

Commentary

Investors' Perspective on Healthspan in 2025

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Healthspan—the period of life spent in good health—is more economically, ethically, and socially valuable than merely extending lifespan.

Traditional healthcare systems focus on diagnosing and treating diseases rather than preventing them, leading to prolonged periods of illness before death. With the global population aging rapidly, maintaining health and productivity into old age is essential for economic sustainability.

Chronic diseases, particularly obesity and diabetes, impose significant financial burdens, yet current healthcare models lack effective business incentives for prevention.

Studies suggest that extending healthspan could have significant economic benefits, with some projections suggesting that every additional year of healthy life could contribute trillions to the global economy.

Geroscience and aging biology present new opportunities, including senolytics and cellular reprogramming, to slow aging-related decline. Reliable biomarkers and digital health innovations will be critical in developing scalable healthspan interventions.

Despite challenges in healthcare investment, the longevity market is expected to reach \$44 billion by 2025. A long-term approach that enhances resilience, reduces healthcare dependency, and drives systemic change may be necessary to support sustainable aging. A shift toward proactive health management can improve quality of life, reduce societal healthcare costs, and create sustainable economic growth. The future of healthcare lies not in treating sickness but in ensuring lifelong health and vitality.

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Why It Matters?

Instead of managing illness, we can invest in technologies and strategies that extend the healthy, productive years of life—reducing healthcare costs and improving quality of life globally.

Short-/Mid-term Key Investment Areas for the Transformation towards Healthspan:

- 1. Personalized & Preventative Medicine – AI-driven health monitoring, early diagnostics, and predictive analytics.*
- 2. Biological Age Reversal Technologies – Senolytics, epigenetic reprogramming, and regenerative medicine.*
- 3. Optimized Nutrition & Lifestyle Interventions – Longevity-focused diets, exercise, and stress management.*
- 4. Advanced Therapies – Stem cells, gene editing, and innovative pharmaceuticals.*
- 5. Health Data & Wearables – Continuous health tracking for early intervention.*

1. Introduction

The traditional focus of healthcare has been on longevity—extending life expectancy—rather than healthspan, which emphasizes maintaining an active, healthy life. However, from an economic, ethical, and societal perspective, increasing healthspan is far more valuable than merely extending lifespan. A slowdown in aging that increases life expectancy by 1 year is globally worth US\$38 trillion, and by 10 years, US\$367 trillion^{[1][2]}.

A longer life without the ability to remain independent and active presents significant challenges, however, both for individuals and society. This paper explores the critical differences between longevity and healthspan, the challenges associated with an aging population, and the investment opportunities within the healthspan sector.^{[3][4][5]}

2. Longevity vs. Healthspan: A Fundamental Shift

While longevity has been the primary goal of medical advancements, simply living longer is of little value if those additional years are marked by disease, disability, and dependency.

This shift in perspective also changes the way healthcare is approached. Traditionally, the healthcare system treats individuals as patients, involving numerous stakeholders such as hospitals, doctors, insurance companies, and medical technology providers. However, when focusing on healthspan, individuals should be viewed as consumers, actively managing their health with the support of their families and, potentially, a personal health concierge—a role that still needs further development.

Healthspan, in contrast, focuses on maintaining individual activity and functionality throughout life. The ability to remain independent, contribute to society, and engage in meaningful activities is far more important than merely adding years to life (see table 1).

Over the past fifty years, life expectancy has increased significantly, but healthspan has not kept pace. In many cases, this means that people are spending a greater portion of their lives dealing with chronic diseases and functional decline. In other words, while people live longer, they also experience extended periods of poor health before death^{[6][7]}.

And in the past decade, the distinction between healthspan and lifespan has transitioned from a niche scientific debate to mainstream discourse, largely due to the convergence of several societal triggers.

First, the rise of digital health and personalized medicine has given individuals unprecedented access to health data, fostering greater awareness of functional aging versus chronological aging.

Second, the economic implications of an aging population, particularly in developed nations, have driven policy discussions around sustainability, workforce productivity, and pension system viability.

Additionally, cultural shifts—spurred by prominent thought leaders, bestselling books, and longevity-focused media—have altered public perception of aging, from an inevitable decline to a modifiable process.

The COVID-19 pandemic also played a role, as it exposed the vulnerabilities of older populations and underscored the importance of resilience and proactive health measures. As a result, investors, policymakers, and healthcare stakeholders are increasingly aligning around healthspan as the critical metric for future healthcare strategies.

For healthspan to become the default paradigm, these structural and cultural barriers must be addressed through policy reform, public awareness campaigns, and investment in preventative infrastructure.

