

of the cases of preterm EG in the literature involve the face. This characteristic formed the basis for the term *noma neonatorum*, coined by Ghosal et al.⁵ because of the clinical similarity between this type of EG and noma (cancrum oris),^{6,7} a disease that is predominantly caused by *Fusobacterium necrophorum* and *Prevotella intermedia*^{8,9} and described in children aged 2 years and older and adults living in unsanitary conditions. Freeman et al.¹⁰ later included these cases of *noma neonatorum* in the description of EG because of their common etiologic pathogen, *Paeruginosa*, which is practically inexistent in classic noma.

The diagnosis of EG, while mainly clinical, must be confirmed by cultures taken from the lesions and, in most cases, a *Paeruginosa*-positive blood culture. These analyses allow EG to be distinguished from other types of lesions in the differential diagnosis, such as deep mycosis or lesions caused by anaerobic pathogens. The main goal of treatment is to resolve the underlying bacteremia, which affects prognosis, and should include synergistic antibiotics generally consisting of an aminoglycoside and an antipseudomonal β -lactam. The lesion should be treated with topical antibiotics and mechanical or chemical debridement.

In conclusion, EG must be included in the differential diagnosis of ulcerous lesions in preterm patients, especially in cases with associated neutropenia, bearing in mind the tendency for these lesions to appear on the face. Rapid identification can allow for early and adequate antibiotic treatment and reduce the high mortality associated with *Paeruginosa* sepsis, especially in lesions that appear days before clinical sepsis as described in the first of these 2 patients.

References

1. Reich HL, Williams Fadeyi D, Naik NS, Honing PJ, Yan AC. Nonpseudomonal ecthyma gangrenosum. *J Am Acad Dermatol*. 2004;50:S114-7.
 2. Versapuech J, Léauté-Labrèze C, Thedenat B, Taieb A, Ragnaud JM. Ecthyma gangréneux à *Pseudomonas aeruginosa* sans septicémie chez une patiente neutropénique. *Rev Med Interne*. 2001;22:877-80.
 3. Rhody C. Bacterial infections of skin. *Prim Care*. 2000;27:459-73.
 4. Funk E, Ivan D, Gillenwater AM. Ecthyma gangrenosum: an unusual cutaneous manifestation of the head and neck. *Arch Otolaryngol Head Neck Surg*. 2009;135:818-20.
 5. Ghosal SP, Sen Gupta PC, Mukherjee AK, Choudhury M, Dutta N, Sarkar AK. *Noma neonatorum*: Its aetiopathogenesis. *Lancet*. 1978;2:289-91.
 6. Tempest MN. Cancrum oris. *Br J Surg*. 1966;53:949-69.
 7. Atiyeh BS, Hashim HA, Rubeiz MT, Hamdan AM, Bitar FF, Serhal HM. Necrotising infection of the orofacial tissues in neonates (*noma neonatorum*). Case report. *Scand J Plast Reconstr Surg Hand Surg*. 1998;32:343-5.
 8. Paster BJ, Falkler WA, Enwonwu CO, Idigbe EO, Savage KO, Levanos VA, et al. Prevalent bacterial species and novel phenotypes in advanced *noma* lesions. *J Clin Microbiol*. 2002;40:2187-91.
 9. Enwonwu CO, Falkler WA, Idigbe EO. Oro-facial gangrene (*noma/cancrum oris*): pathogenetic mechanisms. *Crit Rev Oral Biol Med*. 2000;11:159-71.
 10. Freeman AF, Mancini AJ, Yogev R. Is *noma neonatorum* a presentation of *ecthyma gangrenosum* in the newborn? *Pediatr Infect Dis J*. 2002;21:83-5.
- M.M. Serrano-Martín,^a J. del Boz,^{b,*} M. Chaffanel-Peláez,^a A. Vera-Casaño^c
- ^a *Servicio de Neonatología, Hospital Regional Universitario Carlos Haya, Málaga, Spain*
^b *Servicio de Dermatología, Hospital Costa del Sol, Marbella, Málaga, Spain*
^c *Servicio de Dermatología, Hospital Regional Universitario Carlos Haya, Málaga, Spain*
- * Corresponding author.
E-mail address: mmarser@live.com (J. del Boz).

Cutaneous CD8+ T-cell Infiltrates Associated With Human Immunodeficiency Virus[☆]

Infiltración cutánea por linfocitos T CD8+ asociada a virus de la inmunodeficiencia humana

To the Editor:

Inflammatory skin diseases are common in patients infected by the human immunodeficiency virus (HIV), especially

in those who are severely immunocompromised. In addition, there is a marked association between inflammatory skin diseases and aggressive lymphomas, particularly in cases of extranodal disease. Although most cases with this association are B-cell lymphomas, the most common primary cutaneous lymphomas are cutaneous T-cell tumors.

