

# MELANOMA INSTITUTE AUSTRALIA

## GROIN LYMPH NODE CLEARANCE

### PATIENT INFORMATION



### WHAT IS GROIN (INGUINAL) LYMPH NODE CLEARANCE?

A groin lymph node clearance involves the removal of all the lymph nodes and possible tumour-containing tissue from the groin region.

## LYMPH NODES AND THE LYMPHATIC SYSTEM

Lymph is fluid that crosses from the blood vessels into the tissues as part of the normal (physiological) process of fluid circulation in the body. It travels in a network of lymphatic vessels that eventually return this fluid to the bloodstream. Lymph nodes or lymph glands function as filters along these lymphatic vessels. They trap bacteria and cancer cells and also help the body mount an immune response to infection or cancer. Lymph nodes are commonly found clustered together, particularly in the neck, armpit (axilla) and groin (as shown in Figure 1). Nearly all parts of the body have lymphatic drainage to a specific lymph node or several nodes. The pattern of lymph fluid drainage is different for each individual. The sentinel node(s) is the first lymph node(s) along the lymphatic vessels that drains the fluid from the skin site where a melanoma is located.

If a sentinel node has melanoma in it, or if lymph nodes are found to contain melanoma, irrespective of whether a person has had a previous sentinel node biopsy, the usual recommended treatment is a surgical **lymph node clearance** of the involved lymph node area.

A lymph node clearance is a major operation that aims to control the progression of the melanoma in the lymph node region. After this type of surgery there are sometimes long term consequences that may limit function of the limb or area of the surgery.

This brochure is about the operation involving the group of lymph nodes in the groin.

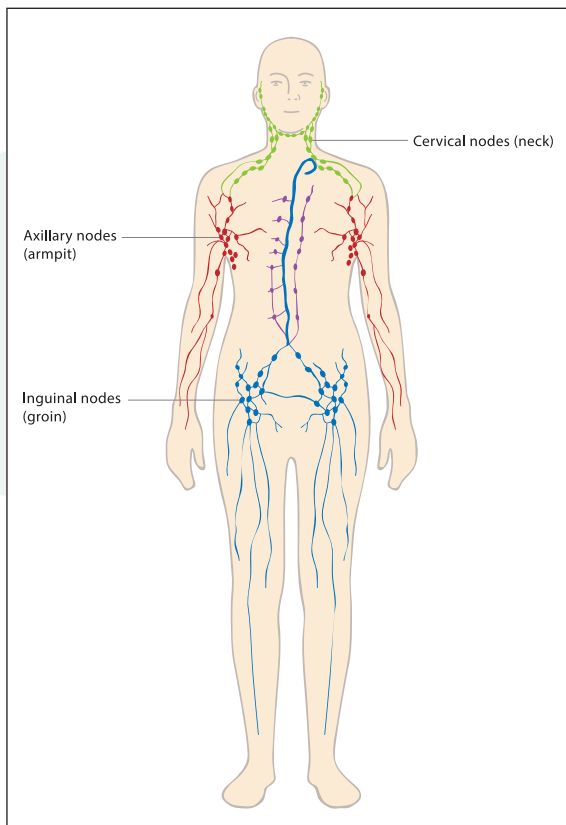


Figure 1: Diagram of the lymphatic system reproduced with permission of Cancer Australia.

## THE OPERATION

### BEFORE THE OPERATION

You will need to attend the hospital a few hours before your operation, having fasted (i.e. no food or fluid) for 6 hours. A full stomach can cause regurgitation of the stomach contents when an anaesthetic is administered. This is dangerous as inhalation of stomach contents into the lungs can result.

### PREPARING FOR A GENERAL ANAESTHETIC

Please let your anaesthetist know if you have had problems with anaesthesia in the past, including post-operative nausea and vomiting. Modern anaesthetic techniques and drugs can reduce this. If you are very anxious you should let the anaesthetist know. Most medications should be continued up to and including the day of surgery, taken with a small sip of water. Two very important exceptions are tablets that thin the blood (for example, aspirin, ibuprofen, cartia, warfarin, clopidigrel) and diabetic tablets (you will be fasting). These should not be taken on the day of surgery.

Your surgeon and anaesthetist should be made aware that you take these medications and will instruct you on what to do leading up to the operation.

**Many complementary medicine treatments can affect blood clotting so please inform your surgeon if you are taking any of these.**

You will also have special stockings to help prevent blood clots in the legs and usually an injection of a drug (heparin or clexane) into the abdominal skin to reduce the risk of blood clots causing deep vein thrombosis (DVT) or pulmonary embolism.

### DURING THE OPERATION

Your surgeon will see you just before going into the operating theatre and will mark the site of the proposed operation. Any final questions can be asked at this time.

A groin dissection is performed under a general anaesthetic so you will not be awake during the procedure. Once you are asleep local anaesthetic will be injected into the area of surgery to provide additional comfort after the operation.

The procedure involves making an incision in the groin. The structures of the groin can be exposed this way, allowing a complete and safe operation.

There are several important structures that run through the groin (arteries, veins and nerves) and the operation is planned and performed to remove all the lymph nodes and associated tissue without causing damage to these. However, minor groin nerves must be removed as part of the operation. This results in a small region of numbness in the upper thigh which is not troublesome but often permanent.

Sometimes it is necessary to remove lymph nodes from above the level of the groin. These lymph nodes are located in the pelvis. Removal of these lymph nodes requires a larger incision extending further up the abdomen. The muscles of the abdominal wall are split to give access to the lymph nodes and then repaired prior to closure of the skin wound.

