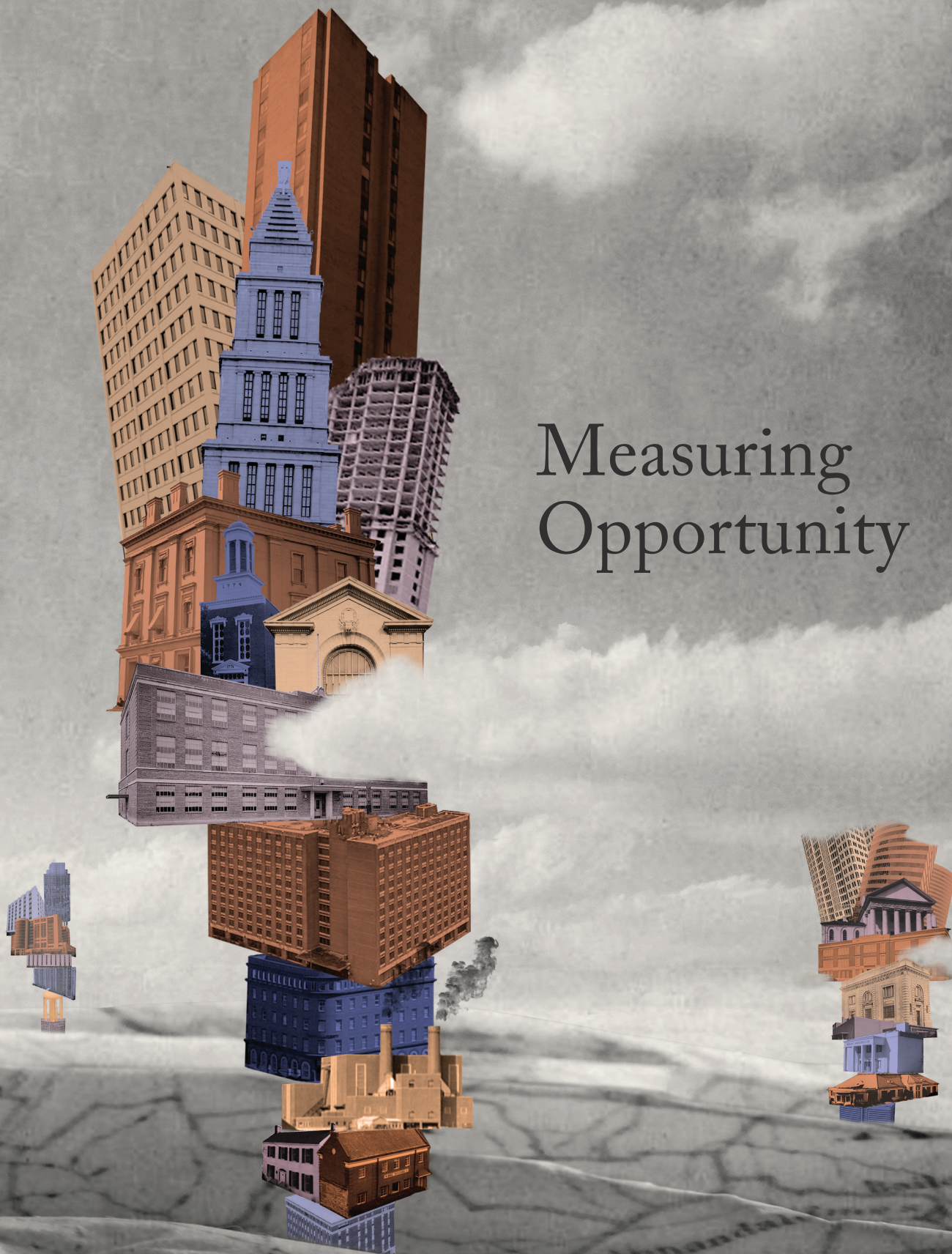


Health and Wellbeing in Northern Virginia:  
The Healthy Places Index

A Study by the Center on Society and Health  
Virginia Commonwealth University

# Measuring Opportunity



## ACKNOWLEDGMENTS

The Virginia Commonwealth University (VCU) Center on Society and Health produced this report for the Northern Virginia Health Foundation.

