

# MEASURES OF GROWTH IN FOCUS



## 2013

*Performance Measures and Benchmarks  
to Achieve a Vibrant and Sustainable  
Economy for Maine*

NINETEENTH REPORT OF THE MAINE ECONOMIC GROWTH COUNCIL

PREPARED BY THE  
MAINE DEVELOPMENT FOUNDATION

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# V I S I O N

A high quality of life for all Maine people.

*Achieving this vision requires a vibrant and sustainable economy supported by vital communities and a healthy environment.*



Prepared for the Maine Economic Growth Council  
*by the*

MAINE DEVELOPMENT FOUNDATION

# 2013 Performance Measures of the Maine Economic Growth Council

## ECONOMY

### *Prosperity*

- ⊖ 1. Per Capita Personal Income
- ⊖ 2. Gross Domestic Product
- ⊖ 3. Employment

### *Business Innovation*

- ⊖ 🚩 4. Research and Development Expenditures
- ⊖ 5. International Exports
- ⊖ 🚩 6. High Speed Internet Subscribers
- ⊕ 7. New Business Starts
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- ⊖ 13. Cost of Health Care
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## COMMUNITY

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- ⊕ 18. Affordable Housing

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- ⊖ 🚩 19. Poverty
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### *Health and Safety*

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## ENVIRONMENT

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### *Development*

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### *Environmental Quality*

- ⊖ 25. Air Quality
- ⊖ ★ 26. Water Quality

## KEY TO SYMBOLS

### GOLD STARS & RED FLAGS

Determining which performance measures receive Gold Stars and Red Flags are judgments made by members of the Maine Economic Growth Council. These determinations reflect consensus of the group and are based on consideration of the best data available and the experienced perspective of Growth Council members. Generally, criteria are as follows:



#### **Exceptional performance.**

Very high national standing and/or established trend toward significant improvement.



#### **Needs attention.**

Very low national standing and/or established trend toward significant decline. In some cases, there is improvement, but it is still viewed as needing attention.

### PROGRESS SYMBOLS

The progress symbols reflect movement toward or away from the benchmarks. The benchmarks are established by the Growth Council and progress is determined objectively each year by reviewing the most recent trend. The Growth Council does not use a uniform methodology in creating benchmarks. Criteria for applying the progress symbols are as follows:



We have moved toward the benchmark since last available data.



We have moved away from the benchmark since last available data.



No significant movement either way since last available data.

## MAINE'S PROSPERITY ACTION PLAN

There have been many excellent reports in recent years analyzing and offering recommendations on the many facets of Maine's economy. While the particulars have differed, there has been a considerable amount of overlap and consensus on the common themes of these reports. What we have lacked is a comprehensive effort to translate these themes into a specific action plan for the State of Maine to move its economy forward.

To rectify this, the 125<sup>th</sup> Legislature passed a bill that charged the Maine Economic Growth Council with developing the Maine Prosperity Action Plan. Building on the excellent work that has been done before, the Growth Council was assigned to review these reports and synthesize the major findings and recommendations into one specific action plan for a sustainable Maine economy. The Growth Council was selected for this work because of the broad respect for its leadership, vision, and commitment to Maine; its credibility; and its deep understanding of Maine's economic conditions, challenges, and opportunities. In short, the Growth Council was selected for all that it brings to the table in preparing the annual *Measures of Growth In Focus* report.

The reports included in the authorizing legislation were the Growth Council's own *Measures of Growth In Focus*; GrowSmart Maine's *Charting Maine's Future*; The Joint Select Committee on Future Maine Prosperity's *Time for Change*; Envision Maine's *Reinventing Maine Government*; and *Making Maine Work*, a three-part series prepared by the Maine Development Foundation and the Maine State Chamber of Commerce, and the background report, *Maine's Investment Imperative II*. According to the legislation, "After reviewing the recommendations and reports, the Council shall identify those proposals it determines offer the most potential for positively transforming economic conditions in the State, extract from those proposals concrete proposals for legislative action and translate them into proposed legislation."

The Council began its work over the summer, with members meeting to review the reports, find the common themes, and formulate them into specific, tangible recommendations. Within each key area of focus are both long-term recommendations and proposals for immediate action by the 126<sup>th</sup> Legislature.

In health and wellness, recommendations focus on investing in preventive care, wellness, and improvements in the current health care system to improve health, increase productivity, and control costs. Energy recommendations are geared toward reducing costs by improving efficiency and expanding the portfolio of available and economically viable alternatives for residential, industrial, and commercial customers. Recommendations in the area of government reform speak to improving the efficiency and effectiveness of the legislative process and regulatory framework, and encouraging cost-effective and efficient regionalization of services. In taxation, the focus is on promoting economic growth, limiting volatility, and limiting government spending, with the savings invested in economic growth and tax reform. Education recommendations are about investing in and supporting a comprehensive system that meets the needs of individuals at all levels, meets the needs of Maine employers, and supports economic growth. In the area of connectivity, recommendations look to create balanced and affordable transportation and communications systems that connect us to the outside world. Finally, innovation and entrepreneurship recommendations address how to support our innovation economy and capitalize on new markets and promote economic growth.

The Maine Prosperity Action Plan was approved by unanimous consent of the Growth Council and has been submitted to the Legislature's Joint Standing Committee on Labor, Commerce, Research, and Economic Development and to the Joint Select Committee on Maine's Workforce and Economic Future. It is the hope and intent of the Growth Council that a process will be institutionalized for tracking our progress on the specific recommendations. The Prosperity Action Plan is available in its entirety through the homepage of the Maine Development Foundation at [www.mdf.org](http://www.mdf.org).

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## MEASURES OF GROWTH IN FOCUS 2013

In the current report, seven indicators moved closer to their benchmarks, seven lost ground relative to their benchmarks, and twelve made no significant movement relative to their benchmarks. Among those that lost ground are Gross Domestic Product and Poverty, two indicators that speak to the overall health of Maine's economy. Maine's Gross Domestic product declined by 0.4% from 2010 to 2011. Overall poverty rates increased in Maine, New England, and the United States, and the poverty rates for children under 5 and under 18 increased in Maine and the United States.

The report includes five red flags: Research and Development Expenditures, a repeat from last year; High Speed Internet Subscribers; Fourth Grade Reading Scores, a repeat from last year; Poverty; and Wellness and Prevention, another repeat from last year. Gold stars were assigned to Eighth Grade Math Scores and Water Quality, two indicators that are new in this year's report. The other new indicator is Air Quality. The Conservation Lands and Multiple Job Holding indicators are no longer included in the report.

The Growth Council believes that the key to improving our economic outcomes is boosting productivity within the state. This requires investment in Maine's people, beginning in early childhood and continuing throughout life; investment in the infrastructure that both supports the economy of today and prepares us for the economy of the future; and management of cost structures that impose an undue burden on Maine's people and businesses.

## THE NATURE OF DATA

Sound policymaking is founded on sound data. The Council strives to provide the most accurate and timely data in a fashion that is useful for policymakers and opinion leaders. While great care is taken to ensure that the information in the report supports good decision making, the data we are dealing with by nature comes with a level of uncertainty. The best data has been collected in a way that manages this uncertainty. The data is regularly revised as more information and better methodologies are made available. As a result, the data in this edition may be slightly different from previous reports and, more importantly, they will be more accurate. Despite any changes in the data, the trends and policy implications are unchanged.

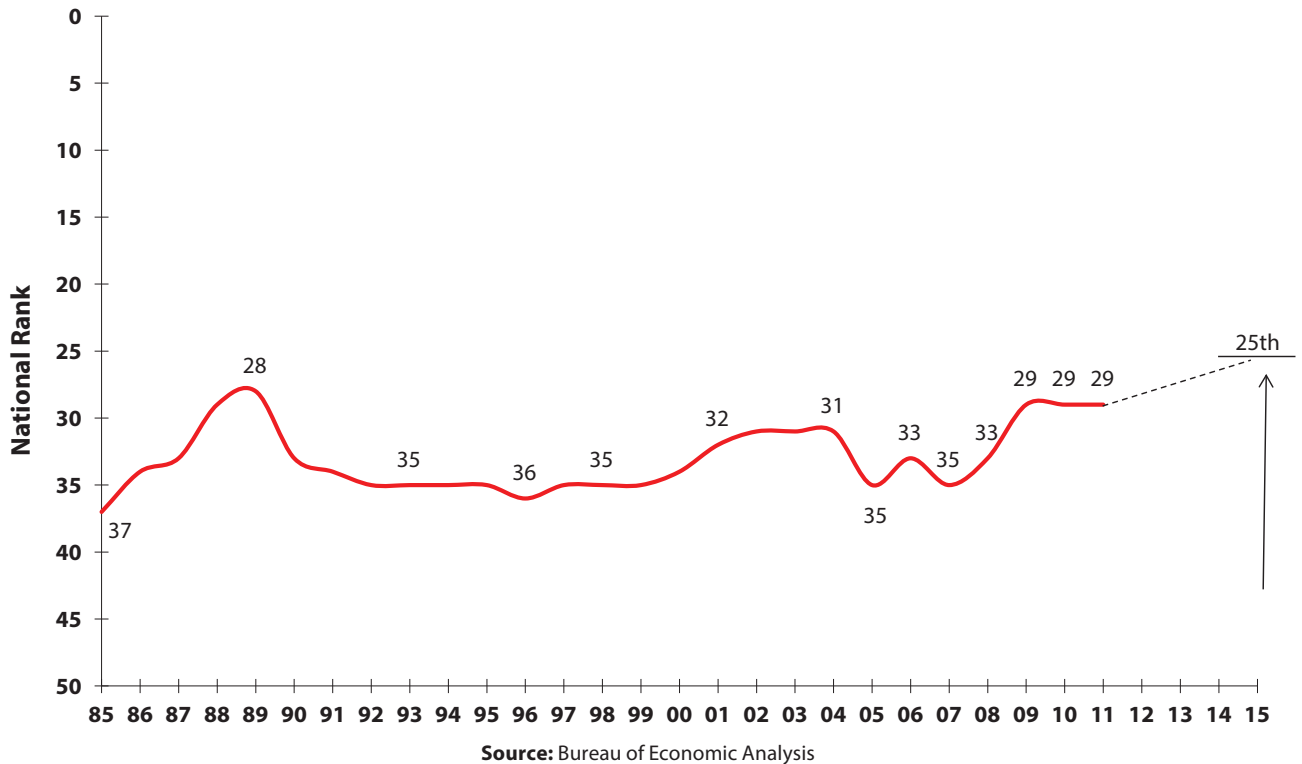




# 1. Per Capita Personal Income

**Benchmark:** Maine's national rank among the 50 states on per capita personal income will reach 25<sup>th</sup> by 2015.

## Maine's National Rank on Per Capita Personal Income 1985 - 2011



## Maine's Rank Unchanged Despite 4.6% Growth

Maine's per capita personal income grew by 4.6% from \$36,629 in 2010 to \$38,299 in 2011. With revised numbers from the Bureau of Economic Analysis, Maine's national rank was 29 in 2009, 2010, and 2011.

New England's average per capita income in 2011 was \$51,274 and the U.S. average was \$41,560; they grew by 4.5% and 4.4%, respectively, from 2010 to 2011. Maine's per capita personal income remained lower than the other New England states.

Per capita personal income is the income received from all sources divided by the state's population. These sources include wages, salary, supplements, rents, dividends, interest, and transfer payments to individuals for which no current services are performed, such as Social Security, unemployment, welfare assistance, and veteran's benefits. Maine received 23% of its income from transfer payments in 2011 while the national average was just under 18%. Increasing the components of Maine's per capita personal income that are not derived from transfer payments can help to boost economic activity in Maine.

Higher incomes can reduce tax burdens, enable consumers to spend and save more money, and make necessities more affordable, giving Mainers more disposable income and enabling us to enjoy a higher quality of life.

Per capita personal income is a critical measurement of economic prosperity and speaks to the productivity of Maine's economy. Continued progress toward the benchmark will require positive movement on many of this report's other indicators.

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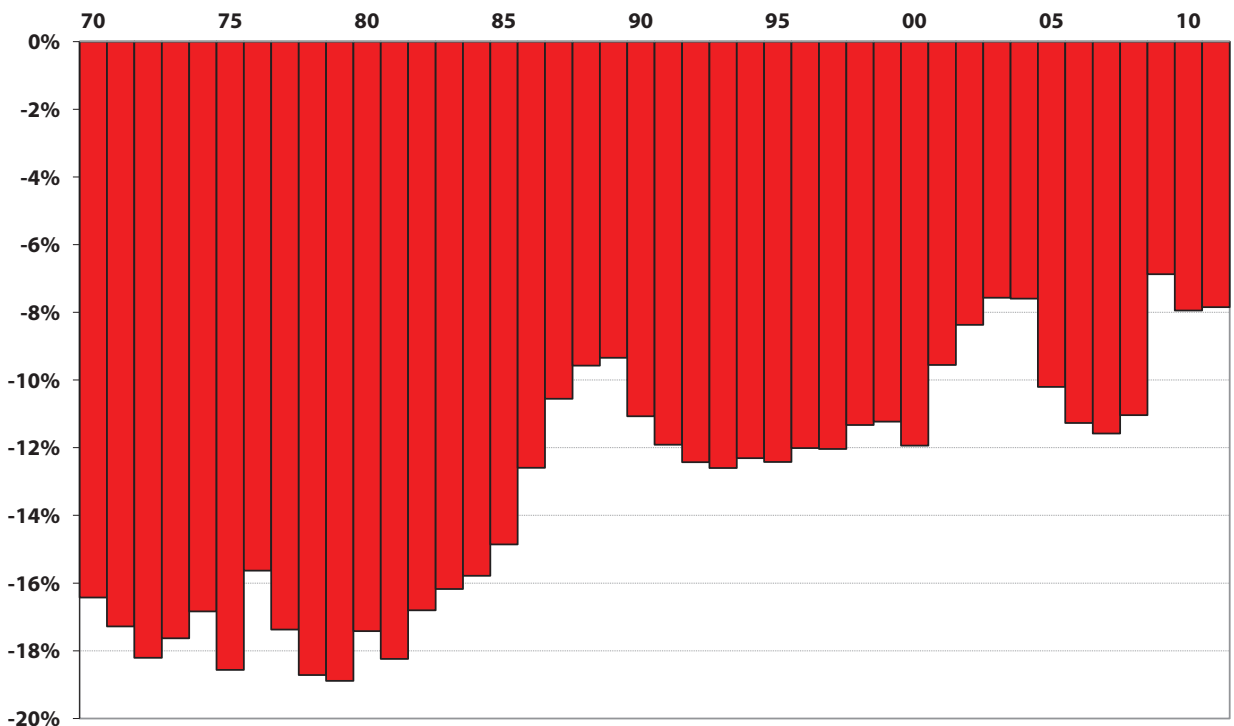
# 1. Per Capita Personal Income (Continued)

| 2011 Personal Income and National Rank,<br>New England States |                 |      |
|---|-----------------|------|
|   | Income          | Rank |
| <b>United States</b>  | <b>\$41,560</b> |      |
| <b>New England</b>  | <b>\$51,274</b> |      |
| Connecticut   | \$57,902        | 1    |
| Massachusetts   | \$53,471        | 2    |
| New Hampshire   | \$45,881        | 9    |
| Rhode Island  | \$43,875        | 15   |
| Vermont   | \$41,572        | 21   |
| Maine   | \$38,299        | 29   |

Source: Bureau of Economic Analysis

The Per Capita Personal Income Gap graph shows that the gap between Maine and the nation has been just under 8% over the last two years.

## Per Capita Personal Income Gap 1970 - 2011 (% Points Maine Income Lags U.S.)



Source: Bureau of Economic Analysis

**Related indicators:** Employment, Research and Development Expenditures, Higher Degree Attainment, Fourth Grade Reading Scores, State and Local Tax Burden, Poverty, Wellness and Prevention



## 2. Gross Domestic Product

**Benchmark:** Maine's GDP growth will outpace New England and the U.S.

### Real Gross Domestic Product Growth Rate 1997 - 2011



Source: Bureau of Economic Analysis

### Economy Grows in U.S. and New England – but not Maine

Gross Domestic Product (GDP) is a measure of economic health and a primary measurement of a growing or receding economy. GDP is the value added in production by labor and property located within a state summed across all industry sectors.

GDP declined across the nation in 2008 and 2009 but rebounded in 2010. From 2010 to 2011, Maine's GDP was down 0.4% while New England grew by 1.8% and the U.S. by 1.5%. Maine's GDP declined by 2.7% over the last five years while New England grew by 2.6% and the U.S. grew by 1.8%.

The industry sector table shows that the relative contribution of major industry sectors to Maine's GDP changed little from 2010 to 2011. Real Estate, Government, Health Care and Social Assistance, and Manufacturing continue to account for half of Maine's economic output. The Administrative and Waste Services (+3.9%) and Construction (+2.9%) sectors saw the greatest growth while the Utilities (-11.7%) and Information (-9.4%) sectors saw the greatest declines. Overall, from 2010 to 2011, nine sectors experienced growth, eight declined, and one was essentially unchanged.

GDP is affected by a number of other indicators. Improvements in educational attainment and health of the workforce lead to greater productivity. Controlling costs like energy and health care make it possible for capital infrastructure investments that improve productivity.

**Related indicators:** Employment, Productivity, Higher Degree Attainment, Fourth Grade Reading Scores, Eighth Grade Math Scores, Cost of Doing Business, Cost of Health Care, Cost of Energy

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## 2. Gross Domestic Product (Continued)

### Real Gross Domestic Product in Maine by Major Industry Sector 2011

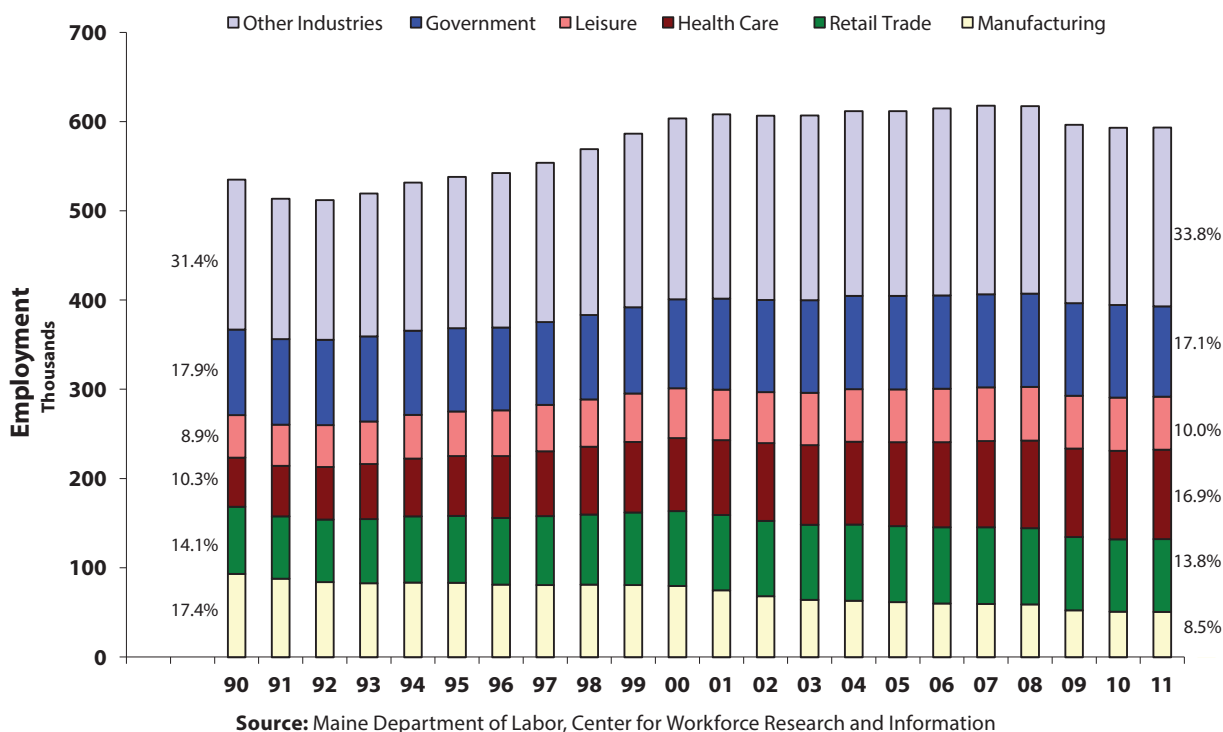
| Industry Sector                        | GDP Millions of Dollars | % of Total | % Change 2010-11 |
|--|-------------------------|------------|------------------|
| Real Estate                            | \$6,041                 | 13%        | -2.3%            |
| Government                             | \$6,005                 | 13%        | -2.8%            |
| Health Care and Social Assistance      | \$5,264                 | 12%        | 1.7%             |
| Manufacturing                          | \$5,186                 | 12%        | 2.2%             |
| Retail Trade                           | \$4,365                 | 10%        | 0.3%             |
| Finance and Insurance                  | \$3,227                 | 7%         | 2.8%             |
| Prof., Scientific & Technical Services | \$2,423                 | 5%         | 2.5%             |
| Wholesale Trade                        | \$2,177                 | 5%         | 0.7%             |
| Construction                           | \$1,606                 | 4%         | 2.9%             |
| Accommodation & Food Services          | \$1,566                 | 3%         | 1.7%             |
| Administrative & Waste Services        | \$1,329                 | 3%         | 3.9%             |
| Information                            | \$1,056                 | 2%         | -9.4%            |
| Trans. and Warehousing                 | \$1,029                 | 2%         | -2.6%            |
| Other Services                         | \$1,017                 | 2%         | -0.1%            |
| Utilities                              | \$631                   | 1%         | -11.7%           |
| Management                             | \$523                   | 1%         | -4.6%            |
| Educational Services                   | \$509                   | 1%         | -1.0%            |
| Arts, Entertainment, Recreation        | \$450                   | 1%         | 0.0%             |

Source: Bureau of Economic Analysis

### 3. Employment

**Benchmark:** Employment measured by the total number of jobs will increase each year.

#### Maine's Average Annual Nonfarm Wage and Salary Employment by Industry Sector 1990 - 2011



#### Maine Gains 400 Jobs: A Skilled Workforce Key to Economic Growth

Maine added 400 jobs as total employment grew from 593,000 to 593,400 from 2010 to 2011.

