Unequal Health Across the Commonwealth

A Snapshot

Virginia Health Equity Report 2008

Executive Summary

Office of Minority Health
& Public Health Policy
Advancing Health Equity For All Virginians

VDH VIRGINIA DEPARTMENT OF HEALTH
Protecting You and Your Environment

The purpose of this report is to draw attention to health inequities that exist in Virginia and to monitor their trends as the Commonwealth strives to eliminate them.

Health inequities are "disparities in health [or health care] that are systematic and avoidable and considered unfair."[1] In Virginia, individuals are more likely to face high rates of disease, disability and death from a host of health conditions that span generations if they are poor, a member of a racial and ethnic minority, or live in rural areas or urban inner cities. These individuals and the communities in which they live experience social inequities tied to social and economic policies and practices that result in an unequal access to social determinants of health (SDOH) which strongly influence opportunities to be healthy.

This report summarizes the data, findings and conclusions presented in the full "Virginia Health Equity Report 2008. The Health Equity Report 2008 represents a snapshot of vital events data taken from birth and death certificates of Virginia's populations stratified by socioeconomic status (SES), racial/ethnicity and rural/non-rural geography.

"Health is tied to the distribution of resources"

Poverty and Health in Virginia

Income and poverty are strong predictors of health because they influence access to the resources and opportunities needed to be healthy. The physical and social environments in which people live, their ability to make and carry out healthy decisions, their exposure to other social and economic factors that influence health, the levels of stress and coping strategies they engage in have major impacts on health outcomes.

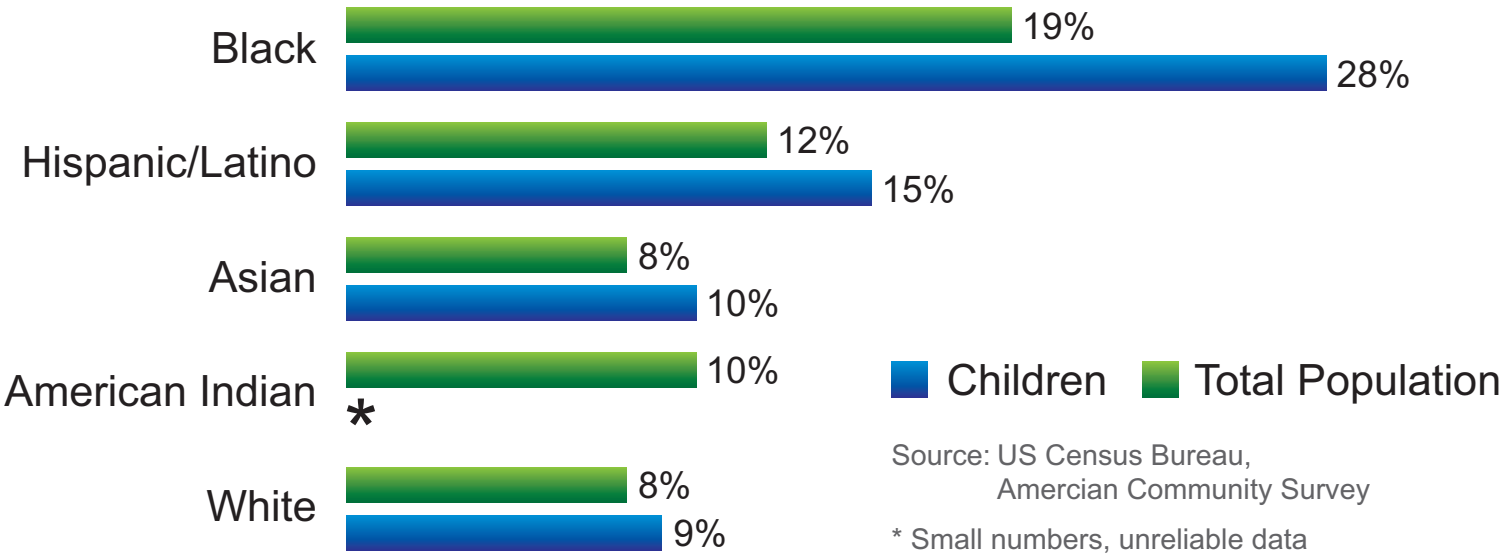
Social Determinants of Health

- Socioeconomic Status *(income, education, job status)*
- Discrimination
- Transportation
- Working Conditions
- Built and Physical Environment
- Social Support and Capital
- Health Care Services
- Healthy Child Development
- Democratic Participation
- Culture
- Housing
- Housing
- Food Security

Poverty Levels

10% of Virginia's total population and 13% of children (209,000 total children) lived below the Federal Poverty Level (FPL) in 2005.

