

# Spleen

## Chapter 7

1

---

---

---

---

---

---

---

---

### New Terminology

Combining Form	Meaning	Example	Meaning of New Term
Aden/o	Gland	Adenoma	Tumor of a gland
Adenoid/o	Adenoid	Adenoidectomy	Excision or surgical removal of an adenoid
Angi/o	Vessel	Angiasthenia	Absence of vessel strength
Vas/o		Vasorrhaphy	Suturing of a vessel
Bacteri/o	Bacteria	Bacteriemia	Condition of bacteria in the blood
Immun/o	Immune	Immunopathology	Study of immune disease

2

---

---

---

---

---

---

---

---

### New Terminology

Combining Form	Meaning	Example	Meaning of New Term
Lymph/o	Lymph	Lymphoma	Lymph tumor
Lymphaden/o	Lymph gland	Lymphadenocoele	Hernia of a lymphatic vessel
Lymphangi/o	Lymphatic vessel	Lymphangiectasis	Dilation of a lymphatic vessel
Lymphocyt/o	Lymph cell	Lymphocytosis	Abnormal condition of lymph cells
Myel/o	Bone marrow, spinal cord	Myeloma	Tumor of the bone marrow
Path/o	Disease	Pathophobia	Fear of disease

3

---

---

---

---

---

---

---

---

### New Terminology

Combining Form	Meaning	Example	Meaning of New Term
Ser/o	Serum	Serous	Pertaining to serum
Splen/o	Spleen	Splenomegaly	Enlargement of the spleen
Thym/o	Thymus	Thymocyte	Thymus cell
Tonsill/o	Tonsil	Tonsillitis	Inflammation of the tonsil
Tox/o	Poison, toxin	Toxoid	Resembling poison
Toxic/o		Toxicogenic	Creating poison

4

---

---

---

---

---

---

---

---

### Spleen

- Largest lymph organ
- Highly vascular
- Spongy parenchyma
- Intra-peritoneal organ
  - Covered entirely with peritoneum
    - Except for its small bare area
      - Splenic hilum

5

---

---

---

---

---

---

---

---

### Spleen

- Posterior to stomach
- In LUQ
- Medial border
  - Left kidney
  - Splenic flexure
  - Pancreatic tail
- Posterior border
  - Diaphragm
  - Pleura
  - Left lung
  - Ribs

6

---

---

---

---

---

---

---

---

# Splenic Vasculature

- Splenic Artery (1)
- Splenic Vein (1)
- Hilum
  - Where artery enters
  - Where vein exits

7

---

---

---

---

---

---

---

---

7

# Spleen

- Functions to produce WBC
- Filters abnormal blood cells from blood
- Stores iron from RBC
- Initiate immune response

