ANATOMY EXAM QUESTIONS

1. Bones of cranium. Fonticuli.
2. Internal surface of the base of the cranium. Cranial fossae.
3. External surface of the base of the cranium.
4. Pterygopalatine fossa. Boundaries and connections.
5. Orbital cavity. Boundaries and connections.
6. Nasal cavity. Boundaries and connections.
7. Bones of the pectoral girdle and upper limb.
8. Bones of the pelvic girdle and lower limb. Pelvis, its sexual differences.
9. General structure of vertebra. Peculiarity of the vertebra from different parts of the vertebral column.
10. Vertebral column. Its structure and development of curvatures. Joints of vertebral bodies and arches. Movements of the vertebral column.
11. Classifications of the joints. Synovial joint, its general organization and main and auxiliary elements. Classification and movements of synovial joints.
12. Craniovertebral joints: atlanto-axial and atlanto-occipital. Muscles taking part in their movements, their innervation and blood supply.
13. Thorax. Structural feature of the ribs and sternum. Costovertebral and sternocostal joints.
14. Sterno-clavicular and acromio-clavicular joints. Movements. Muscles producing movements, their innervation and blood supply.
15. Temporomandibular joint. Ligaments. Movements. Muscles producing movements, their innervation and blood supply.
16. Radiocarpal (wrist) and intercarpal joints. Ligaments. Movements. Muscles producing movements, their innervation and blood supply.
17. Carpometacarpal joint of the thumb (pollex). Ligaments. Movements. Muscles producing movements, their innervation and blood supply.
18. Metacarpophalangeal joints and interphalangeal joints. Ligaments. Movements. Muscles producing movements, their innervation and blood supply.
19. Shoulder (glenohumeral) joint. Ligaments. Movements. Muscles producing

movements, their innervation and blood supply.

20. Elbow joint. Ligaments. Movements. Muscles producing movements, their innervation and blood supply.

21. Hip joint. Ligaments. Movements. Muscles producing movements, their innervation and blood supply.

22. Knee joint. Ligaments. Movements. Muscles producing movements, their innervation and blood supply.

23. Ankle (talocrural) joint. Ligaments. Movements. Muscles producing movements, their innervation and blood supply.

24. Intertarsal joints. Ligaments. Movements. Muscles producing movements, their innervation and blood supply,

25. Muscle as organ. Interaction with connective tissue. Classification of the muscles. Attachments of skeletal muscles: tendon, fascia, synovial sheaths and bursae, aponeuroses.

26. Craniofacial muscles and fasciae of the head. Innervation and blood supply of these muscles.

27. Masticatory muscles. Their innervation and blood supply.

28. Muscles and fasciae of the neck. Innervation and blood supply of these muscles. Triangles and spaces of the neck.

29. Muscles and fasciae of the pectoral girdle and upper limb. Innervation and blood supply.

30. Muscles and fasciae of the pelvic girdle and lower limb. Innervation and blood supply.

31. Anterolateral muscles of the abdomen. Innervation and blood supply. Inguinal canal. Sheath of the rectus abdominis.

32. Muscles of the back. Their innervation and blood supply. Fascia of the back.

33. Muscles of the thorax. Their innervation and blood supply. Diaphragm. Diaphragmatic apertures. Weak places.

34. Muscle of the pelvic diaphragm. Innervation and blood supply.

35. Muscles, attached to the occipital bone. Their innervation and blood supply.

36. Muscles, attached to the hip bone. Their innervation and blood supply.

37. Macromorphological organization of the spinal cord. Meninges. Fixation.

38. Segment of spinal cord. Nuclei of gray matter. Morphology of spinal (dorsal root) ganglion. Composition of spinal nerve. Reflex arch.

39. Somatic plexus: cervical, brachial. Their main branches.

40. Somatic plexus: lumbar and sacral. Their main branches.

41. Brain stem. Structural organization and functional role.

42. Reticular formation. Its localization, general organization and functional role.

43. Rhombencephalon, its parts, their external features and internal structure. Proper nuclei of the pons, relations. Cerebellum, its divisions and their functional role. Cerebellar afferent and efferent connections.

44. Rhomboid fossa. Surface projection of cranial nerve nuclei on the dorsal aspect of the brain stem.

45. Mesencephalon or midbrain. External features and relations. Internal structure.

46. Cranial nerves. Their exits from brain and cranium.

47. Diencephalon, its parts and functional role.

48. Telencephalon. Surface of the cerebrum. Brain cortex connecticus: associative, projective and commissural fibres.

49. Limbic lobe and olfactory pathways. Topography and functional role.

50. Basal nuclei. Topography and functional role.

51. Meninges of the brain and spinal cord. Spaces between meninges and their contents. Connections with ventricules of the brain.

52. Ventricular system. Choroid plexus, secretion and circulation of the cerbrospinal fluid.

53. Conduction tracts, their classification. Ascending spino-cerebellar tracts.

54. Ascending spinothalamic tracts.

55. Ascending bulbothalamic tracts.

56. Descending piramidal tracts. (Cortico-nuclear and cortico-spinal).

57. Descending extrapiramidal tracts.

58. Arterial blood supply of the spinal cord and brain. Velizii circle.

59. Venous drainage of the spinal cord and brain.

60. Autonomic nervous system: general organization and functional role. Autonomic reflex arch.

61. Sympathetic nervous system. Efferent pathways. Pre- and paravertebral plexuses. Pre- and postganglionic fibers. Reflex arch.

