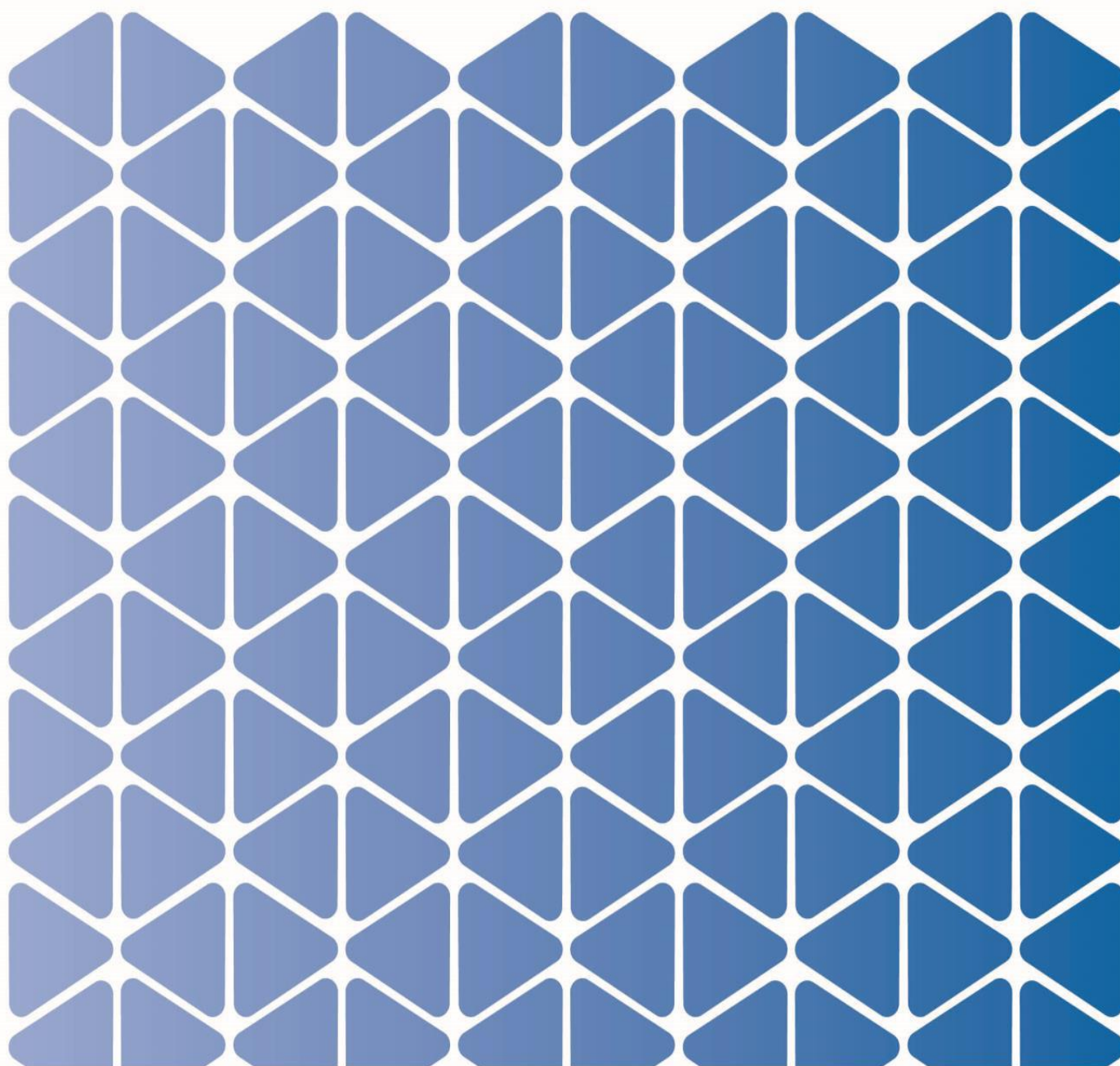


PATIENT INFORMATION**ULTRASOUND GUIDED
PERCUTANEOUS BIOPSY**

Imaging Department
Investigative procedure information leaflet
Ultrasound Guided Percutaneous Biopsy

It has been recommended you have a biopsy using Ultrasound guidance. A biopsy is when a small sample of tissue is taken from a part of the body, the sample will then be processed and examined under a microscope or may be tested in other ways. The examination will help determine what problems (if any) there are and allow your doctor or consultant to advise you of the best treatment. Percutaneous simply means through a small hole (often no more than a needle puncture) in the skin, rather than having to make a large incision.

