment; and material composition.
 12. Explain the principles and concepts related to prophylactic taping, wrapping, bracing, and protective pad fabrication
 13. Explain the principles and concepts related to the fabrication, modification, and appropriate application or use of orthotics and other dynamic and static splints. This includes, but is not limited to, evaluating or identifying the need, selecting the appropriate manufacturing material, manufacturing the orthotic or splint, and fitting the orthotic or splint.
 14. Explain the basic principles and concepts of home, school, and workplace ergonomics and their relationship to the prevention of illness and injury.
 15. Recognize the clinical signs and symptoms of environmental stress.
 16. Obtain, interpret, and make decisions regarding environmental data. This includes, but is not limited to the ability to:
 17. Formulate and implement a comprehensive, proactive emergency action plan specific to lightening safety
 18. Explain normal and abnormal circulation and the physiology of fluid homeostasis.
 19. Identify the normal acute and chronic physiological and pathological responses (e.g., inflammation, immune response, and healing process) of the human body to trauma, hypoxia, microbiologic agents, genetic derangements, nutritional deficiencies, chemicals, drugs, and aging affecting the musculoskeletal and other organ systems, and musculoskeletal system adaptations to disuse.
 20. Describe the etiology, pathogenesis, pathomechanics, signs, symptoms, and epidemiology of common orthopedic injuries, illnesses and diseases to the body's systems.
 21. Describe the body's responses to physical exercise during common diseases, illnesses, and the injury.
 22. Explain directional terms and cardinal planes used to describe the body and the relationship of its parts.
 23. Describe the principles and concepts of body movement including functional classification of joints, arthrokinematics, normal ranges of joint motion, joint action terminology, and muscle groups responsible for joint actions (prime movers, synergists), skeletal muscle contraction, and kinesthesia / proprioception.
 24. Describe common techniques and procedures for evaluating common injuries including taking a history, inspection/observation, palpation, functional testing, special evaluation techniques, and
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neurological and circulatory tests.

25. Explain the relationship of injury assessment to the systematic observation of the person as a whole.
 26. Describe the nature of diagnostic tests of the neurological function of cranial nerves, spinal nerves, and peripheral nerves using myotomes, dermatomes, and reflexes.
 27. Explain the roles of special tests in injury assessment.
 28. Describe strength assessment using resistive range of motion, break tests, and manual muscle testing.
 29. Describe the clinical signs and symptoms of environmental stress.
 30. Describe the components of medical documentation (e.g. SOAP, HIPS and HOPS).
 31. Describe and know when to refer common eye pathologies from trauma and/or localized infection (e.g., conjunctivitis, hyphema, corneal injury, sty, sclera trauma).
 32. Describe and know when refer common ear pathologies from trauma and/or localized infection (e.g., otitis, ruptured tympanic membrane, impacted cerumen).
 33. Describe and know when to refer common pathologies of the mouth, sinus, oropharynx, and nasopharynx from trauma and/or localized infection (e.g., gingivitis, sinusitis, laryngitis, tonsillitis, pharyngitis).
 34. Explain the possible causes of sudden death syndrome.
 35. Describe and know when to refer common injuries or conditions of the teeth (e.g., fractures, dislocations, caries).
 36. Explain the importance and proper procedures for measuring body temperature (e.g., oral, axillary, rectal).
 37. Explain the legal, moral, and ethical parameters that define the scope of first aid and emergency care and identify the proper roles and responsibilities of the certified athletic trainer.
 38. Describe the principles and rationale of the initial assessment including the determination of whether the accident scene is safe, what may have happened, and the assessment of airway, breathing, circulation, level of consciousness and other life-threatening conditions.
 39. Differentiate the components of a secondary assessment to determine the type and severity of the injury or illness sustained.
 40. Describe pathological signs of acute/traumatic injury and illness including, but not limited to, skin temperature, skin color, skin moisture, pupil reaction, and neurovascular function.
 41. Describe the proper management of external hemorrhage, including the location of pressure points, use of universal precautions, and proper disposal of biohazardous materials.
 42. Identify the signs and symptoms associated with internal hemorrhaging.
 43. Describe the appropriate use of aseptic or sterile techniques, approved sanitation methods, and universal precautions for the cleansing and dressing of wounds.
 44. Describe the injuries and illnesses that require medical referral.
 45. Explain the application principles of rest, cold application, elevation, and compression in the treatment of acute injuries.
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46. Describe the signs, symptoms, and pathology of acute inflammation.
 47. Identify the signs and symptoms of head trauma, including loss of consciousness, changes in standardized neurological function, cranial nerve assessment, and other symptoms that indicate underlying trauma.
 48. Explain the importance of monitoring a patient following a head injury, including obtaining clearance from a physician before further patient participation.
 49. Define cerebral concussion, list the signs and symptoms of concussions, identify the methods for determining the neurocognitive status of a patient who sustains a concussion and describe contemporary concepts for the management and return-to-participation of a patient who sustains a concussion.
 50. Identify the signs and symptoms of trauma to the cervical, thoracic and lumbar spines, the spinal cord, and spinal nerve roots, including neurological signs, referred symptoms, and other symptoms that indicate underlying trauma and pathology.
 51. Describe cervical stabilization devices that are appropriate to the circumstances of an injury.
 52. Describe the indications, guidelines, proper techniques and necessary supplies for removing equipment and clothing in order to evaluate and/or stabilize the involved area.
 53. Identify the appropriate short-distance transportation method, including immobilization, for an injured patient.
 54. Identify the signs, symptoms, possible causes, and proper management of the following:
 55. Different types of shock
 56. Allergic, thermal, and chemical reactions of the skin (including infestations and insect bites)
 57. Identify the signs, symptoms, and treatment of patients suffering from adverse reactions to environmental conditions.
 58. Identify information obtained during the examination to determine when to refer an injury or illness for further or immediate medical attention.
 59. Survey the scene to determine whether the area is safe and determine what may have happened.
 60. Describe the physiological and pathological processes of trauma, wound healing and tissue repair and their implications on the selection and application of therapeutic modalities used in a treatment and/or rehabilitation program.
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Preventing Sexual Harassment

