

Views

College Is Still Worth It

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It's an old story: when economic downturns hit, unemployment rates spiral and tales of college graduates forced to tend bar or mop floors proliferate. So, too, do the assertions of experts and budget-constrained political leaders that young people don't need costly postsecondary education in a job market that has little use for college degrees.

[Those who make the "skip college" argument](#) often bolster their arguments with official state and national Bureau of Labor Statistics (BLS) data suggesting that the U.S. higher education system has been turning out far more college grads than current or future job openings require.

To a public wary of paying steep tuition bills in a depressed economy, it all sounds alarming and -- with the backing of national and state government BLS data -- authoritative.

There's just one problem with the official BLS statistics: they're wrong.

BLS data assigns occupations a "required" education level. Their numbers assert that 16.6 percent of jobs, or nearly 25 million jobs, require a bachelor's; in reality, over 30.7 million jobs, or 20.4 percent are filled with workers who have a bachelor's.

The BLS also holds that 6.1 million jobs (4.1 percent) require an associate degree, when 14 million jobs across the economy are actually filled by those with associate-degree holders. The BLS data, therefore, imply that Americans are overeducated.

The most persuasive evidence that the BLS numbers are wrong are earnings data, which show that employers across the country pay a "wage premium" to college graduates, even in occupations that BLS does not consider "college" jobs. This simply means that businesses pay more money to workers with degrees than to those without because employers believe that postsecondary educated workers are more valuable.

And employers aren't just hiring degrees. Over the decades, this premium has ebbed and flowed, but the longer-term trend in demand for college graduates has risen consistently. The college wage premium over high school graduates dropped significantly in the 1970s when vast numbers of college-educated Baby Boomers and males who went to college instead of Vietnam flooded the job market.

When the baby boomers aged beyond their prime college age years and the Vietnam draft ended, most expected a plunge in college-going. The rate of college-going did fall off, but not nearly as much as most experts predicted. Instead, a sharp upswing in the demand for college-educated workers kept college enrollments growing. Moreover, since the early 1980s, college completion has been unable to keep pace with employer demand. As a result, the college wage premium over high school degrees skyrocketed from roughly 30 percent to 74 percent at present. Hardly a sign of an oversupply of college talent.

To dismiss the significance of wage data requires a belief that employers across the country have systematically hired overqualified workers for their job openings and then grossly overpaid them for the past three decades. Consider the implications: It would mean that employers followed the law of supply and demand in the 1970s by cutting back the wage premium, but completely cast it aside in subsequent years by inexplicably throwing extra money at college-educated workers.

It would mean that, by 2008, more than a *third* of all workers with postsecondary education were receiving an appreciable economic benefit from their degrees that reasonable employers should never have paid. In short, if all of this is true, then chaos reigns: economic markets don't work, employers are irrational, and preparing children for college is naive for all but a select few.

There is a better explanation for the puzzling official data that suggest we are producing too many college graduates.

Official education demand numbers have serious flaws

Bureau of Labor Statistics data, as mentioned, underpin the argument that America overproduces college graduates by the millions. Among the chronically overqualified and overpaid are 43 percent of nuclear technicians who have attained more than the “required” associate degree, and the 80 percent of commercial pilots who hold more than their “required” certificate.

While we have high regard for the BLS, and believe that its national and state-level occupational and employment data are unimpeachable, we cannot say the same for its education numbers. They are an offhand byproduct of its other data -- and of substantially lower quality.

One significant flaw in the BLS method is that it categorizes occupations as either "college" or "non-college," a methodology that is both subjective and static. A better approach, typical of mainstream economic analysis, is to track actual earnings of college graduates to determine the demand for postsecondary education. We reason that if the wages of college-educated workers within an occupation are high and/or rising relative to people with high school diplomas or less, that reflects a tangible advantage conferred by postsecondary education. People with college degrees in these occupations, therefore, are not overeducated because they are actually gaining value in return for their educational investment. While all degrees may not produce equal returns, in virtually every case, the return is far greater than the cost of obtaining the diploma.

