“COMPARATIVE STUDY OF EFFICACY OF TOPICAL BROMFENAC SODIUM 0.09% AGAINST TOPICAL PREDNISOLONE ACETATE 1% IN POSTOPERATIVE CATARACT PATIENTS”

by

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ABSTRACT

Background: Steroids are the gold standard for inflammation but they come with added complications of delayed wound healing, increase in IOP and local immunosupression. Therefore, Non Steroidal Anti Inflammatory Drugs (NSAIDs) can be used instead of steroids.

Objectives: To study and compare the efficacy of topical Bromfenac 0.09% with respect to topical prednisinolone acetate 1% in postoperative cataract patients.

Methods: 100 eyes of 91 patients were enrolled in a one year prospective randomised study to undergo Phacoemulsification with PCIOL. They were randomised into two groups. 50 of them received Bromfenac sodium 0.09% postoperatively and another 50 received Prednisolone acetate 1% postoperatively. Postoperatively vision, intraocular pressure, anterior chamber inflammation were assessed on post operative day 1, 3, 7 and 45.

Results: Best corrected visual acuity was >/= 6/9, N6 in all cases in both groups on all follow ups except one case in bromfenac group on postoperative day 7 due to CME. Anterior chamber inflammation on postoperative day 1, 3 was not significant between the two groups with p=0.1601 and p=0.8414. On postoperative day 7, 98% of patients had no inflammation in bromfenac group (one patient had 1+ cells due to non compliance) where as in prednisolone group 100% had < or =1+ inflammation. On postoperative day 45, all patients had no cells except one (0.5+ due to noncompliance).
in bromfenac group. IOP did not show any significant variation between the groups with p value of 0.1868, 0.1936, 0.3835, 0.5350 on day 1, 3, 7, 45 respectively. But the decrease in IOP compared to preoperative IOP was significant in bromfenac group p<0.0001 which was sustained at lower level.

**Interpretation and conclusion:** Bromfenac sodium 0.09% is equally efficient to prednisolone acetate 1% in controlling postoperative inflammation, best corrected visual acuity and IOP.

**Keywords:** phacoemulsification; NSAIDs, steroids; inflammation; intraocular pressure; visual acuity