The makeup of Maine's employment continues to change. Eight industry sectors added jobs between 2010 and 2011, led by Professional and Business Services (1,200 or 2.1%), Health Care (1,100 or 1.1%), and Retail Trade (600 or 0.7%). Five sectors lost jobs, including Government (-2,600 or -2.5%) and Information (-500 or -5.7%).

Manufacturing jobs declined by 400 while manufacturing GDP grew by 2.2% between 2010 and 2011. Manufacturing accounted for 12% of Maine's GDP in both 1997 and 2011 while jobs in the sector declined from 14.6% of Maine's total in 1997 to 8.5% in 2011. Nationwide, outsourcing and improvements in productivity have reduced the number of manufacturing jobs, which have traditionally offered higher wages and benefits than service sector jobs requiring similar educational attainment.

The total numbers only tell part of Maine's employment story. Job quality is another issue. Maine's average annual wage trails both the New England and national averages. In 2011, Maine's average annual wage of \$38,020 was just under 80% of the U.S. average (\$48,043) and approximately 79% of the New England average (\$48,686). Improving the number of high-quality jobs in Maine will increase Mainers' earnings and improve the state's economy.

Maine is likely to see slow job growth and relatively high unemployment for the next few years. The state faces a number of significant challenges in increasing employment. The jobs that will be available may be in different areas of the state and are likely to be in different sectors and require different skill sets from those that were lost. Ensuring that Maine's current and future workers have the education and skill sets to take advantage of emerging employment opportunities is critical to Maine's economic prosperity.

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### 3. Employment (Continued)

#### Employment Growth in Maine by Selected Sectors 2010 - 2011

| Sector                                     | Jobs Gained/Lost | Growth |
|--|------------------|--------|
| Manufacturing                              | -400             | -0.8%  |
| Retail Trade                               | 600              | 0.7%   |
| Health Care and Social Assistance          | 1100             | 1.1%   |
| Leisure and Hospitality                    | -200             | -0.3%  |
| Government                                 | -2600            | -2.5%  |
| Natural Resource and Mining                | 100              | 4.0%   |
| Construction                               | 300              | 1.2%   |
| Transportation, Warehousing, and Utilities | 200              | 1.2%   |
| Wholesale Trade                            | -100             | -0.5%  |
| Information                                | -500             | -5.7%  |
| Financial                                  | 0                | 0.0%   |
| Professional and Business Services         | 1200             | 2.1%   |
| Educational Services                       | 100              | 0.5%   |
| Other Services                             | 400              | 2.0%   |

**Source:** Maine Department of Labor, Center for Workforce Research and Information

Investments in Maine's current and future workers and infrastructure, such as job training, education, and research and development (R&D), are paying dividends. This is most evident in high tech and emerging specialized manufacturing industries that demand highly skilled and highly educated workers. Maine must continue to invest in education at all levels and in all forms to prepare our workforce for the current and future economy.

In addition, many older workers across Maine's economy are approaching retirement. The impact will be felt in all industry sectors and some more than others. Replacing these retiring workers in terms of numbers, knowledge, and skills will be a major challenge for Maine in coming years. Continuing to engage these workers, providing students and current workers with needed education and skills, supporting innovation and entrepreneurship, and engaging new workers both inside and outside of Maine are and will continue to be critical to growing Maine's economy.

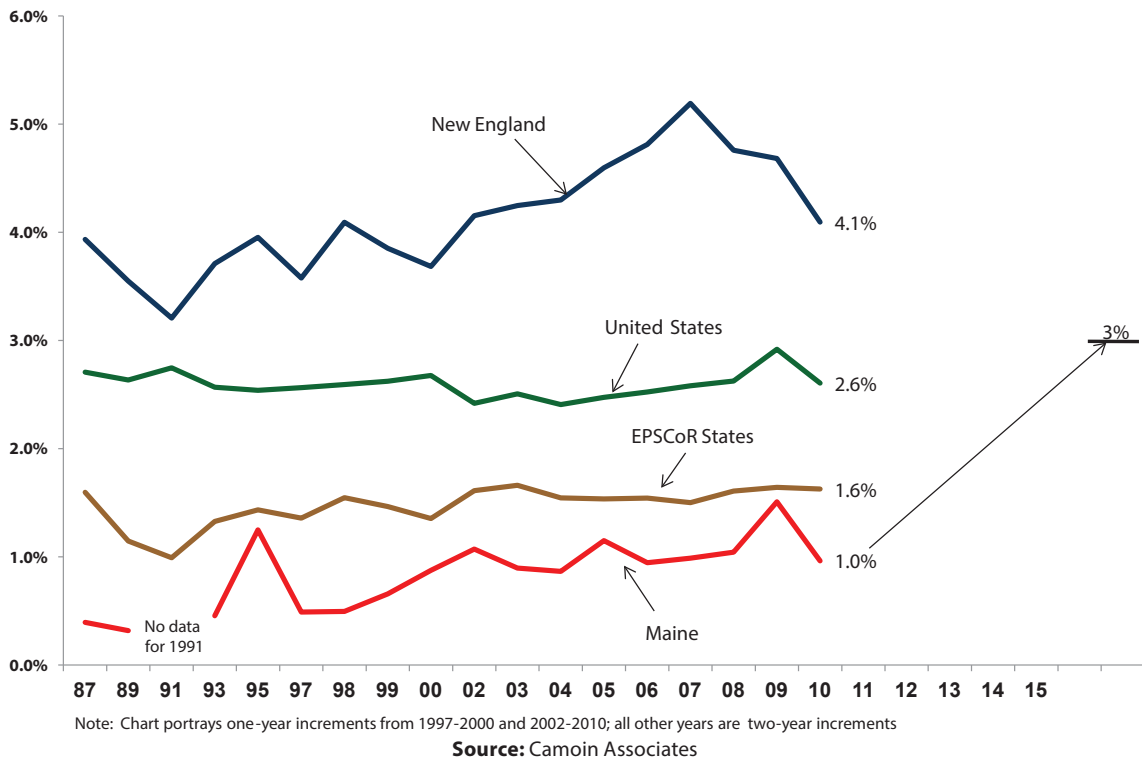
**Related indicators:** Per Capita Personal Income, Gross Domestic Product, Higher Degree Attainment, Fourth Grade Reading Scores, Eighth Grade Math Scores



## 4. Research and Development Expenditures

**Benchmark:** Total R&D spending as a percent of GDP in Maine will increase to 3% by 2015.

### Total R&D Spending as a Percent of Gross Domestic Product 1987 - 2010



### Maine R&D Investment at 1% of Gross Domestic Product – More is Needed to Drive Innovation and Growth

This indicator compares Maine with other EPSCoR states (Experimental Program to Stimulate Competitive Research – a joint program of the National Science Foundation and 25 small, rural states, including Maine), the United States as a whole, and New England.

Maine's R&D investment of \$488 million ranked 45<sup>th</sup> in the nation in 2010. This was approximately 1% of Maine's gross domestic product. At this level of effort, Maine remains at less than half of the U.S. rate of investment in R&D and less than one quarter of the New England rate. Maine's R&D investment as a percentage of GDP is more than twice what it was in 1998, but has been below the nation, the region, and EPSCoR states since 1987.

Maine's upswing in 2009 was due primarily to an increase in the industry component.\* Industry accounted for \$530 million in R&D investment (72% of the state's total) in 2009 and \$251 million (53%) in 2010.

The Growth Council views the 3% benchmark as the investment necessary to expand Maine's innovation-driven economy and improve the state's competitiveness. This is also the goal set in the state's *2010 Science and Technology Action Plan*. An additional investment of approximately \$1 billion would have been required to reach the 3% benchmark in 2010.

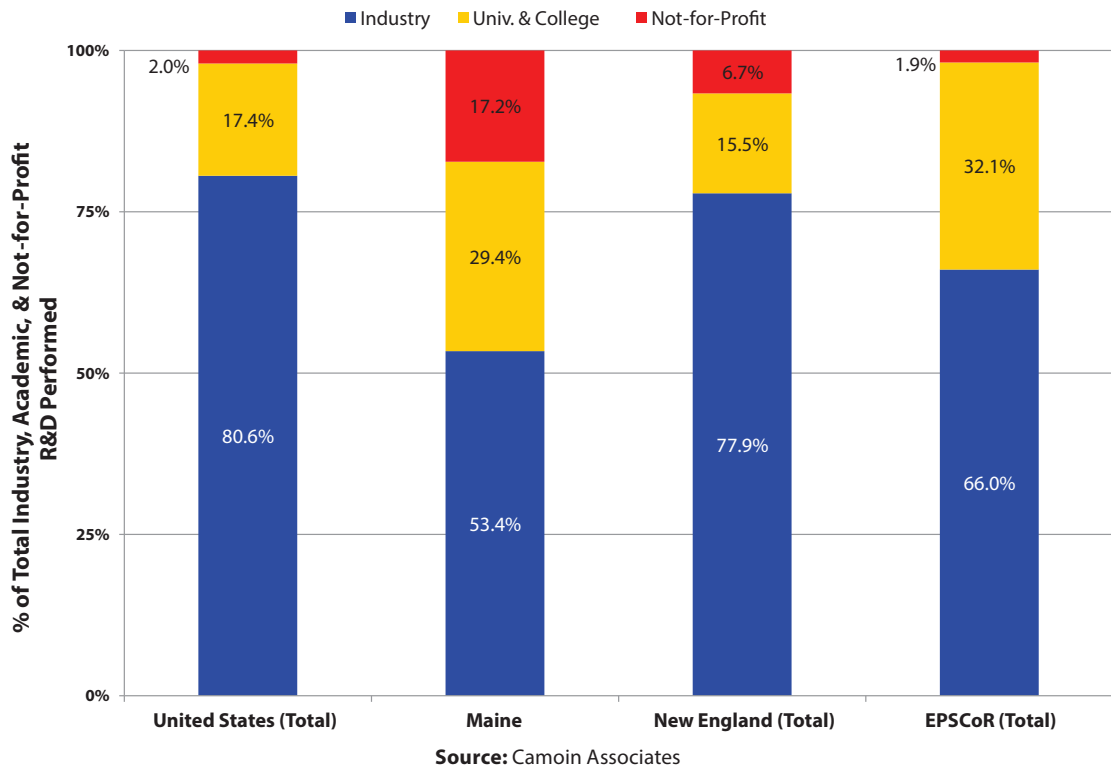
R&D performance is a key measure for gauging Maine's competitiveness in the knowledge-based economy. R&D is a driving force in economic growth. It fuels innovation that leads to new products, processes, technologies, and services. These innovations spawn new industries, new jobs, and, ultimately, an improved quality of life. According to data from

\*The National Science Foundation revised its methodology for calculating industry R&D beginning with 2008 data. Data from 2008 onward are not comparable to prior years.

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## 4. Research and Development Expenditures (Continued)

### R&D by Performance Sector – 2010



the U.S. Patent and Trademark Office, in 2012, Maine had .25 patents per 1,000 people, compared to a rate of 1.02 per 1,000 for New England and .44 per 1,000 for the U.S. Maine's rate was last among the New England states.

Nobel Prize Winner Robert Solow showed that 80% of GDP growth comes from innovation. R&D activity also attracts and supports a highly educated and skilled workforce which, in turn, continues to build a cycle of innovation. All of this leads to better jobs and increased government revenues.

A review by the University of Maine found a 6:1 return on R&D investment at the University. In FY 2010, the University filed 15 new patents and four new U.S. patents were issued; signed five license agreements with Maine companies to commercialize new patents; and helped start or spin off three new companies.

The 2011 Maine Comprehensive Research and Development Evaluation found that the 329 companies that have received support from R&D programs funded by the State of Maine received \$3.67 million in state funding for R&D related activities and expended \$29.56 million from all sources on R&D. The estimated total job impact of the companies was 8,875 and their total revenues were \$1.48 billion.

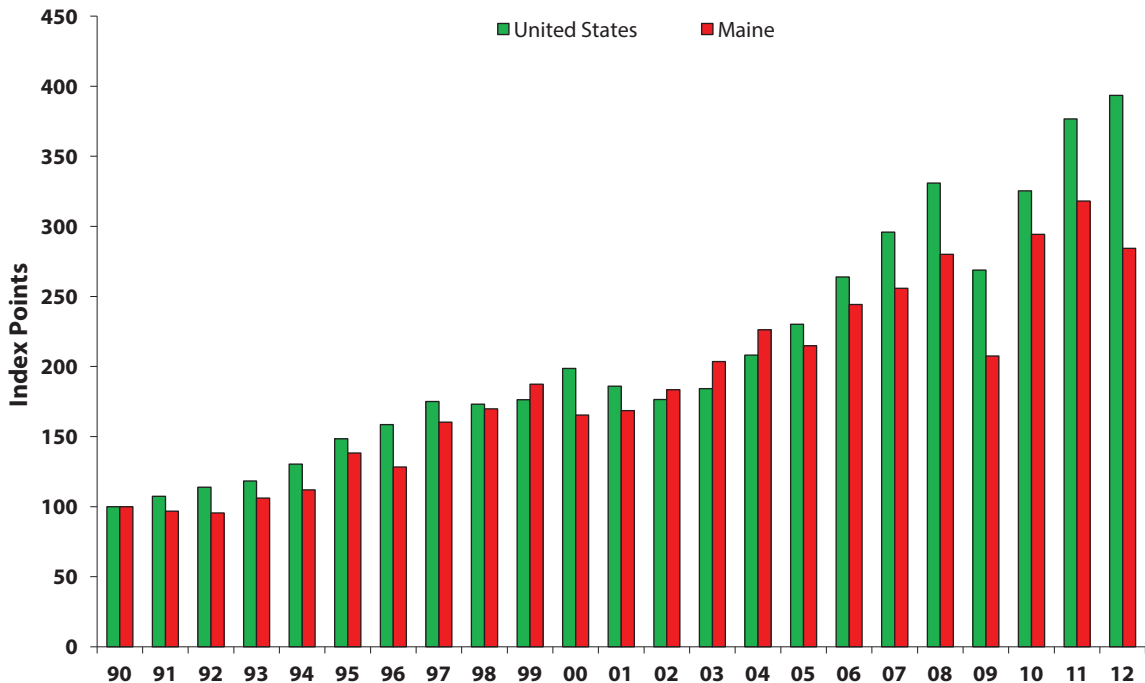
The 29 projects funded by the Maine Technology Asset Fund created 289.5 new jobs in collaborative R&D fields; 18 projects preserved 303 jobs; 19 projects led to the creation of new projects or services; 15 projects led to invention disclosures, licenses, and copyrights; \$17.1 million was generated in sales or licensing within 9 projects; and \$100.7 million was generated in new grants from non-state government sources in 19 projects.

**Related indicators:** Per Capita Personal Income, Gross Domestic Product, Higher Degree Attainment, Fourth Grade Reading Scores, Eighth Grade Math Scores

## 5. International Exports

**Benchmark:** Maine's international exports will grow faster than U.S. international exports.

### International Exports (Indexed from 1990) 1990 - 2012



Source: Maine International Trade Center

### Maine Exports Down 10.6% from 2011

Following a recessionary plunge in 2009, both Maine and U.S. exports continued their long-term growth trajectory through 2010 and 2011. From 2011 to 2012, Maine's exports fell by 10.6% to \$3.06 billion from a record high \$3.42 billion in 2011. U.S. exports grew by 4.5% during this time. Maine's decline was driven in large part by off years in both leading categories of Maine's exports: the Electric Machinery sector, mainly the semiconductor industry, dropped from \$995 million in 2011 to \$621 million in 2012, and Forest Products dropped by \$40 million. Losses in these sectors account for the bulk of the drop in state exports from 2011-2012.

Of Maine's major export commodity sectors, Fish Products grew by 13% from \$303 million to \$342 million, a new state record for that industry sector. Other bright spots included Vehicles and Parts, which grew by 19% from \$76 million to \$90 million; Industrial Machinery, which grew by 16% from \$126 million to \$146 million; and Aircraft/Aerospace parts which continued a growth trend and reached \$268 million, compared with just \$58 million five years ago.

Maine's top export market continued to be Canada, which received 43% of the state's international sales, followed by Malaysia (15%), China (8%), Japan (4%), and the Republic of Korea (3%). The remaining 27% of exports are purchased by over 170 countries worldwide.

Identifying and capitalizing on new markets is critical to growing the Maine economy and supporting Maine manufacturers and industry. International markets represent real growth opportunities with the potential to help Maine businesses grow customers and revenue that will drive productivity and sustainability over time. Ensuring that Maine's businesses are able to deliver a quality product at a competitive price is critical to this indicator and speaks to the need to invest in our workforce and manage cost structures. In all, 181,000 Maine workers are dependent on international trade, a number which has been rising since 2006.

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## 5. International Exports (Continued)

### Maine's Major Exported Commodities, 2012, in Millions of Dollars

| Commodity   | 2012         | 2012 % of Total | Growth Rate 2010 - 2011 |
|---|--------------|-----------------|-------------------------|
| <b>Forest Products Sub-Total</b>                            | <b>885</b>   | <b>28.9%</b>    | <b>-2.6%</b>            |
| <i>Paper and Paperboard</i>                                 | 393          | 12.9%           | -3.1%                   |
| <i>Pulp of Wood, etc.</i>                                   | 258          | 8.4%            | -13.2%                  |
| <i>Wood and Articles of Wood</i>                            | 234          | 7.7%            | 13.6%                   |
| <b>Electric Machinery; Sound Equip; TV Equip; Parts</b>     | <b>621</b>   | <b>20.3%</b>    | <b>-37.6%</b>           |
| <b>Fish, Crustaceans, and Aquatic Invertebrates</b>         | <b>342</b>   | <b>11.2%</b>    | <b>12.8%</b>            |
| <b>Aircraft, Spacecraft, and Parts</b>                      | <b>268</b>   | <b>8.8%</b>     | <b>0.3%</b>             |
| <b>Industrial Machinery, Including Computers</b>            | <b>146</b>   | <b>4.8%</b>     | <b>15.6%</b>            |
| <b>Vehicles, Except Railway or Tramway, and Parts, etc.</b> | <b>90</b>    | <b>2.9%</b>     | <b>18.9%</b>            |
| <b>Optic, Photo, Medical or Surgical Instruments, etc.</b>  | <b>66</b>    | <b>2.2%</b>     | <b>-8.1%</b>            |
| <b>Other</b>  | <b>640</b>   | <b>20.9%</b>    | <b>-2.90%</b>           |
| <b>Total Exports</b>  | <b>3,058</b> | <b>100.0%</b>   | <b>-10.6%</b>           |

**Source:** Maine International Trade Center

The State of Maine must continue building relationships worldwide to identify market opportunities for our businesses, and Maine's businesses must be ready to capitalize on these opportunities. The Maine International Trade Center is an important partner to Maine businesses looking to expand their international markets. Their trade missions have been very successful in helping Maine businesses secure new customers in foreign markets.

