The figure in the photo quiz shows a macrophage containing a cluster of *Pneumocystis jirovecii* trophic forms and one spore of *Histoplasma capsulatum*. Small trophic forms are about 1.5 to 2 μm in size, with acidophilic nuclei that are clearly identified on the figure, contrary to cytoplasmic shapes that are irregular. The distinctive oval spore, about 2 to 3 μm in size, containing an uncolored vacuole which reduces fungal cytoplasm to a tiny arc, makes it possible to diagnose putative histoplasmosis. This macrophage was the only one that contained both a spore of *H. capsulatum* and *P. jirovecii* trophic forms. Two other macrophages containing one spore of *H. capsulatum* in the absence of *P. jirovecii* were detected on one slide, indicating the presence of a low fungal burden in the lungs. Cultures of skin biopsy specimens were positive after only 10 days, revealing *H. capsulatum*, whereas bronchoalveolar lavage (BAL) specimen culture, stored at room temperature, was positive 8 weeks after BAL retrieval, consistent with disseminated histoplasmosis of pulmonary origin. Treatment with liposomal amphotericin B (3 mg/kg/day) followed by itraconazole (200 mg/day) as a secondary prophylaxis provided clinical improvement and absence of relapse until at least January 2005, the month of the patient’s departure to another French city.

This observation emphasizes the risk of overlooking histoplasmosis in cases of low fungal burden. This low burden, combined with slow fungal growth and the absence of a trained microbiologist in an area where histoplasmosis is not endemic, was the cause of a delayed diagnosis. The absence of specific treatment led to dissemination from the lungs. There is evidence that the infection was due to reactivation of latent spores acquired at least 16 months earlier in Martinique. This overseas French territory is an area where histoplasmosis is endemic, in which (i) the incidences of AIDS and histoplasmosis in human immunodeficiency virus (HIV)-infected patients are 0.4/100,000 patients and 1.7% of patients, respectively (1), and (ii) *Pneumocystis* pneumonia (PCP) and disseminated histoplasmosis represent AIDS-defining illnesses (1, 2). Nonetheless, in Martinique and other areas of endemcity, occurrence of concurrent histoplasmosis and pneumocystosis in AIDS patients has been cited in about 15 instances (3–6) and has not been histologically described until now.

REFERENCES


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