

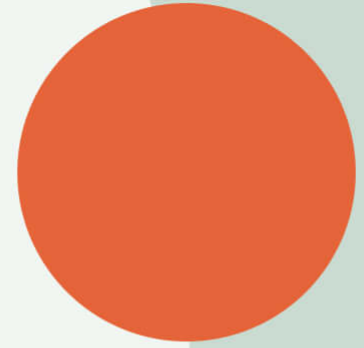
GlycanAge Report

DripDok



-010506

Date of sampling: 13/08/2023



What is GlycanAge?

GlycanAge is a scientifically proven measurement tool. It responds quickly to lifestyle changes, allowing you to measure their impact.

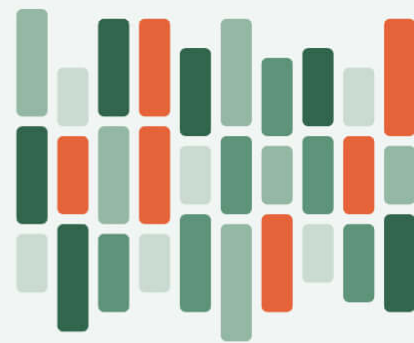
It works by measuring **chronic inflammation** in your immune system at the molecular level – also known as **inflammaging**.

What can it tell me?

Your biological ageing is influenced by your genes, age, and **lifestyle**. GlycanAge measures how your **lifestyle** choices affect the activity of your immune system.

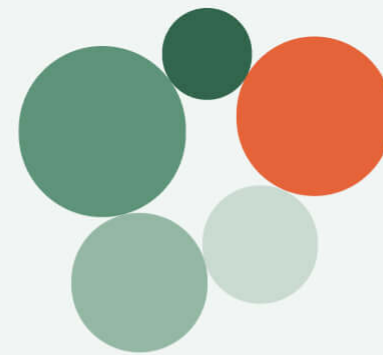
If you make changes and re-test, GlycanAge will help you understand whether the adjustments in your lifestyle and habits are moving you in the right direction.

How do we analyse your profile?



Analyse composition

We look at 29 different glycan structures gathered from your blood sample to determine your unique glycan composition.



Group data into indexes

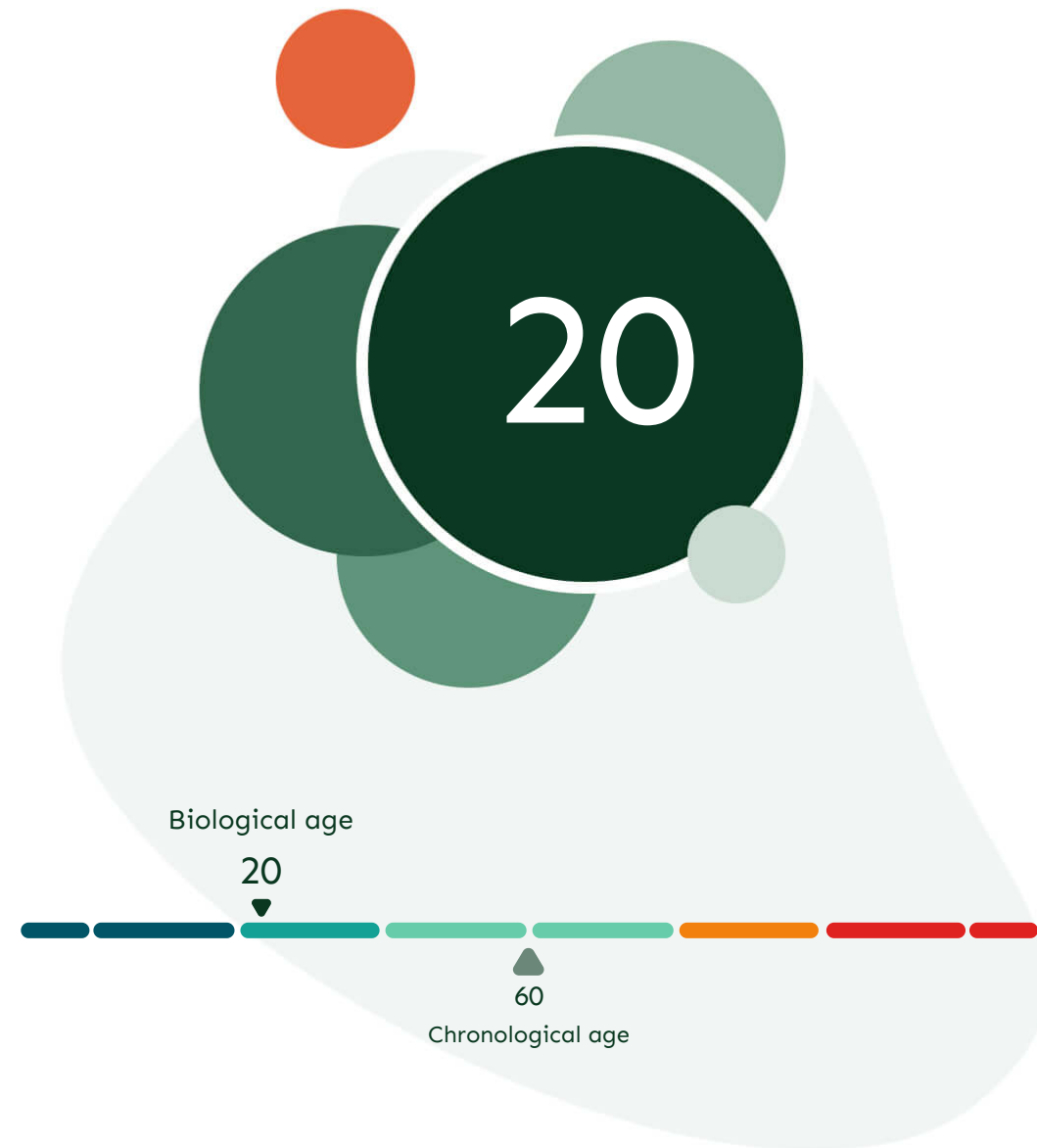
We group related structures into indexes. Some indexes promote chronic inflammation, while others shield you against it.



