

## **A Child Having a Kidney Biopsy**

**Your child is booked to have a kidney biopsy on:**

Date: \_\_\_\_\_

Time: \_\_\_\_\_ am/pm

**Please be at Children's Hospital Admitting by:**

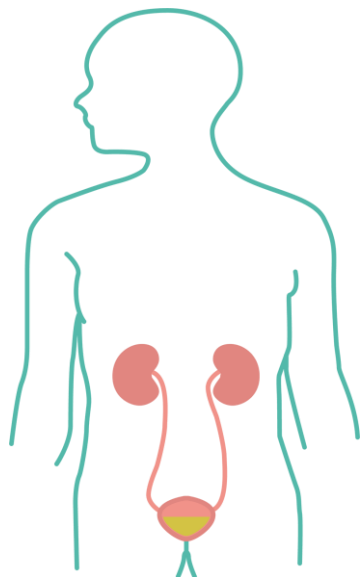
Time: \_\_\_\_\_ am/pm

### **What are kidneys?**

You have 2 kidneys each about the size of your fist. You need healthy kidneys to live. Kidneys clean your blood by filtering out wastes. They also help control your blood pressure by filtering out salt and water. The salts and water combine with the wastes to make pee (urine).

### **Where are the kidneys?**

This picture shows where the kidneys are in your body:



### **What is a kidney biopsy?**

In a kidney biopsy, the doctor takes out a very tiny piece of your kidney with a special needle. This does not harm the kidney. It will help the doctor see why your kidneys aren't working properly.

### **What are the risks of a biopsy?**

**Bleeding** – a small amount of bleeding after the biopsy is very common. About 1 in 10 times there will be enough blood to change the colour of the pee making it look red. We recommend lots of extra fluids to flush out the bladder if that happens. The blood usually clears up after 1 or 2 more pees.

**Blood clots in the pee** – if there is enough blood in the pee, it can form a blood clot in the bladder that can make it hard to pee. This is very uncommon, but if it happens, we may need to put a catheter in the bladder to help you pee.

**Pain during the biopsy** – there can be discomfort during the procedure. We usually use freezing to make it as comfortable as possible. In most cases we use procedural sedation, where medicines are given through an IV before the biopsy – the sedation makes you sleepy and not remember that you had a biopsy. A doctor who specializes in these medicines will help with this.

**Pain after the biopsy** – this is uncommon, but if it happens, it can be a signal that something serious is going on. If you are having a lot of pain, you should let your kidney team know. You should not take any Non-Steroidal Anti-Inflammatory Drugs (NSAIDs) – drugs containing any aspirin, ibuprofen or naproxen. For example: Advil®, Motrin® or Aleve®. Usually acetaminophen (Tylenol®) is very good at relieving any pain.

**Rare problems** – There is a very small risk of injury to the kidney from the biopsy. That includes damage to the blood vessels, kidney infections or urine leaks. It can be serious enough to cause permanent damage or loss of the kidney. Other problems like injury to bowel or life-threatening drug reactions are also rare.



## How will I get ready for the biopsy?

**For two weeks before the biopsy**, if your child is taking any Aspirin® or any blood thinners, discuss these medications with your kidney team.

## In the month before the biopsy you will have:

- a blood test – this is to check if you have a high risk of bleeding. The nurse or doctor will tell you where and when you are to have this done.

## What should you bring to the hospital on the day of your biopsy?

- any of your regular medications.
- water bottle or something to drink.
- food to eat after the procedure.
- activities to keep you busy – books, games, tablet.

## On the day of the biopsy you will:

- not have solid foods *for 8 hours before* you have the biopsy. *You may drink clear fluids (such as water or apple juice) up until 90 minutes before the procedure.* The nurse will discuss this with you.
- bring your morning medicines to the hospital. You may take some of your morning medications with small sips of water only. The nurse will decide if and when you should take these.
- report first to the Admitting Department on the first floor of Children's Clinic. Your nurse or doctor will have told you which area you are to go to:

**Pediatric Day Unit.**

**Pediatric Day Surgery.**

If you are already an inpatient in the hospital, you may have your biopsy in the **Pediatric Day Unit** or the **Operating Room**. Your nurse or doctor will tell you where you will be having your biopsy done.

## At the hospital:

- You will be weighed.
- The nurse will put a blood pressure cuff on your arm and a special clip on your finger or toe to measure oxygen levels in your blood. The cuff and clip do not hurt. The nurse will take your blood pressure, pulse and temperature.
- You will be asked to pee and save it in a small bottle.
- you will have an IV started and if needed, blood samples taken.
- once any bloodwork is done, you may be able to take your morning medicines if needed.
- You will have the biopsy in a procedure room on a stretcher.

