TOWARDS AN UNDERSTANDING OF AN INSTITUTION: THE PERCEIVED
LEGITIMACY OF ONLINE BUSINESS DEGREE PROGRAMS

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MAJOR PROFESSOR: Dr. John Pearson

Organizational forms can become institutionalized in the sense that their existence and application is taken-for-granted and perceived as legitimate by stakeholders. Over time, new organizational forms can emerge that challenge perceived legitimacy of the established form. From this perspective, this dissertation examined institutionalization in the context of online business degree programs (OBDP) in higher education. Specifically, this dissertation examined OBDP as an emerging institutionalized form in relation to its cognitive legitimacy (taken-for-grantedness) and sociopolitical legitimacy (appropriateness) from the perspectives of four key stakeholder groups (students, faculty, academic administrators, and business practitioners). Survey results suggest that OBDPs are perceived as cognitively legitimate across each of the groups studied and socio-politically legitimate in each the four groups studied except for faculty. Furthermore, a conjoint experiment was conducted to determine the influence that four program related characteristics (accreditation, reputation, placement after graduation, and physical linkage) have on the legitimacy perceptions of OBDPs. Conjoint results indicate that each of the factors studied were significant predictors of legitimacy with accreditation being the most significant across each of the four groups. These findings provide a novel test of institutional theory as well as contributing to practice by offering strategic guidance to business schools either currently offering ODBPs or those planning to develop an online version of an existing program.

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CHAPTER ONE

INTRODUCTION

1.1 Overview and Goal of Research

Well established, resilient social structures such as marriage, what is appropriate to wear to work or church, and wearing a seatbelt are all examples of common institutions in the sense that there is a "taken for granted" understanding of what each of these are and the appropriateness of their existence. Often, business processes and strategies also become institutionalized in the sense they are taken for granted and perceived as appropriate modes or templates of operation within an institutional field. For example, Westphal, Gulati, and Shortell (1997) argued that the adoption of total quality management (TQM) in manufacturing is institutionalized in that organizations often base decisions related to the adoption of TQM practices not necessarily on performance but on a desire to be viewed as legitimate. Organizational integration of online processes such as e-commerce use (Gibbs & Kraemer, 2004); internet banking (Shi, Shambare, & Wang, 2008); business-to-business electronic marketplaces (Son & Benbasat, 2007); information technology standards (Bunduchi, Graham, Smart, & Williams, 2008) and diffusion of web technologies (Pearson & Keller, 2009) have also been conceived as institutionalized templates of operation within and across institutional fields. In this vein, this dissertation argues that the creation of a new institutional form is taking place in the context of higher education with regards to online business degree programs. Specifically, this dissertation utilizes institutional theory to assess the degree of legitimacy that online business degree programs possess from the perspective of four key stakeholder groups (students, academic faculty, academic administrators, and business practitioners) and identifies variables that have a direct and positive influence on the institutionalization and subsequent legitimation of

these programs as a taken-for-granted, appropriate institutional form. It is important to note that the institutional references in this dissertation refer to social structures as they relate to higher education and not to a specific school or university. Rather, institutions, in this context, are conceptualized as "multifaceted, durable social structures, made up of symbolic elements, social activities, and material resources" (Scott, 2001, p. 49). From this perspective, traditional academic degree programs are an existing or established institutional form and online business degree programs are considered as a new or emerging institutional form.

For something (e.g. policy, procedure, technology, program, etc.) to become institutionalized it must not only become accepted and taken for granted, it must also be viewed as legitimate. Aldrich and Fiol (1994) present legitimacy as either cognitive, which is based on its taken-for-grantedness; or socio-political which refers to the extent to which it "conforms to recognized principles or accepted rules and standards" (p. 645). Bansal and Clelland (2004) identify legitimacy as it relates to the environmental practices of business as being "desirable, proper, or appropriate" (p. 94).

This is not to say that institutions last forever or are never challenged, rather institutionalization is generally conceived as a process where, over time, new institutional forms emerge, are diffused and maintained, and are ultimately replaced. In this regard, Zucker (1988) posits that institutional destruction, rather than persistence, is the norm. Scott (2005) refers to an "arc of institutionalization" (p. 472) that he suggests "has, necessarily, a beginning and an end as well as a middle" (p. 471). From this perspective, the evolution of institutions can be conceived in terms of the creation of new institutions at the beginning of the arc; the maintenance or diffusion of existing institutions in the middle; and the disruption or replacement of existing institutions at the end. The automobile industry and the development of alternative fuels and

hybrid engines fueled by a combination of gasoline and electricity are an example of the institutional process. The use of gasoline powered engines in automobiles can be considered as institutionalized in the sense that it has long been accepted as a taken-for-granted and appropriate source of fuel. Over time, the automobile industry has evolved and the institutional characteristics by which it operates have been challenged by new developments and technologies that have disrupted the established institutional form. From the perspective of the institutional process in the automobile industry, the development and acceptance of hybrid engines and alternative fuel sources as taken for granted and appropriate represents disruption to the long established institutional form where alternative fuels were considered as inappropriate if they were considered at all. The disruption currently being caused by the emergence and subsequent adoption of these types of automobile technologies has triggered new institutional pressures to offer hybrid models. Automobile manufacturers are compelled to respond to these pressures in an effort to be viewed as legitimate, and as a result, are aggressively developing hybrid and alternatively fueled models. The appropriateness or legitimacy of the emerging institutional form is a response to increasing gasoline prices, decreasing oil supplies, and an increasing concern for the natural environment. Presumably, the current institutional form will be maintained until at some point in the future a new development will emerge that will disrupt this institutional form and the process will begin again.

Movement along the arc of institutionalization can also be described in the context of higher education. The traditional delivery of academic programs has been long established and maintained as an existing institutionalized form in that students physically attend classes that are taught by an instructor that is physically present at the same time and place as the student. In the institutional sense, this dissertation argues that the development of online academic degree

programs, specifically in business schools, are a response to new and emerging institutional pressures and have the potential for disrupting the long established institutional form previously described. It is important to note that the sporadic offering of courses via the internet is not included in the scope of this dissertation, rather complete business programs that are offered online are considered here.

The goal of this research is two-fold: 1) to examine the extent that online business degree programs are institutionalized in the sense that they are perceived as cognitively and socio-politically legitimate by key stakeholders; and 2) to identify key factors that potentially enhance or hinder the progression of institutionalization as it relates to online business degree programs. This dissertation examines online business degree programs as an emerging institutionalized form in relation to its cognitive legitimacy (taken-for-grantedness) and sociopolitical legitimacy (appropriateness).

1.2 Theoretical Basis

Theoretically, this dissertation is based on institutional theory and legitimation (Meyer & Rowan, 1977; Dimaggio & Powell, 1983; Berger & Luckman, 1966). Berger and Luckman's (1966) view of institutionalization is that when knowledge that has been created through sense-making becomes agreed upon as "habitualized actions by types of actors" (p. 54), institutionalization has occurred. Berger and Luckman (1966) describe institutions as being products of history and occurring over time. In their presentation of institutional theory, Meyer and Rowan (1977) utilize Berger and Luckman's (1966) conceptualization of institutions in their definition of institutionalized rules as being "taken for granted or supported by public opinion or the force of law" (p. 341). When something (e.g. process, rule, activity, industry, etc.) becomes "institutionalized" in the sense of Meyer and Rowan (1977), it becomes legitimate and achieves

unquestioned, myth-like status. These myths serve as the default or standard modes of operation for organizations that operate in a certain institutionalized environment. In this sense, institutions serve as "predefined patterns of conduct" (Berger & Luckman, 1966, p. 55) that provide actors with a set of socially constructed rules or behaviors that are deemed acceptable. Traditional higher education is an example of this concept. For the most part, the traditional "college experience" follows a predefined pattern that is very similar today as it has always been. Students physically attend classes arranged and sequenced around some sort of specific curriculum (e.g. engineering, chemistry, economics, etc.). Classes are taught by credentialed (at various levels) faculty; students' mastery of curriculum is assessed at various points throughout the curriculum to ensure (at least in theory) a sufficient level of learning; degrees are awarded; and students enter the workforce having earned a certificate that has been legitimized in the taken-for-granted, institutionalized sense.

Once rules or behaviors have been institutionalized, Berger and Luckman (1966) argue they must be legitimized to provide further meaning and justification for their existence. This dissertation takes the position that online business degree programs are becoming institutionalized and being perceived as a legitimate form of operation in the institutional context of traditional higher education. Basic support for this contention is found in a survey conducted by Allen and Seaman (2010) that found that "over 4.6 million students were taking at least one online course during the fall 2008 term, which is a 17 percent increase over the number reported the previous year" (p. 1). The report also noted that the proliferation of online education is evident in every school classification (doctoral/research, master's, baccalaureate, associate's, specialized) and in each of eight traditional academic disciplines (business, liberal arts and

sciences, health professions, education, computer and information sciences, social sciences and history, psychology, engineering).

1.3 Research Questions and Research Model

Using institutional theory as the theoretical basis, this dissertation tests associated hypotheses indicating the institutionalization and legitimation of online business degree programs. The overarching argument in this dissertation is based on the perception that online business degree programs are emerging as an institutionalized and legitimate form of education. The degree of the institutionalization and legitimation of online business degree programs is examined through the perspectives of key stakeholders; furthermore, the effect that the program characteristics of accreditation, reputation, placement of graduates after graduation, and linkages to other more legitimate entities have on key stakeholders' perceptions of online business program legitimacy are also considered.

The research models in Figure 1.1 and Figure 1.2 illustrate the relationships investigated in this study. Conceptually, Figure 1.1 illustrates the perceived cognitive and socio-politically legitimacy of online business degree programs of each of the four stakeholder groups, and Figure 1.2 illustrates the relationships of the program characteristics of accreditation (yes or no), reputation (strong or weak), placement of graduates after graduation (low or high), and whether or not the program is linked to other, more legitimate entities such as a provider of traditional, face-to-face higher education or corporate partnership.
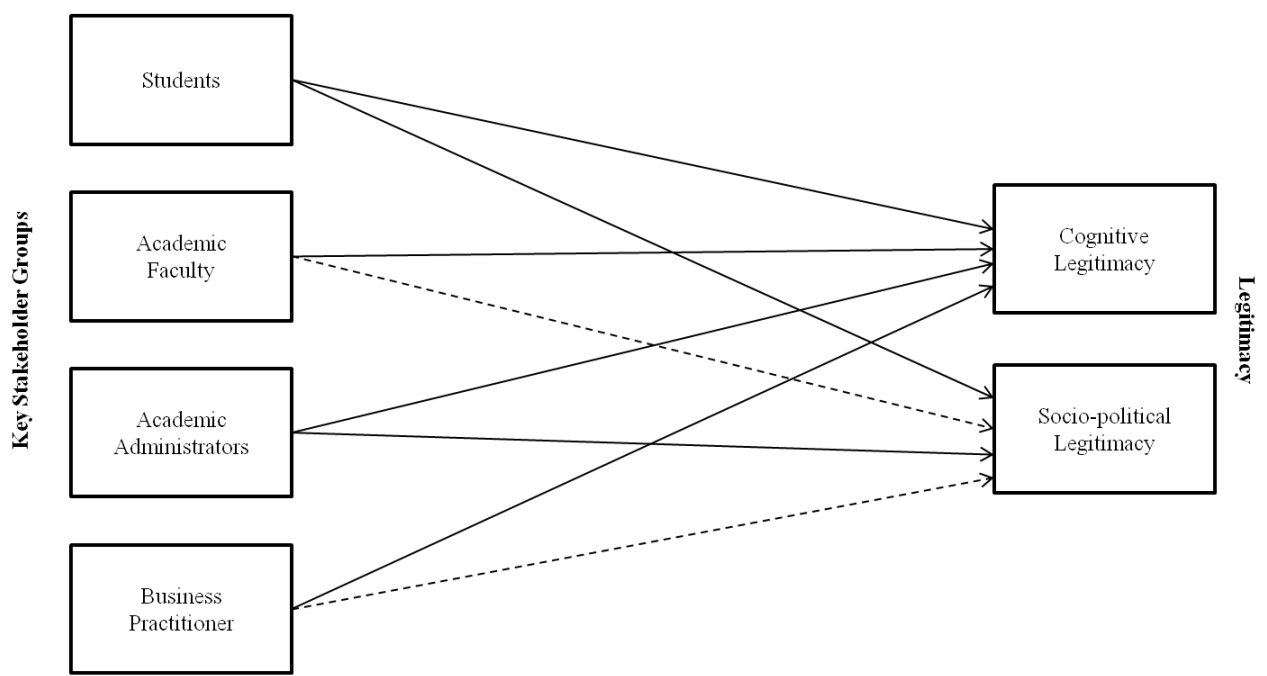
Figure 1.1: Research Model of Key Stakeholder Perceptions of Legitimacy
Note: solid line = positive relationship; dashed line = negative relationship.
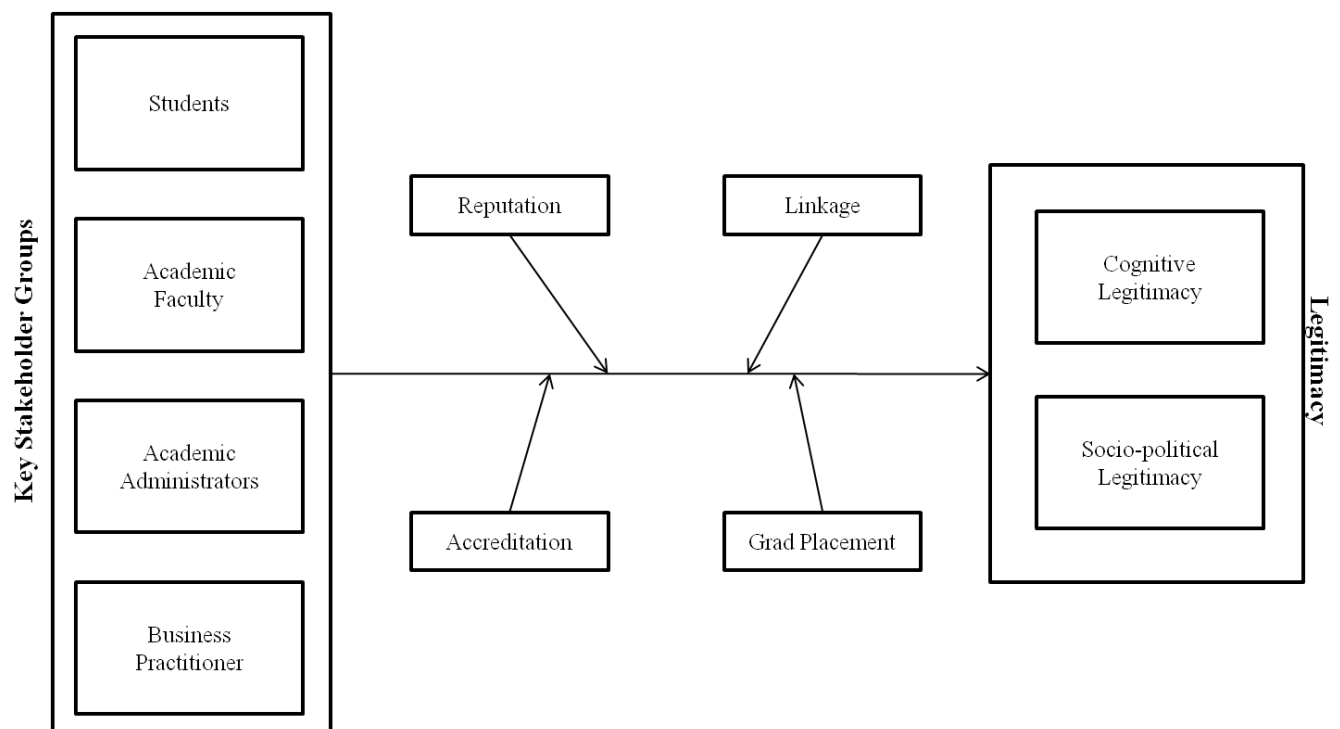
Figure 1.2: Research Model – Program Characteristics as Legitimacy Moderators

Specifically, this dissertation addresses the following two research questions:

1. To what extent are online business degree programs perceived as cognitively (taken for granted) and socio-politically (appropriate) legitimate?

2. How do varying levels of online business degree program accreditation, reputation, placement of graduates after graduation, and physical linkages impact the perceived legitimacy of online business degree programs?

1.4 Theoretical and Practical Contributions

This dissertation applies knowledge and theoretical understanding from organizational studies to the context of higher education; therefore, this dissertation makes both theoretical and practical contributions.

1.4.1 Theoretical contribution.

Theoretically, this dissertation contributes to the literature by considering an established institutional form (traditional higher education) and its unique relationship with a new and emerging institutional form (online business degree programs). Largely, institutional theory research has focused on specific points along the arc of institutionalization, but not how specific points on the arc compare and relate. Scott (2001) notes the need for this sort of institutional research when he calls for institutional scholars to "extend theoretical and empirical efforts to better understand how stable structures become destabilized, how inertia gives way to innovation, how institutional change occurs" (p. 211). More recently, Heugens and Lander (2009) reiterate this need for this type of research when they note the lack of institutional work focused on the process of institutionalization, "the processual dimension of isomorphism – how organizations experience isomorphic pressures, interpret them, and learn to manage them over time – is rarely explored" (p. 76). This research attempts to address this gap by examining the emergence of online business degree programs as a new institutional form as it relates to the established institutional form of traditional higher education.

Additionally, this dissertation theoretically contributes to the institutional theory literature relative to its application to higher education and more specifically, online business programs. Institutional theory has been applied in numerous contexts such as the study of multinational corporations (Kostova, Roth, & Dacin, 2008); offshoring instensity (Gupta, Bhattacharya, Agrawal & Garg, 2009); and executive compensation (Berrone & Gomez-Mejia, 2009), but the application of institutional theory in the context of online learning's emergence as a new institutional field in higher education is novel and unique. Higher education is well suited for institutional research due to its long standing structures and approaches to delivering education to students. Traditional higher education is notoriously resistant to change, and as a result the existing institutional form of higher education has experienced very little challenge to the traditional model of providing education at the post-secondary level. Over time, traditional higher education has become so institutionalized that colleges and universities are often referred to as "institutions" of higher education. From this perspective, this dissertation offers an interesting empirical test of institutional theory that is in-line with the previously mentioned call by Scott (2001) for further examination of how institutional change occurs.

1.4.2 Practical contribution.

This dissertation also makes significant contributions to practice in higher education, relative to strategic planning, enrollment management, and the development and implementation of online degree programs. Strategically, online programs are an option that more and more colleges and universities are considering. Allen and Seaman (2010) found that 73.6% of public, 49.5%, private-nonprofit, and 50.7% private-for-profit schools they surveyed indicated that "online education is critical to their long-term strategies" (p. 10). This is undoubtedly related to the increasing enrollments and interest in online programs previously mentioned. Factors such as

increasing gas prices (Young, 2008), the recession (Kolowich, 2009), and merely convenience (Carnevale, 2007) have all been identified as motivations for students moving towards online programs. This dissertation offers insight regarding how university administrators can strategically plan for online education by considering situations or settings in which legitimation of online education and ultimately the disruption of the traditional form of higher education is stronger and those in which it is weaker. From this perspective, administrators will have a clearer understanding if implementing online programs in their location is an advantageous choice.

This dissertation is also of value to practitioners at the department and instructional level. By understanding the factors affecting the perceived legitimacy of online programs, departmental and instructional level practitioners can better understand how to develop and market their online programs to potential students and ultimately to employers. To the extent that this dissertation provides guidance to practitioners at this level, its contribution can be realized in increased enrollments and placement of graduates after graduation, which ultimately will create a self-reinforcing feedback loop related to the legitimacy of the program due to potential students desiring to enroll in programs that have high placement rates and potential employers wanting to hire students from established, successful programs.

1.5 Organization of Research

The remainder of this dissertation is organized as follows. Chapter 2 provides reviews of the institutional theory literature paying close attention to the streams of the literature focused on institutional change and the process of institutionalization as well as streams of the higher education literature focusing on traditional higher education's resistance to change and the emergence of online programs. Chapter 2 also provides a review of the literature and specific hypotheses related to four specific factors (accreditation, reputation, placement after graduation,

linkages) influencing the perceived legitimacy of online business degree programs. Chapter 3 provides a detailed analysis of the methodology for this study by describing the sample and unit of analysis, identifying distinct measures used for each of the constructs, addressing issues related to reliability and validity, and describing the data collection process. In Chapter 4, the empirical findings and statistical methods employed to the testing of each hypothesis are presented. Finally, Chapter 5 offers an in-depth discussion of the key findings, theoretical and practical implications of the study, suggested areas for future work, and concluding remarks on the research.

CHAPTER TWO

LITERATURE REVIEW AND THEORETICAL DEVELOPMENT

There are many perspectives concerning how organizations and institutional fields change and evolve. The perspective of interest in this dissertation is the institutional literature that focuses on the emergence of new institutional forms and the ultimate enhancement or disruption of existing institutional forms. This stream of literature is related to the notion that, as Holm (1995) states, "new institutions are not created from scratch but are built upon older institutions" (p. 400). From this perspective, this dissertation examines the degree that a new institutional form (online business degree programs) is perceived as legitimate from the perspective of key stakeholders (students, faculty, academic administrators, and business practitioners) in the institutional environment and the subsequent affect that the emergence of this new institutional form could potentially have on the existing institutional form (traditional academic degree programs). From an institutional perspective, the relationship between existing and new institutional forms is an important focus of examination. Purdy and Gray (2009) mention the need for this sort of institutional work when they refer to the study of emerging institutional forms as "persistent and intriguing" (p. 355).