Percentage of Children and Total Population in Poverty, Virginia 2005



- The total African American population was twice as likely and African American children were 3 times more likely to live in poverty than the White population.
- African American children accounted for 47% of all children living in poverty in Virginia.
- Latinos were 1.5 times more likely to live in poverty than their White counterparts.
- Latino children accounted for 7% of all children living in poverty in the state. They were 1.7 times more likely to live in poverty than their White counterparts.
- White children accounted for 44% of all children in poverty.
- Asian children accounted for 3% of all children in poverty.

High Poverty Census Tracts

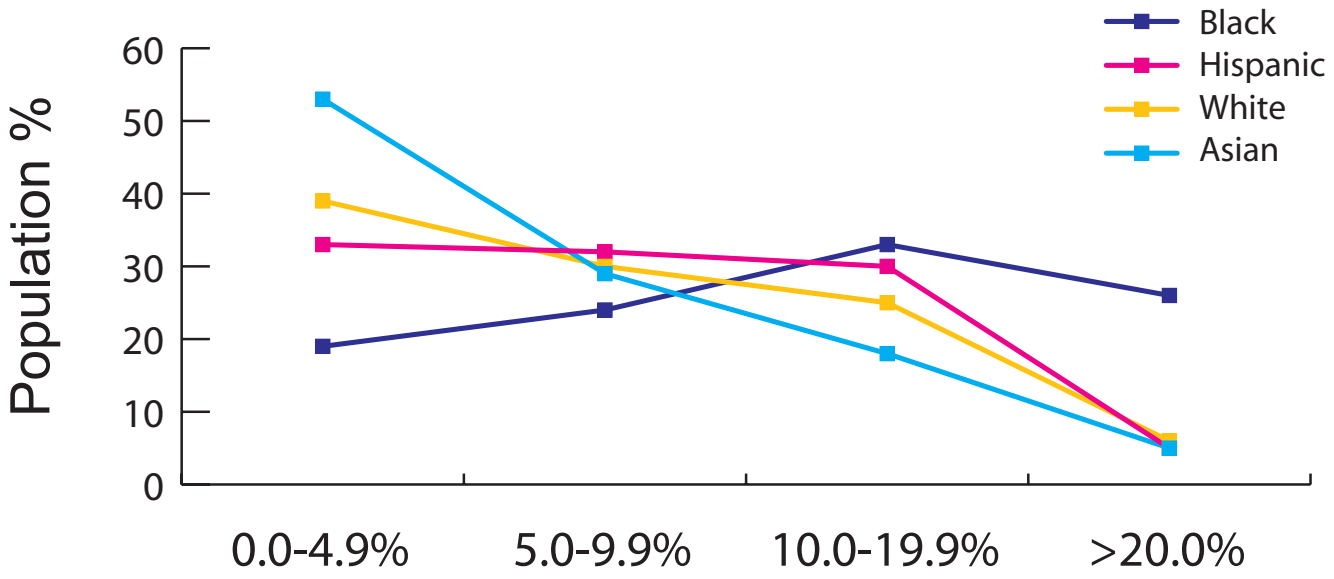
Census tracts are similar to neighborhoods. Neighborhoods with high levels of poverty are less likely to have health promoting opportunities. They often lack access to full service grocery stores, safe and/or affordable recreation facilities, health care providers and strong social networks to shield against chronic stress. These same neighborhoods are more likely to contain liquor stores and fast food restaurants, to experience high crime rates, and to pose other health threats.[6]

In Virginia, as the level of poverty in neighborhoods increases, the proportion of the Asians, Hispanics, and Whites living in those neighborhoods decreases. African Americans, on the other hand, are more likely to live in neighborhoods with higher concentrations of poverty. This inequality is evidence of the historic and present racial residential segregation experienced by African Americans.[3]

- 25% of African Americans live in high poverty census tracts compared to 6% or less of all other racial and ethnic groups.
- Rural populations were more likely to live in high poverty census tracts than urban populations: 14.6% vs. 8.7%. Rural populations were also more likely to live in census tracts with moderately high poverty: 60% vs. 20%.

