

## Transcatheter left atrial appendage occlusion: an early single-center experience

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**Introduction:** Transcatheter left atrial appendage occlusion (LAAO) is a stroke prevention method for patients with atrial fibrillation (AF) and increased thromboembolic risk with a contraindication for oral anticoagulation (OAC) or with an elevated bleeding risk under chronic OAC.<sup>1</sup> This study aimed to assess patient characteristics, acute success rate, and periprocedural complication rate of transcatheter LAAO procedures in our institution.

**Patients and Methods:** This single-center retrospective observational study included all patients who underwent transcatheter LAAO in our center from June 2021 until October 2022. Data were collected from hospital electronic medical records.

**Results:** We evaluated all 18 consecutive patients (55.6% male, 72.2 ± 6.3 years) who underwent transcatheter LAAO. Patient characteristics and risk factors are shown in **Table 1**. The acute success rate was 88.9%, two proctored procedures were unsuccessful due to unfavorable anatomy. There were no procedure-related stroke, device embolization, or device-related thrombus. Procedure characteristics are shown in **Table 2**. Three patients (16.7%) developed postprocedural groin hematoma. One patient developed a femoral arteriovenous fistula and required surgical repair, while another patient developed hemodynamically irrelevant pericardial effusion. During follow-up, there were no thromboembolic complications, and one patient had a bleeding complication with dual antiplatelet therapy.

**TABLE 1. Patient characteristics and risk factors.**

Male, N (%)	10 (55.6)
Age, years	72.2 ± 6.3
BMI, kg/m <sup>2</sup>	27.5 ± 4.1
LVEF, %	53.9 ± 9.1
Persistent/permanent AF, N (%)	9 (50)
Prior TIA/stroke, N (%)	4 (22.2)
Prior major bleeding, N (%)	14 (77.8)
CHADSVASc	3.5 ± 1.5
HASBLED	3.0 ± 0.5

**TABLE 2. Procedure characteristics.**

Procedure time, min	75.8 ± 27.6
Fluoroscopy time, min	9.3 ± 4.5
Radiation dose, mGy	529.4 ± 472.3
Dose area product, mcGy/m <sup>2</sup>	4542.4 ± 4132.1
Contrast agent, ml	61.4 ± 29.5

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**Conclusion:** Our data suggest that, since the introduction of this technology, transcatheter LAAO can be performed in our center with a good rate of acute success and low risk of periprocedural adverse events.

### LITERATURE

1. Glikson M, Wolff R, Hindricks G, Mandrola J, Camm AJ, Lip GYH, et al; ESC Scientific Document Group. EHRA/EAPCI expert consensus statement on catheter-based left atrial appendage occlusion - an update. *Europace.* 2020 Feb 1;22(2):184. <https://doi.org/10.1093/europace/euz258>