Title IX of the Education Amendments of 1972 prohibits sex discrimination against any participant in an educational program or activity that receives federal funds. The act is intended to eliminate sex discrimination in education. Title IX covers discrimination in programs, admissions, activities, and student-to-student sexual harassment. UVU's policy against sexual harassment extends not only to employees of the university but to students as well. If you encounter unlawful sexual harassment or gender based discrimination, please talk to your professor or University representative.

Assessment:

GRADES	NOTICE:
You will receive the same grade for your high school course as you receive for your college course	Your grade for this class will become part of your permanent college transcript and will affect your GPA. A low grade in

See Disclosure document for grade scale

this course can affect college acceptance and scholarship eligibility.

DROPPING THE CLASS

_____ is the last day to drop the course without it showing on your transcript.

_____ is the last day to withdraw from the class.

If you drop the high school class, you must also withdraw from the UVU class to avoid receiving an E or UW (unofficial withdrawal).

ACADEMIC STANDARDS

Each student is expected to maintain academic ethics and honesty in all its forms, including but not limited to cheating and plagiarism.

ATTENTION STUDENTS WITH DISABILITIES: If you have any disability, which may impair your ability to successfully, complete this course, please contact the Accessibility Services office, 863-8747, BU 146. Academic accommodations are granted for all students who have qualified documented disabilities. All services are coordinated with the Accessibility Services office.

CLASS DISCLOSURE

School procedures will be followed. Refer to your student handbook and pay close attention to the following:

-Attendance; Absences; Truancies; Discipline

-Attendance Points: Each academic term, upon the **7th attendance point** (parent excused, truant, and/or unexcused) students may automatically lose credit in the class where those absences have accumulated. Students who have not met the attendance requirement, but have earned a passing grade will receive NG [No Grade] if those absences are not made up. This is congruent with district policy. Refer to your hand book for the point system.