Virginia Commonwealth University 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.



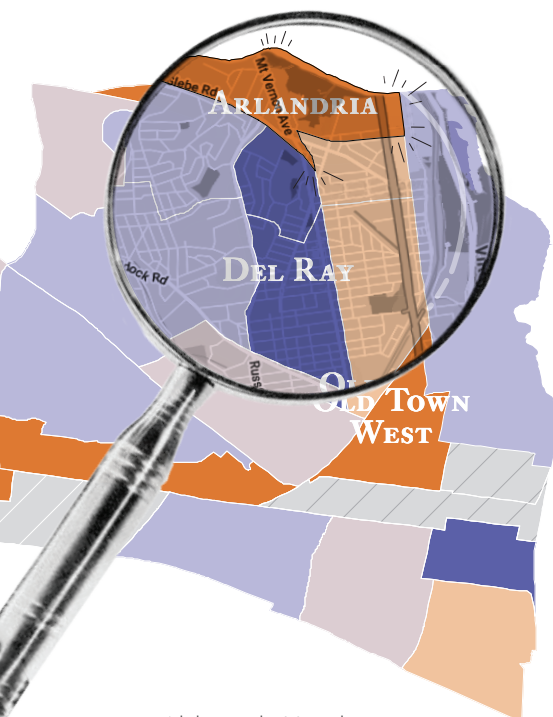
**On the Cover:** Photomontage representing the gaps in opportunity that exist across Northern Virginia. The towers depict the concentration of resources in neighborhoods, providing residents more opportunities for better health and social mobility. Many areas of the region lack these resources, making it more difficult for families to prosper and maintain good health.



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## INTRODUCTION



Although Northern Virginia is generally a very healthy place, individual neighborhoods see starkly different health outcomes.

Northern Virginia regularly ranks among the healthiest and most affluent places in the nation. Most residents of the region enjoy access to an array of resources that support health, such as good schools, a strong economy, ample spaces and opportunities for exercise, and grocery stores with a wide selection of fresh produce.

These impressive statistics for the region and its counties hide the many pockets of disadvantage that exist amid the affluence. For example, there is wide variation in health outcomes between individual neighborhoods in Northern Virginia. In fact, life expectancy—how long a baby born in a given neighborhood is expected to live—varies by as much as 19 years.

The reasons for these differences are numerous and complex. Health care is important but exerts limited influence on our health. What matters more are our living conditions—the social and economic characteristics and resources that shape our opportunity to be healthy. This includes the chance to attend quality schools, find and secure jobs that pay a living wage, buy healthy foods, have space to exercise, and breathe clean air. These conditions are lacking in concentrated areas of Northern Virginia—what we call “islands of disadvantage”—but the struggles in these neighborhoods are often lost amid the glowing statistics for the region.

The historic disinvestment that created these neighborhood conditions is likely to persist without greater awareness of the scale of the problem. Policymakers, philanthropists, and investors have a shared interest in identifying these areas of need, but they lack data-driven tools to identify the communities or prioritize finite resources to maximize their impact.

### THE HEALTHY PLACES INDEX

In an effort to provide change-agents with data to help identify areas of need and assess which areas of investment to prioritize, the Center on Society and Health at Virginia Commonwealth University developed the Healthy Places Index (HPI), a single, overall measure of neighborhood characteristics that shape health and wellbeing (see page 4). The HPI was calculated at the census tract level and reflects a neighborhood’s performance in terms of education, economic and other household resources, housing, transportation, air quality, and healthcare. Based on these six domains and other factors, the HPI provides a single summary score, ranging from 0 to 100, for each census tract in Northern Virginia. The index was calculated to predict life expectancy: lower scores mean the area has fewer resources for residents to achieve good health and live longer lives.

The HPI allows users to see not only which geographic areas are experiencing poor health outcomes, but also what domains (e.g., education, housing) might be important to prioritize for interventions. The results pointed largely to social and economic factors as the main drivers of life expectancy. Over 75% of the variation in life expectancy in Northern Virginia was accounted for by variables representing education, housing, economic characteristics, and other household resources. Local leaders can use this tool to target resources to priority neighborhoods and address the factors that most contribute to the health and wellbeing of their residents.

