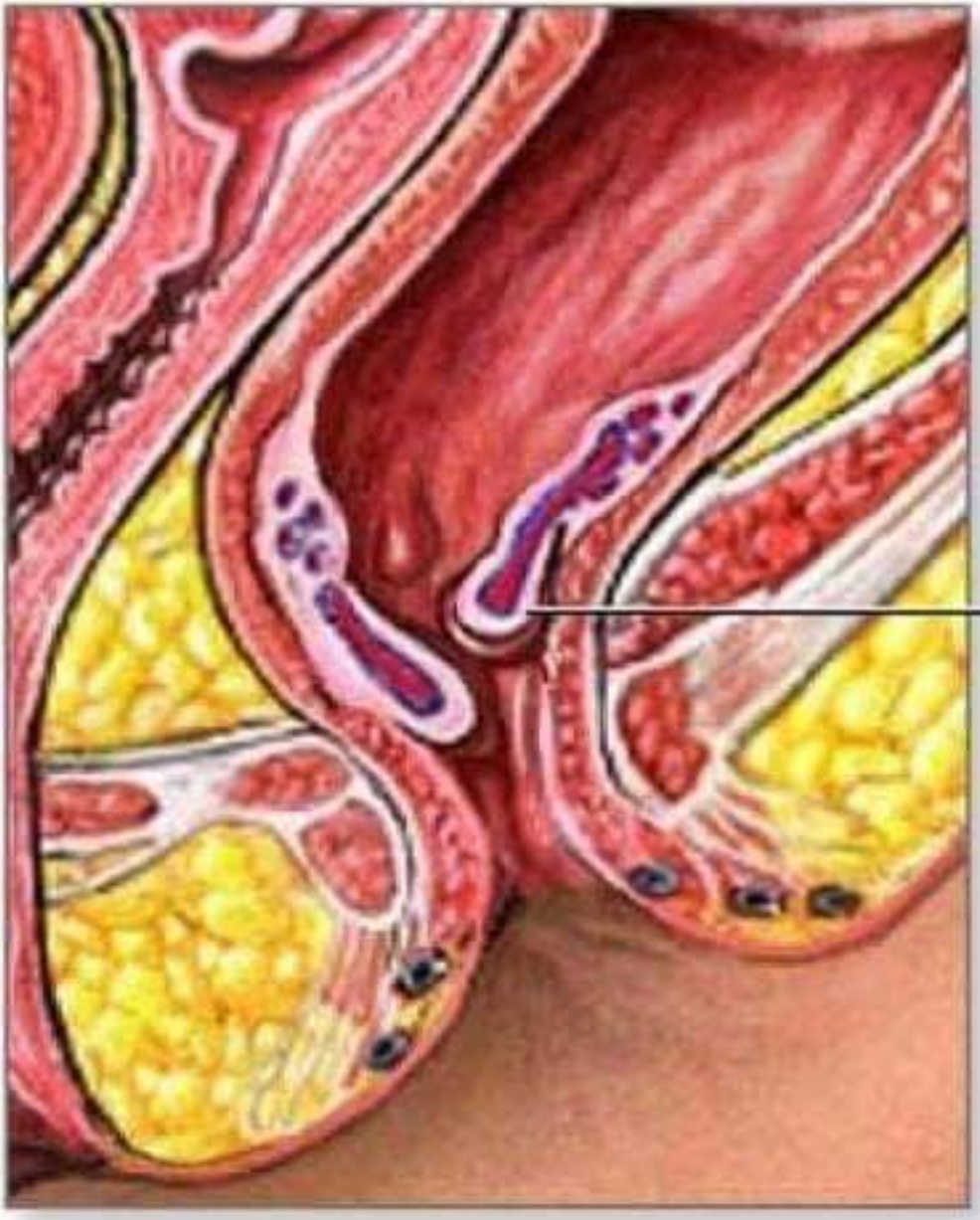
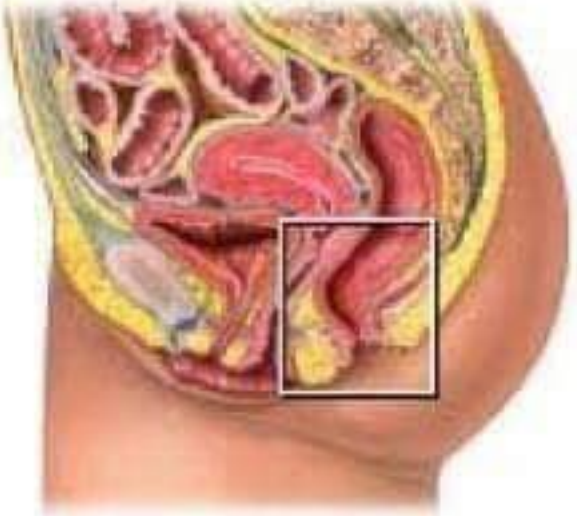
Hemorrhoids

What Are Hemorrhoids?

