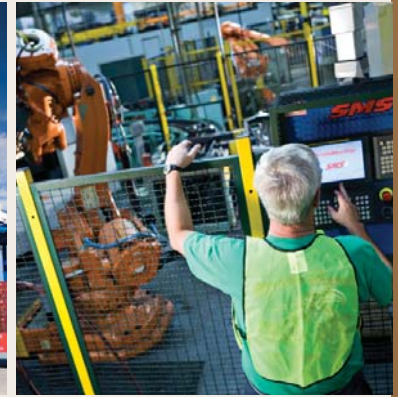


2011 North Carolina Economic Index



A Summary of North Carolina's Economic
Strengths, Challenges and Opportunities

Includes an overview of the recent economic recession

2011 North Carolina Economic Index

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for the design and layout of this document.*

June 2011

NORTH CAROLINA

DEPARTMENT OF COMMERCE



North Carolina Department of Commerce

Policy, Research, and Strategic Planning Division

Beverly Perdue, Governor

J. Keith Crisco, Secretary
Dale Carroll, Deputy Secretary

June 2011

Dear Economic Development Allies:

The North Carolina Department of Commerce believes long-term economic development is predicated on the implementation of a set of strategies to develop North Carolina's capacity for sustained economic growth. The 2011 North Carolina Economic Index is a tool designed to assist state leaders and economic development professionals with identifying, understanding and capitalizing on North Carolina's strengths, addressing its weaknesses, and developing future economic opportunities.

The Index provides a detailed and objective snapshot of the state's economy based on 16 indicators and 53 specific measures. Using the most recent available data at time of publication, the report focuses on North Carolina's performance against six comparison states (Georgia, Massachusetts, Michigan, Pennsylvania, South Carolina and Virginia) and the United States as a whole. Additionally, many indicators and measures provide data for the different regions of the state.

In addition to specific economic data, the report provides information on how indicator results may guide state economic development planning. The report's policy implications serve as a call to action for economic development professionals and policymakers throughout North Carolina. The Index also provides an overview of key economic trends by showing changes over five years. Finally, the Index explores the recession's impacts on North Carolina's economy and how it has affected trends within the State.

Handwritten signature of J. Keith Crisco in black ink.

J. Keith Crisco
Secretary

Handwritten signature of Dale Carroll in black ink.

Dale Carroll
Deputy Secretary

Handwritten signature of Stephanie McGarrah in black ink.

Stephanie McGarrah
Assistant Secretary

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WHAT IS THE 2011 NORTH CAROLINA ECONOMIC INDEX?

The 2011 North Carolina Economic Index is a tool created to assist the State's economic development leaders in capitalizing on North Carolina's economic strengths and addressing its weaknesses. The Index provides a snapshot of how the state is performing based on 16 economic indicators and 53 specific measures. Using the most current data available at the time of publication, the indicators track North Carolina's performance over time to provide an objective, long-term evaluation of the State's economy. North Carolina is compared to six states (Georgia, Massachusetts, Michigan, Pennsylvania, South Carolina and Virginia) and the United States as a whole. Comparison states were selected based on the following characteristics: Georgia, South Carolina and Virginia represent Southeastern geographic competitor states; Michigan and Pennsylvania are comparable manufacturing states; and Massachusetts is a leading technology state.

The Index also includes an analysis section on the impact of the recent recession on North Carolina workers, businesses, industries and families. Key measures evaluated include: state and national unemployment rate; county unemployment; industry employment; foreclosures; and home sales. In this section, each measure analyzes data from December 2007, the official start of the recession, to the latest month data is available, January 2011. Even though the national recession officially ended in June 2009, its impacts are still being felt.

SUMMARY OF INDICATOR FINDINGS

The 16 economic indicators fall into six broad economic categories: Demographic Change; Transitioning Economy; Productivity; Global Economy; Innovation; and Shared Prosperity. Highlighting the complex and interrelated nature of the State's economy, many of the indicators could easily fall into several of the categories. Each category plays a prominent role in North Carolina's economy and affects almost every economic outcome. Together, the indicators form a broad foundation for understanding North Carolina's economic strengths, weaknesses, challenges and opportunities.

Demographic Change: Many economic indicators, such as unemployment rates or output growth, are hard to predict in the long-term. Demographic developments are different. Although demographic surprises occur, major trends tend to build slowly and are discernible in advance.¹ North Carolina's changing demographic landscape is no exception. As North Carolina experiences demographic change, economic development professionals will need to ensure that the state labor force has the right mix of skills, appropriate business and social services are available, and necessary infrastructure such as roads, utilities, and schools are in place.

- **North Carolina is the 10th largest state.** North Carolina currently ranks as the 10th largest state in the country with a population of 9,535,483 according to the 2010 U.S. Census. Since the 2000 Census, the State experienced a population growth of over 18 percent. A major reason for the State's population growth is the significant increase in people migrating from other regions of the United States or foreign countries.
- **U.S. and North Carolina labor force has declined since 2005.** Since 2005 the Nation has experienced a decline in the labor force. Similarly, North Carolina's labor force has declined by 2.1 percent between 2005 and 2010. Nearly 58 percent of North Carolina's population is between the ages of 20 and 64, and workers aged 55 and above constitute a growing segment of the workforce. On January 1st of 2011, the oldest of the Baby Boomer generation began turning 65.² Every day since then and for the next 19 years, about 10,000 more people will turn 65. This segment of the population is also increasingly visible in the workforce, boosting their labor force participation rate from 33.6 percent in 2000 to 38.2 percent in 2010.

Transitioning Economy: North Carolina's economy is transitioning from traditional labor-intensive industries (e.g. textiles, furniture, etc.) to knowledge-based or service-related industries. While this transition is not new, the recession has served to accelerate the transformation. The transition of North Carolina's economy suggests the need to continue workforce training and redevelopment opportunities for displaced manufacturing workers. Employment trends should be used to gauge which industries are growing or contracting and to determine resource allocation for infrastructure improvements, workforce development, and may be used for developing targeted economic incentives.

¹ Little, Jane Sneddon and Triest, Robert K. "Seismic Shifts: The Economic Impact of Demographic Change. An Overview." Federal Reserve Bank of Boston, Conference Series 46. June 2001.

² Passel, Jeffrey and D'Vera Cohn. (2008). Baby Boomers Approach Age 65 – Glumly: Survey Findings About America's Largest Generation [Executive Summary]. Pew Research Institute. <http://pewresearch.org/pubs/1834/baby-boomers-old-age-downbeat-pessimism>

- **North Carolina employment is concentrated in four industries.** Ranked by employment size, North Carolina's four largest industries are: government; health care and social assistance; retail trade; and manufacturing. These industries account for more than 55 percent of employment in the State. Like most of the country, employment in manufacturing is significantly declining. The manufacturing industry has lost over 137,000 workers since 2005.
- **Occupations with the most workers often pay low wages.** The top five North Carolina occupations in terms of employment are: office and administrative support; sales; food preparation and serving; production; and transportation and materials moving. Each of these occupations earns less than \$31,000 annually. While managerial, professional and technical occupations in the state are growing significantly, the vast majority of these jobs are located in North Carolina's urban regions.
- **Health care occupations are growing across North Carolina.** All seven of the State's economic development regions are experiencing significant growth in community and social services occupations, health care support occupations, and health care practitioners and technical occupations.

Productivity: Productivity represents the amount of output per unit of input. In general, as labor productivity increases output grows. It also provides a direct measure of a state's competitive position over time. State output, measured by real gross domestic product (Real GDP), is the monetary value of all goods and services performed in a state adjusted for inflation. A productive labor force and an efficient energy system are two key factors in North Carolina's ability to sustain economic output and promote future growth. New economic development projects, the expansion of existing businesses, and increased production are impacted by the cost, availability and reliability of energy.

- **North Carolina's Real GDP grew faster than U.S.** North Carolina's Real GDP growth rate between 2004 and 2009 exceeds that of the Nation and all comparison states except Virginia. The government was the leading contributor to the State's Real GDP in 2009, followed closely by finance and insurance, real estate and rental and leasing, and nondurable goods manufacturing.
- **North Carolina labor productivity is growing faster than U.S.** The State's labor productivity is growing faster than the U.S. average. North Carolina's growth in labor productivity is driven by a variety of industry sectors across different segments of the economy. Innovation and technology are key determinates of labor productivity growth.
- **North Carolina continues to be a leader in competitive industrial electricity prices.** However, to remain competitive, North Carolina must continue to invest in new, efficient energy sources. To this end, North Carolina has enacted a Renewable and Efficiency Portfolio Standard (REPS). In 2009 North Carolina's percent renewable production, including hydroelectric, was below the national average but above all competitor states except Massachusetts.

Global Economy: An important indicator of economic health is the degree to which a state is engaged in the global economy. Globalization will only increase in the foreseeable future, so economic development professionals should work to ensure North Carolina continues to engage in the global economy. North Carolina's long-term economic growth depends on expanding and diversifying exported industry sectors. The State's ability to compete for national and international export markets is critical for the retention and growth of employment opportunities. Foreign direct investment (FDI) is an important indicator of a state's ability to attract foreign investors and is one of the key determinates of a region's ability to attract new technologies, capital, workforce skills, global connections and job opportunities.

- **North Carolina's dollar value of exports continues to grow.** Canada remains the State's top export destination, but exports to China are experiencing the most growth. North Carolina's top two export commodities are chemicals and machinery.
- **Foreign direct investment has increased.** FDI inflows to North Carolina grew 5.9 percent from 2006 to 2007. The vast majority of FDI in the State comes from Europe. Asian countries are also very interested in North Carolina, with Japan topping the list in FDI. Approximately 206,000 workers in North Carolina are employed by foreign owned companies.

Innovation: The creation and adoption of new products, services and business models is a fundamental driver of the State's economic and social prosperity in the 21st century. A vibrant entrepreneurial economy is typically characterized by a high rate of business turnover, including both firm openings and closings. Investments in research and development (R&D) increase productivity, boost economic growth, generate new products and processes, and improve the quality of people's lives. Available venture capital to companies is a predictor of potential new products and services, job creation and revenue growth in a state.

- **Amount of venture capital in North Carolina is increasing.** North Carolina's share of national venture capital increased from 1.3 percent in 2009 to 2.1 percent in 2010.
- **Education services sector had high number of firms.** Looking at firms of all sizes and all ages, North Carolina's economic sector with the most firms in 2008 was the Education Services industry sector, with 15 percent of the total share of firms.
- **Academic R&D is concentrated in Research Triangle.** Academic R&D, a critical innovation input and one of the State's competitive advantages, is highly concentrated in the Research Triangle Regional Partnership (RTRP) region. In 2009, the three largest universities located in the Research Triangle area – UNC-Chapel Hill, Duke University, and North Carolina State University – accounted for over \$1.8 billion, or 85 percent, in academic R&D expenditures within North Carolina.
- **Several counties received large amounts of DOD contracts.** Ten North Carolina counties received in excess of \$1 million dollars in federal R&D contracts from the Department of Defense in 2010.

Shared Prosperity: North Carolina's economic transformation has brought many benefits to the State – new jobs and opportunities, international recognition as a business location, and rapid population growth – but it has not been painless and many successes have not been widely - shared. Healthy economies generate opportunities for individuals and households to increase incomes. As the State continues its economic transition, economic development leaders must continue to focus on expanding high wage industries and dedicate resources to provide training opportunities and improve the education levels of the labor force for people across North Carolina.

- **Percent of North Carolina population with bachelor's degree or higher is increasing faster than U.S.** The State is improving faster than the national average in the percent of the population 25 years of age or more (25+) having a bachelor's degree or higher education. However, North Carolina was equal to the national average with 43 percent of the State's citizens not pursuing formal education beyond high school.
- **North Carolina's median household income is 84 percent of U.S. average.** North Carolina's median household income is the second lowest among the comparison states. The State's urban economic development regions (Research Triangle, Charlotte, and Piedmont Triad) have the highest average weekly wages.
- **Per capita income differs for rural and urban areas.** Per capita income across counties shows relatively stark differences between rural and urban parts of North Carolina. Mecklenburg, Wake and Orange counties have the highest concentration of wealth.
- **Many North Carolinians do not have health insurance.** Nearly 18 percent of North Carolinians less than 65 years of age were not covered by health insurance between 1999 and 2009. In 2009 only 54 percent of businesses with fewer than 100 employees offered health insurance to their employees in North Carolina.

CONCLUSION

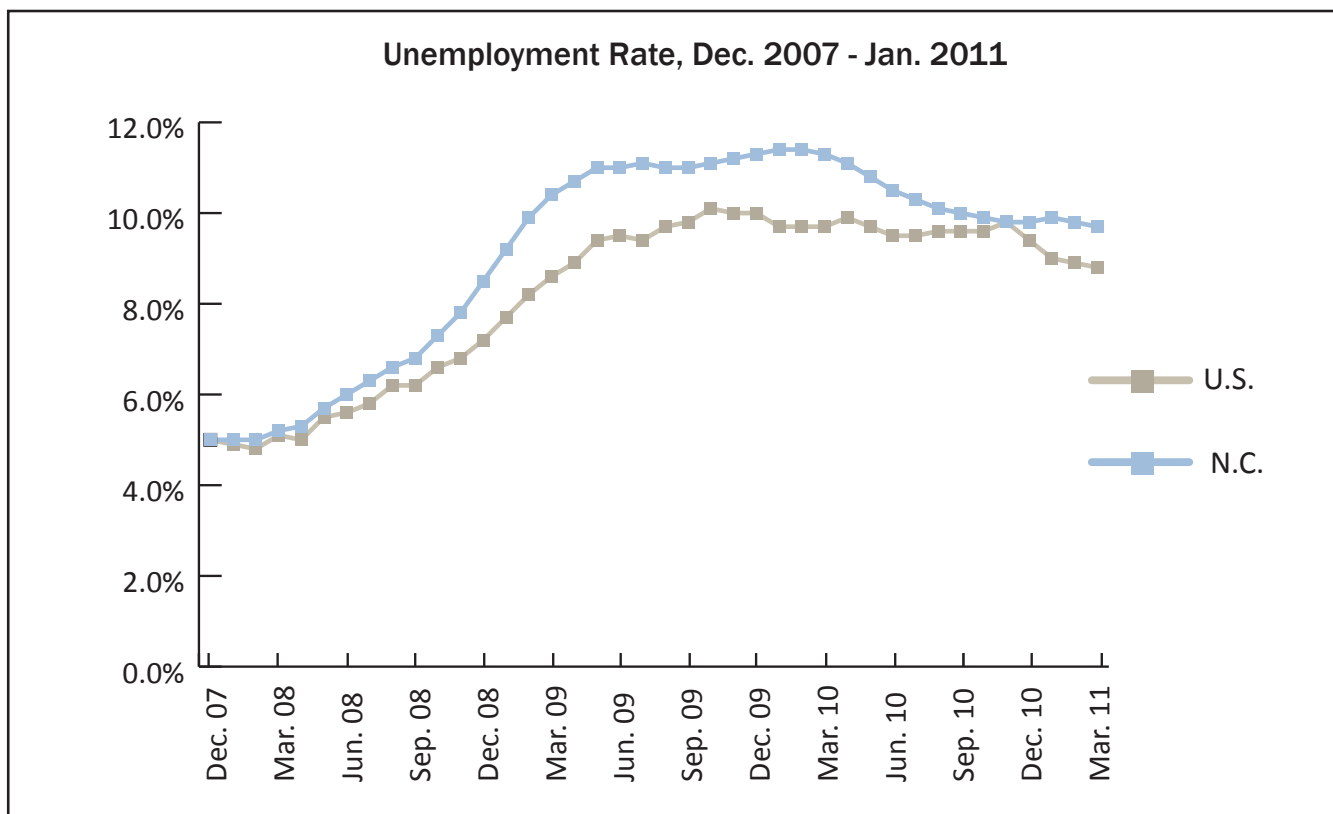
Economic development is a long term investment in the future of North Carolina. In the short-term, the State faces a set of historical economic challenges the Department of Commerce and the economic development community must move to address. However, to remain competitive, North Carolina must not lose sight of its long-term strengths, challenges and opportunities. The State continues to attract people and businesses, and the productivity of its labor force continues to improve. North Carolina's economic success is evident in the increase of the State's Real Gross Domestic Product, its ability to create new firms (small and large) and its expanding export market. These successes are significant, but challenges remain. Despite significant historical investment in education, North Carolina must continue to strengthen its "human capital" through basic education and workforce development. Also, economic opportunity for all North Carolinians, regardless of income level or geographic location, should continue to be an essential goal of the State's economic development policy. This Index can be used to help North Carolina's economic development leaders make policy and resource allocation decisions to leverage the State's successes and mitigate its challenges.

OVERVIEW OF THE RECENT ECONOMIC RECESSION

Similar to the global and national economies, North Carolina is recovering from a recession. According to the National Bureau of Economic Research, the United States entered a recession in December 2007. Employment numbers suggest North Carolina followed in February 2008. Employment and production continued to fall throughout 2008 and 2009. In late 2009 the economy started to stabilize and begin a slow recovery with the official end of the national recession being June 2009. The end of the recession marks the low point in the economic decline, it does not mark a return to pre-recession economic levels. According to several key economic indicators, the economy is showing signs of returning to pre-recession levels, but the path will be long. The following overview analyzes the impact of the recent recession on unemployment rates, industry employment trends, state employment trends, household finances, and the housing market.

UNEMPLOYMENT RATES AND INDUSTRY EMPLOYMENT TRENDS

After the recession started in December 2007, North Carolina's unemployment rate jumped from 5.0 percent to a high of 11.4 percent on a seasonally adjusted basis in February 2010. Over the same time period, the Nation's unemployment rate increased from 5.0 percent to 10.1 percent.

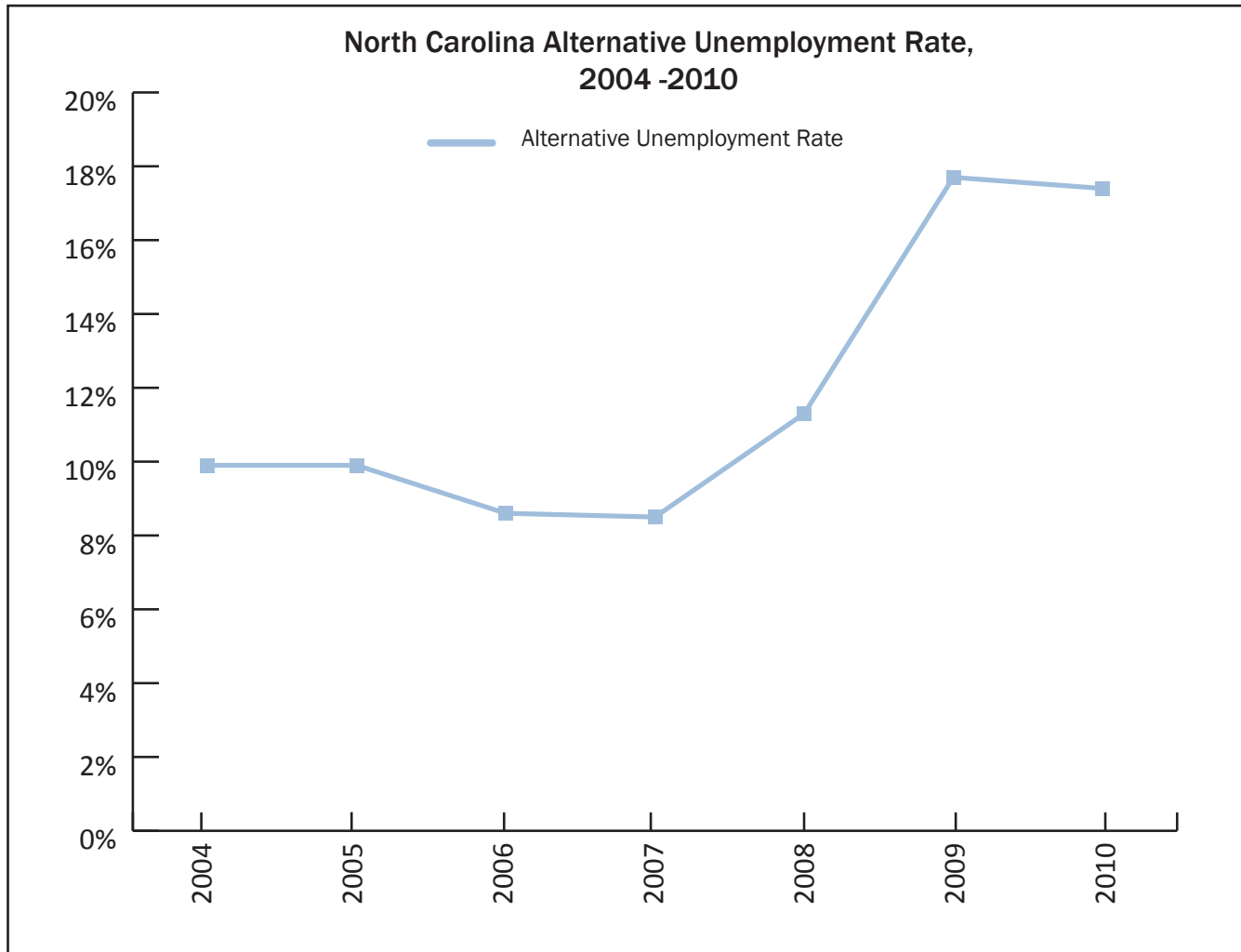


N.C. Employment Security Commission

North Carolina's unemployment rate started to fall after February 2010 to the current level of 9.7 percent (March 2011). The drop in the unemployment rate of 1.7 percentage points is significant, but the largest contributing factor was the shrinking of the labor force, not the employment of additional workers. While employment has increased by 6,200 during this time, the labor force (people working or actively looking for work) has decreased by nearly 79,000. The magnitude of the labor force reduction far exceeds that of employment increases. These two factors have worked together to reduce the number of people considered unemployed by 85,000. As public perception of the job market improves, the size of the labor force will likely increase as more people begin to actively look for jobs. In general, this influx is likely to increase not only the size of the labor force but also the number of people considered unemployed. Therefore, improvement in the job market may correspond with a temporarily static or even increasing unemployment rate.

OVERVIEW OF THE RECENT ECONOMIC RECESSION

In addition to considering the size of the labor force with the traditional unemployment rate, an alternative measure of unemployment exists. This measure captures more than people working and those actively searching for work. An alternative unemployment rate³ can be used that includes both marginally attached workers and workers who work part-time for economic reasons. Marginally attached workers are workers that have looked for employment in the last 12 months, but haven't searched for work in the last 4 weeks. Workers that work part-time for economic reasons are workers that are working less than 35 hours a week and desire full time employment, but cannot find full time employment. The graph below shows the U6 unemployment rate for North Carolina from 2004 to 2010. Note that the U6 unemployment rate has not experienced the same decline seen in the "regular" unemployment rate from 2009 to 2010. All years comprised of the average of the previous four quarters.



U.S. Bureau of Labor Statistics

³ The alternative unemployment used in this analysis is more formally known as U6, calculated by the Bureau of Labor Statistics on a quarterly basis.

OVERVIEW OF THE RECENT ECONOMIC RECESSION

Employment impacts related to the current recession are not equally distributed among all industries.⁴ However, job losses are occurring in both traditional and knowledge-based sectors. According to the following table, nonfarm employment⁵ in North Carolina decreased 7.4 percent (-308,100 jobs) between December 2007 and January 2011. Nearly a third (99,300) of the nonfarm jobs lost since December 2007 were in the Manufacturing industry. Only Government and Education & Health Services have added employment since the start of the recession. In the last four months industry employment has shown improvement with 4 sectors adding a total of 16,000 jobs.

North Carolina Nonfarm Employment Trends by Industry

Industry Sectors	Jan. 11 Employment	Since Start of Recession (12/07 - 01/11)		Last 4 Months (09/10 - 01/11)	
		Change	% Change	Change	% Change
Mining & Logging	5,700	(1,200)	-17.4%	(200)	-3.4%
Construction	165,800	(85,900)	-34.1%	(5,500)	-3.2%
Manufacturing	433,100	(99,300)	-18.7%	500	0.1%
Trade, Transportation, & Utilities	719,800	(60,300)	-7.7%	5,700	0.8%
Information	68,000	(4,200)	-5.8%	(3,200)	-4.5%
Financial Activities	202,100	(10,100)	-4.8%	2,800	1.4%
Professional & Business Services	489,000	(17,600)	-3.5%	7,600	1.6%
Education & Health Services	533,600	800	0.2%	(11,100)	-2.0%
Leisure & Hospitality	390,900	(14,200)	-3.5%	(3,000)	-0.8%
Other Services	156,900	(18,600)	-10.6%	(2,400)	-1.5%
Government	696,500	2,500	0.4%	(31,500)	-4.3%
Total Nonfarm Employment	3,861,400	(308,100)	-7.4%	(40,300)	-1.0%

U.S. Bureau of Labor Statistics

Since the start of the recession, three industry sectors accounted for nearly 80% of the job loss by sector in North Carolina: Manufacturing (-99,300); Construction (-85,900); and Trade, Transportation and Utilities (-60,300). Industries that experienced modest employment losses (between 5,000 and 20,000) include Other Services, Professional and Business Services, Leisure and Hospitality, and Financial Activities. Education & Health Services and Government both experienced slight employment growth. However, over the last four months these two sectors have experienced the largest job losses, -11,100 and -31,500 respectively.

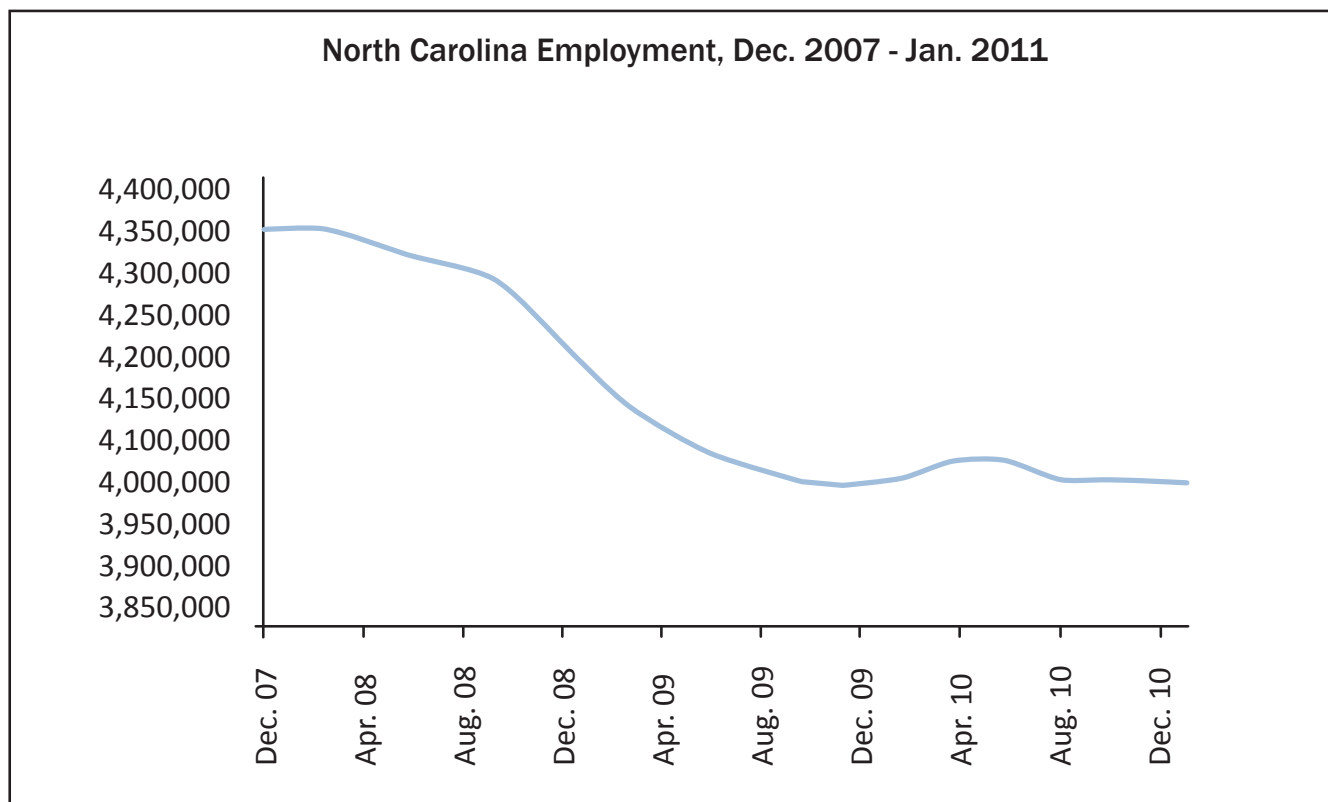
⁴ Industry employment data from the U.S. BLS is considered total employment (full, part time, and temporary).

⁵ Total number of paid workers of any business, excluding the following employees: proprietors, the unincorporated self-employed, unpaid volunteer or family workers, farm workers, and domestic workers. Government employment covers only civilian employees; military personnel are excluded. The total non-farm payroll accounts for approximately 80% of the workers who produce the entire gross domestic product of the United States. (U.S. BLS)

OVERVIEW OF THE RECENT ECONOMIC RECESSION

OVERALL STATE AND LOCAL EMPLOYMENT

An analysis of employment by industry sector excludes a significant portion of the population - such as proprietors, unincorporated self-employed, unpaid volunteer or family workers, farm workers, and domestic workers, who are not included in the sector employment count. To give a full overview of state and local employment, this section examines the total number of people employed in the State of North Carolina. From December 2007 to January 2011 more than 309,000 people lost their jobs. Most of job loss occurred between December 2007 and December 2009. Since December 2009 employment has slowly increased. The largest employment increase since the onset of the recession peaked in April 2010 and was the result of hiring temporary workers for the 2010 Census.

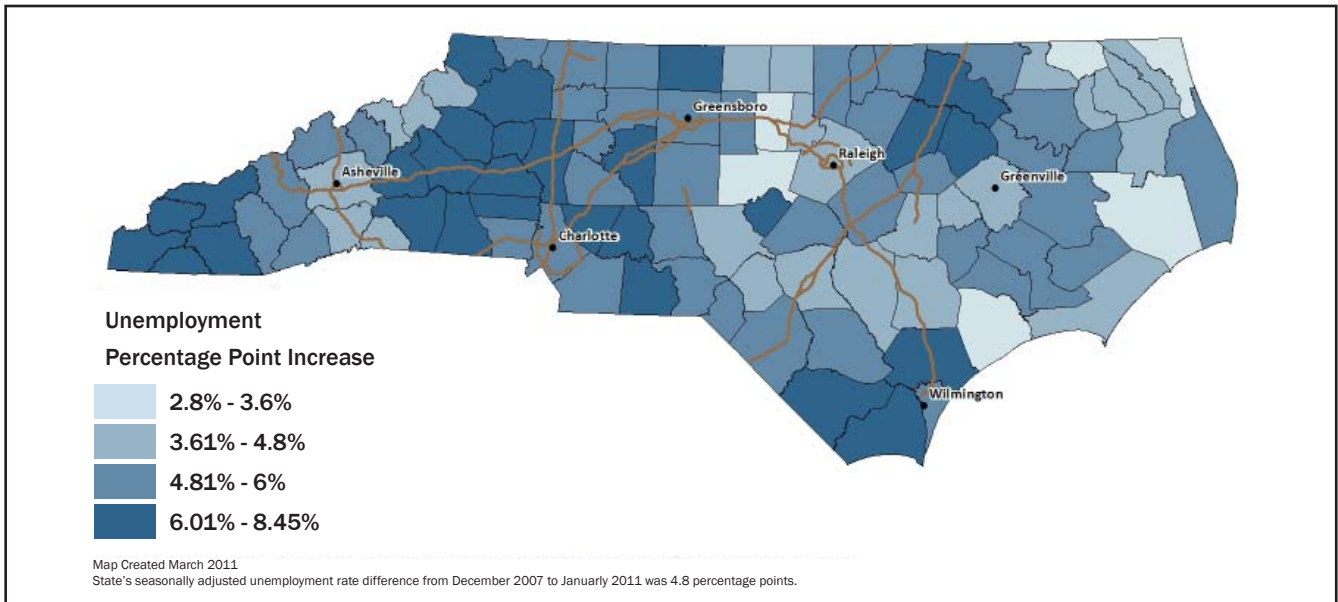


N.C. Employment Security Commission

In many communities across the State, workers continue to struggle to find jobs. In January 2011, the 12 month average unemployment rate for each county in North Carolina was an average of 5.4 percentage points higher than it was in December 2007 at the start of the recession. This does not count “discouraged” workers who want jobs, but have not looked for employment in the last 4 weeks.

