

Comparative Study of Perceived Barriers to Faculty Participation in Distance Education

At a Four-Year University

Elizabeth Bailey

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Approved:

Dr. Jeff Allen, Major Professor

Dr. Robert Insley, Minor Professor

Dr. Jerry L. Wircenski, Committee Member

Dr. Rose Baker, Committee Member

Dr. Mark Wardell, Dean, Toulouse Graduate
School

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The purpose of this Bailey study was to identify perceived barriers of faculty participation in distance education courses in a four-year university and identify the differences in perceived barriers between the Hebert 2003 study and this Bailey study. The literature review covers numerous studies and articles written within the last 10 years that are related to a variety of barriers perceived by faculty and administrators.

There were no statistically significant relationships found between faculty demographics including gender, age, position at the university, tenure status, and number of years faculty have taught in post-secondary education. There were no statistically significant relationships found between the top administrator-ranked motivators and corresponding faculty-ranked motivators, nor between the top administrator-ranked inhibitors and the corresponding faculty-ranked inhibitors. Out of the top four non-participating, faculty-ranked barriers, three were found to have statistically significant relationships with the corresponding administrator-ranked barriers. Statistically significant relationships were found between the faculty-ranked motivators and corresponding administrator identified motivators and between the top ranked barriers identified by non-participating faculty and administrators in Hebert's study compared to non-participating faculty-ranked and administrator-ranked barriers identified in this study.

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Comparative Study of Perceived Barriers to Faculty Participation in Distance Education At a Four-Year University

INTRODUCTION

This Bailey study was intended to collect recent research to compare the results of the 2003 study completed by Janet Gwen Hebert's study called *Perceived barriers to faculty participation in distance education at a four-year university* for her dissertation for her degree of Doctor of Philosophy for the University of North Texas (2003, May). Using the same questionnaire used by Hebert (2003), information of faculty-perceived barriers to faculty participation in distance education at a four-year university based on responses was sought.

Continuing with the definitions set by Hebert (2003), for this Bailey study, faculty are defined as full-time professors who teach at the University of North Texas (UNT). Deans and chairpersons of different colleges within UNT are considered administrators. Distance learning is "learning by any method, and through the use of any media, in which the students are physically separated from the faculty" (Hebert, p. 1).

Background

As students are moving to online education, all universities must offer online courses to support the prediction of need and to support growth of enrollment to sustain the university (Allen & Seaman, 2004). As universities continue to provide excellent educational services to students seeking a higher education, universities must ensure they are meeting the needs of students seeking positions once the students have reached their educational goals. Part of this service is providing education in way that reduces distance and time constraints for students, such as distance education, which

allows more students to have access and make time in their lives for career and personal development. The number of students seeking distance education has increased from previous years by 21 percent, bringing the number of students desiring distance learning options to more than 5.6 million nationwide (Allen & Seaman, 2010).

As an example, the UNT Office of Institutional Research & Effectiveness (2011) shows that in 2010 fall term alone, 11,030 students, or thirty-two percent of all UNT students, were enrolled in distance education courses. This percentage is an increase from the previous year (University of North Texas Center for Learning Enhancement, Assessment, and Redesign, 2011). Supporting this increased need, in 2011 UNT offered more than 1,000 courses online to support the adult student (University of North Texas Center for Learning Enhancement, Assessment, and Redesign, 2011).

Many universities are promoting online learning as a major revenue channel, causing all universities to explore this funding avenue (Byrd & Mixon, 2012). As of 2012, even smaller colleges and universities have built up their online enrollment (Allen & Seaman, 2013). The University of North Texas, as an example, is in competition with a number of other universities currently offering online programs to students. Colorado Technical University offers students information on their online program and reference a PEW Research Center fact that “89% of all four-year public colleges and universities now offer online courses” (Colorado Technical University, n.d.). According to one study, the majority of all schools believe that online courses are “critical to their long-term strategy” (Allen & Seaman, 2004). Overall, universities are increasing their offering of online degrees, such as University of Texas at Austin that offers 26 different degrees online (University of Texas at Austin, n.d.). Sustainable growth for universities requires

active faculty participants. Identifying remaining barriers to active faculty participation is key.

It is imperative that universities, including the University of North Texas, support the needs of students to ensure a continued satisfactory enrollment rate and a continued presence in the national and international academic environments. Both faculty and administrators have a vested interest, through the furthering of their employment, in seeing the level of success achieved. Identification of perceived barriers can assist universities in potentially resolving negative perceptions and improving faculty participation in distance education (Hebert, 2003). With the need for distance education growing, universities need to better understand the perceived barriers that may discourage faculty from participating in distance education. Identification of the differences between faculty barrier perceptions and administrator's perceived barriers to faculty participation in distance education is also needed. With this understanding, programs, which offer supporting factors to decrease faculty concerns about adopting distance education, can be put into place.

This Bailey study being conducted approximately 10 years following Hebert's study, allows faculty, deans, and chairpersons to realize the changes in distance education are apparent between the 2003 Hebert study and this one. While several studies (Berge, 2002; Chen, 2009; Cook, Ley, Crawford, & Warner, 2009; Dooley & Magill, 2002; Koenig, 2010; Maguire, 2005; Shea, 2007) identify barriers, this Bailey study will provide a view into the similarities among other studies and result in a list of those barriers that are still applicable at the University of North Texas.

Theoretical Framework

With an increasing number of students wanting to complete coursework in nontraditional instructional methods, learn at odd hours, and reduce travel to acquire learning, more universities are promoting distance education programs. In addition, with more and more entities offering distance education, there is an increased sense of competition between universities that offer distance education (Hanna, 1998; Deming, Goldin, Katz & Yuchtman, 2015). As a result, universities should be interested in understanding perceived barriers to success and identifying ways to mitigate risks and barriers.

UNT offers distance learning programs to students in the Dallas-Ft. Worth area and other areas due to: “an increasingly congested highway system within the DFW Metroplex, partnership opportunities, and demand for graduates in certain fields” (University of North Texas, 2005, p. 10). These reasons align with the reasons other universities target distance education learners as well (Allen & Seaman, 2010). UNT has put into place many initiatives to support students; and the Center for Distributed Learning offers training and an evaluation process for faculty who are teaching online (University of North Texas, 2005, p. 20.). Interestingly, there is no commentary on the support or changes to the organization since the 2003 study in the Institutional Report on Distance Education and Off-Campus Instruction prepared by UNT.

In her study, Hebert (2003) identified the top four motivational factors ranked by faculty. Those motivating factors are listed below and include the survey question number that supports the factor.

1. Ability to reach new audiences that cannot attend classes on campus (#30)

2. Personal motivation to use technology (#1)
3. Opportunity to develop new ideas (#14)
4. Intellectual challenge (#19)

Hebert (2003) identified the top four motivational factors ranked by administrators.

Those motivating factors are listed below and include the survey question number that supports the factor.

1. Increase in salary (#9)
2. Monetary support for participation (e.g. stipend and overload) (#12)
3. Release time (#23)
4. Credit toward promotion and tenure (#22)

As used by Berge (2002) and Hebert (2003), there are top perceived barriers identified by faculty. Those inhibiting factors are listed below and include the survey question number that supports the factor.

1. Concern about quality of courses (#10)
2. Concern about faculty workload (#1)
3. Lack of release time (#5)
4. Lack of monetary support for participation (e.g., stipend, overload) (#15)

There are also the top four perceived barriers ranked by administrators. Those inhibiting factors are listed below and include the survey question number that supports the factor.

1. Concern about faculty workload (#1)
2. Lack of release time (#5)
3. Lack of credit toward tenure and promotion (#19)

4. Lack of monetary support for participation (e.g., stipend, overload) (#15)

Comparison of these ranked barriers with the previous study against the ranked barriers found in this Bailey study will allow the determination of statistical differences between the two studies. This comparison will also provide the university leadership with ideas of incentives they should promote and barriers they should work to remove.

Population and Sample

The questionnaire was distributed to all full-time faculty, deans, and chairpersons at a single, four-year Texas university, specifically University of North Texas, which is comprised of 12 colleges. There was no homogeneity between the first study and this one. While the population in the first study compared to the second study was not exactly the same, previous studies have not shown differences among faculty perceptions based on age, gender, and tenure status. As such, retaining the UNT population as a convenient sampling provides easy access to the population subjects and applicability of the research results to other similar four-year universities. The research population includes more than 1,000 instructional faculty, (2014, University of North Texas Center for Learning Enhancement, Assessment, and Redesign), 14 Deans (2014, University of North Texas Office of the Provost Deans and Associate Deans), and 57 chairpersons (2014, University of North Texas Office of the Provost Chairs). All complete questionnaires submitted by participants are considered part of the sample and used within the data analysis. To ensure a clear comparison between Hebert's study and this one, this Bailey study stays within the parameters of Hebert's original study: employees of UNT with the title of instructor, lecturer, modified service, principal lecturer, and senior lecturer are not invited to participate in the study.

Delimitations and Limitations

The study is conducted with the assumption that student needs require universities to offer distance education. Previous research defined participation barriers of faulty training, administrators, rewards and compensation, and faculty demographics (Betts, 1998; Hebert, 2003).

The original study used paper-based survey instrumentation, while this Bailey study uses the same questions and design within an HTML version of the instrument within UNT's Qualtrics survey tool. The instrument was made available to participants free of charge and online through a web site. IP addresses from respondents' computers are collected to compare to prevent multiple submissions by the same participant.

The data in this Bailey study could be limited by various biases resulting from the use of a self-report questionnaire. The opinions of barriers perceived by participants could be limited to the respondent's feelings at the time the questionnaire is answered. In addition, the results could be limited by the variation of each participants' definition of each item in the Likert scale. Participants' responses are made anonymously, protecting confidentiality.

The results could also be biased by the number of respondents, as the study is limited to the faculty and deans within the University of North Texas and even further limited by those who choose to complete the questionnaire.

While previous studies have not shown differences among faculty perceptions based on age, gender, and tenure status, the results may be biased by the degree to which the results could be generalized to other departments or universities. To support

an accessible population, the population for this research is restricted to the full-time faculty, deans, and chairpersons at the University of North Texas across all colleges.

Overall, multiple techniques have been used to control biases.

Hypothesis

This section provides the hypothesis used in this Bailey study.

H₀1: There is no statistically significant relationship between faculty demographics and faculty participation in distance education.

H₀2: There is no statistically significant difference between factors that faculty participants identified as motivators and factors that administrators believed motivated faculty to participate in distance education.

H₀3: There is no statistically significant difference between factors that faculty nonparticipants identified as barriers and actors that administrators believed that faculty perceived as barriers to participating in distance education.

H₀4: There is no statistically significant difference between rewards and compensation that participants identified as motivators and the lack of rewards and compensation that nonparticipants perceived as barriers to participation in distance education.

H₀5: There is no statistically significant difference between the top factors that Hebert's faculty non-participants identified as barriers to participation in distance education and the factors that faculty non-participants identified as barriers to participation in distance education in this study.

H₀6: There is no statistically significant difference between top ranked factors that administrators identified as barriers to faculty participation in distance education

in Hebert's study and the top ranked factors that administrators identified as barriers to faculty participation in distance education in this study.

LITERATURE REVIEW

This section reviews literature of recent work on the topics Hebert (2003) discussed in her work: organizational changes resulting from implementation of distance educational programs, changes in student population, distance education changes, and barrier differences since 2003. While perceived barriers or challenges have changed within literature, this Bailey study will focus on the same barriers used in the 2003 study.

UNT Changes

Many universities have made changes within their distance educational courses. As with other institutions, the University of North Texas has made changes since the 2003 study. Students continue to enroll for distance educational courses as shown in reporting both internally to UNT and externally within other universities. The College of Engineering is offering a Ph.D. program (National Science Foundation, 2010) and has changed the online system used for distance education is changing from WebCT to Blackboard Learn (Himmel, 2011). The Center for Learning Enhancement, Assessment, and Redesign provides enlightening statistics pertinent to this Bailey study. "During the Spring 2013 session, students taking online courses (10,632 students) accounted for 10.5% of the total enrollment (34,247) for the university" (UNT: CLEAR, 2013). For this same time period, students taking at least one online course and possibly a face-to-face course totaled up to 10, 632 or 31.1% and 3,020 students (8.8%) are counted to be taking distance learning courses only (UNT: CLEAR, 2013).

Additional enhancements that have been made include the Center for Learning Enhancement, Assessment and Redesign's training opportunities for faculty teaching at UNT. CLEAR offers training for Blackboard, Turnitin, Turning Point, Assessment, and Teaching Effectiveness. The site dedicated to training for UNT faculty demonstrates the ongoing support that UNT faculty receives. There is an entire list of initiatives being offered to faculty (UNT: CLEAR Initiatives, 2013).

Barriers and Incentives

Many articles and studies identify common barriers and incentives since Hebert's study (2003). Studies often explore the motivators or barriers and identify each as being an intrinsic or extrinsic characteristic. This discussion reviews the most commonly found barriers and incentives discussed since Hebert's study. Intrinsic incentives, or those factors that are typically internal to the instructor, include career advancement through the tenure track, overcoming the personal challenge to learn a new technology, enhance their self-growth, and easily the personal satisfaction of succeeding as an online instructor. Extrinsic factors are those factors that are found externally to the individual and may include the monetary reward for teaching and the credit toward tenure.