## Who will be in the room during the biopsy?

*(All of the people in the room will wear masks)*

- The kidney doctor who does the biopsy.
- The sedation doctor who will give you medicine for sleeping.
- The nurse who helps the doctor and you.
- A person special to you, such as your mom or dad, to hold your hand and/or talk with you.
- A person from the ultrasound department to do the picture of your kidney with the doctor.
- A person from the lab who takes the kidney sample to the lab.
- There may be another doctor present who just watches and learns.

## What will happen during the biopsy?

You will lie on your stomach with a pillow under it.

The nurse will put a blood pressure cuff on your arm and a special clip on your finger or toe to measure oxygen levels.



The nurse will take your blood pressure, pulse and oxygen levels several times during the biopsy.

The ultrasound technician will do an ultrasound to take pictures of your kidney and put a small mark on your back over your kidney.

The sedation doctor will give you sleeping medicines. You shouldn't remember anything after this. You should not be in any pain. If you feel pain, you should tell the doctors.

The kidney doctor will then clean your back with special soap. It will feel cold. A clean cloth with a small hole in the middle will then be placed on your back.

Once you are asleep, the doctor will give you some "freezing" in the area with a needle. This will put your skin to "sleep" so you should not feel pain during the biopsy. You will be asleep when this is done.

The doctor will then put in the biopsy needle to take a sample of your kidney. Remember, you will be asleep.

Usually, 2 or more samples are taken. Once they are taken, the doctor or nurse will apply pressure to the biopsy site for 5 minutes. Then they will wash your back and put on a small Band-Aid®.

The doctor may decide to put a tube into your bladder to help with draining your pee. This tube would be removed before you go home.



## **What can I do during the biopsy?**

Listen carefully to the doctor and nurse who will tell you what will happen and how you can help. It's OK to ask questions if you don't understand something.

## **What will happen after the biopsy?**

After the biopsy you will go back to the ward or a recovery area.

The nurse will check your blood pressure, pulse and biopsy site every 15 to 30 minutes for 4 hours.

You will be asked if you have any pain. Be sure to tell the nurse if you do because you can have medicine for this.

The nurse will give you containers and ask you to save all your pee over the next 4 hours so it can be checked for any blood. A small amount of blood in the pee is common right after a biopsy. We expect that the blood should go away before you go home.

You may eat and drink when you feel like it. You will need to bring food and drinks from home.

The nurse will encourage you to drink a lot of liquids to help flush your kidneys.

You can get up and get dressed as soon as you feel like it. The first time you get out of bed, you should ask someone to help you.

## **When can I go home?**

You can usually go home about 4 hours after the biopsy. The doctor will tell you what to do when you go home. The nurse in the day unit or on the ward will review these instructions with you before you go home. Be sure to ask any questions you may have. If there is still blood in the pee after 4 hours, the doctor will meet with you to see if any other treatment is needed. You may need to stay overnight.



If you live outside of Winnipeg, you will need to stay overnight in the city. You can travel home the next day.

### What will I need to do after I go home?

Rest and do quiet things like reading or watching TV for the next 24 hours. No strenuous activities.

Do not do any contact sports (such as hockey or football) or any physical playing with siblings or friends for the next 2 to 3 weeks.

If you are concerned that there is a problem related to the biopsy, call us right away. There is always a doctor on-call in the case of an emergency. Phone numbers to reach the nurse or doctor are in the next section.

### Remember:

- Some blood in your pee is normal at the beginning but it should be gone before you leave the hospital. **Report any increase in the blood, or any bleeding that occurs after you are sent home from your biopsy.**
- You should be able to pee normally after the biopsy. **Call if you are unable to pee or you are passing clots in your pee.**
- You may have some slight pain at the biopsy site. You may have acetaminophen (Tylenol®) for this. Follow the directions on the bottle. **Report any pain that does not get better with Tylenol® and any redness or swelling at the biopsy site after 24 hours.**

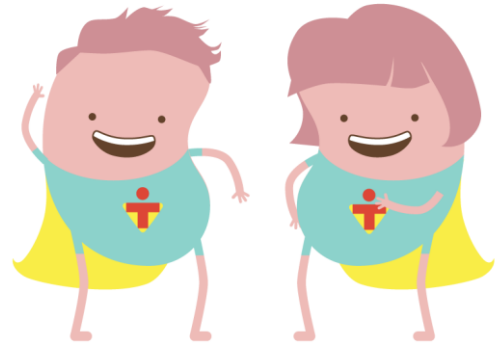
Remove the Band-Aid® 24 hours after the biopsy. You may then have a bath or shower

### Your follow-up appointment is booked for:

### If you have any questions or concerns:



- During the daytime, Monday to Friday, phone the General Nephrology Nurse at 204-787-2775.
- On weekends, after hours or during holidays, phone hospital paging at 204-787-2071 and ask for the Pediatric Nephrologist-On-Call.



Next Review: March 2026