Using institutional theory as its theoretical basis, this dissertation examines this relationship in the context of traditional and online business degree programs. First, this chapter provides a review of the institutional theory literature as it relates to the processes of institutionalization and legitimation. Second, this chapter provides a review of higher education literature focusing on traditional higher education's resistance to change and the emergence of online academic degree programs. Third, this chapter considers the effect of four specific factors (accreditation, reputation, placement after graduation, linkage) on the legitimization of the new

institutional form. Anticipated relationships are developed and stated as research hypotheses based on the literature reviewed.

2.1   Institutionalization and Legitimacy

2.1.1 Institutional theory.

Over the past 30 years, the scholarly work related to institutional theory as a basis for studying organizations has matured and evolved into "an impressive example of a 'cumulative theoretical research program'" (Scott, 2005, p. 461), and what Heugens and Lander (2009) refer to as "one of the leading perspectives of organizational analysis" (p. 61). In his 2008 summary, Scott used phrases like "maturing" and "approaching adulthood" (p. 427) in his description of institutional theory. Over the course of the maturation process that Scott refers to, institutional theory has been studied in numerous contexts from how private colleges adapt to environmental change (Kraatz, 1998); to the adoption and diffusion of web technologies (Pearson & Keller, 2009); to executive compensation (Berrone, Gomez-Mejia, 2009). Table 1 (included at end of this section) provides an overview of the variety of contexts and applications addressed from the perspective of institutional theory. The basic premise for the study of institutions and the development of institutional theory as it relates to this dissertation turns on the question posed by Dimaggio and Powell (1983) when they wonder: "What makes organizations so similar?" (1983, p. 147). In an attempt to address this question, institutional theory is based on the idea that organizations tend to imitate other organizations and practices that are perceived as socially legitimate in an attempt to increase the chance of survival.

The foundation for contemporary applications of institutional theory can be traced to two seminal articles. One of these articles (Meyer & Rowan, 1977) takes a macro perspective by considering the "institutional environment" (p. 340) and its effects on groups of organizations or

what Dimaggio & Powell (1983) later referred to as an "organizational field" (p. 148), and the other article (Zucker, 1977) takes a more micro perspective by examining "cultural persistence" (p. 726) of institutions within organizations.

In their paper on the institutionalization of organizations, Meyer and Rowan (1977) argue that many organizations mold their formal structures to "dramatically reflect the myths of their institutional environments instead of the demands of work activities" (p. 341). Meyer and Rowan make a clear distinction between institutions and organizations, and this distinction is important to note in the context of this dissertation. Meyer and Rowan note this distinction in their definition of institutionalized rules as being either "taken for granted, supported by public opinion, or the force of law" (p. 341). Although specific organizations (e.g. post office, church, etc.) are often considered institutions in the taken for granted sense, institutions are also presented in many other forms (e.g. process, rule, activity, industry, etc.). When something becomes "institutionalized", it becomes legitimate and achieves the unquestioned, myth-like status that Meyer and Rowan describe. These myths serve as the default or standard mode of operation for organizations in a certain institutionalized environment. Based on this, Meyer and Rowan argue that "institutional isomorphism promotes the success and survival of organizations," (p. 349) even when becoming isomorphic with the institutional environment is detrimental to the technical efficiency of the organization. Dimaggio and Powell (1983) base their initial presentation of institutional theory on the same idea that organizations often forsake efficiency for similarity in relation to other organizations in their organizational field, and identify three isomorphic processes (coercive, mimetic, and normative) as the social drivers that move organizations towards similarity. Each of these isomorphic processes is discussed in greater detail later in this chapter.

It is possible that individual institutional actors may not respond to the institutional pressures to conform and choose to ignore or otherwise not conform to institutional pressures. Early institutional theorists (e.g. Meyer and Rowan; Dimaggio and Powell) would view this institutional deviance as detrimental and would suggest that deviance would lead to illegitimacy and non-conformists would ultimately be selected out of the environment. More recently and related to this, a substantial amount of institutional work has been done related to the "pressures to conform" versus the "pressures to perform" (Baretto & Baden-Fuller, 2006). In their meta-analysis of institutional theory, Heugens and Lander (2009) identify the following two distinct forms of performance: "symbolic" which they define as "the extent to which they generate positive social evaluations" (p. 63) and "substantive" which they define as "extent to which they (organizations) are able to generate accounting-based profits or increase their overall market share" (p. 64). Although there seems to be an agreement among institutional theorists that conformance to institutionalized rules yields increases in symbolic performance, the effect that conformance has on substantive performance is less established (Heugens & Lander, 2009). For example, Westphal, et al. (1997) studied "conformity to normative TQM adoption" (p. 388) in hospitals and found that the normative adoption of TQM practices "was negatively associated with organizational efficiency benefits" (p. 388). Extending these findings, Kennedy and Fiss (2009) distinguished between the "motivations to appear legitimate" and "motivations to realize economic performance improvement" (p. 897) in the examination of hospitals' decisions to adopt and implement TQM practices, and found that depending on the time of adoption (early or late), conformity and performance are not necessarily mutually exclusive. In the context examined in this dissertation, traditional providers of higher education may develop and add online educational opportunities to their traditional offerings as a response to demands by

students and competitive pressures even when doing so would create inefficiencies and cause already scarce resources to be allocated away from traditional offerings.

Meyer and Rowan (1977) do not ignore the paradox that is created between the technical production of outputs and the organizational pursuit of legitimacy. Rather, they contend that in order to resolve the inconsistencies between the two, organizations separate or "decouple" (p. 357) portions of its structure from "activities and each other" (p. 357); "maintain elaborate displays of confidence, satisfaction, and good faith" (p. 358); and "minimize inspection and evaluation" (p. 359). An example is the accreditation process of collegiate academic programs. Academic units are decoupled from each other and often pursue external accreditation from institutionally legitimated agencies (e.g. AACSB in business, ABET in engineering, etc.). The accreditation process is often very ceremonial in that the accreditation seeking unit provides documents and evidence of success and plans for future improvement to a team of reviewers from similar (e.g. size, degrees offered, etc.) universities. After reviewing the self-reported evidence of the accreditation-seeking unit and being treated as VIP's during an in-person visit, the review team makes the decision whether or not to grant accreditation to the unit. Accredited units are viewed as more legitimate than units that are not accredited; consequently, the legitimacy provided by accreditation increases a unit's ability to acquire resources (faculty, students, grants, etc.) that are typically associated with organizational success.

Taking a similar, but more micro approach to institutional theory, Zucker (1977) examined how organizational culture persists from generation to generation even as individual organizational actors move in and out of the organization. From this perspective, Zucker considers the role that individual actors play in the following three areas of institutional development: (1) the "general uniformity of cultural understanding, (2) maintenance of these

understandings, and (3) resistance of these understandings to change" (p. 726). These three aspects of cultural persistence are very similar to Scott's (2005) arc of institutionalization (creation, maintenance, disruption) that is described in chapter 1 and is a central tenet of this dissertation. Zucker also points out the inherent duality of the concept of institutionalization by stating that institutionalization is both a "process and a property variable" (p. 728). She makes this distinction by describing the process that organizational actors engage to "transmit what is socially defined as real" (p. 728) from one generation to the next; consequently, at any point during this process or at any point along the arc of institutionalization "the meaning of an act can be defined as more or less a taken-for-granted part of this social reality" (p. 728). Thus, institutions (property variable) are identified by their taken-for-grantedness and persist through the process of institutionalization (process variable). Institutions as a property variable are presented in this dissertation via the primary question of to what extent online business degree programs are perceived as taken for granted, appropriate institutions relative to specific variables that influence the institutionalization process of these programs. By focusing on the role the individual actor plays in creating, maintaining, and disrupting institutions, Zucker's institutional work is the foundation for the emerging stream of institutional literature that focuses on institutional entrepreneurship, and is specifically relevant to this dissertations examination of key stakeholders.

Lawrence and Suddaby (2006) report on the evolution of institutional theory and suggest that "there has over the past 10-15 years emerged a new emphasis in institutional studies on understanding the role of actors in effecting, transforming and maintaining institutions and fields" (p. 215). They identify this focus on actors as "institutional entrepreneurship" (p. 215) and suggest that individual actors behave entrepreneurially to influence institutional legitimacy.

Similarly, Child, Lu, and Tsai (2007) identify institutional entrepreneurship as referring to the "ways in which individuals or organizations create and develop new institutional norms and rules that redefine appropriate social behavior" (p. 1013). For the most part, the empirical testing of institutional entrepreneurship has focused on the methods that individual actors employ in effecting institutional entrepreneurship and the perceived success of the process, and has been studied and operationalized at the individual, organizational, and community of interrelated actors levels of analysis. For example, Mutch (2007) used a case study approach to study a specific institutional entrepreneur, Sir Andrew Barclay Walker, in changing the managerial practices of "public houses" or pubs in the UK in the 19th and 20th centuries (p. 1131). At the organizational level, Munir and Phillips (2005) examined "how Kodak managed to transform photography from a highly specialized activity to one that became an integral part of everyday life" (p. 1665). At the broader, community level, Wang and Swanson (2007) examined the entrepreneurial activities of "various interrelated actors" (p. 82) related to the diffusion of IT innovations, and Child, Liu, and Tsai (2007) examined the establishment of an environmental protection system in China. Although this dissertation does not directly examine the role that individual actors play on the process of institutionalization, the movement through each of the stages of the institutional life cycle is central to the argument presented here.

As the above review of institutional theory has shown, institutional theory is a mature and active field of research. To provide further understanding of institutional theory a thorough review and examination of institutional classifications, isomorphism, and legitimacy is offered in the following sections.

Table 2.1

Overview of institutional theory contexts and applications since 2007

Context	Reference	Primary Institutional Ideas
Strategy		
Strategic alliances	Dacin, Oliver, & Roy (2007)	Strategic alliances legitimate firms
Managers' strategizing behavior	Jarzabkowski (2008)	Strength of institutionalized context influences strategizing behavior
Product introduction of mutual fund firms	Jonsson (2009)	Failure of some practices to move through the process of institutionalization
R&D search intensity	Chen & Miller (2007)	R&D search intensity reflective of institutionalized investment patterns
Family leadership in business groups	Chung & Luo (2008)	Effect of family presence in leadership on institutional change
International management		
Stock option pay in Germany	Sanders & Tuschke (2007)	Adoption of practices that are institutionally contested
Corporate governance models in Taiwan	Chung & Luo (2008)	Institutional mechanisms influence models of corporate governance in emerging economies
Foreign affiliate performance	Chan, Isobe, & Makino (2008)	Effect of degree of host country institutional development on foreign affiliate performance
Entry strategies of foreign investors	Meyer, Estrin, Bhaumik, & Peng (2009)	Impact of market-supporting institutions on business strategies in emerging economies
Wholly owned foreign subsidiaries in China	Li, Yang, & Yu (2007)	How wholly owned formed foreign subsidiaries gain legitimacy in China
Operations management		
Supply chain	McFarland, Bloodgood, & Payan (2008)	Institutional theory used to explain conditions where supply chain contagion is likely to occur
TQM adoption	Westphal, Gulati, & Shortell (1997), Kennedy & Fiss (2009)	Institutional effects of the decision to and consequences of adopting TQM practices
ISO 9000 adoption	Guler, Guillen, & Macpherson (2002), Beck & Walgenbach (2003)	Institutional effects of adopting and formalizing ISO 9000

(Continued)

Table 2.1 (continued)

Context	Reference	Primary Institutional Ideas
MIS		
Internet banking	Shi, Shambare, Wang (2008)	Isomorphic pressures to adopt internet banking
B2B electronic marketplaces	Son & Benbasat (2007)	Role of legitimacy-related factors in the use of B2B marketplaces
Web technologies	Pearson & Keller (2009)	Institutionalization of web technologies
Misc.		
Exit rates of U.S. feature film producer organizations	Cattani, Ferriani, Negro, & Perretti (2008)	Network ties and legitimation in exit rates
Political economics	Jackson & Deeg (2008)	Politics of institutional change
Organizational change in the public sector	Ashworth, Boyne, & Delbridge (2007)	Isomorphism in the public sector
Corporate social responsibility	Campbell (2007)	Mediating role of institutional conditions on corporate social responsibility
Occupational safety and health programs	Corcoran & Shackman (2007)	Institutional perspective of company involvement in voluntary employee safety program

2.1.2   Institutionalization and isomorphism.

According to Scott (2001), institutions can be classified based on three elements or "pillars" (p. 51) that "make up or support institutions" (p. 51). These three elements are regulative, normative, and cultural-cognitive. Maguire and Hardy (2009) refer to these pillars as being the foundation for which "institutionalized practices are held in place" (p. 149) in their case study on the "abandonment of widespread, taken-for-granted practices" (p. 148). The regulative element or pillar focuses on "rule-setting, monitoring, and sanctioning" (Scott, 2001, p. 52). An example of the regulative pillar is the formal rules of a game or sport where a referee or judge is part of the game to enforce the rules of the institution (e.g. football, basketball, etc.). In basketball, for example, the rules or regulations identifying what actions are fouls or are not are institutionalized and deemed as appropriate by participants (coaches, players, spectators, etc.). These rules are enforced by referees that are viewed as legitimate based on their formal association with the sanctioning body, which in this case would be a specific sanctioning agency such as the National Basketball Association (NBA) or the National Collegiate Athletic Association (NCAA).

Relative to the regulative pillar, the normative pillar is less formal and more social in nature and focuses on "rules that introduce a prescriptive, evaluative, and obligatory dimension into social life" (Scott, 2001, p. 54). In the basketball example, the normative pillar is represented by how the game should be played, not just the formal regulations. These normative rules or norms are characteristics that might be associated with sportsmanship and being considered a "clean" or "team" player and become part of the un-written, but established norms of what is acceptable and customary. This pillar is specifically related to this dissertation from the general perspective of how higher education should (face-to-face) and should not (online) be

delivered. As described previously, the accepted institutional template in higher education has long been based on face-to-face interaction between students and instructors that are located in the same physical location, and although forms of delivery have been developed to allow these interactions to take place at a distance (e.g. correspondence, interactive television, online, etc.), the established form has and continues to be the norm with face-to-face, same location delivery method being identified as "traditional" while other methods are presented as less desirable and labeled as "distance" or "extensions".

The cultural-cognitive pillar is related to shared beliefs and taken-for-grantedness as it relates to institutional compliance. In the basketball example used for the previous two pillars, cultural-cognitive would be related to strategy in common or typical game situations. For example, purposefully fouling players at the end of a game or in what situations to call a timeout or substitute players are types of situations that are common in basketball games. In these common situations, there are generally very few (typically 1 or 2) actions or behavioral scripts that coaches follow. The choices for action are often taken-for-granted responses to certain situations. This example is very similar to the pedagogical and administrative decisions that faculty and administrators make in relation to academic degree programs. For example, faculty commonly choose between a relatively small number of pedagogical techniques (e.g. lecture, group work, discussion, etc.) when presenting material to students in their classes, and these commonly used pedagogical techniques are generally applied in specific situations. For example, instructors often use lecture to present foundational knowledge, and group work or discussion for application of knowledge.

The three pillars of institutions as presented by Scott (2001) provide a good foundation for the discussion of institutional isomorphism. Dimaggio and Powell (1983) present institutional

isomorphism in detail by identifying "coercive, mimetic, and normative" (p.147) as three distinct isomorphic processes. Dimaggio and Powell identify coercive isomorphism as resulting "from both formal and informal pressures exerted on organizations by other organizations upon which they are dependent and by cultural expectations in the society within which organizations function" (p.150). In terms of mimetic isomorphism, Dimaggio and Powell suggest that imitation occurs as a response to a managerial perception of uncertainty in the environment. In regards to normative, Heugens and Landers (2009) describe normative isomorphism as providing pressures that "harmonize interpretations by ordaining authoritative readings of the 'ongoing stream of happenings'" (p. 63). Normative isomorphism is best characterized by professionalization in the sense that professional credentials (CPA, Ph.D., M.D., etc.) are a source of legitimacy for individuals and organizations.

In their operationalization of Dimaggio and Powell (1983), Haunschild and Miner (1997) offer a slightly different, but very similar perspective to Dimaggio and Powell's (1983) isomorphic processes by suggesting that organizations imitate one another by either adopting practices that are very common; by mimicking organizations that possess traits similar to their own; or by adopting practices that have produced desirable outcomes in other organizations. Haunschild and Miner (1997) label these three types of imitation as "frequency imitation, trait imitation, and outcome imitation" (p. 472). Frequency imitation seems a lot like coercive isomorphism; trait imitation is very similar to mimetic isomorphism; and outcome imitation is reminiscent of normative isomorphism. To study the presence of these three types of imitation, Haunschild and Miner (1997) examined data gathered on investment bankers and found that the three types of imitation "occur independently" (p. 42). Additionally, they examined the moderating effects of outcome salience and uncertainty on the three types of imitation and found

that salience, measured by past premiums, was related only to outcome imitation; whereas, uncertainty, measured by variance in analyst projections, led to frequency imitation. Kraatz (1998) also studied imitation in his study of curriculum changes in private colleges and found that "colleges tended to imitate similar consortium partners that were performing well rather than larger and more prestigious partners" (p. 623).

Isomorphic forces are routinely considered in literature focusing on institutional change and the process of institutionalization. This sort of institutional work is prevalent in the information systems literature related to the adoption and diffusion of new technologies. For example, Shi, Shambare, and Wang (2008) considered isomorphic pressures in their study of the organizational adoption of internet banking systems, and Pearson and Keller (2009) theoretically examined the effects of each of the isomorphic forces relative to the process of diffusion of customer-supporting web technologies across and within organizational populations. Other examples of technology related topics relative to isomorphic pressures are e-commerce use (Gibbs & Kraemer, 2004) and organizational assimilation of enterprise systems (Liang, Saraf, Hu, & Xu, 2007).

More recently, Heugens and Lander (2009) conducted a meta-analysis of institutional theory that specifically examines the prevalence and findings of institutional research that has measured coercive, normative, and mimetic pressures and found that "the adoption of isomorphic templates improves both symbolic and substantive performance" (p. 61). Their findings related to symbolic performance which they define as the extent that positive social evaluations are generated (p. 63) is directly related to the current study in that symbolic performance is usually presented as legitimacy. Heugens and Lander also "identified several factors that moderate

isomorphic processes" (p. 61) such as type of industry (health care, financial services, education, etc.) and geographic location (United States, Europe, and Asia).

The institutional literature reviewed in the previous sections provides a theoretical foundation to support the core purpose of this study which is to examine online business degree programs as an institutional form and specific factors that affect the process of institutionalization. In this sense, traditional academic degree programs are considered as a well established, thoroughly diffused institutional form and its relationship to the emerging institutional form of online business degree programs. Specifically, this dissertation argues that specific factors enact isomorphic pressures in the environment that set the institutionalization process in motion. Each of the three forms of isomorphism is discussed in further detail in the following sections and described in the context of this dissertation.

2.1.2.1 Coercive isomorphism. As the name implies, coercive isomorphism is the result of explicit pressures related to formal rules, sanctions, or monitoring activities (Fligstein, 1985) that organizations must adhere to in order to compete for resources. When an organization becomes dependent upon another entity for the acquisition of resources, the dependent organization is subject to coercive isomorphism. For example, Teo, Wei, & Benbasat (2003) studied the dominance of an organization's suppliers or customers and the intention to adopt interorganizational systems. In the healthcare industry, Galvin (2002) found evidence of coercive institutional change in U.S. health care interest associations, and Provan (1987) studied the adoption of cost containment policies in hospitals. In their study of corrupt financial practices in emerging economies, Venard and Hanafi (2007) found evidence that coercive pressures influence corruption in financial markets. Their study conceptualized coercive forces as the strength of the business system and quality of the legal framework in the local community as

influencing the adoption of corrupt practices, and their data supported their contention that the stronger the business community and legal framework, the less likely organizations would be to engage in corruption due to the coercive pressures applied by these two entities.

Studies of coercive isomorphism have tended to focus on uses related to resource dependence and state influence (Heugens & Lander, 2009). Issues related to resource dependence and state influence are especially relative to the context of this dissertation. In terms of online degree programs, educational providers would presumably respond to coercive pressures and offer online programs in response to student demands or decreases in revenues and funding from traditional sources (e.g. on-campus enrollments, state allocations, etc.).

2.1.2.2 Mimetic isomorphism. Being less explicit than coercive isomorphism, mimetic isomorphism is, in a sense, the organizational form of peer pressure where organizations directly mimic the actions of other organizations much in the same way a teenager would mimic the actions of their peers. With mimetic isomorphism, behavior is often rationalized by assuming the mentality that "If everyone else is doing it, I should be doing it too". This form of isomorphism is related to Scott's (2001) cultural-cognitive pillar of institutions, and has received the most attention of the three forms of isomorphism by institutional theorists (Mizruchi & Fein, 1999). In a meta-analysis that used the total number of effect sizes across ninety studies of isomorphism, mimetic isomorphism was also found to be the most studied of the isomorphic forces (Heugens & Lander, 2009). Basically, mimetic isomorphism suggests that when in doubt of what decisions to make or strategies to pursue, managers will imitate other organizations in the institutionalized environment that "they perceive to be more legitimate or successful" (Dimaggio & Powell, 1983, p. 152). In this regard, educational providers would look to their competition or aspirant institutions to see if they include online programs as part of their curricular offerings.

