



Education: It Matters More to Health than Ever Before

Americans with fewer years of education have poorer health and shorter lives, and that has never been more true than today. In fact, since the 1990s, life expectancy has decreased for people without a high school education, especially white women.

Education is important not only for higher paying jobs and economic productivity, but also for saving lives and saving dollars.

Saving lives

Policies that set kids up for success—in education and in life generally—are smart strategies for reducing the prevalence of chronic diseases, such as diabetes and heart disease. More education leads to higher earnings that can provide access to healthy food, safer homes, and better health care. And policies in communities can help put children on track for better health and prosperity by strengthening schools, job opportunities, economic growth, safe and affordable housing, and transportation.

Saving dollars

Medical care is important, but actions outside of health care—education, jobs, and economic growth—may be the best way to stem spiraling health care costs (“bend the cost curve”). Disinvesting in education not only makes U.S. businesses less competitive in a global marketplace built on science and technology, but can also increase health care costs in the long run.

“Saving” money by cutting vital “non-health” programs can cost more in the end. We don’t help ourselves by creating a sicker population and workforce that require more expensive medical care.



Now, more than ever, people with less education face a serious health disadvantage.

Shorter lives: Americans with less education are—now, more than ever—dying earlier than their peers. Between 1990 and 2008, the life expectancy gap between the most and least educated Americans grew from 13 to 14 years among males and from 8 to 10 years among females. The gap has been widening since the 1960s.

Worse health: Americans with less education are—now, more than ever—more likely to have major diseases, such as heart disease and diabetes. By 2011, the prevalence of diabetes had reached 15 percent for adults without a high school education, compared with 7 percent for college graduates.

More risk factors: Those with less education are increasingly more likely to have risk factors that predict disease, such as smoking and obesity. By 2011, smoking was reported by 27 percent of people without a high school diploma or GED but by only 8 percent of those with a Bachelor's degree.

Greater disability: Americans with less education are more likely to have diminished physical abilities for health reasons or to be disabled.

Americans without a high school diploma are at greatest risk: While overall life expectancy has generally increased, it has decreased for whites with fewer than 12 years of education—especially white women. Among whites with less than 12 years of education, life expectancy at age 25 fell by more than 3 years for men and by more than 5 years for women between 1990 and 2008.

Education Is Linked to Lifelong Health and Wellbeing



What's the cause? Why does education matter more to health now?

In today's knowledge economy, education paves a path to good jobs: Completing more years of education confers health benefits after leaving school, such as better health insurance, access to medical care, and the resources to live a healthier lifestyle and to reside in healthier homes and neighborhoods.

Early childhood shifts the odds for success—in health and education: Children who grow up in struggling, stressful homes or neighborhoods pay a double price: the living conditions disturb their education, and stress and other life conditions can cause lasting biological harms and cause youth to take up unhealthy or risky behaviors, such as smoking or violence.

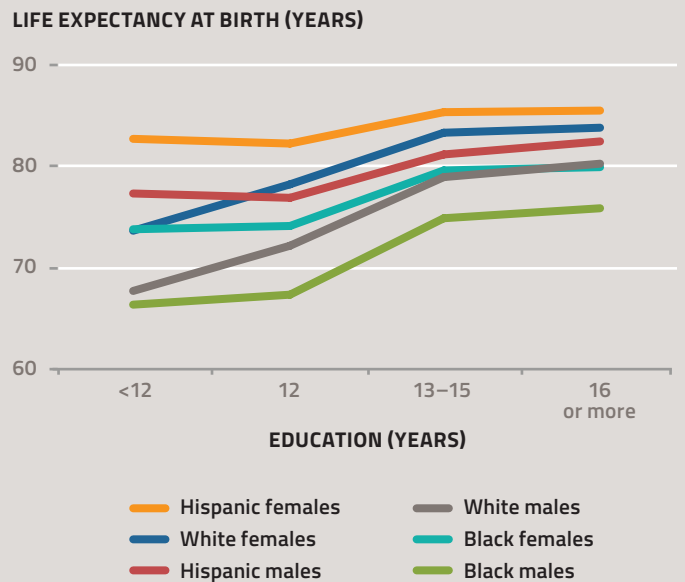
What About Race?

For generations in the United States, life expectancy has been higher among whites than blacks. But the differences in life expectancy by levels of education are now greater among whites than among people of color. For example, in 2008 the difference in life expectancy between those with the most and the least education was 10 years for white females, but 7 years and 3 years, respectively, for black and Hispanic females. It was 13 years for white males but 10 years and 6 years for black and Hispanic males.

Mortality differences across sexes and races have been falling at the same time that socioeconomic differences in mortality have been rising. Increasingly, education—and the social factors associated with education—are transcending the influence of race on health. Blacks with more education have longer lives than whites with less than a high school education. Racial disparities persist—highly educated blacks (at least 16 years of education) live 4 years less than comparably educated whites—but they can expect to live 8 years longer than whites with less than 12 years of education.

Even a few additional years of education can make a difference for health. Across racial and ethnic groups, life expectancy improves with increasing years of education. College graduates live longer than adults with only some college education, and in particular, those with even some years of college education and no Bachelor's degree live longer than those with no education beyond high school.

Life Expectancy at Birth, by Years of Education at Age 25, by Race and Sex, 2008



Adapted from S. Jay Olshansky, et al., Differences in Life Expectancy Due To Race And Educational Differences Are Widening, And Many May Not Catch Up, *Health Affairs*, 31, no.8 (2012):1803-1813.

Compared to those with a college education, Americans with less education:

Die earlier: At age 25, U.S. adults without a high school diploma can expect to die 9 years sooner than college graduates.

