PETCT Diagnostic Imaging Service

Please arrive 15 minutes before your appointment time

Introduction

This leaflet tells you about your Position Emission Tomography Computed Tomography (PETCT) scan. It explains how the examination is performed, what to expect, and the risks involved. It is not meant to replace informed discussion between you and your doctor, but can act as a starting point for such a discussion.

What is a PETCT scan?

The scan uses X-ray technology together with a radioactive tracer to create a 3D picture of the inside of the body. The images taken produce a detailed picture of the internal anatomy and function. These images will allow your doctor to plan any treatment required more accurately.

Before the scan you will be given an injection (usually in the arm) of a low - dose radioactive form of glucose. This allows us to measure the activity of cells in different parts of the body. After a rest period of about an hour, your scan is then carried out, which is painless and usually takes about 30 minutes.

The scanning unit

Your scan will be carried out at an InHealth scanner. This will be a mobile unit located in the front car park of the hospital. The mobile unit looks like a large white trailer with InHealth PETCT Diagnostic Imaging Service written on the side as shown in the photograph. The scanner is similar to a normal CT scanner, only slightly larger.



ON THE DAY OF YOUR PROCEDURE

Preparation

- You must not eat anything for the 6 hours before the scan appointment time
- You must also not drink any meal supplements, liquid food, tea or coffee, flavored water or squash during the 6 hours before your appointment time
- You may drink plenty of plain water
- You must continue to take your usual medication, with the exception of insulin if you are diabetic (see below) During the 24 hours before your appointment time, you should avoid strenuous physical activity e.g. horse riding or exercising in the gym.

During the Procedure

After you have been greeted at reception, a member of staff will explain the procedure. Please feel free to ask any questions regarding the PETCT scan at this point.

A member of staff will then take a short medical history from you to assist the doctor who reports the scan. The Radiographer or Nuclear Medicine Technologist will then inject a small amount of a colourless liquid called 18FDG (low-dose radioactive form of glucose) into a vein in your arm.

You will then rest for approximately one hour prior to your scan. The rest period is to allow the body time to take up the injection. During this rest period, you will be asked to relax as much as possible and refrain from talking, as this can stimulate your muscles and affect the quality of the scan.

You will then be asked to visit the toilet to empty your bladder before your scan. This is to ensure the bladder is empty and gives a good view of the pelvic region. Following this, you will be taken to the scanner, where you will be asked to lie flat and still on a scanning table during the scan for approximately 30 minutes. You will then be free to leave the PETCT unit.

The whole procedure takes approximately 2 hours.

After the procedure, we will ensure you are given some light refreshments of tea or coffee and a sandwich.

Special Information for diabetic patients

If you are diabetic, you should take your usual diabetic medication 4 hours before the scan appointment time together with your usual breakfast and then take no more medication or food. If you are diabetic please do let us know if you are feeling unwell prior to or during your appointment. If you are pregnant, or think that you might be pregnant, or are breast feeding, please contact the Nuclear Medicine Department on 0208 247 3428.

What should I wear?

It is advisable for you to wear comfortable clothes without metal zips or an under-wired bra. You will not normally change into a gown for the scan so will be scanned in your own clothes. Some patients feel cold on the unit even on a warm day, so please bring additional warm clothes, such as a fleece or a hooded jacket and a warm hat.

What about my relatives or accompanying friends?

If you come with friends or relatives there are several waiting areas within the hospital where they can wait whilst you have your scan. They will be informed how long they will need to wait and when they can collect you from the hospital. It is very important that you do not bring children or pregnant friends with you because the PETCT scan uses radiation and children and pregnant women are particularly susceptible to radiation.

What should I bring with me to my appointment?

- Any medication that you would normally take during the day
- A book or personal music/radio device
- A warm jacket or fleece and a warm hat

What happens after the scan?

You will be able to leave as soon as our scan is finished.

You should continue to drink plenty of fluids for the remainder of the day. You should avoid close and prolonged contact with children and pregnant women for 6 hours after the scan.

How will I get my results?

The staff on the PETCT unit cannot discuss the results of your scan with you. The scan is usually reported the same day and the report will be sent to the doctor who referred you for your scan. Once the results have been discussed with the hospital team caring for you the results will be explained to you by your consultant.

How much radiation do I receive from the scan?

The amount of radiation you are exposed to during the PETCT scan is between 10-14milli Sieverts. This is similar to how much you would receive from a Neck/Chest/Abdomen/Pelvis CT scan, on a return flight from London to New Zealand or what you would receive naturally living in Cornwall for 1.5 years. Most of the injected radiation will have left your body 6 hours after the scan. Your referring consultant would have assessed any risks from the radiation with the benefits from the information aimed from the procedure before referring you for the scan.

Please do contact us for any further queries:

The Nuclear Medicine Team

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