



Expert Views

Life Insurance: Making a difference in the fight against cancer

SCOR
The Art & Science of Risk

March 2023



Introduction

Most of us have been touched by cancer in some way. Whether personally or through friends and family, we've experienced the anxiety of a cancer diagnosis, journeyed through treatment, or lived in the aftermath.

The history of cancer is certainly a mixture of success and unfinished business. Improved outcomes and decreasing death rates are offset by the harsh reality that millions of people are still dying every year. But the tide is turning, and medical developments are continuing to advance toward eliminating cancer in our lifetime. All sectors – public, private, and academic – have a role to play through technology, research, and application.

In this article we'll explore movements and innovations that are creating new momentum in the fight against cancer and the role that life insurance can play going forward in cancer prevention, early detection and treatment.

Prevention

Most of the time we think of cancer as something that happens to us. But in reality, cancer is often preventable. In fact, The World Health Organization says that up to 50% of cancers are preventable (who.int).

In the US we've seen a steady decline in cancer death rates over the past 25 years driven primarily by a significant decline in smoking. But these gains are in jeopardy as *obesity could soon become the number one risk factor for cancer*, and increasing obesity in young people may be a predecessor to a new onslaught of cancer in the future.

As shown in this graphic, overall lifestyle and attention to wellness play a key part in prevention. Common sense measures like not smoking, being active, and avoiding too much sun are generally well-known. Prevention works best when social, economic, environmental, public health, medical systems, and business are all working in concert. This alignment in support of lifestyle refinements and incentives is a critical component of a cancer wellness roadmap.

"We will always need good treatments, but we can't treat our way out of this problem. In order to make a dent in a public health sense, we must prevent cancer."

– Timothy Rebbeck, the Vincent L. Gregory, Jr. Professor of Cancer Prevention at the Harvard T.H. Chan School of Public Health.

Ways to reduce your cancer risk



Do not smoke or use any form of tobacco



Avoid too much sun, use **sun protection**

Make your home smoke-free



Reduce indoor and outdoor air pollution



Enjoy a **healthy diet**



Be **physically active**



Breastfeeding reduces the mother's cancer risk



Limit alcohol intake



Vaccinate your children against Hepatitis B and HPV



Take part in organized **cancer screening programmes**



Early Detection

During the past few years, we've also seen the introduction of multi cancer early detection (MCED) tests. These tests are a type of liquid biopsy that detect multiple components of a growing cancer, including circulating tumor cells and tumor DNA, in blood or other body fluids. There are many tests in development intended to screen healthy people for multiple types of cancer. MCEDs might possibly be a game changer in the race to cure cancer by increasing survivability through earlier cancer detection. The vision is that sometime in the not-too-distant future we'll have these tests included in our annual physicals. But it's clear that even as the technology improves, there is *much that we still need to learn about the potential for this life saving technology to bend the mortality curve.*

There are also amazing developments in the study of aging which is currently the number one risk factor for cancer. One novel approach is looking at erosion of the epigenetic landscape (a key driver of aging) as a way to someday reprogram the epigenome and turn back the clock on aging – thus reducing a key risk factor for cancer.

Treatment

We are seeing new cancer treatment technologies being developed and introduced at a rapid pace. Many of these new developments are focused on targeted and personalized treatments *based on multi-omics factors.* One area of significant development includes advances in immunotherapy which helps your own immune system fight and eliminate cancers. According to The Cancer Research Institute, there are approximately 5,000 clinical trials in progress worldwide focused on immunotherapy. *Effective treatment also includes personalized assistance in helping patients navigate the increasingly complex options around second opinions, side effects, Centers of Excellence, and emerging technologies.*

Critically, government and the private sector are also cooperating in these efforts. The Cancer

"The life insurance industry is starting to gain momentum in the fight against cancer and continued advancement will be built on partnering with policyholders, industry peers, and cancer experts"

– Michael Colannino, Executive Vice President – SCOR Global Life

Moonshot, reignited in 2022, is a 'call to action' with the very ambitious goal of cutting the cancer death rate by half in 25 years by bringing together a community of patients, advocates, researchers, and clinicians. One early result is the creation of the Drug Resistance and Sensitivity Network (DRSN), a framework for collaborative research to tackle the complexities of treatment resistance.

With close to 170 million Americans covered by life insurance, the industry is in a great position to help move cancer prevention, treatment, and early detection forward. We are seeing strong momentum as multiple life insurance companies are in the process of introducing MCED programs to their policyholders. The reinsurance industry is fully supportive of these programs and have collaborated in an unprecedented way to help bring these programs to life. Grail is the current leader in the life insurance/MCED space with several programs in development.

