
FY 2017 Midterm Economic Report of the Governor

This publication, required by Section 4-74a of the Connecticut General Statutes, is prepared by the Office of Policy and Management.

Office of the Secretary

Benjamin Barnes, Secretary
Susan Weisselberg, Deputy Secretary

Budget and Financial Management Division

Paul E. Potamianos, Executive Budget Officer
Gregory Messner, Assistant Executive Budget Officer

Economics, Capital, and Revenue Forecasting

Thomas J. Fiore, Section Director
Steven Kitowicz, Principal Budget Specialist
Matthew Pellowski, Budget Analyst
Manisha Srivastava, Budget Analyst
Brian Tassinari, Budget Analyst
Meghan Green, Intern

For information on data or analysis provided in this document or any questions or comments, please contact the Budget and Financial Management Division at (860) 418-6265.

February 3, 2016
Office of Policy and Management
450 Capitol Avenue
Hartford, Connecticut 06106

TABLE OF CONTENTS

	<u>Page</u>
ECONOMIC ASSUMPTIONS OF THE GOVERNOR'S BUDGET	i-v
Economic Outlook	i
Economic Assumptions of the Governor's Budget.....	iii
REVENUE FORECAST	vi-xi
IMPACT OF THE GOVERNOR'S BUDGET ON THE STATE'S ECONOMY	xii-xvii
INTRODUCTION	1
EXECUTIVE SUMMARY	2
GENERAL CHARACTERISTICS	5-21
Census Information	5
Population Projections	10
Housing.....	13
EMPLOYMENT PROFILE	22-34
Employment Estimates	22
Nonagricultural Employment.....	23
Manufacturing Employment.....	26
Nonmanufacturing Employment.....	31
Unemployment Rate	34
SECTOR ANALYSIS	35-83
Energy	35
Gasoline Consumption and Automotive Fuel Economy	47
Export Sector	52
Connecticut's Defense Industry.....	60
Retail Trade in Connecticut.....	66
Small Business in Connecticut	70
Nonfinancial Debt	73
Savings by U.S. Households	80
PERFORMANCE INDICATORS	84-104
Gross Product.....	84
Productivity and Unit Labor Cost.....	88
Value Added	89
Capital Expenditures.....	90
Total Personal Income.....	91
Per Capita Personal Income	95
Per Capita Disposable Personal Income.....	97
Inflation and Its Effect On Personal Income	99
Real Personal Income	100
Real Per Capita Personal Income	101
Cost of Living Index.....	103
MAJOR REVENUE RAISING TAXES	105-123
Personal Income Tax	106
Sales and Use Tax	112
Corporation Business Tax.....	115
Motor Fuels Tax	117
Other Sources	119
APPENDIX	A1-A16

APPENDIX

	<u>Page</u>
Connecticut Resident Population Census Counts	A1-A4
Major U.S. and Connecticut Economic Indicators.....	A5-A16
1. U.S. Economic Variables.....	A5
2. U.S. Personal Income	A6
3. U.S. Personal Income and its Disposition.....	A7
4. U.S. Employment and the Labor Force	A8
5. U.S. Consumer Price Indexes.....	A9
6. Connecticut Personal Income	A10
7. Connecticut Deflated Personal Income	A11
8. Connecticut Manufacturing Employment.....	A12
9. Connecticut Nonmanufacturing Employment	A13
10. Connecticut Labor Force & Other Economic Indicators.....	A14
11. Connecticut Analytics.....	A15
12. Major Connecticut Regional Economic Indicators- Personal Income.....	A16

Economic Report of the Governor

ECONOMIC ASSUMPTIONS OF THE GOVERNOR'S BUDGET

The National Economy

Nationally, economic indicators in 2015 were mixed. On the one hand, employment increased on average by over 200,000 jobs per month, and the unemployment rate fell to 5.0% as of December 2015 (on a preliminary basis). Moreover, the number of discouraged workers and persons working part-time for economic reasons continued their downward trend in 2015, falling 50% and 35%, respectively, below their recession peaks. In other signs of growing strength in the labor market, real hourly compensation picked up to an annual rate of 3.3 and 3.4% growth in the second and third quarters of 2015, compared to an average of 1.1% in 2014.

On the other hand, retiring baby boomers and other demographic shifts continue to depress the labor force participation rate, which has fallen to 38-year lows. As of December 2015, the labor force participation rate was 62.6%, compared to a high of 67.3% in 2000 and 66.2% at the start of 2008. Labor force participation at the pre-recession rate would equate to approximately another 10 million participants in today's workforce. After strong annualized growth in second quarter 2015 (3.9%), real gross domestic product (GDP) growth slowed to 2.0% in the third quarter, compared to an average of 2.5% in 2014. A strong dollar and dampened exports from weak growth abroad are contributing to weakness in GDP growth.

Growth in the consumer price index (inflation) inched lower, from 0.8% over 2014 to 0.7% over 2015. However, excluding the more volatile food and energy prices, inflation grew 2.1% over 2015. In response to the strengthening labor market, and in anticipation of inflation picking up, the Federal Reserve increased the federal funds target rate by 0.25% in December 2015. This is the first rate increase since 2006, and ends the Federal Reserve's seven year near-zero interest rate policy. In announcing the rate increase, the Federal Reserve indicated subsequent increases will be gradual and dependent on inflation and other economic indicators.ⁱ

2015 also brought budget stability to the nation, at least until the next presidential election. President Obama signed a two-year budget deal in November 2015, a deal which averts a government shutdown over the debt limit until March 15, 2017. The budget deal increases discretionary spending equally on domestic and military programs by \$80 billion over two years. To achieve the increased discretionary spending, the bill lifts for two years budget caps put in place by the 2011 Budget Control Act. The increased spending is projected to be offset by cuts and revenue changes targeted to achieve \$75.7 billion.ⁱⁱ

ⁱ <http://www.brookings.edu/research/opinions/2015/12/18-fed-liftoff-focus-on-trajectory-kohn>

ⁱⁱ <https://www.washingtonpost.com/news/powerpost/wp/2015/10/27/whats-in-the-budget-deal/>

Economic Report of the Governor

News from China has been rattling stock markets worldwide. China's government is managing a transition from an economy built on government driven infrastructure investment and industrial / manufacturing output and related exports, to an economy driven by consumer demand. The slowdown in China has been a growing issue since 2012, when annual GDP growth fell by 1.7% to 7.8%. China's GDP growth stands at 6.9% in the third quarter of 2015, the slowest since the recession in 2009. Statistics released by China in August of 2015 included a dip in the national manufacturing Purchasing-Managers Index, which caused the Standard & Poor's 500 Index and the Dow Jones Industrial Average to fall 6.3% and 6.6%, respectively. Beijing intervened using market controls, and eventually devalued the Yuan to keep export prices low. Though markets initially recovered from the August dip, continuing skepticism regarding Chinese economic growth, rising oil inventories, as well as oil's fall to below \$30 per barrel further roiled markets in early 2016.

For the past decade the United States has experienced a significant rise in oil production, due in large part to technological innovations in the area of shale oil fracking. To maintain market share oil exporting countries have increased production, even as prices decline, as many of their economies rely heavily on the export of such energy resources. All of this, in combination with a reduction in demand from Europe and weakening economic growth in China and emerging markets, has led to a historic oversupply in the oil market which is driving prices down. The price of a barrel of Brent crude oil fell from a high of \$115.19 on June 19, 2014 to \$36.61 on December 31, 2015, a 68% drop. The lifting of international sanctions against Iran, and the ensuing potential new source of oil in an already oversupplied market pushed Brent crude oil to a 12-year low of \$27.36 in early January 2016.

The Connecticut Economy

Total seasonally adjusted nonfarm employment reached 1,700,700 in December 2015 (on a preliminary basis). Nonfarm employment grew at the rate of 1.6% over the year, the fastest rate of growth since 1999. Though Connecticut is still 0.7% below its pre-recession jobs peak of 1,713,000 in March 2008, private sector jobs have fully recovered to their pre-recession level. Private sector jobs represent approximately 85% of total nonfarm jobs in Connecticut. Connecticut's unemployment rate was 5.2% in December 2015, down from a high of 9.2% in 2010, and down 1.1% from December 2014.

Connecticut's housing market continues to show signs of improvement, yet remains far below pre-recession levels. Home sales in Connecticut have averaged about 43,000 sales per fiscal year over the last three years (FY 2013 to FY 2015), up 13% from FY 2012 but still down by 43% from FY 2006. The median sales price for existing homes is essentially unchanged since the end of the recession, and remains down 15% from FY 2006. Housing permits, starts and completions have been improving since FY 2013, averaging 5,400, 5,000 and 4,200, respectively, over the past three fiscal years. However, all three indicators remain between 50 to 60% below FY 2006 activity.

Economic Report of the Governor

2015 brought dramatic changes to Connecticut's corporate landscape. United Technologies sold its helicopter division, Sikorsky Aircraft, to Lockheed Martin in July 2015 for \$9.2 billion. Sikorsky is the largest employer in Fairfield County with approximately 8,000 local employees. In April General Electric (GE) announced its intention to divest GE Capital, which was eventually sold piecemeal to a number of financial giants with a portion renamed to Synchrony Financial. In July Synchrony Financial confirmed it would be keeping its headquarters in Stamford, just as GE publicly began a nationwide search for new headquarters. In January 2016, GE confirmed it would be moving 200 of its estimated 800 headquarter employees to Boston, Massachusetts by the summer of 2016. In November 2015, Marriott International announced the \$12.2 billion acquisition of Stamford-based Starwood Hotels & Resorts Worldwide. Combined, Marriott and Starwood constitute the largest hotel company in the world.ⁱⁱⁱ In other industry-shaping news, four out of the nation's five largest health insurance companies are awaiting federal and state approval on mergers. Indianapolis-based Anthem's \$54 billion purchase of Connecticut-based Cigna would result in the nation's largest health insurance company. Following UnitedHealth Group, Connecticut-based Aetna's \$37 billion purchase of Humana would result in the nation's third-largest health plan.^{iv}

Economic Assumptions of the Governor's Budget

The U.S. economy is projected to continue accelerating through FY 2017 with 3.0% growth in real GDP. U.S. growth is then projected to slow to an average of 2.5% in FY's 2019 and 2020. Inflation is expected to increase in FY 2017 to 2.1% (which is the Federal Open Market Committee's target rate), and then remain relatively stable between 2.6% and 2.5% annual growth in FY's 2018 to 2020. The U.S. unemployment rate is projected to continue falling, reaching 4.9% by FY 2017, before stabilizing. Housing starts are expected to slightly accelerate through FY 2018 before stabilizing. U.S. new vehicle sales are projected to surpass their FY 2005 pre-recession peak of 17 million sales by the end of FY 2016. New vehicle sales growth is then expected to stabilize at 1.1% growth through FY 2018 before slightly falling.

Connecticut's economy is expected to grow 2.6% in FY 2017, then decline to an average of 2.2% growth in FY's 2018 to 2020. Personal income growth in Connecticut is projected to slightly slow to 3.8% in FY 2017, before picking up to an average of 4.5% in FY's 2018 to 2020. Housing starts in Connecticut are expected to continue to expand with 10.0% growth in FY 2017, continuing with 19.3% growth in FY 2018, before finishing out the forecast period with an average of 7.8% growth.

Connecticut is expected to recover all jobs lost due to the recession by the third quarter of 2016, six and a half years after the recession ended and over two years after the U.S. fully recovered all jobs

ⁱⁱⁱ <http://www.stamfordadvocate.com/business/article/The-business-year-in-review-6717871.php>

^{iv} <http://www.forbes.com/sites/brucejapsen/2015/10/19/antitrust-showdown-next-after-aetna-humana-shareholders-approve-deal/#4d3134155ef7>

Economic Report of the Governor

lost to the recession. Connecticut's nonagricultural employment is expected to finish off the current fiscal year with a healthy 1.5% growth (24,700 jobs) before decelerating to 0.9% in FY 2017 (15,900 jobs) and further to 0.6% in FY 2018 (9,600 jobs). Connecticut's unemployment rate is projected to decline to 5.2% by FY 2017 and drop down to 4.9% by the end of the forecast period in FY 2020.

Economic Report of the Governor

**TABLE A-1
U.S. AND CONNECTICUT ECONOMIC INDICATORS**

<u>Fiscal Year</u>	U.S. Real GDP (Billions)		CT Real GSP (Millions)		U.S. Housing Starts (Millions)		CT Housing Starts	
	<u>Value</u>	<u>Growth</u>	<u>Value</u>	<u>Growth</u>	<u>Value</u>	<u>Growth</u>	<u>Value</u>	<u>Growth</u>
2014	\$15,751	2.1%	\$227.8	0.5%	1.0	8.7%	4,701	-13.1%
2015	\$16,183	2.7%	\$230.4	1.2%	1.1	10.7%	4,855	3.3%
2016	\$16,543	2.2%	\$234.4	1.7%	1.2	13.4%	5,531	13.9%
2017	\$17,037	3.0%	\$240.5	2.6%	1.3	11.8%	6,083	10.0%
2018	\$17,506	2.8%	\$245.8	2.2%	1.5	10.3%	7,258	19.3%
2019	\$17,941	2.5%	\$250.9	2.1%	1.5	3.7%	7,872	8.5%
2020	\$18,385	2.5%	\$256.6	2.3%	1.6	3.9%	8,442	7.2%

<u>Fiscal Year</u>	U.S. Employment (Millions)		CT Employment (Thousands)		U.S. Unemployment Rate		CT Unemployment Rate	
	<u>Value</u>	<u>Growth</u>	<u>Value</u>	<u>Growth</u>	<u>Value</u>	<u>Change</u>	<u>Value</u>	<u>Change</u>
2014	137.6	1.8%	1,658.6	0.7%	6.8%	-1.0	7.1%	-1.0
2015	140.6	2.1%	1,678.5	1.2%	5.7%	-1.1	6.3%	-0.9
2016	143.2	1.9%	1,703.2	1.5%	5.0%	-0.7	5.2%	-1.1
2017	145.3	1.5%	1,719.1	0.9%	4.9%	-0.1	5.2%	0.0
2018	147.0	1.2%	1,728.7	0.6%	4.9%	0.0	5.1%	-0.1
2019	148.7	1.1%	1,736.2	0.4%	4.9%	0.1	5.0%	-0.1
2020	150.3	1.0%	1,743.2	0.4%	5.0%	0.0	4.9%	0.0

<u>Fiscal Year</u>	U.S. Consumer Price Index (1982-84 = 100)		U.S. New Vehicle Sales (Millions)		CT Personal Income (Millions)	
	<u>Value</u>	<u>Growth</u>	<u>Value</u>	<u>Growth</u>	<u>Value</u>	<u>Growth</u>
2014	235.0	1.6%	15.9	5.5%	\$227,889	1.2%
2015	236.7	0.7%	16.8	5.9%	\$237,132	4.1%
2016	238.0	0.5%	17.8	5.8%	\$246,456	3.9%
2017	243.1	2.1%	18.0	1.1%	\$255,820	3.8%
2018	249.4	2.6%	18.2	1.1%	\$267,857	4.7%
2019	255.9	2.6%	17.9	-1.6%	\$279,540	4.4%
2020	262.3	2.5%	17.5	-2.3%	\$291,671	4.3%

Economic Report of the Governor

REVENUE FORECAST

The following Table shows actual General Fund Revenue collections for fiscal 2015, estimated revenue collections for fiscal 2016, and projected revenue collections for fiscal 2017 by major sources.

TABLE A-2
STATE OF CONNECTICUT - GENERAL FUND REVENUES
(In Millions of Dollars)

	Actual Revenue <u>FY 2015</u>	Projected Revenue At Rates <u>FY 2016</u>	Propose Revenue Changes <u>FY 2016</u>	Net Projected Revenue <u>FY 2016</u>
Taxes				
Personal Income Tax	\$ 9,151.0	\$ 9,570.0	\$ -	\$ 9,570.0
Sales & Use Tax	4,205.1	4,230.3	-	4,230.3
Corporation Tax	814.8	950.4	-	950.4
Public Service Tax	276.8	287.4	-	287.4
Inheritance & Estate Tax	176.7	217.4	-	217.4
Insurance Companies Tax	220.6	226.5	-	226.5
Cigarette Tax	358.7	365.9	-	365.9
Real Estate Conveyance Tax	186.0	194.7	-	194.7
Oil Companies Tax	-	-	-	-
Alcoholic Beverages	61.7	61.7	-	61.7
Admissions and Dues	38.4	38.3	-	38.3
Health Provider Tax	455.0	672.4	-	672.4
Miscellaneous	19.0	19.7	-	19.7
Total Taxes	\$ 15,963.9	\$ 16,834.7	\$ -	\$ 16,834.7
Less Refunds of Taxes	(956.7)	(1,090.4)	-	(1,090.4)
Less Earned Income Tax Credit	(206.9)	(127.4)	-	(127.4)
Less R&D Credit Exchange	(7.9)	(7.1)	-	(7.1)
TOTAL - Taxes Less Refunds	\$ 14,792.3	\$ 15,609.8	\$ -	\$ 15,609.8
Other Revenues				
Transfers Special Revenue	\$ 323.3	\$ 336.4	\$ -	\$ 336.4
Indian Gaming Payments	268.0	261.8	-	261.8
License, Permits, Fees	257.4	312.9	-	312.9
Sales of Commodities & Services	35.8	39.1	-	39.1
Rents, Fines & Escheats	168.7	126.0	-	126.0
Investment Income	0.9	1.2	-	1.2
Miscellaneous	185.0	176.8	-	176.8
Less Refunds of Payments	(64.3)	(66.2)	-	(66.2)
TOTAL - Other Revenues	\$ 1,174.9	\$ 1,188.0	\$ -	\$ 1,188.0
Other Sources				
Federal Grants	\$ 1,241.2	\$ 1,217.0	\$ -	\$ 1,217.0
Transfer From Tobacco	97.4	108.6	-	108.6
Transfers From/(To) Other Funds	(23.8)	(69.5)	-	(69.5)
TOTAL - Other Sources	\$ 1,314.8	\$ 1,256.1	\$ -	1,256.1
TOTAL - General Fund	\$ 17,282.0	\$ 18,053.9	\$ -	\$ 18,053.9

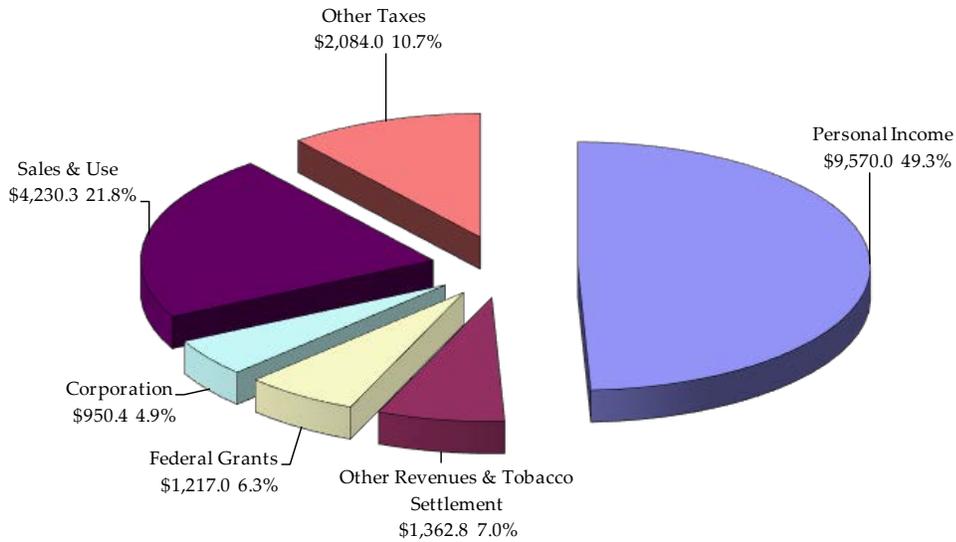
Economic Report of the Governor

Projected Revenue At Current Rates <u>FY 2017</u>	Proposed Revenue Changes <u>FY 2017</u>	Net Projected Revenue <u>FY 2017</u>	<u>Explanation of Changes</u>
\$ 9,829.1	\$ -	\$ 9,829.1	<u>Sales Tax</u> Impact of the Alcoholic Beverages policy change.
4,092.2	0.2	4,092.4	<u>Alcoholic Beverages</u> Eliminate minimum bottle pricing.
904.6	-	904.6	
295.3	-	295.3	<u>Licenses, Permits, and Fees</u> Increase certain Department of Labor filing fees.
174.6	-	174.6	
229.7	-	229.7	
368.6	-	368.6	
199.7	-	199.7	<u>Federal Grants</u> Revenue loss associated with expenditure reductions.
-	-	-	
62.2	1.9	64.1	
39.0	-	39.0	<u>Transfers From/(To) Other Funds</u> Decrease transfer to the Mashantucket Pequot and Mohegan Fund. Eliminate Tobacco Health Trust Fund support for the Asthma Awareness Program and the Easy Breathing Program.
676.1	-	676.1	
20.1	-	20.1	
\$ 16,891.2	\$ 2.1	\$ 16,893.3	
(1,101.5)	-	(1,101.5)	
(133.6)	-	(133.6)	
(8.5)	-	(8.5)	
\$ 15,647.6	\$ 2.1	\$ 15,649.7	
\$ 351.0	\$ -	\$ 351.0	
256.6	-	256.6	
295.2	0.2	295.4	
40.1	-	40.1	
128.0	-	128.0	
3.4	-	3.4	
179.0	-	179.0	
(67.1)	-	(67.1)	
\$ 1,186.2	\$ 0.2	\$ 1,186.4	
\$ 1,273.6	\$ (4.7)	\$ 1,268.9	
104.5	-	104.5	
(61.4)	4.2	(57.2)	
\$ 1,316.7	\$ (0.5)	\$ 1,316.2	
\$ 18,150.5	\$ 1.8	\$ 18,152.3	

Economic Report of the Governor

GENERAL FUND REVENUES FY 2016

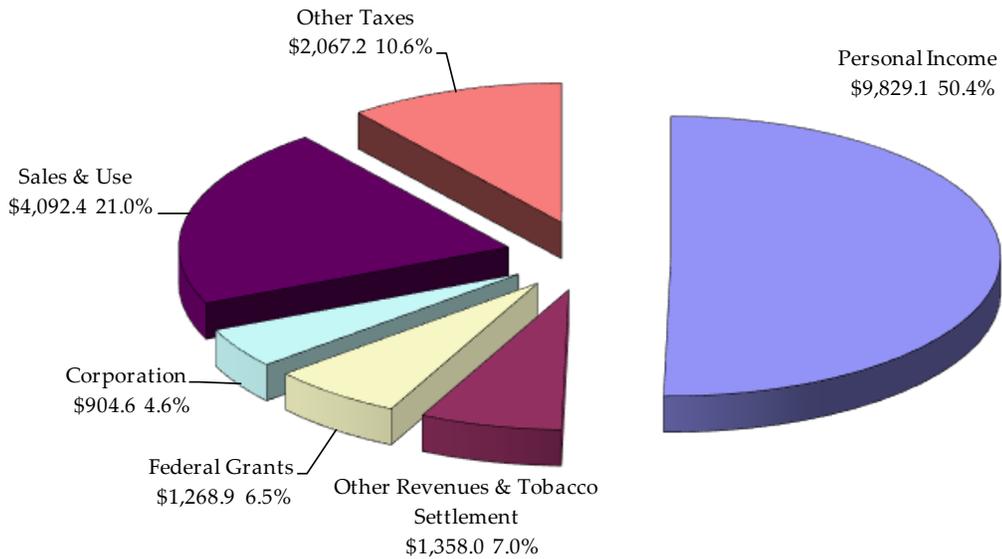
TOTAL \$ 18,053.9 MILLION*



* Refunds are estimated at \$1,090.4 million, the Earned Income Tax Credit is estimated at \$127.4 million, R&D Credit Exchange is estimated at \$7.1 million, Refunds of Payments are estimated at \$66.2 million, and Transfers to Other Funds are estimated at \$69.5 million in FY 2016.

GENERAL FUND REVENUES FY 2017

TOTAL \$ 18,152.3 MILLION*



* Refunds are estimated at \$1,101.5 million, Earned Income Tax Credit is estimated at \$133.6 million, R&D Credit Exchange is estimated at \$8.5 million, Refunds of Payments are estimated at \$67.1 million, and Transfers to Other Funds are estimated at \$57.2 million in FY 2017.

Economic Report of the Governor

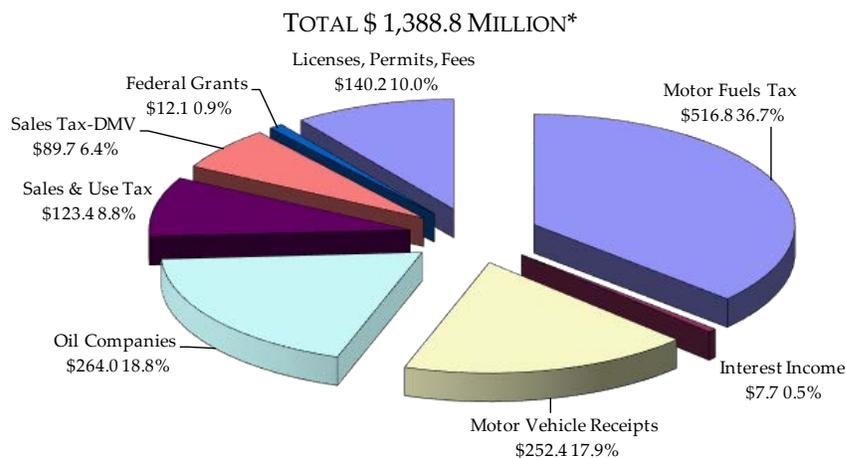
This page has been intentionally left blank.

Economic Report of the Governor

**TABLE A-3
STATE OF CONNECTICUT
SPECIAL TRANSPORTATION FUND REVENUES
(In Millions)**

	Actual Revenue FY 2015	Projected Revenue Current Rates FY 2016	Proposed Revenue Changes FY 2016	Net Projected Revenue FY 2016
Taxes				
Motor Fuels Tax	\$ 516.6	\$ 516.8	\$ -	\$ 516.8
Oil Companies Tax	337.9	264.0	-	264.0
Sales & Use Tax	-	123.4	-	123.4
Sales Tax DMV	83.9	89.7	-	89.7
Less Refunds of Taxes	(7.2)	(7.3)	-	(7.3)
TOTAL - Taxes Less Refunds	\$ 931.1	\$ 986.6	\$ -	\$ 986.6
Other Sources				
Motor Vehicle Receipts	\$ 249.5	\$ 252.4	\$ -	\$ 252.4
Licenses, Permits & Fees	145.4	140.2	-	140.2
Interest Income	6.9	7.7	-	7.7
Federal Grants	12.1	12.1	-	12.1
Transfers From (To) Other Funds	34.7	(6.5)	-	(6.5)
Transfer To TSB	(15.0)	-	-	-
Less Refunds of Payments	(3.9)	(3.7)	-	(3.7)
TOTAL - Other Sources	\$ 429.8	\$ 402.2	\$ -	\$ 402.2
TOTAL - S.T.F.	\$ 1,360.9	\$ 1,388.8	\$ -	\$ 1,388.8

FISCAL YEAR 2016



* Refunds are estimated at \$11.0 million and, Transfers to Other Funds are estimated at \$6.5 million in FY 2016.

Economic Report of the Governor

Projected Revenue Current Rates FY 2017	Proposed Revenue Changes FY 2017	Net Projected Revenue FY 2017
\$ 503.7	\$ -	\$ 503.7
283.7	-	283.7
260.6	-	260.6
90.3	-	90.3
(7.5)	-	(7.5)
\$ 1,130.8	\$ -	\$ 1,130.8
\$ 255.1	\$ -	\$ 255.1
140.7	0.8	141.5
8.5	-	8.5
12.1	-	12.1
(6.5)	-	(6.5)
-	-	-
(3.8)	-	(3.8)
\$ 406.1	\$ 0.8	\$ 406.9
\$ 1,536.9	\$ 0.8	\$ 1,537.7

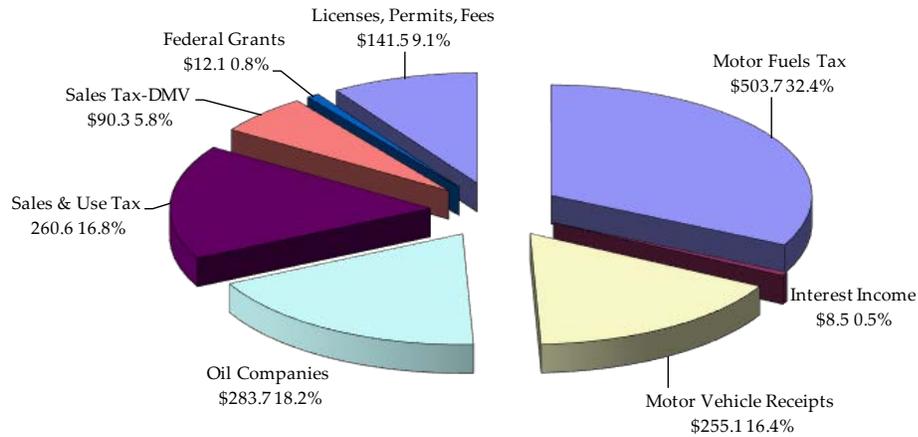
Explanation of Changes

Licenses, Permits and Fees

Increase permit fees for oversize/overweight vehicles.

FISCAL YEAR 2017

TOTAL \$ 1,537.7 MILLION*



* Refunds are estimated at \$11.3 million and, Transfers to Other Funds are estimated at \$6.5 million in FY 2017.

Economic Report of the Governor

IMPACT OF THE GOVERNOR'S BUDGET ON THE STATE'S ECONOMY

The traditional purpose of a governmental budget is threefold: it outlines necessary and desirable public services, it estimates how much these services will cost, and it defines the resources that are required to provide these services. The budget is a fundamental policy document of every level of government. As proposed, enacted and implemented, it represents a consensus regarding what government realistically can and ought to do.

The economic implications of governmental budgets are significant. Government expenditures and investment at the federal, state and local levels are an important dimension of the national economy, accounting for about 20% of the Gross Domestic Product. The spending and tax policies of government profoundly influence the performance of the economy. Because the Governor's budget will account for an estimated 7.2% of Connecticut's Gross State Product in fiscal year 2017, it is inevitable that state government's expenditure and revenue actions influence the state's economy.

Expenditure Actions

General Government

Transportation: Ramp Up

Governor Malloy's proposed revisions to the FY 2017 budget continue his commitment to improving Connecticut's transportation system through a multimodal approach to mitigate congestion, improve capacity, and increase mode options and availability in an effort to stimulate economic development for the state. With the passage of the five-year ramp up plan in the 2015 Legislative Session, the execution of the \$10 billion plan (\$3.8 billion planned state bonding, \$3.2 billion federal funding, and the additional \$2.8 billion in new authorized state bonding) has begun across the various modes including roads, highways, bus, rail, maritime, and bike trails.

Major initiatives that are progressing include:

- The \$350 million reconstruction of I-84 east of Waterbury.
- Replacement of the Q Bridge on I-95 in New Haven.
- Replacement of the Moses Wheeler Bridge on I-95 in Stratford.
- Rehabilitation of the Merritt Parkway in Stamford.
- Planning and engineering for the replacement of the I-84 viaduct in Hartford, the replacement of the MixMaster (Route 8 and I-84) interchange in Waterbury, and modifications to I-91 connection to I-84 at the Charter Oak Bridge in Hartford.
- Expansion of CTfastrak service.
- Construction of a Cttransit bus maintenance and storage facility for the Waterbury area.

Economic Report of the Governor

- Completion of the Component Change Out Buildings – the facilities to maintain the M8 rail cars.
- Replacement of the overhead wire and catenary system that powers the New Haven Line’s electric trains.
- Installation of Positive Train Control (PTC) systems to monitor train activity, prevent collisions, and convey and enforce speed restrictions.
- Replacement of the Northeast Corridor (NEC)/New Haven Line (NHL) communication and signal system.
- Implementation of the Hartford Line Program, a High-Speed Intercity Rail project with an estimated \$570 million cost.
- Provide funding of \$25 million for dredging and navigational work.

As with the capital program, the operating budget for the Department of Transportation focuses on all modes of transportation. To further the Governor’s commitment to a safe rail system, \$6,145,000 is included for rail improvements and safety initiatives through Metro-North. These funds allow for the hiring of positions for maintenance, rehabilitation, and quality assurance programs to assess tracks and facilities.

Governor Malloy’s budget includes \$250,000 to support the operations of the proposed Transit Corridor Development Assistance Authority (TCDA), which will coordinate economic development within one-half mile of passenger rail or bus rapid transit stations. Also, approximately \$50,000 in additional funding is provided for the continued support of the establishment of the Connecticut Port Authority.

Second Chance Society 2.0

Governor Malloy is proposing additional changes to the criminal justice system as an expansion of his Second Chance Society initiative. These changes include bail reforms - including no money bail for misdemeanors, expanding the youthful offender definition to include 18 through 20 year olds, and raising the age of the juvenile justice system’s jurisdiction to include 18, 19 and 20 year olds.

The Governor is proposing to eliminate money bail for anyone charged only with a misdemeanor except where a judge determines that the accused poses an immediate threat to the health or well-being of another person or the general public. In addition, the Governor would allow every defendant the opportunity to make a cash deposit of 10% of the bail set by a judge in order to be released while awaiting trial. The accused would have the option of either making a 10% cash deposit to be held by the court or of accessing the services of a bail bondsman.

Existing statute recognizes that while certain young people may belong in adult court, they should still be afforded protection from lifelong stigma and an incentive not to reoffend. The Governor’s proposal would expand the definition of the existing status of youthful offender to include 18 through 20 year olds. As under current law, youthful offender status does not apply to the most serious crimes including murder and sexual assault and the most serious motor vehicle crimes.

Economic Report of the Governor

Governor Malloy recognizes that when young people make bad decisions, the trajectory of their lives can change permanently and that the longer they spend in the criminal justice system, the more likely they are to commit crimes. As such, in order to give young, low-risk offenders a Second Chance, the Governor is proposing to raise the age of the juvenile justice system's jurisdiction to include, 18, 19 and 20 year olds. The Governor has designated the Juvenile Justice Planning and Oversight Committee (JJPOC) as the stakeholder group responsible for overseeing implementation during this new raise the age effort.

With crime at a 48-year low and recidivism down dramatically, prison population projections indicate a continuing decline heading into FY 2017. As of January 1, 2016, the total inmate population was 15,500 - down more than 600 offenders from the same time last year. The current inmate population is substantially below the all-time high of 19,894 in 2008.

With expansion of the Governor's Second Chance Society initiatives, the steps taken to improve offender re-entry, and the continuing trends in declining crime and prison admissions; Governor Malloy is proposing another prison closure in FY 2017. Current prison population projections allow for the closure of additional facility wings and annexes early in FY 2017 followed by a full facility by the end of the fiscal year. Less capacity will result in fewer posts and existing staff can be redeployed to cover posts throughout the system currently being covered by overtime. Fewer inmates and less facility costs will produce additional savings. It is estimated that \$14.8 million in staff and operating costs will be saved in FY 2017.

The Department of Correction has already taken steps to improve offender reentry, including a streamlined centralized release unit, as well as the opening of the Cybulski Community Reintegration Center - a recently rededicated 600-bed facility which specializes in preparing offenders for reentry.

Education and Workforce Programs

Sustaining Support for Municipal Aid

Since taking office, Governor Malloy has demonstrated strong support for municipal aid, refusing to shift the state's fiscal problems onto municipalities. Given the planned increases in municipal aid adopted during the 2015 legislative session, which are funded through a dedicated stream of receipts from Sales Tax revenue, the Governor is proposing that many of the budgeted grants for municipal aid be subject to the same level of across-the-board reductions faced by state agencies. However, the Governor has held the line on critical Education Cost Sharing (ECS) grants by maintaining the same ECS funding level as in FY 2016. The Governor's recommended budget continues to support new municipal revenue sharing through Select Payments in Lieu of Taxes and funding for motor vehicle property tax relief. Additionally, this budget maintains municipal capital funding and sustains commitments to retirement contributions and health service costs for teachers as well as debt service for the very generous support provided to municipalities for school construction, Town Aid Road and other capital grants.

Economic Report of the Governor

A New Approach to Higher Education Funding

As the Planning Commission for Higher Education, the Outcomes Based Financing Task Force, and the Higher Education Coordinating Council explore how the public systems of higher education are funded, one thing is clear: the current block grant system needs to be rationalized. The true General Fund support for public higher education is understated, and the state's colleges and universities are struggling with unfunded pension liabilities for tuition supported faculty and staff.

The Governor's budget proposes to move away from a roster-based system of funding, with all the resulting fringe benefit complications. Instead, funding is appropriated in the form of a true block grant, to be treated by higher education constituent units as a revenue source.

Additionally, the Governor proposes to establish a \$2.3 million incentive fund in the Board of Regents for outcomes-based funding. These funds would be used to support the state goal of promoting student success for low-income students and reducing achievement gaps.

By establishing baselines, investing in best practices, and using metrics to measure outcomes, the Governor is changing the way agencies are funded. The Governor is making these agencies more accountable to the public and the legislature for their results, while ensuring that the most vulnerable students have pathways for success.

Health and Human Services

To build on efforts to improve accountability for state resources, the Governor is recommending conversion of grant-funded services under the Department of Developmental Services (DDS) to fee-for-service payments to be billed to and paid by the Department of Social Services (DSS). Transitioning the system of grants will help ensure the state is receiving federal reimbursement on all eligible services while improving compliance with Medicaid billing, provider enrollment and client eligibility. This transition will begin with funding that supports community residential services for individuals with intellectual disabilities (ID).

Using the success of the Behavioral Health Partnership in improving health and cost outcomes for children and adults in need of publicly-provided and funded behavioral health services as a model, the Governor is proposing establishment of an ID Partnership. Together, the Departments of Developmental Services and Social Services and the Office of Policy and Management will work to develop a broader array of service options that would allow DDS to provide the appropriate services based on acuity, at the right time and cost. The Partnership will also explore options for private and other third party payments, develop supportive housing models tailored to persons with intellectual disabilities, explore the potential for management of ID services by an administrative services or managed care organization and develop strategies to address and fund the DDS waiting list.

Economic Report of the Governor

Lastly, in order to right-size publicly-provided services for individuals with intellectual disabilities, DDS will continue efforts to downsize Southbury and the regional centers and develop a timetable for potential closure or conversion of public facilities. The budget reflects \$6.2 million in savings from the anticipated conversion of 30 state-operated residential community living arrangements (CLAs) to privately-operated CLAs during FY 2017.

Autism Lead Agency Responsibilities

To reflect the recent expansion in autism coverage under the Medicaid State Plan of medically necessary services for members under age 21 with autism spectrum disorder, lead agency responsibilities and the supporting resources are being transferred from DDS to DSS. The Early Childhood Autism Waiver is being discontinued to reflect the identical coverage being offered under the Medicaid State Plan.

Capital Proposals

The Governor is proposing \$279 million in additional general obligation (GO) bond authorizations in FY 2017. These proposed bond authorizations are in addition to those that were previously authorized by the General Assembly and become effective in FY 2017, which include \$1.87 billion for various projects and programs, \$266.4 million for the Next Generation Connecticut/ UConn 2000 program, \$95 million for the CSCU 2020 program, \$21.1 million for the Bioscience Collaboration Program, \$25 million for the Bioscience Innovation Fund and \$20 million over the biennium for various other programs authorized in prior legislation. These authorizations are offset by the cancellation of \$385.4 million in GO bond authorizations from prior years in order to remain within the statutory debt limit.

New proposed GO bond authorizations are:

- \$8 million for transit-oriented development;
- \$15 million for grants to nonprofit health and human service providers for capital improvements;
- \$5 million for renovations and improvements at the Department of Veterans' Affairs;
- \$181 million for renovations and a new parking garage at the State Office Building;
- \$10 million for the Department of Economic and Community Development programs;
- \$60 million to replace the central utility plant and utility distribution systems at York Correctional Institution in East Lyme .

The Governor is also proposing \$60 million in additional special tax obligation bond authorizations for bus and rail projects. This funding is in addition to the \$693.3 million previously authorized in FY 2017 for the Department of Transportation's regular program for maintaining and improving our highways and transit systems and the \$520.2 million previously authorized to implement projects under the Let's Go CT! long-term transportation plan.

Economic Report of the Governor

Revenue Proposals

Over the past few years, the State of Connecticut enacted revenue and spending policies which addressed a projected annual shortfall of \$3.2 billion in FY 2012 and another \$1.1 billion projected shortfall in FY 2016. These shortfalls reflected the tepid economic recovery that both the nation and Connecticut experienced emerging from the Great Recession. General Fund revenue growth, when adjusted to remove the impact of various tax changes, from FY 2011 through the projected FY 2017 budget will only achieve a 2.3% per annum growth rate. Inflation over that same time period will grow by 1.6% per annum, resulting in real revenue growth of only 0.7% per annum. This level of growth is insufficient to fund government services. With that in mind, the Governor's proposed budget seeks to maintain balance by focusing exclusively on the expenditure side of the budget to align the expenditure growth rate to the state's revenue growth rate. As such, the FY 2017 budget revisions contain no major revenue initiatives. The December 2015 Special Session of the legislature did enact some substantial tax reform in the area of business taxation. This included placing an overall cap on any potential additional tax burden derived from the state's switch to a unitary method of taxation, instituting single factor apportionment based upon sales for all industries, and gradually increasing the cap on the use of certain tax credits. These changes will take some time to digest and be studied for their efficacy in generating sufficient revenue while enhancing the state's competitiveness.

The FY 2017 budget revisions contain some limited revenue measures. First, the Governor continues his commitment to modernize Connecticut's liquor laws in order to make them more consumer friendly and increase competitiveness with our neighboring states. Over the past few years, the state has enacted changes to allow for the retail sale of alcohol on Sundays and certain holidays while expanding the allowable daily hours of operation. This year the Governor is proposing to eliminate minimum bottle pricing. This change is expected to result in additional general fund revenue of \$2.1 million. In late December the State Tax Panel issued their final recommendations. Although many of those recommendations will have to wait for a time when the state's revenue picture improves, the Governor's budget proposal does include some initiatives related to the Tax Panel's recommendations. These include placing a maximum cap on the amount a decedent's estate will have to remit to the Probate Court to fund their services and exempting the first \$10,000 of personal property from the local property tax. In addition, the Department of Revenue Services is moving forward with examining business taxation in the state, including the apportionment method for income derived from the sale of services, and methods to enhance nexus determinations under the sales tax for remote sales. Overall, these revenue actions are modest, but reflect the Administration's policy to concentrate on the cost structure of the state.

Conclusion

Governor Malloy remains committed to a fiscally responsible state government which lives within the state's means and promotes Connecticut's quality of life. The Governor's proposed changes to the fiscal year 2017 budget address the fiscal and economic realities facing the state. The Governor's budget is balanced, represents limited growth over prior years, and remains below the statutory spending cap.

Economic Report of the Governor

This page has been intentionally left blank.

**ECONOMIC REPORT
OF THE GOVERNOR**

FY 2017 Midterm

This page has been intentionally left blank.

Economic Report of the Governor

INTRODUCTION

This report fulfills the requirements of Section 4-74a of the General Statutes which stipulates that:

"The budget document shall include the recommendations of the Governor concerning the economy and shall include an analysis of the impact of both proposed spending and proposed revenue programs on the employment, production and purchasing power of the people and industries within the state."

This report is also designed to provide a brief profile of the State of Connecticut, the economy of the state, revenues and economic assumptions that support the Governor's budget, and an analysis of the impact of both proposed spending and proposed revenue programs on the economy of the State of Connecticut.

The report focuses on eight areas including: (1) the general characteristics of the state; (2) the profile of employment in the state; (3) an in-depth analysis of important Connecticut sectors; (4) the performance indicators the United States, the New England region, and Connecticut; (5) a discussion of the most important revenue sources; (6) the economic assumptions of the Governor's budget and a numerical comparison of some of the important indicators used in the preparation of the Governor's budget; (7) the revenue forecasts of the General Fund and the Special Transportation Fund; and (8) the expected impact of the Governor's budget on the economy of the State of Connecticut.

Economic Report of the Governor

EXECUTIVE SUMMARY

Highlights included in this report are as follows:

Population

Between 2000 and 2010, Connecticut's population grew at a rate of 4.9%, faster than the 3.8% population growth in New England but trailing behind the 9.7% of the U.S. In 2015, Connecticut's population experienced a year over year decline of an estimated 3,876 residents. Connecticut continues to experience net outmigration, with a deficit of 53,498 between 2008 and 2013. At the time of the 2010 census, the relative size of Connecticut's elderly population (age 65+) exceeded both New England and the U.S., while its younger age cohorts, those under 45, trailed the nation as a whole. Population projections indicate that by 2025 the age 65 and over cohort will grow by 54.5% while the working age population will decline 0.5%, resulting in Connecticut's aged dependency ratio increasing by 54.1% by 2025.

Housing

Connecticut's housing market indicators remain mixed. Following a sharp decline in fiscal year 2014, housing starts in Connecticut increased by 2.8% in fiscal year 2015. Median existing home prices increased 0.8% in Connecticut in calendar year 2014, significantly lower than the U.S. as a whole, which saw median home prices increase 5.7%. Calendar 2014 was the second year that median existing home prices in Connecticut experienced a year-over-year increase since the start of the housing crisis. Thirty year mortgage rates remain extremely low, decreasing to 3.9% in November of 2015, and delinquency and foreclosure rates have declined to their lowest level since 2007. Homeowner equity as a percentage of home values improved to 54.6% in 2014, reaching their highest level since 2006.

Employment

In FY 2015 Connecticut gained 19,892 non-farm jobs, representing a 1.2% growth in jobs. During the recent financial crisis, Connecticut lost approximately 100,000 non-farm jobs, and as of fiscal year 2015 had regained 72,500. Manufacturing remains an important sector of Connecticut's economy, representing 9.5% of all non-farm jobs in fiscal year 2015. Connecticut continues to see a decline in manufacturing employment, decreasing 1.0% in FY 2015, while the U.S. experienced slight growth in manufacturing employment. Nonmanufacturing employment gained 21,475 jobs, or 1.4%, in FY 2015, trailing the U.S.'s growth of 2.2% and New England's growth of 1.6%. The largest growth in nonmanufacturing employment in Connecticut came in the services sector, which gained 15,833 jobs or a 2.1% increase over the prior year. In FY 2015, Connecticut's unemployment rate averaged 6.3%, higher than the U.S. at 5.7% and New England at 5.4%. Connecticut's unemployment rate has decreased by 2.8 percentage points from fiscal year 2011, when unemployment stood at an average of 9.1%.

Economic Report of the Governor

Energy

Energy markets continued to experience significant changes in 2015, as an abundance of supply in the oil market, driven in part by the North American energy boom, drove down the price of oil and gasoline during the second half of the year. In 2014, the United States continued to be the world's largest supplier of oil. In 2013 Connecticut consumed 3.2 thousand BTU's per 2009 chained dollar of GDP, making it one of the most energy efficient states relative to output. Overall, Connecticut is 32.3% below the nation's per capita energy consumption and ranks 5th in energy efficiency per capita. In 2014, Connecticut residents consumed 398.9 gallons of gasoline per capita, lower than the national average of 432.4 gallons. Connecticut's energy efficiency is likely due in part to the high relative price of energy in the state. In 2013 Connecticut's overall energy costs were 30% higher than the national average and its electricity prices were 55% higher than the national average.

Export Sector

Exports play a crucial role in the economy. The U.S. trade deficit in 2014 was \$389.5 billion, down from \$376.8 billion in 2013. Total trade exports grew 74.4% from 2005 to 2014, while trade imports have grown 39.9% over the same period. Connecticut exports totaled \$15.9 billion and accounted for 6.4% of GSP in 2014. Over the past five years, Connecticut's exports have decreased by an average of 0.2%. Transportation equipment, nonelectrical machinery and computer and electronic equipment are Connecticut's largest exporting industries and comprise 66.9% of exports in 2014.

Defense Industry

Prime defense contracts tend to be a leading indicator of Connecticut's economic activity. In federal fiscal year (FFY) 2014, Connecticut contractors were awarded \$13.2 billion in defense related prime contracts, up 32.0% from the \$10.0 billion awarded in FFY 2013. However, as defense contract awards normally take several years to complete, the 3-year moving average is a better reflection of actual production activities. In FFY 2014, this average was \$12.0 billion.

Retail Trade

Connecticut's retail trade in FY 2015 totaled \$54.8 billion, a 1.1% increase over FY 2014. Growth in durable sales outpaced growth in non-durable sales in FY 2015, at 1.4% and 0.9% respectively. U.S. E-commerce sales continued their rapid growth, increasing an estimated 14.6% compared to a 2.6% increase in traditional retail sales. Connecticut retail trade as a percentage of disposable income decreased slightly to 27.8% in FY 2015 from 27.8% in FY 2014.

Economic Report of the Governor

Nonfinancial Debt

Total nonfinancial debt grew 126.9% between 2000 and 2014, far outpacing GDP growth of 68.7%. Federal indebtedness grew 253.1%, state and local government debt grew 144.4%, business debts grew 82.6% and household debts grew 92.6%. Connecticut's state government debt outstanding at the end of FY 2013 was \$32.4 billion, up from \$32.0 billion in FY 2012 and \$30.5 billion in FY 2011. Connecticut per capita state government debt was \$8,991 in FY 2013, compared to \$8,505 in FY 2011 and far above the fifty state average of \$3,590 in FY 2013.

Gross State Product

In calendar year 2014, Connecticut's real GSP increased 1.0% to \$228.9 billion in 2009 dollars, falling behind the U.S. and New England which saw increases of 2.2% and 1.6% respectively. Per capita real GSP in Connecticut was 29% higher than that of the U.S.

Personal Income

In fiscal year 2015, real personal income in Connecticut increased 3.3%, compared to 3.9% growth in the U.S. and 3.8% growth in New England. Connecticut's increase in real personal income in 2015 followed a slight decline in 2014 and represented the highest growth since fiscal year 2007. In FY 2015, Connecticut possessed the highest per capita personal income in the nation at \$66,011, a growth of 4.2% over FY 2014.

Economic Forecast

Connecticut's personal income is expected to increase 3.9% in FY 2016 and 3.8% in FY 2017 to \$246,456 and \$255,820 respectively. Connecticut is projected to add 24,700 jobs in FY 2016 and 15,900 jobs in FY 2017, or a respective 1.5% and 0.9% growth. The unemployment rate is projected to decline to 5.2% in FY 2016 and remain at that level in FY 2017.

Economic Report of the Governor

GENERAL CHARACTERISTICS OF THE STATE OF CONNECTICUT

Connecticut, settled in 1633, became the fifth state to ratify the United States Constitution in 1788. The state is the most southern of the New England states, located on the northeast coast and bordered by Long Island Sound, New York, Massachusetts and Rhode Island. Connecticut enjoys a favorable location within New England and the rest of the Eastern seaboard as rail, truck, air transport and ports in the region provide easy access to local and regional markets in this country, Canada, and even Europe and South America. Over one-quarter of the total population of the United States and more than 50% of the Canadian population live within a 500-mile radius of Connecticut.

Connecticut is highly urbanized with a population density of 738 persons for each of its 4,842.4 square miles of land, compared with 87 persons per square mile of land for the United States (3,531,905 square miles), based on 2010 census figures. Hartford, the capital, is a center for the insurance industry and a major service center for business and commerce. Industrial activity in the state is concentrated in two regions: the Naugatuck valley, extending from Bridgeport north, and a belt extending from Hartford west to New Britain and Bristol, and south to New Haven.

Connecticut is a mature and highly developed state, whose primary resources are the energies and skills of its citizens who have benefited from the state's rich historical heritage and have continued its tradition of economic, social and cultural growth.

Census Information

The census is taken on April 1 of each census year. The 2010 Census of Population and Housing was the 23rd in a series that began in 1790 (with a count of four million residents in 18 states).

