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The Landscape of the College Cost Debate

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The Landscape of the College Cost Debate

The ongoing college cost explosion is a disturbing trend, and one that cannot be allowed to continue. After all, education is the great equalizer in our nation. It can bridge social, economic, racial, and geographic divides like no other force. It can mean the difference between an open door and a dead end. And nowhere is this truer than in higher education.

— John A. Boehner and Howard P. "Buck" McKeon (2003)

Early in September of 1960, two tired-looking parents from northern Ohio rolled into Williamsburg, Virginia, ready to move their son into the assigned dorm for his freshman year at the College of William and Mary. The family passed by the Sir Christopher Wren Building, the oldest academic building still in use in the United States. They glanced across the street at Colonial Williamsburg. They had visited the restored colonial town three years earlier during the 350th anniversary of the English settlement at Jamestown, and the visit had sparked a family interest in William and Mary. The drive from Ohio had been long and taxing. Good roads ran out well before they reached Williamsburg. Even though it was a public university, the year at William and Mary was going to be expensive. Tuition and fees were \$722 for an out-of-state student. Room and board would cost even more, \$782 for the full year.¹ The total bill of \$1,504 would stretch the family finances.

Twenty-one years later, another set of parents from Ohio brought their child, this time a daughter, on a similar trip. The son from the first trip was a family friend, and he had raved about his William and Mary education. William and Mary became the daughter's first-choice school. Since William and Mary had moved up its starting date, her trip was in late August instead of September. This family passed the Wren Building and Colonial Williamsburg just as the other family had done years earlier. Because it was August, the air was even hotter and muggier than what the first family had experienced, yet the second family wasn't as tired. By 1981 an interstate highway ran right by Williamsburg, so the drive was shorter and less taxing. William and Mary was still pricy for an out-of-state student, but not as pricy as many private colleges they had investigated. Tuition and fees amounted to \$3,368 for an out-of-state student while room and board added another \$2,384. The total bill was \$5,752. This was 3.8 times as much as the son in the first story had paid in 1960. This did not seem too far out of line. There had been a lot of inflation in the intervening years. The Consumer Price Index (CPI) had increased 3.1 times from 1960 to 1981. And in any case, the family's earnings were sufficient to ensure that important things did not have to be sacrificed in order to put the daughter through college, even a pricy outof-state college.

Now fast-forward to the next generation student from Ohio arriving in Williamsburg in late August of 2006. The Wren Building and Colonial Williamsburg were still there, and again the weather was stifling. Some things don't change. The parents had taken a big gulp when their daughter had been admitted to William and Mary. As an out-of-state student she would face a daunting bill. What was wrong with Ohio State, Miami of Ohio, or Bowling Green? Still, William and Mary was where she wanted to go, so they would find a way to pay. She would likely have to take out some loans before all was said and done. Tuition and fees for an out-of-state student had climbed to \$25,048 and room and board to \$7,385. The total bill of \$32,433 was still below the charges at many fine private schools they had considered, but it was way above those good state schools back home. This time appealing to the rise in the Consumer Price Index did not bring much relief. The average price level measured by the Consumer Price Index was 2.2 times higher in 2006 than in 1981, but tuition, fees, room, and board for an out-of-state student at William and Mary had increased 5.9 times.

Variants of these same three stories could be told about students starting college at almost any institution in the United States. Between the 1987–88 academic year and the 2007–8 academic year, tuition and fees rose on average by 7.4 percent per year at public four-year schools and by 6.3 percent per year at private four-year schools.² Over that same time frame, William and Mary's out-of-state tuition and fees rose 6.8 percent per year and our in-state residents had to come up with an extra

6.2 percent. The inflation rate over this period averaged a mere 3.1 percent per year.

These numbers are important. As the quotation from Representatives Boehner and McKeon's The College Cost Crisis indicates, education is a critical component of the American dream of rising living standards from one generation to the next, and of social mobility based on hard work and achievement. Public opinion surveys consistently find that how much one has to pay for a college education is a serious national concern.³ Presidential candidates always mention "fears that they can't afford a college education for their children" in a listing of the concerns of the middle class. Newspapers fan the flames with headlines such as "College May Become Unaffordable for Most in U.S." (New York Times, December 3, 2008). The survey numbers and the headlines then fuel congressional commissions like the one that produced The College Cost Crisis. These numbers also motivated us to write this book, and we expect that they are part of the reason you decided to pick it up. And these numbers explain the black humor in the Close to Home cartoon at the beginning of the chapter.

