

Anatomy C - Anatomy - December 19 SO Practice - 12-19-2020

1. (1.00 pts) Integumentary System

Which bundles' pattern in the skin establish lines of cleavage?

- A) Nerve
- B) Keratin
- C) Tendon
- D) Collagen
- E) Venule

2. (1.00 pts) What is the Merkel cell's function?

- A) Produces pigments
- B) Secretes inhibitory cytokines
- C) Acts as antigen-presenting cells
- D) Serves as a touch receptor
- E) None of the above

3. (1.00 pts) What are Cathelicidins?

- A) Proteins that regulate the dryness of skin
- B) Proteins that can prevent Strep. A infection in wounded skin
- C) Pigments which, in excess, cause freckles
- D) Lipids that diffuse from the bloodstream into the hypodermis
- E) None of the above

4. (1.00 pts) Which of the following statements about the dermis is correct?

- A) The dermis does not recoil easily.
- B) The dermis is thinner than the epidermis.
- C) The dermis is composed of dense irregular connective tissue containing collagen and elastic fibers
- D) There are no hair follicles embedded in the dermal layer.
- E) None of the above

5. (1.00 pts) Which of the following statements about the reticular layer is correct?

- A) The reticular region is above the papillary layer.
- B) There are no fibroblasts in this region.
- C) The reticular region contains thick collagen fibers.

- D) There are no macrophages in this region.
- E) None of the above

6. (1.00 pts) Which of the following statements about the function of the skin is correct?

- A) The skin is not a blood reservoir
- B) The skin can absorb vitamins A, D, E and K
- C) About 1 L of water evaporates from the skin daily.
- D) The oily sebum keeps the hairs of the skin dry.
- E) None of the above

7. (1.00 pts) Which amino acid synthesizes melanin

- A) Serine
- B) Methionine
- C) Tyrosine
- D) Glycine
- E) None of the above

8. (1.00 pts) What cells in the skin are the least numerous of the epidermal cells?

- A) Melanocytes
- B) Langerhans cells
- C) Keratinocytes
- D) Merckel cells
- E) None of the above

9. (1.00 pts) Which layer of the skin should be cut in order for it to bleed?

- A) Papillary dermis
- B) Stratum germinativum
- C) Stratum lucidum
- D) Stratum Spinosum
- E) None of the above

10. (1.00 pts) Which number for the vertebrae is correct?

- A) 5 cervical
- B) 7 lumbar
- C) 4 sacrum
- D) 12 thoracic
- E) None of the above

11. (1.00 pts) Which of the following is most often caused by osteoporosis

- A) Lateral curvature of spine Brittle bones
- B) Bone infection
- C) Lateral curvature of spine
- D) Inflammation of bone marrow
- E) None of the above

12. (1.00 pts) The order of hair growth is ____, ____, and ____.

13. (1.00 pts) Thin skin has a number of ____ layers.

14. (1.00 pts) The two layers of the dermis are called the ____ layer and the ____ layer.

15. (1.00 pts) Thickening of the outer layer of the skin due to prolonged friction is called ____.

16. (1.00 pts) What layer of epidermis composes the nail mostly, which contains hard keratin ____.

17. (1.00 pts) The three major parts in the structure of hair are the A. _____, B. _____, and C. _____.

18. (1.00 pts) A man that has burned his head and both upper limbs has burnt ____% of the body. (Rule of nines)

19. (1.00 pts) **Skeletal System**

Which suture separates the parietal bones from the occipital bone?

- A) Coronal suture
- B) Lambdoid suture

- C) sagittal suture
- D) Squamous suture
- E) None of the above

20. (1.00 pts) Which bone supports your weight when sitting down?

- A) Pubis
- B) Ilium
- C) Coccyx
- D) Ischium

21. (1.00 pts) Where do the walls between cartilage lacunae break down?