TABLE 1
CENSUS POPULATION COUNTS
(In Thousands)

<u>Year</u>	<u>United States</u>		<u>New England</u>		<u>Connecticut</u>	
	<u>Number</u>	<u>% Growth</u>	<u>Number</u>	<u>% Growth</u>	<u>Number</u>	<u>% Growth</u>
1930	123,203	16.3	8,166	10.3	1,607	16.3
1940	132,165	7.2	8,437	3.3	1,709	6.3
1950	151,326	14.5	9,314	10.3	2,007	17.4
1960	179,323	18.5	10,509	12.8	2,535	26.3
1970	203,302	13.4	11,847	12.6	3,032	19.6
1980	226,542	11.4	12,349	4.2	3,108	2.5
1990	248,710	9.8	13,207	6.9	3,287	5.8
2000	281,422	13.2	13,923	5.4	3,406	3.6
2010	308,746	9.7	14,445	3.8	3,574	4.9

Source: U.S. Bureau of the Census

Economic Report of the Governor

In 2010, the population in the 50 states and the District of Columbia totaled 308.7 million people. Since 1930, the population has risen in all three data series for all decades. However, since 1970, the rate of population growth in Connecticut and New England has been significantly lower than the prior three decades and lower than the nation for recent periods.

In the United States, the resident population, which excludes armed forces overseas, increased from 281,421,906 in 2000 to 308,745,538 in 2010, an increase of 9.7%, and the lowest rate of increase since the 1930s. New England's population increased 3.8% from 2000 to 2010, also experiencing its slowest growth since the 1930s. Within New England, only Connecticut and New Hampshire experienced growth significantly higher than the regional average.

During the last few decades, the heavily populated states experienced a slowdown in the growth of their populations. This phenomenon was common in New England, the Middle Atlantic, the East North Central and the West North Central regions. The fastest growing states were those in the West, the South, the Pacific and the southern portion of the Mountain regions. The overall apportionment of seats in the U.S. House of Representatives generally changes as a result of each decennial census. Also, Connecticut's federal aid levels for certain grants will continue to fall as the state's estimated population size, relative to the nation's, decreases each year.

Resident population in Connecticut, according to figures from the 2010 census, was 3,574,097, an increase of 168,532 from the 3,405,565 figure of 2000. This represented growth of 4.9% for the decade, slower growth than was experienced by the nation as a whole for the fourth consecutive decade, but faster growth than New England for the first time since the 1960s. Between 2000 and 2010, the state's growth rate was the sixteenth lowest in the nation.

TABLE 2
COUNTY POPULATION IN CONNECTICUT

<u>County</u>	<u>2000 Census</u>	<u>2000 Percent</u>	<u>2010 Census</u>	<u>2010 Percent</u>	<u>Percent Change</u>
Fairfield	882,567	25.9	916,829	25.7	3.9
Hartford	857,183	25.2	894,014	25.0	4.3
Litchfield	182,193	5.3	189,927	5.3	4.2
Middlesex	155,071	4.6	165,676	4.6	6.8
New Haven	824,008	24.2	862,477	24.1	4.7
New London	259,088	7.6	274,055	7.7	5.8
Tolland	136,364	4.0	152,691	4.3	12.0
Windham	<u>109,091</u>	<u>3.2</u>	<u>118,428</u>	<u>3.3</u>	<u>8.6</u>
TOTAL	3,405,565	100.0	3,574,097	100.0	4.9

Source: U.S. Bureau of the Census

In the time since the 2010 census, Connecticut has experienced slow population growth. From 2014 to 2015, the state actually experienced a slight decline in population, for the second consecutive year. Following the Great Recession, migration around the country was hampered.

Economic Report of the Governor

However, Connecticut continued to experience net-outmigration during this time, putting downward pressure on population growth. The migration of population to and from Connecticut over the last few decades generally parallels the performance of the state's economy, rising during expansion and declining during recession. Connecticut counties experiencing faster growth during the 2000s generally were those not dominated by large urban areas.

The national population is estimated monthly by the United States Bureau of the Census for total population which includes armed forces overseas, resident population and civilian population. Population growth is a primary long-run determinant of the potential expansion path of the economy from both the supply and demand sides of the economy. The growth of the population and its composition have profound impacts on the labor force, education, housing, and the demand for consumer goods and services.

Annual estimates of population as of mid-calendar year for each state are vital for comparing standards of living through per capita income, productivity through per capita Gross State Product, or a state's private activity bond limitation which, under federal law, is capped at a level dependent upon the size of the population. Estimates are prepared by the U.S. Bureau of the Census based on the number of births and deaths as well as a variety of factors to approximate net migration changes. These factors can include Medicare enrollees, motor vehicle registrations, building permits, licensed drivers, and school enrollments. To comply with the Connecticut General Statutes concerning state aid to municipalities, the Department of Public Health also prepares an annual mid-year estimate of population based on the number of births, deaths and school age population.

TABLE 3
MID-YEAR POPULATION
(In Thousands)

<u>Mid Year</u>	<u>United States</u>		<u>New England</u>		<u>Connecticut</u>	
	<u>Number</u>	<u>% Growth</u>	<u>Number</u>	<u>% Growth</u>	<u>Number</u>	<u>% Growth</u>
2006	298,380	1.0	14,246	0.2	3,517	0.3
2007	301,231	1.0	14,279	0.2	3,527	0.3
2008	304,094	1.0	14,340	0.4	3,546	0.5
2009	306,772	0.9	14,404	0.4	3,562	0.5
2010	309,347	0.8	14,468	0.4	3,580	0.5
2011	311,719	0.8	14,527	0.4	3,590	0.3
2012	314,103	0.8	14,580	0.4	3,594	0.1
2013	316,427	0.7	14,637	0.4	3,597	0.1
2014	318,907	0.8	14,690	0.4	3,595	(0.1)
2015	321,419	0.8	14,728	0.3	3,591	(0.1)

Source: U.S. Bureau of the Census

In addition to naturally occurring births and deaths, the size of the total population is also a product of migration, the number of households and individuals moving into and out of the state. The Internal Revenue Service (IRS) publishes data on changes in filing addresses used by federal

Economic Report of the Governor

income tax filers in successive years, and changes in number of individuals claimed on a return can be used to estimate migration between states. This data shows that between 2008 and 2013 Connecticut experienced net outmigration of 53,498 residents with the largest net outflow to the state of Florida followed by North Carolina. Connecticut experienced a net gain in population from the state of New York.

TABLE 4
SIGNIFICANT MIGRATION PATTERNS IN STATE POPULATION

Changes in Connecticut's Population Due to Migration Between 2008 and 2013

<u>Major Sources of In Migration to Connecticut</u>		<u>Major Destinations of Out Migration from Connecticut</u>		<u>States with Greatest Impact On Connecticut Migration</u>	
New York	85,354	New York	(59,223)	New York	26,131
Massachusetts	29,843	Florida	(49,192)	Florida	(19,744)
Florida	29,448	Massachusetts	(35,870)	North Carolina	(8,083)
New Jersey	16,721	California	(19,413)	Massachusetts	(6,027)
California	15,145	North Carolina	(16,608)	Texas	(5,958)
Other States	127,531	Other States	(174,416)	Other States	(36,999)
Outside US	<u>10,835</u>	<u>Outside US</u>	<u>(13,653)</u>	<u>Outside US</u>	<u>(2,818)</u>
Total In	314,877	Total Out	(368,375)	Total Net	(53,498)

Source: Internal Revenue Service

The 2000 and 2010 census counts are available for each of the 169 cities and towns in Connecticut. Using that information, it is possible to identify those growing at the fastest rates as well as the slowest growing municipalities in the state as seen in the following table.

TABLE 5
FASTEST AND SLOWEST GROWING MUNICIPALITIES IN CONNECTICUT

<u>Fastest Growing Municipalities</u>				<u>Slowest Growing Municipalities</u>			
<u>City/Town</u>	<u>Population</u>		<u>% Change</u>	<u>City/Town</u>	<u>Population</u>		<u>% Change</u>
	<u>2000</u>	<u>2010</u>			<u>2000</u>	<u>2010</u>	
Oxford	9,821	12,683	29.1%	Cornwall	1,434	1,420	-1.0%
Mansfield	20,720	26,543	28.1%	North Canaan	3,350	3,315	-1.0%
Sterling	3,099	3,830	23.6%	Old Saybrook	10,367	10,242	-1.2%
Union	693	854	23.2%	Enfield	45,212	44,654	-1.2%
Ellington	12,921	15,602	20.7%	Branford	28,683	28,026	-2.3%
Lyme	2,016	2,406	19.3%	East Hampton	13,352	12,959	-2.9%
Middlebury	6,451	7,575	17.4%	Bridgewater	1,824	1,727	-5.3%
Haddam	7,157	8,346	16.6%	Salisbury	3,977	3,741	-5.9%
Warren	1,254	1,461	16.5%	Sharon	2,968	2,782	-6.3%
Canton	8,840	10,292	16.4%	Sherman	3,827	3,581	-6.4%
State Average Growth			4.9%				

Source: U.S. Bureau of the Census

Economic Report of the Governor

Households

Demand for goods and services depends upon the level of household income and the total number of households. The number of households is a function of household size and population: for example, for a given population, as the size of the household declines, the number of households increases, which causes higher demand for housing and automobiles as well as household goods and services.

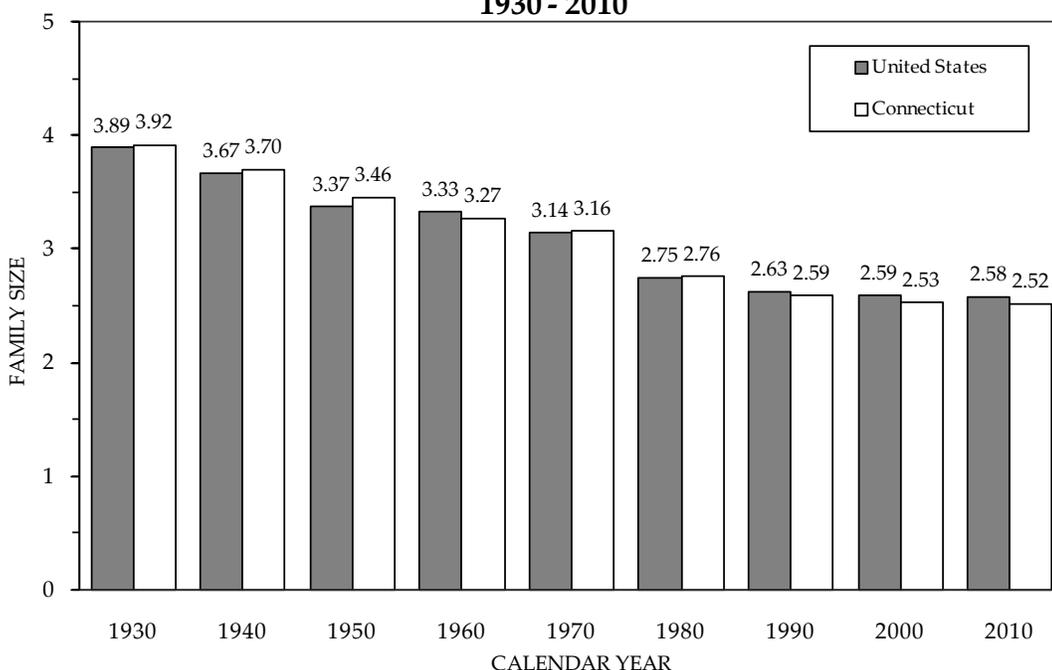
The number of households in Connecticut in 2010 was 1,371,087, up 5.3% from the 2000 Census estimate, and up 3.6% from the 2005 count. This is not unexpected in that it reflects the slow growth of Connecticut's population over the last several years. Family households include a householder and one or more other persons living in the same household who are related by birth, marriage or adoption. Non-family households include a householder living alone or with non-relatives.

TABLE 6
HOUSEHOLDS
(In Thousands)

<u>Calendar Year</u>	<u>Households</u>		<u>During Period</u>	<u>% Change</u>	
	<u>U.S.</u>	<u>Connecticut</u>		<u>U.S.</u>	<u>Connecticut</u>
2000	105,480	1,302	2000-2005	5.3%	1.7%
2005	111,091	1,324	2005-2010	5.1%	3.6%
2010	116,716	1,371	2000-2010	10.7%	5.3%

Source: U.S. Bureau of the Census

PERSONS PER HOUSEHOLD 1930 - 2010



Source: U.S. Bureau of the Census

Economic Report of the Governor

Between 1990 and 2010, the relatively stable population, the increasing number of households, and the changing mix in the types of households in Connecticut resulted in a decrease in average population per household in the state.

The decline in household size can be considered an indicator of social change. Society is adjusting its mores to fit the demands of new generations including delaying marriage, both delaying and having fewer children, and the establishment of one or two person households by career minded men and women. Other social changes that result in smaller households are the increase in the elderly population and the increasing number of one parent families that are the consequence of the general rise in the number of divorces.

Age Cohorts

According to the latest data available, the distribution of Connecticut's population between age cohorts is somewhat different from that of the U.S. average. The state has a lower concentration of persons aged 18 to 44 years than either New England or the nation as a whole, and a higher concentration of persons aged 65 and over (especially 85 and over) than the nation as a whole. Growth in this older age cohort in Connecticut will accelerate as baby boomers age. The aging population will put pressure on state spending requirements, which could be exacerbated by state revenues that are not growing at the same rate as during the late 1990s. The National Center for Health Statistics estimated average life expectancy at birth to be 78.7 years in 2010, up from 73.7 years in 1980, 75.4 years in 1990, and 76.8 years in 2000. As life spans continue to increase nationally, this trend will impact retirement, social security, pension systems, health care, and other similar requirements.

TABLE 7
POPULATION DISTRIBUTION BY AGE IN 2010
(In Thousands)

	<u>0 to 17</u>	<u>18 to 24</u>	<u>25 to 44</u>	<u>45 to 64</u>	<u>65 +</u>	<u>85 +</u>	<u>Total</u>
United States	74,181	30,672	82,135	81,489	40,268	5,493	308,746
% of Total	24.0	9.9	26.6	26.4	13.0	1.8	100
New England	3,151	1,429	3,689	4,135	2,042	324	14,445
% of Total	21.8	9.9	25.5	28.6	14.1	2.2	100
Connecticut	817	327	905	1,019	507	85	3,574
% of Total	22.9	9.1	25.3	28.5	14.2	2.4	100

Source: U.S. Bureau of the Census

Population Projections

The U.S. Bureau of the Census publishes population projections for the United States, while the Connecticut State Data Center at the University of Connecticut produces projections for the state. Based on these projections, the elderly population (those 65 years and over) will continue to grow

Economic Report of the Governor

substantially. The ratio of workers aged 20 to 64 to persons over the age of 65 is projected to decrease 35.7 percent, from 4.2 workers in 2010 to 2.7 workers in 2025.

**TABLE 8
PROJECTIONS OF THE POPULATION IN CONNECTICUT
(Mid-Year Resident Population In Thousands)**

<u>Age Group</u>	2000 <u>Census</u>	2010 <u>Census</u>	2015 <u>Proj.</u>	2020 <u>Proj.</u>	2025 <u>Proj.</u>	% Change <u>2010-2025</u>
Total	3,405.6	3,574.1	3,644.5	3,702.5	3,746.2	4.8
0-19	925.7	915.8	891.8	852.4	822.9	(10.1)
20-44	1,220.3	1,132.7	1,107.6	1,129.4	1,143.9	1.0
45-64	789.4	1,019.0	1,062.9	1,049.7	996.5	(2.2)
65 & Over	470.2	506.6	582.2	671.0	782.8	54.5
85 & Over	64.3	84.9	94.6	94.9	96.4	13.5
Ratio 20-64/65+	4.3	4.2	3.7	3.2	2.7	(35.7)

Source: U.S. Bureau of the Census, Connecticut State Data Center

This significant growth in the elderly population will impact both the size and complexity of the demand for services required by this segment of Connecticut's population. There will be increased demand and costs associated with health care facilities, public transportation, elderly housing, and other services. These changes are being driven by the baby boom generation, which began to reach the age of sixty-five in 2011.

More specifically, the following three tables call attention to some significant trends with particular implications to be considered as resource allocation decisions are made for the future. First, as shown in the following table, Connecticut is and will remain a very densely populated state in a very densely populated region of the country. This has implications for housing, transportation, law enforcement and natural resources, as well as other services.

**TABLE 9
POPULATION DENSITY BY YEAR
(Persons per Square Mile)**

	2000 <u>Census</u>	2010 <u>Census</u>	2015 <u>Projected</u>	2020 <u>Projected</u>	2025 <u>Projected</u>	% Change <u>2010-2025</u>
United States	79.7	87.4	91.0	94.7	98.3	12.5
Connecticut	703.3	738.1	752.6	764.6	773.6	4.8

Source: U.S. Bureau of the Census

In addition, a change is occurring in the age distribution of the population. The following table demonstrates that the elderly population is increasing in number while the non-elderly, on a

Economic Report of the Governor

relative scale, are decreasing. This means that increasing pressure will be brought upon those between the ages of 18 and 65 to provide social and support services for the young and, most particularly, the elderly.

TABLE 10
DEPENDENCY RATIOS*
(Number of Dependent Population per 100 Provider Population)

	<u>2000</u>	<u>2010</u>	<u>2015</u>	<u>2020</u>	<u>2025</u>
Total Dependency Ratio	61.6	58.9	60.8	64.0	68.3
Youth Dependency Ratio	41.5	38.2	36.8	36.3	36.3
Aged Dependency Ratio	20.1	20.7	23.9	27.7	31.9

* The dependency ratio is the number of the target dependent population (i.e., the aged or youth or the two groups combined) divided by the segment of the population which has traditionally provided for the dependent population, through taxes for health and social programs, volunteer activities, etc. The provider group is considered to be those older than 17 and less than 65 years of age.

Source: U.S. Bureau of the Census, Connecticut State Data Center

Finally, the racial and ethnic distribution of the state's population is changing. The white population is decreasing as a percentage of the total, as both the African-American and Hispanic groups increase as a percentage of the total population, with the Hispanic growth rate outpacing the African-American growth rate. Although Asians make up a very small percentage of the total population, Asians comprise the fastest growing group, while the American Indian population remains fairly stable. These same trends are occurring in the nation and the region.

TABLE 11
POPULATION DISTRIBUTION BY RACE AND YEAR
(Percent of Total Population Based On Each Census)

	United States			Northeast Region			Connecticut		
	<u>1990</u>	<u>2000</u>	<u>2010</u>	<u>1990</u>	<u>2000</u>	<u>2010</u>	<u>1990</u>	<u>2000</u>	<u>2010</u>
White	83.9	75.1	72.4	85.6	77.5	74.4	89.6	81.6	77.6
African-	12.3	12.3	12.6	11.4	11.4	11.8	8.6	9.1	10.1
Asian	3.0	3.6	4.7	2.7	4.0	5.5	1.6	2.4	3.8
American Indian	0.8	0.9	0.9	0.3	0.3	0.4	0.2	0.3	0.3
Two Or More	-	2.4	2.9	-	2.3	2.6	-	2.2	2.6
Other	-	5.6	6.4	-	4.6	5.3	-	4.4	5.6
Total	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0	100.0
Hispanic Origin	9.0	12.5	17.3	7.6	9.8	12.6	6.5	9.4	13.4

Note: The method of counting by race changed in 2000. Definitions of various race categories were changed and, for the first time, a respondent could indicate more than one race.

Source: U.S. Bureau of the Census

Economic Report of the Governor

Housing

The United States' financial systems underwent significant turmoil in the latter half of the last decade. Events in the housing sector, which prior to the Great Recession was one of the strongest pillars of the economy, played a pivotal role in precipitating the financial crisis and economic downturn. Record foreclosures due to the resetting of variable rate and subprime mortgages shocked the housing market and mortgage lenders, leading to the demise of some of the nation's largest financial institutions.

During the following years, homeowners watched the equity in their homes decline or disappear. Homes have not sold quickly, and they are still selling for less than they would have prior to the recession. Sluggish growth in the housing market, particularly in the single-family housing market, has had an impact on overall economic activity in the northeast. One leading indicator of strength in the housing market is the monthly National Association of Home Builders Housing Market Index (HMI), which gauges builder confidence in the demand for single-family homes. The index can range from 0 to 100; a reading over 50 indicates that the majority of builders view housing market conditions as good. During state fiscal year 2015, the average HMI reading for the nation was 56, the highest average since fiscal year 2006. By comparison, the average HMI reading for the northeast region during the same period was 43.

TABLE 12
HOUSING STARTS
(In Thousands)

<u>Fiscal</u> <u>Year</u>	<u>United States</u>		<u>New England</u>		<u>Connecticut</u>	
	<u>Number</u>	<u>% Growth</u>	<u>Number</u>	<u>% Growth</u>	<u>Number</u>	<u>% Growth</u>
2006	2,036.0	1.0	54.2	(3.4)	11.4	(5.2)
2007	1,546.2	(24.1)	41.6	(23.2)	8.8	(22.7)
2008	1,132.4	(26.8)	31.0	(25.3)	6.7	(24.0)
2009	646.3	(42.9)	18.6	(40.2)	3.8	(44.0)
2010	594.0	(8.1)	19.5	4.8	3.9	2.4
2011	569.7	(4.1)	18.7	(3.8)	3.5	(8.0)
2012	684.4	20.1	20.2	8.1	3.7	3.3
2013	876.7	28.1	24.4	20.7	5.4	48.0
2014	953.2	8.7	26.4	7.9	4.7	(13.1)
2015	1,055.0	10.7	26.8	1.5	4.8	2.8

Source: U.S. Department of Commerce, Bureau of the Census, IHS.

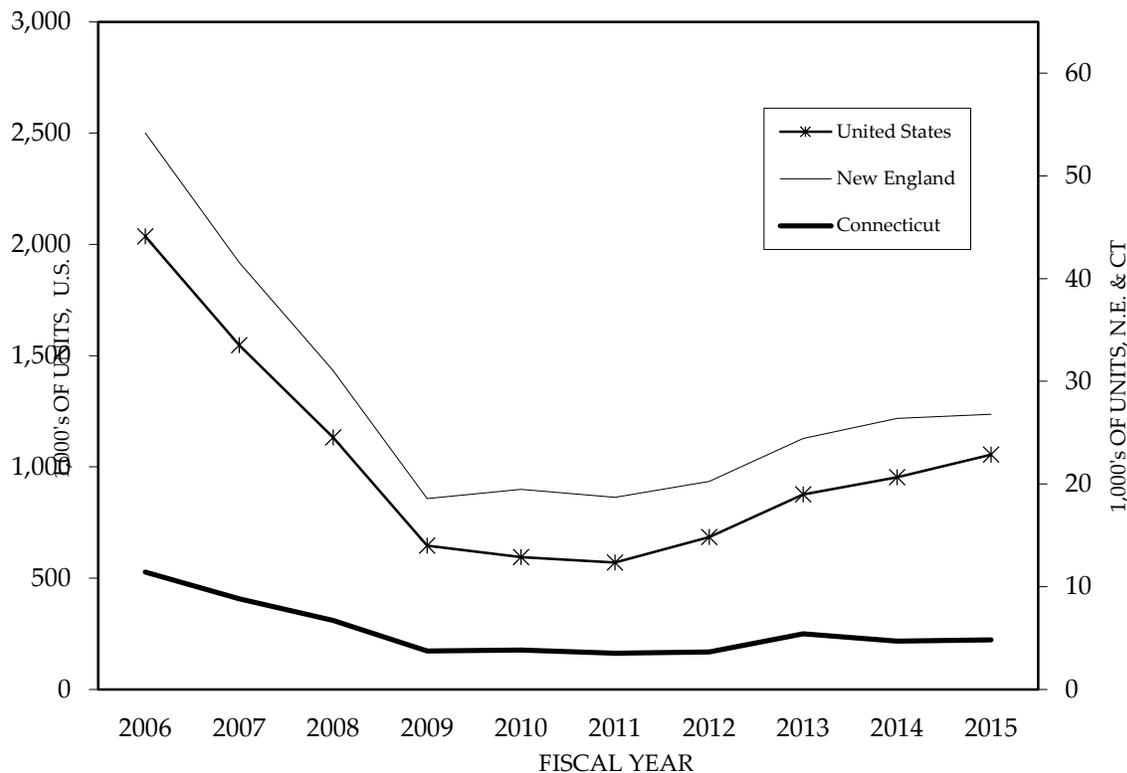
Starts, or the number of housing units on which construction has begun, fell to record lows in FY 2011. In calendar 2009 fewer homes were started in the United States than in any year since the end of World War II, even though the United States population was more than two times greater than the population in 1945. The dramatic decline in housing starts in the aftermath of the Great

Economic Report of the Governor

Recession negatively impacted homebuilders, among others in the construction sector, and undoubtedly contributed to the high unemployment rate nationwide.

Recent housing market indicators in Connecticut and the nation have been mixed. The number of total housing starts increased in state fiscal year 2015 in the United States, New England, and Connecticut. However, single-family starts in Connecticut decreased by 12% in fiscal year 2015, while multi-family starts reached their highest level since fiscal year 1990.

HOUSING STARTS BY FISCAL YEAR



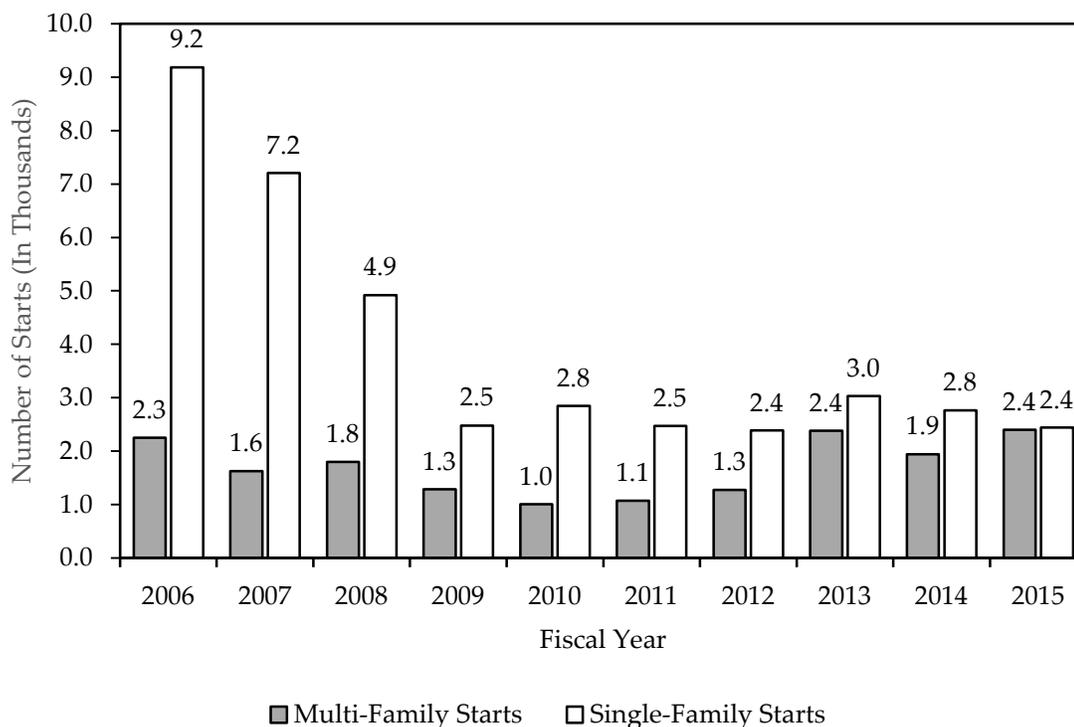
Source: U.S. Department of Commerce, Bureau of the Census, IHS

While starts have begun to recover from lows experienced in the aftermath of the Great Recession, the mix of housing starts is significantly different than it was prior to the crisis in the housing market. In Connecticut in particular, starts in multi-family housing units have recovered to pre-recession levels, while starts in single-family units have languished. This change may be driven by demographic changes and shifting preferences in the state. As the size of the average household has decreased and the Connecticut population has aged, demand for smaller and more affordable housing units has increased. The following graph shows both single- and multi-family housing starts in Connecticut by fiscal year. The chart shows that, over the last decade, the balance between single- and multi-family charts has shifted. In fiscal year 2006, multi-family units

Economic Report of the Governor

accounted for 19.7% of all housing starts in Connecticut. In 2015, multi-family units accounted for 49.6% of all housing starts.

CONNECTICUT SINGLE-FAMILY AND MULTI-FAMILY STARTS (In Thousands)



Source: U.S. Department of Commerce, Bureau of the Census, IHS

Census data from calendar years 2003 to 2007 indicates Americans built over 8.9 million units of housing while the number of households grew by only 6.7 million. As a result, the United States entered the last recession with an excess of housing units from the prior five years. However, during the period from calendar years 2008 to 2014, household formations outpaced completed housing units, 7.2 million to 5.4 million.

Given that housing starts were low through the recent recession, it is no surprise that household formation has also been depressed. New households may be formed when couples separate, children move out of their family's home and when individuals live singly after previously sharing a residence. Conversely, households are reduced when young people move back home with their parents, and households combine to lower expenses. Economic conditions have promoted the latter behavior in recent years.

Economic Report of the Governor

TABLE 13
U.S. HOUSEHOLD FORMATIONS
(In Thousands)

Calendar <u>Year</u>	Total Number of <u>Households</u>	Change in Households from <u>Previous Year</u>
2005	113,343	1,343
2006	114,384	1,041
2007	116,011	1,627
2008	116,783	772
2009	117,181	398
2010	117,538	357
2011	119,927	2,389
2012	121,084	1,157
2013	122,459	1,375
2014	123,229	770

Source: U.S. Bureau of the Census

TABLE 14
CONNECTICUT HOUSING PERMIT ACTIVITY
Calendar Year 2014

<u>County</u>	Total Units		% Growth
	<u>Authorized</u>	<u>% of Total</u>	<u>Over CY 2013</u>
Fairfield	1,889	35.4	(24.5)
Hartford	962	18.1	(9.5)
Litchfield	145	2.7	(8.2)
Middlesex	228	4.3	(2.6)
New Haven	1,140	21.4	39.9
New London	646	12.1	73.7
Tolland	203	3.8	11.5
Windham	<u>116</u>	<u>2.2</u>	<u>17.2</u>
State Total	5,329	100.0	(1.8)

Source: Connecticut Department of Economic and Community Development

Economic Report of the Governor

A leading indicator of construction activity is the number of building permits issued by local authorities authorizing construction. Table 14 shows the Connecticut counties in which privately owned housing permits were issued in calendar 2014, demonstrating the geographic distribution of housing construction activity in Connecticut.

Construction is ultimately undertaken for all but a very small percentage of housing units authorized by permits. A major portion typically gets under way during the month of permit issuance and most of the remainder begins within the three following months. Because of this lag, the number of housing permits issued does not represent the number of units actually put into construction for the period shown and should not be interpreted as housing starts.

Housing permit activity in Connecticut decreased 1.8% in calendar year 2014, following increases of 16.2% in 2013 and 47.1% in 2012. In 2014, half of Connecticut's eight counties experienced an increase in housing permit activity over 2013. New London County experienced growth of more than 70%, reaching its highest level of starts since 2007. New Haven followed with nearly 40% growth, while Windham and Tolland Counties experienced growth between 10% and 20%. Permit activity decreased by less than 10% in Hartford, Litchfield, and Middlesex Counties, while permits in Fairfield County decreased by nearly 25%.

Residential demolition permits issued during calendar year 2014 totaled 1,240, a decrease of 11.2% over calendar year 2013. Fairfield County issued the most demolition permits with 562, followed by Hartford (243) and New Haven (234). According to the Census Bureau, Connecticut had an estimated 1,490,381 housing units in 2014. The following table shows changes in Connecticut's housing unit inventory on a calendar year basis from 2013 to 2014.

**TABLE 15
CONNECTICUT HOUSING INVENTORY**

<u>Structure Type</u>	<u>Inventory</u> <u>2013</u>	<u>% of</u> <u>Total</u>	<u>Inventory</u> <u>2014</u>	<u>% of</u> <u>Total</u>	<u>Net</u> <u>Change</u>	<u>Growth</u> <u>Rate</u>
One-Unit	962,096	64.7	962,877	64.6	781	0.08%
Two-Units	119,386	8.0	120,070	8.1	684	0.57%
Three & Four Units	132,699	8.9	133,452	9.0	753	0.57%
Five Or More Units	259,963	17.5	261,866	17.6	1,903	0.73%
Other	<u>12,851</u>	<u>0.9</u>	<u>12,116</u>	<u>0.8</u>	<u>-735</u>	-5.72%
Total Inventory	1,486,995	100.0	1,490,381	100.0	3,386	0.23%

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

Economic Report of the Governor

Median Sales Price of Housing

Median sales price is the midpoint at which half of the sales are above and half below the price. The median sales price data shown in the following table is for the sale of existing single-family homes. The median sales price in Connecticut in 2014 was \$276,226. The United States experienced an increase of 5.7% in the median sales price in 2014 over 2013, compared to an increase of 0.8% in Connecticut. However, Connecticut has fared slightly better than the United States in the last decade with a decrease in median home price of 4.4% compared to 4.8% nationally.

TABLE 16
SALES PRICE OF EXISTING HOMES IN CONNECTICUT AND THE UNITED STATES
(By Calendar Year)

Calendar Year	Median Price U.S.	% Change	Median Price CT	% Change	CT as a % of U.S.	U.S. Affordability Index
2005	\$217,492		\$289,002		132.9	113.7
2006	\$221,883	2.0	\$304,828	5.5	137.4	107.7
2007	\$215,517	(2.9)	\$309,763	1.6	143.7	117.0
2008	\$195,775	(9.2)	\$300,755	(2.9)	153.6	139.0
2009	\$172,492	(11.9)	\$290,903	(3.3)	168.6	172.3
2010	\$172,742	0.1	\$283,569	(2.5)	164.2	172.6
2011	\$164,933	(4.5)	\$275,323	(2.9)	166.9	188.0
2012	\$175,783	6.6	\$269,977	(1.9)	153.6	197.4
2013	\$195,933	11.5	\$274,068	1.5	139.9	179.7
2014	\$207,125	5.7	\$276,226	0.8	133.4	167.8
05-14 Change	(\$10,367)	(4.8)	(\$12,776)	(4.4)		
CAGR*		(0.5)		(0.5)		

*Compound Annual Growth Rate for period of 2005-2014

Source: IHS

The U.S. housing affordability index decreased for the second year in a row in calendar year 2014. To interpret the housing affordability index, a value of 100 means that a family with the median income has exactly enough income to qualify for a mortgage on a median-priced home, assuming a 20% down payment. A value above 100 signifies that a family earning the median income has more than enough income to qualify for a mortgage loan on a median-priced home. The affordability index remains favorable, in part because the median housing price has not fully recovered from the housing crisis in either Connecticut or the nation.

Economic Report of the Governor

Total Home Sales

Total home sales have not returned to levels experienced prior to the housing crisis. Causes may include deferred household formations, stricter lending standards, decreased speculation, and a trend toward renting instead of owning. The table below shows home sales for Connecticut, New England, and the United States by state fiscal year. In fiscal year 2015, home sales decreased for the second year in a row in Connecticut, while increasing in New England and the United States.

TABLE 17
Total Home Sales
(In Thousands)

Fiscal Year	United States*		New England*		Connecticut	
	Number	% Change	Number	% Change	Number	% Change
2006	6,821.4	(0.1)	313.7	(1.9)	75.5	(2.2)
2007	5,760.2	(15.6)	265.3	(15.4)	64.2	(15.0)
2008	4,371.0	(24.1)	201.1	(24.2)	46.8	(27.1)
2009	3,941.0	(9.8)	169.8	(15.6)	35.8	(23.4)
2010	4,550.6	15.5	209.5	23.4	44.5	24.2
2011	3,920.1	(13.9)	171.4	(18.2)	35.7	(19.7)
2012	4,251.7	8.5	184.6	7.7	38.0	6.2
2013	4,700.5	10.6	207.1	12.2	43.8	15.5
2014	4,745.3	1.0	206.7	(0.2)	42.9	(2.2)
2015	4,882.0	2.9	207.7	0.5	42.3	(1.4)

Source: National Association of Retailers, IHS

* Sum of States' Home Sales

Age of Buyer or Renter

As Table 8 demonstrates, current population projections anticipate a slight increase in the 20-44 year old age group of 1.0% between 2010 and 2025. This is significant in the housing market for two reasons. First, this age group is the prime source of household formation. Consequently, slow growth within this age group will equate to slow formation of new households, reducing demand for starter homes. Moreover, weak demand for starter homes makes it harder for maturing families who already own starter homes to move up, thus reducing demand and appreciation throughout the housing market.

The age group of citizens 65 and older grew during the 2000s at a rate of 7.7%. This age group is projected to continue to grow rapidly during the next ten years. Projected growth rates of the 65 and older age group are 54.5% from 2010 to 2025. With the growth in this demographic, the housing market will see a shift in the type of housing units that are desirable. As baby-boomers

Economic Report of the Governor

become empty-nesters, many will trade-down their large homes for smaller, easier to maintain homes. Demand for rental and condo units, particularly those targeted toward the elderly, will accelerate and boost the state's housing market. However, as the elderly population expands, additional benefits and services to care for this group will be required.

Government Responses to the Housing Market

The federal government has taken several steps to mitigate the effects of the decline and subsequently slow recovery of the housing market. The Making Home Affordable (MHA) program offers services intended to stabilize the housing market and assist current homeowners facing financial duress. The Home Affordable Modification Program (HAMP) is available for homeowners facing imminent default. Through the second quarter of 2015, HAMP had nearly one million active permanent loan modifications. Over 20,000 permanent modifications were started in Connecticut; the median monthly payment reduction in the state was \$526.60. The Home Affordable Refinancing Program (HARP) is available for mortgages owned or guaranteed by Fannie Mae or Freddie Mac which are underwater: the outstanding balance on the loan exceeds the fair market value of the home. As of February 2015, HARP helped nearly 3.3 million homeowners refinance. The HAMP and HARP programs are currently set to expire on December 31, 2016.

Changes in Housing Finance

In calendar year 2014, thirty-year fixed mortgage rates averaged 4.17%, up from 3.98% in 2013 and 3.66% in 2012. Rates were lower through most of 2015, and stood at 3.94% as of November 2015, according to Freddie Mac. Uncertainty in global financial markets has caused investors to seek the safety of treasury bonds in recent years, which has put downward pressure on mortgage interest rates.

Most recent reports on foreclosure rates indicate positive change. The Mortgage Bankers Association reported that mortgages 90 days or more past due declined to 3.57% of all mortgages in the U.S. in the third quarter of 2015, down a full percentage point from the third quarter of 2014. Both delinquency rates and foreclosure rates are at their lowest level since 2007.

Home Equity

A home's equity is calculated by taking the current market value of the home and subtracting the outstanding mortgage balance. This measure shows the amount of ownership homeowners have in their home. A decrease in home equity occurs if there is an increase in the amount of debt homeowners are taking on to pay for their homes or if housing values decline. An increase in home equity may occur if housing values increase or if there is a decrease in the amount of debt issued to homebuyers. According to the Federal Reserve, owners' equity as a percentage of household real estate declined to its lowest levels since World War II during the Great Recession. From 2000 to 2009 home equity dropped 36%, from 60.6% in 2000 to 38.7% in 2009. Home equity

Economic Report of the Governor

has increased in recent years and reached 54.6% in 2014, the highest level since 2006. The overall decline during the 2000's is likely due to a combination of increasing home mortgage debt and sharp declines in home values due to the 2008 recession. While home values have recovered to their highest level since 2006, home mortgages have continued to decline through the most recent economic expansion as existing homeowners continue to pay down their mortgages and home sales remain low by historical standards.

TABLE 18
OWNERS' EQUITY AS A PERCENTAGE OF HOUSEHOLD REAL ESTATE
(In Billions)

Calendar <u>Year</u>	Home <u>Values*</u>	Home <u>Mortgages*</u>	Home <u>Equity</u>
1945	116.0	18.7	83.9%
1950	243.3	45.3	81.4%
1955	367.4	87.9	76.1%
1960	486.9	141.4	71.0%
1965	605.6	219.4	63.8%
1970	874.5	286.0	67.3%
1975	1,413.7	459.1	67.5%
1980	2,943.2	926.5	68.5%
1985	4,699.0	1,450.2	69.1%
1990	6,796.7	2,489.3	63.4%
1995	8,055.5	3,319.2	58.8%
2000	12,212.5	4,813.9	60.6%
2005	22,038.5	8,912.5	59.6%
2006	22,508.1	9,910.2	56.0%
2007	20,674.1	10,613.0	48.7%
2008	17,460.6	10,580.1	39.4%
2009	17,001.2	10,419.3	38.7%
2010	16,422.5	9,915.4	39.6%
2011	16,108.7	9,695.8	39.8%
2012	17,535.3	9,486.7	45.9%
2013	19,651.3	9,403.7	52.1%
2014	20,713.8	9,403.2	54.6%

Source: Federal Reserve "Flow of Funds" Table B.100 and L.100

* In Nominal Dollars

Economic Report of the Governor

EMPLOYMENT PROFILE

Employment Estimates

The employment estimates for most of the tables included in this section are from the U.S. Bureau of Labor Statistics and the Connecticut Labor Department. They are developed as part of the federal-state cooperative Current Employment Statistics (CES) Program. The estimates for the state and the labor market areas are based on the responses to surveys of 5,000 Connecticut employers registered with the Unemployment Insurance program. Companies are chosen to participate based on specifications from the U.S. Bureau of Labor Statistics. As a general rule, all large establishments are included in the survey as well as a sample of smaller employers. It should be noted, however, that this method of estimating employment may result in undercounting jobs created by agricultural and private household employees, self-employed individuals and unpaid family workers who are not included in the sample. The survey only counts total business payroll employment in the economy.

In an effort to provide a broader employment picture, the following table, based on residential employment, was developed. Total residential employment is estimated based on household surveys which include individuals excluded from establishment employment figures such as self-employed and workers in the agricultural sector. By this measure, residential employment in fiscal year 2015 increased by 43,053 jobs. Likewise, the level of establishment employment based on the survey response increased by 19,892 jobs in fiscal year 2015.

The following table provides a ten fiscal year historical profile of residential and establishment employment in Connecticut.

TABLE 19
CONNECTICUT SURVEY EMPLOYMENT COMPARISONS
(In Thousands)

<u>Fiscal Year</u>	<u>Residential Employment</u>	<u>% Growth</u>	<u>Establishment Employment</u>	<u>% Growth</u>
2006	1,728.81	2.10	1,670.77	0.82
2007	1,762.60	1.95	1,689.77	1.14
2008	1,777.71	0.86	1,706.33	0.98
2009	1,757.33	(1.15)	1,664.72	(2.44)
2010	1,728.76	(1.63)	1,605.95	(3.53)
2011	1,740.26	0.67	1,618.57	0.79
2012	1,741.69	0.08	1,633.68	0.93
2013	1,719.85	(1.25)	1,647.18	0.83
2014	1,741.36	1.25	1,658.57	0.69
2015	1,784.41	2.47	1,678.46	1.20

Source: U.S. Bureau of Labor Statistics, Connecticut Department of Labor, IHS Economics

Economic Report of the Governor

Nonagricultural Employment

Nonagricultural employment includes all persons employed except federal military personnel, the self-employed, proprietors, unpaid family workers, farm and household domestic workers. Nonagricultural employment is comprised of the broad manufacturing sector and the nonmanufacturing sector. These two components of nonagricultural employment are discussed in detail in the following sections.

The following table shows a ten fiscal year historical profile of nonagricultural employment in the United States, the New England region, and Connecticut.

TABLE 20
NONAGRICULTURAL EMPLOYMENT
(In Thousands)

Fiscal <u>Year</u>	United States		New England		Connecticut	
	<u>Number</u>	<u>% Growth</u>	<u>Number</u>	<u>% Growth</u>	<u>Number</u>	<u>% Growth</u>
2006	135,317	1.92	6,966	0.81	1,671	0.82
2007	137,295	1.46	7,036	1.00	1,690	1.14
2008	138,084	0.57	7,087	0.72	1,706	0.98
2009	134,299	(2.74)	6,944	(2.01)	1,665	(2.44)
2010	130,090	(3.13)	6,774	(2.45)	1,606	(3.53)
2011	130,912	0.63	6,825	0.76	1,619	0.79
2012	133,003	1.60	6,906	1.18	1,634	0.93
2013	135,184	1.64	6,987	1.19	1,647	0.83
2014	137,604	1.79	7,074	1.24	1,659	0.69
2015	140,561	2.15	7,175	1.43	1,678	1.20

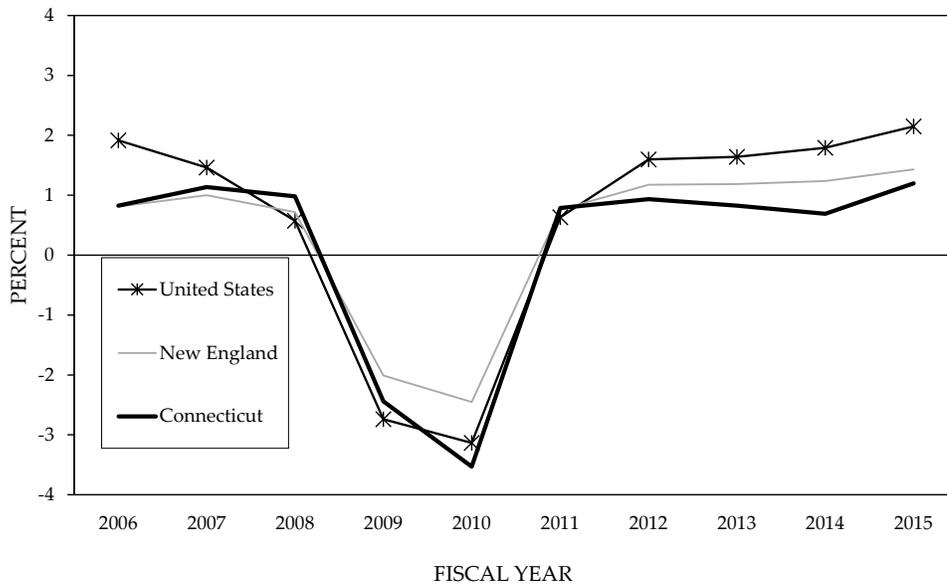
Source: U.S. Bureau of Labor Statistics, Connecticut Labor Department, IHS Economics

In Connecticut, approximately 47% of total personal income is derived from wages earned by workers classified in the nonagricultural employment sector. Thus, increases in employment in this sector lead to increases in personal income growth and consumer demand. In addition, nonagricultural employment can be used to compare similarities and differences between economies, whether state or regional, and to observe structural changes within. These factors make nonagricultural employment figures a valuable indicator of economic activity.

Connecticut experienced positive growth in nonagricultural employment from fiscal year 2004 through fiscal year 2008. After reaching a peak in fiscal year 2008, Connecticut lost approximately 100,000 nonagricultural jobs due to the Great Recession. As of fiscal year 2015 Connecticut had regained approximately 72,500 nonagricultural jobs. The following chart provides a graphic presentation of the growth rates in nonagricultural employment for the state, New England region and nation over a ten fiscal year period.

Economic Report of the Governor

NONAGRICULTURAL EMPLOYMENT FISCAL YEAR GROWTH PERCENT



Source: U.S. Bureau of Labor Statistics, Connecticut Labor Department, IHS Economics

The following table shows employment growth rates for the United States and the State of Connecticut over six decades beginning in state fiscal year 1950. This table highlights the robust growth of nonagricultural employment for Connecticut prior to 1990 juxtaposed against the modest 2.2% growth between 1990 and 2000 and the negative 4.5% growth during the 2000-2010 time period which was significantly impacted by the Great Recession. U.S. growth was negative in the 2000-2010 period for the first time in five decades with a 0.5% decline. Since 2010, employment growth has increased for both the United States and Connecticut by 8.0% and 4.5% respectively.

TABLE 21
NONAGRICULTURAL EMPLOYMENT
LONG-TERM GROWTH RATES
(Not Seasonally Adjusted)

Fiscal Year	Growth Rates		Cumulative Growth Rates	
	United States	Connecticut	United States	Connecticut
1950-1960	23.4%	24.6%	23.4%	24.6%
1960-1970	31.6%	31.9%	62.4%	64.4%
1970-1980	27.3%	17.8%	106.7%	93.6%
1980-1990	20.4%	16.1%	148.8%	124.8%
1990-2000	20.0%	2.2%	198.7%	129.7%
2000-2010	(0.5%)	(4.5%)	197.1%	119.3%
2010-2015	8.0%	4.5%	221.0%	129.2%

Source: U.S. Bureau of Labor Statistics

Economic Report of the Governor

Throughout the last two decades, while manufacturing employment in Connecticut has been steadily declining, employment growth in nonmanufacturing industries has surged. Relatively rapid growth in the nonmanufacturing sector is a trend that is evident nationwide and reflects the increased importance of the service industry. This shift in employment provides for relatively more stable economic growth in the long run through the moderation of the peaks and troughs of economic cycles. In fiscal year 2015, approximately 90% of the state’s workforce was employed in nonmanufacturing jobs, up from roughly 50% in the early 1950s.

The following table depicts the decrease in the ratio of manufacturing employment to total employment in Connecticut over the last six decades.

TABLE 22
CONNECTICUT RATIO OF MANUFACTURING EMPLOYMENT
TO TOTAL EMPLOYMENT
(In Thousands)

<u>Fiscal Year</u>	<u>Total Employment</u>	<u>Manufacturing Employment</u>	<u>NonMfg. Employment</u>	<u>Mfg. Employment as a Percentage of Total Employment</u>
1950	766.1	379.9	386.2	49.6
1955	874.7	423.2	451.6	48.4
1960	915.2	407.1	508.1	44.5
1965	1,033.0	436.2	596.8	42.2
1970	1,198.1	441.8	756.3	36.9
1975	1,224.6	389.8	834.8	31.8
1980	1,428.4	440.8	987.6	30.9
1985	1,558.2	408.0	1,150.2	26.2
1990	1,623.5	341.0	1,282.5	21.0
1995	1,556.4	251.9	1,304.6	16.2
2000	1,682.1	236.8	1,445.4	14.1
2005	1,657.1	196.4	1,460.7	11.9
2010	1,605.9	165.5	1,440.4	10.3
2015	1,678.5	159.5	1,519.0	9.5

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

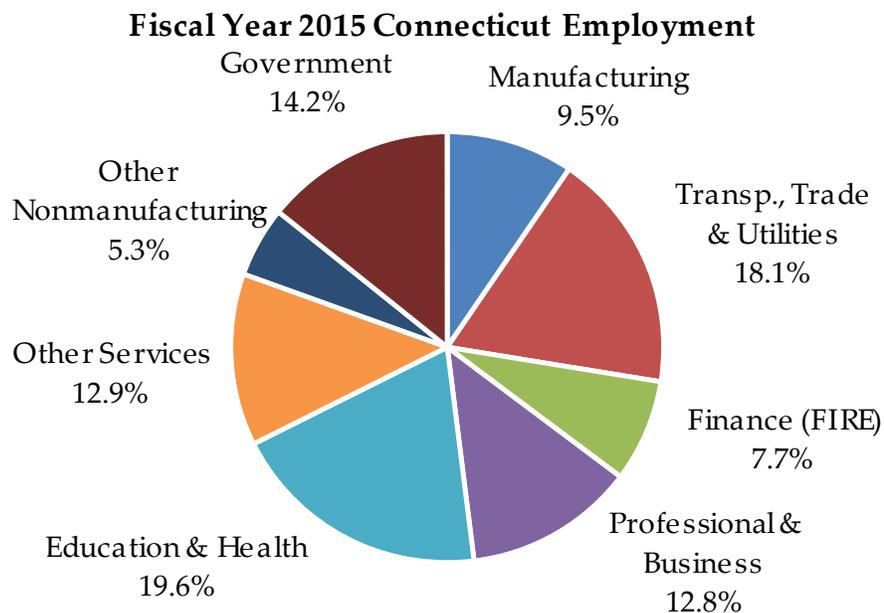
The graph on the right provides a breakdown of Connecticut employment in fiscal year 2015. As is evident, Connecticut employment is highly concentrated in nonmanufacturing employment sectors with only 9.5% of Connecticut laborers employed in the manufacturing sector. The services sector, which includes the professional and business, education and health, and leisure and hospitality segments (included in Other Services), is clearly the leading sector with 41.5% of those working employed in that classification.

