Staying Connected: MPA Student Perceptions of Transactional Presence

Lorenda A. Naylor University of Baltimore

Laura A. Wilson University of Baltimore

Abstract

Online education has increased exponentially in the past five years and is now considered part of mainstream higher education. It has significantly changed bricks and mortar institutions, but has the change been effective? One of the most common concerns regarding online education is the physical separation between teachers and students (Robertson, Grant, & Jackson, 2005; Moore, 1997). In order to bridge the physical distance of online education, Shin (2003, 2002) argues that universities should enhance transactional presence. However, little is known about transactional presence and online public administration courses. This study examines Master's of Public Administration (MPA) student perceptions of transactional presence with two groups: faculty and peers. Findings support previous research of no significant difference between teaching mediums in regards to student perceptions. Contrary to previous studies, neither ethnicity nor gender appear to play a prominent role in whether students are satisfied with the contact they have with peers or with faculty.

INTRODUCTION

Online education in the U.S. has increased exponentially in the past five years and is now considered part of mainstream higher education for most academic institutions. In fact, some experts predict that traditional face-to-face classes will become a model of the past (Blustain, Goldstein, & Lozier, 1999; Drucker, 1997, as cited in O'Malley & McGraw, 1999). In a 2007 report, *Online Education: Five Years of Growth*, the authors found that online enrollment in at least one course doubled at U.S. degree-granting institutions — from 1.6 million in the Fall 2002 semester, to approximately 3.5 million students in the Fall 2006 semester. This shows a compound annual growth rate of 21.6 percent for online education, compared to a growth rate of 1.5 percent for the total

JPAE 15(3): 317–331

student population (Allen & Seaman, 2007). In 2006, two-thirds of all U.S. colleges and universities in the survey reported offering complete online programs. The larger the institution, the higher the percentage of online courses it offered. Equally important is the finding that 59 percent of all institutions (public and private), and 79 percent of all public institutions surveyed identified online education as a long-term growth strategy (Allen & Seaman, 2007). Similarly, a 2005 study found that, among all degree-granting institutions offering traditional master's degree programs, 44 percent also offered online master's degree programs (Allen & Seaman, 2005).

Moreover, online education has significantly transformed the delivery of Master's of Public Administration (MPA) programs. Both MPA courses and degrees are now offered completely online (National Association of Schools of Public Affairs and Administration, n.d.). For example, the University of Baltimore has offered individual MPA courses online since 1999, and the entire MPA degree has been offered online since 2003 (Wilson-Gentry, Gerlowski, Pritchett, Ross, & Martin, 2006). The National Association of Schools of Public Affairs and Administration (NASPAA) incorporated distance education in its accreditation standards and guidelines in the late 1990s, which legitimized the use of online formats in MPA programs (NASPAA, 1997; Schuhmann, Cawley, Green, & Schenker, 2000). Cost-cutting measures and enrollment enhancement served as the impetus for adopting online education (Rahm & Reed, 1997; Cartwright, 1994).

Initial research regarding online public administration education was exploratory in nature, and relied on case studies and small sample-size (small-n) surveys. These studies revealed that online education provides students with more flexibility (Barth, 2004; Ebdon, 1999; Leavitt & Richman, 1997; Mingus, 1999). It also levels the playing field for introverted students (Mingus, 1999) and female students (Stowers, 1995), due to the anonymity characteristic of Web-based courses. Ebdon (1999) reported that students in online courses perceived themselves as having higher interaction levels with their peers.

The use of online courses in MPA degrees has not been without concerns. The workload for students (Ebdon, 1999; Mingus, 1999) and faculty is considerably higher than traditional face-to-face courses (Barth, 2004; Leavitt & Richman, 1997; Mingus, 1999; Rahm, Reed, & Rydl, 1999; Stowers, 1999). Additionally, some students perceived interaction with faculty as unsatisfactory (Ebdon, 1999), though other students perceived it as strong (Mingus, 1999). More recently, it has been argued that it is easier for online students to cheat, due to the psychological distance created by the online teaching format (Campbell, 2006).

