

Herpetic Infection on the Vulva Associated with Eccrine Squamous Syringometaplasia in Malignant Lymphoma

Sir,
Herpetic infection of the eccrine duct has been described as a rare manifestation of herpes virus infection in patients with immunodeficiency. The association of herpetic infection with

eccrine squamous syringometaplasia (ESS) has been reported in patients with AIDS (1). We present here a case of herpetic infection associated with ESS in a patient with malignant lymphoma.



Fig. 1. Multiple painful, erosive erythematous patches developed on the vulva within 1 week.

CASE REPORT

A 45-year-old Korean woman with malignant lymphoma presented with multiple painful, erosive erythematous patches on the vulva (Fig. 1). The skin lesions had developed with multiple vesicles 7 days previously and the vesicles were eroded. The patient had been treated with chemotherapy for malignant lymphoma and had undergone radiotherapy to the lower abdomen for vaginal recurrence. Fresh vesicles showed early cytological changes in the squamous epithelium. Peripheral condensation of the nucleus combined with pale, swollen cytoplasm and acantholytic multinucleated epidermal giant cells were observed. There was a dense inflammatory cell infiltrate in the dermis. There was extensive squamous syringometaplasia in the straight portions of the eccrine duct. Occasional acantholytic necrotic cells were observed in the squamous epithelium (Fig. 2). We performed a PCR with paraffin-embedded tissue sections in order to confirm herpes virus infection. This was positive to common herpes virus DNA primer (2). The skin lesion improved spontaneously in 2 weeks. Three weeks later, the patient died due to respiratory failure.

DISCUSSION

ESS is defined as the transformation of the normal epithelium of the eccrine duct into squamous epithelial cells similar to the stratum spinosum of the epidermis. It has been described in association with chronic cutaneous ulcers and scars (3, 4), keratoacanthoma (4), squamous cell

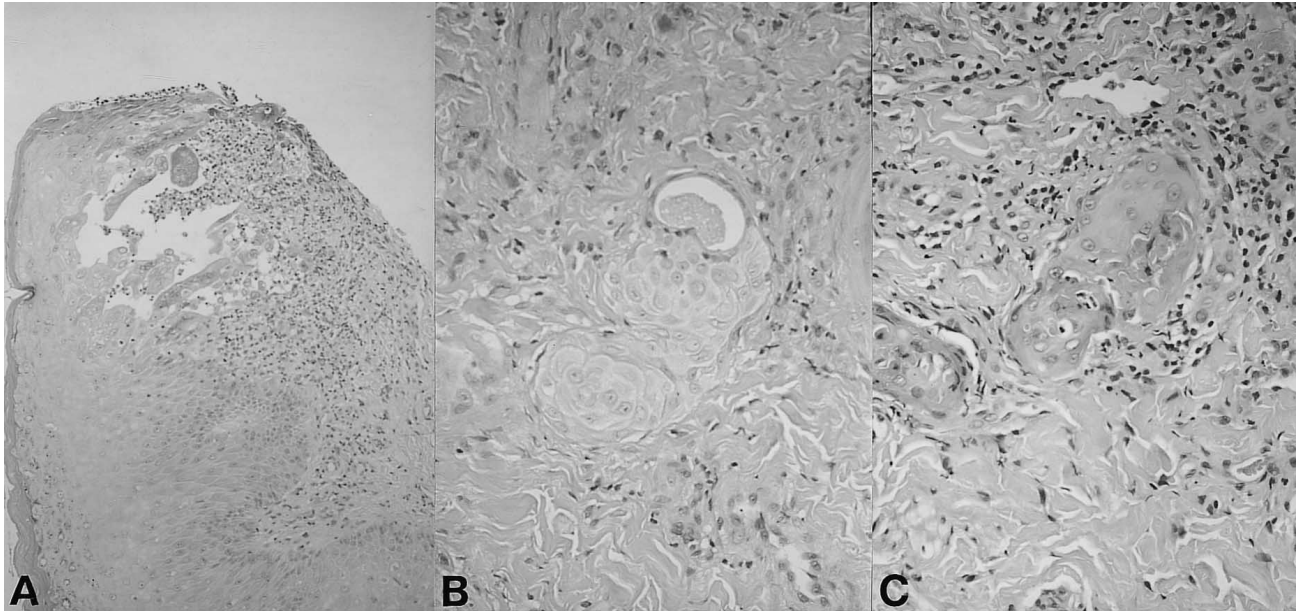


Fig. 2. (A) Herpes virus vesicle (haematoxylin-eosin stain; original magnification $\times 100$). (B) Extensive squamous syringometaplasia (haematoxylin-eosin stain; original magnification $\times 200$). (C) Eccrine duct with squamous syringometaplasia; acantholytic necrotic cells in the metaplastic epithelium (haematoxylin-eosin stain; original magnification $\times 200$).

carcinoma (4), lobular panniculitis (5), pyoderma gangrenosum (5), benoxaprofen ingestion (6) and in patients undergoing chemotherapy (7). However, only 3 HIV positive patients have been reported to have ESS in association with herpetic infection (1). To our knowledge, this is the first case report of herpetic infection associated with ESS in a patient with malignant lymphoma.

The clinical presentation of chemotherapy-induced ESS is characterized by asymptomatic erythematous papules, plaques or vesicles, usually on the axilla, groin, palms, soles or extremities. The onset of the eruption occurs in a median of 12.5 days after the initiation of chemotherapy, with a range of 2–39 days. The eruption resolves spontaneously without scarring in 7–10 days (7). The clinical presentation of our patient was inconsistent with chemotherapy-induced ESS. The patient complained of painful, erosive patches on the vulva that developed 4 months after stopping chemotherapy.

Herpetic infection, the involvement of the eccrine epithelium by herpes virus infection, has been described in 4 previous reports (1, 8–10). However, an association with ESS has been presented in only 1 report in 3 AIDS patients (1). The reason why herpetic infection with eccrine duct involvement is only seen in immunocompromised patients is not known. It is proposed that the immunodeficient state induces a change in the eccrine secretion, and may permit the progression of the viral infection from the epidermis into the ducts of the eccrine sweat gland (1). Although the direct stimuli for squamous metaplasia of the eccrine gland have not been specifically identified, it seems likely that squamous metaplasia occurred as a response to necrosis of the eccrine gland epithelium by herpes virus infection, which may occur in immunocompromised patient (1).

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Accepted April 15, 1999.

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