Calculate GlycanAge

We combine and weight your data to calculate your GlycanAge – a single number that represents the current age of your immune system.

Your Biological Age



Great news!

Your biological age is 40 years younger than your chronological age.

We'd love to hear more about your lifestyle and what you've done to achieve such a great result. Get in touch and tell us about your success. If you haven't already, please review your results with your healthcare specialist at DripDok to learn about areas you might want to investigate and improve.

RESULT BREAKDOWN:

Anti-inflammatory indexes

These indexes protect against chronic inflammation, so it is **better to have more** of them. Their main feature is containing **galactose** and **sialic acid**.

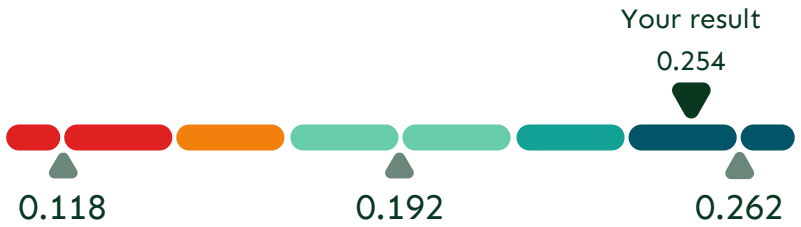
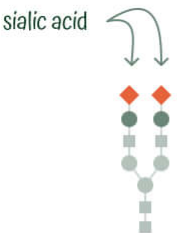
Glycan Youth

An unfavourable Youth result associates with advanced age, nonalcoholic fatty liver, unhealthy excess weight, inflammatory bowel, as well as an increased chance of existing or future metabolic issues, irregular cell growth and over-activation of the immune system.



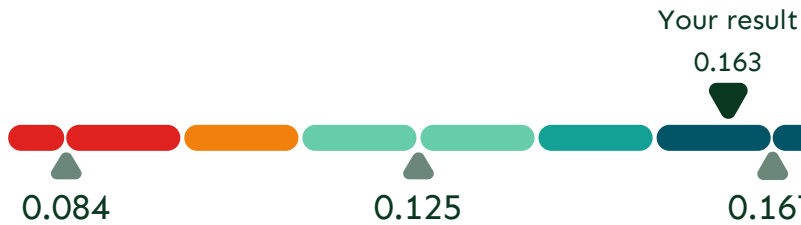
Glycan Shield

An unfavourable Shield result associates with advanced age, inflammatory bowel, increased chance of existing or future metabolic issues, irregular cell growth and over-activation of the immune system.



This result ranks you in the **98th percentile**

Having a **higher** percentile ranking is **better** for this index



This result ranks you in the **98th percentile**

Having a **higher** percentile ranking is **better** for this index

* Your result is compared to people within your age group, biological sex, and ethnicity.

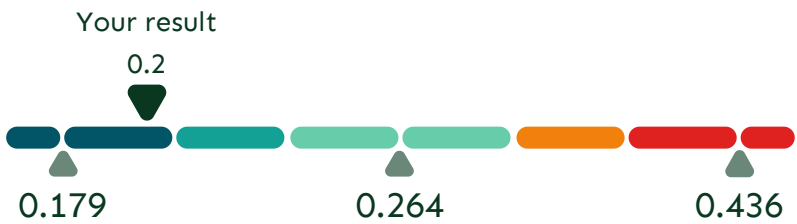
RESULT BREAKDOWN:

Pro-inflammatory index

This index promotes chronic inflammation, so it is **better to have less** of it. Its main feature is **missing galactoses**. The process of losing galactoses occurs naturally as we age, but also by having an unhealthy lifestyle.

