

Current study results

How does exercise influence ageing?

Exercise is considered the key to healthy ageing. But how much does physical activity actually influence life expectancy and biological age? A recent long-term study from Finland provides some surprising findings.

In the twin study published in the European Journal of Epidemiology in January 2025, 22,750 people were followed over three decades. The results show: Moderate physical activity was associated with the lowest mortality rate - it reduced the risk by around 7% compared to inactive individuals. However, more exercise did not bring any additional benefit.¹

WHO recommendations: No guarantee for a longer life

The researchers also examined the effects of the WHO exercise recommendations. These are 150 to 300 minutes of moderate or 75 to 150 minutes of intensive activity per week. However, adherence to these guidelines did not lead to a significantly lower mortality rate or a lower genetic risk of disease. Even in twin pairs where one was significantly more active than the other, there was no clear survival benefit.

Too little or too much exercise makes us age faster

The biological age in a subgroup was also determined using epigenetic "clocks". The result: there is a U-shaped relationship between physical activity and biological ageing. Both very inactive and very active people were biologically older than moderately active people. The very active people were on average 1.2 years older biologically than the moderately active.

Exercise alone is not enough - lifestyle is crucial

The researchers point out that exercise alone is not the cause of a longer life expectancy. Other factors such as diet, smoking, alcohol consumption or previous illnesses could influence the results. For example, an existing illness could lead to a lack of exercise and later to death - and not vice versa.

Conclusion: healthy ageing requires more than sport

The results of the study clearly show that regular, moderate exercise has a positive effect on health and longevity - extreme sport or following general recommendations, on the other hand, are not automatically better. The interplay of several healthy lifestyle factors appears to be decisive in having a positive influence on ageing.

Biofactors and exercise:

What relevance do vitamins and minerals have for mobility and performance?

What health effects of exercise, sport and biofactors can be used in patient care? What role does the musculature play as an endocrine organ? What can biofactors do in the prevention and treatment of lifestyle diseases such as metabolic syndrome, type 2 diabetes or cardiovascular diseases?

You can find detailed information here:

www.gf-biofaktoren.de/symposium-2022/

Literature:

¹ Kankaanpää A et al. The associations of long-term physical activity in adulthood with later biological ageing and all-cause mortality – a prospective twin study. Eur J Epidemiol 2025; 40: 107-122