9.8% of the total population in Virginia lives in high poverty census tracts in 2000

Distribution of Population by Race/Ethnicity and Census Tract Poverty Level, Virginia 2000

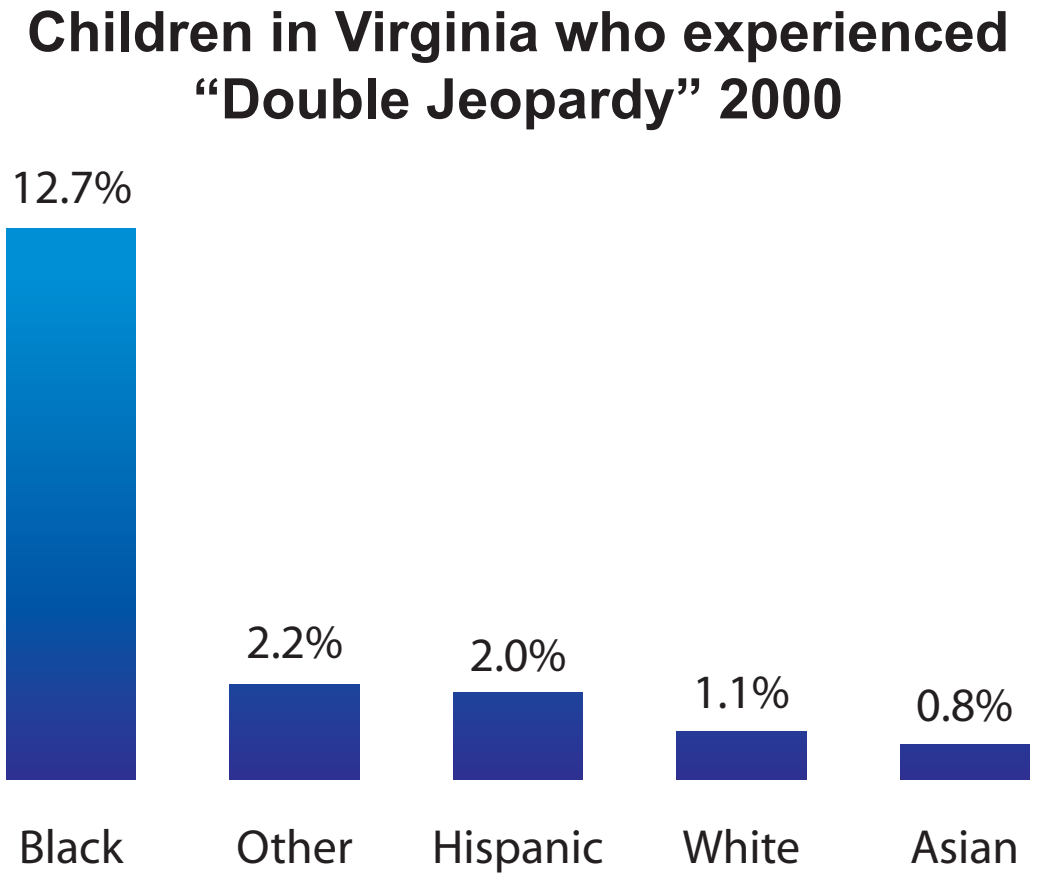


Individuals and families living in poverty often make decisions based on basic survival. Paying rent and utilities or having sufficient and affordable food to eat overrides engaging in healthy behaviors.

Double Jeopardy

Double Jeopardy is defined as living below the federal poverty level and living in a high poverty census tract. Social and economic conditions in which children are born and raised affect health throughout life. Prior to birth and as children grow into adults, they pass through many important developmental stages. These stages are influenced by social, economic, and environmental exposures, many of which may impact physical and mental health outcomes.

3.8% of Virginia's children lived in double jeopardy in 2000.



- African American children were roughly 12 times more likely to experience double jeopardy than White and Asian children.
- Hispanic and other race children were roughly twice as likely to experience double jeopardy as White and Asian children.

