

# **Combined Phacoemulsification Surgery With Intravitreal Ranibizumab Injection In Cataract And Diabetic Macular Edema**

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- \* None of the authors have any financial interest in any product mentioned

# PURPOSE

In this study we investigated the short term results of combined phacoemulsification surgery and intravitreal ranibizumab injection in patients with cataract and diabetic macular edema

# METHODS

- \* Eight eyes of 8 patients were included in this study.
- \* Central macular thickness was measured using spectral domain optic coherence tomography (OCT).
- \* Intravitreal 0.05 ml (0.5 mg) ranibizumab injection was performed immediately after phacoemulsification surgery through pars plana 3.0-3.5 mm to limbus with a 30 gauge needle.

# METHODS

- \* Visual acuity, OCT measurements were performed before, 1 week and 1 month after cataract surgery.
- \* Preoperative and postoperative results were compared.
- \* Nine eyes of 9 patients with diabetic macular edema were used as a control group in which a single intravitreal ranibizumab injection was performed.

# RESULTS

- \* All cases were completed uneventfully and an increase in visual acuity was detected in all cases after surgery.
- \* Central macular thicknesses decreased and mean visual acuity increased in single injection group at week 1 and month 1.
- \* Macular thickness slightly increased in combined surgery at week 1 and decreased significantly at month 1.

# CONCLUSION

In patients with cataract and diabetic macular edema combined phacoemulsification surgery and intravitreal ranibizumab injection is a safe and effective procedure.