



QUESTION BANK

• SEMESTER 1 •

ANATOMY

Lecture 1 - Anatomical Terminology

Part 1: MCQs (Choose the correct answer):

1. The median (sagittal) plane divides the body into:

- A. Anterior and posterior parts
- B. Upper and lower parts
- C. Unequal right and left parts
- D. Two equal right and left halves
- E. Medial and lateral halves

2. A radiologist is reviewing a body section in which the sternum appears in the anterior part and the vertebral column in the posterior part. Which plane produced this section?

- A. Median plane
- B. Coronal plane
- C. Paramedian plane
- D. Horizontal plane
- E. Transverse plane

3. A surgeon requests a CT scan of the abdomen in which the body is cut into upper and lower parts to localize a mass. Which anatomical plane is used for these sections?

- A. Coronal plane
- B. Sagittal plane
- C. Horizontal (transverse) plane
- D. Paramedian plane
- E. Median plane

4. Which of the following statements is correct regarding the paramedian (parasagittal) plane?

- A. It divides the body into anterior and posterior parts
- B. It divides the body into upper and lower parts
- C. It passes through the middle line of the body
- D. It is parallel to the median plane and divides the body into unequal right and left parts
- E. It is a horizontal plane

5. Which of the following is correct regarding the anatomical position?

- A. The body is lying on the back with the face upwards
- B. The palms are directed backwards
- C. The arms are abducted away from the trunk
- D. The knees are slightly flexed
- E. The feet are parallel with the toes pointing forward

6. The prone position means that the body is lying:

- A. On the back with the face upwards
- B. On the front with the face downwards
- C. On the right side
- D. Upright with the palms facing forwards
- E. On the left side

7. Human anatomy is the science dealing with the study of:

- A. The functions of the different body organs
- B. The chemical reactions inside the living cells
- C. The structure of the human body
- D. The diseases affecting the human body
- E. The treatment of the surgical patients

8. The pelvis and the external genitalia are considered parts of the:

- A. Trunk
- B. Head
- C. Neck
- D. Upper limb
- E. Lower limb

9. A football player receives a direct blow to the part of the lower limb lying between the knee joint and the ankle joint. Which part of the limb is injured?

- A. The thigh
- B. The gluteal region
- C. The leg
- D. The foot
- E. The hip

10. Which of the following is a part of the upper limb?

- A. The gluteal region
- B. The forearm
- C. The thigh
- D. The leg
- E. The thorax

11. A patient presents with a cut wound on the side of the forearm nearer to the median plane of the body. This wound is best described as lying on the side of the forearm.

- A. Medial
- B. Lateral
- C. Distal
- D. Superficial
- E. Dorsal

12. Which of the following terms means towards the feet?

- A. Cranial
- B. Cephalic
- C. Superior
- D. Proximal
- E. Caudal

13. An orthopaedic surgeon reports a fracture of the humerus at the part of the bone close to the trunk. Which term did the surgeon use in his report?

- A. Distal
- B. Proximal
- C. Superficial
- D. Medial
- E. Caudal

14. Which of the following statements is correct regarding the upper limb in the anatomical position?

- A. The wrist joint is proximal to the elbow joint
- B. The shoulder joint is distal to the elbow joint
- C. The arm is distal to the forearm
- D. The hand is proximal to the arm
- E. The fingers are distal to the wrist joint

15. Which of the following pairs of anatomical terms is correctly matched?

- A. Anterior – dorsal
- B. Posterior – ventral
- C. Superior – caudal
- D. Anterior – ventral
- E. Inferior – cephalic

16. Superficial means:

- A. Towards the surface of the body
- B. Away from the surface of the body
- C. Towards the median plane
- D. Close to the trunk of the body
- E. Towards the head

17. A patient with a lesion in the right cerebral hemisphere develops paralysis of the left half of the body. In relation to the site of the lesion, the paralysed side is described as:

- A. Ipsilateral
- B. Superficial
- C. Proximal
- D. Contralateral
- E. Median

18. During a physiotherapy session, a patient bends his elbow so that the ventral surfaces of the arm and forearm approach each other with a decrease in the angle between them. This movement is called:

- A. Flexion
- B. Extension
- C. Abduction
- D. Supination
- E. Circumduction

19. A patient with foot drop is unable to raise the dorsum of his foot towards the front of the leg. Which movement of the ankle joint is lost in this patient?

- A. Plantar flexion
- B. Inversion
- C. Eversion
- D. Adduction
- E. Dorsiflexion

20. An athlete is asked to bring his abducted upper limb back towards the side of his body. This movement is termed:

- A. Abduction
- B. Extension
- C. Adduction
- D. Lateral rotation
- E. Protraction

21. A physiotherapist asks a patient to rotate his forearm so that the palm of the hand faces backwards. This movement is known as:

- A. Supination
- B. Lateral rotation
- C. Eversion
- D. Pronation
- E. Retraction

22. Rotation of the lower limb away from the midline of the body is called:

- A. Lateral rotation
- B. Medial rotation
- C. Adduction
- D. Inversion
- E. Depression

23. A player twists his ankle during a match and the sole of his foot turns to face inwards. Which movement has taken place?

