Breast Imaging

San Radiology & Nuclear Medicine



core biopsy patient information

SO YOU NEED A CORE BIOPSY OF THE BREAST. YOU MAY LIKE TO KNOW...

Core biopsy of the breast, both with or without vacuum assistance, is a safe and minimally invasive method of obtaining a sample of breast tissue that a pathologist will then examine under a microscope. These procedures may be requested by your doctor if they, or you, can feel a lump or change in the breast, or may be recommended by a radiologist after evaluating your breast imaging such as mammography and tomosynthesis, ultrasound and/or MRI. The aim is to determine the underlying reason for a clinical change or imaging abnormality.

These biopsies are done to gain answers without subjecting you to a surgical biopsy which requires a general anaesthetic and a larger incision.

The results allow conservative or non-surgical management of benign abnormalities and can also provide very valuable information to assist you in making choices regarding management of a breast cancer.

What is the difference between a core biopsy and a vacuum assisted core biopsy?

Obtaining a core biopsy is a similar procedure whether it is performed with or without vacuum assistance. The difference to you as the patient is that a core biopsy needle is slightly smaller than a vacuum needle, and the equipment used to obtain the sample is slightly different and less complicated for a core biopsy. Often we are happy that we only need a core biopsy, as it is a slightly quicker procedure with less bruising, although bruising can still be quite marked. However, certain types of imaging abnormalities and certain types of pathology require larger cores and that is when we use vacuum assistance. At the San, we are happy to perform core biopsies as an outpatient procedure, but we prefer to admit you as a day stay patient for a vacuum assisted biopsy.

Who is involved with my biopsy and how is it performed?

The procedure is performed with the assistance of a number of health care professionals who each have slightly different duties. There will be a radiologist, a radiographer (trained in sonography, mammography and/or MRI depending on the imaging used) and sometimes a nurse in the room with you during the procedure. There is always someone with you – you are never left on your own. We will be talking to you throughout, keeping you comfortable. If you experience pain or have any other concerns, make sure you tell us so we can address it for you immediately.

The biopsy is performed with image guidance so the radiologist can accurately target the area of concern. The type of image guidance chosen is determined by which imaging shows the abnormality best, combined with what will be the most comfortable for you. For a core biopsy, this

is usually ultrasound but occasionally they are done with mammography (tomosynthesis). For a vacuum assisted biopsy this could be either ultrasound, mammography or MRI.

Regardless of which imaging technique is used, the skin is cleaned with an appropriate antiseptic solution and local anaesthetic is given. This involves an injection into the skin and underlying breast tissue. You will feel a needle prick and a sting, lasting up to about 30 seconds.

For a core biopsy

Once the breast area is numb, a small cut of about 2mm may be made in the skin to allow insertion of the biopsy device. As the cut is only very small stitches are usually not required at the end of the procedure. The needle is inserted into the breast for each sample and makes a 'click' as it takes the sample. The number of samples taken typically ranges from 1 to 5, and our aim is to ensure adequate sampling to allow for maximum confidence in deciding what management or treatment is required based on the pathology results. The samples are sent off to pathology and it usually takes three working days for your referring doctor to receive the results.

For a vacuum assisted core biopsy

Once the breast area is numb, a small cut of around 3mm to 4mm may be made in the skin to allow insertion of the biopsy device. As the cut is only very small, you do not normally need stitches following the procedure. The needle rotates and suction is used to take a number of samples before the needle is withdrawn. The equipment makes some noises which will be explained to you during the procedure. The number of samples taken can be very variable, ranging from one to twenty. The aim is to ensure adequate sampling to allow for maximum confidence in deciding what management needs to be undertaken based on the pathology result. The samples are sent off to pathology and it usually takes three working days for your referring doctor to receive the results.

For both procedures we will often put in a marker clip to indicate the biopsy site at the end. This will be discussed with you should it be considered necessary and you may need a gentle mammogram after the biopsy to show the position of the marker. The marker will be removed if further surgery is required, but if not it can remain in the breast without causing any harm. You are usually unable to feel the marker clip.

What imaging equipment is used?

The procedures for a core biopsy and vacuum assisted biopsy are essentially the same regardless of the imaging technique used. The differences are largely in the positioning of you and your breast and in the imaging equipment itself. Imaging is performed once the breast is positioned in order to localise the area for biopsy prior to commencing, as well as during and/or after the biopsy.