A 60-year-old man with mild chronic obstructive pulmonary disease for which he occasionally used an inhaler presented with intensely pruritic skin lesions on exposed areas that had first appeared 8 months previously. He also reported generalized hair loss, weight loss, and a sensation of unmeasured temperature variability. Physical examination revealed generalized lichenified and erythematous plaques, together with alopecia universalis and signs of inflammatory infiltration on the face, especially above the eyebrows, giving him a leonine appearance (Fig. 1). Palmo-plantar involvement, lymphadenopathy, and visceromegaly were not observed.

[☆] Please cite this article as: Fernández-Morano T, Aguilar-Bernier M, del Boz J, Fúnez-Liébana R. Infiltración cutánea por linfocitos T CD8+ asociada a virus de la inmunodeficiencia humana. *Actas Dermosifiliogr*. 2012;103:638-640.

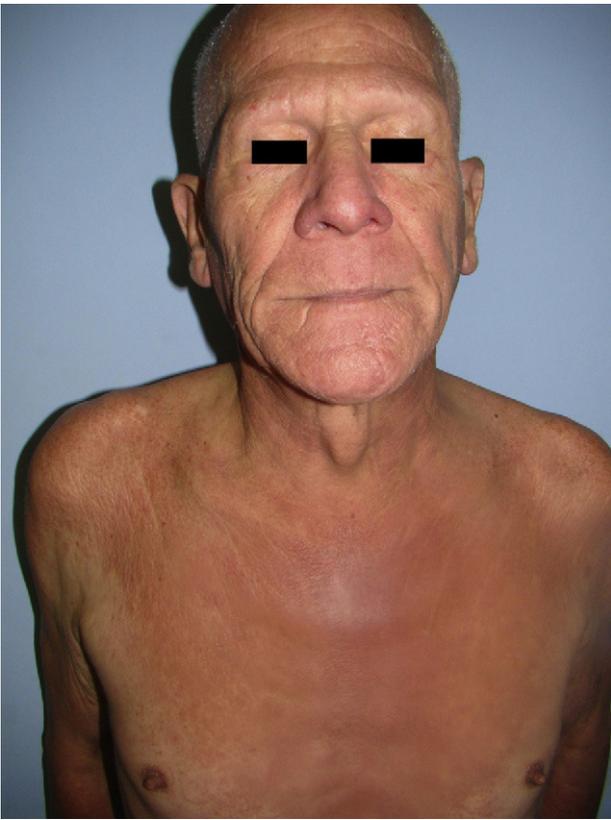


Figure 1 Alopecia universalis and infiltration on the face, especially above the eyebrows, giving the patient a leonine appearance.

At low-magnification biopsy specimens taken from lesions on the scalp and upper right arm revealed a moderate perivascular inflammatory infiltrate in the superficial dermis, with focal involvement of the epidermis and hair follicles. Increased magnification revealed that the superficial dermal inflammatory infiltrate was composed of lymphocytes with enlarged, irregular nuclei and involving points of mild epidermal spongiosis. Immunohistochemical staining with anti-CD3 revealed mainly CD8 positivity and scant CD4⁺ cells. Staining for CD30 was negative (Fig. 2). Testing to detect clonal rearrangement of the immunoglobulin heavy chain gene (JH segment) and T- γ and T- β receptor gene was negative.

The patient was admitted for evaluation of a constitutional syndrome. The most notable findings in the laboratory workup were elevated peripheral eosinophil counts and frequency (570/ μ L, 20.9%) and a high lactate dehydrogenase concentration (877 U/L). Serology for HIV was positive, whereas tests for other entities (syphilis, hepatitis B virus, hepatitis C virus, cytomegalovirus, and Epstein-Barr virus) and tumor markers were negative. Cytometry revealed a low CD4:CD8 ratio (0.15; reference range, 1-4), reduced absolute CD4 lymphocyte count (197/ μ L), increased absolute CD8 lymphocyte count (1291/ μ L), and a low viral load (1293/mL). Computed tomography of the chest revealed centrilobular emphysema but no masses or enlarged nodes. Abdominal ultrasound revealed a hypertrophic prostate with an adenomatous appearance. The electrocardiogram

