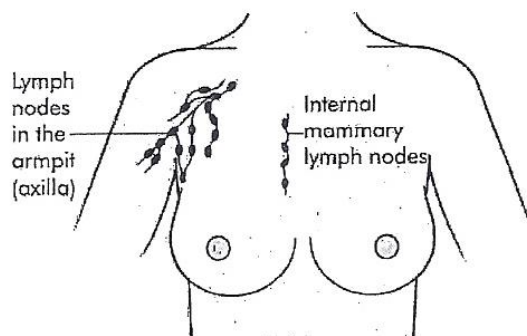


# Breast Lymphoscintigraphy

The status of the axillary lymph nodes is one of the most important prognostic factors in women with early stage breast cancer. If breast cancer cells spread, they are most likely to spread first to lymph nodes located in the axilla or internal mammary chain. The sentinel lymph node is the first lymph node(s) in any draining channel to which breast cancer cells would spread if this occurs from a primary tumour.

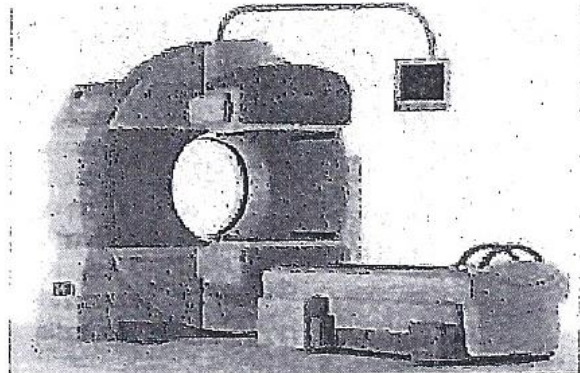
Breast lymphoscintigraphy is a procedure in which the sentinel lymph node(s) is identified enabling it to be removed and examined under a microscope to determine whether cancer cells are present. If the sentinel node(s) do not contain cancer cells an axillary lymph node dissection is usually avoided. It is important to note that breast lymphoscintigraphy can identify the sentinel node but does NOT indicate the presence or absence of cancer cells within it.



## The Procedure

Your study will be arranged for either the afternoon before or the morning of the day of surgery. A referral and all previous breast imaging (mammograms, US, MRI's) must be brought to your appointment.

**Part 1:** Approx. 20-30 minutes if your tumour is palpable a nuclear medicine specialist will inject a small amount of radioisotope around it. For non-palpable tumours ultrasound assistance is often required. The injections may sting briefly but there are no other side effects. You will be asked to massage the injected area after which pictures will be taken with a gamma camera.



**Part 2:** Approx. 45 minutes. A second series of pictures is taken approximately 1-2 hours later. Once the sentinel node(s) has been identified, marks will be drawn on your skin to assist your surgeon. A

low dose SPECT/CT scan is usually performed to provide further anatomic localisation. You will be able to shower taking care not to remove the skin marks if your surgery is the following day.

**Same day surgery at the Mater:** We will deliver the images and report directly to your surgeon.

**Next day surgery at the Mater OR same day surgery at other hospitals:** You will be required to wait for the images and report.

**Note:** This information applies to most patients however your procedure may be varied by your surgeon and/or Nuclear Medicine specialist.