Itchy perianal erythema

This young patient had a perianal rash that did not respond to topical clotrimazole. What is your diagnosis?

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A mother brought her 3½-year-old son into the office for a worsening rash in the perianal area (**FIGURE 1**). Mother and child had been in the office 2 weeks earlier for the rash, and the physician had prescribed topical clotrimazole cream for a presumed case of *Candida* infection. Despite using the cream as directed, the child's rash worsened.

The child's mother told the treating physician (SS) that his rash was painful and itchy. She also said he'd had a few blood-streaked stools.

The little boy had no significant medical history and was not taking any medications. The child otherwise felt well and was afebrile. An examination revealed sharply demarcated, bright red perianal erythema. The rash was moist, with a slight mucoid discharge. The area was not tender on palpation. The remainder of the little boy's physical examination was unremarkable.

- **What is your diagnosis?**
- **How would you manage this condition?**

FAST TRACK

The rash was moist, with a slight mucoid discharge

FIGURE 1

Perianal rash

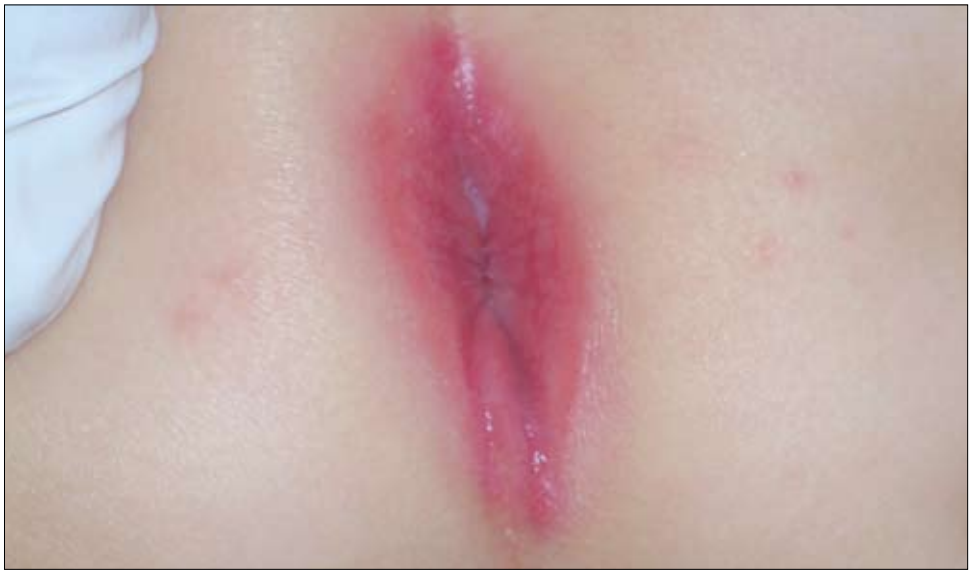

PHOTO BY SAPNA SHETH, DO

This 3½-year-old boy had itchy perianal erythema that did not respond to topical clotrimazole cream.

FAST TRACK

Patients are often initially misdiagnosed and come back to the office when topical steroids or antifungals don't work

Diagnosis: Perianal streptococcal dermatitis

A rapid strep test of the perianal lesion was positive, confirming the diagnosis of perianal streptococcal dermatitis (**FIGURE 2**). Perianal streptococcal dermatitis typically presents as a bright red, moist, sharply demarcated perianal rash. Itching, rectal pain, and blood-streaked stools are common.

Mucoid or serosanguinous oozing from the affected area can also occur. Less commonly, a patient may have perianal swelling, tenesmus, constipation, and anal fissures. Patients with perianal streptococcal dermatitis are afebrile and show no systemic signs of infection.

A common condition in children

Perianal streptococcal dermatitis occurs mostly in children between 6 months and 10 years of age, although cases in adults have been reported.[1] The incidence in pediatric practices ranges from 1 in 200 to 1 in 2000, with a male to female ratio between 2:1 and 3:1.[1] Transmission to family members and contacts in daycare settings have been reported.[1,2]

The culprit? Group A strep

Group A beta-hemolytic streptococcus (GABHS) is the culprit with this form of dermatitis. While the condition was once referred to as "perianal cellulitis," the indolent nature of the infection and the related itching lent support to the more common description of perianal streptococcal dermatitis.

Up to 92% of the cases of perianal streptococcal dermatitis involve positive pharyngeal cultures for GABHS, even in the absence of pharyngeal symptoms.[3] This lends support to the theory that auto-inoculation is the cause for perianal or perineal disease.[1] Asymptomatic perineal carriage of GABHS is rare in healthy people, but has been found in 6% of children with streptococcal pharyngitis.[1]

Rarely, group B or G beta-hemolytic streptococcus or *Staphylococcus aureus* is identified by culture as the cause of disease.

A condition that's easy to mistake for candidiasis

The differential diagnosis of perianal streptococcal dermatitis includes candidiasis, diaper dermatitis, irritant dermatitis (such as trauma from heavy wiping), atopic dermatitis, allergic contact dermatitis, seborrheic dermatitis, pinworm infection, cellulitis, psoriasis, inflammatory bowel disease, histiocytosis, and sexual abuse. Patients are often initially misdiagnosed and come back to the office when treatment with topical steroids, topical antifungals, or oral regimens for pinworm infection fail.

Suspect perianal streptococcal dermatitis when the patient presents with a well-dermarcated, moist, bright red perianal rash with no satellite lesions. Also, consider this diagnosis when a perianal rash fails to respond to initial treatment as expected.

A rapid strep test or culture of the affected region helps to confirm perianal streptococcal dermatitis caused by GABHS.

Penicillin provides prompt improvement

Penicillin V or amoxicillin (40 mg/kg/day divided into 3 oral doses daily) for 10 days is effective as a first-line treatment for perianal streptococcal dermatitis (strength of recommendation [SOR]: **C**).[4]

The amoxicillin suspension tastes better than the penicillin suspension, which may lead to better compliance in children.[5]

Topical mupirocin (Bactroban) 2% applied 3 times daily may also be effective. If a patient is allergic to penicillin, you may want to consider the macrolides (erythromycin, azithromycin, clarithromycin) or clindamycin.[1]

Once the patient takes his or her medication, clinical improvement is prompt; it often occurs within 24 hours.

Relapse is common. Clinical follow-up is indicated as relapse occurs in up to

FIGURE 2

Rapid stress tests for the pharyngeal and perianal areas

The patient's pharyngeal swab (upper) was negative. The perianal swab (lower) was positive.

39% of cases.[6] Relapses usually respond to repeat courses with the same antibiotic. A prolonged treatment course (14 to 21 days) may increase cure rates in patients with relapse.[1]

No relapse for our young patient

Our young patient received a 10-day course of amoxicillin and his case of perianal streptococcal dermatitis resolved. He did not have a relapse. ■

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Disclosure

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