

Regional Anesthesia

Peripheral nerve block before surgery

This handout explains regional anesthesia, which you may receive before surgery. It tells what to expect, benefits and risks, and common side effects.

What is regional anesthesia?

Regional anesthesia uses numbing medicine. It is given before surgery to keep you from feeling pain. A special doctor called an *anesthesiologist* will inject the medicine into the area where you are having surgery.

A *peripheral nerve block* is a type of regional anesthesia. It is also called a *regional block* or *nerve block*. These blocks are often given before surgery on a shoulder, arm, hand, leg, or foot. It is the same type of anesthesia that is given before having dental work.



A member of our Anesthesia team giving a patient a nerve block.

Will I be awake during surgery?

You may have the choice to be awake during your surgery. If you choose to be awake, you may receive a *sedative* medicine to help you stay relaxed. This is called *conscious sedation*.

Your anesthesiologist will talk with you about the right sedation for you. If you have:

- **Minimal sedation**, you will be relaxed, but able to answer questions and follow instructions during surgery.
- **Moderate sedation**, you will feel drowsy during the procedure. You may sleep through much of it. But your surgeon can wake you up to talk with you. You may or may not remember being in the operating room.
- **Deep sedation**, you will sleep through the procedure. You will have little or no memory of being in the procedure room. Your breathing can slow. You may stay asleep until the medicine wears off.

Will I receive any other medicines during surgery?

You may receive both regional and *general anesthesia*. General anesthesia affects the whole body. Most times, it is given through an *intravenous* (IV) line in your arm. It may be given if the main reason for regional anesthesia is to control pain after surgery. If you receive general anesthesia, you will be asleep during surgery.

If you have both types of anesthesia, your anesthesiologist may be able to use less general anesthesia. This might help speed your recovery.

What are the benefits of regional blocks?

Compared to general anesthesia, most patients with regional blocks:

- Have less nausea
- Wake up faster
- Feel less groggy

What are the risks of regional anesthesia?

All medicines and medical procedure involve risks. Some of the risks of regional anesthesia are:

- The block does not work, needing an extra injection
- Bruising or bleeding at the injection site
- Numbness or tingling that lasts a few days
- Infection
- Nerve damage

During surgery, we will closely watch your vital signs. We will monitor your heart rate, blood pressure, and oxygen level for any changes.

What are the side effects of getting anesthesia?

See page 3 for a list of common, rare, and very rare side effects that can occur in patients who receive regional and general anesthesia. Talk with your anesthesiologist if you have any questions about these side effects.

Common Side Effects

These side effects occur in 1 to 10 out of 100 patients.

Side Effect	Regional Anesthesia	General Anesthesia
Feeling sick and vomiting		X
Sore throat		X
Dizziness, blurred vision	X	X
Headache		X
Itching		X
Aches, pains, backaches	X	X
Bruising and soreness from the injection	X	X
Confusion, memory problems		X

Rare Side Effects

These side effects occur in 1 out of 1,000 patients.

Side Effect	Regional Anesthesia	General Anesthesia
Chest infection		X
Muscle pains		X
Breathing problems (during or after surgery)	X	X
Damage to teeth, lips, and tongue		X
Existing health condition gets worse	X	X
Waking up during surgery		X

Very Rare Problems

These problems are very rare. They occur in 1 out of 1,000 to 1 out of 100,000 patients.

Side Effect	Regional Anesthesia	General Anesthesia
Eye damage		X
Serious allergy	X	X
Nerve damage	X	X
Equipment failure	X	X
Death	X	X

What can I expect when I receive regional anesthesia?

- First, you will have an ultrasound scan. *Ultrasound* uses sound waves to show the inside of the body. This scan lets your anesthesiologist see the best place to inject the numbing medicine.
- Most times, patients need only 1 injection of the medicine.
- Most patients have 4 to 24 hours of pain relief after surgery. This depends on the medicine that is used. Your anesthesiologist will talk with you about what to expect.

What about pain relief after surgery?

When longer-term pain relief is needed after surgery, a *nerve block catheter* (small tube) can be placed. This tube allows us to send an ongoing (*continuous*) flow of nerve block medicine to a specific group of nerves.

Most times, nerve block catheters work better than *opioid* pain medicines. They give better pain control and help with faster recovery.

If you have a catheter, our Acute Pain Management Team will manage your catheter and other pain medicines. This team will visit you every day while you are in the hospital.

What can I expect after surgery?

- You may not be able to move your arm or leg until the nerve block wears off. The same nerves that send pain signals to your brain also send the signal to make your muscles move.
- The nerve block may wear off at any time of the day or night. To avoid having severe pain as it wears off, keep taking your other pain medicines as prescribed.
- When you get home, your arm or leg may still be numb and feel heavy. Because you cannot feel pain:
 - Take extra care to protect the limb from hot or cold surfaces.
 - Do not put pressure on your numb limb.
 - If your leg was numbed, take extra care so that you do not fall. We may give you a sling or brace, if needed.

Questions?

Your questions are important. Call your doctor or healthcare provider if you have questions about your nerve block.

☐ **Harborview Regional Anesthesia Service:** Call **206.999.0992** weekdays from 8 a.m. to 5 p.m. For urgent care **only** after hours and on weekends and holidays, call 206.520.5000.

☐ **UW Medical Center - Montlake Regional Anesthesia Service:** Call **206.598.0540** weekdays from 8 a.m. to 4 p.m.