Economic Report of the Governor

Manufacturing Employment

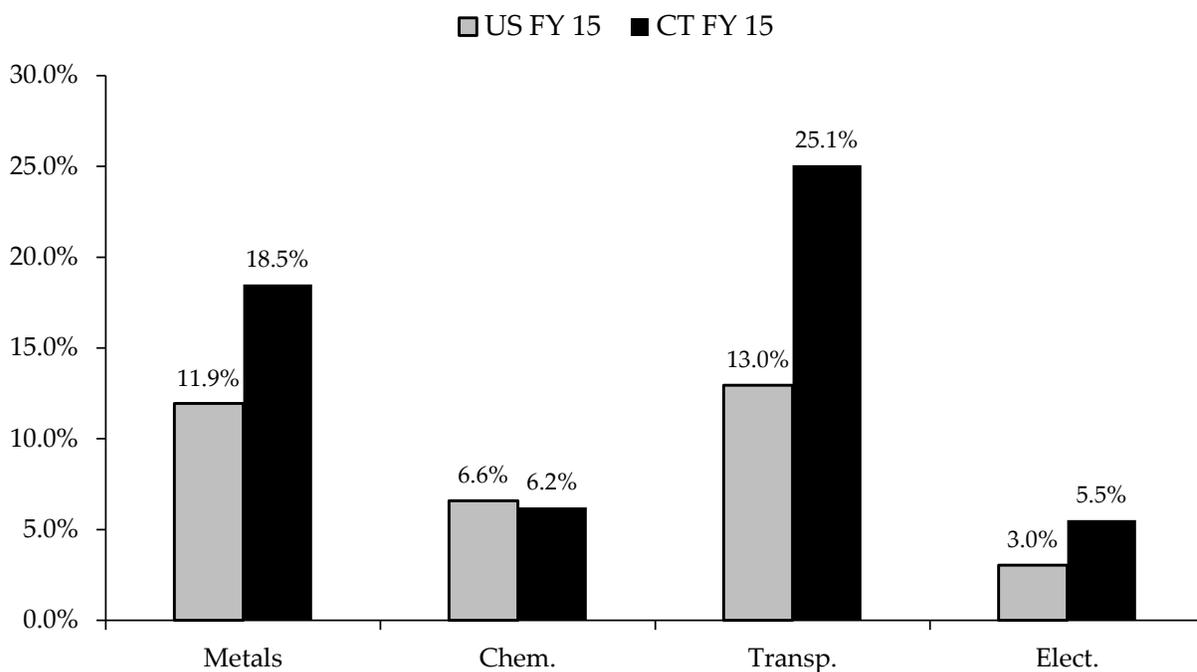
Even with declines in overall manufacturing employment, the ratio of manufacturing employment to total employment still defines Connecticut as one of the major manufacturing and industrial states in the country. Based on the level of personal income derived from this sector, Connecticut ranks twentieth in the nation for its dependency on manufacturing. Within this broad definition, the manufacturing sector can be further broken down into several major components.

Over the last decade the state's distribution of manufacturing employment has remained relatively stable. Defense expenditures have stabilized the transportation equipment sector as evidenced by the percentage of total state manufacturing employment in that sector at 22.0% in fiscal year 2005 and 25.1% in fiscal year 2015. The fabricated metals production sector employment figures as a percent of total state manufacturing have remained stable over the past decade at approximately 17.3% in fiscal 2005 and 18.5% in fiscal 2015. The other major manufacturing sectors, electrical equipment and appliances and chemicals, make up approximately 5.5% and 6.2% of the total manufacturing sector respectively in fiscal 2015. The distribution of employment figures within the manufacturing sector highlights that Connecticut manufacturing is diversified, but has a greater reliance on the metals and transportation equipment sectors.



Economic Report of the Governor

COMPARISON OF MANUFACTURING EMPLOYMENT IN CERTAIN SECTORS (As A Percentage Of Total Manufacturing Employment)



Source: U.S. Bureau of Labor Statistics, Connecticut Labor Department, IHS Economics

In fiscal year 2015, manufacturing employment in the state and New England declined by 0.98% and 0.30% respectively. In contrast, the United States continued an upward trend with a growth rate of 1.62%.

TABLE 23
MANUFACTURING EMPLOYMENT
(In Thousands)

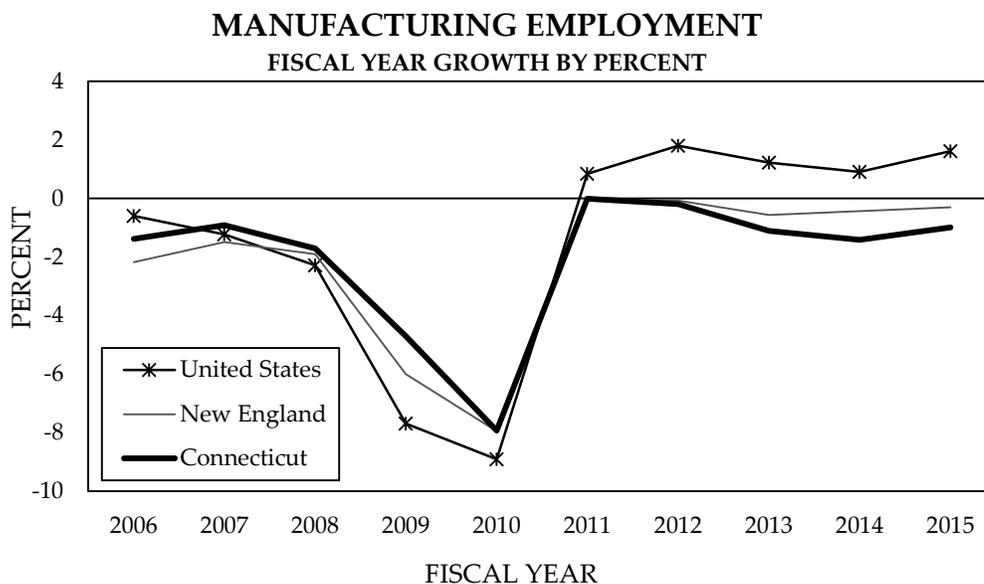
Fiscal Year	United States		New England		Connecticut	
	Number	% Growth	Number	% Growth	Number	% Growth
2006	14,204.3	(0.59)	726.0	(2.18)	193.7	(1.38)
2007	14,030.3	(1.22)	715.2	(1.49)	191.9	(0.91)
2008	13,710.1	(2.28)	701.5	(1.90)	188.7	(1.70)
2009	12,655.1	(7.70)	659.4	(6.00)	179.8	(4.71)
2010	11,527.7	(8.91)	607.0	(7.95)	165.5	(7.93)
2011	11,624.7	0.84	606.6	(0.06)	165.5	(0.01)
2012	11,833.8	1.80	606.2	(0.07)	165.2	(0.19)
2013	11,978.3	1.22	602.8	(0.57)	163.3	(1.11)
2014	12,086.8	0.64	600.2	(0.43)	161.1	(1.41)
2015	12,282.5	1.62	598.3	(0.30)	159.5	(0.98)

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

Economic Report of the Governor

Historically, manufacturing employment closely parallels the business cycle, typically expanding when the economy is healthy and contracting during recessionary periods, as it did during the early 1980s. However, this relationship changed in the latter part of the 1980s, as contractions in manufacturing employment were not initially accompanied by a recession. Other factors, such as heightened foreign competition, smaller defense budgets, and improved productivity, played a significant role in affecting the overall level of manufacturing employment in Connecticut.

The erosion of the state's manufacturing base reflects the national trend away from traditional industries, both durable and nondurable. More of U.S. demand is being satisfied by foreign producers who can manufacture goods more cheaply. The upward trend of higher productivity has enabled Connecticut manufacturers to make more with fewer workers. Even with the structural change, manufacturing employment in Connecticut still accounts for 9.5% of all nonfarm payroll jobs, compared with 8.7% in the U.S. and 8.3% in New England through fiscal year 2015. The following table provides a breakdown of the state's manufacturing employment by industry and indicates percentage changes for the year and for a ten year period for each of the manufacturing sectors.



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

Manufacturing employment showed no signs of improvement in fiscal year 2015 over fiscal year 2014. Printing and related support activities was the only industry with employment growth of 0.3% over fiscal year 2015. The largest reductions in employment were seen in electrical equipment and appliances which dropped 5.2%, and chemicals production which dropped 2.6% over the same period. The percent change from fiscal year 2006 to 2015 demonstrates the overall decline in manufacturing employment over the last decade.

Economic Report of the Governor

TABLE 24
CONNECTICUT MANUFACTURING EMPLOYMENT BY INDUSTRY
(In Thousands)

<u>Industry</u>	FY	FY	FY	Percent Change	
	<u>2006</u>	<u>2014</u>	<u>2015</u>	FY 2014 to <u>FY 2015</u>	FY 2006 to <u>FY 2015</u>
Transportation Equipment	43.6	40.6	40.0	(1.7)	(8.3)
Fabricated Metal Production	33.8	30.1	29.5	(2.1)	(12.6)
Electrical Equipment & Appl.	10.5	9.3	8.8	(5.2)	(15.8)
Chemicals	16.4	10.2	9.9	(2.6)	(39.4)
Printing & Related Support	8.0	5.1	5.1	0.3	(35.9)
Industrial Machinery	18.0	14.0	13.9	(1.0)	(22.9)
All Other	63.5	51.7	52.3	1.2	(17.7)
Total Mfg. Employment	193.7	161.1	159.5	(1.0)	(17.7)

Source: U.S. Bureau of Economic Analysis, Connecticut Labor Department, IHS Economics

Economic Report of the Governor

The following table ranks the 50 states in terms of their relative dependence on manufacturing wages as a percentage of total personal income.

TABLE 25
MANUFACTURING WAGES AS A PERCENT OF PERSONAL INCOME BY STATE
Fiscal Year 2015
(In Millions)

<u>Rank</u>	<u>State</u>	<u>Personal</u> <u>Income</u>	<u>Mfg.</u> <u>Wage</u>	<u>%</u>	<u>Rank</u>	<u>State</u>	<u>Personal</u> <u>Income</u>	<u>Mfg.</u> <u>Wage</u>	<u>%</u>
1	Indiana	\$266,219	\$31,852	11.96%	26	Georgia	\$403,949	\$21,153	5.24%
2	Wisconsin	258,418	26,939	10.42%	27	Maine	54,926	2,874	5.23%
3	Michigan	411,388	37,891	9.21%	28	Louisiana	198,979	10,280	5.17%
4	Iowa	139,997	12,034	8.60%	29	Massachusetts	405,228	20,916	5.16%
5	Ohio	497,064	40,225	8.09%	30	Texas	1,262,653	64,543	5.11%
6	South Carolina	181,497	13,813	7.61%	31	Nebraska	90,094	4,530	5.03%
7	Kentucky	168,559	12,778	7.58%	32	South Dakota	38,549	1,929	5.00%
8	Alabama	185,972	13,824	7.43%	33	Rhode Island	51,957	2,461	4.74%
9	New Hampshire	71,235	5,083	7.14%	34	Oklahoma	172,274	7,990	4.64%
10	Minnesota	273,749	19,352	7.07%	35	Arizona	260,510	11,416	4.38%
11	Kansas	131,957	9,324	7.07%	36	New Jersey	524,836	22,085	4.21%
12	Oregon	168,246	11,752	6.98%	37	West Virginia	67,614	2,793	4.13%
13	Mississippi	104,507	7,058	6.75%	38	Colorado	268,635	9,527	3.55%
14	Tennessee	270,271	18,118	6.70%	39	Virginia	427,004	14,634	3.43%
15	North Carolina	399,059	25,948	6.50%	40	Delaware	44,265	1,486	3.36%
16	Illinois	622,416	39,541	6.35%	41	North Dakota	41,430	1,226	2.96%
17	Arkansas	114,045	7,035	6.17%	42	Maryland	330,326	8,618	2.61%
18	Idaho	61,086	3,708	6.07%	43	New York	1,118,230	25,448	2.28%
19	Washington	359,256	21,803	6.07%	44	Florida	871,164	19,683	2.26%
20	Connecticut	237,132	14,316	6.04%	45	Montana	41,774	888	2.13%
21	Vermont	29,513	1,765	5.98%	46	New Mexico	79,002	1,641	2.08%
22	Utah	113,577	6,698	5.90%	47	Nevada	118,562	2,277	1.92%
23	Pennsylvania	619,904	34,648	5.59%	48	Wyoming	32,375	620	1.92%
24	Missouri	255,872	14,219	5.56%	49	Alaska	40,707	650	1.60%
25	California	1,992,499	106,678	5.35%	50	Hawaii	66,761	589	0.88%
	United States	\$14,991,944	\$790,141	5.27%					

Source: U.S. Department of Commerce, Bureau of Economic Analysis, IHS Economics

Economic Report of the Governor

Nonmanufacturing Employment

The nonmanufacturing sector is comprised of industries that provide a service. Services differ significantly from manufactured goods in that the output is generally intangible, it is produced and consumed concurrently, and it cannot be inventoried. Connecticut's nonmanufacturing sector consists of the industries listed in the following table. Over the last three decades, nonmanufacturing employment has risen in importance to the Connecticut economy, reflecting the overall national trend away from manufacturing.

Nonmanufacturing employment gained approximately 21,475 positions and increased by approximately 1.4% from fiscal year 2014 to 2015. This growth was due in large part to an increase in the services sector which grew by 2.1% (15,833 additional employed). The education and health sector also experienced the largest percentage growth from fiscal year 2006 to 2015 with a 19.0% gain during that period.

The following table provides detail on Connecticut's nonmanufacturing employment by industry and indicates percentage changes for the year and over a ten year period for each of the sectors.

TABLE 26
CONNECTICUT NONMANUFACTURING EMPLOYMENT BY INDUSTRY
(In Thousands)

<u>Industry</u>	<u>FY</u> <u>2006</u>	<u>FY</u> <u>2014</u>	<u>FY</u> <u>2015</u>	<u>Percent Change</u>	
				<u>FY 2014 to</u> <u>FY 2015</u>	<u>FY 2006 to</u> <u>FY 2015</u>
Construction & Mining	67.18	55.02	56.98	3.56	(15.18)
Information	37.84	32.04	31.68	(1.14)	(16.30)
Transp., Trade & Utilities	310.86	299.92	303.28	1.12	(2.44)
Transp., & Warehousing	43.98	44.71	45.68	2.19	3.88
Utilities	8.31	7.49	7.37	(1.61)	(11.22)
Wholesale	67.17	63.12	62.84	(0.45)	(6.44)
Retail	191.41	184.60	187.38	1.50	(2.11)
Finance (FIRE)	143.29	129.23	129.12	(0.09)	(9.89)
Finance & Insurance	122.32	110.19	109.60	(0.54)	(10.40)
Real Estate	20.97	19.04	19.52	2.49	(6.95)
Services	672.95	743.72	759.56	2.13	12.87
Professional & Business	203.00	209.46	214.14	2.24	5.49
Education & Health	276.07	322.48	328.40	1.83	18.95
Leisure & Hospitality	130.80	149.33	153.68	2.92	17.49
All Other Services	63.07	62.46	63.33	1.40	0.41
Government	244.96	237.57	238.39	0.34	(2.68)
Federal	19.77	17.31	17.54	1.35	(11.26)
State & Local	225.19	220.27	220.85	0.26	(1.93)
Total Nonmanufacturing Employment	1,477.07	1,497.52	1,518.99	1.43	2.84

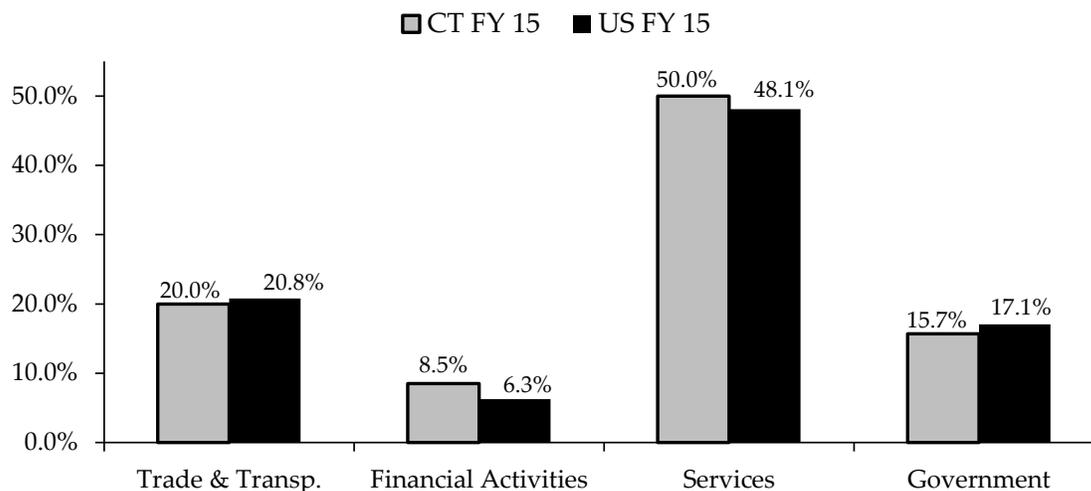
Note: Totals may not agree with detail due to rounding.

Source: U.S. Department of Commerce, Bureau of Economic Analysis, IHS Economics

Economic Report of the Governor

The following chart provides a comparison of select nonmanufacturing sectors in Connecticut to national results.

**COMPARISON OF NONMANUFACTURING EMPLOYMENT IN CERTAIN SECTORS
(As A Percentage Of Total Non-Manufacturing Employment)**



Source: U.S. Bureau of Labor Statistics, IHS Economics

The following table and chart provide a ten fiscal year profile of nonmanufacturing employment in the United States, the New England region, and Connecticut.

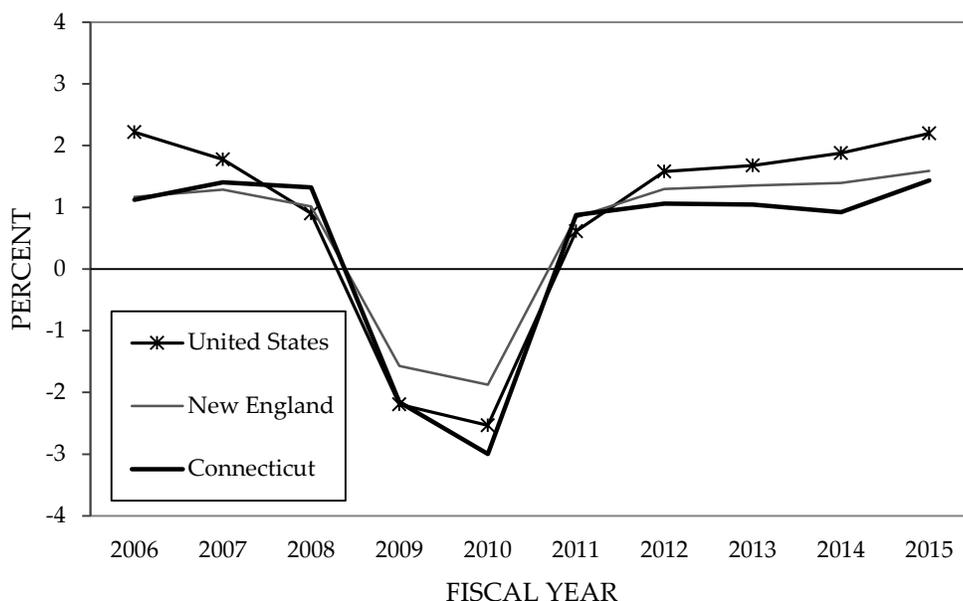
**TABLE 27
NONMANUFACTURING EMPLOYMENT
(In Thousands)**

Fiscal Year	United States		New England		Connecticut	
	<u>Number</u>	<u>% Growth</u>	<u>Number</u>	<u>% Growth</u>	<u>Number</u>	<u>% Growth</u>
2006	121,113	2.2	6,240	1.2	1,477	1.1
2007	123,265	1.8	6,321	1.3	1,498	1.4
2008	124,374	0.9	6,385	1.0	1,518	1.3
2009	121,644	(2.2)	6,285	(1.6)	1,485	(2.2)
2010	118,562	(2.5)	6,167	(1.9)	1,440	(3.0)
2011	119,287	0.6	6,219	0.8	1,453	0.9
2012	121,169	1.6	6,299	1.3	1,468	1.1
2013	123,206	1.7	6,385	1.4	1,484	1.0
2014	125,518	1.9	6,474	1.4	1,498	0.9
2015	128,278	2.2	6,577	1.6	1,519	1.4

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

Economic Report of the Governor

NONMANUFACTURING EMPLOYMENT FISCAL YEAR GROWTH BY PERCENT



Source: U.S. Bureau of Labor Statistics, IHS Economics

Average annual salaries for Connecticut's nonmanufacturing industries are listed in the following table. The figures were derived by dividing total wage and salary disbursements by employment. Percent changes over the previous year and over the decade are also provided.

TABLE 28
AVERAGE CONNECTICUT NONMANUFACTURING ANNUAL SALARIES

Industry	FY 2006	FY 2014	FY 2015	Percent Change	
				FY 2014 to FY 2015	FY 2006 to FY 2015
Construction	\$53,793	\$61,768	\$63,782	3.3	18.6
Information	64,348	90,384	98,019	8.4	52.3
Transp., Trade & Utilities	42,798	47,072	47,759	1.5	11.6
Wholesale Trade	76,014	87,474	90,749	3.7	19.4
Retail Trade	29,783	31,903	32,182	0.9	8.1
Finance, Ins. & Real Estate	123,765	146,008	152,593	4.5	23.3
Professional & Business Services	66,116	83,880	85,909	2.4	29.9
Education & Health Services	42,620	50,770	50,775	0.0	19.1
Leisure & Hospitality Services	21,099	22,944	23,321	1.6	10.5
Government	48,511	58,396	59,747	2.3	23.2
Federal	84,704	104,844	104,254	(0.6)	23.1
State and Local	47,773	57,363	58,651	2.2	22.8

Source: U.S. Bureau of Economic Analysis, IHS Economics

Economic Report of the Governor

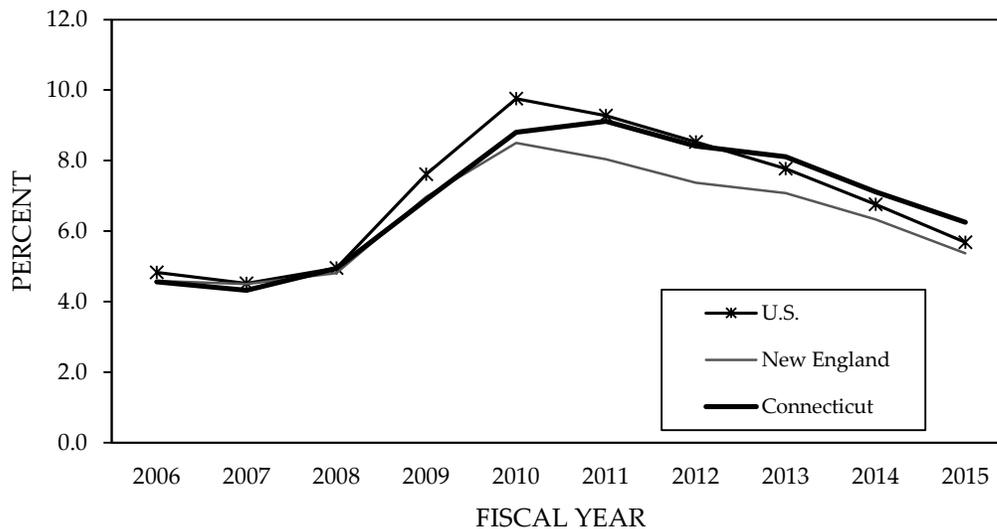
Unemployment Rate

The unemployment rate is the proportion of persons in the civilian labor force who do not have jobs but are actively looking for work. The rate is based upon a monthly survey in which household members are asked a series of questions, one of which is whether a jobless person has looked for work at some time during the preceding four weeks. Those looking for work are considered in the labor force but unemployed. The following table shows the unemployment rate for the U.S., the New England region, and Connecticut over a ten year period. Unemployment rates have fallen considerable since the end of the recession, but remain elevated by historical standards. Connecticut's unemployment rate for FY 2015 was 6.3% compared to a national average of 5.7%.

TABLE 29
UNEMPLOYMENT RATES (%)

<u>Fiscal Year</u>	<u>United States</u>	<u>New England</u>	<u>Connecticut</u>
2006	4.8	4.6	4.6
2007	4.5	4.5	4.3
2008	5.0	4.8	4.9
2009	7.6	7.0	6.9
2010	9.8	8.5	8.8
2011	9.3	8.0	9.1
2012	8.5	7.4	8.4
2013	7.8	7.1	8.1
2014	6.8	6.3	7.1
2015	5.7	5.4	6.3

UNEMPLOYMENT RATES
BY FISCAL YEAR



Source: U.S. Bureau of Labor Statistics, IHS Economics

Economic Report of the Governor

SECTOR ANALYSIS

Energy

The cost of energy has an outsized impact on the economy. For most consumers, transportation and household energy are major and unavoidable expenses, and their cost can affect other spending decisions. Because the U.S. is a net importer of energy, changes in the global energy market often result in changes in the domestic economy. All of the nation's recessions in recent history were concurrent with energy disruptions that occurred worldwide: in 1973 (Arab Oil Embargo), in 1979 (Iranian Revolution), in 1981 (Iran/Iraq war), and in 1991 (Iraq invasion of Kuwait). The March 2001 recession followed an energy supply disturbance that occurred in late 2000 when petroleum inventories remained relatively low and the price reached a then-record high of \$37.80 per barrel, the highest since the Gulf War of 1991. The last recession, which began in December 2007, was preceded by a hike in oil prices accompanied by the joint crises in the housing and financial markets. West Texas Intermediate (WTI) crude oil crept up to a monthly average high of \$94.62 a barrel in November 2007, up nearly 60% from a year earlier. The price continued to rise to an all-time monthly record high of \$133.93 a barrel in June 2008.

Just as increases in the price of oil can negatively impact consumers, price decreases can put money back into consumer's pockets. Price declines occurred during 2014 and 2015, and these savings will have a positive impact on Connecticut residents. In 2014, each Connecticut household consumed an average of 1,050 gallons of gasoline. This means that for each ten cent decrease in gas, Connecticut households will save an average of \$105.00 per year. According to AAA's Daily Fuel Gauge Report, the cost of gasoline in Connecticut was \$2.07 on December 10, 2015, compared to \$2.995 the same time one year ago, and \$3.662 the same time two years ago. On an annualized basis, the decrease from 2014 to 2015 would result in an average savings of \$803 per Connecticut household, or over \$1.0 billion statewide.

The United States, like the rest of the industrialized world, relies heavily on three fossil fuels: crude oil, coal, and natural gas. The following three sections describe energy production and consumption for the world, the United States, and Connecticut.

Worldwide

World oil supply and demand increased slightly in 2014 from 2013 levels. Demand from emerging economies continued to rise. World oil supply and demand among countries or regions continued to be significantly imbalanced. The following table illustrates the disparity between the world's suppliers of oil and its users. Members of the Organization of Petroleum Exporting Countries (OPEC) continued to supply more oil than they consumed. As an example, Saudi Arabia produced 11.51 million barrels per day (MBPD) while consuming 3.19 MBPD, generating an 8.32 MBPD surplus. The Organization for Economic Cooperation and Development (OECD), on the other hand, consumed more than it supplied. In 2014, the OECD consumed 45.06 MBPD, while supplying only 22.49 MBPD, registering a 22.57 MBPD deficit.

Economic Report of the Governor

TABLE 30
WORLD OIL SUPPLY AND DEMAND
Calendar Year 2014

	Supply			Demand	
	Millions of Barrels Per Day	% of Total		Millions of Barrels Per Day	% of Total
Total OECD (a)	22.49	25.4%	Total OECD	45.06	48.9%
United States	11.64	13.1%	United States	19.04	20.7%
Canada	4.29	4.8%	Canada	2.37	2.6%
Mexico	2.78	3.1%	Mexico	1.94	2.1%
Other OECD	3.77	4.3%	Japan	4.30	4.7%
			Germany	2.37	2.6%
Total OPEC (b)	36.59	41.3%	France	1.62	1.8%
Saudi Arabia	11.51	13.0%	Italy	1.20	1.3%
United Arab Emirates	3.71	4.2%	United Kingdom	1.50	1.6%
Iran	3.61	4.1%	Other OECD	10.73	11.6%
Iraq	3.29	3.7%			
Other OPEC	14.48	16.3%	Total Non-OECD	47.03	51.1%
			Russia	3.20	3.5%
All Other	29.59	33.4%	China	11.06	12.0%
Russia	10.84	12.2%	India	3.85	4.2%
China	4.25	4.8%	Saudi Arabia	3.19	3.5%
Other	<u>14.51</u>	<u>16.4%</u>	Other	<u>25.75</u>	<u>28.0%</u>
Total 2014 Supply	88.67	100.0%	Total 2014 Demand	92.09	100.0%
Total 2013 Supply	86.58		Total 2013 Demand	91.24	
Change	2.09	2.4%	Change	0.84	0.9%

Note:

(a) The OECD includes the United States, Western and some Eastern European countries, some Latin American countries, Israel, Australia, Canada, Japan, and New Zealand.

(b) The OPEC includes Algeria, Gabon, Indonesia, Iran, Iraq, Kuwait, Libya, Nigeria, Qatar, Saudi Arabia, the United Arab Emirates, and Venezuela.

Totals may not add due to rounding.

Source: BP Statistical Review of World Energy, June 2015

The United States has become increasingly less reliant on foreign oil due to the development of new oil production technologies as well as increasing fuel efficiency. The nation consumed 19.04 MBPD in 2014, up slightly from 18.96 MBPD consumed in 2013. The country supplied 11.64 MBPD in 2014, up from 10.07 MBPD supplied in 2013. The country had a 38.8% dependency rate on foreign oil supplies, the lowest rate since 1986. The U.S. accounted for 20.7% of global demand

Economic Report of the Governor

and 13.1% of global supply. Deficits between supply and demand also exist in larger economies such as China, Japan, France, and Germany.

Demand in China and India, the world's two most populous countries, continued its upward trend, accounting for 16.2% of the worldwide demand total in 2014, up from 5.6% in 1991. China, the world's second largest consumer, switched from a net exporter of oil in 1993, and began running an increasing oil deficit as its economy continued to grow at a brisk pace. In 2014 China consumed 11.06 MBPD while supplying 4.25 MBPD, registering a 6.81 MBPD deficit. China had a 61.6% dependence rate on foreign oil, significantly ahead of the United States.

Table 30 shows world oil and natural gas reserves by country. Oil or natural gas reserves are the estimated quantities that are recoverable in the future from known reservoirs under existing technological, operating, and economic conditions. Resources that currently are not technologically recoverable but could become recoverable in the future as technologies advance may also be added to the reserve. Energy companies whose equities are traded on the U.S. stock market are required to report their holdings of proved reserves.

Total world oil reserves increased 6.7 billion barrels (BBs) to 1,655.6 BBs in 2014. Reserves remain concentrated in the Middle East. Venezuela increasingly holds a significant percentage of the world's proven oil reserves as well; the country's reserves have now surpassed those of Saudi Arabia. Canada also shares a major portion of the world's oil reserves due to the tar sands in Alberta, Canada. Canada's resources could potentially help the U.S. shift its dependency on Middle Eastern oil. U.S. oil reserves increased by more than 3 BBs to 36.5 BBs in 2014 according to the Energy Information Administration (EIA).

Total world natural gas reserves increased 127.3 trillion cubic feet (TCFs) in 2014 to 6,972.5 TCFs according to the EIA. Russia, a significant exporter of natural gas to Europe, held 24.2% of these reserves. Middle Eastern countries held 40.3% of world reserves. Natural gas reserves in the United States have increased in recent years due to the development of horizontal drilling and hydraulic fracturing ("fracking") technologies used to extract shale gas. During a five year period from 2009-2014 proven reserves in the U.S. increased 105.0 TCFs, or 37.0%.

World energy reserves continue to mirror the pattern of disparity found in the oil supply market. The share of world oil reserves held by all OPEC countries is 72.8%. The Middle East controls 48.5% of world oil reserves with Saudi Arabia controlling approximately 16.2% of the total, followed by Iran's 9.5% and Iraq's 8.5%. The Middle East countries controlled 40.3% of natural gas reserves.

Economic Report of the Governor

TABLE 31
WORLD OIL & NATURAL GAS RESERVES
Calendar Year 2014

	Oil		Gas	
	Billions of <u>Barrels</u>	% of <u>Total</u>	Trillions of <u>Cubic Feet</u>	% of <u>Total</u>
North America	219.8	13.3%	422.1	6.1%
United States	36.5	2.2%	338.3	4.9%
Mexico	10.1	0.6%	17.1	0.2%
Canada	173.2	10.5%	66.7	1.0%
Central & South America	328.3	19.8%	277.6	4.0%
Venezuela	297.7	18.0%	196.4	2.8%
Europe and Eurasia	131.2	7.9%	2,313.7	33.2%
European Union	5.9	0.4%	59.2	0.8%
Russia	80.0	4.8%	1,688.0	24.2%
Middle East	803.6	48.5%	2,812.8	40.3%
Saudi Arabia	268.4	16.2%	290.8	4.2%
Iran	157.3	9.5%	1,193.0	17.1%
Iraq	140.3	8.5%	111.5	1.6%
Kuwait	104.0	6.3%	63.5	0.9%
Qatar	25.2	1.5%	885.3	12.7%
Africa	126.7	7.7%	606.0	8.7%
Libya	48.5	2.9%	54.7	0.8%
Nigeria	37.1	2.2%	180.7	2.6%
Asia Pacific	46.0	2.8%	540.4	7.8%
Total 2014 estimate	1,655.6	100.0%	6,972.5	100.0%
Total 2013 estimate	1,648.9		6,845.2	
Change	6.7	0.4%	127.3	1.9%

Note: * Comprises the continents of Europe and Asia

Totals may not add due to rounding.

Source: U.S. Department of Energy, Energy Information Administration (EIA)

United States

The U.S. has the largest demand for world oil. While the country contains 4.4% of the world population and produces 13.1% of world oil, it consumes 20.7% of world oil. The nation has long been a net energy importer, although America's energy dependence has decreased in recent years. According to the Energy Information Administration's *Monthly Energy Review*, the U.S.

Economic Report of the Governor

consumed 98.45 quadrillion British Thermal Units (QBTU's) of energy in 2014. While this was 2.2 times the 1960 level, energy use has decreased from its peak of 101.03 QBTU's in 2007.

Whereas the U.S. produced 87.39 QBTU's and exported 12.31 QBTU's in 2014, it required net imports of 10.91 QBTU's, which represented 11.1% of total national energy consumption, compared to 22.3% in 2010, 25.2% in 2000, 16.6% in 1990, and 6.0% in 1960. In 2013, 78.5% of energy produced in the U.S. was from fossil fuels (coal, 24.4%; natural gas, including both dry and liquid production, 34.8%; and crude oil, 19.3%). Coal and crude, both domestic and imported, have historically been the leading energy sources in the U.S. However, natural gas has been increasingly prominent since the 1980s.

National energy consumption rose steadily during the 1990s and 2000s before peaking in 2007. Changes in energy consumption are driven by overall economic conditions, the movement of prices, and increases in energy efficiency. The following table displays energy usage in the U.S. in 2014 by fuel type and by economic sector. Petroleum products are currently the most important energy source for the U.S. economy. The 34.88 quadrillion petroleum-generated BTU's accounted for 35.4% of U.S. energy consumption, followed by natural gas at 27.47 QBTU's and coal at 17.99 QBTU's. These fossil fuel sources together accounted for approximately 81.6% of U.S. energy consumption. Nuclear power and hydroelectric power were distant followers.

TABLE 32
U.S. ENERGY CONSUMPTION IN 2014
(Quadrillion BTU's)

<u>Fuels</u>	<u>Resi- dential</u>	<u>Com- mercial</u>	<u>In- dustrial</u>	<u>Trans- portation</u>	<u>Electric Generation</u>	<u>Total</u>	<u>% of Total</u>
Natural Gas	5.24	3.57	9.40	0.90	8.37	27.47	27.9
Petroleum	0.99	0.57	8.19	24.84	0.29	34.88	35.4
Coal	-	0.05	1.51	-	16.44	17.99	18.3
Nuclear	-	-	-	-	8.33	8.33	8.5
Renewables							
Hydroelectric	-	-	0.03	-	2.44	2.47	2.5
Other*	0.87	0.14	2.28	1.29	2.73	7.32	7.4
Electricity	4.79	4.63	3.26	0.03	-	12.71	12.9
Electric Losses	9.76	9.44	6.65	0.05	(38.60)	(12.71)	(12.9)
Total Demand	21.64	18.40	31.30	27.11	-	98.45	100.0

Note: * Includes power generated from wood, biofuels, wind, waste, geothermal, tide, and solar/photovoltaic, as well as imported electricity.

Totals may not add due to rounding.

Source: U.S. Dept. of Energy, Energy Information Administration

The U.S. lags other developed countries in utilizing renewable energy. Hydroelectricity, for example, provided approximately 6.3% of electric generation in the U.S., versus approximately 60% in Canada. Capital investments in alternative renewable energy from solar, hydroelectric,

Economic Report of the Governor

wind, biofuels, and geothermal have increased dramatically in the U.S.; nonetheless, their share of power production remains relatively small. Green energy in total in the U.S. is expected to play an increasingly important role and therefore grow faster than non-green energy sources as energy efficiency and awareness of the environmental impact of greenhouse gas emissions rises. Operable nuclear reactors declined to 99 units through the end of 2014, down from a peak of 112 units in 1990. The most recent closure was the Vermont Yankee Nuclear Power Plant in December of 2014. Nonetheless, nuclear generation accounted for 19.5% of domestic electricity net generation in 2014. The U.S. is the world's largest nuclear power producer, accounting for more than 30% of worldwide nuclear electricity production.

There are five energy-use sectors: residential, commercial, industrial, transportation, and electric power generation. The first four sectors are end-users while the last one is an intermediate-user consisting of all utility and non-utility facilities and equipment used in the electricity industry. The industrial sector was the largest end-user of energy, consuming 31.30 QBTU's in 2014, followed by transportation at 27.11 QBTU's, residential at 21.64 QBTU's, and commercial at 18.40 QBTU's.

In contrast to the relatively smooth trends in the other sectors, industrial consumption has shown the greatest fluctuation, dropping sharply in 1975, 1980-83, 2001-03, and 2008-09 in response to high oil prices and economic slowdowns. The electric power generation sector consumes and also produces energy. Energy losses occur throughout the entire electrical system beginning with utility generation in fossil-fired, nuclear or hydroelectric power plants all the way to the end-users. Energy losses are approximately two-thirds of total energy input during the conversion process of heat energy into mechanical energy for turning electric generators. Of the electricity generated, it is estimated that about 7% is lost in transmission and distribution.

Crude Oil Prices

Crude oil prices have a long history of large fluctuations that affect the global and U.S. economies as well as inflation levels. In 1973, the year of the Arab Oil Embargo, crude oil prices in the U.S. measured by the composite refiners' acquisition cost averaged \$4.15 per barrel. After two consecutive supply disturbances brought on by the Iranian Revolution in 1979 and the Iran-Iraq war in 1980, oil prices reached \$35.28 per barrel in 1981. Long-term prices then trended down to a low of \$12.54 per barrel by 1998 and then stayed in the \$20 range until mid-2003. Crude oil prices started to creep up above \$30 per barrel in late 2003, soared to the mid \$90s in 2008 and hit a record high of nearly \$134 per barrel in mid-2008. Prices then plummeted 70% to close in the low \$40s per barrel by the end of the year.

Following the collapse of oil prices in the midst of the Great Recession, the refiner's acquisition cost rebounded, rising to the mid \$70s in late 2009 and the low \$80s in late 2010. Prices hovered around \$100 per barrel from 2011 through the first half of 2014. However, beginning in the fall of 2014, the cost of a barrel of oil began to decline significantly due to oversupply in the global market. In September 2015, the composite refiner acquisition cost was \$45.53 a barrel; a more than

Economic Report of the Governor

50% reduction from September 2014. Adjusted for inflation, 2011's annual price of \$98.77 per barrel price in 2010 dollars was an all-time high. In real terms, annual average refiner's acquisition costs have dropped in each successive year following that peak.

TABLE 33
CRUDE OIL PRICES AND U.S. CONSUMPTION
 Refiners' Crude Oil Acquisition Costs* Per Barrel

<u>Year</u>	<u>Current \$</u>	In <u>2010 \$*</u>	<u>Year</u>	<u>Current \$</u>	In <u>2010 \$*</u>
1973	4.15	20.37	2005	50.24	56.11
1975	10.38	42.06	2006	60.24	65.18
1980	28.07	74.30	2007	67.94	71.46
1981	35.24	84.51	2008	94.74	95.98
1985	26.75	54.22	2009	59.29	60.26
1990	22.22	37.09	2010	76.69	76.69
1995	17.23	24.66	2011	101.87	98.77
2000	28.26	35.79	2012	100.93	95.86
2001	22.95	28.27	2013	100.49	94.07
2002	24.10	29.22	2014	92.02	84.78
2003	28.53	33.81	2015**	51.13	47.11
2004	36.98	42.69			

Note: * Adjusted by 2010 CPI-U, where 1982-1984 = 100.00 and 2010 = 218.08.

** Average for the first three quarters.

Source: U.S. Department of Energy, Energy Information Administration

Shale Energy

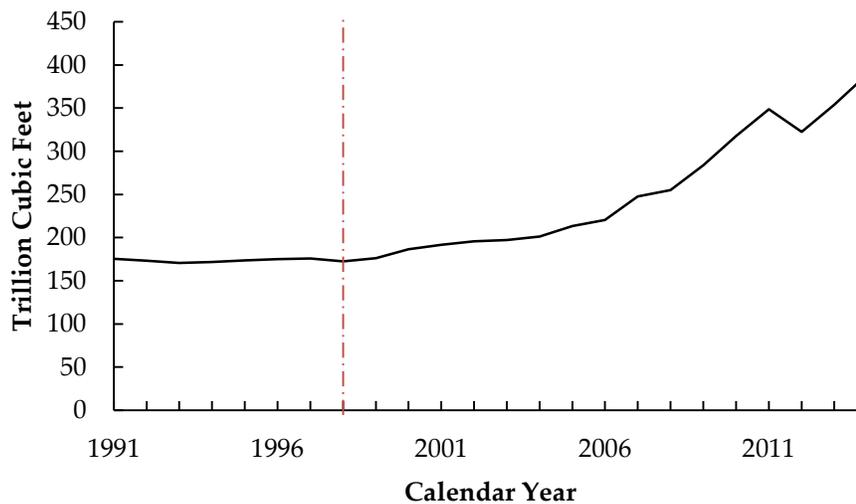
Oil producers in the United States are increasingly able to extract natural gas and petroleum from shale formations across the country. Increased production of these fuels is attributable to the development of horizontal drilling and hydraulic fracturing ("fracking") technology. In the process of fracking, producers pump a mixture of water, sand, and chemicals into shale wells to extract natural gas and petroleum. In conjunction with horizontal drilling, this technique has made the development of shale energy sources economically feasible. As a result, energy resources in the country have increased. The following chart shows the amount of dry natural gas reserves in the United States in trillion cubic feet (TCF) from 1991 to 2014. The dashed line represents the first commercially successful use of fracking in 1998. As the graph shows, the amount of proven natural gas reserves has grown dramatically since the introduction of this technology.

The increased production of fossil fuels from shale formations has had a significant impact on the global market for fossil fuels. Beginning in the second half of 2014, the combination of additional capacity from shale formations and the refusal of OPEC to cap production led to sharply lower

Economic Report of the Governor

fossil fuel prices. Energy observers predict that natural gas and petroleum from shale formations will continue to improve the United States' energy production. The U.S. Energy Information Administration (EIA) forecasts that dry natural gas production will increase 38.6% between 2014 and 2040, from 26.3 QBTU to 36.4 QBTU. As fossil fuel production from shale deposits and other non-traditional petroleum resources increases, the nation's energy dependence will continue to decline. Connecticut's energy market may benefit from development of shale resources. The state is located in close proximity to one of the nation's largest shale formations, the Marcellus shale gas field in New York and Pennsylvania.

U.S. Proven Natural Gas Reserves, 1991-2014



Dashed line represents first commercial use of horizontal fracturing ("fracking"), in 1998.

Source: U.S. Department of Energy, Energy Information Administration

Efficiency

Increasing efficiency has been a focal point of the nation's energy conservation policy. Energy regulatory agencies have been aggressively protecting the environment by promoting energy-efficient products over the past two decades. The National Appliance Energy Conservation Act of 1987 set minimum efficiency standards for 13 appliances and prohibited the sale if standards were not met. In 1992, the EPA embarked upon "*Energy Star*" as a voluntary labeling program to identify and promote energy-efficient products to reduce greenhouse gas emissions. *Energy Star* products use less energy and help protect the environment. The *Energy Star* label now covers product categories from small battery chargers to central air conditioners, and includes appliances, electronics, heating and cooling equipment, office equipment, lighting, commercial food services, and new buildings and plants with additional energy-saving features that are 20–30% more efficient than standard homes.

To promote energy efficient buildings in the U.S., Leadership in Energy and Environmental Design (LEED), a non-profit organization under the U.S. Green Building Council (USGBC),

Economic Report of the Governor

provides green building rating standards for environmentally sustainable construction and design.

Aside from energy conservation, increased productivity also promotes energy efficiency. Productivity, a crucial ingredient in the economy's long-term vitality, is a measure of economic efficiency which relates to how effectively economic inputs are converted into output. Productivity is measured by comparing the amount of goods and services produced with the inputs that are used in production. A measure of efficiency is the amount of energy used to produce a dollar of Gross Domestic Product (GDP). The following table compares U.S. consumption of fuel sources and illustrates the nation's improvement in energy efficiency.

TABLE 34
U.S. PRIMARY ENERGY CONSUMPTION & ENERGY EFFICIENCY

Calendar Year	U.S. Energy Consumption		GDP	BTU	Annualized % Change*
	Toal Quadrillion BTU's	Annualized % Change*	Billion (In 2009\$)	Per \$1 GDP (In 2009\$)	
1985	76.39	(0.4)	7,593.8	10,060	(3.6)
1990	84.49	2.0	8,955.0	9,434	(1.3)
1995	91.03	1.5	10,174.8	8,947	(1.1)
2000	98.82	1.7	12,559.7	7,868	(2.5)
2005	100.19	0.3	14,234.3	7,039	(2.2)
2010	97.48	(0.5)	14,783.8	6,594	(1.3)
2011	96.90	(0.6)	15,020.6	6,451	(2.2)
2012	94.49	(2.5)	15,354.6	6,154	(4.6)
2013	97.24	2.9	15,583.3	6,240	1.4
2014	98.46	1.2	15,961.7	6,168	(1.2)

*Annualized percent change calculated using a compound annualized growth rate formula

Source: U.S. Dept. of Energy, Energy Information Administration, *Monthly Energy Review*
U.S. Dept. of Commerce, Bureau of Economic Analysis

Between 1985 and 2014, energy consumption per dollar of real GDP decreased at a compound annual rate of 1.67% per year. In 1985, 10,060 BTU's of energy were required to produce \$1 of GDP measured in 2009 dollars. In 2014, that number was 6,168 BTU's, a 38.7% reduction. The long-term decline in energy consumption per dollar of GDP resulted from efficiency improvements and a structural shift from energy intensive industries to those that consume less energy but create more value added products, such as finance, banking, and professional services. However, improvements in energy efficiency vary from period to period, depending upon energy prices, consumers' consumption habits, and technology improvements. Efficiency tends to stagnate when fuel prices decline; as oil prices fall, the incentive to conserve energy diminishes.

Economic Report of the Governor

Oil Stability Program

To protect against supply disruptions, the United States began to create a Strategic Petroleum Reserve (SPR) under the Energy Policy and Conservation Act of 1975 (EPCA). The SPR program was established as a 750 million barrel capacity crude oil reserve with the objective of achieving a maximum draw-down rate within 15 days of the notice to proceed, and currently has a design capacity of 714 million barrels. To maximize long-term protection against oil supply disruptions, President George W. Bush in late 2001 directed the Secretary of Energy to fill the SPR up to its capacity. As of December 2015, the reserve held 695.1 million barrels of crude oil. The federal budget passed by the U.S. Congress in October of 2015 includes a plan to sell 58 million barrels from the SPR from 2018 until 2025, more than 8% of current reserves, as a revenue measure.

In early 2000, a shortage of home heating oil sent prices to a high of \$2.45 per gallon from \$1.00 per gallon a year earlier. To reduce such risk in the future, the U.S. Department of Energy established the Northeast Home Heating Oil Reserve under the SPR program. The maximum inventory of heating oil in the reserve is 2 million barrels, which will provide relief for approximately 10 days. This reserve program was permanently established in March of 2001 as a part of America's energy readiness effort, separating it from the Strategic Petroleum Reserve. According to 2013 data from Energy Information Administration, heating oil is the dominant, though declining, fuel used for home heating in Connecticut with 43.7% of all homes in Connecticut using heating oil as the primary heating fuel.

Connecticut

Connecticut is one of the most energy efficient states in the nation. The state consumed 3.2 thousand BTU's per 2009 chained dollar of Gross State Product in 2013, the latest available data. Connecticut was one of the most efficient states based on this measure, behind only the District of Columbia and New York. Connecticut was 48.4% below the national average of 6.2 thousand BTU's. When compared to the national per person consumption, Connecticut residents are moderate energy users. Connecticut consumed 208 million BTU's per capita in 2013, ranking 46th among the 50 states plus the District of Columbia, behind New York, Rhode Island, Hawaii, and California, and tied with Florida. Connecticut was 32.3% below the national figure of approximately 307.3 million BTU's per capita. The state has few indigenous energy sources, and it must import nearly all the energy that it consumes. This situation affects Connecticut consumers' energy choices and results in prices that are higher than the national average. In 2013, Connecticut residents spent \$27.89 per million BTU, compared to \$21.41 for the nation.

Economic Report of the Governor

TABLE 35
CONSUMER ENERGY PRICES IN THE UNITED STATES AND CONNECTICUT*
Nominal Dollars per Million BTU in 2013

	Natural <u>Gas</u>	Motor <u>Gasoline</u>	Residential <u>Heating Fuel</u>	All * <u>Petroleum</u>	Retail <u>Electricity</u>	Total <u>Energy</u>
Connecticut	\$8.16	\$30.55	\$18.84	\$29.47	\$45.88	\$27.89
United States	\$6.44	\$28.60	\$16.52	\$26.11	\$29.64	\$21.41
CT as a % of the U.S.	127%	107%	114%	113%	155%	130%

Note: * Includes motor gasoline, residential and distillate fuel oil, liquefied petroleum gases, and jet fuel, etc.

Source: U.S. Department of Energy, Energy Information Administration, *State Data 2013*

The prior table compares various prices to the national average for natural gas, motor gasoline, residential heating oil, residential electricity, and total average energy paid by consumers in 2013, the latest data available. Overall energy costs in Connecticut in 2013 were 30% higher than the national average, with retail electricity prices 55% higher than the national average. The electric industry has been deregulated in the state since the late 1990s.

TABLE 36
CONNECTICUT ENERGY CONSUMPTION IN 2013
(Trillion BTU's)

<u>Fuels</u>	Resi- <u>dential</u>	Com- <u>mercial</u>	In- <u>dustrial</u>	Trans- <u>portation</u>	Electric <u>Generation</u>	CT <u>Total</u>	% of CT <u>Total</u>	% of US <u>Total</u>
Natural Gas	47.7	47.3	30.5	4.5	110.0	240.1	32.1	27.9
Petroleum	65.0	14.9	15.2	221.6	2.9	319.6	42.7	35.4
Coal	-	-	-	-	7.7	7.7	1.0	18.3
Nuclear	-	-	-	-	178.5	178.5	23.9	8.5
Hydroelectric	-	-	-	-	3.8	3.8	0.5	2.5
Other	9.6	1.5	2.4	-	11.3	24.8	3.3	7.4
Deliv. Elec.	44.8	44.4	11.9	0.6	-	101.8	13.6	12.9
Deliv. Losses	<u>81.9</u>	<u>81.1</u>	<u>21.8</u>	<u>1.2</u>	<u>(314.1)</u>	<u>(128.1)</u>	<u>(17.1)</u>	<u>(12.9)</u>
Total Demand	249.1	189.2	81.9	228.0	-	748.1	100.0	100.0
% of Total-CT	33.3	25.3	10.9	30.5	-	100.0		
% of Total-U.S.	22.0	18.7	31.8	27.5	-	100.0		

Note: Other includes power generated from wood, biofuels, wind, waste, geothermal, tide, and solar/photovoltaic, as well as imported electricity.

