

ANATOMY

Lecture Two

Body Cavities and Its Organs

Dorsal cavity protects the nervous system, and is divided into two subdivisions:

Cranial cavity is within the skull and encases the brain.

Vertebral cavity runs within the vertebral column and encases the spinal cord.

Ventral cavity houses the internal organs (viscera), and is divided into two subdivisions:

Thoracic and Abdominopelvic cavities

Thoracic cavity

is subdivided into pleural cavities, the mediastinum, and the pericardial cavity.

Pleural cavities – each houses a lung

Mediastinum – contains the pericardial cavity and surrounds the remaining thoracic organs.

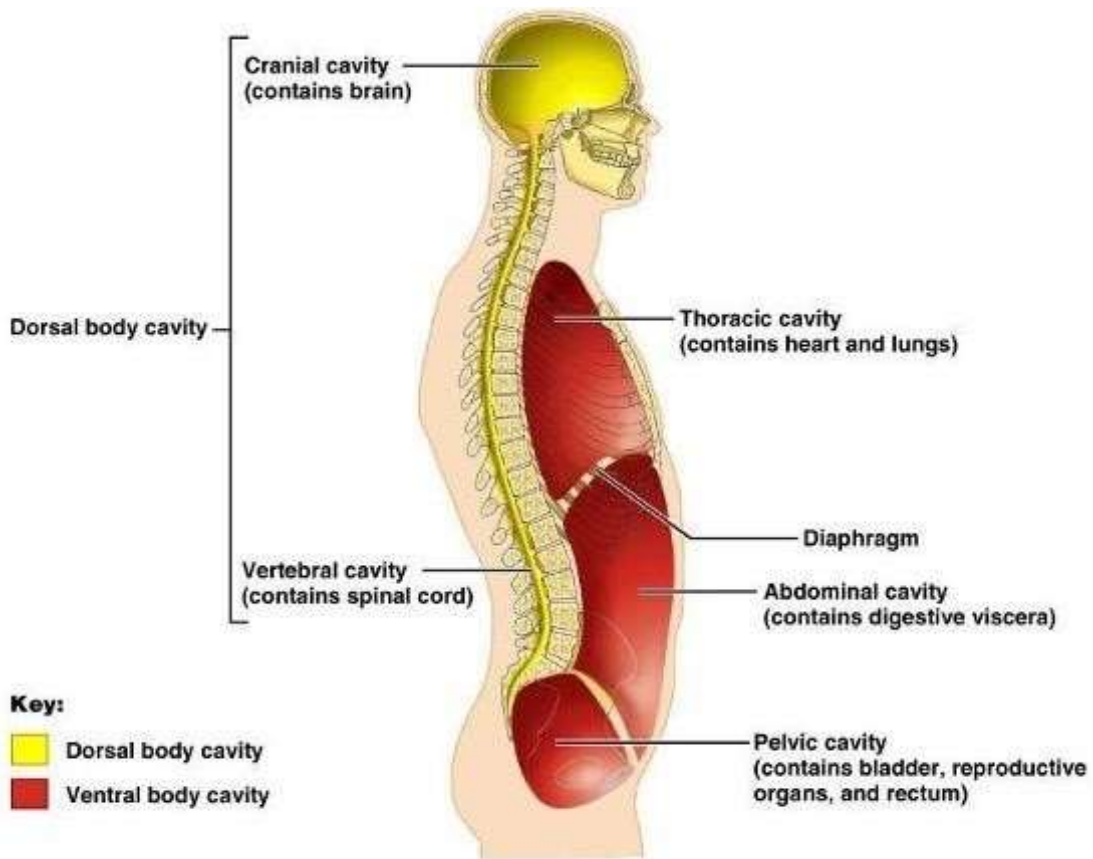
Pericardial cavity – encloses the heart.

The abdominopelvic cavity is separated from the superior thoracic cavity by the dome-shaped diaphragm.

