

# Patient information – Magnetic Resonance Imaging (MRI)

# **Department of Radiology**

#### What is an MRI scan?

MRI is the name given to a technique which uses a magnetic field and radio waves together with an advanced computer system to build up a series of images. Each image represents a thin slice of the body and by combining these slices, the computer can create a cross-sectional image of the part of the body under examination. These images are very detailed and can show both bones and soft tissues in the body and therefore give a great deal of information. By means of the computer, the slices can also be obtained in any direction.

# Are there any risks from the procedure?

As far as is known at present, this is an extremely safe procedure. It does not involve the use of X-rays. You are placed in a very powerful magnetic field but if you have any small pieces of metal inside your body, there is a risk that these may move or heat up during an MRI scan.

If you have or think you have **any** of the following, **you must** contact the MRI department **before** your scan:

- History of metal fragments in your eye
- Pacemaker or replacement valves of any kind
- Metallic clip on an artery or any implant

It may be necessary to have an ordinary X-ray before your scan to prove there are no pieces of metal inside your body.

# Failure to inform us of any metal in your body may cause your scan to be cancelled on the day.

- You will be sent a safety questionnaire with your appointment letter which must be completed before your arrival in the MRI department. Please contact the Radiology Department if there are any queries with the questionnaire.
- Due to the magnetic field, all piercings and jewellery will have to be removed beforehand; please leave these at home with any other valuables. You may wear wedding bands to your appointment but these may need to be removed prior to the scan. Please phone the Radiology Department if you need advice on what needs to be removed before attending. Failure to remove piercings and certain jewellery may result in the cancellation of your scan.
- There is a slight risk with tattoos that they may heat up and potentially cause a skin burn. You must inform the radiographer of the position of any tattoos before the scan. Tell the radiographer **immediately** if the area around your tattoo becomes warm during the scan.

### Please phone us before your appointment date if:

- you are, or think you may be pregnant
- you are diabetic
- you have kidney problems
- you had a reaction to a previous injection of contrast medium given for a previous CT scan or X-ray examination

# Are there any special preparations for the scan?

Usually you do not need to make any special preparation for a MRI scan but this will depend on the area being examined. Unless you have been told otherwise, you may eat and drink normally.

# Can I bring a relative/friend?

Yes, a relative or friend may accompany you to the department, but they are not usually allowed in the examination room. Anyone who enters the scan room will have to undergo safety checks and will be required to place all metallic objects in a locker.

Please do not bring young children with you as they cannot come into the scan room and staff cannot watch them for you.

# When you arrive for your appointment

You will be booked in at reception. A radiographer or other member of staff will check your answers to the safety questionnaire; this may be repeated. For some scans you will be required to undress and put on a hospital gown. You will be asked to place cash, keys, credit cards, watch, specific jewellery and your clothes in a secure locker.

# What happens during the procedure?

In the scan room you will be asked to lie on a couch. The couch will be moved slowly to position the relevant part of your body within the scanner. Staff will return to the control room but you can talk to them via an intercom and they will be watching you whilst the scan is in progress.

During the scan, the machine is very noisy so you will be given earplugs and/or earphones. If you feel uncomfortable or worried, tell the radiographer immediately. Music can sometimes be played whilst you are in the scan room. You may bring your own CD if you wish.

Occasionally, we may need to give an injection of a contrast medium via a vein in the arm. This helps us to see anatomy in more detail. The injection will be explained at the time of your appointment. If you have previously had a reaction to the contrast during an MRI scan please contact the department before your appointment.

# How long will it take?

The scan usually takes approximately 20-30 minutes and, unless an emergency patient causes a delay, your total time in the department is likely to be about 45 minutes. More complex procedures may take up to an hour.

## Will the scan be uncomfortable?

Apart from any machine noise you will not be aware of anything happening. Most patients do not mind lying with their body within the scanner, but some find it claustrophobic. If this makes you feel worried, do tell the radiographer immediately. However, if you suffer badly from claustrophobia, you should talk to the Radiology Department as soon as possible before your appointment.

### Are there any side effects?

No.

#### Can I eat and drink afterwards?

Yes, you can eat and drink as normal.

# When will I receive my results?

The Radiologist will study the images and send the results to your referring doctor. You will be able to discuss these results at the next appointment with your doctor.

#### **Feedback**

When you attend your hospital appointment you should be offered the Friends and Family Test survey asking you the question, "How likely are you to recommend our service to friends and family if they needed similar care or treatment?" - We welcome your comments about what was good about your visit and what would have made your experience better. Your feedback is anonymous and is used to help improve the services we provide to all our patients.

# If I have a query who should I contact?

Please contact the Radiology Department between 9am and 5pm, Monday to Friday. Telephone: 01438 284030

If you are unable to attend your appointment, please let us know at least 48 hours beforehand by telephoning: 01438 284859

Date of publication: November 2012

Author: MRI Lead

Reference: Rad 11 Version: 2 (Nov 2019)

Review Date: November 2022

© East and North Hertfordshire NHS Trust

www.enherts-tr.nhs.uk

You can request this information in a different format or another language.

