2016

Decision-Making on Technology Deployment for Online Programs at Historically Black Institutions

Shirley M. McClellan
Walden University

Walden University

College of Education

This is to certify that the doctoral dissertation by

Shirley McClellan

has been found to be complete and satisfactory in all respects,
and that any and all revisions required by
the review committee have been made.

Review Committee
Dr. James Keen, Committee Chairperson, Education Faculty
Dr. Daniel Salter, Committee Member, Education Faculty
Dr. Estelle Jorgensen, University Reviewer, Education Faculty

Chief Academic Officer
Eric Riedel, Ph.D.

Walden University
2016

Decision-Making on Technology Deployment for Online Programs at Historically Black Institutions

by

Shirley M. McClellan

MA, University of Iowa, 1981

BS, Southern Illinois University, 1975

Dissertation Submitted in Partial Fulfillment

of the Requirements for the Degree of

Doctor of Philosophy

Education

Walden University

August 2016

Abstract

Historically Black colleges and universities (HBCUs) lag behind predominantly White institutions in their production of online courses and degree programs because of nonexistent or inadequate technology training for faculty members and limited financial resources. The purpose of this qualitative comparative case study was to obtain insight into how decisions are made on technology deployment and integration of online programs at HBCUs. Guided by Donaldson's contingency theory, this case study addressed how decisions are determined at HBCUs to integrate online learning programs into the curriculum and how the individuals who make these decisions perceive online learning programs. Survey responses were collected from 16 administrators, chief information officers, and faculty department heads at 3 HBCUs. Frequency data from the surveys led to themes were confirmed by the analysis of interviews and campus documents. Emergent themes included the integration of online programs, interest in online learning, incentives/compensation and release time, mission and goal statements, strategic plans, and professional development. All 3 HBCUs have a process in place for measuring progress and updating strategic plans. Only 1 HBCU had incentives to encourage faculty or administrators to participate in technology deployment, although all 3 HBCUs offered professional development courses and seminars. Online learning was not included in any of the 3 HBCUs' mission and goal statements. Faculty interest in teaching online courses was high at 2 of the HBCUs. Among the implications of these findings for research and practice was the possibility of promoting positive social change through developing and applying improved strategies for technology deployment at HBCUs that might provide better services to students.

Decision-Making on Technology Deployment for Online Programs at Historically Black Institutions

by

Shirley M. McClellan

MA, University of Iowa, 1981

BS, Southern Illinois University, 1975

Dissertation Submitted in Partial Fulfillment

of the Requirements for the Degree of

Doctor of Philosophy

Education

Walden University

August 2016

Dedication

This dissertation is dedicated to God because without his presence, this endeavor would not have been possible. It is also dedicated to my parents, Henry and Gertrude Webb (posthumously), who always provided for me and wanted the best for me, especially a good education so that I may be able to inspire others to pursue their dreams.

Acknowledgments

I am especially grateful to my mentor and my dissertation committee member, Dr. Daniel W. Salter. I am also especially grateful to my former methodologist and dissertation chair, Dr. Kurt W. Schoch; Dr. James P. Keen, my dissertation chair; and Dr. Cheryl Keen for being so helpful during my transition. I appreciate all of the encouragement and guidance they have given to me during this long academic journey. Thank you for pushing me to use my highest intellectual abilities.

I would like to thank the Walden University Institutional Review Board for making sure that I followed all of the required guidelines to complete this study. I also would like to thank the Institutional Review Boards of the three institutions that granted me permission to pursue this study. I want to thank the participants in this study. Without their candid responses, this study could not have been completed. I also want to thank everyone who has provided suggestions, support, and encouragement to me throughout my doctoral program.

Table of Contents

List of Tables

Chapter 1: Introduction to the Study

During the past 20 years, technological advances have made profound transformations in how higher education institutions deliver education (Kurre, Ladd, Foster, Monahan, & Romano, 2012; Sturgis, 2012). Understandably, national and international attention is now being focused on the science, technology, engineering, and mathematics (STEM) disciplines because they are the underlying basis for partnerships and collaborations in the global, technology-based economy (Owens, Shelton, Bloom, & Cavil, 2012). Despite the added attention to the STEM disciplines, there is a short supply of individuals-in particular, women and ethnic minorities- educated in these areas, (Owens et al., 2012). For example, many middle and high school students are not taking rigorous STEM subjects which has resulted in graduates with poor science and mathematics abilities in preparation for advanced STEM courses in college (Owens et al., 2012). Because of this lack of academic achievement in STEM, President Barack Obama encouraged schools to become more current and to adopt improved technology to instruct, evaluate, and administer coursework (Sturgis, 2012). This research project examined how academic administrators made these strategic decisions about technology with a specific focus on the challenges faced at historically Black colleges and universities (HBCUs).

The major sections of Chapter 1 includes background information on the effect of technology on HBCUs, the problem statement, the purpose of the study, the research questions, the theoretical framework, the nature of the study, and the methodology. In Chapter 1, I provide definitions of key concepts, assumptions, scope and delimitations, potential transferability, limitations of study, significance, and the summary.

A call for more degree programs that offer competitive employability skills and convenience for working adults has not necessarily aligned with the realities of achieving those goals, especially in light of increasing pressure to offer degrees online (Kurre et al., 2012). Higher education institutions have had to respond to tuition increases, declining government financial support, increased competition from the for-profit sector, ethical challenges regarding profit-making and financial accountability, and changing regulations from accreditors (Kurre et al., 2012). Although numerous research articles and books have been written about online education, which I reviewed in Chapter 2, the effect of these changes on HBCUs has not been adequately addressed in the scholarship in higher education (Moore, 2008). This challenge to HBCUs is important because, as they fall behind traditional institutions in offering online courses and degree programs, they are less able to meet their mission and address the recognized technology gap for African American students (Flowers, White, Raynor, & Bhattacharya, 2012).

Higher education institutions face increased challenges when including technology into institutional decision-making (Thor, 2013), and academic administrators have fallen well below the private sector in using technology's full potential. Although plenty of data exist, it was the lack of skills to determine what the data mean-compounded with a commitment to data-driven management-that seemed to be at the heart of the problem (Thor, 2013). Unfortunately, like many institutions, HBCUs have struggled to plan appropriately to keep up with technological innovations that they could not anticipate (Hawkins, 2013; Kelderman, 2010; Nworie, Nworie, & Mintah, 2010).

Background

For the past few decades, technological advances have changed how higher education institutions deliver education (Kurre et al., 2012; Sturgis, 2012). One area of particular national and international attention has been the STEM disciplines (Owens et al., 2012). The call for more degree programs that offer competitive employability skills and convenience for working adults has caused technological changes in how instruction is delivered (Kurre et al., 2012). The pressures of declining enrollment have also caused universities to consider new strategies of increasing enrollment (Kurre et al, 2012). Because of these pressures, colleges and universities are offering more online courses and degree programs (Kurre et al, 2012).

According to Smith (2011), chairperson of the board of directors for the United States Distance Learning Association, several HBCUs found themselves in a predicament regarding declining enrollments, decreasing endowments, and demands for more distance learning opportunities, in particular. In 2007, the Association of Public and Land-grant Universities (APLU) and Sloan National Commission on Online Learning surveyed 42 HBCU college presidents and chancellors. More than four in five of the respondents indicated that distance learning programs were critical to the long-term survival of HBCUs (Seaman, 2009). Unfortunately, HBCUs have struggled to plan adequately to keep up with technological innovations that they could not design a strategy for in advance (Hawkins, 2013; Kelderman, 2010; Nworie et al., 2010). Although more HBCUs are offering online courses and degree programs (Stuart, 2012; Stuart & Yep, 2012; Sturgis, 2012), they still lag behind predominantly White institutions (PWIs) in their production of online courses and degree programs (Beasley, 2013).

One result of these challenges has been that, even though many HBCU faculty members were knowledgeable of technological solutions, their universities were often unable to support their use of the latest advances. This lack of training and financial resources (Kinuthia, 2005; Stuart, 2010) has caused the technology gap to widen for African American students (Joseph, 2007). The limited number of STEM course selections and poor academic performance logically followed from of a lack of an ample supply of college educated, qualified STEM leaders (Barnett, Hoke, & Hirsch 2004; Vandevoort, 2004). Mathematics and science teachers may not have majored in STEM fields which may have affected student achievement (Boyd, Goldhaber, Hamilton, & Wyckoff, 2007; Boyd, Grossman, Lankford, Loeb, & Wyckoff, 2006; Cochran-Smith, 2004; Kuenzi, 2008).

To compound the problem for the technology gap, HBCUs have experienced struggles to obtain adequate funding for technology upgrades compared to wealthier, PWIs (Roach, 2008). It was typical for the term *digital divide* to be used to describe HBCUs struggles with technology (Stuart, 2008). Another problem contributing to the digital divide was that some HBCU administrations were resistant to change (Malveaux, 2013). Some HBCU administrators argued that they have always done things in a traditional way. Although PWIs have an alumni giving rate of 60%, the HBCU giving rate is below 10% (Malveaux, 2013), which may affect the availability of additional funds for enrollment growth, scholarships, and technology enhancement.

There has not been much research conducted on how decisions on technology deployment are determined. HBCUs are known for their nurturing, nonintimidating, and assurance-building atmosphere (Walker, 2010), which may not have aligned with the

current, competitive higher-education environment. Because many states have reduced their funding to public colleges and universities, private HBCUs may be the last choice for some students (Malveaux, 2013). Despite inadequate funding, "HBCUs graduate half of the African American teachers and 40% of African American STEM graduates," according to Baskerville, president of the National Association for Equal Opportunity in Education (Malveaux, 2013, p. 123). Further, according to Baskerville, 60% of African American PhDs in STEM majors attended an HBCU as an undergraduate student. Many students with average high school grades have achieved academically at HBCUs because of a supportive and nurturing environment (Malveaux, 2013). This research filled the gap in understanding how HBCU administrators make decisions about technology deployment as technology rapidly changes.

Problem Statement

Although more HBCUs have offered online courses and degree programs (Stuart & Yep, 2012; Sturgis, 2012), they have lagged behind PWIs in their production of online courses and degree programs (Beasley, 2013). One of the recognized challenges has been that although many HBCU faculty members were knowledgeable of technological solutions, their universities did not appear to support their use of the latest advances (Flowers, et al., 2012; Joseph, 2007). This lack of training and financial resources (Kinuthia, 2005) has caused the technology gap to widen for African American students (Joseph, 2007) at a time when increasing focus is being placed on preparing for STEM careers. Little research has been conducted on how decisions on technology deployment are determined, however. This research addressed this gap by assessing how decisions were determined for HBCUs to integrate online learning programs into the curriculum to

justify technology deployment to address the digital divide that exists among African American students.

Purpose of the Study

The purpose of this qualitative comparative case study was to obtain insight into how decisions were made on technology deployment to incorporate online programs at HBCUs. This study is important because it addressed an under-researched area of higher education, HBCUs and online education (Moore, 2008), which has direct relevance to societal needs for a larger and more diverse workforce in the STEM sciences. Technology continues to be a strong force for social change by providing innovative and more efficient ways for delivering this type of education (Donley, 2012; TMC News, 2014), yet HBCUs lagged behind in their use of it. The situation has further exacerbated the overall situation for African American students. The clarity gained by this study should assist HBCU administrators to support technology deployment, thus addressing the technology gap for African American students. Because more online classes are being offered, especially in a blended format (Stuart & Yep, 2012), faculty can play a significant role in supporting African American students' successful attainment of a degree by providing technology enhanced courses that allow for increased competition for their employability skills.

Research Questions

The following research questions guided this study:

1. How are decisions determined at HBCUs to integrate online learning programs into the curriculum?

2. How do the individuals who make these decisions perceive online learning programs at HBCUs?

Theoretical Framework

The theoretical framework for this study is Donaldson's (2001) contingency theory. Donaldson's theory focuses on the relationships between organizations and their environments. Organizational decisions are influenced by external pressures and demands (Kurre et al., 2012) which have certainly been the situation for HBCUs. Environmental influences compelled organizations to respond for survival and competitiveness. This dilemma provided a strategy for institutions to be motivated to keep from having a *misfit* (lack of relevance) after environmental factors change (p. 2). According to Donaldson, a misfit occurs when an organization is no longer relevant for serving the needs of internal and external constituents; the central assumption of contingency theory is that an organization's circumstances and environments are important for comprehending actions and structures or institutions (Donaldson, 2001, pp. 7_8). For example, in a similar way, HBCUs experienced a misfit if decisions are not made to upgrade their technology infrastructures and provide technology deployment to meet the demands of faculty, students, and other stakeholders such as legislators, parents, and the general public.

Donaldson (2001) argued that contingency theory provides a way to understand organizations by providing a holistic foundation that relates to changes in their circumstances (i.e., external and internal contingencies) (pp. 9_10). Contingency theory is the organization's relationship with society, explaining the organization's fits between its composition and contingencies by their beneficial effects on organizational performance (Donaldson, 2001, pp. 17_18). Adaptation of a relevant organization design

can assist decision-makers to attain higher organization performance by implementing a more efficient structure. The contingency approach helps decision-makers to find misfits or poor performance between their organization structures and contingencies. For example, higher education institutions may find misfits in size and diversification of instructional methods that are considered as parts of the strategy of the institutions (Donaldson, 2001, pp. 11_15).

The adaptation of organizational characteristics to outside influences can cause higher organizational effectiveness (Donaldson, 2001). Because of outside pressures, organizations have more prestige to gain if they avoid the misfit that occurred when contingencies transition by accepting new organizational roles that conformed to the new expectations of internal and external pressures. These outside expectations shaped the organization because it needed to comply to prevent a loss of organizational effectiveness (p. 2). According to Burns and Stalker (1961), when an organization does not adapt, the mechanistic structure in an unpredictable environment is not able to implement new strategies and become unable to perform efficiently. Donaldson also argued a large organization that continued to operate by an obsolete set of strategies or standards will experience upper management inundated by the amount of decisions it had to come to terms with which resulted in a poor performing organization. An organization that has numerous decisions to make also experiences a lack of responsiveness to constituencies, resulting in substandard performance. Structural contingency theory stated that institutional structure has to conform to three contingencies of the environment, size, and strategy. These contingencies independently influenced a particular characteristic of the

structure: organic, bureaucratic, and divisional (Donaldson, 2001, p. 3). I discuss a more detailed background explanation of Donaldson's theoretical propositions in Chapter 2.

This framework related to this study and the key research questions because it aligned with the notion that universities must respond to internal and outside pressures to remain competitive with other postsecondary institutions; organizations must stay current and not become irrelevant. The second research question addressed the organization having the ability to adapt to an appropriate organization design by listening to constituents (i.e., students and faculty) to assist decision-makers in making sure the organization is operating efficiently (Donaldson, 2001). The instrument development and data analysis for this study related to the framework because the questions were targeted at HBCU decision-makers and were grouped into three categories (campus planning and policies for technology deployment; organization, access, and connectivity environment; and technology decision-making factors) to facilitate interpretation.

Nature of the Study

The nature of this study was a qualitative comparative case study approach. The rationale for the design was that it will provide an understanding of how senior and associate administrators, including chief information officers (CIOs), and faculty department heads approached this task of technology integration and development which was the primary focus of this study. The focus on how administrators made decisions about technology integration and development was interpretable within Donaldson's (2001) contingency theory. Themes of decision-makers' challenges were examined to clarify how a practicable research problem comes forth. This qualitative comparative case

study analysis helped to identify the kinds of opportunities for technology deployment from the beginning to the end of this study.

The participants for this study consisted of a sample size of six from each of three HBCUs to generate rich information on how decisions are made on technology deployment at these institutions. My role as the researcher for this project was to: (a) develop the research questions; (b) coordinate all data collection procedures; (c) send correspondence to the selected institutions in this case study; and (d) to analyze and interpret the results. Purposeful sampling enabled the researcher to describe the subgroup (decision-makers-senior and associate administrators, including CIOs, and faculty department heads) in more depth. Rich responses (Patton, 2002) facilitated the collection of data for the research questions (Maxwell, 2013). Purposeful sampling involved choosing the times, settings, and persons that could provide extensive responses to the research questions (Maxwell, 2013). Senior HBCU administrators and faculty department heads were appropriate for individuals that could provide "information-rich" responses (Patton, 2002).

The data analysis and interpretation plan included a data collection tool (survey) that consisted of 14 open-ended questions and a follow-up interview. The e-mailed correspondence that was used to solicit participation in this survey contained a link to SurveyMonkey, an online data collection service, was returned to me with respondents having the option to participate in a follow-up interview if they provided their name, title, and contact information. The HyperRESEARCH software program was used to assist with the interpretation and analysis of each set of responses. I was responsible for the final analysis of the data. HyperRESEARCH was selected because it is user-friendly and

allows the researcher to code and access, create theories, and perform analyses of the data. It also allows the researcher to draw visual diagrams (Creswell, 2013).

Definitions

The key concepts used in this study were:

- *Online learning* occurs when more than 80% of the content is delivered online and typically does not have face-to-face meetings (Allen & Seaman, 2003). According to Harper (2008), the instructor does not have the capability of observing students to see if they are engaged with the material, bored, confused, and are actually in attendance.
- *Distance education or distance learning* has been used interchangeably by several researchers for different programs, providers, audiences, and media (Sherry, 1995). The main characteristics of distance education are the separation of instructor and student in space and/or time (Perraton, 1988). Distance education also involves the conscious decision of learning by the student rather than the distant instructor (Jonassen, 1992), and intermittent communication between the student and instructor, by way of print or some form of technology (Keegan, 1986; Garrison & Shale, 1987).
- *Technology deployment* (development) is the complete integration of technology and pedagogy from the beginning stages of course development through the implementation and assessment stages to ensure that faculty have a critical role in the development of technology-based learning options that are compatible with their instruction styles and curricular circumstances (Blair & Madigan, 2000).

- *Senior administrator* is an official who reports directly to the president, supervises a major area of the institution, and has substantial policy-setting duties (McDade, 1987).

Assumptions

This study was based on three assumptions. First, I assumed the data provided by senior and associate administrators, including CIOs, and faculty department heads were accurate. I also assumed that the three sample sizes of six administrators and faculty department heads from each of the HBCUs were representative of other HBCUs with similar student populations. Some variations may have existed in the data from these institutions and may not be representative of other HBCUs. Finally, I assumed that the three sampled HBCUs had similar technology infrastructure characteristics with other HBCUs with similar student populations.

Scope and Delimitations

The particular aspects of the research problem that were addressed in the study include: (a) campus planning and policies for technology deployment; (b) organization, access, and connectivity environment; and (c) other decision-making factors that affect the institutions' decisions on technology deployment in regard to college-level, credit-granting online or distance education course offerings. This focus was selected because three HBCUs provided valuable insight as to how HBCU administrators support and implement technology deployment and the integration of online or distance learning programs into the curriculum. The boundaries of this study were limited to high-level HBCU administrators, including CIOs, and faculty department heads). Selected HBCUs for this study had a minimum student population of 2,500 or more. HBCUs with smaller

student populations were not selected because they did not have a fully developed administrative structure and did not have a technology infrastructure developed enough to contribute abundant data to the study.

The focus of this qualitative comparative case study was a research question addressing the decision-making process. A vast number of theories have emerged in the past several decades to explain how people make decisions and represent various disciplines that include mathematics, sociology, psychology, economics, and political science (Buchanan & O'Connell, 2006). These writers have attempted to determine what decisions characterize people and the implications these decisions have for people's values (Buchanan & O'Connell, 2006). One simple way of differentiating between these three classifications of decision-making was employing the following framework: (a) descriptive: -what individuals do, or have done; (b) prescriptive: -what individuals should and have the capability of doing, and (c) normative: -what individuals should do (theoretically) (Dillon, 1998). In other words, Dillon provided three ways to view or consider decision-making in a systematic plan of action where decision-makers must develop the appropriate course of action for their organization's circumstances and capabilities. This situation describes the challenge facing leaders of HBCUs, and Donaldson's (2001) contingency theory seemed to fit this purpose.

Upon reviewing theories related to decision-making and organizational theory which might apply to higher education context, however, I discovered two theories, in addition to Donaldson's (2001) contingency theory, that are worth considering: Senge's (1990) learning organization theory and Reigeluth's (1999) elaboration theory. Senge's theory focused on decentralizing the role of organizational leadership to enable the

capacity of all employees to be productive for common goals. This approach provides a strategy for organizations to learn because individual employees learn. Persons who continue their education by professional development activities or by taking advanced courses can only enhance an organization's stability and performance. Although learning organization theory is related to the research problem of this study by addressing professional development, it does not specifically address how decisions are made in university environments such as HBCUs.

Reigeluth (1999) focused on sequencing and organizing that have seven major strategies that result in better acquisition of knowledge and a better retention and application resulting in higher learning motivation and control. This approach provided a method by "chunking" or changing huge amounts of information into minute pieces of information that have supportive structures to facilitate memory and learning capacities. Elaboration theory was not pursued in this study because it addresses the cognitive development of enhanced learning and retention. This approach may be appropriate for how faculty can learn in professional development activities and how students can learn in the classroom environment (traditional or online). However, this theory did not address how decisions are made in the university environment and was inappropriate for this study.

After reviewing numerous organizational and decision-making theories, I decided on Donaldson's (2001) contingency theory. The basic idea in this theory is that a high performing organization has to fit or be in agreement with its key constituents to be relevant and efficient or face the consequence of performance loss. This theory, in particular, seemed to be appropriate for studying HBCUs because these institutions have

overcome numerous obstacles in the past. HBCUs still have obstacles to overcome in the current academic climate especially with the integration of technology into the curriculum. Today's colleges and universities are experiencing both internal and external pressures to expand academic programs and to offer online courses and degree programs. Online courses and programs provide marketable career options and convenience for both traditional and nontraditional students.

Donaldson's (2001) contingency theory provided some direction for how the organization can meet both internal and external expectations by engaging in decision-making strategies that enabled the organization to have the right fit with its constituencies to avoid becoming obsolete. This research study fit into Donaldson's (2001) contingency theory by providing data on how decisions are made on integrating online programs into the curriculum to meet the needs of internal and external groups. Donaldson's contingency theory was appropriate for the theoretical framework for this qualitative comparative case study. The contingency theory pinpointed or provided an appropriate target for studying HBCUs as a result of the demands of the internal and external environments. The implications of these pressures have made HBCU administrations to have no alternative but to provide the right fit for their constituencies.

It was possible that the findings of this study concerning technology deployment decisions to integrate online learning programs into the curriculum could be applied to other HBCUs. The data generated can be valuable to senior administrators and faculty in making technology decisions. The data can also be an asset to major stakeholders such as legislators and boards of regents in making technology decisions that affect HBCUs.

Further, findings from this study can be valuable to university technology committees in making recommendations to administrations.

Limitations of the Study

This qualitative comparative case study had several limitations for the final outcomes. These limitations included not having direct (in-person) access to HBCU administrators for observation purposes, limited time, and only a sample of three institutions. This study included only 4-year HBCU institutions with a minimum enrollment of 2,500 and did not include 2-year HBCU institutions. The study also did not include PWIs for comparison purposes because the academic environments are qualitatively different. Issues related to transferability and dependability were of concern because the three HBCUs that were studied were not representative of 100% of HBCUs because of their differences concerning several factors previously discussed. Some prospective participants may have interpreted the invitational e-mail sent from the SurveyMonkey website portal as spam or junk mail and ignored the request for participation in this study.

A methodological weakness was the data collection instrument. It was adapted from two original public domain research instruments and changes and additions had to be made to make it more relevant to current technology trends. Another limitation of this study is that it did not provide detailed data about the technology infrastructures at the sampled HBCUs. Although the data collection instrument had 14 open-ended questions, it may have been considered too long. The number of queries in the instrument may have affected how the respondents answered the questions, especially in the comment section.

They may not have given detailed responses which may have affected the final outcomes of this study.

The biases that may have influenced the study outcomes are that I am African American and have been employed as a middle-level administrator at a 4-year public HBCU for the past 24 years. I have experienced five presidential administrations and may have some biased interpretations of administrative styles of the previous five presidents at this particular HBCU, which was not part of the sample. Reasonable measures to address these limitations were implemented for the research to remain neutral and professional during the entire data collection and analysis process. I worked diligently to build trust and confidentiality with the respondents in this study.

Significance

The potential contributions of the study that advance knowledge in the discipline are improved administrative procedures and decision-making in supporting technology deployment for integration of online or distance learning programs into the curriculum. Another contribution was a better understanding of why HBCU faculty needs to be a high priority in technology deployment to help close the widening technology gap for African American students (Joseph, 2007). An additional contribution was how to have better communication between faculty and academic administrators. Potential contributions of the study that improve practice and policy were that technology deployment for HBCUs will have high priority in strategic planning, including measuring progress and regular updating of the strategic plan, and increased development of online STEM courses to have a competitive edge with other institutions.

Walden University (2014) defines positive social change as a carefully planned process of developing and applying ideas, strategies, and activities to improve the value, dignity, and development of people, localities, organizations, cultures, and societies. The outcome of positive social change is the positive effect on human and social conditions (Walden University, 2014). Within the scope of the project, African American students historically have been disenfranchised in society as a result of the recognized problem of oppression and struggle (Benton, 2001; Institute for Higher Education Policy, 2010). Higher education attainment is a means to overcome this disenfranchisement and is a recognized method to empower people. It is also a mechanism that allows people to move forward in life. Hence, the results of this study support the goal of positive social change.

As noted in Chapter 1, addressing the challenge to HBCUs is important because, as they fall behind traditional institutions in offering online courses and degree programs, they are less able to address the recognized technology gap for African American students (Flowers et al., 2012). The research questions for this qualitative comparative case study provided data on how decisions are determined to integrate online programs into the curriculum and on how the individuals who make the decisions perceive online learning at HBCUs. The results supported the goal of positive social change by providing insight into the decision-making process for leaders and stakeholders. Further, this case study affected improved and informed ideas, strategies, and actions at these institutions as well as other HBCUs. Improved strategic plans and implemented plans will positively affect the human and social conditions at HBCUs resulting in the development of more online courses and degree programs, especially in the STEM areas. The development of more online courses and programs will enable African American students as well as other

students who attend these institutions to have a competitive edge in their career goals and marketable skills. Improved access to more online courses and degree programs at HBCUs will make a positive contribution to the improvement of human and social conditions that affect positive social change.

HBCUs have a unique opportunity to provide leadership in the United States global economic competitiveness (Bagley, 2013). According to Sulcer, executive director of the Level Playing Field Institute and alumnus of historically Black Southern University, HBCUs have an opportunity to produce more engineers and scientists who work for high-technology companies but are also developers of technology and founders of high-technology startups (Bagley, 2013). Sulcer's assertion may have validated that these institutions are in a unique position to contribute to a diverse workforce that aligns with the goal of serving the needs of an increasingly global society and could make a major contribution to positive social change for humanity.

Summary

The introduction provided background information and the reason for this study. The central problem of this research was that HBCUs lag behind in the use of technology for their curricula which has widened the technology gap for African American students. The purpose of this study was to provide insight that has an affect how decisions are made on technology deployment to integrate online learning programs into the curriculums at HBCUs. Chapter 2 contains a discussion of the issues concerning decision-making on technology, the importance of stakeholders, and assessment.

Chapter 2: Literature Review

As stated in Chapter 1, although growing numbers of HBCUs are offering online courses and degree programs (Stuart, 2012, Stuart & Yep, 2012; Sturgis, 2012), they are far behind in developing these programs (Beasley, 2013). One obstacle that HBCU faculty face is that, although they are aware of new technological solutions, the university does not provide support for their use of the latest advances. This lack of professional development and funding (Kinuthia, 2005) has caused the digital divide to widen for African American students (Joseph, 2007). The purpose of this qualitative comparative case study was to find out how decisions are made on technology deployment at HBCUs.

In Chapter 1, I presented the background information to explain how rapid technological advances are affecting HBCUs' abilities to keep up and how their inabilities to stay current are causing a technology disparity among African American students. Chapter 2 consists of the literature search strategy; an overview of decision-making in higher education including the challenge facing HBCUs; the theoretical foundation for the study; the literature review related to key concepts: decision-making, stakeholders, and assessment; and the summary.

