

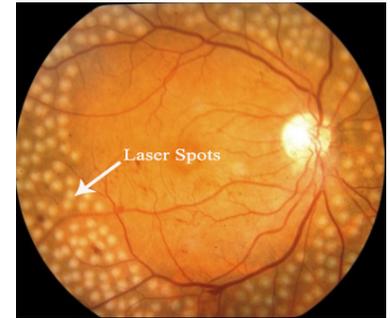
Patient Information:

Pan-Retinal Photocoagulation

Overview:

Pan-Retinal Photocoagulation (PRP) is a form of treatment used for proliferative retinopathy including diabetic retinopathy and vascular occlusion retinopathy. Proliferative diabetic retinopathy is characterized by a growth of abnormal blood vessels within the retina as a result of ischemia (lack of oxygen). These abnormal blood vessels can leak profusely, causing serious damage to the retina and hemorrhaging into the vitreous. Though proliferative diabetic retinopathy only accounts for a small percentage of cases (around 16%), it is responsible for a majority of blindness caused by diabetes.

Pan-Retinal Photocoagulation treatment uses a laser to destroy small areas of the peripheral retina. As shown in the picture above, several hundred spots will be placed in a circle around the mid-periphery of the retina. This reduces the over-all oxygen demanded by the retina, allowing oxygen to be better utilized by the area of the retina responsible for central vision. The treatment also prevents the growth of abnormal blood vessels within the retina. Multiple studies have shown PRP to be very effective in treating proliferative diabetic retinopathy and stabilizing or improving vision. Studies have also shown that over 50% of proliferative diabetic retinopathy cases left untreated lead to blindness, where as only 5% of treated cases lead to blindness



How is it done?

The doctor or an assistant will place several drops in the eye to dilate and numb the eye, preparing it for the laser. Once the local anesthetic drop takes effect, the doctor will have you place your chin on the chin-rest and have you keep your forehead against the forehead-rest. Once in the proper position, a lens will be placed on the front of your eye, which is used to focus the laser precisely on the retina. Through-out the procedure, it is important that you keep your head still.

Does it hurt?

In some patients, the contact lens can cause irritation and/or discomfort. If the anesthetic eye drop is not sufficient to alleviate this discomfort, the doctor can inject a small amount of anesthesia into the top tissue layer or in the space behind your eye. During the procedure, there may be a small pinching sensation with each laser spot. Depending on the amount of laser performed, you may also experience a headache after the procedure. Taking ibuprofen or acetaminophen is usually sufficient to help with this headache.

What are the risks?

Some patients experience a slight irritation after the procedure from the lens being placed on the eye; however, this usually recedes quickly. You won't see out of the eye for approximately 3-4 hours if you has anesthetic given behind the eye (the anesthetic has to wear off before the vision returns). As stated before, it is important that you do not move during the procedure. If you do, there is a possibility that the laser will affect a portion of your vision that it was not intended to (i.e. your central vision). Laser treatment causes light sensitivity, loss of peripheral vision in the area treated with laser, and some glare. Though the use of pan-retinal photocoagulation reduces the risk of vision loss due to diabetes, there is still a possibility that the disease will continue to get worse, causing further vision loss and blindness.

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

The problems after laser treatment are very small. If you have pain in the eye, take ibuprofen or acetaminophen. Should you experience an increase in flashes or floaters, or the sensation of a black curtain coming across your vision please call you doctor immediately. Likewise if you experience significant pain, redness, or a large drop in vision contact your doctor immediately.

Do I need to take any special care or medications after my injection?

No. You can return to your normal activities the same day as your laser treatment and do not need to take any prescription eye drops afterward. You can shower and watch TV without any harm to your eye.

My Post Laser Instructions

- Call my Doctor immediately if I experience significant pain, redness, 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 coming across my vision.
- Take 600-800 mg of Ibuprofen at home with food if you experience any pain in or around the eye.