

CHAPTER 7

CUTANEOUS LESIONS OF ENDEMIC MYCOSES

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Endemic mycoses are histoplasmosis, coccidioidomycosis, paracoccidioidomycosis, and blastomycosis. They have well-defined endemic areas determined by environmental conditions. The entry is usually via the respiratory tract, then hematogenous and lymphatic spread occurs to the skin and other organs. All pathogens are dimorphic fungi^{1,2}

Endemic fungal infections differ in epidemiology, symptoms and prognosis. Clinical manifestations vary depending on the underlying state of the patient, similar clinical patterns may be seen in all infections. These infections may also affect otherwise healthy individuals.¹⁻³

All of the endemic mycoses can be accompanied by cutaneous and mucocutaneous manifestations. Each of them may exhibit a particular pattern of cutaneous manifestations, but overlap in the appearance of the lesions may be present. An accurate diagnosis can only be made by histopathological examination and culture of biopsy samples.¹⁻³

Cutaneous manifestations of the endemic mycoses are mostly seen in the presence of widely disseminated infection. However, skin lesions may occasionally be the only manifestation. The pathogenesis is mostly hematogenous dissemination from a primary pulmonary infection. Rarely, cutaneous lesions arise from direct inoculation in the absence of disseminated infection.³

7.1. Histoplasmosis

Histoplasmosis is caused by the thermally dimorphic fungus, *Histoplasma capsulatum*. The genus consists of two main varieties. *H. capsulatum* var. *capsu-*

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Skin tests and serology are of little benefit in the diagnosis of *B. dermatitidis* infections. Antigen testing using an enzyme immune assay that detects *B. dermatitidis* cell wall polysaccharide in urine and serum may be useful, it is most often positive when disseminated disease is present.^{3,19}

7.4.1.3. Therapy

The severity of illness and the presence of any underlying immunosuppression influence the choice of antifungal drug and the duration of treatment. Mild to moderate pulmonary or disseminated disease should be treated with itraconazole 200 mg once or twice daily for 8–12 months. Moderately severe to severe pulmonary or disseminated disease and the immunosuppressed patients are treated with amphotericin B (deoxycholate form 0.7–1.0 mg/kg/day, or liposomal form 3–5 mg/kg/day) for 1–2 weeks followed by itraconazole 200 mg twice daily for 12 months. Central nervous system disease is treated with liposomal amphotericin B for 4–8 weeks followed by itraconazole for at least one year.¹⁸⁻²⁰

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