The effect of 1.4% sodium hyaluronate (Bio-Hyalur PluS) viscoelastic device on corneal endothelium after uneventful phacoemulsification surgery

Poster Details

First Author: U. Celik
Co Author(s): B. Celik, S. Sevim

Abstract Details

Purpose:
To evaluate the safety and efficacy of 1.4% Sodium-Hyaluronate (Bio-Hyalur PluS, Biotech Lab, Gujarat, India) used during capsulorhexis and intraocular lens (IOL) implantation in phacoemulsification surgery.

Setting:
Cataract and Refractive Surgery Department

Methods:
Fifty seven eyes of 57 patients (65.6 ± 7 years old 22M/35F) were enrolled to the study. The endothelial cell density (ECD) changes, after uneventful cataract surgery, were screened retrospectively.

Results:
The mean preoperative ECD was 2615.68 ± 166.74. Postoperative 1st week, 1st month and ECD values were 2525.20 ± 192.21, 2506.04 ± 176.14, 2503.06 ± 152.28 respectively. Decrease after 1st week of the surgery was not significant on 1st and 3rd months follow ups. (p > 0.05).

Conclusions:
The 1.4% Sodium-Hyaluronate (Bio-Hyalur PluS) effectively protected the endothelium in phacoemulsification surgery. The endothelial cell density preservation in 1st and 3rd month proved its safety.

Financial Disclosure:
None