Where You Sit Affects What You See

Before we start to answer the question posed in our title, we need to walk through the set of issues and perspectives that collectively define the landscape of higher education. Like any landscape, what you see tends to reflect where you sit. The world of higher education looks very different from the president of Swarthmore's window than it does from the office of a member of Congress who chairs a House subcommittee and who hears from an angry slice of the electorate each summer after tuition increases are announced. The world also looks different from the perspective of a small private liberal arts college that lives year-to-year largely on current tuition, a public university facing sudden state budget cuts that throw its planning process out the window several times each decade, or a prestigious and well-endowed private research university whose spending per student largely is independent of tuition revenue. This divided world of higher education defies easy generalizations.

For starters, the sticker-price explosion that generated the numbers of popular concern, and which energizes our politics as a result, masks important underlying differences in the economic environment faced by different types of schools and in how these different types respond to changes in that environment. The reasons for sticker-price *tuition* inflation, for instance, often are quite different at public universities and at private universities even though the basic forces that push up their *costs* over time are quite similar. Public universities are subject to swings in state funding that can affect tuition, independent of any changes in the university's costs. Private universities are more subject to the vagaries of financial markets that affect their endowment portfolios. Yet private and public universities alike are subject to a similar set of cost drivers they share in common with many other industries. Exploring this commonality between higher education and a set of important and related industries will be a major focus of our understanding of the real college cost problem.

We will start with a simple example to show that where you sit does indeed influence what you see. Figure 1.1 gives the time path from 1965 to 2006 of two important variables.⁴ The first is the growth rate of real Gross Domestic Product (GDP). This is a measure of the nation's output as a whole in a given year, and the data series in the figure shows by how much the nation's output grew, expressed as a percentage, relative to last

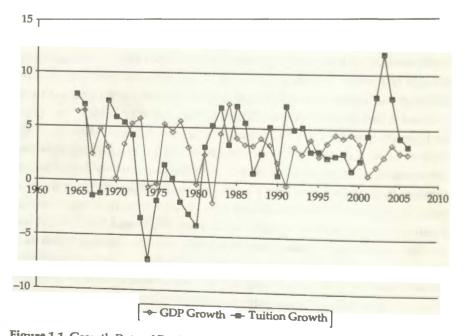


Figure 1.1 Growth Rate of Real GDP and Growth Rate of Real Tuition and Required Fees, Public Universities, 1965–2006

year's output. The second data series is the growth rate of the real value of tuition and required fees at public universities from 1965 to 2006. The term "real" just means that we have corrected for the effects of inflation. At first glance the diagram seems messy, but there are many stories lurking in there.

Suppose we asked the president of a public university to explain what he or she sees. Very likely that president would point out the fact that tuition and fees tend to rise very rapidly after decreases in growth in the overall economy. Your attention would be drawn to the rapid tuition increases following the episodes of negative GDP growth in 1982 and 1991 and the very slow GDP growth in 2001. Even the decade of falling tuition in the 1970s was interrupted by the oil shock years around 1974. The university president would say something like this: "When the overall economy slows down, state tax collections fall, and states cut appropriations for universities. As a result public universities have to resort to large tuition increases to make up for lost public funding."

If we asked Representatives Boehner and McKeon to comment on the data, they would focus on an entirely different phenomenon. In *The College Cost Crisis* they say "the facts show tuition increases have persisted regardless of the circumstances such as the economy or state funding, and have far outpaced inflation year after year, regardless of whether the economy has been stumbling or thriving." Essentially, they are looking at the fact that after 1980 the "real" growth in college tuition and fees always has been positive. This means that tuition and fees always have grown more rapidly than the CPI. Representatives Boehner and McKeon also claim they know why this has happened. They place the blame squarely on "wasteful spending by college and university management."⁵

