



Introduction and anatomical terms

Anatomy Department
Beni-Suef University

Intended learning objectives (ILOs)

By the end of this lecture the student will be able to:

1. Define anatomy.
2. Define directional terms used to describe the human body.
3. Describe anatomical position, planes and sections.
4. Outline the major body cavities.

Fields of anatomical study include

- **Gross anatomy**
- **Histology**
- **Surface anatomy**
- **Applied or clinical anatomy**
- **Surgical anatomy**
- **Radiological anatomy**
- **Endoscopy**
- **Comparative anatomy**
- **Embryology**

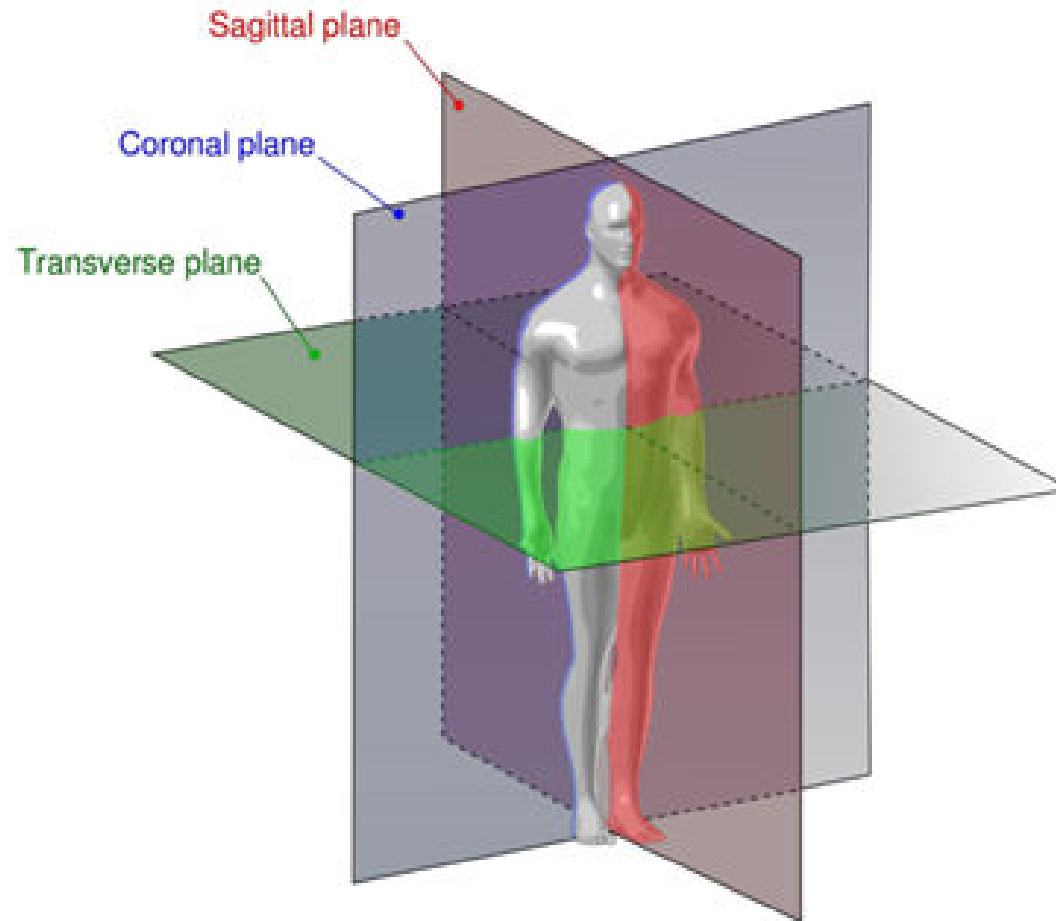
Levels of Organization

- 1. Cells**
- 2. Tissues**
- 3. Organs**
- 4. Systems**
- 5. An organism**

Terms of position



Anatomical planes and lines



Terms of relationship and directions

Superior

Inferior

Anterior (ventral)

Posterior (dorsal)