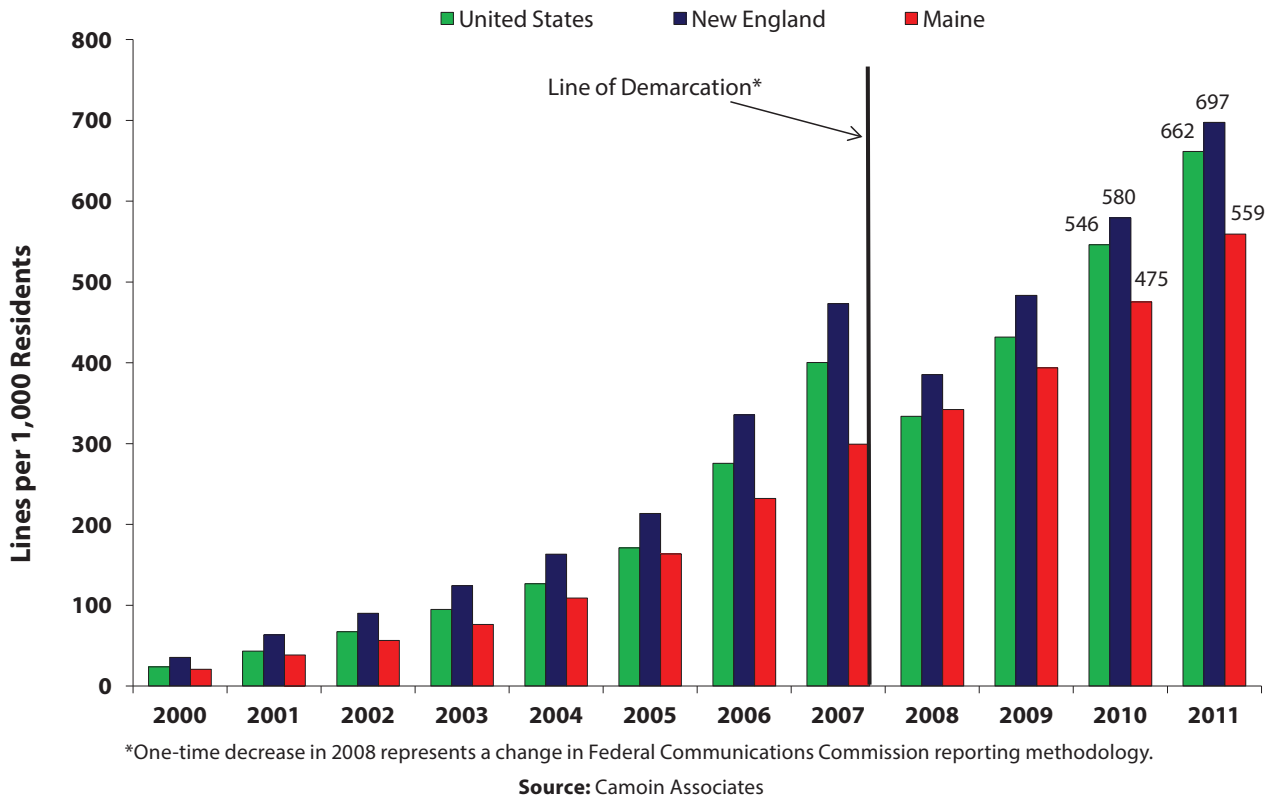
**Related indicators:** Per Capita Income, Gross Domestic Product, Employment, Research and Development Expenditures, Productivity, Higher Degree Attainment, Cost of Doing Business



## 6. High Speed Internet Subscribers

**Benchmark:** Maine will reach the New England level of high speed internet subscribers by 2015.

### High Speed Internet Lines (Subscribers) per 1,000 Residents 2000 - 2011



### Maine's Rate of 559 High Speed Internet Subscribers per 1,000 Residents Remains Below New England and U.S. Rates

Maine gained 84 high speed internet subscribers per 1,000 residents from 2010 to 2011, increasing from 475 to 559. New England grew by 117 subscribers per 1,000 residents, and the U.S. average by 116. As a result, the gap between Maine and the New England average increased from 104 in 2010 to 138 in 2011, and the gap between Maine and the U.S. grew from 71 to 102.

In 2010, 67.4% of Maine households used broadband in the home, ranking Maine 32<sup>nd</sup> in the nation and behind the other five New England states. New England continues to be considerably more connected than the nation as a whole, meaning that achieving the Growth Council's goal of reaching the New England level by 2015 is likely to be difficult absent a major policy shift or public sector investment.

Expanding internet access is particularly difficult for low-density states like Maine. Broadband access is generally more available in southern and coastal Maine and less available in the northern, eastern, and western regions. Even the more-connected regions have pockets that do not have broadband access.

The challenge is connecting and providing options in both rural areas and these pockets all over the state that lie just beyond internet and cable service areas. A minimum density level is needed to make it cost-effective for private service providers to expand service and customers must live within a certain distance of existing wire and wireless technology

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## 6. High Speed Internet Subscribers (Continued)

infrastructure. Those beyond that distance are excluded from the service. Satellite service may be available but has limitations such as costly upfront investments in equipment and/or higher-than-average monthly payments, restrictive bandwidth usage, and vulnerability to changing weather patterns.

Expanding Maine's internet connectivity is nevertheless essential to the state's economic growth and quality of life. Increasingly, in the knowledge economy, the internet links Maine businesses, organizations, and individuals to each other and the world at large. Internet connectivity makes it possible for companies to compete in the greater global economy and is especially important to the state's small businesses. Access also enables entrepreneurs to live and work in communities across the state, expands educational opportunities, and improves the accessibility, quality, and efficiency of health care. It is important to support connectivity expansion efforts in Maine.

**Related indicators:** Per Capita Personal Income, Gross Domestic Product, Employment, Research and Development Expenditures, New Business Starts, Productivity, Cost of Doing Business, Cost of Health Care

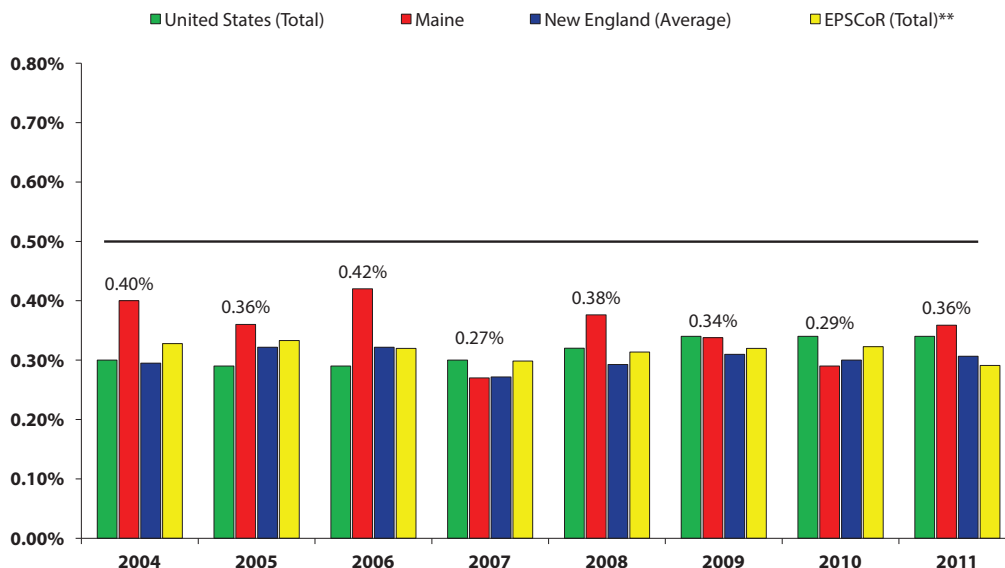
\*The Federal Communications Commission changed its reporting instructions in December of 2008, causing a one-time decrease in the reported number of mobile wireless internet access service connections, from about 60 million nationally in June 2008 to about 25 million in December 2008. The change excluded typical cell phone customers, customers whose only data purchases were entertainment downloads, and customers whose device has an internet browser but can only download customized-for-mobile internet content. As of December 2008, mobile network operators report only customers whose devices allow them to access the full internet and with service plans that allow data use over at least a month.



## 7. New Business Starts

**Benchmark:** The entrepreneurial index in Maine will reach 0.50% by 2015.

### Index of Entrepreneurial Activity\* 2004 - 2011



\*Measures the percent of individuals from ages 20 to 64 who do not own a business in the first survey month that start a business the following month (15+ hours per week)

\*\*Experimental Program to Stimulate Competitive Research, a joint program of the National Science Foundation and 25 small, rural states, including Maine

Source: Camoin Associates

### New Business Activity in Maine Improves in 2011 and Moves Above U.S., New England, and EPSCoR Averages

This index is a statement of business health and vitality. Maine's rate climbed from 0.29% in 2010 to 0.36% in 2011, moving back above the U.S. (0.34%), New England (0.31%) and EPSCoR states (0.29%) averages. Maine's national rank improved from 29<sup>th</sup> in 2010 to 13<sup>th</sup> in 2011.

It is important to know if new businesses are surviving and the type of employment they offer. According to the Maine Department of Labor, from the fourth quarter of 2010 to the fourth quarter of 2011, of 2,316 new business starts in Maine, 1,992 (86%) survived. These businesses created 7,107 jobs in 2010 with an average quarterly wage of \$7,499, approximately 24% below the average quarterly wage for the total private sector.

Microbusinesses, defined as businesses with five or fewer employees, are an important subset of new business activity. According to data from the University of Maine's School of Economics, since 2001, microbusinesses have accounted for a larger percentage of total annual employment in Maine than in any other New England state except Vermont. From 2009 to 2010, Maine's number of microbusinesses dropped by 0.8% after dropping by 1.8% between 2008 and 2009. New England's number was essentially unchanged, and the U.S. number dropped by 1.7%. In 2010, microbusinesses in Maine accounted for 21.8% of the state's total employment, above the New England (18.5%) and national (19.4%) averages.

New business activity, and the success of these businesses, is critical to Maine's economy. Helping more successful small businesses to expand can also boost Maine's economy. Understanding the types of businesses being created and the number and quality of jobs they provide, and providing the supports they need, is an important piece of moving Maine's economy forward.

Continued support of efforts like the Maine Technology Institute; the Maine International Trade Center; the University of Maine's Innovation Engineering program; Women, Work and Community; and the Maine Center for Entrepreneurial Development helps to provide Maine entrepreneurs with the resources they need to build businesses, create jobs, and succeed.

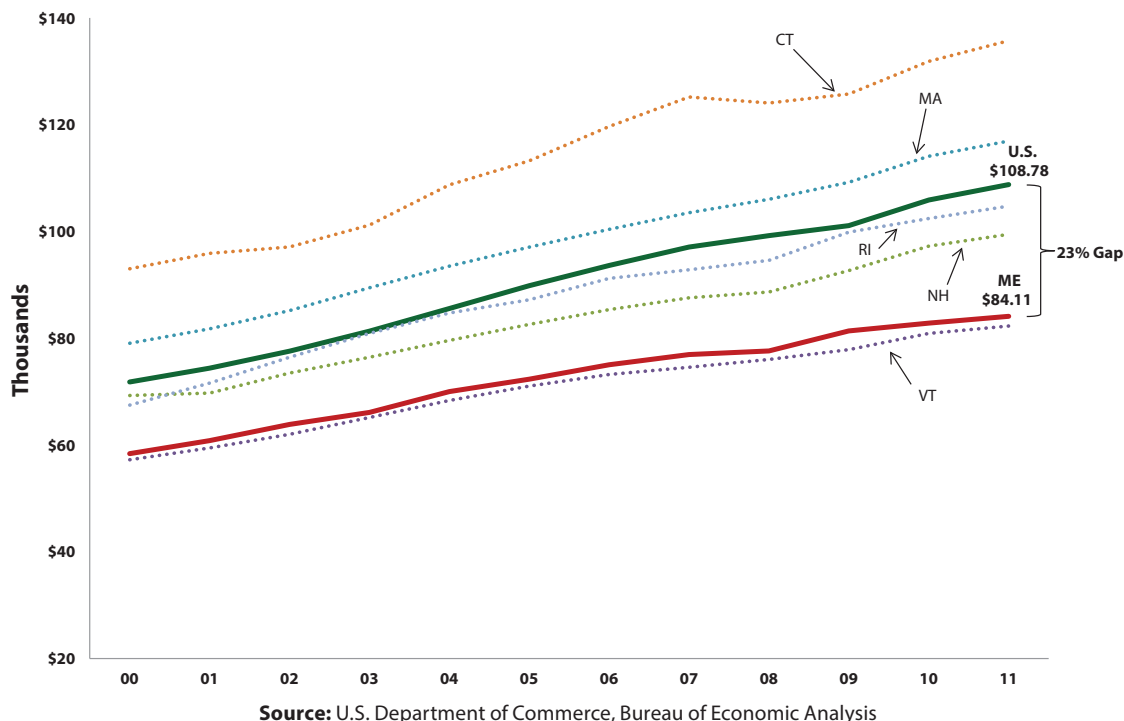
**Related indicators:** Employment, Research and Development Expenditures, Higher Degree Attainment, Fourth Grade Reading Scores, Eighth Grade Math Scores

## 8. Productivity

**Benchmark:** The value added per worker in Maine will increase to within 15% of the value added per worker in the U.S. by 2015.



### Value Added per Worker, all Sectors 2000 - 2011



### Maine Trails National Average on Worker Productivity, a Key Determinant of Economic Success

The Growth Council has begun tracking productivity\* across all economic sectors, a key component of Maine's competitiveness and overall economic health. This replaces the former manufacturing productivity indicator.

Maine's average productivity across all sectors was \$84,107 per worker in 2011. This was 23% below the U.S. average of \$108,783. Productivity has been trending upward in both Maine and the U.S. but Maine has not kept pace with the nation. Maine's productivity increased by 1.5% from 2010 to 2011 while the U.S. average increased by 2.7%. Over the last five years, Maine's growth of 12.1% trailed the national growth of 16.2%.

Among the New England states, Connecticut had the highest productivity, followed by Massachusetts, Rhode Island, New Hampshire, Maine, and Vermont.

The nature of Maine's economy accounts for some of the gap with the rest of the nation. Maine lacks many of the high economy of scale industries, such as the automobile industry, that are driving productivity gains in the rest of the United States. Nevertheless, improving productivity is critical to Maine's businesses remaining competitive with the nation and the world.

Productivity is improved through infrastructure and system investments as well as workforce investments like education and skills development programs. Improving educational attainment, expanding R&D investment, increasing innovation, and managing cost structures are critical to moving this indicator in a positive direction.

**Related indicators:** Gross Domestic Product, Employment, Research and Development Expenditures, Higher Degree Attainment, Fourth Grade Reading Scores, Eighth Grade Math Scores, Cost of Energy, Cost of Health Care, Wellness and Prevention

\* Productivity is calculated by dividing Gross Domestic Product by the total number of employees.



## 9. Higher Degree Attainment

**Benchmark:** The percentage of Maine residents age 25 and over with a higher degree will increase to at least the New England average by 2020.

### Higher Degree Attainment Among Residents Age 25 and Over 2000 - 2011



Source: U.S. Census Bureau, American Community Survey

### Maine Moves Ahead of U.S. Average and Closes Gap with New England Average: Continued Improvement Necessary to Meet Benchmark

The percentage of Maine residents age 25 and older holding an Associate's, Bachelor's, or advanced degree increased from 35.8% in 2010 to 37.3% in 2011. Maine's growth exceeded that of New England and the United States.

Maine's percentage of Bachelor's degree holders increased from 17.3% to 17.9% and the percentage of advanced degree holders increased from 9.5% to 10.5% while the percentage of Associate's degrees remained at approximately 9%. Maine was essentially the same as the U.S. average on Bachelor's and advanced degrees while both trailed the New England averages of 21.0% and 15.1%.

According to the Mitchell Institute's *College Access and Persistence in Maine*, Maine's high school graduation rate increased from 74% in 2000 to 83% in 2011, but the percentage of graduates attending college within one year of graduation (about 60%) has not improved. In 2010, 84% of first-year college students in Maine continued to their second year. Educate Maine reports that the 2010 graduation rates\* were 59% for the University of Maine System and 31% for the Maine Community College System.

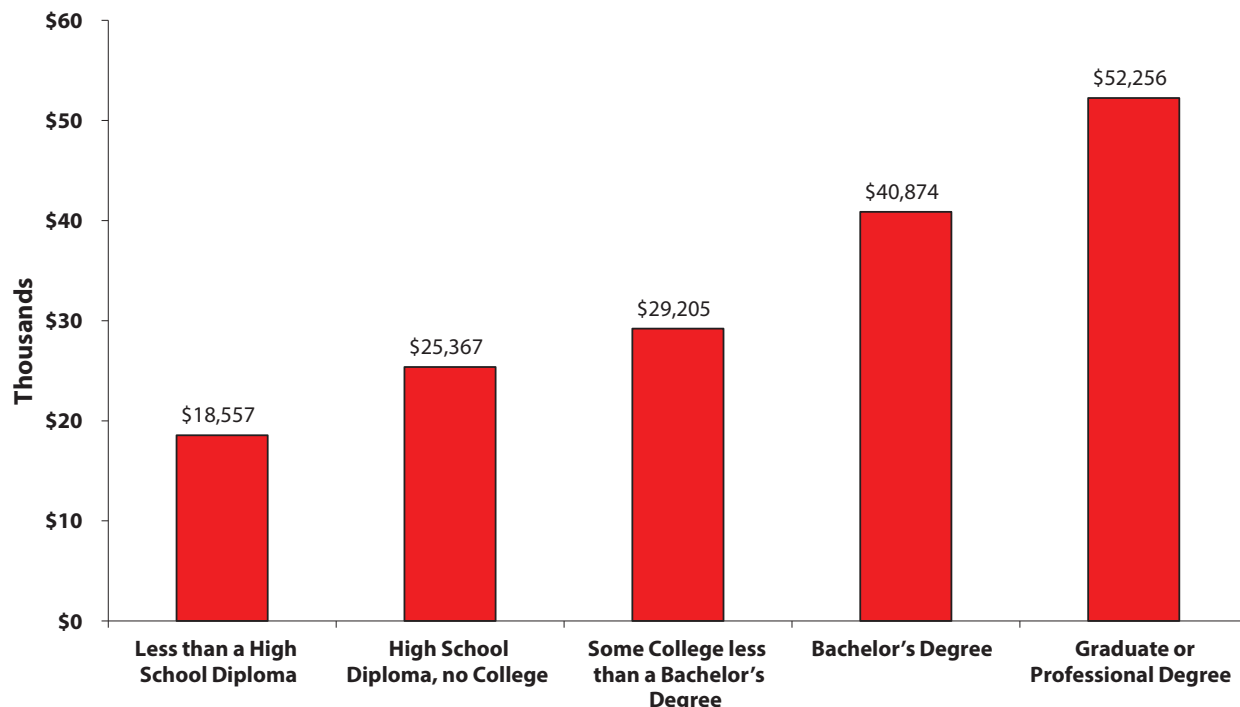
Higher education is critical to providing workers with the knowledge and skills they need to succeed in today's knowledge-driven economy. This enables Maine businesses to compete in the new economy. An educated workforce is critical to businesses deciding to invest, locate, and expand in Maine. The Georgetown Center on Education and the Workforce found that demand for college-educated workers in Maine is projected to be approximately seven times greater than for high school graduates by 2018.