- Alternative Names
  - Rectal Lump
  - Piles
  - Lump in the Rectum
- Definition:
  - Dilated or enlarged veins in the lower portion of the rectum or anus.





Inflamed hemorrhoids

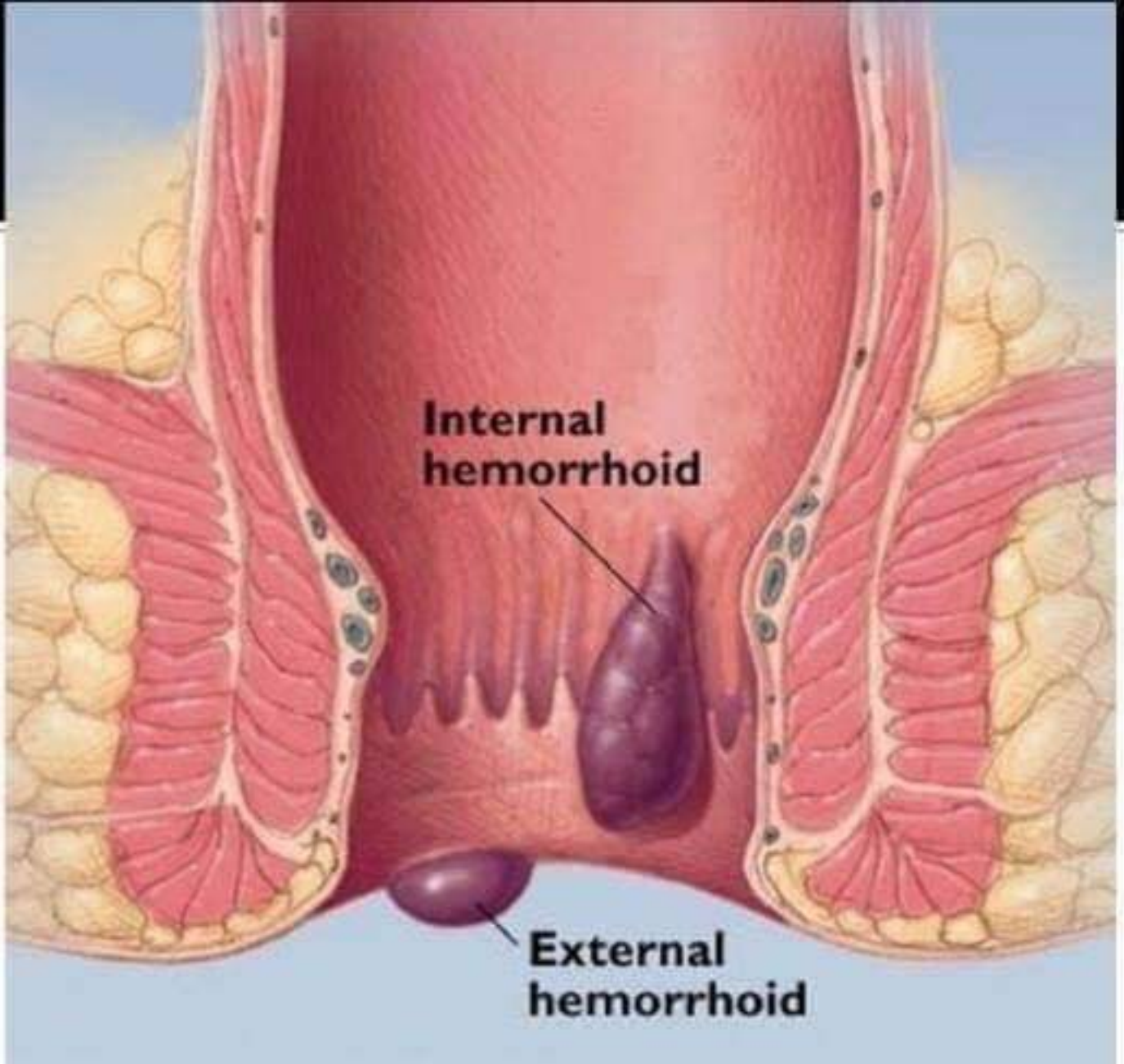
Hemorrhoids are enlarged veins located within tissues of the lower portion of the rectum or anus

