Groin hernia and treatment
**Who is this leaflet for?**

This information is for people who have a groin hernia. It explains what it is, how it is diagnosed, treatment options, what surgery involves and the associated risks.

The information provided is intended for patient guidance only. There are several acceptable treatments and your care may vary depending on the most suitable treatment for you and on your surgeon’s preferences.

**What is a hernia?**

A hernia is a defect (hole) in the abdominal muscles through which the abdominal contents (usually fat but sometimes intestines or other abdominal structures) can protrude. These occur at natural points of weakness in the muscles of the abdominal wall, usually in the inguinal (common), or femoral (less common) regions of the groin.

The term inguinal and femoral simply refer to the position in the groin where these hernias occur.

They can occur on one or both sides (bilateral) of the groin.
What causes a hernia?
Hernias may be present at birth, or develop in later life as a result of any factor that weakens the tissues of the abdominal wall (eg inherited genetics, increasing age, smoking, increased pressure within the abdomen – long term cough, sustained heavy lifting). Usually the development of a hernia is a combination of these factors. There is no good evidence that occasional heavy lifting is a risk factor for developing a hernia.

What are the symptoms?
Remember a hernia is simply a hole in the abdominal wall – a hole through which something can protrude. The hole itself is not painful. There is sometimes, but not always, some discomfort – but it is not excruciating pain. As a rule of thumb, if when you stand up or cough there is no swelling or a lump to see or feel, it is unlikely that you have a hernia – unlikely but not impossible.

When you lie down the protruding bit usually drops back through the hole and there is often nothing to see or feel – unless the hernia is stuck in the hole in the muscles. If the hernia doesn’t go back when you lie down this is called irreducible (or sometimes incarcerated). That is why doctors examine you standing and coughing when checking for a hernia.

How is a hernia diagnosed?
Most groin hernias are diagnosed by the clinical history and examination alone. Occasionally, if the diagnosis is unclear or if pain is the predominant symptom and there is no obvious swelling, further investigations may be used. These include MRI scans, herniography and ultrasound scans.

However, these scans have the problem that they may ‘over diagnose’ hernias. In such cases they report a ‘possible’ or ‘small bulge’, which is really just a bit of normal tissue. So you can’t rely 100% on scans. Be guided by your surgeon.

Does my hernia need to be treated?
Although having a hernia is not usually a serious condition, hernias will not go away without surgical repair.
There is always the option to do nothing. This may be appropriate for longstanding hernias, which do not cause any symptoms and in patients with lots of other medical conditions.

However, most hernias will gradually become bigger and more uncomfortable with time, no matter how careful you are. Wearing a special device called a truss (support) to stop the lump coming out of the hole was used in the past, but is now thought to have no or limited benefit and is also quite uncomfortable.

There is a small chance that a hernia may lead to bowel obstruction or strangulation:

- Obstruction occurs if the intestine (bowel) has become stuck in the hole in the abdominal wall, and like a kink in a hosepipe, contents can no longer pass through the intestine.
- Strangulation occurs if the intestine (bowel) becomes stuck and the blood supply to the portion of the intestine in the hernia gets cut off. This can lead to severe pain and some damage to part of the intestine. The pain is often felt in the abdomen, and the swelling in the groin will become very tender to the touch.

A strangulated hernia is rare and needs emergency surgery. It is always preferable to have a hernia fixed with planned (elective) surgery.

**A loop of intestine becoming trapped and strangulated**
What does surgery involve?

There are two main ways that a groin hernia can be fixed.

‘Open’ surgery – this can be carried out under local or general anaesthetic. Your surgeon will discuss this with you. It’s called ‘open’ because a small incision is made in the skin (usually 2.5-3 inches), in the groin area. The open approach can be carried out using either general or local anaesthetic, and this will depend on both your current health condition and preference after discussion with your surgeon.

During the operation the hernia is identified and the hole is either stitched closed (not common now) or (much more commonly) a mesh is placed over the hole and fixed using fine stitches. The mesh acts like a scaffold and your own tissue will grow through the mesh to reinforce the weakened area without putting tension on the surrounding tissues.

