

# Question Paper

Exam Date & Time: 20-Dec-2021 (10:00 AM - 01:00 PM)



## MANIPAL ACADEMY OF HIGHER EDUCATION

FIRST MBBS DEGREE EXAMINATION - DECEMBER 2021

SUBJECT: ANATOMY - PAPER I

Anatomy Paper-I [AN 111THP1]

Marks: 80

Duration: 160 mins.

**All questions are compulsory.**

**Write brief, clear, relevant and legible answers.**

**Illustrate your answers with diagrams and flow-charts wherever appropriate.**

1. Describe the thyroid gland under the following headings
  - 1A) Parts & Coverings (4)
  - 1B) Blood supply (2)
  - 1C) Applied anatomy (2)
  - 1D) Development (2)
  
2. A 45 year old male comes to the trauma center after road traffic accident with numbness in the right little finger, weakness in the palm muscles and loss of coordinated movements in the fingers. Clinical examination revealed a compound fracture of the medial humeral epicondyle. With your anatomical knowledge of the upper limb answer the following questions.
  - 2A) Name the structure damaged due to fracture of the medial epicondyle of the humerus causing the above mentioned clinical findings. (1)
  - 2B) Describe the origin, course of the structure damaged.(4)
  - 2C) Name the branches of the structure in the forearm and hand (5)
  
3. **Short Answers:**
  - 3A) Describe the origin, course and distribution of the lingual nerve. (4)
  - 3B) Describe the origin, course and branches of external carotid artery (4)
  - 3C) Describe the ciliary ganglion. (4)
  - 3D) Classify the white matter of the cerebrum and give examples for each (4)
  - 3E) Draw a neat labeled diagram of transverse section of the medulla oblongata at the level of sensory decussation (4)
  - 3F) Inferior cerebellar peduncle (4)
  - 3G) Describe the CSF circulation (4)

- 3H) Describe the origin, course, area of distribution and applied anatomy of middle cerebral artery. (4)
- 3I) Describe the formation and branches of deep palmar arch (4)
- 3J) Describe the ligaments associated with the shoulder joint (4)
- 3K) Explain the microscopic structure of the transverse section of the compact bone (4)
- 3L) Describe the histology of the palatine tonsil (4)
- 3M) Describe the formation and fate of neural crest (4)
- 3N) Somites (4)
- 3O) Describe the non-disjunction and associated genetic anomalies (4)

-----End-----

# Question Paper

Exam Date & Time: 21-Dec-2021 (10:20 AM - 01:00 PM)



## MANIPAL ACADEMY OF HIGHER EDUCATION

FIRST MBBS DEGREE EXAMINATION - DECEMBER 2021  
SUBJECT: ANATOMY - PAPER II

Marks: 80

Duration: 160 mins.

Answer all the questions.

Write brief, clear, relevant and legible answers.

Illustrate your answers with diagrams and flow charts wherever appropriate.

1) Describe the parts, position, primary and secondary supports, arterial supply and development of uterus.  
(1+2+3+2+1+1 = 10 marks)

2. A 56 year old man presented with hoarseness of voice, dyspnoea, tracheal tug and pulsating swelling protruding from the upper margin of the sternum. The Computed Topography (CT) scan of chest and angiography showed localized dilatation of a vessel located behind the sternum.

Based on the anatomy of this region, answer the following questions:

- |     |  |     |
|-----|--|-----|
| 2A) | Name the dilated vessel  | (1) |
| 2B) | Discuss the origin, termination and branches of the vessel                   | (3) |
| 2C) | Describe the relations of the vessel with the help of a neat labeled diagram | (4) |
| 2D) | Add a note on the development of the vessel.                                 | (2) |

3. Write shorts notes:

- |     |   |     |
|-----|---|-----|
| 3A) | Enumerate the sites of portocaval anastomosis and its applied importance. | (4) |
| 3B) | Positions and applied anatomy of vermiform appendix.                      | (4) |
| 3C) | Course and tributaries of great saphenous vein                            | (4) |
| 3D) | Tibialis posterior  | (4) |
| 3E) | Microscopic structure of prostate gland                                   | (4) |
| 3F) | Development and anomalies of kidney.                                      | (4) |
| 3G) | Mention any four differences between small and large intestine            | (4) |
| 3H) | Internal trigone of the urinary bladder                                   | (4) |
| 3I) | Draw a neat labeled diagram of mediastinal surface of right lung          | (4) |
| 3J) | Sinuses of pericardium  | (4) |
| 3K) | Iliotibial tract  | (4) |
| 3L) | Cruciate ligaments of knee joint  | (4) |
| 3M) | Microscopic structure of gall bladder                                     | (4) |
| 3N) | Development and anomalies of palate                                       | (4) |
| 3O) | Define muscle. Name the types and parts of muscle.                        | (4) |

.....End.....