Literature Search Strategy

I accessed the Walden University Library website to conduct searches in these research databases: Education Research Complete, ED/ITLib Digital Library, ProQuest Central, Thoreau, and Academic Search Complete. Also, searches were conducted in Google Scholar, Google, and Webcrawler. The search terms included: *decision-making in higher education, HBCUs and distance education, HBCUs and online education, HBCUs and decision-making, the impact of online education on HBCUs, assessment,*

stakeholders, and *case method*. The iterative search process used the previously described search terms and databases to identify and generate scholarship that was relevant to the research topic. In cases where there was little current research, and few (if any) dissertations and conference proceedings, searches were conducted on Google Scholar, Google, and Webcrawler. Occasionally, scholarly articles could be found on these three search engines. Sometimes the terminology used for the search was changed slightly to generate useful results.

Theoretical Foundation

The theoretical framework for this qualitative comparative case study was Donaldson's (2001) contingency theory. Research programs at Ohio State University and the University of Michigan influenced Donaldson (Seyranian, 2009). In the 1950s, Ohio State University researchers conducted surveys on leadership behavior in diverse organizational situations. Concurrently, University of Michigan researchers conducted surveys to measure group productivity to evaluate effective leadership styles. The leadership behaviors that originated from the University of Michigan's study were similar to the mannerisms that were reported by Ohio State researchers. Blake and Moutin continued similar research in 1964 that suggested that effective leaders score high on relationship-oriented behavior and task-oriented behavior as reported by the University of Michigan (Seyranian, 2009). During the 1960s, Fiedler moved the initial theory forward by advocating the contingency approach, the contingency theory of effectiveness. The focus of this theory is that a group's performance depends on the strength of the leadership, and effective leadership depends on two factors: the leader's action plan or relations motivations and viewpoints of the situation (Seyranian, 2009).

Donaldson (2001) built a theory on these earlier efforts. The major theoretical proposition of contingency theory is that organizational decisions are influenced by external pressures and demands (Kurre et al., 2012). Environmental influences compel organizations to respond for survival and competitiveness (Donaldson). The central assumption of contingency theory is that an organization's circumstances and environments are important for understanding actions and structures of organizations (Donaldson). The anticipation of possible environmental events can affect an organization's reactions to external demands. The key is how the organization responds to environmental contingencies for its own survival.

In the contingency theory of organization, a relationship existed between the organization and its effectiveness (Donaldson, 2001). A contingency was any variable that regulates the effect of an organizational characteristic on the organizational outcomes (Donaldson). Thus, the contingency factor decided which characteristic produced high volumes of effectiveness of the organization (or what divisions or individual members). For example, a mechanistic structure produced high performance when the task uncertainty contingency was low, and an organic structure produces high performance when the task uncertainty contingency was high (Donaldson).

Structural contingency theory consisted of three core parts that formed its core paradigm (Donaldson, 2001). First, there was a relationship between contingency and the organizational culture. Second, contingency influenced the organizational structure, because an organization that modified its contingency also changed its structure (Donaldson). Third, a fit of some level of the structural organizational variable to each stage of the contingency resulted in higher effectiveness (Donaldson). Importantly, a

misfit results in lower effectiveness (Donaldson, 2001) and could be the focus for improvement.

An organization that modified the level of its contingency tended to have experienced the right fit when it made the modification and from that point transitioned into a new level of fitness to prevent additional performance loss (Donaldson, 2001). The organization then modified its organizational structure to adjust the new level of contingency variable to avoid additional performance loss. Because of the performance loss of being in misfit, organizations moved toward being fit over time (Donaldson). Further, any organization tended to adopt the framework that fits its level of contingency. This assertion meant that a modification in contingency caused a change in structure so that contingency established structure (Donaldson). The structure change caused the contingency of the organizational structure to move into alignment, which developed the relationship between the contingency and the organizational structure (Donaldson).

Three core commonalities existed across different contingencies and theories (Donaldson, 2001). The commonalities were: association between contingency and organizational structure, contingency change causes organizational structural change, and fit affects performance. Despite differences in contingencies and their consistent structural characteristics, the contingency theories assumed theoretically a relationship between contingency and structure and demonstrated this as an integral part of their empirical research (Donaldson).

A model of organizational change took place in structural contingency theory that caused contingency changes to emerge that caused change in organizational structure. This unified theory of organizational change that represented the contingencies (e.g.,

environment and strategy) was another way of describing the contingency of organizations (Donaldson, 2001). Further, the dynamics that contingency changes caused structural modifications was a second core component of the contingency model. Contingency theories affirmed that there was a fit between an organizational structure and contingency that had a positive influence on effectiveness (Donaldson).

The rationale for selecting the contingency approach theory for this study was that for any company to remain competitive, it had to adapt to innovative ways of delivery services to its customers. Colleges and universities were not like companies and shared many attributes that aligned with contingency theory. In particular, they must provide quality customer service to remain competitive. The contingency approach can also apply to higher education institutions, especially HBCUs because technology has rapidly changed how education is delivered (Aoki, & Pogroszewski, 1998; Heick, 2012; Proulx, 2012; TMC News, 2014).

The qualitative research questions aligned to Donaldson's (2001) contingency theory because higher education institutions, especially HBCUs, are experiencing both internal and external pressures to offer more online learning courses and degree programs which relate to the first research question: "How are decisions determined at HBCUs to integrate online learning programs into the curriculum?" To prepare for the implementation of online learning courses and degree programs, individuals will need to adapt to the advantages of offering distance learning programs to develop and plan online learning courses which related to the second research question: "How are online learning programs perceived at HBCUs?

To summarize, Donaldson's (2001) contingency theory was influenced by research programs at Ohio State University and the University of Michigan (Seyranian, 2009). Organizations responded to environmental influences for their survival. The contingency theory of organization was the relationship of the organization and its performance (Donaldson). Structural contingency theory consisted of three core parts to form its core model. Three core commonalities existed across various contingencies and theories (Donaldson). The contingency theory was selected for this study because it aligned with the customer service approach that numerous companies use to remain competitive. Contingency theory could be applied to higher education institutions and HBCUs, in particular, because of the competitive nature of postsecondary education. Internal and external pressures are compelling HBCUs to offer more online courses and degree programs.

One of Donaldson's (2001) major propositions was that organizational decisions are influenced by external pressures. HBCUs face several external expectations that include the following:

- Enrollment: HBCUs have confronted a changing higher education market that has resulted in declining enrollments. Several HBCUs are in competition with PWIs to attract high-achieving African American students (Top Strategic Issues Facing HBCUs, Now and into the Future, 2014).
- Educational quality and degree offerings: HBCUs are facing demands from policy makers, the media, employers, students, and parents for better academic quality.

Student success and completion: graduation rates for many HBCUs lag behind the national average which makes retention and graduation an ongoing challenge (Top Strategic Issues Facing HBCUs, Now and into the Future, 2014).

- Finances and affordability: HBCUs have offered low tuition and fees that have resulted in a negative effect on faculty salaries, infrastructure costs, and other expenses related to operating an institution.
- Infrastructure: HBCUs have to compete by providing up-to-date libraries, modern residence halls, and student amenities (Top Strategic Issues Facing HBCUs, Now and into the Future, 2014).
- Federal and state policy: HBCUs had to adjust to direct and indirect policy changes including sequestration, changes in the Pell Grant and the Federal Parent PLUS Loan Program, and the possible implementation of a federal college ratings system.
- Governance and leadership: Several HBCUs have experienced governance difficulties that have triggered enormous national pressures ranging from highly monitored presidential searches and compensation, loss of accreditation and fiscal difficulties (Top Strategic Issues Facing HBCUs, Now and into the Future, 2014).

This summary of external pressures is consistent with Donaldson's (2001) assertion that organizational decisions are influenced by external pressures and differences in approach were noted. The next section provides a discussion of the literature that consists of three reoccurring themes, decision-making, stakeholders, and assessment that are relevant to the contingency theory.

Review of Related Research

According to the research for this study, three prevalent themes or concepts emerged: decision-making is pivotal (based on a determining factor) for progress, the importance of internal and external stakeholders, and assessment. Information provided the background for decision-making. It could persuade action. Information could also legitimize decisions after the fact and the authority of the decision-makers in the planning process (Ewell, 1989). According to Keller (1983), "Good information not only facilitates more rational decision-making, it also motivates toward more strategic decision-making." Information served as the foundation for change management in planning decisions because it helps to identify institutional needs and connected problems with strategic solutions (Sayers, 2006). Sometimes there was a complex and tenuous relationship between information and decision-making (Sayers, 2006). An organization systematically collected more data than is necessary for rational decision-making because of organizational expectations (Feldman & March, 1981). In the 21st century, the survival and success of both online and traditional institutions will depend on their ability to make decisions to utilize new technologies to meet their mission and respond in a timely manner to internal and external demands. As institutions attempt to meet these demands while experiencing change and competition, both their organizational frameworks and pedagogical designs will be subject to transformation causing conformation to new decision-making strategies (McFarlene, 2011).

Key benchmarks recommended by major accreditation agencies and best practices served as a beginning for online education administrators and instructors to make decisions to develop program goals and assessment policies for their online program

(Wang, 2006). The success and credibility of online programs depended on an institution's ability to deliver high quality, and cost-effective educational services. Best practices could serve as a baseline for institutions on their decision-making on the development of quality standards in the five key areas of (a) institutional commitment, (b) curriculum and institutional development, (c) faculty support; (d) student support, and (e) learning outcome assessment. The rapidly changing dynamic of online education was affected by changes in demand and technology (Wang, 2006). These changes had implications for university administrators and faculty to stay current with technology trends (Wang, 2006).

Institutional budgets have affected how CIOs make business decisions. In a recent survey, nearly all CIOs (95%) stated that changing tuition rates and student financial aid policies affect how they made decisions (Schaffhauser, 2013). In the area of technology budgets, 51% reported an increase from 2012 to 2013, which represented increases in the general institutional budget at six in 10 institutions. During the same time frame, most CIO respondents reported either no change or a slight increase in the size of their information technology (IT) staffs (Schaffhauser, 2013). CIOs need to be skillful in partnership, collaboration, and political negotiation skills to work with other departments, outside vendors (outsourcing is increasingly routine), and CIOs' superiors. Effective decision-making is crucial for synchronizing business and academic strategies (Dearstyne, 2006).

The Challenge to Administrators at HBCUs

When the deployment of technology occurs at an institution, structural and procedural changes often take place (Mitchell, 2009). Although exterior changes are a

natural occurrence of any new component implemented at an institution, there is also a possible change in organizational culture (Mitchell, 2009). This type of change was consistent with Donaldson's (2001) contingency theory because the adaptation of an appropriate organization design can assist decision-makers to attain higher organization performance by implementing a more efficient structure. What was not clear was why and how these decisions are made at HBCUs.

Online education is different than traditional education because it offers more flexibility in instructional strategies and the opportunity to complete degree requirements while maintaining busy family, social, and work schedules (Allen & Seaman, 2003; Buzzeto-More & Sweat-Guy, 2006; Flowers et al., 2012; Lorenzetti, 2005; Matheos & Curry, 2004). It typically does not have a precise fit into a university's current structure because it involves technologies that were not in place when the institution was established. As a result, the boundaries between academic administration, academic departments, and student services become confused (Jones & O'Shea, 2004). The long-term results of providing online education may have affected cultural changes because the beliefs behind those changes may have been a threat to traditional values and beliefs. The implementation of online education required direct changes to technological and organizational structures (Mitchell, 2009), which in turn affected decision-making.

Technology has physical requirements to support and provide online education. Organizational structure must exist to carry out the daily administrative functions, as well (Mitchell, 2009). Although it is possible for the integration of either technological or structural part of the infrastructure for online education into systems that already exist, processes and procedures will be influenced and changed. The minimum requirements for

the technological infrastructure for online education are computers, networks, distance learning student services, and course management (i.e., Blackboard) (Hanna, 2003; Moor & Kearsley, 2004). This integration of online education may cause a pattern of changes regarding technology and instructional methods as online education became firmly established within the institution (Bartunek & Moch, 1987; Harris, 1994; Kezar, 2001; Levy & Merry, 1986; Mitchell, 2009). One university setting where these challenges and changes were being felt was HBCUs.

HBCUs Involvement With Online Education

Public HBCUs have made some progress in offering online education while private HBCUs have not had any increase in progress in the past three years (Ingeno, 2013). However, Beasley (2013), a systems analyst, stated that the number of HBCUs offering distance learning has been consistent, yet modest. Only about 25% of the HBCUs in the United States offer distance learning degree programs. HBCUS are mostly private and serve traditional-aged residential students, which may account for lower levels of online courses that offered (Ingeno, 2013).

In 2013, these institutions offered a total of 120 programs at all levels (associate, bachelors, masters, and doctoral) resulting in 16 more programs (Ingeno, 2013). However, it should be noted that St. Phillip's College in San Antonio, Texas, provided seven of the 16 new programs than in 2012. Hampton University, a private institution, offered 17 programs in 2012 and 2013-leading the way compared to other HBCUs. None of the HBCUs in Beasley's report stated that they offered blended programs (Ingeno, 2013). A total of 101 (84%) of the HBCU online programs offered in 2013 were labeled as "professions and applied sciences" in the Howard University study. During 2014, an

increase of small, private HBCUs implemented programs with the assistance of online providers (Beasley, 2013) just as large public institutions were partnering with these companies (Ingeno, 2013).

The current literature established the relevance of the problem by discussing HBCU challenges for financial instability, faculty, and technology infrastructure (Evans, Evans, & Evans, 2002; Foster, 2003; Owens et al., 2012; Smith, 2011). To remain relevant and to be competitive, HBCUs will have to upgrade obsolete instructional models to keep up with current technology innovations or lose their competitiveness (HBCU-Levers, 2012). HBCUs are experiencing a climate of declining enrollments, decreasing endowments, and increasing demands for online courses and degree programs (Smith, 2011). Many HBCU presidents and chancellors have acknowledged that the development of online education programs is critical for institutional longevity (Seaman, 2009). When discussing the speed of change related to technology, HBCUs share the challenges facing most institutions.

The challenge of technology which faces all universities and the challenge of being an HBCU have resulted in these higher education institutions encountering major obstacles such as low operating budgets and reduced numbers of faculty and staff (Thor, 2013). Technology is having a profound effect on higher education institutions' abilities to stay current. For example, mobile and nonmobile devices will no longer be distinguishable. Even though schools have struggled to meet current demands, many of the recently purchased devices will no longer be needed (Thor, 2013). Obsolete technology has serious implications for HBCUs that have inadequate budgets and are

struggling to keep up (e.g., current technology training for faculty, a stagnant number of African American students in online STEM majors).

Responding to this challenge requires money, and HBCUs have always had inadequate budgets (HBCU-Levers, 2012). The White House Initiative on HBCUs created by President Jimmy Carter in 1980 (Allen, 2013) has been helpful in bringing financial relief over the years. However, the Great Recession from 2007 to 2009 (Center on Budget and Policy Priorities, 2014) caused a declining amount of financial support for classroom buildings, faculty, and technology infrastructure. Other nonprofit institutions besides HBCUs are also experiencing financial problems (HBCU-Levers, 2012). Several HBCUs and PWIs may fail within the next 15 to 20 years because the administrations are not willing to change to more up-to-date institutional models. Because HBCUs and many PWIs will have to compete for the same pool of available students but with dwindling resources, constant upgrades in high technology will affect how colleges and universities conduct business (HBCU-Levers, 2012). These decisions are left to their administrators to make.

In 2007, the Association of Public and Land-grant Universities and the Sloan National Commission on Online Learning surveyed 42 HBCU college presidents and chancellors. More than four out of five of the respondents indicated that distance learning programs are critical for the long-term survival of HBCUs (Seaman, 2009). According to Smith (2011), chairperson of the Board of Directors for the United States Distance Learning Association, several HBCUs have found themselves in a predicament regarding declining enrollments, decreasing endowments, and demands for more online learning opportunities in particular. One of the factors associated with these problems is that

college presidents have the challenges of faculty, staff, and students' needs with limited funding. HBCUs are increasingly struggling for more revenue to survive (Malveaux, 2013), so strategic decisions are even more high stakes.

To summarize, the rapid rate of change at postsecondary institutions has placed demanding expectations on senior level administrators to be creative and make adjustments or experience the consequences of their institutions ceasing to exist. These challenges have emerged at a difficult time for many institutions, as enrollments and resources are declining. Many of these administrators have to prioritize these competing demands, and this study had the intention to investigate their decision-making practices. An applicable, theoretical framework helped to interpret the results to accomplish that understanding.

Case Method

A case method is a study of a case within an actual life, current context or setting (Yin, 2009). The case method is being discussed here because this study is about decision-making and how senior and associate administrators, including CIOs, and faculty department heads perceive how decisions are made to integrate online learning programs into the curriculum. Decision-making also plays a key role in case method. Primary learning outcomes for students involved in active learning activities include the ability to think critically, to engage in problem solving, and to enhance communication skills. Secondary learning outcomes include the development of leadership skills, an increased understanding of multiculturism, improved self-esteem, and appreciation of the environment that is studied (Lomb & Bowers, 1998). When students used case studies, they identified a core problem, brainstormed possible solutions, and agreed on the best

solution (Holkeboer, 1993). This same approach, which students use, could also be used in actual work environments for decision-making purposes and as a strategy to address research questions.

Case studies of organizational decision-making have been one of the most important research methods for a long time (George & McKeown, 1985). Researchers have used case methods to investigate organizational behavior and improved their theoretical comprehension of that behavior (George & McKeown, 1985). For example, American foreign policy decision-making was greatly enhanced by case studies that have provided clarification for the importance of organizational information-processing systems (Allison, 1971). Case studies have also played a role in the development of our understanding of decision-making in business firms (George & McKeown, 1985). Qualitative comparative case studies, in particular, produce more robust data than single-case studies (Yin, 2009).

It is critical for higher education administrators to involve both internal and external stakeholders in the decision-making process (Cortese, 2003). Decision-makers will have to take the educational experience from a theoretical to a practical level to have an effect on the way the Academy will engage with the external community (Cortese, 2003). This shift will have an effect on the decision-makers who are the most interdisciplinary and long-range planners linked to the decision-making structure of higher education. Decision-makers will have to devote as much time to the education and research that is conducted in higher learning as on the physical, operational, and external community functions of the university and so on in an integrated, interdependent manner (Cortese, 2003). For example, a college or university that used outreach methods to

communicate with local and regional communities but failed to involve faculty and students as an integral part of its operations lost a great percentage of the value of its efforts and failed to have a beneficial role both internally and externally (Cortese, 2003).

Decision-makers, as leaders in developing a sustainable society, had to be able to comprehend and articulate the necessity and advantages of higher education to an expansive range of stakeholders (Cortese, 2003). These individuals included internal decision- makers and other stakeholders (e.g., faculty, operational personnel, and students) and external stakeholders (e.g., parents, alumni, local and regional communities, future employers, funders of education and research, elected government officials, accreditation organizations). The advantages of including stakeholders in decision-making included: (a) improved learning for all-internally and externally for higher education; (b) better prepared students for citizenship and career; (c) increased external respect; (d) attraction of students, faculty, and potential funders. Other advantages of including stakeholders in decision-making included: (a) reduced economic, social, and environmental costs; (b) cooperation and enthusiasm among faculty, staff, and students; and (c) attainment of higher education's moral and social responsibilities (Cortese, 2003).

Assessment and Stakeholders

Assessment is discussed because, for HBCU administrators to make informed decisions, campus leaders must assess the needs of the institution based on evidence (Tingling & Brydon, 2010). The central idea is that decisions supported by hard data and sound analysis will be more successful than decisions based on instinct, folklore, or informal, anecdotal evidence. Assessment has become prevalent in higher education for

different reasons (Aggarwal & Lynn, 2012). Universities are planning, developing, and testing several assessment instruments to appease stakeholders. Accrediting agencies are also requiring assessment plans and how they will be carried out at universities for reaccreditation (Aggarwal & Lynn, 2012). A stakeholder may be any individual or group of individuals either affected upon by the company or able to effect the achievement of objectives (Freeman, 1984, p. 77). Identifying stakeholders involved in colleges and universities is a crucial step towards assessing their needs and developing strategies to meet those needs (Dobni & Luffman, 2003). Fulfilling the needs of stakeholders is an important competitive factor for higher education institutions (Dobni & Luffman, 2003).

The concept of quality is more complicated in higher education than in the industry where the end products are explicitly defined (Tang & Hussin, 2011). Due to students increasingly coming from diverse backgrounds, it is imperative that stakeholders' expectations, especially students', be taken seriously by colleges and universities for quality process improvement. Quality values may have different meanings to many higher education stakeholders as each has different interpretations because they may not have the uniform or agreeable interests in higher education (Tang & Hussin, 2011). The early works of Middlehurst (1992) and Harvey and Green (1993) emphasized the importance and value of reviewing quality from diverse stakeholder perspectives. Higher education has become closely connected to the notion of progress on an individual basis and a societal level (Jongbloed, Enders, & Salerno, 2008). The expansion and democratization of higher education mean that many organizations and individuals have a stake in higher education and want their concerns to be heard (Jongbloed, Enders, & Salerno, 2008). Colleges and universities are becoming more

socially embedded (Benneworth & Arbo, 2006). Outreach to communities and assuming civic responsibilities conformed to a trend to develop higher education policies in ways that made teaching and research more transparent and relevant to society. New forms of assessments for customer accountability were transforming the content of degree programs and scientific research and contributed to the enhancement of academic norms and value (Jongbloed et al., 2008). These modifications were designed to make academic research and curricula more accountable to the demands of various paying stakeholders (Jongbloed et al., 2008).

Leaders used diverse approaches when making decisions, ranging from highly analytical and numerical to ad hoc and intuitive (Tingling & Brydon, 2010). Assessment outcomes or evidence was used to make a decision that is based directly on the evidence. Evidence is used to inform a decision whenever the decision-making process considered hard, objective facts with qualitative inputs, such as intuition or negotiating with other stakeholders. Assessment outcomes were used to support a decision whenever the results were collected or modified for the only purpose of giving legitimacy to a decision that had already been made (Tingling & Brydon, 2010).

HBCUs of the future will need to make tremendous improvements to the organizational and decision-making structures that place them at a distinct disadvantage with other institutions (Lee & Keys, 2013). Decision-making challenges for HBCUs also include increasing faculty development, enhancing financial management, strengthening enrollment management, developing effective student support services, ensuring internal controls, and providing a quality student experience for all students. Institutions are enhanced by using good decision-making practices which can result in exemplary

leadership qualities. HBCUs will need strong leaders, but they also must have intelligent, visionary, and knowledgeable leadership on the board, presidential, administrative, and dean levels (Lee & Keys, 2013). All of these challenges have implications for technology decision-making on HBCU campuses, especially if they are to be competitive with PWIs.

Efficient online leadership involves several job responsibilities for the administrator who oversees programs in higher education such as program planning, marketing, implementation, and quality control to fulfill the diverse needs and expectations of students (McKenzie, Ozkan, & Layton, 2005). Typically, leaders who oversee both traditional and online classes base their decisions on previous professional interactions, initial experiences, and knowledge of the field (McKenzie et al., 2005). In the area of management, Beaudoin (2003) specified several skills online leaders need to have. These skills include: (a) the ability to administer a needs assessment, (b) perform market analysis, (c) develop a strategic plan, (d) prepare technology for the needs of the learners, (e) operationalize his or her ideas, and (f) make resources mobile. Other skills include: (a) introduce the online infrastructure, (b) develop distance learning policies, (c) provide professional development and support for faculty, (d) collaborate with stakeholders, (e) conduct program evaluation and accreditation, and (f) provide information for new leaders.

Further, McKenzie and Bennett (2004) made several recommendations to online leaders in the areas of assessment, distance interaction, and evaluation. The recommendations were: (a) use a variety of evaluation measurements to find out if a course is meeting students' needs (e.g., needs assessment, formative assessments, summative assessment) and (b) collect both qualitative and quantitative types of data

when administering evaluations, prior to administering assessment tools (McKenzie and Bennett, 2004). Additional recommendations were: (a) check for reliability and validity and (b) use a systematic assessment plan for online courses to ensure they meet program and curricular needs (McKenzie and Bennett, 2004). Another method of supporting online leaders' use of assessment to determine the effectiveness of online course was a five step process (Tobin, 2004). The steps started with the administrator providing feedback on the online instructor's strengths and weaknesses followed by testing, redesigning course materials, requesting student feedback, and then determining numerous resources for the course were used by students (Tobin, 2004). An alternative form of assessment that HBCU administrators can use is fundamental strengths, weaknesses, opportunities, and threats (SWOT) analysis (America, 2012). Weaknesses that include poor infrastructure, substandard facilities, and inadequate leadership are just a few of the challenges that some HBCUs may have to improve (America, 2012).

Assessment will be crucial for HBCUs to overcome the numerous internal and external challenges that they face (Lee & Keys, 2013). HBCU leaders will have to change the status of their institutions to be competitive for the future and improve them to educate future generations of students. These challenges raise the question, "How can HBCUs individually and collectively assess themselves and develop strategies?" (Lee & Keys, 2013, p. 27).

HBCUs and Decision-Making

It is important to know that although HBCUs share many historical and cultural attributes, they are not all the same (Minor, 2004). The institutional characteristics that HBCUs have in common can be used to help understand the context in which decisions

are made, however. First, assessments about the credibility of decision-making at HBCUs were better made with comprehension of the context in which decisions are made (Minor, 2004). The traditions of these institutions, the potential contradiction their missions present, and the acknowledgment of a racialized climate are pivotal to comprehending governance and decision-making in the institutional sector. Policymakers and practitioners that understand the context were likely to have a better interpretation of governance at HBCUs (Minor, 2004). Those individuals without an understanding of the context are predisposed to making uninformed comparisons between HBCUs and PWIs which usually labels HBCUs deficient (Minor, 2004). For example, because I have worked at a four-year public HBCU for the past 24 years and I have also worked at two private PWI's previously, I have observed that this particular HBCU has endured its own set of challenges, possibly due to inadequate leadership, limited resources, and board policies.

Decision-making issues that confront all American higher education institutions-funding, completion, remediation, and decreased government/public support-also confront HBCUs (Grummon, 2012). Further, HBCUs have a perceived identity of being only for African American students and simultaneously; they must compete with other institutions for a diverse and qualified pool of students as previously mentioned. Except for approximately 50 to 100 elite institutions, every other four-year institution experiences the same set of challenges concerning funding, marketing, and student success, without having also to cope with a double identity (Grummon, 2012). This challenge is a shared attribute of all HBCUs

Technology Decisions

Limited research on technology decision-making has helped to design and interpret the participants' responses in this study. Decision-making in higher education institutions must take into consideration how technology will have an effect on the delivery of educational programs and how internal and external stakeholders can be best served. Creative instructors must reach out to knowledgeable technology experts both internally and externally to seek information on emerging technologies (Inderbitzin & Storrs, 2008). In order to improve technology usage and the performances of both traditional and online institutions, Roschelle, Pea, Hoadley, Gordin, and Means (2000) argued that institutions should make decisions about improving academic achievement by researching the effective use of technology.

Institutions must also provide professional technology deployment opportunities, instructional plans, to ensure there are adequate numbers of instructors involved in technology activities (McFarlane, 2011). Further, institutions must encourage high levels of interaction among instructors using online learning technologies and provide resources for instructors in their designing, accomplishment, and reporting of technology usage. Finally, institutions must have strong leaders who are knowledgeable about the role as well as the limited capabilities of technology. Although online learning has become popular in recent years, educators must have a caring attitude to those students and communities (stakeholders) they serve (McFarlane, 2011). Social responsibility should be encouraged and accepted by online-institution administrators and faculty leaders as an integral part of quality instruction and integrity (McFarlane, 2011). Open-minded instructors must be resourceful and reach out for assistance from progressive individuals

to assist students in educational attainment by using current and emerging technology (Inderbitzin & Storrs, 2008).