Clearly, where you sit affects what you see and the factors you choose to highlight. Yet there is one critically important difference between these two accounts of what the data tell us. Our hypothetical university president's discussion focused on the *price* charged by public universities. On the other hand, the congressmen focused on wasteful spending by university management. This is an assertion about *cost*. Higher education is one place where we need to be very careful with the distinction between cost and price. As economists we have a clear idea of what we mean when we say cost. We use the word cost to refer to the value of the resources used to produce a good or service. Yet people usually have something different in mind when they ask, "Hey, how much does that car cost?" When people ask about the cost of a car, they are not interested in the value of the resources Ford or Toyota used to make the car. They want to know the price they must pay to get the car.

For the vast majority of college students, the largest cost of higher education is the opportunity costs of their time. Each year a student spends fully enrolled in classes, that person gives up the income that could have been earned had he or she been gainfully employed. There are two reasons this cost will not play an important role in our analysis. First, changes in the opportunity cost faced by students do not directly affect the tuition set by colleges and universities. Second, while these costs are large, they have been decreasing over time, not increasing. The lost value of work time is not part of the "cost problem." Over the last thirty years, the wages earned by workers in the kind of low-skilled jobs students could get if they forego college have not risen as rapidly as the inflation rate. While the explanation for this fact will play an important role in the analysis to come, its effect on the opportunity cost of college attendance is not important to the story we will tell.

For many industries, the distinction between cost and price is of little consequence. In most cases, a firm charges a price that is a bit higher than the cost of labor and other resources, and earns a profit as a result. This profit may ebb and flow, but over a many-year horizon it is fairly stable. In these situations, the factors explaining costs are very similar to the factors explaining prices. Higher education is different. Colleges and universities receive substantial subsidies, from state appropriations for state-supported institutions and from gifts and endowment income for private institutions. These subsidies allow the institution to charge prices (tuition and fees) that are often quite a bit less than costs. There is great variation in these subsidies, so there is great variation in how dependent institutions are on tuition revenue. In some instances tuition covers as little as 10 percent of costs and in other instances it can cover as much as 90 percent. Price and cost are very different in higher education. The university president in our example was saying that when subsidies go down the price charged by institutions has to go up or the value of what students get from their school will fall in other ways as the quantity, quality, and variety of offerings declines. He or she was not making any claim about cost. The congressmen, on the other hand, were making a claim about cost, and they were pointing a finger directly at the college president.

At this point, we will forgive you if you are wondering about our book's title. Do we mean cost, or do we really mean price? Actually, the book you are reading is about both. Frankly, we thought you would pick up the book with its current title more readily than one with the longer title, Why Does College Cost So Much, and Why Is Its Price So High? The more accurate but longer title might well be off-putting. But now that you have picked up the book, we admit that the title is ambiguous. In what follows, we will get into the details of what drives cost, of how tuition and fees are set, and of what links them together.

Choosing a Vantage Point

If where you sit determines what you see, we should explain where we want to sit as we do our analysis. Choosing a framework for thinking about an industry as large and complex as the higher education system is a matter of some importance, so how does one go about choosing a framework? Suppose you are a student of urban environments. If you walk the streets of a major city, your attention naturally will be drawn to certain themes and not to others. Gritty detail is a lot easier to see at street level. By contrast, an aerial view will make you think about an entirely different set of issues. Some details may get blurred, but a broader perspective becomes easier. The same is true in the study of higher education. Poring over the details of a school's budget may incline a researcher to think about problems in a particular way. Placing higher education squarely within the broader context of the national and global economy leads down a very different analytical path.

Much of the contemporary writing on college cost puts a magnifying glass up to the higher education industry, or places individual schools under a microscope for an even more detailed view. We have two major objections to this approach. First, in many important respects taking an up-close look often does not help you truly understand what is going on inside an organization as complex as a college or university. Second, the close-up look tends to focus attention almost exclusively on the university itself or on the policies that affect schools directly. The environment the industry operates in often is ignored or downplayed as just another factor. To put it differently, an analyst who takes a close-up look at a college or university in order to answer a particular question, like why does cost always seem to rise, will naturally tend to find the answers within the college or university. We are tempted to call this the "industry-analyst trap," and both of these objections deserve an extended discussion. Our first objection is that looking at a blizzard of detail is not always conducive to sorting out "big pictures." In its attention to fine detail, the magnifying glass can be quite misleading. The modern university is a multi-product firm. It "produces" many things, including undergraduate teaching, graduate training, individual mentoring, basic and applied research, policy analysis, and public service. Attributing cost increases to each of these activities individually is not possible. As good as detailed data may be, trying to find the "cause" of rising cost in examining the books of a modern university is akin to finding the Holy Grail without the help of Harrison Ford.