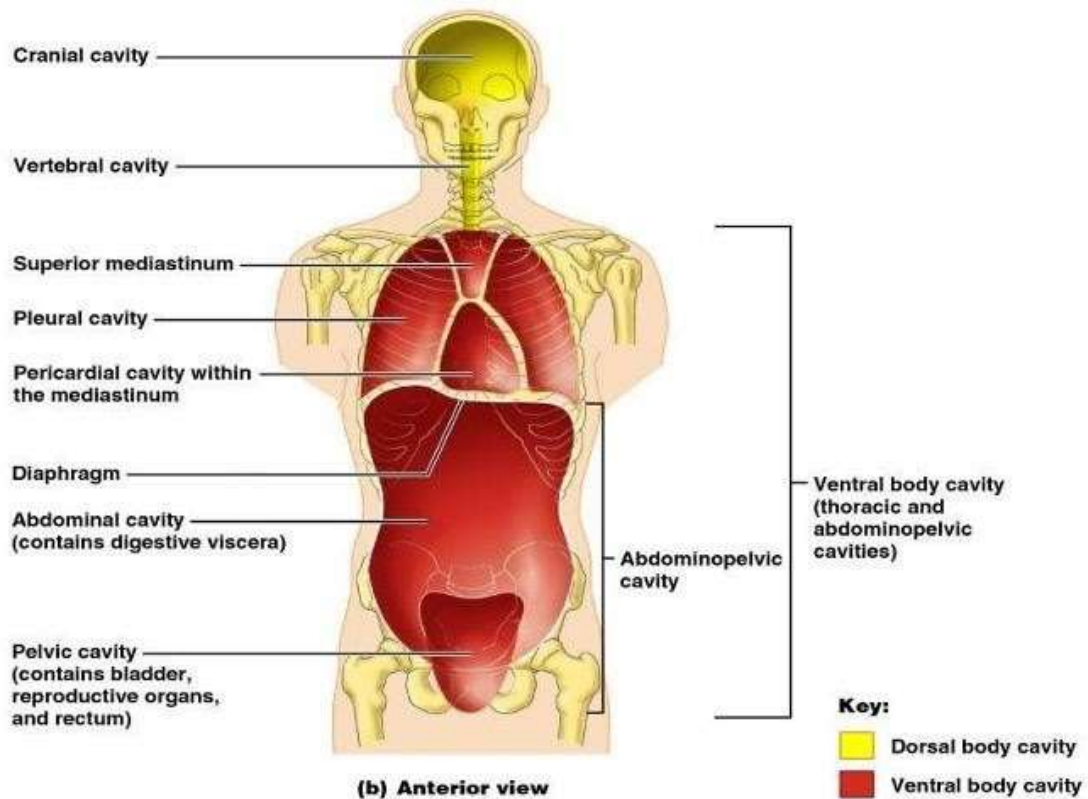
It is composed of two subdivisions:

Abdominal cavity – contains the stomach, small intestines, colon, pancreas, duodenum, spleen, liver, ureters, and kidney.

Pelvic cavity – lies within the pelvis and contains the bladder, reproductive organs of female, and rectum.