Campus planners and decision-makers must also be responsive to both internal and external stakeholders when making technology decisions. Successful implementation of online initiatives has several characteristics (Moloney, 2010, pp. 62-63):
(a) strong institutional support by stating the inclusion of the online programs in the campus mission and strategic plan, (b) specialized units dedicated to the development and support of online progress, (c) financial models that encourage adjustments of online programs by reinvesting funds in campus units and/or through self-supported initiatives, (d) program development focuses on the delivery of complete online degrees, instead of individual online courses, and (e) instruction and course design that accentuates interaction among students and faculty. Other characteristics of successful implementation of online initiatives include: (a) marketing campaigns insure that online programs reach their target enrollments, (b) high quality training and support for faculty, (c) student support services that address the needs of online students by providing exceptional customer service, (d) the ability of the institution to increase its online faculty, and (e) an emphasis on instruction and/or outreach and continuing education.

The Alfred P. Sloan Foundation has been successful promoting the expansion of Asynchronous Learning Networks (ALN) since it started its “Learning Outside the Classroom” initiative in 1992 (Moloney, 2010). It has offered direct grants to institutions to increase their online course offerings, and the implementation of the Sloan Consortium (Sloan-C) which disseminates knowledge about ALN through publications, workshops,

conferences, and its website. These activities have addressed the five principles, with the ultimate goal of increasing opportunity to higher education: (a) program development; (b) faculty recruitment, instruction and course development; (c) access and student orientation; (d) financial and business models; and (e) institutional support and leadership (Moloney, 2010). Although many barriers to increasing online programs remain at many traditional institutions, American colleges and universities are overcoming these obstacles by developing new organization structures that facilitate the expansion of online education (Moloney, 2010).

Decision-making required a commitment to change through planning and was best developed by integration on all levels of the planning process-problem identification, information collection, and solution generation (Sayers, 2006). Assessment procedures helped with monitoring planning actions simultaneously to measure their usefulness, but they also documented final decision-making for the future. Assessment of planning opportunities provides clear connections among how, when, and why decisions were made by preselected lists of anticipated outcomes (Sayers, 2006). It is of great importance that planning models tightly collect information, stakeholders' knowledge, intelligence, leadership, and public awareness. Ideal outcomes were accomplished by effective assessment of planning (Sayers, 2006).

High-quality planning processes required continuous monitoring the attitudes of all stakeholder groups. A well-informed group helps a community collectively move forward and make progress. Today's higher education planners and decision-makers acknowledge the multifunctional nature of information (Sayers, 2006). The dissemination

of information not only helped to identify problems, and solutions, but it addressed and engages the concerns of stakeholders in an intensive process. Information provides the platform for politics and decision-making (Sayers, 2006). Failure to recognize the hidden value information has for decision-making sustained a planning environment where a lack of transparency became cultural, severely limiting and threatening the credibility of any planning process and its outcomes (Sayers, 2006).

The integration of technology into higher education institutions has implications for institutional decisions and communications (Harris & Martin, 2012). The following are ways that data can be used in strategic planning and in communicating with state legislators, administrators, and faculty at universities: (a) emphasis on instructors and personal connections in online courses, (b) faculty development and incentives to use interactive technologies, and (c) updating online information and technology (Harris & Martin, 2012, p. 6). Universities should use student surveys to collect data for decision-making and strategic planning as they begin to offer online courses or increase the number of course offerings in response to budget realities. Student survey data provide a means of ensuring strategic initiatives, including starting or increasing online programs and expanding the use of technology on campus, to make sure students have rigorous, interactive learning experiences in addition to the universities' plans to increase recruitment and retention (Harris & Martin, 2012).

Assessment Revisited

There was little reason to believe that external stakeholders would reduce their demand for indicators that assess effectiveness and efficiency in higher education (Heck, Johnsrud, & Rosser, 2000). Calls for accountability were frequently politically motivated,

and assessments were frequently conducted in a climate of mistrust. It is the responsibility of those who study higher education to make instruments available that can provide valid and reliable indicators for decision-making (Heck et al.).

At the high level, quality assessment was about having authority over operations (Achim, Cabulea, Popa, & Mihalache, 2009). The lower level of assessment was about student life and educational attainment. With the expansion in demand for higher education, the lower level processes had become transparent, and more expensive to society. The external quality assessment was used as a procedure to subject colleges and universities to wider public examination and judgment (Achim et al., 2009).

External quality assessment systems were rapidly becoming an international routine (Achim et al., 2009). During the same time, individual institutions were committing more time to internal assessment and evaluation. Two trends tended to be closely linked; institutions were assessing their internal quality because of the requirements of external stakeholders. They were also assessing internal quality for other reasons because of expansion, variation in programming, and because of budget reductions. These modifications in the external environment raise questions of selection and decision-making for institutions. Internal assessment and evaluation procedures can offer substantive data to make important decisions (Achim et al.).

Internal quality assessment and evaluation procedures were causing tremendous institutional transformations in colleges and universities (Achim et al., 2009). Major institutional changes often guided quality standards and evaluation. The connection between institutional transition and quality assessment and evaluation was interchangeable (Achim et al.).

The satisfying returns to both individuals and institutional departments that have positive outcomes (both internal or external) had become increasingly significant, especially when they have been produced from assessment procedures which require high scrutiny among academic peers (Achim et al., 2009). Although monetary rewards were expected in some locations, reputation or image was the reward that was most respected (Achim et al.).

The Importance of the CIOs

The CIOs, in particular, are important individuals to include when technology decisions need to be made on a university campus. They must be mission-driven by aligning their priorities with those of the institution (Buechner, Detweiler, Clark, & McCredie, 2005). CIOs need to understand how campus-wide policies influence technology on campus. It is important that CIOs are integrated into all stakeholder aspects of the institution, supporting and partnering in research, instruction, and administration (Buechner et al.). Developing a vision and requiring expectations are part of the responsibilities of CIOs. The CIO needs to be an educator and publicist, always interpreting complicated issues and reporting performance in layman terms (Dearstyne, 2006). The CIO's role is transitioning beyond the area of technology operations (Laserfiche, 2013). Today's CIOs need to be versed in both the data and digital areas and serve as chief process officers as well. They also need reliable deputies who are embedded in departments across campus and provide reports on how technology can assist stakeholders in achieving their goals (Laserfiche, 2013).

Further, CIOs need to be included for technology decision-making because they need to understand the institution's strategies, priorities, operating environment,

problems, and opportunities-especially those that can be unethically used through adaptive use of IT and information deployment (Dearstyne, 2006). Finally, CIOs need to be included for technology decision-making because they should have clear priorities (e.g., security, legal compliance, strategically critical systems, high-stakes developmental applications) (Dearstyne, 2006).

The researchers in this literature review have provided descriptive approaches to the three prevalent concepts: decision-making is pivotal for progress, the importance of internal and external stakeholders, and assessment. Substantive descriptions and recommendations in these three areas could enhance institutions in their decision-making processes for the integration of online courses and degree programs into the curriculum at HBCUs. The weakness inherent in the researchers' approaches was that they did not provide an example of any institution that has implemented these recommendations with positive outcomes or an organization that has been recognized for best practices in any of these areas.

Discussion of Key Concepts and Research Questions

The three prevalent themes or concepts mentioned at the beginning of the literature review were: decision-making is pivotal for progress, the importance of internal and external stakeholders, and assessment. The concept, decision-making is pivotal for progress, was discussed to inform this qualitative comparative case study. As stated earlier, information provided the background for decision-making. It could persuade action. Information could also legitimize decisions after the fact and the authority of the decision-makers in the planning process (Ewell, 1989). Case studies have played a role in

the development of our understanding of decision-making in business firms (George & McKeown, 1985).

As leaders in developing a sustainable society, decision-makers must be able to comprehend and articulate the necessity and advantages of higher education to an extensive range of stakeholders (Cortese, 2003). Decision-making required a commitment to change through planning and was best developed by integration into all levels of the planning process-problem identification, information collection, and solution generation (Sayers, 2006). CIOs, in particular, needed to be included for technology decision-making because they need to understand the institution's strategies, priorities, operating environment, problems, and opportunities-especially those that can be unethically used through adaptive use of IT and information deployment (Dearstyne, 2006). Further, CIOs needed to be included for technology decision-making because they should have clear priorities (e.g., security, legal compliance, strategically critical systems, high-stakes developmental applications) (Dearstyne, 2006).

The research literature indicated that academic leaders need information to make sound decisions (Ewell, 1989). Without reliable knowledge, academic leaders may subject their institutions to negative consequences that could have a long-lasting effect. Educational leaders must be open to change through planning (Sayers, 2006) to move their institutions forward. CIOs should be included in all aspects of the technology planning process (Dearstyne, 2006).

The concept, the importance of internal and external stakeholders, was discussed to inform this qualitative comparative case study. Earlier, the literature review discussed that campus planners and decision-makers must also be responsive to both internal and

external stakeholders when making technology decisions (Moloney, 2010). There is little reason to believe that external stakeholders will reduce their demands for indicators that assess effectiveness and efficiency in higher education (Heck et al., 2000). Buechner et al. (2005) also emphasized the importance of CIOs being integrated into all stakeholder aspects of the institution, supporting and partnering in research, instruction, and administration.

It was evident from the previous discussion that both internal and external stakeholders play an important role for higher education institutions, especially for decision-making. In other words, persons with a vested interest should not be taken for granted because they influence institutions to keep abreast of expectations of both internal and external constituencies. It was also evident that persons with a vested interest help to keep higher education institutions from becoming stagnant or staying comfortable within their own element and avoiding enhancement or progress.

The concept, assessment, was discussed to inform this study. Earlier in the literature review, for HBCU administrators to make informed decisions, campus leaders must assess the needs of their institution based on the evidence (Tingling & Brydon, 2010). The central idea was that decisions supported by hard data and sound analysis will be more successful than decisions supported based on instinct, folklore, or formal anecdotal evidence (Aggarwal & Lynn, 2012). Assessment outcomes or evidence was used to make a decision that was based directly on the evidence. Evidence was used to inform a decision whenever the decision-making process considers hard objective facts with qualitative inputs, such as intuition or negotiating with other stakeholders (Tingling & Brydon, 2010). Assessment outcomes were used to support a decision whenever the

results were collected or modified for the only purpose of giving legitimacy to a decision that already had been made (Tingling & Brydon, 2010).

Assessment will be crucial for HBCUs to overcome the numerous internal and external challenges that confront them (Lee & Keys, 2013). HBCU leaders will have to change the status of their institutions to be competitive for the future and improve them to educate future generations of students. As stated earlier, these challenges raised the question, "How can HBCUs individually and collectively assess themselves and develop strategies?" (Lee & Keys, 2013, p. 27).

It was of great importance that planning models tightly collect information, stakeholders' knowledge, intelligence, leadership, and public awareness. The success of planning models could only be accomplished by efficient assessment of planning (Sayers, 2006). Universities should use student surveys to collect data for decision-making and strategic planning as they begin to provide online courses or increase the number of course offerings in response to budget realities (Harris & Martin, 2012). Internal assessment and evaluation procedures could offer substantive data to make important decisions (Achim et al., 2009). The connection between institutional transition and quality standards and evaluation was interchangeable (Achim et al.).

The discussion on the concept, assessment, had indicated its importance to the other concepts, decision-making is pivotal for progress and the importance of internal and external stakeholders. For academic leaders to make informed decisions, stakeholders had an important role to play by keeping leaders informed of their expectations. Informed decisions also required assessment before making any final decisions that will have a major effect on the institution. The literature review revealed that the three concepts are

interrelated. Stakeholders' expectations, reliable assessment procedures, and data can inform sound decision-making. Studies in this literature review failed to discuss that sometimes stakeholders' demands or expectations may be unreasonable or controversial. The literature review did not provide any specific examples of how the three concepts, decision-making is pivotal for progress, the importance of internal and external stakeholders, and assessment have affected an institution, particularly an HBCU. Additional research is needed on how HBCUs are managing stakeholders' expectations and if assessment procedures and data are utilized for decision-making.

The synthesis of the studies discussed earlier was related to the research questions. The qualitative comparative case study approach that was selected was meaningful because the academic leaders' responses from three HBCUs provided multiple responses. Responses to this study produced data that helped to answer the research questions.

Summary

In Chapter 2, I provided a discussion about the challenges in technology deployment for administrators at HBCUs and HBCUs' involvement with online education. It also provided a discussion of Donaldson's (2001) contingency theory. Chapter 2 contained a review of related research that addressed decision-making in higher education, technology decisions, administrators, including CIOs. In Chapter 2, I provided a discussion on case methods with emphasis on qualitative comparative case studies. The key concepts discussed in the related literature were decision-making is pivotal, the importance of internal and external stakeholders, and assessment. Although researchers have provided insightful information on how senior administrators and

faculty leaders can implement each of the key concepts, weaknesses still exist for implementing decision-making strategies that inform technology decisions. Because limited information was known about this topic, additional research was needed on HBCUs' decision-making practices. This study addressed, at least, one of the gaps in the literature and will advance knowledge in the discipline by providing insightful information on decision-making on technology deployment at HBCUs. In Chapter 3, I outline the methodology to collect data for this qualitative comparative case study on how decisions are determined for the integration of distance and online learning programs into the curriculum and on perceptions of distance and online learning at HBCUs.

Chapter 3: Research Method

Introduction

The purpose of this qualitative comparative case study was to obtain insight into how decisions are made to incorporate online programs into the curriculum at HBCUs. This study was important because it addressed an under-researched area of higher education, HBCUs and online education (Moore, 2008). Insights from this study should assist HBCU administrators to support faculty with technology deployment, thus addressing the technology gap for African American students. Because technology continues to be a strong force for social change (Stuart & Yep, 2012), faculty could play an important role in supporting African American students' successful attainment of a degree by providing technology supported courses. These courses will allow for increased competition for their employability skills. In Chapter 3, I address credibility-internal validity to ensure believability and trust among participants.

The major sections of Chapter 3 consist of: (a) the paradigm, (b) the design (case study), (c) the rationale for the study and explanation why other qualitative approaches were not selected and would be inappropriate, (d) the participants, and (e) sampling. I used a purposeful sampling of individuals who could provide responses to questions which enabled me to answer the research questions. In this chapter, I discuss the sample size and why I selected it. I also discuss data collection procedures. In addition, I provide a description of the data analysis and interpretation plan.

Research Questions

1. How are decisions determined at HBCUs to integrate online learning programs into the curriculum?

2. How do the individuals who make the decisions perceive online learning at HBCUs?

Central Concepts/Phenomenon of the Study

The central concepts and phenomenon of the study were based on Donaldson's (2001) contingency theory:

1. Organization decisions are influenced by external pressures and demands (Kurre et al., 2012; Donaldson, 2001).
2. A misfit occurs when an organization is no longer relevant in serving the needs of internal and external constituents (Donaldson, 2001).
3. An organization that continues to operate by an obsolete set of strategies or standards will experience upper management inundated by the amount of decisions it has to come to terms with which results in a poorly performing organization (Donaldson, 2001).

Qualitative Research Tradition

Among all of the multiple approaches to qualitative research, the *qualitative comparative case study* was the most appropriate methodology for determining decision-making on the incorporation of online programs at HBCUs. Qualitative comparative case studies have relied on an interpretation that attached importance to the findings by interpreting the results, offering reasons, coming to conclusions, inferring facts to be learned, and considering the inner significance of things (Patton, 2002). The rigors of analyzing data for explanations as well as rival explanations that took into consideration disconfirming cases, and accounted for data inconsistencies as part of examining the reliability of interpretation. All of these explanations were to be presumed and are

deemed as appropriate when the researcher recognized the interpretation and differentiated between verbal accounts and interpretation (Patton, 2002, p. 480).

Yin (2009) argued that qualitative comparative case studies have advantages and disadvantages over single-case studies. The qualitative data produced from comparative cases were usually more compelling. The reason for selecting a multiple-case design was to have two or more cases that have similarities (e.g., a set of cases that had exemplary results based on some evaluation questions such as how and why an intervention had been carried out successfully). When a researcher had a choice (including resources), comparative case designs may be preferred over single-use studies. Single case studies had weaknesses because the depletion of a researcher's resources in a single case may not produce thick rich data. Two or more case studies produced more interpretive benefits than a single case study.

Direct replication was possible with just two single qualitative case studies (Yin, 2009). Interpretative conclusions originating from two cases were more robust than those originating from a single case study. Single-case studies are viewed as having unnatural conditions (e.g., preferential access to a key respondent). Negative feedback may have resulted into doubt or mistrust about a researcher's ability to conduct empirical work beyond conducting a single-case study. Conducting, at least, two case studies curtailed negative feedback and doubt. A qualitative comparative case study that had more than two cases produced a more compelling effect.

Multiple-case sampling strengthened the authenticity, validity, stability, and confidence of the findings (Yin, 2009). A replication strategy could be used to study one case in depth, and other cases could be analyzed to find out if a pattern existed that

matched the pattern in other cases. Yin advocated a cross-case synthesis as an analytic procedure when the researcher examined two or more cases. He recommended that a word table could be developed to exhibit the data from individual cases based on some uniform framework. The word table allowed the researcher to see similarities and differences among cases.

Role of the Researcher

In recent years, qualitative inquiry moved toward terminologies such as *trustworthiness* and *authenticity* (Patton, 2002). Evaluators searched for "balance," fairness," and "completeness" (Patton, 1997a, p. 282). The researcher had to be careful not to falsify the data to serve his or her vested interests and prejudices. A credible research strategy required practicing neutrality for the phenomenon under study (Patton, 2002). The qualitative researcher's committed role was to understand the words as they revealed themselves and to be true to complexities and multiple viewpoints as they emerge. The balanced researcher would report on confirmatory and disconfirming evidence based on any conclusions provided (Patton, 2002).

As the primary observer and source for data collection and analysis (Merriam, 1988) for this qualitative study, I was responsible for making sure that rigorous procedures were performed to generate detailed responses or high-quality data that could be analyzed for in-depth understanding for this study (Creswell, 2013; Patton, 2002). I did not have any personal nor professional relationships with the participants in this study, especially in a supervisory or instructor role that would have exercised power over the respondents. The researcher is a human being and is the instrument for data collection in qualitative inquiry, which requires that he or she report possible sources of bias and

error (Patton, 2002). I did not anticipate any researcher biases or power relationships that may be a conflict of interest for this study. In this qualitative study, I did not conduct my research in my own work environment which is a four-year public HBCU. A conflict of interest, power differentials, or incentives were not ethical issues for this study.

Methodology

The methodology section consists of (a) participant selection logic, (b) procedures for recruiting and selecting participants, (c) instrumentation, (d) construction of the survey instrument, and (e) related published data collection instruments. Further, several issues of trustworthiness are also addressed in this section.

Participant Selection Logic

The participants for this study came from three HBCUs to generate rich information on how decisions are made to incorporate online programs into the curriculum at these institutions. My role as the researcher for this project was to: (a) develop the research questions; (b) coordinate all collection procedures; (c) send correspondence to the selected institutions in this case study; (d) collect data; and (e) to analyze and interpret the results. Purposeful sampling enabled the researcher to describe the subgroup-respondents (decision makers-vice presidents for academic affairs, vice presidents for student affairs, vice presidents for business and finance, other academic leaders-deans, associate deans, faculty department heads, CIOs) in more depth to generate extensive responses (Patton, 2002). I searched for at least six individuals at each college or university who had academic or student leadership roles to receive the surveys. The ability to have a larger group of six respondents from each college or university provided a broader scope analysis. Purposeful sampling involved relatively small

samples, sometimes single cases (N+1) chosen purposefully to allow questioning and comprehending a phenomenon in depth (Patton, 2002). The criterion for participant selection was current employment as an academic affairs leader, student affairs leader, technology leader, faculty department head, or other educational leader at an HBCU with a minimum student population of 2,500. Participants were selected who met the criteria based on university website directories and confirmations from human resources offices.

Six participants from each of the three HBCUs were selected by using comparable case selection by choosing sites (HBCUs) and groups with similar characteristics over time (Miles, Huberman, & Saldana, 2014) such as the similar administrative structures, student population, and curricula. Patton (2002) argued that no specific rules exist for sample size in qualitative research. Patton also stated sampling to the point of redundancy is more appropriate for basic research, unrestricted timelines, and unlimited resources.

To recruit and select the participants, I followed the following steps:

1. Researched three HBCUs that have a student population of at least 2,500 students.
2. Researched the three selected HBCU websites for e-mail addresses or request e-mail addresses of HBCU high-ranking administrators and faculty department heads via e-mail correspondence. Requested e-mail addresses from the human resources office if e-mail addresses were not available on institution's website.
3. When e-mail addresses were received, a formal letter was generated and sent via e-mail to the administrators above. I introduced myself and explained that I am a doctoral student at Walden University. I stated the purpose of this qualitative comparative case study. The researcher explained that if the potential respondent decides to participate, their obligations would be minimal. The open-ended survey

that each potential respondent was requested to complete was short and only require approximately 20 to 30 minutes of his or her time.

4. Participants were informed that their identity would be kept confidential and would be used only to develop profiles of the administrators who completed the survey.
5. A link to the survey on SurveyMonkey was provided in the e-mail correspondence.

The relationship between saturation and sample size was that there were 107 HBCUs (List of HBCUs by State, 2015) in 20 states, the District of Columbia, and the Virgin Islands compared to the three HBCUs from which administrators' responses were studied. Three HBCUs with a minimum student population of 2,500 each generated descriptive data.

Instrumentation

An online open-ended survey was administered with a follow-up interview for individuals who agreed to participate. Typical formats of online data collection for qualitative studies consisted of virtual focus groups and web-based interviews. Data collection occurred via e-mail or test-based chat rooms, web blogs, life journals, and Internet message boards (Garcia, Standlee, Bechkoff, & Cui, 2009; James & Busher, 2007; Nicholas et al., 2010). I used e-mail correspondence and SurveyMonkey to collect data via the Internet. Qualitative data collection over the Internet had advantages that included reduced cost for travel and data transcription (Creswell, 2013). With data collection on the Internet, participants had more time to think about and responded to requests for information; they could offer deeper insights on the questions that were

asked in the data collection instrument (Nicholas et al., 2010). Another advantage of online data collection was that it provided an alternative for difficult-to-reach groups (because of practical constraints, disability, or language, or communication obstacles) who may have limited involvement with qualitative research (James & Busher, 2007).

Ethical issues with online data collection had increased such as respondents' primary protection, new power distinctions, ownership of the data, genuineness, trustworthiness in the data collected (James & Busher, 2007; Nicholas et al, 2010). Further, Internet-based research had new requirements for both respondents and researchers. For example, participants had to have some computer skills, access to the World Wide Web, and adequate reading and writing proficiency (Creswell, 2013). Researchers had to adjust to a new way of observation by paying attention to texts on a screen, by practicing their skills in analyzing textual data, and in becoming proficient in their online interview skills (Garcia et al, 2009).

The sources for creating the data collection instrument were two published data collection tools that I revised and adapted. I did not use historical or legal documents as a source of data for this qualitative study. The research questions were answered by an online survey. The questions were open-ended, general, and directed to the understanding of the central phenomenon in the study (Creswell, 2013). The participants who could best answer the questions based on purposeful sampling procedures were identified (Miles & Huberman, 1994). Purposeful sampling in qualitative research allows the inquirer to choose individual sites because they can purposefully reveal information about the research problem and the central phenomenon of the study to establish sufficiency of the data collection instrument (Creswell, 2013). Decisions were made about which persons

were to be sampled and which sites were to be used for the research. The sample size was an important decision to make during the data collection process (Creswell, 2013). One general rule for sample size in qualitative studies is to research only a few sites or individuals and to gather right data about each site or persons studied (Creswell, 2013).

The principal goal in qualitative research was not to generalize information, but to clarify the particular, and the specific (Pinnegar & Daynes, 2007). The generalizability of case study research applied to the processes that happen in a case that was researched that may work in other cases, but have the potential of producing different results under a different set circumstances (Becker, 1991; Ragin, 1987; Yin, 2009). Characteristics that were typically generalized from case studies include participants' assessments of generalizability, the similarity of dynamics and constraints to other situations, the presumed extent or universality of the phenomenon studied, and validity from case studies (Hammersley, 1992, pp. 189_191; Weiss, 1994, pp. 26_29).

Related published data collection instruments. I drew my survey questions from the United States Department of Education National Center for Education Statistics (NCES) instrument, the Distance Education at Degree-Granting Postsecondary Institutions: 2006_2007 open-ended survey, dated December 8, 2008 (Parsad & Lewis, 2008). This instrument was previously used with degree-granting postsecondary institutions for the 2006_2007 academic year. Presidents of institutions were not utilized as respondents for this open-ended survey. This open-ended survey was the fourth of its kind to be administered by the NCES. Previously, the open-ended survey was administered in 1995, 1998, and 2002. The NCES open-ended survey was appropriate for this qualitative comparative case study in terms of context and cultural specificity of

protocols and instrumentation because the open-ended survey consisted of general questions about distance education courses and other distance education topics that could be applicable to any degree-granting institution regardless of cultural background or influence. Modifications were needed because the open-ended survey was lengthy with 18 questions. Only one modified question was used for the data collection instrument. Also, instructions from the NCES were modified to inform potential respondents that although their participation was voluntary, their cooperation was critical to make the results informative, accurate, and timely.

The HBCU Technology Assessment Study (TAS), Historically Black Colleges and Universities: An Assessment of Networking and Connectivity, was developed by a team of five researchers located in five cities: Washington, DC; Cincinnati, Ohio; Silver Spring, Maryland; Kalamazoo, Michigan; and Detroit, Michigan. Team members consisted of a public policy specialist, a professional evaluator and research consultant, two telecommunications professionals, and one Internet entrepreneur (Myers, 2000). The research team was charged with designing a needs assessment instrument that was relevant to the issues that affect HBCUs (Myers, 2000). The
TAS instrument was previously used with persons referred by presidents and chancellors of participating institutions who had comprehensive knowledge collectively about each organization's computing capability. These participants completed the open-ended survey to provide the data for the TAS (Myers, 2000). The TAS open-ended survey was appropriate for this case study for context and cultural specificity of protocols and instrumentation as described for the NCES open-ended survey.

Construction of the Survey Instrument

This study used the open-ended survey method. An open-ended survey was developed to collect responses in an unbiased manner. The responses did not reflect differences because of the data collection tool but indicated differences between the participants (Fowler, 2002). How questions are worded can have significant effects on the results. An open-ended survey that is constructed well is considered to be a highly developed skill within scientific research (Rea & Parker, 1997, p. 27). E-mail open-ended surveys are popular in educational research because of cost effectiveness, fast transmission, an efficient turnaround time (Michaelidou & Dibb, 2006).

One of the open-ended surveys that I used in this qualitative comparative case study was partially adapted from national studies administered by the United States Federal Government: Distance Education at Degree-Granting Postsecondary Institutions: 2006-2007 (Parsad & Lewis, 2008) and Historically Black Colleges and Universities: An Assessment of Networking and Connectivity Technology Assessment Study (TAS) (Myers, 2000). I designed some of the questions to inquire about technology issues that were more current. The published open-ended surveys were revised to focus on the technology decision-making issues of this study. The open-ended survey (Appendix C) contained 14 questions that address campus planning and policies for technology deployment; organization, access, and connectivity environment; and other decision-making topics.

Both open-ended surveys were revised by eliminating the following elements: (a) name of the institution and (b) mailing address (including city, state, and ZIP code). All of the questions on the Distance Education at Degree-Granting Postsecondary

Institutions: 2006_07 instrument were eliminated except for questions a through j under Part V. Other Distance Education Topics. The other questions in Part V were not used because it would have made the open-ended survey too lengthy.