Empirically, mimetic studies have been done in various areas and in several different contexts such as diversification decisions (Fligstein, 1991); the adoption of a new organizational form (Lee & Pennings, 2002); and adoption of TQM (Westphal, Gulati, & Shortell, 1997). Barreto and Baden-Fuller (2006) examined the relationship between performance and mimetic isomorphism in branching decisions in the retail banking industry and found that banks followed the legitimacy-based groups that they associated with into unattractive branch locations, thus highlighting the "tension between the pressure to conform and the pressure to perform" (p. 1559).

    2.1.2.3 Normative isomorphism. Supporting tradition, maintaining-the-status-quo, and resisting change are all phrases that exemplify the concept of normative isomorphism. This form of isomorphism stems from pressures to conform to an established way of doing things. Often times, normative pressures are less formal (e.g. maintaining tradition); whereas, in other situations, normative pressures are presented more formally. An example of normative isomorphism presented formally in the context of online degree programs would be an accrediting agency such as AACSB in business or ABET in engineering either supporting or resisting the online form of delivery. It is important to note that the distinction between normative and coercive isomorphism in this example is related to resource dependency. From this perspective, the programs described in this example are not dependent upon the accrediting agencies for resources, but are inclined to adhere to their desires in order to gain legitimacy. Lee and Pennings (2002) found evidence that membership with trade associations influenced the adoption of a new organizational form among a group of Dutch professional service firms, and Mezias (1990) examined how the use of professional auditors changed the institutional environment of financial reporting at the Fortune 2000 over time. Related to this, Honig and

Karlsson (2004) considered having a business education as a normative force in the likelihood that founders of new organizations with business educations would be more likely than those without business educations to write business plans.

Each of the three forms of isomorphism discussed in this section is relative to an organization's desire to gain legitimacy in their organizational field. Being perceived as legitimate by competitors, customers, and other stakeholders is often a key variable in an organization's ultimate success or failure (Hannan & Carrol, 1992; George, Chattopadhyay, Sitkin, & Barden, 2006; Kennedy & Fiss, 2009). Just as organizations need legitimacy to survive, new institutional forms must acquire legitimacy for survival as well (Berger & Luckman, 1966). The topic of legitimacy is discussed in further detail in the following section.

2.1.2.4 Norm formation. A connection to institutional theory and specifically the isomorphic forces discussed in the previous sections can also be drawn to literature on norm formation and enforcement. In early work in this area, Sherif (1937) conducted an interesting experiment that tested subjects' perceptions of autokinetic movement of a light in an otherwise dark room. Subjects were asked to indicate the distance that a light moved over repeated presentations. With no established norm, subjects created their own norms that were enforced and followed across different applications of the experiment; however, when the same experiment was applied in group settings with one participant cooperating with the experimenter, a "prestige effect" (p. 91) was noticed. In short, study participants altered their perceptions of how far the light moved based on the socially constructed norms of the group much like organizations respond to isomorphic pressures to conform to established norms of an institutional environment. Feldman (1984) also examined how group norms are established and enforced. Feldman suggested that established norms are enforced if they "facilitate survival" or reduce

uncertainty relative to acceptable behaviors (p. 48). This is related to institutional pressures to conform that organizations are inclined to respond to in order to be viewed as legitimate.

2.2 Legitimacy

As discussed in Chapter 1, legitimacy is the extent to which an institutionalized form is "socially recognized and its existence is taken for granted" (Kuilman & Li, 2009, p. 229). From this perspective, legitimation is needed when institutions are to be passed onto subsequent generations not involved with the initial development of the institution. Berger and Luckman (1966) identify four levels of legitimation: "incipient legitimation" (p. 94); "theoretical propositions in rudimentary form" (p. 94); "explicit theories by which an institutional sector is legitimated in terms of a differentiated body of knowledge" (p. 94); and "symbolic universes" (p. 95). The complexity of an institution increases as it reaches each subsequent level of legitimation. Once an institution has been established and is in need of legitimation to be passed onto the next generation, the institution achieves incipient legitimation which is based on a shared vocabulary that is used to give meaning. As an institution becomes more taken for granted it will continue through the legitmating levels until it becomes a "symbolic universe" (Berger & Luckman, 1966, p. 95). Berger and Luckman (1966) identify a symbolic universe as a "body of theoretical tradition that integrates different provinces of meaning" (p. 95).

Based on this perception, reality is a socially constructed state created in the minds of those that are operating within it and when portions of this socially constructed reality are taken for granted as the status quo and became habit, they become institutionalized. As these institutions are passed from one generation to the next, they are legitimated by levels of increasing complexity until a symbolic universe is created that incorporates "all socially objectivated and subjectively real meanings" (Berger & Luckman, 1966, p. 96). Through

institutionalization, a person's uncertainty associated with how to behave in an institutionalized situation is drastically reduced or eliminated. Similarly, Feldman (1984) identified "carry-over behaviors from past situations" (p. 52) as one explanation for how norms are formed.

Empirically, institutional theory and the effects and influence of legitimacy have been studied and operationalized in various contexts and in different ways. Tolbert and Zucker (1983) examined the adoption of civil service reform programs by cities during the time period of 1880 to 1935 and found that "the adoption of a policy or program by an organization is importantly determined by the extent to which the measure is institutionalized – whether by law or by gradual legitimation" (p. 22). These findings support the Dimaggio and Powell (1983) arguments concerning coercive (by law) and mimetic (gradual) isomorphism by suggesting that organizations in an effort to be perceived as legitimate adopt practices that have been legitimized by law or by general acceptance of society. Deephouse (1996) also found a relationship between isomorphism and legitimacy in his study of bank regulators. Singh, Tucker, and House (1986) and Baum and Oliver (1991) both examined the relationship between organizational legitimacy and the survival or "mortality" (Baum & Oliver, 1991, p. 171) of organizations. Singh, et al. (1986) found that liability of newness is inversely related with organizational legitimacy. In short, the more legitimate a young organization is perceived to be; the more likely they are to survive.

Other studies of legitimacy have been conducted in various contexts and have generally focused on sources of legitimacy. For example, Greenwood, Suddaby, and Hinings (2002) found that professional associations play an important role in effecting organizational change. Dacin, Oliver, and Roy (2007) examined the legitimacy of strategic alliances relative to five different types (market, relational, social, investment, and alliance) of legitimacy and found that "strategic

alliances serve an important legitimating function for firms" (p. 169). In a study particularly relevant to this disseration, Cattani, et al. (2008) argued that legitimacy relies on the consensus of what they refer to as "audiences" (p. 145) about desirable attributes or features that are deemed appropriate for organizations to be perceived as legitimate. They conducted their study in the context of the motion picture industry and found that organizational legitimacy and survival is relative to audience connectivity. This dissertation is similar in that it examines the perceptions of key stakeholders or audiences relative to the legitimacy and specific factors that influence legitimacy of online business degree programs.

This discussion of institutionalization as a byproduct of legitimation is relevant to the basic thesis of this dissertation in that as the rules and processes associated with online degree programs become institutionalized and perceived as legitimate, the extent that online degree programs are taken for granted will increase; consequently, resulting in the online form being assumed as a normal and accepted mode of operation for higher education providers. As a result, organizations that fail to adopt and offer online degree programs will be viewed as less legitimate than those that do.

2.2.1 Legitimacy in higher education.

Being perceived as legitimate has long been a concern at all levels of higher education. University presidents and trustees strive for legitimacy in order to gain favor of donors and state governing bodies; mid-level administrators seek legitimacy for the survival of individual programs; and individual faculty desire legitimacy in their research and teaching. Legitimacy in the context of both traditional and online academic degree programs is discussed in greater detail in the following section.

2.2.1.1 Legitimacy and traditional academic degree programs. Higher education is notoriously resistant to change. Armstrong (2001) notes, "higher education collectively values highly stability and the ability to survive for long periods of time without revolutionary change" (p. 480). Other authors have referred to higher education as "very slow moving, where change can often be measured in years or even decades" (Folkers, 2005, p. 61); or "glacial in its pace" (Levine & Sun, 2002, p. 6). Perhaps the most telling example of the resilience of the traditional model of higher education is Gumport and Snydman's (2002) account of Kerr's (1987) observation that approximately 70 universities established by 1520 still exist today, and that these 70 universities "are still in the same location with some of the same buildings, with professors and students doing much the same things, and with governance carried on in much the same ways" (Gumport & Snydman, 2002, p. 382). The common theme of change in the higher education literature is presented in and operationalized in various contexts such as higher education expansion (Schofer & Meyer, 2005); characteristics and student experiences (Knox, Lindsay, & Kolb, 1992; Eich, 2008); and issues related to cost efficiencies (Robst, 2001). The use of institutional theory in studies of legitimacy in higher education research is also relatively prevalent. For example, Schofer and Meyer (2005) use institutional theory in their study of the worldwide expansion of higher education in the twentieth century. Gumport and Snydman (2002) consider legitimacy in higher education as it relates to the formal organization of knowledge. Their study was based on the stream of the higher education literature focused on change. Specifically, they identify "the analysis of emerging fields (Boxer, 1998; Gumport, 1998; Slaughter, 1997), the analysis of change within established academic fields (Clark & Neave, 1992; Novick, 1998), and the study of curricular change (Conrad & Haworth, 1990)" (Gumport & Snydman, 2002, p. 375) as streams related to their work.

This research related to change in higher education is of particular interest to this dissertation. Katz and Associates (1999) note the importance of change in higher education, "The real question is not whether higher education will be transformed but rather *how* and *by whom*" (p. 1). These authors go on to identify several factors influencing this transformation and predict a bleak future for those institutes of higher education that fail to enact transformation. Katz and Associates (1999) suggest that "Those that bury their heads in the sand, that rigidly defend the status quo or – even worse – some idyllic vision of a past that never existed, are at a very great risk" (p. 1).

2.2.1.2 Legitimacy and online academic degree programs. One major source of change in higher education is the increasing demand for online academic degree programs. As mentioned in Chapter 1, basic evidence that online degree programs are rapidly increasing can be found in a survey conducted by Allen and Seaman (2010) that found that "over 4.6 million students were taking at least one online course during the fall 2008 term, which is a 17 percent increase over the number reported the previous year" (p. 1). Recognition of the ever-increasing interest in online academic degree programs is found in scholarly writings as well as the popular press. A number of factors such as the recession (Kolowich, 2009) and high gas prices (Young, 2008) have been considered relative to the increasing enrollment in online academic degree programs. This growth is not only being seen in community colleges and for-profit providers of education, but also at larger, more prestigious schools. For example, the University of Illinois plans to increase its online enrollments to 70,000 students by the year 2018 (Foster, 2007). Based on these examples, the legitimacy of online academic degree programs seems to be increasing, at least in terms of density.

Although online enrollments and offerings continue to grow, online academic degree programs are not without its detractors. Faculty often categorize online delivery as being inferior in quality to more traditional methods. One study found that instructors rated traditional, face-to-face methods more favorable in terms of "(a) comfort and ability to interact with students; (b) students' opportunity to interact and participate in class discussions; and (c) instruction accommodating different learning styles" (Lee & Busch, 2005, p. 109). Other authors have suggested that "employers often distrust online degrees" (Carnevale, 2007). Specifically, Adams and DeFleur (2005) found that all other things being equal 98% of hiring managers surveyed would hire a job candidate with a traditional degree over one with an online degree (p. 78).

It is interesting to note the discrepancy between the negative perceptions related to the quality of online academic degree programs and increasing enrollments. This dissertation considers the possibility that legitimacy is more important than quality in regards to online academic degree programs. The importance of legitimacy in this context is related to Meyer and Rowan's (1977) contention that even in the face of decreased efficiency, organizations will "decrease internal coordination and control to maintain legitimacy" (p. 340). In short, institutional theory suggests that being perceived as legitimate is more important than being technically efficient.

2.3 Theoretical Development

As previously mentioned, this dissertation examines online business degree programs as an emerging institutionalized form in relation to its cognitive legitimacy (taken-for-grantedness) and sociopolitical legitimacy (appropriateness) as it relates to the existing institutional form of traditional academic degree programs. Hypotheses and supporting logic related to these two forms of legitimacy are provided in the following two sections.

2.3.1 Cognitive legitimacy.

This dissertation takes the position that the creation of a new institutional form is emerging in the context of higher education with regards to online academic degree programs. Specifically, this dissertation provides an empirical test of institutional theory by identifying four specific variables (accreditation, reputation, placement after graduation, institutional linkages) that directly and positively influence the institutionalization and subsequent legitimation of online business degree programs. The perceived legitimacy and impact of each of these variables relative to online business degree programs is assessed from the perspectives of four key stakeholder groups: students, academic faculty, academic administrators, and business practitioners. Prior to studying the impact of each of these variables, this dissertation establishes that online business degree programs are being established and accepted as a new institutional form in that the stakeholder groups view these programs as cognitively and socio-politically legitimate.

As previously described, cognitive legitimacy refers to the extent that an institutionalized form is considered to be taken-for-granted. The concept of taken-for-grantedness in its most basic form and understanding can be assessed "by measuring the level of public knowledge about a new activity" (Aldrich & Fiol, 1994, p. 648). In the case of online academic degree programs, the level of public knowledge appears to very high and increasing across all of the stakeholder groups considered in this dissertation. Basic evidence of this can be found in references to online education in the popular media and press. Popular news outlets such as *U.S. News and World Report, Time, USA Today,* and *ABC News* have all reported on the trend towards online academic degree programs to a mass market audience. For example*, U.S. News and World Report* now includes rankings and analysis of online programs on their website and in

their annual rankings of schools and universities. They have gone as far as to state that online education is experiencing "meteoric growth" (Greer, 2010). Much of this is based on the 2010 findings of Allen and Seaman's work for the Sloan Consortium's annual study of online education in the United States that found that over the past six years online enrollments have show significant increases every year. As mentioned previously in this chapter, the 2010 report found that in the 2008-2009 school year over 4.6 million students, which is more than one in four higher education students, were taking online courses resulting in a 17% increase over the previous year.

In a more academic, theoretical approach to the study of online education as an institutional form in community colleges, Cox (2005) examined the contention that there are a set of "taken-for-granted ideas about online education" (p. 1754) that serve as mechanisms for the legitimation of online programs. The taken-for-granted, institutional "myths" that Cox considered in her study focused on the topics of access, competition, and technological literacy as they relate to online academic degree programs. Her study found that academic administrators relied on these myths to rationalize the development of online programs. Brooks (2009) also notes competition, demand from students for access and convenience, and utilization of available technology as justifications for the development of online programs.

Based on general public awareness, coverage in popular press and media outlets, and the trending growth of online academic programs over the past decade, it seems reasonable that online business degree programs have attained cognitive legitimacy. Therefore, the following relationship is predicted:

H1: *Students, faculty, academic administrators, and business practitioners will all perceive online business degree programs as cognitively legitimate.*

2.3.2 Socio-political legitimacy.

Related to but separate from the cognitive legitimacy of online academic degree programs is the extent that key stakeholders consider the institutional form of online education to be an appropriate and desirable form for colleges and universities to adopt. It is conceivable that although the practice is generally recognized as being a taken-for-granted form by some stakeholder groups, other stakeholder groups could perceive the adoption of the institutional form as inappropriate and undesirable. Taken from a different context, businesses developed around the distribution of illegal goods and/or services (e.g. drugs, prostitution, gambling, etc.) can be considered as taken-for-granted and thus cognitively legitimate based on the public awareness of their existence; however, these illegal businesses would generally not be considered appropriate by society as a whole, and as result, not achieve socio-political legitimacy. In the case of online academic degree programs, the perceived level of appropriateness is less clear-cut in that there is potentially some disagreement across stakeholder groups relative to the perceived appropriateness of online business degree programs. Specifically, the student and academic administrator stakeholder groups are more likely to perceive online business degree programs as appropriate, than are the academic faculty and business practitioner groups.

As already documented throughout this dissertation, students are increasingly demanding and participating in online education. Based on this, one could conclude that students view online education as an appropriate and desirable means of earning an education. In a study of students who had completed both online and traditional courses, Wyatt (2005) found evidence that the students perceived online education to be a "quality academic experience" (p. 460) and to be "more academically demanding than traditional classroom instruction" (p. 460). Dobbs,

Waid, and Carmen (2009) found similar results in their study of students' perceptions of online education. Their study compared the perceptions of two student groups: 1) students that had participated in online education; and 2) students that had not. Not surprisingly, the study found that students that had participated in online courses had a more favorable impression of online education, but the difference between the groups was primarily a matter of strength of relationship and not a disagreement in direction, which lead those authors to conclude, "Clearly online learning has its place in higher education today and, for some, provides a viable choice and an enriching experience" (p. 23).

Academic administrators' impressions of online academic degree programs are less obvious and a bit more difficult to predict. There is evidence to suggest that when academic administrators are faced with faculty hiring decisions they are inclined to view faculty candidates that earned a doctoral degree online as lower quality if they were even considered (Adams, 2008). However, there is evidence that academic administrators have a paradoxical view of online academic degree programs. Gaytan (2009) examined the perceptions that academic administrators had of online instruction and found that academic administrators place a high value on online versions of distance education, but at the same time, felt that traditional methods were preferable and that the quality of online instruction was inferior to that of traditional methods. The Gaytan study suggests that although academic administrators perceived online education to be inferior, they still felt it was important to their institution's success. Allen and Seaman's (2009) findings that the chief academic officers of over 70% of public schools surveyed reported that "online education is critical to the long-term strategy of my institution" (p. 10) support this contention.

This suggests that although academic administrators may be skeptical about the quality of online academic degree programs relative to a traditional, face-to-face learning environment, they perceive this institutional form as an appropriate and imperative long-term strategy. This paradox between perceived quality and perceived necessity is likely due in large part to the isomorphic pressures academic administrators are experiencing as a result of a reduction in state appropriated funding, student demands, and the adoption of academic degree programs by benchmark, aspirant, and competitor schools. Based on these factors, it is predicted that the pressure to conform to mimetic and coercive isomorphic pressures and the potential of increasing student enrollment will result in academic administrators accepting online academic degree programs as appropriate. Therefore, the following relationship is predicted:

H2: – *Students will perceive online business degree programs as socio-politically legitimate.*

H2a: A*cademic administrators will perceive online business degree programs as socio-politically legitimate.*

The academic faculty and business practitioner stakeholder groups are more inclined to be more skeptical of the appropriateness of online academic degree programs. Seasoned and experienced academic faculty that have been trained and have managed their careers in the context of the long-established institutional form of traditional, face-to-face education naturally resist any new institutional form that creates uncertainty and potentially threatens their role and identity as a faculty member (Scott, 2001; Lawrence & Suddaby, 2006; Maguire & Hardy, 2009). Several studies (Allen & Seaman, 2008, 2010; Seaman, 2009) have consistently shown that academic faculty do not view online education as appropriate. Accounts of faculty displeasure with teaching online are abundant. Clift (2009) documented her strong aversion to her online teaching experience in an essay that she wrote for the *The Chronicle of Higher Education* that she titled "I'll Never Do it Again". Benton (2009) alluded to strong isomorphic

pressures to conform to traditional methods by suggesting that a faculty's professional reputations are potentially at risk when they teach online. This suggests that faculty perceptions of online academic degree programs are not merely apathetic or marginally skeptical, but in some cases, they are contentious.

Although their opinions are not as strong as academic faculty, business practitioners have historically expressed a general distrust and reluctance to hire applicants with online degrees (Carnevale, 2007). Peat and Helland (2004) found evidence to support that the perception of online forms of education as inferior to traditional forms negatively influenced hiring decisions, and in Columbaro and Monaghan's (2009) review of "five published and two unpublished complete empirical studies" (p. 2) on the topic, they found what they referred to as a "marked stigma attached to online degrees throughout the hiring process" (p. 6). One could argue that as the number of graduates from online academic degree programs increases and enters the workforce, business practitioner perceptions will evolve and become more accepting of job applicants that earned their degrees online, but there is no clear empirical evidence that this is currently taking place. Therefore, the following relationship is predicted:

H2b: – *Faculty will not perceive online business degree programs as socio-politically legitimate.*

H2c: – *Business practitioners will not perceive online business degree programs as socio-politically legitimate.*

2.4 Factors Affecting the Legitimacy of Online Business Degree Programs

Assuming the general level of legitimacy for online academic degree programs described in the previous sections, the following sections focus on four specific variables that are thought to influence the perceived legitimacy of online business degree programs as a taken-for-granted and appropriate institutionalized form.

2.4.1 Accreditation.

The first factor thought to influence the perceived legitimacy of online business programs is accreditation. Armstrong (2001) suggested that credentialing through accreditation is important in higher education as it provides external evidence of a program or school's quality. Keller (2008) made a similar argument by suggesting that credentialed or accredited online academic degree programs are more likely to enhance traditional institutions' core competencies. Academic accreditation can be obtained at the school or university level and at the functional or departmental level. For example, accreditation could be granted at the university or collegiate level by the Southern Association of Colleges and Schools (SACS); its business school could be accredited by the Association to Advance Collegiate Schools of Business (AACSB International); and its engineering program could be accredited by ABET. Obtaining each level of accreditation requires a fairly rigorous approval process where the respective accreditating agencies apply normative isomorphic pressures to conform to very specific criteria and measures of quality. To the extent that key stakeholders perceive accreditation as signal of quality, the stronger the normative isomorphic pressures on accredited entities to conform. In higher education, accreditation is an institutional symbol of legitimacy. In the context of business schools, Romero (2008) suggested that due to increasing number of schools offering business programs, the AACSB accreditation credential is "more important than ever" (p. 245). Similarly, Julian and Ofori-Dankwa (2006) noted that business schools are moving towards what they termed as "accreditocracy". They compared an accreditocracy to a traditional bureaucracy and suggested that the accountability and documentation requirements enforced by accreditating agencies increase the perceived legitimacy of all programs to external stakeholders.