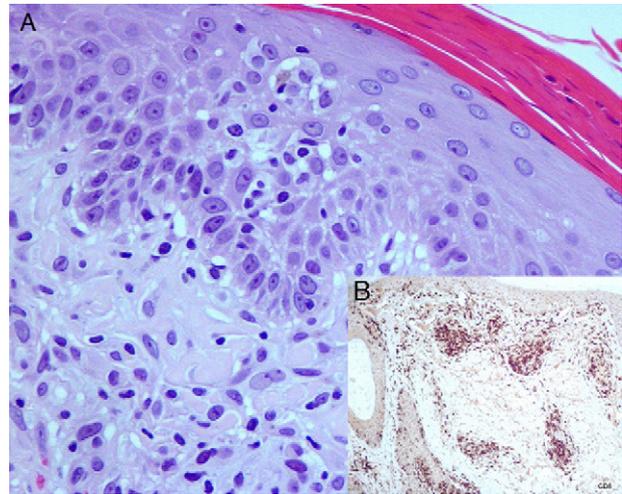


Figure 2 A, Presence of a superficial dermal inflammatory infiltrate composed of lymphocytes with enlarged, irregular nuclei and involving points of mild epidermal spongiosis (hematoxylin-eosin, original magnification $\times 400$). B, Immunohistochemistry revealed positivity with anti-CD8 antibody (Novocastra streptavidin-biotin-diaminobenzidine, original magnification $\times 100$).

revealed mild tricuspid insufficiency. No findings of interest were observed in the computed tomography of the head.

These data confirmed a diagnosis of HIV-associated atypical cutaneous CD8⁺ T-cell infiltrate or cutaneous CD8⁺ pseudolymphoma. After 3 months of systemic antiretroviral therapy (ritonavir, atazanavir, emtricitabine, and tenofovir) and tapered oral prednisolone (starting at 45 mg/d), the patient's progress was good, with a decrease in the number of lesions, resolution of pruritus, and weight gain. In addition, the hair on his scalp and eyebrows began to grow back again (Fig. 3).

Mucocutaneous disorders are very common in HIV-infected patients. Lymphomas are the second most common HIV-associated malignancy after Kaposi sarcoma. Most cases involve non-Hodgkin lymphoma, with a higher incidence of aggressive B-cell subtypes and extranodal disease,^{1,2} although cases of cutaneous T-cell lymphoma have also been reported.^{1,3} HIV-associated polyclonal lymphoproliferative disorders have recently been reported^{1,4,5}; however, these can mimic cutaneous T-cell lymphoma both clinically and histologically, as occurred in the case we report.¹⁻⁷ Cutaneous CD8⁺ pseudolymphoma is uncommon in HIV-infected patients and its pathogenesis poorly understood.^{2,6} It usually presents as extensive plaques or erythroderma^{1,2,4,6,8} and is often associated with eosinophilia.⁶ Histology generally reveals a massive dermal infiltrate composed of CD8⁺ T cells, with or without involvement of the epidermis, and negative results in the clonality study.^{2-4,6}

The literature contains few cases of HIV-associated cutaneous CD8⁺ pseudolymphoma,^{1-4,6,7} which usually appears in later stages of the disease and is associated with severe CD4 lymphopenia.^{1,2,6} The disease is usually treated with systemic corticosteroids, although a favorable response to antiretroviral therapy has been reported.⁶

In our patient, diagnosis was based on the correlation between clinical and pathology findings, including clinical

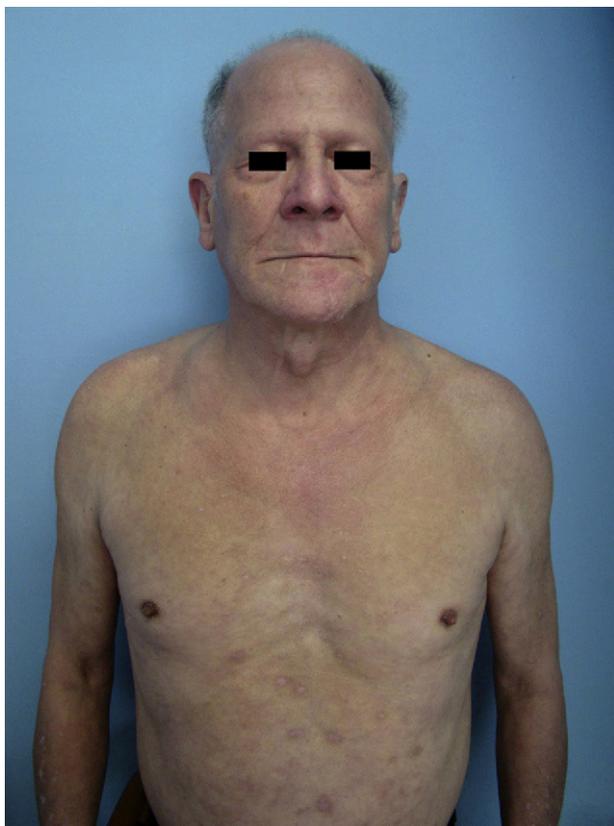


Figure 3 Progress after treatment: decrease in the number of lesions, weight gain, and regrowth of hair on the scalp and eyebrows.

course, response to antiretroviral therapy, and the results of immunohistochemistry and the molecular biology techniques used for the clonality study.

