You have been booked for a

**Repair of**

**HYDROCELE**
This leaflet aims to give you information about your operation, your stay in hospital and advice when you go home. Some of the information may or may not apply to you. Feel free to discuss any issues and questions you may have about your surgery with the medical and nursing staff looking after you.

**HYDROCELE**

A hydrocele is a collection of fluid in a sac in the scrotum next to the testicle. The normal testis is surrounded by a smooth protective tissue sac. It makes a small amount of “lubricating fluid” to allow the testes to move freely. Excess of fluid normally drains away into the veins of the scrotum. If the balance is altered between the amount of fluid made, and the amount that is drained, some fluid accumulates as hydrocele. This will often cause the scrotum to look big or swollen. A hydrocele can be on either one side or on both sides of the scrotum.
WHAT CAUSES A HYDROCELE?

In Children

During pregnancy, the testicles in boy babies actually grow inside the abdominal cavity, not in the scrotum. Four months before birth, a tunnel formed by the smooth lining of the intestinal cavity, pushes down into the scrotum. Between 1 and 2 months before birth, the testicle moves down through this tunnel to be anchored in the scrotum. The tunnel should close after the testicles move through it.

Sometimes when it seals off, some fluid is trapped around the testicles of the scrotum. This trapped fluid is called a non-communicating hydrocele. Sometimes the tunnel closes down but does not completely. As a result, at times the fluid can drip down and accumulate in the scrotum to cause it to look bigger while at other times it can drain back into the
abdominal cavity and thus make the scrotum look normal in size. This is called a **communicating hydrocele** because there is still a tunnels communicating between the belly and the scrotum.

Distinguishing between a communicating and a non communicating hydrocele is important since it may influence the treatment recommended by the surgeon.

**In Adults**

Sometimes, and more commonly in older men, inflammation, trauma of the testicle and epididymis or fluid or blood can cause obstruction within the spermatic cord. Occasionally a hydrocele may be associated with an inguinal hernia. Many occur for no obvious reason.

A hydrocele results in a painless, swollen scrotum, one or both sides, that feels like a water filled balloon.

Diagnosis is confirmed by examination, ultrasound or by transillumination (using a shining flashlight through the swollen part of the scrotum. If the scrotum is full of clear fluid, the scrotum will light up).
WHAT ELSE CAN CAUSE SCROTAL SWELLING BESIDES HYDROCELES?

- Certain medical treatments
- Congestive heart failure
- Epididymitis
- Hernia
- Injury
- Orchitis
- Surgery in the genital area
- Testicular torsion
- Varicocele
- Testicular cancer

HOW IS A HYDROCELE TREATED?

Hydroceles are usually not dangerous. They are usually only treated when they cause infection, discomfort or embarrassment. The best treatment for the hydrocele is surgery. Surgical repair or removal of the fluid filled sac is performed through an incision in the scrotum under a general anaesthetic to prevent further accumulation of fluid.

Benefits of surgery:
- Cosmetic
- Reduction of scrotal size
- Pain relief
WHAT ARE THE ALTERNATIVES TO THIS PROCEDURE?

Leaving it alone can be an option

In adults, if the hydrocele causes no symptoms, one option is simply to leave it alone. If it becomes larger or troublesome, you can always change your mind and have treatment.

For most patients less than a year of age, surgeons will often recommend observing (just watching) non-communication hydroceles. This is because many of these hydroceles will go away on their own. However, if the hydrocele fails to disappear by the time the child reaches his first birthday then it is unlikely to do so. In this situation, the child probably need an operation.

Drainage

The fluid can be drained easily with a needle and syringe. However, following this procedure, it is common for the sac of the hydrocele to refill with fluid within a few months. Draining now and then may be suitable though, if you are not fit for surgery or if you do not want an operation.
The risks associated to this procedure are: recurrence of the hydrocele in 100% of the cases (the fluid builds up again in a month or two), infection, haemorrhage and increase of adhesions in the area that make more difficult and with more chances of complications the surgical repair.

WHAT SHOULD I EXPECT BEFORE THE PROCEDURE?

You will usually be admitted on the same day as your surgery. This minor surgery is done as a day case using general anaesthesia with prompt recovery expected.

You will be asked not to eat or drink for 6 hours before surgery and, immediately before the operation, you may be given a pre-medication by the anaesthetist which will make you dry-mouthed and pleasantly sleepy.