In contrast, we do not define the “college labor market” as the BLS does, with its set of "college" occupations that cover the traditional white-collar and professional jobs. The official BLS data assign an education level to an occupation based on the lowest level of education attainment necessary to access the occupation. This approach is remarkably static and fails to adjust to changing economic realities.

For one, it misses the shift toward increased postsecondary requirements within occupations that are not traditionally deemed "college jobs." Labor economists agree that there has been a consistent shift toward increased postsecondary requirements across a growing share of occupations that previously did not require two- or four-year college degrees. Examples in the white-collar world include increasing demand for college degrees among managers, health care workers, and a wide variety of office workers, from insurance agents to building inspectors. Examples in the blue- and pink-collar world include increasing degree requirements among production workers, health care technicians, and utility and transportation workers.

Technology drives ongoing demand for better-educated workers

The standard explanation in the economic literature for such shifts is “skill-biased technology change.” The core mechanism behind this concept in our current economy is the computer, which automates repetitive tasks and increases the relative value of non-repetitive tasks in individual occupations. Performing these more sophisticated tasks successfully typically requires more skill, training and education.

Wage data show that employers have tended to hire workers with postsecondary credentials for these more complex positions -- and pay a wage premium to get them. As a result, we view a "college job" as any position that gives substantial earnings returns to a college degree, irrespective of occupation, whether an individual is an insurance agent or a rocket scientist.

Our method for tracking education demand is also careful to minimize counting statistical outliers such as bartenders, cab drivers and janitors with BAs and graduate degrees. These kinds of mismatches between degrees and low-skilled jobs -- a phenomenon sometimes called "over-education" -- are relatively small in number and don't matter much in an economy of nearly 150 million jobs. In addition, most such workers won't stay in those positions long-term. They eventually move on to better-paying jobs. Over a 10-year period, each cashier job has 13 incumbents who permanently leave the occupation; among medical doctors, that replacement rate is only one.

People rarely leave jobs that require a college education because they have the best earnings, benefits and working conditions. There are many more brain surgeons who used to be cashiers than there are cashiers who used to be brain surgeons. A brain surgeon never starts as a brain surgeon, but would have likely had all types of jobs before entering college and medical school. Most jobs people hold in high school are in retail, food services, and other low-skill, low-wage jobs, and future brain surgeons are no exception.

In addition, low-skill, non-college positions tend to be greatly overrepresented in the official jobs data because so many of them are part-time. Although low-wage, low-skill jobs make up 20 percent of all jobs in a single year, they only make up 14 percent of the hours worked. Jobs that require a BA or better make up 30 percent of all jobs, but 75 percent of those are full-time, full-year jobs, compared with 64 percent of jobs that require a high school diploma or less.

There are, then, a number of serious flaws with the BLS education demand numbers, ranging from the designation of college and non-college occupations to their failure to reflect rising education requirements across virtually every occupational category. Still, because the BLS has a stellar -- and deserved -- reputation for its employment data, its static and misleading metrics on education requirements are treated with undue credibility. BLS numbers are widely used by social scientists to gauge education demand, and yet their accuracy receives little serious scrutiny.

Census numbers offer valuable test of BLS education demand projections

As it turns out, though, there is an effective test to gauge the validity of education demand projections based on BLS data. The Census Bureau actually counts the number of workers with college degrees in the workforce and tracks their earnings on the job. As time passes and the Census data catch up with the BLS projections, we can determine if those projections were accurate. To get to the punch line: BLS projections always under-predict demand for college educations.

For instance, when we compare the BLS projections for 2006 and the actual count of people in the labor force with degrees during that year, we see that the Bureau undercounted the true number of postsecondary-educated workers by 17 million in 2006, or roughly 30 percent, and by 22 million, or 40 percent in 2008. The alternative method we introduced in [Help Wanted](#) missed by just 4 percent.

