Business has never mattered more. Most people now realize that the livelihood of citizens of Minneapolis is related in complicated ways to the skills and aspirations of the citizens of Guangzhou, Sao Paolo, and Mumbai as well as those of Mobile. The enormous economic expansion within some of the most populous nations of the world, especially China, Brazil, and India, has put competitive pressure on growing numbers of U.S. workers and firms, who compete with others in distant places, even as they also sometimes cooperate through complex networks of trade and investment.

Increasingly, this fragile interdependence is being managed by international business and, over the past several decades especially, by banking and financial sectors that have become tightly linked on a global scale. The “commanding heights” of the economic welfare of nations are no longer occupied by governments alone (Yergin & Stanislaw, 1998). Business in its multiple manifestations has become a prodigious governing force, shaping the destiny of people everywhere.

Business is also more important than ever in American higher education. In 2006–07, the most recent academic year for which national data were available, 21 percent of all undergraduates were business majors. This makes business the most popular field of undergraduate study. When business is combined with other vocational majors such as engineering, nursing, education, agriculture, security studies, and others, the total rises to 68 percent of all undergraduates (National Center for Educational Statistics, 2009).
At the same time, the prominence of business institutions in contemporary U.S. society has enhanced the prestige and authority of successful leaders in business, and business ways of thinking have now taken hold in wider sectors, including not only government but also the organization and leadership of the academy.

For higher education, these developments pose an important question. The American academy has been chartered for important public purposes, chiefly to educate citizens for democracy. The centrality of business in society, the great number of undergraduates who choose business as their field of study, and the even greater numbers who will be employed in business for their working lives demand that higher education do more than just help students acquire tools for advancing their personal careers in business, although that is an important goal. In order to ensure that its graduates develop the breadth of outlook and conceptual agility for living in a global century, higher education also needs to ensure that students understand the relation of business to the larger world and can act on that understanding as business professionals and as citizens. The question, then, is how best to do this? What should undergraduate business education provide for students?

The Bell Project

The answers proposed in this book reflect our work in the Business, Entrepreneurship, and Liberal Learning (BELL) project, an initiative of The Carnegie Foundation for the Advancement of Teaching. Simply put, we believe that undergraduate students who major in business should have the benefits of a strong liberal education. Business and liberal learning must be woven together to prepare students for their professional roles and work and also to prepare them for lives of social contribution and personal fulfillment. In this sense, we propose an integrative vision.
Accordingly, our research has focused on how liberal education interacts with business preparation in undergraduate programs, asking how well undergraduate business education has been able to take advantage of the contributions of liberal learning. We began our research with an understanding, which was subsequently reinforced by our observations, that business majors typically experience the liberal arts and sciences in ways that are weak or episodic. Many business students see liberal arts courses as largely irrelevant to their education. For all the reasons discussed previously—and elaborated in the pages that follow—we believe this is unsatisfactory. Therefore, we set out to examine programs that explicitly announced the intent to provide their undergraduate business majors with the benefits of liberal learning, looking both at common principles and concepts shaping their efforts and at the diverse strategies they have employed. These institutions’ efforts hold lessons for one another and for the larger field of business education, and we believe they also provide an opportunity for liberal arts disciplines to learn from business education, especially about strategies that help students practice and refine their knowledge in real-world circumstances (see, for instance, Shulman, 1997). Additionally, successful efforts at integration within business programs may be instructive for other professional and vocational programs that wish to do the same.

In this sense, we view business education as an instance of the larger phenomenon of vocational majors, fields of study that aim to prepare students directly for entry into the workforce. Due to the rising costs of higher education and the challenges of the employment market, students and their parents today consider preparation for work a top priority among the goals of higher education, and this preference is reflected in the large percentage of students choosing to major in professional or vocational fields. Because more undergraduate students major in business than in any other single field, it would seem there might be a distinctive character or identity to studying business at the college level. But we did not find this to be the case. Undergraduate business seems to be widely understood as a kind of simplified MBA program. In institutions that offer both MBA and undergraduate business degrees, the undergraduate program rarely has its own faculty or dean and its curriculum resembles that of the graduate program. A more distinctive identity for undergraduate business programs would acknowledge that this is their students’ college education as well as professional preparation. This means, in the American tradition of liberal education, that students need to be prepared for their futures as citizens and persons as well as entrants into the workforce.
Rethinking Undergraduate Business Education

To meet the needs of today’s increasingly complex context, undergraduate business programs should help their students develop intellectual perspectives that enable them to understand the role of the field within the larger social world. In keeping with this aim, business programs should uphold and cultivate among students a sense of professionalism grounded in loyalty to the mission of business to enhance public prosperity and well-being. To accomplish this, business education must be integrated with liberal learning.