Totals may not add due to rounding.

Source: U.S. Department of Energy, Energy Information Administration, *State Energy Data 2013*

Economic Report of the Governor

The preceding table displays the amount and percentage share of total energy consumed in Connecticut by fuel source and sector in 2013, the latest available data. Compared to the nation, petroleum and natural gas provide more of Connecticut's energy needs, while coal provides significantly less. Petroleum remains the main source of energy in Connecticut because it is easily transported and fuel oil is the major source to heat homes. In 2013, 43.7% of Connecticut households used fuel oil for home heating, followed by natural gas at 33.6%, electricity at 15.6%, and liquefied petroleum gases at 3.5%, and others at 3.6%. The state's petroleum products are received at the ports in New Haven, New London, and Bridgeport, and shipped by barge on the Connecticut River to central Connecticut.

Connecticut is also more reliant on nuclear energy and less reliant on coal for electric generation than the United States. In 2013, the latest data available, the state generated 35,610,789 net megawatt hours of electricity, primarily from nuclear power and natural gas. Retail sales within the state were at 29,824,516 megawatt hours of electricity. This implies that Connecticut was more than 100% electricity self-sufficient, unlike 2000, when the state generated 56.8% of its own demand and relied on imports from other states and Canada for the balance of its need while certain nuclear reactors were shut down for servicing. In 2013, Connecticut had net electricity exports of 26.3 Trillion BTU.

The power grid that supplies electricity to the entire state is owned and operated by both private and municipal electric companies. Transmission lines connect Connecticut with New York, other New England states, and Canada. These interconnections allow the companies serving Connecticut to meet large or unexpected electric load requirements from resources located outside of Connecticut's borders.

All electric utilities in the state are members of the New England Power Pool and operate as part of the regional bulk power system. An independent system operator, ISO New England Inc., operates this regional system. In 2014, there were 1,619,263 electric consumers in Connecticut. Of these, 90.1% were residential customers, 9.6% were commercial customers, and 0.3% were industrial and transportation customers. Approximately 90% of the electricity was sold by two investor-owned companies: Eversource and United Illuminating.

Natural gas is delivered to Connecticut through pipelines that traverse the state. Natural gas pipeline supplies are generally shipped to Connecticut from Canada and the Gulf of Mexico area, although development of the Marcellus Shale Formation in New York and Pennsylvania could provide additional supply to the region. Connecticut also receives liquefied natural gas (LNG) through interstate pipelines from a terminal located in Boston, Massachusetts which is supplied by LNG tanker ships. Natural gas service is provided to parts of the state through one municipal and three private gas distribution companies. Since 1996, the state's Public Utilities Regulatory Authority (formerly DPUC) has allowed some competitive market forces to enter the natural gas industry in the state. Commercial and industrial gas consumers can choose non-regulated suppliers for their natural gas requirements. Natural gas is delivered to consumers using the local distribution company's mains and pipelines. Located at or near the end of pipelines,

Economic Report of the Governor

Connecticut's distribution companies have to pay higher transportation costs and outbid other buyers in order to gain access rights to the gas wellhead.

Gasoline Consumption and Automotive Fuel Economy

In the U.S., highway vehicles consume approximately 98% of all gasoline, with about 2% used for other purposes such as agriculture, aviation, construction and boating. In 2014 gasoline consumption in the U.S. totaled 137.9 billion gallons. Gasoline consumption in Connecticut totaled 1.43 billion gallons, accounting for 1.04% of the nation's consumption. The table below shows gasoline consumption for the U.S. and Connecticut since 1990.

In 2014, Connecticut residents consumed 398.9 gallons of gasoline per capita, versus 432.4 gallons per capita for the nation. Per capita consumption is attributable to several factors, including gas prices, income levels, traffic conditions, average weight of vehicles, distance residents drive to work or shop, and percentage of workers telecommuting or ride sharing. As one of the smallest and most densely populated states in the nation, Connecticut residents generally commute shorter distances to work and shop. Per capita consumption reached a peak in 2005, and has fallen faster in Connecticut than in the U.S. since then. Between 2005 and 2014, per capita consumption decreased more than 13% in Connecticut, versus 9% for the nation. This has reduced Connecticut's per capita consumption to 92.3% of the U.S. amount.

As the highest per capita personal income state in the nation, Connecticut residents tend to own more automobiles. Connecticut residents owned 405 private and commercial automobiles per 1,000 residents in 2013, versus 354 for the nation. Also, Connecticut had 705 driver licenses per 1,000 residents in 2013, compared to 671 licenses for the nation. Connecticut residents trail the nation as a whole in the use of carpooling. The United States Census Bureau estimates that in 2013, of those commuting to work by car, 9.6% of Connecticut residents carpooled, versus 10.9% for the nation as a whole.

Economic Report of the Governor

TABLE 37
GASOLINE CONSUMPTION IN THE UNITED STATES & CONNECTICUT

Calendar Year	U.S.* Total	Annual**	CT Total	Annual**	Gallons Per Capita		
	Gallons (000's)	% Change	Gallons (000's)	% Change	U.S.*	CT	CT/U.S.* (%)
1990	110,184,150		1,301,715		440.6	395.2	89.7%
1995	120,875,789	1.9%	1,302,750	0.0%	453.3	391.7	86.4%
2000	132,279,950	1.8%	1,476,340	2.5%	468.2	432.4	92.3%
2005	140,338,710	1.2%	1,614,697	1.8%	474.3	460.3	97.0%
2006	140,320,089	0.0%	1,566,875	(3.0)%	469.7	445.3	94.8%
2007	140,436,133	0.1%	1,567,360	0.0%	465.7	444.0	95.3%
2008	136,499,418	(2.8)%	1,494,164	(4.7)%	448.4	421.2	93.9%
2009	136,877,949	0.3%	1,512,081	1.2%	445.7	424.3	95.2%
2010	137,592,937	0.5%	1,514,622	0.2%	444.4	423.1	95.2%
2011	135,204,475	(1.7)%	1,467,953	(3.1)%	433.5	409.0	94.3%
2012	134,998,800	(0.2)%	1,449,384	(1.3)%	429.7	403.5	93.9%
2013	135,595,239	0.4%	1,438,625	(0.7)%	428.5	400.0	93.3%
2014	137,883,016	1.7%	1,434,867	(0.3)%	432.4	398.9	92.3%
Average 2010-14					433.7	406.9	93.8%

* Fifty states plus Washington, D.C.

** Annual growth calculated using compound annual growth rate formula

Source: U. S. Dept. of Transp., Office of Highway Information Management, *Highway Statistics*

Corporate Average Fuel Economy (CAFE)

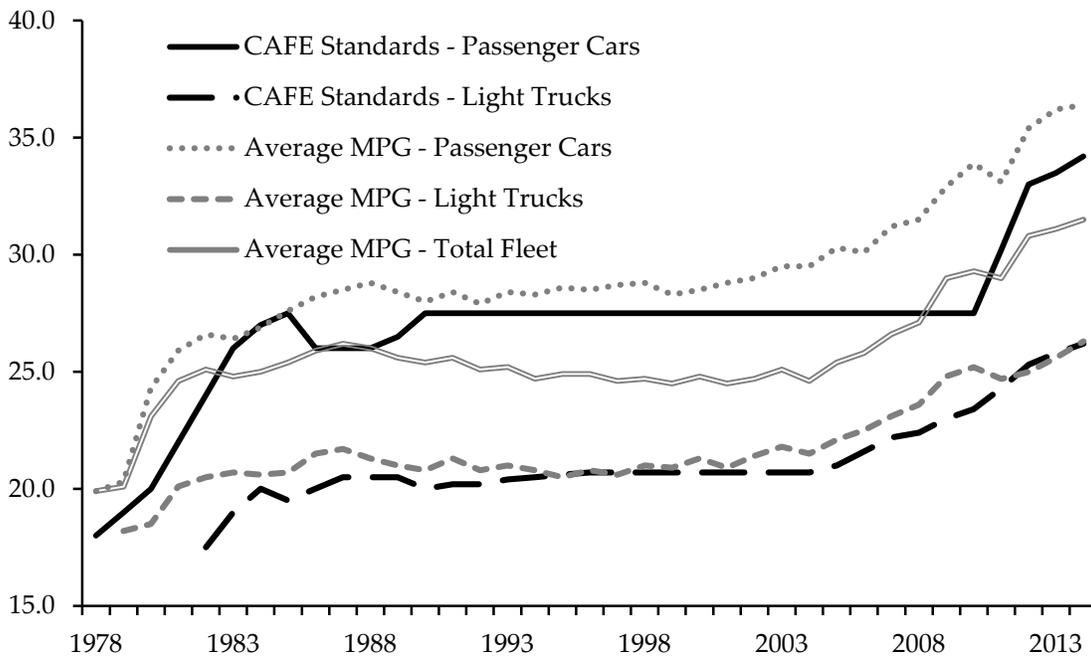
Emissions of carbon dioxide from motor vehicles represent over 30% of the total greenhouse gas emissions in the U.S. In 1973, requirements for Corporate Average Fuel Economy (CAFE) in motor vehicles were first proposed in the wake of Arab oil embargo. In 1975, the Energy Policy and Conservation Act established the CAFE system and authorized the Department of Transportation to set automobile fuel efficiency standards, starting in model year (MY) 1978 for passenger cars and MY 1979 for light trucks. The measurement of CAFE is performed by manufacturers and reported to the U.S. Environmental Protection Agency. The chart below illustrates the automotive fuel economy history for the CAFE standards for passenger cars and light trucks and their average miles per gallon (MPG) that had been produced. While CAFE standards for light trucks continued to increase from 17.5 MPG in MY 1982 to 23.5 MPG in MY 2010, standards for passenger cars remained the same at 27.5 MPG from 1990 to 2010.

Increases in fuel efficiency varied over the past three and a half decades, accelerating during the 1970s and 1980s while remaining relatively constant during the 1990s. Fuel efficiency accelerated again during the 2000s and 2010s. Light trucks gained market share in the 1990s and continued into the early 2000s while sales for high-powered, four-wheel drive cars, and larger, heavier, less

Economic Report of the Governor

fuel-efficient models increased, reducing the average MPG rating for new vehicles. In 1987, the total fleet fuel economy hit a peak at 26.2 MPG when new light trucks made up 31.6% of new light vehicle purchases. Total fleet fuel economy finally returned to 1987 levels in 2007, and reached a high of 31.5 MPG in 2014, the latest data available. Light truck sales have remained relatively constant over the past decade. In 2004 new light trucks sales peaked at 55.6% and then began trending downward to a low of 48.1% in 2009. By 2010 light trucks rebounded and have hovered around 50% of new light vehicle sales.

Miles per Gallon (MPG) for CAFE Standards and Produced Vehicles



Source: U.S. Dept. of Transportation, National Highway Traffic Safety Administration

Federal law imposes a civil penalty of \$5.50 for each tenth of a MPG by which a manufacturer's CAFE level falls short of the standard, multiplied by the total number of passenger automobiles or light trucks produced by the manufacturer in that model year. To further improve air quality and fuel efficiency, the U.S. Congress in 2007 passed the Energy Independence and Security Act that required the fuel efficiency standard to increase to 35 MPG by MY 2020. In the spring of 2009, the federal government accelerated those requirements and moved up the deadline to MY 2016. The National Highway Traffic Safety Administration (NHTSA) issued two new rules to increase CAFE standards under legal authority granted by the 2007 Act. The first ruling, adopted in April of 2010, raised the average MPG for MY 2016 to 34.1 MPG. The second rule, adopted in August of 2012, raised it to 34.5 MPG by MY 2025. As a result, the average MPG for passenger cars was 36.4 MPG in MY 2014, the latest data available, while the average for light trucks was 26.2 MPG. Increases in fuel economy put downward pressure on demand for, and by extension the price of, motor fuels.

Economic Report of the Governor

Fluctuations in Gasoline Prices

The price of gasoline is one of the most closely watched items by consumers. As of December 2014, The U.S. Bureau of Labor Statistics assigned a relative weight of 3.904% to this single component to calculate the CPI-U index, the consumer price index for all urban consumers.

Short-term gasoline prices have long been known for their drastic volatility, often rising and dropping markedly during short periods of time. The average retail gasoline price for all grades in the U.S. in October of 2015 was \$2.29 per gallon, compared to \$3.17 in October of 2014 and \$3.34 in October of 2013. The average retail price for all grades hit an all-time high of \$4.06 in July of 2008, before plummeting to \$1.69 in December that same year. During the first ten months of 2015, average monthly prices rose to a year high of \$2.80 per gallon in June before dropping 18.3% as of October. Because the global oil market is oversupplied and OPEC has signaled it will not cut down on production, prices are projected to remain relatively low through 2016. Changes in gasoline price are determined by the cost of crude oil, supply and demand of fuel, any disruption of refinery operations, inventory levels, seasonality and weather conditions, the regulation of environmental standards, and geopolitical conditions.

TABLE 38
RETAIL MOTOR GASOLINE PRICES
(Dollars per Gallon, Regular Gasoline)

Calendar	Nominal		Calendar	Nominal	
<u>Year</u>	<u>Price</u>	<u>Real Price*</u>	<u>Year</u>	<u>Price</u>	<u>Real Price*</u>
1950	\$0.27	\$1.96	2008	\$3.25	\$3.27
1960	0.31	1.77	2009	2.35	2.35
1970	0.36	1.58	2010	2.78	2.75
1980	1.25	2.82	2011	3.52	3.41
1990	1.16	1.74	2012	3.62	3.44
2000	1.52	1.86	2013	3.51	3.28
2005	2.27	2.47	2014	3.36	3.09
2006	2.57	2.71	2015**	2.49	2.27
2007	2.80	2.87			

Note: Prices for 1950 to 1970 are leaded regular; 1980 and after are unleaded regular.

* Adjusted by GDP Price Deflator (2009=100)

** First three quarters of 2015

Source: U.S. Dept. of Energy, Energy Information Administration; Bureau of Economic Analysis

The long run nominal price shows a relatively stable upward trend except for sharp upticks in the early 1980s and the most recent years. The table above shows the history of retail motor gasoline prices in the U.S. Prices averaged approximately 30 cents per gallon during the 1950s through the early 1970s. Prices began increasing after the Arab oil embargo in 1973. They rose to an average of \$3.25 per gallon in 2008 before declining to an average of \$2.35 per gallon in 2009.

Economic Report of the Governor

In the intervening years, the annual average price has hovered around \$3.50. However, gas prices began to decline during the second half of 2014. In January 2015 the average U.S. price of regular unleaded dipped to \$2.12 per gallon, is lowest price since April 2009.

The real prices listed are adjusted for inflation in 2009 dollars. In 2012, the average real price reached a high of \$3.44 per gallon in 2009 dollars. In both real and nominal terms, the annual average price was below 2012's high through 2013, 2014, and the first three quarters of 2015.

Gasoline Prices in Developed Countries

Gasoline prices in the U.S. may rank among the lowest in the world for oil-importing countries, and even lower than some oil-exporting countries. Average gasoline prices in the European countries are more than double that of the U.S.

According to the International Energy Agency, the average after-tax retail fuel price in the U.S. was \$2.29 per gallon In October 2015, compared to an average of \$5.73 in France, Germany, Italy, Spain, and the United Kingdom.

TABLE 39
END-USER GASOLINE PRICES AMONG DEVELOPED COUNTRIES
Dollars per Gallon, October 2015

<u>Country</u>	<u>Before Tax (\$)</u>	<u>Tax (\$)</u>	<u>End-User Price (\$)</u>	<u>Tax As a % of Price</u>	<u>U.S. End-User Price as a % of Other Country</u>
France	1.90	3.59	5.49	65.4%	41.7%
Germany	1.92	3.67	5.59	65.7%	41.0%
Italy	2.04	4.22	6.26	67.4%	36.6%
Spain	2.14	2.83	4.97	56.9%	46.1%
United Kingdom	1.90	4.42	6.32	69.9%	36.2%
Average of Above	1.98	3.75	5.73	65.1%	40.0%
Japan	2.13	2.09	4.22	49.5%	54.3%
Canada	1.93	1.12	3.05	36.7%	75.1%
USA	1.84	0.45	2.29	19.7%	

Note: Unleaded premium for France, Germany, Italy, Spain, UK; regular unleaded for Canada, Japan and the United States

Source: International Energy Agency, *Monthly Oil Price Statistics*, October 2015

Due to heavy subsidies, fuel prices in most Middle Eastern countries are below the price for crude oil on the world market. Taxes on transportation fuels, in addition to steep taxes on car purchases and ownership, have been used as a way to reduce traffic and prevent environmental damage, as well as to conserve energy. Many European countries such as the United Kingdom, France, and Germany have used a high tax policy on fuel to discourage car use and hence gasoline consumption. The above table shows the retail price of gasoline among selected countries in October of 2015. The tax portion of the price of gasoline in the U.S. accounted for only 19.7% of

Economic Report of the Governor

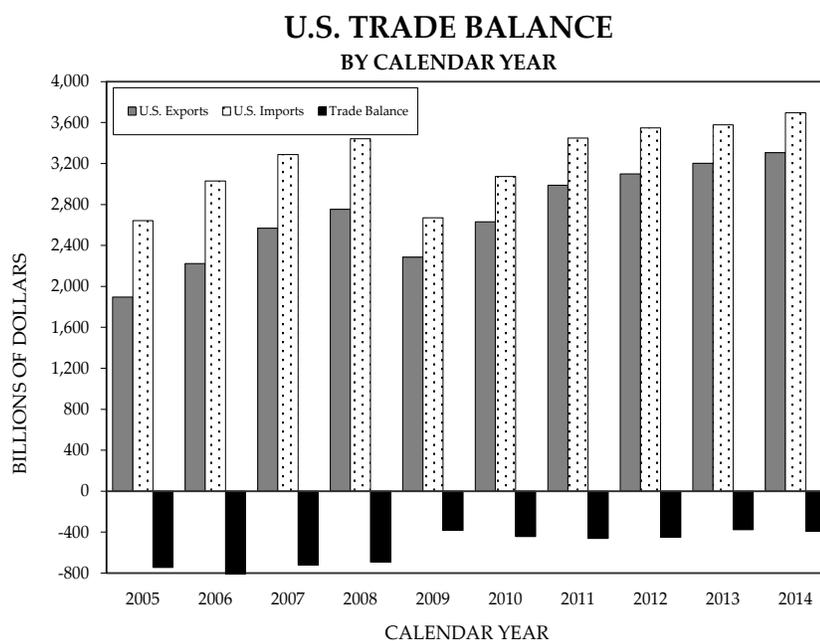
the retail price on average, compared to 69.9% in the U.K. and 65.7% in Germany. Of the average \$0.45 per gallon in taxes in the U.S., 18.4 cents per gallon was the federal excise tax with the remainder attributable to state taxes. While fuel taxes in most European OECD countries continued to increase, the U.S. federal fuels tax has remained at 18.4 cents per gallon since August of 1993.

Export Sector

Trade has played an important role in the U.S. economy. U.S. real exports and imports of goods and services accounted for 30.0% of Gross Domestic Product (GDP) in 2014, down from the previous peak of 31.0% in 2013. The increase over the past decade is attributable to the growth in the U.S. and international economies which accelerated export and import activities. Exports and a favorable balance of payments have traditionally been important to the growth of the U.S., affecting employment, production, and income. Real exports of goods and services have been significantly boosting economic growth over the past decades. Total trade exports have grown 74.4% from 2005 through 2014, while total trade imports have grown 39.9% over the same time period.

The following graph illustrates the United States' trade balance for the past ten years. In 2014, the deficit increased to \$389.5 billion, up from \$376.8 billion in 2013. The current improvement in the trade deficit over the last six years is primarily attributable to the depth of the domestic recession in the U.S. that caused a decline in demand for imported goods as well as increased surpluses in the investment and service transaction categories along with reduced dependence on imported energy.

Consistent with recent history, the United States trade balances in the past decade generally improved during recession years and deteriorated during recovery and expansionary periods. Trade deficits narrowed in 1991, 2001 and 2009 when the U.S. experienced an economic slowdown, whereas deficits widened during the boom years that were experienced during most of the 1990s and 2000s until 2008 when the last recession began. Since 2008 the U.S. trade balance has improved compared to the early 2000s and has remained relatively stable over the past five years.



Source: U.S. Department of Commerce, Bureau of Economic Analysis

Economic Report of the Governor

TABLE 40
U.S. TRADE DEFICIT BY CATEGORY
(In Billions of Dollars)

	2013			2014		
	<u>Exports</u>	<u>Imports</u>	<u>Balance</u>	<u>Exports</u>	<u>Imports</u>	<u>Balance</u>
Total Trade	3,201.3	3,578.0	(376.8)	3,306.6	3,696.1	(389.5)
Merchandise	1,592.0	2,294.6	(702.6)	1,632.6	2,374.1	(741.5)
Foods/Beverages	136.2	116.0	20.2	143.8	126.7	17.1
Industrial Supplies & Materials	492.3	686.7	(194.4)	500.0	672.6	(172.6)
Capital Goods, Excluding Autos	534.5	557.9	(23.4)	551.3	595.7	(44.4)
Autos	152.7	309.6	(156.9)	159.7	328.5	(168.8)
Consumer Goods	188.4	534.0	(345.6)	198.3	559.4	(361.1)
Others	88.0	90.5	(2.5)	79.6	91.2	(11.6)
Services	687.9	463.7	224.2	710.6	477.4	233.1
Travel & Transportation	260.3	194.7	65.6	267.3	205.0	62.3
Business Services	258.1	197.1	60.9	270.1	198.7	71.4
Royalties & License fees	127.9	39.0	88.9	130.4	42.1	88.2
Other Services	41.6	32.8	8.8	42.8	31.6	11.2
Investment Income	921.3	819.7	101.6	963.4	844.6	118.8
Direct Investment	478.1	176.3	301.7	476.6	176.2	300.5
Portfolio Investment Income	294.3	361.8	(67.5)	308.2	378.7	(70.5)
U.S. Gov't Receipts/Payments	126.6	249.5	(122.9)	140.0	259.2	(119.2)
Other Investment Income	22.4	32.1	(9.7)	38.5	30.5	8.0
			<u>Net Change From Previous Year</u>			
Total Trade	103.2	30.3	72.9	105.3	118.1	(12.8)
Merchandise	29.5	(9.1)	38.6	40.6	79.5	(38.9)
Foods/Beverages	3.1	4.9	(1.8)	7.6	10.7	(3.1)
Industrial Supplies & Materials	9.1	(48.1)	57.2	7.7	(14.1)	21.8
Capital Goods, Excluding Autos	7.1	6.1	0.9	16.8	37.8	(21.0)
Autos	6.5	11.1	(4.6)	7.0	18.9	(11.9)
Consumer Goods	7.4	15.1	(7.8)	9.9	25.4	(15.5)
Others	(3.7)	1.8	(5.5)	(8.5)	0.7	(9.1)
Services	31.5	11.7	19.8	22.7	13.7	8.9
Travel & Transportation	14.7	9.4	5.3	7.0	10.3	(3.3)
Business Services	11.7	(5.0)	16.7	12.0	1.5	10.5
Royalties & License fees	3.5	0.3	3.1	2.4	3.1	(0.7)
Other Services	1.6	6.9	(5.4)	1.2	(1.2)	2.4
Investment Income	42.3	27.7	14.5	42.0	24.9	17.2
Direct Investment	11.7	0.3	11.5	(1.4)	(0.2)	(1.2)
Portfolio Investment Income	33.8	16.5	17.3	13.9	17.0	(3.0)
U.S. Gov't Receipts/Payments	17.0	14.8	2.2	13.4	9.7	3.7
Other Investment Income	(20.3)	(3.8)	(16.4)	16.1	(1.6)	17.7

Note: Percent changes were derived before rounding to billions.

Source: U.S. Bureau of Economic Analysis

Economic Report of the Governor

Merchandise Trade

According to the U.S. Department of Commerce, international trade is classified into three categories: merchandise trade, service transactions, and investment income. There are six subcategories within merchandise trade including: foods and beverages; industrial supplies and materials; capital goods excluding autos; autos; consumer goods and others. The deficit in merchandise trade increased by \$38.9 billion for a total deficit of \$741.5 billion in 2014, up from \$702.6 billion in 2013. This increase was largely the result of increases in the importation of capital and consumer goods due to improvements in the United States economy.

United States merchandise imports have been concentrated among four categories: industrial supplies and materials, capital goods excluding autos, autos, and consumer goods. These four categories accounted for 90.8% of total merchandise imports in 2014. In contrast, U.S. exports have been concentrated in two categories: capital goods, and industrial supplies and materials. These two categories accounted for approximately 64.4% of the country's merchandise exports in 2014. Capital goods excluding autos were the largest export for the United States at \$551.3 billion in 2014. Within this category machinery and equipment, except consumer-type, was the largest contributor at \$431.5 billion.

Of the total trade deficit of \$389.5 billion, consumer goods and industrial supplies and materials accounted for the largest portions of the deficit, reaching \$361.1 billion and \$172.6 billion, respectively in 2014. Consumer goods consist of durables and nondurables. Durable goods include household and kitchen appliances such as radio and stereo equipment, televisions and video receivers, bicycles, watches, toys and sporting goods. Nondurables include footwear, apparel, medical, dental and pharmaceutical preparations. The trade deficit in the consumer goods category increased in 2014 by \$15.5 billion.

The second largest portion of the deficit occurred in industrial supplies and materials. This category includes energy products, iron and steel, metal products, lumber and paper and chemicals excluding medicinals. In 2014, the U.S. imported \$672.6 billion worth of these goods compared to the \$500.0 billion that the U.S. exported. The industrial supplies and materials trade deficit at \$172.6 billion represents a \$21.8 billion decline from 2013's deficit of \$194.4 billion.

The third largest portion of the merchandise trade deficit occurred in the auto category at \$168.8 billion, an increase of \$11.9 billion from 2013's deficit of \$156.9 billion.

Service Transactions

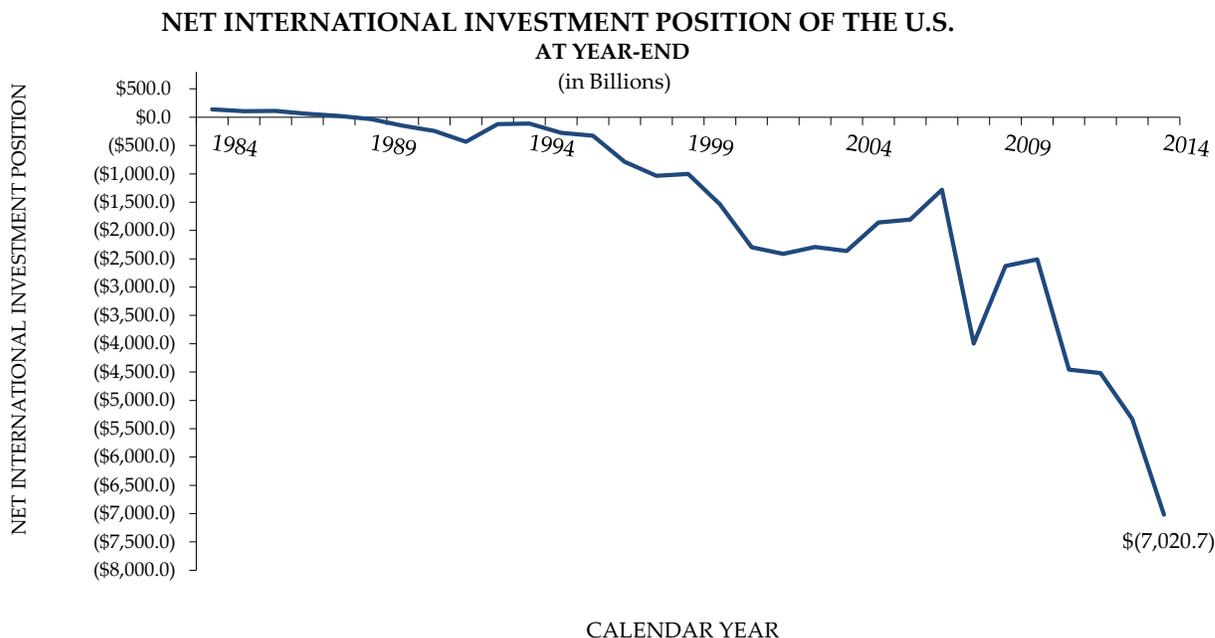
The United States is highly competitive in the delivery of services. The surplus in service transactions increased to \$233.1 billion in 2014, from a surplus of \$224.2 billion in 2013. Imports increased 3.0% to \$477.4 billion while exports of services increased 3.3% to \$710.6 billion. Of the \$233.1 billion total surplus in 2014, \$88.2 billion was attributable to royalty and license fees.

Economic Report of the Governor

Investment Income

The balance in investment income registered a surplus of \$118.8 billion in 2014. Investment income contains two components: 1) receipts generated from U.S.-owned assets abroad including direct investments, other private securities such as U.S. government-owned securities, corporate bonds and stocks, and 2) compensation receipts of workers employed abroad in international organizations and foreign embassies stationed in the U.S., including wages, salaries, and benefits. Payments are the counterpart of U.S. receipts; they are paid on foreign-owned assets invested in the U.S. There are six major types of foreign assets in the United States, including U.S. government securities held by foreign governments and the private sector, direct investments, and liabilities captured by private bonds, corporate stocks and U.S. banks.

According to the U.S. Bureau of Economic Analysis, in calendar 2014 foreign assets in the U.S., measured at current cost, increased by \$2,128.6 billion, or 7.2%, to \$31,615.2 billion, compared to an increase of \$436.4 billion to \$24,595.5 billion for U.S. assets abroad. This placed U.S. international investment at a net negative \$7,020.7 billion. U.S. direct investment in assets abroad continues to exceed foreign direct investment in the U.S. In 2014, the U.S.'s direct investment abroad was \$7,124.0 billion and foreign direct investment in the U.S. was \$6,228.8 billion, registering \$895.2 billion in net investment. Foreign assets in the United States are mostly in securities such as bonds and stocks issued by the U.S. Treasury and corporations.



Source: U.S. Bureau of Economic Analysis

Economic Report of the Governor

TABLE 41
U.S. INTERNATIONAL TRANSACTIONS
(By Area, In Billions of Dollars)

	2013			2014		
	Exports	Imports	Balance	Exports	Imports	Balance
Total Trade	3,201.3	3,578.0	(376.8)	3,306.6	3,696.1	(389.5)
Europe	975.9	972.4	3.5	1,029.4	1,018.7	10.7
Canada	430.4	410.5	19.9	437.2	423.8	13.3
Latin America (1)	752.6	697.9	54.7	769.0	711.7	57.3
Asia and Pacific (2)	772.6	1,187.4	(414.8)	792.2	1,241.0	(448.8)
Africa	60.4	80.4	(20.0)	60.9	63.7	(2.8)
Middle East	117.8	147.1	(29.4)	120.2	145.4	(25.3)
Others (3)	91.7	82.3	9.4	97.7	91.6	6.1
European Union (4)	803.9	810.6	(6.7)	862.3	854.7	7.7
Australia	70.8	24.1	46.7	66.7	26.4	40.3
Japan	144.6	234.1	(89.6)	150.6	231.8	(81.2)
China	172.9	497.7	(324.9)	181.6	525.0	(343.4)
			<u>Net Change From Previous Year</u>			
Total Trade	103.2	30.3	72.9	105.3	118.1	(12.8)
Europe	30.6	17.9	12.7	53.6	46.4	7.2
Canada	9.9	14.4	(4.5)	6.8	13.3	(6.6)
Latin America (1)	27.5	1.7	25.8	16.5	13.9	2.6
Asia and Pacific (2)	22.3	20.1	2.2	19.6	53.6	(34.0)
Africa	2.7	(17.3)	20.0	0.4	(16.7)	17.2
Middle East	5.8	(9.3)	15.1	2.4	(1.7)	4.1
Others (3)	4.5	2.8	1.7	6.0	9.3	(3.3)
European Union (4)	21.8	18.8	3.0	58.4	44.0	14.4
Australia	(6.0)	1.0	(7.0)	(4.1)	2.2	(6.3)
Japan	(2.7)	(6.4)	3.7	6.1	(2.3)	8.4
China	19.5	16.4	3.1	8.7	27.3	(18.6)

- (1) Includes Argentina, Brazil, Mexico, Venezuela, and other western hemisphere countries
- (2) Includes Australia, China, Hong Kong, India, Japan, Republic of Korea, Singapore, Taiwan, and other Asia and Pacific countries
- (3) Includes figures for International Organizations and unallocated areas
- (4) Includes 27 member states: Austria, Belgium, Bulgaria, Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Netherlands, & United Kingdom

Source: U.S. Department of Commerce, U.S. Bureau of Economic Analysis

Economic Report of the Governor

Table 41 shows U.S. trade transactions by area for 2014. The goods, services and income payments trade deficit in 2014 was \$389.5 billion, an increase of \$12.8 billion. In 2014 the United States imported more from the Asia and Pacific area, Africa, and the Middle East than it exported to those regions but exported more than imported in the same year to Canada, Europe and Latin America. Exports to Canada outpaced imports and continued at record levels in 2014.

In 2013, the United States imported \$525.0 billion worth of goods, services and income payments from China while exporting only \$181.6 billion to that country. The resulting trade deficit with China was \$343.4 billion in 2014, larger than the 2013 deficit of \$324.9 billion. The top five U.S. imports from China in 2013 were electrical machinery and equipment at \$127.1 billion, power generation equipment at \$105.3 billion, furniture at \$25.5 billion, toys and games at \$22.6 billion, and footwear at \$17.1 billion. To further illustrate the disparity in trade between the two countries: while the amount of electrical machinery and equipment imported into the U.S. from China was \$117.5 billion in 2013, the top U.S. export to China was seeds and fruit at only \$14.9 billion.

Connecticut Exports

In Connecticut, the export sector has assumed an important role in the state's overall economic growth. State exports of goods for the past five years averaged 6.7% of Gross State Product (GSP).

According to figures published by the United States Department of Commerce, which were adjusted and enhanced by the World Institute for Social and Economic Research to capture a greater percent of indirect exports, Connecticut exports of commodities totaled \$15,930.7 million in 2014. The state's economy benefits from goods produced not only for direct shipment abroad but also from those that are ultimately exported from other states. These indirect exports are important in industries whose products require further processing such as primary metals, fabricated metal products and chemicals. In addition, indirect exports are important in industries whose products constitute components and parts for assembly into machinery, electrical equipment and transportation equipment.

Connecticut industries that rely most heavily on exports are Transportation Equipment (NAICS 336), Nonelectrical Machinery (NAICS 333) and Computer & Electronic Equipment (NAICS 334). NAICS refers to the North American Industry Classification System, which replaced the Standard Industrial Classification (SIC) system and was implemented in 1997. The top three industries accounted for 66.9% of Connecticut's foreign sales in 2014. The following table shows the breakdown of major products by NAICS code for the past five years. In 2014, transportation equipment, which includes aircraft engines and spare parts, gas turbines, and helicopters and spacecraft accounted for 45.9% of total exports down from 48.7% of exports in 2013. In terms of average annual growth from 2010 to 2014, Chemicals posted the strongest growth at 13.5%, followed by Machinery at 7.6%.

Economic Report of the Governor

Overall growth in exports of commodities for the past five years averaged -0.2%. Exports of \$15.9 billion are estimated to account for 6.4% of Connecticut Gross State Product (GSP) in 2014, which is slightly lower than the 6.8% level in 2013.

TABLE 42
COMMODITY EXPORTS ORIGINATING IN CONNECTICUT BY PRODUCT
(In Millions)

<u>NAICS</u>	<u>Industry</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	Percent of 2014	Average Growth
322	Paper	288.5	153.4	156.2	159.5	149.7	0.9%	-15.1%
325	Chemicals	604.2	742.5	873.3	900.1	1,003.3	6.3%	13.5%
326	Plastics and Rubber	254.7	311.3	267.6	239.8	233.4	1.5%	-2.2%
331	Primary Metal	534.6	569.1	704.3	648.4	637.9	4.0%	4.5%
332	Fabricated Metal	615.5	674.8	690.4	720.2	733.4	4.6%	4.5%
333	Machinery, exc. Elec.	1,545.0	1,858.9	1,761.2	1,758.7	2,071.5	13.0%	7.6%
334	Comp. & Electronic	1,307.6	1,444.4	1,365.9	1,235.5	1,267.6	8.0%	-0.8%
335	Electrical Equipment	922.1	914.7	1,026.2	992.6	970.6	6.1%	1.3%
336	Transportation	6,989.3	6,878.6	7,158.2	8,006.2	7,316.2	45.9%	1.1%
339	Misc. MFG	579.1	434.7	292.6	299.1	293.8	1.8%	-15.6%
	Other	<u>2,388.0</u>	<u>2,250.5</u>	<u>1,575.2</u>	<u>1,466.8</u>	<u>1,253.3</u>	7.9%	-14.9%
Total Commodity Exports		16,028.8	16,232.8	15,871.1	16,426.8	15,930.7		-0.2%
% Growth		14.7%	1.3%	-2.2%	3.5%	-3.0%		
Gross State Product (\$M)		231,060	233,027	238,939	242,878	250,569		
% Growth		2.0%	0.9%	2.5%	1.6%	3.2%		2.1%
Exports as a % of GSP		6.9%	7.0%	6.6%	6.8%	6.4%		6.7%

Source: World Institute for Strategic Economic Research (WISERTrade.org)

The bulk of Connecticut's exports are shipped by air from Bradley International Airport and by sea from the port of New Haven. In 2014, exports originating from Connecticut totaled \$15.9 billion, with 65.3% of the total being shipped by air, 16.4% being delivered by sea, and the remaining 18.3% being transported inland by railroad or truck to Canada, Mexico or other states for further shipment to other countries. This compares with 55.4% by air, 17.6% by sea, and 27.5% by land for exports totaling \$4.5 billion in 1990. This reflects the demand for meeting just-in-time inventory requirements, with the majority of goods transported by air as that mode of transportation provides more frequent departures and faster transit times.

The following table shows the ten major foreign countries to which state firms export their products. France is again the largest destination country in 2014 at 13.9%, followed by Canada, Germany, Mexico, and United Arab Emirates. These five countries accounted for 51.8% of total

Economic Report of the Governor

state exports in 2014. Exports to the United Arab Emirates (U.A.E) have grown the fastest in the past five years at an average growth rate of 82.5% due to an increase in transportation related purchases over the last decade. Exports to the South Korea have grown from 2010-2014 at a rate of 8.5%, followed by Germany with 7.8% growth over the same period.

TABLE 43
COMMODITY EXPORTS ORIGINATING IN CONNECTICUT BY COUNTRY
(In Millions of Dollars)

<u>Destination</u>	<u>2014 Rank</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	Percent of 2014 <u>Total</u>	2010-2014 Average Growth <u>Rate</u>
France	1	2,225.7	1,961.0	1,906.6	2,425.3	2,210.7	13.9%	-0.2%
Canada	2	1,611.6	1,713.6	1,914.8	1,909.7	1,913.7	12.0%	4.4%
Germany	3	1,268.0	1,385.5	1,485.7	1,397.2	1,711.9	10.7%	7.8%
Mexico	4	982.3	1,101.8	1,142.2	1,213.3	1,280.7	8.0%	6.9%
U.A.E.	5	103.0	542.2	1,089.2	1,212.1	1,142.0	7.2%	82.5%
China	6	1,024.1	983.0	1,008.9	911.0	907.3	5.7%	-3.0%
United Kingdom	7	652.9	689.5	625.7	693.9	718.9	4.5%	2.4%
South Korea	8	475.2	488.3	551.1	569.3	658.0	4.1%	8.5%
Japan	9	477.2	582.2	573.5	529.0	539.8	3.4%	3.1%
Netherlands	10	567.7	555.4	508.8	486.7	489.5	3.1%	-3.6%
Other Areas		<u>6,641.2</u>	<u>6,230.2</u>	<u>5,064.7</u>	<u>5,079.5</u>	<u>4,358.1</u>	27.4%	-10.0%
Total		16,028.8	16,232.8	15,871.1	16,426.8	15,930.7	100.0%	-0.2%

Source: World Institute for Strategic Economic Research (WISERTrade.org)

In an effort to create jobs and investment, the Connecticut Department of Economic and Community Development has continued to work with a number of foreign companies to establish branches in Connecticut. As a result of this work, foreign countries continually invest and own firms in the state. This foreign investment is an important stimulus for Connecticut's economic growth and future productivity as 7.0% of the state's total private industry employment in 2012 was a result of foreign investment. In 2012, 100,200 Connecticut workers were employed by foreign-controlled companies, a reduction of 2,400 since 2011. Major sources of foreign investment in Connecticut in 2012 included the Netherlands, the United Kingdom, Germany, and Japan.

The Connecticut Department of Economic and Community Development continues to promote international trade to increase Connecticut's global competitiveness. The methods employed to promote international trade include providing export assistance to Connecticut companies as well as providing assistance to foreign companies interested in expanding or relocating in

Economic Report of the Governor

Connecticut. Further information regarding assistance, services, or publications is available through:

State of Connecticut
Department of Economic and Community Development
505 Hudson Street
Hartford, Connecticut 06106
(860) 270-8166, 270-8067, or 270-8068
<http://www.state.ct.us/ecd>

Connecticut's Defense Industry

The defense industry is an integral part of Connecticut's manufacturing sector, and has been since the inception of the United States as a nation. The state's economy is still affected by the volume of defense contracts awarded or subcontracted to Connecticut firms.

In federal fiscal year (FFY) 2014, contractors in the state were awarded \$13.2 billion worth of defense-related prime contracts, with the heaviest concentration in the state's transportation equipment sector. This was up 32.0% from the \$10.0 billion received in awards in FFY 2013. Of the total awarded, the following five companies were the top contractors in the state, primarily for the described areas of work:

- | | |
|------------------------------------|------------------------------|
| 1. United Technologies Corp. | Aircraft, Engines & Turbines |
| 2. General Dynamics Corp. | Submarines |
| 3. Colt Defense Holding LLC. | Firearms |
| 4. Applied Physical Sciences Corp. | Research and Development |
| 5. Carothers Construction, Inc. | Construction |

The following table shows the distribution of prime defense contracts in the state by program or type of work, with a heavy reliance on submarines and rotary wing aircraft, which is very different from the national distribution of all contracts awarded. It is this concentration in large weapon programs which plays a role in the volatility of state awards.

Economic Report of the Governor

TABLE 44
VALUE OF PRIME CONTRACT AWARDS BY PROGRAM IN FFY 2013
(In Millions)

<u>Connecticut Program</u>	<u>Value</u>	<u>Percent</u>	<u>United States Program</u>	<u>Value</u>	<u>Percent</u>
Combat Ships and Landing Vessels	\$ 5,241	39.7%	Aircraft Fixed Wing	\$ 16,839	6.5%
Aircraft, Rotary Wing	2,392	18.1%	Engineering & Tech Services	12,023	4.6%
Gas Turbines and Jet Engines	1,662	12.6%	General Healthcare Services	11,391	4.4%
Submarines	1,631	12.3%	Combat Ships and Landing Vessels	10,340	4.0%
Defense Aircraft Operational	520	3.9%	Professional Support Services	6,367	2.4%
Other	1,762	13.3%	Other	203,487	78.1%
Total	\$13,208	100.0%	Total	\$260,446	100.0%

Source: Federal Procurement Data System (FPDS.gov)

The following table displays the geographic distribution of prime defense contracts within the state, with the majority of the work in Fairfield, New London and Hartford Counties.

TABLE 45
GEOGRAPHIC DISTRIBUTION OF CONNECTICUT PRIME AWARDS
(And Total Awards in Thousands of Dollars)

	<u>FFY 2011</u>	<u>FFY 2012</u>	<u>FFY 2013</u>	<u>FFY 2014</u>
Fairfield	35.4%	42.0%	29.5%	26.2%
Hartford	25.9%	23.1%	26.4%	18.9%
Litchfield	0.4%	0.3%	0.3%	0.2%
Middlesex	0.4%	0.4%	0.1%	0.1%
New Haven	0.8%	0.7%	0.6%	0.7%
New London	36.9%	33.4%	42.8%	53.8%
Tolland	0.1%	0.1%	0.2%	0.1%
Windham	<u>0.1%</u>	<u>0.0%</u>	<u>0.0%</u>	<u>0.1%</u>
State Total	100.0%	100.0%	100.0%	100.0%
State Total	\$12,491,319	\$12,750,053	\$10,036,197	\$13,207,822

Source: Federal Procurement Data System

Prime defense contracts have tended to be "leading" indicators of the state's economic activity. This means that changes in defense contract awards precede changes in employment. However,

Economic Report of the Governor

new defense contract awards cannot be directly converted into anticipated employment gains or losses because: a) contracts have different terms and different completion dates; b) subcontracting on prime awards may be done by firms in different states; c) research and development contracts are usually capital intensive rather than labor intensive; d) there often exists a time lag between contract award and funding availability; and e) as productivity improvements are achieved over time by manufacturers, the same (or greater) amount of work can be done by fewer employees. Although employment is affected by the defense budget, the state's economic activity is not immediately impacted by fluctuations in defense contracts.

To compare the relative volatility of contract awards with employment, the coefficient of variation is used: the larger the number, the greater the volatility. It is derived by dividing the standard deviation of a variable by its mean. The coefficient of variation for the state's defense contract awards over the past decade was 0.182 compared with 0.026 for transportation equipment employment. This implies that the fluctuations in transportation employment are milder than the fluctuations in defense contract awards. Because most defense contract awards are long-term projects, there is usually a backlog of unfinished orders in the pipeline, allowing continued employment even if new contracts are not received.

From \$9.3 billion in FFY 2005, real defense contract awards—the value of contracts after accounting for inflation—increased to \$11.2 billion in FFY 2014. This represents an annual percentage growth rate of 4.4% per year from FFY 2005 to FFY 2014.

**TABLE 46
CONNECTICUT DEFENSE CONTRACT AWARDS AND RELATED EMPLOYMENT**

Federal Fiscal Year	Defense Contract Awards		Connecticut Transportation Equipment Employment		Defense Contract Awards in 2006	
	(\$ 000's)	% Growth	(000's)	% Growth	Dollars (\$ 000's)	% Growth
2005	8,981,848	1.7	43.37	0.65	9,269,193	(1.7)
2006	7,664,577	(14.7)	43.67	0.70	7,664,577	(17.3)
2007	8,616,669	12.4	43.50	(0.38)	8,381,974	9.4
2008	12,226,104	41.9	44.14	1.46	11,447,662	36.6
2009	11,851,941	(3.1)	43.49	(1.48)	11,139,042	(2.7)
2010	11,238,749	(5.2)	42.29	(2.76)	10,387,014	(6.8)
2011	12,491,319	11.1	42.15	(0.34)	11,192,938	7.8
2012	12,750,053	2.1	42.20	0.12	11,194,076	0.0
2013	10,036,197	(21.3)	41.57	(1.49)	8,681,831	(22.4)
2014	13,207,822	31.6	40.35	(2.94)	11,240,700	29.5
Coefficient of Variation	0.182		0.026		0.136	

Sources: U.S. Department of Defense, Bureau of Labor Statistics; Federal Procurement Data System

Economic Report of the Governor

TABLE 47
COMPARISON OF U.S. AND CONNECTICUT DEFENSE CONTRACT AWARDS

Federal Fiscal Year	Connecticut				U.S.			
	Defense Contract Awards (\$ Millions)	3-Year Moving Average % Growth	3-Year Moving Average % Growth	3-Year Moving Average % Growth	Defense Contract Awards (\$ Millions)	3-Year Moving Average % Growth	3-Year Moving Average % Growth	3-Year Moving Average % Growth
2005	8,982	1.7	8,627	14.96	239,339	16.2	213,706	13.84
2006	7,665	(14.7)	8,494	(1.55)	262,130	9.5	235,785	10.33
2007	8,617	12.4	8,421	(0.86)	298,887	14.0	266,785	13.15
2008	12,226	41.9	9,502	12.84	354,847	18.7	305,288	14.43
2009	11,852	(3.1)	10,898	14.69	331,051	(6.7)	328,262	7.53
2010	11,239	(5.2)	11,772	8.02	323,082	(2.4)	336,327	2.46
2011	12,491	11.1	11,861	0.75	329,257	1.9	327,797	(2.54)
2012	12,750	2.1	12,160	2.52	317,659	(3.5)	323,333	(1.36)
2013	10,036	(21.3)	11,759	(3.30)	268,313	(15.5)	305,076	(5.65)
2014	13,208	31.6	11,998	2.03	260,446	(2.9)	282,139	(7.52)
Coefficient of Variation	0.182				0.158			

Source: U.S. Department of Defense, Federal Procurement Data System

The coefficient of variation for Connecticut's defense contract awards over the past decade was 0.182, compared to 0.158 for the U.S., reflecting a pattern of fluctuations in the state's annual levels of defense contract awards which is not inconsistent with that of awards nationally.

As defense contract awards normally take several years to complete, the 3-year moving average is a better reflection of actual production activities. Overall defense changes in Connecticut have historically been more severe and more volatile than the national average. Both of these factors have negative implications for the state's economy. Volatility imposes difficulties for the industry in terms of long term planning, making future capital investment less likely and decreasing the dollars devoted to research and development.

Connecticut's total defense awards, based on a three year moving average, increased at an annual percentage growth rate of 3.7% during the nine-year period from 2005 to 2014, compared to a percentage growth rate of 3.1% for the nation.

The relative share of defense related production activity, measured by the size of the moving average of defense contract awards compared to Gross State Product (GSP), was at or below 2.0% in the late 1990s and has generally hovered around 4.0% to 5.0% since then. In comparison, this share was 9.8% in 1982. The following table provides a ten year history of U.S. and Connecticut defense awards and the proportion of state GSP such awards represent.

In FFY 2014, while Connecticut ranked fourth in total defense contracts awarded, it ranked second in per capita defense dollars awarded with a figure of \$3,672. This figure was 4.5 times the

Economic Report of the Governor

national average of \$817. In 2013, Connecticut ranked eighth in total defense contracts awarded and second in per capita defense dollars awarded with a figure of \$2,788. This was 3.3 times the national average of \$850 for that year.

The wars in Afghanistan and Iraq and the war on terrorism created a need for replacements for lost equipment and systems, spare parts, and new features on existing systems as new needs were identified in the ever-changing environment. Since the wind down of those wars, recent national defense spending has shown slow but steady declines as less of those services are needed. Connecticut is one of the few states that has seen a rise in recent defense spending due to an increased emphasis on upgrading the United States submarine fleet.

