Axillary lymph node clearance

This leaflet explains more about an axillary lymph node clearance, including the benefits, risks and alternatives, and what you can expect when you come to hospital.

If you have any further questions, please speak to a doctor or nurse caring for you.
Further information

Pharmacy Medicines Helpline
If you have any questions or concerns about your medicines, please speak to the staff caring for you or call our helpline.

phone: 020 7188 8748 9am to 5pm, Monday to Friday

Your comments and concerns
For advice, support or to raise a concern, contact our Patient Advice and Liaison Service (PALS). To make a complaint, contact the complaints department.

phone: 020 7188 8801 (PALS) email: pals@gstt.nhs.uk
phone: 020 7188 3514 (complaints) email: complaints2@gstt.nhs.uk

Language Support Services
If you need an interpreter or information about your care in a different language or format, please get in touch:

phone: 020 7188 8815 email: languagesupport@gstt.nhs.uk

NHS 111
Offers medical help and advice from fully trained advisers supported by experienced nurses and paramedics. Available over the phone 24 hours a day.

phone: 111
What is an axillary lymph node clearance?

An axillary lymph node clearance is also known as a ‘lymph node dissection’ or a ‘lymphadenectomy’. It involves removal of all the lymph nodes and possible tumour containing tissue from the axilla (armpit).

A system called the ‘lymphatic system’ transports a substance called ‘lymph’ around the body. Lymph is produced when liquid leaves the blood vessels and enters the surrounding tissues to help provide them with nutrients and oxygen. The lymph fluid is then collected in lymphatic vessels that run up the limbs and chest, and re-enters the bloodstream near the heart. Specialised clusters of tissue called ‘lymph nodes’ (found in the groin, armpit, abdomen, chest and neck) filter lymph travelling through the lymphatic vessels, removing bacteria and cancer cells and preventing these from spreading elsewhere in the body.

Skin cancers, such as melanoma and squamous cell carcinoma, can spread to other parts of the body by the lymphatic system. When cancer cells are filtered, they can get caught in the lymph nodes and can grow there. For example, cancer cells from a skin cancer on the hand can be transported in the lymph via lymphatic vessels to the axilla where they can get caught in lymph nodes and begin to grow. Cancers can also spread to other parts of the body (including the lung, brain and bone) via the blood stream.
If the cancer has spread to your lymph nodes, lymph node clearance is usually recommended. A lymph node clearance is a major operation that aims to stop the cancer from progressing in this region.

**What are the benefits of the operation?**

Surgery to remove the lymph nodes in the axilla will remove all the lymph nodes in the area and help to control the spread of the cancer and hopefully, reduce the chance of spread to other parts of the body.

**What are the risks of the operation?**

The risks of any operation relate in part to the anaesthesia and in part to the operation itself.

In most cases you will have a general anaesthetic – this means that you will be unconscious for the entire operation. You will be able to discuss this with the anaesthetist (the doctor who gives the anaesthetic) before surgery and he/she will identify the best method for your individual case. For more information about this please see our leaflet, **Having an anaesthetic**. If you do not have a copy, please ask us for one.

The main surgical risks are listed below. The full list of risks will be explained by the surgeon treating you.
If you have any questions about your treatment, please contact:

**Clinical nurse specialists (CNS) (skin cancer)**

- **Alison Baker**  
  
  **t:** 020 7188 6639  
  **pager:** 0844 822 2888 (give the operator the pager number 854876)  
  (Monday to Friday, 8am to 4pm)

- **Ian Gosling**  
  
  **t:** 020 7188 4901  
  **pager:** 0844 822 2888 (give the operator the pager number 853360)  
  (Monday to Friday, 8am to 4pm)

- **Cath Morgans**  
  
  **t:** 020 7188 6384  
  **pager:** 0844 822 2888 (give the operator the pager number 898491)  
  (Monday to Thursday, 8am to 6pm)