When possible and appropriate, schools attempt to leverage their traditional accreditation credentials towards the promotion and marketing of their online offerings. Gambescia and Paolucci (2009) studied the ways that schools with online offerings communicated and marketed their online programs and found that when accredited schools and/or programs were able to incorporate their online offerings into their traditional accreditation credential, the schools overwhelmingly highlighted the fact in their promotions. Based on this, it seems logical that online academic degree programs that have earned a recognized accreditation credential will be perceived as more legitimate than non-accredited online academic degree programs by all stakeholder groups. Therefore, the following relationship is predicted:

H3: *Accredited online degree programs will be perceived by key stakeholders as more legitimate than non-accredited programs.*

2.4.2 Reputation.

The second factor thought to influence the perceived legitimacy of online academic degree programs is the established reputation of the school or university providing online education. The importance of an organization's reputation, in any context or industry, is well established in the literature. Jensen and Roy (2008) define reputation as "the prestige accorded firms on the basis of how they have performed in the past" (p. 497) and point out that a firm's reputation creates expectations about future performance based on past performance. Although reputation and legitimacy are closely related, the relationship between reputation and legitimacy can be described by indicating that reputation is an emotional perceptual estimation of a firm; whereas, legitimacy is a broader concept that focuses on adherence to social norms (Deephouse & Carter, 2005; Dacin, Oliver, & Roy, 2007). From this perspective, reputation and legitimacy are clearly related but distinct with reputation being an influential factor in the overall perception of a firm's legitimacy.

Reputation is especially important in higher education. It has been well documented that colleges and universities aspire to receive high rankings from national entities like *U.S. News and World Report* in order to increase and exploit reputational standing (Sauder & Fine, 2008). Recently, Bowman and Bastedo (2009) found a causal relationship between rankings and subsequent student admission, and Bastedo and Bowman (2010) found that published rankings have a significant impact on future assessments of quality, performance, and reputation. Safon (2007) found some evidence that a business school's reputation is a more important factor to recruiters than the perceived value of the program. This suggests that recruiters in some instances are more likely to recruit students from programs with good reputations than they are from programs that are perceived be valuable but less reputable.

This importance placed upon reputation is being applied to online education as well. For example, the *U.S. News and World Report* is now ranking online academic degree programs as is the Online Education Database (OEDb). The OEDb uses eight metrics (retention rate, graduation rate, acceptance rate, student-faculty ratio, percentage of students receiving financial aid, scholarly citations, and how many years the institution has been accredited) to rank online academic degree programs (Kolowich, 2009). Although these rankings are not the only factor in reputation, they certainly are influential in reputational development. Armstrong (2001) also notes the importance and cyclical nature of reputation in higher education. Reputation seems to create a self-reinforcing feedback loop where as schools develop their reputations over time, more highly qualified students are attracted to enroll, and as those students enter the workforce, more prestigious organizations will be attracted to hire those graduates which will result in a reputational increase. From this perspective, the reputation that an online academic degree

program develops over time in terms of rankings and past performance will have a positive effect on the perceived legitimacy of the program. Therefore, the following relationship is predicted:

H4: *Online degree programs that are perceived by key stakeholders to have good reputations will be perceived as more legitimate than those programs with poor reputations.*

2.4.3 Placement after graduation.

The third factor thought to influence the perceived legitimacy of online academic degree programs is the program's ability to assist its graduates in securing employment opportunities. One key factor influencing a student's choice to pursue a post-secondary education is to secure a career and presumably earn a higher salary upon graduation than would have otherwise not been possible with only a secondary education. Research conducted by The Higher Education Research Institute (2010) found that 56.5% of college freshmen indicated that "graduates get good jobs" (p. 2) as a very important factor in college choice. This would especially seem to be true in a poor economy. Online academic degree programs offer more convenient access to students that are interested in earning a degree for possible career advancement than traditional offerings. Allen and Seaman (2008) note the influence that the economy has on online education, "higher education institutions believe that negative economic news is good news for both overall and online enrollments" (p. 9) as decreased opportunities for employment encourage out-of-work students to pursue education and those currently working to increase their advancement potential through additional education. It is logical to assume that students under these conditions would be primarily interested and concerned with the placement record of the programs in which they are enrolling, and as a result, would view programs that placed a high percentage of its graduates as more legitimate than programs that do not.

High placement rates would also serve as a signal of legitimacy to business practitioners when considering online degreed candidates for positions. To the extent that business

practitioners are aware that other organizations they perceive to be legitimate are hiring a

program's graduates, business practitioners would be more likely to respond to mimetic

isomorphic pressures and be inclined to view the program and its graduates as legitimate.

Therefore, the following relationship is predicted:

H 5: *Online degree programs that are perceived by key stakeholders to have high levels of placement after graduation will be perceived as more legitimate than programs with low levels of placement after graduation.*

2.4.4 Linkages.

The fourth factor thought to influence the perceived legitimacy of online academic degree

programs is the online program's linkages to other entities that are perceived as legitimate.

Compared to private for-profit and private not-for-profit, traditional public schools and

universities are the largest provider of online programs (Allen & Seaman, 2008). When an online

program is linked to an established, traditionally legitimate school, the online program's

perceived legitimacy increases as a result of the connection. Gambescia and Paolucci (2009) note

the importance of these types of linkages when describing common ways that universities

promote and communicate their online offerings. They report that traditional schools attempting

to transfer legitimacy to their online offerings often use language such as "the same curriculum"

or "the same faculty" to highlight the linkage to the school's traditional programs. To the extent

that traditional programs are perceived as legitimate, online academic degree programs will

benefit, in terms of perceived legitimacy, as a result of the linkage.

Linkages to more legitimate entities external to the school or university also serve a

legitimating function. Baum and Oliver (1991) examined the linkages concept by suggesting that

the primary way for young organizations to achieve legitimacy is through its relationships or

"linkages" with other, more legitimate organizations. Their study of Toronto childcare

organizations confirmed this hypothesis. More recently, a stream of institutional literature has emerged that is similar to the "linkages" concept studied by Baum and Oliver (1991). This stream of literature examines "legitimacy spillovers" (Ruef, 2000, 2004; Dobrev, Ozdemir, & Teo, 2006; Li, Yang, & Yue, 2007; Kuilman & Li, 2009). Legitimacy spillovers are explained by Kuilman and Li (2009) as occurring "when greater social recognition for one organization (or group of organizations) leads to similar organizations receiving greater social recognition as well" (p. 229). In the context of this dissertation, linkages and spillovers would be very similar to an online degree program establishing a partnership with a corporate entity to provide capital resources, encourage its employees to enroll in the program, and/or hiring graduates of the program. Therefore, the following relationship is predicted:

H6: *Online degree programs that are linked with a more legitimate entity will be perceived by key stakeholders as more legitimate than programs that are not.*

This chapter began with a review of the institutional theory literature that serves as the theoretical foundation for the predicted relationships principle to the arguments of this dissertation. The chapter concludes with a set of stated hypotheses concerning the cognitive and socio-political legitimacy of online academic programs as well as four specific program attributes considered as influential to a program's degree of legitimacy. Chapter 3 describes the specific methodology proposed for testing the hypotheses presented in this chapter.

CHAPTER THREE

RESEARCH METHODS AND DATA COLLECTION

As stated in previous chapters, this research is designed to examine the extent that key stakeholder groups (students, faculty, academic administrators, business practitioners) perceive online business degree programs to be legitimate, and the degree to which four factors (accreditation, reputation, placement after graduation, linkages) influence these perceptions. Being that the basic question examined in this research is perceptual in nature, the hypotheses were tested using a combination of survey (H1- H2c) and conjoint analysis (H3-H6) methods.

The first section of this chapter defines the stakeholder groups and establishes them as four distinct subsamples; explains the approach and sources for recruiting participants for the pilot test and full study; and describes the procedures for executing the study. The second section (section 3.2) of this chapter addresses issues related to the various measures that were used in testing of the stated hypotheses. Specifically, section 3.2 describes the survey instrument used in testing the hypotheses related to cognitive and socio-political legitimacy; provides background information about the conjoint analysis technique as well as the specific conjoint experiment task and variables; and addresses issues related to the reliability of both the survey and conjoint instruments. Section 3.3 concludes this chapter by introducing the statistical methods that were used to analyze the data after collection.

3.1 Participants and Procedure

This study examines the perceptions of four groups (students, faculty, academic administrators, business practitioners) identified as key stakeholders to online business degree programs; consequently, participants for this study were composed of subsamples of members from each of these groups. By using participants that are actually part of the groups being studied

(expert judges), the external validity and generalizability of the results should be increased (Shepherd & Zacharakis, 1997; Aimen-Smith, Scullen, & Barr, 2002).

3.1.1 Subsample definitions.

Definitions of each of the subsamples included in this dissertation were devised relative to the survey and experimental task presented to each group. First, the *student* subsample is defined as individuals currently enrolled in some level of post-secondary coursework at post-secondary provider of education that offers AACSB accredited business curriculum. Second, the *faculty* subsample is identified as individuals that currently hold instructional positions at a post-secondary provider of education that offers AACSB accredited business curriculum. Third, the *academic administrator* subsample is defined as individuals currently in decision making positions at the level of department chair or above at a post-secondary provider of education that offers AACSB accredited curriculum. Fourth, the *business practitioner* subsample is defined as individuals currently in professional positions outside of academia.

3.1.2 Pilot test.

The conjoint experiment and post-experiment questionnaire was pilot tested on doctoral students and a limited number of individuals from each of the subsamples. Recruitment of participants for the pilot test was largely based on personal and professional contacts that I have developed as a previous academic administrator, doctoral student, and current faculty member. Every attempt was made to include representatives from each of the four subsamples with demographics (e.g. age, gender, academic discipline, etc.) representative of the total population. Suggestions relative to questionnaire items as well as the wording of any descriptions and instructions were considered.

3.1.3 Recruitment.

All subsamples were recruited via email and were asked to participate in the research by following a link provided in the email to the online instruments designed for this project. The goal was to have a minimum of 50 participants (200 total) in each of the four subsamples.

Recruitment of participants for the faculty and academic administrator groups was based on a random sample of the 478 institutions of higher education that offer AACSB accredited business programs. The list of AACSB accredited schools was randomly ordered and faculty and academic administrators from the randomly ordered institutions were contacted. Faculty and academic administrator emails were obtained from the specific schools' websites. Ten faculty, two each from the traditional AACSB disciplines (accounting, finance, management, marketing, information systems), and individuals identified on the specific schools' websites as academic administrators were targeted with an overall faculty and academic administrator contact target of 500 each in the first round of recruitment. If the targeted minimum of 50 participants had not been met, additional faculty and academic administrators would have been contacted in increments of 100. In this case, one round of recruitment exceeded the targeted minimum of faculty and academic administrator participants.

In an attempt to recruit student participants, faculty participants were asked if they would be willing to make the study available and encourage their students to participate. Five faculty initially indicated they would be willing to assist with the recruitment of their students, but later declined due to issues of semester timing and concerns relative to the protection of human subjects policies at their specific universities. As a result, 112 students enrolled in business courses at a single four-year state university in the south eastern United States were asked to participate. Students were offered extra credit for their participation.

Business practitioners were recruited through the Kentucky Small Business Development Centers network and members of the Christian County, Kentucky Chamber of Commerce. Contacts within these two groups were asked to participate in the research themselves as well as forward the research request to other potential participants in their professional networks. Through this snowball technique, 101 business practitioners were contacted and asked to participate.

3.1.4 Procedure.

The research instrument was developed and administered to participants via an interactive online system. The email briefly described the project, indicated the expected amount of time to complete the experiment, and provided a hyperlink to the online instrument.

This study is divided into three main parts. Part one of the study asked participants to provide basic demographic information (See Appendix A). Part two was designed to measure the degree that participants in each of the four subsamples perceive online business degree programs to be cognitively (H1) and socio-politically (H2-H2c) legitimate (See Appendix B). Part three of the study used the conjoint analysis method to measure the effect that varying levels and combinations of four online business degree program attributes (accreditation, reputation, placement after graduation, physical linkage) have on the overall legitimacy perceptions of participants in each of the four subsamples (H3-H6). Each participant was provided a short description of the conjoint task, basic instructions, and assumptions relevant to the conjoint task. Specifically, participants were instructed to assume they were acting in today's economic environment; furthermore, it was acknowledged that not all variables important to the decision were included, and participants were urged to consider any other influential factors, not included in the research, as constant and "satisfactory" across all profiles (Norwood & Henneberry, 2006;

Patzelt & Sheperd, 2009). Participants were also presented information relative to the definitions and descriptions of the levels of each variable. (See Appendix C for conjoint task materials.) Upon completing all three parts, participants were presented with a post-experiment questionnaire to assess their level of commitment and understanding of the tasks they completed (See Appendix D). Finally, they were thanked for their participation and provided the opportunity to provide any additional comments related to the legitimacy of online business degree programs or the design of the study.

3.2 Measures

3.2.1 Control variables.

In an effort to control for any influence of individual differences relative to the respondents and/or their organizational settings may have had on the data gathered in this research, basic demographic information specific to each subsample was collected. Of specific interest to this dissertation, Royne (2008) noted the importance of controlling for usage in this type of research. In the context of this research, usage refers to the participant's degree of experience with online business programs. It is reasonable to assume that participants' perceptions of online business programs will be influenced by their personal experience or usage of that type of delivery; consequently, respondents were asked to provide information regarding their previous experience with online business programs. Specific control variables are outlined in Table 3.1 and provided in Appendix A.

Table 3.1
Summary of control variables

Control
All subsamples
Gender
Age
Ethnicity
Marital status
State of residence
Education level
Online course experience
Student subsample
School currently attending
Student classification
Faculty subsample
School currently on faculty
Online teaching experience
Current faculty rank
Academic administrator subsample
School currently serving as administrator
Current administrative position
Online teaching experience
Business practitioner subsample
Organization size
Hiring responsibilities

3.2.2 Part 1 - Cognitive and socio-political legitimacy questionnaire.

Due to the lack of existing measures that directly assess stakeholders' perceptions of legitimacy of online business degree programs, survey items were created for each of the four subsamples with the goal of developing face-valid, internally consistent measures of cognitive and socio-political legitimacy as it relates to online business degree programs. Similar items from two studies from the institutional theory literature (Liang, etal., 2007; Shi, etal., 2008) and two from the higher education literature (Seaman, 2009; Allen & Seaman, 2010) were used to develop the items used to measure the legitimacy related perceptions indicated in H1-H2c. A 5-point Likert-type scale was used with strongly agree and strongly disagree serving as the end points.

3.2.2.1 Part 1 – Dependent variables. The two dependent variables studied in part one of this study are cognitive legitimacy and socio-political legitimacy. *Cognitive legitimacy* is defined as the perceived taken-for-grantedness of the existence of online business degree programs. Items relative to participants' knowledge of the existence of online business degree programs were included. For example, participants were asked "It is taken for granted that business programs are offered online." *Socio-political legitimacy* is defined as the perceived appropriateness of online business degree programs and was measured with items created specifically for each of the subsamples. Examining each of the subsamples separately, socio-political legitimacy can be more specifically directed to decisions that members of each group are likely to make. Following the logic that choosing to engage in a specific behavior implies a perception of appropriateness, the socio-political measures were based on participants' likelihood of specific behaviors. The use of behavioral likelihood measures is consistent with Liang, etal.'s (2007) measure of "top management beliefs" in their study of institutional pressures of adopting ERP systems, and Shi, etal.'s measure of "intent" in their study of adopting internet banking systems. Specifically, *students* were asked to respond to questions relative to their likelihood of enrolling in an online business program; *faculty* were asked questions relative to their likelihood of advising students to enroll in an online business degree program; *academic administrators* were asked questions relative to their likelihood of supporting the development of online business degree programs at their institutions; and *business practitioners* were asked to indicate their likelihood of hiring an otherwise qualified job applicant that earned their academic credential from an online business degree program. The items for each of the subsamples represent decisions that are relevant in the current academic and professional environment. Specific items for each of the subsamples are provided in Appendix B.

3.2.2.2 Part 1 – Reliability. A reliability analysis was conducted on the items in the cognitive and socio-political legitimacy questionnaire to ensure internal consistency of the items for each of the subsamples. Coefficient alphas are provided in Chapter 4 for each construct as well as factor loadings of the items for each subsample.

3.2.2.3 Part 1 – Statistical method. Wilcoxon's matched-pairs signed ranks test was used to test the hypotheses in part one of this study. Wilcoxon's tests the null hypothesis that two related samples are the same and is especially useful in tests related to central tendency (Zikmund, 2003; Howell, 2007). In this context, this provides a means to test the significance of the difference between responses above the median and responses below the median. This test is considered the "most popular nonparametric test for matched groups (or paired scores)" (Howell, 2007, p. 654).

3.2.3 Part 2 - Conjoint analysis background.

Conjoint analysis is an experimental technique that forces respondents to make decisions based on different factors identified as being influential to the decision being made. In a metric conjoint experiment, respondents are provided a hypothetical decision situation composed of various levels of attributes that have been identified as key factors in making the decision (Monsen, Patzelt & Saxton, 2010). Denstadli and Lines (2007) explain the additive nature of the factors in conjoint experiments by noting that respondents "combine the information in a conjoint profile into an overall evaluation that in turn forms the basis for his/her preference statement of choice" (p. 117). In the context of this dissertation, respondents were asked to make a series of judgments or tradeoffs relative to their perceptions of online business degree programs based on various combinations of the factors described in chapter 2. These individual decisions or judgments can then be analyzed to determine the importance or strength of each of the four

factors in the context of the decision being made in the experiment. From this perspective, conjoint analysis is well suited to capture the perceptions of each of the four stakeholder groups (students, faculty, academic administrators, business practitioners) being studied.

In practice and research, conjoint analysis is widely used in marketing applications and academic research contexts to attempt to understand individual preferences in consumer purchase decisions (Ding, Park & Bradlow, 2009). The use of conjoint analysis in organizational and management research is limited; however, management scholars are beginning to recognize it as a valuable and appropriate technique. In organizational research, conjoint analysis has been used primarily to examine employee behaviors relative to work decisions. For example, conjoint analysis has been recently used to determine the effect that tax complexity has on employee's choice of pension plans (Blaufus & Ortlieb, 2009); factors affecting workers' choices between job offers from nonprofit and for-profit job organizations (Lanfranchi, Narcy, and Larguem, 2010); and the incentive related factors that influence employees' decisions to engage in corporate entrepreneurship projects (Monsen, Patzelt, & Saxton, 2010).

Also related to this dissertation is the use of conjoint analysis in the higher education literature. In the context of higher education, conjoint analysis has been used from the perspective of student recruitment to determine the factors that students demand when choosing between different programs (Mark, Lusk, & Daniel, 2004); to determine the ideal package of services to offer in an adult education program (Howard & Sobol, 2004); the factors most influential to students when evaluating an instructor's level of teaching effectiveness (Pietrzak, Duncan, & Korcuska, 2008); and specific factors that influence college students' choice of academic major (Beggs, Bantham, & Taylor, 2008).

Of particular interest to this dissertation are three studies that employed conjoint analysis in applications similar to the ones considered for this dissertation. In the context of online business degree programs, a 2005 study conducted by Chung-Hung examined the factors that influence employed-learners to enroll in online MBA programs and found that the two most important factors for choosing to enroll were "the degree accredited and seen as legitimate" (p. 203). The second example of research that used conjoint analysis especially relevant to this dissertation was presented in the context of the decision to hire recent college graduates. Norwood and Henneberry (2006) asked employers to consider two hypothetical job candidates that possessed a range of different attributes (e.g. internship/experience, GPA, willingness to relocate, etc.). Next, the researchers asked students to indicate their perceptions of what attributes they believed to be important to employers and then compared the results across the two groups, and found that the perceptions of what attributes were important to the hiring decision were generally the same across the two groups, with "multiple language skills" (p.491) being the "major misperception" (p. 491) where students ranked it as the second most important attribute and employers ranked it as the fifth most important (p. 491). Another study, Adams and DeFleur's (2005), that used conjoint analysis to test the "acceptability of a doctoral degree earned online as a credential for obtaining a faculty position" (p. 71) is perhaps the most relevant example of this research method for this dissertation. The relevance of this study to this dissertation is related to the authors' findings that hiring committee members overwhelmingly perceived doctoral candidates who earned their degrees from a traditional program to be superior to those earning degrees from an online program even though the study participants indicated that "having experience teaching an online course is important" and that possessing "this kind of skill is a plus in a hiring situation" (p. 82). These findings relate to the hypothesized differences

across certain stakeholders groups as it relates to cognitive and socio-politically legitimacy. In short, findings such as this support the contention that certain groups (e.g. faculty and academic administrators) acknowledge the existence and the potential necessity of online business degree programs, but have different perceptions concerning the appropriateness of such programs. These examples of conjoint analysis being used in research similar to this dissertation suggest that this technique is appropriate in testing the theoretical model developed in Chapter 2.

In addition to the issues of relevance already described, conjoint analysis has been chosen for this research due to the methodology's key strengths. First, relative to post hoc methodologies like surveys and questionnaires where participants indicate preferences of factors individually, conjoint analysis presents all factors together and requires participants to make tradeoff decisions across the factors. This type of process forces participants to indicate the degree they are willing to sacrifice one valued factor for another valued factor (e.g. reputation for placement after graduation) (Brown, Swinyard, & Ogle, 2003; Aiken & Koch, 2009). By requiring participants to make decisions, proponents of conjoint analysis suggest this approach is a stronger measure of decision making behavior than post hoc methodologies such as surveys and interviews where issues related to self-report bias and introspection are common (Monsen, Patzelt, & Saxton, 2010). Additionally, conjoint analysis provides the ability to measure the relative strength of each individual attribute. The ability to analyze part-worth preferences of individuals within group as well as the overall, aggregate preferences of the group is especially well suited for this dissertation. As with most experimental research, the internal validity of conjoint experiments is generally high due to the researcher being able to fully control the presentation of the stimuli which increases the likelihood that the observed relationships are an

actual product of the factors being studied rather than being influenced by unaccounted for extraneous factors (Zikmund, 2003).

