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## Cutaneous Sarcoidosis of the Scrotum: A Rare Manifestation of Systemic Disease

Susan S. McLaughlin, Allison M. Linquist, and Joseph W. Burnett

Department of Dermatology, University of Maryland School of Medicine, 405 West Redwood St., 6th Floor, Baltimore, MD 21201, USA. E-mail: ssmclaugh@hotmail.com

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Sir,

Sarcoidosis is a systemic granulomatous disease of unknown etiology that can affect various organs, such as the skin, lungs, heart, and eyes, as well as the lymph nodes. Although cutaneous findings in sarcoidosis may occur at any stage in the disease, they usually occur at the onset of disease. Skin lesions are present in up to 37% of patients (1). Cutaneous sarcoidosis is classified as specific (caused by non-caseating granulomas infiltrating the skin) and non-specific or reactive (such as erythema nodosum) (1). Although any part of the cutaneous surface may be involved, reports of genital sarcoidosis are rare. We describe an unusual case of cutaneous sarcoidosis involving the scrotum and penis.

### CASE REPORT

A 37-year-old African American male presented with a 3-month history of an extensive, pruritic, eczematous eruption of the scrotum, with associated edema and tenderness. Clusters of dark papules and plaques had developed on his face one month previously. The patient described having recent fevers, intermittent nausea and vomiting, difficulty urinating, and occasional wheezing but denied persistent shortness of breath. He had no family history of sarcoidosis.

Physical examination revealed an obese, hoarse man with multiple pink-to-violaceous annular papules and plaques on the face (lupus pernio), neck, arms, gluteal cleft, penis, and scrotum. No oral lesions were noted. Shotty, inguinal lymphadenopathy was noted bilaterally. The scrotum was massively enlarged, to approximately 18 cm in diameter, diffusely tender, and lichenified (Fig. 1). The penis was twice normal size and diffusely edematous.

Massive thickening of the scrotal wall was detected on ultrasound examination of the scrotum. The testes, epididymis, and blood vessels were normal. Mediastinal and hilar lymphadenopathy was evident on chest

roentgenogram. Results of pulmonary function tests were not available. No abdominal or pelvic lymphadenopathy was detected by computed tomography scan of the abdomen and pelvis. Direct laryngoscopic examination revealed nodular laryngeal and subglottal involvement. The serum angiotensin-converting enzyme level was elevated at 98 U/l (normal range, 20–60 U/l). A complete blood count, liver function panel, blood urea nitrogen, creatinine, and serum calcium and protein levels were all normal.



Fig. 1. Lichenified pink-to-violaceous papules and plaques cover the massively enlarged scrotum, which showed no improvement after a course of oral prednisone.

roentgenogram. Results of pulmonary function tests were not available. No abdominal or pelvic lymphadenopathy was detected by computed tomography scan of the abdomen and pelvis. Direct laryngoscopic examination revealed nodular laryngeal and subglottal involvement. The serum angiotensin-converting enzyme level was elevated at 98 U/l (normal range, 20–60 U/l). A complete blood count, liver function panel, blood urea nitrogen, creatinine, and serum calcium and protein levels were all normal.

Examination of biopsy specimens from the cheek and scrotum revealed non-caseating epithelioid tubercles surrounded by a sparse lymphocytic infiltrate. The cheek specimen contained granulomas only in the upper dermis, while granulomas with surrounding fibrosis extended into the reticular dermis in the scrotal specimen. There was no evidence of lymphedema in the scrotal specimen. Staining for acid-fast bacilli and PAS staining for fungi were negative. No foreign bodies were detected by polarizing light.

Therapy was initiated with topical fluocinonide 0.05% cream applied three times daily, oral prednisone at 60 mg/day, and a scrotal sling. Unfortunately, the patient did not return to the clinic for his scheduled follow-up appointment. When the patient reappeared 2 months later, his scrotum was markedly more edematous than on his initial examination, and his facial lesions were unchanged. The patient's non-compliance with therapy contributed to the additional scarring of the scrotum, which was evident on his follow-up physical examination. Oral prednisone at 60 mg/day was restarted, with a plan to re-evaluate the patient in 2 weeks. We considered further treatment with higher doses of prednisone, methotrexate, antimalarial agents, minocycline, or other immunosuppressants, but the patient was subsequently lost to follow-up.

## DISCUSSION

Although the exact etiology of sarcoidosis remains unknown, data suggest that it arises in genetically predisposed individuals who have been exposed to a variety of environmental antigens. For example, *Mycobacterium tuberculosis* and atypical mycobacterium species have been isolated from skin and blood samples of patients with sarcoidosis, leading to the hypothesis that the disease might be an extreme form of tuberculosis (1). Human herpesvirus 8 (HHV-8) DNA has also been

detected in tissue samples from the lungs, lymph nodes, oral mucosa, and skin of patients with sarcoidosis, suggesting another possible infectious factor (2). Other researchers did not find serologic evidence of HHV-8 in patients with sarcoidosis (3). Proof of an infectious cause remains a subject of active investigation (4).

Although previous case reports describe sarcoidosis presenting as testicular or epididymal masses without cutaneous lesions (5–8), we believe that this case represents the first case report of cutaneous scrotal and penile lesions as one of the presenting signs of systemic sarcoidosis. Sarcoidosis originating as a scrotal mass limited to the tunics has been reported (5). In this case, a 5-year-old boy presented with fever and an intrascrotal mass extending through all the tunics, but with no skin lesions and no testicular involvement. Our case demonstrates that gross enlargement of the scrotum and penis resembling anasarca can result from the infiltration of sarcoidal granulomas in the skin without any sarcoidal lymph node involvement.

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## Erythema Multiforme-like Molluscum Dermatitis

Hyun-Jeong Lee, Ji-Ae Kwon, and Jin-Wou Kim\*

Department of Dermatology, College of Medicine, St. Paul's Hospital, The Catholic University of Korea, 620-56 Jumong 2-dong, Dongdaemun-ku, Seoul, 130-709, Korea. \*E-mail: paulderma@yahoo.co.kr

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Sir,

Classical molluscum contagiosum (MC) has the clinical appearance of a smooth-surfaced and pearly papule with central umbilication. In at least 10% of cases, particularly in atopic subjects, a patchy eczema, often very irritative, develops around one or more of the lesions a month or more after the onset of MC (1). Sporadic cases of this

molluscum dermatitis with atypical presentation have been reported (2, 3). Here, we describe a case of MC presenting as severe, erythema multiforme-like, targetoid eczema in a patient with atopic dermatitis.

## CASE REPORT

A 7-year-old boy presented with pruritic targetoid eczema on the lower extremities (Fig. 1). Scattered

\*Author for correspondence