TABLE 48
CONNECTICUT DEFENSE CONTRACT AWARDS AND GSP

Federal Fiscal Year	Connecticut	U.S.	Cal. Year CT as % of U.S.	Cal. Year	3-year	CT Awards as % of CT GSP
	Defense Contract Awards (\$ Millions)	Defense Contract Awards (\$ Millions)		Current Dollars (\$ Millions)	Average CT Awards (\$ Millions)	
2005	8,982	239,339	3.8%	205,841	8,627	4.2%
2006	7,665	262,130	2.9%	218,174	8,494	3.9%
2007	8,617	298,887	2.9%	231,897	8,421	3.6%
2008	12,226	354,847	3.4%	234,906	9,502	4.0%
2009	11,852	331,051	3.6%	225,941	10,898	4.8%
2010	11,239	323,082	3.5%	231,017	11,772	5.1%
2011	12,491	329,257	3.8%	234,385	11,861	5.1%
2012	12,750	317,659	4.0%	237,404	12,160	5.1%
2013	10,036	268,313	3.7%	245,128	11,759	4.8%
2014	13,208	260,446	5.1%	251,509	11,998	4.8%

Source: Bureau of Economic Analysis, IHS Economics

Some of the primary defense systems of interest to Connecticut include:

1. CH-53K Heavy Lift Helicopter
2. UH-60 Utility Helicopter (Blackhawk)
3. S-70i Black Hawk Helicopter
4. MH-60R Helicopter (Seahawk)
5. MH-60S Helicopter (Seahawk)
6. C-17 Globemaster Aircraft
7. F-15 Aircraft
8. F-16 Aircraft
9. F-35 Joint Strike Fighter (JSF) Aircraft
10. H-92 Superhawk
11. S-70B Seahawk
12. SA-38B Surveillance Aircraft
13. SA2-37B Reconnaissance Aircraft
14. Virginia Class Submarine

Economic Report of the Governor

TABLE 49
COMPARISON OF STATE PRIME CONTRACT AWARDS
Federal Fiscal Year 2014

State	Prime Contract Awards (\$ 000's)	Rank	\$ Per Capita Prime Contract Awards		State	Prime Contract Awards (\$ 000's)	Rank	\$ Per Capita Prime Contract Awards	
			Awards	Rank				Awards	Rank
Virginia	33,667,751	1	4,047	1	Utah	1,535,681	30	523	26
Connecticut	13,207,822	4	3,672	2	Florida	9,775,688	7	492	27
Maryland	13,026,503	5	2,181	3	Oklahoma	1,839,096	28	475	28
Alaska	1,505,252	31	2,043	4	Nevada	1,275,110	34	450	29
Alabama	8,837,471	9	1,823	5	Louisiana	2,079,536	27	447	30
Hawaii	2,156,774	26	1,521	6	Delaware	405,165	43	434	31
Massachusetts	9,455,375	8	1,403	7	South Dakota	347,349	44	408	32
Kentucky	6,038,085	15	1,369	8	Ohio	4,503,942	18	389	33
Arizona	8,593,066	10	1,279	9	Indiana	2,468,122	23	374	34
Missouri	7,164,760	12	1,182	10	Iowa	1,101,244	38	355	35
Colorado	5,790,444	16	1,083	11	Nebraska	646,894	40	344	36
Washington	7,577,461	11	1,075	12	Illinois	4,305,705	19	334	37
Maine	1,425,130	32	1,072	13	New York	6,276,704	14	318	38
Texas	23,907,150	3	889	14	North Dakota	222,441	46	302	39
New Hampshire	1,132,818	37	854	15	North Carolina	2,530,849	22	255	40
California	30,902,111	2	797	16	Michigan	2,438,144	24	246	41
Pennsylvania	10,160,631	6	795	17	Vermont	150,132	49	240	42
Rhode Island	825,146	39	782	18	Wisconsin	1,290,645	33	224	43
Mississippi	2,271,603	25	759	19	Arkansas	602,714	41	203	44
Minnesota	3,853,825	20	707	20	Montana	204,438	47	200	45
Georgia	6,302,233	13	625	21	Tennessee	1,178,485	36	180	46
New Jersey	5,540,307	17	620	22	Wyoming	91,193	50	156	47
New Mexico	1,263,672	35	606	23	Oregon	573,717	42	145	48
South Carolina	2,752,241	21	570	24	West Virginia	239,749	45	130	49
Kansas	1,572,942	29	542	25	Idaho	161,279	48	99	50
U.S. Total	260,445,865		817						

Source: Federal Procurement Data System, Bureau of the Census

Economic Report of the Governor

Retail Trade in Connecticut

Consumer spending on goods and services, ranging from pencils to refrigerators to haircuts to electricity, accounted for approximately 70% of the gross domestic product (GDP) in fiscal 2014. During the last decade, variations in retail trade closely matched variations in GDP growth, making retail trade an important barometer of economic health.

The North American Industry Classification includes establishments that engage in selling merchandise for personal or household consumption and rendering services incidental to the sale of the goods in the retail trade industry. The North American Industry Classification System (NAICS) codes for retail trade are from NAICS 44 to NAICS 45. In general, retail establishments are classified in these codes according to the principal lines of commodities sold (apparel, groceries, etc.) or the usual trade designation (liquor store, drug store, etc.).

The following table shows the major group in each NAICS code as well as the state's retail trade history for the past two fiscal years. Retail sales reflect the pulse of economic conditions: they perform strongly as the economy expands and perform poorly during a recession. Connecticut retail trade in fiscal 2015 totaled \$54.8 billion, a 1.1% increase over fiscal year 2014 and the fifth straight year of increased total trade.

TABLE 50
RETAIL TRADE IN CONNECTICUT
(In Millions)

<u>NAICS</u>	<u>Industry</u>	<u>FY</u> <u>2014</u>	<u>% of</u> <u>Total</u>	<u>FY</u> <u>2015</u>	<u>% of</u> <u>Total</u>	<u>%</u> <u>Change</u>
441	Motor Vehicle and Parts Dealers	\$9,099	16.8%	\$9,585	17.5%	5.3
442	Furniture and Home Furnishings Stores	\$1,253	2.3	\$1,306	2.4	4.3
443	Electronics and Appliance Stores	\$1,641	3.0	\$1,653	3.0	0.7
444	Building Material and Garden Supply Stores	\$3,161	5.8	\$2,828	5.2	(10.6)
445	Food and Beverage Stores	\$11,184	20.6	\$10,743	19.6	(3.9)
446	Health and Personal Care Stores	\$4,715	8.7	\$4,848	8.8	2.8
447	Gasoline Stations	\$3,774	7.0	\$3,330	6.1	(11.8)
448	Clothing and Clothing Accessories Stores	\$2,946	5.4	\$2,993	5.5	1.6
451	Sporting Goods, Hobby, Book and Music Stores	\$1,055	1.9	\$1,055	1.9	0.0
452	General Merchandise Stores	\$5,381	9.9	\$5,509	10.1	2.4
453	Miscellaneous Store Retailers	\$5,053	9.3	\$5,740	10.5	13.6
454	Nonstore Retailers	<u>\$4,956</u>	<u>9.1</u>	<u>\$5,208</u>	<u>9.5</u>	<u>5.1</u>
	Total	\$54,217	100.0%	\$54,796	100.0%	1.1%
	Durables (NAICS 441, 442, 443, 444)	\$15,154	28.0%	\$15,372	28.1%	1.4%
	Nondurables (All Other NAICS)	\$39,063	72.0%	\$39,424	71.9%	0.9%

Source: Connecticut Department of Revenue Services

Economic Report of the Governor

Retail trade can be broken down into two major categories; durable and nondurable goods. Durable goods are items that presumably last three years or more and include items such as automobiles, furniture, and appliances. Nondurable goods have a shorter life span and include items such as food, gas, apparel, and other miscellaneous products. Durable goods are normally big-ticket items that are sensitive to interest rates and the overall economic climate. Purchases of durable goods increase when interest rates decrease or consumers' income grows and consumer confidence increases. This was the case in fiscal 2015 when durable goods sales grew by 1.4%.

Sales of durable goods experience greater fluctuations during changing economic conditions. Growth in sales at retail stores that concentrate on durable goods tends to increase faster than the growth in gross state product during expansionary years and experience greater declines during recessionary years. Sales of nondurable goods are typically less volatile as most items are deemed "necessities" and relatively inelastic regardless of price variations. Necessities include such items as food, footwear, clothing, gasoline, and drugs. The previous table shows that Connecticut sales of nondurable goods grew by 0.9% in fiscal 2015.

In addition to the traditional transactions occurring in Connecticut-based "bricks and mortar" establishments, a significant amount of retail activity is also taking place within and beyond the state's borders through mail and on-line order sales.

U.S. Supreme Court rulings forbid states from forcing retailers to collect sales tax unless the seller has a physical presence in the state where the purchase is made (nexus). As retail sales via the internet grew rapidly, the U.S. Department of Commerce started estimating e-commerce quarterly transactions in late 1999. In fiscal 2015, national retail e-commerce sales are estimated at \$318.1 billion, accounting for 6.8% of total retail sales of \$4,659.5 billion. Retail transactions through the internet in general have increased much faster than traditional brick and mortar sales. Estimated e-commerce retail sales rose by 14.6% in fiscal 2015 compared to a 2.6% increase for traditional retail sales. The estimate of e-commerce sales does not include travel agencies, financial services, manufacturers, and wholesalers.

Connecticut has seen an erosion of its tax base due to the internet sales trend. In a study conducted by the University of Tennessee's Center for Business and Economic Research in April 2009, it was estimated that in 2012, Connecticut would lose approximately \$63.8 million in state revenue due to e-commerce. Although the Office of Policy and Management believes that the revenue loss is significant, the exact amount is difficult to determine as more traditional "bricks and mortar" retailers with nexus in Connecticut establish internet sales channels and collect the state sales tax. The issue is compounded by the fact that in those instances where an internet retailer does not collect the tax, voluntary compliance by most residents to pay the use tax on such transactions has been low.

Currently, state and local governments as well as the private sector have undertaken a joint effort referred to as the Streamlined Sales Tax Project (SSTP). The project's aim is to fundamentally restructure the national sales tax system by creating a uniform taxable base, thereby simplifying

Economic Report of the Governor

tax administration among the states. The Streamlined Sales and Use Tax Agreement went into effect in October of 2005. As of December 2015, 24 of the 44 states who have authorized participation in SSTP have enacted legislation to fully comply with the agreement to become full-member states, including New Jersey, Rhode Island, and Vermont. Connecticut is currently one of the 44 states referred to as a participant state, as it has not enacted legislation to modify its sales tax.

For years, the world's largest internet retailer, Amazon, has resisted state efforts to require the collection of sales taxes on its sales. As more and more states pass legislation that indirectly circumvents current restrictions, Amazon has now joined the effort to work toward a national standard on taxing online sales. In addition, Amazon's desire to shorten delivery time has necessitated additional warehouse facilities in closer proximity to customers, thereby creating nexus in more jurisdictions. On November 1, 2013, Amazon began collecting sales tax in Connecticut, after it reached an agreement with the state that involved constructing a fifty million dollar distribution center in Windsor.

Retail trade as a percentage of disposable income in Connecticut decreased to 27.8% in fiscal 2015, from 28.5% in FY 2014. The state's per capita disposable income of \$54,770 in FY 2015 was 33.5% above the national average of \$41,024. In FY 2015, Connecticut per capita retail trade was estimated at \$15,235. With the highest per capita disposable income in the nation, continued long-term growth in retail sales is expected. In general, wealthier people tend to purchase more expensive cars and replace them more frequently. The same may be applicable for other durable goods such as computer equipment, appliances and furniture. Additional factors that affect the level of expenditures include tax burden, consumer confidence, economic climate as well as the condition of a household's balance sheet.

According to the 2012 economic census on retail sales, a survey that is done once every five years by the U.S. Department of Commerce, Connecticut had \$51.6 billion of retail sales, down from \$52.2 billion in 2007. Retail sales varied among the state's eight counties with most sales concentrated in Fairfield, Hartford, and New Haven. These three counties accounted for 78.6% of total sales, with the remaining 21.4% spread among the other five counties. The following two tables provide detail on retail sales activity by county. Growth in sales also varied among counties. Between 2007 and 2012, the counties with most retail sales all experienced declining growth. Whereas Litchfield, Middlesex, Tolland, and Windham, which collectively account for 14.4% of Connecticut's retail sales, grew modestly between 2007 and 2012.

Although the retail trade sector is one of the major sources of jobs in the Connecticut economy, the number of establishments and employment within the sector has declined. In 2012, the sector had 12,597 establishments with 182,528 employees, down from 13,807 establishments and 196,133 employees in 2007.

Economic Report of the Governor

TABLE 51
RETAIL SALES IN CONNECTICUT BY COUNTY

	Sales (\$M)	% Of Total	Number of Employees	Per Employee Sales (\$ 000's)	Number of Establish.	Employees Per Establish.	Annual Payroll (\$M)	% of Total
A. 2007 Economic Census								
Fairfield	15,702.2	30.1%	53,738	292.2	3,770	14.3	1,648.8	32.0%
Hartford	13,820.7	26.5%	53,241	259.6	3,423	15.6	1,310.7	25.4%
Litchfield	2,458.2	4.7%	9,059	271.4	788	11.5	239.8	4.6%
Middlesex	2,129.2	4.1%	8,300	256.5	749	11.1	209.9	4.1%
New Haven	11,785.3	22.6%	46,058	255.9	3,172	14.5	1,112.5	21.6%
New London	3,883.0	7.4%	15,660	248.0	1,123	13.9	390.4	7.6%
Tolland	1,206.3	2.3%	5,207	231.7	406	12.8	126.3	2.4%
Windham	<u>1,180.6</u>	<u>2.3%</u>	<u>4,870</u>	<u>242.4</u>	<u>376</u>	<u>13.0</u>	<u>122.0</u>	<u>2.3%</u>
Total	52,165.5	100.0%	196,133	266.0	13,807	14.2	5,160.4	100.0%
B. 2012 Economic Census								
Fairfield	15,166.5	29.4%	49,401	307.0	3,459	14.3	1,553.9	31.2%
Hartford	13,762.4	26.7%	49,862	276.0	3,134	15.9	1,257.3	25.3%
Litchfield	2,655.0	5.1%	8,669	306.3	692	12.5	241.2	4.8%
Middlesex	2,202.6	4.3%	8,548	257.7	659	13.0	215.5	4.3%
New Haven	11,567.5	22.4%	41,925	275.9	2,901	14.5	1,100.7	22.1%
New London	3,679.3	7.1%	14,372	256.0	1,023	14.0	364.3	7.3%
Tolland	1,303.1	2.5%	4,932	264.2	373	13.2	120.4	2.4%
Windham	<u>1,296.2</u>	<u>2.5%</u>	<u>4,819</u>	<u>269.0</u>	<u>356</u>	<u>13.5</u>	<u>121.2</u>	<u>2.4%</u>
Total	51,632.5	100.0%	182,528	282.9	12,597	14.5	4,974.5	100.0%
C. Growth (%) from 2007 to 2012								
Fairfield	(3.4)		(8.1)	5.1	(8.2)	(0.1)	(5.8)	
Hartford	(0.4)		(6.3)	6.3	(8.4)	2.0	(4.1)	
Litchfield	8.0		(4.3)	12.8	(12.2)	8.9	0.6	
Middlesex	3.4		3.0	0.5	(12.0)	16.9	2.7	
New Haven	(1.8)		(9.0)	7.8	(8.5)	(0.3)	(1.1)	
New London	(5.2)		(8.2)	3.2	(8.9)	1.1	(6.7)	
Tolland	8.0		(5.3)	14.0	(8.1)	3.3	(4.6)	
Windham	9.8		(1.0)	11.0	(5.3)	4.1	(0.6)	
Total	(1.0)		(6.9)	6.3	(8.8)	2.0	(3.6)	

Source: U.S. Department of Commerce, 2012 Economic Census

Economic Report of the Governor

The following table compares retail sales with personal income growth and changes in population. Faster sales growth in Tolland and Windham is reflected in personal income growth of 18.3 and 17.3, respectively.

TABLE 52
RETAIL SALES, INCOME AND POPULATION BY COUNTY

	Retail Sales	Personal Income (\$B)			Population (000's)		
	% Change			% Change			% Change
	<u>'07 to '12</u>	<u>2007</u>	<u>2012</u>	<u>'07 to '12</u>	<u>2007</u>	<u>2012</u>	<u>'07 to '12</u>
Fairfield	(3.4)	71.02	77.30	8.8	898.6	936.2	4.2
Hartford	(0.4)	46.24	53.43	15.5	885.2	897.9	1.4
Litchfield	8.0	10.17	11.67	14.7	189.9	187.4	(1.3)
Middlesex	3.4	8.89	10.16	14.2	164.2	165.6	0.8
New Haven	(1.8)	39.92	45.57	14.1	854.0	863.8	1.2
New London	(5.2)	12.45	13.96	12.1	271.0	274.4	1.2
Tolland	8.0	6.97	8.24	18.3	149.8	152.0	1.4
Windham	9.8	4.42	5.19	17.3	117.3	117.9	0.5
Connecticut	(1.0)	200.08	225.50	12.7	3,530.1	3,595.1	1.8

Source: U.S. Department of Commerce, Bureau of Economic Analysis, Bureau of Census

Small Business in Connecticut

Small businesses in the nation, as well as in Connecticut, play an important role in overall economic activity. Small businesses are often cited as major labor generators, important job providers, and the primary technological innovators. Studies have shown that small businesses contributed the majority of the scientific and technological advances and developments in the twentieth century. They tend to be externally efficient which leads to the creation of new products, new jobs, and new processes. On the other hand, large business firms tend to be internally efficient, which leads to substituting capital for labor and focusing on cutting operational costs. In addition, small businesses help develop the free enterprise system, deterring monopoly formation by providing competition. With greater innovation and product differentiation occurring within small businesses, large firms are forced to improve productivity in order to respond to marketplace competition, thereby increasing society's economic well-being and standard of living.

Structurally, small businesses tend mostly to be sole proprietorships and partnerships, and, to a lesser extent, corporations. These organizations range from "mom and pop" stores to high-tech instrument laboratories. The definition of a small business, however, varies, and may even change over time.

Economic Report of the Governor

Theoretically, a small business firm is one that does not benefit from an economy of scale available to large firms. The U.S. Small Business Administration (SBA), in determining eligibility for loans and assistance, takes into account whether the entity concerned is dominant in its market. Other criteria include the amount of annual receipts and number of employees, which may vary by industry. The definition of small business varies from state to state based on comparative size in the regional economy, industrial structure, and policy emphasis.

According to Connecticut General Statutes, Chapter 588r, a small business is a firm with 500 or fewer employees including employees in any subsidiary or affiliate of a corporation, partnership, or sole proprietorship, operating for profit. For entities focused on special innovative research programs, the size of a small business is based upon federal guidelines.

According to a classification established by the U.S. Department of Commerce, businesses can be broken down into several groups by employment size. Since the definition for small business is not generally agreed upon, the Department of Commerce simply lists all employment classes for comparison rather than identifying them by specific size.

In 2012, the latest year data is available, among the total 88,210 establishments employing 1,463,732 persons in Connecticut, small businesses with fewer than 500 employees accounted for 84.2% of total establishments and 49.2% of the total labor force.

The table on the following page shows the breakdown of employment for manufacturing and non-manufacturing sectors and the distribution statistics for establishments and employment by business size in Connecticut. The table demonstrates that small business firms play an important role in both the manufacturing sector and the nonmanufacturing sector. In 2012, manufacturing businesses with fewer than 500 employees accounted for 50.3% of manufacturing employment, compared to 51.0% in 2011 and 45.9% in 2000. In the nonmanufacturing sector, small business firms accounted for 49.1% of all employment in 2012, 49.6% in 2011, and 50.8% in 2000. Cumulatively, small businesses accounted for 49.2% of total employment in 2012, though 84.2% of business establishments were firms with fewer than 500 employees.

Between 2000 and 2010, the two recessions that occurred during the decade had a very noticeable impact on both small businesses and total employment in Connecticut. In 2010, total employment in the state was down 7.1% from 2000, but small businesses were hit especially hard, particularly in the manufacturing sector. From 2000-2010, the number of firms with fewer than 500 employees in the manufacturing sector decreased by 28.3%, compared to a decrease of 4.8% in the nonmanufacturing sector. Overall, small business employment decreased 8% from 2000 to 2010.

Economic Report of the Governor

TABLE 53
SMALL BUSINESS EMPLOYMENT IN CONNECTICUT
(Size of Employment in Thousands)

<u>Calendar Year</u>	<u>1 to 4</u>	<u>5 to 9</u>	<u>10 to 19</u>	<u>20 to 99</u>	<u>100 to 499</u>	<u>500&cup</u>	<u>Total</u>
A. Employment							
<u>Manufacturing Employment</u>							
2000	3.5	6.1	12.1	44.3	40.8	125.9	232.8
2010	3.1	5.1	8.8	31.5	28.2	75.9	152.6
2011	3.0	5.0	8.3	31.5	29.0	73.7	150.6
2012	3.0	5.2	8.0	32.3	28.8	76.4	153.8
(# Change, 00-10)	(0.4)	(1.0)	(3.3)	(12.8)	(12.6)	(50.0)	(80.2)
(# Change, 11-12)	(0.0)	0.2	(0.3)	0.8	(0.2)	2.7	3.1
(% Growth, 00-10)	-11.4%	-16.4%	-27.3%	-28.9%	-30.9%	-39.7%	-34.5%
(% Growth, 11-12)	-0.8%	4.5%	-3.8%	2.4%	-0.6%	3.6%	2.1%
<u>Nonmanufacturing Employment</u>							
2000	72.9	85.5	101.0	227.2	181.2	644.8	1,313.5
2010	68.7	78.1	97.9	210.8	181.4	647.5	1,284.4
2011	67.2	78.2	95.3	210.5	181.9	658.8	1,292.0
2012	67.7	78.4	95.7	216.1	185.1	666.9	1,310.0
(# Change, 00-10)	(4.2)	(7.4)	(3.1)	(16.4)	0.2	2.7	(29.1)
(# Change, 11-12)	0.5	0.2	0.3	5.7	3.2	8.1	18.0
(% Growth, 00-10)	-5.8%	-8.7%	-3.1%	-7.2%	0.1%	0.4%	-2.2%
(% Growth, 11-12)	0.8%	0.2%	0.4%	2.7%	1.7%	1.2%	1.4%
<u>Total Employment</u>							
2000	76.4	91.6	114.1	271.4	222.0	770.6	1,546.3
2010	71.9	83.2	106.8	242.3	209.5	723.4	1,437.0
2011	70.2	83.3	103.6	242.0	210.9	732.6	1,442.6
2012	70.7	83.7	103.7	248.4	213.9	743.3	1,463.7
(# Change, 00-10)	(4.5)	(8.4)	(7.3)	(29.1)	(12.5)	(47.2)	(109.3)
(# Change, 11-12)	0.5	0.4	0.0	6.4	3.0	10.7	21.1
(% Growth, 00-10)	-5.9%	-9.2%	-6.4%	-10.7%	-5.6%	-6.1%	-7.1%
(% Growth, 11-12)	0.7%	0.5%	0.0%	2.7%	1.4%	1.5%	1.5%
B. Total Establishments							
2012	40.3	12.9	8.2	8.3	4.6	14.0	88.2
C. Distribution of Establishments & Employment, 2011							
Establishments	45.7%	14.6%	9.3%	9.4%	5.2%	15.8%	100.0%
Cumulative	45.7%	60.3%	69.6%	79.0%	84.2%	100.0%	
Total Employment	4.8%	5.7%	7.1%	17.0%	14.6%	50.8%	100.0%
Cumulative	4.8%	10.5%	17.6%	34.6%	49.2%	100.0%	
Nonmfg Employ.	5.2%	6.0%	7.3%	16.5%	14.1%	50.9%	100.0%
Cumulative	5.2%	11.2%	18.5%	35.0%	49.1%	100.0%	

Note: Totals may not add due to rounding.

Source: U.S. Bureau of the Census

Economic Report of the Governor

Small businesses are constantly facing operational difficulties and at the same time confronting competition from larger firms. To ensure constant growth for the economy, it is imperative that policy makers pay special attention to small businesses. Recognizing that small business is an important engine of economic growth, the state has aggressively created and provided a wide range of programs and services aimed to help expand or set-up new businesses. The Connecticut Department of Economic and Community Development (DECD) has partnered with the Connecticut Economic Resource Center, Inc., to provide programs such as counseling, training, financing, technical assistance, and trade information to assist this important sector.

For more information, please write or contact the following:

Connecticut Economic Resource Center, Inc.
805 Brook Street, Building 4
Rocky Hill, CT 06067
<http://cerc.com/>
1-860-571-7136
1-800-392-2122
Fax: 1-860-571-7150

Connecticut Department of Economic and Community Development
Research Division
505 Hudson Street
Hartford, CT 06106
<http://www.ct.gov/ecd/>
1-860-270-8000

Nonfinancial Debt

For many years, national attention has been focused on the issue of the federal budget and trade deficits, as well as the level of indebtedness of domestic nonfinancial entities. Domestic Nonfinancial Debt (DNFD) is the aggregate net indebtedness of all nonfinancial borrowers in the United States. It includes the borrowings of all levels of government, business and households. It excludes the debt of foreigners and the liabilities of financial intermediaries such as commercial banks, thrift institutions and finance companies. As required by the Full Employment and Balanced Growth Act of 1978, DNFD is compiled quarterly by the Federal Reserve System.

The following table shows the 25-year history from 1990 to 2014 for total DNFD and each of its four components – households, businesses, federal government, and state and local governments. In 2014, the year-end total domestic nonfinancial debt outstanding was \$43,255.5 billion, approximately 2.5 times GDP. Total non-financial debt between 2000 and 2014 has grown 126.9%, outpacing the growth in GDP of 68.7%. Hovering at a 9.3% growth rate from

Economic Report of the Governor

2003 through 2007, total non-financial debt slowed to an average annual growth of 3.9% between 2009 and 2014 due to the financial crisis that hit the U.S. economy in late 2007.

TABLE 54
DOMESTIC NON-FINANCIAL DEBT (DNFD) OUTSTANDING BY SECTOR IN THE U.S.
In Billions of Dollars at Year-end

	<u>1990</u>	<u>2000</u>	<u>2014</u>	2014 % of <u>Total</u>	Growth	
					(1990 to 2000)	(2000 to 2014)
Private Sector						
Households						
Home Mortgages	\$2,489.3	\$4,813.9	\$9,403.2	21.7%	93.4%	95.3%
Consumer Credit	824.4	1,741.3	3,311.9	7.7%	111.2%	90.2%
Other	<u>292.9</u>	<u>639.5</u>	<u>1,161.0</u>	2.7%	118.3%	81.5%
Total - Households	\$3,606.6	\$7,194.7	\$13,876.1	32.1%	99.5%	92.9%
Business						
Mortgages	\$1,210.8	\$1,738.6	\$3,630.2	8.4%	43.6%	108.8%
Corporate Bonds	1,008.2	2,274.8	4,405.5	10.2%	125.6%	93.7%
Other	<u>1,554.8</u>	<u>2,565.6</u>	<u>3,975.1</u>	9.2%	65.0%	54.9%
Total - Business	\$3,773.8	\$6,579.0	\$12,010.8	27.8%	74.3%	82.6%
Total - Private Sector	\$7,380.4	\$13,773.7	\$25,886.9	59.8%	86.6%	87.9%
Public Sector						
Federal Government*	\$2,830.8	\$4,090.0	\$14,441.1	33.4%	44.5%	253.1%
State & Local Gov't	<u>987.4</u>	<u>1,197.9</u>	<u>2,927.5</u>	6.8%	21.3%	144.4%
Total - Public Sector	\$3,818.2	\$5,287.9	\$17,368.6	40.2%	38.5%	228.5%
Total DNFD	\$11,198.6	\$19,061.6	\$43,255.5	100.0%	70.2%	126.9%
GDP, 4th Quarter	\$5,979.6	\$10,284.8	\$17,348.1		72.0%	68.7%
DNFD as a % of GDP	187.3%	185.3%	249.3%			

Source: Board of Governors of the Federal Reserve System, IHS Economics

*Excludes intra-governmental holdings of Treasury securities

Prior to 1990, household borrowing trailed that of businesses; however, faster growth since 1991 in home mortgages and consumer credit coupled with a steady increase in income helped catapult household borrowing to the top. By 2014, however, of the total \$43.3 trillion nonfinancial debt outstanding, the federal government accounted for 33.4%, followed by households at 32.1%, nonfinancial business at 27.8%, and state and local governments at 6.8%. However, debt outstanding in the private sector accounted for 59.8% of the total in 2014, down

Economic Report of the Governor

from 72.3% in 2000. Due to the financial crisis, deficit spending has led the federal government to overtake the household sector in total outstanding nonfinancial debt. In the aftermath of the Great Recession, a number of large federal fiscal stimulus programs starting in 2008 including tax rebate checks, the American Recovery & Reinvestment Act (ARRA), and job creation resulted in three consecutive years of more than \$1.2 trillion a year of federal borrowing. This represented more than 20% of the annual growth, yielding a public sector increase of 228.5% over the past thirteen years versus 87.9% for the private sector.

The DNFD-to-GDP ratio stood at 249.3% in 2014, up from 229.2% in 2007 and 185.3% in 2000, implying a faster growth in nonfinancial debt than GDP in the past decade. The DNFD-to-GDP ratio gained speed in the late 1980s as a result of a combination of nearly double-digit increases in federal borrowings and the deregulation of the financial markets. During the 1980s, non-bank financial institutions funneled funds more freely between the suppliers of capital and consumers, creating a more competitive and efficient market. The ratio declined in the 1990s as federal debt fell and the growth in borrowings by state and local governments slowed, which was also accompanied by more robust GDP growth. However, during the 2000s the ratio rebounded rapidly, resulting from an accommodative fiscal and monetary policy, less stringent financing standards on mortgages, and an economic recovery that stimulated borrowing and higher spending levels in both the household and business sectors. Growth in the DNFD-to-GDP ratio has stabilized recently, increasing slightly from 247.5% in 2010 to 249.3% in 2014.

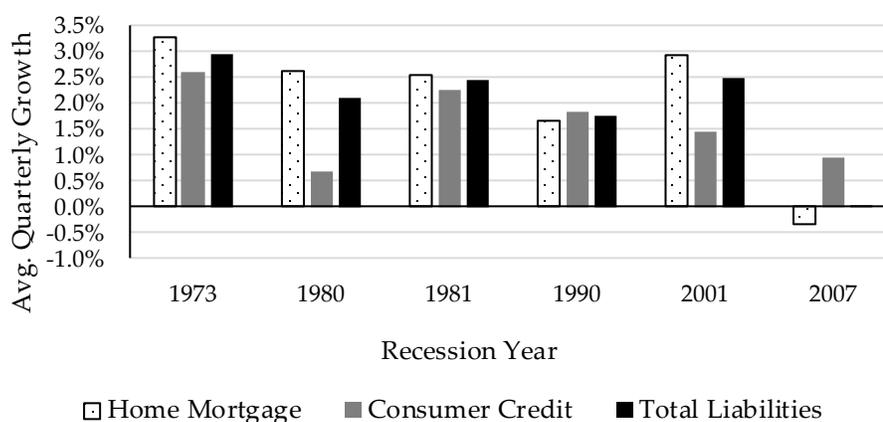
Household Borrowing

Household borrowing, which includes home mortgages, consumer credit, and other miscellaneous items, totaled \$13.9 trillion by the end of 2014. Of the \$13.9 trillion, home mortgage loans accounted for \$9.4 trillion, or 67.8% of household borrowing, followed by consumer credit at \$3.3 trillion, or 23.9%, and the remainder in other miscellaneous items. The graph below shows the trends in household borrowing since the 1973 recession; the bars show average quarterly growth in the major components of household borrowing from the start of each recession to the next peak.

Economic Report of the Governor

Household Borrowing

Average Quarterly Growth From Recession Peak



Source: Federal Reserve Bank of St. Louis

Quarterly growth in total liabilities averaged 1.7% during the 1990's. In the first half of the 1990s, growth in household borrowings averaged only 6.2% per year as sluggish income growth, the depressed value of real estate, and increased health insurance and educational costs made consumers more cautious. In the second half of the 1990s, average household borrowings climbed to 7.3% per year as a result of the continued healthy growth in income from wages, capital gains, and appreciation in home values.

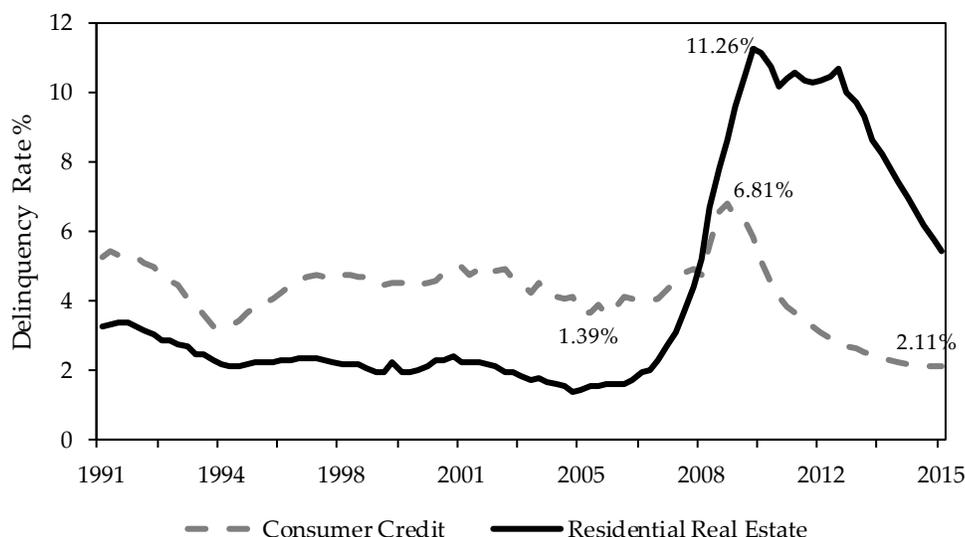
During the economic recovery following the 2001 recession, quarterly growth in borrowing averaged 2.5%, driven primarily by the 2.9% growth in home mortgages as a buildup of wealth generated by increases in income, an appreciation in real estate, favorably low interest rates, and loosened credit standards fueled a borrowing and spending surge.

With the onset of the Great Recession in 2007 and the subsequent slow economic recovery, quarterly growth in total household borrowing slowly increased by an average of 0.04%, when housing, as well as the consumer credit market, struggle to rebound from one of the worst financial environments since the end of WWII. This was atypical of past recoveries where credit expansion typically enhanced economic growth. The slow growth is primarily driven by the -0.3% growth in home mortgages, as consumers refrained from spending, paid off debt and increased savings to strengthen their balance sheets.

Economic Report of the Governor

U.S. Delinquency Rates

As of 2015 Quarter 3



Source: Federal Reserve Bank of St. Louis

As shown in the chart above, delinquency rates on all residential real estate loans increased after the onset of the Great Recession as a correction related to sub-prime and Alt-A mortgages (mortgages that are riskier than prime, but less risky than subprime mortgages) engulfed consumers. From an average rate of 2.3% from 1991 to mid-2008, delinquency rates reached a high of 11.3% in the first quarter of 2010. By the third quarter of 2015, this figure fell to 5.5%. The increase was due to plunging housing prices coupled with reset provisions on certain mortgages and a slowdown in the economy. Although the volume of resets on exotic mortgages peaked between mid-2007 and mid-2008, a backlog of unsold units and rising foreclosures continued to build up the inventory pipeline.

Consumer credit, not secured by real estate, is comprised of non-revolving credit (such as automobile and personal loans) and revolving credit (which includes credit card debt and store charges). It totaled \$3.3 trillion in late 2014, with non-revolving credit accounting for approximately 66.4% of the total consumer credit. Over the years, consumer credit has helped finance a large expansion in spending for consumer non-durables as more consumers rely on credit cards for making purchases online. Total consumer credit outstanding in 2014 increased by 6.0%, with revolving credit increasing by 1.2%. After averaging 4.4% from 1991 to mid-2007, delinquency rates on credit card loans have improved to 2.1% in mid-2015 from 6.8% in mid-2009.

Economic Report of the Governor

Business Borrowing

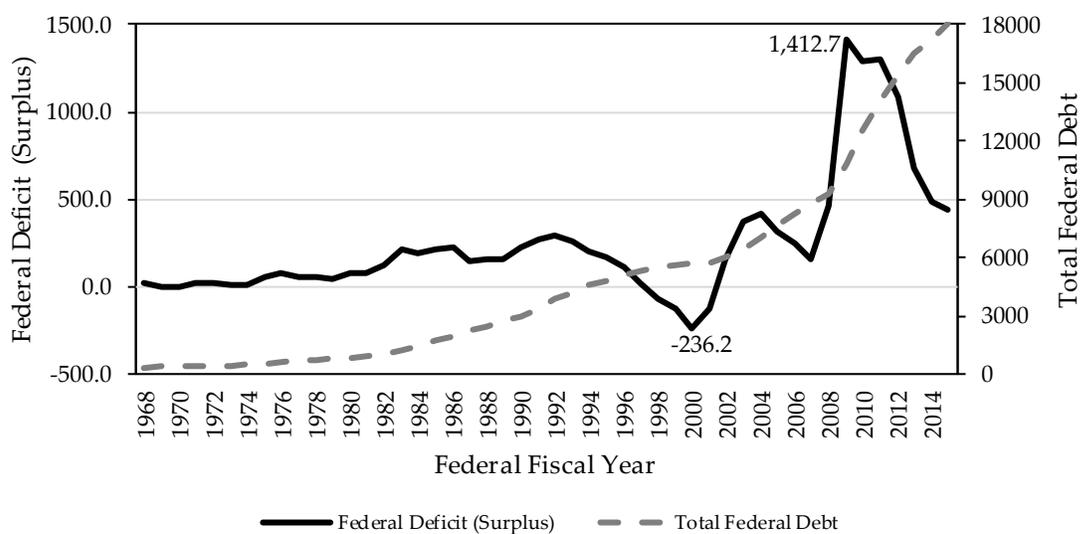
Business borrowings include debts owed by corporations, nonfarm corporations and farms. Total borrowings were \$12.0 trillion at the end of 2014. Borrowing instruments include corporate bonds, commercial paper, municipal securities, bank loans, and mortgages. Mortgages, corporate bonds, and others were divided almost evenly among the total. Business borrowings rose in 2014, with corporate bonds increasing by 6.6%, mortgages 4.5%, and other categories 7.7% compared to 2013. The Federal Reserve's near-zero interest rates and quantitative easing policy pushed the cost of debt to a favorably low level. Taking advantage of this opportunity of low interest rates, businesses replaced short term debt by extending debt maturities, bought back equity, and hoarded cash.

Government Borrowing

The U.S. federal budget has long been operating under deficits. The federal deficit started surging in the early 1980s from expansionary fiscal policy and tax cuts, intending to sacrifice a short-term loss in revenue for a long-term gain through more rapid economic growth. This expectation, however, was not fully realized and deficits persisted into the late 1990s.

Federal Deficit and Outstanding Debt

(in Billions of dollars)



Source: Federal Reserve Board of St. Louis

Note: For the purposes of the above graph, federal deficits are expressed as positive numbers.

As shown in the graph above, after registering deficits in most of the 1990s, the federal budget on unified basis, which includes all operating and trust funds such as Social Security and Medicare programs, turned to a surplus in 1998 which peaked at \$236.2 billion in federal fiscal

Economic Report of the Governor

year (FFY) 2000. Federal operations turned red again in FFY 2002 reaching a high of \$412.7 billion in FFY 2004 before slightly recovering. The onset of the Great Recession boosted federal spending for FFY 2009, FFY 2010 and FFY 2011. Contributing factors included the \$700 billion financial bailout known as the Troubled Asset Relief Program (TARP), and the \$787 billion economic stimulus program, per the American Recovery and Reinvestment Act (ARRA), along with increases in Medicare, Medicaid, unemployment insurance, Social Security, and defense spending. At the same time, tax receipts declined due to the effects of the recession and tax cuts from the ARRA program. The federal deficit reached a high of \$1,412.7 billion in FFY 2009 before dropping dramatically in FFY 14 to \$484.6 billion. The federal government in FFY 2014 spent an estimated \$1.20 for every dollar it took in, a decrease from \$1.28 in FFY 2013. The FFY 2015 deficit is estimated to continue to decrease to \$438.9 billion.

As the federal operating budget continued to post a deficit, the national debt also increased. Interest payments were the fourth largest single budgeted disbursement category, after defense, Social Security, and Medicare. By the end of FFY 2014, gross debt outstanding registered \$17.3 trillion, up 4.7% from FFY 2013, following increases of 7.4% and 9.4% in the previous two years. The U.S.'s deficit of 9.8% of GDP in FFY 2009 was a record high since WWII, but has since declined to 2.8% in FFY 2014. Research shows that a continued deficit of 4% of GDP and higher may hinder economic growth as it may create a risk of inflation, higher interest rates, dissaving, a crowding out of private investments and a devaluation of the dollar.

Of the 2014 total federal gross debt of \$17.3 trillion, \$12.8 trillion, or 73.8%, was held by the public and \$4.5 trillion, or 26.2%, by intra-governmental agencies. Public holders include individuals, corporations, state or local governments, foreign governments, and other entities outside of the United States while intra-governmental agencies hold federal securities in trust funds, revolving funds, and other special funds. The federal statutes authorize federal agencies such as the Federal Reserve Bank and various trust funds to invest in U.S. Treasury securities. The national debt of \$17.3 trillion in FFY 2014 stood at 99.6% of GDP.

According to the U.S. Census Bureau's "State Government Finances," state government debt outstanding in Connecticut at the end of fiscal 2013, the latest available year, was \$32.4 billion, compared to \$32.0 billion in 2012 and \$30.5 billion in 2011. Connecticut per capita state government debt has increased over the past three years, from \$8,505 in fiscal 2011 to \$8,991 in fiscal 2013. The fifty state average registered at \$3,590 in fiscal 2013, compared to \$3,661 and \$3,662 in 2012 and 2011, respectively.

Connecticut's overall credit rating is determined by four major rating agencies: Moody's Investors Service, Standard & Poor's Corporation, Fitch Investors Service, Inc., and Kroll Bond Ratings. As of the end of July 2015, Connecticut's General Obligation bonds are rated Aa3 by Moody's with a "stable" credit outlook and AA by Kroll Bond Ratings and Fitch Investors Service with a "stable" credit outlook. Connecticut is rated AA by Standard & Poor's Corporation with a negative outlook. The rating process provides information for investors about risk. High ratings generally result in lower borrowing costs.

Economic Report of the Governor

Savings by U.S. Households

The solid line on the below chart shows the national savings rate for U.S. consumers from 1959 through the third quarter of 2015. After remaining at an average of 11.4% between 1959 and 1980, the U.S. savings rate began trending down from a high of 12.4% in late 1981 to a low of 2.2% in mid-2005. The savings rate then climbed back up to 9.2% by the fourth quarter of 2012 before falling to the current level of 5.2% in the third quarter of 2015. The average savings rate for the past 5 years is 5.7%.



Note: DPI = Disposable Personal Income

Source: U.S. Department of Commerce, Bureau of Economic Analysis (BEA), Board of Governors of the Federal Reserve System

A low personal savings rate has been a concern for some time as it will negatively impact our economy and society. Consumers' financing of consumption has created an unsustainable level of consumer debt, and the lower national savings rate has not generated sufficient funds domestically to support the investment necessary to sustain long-run economic growth. This has created a situation requiring excessive reliance on foreign capital and an unfavorable current account balance.

In the aftermath of the Great Recession, households concerned about job losses and deflated home equity are saving more while paying down debt, boosting the savings rate. These measures have led to slow growth in personal consumption and economic growth. A 1% increase in the savings

Economic Report of the Governor

rate is equivalent to a spending decrease of approximately \$135 billion for the nation's economy, which equates to 0.75% of GDP. In Connecticut, a 1% increase in the savings rate would decrease spending by \$2.0 billion.

The chart also shows how the savings rate is affected by economic conditions by depicting the net worth of consumers as a percentage of disposable personal income. Before the mid-1970's, the savings rate was trending upward, with the relative net worth generally decreasing. During this period, before various innovative and creative financing mechanisms were available to the middle class, people generally lived on cash. During hard times, they may have saved less, left existing savings untouched to grow as long as possible, and eventually lived on what they had saved. After the mid-1970s, when credit cards and home equity loans became available to more households, the "wealth effect" took hold and people began to spend more because they had more assets to leverage and finance their consumption. From this period onward, the relative net worth generally moved inversely with the savings rate due to the acceleration in capital gains.

The savings rate is defined as personal savings divided by disposable personal income. Disposable personal income is defined as total personal income less "personal current taxes," which includes personal tax and certain nontax payments to governments, but excludes sales tax and property tax payments. Personal savings is defined as disposable personal income less consumption expenditures (including consumer durables), interest payments, and net transfer payments to the rest of the world.

The savings rate is often criticized because, by definition, personal income does not include the sale of existing assets. Realization of capital gains or losses from the appreciation or depreciation of assets such as stocks, bonds and antique collections, etc. are excluded in personal income, leading to under-/overvaluation of the income level. The definition of personal consumption outlay includes expenditures that might arguably be considered investments. For example, the purchase of a computer, a consumer durable, for education or training is treated as consumption. Mortgage interest payments also could be considered part of an investment. These expenditures are essentially "hidden savings". In today's economy, education and training, rather than physical capital, are the major inputs for economic growth. Education expenditures at all levels in the U.S. in 2008 accounted for approximately 5.5% of GDP, compared to 7.7% in Denmark, the highest among major industrialized nations, and 3.4% in Japan, according to data compiled by The World Bank. Critics therefore conclude that the United State's lower national savings rate may be due to an understated personal income with overstated consumption.

Household Balance Sheet

The Federal Reserve Bank's "Flow of Funds Accounts" contains statistics on the assets, liabilities, and net worth for the household sector. The table below shows these three components that comprise a balance sheet for 1970, 2007, and 2015, to evaluate the financial position of the nation's households.

Economic Report of the Governor

TABLE 55
Balance Sheet of Households and Non-profit Organizations
In Billions of Dollars

	1970	% of	2007	% of	2015 Q3	% of	Average
	<u>Real \$*</u>	<u>Total</u>	<u>Real \$*</u>	<u>Total</u>		<u>Total</u>	<u>Growth**</u>
Assets							
Real Estate	6,328.4	23.7%	26,996.4	28.9%	24,981.0	25.1%	3.1%
Stock related	8,235.7	30.8%	33,993.7	36.3%	41,230.9	41.4%	3.6%
Other	12,145.0	45.5%	32,555.6	34.8%	33,338.0	33.5%	2.3%
Time & Saving Deposits	3,346.2	12.5%	8,742.5	9.3%	10,414.8	10.5%	2.6%
Corporate Bonds	183.6	0.7%	1,233.8	1.3%	599.0	0.6%	2.7%
Gov't Securities***	<u>902.0</u>	<u>3.4%</u>	<u>3,192.3</u>	<u>3.4%</u>	<u>2,802.9</u>	<u>2.8%</u>	<u>2.6%</u>
Total	26,709.1	100.0%	93,545.6	100.0%	99,550.0	100.0%	3.0%
Liabilities							
Home Mortgages	1,765.5	59.7%	12,269.4	73.7%	9,459.9	65.8%	3.8%
Consumer Credit	825.1	27.9%	3,023.3	18.2%	3,478.0	24.2%	3.2%
Other	<u>364.6</u>	<u>12.3%</u>	<u>1,349.0</u>	<u>8.1%</u>	<u>1,430.5</u>	<u>10.0%</u>	<u>3.1%</u>
Total	2,955.2	100.0%	16,641.6	100.0%	14,368.4	100.0%	3.6%
Net Worth							
	23,753.9		76,904.0		85,181.5		2.9%
Net Home Equity	4,562.9		14,727.0		15,521.1		2.8%
As a % of Net Worth	19.2%		19.1%		18.2%		
Per Capita Net Worth (\$)	115,109.1		253,532.5		264,374.7		1.9%
As a % of Total Assets							
Home Mortgages	6.6%		13.1%		9.5%		
Liabilities	11.1%		17.8%		14.4%		
Net worth	88.9%		82.2%		85.6%		

Note:

* Real dollar is calculated by using the estimated CPI-U for 2015

** Compound annual growth rate

*** Includes Treasury and Municipal securities

Source: Board of Governors of the Federal Reserve System

Assets

Total assets can be categorized into three components: real estate assets, stock related assets, and other assets (including bank deposits, bonds, money market fund shares, and consumer durable goods). In the third quarter of 2015, household assets totaled \$99,550.0 trillion with real estate comprising 25.1% of total assets, stocks 41.4%, and the remaining 33.5% in other assets. In 1970,

Economic Report of the Governor

real estate comprised 23.7% of total assets, stocks 30.8%, and all other assets 45.5%. This reflects that stock related assets rose in importance over the past four and a half decades relative to real estate and other assets.

From 1955 to 1970, total assets grew at a compound annual growth rate of 3.8%. Total asset growth then slowed in 1970, with a compound annual growth rate of 3.4% through 2007. From 1970 to 2007 total liabilities grew at a compound annual growth rate of 4.8%, as financial vehicles such as home equity loans and credit cards became popular. Total real assets reached a peak of \$93.5 trillion in 2007 before declining sharply during the great recession, reflecting the onset of the Great Recession.

Liabilities

Household liabilities totaled \$14.4 trillion in the third quarter of 2015. Home mortgages accounted for 65.8% of the total with consumer credit at 24.2% and other liabilities at 10.0%. This compared to 59.7%, 27.9%, and 12.3%, respectively, in 1970, reflecting a much faster growth in home mortgage borrowings. Between the first quarter of 2002 and the fourth quarter of 2007, quarterly growth in home mortgages, supported by extraordinarily favorable mortgage rates and an aggressive mortgage lending strategy, averaged 2.9%, outpacing growth in consumer credit (1.4%) and total liabilities (2.5%). Consumer credit primarily includes auto loans, personal loans, and credit card balances.

Net Worth

Net worth (assets less liabilities) measures the resulting financial condition of consumers, which affects the overall economy through its wealth impact on consumers' spending and business activities. Net worth totaled \$85.2 trillion in the third quarter of 2015. When measured in 2015 dollars, real net worth grew from \$23.8 trillion in 1970 to a pre-recession peak of \$76.9 trillion in 2007, before declining to \$62.5 trillion in 2008. Per capita real net worth increased from \$115,109 in 1970 to \$264,375 in 2015, with an annual growth rate of 1.9%.

Along with the increase in net worth has come the additional burden of greater liabilities. In 1970 liabilities accounted for 11.1% of total assets, yet by 2015 they had risen to 14.4% of assets. The primary driver of this change was an increase in home mortgage liability. Indeed, the ratio of home mortgages to total assets grew from 6.6% in 1970, to 13.1% in 2007, before falling to 9.5% in 2015. The increasing use of debt to finance American lifestyles has also increased the proportion of income that must be devoted to repaying that debt. Debt service, which consists of the required payments on outstanding mortgage and consumer debt, as a percentage of disposable personal income has gradually risen from 10.6% in 1980, the earliest available data, to 13.2% in the fourth quarter of 2007. Debt service has since declined to 10.1% as of second quarter 2015, a result of lower interest rates due to the onset of the Great Recession and the expansionary monetary policy implemented by the Federal Reserve.

Economic Report of the Governor

PERFORMANCE INDICATORS

This section is devoted to performance trends of various economic indicators for the United States, the New England region and Connecticut. Statistics are provided indicating the relative economic performance of these entities and showing their strengths and weaknesses.

Gross Product

Gross National Product (GNP) is defined as the aggregate current market value of final goods and services produced by a nation's citizens and capital, regardless of location, in a given period of time. GNP was generally used as a measure of a nation's economic performance to track the cyclical ups and downs of the economy, but GNP reflects more than domestic activity; products produced by citizens outside territorial borders are included, while products produced by foreign workers and capital located in the nation are excluded. As a result, Gross Domestic Product (GDP), which measures all economic activity within a territory and is consistent with other economic indicators such as employment and shipments of manufactured goods, has been adopted as a better measure of economic activity within a territory.

Because prices of goods and services change over time, both GNP and GDP may also change, even if there has been no change in physical output. Therefore, to measure changes in real output, they are adjusted by an index of the general price level and expressed in constant dollars. Other things being equal, when real gross product rises, the economy is experiencing an expansion; when real gross product falls, the economy is experiencing a decline. In the past, a fixed-weighted inflation index, the GDP deflator, had been used to measure real output, but with the rapid change in technology, price movements for certain commodities actually grew less than the price for all goods on average. As such, the traditional measurement of real product misstated the growth in output as it moved away from the base year, creating what is known as substitution bias. To correct for this bias, the U.S. Department of Commerce, Bureau of Economic Analysis, uses a chained-type inflation index, currently based on calendar year 2009.

One measure of a state's economic performance is Gross State Product (GSP). Like GDP, GSP is the current market value of all final goods and services produced by labor and property located in a state. In 2014, the State of Connecticut produced \$250.6 billion worth of goods and services – \$228.9 billion in 2009 chained dollars. This was an increase of 3.2% in current dollars and 1.0% in real dollars over 2014.

