

Sondheimer On Sight: Advances in Cataract Surgery

BY DR. STUART SONDHEIMER, MD Special Columnist



Forty years ago, it was considered successful when patients could see clearly following cataract surgery. Cataracts are a cloudiness of the lens of the eye that causes a decrease in vision. When the loss of vision from a cataract interferes with important visual tasks such as driving or reading, cataract surgery may be warranted. Since the adoption of intraocular lens implants at the time of cataract surgery, most patients have enjoyed excellent vision without the need for thick, heavy spectacles. Intraocular lenses replace the power of the human lens to focus light on the retina so we can see.

RELATED STORIES

Sondheimer On Sight: What In The World Is Keratoconus?

Recently, there have been significant advances that allow many of patients to see well after cataract surgery. After the surgery, a reduced need for corrective lenses to see

at near, intermediate, and far or no need whatsoever for corrective lenses are typical results for patients.

Careful measurements are taken of patients' eyes in preparation for having cataract surgery. Lasers, ultrasound, and optical devices that precisely measure the length of the eye, the curvature of the cornea, the diameter of the cornea, the distance between the cornea and lens, and the depth of the lens are used. This information predicts the optimum intraocular lens and placement of that lens in the eye to achieve the best vision without the need for a corrective eye lens after cataract surgery.

Astigmatism is a barrel shaped distortion of vision usually caused by the cornea being shaped oblong like a football rather than spherical, like a basketball. Until recently, most patients with preexisting astigmatism required glasses or contact lenses to see well in the distance after cataract surgery. Today, astigmatism can be corrected at the time of surgery with astigmatism compensating intraocular lenses or with corneal incisions. The precise placement of the astigmatism-correcting intraocular lenses can be improved with ORA System. This system measures the precise optical wave front of the eye with and without the intraocular lens implant during surgery, and helps eye surgeons position the correcting lens implant in the optimum position for the patient to see his or her best without the need for corrective lenses.

With Monovision, where one eye is focused for far and the other focused for near, by the selection and implantation of the proper intraocular lenses after cataract surgery, many patients see well both in the distance and for reading without the need for corrective lenses.

Another way that patients see well in the distance, intermediate and near without glasses or contact lenses after cataract surgery is with a multifocal intraocular lens that separates light into focus from different distances. New operating microscopes, such as the Zeiss Lumera, enable surgeons to precisely center these lenses. Another technology that can enable patients to see well without glasses is the Accommodating Intraocular Lens that changes its focus as a patient looks at different distances.

With the many wonderful advances in cataract surgery, such as precise measuring techniques, intraocular lenses to correct nearsightedness, farsightedness, astigmatism, and the need for reading glasses, many patients see better after having cataract surgery than they have ever seen in their adult lives without the need for glasses or contact lenses.

Dr. Stuart Sondheimer, MD is an ophthalmologist and eye surgeon with offices located in Park Ridge, Deerfield and Skokie. The advice contained in this column is for informational purposes only. Readers should consult with a physician to evaluate any illness or medical condition. Dr. Sondheimer accepts new patients. Call (847) 677-2794 or visit his web site at: www.drsondheimer.com.