

Hemoglobin A1c (HbA1c)

A hemoglobin A1c test helps identify those at an increased risk of developing diabetes, as well as monitor a diabetes patient to help in treatment decisions. The A1c test evaluates the average amount of glucose in the blood over the last 2 to 3 months by measuring the percentage of glycated (glycosylated) hemoglobin.

What is hemoglobin?

Hemoglobin is an oxygen-transporting protein found inside red blood cells. There are several types of normal hemoglobin, but the predominant form – about 95-98% – is hemoglobin A. As glucose circulates in the blood, some of it spontaneously binds to hemoglobin A. Hemoglobin A1c, also called glycated hemoglobin, is hemoglobin with glucose attached. The higher the level of glucose in the blood, the more glycated hemoglobin is formed.

When should I have an A1c test done?

Hemoglobin A1c may be ordered as part of a health checkup or when someone is suspected of having diabetes because of classical signs or symptoms of increased blood glucose levels (hyperglycemia) such as:

- Increased thirst
- Increased urination
- Fatigue
- Increased appetite
- Blurred vision
- Slow-healing wounds or infections

An A1c test may also be considered in overweight adults with the following risk factors:

- Physical inactivity
- Abnormal lipid profile
- First-degree relative (sibling or parent) with diabetes
- High-risk ethnicity
- High cholesterol
- High blood pressure
- History of cardiovascular disease

What should I do if the results are abnormal or out of range?

It is always recommended you meet with a healthcare provider to determine what your laboratory test results mean to you. Your healthcare provider will review all of your test results and, combined with your health history, will be able to provide an accurate course of action.

If your results were high: If you have not been diagnosed with diabetes, high levels could indicate an increased risk of developing diabetes. If you have diabetes, abnormal results could indicate that your diabetes is not being controlled and you may be at risk for complications. Keeping A1c levels close to normal is a key part of diabetes care. The American Diabetic Association recommends diabetics keep their A1c levels at less than 7%. As with any abnormal results, it's important that you discuss their implications with your healthcare provider.

If your results were within normal range: Because your test results give a measure of how well your diabetes is being controlled, they can provide important information for your healthcare provider. Talk with your healthcare provider about your results and how you can use them to better manage your diabetes.

What other resources are available to learn more about my health and laboratory tests?

- American Diabetes Association: diabetes.org
- Lab Tests Online: labtestsonline.org

DLO Direct offers direct access to laboratory testing for informational purposes. A DLO Direct lab test result is not a medical diagnosis and is not intended as medical advice. Only a healthcare provider can interpret lab results and diagnose a medical condition or disease.

Because tests have not been ordered by a healthcare provider, third party entities, including Medicare and Medicaid, will not reimburse for these tests.



dlodirect.com • 800.891.2917