The bottom line is that the BLS predictions didn't even come close to what actually happened in the economy. The only way to reconcile those projections with real life is to assert that the Bureau's projections reflect the number of college degrees employers actually *require*, not the actual numbers of college-educated workers they decide to hire. If this is the case, then employers not only hired millions of overqualified workers in 2006 and 2008, but paid wage premiums of more than 70 percent for the privilege -- a notion, as we said earlier, that requires a belief that business owners across the nation and economic markets as a whole have taken leave of their senses.

Spate of media stories on value of college fuels needless fears

And yet, much of the media coverage of the issue would have us believe college isn't worth it.

Stories on the value of college tend to follow the business cycle, and when the cycle is down, journalists often find it easy to write a story that bucks the conventional wisdom. Headlines that suggest postsecondary education no longer pays off in the labor market are news because they play into middle-class parents' fears that they will not be able to give their children the advantages they had. The bad advice gets more and more pointed as the recession deepens.

This year, *The New York Times* offered "Plan B: Skip College," while *The Washington Post* ran "Parents Crunch the Numbers and Wonder, Is College Still Worth It?" Even *The Chronicle of Higher Education* [has succumbed](#), recently running "Here's Your Diploma. Now Here's Your Mop." -- a story about a college graduate working as a janitor that implies a college degree may not be worthwhile in today's economic climate.

And if college educated workers were overpaid by 75 percent and oversupplied by 40 percent, why wouldn't they be the first fired and last hired in these tough times? It is true that unemployment rates are relatively high among college grads. When it rains long enough and hard enough, everyone gets wet. But the unemployment rate for all workers with college degrees is a quarter the rate for high school graduates.

And it's true, as the *New York Times* pointed out in an [editorial](#) on December 13, that the unemployment rate for freshly minted college grads was 9.2 percent, not much different from the 9.8 percent unemployment rate for all workers. But the *Times* didn't bother to mention that the unemployment rate for freshly minted high school graduates was 35 percent.

The current recession isn't the first to produce such gloom. The *New York Times* and other prominent newspapers were printing similar stories in the early 1980s, during the last severe recession. At that time, the *Times* ran headlines like "The Underemployed: Working for Survival Instead of Careers."

And it's not just the journalists who get gloomy. The *New York Times* quoted Ronald Kutscher, associate commissioner at the Bureau of Labor Statistics in 1984, as saying, "We are going to be turning out about 200,000 to 300,000 too many college graduates a year in the '80s." Yet the 1980s was a decade that saw an unprecedented rise in the wage premium for college-educated workers over high school-educated workers. The wage premium for college degrees over high school degrees increased from 30 percent to more than 80 percent -- evidence that the postsecondary system was under-producing college graduates, not that, as Kutscher went on to say, "the supply far exceeds the demand."

The gloomy stories, the high unemployment among college graduates and the misleading official data are unlikely to keep many middle- and upper-class youth from going to college. Higher education is a value that such families are unlikely to abandon, regardless of economic pressures. Instead, the real tragedy of these headlines is the message they send to less privileged youth for whom college is not an assumed path. The negative press on college fuels pre-existing biases among working families that college is neither accessible nor worth the cost and effort. Moreover, the bad press and worse data strengthen the hand of [elitists](#) who argue that college should be the exclusive preserve of those born into the right race, ethnicity and bank account.

It is important to note that current evidence demonstrates increasing demand for college graduates, and the future promises more of the same. By 2018, our own projections from the “Help Wanted” study show that 63 percent of jobs nationwide will require some form of postsecondary degree. Moreover, postsecondary education has become the only way to secure middle-class earnings in America and, for the least advantaged among us, is now the only way to escape poverty. In 1970, about 60 percent of Americans who attained middle-class status were high school graduates or dropouts. Today, only 46 percent can be found there. In contrast, 44 percent of the top three income deciles had postsecondary education in 1970; today, 81 percent do.