Initially, the use of online education was posed as "one of the big questions facing public administration education" (Denhardt, 2001, p. 526). Today, online MPA courses are considered part of mainstream education, and treated as

such. According to the 2008 NASPAA Commission on Peer Review and Accreditation (COPRA) standards, it is critical that distance education be comparable to traditional (face-to-face) education in regards to core curriculum, faculty, admission standards, student services, and support services (NASPAA, 2008). The key issue is ensuring that online or distance MPA courses are as effective as traditional courses in educating public administrators.

LITERATURE

NASPAA (2008) defines distance education as occurring with "students who do not engage regularly in face-to-face interaction with an instructor who is in physical proximity" (p. 13). Lahart and Mendez-Grant (1997) define online or distance education as a "collection of teaching approaches that is concerned with the delivery of instruction to students who are not at the same location as the instructor" (p. 6). It has changed universities by releasing coveted classroom space and increasing student access. But has the change been effective? The initial debate focused on comparing the two course-delivery mediums (face-toface and online), and asked the critical question: "Can a computer-mediated course offer the same or equal quality as a traditional classroom?" Proponents argue that distance learning can be equally successful as traditional classroom teaching. In reviewing 355 comparative studies, Russell (1999) concluded that, in regards to student outcomes, student perceptions, and attitudes toward technology, there was "no significant difference" between technologically mediated courses and traditional face-to-face courses. However, these findings have been challenged based on doubts about scientific rigor of the studies.

Online education also provides the additional benefits of flexibility (Ebdon, 1999) and anonymity, which typically are absent in traditional courses. Anonymity or invisibility flattens the hierarchy and social status of peers (Oravec, 1996), which makes some students feel more comfortable expressing themselves online (Mingus, 1999).

Opponents of online education have urged institutions to be cautious when reviewing the results of studies such as those reviewed above. In the wellreferenced report — titled *What's the Difference?* — Phipps and Merisotis (Institute for Higher Education, 1999) warn that many studies are seriously flawed, which creates uncertainty and suspicion about the "no significant difference" finding. Specifically, the studies lack control of extraneous variables, subjects are not randomly selected, measurement instruments lack validity and reliability, and reactive effects are not controlled (Institute for Higher Education, 1999). However, harsh critique of distance education studies by Phipps and Merisotis (Institute for Higher Education, 1999) has been met with equal concern. Brown and Wack (1999) point out that Phipps and Merisotis (Institute for Higher Education, 1999) utilize the same criteria that they accuse, for example, Russell (1999) of using to justify his findings. Over time, this lively debate has shifted from comparing course mediums to focusing on the quality of online education.

Transactional Distance

One of the most common concerns regarding online education is transactional distance (Robertson, Grant, & Jackson, 2005; Moore, 1997), which is the separation between teachers and students. There are degrees of transactional distance. The concept is not simply an issue of geographic separation (Moore, 1997), given that it also can occur in face-to-face classrooms (Rumble, 1986). Moore (1997) describes it as "the universe of teacher-learner relationships that exist[s] when learners and instructors are separated by space and/or by time" (p. 22). Specifically,

The transaction that we call distance education occurs between teachers and learners in an environment having the special characteristic of separation of teacher from learners. This separation leads to special patterns of learner and teacher behaviours. It is the separation of learners and teachers that profoundly affects both teaching and learning. With separation there is a psychological and communications space to be crossed, a space of potential misunderstanding between the inputs of instructor and those of the learner. It is this psychological and communications space that is the transactional distance. ... It is a relative rather than absolute term (Moore, 1997, p. 22).

According to Moore (1997), the degree of transactional distance is influenced by three interrelated variables: (1) the dialogue between learners and teachers, (2) the structure of the instructional program, and (3) learner autonomy. Moore postulates that transactional distance is increased by low dialogue and high structure, but can be mitigated by increased student autonomy. This claim is supported by the finding that online student success is determined by the immediacy of information, feedback, and assistance (Wilson & Whitelock, 1998; Vonderwell, 2003). In contrast, high dialogue and low structure decrease the need for learner autonomy because transactional distance is lower in such situations. Because online courses tend to have lower dialogue and higher structure, it is not surprising that online students need higher levels of motivation and self-discipline than students in traditional courses (Wilson, 1996; Rivero, 1998; Ahern & Repman, 1994; Hiltz, 1994; Barth, 2004; Cohen, Eimicke, Kamlet, & Pearson, 1998), and that successful online students are characterized as self-motivated, independent, and organized (Irizarry, 2002). In order to mitigate transactional distance in online courses, faculty should have frequent and consistent communication with students and design courses with flexibility.