Life and Death in Virginia

Major Causes of Death

Heart disease, cancer, and stroke accounted for about 70% of deaths in 2006. Other leading causes of death include unintentional injuries, chronic lower respiratory disease (CLRD), diabetes, kidney disease, Alzheimer's disease, influenza and pneumonia, septicemia, suicide, homicide, and HIV/AIDS.

Educational Attainment Matters

With the exception of suicide, death rates are highest for Virginians with less than 12 years of education, followed by those with 12 years of education, and the lowest death rates are among those with more than 12 years of education. Although in 2006 the suicide rate did not exactly follow this pattern, the rate for the least educated was higher than the rate for the most educated.

- In 2006, Death rates for Virginians with the lowest level of educational attainment - less than 12 years of education - ranged from 1.7 times higher to 8.5 times higher than Virginians with the highest level of educational attainment - more than 12 years of education.
- For Virginians with 12 years of education, mortality rates ranged from 1.6 times higher to 4.7 times higher than Virginians with the highest level of educational attainment - more than 12 years of education.

The Legacy of Disadvantage

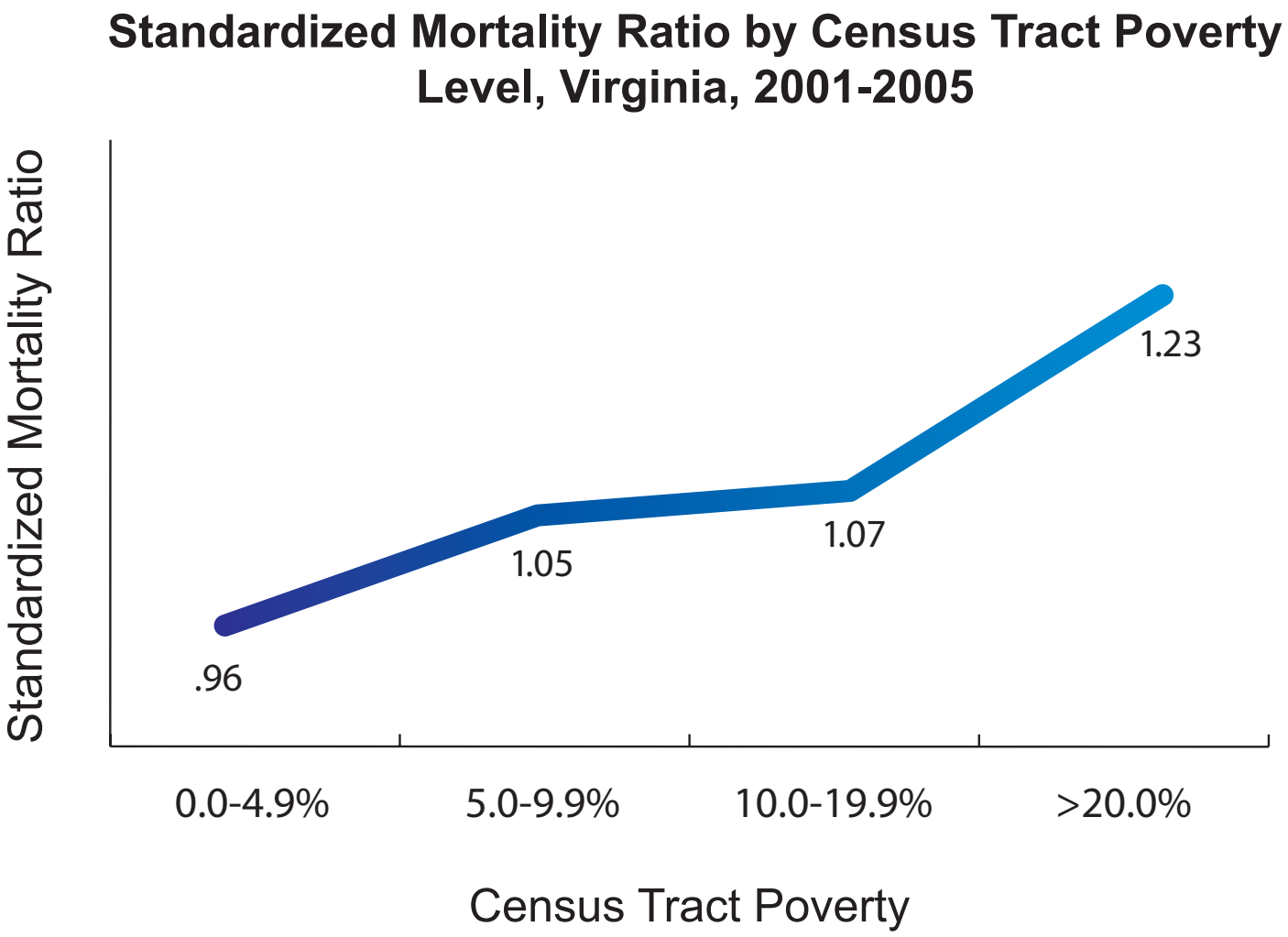
Research studies have found that women who were born into and/or grew up in poverty have an increased risk of giving birth to a low weight infant or experiencing an infant death. Being born low birth weight increases the risk of developing chronic diseases (e.g., hypertension, diabetes, and heart disease) as an adult. Therefore, poverty among women and children is an important risk for poor birth outcomes, the development of chronic diseases, and increased risk of disease across generations[4,5].

