

CORNEAL TRANSPLANT WITH LASER

Dr. Yaron Rabinowitz Serving Patients from Los Angeles, Beverly Hills, Lancaster and Santa Clarita

As a leading Los Angeles corneal transplant specialist, Dr. Rabinowitz is dedicated to providing compassionate patient care and the most rewarding results possible. Please read the information below to learn more about Dr. Rabinowitz and how he performs corneal transplants at his Los Angeles, Santa Clarita and Lancaster facilities.

For the past 30 years Corneal Transplants have been performed using a manual trephine – a plastic device with a circular blade used for cutting the recipient and donor cornea. While this technology worked quite well, there are several problems associated with it, which could lead to significant astigmatism following surgery thus significantly delaying visual recovery. Additionally the cut created by these trephines are vertical which are not ideal for rapid and strong wound healing.

In 2005, the FDA approved the Intralase technology to perform corneal transplants. This is the same technology our center has been using to create LASIK flaps. We were the first center in Los Angeles to bring the Intralase technology to our patients. Now we are the first and one of the few centers to offer this new I.E.K. technology in the Los Angeles area.

With this technology the cornea is cut from the patient in a highly precise manner with the laser(see video clip) and in a similar manner the donor cornea is prepared by the eye bank. The patient is then wheeled from our laser room right into our medicare/AAAHC certified surgery center, the only surgery center in Los Angeles specifically designed for these procedures, and the donor cornea is placed onto the patient in the site where the cornea was removed.

Because both the donor and the recipient are cut in a precise patterned manner(see figure 1), they almost fit perfectly into each other. This allows the surgeon to place the cornea more accurately resulting in much less astigmatism and much more rapid visual recovery. In fact most of our patients have relatively useful vision within the first couple of months after surgery. Also because the cut is patterned, it results in a much larger surface area for healing which results in a stronger wound much earlier and allowing for early removal of stitches.(see figure 2). To minimize the chance of rejection we now combine all of our I.E.K.s with the DALK (Deep Anterior Lamellar Keratoplasty) procedure. Doing this with the Intralase makes it easier to achieve separation of the the layers to obtain excellent vision while minimizing rejection.

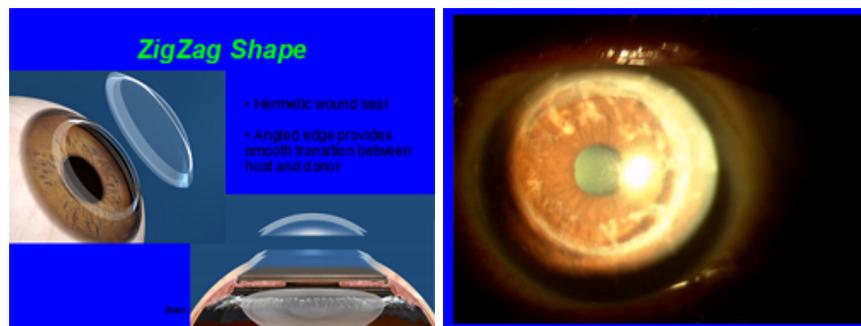


Figure 1

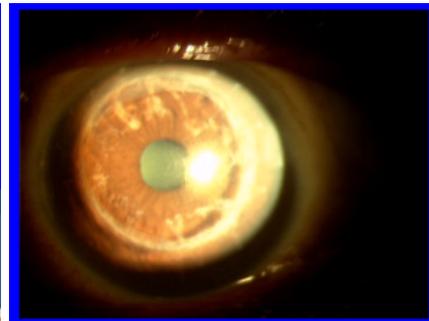


Figure 2

This new technology is truly revolutionary and the results in our first 100 patients has been so good that we now, offer only this technology for our patients who need corneal transplants. Because parts of this procedure are not fully covered by insurance there is some out of pocket costs but all of our patients have told us it is well worth the small additional expense.

Here is what Charles Dickson, an artist in the African American Community and one of our first I.E.K. recipients has to say. " 15 years ago I had a corneal transplant for Keratoconus using the Mechanical(bladed) trephine. I got a good result but it took me 18 months before I could really see well. In July 2007 I had I.E.K for my other eye also with Keratoconus. Within 6 weeks I was seeing better in this eye than I saw with my other eye at 18 months. I am presently seeing 20/40 without correction. This is truly a remarkable advance in corneal transplant technology".(see Mr. Dickson's cornea and topographic map showing only 1.7D of astigmatism following surgery, figures 3 and 4).

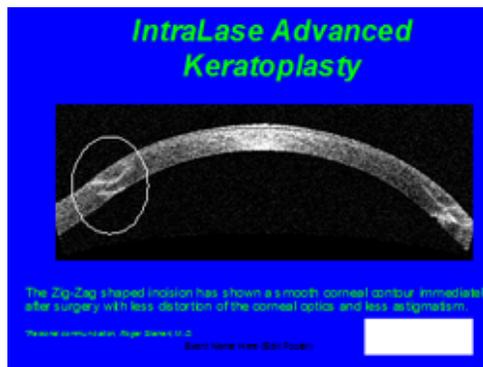


Figure 1

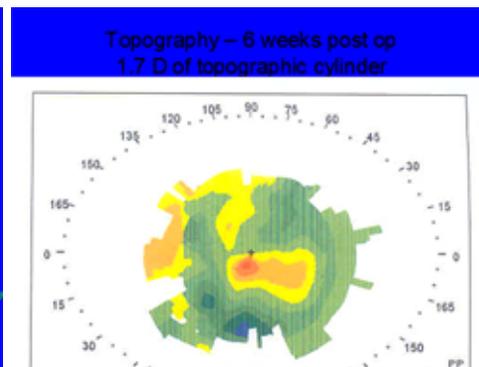


Figure 2