

# The Economics of Higher Education

DECEMBER 2012

American companies and businesses require a highly skilled workforce to meet the demands of today's increasingly competitive global economy. However, while postsecondary education has become increasingly important over time, there have also been growing concerns about the accessibility and affordability of higher education.

In this joint report by the United States Department of the Treasury and Department of Education, we examine the current state of higher education, the economic benefits of education, access to higher education, the financial aid system, and recent policy changes. Key findings include the following:

- **Students are bearing a greater share of the college costs than a generation ago.** At public four-year colleges and universities, tuition and fees as a percent of revenue has doubled since 1987, while the proportion funded by state and local governments has fallen by about one-third. Meanwhile, in-state tuition at public four-year colleges and universities has grown by two-thirds since 2000 after adjusting for inflation. In response to these recent trends, the Obama Administration has implemented several new policies to provide relief for students and their families, including increasing the maximum Pell grant, introducing the American Opportunity Tax Credit (AOTC), keeping subsidized Stafford loan interest rates at affordable levels, and expanding "income-based repayment" for some student loans.
- **People with more education typically earn more and have a lower likelihood of being unemployed.** In 2011, the typical worker with just a bachelor's degree earned about \$1,000 a week, roughly two-thirds more than those with a high school diploma.<sup>1</sup> The unemployment rate for workers with a bachelor's degree was 4.9 percent, about half of the rate for people with a high school diploma.
- **Education significantly increases the ability of children to move up the economic ladder.** Having a college degree means that children born into the middle three income quintiles are more than 75 percent more likely to advance to a higher income quintile as adults than those who do not get a college degree.

<sup>1</sup> Throughout this summary, when levels of education are used for reporting labor and income statistics, the levels are the highest attained (e.g., *only* a bachelor's degree) and are not inclusive of higher levels.

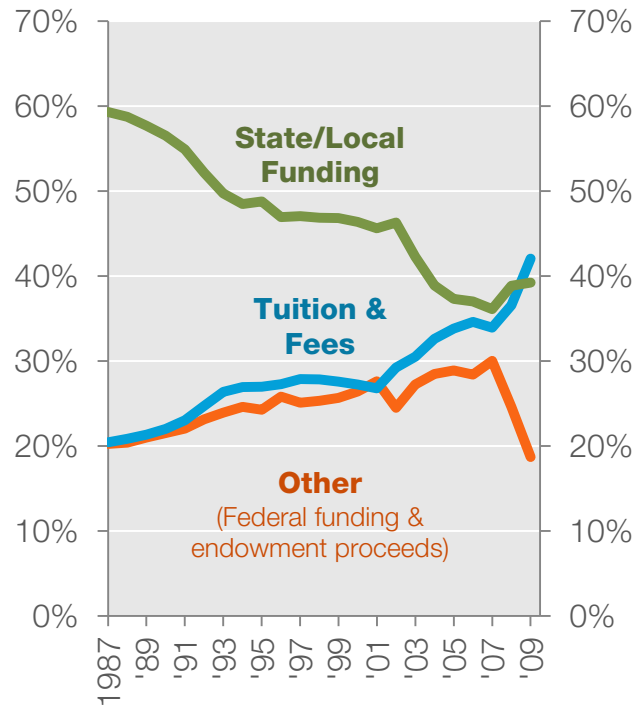
## State funding for public institutions has declined since the 1980s.

- Today, students and their families are contributing a greater share of college revenue than a generation ago, while the share borne by states and local government funding has fallen sharply (see Figure 1). In 2009, tuition and fees comprised over 40 cents of every dollar of revenue at public four-year institutions. That is up from 20 cents of every dollar in 1987. The trend is similar on a per-student basis.
- Meanwhile, states and local governments were responsible for about 40 cents of every dollar of revenue at public four-year institutions in 2009. That fell from 60 cents of every dollar in 1987. State funding per student also declined over this period, to \$8,655 from \$10,726 per student.
- Over the same period, higher education costs have been rising, especially at public four-year colleges and universities that most students attend.
  - In-state posted tuition at public four-year institutions rose an average of 67 percent between 2000 and 2011 after adjusting for inflation. Out-of-state tuition grew 47 percent over the same period.
  - This cost shift from states and local governments to students and families has contributed to the sharp increase in student lending over the last decade.
- The Obama Administration has implemented several new federal education policies in response to these trends. The Recovery Act, for example, increased the maximum Pell grant by 17 percent and replaced the Hope Credit with the broader and more generous American Opportunity Tax Credit (AOTC). The Administration has also kept subsidized Stafford loan interest rates at more affordable levels for another year, and has successfully pushed for “income-based repayment” options for students participating in the Direct Loan program.