Between 2009 and 2014, the contribution to Connecticut's GSP from the information and professional and business service sectors increased, while manufacturing and FIRE (Finance, Insurance, and Real Estate) fell. Broadly defined services in the private sector, which include information, professional and technical services, health care and education, FIRE, and other services, increased to 60.6% of total GSP in 2014 from 59.7% in 2009. During this period, the contribution to GDP from services for the nation was relatively flat, increasing to 51.1% of GDP in 2014 from 51.0% in 2009. During this same time period, the manufacturing sector's contribution

Economic Report of the Governor

to the nation's GDP was also relatively flat, rising slightly from 12.1% in 2009 to 12.2% in 2014. Theoretically, Connecticut and the nation's service-based economies should help smooth the business cycle, reducing the span and depth of recessions and prolonging the length of expansions. Activities in service sectors are less susceptible to pent-up demand, less subject to inventory-induced swings, less intensive in capital requirements, and somewhat less vulnerable to foreign competition than the manufacturing sector. Connecticut began moving toward services sooner than the nation as a whole.

TABLE 56
GROSS PRODUCT

A. Millions of Current Dollars

Calendar Year	United States*		New England *		Connecticut	
	Dollars	% Growth	Dollars	% Growth	Dollars	% Growth
2009	14,320,114	(2.1)	792,445	(0.7)	226,572	(2.2)
2010	14,859,776	3.8	819,283	3.4	231,060	2.0
2011	15,406,003	3.7	839,300	2.4	233,027	0.9
2012	16,041,264	4.1	867,597	3.4	238,939	2.5
2013	16,549,228	3.2	882,222	1.7	242,878	1.6
2014	17,232,618	4.1	914,788	3.7	250,569	3.2
% Increase ('09 to '14)		20.3		15.4		10.6

B. Constant Dollars**

Calendar Year	United States*		New England *		Connecticut	
	Dollars	% Growth	Dollars	% Growth	Dollars	% Growth
2009	14,320,114	(2.7)	792,445	(2.8)	226,572	(4.5)
2010	14,628,169	2.2	812,028	2.5	228,918	1.0
2011	14,833,680	1.4	820,335	1.0	227,319	(0.7)
2012	15,127,489	2.0	829,635	1.1	227,751	0.2
2013	15,317,517	1.3	826,534	(0.4)	226,717	(0.5)
2014	15,659,221	2.2	839,442	1.6	228,901	1.0
% Increase ('09 to '14)		9.4		5.9		1.0

* Sum of States' Gross State Products.

** 2009 chained dollar series are calculated as the product of the chain-type quantity index and the 2009 current-dollar value of the corresponding series, divided by 100. The system for these calculations was converted from SIC Codes to the NAICS system starting in 1998.

Source: U.S. Department of Commerce, Bureau of Economic Analysis

Connecticut's production has historically been concentrated in two areas: finance, insurance and real estate (FIRE) and manufacturing. However, in 2014, professional and business services

Economic Report of the Governor

exceeded the manufacturing sector's contribution to Connecticut's GSP. In 2014, production in FIRE and professional and business services accounted for 40.3% of total production in Connecticut, compared to 32.0% for the nation and down slightly from 40.7% in 2009. This demonstrates that Connecticut's economy is more heavily concentrated in a few industries than the nation as a whole and this concentration has changed little in recent years. Connecticut's portion of U.S. total GSP has decreased from 1.58% in 2009 to 1.45% in 2014.

TABLE 57
GROSS PRODUCT BY SOURCE
(In Billions of Current Dollars)

Industry	----- Calendar 2009 -----				----- Calendar 2014 -----			
	U.S.	%	CT	%	U.S.	%	CT	%
Agriculture, Forest & Fisheries	137.7	1.0	0.271	0.1	215.4	1.3	0.391	0.2
Construction & Mining	867.6	6.1	7.098	3.1	1,117.8	6.5	7.920	3.2
Manufacturing	1,726.7	12.1	27.774	12.3	2,097.7	12.2	27.356	10.9
Wholesale Trade	822.8	5.7	12.754	5.6	1,044.5	6.1	14.859	5.9
Retail Trade	842.1	5.9	11.222	5.0	997.8	5.8	13.133	5.2
Transportation & Utilities	649.6	4.5	7.984	3.5	786.5	4.6	8.930	3.6
Information	705.3	4.9	10.620	4.7	824.7	4.8	12.974	5.2
Finance, Insurance, Real Estate	2,874.0	20.1	67.038	29.6	3,470.6	20.1	70.835	28.3
Professional, Business Services	1,661.1	11.6	25.206	11.1	2,057.0	11.9	30.018	12.0
Health Care & Education	1,214.0	8.5	22.157	9.8	1,419.6	8.2	25.588	10.2
Other Services	851.8	5.9	10.283	4.5	1,041.9	6.0	12.445	5.0
Government	<u>1,967.1</u>	<u>13.7</u>	<u>24.165</u>	<u>10.7</u>	<u>2,159.2</u>	<u>12.5</u>	<u>26.120</u>	<u>10.4</u>
Total	14,320.1	100.0	226.572	100.0	17,232.6	100.0	250.569	100.0
Broadly Defined Services*		51.0		59.7		51.1		60.6
CT as a % of U.S. Total GSP			1.58				1.45	

*Note: Broadly Defined Services includes Information, FIRE, Professional/Tech Services, Health Care/Education and Other Services

Source: U.S. Department of Commerce, Bureau of Economic Analysis

Per Capita Gross Product

Growth in gross product may not sufficiently reflect the overall improvement in the economy. Gross product may rise significantly, but population may increase even more rapidly, signifying no real improvement in the economy. Therefore, real per capita gross product, which takes into

Economic Report of the Governor

account increases in population and inflation, provides a better measure of the standard of living among differing economies.

Growth in Connecticut slowed during and following the recession of 2001, reflecting a struggle to recover from a deeper recession compared with the impact on the United States. The ratio of Connecticut's real per-capita output relative to the United States was generally increasing between 2004 and 2008, suggesting that Connecticut did eventually pull out of that recession with strength. The latest data shows that the most recent recession hit Connecticut hard in 2009, with real per-capita output dropping 4.9%. While nominal per-capita gross product in Connecticut has grown in Connecticut, real per-capita output declined slightly in 2011 and 2013. Per-capita output for the state relative to the nation dipped slightly between 2009 and 2014 from 136% of the U.S. level to 129%.

**TABLE 58
PER CAPITA GROSS PRODUCT**

A. Millions of Current Dollars

Calendar Year	United States*		New England*		Connecticut		
	Dollars	% Growth	Dollars	% Growth	Dollars	% Growth	% of U.S.
2009	46,680	(2.9)	55,017	(1.2)	63,612	(2.6)	136
2010	48,036	2.9	56,634	2.9	64,554	1.5	134
2011	49,422	2.9	57,774	2.0	64,900	0.5	131
2012	51,069	3.3	59,511	3.0	66,476	2.4	130
2013	52,289	2.4	60,262	1.3	67,478	1.5	129
2014	54,045	3.4	62,312	3.4	69,667	3.2	129
% Increase ('09 to '14)		15.8		13.3		9.5	

B. In Constant Dollars**

Calendar Year	United States*		New England*		Connecticut		
	Dollars	% Growth	Dollars	% Growth	Dollars	% Growth	% of U.S.
2009	46,680	(3.6)	55,017	(3.2)	63,612	(4.9)	136
2010	47,287	1.3	56,133	2.0	63,955	0.5	135
2011	47,586	0.6	56,468	0.6	63,311	(1.0)	133
2012	48,160	1.2	56,907	0.8	63,363	0.1	132
2013	48,397	0.5	56,458	(0.8)	62,988	(0.6)	130
2014	49,110	1.5	57,180	1.3	63,642	1.0	130
% Increase ('09 to '14)		5.2		2.6		0.0	

Source: U.S. Department of Commerce, Bureau of Economic Analysis & Bureau of the Census

* Sum of States' Gross State Products.

** 2009 chained dollar series are calculated as the product of the chain-type quantity index and the 2009 current-dollar value of the corresponding series, divided by 100. The system for these calculations was converted from SIC Codes to the NAICS system starting in 1998.

Economic Report of the Governor

Productivity and Unit Labor Cost

Gross State Product provides information to gauge Connecticut's efficiency in the use of labor, i.e., labor productivity. Rising productivity leads to an improved standard of living and puts downward pressure on inflation. In the table below, the column entitled Hourly Production shows labor productivity as the ratio of total output to total workhours in Connecticut's manufacturing sector. On an hourly basis, nominal output in the manufacturing sector increased from \$131.5 in 2001 to \$141.0 in 2013, a 7.2% increase in output per hour over the period.

Another approach allows for the assessment of the labor cost for each \$1 of product produced: the unit labor cost. Labor cost is one of the major input costs and is often cited as a critical indicator of competitiveness. The column labeled Unit Labor Cost shows the monetary cost which is equal to the total wages of all production workers divided by gross state product in the manufacturing sector. For each dollar of output costs, the unit labor cost has increased from 14.8 cents in 2004 to 17.3 cents in 2013, a 16.8% increase over the period, while production workers have seen an 18.8% increase in average hourly wages.

Overall, productivity depends upon a broad range of factors. Other than wages, the quality of management as well as the size and quantity of capital stock invested in the form of plant, machinery and equipment, and the employment of new technologies impact productivity. Any increase in labor productivity is the combined result of all these factors.

TABLE 59
CONNECTICUT'S MANUFACTURING LABOR PRODUCTIVITY

Cal. Year	Manufact. GSP (Million)	Production Workhours (Million)	Hourly Production (Output Per Hour)	Total Wages (Million)	Average Hourly Wages	Unit Labor Cost (¢ Per \$1 Output)
2004	\$30,407	231.2	\$131.5	\$4,509.9	\$18.35	14.8
2005	\$31,015	223.5	\$138.8	\$4,500.0	\$18.96	14.5
2006	\$35,312	219.6	\$160.8	\$4,549.1	\$19.79	12.9
2007	\$37,192	235.8	\$157.7	\$5,019.7	\$20.64	13.5
2008	\$36,117	218.0	\$165.7	\$4,841.6	\$21.43	13.4
2009	\$27,790	194.6	\$142.8	\$4,529.5	\$23.06	16.3
2010	\$28,194	187.0	\$150.8	\$4,496.8	\$23.70	15.9
2011	\$26,780	184.9	\$144.8	\$4,510.2	\$24.80	16.8
2012	\$27,126	195.2	\$138.9	\$4,667.4	\$23.95	17.2
2013	\$27,839	197.4	\$141.0	\$4,823.5	\$21.79	17.3
% Increase ('04-'13)			7.2		18.8	16.8

Source: U.S. Department of Commerce, Bureau of Economic Analysis
 U.S. Department of Commerce, Bureau of the Census, "Annual Survey of Manufactures"
 U.S. Department of Labor, Bureau of Labor Statistics

Economic Report of the Governor

Value Added

A full assessment of the performance of Connecticut's manufacturing sector requires information in addition to manufacturing employment. Employment figures provide only a partial view of what is actually occurring in the manufacturing sector of the Connecticut economy. Although Connecticut lost over 111,000 manufacturing jobs, or nearly 41%, between calendar year 1992 and 2013 according to the Bureau of Labor Statistics, the impact on the economy from this loss is partially mitigated by a long-term increase in productivity per worker.

Value added is the market value of a firm's output less the value of inputs which it purchased from other firms. Changes in productivity over time can be measured by dividing the value that is added to a product by the total number of production workers involved in producing that good. In calendar year 2013, each manufacturing worker in Connecticut added more than \$348,000 of value, 12.6% higher than the national average.

The following table lists value added per production worker for Connecticut and the U.S.

TABLE 60
VALUE ADDED PER PRODUCTION WORKER
(In Current Dollars)

Cal. Year	Conn.	United States	% Change From Prior Period		Cumulative % Change From 1992		Ratio of Conn. Value Added to U.S.
			Conn.	U.S.	Conn.	U.S.	
1992	\$143,074	\$122,387	38.6	28.9	-	-	1.169
1997	179,595	151,317	25.5	23.6	25.5	23.6	1.187
2002	219,805	182,512	22.4	20.6	53.6	49.1	1.204
2007	299,483	253,867	36.2	39.1	109.3	107.4	1.180
2008	313,512	255,682	4.7	0.7	119.1	108.9	1.226
2009	276,511	263,426	(11.8)	3.0	93.3	115.2	1.050
2010	313,652	296,423	13.4	12.5	119.2	142.2	1.058
2011	315,483	308,140	0.6	4.0	120.5	151.8	1.024
2012	331,034	294,085	4.9	(4.6)	131.4	140.3	1.126
2013	348,523	309,570	5.3	4.2	143.6	152.9	1.126

Note: Value Added Per Production Worker = $\frac{\text{Total Value Added by Manufacture}}{\text{Number of Production Workers}}$

Source: U.S. Department of Commerce, "Annual Survey of Manufactures"

Economic Report of the Governor

TABLE 61
VALUE ADDED PER PRODUCTION WORKER IN CONNECTICUT BY INDUSTRY
(In Current Dollars)

<u>Industry</u>	<u>2011</u>	<u>2013</u>	<u>% Change</u>
Manufacturing	\$315,483	\$348,523	10.5
Food	388,994	486,755	25.1
Paper	310,570	398,637	28.4
Printing	168,377	148,115	(12.0)
Chemical	370,554	559,607	51.0
Plastics & Rubber	171,645	196,494	14.5
Primary Metals	298,707	278,539	(6.8)
Fabricated Metals	195,734	212,342	8.5
Machinery	221,617	302,434	36.5
Computer & Electronic	362,862	425,264	17.2
Electrical Equipment	310,978	289,920	(6.8)
Transportation Equipment	529,469	513,377	(3.0)

Note: Value Added Per Production Worker = $\frac{\text{Total Value Added by Manufacture}}{\text{Number of Production Workers}}$

Source: U.S. Department of Commerce, "Annual Survey of Manufactures"

Value added per production worker can vary greatly among manufacturing sectors. Factors which may contribute to this variance include the mix between labor and capital, the overall cost structure of an industry, the volume of production, and the prevailing markup or profit on a product. The previous table segments value added per production worker by industry in Connecticut for calendar year 2011 and 2013, the two most recent years of available data from the Annual Survey of Manufacturers.

Capital Expenditures

Connecticut's manufacturers have also been making substantial investments in capital equipment. Total capital expenditures are defined as outlays for permanent additions and major alterations to manufacturing establishments and investments in new machinery and equipment used for replacement and additions to plant capacity. Organizations undertake capital projects for various reasons including to reduce costs, improve efficiencies, upgrade product quality, develop new products, and implement environmental and safety technology. According to the Annual Survey of Manufactures and the U.S. Census Bureau's Economic Census, for the past ten years, the level of capital expenditures within Connecticut has remained above one billion dollars. The following table details capital expenditures in Connecticut.

Economic Report of the Governor

TABLE 62
TOTAL CAPITAL EXPENDITURES IN CONNECTICUT
(In Millions of Dollars)

Calendar <u>Year</u>	Connecticut <u>Capital Expenditures</u>	Percent <u>Change</u>
2004	\$1,236.2	(0.5)
2005	1,201.6	(2.8)
2006	1,260.5	4.9
2007	1,638.3	30.0
2008	1,166.1	(28.8)
2009	1,036.7	(11.1)
2010	1,106.3	6.7
2011	1,274.0	15.2
2012	1,317.9	3.4
2013	1,280.8	(2.8)

Source: U.S. Department of Commerce, "Annual Survey of Manufactures", U.S. Census Bureau

Total Personal Income

Total personal income, defined as current income received by persons from all sources including public and private transfer payments but excluding transfers among persons, is a reliable measure of economic performance. Total personal income captures the manufacturing sector through manufacturing wages; the nonmanufacturing sector through wages in government, wholesale/retail trade, utilities, transportation, mining, personal services, etc.; the private sector through proprietors' income, etc.; and a part of agricultural activity via farm properties' income. Personal income is approximately 85% of Gross Domestic Product; hence, the two are well correlated.

The U.S. Department of Commerce defines the various sources of personal income as the following:

Wages and Salaries - the monetary remuneration of employees, including the compensation of corporate officers; commissions, tips and bonuses; and receipts in kind that represent income to the recipient. Wages and salaries are measured before deductions such as social security contributions and union dues.

Other Labor Income - consists primarily of employer contributions for employee pension and insurance funds and employer contributions for government social insurance.

Property Income - income from dividends, interest and rents.

Economic Report of the Governor

Dividends are payments in cash or other assets, excluding stock, by corporations organized for profit, to non-corporate stockholders who are U.S. residents.

Interest is the monetary and imputed interest income of persons from all sources. Imputed interest represents the excess of income received by financial intermediaries from funds entrusted to them by persons, over income disbursed by these intermediaries to persons. Part of imputed interest reflects the value of financial services rendered without charge to persons by depository institutions. The remainder is property income held by life insurance companies and private non-insured pension funds on behalf of persons; one example is the additions to policyholder reserves held by life insurance companies.

Rental income is the monetary income of persons (except those primarily engaged in the real estate business) from the rental of real property (including mobile homes); the imputed net rental income of owner-occupants of nonfarm dwellings; and the royalties received by persons from patents, copyrights, and rights to natural resources.

Proprietors' Income - the income, including income-in-kind, of sole proprietorships and partnerships and of tax-exempt cooperatives. The imputed net rental income of owner occupants of farm dwellings with certain adjustments is included.

Transfer Payments - income payments to persons, generally in monetary form, for which they do not render current services. These include payments by the government and business to individuals and nonprofit institutions.

Personal Contributions to Social Insurance - contributions made by individuals under the various social insurance programs. Payments by employees and the self-employed (farm and nonfarm) are included as well as contributions that are sometimes made by employers on behalf of their employees (i.e., those customarily paid by the employee but, under special arrangement, paid by the employer).

The correlation between Gross Domestic Product and personal income provides another basis of comparison among individual states. A comparison of growth rates in personal income is a good indicator of a state's present and potential future performance.

According to figures provided by the U.S. Bureau of Economic Analysis, personal income of Connecticut residents during fiscal year 2015 was \$237.1 billion, a 4.1% increase over fiscal year 2014. Total personal income in Connecticut increased 31.0% from fiscal 2006 to 2015. For the United States, total personal income increased 36.1%, and in the New England region, the increase for the identical period was 33.5%.

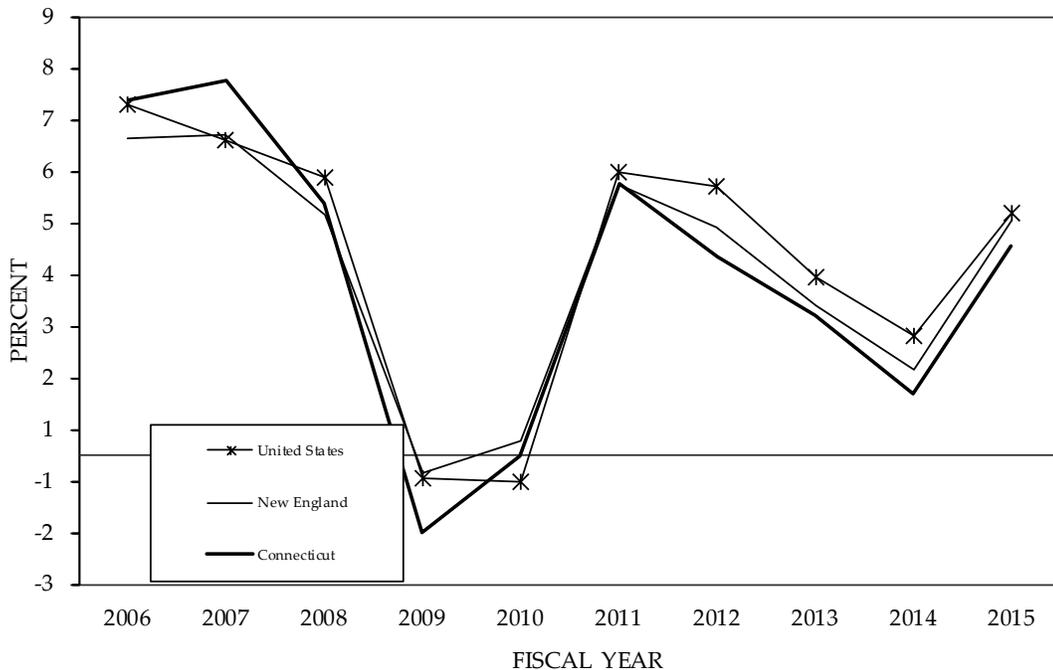
Economic Report of the Governor

The following table and chart show personal income for the United States, the New England region, and Connecticut.

TABLE 63
PERSONAL INCOME
(In Millions)

Fiscal Year	United States		New England		Connecticut	
	Dollars	% Growth	Dollars	% Growth	Dollars	% Growth
2006	11,029,825	6.80	637,592	6.14	181,013	6.88
2007	11,701,050	6.09	677,111	6.20	194,180	7.27
2008	12,329,750	5.37	708,645	4.66	203,647	4.88
2009	12,275,250	(0.44)	706,305	(0.33)	200,579	(1.51)
2010	12,211,975	(0.52)	708,220	0.27	200,573	(0.00)
2011	12,883,175	5.50	745,328	5.24	211,132	5.26
2012	13,555,550	5.22	778,210	4.41	219,237	3.84
2013	14,025,125	3.46	800,701	2.89	225,195	2.72
2014	14,350,825	2.32	814,065	1.67	227,889	1.20
2015	15,021,825	4.68	851,137	4.55	237,132	4.06

PERSONAL INCOME GROWTH
FISCAL YEAR GROWTH BY PERCENT



Source: U.S. Department of Commerce, Bureau of Economic Analysis

Economic Report of the Governor

Connecticut's sources of personal income vary slightly from those of the United States, with wages and employee salaries accounting for approximately 52.2% of total personal income compared to 51.0% for the nation in fiscal year 2015. The following table shows the sources of personal income for the United States and Connecticut over a ten fiscal year period. The table indicates a significant shift from manufacturing wages to other sources of income including property income and transfer payments.

TABLE 64
SOURCES OF PERSONAL INCOME
(In Billions of Dollars)

	<u>Fiscal Year 2006</u>				<u>Fiscal Year 2015</u>			
	<u>U.S.</u>	<u>%</u>	<u>CT</u>	<u>%</u>	<u>U.S.</u>	<u>%</u>	<u>CT</u>	<u>%</u>
Manufacturing								
Salaries & Wages	726.1	6.6	13.4	7.4	792.9	5.3	14.4	6.1
Nonmanufacturing								
Salaries & Wages	5,158.8	46.8	85.7	47.4	6,862.3	45.7	109.4	46.1
Proprietors								
Income	1,030.7	9.3	17.2	9.5	1,370.5	9.1	23.0	9.7
Property								
Income	2,027.8	18.4	36.6	20.2	2,776.8	18.5	49.1	20.7
Other Labor								
Income	1,421.9	12.9	22.6	12.5	1,799.4	12.0	28.5	12.0
Transfer Payments								
Less Payments to								
Social Insurance	<u>664.5</u>	<u>6.0</u>	<u>5.5</u>	<u>3.0</u>	<u>1,420.0</u>	<u>9.5</u>	<u>12.8</u>	<u>5.4</u>
Total	11,029.8	100.0	181.0	100.0	15,021.8	100.0	237.1	100.0

Note: Totals may not agree with detail due to rounding.

Source: U.S. Department of Commerce, Bureau of Economic Analysis

Connecticut's distribution of wages and salaries by industry varies more significantly from those of the United States, with the Finance, Insurance, and Real Estate industry accounting for approximately 17.6% of total wages compared to 9.3% for the nation in fiscal year 2015. The following table shows a comparative study of the wages and salaries distribution for the United States and Connecticut over a ten fiscal year period. The table also clearly shows a significant shift from manufacturing and construction to education and health care.

Economic Report of the Governor

TABLE 65
WAGES AND SALARIES DISTRIBUTION BY INDUSTRY
(as a % of Total)

	<u>Fiscal Year 2006</u>		<u>Fiscal Year 2015</u>	
	<u>U.S. %</u>	<u>CT %</u>	<u>U.S.%</u>	<u>CT %</u>
Manufacturing	12.3	13.5	10.4	11.7
Finance, Insurance & Real Estate	9.6	19.2	9.3	17.6
Construction & Mining	6.6	3.9	5.9	3.3
Public Utility, Trade & Transp.	16.5	14.4	15.8	13.2
Information	3.4	2.6	3.4	2.8
Education & Health	11.4	12.7	13.1	15.2
Leisure & Hospitality	4.3	3.0	4.7	3.3
Other Professional & Business	15.2	14.5	17.6	16.8
Other Services	3.1	2.6	3.2	2.6
Government	16.9	13.4	16.2	13.4
Fishing, Forestry, & Farming	0.5	0.1	0.6	0.2
Total	100.0	100.0	100.0	100.0

Note: U.S. Total Wages & Salaries in FY 2006: \$5,884,900.0 million and \$7,655,175.0 million in FY 2015

CT Total Wages & Salaries in FY 2006: \$99,143.0 million and \$123,791.0 million in FY 2015

Source:U.S. Department of Commerce, Bureau of Economic Analysis

Per Capita Personal Income

One of the more important single indicators of a state's performance is the growth in per capita personal income. Per capita income is total personal income divided by the population. On a per capita basis, personal income growth in Connecticut increased 28.1% from fiscal year 2006 to 2015, compared to a national increase of 26.5% and a New England region increase of 29.1%.

Per capita personal income in Connecticut, for the most recent fiscal year, was 14.1% higher than for the New England region and 41.1% higher than for the United States. Connecticut's per capita personal income continues to be at a higher level than that of the nation and New England due to the concentration of relatively high paying manufacturing industries, major corporate headquarters within the state, and the financial services sector.

The following table shows the growth in per capita personal income for ten fiscal years for the United States, the New England region and Connecticut. The chart provides a graphic representation of the growth rates in per capita personal income for the three entities over a ten fiscal year period.

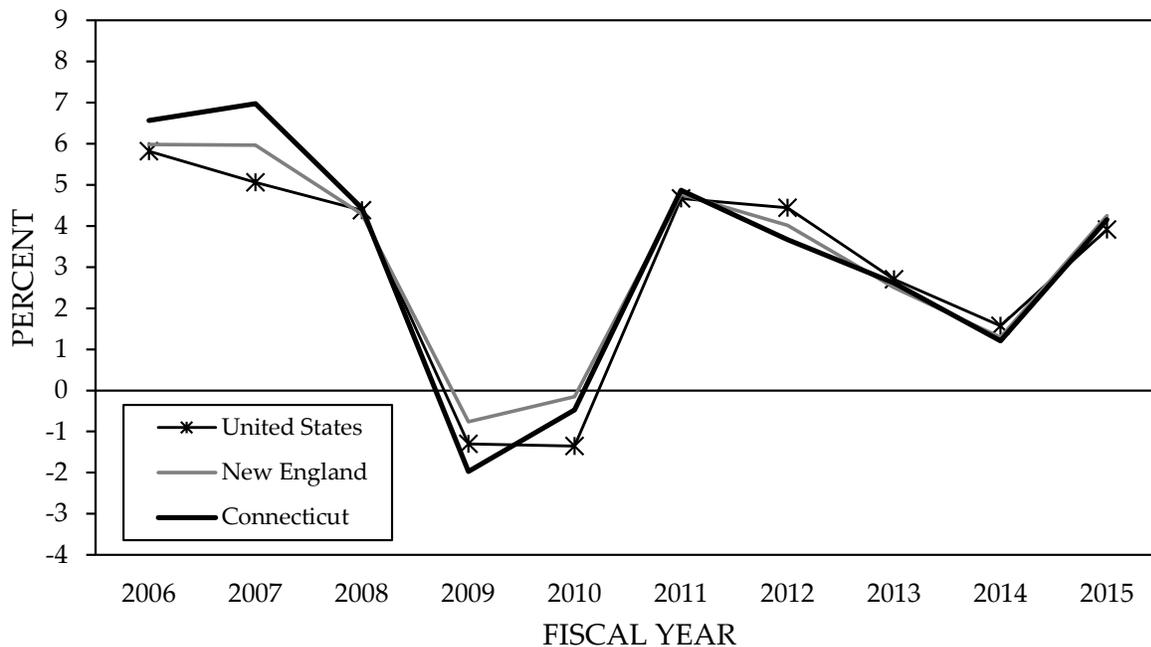
Economic Report of the Governor

TABLE 66
PER CAPITA PERSONAL INCOME

Fiscal Year	United States		New England		Connecticut	
	Dollars	% Growth	Dollars	% Growth	Dollars	% Growth
2006	37,004	5.74	44,791	5.98	51,518	6.56
2007	38,872	5.05	47,461	5.96	55,108	6.97
2008	40,586	4.41	49,495	4.29	57,548	4.43
2009	40,036	(1.36)	49,119	(0.76)	56,411	(1.97)
2010	39,487	(1.37)	49,043	(0.15)	56,144	(0.47)
2011	41,329	4.66	51,384	4.77	58,876	4.87
2012	43,167	4.45	53,447	4.01	61,032	3.66
2013	44,369	2.79	54,783	2.50	62,627	2.61
2014	45,055	1.55	55,491	1.29	63,379	1.20
2015	46,795	3.86	57,847	4.25	66,011	4.15

Source: U.S. Department of Commerce, Bureau of Economic Analysis

PER CAPITA PERSONAL INCOME GROWTH
FISCAL YEAR GROWTH BY PERCENT



Source: U.S. Department of Commerce, Bureau of Economic Analysis

Economic Report of the Governor

The following table shows per capita income for each of the fifty states with their corresponding ranking for fiscal year 2015. In 2015, Connecticut ranked number one in the nation based on per capita personal income. Connecticut's figure of \$66,011 for per capita personal income remained approximately 41.1% higher than the national average.

TABLE 67
PER CAPITA PERSONAL INCOME BY STATE
(Fiscal 2015)

<u>State</u>	<u>Per Capita</u> <u>Income</u>	<u>Rank</u>	<u>State</u>	<u>Per Capita</u> <u>Income</u>	<u>Rank</u>
Connecticut	\$66,011	1	Wisconsin	\$44,854	26
Massachusetts	59,883	2	Oklahoma	44,087	27
New Jersey	58,697	3	Florida	43,304	28
New York	56,622	4	Ohio	42,843	29
Alaska	55,275	5	Louisiana	42,606	30
Wyoming	55,173	6	Missouri	42,156	31
Maryland	55,170	7	Oregon	42,004	32
North Dakota	54,921	8	Michigan	41,492	33
New Hampshire	53,705	9	Maine	41,411	34
California	51,215	10	Nevada	41,361	35
Virginia	51,114	11	Tennessee	41,149	36
Washington	50,426	12	Montana	40,531	37
Minnesota	49,881	13	Indiana	40,346	38
Colorado	49,611	14	North Carolina	39,934	39
Rhode Island	49,257	15	Georgia	39,721	40
Illinois	48,439	16	Arizona	38,401	41
Pennsylvania	48,427	17	Arkansas	38,379	42
Nebraska	47,604	18	Alabama	38,286	43
Vermont	47,155	19	Utah	38,203	44
Delaware	46,983	20	Kentucky	38,173	45
Hawaii	46,831	21	New Mexico	37,921	46
Texas	46,229	22	South Carolina	37,307	47
Kansas	45,364	23	Idaho	37,065	48
South Dakota	44,977	24	West Virginia	36,678	49
Iowa	44,912	25	Mississippi	34,917	50
U.S. Average	\$46,795				

Source: U.S. Department of Commerce, Bureau of Economic Analysis

Per Capita Disposable Personal Income

The following table shows per capita disposable income for each of the fifty states with their corresponding ranking for fiscal year 2015. Per capita disposable income is defined as the income

Economic Report of the Governor

available to an individual for spending or saving. It is per capita personal income less personal tax and nontax payments. Personal taxes are composed of federal, state and local income taxes, as well as personal property taxes and estate and gift taxes. Nontax payments are made up of fines and fees.

TABLE 68
PER CAPITA DISPOSABLE PERSONAL INCOME BY STATE
(Fiscal 2015)

<u>State</u>	<u>Per Capita Disposable Income</u>	<u>Rank</u>	<u>State</u>	<u>Per Capita Disposable Income</u>	<u>Rank</u>
Connecticut	<u>\$54,895</u>	<u>1</u>	Oklahoma	\$39,681	26
New Jersey	50,525	2	Wisconsin	39,582	27
Massachusetts	50,261	3	Florida	38,682	28
Alaska	50,229	4	Louisiana	38,392	29
Wyoming	48,631	5	Ohio	37,992	30
New Hampshire	48,162	6	Tennessee	37,681	31
North Dakota	48,068	7	Missouri	37,565	32
Maryland	47,603	8	Maine	37,027	33
New York	46,905	9	Nevada	36,896	34
Washington	45,018	10	Michigan	36,717	35
Virginia	44,678	11	Oregon	36,536	36
California	43,890	12	Indiana	35,995	37
Rhode Island	43,578	13	Montana	35,962	38
Colorado	43,302	14	North Carolina	35,511	39
Minnesota	42,971	15	Georgia	35,252	40
Pennsylvania	42,664	16	Alabama	34,652	41
Nebraska	42,494	17	Arkansas	34,603	42
Vermont	42,135	18	Arizona	34,518	43
Illinois	41,991	19	New Mexico	34,433	44
Hawaii	41,924	20	Kentucky	34,207	45
Delaware	41,678	21	Utah	33,974	46
Texas	41,379	22	South Carolina	33,551	47
South Dakota	40,774	23	Idaho	33,371	48
Kansas	40,320	24	West Virginia	33,113	49
Iowa	40,122	25	Mississippi	31,986	50
U.S. Average	\$41,026				

Source: U.S. Department of Commerce, Bureau of Economic Analysis

All figures derived by:
$$\frac{\text{Disposable Personal Income}}{\text{Population}}$$

Economic Report of the Governor

Inflation and Its Effect On Personal Income

Inflation is defined as a rise in the general price level (or average level of prices) of all goods and services, or equivalently a decline in the purchasing power of a unit of money. The general price level varies inversely with the purchasing power of a unit of money. Hence, when prices increase purchasing power declines.

To take into account the erosion of purchasing power due to increasing prices, income is deflated by a consumer price index. The Consumer Price Index (CPI) is a measure of the average change in prices over time for a fixed market basket of goods and services. The Bureau of Labor Statistics publishes CPI's for two population groups: a CPI for All Urban Consumers (CPI-U) which covers approximately 80 percent of the total population; and a CPI for Urban Wage Earners and Clerical Workers (CPI-W) which covers 32 percent of the total population and is a subset of the CPI-U population. The CPI-U includes, in addition to wage earners and clerical workers, groups such as professional, managerial and technical workers, the self employed, short-term workers, the unemployed, retirees and others not in the labor force.

The following table shows the Consumer Price Index for All Urban Consumers and its growth over a ten fiscal year period.

TABLE 69
THE U.S. CONSUMER PRICE INDEX
(1982-84=100)

<u>Fiscal Year</u>	<u>CPI</u>	<u>% Growth</u>
2006	198.9	3.78
2007	204.1	2.60
2008	211.7	3.71
2009	214.6	1.40
2010	216.8	0.98
2011	221.1	1.98
2012	227.6	2.94
2013	231.4	1.67
2014	235.0	1.55
2015	236.7	0.73

Source: U.S. Bureau of Labor Statistics

The CPI is a weighted index that is based on prices of food (14.3%), apparel (3.3%), housing (42.2%), transportation (15.3%), medical care (7.7%), education (7.1%), and the other goods that people buy for day-to-day living (10.1%). In addition, all taxes directly associated with the purchase and use of items and services are included in the index. In calculating the index, price changes for the various items in 85 urban areas across the country are averaged together with weights which represent their importance in the spending of the appropriate population group.

Economic Report of the Governor

Local data is then combined to obtain a U.S. city average. Movements of the indexes from one month to another are usually expressed as percentage changes rather than changes in index points, because index point changes are affected by the level of the index in relation to its base period while percentage changes are not.

Real Personal Income

Real personal income is total personal income deflated by the Consumer Price Index, a measure of personal income that usually includes adjustments for changes in prices. The following table shows real personal income growth for the United States, the New England region and Connecticut since the base period of 1982-84. These figures, because they take into account the effects of inflation, provide a better perspective on overall gains in personal income.

TABLE 70
REAL PERSONAL INCOME
(In Millions)

Fiscal Year	United States		New England		Connecticut	
	Dollars	% Growth	Dollars	% Growth	Dollars	% Growth
2006	5,544,251	2.91	320,492	2.28	90,988	2.99
2007	5,732,661	3.40	331,735	3.51	95,134	4.56
2008	5,824,602	1.60	334,766	0.91	96,203	1.12
2009	5,718,766	(1.82)	329,052	(1.71)	93,445	(2.87)
2010	5,633,835	(1.49)	326,728	(0.71)	92,532	(0.98)
2011	5,827,808	3.44	337,155	3.19	95,507	3.22
2012	5,956,775	2.21	341,972	1.43	96,340	0.87
2013	6,061,765	1.76	346,069	1.20	97,331	1.03
2014	6,107,566	0.76	346,458	0.11	96,987	(0.35)
2015	6,346,944	3.92	359,618	3.80	100,192	3.30

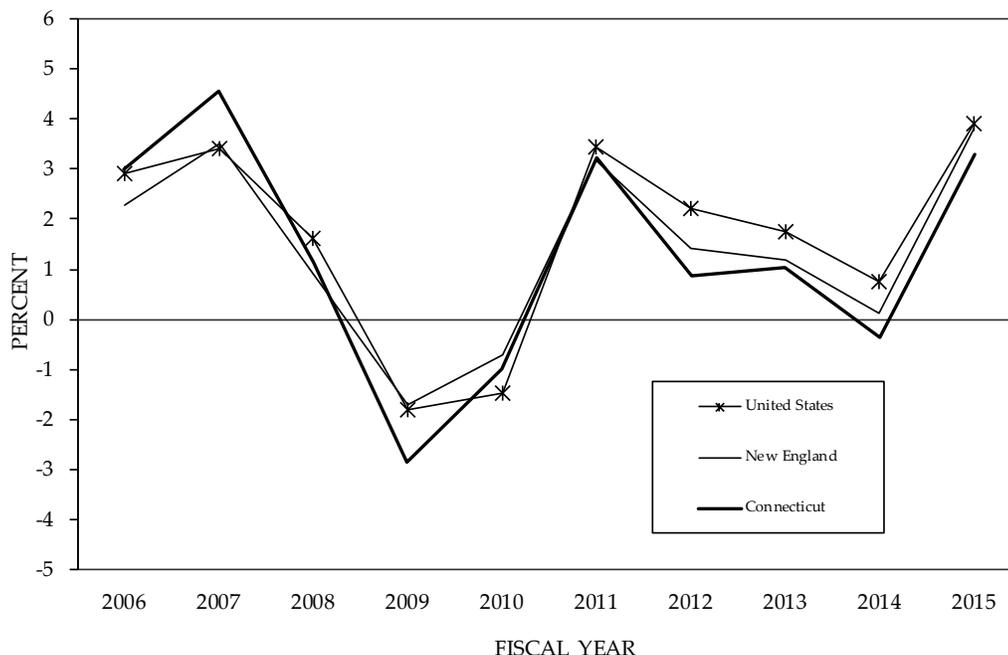
Source: U.S. Department of Commerce, Bureau of Economic Analysis, IHS Economics

It is important to note that there are regional differences in prices. Local area CPI indexes are by-products of the national CPI program. Because each local index is a small subset of the national index, it has a smaller sample size and is therefore subject to substantially more sampling and other measurement error than the national index. Therefore, local area indexes show greater volatility than the national index in the short run, although their long-term trends are quite similar. Therefore, the national Consumer Price Index was utilized in the table above to provide the comparison among the United States, the New England region and Connecticut.

The following chart provides a graphic presentation of the growth in real personal income for the three entities over a ten fiscal year period.

Economic Report of the Governor

REAL PERSONAL INCOME GROWTH FISCAL YEAR GROWTH BY PERCENT



Source: U.S. Department of Commerce, Bureau of Economic Analysis

Real Per Capita Personal Income

Real per capita personal income is per capita personal income deflated by the Consumer Price Index and shows how individuals in a geographical entity have fared after adjusting for the effects of inflation. A comparison of the growth rates measures the relative economic performance of each entity as it adjusts personal income growth by population changes.

**TABLE 71
REAL PER CAPITA PERSONAL INCOME**

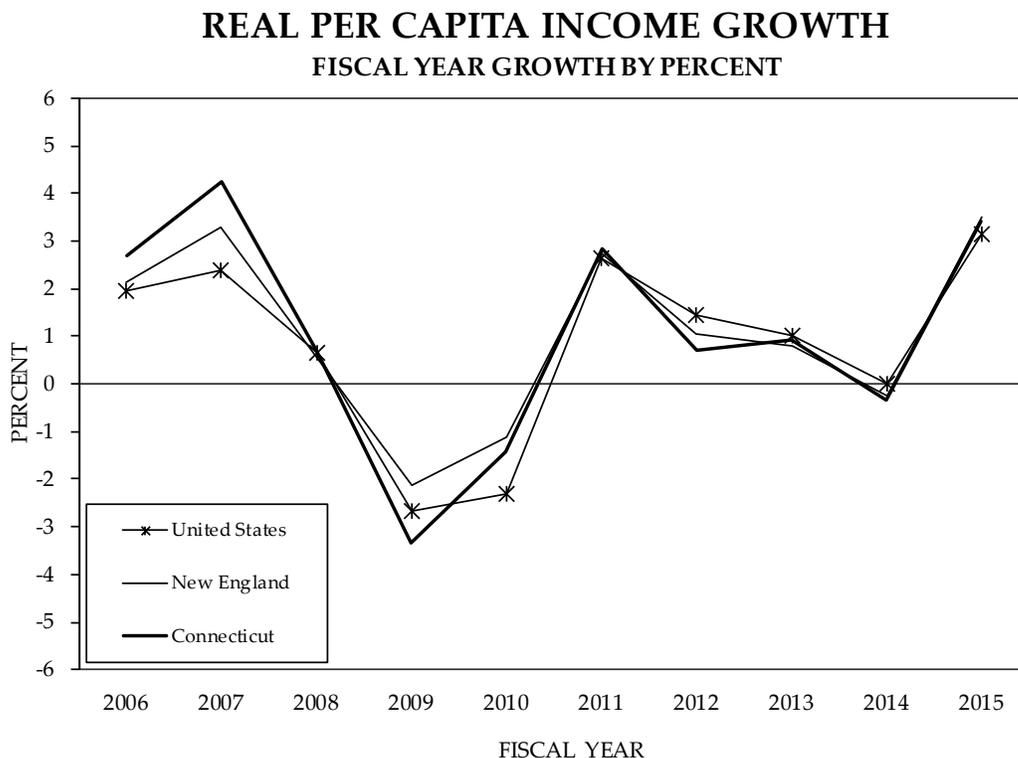
Fiscal Year	United States		New England		Connecticut	
	Dollars	% Growth	Dollars	% Growth	Dollars	% Growth
2006	18,614	1.96	22,515	2.12	25,897	2.68
2007	19,060	2.40	23,253	3.28	26,999	4.26
2008	19,183	0.65	23,382	0.56	27,186	0.69
2009	18,672	(2.67)	22,883	(2.13)	26,280	(3.33)
2010	18,241	(2.30)	22,625	(1.13)	25,902	(1.44)
2011	18,721	2.63	23,244	2.74	26,633	2.83
2012	18,993	1.45	23,487	1.04	26,820	0.70
2013	19,185	1.01	23,677	0.81	27,068	0.92
2014	19,188	0.02	23,617	(0.26)	26,973	(0.35)
2015	19,794	3.16	24,442	3.49	27,890	3.40

Source: IHS Economics, Bureau of Economic Analysis

All figures derived by:
$$\frac{\text{Total Real Personal Income}}{\text{Population}}$$

Economic Report of the Governor

The previous table shows the growth in real per capita personal income for the United States, the New England region, and Connecticut. The chart below provides a graphic presentation of the growth in real per capita personal income for the three entities over a ten fiscal year period.



Source: IHS Economics, Bureau of Economic Analysis

TABLE 72
GROWTH IN REAL PER CAPITA PERSONAL INCOME
(Base Year: 2009)

Fiscal Year	% Growth		% Cumulative Growth	
	<u>United States</u>	<u>Connecticut</u>	<u>United States</u>	<u>Connecticut</u>
1950-1960	31.0%	30.0%	31.0%	30.0%
1960-1970	38.1%	41.9%	80.9%	84.4%
1970-1980	15.0%	13.8%	107.9%	109.8%
1980-1990	21.1%	34.8%	151.8%	182.8%
1990-2000	15.7%	18.1%	191.3%	233.9%
2000-2010	6.5%	8.1%	210.1%	260.9%
2010-2015	6.6%	5.4%	230.7%	280.5%

Source: U.S. Department of Commerce, Bureau of Economic Analysis

The above table highlights the cumulative growth in real per capita personal income over the past sixty-five years. Overall, Connecticut has higher cumulative growth in real per capita personal

Economic Report of the Governor

income, exceeding the United States by 49.8 percentage points. During the most recent decade, Connecticut’s personal income growth has been weak at only 8.1%, a likely result of two economic bubbles bursting (technology and housing) and the Great Recession of the last two years of the decade. Even though job growth in the state has lagged that of the nation, Connecticut residents’ income growth has out-performed that of the nation’s over the long-term.

Cost of Living Index

Statistics regarding inflation and the cost of living for Connecticut are frequently requested by the public. The two indicators are not the same. An inflation index such as the CPI-U is used to measure purchasing power relative to its historical performance, while the cost of living index is used to measure purchasing power relative to one’s geographical peers. In other words, the cost of living index is produced to measure the price level of consumer goods and services for a specific area relative to other jurisdictions at a given time.

A widely used index to measure cost of living differences among urban areas is *ACCRA Cost of Living Index*, which is produced by The Council for Community and Economic Research (C2ER). This report includes indices for approximately 320 Metropolitan Statistical Areas (MSAs), Metropolitan Statistical Divisions, and Micropolitan Statistical Areas as defined by the U.S. Office of Management and Budget (OMB). In Connecticut, the C2ER survey includes the three urban areas from the following MSAs: Stamford in the Bridgeport-Stamford-Norwalk MSA, Hartford in the Hartford-West Hartford-East Hartford MSA, and New Haven in the New Haven-Milford MSA.

The following table shows the cost of living comparison for three neighboring cities: Boston in the Boston-Quincy MTD, Hartford in the Hartford-West Hartford-East Hartford MTA, and New York (Manhattan) in the New York-White Plains-Wayne NY-NJ MTD based on 2015 third quarter data.

**TABLE 73
COMPARISON OF COST OF LIVING**

2015 Third Quarter Data	Composite	Grocery			Trans-	Health	
<u>MTA/MTD</u>	<u>Index</u>	<u>Items</u>	<u>Housing</u>	<u>Utilities</u>	<u>portation</u>	<u>Care</u>	<u>Misc.*</u>
Hartford, CT	124.0	129.2	130.7	131.4	112.6	116.9	118.6
Boston, MA	145.7	101.1	200.9	149.8	108.0	135.5	131.5
New York**, NY	236.1	126.5	497.6	129.2	128.3	113.7	147.3
Index Weights	100%	13.96%	27.80%	10.23%	12.12%	4.41%	31.48%

Note: * denotes miscellaneous goods and services

** Manhattan

Source: The Council for Community and Economic Research (C2ER), “*ACCRA Cost of Living Index*”, Data for Third Quarter 2015

Economic Report of the Governor

The Cost of Living Composite Index is weighted by a “market basket” of approximately 60 goods and services for the typical professional and executive household. It is further broken down into six categories including grocery items, housing, utilities, transportation, health care, and miscellaneous goods and services to reflect the different categories of consumer expenditures. The index for the Hartford area, for example, was 124.0 in the third quarter of 2015. Compared to the national index of 100, this shows that the overall living cost in the Hartford area was higher than the national average by 24.0% in the third quarter of 2015. Among the six categories, the cost of utilities in the Hartford area was the most expensive item at 31.4% higher than the national average, followed by housing at 30.7%, grocery items at 29.2%, miscellaneous items at 18.6%, healthcare at 16.9%, and transportation at 12.6% higher than the national average. The index, updated quarterly with an annual report published in January of the succeeding year, does not include differences in state and local government taxes.

In the third quarter of 2015, many cities had a relatively higher cost of living than the Hartford area. These include, for example, New York City (Manhattan) at 236.1; San Francisco, California at 178.1; and Washington, D.C. at 149.3. Living costs in most cities in the southern and mountain west states are relatively low; for example, Idaho Falls, Idaho at 82.6; Jackson, Mississippi at 83.4; and San Antonio, Texas at 85.9. The cost of living in the Hartford area was comparable to other cities in the northeast such as Philadelphia, Pennsylvania; Providence, Rhode Island; and Newark, New Jersey, which registered at 118.4, 123.1 and 125.0, respectively. The cost of living index can provide useful information for relocation decisions. Individuals contemplating a job offer in a certain area may use this index as a guide to evaluate the financial merits of the move. For example, Hartford residents considering a move to New York City (Manhattan) would need a 90.4% increase in after-tax income to maintain their current lifestyle. On the other hand, New York City residents contemplating a move to Hartford could have a 47.5% reduction in after-tax income and still maintain their current standard of living.

The cost of living for metropolitan statistical areas within Connecticut also varies. In the third quarter of 2015, the ACCRA cost of living index was 145.8 in the Stamford area, 124.0 in the Hartford area, and 122.6 in the New Haven area. These three statistical areas accounted for more than 80% of the state’s total population. The following table demonstrates the relative index of the components for these three Connecticut regions.

TABLE 74
COMPARISON OF COST OF LIVING IN CONNECTICUT
Hartford, New Haven, and Stamford MTAs

2015 Third Quarter <u>MSA</u>	Composite <u>Index</u>	Grocery <u>Items</u>	Housing <u>Housing</u>	Utilities <u>Utilities</u>	Trans- <u>portation</u>	Health <u>Care</u>	Misc. <u>Misc.</u>
Hartford	124.0	129.2	130.7	131.4	112.6	116.9	118.6
New Haven	122.6	134.6	134.7	101.4	109.3	112.8	120.0
Stamford	145.8	136.9	204.8	131.8	110.2	113.4	120.3

Source: The Council for Community and Economic Research (C2ER), “ACCRA Cost of Living Index”, Data for Third Quarter 2015

Economic Report of the Governor

THE MAJOR REVENUE RAISING TAXES IN THE STATE OF CONNECTICUT

In fiscal year 2014, Connecticut's General Fund derived 81 percent of its revenue from the collection of taxes. To provide an analysis of the overall tax burden on the individuals of each state, the following table was prepared for fiscal year 2014. The table shows overall state tax collections as a percentage of personal income. In the table, note that Connecticut ranks 15th, signifying that in fourteen other states, a greater percentage of an individual's income is collected in state taxes than in Connecticut.

TABLE 75
STATE TAX COLLECTIONS AS A PERCENTAGE OF PERSONAL INCOME
Fiscal 2014

<u>State</u>	<u>Percentage</u>	<u>Rank</u>	<u>State</u>	<u>Percentage</u>	<u>Rank</u>
North Dakota	15.22%	1	Oregon	6.10%	26
Vermont	10.39%	2	Iowa	6.04%	27
Hawaii	9.47%	3	Maryland	5.98%	28
Minnesota	8.84%	4	Rhode Island	5.97%	29
Alaska	8.77%	5	New Jersey	5.91%	30
West Virginia	8.18%	6	Utah	5.83%	31
Arkansas	8.15%	7	Washington	5.72%	32
New Mexico	7.68%	8	Pennsylvania	5.72%	33
Delaware	7.50%	9	Kansas	5.67%	34
Mississippi	7.43%	10	Ohio	5.64%	35
Wyoming	7.31%	11	Nebraska	5.57%	36
California	7.29%	12	Oklahoma	5.52%	37
Maine	7.23%	13	Arizona	5.25%	38
New York	7.16%	14	Alabama	5.23%	39
<u>Connecticut</u>	<u>6.99%</u>	<u>15</u>	South Carolina	5.17%	40
Kentucky	6.89%	16	Louisiana	5.06%	41
Montana	6.64%	17	Georgia	4.86%	42
Indiana	6.62%	18	Colorado	4.63%	43
Wisconsin	6.58%	19	Texas	4.63%	44
Massachusetts	6.53%	20	Virginia	4.61%	45
Illinois	6.47%	21	Tennessee	4.55%	46
Nevada	6.36%	22	Missouri	4.54%	47
Michigan	6.28%	23	Florida	4.27%	48
Idaho	6.25%	24	South Dakota	4.22%	49
North Carolina	6.17%	25	New Hampshire	3.34%	50
U.S. Average	6.03%				

Source: Bureau of Economic Analysis, U.S. Census Bureau, "Annual Survey of State Government Tax Collections, 2014"; IHS Economics

Following is a discussion of the major taxes in the State of Connecticut.

