



## Association of American Cancer Institutes COMMENTARY

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### Commentary Overview

\* Philadelphia leads the nation in the “zip code gap”—the difference in longevity between neighborhoods. The Sidney Kimmel Cancer Center (SKCC) at Jefferson is committed to reducing this gap.

\* SKCC is a founding member of the Precision Medicine Exchange Consortium, which, with eight partner cancer centers and Foundation Medicine, is enhancing access to genomic testing.

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### Zip Code vs. Genetic Code: Breaking Down Cancer Disparities in Philadelphia

By Karen E. Knudsen, PhD

In Philadelphia, the nation’s sixth largest city, history weighs on every street, from the cobblestones around the Liberty Bell and Independence Hall to the sidewalk outside the emergency rooms of Thomas Jefferson University Hospital, in Center City.

Today, Philadelphia tops the nation in what’s known as the “zip code gap”. For example, there is a difference of 20 years in longevity between the zip codes of the neighborhoods of Society Hill and Strawberry Mansion. Philadelphia is America's poorest major city, has one of the highest obesity rates amongst large cities, and has the greatest disparity in mortality, especially from cancer, for vulnerable populations. For me and my colleagues that translates into an unfortunate daily story--older, poorer, Philadelphians presenting for emergency care with advanced cancer, often without prior diagnosis.

The Sidney Kimmel Cancer Center at Jefferson (SKCC) is the city’s focal point for the war against disparities in cancer outcomes. More than half of our patients rely on Medicare or Medicaid. One in four patients within our catchment area live in high poverty neighborhoods with limited or no walkable access to healthy food. Some 16 percent of the city’s patients cannot complete scheduled healthcare visits due to lack of transportation. Smoking and obesity rates outpace the nation, and infection with HIV - now a confirmed cancer-causing agent - is highest amongst the 10 largest US cities, with rates five times the national average.

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\* A new support and information cancer center at SKCC allows Philadelphians to drop in to receive information on care, caregiving, screening, and risk.

### About AACI Commentary

As part of AACI's efforts to feature the work and views of its member centers, AACI publishes *AACI Commentary*, a quarterly editorial series. Written by cancer center leaders, each edition focuses on a major issue of common interest to AACI cancer centers.



## Reducing the Longevity Gap

One of SKCC's core strategic commitments is to reduce the gap in longevity within five years, and to pursue three critical strategic avenues to reduce disparities.

First, we now know that small differences in genetics can make large differences in cancer treatment outcomes. Every step we take towards understanding these differences translates into targeted therapy and reduces disparities in mortality. SKCC is a founding member of the Precision Medicine Exchange Consortium, which together with eight partner cancer centers and Foundation Medicine is enhancing access to genomic testing and is dedicated to meaningfully improving outcomes for patients with advanced cancer.

We expanded our genetic testing with a first-in-class men's genetic risk initiative, which serves to identify those Philadelphians most at risk for developing aggressive disease and to inform development of appropriate screening plans. We are forging the field of genetic evaluation for prostate cancer risk through cutting edge genetic studies, and we held the first international consensus conference on the topic. We prioritized identifying the genetic basis of disparity for haploidentical bone marrow transplants, and translated these findings into novel therapeutic strategies.

Second, we are deeply committed to drawing community physicians and their patients into seeking early screening, early diagnosis, and advanced protocols for treatment. In addition to standard practices of mobile screening units, outreach to local organizations, and community physician education, SKCC now brings care directly to neighborhoods with unacceptable cancer incidence and mortality rates. With our parent university and health system we expanded into twelve hospitals across two states, bringing expert care to some of the most cancer-challenged counties in the nation.

A new SKCC ambulatory cancer center will open in June 2018, providing a northern "hub" for advanced cancer care and clinical trials, thus reducing the transportation barrier for patients in this area of the city. Additional access to screening and clinical trials is made possible through engagement of 25 SKCC affiliates, supported in large part by partnering with private oncology groups. Notably, minorities account for 26 percent of accruals to SKCC clinical trials.

## Increasing Access to Screening, Information

Finally, increasing access to cancer screening and care is essential to mitigating cancer disparities. In the heart of our urban campus we opened a new support and information cancer center where Philadelphians drop in to receive information on care, caregiving, screening, and risk. Community volunteers assist with staffing, and

provide vital links to survivorship and wellness programs within the city. We responded to the needs of hourly workers unable to complete cancer care by opening our infusion center on nights and weekends. We increased uptake for cancer screening by offering mammograms on the weekend.

Our population research leaders successfully identified research priorities centered on cancer disparities within our region, and a mechanism we call TIPS (Transdisciplinary Integration of Population Science), now shapes our hiring, research design, and care delivery. TIPS orchestrates paradigm-shifting research aimed to transform the experiences of patients and family members. Through these priorities we adopted technology-based patient engagement strategies, including Cancer Care 360 for virtual care at home. We prioritized reducing cancer disparities by developing effective strategies to enhance colorectal cancer screening, resulting in increased uptake in the region.

As Philadelphia grows and brings with it new cancer challenges, the SKCC goal is simple - to break down the zip code barrier and reduce the number of vulnerable people who present in our emergency room with late-stage cancers. That's the vision for tomorrow's Philadelphia history - a new revolution in ending disparities in cancer mortality.

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*Representing 97 of North America's premier academic and free-standing cancer centers, the Association of American Cancer Institutes is dedicated to reducing the burden of cancer by enhancing the impact of leading cancer centers.*

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