The demographics of the group being studied are taken into considerations to ensure that the sample participants are diverse and adequately reflect the full population of full-time faculty, deans, and administrators of UNT. The characteristics included within this Bailey study include age, tenure status, experience, gender, and position within the university. Many studies have not found correlation between perceptions of barriers and incentives and most demographic characteristics (Maguire,

2005). However, tenure in respect to the external motivation of recognition among peers continues to be an area of interest. Within Hebert's study, there was no significant relationship found between tenured and non-tenured faculty participating in distance education. This Bailey study should provide current information about identification if there is a significant relationship between those faculty participating in distance education and those who have received tenure in today's university environment.

The interest, support, and encouragement of administrators are noted in Hebert's writing to be "essential to the long-term nurturing and growth of distance education programs" (Hebert, 2003). However, the few studies performed between 2003 and 2013 continue to list the lack of administrative support as a barrier to faculty participation in distance education. Green, Alejandro, and Brown identified the lack of institutional support as a discouraging factor for the retention of faculty teaching distance education courses (2009). Kern cited studies showing that faculty attitudes shifted to acceptance of distance education programs with the "support of administrators who hear concerns about workload, training, and professional development" (2009).

Gibson, Harris, and Colaric (2008) commented that the way an administrator views distance education can make a difference in the instructional system that supports the instructors. In the same study, the authors note that administrators appreciate distance education, as there is "no demand for increased physical space" (2008) to support students participating in distance education. O'Quinn (2002) cited Wolcott who found that the attitude of administrators" (2003) was important to faculty acceptance and participation in distance education.

Many articles and studies identified a common barrier perceived by faculty as a lack of time to develop courses (Berge, 2002; Graham, 2011; Green, Alejandro, & Brown, 2009; Kern, 2010; Napier, 2011; O'Quinn, 2002; Shea, 2007). Green, Alejandro, and Brown speak to the ideas that universities that fail to "provide faculty with adequate time to develop and maintain distance education courses" (2009) will have a hard time keeping faculty on staff. One study went into details regarding the perceived costs to develop courses (Chen, 2009), such as transitioning them from face-to-face courses, or updating courses to reflect newer goals and outcomes, as being another barrier to faculty participation.

One of the more common barriers to faculty participating in distance education was that of faculty workload (Chen, 2009; Cook, Ley, Crawford, & Warner, 2009; O'Quinn, 2002; Panda & Mishra, 2007). While some studies included the time needed to prepare for a distance education course as part of the workload issue, the number of classes assigned to a specific distance education faculty member and the number of students enrolled in each of those courses is a heavy burden as well. Green, Alejandro, and Brown found that the concerns of workload and time commitment to be the largest barriers to faculty teaching online (2009).

Many faculty members perceive that there is more of a one-on-one feeling to teaching in a distance education course. For example, an instructor must go out of the way to repeat a common question and the answer in a public forum available to all students to duplicate the instructor's ability to restate the question and answer it within a lecture environment. As a result, there is a faculty perception that teaching distance courses take more time (Shea, 2007). As a result studies show that administrators

should consider the class size for a distance education class and keep the class size small to allow each student to receive personal attention (Schulte, 2010). Schifter indicates that faculty may find new challenges that are more time consuming than what they are accustomed to seeing in face to face courses (2000). More time to teach distance courses, in addition to face-to-face courses or the increased time to teach distance courses (Berge, 2002; Cook, Ley, Crawford, & Warner, 2009; Shea, 2007) was a common barrier.

While time in general seems to be an issue, faculty also feel an increased amount of time needed to learn the technology that accompanies distance education (Tabata & Johnsrud, 2008). The technology supporting online education reduces the geographical constraints and synchronous time constraints to teaching. Many studies showed that the faculty perception of poor technical support was a large barrier (Berge, 2002; Cook, Ley, Crawford, & Warner, 2009; Dooley, 2002; Graham, 2011; Kern, 2010; MacKeogh, 2009; O'Quinn, 2002; Osika, Johnson, & Buteau, 2009; Panda & Mishra, 2007). As with the first impression concept, once faculty feel they are not supported by a technology group or support team, their discussions of failures to students usually shifts to blaming the technology team. Betts found that faculty looked to the institution to provide technical support and training to ensure success in distance education efforts (1998).

Lack of technological experience or training showed up as a primary barrier to faculty participation in a number of studies (Berge, 2002; Cook, Ley, Crawford, & Warner, 2009; Dooley, 2002; Graham, 2011; Green, Alejandro, & Brown, 2009; Kern, 2010; O'Quinn, 2002; Panda & Mishra, 2007). Dooley & Murphey identified the need for

development support to design courses that are effective (2000). Receiving training and information as to where faculty could go to receive training was a consistent message (Berge, 1998; Betts, 1998; Peerani, 2013).

Many authors indicate in their work that one of the major factors that discourage faculty participation in distance education is the lack of faculty rewards or incentives in the form of compensation (Berge, 2002; Chen, 2009; Cook, Ley, Crawford, & Warner, 2009; Dooley, 2002; Graham, 2011; Green, Alejandro, & Brown, 2009; MacKeogh, 2009; O'Quinn, 2002; Osika, Johnson, & Buteau, 2009; Panda & Mishra, 2007; Shea, 2007). Compensation was found to be acceptable in a number of forms including release time, extra workload pay, new equipment, travel budget, or access to a teaching assistant (Green, Alejandro & Brown, 2009). The compensation piece was one of the strongest factors in faculty motivation (Schifter, 2000).

Concern over quality of courses or effectiveness of online courses compared to face-to-face are also present (Cook, Ley, Crawford, & Warner, 2009; Graham, 2011; Koenig, 2010; MacKeogh, 2009; O'Quinn, 2002; Osika, Johnson, & Buteau, 2009). Schifter found that faculty are more likely to opt out of teaching distance courses if the quality is not where they expect it to be (2000). However, Dooley and Magill reported that course evaluations are higher for distance education courses than for face-to-face courses (2002).

As distance education grows to support student demand, universities must continue to review the quality of faculty as well as programs offered to students. Universities must also continue to review the barriers that faculty perceive that may cause hesitation to teach online courses. Within the research reviewed, there are

several motivators and barriers that continue to be included in perceptions of faculty, and discovering the extent of these perceptions is a valuable study for universities.

METHODOLOGY

The purpose of this Bailey study was to determine faculty, dean, and chairpersons' perceived barriers to faculty participation in distance education at the University of North Texas. This chapter discusses the methodology planned for this Bailey study.

Population

The sample for this study was drawn from the population of faculty, including professors, associate professors, and assistant professors. The entire population of administrators including deans, associate deans, chairs and faculty directors were used to draw a sample in this Bailey study (2013, University of North Texas Office of the Provost). Within the University of North Texas, many degree programs and certifications are offered online. According to a report from the University of North Texas, Office of Institutional Research & Effectiveness, more than 675 courses were offered online within the 15 colleges for the fall 2012 semester.

Invited to participate in the study were all deans and chairpersons. According to the UNT Office of Provost, Deans, and Associate Deans Web page (2013, March), there are 15 deans, 28 associate deans, and 13 assistant deans, and 57 chairpersons. Included in the study were all professors, associate professors, and assistant professors. According to a report from the University of North Texas Office of Institutional Research and Effectiveness, there are 215 assistant professors, 312 associate professors, and 322 professors. To stay within the parameters of Hebert's

original study, the titles of instructor, lecturer, modified service, principal lecturer, and senior lecturer were not sent the invitation to participate. Adjunct faculty were not invited to participate in this Bailey study to better align with and be able to compare data to the Hebert study. As a result, approximately 962 surveys were sent out in email (962=full-time faculty members, 56=deans, 57=chairpersons). All complete responses from the entire population were studied.

Instrumentation

The same two, self-assessing questionnaires used by Hebert (2003), and constructed by Betts (1998), were used within this Bailey study: one survey path for faculty and one survey path for administrators and chairpersons. The faculty survey sections include: distance education background, self-assessment, faculty responses, and demographics. The administrator survey includes: distance education background, faculty assessment, administrator and chair responses, and demographics. Data collected from the survey were analyzed and results were reported within the dissertation. Both open-ended and closed-ended questions are used, depending on the section. In the faculty survey there are 10 demographic questions, 35 faculty self-assessment questions for those with previous distance education background, five distance-learning background questions for those with previous distance education background, 20 faculty self-assessment questions for those with no previous distance education background, four faculty distance-learning background questions for those with no previous distance education background, and seven faculty response questions. In the administrators survey there are nine demographic questions, 35 faculty assessment questions that administrators complete with their opinion as to faculty

beliefs, 20 faculty assessment questions for those with no previous distance education background, four faculty distance-learning background questions for those with no previous distance education background, and nine faculty response questions.

The survey data was collected using UNT's Qualtrics Survey Software. A link to the UNT-housed survey was sent to participants by Dr. Jeff Allen on behalf of the student researcher using distribution lists provided by the UNT Help Desk in an email along with a message explaining the purpose of the study. The participant had to agree to the informed consent before answering the survey questions. The original survey had participants manually moving from page to page to advance to a subsequent question, branching based on response. Within Qualtrics, the survey automatically displays the appropriate questions in the appropriate order based on question response. According to one study, this online method can decrease completion time and potentially make completion of the survey easier (Mavletova & Cooper, 2014).

As indicated within Hebert's study, the surveys had reliability measured and validated "by panelists from George Washington University and George Mason University" (Hebert, 2003), and a pilot study was performed. Reliability results showed the following comparison.

Table 1
Reliability Results of Cronbach Alpha Calculations

	Pilot (33 surveys)	Final (539 surveys)
Motivating Factors	$\alpha = 0.8153$	$\alpha = 0.9303$
Inhibiting Factors	$\alpha = 0.7415$	$\alpha = 0.9475$

The survey instrument was also tested against the Gall et al. (1996) 21-point guidelines for questionnaire design. Dr. Hebert's permission was obtained to use her survey instruments before distribution of the surveys for this Bailey study. Once data for

this Bailey study is collected, comparison of the percentages of male and female participants were made and other such demographics information to see the differences between this Bailey study and Hebert's study.

From the survey completed by Hebert, a few changes weren made to this Bailey survey. The demographic information section was moved to the end of the survey. According to different studies including Dillman et al (2009), Teclaw, Price, & Osatuke (2012), and Neiderhauser & Mattheus (2010), demographic questions should be placed at the end of the survey to "prevent boredom and to engage the participant early in the survey" (Neuderhauser & Mattheus, 2010) and to improve return rates (Teclaw, Price, & Osatuke, 2012). The age demographic question was changed from selection of one of three, age-range choices to a fill-in-the-blank question. This change allows the mean of the respondent age to be analyzed easier than analyzing the frequency distribution between age ranges. The survey was conducted online rather than with paper submission to make data analysis easier. The types of technologies used within classes were updated to include current technologies such as Blackboard. The specific questions changed are shown in Appendix B with the original questions in the left column and revised questions in the right column. Differences in wording are displayed in red.

Data Collection

For data collection, an email was scheduled to be sent out, preferably on a Friday afternoon after noon CST (Munoz-Leiva, Sanchez-Fernandez, Montoro-Rios, & Ibanez-Sapata, 2010) to participants, asking them to respond to and complete a 15 minute, HTML-based online survey within two weeks. An introduction was included in

the email (see Appendix F) with a call to participate and includes a link to the survey. The email was addressed to participants in general and explains the need for the study and requests their participation. The email outlines the estimated 15 minutes to complete the survey. The initial page of the survey includes the IRB approved and required confidentiality and purpose information. The response to the first question of the survey branched the participant down a faculty or administrator path of the instrument. Scoring for the Likert questions range from strongly disagree to strongly agree.

Based on a research study on response rate by Paraschiv (2013), only three emails should be sent to participants: initial invitation to participate, a single reminder, and a notice of the final date for participation (Munoz-Leiva, Sanchez-Fernandez, Montoro-Rios, & Ibanez-Sapata, 2010). Once the initial email announcing the survey was sent out, a reminder email was be sent. Ideally, the email would have been sent out on the Thursday after the initial invitation to those who have not responded, and a tertiary notification scheduled to be sent Wednesday before the final date to those who have still not responded (Paraschiv, 2013). With the need to use the distribution list required by the Help Desk, customized emails to those who had not yet responded were not able to be sent, as a distribution list does not track completion.

With consideration to a 95% confidence level, a confidence interval of five, and a 50% response distribution estimate for a population size of approximately 1500 participants, 306 respondents were needed to a statistically significant response rate. The plan included the idea that if by the end of the first week the participant number was

not above 300, a more personalized reminder would be sent in an effort to improve the response rate (Fan & Yan, 2010).

Treatment of the Data

As in the original study, reliability estimates were computed using Cronbach's alpha and data was calculated with Pearson's chi-square and independent samples *t*-tests. Cronbach's alpha reliability testing occurred across all items. Means for each top ranked item from Hebert's study were compared to those from this Bailey study.

Summary

While technology changes and student's needs for online learning increase, universities are changing their offerings to meet these changes. Faculty, who work within these environments and regularly deal with the students, may resist the changes that distance learning charges universities to embrace. To ensure we are meeting the needs of faculty members to advance their skills in distance learning, faculty member's perceived barriers should be identified and removed.

