

# Treating Glaucoma

## WITH iSTENT - WORLD'S TINIEST MEDICAL DEVICE

Most of us are familiar with stents used to prevent heart attacks and strokes. When blood vessels get clogged, these devices can be positioned inside the constricted channel to hold them open and maintain adequate flow. In a similar way, the iStent micro-bypass, world's smallest implant, is being placed inside the eye during cataract surgery. It increases fluid flow to help patients manage mild to moderate open-angle glaucoma.



### WHAT IS GLAUCOMA?

A leading cause of blindness, glaucoma is a group of diseases that damage the eye's optic nerve. Mild to moderate open-angle glaucoma is common, but many people do not realize they have it—especially in the early stages before their vision is affected. The condition is caused

by a clogged drainage system within the eye. When fluid cannot get out into the bloodstream, it builds up and pressure rises inside the eye. Too much pressure causes the gradual loss of vision. While this type of glaucoma moves slowly, its damage is irreparable.

### NEW TREATMENT TECHNOLOGY

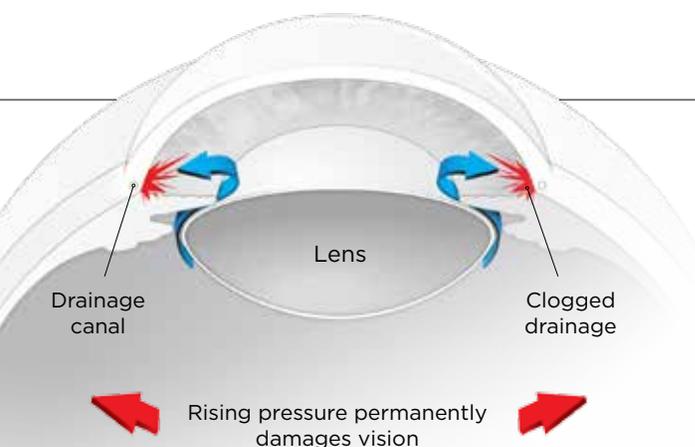
Once diagnosed with glaucoma, most people spend the rest of their lives taking one, two or even three different eye drop medicines. Unfortunately, these drops are needed every day. They can be inconvenient and expensive. But the iStent micro-bypass can increase the eye's ability to drain fluid and is being implanted at the time of cataract surgery by a number of our surgeons.

The tiny titanium iStent is positioned in the eye's drainage canal where it allows blocked fluid to flow into the bloodstream. Eye pressure is lowered and the need for medications is reduced.



iSTENT SIZE





**HOW CLOGGED DRAINAGE DAMAGES VISION**

- A complex drainage system is located in the front part of the eye
- When it gets clogged, fluid cannot flow into the drainage canal
- As fluid builds up, eye pressure rises
- Rising pressure causes gradual loss of vision
- Permanent blindness can result

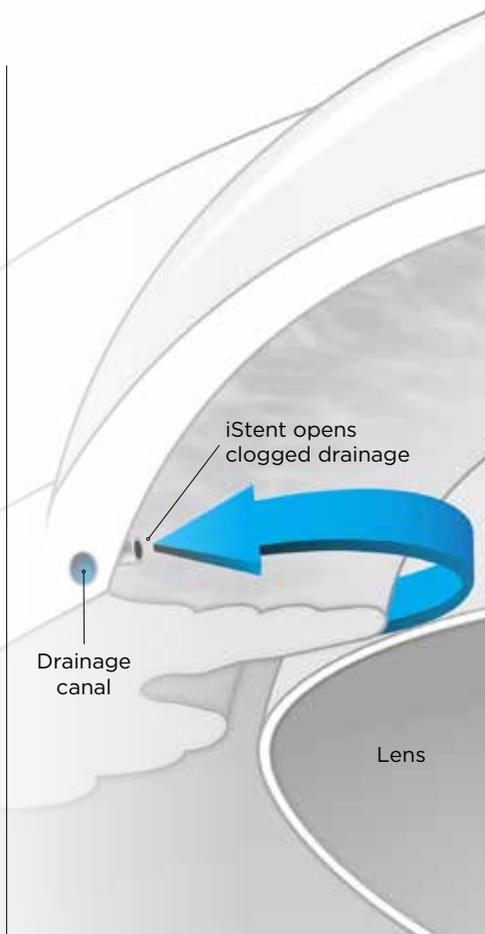
**HOW THE ISTENT WORKS**

While the iStent is highly innovative technology, the way it works is quite simple.

- If you have glaucoma, the drainage system at the front of your eye has become clogged. Left untreated, eye pressure could increase resulting in loss of vision.
- iStent creates an opening through the blockage to improve the eye's natural outflow.
- By increasing fluid outflow, the iStent is designed to reduce pressure within the eye.

**THE PROCEDURE**

Placing the iStent is a short but delicate and precise procedure. Upon completion of cataract surgery, the surgeon uses the same incision to insert the micro-bypass in the front chamber of the eye. The tiny device is gently positioned in the blocked drainage system located near the outer edge of the iris, the colored part of the eye.



**CANDIDATES**

The iStent procedure can be a good option for adults with mild to moderate open-angle glaucoma who are using one to three glaucoma medications and are ready to have cataract surgery. iStent is not usually used for advanced glaucoma patients.

**ADVANTAGES**

- Implanted during cataract surgery
- Usually lowers eye pressure and reduces need of medications
- Has minimal impact on delicate eye tissue and rapid recovery
- Has an excellent safety profile
- May help avoid potential side effects of long-term medication
- Does not limit future vision treatments
- Is covered by Medicare and many private insurance plans

**CONCLUSION**

iStent is the first glaucoma micro-stent to be approved by the FDA. Several other devices are undergoing FDA clinical evaluation and could be available within the next year or two. In our early experience, iStent patients can often discontinue one or two eye drop medications. While cataract surgery on its own frequently reduces eye pressure and improves glaucoma, this small device can significantly enhance improvement. Some patients achieve little or no effect, but the majority enjoy small yet important lowering of eye pressure which seems to last over time.

**QUESTIONS**

If you have questions about this procedure, or would like to proceed with treatment, call our surgery counselors or talk with your optometric physician.

Pacific Cataract and Laser Institute  
www.pcli.com

800-884-7254  
800-557-7254 In Alaska



Scan to watch our iStent video, or visit the glaucoma section of our video library at pcli.com