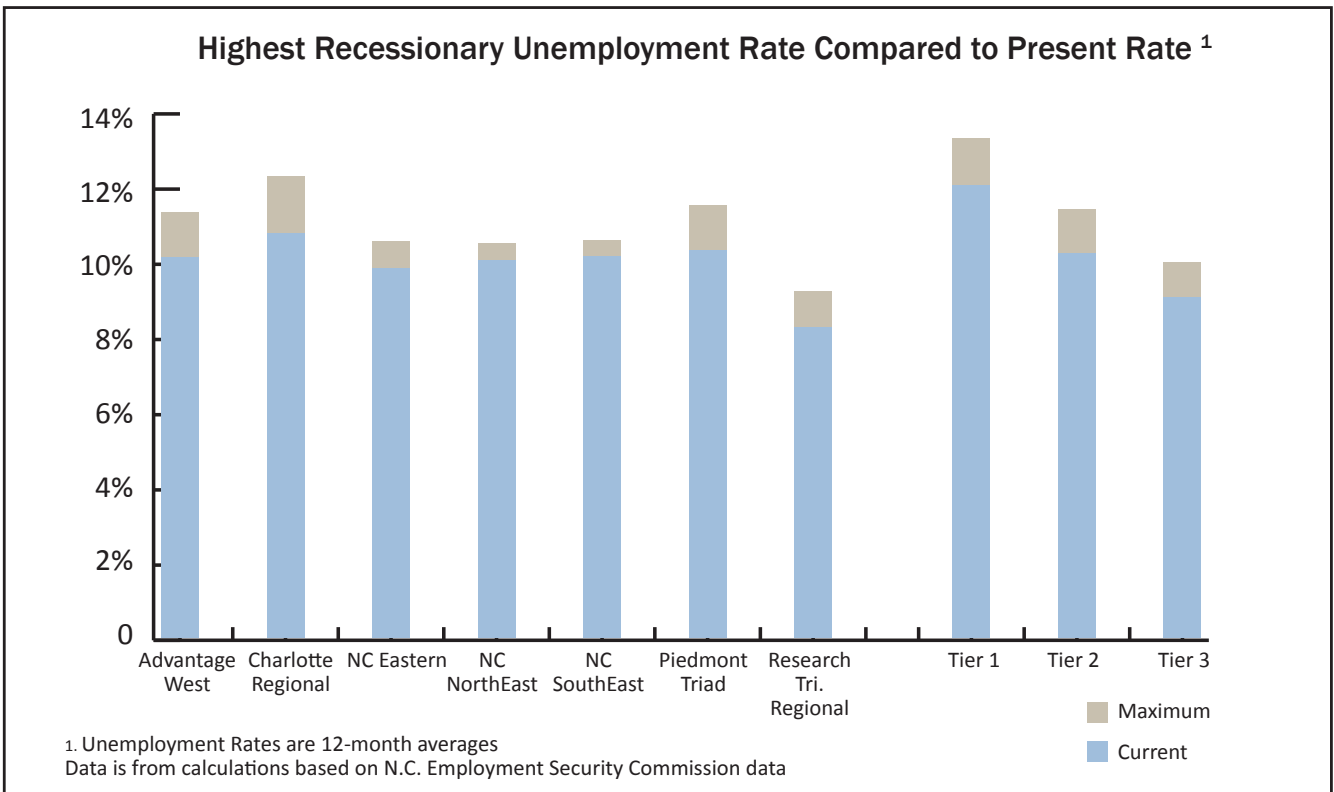
OVERVIEW OF THE RECENT ECONOMIC RECESSION

Percentage Point Change in 12 Month Unemployment Rate Average from Dec. 2007 to Jan. 2011



Source: Calculations based on N.C. Employment Security Commission data

Not all areas experienced the same change in unemployment over the course of the recession. The following graph shows the economic development regions and tier unemployment rates at their recessionary high and current levels. Unemployment has not declined significantly since its peak during the recession. All categories experienced their unemployment rate peak in March of 2010 except for the NC Southeast region and the Tier 3 counties, which experienced their highest unemployment rate in April 2010. Tier 1 counties experienced the highest peak unemployment rate, 13.3 percent. The RTRP region had the lowest rate, while the Charlotte region has experienced the largest post-recession decline, 1.5 percentage points.



OVERVIEW OF THE RECENT ECONOMIC RECESSION

HOUSEHOLD FINANCES AND THE HOUSING MARKET

Not surprisingly, the recession and associated loss of jobs significantly impacted families. Household finances were negatively impacted by the simultaneous decline in wealth associated with the decrease in housing and stock values and deterioration in the job market. According to the latest forecasts prepared by Dr. Michael Walden, the William Neal Reynolds Distinguished Professor of Economics at North Carolina State University, income and consumer spending declined significantly during the recession and continues to be an issue. While the downward trend was less pronounced in the latter half of 2010, it is expected to continue for the near future. The decreased consumer wealth continues to have a depressing effect on retail sales. "Sales in 2010 are tracking sales in 2009 but are still well below those in the pre-recessionary year of 2007."⁶

A key driver of the recession was the housing market. The "housing bubble" built up earlier this decade ultimately led to the "housing bust" of plummeting sales and weak prices over the past four years. In 2010, there were over 48,000 foreclosure filings in the State, an increase of nearly 31 percent from the year before.⁷ On a positive note, home foreclosures in North Carolina for December 2010 through February 2011 were all lower than their levels from a year ago. The number of home foreclosure notices in December declined 15 percent from the same month a year ago.

Recently released data from the North Carolina Association of Realtors shows home sales in February 2011 are up 2 percent from the year before (4,782 units sold compared to 4,687). In fact, since the beginning of 2010, the only months where home sales were below the level from the same month in the previous year was from July 2010 to November 2010.

Existing Home Sales in North Carolina

	Jul. 10	Aug. 10	Sep. 10	Oct. 10	Nov. 10	Dec. 10	Jan. 11	Feb. 11
Units Sold	6,772	6,533	6,219	5,712	5,387	6,507	4,750	4,782
% Change Prev. Month	-28.8%	-3.5%	-4.8%	-8.2%	-5.7%	20.8%	-27.0%	0.7%
% Change Year Ago	-19.0%	-15.7%	-16.1%	-26.7%	-28.3%	10.2%	8.2%	2.0%

N.C. Association of Realtors

CONCLUSION

The impacts of the recent recession are still being felt and significant economic challenges confronting the state will continue for the foreseeable future. Existing economic development efforts and programs designed to help address recession related issues, such as the heightened unemployment rate, job losses in key statewide industries, and weak housing sales are increasingly important. Still, North Carolina must not lose sight of its long-term economic strengths, challenges and opportunities. The long-term impacts resulting from solutions created to deal with short-term problems should be strongly considered before any decisions are made. While the overall impacts of the recession are unquestionably damaging to North Carolinians, it provides North Carolina with the opportunity to realign resources and programs. The State has the potential to exit the economic crisis stronger and in a more competitive position, both nationally and globally.

⁶ Dr. Michael L Walden. "The North Carolina Economic Outlook." Winter 2010.

⁷ Data from Realty TRAC

INDICATOR 1: POPULATION

Key Findings

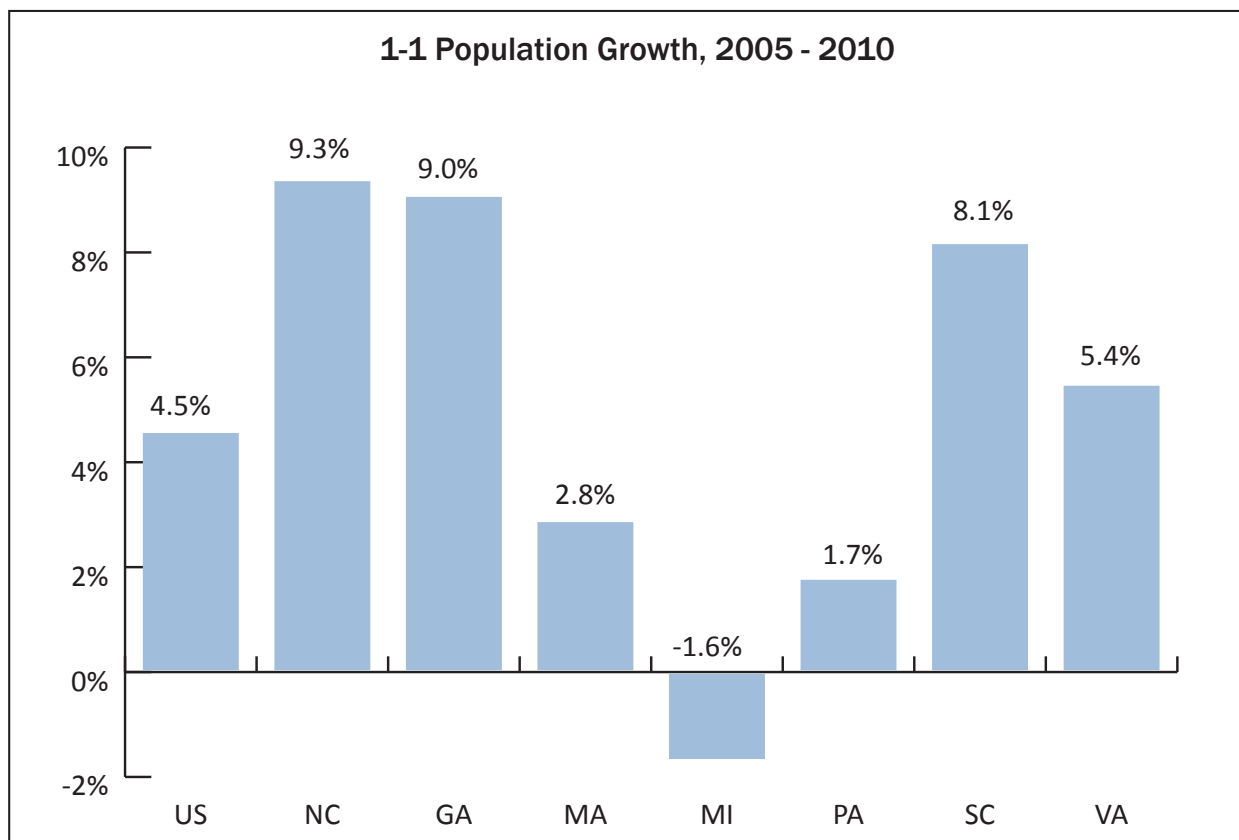
- North Carolina ranks as the 10th largest state in the United States with a population of 9,458,888.
- Since 2005, the State experienced the highest growth rate (9.3 percent) among comparison states.
- The State's population growth is primarily due to net migration. Fifty percent of the growth is attributable to individuals moving to North Carolina from other states.
- From 2000 to 2009, all seven economic development regions in North Carolina demonstrated positive population growth.
- Net migration is the leading factor contributing to population growth in all regions except for the Eastern and Southeast Regions.

Indicator Overview

Changes in population have social and economic implications that influence business-location decisions, infrastructure demands and service requirements. North Carolina's population experienced substantial growth over the past decade due to people moving to the State from other states or countries (positive net migration). Population growth is considered an indication of economic opportunity as people often move to regions where there are jobs.

How Does North Carolina Perform?

North Carolina is ranked as the 10th largest state in the country with a resident population total of 9,458,888. The State recorded the highest rate of growth (9.3 percent) among comparison states during the 5-year period ending in 2010 [1-1]. The state's population growth rate was more than two times the national average. Georgia, South Carolina and Virginia, all Southeastern states, experienced population growth in excess of 5 percent over the same time period.



U.S. Census Bureau

INDICATOR 1: POPULATION

Between 2000 and 2009, North Carolina's population increased by more than 1.3 million [1-2]. Three components make up population growth: 1) natural growth - the excess of births over deaths; 2) in-migration - the movement of people from another state to North Carolina; and 3) immigration - the movement of people from outside the country to North Carolina.⁸ North Carolina's population growth is due primarily (66.0 percent) to net migration (people who moved into N.C. less those who moved out). Most of this growth (85 percent) occurred in counties linked to a municipality of at least 50,000 people. Sixteen percent of the overall growth is attributable to immigration and 50 percent is attributable to individuals moving to North Carolina from other states.

Over the same time period, all seven economic development regions in North Carolina demonstrated positive population growth. The Charlotte and Research Triangle regions each experienced an increase in population of more than 445,000 people [1-2]. These two regions account for 67 percent of the State's population growth (902,455 people). Net migration is the leading factor contributing to population growth in all regions except for the Eastern and Southeast Regions.

1-2 County Population Change by NC Economic Development Regions, 2000-2009⁹

Region	Population Change	% Natural Increase	% Net Migration
Advantage West	73,779	5.9%	94.1%
Charlotte Region	445,830	30.3%	69.7%
Eastern Region	71,443	78.9%	21.1%
Northeast Region	17,602	25.0%	75.0%
Southeast Region	117,745	51.6%	48.4%
Piedmont Triad Region	164,492	37.3%	62.7%
Research Triangle Region	456,625	29.7%	70.3%
North Carolina Total	1,347,516	34.0%	66.0%

U.S. Census Bureau

The United States' population is aging. On January 1st of 2011, the oldest of the Baby Boomer generation began turning 65. Every day since then and for the next 19 years, about 10,000 more will cross that threshold daily.¹⁰ North Carolina's population age breakdown nearly matches the United States, implying the Baby Boomer retirement trend will impact the State similarly to the US as a whole [1-3]. In 2009 in North Carolina, Baby Boomers accounted for an estimated 2.4 million people, or 26% of the State's total population. As this segment of the population ages, smaller, more recent generations will be required to support a growing elderly population. However, the State's workforce should remain a robust size for the next several decades, considering more than half (53%) of North Carolina's population is between the ages of 25 and 64 and the rate of people migrating in from other states ranks 7th in the nation. Proportionally, Pennsylvania's "65 years and older" population is the highest among comparison states while Georgia's is the lowest.

⁸ Walden, Michael L. North Carolina in the Connected Age: Challenges and Opportunities in a Globalizing Economy. Chapel Hill, NC: University of North Carolina Press, 2008.

⁹ The domestic migration measured at the county level includes movement from any U.S. County to another. Therefore, migration between counties in the same economic development region will be counted as domestic migration.

¹⁰ Passel, Jeffrey and D'Vera Cohn. (2008). Baby Boomers Approach Age 65 – Glumly: Survey Findings About America's Largest Generation [Executive Summary]. Pew Research Institute. <http://pewresearch.org/pubs/1834/baby-boomers-old-age-downbeat-pessimism>.

INDICATOR 1: POPULATION

1-3 Percent of Population by Age Group, 2009

	Under 24 years	25 to 44 years	45 to 64 years	65 years and over
United States	34%	27%	26%	13%
North Carolina	34%	27%	26%	13%
Georgia	33%	26%	22%	9%
Massachusetts	28%	24%	24%	12%
Michigan	30%	22%	24%	12%
Pennsylvania	27%	22%	24%	13%
South Carolina	30%	23%	23%	12%
Virginia	30%	25%	23%	11%

U.S Census Bureau

What Does this Mean for North Carolina Economic Development?

The relationship between economic development and population growth is strong. North Carolina will experience population growth from individuals moving from other states or countries if employment opportunities continue and the State maintains a high quality of living. To meet the needs of an expanding economy, economic development professionals will need to continue to focus on strategic workforce planning to ensure the State has an appropriately sized workforce with necessary skill sets. In addition, as North Carolina's population increases, policymakers will need to continue to look for innovative ways to fund infrastructure (schools, utilities, roads/transit, broadband, water/sewer, etc.) improvements.

INDICATOR 2: LABOR FORCE

Key Findings

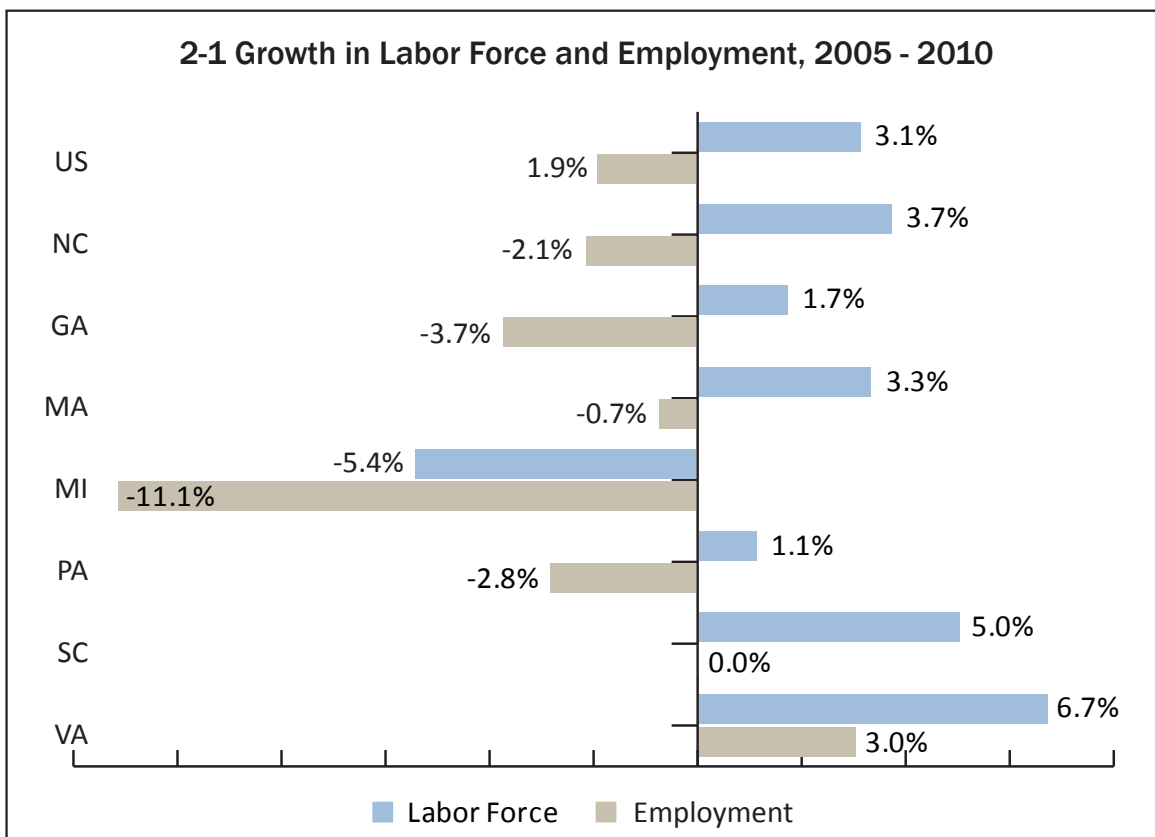
- Between 2005 and 2010, North Carolina's labor force grew 3.7 percent, greater than the United States rate of 3.1 percent. Employment fell by 2.1 percent, greater than the national average of 1.9 percent.
- North Carolina's labor force participation rate of 63 percent in 2010 is lower than the state's rate of 66 percent in 2005.
- Women make up 2.2 percentage points more of the employed population in 2009 than they did in 2005.
- Labor force participation rates among older workers (55+ years old) are increasing, but this increased participation is being offset by declining participation among younger workers (between 24 and 54 years old).

Indicator Overview

A state's labor force is defined as the number of people employed plus those seeking employment. Labor force growth can signify a positive economic outlook. The labor force participation rate is the ratio between a state's labor force and its total population. Historically, increases in labor force participation were the result of population increases associated with the "Baby Boomer" generation and women entering the workforce. Future labor force participation rates should increase as the State recovers from the recession and older workers increasingly have the ability and need to work longer in life.¹¹

How Does North Carolina Perform?

While the State's labor force grew larger, the State's employment level dropped, decreasing 2.1 percent in the last five years. This trend was not unique to North Carolina as all comparison states except Virginia and South Carolina saw a decrease in employment levels. Of the comparison states, North Carolina had the fourth lowest percent decline of employment. All comparison states had an increase in labor force except Michigan which registered a 5.4 percent decrease from 2005 to 2010. The percent increase in labor force participation in North Carolina, South Carolina, and Virginia were all above the national average. This may indicate increased desire by the labor force to work in the Southeastern United States and companies to locate in the State.



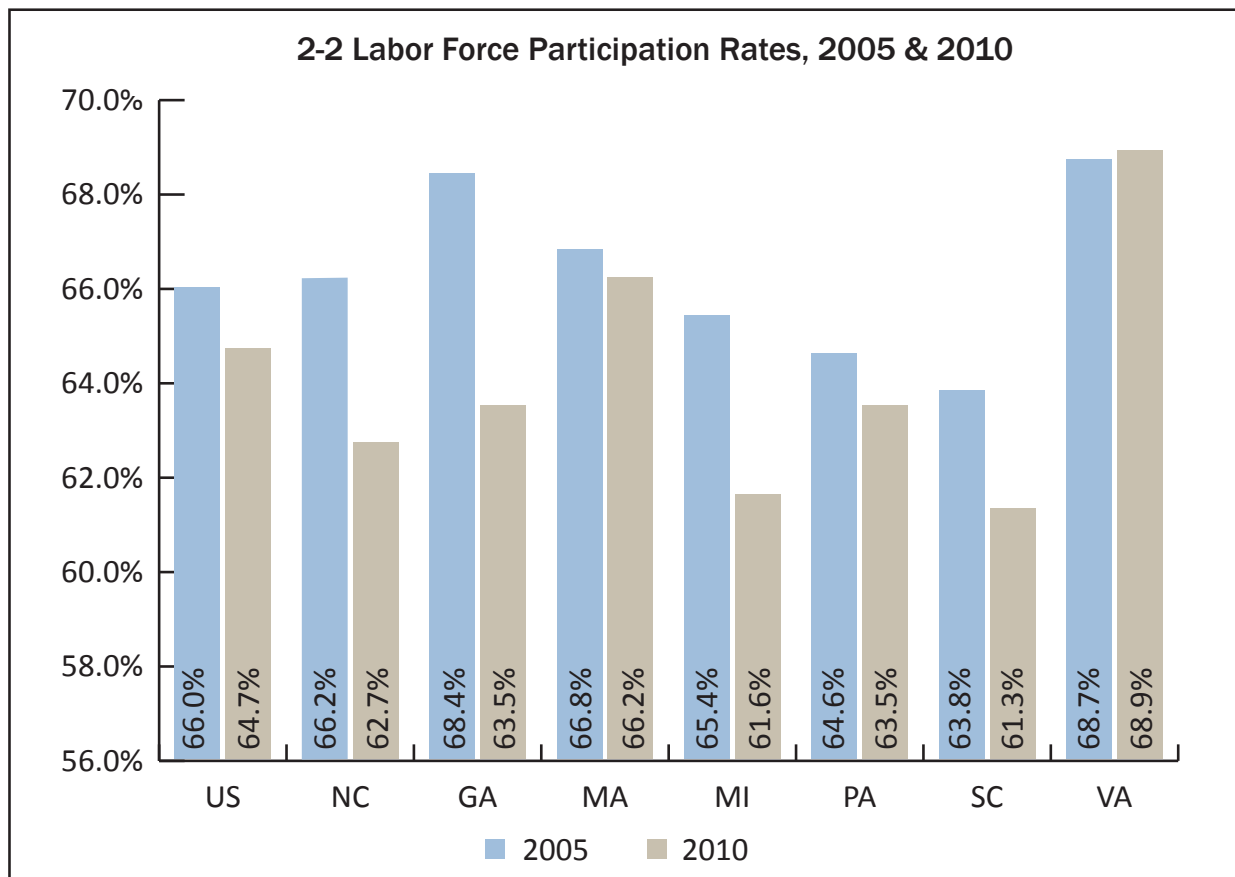
U.S. Bureau of Labor Statistics

¹¹ Mary Daly and Tali Regev, "Labor Force Participation and the Prospects for U.S. Growth", <http://www.frbsf.org/publications/economics/letter/2007/el2007-33.html#subhead2>

INDICATOR 2: LABOR FORCE

For much of the past four decades, labor force participation rates in the United States trended up, rising from less than 60 percent in the early 1960s to more than 67 percent by the late 1990s. However, after peaking in 2000, the labor force participation rate has declined steadily. The aging of the baby boom cohort is increasing the size of older age groups, which historically have lower labor force participation rates, and teenagers and young adults are remaining in school longer.¹² Both of these were exacerbated by the recession. The widespread loss of jobs and wealth forced more members of the baby boom cohort to delay retirement. The loss of jobs pushed more students to remain in school in the hopes of increasing their marketability and delaying entry into the job market until more positions were available.

Although the overall labor force has grown, labor force participation rates have declined in the United States since 2005 [2-2]. This is because the U.S. population has been growing faster than the labor force. In 2005, North Carolina's labor force participation rate was 66.2 percent; in 2010 it dropped to 62.7 percent, below the national average of 64.7 percent. Among comparison states, only Georgia and Michigan had larger percentage point drops in participation rates. Virginia was the only state to experience an increase in labor force participation between 2005 and 2010, likely due to the presence of Federal employees and contractors. The labor force participation rates for 2005 and 2010 are shown below.



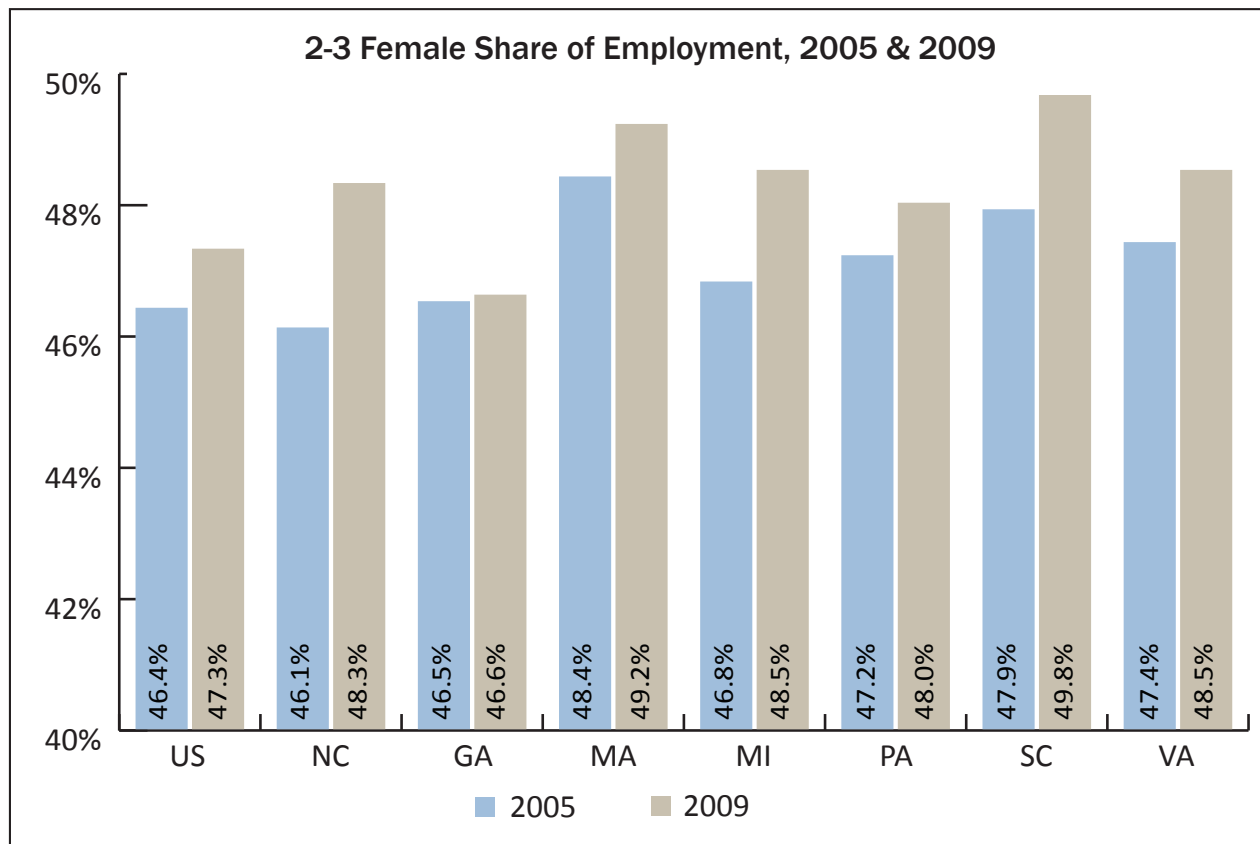
Source: U.S. Bureau of Labor Statistics

Note: The chart starts at 56 percent to better show the difference between years.

¹² Aaronson, Stephanie et al. "The Recent Decline in Labor Force Participation and its Implications for Potential Labor Supply." Division of Research and Statistics, Board of Governors of the Federal Reserve System. March 2006. http://bigpicture.typepad.com/comments/files/200603bpea_aaronson.pdf

INDICATOR 2: LABOR FORCE

In addition to the decline in labor force participation, the recent recession has changed the male-female composition of the workforce. The loss of many male dominated jobs has led many people to term the last recession as a “mancession.”¹³ This male job loss has caused women’s share of employed workers to increase, especially in North Carolina. From 2005 to 2009 the women’s share of employed workers in North Carolina has increased 2.2 percentage points, from 46.1 percent to 48.3 percent. This was the largest increase among competitor states and more than twice the percentage point increase nationally. Nationally, women’s share of employment is lower than North Carolina’s, 47.3 percent and 48.3 percent respectively. South Carolina had the next highest jump from 2005 to 2009, going from 47.9 percent to 49.8 percent. This employment shift towards women reflects the jobs the recession left behind. The economy mainly lost jobs in the construction and manufacturing fields, which tend to employ more men than women. Meanwhile, women tend to work in more “white collar” positions such as health care and education. Women have also seen higher college graduation rates in the last 10 years, another buffer against unemployment.



Source: U.S. Bureau of Labor Statistics

Note: The chart starts at 40 percent to better show the difference between years.

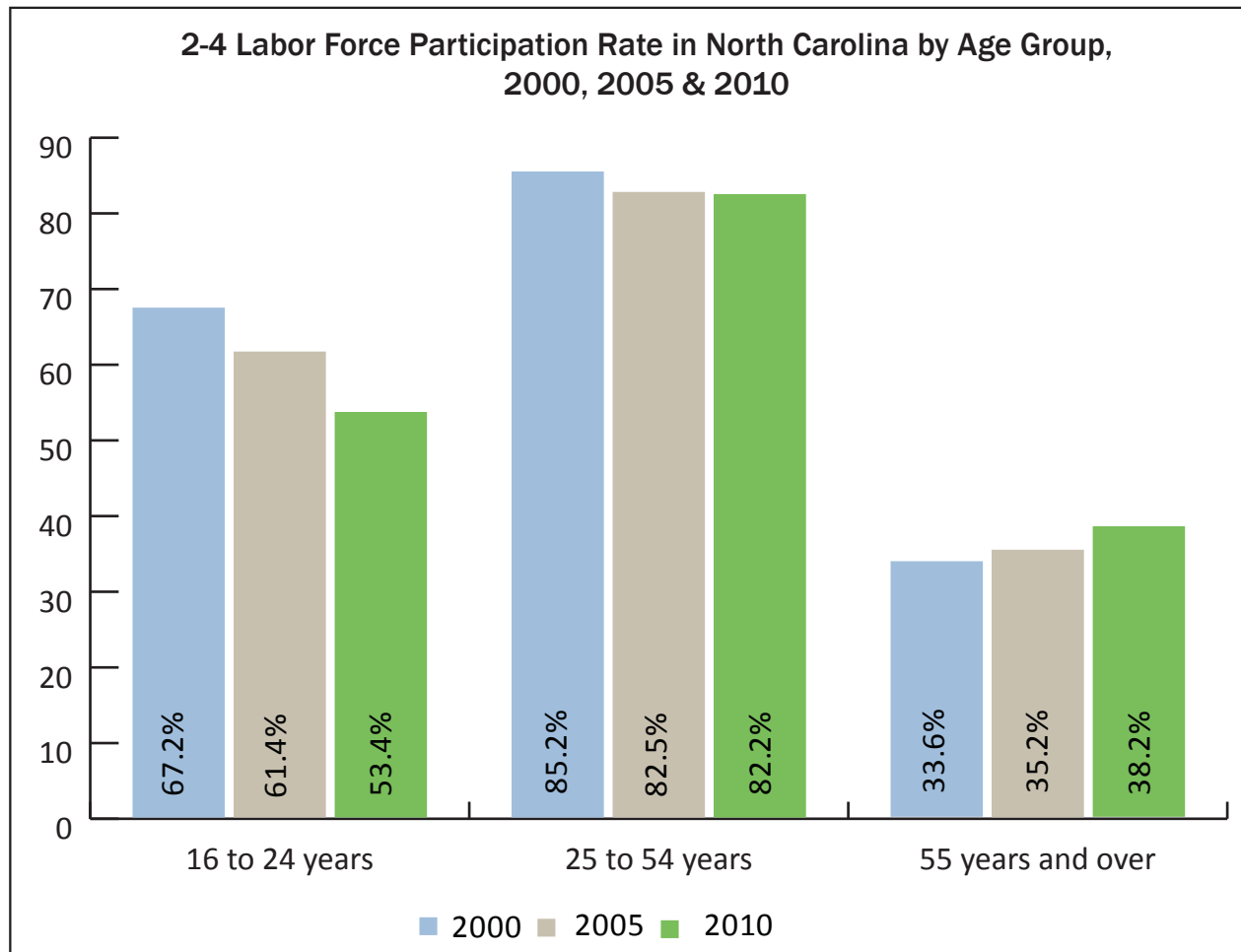
Older adults (55 years and older) usually choose to exit the workforce, but market forces and increased access to medical care have extended the working lives of many cohorts, including the Baby Boomers. This historical trend reversal for the Baby Boomer generation means they have increased their labor force participation rate. They still fall behind the rates of workers in the lower age groups, but in a slow economy those are positions that would have been filled by younger workers.¹⁴ As the population of North Carolina continues to age, the increased participation rate of older workers will cause the older labor force cohort to grow at a faster rate than before. In 2010, the percentage of workers aged 55 and above participating in the labor force was 38.2 percent, up from 35.2 percent in 2005 and 33.6 percent in 2000.

