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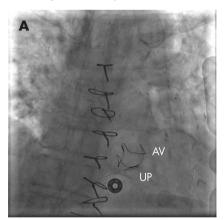
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IMAGES IN CARDIOLOGY

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Intracardiac echocardiography in the diagnosis of prosthetic valve endocarditis

79-year-old woman was transferred to our hospital after a syncopal episode that resulted in a cervical spine fracture. She had undergone coronary artery bypass grafting and bioprosthetic aortic valve replacement 3 years before this admission. On presentation, she was febrile with blood cultures positive for Candida parapsilosis. Serial transthoracic echocardiograms did not show valvular vegetations, and transoesophageal echo was considered relatively contraindicated owing to the patient's cervical injury. Despite treatment with intravenous fluconazole and caspofungin, fever and positive repeat blood cultures persisted. A definitive diagnosis was made by intracardiac echocardiography (ICE; Acunav, Seimens Medical, Mountain View, CA, UISA), which allowed close approximation between the ultrasound transducer and the prosthetic valve (panel A). A 2 mm mobile vegetation was visualised attached to one of the leaflets of the aortic bioprosthetic valve (panel B; video). Aortic valve replacement was performed and fungal vegetation was confirmed by mycopathology. There was no evidence of abscess formation. Eleven days



Fluoroscopy image demonstrating proximity of the ultrasound probe (UP) and aortic valve (AV).

after the operation, a pacemaker was implanted for recurrent sinus arrest (aetiology of syncope). The patient was discharged from the hospital in good condition

These images illustrate a new use of ICE as a diagnostic modality for prosthetic valve endocarditis. Although a few studies have examined the role of ICE in the evaluation



Intracardiac echocardiography view of the aortic valve (AV) and left ventricular outflow tract with mobile vegetation (Veg) on the aortic leaflet.

of valvular pathology, its clinical role has primarily been within the electrophysiology laboratory to guide catheter placement. As this technology continues to evolve, ICE may supplement other imaging modalities and find new clinical applications.

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