\*Graduation within 150% of normal program (6 years for Bachelor's degrees and 3 years for Associate's degrees); excludes students who transfer and part-time students.

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## 9. Higher Degree Attainment (Continued)

### 2011 Maine Median Earnings for Population Age 25 and Over by Educational Attainment



Source: U.S. Census Bureau, American Community Survey

Educational attainment is linked to many other issues benchmarked in this report. As the second chart shows, Maine's median earnings increase with educational attainment. Greater educational attainment also improves employment, productivity, innovation, health and wellness, per capita incomes, and gross domestic product. This, in turn, generates more tax revenue that can be used for needed services and investments, such as roads, broadband, and research and development. Education also is a key to a healthy, functioning democracy, and improved self-esteem and aspirations. Education provides the means to move many indicators in this report.

Improving attainment levels starts with positioning people to succeed by investing in high-quality early childhood development. A healthy K-12 system must then prepare students to succeed in higher education and other post-secondary training options. Higher education institutions must provide students with the knowledge, skills, and abilities needed to succeed in the careers available in the economy of today and tomorrow.

Given Maine's demographics, young people and current students alone will not be enough to sufficiently boost the state's educational attainment. According to the U.S. Census Bureau, there are upwards of 200,000 individuals in Maine who have some amount of college credit but have not completed their degree. Engaging these and other adults in continuing their education must be a part of Maine's efforts to improve overall educational attainment.

There are a number of existing efforts in Maine focused on improving educational attainment. The Maine Children's Growth Council and the Maine Early Learning Investment Group focus on improving the early childhood system. Educate Maine works to transform the entire system. Programs like the MELMAC Education Foundation and Jobs for Maine's Graduates are working to ensure that high school graduates who want to continue their education follow through with their plans. The Maine Employers' Initiative works with employers to improve skills and training in the incumbent workforce, connects employers and educators with one another, and engages new populations in the Maine workforce.

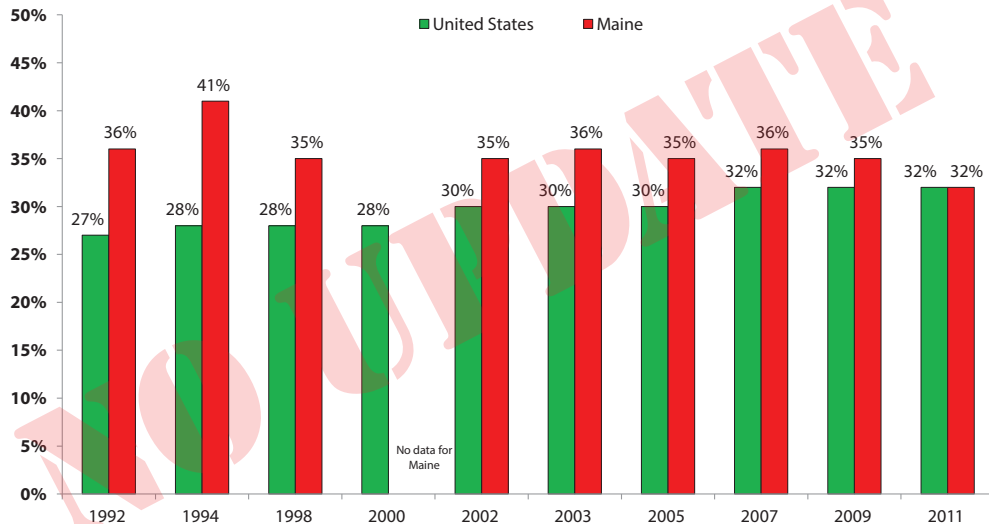
**Related indicators:** Per Capita Personal Income, Gross Domestic Product, Employment, Fourth Grade Reading Scores, Eighth Grade Math Scores, State and Local Tax Burden, Poverty



## 10. Fourth Grade Reading Scores

**Benchmark:** Maine's share of students scoring proficient and above will reach 50% by 2015.

### Average Fourth Grade Reading Scores, Share Scoring Proficient\* and Above, 1992 - 2011



\*Proficient defined as competency over challenging subject matter, application to real-world situations, and appropriate analytical skills

**Source:** National Center for Education Statistics, National Assessment of Education Progress (NAEP)

### One-third of Maine Students Proficient in Reading - Starting Early Has the Greatest Return on Investment

The National Assessment of Education Progress (NAEP)\* reading assessment is done every two years and the last available data is 2011. Fourth grade is a critical juncture in the development of reading skills, which are essential to future success in school, work, and life. This is when reading should be established as a skill and students transition from “learning to read” to “reading to learn.” Fourth grade reading scores reflect the effectiveness of previous investments (such as early childhood, pre-K, and Head Start) and are a predictor of future student success, outcomes, and public costs.

The percentage of Maine fourth graders testing at a proficient or above level has declined in recent years to the national average of 32%. Maine’s decline has coincided with a decline in the state’s K-12 enrollment and an increase in K-12 expenditures. Average scores in both Maine and the nation differ based on gender (girls score higher than boys), race (white students score higher than non-white students), and eligibility for free or reduced-price lunches (eligible students score lower than non-eligible students). According to *Maine KIDS COUNT 2012*, 84,496 (46%) Maine students were eligible for free or reduced-price lunches during the 2011-2012 school year.

Approximately 85% of the core brain structure is formed by age 3. Positive early childhood experiences create a strong, sturdy foundation and prepare the brain for all the development that follows. Investment in early childhood education (like Educare Central Maine and Head Start) has been shown to have the highest return on investment over the long term in the form of improved K-12 performance, higher college attendance and completion, higher productivity and incomes, and reduced social costs (remediation, criminal justice, health care, and welfare).

Positive movement on many other economic indicators starts with children having the tools to become productive members of society. School cannot compensate for all societal factors but is one of the main places where skills like reading are honed. It is also one of the largest components of the state budget and the largest for municipal budgets.

**Related indicators:** Per Capita Personal Income, Gross Domestic Product, Employment, Productivity, Higher Degree Attainment, Wellness and Prevention

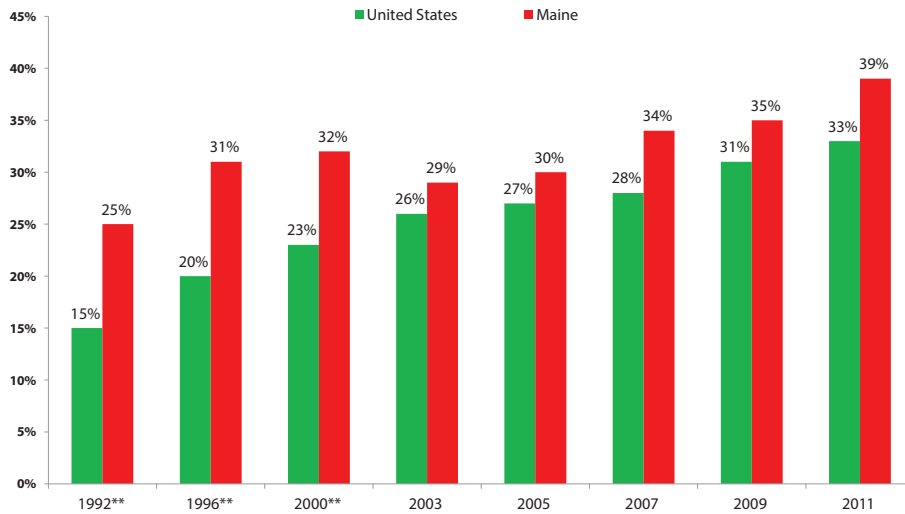
\*The National Assessment of Educational Progress (NAEP) is the largest nationally representative and continuing assessment of America’s students in various subject areas, including reading. NAEP assessments are administered uniformly nationwide, allowing for state to state comparisons and for analysis of long-term trends. The NAEP assesses students at critical periods of development and learning: grades 4, 8, and 12.

## 11. Eighth Grade Math Scores

**Benchmark:** Maine's share of students scoring proficient and above will reach 50% by 2015.



### Average Eighth Grade Math Scores, Share Scoring Proficient\* and Above, 1992 - 2011



\*Proficient defined as competency over challenging subject matter, application to real-world situations, and appropriate analytical skills

\*\*Accommodations were not permitted for this assessment

**Source:** National Center for Education Statistics, National Assessment of Education Progress (NAEP)

### Maine Exceeds U.S. Average with 39% of Eighth Graders Scoring Proficient or Better

Math is an indispensable skill in today's society and work environment. It is especially important in industries related to science, technology, engineering, and math, many of which are growing and are expected to continue to grow going forward. For this reason, the Growth Council chose to add this indicator to the report this year.

The percentage of Maine eighth graders scoring proficient or better increased from 25% in 1992 to 39% in 2011 on the National Assessment of Education Progress (NAEP).<sup>\*</sup> The U.S. average increased from 15% to 33% and the New England average increased from 23% to 42% during that same time.

Average scores in both Maine and the nation showed minimal differences based on gender. White students scored higher than non-white students in both Maine and the U.S. and students eligible for free or reduced-price lunches scored lower than non-eligible students. As noted in the Fourth Grade Reading Scores indicator, according to *Maine KIDS COUNT 2012*, 84,496 (46%) Maine students were eligible for free or reduced-price lunches during the 2011-2012 school year. The Poverty indicator shows that the poverty rate for both Maine children under 5 and Maine children under 18 increased from 2010 to 2011, although they remain below U.S. averages.

Eighth grade scores reflect skills in algebra, which is increasingly recognized as a foundational skill. The Maine Comprehensive Research and Development Evaluation, Maine Innovation Index 2011, and Statewide Strategic Plan for Science, Technology, Engineering, and Mathematics cite eighth grade math scores as an indicator of Maine's future success in these areas. According to the Mitchell Institute, math proficiency is a strong indicator of a student's readiness for college. Students need a solid foundation to prepare them for success later on in academics, in life, and in careers.

**Related indicators:** Per Capita Personal Income, Gross Domestic Product, Employment, Productivity, Higher Degree Attainment, Wellness and Prevention

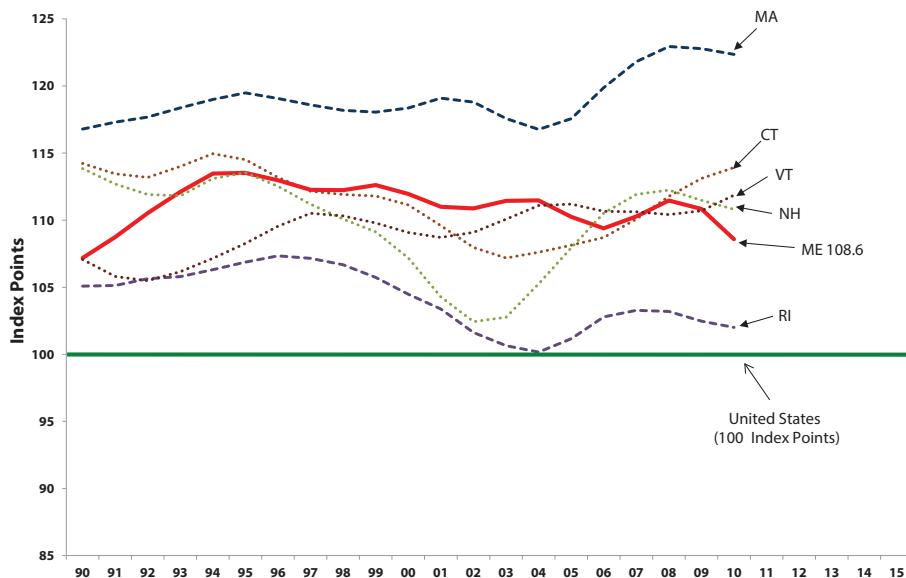
<sup>\*</sup>The National Assessment of Educational Progress is the largest nationally representative and continuing assessment of America's students in various subject areas, including math. NAEP assessments are administered uniformly nationwide, allowing for state to state comparisons and for analysis of long-term trends. The NAEP assesses students at critical periods of development and learning: grades 4, 8, and 12.



## 12. Cost of Doing Business

**Benchmark:** The cost of doing business in Maine will decrease to the U.S. average by 2015.

### Cost of Doing Business 1990 - 2010



Source: Moody's Analytics

### Maine's Cost of Doing Business Ranks 10<sup>th</sup> at 110.8% of U.S. Average

The Moody's Analytics Cost of Doing Business index is a weighted scale of labor costs (wages, benefits, and productivity), energy costs (industrial and commercial electricity), and tax burden (state and local). For Maine, labor costs are weighted at 73%, energy costs at 17%, and taxes at 10%. Regulatory environment is captured in part by the tax index.

Maine improved from 10.8% above the national average in 2009 to 8.6% above the national average in 2010 as the state's ranking improved from 7<sup>th</sup> to 10<sup>th</sup> (1 is the highest cost of doing business and 50 is lowest).

Maine's cost of doing business is impacted by several factors. Our reliance on oil and oil products for energy leaves us particularly vulnerable to price spikes in this market; diversifying our energy supply can help businesses capitalize on lower-cost options. Maine's relatively low unit labor cost helps lower our cost of doing business but also means lower incomes for Maine people. Maine has made progress in lowering our tax burden in recent years, but our burden remains above the national average.

The relative cost of doing business is important to a region's economy. It impacts the ability of companies to make a profit, and is an important consideration for businesses looking to locate or expand in the state. Some of the states with the highest costs of doing business, however, are among the leaders in other positive economic indicators. Managing Maine's cost structures can help lower the cost of doing business, and investing in the state's workforce and infrastructure can help provide Maine businesses with the resources needed to succeed in the larger economy.

#### New England Ranks by Indexes, 2010

|           | Overall Rank | Unit Labor Rank | Cost of Energy Rank | Tax Burden Rank |
|-----------|--------------|-----------------|---------------------|-----------------|
| MA        | 2            | 1               | 3                   | 29              |
| CT        | 4            | 18              | 2                   | 6               |
| VT        | 6            | 4               | 9                   | 5               |
| NH        | 7            | 6               | 5                   | 46              |
| <b>ME</b> | <b>10</b>    | <b>24</b>       | <b>11</b>           | <b>3</b>        |
| RI        | 14           | 38              | 8                   | 9               |

Source: Moody's Analytics

#### Maine's National Rank in Cost of Doing Business, 1995 - 2010

| 95 | 96 | 97 | 98 | 99 | 00 | 01 | 02 | 03 | 04 | 05 | 06 | 07 | 08 | 09 | 10 |
|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|----|
| 6  | 6  | 5  | 5  | 5  | 5  | 4  | 5  | 5  | 5  | 7  | 9  | 8  | 7  | 7  | 10 |

Source: Moody's Analytics

**Related indicators:** Per Capita Personal Income, Cost of Energy, Cost of Health Care, State and Local Tax Burden

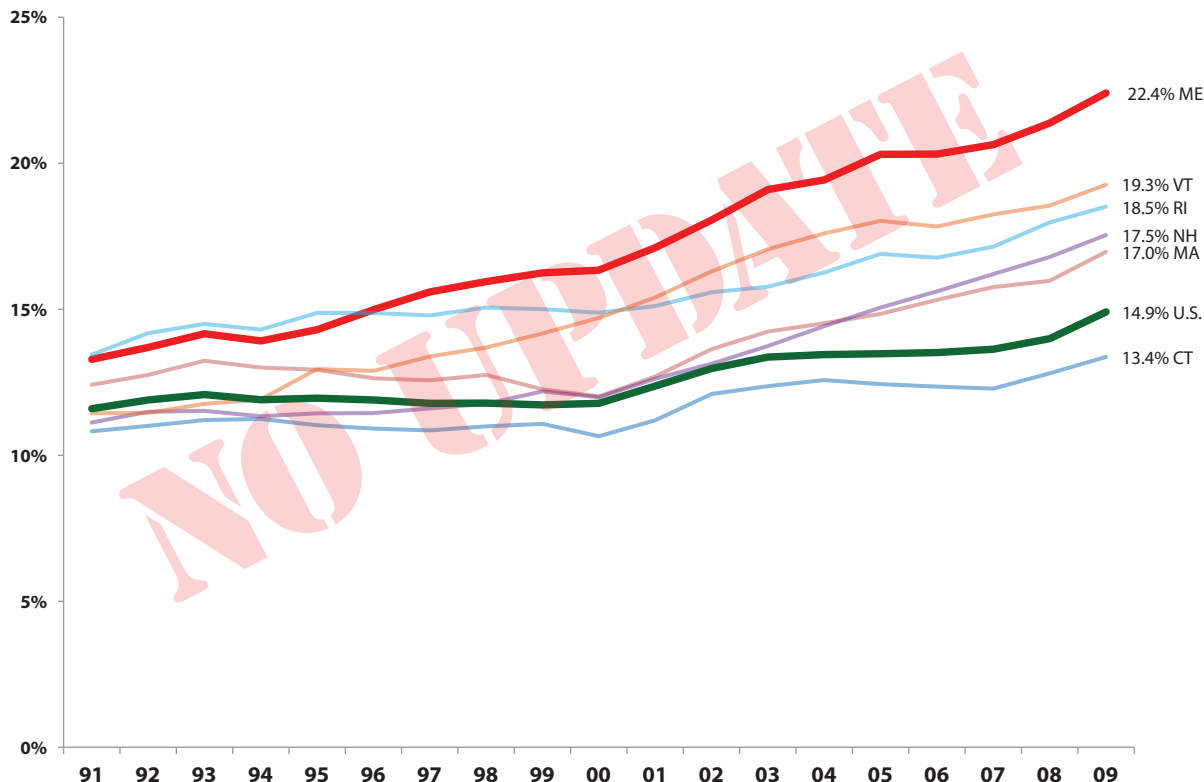


## 13. Cost of Health Care

**Benchmark:** Maine health care costs as a percent of GDP will decline to the U.S. average by 2015.



### Total Health Care Expenditures as a Percent of GDP 1991 - 2009



Source: Kaiser Family Foundation and Bureau of Economic Analysis

### Maine Health Care Spending Accounts for 22.4% of GDP Exceeding U.S. Average and All New England States

Updated data on health care expenditures as a percentage of Gross Domestic Product (GDP) was available for the first time since 2004 and included in last year's report. The cost of health care has an enormous impact on Maine's economy. Although no update is available since last year's report, the Council is including this data again to underscore the need for reliable updated data and its importance to Maine's policymakers.

The graph depicts the increases in health care expenditures as a percentage of GDP for Maine, the other New England states, and the U.S. from 1991 to 2009. In 1991, health care expenditures accounted for 13.3% of Maine's GDP. The other New England states ranged from Connecticut's 10.8% to Rhode Island's 13.4%, and the U.S. average was 11.6%.

Since the mid-1990s, the upward trajectory of Maine's health care costs as a percentage of GDP has exceeded that of the other New England states and the U.S. By 2009, health care expenditures accounted for 22.4% of Maine's GDP, higher than the other New England states and the U.S. average.

Per capita expenditure data shows the high cost of health care in New England relative to the U.S. average. U.S. average per capita health care expenditures increased from \$4,127 in 2000 to \$6,815 in 2009 (36%). Maine's rate increased from \$4,656 to \$8,521 (45%) over the same time. Per capita expenditures grew by at least 41% in all of the other New England states as well.

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## 13. Cost of Health Care (Continued)

### Per Capita Health Care Expenditures 2000 and 2009



Maine's situation is attributable to both relatively high health care costs and a comparatively small economy. In 2009, Massachusetts (\$9,278) and Connecticut (\$8,654) both had higher per capita expenditures than Maine. However, health care expenditures accounted for a much higher share of GDP in Maine (22.4%) than in either of these states (17.0% in Massachusetts and 13.4% in Connecticut) due to their much larger economies.

High costs limit access to health care, affecting the overall health and productivity of Maine's people, disrupting families and communities, interrupting work and education, and detracting from quality of life. As the data shows, Maine's health care costs have been rising steadily, imposing a growing and disproportionate burden on Maine's people, businesses, and government. Maine businesses identified the high cost of health care as the top obstacle to investment in the Maine Development Foundation's 2010 *Making Maine Work* survey ([www.mdf.org](http://www.mdf.org)).

