The Spectrum of HIV-Associated Infective and Inflammatory Dermatoses in Pigmented Skin

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KEYWORDS

• Aids • HIV • Immunosuppression • Infections • Inflammatory dermatoses • Treatment

KEY POINTS

- The introduction of antiretroviral medication has changed the epidemiology, morbidity, and mortality of HIV disease.
- Antiretrovirals have also altered the incidence of infective and inflammatory diseases affecting the skin.
- Cutaneous disorders due to HIV infection remain a major problem in HIV-infected patients.
- In patients with pigmented skin, HIV-associated dermatoses result in special challenges, particularly with regard to diagnosis and treatment.
- Due to the common problem of dyspigmentation caused by these conditions in pigmented skin, early diagnosis and effective treatment are of utmost importance.

INTRODUCTION

Patients living with HIV and AIDS are susceptible to various infective and inflammatory dermatoses. Even after the introduction of antiretroviral medication, the visible impact of skin lesions remains a major area of concern in patients living with HIV,[1] affecting their quality of life and self-esteem. In patients with pigmented skin, postinflammatory hyperpigmentation is a common finding and may lead to stigmatization and misdiagnosis.

Inflammatory and infective dermatoses can affect patients at any stage of HIV disease, with some considered markers of immunosuppression.

Skin lesions can predict treatment response or failure of antiretroviral medication; some worsen or appear initially after the initiation of antiretrovirals due to the immune reconstitution inflammatory syndrome (IRIS). Introduction of antiretroviral medication has changed the profile of HIV-associated dermatoses.[2] There is a dramatic decrease in opportunistic infections, whereas certain inflammatory conditions are on the increase.

In the setting of HIV/AIDS, it is important for physicians to be aware that infective and inflammatory dermatoses are often atypical, more severe, and more resistant to treatment.[1,3] There is a paucity of literature on HIV-associated skin disorders

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in pigmented skin, especially in Africans. This article focuses on the clinical presentation in patients with pigmented skin of the most common HIV-associated infective and inflammatory dermatoses.

VIRAL INFECTIONS

Herpes Simplex Virus Infection

Herpes simplex virus (HSV) infection causes substantial morbidity in patients with HIV. HSV can serve as a cofactor in the progression of HIV.[4] This is suggested by simultaneous isolation of HSV and HIV from the same lesion, reduction of HIV shedding in coinfected individuals undertaking antiherpetic treatment, and data suggesting that HSV infection may adversely affect the progression of immunodeficiency in HIV-infected persons.[4] Herpes labialis caused by HSV type 1 (HSV-1) is common in HIV. In the setting of HIV, it tends to be more aggressive and lesions tend to last longer (**Fig. 1**). Herpes genitalis caused by HSV type 2 (HSV-2) is the most frequent genital ulcer disease among HIV seropositive patients.[4] Herpes genitalis presents as vesicles, erosions, and ulcers on the genitalia. In patients with AIDS, the severity and duration of recurrent genital herpes may be more severe than that seen in normal hosts.[4]

Molluscum Contagiosum

Molluscum contagiosum caused by a poxvirus is common in HIV. Lesions are skin-colored, dome-shaped papules or nodules with central umbilication.

In the setting of HIV, molluscum contagiosum tends to be atypical and extensive (**Fig. 2**). Atypical lesions may resemble other conditions, such as basal cell carcinoma, keratoacanthomas, and cryptococcosis. Although it is a clinical diagnosis, biopsy may be necessary to confirm the diagnosis. Histopathology shows intracytoplasmic inclusion bodies, called molluscum bodies or Henderson-Paterson bodies.

Fig. 1. Herpes labialis is an HIV-infected patient.

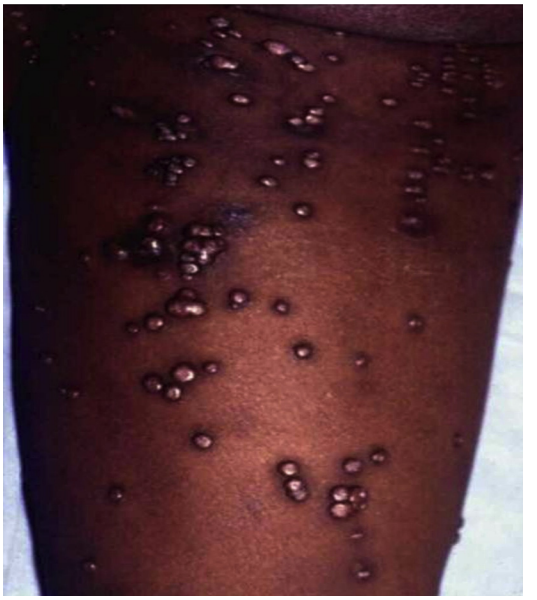

Fig. 2. Disseminated molluscum contagiosum.

Treatment of molluscum contagiosum in HIV patients includes restoration of immune competence by highly active antiretroviral therapy.

In some patients, lesions may respond to immunomodulators, such as imiquimod 5% cream. Resistant lesions may be treated with cryotherapy, which involves application of liquid nitrogen onto the lesions for cold-induced cell destruction; however, this may not be possible in patients with extensive disease. Complications of cryotherapy are hypopigmentation, hyperpigmentation, and scarring.

Herpes Zoster

Herpes zoster is also common in HIV setting and tends to be multidermatomal (**Fig. 3**). HIV patients often get recurrent episodes. It presents as painful blisters after a dermatome. The pain may be severe in some patients and they are more likely to require medical attention.

Treatment of herpes zoster is aimed at speedy healing of skin lesions, limiting disease progression, pain reduction, and prevention of complications, such as postherpetic neuralgia.

Systemic antivirals, such as oral acyclovir (800 mg 5 times a day for 7–10 days) or valacyclovir (1000 mg 3 times a day for 7 days), are helpful. A combination of analgesics and antiinflammatories should be given for pain.

A common complication of herpes zoster is postherpetic neuralgia, in which the pain of herpes