Extended Septal Myectomy in Hipertrophic Obstructive Cardiomyopathy

Miectomia septal ampliada en la miocardiopatía hipertrófica obstructiva

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This paper by Seia and the multidisciplinary team from the Instituto Cardiovascular de Buenos Aires, Argentina, (1) is an important examination of the hemodynamic impact and echocardiographic changes after an extended septal myectomy in patients with hypertrophic obstructive cardiomyopathy. It is especially important in the current era, when multiple new modalities for the treatment of left ventricular outflow tract obstruction are becoming available. The team is to be recognized for their outstanding surgical results and for the detailed short and medium-term echocardiographic evaluations.

They have shown that a patient undergoing an extended septal myectomy at a center of excellence, can expect resolution of symptoms, with a low risk of mortality and a low risk for heart block requiring a permanent pacemaker. The echocardiographic findings show a durable elimination of the left ventricular outflow tract obstruction with continued improvement in myocardial diastolic function, ventricular hemodynamics, mitral regurgitation along with reverse remodeling of the left atrium.

A frequent critique of a paper like this is that a large percentage of the patients had additional cardiac surgical procedures including 46% of the patients who also underwent a mitral valve intervention, 20% had coronary artery bypass grafting and 18% of the patients had a maze procedure. As a result, it is challenging to attribute all the improvement in echocardiographic parameters just to the extended septal myectomy.

The authors have focused on the echocardiographic changes; however, not mentioned but implicit in their results and for all centers treating patients with HCM, is that a multidisciplinary team of surgeons and cardiologist have performed a comprehensive assessment of the clinical, imaging and echocardiographic findings and have treated all important cardiovascular issues.

Atrial fibrillation is one example. Patients with hypertrophic cardiomyopathy are estimated to have a 25% lifetime incidence of atrial fibrillation. Surgical reviews have shown that only a small percentage of patients with atrial fibrillation undergo concomitant surgical ablation at the time of cardiac surgery. The fact that 18% of the study's patients underwent a Maze procedure suggests that the team is aggressively treating atrial fibrillation, which when left untreated can be a significant burden for patients with hypertrophic cardiomyopathy.

As new drug therapies, like myosin inhibitors and less invasive percutaneous approaches to septal reduction become available, it is increasingly important to take an in depth assessment of all cardiovascular issues impacting the patient's clinical state and cardiac function. With that information a multidisciplinary team including surgeons, imaging specialists, interventionalists and electrophysiologists can develop a comprehensive course of treatment and then strive to achieve the excellent results of the team at the Instituto Cardiovascular de Buenos Aires.

Conflicts of interest

None declared.

(See author's conflict of interest form on the website).

REFERENCES

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