# THE HEALTHY PLACES INDEX

## *A Closer Look*

Weighted Most

- Preschool enrollment
- High school diploma/higher
- Some college/higher
- Lack of English proficiency

- Food access
- Income inequality
- Marital status
- Median household income
- Poverty rates
- Public assistance
- Single-parent households
- Unemployment rate
- +3 More

- Old housing
- Overcrowding
- Housing vacancies
- Renter occupied
- Home value/rent
- Housing cost
- Poor housing conditions
- Housing stability
- Housing opportunity index
- +8 More

- Commuting method
- Travel time to work
- Transportation cost
- No access to vehicle
- +2 More

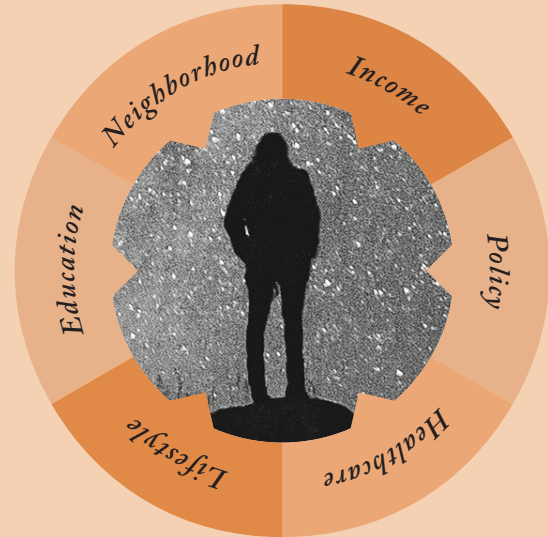
- Cancer risk
- Environmental hazards
- Respiratory risk

- Provider access
- Insurance coverage
- Uninsured rates
- +4 More

Weighted Least

### The Social Determinants of Health

Health is about more than health care. It is shaped by an array of social and environmental factors, from the amount and quality of education we receive to our income, housing, and the physical and social conditions of our neighborhoods. By itself, health care accounts for only 10 to 20% of the variation in health outcomes.



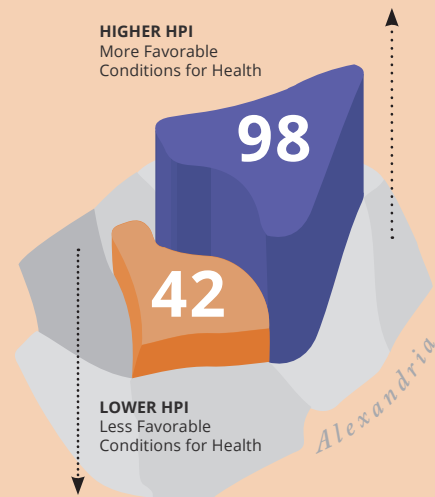
EDUCATION	34%
ECONOMIC/OTHER HOUSEHOLD RESOURCES	26%
HOUSING	16%
TRANSPORTATION	10%
AIR QUALITY	9%
HEALTHCARE ACCESS	6%

### Quantifying and Analyzing Determinants: A New Index

The web of factors that shape health is complex, posing a challenge for policymakers and service providers attempting to make smart investments that maximize impact with limited resources. The Healthy Places Index (HPI) is a single measure that can size up the health of a neighborhood. It takes dozens of neighborhood variables into account and estimates how much these factors explain variations in health across the region.

### Interpreting Scores: Predicting Life Expectancy and Identifying Places in Need

HPI scores range from 0 to 100—higher scores reflect areas with more resources for health and longer life expectancies. Calculated at the census tract (approximate neighborhood) level, these scores enable local leaders to identify and target priority neighborhoods with well-informed, data-driven policies and programs.



