

1. Which of the following is a function of the basement membrane?

- a. contractility
- b. excitability
- c. modification of secreted protein
- d. active ion transport
- e. filtering of nutritionist to the epithelial cells**

2. The epithelium that typically lines the urinary system is:

- a. simple columnar epithelium
- b. stratified squamous epithelium
- c. transitional epithelium**
- d. pseudostratified ciliated epithelium
- e. simple squamous epithelium

3. Each of the following statements about epithelial tissue are true EXCEPT

- a. squamous epithelia cells are flat and plate-like
- b. a pseudostratified epithelium has all its cells in contact with the underlying extracellular matrix
- c. a simple columnar cell is typically 2-3 times higher than its width**
- d. transitional epithelium is a characteristic cell lining
- e. epithelial cells are scattered among loose connective tissue

4. Keratinized stratified squamous epithelium is found in the

- a. lining of the mouth
- b. lining of the urinary bladder
- c. lining of the small intestine
- d. pancreas
- e. skin**

5. Which typ of the muscle has a single nucleus per cell

- a. cardiac muscle
- b. skeletal muscle
- c. smooth muscle**
- d. both cardiac and smooth muscle
- e. both cardiac and skeletal muscle

6. Which of the following contains actin and myosin filaments

- a. cardiac muscle
- b. skeletal muscle
- c. smooth muscle
- d. both cardiac and smooth muscle
- e. all three types of muscles**

7. The sarcoplasmic reticulum of skeletal muscle functions in

- a. cellular calcium storage**
- b. cellular glycogen storage
- c. glycogen degradation
- d. transport of calcium into nucleus

e. release of ATP

8. Which tissue possesses all of the following characteristics?

- cells cylindrical in shape
- striated
- usually one nucleus per cell
- often branched and connected by intercalated discs
- under involuntary control

a. bone

b. nervous tissue

c. cardiac muscle

d. skeletal muscle

e. smooth muscle

9. The following description applies to which blood cell type: exits the bloodstream and lives and functions in connective tissue spaces where it is recognized and termed a histiocyte or tissue macrophage?

a. eosinophil

b. neutrophil

c. lymphocyte

d. monocyte

e. basophil

10. Which of the following has 2 nuclear lobes and a large cytoplasmic granules containing major basic protein?

a. eosinophil

b. neutrophil

c. lymphocyte

d. monocyte

e. basophil

11. What number represents a normal hematocrit?

a. 25

b. 35

c. 45

d. 55

e. 65

12. Which of the following would have the largest amount of elastic fibers in its wall?

a. vena cava

b. pulmonary vein

c. aorta

d. renal artery

e. arteriole

23. which of these connective tissue types has protective

a. bone

b. cartilage

c. ligaments

- d. tendons
- e. both c and d

25. The surface of the medullary cavity of long bones is lined with connective tissue membrane called:

- a. periosteum**
- b. epiphyseal plates
- c. endosteum
- d. perichondrium
- e. lamellae

26. Which of these substances is present in the largest quantity in bone?

- a. collagen
- b. hydroxyapatite**
- c. proteoglycan aggregates
- d. lacune cartilage
- e. none of above

27. Are stem cells that have ability to become osteoblast or chondroblast

- a. osteocytes**
- b. osteoclast
- c. osteoprogenitory cells
- d. osteon
- e. chondrocytes

28. Which of these structures is found within an osteon?

- a. concentric lamella**
- b. interstitial lamella
- c. circumferential lamella
- d. periosteum
- e. all of these

29. The cells that form myelin in the PNS are: *BUT in CNS the answer should be oligodendrocytes (d)*

- a. neurolemmocytes
- b. schwann cells**
- c. astrocytes
- d. oligodendrocytes
- e. microglia

30. Which of the following is NOT a component of a neuron or an organelle within a neuron?

- a. dendrite
- b. lysosomes
- c. neurolemmocyte**
- d. axon
- e. astrocytes

31. The two major types of cells composing neural tissue are:

- a. astrocytes and microglia
- b. neurons and neuroglia**
- c. somas and axons
- d. satellite cells and schwann cells
- e. neurolemmocytes and neuroglia

32. Neurotransmitters are released at the

- a. cell body
- b. dendrites
- c. axon terminal**
- d. myeline sheath
- e. ranviers nodes