This chapter covered this study's population, instrumentation, data collection, and treatment of the data. Chapter Four covers the results of the analysis of the study's collected data.

DATA ANALYSIS AND DISCUSSION OF RESULTS

Research Findings

The purpose of the Bailey study was to identify perceived barriers of faculty participation in distance education courses in a four-year and identify the differences in perceived barriers between the 2003 study and this one. This chapter presents the

results of the statistical analysis of the response data collected from questionnaires sent to faculty and administrators at the University of North Texas.

As estimated by the UNT Help Desk, 866 survey emails were initially sent. Of the 866 population, 123 responses were received. Responses received and used within the analysis included 98 from faculty and 25 from administrators. Of the faculty surveys, 96 (98%) were completed and deemed usable. Of the administrator surveys, 25 (100%) were completed and deemed usable.

While the chapters discussing delimitations and limitations section indicated that IP addresses could be collected and used to prevent multiple submissions by the same participants, some IP addresses were the same within the collected data records. After investigation it was discovered that multiple participants could have used the same computer resulting in the same IP address even though the user could have been logged in with a different network identification and password. From another source (Reaces, 2015), multiple computers within a single network can display the same IP address within survey data as the router for a single network can translate the IP address as it relays requests to the originating computer. As a result, all entries with the same IP address were accepted as valid entries.

Reliability of Instrument Scores

Analysis of the reliability of the survey instrument scores indicate acceptable reliability. The final survey (123 usable responses returned) show that motivating factors $\alpha = 0.937$ and inhibiting factors $\alpha = 0.876$. The results were slightly different than those reported in Hebert's study (2003): the final 287 surveys returned showed motivating factors $\alpha = 0.9162$ and inhibiting factors $\alpha = 0.8991$.

Correlation of Survey Responses and Hypothesis

This section provides the correlation of each research hypothesis with the corresponding survey responses.

H₀1: There is no significant relationship between faculty demographics and faculty participation in distance education.

Within the survey, H₀1 is supported by responses from the faculty survey (see Appendix D: Faculty Self-Study), section VI. Faculty Demographics. The questions survey the demographic variables of (a) gender, (b) age, (c) position in the university, (d) tenure status, and (e) number of years faculty member has taught in postsecondary education. A Pearson's chi-square test were used to determine whether there is a statistically significant relationship between gender and faculty participation in distance education, between age and faculty participation, between position within the university and faculty participation, and tenure status and faculty participation. Independent samples *t*-tests were used to determine whether there is a significant statistical relationship between the means of the number of years faculty taught in postsecondary education and participation in distance education.

H₀2: There is no statistically significant difference between factors that faculty participants identified as motivators and factors that administrators believed motivated faculty to participate in distance education.

H₀2 is supported by responses from all faculty survey items found in section I. Faculty Self-Assessment – Distance Learning Participant (see Appendix D: Survey Instrument – Faculty) and responses from the dean and chairpersons' survey,

section III. Faculty Assessment – Inhibitors questions (See Appendix E: Survey Instrument – Deans/Chairpersons). For H_02 , independent samples t -tests, using a 0.05 significance level, were conducted to determine whether there was a statistically significant difference in the means of the top four factors identified by faculty as motivational factors and the means of the top four factors identified as motivational factors by deans and chairpersons.

Ho3: There is no statistically significant difference between factors that faculty non-participants identified as barriers and factors that administrators believed that faculty perceived as barriers to participation in distance education.

Responses correlating to H_03 are found in the faculty survey, section III. Faculty Self-Assessment – No Distance Learning Participation (see Appendix D: Survey Instrument – Faculty), and the dean and chairpersons' survey section III. Faculty Assessment – Inhibitors, (see Appendix E: Survey Instrument – Deans/Chairpersons). Independent samples t -tests were conducted using a 0.05 significance level to determine whether there was a statistical difference in the means of the top four ranked items faculty perceived as barriers and the means of corresponding items perceived by deans and chairpersons as barriers to faculty participation in distance education.

Ho4: There is no statistically significant difference between rewards and compensation that participants identified as motivators and the lack of rewards and compensation that nonparticipants perceived as barriers to participation in distance education.

Responses correlating to H₀4 are found in the faculty survey section I. Faculty Self-Assessment – Distance Learning Participant (see Appendix D: Survey Instrument – Faculty, items 4, 9, 12, 16, 17, 22, 23, 25, 26, and 29) and section III. Faculty Self-Assessment – No Distance Learning Participation (see Appendix D: Survey Instrument – Faculty, items 1, 18, 15, 6, 9, 19, 5, 12, 14, and 17). Independent samples *t*-tests were conducted using a 0.05 significance level to determine whether there was a statistically significant difference between the means of rewards and compensation that participants identified as motivators and the means of corresponding lack of rewards and compensation of non-participants perceived to be barriers to participation in distance education.

Ho5: There is no statistically significant difference between the top factors that Hebert's faculty non-participants identified as barriers to participation in distance education and the factors that faculty non-participants identified as barriers to participation in distance education in this study.

Table 17 in Hebert's (2003) study provides the means for each ranked item for faculty non-participants. Responses correlating to H₀5 are found in the faculty survey, section III, Faculty Self-Assessment – No Distance Learning Participation (see Appendix C: Survey Instrument – Faculty). Independent samples *t*-tests were conducted using a 0.05 significance level to determine whether there was a statistical difference in the means of the top four ranked items faculty non-participants in Hebert's study perceived as barriers and the means of corresponding items faculty non-participants perceived as barriers to faculty participation in distance education in this study.

Ho6: There is no statistically significant difference between top ranked factors that administrators identified as barriers to faculty participation in distance education in Hebert's study and the top ranked factors that administrators identified as barriers to faculty participation in distance education in this study.

Table 17 in Hebert's (2003) study provides the means for each ranked item for administrator participants. Responses correlating to H₀6 are found in the dean and chairpersons' survey section III, Faculty Self-Assessment – Inhibitors, items 1, 5, 10, and 15 (see Appendix D: Survey Instrument – Deans/Chairpersons).

Independent samples *t*-tests were conducted using a 0.05 significance level to determine whether there was a statistical difference in the means of the top four ranked items administrator participants in Hebert's study perceived as barriers and the means of corresponding items administrator participants perceived as barriers to faculty participation in distance education in this study.

Analysis of Hypothesis

H₀1: There is no statistically significant relationship between faculty demographics and faculty participation in distance education.

Table 2 displays the distribution of male and female participants and non-participants. There were records where the age value was deemed not usable, such as where the age was entered by the participant as 0 and 143. Those values deemed not usable were removed from the analysis.

Table 2
Gender Distribution Between Participants and Non-Participants

	Participants	Non-Participants
Gender		

Female	21	17
Male	20	28

Note: Chi-square = 1.572, $p = 0.210$.

A Pearson's chi-square test was used to determine whether there was a statistically significant relationship between gender and faculty participation in distance education. Using a 0.05 significance level, the null hypothesis failed to be rejected, resulting in no significant statistical relationship between gender and faculty participation in distance education.

In Hebert's study, she grouped ages by 18-30, 31-44, and 45+. The ages in this sample ranged from 30-75. On average, the age of participants was 52.87 (SD=11.01), and for non-participants was 51.71. Table 3 displays the means and standard deviation for participants and non-participants.

Table 3
Age Demographics of Participants and Non-Participants

	Mean Age	Std. Deviation
Age		
Participants	52.87	11.02
Non-participants	51.71	10.13

An independent samples t -test was used to test for a mean difference between participants and non-participants on age. Using a 0.05 significance level, the test indicates there are no statistically significant differences between the means of the ages and faculty participation in distance education, $t(79) = .493$, $p = .624$.

In Hebert's study, a Pearson's chi-square test was performed with no statistical significance identified. As age is a categorical (discrete ratio) variable, there are many discrete categories of ages resulting from a chi-square analysis, and grouped numbers

can be too small to carry out meaningful analysis. An independent samples *t*-test was performed instead and a Shapiro-Wilks test was performed to ensure that the resulting data from the independent samples *t*-test could be considered normally distributed (participant's Sig. = 0.098, non-participants Sig. = 0.780).

Table 4 shows the distribution of position with the university between faculty participants and non-participants.

Table 4
Position Within the University Distribution Between Participants and Non-Participants

Position	Participants	Non-Participants
Regents professor	2	2
Professor	13	16
Associate professor	18	20
Assistant professor	6	6
Other	2	1

Note: Chi-square = 0.564, $p = 0.967$.

A Pearson's chi-square test was used to determine whether there was a significant relationship between position within the university and faculty participation in distance education. Using a 0.05 significance level, the null hypothesis was not rejected. Therefore, there is no significant statistical relationship between position within the university and faculty participation in distance education, $X^2(4, N=86) = 0.56$, $p = 0.967$.

Table 5 shows the distribution of tenure status between participants and non-participants.

Table 5*Tenure Status Distribution Between Participants and Non-Participants*

	Participants	Non-Participants
Tenure Status		
Tenured	35	39
Non-tenured	6	6

Note: Chi-square = 0.030, $p = 0.862$.

A Pearson's chi-square test was used to determine whether there was a significant relationship between tenure status and faculty participation in distance education. Using a 0.05 significance level, the null hypothesis failed to be rejected. Therefore, there is no significant statistical relationship between tenure status and faculty participation in distance education.

Independent samples *t*-tests were used to determine whether there was a significant statistical relationship between the means of the number of years faculty taught in post-secondary education and participation in distance education. There was no significant difference in the scores for participants ($M=19.67$, $SD=11.04$) and non-participants ($M=18.91$, $SD=8.80$); $t(76)=0.350$, $p=0.727$. Using a 0.05 significance level, results of the analysis failed to reject the null hypothesis. Therefore, there is no statistically significant relationship between number of years faculty have taught in post-secondary education and participation in distance education.

H₀₂: There is no statistically significant difference between factors that faculty participants identified as motivators and factors that administrators believed motivated faculty to participate in distance education.

Table 6 displays the rank order of factors that faculty identified as having been the most motivational to their participation in distance education. It also shows the rank placement of the same factors by administrators.

Table 6

Top Four Motivational Factors Ranked by Faculty Compared to Corresponding Factors Ranked by Administrators

Rank by Faculty	Item	Rank by Admin.	<i>t</i>	<i>df</i>	<i>p</i>	<i>d</i>
1	Increase in salary (# 9)	31	6.21	58	< .001	2.21
2	Release time (# 23)	35	8.20	58	< .001	2.39
3	Merit pay (# 25)	33	6.47	58	< .001	2.10
4	Reduced teaching load (# 4)	29	5.53	58	< .001	1.99

Independent samples *t*-tests were conducted to determine whether there was a statistically significant difference in the means of the top four ranked factors identified as motivational by faculty and the means of corresponding factors that administrators believed motivated faculty to participate in distance education. Using a 0.05 significance level, all differences were found to be statistically significant and all null individual *t*-test hypotheses were rejected. Therefore, there is a statistically significant difference between the top four ranked motivators identified by the faculty and the corresponding factors identified by administrators as motivational to their participation in distance education. The relative rank of these items differed dramatically between faculty and administrators.

Table 7 displays the rank order of factors that administrators identified as being motivating factors to faculty participation in distance education. It also shows the rank placement of the same factors by faculty.

Table 7

Top Four Motivational Factors Ranked by Administrators Compared to Corresponding Factors Ranked by Faculty

Rank by Admin	Item	Rank by Faculty	<i>t</i>	<i>df</i>	<i>p</i>	<i>d</i>
1	Professional prestige and status (# 16)	11	1.24	58	.219	.391
2	Opportunity to influence social change (# 10)	9	1.36	58	.178	.437
3	Required by department (# 6)	25	-.798	45*	.429	-.283
4	Increased quality of students (# 34)	13	1.72	42*	.092	.498

Note. * Degrees of freedom are adjusted to account for not meeting the homogeneity of variance assumption.

Independent samples *t*-tests were conducted to determine whether there was a statistically significant difference in the means of the top four ranked factors identified by administrators as motivators to faculty and the means of corresponding factors that faculty believed motivated them to participate in distance education. Using a 0.05 significance level, results of the analysis failed to reject all null individual *t*-test hypotheses. Therefore, there is no statistically significant difference between the top four ranked motivators identified by the administrators and the corresponding factors identified by faculty as motivational to their participation in distance education.

Ho3: There is no statistically significant difference between factors that faculty non-participants identified as barriers and factors that administrators believed that faculty perceived as barriers to participation in distance education.

Table 8 shows the rank order of factors that faculty perceived as barriers to their participation in distance education. The table shows the rank placement of the same factors by administrators.

Table 8

Top Four Perceived Barriers Ranked by Non-participating Faculty Compared to Corresponding Factors Ranked by Administrators

Rank by Faculty	Item	Rank by Admin	<i>t</i>	<i>df</i>	<i>p</i>	<i>d</i>
1	Lack of technical background (# 7)	18	5.10	61	$p<.001$	1.154
2	Lack of recognition and awards (# 17)	2	.879	61	.383	.259
3	Negative comments made by colleagues about distance learning teaching experiences (# 2)	8	2.27	61	$p<.001$.628
4	Lack of professional prestige (# 6)	14	3.82	61	$p<.001$.841

Note: *Significance level 0.05.