**If you have any questions about your outpatient appointments or clinic letters contact:**

**plastic surgery consultant secretaries**

- **Mrs Jenny Geh**  
  
  **t:** 020 7188 5130  
  (Monday to Friday, 9am to 5pm)

- **Mr MacKenzie Ross**  
  
  **t:** 020 7188 9861  
  (Tuesday to Thursday, 9am to 5pm)

For more information leaflets on conditions, procedures, treatments and services offered at our hospitals, please visit [www.guysandstthomas.nhs.uk/leaflets](http://www.guysandstthomas.nhs.uk/leaflets)

**Very common problems (affecting approximately one in 10 patients)**

- Numbness around the scar and upper arm (which can be permanent).
- Seroma (liquid collection at the site of operation).
- Mild wound dehiscence (opening up) or delayed wound healing.
- Lymphoedema (persistent swelling of the arm) which is due to retained lymph liquid. This can be uncomfortable and can interfere with the use of the arm. It usually occurs less than one year following the operation but may occur later following trauma or infection in the arm. If lymphoedema develops it can be difficult to treat and requires long term treatment with compressive stockings and specialist physiotherapy.
- Infection of the arm.
- Shoulder stiffness-physio may be needed to help you to mobilise

**Common problems (affecting approximately one in 100 patients)**

- Haematoma (a collection of blood at the site of the operation).
- Neuralgia (pain in the nerves in the arm or axilla).
- Poor scarring (lumpy and itchy) at the site of the surgical incision.
Uncommon problems (affecting approximately one in 1,000 patients)

- Deep vein thrombosis (blood clots in the leg veins, often referred to as DVT).
- Pulmonary embolism (blood clots in the lungs, often referred to as PE).
- Haemorrhage (heavy bleeding).
- Chest infection.

Rare or very rare problems (affecting between one in 10,000 and one in 100,000 patients)

- Serious damage to nerves in the arm, which may affect arm or hand movements.
- Further operations, for example to clean away dead tissue at the wound site and apply a skin graft.

Rarely, in the presence of haemorrhage, a haematoma, wound healing problems or a persistent seroma, patients may need to return to theatre for a second operation.

Are there any alternatives?

Some patients can be treated with drugs, depending on the cancer type. One option is not to operate. However, if left untreated, affected lymph nodes usually grow in size and can put pressure on the major arteries, veins and nerves supplying the arm. This can affect the arm’s function and can cause pain. As the cancer progresses, it can cause the overlying skin to break down.

Contact us

In case of an urgent problem, please contact (for advice only):

- Plastic surgery SHO
  Available 24 hours a day
  t: 020 7188 7188 (ask to speak to the doctor on bleep number 0155)

- Alan Apley Ward
  Available 24 hours a day,
  t: 020 7188 0561 (ask to speak to the nurse in charge)

If you have any questions before your operation, please contact:

- Plastic surgery access team
  t: 020 7188 8882

If you have a problem with your wound/dressings or drain bottles, please contact:

- Gaby De Luca (plastic surgery clinical nurse specialist)
  Available Monday to Friday, 8am to 4pm
  t: office 020 7188 2503  t: mobile 07917 087 937
  Please leave a message and the nurse will call you back.

- Hortense Prince and Diane Sinden (Plastics Dressing Clinic (PDC) nurses)
  t: 020 7188 7270 (Monday to Friday, 9am to 5pm)
  Please leave a message and the nurse will call you back.
You will also be seen in our clinic two weeks after the operation to further check the wound and give you the results of the tissue assessment. Once your surgeon is satisfied that the operative site has healed completely, you may be discharged back to the dermatologist that originally treated you. It is likely he/she will follow you up for between five and ten years to make sure there is no sign of disease recurrence.

**Useful sources of information**

**Dimbleby Cancer Care** – The cancer support service for Guy’s and St Thomas’ hospitals.

*t:* 020 7188 5918  
*w:* [www.dimblebycancercare.org](http://www.dimblebycancercare.org)

**Macmillan Cancer Support** – A national service providing support and advice for people affected by cancer.

*t:* 0808 808 2020  
*w:* [www.macmillan.org.uk/Cancerinformation/Cancertypes/Skin/Skincancer.aspx](http://www.macmillan.org.uk/Cancerinformation/Cancertypes/Skin/Skincancer.aspx)

**Giving your consent (permission)**

We want to involve you in decisions about your care and treatment. If you decide to go ahead, you will be asked to sign a consent form. This states that you agree to have the treatment and you understand what it involves.