(a) Lateral view



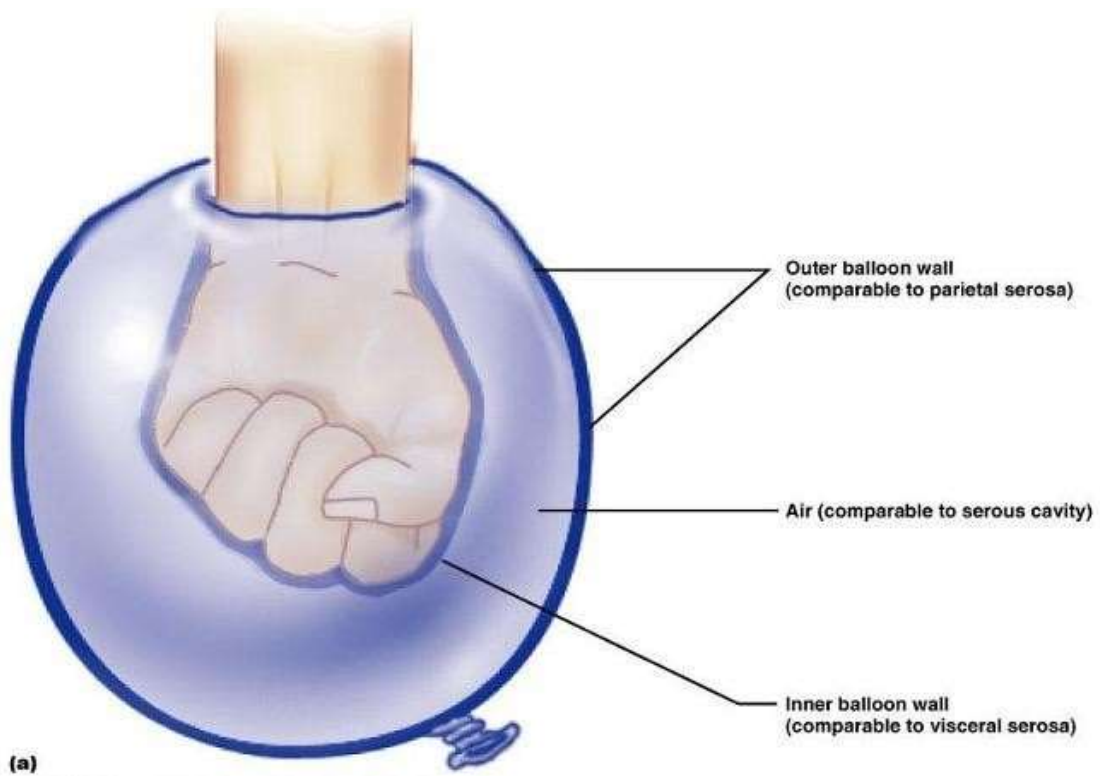
(b) Anterior view

Ventral Body Cavity Membranes

Parietal serosa lines internal body walls.

Visceral serosa covers the internal organs.

Serous fluid separates the serosa.



Other Body Cavities

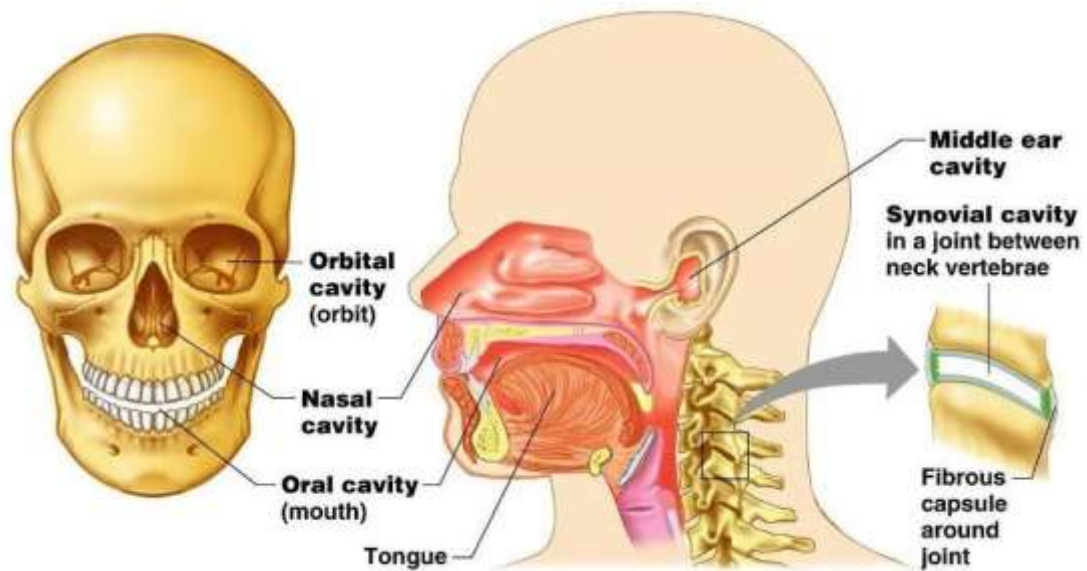
Oral and digestive – mouth and cavities of the digestive organs.

Nasal -- located within and posterior to the nose.

Orbital – house the eyes.

Middle ear – contain bones (ossicles) that transmit sound vibrations.

