



Information about Epidurals and Combined Spinal Epidurals (CSE)

Pain is a normal part of labour and birth. There are many ways you can soothe your pain. Breathing techniques, comfort measures such as position changes, massage, a warm shower and coaching can be used throughout labour. If labour becomes too difficult, you may want extra help from medications that relieve pain. Your care provider or nurse will talk to you about options such as breathing a gas called entonox or injecting pain medication into your muscle or through an intravenous (IV). If you do not choose these options or if they do not provide enough pain relief, an epidural or combined spinal epidural may be suggested.

What is an epidural?

An epidural is placed using a needle and provides pain relief medication into the small of your back via a fine tube.

This medication numbs the nerves coming from your womb or uterus and birth canal. Pain relief begins in 5 to 10 minutes and is complete by 20 minutes. Most epidurals have been shown to be a safe and useful way for women to manage their pain during labour and delivery.

What about side effects and possible problems?

An epidural is usually safe and has few side effects for you or your baby. For most women the benefits of pain relief far outweigh the risks of having the epidural. All medical procedures have some risk. Side effects or risks for labour epidurals are:

Side effects for the mother:

- ▶ Not all epidurals work perfectly, about 10% leave areas on your belly “unfrozen”, and some only numb half of your body. About 3 to 5% need to be replaced at some point in labour.
- ▶ You may shiver as the epidural begins to work.
- ▶ Your blood pressure may go down. Your nurse or the doctor that gives you the epidural (an “Anesthesiologist”) will check your blood pressure often.
- ▶ You may have local back discomfort and tenderness after an epidural. This is due to bruising around the area and soon goes away. About 50% of women have generalized low back pain after delivery. The epidural does not cause this.
- ▶ You may not be able to “pee” on your own. If that happens the nurse will put a small tube into your bladder to empty it.

Risks for the mother:

- ▶ Rarely, less than 1 in 100 times, the epidural needle goes into the space where spinal anesthesia is done. If this happens, you could get a headache, called a “spinal headache”, a day or two after the epidural was given.
- ▶ Very rarely women have an allergy to the medication used for the epidural. This may range from a minor rash to a major allergic reaction.

- ▶ Very rarely, 1 in 10,000 times, a nerve may be damaged. It usually recovers, but there have been a few cases of lasting nerve damage in 1 in 85,000. Paralysis is very, very rare 1 in 500,000, as is death (1 in a million).
- ▶ Very, very rarely (1 in 200,000) you could develop an infection in your back or the lining around the brain and spinal cord (meningitis).
- ▶ Epidurals do NOT make you more likely to need a cesarean delivery (or “C-section”).

Risks for the baby:

- ▶ Your baby’s heart rate may go down in the first 30 minutes after an epidural. Usually this is because your blood pressure has gone down, and when that is treated the baby’s heart rate returns to normal. Your nurse monitors your baby’s heart rate closely in the first 30 minutes after the start of your epidural.
- ▶ You may develop a fever after the epidural has been in place for several hours. The fever goes away on its own if it was caused by the epidural. We give acetaminophen, also called Tylenol®, to try and decrease the effects of the fever on you and your baby.
- ▶ There is a very small risk your contractions may come less often, especially if you are not moving. This can slow down labour. Your nurse will help to reposition you frequently and encourage you to get out of bed. Occasionally, your Doctor or/ Midwife may need to start a medication called Oxytocin to increase your contractions.
- ▶ You may find it harder to effectively push out your baby, even when a low dose medication is used. This may be more so if this is your first baby. This means you may need help with a vacuum or forceps to delivery your baby.