Independent samples *t*-tests were conducted to determine whether there was a statistically significant difference in the means of the top four ranked items perceived as barriers by faculty and the means of the corresponding items perceived by administrators as barriers to faculty participation in distance education. Using a 0.05 significance level, one of the top four items, lack of recognition and awards, failed to reject the null individual *t*-test hypothesis and shows no statistically significant difference between the mean values. The other three items have differences found to be statistically significant and the null individual *t*-test hypotheses for these three items were rejected. There appears to be a statistically significant difference between three of the top four ranked motivators identified by faculty and the corresponding factors

identified by administrators as motivational to their participation in distance education. It is noted that the relative rank of these items differed dramatically between faculty and administrators.

Table 9 displays the rank order of factors that administrators perceived to be barriers to faculty participation in distance education, and the rank order placement of the same factors by faculty.

Table 9
Top Four Perceived Barriers Ranked by Administrators Compared to Corresponding Factors Ranked by Faculty

Rank by Admin	Item	Rank by Faculty	<i>t</i>	<i>df</i>	<i>p</i>	<i>d</i>
1	Other additional inhibiting factors (# 20)	8	-4.93	61	.624	-.113
2	Lack of recognition and awards (# 17)	2	.879	61	.383	.260
3	Lack of distance learning training provided by the institution (# 3)	10	.464	61	.645	.138
4	Lack of technical support provided by the institution (# 11)	11	.438	61	.663	.138

Note: *Significance level 0.05.

Independent samples *t*-tests were conducted to determine whether there was a statistically significant difference between the means of the top four ranked items perceived by administrators as barriers to faculty participation in distance education and the means of corresponding items perceived by faculty as barriers to their participation in distance education. Using a 0.05 significance level, results of the analysis failed to reject all null individual *t*-test hypotheses. Therefore, there appears to be no statistically

significant difference between the mean values assigned to each item by administrators and faculty.

Ho4: There is no statistically significant difference between rewards and compensation that participants identified as motivators and the lack of rewards and compensation that nonparticipants perceived as barriers to participation in distance education.

Table 10 displays the relationship between rewards and compensations that participants identified as motivators and the lack of rewards and compensation that non-participants perceived as barriers to participation in distance education.

Table 10
Comparison of Rewards and Compensation Between Participants and Non-Participants

Item	<i>t</i>	<i>df</i>	<i>p</i>	<i>d</i>
4/1 Teaching load	4.651	68	p < .001	1.141
9/18 Salary	6.381	68	p < .001	1.844
12/15 Monetary support	7.264	68	p < .001	2.093
16/6 Professional prestige	3.332	68	p < .001	.966
17/9 Grants	6.718	67.1*	p < .001	1.754
22/19 Tenure and promotion	4.251	68	p < .001	1.282
23/5 Release time	8.503	68	p < .001	2.168
25/12 Merit pay	6.860	68	p < .001	1.866
26/14 Royalties	3.601	66.6*	p < .001	1.119
29/17 Recognition and awards	4.714	68	p < .001	1.352

Note. * Degrees of freedom are adjusted to account for not meeting the homogeneity of variance assumption.

Independent samples *t*-tests were conducted to determine whether there was a statistically significant difference between the means of rewards and compensation that

participants identified as motivators and the means of corresponding lack of rewards and compensation that non-participants perceived to be barriers to participation in distance education. Using a 0.05 significance level, all items were found to have statistically significant differences resulting in the null hypothesis to be rejected.

Ho5: There is no statistically significant difference between top factors that faculty non-participants identified as barriers to participation in distance education in Hebert's study and the factors that faculty non-participants identified as barriers to participation in distance education in this study.

Table 11 displays the comparison between top barriers to participate in distance education identified by faculty non-participants in Hebert's study (2003) and top barriers to participate in distance education identified by faculty non-participants in this study.

Table 11
Top Barriers Ranked by Non-Participating Faculty in Hebert's Study Compared to Corresponding Barriers Ranked in this Study

Rank in Hebert's Study	Item	Rank in This Study	<i>t</i>	<i>df</i>	<i>p</i>	<i>d</i>
1	Concern about quality of courses (#10)	20	-24.61	45	$p < .001$	-2.59
2	Concern about faculty workload (#1)	16	-11.76	45	$p < .001$	-1.70
3	Lack of release time (#5)	18	-11.61	45	$p < .001$	-1.70
4	Lack of monetary support for participation (#15)	19	-11.21	45	$p < .001$	-1.52

One sample *t*-tests were conducted to determine whether there was a statistically significant difference between the means of the top ranked items identified by faculty non-participants as inhibitors to participation in distance education in Hebert's study (2003) and the means of the top ranked inhibitors to participation in distance education

by non-participating faculty in this study. Using a 0.05 significance level, all differences were found to be statistically significant and all null *t*-test hypotheses were rejected. Therefore, it appears to be a statistically significant difference between the top four ranked barriers identified by non-participating faculty in Hebert's study and the corresponding barriers identified by non-participating faculty in this study.

Ho6: There is no statistically significant difference between top ranked factors that administrators identified as barriers to faculty participation in distance education in Hebert's study and the top ranked factors that administrators identified as barriers to faculty participation in distance education in this study.

Table 12 displays the comparison between top barriers to participate in distance education identified by administrators in Hebert's study (2003) and top barriers to participate in distance education identified by administrators in this study.

Table 12
Top Barriers Ranked by Administrators in Hebert's Study Compared to Corresponding Barriers Ranked in this Study

Rank in Hebert's Study	Item	Rank in This Study	<i>t</i>	<i>df</i>	<i>p</i>	<i>d</i>
1	Concern about faculty workload (#1)	20	18.58	16	<i>p</i> <.001	-2.73
2	Lack of release time (#5)	17	-14.13	16	<i>p</i> <.001	-2.38
3	Lack of credit toward tenure and promotion (#19)	12	-9.291	16	<i>p</i> <.001	-1.93
4	Lack of monetary support for participation (#15)	16	-12.89	16	<i>p</i> <.001	-2.06

One sample *t*-tests were conducted to determine whether there was a statistically significant difference between the means of the top ranked items identified by administrators as inhibitors to participation in distance education in Hebert's study (2003) and the means of the top ranked inhibitors to participation in distance education by administrators in this study. Using a 0.05 significance level, all differences were found to be statistically significant and all null *t*-test hypotheses were rejected. Therefore, it appears to be a statistically significant difference between the top four ranked barriers identified by administrators in Hebert's study and the corresponding barriers identified by administrators in this study.

Summary

This chapter discussed the planned methodology to be used on the data collected from faculty and deans and chairpersons within this study. Chapter 5 discusses the findings and offers recommendations for future studies.

SUMMARY OF FINDINGS, CONCLUSIONS, AND RECOMMENDATIONS

This chapter summarizes and discusses the study's findings regarding the perceived barriers to faculty participation in distance education and offers future research recommendations.

The purpose of the study was to identify perceived barriers of faculty participation in distance education courses in a four-year and identify the differences in perceived barriers between a 2003 study and this one. A self-reporting survey with a path for faculty and a path for administrators, comprised of deans and chairpersons, is used within this study. The faculty survey sections include: distance education background, self-assessment, faculty responses to barriers and motivators, and demographics. The

administrator survey includes: distance education background, faculty assessment, administrators responses to barriers and motivators, and demographics. The population of faculty including professors, regent professors, associate professors, and assistant professors are included in this study. The entire population of administrators including deans, associate deans, and chairpersons were included in this study.

In May, 2015, 866 email messages were distributed to all faculty and administrators at the University of North Texas. The email explained the survey need and included a link to the Qualtrics survey. Due to constraints in the mass email program and distribution lists, tracking, as planned, of those who had participated versus who had not participated was not possible. Two weeks later, a second survey was sent out to the entire 866 recipients asking for a response from those who had not yet responded to the survey. Again, two weeks later, a third email was sent out in June to the entire set of distributions lists. A large number of responses was not received.

Dr. Jeff Allen, the supervising researcher, received emails of complaints regarding the multiple emails that went out, so a fourth email was not sent. One hundred twenty-one surveys were completed: 98 completed faculty surveys and 25 completed administrator surveys. Of the faculty surveys, 96 (98%) were completed and deemed usable. Of the administrator surveys, 25 (100%) were completed and deemed usable.

Discussion of Findings

The results of the study yielded several statistically significant relationships.

H₀1: There is no statistically significant relationship between faculty demographics and faculty participation in distance education.

The variables explored for the first hypothesis included: gender, age, position in the university, tenure status and number of years a faculty member has taught in post-secondary education. There were no statistically significant relationships identified among the demographic items and faculty participation in distance education (gender, age, position, tenure status, and number of years participating in post-secondary education). Overall, the data aligns with previous analysis found during the literature review of this study.

Approximately 51% of the participants and 38% of non-participants were female, and 49% of the participants and 62% of the non-participants were male. The percentages of males and females were consistent with the percentages found in Hebert's study. Table 13 shows the age comparison between participants in this study and the previous study.

Table 13
Age Comparison Between Participants in Current and Previous Studies

Age	This Study	Hebert's Study
< 30	0	0
30-44	23.1%	25.8%
45+	76.9%	74.2%

Of interesting note, 33% of participants were over the age of 60. Within Hebert's study, she grouped age into less than 30, between 30 and 44, and over 45. By doing so, she restricted comparison by forcing the viewer to treat each group the same. It cannot be easily determined if similar percentages of specific-aged faculty are present.

Table 14 shows a visual view into the percentages of participants and non-participants by role in this study compared to the percentages of participants and non-participants by role in Hebert's study.

Table 14

Position Comparison Between Participants and Non-Participants in Current and Previous Studies

Positions	This Study		Hebert's Study	
	Participants	Non-Participants	Participants	Non-Participants
Regents Professors	4.9%	4.4%	9.0%	8.7%
Professor	31.7%	35.6%	21.6%	34.0%
Associate Professor	43.9%	44.4%	34.3%	28.9%
Assistant Professor	14.6%	13.3%	35.1%	28.4%
Other	4.9%	2.2%	0	0

In Hebert's study, there were only 4 positions available within the survey. The additional position of Other collected three respondents who felt their titles did not match the four positions offered from which to choose. In comparison, the percentages of non-participating Professors were similar, but Associate Professor respondents were higher. While Green, Alejandro, and Brown speak to workload and time commitment to be the largest barriers to faculty teaching online (2009), the percentage differences between Professors and Associate Professors who are not participating in distance learning should encourage exploration into the workload assigned to each role and the potential link to non-participation in distance education.

While there was no statistically significant relationship between tenured and non-tenured status and faculty participation in distance education, consideration should be given to the requirements for tenure track faculty. With the trends for universities to hire more adjunct or non-tenured faculty to teach (Chapman, 2011), existing, tenured faculty may feel anxiety toward adjunct staff teaching distance education classes.

H₀2: There is no statistically significant difference between factors that faculty participants identified as motivators and factors that administrators believed motivated faculty to participate in distance education.

Within this study, there was statistical significance found between motivational factors identified by faculty compared to those corresponding factors identified by faculty as motivators to faculty participating in distance education. Within Hebert's study, there was no statistical significance found between the mean values assigned to the top four ranked factors ranked by faculty compared to corresponding factors ranked by administrators.

In Table 15, the top motivating factors ranked by faculty and the corresponding rank by administrators in this study are compared to the corresponding factors ranked in Hebert's study.

Table 15
Top Motivating Factors Comparison Between Faculty-Ranked Factors and Corresponding Administrator-Ranked Factors in Current and Previous Studies

Motivating Factors		This Study		Hebert's Study	
Item		Faculty Ranking	Admin Ranking	Faculty Ranking	Admin Ranking
9	Increase in Salary	1	31	34	1
23	Release time	2	35	32	3
25	Merit Pay	3	33	31	6
4	Reduced teaching load	4	29	33	8

Based on this comparison, the faculty rankings in this study were closer to the administrator's views in Hebert's study as were the Administrator's rankings in this study compared to the faculty rankings in Hebert's study.

It is interesting that the current study shows that monetary factors, those more extrinsic factors, are more important to faculty now compared to rankings of those corresponding rankings in 2003. Even the fifth ranked item, monetary support for participation (e.g. stipend, overload), was ranked 34 by administrators. Interestingly, recognition and awards, job security, and credit for promotion and tenure were the next three ranked items by faculty. These factors are consistent with findings from other studies as well (Cook, Ley, Crawford, & Warner, 2009; Green, Alejandro & Brown, 2009; O'Quinn, 2002).

Also in Hebert's study, the opportunity to develop new ideas and intellectual challenge were ranked higher by faculty than in this study. While Herbert noted that "...early adopters of distance education are self-motivated and innovative individuals..." (Hebert, 2003), it seems that the more motivational factors are monetary within today's faculty. With the differences in ranking of monetary motivation so high for faculty and fairly low for administrators, this disparity should be reviewed for the impact on faculty interest in distance education.