The press coverage and expert stumbles don’t reflect the empirical reality, but they are symptomatic of a mundane human instinct. People tend to project what’s happening in the present into the distant future. If housing prices are great, they’ll be that way forever! If job creation is slow, it will be that way forever! If college graduates have to work as bartenders in the depth of a recession, their degrees will never get them ahead! The reality is that jobs come and go with economic cycles. But what lies beneath the economic cycles, and what has remained constant, is the relentless engine of technological change that demands more skilled workers. There is no indication that the trend has suddenly reversed itself.

College is still the best safe harbor in bad economic times

Meanwhile, when jobs disappear, college is the best safe harbor for waiting out the recession and improving your hiring prospects in anticipation of the recovery. Indeed, college-educated workers are much more likely to be employed than their high school-educated counterparts, even during a recession.

Irrespective of the current economic conditions, individuals need to consider college as a lifelong investment decision. Likewise, the investment horizon for economic development needs to be measured in decades, not annual budget cycles. Skipping or shortening college on the basis of a headline or even a few years of bad economic news is foolish for individuals whose careers will span 40 or more years of working life. On average, skipping an associate degree will cost a high school graduate half a million dollars in earnings, and skipping a bachelor’s degree will cost \$1 million in potential earnings over a lifetime.

[Many argue that the value of college is declining as tuition rises.](#) However, while it is true that the sticker price cost of going to college has risen faster than the inflation rate, the college wage premium has risen even faster, both in terms of the cost of going to college and the inflation rate. The best measure of the value of college is the net present value of going to college. Here we discount the lifetime earnings by the real interest rate, and discount the principal and interest payments from taking out a college loan (a \$60,000 loan). Once we’ve done that, the most accurate estimation of the average value of a college education over a high school education is still \$1 million dollars (net present value).

Our own forthcoming research shows that we have under-produced college graduates by almost 10 million since 1983. We also find in Help Wanted that through 2018, at least three million jobs that require postsecondary education and training will be unfilled due to lack of supply. The share of jobs for those with a high school education or less is shrinking. In 1973, high school graduates and dropouts accounted for 72 percent of jobs, while by 2007 it was 41 percent. The opposite has happened for those with at least some college: the share of jobs has increased from 28 percent in 1973 to 59 percent in 2007, and is projected to be 63 percent by 2018. Likewise, the share of national wage income from college-educated workers has increased from 38 percent to 73 percent since 1970, and there is every reason to believe that this trend will continue.

We believe there is no doubt about the requirements of our fast-approaching economic future: we need more college graduates, not fewer. But at the very time we need our higher-education system to kick into high gear, it is under pressure to apply the brakes instead.

While the economics of higher education are clear, the politics are not. The economy’s lackluster demand in recession, coupled with media stories questioning the value of college, makes it easier to excuse cuts in public funding for postsecondary education. In the short term, federal stimulus funds have helped fill the gaps for postsecondary cuts driven by declining state revenues. But the stimulus funds will be unavailable after 2011, and federal money can’t make up the difference indefinitely. In fact, it’s an easy target for the chopping block. Higher education is especially vulnerable in the debate about public priorities because it lacks the core constituency and the immediacy of such issues as Social Security or homeland security.

Still, it's clear that reducing funding for postsecondary education is both bad economic and social policy. The consequences of slashing higher education budgets is a decision that will effect inequality for the next several decades by determining who gets access to middle-class careers. And, slowing the stream of college graduates into the economy threatens to leave employers without the skilled workers they need to thrive in a fiercely competitive economy.

While doubts about spending on higher education are understandable in the depths of a catastrophic recession, the potential consequences of succumbing to gloom and relying on flawed data to inform decisions about the value of postsecondary education are ruinous.

Bad numbers on the economic value of college encourage disinvestment in college both by individuals and government. And disinvestment in higher education is bad news not only for our higher education system, but for our economy -- and for the lives and futures of millions of Americans.

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