¹³ Sarah Baxter, “Women are victor in ‘Mancession’”, The Times, http://www.timesonline.co.uk/tol/news/world/us_and_americas/article6445913.ece

¹⁴ Catherine Rampell, NY Times 7/15/2010, “Seniors Outnumber Teenagers in Job Force”, <http://economix.blogs.nytimes.com/2010/07/15/seniors-outnumber-teenagers-in-job-force/>

INDICATOR 2: LABOR FORCE

This shift is made more important since the share of workers between ages 25 and 54 participating in the labor force has decreased from 85.2 percent in 2000 to 82.2 percent in 2010. The three percentage point decline in the “prime” age group, 25 to 54 years old, is smaller than the increased participation rate among those over 54 years of age. However, the “prime” group makes up the largest portion of the work force; there are 107,000 more people in the labor force over 54 years of age than there would be had the participation rate remained the same as it was in 2000. Meanwhile, the decreased participation rate by workers in the “prime” group (25 to 54) decreased their labor force participation by 111,000 people. Thus, shifting participation rates by North Carolinians 25 and older has led to a decrease of approximately 7,000 people had the participation rates remained at 2000 levels.¹⁵



Source: U.S. Bureau of Labor Statistics

What Does this Mean for North Carolina Economic Development?

The majority of North Carolina’s labor force is currently between the ages of 25 and 54. As this population segment ages, it is predicted many of these workers will stay in the labor force longer due to economic reasons. Given the recent decline in job opportunities for workers in labor-intensive industries and the aging workforce, programs like occupational extension and workforce development will continue to increase in value, particularly for older workers. The recent loss of male dominated fields will also increase the need for training and educational programs to provide skills needed to fill jobs around the State and relieve the pressure from high unemployment on the economy.

¹⁵ This assumes all other demographic trends since 2000, such as population increases, would have occurred.

INDICATOR 3: INDUSTRY MIX

Key Findings

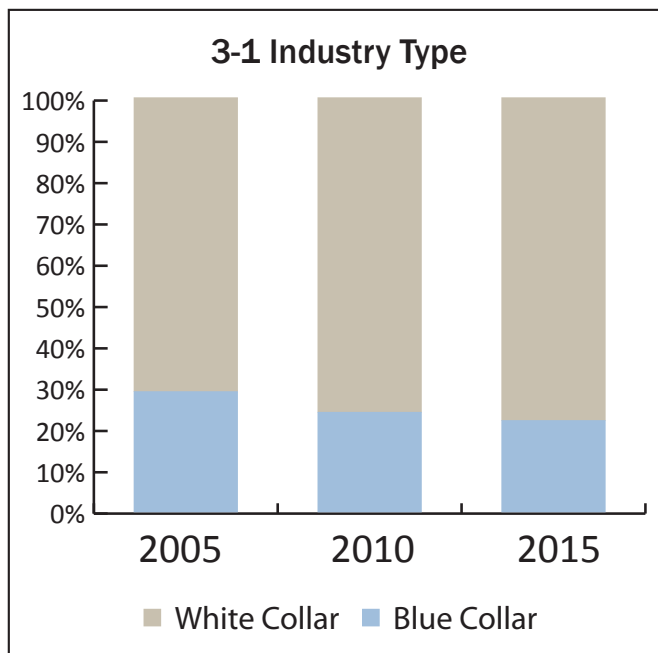
- From 2005 to 2010 the State has a net job loss of approximately 23,700 across all industries. Manufacturing sector losses are 137,100, meaning all other sectors have had a net gain of 113,400 jobs over this time.
- Five years ago the manufacturing industry in North Carolina only trailed the public sector in employment, now it has fallen to fourth behind both Health Care and Retail Trade.
- The public sector is the largest employment sector, employing one in five working North Carolinians; 18 percent of public sector employment is military, 24 percent is state government, and 52 percent is local government (including teachers).
- The percent of total employment coming from traditional or labor intensive industries has decreased from 29 percent of North Carolina's total industry employment to 24 percent.

Indicator Overview

Industry concentration and employment trends help to determine an economy's overall health. Analyzing industry trends can highlight existing competitive advantages, provide insight into the existing workforce skills, and divulge whether a region's economic base is susceptible to economic downturns. More specifically, understanding how a region's industry mix compares to others and how it has changed allows economic development professionals to target scarce resources for industrial recruitment and expansion, workforce development, and international trade.

How Does North Carolina Perform?

Over the past five years, ten of the twenty super-sectors measured have gained industry employment and ten have lost employment.¹⁶ In general, the changes have led to a transition away from the State's traditional, labor intensive, production-oriented, "blue collar" industries to more of a service and knowledge-based "white collar" economy. Between 2005 and 2010, 91 percent of job growth has been in the service sector industries. Meanwhile, manufacturing industries have accounted for 56 percent of job losses.



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The recession has served to accelerate the State's economic transformation. Since 2007 over 100,000 jobs have been lost in the manufacturing sector. In contrast, only five sectors have experienced job growth during this time. This accounts for 90,000 additional jobs, with 97 percent of the growth concentrated to service sector industries. The public sector accounts for over 50 percent of the job growth over this time. Currently, the public sector employs 22 percent of all employed people in North Carolina, which exceeds the national average of public sector employment (18 percent). However, the largest source of North Carolina's over-concentration in government employment is military sector employment, which is more than double the national average. When removed, civilian government workers only account for 18 percent of the total civilian workforce in North Carolina compared to 17 percent nationwide.

¹⁶ Data used in this section includes all employees covered by unemployment insurance. Covered employment is subject to the Employment Security Law on which Unemployment Insurance taxes must be paid.

INDICATOR 3: INDUSTRY MIX

3-2 North Carolina Employment by Industry Sector, 2005 & 2010

Industry Sector	2005		2010		2005 - 2010	
	Employment	% of Total	Employment	% of Total	Total Change	%
Agriculture, forestry, fishing and hunting	29,289	0.73%	27,570	0.69%	-1,719	-6%
Mining	3,522	0.09%	3,577	0.09%	55	2%
Utilities	13,277	0.33%	12,379	0.31%	-898	-7%
Construction	233,351	5.82%	174,742	4.38%	-58,609	-25%
Manufacturing	570,876	14.23%	433,722	10.88%	-137,154	-24%
Wholesale trade	171,666	4.28%	166,656	4.18%	-5,010	-3%
Retail trade	447,271	11.15%	436,525	10.95%	-10,746	-2%
Transportation and warehousing	136,529	3.40%	121,453	3.05%	-15,076	-11%
Information	77,049	1.92%	69,736	1.75%	-7,313	-9%
Finance and insurance	143,012	3.57%	144,920	3.63%	1,908	1%
Real estate and rental and leasing	50,329	1.25%	49,895	1.25%	-434	-1%
Professional and technical services	160,809	4.01%	174,473	4.38%	13,664	8%
Management of companies and enterprises	63,594	1.59%	72,186	1.81%	8,592	14%
Administrative and waste services	225,571	5.62%	229,959	5.77%	4,388	2%
Educational services	51,235	1.28%	63,218	1.59%	11,983	23%
Health care and social assistance	397,468	9.91%	463,642	11.63%	66,174	17%
Arts, entertainment, and recreation	45,821	1.14%	54,124	1.36%	8,303	18%
Accommodation and food services	313,783	7.82%	338,232	8.48%	24,449	8%
Other services (except public administration)	97,609	2.43%	90,713	2.27%	-6,896	-7%
Government	779,128	19.42%	859,732	21.56%	80,604	10%
Totals	4,011,189	100%	3,987,454	100%	-23,735	-1%

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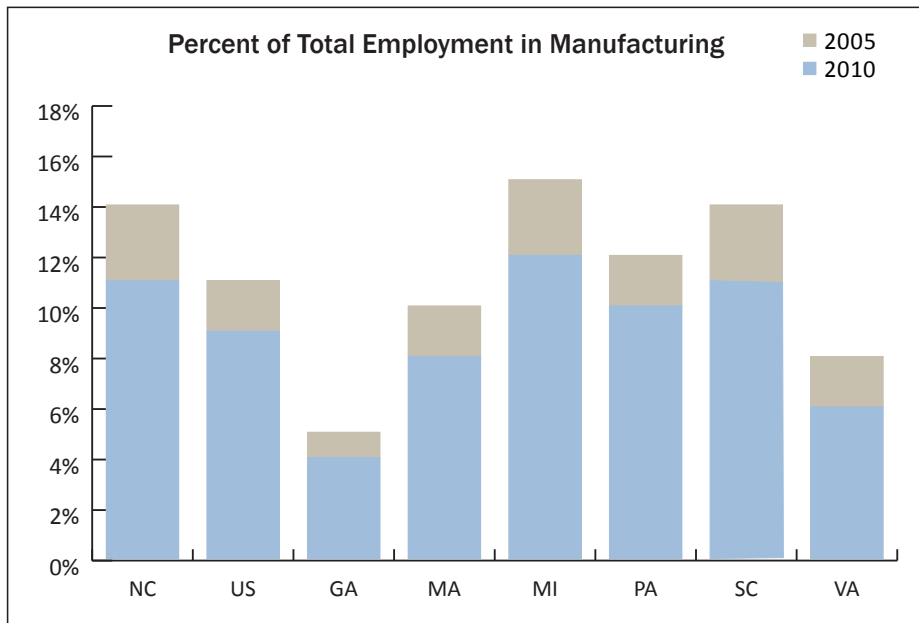
Job loss in the manufacturing sector garnered significant attention in recent years. As mentioned previously, ten of the twenty industry sectors in the chart above have lost employment since 2005. However, only three lost employment between 2005 and 2007, and the manufacturing sector accounted for 87 percent of the State's gross employment loss during that time. Although the losses experienced in the manufacturing sector have accelerated, the decline of the sector was occurring prior to the recession. Even though North Carolina's largest traditional industry sector is in severe decline, successful signs exist especially when taken in the context of six of the State's competitors and the U.S. as a whole.

Between 2005 and 2010, North Carolina experienced losses in other sectors as well. Construction, Transportation & Warehousing, Information, and Retail Trade lost a combined 91,744 jobs during this period. However, the State also experienced significant employment increases in other sectors to partially offset these losses. Employment in Health Care & Social Assistance, Accommodations & Food Services, Educational Services, Professional & Technical Services, Management of Companies & Enterprises, and Arts, Entertainment & Recreation increased by 133,165.

Only two competitor states, Georgia and Michigan, have lost larger portions of their manufacturing industry. From 2005 to 2010, these states have experienced overall employment losses across all industry sectors of 5 percent and 13 percent, respectively, while North Carolina has lost less than 1 percent of its overall employment over the same period. For comparison, the Nation as a whole has lost 19 percent of its manufacturing sector and 3 percent across all industry sectors. North Carolina's large manufacturing losses amounting to one quarter of the 2005 sector level employment has significantly impacted the State's economy. The State's overall employment loss of 1 percent between 2005 and 2010 appears to indicate North Carolina's economy is transitioning away from manufacturing to other sectors.

INDICATOR 3: INDUSTRY MIX

3-3 Change in the Manufacturing Industry 2005 - 2010



Manufacturing Employment Change		
	Total Change	% Change
NC	-137,154	-24%
US	-2,631,352	-19%
GA	-58,857	-28%
MA	-51,616	-17%
MI	-211,188	-31%
PA	-121,350	-18%
SC	-53,696	-20%
VA	-64,716	-22%

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What Does this Mean for North Carolina Economic Development?

Recent industry employment trends can be used to gauge which industries are growing or contracting as well as to determine resource allocation for infrastructure improvements, incentives, and workforce development. The transition of North Carolina's economy from labor-intensive traditional industries to knowledge-based or service-related industries such as health care and technical services suggests the need to continue workforce training and redevelopment opportunities for displaced workers. This trend has persisted for every year since at least 1990 with service and knowledge-based industries growing at a faster rate (or shrinking at a slower rate) than traditional labor intensive industry sectors. Still, the State's traditional labor-intensive industries will have a place in the State's economy for years to come. Rather than disappearing, North Carolina's traditional manufacturing industries are likely to take on higher value-added or more technologically advanced activities to ensure competitiveness in the global economy.

INDICATOR 4: OCCUPATIONAL MIX

Key Findings

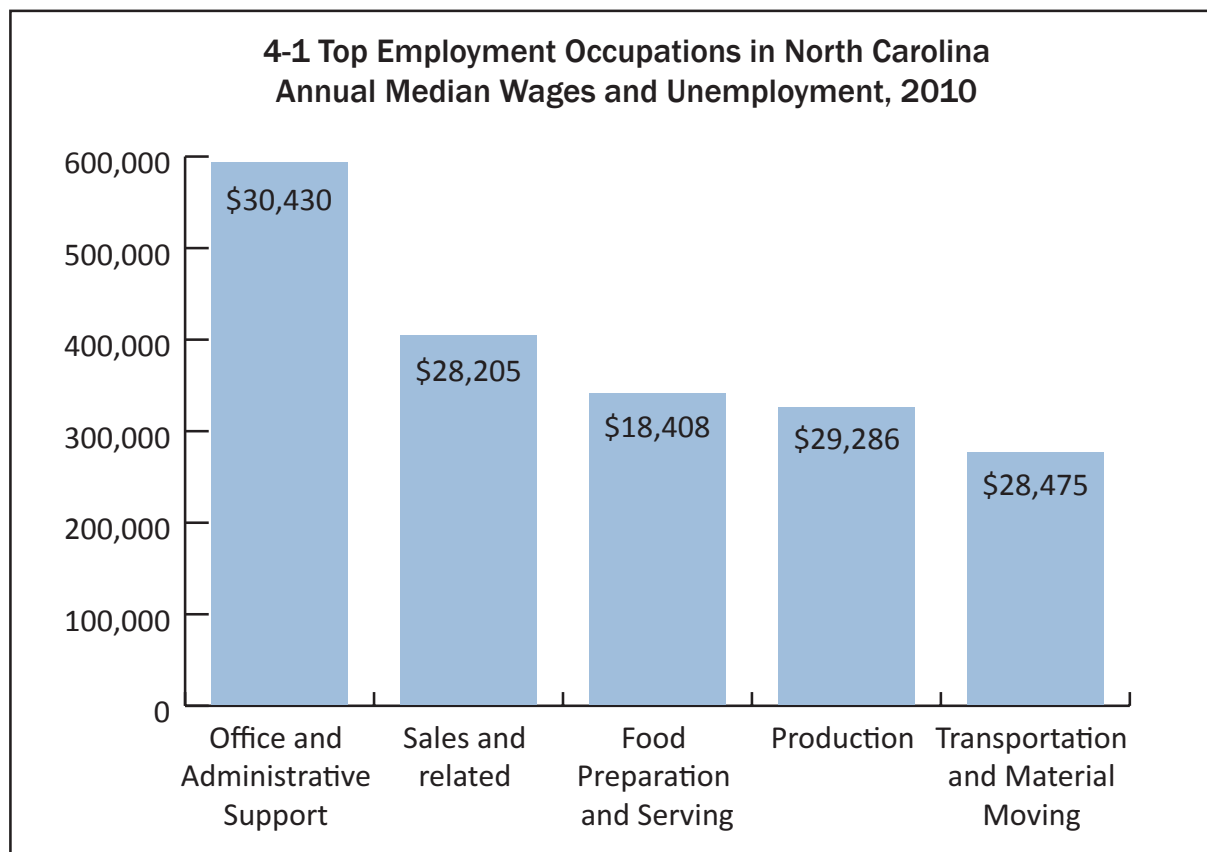
- When ranked by employment, the top five occupations in North Carolina all earn less than \$30,500 annually.
- All five of the top earning occupations in North Carolina have median annual earnings of \$60,000 or more.
- Between 2005 and 2010, jobs in managerial, professional and technical occupations, generally considered desirable occupations, grew 7 percent in North Carolina despite the recession.
- All seven of the State's economic development regions experienced significant growth in community and social services occupations.

Indicator Overview

Knowledge-based jobs sustain an economy by increasing labor productivity and wealth. These jobs help insulate a region from adverse business events that typically cause economic downturns. A region's occupation mix can range from occupations that are knowledge-intensive and associated with higher levels of educational attainment to those historically requiring less education. Occupational composition can also help explain differences in wages among regions.

How Does North Carolina Perform?

When ranked by employment, the top five occupations in North Carolina all earn less than \$30,500 annually [4-1].¹⁷ Each of these, excluding food preparation and serving, experienced employment declines between 2005 and 2010. However, prior to the Great Recession¹⁸ only production jobs were in decline. Over the 2005 to 2010 timeframe, production employment declined in every region of the State, resulting in a loss of 92,950 jobs (-22.2 percent).



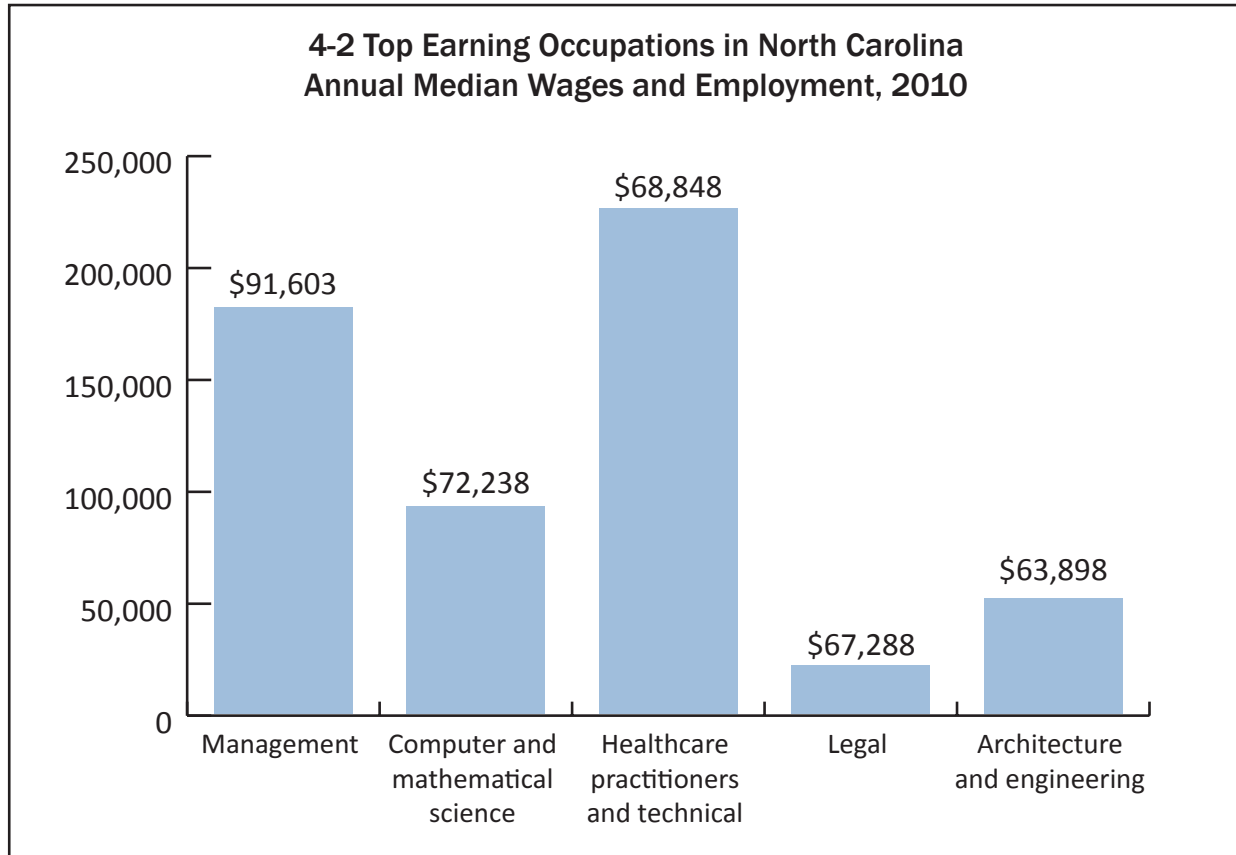
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¹⁷ Top five North Carolina Occupations [2010 employment]: 1) Office and administrative support [592,467]; 2) Sales [403,920]; 3) Food preparation [340,739]; 4) Production [325,484]; and 5) Transportation and Material Moving [276,046].

¹⁸ The Great Recession began in December, 2007.

INDICATOR 4: OCCUPATIONAL MIX

On average, management occupations pay the highest wages in the North Carolina, followed by computer and mathematical science occupations and health care practitioners [4-2]. All five of the top earning occupations in the State have median annual earnings of approximately \$64,000 or more. However, there are far less North Carolinians working in the top five earning occupations (14 percent) than those working in the top employing occupations (49 percent) discussed in chart 4-1.



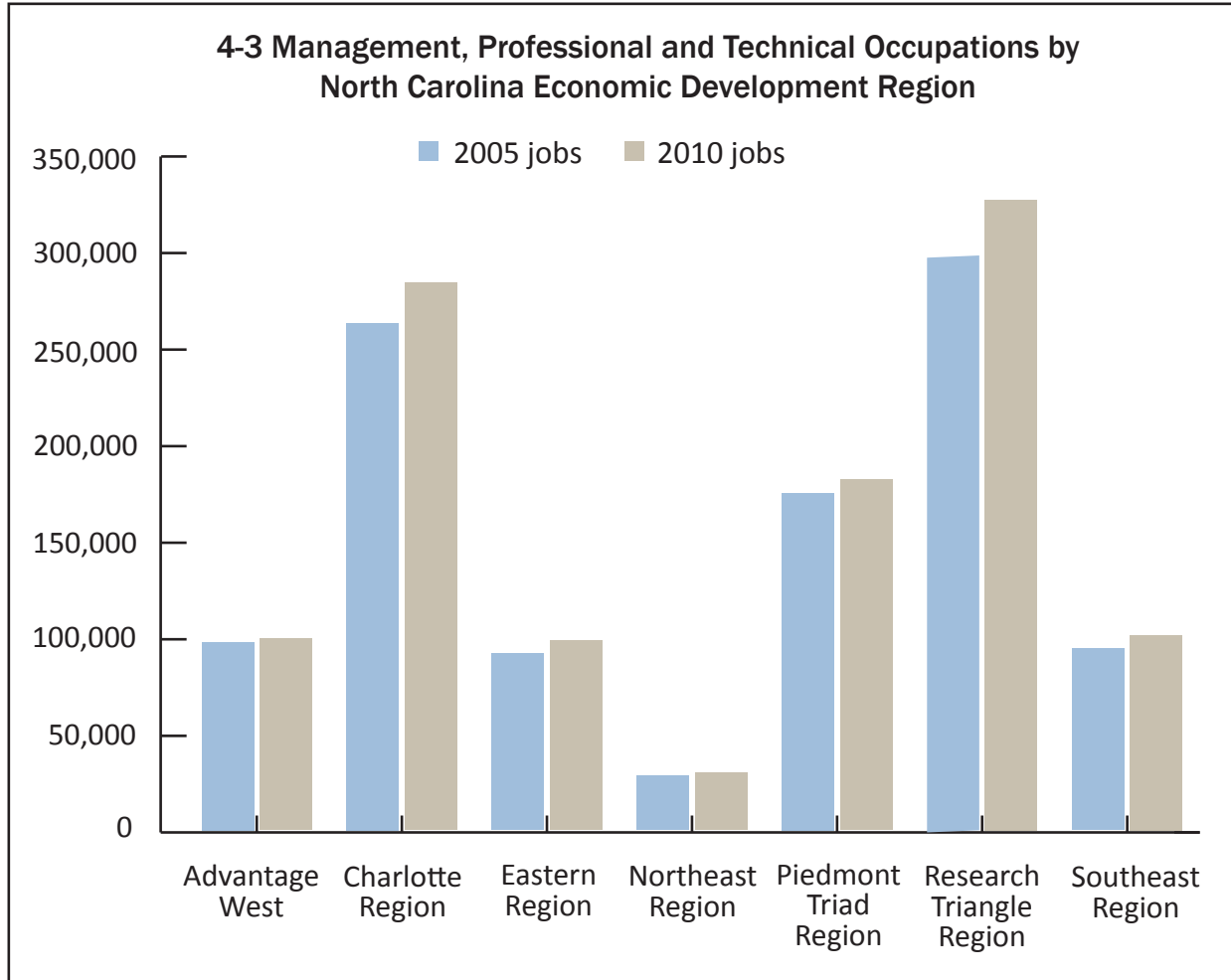
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Growth in management, professional and technical occupations¹⁹ often indicates a state's transition into a knowledge-based economy.²⁰ These occupations are generally associated with higher educational attainment levels (bachelor's degree or higher) and corresponding higher wages. Despite the Great Recession, jobs in managerial, professional and technical occupations grew by 7 percent in North Carolina. All seven economic development regions in the State added knowledge-based jobs between 2005 and 2010. However, most were concentrated in the State's more urban regions [4-3]. While the Research Triangle (10 percent), Charlotte (8 percent), and Eastern (7 percent) regions all experienced growth from 2005 to 2010, the rates were significantly slower than the growth from years prior at 18 percent, 16 percent, and 11 percent, respectively (2003-2008).

¹⁹ Occupations categories include: management; business and financial operations; computer and mathematical science; architecture and engineering; life, physical and social science; community and social service; legal; education, training and library; and arts, design, entertainment, sports, and media.

²⁰ Atkinson, R.D., and R.H. Court. 1998. *The New Economy Index: Understanding America's Economic Transformation*. Washington, DC: Progressive Policy Institute.

INDICATOR 4: OCCUPATIONAL MIX



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From 2005 to 2010, all seven of the State's economic development regions experienced significant growth in community and social services occupations. Six of the seven regions added jobs in health care practitioners, technical, and support groups [4-4]. Healthcare occupations should continue to grow in the region as North Carolina's population both ages and grows. In health care occupations, home health aides have the largest worker growth from 2005 to 2010, adding over 12,000 positions, but have a median annual wage of around \$19,000 or \$9.53 an hour.

INDICATOR 4: OCCUPATIONAL MIX

4-4 Top 5 Growing Occupations by Economic Development Region, 2005-2010

	Advantage West	Charlotte	Eastern	Piedmont Triad	North East	Research Triangle	South East
Community and social services	7%	18%	23%	16%	22%	14%	19%
Computer and mathematical science			14%				11%
Food preparation and serving related						12%	
Health care practitioners and technical	8%	15%	10%	11%	7%	24%	
Health care support	12%	20%	10%	16%		21%	17%
Life, physical, and social science		16%			11%		13%
Personal care and service						15%	
Business and financial operations occupations					5%		10%
Education, training, and library occupations	7%	16%	9%	10%	8%		
Protective service occupations	8%			9%			

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What Does this Mean for North Carolina Economic Development?

As North Carolina transforms into a knowledge-based economy, the State will need to continue to create opportunities for citizens to move into knowledge-intensive occupations. Strategies to accomplish this may include increased science, math and technology curriculum offerings, and continued investment in targeted workforce development programs to retrain displaced workers. In addition, community development efforts and improved access to basic services, such as health care, are increasingly important as North Carolina transitions to a knowledge-based economy. Individuals who seek managerial, professional, and technical jobs tend to be highly mobile and willing to move, resulting in quality of life playing an important role in recruiting and retaining talent.

INDICATOR 5: EXPORTS

Key Findings

- In 2010, North Carolina's exports of goods²¹ totaled \$24.8 billion, a 13.9 percent increase from 2009.
- Canada remained the State's top export market; however, exports to Canada fell 4.5 percent while exports to China grew 157.2 percent between 2005 and 2010.
- Chemicals were North Carolina's leading exports, accounting for nearly one fifth of the State's total export value.

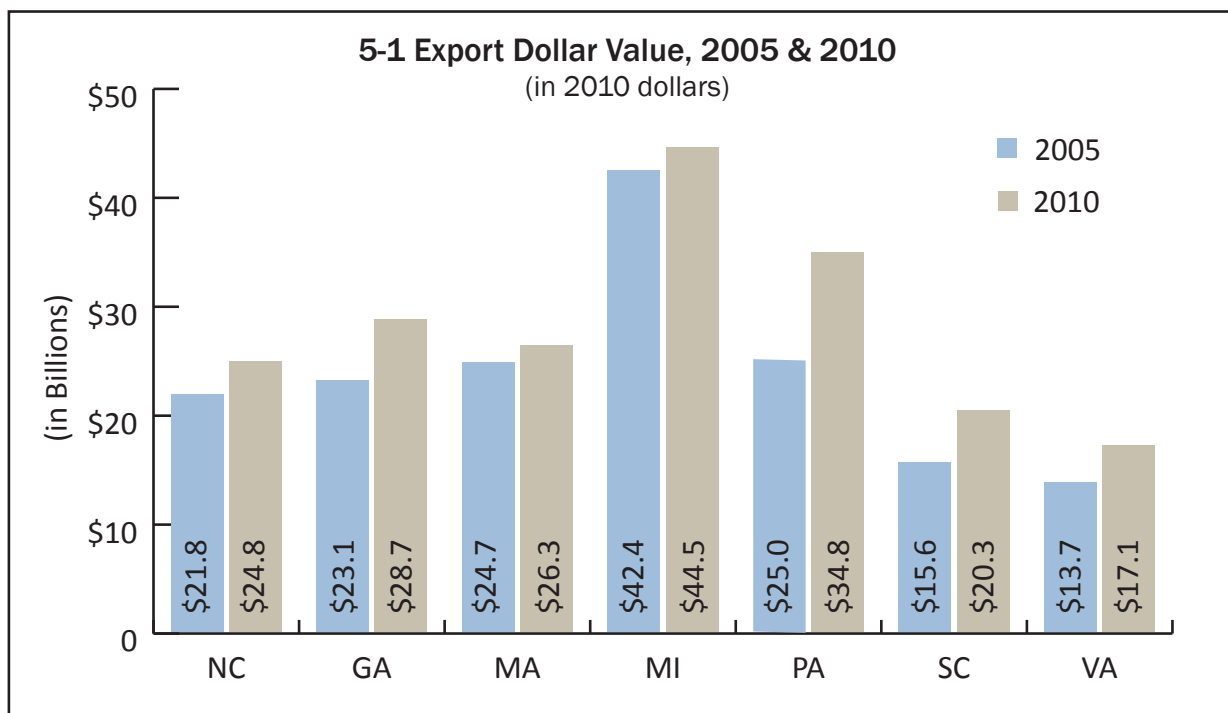
Indicator Overview

A state's growth and prosperity depend on its ability to export goods and services to foreign markets as 80 percent of the global economy lies outside the United States.²² Despite the impact of the global recession on a state's economy, the value of a state's exports continue to be a key driver of its gross domestic product (GDP). Diversification of export portfolios in industry sector and markets destination is the vital engine of the long-term economic growth in North Carolina.

How Does North Carolina Perform?

In 2010, North Carolina's exports totaled \$24.8 billion representing an increase of 13.9 percent over the previous year while the U.S. exports rose 21 percent to \$1.3 trillion. Among its southern comparison states, North Carolina ranked higher than South Carolina and Virginia but behind Georgia in the value of exports. Michigan outperformed all benchmark states due largely to its high volume exports in transportation equipment, such as motor vehicles and parts as well as aerospace products and parts. In 2010, growth prevailed in nearly every export sector in North Carolina. Companies in the Machinery, Electrical, & Transportation Equipment and Paper industries saw significant growth. Growth in exports was less for Computer & Electronic Products as well as Textiles and Fabrics. Though the Chemical sector was one of the few industries that experienced decline in exports in 2010, it still accounted for one-fifth of the North Carolina's total exports.

Measured by percentage growth in exports between 2005 and 2010, North Carolina gained 13.6 percent. Pennsylvania experienced the largest increase at 39.2 percent, whereas Michigan grew merely 5 percent, the lowest one among the benchmark states.