Ultrasound scanning involves the use of high-frequency sound waves to produce pictures of the inside of the body; ultrasound exams do not use ionizing radiation (X-rays). Ultrasound images are watched in real-time and show the structure and movement of the body's internal organs, as well as blood flowing through blood vessels. Ultrasound imaging is a painless medical test that helps doctors diagnose and treat medical conditions.

You will be asked to lie on a couch and jelly placed on your skin. Your radiologist will use a probe to examine your abdomen, determine precisely the area to take the biopsy and the best approach to make. Your skin will then be cleaned with antiseptic solution and local anaesthetic injected into a small area of skin and the surrounding tissues to minimise the discomfort associated with the procedure. You may be asked to hold your breath for 5-10 seconds whilst a needle is inserted, this should not be painful but you may feel some discomfort and pressure, one or more samples will be taken. Some techniques use a needle which produces a loud click when the sample is obtained. You may feel some local discomfort following the procedure at the site of the biopsy.

This leaflet explains some of the benefits, risks and alternatives to Ultrasound Guided Percutaneous Biopsy to help you make the best, informed decision as to your treatment. Please ask your radiological team about anything you do not fully understand or want to be explained in more detail.

We recommend that you read this leaflet carefully. You and your doctor (or other appropriate health professional) will also need to record that you agree to have the procedure undertaken by signing a consent form, which your health professional will give you.

Intended benefits of the procedure

The aim of the examination is to help determine what problems (if any) there are, by obtaining a sample of tissue for laboratory examination, and allow your doctor or consultant to advise you of the best treatment. You need to be aware that there is a chance that the result could come back inconclusive, meaning no diagnosis. Your referring Doctor will be in touch should this be the case.

Serious or frequent risks

Your doctor has decided to recommend you have this procedure undertaken to help in your continuing treatment, in so doing they have balanced the benefits against any potential risks associated with it.

Ultrasound has no known side effects and percutaneous biopsy is considered to be a safe procedure. Occasionally complications can arise because of the test's invasive nature. These include:

- **Bleeding;**
Internal bleeding from the puncture site can occur. This bleeding will normally stop on its own. Occasionally the bleeding is more severe and a blood transfusion may be required.
- **Infection;**
There is a small risk of infection.
- **Reaction to local anaesthetic;**
There is a small risk of a reaction to the drug used.
- **Accidental injury to other organs;**
There is a small risk of injury to other organs including the lung, liver or bowel – depending on the site the needle insertion. The risk of this complication is substantially reduced by the use of the US guidance.
- **Inadequate sampling**
We might have to repeat the procedure in the near future if the samples are non-diagnostic or inadequate for all tests.
- **Death**
Rare.

You will be cared for by a skilled team of doctors, nurses and other healthcare workers who are involved in this type of procedure regularly. If problems arise, we will be able to assess them and deal with them appropriately. As with all invasive procedures, there is a very small risk that you may die from complications of the procedure.

Please let the Imaging Department know if you;

- have had a heart valve replacement;
- have suffered from endocarditis;
- have had a pulmonary shunt inserted;
- are taking any of the drugs mentioned below; or
- have any allergies.

Other procedures that are available

The alternative procedures which would obtain a sample are to undergo surgery, or sometimes CT guidance may be appropriate. Your doctor can discuss this with you.

Your anaesthesia

Local anaesthetic will be injected to help ensure that you are comfortable during the procedure.

Preparation for your procedure

You can eat and drink normally and you may take your routine medications with sips of water.

You may need to have a blood coagulation test carried out. You will be informed of the arrangements for this test.

You can usually continue with your normal medication, except those listed below in which case please inform your doctor and the radiology department. Please bring any medication you take with you, particularly if you are to be admitted.

Your normal medication

We will usually ask you to continue with your normal medication (except as instructed below) during your stay in hospital, so please bring it with you.

Aspirin/Dipyridamole

If you are taking these medicines regularly, please stop 5 days before the biopsy unless you have a high risk indication. e.g. have had a cardiac stent inserted within the last twelve months.

Clopidogrel, Dipyridamole, Cilostazol or Prasugrel

If you are taking any of these regularly, please ring the booking coordinator on 01527503030 asking for extension 44603. We will need to know why you are taking this medication and discuss this with you. You will need to stop taking these prior to your procedure, but this should only be done after discussion with the Referring Clinician.