Although this method has a number of strengths, it is not without its limitations. The most notable limitation is related to issues of external validity in that the controlled, hypothetical nature of the decision situation "is not a perfect representation of the choice process" (Aiken & Koch, 2009, p. 83). Although the hypothetical profiles in conjoint experiments are designed to be as realistic as possible, they are not real-world situations; consequently, critics often argue this reduces the external validity of these types of experiments. However, Monsen, Patzelt, and Saxton (2009) have noted that "despite the fact that these experimentally manipulated scenarios can result in unrealistic combinations, research has demonstrated that this does not significantly affect realistic decision making" (p. 113).

Another potential limitation and criticism of conjoint analysis is the possibility that respondents will view the factors presented as important simply because they are included in the profile and would not otherwise consider these factors when making this type of decision (Patzelt & Shepherd, 2009). A similar critique has also been made suggesting that additional variables important to the decision are likely to be omitted. These critiques of conjoint analysis are not without merit; however, every attempt has been made to include attributes that are both theoretically and practically relevant. Louviere (1988) notes that there is "no 'best' approach to attribute identification" (p. 50), but it is generally accepted that chosen attributes should be grounded in theory and relevant literature (Aiken & Koch, 2009; Blaufus & Ortlieb, 2009) and be realistic and relevant to the decision task (Dijkstra & Timmermans, 1997; Aiken & Koch, 2009). As indicated in Chapter 2, the theoretical grounding of each of these attributes are well established in the literature as being influential factors in the perceptions and opinions in

decisions similar to the ones in this research. Additionally, opinions on attributes were gathered from members representative of each of the four groups studied in this research. These "experts" were asked to list factors or criteria that they would consider in determining the legitimacy of any (regardless of discipline or method of delivery) academic degree program. Each factor mentioned was counted and ranked and then confirmed by a separate group of stakeholder members. The four factors included in this research were the four factors most often mentioned and ranked as most influential factors in both testing groups. Gathering opinions of these "experts" increases the likelihood that these factors are realistic and influential in this type of decision task.

> ***3.2.3.1 Part 2 - Conjoint experiment.*** As described in the previous section, conjoint analysis experiments are based on the hypothetical situations (stimuli) that force participants to engage in decisions concerning a dependent variable relative to various combinations of attributes (independent variables). There are different approaches to conjoint analysis (traditional, choice-based, adaptive) with each having its intricacies and appropriate conditions. The traditional approach to conjoint analysis is a full factorial design where every member of the sample is exposed to the complete set of scenarios, including all variable combinations. Since each participant must evaluate every scenario in the traditional approach, the number of attributes and levels must be limited to avoid issues related to boredom and fatigue of respondents. The traditional approach is generally used in studies containing a maximum of nine factors, but typically six or less are believed to be more realistic in terms of what respondents can be expected to respond to before engaging in some sort of simplification strategy (Orme, 2009). Louviere (1988) suggested that unless participants are offered considerable incentive, thirty-two should be the maximum number of treatments or scenarios for the traditional approach (p. 58).

Other forms of conjoint analysis like the adaptive and choice based approaches have been designed to allow researchers to include more attributes and attribute levels. The choice based approach is extremely popular in consumer purchase research because it requires respondents to choose between two brands or products based on a number of attributes, typically including price. Adaptive approaches to conjoint are fractional (rather than full) factorial designs. In these types of designs, more factors are possible, but participants are only exposed to a random sample of the possible scenarios. This sort of approach requires a larger sample size than full factorial designs. This dissertation uses the traditional, full factorial approach to conjoint analysis. The full factorial design (2 x 2 x 2 x 2) is possible because the number of attributes (four) and number of profiles (sixteen) falls well within the limits of what has been shown to be reasonable for participants.

     3.2.3.2 Part 2 - Dependent variable. The dependent variable in part two of this study is the participant's perception of the overall legitimacy of online business degree programs and was measured through the conjoint experiment described above. The conjoint experiment in this dissertation consisted of sixteen hypothetical profiles that consisted of four, two level attributes (independent variables) and a scale in which participants from all four subsamples indicated their perception of the overall legitimacy of online business programs relative to the various levels and combinations of attributes. A metric rating scale was used to capture perceptions of the participants. As recommended by Louviere (1988), an 11-category rating scale was used with not very legitimate and very legitimate serving as the end points. Louviere (p. 56) notes that the "number of rating categories is determined by the number of treatments", and indicates that for studies with sixteen or fewer treatments, as is the case of this dissertation, an 11-category rating scale is sufficient for "subjects to discriminate among the treatments" (p. 56). A sample scenario

including the rating scale is provided Table 3.2 below; furthermore, the experiment instructions,

attribute descriptions, and a sample scenario are all included in Appendix C.

Table 3.2
Sample scenario for conjoint task

Indicate your perception of the legitimacy of an online business degree program that has the following characteristics: ACCREDIDATION: YES- The program is accredited by an appropriate external entity. REPUTATION: STRONG- The program has earned a level of prestige and is considered very reputable based on its past performance. PLACEMENT AFTER GRADUATION: LOW- A very small number of the program's graduates gain employment upon completion of the program. LINKAGE: YES- The online business degree program is formally connected to a more legitimate external entity such as a traditional, in-person university or corporation. **Perception of Legitimacy** **My perception of the legitimacy of an online business degree program with these characteristics:** Not Very Legitimate   Very Legitimate 1   2   3   4   5   6   7   8   9   10   11

3.2.3.3 Part 2 - Independent variables. In this conjoint experiment, the hypothetical

profiles presented to participants consisted of four attributes or independent variables.

Accreditation refers to whether or not (yes/no) the online business degree program is accredited

by an appropriate external entity. *Reputation* is also a two-level variable (strong/weak), and

refers to whether or not the online business degree program is thought to be prestigious based on

past performance. *Placement after graduation* refers to the degree (high/low) that an online

business degree program places its graduates in employment upon program completion. *Linkage*

refers to whether or not (yes/no) the online business degree program has a formal connection to more a legitimate entity such as a traditional university or corporation.

     3.2.3.4 Part 2 – Reliability. Conjoint analysis is a repeated measures technique where issues related to reliability are addressed through replication of profiles and test-retest checks (Monsen, Patzelt, Saxton, 2009). To be able to assess the reliability of the current experiment, each participant was exposed to each of the sixteen total profiles, four repeated profiles used as test-retest checks, and three warm-up scenarios (Warm-up scenarios are presented at the beginning of the task and are intended to make participants aware of the specific requirements of completing the conjoint task. Responses to the warm-up scenarios were not included in data analysis.) meaning each individual was asked to respond to twenty-three profiles during the experiment, which falls well within the acceptable range of profile exposures described in section 3.2.2.1 of this chapter. Correlations between the original and replication profiles were conducted as a test-retest of reliability.

     3.2.3.5 Part 2 – Statistical method. Hierarchical multiple regressions were used to test the hypotheses stated in Chapter 2. Multiple regression or analysis of variance (ANOVA) could both be used to statistically analyze the data collected in this experiment. Louviere (1988) notes the similarities in the two techniques in this type of research, but offers that regression models are particularly useful because of the ability to "partition the variance into meaningful polynomial pieces that permit inferences to be made about functional form" (p. 45). Controlling for demographic variables, a series of hierarchical regression analyses were conducted with each subsample's dependent variable to explore the main effects and interaction effects related to the varying levels of each of the four attributes.

3.2.3.5.1 Assumptions. The basic assumption in conjoint analysis is that decision making is an additive process where decision makers gather and combine information about determinate attributes to form overall impressions. In regards to the additive nature of decision making, Louviere (1998) states, "It is this integration or combining of attribute information that one studies with conjoint analysis techniques" (p. 11). Based on the theoretical and practical development of attributes previously described, it is reasonable to assume that the members of each of the subsamples represented in this research would take all four of these attributes into consideration before developing legitimacy based perceptions. In short, this research assumes that the total utility of the decision indicated by the dependent variable is the sum of the part-worth utilities for each of the individual factor levels. It should be noted that these assumptions are possibly flawed in that not all decisions are made rationally based on a series of tradeoff judgments among a finite set of factors. Instead many decisions are made using more behavioral approaches where individuals rely on incomplete information and intuition where the variables influencing decisions are less obvious (Simon, 1987; Jones & George, 2011).

CHAPTER FOUR

RESULTS

This dissertation examines the cognitive and socio-political legitimacy of online business degree programs based on the perceptions of four key stakeholder groups: students, faculty, academic administrators, and business practitioners, and the influence that four program related variables: accreditation, reputation, placement after graduation, and linkage have on these perceptions. An analysis of the data collected as well statistical tests of the six hypotheses designed for this study are presented in this chapter.

Characteristics of the sample are summarized and presented in the first section of this chapter. Data relative to the sample as a whole as well as by individual subgroup are both provided in this section. The second section (4.2) is associated with part 1 of the study that focuses on the cognitive and socio-political legitimacy of online business programs. Specifically, this section provides the results to factor and reliability analyses of scale items, correlation analysis, and statistical tests of hypotheses 1, 2, and 2c. The third section (4.3) includes results for the conjoint experiment in part 2 of the study, including reliability analysis, correlations, and statistical tests hypotheses 3 through 6. Section 4.4 concludes this chapter with results pertaining to degree of engagement and motivation of participants during the study.

4.1 Sample Characteristics

This study had 306 individual participants. Of the 306 participants, 102 were students, 86 were academic faculty, 64 were academic administrators, and 54 were business practitioners. Participants ranged in age from a minimum of 19 years to a maximum of 73 years; more males (205) participated in the study than females (101); and the marital status of participants was relatively balanced with 57.8% being married and 42.2% being single. Geographically, the

sample consisted of participants from 39 states. A smaller percentage of participants had personally taken an online course (40.2%) than had not (59.8%), and of those that had taken an online course the majority (34.6%) had taken only 1-5 courses in the format.

4.1.1 Subsample specific characteristics.

In addition to the demographic information collected for all of the subsamples, data on subsample specific characteristics was also collected. The student subsample was composed of 59.8% males and 40.2% females with a mean age of 23 years. A vast majority (95%) of the student participants held either junior or senior status, and they represented 19 academic areas of study. A majority of the students (63.7%) had taken an online class.

The faculty subsample had 68.6% male and 31.4% female participants that had a mean age of 50 years. A majority of the faculty participants held the rank of either associate (19.8%) or full (45.3%) professor. The faculty subsample represented 47 AACSB accredited schools of business, 11 academic disciplines, and 40.7% of the faculty participants reported having taught an online course.

Academic administrators from 52 different schools with an AACSB accredited school of business participated in this study. The gender make-up of the academic administrator subsample was 75% male and 25% female. The mean age of the academic administrators was 55 years. Department Chairs and Assistant Deans accounted for 84.4% of this subsample, and 56.3% of the entire academic administrator subsample reported that they had not taught an online course.

The gender composition of the business practitioner subsample was 68.5% male and 31.5% female, and the mean age of this subsample was 40 years. The business practitioners in this study had a mean of 18.13 years of work experience and a mean of 10.3 years of experience as managers, and a majority (77.8%) reported that they were responsible for final hiring

decisions. Although only 35.2% indicated that they had personally taken an online course, 72.2%

reported that they knew someone that had taken a course online. A complete summary of sample

characteristics is provided in Table 4.1.

Table 4.1
Subsample characteristics as a percentage of the sample

Characteristic	Total (n = 306)	Student (n = 102)	Faculty (n = 86)	Academic Administrator (n = 64)	Business Practitioner (n = 54)
All Subsamples					
Gender:					
Male	67.0	59.8	68.6	75.0	68.5
Female	33.0	40.2	31.4	25.0	31.5
Age (yrs.)	$M = 40.4$	$M = 22.79$	$M = 50.2$	$M = 55.23$	$M = 40.48$
Ethnicity:					
Caucasian	92.2	93.1	86.0	93.8	98.1
African-American	2.0	2.9	2.3	----	1.9
Asian	4.9	2.9	10.5	4.7	----
Hispanic	.7	1.0	1.2	----	----
Marital status:					
Single	42.2	94.1	20.9	10.9	14.8
Married	57.8	5.9	79.1	89.1	85.2
Education completed:					
High School	3.3	9.8	----	----	----
Some College	21.2	59.8	----	----	7.4
Associate's					
Bachelor's	6.5	18.6	----	----	1.9
Graduate	12.4	10.8	----	----	50.0
Doctoral	13.1	1.0	11.6	10.9	40.7
	43.5	----	88.4	89.1	----
Online experience:					
Yes	40.2	63.7	24.4	28.1	35.2
No	59.8	36.3	75.6	71.9	64.8
Student only					
Class:					
Freshman		1.0			
Sophomore		1.0			
Junior		26.5			
Senior		68.6			
Graduate		2.9			
Faculty only					
Rank:					
Lecturer			10.5		
Assist. Prof.			24.4		
Assoc. Prof.			19.8		
Full Prof.			45.3		

Table 4.1 (continued)

Characteristic	Total (n = 306)	Student (n = 102)	Faculty (n = 86)	Academic Administrator (n = 64)	Business Practitioner (n = 54)
Online teach experience:					
Yes			40.7		
No			59.3		
Academic administrator only					
Position:					
Dept. Chair				51.6	
Assist./Assoc. Dean				32.8	
Dean				10.9	
Assist./Assoc.V.P./Provost				----	
V.P./Provost				3.1	
President				1.6	
Online teach experience:					
Yes				43.8	
No				56.3	
Business practitioner only					
Org. size (no. of employees):					
< 25					35.2
26-50					7.4
51-100					9.3
>100					48.1
Work experience (yrs.):					M = 18.13
Management experience (yrs.):					M = 10.3

4.2 Part 1 – Cognitive and Socio-political Legitimacy

4.2.1 Factor analysis and item reliability.

Due to the lack of existing measures of the perceived legitimacy of online business

degree programs, scales were created with the goal of developing valid, internally consistent

measures of two specific aspects of legitimacy: cognitive and socio-political legitimacy. Scale

items were created and presented to each of the four subsamples. Four separate factor analyses

were run, one for each subgroup. Factor analyses were conducted on scale items to identify

underlying indicators of cognitive and socio-political legitimacy. "The general purpose of factor

analysis is to summarize the information contained in a large of number of variables into a

smaller number of factors" (Zikmund, 2003, p. 586), and the factor analyses conducted on the

items for each of the four subsamples identified three separate factors, with the third factor only containing one item. The item that failed to load on the first two factors in each of the subsamples was, "I have no knowledge of business degree programs being offered online." After removing this item from each of the scales, the factor analysis identified two separate factors (cognitive and socio-political legitimacy) as expected. A varimax rotation procedure with an eigenvalue cut-off of one was used in determining the factors.

An internal reliability analysis was also conducted. Reliability analyses on all four of the socio-political scales were found to be high ($\alpha > .88$). The results of the reliability analyses on the four cognitive legitimacy scales were less impressive with the student ($\alpha = .04$) and business practitioner ($\alpha = .37$) subsamples being the lowest, and the faculty ($\alpha = .63$) and academic administrator ($\alpha = .70$) subsamples being the highest. Due to the low reliability of the cognitive legitimacy scale, any analysis related to the findings of this scale are suspect and are considered for descriptive, non-explanatory purposes only. (Specific issues related to this limitation and suggestions for future research are addressed in Chapter 5.) Items included in each factor, factor loadings, percentage of total cumulative variance explained by the factors, and alpha values of the internal reliability of each scale is presented in Table 4.2.

Table 4.2
Factor and reliability analyses of cognitive and socio-political legitimacy scales.

Scales and Items	Factor Loadings*		% Variance Explained		Alpha	
	Cognitive	Socio-political	Cognitive	Socio-political	Cognitive	Socio-political
Student (N = 102)			12.16	51.56	.04	.90
1. Business degree programs should not be offered online.	.136	.728				
2. I do not feel that online business degree programs are appropriate.	-.043	.795				
3. Online business degree programs are legitimate.	-.060	.885				
4. It is appropriate that business degree programs are offered online.	-.177	.856				
5. I would enroll in an online business degree program.	.327	.691				
6. Online business degree programs are not legitimate.	-.096	.858				
7. I take it for granted that business programs are offered online.	.632	.236				
8. I would recommend online business degree programs to others.	.171	.793				
9. I assume that business programs are offered online.	-.702	.253				
Faculty (N = 86)			19.24	53.29	.63	.92
1. I would advise students to enroll in an online business degree program.	-.003	.830				
2. I do not feel that online business degree programs are	-.041	.735				

Table 4.2 (continued)

Scales and Items	Factor Loadings*		% Variance Explained		Alpha	
	Cognitive	Socio-political	Cognitive	Socio-political	Cognitive	Socio-political
appropriate.						
3. I take it for granted that business programs are offered online.	.832	.101				
4. Online business degree programs are not legitimate.	.043	.883				
5. I assume that business programs are offered online.	.856	.047				
6. Business degree programs should not be offered online.	.240	.829				
7. It is appropriate that business degree programs are offered online.	.195	.857				
8. Online business degree programs are legitimate.	.117	.907				
Academic Administrators (N = 64)			15.65	62.35	.70	.96
1. Online business degree programs are not legitimate.	.047	.874				
2. Business degree programs should not be offered online.	-.078	.911				
3. I would support the development of an online business degree program at my institution.	-.046	.908				
4. Online business degree programs are critical to the future of higher education.	.071	.801				
5. I do not feel that online business degree programs are appropriate.	-.085	.842				
6. I assume that business	.877	.074				

Table 4.2 (continued)

Scales and Items	Factor Loadings*		% Variance Explained		Alpha	
	Cognitive	Socio-political	Cognitive	Socio-political	Cognitive	Socio-political
programs are offered online.						
7. Online business degree programs are legitimate.	.058	.888				
8. I take it for granted that business programs are offered online.	.873	-.065				
9. Online business degree programs are critical to the long-term strategy of my institution.	.089	.912				
10. It is appropriate that business degree programs are offered online.	-.028	.915				
Business Practitioners (N = 54)			13.68	45.77	.37	.89
1. Online business degree programs are legitimate.	.020	.721				
2. Business degree programs should not be offered online.	.223	.734				
3. I do not feel that online business degree programs are appropriate.	.041	.816				
4. It is appropriate that business degree programs are offered online.	.136	.817				
5. Online business degree programs are not legitimate.	.275	.764				
6. I would encourage my current employees to enroll in an online business degree program.	-.062	.758				
7. I would hire a graduate from an	.202	.710				

Table 4.2 (continued)

Scales and Items	Factor Loadings*		% Variance Explained		Alpha	
	Cognitive	Socio-political	Cognitive	Socio-political	Cognitive	Socio-political
online business degree program at my organization.						
8. Given the availability of resources, I would pay for my current employees to enroll in an online business degree program.	-.114	.714				
	.727	.119				
9. I take it for granted that business programs are offered online.	.797	.001				
10. I assume that business programs are offered online.						

*Note: Shaded items are included in respective factor.

4.2.2 Correlation analysis.

Demographic and data collected concerning participants' online course experience was correlated with the cognitive and socio-political dimensions of perceived legitimacy to determine if any significant relationships existed (See Table 4.3).

The student and business practitioner subsamples yielded the fewest significant results among these variables. Specifically, there was a positive and significant relationship between the cognitive and socio-political dimensions of perceived legitimacy in the student subsample. It should be noted that the student subsample was the only subsample that yielded a significant relationship between these two dimensions. The only significant relationship found in the business practitioner subsample was a negative relationship between age and whether or not they had experience taking an online course. Not surprisingly, younger business practitioners had more experience with online courses.

The faculty subsample yielded the greatest number of significant relationships. For this subsample, those that had taken an online course were more likely to have taught an online course and perceived online business programs as more socio-politically legitimate. Similarly, there was also a positive and significant relationship between having taught an online course and the perception of socio-political legitimacy. Demographically, this subsample yielded two very interesting results. First, there was a positive and significant relationship between marital status and both of the legitimacy dimensions, indicating that married faculty perceive online business degree programs as more cognitively and socio-politically legitimate. Perhaps most interesting in relation to this dissertation is that there was a significant negative relationship between faculty rank and perceived socio-political legitimacy. The higher ranking faculty members perceived online business degree programs as less socio-politically legitimate.

In the academic administrator subsample, three variables (position, knowing someone that has taught online, and knowing someone that has taken an online course) were found to have significant positive relationships with socio-political legitimacy. Opposite of the findings in the faculty subsample, higher ranking administrators perceived online programs as more socio-politically legitimate. Perhaps the most interesting relationship in this subsample is the significant negative relationship between the number of courses that an academic administrator has personally taught and their perceptions of the socio-political legitimacy. The more online courses that the academic administrator participants in this study had taught the less socio-politically legitimate they perceived them to be.

