



# Virginia Healthcare Workforce Briefs

Indicators from the Bureau of Economic Analysis

Regional Economic Accounts

## Series 3: Income & Compensation

Series 3, Issue 5

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### Inside this Brief:

HC&SA Earnings	2
Earnings Growth Rates	2
Share of Earnings	3
Historical Share	3
Growth by Earning Type	4
Compensation per Employee	4

### Highlights

- ◆ This report provides information concerning Q3 2012 income in Virginia's Health Care & Social Assistance (HC&SA) sector and incorporates revisions made by the Bureau of Economic Analysis for Q1 2012 and Q2 2012.
- ◆ Total earnings in Virginia's HC&SA sector rose by \$204 million in Q3 2012 to \$24.290 billion. Total earnings rose by 0.6% since Q3 2011.
- ◆ Total compensation in Virginia's HC&SA sector rose by \$197 million to \$21.943 billion in Q3 2012. Total compensation rose by 0.3% since Q3 2011.
- ◆ Compensation per Employee rose by \$16 to \$55,561 in Virginia's HC&SA sector in Q3 2012. Compensation per employee fell by 2.5% since Q3 2011.
- ◆ HC&SA earnings in Q2 2012 were revised downward by \$723 million. HC&SA employee compensation in Q2 2012 was revised downward by \$725 million. HC&SA compensation per employee was revised downward by \$1,893.

*The calendar year is the basis for quarters in this series. See Page 5 for additional information on this series.*

### Data in Brief

	Income (Millions of Dollars)				Growth Rate, Annualized		
	Q3 2011	Q1 2012	Q2 2012	Q3 2012	Annual	6-Month	Quarterly
<b>Earnings (Personal income less rents, interest, dividends and government payments)</b>							
<b>Virginia</b>	\$280,973	\$285,169	\$285,228	\$286,520	2.0%	0.9%	1.8%
<b>National</b>	\$9,479,621	\$9,681,397	\$9,722,559	\$9,772,606	3.1%	1.9%	2.1%
<b>Health Care &amp; Social Assistance Earnings</b>							
<b>Virginia</b>	\$24,152	\$24,602	\$24,086	\$24,290	0.6%	-2.5%	3.4%
<b>National</b>	\$1,048,897	\$1,062,646	\$1,066,626	\$1,072,882	2.3%	1.9%	2.4%
<b>Health Care &amp; Social Assistance Employee Compensation (Earnings less proprietor's income, includes salaries, wages &amp; benefits)</b>							
<b>Virginia</b>	\$21,877	\$22,270	\$21,746	\$21,943	0.3%	-2.9%	3.7%
<b>National</b>	\$927,517	\$938,249	\$941,761	\$947,623	2.2%	2.0%	2.5%
<b>Health Care &amp; Social Assistance Compensation per Employee (HWDC Estimate)</b>							
<b>Virginia</b>	\$56,976	\$57,313	\$55,545	\$55,561	-2.5%	-6.0%	0.1%
<b>National</b>	\$55,659	\$55,698	\$55,504	\$55,726	0.1%	0.1%	1.6%

## Health Care & Social Assistance Earnings

**Figure 1: Quarterly Change in Total Earnings from Virginia's Health Care & Social Assistance Sector. Includes proprietor's income, salaries and wages, and benefits.**



