How to Succeed With the AcrySof IQ Restor Lens

Six steps for excellent outcomes after cataract surgery with this multifocal IOL.

BY THOMAS G. ABELL, MD

I began practicing ophthalmology in 1981 and approach cataract surgery as refractive surgery. When cataract patients come into my office, they hear about several IOL options. Premium IOLs maximize these patients’ outcomes and satisfaction by combining cataract and refractive surgery. My first choice is the AcrySof IQ Restor IOL +3.0 D (Alcon Laboratories, Inc., Fort Worth, TX), because I find this lens provides patients with excellent vision at distance, near, and intermediate distance.

A high percentage of my patients select the AcrySof IQ Restor IOL because of what my staff calls the Abell six step, a preoperative educational program. During an hour-long discussion, my staff and I explain the program to each patient and emphasize that the six steps (three on the right eye, three on the left eye) are performed as indicated over a 1-year period. This approach helps to manage patients’ expectations and creates a realistic timeline.

STEPS 1 AND 2: CATARACT SURGERY AND THE IOL’S IMPLANTATION

A successful outcome with the AcrySof IQ Restor IOL requires great attention to detail on the part of the surgeon. An emmetropic result and centration of the lens must be obtained to maximize quality of vision, facilitate neuroadaptation, and minimize dysphotopsia. If these endpoints are not obtained, aberration will result, which will lower patients’ satisfaction.

First, I center the IOL over the visual axis versus over the geographical center or slightly nasal to it. I identify the visual axis through techniques I used many years ago for RK. I turn down the illumination of the operating microscope and ask the patient to fixate on the microscope’s filament. Next, I ink the anterior Purkinje image with methylene blue. I then center a 6-mm RK marker with a crosshair over the anterior image and mark it. These markings serve as my template for performing a 5.50- to 7.75-mm circular capsulorhexis and for centering the AcrySof IQ Restor lens. The ink will be present during the procedure, but it will disappear by the time I examine the patient in the clinic 1 to 2 hours postoperatively.

After completing my standard cataract procedure, I position the AcrySof IQ Restor IOL. I only use a small amount of viscoelastic to expand the distal capsular bag and maintain the anterior chamber. To remove the viscoelastic, I use the phaco tip to gently push down on the central button of the IOL and secure it during evacuation.

During this maneuver, I position the central button right under the initial mark of the visual axis, thus reducing dysphotopsia, glare, and halos. As fibrosis of the capsule occurs, the centration will be maintained.

During their postoperative examination, I ask patients to share with me their observations since their last visit. (I never refer to these as complaints.) For example, they may note some haloing or dysphotopsia. After examining them, I explain the etiology of their observations. Most of the time, the findings are normal, and I remind them that they have only completed two of the six steps. This helps to reassure and guide the patient through the process.

STEPS 3 AND 4: YAG LASER CAPSULOTOMY

Fibrosis of the capsular bag around the implant secures the positioning but also causes visual impairment. It will occur much earlier with premium lenses than with monofocal lenses. Typically, patients present a couple of months after the cataract/IOL procedure and tell me that they are not seeing as well as they did immediately postoperatively. Preoperative discussions should have prepared them for this situation. I remind them that the capsular fibrosis is positive in that it secures the IOL in position.
I perform YAG laser capsulotomy 3 months after cataract/IOL surgery, if indicated. It is very important to open the capsule before performing LASIK or surface ablation in that the first may induce a refractive change. Since incorporating the Abell six-step program with centration, only one implant has been exchanged due to significant scuffing. Although explantation is extremely rare, it must be taken into consideration prior to proceeding with steps 3 and 4, because YAG laser capsulotomy will make an exchange more difficult. If an exchange is deemed necessary, it is advantageous to perform it prior to YAG laser capsulotomy.

**STEPS 5 AND 6: REFRACTIVE ENHANCEMENT**

In steps 5 and 6, I address the refractive outcome. I find that this is the most important part of the process. Emmetropia must be obtained to maximize outcomes and meet patients’ expectations. I perform either LASIK or surface ablation.

A refractive enhancement is necessary approximately 30% of the time. It is usually required for eyes with residual sphere of 0.50 D or greater and cylinder of 0.75 D or greater. I use the WaveLight Q400 (Alcon Laboratories, Inc.).

**CONCLUSION**

Sixty percent of my cataract patients receive the AcrySof IQ Restor IOL implant. This percentage would be almost 80%, but I screen out patients who have corneal irregularities, limited BCVA, and macular pathology. All of my patients who receive the AcrySof Restor IOL are satisfied, due in no small part to my six-step process, which I believe prepares them for surgery and the postoperative period. With implementation of the Abell six step, my patients become advocates.

Section editor Kerry D. Solomon, MD, is director of the Carolina Eyecare Research Institute in Mount Pleasant, South Carolina, and adjunct clinical professor of ophthalmology at the Medical University of South Carolina in Charleston. Dr. Solomon may be reached at (843) 881-3937; kerry.solomon@carolinaeyecare.com.

Thomas G. Abell, MD, is the medical director and founder of Lexington Laser Eye Center, the medical director and surgeon for AbellEyes Refractive Solutions, and the medical director and surgeon for AbellEyes Laser Vision Correction Center in Lexington, Kentucky. He is a consultant to Alcon Laboratories, Inc., and a member of its speakers’ bureau. Dr. Abell may be reached at (859) 373-0300; drabell@abelleyes.net.