We believe that undergraduate education of every kind should enable students to make sense of the world and their place in it, preparing them to use knowledge and skills as means toward responsible engagement with the world. In order to contribute to the larger life of society, students must be able to draw on varied bodies of knowledge. They need to gain fluency in looking at issues from multiple points of view, which requires the opportunity to explore with others different ways of posing problems and defining purposes. These are the traits that have historically defined a liberal education. In this sense, the question of what business education should provide for students is part of the more fundamental question of what a college education should provide.

Research on educational attainment provides abundant evidence that a college education produces significant lifelong effects. College is a prime moment for students, including many older students, to question and redefine their core sense of who they are. It offers the opportunity to expand their understanding of the world and to develop skills they will need to make their way in it. College education enables students to grow as whole persons as well as develop their minds and strengthen their working skills. It helps awaken their intellectual curiosity and self-reflection and can aid their evolution toward attaining a sense of responsibility for the common good.

Today’s educational challenge is to prepare students for a world in which ensuring the welfare of the human population must take place within a concern for planetary survival. In such a context, a college education needs more than ever to enable students to understand the world and find their place in it. Beyond that, higher education’s mission requires helping students develop so they can and will contribute to the life of their times. These are ideals long espoused by the tradition of liberal education and represented in the core commitments that define professional preparation. These aims have become especially important in the education of business undergraduates today because of the critical and pervasive role of business in contemporary life.
Narrowed Perspectives and Missed Connections

Business programs, like all forms of professional preparation, immerse students in the values and mind-sets that are peculiar to the field; in business this means, most prominently, the logic of the marketplace. This immersion holds the attendant danger that students will lose sight of the larger pluralism of institutional sectors and spheres of value within which business has to operate. This is not just a theoretical concern. Indeed, we found it distressingly common, even in high-quality programs, to hear students say that their business courses had taught them that “everything is business”—overlooking the different values represented by their families, religious congregations, and communities.

Like all undergraduates, business students need the ability to grasp the pluralism in ways of thinking and acting that is so salient a characteristic of the contemporary world. And it is especially important that business students learn to recognize and distinguish between the dominant logic of business and the marketplace, on the one hand, and, on the other, the very different values and ways of acting that hold sway in the family and the domestic sphere, the worlds of science and education, the arts, and within a democratic government. Business graduates will need facility in moving among these different spheres of value and logics of action. They will benefit from learning to see business and its logic from the outside as well as from within.

The need to grasp this pluralism of values and contexts is, we believe, a weak link in the current organization of undergraduate business programs. Most business programs require their students to take a substantial number of courses outside the business disciplines, in classic arts and sciences fields such as English composition, literature, history, the social sciences, science, and mathematics. However, the relation of these studies to students’ major courses in business is rarely well articulated or closely coordinated. The overall program as it stands now might be thought of as a curricular barbell: each end of the bar carries a significant weight of intellectual subject matter but the connection is slender. On the two ends of the barbell, students encounter courses taught by different groups of faculty, often from different schools or colleges, who have little contact with their colleagues on the other side of the curriculum. The linkages between the two ends of the barbell receive little explicit attention either in the way the curriculum is organized or in how courses are taught.

This arrangement is not the best way to support the high-quality, interconnected learning that today’s students need in order to understand the relation of business to the larger world. In recent decades, research on human learning has made it clear that effective learning depends
significantly on learners’ intentions and motivation. With business students’ focus on career preparation as the most important outcome of college, the goals of liberal education are more achievable if they are explicitly related to students’ existing horizon of interest.

Liberal learning has the potential to broaden and reshape such initially narrow purposes but for this to occur students must come to see how and why the perspectives of the arts and sciences disciplines open up and provide insight into matters of concern to them. This requires a kind of teaching that systematically leads students to grasp and participate in making such connections (Kuh, 2008; National Research Council, 2000; Pascarella & Terenzini, 2005).

