

What happens if an abnormality is detected?

Approximately 1 in 50 babies are born with a congenital abnormality. Some are minor blemishes and others major structural problems. If an abnormality is suspected at your 18 week scan you will be informed immediately by the attending obstetrician gynaecologist at the clinic. *If you do not wish to be informed of an abnormality please let the staff know prior to the scan.* The significance and implications of the abnormal finding will be explained to you. In some patients a repeat ultrasound 1-2 weeks later may be required. In others it may be necessary to consider needle tests on the day such as amniocentesis (refer information leaflet) or CVS (refer information leaflet) to determine whether the baby has Down syndrome or other genetic/chromosome abnormalities.

Many abnormalities detected at the routine 18-20 week scan are not necessarily serious and do not necessarily result in mental or physical deficit e.g. hole in the heart, skin tags, extra digits etc. In fact most holes in the heart close spontaneously either during the pregnancy or shortly after birth without need for medical treatment or intervention.

Some abnormalities are however serious or lethal and are not compatible with survival during the pregnancy or after birth. Many patients in these circumstances choose to interrupt the course of the pregnancy. The choice to interrupt or continue the pregnancy before 20 weeks lies with you and your partner.

It is important that the above information be kept in perspective. That is to say that 98-99% of babies are born healthy and normal

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OBSTETRIC & GYNAECOLOGICAL ULTRASOUND



**18-20 Week
Ultrasound**

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What information may be obtained at the 18-20 week ultrasound?

The routine 18-20 week ultrasound examination provides the following information about your pregnancy:

- 1) Determines the number of babies present
- 2) Detects the baby's heart beat
- 3) Determines the size of the baby and compares this to your period dates
- 4) Detects structural abnormalities
- 5) Assesses the position of the placenta
- 6) Assesses the volume of fluid surrounding the baby

Are there any risks to this ultrasound examination?

No. There is no evidence in the medical literature, following extensive research, to show that ultrasound causes any harm to you or your baby.

What are the limitations of the examination?

*The 18– 20 week ultrasound does not detect **all** fetal abnormalities.* It is expected however that the majority of fetal structural abnormalities will be identified. The quality of the image obtained at the time of the scan determines the ability to detect problems. Factors which influence image quality include:

- 1) **The distance between the ultrasound probe and the baby.** It is relatively easy to identify the anatomy in patients who are of normal weight or underweight when compared to patients who are overweight.
- 2) **The position of the baby.** In most pregnancies the position of the baby is favorable. In a small percentage of patients however the baby lies curled up with its spine covering the internal organs. In these circumstances you may be asked to 1) drink more water 2) empty your bladder or 3) go for a short walk. Occasionally you will need to be rebooked for a further scan.
- 3) **The number of weeks of pregnancy.** If you present too early for your scan (i.e. <18 weeks) the organs may not yet be fully formed and it may not be possible to identify the various structures. A follow up examination in 2-4 weeks in these circumstances is generally recommended.

How is the examination performed?

In 99% percent of patients this is performed as an abdominal scan. Warm jelly is placed on your abdomen and a light plastic probe is guided over the abdomen as images are displayed on the monitor above you. Various parts of the baby's anatomy they will be pointed out to you as the examination is in progress. Some parts of the examination may difficult to interpret or understand but are important from the technician's point of view that they are assessed, so don't be alarmed if you cannot understand **all** aspects of the scan.

In situations where the baby is in an awkward position or limited views are obtained of the placenta it may be necessary to perform a transvaginal examination. However such a scan will only be performed with your permission (please refer transvaginal ultrasound information leaflet).

What is recorded during the examination?

Several measurements are taken of the baby's head, abdominal circumference, and leg length. These measurements are used to determine an ultrasound age for the baby. If the ultrasound age agrees within 7 days of pregnancy age based on your period dates, then your dates are "confirmed". If however there is more than a 7 day discrepancy, the pregnancy age will be based on the ultrasound measurements, unless you have had an earlier ultrasound.

When there is a discrepancy this does not mean your dates are incorrect. Rather you may have a long cycle, short cycle, ovulated late or earlier than usual etc. You will be informed at the end of the examination of the expected date of delivery based on the final measurements.

Next the anatomy of the baby is examined. Several measurements are taken and documented and a lengthy list of all fetal body structures are checked. Some of these will be easy to understand and others not so easy. A running commentary will be provided to you as the examination is in progress. Try where possible to reserve your questions until the end of the examination. Finally the position of the afterbirth, volume of fluid around the baby and the length of the cervix (neck of the womb) is documented.