Glycan Mature

An unfavourable Mature result associates with menopause and perimenopause in women, periodontal inflammation, inflammatory bowel, unhealthy excess weight, advanced age, as well as an increased chance of existing or future metabolic issues, irregular cell growth and over-activation of the immune system.



This result ranks you in the **7th percentile**

Having a **lower** percentile ranking **is better** for this index

* Your result is compared to people within your age group, biological sex, and ethnicity.

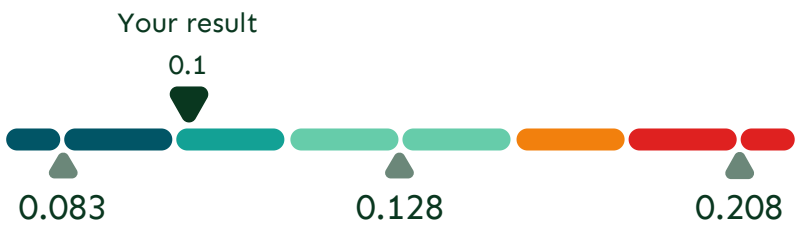
RESULT BREAKDOWN:

Supportive indexes

These indexes aren't strictly pro- or anti-inflammatory. Instead, they are a special group of **complementary indexes** that provide an **additional layer of information**.

Glycan Lifestyle

An unfavourable Lifestyle result associates with chronic pulmonary obstruction, smoking and history of tobacco consumption, unhealthy excess weight, inflammation, advanced age, as well as an increased chance of existing or future metabolic issues, irregular cell growth and over-activation of the immune system.



This result ranks you in the **5th percentile**

Having a **lower** percentile ranking **is better** for this index

Glycan Median

An unfavourable Median result associates with chronic pulmonary obstruction, poor socioeconomic status, increased chance of existing or future metabolic issues, irregular cell growth and over-activation of the immune system.



This result ranks you in the **6th percentile**

Having a **higher** percentile ranking **is better** for this index

* Your result is compared to people within your age group, biological sex, and ethnicity.

What's next?

CONTINUE READING

Learn what affects our glycan composition

We'll review these major areas of interest:

- Genetics
- Natural ageing
- Lifestyle

These are not personally tailored to you.

Exploring this chapter might give you some ideas of what to discuss with your specialist.



TAKE ACTION

Get in touch with your DripDok specialist

It is confidential and gives you the opportunity to discuss your health, lifestyle and any medical conditions in conjunction with your results to help you decide what you'd like to do next.



What affects our glycan composition?

Natural ageing

When we're young, our glycan composition is rich in glycans with sialic acid. As we get older, the glycans tend to lose "arms". More precisely — they lose sialic acids and galactoses. This causes them to transition from preventing chronic inflammation to promoting it.

Important note

Before you continue...

Content you're about to see is for informational purposes only. It is derived from scientific research.

It is NOT personally tailored to you.

Genetics

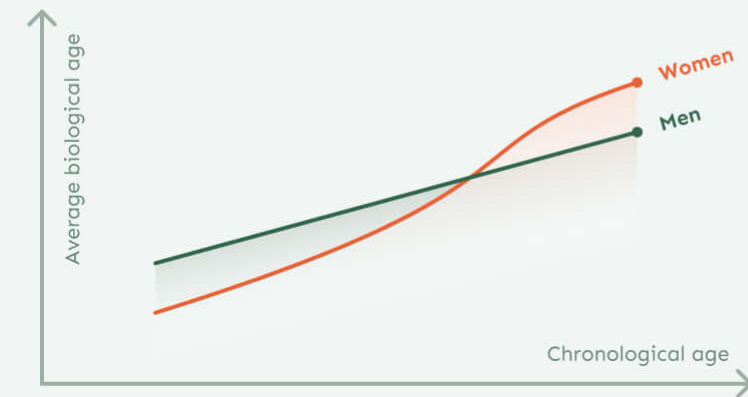
Our glycan composition is partly inherited. We've conducted research on cohorts across the world which demonstrate that different ethnic groups age differently.

Lifestyle

Our lifestyle choices play a major role in shaping us. Nutrition, exercise, stress and medical interventions, all affect our glycan composition. This is great news as it gives us a way to influence our glycans.

