

# Extravasation and Infiltration

Information for patients



Leeds Cancer  
Centre

## **What are extravasations and infiltrations?**

When fluids or drugs are given into the bloodstream sometimes they can leak out of the vein into the surrounding skin and tissues.

Some anti-cancer treatments are called vesicant drugs and they are known to cause damage to the surrounding skin and tissues if they leak out of the vein. If a vesicant drug leaks out of a vein it is called extravasation. Other anti-cancer drugs are irritant or cause inflammation. If they leak outside the vein it is called infiltration.

You may have noticed pain, stinging, swelling or other changes to the skin at the site of the cannula, or the nurse may have noticed that the drug isn't flowing into the vein easily.

## **Why did this happen?**

We don't always know why the drug has leaked into the tissues although we know it can happen sometimes when giving intravenous cancer drug therapy. We take lots of precautions to reduce the risk but it is not possible to totally prevent this happening. The most important thing is that it has been detected and treated as quickly as possible.

## **Why is extravasation and infiltration a problem?**

If extravasation goes untreated it can lead to pain, stiffness and tissue damage.

## What treatment have I received to prevent this tissue damage?

The nurse will give you the recommended treatment for the drug which has leaked. Treatment depends on which drug is involved and how much has leaked out of the vein. You may have needed injections into the surrounding area or for a medication to be applied to the area along with heat or cold packs.

These treatments help to reduce the likelihood of on-going problems by reducing inflammation, helping absorption or to speed up breakdown of the drug before it can cause damage. It is normal for the area to be bruised and painful following the injection treatment.

The nurse may have arranged for a photograph to be taken of the site of injury. This is so the medical team can assess your response to the extravasation treatment.

It may also be necessary to refer you to the plastic surgeons for a surgical procedure to wash out the chemotherapy from the affected area or for further monitoring and treatment.

## What do I need to do?

1. Gently exercise the affected arm or hand. Take mild painkillers if you need to.
2. Elevate the limb if possible.
3. Only apply lotions/creams to the affected area which have been recommended by the chemotherapy team. Do not use soap on the affected area. After washing dry gently with a clean towel.
4. Avoid tight clothing around the affected area.
5. Do not expose the affected area to sunlight.
6. **Look at the area at least twice a day:**
  - Has the area changed colour or increased in redness?
  - Is the area blistering, peeling or flaking?
  - Is the area more uncomfortable?
  - Is the pain making it difficult for you to exercise the arm or hand?
7. You may need to apply a medication to the area or apply heat or cold. The nurse will explain what you need to do.

## When should I contact the hospital for advice?

If you answered **Yes** to any of the questions in section six highlighted on the previous page or if you have any other concerns then you should contact the hospital.

## Who do I contact?

You must contact someone at this hospital who is used to dealing with extravasation and infiltration

- If it is within the hours of 8.00am - 6.30pm, Monday - Friday contact the ward or unit where you had your treatment administered.
- If it is between 7pm and 8am Monday to Friday, or any time over a weekend or bank holiday, please phone the oncology patient enquiries blepholder via the hospital switchboard on **0113 243 3433**. (You may need to wait a while to get connected).

Please follow the instructions below (the nursing team will match instructions with guidance from LTHT policy).

## Please follow the instructions below

| Nurse to tick if applicable | Instructions   | Reasons   |
|-----------------------------|--|---|
| <input type="checkbox"/>    | Elevate affected hand/arm as much as possible for the first 24 hours and gently exercise the hand regularly.   | Helps to reduce the swelling.   |
| <input type="checkbox"/>    | Apply a hot water bottle or heat pad for 30 minutes every six hours, for the first 1 - 2 days. Make sure it is not too hot. Avoid direct contact with affected skin. Use with caution to prevent burns/scalds. | This may help to disperse the drug and reduce swelling and irritation.          |
| <input type="checkbox"/>    | Apply a cold pack for 30 minutes every two hours, for the next 24 hours except when asleep. Avoid direct skin contact/use dry gauze between skin and the cold source. Use carefully to avoid cold burns.       | This may help to neutralise the drug and reduce tissue swelling and irritation. |

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## What happens next?

Before you go home you will either be given an appointment to attend the hospital for review, or a nurse will contact you to assess how the area looks and feels.

Further monitoring will be arranged if required.

| Nurse to tick if applicable   | Instructions   | Reasons   |
|---|--|---|
| <p>Start applications immediately</p> <p><input type="checkbox"/></p> <p>Or</p> <p>Delay starting applications for 8-12 hours</p> <p><input type="checkbox"/></p> | <p>For the first 24 hours apply DMSO to the extravasation site with a cotton bud every two hours except whilst asleep. Avoid unaffected skin. After 24 hours apply DMSO every 6 hours. Also start applying hydrocortisone cream to the area every 6 hours but stagger so using alternate products every 3 hours except whilst asleep. Continue for up to seven days. Stop DMSO if a blister forms and contact the hospital for advice.</p> | <p>This helps to remove the drug that has leaked into the tissue.</p> |
| <p><input type="checkbox"/></p>   | <p>Apply a thin layer of hydrocortisone cream to the affected area four times a day for the next seven days or as long as the area is red.</p>   | <p>This may help to reduce inflammation.</p>                          |

**You need to attend:**.....

Date: ..... Time: .....

**You will be contacted by phone:**

Date: ..... Time: .....



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***Your views matter***



The printing of this leaflet has been funded thanks to donations and gifts in Wills to Leeds Hospitals Charity  
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© Leeds Teaching Hospitals NHS Trust 2013 • 3rd edition Ver 1  
Developed by Amanda Callister, Senior Chemotherapy Nurse  
Design by Medical Illustration Services • 20230725\_003/JG

LN004407  
Publication date  
11/2023  
Review date  
11/2026