Costly treatments and an aging population play a part in the high costs of medical care. Maine's rates of obesity and overweight increase the prevalence of expensive preventable illnesses. The distribution of medical care and variations in the quality and cost of care (according to the Maine Health Data Organization, identical procedures may vary in cost by over 200% depending on the provider) also play a role.

There are a number of ways to rein in growing health care costs. Providing health care consumers with access to full information can help them make more informed choices about their care. Improved efficiency in the delivery of health care services can lower costs. Efforts to improve the overall health and wellness of Maine's people can reduce the need for medical care. These and other policies to address the high cost of health care are critical to Maine's economy.

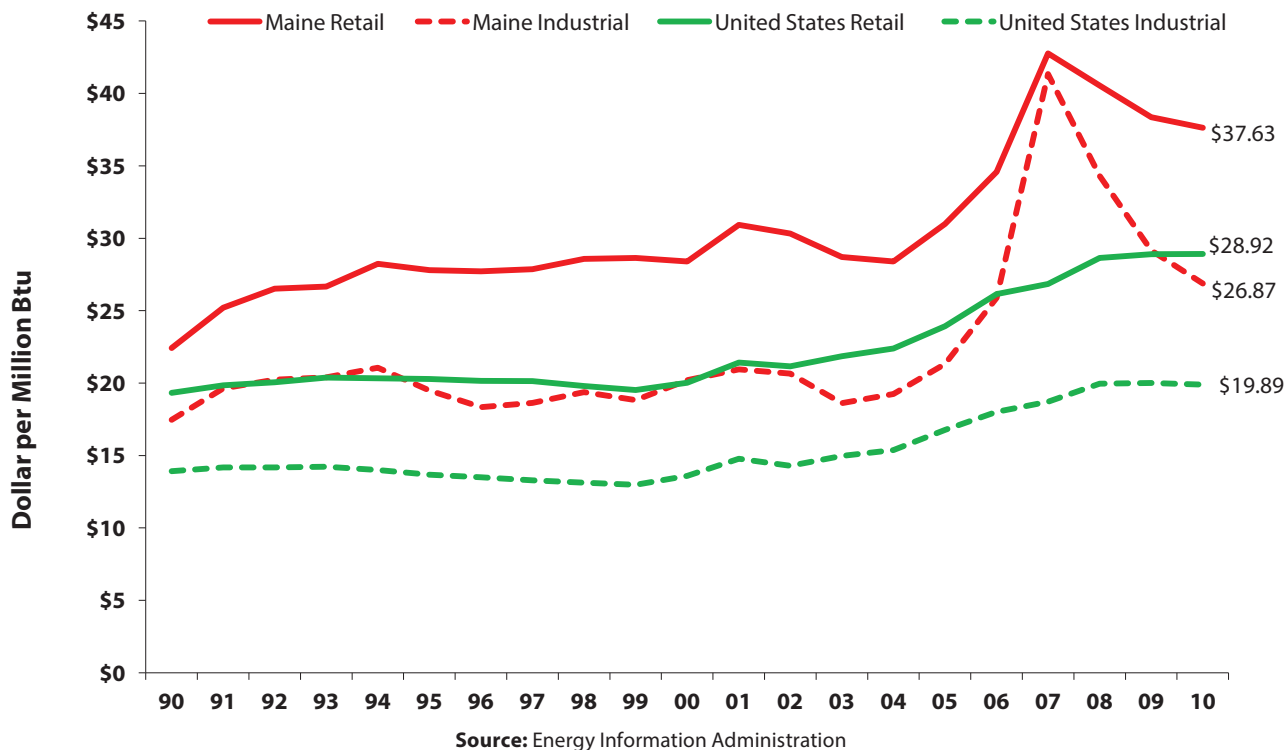
**Related indicators:** Gross Domestic Product, Employment, Cost of Doing Business, Wellness and Prevention, Health Insurance Coverage

## 14. Cost of Energy

**Benchmark:** The cost of electricity in Maine will decrease to the U.S. average by 2015.



### Retail (all sectors) and Industrial Electricity Price, Maine and U.S. 1990 - 2010



### Maine Retail and Industrial Electricity Prices Continue to Drop but Remain Higher Than U.S. Average - State Needs to Improve Efficiency and Continue to Diversify the Energy Mix

Maine's retail and industrial electricity prices both continued to drop from 2009 to 2010, with the retail price per British Thermal Unit (Btu) declining by \$0.73 and the industrial price by \$2.29 per Btu. However, Maine's energy prices remain well above the national average and the cost of energy is a concern for Maine's people and businesses. The gap between Maine's retail electricity prices and the nation's was 16% in 1990 and 30% in 2010; the industrial price gap was 25% in 1990 and 35% in 2010.

High energy costs are a challenge throughout the New England region. Maine's ranking of 11 was lowest among the New England states in the 2010 Cost of Doing Business indicator. Maine's prices can be up to 40% higher than Hydro-Quebec residential rates that benefit from the Hydro-Quebec large scale hydroelectric generation facility, coal, and nuclear generation.

Businesses, particularly manufacturers, weigh the cost of energy heavily when making location and expansion decisions. In the Maine Development Foundation's 2010 *Making Maine Work* survey ([www.mdf.org](http://www.mdf.org)), 78% of Maine's business leaders surveyed listed the cost of energy as the second strongest negative impact on businesses and organizations.

While the costs of oil and oil products do not vary greatly across the nation, Maine's usage is high. More Mainers (68%) heat their homes with oil than the national average (6.2%) and more of Maine's passenger movement (95%) happens by road than the national average (80%). According to an October 2012 report by TRIP, a national transportation research group, 81% of the commodities delivered annually from sites in Maine is transported by truck.

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## 14. Cost of Energy (Continued)

This leaves Maine particularly vulnerable to volatility in petroleum prices and changing world politics. While there is little that Maine can do to affect the world oil market, becoming less dependent upon oil would give Maine more control over our energy supply and price.

Increased energy efficiency can reduce overall energy use. The Efficiency Maine Trust has had success helping businesses implement efficiency measures to reduce their energy use. More can be done in this area, particularly with large industrial and commercial customers. Diversifying the mix of energy sources will make Maine less reliant on any single source and provide options to Maine businesses and residents. With its primary sources within North America, natural gas offers more stability than oil. In addition, recent growth in the pellet, wind, tidal, and bio-fuel industries in Maine are promising options to diversity the energy mix.

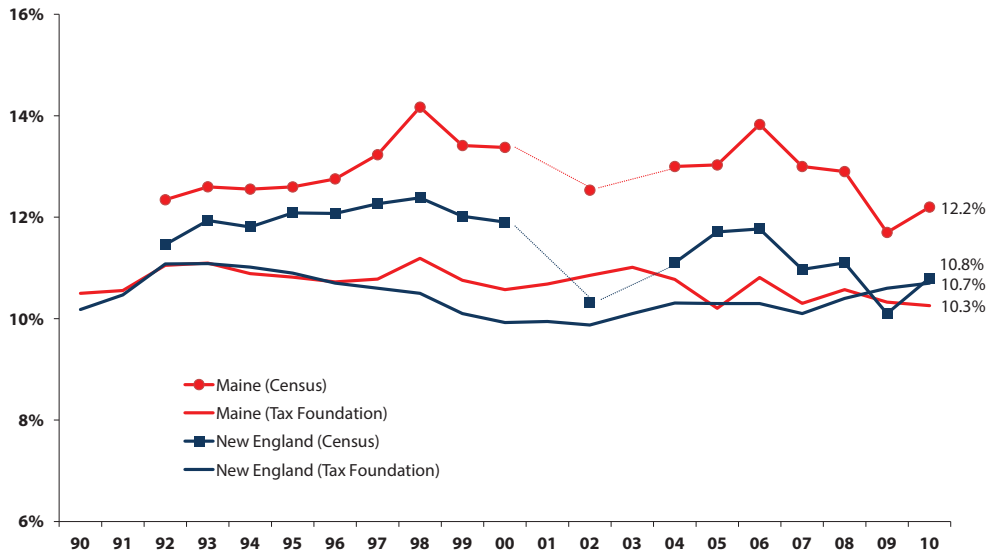
**Related indicators:** [Gross Domestic Product](#), [Productivity](#), [Cost of Doing Business](#)

## 15. State and Local Tax Burden

**Benchmark:** Maine's tax burden will decline and move to the New England average each year through 2015.



### State and Local Taxes as a Percent of Income 1990 - 2010



Source: U.S. Census Bureau and Tax Foundation

### Maine's State and Local Tax Burden Increases Slightly According to U.S. Census and Tax Foundation

Tax burden measures the amount of state and local taxes a taxpayer pays for every \$100 of income, reported as a percent. According to U.S. Census data, Maine's total state and local tax burden increased from 11.8% in 2009 to 12.2% in 2010. New England's tax burden increased from 10.1% to 10.8%. According to the Tax Foundation's methodology\*, Maine's burden of 10.3% remained below the New England average of 10.7%.

Taxes and the tax structure are a cost factor for businesses and impact the amount of income that residents have to spend in the larger economy. They also generate revenue to invest in services, such as education and transportation, which are valued by businesses and residents alike. A tax rate and structure that provide stable revenues and enable Maine to both compete economically and finance needed services is critical.

In 2010, Maine's state and local tax burden according to Census data again ranked 6<sup>th</sup> and according to Tax Foundation data again ranked 9<sup>th</sup>. The tax burden can be lowered by reducing spending, increasing incomes, or a combination of the two.

Based on 2010 Census data, Maine's per capita state and local taxes were \$4,398, ranking 14<sup>th</sup> nationally. The Tax Foundation's estimate of \$3,807 ranked Maine 18<sup>th</sup>. According to both sources, Maine's per capita taxes and ranking were below every New England state except New Hampshire.

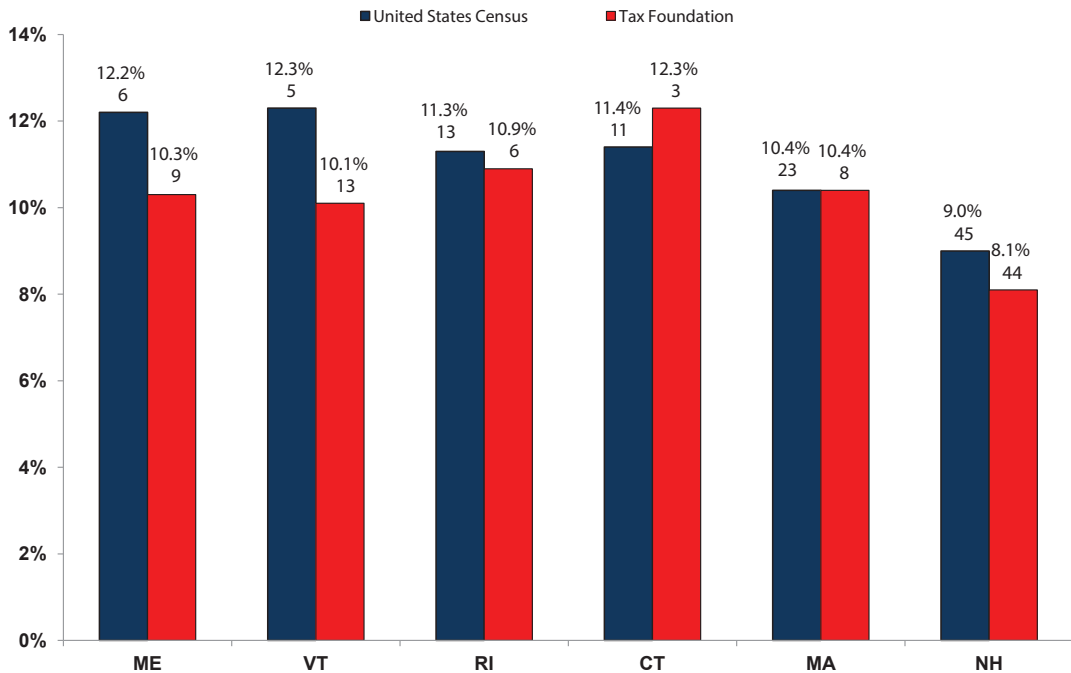
Government spending is another important factor in the tax burden equation. The ability of the government to provide services is complicated by the fact that the cost of health care, energy, and education (see these indicators in this report) continue to rise faster than incomes and, in turn, tax revenue. Efforts to streamline service delivery are one strategy to address a growing structural budget gap. Maine's performance on this indicator has been aided by policymakers not raising taxes to address recent budget shortfalls. Continued efforts to improve the educational attainment and productivity of Maine people can boost incomes and positively affect this benchmark.

\*Census estimates are calculated by dividing total in-state taxes by total in-state income. The Tax Foundation makes adjustments to those numbers to account for a state's effort to "export" taxes. For Maine, the majority of exportation happens with out-of-state homeowners who pay in-state property taxes for second homes.

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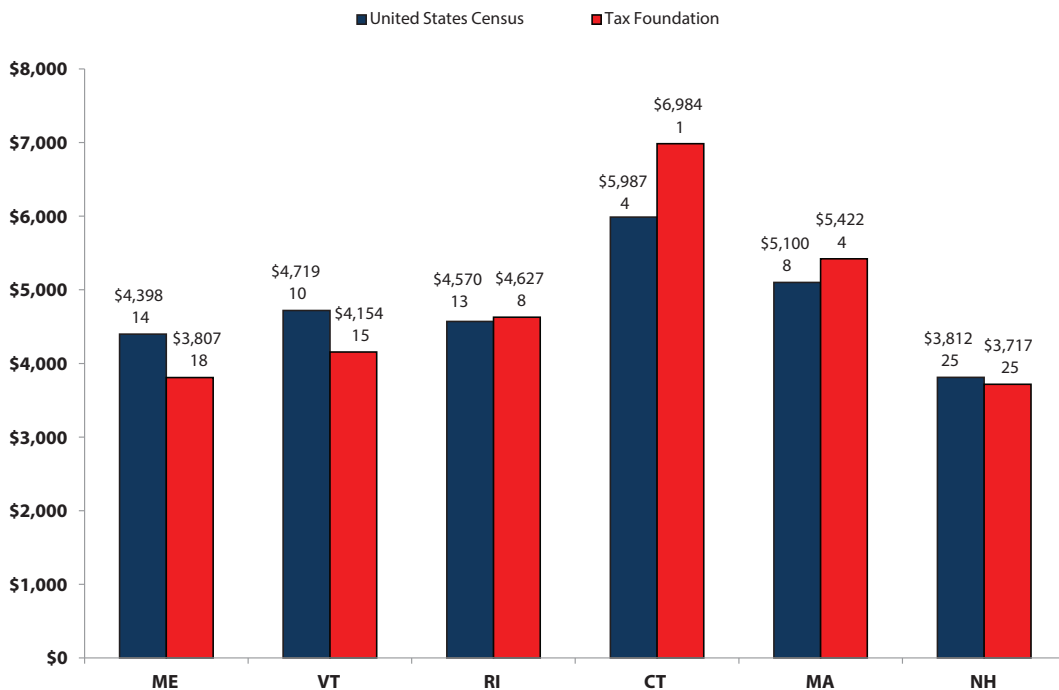
## 15. State and Local Tax Burden (Continued)

### State & Local Tax Burden and National Ranking 2010



Source: U.S. Census Bureau and Tax Foundation

### Per Capita State & Local Taxes and National Ranking 2010



Source: U.S. Census Bureau and Tax Foundation

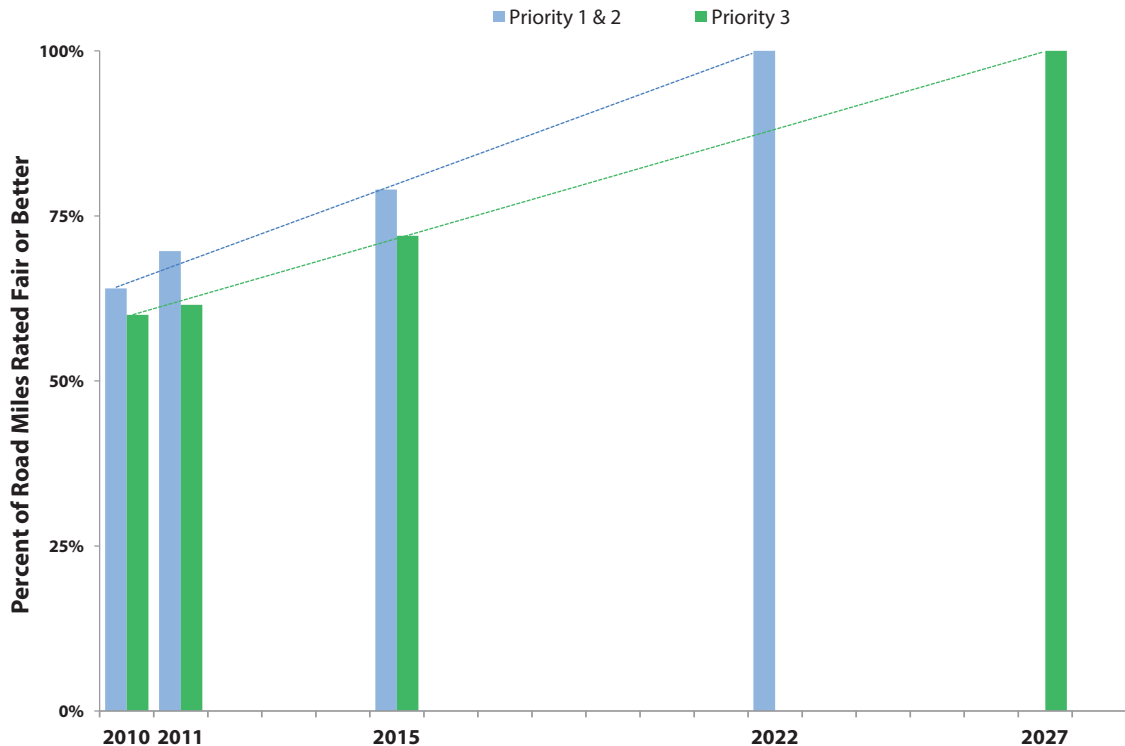
**Related indicators:** Per Capita Personal Income, Productivity, Higher Degree Attainment, Fourth Grade Reading Scores, Eighth Grade Math Scores, Cost of Doing Business

## 16. Transportation Infrastructure

**Benchmark:** 81% of Priority 1 & 2 roads and 70% of Priority 3 roads will meet a rating of fair or better by 2015.



### Maine Priority Road Performance 2010 - 2027



Source: Maine Department of Transportation

### Maine Ahead of Highway Improvement Goals but Substantial Investment Still Needed

Last year, the Economic Growth Council transitioned to a new data base and methodology for monitoring highway investment performance. This approach complements the State's new method for measuring performance based on Highway Corridor Priorities and Customer Service Levels (see 23 MRSA Section 73, subsection 7). Priorities range from 1 to 6 to reflect federal functional classification, regional economic significance, heavy haul truck use, and relative regional traffic volumes. Customer Service Levels reflect road and bridge safety, condition and service factors with ratings of excellent, good, fair, poor or unacceptable. For more data and information on this methodology go to: [www.maine.gov/mdot/about/assets/hwy/](http://www.maine.gov/mdot/about/assets/hwy/)

After the first year of generating performance data, MaineDOT observed an unintended volatility in the data measuring safety that resulted in the 2010 baseline numbers being changed slightly for this year's report.

The Council is focusing on priority 1, 2, and 3 roads because these roads represent only 19% of all public ways but carry 70% of all traffic. These are the roads that support the Maine economy by moving the overall dominant share of passenger and freight transport. The accompanying chart combines priority 1 and 2 roads in the blue bar showing that 1,638 miles (70%) scored fair or better for safety, condition, and service in 2011. This is an improvement of 129 miles from 2010 and surpasses the trend line, meaning that 222 additional miles must be improved to meet the benchmark of 81% of priority 1 and 2 roads rated fair or better for safety, condition, and service by 2015. In 2011, 62% of priority 3 roads scored fair or better, 17 miles below the desired trend line; 203 priority 3 miles must be upgraded to reach the benchmark of 70% by 2015.

