

# Undergoing a percutaneous liver biopsy

Endoscopy

## What is the aim of this leaflet?

The aim of this leaflet is to explain the procedure for patients undergoing a liver biopsy. This leaflet is not meant to replace informed discussion between you and your Doctor, but can act as a starting point for outlining risks and benefits.

If you need this information to be presented in a different way other than written text, we will work with you to try to make sure you receive the information in a way that is acceptable to you.

## What is a percutaneous biopsy?

A needle biopsy is a way of taking a small sample of tissue out of your body, using a special needle. This allows the Doctors to look at the sample under a microscope to find out what it is. This will allow an accurate diagnosis and treatment plan for you. As this biopsy is done through the skin, it is called a percutaneous biopsy.

## What are the benefits of a liver biopsy?

Having a biopsy will help your Doctor to make a correct diagnosis so that you can get suitable treatment. Other investigations such as ultrasound or computed tomography (CT) may have shown an abnormality in your liver, but it is not always possible to determine the cause or degree of these abnormalities by looking at scans alone. The simplest way to make a diagnosis is to examine a sample of liver tissue under the microscope.

## What are the potential risks and benefits of having a liver biopsy?

Percutaneous liver biopsy is a safe procedure, but there are a few risks or complications that can arise, as with any medical treatment. The risks and benefits will be discussed during consent. Common risks and benefits are listed below. You will also have the opportunity to discuss any concerns before your procedure.

### Risks:

- The most common complication is pain at the biopsy site, sometimes this pain can travel to the right shoulder. This can usually be controlled with pain killers
- If you are having a liver biopsy, there is a risk of bleeding. Bleeding may affect 1 in 200 liver biopsies. Often this settles by itself. But 1 in 4 patients who bleed may require a blood transfusion. Very rarely, less than 1 in 500, an operation may be required to stop bleeding

**The prevention of infection is a major priority in all healthcare and everyone has a part to play.**

- Please decontaminate your hands frequently for 20 seconds using soap and water or alcohol gel if available
- If you have symptoms of diarrhoea and/or vomiting, cough or other respiratory symptoms, a temperature or any loss of taste or smell please do not visit the hospital or any other care facility and seek advice from 111
- Keep the environment clean and tidy
- Let's work together to keep infections out of our hospitals and care homes.

- The biopsy may fail to give an answer. This may be because normal tissue has been taken rather than abnormal tissue or the sample was not big enough. In this instance, a further biopsy or other procedure may be necessary
- Very rarely, the biopsy site may become infected. The skin should be checked until it heals
- Very rarely, the procedure could cause injury to other organs
- Mortality. Although this is a safe procedure there is a small risk of death. This is rare and is estimated to be about 1:500 cases.

**Benefits:**

- The procedure is minimally invasive meaning recovery time is quicker than a surgical biopsy
- The sample taken may aid in diagnosis of the abnormal tissue.

## Are there any alternative treatments and what if I decide not to have it done?

This is the simplest way to obtain tissue and make a diagnosis. The alternatives are :

**Trans-jugular biopsy:** This type of biopsy is done under ultrasound and X-ray guidance. In certain circumstances, your Doctor may decide to perform the biopsy using this method - you will be advised of the reason for this if this is the case.

**An open operation:** To obtain a tissue sample.

**No treatment:** Your Consultant will discuss the option of no treatment.

## Who will be performing the biopsy?

A Radiologist will perform the biopsy. They have special expertise in image interpretation and using X-ray and scanning equipment to guide the biopsy.

## Giving my consent (permission)

The Physician in charge of your care has made the decision for you to have this procedure. The staff caring for you will ask your permission to perform the procedure. You will be asked to sign a consent form that says you have agreed to the procedure and that you understand the benefits, risks and alternatives. If there is anything you do not understand or if you need more time to think about it, please tell the staff caring for you. It is your decision and you can change your mind at any time, even if you have signed the consent form. Please let staff know immediately if you change your mind and your wishes will be respected at all times.

## Are you required to make any special preparations before the biopsy?

You can come into hospital, have a liver biopsy and go home the same day. You will need to arrange for someone to take you home by car or taxi.

You will have a blood test to check your clotting about 1 week before the biopsy.

It is important you tell your Doctor about all the tablets you take, especially blood thinning medications. These may need to be stopped or altered, depending on why you are taking them. Aspirin, dipyridamole, non-steroidal anti-inflammatory drugs are stopped 7 days before biopsy. Clopidogrel, prasugrel are stopped 14 days before biopsy. Warfarin is stopped 5 days before a biopsy. Rivaroxaban, dabigatran, apixaban are stopped 2 days before biopsy.

Other medications should be taken as normal.

If you are unsure, please contact your Consultant before your biopsy.

These procedures are usually carried out as a day case procedure under local anaesthetic. Although it is planned that you go home on the same day, it is advisable to bring an overnight bag with you in case it should be necessary for you to stay in hospital overnight.

You must not eat for 4 hours before the biopsy, but you may drink the morning of the biopsy.

If you require an ambulance to attend this appointment, please contact Patient Transport Service on 01902 694999.