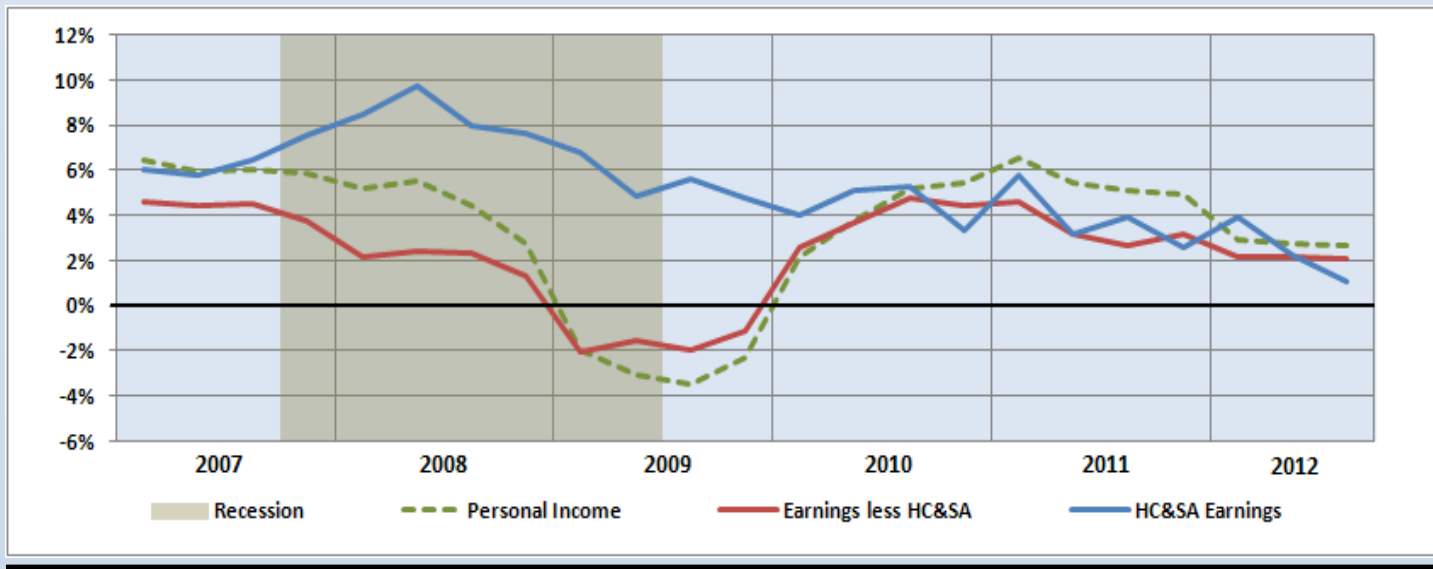
During the third quarter of 2012, total earnings in Virginia's HC&SA sector increased by \$204 million relative to the previous quarter. However, the four-quarter moving average of the quarterly change in total earnings has continued to decline, furthering a trend that began during the middle of the recession in the third quarter of 2008. Given the weak results in Q4 2011 and Q2 2012, the moving average is now at just \$34.5 million, which represents its lowest level since the NAICS classification system was implemented in 1990.

These results were influenced considerably by the revisions made to preliminary results in Q1 2012 and especially Q2 2012. Preliminary results indicated that total earnings in Q2 2012 increased by \$204 million, but revised estimates now indicate that total earnings actually fell by \$516 million during the quarter, which represents its worst quarterly loss in more than two decades.

## Virginia's HC&SA Earnings Growth Rate

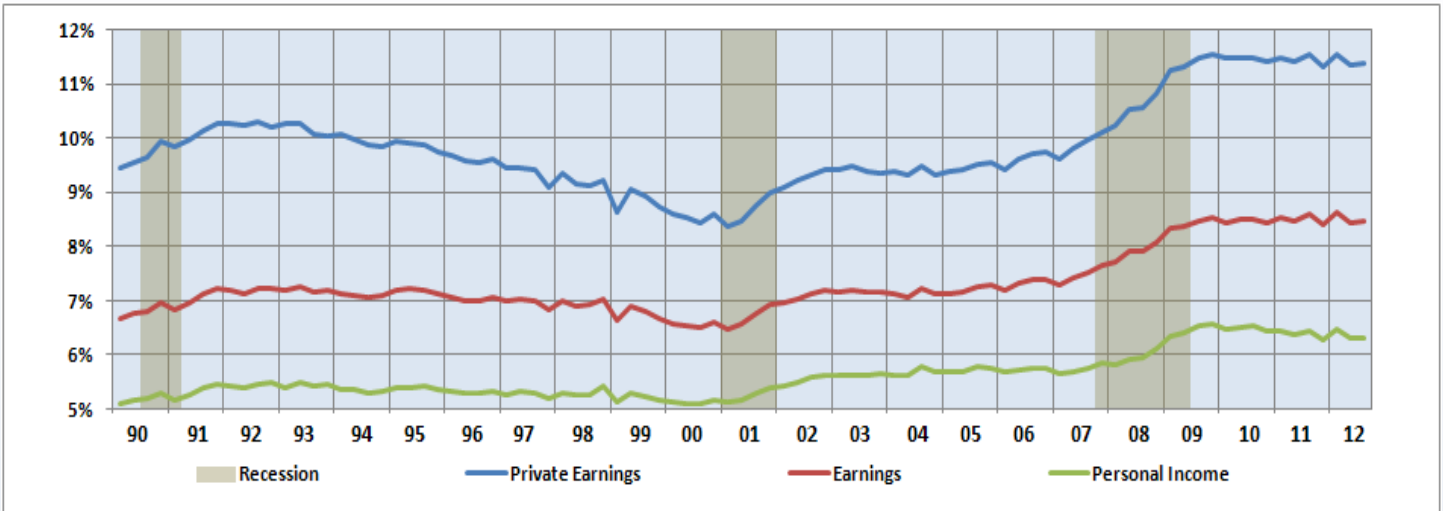
In the immediate aftermath of the end of the recession in 2009, the four-quarter moving average for the earnings growth rate of non-HC&SA earnings and personal income, both of which fell into negative territory during the recession, rebounded strongly off their lows and converged toward the moving average for HC&SA earnings. The personal income growth rate increased from -3.5% to a high of 6.5% in Q1 2011, while non-HC&SA earnings increased from -2.1% to a high of 4.7% in Q3 2010. However, ever since personal income and non-HC&SA earnings converged with HC&SA earnings in 2010, all three have trended downward, although HC&SA earnings have seen a more precipitous decline. After reaching a post-recessionary high of 5.8% in Q1 2011, the four-quarter moving average of the HC&SA earnings growth rate has declined to just 1.1% and is now growing slower than both personal income and non-HC&SA earnings.