‘Keyhole’ or ‘laparoscopic’ surgery – your operation will be carried out under general anaesthetic. One small cut (1-2cm long) is made near your belly button and two small cuts are made in your lower abdomen. Carbon dioxide gas is used to inflate your abdomen and a small telescopic camera is then inserted to view the hernia from within the abdomen. This means that the surgeon is looking at the hole from the inside of your abdomen. A mesh is then placed over the hole. It is a bit like repairing a puncture in a tyre with a patch from the inside.
There are in fact two laparoscopic methods:

- In TAPP (Trans-Abdominal Pre-Peritoneal) the telescope is placed into the abdominal cavity.
- In TEP (Totally extra-peritoneal) the abdominal cavity is not entered and the operation takes place in the space between the muscles and the lining of the abdomen.

There are advantages and disadvantages to both. In expert hands both methods give equally good results and you should be guided by your surgeon.

All of the operations usually take between 30 minutes and 90 minutes operating time.

**Which operation should I have?**

In practice, there is not much difference between the operations. The surgeon’s expertise in a particular technique is at least as important as the type of repair that is being performed. It is important that this decision is made after discussion with your surgeon.

Keyhole ‘laparoscopic’ repair may be beneficial for:

- recurrent hernias – that have come back after being surgically repaired before using the open operation
- bilateral hernias – hernias in both groins
- hernias in women – there is some evidence that women have a higher chance of another undiagnosed hernia that is not easily seen during open surgery
- very active patients whose predominant symptom is pain.

Open repair using local anaesthetic may be better for patients who are older and have other medical problems, or patients who do not want a full general anaesthetic.

**When will I go home?**

You will usually be able to go home the same day as your operation. If you have other medical conditions, or do not have anyone at home with you,
you may need to stay in hospital overnight. Sometimes it may be difficult to pass urine immediately after the operation and that is another reason to stay in hospital overnight.

What are the risks of surgery?
Problems after straightforward groin hernia repair are very rare but as with all operations there are some possible risks or complications.

Short-term problems
- Bleeding – can occur after any skin cut.
- Infection – can occur after any skin cut.
- Seroma – a collection of clear fluid that sometimes occurs after surgery at the hernia site.
- Haematoma – this is a bruise that can occur in the groin or the scrotum and can be quite dramatic. Whilst a small amount of bruising is normal, a large bruise causing swelling of the scrotum is rare.
- Damage to the surrounding structures – the blood supply to the testicle (on the side of the hernia repair) can be damaged (this is very very rare in first time hernia repair). Other abdominal structures can be damaged in keyhole surgery (also very rare).
- Deep vein thrombosis and pulmonary embolism – blood clot in the legs, which may then travel to the lungs, can be a problem after any operation. The risk after hernia repair is very very low. If you are an ‘at risk’ individual, you will be given special graded compression stockings and possibly blood thinning injections to reduce the risk even further.

Medium and long-term problems
- Recurrence – the hernia comes back – about a one in 200 risk.
- Long term discomfort or pain – this is rare but can occur in up to 5% (one in 20) groin hernia repairs. By long term pain we mean pain lasting for more than three months after the operation. We don’t know exactly what causes long term discomfort but one theory is that it is due to inadvertent nerve damage during the operation. The likelihood appears to be higher in patients who have small hernias and whose predominant symptom before the operation is pain.
Mesh infection – this is very very rare (about one in 500 risk). The mesh can become infected – usually from bacteria on the patient’s skin. If this does occur the mesh will usually need removing with another operation and the hernia may come back (recur).

How do I prepare for surgery?
You will need to attend a pre-operative assessment clinic or have a telephone assessment. This allows us to assess your fitness for surgery and ensures you are fully prepared for your operation.
This will include:
- giving a health history
- providing blood samples
- obtaining an MRSA (Methicillin resistant Staph-Aureus) swab, if necessary
- giving a medication history (please bring your medications with you)
- giving you the opportunity to answer any questions you may have.

On the day of the procedure
Your surgical team will have given you specific instructions for your case, depending on the time scheduled for your operation. It is really important that you follow these instructions or your operation may have to be postponed.

Make sure that you have a friend or relative who can bring you in to hospital, take you home, and stay with you overnight.

Wear comfortable loose fitting clothing and bring a small overnight bag with dressing gown, slippers, nightwear and toiletries (just in case you need to stay overnight).