An Integrative Vision

Our aim in this book is to stimulate and contribute to a national discussion about business education and its future by focusing on approaches that work to integrate the two ends of the usual barbell curriculum. Rather than a barbell, we envision something more like a double helix. Borrowing from the famous DNA model developed by Watson and Crick, we propose the double helix as a metaphor for an undergraduate business curriculum that explicitly and continually links students’ learning of business to their use of various arts and sciences disciplines that provide a larger, complementary view of the world.

This is not simply an imagined possibility. As we will illustrate in the chapters that follow, we observed courses and entire programs that explicitly put the disciplinary insights and tools of the social sciences and humanities to use in this way. We first encountered the double helix metaphor at Santa Clara University. There, and in similar programs, we saw the liberal arts and sciences used to provide an understanding of the other institutional sectors that business depends on, such as effective public education systems organized by governments, and the ways in which business affects those other institutional contexts. Through these double helix approaches, faculty as well as students can develop facility in navigating the pluralism of values and operating logics that will mark their graduates’ actual lives as business professionals and as citizens.

In the absence of this kind of integrative consciousness, undergraduate business education is often narrow. By this we mean that it provides too little depth of understanding about or flexibility of perspective on the tools and concepts employed in business disciplines. This leads students to view these conceptual tools not as hypotheses to be employed for specific purposes but as simple and complete descriptions of reality. As
we will try to show, this limits students’ development as thinkers. And, in doing so, it threatens to undermine the creative thinking that feeds innovation.

By contrast, when there is more intentional integration of liberal learning approaches with business—double helix style—faculty can help students achieve more advanced educational goals. They can also strengthen students’ sense of professional purpose by showing more effectively how business is interconnected with other dimensions of society and the environment. Implementing this integrative approach will require significant and sometimes difficult reform—that is the nature of innovation. But there is much to build on, historically and in current campus practice.

The Design of the Study

We began our study by surveying business programs broadly, by reading widely in the history of the field and in current business education literature, and by talking with those who have special expertise and experience to share. We also brought to our work a set of ideas and frameworks from Carnegie’s earlier studies of preparation in nursing, medicine, the clergy, engineering, and law (Benner, Sutphen, Leonard, & Day, 2009; Cooke, Irby, & O’Brien, 2010; Foster, Dahill, Golemon, & Tolentino, 2006; Sheppard, Macatangay, Colby, & Sullivan, 2009; Sullivan, Colby, Wegner, Bond, & Shulman, 2007).

With a broad sense of the field in view, we chose ten campuses for intensive site visits during the academic years 2007–08 and 2008–09. Our first criterion was to look for places that were committed to bringing liberal learning and business perspectives together in an intentionally integrated curriculum with appropriate pedagogies.

To ensure that we grasped the broad range of issues involved, we also wanted to be sure we visited a variety of program types. We went to several large university business schools. One of these was the Kelley School of Business at Indiana University (IU), as well as the Liberal Arts and Management Program housed in the IU College of Arts and Sciences. Three private university business schools figured in our rounds: the Wharton School of the University of Pennsylvania and the Stern School of New York University along with the Program in Management Science at Massachusetts Institute of Technology’s Sloan School of Management. We visited Babson College and Bentley University, institutions begun as business colleges that have evolved into full four-year institutions, as well as Morehouse College and Franklin & Marshall College among predominately liberal arts institutions. Our sites also included Santa Clara University, a Jesuit institution in California, and Portland State University, a public, urban university in Oregon (see “Site Visit Institutions”).
Our campus visits lasted several days. During that time, we spoke with a variety of academic personnel and students. We talked with deans, faculty, and students in the business programs and the arts and sciences. We visited classes in the business disciplines and the arts and sciences courses frequented by business students, giving special attention to those educational experiences that brought the two areas of the curriculum together. We sought to understand the varying practices of teaching and learning employed in these areas of the business students’ curriculum, the kinds of intellectual and social skills that each emphasizes, how students are assessed, and the kinds of moral meaning and professional identity that faculty intend to convey and that students perceive as salient. We interviewed arts and sciences and business faculty individually and held focus groups with students from business and the arts and sciences.

