Testing for Diabetes in Pregnancy

Diabetes can cause problems for you and your baby during your pregnancy and birth, so it’s important to know if you have or are at risk of diabetes and how to look after yourself and your baby.

What is diabetes in pregnancy?
Whenever we eat, a hormone called insulin helps move the sugar from our food through our blood and into our muscles, where it is turned into energy to help us move.

When you are pregnant, your body produces lots of other hormones to help your baby grow. Some of these hormones can stop insulin working well. This causes sugar to build up in your blood because it can’t get to your muscles. You have diabetes when you have too much sugar in your blood.

Pregnancy diabetes generally goes away after your baby is born, though it leaves you with more chance of developing diabetes again later in life.

What can happen if you have diabetes in pregnancy?
If you have diabetes when you are pregnant and don’t get treatment:
• your baby can grow too big, and this can cause problems for you and your baby during the birth
• you can develop high blood pressure and pre-eclampsia (a serious condition that can give you headaches, abdominal pain, nausea and other problems)

• your baby may have problems with their own blood sugar when they are born, and they will have more risk of getting diabetes later in life.

Testing for diabetes
There are three blood tests that can help you find out if you have or are at risk of getting diabetes during your pregnancy. The three tests are:
• HbA1c
• Oral glucose challenge test (OGCT)
• Oral glucose tolerance test (OGTT).

HbA1c
The HbA1c is a simple blood test. You will be offered it at the same time as your first antenatal blood tests. You can eat and drink normally before the test, and you can leave as soon as the test is finished.

The HbA1c test shows your average blood sugar level for the past 6–12 weeks. It measures what percentage of your haemoglobin (the protein in your red blood cells that carries oxygen) is coated with sugar (glycated). A high HbA1c level means that more sugar has been circulating in your body and you have a higher risk of getting diabetes in your pregnancy.

If the HbA1c test shows that you have diabetes, you’ll be offered another HbA1c test 3 months after your baby is born to check that your blood sugar level is back to normal.
Oral glucose challenge test (OGCT)
If you are not at high risk of diabetes in pregnancy, your Lead Maternity Carer (LMC) will offer you an oral glucose challenge test (also called a polycose test) when you are between 24 and 28 weeks pregnant. This test measures how well your body can process sugar. You can have this test at any time of the day.

For this test, you’ll drink a sugary drink and then wait 1 hour before giving a blood sample. You will not need to do anything special before or after the test. Most people do not have side effects from the oral glucose challenge test.

Oral glucose tolerance test (OGTT)
If your HbA1c or oral glucose challenge test results were high, your LMC will offer you an oral glucose tolerance test. This test will confirm if you have pregnancy diabetes or not.

This test is done on an empty stomach, so your appointment for the test will be in the morning. You shouldn’t eat or drink anything for at least 8 hours before the test. You can eat normally the day before the test, but don’t have anything to eat or drink (except water) after your last meal the evening before.

When you arrive for the test, a blood sample is taken to measure how much sugar is in your blood after you’ve been fasting. Next, you’ll drink a sugary drink and then wait 2 hours before giving another blood sample. You will not be able to leave the lab for 2 hours.

Most people do not have side effects from the OGTT. Some feel sick, sweaty or light-headed after they drink the sugary drink, but long-term, serious side effects from this test are very uncommon.

If the tests show that you have diabetes, your LMC will talk to you about ways you can access care to manage it. They will also refer you to a specialist for advice.

Keep doing these things to keep you and your baby healthy
• Attend regular check-ups with your LMC.
• Get regular exercise.
• Eat healthy food.
• Don’t smoke.
• Don’t drink alcohol.
• Avoid drugs.

For more information
• Talk to your GP, LMC, diabetes nurse or specialist.
• Visit the Ministry of Health National Maternity Guidance web page.
• Visit the Diabetes New Zealand website www.diabetes.org.nz/about_diabetes/gestational_diabetes