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## 16. Transportation Infrastructure (Continued)

Current capital funding must rise by approximately \$150 million per year to meet State goals for the State highway and bridge network. This shortfall occurs primarily within priority 1, 2, and 3 roads. The goal for priority 4 roads is limited to providing a ride quality of fair or better. The goal for priority 5 roads is met if the State continues to fund 600 miles of maintenance paving per year. Priority 1, 2, and 3 roads need more intensive pavement treatments, an increase in highway reconstruction of two to three times current levels, and a continuation of current efforts to reduce the relatively large inventory of bridges needing repair or replacement.

Rising improvement costs, the repeal of motor fuel tax indexing, and rising vehicle fuel efficiency (which translates into lower revenues from gasoline taxes) impede Maine's ability to make the investments needed to support our economy. Maine will have to reconcile these shortcomings and decide whether to meet the State's highway investment goals through user fees, general fund revenues, or both.

Late in 2012, the Maine Section of the American Society of Civil Engineers issued a Report Card on Maine's Infrastructure that updated their 2008 report card. The update revealed an unchanged grade of D for roads, C for railroads and C- for passenger transportation. Bridges showed some improvement, rising from D+ in 2008 to C- in 2012. Airports moved from a B- to a B and Ports and Waterways moved from C- to a C. Investment in these other modes of transportation, as well as in bike paths, sidewalks, and transit, can help balance the burden on Maine's road network.

| Actual Road Miles and Targets, 2010 - 2027 |      |      |      |      |      |
|--|------|------|------|------|------|
|  | 2010 | 2011 | 2015 | 2022 | 2027 |
| Priority 1 and 2                           | 1509 | 1638 | 1860 | 2351 | N/A  |
| Priority 3                                 | 1184 | 1213 | 1416 | N/A  | 1972 |

Source: Maine Department of Transportation

**Related indicators:** Gross Domestic Product, High Speed Internet Subscribers, Productivity, Cost of Doing Business, Cost of Energy, State and Local Tax Burden

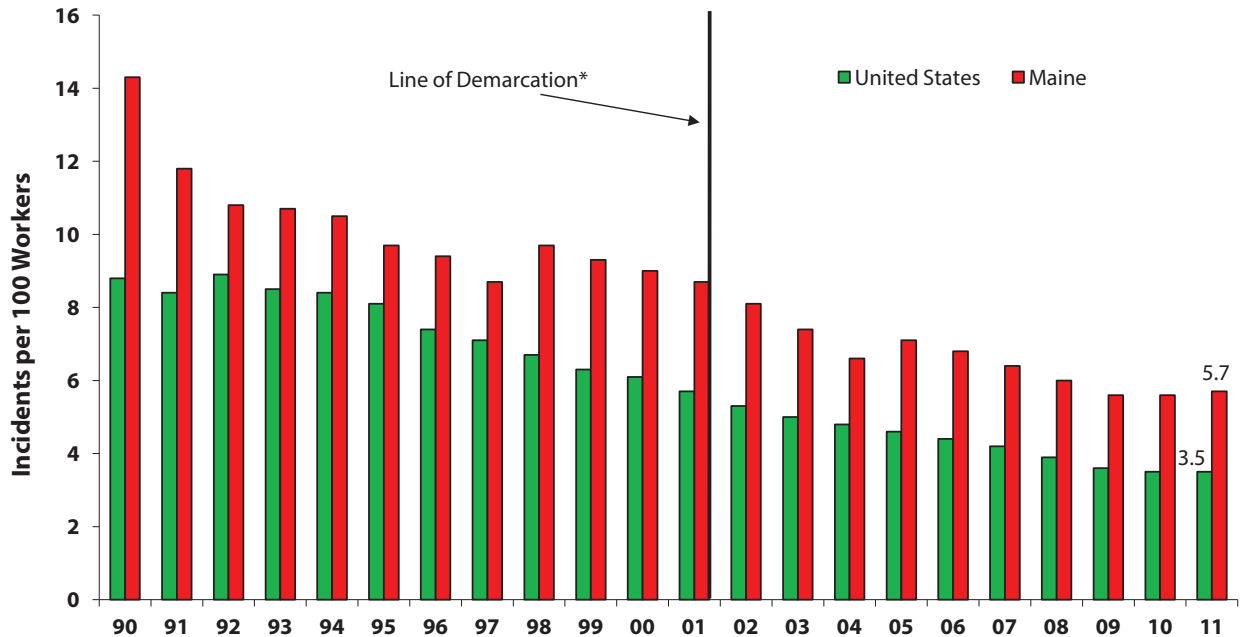


## 17. On-the-Job Injuries and Illnesses (Reported)

**Benchmark:** Maine's reported on-the-job injury and illness rate will get closer to the U.S. rate each year through 2015.



### On-the-Job Injuries and Illnesses (Reported) 1990 - 2011



\*BLS revised recordkeeping requirements for incidence rates in 2002; details are available at <http://www.osha.gov/recordkeeping/ppt1/ppt1script.html>

Source: U.S. Department of Labor, Bureau of Labor Statistics

### Maine Rate\* and U.S. Rate Unchanged

The Maine and U.S. numbers of reported on-the-job injuries and illnesses\*\* per 100 full-time industrial workers were both essentially unchanged from 2010 to 2011. The gap between Maine and U.S. rates has declined from 5.5 per 100 workers in 1990 to 2.2 in 2011.

Maine's historic higher-than-average rate of on-the-job injuries and illnesses is due in part to the relatively hazardous working environments found in many manufacturing industries. The decline of manufacturing sectors over time has contributed to the lowered rate. The institution of workplace safety programs throughout Maine has also helped to reduce injury and illness rates.

Workplace safety is an important component of Maine's current economy and of long-term economic growth. On-the-job injuries and illnesses negatively affect the vitality of the workplace and the larger community. They limit an individual's ability to contribute to the state's economy and a business' ability to compete. Reducing the incidence of on-the-job injuries and illnesses lowers health costs, increases productivity, and ultimately increases economic growth. The table shows that Maine's median days away from work per incident in the private sector have been lower than the U.S. average since 2003.

### Median Days Away From Work Private Sector Only

| Year | Maine | U.S. |
|------|-------|------|
| 2003 | 6     | 8    |
| 2004 | 6     | 7    |
| 2005 | 5     | 7    |
| 2006 | 6     | 7    |
| 2007 | 5     | 7    |
| 2008 | 6     | 8    |
| 2009 | 5     | 8    |
| 2010 | 5     | 8    |
| 2011 | 5     | 8    |

Source: Survey of Occupational Injuries and Illnesses

**Related indicators:** Gross Domestic Product, Employment, Productivity, Cost of Doing Business, Cost of Health Care, Wellness and Prevention

\*OSHA recordable incident rate for the State of Maine for public and private sector establishments.

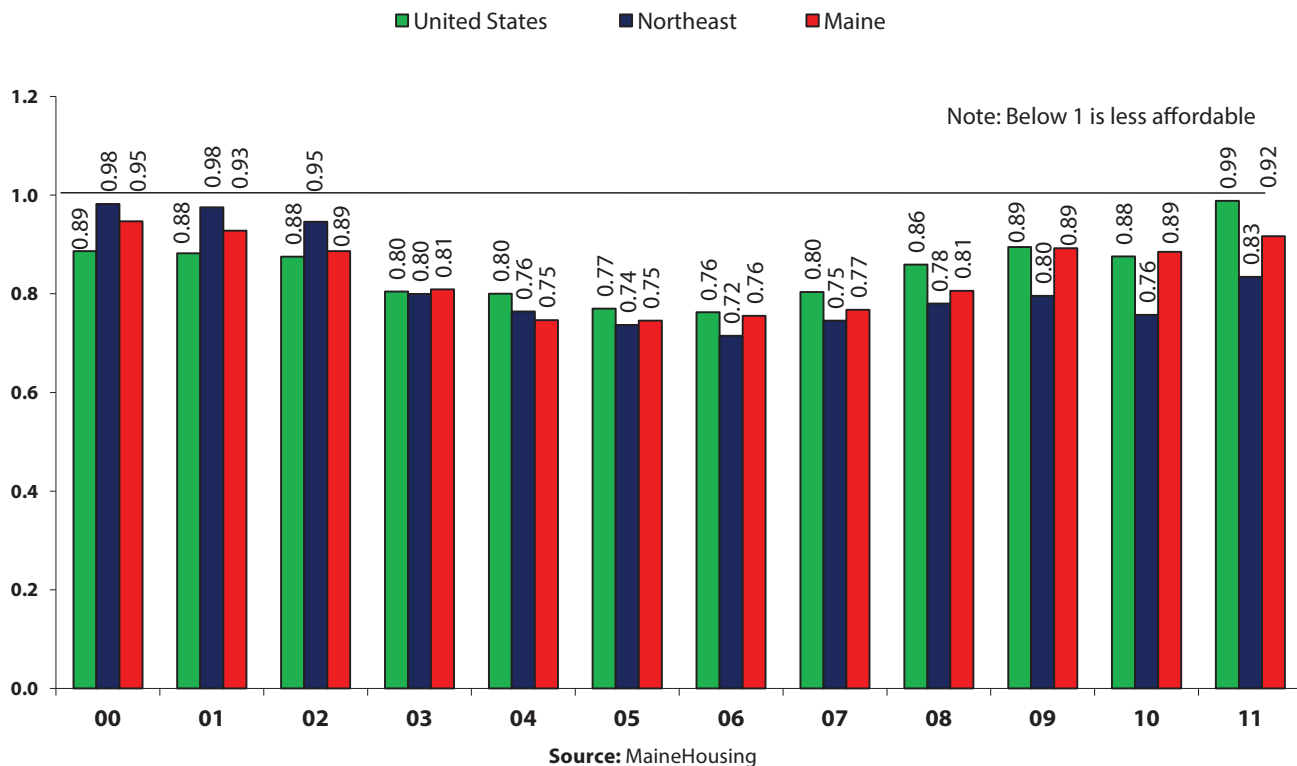
\*\*The data used for this indicator includes all types of work-related injuries and illnesses required to be recorded by the Occupational Safety and Health Administration (OSHA), which defines an injury or an illness as an abnormal condition or disorder. These include, but are not limited to, cuts, fractures, sprains, or amputations. Illnesses include both acute and chronic illnesses, including, but not limited to, skin disease, respiratory disorder, or poisoning. While on-the-job injuries and illnesses may still go unreported, many Maine employers have taken steps emphasizing safety and the reporting of injuries.



## 18. Affordable Housing

**Benchmark:** The housing affordability index in Maine will reach 1 by 2015.

### Maine's Housing Affordability Index by Year (weighted owner/renter) 2000 - 2011



### Housing Affordability Improves in Maine but Geographic Differences Remain

The index used here is the weighted average of MaineHousing's homeownership affordability index\* and rental affordability index\*\*, with the weighting based on the relative numbers of homeowner and rental households. In the graph above, a higher index means that housing is more affordable, and a lower index means that housing is less affordable.

After declining in the mid-2000s, housing has become more affordable in Maine in recent years and improved from 0.89 in 2010 to 0.92 in 2011. The U.S. index improved from 0.88 to 0.99 and the Northeast improved from 0.76 to 0.83. Housing was more affordable in the U.S. as a whole in 2011 than 2000 and less affordable in the Northeast region.

The affordability of housing has a number of significant societal impacts. High housing costs require people to devote more of their incomes to rent or mortgage payments, leaving less money for other goods and services. High costs of housing can affect employment and job quality as people are less able to relocate for work.

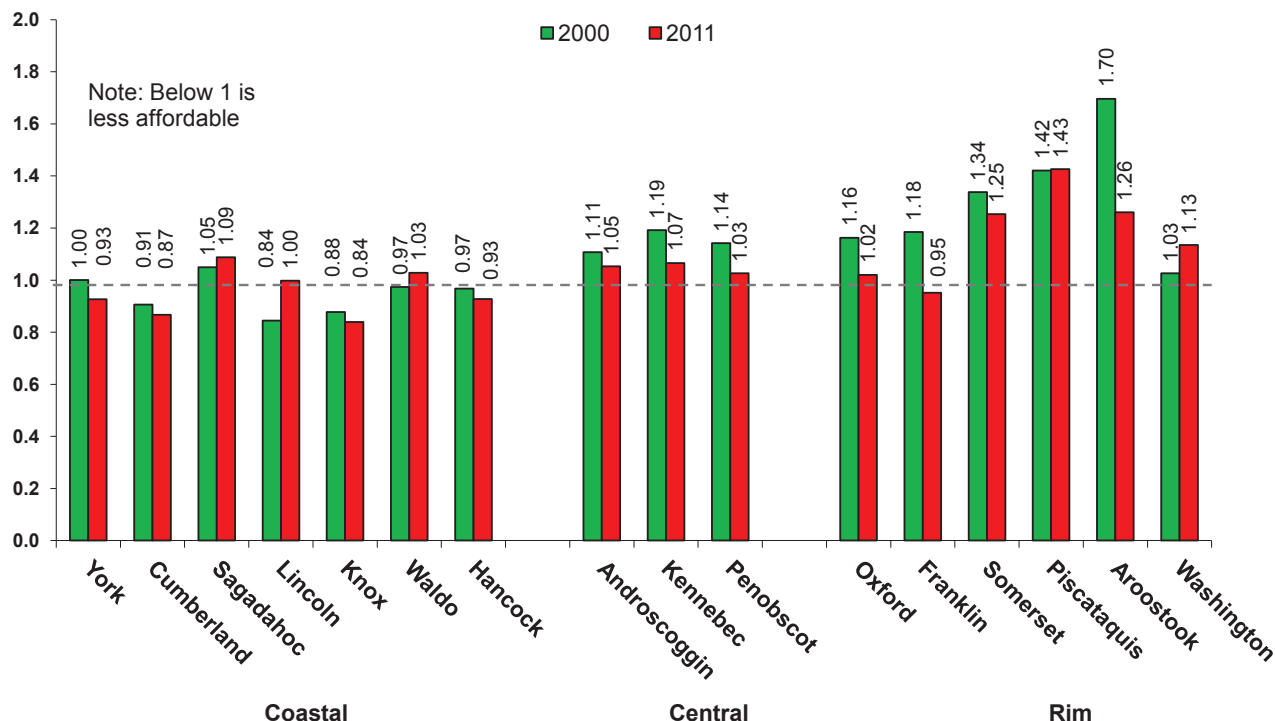
\*The homeownership affordability index is the ratio of the home price that a Maine household at median income can afford to the actual median home price. A home price is considered to be affordable if no more than 28% of monthly gross income is needed to cover payment on a 30-year mortgage with a 5% down payment (including taxes, homeowners insurance, and private mortgage insurance).

\*\*The rental affordability index is the ratio of the rent that a Maine renter household with median renter household income can afford to the actual average rent for a two-bedroom apartment, including utilities. A rental is considered to be affordable if no more than 30% of gross monthly income is needed to cover the rent. In this index, median rental household income is used rather than median household income generally, because typically the median income of renter households is 25 to 35% less than households overall.

*(continued on next page)*

## 18. Affordable Housing (Continued)

### Maine's Housing Affordability Index by County (weighted average) 2000 vs. 2011



Housing affordability also affects the development patterns noted in the Population of Service Center Communities indicator. In many of Maine's employment centers, high housing costs make it difficult for people to afford to live in the same communities in which they work. The resulting long commutes and sprawling development impose additional costs on the individual and society, including maintenance of transportation infrastructure, energy costs, and community infrastructure like schools.

The most recent recession has affected both housing prices and incomes. With both home values and incomes falling, Maine's delinquent mortgage rates climbed during this period, although they remained below national levels.

The county graph, which compares homeowner/renter affordability for each of Maine's counties in 2000 and 2011, provides additional insights into the affordability of housing in Maine. Eleven Maine counties were considered affordable (an index above 1) in 2011 while only four were in 2010. Five Maine counties (Sagadahoc, Lincoln, Waldo, Piscataquis, and Washington) were more affordable in 2011 than in 2010, while none were in 2010. In general, in both 2000 and 2011, housing was more affordable in the central and rim counties and less affordable in the coastal counties. Policymakers also need to consider the differences in affordability within counties as well as between counties.

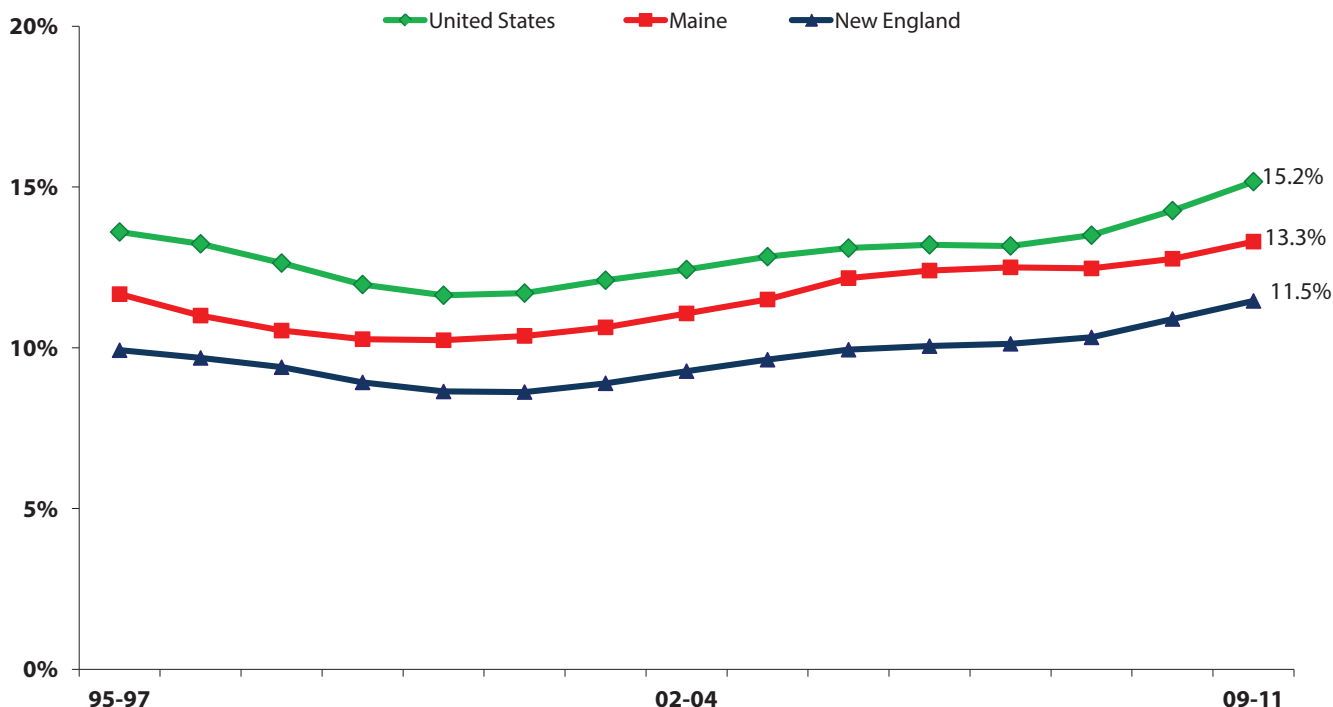
**Related indicators:** Per Capita Personal Income, Employment, Transportation Infrastructure, Population of Service Center Communities



## 19. Poverty

**Benchmark:** Maine's poverty rate will decline and remain below the U.S. through 2015.

### Poverty Rates 1997 - 2011 3-Year Moving Average



Source: U.S. Census Bureau Small Area Income & Poverty Estimates

### Maine Poverty Rate Increases to 13.3% Overall, 24.2% for Children Under 5, and 19.3% for Children Under 18

Maine's three-year moving average poverty rate increased from 12.8% in 2010 to 13.3% in 2011. Maine's poverty rate has been below the national rate and above the New England rate since 1995. In light of the most recent recession, the issue of poverty in Maine will remain a concern for the foreseeable future.

It is widely believed that the traditional 100% poverty rate underestimates the total number of people having trouble making ends meet. The U.S. Department of Health and Human Services' 2011 poverty guidelines for a single person in the contiguous U.S. was \$10,890. Policymakers and program administrators frequently use 200% of poverty (double the income level) to measure the number of people in need and to determine eligibility for aid. According to the American Community Survey's 2011 one-year estimates, more than one out of every three people in Maine (34.6%) and the nation (35.2%) lived below 200% of the federal poverty level. In Maine, this translated into 446,713 individuals.

