

## Fistula između aorte i lijeve pretklijetke – prikaz slučaja

### Aorto-left atrial fistula – a case presentation

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**KLJUČNE RIJEČI:** aortna stenozna, fistula između lijeve pretklijetke i aorte, srčano zatajivanje.

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**Uvod:** Fistule između aorte i lijeve pretklijetke ehokardiografski nalazimo vrlo rijetko. Najčešće se javljaju kao komplikacija apscesa aortnog korijena uzrokovanog endokarditisom aortalnog zaliska, ali također kao posljedica paravalvularnog apscesa, stanja po zamjeni aortalnog zaliska i aortne disekcije<sup>1</sup>.

**Prikaz slučaja:** Predstavljamo slučaj 69-godišnje bolesnice, upućene na dodatnu obradu transezofagijskom ehokardiografijom (TEE) zbog sumnje na komunikaciju između aorte i lijeve pretklijetke. Unatrag 8 godina kod bolesnice je zbog teške aortalne stenozne učinjena zamjena aortalnog zaliska mehaničkim (21-mm St. Jude Medical). Tri godine nakon operacije bolesnica se prezentira tegobama u vidu intolerancije napora i otežanog disanja koji su tijekom narednih godina postajali sve izraženiji. Početkom 2015. godine učinjena je transtorakalna ehokardiografija kojom se nađe uredna pozicija i funkcija mehaničkog aortalnog zaliska te se postavi sumnja na komunikaciju između aorte i lijeve pretklijetke. Trodimenzionalnom transezofagijskom ehokardiografijom prikaže se fistula između nekoronarnog sinusa aorte i lijeve pretklijetke s pretokom uz očuvanu funkciju lijeve klijetke.

**Zaključak:** Fistule između aorte i lijeve pretklijetke su vrlo zanimljivi i rijetki ehokardiografski nalazi koji se mogu manifestirati simptomima srčanog zatajivanja. Ehokardiografija, posebno TEE ključna je metoda u potvrđivanju dijagnoze. Kod bolesnika koji imaju simptome srčanog zatajivanja najčešće se pristupa kirurškom zatvaranju fistule između aorte i lijeve pretklijetke. Perkutano zatvaranje fistule između aorte i lijeve pretklijetke s Amplatzerom izvodi se u slučajevima povoljnih anatomskih odnosa<sup>2</sup>.

**Introduction:** Fistulas between the aorta and the left atrium are very rare. They are usually a complication of aortic root abscess formation caused by aortic valve endocarditis, but also of paravalvular abscess, aortic valve replacement, and aortic dissection<sup>1</sup>.

**Case presentation:** We present a case of a 69-year-old woman who was referred to our Clinic for transesophageal echocardiography evaluation (TEE) of a suspected aorto-left atrial communication. Eight years earlier, she had undergone aortic valve replacement with a 21-mm St. Jude Medical mechanical aortic valve because of aortic stenosis. Three years later, she presented with effort intolerance and dyspnea. These symptoms aggravated over the years. Transthoracic echocardiography performed at the beginning of 2015 demonstrated the normal position and function of a mechanical aortic valve with suspected aorto-left atrial communication. A three-dimensional TEE performed in our Clinic revealed a fistula between the noncoronary sinus of the aorta and left atrium with a shunt through it. The left ventricle function was preserved.

**Conclusion:** Although very rare, aorto-left atrial fistulas are very interesting echocardiographic findings which may be presented with heart failure symptoms. Echocardiography, especially TEE, is crucial in confirming the diagnosis. The surgical closure of aorto-left atrial fistulas is the standard treatment in symptomatic patients. The percutaneous closure of aorto-left atrial fistulas with an Amplatzer-type device may be performed in cases when the anatomy is favorable<sup>2</sup>.

#### LITERATURE

1. Archer TP, Mabee SW, Baker PB, Orsinelli DA, Leier CV. Aorto-left atrial fistula. A reversible cause of acute refractory heart failure. *Chest.* 1997;111(3):828-31. DOI: <http://dx.doi.org/10.1378/chest.111.3.828>
2. Hernández-García JM, Alonso-Briaies JH, Jiménez-Navarro MF, Cabrera-Bueno F, González-Cocina E, Such-Martínez M. Transcatheter closure of aorto-left atrial fistula using an Amplatzer device. *Rev Esp Cardiol.* 2005;58(9):1121-3. DOI: [http://dx.doi.org/10.1016/S1885-5857\(06\)60443-X](http://dx.doi.org/10.1016/S1885-5857(06)60443-X)

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