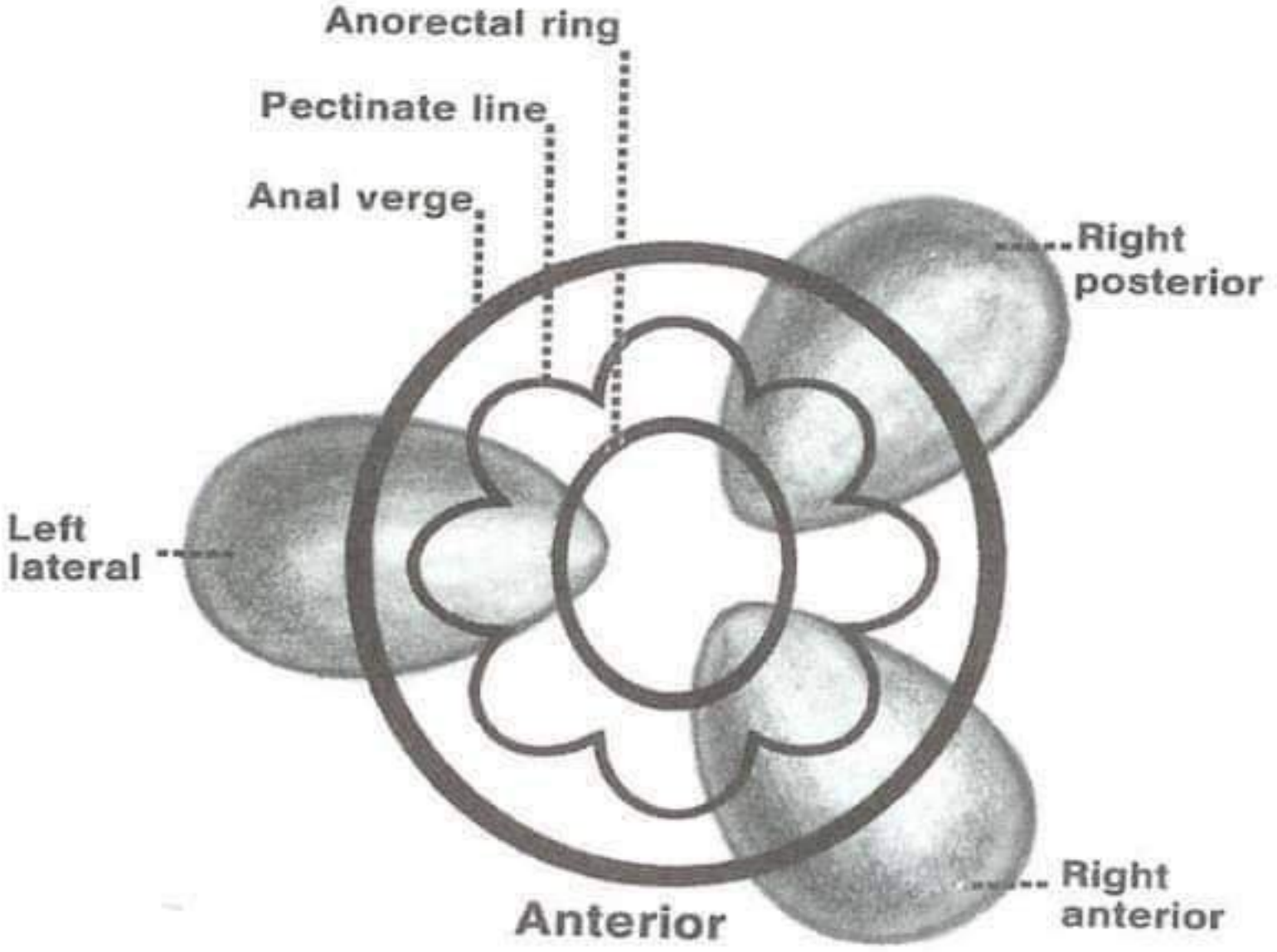
Frequency

- 10 million
- Peak ages: 45-65 years
- ½ of adults experience hemorrhoids by age 50
- Common among pregnant women
  - Temporary