Table 4.3

Correlations between selected demographics and online experience, and dimensions of perceived legitimacy by subsample

Variable	Cognitive legitimacy	Socio-political legitimacy
Students (N = 102)		
Cognitive legitimacy	1	.27**
Taken course online[a]	.05	.12
Faculty (N = 86)		
Taught course online[a]	.07	.25*
Taken course online[a]	-.06	.22*
Marital status[b]	.24*	.30**
Rank[c]	.01	-.34**
Academic Administrators (N = 64)		
Taken course online[a]	.01	-.10
Position[d]	.10	.31*
Know someone that has taught online[a]	.01	.33**
Know someone that has taken an online course[a]	-.09	.27*
No. of online courses taught	-.05	-.39*
Business Practitioners (N = 54)		
Taken course online[a]	-.01	-.15

* $p<.05$.
** $p<.01$.
a. 0 = no; 1 = yes.
b. 0 = single; 1 = married.
c. 1 = lecturer; 2 = assistant prof.; 3 = associate prof.; 4 = full prof.
d. 1 = dept. chair; 2 = assistant dean; 3 = dean; 4 = associate provost; 5 = provost; 6 = president.

4.2.3 Tests of H1-H2c.

The hypotheses (H1-H2c) for this portion of the study predicted relationships relative to each of the four subsamples' perceptions of the cognitive and socio-political legitimacies of online business degree programs. Hypothesis support was determined by comparing responses above and below the median for each scale. Wilcoxon's matched-pairs signed-ranks test was used to determine statistical significance of the difference between responses above and below the median. Table 4.4 provides descriptive statistics for each of the eight scales as well as z-scores and associated levels of significance derived from the Wilcoxon matched-pairs signed-ranks test.

Table 4.4
Legitimacy scales' descriptives and Wilcoxon's matched-pairs signed-ranks test z-scores

Scale	Min	Max	Median	Response Mean	% Response Above Median	z-score
Students (N=102)						
CL[a]	2	10	6	6.95	61.76	-5.83***
SPL[b]	7	35	21	23.13	66.66	-.344**
Faculty (N=86)						
CL[a]	2	10	6	7.21	63.95	-4.61***
SPL[b]	6	30	18	17.65	40.69	-.529
Academic Admin. (N=64)						
CL[a]	2	10	6	7.75	71.87	-4.91***
SPL[b]	8	40	24	26.01	57.81	-1.65*
Business Pract. (N=54)						
CL[a]	2	10	6	7.27	70.37	-4.75***
SPL[b]	8	40	24	26.81	59.25	-3.12**

***$\alpha < .001$
**$\alpha < .05$
*$\alpha < .10$
a = cognitive legitimacy
b = socio-political legitimacy

Consistent with the prediction of hypothesis 1, respondents from all subsamples ranked online business degree programs above the median on the cognitive legitimacy scale and were all significant at the .001 level indicating a significant difference between the responses above and

below the median; consequently, hypothesis 1 was supported based on the data collected; however, claiming support for this hypothesis is marginal at best due to the low reliability of the scale.

Hypotheses 2-2c predicted the socio-political legitimacy perceptions of each of the four subsamples. Hypotheses 2 and 2a predicted that students and academic administrators would perceive online business degree programs as socio-politically legitimate. Findings relative to these two hypotheses were significant and consistent with predictions, thus H2 and 2a were supported.

Hypotheses 2b and 2c predicted that faculty and business practitioner respondents would not perceive online business degree programs as socio-politically legitimate, and as predicted, 59.31% of faculty participants' responses were below the scale's median score; however, this difference was not found to be significant indicating that there was no statistically significant difference between those perceiving online business degree programs as socio-politically legitimate and those perceiving them not socio-politically legitimate; consequently, no statistical support was found for this hypothesis. Contrary to predictions, Hypothesis 2c's findings showed that business practitioners perceive online business degree programs as socio-politically legitimate. This finding was significant at the .01 level. Based on these findings, hypothesis 2c was rejected.

4.3 Part 2 – Conjoint Analysis

As with part one of the study, 306 total individuals from the four subsamples participated (students = 102; faculty = 86; academic administrators = 64; business practitioners = 54) in this part of the study. The 306 participants each responded to 23 scenarios which yielded 7,038 total observations. The first three scenarios presented to participants were considered warm-up

scenarios and were not included in the final analysis; consequently, the final analysis included 6,120 observations.

This part of the study examined the influence that four online business degree program variables (accreditation, reputation, placement after graduation, linkage) have on predicting the legitimacy perceptions of participants in each of the four subsamples. Each of these variables contained two levels resulting in a 2 x 2 x 2 x 2 factorial design. To conduct the statistical analyses described in this section, dummy variables were created for each variable level to indicate the presence or lack of (1 if included; 0 if not) a specific variable level in each scenario.

4.3.1 Reliability.

To test the reliability of the conjoint task, four of the scenarios that participants were exposed to were repeated so that test-retest reliability could be conducted. Correlation analysis as well as an internal reliability analysis was conducted on each of the repeated items. Each of the repeated pairs was significantly and positively correlated, and was found to have a high degree ($\alpha > .84$) of internal reliability. Correlation coefficients and alpha values for each pair of repeated scenarios is provided Table 4.5.

Table 4.5
Correlations and alpha values for test-retest reliability

Scenarios	Correlation	Alpha
4 & 17	.74**	.85
8 & 20	.77**	.87
9 & 22	.82**	.90
12 & 16	.78**	.88

** $p < .01$

4.3.2 Correlations.

Correlation analyses when all subsamples were included as well as when performed on each subsample separately revealed a number of significant relationships between program variables and perceived legitimacy (See Table 4.6). The signs of each of the relationships were

consistent with predictions, and although each of the relationships were statistically significant, the strength of the correlations was not especially impressive. Specifically, the presence of accreditation, a strong reputation, high placement after graduation, and being linked to a more legitimate entity all yielded positive, significant results with accreditation being the strongest relationship and linkage to a more legitimate entity being the weakest.

Table 4.6
Correlations between program variables and legitimacy perception

Program Variable	Legitimacy Perception				
	All	Student	Faculty	Aca. Admin.	Bus. Prac.
Accreditation - no	-.43**	-.42**	-.41**	-.46**	-.47**
Accreditation - yes	.43**	.42**	.41**	.46**	.47**
Reputation - weak	-.33**	-.35**	-.30**	-.34**	-.35**
Reputation - strong	.33**	.35**	.30**	.34**	.35**
Placement after graduation - low	-.31**	-.38**	-.29**	-.27**	-.29**
Placement after graduation - high	.31**	.38**	.29**	.27**	.29**
Linkage - no	-.18**	-.19**	-.14**	-.16**	-.29**
Linkage - yes	.18**	.19**	.14**	.16**	.29**

** $p < .01$

4.3.3 Regression Analyses.

A series of hierarchical regression analyses were conducted with program related characteristics as independent variables to determine which were most strongly related to the dependent variable, perception of legitimacy. To determine the amount of variance explained in the perceived legitimacy of online business degree programs by the four program related characteristics over and above the amount of variance explained by demographic control variables alone, demographic variables were entered into Model 1 before the program characteristics were entered in Model 2. This approach was implemented considering all subsamples and all four predictors as well as by individual subsample group. The significant predictors and R^2 values from each regression model are shown in Table 4.7.

4.3.3.1 Model 1 - Controls. The demographic variables of gender, age, marital status, level of education, and previously taking an online course were used as control variables and

entered into the regression analysis first. When all subsamples were included, each of the control variables were found to be significant predictors of legitimacy perception except for gender. It should also be noted that the beta coefficient for education level was negative when all subsamples were included, suggesting that participants with higher levels of education perceived online business degree programs as less legitimate. When only the student subsample was considered, gender and education level were the only significant predictors, and as when all subsamples were included, education was a negative predictor. The controls that were found to be significant predictors with the faculty and academic administrator subsamples were age, marital status, and previously taking an online course. In these groups, marital status and previously taking an online course were positive predictors. There was, however, a discrepancy in the sign of the relationship in the age variable. In the faculty subsample, age was a negative predictor indicating younger faculty perceive online business degree programs as more legitimate; whereas, it was a positive predictor in the academic administrator group suggesting that academic administrators were more likely to perceive online business degree programs as more legitimate as they age. The only two control variables found to be significant predictors in the business practitioner subsample were gender and age with age being a positive predictor with this group as it was with academic administrators.

4.3.3.2 Model 2 - Program characteristics. After the control variables were entered in model 1, the four program characteristic variables were entered in model 2 to determine the amount of variance explained by program characteristics over and above what was explained by demographics alone. The R^2's of all five of the models including the program characteristic variables was found to be significant, and each of the program characteristics were found to be significant predictors in all models tested. Specifically, when all subsamples were included in the

analysis, program characteristics explained 46% of the variance in perception of legitimacy, which was 44% over and above the amount explained by demographic variables alone. When only the student subsample was considered, 51% of the variance was explained, which was 50% more than the amount explained by demographic variables only. Program characteristics described 42% of the variance in perceived legitimacy when only the faculty subsample was considered. This was 37% more than what was explained by demographics only. Similarly, 47% of the variance was explained by program characteristics in the academic administrator subsample which was 44% more than what was explained by demographics alone. In the business practitioner subsample, 54% of the variance was explained when the program characteristics were entered into the model, which was 53% over and above what was explained by demographics alone.

Relative to the predictive strength of the specific program characteristic variables, the accreditation variable was found to be the strongest predictor across all five of the sample groupings, placement after graduation was second strongest, reputation third strongest, and linkage to a more legitimate entity was found to be the weakest predictor. Specifically, accreditation was ranked as the strongest predictor in each individual group and linkage to more legitimate entity was ranked lowest in each group except for the business practitioner group where it was the second strongest predictor. Another interesting finding relative to the specific program characteristic variables is that placement after graduation was found to be a notably stronger predictor of perceived legitimacy with the student subsample than with the other sample groups.

Hypotheses three through six stated that each of the program characteristic variables, when in their positive state, would be significant predictors of the perceived legitimacy of online

business degree programs, and based on the findings of the regression analyses presented in this

section, these four hypotheses are supported.

Table 4.7
Summary of R2 model values and significant predictors from regression analyses

Subsample	Model	Predictor	Beta	Model R^2	Change in R^2
All	1	Age,	.01**	.02***	
		Marital status,	.40***		.44***
		Education,	-.27***		
		Online exp.[a]	.36***		
	2	Accreditation,	2.62***	.46***	
		Reputation,	1.77***		
		Grad. place,	1.89***		
		Linkage.	1.33***		
Student	1	Gender,	.33***	.01**	
		Education.	-.25***		.50***
	2	Accreditation,	2.43***	.51***	
		Reputation,	1.79***		
		Grad. place,	2.18***		
		Linkage.	1.33***		
Faculty	1	Age,	-.01**	.05***	
		Marital status,	1.33***		.37***
		Online exp.[a]	.83***		
	2	Accreditation,	2.52***	.42***	
		Reputation,	1.65***		
		Grad. place,	1.80***		
		Linkage.	1.12***		
Academic Administrator	1	Age,	.04***	.03***	
		Marital status,	.62***		.44***
		Online exp.[a]	.32*		
	2	Accreditation,	2.94***	.47***	
		Reputation,	1.95***		
		Grad. place,	1.70***		
		Linkage.	1.21***		
Business Practitioner	1	Gender,	-.39**	.01**	
		Age.	.03***		.53***
	2	Accreditation,	2.74***	.54***	
		Reputation,	1.71***		
		Grad. place,	1.69***		
		Linkage.	1.82***		

* $p < .10$
** $p < .05$
*** $p < .01$
a. Online exp. = previously taking an online course.

4.4 Part 3 – Participant engagement.

In an attempt to establish a sense of the level of engagement of the participants during the study, a post-experiment questionnaire was provided that asked participants to indicate on a 5-point scale their level of 1) motivation to participate in the study; 2) commitment to completing the research tasks; 3) effort that was put into making decisions relative to legitimacy of online business degree programs; and 4) how well the tasks were understood. For the purposes of this analysis, participants ranking their level of engagement above each the scales' midpoint of three were considered as high. From this perspective, 47% rated their motivation to participate as high; 61% indicated they had high levels of commitment to the task; 59% indicated they put forth a large amount of effort in completing the task; and 91% indicated that they understood the tasks they were asked to complete.

CHAPTER FIVE

DISCUSSION AND CONCLUSIONS

Discussions of the hypothesized related findings as well as other notable results are provided in this chapter, as are the implications and contributions to theory and practice. Limitations and suggestions for future research are also considered and provided in this chapter.

5.1 Discussion

5.1.1 Cognitive and socio-political legitimacy.

The findings of this dissertation indicate that, overall, online business degree programs are perceived as cognitively and socio-politically legitimate across the four stakeholder groups (students, faculty, academic administrators, and business practitioners) included in the scope of the study. This indicates that each of the four groups are not only aware of and familiar with online business degree programs (cognitive legitimacy) but also view them as appropriate (socio-political legitimacy). Although less reliable, findings relative to the cognitive legitimacy construct were notably higher than those for socio-political legitimacy suggesting that each of the four groups are aware of and take for granted the existence of online business programs, but are less confident about the appropriateness of these types of programs. The strength and responses to the appropriateness related items was less consistent across the groups. Of specific interest are items presented to each group indicating probable action rather than just general opinions of online business degree programs. The following sections examine the specific findings relative to each group.

5.1.1.1 Students. Overall, the student group indicated a strong perception of both cognitive and socio-political legitimacy of online business degree programs, but when asked to indicate the likelihood that they would either enroll in an online business degree program

themselves or recommend an online business degree program to others, their responses were not as strong. Specifically, 42% of students either moderately or strongly disagreed with the statement, "I would enroll in an online business degree program;" and 35% either moderately or strongly disagreed with the statement, "I would recommend online business degree programs to others." These findings indicate that although students view online business degree programs as legitimate, they do not prefer to actively participate themselves. I feel that this finding is notable and is likely due to the demographics of the students that participated in this study. The students that participated in this study were mostly senior-level undergraduate students enrolled in a traditional, face-to-face business program, and although many indicated they had taken one or two online courses, they were most likely influenced by their experiences in the face-to-face environment.

   5.1.1.2 Faculty. As expected, the faculty that participated in this study had the most negative perceptions of online business degree programs. Faculty were very aware of online business degree programs and this was indicated in their strong perceptions related to cognitive legitimacy. Also as predicted, faculty perceptions of the appropriateness (socio-political legitimacy) of online business degree programs was the lowest of the groups studied. Specifically, a majority of the faculty participants indicated that they would not advise students to enroll in an online business degree program. There were also a few key demographic variables that influenced faculty perceptions. Faculty that had either taken or taught online courses viewed online business programs as more socio-politically legitimate than those that had not. This is not surprising and supports the notion that the more experience that an individual has with online business degree programs, the more legitimate they perceive them to be. Perhaps related to this is the finding that high ranking faculty perceived online business degree programs as less

legitimate than lower ranking faculty. Even though higher ranking faculty often teach online courses, their perceptions related to legitimacy are likely to be grounded in the perspective that reinforces what they have known and found successful over time. Less obvious is the influence that marital status had on the faculty group. Married faculty viewed online business programs as more cognitive and socio-politically legitimate than non-married faculty. This may be due to the anywhere, anytime convenience generally associated with teaching and/or taking online courses. Married faculty may view teaching online courses as a way to achieve more autonomy with their time allowing them to be more flexible and available to spend time with their spouses and families.

Relative to their overall perceptions of the legitimacy of online business degree programs, faculty perceptions were more mixed. When asked to respond to the statement, "Online business degree programs are legitimate," the responses were divided with 39% disagreeing, 31% agreeing, and 30% neutral or uncertain. These mixed perceptions and that approximately two-thirds of the faculty respondents either agreed or were uncertain or neutral seems to suggest that although faculty are largely skeptical of online business degree programs, their opinions towards legitimacy are shifting towards the positive more than previous research has indicated. It could be that faculty are not specifically opposed to online business degree programs as such, but are generally resist change and would perceive any changes to the established norm as illegitimate.

5.1.1.3 Academic administrators. The academic administrator group had the most favorable legitimacy related impressions of online business degree programs. Their favorable impressions were consistent across specific, action related items with a majority of academic administrators indicating that they perceived online business degree programs as critical to the

future of higher education as well as being critical to the long-term strategy of their institutions. Furthermore, a majority of the academic administrators that participated in this study indicated that they would support the development of an online business degree program at their institution. I think these findings are notable and are potentially the most impactful considering that academic administrators control resources and are directly involved in long-term strategic decision making. That the decision makers and controllers of resources perceive online business degree programs as critical to the long term strategies clearly suggests the staying power of these types of programs.

Contrary to the results found in the faculty sample, higher ranking academic administrators viewed online business degree programs as more legitimate than lower ranking administrators. This is likely due to the visionary and long-term nature of higher ranking administrative positions. Higher ranking administrators (Presidents, Vice Presidents, Deans) are more involved in long-term, strategic planning at their institutions than are lower ranking administrators (Assistant Deans, Department Chair) and tend to be more concerned with or motivated by non-academic related issues such as enrollments, revenue generation, and external stakeholders. The development and delivery of online offerings are often viewed by administrators as ways to address these non-academic related concerns. An interesting finding related to this is the negative relationship between the number of courses that academic administrators had taught online and their perceptions. These findings indicated that the more courses administrators had taught online the less legitimate they viewed them to be. This finding is more in-line with faculty assumptions, and it could be that administrators that have direct experience with the academic aspects of developing and delivering online courses view them as less legitimate; whereas, those that do not have these experiences are more focused on the non-

academic opportunities that these types of programs offer, and as a result, their legitimacy based judgments are formulated based on different factors (e.g. enrollments, new revenues, etc.) than those that influence faculty or other academic administrators closer to the actual delivery of the program (e.g. technology, learning, quality, etc.).

    5.1.1.4 Business practitioners. Counter to predictions, business practitioners perceived online business degree programs as both cognitively and socio-politically legitimate. Sixty-three percent of the business practitioners either moderately or strongly agreed with the statement, "Online business degree programs are legitimate." It is likely that this finding is related to the "prestige effect" described by Sharif (1937) in his study of norm formation in that business practitioners' perceptions of legitimacy may have been influenced by the existence of an academic study and by being asked to participate. It is possible that the mere fact that the topic of online business degree programs is being formally and academically studied supports lends prestige to the topic and increases the perceived legitimacy of the topic.

    The most notable findings from this group were found in specific questions relative to hiring graduates of online business degree programs and supporting current employees to pursue online degrees. Relative to hiring, 46% indicated that they would hire graduates of an online business degree program with only 13% indicating that they would not. (The remaining 41% were uncertain or neutral.) When considered alone, these hiring related results are not that surprising; however, when considered with the findings that business practitioners were less likely to support or pay for current employees to pursue an online business degree, the results become harder to interpret. Prestige may be playing a role here too. It may be that business practitioners are especially influenced by the diploma or credential when it comes to new hires. The mere fact that an applicant had completed a degree, whether online or not could satisfy

minimum hiring related qualifications. On the other hand, when it comes to supporting and/or paying for current employees to advance their education, business practitioners see less value and are more skeptical of online business degrees. It could be that business practitioners are more concerned with and influenced by the performance of current employees and do not necessarily value or support additional education in any form, or it could be that business practitioners have the impression that if employees want to pursue online business degrees on their own or prior to hire that is sufficient, but if the current organization or employer is going to have any influence in the decision, online business degrees would be discouraged.

5.1.2 Program-related and demographic factors influencing legitimacy perceptions.

In addition to the overall cognitive and socio-political legitimacy perceptions discussed in the previous sections, this dissertation demonstrates that the business degree program related variables of accreditation, reputation, placement after graduation, linkage, and certain demographic variables have an effect on legitimacy perceptions of online business degree programs.

5.1.2.1 Program-related factors. As predicted, each of the four program-related factors were found to positively influence the legitimacy perceptions of online business degree programs across all groups. Most notably, the program-related factor of accreditation was found to have the strongest influence on legitimacy perceptions across all of the groups. The general consensus across the groups studied here is that if the online program meets the accreditation standards set forth by AACSB specifically, then it is more likely to be viewed as legitimate.

The order of influence of the other program-related variables varied across the groups. The reputation variable was viewed as the third most influential variable in each of the groups, except for academic administrators. This is not surprising due to the external and non-academic

perspectives that administrative positions require. Academic administrators are often directly rewarded and certainly motivated by preserving and elevating the reputations of their institutions. This is not to say that students and faculty are not concerned with reputation, but students and faculty have less direct influence on reputation.

Placement after graduation was identified second to accreditation as the most influential factor for the student and faculty groups. One of the main, if not the main, priority of students is securing employment after graduation, so it is expected that student legitimacy perceptions would be heavily influenced by the placement after graduation factor. Less obvious is the influence that placement after graduation has on faculty. The emphasis placed on placement after graduation by the faculty group is likely due to issues related to practical relevance. Although faculty may be skeptical of the academic merits of online business degree programs, the sentiment is likely that if online graduates are able to secure employment, then a large part of the faculty function of preparing students for the world of work and careers is fulfilled.

The linkage factor had the least influence on legitimacy of the four factors except with the business practitioner group. Business practitioners perceived the linkage factor as the second most legitimacy influencing factor behind accreditation. In terms of legitimacy, it is likely that business practitioners' perceptions are increased when an online business program is linked to an established educational institution. In this sense, they are less likely to be aware of or concerned with the technical aspects of program and curricular development; consequently, it is likely their perceptions of legitimacy are based on their impressions of the traditional school that the online business degree program is linked to. Perhaps it is that business practitioners have considered online business degree programs individually rather than generally, and their perceptions of

online business programs not linked to an established traditional entity (e.g. University of Phoenix) would not be viewed as legitimate at all.