Medial

Lateral

Proximal

Distal

Superficial

Deep

Internal

External

Terms of movement

Flexion

Extension

Adduction

Abduction

Medial rotation

Lateral rotation

Circumduction

Supination

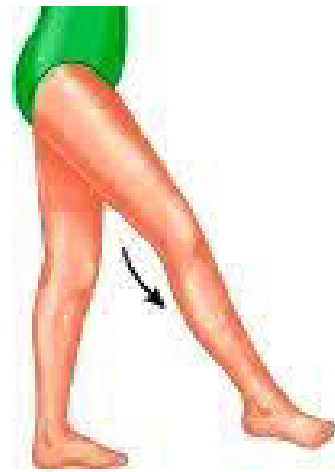
Pronation

Inversion

Eversion



flexion of leg



extension of leg



adduction of thigh



abduction of thigh

a. Angular movements



rotation
of arm



pronation of hand



inversion



eversion

b. Circular movements

c. Special movements

Body Cavities

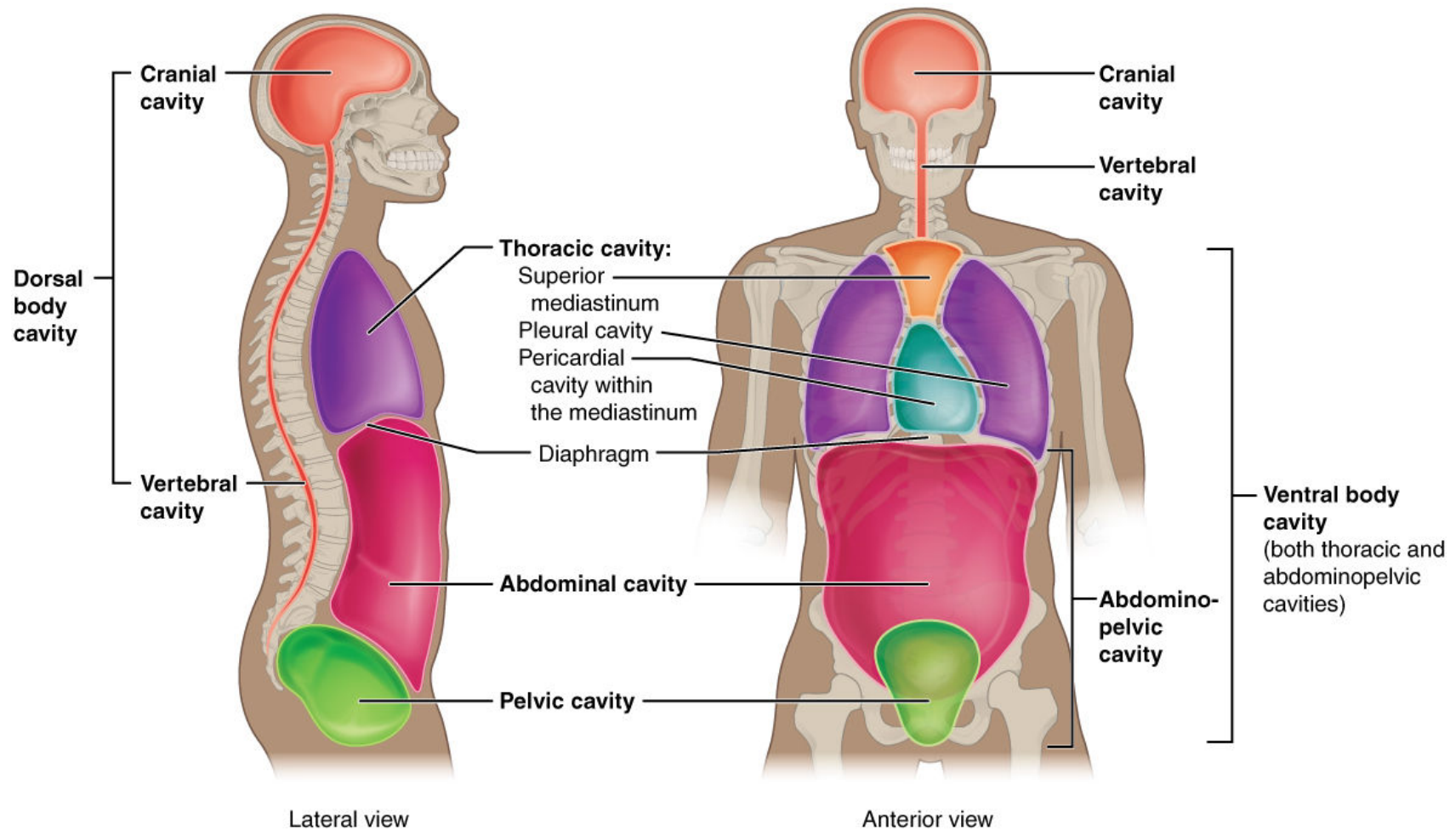
Cranial cavity

Vertebral canal

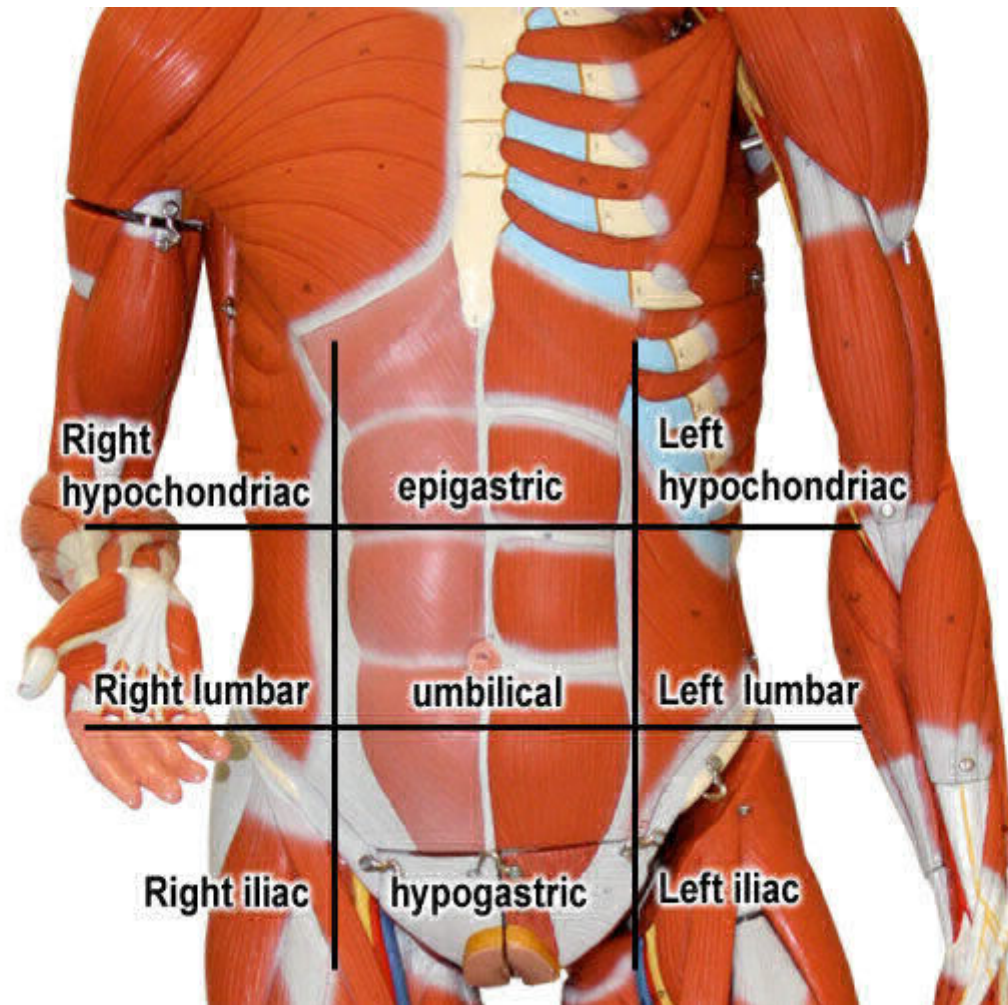
Thoracic cavity

- **Pleural cavity**
- **Pericardial cavity**
- **Mediastinum**

Abdomino-pelvic Cavity



Abdomino-pelvic Regions and Quadrants



Quiz

1. Which answer describes the anatomical position?
 - a. Standing erect, facing observer, arms at side, palms facing to your side.
 - b. Standing erect, facing observer, arms at side, palms facing forward.
 - c. Standing erect, facing observer, arms at side, palms facing back.
 - d. Standing erect, facing observer, arms at side, palms facing outward.

2. section separates the body into right and left portions.

- a. Frontal
- b. Transverse
- c. Dorsal
- d. Sagittal

3. The cavity of the body immediately inferior to the diaphragm is the

- a. Pleural
- b. Thoracic
- c. Inguinal
- d. Abdominal

4. The anatomical term that means “away from the midline of the body” is

- a. Medial
- b. Proximal
- c. Distal
- d. Lateral

Thank you