Current Healthcare Model (Sick Care)	Future-Oriented Model (Healthspan Improvement)
Focuses on disease treatment	Focuses on disease prevention & longevity
Reacts to illness once symptoms appear	Proactively extends healthy years of life
Prioritizes pharmaceutical interventions	Prioritizes lifestyle, early diagnostics, and regenerative medicine
High costs for late-stage disease care	Lower costs through prevention & personalized medicine
Treats age-related diseases as inevitable	Views aging as a modifiable process
Healthcare costs rise with aging populations	Economic benefits from a healthier, longer-living workforce
Patients rely on reactive doctor visits	Individuals track and optimize health in real-time with AI and wearables
Medical research focuses on cures	Medical research focuses on biological resilience & aging mechanisms

Table 1. *The difference in delivery and focus between the current healthcare provision model and the future-oriented focus on HEALTHSPAN*

3. The Economic Necessity of Extending Healthspan

The world is experiencing an unprecedented demographic shift. Today, there are approximately one billion people over the age of 65. By 2050, this number is expected to double.

At the same time, global population growth is slowing, leading to a shrinking workforce and increasing economic pressures related to healthcare and elderly care. If current healthcare and social systems remain unchanged, the burden of sickness and long-term care will become unsustainable.

Historically, healthcare has been viewed as a matter for health ministries and medical institutions. However, as aging populations place increasing pressure on public finances, the responsibility for addressing these challenges will shift to finance ministers, social security agencies, and retirement policymakers.

Despite mounting evidence supporting a proactive healthspan approach, the inertia of traditional healthcare systems is deeply entrenched in a reactive, sick-care model. This is not solely due to economic structures but also to subtle yet pervasive influences from industry and societal mindset. The pharmaceutical and medical device industries, which generate billions in revenue from chronic disease management, naturally prioritize treatments over prevention. This has led to a healthcare system that rewards intervention rather than health preservation.

Moreover, the cultural perception of health as something that is "repaired" rather than "maintained" contributes to delayed engagement in preventative strategies. The reactive mindset is reinforced by insurance reimbursement models, regulatory approvals, and even medical education, which emphasize disease treatment over longevity science.

The ultimate goal should be to extend healthspan so that people remain active and independent until at least the age of 90 or 95, reducing the period of disability and dependency at the end of life^{[3][8]}. Whatever follows with respect to increased longevity may still be decades out, but this also needs to follow the same base concept of not increasing merely the time that someone is alive.

4. Building Resilience for Healthy Aging

One of the primary drivers of increasing healthcare costs is the rapid rise in chronic diseases. Conditions such as obesity, diabetes, cardiovascular disease, and neurodegenerative disorders are placing enormous financial and social burdens on individuals and healthcare systems.

The root causes of these diseases are often not addressed, with healthcare systems primarily focusing on treating symptoms rather than preventing illness. Current models lack the necessary business incentives to prioritize prevention and predictive healthcare.

Some regions, such as the Gulf Cooperation Council (GCC) countries, have recognized the urgency of addressing these issues before they become unmanageable. These nations understand that while their populations are currently relatively young, elderly care will become one of the most significant burdens in the future.

Preventing individuals from becoming care-dependent requires a proactive approach that strengthens resilience across multiple aspects of health—mental, physical, and emotional. As people age, their ability to respond to health challenges diminishes. Factors such as cellular senescence, reduced mental stimulation, and social isolation contribute to declining resilience. By prioritizing interventions that enhance resilience, individuals can maintain their ability to fight disease and recover from health setbacks more effectively.

Healthy aging enables people to continue engaging in meaningful activities such as traveling, working, socializing, and caring for their families. In many cases, older individuals continue to contribute to the economy in both formal and informal capacities. The notion that someone becomes "old" at 60 or 65 is

outdated. If individuals remain healthy and active, their contributions to society and the economy can far outweigh their costs^{[9][10][11]}.

5. The Science Behind Healthspan: Geroscience/Aging Biology

Aging is the single greatest risk factor for disease and mortality. As a result, the field of geroscience—focused on understanding the biology of aging—has become a key area of research. Scientists are exploring interventions such as senolytics, which target and remove senescent cells, and cellular reprogramming, which has the potential to reverse or slow aging-related decline.

Although prevention strategies intuitively make sense, their long-term socioeconomic benefits have not been adequately quantified.

Demonstrating the financial and health outcomes of preventative measures will be crucial for encouraging widespread adoption; however, it is also essential for the support of the investment community.

One of the primary challenges is that aging itself is not classified as a disease, which makes it difficult to establish standardized health metrics.

The development of accurate and meaningful biomarkers is therefore essential for measuring healthspan improvements and validating new interventions.

6. The Role of Biomarkers in Business and Investment

The biomarkers should be minimally invasive, cost-effective, and capable of tracking individual healthspan progress. Digital health technologies, such as wearables and remote monitoring devices, offer promising solutions for integrating biomarker data into everyday health management and to complement the more invasive and expensive ones based on epigenetic, microbial, metabolomics, and other measures.

Trust and evidence-based validation will be the key factors in driving adoption and investment in these innovations^[12].

7. Global Leadership in Healthspan Innovation

The recent GHS2025 conference, which featured 180 speakers and attracted 3,000 attendees (with thousands more joining via livestream), highlighted the rapid growth of healthspan-related innovations and ongoing global research activities in this field.

It was evident that leading healthspan and longevity efforts are emerging from regions such as Dubai, Saudi Arabia, Abu Dhabi, and Singapore.