Live with greater illness: Adults with less education are more likely to report diabetes and heart disease and to have worse health.

Generate higher medical care costs: The growing percentage of Americans in poor health intensifies demands on the health care system and fuels the rising costs of health care.

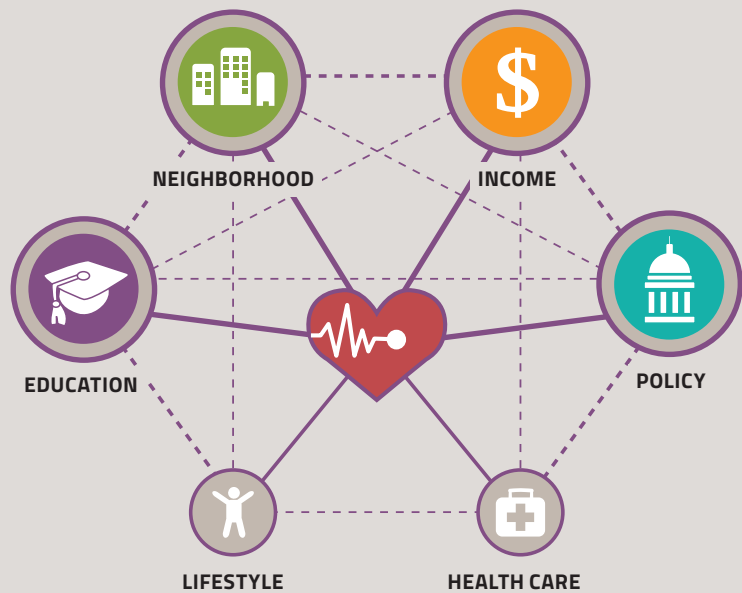
Are less productive at work: A good education is important to work productivity on many levels, not just in cognitive skills but also in performing basic everyday tasks.

Experience more psychological distress: Stress is higher among poorly educated Americans, and this can have harmful biological effects.

Have less healthy lifestyles: People with a high school education or less are more likely to have risk factors for disease—to smoke, to smoke while pregnant, to be physically inactive, to be obese, or to have children who are obese.

Connect the Dots

Education matters to health, and so do the conditions in neighborhoods and communities that harm the health of young children, trigger unhealthy or risky behaviors and undermine the success of students and schools. Policies that address early child care, housing, transportation, food security, unemployment, and economic development are important to both education and health.



Upcoming issue briefs from the Education and Health Initiative

What's causing this?

ISSUE BRIEF 2: **Unpacking the**

Causes: The full “back story” on the links between education and health are complex. The next issue brief in this series will expand upon the interconnections between education and health in the lives of children, teens, and adults. The brief will also provide a view from the inner city to hear the voices of those deeply affected by these challenges.

Will health care reform solve the problem?

ISSUE BRIEF 3: **Health Care: Necessary but Not Sufficient:**

Efforts to achieve improved access to health care and health insurance are vital, but they cannot erase the health gaps related to education. Evidence from integrated health systems where all members have access to care (such as the Veterans Health Administration) still show that college-educated patients have better outcomes than those with less education.

Does cutting education spending save money?

ISSUE BRIEF 4: **The Return on**

Investment: In an era of fiscal austerity and spiraling health care costs, elected officials are tempted to cut funding for education, social programs, and public health services to balance the budget—often to offset the high costs of Medicaid. Disinvestment in education leads to more illness and higher medical care costs that offset the intended “savings” of these same budget cuts. This issue brief will also examine the return on investment, showing how higher educational attainment might translate into lower costs for medical care.

The Education and Health Initiative

This issue brief is a product of the Education and Health Initiative (EHI), a program of the Virginia Commonwealth University Center on Society and Health, supported by the Robert Wood Johnson Foundation.

- Launched in September 2012, the aim of the EHI is to raise awareness about the important connections between education and health.
- We “connect the dots” between distinct education and health policy spaces.
- We meet with leaders in government and the private sector—at the national, state, and local level—to explore the ties between education and better health.
- We produce online media and issue briefs to explore specific themes and stimulate discussion.

The Center on Society and Health

The VCU Center on Society and Health is an academic research center that studies the health implications of social factors—such as education, income, neighborhood and community environmental conditions, and public policy. Its mission is to answer relevant questions that can “move the needle” to improve the health of Americans. We present our work in formats and venues that are useful to decision-makers and change agents. The Center pursues these goals through collaboration with scholars in different disciplines at VCU and other institutions, and by nurturing partnerships with community, government, and private-sector stakeholders.

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Sources

- Crimmins and Saito. Trends in healthy life expectancy in the United States, 1970-1990. *Soc Sci Med* 2001;52:1629-41.
- Goldman and Smith. The increasing value of education to health. *Soc Sci Med* 2011;72:1728-37.
- Jemal et al. Widening of socioeconomic inequalities in U.S. death rates, 1993-2001. *PLoS One* 2008;3:e2181.
- Meara et al. The gap gets bigger: changes in mortality and life expectancy, by education, 1981-2000. *Health Aff* 2008;27:350-60.
- Montez and Zajacova. Trends in mortality risk by education level and cause of death among US White women from 1986 to 2006. *Am J Public Health* 2013;103:473-9.
- National Center for Health Statistics. *Health, United States, 2011*. Hyattsville, MD. 2012.
- Olshansky et al. Differences in life expectancy due to race and educational differences are widening, and many may not catch up. *Health Aff* 2012;31:1803-13.
- Ross et al. Education and the gender gaps in health and mortality. *Demography* 2012;49:1157-83.
- Schiller et al. Summary health statistics for U.S. adults: National Health Interview Survey, 2011. National Center for Health Statistics. *Vital Health Stat* 10(256). 2012.