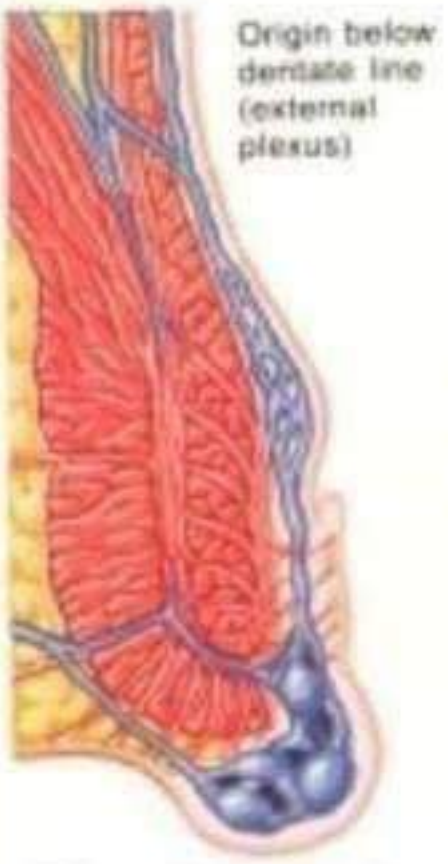
ANATOMY AND CLASSIFICATION

- Right anterior, Right posterior and Left lateral positions
- Those originating above the dentate line which are termed **internal**
- Those originating below the dentate line which are termed **external**

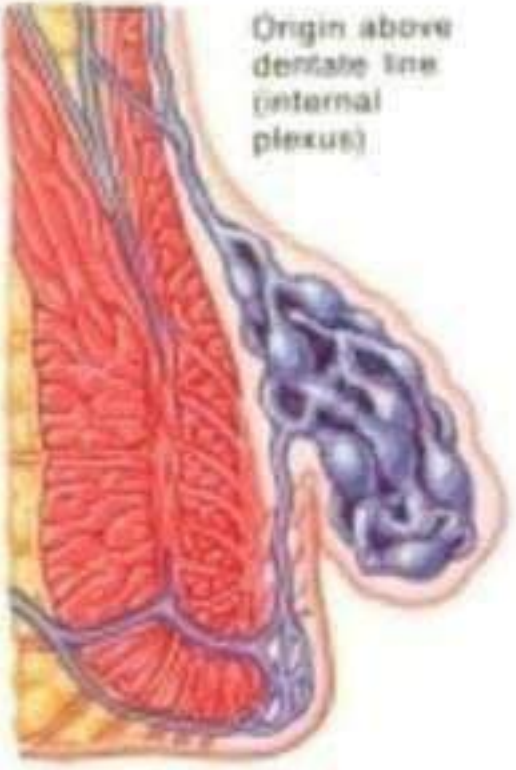

Internal
hemorrhoid
External
hemorrhoid


Anorectal ring
Pectinate line
Anal verge
Right posterior
Left lateral
Right anterior
Anterior