Please be sure to inform your Urologist in advance of your surgery if you have any of the following:

-an artificial heart valve
- a coronary artery stent
- a heart pacemaker or defibrillator
- an artificial joint
- an artificial blood vessel graft
- a neurosurgical shunt
- any other implanted foreign body
- a prescription for Warfarin, Aspirin or Clopidogrel (Plavix)
- a previous or current MRSA infection
- high risk of variant CJD (if you have received a corneal transplant, a neurosurgical dural transplant or previous injections of human-derived growth hormone).

**HOW LONG WILL I BE IN HOSPITAL?**

Your operation has been planned as a day case procedure which means that you will be able to come into hospital and be discharged late the same day. Depending on their circumstances, some patients are admitted overnight.
**BEFORE YOU COME INTO HOSPITAL**

You will need to have a bath or shower. Please shave your operation site before admission, or if you prefer we shave you before surgery.

**ADMISSION TO HOSPITAL**

On arrival to hospital, you will need to book in at the Admission desk. You will be directed to the ward, to day surgery or to the theatre; here you will meet your nurse and other members of the team who will be looking after you. The facilities and general routine of the ward would be explained to you.

**GETTING READY FOR THE OPERATION**

The nurse who is admitting you will ask some routine questions, about your general health, the medication you take and any allergies you have. You will be seen by your surgeon and anaesthetist. You will be asked to sign a consent form if you have not already done so, to say that you understand what you have come into hospital for and what the operation involved. If you have any question, please ask.

You will be asked to put on a theatre gown. A nurse will check that you have a wristband on with your name, and that your documentation, consent is in order. (You will be
asked the same questions by several staff en route to theatre, these are all safety measures).

**CONSENT AND RISKS**

A consent form is a legal document, recognizing your willingness to proceed with the intended treatment. You are required to sign a consent form for the operation once you fully understand the reason for the operation and the risk involved.

All the operations have risks associated with them. All risks should be discussed with your doctor. You should understand the procedure and any available alternative treatment discussed.

Your local doctor may also be able to answer your question.
THE HYDROCELE REPAIR OPERATION

You will be anaesthetized and pain free. Either a full general anaesthetic (where you will be asleep throughout the procedure) or spinal anaesthetic (where you are awake but unable to feel anything from the waist down) will be used. All methods minimise pain; your anaesthetist will explain the pros and cons of each type of anaesthetic to you.

IN CHILDREN

The repair involves making and incision just below the belt line and dissecting down to the hole in the muscle layer. The hydrocele lying is removed from the scrotum and any communication with the belly cavity is closes with stiches. The deeper tissues and skin are the sewn together with dissolvable
sutures that are hidden under the skin so that there are no stiches to be removed.

An incision is made just above the groin. The open communication between the abdominal cavity and scrotum will be repaired. The muscles are tightened to prevent a hernia. The fluid is removed from the scrotum, and the incision is closed. The stiches dissolve, no stiches have to be removed after surgery.

**IN ADULTS**

An incision is made in the scrotum, the fluid is drained and the hydrocele sack either everted or sewn up so that it cannot re-form.
ARE THERE ANY SIDE EFFECTS

As with any medical treatment there are some potential complications with hydrocelectomy. You should be reassured that, although all these complications are well recognized, the majority of patients do not suffer any problems after a urological procedure.

COMMON (GREATER THAN 1 IN 10)
Swelling of the scrotum lasting for several days
Seepage of yellowish fluid from the wound several days after surgery

OCCASIONAL (BETWEEN 1 IN 10 AND 1 IN 50)
Blood collection around testes which resolves slowly or requires surgical removal.
Possible infection of the incision or the testis requiring further treatment with antibiotics or surgical drainage

RARE (LESS THAN 1 IN 50)
Recurrence of fluid collection
Chronic pain in the testicle or scrotum

HOSPITAL-ACQUIRED INFECTION
Colonization with MRSA (0.9% - 1 in 110)
Clostridium difficile bowel infection (0.01% - 1 in 10,000)
MRSA bloodstream infection (0.02% - 1 in 5000)
The rates for hospital acquired infection may be greater in high risk patients e.g. with long term drainage tubes, after removal of the bladder for cancer, after previous infections, after prolonged hospitalization or after multiple admissions.

