

Introduction

This leaflet aims to provide you with basic information about the Central Neuraxial Block that you are going to receive. Please discuss with your anaesthetist if you need further information or clarification.

What is Central Neuraxial Block (CNB) ?

CNB is one of following techniques of anaesthesia where **nerves** from the spinal cord are anaesthetized,

Spinal Anaesthesia: a very thin needle is inserted between the **bones of your spine** into the **spinal canal**.

A small amount of **local anaesthetic (LA)** drug is injected to anaesthetize **selected spinal nerves**.

Epidural Anaesthesia: a needle is inserted between the bones of your spine into the epidural space (outside the dura membrane but within the spinal canal), via this needle is inserted a fine plastic tube, and positioned in the epidural space. LA drug is injected through this tube to anaesthetize selected spinal nerves.

Combined Spinal Epidural Anaesthesia: the above done together with a specially designed needle set.

What will you feel during your CNB ?

You will lose sensations over the lower part of your body and lose power in your legs. You will still be awake and know that the operation is taking place, but not experience any pain although you may be aware of a vague sense of touch. You will not be able to see the operation because a screen will be placed. If safe and appropriate, your anaesthetist will give you sedative drug to relieve your anxiety or you may request this. Your sensation and power will come back after the effect of the LA drug wears off in a few hours.

Are there any conditions that make you unsuitable for CNB ?

Your anaesthetist will determine whether you are suitable for CNB after assessing your medical condition and the nature of your operation. The following conditions may make you unsuitable for this:

1. You refuse.
2. You have a history of hypersensitivity reaction to the LA drugs, or coagulation problem such as bleeding disorder (ease of bruising / prolonged bleeding) or medications to “thin” your blood to prevent clotting.
3. Your back around the proposed insertion site is infected or had undergone operation before, especially with the presence of an implant.

Who is responsible for your CNB ?

Your anaesthetist, a medical doctor trained and specialized in providing anaesthesia, will stay with you all the time during the anaesthesia and ensure your safety during your operation.

Pre-anaesthetic Assessment

Your anaesthetist will usually interview you before operation, and do the following assessment and preparation:

1. Ask about your medical, surgical, anaesthetic, drug and allergy history, smoking or drinking habits.
2. Perform a physical examination, review your investigation results and order further investigations if needed.
3. Discuss the anesthetic plan and procedure, explain the risks and benefits, suggest pre-medication.
4. Obtain consent for anaesthesia from you.

Do you need to fast before operation ?

You should not eat and drink for at least 6 hours before your operation, known as 'fasting'.

Your usual medications

You should follow instructions of your anaesthetist on which usual medications you should or should not take on the day of your operation. You may take your medications with sips of water while you are fasting.

What should you do if you feel unwell on the day of operation ?

Please inform the Hospital (**Admission Office Tel: 2760 3412**) if you feel unwell on the day of your operation. Your operation may need to be postponed to avoid unnecessary risks.

On the day of operation

1. In the theatre before starting the operation, your anaesthetist, surgeon and nurse will check your identity, the type and site of operation, and the type of anaesthesia. This is to ensure you are the right patient and your planned operation and anaesthesia are correct; we call this final verification process as '**time out**'.
2. Various monitoring device will be attached to you.
3. Your anaesthetist will insert a catheter/plastic tubing into your vein with a needle.
4. You may be asked to lie on your side or to sit up while your anaesthetist performs the CNB.
5. After the block is done, your anaesthetist will assess the effect of anaesthesia before the operation starts. It may be necessary for you to have general anaesthesia if the effect of CNB is not satisfactory.
6. The anaesthetist will stay with you through the operation, monitor your vital signs, give you treatment as necessary and ensure your safety.

Post-operative Pain Relief

After the block wears off, you may start to have wound pain. Pain relief may be extended by continuing to inject LA drugs through the epidural catheter or drugs like morphine can be given. Your anaesthetist will discuss the different choices with you.

Is there any risk in CNB ?

In general, CNB is safe, associated side effects and complications are summarized as follows.

<i>Common (1 in 100 to 1 in 10)</i>	<i>Rare (1 in 10,000) or very rare (1 in 100,000)</i>
Self limiting headache or back pain	Spinal or epidural blood clot, abscess and infection
Transient difficulty in passing urine	Nerve damage and paralysis
Itching associated with morphine	Local anaesthetic toxicity, irregular heart rate

Remarks

This is general information only and the list of complications is not exhaustive. Other unforeseen complications may occasionally occur. In special patient groups, the actual risk may be different. For further information please contact your doctor. Evangel Hospital reserves the right to amend this leaflet without prior notice. We welcome suggestions or enquiries on the information provided in this leaflet. Please contact our Healthcare professionals so that we could follow up and make improvement.

Reference

Hospital Authority: "Central Neuraxial Block (Spinal/Epidural Anaesthesia) for Adults: What should you know?" (2020)
Smart Patient: http://www.ekg.org.hk/pilic/public/Anaes_PILIC/Anaes_CentralNeuraxialBlockforAdults_0154_eng.pdf (13-07-2023)