## STARK DIFFERENCES BETWEEN NEIGHBORS

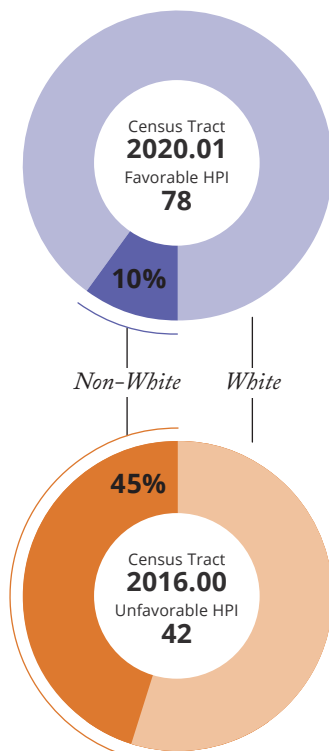
A closer examination of the HPI data for Northern Virginia draws attention to neighborhoods where a combination of factors limit the opportunity of residents to realize optimal health. For example, census tract 9017.02 near Manassas has an HPI of 47 and the health outcomes are poor—less than half of adults carry private health insurance, and life expectancy is only 77 years, while many areas throughout the region enjoy life expectancies well beyond age 80. The conditions that shape health and economic opportunity in this census tract are also poor: fewer than two-thirds (64%) of adults have completed high school and over a quarter (27%) of children live in poverty. The median household income is \$63,750—far less than the regional average of \$114,243.

Areas like tract 9017.02—with poorer health outcomes, fewer resources, and limited employment and educational opportunities—are disproportionately populated by people of color (tract 9017.02’s population is 58% black or Hispanic). Throughout the region, historic discriminatory policies and practices, along with years of disinvestment and low property values, have left a number of neighborhoods with underfunded schools, undesirable housing, and limited or unsafe park space or areas to exercise.

A particularly poignant example is seen in Alexandria. Census tracts 2020.01 and 2016.00 are only blocks apart, but their neighborhood environments differ greatly. Tract 2020.01 in Old Town has an HPI of 78 and most (90%) of the population is white. Babies born in this tract can expect to live 87 years, only 5% of children live in poverty, and the vast majority (98%) of households have access to a vehicle. This stands in stark contrast to nearby census tract 2016.00 in Old Town West, where the HPI is only 42 and 40% of residents are black or Hispanic. Babies born here can expect to live only 78 years, almost a decade less than in Old Town (2020.01); 58% of children live in poverty; and 20% of households have no access to a vehicle. These trends hold throughout the region—in the tracts with the highest HPI scores (top 20%), only 15% of the population is black or Hispanic. In contrast, in the tracts with the lowest HPI scores (bottom 20%), the population is 49% black or Hispanic.