Men and women age differently

Men and women exhibit slightly different biological ageing curves. Women tend to have a greater amount of glycans that prevent chronic inflammation BEFORE perimenopause and menopause. During and after — there is usually a strong shift towards pro-inflammatory glycans. Men on the other hand have a much more linear change in glycan profile.



Menopause & Perimenopause

Menopause is when a woman stops having periods and is no longer able to get pregnant naturally. Perimenopause is the period leading up to menopause.

During this life-stage there are drastic changes in women's glycan composition. Pro-inflammatory glycans increase, and anti-inflammatory are reduced.

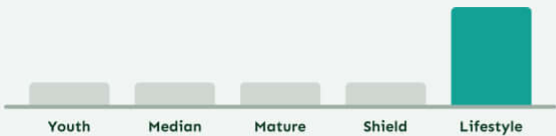
Andropause

Andropause describes the steady changes (decline) in male's hormone levels, which usually relates to other age-related issues. This steady change is why men have a more linear ageing curve.

Nutrition

Changing nutrition can yield long-term benefits, but optimising it often requires a personalised approach. In our studies, the only plan that had a consistently beneficial effect was a low-calorie diet that removed overly processed foods.

Removing overly processed foods rich in hidden sugars and empty calories improves Glycan Lifestyle index, but doesn't have a significant effect on other indexes.

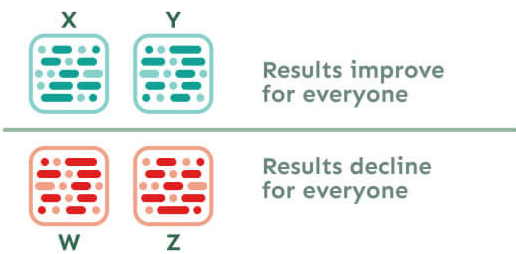


There is no “magic diet”

We’ve conducted a research to determine whether there’s a diet that is beneficial to **everyone**.

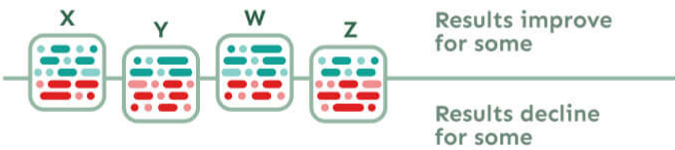
What we expected:

- Clear improvement with diet X and Y
- Clear decline with diet W and Z



What we actually learned:

- No clear indication of benefits for different diets
- **Diet needs to be tailored for your unique metabolism.**



Managing obesity

There are various types of fat our bodies tend to accumulate over the years. Not all fat is considered "bad". However, accumulation of a large amount of excess abdominal fat causes metabolic stress and inflammation.



In context of managing obesity, **low calorie diet** yields positive improvements across all indexes.

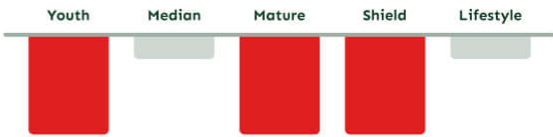


Extensive weight loss has been proven to positively affect almost all indexes.

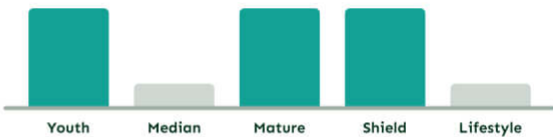
Exercise

Exercise has many positive effects on health, but over-exercise will have a negative effect.

High intensity training when combined with caloric restriction depletes the natural capacity of our immune system. It has a negative impact on most indexes.



However, high intensity training can be beneficial for your glycan profile when combined with a good recovery period and proper nutrition.





Thank you for choosing GlycanAge

Glycans are complex carbohydrate molecules and one of the four primary components of the cell (alongside DNA, proteins, and lipids).

Glycans perform numerous tasks and play a major role in all essential functions of the human body, including our immune system. They participate in virtually all our body's processes; therefore, it is not surprising that molecular defects in glycan synthesis are recognised as a direct cause of an increasing number of diseases.

The study of glycans is still in its infancy. However, it is already providing useful and unique insights into how our bodies age at a molecular level.

GlycanAge provides you access to the most advanced information available. Created by the world's leading authority on glycoscience, Professor Gordan Lauc and fulfilled at his laboratory, Genos — world leaders in the extraction and analysis of glycans.

Our combined research team has studied ageing for over 25 years, publishing our findings in more than 200 scientific papers.

GlycanAge is proven to respond to lifestyle changes, in both scientific trials and personal tests spanning over 150k individuals.

List of references

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“Glycans are directly involved in the pathophysiology of every major disease...

Additional knowledge from glycoscience will be needed to realize the goals of personalized medicine and to take advantage of the substantial investments in human genome and proteome research and its impact on human health.”

— US National Academies, 2012