## Pruritus Ani Caused by Beta-Haemolytic Streptococci

Sir

Pruritus ani is a troublesome and often uncurable condition affecting middle-aged men more often than females, with a 4 to 1 ratio (1). A number of diverse aetiological factors have been implicated (2-4). In childhood, infection with betahaemolytic streptococci group A can cause pruritus ani or perianal cellulitis with erythema, irritation and pruritus, so-called perianal streps (5-7). In children cure is usually obtained by orally administered penicillin or erythromycin for 10–14 days (5–7). In adults the course is prolonged, sometimes lifelong. Some believe that faecal contamination is the basic cause (8). As faecal contact with the area is inevitable, such a view supports an attitude of defeatism and abandonment which is common among therapists. Among newer textbooks of dermatology only one (1) mentions streptococcal infection in adults as one among many other causes of the itch. To the best of our knowledge no studies have focused on pruritus ani associated with beta-haemolytic streptococci.

## MATERIALS AND METHODS

Within 12 months 19 patients, 16 males (mean age 41.5 years, range 27–71 years) and 3 females (mean age 33.5 years, range 30–36 years), were referred because of long-standing severe pruritus ani (mean duration = 6 years, range 1–20 years). In all, bacterial swabs revealed significant growth of beta-haemolytic streptococci in the perianal area. Beta-haemolytic streptococci group G were found in 11 (58%) patients and beta-haemolytic streptococci group B were detected in 8 (42%). In addition 4 (21%) patients had significant growth of S. aureus, and in one patient both Staphylococcus aureus and Haemophilus influenzae were cultured. None of the patients had streptococci in throat-swabs or swabs from the nose. Clinical examination revealed erythema in the perianal area extending to crena with slight oedema and various degrees of maceration, scaling and lichenification. Allergic contact dermatitis, mycotic infection and threadworm infestation were excluded. In 2 patients skin biopsy was performed to exclude psoriasis and lichen selerosus. The histologic diagnosis was that of acute or subacute dermatitis.

Oral penicillin V 2–6 million units daily for 1–2 weeks could reduce the pruritus transiently, but it recurred within 1–2 weeks, and haemolytic streptococci were cultured again. To eradicate concomitant presence of *S. aureus* a combination of oral penicillin V 1 million units and dicloxacillin 0.5 g three times daily was administered for 2 weeks, with the dose regimen repeated after 2 weeks, which resulted in permanent cure in 2 (18%) of 11 patients so treated (Table I). Enterosoluble erythromycin tablets 0.5 g twice daily for 2 weeks proved curative in 3 (43%) of 7 patients treated, whereas oral clindamycin 300 mg thrice daily for 7 days cured 3 (33%) of 10 patients. High-dose penicillin G 5 million units given by the intravenous route twice daily for 7 days in combination with oral vancomycin 1 g twice daily was tried in 2 patients without any effect. In all, the various antibiotic treatments totally eliminated signs and symptoms in 8 (42%) of the 19 patients. In the rest there was temporary relief or reduction of the itch and the eczematous changes.

One hundred-and-fourteen consecutive patients attending our STD-clinic for routine examination constituted a control group. All had bacterial swabs taken from the perianal region. Two patients (2%) without pruritus ani had beta-haemolytic, one group G and one group B. In addition various gram-negative bacteria, normally present in the region, were cultured.

Table I. Different antibiotic dose regimens given to 19 patients with long-standing pruritus ani associated with beta-haemolytic streptococcal infection

Treatment	No. of patients treated	Cure rate
Penicillin V	19	0/19 (0%)
Penicillin V + Dicloxacillin*	11	2/11 (18%)
Erythromycin*	7	3/7 (43%)
Clindamycin*	10	3/10 (30%)
Penicillin G+ Vancomycin*	2	0/2 (0%)

<sup>\*</sup> Additional topical treatment with betamethasone in combination with fucidin (Fucicort creme®) twice daily.

## DISCUSSION

An optimal treatment of anal streptococci in adults, which seem to play an important causative role in pruritus ani, remains to be defined. Our preliminary data suggest that oral therapy with erythromycin, clindamycin or a combination of penicillin V and dicloxacillin is effective in some patients. Pruritus ani, is an inaccurate diagnosis, no better than "sore throat" or "abdominal pain". It is a symptom, not a true diagnosis, and efforts should therefore concentrate on disclosing and eliminating its cause instead of describing its effects.

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