In conclusion, this diagnosis should be considered when an HIV-infected patient has intensely pruritic skin infiltration, alopecia universalis, weight loss, and eosinophilia. Nevertheless, differential diagnosis should include cutaneous T-cell lymphoma, primary hypereosinophilic syndrome (>1500/ μ L in peripheral blood for more than 6 months

with no other apparent explanation), toxicoderma, atopic dermatitis, contact dermatitis, parasitic infestation, and other HIV-associated skin diseases, such as papuloerythroderma of Ofuji.

References

- Guitart J, Variakojis D, Kuzel T, Rosen S. Cutaneous CD8+ T-cell infiltrates in advanced HIV infection. *J Am Acad Dermatol.* 1999;41:722–7.
- Zhang P, Chiriboga L, Jacobson M, Marsh E, Hennessey P, Schinella R, et al. Mycosis fungoideslike T-cell cutaneous lymphoid infiltrates in patients with HIV infection. *Am J Dermatopathol.* 1995;17:29–35.
- Friedler S, Parisi MT, Waldo E, Wieczorek R, Sidhu G, Rico MJ. Atypical cutaneous lymphoproliferative disorder in patients with HIV infection. *Int J Dermatol.* 1999;38:111–8.
- Bachelez H, Hadida F, Parizot C, Flageul B, Kemula M, Dubertret L, et al. Oligoclonal expansion of HIV-specific cytotoxic CD8 T lymphocytes in the skin of HIV-1-infected patients with cutaneous pseudolymphoma. *J Clin Invest.* 1998;101:2506–16.
- Bergman R. Pseudolymphoma and cutaneous lymphoma: facts and controversies. *Clin Dermatol.* 2010;28:568–74.
- Schartz NE, De La Blanchardière A, Alaoui S, Morel P, Sigaux F, Vignon-Pennamen MD, et al. Regression of CD8+ pseudolymphoma after HIV antiviral triple therapy. *J Am Acad Dermatol.* 2003;49:139–41.
- Picard-Dahan C, Le Guyadec T, Grossin M, Fenton N, Raphael M, Simonpoli AM, et al. Erythrodermies pigmentées au cours du SIDA. *Ann Dermatol Venerol.* 1996;123:307–13.
- Burns MK, Cooper KD. Cutaneous T-cell lymphoma associated with HIV infection. *J Am Acad Dermatol.* 1993;29:394–9.

T. Fernández-Morano,^{a,*} M. Aguilar-Bernier,^a J. del Boz,^a R. Fúnez-Liébana^b

^a *Servicio de Dermatología, Hospital Costa del Sol, Marbella, Spain*

^b *Servicio de Anatomía Patológica, Hospital Costa del Sol, Marbella, Spain*

* Corresponding author.

E-mail address: tfm_84@hotmail.com

(T. Fernández-Morano).

Zosteriform Connective Tissue Nevus: A New Case Report[☆]

Nevus de tejido conectivo con patrón zosteriforme. Aportación de un nuevo caso

To the Editor:

Connective tissue nevus is a type of dermal hamartoma with a variable clinical presentation. This condition generally

appears on the trunk or limbs as flesh-colored, yellowish, or brownish plaques with a marbled surface. Its most typical presentations include the orange-peel skin associated with tuberous sclerosis or cobblestone plaques. Connective tissue nevus is characterized by excess collagen or altered elastic fibers. Diagnosis is based on the correlation of clinical and pathological findings, and it is essential to identify variants that are potentially associated with extracutaneous manifestations. Zosteriform connective tissue nevus is an extremely rare variant, with only 5 cases reported to date.

We present the case of a 14-year-old girl with no past history of interest who came to our clinic with an indurated area on her right upper arm that first appeared when she was 6 months old. The lesion initially measured 1 cm and

[☆] Please cite this article as: Castellanos-González M, Petiti-Martín G, Postigo C, Rodríguez-Peralto JL. Nevus de tejido conectivo con patrón zosteriforme. Aportación de un nuevo caso. *Actas Dermosifiliogr.* 2012;103:640–642.