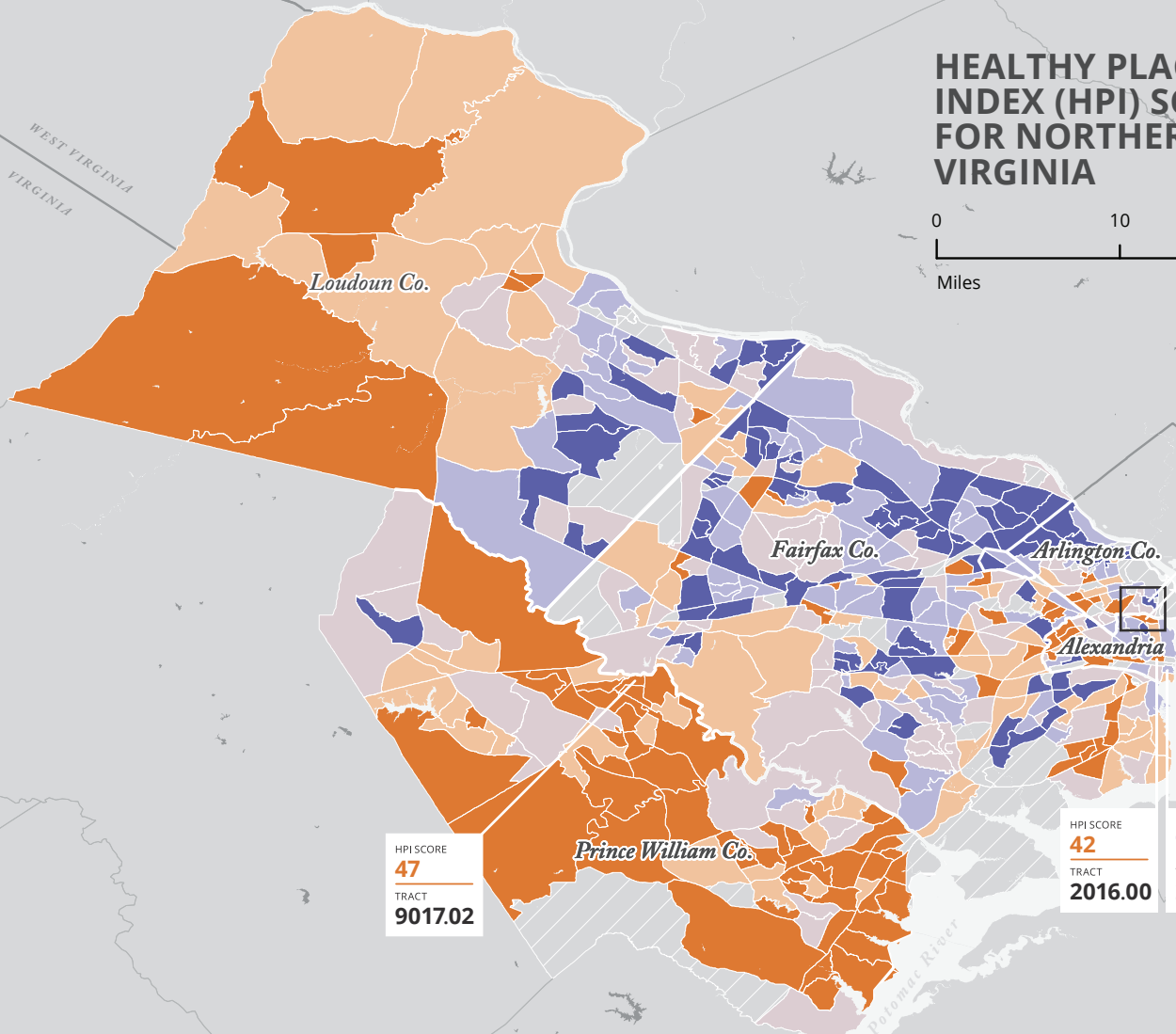
Throughout Northern Virginia, these pockets of disadvantage are often situated adjacent to areas of great wealth and resources—where residents not only enjoy good schools, green spaces, and grocery stores with an abundance of produce and other healthy foods, but also where the majority of adults have completed at least some college, and thus have opportunities for higher-paying jobs and employer-provided health insurance. Take tracts 2012.03 and 1036.01, for example, on either side of Glebe Road near the border of Alexandria and Arlington County (see page 6). Residents of tract 1036.01, north of Glebe Road, have good opportunities for health, whereas residents of tract 2012.03 in Arlandria, south of Glebe Road, have fewer adults with postsecondary education, lower median income and home values, higher rates of unemployment and poverty, lower life expectancy, and a lower HPI score.

### Race/Ethnicity of Neighboring Census Tracts in Alexandria



**Above:** Areas with less favorable conditions for health disproportionately impact people of color, as shown by the uneven racial composition of the above census tracts.

# HEALTHY PLACE INDEX (HPI) SCORES FOR NORTHERN VIRGINIA



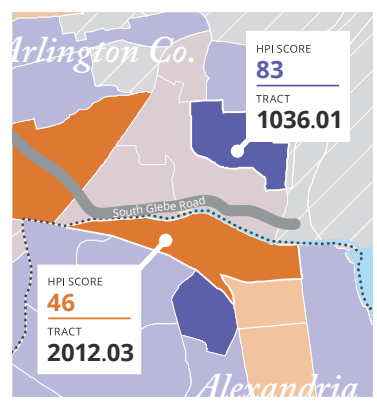
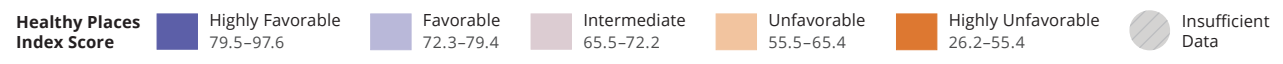
HPI SCORE  
**47**  
TRACT  
**9017.02**