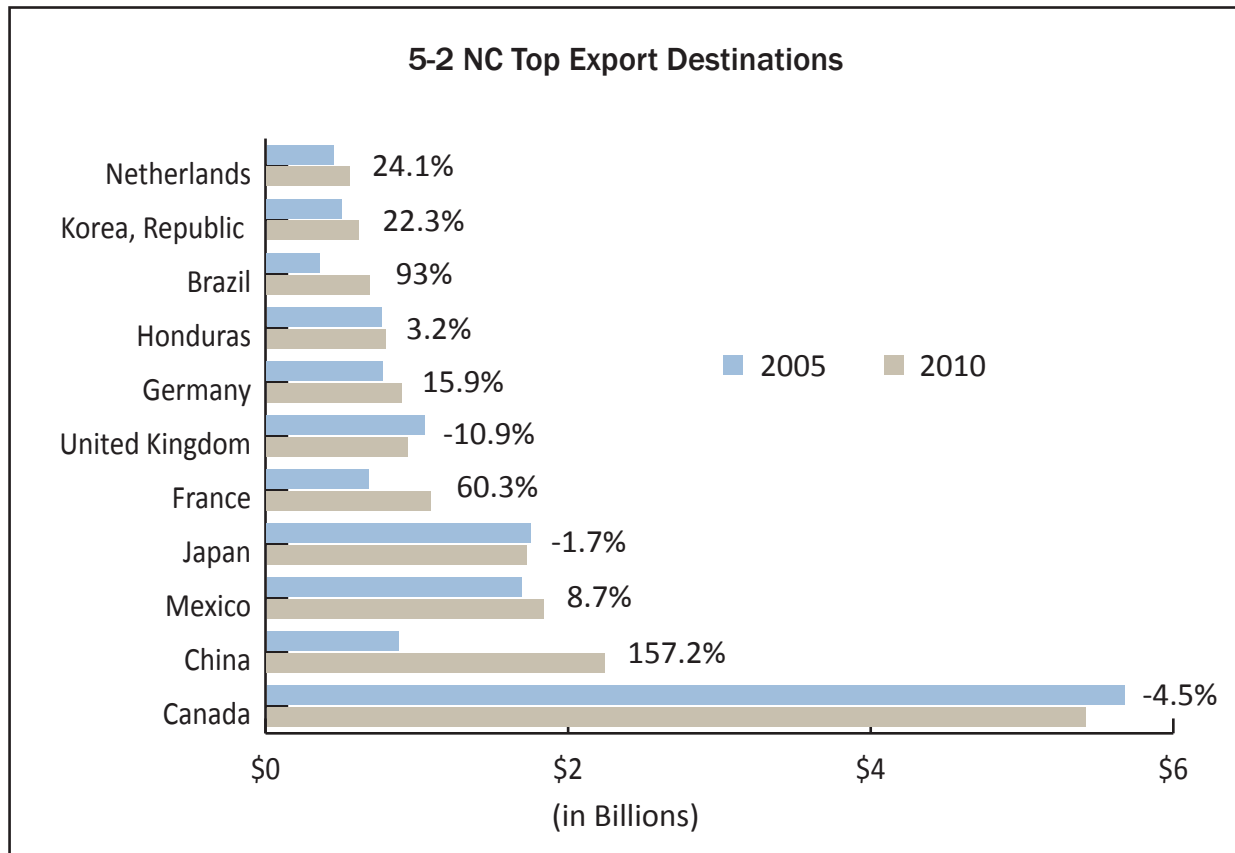
Source: Wisetrade 2011

²¹ The export indicator provides statistics on exports of goods only. All figures are for total exports (domestic exports plus re-exports) and are drawn from the Origin of Movement (OM) series compiled by the Foreign Trade Division of the U.S. Census Bureau. OM data cover exports of goods only. There are no comparable statistics for exports of services at the state level.

²² Business Roundtable's Trade Resource Center http://trade.businessroundtable.org/trade_2006/wto/us_economy.html

INDICATOR 5: EXPORTS

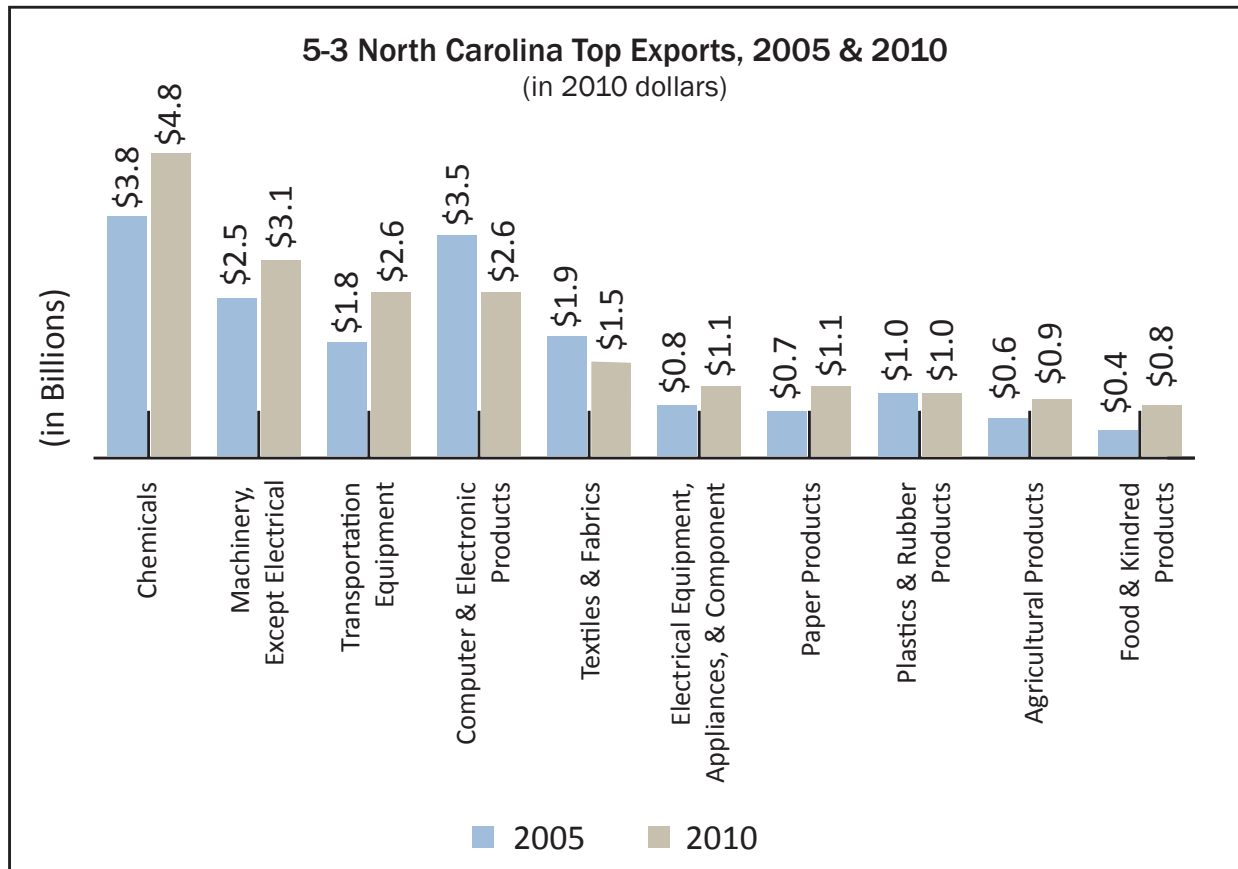
Canada has long been North Carolina's leading export market in terms of dollar value. In 2010, companies in North Carolina exported \$5.4 billion worth of goods to Canada, up 19.9 percent from the previous year. China and Mexico ranked second and third for North Carolina export markets, totaling \$2.2 billion and \$1.8 billion, respectively. Among its top ten export markets, North Carolina's exports to China represented the largest destination country increase (157.2 percent) during the 2005 - 2010 period; followed by Brazil (93 percent) and France (60.3 percent).



Source: Wisetrade 2011

Between 2005 and 2010 Computers & Electronics, Textiles & Fabrics, and Plastics & Rubbers experienced declines in exports, but still remain among the State's top ten export sectors in 2010. Chemical sector gained slightly over \$1 billion in export sales; however, measured by percentage growth, Food & Kindred Products (meats, grains and dairy) saw the largest increase at 105.2 percent. The increase was due in large part to the rising demand of the State's food products in Japan.

INDICATOR 5: EXPORTS



Source: Wisetrade 2011

What Does this Mean for North Carolina Economic Development?

Despite the global recession and its impact on North Carolina's economy, exports continued to be one of the key drivers for the State's economic development. Exporting helps companies in North Carolina diversify their business portfolios and become more profitable and resilient in the global market. Exports are also critical in employment growth - nearly one out of every ten jobs in the State is supported by exports.²³ In addition to the United States Department of Commerce's presence across the globe, the International Trade Division of North Carolina's Department of Commerce has staff in North Carolina and in seven locations around the globe to facilitate export growth. For North Carolina to remain competitive in the global economy, it must continue to explore new markets for the goods and services it produces. Such efforts require focus in strengthening and expanding relationships with overseas trading partners and understanding how North Carolina industries fit within global commodity value chains. Infrastructure investment in highways, inland terminals and port facilities is needed to improve the ability to efficiently move goods. Enhanced export assistance and increased availability of credits to small and medium-sized companies seeking to export are crucial in connecting businesses to the global market place.

²³ The statement is based on the 2010 IMPLAN analysis performed by the NC Department of Commerce to estimate export contribution to the state's economy.

INDICATOR 6: ENERGY

Key Findings

- In 2009, the average industrial price of electricity in North Carolina was lower than the national average.
- Industrial electricity price increases from 2004 to 2009 were over 20 percent higher than from 2002 to 2007.
- For the period 2004-2009, North Carolina's increase in average industrial electricity prices (23 percent) was less than the United States average (28 percent). South Carolina and Virginia's average increases over the period were 40 percent and 61 percent, respectively.
- North Carolina continues to add megawatts of renewable-generated electricity, due to a mandate adopted in 2007, including over 4,500 megawatts of solar power.

Indicator Overview

Energy is critical to economic development. In particular, low cost power is important to the manufacturing sector in North Carolina, despite the State's ongoing transition towards service industries. In addition, the State has seen growth in a number of energy intensive industries, such as data centers. The utility industry is regulated in North Carolina and most customers are served by two investor-owned entities, Duke Energy and Progress Energy. In addition to Duke Energy and Progress Energy, service is provided by electric membership corporations or municipal power systems. In North Carolina, the Utilities Commission is responsible to the investor-owned utilities and the public to provide just and reasonable rates and charges for public utility services and to promote conservation of energy. The cost of providing energy varies by a state's natural resources, transportation and electric infrastructure, types of power generation facilities, age of the facilities, and anticipated future energy needs.

The electrical energy landscape is in a period of rapid change – and those changes could have bearing on North Carolina. For example, the country's nuclear plant fleet is aging, and North Carolina's Duke Energy has begun the permitting process to build a new nuclear plant to serve the State's customers. According to the National Energy Technology Laboratory, 2010 marked the largest increase in gigawatts of capacity from coal since 1985; one of those new plants was built at Cliffside in western North Carolina. Meanwhile, states have been more active than ever before in creating policies to advance renewable energy sources such as wind and solar. The U.S. Energy Information Administration projects "renewable-generated electricity will account for 17% of total U.S. electricity generation in 2035, up from 9% in 2008."²⁴ Federal loan guarantees and Recovery Act dollars have contributed to this growth by mitigating some of the risk.

How Does North Carolina Perform?

Electricity Costs

In 2009, the average industrial price of electricity in North Carolina was 5.99 cents per kilowatt hour, lower than the U.S. average (6.70 cents) and all but one benchmark state (South Carolina). In recent years, North Carolina has competed with lower prices in neighboring states, South Carolina and Virginia. However, in 2009, Virginia's prices were nearly two cents higher than they were in 2007 and nearly one cent higher than North Carolina's.

Between 2004 and 2009, North Carolina's average prices rose by a full cent in nominal terms [6-1]. While this is a substantial increase, all comparative states experienced increases of more than 38 percent, except Pennsylvania. Thus, North Carolina's long-enjoyed competitive advantage in lower relative industrial electric prices still largely exists even as the price increases. However, cost uncertainty exists in the sector due to the changing conditions with the State's investor owned utilities.²⁵

²⁴ EIA, "How much of our electricity is generated from renewable sources?", http://www.eia.doe.gov/energy_in_brief/renewable_energy.cfm

²⁵ North Carolina's two investor-owned utilities (IOU's), Duke Energy and Progress Energy, will begin general rate cases in 2011, a regulatory proceeding with the North Carolina Utilities Commission that will determine how much of utility operations can be justly and fairly recoverable in rates. At the same time, Duke and Progress have announced plans for a merger and indicated a desire to build new baseload, likely a nuclear plant, within the decade. Dr. Mike Walden, an economist at North Carolina State notes in a recent news article that a merger could mean cost savings for customers: "if the larger company can better take advantage of economies of scale, rates may be lower than they would have been with the smaller companies," he said. On the other hand, rates could rise. A planned Progress nuclear facility in Florida is expected to add \$25 to monthly electric bills there, according to a report in the Charlotte Observer.

INDICATOR 6: ENERGY

6-1 Average Industrial Price of Electricity, cents per KWh, 2004-2009

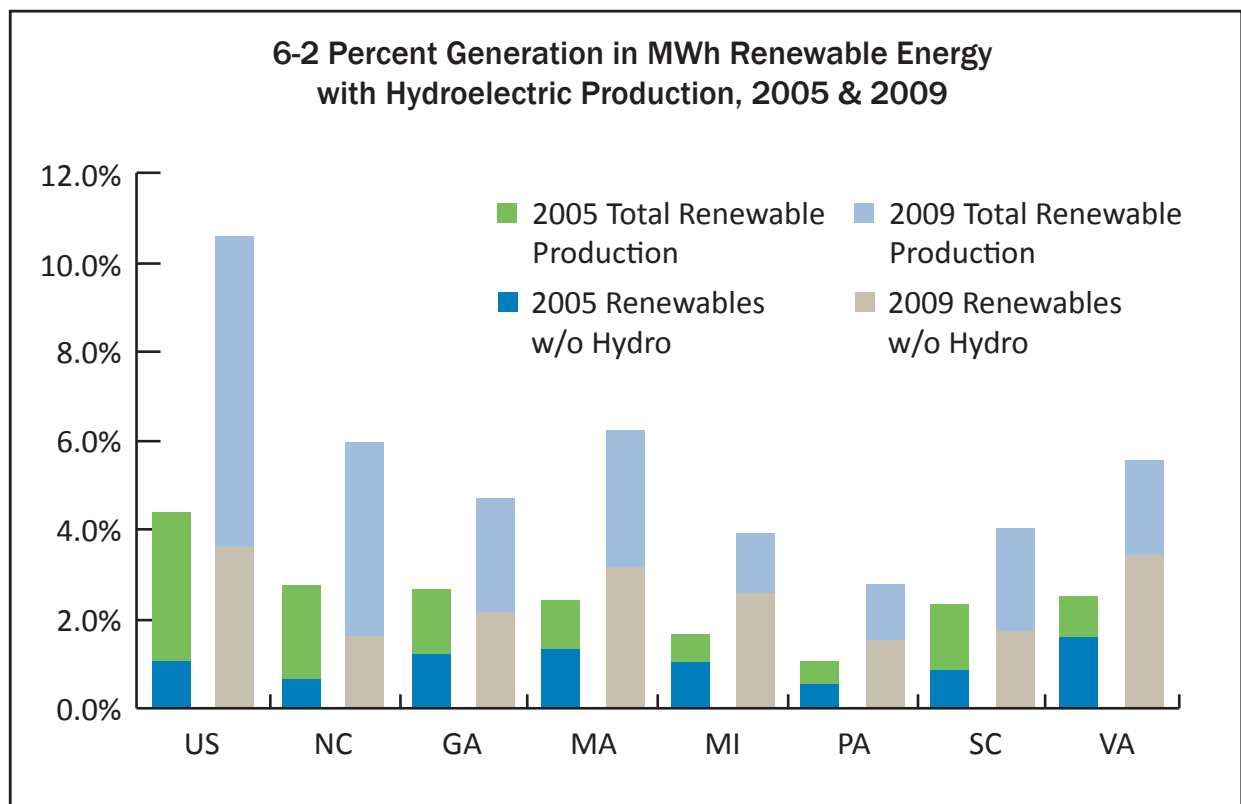
(Prices are not adjusted for inflation)

	US	NC	GA	MA	MI	PA	SC	VA
2004	5.25	4.88	4.43	8.48	4.92	5.87	4.13	4.27
2005	5.73	5.04	5.28	9.22	5.32	6.29	4.55	4.46
2006	6.16	5.23	5.38	13.04	6.05	6.63	4.71	4.69
2007	6.39	5.47	5.53	13.03	6.47	6.87	4.83	5.07
2008	6.83	5.54	6.67	14.85	6.74	7.02	5.37	5.82
2009	6.70	5.99	6.12	14.08	6.99	7.21	5.79	6.91
% change 04-09	27.6%	22.7%	38.1%	66.0%	42.1%	22.8%	40.2%	61.8%

United States Energy Information Association data, 2010

Renewable Energy

In 2007, the North Carolina General Assembly enacted a mandatory Renewable and Efficiency Portfolio Standard ²⁶ (REPS), requiring 12.5 percent of retail energy sales to come from renewable and/or efficiency sources by 2020. There are 35 states with a renewable energy mandate, standard or goal, but no other state in the Southeast has a requirement. This creates a potential competitive advantage for North Carolina over the rest of the Southeastern United States to attract significant new development of the renewable energy and energy conservation supply chains from energy equipment to power generation. Between 2007 and 2009, the State added 4,563 MW of solar power and 44,646 MW of biomass power, which along with other renewable generated energy sources (other than hydroelectric) contributed to an increase of over 3 percentage points in renewable power generation from 2005 to 2009 [6-2].



Calculations based on Energy Information Association data, 2010.

²⁶ http://www.ncga.state.nc.us/enactedlegislation/statutes/html/bysection/chapter_62/gs_62-133.8.html

INDICATOR 6: ENERGY

North Carolina outpaces many competitor states in solar generation as a portion of its total renewable portfolio. Solar thermal and photovoltaic accounted for 0.2 percent of the State's renewable portfolio in 2009, but in Georgia, Michigan, South Carolina and Virginia, solar generation was zero. North Carolina currently does not have any developed wind generation, but policymakers and economic developers are actively pursuing its potential on land and in the State's coastal waters. Wind accounts for over half of the total U.S. renewable portfolio [6-3].

6-3 Percent of State Renewable Portfolio by Energy Type, 2009

	Geothermal	Other Biomass	Solar Thermal & PV	Wind	Wood Fuels
US	10.4%	12.8%	0.6%	51.4%	24.7%
NC	0.0%	6.9%	0.2%	0.0%	92.8%
GA	0.0%	2.8%	0.0%	0.0%	97.2%
MA	0.0%	90.1%	0.0%	0.5%	9.4%
MI	0.0%	31.8%	0.0%	11.4%	56.8%
PA	0.0%	47.1%	0.1%	32.1%	20.7%
SC	0.0%	7.9%	0.0%	0.0%	92.1%
VA	0.0%	29.3%	0.0%	0.0%	70.7%

Calculations based on Energy Information Association data, 2010

The costs associated with energy production have been a barrier for large-scale renewable production. "Renewable energy power plants are generally more expensive to build and to operate than coal and natural gas plants. Recently, however, some wind-generating plants have proven to be economically feasible in areas with good wind resources, compared with other conventional technologies, when coupled with the [Federal] Renewable Electricity Production Tax Credit."²⁷ North Carolina has also been active in studying energy conservation approaches, such as smart grid technology. In 2009 North Carolina regulators cleared Duke Energy Carolinas to start a pilot program in Charlotte to establish a pilot "smart grid" project.²⁸

What Does this Mean for North Carolina Economic Development?

New economic development projects and the expansion of existing businesses are impacted by the cost, availability and reliability of energy. North Carolina's inexpensive and reliable electricity has historically been a competitive advantage for economic development prospects. However, the State may be losing ground in this regard as the rising cost of fuel and the State's growing population and demand for energy leads to the construction of new generation plants and potentially higher prices. To remain competitive for industrial projects, North Carolina must not only invest in new energy infrastructure, but also expand initiatives designed to assist companies with energy efficiency, such as the State's Industrial Extension Service. In addition, North Carolina should strive to increase the efficiency of current power generation facilities, implement existing efficiency standards for state buildings, and encourage increased energy and power research.

North Carolina's energy landscape is likely to change in coming years. The potential merger of the State's two investor owned utilities, the baseload plants they plan to build, and the maturity of the State's RPS will all be important factors impacting power costs. Some potential impacts are likely to result in cost savings, while others are likely to increase costs. The degree of these impacts and their cumulative effect on energy rates for customers remains largely unknown.

²⁷ EIA, "How much of our electricity is generated from renewable sources?", http://www.eia.doe.gov/energy_in_brief/renewable_energy.cfm

²⁸ Triangle Business Journal, "North Carolina approves Duke Energy's 'smart grid' initiative", <http://www.bizjournals.com/triangle/stories/2009/03/09/daily37.html>

INDICATOR 7: FOREIGN DIRECT INVESTMENT (FDI)

Key Findings

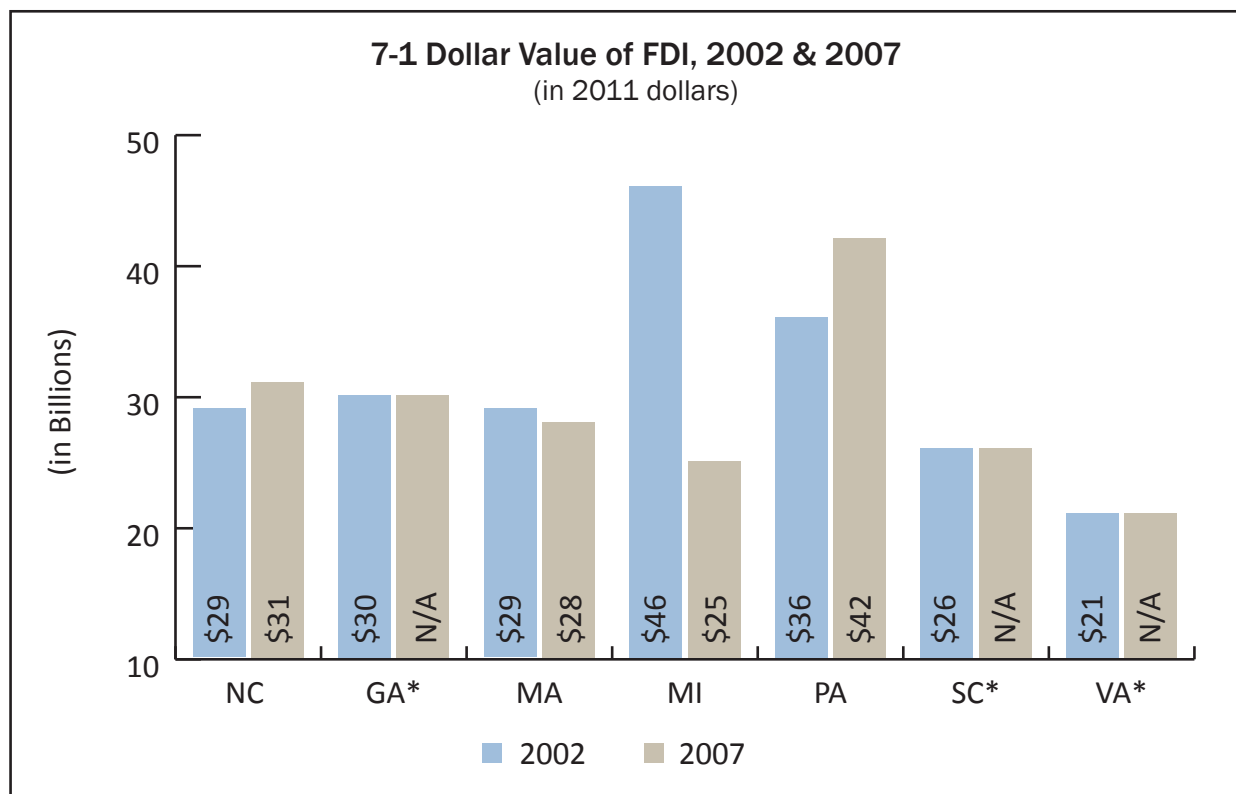
- In 2007, FDI inflows to North Carolina grew 5.9 percent over 2006 while the United States saw an increase of 6.3 percent.
- Germany was North Carolina's largest foreign investor in 2007, followed by the United Kingdom and Japan.
- In 2007, approximately 206,700 workers in North Carolina were employed by foreign owned companies.

Indicator Overview

Foreign direct investment (FDI) is a benchmark for measuring the presence of foreign-owned businesses in a state. FDI is an important indicator of a state's ability to attract foreign companies and a key determinate of a region's ability to attract new technologies, capital, workforce skills, global connections, and job opportunities.

How Does North Carolina Perform?

In 2007, North Carolina's value of foreign direct investment grew 5.9 percent from the previous year to \$30.7 billion (in 2011 dollars²⁹), representing 2.2 percent of the U.S. total. Between 2002 and 2007, FDI inflows to North Carolina experienced an increase of 4.5 percent while Pennsylvania grew 18.8 percent³⁰. During the same period Michigan suffered a decline of 45 percent of its 2002 total, due in part to its sharp drop (61 percent) in foreign investment in the manufacturing sector.



Source: U.S. Bureau of Economic Analysis

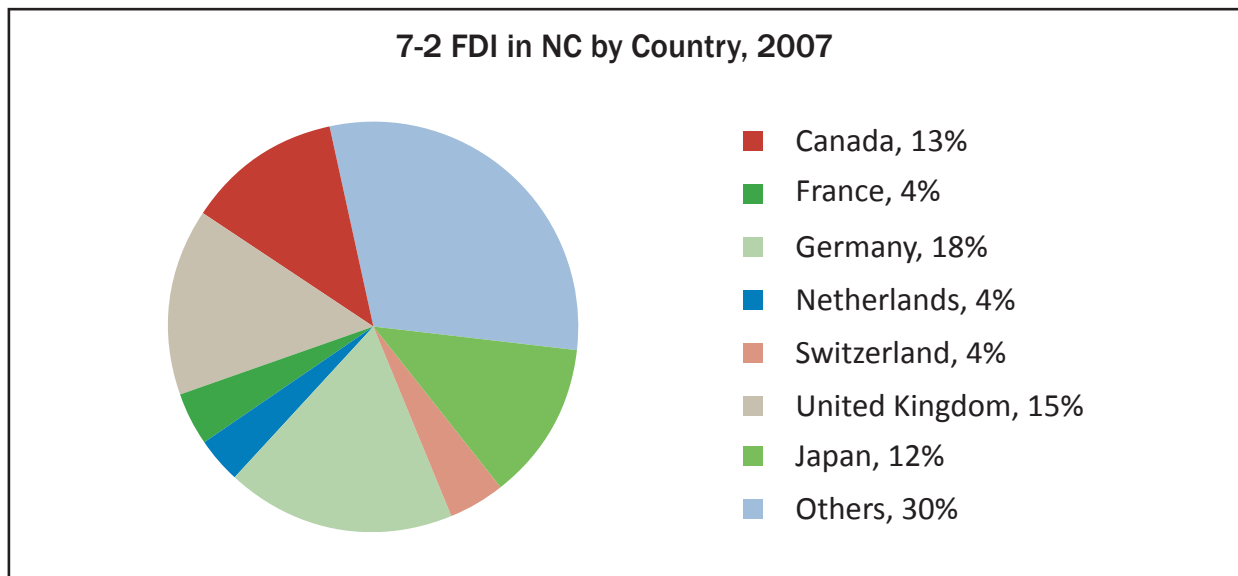
* Data for GA, SC and VA is suppressed.

²⁹ All FDI value is in 2011 dollars. The latest data available for FDI value is from 2007

³⁰ FDI dollar value comparison with other benchmark states (Georgia, South Carolina and Virginia) are not available as the 2007 data on FDI value for these states are suppressed by the U.S. Bureau of Economic Analysis to avoid disclosure of individual companies.

INDICATOR 7: FOREIGN DIRECT INVESTMENT (FDI)

North Carolina has traditionally attracted significant foreign direct investments from Europe. In 2007, nearly half of the State's FDI came from the member states in the European Union. In terms of dollar value, Germany provided the largest amount of direct investment in North Carolina representing 18 percent of the state's total FDI in 2007; followed by the United Kingdom (15 percent). Measured by percentage growth over the 2002 - 2007 period, German investment in North Carolina grew merely 7 percent while Switzerland has increased its investment in the state by 81 percent. During the same period, North Carolina saw declined FDI inflows from the Netherlands (65 percent), France (34 percent) and United Kingdom (30 percent). North Carolina continues to attract foreign investment from regions all across the world. During the 2002-2007 period, inbound FDI from Canada to the state rose 62.5 percent. Companies in Asia also increased their investment in North Carolina with Japan topping the list. Investment received by the state from countries other than Canada, Japan and EU members grew 44.5 percent.

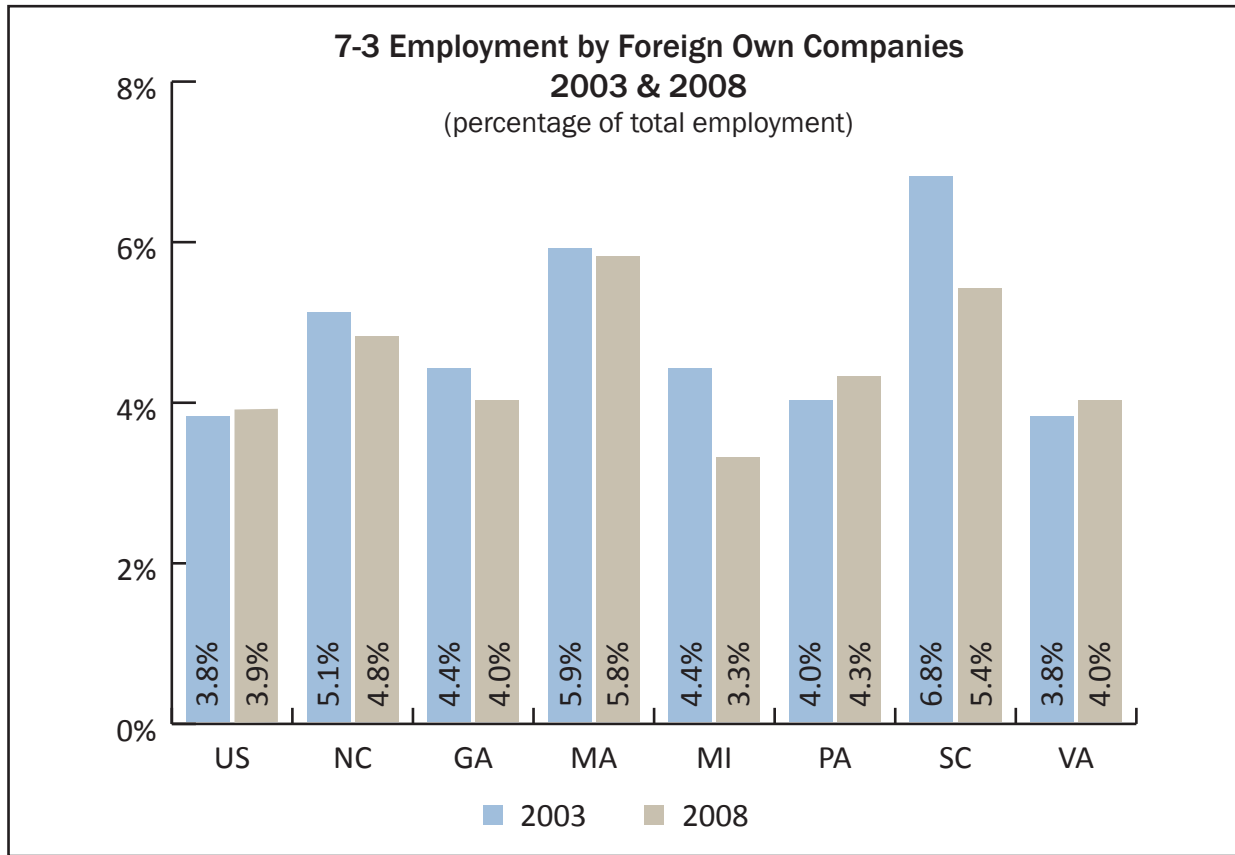


Source: U.S. Bureau of Economic Analysis

In 2008, North Carolina ranked ninth nationally and second among benchmark states in the number of workers hired by majority-owned U.S. affiliates ("foreign owned companies"). Approximately 206,700 workers in North Carolina were employed by these foreign owned businesses in which a foreign investor or company held at least a 50 percent stake. These businesses represented 4.8 percent of total employment in the state, third highest among comparison states, behind Massachusetts (5.8 percent) and South Carolina (5.4 percent).