62. Parasympathetic nervous system. Efferent pathways. General organization, reflex arch.

63. General organization of enteric nervous system. Plexuses, reflex arch.

64. Visual apparatus. Sclera. Cornea. Corneal reflex.

65. Visual apparatus. Choroid. Ciliary body. Chambers of the eye. Iris. Macroscopic structure and functional role. Pupillary light reflex.

66. Visual apparatus. Retina. Macrostructure of the retina. Visual pathway.

67. Ocular refractive media. Aqueous humour balance. Structure of the vitreous body, lens. Accommodation reflex.

68. Accessory visual apparatus. Fixation. Extraocular muscles, their actions, innervation and blood supply. Lacrimal gland, its innervation and blood supply.

69. External ear. Structure and functional role. Arterial blood supply and venous drainage of the auditory and vestibular apparatus.

70. Tympanic cavity. Boundaries, connections and contents. Innervation of the muscles of tympanic cavity.

71. Internal ear. Structure of the osseous and membranous labyrinths. Perilymph and endolymph, their circulation. Auditory tract. Vestibular tract.

72. Heart, its macromorphology and topography. Vessels of the heart. Innervation of the heart. Coordination of cardiac activity: conducting system, its structure and functional role.

73. Lymphatic system. General structure: topography of lymph nodes and vessels.

74. External vessels of the head and neck. Lymphatic drainage and innervation of the head and neck.

75. Blood supply, venous and lymphatic drainage of the pectoral girdle and upper limb.

76. Blood supply, venous and lymphatic drainage of the pelvic girdle and lower limb.

77. Blood supply, venous and lymphatic drainage of the thorax and abdomen. Cava-caval anastomoses.

78. Thymus. Embrionic development. Macromorphology, localization and functions of the thymus. Blood supply of the thymus. Thymic hormones and other secreted factors.

79. Bone marrow. Macromorphology, localization and functions of bone marrow.

80. Spleen. Embrionic development. Macromorphology and topography of the spleen. Splenic microcirculation. Function of the spleen.

81. General features of the digestive system. Main organs, their functions. General structure of the wall. Peritoneum and its derivatives.

82. Oral cavity. Boundares and connections. Teeth. Innervation, blood supply and lymphatic drainage of the oral cavity. Salivary glands. Macromorphology of the salivary glands. Their innervation and vascularization.

83. Tongue. Macromorphology, localization of the tongue. Lingual musculature. Lingual vessels and nerves. Gustatory apparatus.

84. Pharynx. Its parts, Waldeyer's ring. Morphology of tonsils. Pharyngeal musculature, its innervation and vascularization. Mechanism of swallowing.

85. Oesophagus. Macromorphology, localization of the esophagus. Its innervation and vascularization.

86. Stomach. Its localization and fixation within organism. Macromorphology of the stomach. Its innervation, vascularization and lymphatic drainage.

87. Small intestine. Macromorphology, localization of the small intestine. Its innervation, vascularization and lymphatic drainage.

88. Large intestine. Macromorphology, localization of the large intestine. Its innervation and vascularization. Vermiform appendix.

89. Pancreas. Macromorphology, localization of the pancreas. Its innervation and vascularization.

90. Liver. Macromorphology, localization of the liver. Its innervation and vascularization. Porto-caval anastomoses.

91. General organization of the respiratory system. Anatomy of the chest. Mediastinum.

92. Divisions of the respiratory system. Upper respiratory tract: nasal cavity, paranasal sinuses, nasopharynx, oropharynx. Their macrostructures, vessels and nerves. Olfactory apparatus.

93. Larynx. Laryngeal cartilages, ligaments and musculature. Blood supply and lymphatic drainage and nerve supply. Anatomy of phonation.

94. Trachea, bronchi. Their macrostructures, vessels and nerves.

95. Lungs. Embrionic development. Pulmonary surface feature fissures and lobes, hila and roots. Pleurae. Blood supply and lymphatic drainage and nerve supply.

96. Hypophisis. Embrionic development. Macromorphology, localization of the pituitary gland, its connection with hypothalamus.

97. Thyroid gland, parathyroid gland. Embrionic development. Macromorphology, localization, vessels and nerves. Control of hormone secretion.

98. Suprarenal glands. Embrionic development. Macromorphology, localization, adrenal blood supply and innervation.

99. Pineal gland. Embrionic development Macromorphology, localization, vessels and nerves.

100. Kidney. Embrionic development. Macromorphology, localization, fixation and functions. Kidney vasculature and innervation.

101. Urinary tracts. Macromorphology, localization, blood supply and innervation.

102. Male reproductive system. Embrionic development General organization. Coats of the scrotum, its formation.

103. Vas deferens, ejaculatory duct. Seminal vesicles, prostate. Structure and functions. Endocrine control. Vessels and nerves.

104. Female reproductive system. Embrionic development Its localization and fixation. Ovary, uterus and fallopian tubes. Macromorphology, localization, blood supply and innervation.

105. Embrionic circulation.

106. Skin and its derivatives. Structure, functions, blood supply and innervation.