



Acute maternal hyperoxygenation testing in babies with congenital heart disease

This leaflet is about a test called acute maternal hyperoxygenation. The test measures your unborn baby's response to oxygen if they have a heart problem (congenital heart disease). The leaflet explains the benefits of the test, possible effects and what you can expect at your hospital appointment. If you have any questions, please speak to the doctor or nurse caring for you.

Acute maternal hyperoxygenation testing

This is when we give you oxygen through a mask if:

- you are pregnant
- your unborn baby has been diagnosed with a heart problem (congenital heart disease)

During the test, we check your baby's response to the oxygen using ultrasound scans. This is the same type of scan that you have during pregnancy to monitor your baby's heart.

Benefits of the test

Studies have shown that it is useful to record how the unborn baby's blood flow changes when we give oxygen to the mother. This can help the medical team to predict how unwell the baby might be when they are born. We then use the information to plan your delivery.

Risks of the test

There are no known risks of giving oxygen to pregnant women for a short period. Several studies have checked that this is safe for you and your baby.

Other treatment options

Another option is to have standard tests with ultrasound scans alone, as you have already been doing during your pregnancy. We then use the scan results to plan and guide possible early treatments that your baby might need after birth.

Preparing for the test

No specific preparation is needed. The test is like a standard ultrasound scan of the baby but may take a bit longer.

Giving your permission (consent)

We want to involve you in decisions about your care and treatment. If you decide to have acute maternal hyperoxygenation testing, we will ask you to sign a consent form. This says that you understand what is involved and agree to have the ultrasound with oxygen.

If you would like more information about our consent process, please speak to a member of staff caring for you.



During the test

The test involves the following steps:

- We do a full ultrasound scan of the baby with a device called a probe on your tummy.
- We attach a face mask to cover your nose and mouth, and give you oxygen to breathe as you lie on a couch.
- We repeat the ultrasound scan 10 minutes later to see how the patterns of blood flow change in your baby.

How the test feels

You do not feel any pain during the test. Giving you oxygen during an ultrasound scan does not cause pain.

After the test

You can go home after the test, just like after a standard ultrasound scan. There is no need to stay in hospital.

After you leave hospital

You can resume your usual day-to-day activities immediately, just as you would after your other scan appointments.

Follow-up appointment

Whether you have a follow-up appointment depends on when the acute maternal hyperoxygenation test takes place. In most cases, this happens during your last appointment with the fetal cardiology (heart) team before you give birth.

If there is a change in your delivery plan, we will talk to your pregnancy specialist (obstetrician) and midwife about this. You may then need another appointment.

More information

The following websites have more information about congenital heart disease:

British Heart Foundation

Web www.bhf.org.uk/informationsupport/conditions/congenital-heart-disease

Evelina Children's Heart Organisation (ECHO)

Web www.echo-uk.org

Contact us

If you have any questions or concerns about acute maternal hyperoxygenation testing, please contact the fetal cardiology team, **phone** 020 7188 9201, Monday to Friday, 9am to 5pm, **email** fetalcardiologycns@gstt.nhs.uk

For more information on conditions, procedures, treatments and services offered at our hospitals, please visit web www.evelinalondon.nhs.uk/leaflets



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