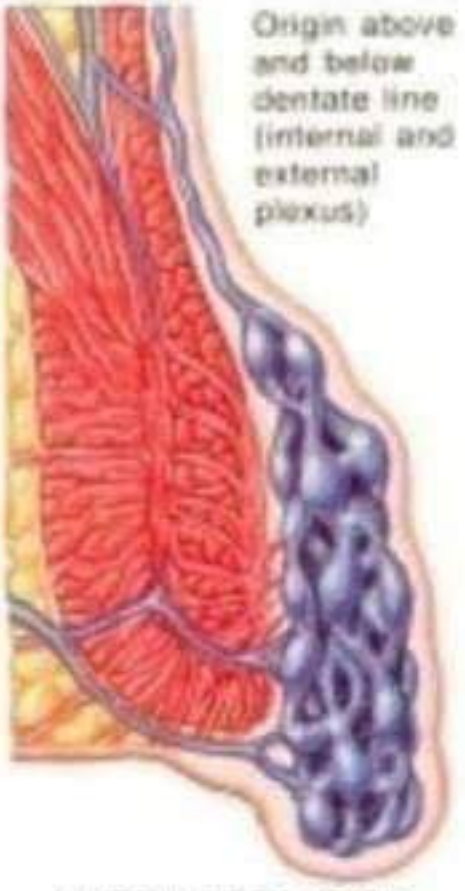
Types of hemorrhoids



External Hemorrhoid



Internal Hemorrhoid



Mixed Hemorrhoids

Internal Hemorrhoids

Internal Hemorrhoids Disease

- Manifested by two main symptoms
  - Painless Bleeding
  - Protrusion

  (*Pain is rare as they originate above dentate line*)
- Most popular etiologic theory states that Hemorrhoids result from **chronic straining** at defecation
- Continued straining causes **engorgement** and **bleeding**, as well as hemorrhoidal **prolapse**

Classification

Grades:

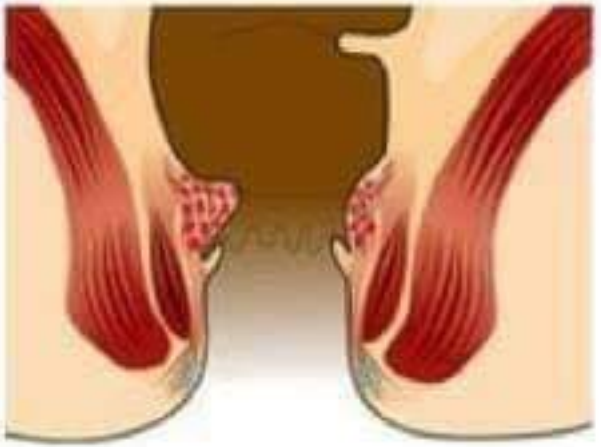
I.Hemorrhoids only bleed

II.Prolapse and reduce spontaneously

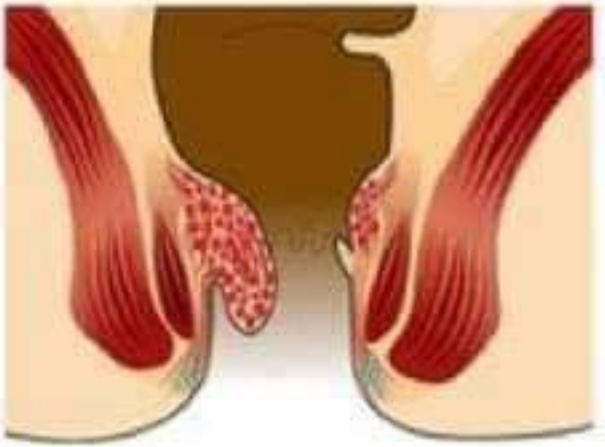
III- Require replacement

IV- Permanently Prolapsed

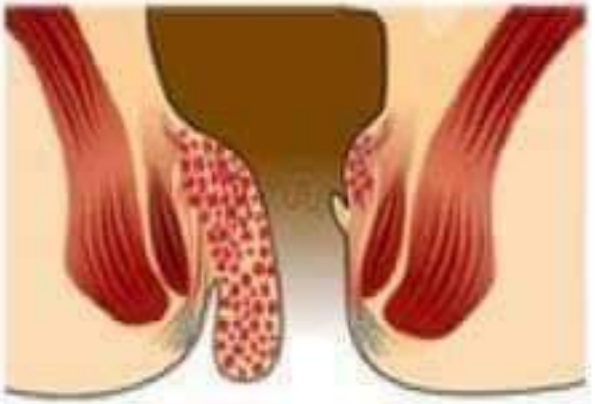
1st Degree: No Prolapse.
Just prominent blood vessels



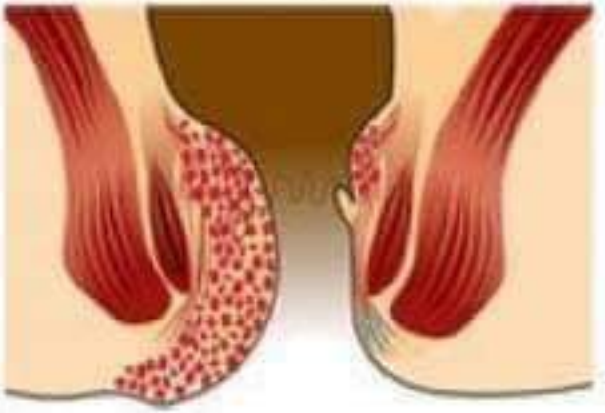
2nd Degree: Prolapse upon bearing down but spontaneously reduced.



