

## IMAGE IN CARDIOLOGY

# Cardiac computed tomography in the assessment of endocarditis complications

## Tomografia cardíaca na avaliação de complicações por endocardite

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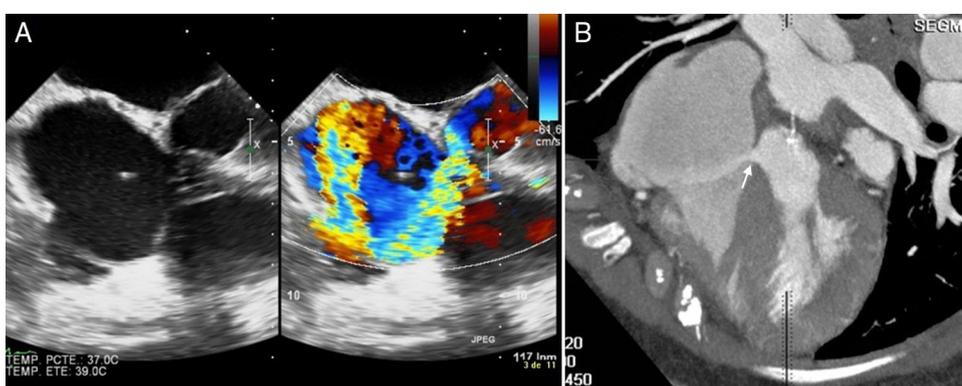
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A 44-year-old woman with a prosthetic aortic valve was admitted to the cardiology department with shortness of breath and a new diastolic murmur. Transthoracic (TTE) and transesophageal echocardiography (TEE) were performed, the latter revealing a fistula between the aortic root and the right atrium (Figure 1A). Although blood cultures were negative, the final diagnosis was endocarditis. Prior to surgery,

cardiac computed tomography (CT) confirmed the presence of a subaortic fistula (Figure 1B).

Cardiac CT is an emerging tool for detection of complications after aortic valve replacement, especially in cases in which TTE or TEE are inconclusive. Cardiac CT can be useful in detection of dehiscence, abscess formation, valve obstruction, pseudoaneurysms or, as in the case



**Figure 1** (A) Transesophageal echocardiography with and without color Doppler revealing subaortic flow to the right atrium; (B) cardiac computed tomography confirming the presence of a subaortic fistula (arrow).

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reported, fistulas between heart chambers. It may also provide incremental benefit in the preoperative assessment of patients with endocarditis.

### **Ethical disclosures**

**Protection of human and animal subjects.** The authors declare that no experiments were performed on humans or animals for this study.

**Confidentiality of data.** The authors declare that they have followed the protocols of their work center on the

publication of patient data and that all the patients included in the study received sufficient information and gave their written informed consent to participate in the study.

**Right to privacy and informed consent.** The authors declare that no patient data appear in this article.

### **Conflicts of interest**

The authors have no conflicts of interest to declare.