Economic Report of the Governor

Personal Income Tax

For income years commencing on or after January 1, 1991, a personal income tax was imposed upon income of residents of the state (including resident trusts and estates), part-year residents and certain non-residents who have taxable income derived from or connected with sources within Connecticut. For tax years commencing on or after January 1, 1991, and prior to January 1, 1992, the tax was imposed at the rate of 1.5% on Connecticut taxable income. For tax years commencing on or after January 1, 1992, the separate tax on capital gains, dividends and interest was repealed, and the tax was imposed at the rate of 4.5% of Connecticut taxable income. Beginning with tax years commencing on or after January 1, 1996, a second, lower tax rate of 3% was introduced for a certain portion of taxable income. Beginning with tax years commencing January 1, 2003 the 4.5% rate was increased to 5.0%. Beginning with tax years commencing January 1, 2009, a third higher bracket of 6.5% was introduced on incomes in excess of \$500,000 for single filers and \$1,000,000 for joint filers. Beginning with tax years commencing January 1, 2011, five new tax brackets replaced all previous brackets greater than the lowest rate. The lowest bracket remained unchanged while the highest bracket imposes a 6.7% tax on incomes in excess of \$250,000 for single filers and \$500,000 for joint filers. Beginning with tax year commencing January 1, 2015, the 6.7% rate was increased to 6.9% and a new seventh tax bracket was added at a 6.99% rate for incomes in excess of \$500,000 for single filers and \$1,000,000 for joint filers. The amount of taxable income subject to the lower tax rate has been expanded as set forth in the table below. Depending on federal income tax filing status and Connecticut adjusted gross income, personal exemptions ranging from \$15,000 to \$24,000 are available to taxpayers, with such exemptions phased out at certain higher income levels. Legislation enacted in 1999 increased the exemption amount for single filers over a certain number of years from \$12,000 to \$15,000. In addition, tax credits ranging from 75% to 1% of a taxpayer's Connecticut tax liability are also available, again dependent upon federal income tax filing status and Connecticut adjusted gross income (See Table 78 for more details). Neither the personal exemption nor the tax credit is available to a trust or an estate. Also commencing in income year 1996, personal income taxpayers were eligible for up to a \$100 credit for property taxes paid on their primary residence or on their motor vehicle. This credit has been modified over the years and for income year 2016 will be \$200.

The personal income tax generated \$9,151.0 million in fiscal year 2015, \$8,718.7 million in fiscal year 2014, and \$8,719.2 million in fiscal year 2013. In fiscal year 2015, this tax accounted for 53.0% of total General Fund revenue.

Economic Report of the Governor

TABLE 76
 TAXABLE INCOME AMOUNTS SUBJECT TO THE LOWER RATE
 WITH THE REMAINDER SUBJECT TO THE HIGHER RATE

<u>Income Year</u>	<u>Low Rate</u>	<u>High Rate</u>	Amount At Low Rate By Filing Status		
			<u>Single</u>	<u>Joint</u>	<u>Head of Household</u>
1996	3.0%	4.5%	\$ 2,250	\$ 4,500	\$ 3,500
1997	3.0%	4.5%	\$ 6,250	\$12,500	\$10,000
1998	3.0%	4.5%	\$ 7,500	\$15,000	\$12,000
1999 - 2002	3.0%	4.5%	\$10,000	\$20,000	\$16,000
2003 - 2008	3.0%	5.0%	\$10,000	\$20,000	\$16,000
2009-2010	3.0%	5.0%-6.5%	\$10,000	\$20,000	\$16,000
2011-2014	3.0%	5.0%-6.7%	\$10,000	\$20,000	\$16,000
2015-Present	3.0%	5.0%-6.99%	\$10,000	\$20,000	\$16,000

Economic Report of the Governor

The following table compares the personal income tax collections as a percentage of personal income for the fifty states for fiscal 2014.

TABLE 77
STATE INCOME TAX COLLECTIONS AS A PERCENTAGE OF PERSONAL INCOME
Fiscal 2014

<u>State</u>	<u>Percentage</u>	<u>Rank</u>	<u>State</u>	<u>Percentage</u>	<u>Rank</u>
Oregon	4.19%	1	Iowa	2.34%	23
New York	4.00%	2	Kentucky	2.33%	24
Minnesota	3.64%	3	Idaho	2.28%	25
California	3.59%	4	Colorado	2.23%	26
Massachusetts	3.43%	5	Rhode Island	2.19%	27
Connecticut	3.41%	6	Missouri	2.17%	28
North Carolina	2.74%	7	Michigan	1.99%	29
Hawaii	2.74%	8	South Carolina	1.98%	30
Wisconsin	2.72%	9	Kansas	1.94%	31
West Virginia	2.69%	10	Indiana	1.92%	32
Utah	2.67%	11	Pennsylvania	1.81%	33
Maine	2.66%	12	Alabama	1.80%	34
Montana	2.66%	13	Oklahoma	1.80%	35
Illinois	2.65%	14	Ohio	1.76%	36
Virginia	2.65%	15	New Mexico	1.73%	37
Delaware	2.46%	16	Mississippi	1.64%	38
Maryland	2.45%	17	Louisiana	1.44%	39
Nebraska	2.43%	18	Arizona	1.39%	40
New Jersey	2.38%	19	North Dakota	1.24%	41
Arkansas	2.37%	20	New Hampshire	0.14%	42
Vermont	2.37%	21	Tennessee	0.09%	43
Georgia	2.34%	22			
U.S. Weighted Average	2.17%				

Note: The following states do not levy an income tax: Alaska, Florida, Nevada, South Dakota, Texas, Washington, and Wyoming.

Source: IHS Economics: Bureau of Economic Analysis; U.S. Census Bureau, "2014 Annual Survey of State Government Tax Collections"

The following table shows Connecticut personal income tax exemptions ranging from \$15,000 to \$24,000 including the phase out as income levels rise depending on adjusted gross income for each income tax filing status.

Economic Report of the Governor

TABLE 78
CONNECTICUT PERSONAL INCOME TAX CREDITS & EXEMPTIONS
Income Year 2016

<u>Single</u>			<u>Married Filing Jointly</u>			<u>Head of Household</u>		
Exemption: \$15,000			Exemption: \$24,000			Exemption: \$19,000		
Phase Out: \$1K of exemption for each \$1K from \$30.0K to \$45.0K			Phase Out: \$1K of exemption for each \$1K from \$48K to \$72K			Phase Out: \$1K of exemption for each \$1K from \$38K to \$57K		
AGI From	AGI To	% of Tax	AGI From	AGI To	% of Tax	AGI From	AGI To	% of Tax
\$15,000	\$18,800	75%	\$24,000	\$30,000	75%	\$19,000	\$24,000	75%
\$18,800	\$19,300	70%	\$30,000	\$30,500	70%	\$24,000	\$24,500	70%
\$19,300	\$19,800	65%	\$30,500	\$31,000	65%	\$24,500	\$25,000	65%
\$19,800	\$20,300	60%	\$31,000	\$31,500	60%	\$25,000	\$25,500	60%
\$20,300	\$20,800	55%	\$31,500	\$32,000	55%	\$25,500	\$26,000	55%
\$20,800	\$21,300	50%	\$32,000	\$32,500	50%	\$26,000	\$26,500	50%
\$21,300	\$21,800	45%	\$32,500	\$33,000	45%	\$26,500	\$27,000	45%
\$21,800	\$22,300	40%	\$33,000	\$33,500	40%	\$27,000	\$27,500	40%
\$22,300	\$25,000	35%	\$33,500	\$40,000	35%	\$27,500	\$34,000	35%
\$25,000	\$25,500	30%	\$40,000	\$40,500	30%	\$34,000	\$34,500	30%
\$25,500	\$26,000	25%	\$40,500	\$41,000	25%	\$34,500	\$35,000	25%
\$26,000	\$26,500	20%	\$41,000	\$41,500	20%	\$35,000	\$35,500	20%
\$26,500	\$31,300	15%	\$41,500	\$50,000	15%	\$35,500	\$44,000	15%
\$31,300	\$31,800	14%	\$50,000	\$50,500	14%	\$44,000	\$44,500	14%
\$31,800	\$32,300	13%	\$50,500	\$51,000	13%	\$44,500	\$45,000	13%
\$32,300	\$32,800	12%	\$51,000	\$51,500	12%	\$45,000	\$45,500	12%
\$32,800	\$33,300	11%	\$51,500	\$52,000	11%	\$45,500	\$46,000	11%
\$33,300	\$60,000	10%	\$52,000	\$96,000	10%	\$46,000	\$74,000	10%
\$60,000	\$60,500	9%	\$96,000	\$96,500	9%	\$74,000	\$74,500	9%
\$60,500	\$61,000	8%	\$96,500	\$97,000	8%	\$74,500	\$75,000	8%
\$61,000	\$61,500	7%	\$97,000	\$97,500	7%	\$75,000	\$75,500	7%
\$61,500	\$62,000	6%	\$97,500	\$98,000	6%	\$75,500	\$76,000	6%
\$62,000	\$62,500	5%	\$98,000	\$98,500	5%	\$76,000	\$76,500	5%
\$62,500	\$63,000	4%	\$98,500	\$99,000	4%	\$76,500	\$77,000	4%
\$63,000	\$63,500	3%	\$99,000	\$99,500	3%	\$77,000	\$77,500	3%
\$63,500	\$64,000	2%	\$99,500	\$100,000	2%	\$77,500	\$78,000	2%
\$64,000	\$64,500	1%	\$100,000	\$100,500	1%	\$78,000	\$78,500	1%

Source: General Statutes of the State of Connecticut

Economic Report of the Governor

The following table shows whether state and local governmental obligations are included in the definition of state income for tax purposes.

TABLE 79
STATE AND LOCAL GOVERNMENT OBLIGATIONS EXEMPTIONS
FOR DETERMINING INDIVIDUAL'S STATE INCOME

<u>State</u>	<u>Own</u> <u>Securities</u>	<u>Other</u> <u>State's</u> <u>Securities</u>	<u>State</u>	<u>Own</u> <u>Securities</u>	<u>Other</u> <u>State's</u> <u>Securities</u>
Alabama	E	T	Montana	E	T
Alaska (no tax)			Nebraska	E	T
Arizona	E	T	Nevada (no tax)		
Arkansas	E	T	New Hampshire	E	T
California	E	T	New Jersey	E	T
Colorado	E	T	New Mexico	E	T
Connecticut	E	T	New York	E	T
Delaware	E	T	North Carolina	E	T
Florida (no tax)			North Dakota	E	T
Georgia	E	T	Ohio	E	T
Hawaii	E	T	Oklahoma	T (1)	T
Idaho	E	T	Oregon	E	T
Illinois	T (1)	T	Pennsylvania	E	T
Indiana	E	T (2)	Rhode Island	E	T
Iowa	T (1)	T	South Carolina	E	T
Kansas	E	T	South Dakota (no tax)		
Kentucky	E	T	Tennessee	E	T
Louisiana	E	T	Texas (no tax)		
Maine	E	T	Utah	T (1)	T(3)
Maryland	E	T	Vermont	E	T
Massachusetts	E	T	Virginia	E	T
Michigan	E	T	Washington (no tax)		
Minnesota	E	T	West Virginia	E	T
Mississippi	E	T	Wisconsin	T (1)	T
Missouri	E	T	Wyoming (no tax)		

T = Taxable / E = Exempt

- (1) Interest earned from some qualified obligations is exempt from the tax.
- (2) Taxable for bonds acquired after 2011, bonds acquired before 2012 are exempt.
- (3) Taxable for bonds acquired after 2002 if the other state or locality imposes an income-based tax on Utah bonds.

Source: Commerce Clearing House, Inc.; State Taxation of Municipal Bonds for Individuals
The following table compares the personal income tax rates and bases for the fifty states and the District of Columbia.

Economic Report of the Governor

**TABLE 80
PERSONAL INCOME TAX BY STATE**

State	Low Bracket		High Bracket		State	Low Bracket		High Bracket	
	% Rate	To Net Income	% Rate	From Net Income \$		% Rate	To Net Income \$	% Rate	From Net Income \$
Alabama (3)	2.00	1,000	5.00	6,001	Missouri (1)	1.5	1,000	6.0	9,001
Arizona (1)	2.59	20,000	4.54	300,001	Montana (1,c)	1.0	2,800	6.9	17,101
Arkansas (3,c)	0.90	4,299	7.00	35,100	Nebraska (1)	2.46	6,090	6.84	58,921
California (1,c)	1.00	15,700	12.30	1,052,886	New Hampshire (b)				
Colorado (2)	4.63	All			New Jersey (3)	1.4	20,000	8.97	500,001
Connecticut	3.00	20,000	6.99	1,000,000	New Mexico (1)	1.7	8,000	4.9	24,001
Delaware (1)	2.20	5,000	6.75	60,001	New York (1,c)	4.0	16,700	8.82	2,092,801
Georgia (1)	1.00	1,000	6.00	10,001	N. Carolina (1)	6.0	21,250	7.75	100,001
Hawaii (1)	1.40	4,800	11.00	400,001	N. Dakota (2,c)	1.10	62,600	2.90	411,501
Idaho (1,c)	1.60	2,904	7.40	21,780	Ohio (1)	0.495	5,000	4.997	200,001
Illinois (1,d)	3.75	All			Oklahoma (1)	0.5	2,000	5.25	15,001
Indiana (1,d)	3.40	All			Oregon (2,c)	5.0	6,600	9.9	250,001
Iowa (1,c)	0.36	1,539	8.98	69,256	Pennsylvania (3)	3.07	All		
Kansas (1)	2.70	30,000	4.60	30,001	Rhode Island(1,c)	3.75	60,550	5.99	137,651
Kentucky (1)	2.00	3,000	6.00	75,001	S. Carolina (2,c)	0.0	2,910	7.0	14,551
Louisiana (1)	2.00	25,000	6.00	100,001	Tennessee (b)				
Maine (1,c)	0.00	10,449	7.95	41,850	Utah (1)	5.0	All		
Maryland (1)	2.00	1,000	5.75	300,001	Vermont (2,c)	3.55	61,600	8.95	405,101
Massachusetts	5.25	All	(a)		Virginia (1)	2.0	3,000	5.75	17,001
Michigan (1)	4.25	All			W. Virginia (1)	3.0	10,000	6.5	60,001
Minnesota (2,c)	5.35	36,650	9.85	258,262	Wisconsin (1,c)	4.0	14,790	7.65	325,701
Mississippi (3)	3.00	5,000	5.00	10,001	Dist. of Col. (2)	4.0	10,000	8.95	350,001

The following states do not levy an income tax: Alaska, Florida, Nevada, South Dakota, Texas, Washington & Wyoming.

Note: Tax rates are for married filers filing joint returns and do not include income taxes levied at the local level.

Base: (1) – Modified Federal Adjusted Gross Income
 (2) – Modified Federal Taxable Income
 (3) – State’s Individual Definition of Taxable Income

- (a) The rate is 12% for short-term capital gains and 5.25% for interests and dividends.
- (b) Income taxes are limited to interest and dividends: 5.0% in NH and 6.0% in Tenn.
- (c) Brackets are indexed for inflation annually. Oregon brackets \$125,000 and over are not indexed for inflation.
- (d) Flat rate is scheduled to decrease in income year 2024: Illinois to 3.25%; and a decrease after December 31, 2016: Indiana to 3.23%.

Source: Commerce Clearing House, Inc.

Economic Report of the Governor

Sales and Use Tax

The sales tax is imposed, subject to certain limitations, on the gross receipts from certain transactions within the state of persons engaged in business in the state including: 1) retail sales of tangible personal property; 2) the sale of certain services; 3) the leasing or rental of tangible personal property; 4) the producing, fabricating, processing, printing, or imprinting of tangible personal property to special order or with material furnished by the consumer; 5) the furnishing, preparing or serving of food, meals or drinks; and 6) the occupancy of hotels or lodging house rooms for a period not exceeding thirty consecutive calendar days.

The use tax is imposed on the consideration paid for certain services, purchases or rentals of tangible personal property used within the state and not subject to the sales tax.

Both the sales and use taxes are levied at a rate of 6.35%. Various exemptions from the tax are provided, based on the nature, use, or price of the property or services involved or the identity of the purchaser. Certain items are taxed at reduced rates. Hotel rooms are taxed at 15%.

The sales and use tax is an important source of revenue for the State of Connecticut. The tax generated \$4,205.1 million in fiscal year 2015, \$4,100.6 million in fiscal year 2014, and \$3,897.0 million in fiscal year 2013. In fiscal year 2015, sales and use taxes accounted for 24.3% of the total revenue, compared to 24.1% in fiscal year 2014, and 20.1% in fiscal year 2013. The increase in the fiscal year 2014 sales and use tax share is partially due to Connecticut's shift to net budgeting of Medicaid, which decreased the revenue base.

When analyzing sales taxes, a simple comparison of rates is not an effective way to measure the tax burden imposed. An analysis of the tax base must be included to provide a more meaningful comparison.

To provide a relevant comparison of sales tax burden, two studies are presented. The first study shows sales tax collections as a percentage of personal income. The larger the percentage of personal income going to sales tax collections, the heavier the burden of that tax. The table on the following page shows sales tax collections as a percentage of personal income and the corresponding ranking of the states. Note that Connecticut's tax burden is less than 29 other states. The comparison is based on fiscal year 2014 data. From fiscal year 1991 to fiscal year 2014, Connecticut's sales tax collections as a percentage of personal income dropped from 3.15% with a rank of ninth to 1.68% with a rank of 30th, and compared to the national average of 2.01%. This change was primarily due to the reduction in Connecticut's sales tax rate from 8% to 6.35% and an expansion of the exemptions on certain services and goods.

The second study provides an analysis of major sales tax exemptions by state. Connecticut excludes from its sales tax such major items as food products for human consumption, drugs and medicines used by humans, machinery, professional services, residential utilities and motor fuels. The second table shows the comparison for major sales tax exemptions.

Economic Report of the Governor

TABLE 81
SALES TAX COLLECTIONS AS A PERCENTAGE OF PERSONAL INCOME
Fiscal 2014

<u>State</u>	Tax Rate			<u>State</u>	Tax Rate		
	<u>(%)</u>	<u>Percentage</u>	<u>Rank</u>		<u>(%)</u>	<u>Percentage</u>	<u>Rank</u>
Hawaii	4.000*	4.43%	1	Kentucky	6.000*	1.94%	24
Washington	6.500*	3.46%	2	Iowa	5.750*	1.94%	25
Nevada	6.850*	3.41%	3	West Virginia	7.500*	1.86%	26
North Dakota	5.000*	3.28%	4	Wisconsin	7.000*	1.86%	27
Mississippi	7.000*	3.24%	5	Rhode Island	5.000	1.84%	28
Arkansas	5.125	2.85%	6	New Jersey	5.950*	1.77%	29
New Mexico	7.000*	2.80%	7	Connecticut	6.350	1.75%	30
Indiana	5.600*	2.75%	8	Utah	7.000	1.68%	31
Texas	6.250*	2.71%	9	Pennsylvania	6.000*	1.59%	32
Florida	6.500*	2.59%	10	Oklahoma	4.500*	1.58%	33
Wyoming	6.000*	2.47%	11	North Carolina	4.000*	1.54%	34
Arizona	7.000*	2.41%	12	Louisiana	4.750*	1.53%	35
South Dakota	4.000*	2.40%	13	Massachusetts	4.000*	1.43%	36
Tennessee	6.000*	2.39%	14	Illinois	6.250	1.41%	37
Idaho	6.150*	2.34%	15	Alabama	6.250*	1.35%	38
Kansas	4.000*	2.31%	16	Georgia	4.000*	1.34%	39
Maine	6.000	2.24%	17	Missouri	6.000*	1.33%	40
Ohio	5.500	2.13%	18	Maryland	4.225	1.32%	41
Michigan	6.875*	2.13%	19	Vermont	6.000*	1.24%	42
Minnesota	6.000*	2.08%	20	New York	4.000*	1.18%	43
Nebraska	5.500*	2.02%	21	Colorado	2.900*	1.03%	44
California	6.000	1.97%	22	Virginia	5.300*	0.87%	45
South Carolina	6.000*	1.95%	23				

U.S. Weighted
Average** 1.89%

Notes:

- * Local tax rates are additional
- Tax rates are effective as of January 1, 2015
- Alaska, Delaware, Montana, New Hampshire, and Oregon do not levy a sales tax.
- ** Alaska, Delaware, Montana, New Hampshire, and Oregon are not included in the U.S. weighted average.

Source: Bureau of Economic Analysis, U.S. Census Bureau, "Annual Survey of State Government Tax Collections, 2014"; IHS Economics

Economic Report of the Governor

TABLE 82
MAJOR SALES TAX EXEMPTIONS BY STATE

<u>State</u>	<u>Food</u>	<u>Prescription Drugs</u>	<u>Motor Fuels</u>	<u>Clothes</u>
Alabama	T	E	E	T
Arizona	E	E	E	T
Arkansas	T (1)	E	E	T
California	E	E	T	T
Colorado	E	E	E	T
Connecticut	E	E	E	T
Florida	E	E	E (6)	T
Georgia	E	E	T (1)	T
Hawaii	T	E	T	T
Idaho	T	E	E	T
Illinois	T (1)	T (1)	T (5)	T
Indiana	E	E	T	T
Iowa	E	E	E	T
Kansas	T	E	E	T
Kentucky	E	E	E	T
Louisiana	E	E	E	T
Maine	E	E	E	T
Maryland	E	E	E	T
Massachusetts	E	E	E	E (2)
Michigan	E	E	T	T
Minnesota	E	E	E	E
Mississippi	T	E	E	T
Missouri	T (1)	E	E	T
Nebraska	E	E	E	T
Nevada	E	E	E	T
New Jersey	E	E	E	E
New Mexico	E	E	E	T
New York	E	E	T	E (3)
North Carolina	E	E	E	T
North Dakota	E	E	E	T
Ohio	E	E	E	T
Oklahoma	T	E	E	T
Pennsylvania	E	E	E	E
Rhode Island	E	E	E	E (4)
South Carolina	E	E	E	T
South Dakota	T	E	E	T
Tennessee	T (1)	E	E	T
Texas	E	E	E	T
Utah	T (1)	E	E	T
Vermont	E	E	E	E
Virginia	T (1)	E	E	T
Washington	E	E	E	T
West Virginia	E	E	T	T
Wisconsin	E	E	E	T
Wyoming	<u>E</u>	<u>E</u>	<u>E</u>	<u>T</u>
Total Taxable	13	1	8	38

Note: These states do not levy a sales tax: Alaska, Delaware, Montana, New Hampshire & Oregon.
T = Taxable under the sales tax, E = Exempt from the sales tax (1) Taxed at a reduced rate. (2) Up to a sales price of \$175 per item. (3) Up to a sales price of \$110 per item. (4) Up to a sales price of \$250 per item. (5) Sales of majority blended ethanol fuel are exempt. (6) Unless used by railroad locomotives or vessels to transport persons or property in interstate or foreign commerce.

Source: Commerce Clearing House, Inc., Federation of Tax Administrators

Economic Report of the Governor

Corporation Business Tax

The Corporation Business Tax is imposed on any corporation, joint stock company or association or fiduciary of any of the foregoing which carries on or has the right to carry on business within the state or owns or leases property or maintains an office within the state. The Corporation Business Tax consists of three components, and the taxpayer's liability is the greatest amount computed under any of the three components. The first is a tax measured by the net income of a taxpayer (the "Income-Base Tax"). Net income means federal gross income (with limited variations) less certain deductions, most of which correspond to the deductions allowed under the Internal Revenue Code of 1986, as amended from time to time. The corporation business tax generated \$814.8 million in FY 2015, \$782.2 million in FY 2014, and \$742.5 million in fiscal year 2013. In fiscal year 2015, this tax accounted for 4.7%, up slightly from fiscal year 2014, when it accounted for 4.6% of total General Fund revenue.

If a taxpayer is taxable solely within the state, the Income-Base Tax is measured by, and based upon, its entire net income. If a taxpayer is taxable in another state in which it conducts business, the base against which the Income-Base Tax is measured is the portion of the taxpayer's entire net income assigned to the state, pursuant to a statutory formula designed to identify the proportion of the taxpayer's trade or business conducted within the state based upon the proportion of sales within the state. Public Act 15-244 maintained an existing 20% surcharge for income year 2016 and 2017, declining to 10% in income year 2018 and eliminating the surcharge in income year 2019 and beyond. Currently, the Income-Base Tax is levied at the rate of 7.5%. The surcharge does not apply to companies with less than \$100 million in annual gross revenue or whose tax liability does not exceed the minimum tax of \$250. The surcharge is calculated prior to the application of any credits.

The second part of the Corporation Business Tax is an additional tax on capital (the "Additional Tax"). The additional tax base is determined either as a specific maximum dollar amount or at a flat rate on a defined base, usually related in whole or part to its capital stock and balance sheet surplus, profit and deficit. If a taxpayer is also taxable in another state in which it conducts business, the defined base is apportioned most often to the value of certain assets having tax status within the state. The third component of the Corporation Business Tax is the Minimum Tax, which is \$250. Corporations must compute their tax under all three bases and then pay the tax under the highest computation.

Numerous tax credits are also available to corporations including, but not limited to, research and development credits of 1% to 6%, credits for property taxes paid on electronic and data processing equipment, and a 5% credit for investments in fixed and human capital.

The table on the following page provides a comparison of the assessed rates for the corporation business tax for the fifty states and the District of Columbia.

Economic Report of the Governor

**TABLE 83
CORPORATION TAX BY STATE
FOR TAX YEAR 2015**

State	<u>Low Bracket</u>		<u>High Bracket</u>		State	<u>Low Bracket</u>		<u>High Bracket</u>	
	Rate	To Net Income \$	Rate	From Net Income \$		Rate	To Net Income	Rate	From Net Income \$
Alabama	6.5	All			Missouri	6.25	All		
Alaska	0.0	25,000	9.4	222,000	Montana	6.75	All		
Arizona	6.0	All			Nebraska	5.58	100,000	7.81	100,001
Arkansas	1.0	3,000	6.5	100,001	New Hampshire	8.5	All		
California (1)	8.84	All			New Jersey	9.0	All		
Colorado	4.63	All			New Mexico	4.8	500,000	6.9	1.0M+
Connecticut (2)	7.5	All			New York	7.1	All		
Delaware	8.7	All			N. Carolina	5.0	All		
Florida (3)	5.5	All			N. Dakota	1.41	25,000	5.15	50,001
Georgia	6.0	All			Ohio (6)				
Hawaii	4.4	25,000	6.4	100,001	Oklahoma	6.0	All		
Idaho	7.4	All			Oregon	6.6	1.0M	7.6	1.0M+
Illinois (4)	9.5	All			Pennsylvania	9.99	All		
Indiana	7.0	All			Rhode Island	7.0	All		
Iowa	6.0	25,000	12.0	250,001	S. Carolina	5.0	All		
Kansas (5)	4.0	All			Tennessee	6.5	All		
Kentucky	4.0	50,000	6.0	100,001	Texas (7)				
Louisiana	4.0	25,000	8.0	200,001	Utah	5.0	All		
Maine	3.5	25,000	8.93	250,000	Vermont	6.0	10,000	8.5	25,001
Maryland	8.25	All			Virginia	6.0	All		
Massachusetts	8.0	All			West Virginia	6.5	All		
Michigan	6.0	All			Wisconsin	7.9	All		
Minnesota	9.8	All			District of Col.	9.4	All		
Mississippi	3.0	5,000	5.0	10,001					

Note: The table does not include corporate income taxes levied at the local level. These states do not levy a corporate income tax: Nevada, South Dakota, Washington & Wyoming. The following states require a minimum tax: AZ \$50; CA \$800; CT \$250; ID \$20; MA \$456; MT \$50; NJ \$500; NY \$25; OR \$150; RI \$500; UT \$100; VT \$250; District of Columbia \$250

- (1) Banks and financial corporations (except financial S-corporations) are subject to a 10.84% tax.
- (2) A 20% surcharge is imposed for tax years 2012 - 2017 on companies with more than \$100 million in annual gross revenue.
- (3) An alternative minimum tax imposed 3.3%, an exemption of \$50,000 is allowed.
- (4) Sum of corporation income tax rate of 7.0% and a replacement tax of 2.5%.
- (5) A surtax of 3.0% is imposed on income over \$50,000.
- (6) Commercial Activity Tax-based on a tiered Annual Minimum Tax and 0.26% on gross receipts over \$1 million
- (7) A franchise tax of 0.975% is imposed on entities with more than \$1,080,000 of total revenues.

Source: Commerce Clearing House. Rates as of January 1, 2015.

Economic Report of the Governor

Motor Fuels Tax

The state imposes a tax, subject to certain limitations, (1) on gasoline and certain other liquids which are prepared, advertised, offered for sale, sold for use as, or commonly and commercially used as, a fuel in internal combustion engines ("gasoline" or "gasohol"), and (2) on all combustible gases and liquids which are suitable and used for generation of power to propel motor vehicles ("special fuels"). The distributors liable for these taxes are those entities which distribute fuel within the state, import fuel into the state for distribution within the state, or produce or refine fuels within the state.

The Gasoline Tax is imposed on each gallon of gasoline or gasohol sold (other than to another distributor) or used within the state by a distributor. The tax on special fuels (the "Special Fuel Tax") is assessed on each gallon of special fuels used within the state in a motor vehicle licensed, or required to be licensed, to operate upon the public highways of the state.

The Special Fuels Tax is paid by vehicle users, and is generally collected by retail dealers of special fuels (primarily diesel fuel). Various exemptions from both taxes are provided, among which are sales to, or use by the United States, the state or its municipalities.

The Motor Carrier Road Tax is imposed upon gallons of fuel (again, primarily diesel fuel) used by business entities ("motor carriers") which operate any of the following vehicles in the state: (1) passenger vehicles seating more than nine persons; (2) road tractors or tractor trucks; or (3) trucks having a registered gross weight in excess of eighteen thousand pounds. Such motor carriers pay the tax on the gallons of fuel which they use while operating such vehicles in the state. The number of gallons subject to the tax is determined by multiplying the total number of gallons of fuel used by the motor carrier during each year by a fraction, the numerator of which is the total number of miles traveled by the motor carrier's vehicles within the state during the year, and the denominator of which is the total number of miles traveled by the motor carrier's vehicles both within and outside the state during the year.

The Gasoline Tax is 25 cents per gallon. Effective July 1, 2014, the Special Fuels and Motor Carrier Taxes were reduced by 0.4 cents per gallon, from 54.9 cents per gallon to 54.5 cents per gallon. The 1983 session of the General Assembly enacted a Special Transportation Fund for highway construction and maintenance and 1 cent per gallon of the motor fuels tax, or a total of \$14.2 million, was dedicated to this fund. Beginning July 1, 1984, all collections from the motor fuels tax were directed to the Special Transportation Fund.

The table on the following page shows the comparative rates for Motor Fuel Taxes for the 50 states.

Economic Report of the Governor

TABLE 84
MOTOR FUEL TAXES BY STATE

State	Sales			State	Sales		
	Excise Tax	Tax Rate %	Total Tax*		Excise Tax	Tax Rate %	Total Tax*
Alabama	16.0¢	-	16.0¢	Montana	27.0¢	-	27.0¢
Alaska	8.0	-	8.0	Nebraska	25.6	-	25.6
Arizona	18.0	-	18.0	Nevada	24.0	-	24.0
Arkansas	21.5	-	21.5	New Hampshire	22.2	-	22.2
California	36.0	2.25	35.3	New Jersey	10.5	-	10.5
Colorado	22.0	-	22.0	New Mexico	17.0	-	17.0
Connecticut (a)	25.0	-	25.0	New York	8.0	4.0	16.6
Delaware	23.0	-	23.0	North Carolina (f)	37.5	-	37.5
Florida	17.3	-	17.3	North Dakota	23.0	-	23.0
Georgia (b)	7.5	-	19.3	Ohio	28.0	-	28.0
Hawaii (c)	17.0	4.0	25.9	Oklahoma	16.0	-	16.0
Idaho	25.0	-	25.0	Oregon	30.0	-	30.0
Illinois	19.0	6.25	33.2	Pennsylvania	50.5	-	50.5
Indiana (d)	18.0	7.0	33.7	Rhode Island	32.0	-	32.0
Iowa	21.0	-	21.0	South Carolina	16.0	-	16.0
Kansas	24.0	-	24.0	South Dakota	22.0	-	22.0
Kentucky (e)	26.2	-	26.2	Tennessee	20.0	-	20.0
Louisiana	20.0	-	20.0	Texas	20.0	-	20.0
Maine	30.0	-	30.0	Utah	24.5	-	24.5
Maryland	30.3	-	30.3	Vermont	12.1	-	12.1
Massachusetts	24.0	-	24.0	Virginia	11.1	-	11.1
Michigan	19.0	6.0	32.5	Washington	37.5	-	37.5
Minnesota	28.5	-	28.5	West Virginia (g)	20.5	-	35.7
Mississippi	18.0	-	18.0	Wisconsin	30.9	-	30.9
Missouri	17.0	-	17.0	Wyoming	24.0	-	24.0

* The total column in the above table is the sum of per gallon state tax and sales taxes or additional taxes where applicable. The price used to estimate the effect of the sales tax, which excludes state taxes, was \$2.06 per gallon.

- (a) Plus a petroleum gross receipts tax of 8.1%
- (b) Includes a pre-paid sales tax converted to a cents per gallon rate of 11.8¢
- (c) County taxes between 8.8¢ and 16.5¢ per gallon are levied in addition to the state tax of 17¢ per gallon. An average of 15.1¢ was used in calculating the total tax.
- (d) Plus an 11¢ surcharge tax effective January 1, 2014.
- (e) KY: Rate is variable, adjusted quarterly. MA: Rate is variable, adjusted annually
- (f) Includes an additional tax based on the average wholesale price of motor fuel.
- (g) Plus additional variable wholesale tax rate of 14.1¢ per gallon effective January 1, 2015.

Source: Commerce Clearing House, Inc.; National Conference of State Legislatures

Economic Report of the Governor

Other Sources

The following tables show the most recent comparative rates or exemptions for some of the other taxes and fees collected by the states.

**TABLE 85
CIGARETTE TAXES BY STATE**

<u>State</u>	<u>Rate</u>	<u>State</u>	<u>Rate</u>
Alabama	\$ 0.425	Montana	\$ 1.70
Alaska	\$ 2.00	Nebraska	\$ 0.64
Arizona	\$ 2.00	Nevada	\$ 1.80
Arkansas	\$ 1.15	New Hampshire	\$ 1.78
California	\$ 0.87	New Jersey	\$ 2.70
Colorado	\$ 0.84	New Mexico	\$ 1.66
<u>Connecticut</u>	<u>\$ 3.65</u>	New York	\$ 4.35
Delaware	\$ 1.60	North Carolina	\$ 0.45
Florida	\$ 1.339	North Dakota	\$ 0.44
Georgia	\$ 0.37	Ohio	\$ 1.60
Hawaii	\$ 3.20	Oklahoma	\$ 1.03
Idaho	\$ 0.57	Oregon	\$ 1.31
Illinois	\$ 1.98	Pennsylvania	\$ 1.60
Indiana	\$ 0.995	Rhode Island	\$ 3.75
Iowa	\$ 1.36	South Carolina	\$ 0.57
Kansas	\$ 0.79	South Dakota	\$ 1.53
Kentucky	\$ 0.60	Tennessee	\$ 0.62
Louisiana	\$ 0.36	Texas	\$ 1.41
Maine	\$ 2.00	Utah	\$ 1.70
Maryland	\$ 2.00	Vermont	\$ 3.08
Massachusetts	\$ 3.51	Virginia	\$ 0.30
Michigan	\$ 2.00	Washington	\$ 3.025
Minnesota	\$ 2.90	West Virginia	\$ 0.55
Mississippi	\$ 0.68	Wisconsin	\$ 2.52
Missouri	\$ 0.17	Wyoming	\$ 0.60

Note: The tax is based on a pack of 20 cigarettes.

Source: Commerce Clearing House, Inc., Federation of Tax Administrators. Updated December 2015.

Economic Report of the Governor

TABLE 86
INSURANCE COMPANIES TAX BY STATE

<u>State</u>	Domestic Tax Rate % (1)	Foreign Tax Rate % (1)	<u>State</u>	Domestic Tax Rate % (1)	Foreign Tax Rate % (1)
Alabama	0.50-4.00	0.50-4.00	Montana	2.75	2.75
Alaska	0.75-6.00	0.75-6.00	Nebraska (4)	0.375-3.00	0.50-3.00
Arizona (3)	0.66-3.00	2.00-3.00	Nevada	2.00-3.50	2.00-3.50
Arkansas	0.75-3.00	0.75-3.00	New Hampshire (5)	1.25-4.00	3.00
California	0.50-5.00	0.50-5.00	New Jersey	1.05-5.00	1.05-5.00
Colorado (2)	1.00-2.25	2.00-2.25	New Mexico	3.003-4.003	3.003-4.003
Connecticut	1.75-4.00	1.75-4.00	New York	1.75-7.10	1.75-7.10
Delaware (3)	1.75-5.00	1.75-5.00	North Carolina	1.90-2.50	1.90-2.50
Florida (4)	0.75-1.75	0.75-1.75	North Dakota	1.75-2.00	1.75-2.00
Georgia (2,4)	0.50-4.00	0.50-4.00	Ohio (4)	1.00-5.00	1.00-5.00
Hawaii	0.88-4.27	0.88-4.27	Oklahoma (4)	2.25-6.00	2.25-6.00
Idaho (2)	1.50	1.50	Oregon (4)	(6)	(6)
Illinois (4)	0.40-0.50	0.40-0.50	Pennsylvania	1.25-2.00	1.25-2.00
Indiana (4)	1.30	1.30	Rhode Island	2.00	2.00
Iowa	1.00	1.00	South Carolina	0.75-2.35	0.75-2.35
Kansas (4)	2.00-6.00	2.00-6.00	South Dakota (4)	1.25-2.50	1.25-2.50
Kentucky (4)	1.50-2.00	1.50-2.00	Tennessee (4,5)	1.75-5.50	1.75-5.50
Louisiana (4)	2.00-5.00	2.00-5.00	Texas	0.88-4.85	0.88-4.85
Maine (4)	1.00-2.55	1.00-2.55	Utah	0.45-4.25	0.45-4.25
Maryland	2.00-3.00	2.00-3.00	Vermont	2.00	2.00
Massachusetts	2.00-2.28	2.00-2.28	Virginia	1.00-2.50	1.00-2.50
Michigan	1.25-2.00	1.25-2.00	Washington	0.95-2.00	0.95-2.00
Minnesota (4)	1.00-2.00	1.00-2.00	W. Virginia (4,5)	2.00	2.00
Mississippi (4)	3.00	3.00	Wisconsin	2.00-3.50	0.50-2.375
Missouri	1.00-2.00	1.00-2.00	Wyoming	0.75-1.00	0.75-1.00

Note: The tax is based on the net premiums of authorized insurers, excludes surplus line rates, captive rates, and marine underwriting profits.

- (1) Depending upon the type of insurance issued or the type of organization formed.
- (2) Rate is reduced depending upon the percentage of premiums or assets invested in the State or the State's securities.
- (3) Plus a surtax of 0.4312% on vehicles in Arizona and 0.25% in Delaware.
- (4) Plus a fire marshal's tax not to exceed 1%; 0.375% in Oklahoma; 0.50% in Indiana and South Dakota; 0.50% in West Virginia; 0.65% in Minnesota; 0.75% in Kentucky, Nebraska, Ohio, Tennessee, 0.80% in Kansas; 1.25% in Louisiana; 1.4% in Maine, and 1.15% in Oregon.
- (5) With minimum tax of \$200 in New Hampshire, North Dakota, & West Virginia, \$150 in Tennessee and \$250 in New York and Ohio.
- (6) After 2001, foreign and alien insurers are no longer subject to gross premium tax, but are subject to the corporate excise tax.

Source: Commerce Clearing House, Inc.

Economic Report of the Governor

TABLE 87
ALCOHOLIC BEVERAGE EXCISE TAXES BY STATE
(Dollars per Gallon)

<u>State</u>	<u>Distilled</u> <u>Spirits</u>	<u>Wines</u> <u>14%</u> <u>or</u>	<u>Wines</u> <u>14%</u> <u>to 21%</u>	<u>Be</u>	<u>State</u>	<u>Distilled</u> <u>Spirits</u>	<u>Wines</u> <u>14%</u> <u>or Less</u>	<u>Wines</u> <u>14%</u> <u>to 21%</u>	
Alabama (2)	(1)	1.70	9.16	.53	Montana	(1)	1.06	1.06	.14
Alaska	12.80	2.50	2.50	1.07	Nebraska	3.75	.95	1.35	.31
Arizona	3.00	.84	.84	.16	Nevada	3.60	.70	1.30	.16
Arkansas	2.50	.75	.75	.23	New Hampshire	(1)	(1)	(1)	.30
California	3.30	.20	.20	.20	New Jersey	5.50	.88	.88	.12
Colorado	2.28	.28	.28	.08	New Mexico	6.06	1.70	1.70	.41
Connecticut	5.40	.72	.72	.24	New York (2)	6.44	.30	.30	.14
Delaware	3.75	.97	.97	.16	N. Carolina	(1)	1.00	1.11	.62
Florida	6.50	2.25	3.00	.48	N. Dakota	2.50	.50	.60	.16
Georgia (2)	3.79	1.51	2.54	.32	Ohio	(1)	.32	1.00	.18
Hawaii	5.98	1.38	1.38	.93	Oklahoma	5.56	.72	.72	.40
Idaho	(1)	.45	.45	.15	Oregon	(1)	.67	.77	.08
Illinois (2)	8.55	1.39	1.39 (6)	.23	Pennsylvania	(1)	(1)	(1)	.08
Indiana	2.68	.47	.47	.12	Rhode Island	5.40	1.40	1.40	.11
Iowa	(1)	1.75	1.75	.19	S. Carolina (3)	2.72	.90	.90	.77
Kansas	2.50	.30	.75	.18	S. Dakota	3.93	.93	1.45	.27
Kentucky	1.92	.50	.50	.08	Tennessee (4)	4.40	1.21	1.21	1.29
Louisiana (2)	2.50	.11	.23	.32	Texas	2.40	.20	.41	.20
Maine	(1)	.60	1.25	.35	Utah	(1)	(1)	(1)	.41
Maryland (2)	1.50	.40	.40	.09	Vermont	(1)	.55	.55	.27
Massachusetts	4.05	.55	.55	.11	Virginia	(1)	1.51	(1)	.26
Michigan	(1)	.51	.76	.20	Washington	14.27	.87	1.72	.26
Minnesota	5.03	.30	.95	.15	W. Virginia	(1)	1.00	1.00	.18
Mississippi	(1)	.35	.35	.43	Wisconsin (5)	3.25	.25	.45	.06
Missouri	2.00	.42	.42	.06	Wyoming	(1)	(1)	(1)	.02

- (1) Government directly controls sale, revenue generated through markup, store profits, and additional taxes and fees.
- (2) Additional excise taxes on beer at the local level. Additional local taxes in NYC.
- (3) Additional surtaxes of 9% on alcoholic beverages and 18¢ per gallon for wine are applied.
- (4) Tennessee levies a 17% surcharge on the wholesale price of malt beverages.
- (5) An administration fee of 3¢ per gallon is imposed on intoxicating liquors.
- (6) Over 20%-\$8.55/gallon

Source: Commerce Clearing House, Inc., Federation of Tax Administrators. Updated December 2015.

Economic Report of the Governor

TABLE 88
GENERAL FUND REVENUES

<u>TAXES (\$K)</u>	<u>FY 2011</u>	<u>FY 2012</u>	<u>FY 2013</u>	<u>FY 2014⁽¹⁾</u>	<u>FY 2015</u>
Personal Income	\$7,246,431	\$8,310,820	\$8,719,245	\$8,718,659	\$9,151,037
Sales and Use	3,353,230	3,830,117	3,896,998	4,100,564	4,205,051
Corporation	794,473	716,522	742,515	782,239	814,805
Public Service Corporation	269,806	250,397	266,647	293,303	276,833
Inheritance & Estate	237,573	191,699	439,519	168,075	176,750
Insurance Companies	220,626	237,609	260,858	240,666	220,629
Cigarettes	404,111	421,005	399,822	376,835	358,704
Real Estate Conveyance	94,822	107,531	113,830	180,511	185,955
Oil Companies	169,163	146,067	175,526	35,580	-
Electric Generation	-	69,532	66,823	15,315	7
Alcoholic Beverages	48,923	60,595	60,406	60,644	61,651
Admissions, Dues, Cabaret	34,456	34,398	36,544	39,935	38,436
Miscellaneous	140,506	536,810	523,028	498,260	474,009
Total - Taxes	<u>\$13,014,119</u>	<u>\$14,913,103</u>	<u>\$15,701,763</u>	<u>\$15,510,588</u>	<u>\$15,963,866</u>
Less Refunds of Taxes	(956,054)	(1,105,171)	(1,144,993)	(1,182,397)	(1,163,639)
Less Refunds of R&D Credit	(8,599)	(3,563)	(4,086)	(5,055)	(7,878)
Total - Taxes Less Refunds	<u>\$12,049,467</u>	<u>\$13,804,369</u>	<u>\$14,552,684</u>	<u>\$14,323,136</u>	<u>\$14,792,350</u>
<u>OTHER REVENUE</u>					
Transfer-Special Revenue	\$293,108	\$313,757	\$315,452	\$323,219	\$323,315
Indian Gaming Payments	359,582	344,645	296,396	279,873	267,986
Licenses, Permits & Fees	250,442	283,414	262,068	314,722	257,444
Sales of Commodities & Services	35,506	35,007	36,298	40,523	35,813
Rents, Fines & Escheats	157,771	123,424	144,141	130,875	168,679
Investment Income	29	964	(792)	(336)	943
Miscellaneous	178,728	191,965	163,818	206,782	185,014
Less Refunds of Payments	(1,875)	(85,377)	(74,016)	(66,625)	(64,281)
Total - Other Revenue	<u>\$1,273,291</u>	<u>\$1,207,780</u>	<u>\$1,143,366</u>	<u>\$1,229,032</u>	<u>\$1,174,912</u>
<u>OTHER SOURCES</u>					
Federal Grants	\$4,235,178	\$3,607,163	\$3,733,910	\$1,243,861	\$1,241,244
Transfer from Tobacco Fund	95,304	96,100	103,100	107,000	97,367
Transfer From/(To) Other Funds	54,215	(153,799)	(128,028)	106,528	(23,834)
Total - Other Sources	<u>\$4,384,697</u>	<u>\$3,549,464</u>	<u>\$3,708,982</u>	<u>\$1,457,389</u>	<u>\$1,314,777</u>
GRAND TOTAL	\$17,707,454	\$18,561,633	\$19,405,031	\$17,009,556	\$17,282,038
<u>TAXES</u>	<u>% of Total</u>	<u>% of Total</u>	<u>% of Total</u>	<u>% of Total</u>	<u>% of Total</u>
Personal Income	40.92	44.77	44.93	51.26	52.95
Sales and Use	18.94	20.63	20.08	24.11	24.33
Corporation	4.49	3.86	3.83	4.60	4.71
Public Service Corporation	1.52	1.35	1.37	1.72	1.60
Inheritance & Estate	1.34	1.03	2.26	0.99	1.02
Insurance Companies	1.25	1.28	1.34	1.41	1.28
Cigarettes	2.28	2.27	2.06	2.22	2.08
Real Estate Conveyance	0.54	0.58	0.59	1.06	1.08
Oil Companies	0.96	0.79	0.90	0.21	-
Electric Generation	-	0.37	0.34	0.09	-
Alcoholic Beverages	0.28	0.33	0.31	0.36	0.36
Admissions, Dues, Cabaret	0.19	0.19	0.19	0.23	0.22
Miscellaneous	0.79	2.89	2.70	2.93	2.74
Total - Taxes	<u>73.50</u>	<u>80.34</u>	<u>80.92</u>	<u>91.19</u>	<u>92.37</u>
Less Refunds of Taxes	(5.40)	(5.95)	(5.90)	(6.95)	(6.73)
Less Refunds of R&D Credit	(0.05)	(0.02)	(0.02)	(0.03)	(0.05)
Total - Taxes Less Refunds	<u>68.05</u>	<u>74.37</u>	<u>74.99</u>	<u>84.21</u>	<u>85.59</u>
<u>OTHER REVENUE</u>					
Transfer-Special Revenue	1.66	1.69	1.63	1.90	1.87
Indian Gaming Payments	2.03	1.86	1.53	1.65	1.55
Licenses, Permits & Fees	1.41	1.53	1.35	1.85	1.49
Sales of Commodities & Services	0.20	0.19	0.19	0.24	0.21
Rents, Fines & Escheats	0.89	0.67	0.74	0.77	0.98
Investment Income	-	0.01	-	-	0.01
Miscellaneous	1.01	1.01	0.84	1.22	1.07
Less Refunds of Payments	(0.01)	(0.01)	(0.38)	(0.39)	(0.37)
Total - Other Revenue	<u>7.19</u>	<u>6.51</u>	<u>5.89</u>	<u>7.23</u>	<u>6.80</u>
<u>OTHER SOURCES</u>					
Federal Grants	23.92	19.43	19.24	7.31	7.18
Transfer from Tobacco Fund	0.54	0.52	0.53	0.63	0.56
Transfer From/(To) Other Funds	0.31	(0.82)	(0.66)	0.63	(0.14)
Total - Other Sources	<u>24.76</u>	<u>19.12</u>	<u>19.11</u>	<u>8.57</u>	<u>7.61</u>
GRAND TOTAL	100.00	100.00	100.00	100.00	100.00

Economic Report of the Governor

TABLE 89
SPECIAL TRANSPORTATION FUND REVENUES

<u>TAXES</u> (\$K)	<u>FY 2011</u>	<u>FY 2012</u>	<u>FY 2013</u>	<u>FY 2014</u>	<u>FY 2015</u>
Motor Fuels	\$438,526	\$492,795	\$501,269	\$508,058	\$516,581
Oil Companies	165,300	226,900	199,400	380,700	337,903
DMV Sales	71,943	76,618	79,000	82,216	83,868
Less Refunds of Taxes	(6,769)	(7,006)	(6,094)	(6,993)	(7,236)
Total - Taxes Less Refunds	<u>\$713,999</u>	<u>\$789,306</u>	<u>\$773,576</u>	<u>\$963,981</u>	<u>\$931,116</u>
<u>OTHER REVENUE</u>					
Motor Vehicle Receipts	\$220,144	\$235,446	\$234,484	\$236,063	\$249,479
Licenses, Permits & Fees	135,453	135,974	137,284	138,390	145,429
Interest Income	5,506	2,208	4,138	6,771	6,946
Federal Grants	9,360	12,915	12,416	12,100	12,115
Transfer from Other Funds	107,550	81,550	95,245	(76,500)	41,197
Transfer to Other Funds	(6,500)	(6,500)	(6,500)	(6,500)	(6,500)
Transfer to TSB	(15,300)	(15,000)	(15,000)	(15,000)	(15,000)
Less Refunds of Payments	(3,005)	(2,979)	(3,154)	(3,614)	(3,871)
Total - Other Revenue	<u>\$453,208</u>	<u>\$443,614</u>	<u>\$458,912</u>	<u>\$291,710</u>	<u>\$429,795</u>
GRAND TOTAL	\$1,167,208	\$1,232,921	\$1,232,487	\$1,255,690	\$1,360,911
<u>TAXES</u>	<u>% of Total</u>				
Motor Fuels	37.57	39.97	40.67	40.46	37.96
Oil Companies	14.16	18.40	16.18	30.32	24.83
DMV Sales	6.16	6.21	6.41	6.55	6.16
Less Refunds of Taxes	(0.58)	(0.57)	(0.49)	(0.56)	(0.53)
Total - Taxes Less Refunds	<u>61.17</u>	<u>64.02</u>	<u>62.77</u>	<u>76.77</u>	<u>68.42</u>
<u>OTHER REVENUE</u>					
Motor Vehicle Receipts	18.86	19.10	19.03	18.80	18.33
Licenses, Permits & Fees	11.60	11.03	11.14	11.02	10.69
Interest Income	0.47	0.18	0.34	0.54	0.51
Federal Grants	0.80	1.05	1.01	0.96	0.89
Transfer from Other Funds	9.21	6.61	7.73	(6.09)	3.03
Transfer to Other Funds	(0.56)	(0.53)	(0.53)	(0.52)	(0.48)
Transfer to TSB	(1.31)	(1.22)	(1.22)	(1.19)	(1.10)
Less Refunds of Payments	(0.26)	(0.24)	(0.26)	(0.29)	(0.28)
Total - Other Revenue	<u>38.83</u>	<u>35.98</u>	<u>37.23</u>	<u>23.23</u>	<u>31.58</u>
GRAND TOTAL	100.00	100.00	100.00	100.00	100.00

(1) Beginning in FY 2014, Federal Grants within the General Fund reflect the conversion to net budgeting of the Medicaid account. In addition, in reporting FY 2014 results the Comptroller included \$598.5 million from the proceeds of GAAP Conversion Bonds within the revenue schedule. Since these proceeds were reserved for use in mitigating the cumulative GAAP deficit, the Office of Policy and Management has not included the \$598.5 million within the General Fund revenue schedule.