In addition to great progress in the fight against cancer, SCOR and the life insurance industry are also moving to engage their policyholders in other critical areas of health and wellness (e.g., diabetes, wellbeing, falls prevention and genetics). The keys to these advancements are shifting consumer expectations which necessitate building engagement pathways to policyholders and offering interventions that work in the life insurance space. As we further develop our thinking in these areas, we'll also begin quantifying the impact that these emerging technologies can have on future mortality improvement assumptions.



Breakthrough Technologies

Liquid Biopsies were first FDA approved in 2013 and used for monitoring the level of circulating tumor cells as a new tool to help track cancer disease progression. More recent advances identify circulating tumor fragments through different forms of cell free DNA (cfDNA) floating in the blood.

As developments continue usage will expand further to include monitoring cancer growth, detecting genetic mutations, identifying signs of relapse, and predicting sensitivity to immunotherapy. For more information visit [MCED Consortium](#)

CAR T Cell Immunotherapy collects T cells from the patient and re-engineers them to produce receptors that are designed to target and kill cancer cells. Today multiple CAR T-cell therapies are FDA approved for the treatment of blood cancers, including lymphomas, some forms of leukemia, and, most recently, multiple myeloma. Initially used as a last resort when other treatments failed, CAR T Cell has produced amazing remissions rates in children and adults suffering from acute lymphoblastic leukemia. For more information visit [CAR T-Cell Therapy Infographic - NCI \(cancer.gov\)](#)

The Study of Aging is important because aging is the largest risk factors for critical diseases and ultimate mortality. Early studies are showing the loss of epigenetic information as a key cause of aging - and that restoring the integrity of the epigenome can reverse the signs of aging. This work is one step in transforming our thinking about biological aging and could ultimately impact treatment of many diseases and chronic conditions.

Progress toward controlling biological age is a potential game changer that will (in the near-term) lead to improved insights for living a healthier and higher quality life.

[Loss of epigenetic information as a cause of mammalian aging: Cell](#)

“NMG Consulting’s 2022 Individual Mortality Study shows strong interest in health and wellness propositions, with interest appearing to be pivoting from engagement led propositions (‘step and reward’) to clinical interventions that can more robustly assess and influence mortality and morbidity outcomes.”

– NMG Individual Mortality Reinsurance Study 2022



Roadmap to the Future

So how do we make a difference and impact more lives? Here are key steps we can take to extend our efforts in the fight against cancer both in life insurance and across society in general.

- **Build a Comprehensive H&W Strategy**

There is a perfect alignment between life insurance and policyholder wellness – everybody wins when policyholders are living longer. Begin extending the trust you've built around financial wellness to health and wellbeing. Evolve measurement from customer satisfaction in the short term to improved persistency and mortality over time.
- **Create a Sustainable Approach to Cancer**

The emergence of MCED pilots in the life insurance industry has created significant momentum around cancer detection and health and wellness in general. Explore how to design a sustainable cancer strategy that includes prevention, early detection, and treatment.
- **Partner with Cancer Experts**

Develop partnerships with leading cancer experts to provide education and encouragement to policyholders. Partnerships with leading cancer Centers of Excellence can provide co-branding opportunities and lend credibility to your initiatives.
- **Stay Connected to New Developments**

Evaluate new and existing technologies and plot out a reasonable commercialization pathway. Leverage solutions that are the best fit (from a life cycle perspective) for life insurance. But don't overlook the value of encouraging screenings and annual physicals as a good starting point.
- **Engage with Regulators**

Look for opportunities to bring regulators into the discussion and utilize the regulators' innovation initiatives to test new approaches before fully committing to filing products.
- **Consider a Broader Impact**

In order to make a significant impact the entire life insurance industry will need to work together. This includes rethinking collaboration vs. competition across the industry and looking for opportunities to build a coalition around cancer.



An Industry Call to Action

The time has never been better for the life insurance industry to make a broader impact on the problems facing our policyholders. And the solutions will be found both within our industry and through strategic partnerships that tap into new capabilities. The responsibility is on us as an industry to continue the momentum by *joining the movements* that are driving change, *looking for ways to partner* within the industry on sustainable solutions, and *helping to shape the future* through academic alliances and consortiums.

Stay tuned for more content from the SCOR Health and Wellness team that will focus on developing and implementing a sustainable cancer strategy.

Resources:

1. <https://www.whitehouse.gov/cancermoonshot/>
2. <https://www.annuity.org/life-insurance/statistics>
3. <https://www.annuity.org/life-insurance/statistics>

For more information, contact the authors:



Michael Colannino
Executive Vice President,
SCOR Global Life
MCOLANNINO@scor.com



Joe Sharp
Vice President, Head of
Health and Wellness
JSHARP@scor.com

SCOR
The Art & Science of Risk

March 2023