Our aim in these conversations was to understand the experience of business education for faculty and for students and how that is enriched or modified by experiences with liberal learning methods and content. To round out our picture, we also inquired into cocurricular activities and the overall campus climate. We spoke with student affairs personnel and student advisors as well as recent graduates of several of the programs we visited. From these conversations, we assembled detailed pictures of how specific practices of business education focus students’ understanding and sensibility and the ways in which integration with the perspectives of the liberal arts and sciences expands and enriches such

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**Site Visit Institutions**

Babson College  
Bentley University  
Franklin & Marshall College  
Indiana University, Bloomington (Kelley)  
Massachusetts Institute of Technology (Sloan)  
Morehouse College  
New York University (Stern)  
Portland State University  
Santa Clara University (Leavey)  
University of Pennsylvania (Wharton)
understanding and opens possibilities for students. These observations and conversations form the basis of the argument this book sets out in the following chapters.

Overview of the Book

Building on the themes and rationale articulated in these opening pages, Chapter Two sets our study and recommendations in a longer-term context. Toward this end, we review a century of developments in which business education has been reshaped several times in response to the needs and problems of business and the larger society. Indeed, many of the issues in the field’s historical development continue to be salient today; in some ways they are the source of today’s challenges but they are also, in some cases, windows into what will be needed to meet those challenges.

Chapter Three turns to the experience of today’s undergraduate business students. We draw here not only on our conversations and observations at particular institutions but also on what is known through research and practice about the larger world of undergraduate business programs. Our findings point to the strengths of business programs—particularly their attention to students’ application and use of knowledge in real-world contexts—and to limitations that call out for a more robust dose of knowledge, skills, and ways of thinking from the liberal arts and sciences. Our sense of these strengths and limitations reflects what we learned about the goals and attitudes of students in business and the arts and sciences as well.

Chapter Four sets out a normative model of liberal education, its goals, and its distinctive modes of thinking, which we identify as Analytical Thinking, Multiple Framing, and the Reflective Exploration of Meaning. Our aim is to show what these three modes entail and to illustrate how they complement and can be enriched by the forms of Practical Reasoning characteristic of professional education. This chapter also compares undergraduate business with other forms of professional preparation.

Chapter Five describes some of the ways that the dimensions of liberal learning described in Chapter Four are taught in the courses we observed and examines their relative prevalence in different areas of the curriculum and the experience of students. We want to provide concrete instances of how these learning goals are addressed by faculty in business and in the liberal arts and to give the reader a sense of which goals are well represented, which warrant increased attention, and what can be learned from practices now in place on campuses we visited.
Chapter Six focuses on pedagogical strategies that support the integration of liberal and business learning. We highlight a set of powerful pedagogies that are especially characteristic of undergraduate business education but we also look at some that are important but not widely experienced by business students. The chapter suggests that arts and sciences faculty have much to learn pedagogically from their colleagues in business schools, just as business faculty can benefit from teaching approaches more characteristic of the liberal arts.

Chapter Seven goes beyond individual courses and classroom practices to examine different curricular models that hold promise for linking business and liberal learning in a more complete and integrated whole. The chapter also suggests ways that the double helix curriculum can be reinforced by student advising, faculty development, out-of-class experiences, and a wider campus culture. In all of these, institutional intentionality and commitment are essential.

Chapter Eight explores two emerging themes in business programs: globalization and entrepreneurship. These themes provide fertile ground in which to connect business and liberal learning toward more effective preparation of business leaders as global citizens. The chapter suggests approaches to teaching for global competence and entrepreneurship, including social entrepreneurship, that tie these subjects closely to the content, goals, and practices of liberal education.

Chapter Nine considers the importance of rethinking business education and highlights five broad recommendations for change. Our emphasis is on the implications of our central thesis: that in order to add value in contemporary business settings and contribute as well to the larger world, students need a stronger education in the liberal arts and sciences, one that is intentionally integrated with their preparation for a career in business. The book concludes with a number of practical action items that can help campuses get started with a process that is necessarily long term but also urgent.

