Cyclosporiasis In A HIV-Positive Patient

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Sir,

Cyclospora appears to represent a newly identified cause of diarrhoea in humans. The first reported case of Cyclosporiasis in Malaysia was documented in Selangor in 1994. The patient was a 28-year old male drug addict who was found positive for HIV. He presented with three weeks history of diarrhoea prior to admission. We report a case of cyclosporiasis in a HIV-positive patient.

A 36-year old housewife was admitted following three months history of fever and diarrhoea. Her fever was said to be of low grade. She passed watery stool 5-6 times daily. No blood except occasional mucus was noted in the stool. She was subsequently found to be positive for HIV antibodies by Western blotting. Faecal examination of unstained wet mounts revealed spherical hyaline cyst-like formation of 8-9µm. These were coloured red when stained with modified Ziehl-Neelsen stain. Stool cultures yielded no bacterial pathogen. The patient was treated with Metronidazole and her diarrhoeic symptoms resolved ten days after admission.

Little is known about the life cycle, host range and mode of transmission of Cyclospora. It was first described in 1979 in three patients in Papua New Guinea². The organisms have two sporocysts per oocysts and two sporozoites per sporocysts. It causes prolonged diarrhoea in immunocompetent and immunocompromised patients. In immunocompetent patients, the diarrhea is self-limiting. The diarrhea is said to be more prolonged immunocompromised patients. Laboratory diagnosis of the organism is simple, much depends on its morphology and measurement. Identification may be made by microscopic examination of stool wet mounts and confirmed by modified acid-fast Identification may also be made by microscopic examination under ultra-violet illumination. The oocysts are seen as wrinkled spheres under saline wet mounts. They are spherical in shape with a central greenish morula. The organisms fluoresce and show shining bluish circles under ultra-violet examination. Both Cryptosporidium and Cyclospora are acid-fast. Cysts of Cryptosporidium are spheres measuring 4.5-5.5µm while Cyclospora are much larger (8-10µm). The organisms stain variably; the stain colour ranges from unstained to mottled pink to deep red. Hence Cyclospora may in fact be misidentified as a Cryptosporidium species if one fails to note its larger size. Laboratory investigators who are screening stool for Cryptosporidium should measure oocysts to distinguish between the two. With increased use of modified acid-fast staining and recognition of its larger size, Cyclosporiasis may be more common than what appears to be in Malaysia. We therefore propose that Cyclospora should be considered in patients with a history of prolonged diarrhoea.

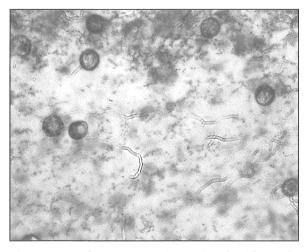


Fig. 1: Cyclospora species stained with modified acid-fast stain

LETTER TO THE EDITOR

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