Questions 5 through 14 from the TAS (2000) instrument were not used because these inquiries were not relevant for this study because they pertained to students' usage of computers and specific campus facilities and computer resources. I developed Questions 4 through 11 on the revised open-ended survey to provide inquiry for more relevant and time-sensitive technology topics for colleges and universities. Questions 15 through 41 from the TAS (2000) instrument were not used in the revised open-ended survey because they would not be relevant and were too detailed for this study. Questions 42 and 43 from the TAS (2000) instrument were used in the revised open-ended survey. Questions 44.1 through 45.22 from the TAS (2000) instrument were not be used in the revised open-ended survey because only three options are provided for answers and there was not an opportunity for the respondent to elaborate on each question. Questions 1 through 3 and 12 through 13 were taken from the "Technology Assessment Study" (TAS). Question 14 was modified and taken from the "Distance Education at Postsecondary Institutions 2006_2007.

Context and Culture Specific Issues

Several of the questions in the instrument were adapted and modified from the Distance at Degree-Granting Postsecondary Institutions: 2006-2007 open-ended survey (Parsad & Lewis, 2008) and from the HBCU TAS (Myers, 2000). All of the questions in the Data Collection Protocol were reviewed while being developed for any context and culture-specific issues about HBCU campuses.

All of the questions could be administered at any HBCU degree-granting institution without any relevance to context or culture-specific issues.

In addition to the open-ended survey, I also conducted a follow-up with only those individuals who had indicated their willingness to complete the follow-up interview to be included in the sample. The follow-up questions were based on any of the open-ended survey inquiries that needed clarification. I attempted to use phone interviews at alternate times to follow-up with respondents with contact information who had indicated on the open-ended survey they were willing to be contacted without any success because of their demanding schedules. The follow-up interview was e-mailed to address five faculty issues with these specific questions (Appendix C):

- What incentives are in place to encourage faculty or administrators to participate in technology deployment?
- Are course designs handled by teams, subject content experts, instructional designers, information technology experts, and evaluation personnel? How effective are the course designs?
- What professional development courses or seminars are provided for faculty members to transition from a traditional (face-to-face) classroom environment to an online environment?
- Please indicate whether faculty members are being compensated and/or provided with release time to develop online courses at your institution.
- To what extent do you believe online courses enhance or detract from a caring and nurturing environment that is characteristic of HBCUs?

I also reviewed university websites for online programs to identify documents or information (e.g., strategic plans, registration deadlines, Blackboard training, online courses) that indicated or provided information on how decisions were made to implement online degree programs into the curriculum.

Triangulation was used for this qualitative comparative case study by administering the open-ended survey to six additional faculty members who had no administrative responsibilities such as department heads at each HBCU in the sample. This subgroup of respondents provided a third source of data from actual faculty members who had either the experience or potential to teach online courses. Faculty members were able to provide their unique perspective of online education at their respective institutions. Triangulation requires confirmation of evidence from diverse sources to focus on a perspective (Creswell, 2013). Triangulation occurs when qualitative researchers find similar themes from diverse sources of data. This method provides validity for the findings (Creswell, 2013). According to Maxwell (2013), triangulation reduces the danger of chance relationships and of systematic bias because of a specific data collection technique and provides an enhanced assessment of the collective explanations. Miles et al. (2014) argued that in cross-case studies, duplication is a critical component of the basic data collection process.

Trustworthiness

The trustworthiness section will consist of: (a) content validity, (b) sufficiency of data collection instrument, (c) data analysis, (d) treatment of discrepant cases, and (e) context and culture specific issues. Issues of trustworthiness also addressed: (a)

credibility-internal validity, (b) transferability-external validity, (c) dependability, (d) confirmability, (e) ethical procedures, and (f) ethical concerns.

Content Validity

The validity of a measurement method is the comprehensiveness to which it measures what it is supposed to measure (Price & Oswald, 2006). Said another way, content validity is the degree to which the measurement method covers the entirety of relevant thoughts and feelings that give meaning to the construct being measured (Price & Oswald, 2006). The content validity of the Distance Education at Degree-Granting Postsecondary Institutions: 2006-2007 (Parsad & Lewis, 2008) and the TAS (Myers, 2000) instruments had already been established. These national studies were administered by the U. S. Department of Education, National Center for Education Statistics (NCES) and by the U. S. Department of Commerce, National Telecommunications and Information Administration (NTIA). The 2006-2007 distance education study collected data on the prevalence, types, delivery, policies, and acquisition or creation of distance education courses and programs (NCES, 2008). The TAS provided a necessary baseline of data about the technological preparedness of HBCUs. Results from this study were useful for both the U. S. Department of Commerce and the National Association for Equal Opportunity in Higher Education (NAFEO) in advising HBCU leaders, federal and state government, and the private sector about the strengths and weaknesses of HBCUs (Myers, 2000). The results from this report also served as useful instruments for HBCUs as they plan for the future (Myers, 2000). Both open-ended surveys covered a wide gamut of topics that were relevant to online and distance education courses and programs at

HBCUs and should satisfy the content validity requirement because they had already been proven to provide a variety of valuable data.

Sufficiency of Data Collection Instrument

The data collection instrument (Appendix C) should be sufficient for collecting data because it was partially adapted and modified from two national studies by the United States Federal Government. The two research studies were: Distance Education at Degree-Granting Postsecondary Institutions: 2006-2007 (Parsad & Lewis, 2008) and Historically Black Colleges and Universities: An Assessment of Networking and Connectivity Technology Assessment (TAS) (Myers, 2000). Both instruments consisted of questions that were still relevant for today. I included additional inquiries that were time-sensitive for current technology issues. The variety of queries were adapted from two national sources and from the researcher provided sufficient data to answer the research questions.

The responses to the questions on the data collection instrument (Appendix C) helped me to answer the research questions for this study. Data collections occurred on a daily basis, were forwarded to the researcher from the SurveyMonkey website, and were recorded on an Excel spreadsheet. The duration of the data collection events continued for over one month. Data were grouped into categories based on the questions and the responses. The groups consisted of: (a) campus planning and policies for technology deployment; (b) organization, access, and connectivity environment; and (c) technology decision factors.

The follow-up plan if recruitment resulted in too few participants was to send out reminder e-mails with the link to SurveyMonkey. Potential respondents were reminded

that the open-ended survey only has 14 questions. If all of the replies were not received within one week, a general follow-up e-mail was forwarded to all potential participants. Initially, if potential participants from a particular HBCU did not respond within two weeks, another HBCU would be purposefully selected with the same procedures for recruitment, participation, and data collection. However, because of the profound difficulty in obtaining approval from HBCU IRBs and the time constraints of this study, I decided not to pursue additional HBCUs for participation in this study.

Debriefing procedures were utilized to verify responses. Debriefing means questioning participants about their responses for accuracy. When respondents completed the open-ended survey on SurveyMonkey and sent it back, the researcher had a list of participants that the open-ended survey was sent to for debriefing purposes. The transmittal of the completed open-ended survey via SurveyMonkey was only one method of contact by the respondents for this study by allowing participants to provide optional contact information at the end of the open-ended survey. Other methods of contact included e-mail and telephone if the respondents provided appropriate information. Follow-up procedures were conducted for the qualitative comparative case study for the purpose of checking out rival responses (Miles, et al., 2014) for clarification by telephone and e-mail.

Data Analysis Plan

During the reading process, I took notes and wrote memos on what was read in the data and planned for tentative strategies for categories and relationships (Maxwell, 2013). During this time, I used three analytic options: (a) memos, (b) grouping strategies (e.g. coding and thematic analysis), and (c) linking strategies (e.g., narrative analysis)

(Maxwell, 2013). Examples of data analysis included: reading and thinking about the transcripts and notes, writing memos, creating coding categories and applying these strategies to the data, analyzing narrative frameworks and messages within written passages, and developing charts and other graphic displays (Maxwell, 2013). The connection of data to a specific research question in this study was organized into these categories: campus planning and policies for technology deployment; organization, access, and connectivity environment; and other decision-making topics. These groups of questions were arranged for easier computer analysis of textual data.

According to Maxwell (2013), the principal grouping strategy in qualitative studies is coding. Strauss (1987) argued that the primary goal of coding is to break up the data and rearrange them into categories that make the comparison between entities in the same group more amenable that are helpful in the development of theoretical concepts. Responses in the study were coded based on the organized categories. The HyperRESEARCH software program was used to assist with the interpretation and analysis of each set of replies. (Researchware, 2014). This software helped to organize the data and helped me to see patterns or recurring themes. I performed the analysis. HyperRESEARCH was powerful and flexible and assisted in how I wanted to approach the data (Researchware, 2014). The software can help the researcher with virtually any kind of qualitative data, including audio, video, graphical, or textual. It had an immediate cognition interface and well-written documentation (Researchware, 2014). HyperRESEARCH was not designed to analyze the data. As stated previously, I was responsible for the cognitive processes to analyze the data (Researchware, 2014). HyperRESEARCH enabled to me to code, retrieve, and perform analyses of the data.

This software program had been used by qualitative analysts in the social sciences and other fields since 1991 (Researchware, 2014).

Treatment of Discrepant Cases

A key component of the logic of validity testing in qualitative studies was identifying and assessing discrepant data and negative cases (Maxwell, 2013). For example, events or occurrences that cannot be accounted for by a particular explanation may signal important defects in the data. There are also times when an obvious discrepant occurrence was not convincing, as when the analysis of the discrepant data itself was questionable (Maxwell, 2013). When discrepant data is in doubt, the researcher needs to review rigorously both the supporting and the discrepant data to determine whether it is more acceptable to keep or modify the results, at the same time being cognizant of all the pressures to ignore data that do not fit with the results. I asked others (faculty and staff members) for feedback on the results to determine if any biases and assumptions exist (Maxwell, 2013). Other persons (methodologist, faculty, and staff members) were asked to check for any errors in the researcher's logic or methods (Maxwell, 2013). In difficult cases, the researcher reported discrepant data and let readers have the leverage of evaluating and determining their judgments (Wolcott, 1990).

Issues of Trustworthiness

Credibility-internal validity. Respondent validation was another way of describing member checks (Bryman, 1988; Lincoln & Guba, 1985) by periodically soliciting feedback about the researcher's data and findings from the participants that were involved in the study (Maxwell, 2013. Member checks were conducted on the participants to establish credibility and trust. The participants were provided the

opportunity to verify the findings of the study and that their responses were valid. According to Miles, Huberman, and Saldana (2014), the findings should be determined to be accurate by the original participants.

Transferability-External Validity

It was important to know if the conclusions of a study have a greater effect of transferability to other contexts (Miles et al., 2014). The researcher needed to know if the findings fit and to what extent they could be generalized (Miles et al.). According to Glaser (2005), grounded theorists affirm that the methodology developed concepts that substantiate their transferability to other populations and situations. Thick "rich" descriptions and variation in participant selection were the strategies that were used. Miles et al. advocated these points out of several to be considered for transferability-external validity for a qualitative study: (a) the characteristics of the original participants in the original sample, settings, and processes should be adequately described to allow full comparisons with other samples; (b) the findings should have "thick description" for readers to determine transferability and appropriateness for their own locations, and (c) the processes and findings described in the conclusions can be experienced in similar settings. I used these strategies to ensure transferability to comparable settings.

Dependability

Dependability is comparable to reliability and is achieved with auditing activities (Tobin & Bagley, 2004). An audit trail allowed others to review the researcher's documentation of data, methods, decisions, and the final product (Tobin & Begley, 2004). Member checking allowed the original participants to check the findings for any inconsistencies or flaws.

Confirmability

Confirmability was comparable to objectivity or neutrality and was based on findings from the data and not the researcher's beliefs or assumptions (Tobin & Begley, 2004). Reflexivity was critical to the auditing process in which the researcher maintains a self-critical account of the research procedures, including the researcher's internal and external communication. Auditing was also a means for making confirmability genuine or believable. Authenticity was demonstrated if inquirers could display a spectrum of realities (fairness), with indications of their concerns, issues, and related values (Tobin & Begley, 2004). I kept detailed notes of each research procedure to ensure confirmability. Auditing was utilized through member checking to ensure that the data was accurate.

Ethical Procedures

Before conducting a study to gain access to the participants and data, it was necessary to apply for college or university approval from the Institutional Review Board (IRB) as required by Walden University. The IRB granted approval number 05-29-15-0013657 after reviewing the application to make sure that the study was in compliance with the university's ethical guidelines and with United States regulations, whenever applicable. Further, IRB approval from each of the three HBCUs was also granted. The three HBCU IRB approvals are on file at Walden University IRB. Permissions to collect data from participants and sites were requested at an early stage during the study (Creswell, 2013).

During the initial contact with the individuals, the purpose of the study was explained. A statement about the purpose of the research was included on the informed consent form approved by the IRB (Creswell, 2013). The individuals were informed that

the study was voluntary and that they would not be placed in a situation with risk. The participants were not be given deceptive information about the purpose of the study and in the process of providing data (e.g., through open-ended surveys) (Creswell, 2013). I kept the names of the participants confidential by using pseudonyms and by developing composite profiles or cases.

Ethical Concerns

During the first contact with the potential participants, I was transparent about the purpose of the research project to develop a sense of trust with them (Miles et al., 2014). Since the data was retrieved from open-ended surveys via the Internet, I sent out e-mail correspondence to introduce myself with an acknowledgment that I would be conducting an IRB-approved qualitative comparative case study. The purpose of the study was fully disclosed in the e-mail correspondence and the informed consent form (Evans, 2011). In the third paragraph of the e-mail correspondence to potential participants, I informed the potential participants that their obligations would be minimal. They were informed that the open-ended survey would be short and would only take about 20 to 30 minutes of their time and that it would be anonymously returned to the researcher via SurveyMonkey, an Internet data collection service that offers a large variety of features and a modest pricing structure (Marra & Bogue, 2006). SurveyMonkey was designed to be easy to use although it does not provide the high level of customization that some other Internet data collection services offer. It is easy to use features may explain why Open-ended survey Monkey is so popular (Marra & Bogue, 2006). If participants decided to contact the researcher by telephone or by e-mail, they were informed that their identities would be kept confidential and would be used only to compile administrator

profiles. Potential participants were informed that participation in this study was voluntary (Evans, 2011).

Ethical Concerns Related to Data Collection/Intervention Activities

It was important for the researcher to develop good relationships with the participants in the study who were also referred to as the "gatekeepers" who have the ability to facilitate or hinder progress with the study (Maxwell, 2013). Ongoing contact with participants and data collection was not possible because of limited contact and the nature of the data collection. Relationships with respondents were negotiated and renegotiated as needed (Maxwell, 2013). Although a successful study does not require total access, it did require mutual understanding with participants that allowed the researcher to obtain the data that was needed to answer the research questions. McGinn (2008) argued that a researcher can have too much rapport with participants, as well as not enough. It was the type of rapport and the amount that was crucial. For example, a respondent could be very involved intellectually in a study, but may not have revealed anything of a deeply personal nature which may work for some studies (Maxwell, 2008).

The researcher was the instrument of this qualitative study and the relationships with the participants were the methods by which the research was conducted (Maxwell, 2013). More specifically, the kinds of established research relationships could have facilitated or interfered with other areas of the study design that included participant selection and data collection (Maxwell, 2013). I anticipated possible concerns that the participants potentially had and addressed them in the beginning description and negotiation of the research study. Negative purposes and assumptions could have resulted in unfavorable outcomes for this qualitative study. I used an identity memo to become

aware of any negative purposes or assumptions (Maxwell, 2013). Alertness was critical for any potential problems. The purpose of this study was explicitly explained; plain instructions were provided, and how the data would be used (Maxwell, 2013). I informed the participants that their involvement in the study was appreciated and had been a worthwhile experience (Maxwell, 2013) and contributed to the literature on how decisions were made for technology deployment at HBCUs. Their participation in the study may have also produced enlightening data that will assist HBCU administrators with decision-making for technology deployment for the future.

Treatment of Data

Data collected for this study were protected by the use of pseudonyms and secure storage to ensure each participant's identity remained confidential (Miles et al., 2014). Folders of data per case or site were labeled with subfolders such as "Linda Data" with subfolders of open-ended survey responses (Miles et al., 2014). A single master file was recommended for an individual, short term, qualitative study. All of the data were placed in a "working file" and were summarized and entered into the final report (Miles et al., 2014).

Back-up copies of computer files were developed (Davidson, 1996). A master list of the types of data collected was created. A data collection matrix was developed to find easily and identify data for the study (Creswell, 2013. The findings of the data will be presented in Chapter 4. As researcher for this study, I have access to the data. The data will be maintained for a maximum of 5 years before it is destroyed.

Summary

Chapter 3 provided information on the research design and rationale, the role of the researcher, the methodology instrumentation, procedures for recruitment, participation and data collection, data analysis plan, issues of trustworthiness, and ethical procedures. Chapter 4 will provide a discussion of the findings of this study.

Chapter 4: Results

Introduction

The purpose of this qualitative comparative case study was to obtain insight into how decisions are made to integrate online programs into the curriculum at HBCUs. Insights from this study should assist HBCU administrators and department heads to support faculty with technology deployment, thus addressing the technology gap for African American students. Because technology continues to be a strong force for social change, faculty can play a crucial role in supporting African American students' successful attainment of a degree by offering technology supported courses that allow for increased competition for their employability skills. To address this gap, I developed the following research questions:

1. How are decisions determined at HBCUs to integrate online learning programs into the curriculum?
2. How do the individuals who make the decisions perceive online learning at HBCUs?

The sections of Chapter 4 consist of (a) the setting, (b) participant demographics, (c) data collection, (d) data analysis, (e) evidence of trustworthiness, (f) results, and (g) summary. I did not conduct a pilot study because of time constraints and the limited numbers of HBCUs with IRB approval that were available for participation. A data collection and research question matrix summarized specific open-ended survey numbers that respond to each research question based on administrators' and faculty members' responses (Appendix F). The data collection and research question matrix also addressed

the outcomes for interviews, documents from HBCU websites that address online learning, and debriefing results for each research question.

Setting

A historical perspective of each of the three HBCUs provides some insight as to how these institutions began and how far they have come despite discrimination and financial challenges (Jaschik, 2016). Two HBCUs were located on the East Coast of the United States. The other HBCU was located in the Southern United States. University A had a student enrollment of nearly 6,000. University B had a student enrollment more than 3,000, and University C had a student enrollment more than 8,000 (HBCU College Listings, 2015). Each of the three HBCUs in this study has its unique historical beginnings and missions.

University B was established in 1878 to provide education for freed African Americans. It is a comprehensive public institution that provides numerous degree programs at the bachelor's and master's levels. University B has the smallest student population of the three HBCUs, more than 3,000 and has a diverse student body.

University A was established late in the 19th century as an industrial academy in a one room structure with a few students and one teacher. Later it started offering higher level curriculum above high school and is now a comprehensive HBCU. University A has a student population of nearly 6,000. University A offers bachelors, masters, doctor of nursing, doctor of physical Therapy, and certificate programs.

University C was established in 1909 as a religious training school. It later evolved into a public liberal arts institution. University C offers bachelors, masters, Juris

doctoral, and PhD programs. It is a comprehensive university with a diverse student population of more than 8,000 students, the largest HBCU in this study.

Two HBCUs, University A and University B recently had a change in personnel for the vice presidents of academic affairs/provost positions which may have influenced the interpretation of the study results. The vice president for academic affairs/provost at both University A and University B had decided that the emphasis on online learning for lower level (freshmen and sophomores) students should be redirected to higher level students (juniors and seniors). It is their belief that freshmen and sophomores need more traditional (face-to-face) instruction to provide a more caring and nurturing environment that is characteristic of HBCUs. This change in emphasis may have influenced participants' experiences at the time of this study.

Demographics

Participants came from the three HBCUs. Prospective participants consisted of three administrators, three faculty department heads, and six faculty members from each institution, making a total of 12 prospective respondents for each institution. A total of 36 potential participants were sent invitational e-mails to participate in the study. The 14 open-ended questions in the open-ended survey were administered to find out how decisions are made on technology deployment at HBCUs. The questions addressed the following three areas: (a) campus planning and policies for technology deployment; (b) organization, access, and connectivity environment; and (c) technology decision-making factors. Data were collected from 16 participants. However, fewer responses were received from University C because there were only four participants.

Data Collection

The data collection occurred on the three HBCU campuses that I described earlier. The frequency of the data collection occurred by sending out reminders with the open-ended survey link to prospective participants several times per week for approximately 1 month. A 14 question open-ended survey link was included in every e-mail reminder each time one was sent out. The data were recorded in SurveyMonkey for each respondent. A change in procedures request was submitted to the Walden University IRB because the first attempt to collect data for this study resulted in only one response. After the request for a change in procedures was approved and the prospective participants were sent a revised invitational e-mail by the chair of my dissertation committee and I forwarded e-mail reminders, there was a much-improved response rate. The response rate changed from only one response to 16 replies.

Data Analysis

I took detailed notes of my reflections regarding responses for each open-ended survey question. I also saved and backed up individual responses from the SurveyMonkey open-ended survey on my computer hard drive, travel disk, and on Google Drive. I divided and hand coded individual responses by institution. I saved individual responses in Microsoft Word and exported them to the HyperResearch software where I coded them electronically and recorded them in a code book for each of the three HBCUs in this study. I exported open-ended survey questions and responses and recorded them on an Excel spreadsheet.

I analyzed code frequencies by creating a report in the HyperResearch software program by choosing tools and frequency report in the software menu. The software

filtered cases to represent each of the three HBCUs in this qualitative comparative study. The frequency report listed all of the codes in the code book with the total number of times each code had been used in the study. I perused frequency reports for categories and reoccurring themes.

The prominent codes that addressed campus planning and policies for technology deployment were:

- Provost and chancellor are responsible for making decisions for technology deployment.
- Course designs are handled by teams, department, subject content experts, instructional designers.
- Faculty and administration are responsible for making decisions for integration of online programs into the curriculum.

Additional codes that addressed campus planning and policies for technology deployment were:

- No incentives.
- Online learning not included in mission and goal statements,
- Faculty interest very high.
- Online courses do not detract from the caring environment of HBCUs,
- Workshops and seminars.
- Numerous opportunities for workshops and individual training.

The codes that addressed organization, access, and connectivity environment were:

- State network system provides clarity of purpose promotes quality and reduces duplications.

- State network system provides resources, sharing, collaboration, teamwork, partnerships, community accountability, commonness of educational experiences.
- State network system important in accessing additional resources,
- State network system provides cheaper resources.
- Impact of networking with other institutions-not applicable.
- We have not done this (impact of networking with other institutions).

Technology Decision Factors That Emerged From the Data

I sought out phrasing and adjectives that determined the strength of responses as moderate or major by the 16 participants. Technology decision-making factors were listed in Part C of the open-ended survey. The technology decision-making factors resulted in codes that had a higher number of responses than the other listed codes were the following:

- 10 of the 16 were seeking to increase student enrollment; moderate extent-6 respondents, major extent-4 respondents.
- 10 of the 16 providing access to college for students who otherwise would not have access (e.g., because of geographic, family, or work-related reasons: moderate extent-5 respondents, major extent-5 respondents.
- 9 of the 16 responding to the needs of employers/business: moderate extent-6 respondents, major extent-3 respondents.
- 9 of the 16 meeting student demand for flexible schedules: moderate extent-4 respondents, major extent-5 respondents.
- 8 of the 16 were making more courses available: moderate extent-4 respondents, major extent-4 respondents.

Themes That Emerged From the Data

The HyperResearch frequency report produced reoccurring codes that developed into themes. Themes that emerged from the data included (a) integration of online programs, (b) interest in online learning, (c) incentives/compensation and release time, (d) mission and goal statements, (e) strategic plans, and (f) professional development. These themes emerged from a frequency report generated by the HyperResearch software program. The themes are summarized in Table 1 and are then explained more fully.

Table 1

Themes That Emerged From the Data

Themes	Indicators	# of participant statements
Integration of online programs	The vice presidents for academic affairs/ Provosts at University A and University B make decisions and set the tone for how technology deployment of online courses into the curriculum is handled and in some cases perceived at these institutions. University C uses a collaborative approach for the integration of online courses and programs.	9
Interest in online learning	There was very high interest among faculty in online learning at two of the HBCUs, University A and University C. Faculty members at University B had mixed feelings about teaching online courses.	9
Incentives/compensation and release time	Incentives were not consistent for all three HBCUs. Only two respondents stated that compensation and release time are provided for faculty to develop online courses.	32
Mission and goal statements	Online learning was not stated in the mission and goal statements at any of the three HBCUs.	16

(*table continues*)

Themes	Indicators	# of participant statements
Strategic plans	The strategic plans for University A, University B, and University C address online and distance learning in their strategic plans. Changes were about to be made for University A with more emphasis on the development and use of information technology.	16
Professional development	All three HBCUs offered numerous professional development opportunities for workshops, seminars, and webinars for online course development and instruction.	16

Integration of Online Programs

The vice presidents for academic affairs/provosts at the three HBCUs make decisions and set the tone for how technology deployment of online courses into the curriculum is handled and some in cases perceived at these institutions. For example, University B respondent 4 stated, “The new VPAA has usurped that decision-making authority from the 3 technology committees,” Another University B respondent 11 stated, “VPAA” University B respondent 13 stated, “Provost has the final say. Department Chair and Dean.” University A respondent 1 stated, “Provost and Chancellor.” University A respondent 5 stated, “The university administration.” University A respondent 15 stated, “. . . . The Office of Academic Affairs (Under the Provost and Vice Chancellor for Academic Affairs . . . .) The Chancellor: then the University Board of Trustees . . .”.

University C had a collaborative approach to making decisions for the integration of online programs into the curriculum. For example, University C respondent 16 stated, “Deans, department chairs, and faculty. Ultimately, online programs have to go through the university system for approval and then to University C GA.” The integration of

online programs into the curriculum at University A and University B was determined by the vice presidents for academic affairs/provosts. Decision-making for the integration of online programs at University C was a collaborative effort by different entities within the institution and by governing bodies outside the institution.

Interest in Online Learning

Very high interest existed among faculty in online learning at two of the HBCUs, University A and University C. Faculty members at University B had mixed feelings about teaching online courses. For example, University C respondent 9 stated, "Faculty interest in developing and teaching online is very high at our institution. My unit works closely with faculty to provide financial support, training and development," and "Resources for faculty teaching online or in hybrid format. However, the majority of faculty are very receptive to online learning as long as support is available." University A respondent 12 stated, "Many faculty are very interested in teaching online courses." University B respondent 6 stated, "Faculty members are very much interested in online courses." Another University B respondent 2 stated, "Our institution is divided, some instructors would prefer only online instruction while others will not teach online. The current administration has eliminated all nonessential online offerings indefinitely."

Incentives/Compensation and Release Time

Incentives were not consistent for all three HBCUs. Only two respondents stated that compensation and release time are provided to faculty to develop online courses. For example, University C respondent 9 explained,

> For my unit we provide faculty with stipends to develop online courses. Once the course is fully developed and offered, faculty are provided a stipend to teach the

> course online. Also, each summer up to 10 faculty members are selected to attend a three week online course development training program. These individuals are compensated for their participation.

University A respondent 1 stated, “We previously provided tablets as prizes for the first few faculty/staff that completed a certain online technical training. Due to the recent budget turmoil, we have been unable to provide prizes.” University B respondent 2 replied, “There are no incentives.”

Compensation and release time for faculty members to develop online courses were also not consistent at the three HBCUs. For example, University C respondent 14 stated, “There are some compensation structure in place for online course development.” Another University C respondent 15 stated,

> At one time this was the impetus of the University (especially at the early stages on online curriculum) from University C-GA (our statewide administrative body), as a more campus-wide directive. Currently, I believe this may occur for specific course development based on departmental need. However, in the age of “for profit versus brick and mortar” there is a massive need to encourage more and more development of online courses and programs. There is a massive demand for online instruction. It has been my experience that if you cannot meet the basic need for online courses, then students will quickly go elsewhere.

University A respondent 8 replied, “No funds for compensation have been cut and redirected.” University B respondent 10 expressed, “Faculty members do not receive release time or extra compensation for the development of any type of course regardless of delivery method.”

Mission and Goal Statements

Online learning was not stated in the mission and goal statements at any of the three HBCUs. For example, University C respondent 15 stated, “Not clearly and specifically placed ‘out front’ but is included by nature in the University KPIs (Key Performance Indicators).” University A respondent 1 stated, “No strong language was used before, but it is my understanding that many changes are on the horizon.” University B respondent 4 stated, “Online learning is not integral to the mission or goals of the university.”