8

---

---

---

---

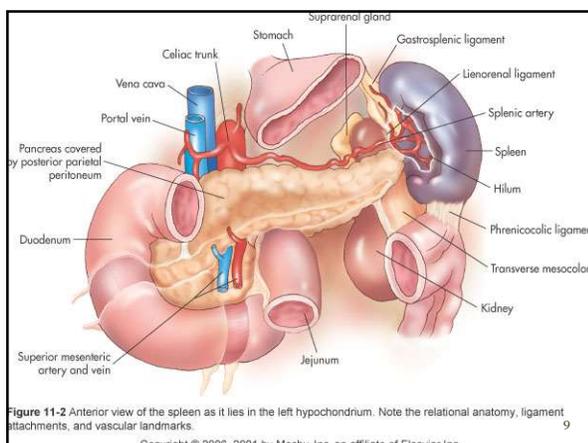
---

---

---

---

8



---

---

---

---

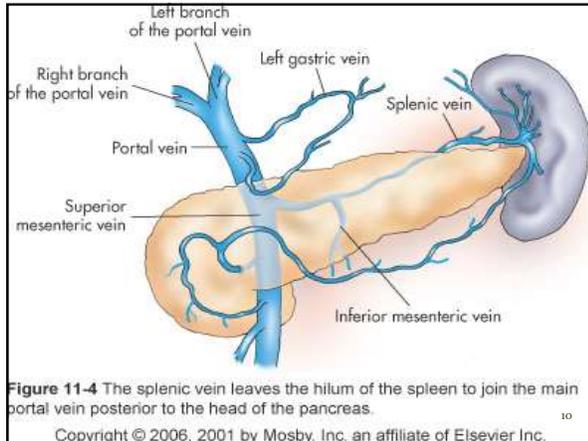
---

---

---

---

9



10

---

---

---

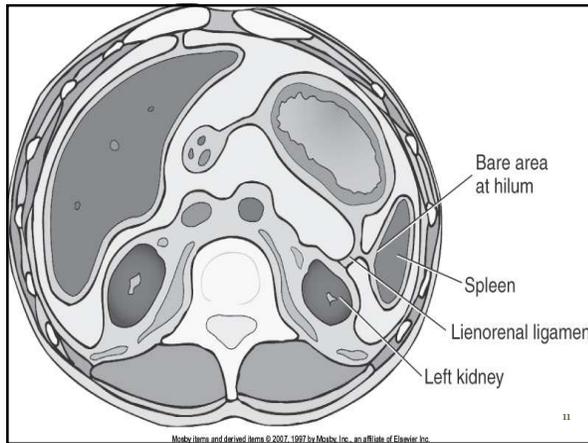
---

---

---

---

---



11

---

---

---

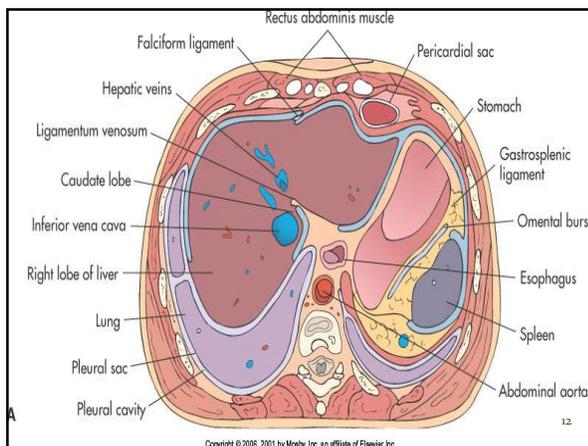
---

---

---

---

---



12

---

---

---

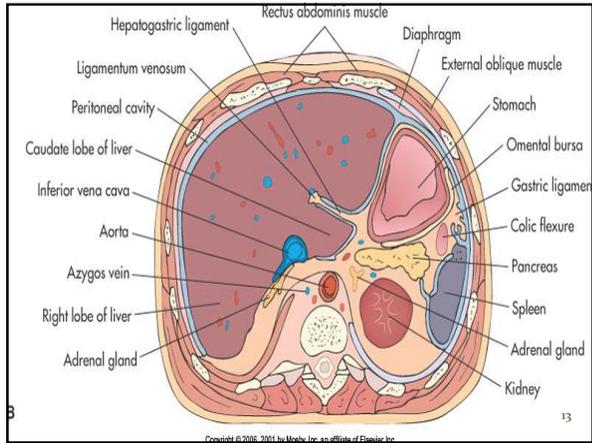
---

---

---

---

---



13

---

---

---

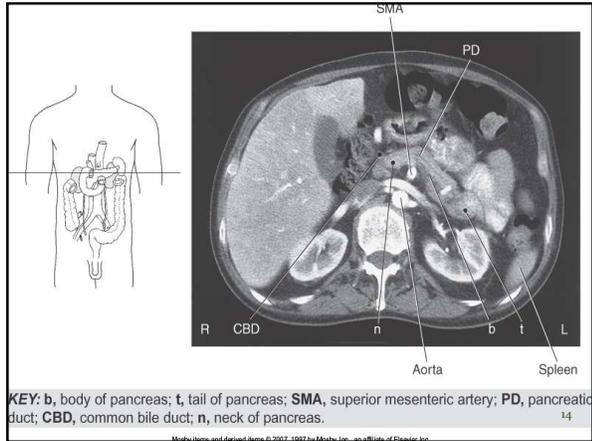
---

---

---

---

---



14

---

---

---

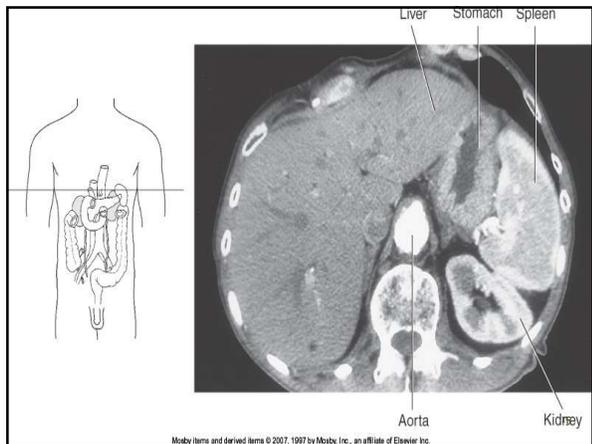
---

---

---

---

---



15

---

---

---

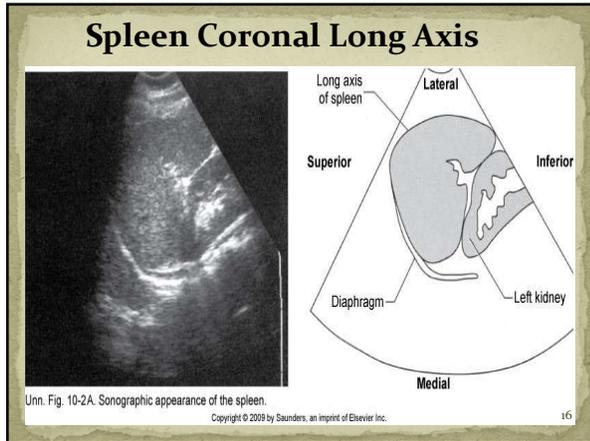
---

---

---

---

---



16

---

---

---

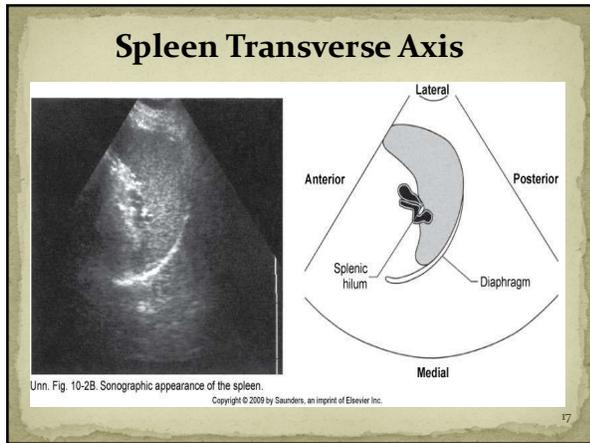
---

---

---

---

---



17

---

---

---

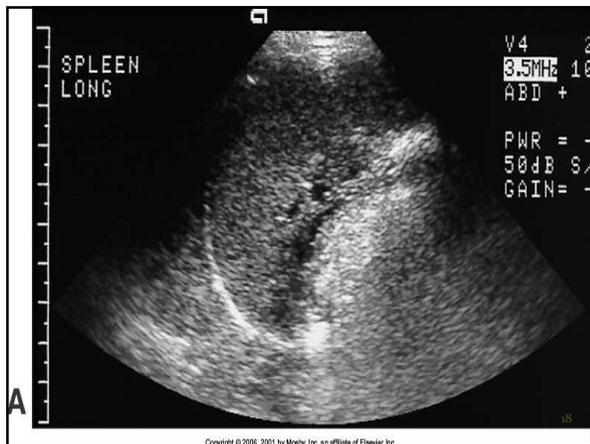
---

---

---

---

---



18

---

---

---

---

---

---

---

---



19

---

---

---

---

---

---

---

---

### Lymph Nodes

- **Filtration:**
  - Filters and traps germs
  - Makes antibodies to know what needs to be disposed of
- **Immune response:**
  - Destroys germs
  - Keeps track of immune cells for the body to know when to make more of a certain kind

20

---

---

---

---

---

---

---

---

### Anatomy of a Lymph Node

Afferent lymphatic vessel

Valve to prevent backflow

Capsule

Nodule

Sinus

Cortex

Hilum

Efferent lymphatic vessel

21

---

---

---

---

---

---

---

---

### Lymph Nodes Sonographic Appearance

- bean or oval shape
- low echogenicity
- Homogenous echotexture
- smooth border
- hyperechoic hilum with internal blood flow
- <2cm

22

---

---

---

---

---

---

---

---

22

### Lymph Nodes

23

---

---

---

---

---

---

---

---

23