This page has been intentionally left blank.

APPENDIX

This page has been intentionally left blank.

Economic Report of the Governor

Connecticut Resident Population Census Counts

	Population		Population		2000-2010 <u>Change</u>	%	2014 <u>DPH* Est</u>
	<u>2000</u>	<u>Rank</u>	<u>2010</u>	<u>Rank</u>			
Total	3,405,565		3,574,097		172,280	4.9	3,596,677
Andover	3,036	147	3,303	147	267	8.8	3,272
Ansonia	18,554	57	19,249	60	695	3.7	18,959
Ashford	4,098	135	4,317	136	219	5.3	4,259
Avon	15,832	68	18,098	65	2,266	14.3	18,421
Barkhamsted	3,494	143	3,799	141	305	8.7	3,705
Beacon Falls	5,246	125	6,049	123	803	15.3	6,055
Berlin	18,215	59	19,866	54	1,651	9.1	20,610
Bethany	5,040	126	5,563	126	523	10.4	5,531
Bethel	18,067	61	18,584	62	517	2.9	19,372
Bethlehem	3,422	144	3,607	143	185	5.4	3,501
Bloomfield	19,587	52	20,486	52	899	4.6	20,819
Bolton	5,017	127	4,980	131	-37	-0.7	4,952
Bozrah	2,357	153	2,627	152	270	11.5	2,622
Branford	28,683	32	28,026	37	-657	-2.3	28,225
Bridgeport	139,529	1	144,229	1	4,700	3.4	147,612
Bridgewater	1,824	160	1,727	162	-97	-5.3	1,675
Bristol	60,062	11	60,477	13	415	0.7	60,570
Brookfield	15,664	69	16,452	71	788	5.0	17,055
Brooklyn	7,173	113	8,210	110	1,037	14.5	8,254
Burlington	8,190	108	9,301	104	1,111	13.6	9,576
Canaan	1,081	168	1,234	168	153	14.2	1,195
Canterbury	4,692	131	5,132	130	440	9.4	5,088
Canton	8,840	101	10,292	95	1,452	16.4	10,345
Chaplin	2,250	155	2,305	156	55	2.4	2,262
Cheshire	28,543	33	29,261	32	718	2.5	29,250
Chester	3,743	141	3,994	139	251	6.7	4,316
Clinton	13,094	81	13,260	82	166	1.3	13,129
Colchester	14,551	74	16,068	72	1,517	10.4	16,192
Colebrook	1,471	165	1,485	165	14	1.0	1,445
Columbia	4,971	129	5,485	127	514	10.3	5,454
Cornwall	1,434	166	1,420	167	-14	-1.0	1,398
Coventry	11,504	87	12,435	87	931	8.1	12,419
Cromwell	12,871	83	14,005	79	1,134	8.8	14,113
Danbury	74,848	7	80,893	7	6,045	8.1	83,784
Darien	19,607	51	20,732	51	1,125	5.7	21,689
Deep River	4,610	133	4,629	133	19	0.4	4,571
Derby	12,391	84	12,902	84	511	4.1	12,768
Durham	6,627	116	7,388	116	761	11.5	7,348
East Granby	4,745	130	5,148	129	403	8.5	5,212
East Haddam	8,333	105	9,126	106	793	9.5	9,127
East Hampton	13,352	78	12,959	83	-393	-2.9	12,874
East Hartford	49,575	19	51,252	19	1,677	3.4	51,033
East Haven	28,189	35	29,257	33	1,068	3.8	29,044

Economic Report of the Governor

Connecticut Resident Population Census Counts

	<u>Population</u> <u>2000</u>		<u>Population</u> <u>2010</u>		<u>2000-2010</u> <u>Change</u>	<u>%</u> <u>Chg.</u>	<u>2014</u> <u>DPH* Est</u>
		<u>Rank</u>		<u>Rank</u>			
East Lyme	18,118	60	19,159	61	1,041	5.7	19,140
East Windsor	9,818	96	11,162	94	1,344	13.7	11,423
Eastford	1,618	163	1,749	161	131	8.1	1,734
Easton	7,272	111	7,490	115	218	3.0	7,631
Ellington	12,921	82	15,602	74	2,681	20.7	15,795
Enfield	45,212	20	44,654	22	-558	-1.2	44,626
Essex	6,505	117	6,683	120	178	2.7	6,612
Fairfield	57,340	13	59,404	14	2,064	3.6	61,347
Farmington	23,641	44	25,340	44	1,699	7.2	25,627
Franklin	1,835	159	1,922	159	87	4.7	1,984
Glastonbury	31,876	29	34,427	29	2,551	8.0	34,754
Goshen	2,697	151	2,976	150	279	10.3	2,914
Granby	10,347	93	11,282	92	935	9.0	11,310
Greenwich	61,101	10	61,171	10	70	0.1	62,610
Griswold	10,807	89	11,951	90	1,144	10.6	11,916
Groton	39,907	23	40,115	25	208	0.5	40,167
Guilford	21,398	49	22,375	50	977	4.6	22,413
Haddam	7,157	114	8,346	109	1,189	16.6	8,333
Hamden	56,913	14	60,960	11	4,047	7.1	61,422
Hampton	1,758	161	1,863	160	105	6.0	1,859
Hartford	121,578	3	124,775	3	3,197	2.6	124,705
Hartland	2,012	158	2,114	158	102	5.1	2,129
Harwinton	5,283	124	5,642	125	359	6.8	5,531
Hebron	8,610	104	9,686	99	1,076	12.5	9,564
Kent	2,858	150	2,979	149	121	4.2	2,910
Killingly	16,472	67	17,370	68	898	5.5	17,172
Killingworth	6,018	121	6,525	121	507	8.4	6,490
Lebanon	6,907	115	7,308	117	401	5.8	7,309
Ledyard	14,687	72	15,051	77	364	2.5	15,121
Lisbon	4,069	136	4,338	135	269	6.6	4,342
Litchfield	8,316	106	8,466	108	150	1.8	8,264
Lyme	2,016	157	2,406	154	390	19.3	2,389
Madison	17,858	64	18,269	64	411	2.3	18,259
Manchester	54,740	15	58,241	15	3,501	6.4	58,106
Mansfield	20,720	50	26,543	41	5,823	28.1	25,977
Marlborough	5,709	123	6,404	122	695	12.2	6,430
Meriden	58,244	12	60,868	12	2,624	4.5	60,293
Middlebury	6,451	118	7,575	114	1,124	17.4	7,591
Middlefield	4,203	134	4,425	134	222	5.3	4,424
Middletown	43,167	21	47,648	20	4,481	10.4	47,043
Milford	52,305	17	52,759	17	454	0.9	53,358
Monroe	19,247	54	19,479	59	232	1.2	19,867
Montville	18,546	58	19,571	57	1,025	5.5	19,635
Morris	2,301	154	2,388	155	87	3.8	2,314

Economic Report of the Governor

Connecticut Resident Population Census Counts

	<u>Population</u>		<u>Population</u>		<u>2000-2010</u>	<u>%</u>	<u>2014</u>
	<u>2000</u>	<u>Rank</u>	<u>2010</u>	<u>Rank</u>	<u>Change</u>	<u>Chg.</u>	<u>DPH* Est.</u>
Naugatuck	30,989	30	31,862	30	873	2.8	31,659
New Britain	71,538	8	73,206	8	1,668	2.3	72,878
New Canaan	19,395	53	19,738	55	343	1.8	20,314
New Fairfield	13,953	75	13,881	81	-72	-0.5	14,149
New Hartford	6,088	120	6,970	118	882	14.5	6,812
New Haven	123,626	2	129,779	2	6,153	5.0	130,282
New London	25,671	40	27,620	38	1,949	7.6	27,374
New Milford	27,121	37	28,142	36	1,021	3.8	27,474
Newington	29,306	31	30,562	31	1,256	4.3	30,685
Newtown	25,031	41	27,560	39	2,529	10.1	28,152
Norfolk	1,660	162	1,709	164	49	3.0	1,655
North Branford	13,906	76	14,407	78	501	3.6	14,322
North Canaan	3,350	145	3,315	146	-35	-1.0	3,214
North Haven	23,035	46	24,093	47	1,058	4.6	23,909
North Stonington	4,991	128	5,297	128	306	6.1	5,288
Norwalk	82,951	6	85,603	6	2,652	3.2	88,145
Norwich	36,117	26	40,493	24	4,376	12.1	40,178
Old Lyme	7,406	110	7,603	113	197	2.7	7,575
Old Saybrook	10,367	92	10,242	96	-125	-1.2	10,217
Orange	13,233	79	13,956	80	723	5.5	13,955
Oxford	9,821	95	12,683	85	2,862	29.1	12,914
Plainfield	14,619	73	15,405	75	786	5.4	15,135
Plainville	17,328	66	17,716	67	388	2.2	17,801
Plymouth	11,634	86	12,243	88	609	5.2	11,914
Pomfret	3,798	140	4,247	137	449	11.8	4,179
Portland	8,732	102	9,508	101	776	8.9	9,444
Preston	4,688	132	4,726	132	38	0.8	4,748
Prospect	8,707	103	9,405	103	698	8.0	9,723
Putnam	9,002	98	9,584	100	582	6.5	9,416
Redding	8,270	107	9,158	105	888	10.7	9,309
Ridgefield	23,643	43	24,638	46	995	4.2	25,205
Rocky Hill	17,966	62	19,709	56	1,743	9.7	20,094
Roxbury	2,136	156	2,262	157	126	5.9	2,201
Salem	3,858	138	4,151	138	293	7.6	4,184
Salisbury	3,977	137	3,741	142	-236	-5.9	3,665
Scotland	1,556	164	1,726	163	170	10.9	1,694
Seymour	15,454	70	16,540	70	1,086	7.0	16,537
Sharon	2,968	149	2,782	151	-186	-6.3	2,725
Shelton	38,101	25	39,559	26	1,458	3.8	41,295
Sherman	3,827	139	3,581	144	-246	-6.4	3,671
Simsbury	23,234	45	23,511	48	277	1.2	23,975
Somers	10,417	91	11,444	91	1,027	9.9	11,303
South Windsor	24,412	42	25,709	43	1,297	5.3	25,823
Southbury	18,567	56	19,904	53	1,337	7.2	19,881

Economic Report of the Governor

Connecticut Resident Population Census Counts

	<u>Population</u>		<u>Population</u>		<u>2000-2010</u>	<u>%</u>	<u>2014</u>
	<u>2000</u>	<u>Rank</u>	<u>2010</u>	<u>Rank</u>	<u>Change</u>	<u>Chg.</u>	<u>DPH* Est.</u>
Southington	39,728	24	43,069	23	3,341	8.4	43,815
Sprague	2,971	148	2,984	148	13	0.4	2,980
Stafford	11,307	88	12,087	89	780	6.9	11,881
Stamford	117,083	4	122,643	4	5,560	4.7	128,278
Sterling	3,099	146	3,830	140	731	23.6	3,773
Stonington	17,906	63	18,545	63	639	3.6	18,512
Stratford	49,976	18	51,384	18	1,408	2.8	52,734
Suffield	13,552	77	15,735	73	2,183	16.1	15,814
Thomaston	7,503	109	7,887	112	384	5.1	7,683
Thompson	8,878	100	9,458	102	580	6.5	9,308
Tolland	13,146	80	15,052	76	1,906	14.5	14,872
Torrington	35,202	27	36,383	27	1,181	3.4	35,190
Trumbull	34,243	28	36,018	28	1,775	5.2	36,578
Union	693	169	854	169	161	23.2	846
Vernon	28,063	36	29,179	34	1,116	4.0	29,098
Voluntown	2,528	152	2,603	153	75	3.0	2,593
Wallingford	43,026	22	45,135	21	2,109	4.9	45,074
Warren	1,254	167	1,461	166	207	16.5	1,427
Washington	3,596	142	3,578	145	-18	-0.5	3,487
Waterbury	107,271	5	110,366	5	3,095	2.9	109,307
Waterford	19,152	55	19,517	58	365	1.9	19,427
Watertown	21,661	48	22,514	49	853	3.9	22,046
West Hartford	63,589	9	63,268	9	-321	-0.5	63,324
West Haven	52,360	16	55,564	16	3,204	6.1	54,905
Westbrook	6,292	119	6,938	119	646	10.3	6,902
Weston	10,037	94	10,179	97	142	1.4	10,388
Westport	25,749	39	26,391	42	642	2.5	27,561
Wethersfield	26,271	38	26,668	40	397	1.5	26,446
Willington	5,959	122	6,041	124	82	1.4	5,934
Wilton	17,633	65	18,062	66	429	2.4	18,692
Winchester	10,664	90	11,242	93	578	5.4	10,929
Windham	22,857	47	25,268	45	2,411	10.5	25,005
Windsor	28,237	34	29,044	35	807	2.9	29,069
Windsor Locks	12,043	85	12,498	86	455	3.8	12,565
Wolcott	15,215	71	16,680	69	1,465	9.6	16,716
Woodbridge	8,983	99	8,990	107	7	0.1	8,925
Woodbury	9,198	97	9,975	98	777	8.4	9,719
Woodstock	7,221	112	7,964	111	743	10.3	7,860

* DPH stands for the Connecticut Department of Public Health

Source: U.S. Bureau of the Census, April 1, 2000 & 2010
 Department of Public Health, "Est. Population in Connecticut as of July 1, 2014"

Economic Report of the Governor

MAJOR U.S. ECONOMIC INDICATORS - FISCAL YEAR BASIS

TABLE 1
U.S. ECONOMIC VARIABLES

	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
Gross Domestic Product (\$B)	13,508.9	14,157.6	14,684.1	14,529.3	14,630.1	15,246.8	15,867.1	16,373.2	16,984.9	17,675.3
Percent Change	6.5%	4.8%	3.7%	-1.1%	0.7%	4.2%	4.1%	3.2%	3.7%	4.1%
Real GDP	14,450.2	14,721.1	14,945.8	14,549.8	14,573.8	14,913.9	15,216.2	15,430.6	15,750.6	16,182.8
Percent Change	3.1%	1.9%	1.5%	-2.6%	0.2%	3.0%	2.0%	1.4%	2.1%	2.7%
GDP Deflator (2009=100)	93.5	96.2	98.2	99.9	100.4	102.2	104.3	106.1	107.8	109.2
Percent Change	3.3%	2.9%	2.2%	1.6%	0.5%	1.8%	2.0%	1.8%	1.6%	1.3%
Housing Starts (K)	2,036.0	1,546.2	1,132.4	646.3	594.0	569.7	684.4	876.7	953.2	1,055.0
Percent Change	1.0%	-24.1%	-26.8%	-42.9%	-8.1%	-4.1%	20.1%	28.1%	8.7%	10.7%
Unemployment Rate	4.8%	4.5%	5.0%	7.6%	9.8%	9.3%	8.5%	7.8%	6.8%	5.7%
New Vehicle Sales (M)	16.8	16.3	15.3	10.6	11.2	12.2	13.6	15.1	15.9	16.8
Percent Change	-1.6%	-2.6%	-6.3%	-30.5%	5.3%	9.4%	11.2%	10.6%	5.5%	5.9%
Consumer Price Index ('82-'84=100)	198.9	204.1	211.7	214.6	216.8	221.1	227.6	231.4	235.0	236.7
Percent Change	3.8%	2.6%	3.7%	1.4%	1.0%	2.0%	2.9%	1.7%	1.6%	0.7%
Industrial Production Index ('07=100)	100.6	103.7	104.4	93.4	91.4	96.0	98.9	100.9	103.5	107.0
Percent Change	2.3%	3.1%	0.7%	-10.5%	-2.1%	5.0%	3.0%	2.0%	2.6%	3.4%
Personal Income (\$B)	11,029.8	11,701.1	12,329.8	12,275.3	12,212.0	12,883.2	13,555.6	14,025.1	14,350.8	15,021.8
Percent Change	6.8%	6.1%	5.4%	-0.4%	-0.5%	5.5%	5.2%	3.5%	2.3%	4.7%
Real Personal Income (\$B in 2009=100)	11,773.5	12,213.4	12,486.6	12,282.3	12,094.7	12,537.8	12,878.9	13,123.5	13,241.5	13,751.7
Percent Change	3.6%	3.7%	2.2%	-1.6%	-1.5%	3.7%	2.7%	1.9%	0.9%	3.9%
Disposable Personal Income (\$B)	9,741.7	10,273.8	10,804.0	10,953.8	11,041.3	11,529.1	12,078.2	12,424.6	12,636.0	13,154.4
Percent Change	5.9%	5.5%	5.2%	1.4%	0.8%	4.4%	4.8%	2.9%	1.7%	4.1%
Disposable Personal Income (\$B in 2009\$)	10,399.2	10,724.1	10,941.5	10,960.8	10,935.6	11,220.8	11,475.4	11,626.2	11,659.6	12,042.5
Percent Change	2.8%	3.1%	2.0%	0.2%	-0.2%	2.6%	2.3%	1.3%	0.3%	3.3%

Economic Report of the Governor

MAJOR U.S. ECONOMIC INDICATORS - FISCAL YEAR BASIS

TABLE 2
U.S. PERSONAL INCOME
(BILLIONS OF DOLLARS)

	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
Personal Income	11,029.8	11,701.1	12,329.8	12,275.3	12,212.0	12,883.2	13,555.6	14,025.1	14,350.8	15,021.8
Percent Change	6.8%	6.1%	5.4%	-0.4%	-0.5%	5.5%	5.2%	3.5%	2.3%	4.7%
Wages & Salaries	5,884.9	6,239.3	6,483.1	6,385.9	6,281.0	6,526.0	6,763.3	7,022.8	7,283.1	7,655.2
Percent Change	5.8%	6.0%	3.9%	-1.5%	-1.6%	3.9%	3.6%	3.8%	3.7%	5.1%
Manufacturing Income	726.1	745.7	749.0	699.7	658.4	696.1	720.3	739.4	762.0	792.9
Percent Change	2.9%	2.7%	0.5%	-6.6%	-5.9%	5.7%	3.5%	2.7%	3.1%	4.1%
Nonmanufacturing Inc.	5,158.8	5,493.6	5,734.1	5,686.2	5,622.5	5,830.0	6,043.0	6,283.4	6,521.0	6,862.3
Percent Change	6.3%	6.5%	4.4%	-0.8%	-1.1%	3.7%	3.7%	4.0%	3.8%	5.2%
Other Labor Income	1,421.9	1,472.9	1,529.2	1,541.8	1,555.0	1,612.9	1,654.6	1,702.8	1,747.5	1,799.4
Percent Change	4.6%	3.6%	3.8%	0.8%	0.9%	3.7%	2.6%	2.9%	2.6%	3.0%
Proprietor's Income	1,030.7	1,014.7	1,003.8	982.8	1,011.4	1,079.2	1,200.0	1,270.1	1,305.7	1,370.5
Percent Change	7.0%	-1.6%	-1.1%	-2.1%	2.9%	6.7%	11.2%	5.8%	2.8%	5.0%
Farm Income	41.0	36.2	46.2	36.1	40.6	62.4	69.1	77.1	82.9	67.4
Percent Change	-12.8%	-11.8%	27.7%	-21.7%	12.2%	53.8%	10.7%	11.7%	7.5%	-18.7%
Nonfarm Income	989.8	978.6	957.6	946.6	970.8	1,016.9	1,131.0	1,193.0	1,222.9	1,303.2
Percent Change	8.0%	-1.1%	-2.1%	-1.1%	2.6%	4.7%	11.2%	5.5%	2.5%	6.6%
Rental Income	225.0	190.6	216.4	302.3	369.2	442.9	510.8	541.4	586.4	634.5
Percent Change	-9.8%	-15.3%	13.5%	39.7%	22.2%	19.9%	15.3%	6.0%	8.3%	8.2%
Personal Dividend Inc.	647.7	773.4	839.6	689.6	503.8	612.0	743.3	840.4	796.7	848.9
Percent Change	11.8%	19.4%	8.6%	-17.9%	-26.9%	21.5%	21.5%	13.1%	-5.2%	6.5%
Personal Interest Income	1,155.2	1,283.3	1,371.2	1,326.9	1,217.7	1,209.1	1,259.6	1,281.1	1,295.4	1,293.5
Percent Change	15.6%	11.1%	6.9%	-3.2%	-8.2%	-0.7%	4.2%	1.7%	1.1%	-0.1%
Transfer Payments	664.5	726.9	886.5	1,046.2	1,274.1	1,401.2	1,424.0	1,366.6	1,336.1	1,420.0
Percent Change	7.9%	9.4%	21.9%	18.0%	21.8%	10.0%	1.6%	-4.0%	-2.2%	6.3%

Economic Report of the Governor

MAJOR U.S. ECONOMIC INDICATORS - FISCAL YEAR BASIS

TABLE 3
U.S. PERSONAL INCOME AND ITS DISPOSITION
(BILLIONS OF DOLLARS)

	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
Less:										
Contributions to Social Insurance	900.2	943.0	975.9	976.7	971.5	952.6	932.0	1,028.3	1,132.4	1,181.2
Percent Change	5.6%	4.8%	3.5%	0.1%	-0.5%	-1.9%	-2.2%	10.3%	10.1%	4.3%
Equals:										
Personal Income	11,029.8	11,701.1	12,329.8	12,275.3	12,212.0	12,883.2	13,555.6	14,025.1	14,350.8	15,021.8
Percent Change	6.8%	6.1%	5.4%	-0.4%	-0.5%	5.5%	5.2%	3.5%	2.3%	4.7%
Less:										
Personal Taxes	1,288.2	1,427.3	1,525.7	1,321.4	1,170.7	1,354.1	1,477.4	1,600.6	1,714.8	1,867.4
Percent Change	13.7%	10.8%	6.9%	-13.4%	-11.4%	15.7%	9.1%	8.3%	7.1%	8.9%
Equals:										
Income (\$B)	9,741.7	10,273.8	10,804.0	10,953.8	11,041.3	11,529.1	12,078.2	12,424.6	12,636.0	13,154.4
Percent Change	5.9%	5.5%	5.2%	1.4%	0.8%	4.4%	4.8%	2.9%	1.7%	4.1%
Less:										
Personal Outlays	9,447.1	9,955.8	10,400.2	10,314.1	10,425.6	10,851.3	11,291.6	11,617.1	12,025.1	12,511.6
Percent Change	6.6%	5.4%	4.5%	-0.8%	1.1%	4.1%	4.1%	2.9%	3.5%	4.0%
Equals:										
Personal Savings	294.6	318.0	403.8	639.8	615.7	677.8	786.6	807.4	610.9	642.9
Percent Change	-10.3%	8.0%	27.0%	58.4%	-3.8%	10.1%	16.1%	2.6%	-24.3%	5.2%
Personal Savings Rate	3.0%	3.1%	3.7%	5.8%	5.6%	5.9%	6.5%	6.5%	4.8%	4.9%

Economic Report of the Governor

MAJOR U.S. ECONOMIC INDICATORS - FISCAL YEAR BASIS

TABLE 4
U.S. EMPLOYMENT AND THE LABOR FORCE
(MILLIONS OF JOBS)

	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
Establishment Employ.	135.3	137.3	138.1	134.3	130.1	130.9	133.0	135.2	137.6	140.6
Percent Change	1.9%	1.5%	0.6%	-2.7%	-3.1%	0.6%	1.6%	1.6%	1.8%	2.1%
Manufacturing	14.2	14.0	13.7	12.7	11.5	11.6	11.8	12.0	12.1	12.3
Percent Change	-0.6%	-1.2%	-2.3%	-7.7%	-8.9%	0.8%	1.8%	1.2%	0.9%	1.6%
Nonmanufacturing	121.1	123.3	124.4	121.6	118.6	119.3	121.2	123.2	125.5	128.3
Percent Change	2.2%	1.8%	0.9%	-2.2%	-2.5%	0.6%	1.6%	1.7%	1.9%	2.2%
Construction & Mining	8.2	8.4	8.2	7.4	6.3	6.2	6.4	6.6	6.9	7.2
Percent Change	6.2%	2.2%	-2.3%	-10.3%	-14.0%	-1.5%	3.2%	2.4%	4.1%	4.4%
Information	3.1	3.0	3.0	2.9	2.7	2.7	2.7	2.7	2.7	2.8
Percent Change	-0.9%	-0.7%	-0.3%	-4.1%	-5.4%	-2.0%	-0.5%	0.5%	1.3%	1.8%
Public Utility, Trade & Transportation	26.1	26.5	26.6	25.6	24.6	24.8	25.3	25.6	26.1	26.7
Percent Change	1.6%	1.2%	0.6%	-3.9%	-3.8%	0.8%	1.9%	1.3%	1.9%	2.1%
Finance, Insurance & Real Estate	8.3	8.4	8.3	8.0	7.7	7.7	7.7	7.8	7.9	8.1
Percent Change	2.0%	1.0%	-1.1%	-3.1%	-3.6%	-0.7%	0.7%	1.3%	1.2%	1.7%
Services	53.5	54.9	55.9	55.2	54.6	55.6	57.1	58.6	60.1	61.7
Percent Change	2.8%	2.6%	1.8%	-1.2%	-1.1%	1.9%	2.7%	2.7%	2.5%	2.8%
Professional & Business	17.3	17.8	18.0	17.1	16.5	17.0	17.6	18.2	18.8	19.4
Percent Change	3.9%	3.0%	0.9%	-4.7%	-3.6%	3.1%	3.6%	3.3%	3.1%	3.4%
Education & Health	17.9	18.3	18.9	19.4	19.7	20.0	20.5	20.9	21.3	21.7
Percent Change	2.8%	2.6%	3.0%	2.6%	1.8%	1.7%	2.1%	2.1%	1.7%	2.3%
Leisure & Hospitality	12.9	13.3	13.5	13.2	13.0	13.2	13.6	14.0	14.5	14.9
Percent Change	2.3%	2.6%	1.6%	-1.9%	-1.9%	1.4%	2.9%	3.2%	3.4%	3.1%
Other Services	5.4	5.5	5.5	5.4	5.3	5.3	5.4	5.5	5.5	5.6
Percent Change	0.3%	1.0%	0.9%	-1.3%	-2.0%	0.1%	1.2%	1.0%	1.4%	1.5%
Government	21.9	22.1	22.4	22.6	22.6	22.3	22.0	21.9	21.8	21.9
Percent Change	0.8%	1.0%	1.2%	0.9%	0.0%	-1.3%	-1.4%	-0.4%	-0.2%	0.3%
Civilian Labor Force	150.4	152.4	153.7	154.6	153.9	153.6	154.3	155.3	155.5	156.6
Percent Change	1.4%	1.4%	0.8%	0.6%	-0.4%	-0.2%	0.4%	0.7%	0.1%	0.7%
Unemployment Rate	4.8%	4.5%	5.0%	7.6%	9.8%	9.3%	8.5%	7.8%	6.8%	5.7%

Economic Report of the Governor

MAJOR U.S. ECONOMIC INDICATORS - FISCAL YEAR BASIS

TABLE 5
CONSUMER PRICE INDEXES
(1982-1984 = 100)

	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
All Items – Urban Consumers	198.9	204.1	211.7	214.6	216.8	221.1	227.6	231.4	235.0	236.7
Percent Change	3.8%	2.6%	3.7%	1.4%	1.0%	2.0%	2.9%	1.7%	1.6%	0.7%
Food & Beverages	193.4	198.9	208.1	218.2	218.6	223.1	231.5	235.4	239.1	245.1
Percent Change	2.3%	2.9%	4.6%	4.8%	0.2%	2.0%	3.8%	1.7%	1.5%	2.5%
Housing	199.6	206.5	212.8	217.5	216.5	217.2	221.0	224.9	230.2	235.6
Percent Change	3.7%	3.5%	3.1%	2.2%	-0.5%	0.3%	1.7%	1.8%	2.4%	2.3%
Energy	194.2	198.6	226.6	208.2	206.4	227.8	245.9	245.7	246.5	221.3
Percent Change	21.6%	2.3%	14.1%	-8.1%	-0.9%	10.4%	7.9%	-0.1%	0.3%	-10.2%
Commodities	163.1	165.0	172.0	170.9	173.2	178.7	186.3	187.8	188.0	184.5
Percent Change	3.9%	1.2%	4.2%	-0.6%	1.3%	3.2%	4.3%	0.8%	0.1%	-1.9%
Apparel	119.2	119.6	118.6	119.4	120.1	119.7	124.9	127.0	127.6	126.8
Percent Change	-0.8%	0.4%	-0.8%	0.7%	0.6%	-0.3%	4.3%	1.7%	0.5%	-0.6%
Transportation	179.9	181.2	192.8	182.6	189.0	202.9	215.5	217.8	217.8	206.2
Percent Change	7.7%	0.7%	6.4%	-5.3%	3.5%	7.3%	6.2%	1.1%	0.0%	-5.3%
Services	234.6	242.9	251.0	258.1	260.1	263.2	268.5	274.6	281.5	288.3
Percent Change	3.7%	3.6%	3.3%	2.8%	0.8%	1.2%	2.0%	2.3%	2.5%	2.4%
Medical Care	329.7	343.0	358.6	369.4	382.2	394.0	407.4	420.6	430.2	440.9
Percent Change	4.1%	4.0%	4.6%	3.0%	3.5%	3.1%	3.4%	3.2%	2.3%	2.5%
Other Goods & Services	317.6	327.5	338.9	355.3	377.1	384.6	390.7	397.8	404.7	411.2
Percent Change	2.8%	3.1%	3.5%	4.8%	6.1%	2.0%	1.6%	1.8%	1.7%	1.6%

Economic Report of the Governor

MAJOR CONNECTICUT ECONOMIC INDICATORS - FISCAL YEAR BASIS

**TABLE 6
PERSONAL INCOME
(BILLIONS OF DOLLARS)**

	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
Personal Income	181.01	194.18	203.65	200.58	200.57	211.13	219.24	225.19	227.89	237.13
Percent Change	6.9%	7.3%	4.9%	-1.5%	0.0%	5.3%	3.8%	2.7%	1.2%	4.1%
Disposable Personal Income	152.11	161.68	169.13	170.73	173.87	181.11	187.04	190.41	190.47	197.20
Percent Change	5.7%	6.3%	4.6%	0.9%	1.8%	4.2%	3.3%	1.8%	0.0%	3.5%
Total Wages	92.49	97.77	101.24	98.61	96.47	100.72	102.23	104.86	107.28	110.38
Percent Change	5.0%	5.7%	3.5%	-2.6%	-2.2%	4.4%	1.5%	2.6%	2.3%	2.9%
Manufacturing Wages	12.51	12.96	13.32	12.64	11.88	12.74	12.90	13.17	13.21	12.87
Percent Change	1.6%	3.6%	2.8%	-5.1%	-6.0%	7.2%	1.3%	2.1%	0.3%	-2.6%
Nonmanufacturing Wages	79.98	84.81	87.92	85.97	84.59	87.98	89.33	91.69	94.07	97.51
Percent Change	5.5%	6.0%	3.7%	-2.2%	-1.6%	4.0%	1.5%	2.6%	2.6%	3.7%
Other Labor Income	21.06	21.38	22.53	22.68	22.65	23.50	23.49	23.90	24.75	25.42
Percent Change	1.2%	1.5%	5.4%	0.7%	-0.2%	3.8%	-0.1%	1.8%	3.6%	2.7%
Proprietor's Income	17.23	17.12	16.14	16.34	18.44	18.39	19.65	20.66	21.35	22.99
Percent Change	7.2%	-0.6%	-5.7%	1.2%	12.8%	-0.3%	6.9%	5.2%	3.4%	7.7%
Property Income	36.57	42.23	45.30	41.95	38.44	41.37	45.12	47.53	47.18	49.08
Percent Change	14.8%	15.5%	7.3%	-7.4%	-8.4%	7.6%	9.1%	5.3%	-0.7%	4.0%
Transfer Payments Less Social Insurance	6.44	7.26	9.09	11.64	14.27	15.69	16.25	15.31	14.12	14.74
Percent Change	5.5%	12.8%	25.1%	28.1%	22.6%	9.9%	3.6%	-5.8%	-7.8%	4.4%
Transfer Payments	19.51	20.79	23.13	25.77	28.20	29.25	29.27	29.74	30.02	31.01
Percent Change	4.2%	6.6%	11.3%	11.4%	9.4%	3.8%	0.0%	1.6%	0.9%	3.3%
Social Insurance	13.07	13.52	14.04	14.13	13.93	13.57	13.02	14.43	15.90	16.27
Percent Change	3.6%	3.5%	3.8%	0.6%	-1.4%	-2.6%	-4.0%	10.8%	10.2%	2.3%

Economic Report of the Governor

MAJOR CONNECTICUT ECONOMIC INDICATORS - FISCAL YEAR BASIS

**TABLE 7
DEFLATED PERSONAL INCOME
(BILLIONS OF DOLLARS)**

	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
Personal Income	193.24	202.69	206.26	200.70	198.65	205.49	208.30	210.72	210.28	217.08
Percent Change	3.7%	4.9%	1.8%	-2.7%	-1.0%	3.4%	1.4%	1.2%	-0.2%	3.2%
Disposable Personal Income	162.38	168.77	171.30	170.84	172.20	176.28	177.71	178.17	175.76	180.53
Percent Change	2.6%	3.9%	1.5%	-0.3%	0.8%	2.4%	0.8%	0.3%	-1.4%	2.7%
Total Wages	98.74	102.05	102.53	98.67	95.54	98.03	97.13	98.12	98.99	101.04
Percent Change	1.8%	3.4%	0.5%	-3.8%	-3.2%	2.6%	-0.9%	1.0%	0.9%	2.1%
Manufacturing Wages	13.35	13.53	13.49	12.64	11.77	12.40	12.26	12.33	12.19	11.78
Percent Change	-1.5%	1.3%	-0.3%	-6.3%	-6.9%	5.3%	-1.1%	0.6%	-1.1%	-3.3%
Nonmanufacturing Wages	85.39	88.53	89.04	86.02	83.78	85.63	84.88	85.80	86.80	89.26
Percent Change	2.3%	3.7%	0.6%	-3.4%	-2.6%	2.2%	-0.9%	1.1%	1.2%	2.8%
Other Labor Income	22.48	22.32	22.82	22.70	22.43	22.88	22.31	22.37	22.84	23.27
Percent Change	-1.8%	-0.7%	2.2%	-0.6%	-1.2%	2.0%	-2.5%	0.2%	2.1%	1.9%
Proprietor's Income	18.39	17.88	16.35	16.35	18.26	17.90	18.67	19.33	19.70	21.04
Percent Change	4.0%	-2.8%	-8.5%	0.0%	11.7%	-2.0%	4.3%	3.6%	1.9%	6.8%
Property Income	39.04	44.08	45.88	41.98	38.07	40.26	42.87	44.47	43.53	44.93
Percent Change	11.4%	12.9%	4.1%	-8.5%	-9.3%	5.8%	6.5%	3.7%	-2.1%	3.2%
Transfer Payments Less Social Insurance	6.88	7.58	9.20	11.65	14.13	15.27	15.44	14.32	13.03	13.49
Percent Change	2.4%	10.3%	21.4%	26.5%	21.3%	8.0%	1.1%	-7.2%	-9.0%	3.6%
Transfer Payments	20.82	21.70	23.43	25.78	27.93	28.47	27.81	27.83	27.70	28.38
Percent Change	1.1%	4.2%	8.0%	10.1%	8.3%	2.0%	-2.3%	0.1%	-0.5%	2.5%
Social Insurance	13.95	14.12	14.22	14.14	13.80	13.21	12.37	13.50	14.67	14.89
Percent Change	0.5%	1.2%	0.8%	-0.6%	-2.4%	-4.3%	-6.3%	9.2%	8.6%	1.5%

Note: All categories are deflated by GDP Price Index (2009 = 100).

Economic Report of the Governor

MAJOR CONNECTICUT ECONOMIC INDICATORS - FISCAL YEAR BASIS

TABLE 8
MANUFACTURING EMPLOYMENT
(THOUSANDS -Seasonally Adjusted)

	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
Manufacturing	193.69	191.93	188.66	179.78	165.52	165.50	165.18	163.35	161.05	159.47
Percent Change	-1.4%	-0.9%	-1.7%	-4.7%	-7.9%	0.0%	-0.2%	-1.1%	-1.4%	-1.0%
Transportation Equip.	43.60	43.52	43.93	43.94	42.41	42.11	42.31	41.76	40.65	39.95
Percent Change	0.7%	-0.2%	1.0%	0.0%	-3.5%	-0.7%	0.5%	-1.3%	-2.7%	-1.7%
Fabricated Metals	33.75	33.64	33.38	31.60	28.19	28.40	28.83	29.69	30.14	29.49
Percent Change	-0.5%	-0.3%	-0.8%	-5.3%	-10.8%	0.7%	1.5%	3.0%	1.5%	-2.2%
Electrical Equip. & App	10.46	10.83	11.16	10.58	9.72	9.90	9.86	9.70	9.28	8.78
Percent Change	-0.4%	3.5%	3.1%	-5.2%	-8.2%	1.9%	-0.4%	-1.6%	-4.3%	-5.3%
Chemicals	16.38	15.44	14.34	13.18	11.96	11.72	10.82	10.21	10.20	9.93
Percent Change	-2.9%	-5.8%	-7.1%	-8.1%	-9.2%	-2.0%	-7.6%	-5.7%	-0.1%	-2.6%
Printing & Support	7.99	7.81	7.49	6.63	5.82	5.68	5.59	5.26	5.10	5.12
Percent Change	-2.4%	-2.3%	-4.0%	-11.5%	-12.2%	-2.3%	-1.6%	-5.9%	-3.0%	0.2%
Industrial Machinery	18.00	18.16	18.01	17.03	15.33	14.88	14.71	14.27	14.01	13.87
Percent Change	-1.9%	0.9%	-0.8%	-5.4%	-10.0%	-2.9%	-1.2%	-2.9%	-1.8%	-1.0%
All Other	63.51	62.54	60.35	56.82	52.09	52.81	53.07	52.46	51.67	52.33
Percent Change	-2.7%	-1.5%	-3.5%	-5.9%	-8.3%	1.4%	0.5%	-1.1%	-1.5%	1.3%

Economic Report of the Governor

MAJOR CONNECTICUT ECONOMIC INDICATORS - FISCAL YEAR BASIS

TABLE 9
NONMANUFACTURING EMPLOYMENT
(THOUSANDS -Seasonally Adjusted)

	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
Nonmanufacturing	1,477.1	1,497.8	1,517.7	1,484.9	1,440.4	1,453.1	1,468.5	1,483.8	1,497.5	1,519.0
Percent Change	1.1%	1.4%	1.3%	-2.2%	-3.0%	0.9%	1.1%	1.0%	0.9%	1.4%
Construction & Mining	67.2	68.5	69.2	60.3	51.8	51.4	52.4	53.1	55.0	57.0
Percent Change	-0.1%	2.0%	1.0%	-12.9%	-14.1%	-0.8%	2.1%	1.2%	3.7%	3.6%
Information	37.8	38.1	38.5	36.4	32.5	31.6	31.2	31.7	32.0	31.7
Percent Change	-2.2%	0.6%	1.1%	-5.5%	-10.7%	-2.7%	-1.3%	1.6%	1.1%	-1.1%
Utilities	8.3	8.1	8.3	8.7	8.1	7.8	7.6	7.5	7.5	7.4
Percent Change	-4.1%	-2.0%	2.5%	4.1%	-6.6%	-3.3%	-2.6%	-1.7%	-0.2%	-1.6%
Transportation	44.0	44.1	44.1	42.9	40.8	41.6	42.3	43.7	44.7	45.7
Percent Change	2.7%	0.2%	0.1%	-2.7%	-5.0%	2.0%	1.7%	3.2%	2.4%	2.2%
Wholesale Trade	67.2	67.7	69.1	67.3	63.2	62.9	63.2	63.1	63.1	62.8
Percent Change	1.9%	0.8%	2.1%	-2.6%	-6.2%	-0.4%	0.3%	-0.1%	0.1%	-0.4%
Retail Trade	191.4	191.1	190.9	182.6	177.4	179.6	181.3	182.6	184.6	187.4
Percent Change	-0.7%	-0.2%	-0.1%	-4.4%	-2.8%	1.2%	1.0%	0.7%	1.1%	1.5%
Finance & Insurance	122.3	123.8	123.2	121.0	116.6	116.7	115.4	113.3	110.2	109.6
Percent Change	1.3%	1.2%	-0.5%	-1.8%	-3.7%	0.1%	-1.1%	-1.8%	-2.7%	-0.5%
Real Estate	21.0	21.1	20.9	19.9	19.0	18.8	18.7	18.9	19.0	19.5
Percent Change	2.4%	0.8%	-1.3%	-4.7%	-4.7%	-0.7%	-0.7%	1.0%	0.9%	2.5%
Professional & Business	203.0	206.0	208.2	197.4	188.4	194.0	200.6	204.5	209.5	214.1
Percent Change	2.4%	1.5%	1.1%	-5.2%	-4.5%	2.9%	3.4%	1.9%	2.4%	2.2%
Education & Health	276.1	283.8	292.2	299.9	304.1	310.8	315.2	319.6	322.5	328.4
Percent Change	1.9%	2.8%	3.0%	2.6%	1.4%	2.2%	1.4%	1.4%	0.9%	1.8%
Leisure & Hospitality	130.8	134.0	137.4	135.2	132.6	135.4	140.6	144.8	149.3	153.7
Percent Change	1.7%	2.4%	2.5%	-1.6%	-1.9%	2.1%	3.9%	3.0%	3.1%	2.9%
Other Services	63.1	64.3	63.8	62.1	60.6	60.6	60.8	62.2	62.5	63.3
Percent Change	0.7%	1.9%	-0.7%	-2.8%	-2.4%	0.0%	0.3%	2.4%	0.3%	1.4%
Federal Government	19.8	19.6	19.6	19.5	19.8	18.4	17.8	17.5	17.3	17.5
Percent Change	-1.0%	-0.7%	-0.1%	-0.6%	1.3%	-6.8%	-3.2%	-1.9%	-1.0%	1.3%
State & Local Gov't.	225.2	227.6	232.2	232.0	225.6	223.5	221.4	221.6	220.3	220.9
Percent Change	1.0%	1.1%	2.0%	-0.1%	-2.7%	-0.9%	-0.9%	0.1%	-0.6%	0.3%

Economic Report of the Governor

MAJOR CONNECTICUT ECONOMIC INDICATORS - FISCAL YEAR BASIS

TABLE 10
LABOR FORCE & OTHER ECONOMIC INDICATORS
(THOUSANDS -Seasonally Adjusted)

	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
Labor Force	1,811.4	1,842.2	1,870.1	1,887.5	1,895.6	1,914.8	1,901.7	1,871.7	1,874.6	1,903.4
Percent Change	1.7%	1.7%	1.5%	0.9%	0.4%	1.0%	-0.7%	-1.6%	0.2%	1.5%
Nonfarm Employment	1,670.8	1,689.8	1,706.3	1,664.7	1,606.0	1,618.6	1,633.7	1,647.2	1,658.6	1,678.5
Percent Change	0.8%	1.1%	1.0%	-2.4%	-3.5%	0.8%	0.9%	0.8%	0.7%	1.2%
Residential Employment	1,728.8	1,762.6	1,777.7	1,757.3	1,728.8	1,740.3	1,741.7	1,719.9	1,741.4	1,784.4
Percent Change	2.1%	2.0%	0.9%	-1.1%	-1.6%	0.7%	0.1%	-1.3%	1.3%	2.5%
Unemployed	82.6	79.6	92.4	130.1	166.9	174.6	160.0	151.8	133.2	119.0
Percent Change	-5.3%	-3.6%	16.0%	40.8%	28.2%	4.6%	-8.4%	-5.1%	-12.2%	-10.7%
Unemployment Rate	4.6%	4.3%	4.9%	6.9%	8.8%	9.1%	8.4%	8.1%	7.1%	6.3%
Households	1,349.9	1,351.7	1,359.6	1,365.3	1,369.7	1,366.1	1,367.2	1,358.3	1,361.5	1,370.3
Percent Change	0.5%	0.1%	0.6%	0.4%	0.3%	-0.3%	0.1%	-0.7%	0.2%	0.6%
Housing Starts	11,434.9	8,834.4	6,718.5	3,761.0	3,851.4	3,542.0	3,658.2	5,409.7	4,701.1	4,854.9
Percent Change	-5.2%	-22.7%	-24.0%	-44.0%	2.4%	-8.0%	3.3%	47.9%	-13.1%	3.3%
Single Family Percent Change	9,182.8	7,207.2	4,922.5	2,479.0	2,849.0	2,469.7	2,385.9	3,032.1	2,764.4	2,439.6
	-8.4%	-21.5%	-31.7%	-49.6%	14.9%	-13.3%	-3.4%	27.1%	-8.8%	-11.8%
Multi Family Percent Change	2,252.2	1,627.2	1,796.1	1,282.1	1,002.4	1,072.3	1,272.3	2,377.7	1,936.7	2,415.3
	10.5%	-27.8%	10.4%	-28.6%	-21.8%	7.0%	18.6%	86.9%	-18.5%	24.7%
New Car Registrations	196.9	189.7	184.0	129.0	133.4	148.1	152.0	161.5	174.6	175.7
Percent Change	-8.8%	-3.6%	-3.0%	-29.9%	3.4%	11.0%	2.6%	6.3%	8.1%	0.6%

Note: Housing starts are expressed in whole numbers, not thousands

Economic Report of the Governor

MAJOR CONNECTICUT ECONOMIC INDICATORS - FISCAL YEAR BASIS

**TABLE 11
ANALYTICS**

	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
Wages/Total Income	51.1%	50.3%	49.7%	49.2%	48.1%	47.7%	46.6%	46.6%	47.1%	46.5%
Other Labor Income /Total Income	11.6%	11.0%	11.1%	11.3%	11.3%	11.1%	10.7%	10.6%	10.9%	10.7%
Social Insurance /Total Income	7.2%	7.0%	6.9%	7.0%	6.9%	6.4%	5.9%	6.4%	7.0%	6.9%
Transfer Payments /Total Income	10.8%	10.7%	11.4%	12.8%	14.1%	13.9%	13.4%	13.2%	13.2%	13.1%
Proprietor's Income /Total Income	9.5%	8.8%	7.9%	8.1%	9.2%	8.7%	9.0%	9.2%	9.4%	9.7%
Property Income /Total Income	20.2%	21.7%	22.2%	20.9%	19.2%	19.6%	20.6%	21.1%	20.7%	20.7%
Average Wages (Thousands)	54.95	57.45	58.93	58.78	59.59	61.77	62.12	63.19	64.22	65.32
Average Mfg. Wages (Thousands)	64.59	67.53	70.61	70.27	71.78	76.96	78.10	80.64	82.02	80.70
Average Nonmfg. Wages (Thousands)	55.86	58.45	59.85	59.93	61.01	63.52	64.48	65.98	67.05	69.10
Manufacturing Share of Nonfarm Employment	11.6%	11.4%	11.1%	10.8%	10.3%	10.2%	10.1%	9.9%	9.7%	9.5%
Residential Employment /Total Nonfarm Employment	1.035	1.043	1.042	1.056	1.076	1.075	1.066	1.044	1.050	1.063

Economic Report of the Governor

MAJOR CONNECTICUT REGIONAL ECONOMIC INDICATORS - CALENDAR YEAR BASIS

TABLE 12
PERSONAL INCOME (MILLIONS-Seasonally Adjusted Annual Rate)

BRIDGEPORT-STAMFORD-NORWALK

	<u>2005</u>	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>
Personal Income	63,867.0	70,858.0	77,354.8	80,544.9	76,673.3	77,805.0	83,305.0	88,151.6	90,010.8	90,912.5
Percent Change	9.3%	10.9%	9.2%	4.1%	-4.8%	1.5%	7.1%	5.8%	2.1%	1.0%
Total Wages	30,285.3	32,472.3	34,880.0	35,981.3	33,983.5	33,195.2	35,162.1	35,585.9	36,206.2	36,864.9
Percent Change	6.4%	7.2%	7.4%	3.2%	-5.6%	-2.3%	5.9%	1.2%	1.7%	1.8%

HARTFORD-WEST HARTFORD-EAST HARTFORD

	<u>2005</u>	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>
Personal Income	50,152.0	52,756.6	56,378.0	59,414.0	60,124.2	59,611.6	62,136.8	63,550.3	65,857.0	66,647.2
Percent Change	6.0%	5.2%	6.9%	5.4%	1.2%	-0.9%	4.2%	2.3%	3.6%	1.2%
Total Wages	31,143.4	32,506.2	34,335.4	35,488.4	35,074.2	34,377.3	35,874.8	36,590.1	37,915.9	39,045.5
Percent Change	6.2%	4.4%	5.6%	3.4%	-1.2%	-2.0%	4.4%	2.0%	3.6%	3.0%

NEW HAVEN-MILFORD

	<u>2005</u>	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>
Personal Income	33,193.1	34,367.2	36,255.0	38,060.2	37,990.1	37,745.0	39,354.8	40,428.5	41,558.6	42,297.8
Percent Change	4.4%	3.5%	5.5%	5.0%	-0.2%	-0.6%	4.3%	2.7%	2.8%	1.8%
Total Wages	16,864.0	17,319.5	18,023.8	18,772.6	18,562.9	18,199.6	18,760.3	19,073.3	19,633.2	20,093.4
Percent Change	4.2%	2.7%	4.1%	4.2%	-1.1%	-2.0%	3.1%	1.7%	2.9%	2.3%

NEW LONDON-NORWICH, CT-RI

	<u>2005</u>	<u>2006</u>	<u>2007</u>	<u>2008</u>	<u>2009</u>	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>
Personal Income	10,667.3	11,027.5	11,502.9	12,205.3	12,365.5	12,268.8	12,746.6	13,082.8	13,338.0	13,490.6
Percent Change	4.0%	3.4%	4.3%	6.1%	1.3%	-0.8%	3.9%	2.6%	2.0%	1.1%
Total Wages	5,970.2	6,204.7	6,422.4	6,749.3	6,793.7	6,654.8	6,757.7	6,753.3	6,765.7	6,831.6
Percent Change	4.0%	3.9%	3.5%	5.1%	0.7%	-2.0%	1.5%	-0.1%	0.2%	1.0%