- A) Calcification
- B) Bone deposition
- C) Cell proliferation
- D) Reserve Cartilage

22. (1.00 pts) What kind of bones are the hyoid and vertebrae?

- A) Short bones
- B) Irregular bones
- C) Flat bones
- D) Long bones

23. (1.00 pts) The most abundant type of bone in the body is:

- A) Short bone
- B) Flat bone
- C) Long bone
- D) Sesamoid bone

24. (1.00 pts) Which of the following is a function of flat bones?

- A) Provide stability
- B) Act as an attachment point for muscles
- C) Provide leverage
- D) Allow motion

25. (1.00 pts) What part of a long bone is the region between the diaphysis and epiphysis?

- A) Articular cartilage

- B) Periosteum
- C) Medullary cavity
- D) Endosteum
- E)

26. (1.00 pts) What cells are unspecialized bone stem cells derived from mesenchyme.

- A) Osteoclasts
- B) Osteocytes
- C) Osteoblasts
- D) Osteoprogenitor cells
- E) None of the above

27. (1.00 pts) Which of the following statements about spongy bone tissue is correct?

- A) Spongy bone consists of lamellae that are arranged in a regular pattern of thick columns called trabeculae.
- B) Spongy bone tissue contains osteons.
- C) There are macroscopic spaces in spongy bone tissue that consists of yellow bone marrow.
- D) Spongy bone tissue makes up most of the interior bone tissue of short, flat, sesamoid, and irregularly shaped bones.
- E) None of the above

28. (1.00 pts) What vitamin is needed for the synthesis of collagen?

(Mark **ALL** correct answers)

- A) A
- B) C
- C) D
- D) E
- E) None of the above

29. (1.00 pts) The patellar ligament attaches to:

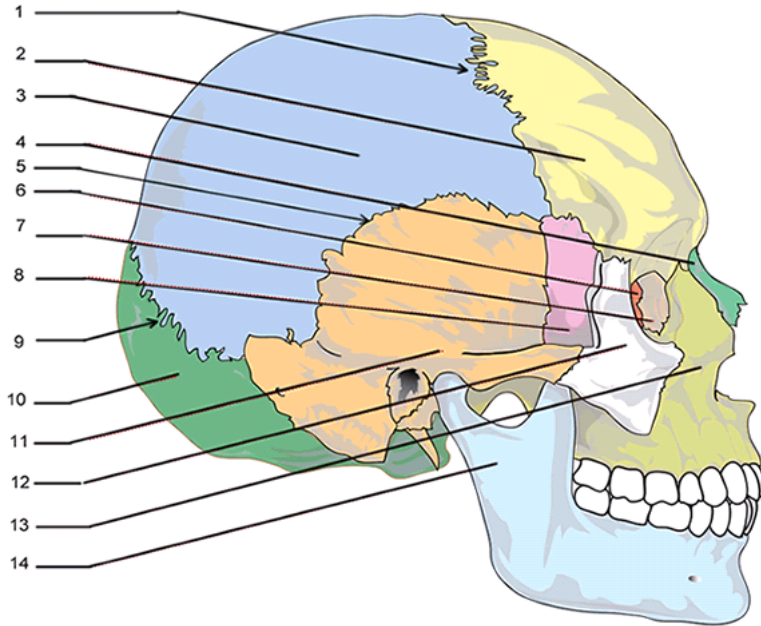
- A) Tibia
- B) Fibula
- C) Talus
- D) Femur

30. (1.00 pts) The secondary ossification center begins at:

- A) Diaphysis
- B) Epiphysis
- C) Metaphysis
- D) Epiphyseal line

31. (1.00 pts) Which kind of bone cell starts calcification?

- A) Osteoclasts
- B) Osteocytes
- C) Osteoblasts
- D) Osteoprogenitors



For questions 24-36, label the parts of the skull above.