Once you have signed the consent form or confirmed your signature if you signed in advance, you will be given a copy if you want one for your records.

If you would like more information about our consent process, please speak to a member of staff caring for you.

**What happens at the outpatient clinic?**

You will be seen by a consultant plastic surgeon or his/her registrar. He/she will ask questions, examine you, discuss the operation and sign a consent form with you. You will need to complete some forms to book your operation, and in some cases it may be possible to give you a date for your operation there and then. The surgeon who sees you in clinic will send a letter to your GP, informing him/her about the operation. A copy of this will also be sent to your home address if you agree.
What happens at the pre-operative assessment clinic?

You will usually be sent to the pre-operative assessment clinic directly from the outpatient clinic. Pre-operative assessment is an appointment where we can assess your fitness for surgery and anaesthesia.

Further information is available in our leaflet, Welcome to the pre-operative assessment clinic. Please ask us for a copy if you do not have one.

You should continue taking most medications in the days leading up to (and on) the day of your operation. If you are taking medicines for diabetes (insulin or tablets) or are taking any antiplatelet medicines (such as aspirin or clopidogrel) or anticoagulants (such as warfarin or rivaroxaban), then these may need to be stopped temporarily or altered around the time of your operation. You should discuss this with your doctor or pre-assessment nurse who will advise you.

If you are taking any complimentary medicines (such as herbal medicines), it is important to mention this at the pre-operative assessment clinic. Please also let us know if you have any allergies to any medicines. The staff in the plastic surgery access team will give specific fasting instructions depending on the anticipated time of your operation (contact number at the end of this leaflet).

You can shower unless instructed not to by your consultant. Take care not to spray directly onto the wound and to gently pat (not rub) the dressings dry with a towel afterwards.

You can start driving once you feel well, alert and able to perform an emergency stop. This is usually after approximately four weeks. It is advisable to check with your insurance company before returning to driving, as this may affect your cover.

The majority of patients recover well and return to work and recreational activities about four to six weeks after the surgery. This, however, will depend on the nature of your job and the activities you participate in. The scar in your armpit will improve over time and may take 18 months to settle completely. Once the wound has healed you will be given information on scar massage. You should massage and moisturise the scar for three months following the operation.

Will I have any follow-up appointments?

You will usually be seen in the plastics dressing clinic (PDC) one week after going home. This is so that we can check your wounds (and drains if they are still present). If we have used absorbable (dissolving) stitches, these do not need to be removed. However, non-absorbable sutures are usually removed between 10 and 14 days after your operation. Depending on the appearance of the wound, it may or may not need to be redressed.
drains will be recorded daily, and only once this falls below a certain amount can the drains be removed. The drains are normally needed for at least two to six weeks. If the drains are removed too early there can be a build up of liquid (seroma) which can be uncomfortable and may need to be removed by inserting a needle through the scar to drain off the liquid. If your drain output is high, you will be shown how to measure the level and record it for yourself at home.

Following your operation, you will be encouraged to move around to reduce the chances of developing a DVT. You can also start to exercise the arm with gentle stretches. Try to touch the back of the head and your lower back with the hand on the side of your operation. This may be uncomfortable with the drains, but should be possible to achieve.

What do I need to do after I go home?

It is important to keep moving at home but you should avoid strenuous activities. You may find you are tired after the surgery and you should return to your usual activities slowly. When resting you should elevate your operated arm.

You should watch out for signs of infection, which may include increasing pain, increasing redness, swelling, oozing and fever (temperature higher than 38°C).

What happens on the day of my operation?

You should bring all of your regular medications with you. Patients are usually admitted on the day of surgery to the Day Surgery Unit (DSU) at St Thomas’ Hospital. Further information about what to expect can be found in our information leaflet – Surgical Admissions Lounges (SAL) and Day Surgery Units (DSU) at Guy’s and St Thomas’ hospitals. Please ask us for a copy of this leaflet if you do not have one.