3rd Degree: Prolapse upon bearing down and requires manual reduction.



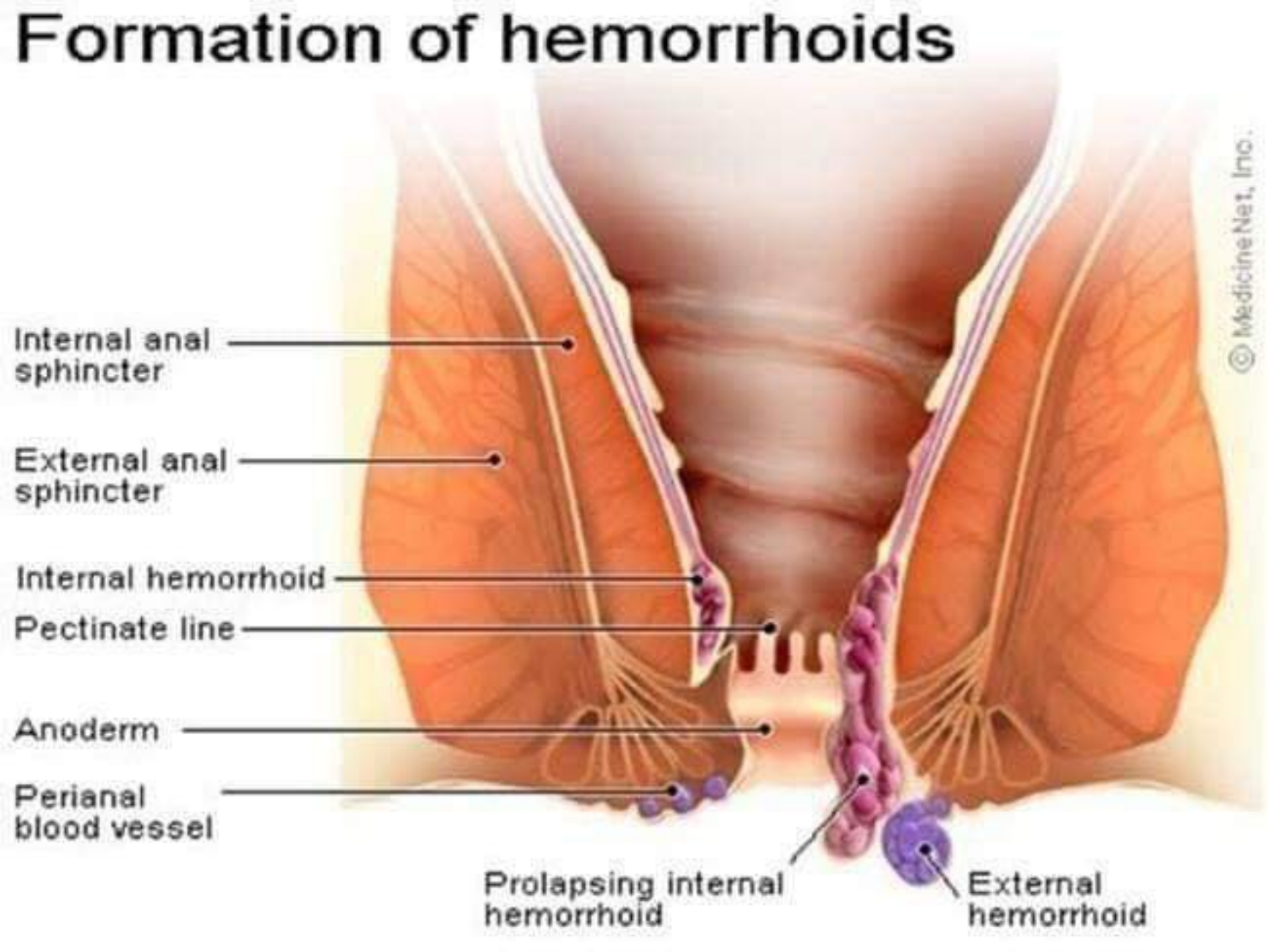
4th Degree: Prolapsed and cannot be manually reduced.