Between 2003 and 2008, employment by foreign owned companies in North Carolina grew 1.4 percent while Michigan and South Carolina saw the greatest declines at -26.4 percent and -15.5 percent, respectively. Virginia had the highest employment growth of 15 percent, followed by Pennsylvania (13 percent).

INDICATOR 7: FOREIGN DIRECT INVESTMENT (FDI)



Sources: U.S. Bureau of Economic Analysis and Bureau of Labor Statistics

What Does this Mean for North Carolina Economic Development?

Foreign direct investment increases integration into the global economy. It encourages adoption of new technologies, improves labor quality, expands international trade volume, and contributes to economic growth and job creation. The U.S. continues to be the leading destination for foreign direct investment as it offers a stable and low cost business environment to serve the world's largest consumer market. North Carolina's strategic geographic location provides foreign companies easy access to customers and suppliers as well as opportunities to tap into the major U.S. markets. As the global economy begins to recover and businesses start to invest again, North Carolina will face competition for foreign investment from other states and countries. To retain and attract more foreign investors, North Carolina must continue to enhance its competitive investment climate including tax structure, legal system, business regulations and financing. In addition, the State must devote resources to improve physical infrastructure to move people and goods. Improving human capital through skill development in technical training, foreign language ability, and cultural understanding is essential for North Carolina to thrive in the global economy. These combined efforts will further maximize the return on investment of foreign firms in the State.

INDICATOR 8: RESEARCH AND DEVELOPMENT (R&D)

Key Findings

- North Carolina continues to be ranked second, behind Virginia, among competitor states in state and local government funded R&D expenditure.
- North Carolina ranks seventh in the United States for R&D performance in universities and colleges in 2007.
- A total of ten North Carolina counties receive in excess of \$1 million in federal R&D contracts from the Department of Defense.

Indicator Overview

Investments in research and development (R&D) increase productivity, boost economic growth, generate new products and processes, and improve the quality of people's lives. High degrees of R&D activity in a state show support for future growth in knowledge-based industries. Prioritization of R&D among public or private goals can be ascertained when proportionally compared to the Gross Domestic Product (GDP). The dollars spent on R&D can be examined for various allocation segments including private industry, federal government, and academic institutions.

How Does North Carolina Perform?

Total North Carolina R&D expenditures continue to rise, growing by more than \$2 million from 2006 to 2007. An estimated 75 percent of total North Carolina R&D expenditures were funded by businesses in 2007. The Federal Government was the second largest supporter of total R&D (20 percent). The Federal Government was also responsible for funding a large part of university conducted research and development, followed by the institutions themselves. North Carolina, compared to all competitor states, had the highest amount of university conducted R&D support from businesses (13.6 percent). Pennsylvania followed, with only 7.5 percent.

How much a state spends on R&D can be greatly affected by the size of their economy. Consequently, variations in R&D expenditures by state may reflect differences in the size of a state's economy, rather than true efforts in R&D. To control for this, a ratio between R&D expenditures and state GDP, known as R&D Intensity, is useful. North Carolina's R&D intensity is below the national average of 2.7, but still performs better than 31 states, ranking 19th. The chart to the right illustrates R&D intensity of comparison states using revised GDP figures from the Bureau of Economic Analysis. R&D is concentrated, with ten states accounting for 64 percent of total U.S. R&D expenditures in the top 20 states, including North Carolina, account for an additional 21 percent or 85 percent of total US R&D. R&D expenditures represent approximately 1.7 percent of the North Carolina's GDP which is comparable to some of the benchmark states. Massachusetts, which ranks second to California for all R&D performance, has a much higher ratio of R&D to GDP at 6.1 percent.³¹

8-1 R&D Intensity by State
(R&D as a Percent of GDP)

State	Intensity
United States	2.7%
Massachusetts	6.9%
Michigan	4.5%
Pennsylvania	2.5%
Virginia	2.4%
North Carolina	2.3%
South Carolina	1.5%
Georgia	1.1%

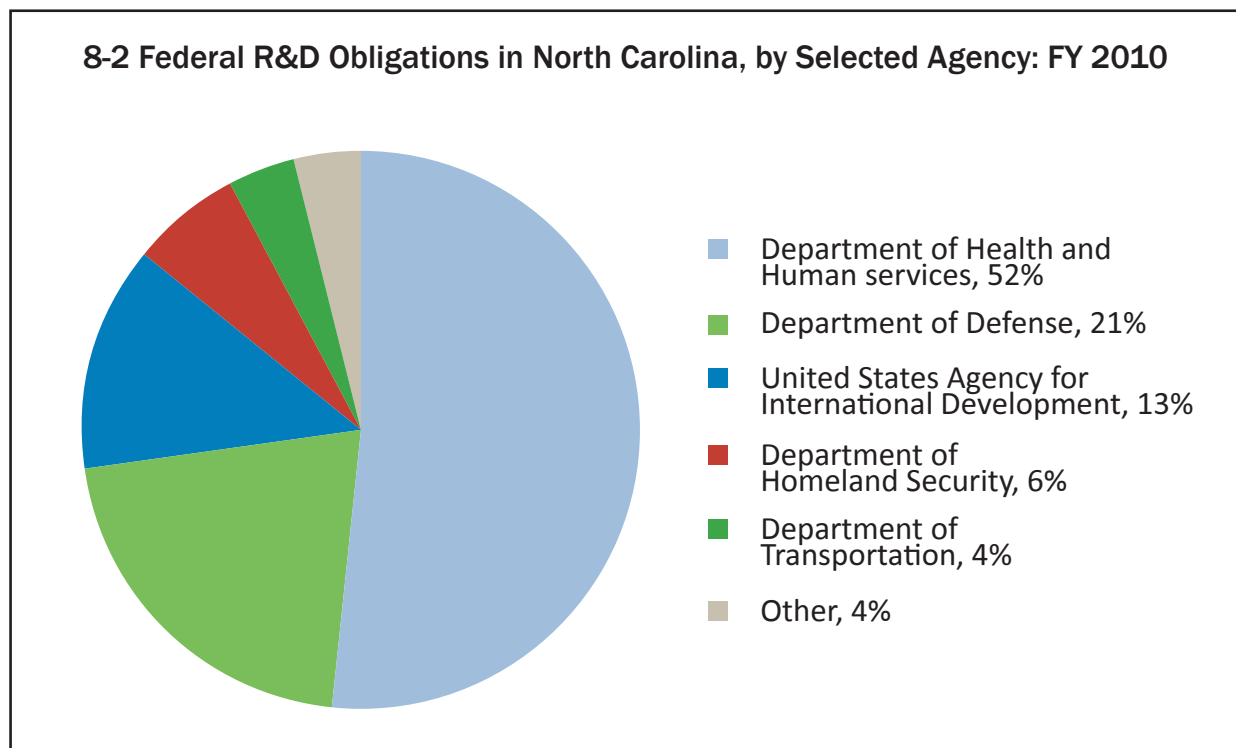
National Science Foundation

R&D effectiveness can also be measured by the number of patents awarded in a state. Patents represent a return on innovation and invention, thus it can be used to gauge successful R&D environments. North Carolina ranks in the middle of competitor states, ahead of Virginia, South Carolina, Pennsylvania and Georgia in terms of patents awarded per 1,000 individuals in science and engineering occupations in 2008.

³¹ National Science Foundation, National Center for Science and Engineering Statistics. "Science and Engineering Indicators 2010". January 2010. <http://www.nsf.gov/statistics/seind10/c4/c4s2.htm#s2>

INDICATOR 8: RESEARCH AND DEVELOPMENT (R&D)

The Federal Government supports research through a number of policy measures, the most direct being the implementation and funding of R&D that would not otherwise be conducted or financed in the private sector. The most recent data of federal obligations for R&D in North Carolina shows approximately 52 percent of funding from the U.S. Department of Health and Human Services [8-2]. In 2007, Health and Human Services obligations were estimated to make up 70 percent of total federal R&D obligations in North Carolina. The state has considerable obligations from the Department of Health and Human Services in part because of the quality of academic research institutions in North Carolina focused on the health sciences and medical fields. North Carolina has since expanded its capabilities to include more defense related R&D. Following Health and Human Services, the Department of Defense, Department of Homeland Security and the U.S. Agency for International Development make up another 40 percent of federal R&D obligations in North Carolina.

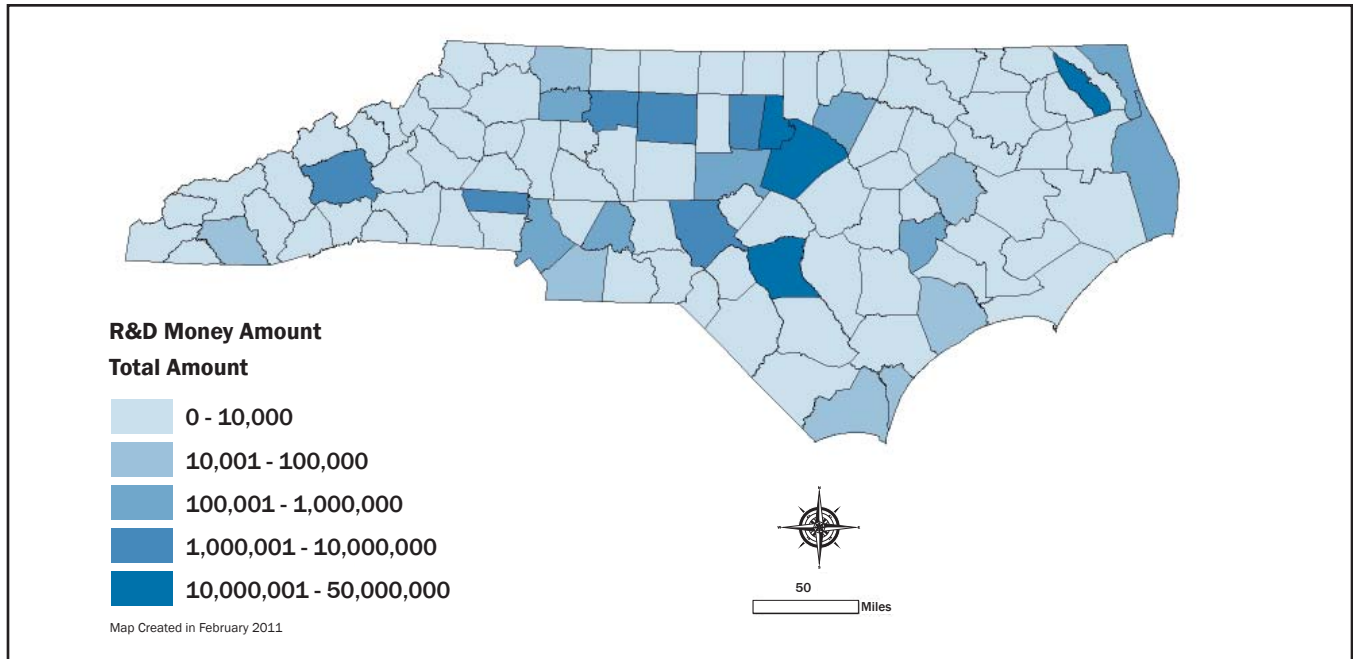


USAspending.gov

North Carolina has attempted to attract more Federal R&D contracts from the Department of Defense and the Department of Homeland Security due to the large and increasing military presence in the State. The top four counties receiving the highest amounts of defense related R&D funding in 2010 were Wake, Durham, Cumberland, and Pasquotank [8-3]. Cumberland County includes Fort Bragg, one of the largest military bases in the United States, and Pasquotank County has a Coast Guard Air Station in Elizabeth City. Both Wake and Durham lack military bases, but have numerous R&D institutions. Ten counties receive more than one million dollars in defense R&D contracts in North Carolina. This funding helps support local economies and industries outside of the traditional metropolitan areas.

INDICATOR 8: RESEARCH AND DEVELOPMENT (R&D)

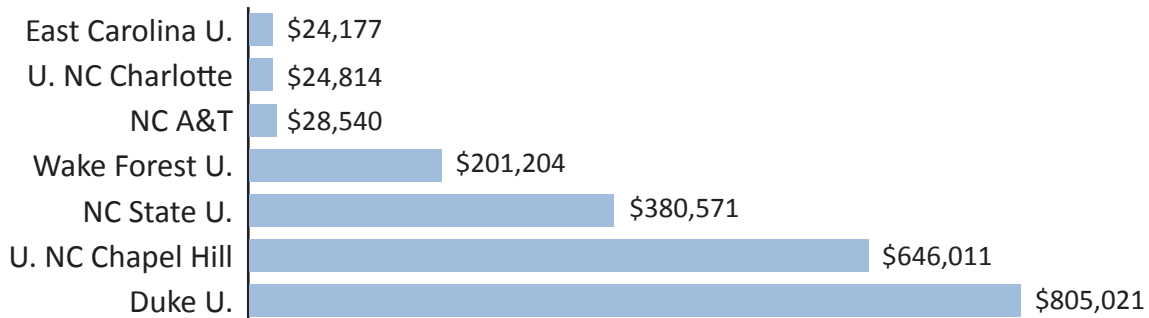
8-3 Federal Defense Contracts in R&D by County in North Carolina (Fiscal Year 2010)



USAspending.gov

Academic R&D, a critical innovation input and one of the State's competitive advantages, is highly concentrated in the Research Triangle region. In 2009, the three largest universities located in the Research Triangle Region – UNC-Chapel Hill, Duke University, and North Carolina State University – accounted for over \$1.8 billion, or 85 percent, in academic R&D expenditures within the State. These expenditures contributed to North Carolina's ranking among the top states in academic R&D. Significant activity also exists at other universities throughout North Carolina, including Wake Forest University, NC A&T, UNC Charlotte, and East Carolina [8-4].

8-4 R&D Expenditures at North Carolina Academic Institutions, 2009



National Science Foundation

INDICATOR 8: RESEARCH AND DEVELOPMENT (R&D)

The reputation for innovation associated with North Carolina's universities and colleges is due in part to the financial support they receive for R&D from state and local governments. Among comparison states, North Carolina ranked second behind Virginia (11.4 percent) with 10.5 percent of its academic R&D funding coming from state and local governments. Both North Carolina and Virginia lead competitor states by at least five percentage points in this metric. The North Carolina General Assembly has a strong tradition of supporting research and development. One of its most recent investments is the North Carolina Research Campus. Located in Kannapolis, the Research Campus is a public-private partnership established to advance health and nutrition research. The Federal Government tends to support both private and public institutions equally, whereas the State Government favors public institutions. Private industries typically support private institutions' R&D more than public institutions' R&D efforts.

What Does this Mean for North Carolina Economic Development?

North Carolina should continue to encourage public-private partnerships to help fuel innovation and balance the benefits and costs of research and development. The State should emphasize the dispersion of technology throughout the State, such as rural area broadband, to encourage regional knowledge ecosystems, where networks of collaboration are improved. Universities are likely to remain the center of successful R&D regions. Therefore, North Carolina should also continue to support universities and develop new learning programs targeted at R&D opportunities, such as defense. Research universities spark regional economic development through invention, innovation and technology transfer; thus they create an educated work force ready to meet the demands of an increasingly knowledge based economy. Additionally, universities themselves and the settings they provide attract smart and talented people to the area.³² R&D, along with other social, economic, and technological factors, creates new knowledge and contributes to innovation and the introduction of new goods, services, processes, and managerial practices.³³ Continued R&D investment is critical to North Carolina's efforts to diversify its industrial base, increase productivity, and attract and retain innovative companies and talented workers.

³² Anderson Economic Group, LLC. Et al. "Research and Development in the URC" An update to the 2010 Economic Impact Report. December 2010. http://andersoneconomicgroup.com/Portals/0/upload/AEG_R&DUpdate_PUBLIC.pdf

³³ National Science Foundation, National Center for Science and Engineering Statistics. "Science and Engineering Indicators 2010". January 2010. <http://www.nsf.gov/statistics/seind10/c4/c4s1.htm>

INDICATOR 9: ENTREPRENEURIAL AND SMALL BUSINESS CAPITAL

Key Findings

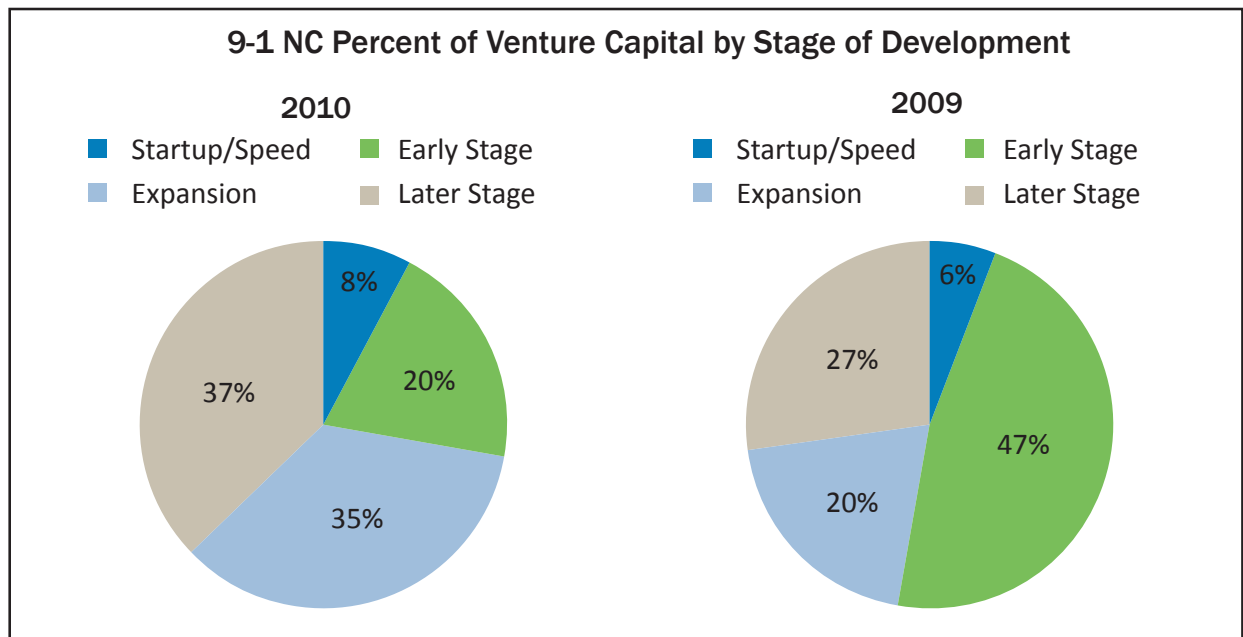
- In 2010 North Carolina, unlike the Nation, experienced an increase in venture capital funding.
- Out of total United States venture capital, 20 percent is contributed to the software industry, which is established and growing in North Carolina compared to the Nation as a whole.³⁴
- Federal funding of the SBIR/STTR Programs decreased substantially from 2009 to 2010 with North Carolina's share decreasing from \$47 million to \$3.5 million.

Indicator Overview

Stimulating entrepreneurial activity is an important and growing focus of economic development efforts throughout the United States. Venture capital is critical for technology-based start-ups and is most commonly used to stimulate the flow of equity to high-growth industries. The amount of venture capital available to companies is a predictor of potential new products and services, job creation, and revenue growth in a state. The U.S. Small Business Administration's Small Business Innovation Research (SBIR) and Small Business Technology Transfer (STTR) programs require certain federal agencies to set aside a percentage of their research and development (R&D) budgets for grants to small business. On average, companies that receive SBIR/STTR funding significantly out-perform similar companies that do not receive such support.³⁵

How Does North Carolina Perform?

Startup/seed capital is needed to get an entrepreneurial venture off of the ground. Businesses that typically obtain startup capital are young companies that have not produced a product or service for commercial sale. The companies are so new it may be difficult to obtain a commercial loan sufficient for covering all related startup expenses. In North Carolina, 8 percent of all venture capital in 2010 went to startup/seed projects [9-1]. While startup capital is risky, it is critical for fostering an entrepreneurial environment. Most venture capital is available at the expansion and later stages of development, which are considered more certain to provide profits. In 2010, the dollar value of venture capital funds in North Carolina was greater in all development stages, except early stage, compared to 2009. Venture capitalists have shifted investment decisions away from earlier stage ventures towards ventures in the expansion and later stages, thus reducing risks. Since 2009, there has been a substantial increase in funding for these expansion and later stage ventures.



PriceWaterhouseCoopers; National Venture Capital Association

³⁴ Hardin, John and Harder, Chris. 2003. Tracking Innovation: North Carolina Innovation Index. North Carolina Board of Science and Technology, North Carolina Department of Commerce. http://www.ncscitech.com/PDF/reports/ti_2003.pdf

³⁵ BusinessFinance.com. Seed Capital. February 2008. <http://www.businessfinance.com/seed-capital.htm>

INDICATOR 9: ENTREPRENEURIAL AND SMALL BUSINESS CAPITAL

In 2010, North Carolina businesses attracted approximately \$456 million in venture capital funding, down from 2008, but substantially higher than 2009 (\$244 million). North Carolina's share of national venture capital increased from 1.3 percent in 2009 to 2.1 percent in 2010. For the entire nation, California was the top state to receive funding in 2010 with 50 percent of total U.S. venture-backed investment. This is the third consecutive year California received 50 percent or more of total U.S. venture-capital. Massachusetts was second, capturing 11 percent of total U.S. dollars. North Carolina ranks 9th among all fifty states, trailing competitor states Massachusetts (2nd), and Pennsylvania (7th). North Carolina did have the highest dollar per deal ratio compared to all comparison states in 2010, with an average investment of \$8 million for each deal.

9-2 Venture Capital Funds and Number of Deals, by Select State

State	2010 Venture Capital Investment	Number of Deals	Dollar per Deal
GA	\$333,351,000	63	\$5,291,286
MA	\$2,372,657,300	351	\$6,759,707
MI	\$151,558,700	33	\$4,592,688
NC	\$456,256,200	57	\$8,004,495
PA	\$508,438,200	153	\$3,323,125
SC	\$20,715,000	8	\$2,589,375
VA	\$375,436,300	51	\$7,361,496

PriceWaterhouseCoopers; National Venture Capital Association

In recent decades, venture capital has played an instrumental role in supporting high-tech, high growth industries such as information technology.³⁶ Venture capital funding in the fourth quarter of 2010 was most likely to be spent on companies in the software industry.³⁷ Industrial/Energy³⁸ and Biotechnology were also highly rated industry options, comprising about 30 percent of all venture capital investments. These industries are technology dependent and require substantial capital in order to develop into mature firms.

Small businesses, which may not obtain funding through private venture capital, are granted venture funding from the Federal Government through the SBIR/STTR programs. Despite larger benefits to society, small firms generally under-invest in R&D, which is why the SBIR/STTR program goal of increasing R&D funding in small firms is valuable.^{39,40} Nevertheless, a steep decline in program funds occurred nationally as a result of spending cuts by the federal government. In 2010, North Carolina was granted slightly more than \$3.5 million down from \$47 million in 2009. All competitor states faced similar decreasing situations with South Carolina experiencing the largest decrease from the previous year [9-3]. Prior to 2010, SBIR/STTR funding remained relatively steady across the nation, until sharp program-wide decreases in 2010.

³⁶ National Venture Capital Association and HIS Global Insight, "Venture Impact, The Economic Importance of Venture Backed Companies to the U.S. Economy." 2009. http://www.nvca.org/index.php?option=com_content&view=article&id=255&Itemid=103

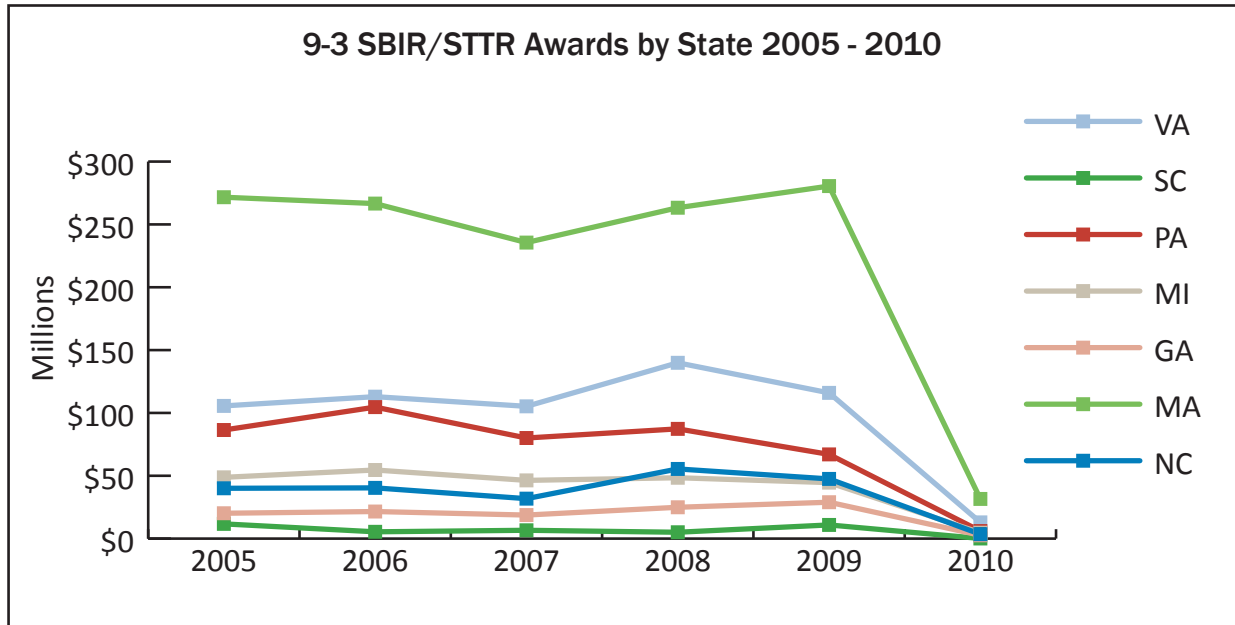
³⁷ PricewaterhouseCoopers and National Venture Capital Association, "MoneyTree Report, Q4 2010/Full-year 2010" January 2011. https://www.pwcmoneytree.com/MTPublic/ns/moneytree/filesource/exhibits/MoneyTree_Q42010_Full%20Year.pdf

³⁸ PricewaterhouseCoopers and National Venture Capital Association, "MoneyTree Report, Q4 2010/Full-year 2010" January 2011. https://www.pwcmoneytree.com/MTPublic/ns/moneytree/filesource/exhibits/MoneyTree_Q42010_Full%20Year.pdf

³⁹ Industrial/Energy is defined as "Producers and suppliers of energy, chemicals, and materials, industrial automation companies and oil and gas exploration companies. Also included are environmental, agricultural, transportation, manufacturing, construction and utility-related products and services". <https://www.pwcmoneytree.com/MTPublic/ns/nav.jsp?page=definitions>

⁴⁰ Small firms tend to under-invest in R&D because they receive considerably less benefit (profits) than society (new products/services, knowledge externalities, economic spillovers, etc.). Government can counter this by supporting research efforts that promise potential gains for society but are unlikely to yield immediate gains (profits) to the innovating firm. Wallsten, S. 2000. "The R&D Boondoggle." Regulation, Vol. 23, No.4, pp. 12-16. <http://www.cato.org/pubs/regulation/regv23n4/wallsten.pdf>

INDICATOR 9: ENTREPRENEURIAL AND SMALL BUSINESS CAPITAL



U.S. Small Business Administration

What Does this Mean for North Carolina Economic Development?

Without venture capital, many innovative companies in North Carolina will not realize their full growth potential. Venture capital is highly concentrated in two regions in the United States: Silicon Valley and New England (Boston). More entrepreneurs creating start-ups, sharing knowledge, and attracting venture capital funds exponentially increases the prospect of North Carolina emerging as a vibrant incubator.⁴¹ Given North Carolina's strength in research at its universities and in the private sector, an emphasis should be placed on improving venture capital opportunities in the State, particularly early-stage capital by further linking the private sector with research universities, as university based research has significant local spillovers. Universities and research institutions create technology transfer of new ideas between entrepreneurs and encourage growth among start up ventures in new industries.⁴² More established industries such as software and biotech continue to require venture capital funds for technological innovation. Given the presence of these industries in the State, North Carolina has an opportunity in increasing investment and employment in these industries. The more successful North Carolina continues to be in industries where a mature presence exists, the more venture capital dollars the State is likely to attract for these industries and for new, emerging industries and firms. This portfolio approach could increase the State's standing as a venture capital hub over the long-term.

⁴¹ In general, entrepreneurs who start companies do not relocate but stay close to the source of their perceived competitive advantage. Feldman, M. 2003.

"The Emergence of Entrepreneurship Policy: Governance, Start-ups, and Growth in the U.S. Knowledge Economy." Chapter 5, pg. 107. Edited by David Hart, 2003. Cambridge University Press

⁴² Jaffe, Adam B. "Universities and Regional Patterns of Commercial Innovation." REI Review (1989).

INDICATOR 10: EDUCATIONAL ATTAINMENT

Key Findings

- In 2009, North Carolina was at the national average with 43 percent of the State's citizens not pursuing formal education beyond high school.
- Between 2000 and 2009, North Carolina outperformed the national average and benchmark states in reducing the percent of 25+ population having attained less than a high school graduation or equivalent (-7.0 points). North Carolina also tied or outperformed all comparison states by increasing the percent of 25+ population having attained a bachelor's degree or higher (+2.4 points).
- In the 2008-2009 academic year, North Carolina trailed the national average in the number of graduate degrees awarded in science and engineering fields.

Indicator Overview

Education is a key driver of economic prosperity. Educational attainment measures the highest education level completed by an area's population. Higher levels of education tend to lead to higher wages, improve a worker's ability to adapt to changing economic conditions and utilize new technologies, and are increasingly a prerequisite for employment in knowledge-based industries.

How Does North Carolina Perform?

Overall, North Carolina is comparatively less educated than the nation as a whole and many benchmark states. In 2009, the State trailed or tied national averages in all educational attainment categories except for Associate's Degrees and Some College/No Degree [10-1]. In addition, North Carolina trailed all benchmark states except for South Carolina for the percent of population over twenty-five years of age having attained a graduate degree. Only Georgia and South Carolina had more people with less than a high school diploma or equivalent.

10-1 Educational Attainment by Degree Category, 2009

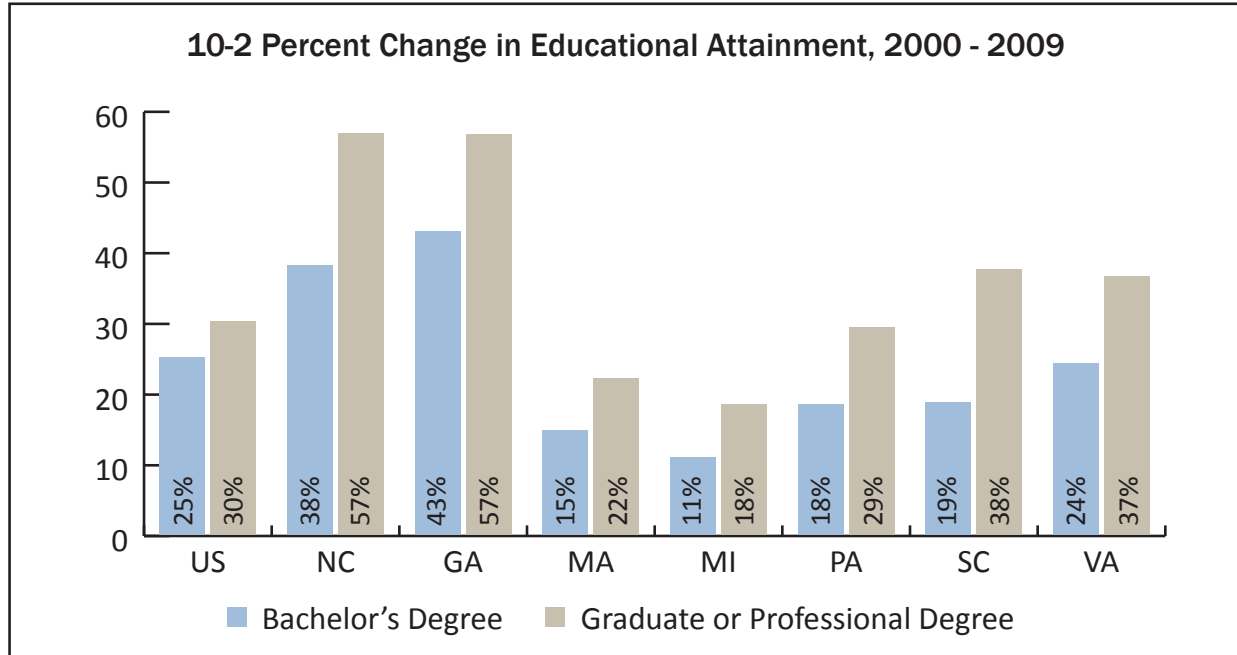
(Percent persons 25 years and older)

	US	NC	GA	MA	MI	PA	SC	VA
Less than a High School Graduation or Equivalent	14.8%	15.6%	16.1%	11.1%	12.1%	13.2%	16.4%	13.4%
High School Graduation or Equivalent	28.5%	27.3%	28.9%	26.3%	31.1%	37.7%	30.3%	25.4%
Associate's Degree	7.5%	8.5%	6.4%	7.7%	8.2%	7.3%	8.4%	6.6%
Some College, No Degree	21.3%	22.0%	21.0%	16.7%	24.1%	16.6%	20.6%	20.6%
Bachelor's Degree	17.6%	17.7%	17.6%	21.8%	15.2%	16.2%	15.9%	19.9%
Graduate or Professional Degree(s)	10.3%	8.8%	9.9%	16.4%	9.4%	10.2%	8.4%	14.1%

U.S. Census Bureau

However, North Carolina ranks high for improving educational attainment in two important categories. The State reduced the percent of the 25+ population having attained less than a high school graduation or equivalent, from 22.6 percent in 2000, to 15.6 percent in 2009, a decrease of 7.0 percentage points. Comparatively, the nation as a whole reduced the percent of the 25+ population with less than a high school degree or equivalent by 3.7 percentage points over the same period. Also, North Carolina increased the number of the 25+ population with a bachelor's degree by 38 percent, equating to 300,522 more bachelor's degrees in 2009 than in 2000 and a 57 percent increase in graduate and professional degrees (+196,118) [10-2]. During the same period, the United States increased educational attainment for the 25+ population with a bachelor's degree or higher by 35 percent.