**AFTER YOUR OPERATION**

You will wake up in the recovery room; here specially trained nurses will monitor closely how you feel. On waking you will have a small oxygen mask in place, this will help the anaesthetic wear off. The nurses will check your blood pressure and pulse and make sure that you are comfortable. When the doctors and nurses are happy with your condition you will be taken back to the ward were you will be made comfortable and can rest.

Refreshments will be offered as soon as is safe for you to have these.
PAIN CONTROL

Expect some discomfort. You will have given strong pain killing and/or local anaesthetic drug in theatre, which will reduce pain for the first few hours. Your pain will be closely monitored to ensure that is kept to a minimum. You will be offered and given pain relief, as appropriate. You will be given pain-killing tablets to take home, which you should take as directed. The doctor can give you some antibiotics to take for 5 days as directed.

WHAT SHOULD I EXPECT WHEN I GET HOME

When you leave hospital, you will be given a ‘draft’ discharge summary of your admission. This holds important information about your inpatient stay and your operation. If you need to call your GP for any reason or to attend another hospital, please, take this summary with you to allow the doctors to see details of your treatment. This is particularly
important if you need to consult another doctor within a few days of your discharge.

You must make sure that an adult can take you home in a car or taxi. You will need to go home to rest; you must have an adult stay with you for the first 24 hours after your operation. You should not drink alcohol for a minimum of 48 hours after your operation.

Ice packs may be kept close to the areas for the first day after surgery to reduce the swelling. You are advised to wear close fitting underpants for support for a few weeks after surgery.

After a hernia operation the patient will have some pain. Many times this is controlled with over-the-counter pain medicines, but it may be necessary to take prescription pain medicine as directed by your surgeon. The child may need to rest at home before returning to school for up to a week, and will likely have to refrain from full strenuous activities for a month.
It is advisable to wear supportive underpants or scrotal support until the swelling and discomfort have settled.

You are advised to take 10-14 days off work and should avoid any strenuous exercise or heavy lifting to allow wound healing. Sexual intercourse is best avoided or 10 days or until local discomfort has settled.

**THE WOUND**

The wound should be kept clean and dry for 24 hours. Thereafter, if a dressing is in place, this can be removed following a short bath or shower. Until this area, heals, do not have lengthy baths or showers since this will encourage the stiches to dissolve too quickly and my cause infection.

You will have dissolving stiches, which may begin to come away after a few days but can take up to two weeks to clear completely. If all is well you may shower the day after your surgery. Pat the wound dry gently with a clean towel for the first seven days or so. Thereafter you may treat the wound normally. You should expect some swelling to the wound and testicles, which may feel hard and there may be some bruising. Wearing supporting underpants (slip type, tight and/or double) will help to reduce swelling an ease discomfort.
OTHER IMPORTANT POINTS

Some lumpiness above or behind the testicle is common following the procedure and is often permanent.

WHAT TO LOOK FOR

It may be several hours before you pass water. If you have any difficulty, particularly if your bladder feels uncomfortable full but you still cannot pass water, you should attend your local Emergency Department.

If you suffer from excessive pain, excessive bruising or excessive swelling of the testicles you should contact your own GP or the department for advice or attend your local Emergency Department.

THE FIRST FEW DAYS

Gently increase your activity over the first few days, little and often you can do more each day.

You are encouraged to move and walk as this will help prevent stiffness, soreness and help with your circulation and minimize the risk of complications such as chest infection, deep vein clots and clots to the lungs. Take painkillers to ease any discomfort to enable you to mobilise.
WORK AND ACTIVITY

You can get sick note from the ward for the first week. You will need to see your GP for any further sick notes. At first, discomfort in the wound will prevent you from harming yourself by lifting things that are too heavy. You can return to normal activity when the pain has settled. Swelling of the wound or testicle need not prevent normal activity (if it is not severe). Sex will not harm you but may be painful in the first week or two. You should be able to return to work after one or two weeks.

DRIVING

You may drive as soon as you are confident that you can do an emergency stop. One or two weeks is usual.

OUTPATIENT

You will not routinely be given an out-patients appointment, but should you have any concerns or would like some advice, please ring our office.
If you develop any of the following:

- Big swelling and pain in the scrotum
- Fever, chills, sweats
- Worsening wound discomfort
- Haematoma in the area

NOTIFY THE UROLOGIST OR ATTEND TO THE EMERGENCY DEPARTMENT