Nasal Valve Reconstruction: A Quality of Life Assessment

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Abstract
Objective: 1) Evaluate patient reported outcomes of nasal valve repair using a survey. 2) Understand quality of life measures following nasal valve reconstruction

Method: This retrospective study evaluated patients who underwent nasal valve reconstruction between December 2005 and December 2011. The study involved a 39-question survey that measured quality of life, overall satisfaction with the surgical outcomes, and patient-reported surgical outcomes in multiple symptoms including nasal obstruction, exercise, tolerance, sleep, etc.

Results: Forty-two patients completed the survey and 25 had prior nasal surgery. The most common postoperative complaint was breathing difficulties (36%). Seventeen patients (39%) reported no change in the size of the nose despite augmentation of the nasal valve. Of those patients who did notice a change, 52% stated they noticed the increase in size occasionally and never heard comments from others (70%). Overall, patients were satisfied with the results (81%), and 98% would recommend the procedure to others. There was a statistically significant improvement in nasal blockage/obstruction, and breathing through the nose during exercise.

Conclusion: Our data suggest that nasal valve reconstruction is a reasonable approach to patients with nasal obstruction and trouble breathing through the nose. This approach may be especially important in patients who have already had prior nasal surgery.

Introduction
• Estimated 13% of the population has nasal valve collapse
• Often overlooked component of nasal obstruction
• Many different surgical options exist: spreader grafts, batten grafts, columellar strut, septoplasty, etc.
• No “gold standard” recognized because problem is complex
• Few patient reported outcome studies

Methods
• Objective, retrospective study that focused on patient reported outcomes following septorhinoplasty or revision septorhinoplasty using grafts/implants
• Telephone questionnaire of 37 questions: quality of life measures pre- and postoperatively

• 100% of patients reported no pain at ear cartilage donor site (N=8)
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Results
• 44 patients completed survey: 57% revisions
• Surgery dates (12/2005 to 9/2011)
• Spreader grafts (57%); Batten grafts (7%); Columellar strut (66%);
• Nasal implants (34%); Septoplasty (89%); Turbinate reduction (50%)

Conclusions
• Patients are highly satisfied with NVR
• 57% revision septrhinoplasty
• Although patients report their nose is larger (61%), still recommend procedure to others (98%)
• Worst part of recovery: trouble breathing through nose
• Most patients recommend 2 weeks for recovery
• Ear cartilage donor sight with no morbidity
• All nasal symptoms showed a statistically significant improvement pre-to postoperatively
• Consider NVR in patients with obstructive nasal symptoms with prior septoplasty

References