In 2001, David Breneman, who was then dean of the School of Education at the University of Virginia, argued forcefully that separating out the individual strands of cost in a multi-product university is fundamentally impossible. Breneman put it this way:

How one chooses to allocate costs among these joint products was essentially arbitrary, and one could generate wildly different cost estimates for the parts, based on that allocation. The profundity of this problem was sufficiently persuasive that I ceased to view internal cost analysis as a worthy economic topic, although its application often served internal political purposes.⁶

Here is a simple example of the problem. How do you measure the cost of teaching? Do you allocate some, all, or none of the central administration's time and salary to this? Might some faculty research also contribute to teaching? Should some of the equipment cost then be placed as a teaching cost? Do you split library expenditures somehow? Where do you place career services for students or IT support of academic computing? More generally, if one wanted to allocate costs to teaching and to research separately, one would have to split faculty salary into shares devoted to each. This is a fool's errand.

Our second objection centers on the fact that a close-up view is likely to inflate the relative importance of what is going on in the view provided by the magnifying glass or the microscope. The view through the magnifying glass or microscope tends to see certain things more clearly than others. This close perspective reveals warts and blemishes in clear detail. The magnifying glass to the industry reveals potentially unsettling things. Some universities seem engaged in prestige games with each other, driven in part by an obsession with the annual *U.S. News and World Report* rankings. Some faculty members seem disconnected from the teaching mission of the university and focused instead on individual achievement and personal recognition. Line items for things as diverse as central administration, psychological counseling, and equipment for laboratories or for student recreation centers may seem to have grown "disproportionately." Thus the glass and the microscope together may suggest a shift in mission toward research and student services, seemingly without offering a substantial payoff to families, taxpayers, and university-endowment donors.

The close-up view seems to suggest more than a whiff of inefficiency and dysfunction in our colleges and universities. This is also the perspective that forms much of the expert opinion that fuels both the popular perception of the college-cost problem and the public policy response to it. In chapter 7, we elaborate on this micro view in greater detail, and we argue that the pattern of cost increase seen in higher education over the past sixty years probably does not conform to a narrative based on stories of increasing dysfunction in the higher education industry as a whole or in the institutions that comprise the industry.

Still, we recognize the power of the close-up view. Paying careful attention to the details of university spending leads to many pertinent questions about how universities allocate their resources. In other words, it helps us to think about evolving university priorities. The close-up view also is instrumental in building up reliable data about what is going on financially inside of the ivory tower. On some occasions, we too will use these micro data to help us sort out differences between types of institution—public versus private four-year research universities, for instance—which is another feature of the landscape of higher education.

Instead of the magnifying glass and the microscope, in our search for the bigger picture we will survey the landscape from a higher altitude. We will place the higher education industry in the context of broader economic forces that have shaped the whole American economy, and indeed the world economy, over the course of the past century. So instead of looking at the exceptionalism of colleges and universities, we will be examining the connections between higher education and industries to which it is similar, seeking the commonalities that explain the evolution of higher education costs and pricing over the past century.

The view from ten thousand feet reveals that the question: "Why do higher education costs rise more rapidly than other costs?" could just as easily be phrased as, "Why do the costs of other goods and services rise more slowly than the costs of higher education?" Both are questions about the same comparison, but the second question frames things quite differently. As we will demonstrate, exploring this second question leads to interesting findings. In fact, there are some industries whose costs rise even more rapidly than the costs of higher education as well as industries whose costs rise more slowly than the costs of higher education. Sorting out which industries are which will tell us quite a bit about what drives cost increases in those industries as well as in higher education.

