

Fundamentals of Sports Medicine

Sports Medicine · Practice Test · 25 Questions

1. Which type of tissue connects a muscle to a bone?

- A) Ligament
- B) Tendon
- C) Cartilage
- D) Nerve

2. What is the primary function of the R.I.C.E. method in sports medicine?

- A) To increase blood flow
- B) To build muscle mass
- C) To manage soft tissue injuries
- D) To improve cardiovascular endurance

3. Which mineral is most essential for maintaining healthy bone density in athletes?

- A) Calcium
- B) Iron
- C) Sodium
- D) Potassium

4. What is the medical term for the displacement of a bone from its normal position in a joint?

- A) Sprain
- B) Strain
- C) Fracture
- D) Dislocation

5. Which energy system is primarily used for short, explosive bursts of activity, like a 50-meter sprint?

- A) Aerobic system
- B) Anaerobic system
- C) Digestive system
- D) Respiratory system

6. What does the 'I' in the R.I.C.E. treatment protocol stand for?

- A) Immobilize
- B) Inflammation
- C) Ice
- D) Injury

7. A strain refers to an injury involving which structures?

- A) Bones and cartilage
- B) Muscles and tendons
- C) Ligaments and joints
- D) Nerves and blood vessels

8. Which of these is a common symptom of heat exhaustion?

- A) High blood pressure
- B) Excessive sweating
- C) Increased hunger
- D) Increased bone density

9. What is the role of a ligament in the human body?

- A) Connects bone to bone
- B) Produces red blood cells
- C) Contracts to create movement
- D) Stores energy for muscles

10. Which of these nutrients is the body's primary source of fuel for high-intensity exercise?

- A) Protein
- B) Carbohydrates
- C) Fats
- D) Fiber

11. What is the main purpose of a warm-up before athletic activity?

- A) To decrease heart rate
- B) To increase muscle temperature and elasticity
- C) To replace lost electrolytes
- D) To eliminate the need for hydration

12. Which organ is responsible for filtering blood and maintaining electrolyte balance?

- A) Liver
- B) Kidney
- C) Heart
- D) Lungs

13. What is a 'concussion' classified as in medical terms?

- A) A bone fracture
- B) A mild traumatic brain injury
- C) A skin abrasion
- D) A muscle tear

14. Which type of exercise focuses on lengthening the muscle to improve range of motion?

- A) Resistance training
- B) Flexibility training
- C) Aerobic exercise
- D) Anaerobic exercise

15. What is the primary function of red blood cells during physical activity?

- A) To fight infections
- B) To transport oxygen to tissues
- C) To clot blood at injury sites
- D) To regulate body temperature

16. Which of these is the most effective way to prevent dehydration during sports?

- A) Drinking only when thirsty
- B) Drinking water before, during, and after exercise
- C) Drinking sports drinks instead of water
- D) Avoiding all liquids for two hours before the game

17. What term describes the amount of blood pumped by the heart in one minute?

- A) Cardiac output
- B) Blood pressure
- C) Pulse rate
- D) Respiratory rate

18. Which component of fitness is measured by the sit-and-reach test?

- A) Muscular strength
- B) Cardiovascular endurance
- C) Flexibility
- D) Body composition

19. What is the main cause of exercise-induced muscle cramps?

- A) Too much protein
- B) Electrolyte imbalance and dehydration
- C) Lack of sleep
- D) Low vitamin C intake

20. Which body system is responsible for controlling and coordinating muscle movement?

- A) Skeletal system
- B) Nervous system
- C) Endocrine system
- D) Respiratory system

21. What is the term for the maximum amount of oxygen the body can utilize during exercise?

- A) Vital capacity
- B) VO₂ max
- C) Anaerobic threshold
- D) Basal metabolic rate

22. Which type of joint allows for rotation, such as the neck?

- A) Hinge joint
- B) Pivot joint
- C) Ball and socket joint
- D) Gliding joint

23. What is the primary role of a 'spotter' in weight training?

- A) To count repetitions
- B) To assist with the weight if the lifter fails
- C) To track progress in a logbook
- D) To time the rest periods

24. Which of these is a chronic injury often caused by overuse?

- A) Fracture
- B) Sprain
- C) Tendinitis
- D) Dislocation

25. What is the function of the 'patella' in the human body?

- A) To protect the knee joint
- B) To stabilize the ankle
- C) To connect the femur to the hip
- D) To provide structure to the spine