Causes

- Pressure
  - Constipation
  - Diarrhea
  - Sitting or standing for long periods of time
  - Obesity
  - Heavy Lifting
  - Pregnancy

Formation of hemorrhoids



Symptoms

- Rectal Bleeding
- Bright red blood in stool
  - Dripping in the toilet
  - On wiping after defecation
- Pain during bowel movements
- Anal Itching
- Rectal Prolapse (while walking, lifting weights)
- Thrombus
- Extreme pain, bleeding and occasionally signs of systemic illness in case of strangulation

External Hemorrhoids

- Asymptomatic
  - except when secondarythrombosed
- Thrombosis may result from defecatory straining or extreme physical activity or may be random event
- Patient presents with constant anal pain of acute onset
- Physical examination identifies external thrombosis as purple mass at anal verge
- **Management**

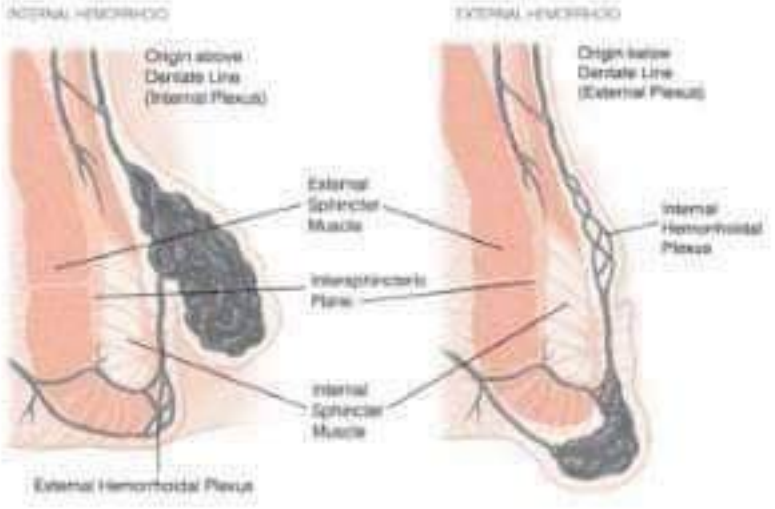
  -Depends on patients symptoms

  -In the first 24 – 72 hours after onset, pain increase and excision is warranted

  -After 72 hours, pain generally diminishes

Signs and Tests

- Rectal Examination
  - Visual
  - Digital
- Tests
  - Stool Guaiac(FOBT)
  - Sigmoidoscopy
  - Anaoscopy
  - Proctoscopy



Physical Examination

- Patients should be examined in the left lateral decubitus position (while asking the patient to bear down)
  - any rashes, condylomata, or eczematous lesions.
  - external sphincter function
  - Any abscesses, fissures or fistulae

- lubricated finger should be gently inserted into the anal canal
- the resting tone of the anal canal should be ascertained as well as the voluntary contraction of the puborectalis and external anal sphincter.

- masses should be noted as well as any areas of tenderness.

Referral

- Gastroenterologists
- Seek emergency care if :
  - large amounts of rectal bleeding
  - Lightheadedness
  - Weakness
  - Rapid HR < 100 BPM

Complications

- The blood in the enlarged veins may form clots and the tissue surrounding the hemorrhoids can die (Necrosis)
- This causes painful lumps in the anal area.
- Severe bleeding can occur causing iron deficiency anemia.

Treatments

- Varies from simple reassurance to operative hemorrhoidectomy.

- Treatments are classified into *three* categories:
  1) Dietary and lifestyle modification.
  2) Non operative / office procedures.
  3) Operative hemorrhoidectomy.

Dietary and Lifestyle Modifications

- The main goal of this treatment is to minimize straining at stool.
- Achieved by increasing fluid and fiber in the diet, recommending exercise, and perhaps adding fiber agents to the diet such as psyllium.
- If necessary, stool softeners may be added.
- ***"you don't defecate in the library so you shouldn't read in the bathroom".***