Placing ourselves above the flurry of detail included in the accounts of a college or university has its dangers, too. As we look across time, we have to be acutely aware of the differences between the economic environment of the 1950s and 1960s and the economic environment of the early twenty-first century. The three vignettes that began the chapter did account for one small aspect of change over time, namely the tendency for the overall price level to move upward almost every year. Most analyses of college cost and price recognize this, which is why things like tuition and fees are adjusted (deflated) to reflect "real" values that account for ongoing inflation. But the impact of time on how we should think about higher education is far more subtle, and interesting, than dealing with simple inflation.

The average standard of living is much higher today than it was in 1960, and this affects what students and their families expect a university to provide. This standard-of-living effect influences many aspects of university life (and cost), including room and board, medical care, career services, and counseling. Accounts of college cost that uncritically presume that upgraded services are mere gold plating or fluff are subjecting higher education to the kind of scrutiny that they might not apply to housing or cars. The concept of value cannot be divorced easily from conditions in the rest of the market.

In addition, the distribution of income in the United States today is quite different than it was in 1960. The middle-class society of 1960 has morphed into a world of greater inequality, so the impact of rising college cost varies by where one sits in the American income distribution. And where one sits in the income distribution is determined in large part by one's prior education and by the educational level of one's parents. This is one reason why the question of higher education affordability is complex, certainly more complex than watching how any one measure of cost has risen over time. Colleges and universities individually have no direct control over the broad shape of the U.S. income distribution, but as we will show, the broad social and economic changes that have raised inequality have had a significant effect on higher education costs and on the extent to which people face affordability problems in acquiring a higher education for their children. The question of college affordability will occupy a significant place in our narrative, but only after we have told our story of college cost.

The multi-generational saga that introduced this chapter offers us a simple road map to the landscape of college cost. The most basic feature of the map is that the price of a year in college always seems to go up faster than inflation. In certain eras, the price pressure seems livable while at other times the problem acquires a marked virulence, but over the long haul college price increases tend to outstrip our broad measures of price inflation in the economy as a whole. The multi-family narrative also makes plain that the rate of price climb has accelerated in recent years. This is the second big feature of the road map we will follow. Any comprehensive overview of college cost has to explain these two basic facts, and we will indeed work very hard to demystify the process behind these stories.

Preview of the Argument

The book is divided into four parts. We will complete part I by taking an aerial view of the data on costs and prices in higher education and in a wide set of other industries as they have evolved since the 1940s. This allows us to situate colleges and universities within the broader economic history of the U.S. economy as a whole, and it lays out a set of facts that any narrative should explain. Higher education costs and prices follow a time path that is by no means unique. Several other industries have experienced a rather similar trajectory. These industries include things like the services of physicians, dentists, and lawyers, as well as bank service charges and the expenses associated with providing life insurance. This similarity could just be a coincidence, or it could reflect commonalities that lead these industries to react to changes in the economic environment in broadly similar ways.

Part II of the book makes the case that the similarity is not a mere coincidence. We identify three major forces operating in the broader economy whose combined effects explain the evolution of cost in higher education and in a set of kindred industries. These three forces are like a strong tripod or three-legged stool that firmly supports our story. Each of these forces is a component of the technological progress that has occurred in the United States since the end of World War II, and each is independent of the others. The three legs each require a chapter to fully explain. We will provide a short introduction here. First, technological progress is not evenly distributed across industries. It is quite rapid in some industries and much slower in others. Rapid technological progress generally holds down costs because it allows a firm to use less input, especially labor input, to make its products. Economists have long known that technological progress tends to lag in most service-providing industries such as higher education, and costs thus rise rapidly compared to industries with significant growth in labor productivity. All of the industries whose costs behave similarly to higher education are service industries. This is no coincidence.

The second leg of our stool is based on the kind of technological progress the U.S. economy has experienced. For quite some time, technological progress has favored workers with ever-higher levels of education. For the first three quarters of the twentieth century, the educational system was able to meet the increasing demand for skilled workers by producing more graduates. Over the last thirty years, however, the growth of educational attainment has not kept pace with the demand. As a result, the wages offered to highly educated workers have increased. The data for wage differentials across education levels are very clear. The monetary payoff to getting additional years of schooling started to grow rapidly starting in the late 1970s. As a result, all industries that use highly educated labor have had to pay more for their major service providers: college professors, physicians, dentists, lawyers, bank loan officers, and accountants and actuaries.

