

# Acne

## FAST FACTS

# 85%

of people aged 12 – 24  
suffer from acne

# 33%

of pediatric and adolescent  
patients have acne that  
persists into adulthood

# 33%

of patients in one survey  
acknowledged the presence  
of acne scars

# 51%

of girls with acne have  
depressive symptoms,  
compared to 32% of girls  
without acne

# 20%

of boys with acne have  
depressive symptoms,  
compared to 14% of boys  
without acne

Acne, one of the most common dermatologic conditions, is caused by inflammation of the pilosebaceous unit resulting from complex interplay between abnormal keratinization, hormonal influences, innate and acquired immunity, genetics and other environmental factors. Treatment is based on the type of acne and its severity.

## ASSESSMENT

Perform a standard health history and physical exam (HPE) with probing questions into family history of acne, prior treatments including OTC acne treatments, and menstrual history if female. Perform a full skin exam including face, chest, shoulders and back. Determine lesion type — comedonal versus inflammatory.

Determine severity, based on lesion type, number and size.

- **Mild** — characterized by plugging of the sebaceous gland
- **Moderate** — large number of inflammatory papules/pustules and small cystic nodules
- **Severe** — large numbers of noninflammatory and inflammatory lesions and cystic nodules

## HPE RED FLAGS

- Eruption between ages of 3 – 7 years
- Acne in the setting of irregular menses, hirsutism, androgenetic alopecia
- Signs of androgenization in a female
- Abrupt acne onset
- Treatment-resistant acne

## MANAGEMENT/TREATMENT

Manage acne based on the primary lesion type and severity.

### For mild and moderate cases:

All patients should be on topical retinoid therapy as shown

- **Topical retinoids** — adapalene 0.1% gel (OTC), tretinoin 0.025% cream, or tretinoin 0.01% gel
- **Antimicrobial and anti-inflammatory topicals** — benzoyl peroxide 2 – 5% wash/gel OR topical antibiotics such as clindamycin 0.01% lotion
- **Use topical antibiotics** in tandem with benzoyl peroxide to prevent resistance

### For moderate to severe cases:

- **Oral antibiotics** — doxycycline or minocycline, with doxycycline preferred. Maximum 3 month duration
- **Use hormonal therapy** with estrogen-containing combined oral contraceptives for female patients
- **Refer to dermatologist** for possible initiation of isotretinoin

