



PATIENT INFORMATION

PAEDIATRIC DIABETES – HbA1c



What is an HbA1c blood test?

The level of HbA1c depends on the blood glucose levels during the life span of the red blood cell, which lives for about three months. Glucose (sugar) is attached to the red blood cells. The HbA1c blood test reflects the average over the three months.

- HbA1c is short for Glycated haemoglobin..
- Glucose (sugar) is bound to the Haemaglobin in the red blood cells.
- The level of HbA1c depends on the blood glucose levels during the life span of the red blood cell.
- A red blood cell lives for about 120 days.
- HbA1c reflects the average blood glucose during the last 3 months. It especially tells you what has been happening in the 6-8 weeks in the middle of that 3 month period.

How often should I check my HbA1c ?

HbA1C should be checked regularly, every 3 months in a person with type 1 diabetes. This is done by a machine in clinic using a finger prick blood sample so that you can discuss the results with your team on the day.

How can I improve my HbA1c

Monitor your blood glucose levels regularly and make necessary adjustments to your insulin dose. If you are finding it difficult to improve contact your nurse or dietitian for some advice and support.

Check your blood glucose meter for weekly averages, two weekly averages and aim to **reduce** your **average** readings.

Eat a healthy diet, and take part in some form of regular physical activity.

You can plot your own HbA1c results from clinic here:

HbA1c mmol/ mol	Date	Date	Date	Date	Date	Date	Date	Date	Date	Date
130										
119										
109										
97										
86										
75										
64										
57										
53										
48 Target										
45										
40										

What should my HbA1c be?

Many studies have shown that in young people with a HbA1c of 48mmol/mol or under the risk of long term complications will decrease considerably.

A high HbA1c increases your risks of complications relating to diabetes in the future

Normal value non-diabetics	20-42mmol/mol
Excellent diabetic glycaemic control	48mmol/mol
Fair control but work at reducing (a small risk of complications)	57mmol/mol or under
Poor control, work to improve (a higher risk of complications)	58-68mmol/mol
Very poor control, work to improve (a very high risk of complications)	75mmol/mol

What do we mean by complications?

Complications for young people include delayed puberty and poor growth, as well as long term complications such as eye, kidney and nerve disease. Check out the leaflet "all about complications" for more information.

Data from the Diabetes Control and Complications Trial (DCCT 1995) demonstrated conclusively that good control with blood glucose levels and HbA1c will delay and slow the progression of the most serious complications.

- 76% Reduction in Retinopathy (eye disease)
- 50% Reduction in Nephropathy (kidney disease)
- 60% Reduction in Neuropathy (damage to nerves)

If your symptoms or condition worsens, or if you are concerned about anything, please call your GP, 111, or 999.

Patient Experience

We know that being admitted to hospital can be a difficult and unsettling time for you and your loved ones. If you have any questions or concerns, please do speak with a member of staff on the ward or in the relevant department who will do their best to answer your questions and reassure you.

Feedback

Feedback is really important and useful to us – it can tell us where we are working well and where improvements can be made. There are lots of ways you can share your experience with us including completing our Friends and Family Test – cards are available and can be posted on all wards, departments and clinics at our hospitals. We value your comments and feedback and thank you for taking the time to share this with us.

Patient Advice and Liaison Service (PALS)

If you have any concerns or questions about your care, we advise you to talk with the nurse in charge or the department manager in the first instance as they are best placed to answer any questions or resolve concerns quickly. If the relevant member of staff is unable to help resolve your concern, you can contact the PALS Team. We offer informal help, advice or support about any aspect of hospital services & experiences.

Our PALS team will liaise with the various departments in our hospitals on your behalf, if you feel unable to do so, to resolve your problems and where appropriate refer to outside help.

If you are still unhappy you can contact the Complaints Department, who can investigate your concerns. You can make a complaint orally, electronically or in writing and we can advise and guide you through the complaints procedure.

How to contact PALS:

Telephone Patient Services: 0300 123 1732 or via email at: wah-tr.PALS@nhs.net

Opening times:

The PALS telephone lines are open Monday to Friday from 8.30am to 4.00pm. Please be aware that you may need to leave a voicemail message, but we aim to return your call within one working day.

If you are unable to understand this leaflet, please communicate with a member of staff.