One of Hebert's higher faculty-ranked factors was personal motivation to use technology, and that item was ranked at 33 by faculty in this study. This change makes sense considering that more and more faculty use technology differently today within their distance education classes in comparison to technology used in 2003. Looking to the survey differences between Herbert's study and this one, visible changes have occurred. In Hebert's study, delivery systems included cable TV and CU-SeeMe. In today's classroom, UNT uses Blackboard, which is a learning environment where audio recordings, video, chat, and discussions are readily blended within a single

environment. Instead of recording a video to be aired on a specific television channel, on a specific date and at a specific time, instructors can record a video from their own desk to be launched from within the learning environment and displayed in a computer window. There are no expensive recording studios involved, only a computer camera and appropriate software. As this perception of technology as a motivator is identified within this study and aligns with previous studies (Berge, 2002; Cook, Ley, Crawford, & Warner, 2009; Graham, 2011; Green, Alejandro, & Brown, 2009; Kern, 2010; Panda & Mishra, 2007), consideration to the idea that some faculty continue to see technology as a barrier should remain in the thoughts of leaders as they continue to provide technology training, such as what CLEAR offers to UNT faculty.

In Table 16, the top motivating factors ranked by administrators and the corresponding rank by faculty in this study are compared to the corresponding factors ranked in Hebert's study.

Table 16
Top Motivating Factors Comparison Between Administrator-Ranked Factors and Corresponding Faculty-Ranked Factors in Current and Previous Studies

Motivating Factors		This Study		Hebert's Study	
Item		Faculty Ranking	Admin Ranking	Faculty Ranking	Admin Ranking
16	Professional prestige	11	1	22	33
10	Opportunity to influence social change	9	2	23	34
6	Required by department	25	3	24	29
34	Increased quality of students	13	4	21	16

Factors ranked high by the administrators in this study are closer in similarity to the rankings of faculty in this study than compared to the rankings of faculty and administrators in Hebert's study. The factors identified by administrators in this study

seem to be more intrinsic factors than the extrinsic factors ranked by administrators in the previous table.

In Hebert's study, she noted that the mean range for faculty for all items was 3.74 – 1.66, which is closer to the mean range for administrators in this study of 1.88 – 3.35. The administrators mean range for all items in Hebert's study was 4.08 – 2.86 which is close to the mean range for faculty in this study of 2.28 – 4.33 (Hebert, 2003).

Additional motivating factors collected from faculty participants in this study added some interesting factors that should be considered in future studies:

- Allows travel while teaching
- Offers asynchronous interactions
- Supports increased enrollment
- Might attract enough students that a small class will make
- Participation offers professional preparation for students

For this last bullet, participation in distance education may prepare students to communicate remotely in the global interactions that are common in major corporations.

Along the lines of monetary support, one survey question asked if UNT should reward faculty differently for involvement with distance education. In the study, 33 non-participating faculty responded with specific comments. Many of the comments aligned with the existing motivators and barriers offered as options. Some additional comments included:

- Offering a dedicated student assistant such as a TA to assist.

- Faculty are rewarded more for publishing than teaching distance education courses. The university needs to decide which is more important – publishing or developing distance courses.
- Faculty annual evaluations should be adjusted to take distance learning participation into account.
- Offer a dedicated designer to develop the online class.

These comments also support findings in other studies around faculty rewards (Berge, 2002; Chen, 2009; Cook, Ley, Crawford, & Warner, 2009; Graham, 2011; Green, Alejandro, & Brown, 2009; MacKeogh, 2009; O'Quinn, 2002; Osika, Johnson, & Buteau, 2009; Panda & Mishra, 2007; Shea, 2007).

H₀₃: There is no statistically significant difference between factors that faculty non-participants identified as barriers and factors that administrators believed that faculty perceived as barriers to participating in distance education.

The top ranked barriers identified by non-participating faculty and barriers identified by administrators showed to be statistically significant with the exception of one, lack of recognition and rewards. The mean values for items: lack of technical background, negative comments made by colleagues about distance learning teaching experiences, and lack of professional prestige were all found to have statistical significance.

In Table 17, the top perceived barriers ranked by non-participating faculty compared to corresponding administrator-ranked factors are shown in comparison between this study and Hebert's study.

Table 17

Top Inhibitors Comparison Between Non-participating Faculty-Ranked Factors and Corresponding Administrator-Ranked Factors in Current and Previous Studies

Inhibiting Factors		This Study		Hebert's Study	
Item		Faculty Ranking	Admin Ranking	Faculty Ranking	Admin Ranking
7	Lack of technological background	1	18	9	8
17	Lack of recognition and rewards	2	2	18	19
2	Negative comments made by colleagues about distance learning teaching experiences	3	8	16	16
6	Lack of professional prestige	4	14	15	13

When compared with the previous study, none of the higher ranked items from this study were found to be considered close to a high-ranking factor in Hebert's study. In Hebert's study, quality of courses, faculty workload, release time, and monetary support for participation were the highest concerns. With this information, university leadership can work on exploring the technology challenges faculty face as an item to improve to encourage faculty participation in distance education. Faculty factors for recognition and rewards, along with professional prestige, should be reviewed to ensure that faculty who currently teach are being seen as significant to the university's distance education programs. In this way, non-participating faculty may see more value in their own participation.

Additional inhibiting factors were collected from non-participating faculty in this study that added some interesting factors that should be considered:

- Student feedback to one non-participating faculty said that online classes are useless and a waste of time

- Distance learning is not a good fit for some subjects, such as science where one comment was virtual science experiments do not work well

The first additional factor aligns with the concern about quality issues, which was an existing factor not chosen by the participant. Both items have to do with the content being offered in distance education courses as well. Previous studies have indicated that some courses are a better fit for distance education than others, including more foundational courses such as history, finance, economics, language arts, and social sciences courses (Kern, 2010; Koeing, 2010; MacKeogh & Fox, 2009). This might indicate that marketing of distance education to students is equally as important as marketing them to faculty to encourage participation. It might be interesting to see if there is a correlation between inhibiting factors identified by non-participating students compared to inhibiting factors identified by non-participating students.

One of the questions within the study asked non-participating faculty why they have not participated when asked. Additional reasons to non-participation included no support from department or college Dean to establish a new course, too much initial time commitment, and no funding for developing the distance education course. Since faculty participants seem to be concerned with the monetary motivational factors, these comments from non-participants around the funding for distance programs align with other studies (Cook, Ley, Crawford, & Warner, 2009; Oskia, Johnson, & Buteau, 2009; Shea, 2007; Shifter, 2000). One or two additional comments also indicated that while the faculty member did not want to teach a distance education course, the respondent indicated interest in supplementing a face-to-face course with video lectures and other like distance education technologies to make content available to a wider audience for

commuting students or for classes that are located off campus. Shifler (2000), Shea (2007), and Schulte (2010) recognize that faculty considers distance education courses to be challenging and consideration to student and faculty needs alike is important to the success of distance education programs. One non-participating faculty member recommended that instead of asking if UNT should reward faculty differently, the question should be separated into two ideas: whether the faculty should be treated differently professionally or treated differently financially, indicating that there is a perception of disparate treatment around both concepts. From the administrator's perspective, several comments were offered that financial incentives and encouragement were needed to promote faculty participation.

Another question asked if there were any career advantages for faculty involvement in distance learning. Out of 87 respondents, 7% said yes, 48% said no, and 45% were not sure. Of the advantages offered in comments, responses included internal grants being available, recognition for being modern, overall less preparation time for courses once they are developed, and opportunity for those who can teach online to avoid current, long-term construction and traffic problems in North Texas.

Additional comments included the need for face-to-face discussions or other activities found in disciplines such as music theory and chemistry where hands-on activities are involved and feel that distance education courses would not offer the same experience necessary for the student to learn the course objectives. One respondent went as far to explain that "forming intimate relationships as a guide/mentor is difficult" and alludes to the idea that this relationship is difficult in a lecture hall model in addition to the distance learning model. Along those same lines, one non-participating

respondent's comment is that critical thinking skills cannot be learned or demonstrated in distance learning courses.

One study conducted by O'Lawrence speaks to the idea that there is need for classroom experiences in addition to distance education in a "hybrid" (2007) format to support different learners. Comments within this study align with those ideas in addition to some UNT faculty member perceptions that distance education works for some programs, and is fine for undergraduate courses, but that graduate courses should be more face-to-face, moving the model away from content-driven to degree-level specific. Another faculty comment centers on the non-participant's perception that the university has backed off the push to distance learning and instead is now promoting an appreciated, balanced approach. This balanced approach, or at least an approach that offers this hybrid approach of part classroom and part distance education continues to have support in secondary education (Main & Dziekan, 2012).

Other comments centered on student cheating on exams offered in distance education courses. While proctored exams are offered in face-to-face courses, not being able to determine if the student completing the online exam was truly the student listed on the grade roster is a concern for a number of faculty respondents. One comment referenced the quality of learning outcomes of distance education courses and that the online work and exams do not reflect the students master of the course materials.

H₀4: There is no statistically significant difference between rewards and compensation that participants identified as motivators and the lack of

rewards and compensation that nonparticipants perceived as barriers to participation in distance education.

While each item indicated a statistically significant relationship between rewards and compensation that participants identified as motivators and lack of corresponding rewards and compensation non-participants identified as inhibitors to participation in distance education, the wording of the question and responses could cause interpretation to be different between participants and non-participants. This comparison might be similar to comparing flavor of a red apple to a green apple. While both are apples, the color can cause the end flavor results to be different.

Table 18 shows the question and responses for both non-participating inhibitors and participating motivators for easy comparison.

Table 18
Comparison of Non-Participating Faculty Inhibitor Response Wording and Participating Faculty Motivator Response Wording

Item	Participant Question and Motivators	Item	Non-Participant Question and Inhibitors
	For faculty who currently are participating or previously have participated in distance learning, rate the extent to which you agree the factors listed below have motivated you to participate in distance learning (strongly agree through strongly disagree).		For faculty who have never participated in distance learning, rate 1-5 the extent to which you agree the factors listed below would inhibit your participation in distance learning (strongly agree through strongly disagree).
4	Reduced teaching load	1	Concern about faculty workload
9	Increase in salary	18	Lack of salary increase
12	Monetary support for participation (e.g. stipend, overload)	15	Lack of monetary support for participation (e.g. stipend, overload)
16	Professional prestige and status	6	Lack of professional prestige

17	Grants for materials/expenses	9	Lack of grants for materials/expenses
22	Credit toward promotion and tenure	19	Lack of credit toward tenure and promotion
23	Release time	5	Lack of release time
25	Merit pay	12	Lack of merit pay
26	Royalties on copyrighted materials	14	Lack of royalties on copyrighted materials
29	Recognition and awards	17	Lack of recognition and awards

For example, the wording difference between teaching load and faculty workload could be misinterpreted to include or not include both teaching work and other efforts included in the faculty role, such as research, new course development, student mentoring, and other such non-teaching workload efforts. As a result, this interpretation difference could cause the statistically significant difference to not be attributed just to the identified factors and could call the validity of the question and responses into question.

The statistically significant relationship around this hypothesis continues to reinforce previous studies (Berge, 2002; Chen, 2009; Cook, Ley, Crawford, & Warner, 2009; Dooley, 2002; Graham, 2011; Green, Alejandro, & Brown, 2009; MacKeogh, 2009; O'Quinn, 2002; Osika, Johnson, & Buteau, 2009; Panda & Mishra, 2007; Shea, 2007) on rewards, incentives, and compensation and the need for regular review of compensation offerings to faculty.

Ho5: There is no statistically significant difference between the top factors that Hebert's faculty non-participants identified as barriers to participation in

distance education and the factors that faculty non-participants identified as barriers to participation in distance education in this study.

The results of this study indicate there was a statistically significant relationship (see Table 11 on page 34 for the statistical findings) between the top four ranked barriers identified by non-participating faculty in Hebert's study and the corresponding barriers identified by non-participating faculty in this study. The top ranked factors that non-participating faculty in this study identified as inhibitors to their participation in distance education were considerably different from the top ranked factors identified by non-participating faculty in Hebert's study. Hebert's study showed that course quality, workload, release time, and then monetary support were important. In this study, technical background, recognition and awards, negative peer experiences, and professional prestige were higher ranked factors in this study.

Ho6: There is no statistically significant difference between top ranked factors that administrators identified as barriers to faculty participation in distance education in Hebert's study and the top ranked factors that administrators identified as barriers to faculty participation in distance education in this study.

The results of this study indicated there was a statistically significant relationship (see Table 12 on page 35 for the statistical findings) between the top ranked barriers identified by administrators in this study and top ranked barriers identified by administrators in Hebert's study. Hebert's study identified administrator's perceptions of high-ranking barriers to faculty participation in distance education were concerned with workload, release time, credit toward tenure and promotion, and monetary support for

participation. In this study, the other inhibiting factors not listed as selectable options, recognition and awards, training, and technical support were considered to be the top barriers ranked by administrators to faculty participation in distance education.

Recommendations

While conducting the study, several ideas and thoughts surfaced indicating additional research was needed in a few areas.

1. UNT leaders should explore what is currently being promoted as incentives within different colleges and departments and compare against each other. Participants were asked in the study if there were career advantages to involvement in distance education. Only 7% agreed that there were advantages to participation in distance education. A surprising 48% of survey respondents indicated that there were no career advantages to participating in distance education. The remaining 45% were not sure if there was an advantage to participating in distance education. The idea that this large percent of both faculty and administrators do not see or understand the advantages of participation tells us that either participation needs to be recognized or the rewards should be communicated to all faculty and deans.