"Increasing job opportunities, providing education and training for better jobs, investing in our schools, improving housing, integrating neighborhoods, giving people more control over their work-these are as much health strategies as diet, smoking, and exercise."

– David Williams, PhD.,
Norman Professor of Public Health,
Department of Society, Human Development and Health
Harvard University School of Public Health

Mortality Ratio by Census Tract Poverty

The standardized mortality ratio (SMR) compares the actual death rate to the expected death rate for people living in increasing levels of neighborhood poverty. An SMR greater than 1.0 means the death rate is higher than expected; an SMR less than 1.0 means the death rate is lower than expected.



* Observed death data were obtained from VDH Vital Statistics, (2001-2005, geocoding error rate = 10%); Expected death data were calculated from Census 2000 data (SF1, P12) and 2005 age-specific death rates (CDC- National Center for Health Statistics).

As neighborhood poverty increases, standardized mortality increases. In the neighborhoods with the least amount of poverty, death rates were 4% **lower** than expected. In the higher census tract poverty neighborhoods, death rates were respectively 5%, 7% and 23% **higher** than expected.

It is not just Virginians who live in the highest poverty neighborhoods that face higher death rates than expected. This finding is consistent with data across the country and around the world.[6]

African Americans at Higher Risk

African Americans experience significantly higher rates of individual and neighborhood level poverty than Whites, which most likely plays a role in the increased risk of death among African Americans in the Commonwealth. Research also suggests that self-reported experiences of racism are tied to poorer health status[7].

Heart disease, cancer and stroke accounted for about 70% of all deaths in 2006. African Americans had higher mortality rates than Whites:

- Heart disease, 25% higher
- Cancer, 23% higher
- Cerebrovascular disease, 150% higher

For 10 other major causes of deaths, Whites had the highest rates for unintentional injury, chronic lower respiratory disease, Alzheimer's Disease, influenza & pneumonia, and suicide. African Americans had the highest rates for diabetes, nephritis & nephrosis, septicemia, homicide, and HIV/AIDS. However, for these 10 causes of death, the overall age-adjusted death rate for African Americans was 22% higher than for Whites.

Becoming an American May Be Bad For Your Health

Asian Americans and Hispanic/Latinos in Virginia had lower mortality rates for all causes of death in which there were enough deaths to calculate a rate. Although