Strategic Plans

The strategic plans for University A, University B, and University C address online learning. Changes were about to be made for University A with more emphasis on the development and use of information technology and distance education in their strategic plan. University A respondent 1 stated, “Our strategic plan expires this year. A new one is being created for the next 3-4 years which heavily involves the development and use of technology.” University B respondent 6 stated “Information technology is very much the part of our strategic plan and more consideration is given to it.” University C respondent 14 replied, “Excellent! The plan is designed to address different levels of technology across the university.”

Professional Development

All three HBCUs offered numerous professional development opportunities for workshops seminars, and webinars for online course development and instruction. University B respondent 6 stated, “Faculty members undergo the Quality Matters training and it is a requirement that online instructors must be certified to teach an online course.”

University C respondent 14 stated, “Training through Blackboard Distance Education Office, Professional Development Office the office of E-Learning and professional development activities outside the university.” University A respondent 16 replied, “There are several CETL classes offered each semester to assist in this process. However, there is a current moratorium on the development and offering of most online classes. The university has decided that online classes are not compatible with our student population.”

The above statements by the participants in this study provided indicators that substantiate the specific themes that emerged from the data. The higher the number of participants’ statements that had indicators resulted in more documentation that emerged into specific themes. The SurveyMonkey individual respondent reports also provided verbatim responses to all of the questions that contributed to the emerging themes.

Discrepant Cases

Discrepant data may have occurred for University B and University C. Question 4 stated, “What incentives are in place to encourage faculty or administrators to participate in technology deployment?”

- University C respondent 9 stated, For my unit we provided faculty with stipends to develop online courses. Once the course is fully developed and offered, faculty ‘members’ are provided a stipend to teach the course online. In addition, each summer up to 10 faculty members are selected to attend a 3week online course development training program. These individuals are compensated for their participation,

- University C respondent 14 stated, Technology use is an expectation. Faculty members are encouraged to use technology, technology devices and resources are provided to support technology deployment. Faculty members have access to an e-learning office and resources, access to Blackboard, WebEx, and Blackboard Collaborate, and
- University C respondent 15 stated, For the most part incentives are rather inconsistent. There are methods that could be in place to encourage better participation but unfortunately much of this area is rather subjective. As such, a well-rounded strategy that could increase participation is not in place.

University C respondents' answers to this question seem rather inconsistent or discrepant with responses from other participants. These responses indicate that some departments at this institution are better equipped to encourage faculty members to participate in technology deployment than others. Although incentives were offered at University C, there seems to be some disagreement or lack of knowledge among respondents if they are administered consistently on campus. Based on these responses to the open-ended survey, University C does not provide incentives for technology deployment for all of its faculty members.

University B respondents had discrepant answers to question 1 which stated, "If a technology needs assessment has been conducted at your institution, what is your perception of the value of the study? The responses to this question were: (a) University B respondent 2 stated, "If one has been done I am not aware of it;" (b) University B respondent 3 stated, "The needs assessment study was most helpful in setting our budget priority for the new year;" (c) University B respondent 4 stated, "No comprehensive

technology needs assessment has been conducted;" and (d) University B respondent 6 stated, "Not applicable." Additional University B respondents' comments regarding a technology needs assessment being conducted at their institution included the following: (a) University B respondent 7 stated, "I'm only in my second year at University B. If a technology needs assessment was done during that time I wasn't aware of it;" (b) University B respondent 10 stated, "There has not been a formal institutional needs assessment;" (c) University B respondent 11 stated, "An internal self-assessment was performed and primarily highlighted areas of concern that IT previously identified but was looked as a good exercise with stakeholders to understand their needs were being considered;" and (d) University B respondent 13 stated, "NA."

These responses were inconsistent and may indicate a communication problem at University B. Some respondents in administrative roles stated that a needs assessment study took place while some faculty members stated one did not take place or not applicable, meaning that they were not aware of a needs assessment.

University A respondents also had discrepant answers to question one, "If a technology needs assessment study has been conducted at your institution, what is your perception of the value of the study?"

- University A respondent 1 stated, we conduct needs assessments yearly, however, state funding is not always sufficient to fulfill the needs. Nonetheless, the assessments are valued.
- University A respondent 5 replied, Yes, very valuable.
- University A respondent 8 stated, the study was by University System General Administration involving technology needs and usage. The study was valued

because it was conducted across campuses but needs additional questions for our campus.

- University A respondent 12 stated, I am not aware of a needs assessment open-ended survey.
- University A respondent 17 stated, I am not aware of a technology needs assessment being completed.

The responses for University A were inconsistent as they were for University B which also indicated that a communication problem may exist. Others (faculty and staff members) were also asked about University A's responses and they speculated that a communication problem may exist on this campus.

Evidence of Trustworthiness

The evidence of trustworthiness section consists of: (a) credibility, (b) transferability, (c) dependability, and (d) confirmability. The results and analysis of the responses follow this section.

Credibility

Phone calls were made without success at alternate times for several days to 11 respondents who agreed to be contacted for interviews and to conduct member checks for internal validity. Although several phone calls were made, the respondents were never available resulting in no data collection from phone interviews. Consequently, validation of responses was conducted via e-mail with each participant's responses attached. Seven of the respondents who agreed to be contacted responded to debriefing e-mails. Several reminders were forwarded to the respondents. Five of the seven respondents indicated that their original responses were accurate or no changes needed to be made. Two

respondents made changes to their responses. One respondent made revisions for responses to questions 9 and 10. Another participant revised questions 3, 6, 10, and 12. The remaining four respondents who had not replied to previous debriefing e-mails were sent one last reminder with a deadline to respond by the end of the next business day. They were informed if they did not reply, the assumption would be made that their responses are acceptable and did not need any changes or revisions. No response was received from the remaining four respondents. Further, the comment section in the open-ended survey had a low number of responses. Only four respondents wrote one or two lines and which may have contributed to the lack of rich, thick data for this section. Also, eight respondents wrote *na* without elaboration to answer some of the questions and one respondent wrote *not applicable* to answer a question. Two respondents replied *none* and two respondents replied *no* to the questions. Only one respondent replied *yes* to one of the questions. Despite the difficulty in getting participants to respond to debriefing e-mails, the findings seem to accurately depict reality as seen by the respondents (Lincoln & Guba, 1985). Table 2 summarizes the number of short responses to the survey:

Table 2

Short Responses to Survey Questions

Responses	Number	Elaboration
Comments	4	1_2 lines
NA or Not applicable	9	0

(table continues)

Responses	Number	Elaboration
None	2	0
No	2	0
Yes	1	0

Transferability

The conclusions of this study may be transferable in some cases. These results may be transferable at some HBCUs with similar backgrounds and student populations. However, the reader will have to decide if the outcomes to this study are transferable based on the similarities of campus demographics. The respondents in this study consisted of three administrators, three department heads, and six faculty members representing the triangulation group at each of the three HBCUs, thus possibly allowing full comparisons with other universities. The responses have descriptions for readers to determine transferability and appropriateness for their own locations. The processes and findings that are described in the conclusions could be experienced or observed in similar HBCU settings.

Dependability

Dependability was achieved by conducting auditing activities. Respondents who agreed to be contacted were given the opportunity to review their responses and to make revisions as needed. Member checking allowed the respondents to check their responses

for any inconsistencies or flaws. The data documented naturally-occurring circumstances (Lincoln & Guba, 1985).

Confirmability

One of the auditing procedures used was to maintain a self-critical account of the research procedures, including my internal and external communication. Detailed notes of each research method were maintained to ensure confirmability. Auditing was conducted by member checking by e-mail to ensure the responses or data are accurate. As researcher, I had the capacity to discern the authenticity of the data, analyze, and make recommendations (Lincoln & Guba, 1985).

Results Responding to the Research Questions

The results I have included in this section are direct responses to the survey questions that answer the research questions and are separate from the emergent themes I presented earlier in this chapter. Selected responses of the participants are listed in this results section to avoid the redundancy of listing responses that were similar. The replies to the survey are discussed in the following paragraphs that address the two research questions. Table 3 (Appendix F) summarizes the open-ended survey questions that addressed the two research questions, RQ1, and RQ2. Table 3 also summarizes whether participants responded to requests for interviews and debriefing for this study.

Research Question 1:

How are decisions determined at HBCUs to integrate online learning programs into the curriculum?

One University C respondent stated that the university had a plan in place for implementation of procedures for measuring progress and updating their strategic plan.

For example, this respondent stated, “The university has an Office of Strategic Planning and the direction for that office provides annual updates on the strategic plan and the progress that has been made toward accomplishing goals and objectives.” University C seems to have a well-organized plan in place for measuring progress and updating its strategic plan. Another University C respondent expressed, “Performance-based matrix and aligned with strategic plan. The plan is also aligned with University System General Assembly performance-based matrix.” These responses indicate that University C seems to be progressive in its approach to providing metrics for the institution to improve educational output and services. University C addresses online and distance learning in their strategic plans and is relevant for one of the themes that emerged from the data, strategic plans.

University A also seems to be engaged in measuring progress and updating its strategic plan. One University A respondent expressed, “We have a new Chancellor who started in January of this year. He has just started to engage the University in developing a new 5-year strategic plan . . .”. The new chancellor at University A seems to be starting the university in the right direction by engaging the university in developing a new strategic plan. The actions by the new chancellor are relevant for the theme of strategic plans that emerged from the data.

University B respondents did not indicate that the institution had a specific strategic plan in place at the time of this study. One respondent stated, “Subcommittees are in charge of sections of the plan.” University B does not seem to be as organized at University C and University A for implementation of procedures for measuring progress and updating the strategic plan. It seems that University B officials will be gathering

information from different areas of the campus to see if they are meeting certain benchmarks for a strategic plan. It does not seem that University B has all of the information in place for developing a multi-year strategic plan. The actions by the University B administration are also relevant for the theme of strategic plans that emerged from the data.

University C respondents seemed to be inconsistent in their replies to survey question 4 concerning whether incentives are in place to encourage faculty members or administrators to participate in technology development. One University C respondent replied, “For my unit, we provide faculty with stipends to develop online courses. Once the course is fully developed and offered, faculty are provided a stipend to teach the course online . . . ” Another University C respondent replied, “For the most part incentives are rather inconsistent . . . ” It seems that some University C departments or areas offer incentives for technology deployment while others do not.

University A respondents seemed to be adamant that there are no incentives in place to encourage faculty or administrators to participate in technology deployment. For example, one respondent stated, “. . . Due to the recent budget turmoil, we have been unable to provide prizes.” Another University A respondent replied, “We use to have additional Title 3 funds for faculty to increase the use of technology and innovative practices.” Although no incentives were being offered at the time of this case study at University A, it seems that these respondents would welcome incentives for technology deployment to enhance online courses and programs.

University B respondents indicated that their institution does not offer any incentives to encourage faculty or administrators to participate in technology deployment.

One respondent replied, “There are no incentives.” Another respondent expressed, “I do not know of anything.” Overall, the University B respondents seem to be in a situation where they do not have any input or they are not encouraged to make suggestions for incentives for technology deployment on their campus. It seems as though technology deployment of online courses and degree programs were not a high priority.

University C respondents indicated there are ample opportunities for faculty members to participate in professional development courses or seminars to transition from a traditional (face-to-face) classroom environment to an online environment. For example, a University C respondent stated, “The Office of Extended Studies does an outstanding job . . . of providing online course professional development.” Overall, University C respondents seemed to be satisfied with the support the institution provides for professional development for transitioning to online courses and degree programs. In other words, the necessary support systems seem to be in place for the professional development of faculty members.

Although University A has a Center for Education in Teaching and Learning (CETL) that provides professional development seminars for transitioning from a traditional classroom environment to an online environment, the administration imposed a moratorium on the development of online courses. One respondent expressed, “However, there is a current moratorium on the development and offering of most online classes are not compatible with our student population.” University A appears to have a conflict of interest when it comes to offering professional development opportunities for faculty members to transition to an online classroom environment. It seems that two different messages are being sent out to faculty members that while professional

development opportunities were available on campus, the provost would not allow any further deployment of online courses and degree programs. It also raises the question, if faculty members are not allowed to develop additional online courses and degree programs, why should they bother to participate in professional development seminars and workshops that address transitioning to an online environment? The consequences of the administrative decision may place the institution at a major disadvantage in the future regarding enrollment and competitiveness with other institutions.

University B respondents stated that professional development opportunities are available for faculty members who want to transition from a traditional classroom environment to an online environment. For example, one University B respondent replied, “Quality Matters certification required. Numerous opportunities for workshops and individual training. The online policy is limited in its enforcement.” Although there are numerous opportunities for professional development for faculty members, it seems that the administration is not a strong advocate for the expansion of online courses and degree programs on this campus.

University C respondents stated there is some compensation in place for faculty members to develop online courses. However, release time is handled differently depending on the department chair and dean. A University C respondent replied, “Faculty are compensated for developing and teaching online courses. Course release time can be negotiated with the department chair and dean; however, this is not common on our campus at this time.” As HBCUs experience reduced budgets, providing release time for faculty members would be considered a luxury. Many HBCUs are not in a lucrative

positon where they can afford to provide release time for faculty members because of fiscal challenges.

University A respondents are in agreement that there are not any funds available for compensation or release time to develop online courses. One University A respondent expressed, “No funds for compensation have been cut and redirected.” Because the provost has placed a moratorium on the development of future online courses and degree programs, it seems unlikely that resources will be directed to compensation and release time for the development of online learning programs.

University B respondents had similar responses to University A respondents regarding compensation and release time for faculty members. One University B respondent replied, “Faculty members are not being compensated nor do they receive release time to develop online courses and degree programs.” In the era of budget cuts for HBCUs, it did not seem likely at the time of this study that the University B administration will provide compensation and release time for faculty members to develop online courses and degree programs.

University C respondents indicated that there is a collaborative effort at their institution to make decisions for the integration of online programs into the curriculum. One University C respondent expressed, “This is a collaborative effort at our institution. The idea originates from the academic unit (faculty and department chairs) and then moves from the academic unit . . . and then moves through the College/School curriculum approval process . . . .” The University C administration seems to be proactive by involving deans, department chairs, and faculty in the decision-making process. A collaborative approach to the process seems to be an equitable method of reaching out to

various academic departments so they can be a part of the process and have some ownership.

University A respondents also stated that they have a collaborative effort at their institution to make decisions for the integration of online programs into the curriculum. A University A respondent replied, ". . . faculty and administration. We have a secondary group which includes University System General Administration." Both University C and University A have a similar collaborative approach to make decisions about online programs. This common collaborative approach may have something to do with both universities operating under the same university system.

University B also had a collaborative approach for making decisions for the integration of online programs into the curriculum, although the provost made the final decision. A University B respondent replied, "Departments, Deans, the Faculty Senate and the Provost are all involved." University B respondents did not indicate that their institution was part of a university system.

University C respondents did not indicate that online learning was included in the institution's mission and goal statements. One University C respondent stated, "Online learning is not specifically addressed in the university's mission and goal statements." The omission of online learning in the mission and goal statement may mean that University C has not caught up with the technology innovations of being integrated into the curriculum as part of current and future plans. It may also mean that University C has missed an opportunity to be progressive in fully embracing online learning.

University B respondents also stated that online learning is not included in the university's mission and goals statements. A University B respondent replied, "Online

learning is not integral to the mission or goals of the university." University B also seems to have missed an opportunity to state that online learning is integrated in the curriculum.

University C respondents answered the question concerning online learning being included in the university's mission and goal statements as basically nonexistent. One University C respondent stated, "Online learning is not specifically addressed in the university's mission and goal statements." Although University C offers numerous online courses and degree programs, it has missed an opportunity to include online learning in its mission and goal statements. Because University C seems to be a strong proponent of online learning, its administration needs to update its mission and goal statements to include online learning to become current and competitive with other institutions.

University B respondents also answered the question concerning online learning being included in the university's mission and goal statements as nonexistent. One University B respondent replied, "Online learning is not integral to the mission or goals of the university," University B just as University C has missed an opportunity to provide online learning in its mission and goal statements. Although the university's provost has imposed a moratorium on the development of future online courses and degree programs, University B continues to have existing online learning in place. The inclusion of online learning in the university's mission and goal statements has the potential of making University B more competitive and up-to-date.

University A respondents also indicated that online learning was not included in the institution's mission and goal statements. One University A respondent expressed, "No strong language was used before, but it is my understanding that many changes are on the horizon." Based on this respondent's answer, it appears that the university is

planning to include online learning in its mission and goal statements. University A administration's move in this direction seems to be an admission that online learning is here to stay and that to become more competitive and current, online learning must be included in the mission and goal statements. A movement toward the expansion of online learning may be justification for including online learning in the mission and goals statements.

Analysis of Results That Address Research Question 1

My analysis of the survey questions that were designed to address RQ1 led to several observations. All three HBCUs have a process in place for measuring progress and updating their strategic plans. The process for the implementation of procedures include: (a) Office of Strategic Planning updates the strategic plan annually, (b) the institutional assessment plan, and (c) focus groups, listening tours and mining the data to determine if benchmarks are being met. Technology deployment may need to be a top priority for inclusion in the strategic plans of these institutions.

Only one HBCU, University C, had incentives in place to encourage faculty or administrators to participate in technology deployment. The other two HBCUs had no incentives in place although University A previously had offered tablets. The tablet incentives were phased out because of a reduction in federal Title III funding. It may be advantageous for the sponsored program offices and faculty members to research available technology grants to assist with providing incentives to participants in the development and implementation of online courses and programs.

All three HBCUs offered numerous professional development courses and seminars. Examples of professional development activities included: (a) workshops and

seminars, (b) Blackboard training, (c) brown bag luncheons for faculty facilitated by the Center for Teaching and Learning, and (d) Quality Matters training. Although professional development activities were in place, University A and University B faculty members seem to need more of a philosophical and financial commitment by their administrations to increase online courses and programs.

Only one HBCU, University C, provided compensation to develop online courses. The other two HBCUs, University A and University B, did not provide compensation for online course development. Innovative ways may need to be found for University A and University B to provide compensation for online course development.

The responsibility of making decisions for the integration of online programs into the curriculum was a collaborative effort at University C. This effort involved deans, department chairs, and faculty with approval by the university system and the university system general assembly. Decision-making for online programs at the other two HBCUs, University A and University B, was handled by the provost, chancellor, vice president for academic affairs, and the university administration most of the time. University A and University B may need to reevaluate their decision-making process for the deployment of online programs to avoid lagging behind other institutions.

Online learning was not included in any of the three HBCUs' mission and goal statements. It seems that technology has surpassed visionary strategic planning to include online learning in the mission and goal statement of these HBCUs. The three HBCUs in this study may need to make a concerted effort to include online education in their mission and goal statements to become more current and competitive with other institutions.

My analysis of the survey questions regarding RQ1 was facilitated by studying the responses that were most common among participants from each of the three universities. The survey questions that address Research Question 1 are: 3, 4, 6, 7, 10, 11, and 14. Survey questions that address Research Question 2 are: 1, 2, 8, 9, 11, 12, and 13 (see Appendices C and D for survey questions).

University A's responses that address RQ1 had the highest number of responses to these factors:

- Meeting student demand for flexible schedules-major extent: 4.
- Providing access to college for students who otherwise would not have access (e.g., because of geographic, family, or work-related reasons)-major extent: 3 and maximizing the use of existing college facilities-major extent: 3.

University C's highest number of responses to question 14 that address RQ1 were:

- Seeking to increase student enrollment-major extent:2.
- Making more degree programs available-major extent: 2.
- Meeting student demand for reduced seat time-major extent:2.

University B's highest number of responses to question 14 that address RQ1 were:

- Seeking to increase student enrollment-moderate extent:4.
- Making more courses available-minor extent: 5.
- Making more degree programs available-minor extent: 5.
- Making more certificate programs available-minor extent: 5.
- Making student demand for flexible schedules-minor extent: 4.
- Maximizing the use of existing college facilities-minor extent: 5.
- Meeting student demand for reduced seat time-not at all: 5.

University C and University B shared a commonality in seeking to increase student enrollment. University B's administration does not prioritize making decisions on technology deployment regarding college-level, online course offerings for increasing student enrollment, as did University C. Further, University B had the highest number of minor extent responses to several factors. A higher number of minor extent responses to technology deployment factors may imply that increasing online courses and degree programs is not a major concern for this institution.

Based on University A's largest number of major extent responses were for the three indicators for open-ended survey question 14: meeting student demand for flexible schedules, providing access to college for students who otherwise would not have access, and maximizing the use of existing college facilities. The administrators and faculty members placed more emphasis on student access as affecting their institution's decisions on technology deployment and online course offerings.

University C's major extent responses placed more emphasis on seeking to increase student enrollment. The respondents placed less emphasis on making more degree programs available and maximizing the use of existing college facilities. Participants responded to the use of existing college facilities to a minor extent. Administrators and faculty members were divided in their responses to the importance of meeting student demand for reduced seat time with two minor extent responses and two major extent responses.

Because University B is smaller than the other two HBCUs in this study with a population over 3,000 and the numerous minor extent responses to the above five factors suggest that technology deployment of online courses and programs is less progressive on

this campus than the other two HBCUs. In contrast, technology deployment of online courses seems to have already grown at University C for the size of the student population.

The data I perused from the administrators' responses from the three HBCUs did not produce any responses that mentioned the expensiveness of technology or budget shortfalls as a major concern. However, faculty members were vocal about the lack of funds for compensation, release time, and incentives to develop online courses and degree programs. Administrators may not be vocal about reduced budgets because they realize this is the era that we live in-doing more with less. Further, administrators may not be as vocal about reduced budgets as faculty members because they are not as directly affected because of their higher salaries in some cases. Specific survey questions and responses for each HBCU that address RQ1 are located in Appendix G.

In addition to the university responses to RQ1, I researched all three HBCU websites to find out what kinds of documents were in place that addressed how decisions are determined to integrate online learning programs into the curriculum. None of the websites contained documents that addressed RQ1 in terms of online learning in strategic plans, mission statements, technology committee doctrines, and meeting minutes. The following documents were found on the websites:

- Online programs (general description.
- Online certificates and programs.
- Off-campus programs.
- Online course listing quick navigation.
- Typical questions and answers about online courses.

Other documents that were found on the websites were:

- Achieving academic distinction: the plan for student success (specifically addresses expanding online and distance learning offerings.
- Thinking about an online course?/ References for students in online courses,
- Online-anytime, anywhere-courses and programs-hybrid courses.
- Online users guide, and
- The Canvas Learning Management System computer and browser requirements.

Additional documents that addressed course development, online programs, and strategic plans were found on the websites included:

- Guidelines on course development.
- 2008-2012 strategic plan (offer select courses and programs via distance and online venues),
- Online programs (general listing,.
- Distance education FAQs (questions and answers.
- Center for University Teaching and Learning 2004-2009 strategic plan (implementation of new instructional technologies, incorporating technology into courses teleconferencing and distance learning through interactive video assist faculty in developing and enhancing technology skills, technology training provide technical assistance for implementing instructional technologies).

Research Question 2:

How do the individuals who make decisions perceive online learning programs at HBCUs?

My analysis of the survey responses in regard to who participants perceived made decisions about online learning programs resulted in similar/divergent responses. University C respondents stated that technology needs assessments were conducted on a regular basis on their campus. A University C respondent replied, “I have conducted several needs assessments at University C in 23+ years of service. In my opinion each time the needs assessments were conducted they provided very valuable insight on the technology needs of the University at that time.” Because technology needs assessments are conducted on a regular basis at University C, the campus appears to getting the attention it needs to be proactive in technology deployment.

University A respondents also stated that technology needs assessments are conducted annually. One University A respondent answered, “We conduct needs assessments yearly, however, state funding is not always sufficient to fulfill the needs. Nonetheless, the assessments are valued.” University A also seems to be proactive in mining data for technology deployment. However, the annual technology needs assessment at University A may be interpreted as a conflict of interest because the provost had imposed a moratorium on the development of future online courses and degree programs.

University B had conflicting responses concerning technology needs assessments on their campus. One University B respondent replied “If one has been done I am not aware of it.” Another University B respondent replied, “The needs assessment study was most helpful in setting our budget priority for the year.” More University B respondents stated that a technology needs assessment had been conducted. However, it could be that

one of the respondents was unaware that a technology needs assessment had been conducted.

University C respondents indicated more attention needs to be given to informational technology in the strategic plan. A University C respondent replied, "Although the university has a solid strategic plan, I would like to see more emphasis on technology," Based on University C respondents' replies, the university administration may need to focus more on the development and use of informational technology in the strategic plan.

University A respondents stated that a new strategic plan that involves informational technology is being developed. One University A respondent answered, "Our strategic plan expires this year. A new one is being created for the next 3-4 years which heavily involves the development and use of technology." The University A administration seems to be on the right pathway for including the development and use of informational technology in its strategic plan.

University B respondents stated their strategic plan is still in preparation that incorporates informational technology. A University B respondent answered, "The updated strategic plan has not been disseminated yet." Another University B respondent replied, "Information technology is very much the part of our strategic plan and more consideration is given to it." University B also seemed to be on the right pathway for inclusion of the development and the use of informational technology in its strategic plan. However, a strategic plan that heavily involves the development and use of informational technology seemed to conflict with the provost's philosophy of imposing a moratorium on the development of future online courses and programs.

University C respondents indicated there is high interest among faculty members to teach online courses. One University C respondent replied, “It is extraordinarily high. Online learning is often ‘fully unexplored frontier’ by many brick and mortar institutions involved in education.” Because the University C administration is proactive in its approach toward online learning and valuable resources are already in place, faculty members seemed to have a high interest in using online instructional methods.

University A respondents expressed high interest in online learning. A University A respondent replied, “I think there is high interest. However, our Provost has decided that online classes are not the best vehicle for our students, and we are moving away from them.” University A seemed to have a dilemma that has come between the wishes of faculty members, the strategic plan, and the provost’s moratorium on the future development of online courses and degree programs. The university administration needs to make a decision if whether it will embrace and support the development of online courses and programs.

University B respondents stated that some faculty members are supportive of online learning while others are not supportive. A University B respondent expressed, “Our institution is divided, some instructors prefer only online instruction while others will not teach online. The current administration has eliminated all nonessential offerings indefinitely.” By eliminating all nonessential course offerings indefinitely, it appears that the administration is going backwards instead of going forward by embracing online education to make the institution more competitive and to increase enrollment. Faculty members who are interested in teaching online courses should be given this opportunity. The success of online courses and programs may have a positive effect on other faculty

members who are not currently teaching online. In other words, more faculty members may become interested in online instruction which could enhance University B's curriculum and enrollment.

University C respondents indicated that online courses enhance the caring and nurturing environment that is characteristic of HBCUs. One University C respondent replied, "If an online course is properly designed and the faculty is enthusiastic about teaching online, the caring and nurturing will not be lost." It seems that the University C culture promotes this kind of thinking among faculty members coupled with the fact there is high interest in teaching online courses at this institution.

University A respondents also indicated that online courses enhance the caring and nurturing environment that is characteristic of HBCUs. A University A respondent answered, "I believe online courses can still help to create a caring and nurturing environment by the behavior of the instructor. An online course should not impede the ability to show compassions." It is evident from the responses that University A respondents believe that online courses enhance the environment if administered correctly.

University B respondents expressed mixed opinions if whether online courses enhance or detract from the caring and nurturing environment that is characteristic of HBCUs. For example, one University B respondent replied, ". . . . There are very strong arguments on both sides of the issue. With that in mind, HBCUs historically are nurturing environments and such considerations should not be lost due to technology." Another respondent replied, "Most students and two-thirds faculty feel online courses detract from student learning and the hand-holding environment of F2F classes. The new VPAA has

prohibited freshmen from taking online courses." The University B administration may need to embrace online learning more so that it can be embedded in all instructional methods of delivery. It may be possible to maintain a caring and nurturing environment if online learning is administered correctly and if the vice president for academic affairs changes his or her mindset about the potential of online learning.