As non-participating faculty at UNT identified the lack of recognition and rewards, and lack of professional prestige, as high-ranked barriers to participation in online learning, additional studies can be conducted to determine different strengths and weaknesses to promote the stronger aspects of incentives, recognition, and rewards across all colleges. Are the incentives, recognition, and rewards the same across all colleges, or are different academic departments handling things differently? Additional questions that might be explored include: Are perceptions different

because the way distance education is being managed is different when cross-departmental conversations occur? If colleges or departments are handling the encouragement of participation differently, how are they different? What are the participating and non-participating faculty member perceptions? Which program is working well and why? This exploration of current incentives being offered can result in faculty renewed interest in and to encourage faculty participation in distance education across the entire university.

As noted in the discussion of the second hypothesis on page 40, this study identified that faculty identified more extensive, compensative motivators such as monetary support, and an increase in salary than in Hebert's study in 2003. These identified factors support other studies (Berge, 2002; Chen, 2009; Cook, Ley, Crawford, & Warner, 2009; Dooley, 2002; Graham, 2011; Green, Alejandro, & Brown, 2009; MacKeogh, 2009; O'Quinn, 2002; Osika, Johnson, & Buteau, 2009; Panda & Mishra, 2007; Shea, 2007) and from Schifter who identified a compensation as a strong motivating factor to faculty participation in distance education (2000). With this information, the idea that administrators at UNT see high-ranked, faculty compensation motivators, like salary increases and merit pay, being of lower importance. In this study, of 35 ranked factors, administrators ranked salary at 31 and merit pay at 33, in the lowest ranking bracket. This disparity can cause faculty dissatisfaction and general tension feeling that administrators are not listening to faculty needs. Universities need to be aware of this dichotomy and evaluate faculty perceptions. UNT leadership should align administrator's grasp of faculty needs and preferences as they define future strategies for the university as a

whole in terms of distance education and faculty-supporting programs. As universities strive to find the right balance between distance education and classroom learning, assuring the motivational needs of faculty are heard and used within these strategies is critical to the success of any learning program.

2. UNT already offers a number of services to assist faculty with some of the faculty-identified barriers: consulting, assessment and evaluation, course production, course delivery environment assistance, videoconferencing instruction, and teaching technology instruction. As non-participating faculty identified lack of technological background as the highest ranked reason for not participating in distance education, the University of North Texas CLEAR leaders might consider that more marketing might be needed for non-participating faculty to assist with their perception of available services to assist them with learning more about technology to support participation in distance education.

Another high-ranking barrier is the presence of negative comments made by colleagues about distance learning and teaching experiences. UNT leadership might consider finding a common environment where experienced distance educators can share experiences and potentially offer mentoring services to those faculty interested in teaching distance courses. This community of practice, if you will, is one way to share the experiential lessons of current distance educators and potentially reduce any learning curve for novice distance faculty. Within James Wright's motivational study, he found negative perceptions as well and recommended that experiences be provided where faculty could experience "high-

quality, online instruction” (Wright, 2014) themselves and, in this way, potentially improve perceptions of distance education in general.

3. Interestingly, while one non-participating faculty felt that a dedicated designer should develop a class so the faculty member would not need release time to develop the course, an opposing opinion was that a non-designer instructor should not be evaluated poorly for a course that was designed by someone else. Several comments in along these lines seem to indicate that faculty are not engaged in working with a developer when a course is developed. Additional exploration should be made around how distance education courses are developed – based on existing courses taught by a disparate set of faculty, or based on an agreed upon set of course objectives and activities that support learning of those objectives.
4. Future researchers should consider adding adjunct faculty as part of future studies. According to Belkin and Korn, universities are hiring more adjunct faculty instead of using tenured professors to reduce expenses (2015). While this was a comparative study where the variables needed to be similar to the original study, exploring the perceptions of motivators and barriers of adjunct faculty in comparison to full-time faculty might identify barriers that are different from the ones found in this and previous studies (Betts, 1998; Hebert, 2003). The exploration of the participating and non-participating adjunct faculty perceptions, or those faculty that are working part-time, for comparison as these faculty members are becoming more prevalent within most universities. Including adjunct faculty also might allow for an assessment of potential training needs for adjunct faculty in distance education in comparison to the population of this study. Along the same lines, research should be conducted to see

if faculty perceive that adjunct are treated differently in terms of rewards and benefits when participating in distance education. While the first recommendations called for the review of all recognition and rewards for participation, looking into how faculty perceive each other (full-time versus adjunct) and how that might impact the willingness to participate in distance education and other programs promoted by the university.

5. Within the literature review, little information was found regarding the use of social media as a barrier or motivator to participation in distance education. Students are more and more integrated within social media such as Facebook, SnapChat, Twitter and others. One article (Roblyer et al., 2010) goes as far as to indicate that students are more likely to use Facebook than faculty. As this research only compares student participation in Facebook against faculty participation in Facebook, additional research should be conducted to determine if the integration of social media within distance education would be perceived as a barrier or inhibitor to faculty participation in distance education. While different teaching interactions are used and promoted by CLEAR, is the use of social media an interaction or activity that should be considered in distance education? Is there a correlation between faculty participation and any form of social media being used within a distance education course?
6. While students are asked to evaluate teaching effectiveness (University of North Texas, 2015) to assist with the measurement of instructional effectiveness, there is no current, visible connection between faculty effectiveness and faculty participation in distance education. Within the evaluation process, is consideration of whether the

course being taught is face-to-face versus distance a factor to the evaluations provided on faculty? Are faculty evaluations different for those who teach both face-to-face and distance courses?

7. Comments provided within this study indicate that faculty are starting to look more strategically at distance education such as thoughts that distance education increases enrollment, as it attracts remote student participation, and allows more classes to make. This type of comment makes one wonder if enrollment has increased as a result of distance education offerings or if any increase in enrollment could be attributed to other factors.

In conclusion, while this study is significant as it adds to the collection of analysis performed around the perceptions of barriers to faculty participation in distance education and offers a current view into the motivators and barriers to participation at UNT, additional research can be conducted to provide a more focused view on a number of topics.

Summary

This study was conducted to identify perceived barriers of faculty participation in distance education at a four-year university that are present today and compare the differences between these present barriers and those identified in a previous 2003 study. In summary, there were no statistically significant relationships found between faculty demographics including gender, age, position at the university, tenure status, and number of years faculty have taught in post-secondary education. Statistically significant relationships were found between the faculty-ranked motivators and corresponding administrator-identified motivators. There were no statistically significant

relationships found between the top administrator-ranked motivators and corresponding faculty-ranked motivators. Out of the top four non-participating, faculty-ranked barriers, three were found to have statistically significant relationships with the corresponding administrator-ranked barriers. There were no statistically significant relationships found between the top administrator-ranked inhibitors and the corresponding faculty-ranked inhibitors. There were statistically significant relationships between the top ranked barriers identified by non-participating faculty and administrators in Hebert's study compared to non-participating faculty-ranked and administrator-ranked barriers identified in this study.

The faculty and administrator-ranked barriers continue to support the barriers identified within the initial literature review. From these results shown in Tables 6 through 9, administrators and faculty have different perceptions of importance of factors that inhibit faculty participation and factors that motivate faculty participation. High-ranked faculty-identified motivators had corresponding low-rankings by administrators. The differences are great (faculty ranked 1-4 and administrator ranked between twenty-ninth and thirty-fifth in the rankings list). Faculty factors for recognition and rewards, along with professional prestige, should be reviewed to ensure that faculty, who currently teach distance education, are seen as significant to the university's distance education programs. Combined with the comments, additional research should be conducted to explore the reasons behind these ranking differences. As a result of that exploration, communication or additional education around the benefits of distance education can be provided to faculty and administrators alike.

Chapter five provided a discussion of the findings and recommendations for additional research.

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APPENDIX A: SURVEY PERMISSION CORRESPONDENCE

Re: Instrumentation Reproduction Permission

Jann <jghjlm@centurylink.net>
To: Elizabeth Bailey <bethbailey6@gmail.com>

Fri, Dec 11, 2015 at 5:19 PM

Beth,
Yes, you have my permission to reprint excerpts from my dissertation and reproduce the instrumentation as requested in your email below.
Best of luck to you.
Janet Hebert, PhD

Sent from my iPhone

On Dec 10, 2015, at 4:47 PM, Elizabeth Bailey <bethbailey6@gmail.com> wrote:

Hello,

I have been asked to change the wording for my request. Please respond to this email and not the previous one.

Hello, Dr. Hebert,

I previously requested and received your permission to reprint in my dissertation excerpts from your paper: Hebert, J. G. (2003, May). Perceived Barriers to Faculty Participation in Distance Education at a 4-Year University. (Doctoral dissertation, University of North Texas, 2003). Retrieved from <http://www.sageperformance.com/drjeffallen/Dissertation-Example/JannHebert.pdf>

In addition, I would also like to confirm your permission to reproduce your instrumentation.

The same information applies to this request in that the requested permission extends to any future revisions and editions of my dissertation to the electronic publication of my dissertation by the University of North Texas. University of North Texas may supply copies of my dissertation on demand. These rights will in no way restrict republication of the material in any other form by you or by others authorized by you. Your signing of this letter will also confirm that you own the copyright to the above-described material.

Would you please reply with confirmation of your approval to also reproduce your instrumentation?

Thank you very much.

August 23, 2009

Janet Hebert
Po Box 804
Silverton, CO 81433-0804

Dear Dr. Hebert:

I am a graduate student at UNT and am interested in replicating your study, Perceived Barriers to Faculty Participation in Distance Education at a 4-Year University. I would like your permission to reprint in my dissertation excerpts from your paper: Hebert, J. G. (2003, May). Perceived Barriers to Faculty Participation in Distance Education at a 4-Year University. (Doctoral dissertation, University of North Texas, 2003). Retrieved from <http://www.sageperformance.com/drjeffallen/Dissertation-Example/JannHebert.pdf>

The requested permission extends to any future revisions and editions of my dissertation to the electronic publication of my dissertation by the University of North Texas. University of North Texas may supply copies of my dissertation on demand. These rights will in no way restrict republication of the material in any other form by you or by others authorized by you. Your signing of this letter will also confirm that you own the copyright to the above-described material.

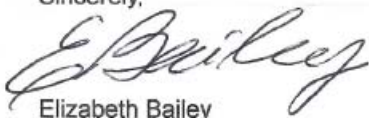
If these arrangements meet with your approval, please print this letter, sign where indicated below and return it to me to:

Elizabeth Bailey
6017 Rock Cove
Flower Mound, TX 75028

Also, I would love to stay in touch with you during the process of completing my research. Please let me know if it is acceptable to continue to stay in touch by email or telephone by providing me with both your email address and phone numbers.

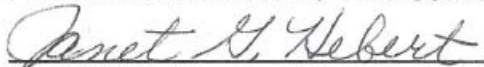
Thank you very much.

Sincerely,



Elizabeth Bailey

PERMISSION GRANTED FOR THE USE REQUESTED ABOVE:



Janet G. Hebert

Date: 3 September 2009

APPENDIX B: INSTRUMENTATION CHANGES BETWEEN 2003 STUDY AND 2014 STUDY

Comparison of Question Wording Used by Hebert Versus This Study

Table 19

Comparison of Question Wording Used by Hebert Versus This Study

Hebert Question Wording	New Question Wording
Where do you teach your courses? Check all that apply. Denton () UNTSC () General Metroplex () Other Metro Sites () Other Locations ()	Where do you teach your courses? Check all that apply. Denton () HSC () Dallas () Discovery Park () Online () Other location(s) ()
Please identify the types of technologies you currently use to support your courses/to interact with students, administrators, and other faculty: Check the box to the right of all that apply. E-mail () Listservs () Telephone () Fax () Two-way interactive videoconferencing () Two-way online computer conferencing (e.g. CU-SeeMee , Net Meeting () Interactive CD-ROM programs () Videotapes () Audiotapes () Computer-based technology (e.g. Internet – World Wide Web , Bulletin Board) Other	Please identify the types of technologies you currently use to support your courses/to interact with students, administrators, and other faculty: Check all that apply. E-mail () Listservs () Telephone () Fax () Two-way interactive videoconferencing () Two-way online computer conferencing, such as NetMeeting () Interactive CD-ROM programs () Videotapes () Audiotapes () Blackboard Learn () Other computer-based technology, such as social media () Other () Specify Other _____ (if selected)
What delivery systems are you using or have you used while teaching distance education courses? Check all that apply. Two-way audio/visual interactive conferencing Two-way audio, one-way video conferencing One-way live video Cable TV One-way prerecorded video Audiographics Two-way audio (e.g., phone conferencing) Two-way online computer conferencing (e.g., CU-SeeMe , Net Meeting) Computer-based technology (e.g., Internet – World Wide Web, Bulletin Board)	What delivery systems are you using or have used while teaching distance education courses? Check all that apply. Two-way audio/visual interactive videoconferencing () Two-way audio, one-way video conferencing () One-way live video () One-way pre-recorded video (e.g. YouTube) () Two-way audio (e.g. phone conference) () Two-way online computer conferencing (e.g. Net Meeting) () Blackboard Learn () Other computer-based technology (e.g. social media) () Other () Specify Other _____ (if selected)
Would you be interested in participating in faculty development programs that focus on distance learning training? Yes () No () If yes, please specify topics of interest. Check all that apply. Two-way audio/visual interactive conferencing Two-way audio, one-way video conferencing One-way live video Cable TV One-way prerecorded video Audiographics	Would you be interested in participating in faculty development programs that focus on distance learning training? Yes () No () If yes, please specify topics of interest. Check all that apply. Two-way audio/visual interactive videoconferencing () Two-way audio, one-way video conferencing () One-way live video () One-way pre-recorded video (e.g. YouTube) () Two-way audio (e.g. phone conference) () Two-way online computer conferencing (e.g. Net Meeting) ()

