

# Minnesota State University Moorhead

## AT 220: Care and Prevention of Injuries & Illnesses

### A. COURSE DESCRIPTION

Credits: 3

Lecture Hours/Week: 3

Lab Hours/Week: 0

OJT Hours/Week: \*.\*

Prerequisites: None

Corequisites: AT 220L

MnTC Goals: None

This course will provide the student with the basic principles of prevention, recognition, immediate care, and treatment of common injuries and illnesses associated with physical activity. The student will also learn basic taping and wrapping techniques.

**B. COURSE EFFECTIVE DATES:** 08/23/2010 - Present

### C. OUTLINE OF MAJOR CONTENT AREAS

1. Role of the Athletic Trainer and Coach.
2. Record Keeping.
3. Physical Exams.
4. Wellness Screening.
5. Legal Concerns.
6. Conditioning.
7. Pathology of Injury.
8. Tissue Response to Injury .
9. Injury Evaluation and Assessment.
10. Modalities.
11. Rehabilitation.
12. Foot, Ankle, Low Leg.
13. Ankle Taping.
14. Knee.
15. Thigh, Hip, Groin, Pelvis.
16. Shoulder.
17. Elbow.
18. Thumb Taping.
19. Face.
20. Head.
21. Abdomen and Thorax.
22. Youth Injuries.
23. Environmental Concerns.
24. General Medical.

## **D. LEARNING OUTCOMES (General)**

1. Explain the risk factors associated with physical activity.
2. Appraise the risk factors associated with common congenital and acquired abnormalities, disabilities, and diseases.
3. Identify and explain the epidemiology data related to the risk of injury and illness related to participation in physical activity.
4. Identify and explain the recommended or required components of a pre-participation examination based on appropriate authorities' rules, guidelines, and/or recommendations.
5. Describe the basic concepts and practice of wellness screening.
6. Describe the body's anatomical and physiological adaptation to cardiovascular and muscular conditioning programs.
7. Identify the components of a physical conditioning program (pre-season, in-season, post-season, and off-season).
8. List the safety precautions, hazards, and contraindications of various stretching, strengthening, or flexibility routines and/or equipment.
9. 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.
10. Recognize the clinical signs and symptoms of environmental stress.
11. Explain the accepted guidelines, recommendations, and policy and position statements of applicable governing agencies related to activity during extreme weather conditions.
12. 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.
13. Interpret standard nomenclature of athletic injuries and illnesses.
14. Explain medical terminology and abbreviations necessary to communicate with physicians and other health professionals.
15. Describe the components of medical documentation (e.g. SOAP, HIPS/HOPS).
16. Explain the application principles of cold application, elevation, and compression in treatment of acute non-limb-threatening pathologies.
17. Recognize signs and symptoms of head trauma, including loss of consciousness, changes in standardized neurological, cranial nerve assessment, and other symptoms that include underlying trauma.
18. Predict the physiological process of wound healing and tissue repair and its implications (limitations, contraindications) on the development and progression of an appropriate rehabilitation or reconditioning program.
19. Identify the consequences of improper fluid replacement.
20. Describe the signs, symptoms, and physical consequences of disordered eating.
21. Describe home care and self-treatment plans of acute injuries and illnesses.
22. Select, fabricate, and apply appropriate preventive taping and wrapping procedures, splints, braces, and other special protective devices. Procedures and devices should be consistent with sound anatomical and biomechanical principles.

## **E. Minnesota Transfer Curriculum Goal Area(s) and Competencies**

None

## **F. LEARNER OUTCOMES ASSESSMENT**

As noted on course syllabus

**G. SPECIAL INFORMATION**

None noted