How will I feel after surgery?
During your operation, you will have local anaesthetic or will be asleep so should not feel any pain. Afterwards, you may have some mild discomfort and painkillers will be provided to keep you comfortable.
If you had your surgery laparoscopically you may experience shoulder tip pain as well as surgical pain secondary to the gas used to expand your abdomen.

The effects of anaesthetic will usually have worn off after a couple of hours.

You will be able to eat and drink as soon as you feel able.

You will be encouraged to mobilise as soon as possible, for example to walk out to the toilet. You will usually be allowed home within four hours following surgery.

**What happens when I go home?**

- **Pain** – over the counter medication such as paracetamol/ibuprofen should give adequate pain relief so ensure you have a supply at home. It is advised that they are taken regularly (i.e. four to six hourly as per the instructions) for the first 48 hours following surgery, then continued as required.

- **Bruising** – there may be some bruising at the operation site. This is entirely normal and will gradually go down. If bruising/swelling increases rapidly within hours of surgery and is associated with dizziness/light headedness inform your GP.

- **Numbness** – you may notice that there is a numb area below the wound. In most cases these sensations will gradually return, but sometimes a small area of numbness remains.

- **Diet** – you may eat and drink normally.

- **Mobility** – this is very important. Try to remain physically active. If you feel tired, sit down and put your feet up for short periods, but do not go to bed during the day. This will improve circulation in your legs and reduce the risk of deep vein thrombosis (DVT).

- **Hygiene** – shower rather than bath for the first 10 days. The dressing provided should be waterproof but check this with your nurse before you are discharged.

- **Wounds** – methods of wound closure vary depending on your surgeon. Sutures (stitches) are usually dissolvable and you should be able to remove any steri-strips (‘butterfly stitches’) yourself at seven days. Do not change the dressings unless they have become very blood stained.
Wounds should appear clean, dry and healing. If you are in doubt seek advice from your GP’s practice nurse.

- **Activities** – as you recover you will be able to increase your activities. You will be able to return to work within one to two weeks but if your job involves heavy lifting it may be up to six weeks before you can return to work. Discuss this with your consultant.

- **Driving** – you may drive as soon as you are able to drive safely without impairment to your reaction time or ability to think clearly. It is always a good idea to check with the DVLA and your insurance provider.

**Will I need a follow-up appointment?**

Most patients recover quickly and do not need to be seen again, however if required, an out-patient appointment could be made.

**What should I watch out for following surgery?**

You should feel better every day following surgery. However, if you feel worse than the previous day and have any of the following symptoms in the first week:

- sudden, prolonged abdominal pain not improved with medication
- cannot eat or drink and have unexplained nausea and/or vomiting
- have increased abdominal tenderness and bloating (distension)
- or develop an irregular heartbeat, palpitations, a high temperature or sweats.

**Please contact:**

Upper GI Team

- Louise Maitland – Upper GI Nurses
  Jackie Dingle 07785744872
- Bianca Daniels – Secretary
  (For Mr Finlay/Mr Peyser) 01872 253058
- Penny Pellow – Secretary
  (For Mr Cota/Mr Clarke/Mr Cioara) 01872 252373
Colorectal Team

- Colorectal Nurse Specialist
  07917243118
- Denise Crawley – Secretary
  (For Mr Widdison/Mr May)
  01736 874145
- Georgia Rance – Secretary
  (For Mr Faux/Mrs Feldman)
  01872 252271
- Trudy Caldwell – Secretary
  (for Mr Lidder/Mr Arumagam)
  01872 252736
- Penny Gerrard – Secretary
  (Mr Gopalswamy)
  01736 874038

Or your GP, explaining your recent keyhole surgery and your current symptoms.

OUT OF HOURS

You can contact the St Mawes Ward 01872 253032 explaining that you have had keyhole surgery and the problems you are experiencing. They will take your details and the on-call Registrar should call you back to discuss your concerns.

OR

Call the emergency GP.

For a life threatening emergency dial 999.

Further Information

www.nhschoices.uk
www.britishherniasociety.org
Patient Advice and Liaison Service (PALS) Royal Cornwall Hospital
01872 253545

Please contact your Consultant’s team for further advice.
If you would like this leaflet in large print, braille, audio version or in another language, please contact the General Office on 01872 252690