    5.1.2.2 Demographic factors. Of the demographic factors, age, marital status, and having taken an online course were all found to be the most significant. There was some discrepancy across the groups in terms of the influence of age. In the faculty group, age was a negative predictor indicating that younger faculty perceive online business degree programs as more legitimate; however, with the academic administrator and business practitioner groups, age was a positive predictor. These findings are consistent with the results discussed previously related to rank in the faculty and academic administrator groups in that younger faculty are likely to be lower ranking just as older administrators are likely to be higher ranking, but this finding is unexpected with the business practitioner group. It may be that older business practitioners are farther removed from their own educational experiences and are more willing to consider or to accept changes and innovations relative to their own experiences; whereas, younger business practitioners that have had more recent educational experiences are less accepting or more skeptical of anything different from their own experience. Marital status and having taken an online course were also found to be positive predictors in the faculty and academic administrator groups. As previously mentioned in this chapter, married individuals may be attracted to the autonomy that online courses provided. Based on this, it would stand to reason that marital status would also be a significant predictor in the student group. The lack of significance of marital status with the student group in this study is likely do the relatively small percentage of married students (5.9%) that participated. It is interesting that having taken an online course was not found to be a significant predictor with the student and business practitioner groups. It seems reasonable, and previous research suggests, that usage or previous experience is a key variable in

terms of influencing perceptions. It could be that faculty and academic administrators view themselves as experts or more qualified to make judgments of educational programs; whereas, students and business practitioners are not as confident in their knowledge or opinions in this area, and as a result, they are less influenced by their previous personal experiences and more influenced by other factors.

5.2 Theoretical and Practical Implications

There are various strengths of this dissertation. These strengths are most notable relative to the theoretical and practical implications of the findings of this study. Discussion of these implications is provided in the following sections.

5.2.1 Theoretical implications.

There are a number of theoretical implications of this dissertation. First, two legitimacy based scales (one for cognitive legitimacy; one for socio-political legitimacy) were developed for use in this type of research. Being a relatively new and growing area of research, valid and reliable instruments are needed for future research. The scale developed to measure the socio-political legitimacy construct was found to be especially reliable and should prove to be useful in future research of this type.

Second, the participants of the research represented four distinct stakeholder groups. By not focusing on any one individual group, the generalizability of the findings across the groups is increased. Additionally, the composition of the faculty and academic administrator groups was especially diverse in terms of rank, geographic location, academic discipline, size of institution, institutional control (public vs. private), and degrees granted (undergraduate, graduate, doctoral). By not limiting the sample to faculty or academic administrators from one type of school or

discipline the representativeness of the respective populations is notable, thus further strengthening the generalizablity of the results.

Third, the use of conjoint analysis to measure perceptions of legitimacy in institutional research is novel. Conjoint analysis has long been used in marketing related research to measure perceptions of product attributes, but the use of the method in institutional or higher education research is virtually non-existent. As the body of research in institutional theory as well as higher education innovation matures and evolves, new methods and approaches to conducting research are needed. This dissertation fills this gap by applying this established method in these contexts.

Fourth, participants in this study indicated their inclination towards specific behaviors based on membership in one of the groups studied. This is opposed to asking participants to indicate impressions or behaviors in situations from which they have no personal experience. For example, students were asked about their likelihood to enroll in an online business degree program, and business practitioners were asked to indicate the likelihood of hiring a graduate of online business degree program. By asking participants to make hypothetical judgments relative to situations that they are faced with in their everyday lives, the validity of the responses is increased.

Fifth, this dissertation contributes to the institutional theory literature by providing an empirical test of institutional theory in higher education, specifically relative to the emergence of online programs in higher education. The application of institutional theory in this context is both new and appropriate due to the long standing institutional templates indicative of higher education. As a result, this dissertation contributes to both the institutional theory literature as well as the corresponding stream of the higher education literature.

5.2.2 Practical implications.

The practical implications of this dissertation are primarily based on the unique perspectives of each of the four groups studied. The results provided here indicate that different stakeholder groups are influenced by different factors when it comes to the legitimacy based perceptions of online business degree programs. This type of insight can be used by academic administrators in the development and implementation of online business degree programs. Strategically, the successful development and implementation of online programs is contingent upon several factors and the direct involvement of each of the groups included in this study. Academic administrators must identify, acquire, and allocate resources; faculty must be recruited, trained, and provided with resources to teach; students must be recruited to enroll; and business practitioners must be identified and educated in the benefits of the program with the hopes of hiring graduates and/or supporting enrollment of current employees. This research provides practical support relative to each of these tasks. Based on the practical information acquired from this study, developers of new online programs as well as administrators of existing online programs can target their message and efforts towards each of these groups based on the factors that are most important to each specific group.

Additionally, these findings emphasize the importance of accreditation. Accreditation was indicated as being the most important variable influencing legitimacy perceptions across the groups studied. Schools interested in developing an online business degree program that is perceived as legitimate must pursue accreditation.

5.3 Limitations and Future Research Directions

    5.3.1 Limitations.

This dissertation does have limitations that should be considered and addressed in future research. The first limitation is related to the lack of randomness in the student and business practitioner samples. The student participants in this study were students enrolled in business courses at a single four-year state university in the south eastern United States, and the business practitioners were recruited via a snowball approach based on contacts of two relatively small and specific professional groups. Although using students from a single location and an extended network of business contacts are commonly used practices in research, it certainly limits the diversity and randomness of the sample. As a result, the samples used are likely to not be representative of the population. This should be taken into account when generalizing the results across these two groups. This limitation is especially notable in the student subsample and future research should attempt to collect student data from a more diverse sample of students at several locations. The limitations relative to the of the business practitioner subsample should be less problematic due to the diversity present in the current sample. For example, the business practitioner subsample had participants from six different states (Georgia, Iowa, Kentucky, Missouri, Nebraska, and Tennessee), represented a broad span of ages (23-65 years), work experience (2-40 years), and managerial experience (0-35 years).

The second limitation is related to the reliability of the scale developed to measure the cognitive legitimacy construct. The reliability of the cognitive legitimacy scale was especially low across all the groups. Statistically, this is likely due to after factor analyzing the items only two items loaded on the cognitive factor. Conceptually, items related to the knowledge and taken-for-grantedness of online business degree programs was likely so obvious that they were

confusing to participants. By participating in the study and responding to items related to the appropriateness of the online business degree programs there was an implication or assumption of basic knowledge which likely created noise and confusion in the responses to items related to the construct. Future research should either focus on developing additional items that more distinctly measure this construct, or assume a baseline of institutional knowledge exists and remove the cognitive construct from consideration and just focus on the socio-political aspects of legitimacy.

The third limitation is related to the ordering of factors in the conjoint task. The factors in each of the scenarios of the conjoint task were presented in the same order throughout the experiment. This could potentially cause an ordering effect that influenced the results in that the ranking of the factors might follow the order of presentation. In the case of this study, accreditation was the first factor presented in each of the scenarios and it was also the highest ranking factor; however, the other factors' rankings were not consistent with the order they were presented. Therefore, this does not seem to be a major limitation to this study.

The fourth and perhaps most notable limitation is related to the factor combinations that composed each of the scenarios in the conjoint experiment. Some of the combinations were likely perceived as unrealistic to some participants. For example, some participants may have found it difficult to imagine a situation where an online business degree program had a weak reputation, low placement after graduation, was not linked to any other entity, but was accredited by the AACSB; or conversely, had a strong reputation, high placement after graduation, was linked to another entity, but was not accredited. This issue was most likely prevalent with the faculty and academic administrator groups due to their knowledge and familiarity of the AACSB accreditation procedure and requirements. This issue also seemed to be specifically related to the

reputation factor. From a practical point of view, it might be hard to imagine an online business degree program that had a strong reputation but was not accredited, had low placement after graduation, and was not linked to another entity. Future research should consider the combinations and definitions of the factors used and attempt to make all combinations conceptually realistic.

The fifth limitation is related to the economic decision making process that conjoint analysis assumes in that decisions are made based on rational judgments across a set of known factors. In reality, decision making processes are typically more behavioral in nature and rely on any number of factors and influences like intuition and emotion; therefore, some would argue that by presenting four specifically defined factors is unrealistic in that there is no way to be sure that any, let alone all, of the identified factors would factor into legitimacy based decisions. As discussed in Chapter, this is limitation inherent to conjoint analysis in general. Future research should take this into consideration and consider behavioral models of decision making and alternate experimental designs.

The sixth limitation is related to potential bias associated with the definition of the linkage factor. The linkage factor was defined as being "connected to a more legitimate external entity such as a traditional, in-person university or corporation". This definition could potentially indicate researcher bias based on the definition's implication that traditional, in-person universities are inherently more legitimate than ones that are online. From an institutional perspective, the established institutional form, which in this case is traditional and in-person, would be considered as more legitimate than an emerging or new institutional form as in the case of online business degree programs, consequently, any bias associated with this is expected to be minimal.

The final limitations are related to possible common method and self-selection biases. The potential for common method bias is related to the fact that independent variable data and dependent variable data were both collected from the same source. Also, the data was self-reported and participants self-selected their participation. Future research should consider these issues and include measures of actual behavior such as student enrollment or business practitioner hiring.

5.3.2 Future research.

There are ample opportunities for future research to build on the findings of this dissertation. First, future research should consider each of the four stakeholder groups in finer detail by using longer, more detailed scales of legitimacy to attempt to expand on this dissertation's unique findings of each group. For example, future research should examine the business practitioner findings relative to hiring graduates of online business degree programs and the support of current employees enrolling in an online business degree program. The results found here indicate that business practitioners view these two activities differently. It would be interesting to examine this in further detail. Being the most skeptical of the groups studied, faculty perceptions should also be considered in finer detail to attempt to determine the specific aspects of online business degree programs that faculty resist. It could be that faculty's perceptions are a result of resisting change, but could also be that there are more specific online business program related factors that are influencing their perceptions. The perceptions of online as well as traditional students should also be considered. It is likely that the perceptions of these two groups will differ, and it would be interesting for future research to examine the underlying causes for the differences.

This dissertation examined online business degree programs in a general sense. Future research should consider the legitimacy perceptions of different types of programs and in different academic disciplines. For example, future research might examine the perceptual differences between undergraduate and graduate programs. It may be that online programs at the undergraduate level are perceived more or less legitimate than online programs at the graduate level. For-profit (e.g. University of Phoenix) versus not-for-profit programs should also be considered. In this vein, this dissertation also provides ample opportunity to apply this research to other academic disciplines other than business (e.g. sciences, humanities, etc.) or specific disciplines within business (e.g. accounting versus management, etc.). For example, it might be that online business degree programs are viewed as more legitimate than online engineering programs. Or, it might be that online marketing programs are perceived as more legitimate than online accounting programs. This type of approach could be framed in the context of diffusion of innovation. I believe this approach would be especially well suited to build on the seminal work of Tushman and Anderson (1986) in the area that made the distinction between competence enhancing and competence destroying innovations focusing on specific attributes when online programs happily coexist with the establish form by enhancing competencies and other situations where these types of programs may be at odds with the established form and create a competence destroying or disrupting effect.

Next, future research should consider other variables (price, length of program, degrees offered, etc.), additional levels of the current variables studied that might influence perceptions of legitimacy, or other approaches to decision making. This research included two levels of each of the variables studied. Adding additional levels to the reputation and placement after graduation variables could provide finer grained results that offer more insight into those specific

variables. Other types of accreditation should also be considered. This dissertation identified AACSB as the accrediting agency, but it would be interesting to see if any accreditation increases legitimacy or if participants were specifically influenced by the AACSB designation. It might be that faculty and administrators were influenced by the AACSB designation but the student and business practitioner groups would be similarly influenced by any accreditation.

Finally, future research should consider this research in a temporal sense to determine if perceptions of legitimacy change over time. After a period of time, this study could be conducted again to these same groups to see if perceptions of legitimacy were stronger or weaker. This would provide an interesting insight into how institutional forms evolve and become ingrained into the normal operating template of the industry. Related to this it would also be interesting to examine over time if the current and established institutional template has been disrupted by this new and emerging form, or if the new and emerging form, serves as a complimentary form to the existing form.

5.4 Conclusion

This dissertation provides an empirical test of institutional theory in the context of higher education, specifically online business degree programs. An understanding of the legitimacy based perceptions of four key stakeholder groups (students, faculty, academic administrators, and business practitioners) has been gained. Additionally, the legitimacy influencing effect of four program-related variables (accreditation, reputation, placement after graduation, linkage) have been examined and each were found to be positive influencers of legitimacy, with accreditation having the strongest influence. Based on the findings of this dissertation, I can conclude that online business degree programs are achieving legitimacy and are being accepted as an appropriate institutional form. Although the strength of the legitimacy perceptions differed

across each of the stakeholder groups, there seemed to be some consensus of the current and potential impact of online business degree programs. From this perspective, there are certainly skeptics of online business degree programs, but these types of programs are becoming more and more established. I hope this research sheds some light on this rapidly growing institutional form within higher education, and encourages future research in this area.

REFERENCES

Adams, J. (2008). Understanding the factors limiting the acceptability of online courses and degrees. *International Journal on E-Learning, 7*(4), 573-587.

Adams, J., & DeFleur, M. H. (2005). The acceptability of a doctoral degree earned online as a credential for obtaining a faculty position. *The American Journal of Distance Education, 19*(2), 71-85.

Aiken, K. D., & Koch, E. C. (2009). A conjoint approach investigating factors in initial team preference formation. *Sport Marketing Quarterly, 18*, 81-91.

Aiman-Smith, L., Scullen, S., & Barr, S. (2002). Conducting studies of decision making in organizational contexts: A tutorial for policy-capturing and other regression based techniques. *Organizational Research Methods, 5*(4), 388-414.

Aldrich, H. E., & Fiol, C. M. (1994). Fools rush in? The institutional context of industry creation. *Academy of Management Review, 19*(4), 645-670.

Allen, I. E., & Seaman, J. (2008). Online education in the United States, 2008 (pp. 1-23): The Sloan Consortium.

Allen, I. E., & Seaman, J. (2010). Learning on demand: Online education in the United States, 2009 (pp. 1-24): The Sloan Consortium.

Armstrong, L. (2001). A new game in town: Competition in higher education. *Information, Communication & Society, 4*(4), 479-506.

Ashworth, R., Boyne, G., & Delbridge, R. (2007). Escape from the iron cage? Organizational change and isomorphic pressures in the public sector. *Journal of Public Administration Research and Theory, 19*, 165-187.

Bansal, P., & Clelland, I. (2004). Talking trash: legitimacy, impression management, and unsystematic risk in the context of the natural environment. *Academy of Management Journal, 47*(1), 95-103.

Barreto, I., & Baden-Fuller, C. (2006). To conform or to perform? Mimetic behaviour, legitimacy-based groups and performance consequences. *Journal of Management Studies, 43*(7), 1559-1581.

Bastedo, M., & Bowman, N. (2010). U.S. News & World Report college rankings: Modeling institutional effects on organizationl reputation. *American Journal of Education, 116*(2), 163-183.

Baum, J. A. C., & Oliver, C. (1991). Institutional linkages and organizational mortality. *Administrative Science Quarterly, 36*(2), 187-218.

Beck, N., & Walgenbach, P. (2003). ISO 9000 and formalization - How organizational contingencies affect organizational responses to institutional forces. *Schmalenbach Business Review, 55*(4), 294-320.

Beggs, J. M., Bantham, J. H., & Taylor, S. (2008). Distinguishing the factors influencing college students' choice of major. *College Student Journal, 42*(2), 381-394.

Benton, T. H. (2009). Online Learning: Reaching Out to the Skeptics. *Chronicle of Higher Education, 56*(4/5), A36-A38.

Berger, P. L., & Luckman, T. (1966). *The social construction of reality: A treatise in the sociology of knowledge* (Part II ed.). New York: Doubleday.

Berrone, P., & Gomez-Mejia, L. R. (2009). Environmental performance and executive compensation: An integrated agency-institutional perspective. [Article]. *Academy of Management Journal, 52*(1), 103-126.

Blaufus, K., & Ortlieb, R. (2009). Is simple better? A conjoint analysis of the effects of tax complexity on employee preferences concerning company pension plans. *Schmalenbach Business Review, January*, 60-83.

Bowman, N. A., & Bastedo, M. N. (2009). Getting on the front page: Organizational reputation, status signals, and the impact of U.S. News and World Report on student decisions *Research in Higher Education, 50*(5), 415-436.

Brooks, M. (2009, May, 29). The excellent inevitability of online courses. *The Chronicle of Higher Education, 55,* A64.

Brown, A. J., Swinyard, W., & Ogle, J. (2003). Women in academic medicine: A report of focus groups and questionnaires, with conjoint analysis. *Journal of Women's Health, 12*(10), 999-1008.

Bunduchi, R., Graham, I., Smart, A., & Williams, R. (2008). Homogeneity and heterogeneity in information technolgy private standard settings - The institutional account. *Technology Analysis & Strategic Management, 20*(4), 389-407.

Campbell, J. L. (2007). Why would corporations behave in socially responsible ways? An institutional theory of corporate social responsibility. *Academy of Management Review, 32*(3), 946-947.

Carnegie. (2005). The carnegie classification of institutions of higher education Retrieved September 27, 2010, from http://classifications.carnegiefoundation.org/

Carnevale, D. (2007, January 5). Employers often distrust online degrees. *The Chronicle of Higher Education, 53,* A28.

Carnevale, D. (2007). Nonprofit institutions could make gains in online education, report says. *The Chronicle of Higher Education, 53*(31), A30.

Cattani, G., Ferriani, S., Negro, G., & Perretti, F. (2008). The structure of consensus: Network ties, legitimation, and exit rates of U.S. feature film producer organizations. *Administrative Science Quarterly, 53*, 145-182.

Chan, C. M., Isobe, T., & Makino, S. (2008). Which country matters? Institutional development and foreign affliate performance. *Strategic Management Journal, 29*, 1179-1205.

Chen, W.-R., & Miller, K. D. (2007). Situational and institutional determinants of firms' R&D search intensity. *Strategic Management Journal, 28*(4), 369-381.

Child, J., Lu, Y., & Tsai, T. (2007). Institutional entrepreneurship in building an environmental protection system for the People's Republic of China. *Organization Studies, 28*(07), 1013-1034.

Chung, C.-N., & Luo, X. (2008). Human agents, contexts, and institutional change: The decline of family in the leadership of business groups. *Organization Science, 19*(1), 124-142.

Chung, C.-N., & Luo, X. (2008). Institutional logics or agency costs: The influence of corporate governance models on business group restructuring in emerging economies. *Organization Science, 19*(5), 766-784.

Chung-Hung, H. (2005). Exploring Employed-learners' Choice Profiles for VMBA Programs. *Journal of American Academy of Business, Cambridge, 7*(2), 203-211.

Clift, E. (2009). I'll Never Do It Again. *Chronicle of Higher Education, 55*(38), A33-A34.

Columbaro, N., & Monaghan, C. (2009). Employer perceptions of online degrees: A literature review. *Online Journal of Distance Learning Administration, 12*(1).

Corcoran, D. J., & Shackman, J. D. (2007). A theoretical and empirical analysis of the strategic value of beyond compliance occupational health and safety programs. *Journal of Business Strategies, 24*(1), 49-68.

Cox, R. D. (2005). Online education as institutional myth: Rituals and realities at community colleges. *Teachers College Record, 107*(8), 1754-1787.

Dacin, M. T., Oliver, C., & Roy, J.-P. (2007). The legitimacy of strategic alliances: An institutional perspective. *Strategic Management Journal, 28*, 169-187.

Deephouse, D. L. (1996). Does isomorphism legitimate? *Academy of Management Journal, 39*(4), 1024-1039.

Deephouse, D. L., & Carter, S. M. (2005). An examination of differences between organizational legitimacy and organizational reputation. *Journal of Management Studies, 42*(2), 329-360.

Denstadli, J. M. (Rune Lines). Conjoint respondents as adaptive decision makers. *International Journal of Market Research, 49*(1), 117-132.

Dijkstra, J., & Timmermans, H. J. P. (1997). Exploring the possibilities of conjoint measurement as a decision-making tool for virtual wayfinding envinroments. 1-10.

Dimaggio, P. J., & Powell, W. W. (1983). The iron cage revisited: Institutional isomorphism and collective rationality in organizational fields. *American Sociological Review, 48*(2), 147-160.

Ding, M., Park, Y.-H., & Bradlow, E. T. (2009). Barter markets for conjoint analysis. *Management Science, 55*(6), 1003-1017.

Dobbs, R. R., Waid, C. A., & Carmen, A. d. (2009). Students' perceptions of online courses: The effect of online course experience. *The Quarterly Review of Distance Education, 10*(1), 9-26.

Dobrev, S. D., Ozdemir, S. Z., & Teo, A. C. (2006). The ecological interdependence of emergent and established organizational populations: Legitimacy transfer, violation by comparison, and unstable identities. *Organization Science, 17*(5), 577-597.

Eich, D. (2008). A grounded theory of high-quality leadership programs: Perspectives from student leadership development programs in higher education. *Journal of Leadership & Organizational Studies, 15*(2), 176-187.

Feldman, D. C. (1984). The development and enforcement of group norms. *The Academy of Management Review, 9(1),* 47-53.

Fligstein, N. (1985). The spread of the multidivisional form among large firms, 1919-1979. *American Sociological Review, 50*(3), 377-391.

Folkers, D. A. (2005). Competing in the marketspace: Incorporating online education in higher education - An organizational perspective. *Information Resources Management Journal, 18*(1), 61-77.

Foster, A. L. (2007, April 27). Illinois plans to draw 70,000 students to distance education by 2018. *The Chronicle of Higher Education, 53,* A50.

Galvin, T. L. (2002). Examining institutional change: Evidence from the founding dynamics of U.S. health care interest associations. *Academy of Management Journal, 45*(4), 673-696.