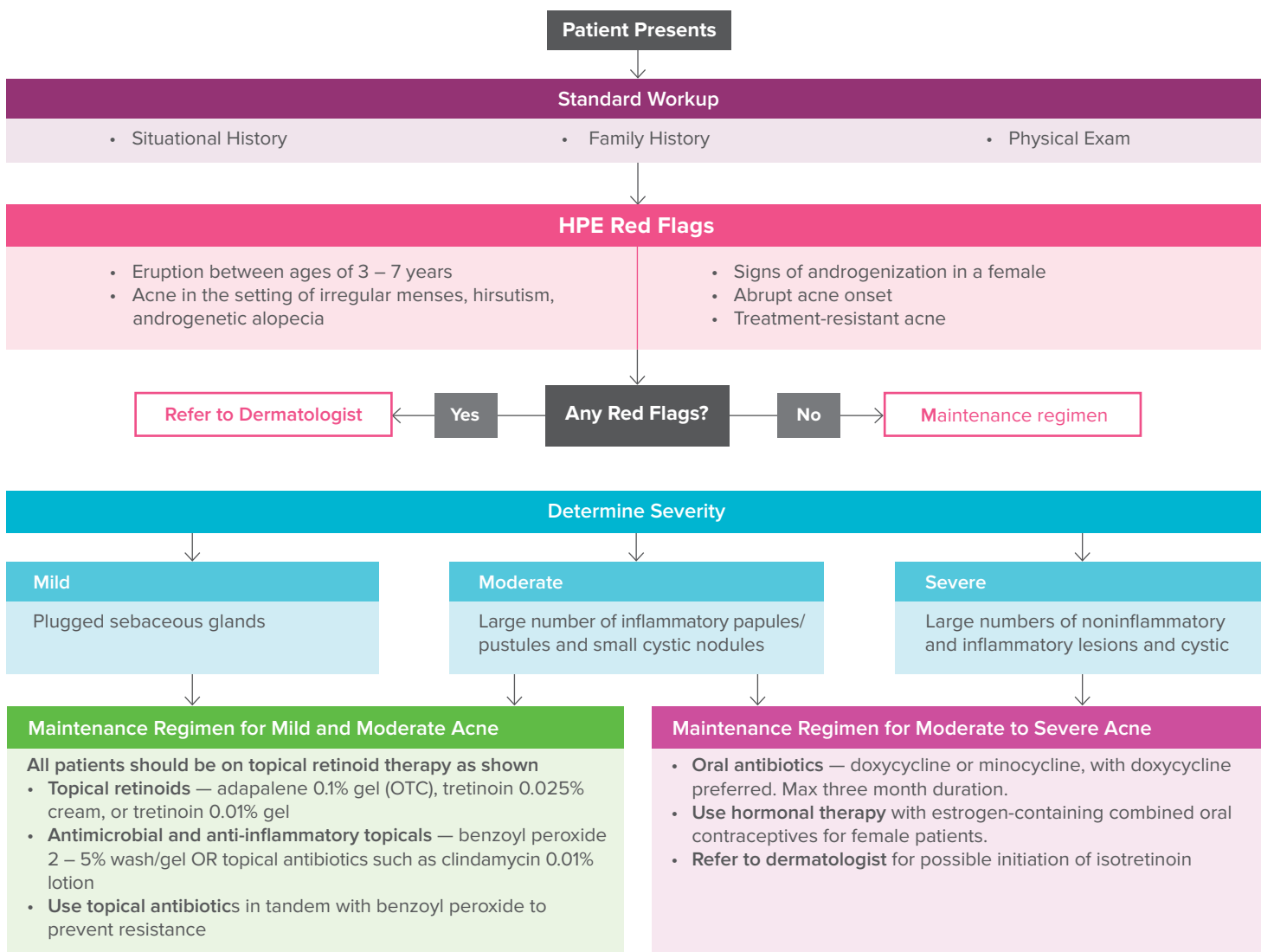
## WHEN TO REFER

Refer patients with mild to moderate acne who do not respond to topical therapy to Cincinnati Children's Dermatology for further evaluation and management. Refer any patient with moderate to severe acne for potential initiation of isotretinoin. Oral antibiotics can be initiated where appropriate while the patient is waiting for their Dermatology appointment. Refer patients aged 3 – 7 years with acne to Endocrinology in addition to Dermatology as this may be a sign of premature adrenarche. Before referral, treat mild acne with a retinoid and an anti-microbial/anti-inflammatory as described above.

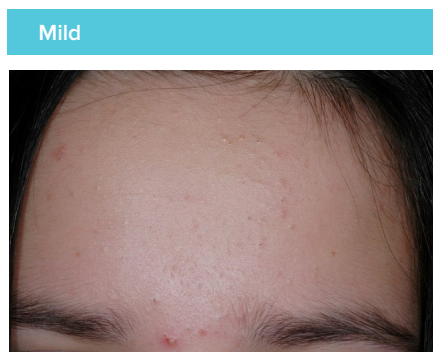
If you have clinical questions  
about patients with acne, email  
[dermatology@cchmc.org](mailto:dermatology@cchmc.org).

If you would like additional copies of this tool, or would like more information, please contact the Physician Outreach and Engagement team at Cincinnati Children's.

# Acne



## VISUAL REFERENCE TO ACNE SEVERITY



For urgent issues, or to speak with the specialist on call 24/7, call the Physician Priority Link at 1-888-636-7997.