University C respondents stated that online learning is not addressed in the institution's mission and goal statements. A University C respondent replied, "Online learning is not specifically addressed in the university's mission and goal statements. However, the issue of access for all students is part of the mission and 2020 strategic plan. . . . ." Although online learning is mentioned in University C's strategic plan, the administration may need to consider including it in the institution's mission and goal statements to showcase a complete commitment to offering online courses and degree programs.

University A respondents also indicated that online learning is not included in the institution's mission and goal statements. A University A respondent replied, "No strong language was used before, but it is my understanding that many changes are on the horizon." The University A administration may realize that it is time to include online learning in the institution's mission and goal statements to show commitment to alternative course delivery methods to become competitive with other institutions and to increase enrollment.

University B respondents also stated that online learning is not included in the institution's mission and goal statements. One University B respondent expressed, "Online learning is not integral to the mission or goals of the university." University B's

administration, unlike University A, does not appear to have plans to include online learning in its mission and goal statements. The administration may want to reconsider the inclusion of online learning in the mission and goal statements because failure to embrace online learning could be costly in the future regarding the types and number of courses and degree programs that are offered compared to other institutions.

University C respondents stated that their institution is part of a statewide network system and there are advantages for participation in this system. One University C respondent replied, "We are a constituent member of the University C 14-campus system. There are a number of advantages to being a part of a higher education system, including reduced pricing for licensing of our Blackboard LMS and other applications to support online learning . . . ." Because University C's administration is a strong advocate for online learning, it is not surprising that their institution is part of a state network system. Being part of a statewide network system may help to enhance online learning outreach and opportunities.

University A respondents also stated that their institution belongs to a statewide network system. A University A respondent expressed, "The cheaper resources. Most pricing for licensing is negotiated at the state level." Although University A's administration is not as strong of a proponent for online learning because of the provost's beliefs, it is probably helpful to be part of a statewide network.

University B respondents stated that their institution is not part of a statewide system. One University B respondent replied, "We are not part of a state network system." By not being a part of a statewide network system may be because the particular state where University B is located did not have a statewide network system which is not

a reflection on the institution. However, University B's administration may need to become stronger proponent of online learning and an advocate for a statewide network system that can provide lower prices for licensing and other resources to enhance online learning.

All of University C respondents stated that the effect of networking with institutions outside their campus for online learning purpose was a positive experience. A University C respondent replied, "Having the opportunity to network with colleagues in the University System is very beneficial. We support each other in various areas, such as policies, procedures, course offerings, training materials and faculty collaboration." University C seems to have fully benefited from being a part of the statewide network system because the institution offers a variety of online courses and degree programs. Further, the faculty members at University C seem to be highly interested in online learning.

University A respondents have also indicated that the effect of networking with institutions outside their campus for online learning has also provided a positive experience. A University A respondent answered, "It is important in accessing additional resources." The University A administration may need to administer a technology needs assessment to find out what the needs are for the students and faculty members before limiting the number of online courses and degree programs that are offered. It may be beneficial for the University A administration to take full advantage of the statewide network system to enhance the curriculum.

University B respondents stated that their institution is not part of a statewide network system. One respondent replied, "We have not done this." As stated earlier,

University B's administration may need to become a stronger proponent for online learning and for a statewide network system that can provide lower prices for licensing and other technology resources. A statewide network system could help to enhance University B's online courses and degree programs.

Analysis of Results that Address Research Question 2

Both University C and University A respondents stated that technology needs assessments had been conducted at their respective institutions. However, a University A respondent was not aware of a needs assessment at the institution. Also, a University B respondent was unaware of a needs assessment study on the campus. All three HBCUs seem to display some inconsistency in the awareness of technology needs assessment studies on their campuses.

Although there seems to be a consensus at University C that a strategic plan exists, the plan needs specific goals on acquiring and implementing technology. At University A, a new strategic plan was being developed for the next 3 to 4 years which heavily involves the development and use of technology. University B respondents seem to have mixed messages about having a strategic plan at their institution.

The perception of the value of a strategic plan for the development and use of informational technology by one University C respondent is that more emphasis should be placed on technology. Another University C respondent expressed that the plan is designed to address different levels of technology across the University. A University A respondent explained that a new strategic plan is being developed for the next 3 to 4 years with emphasis on the development and use of technology. A University B respondent stated that information technology is very much part of their strategic plan and more

consideration is being given to it. It seems that more consideration is being given for expanded emphasis on information technology in the strategic plans at all three HBCUs. The administrations at these institutions may be realizing that if they do not include informational technology deployment in their strategic plans, they may be left far behind.

Faculty interest in teaching online courses is high at both University C and University A. However, at University A, a respondent stated that their provost has decided that online classes are not the best instructional method for their students. A University B respondent indicated that their institution is divided because some instructors prefer only online instruction while others refuse to teach online. Another University B respondent stated that their provost has placed more emphasis on face-to-face courses because he feels that freshmen need more of an in-person nurturing environment.

Respondents at both University C and University A believe that online courses can enhance the environment if they are taught properly and with enthusiasm. A University B respondent explained that HBCUs historically are nurturing environments and such considerations should not be lost due to technology. However, another University B respondent stated that most students and two-thirds of the faculty believe online courses detract from student learning and the nurturing of a face-to-face classes. Further, a University B respondent said the new vice president for academic affairs has prohibited freshmen from taking online courses. Perhaps it might be worthwhile for the new vice president for academic affairs to research both 4-year PWIs and 4-year HBCUs to find out how their administrations are integrating online courses and technology in general for freshmen.

Respondents at all three HBCUs stated that online learning is not specifically addressed in their universities' mission and goal statements. University B respondents explained that online learning is not integral to the mission or goals of the university. To be more competitive with academic programming and with increasing enrollment, all three HBCUs may need to be more proactive to include online learning in their mission and goal statements.

Both University C and University A respondents stated there are many advantages for being part of a state network system that includes resource sharing, collaboration, teamwork, partnerships, community accountability, commonness of educational experiences for students, value of degrees, and protection. Also, a University A respondent explained that students can take courses at different institutions within the system at the same price as their home institution. University B respondents stated their institution is not part of a state network system. It is evident that states operate their public university systems differently, depending on what part of the United States they are located and the philosophical direction of their boards.

Another University C respondent reiterated that networking with institutions outside their campus provides support regarding policies, procedures, course offerings training materials, and faculty collaboration. A University A respondent stated that networking with other institutions is important for accessing additional resources. As stated previously, University B is not part of a state network system. Based on the responses from University C and University A, it may be advantageous for University B to become part of a state network system to become more competitive in offering online

academic courses and programs. Specific survey questions and responses for each HBCU that address RQ2 are located in Appendix H.

In addition to the university responses to RQ2, the websites of all three universities were researched to find out how decision-makers perceive online learning programs at these HBCUs. The following documents or methods of communication were found on the websites:

- Online technology newsletter from the Division of Extended Studies for faculty, staff, administrators, and students.
- Facebook- online degrees.
- Twitter.

University C appears to be more transparent and a proponent of online learning programs compared to University A and University B based on their communication outreach to the campus community via newsletter, Facebook, and Twitter. University C's online newsletter contained these topics:

- Registration deadlines.
- Trends and technology.
- Faculty news.
- Blackboard training sessions.
- New online programs and certificate programs.

Additional topics covered in University C's online newsletter included:

- Faculty courses that are Quality Matters certified.
- Student quote about distance and online education at University C.
- News article on University C's School of Law, a leader in telepresence education.

- An announcement for recruitment for online and distance education programs.

University C's Facebook page contained:

- General news articles about institutions within the university system.
- University C Extended Studies invitation to check out the writing studio.
- Visitor posts.
- Like you page.
- Reviews (tell people what you think).
- Links to other articles.

University C's Twitter page contained these tweets:

- Graduates of HBCUs have well-being edge (strong, consistent, and progressing-in a number of areas of their lives, particularly in their financial and purpose well-being).
- Employers look for educated workers to fill high demand jobs.
- Support University C as the Tom Joyner Foundation School of the Month (for fundraising purposes).
- University C students worked 237,495 volunteer hours assisting organizations and agencies, a contribution worth nearly $5.1 million to the local economy.

Discrepant Cases/Nonconfirming Data related to RQ2. Based on the responses from University A, University B, and University C, discrepant or nonconfirming data sometimes emerged that were not in agreement with one of the themes that were discussed earlier in this chapter. The data were presented verbatim the way participants responded without editing except for the use of pseudonyms to give the reader a more realistic experience for the responses. It was my responsibility, as researcher, to identify

the themes based on the data that emerged. Data that addressed incentives/compensation and release time, in particular, was not in agreement with this particular theme because of numerous inconsistent responses for the three HBCUs.

Summary

In response to Research Question 1, "How are decisions determined at HBCUs to integrate online programs into the curriculum?" all three HBCUs have a process in place for measuring progress and updating their strategic plans. Only one HBCU, University C, had incentives in place to encourage faculty or administrators to participate in technology deployment. All three HBCUs offered numerous professional development courses and seminars. Only one HBCU, University C, provided compensation to develop online courses. The responsibility of making decisions for the integration of online programs into the curriculum was a collaborative effort at University C. Online learning was not included in any of the three HBCUs' mission and goal statements. None of the three HBCU websites contained documents that addressed Research Question 1 for factors regarding online learning in strategic plans, mission statements, technology committee doctrines, and meeting minutes. Additional documents for University B and University C were found on their websites that addressed course development and online programs.

In response to Research Question 2, "How do the individuals who make decisions perceive online learning at HBCUs?" both University C and University A respondents stated that technology needs assessments had been conducted at their respective institutions. Although there seemed to be a consensus at University C that a strategic plan exists, the plan needed specific goals on acquiring and implementing technology. The perception of the value of a strategic plan for the development and use of informational

technology by one University C respondent was that more emphasis should be placed on technology. Faculty interest in teaching online courses was high at both University C and University A. Respondents at both University C and University A believed online courses can enhance the classroom environment if they are taught properly. Respondents at all three HBCUs stated that online learning is not specifically addressed in their universities' mission and goal statements. Both University C and University A respondents stated there are several advantages for being part of a state network system. I researched the websites of all three universities to find out how decision-makers perceive online learning programs at HBCUs. University C displayed numerous documents or methods of communication regarding online learning via online newsletter, Facebook, and Twitter. Although the responses of their staff members and the setting of each institution were discussed, brief summaries of the characteristics of the three key institutions are provided next to provide a context for this discussion. Chapter 5 will provide an interpretation of the findings.

Chapter 5: Discussion, Conclusion, and Recommendations

The purpose of this qualitative comparative case study was to obtain insight into how decisions are made to incorporate online courses and programs into the curriculum at HBCUs. This study was conducted because it addresses an under-researched area of high education, HBCUs and online education (Moore, 2008) and the technology gap for African American students (Flowers et al., 2012). HBCUs have not been able to keep up with the changing demands of technology to offer online courses and programs compared to PWIs causing African American students to not have as much access as students at majority institutions. The effect of changing technology has not been adequately addressed in higher education research.

My summary of the findings noted that University C's administration seemed to be proactive in responding to both internal and external pressures. University A's senior administrators seemed to be taking a less proactive approach in responding to internal and external pressures and demands by placing a moratorium on the growth of future online courses and degree programs. University B's administration also seemed to take a less proactive approach in responding to internal and external pressures and demands. The administration placed more emphasis on face-to-face courses for freshmen.

The three HBCUs had different strategies on decision-making for technology deployment. University C seemed to be the most progressive HBCU regarding technology deployment. It had the full support of the vice president for academic affairs/provost and the chancellor, and the advantage of being a part of a state network system. University C's administration was constantly conducting technology needs

assessments to satisfy the needs and demands of internal and external stakeholders to make decisions.

Interpretation of the Findings

The strategies pursued by the campuses appeared to be consistent with Donaldson's (2001) observations that environmental influences compel organizations to respond for survival and competitiveness. According to Donaldson, whose work provided the conceptual framework for this study, an organization's reaction to external demands can be anticipated by possible environmental events affecting it. The key point is how the organization responds to environmental contingencies for its own survival to avoid becoming a misfit.

Although University A offered online courses and was also part of a state network system, its provost did not seem fully committed to technology deployment for future online courses and programs. Further, this provost had decided that online classes are not the best method of delivery for the university's student population. In contrast to University C, the belief systems of these senior administrators appeared to limit technology deployment of online courses. University B, unlike University C and University A, is not part of a state network system and did not appear to have the full commitment of the administration for technology deployment and did not seem to be concerned about Donaldson's (2001) proposition of environmental influences on survival and competitiveness.

At the time of this study, the provost at University B believed that lower level classes, especially for first-year students, should be offered as face-to-face courses to provide nurturing. The provost at University A seemed to believe that online courses are

not appropriate for their student population and had placed a moratorium on the development of future online courses. University B also seemed to take a conservative approach to technology deployment of online courses and programs. According to Donaldson (2001), the central assumption of contingency theory is that an organization's circumstances and environments are important for understanding actions and structures or organizations. The belief systems of the provosts at University B and University A have influenced the institutions' approaches to technology deployment of online courses and programs despite external pressures. Donaldson predicted that an organization that made the modification based on external pressures and demands transitioned into a new level of fitness to prevent performance loss. Thus, Donaldson's contingency theory has implications for Universities A and B.

Donaldson's (2001) contingency theory emphasized the relationships between organizations and their environments. Environmental influences cause organizations to react for survival and marketability. University B did not seem to be responding to both the internal and external pressures and demands as University C was responding. The provost at University A also did not seem to be responding to internal and external pressures and demands just University B. According to Donaldson, a misfit has occurred when an organization no longer provides services needed to its internal and external constituents. The belief systems of the provosts at University B and University A toward the future development of online courses could be impeding technology deployment of the curriculums at both institutions and could result in a misfit with all affected constituents.

Although HBCUs share many historical and cultural characteristics, they are not all the same (Minor, 2004), and these findings reinforce that view. The institutional characteristics that HBCUs have in common can be used to help understand the context in which decisions are made. Based on the three HBCU administrations' approaches to technology deployment decision-making, however, it could be argued that their administrative decision-making varies for each respective institution and has implications for the decision-making styles for technology deployment for other HBCUs in the United States. In other words, these universities vary in decision-making strategies for the integration of online courses and programs into the curriculum. HBCUs vary in decision-making strategies as a result of (a) having adequate or limited financial resources, (b) because of the belief systems of senior administrators and faculty members and, (c) if whether internal and external pressures and demands have made a compelling effect on the decision-making process for online courses and degree programs.

The integration of technology into higher education has implications for institutional decisions and communications (Harris & Martin, 2012). Data can be used in strategic planning and in communicating with state legislators and administrators, and faculty at universities in the following ways: (a) emphasis on faculty and personal connections in online courses, (b) faculty development and incentives to use interactive technologies, and (c) updating online information and technology. Many respondents from University C indicated a needs assessment for technology deployment had been conducted. A needs assessment has implications for University A and University B administrations for planning purposes for the technology deployment for online courses and programs in their strategic plans. A completed needs assessment as a precursor is an

example of the importance of having a guiding plan in place toward technology deployment. The strategic plan will provide a framework for what direction the institution is going toward online and distance education. A comprehensive strategic plan will keep administrators informed and prepared for foreseeable challenges (Howell, Williams, & Lindsay, 2003; Lerner, 1999).

According to open-ended survey participants, none of the three HBCUs has addressed online learning in its mission and goal statements which is important for both internal and external stakeholders. Decision-makers must be able to comprehend and articulate the necessity and advantages of higher education to a wide range of stakeholders. The inclusion of stakeholders in the decision-making process should develop into more robust mission and goal statements that directly and boldly address online learning; that may result in these institutions being in competition with other colleges and universities that offer online and distance learning courses and programs. The mission and goal statements provide a means to communicate both internally and externally what the institution is about and what it is committed to regarding academic programs.

The success and credibility of online programs depend on an institution's ability to deliver high quality and cost-effective educational services (Wang, 2006). Overall, University A and C respondents indicated very high interest among faculty for online learning while University B respondents indicated there are mixed feelings about teaching online courses. However, because data were not collected on students' interests for online learning for this study, how technology deployment of online learning is perceived by the three HBCUs' student populations cannot be determined, although logic

would suggest that all students want to have skills relevant to the current workplace environment.

The rapidly changing dynamic of online education is affected by changes in demand and technology (Wang, 2006). These changes have implications for university administrators and faculty to stay current with technology trends. The rapidly changing dynamic of online education had particular implications for the HBCUs in this study. University C seemed to be keeping up as much as possible with the current technology, trends, and with active participation in the state network system. Although University A participated in the state network system, the provost was not allowing new development of online courses and full participation in the state network system. Further, University B did not participate in a state network system which seemed to place this institution at a severe disadvantage in keeping up with the current technology trends. According to Donaldson (2001), an organization that continues to operate by obsolete strategies will cause upper management to come to terms with its past decisions which resulted in a poor performing organization. University C was more exemplary of an institution keeping up with the rapidly changing dynamic of online education. However, University A and University B seemed to be in need of expediting their status with this changing dynamic environment.

Of particular note, the CIOs at these three institutions were not mentioned in others' responses as having influence for technology deployment decision-making (Buechner et al., 2005) although CIOs were included in the sample. CIOs are important individuals to include when planning for technology, and when decisions need to be made on a university campus (Durso, 2012). CIOs should be integrated into all

stakeholder aspects of the institution, supporting and partnering in research, instruction, and administration (Buechner et al., 2005). Further, CIOs need to be included for technology decision-making because they need to understand the institution's priorities, operating environment, problems, and opportunities-especially those that can be unethically used through adaptive use of information technology and information deployment (Dearstyne, 2006). The findings among the responses of the three HBCU participants in this study regarding not mentioning CIOs as having influence in technology decision-making for the integration of online courses or programs into the curriculum may have implications for a contingency factor that affects organizational outcomes and survival.

In the contingency theory of organization, a relationship exists between the organization and its effectiveness (Donaldson, 2001). Contingency is any variable that regulated the effect of an organizational characteristic on the organizational outcomes. Thus, the contingency factor decides which characteristic produces high volumes of the effectiveness of the organization (or what divisions or individual members). The seven findings can be interpreted as the variables that regulate the effect of organizational characteristics on the organizational outcomes. In other words, the current state of affairs at each of the three HBCUs regarding decision-making for the integration of online courses and programs into the curriculum is determined by a senior administrator such as the vice president for academic affairs/provost with some input from deans, department chairs, and faculty. Thus, the influence of this senior administrator can be interpreted as a contingency factor that affects organizational outcomes regarding technology deployment.

Three prevalent themes or concepts emerged as a result of the literature review. The three themes were: decision-making is pivotal toward progress, the importance of internal and external stakeholders, and assessment. The literature seemed to point out that these three themes are interdependent with each other in providing information for decision-making. In other words, a decision can maneuver the direction of the institution regarding academic programming, online and distance education, in particular. Internal and external stakeholders are critical to the overall advancement of the institution, especially the curriculum. The literature also emphasized that assessment is critical for optimal performance of an institution. Assessment provides data that can inform what is working well, what is not working so well, and suggestions or recommendations for correcting the problem areas.

Senior administrators can also learn how to improve their institutions by reviewing case studies of organizational decision-making at other institutions (George & McKeown, 1985). As stated earlier, American foreign policy decision-making was substantially improved by reviewing case studies that have provided transparent information for organizational information-processing systems (Allison, 1971). The understanding of decision-making in business firms has also been improved by researching case studies (George & McKeown, 1985). A plethora of literature exists to substantiate decision-making is pivotal, the importance of internal and external stakeholders, and assessment.

Limitations of the Study

I was not successful in getting the 11 respondents who agreed to follow-up interviews to participate in this second stage of data collection. As stated earlier,

numerous attempts were made at alternate times to conduct follow-up interviews by phone. Due to the demanding schedules (including spring advisement) of administrators and faculty members phone interviews were difficult to accomplish. Overall, the responses to the survey questions were understandable with no clarifications needed. Only two respondents made revisions in their debriefing e-mails. The four respondents who had not replied to the debriefing e-mails were sent one last reminder with a deadline to respond by the end of the next business day on a specific date (Appendix F). Because of the difficulty and minimum responses to the follow-up interviews conducted by debriefing emails as a result of the lack of the aforementioned phone interviews, the acquisition of richer data could not be achieved.

One issue that emerged from the execution of the study was the challenge of getting the needed information. The first set of invitational e-mails that were sent via the SurveyMonkey website portal may have been interpreted by recipients as spam or junk mail and were ignored. This interpretation by recipients may have resulted in only one response and may have technology implications for the generic appearance of the invitational e-mails' subject lines and text when they were sent out from the SurveyMonkey website. Because of the minimal response to the first invitational e-mail, a change in procedures request was submitted to the Walden University IRB. Approval was granted for the chair of my dissertation committee to send out invitational e-mails to explain the purpose of the study to prospective participants at the three HBCUs. I also sent out several reminder e-mails with the open-ended survey link by using my Walden e-mail account which resulted in an improved response rate, 16 responses. Because of the

difficulty in obtaining responses resulted in the small sample of 16 responses, it has implications that the results may be less useful to other institutions.

Another issue was the low number of responses in the comment section. Several respondents wrote only one to two lines or one to two-word responses such as N/A or No without elaboration for the open-ended questions. The final outcomes of this study may have been affected because several of the respondents did not give as detailed responses as desired. In spite of these limits, a range of responses where noted and some insights were found in them.

Recommendations

A more comprehensive qualitative comparative case study is recommended that would include direct (in-person) interviews. Because of the difficulty in getting selected HBCU IRBs to acknowledge receipt of IRB applications and to process and approve applications, it is recommended that a study should be conducted that has a better geographical representation of HBCUs. For example, there are 107 HBCUs (List of HBCUs by State, 2015) in the United States. HBCUs should represent the Eastern, Southern, and Midwestern sections of the United States, including the Virgin Islands in a future multiple case study.

The use of incentives such as gift cards is recommended for future case studies at HBCUs because of the difficulty in getting an increased number of administrators and faculty members to respond. I believe more individuals would have responded if there had been some incentives in place for them despite their busy schedules. I sense that HBCU administrators and faculty members are skeptical of online surveys and direct (in-person) interviews may generate richer case study data.

Because of the time constraints for this study, another recommendation for a future study is to collect detailed data about the technology infrastructures at each sampled HBCU. A new data collection instrument could be developed that includes questions that address new technology, including software applications, and social media use at each HBCU. Specific questions directed at CIOs' involvement with technology deployment of online courses should be included in this instrument. A longer timeframe for conducting the study (up to one year) may be more conducive to this type of qualitative comparative case study that will provide more "rich" data that will affect the final outcomes.

Because the expansion of technology deployment requires monetary investments, HBCUs should consider implementing the following strategies to improve technology deployment decision-making at their respective institutions: (a) cultivate African American fundraisers by introducing fundraising as a potential career to students who are interested in the success of HBCUs; (b) educate students about philanthropy and the importance of giving back financially to their institution at new student orientation; (c) initiate partnerships with community organizations, other HBCUs, other minority serving institutions, and majority institutions. Corporations, foundations, and other funders are favorable toward partnerships because they bring together common strengths and provide opportunities for creative and innovative thinking; (d) pay attention to the changing agendas of public and private funders and interpret the expectations of these agendas. Today's funders are looking for how HBCUs respond to and lead major trends in higher education, and (e) provide more leverage for faculty governance. Presidents and

administrators should involve faculty in institutional decision-making. Additional strategies to strengthen technology deployment decision-making at HBCUs include:

- Seek investments in fundraising and innovations to generate revenue.
- Use data as a baseline for making decisions. When data indicate a need for improvement, make modifications, and monitor performance over time.
- Revamp curricula to fulfil 21st Century needs while continuing to build on rich African American history and tradition.
- Increase the quality of senior-level leadership to enhance the institution financially, intellectually, and socially to the institutions.
- Develop consortia to provide strong academic programs and learning opportunities by using technology to contribute expertise; and (f) develop collective goals for the future of HBCUs and for African American communities provide leadership by infusing African American leadership into national conversations (Gasman, n.d.).

Although Gasman (n.d.) has provided strategies to improve technology Deployment decision-making mostly from a fiscal point of view, there are additional practical strategies that HBCUs can implement to expand technology deployment decision-making. These strategies coupled with Gasman's strategies provide a more comprehensive approach for university administrators to implement. If the following strategies are also implemented, they have the potential of improving technology deployment decision-making at HBCUs. The more strategies that HBCUs can implement, it also has the potential of expanding online courses and degree programs. As more online learning is added to the curriculum and it becomes more popular, it may influence

more faculty members to be interested in online professional development and course design. The strategies include the following:

- Include CIOs in technology deployment decision-making at all levels, especially for online curricula.
- Create permanent technology committees that include faculty department heads and other faculty members.
- Research potential funding to provide consistent incentives and release time for faculty to participate in technology deployment of online degree programs and courses.
- Administer annual needs assessments to students, faculty, and staff.
- Include a well-crafted commitment to the development of online degree programs and courses in mission statements and strategic plans.

The expansion of technology deployment decision-making may also include these strategies:

- Send CIOs, faculty, and administrators to technology conferences to obtain updated information on technology trends, advances, and forecasts.
- Invite students to participate in technology deployment decision-making meetings to obtain their perspectives on online degree programs and courses and how course offerings and online software can be improved.
- Send out online technology newsletters to faculty, staff, administrators, students, and external stakeholders to keep them apprised of the latest technology enhancements, degree programs, and course offerings on campus. Regular

communication with internal and external stakeholders will help to increase interest in the expansion and participation in online degree programs and courses.

- Create partnerships and activities with middle schools and high schools to generate interest in the college or university to increase enrollment opportunities that will increase future revenue for the expansion of technology deployment.

Finally, the challenges presented by interpreting the results in light of the framework provided by Donaldson's contingency theory suggest that a future study might be more strongly guided and interpreted such as Argyris's theories of organizational learning, including the problem of defensive routines in the face of organizational change.

Implications

The results of this study support positive social change, by supporting the success of HBCUs' expansion of online educational opportunities for African American students and other students who attend these institutions. Responses to the open-ended survey revealed the opportunity for more online courses for at least two of the HBCUs in this study for technology deployment of online courses and programs into the curriculum. Higher education that is more accessible by the expansion of online courses and programs will make these institutions more competitive and may help to increase enrollment which will result in increased revenue in a time of limited state and federal funding support. The expansion of online educational opportunities will also make higher education more attainable by offering more online programs and flexible schedules for both traditional and nontraditional students. Online learning will provide a means for African American students, in particular, to overcome their disenfranchisement in

American society (Payne, 2008) which may have a direct, positive effect on social change.

Public HBCUs are educating an equal or greater percentage of African American students than PWIs, but receive fewer dollars in tuition and fees. HBCUs receive less revenue in tuition and fees because states provide PWIs funding at higher rates is a symptom of institutional racism in higher education. At a time of reduced state funding, HBCUs cannot afford to depend on state funding alone. HBCUs need to diversify their sources of funding by engaging in fundraising, capital campaigns, and endowment building. The entire HBCU business model of providing low costs needs to be revamped. The presidents and the boards have to work together to know the detailed finances of the institutions to provide stability and growth (Top Strategic Issues Facing HBCUs, Now and into the Future, 2014).

This study has provided a sampling of the decision-making process for leaders and stakeholders. Further, this qualitative comparative case study may have an effect on improved mission and goal statements and strategic plans that include language that is inclusive of online learning courses and programs. Commitment to online learning will have a positive effect on the human and social conditions at HBCUs resulting in the development of more online courses and degree programs, especially in the STEM areas. Improved access to more online courses and degree programs at HBCUs will make a positive contribution to the improvement of human and social conditions that affect positive and social change.