## Where will the procedure take place?

The procedure will take place in the Radiology Day Case Unit. The biopsy will be performed in the ultrasound room or Angiography Suite. If you are on a different ward, radiology will liaise with your ward nurse to arrange transport.

## What happens during the procedure?

### Percutaneous biopsy

You will be asked to get undressed and put on a hospital gown. Usually, you will lie on your back or side in the position that the Radiologist has decided is most suitable. The biopsy is performed under sterile conditions. Local anaesthetic is injected into the skin over the lower chest or upper abdomen. This may sting for a few seconds but will then go numb. The Radiologist uses imaging, usually ultrasound, to allow accurate access of the abnormal tissue through a minute incision. The Radiologist will place the biopsy needle into the liver and take a sample. A plaster will be put on the biopsy spot.

### Will it hurt?

When the local anaesthetic is injected, it will sting for a short while, but this soon wears off. Some discomfort may be felt when the biopsy sample is taken. You may experience the pain travel to your right shoulder. If you are in pain, please ask the Nurse for pain relief.

### How long will it take?

Every patient is different, and it is not always easy to predict, but usually 30 minutes.

### What happens afterwards?

- You will be taken back to your ward or the day case unit
- Nursing staff will carry out routine observations including pulse and blood pressure
- You will generally stay flat in bed for 4 hours
- You will be able to eat and drink a little during this time
- If you need the toilet, you will be given a bed pan
- If you are a day case patient, you can usually go home after four hours of rest.

### Going home advice?

- You will not be allowed to drive, walk or travel home on public transport
- You will not be allowed to go home on your own. Please arrange for someone to collect you on discharge
- You must have a responsible adult with you at home on the first night following your biopsy
- If you have any discomfort, you can take paracetamol
- Observe the puncture site for any bleeding, swelling, or infection
- If you have more severe pain or any symptoms that concern you, please seek medical assistance at your local Emergency Department.
- You are advised not to drive for 24 hours and avoid strenuous exercise for 48 hours
- Please also read the patient discharge advice sheet

## When will I receive the result?

The result may take 10 to 14 days to process and your Doctor will write to you with the result as soon as it is available.

## Trainee Doctors

A radiology trainee (qualified experienced Doctors in training in Radiology) or occasionally a student may be present during the examination. If you would prefer them not to attend, please let a member of Radiology staff know.

## How to contact us

If you have any personal access needs, require wheelchair access and wish to speak to a member of staff for further information please contact the Interventional Radiology Department on (01902) 307999 ext 86344 between 09:00 and 17:00.

### **Angiography Suite / Interventional Radiology**

Second floor Radiology A2

New Cross Hospital

Wolverhampton

West Midlands

WV10 0QP

### **Patient Advice and Liaison Service**

New Cross Hospital

01902 695362

Email: [rwh-tr.pals@nhs.net](mailto:rwh-tr.pals@nhs.net)

## English

If you need information in another way like easy read or a different language please let us know.

If you need an interpreter or assistance please let us know.

## Lithuanian

Jeigu norėtumėte, kad informacija jums būtų pateikta kitu būdu, pavyzdžiui, supaprastinta forma ar kita kalba, prašome mums apie tai pranešti.

Jeigu jums reikia vertėjo ar kitos pagalbos, prašome mums apie tai pranešti.

## Polish

Jeżeli chcieliby Państwo otrzymać te informacje w innej postaci, na przykład w wersji łatwej do czytania lub w innym języku, prosimy powiedzieć nam o tym.

Prosimy poinformować nas również, jeżeli potrzebowaliby Państwo usługi tłumaczenia ustnego lub innej pomocy.

## Punjabi

ਜੇ ਤੁਹਾਨੂੰ ਇਹ ਜਾਣਕਾਰੀ ਕਿਸੇ ਹੋਰ ਰੂਪ ਵਿਚ, ਜਿਵੇਂ ਪੜ੍ਹਨ ਵਿਚ ਆਸਾਨ ਰੂਪ ਜਾਂ ਕਿਸੇ ਦੂਜੀ ਭਾਸ਼ਾ ਵਿਚ, ਚਾਹੀਦੀ ਹੈ ਤਾਂ ਕਿਰਪਾ ਕਰਕੇ ਸਾਨੂੰ ਦੱਸੋ।

ਜੇ ਤੁਹਾਨੂੰ ਦੁਭਾਸ਼ੀਏ ਦੀ ਜਾਂ ਸਹਾਇਤਾ ਦੀ ਲੋੜ ਹੈ ਤਾਂ ਕਿਰਪਾ ਕਰਕੇ ਸਾਨੂੰ ਦੱਸੋ।

## Romanian

Dacă aveți nevoie de informații în alt format, ca de exemplu caractere ușor de citit sau altă limbă, vă rugăm să ne informați.

Dacă aveți nevoie de un interpret sau de asistență, vă rugăm să ne informați.

## Traditional Chinese

如果您需要以其他方式了解信息，如易读或其他语种，请告诉我们。

如果您需要口译人员或帮助，请告诉我们。