Two-way audio (e.g., phone conferencing) Two-way online computer conferencing (e.g., CU-SeeMe , Net Meeting) Computer-based technology (e.g., Internet – World Wide Web, Bulletin Board)	Blackboard Learn () Other computer-based technology (e.g. social media) () Other () Specify Other _____ (if selected)
Have you ever been asked to: (a) teach a distance learning course? Yes () No () (b) design a distance learning course? Yes () No () If you answered yes to either of the above, please specify why you did not get involved. _____	Have you ever been asked to: teach a distance learning course? Yes () No () If you Yes, why did you not get involved? _____ design a distance learning course? Yes () No () If you Yes, why did you not get involved? _____
What is your age? Under 30 years old () 30-45 years old () 45+ years old ()	What is your age? 18-30 () 31-44 () 45+ ()
Please identify the types of technologies you currently use to support your courses/to interact with students, administrators, and other faculty: Check the box to the right of all that apply. E-mail Listservs Telephone Fax Two-way interactive videoconferencing Two-way online computer conferencing (e.g., CU-SeeMe , Net Meeting) Interactive CD-ROM programs Videotapes Audiotapes Blackboard Learn Computer-based technology (e.g., Internet – World Wide Web, Bulletin Board)	Please identify the types of technologies you currently use to support your courses/to interact with students, administrators, and other faculty: Check all that apply. E-mail () Listservs () Telephone () Fax () Two-way interactive videoconferencing () Two-way online computer conferencing, such as NetMeeting () Interactive CD-ROM programs () Videotapes () Audiotapes () Blackboard Learn () Other computer-based technology, such as social media () Other () Specify Other _____ (if selected)
Would you be interested in participating in faculty development programs that focus on distance learning training? Yes () No () If yes, please specify topics of interest. Check all that apply. Two-way audio/visual interactive conferencing Two-way audio, one-way video conferencing One-way live video Cable TV One-way prerecorded video Audiographics Two-way audio (e.g., phone conferencing) Two-way online computer conferencing (e.g., CU-SeeMe , Net Meeting) Computer-based technology (e.g., Internet – World Wide Web, Bulletin Board)	Would you be interested in participating in faculty development programs that focus on distance learning training? Yes () No () If yes, please specify topics of interest. Check all that apply. Two-way audio/visual interactive videoconferencing () Two-way audio, one-way video conferencing () One-way live video () One-way pre-recorded video (e.g. YouTube) () Two-way audio (e.g. phone conference) () Two-way online computer conferencing (e.g. Net Meeting) () Blackboard Learn () Other computer-based technology (e.g. social media) () Other () Specify Other _____ (if selected)

APPENDIX C: INFORMED CONTENT FORM – FACULTY AND DEANS/CHAIRPERSONS

Informed Content Notice

You may keep this form for your records.

Participation in this survey is voluntary.

Participants must be 18 years of age or older to participate in this study.

Before agreeing to participate in this research study, it is important that you read and understand the following explanation of the purpose, benefits and risks of the study and how it will be conducted.

Title of Study: Replication of Perceived Barriers to Faculty Participation in Distance Education at a 4-Year University Study

Student Investigator: Elizabeth Bailey, University of North Texas (UNT) Department of Learning Technologies. **Supervising Investigator:** Dr. Jeff Allen

Purpose of the Study: You are being asked to participate in a research study that involves exploration of faculty-perceived barriers to faculty participation in distance education courses in a 4-year university.

Study Procedures: You will be asked to answer questions regarding your current and previous level of participation in distance learning, rating of motivating factors, rating of inhibitors, distance learning background and regarding your demographics that will take about 15 minutes of your time.

Foreseeable Risks: No foreseeable risks are involved in this study. However, you may feel emotionally uneasy when asked to rank your perceptions of motivating and inhibiting factors to your participation in distance education.

Benefits to the Subjects or Others: This study is not expected to be of any direct benefit to you, but researchers hope to learn more about the current perceptions of motivating and inhibiting factors to your participation in distance education. Results from the study will be available to educators and administrators to assist them in eliminating any perceived barriers.

Compensation for Participants: There is no compensation for respondents, and participation in this study is voluntary.

Procedures for Maintaining Confidentiality of Research Records: Confidentiality will be maintained to the degree possible given the technology and practices used by the online survey company. Your participation in this online survey involves risks to confidentiality similar to a person's everyday use of the internet. Data records will be stored on the UNT campus. You are assured of completed confidentiality. Please do not put or indicate your name on the questionnaire. The confidentiality of your individual information will be maintained in any publications or presentations regarding this study.

Questions about the Study: If you have any questions about the study, you may contact Elizabeth Bailey at 972-724-8881 or Dr. Jeff Allen at Jeff.Allen@unt.edu.

Review for the Protection of Participants: This research study has been reviewed and approved by the UNT Institutional Review Board (IRB). The UNT IRB can be contacted at (940) 565-3940 with any questions regarding the rights of research subjects.

Research Participants' Rights:

Clicking Yes to the question indicates that you have read all of the above and that you confirm all of the following:

- Elizabeth Bailey has explained the study to you and you have had an opportunity to contact him/her with any questions about the study. You have been informed of the possible benefits and the potential risks of the study.
- You understand that you do not have to take part in this study, and your refusal to participate or your decision to withdraw will involve no penalty or loss of rights or benefits. The study personnel may choose to stop your participation at any time.
- You understand why the study is being conducted and how it will be performed.
- You understand your rights as a research participant and you voluntarily consent to participate in this study.
- You understand you may print a copy of this form for your records.

I have read, understood, and printed a copy of, the above consent form and desire of my own free will to participate in this study.

Yes () No () (If no selected, Then Skip to the End of the Survey)

APPENDIX D: SURVEY INSTRUMENT – FACULTY

University of North Texas 2015 Faculty Self-Study

Are you currently participating, or previously have participated in distance learning?

Yes () (If Yes, Skip to Faculty Self-Assessment – Distance Learning Participant)

No () (If No, Skip to Distance Learning Background – No Distance Learning Participation)

I. FACULTY SELF-ASSESSMENT – DISTANCE LEARNING PARTICIPANT

For faculty who currently are participating or previously have participated in distance learning, rate 1-5 the extent to which you agree the factors listed below have motivated you to participate in distance learning, where 1 = strong agree and 5 = strongly disagree).

	Statements	5 - Strongly agree	4 - Agree	3 - Neutral	2 - Disagree	1 - Strongly Disagree
1.	Personal motivation to use technology					
2.	Prior technological background					
3.	Opportunity for scholarly pursuit					
4.	Reduced teaching load					
5.	Opportunity to use personal research as a teaching tool					
6.	Required by department					
7.	Support and encouragement from dean or chair					
8.	Working conditions (e.g. hours, location)					
9.	Increase in salary					
10.	Opportunity to influence social change					
11.	Job security					
12.	Monetary support for participation (e.g. stipend, overload)					
13.	Expectation by university that faculty participate					
14.	Opportunity to develop new ideas					
15.	Visibility for jobs at other					

	institutions/organizations					
16.	Professional prestige and status					
17.	Grants for materials/expenses					
18.	Support and encouragement from departmental colleagues					
19.	Intellectual challenge					
20.	Overall job satisfaction					
21.	Technical support provided by the institution					
22.	Credit toward promotion and tenure					
23.	Release time					
24.	Distance learning training provided by institution					
25.	Merit pay					
26.	Royalties on copyrighted materials					
27.	Greater course flexibility for students					
28.	Opportunity to diversify program offerings					
29.	Recognition and awards					
30.	Ability to reach new audiences that cannot attend classes on campus					
31.	Opportunity to improve my teaching					
32.	Support and encouragement from institution administrators					
33.	Enhanced quality of courses					
34.	Increased quality of students					
35.	Please list any additional motivating factors:					

II. DISTANCE LEARNING BACKGROUND – DISTANCE LEARNING PARTICIPANT

- How many years have you been involved in distance learning? Started this semester () 1 year () 2 - 5 years () 6 - 9 years () 10 + years ()
- What has your involvement in distance learning included? *Check all that apply.*
Teaching courses () Designing courses () Providing consultation

3. What delivery systems are you using or have used while teaching distance education courses? *Check all that apply.*

Two-way audio/visual interactive videoconferencing () Two-way audio, one-way video conferencing () One-way live video () One-way pre-recorded video (e.g. YouTube) () Two-way audio (e.g. phone conference) () Two-way online computer conferencing (e.g. Net Meeting) () Blackboard Learn () Other computer-based technology (e.g. Internet – World Wide Web, bulletin board, social media) () Other () Specify Other _____ (if Other selected)

4. Do you teach distance learning courses while teaching traditional courses during the academic year? Yes () No ()

5. Are you currently teaching courses via distance learning for companies, organizations, or programs outside of the University of North Texas? Yes () No ()

If yes, what delivery systems are you using? _____

6. Would you be interested in participating in faculty development programs that focus on distance learning training? Yes () No ()

If yes, please specify topics of interest. *Check all that apply.*

Two-way audio/visual interactive videoconferencing () Two-way audio, one-way video conferencing () One-way live video () One-way pre-recorded video (e.g. YouTube) () Two-way audio (e.g. phone conference) () Two-way online computer conferencing (e.g. Net Meeting) () Blackboard Learn () Other computer-based technology (e.g. social media) () Other () Specify Other _____ (if selected)

Continue to question V, Faculty Response.

III. FACULTY SELF-ASSESSMENT – NO DISTANCE LEARNING PARTICIPATION

For faculty who have never participated in distance learning, rate 1-5 the extent to which you agree the factors listed below would inhibit your participation in distance learning, where 1 = strongly agree and 5 = strongly disagree).

	Statements	5 - Strongly agree	4 - Agree	3 - Neutral	2 - Disagree	1 - Strongly Disagree
1.	Concern about faculty workload					
2.	Negative comments made by colleagues about distance learning teaching experiences					
3.	Lack of distance learning training provided by the institution					
4.	Lac of support and encouragement from departmental colleagues					
5.	Lack of release time					
6.	Lack of professional prestige					
7.	Lack of technological background					
8.	Lack of support and encouragement from dean or chair					
9.	Lack of grants for materials/expenses					
10.	Concern about quality of courses					
11.	Lack of technical support provided by the institution					
12.	Lack of merit pay					
13.	Lack of support and encouragement from institution's administrators					
14.	Lack of royalties on copyrighted materials					
15.	Lack of monetary support for participation (e.g. stipend, overload)					
16.	Concern about quality of students					
17.	Lack of recognition and awards					
18.	Lack of salary increase					
19.	Lack of credit toward tenure and promotion					
20.	Other additional inhibiting factors: _____					

IV. DISTANCE LEARNING BACKGROUND – NO DISTANCE LEARNING PARTICIPATION

If you have never taught a distance learning course, please complete this section.

1. Have you ever been asked to:

a. teach a distance learning course? Yes () No ()

If you Yes, why did you not get involved? _____

b. design a distance learning course? Yes () No ()

If you Yes, why did you not get involved? _____

2. In which area of distance learning would you be interested in participating?

Check all that apply. None () Teaching () Co-teaching () Designing courses ()

3. Would you be interested in participating in faculty development programs that focus on distance learning training? Yes () No ()

If yes, please specify topics of interest. *Check all that apply.*

Two-way audio/visual interactive videoconferencing () Two-way audio, one-way video conferencing () One-way pre-recorded video (e.g. YouTube) () two-way audio (e.g. phone conference) () Two-way online computer conferencing (e.g. Net Meeting) () Blackboard () Other computer-based technology, such as social media () Other () Specify Other _____ (if selected)

4. Please specify what the University of North Texas could do to encourage you to participate in distance learning in the future?

Continue to question V, Faculty Response.

V. FACULTY RESPONSE

All faculty members, please answer the following questions.

1. What is your attitude toward distance learning instruction in postsecondary education? Positive () Negative () Neutral ()
2. If you have taught, co-taught, or designed distance learning courses in the past and are no longer doing so, please specify why you are no longer using this method of instruction.

3. Do you know what the stated policy of the University of North Texas is on its involvement in distance learning? Yes () No () Not sure ()
4. Have you, or do you plan on participating in seminars and workshops on distance learning provided by the University of North Texas? Yes () No ()
5. What opportunities for faculty development in distance learning, if any, should the University of North Texas offer?

6. Are there currently any career advantages for faculty involved in distance learning at the University of North Texas? Yes () No () Not sure ()
If yes, describe the advantages.

7. Should the University of North Texas reward faculty differently for involvement with distance learning than for traditional teaching and research? Yes () No ()

If yes, how?

8. Do you believe there is pressure to involve faculty in distance learning? Yes () No ()

If yes, where do you believe this pressure comes from?

9. Is there anything else you would like to say about distance learning?

VI. FACULTY DEMOGRAPHICS

Directions: Answer the following questions based on your **current** status at UNT.