**Figure 2: Earnings Growth Rate, 4-Quarter Moving Average (Annualized)**



## Share of Earnings

**Figure 3: The Health Care and Social Assistance Sector's Share of Earnings and Income in Virginia**



In Q3 2012, the share of both earnings and personal income that was attributable to Virginia's HC&SA sector increased slightly. The HC&SA sector now accounts for 11.4% of private earnings, 8.5% of total earnings and 6.3% of personal income. However, the recent long-term trend continued unabated. After growing in relative importance during the 2007-2009 recession, the HC&SA sector's share of earnings and income has remained essentially flat for the past three years. Regardless, over the past two decades, Virginia's HC&SA sector has appreciably increased its share of both earnings and income. For instance, since Q1 1990, its share of private earnings has increased nearly two percent.

**Personal Income** includes all income from all sources.

**Earnings** includes employee compensation and proprietors income. They do not include unearned income, such as non-business related interest, dividends, and rents, government payments, payments from pension funds, lawsuits, etc.

**Private Earnings** is all earnings less incomes from federal, state or local governments or the military. Private earnings include earnings from non-profits.

## Historical Share of Earnings by Industry

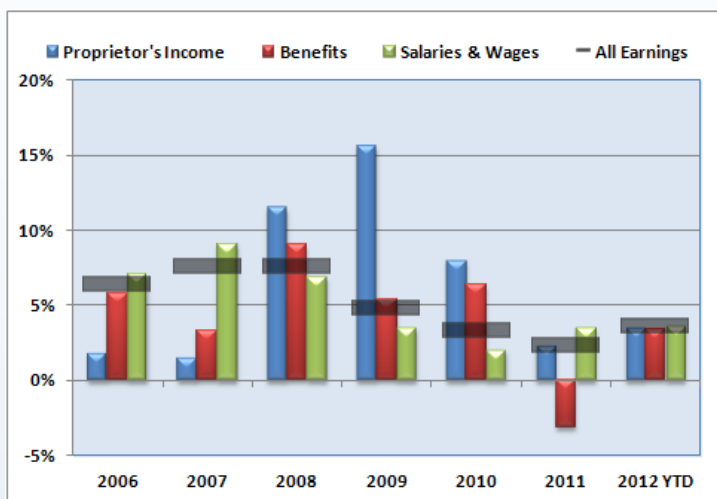
Over the past two decades, Virginia's economy has been transformed by two dominant trends: the rise of Professional, Scientific & Technical Services and the fall of Manufacturing. During this time period, Professional Scientific & Technical Services nearly doubled its share of private earnings, while Manufacturing has lost more than half of its share. Meanwhile, the HC&SA sector has firmly entrenched itself as the second largest private industry in Virginia.

