

Hydatid disease – the ‘water lily’ sign

Elmarie Smedema, Bongani M Mayosi, Jan-Peter Smedema

A 30-year-old black woman with hydatid liver disease and HIV infection (World Health Organization stage III) presented with symptoms of heart failure. Echocardiography showed global impairment of the left ventricular function (ejection fraction 40%) and no evidence of hydatid heart disease. Magnetic resonance imaging confirmed the presence of large hydatid cysts in the right lobe of the liver (12 x 12 x 11 cm), and in the lesser peritoneal sac (8 x 8 x 9 cm), the latter showing a ruptured germinal membrane, demonstrating the ‘water lily appearance’ (Fig. 1). After initiating treatment with albendazole, ultrasound-guided percutaneous aspiration of the

intraperitoneal cyst produced 900 ml of clear fluid; aspiration was followed by instillation and aspiration of hypertonic saline. The patient was also treated with antiretroviral and heart failure medication, which resulted in resolution of cardiac symptoms and improvement of the left ventricular ejection fraction to normal (ejection fraction 60%) over 1 year.

Elmarie Smedema is a radiographer with special expertise in magnetic resonance imaging. Her husband, Jan-Peter Smedema, is a cardiologist at the N1 City Hospital, Cape Town, and Honorary Lecturer in the Department of Medicine at Groote Schuur Hospital.

Bongani Mayosi is the Chief Physician at Groote Schuur Hospital and Professor of Medicine at the University of Cape Town. His research interests include genetics of heart disease, treatment of tuberculous pericarditis, and prevention of rheumatic fever.

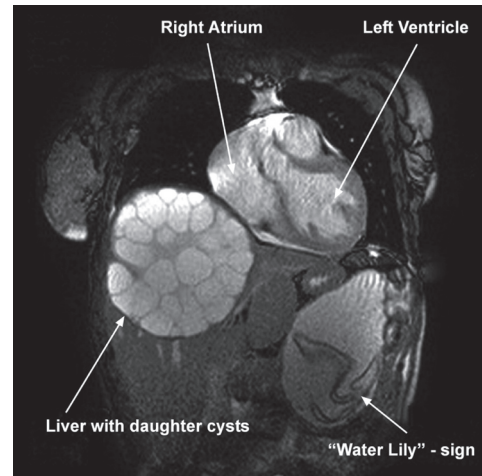


Fig. 1. T2-weighted magnetic resonance study of the torso (coronal view) demonstrates the presence of hydatid cysts in the liver and the lesser peritoneal sac ('water lily' sign).

Corresponding author: B Mayosi (bmayosi@uctgsh1.uct.ac.za)