Poverty rates vary widely within Maine. They are higher in the rural counties in the west, north, and east and lower in Maine's southern and service center counties. Washington County had the highest rate at 21.7% and York the lowest at 10.2%. Overall, poverty rates increased in eleven Maine counties from 2010 to 2011 – in three of the seven coastal counties, all three central counties, and five out of six rim counties.

From 2000 to 2011, the poverty rate for Maine children under 5 grew from 17.5% to 24.2% and the rate for children under 18 grew from 12.9% to 19.3%. U.S. rates have also grown steadily and exceed the Maine averages, but the growing poverty rate for Maine children is a concern. According to the Annie E. Casey Foundation's KIDS COUNT Data Center, 43%

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## 19. Poverty (Continued)

| Poverty Rate Children Under Age 18 |       |       |
|------------------------------------|-------|-------|
|                                    | Maine | U.S.  |
| 2000                               | 12.9% | 16.2% |
| 2001                               | 12.8% | 16.3% |
| 2002                               | 14.2% | 16.7% |
| 2003                               | 14.3% | 17.6% |
| 2004                               | 14.3% | 17.8% |
| 2005                               | 16.7% | 18.5% |
| 2006                               | 16.9% | 18.3% |
| 2007                               | 15.7% | 18.0% |
| 2008                               | 16.5% | 18.2% |
| 2009                               | 17.5% | 20.0% |
| 2010                               | 18.2% | 21.6% |
| 2011                               | 19.3% | 22.5% |

| Poverty Rate Children Under Age 5 |       |       |
|-----------------------------------|-------|-------|
|                                   | Maine | U.S.  |
| 2000                              | 17.5% | 18.7% |
| 2001                              | 16.2% | 18.6% |
| 2002                              | 18.2% | 19.0% |
| 2003                              | 18.8% | 20.3% |
| 2004                              | 18.4% | 20.5% |
| 2005                              | 20.0% | 21.3% |
| 2006                              | 21.4% | 21.0% |
| 2007                              | 19.4% | 20.8% |
| 2008                              | 21.8% | 21.2% |
| 2009                              | 21.4% | 23.2% |
| 2010                              | 23.5% | 25.0% |
| 2011                              | 24.2% | 25.8% |

| 2011 Poverty Rate by Maine County |              |
|-----------------------------------|--------------|
| County                            | Poverty Rate |
| <b>Coastal Counties</b>           |              |
| York                              | 10.2%        |
| Cumberland                        | 12.1%        |
| Sagadahoc                         | 11.7%        |
| Lincoln                           | 12.1%        |
| Knox                              | 13.0%        |
| Waldo                             | 16.0%        |
| Hancock                           | 13.8%        |
| <b>Central Counties</b>           |              |
| Androscoggin                      | 16.1%        |
| Kennebec                          | 12.8%        |
| Penobscot                         | 17.2%        |
| <b>Rim Counties</b>               |              |
| Oxford                            | 16.5%        |
| Franklin                          | 17.4%        |
| Somerset                          | 18.6%        |
| Piscataquis                       | 19.5%        |
| Aroostook                         | 18.3%        |
| Washington                        | 21.7%        |

Source: U.S. Census Bureau Small Area Income & Poverty Estimates

of Maine's children under the age of 18, or 113,000 children, were below 200% of the poverty level in 2011. As discussed in the Fourth Grade Reading Scores indicator, ensuring that children have a positive environment in early childhood is critical to their future success and Maine's economy.

Improving educational attainment is again critical to moving this indicator. Increased education creates more opportunities and increases earning potential which can lift people out of poverty. The Growth Council feels that investments in lifelong learning beginning at birth are critical to the Maine economy.

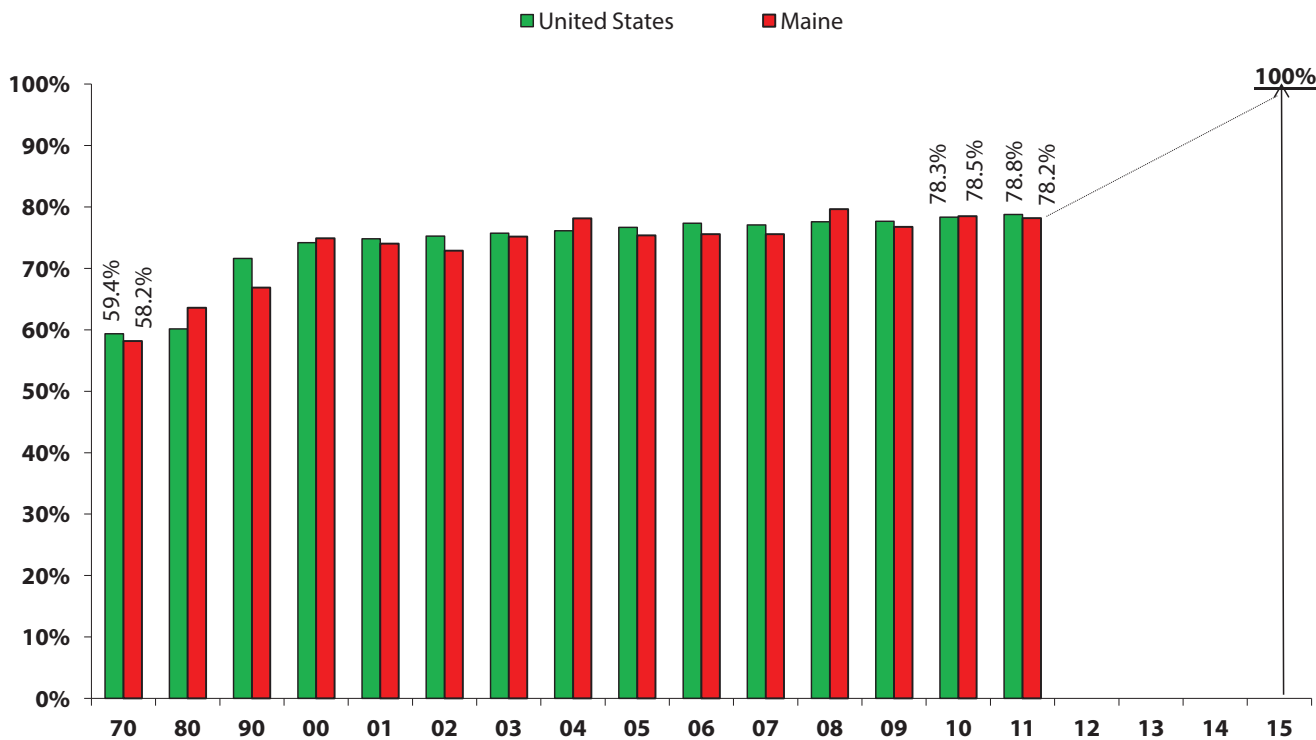
**Related indicators:** Per Capita Personal Income, Employment, Higher Degree Attainment, Fourth Grade Reading Scores, Eighth Grade Math Scores, Cost of Health Care, Cost of Energy, State and Local Tax Burden



## 20. Gender Income Disparity

**Benchmark:** The median annual income of women working full-time will improve to 100 percent of the median annual income of men working full-time by 2015.

### Women's Income as a Percent of Men's for Full-Time, Full-Year Work 1970 - 2011



Source: U.S. Census Bureau, American Community Survey

### Women Continue to Earn Less Than Men in Maine and Across the U.S.

In 2011, women working full-time, full-year in Maine earned 78.2% or \$0.78 for each dollar earned by men. The median earnings for women were \$34,606 compared to \$44,260 for men. Earnings for women increased by \$647 (from \$33,959 to \$34,606) from 2010 to 2011 and earnings for men increased by \$1,003 (from \$43,257 to \$44,260). Nationally, women earned 78.8% of men's earnings, or \$0.79 for every dollar earned by men. Women's earnings increased by \$587 (from \$36,612 to \$37,199) and men's earnings increased by \$493 (from \$46,740 to \$47,233) from 2010 to 2011.

Gender income disparity (the wage gap between women's earnings and men's earnings) has changed little in Maine over the past decade and the rate of change in the earnings gap has slowed over the previous two decades. Women's earnings were 66.9% of men's earnings in 1990 and increased to 74.9% in 2000 but have not grown as quickly since then.

While there are variations in the wage gap across age, race, education level, and occupation the overall pattern of women earning less than men has been and continues to persist throughout the labor market. Occupational segregation and wage discrimination are the primary reasons and result in significant life-time disparities in income for women and their families and limit women's contributions to our economy. According to an August 2012 report by the Center for American Progress, nationally, the average woman can be expected to lose an estimated \$431,000 due to the gender wage gap over a 40 year career.

Women with at least four years of college education face less wage disparity. However, a 2012 study by the American Association of University Women found that nationwide, women one year out of college who were working full-time earned less than their male counterparts. Some higher-earning occupations have lower wage gaps than the average and may be desirable options for women.

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## 20. Gender Income Disparity (Continued)

| Maine Industries with Highest Percent Female Employees |                           |                     |                       |                                |
|--|---------------------------|---------------------|-----------------------|--------------------------------|
| Industry   | Percent Women in Industry | Median Wage for Men | Median Wage for Women | Women's Earnings as % of Men's |
| Health Care and Social Assistance                      | 80%                       | \$41,078            | \$28,184              | 68.6%                          |
| Educational Services                                   | 68%                       | \$37,920            | \$30,139              | 79.5%                          |
| Finance and Insurance                                  | 65%                       | \$58,854            | \$37,460              | 63.6%                          |
| Accommodation and Food Services                        | 59%                       | \$15,669            | \$11,704              | 74.7%                          |
| Other Services, Except Public Administration           | 54%                       | \$29,631            | \$16,400              | 55.3%                          |
| Management of Companies and Enterprises                | 51%                       | \$66,198            | \$43,947              | 66.4%                          |
| Real Estate and Rental and Leasing                     | 51%                       | \$35,829            | \$25,826              | 72.1%                          |
| Professional, Scientific, and Technical Services       | 50%                       | \$61,017            | \$33,341              | 54.6%                          |
| Retail Trade   | 49%                       | \$27,402            | \$16,623              | 60.7%                          |
| Information  | 47%                       | \$41,639            | \$28,965              | 69.6%                          |

| Maine Industries with Highest Median Female Wages |                           |                     |                       |                                |
|---|---------------------------|---------------------|-----------------------|--------------------------------|
| Industry  | Percent Women in Industry | Median Wage for Men | Median Wage for Women | Women's Earnings as % of Men's |
| Utilities   | 18%                       | \$53,569            | \$45,772              | 85.4%                          |
| Management of Companies and Enterprises           | 51%                       | \$66,198            | \$43,947              | 66.4%                          |
| Finance and Insurance                             | 65%                       | \$58,854            | \$37,460              | 63.6%                          |
| Public Administration                             | 42%                       | \$47,737            | \$36,247              | 75.9%                          |
| Mining, Quarrying, and Oil and Gas Extraction     | 7%                        | \$44,271            | \$35,125              | 79.3%                          |
| Professional, Scientific, and Technical Services  | 50%                       | \$61,017            | \$33,341              | 54.6%                          |
| Transportation and Warehousing                    | 25%                       | \$40,410            | \$31,337              | 77.5%                          |
| Educational Services                              | 68%                       | \$37,920            | \$30,139              | 79.5%                          |
| Wholesale Trade                                   | 25%                       | \$42,614            | \$29,210              | 68.5%                          |
| Health Care and Social Assistance                 | 80%                       | \$41,078            | \$28,184              | 68.6%                          |

An April 2011 study by the Institute for Women's Policy Research found that of 111 different occupations with sufficient data to calculate the wage gap only four showed women out-earning men. The table shows that women's earnings are well below those of men in many of the industries with the highest percentages of female employees.

The earnings gap impacts women's choices on where to live and the opportunities they can offer their children. Women are also more likely than men to be single heads of households, affecting poverty among children. The pay gap also contributes to a higher poverty rate among elderly women, who generally live longer than men. Reducing gender disparities can help Maine's economy and people in a number of ways.

Reducing the wage gap will require a multi-faceted approach aimed at reducing occupational segregation, broadening career choices for women, enforcing equal employment laws, and promoting practices that eliminate harassment and discrimination in the workplace.

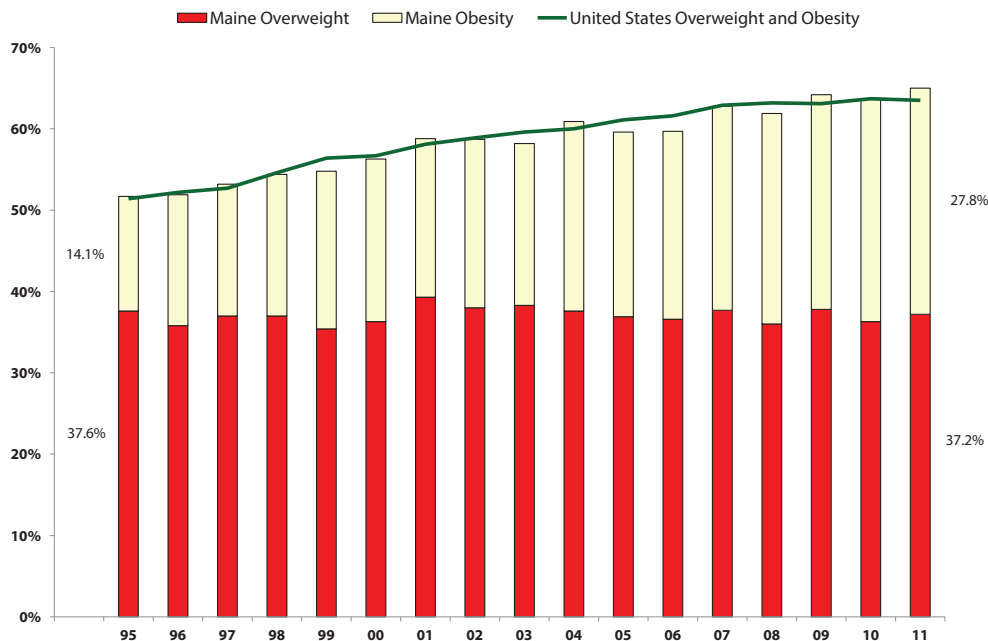
**Related indicators:** Per Capita Personal Income, Gross Domestic Product, Employment, Productivity, Higher Degree Attainment, Poverty



## 21. Wellness and Prevention

**Benchmark:** The percent of overweight and obese adults in Maine will decrease to 50% by 2015.

### Percent of Overweight and Obese Adults 1995 - 2011



Source: Center for Disease Control, Behavioral Risk Factor Surveillance System

### Weight Puts Over Two-Thirds of Maine Adults at Risk

Maine's adult overweight (Body Mass Index of 25.0 to 29.9) and obesity rate (Body Mass Index  $\geq 30$ ) was just over half (51.7%) of the population in 1995 and over two-thirds (65.0%) in 2011. Maine's increase has exceeded the national average. Maine's overweight rate has remained fairly stable (37.6% in 1992 and 37.2% in 2011). The increase in the combined overweight and obesity rates is due entirely to the percentage of obese adults essentially doubling from 1995 to 2011 (from 14.1% to 27.8%).

Being overweight or obese is the third leading cause of preventable deaths in both Maine and the United States. Overweight and obesity are risk factors for chronic diseases such as diabetes, heart disease, stroke, high cholesterol, asthma, arthritis, and some cancers. The increase in the obesity rate is critical because risk increases with weight.

Maine's high overweight and obesity rates have significant economic costs. Overweight and obesity in Maine have been found to drive \$767 million annually in medical expenses and result in annual productivity losses of \$2 billion. A reduction in Maine's overweight and obesity rates is needed to control health care costs and improve productivity.

Reducing the rate of obesity and associated chronic diseases is critical to Maine's citizens and economy. Recent years have also seen increased obesity and overweight rates among Maine high school students. The Council has set an aggressive goal. Appropriate policies and public education that encourage healthier behaviors and improve access to healthier choices are needed to improve Maine's overweight and obesity rates and reduce the prevalence of chronic diseases.

A number of valuable efforts are being made statewide, including Healthy Maine Partnerships and Maine Downtown Center's Green Downtowns and Healthy Main Streets programs. Programs for children include Let's Go! 5-2-1-0, Farms to Schools and Maine-ly Nutrition. Employers are increasingly utilizing wellness plans and insurance programs that encourage healthy behaviors and are aided by efforts like the Wellness Councils of Maine. Fully engaging all of the relevant sectors is critical to reversing Maine's upward trend.

**Related indicators:** Productivity, Cost of Doing Business, Cost of Health Care, On-the-Job Injuries and Illnesses, Health Insurance Coverage

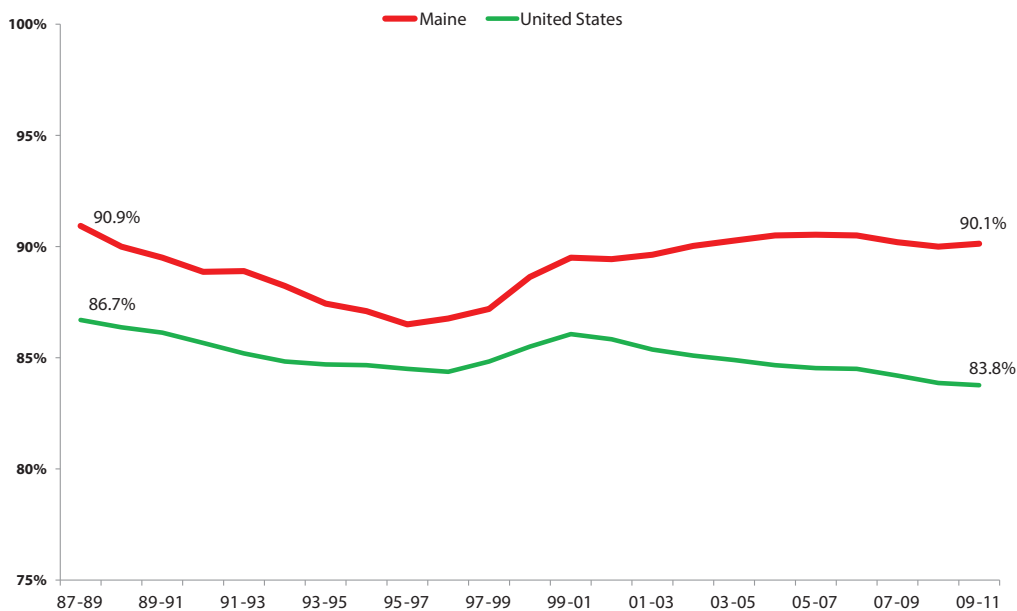


## 22. Health Insurance Coverage

**Benchmark:** The percentage of Maine's population with health insurance coverage will continually rise and remain above the U.S. rate.



### Percent of Population with Health Insurance Coverage 3-Year Moving Average 1989 - 2011



Source: U.S. Census Bureau

### Greater Share of Mainers Have Health Insurance Than in the Nation

Maine remained well ahead of the nation in the proportion of the population covered by insurance in 2011. Both Maine and the nation have remained stable on this measure in recent years. Since 2002-04, Maine's three-year moving average has been approximately 90% and the U.S. average has been in the 85% range.

Maine has done well in making insurance available to a large majority of people. Providing widespread health insurance can lower barriers to getting appropriate preventive screening and timely medical care which can avoid higher medical costs down the road. This, in turn, enables people to live healthier, more productive lives.

According to the Kaiser Foundation, the percentage of Mainers covered by various forms of insurance was unchanged from 2010. The difference between Maine's Medicaid coverage (22%) and the nation's (16%) accounts for Maine's higher insurance coverage rate.

| Health Insurance Coverage<br>Total Populations 2011 |      |       |
|---|------|-------|
|   | U.S. | Maine |
| Employer  | 49%  | 48%   |
| Individual  | 5%   | 4%    |
| Medicaid  | 16%  | 22%   |
| Medicare  | 13%  | 14%   |
| Other Public  | 1%   | 2%    |
| Uninsured   | 16%  | 10%   |

Source: Kaiser State Health Facts

Rising insurance and health care costs have made it increasingly difficult for Maine and national employers to offer affordable health insurance benefits and for individuals to purchase on the open market. Maine expanded MaineCare coverage to low-income people and the Legislature passed wide-sweeping changes to existing insurance laws. With rising health care costs, financing both public and private insurance programs will continue to be a challenge. Passage of the federal Affordable Care Act will have dramatic impacts on insurance coverage in both Maine and the nation in 2014.