CLASSROOM POLICY

1. Come to class prepared: something to write with, paper, and class text every day.
2. When the teacher is addressing the class it is expected that full attention will be given (also, if a student is officially addressing the class).
3. If you have comments, raise your hand-so I can keep up.
4. No food, drinks, or headphones allowed in the classroom.
5. The most important rule is common respect-student to student, teacher to student, student to teacher. There needs to be an atmosphere conducive to learning, in other words, quiet and orderly.

GRADING

Grading will be based on a weighted point system from assignments, tests, quizzes, skills and class participation. 43 percent of your grade will come from tests, 25 percent from homework and special projects, 27 percent from skills, and 5 percent from training hours.

A= 94 to 100% of points, A-= 90 to 93%, B+= 87 to 89%, B= 83 to 86%, B-= 80 to 82%, C+= 77 to 79%, C= 73 to 76%, C-= 70 to 72%, and F= 69% of points and below.

TESTS

A test will come from almost every unit based on notes, reading, films, and guest speakers. Testing will come from what is covered in class as well as from homework. The state exam will be worth a significant portion of your forth term grade. I will also raise any term grade one full grade if you pass the state exam with an 80% or higher and earn a State Skill Certificate.

ASSIGNMENTS

Assignments will come from chapter questions, work sheets, and special projects that will be done in groups and privately.

QUIZZES

There will be a quiz on each unit covering a body joint. Pop quizzes will be given if students are not paying attention or are not participating in class activities, including doing vocabulary words.

NOTEBOOK

You will need to obtain a large 3-ring binder in which to keep notes, homework, handouts, anatomy packets, etc. This will be of major help in preparing for the final and State exam. I will collect and check the binders a minimum of once each term and will give substantial point value for these in the homework category.

MAKE UP WORK

Assignments are to be turned in when due and tests taken on specified days. The only exception to this is with an excused absence, and this has to be arranged by you, the student, and taken care of within a few days of returning to class.

Any late work will be given half credit as long as it is not more than three weeks old. If a student's grade falls below a C, they need to attend Academic Assistance to make up missing work or redo work in efforts to bring their grade up.

TRAINING HOURS

Five percent of your grade will come from assisting in the training room, at games or at practices. On the average, one half hour a week will be required (5 hours total). Your attitude while doing it is also important. You will be responsible for recording these hours and having them signed by the supervisor at the event you attend. BYU student trainers and I can sign for these hours. Travel time is not part of your hours, only direct event contact time counts.

VOCABULARY WORDS

Vocabulary words will be on the board almost every day. At the beginning of class they are to be written down and a definition looked up and written for each word. Periodically they will be checked. The day of each test the words will be collected. Each word is worth one point and they are recorded as a homework score. If a student does all the words, has not been absent or tardy, and has taken class notes, they get ten points extra credit added to their test score for that unit.

EXTRA CREDIT

Extra credit can be earned through class participation as we review material from the previous day. Points can also be lost in this area through disruptive behavior.

SHIRT

A Timpview sports medicine-shirt will be available. If possible, it is suggested that the shirt be worn at contests in which you are assisting. Your general appearance should be professional, be clean and modest, no shabby jeans and such.

LAB

There will be a random taping test each term from all the tape jobs we have learned. So you will need to need to take time in lab to review and practice old tape jobs.

We will spend a lot of time in the Training Room for lab. Points on the lab assignment and or participation points can be reduced for; disrespect to the lab or others, not participating, not practicing and making good use of the time.

VIDEOS

During the year, several educational videos will be shown. In particular, I plan to use the educationally enhanced version of "Super Size Me". It is a documentary based on the harmful effects of fast foods.

TOPICS TO BE COVERED

Introduction to Exercise Science (Professions), Medical Terminology, Anatomy/Physiology overview, Nutrition, Conditioning Concepts/Fitness Assessment, Diseases and Injury Prevention, Sports First Aid, Injury Evaluation, Injury/Healing Process, Modalities, Rehabilitation, Sports Psychology.

TRAVEL

In obtaining practicum hours many students choose to travel with Timpview athletic teams to away games. It is required that they travel in school-provided transportation.

CONSENT FOR EMERGENCY CARE AND DISCLOSURE SIGNATURE SLIP

Please return the attached form signed by parent and student.