



Ultrasound scans

This information sheet explains about ultrasound scans, why they might be needed and what to expect when your child comes to Great Ormond Street Hospital (GOSH) to have one.

What is an ultrasound scan?

An ultrasound scan uses sound waves to take pictures of your child's body. The sound waves are of a much higher frequency than normal so you cannot hear them. A jelly is used to help conduct them inside the body. An ultrasound scan usually takes between 15 and 30 minutes, depending on the part of the body being scanned.

Your child might need this scan so that the doctors can get detailed pictures of the size and shape of part of their body and how well it is working. The information from the scan is then used to plan your child's treatment.

Ultrasound scans are carried out in the Radiology department, either by a radiologist (doctor specialised in imaging techniques) or a sonographer (someone who specialises in ultrasound imaging).

Are there any alternatives?

There are various types of imaging techniques, such as x-rays, CT or MRI scans, which can be used instead of or as well as ultrasound scans. These scans use x-rays or magnets to create the pictures. The type of imaging used depends on your child's health and the reason why the imaging is needed. Different types of scan are useful for answering different types of medical question. Ultrasound scans are best for looking at soft tissues, such as the liver, kidneys, bladder, and muscle.

When you receive your appointment letter

If you are unable to keep this appointment, please inform the department as soon as possible beforehand. Sometimes we can offer the appointment to another child on the waiting list. As so many children and young people need to use our services, we have had to introduce a policy where if a child cancels or does not attend two appointments in a row, we will close their referral and inform their GOSH consultant.

If your child is anxious about the scan, please explain exactly what will happen. Sometimes it helps to have a practice at home using body lotion or hair gel instead of the jelly and using the top of a deodorant bottle or your hand instead of the probe.

The day of the scan

Please arrive at the Radiology department at the time stated in your child's appointment letter.

If your child is having an abdominal ultrasound scan, they should avoid eating and drinking for four hours before the test. This makes it easier to see all the structures of the digestive system.



If your child is having a renal (kidney) ultrasound, they should drink plenty of fluid before the scan so that the bladder is full. Usually, the radiologist or sonographer will want to take pictures of your child's bladder when it is full and when it is empty. There is a toilet in the ultrasound room so your child can empty their bladder during the scan.

During the scan, your child can watch television on a screen above the bed, or read a book or hold a favourite toy. Your child's clothes will need to be loosened around the area being scanned so that the jelly can be applied directly to their skin.

The scan

You will be able to stay with your child throughout the scan. Your child will need to lie on the bed with the lights turned down low so that the radiologist or sonographer can see the screen easily. They will put some jelly on your child's skin, over the area being scanned, and move a probe over the area.

This probe transmits the sound waves that pass through your child's body and picks them up again as they are bounced back. This forms a picture which is stored on a computer. Depending on the part of the body being scanned, your child may have to sit up or roll over so that the radiologist or sonographer can get the best pictures possible.

After the scan

When enough pictures have been taken, they will wipe off the jelly so that your child can get off the bed and go home if no further tests or treatment is planned. The pictures from the scan will be sent to your hospital doctor straightaway through our computer system.

Are there any risks?

No. Ultrasound scans use only sound waves, rather than x-rays or magnetism, to form pictures. The radiologist or sonographer will warm up the jelly before putting on your child's skin but it may tickle a little.

If you have any questions, please telephone the Radiology department on 020 7829 8615