The third leg of our stool explores how technological advancements in higher education can raise costs instead of lowering them. Technological change always has two possible effects on an industry. New techniques can reduce the cost of making the same old thing. Alternatively, new ways can improve the quality of what we do or they can make the product or service we provide different from the older version in ways that benefit the buyer. Technology has transformed many important services in recent years, including higher education and medicine. We argue that the changes in higher education have been largely cost increasing, and that they have been driven by the needs of students and employers in the contemporary labor market. In plain language, our product is different today in important ways, and being up-to-date has raised cost.

Putting all three legs of the stool together, the unifying theme is that technological change and innovation itself are major forces behind rising higher education costs. Costs rise rapidly in higher education and in other related industries because of the kinds of industries they are and because of the economic environment in which they operate. If our story is true, rapidly rising costs need not reflect bad behavior or the wrong incentives. Many people who study higher education have taken a very different approach, one that takes a close-up view of colleges and universities. What they see is not very pretty. They see dysfunctional decision making at the institutional level and a dysfunctional market for higher education as a whole. This view also shapes much of the current political landscape of higher education. After presenting our full explanation, we spend a chapter exploring this alternative view. This chapter ends with a set of examples drawn from well-used data that we think show that our aerial view provides a much more compelling explanation of the overall evolution of cost and price in higher education.

In part III, our focus shifts from costs to prices. Higher education is a highly subsidized industry. Colleges and universities receive subsidies from state governments if they are public, and all institutions receive subsidies from gifts and endowment earnings. These subsidies allow institutions to charge the average student much less than the actual cost of providing an education. There are also student-specific subsidies through grants and scholarships that change the price that individual students pay. Some grants and scholarships are offered by institutions, while others are awarded by governments and private entities. In this part of the book, we explore how list-price tuition is set and what determines the average tuition that students actually pay. We end this part of the book with a look at the charged question of affordability in higher education. Changes in affordability depend on changes in family incomes, changes in college costs, and changes in the subsidies available to college students. Perhaps surprisingly, our analysis suggests that college has become more affordable over time except for families at the lower end of the income distribution.

In part IV, we turn our attention to higher education policy. Our aerial view of the higher education industry suggests that many of the cost and price drivers in higher education defy easy fixes, but one area where policy can make a real difference is in helping to create access. The word "education" does not appear in the U.S. Constitution; nevertheless, and particularly in the second half of the twentieth century, the federal government has played a significant role in higher education. Starting in 1965, the federal government became a provider of financial aid. More recently, the federal government has started monitoring college tuition. There is a growing body of evidence that the complexity of our financial aid system is a real barrier to many students who could otherwise succeed in college. Most reform proposals highlight simplifying this process and making it more transparent to students and their families. In addition to laying out the costs and benefits of simplifying the current system, we advance an immodest proposal that would radically simplify and universalize how the federal government supports students.

Lastly, state governments have been involved in education for much longer than the federal government. The vast majority of college students attend state-supported colleges and universities. The last thirty years have seen a significant decline in the share of the average state's budget allocated to higher education, despite a substantial increase in the student population being served. The states now cover a much smaller fraction of the cost of providing college training than in the past. This retreat of the state has left public higher education leaders in a difficult economic and political position, pushing simultaneou ly for more state support and for substantial tuition increases in order to maintain the integrity of their programs. We do not think a return to the high state appropriation and low-tuition model is a reasonable hope for re toring quality and access to state institutions. Our political and educational leadership needs to recognize the permanence of this new world of different state priorities, and they need to find ways to enable mor of their citizens to take advantage of high-quality programming. We offer a reform idea that would change the fundamental relation hip between states and their public higher education institutions. State should stop funding schools. They should fund students instead. Likewise, public universities need decision-making independence so they can plan effectively like other forward-thinking institutions. We show how the e twin pillars of a New Compact would change incentives in public higher education for the better. Our proposal is not a privatization plan, but it recognizes the permanently reduced role of the state.