Using stitches or staples, the procedure generally takes 1–3 hours. Any large wound produces fluid (like that in a blister) so a surgical drain is placed to collect this. The drain is a soft flexible silicone tube that is connected to a suction bottle. It will be checked frequently after the operation and changed as required by the nursing staff (see Figure 2). The drain will generally be in place for 5–10 days, but sometimes up to six weeks after the operation.

After the operation a pathologist assesses the tissue removed from the groin. The detailed pathological examination of this tissue takes about seven working days. Information from this analysis is important regarding your ongoing care and may determine the need for radiotherapy and other forms of treatment.



*Figure 2: Drains in the groin area following surgery.*

## AFTER THE OPERATION

### IMMEDIATELY AFTER THE OPERATION

After surgery you will be taken to a recovery ward that is specially equipped and staffed to monitor patients postoperatively. Pain relief and anti-nausea medication will be provided as necessary. It will be important for you to inform the recovery staff if you are in pain or feel sick so that more medication can be given.

### THE DAYS AFTER THE OPERATION

The benefits of being out of bed and moving around soon after an operation need to be balanced against the risk of causing bleeding and aggravating discomfort in the wound following a groin operation. Groin dissection wounds sometimes have complications of healing. In most cases surgeons prefer their patients to remain on bed rest for up to five days. After this you will be encouraged to slowly mobilise as comfort allows. The drain will be checked frequently and the reservoir emptied or replaced as required.

Most patients, depending on their level of fitness and their home circumstances, spend 5–7 nights in hospital and then go home, often with the drain in place. The nursing staff will train you in its care and arrange follow-up prior to leaving hospital. Community nurses are often organised to assist in the management of the drain when you return home. At the time of discharge a prescription for analgesics and possibly antibiotics will be provided. Generally the stitches and/or staples in the wound will be removed after 10–20 days.

Tiredness is common for a few weeks after any major surgery and you will need to take at least 3–6 weeks of leave from even the quietest of jobs. It is important to take life quietly and allow the area of surgery to heal. You may drive and resume normal activities when you feel confident of full control. For most people this takes several weeks, sometimes longer. It may be useful to check with your insurance company regarding their policy concerning “impairment to drivers”.

## POSSIBLE SIDE EFFECTS

Most people cope with the operation very well and have few problems. The most common problems relate to prolonged lymph flow via the drain, fluid collection in the groin, or minor wound infection. These problems are usually managed simply, without needing re-admission to hospital.

Your surgeon will have discussed the benefits and the risks of the procedure at your pre-operative consultation and this document is not intended to replace that discussion. However, in broad terms possible side effects can be grouped as follows:

### EARLY SIDE EFFECTS (COMMON)

- Numbness around the wound and in the upper thigh, minor wound infection, small haematoma (blood collection) or seroma (lymph fluid collection).
- With a more extensive procedure involving removal of the nodes in the pelvis the bowel may rest for 2–3 days making it uncomfortable to eat solids. Fluids only may be recommended orally until the bowels begin to work normally again.

### EARLY SIDE EFFECTS (UNCOMMON)

- Excessive bleeding needing re-operation, major wound infection requiring re-operation.
- Deep vein thrombosis (clots in the veins in the legs), pulmonary embolism (clots in the lungs).
- Damage to nerves supplying muscles, damage to blood vessels.
- Chest infection.

### LATE SIDE EFFECTS (COMMON)

- Prominent scar at site of incision.
- Numbness around wound and in the inner thigh.
- Small seroma (fluid collection) in wound.
- Lymphoedema (swelling of the leg).

## LATE SIDE EFFECTS (UNCOMMON)

- Large seroma (fluid collection) requiring repeated drainage or new drain insertion.
- Neuralgia in the leg or groin.

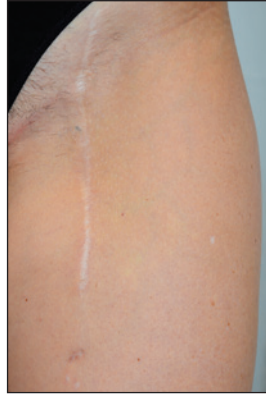


Figure 3: The scar will fade over time.

## LYMPHOEDEMA

Lymphoedema is limb swelling due to retained lymphatic fluid. It occurs in 15–20% of patients that have this operation. If it does happen, there is obvious fluid retention in the limb that may create problems using the limb. It may be uncomfortable. It isn't usually painful unless there is infection present. Lymphoedema mostly happens within 12 months of melanoma surgery but may occur years later. It may be brought on by trauma to the leg especially if there is a penetrating injury to the skin and infection occurs.

If lymphoedema does occur, active and ongoing therapy, sometimes with compression bandaging and garments and manual lymphatic drainage techniques, is required. This would require referral to a specialist lymphatic therapist. There is a separate brochure available about lymphoedema.

## RECOVERY

Most people recover well from groin dissection and return to their usual work and recreational activities after 4–6 weeks. The scar in the groin becomes less noticeable with time.

Regular post-operative checks for progress on healing and possible melanoma recurrence will be recommended.

The surgery has taken place because of the excellent chance it will stop the melanoma progressing in the groin and reduce the risk of spread from the groin to elsewhere in the body. However, it may not stop the melanoma recurring elsewhere in the body and ongoing, regular, follow up will therefore be necessary.

It is important to discuss any issues raised by reading this information brochure with your surgeon.