What is a combined spinal epidural? (CSE)

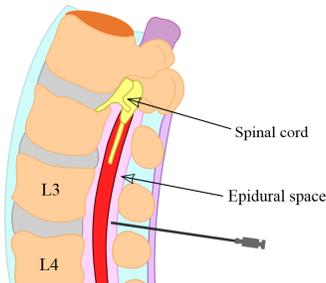
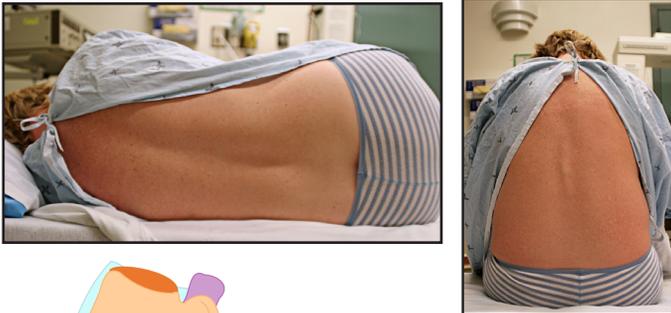
A CSE adds spinal anesthesia to an epidural. The doctor inserts a smaller spinal needle through the epidural needle until it reaches the spinal fluid and then injects a very small amount of fast acting medication into the spinal fluid.

Usually this extra step is done if you are in very advanced labour or are extremely uncomfortable as relief is very fast. It also can work better when trying to manage pain for back labour. The epidural catheter is then left in place so more medication can be given as needed.

The side effects of a CSE are the same as an epidural. However, there is a greater chance of your baby's heart rate going down after the fast acting medication is given. Your baby's heart rate will be monitored very closely in the first few minutes. Your baby's heart rate will usually return to normal by changing your position and giving you more fluids. Having a CSE will not increase your chance of having a C-section.

How is it done?

- ▶ A doctor called an anesthesiologist gives epidurals / CSEs
- ▶ A small plastic tube is placed in your arm through a needle before the epidural is placed. It is called an intravenous (IV)
- ▶ You are asked to lay on your side, or sit on the side of the bed.



The anesthesiologist:

- ▶ May scan your back with an ultrasound machine to check spaces between the bones.
- ▶ Cleans your back by washing it with a liquid.
- ▶ Injects freezing (local anesthetic) into the skin area where the epidural will be placed, this causes just a few seconds of discomfort.
- ▶ Inserts an epidural needle between the bones in your lower back into a space outside the lining of your spine called the "epidural space". You may feel an ache or pressure as this is done but this does not usually hurt.
- ▶ If you are having an epidural, the anesthesiologist threads a thin plastic tube called a catheter through the hollow epidural needle into the epidural space.
- ▶ If you are having a CSE, the anesthesiologist will then place the smaller spinal needle through the epidural needle and guide it beyond the epidural space and inject a small amount of medication into the spinal fluid.

- ▶ Removes the needle (s) and leaves only the epidural tubing in place. It is taped to your back.
- ▶ Injects pain relief medication through the catheter
- ▶ Puts you on a "Patient-Controlled Epidural pump" which allows you to give yourself extra medication when you feel you need it. This allows for women even in early labour to have an epidural without becoming too numb.

What does it feel like when the epidural/ CSE is working?

- ▶ The area between your groin and "belly button" become numb.
- ▶ Your legs may feel warm, tingly and sometimes a bit heavy.

Do epidurals/CSE let me walk?

The drug used in an epidural/CSE at BC Women's will allow you to be mobile. Your legs may feel a little bit numb but you should be able to move them easily.

Your nurse will help you:

- ▶ Labour in different positions
- ▶ Use the bathroom
- ▶ Sit in a chair
- ▶ Walk in your labour room
- ▶ If safe, walk around the hospital unit

You need to remain in bed for the first 30 minutes after the epidural / CSE is started. Your nurse will then help you to mobilize. Several safety checks must be done first. Your nurse will measure your blood pressure, leg strength, and test the feeling in your feet to make sure that it is safe to get you out of bed.

Whenever you walk there must be someone with you at **all times** for support.

You may **not** be allowed to walk if:

- ▶ You have too much pain and need more medication
- ▶ You do not pass the safety checks
- ▶ Your Doctor or Midwife advises against it because of safety concerns for you or your baby

If you are unable to walk you can continue to mobilize in bed. Your nurse will support you to frequently change positions.

Where can I get more information?

- ▶ BC Women's Department of Anesthesia - ask your nurse to have an Anesthesiologist speak with you.
- ▶ Your Doctor or / Midwife