Maine currently has the highest median age in the nation. As the population continues to age, an increased share of the state's population will be enrolled in the federal Medicare program. Low-income people 65 and older and some younger individuals with disabilities are eligible for both MaineCare and Medicare. Because MaineCare, not Medicare, pays for most long-term care, MaineCare may see additional cost increases that parallel the aging population.

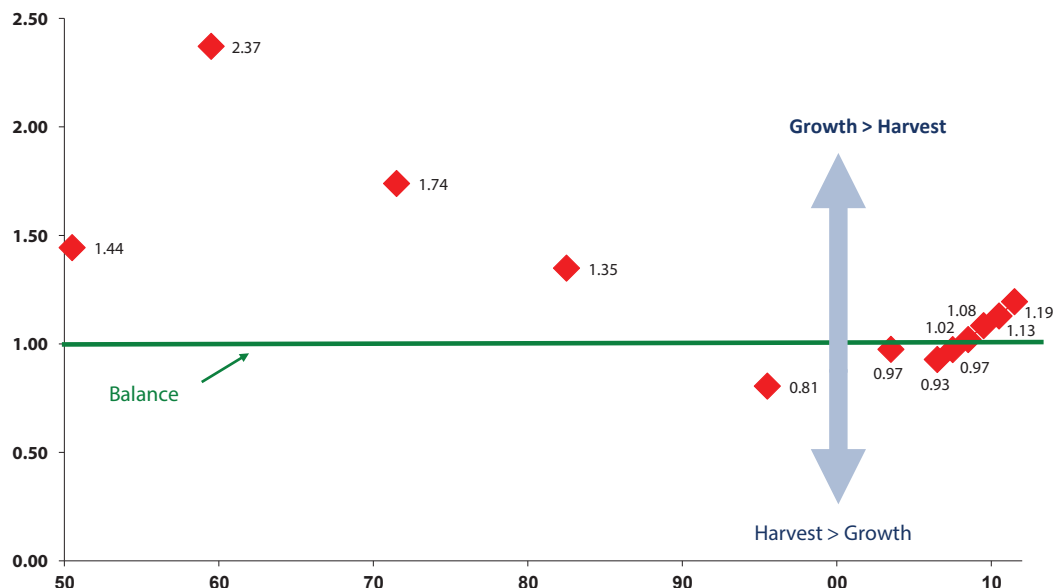
**Related indicators:** Employment, Productivity, Cost of Doing Business, Cost of Health Care, Wellness and Prevention



## 23. Sustainable Forest Lands

**Benchmark:** The balance of net growth to removals will be maintained over time near a 1:1 net growth to removals ratio.

### Historic Trend in the Net Growth to Removals Ratio



Source: Department of Conservation, Maine Forest Service

### Sustainable Management of Maine's Forest Lands Continues

For this indicator, a net growth ratio value greater than one indicates that growth is greater than harvest, while a net growth ratio value less than one indicates that harvest exceeds growth. Minor fluctuations around the ideal ratio of 1:1 are acceptable, provided that wide variations in either direction are avoided and the long-term trend is neutral. The 2011 ratio of net growth to removals is 1.19:1, meaning that the indicator continues to meet the benchmark.

The ratio of net growth to removals peaked in 1959 at an unsustainable ratio of 2.37. Over the next 36 years (1959–1995) multiple impacts, including a maturing forest, the spruce budworm epidemic, and harvesting, brought the ratio on a decline to an undesirable value of 0.81 in 1995. Since then the ratio has had steady improvement, crossing the 1:1 balance point in 2008.

Since 1990, the harvest of forest products (sawtimber, pulpwood, firewood, and biomass) has ranged from 17.2 to 19.7 Million Green Tons. Over this period, the mix and individual contribution of various products has shifted to meet market demands. Despite this historic high level of sustained harvest, the growing stock inventory has increased 13% since 1995, and at a current level of 23.6 Billion Cubic Feet (BCF) is again approaching the apex measured in 1982 of 24.1 BCF.

Sustainable forestry is essential to Maine's economy, identity, and quality of life, particularly with the mounting concern over the future of Maine's forest lands. Maine's forests cover 89% of the state's land area, with 95% of this acreage actively managed by private landowners. Maine's forests support healthy wildlife populations, provide clean water, supply raw materials used to create products ranging from newspaper to alternative fuels, and offer a wide variety of recreational opportunities. Maintaining the long-term balance between growth and removals is a key component in sustaining Maine's forests and their contribution to the state's economy.

Maine's forests play an important role in the quality of Maine's air and water as measured by those indicators in this report. Together, the Environment indicators are important measures of how well the state is supporting our town centers, conserving resources, and supporting our natural resource-based economy.

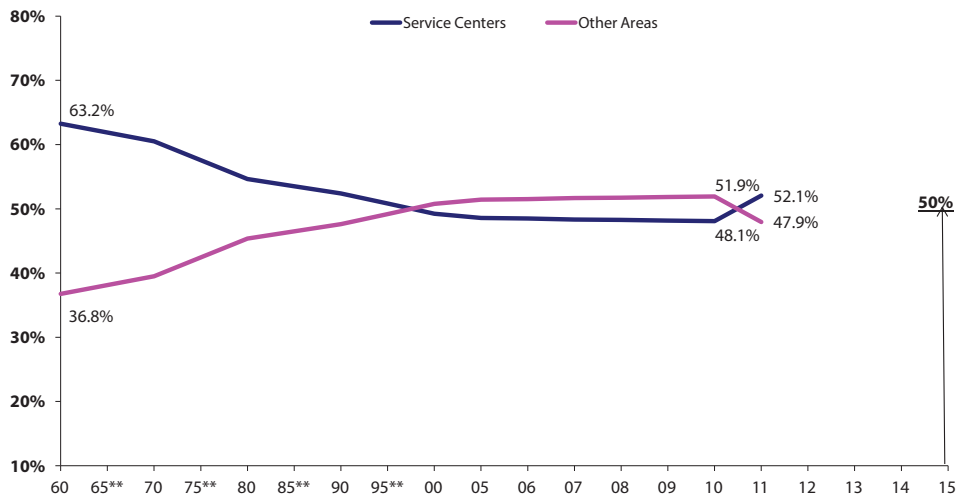
**Related indicators:** Gross Domestic Product, Employment, Population of Service Center Communities, Air Quality, Water Quality

## 24. Population of Service Center Communities

**Benchmark:** The percentage of Maine people who reside in service center municipalities will remain at or above 52% through 2015.



### Percent of Maine's Population Living in Service Centers\* (Compared to Other Municipalities) 1960 - 2011



\*The Municipal Planning Assistance Program and Office of Policy and Management revised the list of service centers in January 2013.

\*\*Estimated

**Source:** Municipal Planning Assistance Program and U.S. Census Bureau population estimates

### Revised Criteria Bring Percentage of Mainers Living in Service Center Communities\* to 52%\*\* Preserving Town Centers a Key to Maine's Economy and Quality of Life

The Maine Department of Agriculture, Conservation, and Forestry's Municipal Planning Assistance Program updated the list of service center communities in January 2013 based on the 2010 U.S. Census. As a result, 16 communities were added to the list and 11 communities were removed from the list. This change resulted in a reversal of the percentage of Maine's population living in service center communities and the percentage living in other areas: 52.1% of Maine's population lived in service centers in 2011 compared to 48.1% in 2010. The Growth Council's new benchmark reflects this change.

The patterns of development in Maine have important ramifications. Redundant and costly infrastructure, including roads, schools, and waste systems may be needed to accommodate population shifts, even as service center communities struggle to fund their underutilized infrastructure. Attempts to remedy this situation, such as regionalization and consolidation of municipal services, have met with varying success.

Vibrant service center communities attract young people, retirees, diverse populations, and creative economic ventures, all of which help to move Maine's economy forward. The majority of Maine jobs, services (hospitals, social services, educational institutions, cultural activities, and government services), and retail sales are located in 80 specifically identified service center communities. Preserving service centers also enables people to access services by active modes of transportation.

Investment in existing town centers helps keep these areas vibrant and brings a high return on investment. For example, from September 2002 to December 2012, Main Street Maine communities saw \$169.7 million of reinvestment in physical improvements from public and private sources; a net gain of 269 businesses; a net gain of 1,020 full-time and 271 part-time jobs; 622 building rehabilitations and improvements; and a total leverage ratio of \$25.43 for every dollar spent.

#### Related indicators: Affordable Housing, Wellness and Prevention, Air Quality, Water Quality

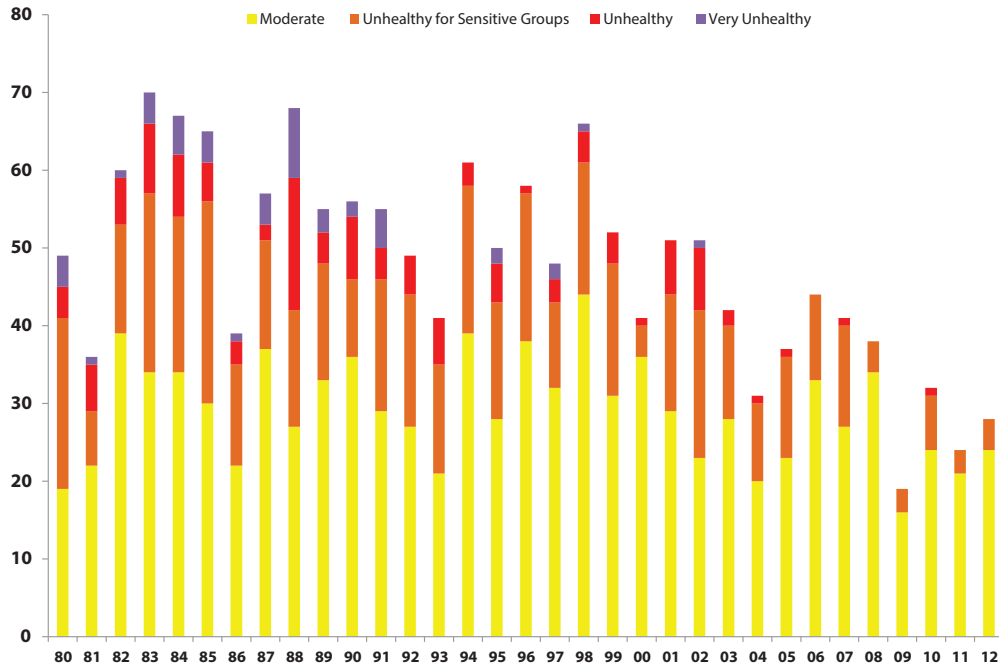
\*Criteria used to determine service center communities: population, housing units, population density, income, retail sales, service sector jobs, employment, subsidized housing, jobs held by non-resident workers, employed civilian labor force, jobs to workers ratio. For more details and a complete list see <http://www.maine.gov/doc/commissioner/landuse/servicecenters/index.shtml>

\*\*The list of service center communities includes some community urban compact areas. The entire population of those communities has been included in this calculation.

## 25. Air Quality

**Benchmark:** Maine's overall number of days that fall into one of the listed categories and the severity of the health categories will continue to decline through 2015.

### Maine Maximum Eight-Hour Ozone Count by Air Quality Index Category



Source: Maine Department of Environmental Protection

### Maine's Air Quality – an Important Asset – Continuing to Improve

This is a new indicator in the report. The air quality indicator is based on ozone levels averaged over an eight-hour period in parts per billion, which are measured by a network of monitors recording concentrations of major pollutants throughout the state. The data is based on the highest value in the state for each day and the number of times that maximum value falls into each air quality index category (good, moderate, unhealthy for sensitive groups, unhealthy, and very unhealthy).

In 1983, 70 days fell into one of the listed categories, and four days fell into the "very unhealthy" category. Maine's air quality has improved since then; in 2012, only 28 days fell into one of the listed categories, and no days fell into the "unhealthy" or "very unhealthy" categories.

A separate comparison is of Maine's statewide maximum eight-hour ozone design value to the national standard. The maximum eight-hour ozone design value measures the fourth highest daily maximum concentration averaged over three years. Maine's values were above 100 for much of the 1980s but have been below the national ambient air quality standard of 75 since 2010.

The quality of Maine's air has important impacts for the health of Maine people and the quality of life in the state. Due to our location, the quality of Maine's air is dependent on actions outside of our state as well as within our state. The changing nature of Maine's economy affects the quality of our air, as do policies at the state and national level. Maine's air is on average cleaner than the rest of the nation and can help to attract people and businesses to the state.

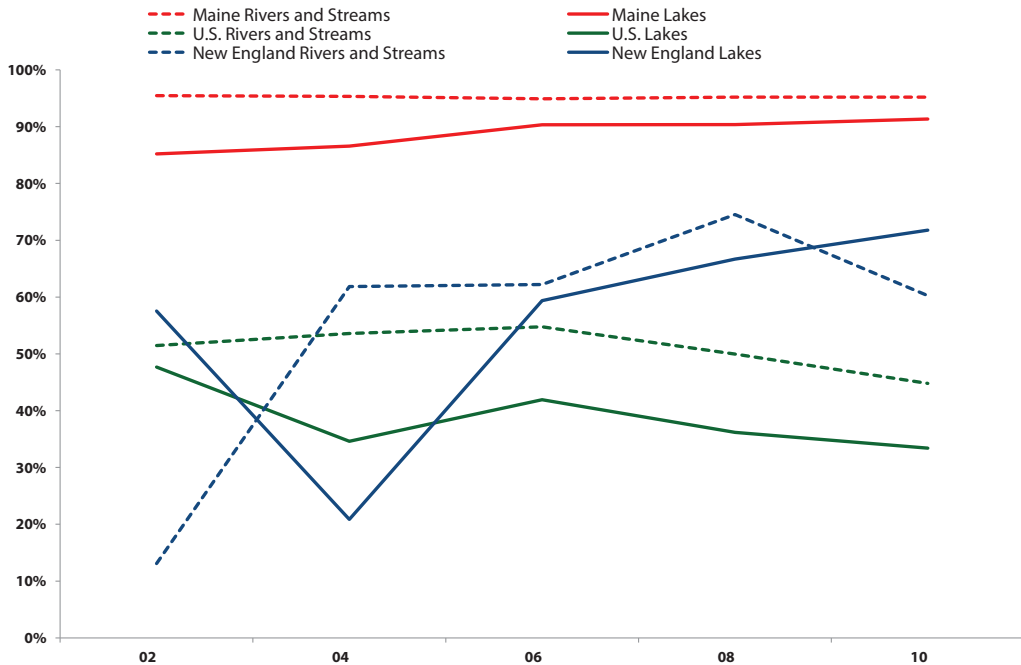
**Related indicators:** Gross Domestic Product, International Exports, Productivity, Cost of Health Care, Wellness and Prevention, Population of Service Center Communities, Sustainable Forest Lands, Water Quality

## 26. Water Quality

**Benchmark:** The percentage of Maine's assessed water bodies classified as categories 1 and 2 will increase each year through 2015.



### Percent of Water Bodies Classified as Category 1 or 2



Source: Maine Department of Environmental Protection, Bureau of Land and Water Quality, and U.S. Environmental Protection Agency

### Maine's Waters Cleaner than U.S. Average

This is a new indicator in the report. The chart compares water quality in Maine and the United States and Environmental Protection Agency (EPA) Region 1 (the New England states) average. The Maine Department of Environmental Protection reports the water quality for Maine's rivers and streams and lakes and ponds to the U.S. EPA every two years. Assessed waters are classified into one of five categories. Categories 1 and 2 are waters for which all or some designated uses and water quality standards are attained. Category 1 and 2 waters are approximately equivalent to the EPA's "Good" classification.

The chart shows that, from 2002 to 2010, approximately 95% of Maine's assessed river and stream miles, and between 85% and 90% of Maine's assessed lake and pond acreage, met the Category 1 or 2 water quality classifications. Over the same time, between 45% and 55% of U.S. rivers and streams, and between 33% and 48% of U.S. lakes, met the "Good" threshold. The percentages meeting the "Good" criteria in New England fluctuated between 13% and 75% for rivers and streams and between 21% and 72% for lakes from 2002 to 2010.

The Growth Council views this indicator and the Air Quality indicator as a statement on the quality of Maine's environment. A clean environment is an important part of Maine's image and brand both in our state and in the world beyond. Maine's environment is a critical part of our quality of life that affords us a competitive advantage in attracting people and employers to our state and supports a vibrant tourism economy. Clean air and water also positively impact the health of Maine's people. Maine's forests play an important role in the quality of Maine's waters and the Sustainable Forest Lands indicator is linked to this indicator.

**Related indicators:** Gross Domestic Product, International Exports, Productivity, Cost of Health Care, Wellness and Prevention, Population of Service Center Communities, Sustainable Forest Lands, Air Quality

## CITING INFORMATION IN THIS REPORT

Reproduction of the information contained in *Measures of Growth In Focus* is encouraged with proper citation. Wherever data or text is reproduced, please reference the source in the following manner: "Data source: Maine Economic Growth Council and Maine Development Foundation, *Measures of Growth In Focus* 2013."

## ABOUT THE DATA AND ITS TIMELINESS

The data in this report came from a wide variety of sources, primarily state and federal agencies. Some agencies are able to provide data that is immediately up-to-date, while others experience a lag in reporting. Where possible, estimates were given by agencies in order to compensate for lags in confirmed data.

## ON THE WEB

*Measures of Growth In Focus* 2013 is available on the website of the Maine Development Foundation (MDF) in Adobe® portable document format (.pdf) for easy download and printing. Visit the Maine Economic Growth Council through the homepage of the MDF website at [www.mdf.org](http://www.mdf.org).

## BACKGROUND AND ACKNOWLEDGMENTS

The Growth Council is co-chaired by the President and CEO of Hussey Seating Company, Tim Hussey, and former State Senator Chris Rector. The Growth Council was established in statute by the Governor and the Legislature in 1993 to develop a vision and goals for the state's long-term economic growth. It is comprised of 19 members: 14 representing the private, public, education, labor, and nonprofit sectors; four legislators; and the commissioner of the Department of Economic and Community Development. Membership to the Council requires a three-way appointment from the Governor, Senate President, and Speaker of the House.

Since its inception, the Council has published 19 annual editions of *Measures of Growth In Focus*. The State Legislature uses the report as a guide in its deliberations. Several state agencies have formally incorporated the report's goals and benchmarks into their own strategic plans. Nonprofit organizations have initiated programs aimed directly at accomplishing specific benchmarks. Government officials have used *Measures of Growth In Focus* to justify programs to achieve the goals. Teachers have incorporated the substance of the reports into their curriculum. Policy development forums have used the benchmarks as springboards.

*Measures of Growth In Focus* has been constantly revised over the years in order to provide our readership with the most up-to-date overview of Maine's progress towards long-term, sustainable economic growth, and a high quality of life for all its citizens. In recent years, the Council has opted to include what it deems are only the most critical factors impacting the vision of this report. The result is a leaner, more focused edition of *Measures of Growth In Focus*.

The Maine Economic Growth Council is administered by MDF. MDF was created by the Legislature and Governor in 1978 as a private, nonprofit corporation with a broad mandate to promote Maine's economy. MDF empowers leaders, strengthens Maine communities, and guides public policy. Today, MDF is financed primarily with private resources.

Ryan Neale, MDF Program Director, administered Growth Council meetings and authored the report. Edmund Cervone, President and CEO of MDF, directed the development of this report. MDF intern Jeff Lamson provided background research. Lauren Mier was the graphic designer. J.S. McCarthy Printers printed the report.

The work of the Growth Council is financed by a state appropriation through the Maine Department of Economic and Community Development, and supplemented by private contributions from the membership of MDF.

The Maine Development Foundation and the Maine Economic Growth Council extend sincere appreciation to the organizations and people who generously provided data and guidance.

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