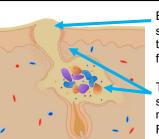


## **ADOLESCENT ACNE VULGARIS**



### **PATHOPHYSIOLOGY**

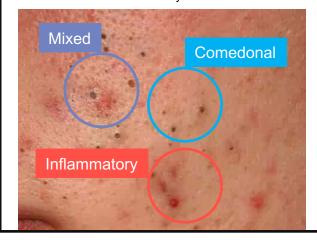


Exfoliated cells mix with sebum, causing obstruction of the pilosebaceous unit and formation of a comedone.

Trapped bacteria convert sebum to free fatty acids; neutrophils attracted to the FFA cause inflammation.

#### **DIAGNOSIS**

- Clinical diagnosis
- □ Differential Diagnosis → flat warts; steroid acne; folliculitis; keratosis pilaris
- Types include comedonal, inflammatory (papulopustular or nodulocystic), and mixed comedonal and inflammatory



#### **MANAGEMENT**

# Topical Agents

# 1) Benzoyl peroxide

(anti-inflammatory); inactivates some topical retinoids, so they should not be applied at the same time of day; may cause redness or irritation

- 2) Topical retinoids come in various strengths and formulations
- 3) Topical antibiotics (clindamycin 1% or erythromycin 2%) should be combined with benzoyl peroxide (5%)

## Systemic Agents

- Systemic antibiotics (ex. doxycycline); side effects include photosensitivity, pseudotumor cerebri, and GI upset
- 2) Systemic retinoids
  (ex. isotretinoin);
  multiple side effects
  including teratogenicity
  and skin drying; should
  be prescribed by those
  with experience;
  recommend including
  a water-based
  moisturizer to combat
  drying
- Hormonal therapy (combined OCP) is an option for females with acne that flares with menstrual cycles

### **Selecting Appropriate Therapy**

- Comedonal → topical retinoids alone usually sufficient to treat
- Inflammatory → anti-inflammatory medication in the morning with a topical retinoid in the evening
- Mixed comedonal and inflammatory → combined topical retinoids and anti-inflammatory medication

### **Course & Complications**

- Affect up to 85% of teenagers
- Not due to poor hygiene
- Avoid abrasive/irritating cleansing routine
- Consider the psychosocial impact, regardless of severity
- Post inflammatory hyperpigmentation can occur in all skin types, but may be more persistent/severe in darker skin
- Scarring is more easily prevented than treated, so treat early and appropriately
- Refer to a dermatologist if acne is not improving after 3mo of treatment