Conclusion

This qualitative comparative case study has addressed decision-making on technology deployment for online courses and degree programs at historically Black institutions. The three HBCUs that were included in this study are faced with challenges to keep up with changing technologies to offer online courses and degree programs and the pressures of adequate enrollment. Reduced state budgets also present challenges that these institutions have to contend with. Diverse sources of funding may help to relieve the burden along with improved communication and cooperation between the presidents and the boards. These strategies may help to alleviate some of the financial challenges. These institutions cannot afford to operate in environments that are obsolete that result in becoming misfits that will evolve into poor performing organizations (Donaldson, 2001). Technology deployment of online courses and degree programs is a convenient and efficient way to deliver education to the masses. HBCUs have a perception of being only for African American students and at the same time, these institutions have to be competitive with other institutions concerning funding, marketing, and student success (Grummon, 2012). HBCU administrations have the challenge of assessing institutional and student needs, preserving their rich African American heritage, and at the same time be competitive by expanding their online courses and degree programs to all segments of society to survive.

References

Achim, M. I., Cabulea, L., Popa, M., & Mihalache, S. S. (2009). On the role of benchmarking in the higher education quality assessment. *Annales Universitatis apulensis Series Oeconomica, 11*(2), 850_853. Retrieved from http://ideas.repec.org/a/alu/journal/v2y2009illp27.html

Aggarwal, A. K., & Lynn, S. A. (2012. Using continuous improvement to enhance an online course. *Decision Sciences Journal of Innovative Education, 10*(1), 25_48.

Allen, F. (2013). *Advocates: HBCUs must adapt to teach 21st century students*. Retrieved from http://www.blackvoicenews.com/news-wire/r9067-advocates-hbcus-must-adapt-to...

Allen, I., & Seaman, J. (2003). Sizing the opportunity: *The quality and extent of online education in the United States, 2002_2003*. Needham, MA: Sloan.

Allison, G. T. (1971). *Essence of decision: Explaining the Cuban missile crisis*. Boston, MA: Little, Brown.

America, R. F. (2012). *Can HBCUs compete?* Retrieved from http://www/jbhe.com/2012/10/can-hbcus-complete/

Aoki, K., & Pogorszewski, D. (1998). Virtual university reference model: A guide to delivering education and support services to the distance learner. *Online Journal of Distance Learning Administration, 1*(3), 1_14.

Bagley, R. O. (2013). *Why we need more minority tech-entrepreneurs.* Retrieved from http://www.forbes.com/sites/rebecca/2013/11/D1/why-we-need-more-minority-tech-...

Barnett, B., Hoke, M., & Hirch, E. (2004). NCLB: Highly qualified teachers-The search for highly qualified teachers. *Phi Delta Kappa*. Retrieved from http://www.highbeam.com/doc/1G1-116362446.html

Beasley, R. (2013). *Essay on online learning strategies for black colleges*. Retrieved from http://www.insidehighered.com/views/2013/04/09/essay-online-learning-strategies-black-colleges

Beaudoin, M. (2003). Distance education leadership for the new century. *Online Journal of Distance Learning Administration, 6*(2). Retrieved from http://www.editlib.org.ezp.waldenlibrary.org/p/21298/print/

Becker, H. S. (1991). Generalizing from case studies. In E. Eisner & A. Peshkin (Eds.), *Qualitative inquiry in education: The continuing debate* (pp. 233-242) New York, NY: Teachers College Press.

Benneworth, P., & Arbo. P. (2006). *Understanding the regional contribution of higher education institutions: A literature review.* Paris, France: ONED/IMHE.

Benton, M. A., (2001). Challenges African American students face at predominantly White institutions. Retrieved from http://colostate.edu/Depts/SAHE/JOURNAL2/2001/Challenges.htm

Blair, K., & Madigan, D. (2000). Involving faculty in faculty development: A recursive model. *Society for Information Technology & Teacher Education International Conference,* 2000(1), 418_423.

Boyd, D., Goldhaber, D., Hamilton, L., & Wyckoff, J. (2007). The effect of certification and preparation on teacher quality. *The Future of Children, 17.* Retrieved from http://www.questia.com

Boyd, D., Grossman, P., Lankford, H., Loeb, S., & Wyckoff, J. (2006). How changes in entry requirements alter the teacher workforce and affect student achievement. *Education Finance and Policy, 1*(2), 176_216.

Bryman, A. (1988). *Quantity and quality in social research*. London, England: Unwin Hyman.

Buchanan, L., & O'Connell, A. (2006). A brief history of decision-making. *Harvard Business Review*. Retrieved from http//hbr.org/2006/01/a-brief-history-of-decision-making/ar/1

Buechner, J. C., Detweiler, R. A., Clark, M., & McCredie, J. (2005). What presidents want from CIOs-and vice versa? *Chronicle of Higher Education, 52*(16), B25_B27.

Buzzetto-More, N., & Sweat-Guy, R. (2006). Incorporating the hybrid learning model into minority education at a historically black university. *Journal of Information Technology Education, 5*, 153_164.

Center on Budget and Policy Priorities (2014). *Chart book: The Legacy of the Great Recession.* Retrieved from http://www.cbpp.org/cms/indes.cfm?fa=faview&id=3252

Cochran-Smith, M. (2004). Taking stock in 2004: Teacher education in dangerous times. *Journal of Teacher Education, 55*(1), 3.

College Scholarships, Colleges, and Online Degrees, 2014. *Historically Black colleges and universities.* Retrieved from http://www.college-scholarships.com/historically_black_colleges_universities.htm

Cortese, A. D. (2003). The critical role of higher education in creating a sustainable future. *Planning for Higher Education,* 31(3), 15_22.

Creswell, J. W. (2013). *Qualitative inquiry & research design: Choosing among five approaches* (3rd ed.). Thousand Oaks, CA: Sage Publications.

Davidson, F. (1996). *Principles of statistical data handling*. Thousand Oaks, CA: Sage Publications.

Dearstyne, B. W. (2006). Information program leaders in transition. *The Information Management Journal,* 44-50. Retrieved from http://www.thefreelibrary.com/CIOs:informationprogramleadersintransiton:chiefinformation...-a0184698623

Dillon, S. M., (1998). *Descriptive decision-making: Comparing theory with practice.* Unpublished manuscript. Department of Management Systems, University of Waikato, New Zealand. Retrieved from http://orsnz.org.nz/conf33/paper/p61.pdf

Dobni, C., & Luffman, G. (2003). Determining the scope and impact of market orientation profiles on strategy implementation and performance. *Strategic Management Journal, 24*(6), 577_585.

Donaldson, L. (2001). *The contingency theory of organizations*. SAGE Publications, Incorporated.

Donley, M. (2012). *Technology's influence on education*. Retrieved from http://source.southuniversitiy.edu/print-article.aspx?ContentID=76874

Durso, T. W. (2012). The changing face of the CIO. *University Business, 15*(8), 68-72.

Evans, A. L., Evans, V., & Evans, A. M. (2002). Historically Black Colleges and Universities (HBCUs). *Education, 123*(1), 3-16, 180.

Evans, R. (2011). First year composition: Teaching at private HBCUs. *HBCU Connect*. Retrieved from https://hbcuconnect.com/cgi-bin/forum.cgi?thread_id=17885

Ewell, P. T. (1989). Information for decision: What's the use? *New Directions for Institutional Research, 64*, 7_19.

Feldman, M. S., & March, J. G. Information in organizations as signal and symbol. *Administrative Science Quarterly 26*, 171_186.

Flowers, L., White, E., Raynor, J., & Bhattacharya, S. (2012*). African American Students' participation in online distance education in STEM disciplines: Implications for HBCUs.* Retrieved from http://sgo.sagepub.com/content/2/2/215824412443544 doi: 1177/2158244012443544

Foster, A. L. (2003). Playing catch-up. *The Chronicle of Higher Education*, A27.

Fowler, F. G. (2002). *Open-ended survey research methods* (3rd ed.). Thousand Oaks, CA: Sage Publications.

Freeman, R. (1984). The politics of stakeholders theory: Some future directions. *Business Ethics Quarterly*, *4*(4), 409_422.

Garcia, A. C., Standlee, A. I., Bechkoff, J., & Cui (2009). Ethnographic approaches to the Internet and computer-mediated communication. *Journal of Contemporary Ethnography*, *38*(1), 552_84.

Garrison, D. R., & Shale, D. (1987). Mapping the boundaries of distance education: Problems in defining the field. *The American Journal of Distance Education, 1*(1), 7_13.

Gasman, M. (n.d.). *The changing face of historically Black colleges and universities.*

Retrieved from http://www.gse.upenn.edu/pdf/cmsi/Changing_Face_HBCUs-pdf

George, A.L., & McKeown, T. J. (1985). Case studies and theories of organizational decision-making. *Advances in Information Processing in Organizations, 2*, 21_58.

Glaser, B. G. (2005). *The grounded theory perspective III: Theoretical coding*. Mill Valley, CA: Sociology Press.

Grummon, P. T. H. (2012). *Issues facing historically Black colleges and universities*. Retrieved from http://www.scup.org

Hammersley, M. (1992). *What's wrong with ethnography?* London, England: Routledge.

Hanna, D. E. (2003). Organizational models in higher education, past and future. In M. G. Moore & W. G. Anderson (Eds.), *Handbook of distance education* (pp. 67_78). Mahwah, NJ: Lawrence Erlbaum Associates.

Harper, R. (2008). Online learning in the United State Education System. In C. Bonk et al (Eds.), *Proceedings of World Conference on E-Learning in Corporate, Government, Healthcare, and Higher Education 2008*, 2691_2708.

Harris, H. S., & Martin, E. W. (2012).Student motivations for online classes. *International Journal for the Scholarship of Teaching & Learning, 6*(2), 1_8.

Harvey, L., & Green, D. (1993). Defining quality. *Assessment and Evaluation in Higher Education, 18*(1), 9-34.

Hawkins, B. (2013). College, connected. *Diverse Issues in Higher Education, 30*(4), 1_4.

HBCU College Listings. (2015). Retrieved from http://www.hbcuconnect.com/colleges

HBCU-Levers. (2012). *Seven HBCU strategies for survival and success.* Retrieved from http://-levers.blgspot.com/2012/07/hbcu-survival-and-success.html

Heck, R. H., Johnsrud, L. K., & Rosser, V. J. (2000). Administrative effectiveness in higher education: Improving assessment procedures. Research in higher education: Improving assessment procedures. *Research in higher education, 41*(6), 663_684.

Heick, T. (2012). *A primer: Three ways technology has changed education.* Retrieved from http://www.edudemic.com/a-primer-3-ways-technology-has-changed-education/

Holkeboer, R. (1993). *Right from the start: Managing your way to college success.* Belmont, CA: Wadsworth, Inc.

Howell, S. L, Williams, P. B., & Lindsay, N. K. (2003). Thirty-two trends affecting distance education: An informed foundation for strategic planning. *Online Journal of Distance Learning Administration, 6*(3), 1_19. Retrieved from http://westga.edu/-distance/ojdla/fall63/howell63html?ref=%C4%BOlKSex Shop.com

Inderbitzin, M., & Storrs, D. A. (2008). Mediating the conflict between transformative pedagogy and bureaucratic practice. *College Teaching, 56*(1), 47_52. Ingeno, L. (2013). Online programs at historically Black colleges are increasing modestly. *Inside Higher Ed*. Retrieved from http://www.highered.com

Ingeno, L. (2013). Online programs at historically Black colleges are increasing modestly. *Inside Higher Ed*. Retrieved from http://www.highered.com

Institute for Higher Education Policy (2010). A snapshot of African Americans in Higher Education. Retrieved from http://www.ihep.org/assets/files/publications/a-f/BLACK_HISTORY_MONTH-2010_MINT_BRIEF.pdf

James, N., & Busher, H. (2007). Ethical issues in online educational research: Protecting privacy, establishing authenticity in e-mail interviewing. *International Journal of Research & Method in Education, 30*(1), 101_113.

Jaschik, S. (2016, April 11). Study: Black colleges pay more to issue bonds than colleges in similar financial circumstances. *Inside Higher Ed*. Retrieved from https://www.insidehighered.com

Jonassen, D. H. (1992). *Application and limitations of hypertext technology for distance learning.* Paper presented at the Distance Learning Workshop, Armstrong Laboratory, San Antonio, TX.

Jones, N., & O'Shea, J. (2004). Challenging hierarchies: The impact of e-learning. *Higher Education, 48*, 379_395.

Jongbloed, B., Enders, J., & Salerno, C. (2008). *Higher Education, 56*(3), 303-324. doi: http://dx.doi.org/10.1007/s10734-008-9128-2

Joseph, L. (2007). *The adoption and diffusion of computing and Internet technologies in historically Black colleges and universities* (Doctoral dissertation). Retrieved from http://search.proquest.com.ezpwaldenlibrary.org/docview/304761/abstract/13CBCF3...

Keegan, D. (1986). *The foundations of distance education.* London, England: Croon Helm.

Kelderman, E. (2010). Black colleges see a need to improve their image. *Chronicle of Higher Education, 56*(39), 1_6.

Keller, G. (1983). Academic strategy: *The management revolution in American higher education.* Baltimore, MD: Johns Hopkins University Press.

Kezar, A. (2001). *Understanding and facilitating organizational change in the 21st century: Recent research and conceptualizations.* San Francisco: Jossey-Bass.

Kinuthia, W. (2005). Planning faculty development for successful implementation of web-based instruction. *Campus-Wide Information Systems, 22*(4), 189_200.

Kuenzi, J. J., (2008). Science, technology, engineering, and mathematics (STEM) education: Background, federal policy, and legislative action. *Congressional Research Service, Report for Congress*, Retrieved from http://www.fas.org/sgp/crs/misc/RL33434.pdf

Kurre, F. L., Ladd, L., Foster, M. F., Monahan, M. J., & Romano, D. (2012). The state of higher education in 2012. *Contemporary Issues in Education Research, 5*, 233_256.

Laserfiche. (2013). *The CIO perspective: Five ways the digitization of higher ed is turning IT into a business.* Retrieved from https://mail.google.com/mail?ui=2amp;ik=dc78243238&view=pt&search=inbo...

Lawrence-Lightfoot, S., & Hoffman Davis, I. (1997). *The art and science of portraiture.* San Francisco, CA: Jossey-Bass.

Lee, J. M., & Keys, S. W. (2013). *Repositioning HBCUs for the future*. Retrieved from http://www.aplu.org/document.doc?id=4943

Lerner, A. L. (1999). *A strategic planning primer for higher education*. Retrieved from http://fgcu.edu/Provost/files/Strategic_Planning_Primer.pdf

Levy, A., & Merry, U. (1986). *Organizational transformation: Approaches, strategies, theories*. New York, NY: Praeger.

Lincoln, Y. S, & Guba, E. G. (1985). *Naturalistic inquiry*. London: Sage Publications.

List of HBCUs by State. (2015). Retrieved from http:/www.hbcubuzz.com

Lomb, R. C., & Blowers, A. (1998). Teaching criminal justice through the social inquiry method. *Journal of Criminal Justice Education, 9*(1), 103_117.

Lorenzetti, J. (2005). Lessons learned about student issues in online learning. *Distance Education Report, 9*(6), 1_4.

Malveaux, J. (2013). Is there a war on HBCUs? *Essence, 44*(4), 118_123.

Marra, R.M., & Bogue, B. (2006). *A critical assessment of online open-ended survey tools*. Paper presented at the 2006 WEPAN Conference, WEPAN Women in Engineering Programs and Advocates Network, Pittsburgh, PA.

Matheos, K., & Curry, J. (2004). Online learning: Changes policies and practices. In *Occasional Papers in High Education Number 12,* Advances and Challenges in e-learning at Canadian Research Universities, Centre for Higher Education Research and Development, University of Manitoba.

Maxwell, J. A. (2013). *Qualitative research design: An interactive approach* (3rd ed.). Thousand Oaks, CA: Sage Publications.

McDade, S. A. (1987). *Higher education leadership: Enhancing skills through professional development programs* (Report No. 5). Washington, DC: Association for the Study of Higher Education.

McFarlane, D. A. (2011). A comparison of organizational structure and pedagogical approach: Online versus face. *Journal of Educators Online, 8*(1), 1_43. Retrieved

from http://ehis.ebscohost.com.ezp.waldenulibrary.org/ehost/detail?vid=7&sid:e2e948ed-5d93-4

McGinn, M. K. (2008). Researcher-participant relationships. In L. Given ((Ed.), *The SAGE encyclopedia of qualitative research methods* (pp. 767_71). Thousand Oaks, CA: Sage Publications.

McKenzie, B. & Bennett, E. (2004). *Making online work: Messages from the field.* Technology and Teacher Education Annual-2004. Atlanta, GA: Association for Advancement of Computing in Education.

McKenzie, B., Ozlan, B. & Layton, K. (2005). Distance leadership practices: What works in higher education. In G. Richards (Ed.). *Proceedings of World Conference on E-learning in Corporate, Government, Healthcare, and Higher Education,* 926_931. Chesapeake, VA: AACE.

Michaelidou, N., & Dibb, S. (2006). Using e-mail open-ended surveys for research: Good practice in tackling non-response. *Journal of Targeting, Measurement and Analysis for Marketing, 14*(4), 289_296. Retrieved from http://searchproquest.com/docview/236968977?accountid=14872

Middlehurst, R.l (1992). Quality: An organizing principle for higher education? *Higher Education Quarterly, 46*(1).

Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis: An expanded sourcebook* (2nd ed.). Thousand Oaks, CA: Sage Publications.

Miles, M. B., Huberman, A. M. & Saldana, J. (2014). *Qualitative data analysis: A Methods sourcebook* (3rd ed.). Thousand Oaks, CA: Sage Publications.

Minor J. T. (2004). Decision-making in historically Black colleges and universities: Defining the governance Context. *The Journal of Negro Education, 73*(1), 40_52.

Mitchell, R. L. G. (2009). Online education and organizational change. *Community College Review, 37*(1), 81_101.

Moloney, J. F. (2010). Scaling online education: increasing access to higher education. *Journal of Asynchronous Learning Networks, 14*(1), 55_70. Retrieved from http://www.editlib.org/p/53523

Moore, B. (2008). *Distance education: The readiness of the nation's historically Black colleges and universities* (Doctoral dissertation). Retrieved from http://search.proquest.com.ezp.waldenulibrary.org/docview/3043830001/abstract/13D4DF...

Myers, S. (2000). *HBCU technology assessment study*. U. S. Department of Commerce, National Telecommunications and Information Administration, Technology Opportunities Program. Retrieved from http://www.ntia.doc.gov/files/ntia/publications/nafeo.pdf

Nicholas, D. B., Lach, L., King, G., King, G., Schott, M., Boydell, K., Sawatzky, R., Resman, J., Schippel, E., & Young, N. L. (2010). Contrasting internet and face-to-face focus groups for children with chronic health conditions: Outcomes and participant experiences. *International Journal of Qualitative Methods, 9*(1), 105_121.

Nworie, B., Nworie, J., & Mintah, J. (2010). Does the digital divide still exist: Technology access and minorities in higher education? In *Proceedings of World*

Conference on Educational Multimedia, Hypermedia and Telecommunications 2010. Chesapeake, VA: AACE. Retrieved from http://www.editlib.org/p/34755

Owens, E., Shelton, A., Bloom, C., & Cavil, J. (2012). The significance of HBCUs to the production of STEM graduates: Answering the call. *The Journal of Educational Foundations, 26*(3_4), 33_47.

Parsad, B., & Lewis, L. (2008). *Distance Education at Degree-Granting Postsecondary Institutions: 2006-07* (NCES 2009-044). Washington, DC: National Center for Education Statistics, Institute of Education Sciences, U. S. Department of Education. Retrieved from http://nces.ed.gov/pubs2009/2009044.pdf

Patton, M. Q. (1997). *Utilization-focused evaluation: The new century text* (3rd ed.). Thousand Oaks, CA: Sage Publications.

Patton, M. Q. (2002). *Qualitative research & evaluation methods* (3rd ed.). Thousand Oaks, CA: Sage Publications.

Payne, L. (2008, August 5). House issues apology for slavery. *McClatchy-Tribune News Service*, p. 1.r

Perraton, H. (1988). A theory for distance education. In D. Stewart, D. Keegan, & B. Holmberg (Ed.), *Distance education: International perspectives.* New York, NY: Routledge.

Pinnegar, S., & Daynes, J. G. (2007). Locating narrative inquiry historically: Thematics in the turn to narrative. In D. J. Clandinin (Ed.), *The Sage handbook of narrative inquiry: Mapping a methodology*, (pp.3_34). Thousand Oaks, CA: Sage Publications.

Price, P., & Oswald, P. (2006). *Research methods by dummies*. Retrieved from

http://psych.csufresno.edu/psy144/Content/Measurement/validity.html

Proulx, C. (2012). *Five ways technology will impact higher ed in 2013*. Retrieved from http://www.forbes.com/sites/groupthink/2012/11/5-2162-53dhnology-2ill-impact-higher-...

Ragin, C. C. (1987). *The comparative method: Moving beyond qualitative and quantitative strategies.* Berkeley, CA: University of California Press.

Rea, L. M., & Parker (1997). *Designing and conducting open-ended survey research: A Comprehensive guide*. San Francisco, CA: Jossey Bass Publishers.

Reigeluth, C. M. (1999). *Instructional-design theories and models: A new paradigm of instructional theory: Volume II; A paradigm of instructional theory*. Mahwah, NJ: Lawrence Erlbaum.

Researchware. (2014). HyperRESEARCH in a nutshell. Retrieved from http://www.researchware.com

Roach, R. (2008). Making strides: HBCUs seek progress on information technology resources. *Diverse Issues in Higher Education, 25*(2), 21_23. Retrieved from http://search.proquest.com/docview/194190654?accountid=14872

Roschelle, J. M., Pea, R. D., Hoadley, C. M., Gordin, D. N., & Means, B. M. (2000). Changing how and what children learn in school with computer-based technology. *Children and Computer Technology, 10*(2), 76_101.

Sayers, K. W. (2006). Information and inattentiveness in higher education planning. *College and University, 81*(3), 45_47, 49_59. Retrieved from http://search.proquest.com/docview/225411730?accountid=17872

Schaffhauser, D. (2013). *While CIOs may sit at senior level, service gaps still remain.* Retrieved from http://campustechnology.com/Article/2013/07/pe/Whilel-CIOs-may-Sit-at-Senior-Level-Se...

Schwandt, T. A. (2001). *Dictionary of qualitative inquiry.* Thousand Oaks, CA: Sage Publications.

Seaman, J. (2009). *Online learning as a strategic asset. Volume II: The paradox of faculty voices-views and experiences with online learning*. Retrieved from http://www.eric.ed.gov/ERICWebPortal/Search/detaillmini.jsp?nfpb=true$_&ERICExtSear...

Senge, P. (1990). *The fifth discipline. The art and practice of the learning organization.* New York: Doubleday/Currency.

Seyranian, V. (2009). Contingency theories of leadership. *Encyclopedia of group Processes & Intergoup Relations*. In J. M. Levine & M. A. Hogg (Eds). Thousand Oaks, CA: Sage Publications, 2009, 152.

Sherry, L. (1995). Issues in distance learning. *International Journal of Educational Telecommunications, 1*(4), 337_365.

Smith, R. (2011). HBCUs must embrace online education. *Diverse: Issues in Higher Education, 28*(3), 25.

Strauss, A. (1987). *Qualitative analysis for social scientists*. Cambridge, England: Cambridge University Press.

Stuart, R. (2010). Getting connected. *Diverse Issues in Higher Education, 24*(3), 13_14.

Stuart, R. (2012). A different world. *Diverse: Issues in Higher Education, 29*(15), 2_5.

Stuart, R., & Yep, D. (2012). Open-ended survey: Nearly one in four HBCUs offer full, blended online degree programs. *Diverse: Issues in Higher Education, 29*(15), 16.

Sturgis, I. (2012). The online frontier. *Diverse: Issues in Higher Education 29*(3), 16_19.

Tang, S. F., & Hussin, S. (2011). Quality in higher education: A variety of stakeholder perspectives. *International Journal of Social Science and Humanity, 1*(2), 126-n/a. doi: http://dx/doi/.org/10.7763/IJSSH, 2011.V1.21

Thor, L. (2013). Technology will make higher education institutions more in-tune with students in a decade. *Commodization & Competition*. Retrieved from http://www.evolllution.com/opinions/technology-higher-education-institutions-in-tune-students-decade

Tingling, & Brydon (2010). *Is decision-based evidence making necessarily bad? MIT Sloan Management Review.* Retrieved from http;//sloanreview.mit.edu/article/is-decision-based-evidence-making-necessarily-bad/?us…

TMC News (2014). *Impact of technology on education*. Retrieved from http://tmcnet.com/usubmit/2014/01/13/7617945.htm

Tobin, G. A., & Begley, C. M. (2004). Methodological rigor within a qualitative framework. *Journal of Advanced Nursing, 48*(4), 388-396.

Tobin, T. T. (2004). Best practices for administrative evaluation of online faculty. Online *Journal of Distance Learning Administration, 6*(1). Retrieved from http://www.editlib.org.ezp.waldenulibrary.org/p/21298/print/

Top Strategic Issues Facing HBCUs, Now and into the Future (2014). *Association of Governing Boards of Universities and Colleges.* Retrieved from http://www.agb.org

Vandervoort, L. G., Amrein-Beardsley, A., & Berliner, D. C. (2004). Students of national board certified teachers outperform peers on national test. *Education Policy Analysis Archives, 12*(46). Retrieved from http://epaa.asu.edu/epaa/v12n46/

Walden University. (2014). 2014-2015 Walden University Catalog (September 2014) Walden University: Vision, mission, and goals. Retrieved from http://catalog.waldenu.edu/content.php?catoid=106&navoid=27620&hl=%22social+change...

Walker, M. (2010). HBCUsOnline.com conveying the black college experience to distance learning. *Diverse: Issues in Higher Education, 27*(18), 30_32.

Wang, Q. (2006). Quality assurance: Best practices for assessing online programs. *International Journal on E-learning, 5*(2), 265_274. Retrieved from http://www.editlib.org/p/560

Weiss, R. S. (1994). *Learning from strangers: The art and method of qualitative interviewing.* New York, NY: Free Press.

Wolcott, H. F. (1990). *Writing up qualitative research*. Newbury Park, CA: Sage Publications.

Yin, R. K. (2009). *Case study research: Design and methods* (4th ed.). Thousand Oaks, CA: Sage Publications.

Appendix A: Invitation Letter/Implied Consent

Greetings University Administrator or Faculty Member:

My name is Shirley McClellan, and I am a doctoral student at Walden University, as well as a Director of Educational Talent Search at Fort Valley State University. I am conducting an IRB-approved research study on decision-making on technology deployment at historically Black institutions for my dissertation. This topic was selected because Historically Black Colleges and Universities (HBCUs) have struggled to plan appropriately to keep up with technological innovations to offer competitive online courses and degree programs for African American and other students who attend these institutions. If you are currently a high ranking administrator or faculty member, please consider participating in this study.

The purpose of this study is to collect information on how decisions are made to incorporate online programs into the curriculum at HBCUs. Insights from this study should assist HBCU administrators to support faculty with technology deployment, thus addressing the technology gap for African American students.

The potential benefits of this study are improved administrative procedures and decision-making in supporting development for integration of online or distance learning programs in the curriculum. Additional benefits include a better understanding of why HBCU faculty needs to be high priority in technology deployment to help close the widening technology gap for African American students, as well as improved communication between faculty and academic administrators.

If you agree to participate, your obligations will be low. You will complete a short anonymous open-ended survey via the Internet that will require 20 to 30 minutes of your time, and will be returned to me via SurveyMonkey, an online data collection service. **If you complete an open-ended survey, your response will be returned to me anonymously unless you agree to a follow-up interview for clarification of responses. If you agree to the follow-up interview, there will be a place to provide contact information at the end of the open-ended survey**. Your identity will be kept confidential, and will be used only to compile subfolders of participant profiles by using pseudonyms. Your name will not be connected to your interview responses, but I will create codes for each response to maintain confidentiality. Audio recordings of the interviews will be destroyed after they are transcribed. The follow-up interview should take no longer than 30 minutes.