**Table 2: Virginia's Largest Private Industries by Share of Earnings**

Rank	Q3 1992		Q3 2002		Q3 2012	
	Industry	Share of Private Earnings	Industry	Share of Private Earnings	Industry	Share of Private Earnings
1	Manufacturing	17.12%	Professional, Scientific & Technical Services	16.70%	Professional, Scientific & Technical Services	23.85%
2	Professional, Scientific & Technical Services	12.66%	Manufacturing	11.05%	Health Care & Social Assistance	11.40%
3	Health Care & Social Assistance	10.31%	Health Care & Social Assistance	9.34%	Manufacturing	7.95%

## Growth by Earnings Type

**Figure 4: Virginia HC&SA Earnings Growth Rate by Type of Earnings (Annualized)**



HC&SA earnings are distributed among proprietors (which includes practitioners in private practice), employee benefits and employee salaries & wages. Growth of each earning type tends to vary dramatically and can represent a growth in the number of workers, a growth in individual incomes, or some combination of both.

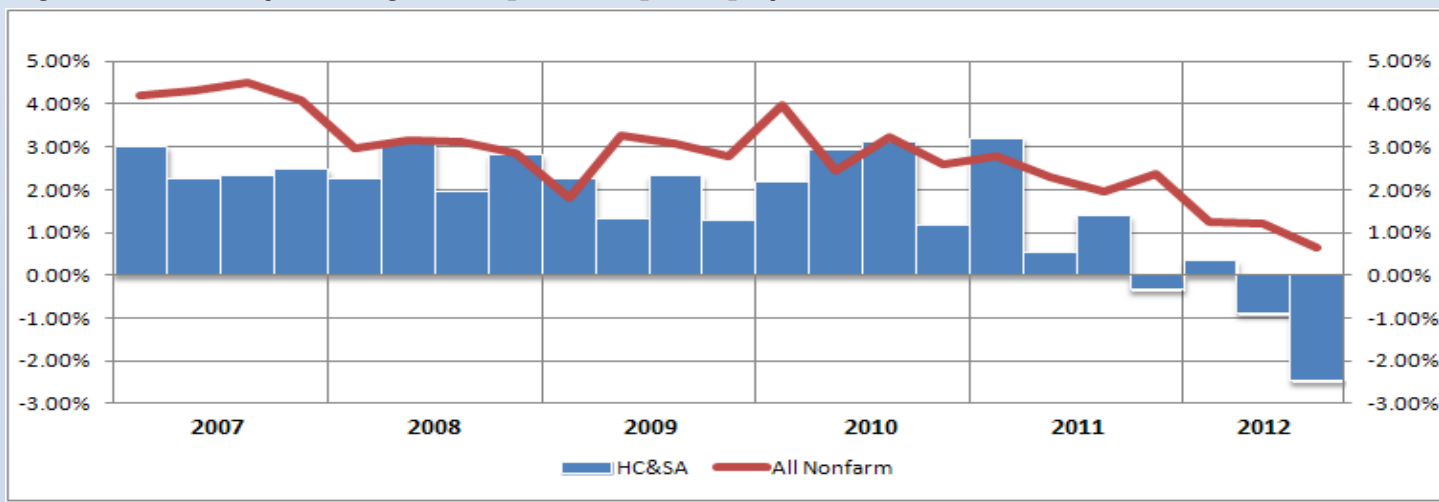
The second-quarter revisions drastically cut the growth rates of both employee benefits and salaries & wages. Whereas last quarter's estimates indicated that total employee compensation was growing by approximately 10% annually, these growth rates fell by two-thirds to approximately 3.5% in Q3 2012. Growth in employee compensation through benefits, wages & salaries is now in line with proprietor's income, which is growing at a 3.5% annualized rate.

Earnings Type	Level (Millions)	Share
Proprietor's Income	\$2,347	9.7%
Benefits	\$3,741	15.4%
Salaries & Wages	\$18,202	74.9%
<b>Total</b>	<b>\$24,290</b>	<b>100%</b>

## Compensation per Employee

According to Healthcare Workforce Data Center estimates (see methodology, next page), employees in Virginia's HC&SA sector earned an average of \$55,561 (annualized) in Q3 2012. Note this figure includes salaries & wages plus the cost of benefits for employed persons only. Practitioners in private practice, which includes a large number of the sector's highly paid professionals, are not included in this figure. After many years of rather robust growth, the year-over-year change in compensation per employee has fallen considerably over the past four quarters. In Q4 2011, the year-over-year growth rate went negative, and this trend has only been exacerbated in 2012. The downward revision in Q2 2012 compensation decreased year-over-year growth from nearly 3% to -0.9%, and growth declined even further in Q3 2012 to -2.5%. Overall employee compensation has followed the same pattern, with year-over-year growth falling below 1% for the first time in over a decade, as calculated by the HWDC.