HPI SCORE  
**83**  
TRACT  
**1036.01**

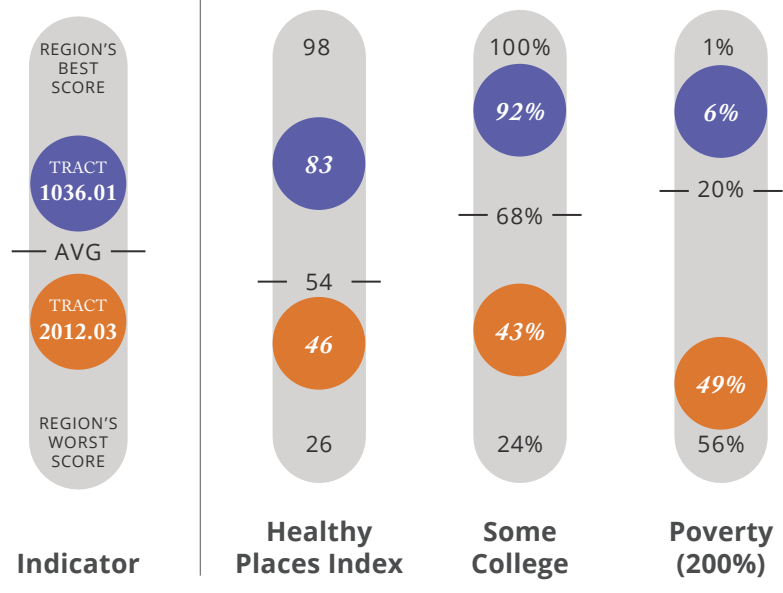
HPI SCORE  
**46**  
TRACT  
**2012.03**

HPI SCORE  
**42**  
TRACT  
**2016.00**

HPI SCORE  
**78**  
TRACT  
**2020.01**



Residents of tract 1036.01, north of Glebe Road, have good opportunities for health, whereas residents of tract 2012.03 in Arlandria, south of Glebe Road, have fewer adults with postsecondary education, lower median income and home values, higher rates of unemployment and poverty, lower life expectancy, and a lower HPI score.



# WHAT CAN BE DONE?



As the HPI data demonstrate, health is shaped by a wide variety of factors that fall outside the health care sector—such as education, housing, and transportation. These factors contribute more to our health than health care. Decisions made about schools, zoning, Metro fares, and other social policies are, in effect, health policies. They are also key to promoting economic opportunity, social mobility, community development, and reversing the effects of historic discriminatory policies and practices.

Meaningful change in each of these areas requires collaboration across sectors: people need affordable housing, transportation, and child care to access jobs or seek higher education. Working together, policymakers in different sectors can achieve greater collective impact than any one sector can achieve alone. This collaborative spirit is behind *Region Forward*, the planning initiative of the Metropolitan Washington Council of Governments, *Destination 2027* in Arlington County, and the *Live Healthy* initiative in Fairfax County.

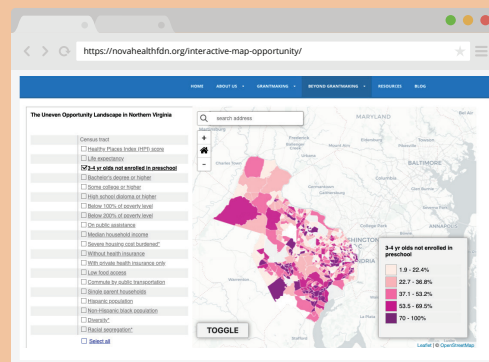
Such efforts are about more than helping communities in need; they improve the lives for everyone in Northern Virginia. As has been shown in similar efforts across the nation, areas with programs that have invested in communities in need—reducing inequities and promoting opportunity—have enjoyed a stronger economy, a more productive workforce, strengthened community partnerships, and improved living conditions for all residents.

By working collaboratively, we can create an environment in Northern Virginia that works to break down the barriers that have historically prevented some from achieving health. Together we can improve the prosperity of the entire region, ensuring that all residents have the potential to thrive and enjoy a healthier tomorrow.

## Want to explore these data further?

Visit our interactive map at:

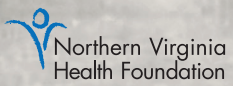
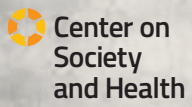
<https://novahealthfdn.org/interactive-map-opportunity>



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