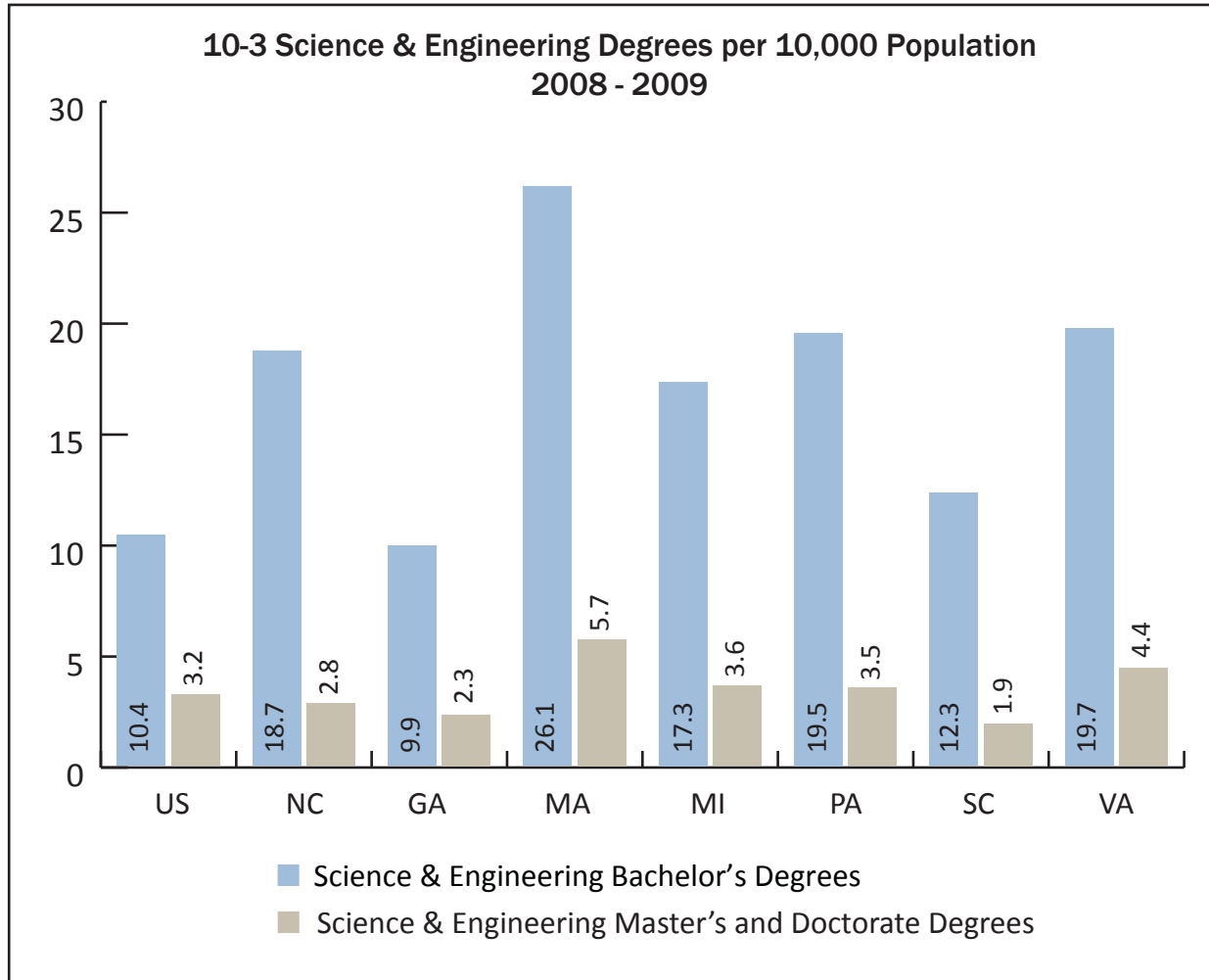
INDICATOR 10: EDUCATIONAL ATTAINMENT



Integrated Postsecondary Education Data System, National Center for Education Statistics

Science and engineering education is an important indicator for economic development because the skills associated with their education are needed in knowledge-based jobs. During the 2008-2009 academic year, North Carolina's performance was mixed. The State produced 18.7 science and engineering bachelor's degrees and 2.8 science and engineering master's and doctorate degrees per 10,000 population [10-3]. North Carolina ranked higher than Georgia, Michigan, South Carolina and the United States for awarded science and engineering bachelor's degrees. However, the State trailed all comparison states except for South Carolina and Georgia in terms of awarded master's and doctorate degrees.

INDICATOR 10: EDUCATIONAL ATTAINMENT



Integrated Postsecondary Education Data System, National Center for Education Statistics

What Does this Mean for North Carolina Economic Development?

The growth of North Carolina's economy is predicated on the capabilities of its workforce, and educational attainment is a fundamental way of measuring those capabilities. North Carolina's educational attainment levels, including conferred science and engineering degrees, rank below the national figures and key benchmark states. This means North Carolina employers could face challenges finding and hiring a highly educated workforce, particularly workers necessary for knowledge-based industries. However, North Carolina's documented progress suggests the State's labor force is improving more rapidly than the Nation as a whole and most benchmark states in many categories. Employers seek locations producing and attracting a highly educated workforce. Continuing to target investment in education will enable North Carolina's population to move up the educational attainment ladder and continue to attract a workforce employers seek.

INDICATOR 11: STATE GROSS DOMESTIC PRODUCT

Key Findings

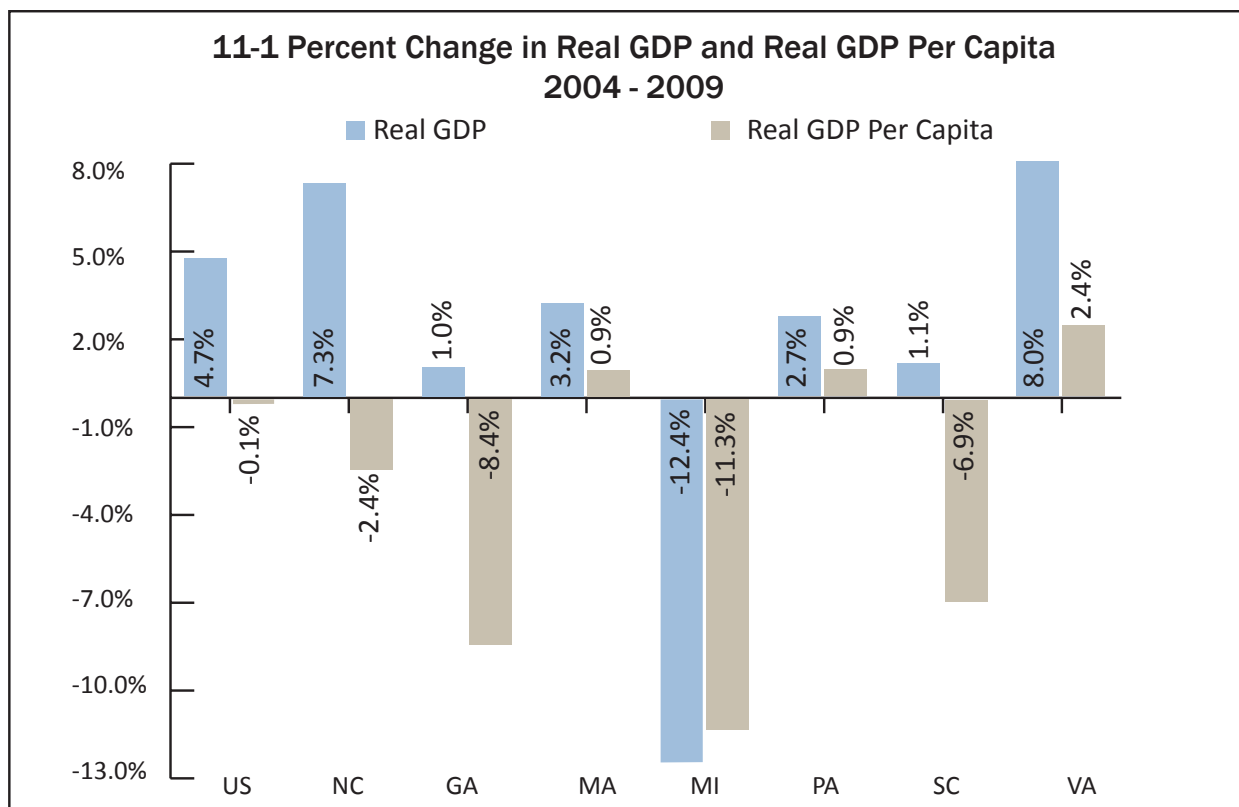
- Between 2004 and 2009, North Carolina's Real Gross Domestic Product (GDP) grew by 7.3 percent, greater than the U.S. average and five of the six comparison states.
- However, since the start of the recession (2007) Real GDP has fallen 4.5 percent.
- In 2009, North Carolina's per capita real GDP was \$38,847, slightly below the national per capita real GDP.
- In 2009, the Government was the leading contributor to the State's GDP and replaced nondurable goods manufacturing, which had been the leading contributor to the State's GDP in 2007.

Indicator Overview

One of the most common ways to measure a state's overall economic performance or strength is to look at state gross domestic product (State GDP). The U.S. Bureau of Economic Analysis (BEA) defines GDP as a measurement of a state's output – the value added in production by the labor and property located in the state. State GDP is the monetary value of all goods and services performed in a state in one year.

How Does North Carolina Perform?

In the years before the recession the State experienced significant economic growth. In 2004, North Carolina's Real GDP⁴³ was \$335.9 billion. Real GDP peaked in 2007 at \$377.6 billion before declining to \$360.5 billion in 2009. Despite the decrease from 2007 to 2009 the State's Real GDP grew by 7.3 percent from 2004 to 2009, greater than the U.S. average of 4.7 percent and faster than all comparison states [11-1] except Virginia.

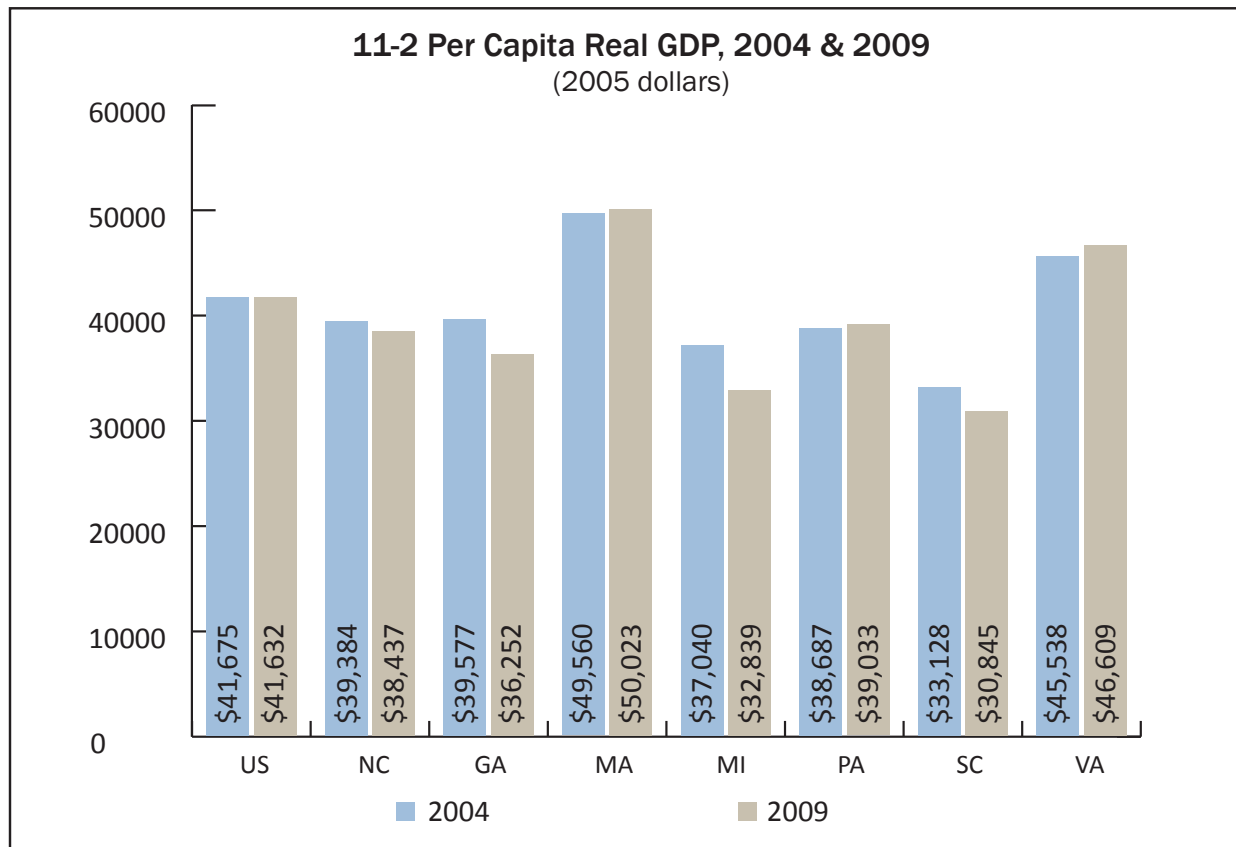


U.S. Bureau of Economic Analysis

⁴³ "Real" GDP is Gross Domestic Product adjusted for inflation; stated in terms of a base year (2005).

INDICATOR 11: STATE GROSS DOMESTIC PRODUCT

Per capita Real GDP by state is an important measure of prosperity for an area. It is calculated by dividing the Real GDP of the state by the state's population. In 2009, North Carolina's per capita Real GDP was \$38,437, down from \$39,384 in 2004 [11-2]. The State's per capita Real GDP was slightly less than the United States (\$41,632) and significantly less than Massachusetts (\$50,023) and Virginia (\$46,609). During the same period (2004 to 2009) North Carolina's per capita Real GDP growth rate was -2.4 percent and behind the national average of -0.1 percent. It's interesting to note North Carolina's Real GDP increased more than all but one benchmark state between 2004 and 2009, while Real GDP per capita decreased faster than all but one benchmark state over the same period. This is a result of North Carolina's population increasing more rapidly than Real GDP. Even still, North Carolina had a smaller decline in Real GDP Per Capita than South Carolina, Georgia, and Michigan over the 5 year period.



U.S. Bureau of Economic Analysis

Government in North Carolina was the largest contributor to GDP over the course of the recession. In 2009, North Carolina government accounted for 14.3 percent of the total State GDP, up from 12.9 percent in 2007. The finance and insurance industry was also a major contributor to State GDP at 11.6 percent, up from 10.2 percent in 2007 [11-3]. Real estate and nondurable goods manufacturing continued to be important industries for North Carolina, with both contributing over 10 percent to State GDP. Since 2004 the finance and insurance industry has seen the largest percentage point increase in its contribution to State GDP. Finance and insurance's portion of State GDP increased 1.3 percentage points from 2004 to 2009.

INDICATOR 11: STATE GROSS DOMESTIC PRODUCT

11-3 Top Ten Industries Contributing to North Carolina's GDP, 2009

2-Digit NAICS Industry	2009 % of State GDP	2007 % of State GDP	5 Year Trend 2004 to 2009
Government	14.3%	12.9%	Increase
Finance and insurance	11.6%	10.2%	Increase
Real estate and rental and leasing	10.5%	9.7%	Increase
Nondurable goods manufacturing	10.1%	13.0%	Decrease
Durable goods manufacturing	8.0%	8.7%	Increase
Health care and social assistance	6.8%	6.2%	Increase
Wholesale trade	6.0%	5.5%	Increase
Retail trade	5.7%	6.0%	Decrease
Professional and technical services	5.3%	5.0%	Increase
Information	3.6%	3.2%	Increase

U.S. Bureau of Economic Analysis

What Does this Mean for North Carolina Economic Development?

With respect to GDP, North Carolina's economy continues to perform well despite the recession. During the recession industries such as manufacturing and construction declined, but their economic activity has been offset by growth in government and the financial and insurance industries. North Carolina must maintain its commitment to economic development activities that has helped companies maintain output and bring new companies to the state. Activities include the support of entrepreneurship, enhancing research and development, encouraging investment in new technologies, and investing in workforce development programs that transition workers to knowledge-based industries.

INDICATOR 12: LABOR PRODUCTIVITY

Key Findings

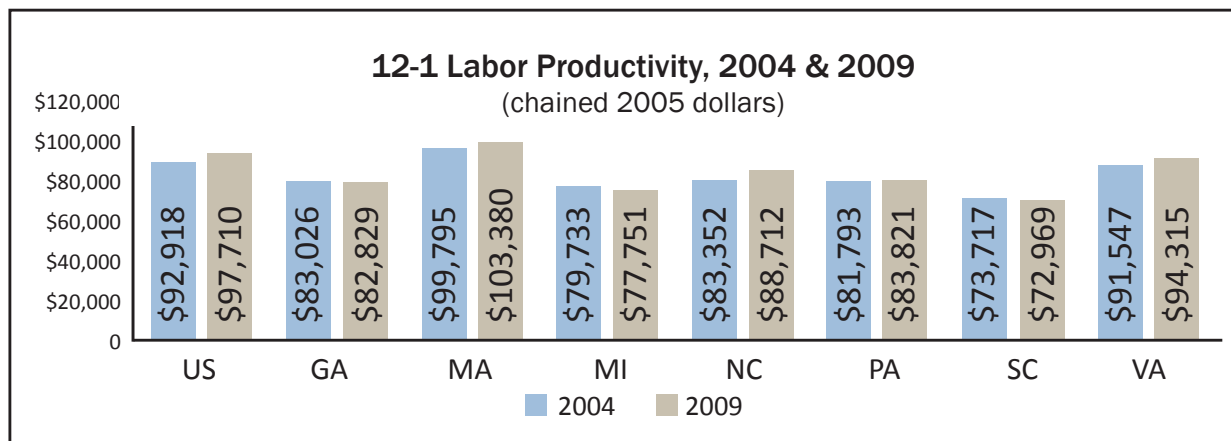
- North Carolina's labor productivity ⁴⁴ (\$88,712) remains below the national average (\$97,710) but above competitor states Georgia (\$82,829), Michigan (\$77,751), Pennsylvania (\$83,821), and South Carolina (\$72,969).
- Between 2004 and 2009, real labor productivity in North Carolina grew by 6.4 percent, which is slightly higher than the United States average growth of 5.2 percent, and better than all the other comparison states.
- North Carolina's growth in labor productivity is driven by a variety of industry sectors across different segments of the economy, including manufacturing and information.

Indicator Overview

It is important to understanding the dynamics of labor productivity in order to strategically formulate policies to support economic growth. Productivity represents the amount of output per unit of input. For state comparison purposes, output is measured in terms of Gross Domestic Product (GDP), and input is measured in terms of employment. Labor productivity growth can be divided into several components: 1) an increase in the amount of capital per worker; 2) an increase in the skills and education of the average worker; and 3) technological advances. Not only is labor productivity growth tied to earnings growth and standard of living, it also provides a direct measure of a state's competitive position over time.⁴⁵

How Does North Carolina Perform?

In 2009, North Carolina's labor productivity was \$88,712, up from \$83,352 in 2004 [12-1]. However, North Carolina's labor productivity is below the national average (\$97,710), but above comparison states Georgia (\$82,829), Michigan (\$77,751), Pennsylvania (\$83,821), and South Carolina (\$72,969). In general, industries utilizing advanced technology are able to produce more output per worker than labor intensive industries. During economic downturns, less productive equipment and labor become more expendable.



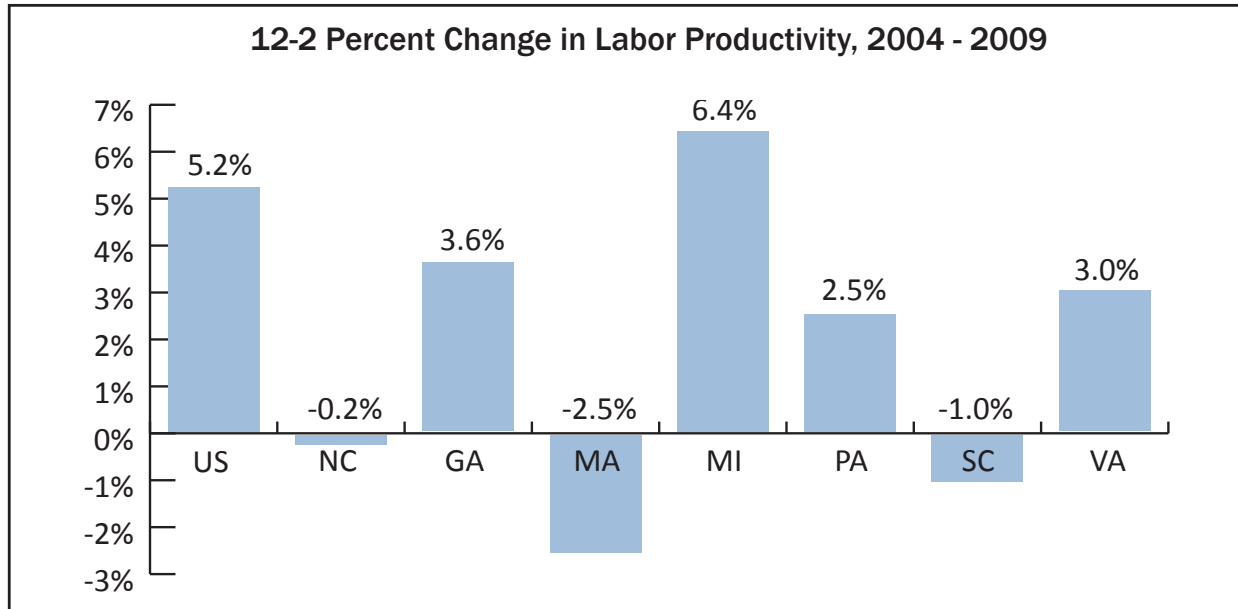
U.S. Bureau of Labor Statistics; Bureau of Economic Analysis, U.S. Department of Commerce

Between 2004 and 2009, North Carolina's real labor productivity increased 6.4 percent, more than the U.S. average increase of 5.2 percent, and above all the comparison states [12-2]. Massachusetts, Pennsylvania, and Virginia also had real labor productivity growth, whereas South Carolina, Michigan, and Georgia all saw decreases in labor productivity.

⁴⁴ 2009 Labor Productivity Calculations are reported in chained, 2005 dollars.

⁴⁵ Bauer, Paul and Yoonsoo Lee. "Labor Productivity Growth Across States." Economic Commentary, Federal Reserve Bank of Cleveland, September 6, 2005. <http://ideas.repec.org/a/fip/fedcec/y2005ijun.html>.

INDICATOR 12: LABOR PRODUCTIVITY



U.S. Bureau of Labor Statistics; Bureau of Economic Analysis, U.S. Department of Commerce

North Carolina industries experienced significant labor productivity growth from 2004 to 2009. Figure 12-3 outlines changes in industry productivity along with its component measures, output and employment. The Manufacturing and Information sectors had the highest levels of productivity growth and experienced increasing output but employment declines. This suggests an increase in automation and the use of more advanced technologies to remain competitive. These measures are often used during recessionary periods to reduce costs and increase efficiency.

12-3 North Carolina Labor Productivity Growth and Components by Select Industries 2004 - 2009

	Employment Growth	Output Growth	Productivity Growth
Traditional Industries			
Agriculture	-5.7%	6.9%	13.3%
Construction	-12.1%	-29.6%	-19.9%
Manufacturing	-22.6%	-0.8%	28.2%
New Economy Industries			
Information	-4.0%	21.9%	27.0%
Finance and Insurance	5.0%	20.5%	14.7%
Professional and Technical Services	18.7%	21.0%	1.9%
Local (Non-traded) Industries			
Retail	0.3%	-0.4%	-0.7%
Real Estate	2.4%	17.9%	15.1%
Healthcare	21.2%	18.9%	-1.9%

U.S. Bureau of Economic Analysis; North Carolina Employment Security Commission

INDICATOR 12: LABOR PRODUCTIVITY

What Does this Mean for North Carolina Economic Development?

The state's recent increase in labor productivity can be attributed to the recession as well as broader industry trends. The State has experienced significant job losses in the manufacturing sector, a sector affected by recessionary periods more than most. Reducing employment in a sector that does not have high labor productivity levels serves to increase productivity. Additionally, those firms and employees remaining in the manufacturing sector will be more productive, thus increasing the level of productivity in the manufacturing sector itself. North Carolina's economy is transitioning to more technology and knowledge-intensive enhancements with regards to investments and use of capital and labor. This change is even occurring in the traditional industries. The State should continue to support companies that upgrade their technology and take advantage of new innovations. Also, the State should continue to focus on training and educating its workforce with a particular emphasis on preparing workers for employment in technology-intensive industries and advanced manufacturing.

INDICATOR 13: FIRM GROWTH

Key Findings

- In 2010, North Carolina ranked 17th in the nation for fastest growing firms.^{46,47}
- The total number of firms in the manufacturing industry decreased significantly between 2004 and 2008.
- North Carolina ranked second among competitor states, with an 8.7 percent increase in the number of large firms from 2005 to 2009.

Indicator Overview

Firms are generally defined as business entities that are not necessarily tied to one state or location. Establishments are individual businesses. Many firms, especially large firms, have multiple establishments in different states and countries. A vibrant entrepreneurial economy is typically characterized by a high rate of firm turnover, including both firm openings and closings. Net firm creation is the overall change in number of firms from one year to the next.⁴⁸ Positive net firm growth generally reflects a healthy economy in which new business locations and start-ups outpace firm closings and relocations out-of-state. While many entrepreneurial ventures fail within the first few years, others experience significant growth. The prevalence of new, rapidly growing firms is a sign of a dynamic and adaptive state economy.

How Does North Carolina Perform?

In a 2010 Kauffman Foundation ranking of states with the fastest growing firms, Massachusetts and Virginia ranked first and second in the Nation, respectively. Georgia (9th) and Pennsylvania (14th) also ranked ahead of North Carolina (17th).⁴⁹ Between 2005 and 2009, North Carolina saw a decrease in the total number of firms by -1.2 percent. Among comparison states only South Carolina experienced a positive change, 2.1 percent, in the total number of firms. Following the same trend, small firms with less than 50 employees decreased in all benchmark states except South Carolina. However, the number of large firms increased between five and ten percentage points in all comparison states. North Carolina ranked second behind South Carolina in percent change in large firms from 2005 to 2009 with an increase of 8.7 percent. Larger firms typically have an economic advantage when innovation and production involve large fixed costs. On the other hand, when flexibility or the ability to shift resources is more appropriate, smaller firms have an advantage. Thus, while size does matter in the innovation and growth of a firm, the relationship varies based on market opportunities.

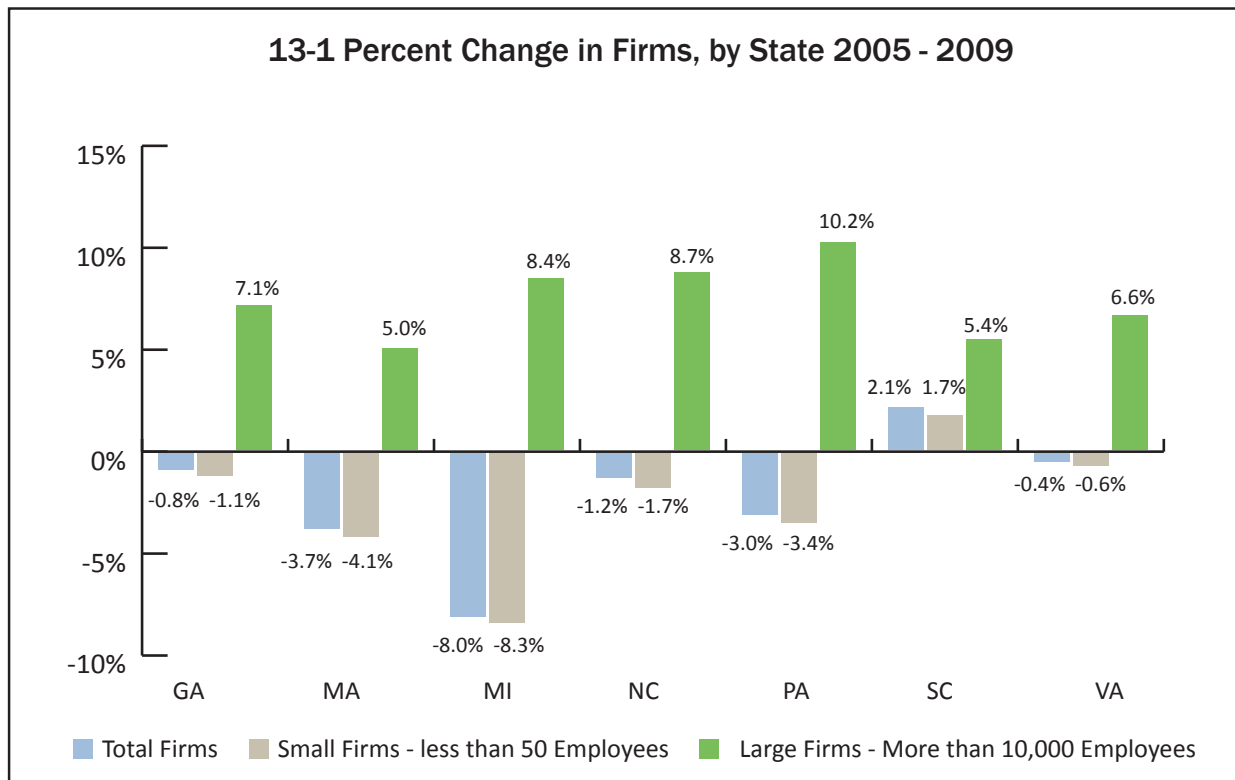
⁴⁶ The Information Technology & Innovation Foundation/The Kauffman Foundation, "The 2010 State of the New Economy Index", November 2010. <http://itif.org/publications/2010-state-new-economy-index>

⁴⁷ This is a measure of the number of Deloitte Technology Fast 500 and Inc. 500 firms as a share of total firms

⁴⁸ Accounts for start-ups, firm closings, locations and relocations, and reorganizations

⁴⁹ The Fast 500 and Inc. 500 lists are composed of the fastest-growing firms, revenue growth of at least 200 percent over a four-year span and 300 percent growth in three years, respectively. While firms attaining such growth rates generally have fewer than 100 employees, they represent a state's most successful entrepreneurial efforts and hold the most promise for continued growth. Microsoft and Paul Mitchell, among others, were listed on the Inc. 500 before they became household names. A state's performance in this measure is one indication of the vitality of its entrepreneurial network.

INDICATOR 13: FIRM GROWTH



The presence of large firms, with 10,000 or more employees nationally, is increasing in the State. There were 701 large firms with establishments in North Carolina, making up only 0.5 percent of all firms in the State.⁵⁰ Almost 93 percent of all firms in North Carolina had 1-49 employees. Therefore, even though larger firms are increasing in number, only a small number of all firms in NC have more than 50 employees. For comparison, the increases in large firms added 27,000 jobs to the State from 2005 to 2009, but the decrease in small firms (fewer than 50 employees) cost the State over 43,000 jobs in the same period.

A firm's age is an important characteristic to consider when analyzing firms. The distinction of firm age has been noted as a major driver of job creation. A report by the Kauffman Foundation showed that nationally, most net job creation is attributable to firms that have existed between one and five years.⁵¹ However, in North Carolina, firms ages 1-5 had the largest decreases in net job creation rates in 2009.⁵² These figures are the effects of the increasing climate of risk aversion resulting from the recent recession. All parties, including investors and entrepreneurs, have likely found it more difficult or are unwilling to devote time and resources to creating new businesses.

