



1) One of the following is INCORRECT about the bone ? Select one:

- a. The organic components are mainly formed by collagen type I
- b. The inorganic components are responsible for its rigidity
- c. Medullary bone mainly formed by trabeculae
- d. The periosteum covers the outer surfaces of bone trabeculae
- e. Compact bone and spongy bone have the same chemical composition

Answer: d

2) One of the following is INCORRECT concerning the Chondroblasts? Select one:

- a. They change to form chondrogenic cells
- b. They differentiated from the perichondrium
- c. They are not surrounded by lacunae
- d. They have basophilic cytoplasm
- e. They provide collagen and proteins

Answer : a

3) Which of the following is NOT true regarding the osteon in compact bone? Select one:

- a. The primary cell type within the mineralized bone of the osteon is the osteoclast
- b. It is composed of concentric lamellae of mineralized material
- c. Blood vessels reach the osteons from the bone marrow through the Volkmann's Canals
- d. Lamellae in between osteons are called interstitial lamellae.
- e. The central component is the Haversian Canal which contains blood vessels and nerves

Answer: c

4) One of the following is INCORRECT regarding the periosteum and endosteum? Select one:

- a. The endosteum vascular fibrous sheath covering the exterior of flat and long bone
- b. The periosteum has Sharpeys fibres
- c. The cellular layer of the periosteum contains osteoprogenitor cells
- d. The articulating surfaces are not covered by the periosteum
- e. The endosteum contains single layer of squamous osteoprogenitor cells

Answer: a

6) One of the following is CORRECTLY matched? Select one:

- a. Osteoblast — — — long cellular processes
- b. Osteoclast — — -secrete acid phosphatase
- c. Osteocyte ----- inert cells
- d. Osteoblast ----- secrete collagenase
- e. Osteoclast ----- secrete alkaline phosphatase

Answer: c

8) Sharpey's fibers located in the periphery of the bone , are ?

- a. Collagen fibers from ligaments that attach to bone
- b. Elastic fibers that are found in the tendons
- c. Fibers that make up the structure of endosteum
- d. Elastic fibers that make up the structure of periosteum
- e. Collagen fibers within Canaliculi

10) The cells that maintain mature compact bone are ?

- a. Osteoclasts
- b. Osteogenic cells
- c. Chondrocytes
- d. Osteoblast
- c. Osteocyte

Answer: c

11) Of the cells associated with bone , the one primarily responsible for the initial secretion and calcification of bone matrix is ?

- a. Osteoprogenitor cell
- b. Osteoblast
- c. Osteoclast
- d. Osteocyte
- e. Osteogenic cell

Answer: b

12) Which one is incorrect about the osteoblast ?

- a. They secrete collagenase
- b. They secrete osteoid
- c. They secrete alkaline phosphate
- d. They are basophilic
- e. They have one nucleus

Answer: a

13) The incorrect matched?

Elastin cartilage – increases with age

