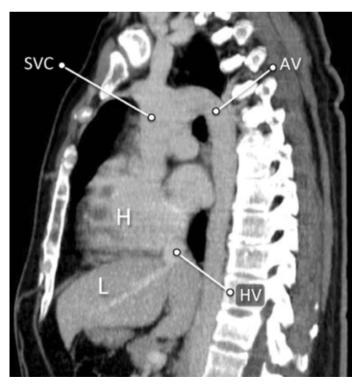


**Figure 2.** Contrast-enhanced multidetector computed tomography axial (1), coronal (2), and Sagittal (3) multiplanar reconstruction that shows the congenital anomalies azygos continuation of the inferior vena cava, with a dilated azygos vein (AV), normal superior vena cava (SVC), and hepatic vein (HV) of the liver (L) connected directly with the right atrium of the heart (H)



**Figure 3.** Contrast-enhanced multidetector computed tomography axial (1), coronal (2), and Sagittal (3) multiplanar reconstruction that shows the congenital anomalies azygos continuation of the inferior vena cava, with a dilated azygos vein (AV), normal superior vena cava (SVC), and hepatic vein (HV) of the liver (L) connected directly with the right atrium of the heart (H)

Multidetector computed tomography is the first-line noninvasive diagnostic method for characterizing the vascular anatomy and its anomalies (3). So, any possible venous variant, including azy-gos continuation, has to be detected in the preoperative setting of conventional thoracoabdominal surgery and percutaneous endovascular venous and cardiac procedures to plan the most suitable therapeutic approach (1-4).

## 🔟 Umberto Geremia Rossi, ២ Anna Maria Ierardi¹,

Diaurizio Cariati<sup>2</sup>

Department of Diagnostic Imaging - Interventional Radiology Unit, Ente Ospedaliero Galliera Hospital Mura Delle Cappuccine; Genova-*Italy* 

<sup>1</sup>Department of Diagnostic Imaging - Radiology Unit, I.R.C.C.S. Cà Granda Fondation, Maggiore Policlinico Hospital; Milano-*Italy* <sup>2</sup>Department of Diagnostic and Therapeutic Advanced Technology -Diagnostic and Interventional Radiology Unit, Azienda Socio Sanitaria Territoriale Santi Paolo and Carlo Hospital; Milano-*Italy* 

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Address for Correspondence: Umberto Geremia Rossi, MD, Department of Diagnostic Imaging-Interventional Radiology Unit, Ente Ospedaliero Galliera Hospital Mura Delle Cappuccine; Genova-Italy Phone: 00390105634154 E-mail: umberto.rossi@galliera.it ©Copyright 2020 by Turkish Society of Cardiology - Available online at www.anatoljcardiol.com D0I:10.14744/AnatolJCardiol.2020.61168

# Author`s Reply

### To the Editor,

We would like to thank the authors for their valuable comments on our case report study (1). Secundum atrial septal defect in patients with interrupted inferior vena cava (IVC) and azygos continuation is a very rare condition. The patient with azygos continuation of the IVC is usually asymptomatic and it is detected incidentally (2, 3). These anomalies are usually detected during computed tomography (CT) angiography taken for other reasons. Also, contrast should be given from the lower and upper extremities for a clear evaluation of the venous variations. CT angiography is not a routine in the preoperative evaluation of secundum atrial septal defect (ASD). Routine CT angiography is not cost-effective for a very rare condition and there are risks such as giving contrast to patients.

It may be possible to verify if cardiac catheterization is performed for atrial septal defect closure assessment. However, cardiac catheterization is not routine in the preoperative evaluation of ASD. Cardiac catheterization is required to determine PVR in patients with high PAB on echocardiography.

It is important to perform transesophageal echocardiography in patients, as part of the detailed assessment for the percutaneous closure of the ASD (4). Transesophageal echocardiography (TEE) provides adequate evaluation of the rims and size of the defect. In a patient with azygos continuation of the IVC, the hepatic veins are directly connected with the right atrium, and they can be considered as the IVC in TEE.

Consequently, as in the examples in the literature, azygos continuation of the IVC may not be detected during the preoperative evaluation, since routine CT angiography and cardiac catheterization were not performed (5). It is useful to keep in mind the techniques that should be applied when such a situation is encountered during the operation.

Elnur Alizade, <sup>(D)</sup> Ahmet Karaduman, <sup>(D)</sup> İsmail Balaban, <sup>(D)</sup> Berhan Keskin, <sup>(D)</sup> Semih Kalkan Department of Cardiology, Koşuyolu Heart Training and Research Hospital; İstanbul-*Turkey* 

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#### Address for Correspondence: Dr. Ahmet Karaduman,

Koşuyolu Eğitim ve Araştırma Hastanesi, Kardiyoloji Bölümü, Denizer Sok. No: 2 Cevizli/Kartal 34865 İstanbul-*Türkiye* Phone: +90 216 500 15 00 E-mail: ahmetkaraduman91@gmail.com ©Copyright 2020 by Turkish Society of Cardiology - Available online at www.anatoljcardiol.com