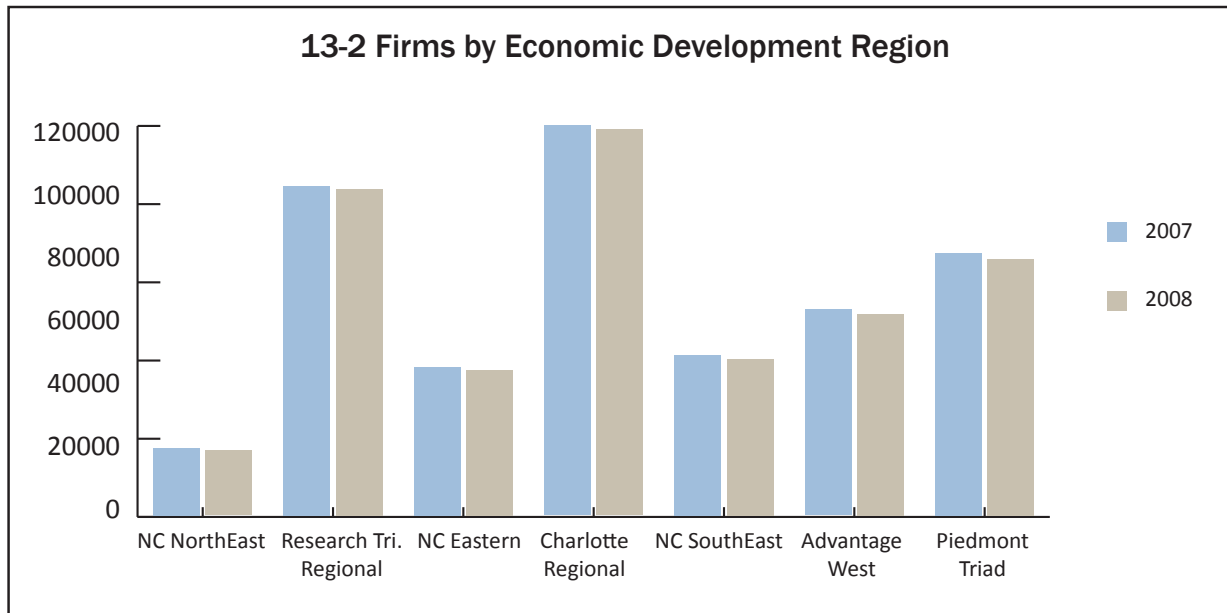
Comparing firms across economic development regions shows the Charlotte Regional Partnership having the most firms, followed by the Research Triangle Regional Partnership. From 2007 to 2008 the Northeastern region saw the greatest decline in number of firms, -3.4 percent, and had the lowest number of firms compared to other regions. The South Eastern region saw the next highest decline in firms, (-2.6 percent), followed by the Piedmont Triad (-2.4 percent), Advantage West (-2.3 percent), and the Eastern region (-2.2 percent). The Research Triangle and Charlotte Regions had the smallest percentage change in the number of firms from 2007 to 2008 with -0.9 percent and -1 percent respectively.

⁵⁰ Note: Here the size of the firm refers to the business as a whole. A large firm may have fewer than 10,000 employees in the state of North Carolina, but more than 10,000 employees as a whole.

⁵¹ The Kauffman Foundation Research Series: Firm Formation and Economic Growth. "Where Will the Jobs Come From," November 2009. http://www.kauffman.org/uploadedfiles/where_will_the_jobs_come_from.pdf

⁵² Net Job Creation, as defined by the Kauffman Foundation is described as the inflow and outflow of employment in firms of every age including churning, where some classes of firms may have a higher inflow than outflow and greater pool of firms, thus generating a positive net figure

INDICATOR 13: FIRM GROWTH



U.S. Census Bureau, *County Business Patterns*

Looking at firms of all sizes and all ages, North Carolina's economic sector with the most firms in 2008 was the Education Services industry sector, with 15 percent of the total share of firms.⁵³ In 2004 the sectors with the most firms were manufacturing (16 percent) and retail trade (14 percent). Professional, Scientific and Technical Services, along with Administrative and Support and Waste Management and Remediation Services, and Real Estate were the only industries to see increases in the share of total firms between 2004 and 2008. Firms in the Retail Trade, Wholesale Trade, Forestry, Fishing Hunting, and Agricultural Support and the Management of Companies industries experienced a decrease in the percent share of total firms from 2004 to 2008. Overall these changes, either positive or negative, were marginal.⁵⁴ Within the time period, most industries remained stable in the number of firms.

What Does this Mean for North Carolina Economic Development?

North Carolina continues to remain competitive nationally in terms of firm growth, even though the number of firms in the State has declined over the last five years. The decline has been less severe than many comparative states, and is in large part due to the recent recession. Continued global pressures on traditional industries in the State have shifted firm growth to new industries. The expectation is these sectors will continue to experience expanding firm numbers. The economy of the future is categorized by fast-growing, entrepreneurial companies. Innovation is increasingly becoming an important determinant of competitive advantage, and the ability of North Carolina to rejuvenate itself through the formation of new, innovative companies is critical to its economic vitality.⁵⁵ Additional early-stage capital, more advanced entrepreneurial networks, and improved technology transfer are associated with greater firm growth and a larger, more diversified economy.

⁵³ Educational firms are private businesses that provide educational services such as private tutoring and employment training. Private for-profit and nonprofit schools and universities are also included in this group. Public schools and universities are not included in this count.

⁵⁴ Changes in the number of firms was less than or equal to one percentage point, for both increasing industries and decreasing industries.

⁵⁵ The Information Technology & Innovation Foundation/The Kauffman Foundation. "2008 State of New Economy Index," November 2008. http://www.itif.org/files/2008_State_New_Economy_Index.pdf

INDICATOR 14: EARNINGS

Key Findings

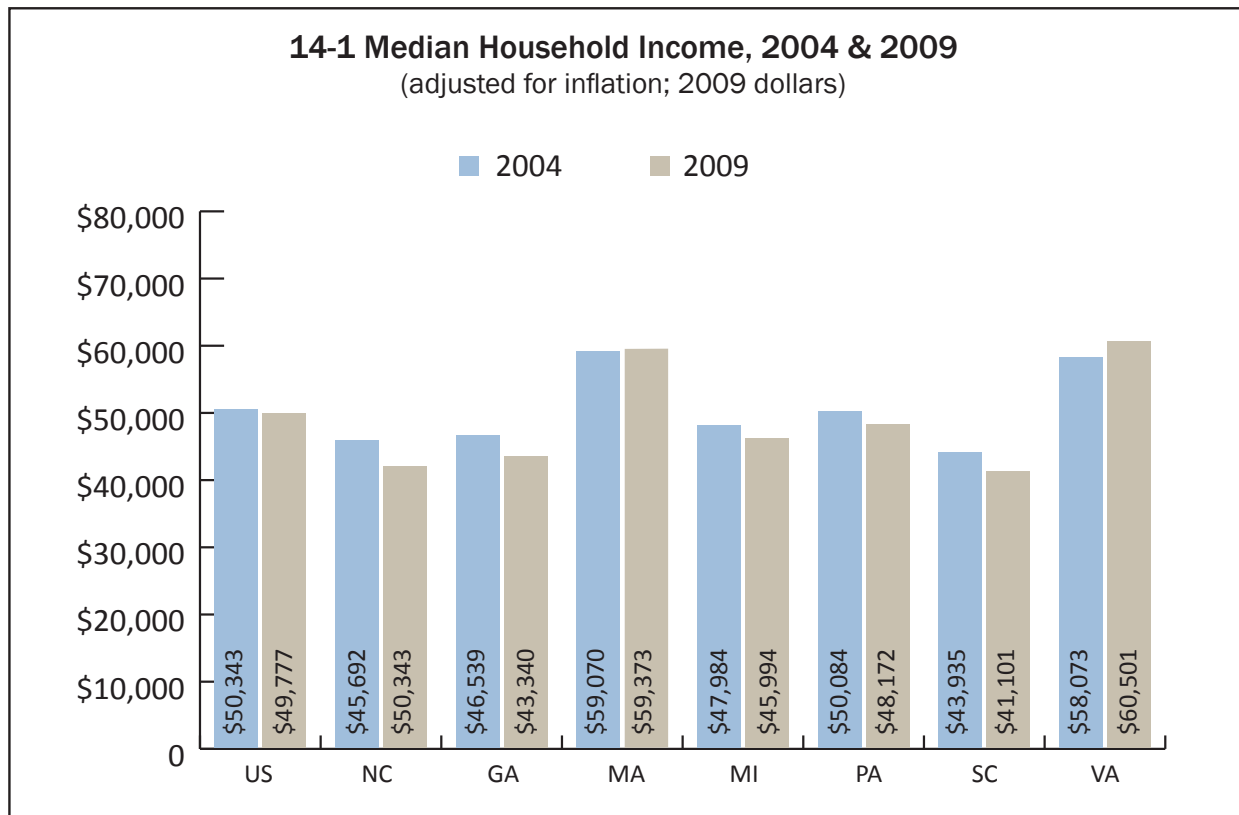
- North Carolina's median household income was 84 percent of the United States average and the second lowest among comparison states.
- North Carolina ranked eighth in the nation in pay parity for men and women in 2009. It was the only state among the comparison states to be ranked in the top 10.
- North Carolina's economic development regions, led by the Research Triangle Region, saw an average weekly wage increase of \$11 from 2005 to 2010 when adjusting for inflation.

Indicator Overview

Earnings are often cited as a key indicator of job quality and the overall health of an economy. Increasing the number of high-wage jobs is a major goal of economic development. It allows for greater consumer spending which leads to economic growth. North Carolina's relatively low earnings (median household income and average weekly wage) reflect the state's comparatively low cost of living and its traditional concentration of labor intensive industries.

How Does North Carolina Perform?

In 2009, North Carolina's median household income⁵⁶ was \$41,906, below the national average of \$49,777 and all comparison states except South Carolina [14-1] – this standing also exists across gender lines. The State's median household income was 84 percent of the national average in 2009, down from 91 percent in 2004. From 2004 and 2009, North Carolina experienced the largest decline (8.3 percent) in median household income among comparison states and the fourth largest decline in the Nation.

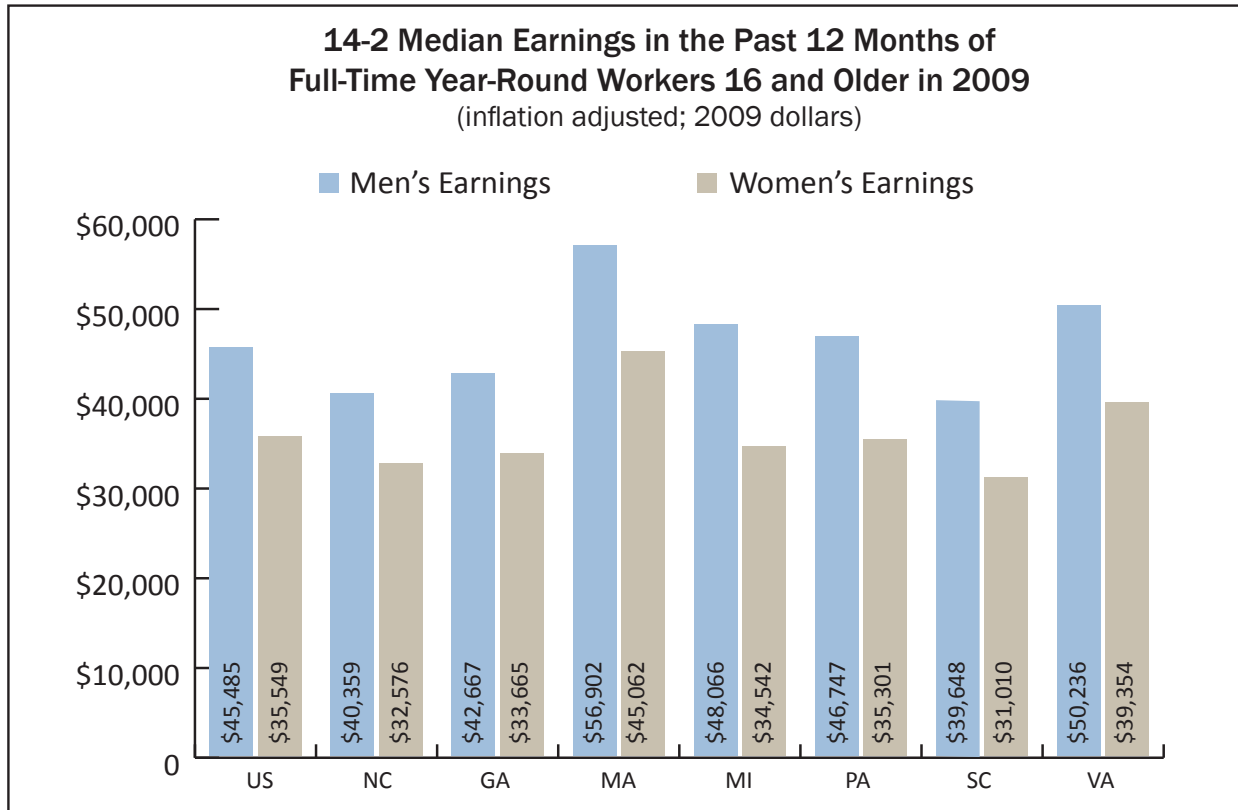


U.S. Census Bureau

⁵⁶ Household income is the sum of income received in the calendar year by the head of household and all household members 15 years old and over (U.S. Census Bureau).

INDICATOR 14: EARNINGS

Despite a decline in median household income North Carolina has made strides in closing the earnings⁵⁷ gap between men and women. Having equal earnings between men and women is referred to as pay parity. North Carolina ranks among the top in the nation in equal pay for men and women. In North Carolina, women’s median earnings are 80.7 percent of men’s earnings. This means for every \$100 men earn women earn \$80.70. North Carolina has the eighth highest ratio in the nation. Among our competitor states Massachusetts has the next highest ratio of 79.2 percent, placing them 12th nationally. Georgia, Virginia, and South Carolina are also among the top 20 states in the nation at 14th, 19th, and 20th, respectively. Pennsylvania (75.5 percent) and Michigan (71.9 percent) rank in the bottom two among comparison states and both are below the national average (78.2 percent) in pay parity. Pay parity is important because it implies equal wages and opportunities, which helps boost workplace morale and productivity.

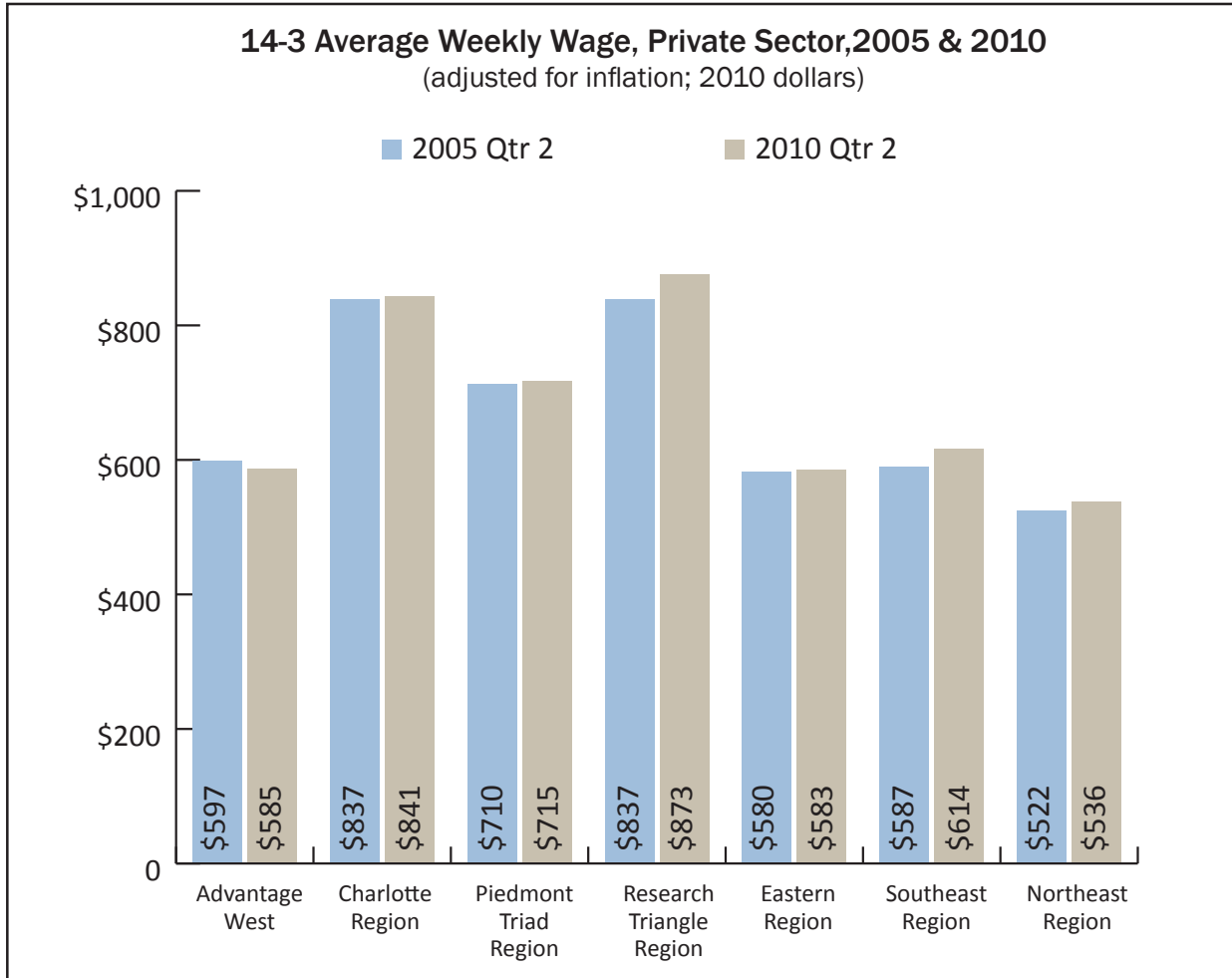


U.S. Census Bureau, American Community Survey, 2009

The Research Triangle, Charlotte, and Piedmont Triad regions had the highest average weekly wages in 2010 (\$873, \$841, and \$715, respectively) [14-3]. These urban regions have a high concentration of highly paid, knowledge-based jobs. When adjusted for inflation, there has been little increase in average weekly wages across the state between 2005 and 2010. The Southeast region experienced the largest percentage increase in wages, 4.6 percent, followed closely by the Research Triangle region (4.3 percent). The Northeast region was the only other region to experience an average weekly wage increase over two percent (2.7 percent). The Advantage West region experienced the only decrease, declining 2 percent since 2005. The Charlotte, Piedmont Triad, and Eastern regions experienced relatively low growth with 0.5 percent, 0.7 percent, and 0.5 percent growth respectively.

⁵⁷ "Earnings" are defined as the sum of wages, salary, and net self-employment income and do not include other income sources such as property income, government cash transfers, employer benefits or other types of cash income.

INDICATOR 14: EARNINGS



N.C. Employment Security Commission

What Does This Mean for North Carolina Economic Development?

Earnings provide an important look into the economic well being of families in the State. Healthy economies generate opportunities for individuals and households to increase incomes by providing jobs with competitive wages for all people regardless of sex and education level. As North Carolina continues its transition into a more service based economy the State must maintain a focus on expanding high-wage industries, providing job training opportunities in new industries and improving the education and skill levels of the labor force.

INDICATOR 15: INCOME DISTRIBUTION

Key Findings

- North Carolina had a higher percentage of tax returns filed by the lowest income category than did the United States as a whole.
- Nationally, the number of households claiming the earned income tax credit increased by over two million, from 22,418,110 in 2004 to 24,780,454 in 2008.
- Forty percent of North Carolina's counties have average per capita income at or below the federal poverty level for a three person household.

Indicator Overview

Promoting economic opportunity for citizens regardless of income level is an essential goal of economic development in North Carolina. Income distribution is an important indicator for measuring the degree to which North Carolina's economy is creating opportunities for all residents across the state. The last year of available data from the IRS is 2008, which economists mark as the start of the Great Recession, so none of the trends in income and jobs from the downturn are captured. Nevertheless, data suggest the number of low to moderate income families in the State continues to rise.

How does North Carolina Perform?

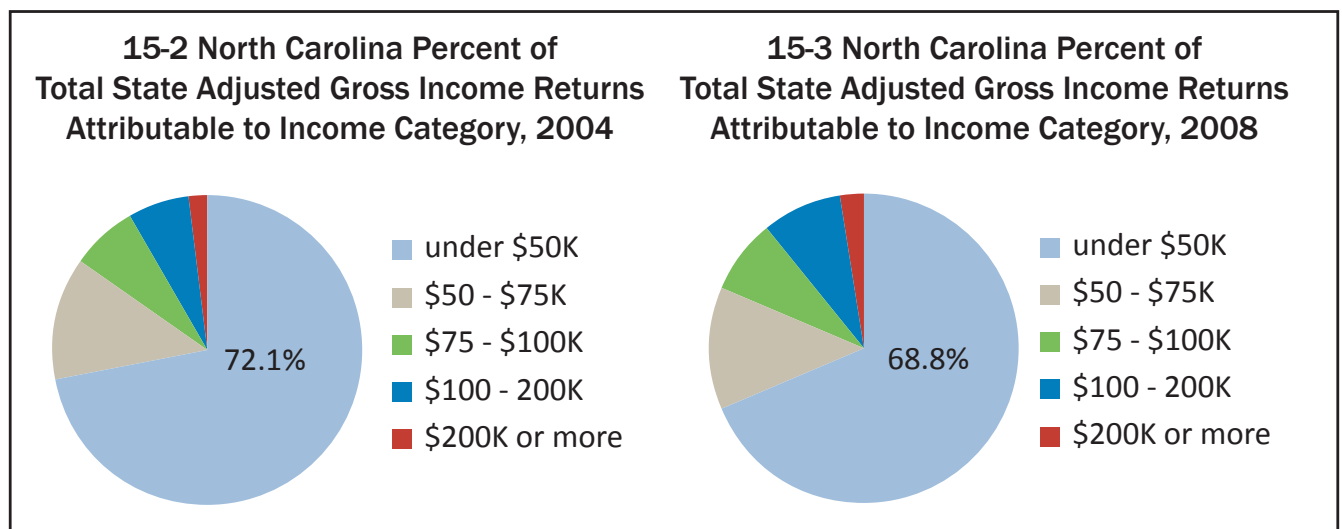
North Carolina had a higher percentage of tax returns filed by the lowest income category compared to the Nation (68.8 percent and 65.7 percent, respectively). Among comparison states, only Georgia and South Carolina had a larger percentage of tax returns filed by the lowest income category than North Carolina.

15-1 Percent of Tax Returns by Income Category, 2008

	US	NC	GA	MA	MI	PA	SC	VA
under \$50k	65.7%	68.8%	69.2%	58.7%	66.1%	65.0%	71.3%	59.8%
\$50-\$75k	13.4%	12.9%	12.3%	14.3%	13.8%	14.2%	12.2%	14.0%
\$75-\$100k	8.2%	7.7%	7.3%	9.2%	8.7%	8.7%	7.3%	9.3%
\$100-\$200k	9.6%	8.3%	8.7%	13.2%	9.2%	9.4%	7.4%	12.9%
\$200k or more	3.0%	2.4%	2.6%	4.6%	2.1%	2.7%	1.9%	4.1%

U.S. Internal Revenue Service

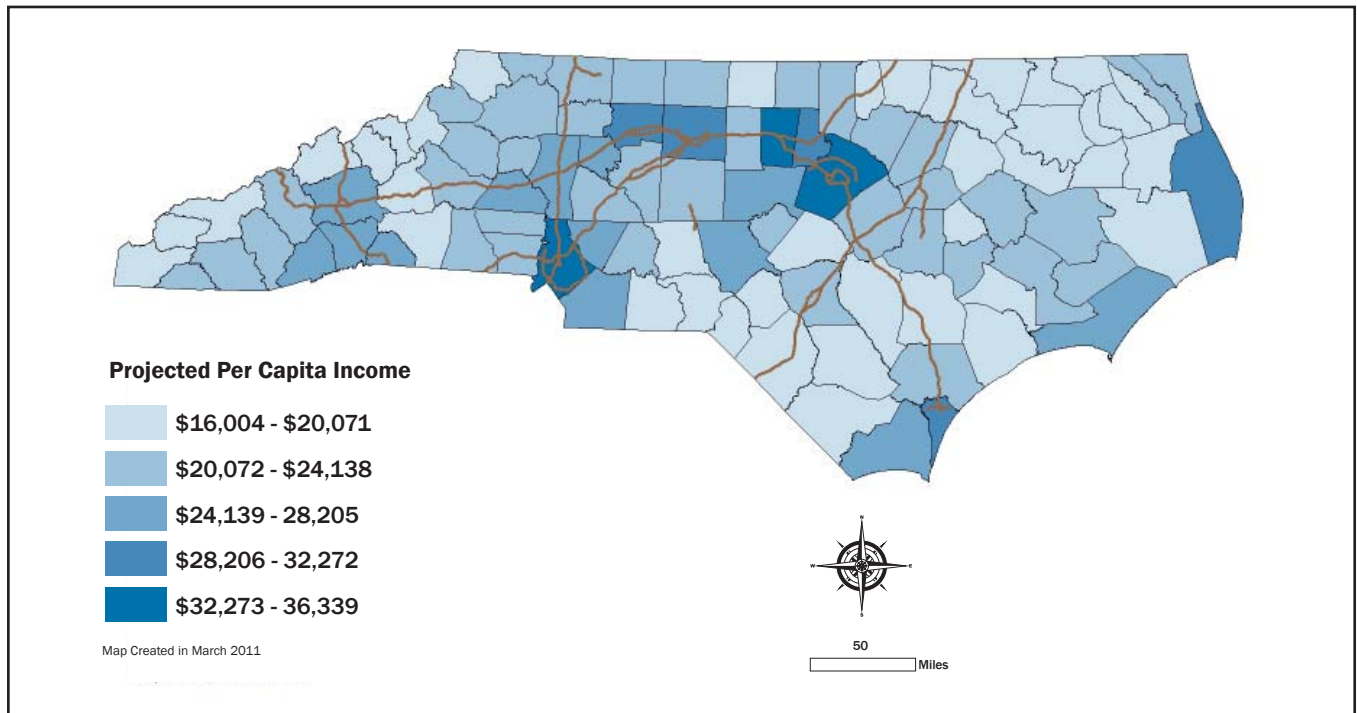
Between 2004 and 2008, the percentage of tax returns filed by North Carolina households earning less than \$50,000 decreased by more than 3 percentage points. Those households making between \$100,000 and \$200,000 and those over \$200,000 each increased slightly, by 2 and 0.5 percentage points, respectively. Whether these changes are due to increased wealth or inflation is uncertain.



INDICATOR 15: INCOME DISTRIBUTION

Per capita income across counties shows relatively stark differences between rural and urban parts of the state. Mecklenburg, Wake and Orange counties have the highest concentrations of wealth. High wage, new economy jobs are located in the urban counties, while nearly 40% of the state has per capita incomes between \$16,000 and \$20,000 –at or below the federal poverty line for a three person household.

15-4 2009 Projected Per Capita Income



EDIS

What Does this Mean for North Carolina Economic Development?

Identifying strategies to both promote growth and address income inequality remains a major challenge for economists, policy makers, and economic development professionals. Education remains a top determinant of income attainment. Workers with a post-secondary degree are much more prepared to compete for high paying, knowledge-based occupations. The State's public policy must continue to shift its focus beyond high school completion as the capstone of one's educational attainment to Associate's degrees, Bachelor's degrees or advance degree completion. Continued investment in education is a long-term approach for economic development success. It enhances workforce development opportunities for transitioning or displaced workers and could slow the growth of income disparity in North Carolina. Skills training and educational opportunities are particularly important for low-income families.

INDICATOR 16: HEALTH CARE ACCESS, COST, & PRODUCTIVITY

Key Findings

- Between 1999 and 2009, 17.6 percent of North Carolinians under 65 years of age were not covered by health insurance.
- In 2009, North Carolinians were paying \$60 above the national average (\$13,027) for a family health care plan. For employer-based coverage, employees are paying 30 percent of the plan cost, which is also above both the national average and all other benchmark states.
- In 2009, 54 percent of North Carolina businesses with less than 100 employees offered health insurance to their employees.
- North Carolina has the 10th highest obesity rate in the Nation and the 11th highest childhood obesity rate.

Indicator Overview

A healthy workforce is vital to strong economic growth. An unhealthy population causes increased worker's compensation costs, higher medical claims, absenteeism, and lost productivity.⁵⁸ Good health and economic growth are mutually beneficial.⁵⁹ In 2009, approximately 49 percent of all Americans depended on employer-sponsored health insurance.⁶⁰ From 1999 to 2009, nationwide average premiums for employer-sponsored coverage rose 201 percent.⁶¹ The impact of the 'Great Recession' and higher industry costs has forced businesses to apportion more of the premium costs to employees. Studies have shown the uninsured create higher healthcare costs for society because federal, state, and local governments spend billions of dollars every year to compensate hospitals and clinics for provided services.⁶² Further, "economic vitality ... is diminished by productivity lost as a result of the poorer health and premature death or disability of uninsured workers."⁶³

How Does North Carolina Perform?

In 2010, North Carolina ranked 35th in overall health⁶⁴ and has the 10th highest adult obesity rate in the nation along with the 11th highest childhood rate.^{65,66} Altogether, 65 percent of adults in North Carolina are overweight or obese.⁶⁷ Chronic illness directly affects length of life and productivity. The difference between urban and rural areas is apparent when examining mortality rankings by county [16-1]. The mortality rate is the number of people who died divided by the area's total population.

⁵⁸ "NC's Competitive Edge." Institute for Emerging Issues, Feb. 2011. (http://www.ncsu.edu/iei/wp-content/uploads/2011/02/IEICompetitive_Final.pdf).

⁵⁹ Zhekov, A. "Health and Economy." *Health Policy and Management* 1.4 (2009): 27-33. Web.

⁶⁰ The Henry J. Kaiser Family Foundation. "Health Insurance Coverage of the Total Population, states (2008-2009), U.S. (2009)." (<http://www.statehealthfacts.org/index.jsp>)

⁶¹ "NC's Competitive Edge." Institute for Emerging Issues, Feb. 2011. http://www.ncsu.edu/iei/wp-content/uploads/2011/02/IEICompetitive_Final.pdf.

⁶² "Hidden Costs, Value Lost: Uninsurance in America." Institute of Medicine, June 2003. Web. (<http://www.iom.edu/~media/Files/Report%20Files/2003/Hidden-Costs-Value-Lost-Uninsurance-in-America/Uninsured5FINAL.pdf>).

⁶³ Ibid

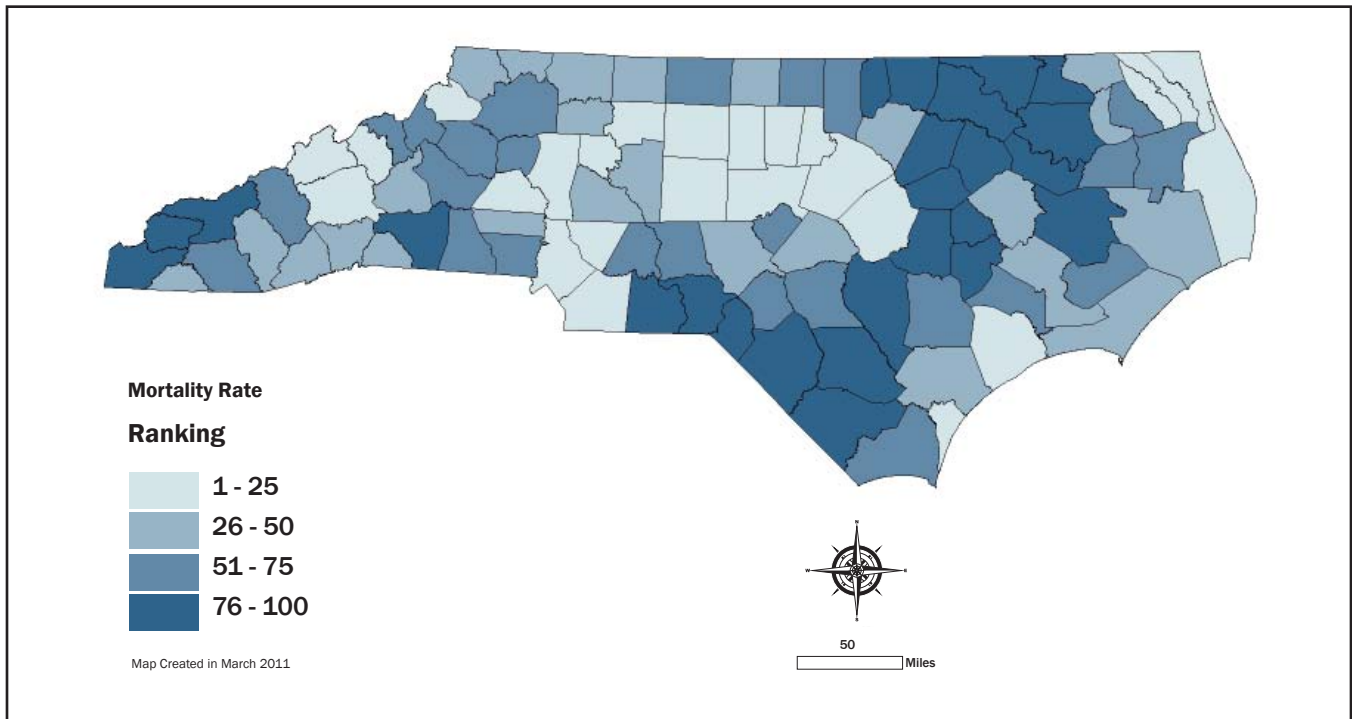
⁶⁴ America's Health Rankings - State Healthstats. Web. <<http://statehealthstats.americashealthrankings.org/#/state/US/NC/2010>>.