This study involves little or no risk and does not provide compensation. Completing this open-ended survey is voluntary. You may skip questions, and can exit any section of the research at any time. **If you click on the link below to participate in the open-ended survey, it will be considered as implied informed consent.** You may keep a copy of this invitation letter/implied informed consent for your records. If you have questions about your rights as a participant please contact Dr. Leilani Endicott, Chair, Walden University Institutional Review Board at irb@waldenu.edu. Please feel free to contact me or the Chairperson of my dissertation committee about the research at the telephone numbers and e-mail addresses below. The following is the link to the open-ended survey:

_____

Begin Open-ended survey Thank you for your consideration and time!

Sincerely,

Shirley M. McClellan, B.S., M.A., Ph.D. Candidate in Education at Walden University

If you would like to contact my Chairperson, his contact information is the following:

Dr. Kurt W. Schoch
Research and Residencies
The Richard W. Riley College of Education and Leadership
Walden University
100 Washington Avenue South, Suite 900
Minneapolis, MN 55401

Thanks again for your participation and for advancing research!

Appendix B: Invitation Letter from Dissertation Chair

Dr. _____:

I am writing to you as the dissertation chair for Shirley McClellan, a PhD student in Higher Education at Walden University. Ms. McClellan's dissertation is titled Decision-making on Technology Deployment at Historically Black Institutions; the purpose of her study is to obtain insight into how decisions are made on technology deployment to incorporate online programs at HBCUs. Insights from this study should assist HBCU administrators in supporting faculty with technology deployment, thus addressing the technology gap for African American students. The potential benefits of this study are improved administrative procedures and decision-making in supporting development for integration of online or distance learning programs in the curriculum.
You have been contacted as someone who might have insights into this process and therefore could provide information that will be very helpful in answering the research questions for this study.

If you agree to participate, you will complete a short, anonymous open-ended survey via the Internet that will require 20 to 30 minutes of your time, and will be returned via Open-ended SurveyMondey, an online data collection service. If you complete an open-ended survey, your responses will be returned anonymously unless to agree to a follow-up interview for clarification of responses. If you agree to the follow-up interview, there will be a place to provide contact information at the end of the open-ended survey. Your identity will be kept confidential, and will be used only to compile subfolders of participant profiles by using pseudonyms. Your name will not be connected to you interview responses, but I will create codes for each response to maintain confidentiality. Audio recordings of the interviews will be destroyed after they are transcribed. The follow-up interview should take no longer than 30 minutes.

On Ms. McClellan's behalf, I encourage you to respond affirmatively to her request for your participation. As noted, the responses she receives have the potential to provide valuable insights and information to improve administrative processes and decision-making in technology areas in HBCUs.
Please feel free to let me know if you have any questions.
Thank you for your consideration and time!

Kurt Schoch, EdD
Core Faculty and Dissertation Chair
Division of Higher Education & Adult Learning, Administration & Leadership
The Richard W. Riley College of Education and Leadership
Walden University
100 Washington Avenue South Suite 900
Minneapolis, MN 55401
Editor: Journal of Educational Research and Practice
2105 Baldrige Examiner

Appendix C: Data Collection Protocol

Data Collection Protocol

While participation in this open-ended survey is voluntary, your feedback is critical to make the results of this research timely and informative.

Purpose: To find out how decisions are made on technology deployment at Historically Black College and Universities.

Instructions: Please answer all questions and elaborate or comment on each question in complete sentences. **After the comments for question 14, you will find a request for a follow-up interview to clarify any of your responses. All responses will be kept strictly confidential.**

A. Campus Planning and Policies for Technology deployment

1. If a technology needs assessment study has been conducted at your institution, what is your perception of the value of the study?

Comments:_____
_____
_____
_____
_____
_____
_____
_____
_____
_____

2. What is your perception of the value of your institution's strategic plan for the development and use of information technology?

Comments:_____
_____
_____
_____
_____
_____
_____
_____
_____
_____

3. Describe the process for your institution's implementation of procedures for measuring progress and updating your strategic plan?

Comments:_____

4. What incentives are in place to encourage faculty or administrators to participate in technology deployment?

Comments:_____

5. Are course designs handled by teams, subject content experts, instructional designers, information technology experts, and/or evaluation personnel? How effective are the course designs?

Comments:_____

6. What professional development courses or seminars are provided for faculty members to transition from a traditional (face-to-face) classroom environment to an online environment?

Comments:_____

7. Please indicate whether faculty members are being compensated and/or provided with release time to develop online courses at your institution.

Comments:_____

8. Please describe your understanding of faculty members' interest in teaching online courses.

Comments:_____

9. To what extent do you believe online courses enhance or detract from the caring and nurturing environment that is characteristic of HBCUs?

Comments:_____

10. Who is responsible for making decisions for the integration of online programs into the curriculum?

Comments:_____

11. How is online learning included in the university's mission and goal statements?

Comments:_____

B. Organization, Access, and Connectivity Environment

12. If your institution is part of a state network system, what is the advantage of participation in this system?

Comments:_____
_____
_____
_____
_____
_____
_____
_____
_____
_____

13. If your campus is part of a state network system, what is the impact of networking with institutions outside of your campus for online learning purposes?

Comments:_____
_____
_____
_____
_____
_____
_____
_____
_____
_____

C. Technology Decision-Making Factors

14. To what extent do the following factors affect your institution's decisions on technology deployment in regard to college-level, credit-granting online course offerings? (Select one on each line.)

(c) Seeking to increase student enrollment
1) Not at all___ 2) Minor extent___ 3) Moderate extent___ 4) Major extent___

(d) Making more courses available
1) Not at all___ 2) Minor extent___ 3) Moderate extent___ 4) Major extent___

(e) Making more degree programs available
1) Not at all___ 2) Minor extent___ 3) Moderate extent___ 4) Major extent___

(f) Making more certificate programs available
1) Not at all___ 2) Minor extent___ 3) Moderate extent___ 4) Major extent___

(g) Meeting student demand for flexible schedules
1) Not at all___ 2) Minor extent___ 3) Moderate extent___ 4) Major extent___

(h) Providing access to college for students who otherwise would not have access (e.g., because of geographic, family, or work-related reasons)
1) Not at all___ 2) Minor extent___ 3)Moderate extent___ 4) Major extent___

(i) Responding to the needs of employers/business
1) Not at all___ 2) Minor extent___ 3) Moderate extent___ 4) Major extent___

h) Maximizing the use of existing college facilities
1) Not at all___ 2) Minor extent___ 3) Moderate extent___ 4) Major extent___

i) Meeting student demand for reduced seat time
1) Not at all___ 2) Minor extent___ 3) Moderate extent___ 4) Major extent___

j) Other factor (Specify)_____
(j) Not at all___ 2) Minor extent___ 3) Moderate extent___ 4) Major extent___

Comments:_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____
_____

Dear Participant:

I would appreciate the opportunity for a follow-up interview to clarify any responses you may have provided. If you are willing to participate in a follow-up interview, please complete the contact information below before submitting this open-ended survey. Thank you in advance for your participation in this research study.

Name: _____ Title: _____

E-mail Address: _____

Phone Number :___(_____) _____
area code

Appendix D: Universities A, C, and B Responses to Questions 14

University A responses to survey question 14 that address RQ1 were**:**

a. Seeking to increase student enrollment
1) Not at all___ 2) Minor extent_2__ 3) Moderate extent_1__ 4) Major extent_2__

b. Making more courses available
1) Not at all___ 2) Minor extent_2__ 3) Moderate extent_1__ 4) Major extent_2__

c. Making more degree programs available
1) Not at all___ 2) Minor extent_3__ 3) Moderate extent_1__ 4) Major extent_1__

d. Making more certificate programs available
1) Not at all___ 2) Minor extent_2__ 3) Moderate extent_1__ 4) Major extent_2__

e. Meeting student demand for flexible schedules
1) Not at all___ 2) Minor extent_1__ 3) Moderate extent_1__ 4) Major extent__3_

f. Providing access to college for students who otherwise would not have access (e.g., because of geographic, family, or work-related reasons)
1) Not at all___ 2) Minor extent_2__ 3)Moderate extent___ 4) Major extent__3_

g. Responding to the needs of employers/business
1) Not at all___ 2) Minor extent_2__ 3) Moderate extent_1__ 4) Major extent__2_

h. Maximizing the use of existing college facilities
1) Not at all___ 2) Minor extent_2__ 3) Moderate extent_1__ 4) Major extent__3_

i. Meeting student demand for reduced seat time
1) Not at all___ 2) Minor extent_2_ 3) Moderate extent_1__ 4) Major extent_2__

j. Other factor (Specify)_____
1) Not at all___ 2) Minor extent_1__ 3) Moderate extent__1_ 4) Major extent___

University C Responses to survey question 14 that address RQ1:

a. Seeking to increase student enrollment
2) Not at all___ 2) Minor extent___ 3) Moderate extent_1__ 4) Major extent_2__

b. Making more courses available
2) Not at all___ 2) Minor extent___ 3) Moderate extent_2__ 4) Major extent_1__

c. Making more degree programs available
2) Not at all___ 2) Minor extent_3__ 3) Moderate extent_1__ 4) Major extent_2__

d. Making more certificate programs available
2) Not at all___ 2) Minor extent_1__ 3) Moderate extent_2__ 4) Major extent___

e. Meeting student demand for flexible schedules
2) Not at all___ 2) Minor extent___ 3) Moderate extent_2__ 4) Major extent__1_

f. Providing access to college for students who otherwise would not have access (e.g., because of geographic, family, or work-related reasons)
2) Not at all___ 2) Minor extent___ 3)Moderate extent_2__ 4) Major extent__1_

g. Responding to the needs of employers/business
2) Not at all___ 2) Minor extent___ 3) Moderate extent_2__ 4) Major extent__1_

h. Maximizing the use of existing college facilities
1) Not at all___) Minor extent_2__ 3) Moderate extent___ 4) Major extent__1_

i. Meeting student demand for reduced seat time
1) Not at all___ 2) Minor extent_2_ 3) Moderate extent_1__ 4) Major extent_2__

j. Other factor (Specify)_____
2) Not at all___ 2) Minor extent___ 3) Moderate extent__1_ 4) Major extent__2_

University B Responses to survey question 14 that address RQ1:

a. Seeking to increase student enrollment
3) Not at all_1_ 2) Minor extent_3__ 3) Moderate extent_4__ 4) Major extent___

b. Making more courses available
3) Not at all_1__ 2) Minor extent_5__ 3) Moderate extent_1__ 4) Major extent_1__

c. Making more degree programs available
3) Not at all_2__ 2) Minor extent_5__ 3) Moderate extent___ 4) Major extent___

d. Making more certificate programs available
3) Not at all_3_ 2) Minor extent_4__ 3) Moderate extent_2__ 4) Major extent___

e. Meeting student demand for flexible schedules
3) Not at all_1__ 2) Minor extent_4__ 3) Moderate extent_1__ 4) Major extent__1_

f. Providing access to college for students who otherwise would not have access (e.g., because of geographic, family, or work-related reasons)
3) Not at all_1__ 2) Minor extent_3__ 3)Moderate extent_3__ 4) Major extent__1_

g. Responding to the needs of employers/business
3) Not at all_2__ 2) Minor extent_3__ 3) Moderate extent_3__ 4) Major extent__2_

h. Maximizing the use of existing college facilities
1) Not at all_2__ 2) Minor extent_5__ 3) Moderate extent_1__ 4) Major extent___

i. Meeting student demand for reduced seat time
1) Not at all_5__ 2) Minor extent_2_ 3) Moderate extent_1__ 4) Major extent_2__

j. Other factor (Specify)_____
k. Not at all_3__ 2) Minor extent_1__ 3) Moderate extent__1_ 4) Major extent___

Appendix E: Universities A, C, and B Higher Number of Responses

University A's responses to survey question 14 that address RQ1 had a larger number of responses for the following factors:

- Meeting student demand for flexible schedules-Major extent: 3
- Providing access to college for students who otherwise would not have access (e.g., because of geographic, family, or work-related reasons)-Major extent: 3
- Maximizing the use of existing college facilities-Major extent: 3

University C's responses to survey question 14 that address RQ1 had a larger number of responses for the following factors:

- Seeking to increase student enrollment-Major extent: 2
- Making more degree programs available-Minor extent: 3
- Maximizing the use of existing college facilities-Minor extent: 2
- Meeting student demand for reduced seat time-Minor extent: 2 and Major extent: 2

University B's responses to survey question 14 that address RQ1 had a larger number of responses for the following factors:

- Making more courses available-Minor extent: 5
- Making more degree programs available-Minor extent: 5
- Making more certificate programs available-Minor extent: 5
- Meeting student demand for flexible schedules-Minor extent: 4
- Maximizing the use of existing college facilities-Minor extent: 5

Appendix F: Table 3 Data Collection and Research Question Matrix

Table 3

Data Collection and Research Question Matrix

Data collection source	Research Question 1: How are decisions determined at HBCUs to integrate online learning programs into the curriculum?	Research Question 2: How do the individuals who make these decisions perceive online learning programs at HBCUs?
Open-ended survey Item Numbers-Administrators	Questions 3, 4, 6, 7, 10, 11, 14a, 14b, 14c, 14d, 14e, 14f, 14g, 14h, 14i, 14j	Questions 1, 2, 8, 9, 11, 12, 13
Open-ended survey Item Numbers-Faculty	Questions 4, 5, 6, 7, 10, 14a, 14b, 14c, 14d, 14e, 14f, 14g, 14h, 14i, 14j	Questions 1, 2, 8, 9, 12, 13
Interviews	Contact for interviews via phone were attempted at alternate times without success. Due to the demanding schedules (including spring advisement) of administrators and faculty, phone interviews were difficult to accomplish. Overall, the responses were understandable with no clarifications needed. Two (2) respondents made revisions in their debriefing e-mails.	N/A
Debriefing	Eleven (11) respondents agreed to be interviewed or debriefed. Seven (nearly 64%) actually responded to debriefing e-mails with their individual responses attached. Several reminders were forwarded to the respondents. Five (5) of the seven (7) respondents indicated that their original responses were accurate or no changes needed to be made. Two (2) respondents made	Questions 1 to 14

	changes to their responses. One respondent made revisions for responses to questions 9 and 10. Another respondent made revisions to questions 3, 6, 10, and 12. The remaining four (4) respondents who had not replied to the debriefing e-mails were sent one last reminder on October 27, 2015, with a deadline to respond by the end of the business day on October 28, 2015. They were informed that if they did not reply, the assumption would be made that their responses were acceptable and did not need any changes or revisions. No reply was received from the remaining four respondents.	
Additional Factors	N/A	N/A

Appendix G: Raw Data for Research Question 1

Research Question 1:

How are decisions determined at HBCUs to integrate online learning programs into the curriculum?

Survey Question 3: Describe the process for your institution's implementation of procedures for measuring progress and updating your strategic plan.

University C responses to survey question 3 that address RQ1 were**:** "the university has an Office of Strategic Planning and the director for that office provides annual updates on the strategic plan and the progress that has been made toward accomplishing goals and objectives . . .", "In the past, there were not sustainable metrics in place. A better process is needed . . .", and "Performance-based matrix and aligned with strategic plan. The plan is also aligned with University System General Assembly performance-based matrix."

University A responses to survey question 3 that address RQ1 were**:** "The Institutional Assessment would do this but we are revising our plan for January 2016," and "we have a new Chancellor who started in January of this year. He has just started engaging the University in developing a new 5 year strategic plan . . .".

University B responses to survey question 3 that address RQ1 were**:** "We will be conducting focus groups, listening tours, and mining the data in order to determine if we are meeting our bench marks," "sub committees are in charge of sections of the plan," and "a university wide committee consisting of faculty members, administrators, staff, and students is appointed by the president to oversee all this."

Survey Question 4: What incentives are in place to encourage faculty or administrators to participate in technology deployment?

University C responses to survey question 4 that address RQ1 were**: "**For my unit, we provide faculty with stipends to develop online courses. Once the course is fully developed and offered, faculty are provided a stipend to teach the course online . . .", technology use is an expectation. Faculty members are encouraged to use technology, technology devices and resources are provided to support technology deployment," and "For the most part incentives are rather inconsistent. There are methods that could be in place to encourage better participation but unfortunately much of this area is rather subjective . . .".

University A responses to survey question 4 that address RQ1 were**:** "We previously provided tablets as prizes for the first few faculty/staff that completed a certain online technical training. Due to the recent budget turmoil, we have been unable to provide the prizes," "no incentives," and "we use to have additional title 3 funds for faculty to increase the use of technology and innovative practices. "

University B responses to survey question 4 that address RQ1 were**:** "There are no incentives," "I do not know of anything," and "I'm only aware of intrinsic incentives: the joy of teaching with technology, seeing the joy students have in using it, etc."

Survey Question 6: What professional development course or seminars are provided for faculty members to transition from a traditional (face-to-face) classroom environment to an online environment?

University C responses to survey question 6 that address RQ1 were**:** "Each semester, my unit provides a number of workshops and seminars to assist faculty with transitioning to an online environment . . . ", "training through Blackboard, Distance Education office, Professional Development Office, the Office of E-Learning and professional development activities outside the university," and "the Office of Extended Studies does an outstanding job (considering they are understaffed and need plenty of the personnel mentioned in question 5) of providing online course professional development, . . . ".

University A responses to survey question 6 that address RQ1 were**:** "We have a Center for Education in Teaching and Learning (CETL) that conducts training about pedagogy and other tactics for online/face2face learners," "Center for Teaching and Learning has seminars and workshops, and "there are several CETL classes offered each semester to assist in this process. However, there is a current moratorium on the development and offering of most online classes. The university has decided that online classes are not compatible with our student population."

University B responses to survey question 6 that address RQ1 were**:** "We have monthly Professional Development (Brown Bag Luncheons) for faculty. They are conducted via Center for Teaching and Learning," "faculty members undergo the Quality Matters Training and it is a requirement that online instructors must be certified to teach an online course," and "Quality Matters certification required. Numerous opportunities for workshops and individual training. The online policy is limited in its enforcement."

Survey Question 7: Please indicate whether faculty members are being compensated and provided with release time to develop online courses at your institution.

University C responses to survey question 7 that address RQ1 were**:** "Faculty are compensated for developing and teaching online courses. Course release time can be negotiated with the department chair and dean; however this is not common on our campus at this time "there are some compensation structure in place for online course development," and

> At one time this was the impetus at the University (especially at the early stages of online curriculum building) from the University System-General Assembly (our statewide administrative body), as a more campus-wide directive. Currently, I believed this may occur for specific course development based on departmental need. However, in the age of "for profit versus brick and mortar, there is a massive need to encourage more and more development of online courses and programs . . .".

University A responses to survey question 7 that address RQ1 were**:** "No funds for compensation have been cut and redirected," "many years ago faculty were compensated but not now," and "No. As a faculty member who has designed two online courses, I am not aware of compensation or release time."

University B responses to survey question 7 that address RQ1 were**:** "Faculty members are not being compensated nor do they receive release time to develop online courses," "faculty members do not receive release time or extra compensation for the development of any type of course regardless of delivery method," and

> No compensation whatsoever for the course development. And other instructors take over many courses using the work of the instructor who developed the course. No intellectual property so the university is taking advantage of faculty members who care enough to develop interactive courses.

Question 10: Who is responsible to make decisions for the integration of online programs into the curriculum?

University C responses to survey question 10 that address RQ1 were**:** "This is a collaborative effort at our institution. The idea originates from the academic unit (faculty and department chairs) and then move through the College/School curriculum approval process . . .", "deans, department chairs, and faculty. Ultimately online programs have to go through the university system for approval and then to the University System General Assembly," and "the head of the Department of Extended Studies is responsible for the procurement of the delivery platform. The actual curriculum approval must be properly vetted through the following . . .".

University A responses to survey question 10 that address RQ1 were**: "**Provost and Chancellor," "the university administration," and "faculty and administration. We have secondary group which includes University System General Administration."

University B responses to survey question 10 that address RQ1 were**:**

"Currently is the VPAA," "vice president for academic affairs, deans, and department heads," " the new VPAA has usurped that decision-making authority from the 3 technology committees," "Departments, Deans, the Faculty Senate and the Provost are all involved," and "provost has the final say. Department Chair and Dean.

Survey Question 11: How is online learning included in the university's mission and goal statements?

University C responses to survey question 11 that address RQ1 were**: "**Online learning is not specifically addressed in the university's mission and goal statements. However, the issue of access for all students is part of the mission and 2020 strategic plan . . . ", "minimally," and "it is no longer included in such."

University B responses to survey question 11 that address RQ1 were**:** "It is not, "it is discussed under on the key goals-Academic Excellence," "online learning is not integral to the mission or goals of the university, "it is included indirectly as providing excellent educational opportunities to a diverse student population," and "it is not included in our mission."

Survey Question 14: To what extent do the following factors affect your institution's decisions on technology deployment regarding college-level, credit-granting online course offerings? (Select one on each line.)

University A responses to survey question 11 that address RQ1 were: "No strong language was used before, but it is my understanding that many changes are on the horizon,") "innovative practices and flexible learning lifestyle," "it was not there in the past," "it is no longer included in such," and "minimally."

Appendix H: Raw Data for Research Question 2

Research Question 2:

How do the individuals who make decisions perceive online learning programs at HBCUs?

Survey Question 1: If a technology needs assessment study has been conducted at your institution, what is your perception of the value of the study?

University C responses to survey question 1 that address RQ2 were**:**

A technology needs assessment was conducted last year for distance and online education. For my unit, the study provided valuable information or the hardware, software, and training needed to adequately faculty developing and delivering online instruction, "a needs assessment has been conducted. The assessment is aligned with the strategic plan of the university," and

> I have conducted several needs assessments at University C in 23+ years of service. In my opinion, each time the needs assessments were conducted they provided very valuable insight on the technology needs of the University at that time.

University A responses to survey question 1 that address RQ2 were**:**

> "We conduct needs assessments yearly, however, state funding is not always sufficient to fulfill the needs. Nonetheless, the assessments are valued," (b) "yes, very valuable, the study was conducted by University System General Assembly involving technology needs and usage. The study was valued because it was conducted across campuses but needs additional questions for our campus, and (d) "I am not aware of a technology needs assessments being completed."

University B responses to survey question 1 that address RQ2 were**:** "If one has been done I am not aware of it," "the needs assessment study was most helpful in setting our budget priority for the year," "no comprehensive technology needs assessment has been conducted," and "an internal self-assessment was performed and primarily highlighted areas of concern that IT previously identified but was looked as a good exercise with stakeholders to understand their needs were being considered."

Survey Question 2: What is your perception of the value of your institution's strategic plan for the development and use of informational technology?

University C responses to survey question 2 that address RQ*2* were**:** "Although the university has a solid strategic plan, I would like to see more emphasis on technology. There are references to integrating technology, however, there are no specific goals focused on acquiring and implementing technology" and "excellent! The plan is designed to address different levels of technology across the university."

University A responses to survey question 2 that address RQ2 were**:** "Our strategic plan expires this year. A new one is being created for the next 3-4 years which heavily involves the development and use of technology," and "we are in the process of changing our strategic plan so it has not been incorporated yet. The previous strategic plan had it included but not enough resources was directed towards it."

University B responses to survey question 2 that address RQ2 were**:** "The updated strategic plan has not been disseminated yet," "information

technology is very much the part of our strategic plan and more consideration is given to it, and "our strategic plan is still in preparation."

Survey Question 8: Please describe your understanding of faculty members' interest in teaching online courses.

University C responses to survey question 8 that address RQ2 were**:**

Faculty interest in developing and teaching online is very high at our institution. My unit works closely with faculty to provide financial support, training, and development, and resources for faculty teaching online. There is still a small population of faculty who are not interested in teaching online or in a hybrid format, and

(c) "It is extraordinarily high. Online learning is the often 'fully unexplored frontier' by many brick and mortar institutions involved in education."

University A responses to survey question 8 that address RQ2 were**:**

"Interest for faculty is high because they want to increase marketability of their program and flexibility for students," "many faculty are very interested in teaching online courses," and "I think there is high interest. However, our Provost has decided that online classes are not the best vehicle for our students, and we are moving away from them."

University B responses to survey question 8 that address RQ2 were**:**

"Our institution is divided, some instructors prefer only online instruction while others will not teach online. The current administration has eliminated all nonessential online offerings indefinitely," and "faculty members are very much interested in online courses, and "I'm not sure how faculty as a whole feel about

this. Our Provost has placed more of a focus on face-to-face courses because he feels freshmen coming in need this experience. They haven't yet developed the skills to allow them to be successful in an online course."

Survey Question 9: To what extent do you believe online courses enhance or detract from the caring and nurturing environment that is characteristic of HBCUs?

University C responses to survey question 9 that address RQ2 were**:**

"If an online course is properly designed and the faculty is enthusiastic about teaching online the caring and nurturing will not be lost," and "they do not. One cannot confuse the course dissemination methodology with plain old "bad instruction."

University A responses to survey question 9 that address RQ2 were**:** "I believe online courses can still help to create a caring and nurturing environment by the behavior of the instructor. An online course should not impede the ability to show compassions," and "I think they can enhance when done correctly, however, we did not require faculty to demonstrate competence or attend a workshop in order to teach online courses."

University B responses to survey question 9 that address RQ2 were**:**

Due to the changing environment in higher education, technology, specifically online courses is important. There are very strong arguments on both sides of the issue. With that mind, HBCUs historically are nurturing environments and such considerations should not be lost due to technology, "most students and two-thirds faculty feel online courses detract from student learning and the hand-holding environment of F2F classes. The new VPAA has prohibited freshmen from taking online courses," and "online courses work very well for serious and good students but it is not for everyone. It works

better in upper division courses and certainly not for under prepared students. Also it does not work well for mathematics."

Survey Question 11: How is online learning included in the university's mission and goal statements? *Note: This inquiry overlaps for Research Questions 1 and 2.

University C responses to survey question 11 that address RQ2 were**:** Online learning is not specifically addressed in the university's mission and goal statements. However, the issue of access for all students is part of the mission and 2020 strategic plan. The chancellor and provost are very supportive of online learning and ensure resources are available to grow online courses and programs and "it is embedded to address the diverse needs of students.

University A responses to survey question 11 that address RQ2 were**:** "No strong language was used before, but it is my understanding that many changes are on the horizon," and "it is no longer included in such."

University B responses to survey question 11 that address RQ2 were**:** "Online learning is not integral to the mission or goals of the university," "it is included indirectly as providing excellent educational opportunities to a diverse student population," and "it is not included in our mission."

Survey Question 12: If your institution is part of a state network system what is the advantage of participation in this system?

University C responses to survey question 12 that address RQ2 were**:** We are a constituent member of the University C 14-campus system. There are a number of advantages to being a part of a higher education system, including reduced pricing for licensing of our Blackboard LMS and other applications to support online learning. . . . .,

and “resources, sharing, collaboration, teamwork, partnerships, community accountability, commonness of educational experiences (for the student), value of the degree(s), and protection.”

University A responses to survey question 12 that address RQ2 were**:** “the “Cheaper resources. Most pricing for licensing is negotiated at the state level, “advantage is online courses through the portal system that is open for any student, and “students can take courses at different institutions within the system at the same price as their home institution. Share of resources.”

University B responses to survey question 12 that address RQ2 were**:** “We are not part of a state network system,” “not applicable,” and “I’m not sure if we’re part of a state network system.”

Survey Question 13: If your campus is part of a state network system, what is the impact of networking with institutions outside of your campus for online learning purposes?

University C responses to survey question 13 that address RQ2 were**:** “Having the opportunity to network with colleagues in the University System is very beneficial. We support each other in various areas, such as policies, procedures, course offerings training materials and faculty collaboration,” “excellent coordination between campuses via University System General Assembly,” and “See answer to question 12. Reiterated as: Resources, sharing, collaboration, teamwork, partnerships, community accountability, commonness of educational experiences (for the student, value of the degree(s), and protection.”

University A responses to survey question 13 that address RQ2 were**:** "Non-state institutions and private colleges have more flexibility with the way they spend money and are not required to meet specific curriculum criteria, therefore allowing more flexibility," and "it is important in accessing additional resources," and "share resources and flexibility for students."

University B responses to survey question 13 that address RQ2 were**:** "Not applicable," and "we have not done this."