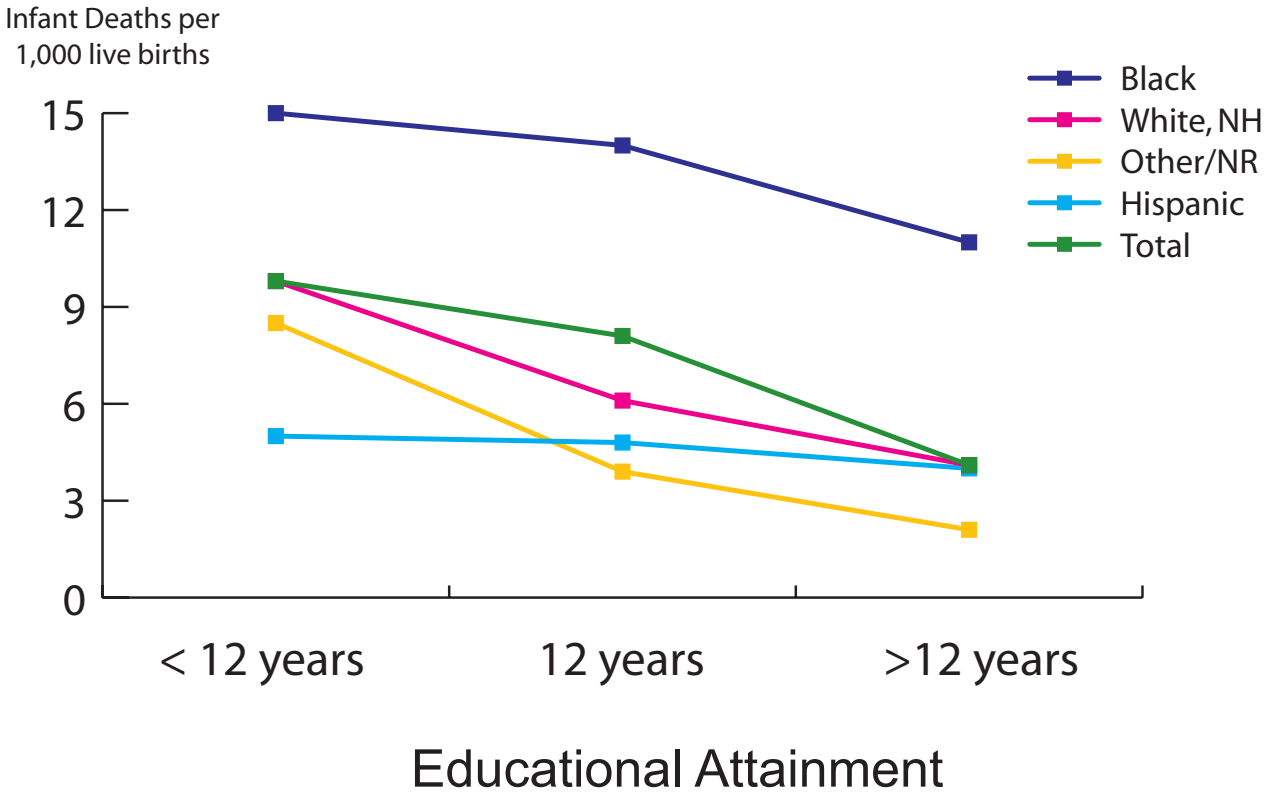
there are differences in health status among subgroups of these populations, the overall comparisons support evidence that immigrant groups, on average, have better health status than native born Americans. Unfortunately, this health advantage decreases the longer immigrants remain the United States.

The health of immigrants who have been in the U.S. more than 5 years and children of immigrants becomes more similar to the health of native born Americans. Research relates this worsening in health to taking on American behaviors and social norms, the loss of strong social networks and the hopefulness that brought immigrants here in the first place, experiences of racism, and the ongoing effect of poverty, especially among Hispanic/Latinos.[2, 8]

Infant Mortality

Infant mortality shows the same patterns as other causes of death in Virginia. Women with less than 12 years of education are 2.1 times more likely to experience an infant death than women with greater than 12 years of education.

Infant Mortality by Education and Race/Ethnicity, Virginia 2004-2006



Source: Virginia Division of Helath Statistics

- At all educational levels, Black women were more likely, 1.7 to 2.3 times, to experience an infant death.
- Hispanic women and women of other races experienced the lowest infant mortality rates across all educational groups.