Most patients are asked to come in at 7.30am and you may have to wait several hours before your slot in theatre. It is therefore a good idea to bring something with you to pass the time (such as a magazine or book). If you have diabetes you will be given a morning appointment.

Your surgeon will see you and mark the site of the proposed operation with a marker pen. He/she will also talk through the operation with you again, and you will have the chance to ask questions. It is a good idea to write your questions down in advance, in case you forget them on the day.

You will also meet your anaesthetist to talk about the anaesthetic. If you are very anxious please let them know, as it may be possible for them to give you medicines to make you feel more relaxed.

You may be given compression stockings to wear. These help to reduce your risk of developing blood clots (DVTs). Following your operation you may also be given
injections of an anticoagulant medicine, which also help to reduce the risk of developing blood clots.

You will be put to sleep in the anaesthetic room before being taken through to the operating theatre. You will not be able to feel anything (including pain) and will not remember any of the surgery.

What happens during the operation?
The operation involves making an incision in the armpit. Major nerves, arteries, veins and other structures are protected, and then all of the surrounding tissue (including the lymph nodes) is removed. The operation will disrupt the lymph drainage channels, causing the lymph liquid to collect in the space where the tissue has been removed. For this reason, two plastic tubes (drains) will be inserted to drain the liquid out of the body and prevent it from causing problems.

At the end of the operation, the incision is stitched (sutured) and dressings applied. You will also be given a local anaesthetic to help reduce any pain you might experience after the surgery – this usually lasts several hours. Immediately after the operation you will be taken to a recovery area near the theatre where you will stay until you wake up. You may require additional pain relief and medication to prevent nausea from the anaesthetic. You will most likely be connected to a drip, which provides liquid until you can eat and drink. You may also have a catheter (thin tube leading to your bladder) in place until you are able to go to the toilet. Once you have fully woken up you will be taken back to the ward.

The tissue that has been removed is sent to the pathologist for examination under a microscope. This is to assess how far the cancer has spread. The results of this assessment take two weeks and will be discussed with you when you are seen in the outpatient clinic.

All patients who have had an axillary lymph node clearance will also be discussed at the melanoma multidisciplinary team (MDT) meeting. This is a meeting of specialists, including the plastic surgeon, dermatologist, oncologist, radiologist and specialist skin cancer nurse. At this meeting, they will look at the tissue specimen to see how far the tumour has spread and decide if any further treatment is needed.

What happens when I am admitted to the ward?
Most patients will stay on Alan Apley Ward, which is on the 8th floor in the North Wing, St Thomas’ Hospital. You should expect to stay in hospital for at least two days. Following your operation, your appetite will gradually return. Once you are ready, you will be allowed to eat and drink as normal and your drip will be disconnected.

On the morning after the day of your operation, you will be seen by a team of surgeons and nurses who will examine your wound and check your health records. Some patients may also need to have blood tests.

You will still have tubes attached to drain the lymph liquid from the armpit. The liquid usually looks bloody to start with but becomes clear and straw-coloured over time. The amount of fluid in the bottles connected to your
injections of an anticoagulant medicine, which also help to reduce the risk of developing blood clots.

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**Giving your consent (permission)**

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Once you have signed the consent form or confirmed your signature if you signed in advance, you will be given a copy if you want one for your records.

If you would like more information about our consent process, please speak to a member of staff caring for you.

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Uncommon problems (affecting approximately one in 1,000 patients)
• Deep vein thrombosis (blood clots in the leg veins, often referred to as DVT).
• Pulmonary embolism (blood clots in the lungs, often referred to as PE).
• Haemorrhage (heavy bleeding).
• Chest infection.

Rare or very rare problems (affecting between one in 10,000 and one in 100,000 patients)
• Serious damage to nerves in the arm, which may affect arm or hand movements.
• Further operations, for example to clean away dead tissue at the wound site and apply a skin graft.

Rarely, in the presence of haemorrhage, a haematoma, wound healing problems or a persistent seroma, patients may need to return to theatre for a second operation.