Synovial – joint cavities.



*Abdominopelvic
Regions*

Umbilical

Epigastric

Hypogastric

**Right and left iliac or
inguinal.**

Right and left lumbar.

**Right and left
hypochondriac.**

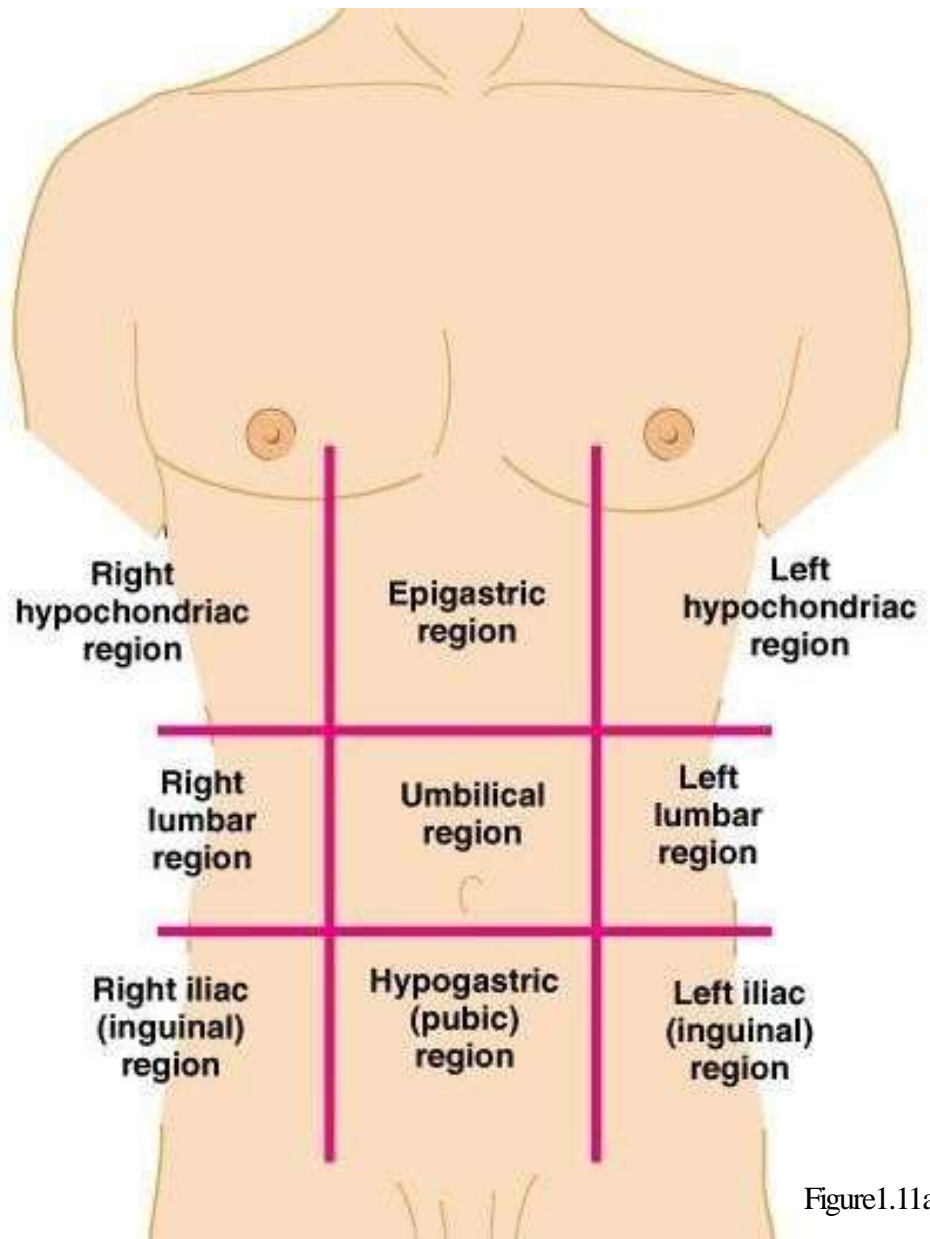


Figure 1.11a