Gambescia, S. F., & Paolucci, R. (2009). Academic fidelity and integrity as attributes of university online degree program offerings. *Online Journal of Distance Learning Administration, 12*(1).

Gaytan, J. (2009). Analyzing online education through the lens of institutional theory and practice: The need for research based and validated frameworks for planning, designing, delivering, and assessing online instruction. *The Delta Pi Epsilon Journal, LI*(2), 62-75.

George, E., Chattopadhyay, P., Sitkin, S. B., & Barden, J. (2006). Cognitive underpinnings of institutional persistence and change: A framing perspective. *Academy of Management Review, 31*(2), 347-365.

Gibbs, J. L., & Kraemer, K. L. (2004). A cross-country investigation of the determinants of scope of e-commerce use: An institutional approach. *Electronic Markets, 14*(2), 124-137.

Greenwood, R., Suddaby, R., & Hinings, C. R. (2002). Theorizing change: The role of professional associations in the transformation of institutionalized fields. *Academy of Management Journal, 45*(1), 58-80.

Greer, J. (2010, January 26). Study: Online education continues its meteoric growth. *U.S. News & World Report*.

Guler, I., Guillén, M. F., & Macpherson, J. M. (2002). Global competition, institutions, and the diffusion of organizational practices: The international spread of ISO 9000 quality certificates. *Administrative Science Quarterly, 47*(2), 207-232.

Gumport, P. J., & Snydman, S. K. (2002). The formal organization of knowledge: An analysis of academic structure. *The Journal of Higher Education, 73*(3), 375-408.

Gupta, S., Bhattacharya, T., Agrawal, S., & Garg, M. (2009). Location attractiveness as a derteminant of firms' offshoring intensity. *The Icfai University Journal of Supply Chain Management, VI*(2), 56-66.

Haunschild, P. R., & Miner, A. S. (1997). Modes of interorganizational imitation: The effects of outcome salience and uncertainity. *Administrative Science Quarterly, 42*(3), 472-500.

Heugens, P. P. M. A. R., & Lander, M. W. (2009). Structure! agency! (and other quarrels): A meta-analysis of institutional theories of organization. [Article]. *Academy of Management Journal, 52*(1), 61-85.

Holm, P. (1995). The dynamics of institutionalization: Transformation processes in norwegian fisheries. *Administrative Science Quarterly, 40*(3), 398-422.

Honig, B., & Karlsson, T. (2004). Institutional forces and the written business plan. *Journal of Management, 30*(1), 29-48.

Howard, M. W., & Sobol, M. G. (2004). Combining economic and conjoint analysis to determine optimal academic services. *Decision Sciences Journal of Innovative Education, 2*(1), 27-44.

Institute, H. E. R. (2010). The american freshman: National norms fall 2009 (pp. 1-4). Los Angeles.

Jackson, G., & Deeg, R. (2008). From comparing capitalisms to the politics of institutional change. *Review of International Political Economy, 15*(4), 680-709.

Jarzabkowski, P. (2008). Shaping strategy as a structuration process. *Academy of Management Journal, 51*(4), 621-650.

Jensen, M., & Roy, A. (2008). Staging exchange partner choices: When do status and reputation matter? *Academy of Management Journal, 51*(3), 495-516.

Jones, G. R., & George, J. M. (2011). *Contemporary management. 7ed.* New York: McGraw-Hill Irwin.

Jonsson, S. (2009). Refraining from imitation: Professional resistance and limited diffusion in a financial market. *Organization Science, 20*(1), 172-186.

Julian, S., & Ofori-Dankwa, J. (2006). Is accreditation good for the strategic decision making of traditional business schools? *Academy of Management Learning and Education, 5*(2), 225-233.

Katz, R. N., & Associates. (1999). *Dancing with the devil*. San Francisco: Josey-Bass, Inc.

Keller, R. H. (2008). Online education as a disruptive technology: A theoretical perspective. *The Journal of Learning in Higher Education, 4*(1), 19-25.

Kennedy, M. T., & Fiss, P. C. (2009). Institutionalization, framing, and diffusion: The logic of TQM adoptioin and implmentation decisions among U.S. hospitals. *Academy of Management Journal, 52*(5), 897-918.

Kerr, C. (1987). A critical age in the university world: Accumulated heritage versus modern imperatives. *European Journal of Education, 22*(2), 183-193.

Knox, W. E., Lindsay, P., & Kolb, M. N. (1992). Higher education, college characteristics, and student experiences: Long-term Effects on educational satisfactions and perceptions. *The Journal of Higher Education, 63*(3), 303-328.

Kolowich, S. (2009, January 16). Recession may drive more adult students to take online courses. *The Chronicle of Higher Education, 55,* A11.

Kostova, T., Roth, K., & Dacin, M. T. (2008). Institutional theory in the study of multnational corporations: A critique and new directions. *Academy of Management Review, 33*(4), 994-1006.

Kraatz, M. S. (1998). Learning by association? Interorganizational networks and adaptation to environmental change. *Academy of Management Journal, 41*(6), 621-643.

Kuilman, J. G., & Li, J. (2009). Grades of membership and legitimacy spillovers: Foreign banks in Shanghai, 1847-1935. *Academy of Management Journal, 52*(2), 229-245.

Lanfranchi, J., Narcy, M., & Larguem, M. (2010). Shedding new light on intrinsic motivation to work: Evidence from a discrete choice experiment. *Kyklos, 63*(1), 75-93.

Lawrence, T. B., & Suddaby, R. (2006). Institutions and institutional work. In S. R. Clegg, C. Hardy, T. B. Lawrence & W. R. Nord (Eds.), *The sage handbook of organization studies* (2nd ed., pp. 251-254). London: SAGE Publications, Inc.

Lee, J. A., & Busch, P. E. (2005). Factors related to instructors' willingness to participate in distance education. *The Journal of Educational Research, 99*(2), 109-115.

Lee, K., & Pennings, J. M. (2002). Mimicry and the market: Adoption of a new organizational form. *Academy of Management Journal, 45*(1), 144-162.

Levine, A., & Sun, J. C. (2002). *Barriers to distance education*. Washington, DC: American Council on Education.

Li, J., Yang, J. Y., & Yue, D. R. (2007). Identity, community, and audience: How wholly owned foreign subsidiaries gain legtimacy in China. *Academy of Management Journal, 50*(1), 175-190.

Liang, H., Saraf, N., Hu, Q., & Xue, Y. (2007). Assimilatoin of entrerprise systems: The effect of institutional pressures and the mediating role of top management. *MIS Quarterly, 31*(1), 59-87.

Louviere, J. J. (1988). *Analyzing decision making: Metric conjoint analysis*. Newbury Park, California: SAGE Publications, Inc.

Maguire, S., & Hardy, C. (2009). Discourse and deinstitutionalization: The decline of DDT. *Academy of Management Journal, 52*(1), 148-178.

Mark, D. R., Lusk, J. L., & Daniel, M. S. (2004). Recruiting agricultural economics graduate students: Student demand for program attributes. *American Journal of Agricultural Economics, 86*(1), 175-184.

McFarland, R. G., Bloodgood, J. M., & Payan, J. M. (2008). Supply chain contagion. *Journal of Marketing, 72*, 63-79.

Meyer, J. W., & Rowan, B. (1977). Institutionalized organizations: Formal structure as myth and ceremony. *The Amercian Journal of Sociology, 83*(2), 340-363.

Meyer, K. E., Estrin, S., Bhaumik, S. K., & Peng, M. W. (2009). Institutions, resources, and entry strategies in emerging economies. *Strategic Management Journal, 30*, 61-80.

Mezias, S. J. (1990). An institutional model of organizational practice: Financial reporting at the Fortun 200. *Administrative Science Quarterly, 35*, 431-457.

Mizruchi, M. S., & Fein, L. C. (1999). The social construction of organizational knowledge: A study of the uses of coercive, mimetic, and normative isomorphism. *Administrative Science Quarterly, 44*(4), 653-683.

Monsen, E., Patzelt, H., & Saxton, T. (2010). Beyond simple utility: Incentive design and trade-offs for corporate employee-entrepreneurs. *Entrepreneurship Theory and Practice, 34*(1), 83-103.

Munir, K. A., & Phillips, N. (2005). The birth of the 'Kodak Moment': Institutional entrepreneurship and the adoption of new technologies. *Organization Studies, 26*(11), 1665-1687.

Mutch, A. (2007). Reflexivity and the institutional entrepreneur: A historical exploration. *Organization Studies, 28*(7), 1123-1140.

Norwood, F. B., & Henneberry, S. R. (2006). Show me the money! The value of college graduate attributes as expressed by employers and perceived by students. *American Journal of Agricultural Economics, 88*(2), 484-498.

Orme, B. (2009). Which conjoint method should I use? In S. Software (Ed.), *Research Paper Series* (pp. 1-6).

Patzelt, H., & Shepherd, D. A. (2009). Strategic entrepreneurship at universities: Academic entrepreneurs' assessment of policy programs. *Entrepreneurship Theory and Practice, 33*(1), 319-340.

Pearson, A. M., & Keller, H. (2009). Explaining web technology diffusion: An institutional theory perspective. *Communications of the Association for Information Systems, 25*(44), 593-606.

Peat, J. A., & Helland, K. R. (2004). *The competitive advantage of online versus traditional education.* Paper presented at the Academy of Human Resource Development International Conference, Austin, Tx.

Pietrzak, D., Duncan, K., & Korcuska, J. S. (2008). Counseling students' decision making regarding teaching effectiveness: A conjoint analysis. *Counselor Education & Supervision, 48*(December), 114-132.

Provan, K. G. (1987). Environmental and organizational predictors of adoption of cost containment policies in hospitals. *Academy of Management Journal, 30*(2), 219-239.

Purdy, J. M., & Gray, B. (2009). Conflicting logics, mechanisms of diffusion, and multilevel dynamics in emerging institutional fields. *Academy of Management Journal, 52*(2), 355-380.

Robst, J. (2001). Cost efficiency in public higher education institutions. *The Journal of Higher Education, 72*(6), 730-750.

Romero, E. J. (2008). AACSB accreditation: Addressing faculty concerns. *The Academy of Management Learning and Education, 7*(2), 245-255.

Royne, M. B. (2008). Cautions and concerns in experimental research on the consumer interest. *The Journal of Consumer Affairs, 42*(3), 478-483.

Ruef, M. (2000). The Emergence of Organizational Forms: A Community Ecology Approach. [Article]. *American Journal of Sociology, 106*(3), 658-714.

Ruef, M. (2004). For whom the bell tolls: ecological perspectives on industrial decline and resurgence. [Article]. *Industrial & Corporate Change, 13*(1), 61-89.

Safon, V. (2007). Factors that influence recruiters' choice of b-schools and their MBA graduates: Evidence and implications for b-schools. *Academy of Management Learning and Education, 6*(2), 217-233.

Sanders, W. G., & Tuschke, A. (2007). The adoption of institutionally contested organizational practices: The emergence of stock option pay in Germany. *Academy of Management Journal, 50*(1), 33-56.

Sauder, M., & Fine, G. A. (2008). Arbiters, entrepreneurs, and the shaping of business school reputations. *Sociological Forum, 23*(4), 699-723.

Schofer, E., & Meyer, J. W. (2005). The worldwide expansion of higher education in the twentieth century. *American Sociological Review, 70*, 898-920.

Scott, R. W. (1995). *Institutions and organizations*. Thousand Oaks: SAGE.

Scott, R. W. (2001). *Institutions and organizations* (2nd ed.). Thousand Oaks: SAGE.

Scott, W. (2008). Approaching adulthood: the maturing of institutional theory. *Theory and Society, 37*(5), 427-442.

Scott, W. R. (2005). Institutional theory: Contributing to a theoretical research program. In K. G. Smith & M. A. Hitt (Eds.), *Great minds in management: The process of theory development*. Oxford: Oxford University Press.

Seaman, J. (2009). Online learning as a strategic asset, Volume II: The paradox of faculty voices: views and experiences with online learning (pp. 1-47): Association of Public and Land-Grant Universities.

Shepherd, D., & Zacharakis, A. (1997). Conjoint analysis: A new methodological approach for researching the decision policies of venture capitalist. *Venture Capitalist, 1*(3), 197-217.

Sherif, M. (1937). An experimental approach to the study of attitudes. *Sociometry, 1(1),* 90-98.

Shi, W., Shambare, N., & Wang, J. (2008). The adoption of internet banking: An institutional theory perspective. *Journal of Financial Services Marketing, 12*(4), 272-286.

Simon, H. A. (1987). Making management decisions: The role of intuition and emotion. *Academy of Management Executive, 1*, 57-64.

Singh, J. V., Tucker, D. J., & House, R. J. (1986). Organizational legitimacy and the liability of newness. *Administrative Science Quarterly, 31*(2), 171-193.

Son, J.-Y., & Benbasat, I. (2007). Organizational buyers' adoption and use of b2b electronic marketplaces: Efficiency- and legitimacy oriented perspectives. *Journal of Management Information Systems, 24*(1), 55-99.

Teo, H. H., Wei, K. K., & Benbasat, I. (2003). Predicting intention to adopt interorganizational linkages: An institutional perspective. *MIS Quarterly, 27*(1), 19-49.

Tolbert, P. S., & Zucker, L. G. (1983). Institutional sources of change in the formal structure of organizations: The diffusion of civil service reform, 1880-1935. *Administrative Science Quarterly, 28*(1), 22-39.

Tushman, M. & Anderson, P. (1986). Technological discontinuities and organizational environments. *Administrative Science Quarterly, 31*, 439-465.

Venard, B., & Hanafi, M. (2007). Organizational isomorphism and corruption in financial institutions: Empirical research in emerging countries. *Journal of Business Ethics, 81*, 481-498.

Wang, P., & Swanson, E. B. (2007). Launching professional services automation: Institutional entrepreneurship for information technology innovations. *Information and Organization, 17*, 59-88.

Westphal, J. D., Gulati, R., & Shortell, S. M. (1997). Customization or conformity? An institutional and network perspective on the content and consequences of TQM adoption. *Administrative Science Quarterly, 42*, 366-394.

Wyatt, G. (2005). Satisfaction, academic rigor and interaction: Perceptions of online instruction. *Education, 125*(3), 460-468.

Young, J. R. (2008, July 18). $4-a-gallon gas drives more students to online courses. *The Chronicle of Higher Education, 53,* A30.

Zikmund, W. (2003). *Business research methods* (7 ed.). Mason, Ohio: South-Western.

Zucker, L. G. (1977). The role of institutionalization in cultural persistence. *American Sociological Review, 42*(5), 726-743.

Zucker, L. G. (1998). Where do institutional patterns come from? Organizations as actors in social systems. In L. G. Zucker (Ed.), *Institutional Patterns and Organizations: Culture and Environment* (pp. 23-49). Cambridge, Mass: Ballinger

APPENDICES

APPENDIX A

DEMOGRAPHIC INFORMATION

A1. Items for All Subsamples.

1. Gender   ____ Male
         ____ Female

2. Age   ____ (years)

3. Ethnicity   ____ Caucasian (White)
         ____ African or African American
         ____ Asian or Asian American
         ____ Hispanic
         ____ Other (Please specify)

4. Marital Status   ____ Single
         ____ Married

5. In what state do you currently reside?

6. Please indicate the highest level of education you have completed.
         ____ High School Diploma
         ____ Some College
         ____ Associate's Degree
         ____ Bachelor's Degree
         ____ Graduate or Professional Degree
         ____ Doctoral Degree

7. Have you ever taken an online course?
         ____ Yes
         ____ No

8. How many online courses have you taken (including the current semester)?
         ____ 1-5
         ____ 6-10
         ____ 11-15
         ____ 16-20
         ____ More than 20

9. Please indicate which of the following best describes you currently.
         ____ Student
         ____ Faculty
         ____ Academic Administrator (including Department Chair)
         ____ Business Practitioner

A2. Items for Student Subsample.

1. What school are you currently attending?

2. I know someone that has taken courses in an online business degree program.
    ___Yes   ____No

3. What is current major/area of study?

4. What is your current classification?
    ____ Freshman   ____ Senior
    ____ Sophomore   ____ Graduate
    ____ Junior

A3. Items for Faculty Subsample.

1. At what school are you currently on the faculty?

2. Have you ever taught an online course?

3. What is your academic discipline?

4. I know someone that has taught courses in an online business degree program.
    ___Yes   ____No

5. I know someone that has taken courses in an online business degree program.
    ___Yes   ____No

6. What is your current faculty rank?
    ____ Lecturer
    ____ Assistant Professor
    ____ Associate Professor
    ____ Full Professor

7. How many online courses have you taught (including the current semester)?
    ____1-5
    ____6-10
    ____11-15
    ____16-20
    ____ More than 20

A4. Items for Academic Administrator Subsample.
1. At what school are you currently an administrator?

2. Which of the following best describes your current administrative position?
   _____ Department Chair
   _____ Assistant/Associate Dean
   _____ Dean
   _____ Assistant/Associate Vice President/Provost
   _____ Vice President/Provost
   _____ President

3. Have you ever taught an online course?
   ___yes   ___no

4. I know someone that has taught in an online business degree program.
   ___yes   ___no

5. I know someone that has taken courses in an online business degree program.
   ___yes   ___no

6. How many online courses have you taken (including the current semester)?
   _____1-5
   _____6-10
   _____11-15
   _____16-20
   _____ More than 20

A5. Items for Business Practitioner Subsample.
1. Which of the following best describes the size of your current organization?
   _____ Less than 25 employees
   _____ 26-50 employees
   _____ 50-100 employees
   _____ More than 100 employees

2. Have you ever been responsible for final hiring decisions?
   _____ Yes
   _____ No

3. Have you ever been a member of a hiring committee?
   _____ Yes
   _____ No

4. How many years of work experience do you have?

5. How many years of managerial experience do you have?

6. I know someone that has taken courses in an online business degree program.
   ____ Yes
   ____ No

APPENDIX B

COGNITIVE AND SOCIO-POLITICAL ITEMS

B1. Instructions.
The following questions ask about your perceptions of the legitimacy of online business degree programs. Please respond to each question by using the scale below. Please select the response that most accurately describes you. Please answer open and honestly, there are no right or wrong answers.

1	2	3	4	5
strongly disagree	moderately disagree	neutral or uncertain	moderately agree	strongly agree

B2. Cognitive Legitimacy Items – All Subsamples
1. I take it for granted that business programs are offered online.
2. I assume that business programs are offered online.
3. I have no knowledge of business degree programs being offered online.

B3. Socio-political Items – All Subsamples
1. It is appropriate that business degree programs are offered online.
2. Business degree programs should not be offered online.
3. I do not feel that online business degree programs are appropriate.
4. Online business degree programs are legitimate.
5. Online business degree programs are not legitimate.

B3.1 Student subsample.
1. I would recommend online business degree programs to others.
2. I would enroll in an online business degree program.

B3.2 Faculty subsample.
1. I would advise students to enroll in an online business degree program.

B3.3 Academic administrator subsample.
1. Online business degree programs are critical to the long-term strategy of my institution.
2. I would support the development of an online business degree program at my institution.
3. Online business degree programs are critical to the future of higher education.

B3.4 Business practitioner subsample.
1. I would hire a graduate from an online business degree program at my organization.
2. I would encourage my current employees to enroll in an online business degree program.
3. Given the availability of resources, I would pay for my current employees to enroll in an online business degree program.

APPENDIX C

CONJOINT ANALYSIS EXPERIMENT

C1. Task Instructions
In this part of the study, you will be asked to evaluate an online business degree program relative to specific program characteristics. Your task is to decide how legitimate you perceive an online business degree program given the program characteristics provided in the following scenarios. When making these decisions, please assume the following:

- Consider any other factors (e.g. price, convenience, etc.) that you feel would influence your decision to enroll in an online business degree program as constant, equal, and satisfactory across all scenarios.

Please consider each scenario of the 23 scenarios as a separate decision, independent of all other scenarios presented in this portion of the study.

Important:
Due to incomplete questionnaires being unusable in the statistical analysis, you must respond to all scenarios presented in this portion of the study. All responses will be anonymous and remain confidential. Reference to any individual response will never be made in any report, presentation, or publication.

C2. Sample Scenario.
Indicate your perception of the legitimacy of an online business degree program that has the following characteristics:

ACCREDIDATION: YES- The program is accredited by an appropriate external entity.

REPUTATION: STRONG- The program has earned a level of prestige and is considered very reputable based on its past performance.

PLACEMENT AFTER GRADUATION: LOW- A very small number of the program's graduates gain employment upon completion of the program.

LINKAGE: YES- The online business degree program is formally connected to a more legitimate external entity such as a traditional, in-person university or corporation.

Perception of Legitimacy

My perception of the legitimacy of an online business degree program with these characteristics:

Not Very Legitimate										Very Legitimate
1	2	3	4	5	6	7	8	9	10	11

APPENDIX D

POST-EXPERIMENT QUESTIONAIRRE

The following questions relate to your experience and approach to participating in this experiment. Please carefully recall the series of tasks and respond accordingly.

1. How motivated were you to take part in this research?

   Not Very   Very
   Motivated   Motivated
        1   2   3   4   5

2. How committed were you to completing the research tasks?

   Not Very   Very
   Committed   Committed
        1   2   3   4   5

3. How much effort did you put into making decisions about the legitimacy of online business degree programs under the given conditions?

   Very Little   A great deal of
   Effort   Effort
        1   2   3   4   5

4. How well did you understand the tasks you were asked to complete?

   Did Not   Fully
   Understand   Understood
        1   2   3   4   5

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Keller, H. & Cox, J. R. (2004). The proteomics stock market project: A cross-disciplinary collaboration in biochemistry and business education. *Journal of Chemical Education,* 81: 519-522.