- A. Eversion
- B. Dorsiflexion
- C. Pronation
- D. Abduction
- E. Inversion

24. Which of the following statements is correct regarding the anatomical terms of movement?

- A. Protraction means moving posteriorly
- B. Retraction means moving anteriorly
- C. Elevation means moving up
- D. Depression means moving up
- E. Adduction means moving away from the midline

25. A bowler moves his upper limb at the shoulder joint in a circular manner, combining extension, abduction, flexion and adduction. This combined movement is called:

- A. Rotation
- B. Circumduction
- C. Supination
- D. Elevation
- E. Eversion

Part 2: Essay / Short-Answer Questions:

1. Complete the following:

- a) The plane which divides the body into two equal right and left halves is
- b) The plane which divides the body into anterior and posterior parts is

2. Enumerate the three parts of the trunk:

- a)
- b)
- c)

3. Give the anatomical term for each of the following:

- a) Movement of the foot so that the sole faces outwards
- b) Moving a part of the body anteriorly
- c) The position in which the body lies on the front with the face downwards
- d) The term meaning the same side of the body

4. Define the following:

a) The anatomical position:

b) Circumduction:

5. Explain the following statement: "A lesion in the right cerebral hemisphere results in paralysis of the contralateral side of the body".

6. Complete the following:

a) The term meaning close to the point of origin or the trunk is

while the term meaning far from it is

b) Rotation of the forearm so that the palm faces backwards is called

while rotation so that the palm faces forwards is called

c) Movement of the shoulder upwards is called

while its movement downwards is called

Part 1: MCQ Answer Key (with slide references)

1. D – The median (sagittal) plane divides the body into two equal right and left halves **Slide 14** (a vertical plane passing anteroposteriorly in the middle line of the body)
2. B – Coronal plane **Slide 16** (a vertical plane dividing the body into anterior and posterior parts)
3. C – Horizontal (transverse) plane **Slide 17** (it divides the body into upper and lower parts)
4. D – It is parallel to the median plane and divides the body into unequal right and left parts **Slide 15** (the paramedian or parasagittal plane)
5. E – The feet are parallel with the toes pointing forward **Slide 9** (standing upright and facing forward, arms straight with the palms facing forward)
6. B – On the front with the face downwards **Slide 11** (supine means that the body is lying on the back)
7. C – The structure of the human body **Slide 4** (anatomy is a descriptive science; its terms are derived from Latin or Greek)
8. A – Trunk **Slides 6 & 7** (the trunk = thorax, abdomen and pelvis with the external genitalia)
9. C – The leg **Slide 8** (the lower limb: gluteal region, hip joint, thigh, knee joint, leg, ankle joint, foot and toes)
10. B – The forearm **Slide 8** (the upper limb: shoulder joint, arm, elbow joint, forearm, wrist joint, hand and fingers)
11. A – Medial **Slide 19** (medial means towards the median plane; lateral means away from the median plane)
12. E – Caudal **Slide 20** (inferior = caudal, towards the feet; superior = cranial = cephalic, towards the head)
13. B – Proximal **Slide 21** (proximal means close to the point of origin or the trunk of the body)
14. E – The fingers are distal to the wrist joint **Slide 21** (distal means far away from the point of origin or the trunk)
15. D – Anterior – ventral **Slide 22** (posterior = dorsal, towards the back of the body)
16. A – Towards the surface of the body **Slide 23** (deep means away from the surface of the body)
17. D – Contralateral **Slide 24** (contralateral = the opposite side of the body; ipsilateral = the same side)
18. A – Flexion **Slide 26** (approximation of the ventral surfaces with a decrease in the angle between them)
19. E – Dorsiflexion **Slide 26** (dorsiflexion is flexion at the ankle towards the dorsum; plantar flexion is the extension)
20. C – Adduction **Slide 27** (adduction is moving towards the midline; abduction is moving away from it)
21. D – Pronation **Slide 28** (medial rotation of the forearm, so that the palm faces backwards)
22. A – Lateral rotation **Slide 28** (rotation away from the midline; medial rotation is rotation towards the midline)
23. E – Inversion **Slide 29** (movement of the foot so that the sole faces inwards; eversion is outwards)
24. C – Elevation means moving up **Slide 30** (depression is moving down, protraction is moving anteriorly, retraction is posteriorly)
25. B – Circumduction **Slide 31** (a combined rotatory movement involving extension, abduction, flexion and adduction)

Part 2: Essay Answer Key (with slide references)

1. Anatomical planes — Slides 14 & 16

- a) The **median (sagittal) plane** (two equal right and left halves).
- b) The **coronal plane** (anterior and posterior parts).

2. Parts of the trunk — Slides 6 & 7

- a) Thorax • b) Abdomen • c) Pelvis and external genitalia.

3. Anatomical terms — Slides 11, 24, 29 & 30

- a) **Eversion** (movement of the foot so that the sole faces outwards).
- b) **Protraction** (moving anteriorly; the opposite is retraction, moving posteriorly).
- c) **Prone position** (lying on the front with the face downwards).
- d) **Ipsilateral** (the same side of the body; contralateral is the opposite side).

4. Definitions — Slides 9 & 31

- a) **Anatomical position**: a person standing upright and facing forward, with the arms straight and the hands held by the hips with the palms facing forward, and the feet parallel with the toes pointing forward. All anatomical descriptions are related to this position.
- b) **Circumduction**: a combined rotatory movement involving extension, abduction, flexion and adduction.

5. Explanation of the statement — Slide 24

- Contralateral means the opposite side of the body, while ipsilateral means the same side.
- Each cerebral hemisphere controls the opposite half of the body, so a lesion of the right cerebral hemisphere results in paralysis of the left (contralateral) side, and the vision of the right (ipsilateral) eye may also be affected.

6. Completion — Slides 21, 28 & 30

- a) **Proximal** / **Distal**.
- b) **Pronation** (medial rotation) / **Supination** (lateral rotation).
- c) **Elevation** / **Depression**.