

Chapter 10 and 11 Study Guide

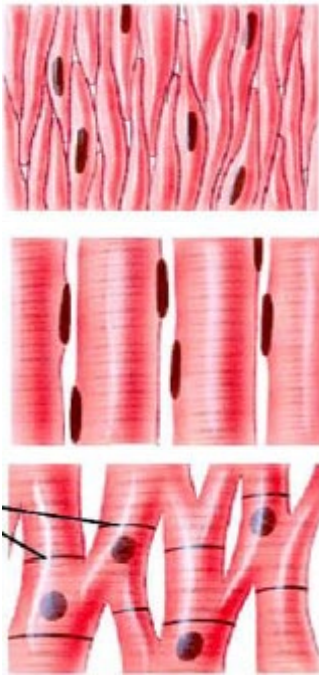
Muscular System

1. Which types of muscle are involuntary?
2. Which filament is thin?
3. Which connective tissue sheath surrounds the individual skeletal muscle cell?
4. What are three functions of the muscular system?
5. What is the contractile unit between to z lines called?
6. What is the protein that composes the thick filaments?
7. Place the following in the correct order from largest to smallest: myofilament, fiber, fascicle, myofibril.
8. What is the plasma membrane of a muscle cell called?
9. What is the cytoplasm of a muscle cell called?
10. What is the neurotransmitter that stimulates muscle contractions?
11. What is the function of creatine phosphate in muscle cells?
12. What is the difference between isotonic and isometric muscle contractions?
13. What is a muscle that assists or works with a prime mover?
14. What is a muscle that does the opposite of a prime mover?
15. What is the antagonist of the biceps brachii?
16. Define abduction and adduction.
17. What are three characteristics used in the naming of muscles?
18. What is the metabolic pathway that produces large amounts of ATP by using oxygen and glucose?
19. What are the three types of muscle?
20. Where is each of the three types of muscle found?
21. When thin and thick filaments slide over each other what is happening to the muscle?
22. What are myofibrils?
23. What connects skeletal muscles to bones?
24. What is the function of smooth muscle?
25. What is the function of cardiac muscle?
26. What is the function of skeletal muscle?
27. What is the function of muscle tissue?
28. What connective tissue sheath surrounds a bundle of muscle fibers?
29. What is a bundle of muscle fibers called?
30. What connective tissue sheath surrounds the entire muscle?
31. What is a concentric contraction?
32. What is an eccentric contraction?
33. What is an origin?
34. What is an action? Give examples
35. Describe an insertion.
36. What are the golden rules of muscle contraction?

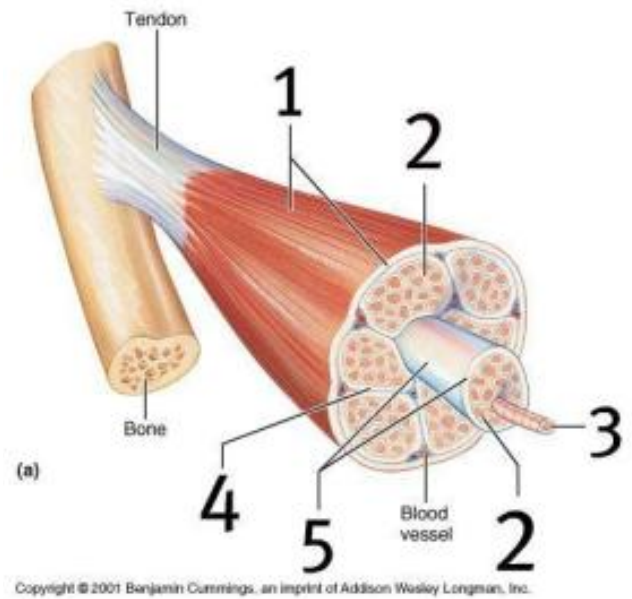
37. What is a prime mover called?

38. What muscle type stabilizes a joint during contraction?

39.



41. label the muscle diagram



40. Label the sarcomere below:

