

# CHALLENGES AND OPPORTUNITIES FOR ECONOMIC PROSPERITY IN THE 21<sup>ST</sup> CENTURY

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*Sustainable and Equitable Economic Development  
in Maryland*

NATIONAL CENTER FOR SMART GROWTH  
RESEARCH AND EDUCATION  
UNIVERSITY OF MARYLAND



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**This report was written by the National Center for Smart Growth Research and Education in consultation with its Sustainable and Equitable Economic Development (SEED) Initiative partners:**

- Central Maryland Transportation Alliance;
- Baltimore Regional Initiative Developing Genuine Equality;
- Job Opportunities Task Force;
- 1000 Friends of Maryland; and,
- Maryland Department of Planning

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## Executive Summary

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In this report we summarize the results of research by the National Center for Smart Growth on Maryland's economic, social, and spatial development trends. Funded by the Surdna Foundation, the focus of the research is both broad and narrow. The focus is broad in the sense that the research is intended to promote sustainable development in all its various manifestations. The focus is narrow in that the primary thrust of the research is on economic and demographic trends, and their spatial and equity implications. The research is based almost entirely on data obtained from federal, state, and local data sources. In this first of several forthcoming reports, our value added, therefore, is largely in the organization and interpretation of data. Subsequent reports will address economic and equity issues in greater depth.

Our analysis reveals that Maryland has for several decades grown at a modest but largely steady pace, generally outperforming the rest of the nation. But economic growth and prosperity is far from even and has benefited some regions and demographic groups more than others. Further, although the state has a highly diversified economy, it relies extensively on the federal government, which is expected to contract in the coming years, at least in the national-capital region. Further still, some regions and demographic groups are doing very well while others experience high levels of poverty and a measureable lack of opportunity. These longstanding economic, demographic, and geographic trends portend a future that is sustainable from neither an economic nor an environmental perspective. Therefore, PlanMaryland, the state's first statewide development plan, represents a unique opportunity to address Maryland's economic, demographic, and geographic imbalances.

To address these issues, we offer several recommendations for the implementation of PlanMaryland.

First, the implementation of PlanMaryland needs to address the diversity of Maryland's regions. Toward this end, the state should develop economic development strategies for each region. In doing so, it should explicitly consider regionally specific growth prospects, comparative advantage, wage levels, career ladders, agglomeration opportunities, interregional integration, and environmental factors in the selection of industrial targets. The Maryland Department of Business and Economic Development in particular should work with regional stakeholders and sister state agencies, to prepare economic development plans that integrate infrastructure, land use, workforce and equity goals and strategies for each region of the state. These economic development plans must be based on regional economic strengths and weaknesses, integrate urban centers with their rural peripheries, and advance the well-being of the underserved. In addition, specific programs, policies, and incentives should be developed for regions of statewide economic concern, such as Baltimore City, Western Maryland and the Lower Eastern Shore. Moving to a region-focused approach will be a challenge that requires a very deliberate effort. Ultimately, it may even require a re-

evaluation of regional definitions from a needs-based perspective rather than from a geographical or jurisdictional perspective.

Second, as Maryland's demographic composition continues to evolve, the state should formulate economic development and workforce strategies within PlanMaryland for special populations such as recent immigrants, the previously incarcerated, single mothers, senior citizens, and others. The Maryland Department of Labor, Licensing and Regulation in particular should lead a multi-agency effort to eliminate achievement gaps using targeted education, workforce development, and housing programs and by expanding access to opportunities. These strategies must be both regionally and demographically specific and designed to reduce or eliminate disparities in opportunities between residents with different ethnic and cultural backgrounds and residents located in various parts of urban and rural Maryland.

Third, PlanMaryland should be augmented to address spatially specific economic and transportation centers. To do so, PlanMaryland map elements should include regions and centers as complements to planning area designations submitted by local governments. These new planning elements should be identified based on scientific analyses of economic, social, environmental, and transportation functions.<sup>1</sup> For each critical economic center, the state should work with local governments to develop "sustainable community" plans if they have not already been designated as sustainable communities by the Smart Growth subcommittee. These newly designated economic centers should feature prominently in the forthcoming state transportation, housing, workforce, and economic development plans.

Finally, PlanMaryland should be designed to serve as a central link to the forthcoming state transportation, housing, climate change, and workforce development plans. Such linkages can be established using web-based hyperlinks and integrated planning information systems.

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<sup>1</sup> See, e.g., Puget Sound Regional Council (2002).

## Introduction

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On December 19, 2011, Governor O'Malley signed PlanMaryland, the state's first State Development Plan. According to Planning Secretary Rich Hall, "the plan is a framework for a collaborative process between the State and local governments, the development and environmental communities, the Sustainable Growth Commission and other stakeholders to address critical issues of environmental and fiscal sustainability."<sup>2</sup> From the time the Governor signed the plan until now, the Maryland Department of Planning has developed guidelines for planning area designations and other state agencies have developed first drafts of state-agency implementation plans. Plan implementation is moving along. But while the Plan, the local area guidelines, and the implementation strategies address a range of policy issues, none offers a strategy for integrating economic development and social equity into a plan for the future development of the state.

The Maryland Department of Business and Economic Development has many initiatives, programs, and plans to foster economic development. Similarly, the Maryland Department of Labor, Licensing and Regulation has many initiatives, programs and plans to facilitate workforce development. Among the key objectives of PlanMaryland is the integration the programs of these two agencies (as well as other agencies) into an overall development strategy for the state. Such integration, however, is difficult and requires extensive analysis of the strengths, weaknesses, and forces that shape the Maryland economy, a clear understanding of social and demographic trends, and the linkages between transportation, land-use, economic development and social justice.

Like preparing a local comprehensive plan, preparing a plan for the future development of a state is a complex and time-consuming process. It requires extensive analyses of social, economic, housing, transportation, and environmental issues and more. It also requires mobilization of the public-at-large as well as state and local stakeholder groups. For this reason, such planning efforts often begin with white papers or policy reports that address particular aspects of the planning challenge. We offer one such policy report here. In future reports we will examine disparities in opportunities in greater depth and offer more analyses on the economic strengths and weaknesses of the state. Understanding these strengths and weaknesses is a critical step in identifying desired economic development outcomes and constructing strategies to achieve those outcomes.

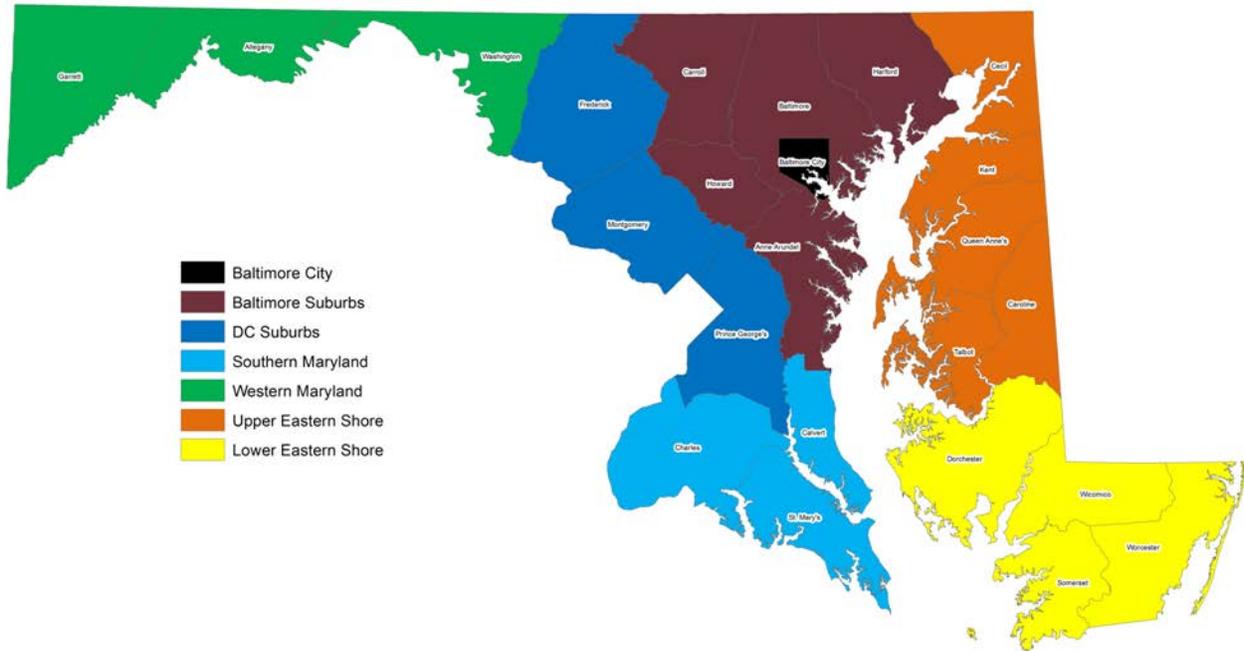
In this report we summarize the results of research by the National Center for Smart Growth on the social, economic, and spatial development trends. Funded by the Surdna Foundation, the focus of the research is both broad and narrow. The focus is broad in the sense that the research is intended to promote "sustainable development" in all of its manifestations. The focus is narrow in that the primary thrust of the research is on

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<sup>2</sup> Maryland Department of Planning, "PlanMaryland: A Sustainable Growth Plan for the 21<sup>st</sup> Century." December 2011.

economic and demographic trends, and their spatial and equity implications. The research is based almost entirely on data obtained from federal, state, and local data sources. Our value added, therefore, is largely in the organization and interpretation of data.

For this report, we have generally used the Maryland Department of Planning's boundaries for regions of the state. Whenever possible, however, we have split the Baltimore Region into two parts – the City of Baltimore and the Baltimore suburbs. All of Maryland's regions are both internally and externally diverse, but we found that distinguishing the city from its suburbs in particular, revealed two especially divergent stories of what is happening in the greater Baltimore Region. Figure 1 highlights the different regions of the state.



**Figure 1. Map of Maryland's Regions.** Note that Baltimore City and the Baltimore suburbs together create the "Baltimore Region."

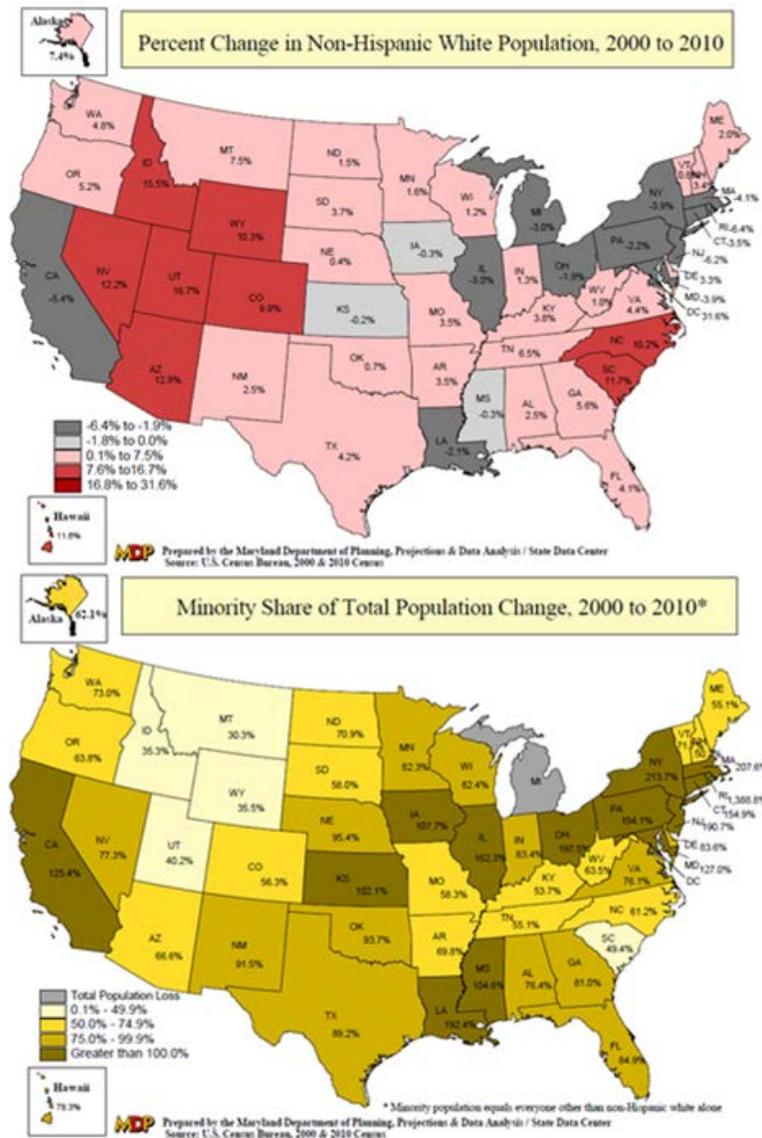
This is but the first of several forthcoming reports under the Surdna-funded Sustainable and Equitable Economic Development (SEED) Initiative. This initiative involves the collective efforts of six organizations to promote equity and sustainable development: the National Center for Smart Growth Research and Education at the University of Maryland, the Central Maryland Transportation Alliance, the Job Opportunities Task Force, the Baltimore Regional Initiative Developing Genuine Equity, 1000 Friends of Maryland, and the Maryland Department of Planning. This report, however, is wholly written by the National Center for Smart Growth to provide its partners with a resource for PlanMaryland and policy implementation.

## Population and Demographics

Sometimes described as America in miniature, the State of Maryland is a remarkably diverse state. Its cultural topography ranges from resort hotels on the Atlantic shore to fields of corn and soybeans that blanket the Eastern Shore; from fishing boats that bob on the Chesapeake Bay to tony suburbs that sparkle on the D.C. border; from ethnic villages in Baltimore City to blue collar taverns in the Baltimore suburbs; and from sleepy hamlets in the Appalachian foothills to vibrant new towns in the Baltimore-Washington corridor. Such diversity is what makes the state rich in culture and resilient to the economic cycles that periodically rock the national economy. But it also presents challenges to state planners, who must promote the general welfare of all Maryland residents yet meet the diverse needs of disparate regions, cities, counties, and neighborhoods.

Maryland lies at the Southern tip of the Boston-Washington megalopolis and is thus shaped by the economic and demographic trends that bear on the Mid-Atlantic seaboard. Like neighboring New Jersey to the north and Virginia to the south, Maryland has grown at a slow but steady rate for the past several decades. Its 9.0 percent growth rate from 2000 to 2010 ranks 23<sup>rd</sup> among all states, faster than New Jersey (4.5 percent) but slower than Virginia (13.0 percent). The performance of the Maryland economy tends to follow closely the performance of the national economy, but its slow, long term expansion has generally sustained a vibrant economy, arguably without overwhelming the capacity of its physical and institutional infrastructure.

While the pace of growth has remained relatively steady for several decades, the demographics of that growth



**Figure 2. U.S. maps demonstrating the changing impact of minority population in each state.** Source: Maps prepared by MDP, data from 2000 and 2010 Census.

have changed dramatically, as shown in Figure 2. In the last decade minority populations have grown rapidly in Maryland, while the non-Hispanic white population has declined. The Hispanic population more than doubled, growing to 8.2 percent of the state's population in 2010. The Asian population increased 51.0 percent and grew to represent 5.5 percent of the population. The black population grew by 14.3 percent and now represents 29.0 percent of the population. Collectively, minorities now represent 45.3 percent of the state's population,<sup>3</sup> and there is little doubt that the future population of Maryland will be highly diverse and predominantly nonwhite.

Among the 50 states, Maryland ranks high in income, education, and employment. Maryland's unemployment rate is currently<sup>4</sup> 7.0 percent, 18<sup>th</sup> lowest in the nation. And while the unemployment rate has followed the ups and downs of the most recent recession, it has remained consistently below the national average, below New Jersey, but higher than Virginia. In 2010, Maryland's poverty rate was the second lowest in the nation (9.9 percent, behind only New Hampshire with 8.3 percent), although national poverty measures are not adjusted for Maryland's relatively high cost of living. Maryland's degree of income equality, measured as a gini coefficient, was 0.443 in 2010, less than both New Jersey (0.464) and Virginia (0.459).<sup>5</sup> These figures suggest that income in Maryland is more evenly distributed than in its neighboring states. Like the rest of the nation, however, Maryland's poverty rate and income inequality have risen over the last decade.

Maryland has always ranked high nationally in terms of educational attainment. The state ranks 25<sup>th</sup> in the percent of the population age 25 and older that has a high-school diploma or GED (88.1 percent in 2010) but 3<sup>rd</sup> in the percent of population with a bachelor's degree (36.1 percent), and 2<sup>nd</sup> in the percent of the population with a graduate or professional degree (16.4 percent).

Labor force participation in Maryland has historically been relatively high. Since 1976, the state's labor force participation rate has ranked as high as sixth, but only as low as 16<sup>th</sup>. In 2011, 67.6 percent of the state's civilian population was in the labor force, which ranked 15<sup>th</sup> among the 50 states. There is little doubt that in aggregate, Maryland has a well-educated and productive workforce.

Although the Maryland population is, on average, well-educated and prosperous, levels of income, education and other measures of prosperity vary extensively by demographic groups. Non-Hispanic whites and Asians are the best educated. As shown in Figure 3, in 2010, 91.5 percent of whites age 25 and older had a high school diploma or GED and

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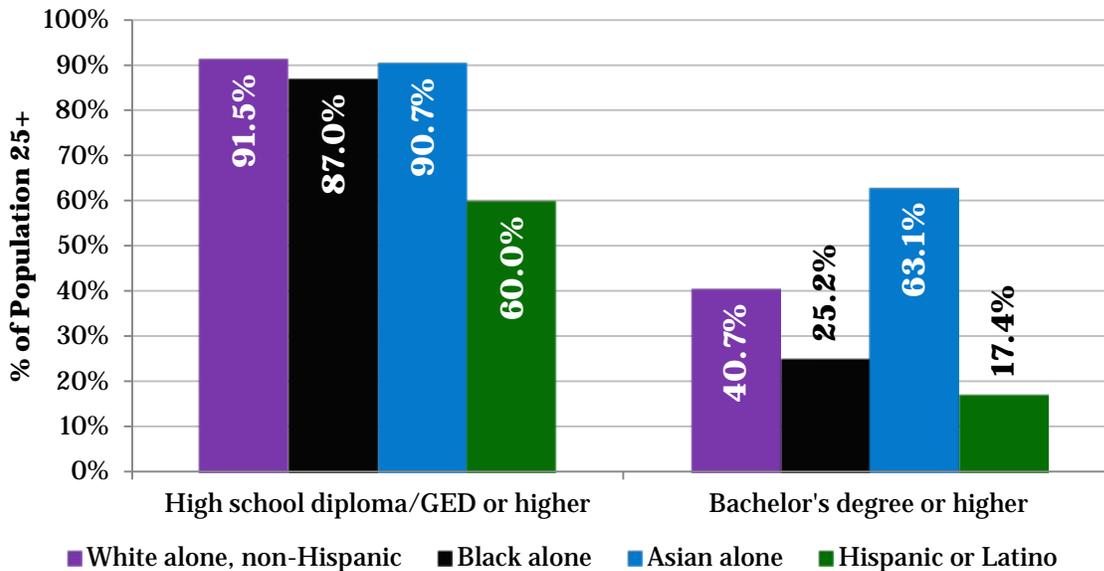
<sup>3</sup> This ranks Maryland sixth in the country in minority share of population, behind only Hawaii (77.3 percent), California (59.9 percent), New Mexico (59.5 percent), Texas (54.7 percent) and Nevada (45.9 percent).

<sup>4</sup> July 2012 employment data from the U.S. Bureau of Labor Statistics.

<sup>5</sup> A Gini coefficient is a measure of income inequality that ranges from zero, if the distribution of income is perfectly equal among all units (people, households, etc.), to one if one unit held all the income and all others had none.

40.7 percent had bachelor's degrees; 90.7 percent of Asians had a high school diploma or equivalent, but they were more likely than whites to have an advanced degree, with 63.1 percent having a bachelor's degree. Among the black population, 87.0 percent have a high school diploma or GED, but only 25.2 percent have a bachelor's degree. Most striking is the Hispanic population, where only 60.0 percent had a high school diploma or GED, and merely 17.4 percent had a college degree.

The disparity in education and income could potentially be exacerbated by the age structure of the respective populations. The existing age structure of the state population looks quite similar to the age structure of the nation as a whole: there are bulges in the population pyramid that reflect the baby boom generation and its echo. Similar to the nation, this portends a rise in the dependency ratio of those who work to those who do not.<sup>6</sup> But given the relatively younger age profile of minorities, particularly Hispanics and blacks, it is clear that today's minority youths will make up a large proportion of tomorrow's workforce.<sup>7</sup> There is no reason to believe that minority populations cannot, in the future, achieve the same levels of education, income, and employment as the current white populations. But if they do not, and if they maintain the same levels of education, income, and employment as they do now, Maryland's status as a national leader in income, education, and employment will be difficult to sustain. The implications are fairly obvious, and it is clear that local, regional, and state economic development strategies must consider specific populations and address issues of equity to ensure sustainable growth. This concept will be explored further in a future SEED report looking at economic opportunity across Maryland.



**Figure 3. Educational attainment in Maryland, by race/ethnicity.** Source: 2010 Census, U.S. Census Bureau.

<sup>6</sup> A dependency ratio is computed by dividing the retirement age population (65 and older) by the working age population (18 to 64).

<sup>7</sup> See Goldstein, 2012.

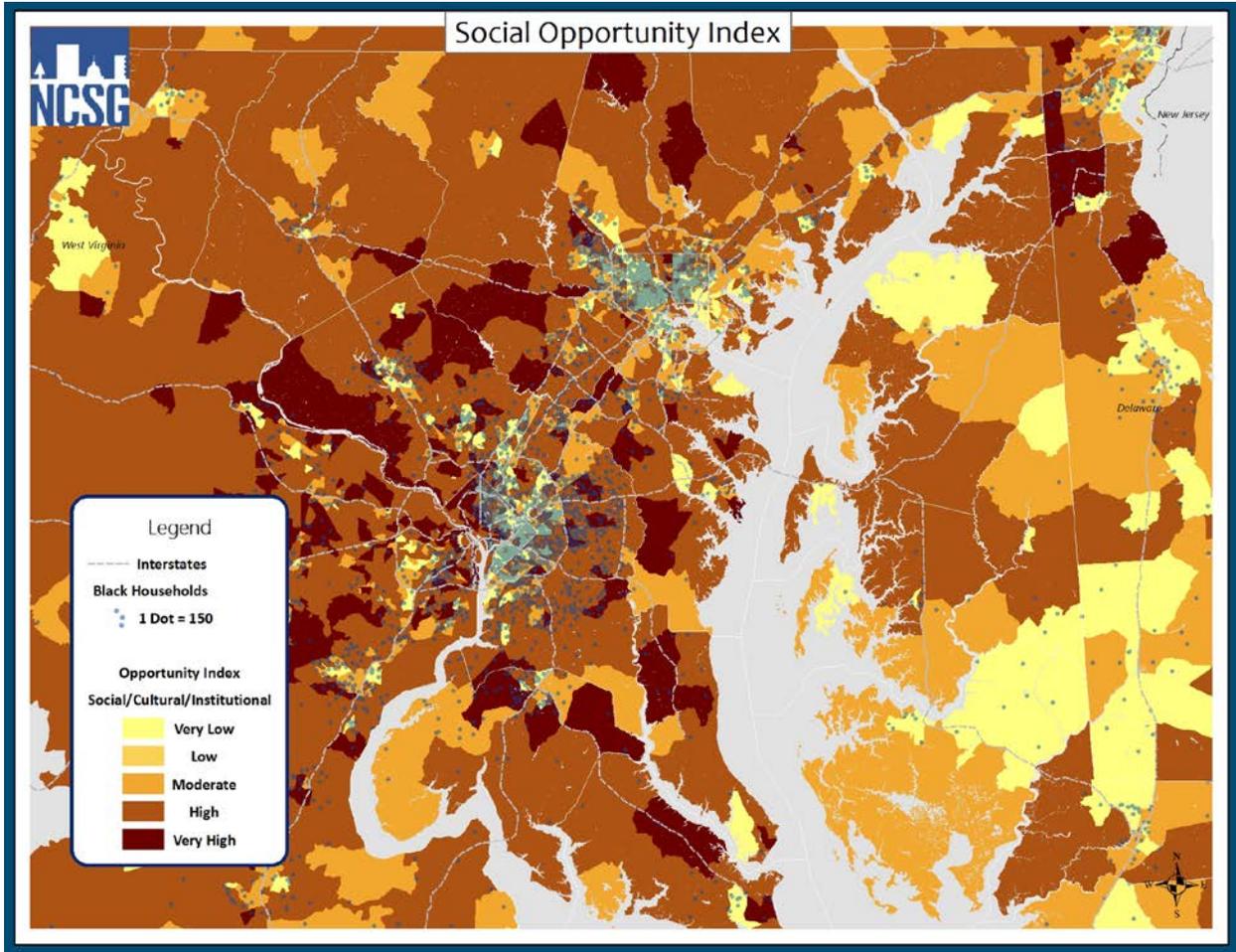
Population growth in the state is also geographically highly uneven. Southern Maryland has seen the most rapid rate of growth in each of the last four decades. From 2000 to 2010, the region's population grew at a rate of 1.9 percent annually, compared to 1.3 percent on the Eastern Shore, 1.0 percent in the D.C. Suburbs region, 0.9 percent in the Baltimore suburbs, and 0.7 percent in Western Maryland. During that same time period, the City of Baltimore experienced a decrease in population of 0.5 percent annually. Since 1970, Southern Maryland's share of the state's population has more than doubled from 2.9 to 5.9 percent. The Eastern Shore's share grew from 6.6 to 7.8 percent. The Baltimore suburbs grew from 29.7 to 35.4 percent of the state's population, whereas the D.C. Suburbs region grew from 32.4 to 35.8 percent. Western Maryland's continued slow growth meant that its share of the state's population fell from 5.3 percent in 1970 to only 4.4 percent in 2010. But the largest loss in population share occurred in Baltimore City where the share fell from 23.1 to 10.8 percent. According to forecasts by the Maryland Department of Planning, Baltimore City has begun to reverse its population decline;<sup>8</sup> but there is very little evidence thus far that Baltimore can gain population without significant policy intervention. If it does not, the Baltimore metropolitan area will continue to decentralize, and the state's population center of gravity will continue to shift toward the D.C. Suburbs region.

Uneven population growth is not a new phenomenon. Over the course of history, in Maryland and elsewhere, population growth has generally occurred first at ports, transshipment points, and other important centers of commerce, then spread over time. To some extent, that is what is happening now as the automobile has facilitated growth in exurban Charles, Frederick, and Washington Counties. But it is not clear that this pattern of growth is environmentally or fiscally sustainable.

While every region of the state deserves to prosper and grow, continued population decentralization has major statewide consequences, most of which are adverse. Population decentralization will surely increase gasoline consumption and greenhouse gas emissions as distances increase between where people live and where they work. Further, continued loss of employment in Baltimore City will reduce the efficiency of rail transit systems, which are generally designed to bring workers from the suburbs to the central city. The value of investment in the proposed Red Line through downtown Baltimore, in particular, will depreciate as employment in Baltimore City continues to decline. It will also result in greater expenditure on infrastructure in the exurbs and a loss of tax base in Baltimore City and its inner suburbs. The equity implications are also adverse. Despite minorities, especially new immigrants, moving to the suburbs at historic rates, those minorities and other residents of Baltimore City that get left behind need to be the focus of economic and workforce development strategies.

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<sup>8</sup> Maryland Department of Planning (2012). "Demographic and Socio-Economic Outlook: Baltimore City." Viewed online at <http://www.mdp.state.md.us/MSDC/County/baci.pdf> on August 29, 2012.



**Figure 4. Social opportunity map and the location of black households.**

Perhaps even more disconcerting, the state's spatial and social disparities are highly interrelated. Despite years of efforts toward integration, Baltimore City and Prince George's County remain predominantly black. The Hispanic population meanwhile is rapidly concentrating in select corridors of the D.C. Suburbs region. Low-income whites, meanwhile, dominate Western Maryland and the Lower Eastern Shore. Not coincidentally, these areas offer the least social and economic opportunity. Years of social research demonstrate that social and economic advancement depends critically on access to social networks, career ladders, and quality education. As shown in Figure 4, black populations across the state are heavily concentrated in areas of lower social opportunity.<sup>9</sup> This makes even more difficult the task of assuring that the future population of Maryland currently has access to people, jobs, and institutions that will help them thrive.

<sup>9</sup> The social opportunity index is designed to capture social and cultural elements and resources that help people succeed. Indicators of these types of opportunity include things like homeownership, social networks, or public sources of cultural knowledge like libraries or theaters. Opportunity mapping, such as shown in Figure 4, will be a primary focus of a future SEED report.

## Employment and Economic Structure

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Population growth is driven in large part by economic growth. Over the long term, the Maryland economy also has grown at a slow, but steady rate. Due largely to its proximity to Washington, D.C., Maryland has enjoyed lower unemployment rates, higher incomes, and less cyclical volatility than most other states. Maryland also tends to rank high in many national rankings of entrepreneurship, research and high-tech firms. According to the U.S. Chamber of Commerce, Maryland ranks first in academic R&D intensity, third in high-tech share of businesses, third in STEM (science, technology, engineering and mathematics) job concentration. The state also ranks first in entrepreneurship and innovation; ranks fifth in growth, productivity, and livability; has the seventh best talent pipeline; and is identified by the Chamber as a top ten future boom state.<sup>10</sup>

Although widely known for its reliance on government, the industrial mix of the state as a whole is relatively diverse and differs little from the nation as a whole. In only two sectors does the Maryland share of employment exceed the national share by more than two percentage points: professional services and government (the federal government in particular). Other industries for which the share of employment in Maryland exceeds that of the nation (but by less than two percentage points) include health care, construction, real estate, educational services, arts and entertainment, and administrative. In contrast, Maryland has a particularly low share of employment in manufacturing. The share of employment in manufacturing in Maryland is more than two percentage points lower than the share in the United States. Manufacturing is the only industry for which that is the case.

The good news for Maryland is that the government and professional services sectors have historically been cyclically resilient and growing over the long term. Given persistent budget shortfalls at all levels of government, renewed efforts to cut government spending, and other austerity measures, it is unlikely that government expansion and its spin-off growth in professional services will continue in the near or distant future—at least not in the national capital region. Clearly this would have adverse effects on the Maryland economy and increase competition with neighboring Virginia, which has an even greater share of employment in both government and professional services. Competition over job growth between Montgomery County, Maryland, and Fairfax County, Virginia has already intensified as military budgets decline.

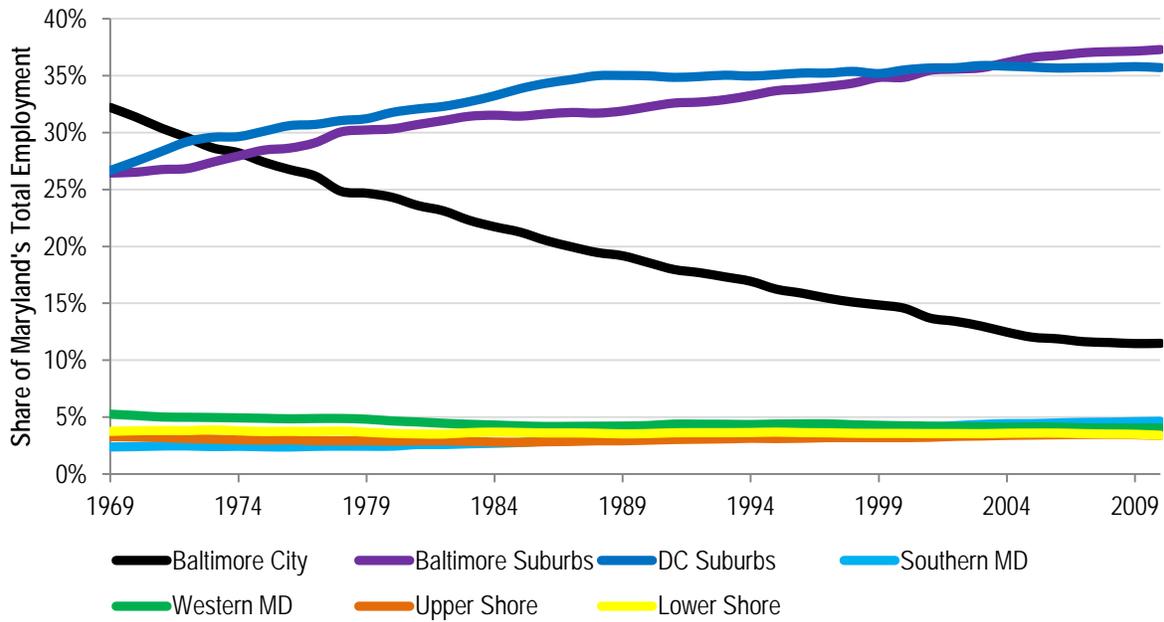
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<sup>10</sup> Praxis Strategy Group and Joel Kotkin (2012). “Enterprising States: Policies that Produce.” Viewed online at <http://www.uschamber.com/sites/default/files/reports/Enterprising-States-2012-web.pdf> on September 4, 2012.

**Table 1. Industrial mix comparison of Maryland, New Jersey, Virginia and the U.S. as a whole, 2010.** Numbers highlighted in yellow indicate a larger share of employment than exists nationwide. *Source: U.S. Bureau of Economic Analysis.*

Description	Maryland Share	US Share	NJ Share	VA Share
<b>Total employment</b>	<b>3,349,774</b>	<b>171,093,400</b>	<b>4,947,336</b>	<b>4,709,575</b>
Forestry & fishing	0.2%	0.5%	0.1%	0.3%
Mining	0.1%	0.7%	0.1%	0.3%
Utilities	0.3%	0.3%	0.3%	0.2%
Construction	6.1%	5.2%	4.3%	5.9%
Manufacturing	3.7%	7.1%	5.5%	5.1%
Wholesale trade	2.8%	3.5%	4.7%	2.6%
Retail trade	10.0%	10.4%	10.5%	10.1%
Transportation & warehousing	2.7%	3.2%	3.9%	2.8%
Information	1.7%	1.9%	1.9%	1.9%
Finance and insurance	5.1%	5.6%	6.9%	4.3%
Real estate	4.9%	4.4%	5.4%	4.3%
Professional	9.8%	6.9%	8.4%	10.8%
Management	0.7%	1.2%	1.6%	1.6%
Administrative	6.2%	6.1%	6.1%	5.7%
Educational services	2.8%	2.4%	2.5%	2.0%
Health care & social assistance	11.8%	11.1%	11.6%	9.2%
Arts & entertainment	2.3%	2.2%	2.1%	2.0%
Accommodation & food	6.3%	7.0%	6.2%	6.7%
Other services	5.6%	5.8%	4.9%	5.6%
Government	16.9%	14.4%	13.1%	18.7%
Federal, civilian	5.1%	1.8%	1.2%	4.1%
Military	1.4%	1.2%	0.5%	3.2%
State and local	10.4%	11.4%	11.3%	11.4%
State government	3.1%	3.1%	3.1%	3.4%
Local government	7.3%	8.3%	8.3%	8.0%

In part because of its diversity and strengths in expanding sectors, the aggregate Maryland economy has performed comparatively well for several decades; the performance of regional economies within Maryland, however, have varied widely. In general, the economies of the Baltimore suburbs and the D.C. Suburbs region, the Upper Eastern Shore, and especially Southern Maryland, perform well, with rates of job growth that exceeded ten percent over the past decade. Job growth in Western Maryland and the Lower Shore, however, continues to lag the rest of the state; growing over the past decade by just 5.0 and 4.6 percent, respectively. The City of Baltimore has seen its total number of jobs decrease in three of the last four decades, including a 13.4 percent decrease from 2000 to 2010. As a consequence (and as shown in Figure 5), from 1969 to 2010, Baltimore City's share of the state's employment fell from one third to just over ten percent!



**Figure 5. Share of Maryland's Total Employment by Region, 1969-2010.** Baltimore City's share of the state's total employment continues to decline whereas employment shares in the state's suburban regions have increased. *Source: U.S. Bureau of Economic Analysis.*

**Table 2. Employment and Shares by Industry for Maryland and its Regions, 2010.** The darker the green, the higher the sector's share of the region's jobs. *Source: U.S. Bureau of Economic Analysis.*

Industry Sector	Maryland Total	Baltimore City	Baltimore Suburbs	D.C. Suburbs	Southern MD	Western MD	Upper Shore	Lower Shore
<b>Total employment</b>	<b>3,364,818</b>	<b>386,532</b>	<b>1,254,539</b>	<b>1,201,142</b>	<b>156,230</b>	<b>136,648</b>	<b>114,957</b>	<b>114,770</b>
Forestry & fishing	0.2%	NA	0.1%	0.1%	0.1%	0.3%	0.3%	0.0%
Mining	0.1%	0.0%	0.1%	0.1%	0.1%	0.5%	0.1%	0.0%
Utilities	0.3%	NA	0.0%	0.1%	0.0%	0.1%	0.1%	0.3%
Construction	6.1%	3.0%	6.3%	6.6%	7.0%	5.8%	5.7%	5.7%
Manufacturing	3.7%	3.5%	4.1%	2.4%	1.6%	6.8%	7.4%	6.4%
Wholesale trade	2.8%	2.2%	3.6%	2.3%	0.4%	0.5%	2.6%	2.6%
Retail trade	10.0%	4.8%	11.0%	9.4%	12.9%	14.0%	11.4%	11.8%
Trans. & warehousing	2.7%	2.9%	1.5%	1.9%	2.6%	4.4%	3.0%	1.6%
Information	1.7%	1.3%	1.7%	2.1%	0.9%	1.3%	0.9%	1.1%
Finance and insurance	5.0%	4.4%	5.6%	5.1%	2.8%	6.0%	3.6%	3.3%
Real estate	4.9%	2.8%	5.1%	5.3%	5.6%	3.3%	5.5%	4.8%
Professional	9.8%	6.3%	10.0%	12.3%	10.7%	1.9%	4.0%	3.9%
Management	0.7%	0.3%	0.6%	0.9%	0.4%	0.2%	0.3%	1.1%
Administrative	6.2%	5.7%	6.2%	6.9%	5.0%	4.9%	4.6%	3.7%
Educational services	2.8%	8.0%	2.1%	2.3%	1.4%	1.0%	2.0%	0.8%
Health care & social assistance	11.7%	20.1%	11.0%	9.9%	9.7%	12.8%	9.4%	10.9%
Arts & entertainment	2.3%	2.0%	2.4%	2.3%	2.0%	1.9%	2.8%	2.2%
Accommod. & food	6.3%	5.5%	6.2%	5.7%	7.4%	7.3%	7.5%	11.7%
Other services	5.6%	5.2%	5.1%	6.2%	6.0%	5.3%	6.5%	5.6%
Government	16.8%	21.0%	15.5%	17.4%	19.6%	13.6%	12.1%	15.3%
Federal, civilian	5.1%	2.8%	5.3%	6.6%	7.0%	1.1%	1.8%	0.8%
Military	1.4%	0.5%	1.8%	1.3%	2.5%	0.6%	0.6%	0.6%
State and local	10.3%	17.6%	8.5%	9.5%	10.1%	12.0%	9.6%	13.9%
State government	3.1%	10.2%	2.1%	2.0%	0.9%	4.3%	0.6%	5.0%
Local government	7.2%	7.4%	6.4%	7.5%	9.2%	7.7%	6.8%	8.9%

Each region has a unique industrial mix as can be seen in Table 2. Most regions have their largest share of employment in government, although the share of government employment by level of government varies by region. The suburban regions of the state tend to have more employment in professional services, while the rural regions have higher job shares in retail trade and manufacturing. The City of Baltimore has more than one fifth of its jobs in health care.

These differences in industrial structure suggest that uniform statewide economic development policies will not benefit all parts of the state equally, and a strong case can be made for designing economic development strategies on a regional basis. Moving in that direction, the Maryland Department of Business and Economic Development has identified “embrac[ing] regional and economic diversity” as one of four strategies in its most recent strategic plan.<sup>11</sup>

The economic and demographic diversity of Maryland’s regions has important implications for PlanMaryland. It suggests PlanMaryland needs to address the specific needs of each particular region in an integrated fashion. Whereas containing sprawl, promoting compact growth and transit oriented development, creating economic synergies, and training immigrants for careers in government, health care, and information technology may be appropriate development strategies for regions in the central core of the state, they are probably less appropriate strategies for the more rural parts of the state. In Western Maryland and the Eastern shore, for example, a development strategy based on resource preservation, agriculture, tourism and recreation and creative linkages between rural and urban areas may be more appropriate. The data presented below suggest much more research and policy development is needed in this regard.

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<sup>11</sup> Maryland Department of Business and Economic Development. “Charting Maryland’s Economic Path: Discovery, Diversity & Opportunity,” Spring 2011, pp. 23-35. Retrieved online at <http://www.choosemaryland.org/aboutdbed/Documents/medcStrategicReport.pdf> on October 5, 2012.

## Baltimore Region<sup>12</sup>

The Baltimore region as a whole continues to grow and prosper. According to a recent report by the Brookings Institution, compared to the U.S. as a whole, job growth in the region was stronger in the seven years leading up to the Great Recession, while job loss during the recession was smaller. The report further indicates, however, that in recent decades growth in the region's lowest paying industries has kept pace with the nation, whereas growth in the middle- and highest-paying industries has been slower than the national average.<sup>13</sup>

Currently, the Baltimore suburbs and the D.C. Suburbs region have approximately the same total population; but even with optimistic projections for economic growth throughout the Baltimore Region, population in the D.C. Suburbs region of Maryland is expected to exceed that in the Baltimore suburbs in the near and distant future. The Maryland Department of Planning projects job growth from 2010 to 2040 in the Baltimore Region to exceed that in the D.C. Suburbs by more than 66,000 jobs. Meanwhile population growth in the D.C. Suburbs region of Maryland is expected to outpace population growth in the Baltimore suburbs by approximately 154,500 people<sup>14</sup> due to an adverse jobs-housing ratio in the D.C. Suburbs.

But as the Brookings report also notes, there is great disparity between the economic fortunes of Baltimore City and its surrounding communities. Blacks make up the majority of city residents, as they have for many decades. The population of the city peaked in 1950 at 949,708 and has declined ever since to its current (2011) population estimate of 619,493 – a 34.8 percent loss of population! The city also falls short in many measures of well-being. It has the highest poverty rate (24.7 percent in 2010), the fourth highest unemployment rate (9.8 percent in April 2012), the lowest level of educational attainment (78.3 percent with a high school diploma in 2010), the third lowest median household income (\$38,186 in 2010), and ranks lowest on the health outcome and health factor indices recently released by the Population Health Institute at the University of Wisconsin.<sup>15</sup>

The suburban counties in the Baltimore region differ substantially from the city both in demographic and economic characteristics and trends. The Baltimore suburbs are

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<sup>12</sup> The Baltimore Region includes Anne Arundel, Baltimore, Carroll, Harford, and Howard Counties as well as the City of Baltimore. Note that all references in the report to the “Baltimore Suburbs” region indicate the exclusion of Baltimore City.

<sup>13</sup> Vey, Jennifer S. “Building from Strength: Creating opportunity in greater Baltimore’s next economy.” The Brookings Institution, Metropolitan Policy Program, April 2012, p. 5. Retrieved online at [http://www.brookings.edu/~media/research/files/reports/2012/4/26%20baltimore%20economy%20vey/0426\\_baltimore\\_economy\\_vey.pdf](http://www.brookings.edu/~media/research/files/reports/2012/4/26%20baltimore%20economy%20vey/0426_baltimore_economy_vey.pdf) on October 5, 2012.

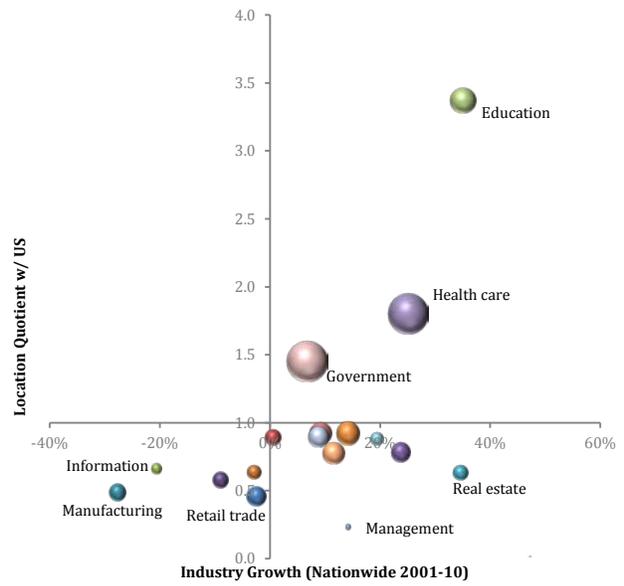
<sup>14</sup> Source: Maryland Department of Planning (2012). “State Data Center: Projections to 2040.” Available online at [http://www.mdp.state.md.us/msdc/S3\\_Projection.shtml](http://www.mdp.state.md.us/msdc/S3_Projection.shtml) (visited September 4, 2012).

<sup>15</sup> Source: Population Health Institute (2012). “County Health Rankings & Roadmaps: A Healthier Nation, County by County.” Available online at <http://www.countyhealthrankings.org/#app/maryland/2012/rankings/outcomes/overall> (visited September 4, 2012).

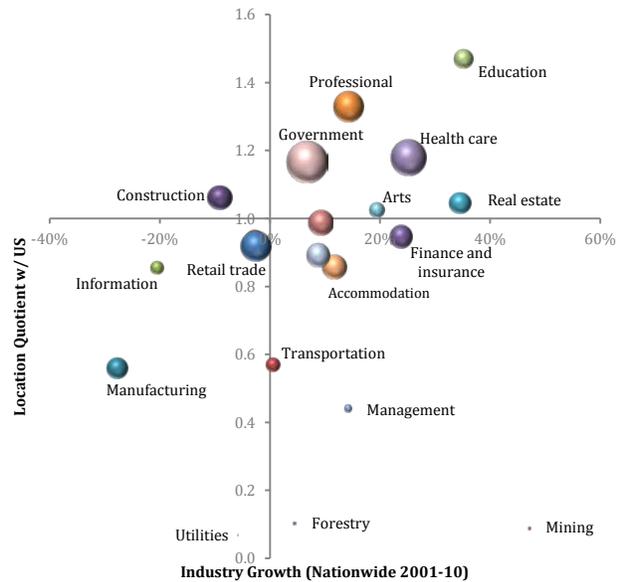
predominantly white, although the population of Baltimore County is 25.7 percent black and the population of Howard County is 17.1 percent black and 14.3 percent Asian. In every suburban Baltimore county, nearly 90 percent of the adult population has a high school diploma, and over 30 percent has a bachelor's degree. In Howard County, nearly 60 percent has a bachelor's degree. Poverty rates are less than 10 percent for every county in the region and close to 5 percent for most.

The industrial mix of the Baltimore region features strength in education, professional services, health care, and government, especially state government. The economy of Baltimore City continues to struggle, however. Once the dominant employment center of the state, employment has fallen from 540,701 in 1969 to 386,532 in 2010. On a positive note, employment in the city is strongly dominated by three sectors (as can be seen in Figure 6): education, health care, and government (especially state government), sectors that have experienced continuous growth over the most recent decade.<sup>16</sup>

Like Baltimore City, the suburban Baltimore counties have high levels of employment in government, health care, and education. In addition, Howard County has strengths in professional services and wholesale trade; Harford County has strengths in



**Figure 6. National Industry Growth (2001-10) and Importance to the City of Baltimore (2010).** Source: U.S. Bureau of Economic Analysis.



**Figure 7. National Industry Growth (2001-10) and Importance to the Baltimore Region (2010).** Source: U.S. Bureau of Economic Analysis.

<sup>16</sup> In this and the other bubble charts like it throughout this section of the report, the horizontal axis captures nationwide industry growth from 2001 to 2010. The vertical axis represents the location quotient – or relative importance of an industry in terms of employment share – compared to U.S. employment levels. The size of each bubble represents the number of jobs in each industry for the designated geography in 2010.

**Table 3. Industries with the largest relative shares of jobs (location quotients) in 2010 by county, Baltimore Region.**

County	Industries with the Highest Location Quotients
Baltimore City	Educational services (3.42) State government (3.35) Health care (1.83)
Anne Arundel County	Federal government, civilian (6.49) Military (3.67) Professional, scientific and technical services (1.32)
Baltimore County	Federal government, civilian (1.88) Finance and insurance (1.40) Health care (1.30)
Carroll County	Construction (1.92) Retail trade (1.23) Real estate, rental and leasing (1.21)
Harford County	Federal government, civilian (5.00) Military (2.08) Construction (1.33)
Howard County	Professional, scientific and technical services (2.63) Wholesale trade (2.17) Information (1.28)

retail trade and transportation, and Baltimore County has stronger real estate and construction sectors than the city. Additional industry strengths are noted in Table 3.

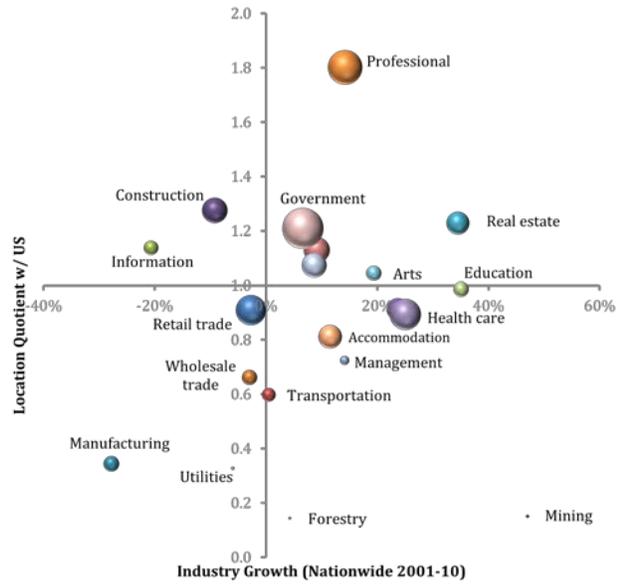
Unlike the city, employment in the Baltimore suburbs has grown substantially over the last several decades. Whereas the city's employment has fallen 28.5 percent since 1969, the Baltimore suburbs have gained more than 810,500 jobs (representing a 182.6 percent increase) over the same time period.

### D.C. Suburbs<sup>17</sup>

The D.C. Suburbs region represents the emerging dominant region of the state. The region is already the largest in terms of total population and boasts the most rapid growing employment center in the I-270 corridor. The region as a whole is highly diverse, although Prince George’s County is predominantly black and Frederick County is predominantly non-Hispanic white.<sup>18</sup> Montgomery and Prince George’s Counties lost white residents in the last decade leaving Montgomery County more and Prince George’s County less diverse. Overall, the population growth in the region has been driven by growth in the minority population, which saw an increase of 30.0 percent from 2000 to 2010 (compared to a 10.9 percent decrease in the non-Hispanic white population). Furthermore, this growth can be largely attributed to an increase in the region’s foreign born population.

More than 80 percent of residents in all three counties have high school diplomas and more than 50 percent of Montgomery County residents have a bachelor’s degree. Though rising over the last three decades, the poverty rate in all three counties remains less than 10 percent.

The D.C. Suburbs region also has large employment shares in professional services and government, especially the federal government. The region also has strengths in information, real estate, and construction. Table 4 identifies the particular industry strengths of each county in the D.C. Suburbs region.



**Figure 8. National Industry Growth (2001-10) and Importance to the DC Suburbs Region (2010).**  
 Source: U.S. Bureau of Economic Analysis.

**Table 4. Industries with the largest relative shares of jobs (location quotients) in 2010 by county, DC Suburbs.**

County	Industries with the Highest Location Quotients
Frederick County	Federal government, civilian (1.79) Professional, scientific, technical services (1.70) Construction (1.61)
Montgomery County	Federal government, civilian (4.25) Professional, scientific, technical services (2.29) Real estate, rental and leasing (1.46)
Prince George’s County	Federal government, civilian (3.70) State government (1.68) Construction (1.60)

<sup>17</sup> The DC Suburbs region includes Frederick, Montgomery and Prince George’s Counties.

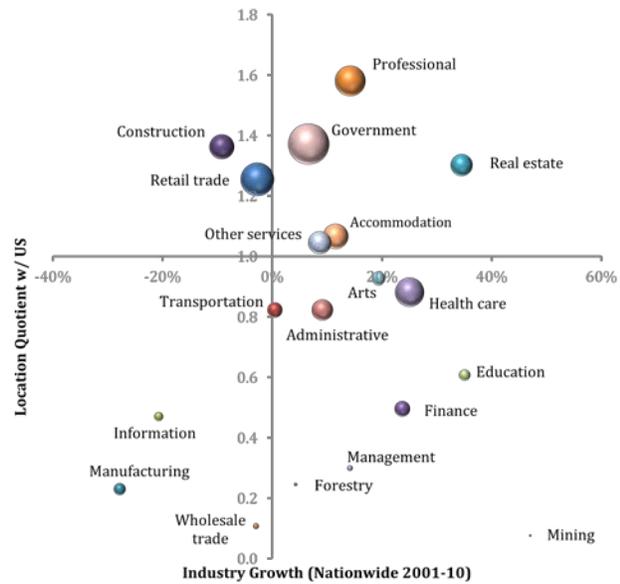
<sup>18</sup> Between 2000 and 2010, however, Frederick County’s Hispanic population actually grew more than the non-Hispanic white population (12,471 more Hispanic people compared to only 9,679 more non-Hispanic whites).

### Southern Maryland<sup>19</sup>

Southern Maryland is the fastest growing region in the state. Charles County has a large and rapidly growing black population that nearly doubled in size from 2000 to 2010. Meanwhile, Calvert and St. Mary’s Counties are predominantly white and have experienced more modest increases in the minority population share (3.4 and 4.0 percentage point increases, respectively, compared to 18.9 percentage points for Charles County). In terms of educational attainment, 90.7 percent of all adult residents have a high school diploma, which is the highest rate of all the regions in the state. Very few of those high school graduates, however, have college degrees – only 27.2 percent, compared to the statewide rate of 35.6 percent. According to 2010 Census estimates, the poverty rates for the three counties range from 6.2 to 7.5 percent.

**Table 5. Industries with the largest relative shares of jobs (location quotients) in 2010 by county, Southern Maryland.**

County	Industries with the Highest Location Quotients
Calvert County	Construction (1.84) Real estate, rental and leasing (1.53) Local government (1.41)
Charles County	Federal government, civilian (2.25) Retail trade (1.70) Construction (1.56)
St. Mary’s County	Federal government, civilian (7.59) Military (3.51) Professional, scientific and technical services (2.57)



**Figure 9. National Industry Growth (2001-10) and Importance to the Southern Maryland Region (2010).** Source: U.S. Bureau of Economic Analysis.

As a region, Southern Maryland has large employment shares in government, professional services, real estate, construction, and retail trade. The region’s largest employers – each with over 1,000 employees – include Dyncorp International and Wal-Mart/Sam’s Club. Calvert County’s strengths are in construction, real estate and local government. Table 5 highlights the industrial sectors with the strongest relative job shares in each of the Southern Maryland counties.

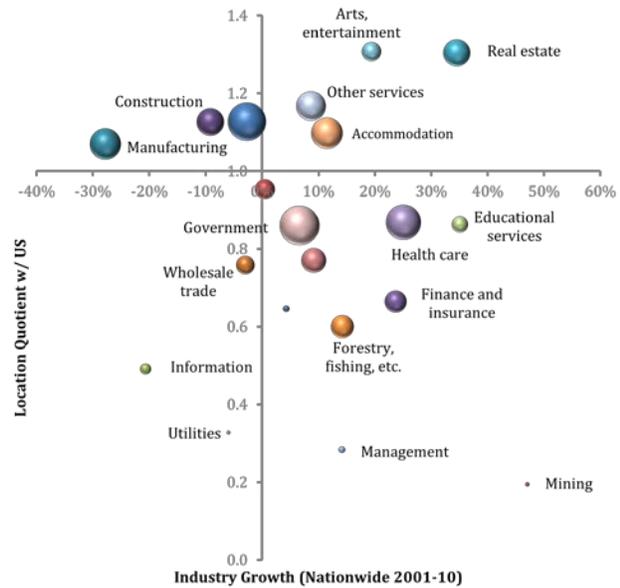
<sup>19</sup> Southern Maryland consists of Calvert, Charles and St. Mary’s Counties.

## Upper Eastern Shore<sup>20</sup>

The Upper Eastern Shore is growing at a moderate rate led by growth in Queen Anne’s and Cecil Counties. The region is predominantly white and Kent, Queen Anne’s, and Talbot Counties are three of only four counties in the state losing black residents. More than 80 percent of the residents in all five counties have a high school diploma and the percent of adult population with a bachelor’s degree ranges from about 14 percent in Caroline County to about 33 percent in Talbot County. The Census estimates that the poverty rate in 2010 ranged from a low of 7.3 percent in Queen Anne’s County to 14.2 percent in Kent County.

**Table 6. Industries with the largest relative shares of jobs (location quotients) in 2010 by county, Upper Eastern Shore.**

County	Industries with the Highest Location Quotients
Caroline County	Transportation and warehousing (2.39) Manufacturing (1.31) Other services (1.18)
Cecil County	Federal government, civilian (2.10) Transportation and warehousing (1.92) Forestry, fishing and related activities (1.84)
Kent County	Educational services (2.65) Arts, entertainment and recreation (1.99) Real estate, rental and leasing (1.32)
Queen Anne’s County	Construction (1.69) Real estate, rental and leasing (1.61) Arts, entertainment and recreation (1.54)
Talbot County	Real estate, rental and leasing (1.66) Professional, scientific, technical services (1.37) Health care and social assistance (1.31)



**Figure 10. National Industry Growth (2001-10) and Importance to the Upper Eastern Shore (2010).**

Source: U.S. Bureau of Economic Analysis.

The economy of the Upper Eastern Shore features strengths in arts and entertainment, real estate, accommodation and food services, retail trade, and manufacturing. The region’s largest employer is Shore Health System, with over 1,000 employees. Table 6 lists the industries with the largest relative strengths for each Upper Shore county.

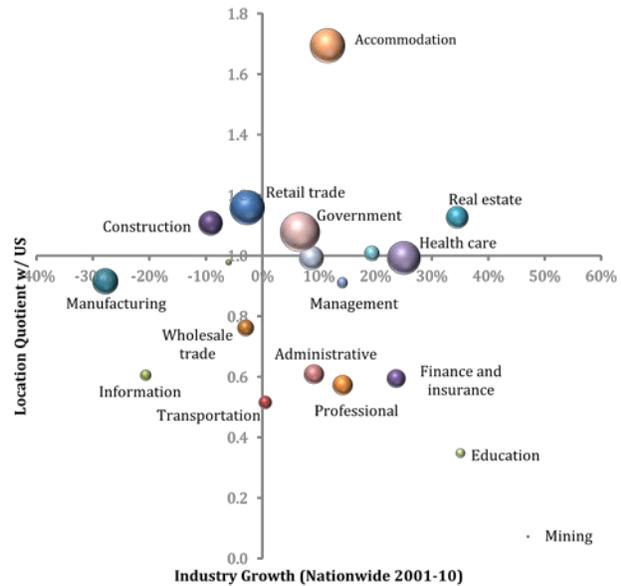
<sup>20</sup> The Upper Eastern Shore includes Caroline, Cecil, Kent, Queen Anne’s and Talbot Counties.

## Lower Eastern Shore<sup>21</sup>

The Lower Eastern Shore is also growing moderately, led by Worcester County. The

**Table 7. Industries with the largest relative shares of jobs (location quotients) in 2010 by county, Lower Eastern Shore.**

County	Industries with the Highest Location Quotients
Dorchester County	Manufacturing (2.08) State government (1.60) Construction (1.13)
Somerset County	State government (6.09) Wholesale trade (1.88) Local government (1.11)
Wicomico County	Utilities (2.00) State government (1.52) Management of companies/enterprises (1.51)
Worcester County	Accommodation and food services (3.48) Real estate, rental and leasing (1.95) Arts, entertainment and recreation (1.70)



**Figure 11. National Industry Growth (2001-10) and Importance to the Lower Eastern Shore (2010).**

Source: U.S. Bureau of Economic Analysis.

region is predominantly white, although in Somerset County the white population is just over 50 percent. The percent of population with a high school diploma is about 80 percent for all four counties, while the share of population with a bachelor's degree ranges from about 12 percent in Somerset County to 20 percent in Worcester County. Poverty rates range from a low of 10.6 percent in Worcester County to 19.3 percent in Somerset County.

The economy of the Lower Shore is highly dependent on tourism; accommodation and food services, which represent a disproportionate share of regional employment. The region's largest employers include Peninsula Regional Medical Center, Perdue Farms, and Wal-Mart/Sam's Club. Table 7 highlights the industries that are most important to the economies in each Lower Shore county.

<sup>21</sup> The Lower Eastern Shore includes Dorchester, Somerset, Wicomico and Worcester County.

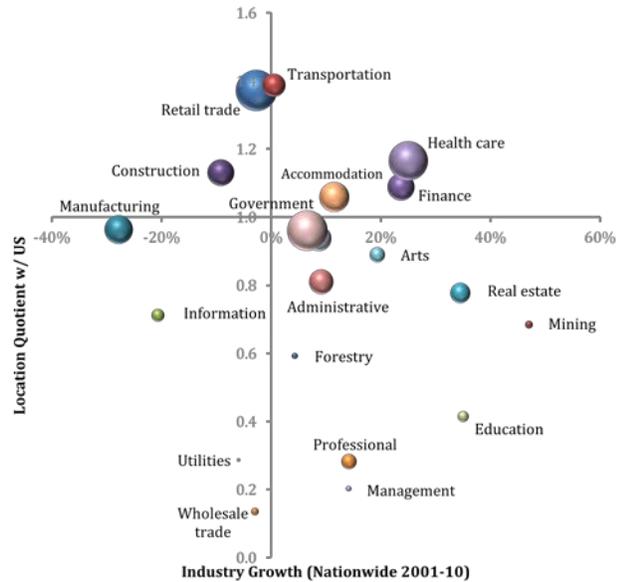
## Western Maryland<sup>22</sup>

Western Maryland is the state’s slowest growing region. Washington County, which already represents more than two thirds of the region’s population, is the only county growing; Allegany and Garrett Counties have essentially not grown for the past three decades.<sup>23</sup> The region is predominantly white, but with a growing black and Hispanic population in Washington County. In all three counties, more than 80 percent of the population has a high school diploma, but less than 20 percent have bachelor’s degrees. In 2010, the poverty rate ranged from 11.4 percent in Washington County to 17.1 percent in Allegany County.

The economy of Western Maryland features a high share of employment in transportation, retail trade, and health care services. The largest employers in the region include Citicorp Credit Services, First Data Merchant Services, Mack Trucks, Wal-Mart/Sam’s Club, Washington County Hospital, the Western Maryland Health System.

**Table 8. Industries with the largest relative shares of jobs (location quotients) in 2010 by county, Western Maryland.**

County	Industries with the Highest Location Quotients
Allegany County	State government (2.63)
	Health care and social assistance (1.69)
	Transportation and warehousing (1.28)
Garrett County	Mining (2.80)
	Forestry, fishing, and related activities (2.25)
	Real estate, rental and leasing (2.02)
Washington County	Transportation and warehousing (1.55)
	Retail trade (1.50)
	Finance and insurance (1.47)



**Figure 12. National Industry Growth (2001-10) and Importance to the Western Maryland Region (2010).** Source: U.S. Bureau of Economic Analysis.

<sup>22</sup> Western Maryland consists of Allegany, Garrett and Washington Counties.

<sup>23</sup> The slight increase seen in Allegany County is entirely the result of an increase in the county’s group quarters (primarily prison) population. From 1990 to 2010, the county saw a population increase of 141 people, yet the household population decreased by more than 4,700.

## Maryland's Economic Growth Centers

While the Maryland economy is distinguished by its regional diversity, there are other important geographies that deserve special attention. A growing body of research has noted the importance of economic centers as key components of economic growth and prosperity.<sup>24</sup> By some, clusters are defined as industries connected by supply and demand relationships regardless of location. By others, clusters are defined as concentrations of firms in similar industries in a given location. Here we define economic clusters (or economic growth centers) as contiguous concentrations of areas with relatively high employment densities. As discussed below, we have identified and characterized 23 economic centers within the State of Maryland. Further, we suggest these centers serve not only as dominant centers of economic activity but serve critical functions for the state's transportation system with important implications for land development patterns.

The economic centers we have identified (shown in Figure 13), are contiguous transportation analysis zones that meet critical job density thresholds.<sup>25</sup> Based on a minimum of 10,000 jobs and a density threshold of 9 jobs per acre, we identified 23 centers in the state. The importance of these employment centers to the economy of Maryland is readily apparent in Table 9. These 23 clusters constitute just over one percent of the state's land area but in 2007 represented 42.3 percent of all jobs, 20.8 percent of all auto trips, and 39.4 percent of all transit trips in the state (see Table 9). They also represent important growth engines, capturing 21 percent of new start-ups and nearly one-third of new jobs in 2008 and 2009.

**Table 9. Relative Importance of Maryland's Economic Centers.**

	Share of Land Area	Share of Households	Share of Employment	Share of Trips Produced	Share of Trips Attracted	Share of Auto Trips	Share of Transit Trips
Economic Centers	1.22%	17.04%	42.28%	21.35%	28.76%	20.75%	39.38%
Remainder of State	98.78%	82.96%	57.72%	78.65%	71.24%	79.25%	60.62%

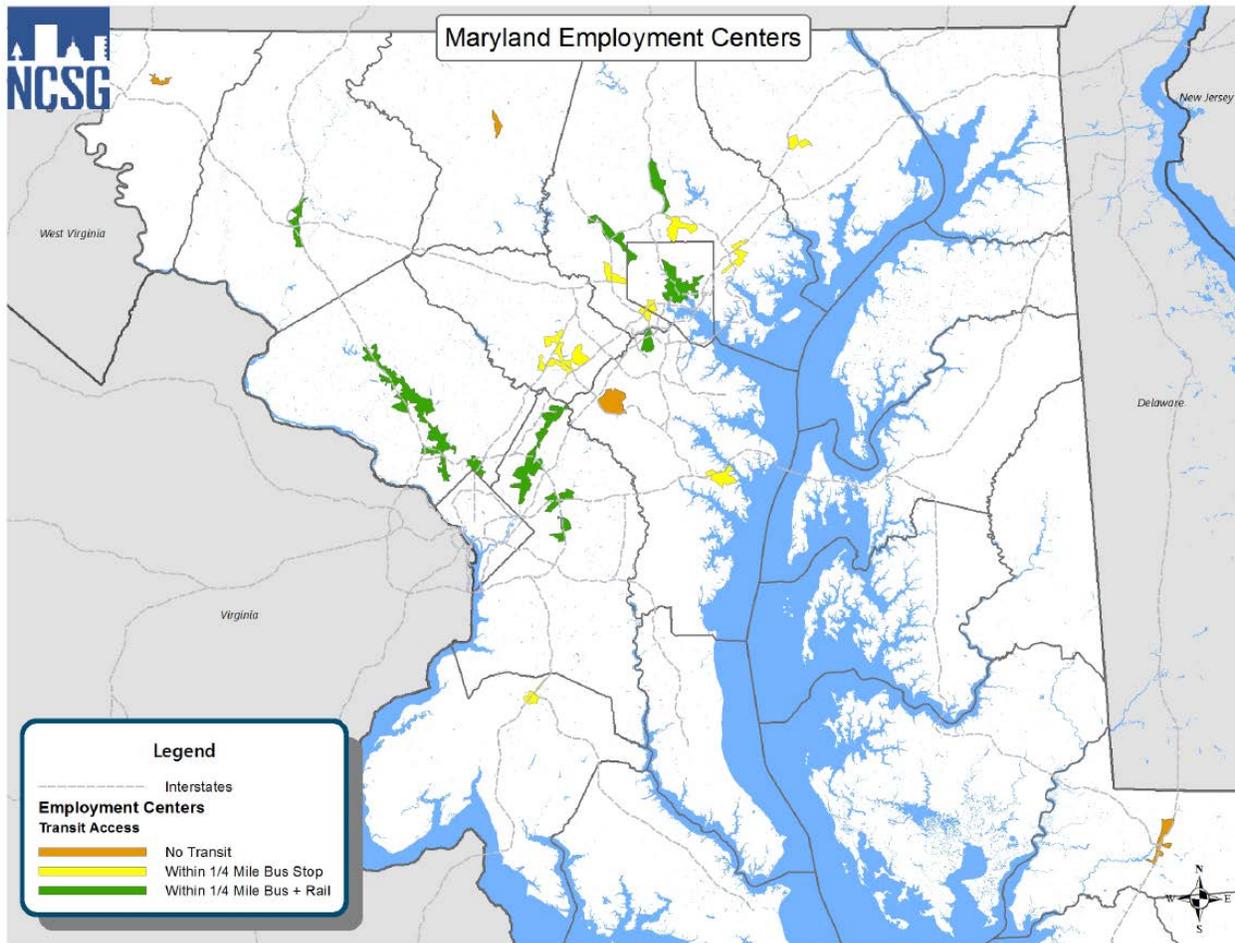
As shown in Figure 13, most of Maryland economic centers are located in the Baltimore-Washington corridor, primarily along major transportation routes and nodes. Hagerstown is the Western-most center and Salisbury is the furthest south and east. Most centers are served by federal interstates or state highways and multiple modes of transit while others, such as Hagerstown, Salisbury and Westminster, have almost no transit service at all.

In addition to high employment densities, Maryland's economic centers have several noteworthy characteristics. The average employment density of all 23 centers is 18.3 workers per acre, or 11,686 workers per square mile, while the employment density for

<sup>24</sup> See Porter, Michael E. (2000). Location, Competition, and Economic Development: Local Clusters in a Global Economy. *Economic Development Quarterly*, 14(1), 15-34.

<sup>25</sup> Transportation analysis zones are approximately the size of census tracts and used by metropolitan planning organizations for transportation planning.

the state as a whole is 327 workers per square mile. Wages in these centers are also relatively high. Employees that work in these centers earn on average 35 percent more than their counterparts working elsewhere in the state. On average, firms located within centers tend to be larger than those located outside centers by an average of 14 employees per firm. The centers also capture 21 percent of new start-ups in the state and nearly one-third of the jobs created by start-ups. Research by the National Center for Smart Growth has also shown that Maryland's economic centers offer valuable agglomeration economies,<sup>26</sup> which enable them to serve as important sources of new firms and job growth.<sup>27</sup>



**Figure 13. Map of Maryland's economic centers and their transit accessibility.**

Maryland's centers range widely in size and specialization. The largest center, located in downtown Baltimore, contains over 234,000 jobs and specializes in utilities, education, and finance. The second and third largest centers, located in the I-270 corridor,

<sup>26</sup> Agglomeration economies arise when firms realize cost savings by locating near other firms in the same or different industries.

<sup>27</sup> Ding, Chengri, Yi Niu, and Gerrit J. Knaap. (2011). Industrial Clusters and Agglomeration Economics in Maryland, 58th Annual North American Meeting of the Regional Science Association International (Second Conference of the Regional Science Association of the Americas), Miami, November 10-12.

combined contain more than 366,000 jobs and specialize in management of companies and enterprises; professional, scientific and technical services; and public administration. The smallest centers are Hagerstown and Westminster, which have 13,417 and 10,585 jobs, respectively. With a few exceptions, the industrial composition of the centers is highly diverse. Only in Linthicum Heights (dominated by Northrop Grumman), Fort Meade (dominated by the military), and Woodlawn (dominated by the Social Security Administration) is the employment share of an individual industry greater than 30 percent. In general, Maryland's 23 centers represent locations with a high concentration of jobs, in a wide range of industries that pay high wages, and serve as job creation engines for the state.

**Table 10. Descriptive statistics for Maryland's economic centers, 2007.**

Economic Growth Center	County	Area (Acres)	Employment	Job Density	Annual Wage	Job Diversity Index
Downtown Baltimore	Baltimore City	6,599.6	234,103	35.5	\$56,666	9.524
Bethesda-North Bethesda	Montgomery	4,994.3	191,597	38.4	\$65,765	10.373
Rockville-Gaithersburg-Germantown	Montgomery	9,614.1	174,633	18.2	\$56,321	10.501
Route 1	Prince George's	8,704.3	110,019	12.6	\$46,497	9.828
Columbia	Howard	6,133.5	73,069	11.9	\$54,973	9.311
Towson	Baltimore	2,830.8	71,639	25.3	\$47,707	9.572
Fort Meade <sup>28</sup>	Anne Arundel	4,362.7	56,000	12.8	–	–
Cockeysville	Baltimore	3,316.7	55,794	16.8	\$51,931	9.955
Annapolis	Anne Arundel	2,720.9	50,185	18.4	\$43,216	8.300
Silver Spring	Montgomery	1,685.2	44,141	26.2	\$53,775	8.217
Pikesville-Owings Mill	Baltimore	3,593.6	40,767	11.3	\$40,017	10.609
Frederick	Frederick	2,718.2	40,333	14.8	\$42,481	10.796
Woodlawn	Baltimore	1,783.6	33,989	19.1	\$55,440	5.300
Landover	Prince George's	2,346.6	33,395	14.2	\$63,356	9.636
Rossville	Baltimore	2,021.1	32,458	16.1	\$41,927	9.328
Salisbury	Wicomico	2,696.7	28,380	10.5	\$35,724	10.849
Halethorpe	Baltimore	1,663.7	19,980	12.0	\$46,053	9.724
Linthicum Heights	Anne Arundel	1,581.4	19,482	12.3	\$84,510	4.712
Largo	Prince George's	1,611.6	17,781	11.0	\$44,129	9.900
St. Charles - Waldorf	Charles	1,256.3	15,472	12.3	\$28,694	7.406
Bel Air	Harford	1,474.5	13,960	9.5	\$32,998	9.061
Hagerstown	Washington	857.4	13,417	15.6	\$34,525	6.802
Westminster	Carroll	1,072.3	10,585	9.9	\$33,866	7.464
All Economic Growth Centers		75,639.1	1,381,179	18.3		

Maryland's 23 centers also play important roles in the state's transportation system. In addition to holding 40 percent of all jobs statewide, the centers hold over 17 percent of all households. This concentration of jobs and households tends to reduce commute trip lengths. In addition, during the morning peak hour of travel, the centers generate over 21 percent of trip origins and nearly 29 percent of trip ends. For this reason, the share of transit trips that begin or end in these centers is nearly 40 percent.

<sup>28</sup> The data for Fort Meade employment is a 2011 estimate from the Fort Meade Regional Growth Commission. All other employment data are for 2007 and come from ES202, which does not include military employment.

**In sum, Maryland 23 economic centers clearly play a disproportionate role in the state's economy. Not only are they locations of high concentrations of high paying jobs and centers of firm growth and expansion, but they are key links in the state's transportation system. A plan for the growth and development of the state must pay particular attention to these critical economic engines. As illustrated in plans for other parts of the country, economic centers can play a critical role in shaping a spatial strategy for sustainable development.<sup>29</sup> Even a modest percentage of future development in such centers could result in more efficient use of urban land and public services. What's more, transportation investments designed to serve and link these centers could serve a greater share of the region's population, help to provide new choices for the region's residents, and ease congestion. Increased travel by transit, high occupancy vehicles, and walking or biking can help to reduce dependence on single-occupant vehicles. Finally, an integrated economic development and workforce development strategy that is center based could produce a future that is more sustainable and equitable over the long term. That is the direction of future research.**

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<sup>29</sup> C.f., Puget Sound, Region Forward.

## Summary and Recommendations

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In this report we present a brief overview of social, economic, and geographic trends, especially those that are pertinent to the development and implementation of PlanMaryland, the newly adopted state development plan. Our principal findings are as follows:

### *Population and Demographics*

- Maryland's population continues to grow over the long term at a slow but steady rate, though rates of growth vary dramatically by region.
- With the state's white population decreasing, its overall population growth is being driven entirely by a surge in the minority population.
- Minority populations currently have, on average, lower incomes, less education, and higher rates of poverty and fertility.
- Unless the income, education, and employment levels of Maryland's minorities are raised, all Maryland residents will be adversely affected.
- Southern Maryland is the fastest growing region but the Baltimore and D.C. suburbs are growing most; Western Maryland is not growing and Baltimore City's population continues to decline.
- There are distinct areas – most but not all in declining regions – that offer residents measurably fewer social and economic mobility opportunities.
- The current spatial distribution of minority and low-income populations tends to maintain or exacerbate existing disparities in social mobility.

### *Employment and Economic Structure*

- For several decades, the Maryland economy has performed relatively well due in part to its high share of employment in the government and professional services sectors.
- While the state economy has performed well, the performance of regional economies varies extensively. Employment in Southern Maryland and the Baltimore and D.C. suburbs continues to grow, but the Eastern Shore is experiencing only modest job growth, and Western Maryland is relatively stagnant.
- The number of jobs in Baltimore City continues to decline causing the city's share of the state's employment to plummet.
- Maryland's regional economies differ extensively in industrial composition, as does the industrial composition of counties within some regions.

### *Maryland's Economic Growth Centers*

- Forty percent of the state's employment is concentrated in the one percent of the state's land that has the highest employment densities.
- These 23 employment centers feature high wages rates, high rates of growth, and generally diversified industrial mixes.

- These employment centers also feature a disproportionate share of trip origins and destinations. Compared to other parts of the state, they also have shorter trip lengths and higher shares of trips by transit.

The implications of these findings for the implementation of PlanMaryland are profound. They suggest a need for further consideration of social equity, regional economic development, and alternative planning frameworks. Specifically, we recommend that the Maryland Department of Business and Economic Development work with regional stakeholders to prepare regional economic development plans for incorporation in PlanMaryland, and that these plans become the basis for regionally focused state agency implementation strategies. Such plans and strategies should include programs designed to promote sustainability, advance the welfare of the underserved, and include new map elements that represent regions, centers, and corridors. Specifically we recommend the following:

First, the implementation of PlanMaryland needs to address the diversity of Maryland's regions. Toward this end, the state should develop economic and workforce development strategies for each region. In doing so, it should consider explicitly regionally specific growth prospects, comparative advantage, wage levels, career ladders, agglomeration effects, interregional integration, and environmental factors in the selection of targets. The Maryland Department of Business and Economic Development in particular should work with regional stakeholders to prepare economic development plans that integrate infrastructure, land use, workforce and equity goals and strategies for each region of the state. These economic develop plans should be based on regional economic strengths and weaknesses, serve to integrate urban centers with their rural peripheries, and advance the well-being of the underserved. Specific programs, policies, and incentives should be developed for regions of statewide economic concern, such as Baltimore City, Western Maryland and the Lower Eastern Shore. Moving to a region-focused approach will be a challenge that requires a very deliberate effort. Ultimately, it may require a re-evaluation of regional definitions from a needs-based perspective rather than a geographical or jurisdictional perspective.

Second, as Maryland's demographic composition continues to evolve, the state should formulate economic development and workforce strategies within PlanMaryland for special populations such as recent immigrants, the previously incarcerated, single mothers, senior citizens, and others. The Maryland Department of Labor, Licensing and Regulation in particular should lead a multi-agency effort to eliminate achievement gaps using targeted education, workforce development, and housing programs and by expanding access to opportunities. These strategies must be both regionally and demography specific and designed to reduce or eliminate disparities in opportunities between residents with different ethnic and cultural backgrounds and residents located in various parts of urban and rural Maryland.

Third, PlanMaryland should be augmented to address spatially unique economic and transportation centers. To do so, PlanMaryland map elements should include regions and centers as a complement to planning area designations submitted by local

**governments. These new planning elements should be identified based on scientific analyses of economic, social, environmental, and transportation functions (e.g., develop and use like GreenPrint). For each of the 23 economic centers identified in this report, the state should work with local governments to develop “sustainable community” plans if they have not already been designated as sustainable communities by the Smart Growth subcabinet.<sup>30</sup> Special emphasis and recognition should be given to these newly designated centers in the planning area designation process and they should feature prominently in the forthcoming state transportation, housing, workforce, and economic development plans.**

**Finally, PlanMaryland should be designed to serve as a central link to the forthcoming state transportation, housing, climate change, and workforce development plans. Such linkages can be established using web-based hyperlinks and integrated planning information systems.**

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<sup>30</sup> While these 23 centers should be a primary focus for sustainable and equitable economic development from a statewide perspective, additional centers, with lower density thresholds, should be identified within the rural regions of the state for similar sustainable community consideration.

## References

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