

Retinal detachment: diagnosis and operation

This leaflet contains information about retinal detachment.

Diagnosis

Inside the eye, the entire space between the lens and the retina is filled with vitreous (see Figure 1). When you grow older, the composition of the vitreous slowly changes. As a result, it may detach from the retina at some point (see Figure 2). This is quite common when you grow older, and it may happen quite suddenly. Sometimes this may cause a small tear in the retina (see Figure 3). Fluid may pass through the tear and end up under the retina, which may cause the retina to lift. This is called retinal detachment or a detached retina (see Figure 4). If you have retinal detachment, you must undergo surgery, because if you don't, your vision may be impaired.

The eye

■ retina ■ vitreous

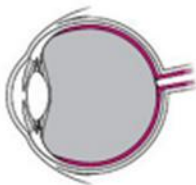


Figure 1



Figure 2



Figure 3



Figure 4

Pre-operative screening

If you and your ophthalmologist have decided that you will undergo surgery, a pre-operative screening appointment (POS) will be scheduled for you. You may have to return for this at a later hour, or on a different day. During your pre-operative screening, you will first have an intake interview with a nurse. She will give you information on the operation and write down any medication you may be taking. We will need a list of all the medicines you are taking. You can get such a list free of charge from your pharmacy.

The anaesthetist will discuss your health status and use of medicines with you. If necessary, a few preliminary examinations will be performed.

If you wish to spend the night at a nearby hotel before or after the operation, the nurse will give you the information you need.

Preparing for the operation

It is important that you apply 2 types of medication to the eye on which the surgery will be performed the night before the operation, while you are at home.

1. 1 drop of Nevanac once. Nevanac drops are thick and slimy. Warm the bottle beforehand by holding it in your hands, and shake well before use. Store the bottle upside down.
2. Tobrex eye ointment once (= 1 cm, once)

The day of the operation

Generally, the operation and your stay at the hospital will take all day. Most people can go home the same day. Retinal detachment surgery is usually performed under local anaesthesia. Some operations require general anaesthesia (narcosis). The anaesthetist will discuss this with you.

During the operation

There are several ways to get the retina back where it's supposed to be.

External operation: scleral buckle

An external operation involves placing a tiny band made of silicon (buckle) around the eye. Afterwards, a tiny hole is created in the eyeball from the outside. As a result, the amount of fluid caught under the retina will reduce. Afterwards, the eye will have to 'repressurise'. To achieve this, a mixture of air or gas is generally injected into the eye. This helps press the tear in the retina shut from the inside. Afterwards, the surgeon will place an additional tiny silicon band (buckle) at the site of the tear in the retina, under the initial band. The buckle will press the tear shut from the outside. In order to ensure that the retina is properly attached again, the part of the retina surrounding the tear is often frozen during the operation, or treated with a laser after the operation.

Internal operation: vitrectomy

When an internal operation is performed, first as much as possible of the vitreous is removed. After that, the retina is pressed into place by means of a special fluid. The retina then undergoes laser treatment to make sure it is properly attached to the back of the eye. The special fluid is then removed and replaced by air, gas or oil. This causes the retina to be pressed into place for a while, until it has properly attached to the back of the eye. Sometimes vitrectomy will be combined with the placement of a tiny band (buckle) around the eye, or with cataract removal surgery.

After the operation

- You will receive a leaflet explaining how to go about your activities, your posture, symptoms you may experience and what kind of post-operative check-ups you can expect.
- You will not be able to drive yourself home after the operation. Therefore, you are requested to bring someone else to the hospital who can take you home after the operation.
- The day after the operation, you will begin to apply the eye drops you have been prescribed.
- One or two days after the operation, you will visit our outpatients' clinic for a check-up. During that check-up, your pupil will be dilated (made wider) by means of eye drops. This will temporarily affect your vision. Therefore, you are requested to bring someone with you when you come to the hospital.

- Bring sunglasses every time you come to the hospital for a check-up. You may be temporarily sensitive to bright light.

If any air was injected into your eye, it will disappear of its own accord, typically after 1 week. Gas, too, will disappear of its own accord: short-acting SF₆ will disappear after about 2 weeks, while long-acting C₃F₈ will disappear after 6 to 8 weeks.

While there is air or gas in your eye, you are not allowed to:

- Fly
- Deep sea diving
- Spend time in mountains with large altitude differences

Oil does not disappear of its own accord, and it will be surgically removed after a few months.

Results

With most patients, surgeons can put the retina back in its right place, and keep it there afterwards. However, sometimes this will take more than one operation or laser treatment. The main reason why the retina will sometimes shift is the growth of scar tissue on the retina. Your sharpness of vision after the operation will mainly depend on the condition of your retina before the operation. Your ophthalmologist will be happy to tell you more about this.

Undergoing treatment at Oogziekenhuis Rotterdam

Oogziekenhuis Rotterdam trains doctors, paramedics and nurses. This means that you may be (partially) treated by someone who is still training to become an ophthalmologist. This is always done under the supervision and responsibility of a fully qualified ophthalmologist.

Oogziekenhuis Rotterdam's policy is to refer patients back to their own ophthalmologist, or to another ophthalmologist closer to their own home. Naturally, we will only refer you back if your ophthalmic symptoms are fully under control. This is also true for patients who came to Oogziekenhuis Rotterdam of their own accord, to obtain a 'second opinion'.

More information

If you have any questions after reading this leaflet, please write them down and discuss them with the ophthalmologist during your next appointment.

Or you can contact our Customer Contact Centre:

- Monday through Friday, between 8.15am and 4.30pm, 010 401 7666.
- Remaining hours: 010 401 7777.