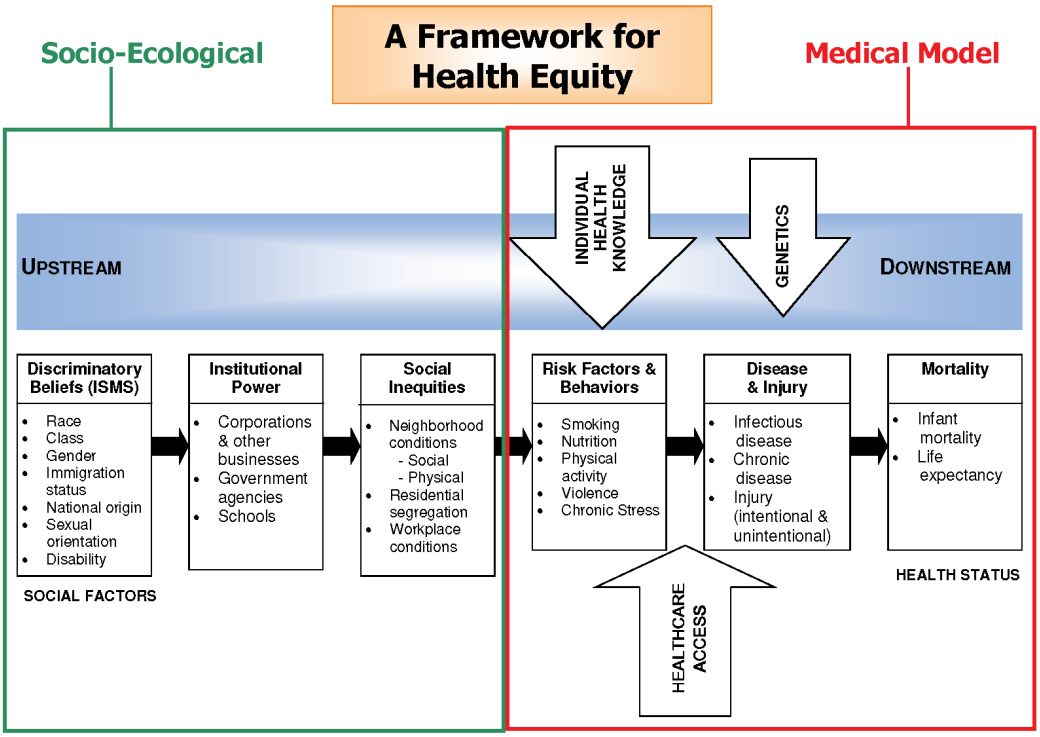
Again, the effect of socioeconomic disadvantage and racial marginalization on negative health outcomes is evident. It is also apparent that there are significant protective effects of socioeconomic advantage and immigrant status.

In addition to individual educational attainment, census tract poverty also affects birth outcomes in the Commonwealth.

- Women of all races and ethnicities are at increasing risk of infant death as the poverty rate in their community increases.
- Women living in census tracts with the highest poverty level were 2.8 times more likely to experience an infant death than women in census tracts with the lowest levels of poverty.

Conclusions and Recommendations

Health inequities that exist among different socioeconomic, racial/ethnic, and geographic communities in Virginia deserve the attention of all citizens. In order to eliminate health inequities multiple strategies are necessary. The conceptual framework developed and utilized by the Alameda County Health Department and the Bay Area Health Inequities Initiative (BARHII) in the San Francisco, California area identifies important focus areas for intervention.[9] This framework combines the traditional focus of the medical model on behavior change and access to care with the socioecological model that focuses on social relationships, organizations, neighborhoods, policies and social inequities that influence health inequities.



- Adapted by ACPHD from the Bay Area Regional Health Inequities Initiative, Summer 2008

Some important intervention recommendations that relate to this framework include:

- Increase awareness among policy makers, the general public and key stakeholders of the extent of health inequities, their multiple causes, and the need for comprehensive strategies to eliminate them.
- Regularly monitor health inequities and progress towards eliminating them in the Commonwealth.
- Support health care efforts that focus on assuring equitable access to high quality and culturally and linguistically appropriate services.
- Develop strategies to promote healthy behaviors that target the many levels of factors that influence those behaviors.
- Implement community-based participatory approaches that engage and empower disadvantaged neighborhoods and build social capital to address the conditions that create barriers to good health.

Additionally, the framework highlights the critical need for a new focus and emphasis among all of us on addressing the inter-related social and economic factors that strongly impact health outcomes, such as income, education quality, neighborhood environ-

ment, discrimination, affordable and quality housing, transportation, and working conditions.