⁶⁵ Trust for America's Health. *F as in fat: How obesity policies are failing in America, 2010*. Washington, DC: Trust for America's Health; 2010. Available at (<http://healthyamericans.org/reports/obesity2010/>)

⁶⁶ North Carolina Child Health Assessment and Monitoring Program (CHAMP). North Carolina Department of Health and Human Services, Division of Public Health, State Center for Health Statistics. 2009. Available at (<http://www.schs.state.nc.us/SCHS/champ/2009/topics.html>)

⁶⁷ "Physical Activity, Nutrition and Obesity in North Carolina. Quick Facts, Updated December 2010." Eat Smart, Move More NC. Web. (<http://www.eatsmartmovemorenc.com/Data/Texts/Quick%20Facts.pdf>).

16-1 2010 North Carolina Mortality Rankings, by County



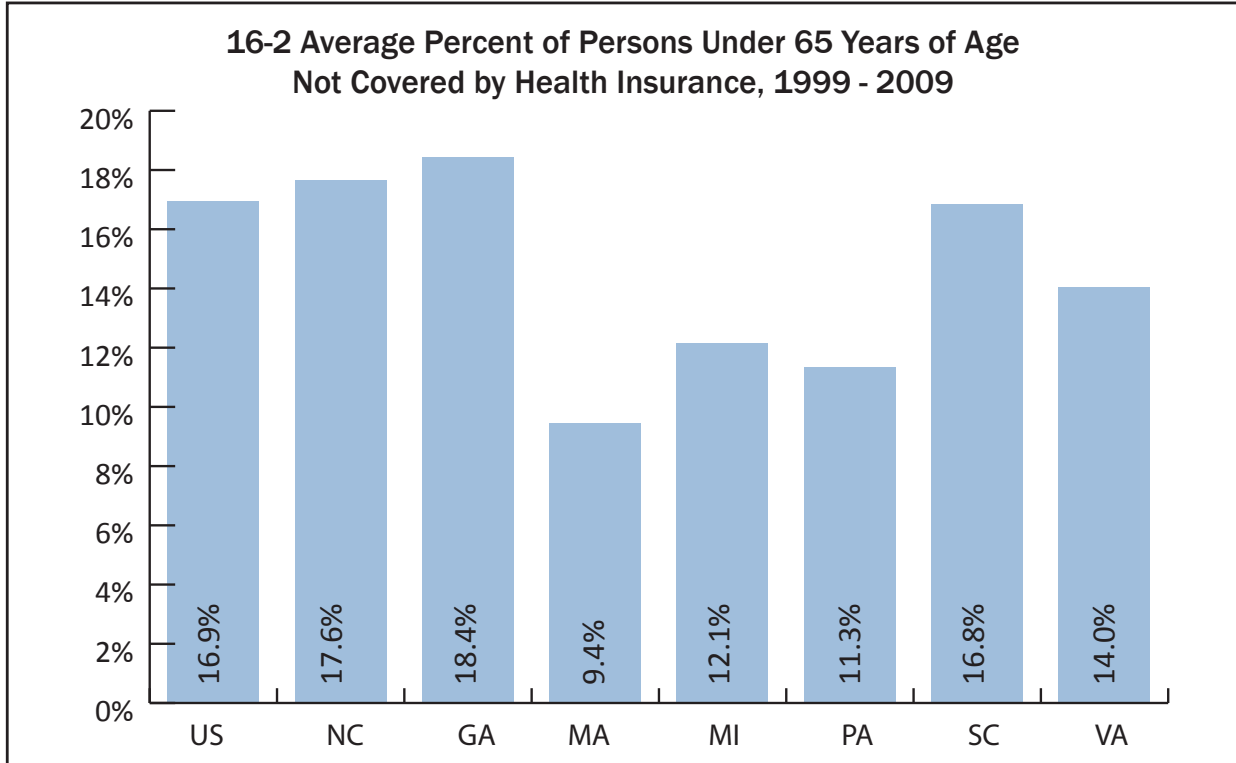
www.countyhealthrankings.org

Obesity is directly correlated to chronic illnesses such as heart disease and diabetes, both of which can require lengthy and expensive medical treatment. As such, being ranked as a highly obese state provides a partial explanation as to why North Carolina's annual growth in healthcare expenditures has increased 7.2 percent from 1998 to 2004. This rise amounts to the largest increase among 12 other Southeastern states.⁶⁸

Between 1999 and 2009, 17.6 percent of North Carolinians under age 65 years were not covered by health insurance [16-2]. This percentage is more than the national average (16.9 percent) and higher than all other benchmark states, except Georgia (18.4 percent).

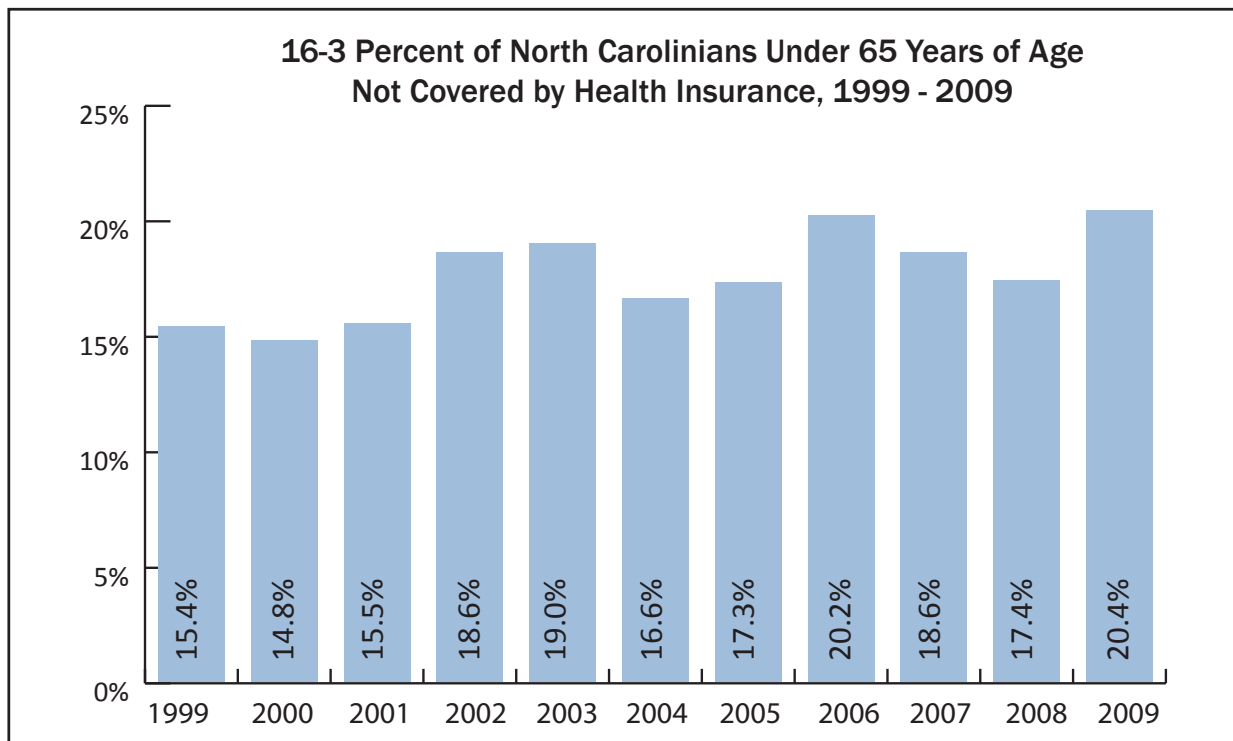
⁶⁸ "NC's Competitive Edge." Institute for Emerging Issues, Feb. 2011. Web. <http://www.ncsu.edu/iei/wp-content/uploads/2011/02/IEICompetitive_Final.pdf>.

INDICATOR 16: HEALTH CARE ACCESS, COST, & PRODUCTIVITY



United States Census Bureau

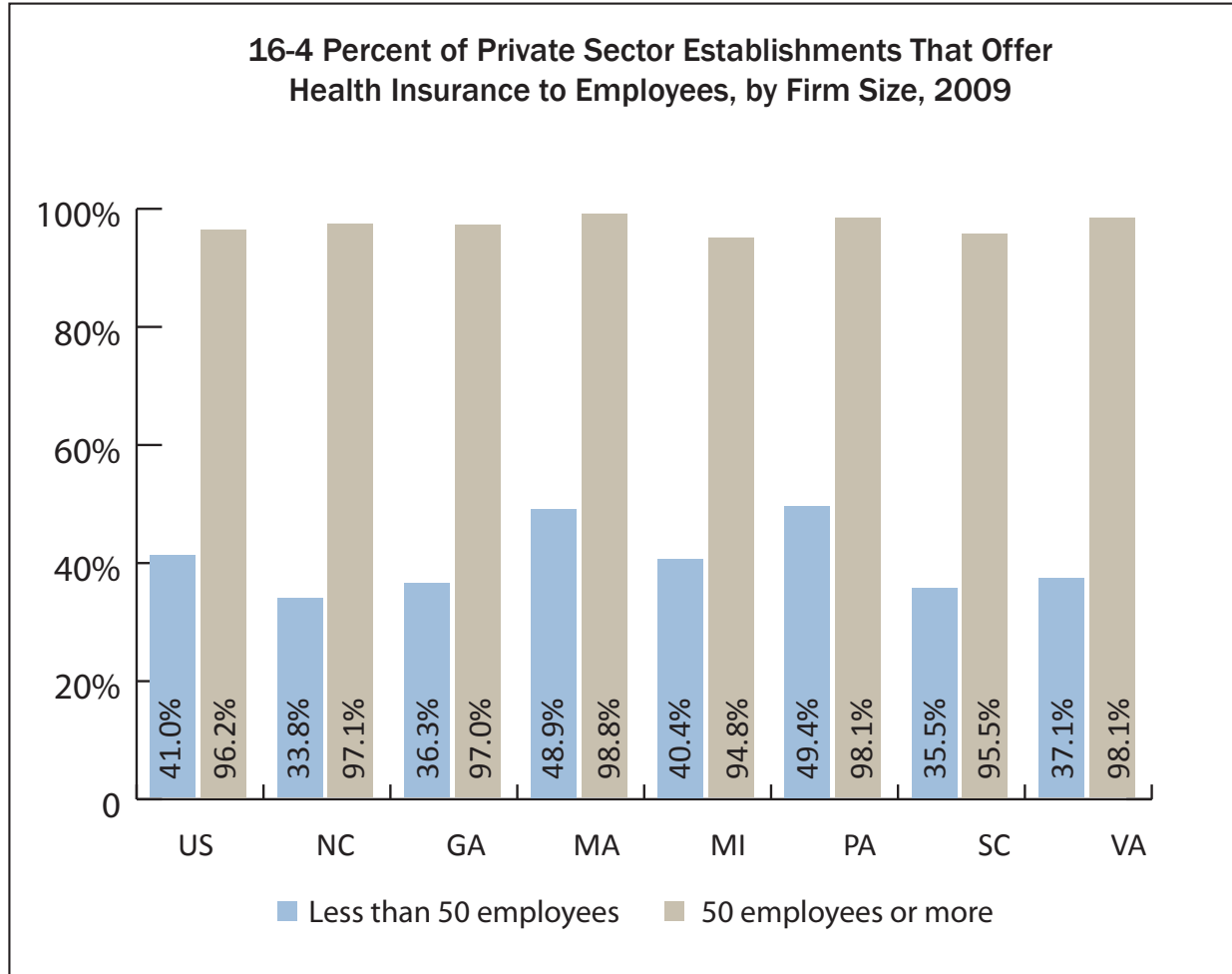
Over the ten year time period, the number of persons under 65 years of age not covered by health insurance in North Carolina has fluctuated annually. As of 2009, over 20 percent of North Carolina’s ‘under 65’ population did not have insurance coverage, a steady increase from the 15.4 percent rate in 2000 [16-3]. Between 2008 and 2009, the United States, North Carolina, and all competitor states except for Massachusetts experienced an increase in the number of uninsured persons.



United States Census Bureau

INDICATOR 16: HEALTH CARE ACCESS, COST, & PRODUCTIVITY

Health care costs in the United States have increased significantly. Since 2000, nationwide average family coverage premiums have increased 114 percent.⁶⁹ Between 1999 and 2009, average premiums for North Carolina's employer-sponsored coverage increased 217 percent.⁷⁰ Nearly 34 percent of private companies with less than 50 employees in North Carolina offer health insurance, which is lower than the national average and all competitor states [16-4].



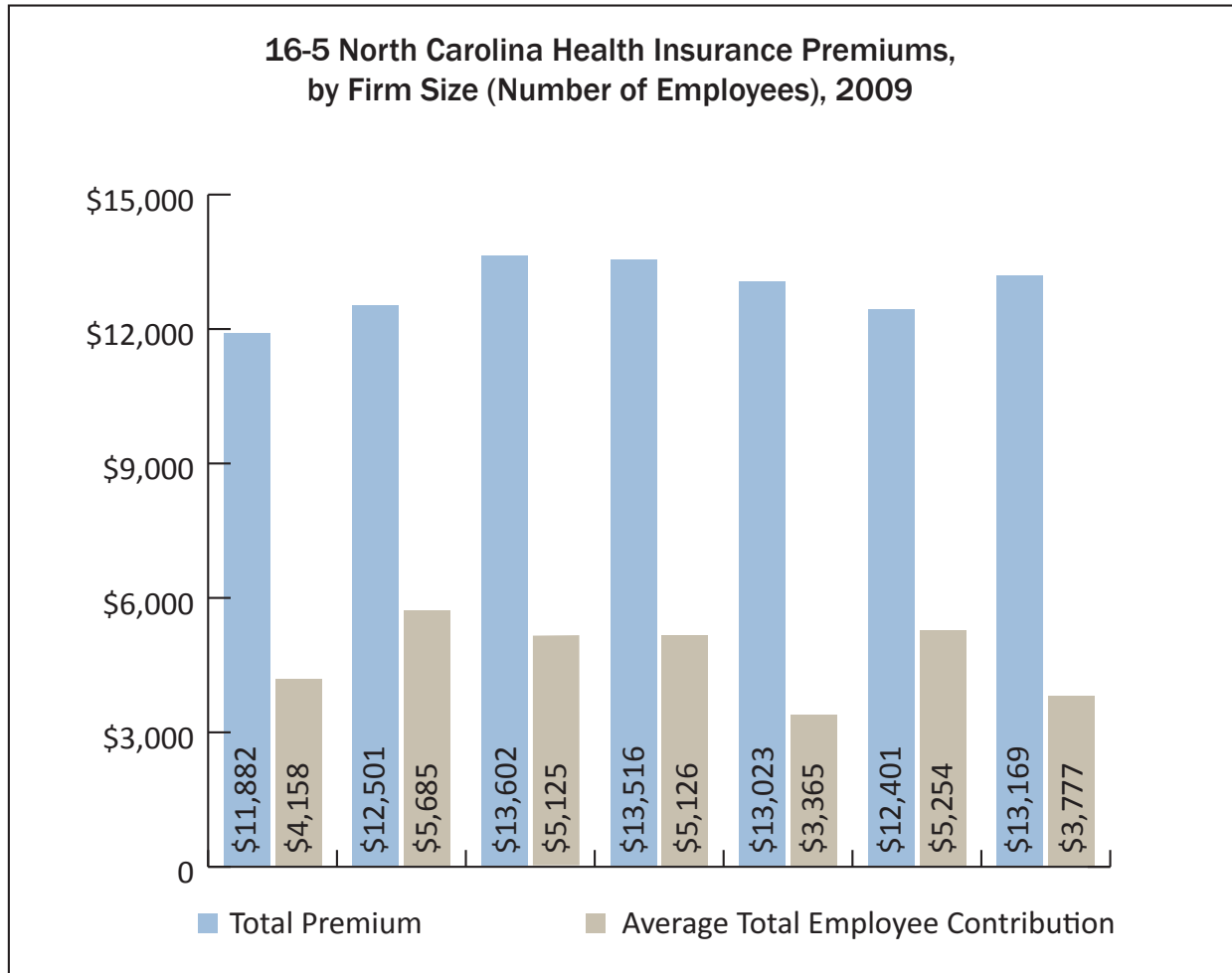
The Henry J. Kaiser Family Foundation

As a result of increasing health care costs, employees are being asked to cover a greater portion of health insurance premiums. In 2009, North Carolina employees were paying over 30 percent of their employer-based family premiums [16-5]. This ratio is above the national average and all other benchmark states. Depending on firm size, the average total family premium ranged from \$11,882 to \$13,602 per year.

⁶⁹ The Henry J Kaiser Family Foundation. Employee Health Benefits: 2008 Annual Survey. September 2008.

⁷⁰ NC's Competitive Edge." Institute for Emerging Issues, Feb. 2011. Web. <http://www.ncsu.edu/iei/wp-content/uploads/2011/02/IEICompetitive_Final.pdf>.

INDICATOR 16: HEALTH CARE ACCESS, COST, & PRODUCTIVITY



U.S. Department of Health and Human Services

According to the most recent national data (2009), the total percentage of firms offering health benefits has decreased since 2008. Only 24 percent of firms with less than ten employees offer insurance, a 20 percent decline from 2008, and a 35 percent decrease since 2000. On average, 54 percent of firms employing less than 100 people offer health insurance, a decrease of 17 percent since 2000. In contrast, 99 percent of firms employing over 100 people offer health coverage.

16-6 Percent of North Carolina Private-Sector Establishments that Offer Health Insurance by Firm Size, 2000 versus 2009

	Less than 10 employees	10-24 employees	25-99 employees	100-999 employees	1000 or more employees	Less than 50 employees	50 or more employees
2000	38%	78%	82%	98%	100%	47%	98%
2009	24%	63%	76%	98%	100%	34%	97%
Percent Change	-35%	-19%	-7%	0%	0%	-29%	0%

2009 Medical Expenditure Panel Survey

INDICATOR 16: HEALTH CARE ACCESS, COST, & PRODUCTIVITY

What Does this Mean for North Carolina Economic Development?

Health care coverage is getting more expensive and many people have less healthy lifestyles, which further drives up health care costs. New federal regulations have created uncertainty for the health care industry, affecting both the private sector and all levels of government. Time will reveal whether this period of uncertainty is followed by increased healthcare coverage, reduced costs and a healthier population. Meanwhile, costs continue to rise and society continues to suffer from more lifestyle-related illnesses. To combat rising costs, North Carolinian companies and residents can proactively work toward living healthier lifestyles and focusing on preventing illness before medical treatment is needed.

Population

Population Growth: Cumulative Estimates of Population Change for the United States, Regions, States, and Puerto Rico are from the Population Division of the U.S. Census Bureau. (<http://www.census.gov/popest/states>) 2010 Census Data showing current population statistics. (<http://factfinder2.census.gov/faces/nav/jsf/pages/searchresults.xhtml?ref=geo&refresh=t>) Population growth for the economic development regions of North Carolina were also obtained from the U.S. Census Bureau, Population Division's Cumulative Estimates of Population Change for Counties of North Carolina and County Rankings tables. (<http://www.census.gov/popest/counties/CO-EST2007-02.html>)

Demographic Components of Population Change: Migration statistics for the United States, Regions, and States are from the Cumulative Estimates of the Components of Population Change tables published by the U.S. Census Bureau's Population Division Available at:(<http://www.census.gov/popest/states/NST-comp-chg.html>), Specific state demographic data are from the U.S. Census Population Estimates (<http://www.census.gov/popest/states/asrh/SC-EST2007-04.html>) and American Fact Finder, Census 2010 Summary files.(<http://factfinder2.census.gov/faces/nav/jsf/pages/searchresults.xhtml?ref=geo&refresh=t>)

Percent of Population by Age Group: Cumulative Estimates of Population Change for the United States, Regions, States, and Puerto Rico are from the Population Division of the U.S. Census Bureau (<http://www.census.gov/popest/states/>). The Population Estimates Program publishes state population estimates each year for total population with details on age, sex, race, and Hispanic origin (<http://www.census.gov/popest/states/asrh/SC-EST2007-01.html>).

Labor Force

Growth in Labor Force and Employment: Seasonally adjusted labor force and employment is from the Bureau of Labor Statistics, Local Area Unemployment Statistics program. (<http://www.bls.gov/data/#unemployment.>)

Labor Force Participation Rate: Annual average labor force participation rates data for states is from the Bureau of Labor Statistics, Civilian Non-institutional Population and Associated Rate and Ratio Measures for Model-Based Areas. The National labor force participation rate data is from the Bureau of Labor Statistics, Current Population Survey (<http://www.bls.gov/data/#unemployment>). Local Area Unemployment Statistics and Employment status of the Civilian Non-institutional Population in states by sex, race, Hispanic or Latino ethnicity, and detailed age from the Bureau of Labor Statistic (<http://www.bls.gov/lau/table14full05.pdf>) (<http://www.bls.gov/lau/ptable14full2010.pdf>). Labor Force Characteristics by State and Sex are from the U.S. Census Bureau (<https://www.census.gov/compendia/statab/2011/tables/11s0593.pdf>).

Industry Mix

Employment in North Carolina by Industry: Industry employment data are from Economic Modeling Specialists, Inc (EMSI). EMSI derives its industry employment data by combining covered employment data from Quarterly Census of Employment and Wages (QCEW) produced by the Department of Labor with total employment data in Regional Economic Information System (REIS) published by the Bureau of Economic Analysis (BEA), and augmenting it with County/ZIP Business Patterns (CBP) and Non-employer Statistics (NES) published by the U.S. Census Bureau. In addition, Current Employment Statistics (Bureau of Labor Statistics) is used to fill the 6-9 month lag in QCEW and create more informed estimates for current-year data. Information from EMSI is provided as part of a paid subscription service. (<http://www.economicmodeling.com/>)

Occupational Mix

North Carolina Employment, Earnings, and Regional Data by Occupation: Occupational data for North Carolina are from Economic Modeling Specialists, Inc (EMSI). EMSI's occupation data are based on EMSI's industry data and regional staffing patterns taken from the Occupational Employment Statistics program (U.S. Bureau of Labor Statistics). Wage information is partially derived from the American Community Survey. The occupation-to-program (SOC-to-CIP) crosswalk is based on one from the U.S. Department of Education, with customizations by EMSI. Information from EMSI is provided as part of a paid subscription service. (<http://www.economicmodeling.com/>)

Exports

Dollar Value of Exports, Destination Countries, and Top Commodities: National and state export data is from WISERTrade, the World Institute for Strategic Economic Research, for dollar value of exports. All information displayed from WISERTrade is provided as part of a paid subscription service. (<http://www.wisertrade.org/home/index.jsp>)

Energy

Average Industrial Price of Electricity: Electricity price data was obtained from Energy Information Administration; Electric Energy Price by Class of Service and State. (http://www.eia.doe.gov/cneaf/electricity/epa/epa_sprdshts.html)

Percent of Net Electric Power Generated from Renewable Energy Sources (Excluding Hydroelectric): Net Generation from Other Renewable Energy by State and Net Generation by State data are from the U.S. Department of Energy, Energy Information Administration, Form EIA-906, "Power Plant Report;" and Energy Information Administration, Form EIA-920 "Combined Heat and Power Plant Report;" Net Generation by State by Sector. (http://www.eia.doe.gov/cneaf/electricity/epa/epa_sprdshts.html)

Foreign Direct Investment

Dollar Value and Source by Country of Foreign Direct Investment: Foreign Direct Investment data are from the U.S. Bureau of Economic Analysis, Foreign Direct Investment in the U.S. Financial and Operating Data for U.S. Affiliates of Foreign Multinational Companies, Majority-Owned U.S. Affiliates. (<http://www.bea.gov/international/di1fdiop.htm>)

Percent of Total Employment in Foreign Owned Companies: Employment data are from the U.S. Bureau of Economic Analysis, Foreign Direct Investment in the U.S. Financial and Operating Data for U.S. Affiliates of Foreign Multinational Companies, Majority-Owned U.S. Affiliates, and the Bureau of Labor Statistics Local Area Unemployment Statistics database. (<http://www.bls.gov/data/#unemployment>)

Research & Development

R&D Spending as Share of State Gross Domestic Product: Research and development data, are from National Science Foundation, National Center for Science and Engineering Statistics, National Patterns of R&D Resources. (http://www.nsf.gov/statistics/nsf10314/content.cfm?pub_id=4000&id=2) Gross Domestic Product, by state, for all industries, is from the United States Department of Commerce, Bureau of Economic Analysis. (<http://www.bea.gov/regional/gsp>)

Federal R&D Obligations for Research and Development to North Carolina, by Agency: Recent Research and development data showing federal contractual obligations for R&D performed in North Carolina is from USAspending.gov. Selected criteria include: Federal Obligations in R&D to North Carolina, FY 2010, contracts only, R&D contracts, all agencies, North Carolina as place of performance (USAspending.gov)

R&D Expenditures at North Carolina Academic Institutions: Expenditure data figures are from National Science Foundation, National Center for Science and Engineering Statistics, National Patterns of R&D Resources, however Fiscal Year 2009 data was provided directly to the N.C. Department of Commerce before being published publicly. (<http://www.nsf.gov/statistics/rdexpenditures/>)

Entrepreneurial & Small Business Capital

North Carolina Venture Capital by Stage of Development: Venture capital investment data is from the "Money Tree Report". The "Money Tree Report" is the collaboration between PricewaterhouseCoopers and the National Venture Capital Association (based upon data from Thomson Reuters). (<https://www.pwcmoneytree.com/MTPublic/ns/index.jsp>) SBIR & STTR Funding per Small Business: Data for state SBIR and STTR funding is from the Small Business Administration's Tech-Net database. (http://tech-net.sba.gov/tech-net/public/dsp_search.cfm)

Educational Attainment

Educational Attainment: Data regarding educational attainment is from the U.S. Census Bureau's American Community Survey Multiyear Profile. (http://factfinder.census.gov/servlet/STTable?_bm=y&-qr_name=ACS_2009_1YR_G00_S1501&-ds_name=ACS_2009_1YR_G00_-&-state=st&-_lang=en)

Science & Engineering Degrees Awarded (Bachelor's and Master's/Doctorates) per 10,000 Population: Data on the number of degrees awarded is based on select classification of instructional program codes. The data are from the Integrated Post-Secondary Education Data System (IPEDS) of the National Center for Education Statistics (<http://nces.ed.gov/ipeds/>). Cumulative Estimates of Population are from the Population Division of the U.S. Census Bureau (<http://www.census.gov/popest/states/>).

State Gross Domestic Product

Percent Change in Real GDP: National and state real Gross Domestic Product data are from the U.S. Bureau of Economic Analysis. (<https://bea.gov/regional/gsp/>)

Per Capita Real GDP: National and state real Gross Domestic Product data are from the U.S. Bureau of Economic Analysis. Cumulative Estimates of Population Change for the United States, Regions, States, and Puerto Rico are from the Population Division of the U.S. Census Bureau. (<http://www.census.gov/popest/states/>)

Top Ten Industries Contributing to North Carolina's GDP: North Carolina's Real Gross Domestic Product by industry is from the Bureau of Economic Analysis (BEA) Regional Economic Accounts Gross Domestic Product by State tables. (<http://www.bea.gov/regional/gsp/>)

Labor Productivity

Labor Productivity (State GDP/Employment): National and state Gross Domestic Product, in chained 2005 dollars, data are from the U.S. Bureau of Economic Analysis. (<https://bea.gov/regional/gsp/>) National unadjusted annual average employment is from the Bureau of Labor Statistics, Current Employment Statistics. (<http://www.bls.gov/data/>) Seasonally unadjusted annual average State employment is from the Bureau of Labor Statistics, Local Area Unemployment Statistics program. (<http://data.bls.gov/cgi-bin/surveymost?la>)

North Carolina Labor Productivity Growth and Components by Select Industries: National and state Gross Domestic Product, chained 2005 dollars, data are from the U.S. Bureau of Economic Analysis. (<https://bea.gov/regional/gsp/>) Employment data are from the N.C. Employment Security Commission, Labor Market Information Division, Quarterly Census of Employment and Wage Program (QCEW), Employment and Wage by Industry. (<http://www.ncesc1.com/lmi/industry/industryMain-NEW.asp>)

Firm Growth

Percentage Change in Number of Firms, by size and age: The annual number of firms by state is from Center for Economic Studies Longitudinal Business Database provided by the United States Census Bureau, division of Business Dynamics Statistics. (http://www.ces.census.gov/index.php/bds/bds_database_list)

Percentage Change in Number of Firms, by Economic Development Region: The annual number of firms by county is from the County Business Patterns Database provided by the United States Census Bureau, Statistics of US Businesses division. (<http://www.census.gov/econ/subb/>)

State Ranking of Fastest Growing Firms: Rankings are based on the number of Deloitte Technology Fast 500 and Inc. 500 firms as a share of total firms. Rankings are published by the Information Technology & Innovation Foundation/The Kauffman Foundation in "The 2010 State of the New Economy Index". (<http://itif.org/publications/2010-state-new-economy-index>)

Earnings

Median Household Income: Value and data by sex, for specific regions, states, and the national level are from the U.S. Census Bureau's, American Community Survey, 2009, American Fact Finder. (<http://www.census.gov/prod/2010pubs/acsbr09-3.pdf>) (http://factfinder.census.gov/servlet/DatasetMainPageServlet?_program=ACS&_submenuId=datasets_1&_lang=en&_ts=)

Average Weekly Wage by NC Economic Development Region: Weekly wage data for the regions are from the N.C. Employment Security Commission, Labor Market Information Division, Quarterly Census of Employment and Wage Program (QCEW), Employment and Wage by Industry. (<http://esesc23.esc.state.nc.us/d4/QCEWSelection.aspx>)

Income

Tax Returns by Income Category: Tax return statistics and adjusted gross income data are from the Internal Revenue Service. (<http://www.irs.gov/taxstats/article/0,,id=171535,00.html>)

Projected Per Capita Income: 2009 projections are from the North Carolina Department of Commerce, Economic Development Information System (EDIS), county custom profile, selected income. (<https://edis.commerce.state.nc.us/EDIS/demographics.html>)

Health Care Access & Cost

North Carolina Mortality Rankings by County: Rankings are provided by Robert Wood Johnson Foundation and the University of Wisconsin, Population Health Institute through County Health Rankings. (<http://www.countyhealthrankings.org/north-carolina/outcomes-components-ranking>)

Persons Under 65 Years of Age Not Covered by Health Insurance: Statistics on health insurance coverage by age category are from the United States Census Bureau, Current Population Survey's Annual Social and Economic Supplement (ASEC). Health Insurance Coverage Status and Type of Coverage by State-Persons Under 65. (<http://www.census.gov/hhes/www/hlthins/data/historical/index.html>)

Average Family Health Insurance Premiums: The Henry J. Kaiser Family Foundation, State Health Facts database, Employer based Health Premiums, Family Coverage. (<http://www.statehealthfacts.org/index.jsp>)

Percent of Private Sector Health Insurance Premiums: Information specific to employer based health premiums is also available from The Henry J. Kaiser Family Foundation, State Health Facts database. (<http://www.statehealthfacts.org/comparebar.jsp?ind=271&cat=5>)

Health Insurance Coverage by Type and State: Health insurance coverage information is available from the Henry J. Kaiser Family Foundation; State Health Facts; Health Insurance Coverage of Total Population. (<http://www.statehealthfacts.org/comparetable.jsp?ind=125&cat=3&yr=1&typ=1>)

NORTH CAROLINA

DEPARTMENT OF COMMERCE

North Carolina Department of Commerce • Policy, Research & Strategic Planning Division
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