

Study suggests lung cancer mortality highest in black persons living in most segregated counties

January 16 2013

Lung cancer mortality appears to be higher in black persons and highest in blacks living in the most segregated counties in the United States, regardless of socioeconomic status, according to a report published in the January issue of *JAMA Surgery*, a JAMA Network publication.

Lung cancer is the leading cause of [cancer death](#) in the United States and blacks are disproportionately affected with the highest incidence and mortality rates.

Awori J. Hayanga, M.D., M.P.H., of the University of Washington, Seattle, and colleagues examined the relationship between race and lung [cancer mortality](#) and the association with [residential segregation](#) by using data obtained from the 2009 Area Resource File and Surveillance, [Epidemiology](#) and End Results program to conduct a population-based study.

"The overall [lung cancer](#) mortality rate between 2003 and 2007 was higher for blacks than for whites (58.9 percent vs. 52.4 percent per 100,000 population)," according to the study results.

The authors identified segregation as highest in the Northeast, Midwest and South and lowest in the Northwest. A total 28 percent of the U.S. population lives in counties with low segregation, 40 percent in counties with moderate segregation, and 32 percent in counties with high

segregation, according to the study findings.

"Blacks living in counties with the highest levels of segregation had a 10 percent higher mortality rate than those residing in counties with the lowest level of segregation. This increase was not observed among the white population, and, in contradistinction, the mortality rate was 3 percent lower among whites living in the most segregated counties when compared with those living in the least segregated counties," the authors comment.

The authors do note that because they performed a cross-sectional analysis, they were unable to make causal inferences at the individual level.

"The equalization of lung [cancer mortality rates](#) between the black and white races might require that counties, or census tracts, of high [segregation](#), with their attendant physical deprivation, social ills, and limited access, receive more attention to address the existing disparities," the authors conclude. "Public health initiatives, such as smoking cessation and early cancer screening programs, should be prioritized in these counties. Access to screening and expedient referral to specialist care should be optimized to ensure that the benefits of early cancer screening are realized."

In an invited critique, David C. Chang, Ph.D., M.P.H., M.B.A., of the University of California, San Diego, writes: "The focus of the study by Hayanga et al not only is novel but also has important practical implications. Looking at the successes of desegregation efforts since the Civil Rights Movement in the 1960s, one may argue that desegregation efforts are more feasible, both politically and practically, than changing someone's [socioeconomic status](#)."

"The influence of these social policies on patient outcomes also

highlights the importance of physician collaboration with nonphysician professionals, such as legislators and policymakers," Chang concludes.

More information: JAMA Surg. Published online January 16, 2013.
2013;148(1):37-42.

JAMA Intern Med. Published online January 16, 2013.
2013;148(1):42-43.

Provided by JAMA and Archives Journals

Citation: Study suggests lung cancer mortality highest in black persons living in most segregated counties (2013, January 16) retrieved 25 April 2024 from
<https://medicalxpress.com/news/2013-01-lung-cancer-mortality-highest-black.html>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.