

Retrospective Review of 25 Gauge Vitrectomy Surgery

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PURPOSE

To review post-operative examinations and complications of 25g vitrectomies.

METHODS

A retrospective review of visual acuity, IOP and complications of 25 g vitrectomies performed on 610 eyes by 3 retina specialists. Snellen visual acuity (VA) and IOP were recorded for pre-op, 1 day post-op, 1 week post-op and 1 month post-op visits. Postoperative complications leading to return to the OR or office based procedures were recorded for up to 6 months post-operatively.

RESULTS

Visual acuity: Pre-operatively 165 patients had VA>20/60. POD#1 23 patients had VA>20/60. POD#7 179 patients had VA>20/60. POD#30 253 patients had VA>20/60. The most common post-op complication was hypotony (IOP<10mm Hg): 135 patients had an IOP from 0-9 mm Hg on POD#1, 52 patients had an IOP from 0-9 mm Hg on POD#7, no hypotony was seen on POD#30. The presence of an air/gas tamponade did not prevent post-op hypotony. Thirty three patients returned to the OR for additional surgery within 6 weeks of the 25g surgeries. Three cases of endophthalmitis developed in patients at one hospital. All three did not receive the usual pre-operative Betadine drops. 2 retinal detachments occurred and 4 retinal tears developed within 6 weeks. Long term complications included 3 retinal detachments and 2 retinal tears.

CONCLUSION

25 gauge vitrectomy surgery allows for a rapid return in vision with few complications. Post-op hypotony the most common complication resolved spontaneously in most patients. There does not appear to be any increased risk in retinal tears or detachments long term compared to 20g vitrectomy techniques.

* Financial interest disclosed