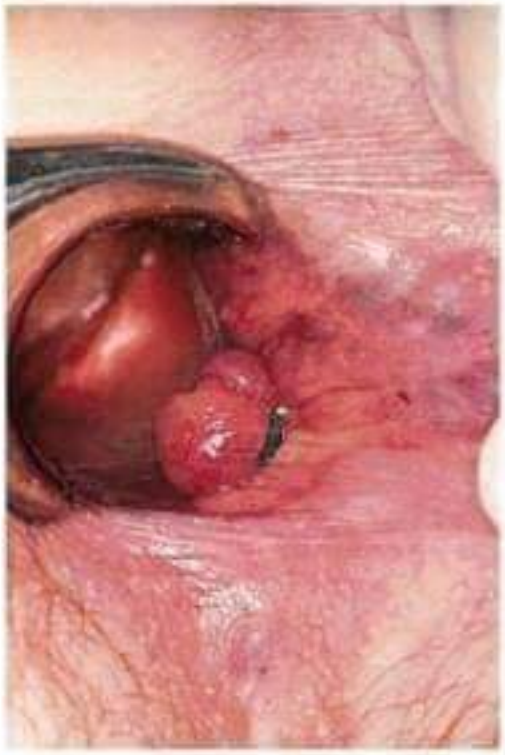
- Apply OTC cream or suppository containing hydrocortisone
- Keep anal area clean
- Apply warm wet compresses x 10min

- If prolapses, gently push back into anal canal
- Use a sitz bath with warm water
- Use moist towelettes or wet toilet paper instead of dry toilet paper.

Office Treatments

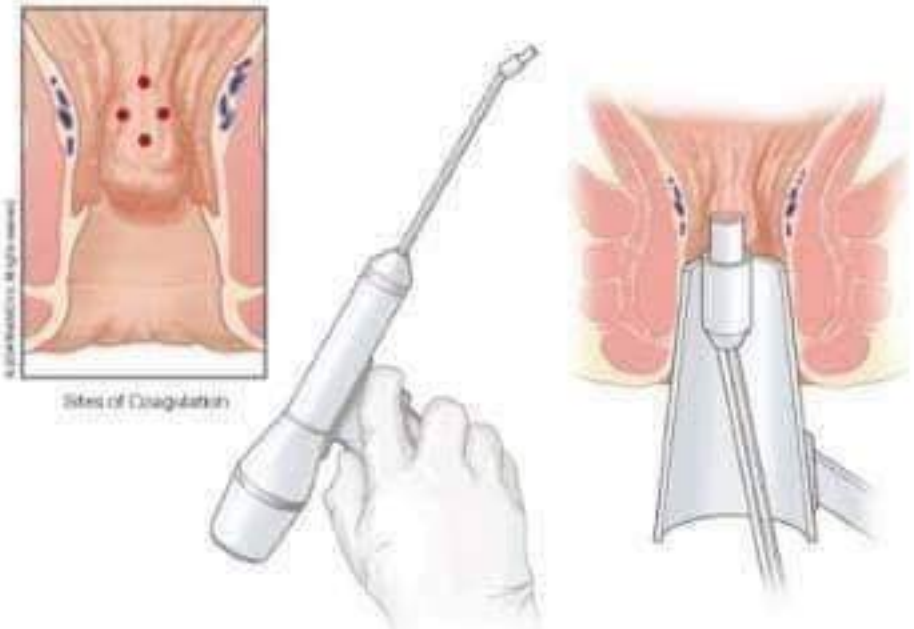
RUBBER BAND LIGATION

- Grade I or Grade II hemorrhoids and, in some circumstances, Grade III hemorrhoids.
- Complications include bleeding, pain, thrombosis and life threatening perianal sepsis.
- Successful in two thirds to three quarters of all individuals with first and second degree hemorrhoids.



Office Treatments
INFRARED COAGULATION

- Generates infrared radiation which coagulates tissue protein and evaporates water from cells.
- Most beneficial in Grade I and small Grade II hemorrhoids.



Office Treatments
SCLEROTHERAPY

- Injection of an irritating material into the sub mucosa in order to decrease vascularity and increase fibrosis.

- Injecting agents have traditionally been phenol in oil, sodium morrhuate, or quinine urea.

Office Treatments

- **Manual anal dilatation** was first described by Lord.

- **Cryotherapy** was used in the past with the belief that freezing the apex of the anal canal could result in decreased vascularity and fibrosis of the anal cushions.

Surgical Treatment of Hemorrhoids
HEMORRHOIDECTOMY

- The triangular shaped hemorrhoid is excised down to the underlying sphincter muscle.
- Wound can be closed or left open

- **Stapled** hemorrhoidectomy has been developed as an alternative to **Standard** hemorrhoidectomy

Prevention

- Eat high fiber diet
- Drink Plenty of Liquids
- Fiber Supplements
- Exercise
- Avoid long periods of standing or sitting
- Don't Strain
- Go as soon as you feel the urge