Reviewer’s report

Title: Percutaneous septal ablation for left mid-ventricular obstructive hypertrophic cardiomyopathy: a case report

Version: 1 Date: 4 April 2005

Reviewer: Pawel Petkow Dimitrow

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General
This interesting case report documents that double level obstruction in HC is invasively treatable.

Major Compulsory Revisions (that the author must respond to before a decision on publication can be reached)

1. Pre- and post-procedural 2-DE echocardiograms (full sized images) illustrating post infarct LV remodelling should be presented. Please, mention the duration of post-procedural follow up.
2. Pre- and post-procedural values of ejection fraction are necessary.
3. Please, provide complete invasive pressure measurements at rest conditions after ablation (similar to data before intervention i.e. LV apex, LV outflow tract and aortic pressures).
4. The area of echocontrast deposit is not clearly visualised in figure 2A. Please, provide a more illustrative example.
5. The Authors stated that “there is only single report of therapeutic effect of DDD pacing in MVO”, however Begley D et al. (“Dual chamber pacemaker therapy for mid-cavity obstructive hypertrophic cardiomyopathy” Pacing Clin Electrophysiol. 2001;24:1639-44) reported follow-up in 14 patients.
6. In the cited paper by Seggewiss et al. (ref. 10) the fourth septal branch was occluded in contrast to occlusion of the first perforator in the presented patient. This technical difference should be stressed in the discussion. In the described patient, occlusion of the first perforator (which probably originates distantly from LAD ostium) allows to reduce obstruction at both mid-cavity and LV outflow tract levels. Please, measure the distance between the LAD coronary artery ostium and the origin of the first perforator and discuss the measured value in comparison with findings presented by Singh M. et al. (“Anatomy of the first septal perforating artery: a study with implications for ablation therapy for hypertrophic cardiomyopathy.”) Mayo Clin Proc. 2001;76:799-802.
7. Septal ablation does not provide completely comparable results to myoectomy. Firoozi S, et al. (“Septal myotomy-myectomy and transcoronary septal alcohol ablation in hypertrophic obstructive cardiomyopathy. A comparison of clinical, haemodynamic and exercise outcomes. Eur Heart J. 2002;23:1617-24”) concluded that the superior effect of surgical myoectomy on exercise test parameters suggests that surgery remains the gold standard against which new treatment modalities should be compared.

Minor Essential Revisions (such as missing labels on figures, or the wrong use of a term, which the author can be trusted to correct)

Discretionary Revisions (which the author can choose to ignore)
Unable to decide on acceptance or rejection until the authors have responded to the major compulsory revisions

**What next?:** An article whose findings are important to those with closely related research interests

**Quality of written English:** Needs some language corrections before being published

**Statistical review:** No

**Declaration of competing interests:**
I declare that I have no competing interests.