Are there any alternatives?
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Contact us
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Plastic surgery SHO
Available 24 hours a day
t: 020 7188 7188 (ask to speak to the doctor on bleep number 0155)

Alan Apley Ward
Available 24 hours a day,
t: 020 7188 0561 (ask to speak to the nurse in charge)

If you have any questions before your operation, please contact:

Plastic surgery access team
t: 020 7188 8882

If you have a problem with your wound/dressings or drain bottles, please contact:

Gaby De Luca (plastic surgery clinical nurse specialist)
Available Monday to Friday, 8am to 4pm
t: office 020 7188 2503 t: mobile 07917 087 937
Please leave a message and the nurse will call you back.

Hortense Prince and Diane Sinden (Plastics Dressing Clinic (PDC) nurses)
t: 020 7188 7270 (Monday to Friday, 9am to 5pm)
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Contact us continued

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Very common problems (affecting approximately one in 10 patients)

- Numbness around the scar and upper arm (which can be permanent).
- Seroma (liquid collection at the site of operation).
- Mild wound dehiscence (opening up) or delayed wound healing.
- Lymphoedema (persistent swelling of the arm) which is due to retained lymph liquid. This can be uncomfortable and can interfere with the use of the arm. It usually occurs less than one year following the operation but may occur later following trauma or infection in the arm. If lymphoedema develops it can be difficult to treat and requires long term treatment with compressive stockings and specialist physiotherapy.
- Infection of the arm.
- Shoulder stiffness-physio may be needed to help you to mobilise

Common problems (affecting approximately one in 100 patients)

- Haematoma (a collection of blood at the site of the operation).
- Neuralgia (pain in the nerves in the arm or axilla).
- Poor scarring (lumpy and itchy) at the site of the surgical incision.
If the cancer has spread to your lymph nodes, lymph node clearance is usually recommended. A lymph node clearance is a major operation that aims to stop the cancer from progressing in this region.

**What are the benefits of the operation?**

Surgery to remove the lymph nodes in the axilla will remove all the lymph nodes in the area and help to control the spread of the cancer and hopefully, reduce the chance of spread to other parts of the body.

**What are the risks of the operation?**

The risks of any operation relate in part to the anaesthesia and in part to the operation itself.

In most cases you will have a general anaesthetic – this means that you will be unconscious for the entire operation. You will be able to discuss this with the anaesthetist (the doctor who gives the anaesthetic) before surgery and he/she will identify the best method for your individual case. For more information about this please see our leaflet, *Having an anaesthetic*. If you do not have a copy, please ask us for one.

The main surgical risks are listed below. The full list of risks will be explained by the surgeon treating you.
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Skin cancers, such as melanoma and squamous cell carcinoma, can spread to other parts of the body by the lymphatic system. When cancer cells are filtered, they can get caught in the lymph nodes and can grow there. For example, cancer cells from a skin cancer on the hand can be transported in the lymph via lymphatic vessels to the axilla where they can get caught in lymph nodes and begin to grow. Cancers can also spread to other parts of the body (including the lung, brain and bone) via the blood stream.
Further information

Pharmacy Medicines Helpline
If you have any questions or concerns about your medicines, please speak to the staff caring for you or call our helpline.
t: 020 7188 8748 9am to 5pm, Monday to Friday

Your comments and concerns
For advice, support or to raise a concern, contact our Patient Advice and Liaison Service (PALS). To make a complaint, contact the complaints department.
t: 020 7188 8801 (PALS) e: pals@gstt.nhs.uk
t: 020 7188 3514 (complaints) e: complaints2@gstt.nhs.uk

Language Support Services
If you need an interpreter or information about your care in a different language or format, please get in touch:
t: 020 7188 8815
e: languagesupport@gstt.nhs.uk

NHS 111
Offers medical help and advice from fully trained advisers supported by experienced nurses and paramedics. Available over the phone 24 hours a day.
t: 111
Axillary lymph node clearance

This leaflet explains more about an axillary lymph node clearance, including the benefits, risks and alternatives, and what you can expect when you come to hospital.

If you have any further questions, please speak to a doctor or nurse caring for you.