



**FACULTY OF  
PAIN MEDICINE**  
of the Royal College of Anaesthetists

**Information sheet for adult patients undergoing:**

# **Peripheral Nerve Injections: Intercostal nerve block**

**for the Treatment of Pain**

## **What is the aim of this information sheet?**

The aim of this information sheet is to provide you with information relating to intercostal nerve blocks and to answer some questions that you may have. Please note that practice may vary. Your doctor will be able to explain fully what to expect.

## **What is an intercostal nerve block?**

An intercostal nerve block is an injection around an intercostal nerve. All the ribs have nerves that closely travel underneath them from the spine at the back to the sternum breast bone at the front. These are called intercostal nerves. An intercostal nerve block is usually given if someone has chest wall pain over a localised area of the chest wall. This can occur after an attack of shingles or when there is a scar after an operation on the chest.

## Is this the right treatment for me?

Other treatment options will be discussed with you before deciding to go ahead with the injections and your consent is needed. The decision on whether or not to go ahead with the injection(s) is a shared decision between you and your doctor. Your doctor will be able to provide you with up-to-date information about the likelihood of this being a successful treatment for you and how this treatment fits into the best pathway of care. If you are undecided about whether or not to have the injection then further advice and information to make this informed decision can be provided. Please speak to your doctor for more information.

If your health has changed, it is important to let your doctor know;

- If you have an infection in your body or on the skin of your back, your doctor will postpone the treatment until the infection is cleared
- If you have been started on anticoagulant or antiplatelet medicines that “thin the blood” such as warfarin, heparin or clopidogrel, this may require extra preparation
- If you suffer from diabetes, the use of steroids during injections may cause your blood sugar to change requiring monitoring and adjustment of your diabetic medication
- If you have any allergies

You must also inform the doctor if there is any chance that you could be pregnant.

Finally, if you are planning to travel abroad or fly within two weeks after the injections, please let your doctor know as it may be best to change the date of the injections.

## I have heard that steroids are being used unlicensed/off-label, what does this mean?

Steroids (corticosteroids) are commonly used in managing chronic pain but are licensed for specific routes of administration only. Some routes of administration to treat pain are not on license. This is referred to as off-label use. The manufacturer of the medicine may not have applied for a specific licence to extend its usage. MANY medicines used in pain medicine are used off-label. Your doctor will be able to discuss this with you further.

## What will happen to me during the treatment?

Before the injection, your doctor will discuss the procedure with you. Your doctor will either obtain your consent before the injection or confirm this consent if it was previously given. The treatment will take place in a dedicated area with trained personnel. Sometimes electrical stimulation of the nerve or image guidance will be used to enable accurate injection. Not all doctors undertake these injections in exactly the same way but the following usually happens;

- You will be prepared for the procedure as per local protocol
- Observations such as blood pressure and pulse rate may be made
- A small needle (cannula) may be placed in the back of your hand

- You will be carefully positioned and the skin around the injection site(s) will be cleaned with an antiseptic solution or spray; this can feel very cold
- You will feel a stinging sensation as local anaesthetic is injected to numb the skin and surrounding tissues. Your doctor will warn you of this first
- The doctor will direct the injections to the nerves carrying sensation from the area(s) suspected to be a source of pain. When the injections are made, you may feel pressure, tightness or a pushing sensation. If there is any discomfort, do let the doctor know

### **What will happen to me after the injections?**

After the injections you will be taken to a recovery or ward area where nursing staff will observe you. Sometimes you will be asked to lay flat for about 30 minutes or longer. You may be assisted to sit up and your blood pressure and pulse may be checked. You will be advised when to get dressed and be given assistance to help to ensure that you can stand safely after the procedure. You will be given further advice when you are ready to go home.

### **When will I be able to go home from hospital after my injections?**

You will usually be able to return home within a few hours after the injection and in some cases much sooner, depending on how many injections are needed and how long your doctor or nurse want you to stay for recovery. Please ensure that you have made arrangements for someone to collect you after the procedure. Failure to do so will likely result in your procedure being cancelled. It is unsafe for you to drive home immediately after the procedure. If you do so your motor insurance will be invalid.

### **What can I do after my procedure?**

Ideally, you should arrange for someone to stay with you for 24 hours but, failing that, you should at least have access to a telephone. You should not drive, operate machinery, sign legal documents, provide childcare unsupervised or drink alcohol until fit to do so.

If in doubt, please discuss these issues with your doctor for further advice.

### **When can I return to work after the procedure?**

This will vary between individuals and may depend on the nature of your work. It is difficult to give general advice and so you should discuss this with your doctor.

## Will I experience any side-effects?

As with any procedure, side-effects may occur. However, these are usually minor and there is little risk of serious harm.

Side-effects may include;

- Mild local tenderness and/or bruising at the site of the injection, that usually settles over the first few days
- Pneumothorax. There is a small chance of puncturing the lung (pneumothorax). This can lead to pain and breathlessness. The pain is often a severe pain, which is sharp and worse on taking a large breath in. If this symptom were to occur or you were to feel breathless then you must seek immediate medical help since this may require treatment and a stay in hospital
- Intravascular injection. During the injection, you may experience signs of local anaesthetic toxicity if the injection is passing into a blood vessel. You should inform your doctor immediately if you develop tingling around your mouth or a metallic taste, ringing in your ears, feeling drunk, dizzy, blurred vision, muscle twitches or difficulty in breathing
- The local anaesthetic may rarely spread causing some numbness. Should this occur, the effect is temporary and will rapidly resolve over minutes or rarely hours
- Infection. This is rare. You should seek medical help if there is local warmth or redness over the site of injection with tenderness and/or you feel hot and unwell. This may require antibiotic treatment
- Nerve injury is extremely rare (less than 1 in 10,000 cases)
- Injection treatments are not always effective and may not help your pain

## What can I expect in the days afterwards?

You may experience some soreness or aching at the injection site. Please keep the area of the injections dry for 24 hours following the procedure. Do not worry if your pain feels worse for a few days as this sometimes happens. Take your regular pain killers and medications as normal and this should settle down. Try to keep on the move about the house whilst avoiding anything too strenuous.

## What should I do in the weeks after the injections?

As your pain decreases, you should try to gently increase your exercise. It is best to increase your activities slowly. Try not to overdo things on a good day so that you end up paying for it with more pain the following day. Your doctor can provide more specific advice.

## What follow-up will be arranged?

Though practice may vary, a letter will usually be sent to your GP and your doctor will advise on what to do after the procedure. You may be asked to make a call to the pain department, be given a form to fill in, or given a telephone review or other appointment.

## Is there anything else I need to consider before the procedure?

- Please bring your glasses if you need them for reading
- Always bring a list of all current medication
- Continue to take your medication as usual on the treatment day

## Finally...

The information in this leaflet is not intended to replace your doctor's or health care team's advice. If you require more information or have any questions or concerns please speak to your GP or contact your Pain Clinic.

Name:	
Pain Service:	
Address:	
Contact numbers:	

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