32. (1.00 pts) (1)

33. (1.00 pts) (2)

34. (1.00 pts) (3)

35. (1.00 pts) (4)

36. (1.00 pts) (5)

37. (1.00 pts) (6)

38. (1.00 pts) (7)

39. (1.00 pts) (8)

40. (1.00 pts) (9)

41. (1.00 pts) (10)

42. (1.00 pts) (11)

43. (1.00 pts) (12)

44. (1.00 pts) (13)

45. (1.00 pts) (14)

46. (1.00 pts) Muscular System

_____ binds to troponin to induce muscle relaxation.

47. (1.00 pts) The three main types of joints are _____, _____, and _____, joints.

48. (1.00 pts) The less movable end of a muscle that is usually located proximally is called the _____.

49. (1.00 pts) The more moveable end of a muscle that is usually located distally is called the _____.

50. (1.00 pts)

The serious bacterial disease that causes painful muscle spasms mostly in the neck and jaw muscles, affects the nervous system, and can eventually lead to death is called _____.

51. (1.00 pts) Cervical vertebrae are the biggest type of vertebrae

True False

52. (1.00 pts) A burn that involves the entire epidermis and some of the dermis is _____ degree

- A) first
 B) second
 C) third
 D) fourth

53. (1.00 pts) Which of the following is NOT a layer of the skin?

- A) Stratum Corneum
 B) Stratum Basale
 C) Stratum Spinosum
 D) Stratum Sinusoidal

54. (1.00 pts) Which of the following hormones is associated with Vitamin D?

- A) Apocrine
 B) Calcitriol

- C) Peptide
- D) Calcitrone

55. (1.00 pts) The last cervical vertebrae has a large, non-bifid spinous process.

- True
- False

56. (1.00 pts) The axial skeleton has 70 bones.

- True
- False

57. (1.00 pts) The lumbar vertebrae have the thinnest vertebral discs.

- True
- False

58. (1.00 pts) The thoracic vertebrae do not have articular facets for ribs.

- True
- False

59. (1.00 pts) Which of the following is true about smooth muscle?

- A) Its contraction is voluntary
- B) It is striated
- C) It can be found in the bladder
- D) The muscle fibers are arranged in a parallel fashion, forming thick ropes

60. (1.00 pts) Hypocalcemia(low calcium levels) can cause what?

- A) Muscle strain
- B) Muscle tension
- C) Muscle spasms
- D) Muscle cramps

61. (1.00 pts) At the start of excitation-contraction coupling:

- A) The muscle action potential propagates along the sarcolemma and down the transverse tubules.
- B) Ca^{2+} released from the sarcoplasmic reticulum binds to tropomyosin.
- C) Troponin blocks the binding of myosin heads to actin filaments.
- D) Relaxation occurs when Ca^{2+} is excreted from the muscle fiber

62. (1.00 pts) On which point is the gastrocnemius originated at?

- A) Femur

- B) Patella
- C) Fibula
- D) Tibia

For questions 37-43, match the letters to the corresponding muscles.

- A. Flexion
- B. Extension
- C. Abduction
- D. Adduction

63. (1.00 pts) __ Triceps brachii

64. (1.00 pts) __ Deltoid

65. (1.00 pts) __ Vastus lateralis

66. (1.00 pts) __ Sternocleidomastoid

67. (1.00 pts) __ Rectus abdominis

68. (1.00 pts) __ Gluteus maximus

69. (1.00 pts) __ Gluteus medius

70. (1.00 pts) 50% of muscle mass is lost by the age of 80.

- True
- False

71. (1.00 pts) A sarcomere consists of an array of thick and thin filaments between two Z discs.

True False

72. (1.00 pts) Muscle contraction generates about 50% of the body's heat.

True False

73. (1.00 pts) During movement of a muscle, the origin remains stationary and the insertion moves.

True False

74. (1.00 pts) Cardiac and smooth muscles are involuntary muscle tissues.

True False

75. (1.00 pts) Thick filaments are composed of actin while thin filaments are composed of myosin.

True False

You have finished the test. Bye!