Addressing many of these upstream factors means changing public policies that influence health (e.g. educational policy, economic policy, housing policy). Developing public policy that promotes health equity requires an analysis of the interactive effects of policies across multiple sectors and the unintended effects of well meaning policies. It is also helpful to identify how policies interact with local culture, history, social networks, and other dynamics to determine why certain disadvantaged communities may be more negatively affected by limited resources and opportunities than others. This information provides additional clues to promoting health equity.

Specific public policy recommendations can be divided into two categories[6]: those that target the causes of differences in socioeconomic status (SES) (e.g. improved quality of education, economic development, reducing child poverty) and those that alleviate the negative consequences of living in lower SES environments (e.g. creating safe places to be physically active and increasing access to healthy foods through zoning, partnerships, tax incentives, etc.; reducing workplace hazards; expanding health promoting policies in schools and local organizations; increasing availability of quality and affordable housing).

Eliminating health inequities transcends traditional public health and health care programs. Achieving this vision will require concerted efforts by individuals, families, communities, civic organizations, faith communities, employers, health care providers, public health practitioners, policy makers, and others. This vision requires reorientation of our individual and collective thinking, policies, programs, and resource allocations towards the goal of assuring that all Virginians have the same opportunities to be healthy.

To obtain the full Virginia Health Equity Report, 2008, please visit our website at:
www.vdh.virginia.gov/healthequity or if you have questions contact: Virginia Department of Health, Office of Minority Health and Public Health Policy, 109 Governor Street, Suite 1016-E, Richmond, Virginia 23219. Phone: 804-864-7435.

Health is more than health care.
Health is tied to the distribution of resources.
Racism imposes an added burden.
The choices we make are shaped by the choices we have.
High demand + low control = chronic stress.
Chronic stress can be deadly.
Inequality - economic and political - is bad for our health
Social policy is health policy.
Health inequities are not natural.
We all pay the price for poor health

-Unnatural Causes/California Reel[10]

---

[1] Troutman A. Establishing a center for health equity and social justice in a local health department. In Tackling health inequities through public health practice: a handbook for action, 2006. pp. 185-192; . edited by Richard Hofrichter. National Association of County and City Health Officials.

[2] Koya K, Egede L. (2007). Association between length of residence and cardiovascular disease risk factor among an ethnically diverse group of United States immigrants. Journal of General Internal Medicine. 22(6):841-846.

[3] Acevedo-Garcia D, Osypuk T, McArdle N, and Williams D. (2008). Toward a policy-relevant analysis of geographic and racial/ethnic disparities in child health. Health Affairs; 27(2): 321-333.

[4] Wadsworth M, Kuh D. (1997). Childhood influences on adult health: a review of recent work from the British 1946 national birth cohort study, the MRC National Survey of Health and Development. Paediatric and perinatal epidemiology;11:2-20.

[5] Lu M, Halfon N. (2003). Racial and ethnic disparities in birth outcomes: a life-course perspective. Maternal and child health journal; (1): 13-30.

[6] MacArthur Foundation Research Network on Socioeconomic Status and Health (2007). Reaching for a healthier life: facts on socioeconomic status and health in the U.S.

[7] Williams D, Neighbors H, Jackson J. (2003). Racial/ethnic discrimination and health: findings from community studies. American Journal of Public Health; 93(2): 200-208.

[8] Franzini L, Ribble J, Keddie A. Understanding the Hispanic Paradox. In Race, Ethnicity, and Health, 2002. pp. 280-310. edited by Thomas LaVeist. Jossey-Bass Publishing.

[9] Iton A. (2008) The ethics of the medical model in addressing the root causes of health disparities in local public health practice. Journal of public health management and practice; 14(4): 335-339.

[10] www.unnaturalcauses.org

Office of Minority Health & Public Health Policy

Advancing Health Equity For All Virginians

Office of Minority Health and Public Health Policy

Michael O. Royster, MD, MPH
Office Director

Main Line: (804) 864-7435

Toll Free: (800) 694-7349

Street Address:
109 Governor Street, Suite 1016 East
James Madison Building
Richmond, VA 23219

Mailing Address:
PO Box 2448
Richmond, VA 23219

www.vdh.virginia.gov/healthpolicy

VDH VIRGINIA DEPARTMENT OF HEALTH
Protecting You and Your Environment