1. Which level of student(s) do you teach? *Check all that apply.*

Undergraduate () Graduate () Certificate ()

2. Please indicate your gender: Male () Female ()

3. What is your age? 18-30 () 31-44 () 45+ ()

4. What is your position title at the University of North Texas?

Regents professor () Professor () Associate professor () Assistant professor ()

5. Are you tenured? Yes () No ()

If no, are you in a tenure-accruing position? Yes () No ()

6. Where do you teach your courses? *Check all that apply.*

Denton () HSC () Dallas () Discovery Park () Online () Other
location(s) ()

7. How many years have you been teaching at the University of North
Texas? ____

8. How many years have you been teaching in postsecondary education?

9. Have you taken any courses through distance learning? Yes () No ()

10. Have you taught a course through distance learning? Yes () No ()

If Yes, link to question 11. If No, link to Section III. Distance Learning
Background.

11. Please identify the types of technologies you currently use to support your
courses/to interact with students, administrators, and other faculty: *Check
all that apply.*

E-mail () Listservs () Telephone () Fax () Two-way interactive
videoconferencing () Two-way online computer conferencing, such as
NetMeeting () Interactive CD-ROM programs () videotapes ()
audiotapes () Blackboard () Other computer-based technology, such as
social media () Other () Specify Other _____ (if selected)

Thank you!

APPENDIX E: SURVEY INSTRUMENT – DEANS/CHAIRPERSONS

University of North Texas 2015 Deans/Chairpersons Self-Study

I. DISTANCE LEARNING BACKGROUND – DEANS/CHAIRPERSONS

Please complete this section.

1. How many distance learning courses are offered through your College/School/Department? None () 1 – 5 courses () 6 – 10 courses () 11- 19 courses () 20+ courses () Not sure ()
2. How many professors design distance learning courses in your College/School/Department? None () 1 – 5 professors () 6 – 10 professors () 11- 19 professors () 20+ professors () Not sure ()
3. Do you know how many faculty members in your College/School/Department teach distance learning courses outside of the UNT? Yes () No () Not sure () Not allowed ()
If yes, how many? _____
4. Does your College/School/Department offer formal training for distance learning instructions to faculty members? Yes () No () If yes, what kind of training?

5. Have you ever been asked to: *Check all that apply.*
 - a. Teach a distance learning course? Yes () No ()
If Yes, did you teach? Yes () No ()
 - b. Co-teach a distance learning course? Yes () No ()
If Yes, did you co-teach? Yes () No ()
 - c. Design a distance learning course Yes () No ()
If Yes, did you design a course? Yes () No ()

- d. If you were asked to teach, co-teach or design distance learning courses and you did not get involved, please specify why you chose not to get involved. _____
6. Have you ever contemplated teaching, co-teaching, or designing a distance learning course? Yes () No ()
- If yes, did you pursue this method of instruction? Yes () No ()
- If you did not pursue this method of instruction, please specify why. _____
- If you did pursue this method of instruction, please specify why. _____
7. In which area of distance learning would you be interested in participating?
Check all that apply. None () Teaching () Co-teaching () Designing Courses ()
8. Would you be interested in participating in faculty development programs that focus on distance learning training? Yes () No ()
- If yes, please specify topics of interest. *Check all that apply.*
- Two-way audio/visual interactive videoconferencing () Two-way audio, one-way video conferencing () One-way pre-recorded video (e.g. YouTube) () two-way audio (e.g. phone conference) () Two-way online computer conferencing (e.g. Net Meeting) () Blackboard () Other computer-based technology, such as social media () Other () Specify Other _____ (if selected)

II. FACULTY ASSESSMENT – MOTIVATORS

Please rate 1-5 the extent to which you agree the factors listed below would motivate the faculty in your College/School/Department to participate in distance learning, where 1 = strong disagree and 5 = strongly agree.

	Statements	5 - Strongly agree	4 - Agree	3 - Neutral	2 - Disagree	1 - Strongly Disagree
--	------------	--------------------------	--------------	----------------	-----------------	-----------------------------

1.	Personal motivation to use technology					
2.	Prior technological background					
3.	Opportunity for scholarly pursuit					
4.	Reduced teaching load					
5.	Opportunity to use personal research as a teaching tool					
6.	Required by department					
7.	Support and encouragement from dean or chair					
8.	Working conditions (e.g. hours, location)					
9.	Increase in salary					
10.	Opportunity to influence social change					
11.	Job security					
12.	Monetary support for participation (e.g. stipend, overload)					
13.	Expectation by university that faculty participate					
14.	Opportunity to develop new ideas					
15.	Visibility for jobs at other institutions/organizations					
16.	Professional prestige and status					
17.	Grants for materials/expenses					
18.	Support and encouragement from departmental colleagues					
19.	Intellectual challenge					
20.	Overall job satisfaction					
21.	Technical support provided by the institution					
22.	Credit toward promotion and tenure					
23.	Release time					
24.	Distance learning training provided by institution					
25.	Merit pay					
26.	Royalties on copyrighted materials					
27.	Greater course flexibility for students					
28.	Opportunity to diversify program offerings					
29.	Recognition and awards					
30.	Ability to reach new audiences that cannot attend classes on campus					
31.	Opportunity to improve my teaching					
32.	Support and encouragement from institution administrators					
33.	Enhanced quality of courses					
34.	Increased quality of students					

Please list any additional factors what would motivate your faculty to participate in distance learning. _____

III. FACULTY ASSESSMENT – INHIBITORS

Please rate 1 to 5 the extent to which you agree the factors listed below would inhibit the faculty in your College/School/Department to participate in distance learning, where 1 = strongly disagree and 5 = strongly agree).

	Statements	5 - Strongly agree	4 - Agree	3 - Neutral	2 - Disagree	1 - Strongly Disagree
1.	Concern about faculty workload					
2.	Negative comments made by colleagues about distance learning teaching experiences					
3.	Lack of distance learning training provided by the institution					
4.	Lac of support and encouragement from departmental colleagues					
5.	Lack of release time					
6.	Lack of professional prestige					
7.	Lack of technological background					
8.	Lack of support and encouragement from dean or chair					
9.	Lack of grants for materials/expenses					
10.	Concern about quality of courses					
11.	Lack of technical support provided by the institution					
12.	Lack of merit pay					
13.	Lack of support and encouragement from institution's administrators					
14.	Lack of royalties on copyrighted materials					
15.	Lack of monetary support for participation (e.g. stipend, overload)					
16.	Concern about quality of students					
17.	Lack of recognition and awards					
18.	Lack of salary increase					
19.	Lack of credit toward tenure and promotion					
20.	Other additional motivating factors: _____					

Please list any additional factors that you believe would inhibit your faculty from participating in distance learning. _____

IV. DEANS' AND CHAIRPERSONS' RESPONSE

Please answer the following questions.

1. What is your attitude toward distance learning instruction in postsecondary education? Positive () Negative () Neutral ()
2. Do you know what the stated policy of the University of North Texas is on its involvement in distance learning? Yes () No () Not sure ()
3. What do you think the UNT policy on distance learning should be?

4. Have you, or do you plan on participating in seminars and workshops on distance learning provided by the University of North Texas? Yes () No ()
5. What opportunities for faculty development in distance learning, if any, should the University of North Texas offer?

6. If there were definite career advantages for becoming involved in distance learning, do you believe it would make any difference to you? Yes () No ()
7. Do you think faculty academic standing should be advantaged by extensive involvement in distance learning? Yes () No ()
If yes, how?

-
8. Are there currently any career advantages for faculty involved in distance learning at the UNT? Yes () No () Not sure ()

If yes, describe the advantages.

9. Should the University of North Texas reward faculty differently for involvement with distance learning than for traditional teaching and research? Yes () No ()

If yes, how?

10. What do you believe the UNT could do to get faculty to participate in distance learning in the future?
-

11. Do you believe there is pressure to involve faculty in distance learning? Yes ()

No ()

If yes, where do you believe this pressure comes from?

12. Is there anything else you would like to say about distance learning?
-
-

V. DEAN AND CHAIRPERSONS' DEMOGRAPHICS

Directions: Answer the following questions based on your **current** status at UNT.

1. In which college/school are you Dean or Chairperson?

College of Arts & Sciences () College of Business () College of Education ()
College of Engineering () College of Information () College of Merchandising,
Hospitality and Tourism () College of Music () College of Public Affairs &
Community Service () College of Visual Arts and Design () Honors College ()
Libraries () School of Journalism () Texas Academy of Mathematics and
Science () Toulouse School of Graduate Studies () Other _____

2. What is your age? 18-30 () 31-44 () 45+ ()

3. Please indicate your gender: Male () Female ()

4. Do you teach any courses at the University of North Texas? Yes () No ()

If so, how many courses do you teach during the academic year? _____

5. How many years have you been working at the University of North Texas? _____

6. How many years have you been a dean/chairperson at the UNT? _____

7. How many years have you been working in postsecondary education? _____

8. Have you taken any courses through distance learning? Yes () No ()

9. Have you taught a course through distance learning? Yes () No ()

10. Please identify the types of technologies you currently use to support your

courses/to interact with students, administrators, and other faculty: *Check all that apply.*

E-mail () Listservs () Telephone () Fax () Two-way interactive

videoconferencing () Two-way online computer conferencing, such as

NetMeeting () Interactive CD-ROM programs () videotapes () audiotapes ()

Blackboard Learn () Other computer-based technology, such as social media ()

Other () Specify Other _____ (if selected)

Thank you!

APPENDIX F: EMAIL INCLUDING SURVEY LINK

Email

Sent on behalf of my doctoral student:

Dear UNT Faculty Member, Dean, Chairperson, or Administrator:

I am a doctoral student with Learning Technologies working toward my degree in Applied Technology & Performance Improvement at the University of North Texas. I am conducting a survey of all full-time UNT faculty, chairpersons and deans to determine the perceived barriers to faculty participation in distance education.

Why should you help? As universities continue to provide online educational services to students seeking higher education, universities must ensure they are meeting the needs of faculty. This study can help identify barriers present in today's environment that can be provided to UNT so that potentially changes can be made to better support you. Results are expected to be used for feasibility studies and planning intervention strategies relating to distance education.

In addition, at the end of the survey, you may provide your name and email address for a chance to win a \$20 Amazon gift card.

I invite you to assist me with this research project by completing the survey found in UNT's Qualtrics survey tool at
https://unt.az1.qualtrics.com/SE/?SID=SV_2oFWTOk7tGOWSyN.

Approximately 15 minutes is required to complete the survey.

Please Remember:

- Your participation in this study is voluntary.
- All of your responses will remain confidential.
- Please complete the instrument by May 27.

Please address any questions to me at 972-724-8881 or by email at elizabethbailey@my.unt.edu.

Thank you for your time and participation..

Sincerely,
Elizabeth Bailey
6017 Rock Cove
Flower Mound, TX 75028

**APPENDIX G: TABLE 20 COMPARISON OF COMPLETE LIST OF MOTIVATORS AS RANKED BY
FACILTY AND ADMINISTRATORS**

Table 20*Comparison of Complete List of Motivators as Ranked by Faculty and Administrators*

Item	Ranked by Faculty	Rank by Administrators	Faculty Mean	Administrator Mean
9	1	31	4.33	2.12
23	2	35	4.28	1.88
25	3	33	4.16	2.06
4	4	29	4.12	2.12
12	5	34	4.09	1.94
29	6	13	4.09	2.82
11	7	17	3.88	2.65
22	8	28	3.84	2.18
10	9	2	3.79	3.35
17	10	15	3.79	2.76
16	11	1	3.74	3.35
26	12	24	3.67	2.47
34	13	4	3.67	3.18
18	14	11	3.65	2.82
5	15	19	3.63	2.59
15	16	5	3.58	3.12
24	17	26	3.49	2.35
32	18	12	3.44	2.82
33	19	8	3.44	3.00
3	20	22	3.26	2.53
7	21	21	3.23	2.59
13	22	14	3.16	2.76
35	23	6	3.12	3.00
31	24	25	3.09	2.47
6	25	3	3.07	3.24
21	26	32	3.00	2.06
2	27	23	2.86	2.53
28	28	18	2.77	2.65
14	29	10	2.77	2.82
8	30	30	2.70	2.12
20	31	9	2.67	2.88
19	32	7	2.60	3.00
1	33	16	2.53	2.71
27	34	20	2.37	2.59
30	35	27	2.28	2.24

**APPENDIX H: TABLE 21 COMPARISON OF COMPLETE LIST OF BARRIERS AS RANKED BY
FACILTY AND ADMINISTRATORS**

Table 21*Comparison of Complete List of Barriers as Ranked by Faculty and Administrators*

Item	Ranked by Faculty	Rank by Administrators	<i>Faculty Mean</i>	<i>Administrator Mean</i>
7	1	18	2.98	1.82
17	2	2	2.85	2.59
2	3	8	2.80	2.18
6	4	14	2.78	1.94
14	5	7	2.74	2.24
4	6	15	2.72	1.94
13	7	5	2.67	2.41
20	8	1	2.65	2.76
16	9	9	2.61	2.18
3	10	3	2.61	2.47
11	11	4	2.61	2.47
18	12	13	2.59	2.06
8	13	6	2.57	2.29
19	14	12	2.48	2.12
12	15	11	2.24	2.12
1	16	20	2.13	1.65
9	17	10	2.13	2.12
5	18	17	2.11	1.88
15	19	16	2.04	1.94
10	20	19	1.61	1.82