These countries have recognized the shortcomings of traditional healthcare models and are actively investing in new strategies to promote long-term health.

In contrast, many developed nations have struggled to address aging-related challenges effectively, lacking the ability to implement meaningful reforms^{[13][14]}.

8. Investment Considerations for Healthspan

Challenges in Healthcare Investment

Investing in healthcare is notoriously complex due to regulatory barriers, systemic inefficiencies, and financial constraints. Among the most promising investment opportunities are likely to be those that reduce friction in the healthcare system—whether through improved processes, commercial innovations, or workforce adaptations.

Defining Healthspan Innovation

True innovation occurs when an invention positively impacts large populations. A practical approach to healthspan innovation involves avoiding harmful behaviors, supplementing essential biological components such as microbial diversity and genetic resilience, and introducing novel interventions that were previously unavailable.

Developing personalized aging clocks that track organ-specific and overall healthspan progress will be crucial in both individual health management and to manage and define broader public health strategies.

Economic Rationale for Investing in Healthspan: A Perspective and the Role of Venture Capital

The longevity market (currently at \$25 Billion) —without detailed numbers on the newly defined healthspan segment— is projected to reach \$44 billion by 2030, offering significant investment potential^[15].

Studies suggest that extending healthspan by just one year in 10% of the aging population could reduce U.S. entitlement program costs by \$29 billion annually while adding \$80 billion to the economy. So the role of the government in financing the research needs to be discussed.

Financial professionals increasingly recognize that healthspan investments can generate greater returns than traditional healthcare models.

Despite these clear economic incentives, many Western countries have failed to prioritize healthspan investment.

This failure stems from structural inertia in healthcare financing and policy-making. In most developed economies, healthcare spending is treatment-driven rather than prevention-focused, largely due to misaligned incentives in insurance systems, government policies, and corporate healthcare structures. Public healthcare models often reimburse illness management, rather than incentivizing proactive, preventative health strategies. Consequently, financial resources continue to favor chronic disease care, rather than fostering early interventions and longevity-focused treatments.

Economic Theory and the Coasean Explanation

Economic theory provides an explanation for this phenomenon. Ronald Coase's seminal work on transaction costs explains how institutions, such as markets and firms, emerge to increase efficiency by reducing the costs of conducting transactions^[16].

Firms, including healthcare institutions, exist because they can perform certain transactions more efficiently internally rather than relying on the open market.

Applying Coase's theory to healthspan investment, existing healthcare institutions in Western countries are structured to minimize transaction costs within a treatment-based model:

Moreover, Coase's analysis of social costs suggests that when transaction costs are high, resource allocation is often inefficient, as stakeholders struggle to negotiate effectively.

In the case of healthspan investment, entrenched interests—including healthcare providers, insurers, and policymakers—create institutional resistance to reallocating resources toward preventative health measures. This results in a continued focus on treatment, even when prevention would be more economically viable in the long run^[17].

The Role of Venture Capital in Overcoming Institutional Inertia

While Coase's theories explain institutional inertia, they do not address how new, more efficient institutions emerge—a gap that venture capital (VC) fills. Unlike governments or traditional corporations, VCs (*should, but often do not!*) operate on a high-risk, high-reward model, enabling the creation of disruptive healthcare innovations. By offering excess returns to investors willing to absorb risk, venture capital funds high-risk breakthroughs in healthspan technologies, such as AI-driven diagnostics, regenerative medicine, and longevity-focused biotechnology.

While Western governments have been slow to adapt, emerging leaders such as Singapore, the UAE, and Saudi Arabia have already begun actively investing in healthspan technologies. If Western economies do not transition their healthcare funding models toward prevention and longevity, they may lag behind nations that embrace venture-driven innovation in healthspan.

A Shift Towards Healthspan Investment

Ultimately, market and corporate structures ensure efficiency, but they fail to explain how new, superior institutions emerge. Venture capital may play a role in shifting healthcare strategies from reactive disease management to proactive healthspan extension, alongside policy and institutional reforms. This transformation is not just an economic necessity—it is a societal imperative for sustainable growth, reduced healthcare burdens, and long-term productivity.

Healthspan investments require a long-term perspective, often spanning 10 to 20 years. While many assume that preventive interventions are cost-saving, they are often cost-increasing—yet still cost-effective compared to conventional medical treatments.

9. Conclusion

The future of healthcare lies not in treating diseases after they arise but in proactively ensuring lifelong health.

It is clear, of course, that the sick care approach continues to be very important and that we still need to invest in improving diagnosis, therapy options, and outcomes, as well as improving/democratizing access to technologies and clinical interventions.

It may be necessary to establish government initiatives that stimulate investments financially separated from the current business model of health and ideally also run/overseen/managed by an entity that is not financed by the health ministries.

Future healthcare strategies should prioritize healthspan-related innovations over merely treating preventable health issues after they arise^{[18][19][20]}.

By prioritizing prevention and resilience, we can create a healthier, more productive society while also generating potential economic benefits and reducing long-term healthcare costs.

Notes

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Statements and Declarations

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