What is a retinal tear and why is a cryopexy being performed?

A retinal tear is a hole that forms in the outer portion of the retina. Tears can form as a result of posterior vitreous detachment, trauma or a membrane on the retina. People who have moderate to high myopia (-2.0 or greater eyeglasses prescription) are at a much greater risk for developing tears.

A retinal tear almost always precedes a retinal detachment. If left untreated, there is a much higher chance that a retinal detachment can form. A detachment forms because fluid from inside the eye is able to enter the tear, causing the retina to lift off (or detach) from the tissue below. To prevent a tear from causing a retinal detachment, the doctor will seal the retina around the tear.

If the retinal tear is in the extreme outer edge of the retina, or if it is inaccessible by laser, the doctor will perform a retinal cryopexy to seal the tear. The doctor will locate the tear using an indirect ophthalmoscope and place a metal probe on the outside of the eye above where the tear is located.
**How is it done?**

First, the doctor will place an anesthetic drop in your eye to numb it up. After a few minutes, an injection of anesthesia into the conjunctiva will be given to further numb the eye. After the local anesthetic takes effect, the doctor will apply a freezing probe to the outer surface of the eye directly over the retinal hole or tear, and while looking into your eye, will administer several bursts of cryotherapy to the area. The whole procedure takes around 30 minutes to complete.

**Does it hurt?**

During the procedure, you may experience a pressure sensation where the probe is during the freeze application. Less common are sensations of cold and/or a slight pain during the procedure.

**What are the risks?**

Risks involved in retinal cryopexy include infection, subconjunctival hemorrhage, double vision, and glaucoma. Also there is a risk that the hole or tear may not be completely sealed, requiring further treatment. All of these complications except the subconjunctival hemorrhage, however, are quite uncommon.

**When should I call my Doctor if I think I am having a problem?**

Though the risks of complication are minimal, you should contact our office immediately if you experience any of the following symptoms: an increase of flashes or floaters, significant pain in your eye, extreme irritation or redness, a large drop in your vision or the sensation of a black curtain coming across your vision.

**Do I need to take any special care or medications after my retinal cryopexy?**

Yes. If you are diagnosed with a PVD or retinal tear, your doctor may ask that you do not engage in any strenuous activity, jogging or any other exercise, or roller-coasters for at least four weeks. You may experience some post-treatment pain in or around the eye for several days, which can be relieved by taking ibuprofen (like Advil) pain medication. You may also notice redness at or near the freeze site, which should disappear within a week. During this period, your doctor will continue to monitor your healing progress.

**My Post Retinal Cryopexy Instructions**

- Call my Doctor immediately if I experience significant pain, or a large drop in vision in the treated eye.
- Call my doctor immediately if I experience an increase in flashes or floaters, or the sensation of a black curtain across my vision.
- Take 600-800 mg of Ibuprofen with food at home if you experience any pain in or around the eye.