**Figure 5: Year-over-year change in compensation per employee.**



## Definitions

Economic data in this briefing is from the US Bureau of Economic Analysis' Regional Economic Accounts. In particular, we use the Quarterly State Personal Income Accounts. The definitions provided here are written for a lay audience. More technical definitions and in-depth information on the Regional Economic Accounts are available on the BEA's website: <http://www.bea.gov/regional/about.cfm>.

**Personal Income:** Income received from all sources, including salaries & wages, benefits, business profits, rents, government payments or retirement and investment funds. Personal income are based on where recipients live.

**Earnings:** Earned income includes salaries & wages, benefits (aka supplements to wages and salaries) and proprietor's income. Earnings and its components are based on where recipients work.

**Proprietor's Income:** Income from small businesses (sole proprietorships & partnerships), corporate director's fees and tax-exempt cooperatives. It does NOT include dividends or interest received by non-financial businesses or rental income received by non-real estate businesses.

**Compensation:** Salaries & wages and benefits.

**Benefits:** Referred to as "supplements to wages and salaries by the BEA, benefits includes employer contributions to retirement funds, insurance (including health and life) and to government social insurance programs (e.g., unemployment insurance, Social Security, worker's compensation insurance, etc).

**Salaries & Wages:** Salaries, wages, commissions, bonuses and tips, before deductions, based on when payments are disbursed. The value of stock options are also included at the time the options are exercised.

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## Method of Estimating Compensation per Employee

The HWDC derives estimates of compensation per employee from two sources: 1) US Bureau of Economic Analysis' Regional Economic Accounts (REA), and, 2) the Current Establishment Survey (CES) administered jointly by the US Bureau of Labor Statistics and the US Census Bureau. These sources use different methodologies and different definitions. Although more vigorous estimates of employment are available, the HWDC uses these sources to provide the most timely indication of current trends possible at the state-industry level. The HWDC estimates are early indicators only.

To make the two data sources more comparable, the HWDC makes the following transformations:

**CES:** To obtain quarterly estimates of employment, monthly figures are averaged for the quarter. For nonfarm employment, we remove the latest available estimate of logging employment from the Quarterly Census of Employment and Wages, rounded to the nearest hundred, from nonfarm totals in the CES prior to averaging.

**REA:** From nonfarm compensation (or its components), we remove military earnings, agriculture, fishing and forestry earnings and an estimate of earnings from households. For household earnings estimates, we use the REA's Annual State Personal Income and Employment tables to develop current estimates of the proportion of "Other services, except public administration" compensation from employment in private households. We use the most recent data available for the current quarter. We apply this proportion to the current quarterly estimate of "Other services, except public administration".

Despite these transformations, the figures are not wholly comparable. The BEA makes additional adjustments to BLS data when creating its own, annual estimates of employment. Historical indicators are not adjusted by the HWDC, however adjustments made to REA or CES series are incorporated into historical data. For more information on employment data and the REA, see the BEA's *State Personal Income and Employment Methodology*, pages XI-1 to XI-11 & Table K.

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The Department of Health Professions Healthcare Workforce Data Center works to improve the data collection and measurement of Virginia's healthcare workforce through regular assessment of workforce supply and demand issues among the 80 professions and 350,000 practitioners licensed in Virginia by DHP.

The HWDC collects data on Virginia's licensed health professionals through surveys completed during the online license renewal and application process. Survey results and data may be accessed on our website: [www.dhp.virginia.gov/hwdc/](http://www.dhp.virginia.gov/hwdc/).

The HWDC also provides a series of Virginia Healthcare Workforce Briefs based on data collected by the US Department of Labor's Bureau of Labor Statistics and the US Department of Commerce' Bureau of Economic Analysis.

Virginia Healthcare Workforce Briefs:

Series 1: State & National Employment (Monthly)

Series 2: Virginia Regional Employment (Monthly)

Series 3: Income & Compensation (Quarterly)

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## About the Data

Data used in creating this report is from the US Department of Commerce' Bureau of Economic Analysis' Regional Economic Accounts. Unless otherwise noted, data is seasonally adjusted and annualized, and quarterly presentations are based on the calendar year. Data from recent quarters is preliminary and subject to revision in future releases from the BEA. Revisions will be reported in future editions of this series.

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