With **ultrasound** guided procedures, you will be either be lying down flat on your back or rolled slightly to one side with your arm resting above your head. Minor movement is not usually a problem.

With mammographic and tomosynthesis guided procedures you may be lying on your side or you may be sitting up in a specially designed high backed chair. The breast needs to be compressed and the compression plate is designed with an opening through which the radiologist passes the biopsy device. It is vital you stay completely still as the target area is often extremely small and any movement can shift it out of reach of the biopsy device. If you feel the need to adjust your head, arm or shoulder please talk to us so we can assist you.

With MRI guided vacuum assisted biopsies you will be lying on your stomach with your breasts gently immobilised by the MRI breast cradle and a perforated plastic compression plate. You will be given an injection of MRI dye (Gadolinium), the same as for a diagnostic MRI. While the biopsy is being performed, once you are in position, it is again vital that you remain completely still.

When the radiologist is sure they have adequate samples, firm pressure will be applied to the biopsy area for up to 20 minutes before dressing and ice are applied.

Where does the biopsy happen?

The biopsy is performed in San Radiology. While the biopsy itself is relatively quick, there is more time involved in the set up and imaging before and after the biopsy therefore the entire procedure can take up to an hour. For vacuum assisted biopsy procedures we prefer to admit you as a Radiology Day Stay patient so we can best guide and support you through the experience. We will have you stay with us for a short time after the procedure so we can check the biopsy site and ensure there is no significant bleeding, before we discharge you with an information sheet.

What preparation is necessary?

Please bring all you breast imaging studies with their reports on the day of the procedure.

Please do not use deodorant or talcum powder on the day of the procedure. These substances can be seen on mammograms and can have an impact on the interpretation of the image.

We need to know if you are taking blood thinning medications such as aspirin, clopidogrel or warfarin in the days prior to the procedure. If you are taking these sorts of medications, please contact San Radiology on (02) 9480 9850 to discuss this with one of our nurses.

What happens after the biopsy?

Most women have bruising, which on occasion can be quite spectacular, and this can last for some days or even up to a few weeks. Simple measures including ice-packs and Panadol are usually adequate to help with the inevitable bruising and variable levels of discomfort some women feel. We do not recommend aspirin or anti-inflammatory medicines for pain relief after the biopsy as these can make the bruising worse and/or increase the pain. We recommend you keep the site dry and avoid strenuous activities including sports for 24 to 48 hours to allow the breast time to heal. This may

be recommended for a few days for women having a vacuum assisted biopsy.

When will I get the biopsy results?

The results of the biopsy will take approximately three working days and will be sent to your referring doctor and any other relevant healthcare workers involved in your care. This referring doctor is usually best placed to discuss your results and further management and to refer you on if necessary. Make sure you understand how your doctor wants to communicate these results to you and make any necessary appointments.

WHAT ARE THE RISKS OF A BIOPSY?

As with any medical procedure there are risks, but they are small.

As noted previously, bleeding occurs. This is more likely if you are taking, or have taken in the week before your procedure, blood thinning medications including low dose aspirin and non-steroidal anti-inflammatory medications. Usually it is relatively minor but on rare occasions it can be significant, with a large bruise that can be painful and slow to resolve. This is why we keep compression on your breast after the procedure and observe you before you go home. Rarely, delayed bleeding can occur. If you notice visible or increasing bleeding onto the dressing, or if the breast starts to swell and become painful, you should ideally have someone put firm pressure over the area with the palm of their hand. You can apply this pressure yourself if you are on your own. If this occurs please contact the hospital.

Very rarely, a skin stitch may be needed to control the bleeding.

Whenever a biopsy is performed there is a small chance of infection, which for a breast biopsy is estimated at less than 1 in 1,000 procedures. Everything possible is done to minimise this risk but should you notice the development of redness, swelling and/or heat with increasing pain in the days following the procedure, you should see your GP initially for review and advice.

FURTHER INFORMATION

On the day of the procedure we will review the process in full with you and will be happy to answer any questions you may have. We will obtain your written consent as part of the operation.

Of course, if you have concerns before the day you can contact San Radiology on (02) 9480 9850.

San Radiology/MRI Level 3, Tulloch Building **Nuclear Medicine/PET-CT** Level 3, San Clinic 185 Fox Valley Road, Wahroonga NSW 2076

