# Pompholyx Eczema as a Manifestation of HIV Infection, Response to Antiretroviral Therapy

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### Sir,

Pompholyx or dyshidrotic eczema is a pruritic chronic dermatitis chiefly affecting the palms of the hands and soles of the feet (1). The aetiology is unknown, although there is thought to be a link with nickel exposure (2). The cutaneous manifestations of HIV infection are numerous (3), but there are no descriptions of pompholyx eczema in HIV. We describe here a man with HIV infection and pompholyx eczema in whom conventional treatment of pompholyx failed, but in whom it resolved completely on commencement of combination antiretroviral therapy (ART).

## CASE REPORT

A 56-year-old male smoker with known HIV infection presented with a pruritic rash affecting the palms of his hands and the soles of his feet (Fig. 1). Due to his general good health and reasonable CD4 count (323 cells/mm<sup>3</sup>, 25%) he was not taking antiretroviral drugs. He was treated empirically with topical steroid and antifungal cream, but failed to improve. Further treatment with chlorhexidine soaks, topical terbinafine and systemic ketoconazole and flucloxacillin failed to resolve the pompholyx. Skin scrapings were negative for fungi on microscopy and culture and repeated syphilis serology was negative.

It transpired that when diagnosed with HIV in Africa several months previously, he had had a similar episode that had resolved with a 4-week course of antiretroviral agents. He was unsure which agents he had received and unfortunately this short course of ART had resulted in high-level non-nucleoside drug resistance. As his pompholyx eczema was felt to be a manifestation of symptomatic HIV disease, the topical steroids and antimicrobials were all stopped and he was commenced on combination ART with lopinavir/ritonavir, lamivudine and tenofovir. At review 6 weeks after commencing combination ART, he had a good virological response with a 2.94 log drop in HIV viral load and an associated rise in CD4 count to 488 cells/mm<sup>3</sup>. His pompholyx had resolved completely (Fig. 2)

#### DISCUSSION

Although it has been described as part of the immune reconstitution inflammatory syndrome (4), this is the first report of pompholyx as a manifestation of symp-



*Fig. 1.* Pompholyx eczema affecting palms of hands and soles of feet prior to commencing combination antiretroviral therapy.



*Fig. 2.* Complete resolution of pompholyx eczema after 6 weeks of combination antiretroviral therapy.

tomatic HIV infection. This patient's eczema failed to respond to numerous topical and systemic treatments and only improved when his immune system was reconstituted with combination ART.

The recognized treatments of pompholyx often involve immune suppression, either with topical or systemic steroids or with other immunosuppressants such as mycophenalate mofetil and azathioprine (5). It is therefore interesting that in the case described here, of a man already immunocompromised, resolution occurred only after immune reconstitution. This presumably reflects the complex nature of the underlying pathogenesis of pompholyx and the influence of a compromised immune system in HIV infection or a direct effect of HIV infection.

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