Warfarin, Dabigatran and Rivaroxaban

If you are taking any of the above, it may need to be stopped prior to the procedure and alternative medication should be arranged with your referring Clinician. Please ring the booking coordinator on 01527503030 asking for extension 44603. We will need to know why you are taking this and what your target INR is.

On the day of the procedure

You should attend your appointment 15 minutes before the stated time. Following the procedure, you will usually be admitted for observation for a period of a few hours. Prior to the examination the Consultant Radiologist who will be carrying out your procedure will be available to answer any queries you may have. Please let us know in advance if you are allergic to any antibiotics or other drugs.

During the investigation

In the examination room you will be made comfortable on the couch. The procedure will then be performed as described above.

After your investigation

Following the procedure, you will usually be admitted for observation for a period of a few hours.

Leaving hospital

Length of stay

Most patients having this type of test will be in hospital for 4 – 6 hours post biopsy

Medication when you leave hospital

Before you leave hospital, the pharmacy will give you any extra medication that you need to take when you are at home.

Convalescence

How long it takes for you to fully recover from your biopsy varies from person to person. It can take one to two days.

Once home, it is important to rest quietly for the remainder of the day.

Please contact your doctor if you:

- have excessive bleeding from the biopsy site;
- experience excessive sweating;
- experience excessive shivering; or
- generally feel unwell.

Wound

A small waterproof or gauze dressing will be placed over the site after the test and can be replaced if needed.

Personal hygiene

You will normally bathe or shower as normal after you leave hospital.

Diet

You don't usually need to follow a special diet. If you need to change what you eat, we will give you advice before you go home.

Exercise

You should not participate in strenuous sports for the first 10 days after your biopsy. You should avoid heavy lifting and carrying heavy shopping.

Driving

You should not drive until you feel confident that you could perform an emergency stop without discomfort. It is your responsibility to check with your insurance company.

Work

When you return to work will depend on your job. If your job involves heavy manual work you may be advised to take a week off. If your job does not include manual work or lifting you may be able to return to work 2 days after the biopsy.

Test results

We will normally send the samples to a special laboratory in the hospital for tests. The results will not be available on the day of the examination. They will be sent to your referring consultant who will usually either write to you or arrange an outpatient appointment.

Additional Information

The following Internet websites contain additional information that you may find useful:

- www.patient.info
Information fact sheets on health and disease
- www.worcsacute.nhs.uk
Worcestershire Acute Hospitals NHS Trust
- www.radiologyinfo.org
For information on a wide range of radiological procedures.
- www.nhs.uk
On-line Health Encyclopaedia and Best Treatments Website.
- www.bsir.org
British Society of Interventional Radiology – patient information

If your symptoms or condition worsens, or if you are concerned about anything, please call your GP, 111, or 999.

Patient Experience

We know that being admitted to hospital can be a difficult and unsettling time for you and your loved ones. If you have any questions or concerns, please do speak with a member of staff on the ward or in the relevant department who will do their best to answer your questions and reassure you.

Feedback

Feedback is really important and useful to us – it can tell us where we are working well and where improvements can be made. There are lots of ways you can share your experience with us including completing our Friends and Family Test – cards are available and can be posted on all wards, departments and clinics at our hospitals. We value your comments and feedback and thank you for taking the time to share this with us.

Patient Advice and Liaison Service (PALS)

If you have any concerns or questions about your care, we advise you to talk with the nurse in charge or the department manager in the first instance as they are best placed to answer any questions or resolve concerns quickly. If the relevant member of staff is unable to help resolve your concern, you can contact the PALS Team. We offer informal help, advice or support about any aspect of hospital services & experiences.

Our PALS team will liaise with the various departments in our hospitals on your behalf, if you feel unable to do so, to resolve your problems and where appropriate refer to outside help.

If you are still unhappy you can contact the Complaints Department, who can investigate your concerns. You can make a complaint orally, electronically or in writing and we can advise and guide you through the complaints procedure.

How to contact PALS:

Telephone Patient Services: 0300 123 1732 or via email at: wah-tr.PALS@nhs.net

Opening times:

The PALS telephone lines are open Monday to Friday from 8.30am to 4.00pm. Please be aware that you may need to leave a voicemail message, but we aim to return your call within one working day.

If you are unable to understand this leaflet, please communicate with a member of staff.