FIGURE 1

## Public Colleges & Universities are Increasingly Dependent on Tuition and Fees

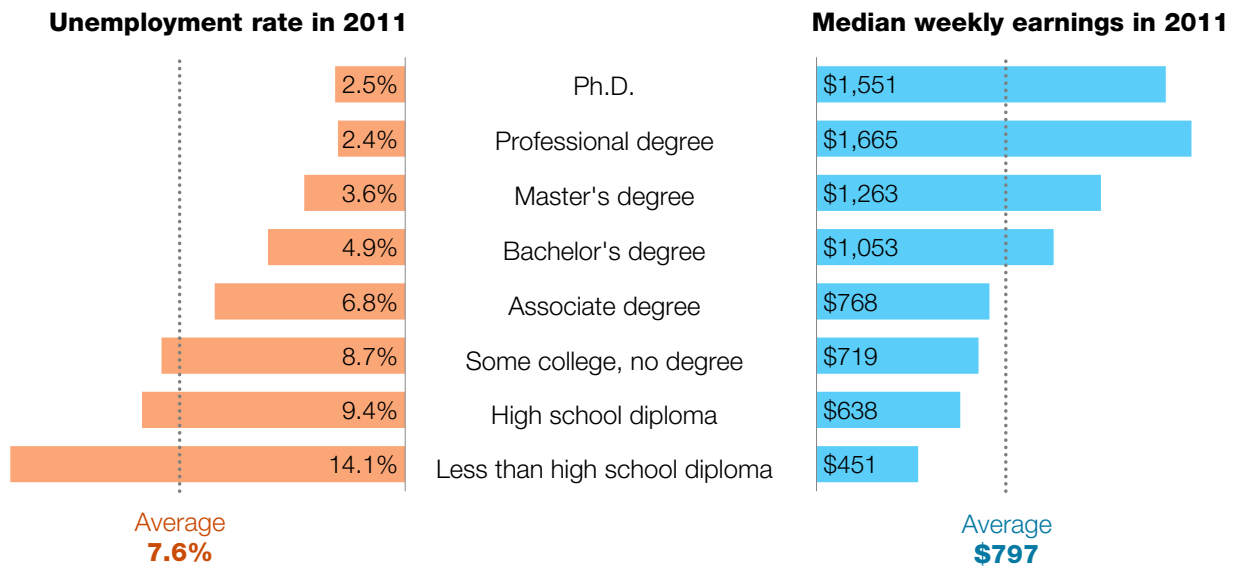
Sources of revenue at public four-year colleges and universities, as a percent of total revenue



Source: Treasury analysis of IPEDS data.

FIGURE 2

## Median Weekly Earnings and Unemployment Rate by Educational Attainment



Source: Bureau of Labor Statistics.

### More education typically means lower unemployment and higher income.

- The unemployment rate for Americans with a high school diploma (9.4 percent) is about twice the rate of those with a bachelor's degree (4.9 percent). Americans who did not graduate from high school are unemployed at almost three times the rate (14.1 percent) as those with a bachelor's degree. The gap is even wider relative to those with graduate and professional degrees (see Figure 2).
- Median weekly earnings in 2011 for a full-time worker with a bachelor's degree was \$1,053, or 65 percent higher than those for a high school graduate.<sup>2</sup> That amounts to a difference of about \$22,600 a year.
  - After growing steadily throughout the 1980s and 1990s, recent evidence suggests that the difference in earnings between high school and college graduates is the highest it has been since 1915, the earliest year for which there are estimates of the college wage gap.

<sup>2</sup> Bureau of Labor Statistics (2012).

- Workers with more than a bachelor’s degree see an even wider gap relative to high school graduates, on average. For example, a worker with a master’s degree typically earned twice as much in 2011 as one with a high school diploma. Those with a professional degree, such as a J.D., earned more than two-and-a-half times as much on average.
- Moreover, the college wage gap underestimates the economic benefits of higher education since more-educated workers are less likely to be unemployed and more likely to have jobs that provide additional non-wage compensation (e.g., paid vacation and employer-provided health insurance).

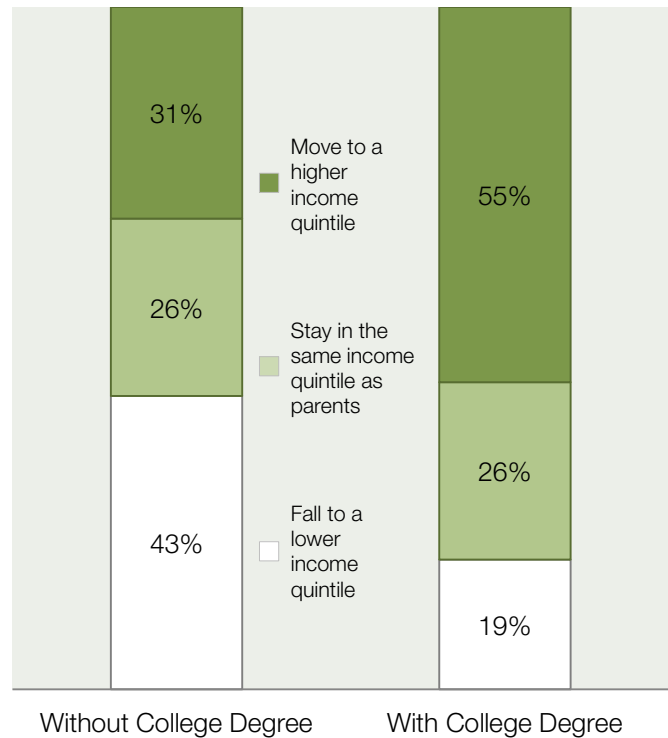
### Higher education helps children climb up the ladder of economic success.

- Without a college degree, children born into the middle three quintiles have a 31 percent chance of reaching a higher income quintile by the time they are adults (see Figure 3).<sup>3</sup>
- With a college degree, the probability that a child born into the middle three quintiles will attain a higher income quintile by adulthood rises to 55 percent, or 77 percent higher.

FIGURE 3

### A College Degree is an Important Engine for Income Mobility

Probability that a child born into the 2<sup>nd</sup>, 3<sup>rd</sup>, or 4<sup>th</sup> income quintile moves to a different relative income position as an adult



Source: Isaacs, Sawhill, & Haskins (2011), Treasury calculations.

<sup>3</sup> Brookings analysis of the Panel Study of Income Dynamics (Isaacs, Sawhill, & Haskins, 2011).