A Teachable Moment

The need to broaden the focus of undergraduate business education today struck us with particular force in part because of the timing of our research. We were in the process of visiting campuses when the economic crisis began in 2008. As the crisis deepened and grew in scope, we found ourselves in the midst of a teachable moment, with the stage set for extensive analysis and debate about the causes of the disaster, how to respond, and what would prevent its repetition. Why did this crisis happen and on
such a scale? Who did what? How is it like and unlike other economic catastrophes, such as the Great Depression? What do we mean by a successful economy and how can we determine soundness? What role should business professionals play in ensuring economic success? And, of course, what should be done next and who should do it?

Such questions represent a great opportunity for business programs, a chance to validate the worth of business in the academy by bringing the analytical tools of the business disciplines to bear on the causes and dimensions of the crisis. Professions such as medicine and engineering focus a good deal of attention on understanding failures as ways to improve future practice (Cooke et al., 2010; Sheppard et al., 2009). Here, it seemed, was a parallel opportunity for business to examine its own thinking, its models and mind-sets, its strengths, and, yes, its failures and shortfalls.

Certainly we saw some of this kind of reflection and soul searching. In Chapter Five we tell the extended story of how one program seized the moment for self-reflection and reform. But, to put it frankly, in most cases this potentially teachable moment seems to have been a missed educational opportunity.

What we expected to see was urgent attention within business programs to probing such a frightening, large-scale catastrophe, one that threatened to destroy the global economic system itself. Instead, in many of the sites we visited, the crisis was characterized as a kind of natural event, like being overtaken by a storm, which was unforeseeable and perhaps inexplicable. In classes we observed, there was little systematic, disciplined examination of the institutional context and public policies that underlay the events.

This was surprising, especially considering the repeated crises of the previous decade. The crash of the dot.com boom in 2000, followed by the Enron and WorldCom failures in 2001—each of which caused huge losses of assets—had already revealed dangerous weaknesses in accounting, managerial, and investor practices throughout the economy. At least within the scope of our observations, it seemed that although students and faculty felt overtaken by events, relatively few were motivated to examine deeply how an economic meltdown of this magnitude could have occurred. Many we spoke with seemed to hope that it would all somehow be corrected so they could resume business as usual. Their previous understandings of the workings of the business world were so strong that, even in the face of massive problems, neither business faculty nor students cracked open those understandings to reveal the need for alternative points of view and new approaches.
At the same time, it should be said that the largest business event of our times raises questions not only about undergraduate business education but also about undergraduate education as a whole. An educationally coordinated approach to understanding the crisis must engage the liberal arts and sciences along with the business disciplines. The failure to provide coordinated settings and experiences in which students could engage with a signal event of the time reveals not only narrowness in the business fields but also insularity in the arts and sciences.

Additionally, this missed opportunity underscores the pressing need to revise undergraduate education to ensure that when students graduate they are on the path toward becoming fully reflective business professionals and not simply technicians. The great strength of U.S. higher education, its comparative global advantage, has been its commitment—most visible in liberal education—to providing undergraduates with a broad understanding of the world, encouraging them to probe and link ideas for deeper understanding. In the world of technological competition, this has been hailed as the key strength that U.S. institutions can build on (National Academy of Engineering, 2004). We believe that business education could strengthen these same qualities by integrating liberal learning with business preparation toward a higher level of performance.

It is not perhaps altogether surprising that the teachable moment of the 2008 financial crisis has so far been turned to little immediate educational advantage. Learning from failure is not easy; lessons need time to sink in, to filter through the system, to generate alternative ways of thinking and acting. Perhaps, too, the crisis represented too great an intrusion on some of the key assumptions of recent business theory. However, like business itself, business education must continually improve its capacity for learning and change.

As we will say more fully in the chapters that follow, business preparation in the United States faces new uncertainties and complexities. It seems abundantly clear, for example, that the business sector will become increasingly interrelated with government, not-for-profit, and scientific research sectors, especially as business comes to operate in an ever more international context.

Within this global perspective it also is becoming clear that the conditions governing the conduct of business have become less stable than the current, highly technical model of business education presumes. As a
result, there will be increased demand for skill in understanding and negotiating varying social environments. This in turn demands breadth and flexibility of mind among business professionals, precisely the qualities that have long been objectives of liberal education.

For these reasons, we believe that the time has come to reimagine undergraduate business programs. Our investigation is intended as a contribution to that venture.