Transactional Presence

Building on Moore's (1997) concept of transactional distance, Shin (2002) coined the term "transactional presence" to capture the feeling of connectedness and availability in distance education. Similar to Moore (1997), the term "transactional" refers to relatedness, while "presence" refers to social richness. This richness "involves the degree to which media are capable of making users perceive other users' sociability, warmth, sensitivity, personality, or closeness in a mediate[d] communication situation" (Shin, 2002, p. 124). In other words, it is the "feeling of contact" (Williams, 1978, p. 127; Shin 2002, p. 126). Social presence is significant because it is positively related to online student satisfaction (Boverie, Nagel, McGee, & Garcia, 1997; Gunawardena & Zittle, 1997; Hackman & Walker, 1990); it can bridge the physical distance of online education. In essence, it focuses on the psychological presence that is often missing in online education.

Shin (2003) examined the role of transactional presence by surveying 506 undergraduate distance-education students at Korea National Open University. Results indicate that Institutional Transactional Presence (TP) predicts overall student satisfaction, a student's intent to persist (graduate), and studentperceived learning achievement. Teacher TP influences student-perceived learning achievement, and Peer TP influences satisfaction and intent to persist. These findings suggest that universities providing online education need to be aware of the role of faculty and peers, as well as the institution's interactions and relationships with students. Student support services are critical to an institution's success (Sewart, 1993; Tait, 1996).

Transactional presence may be critical for some student populations' success in online educational formats. In comparing online and traditional classes, Rovai and Gallien (2005) found that African-American students prefer learning in traditional class settings more than white students do. The sense of community developed in the traditional classroom setting may be more valued for this student population than independent learning in online formats (Rovai & Gallien, 2005). Kirkup and von Prummer (1990) argue that women in their study preferred interactive learning styles that are more likely to be found in traditional classroom settings, and "demonstrated a strong need for connection with others during their studies" (Kirkup & von Prummer, 1990, p. 28).

Study and Methodology

This study assesses MPA student perceptions of transactional presence in two areas —with faculty and with peers. Specifically, it looks at students' perceptions regarding the amount and satisfaction of contact they have with faculty and peers. Its aim is to evaluate the extent to which MPA students perceive transactional or social presence in online graduate courses at a mid-sized urban university. While most studies have focused on individual online classes (Institute for Higher Education, 1999), this study concentrates on a degree program, specifically an MPA program.

The University of Baltimore (UB) has offered its entire MPA program online since 2003. Previous research on online graduate programs at UB found that a substantial portion of students taking these courses also take traditional courses at the Baltimore campus (Wilson-Gentry, Gerlowski, Pritchett, Ross, & Martin, 2006). This fact enables the current authors to compare the sense of transactional presence in both live and online classes.

A cross-sectional survey of MPA students who took at least one online course between the Spring 2006 and Fall 2007 semesters was conducted in December of 2007. Included in this survey were a number of questions meant to measure aspects of transactional presence, such as the amount of contact with peers and professors, and satisfaction with that contact. Additional questions attempted to capture whether students were fully online, or whether they were using online classes in conjunction with more traditional formats.

There are two notable study limitations. First, the sample under-represents minority students compared to the UB student population. Second, because this was a self-administered survey, it probably captured students at either end of the spectrum — those who loved or hated the online course experience.

Respondent Profile

Eighty-nine students who took at least one online MPA class between the Spring 2006 and Fall 2007 semesters completed the survey instrument. The survey was e-mailed to 450 MPA students, and generated a 20-percent response rate. Several reasons may account for the relatively low response rate. First, the sample included students who had graduated. These students might be less interested in completing a survey. Second, this problem is compounded by the fact that the invitation to participate was sent to a university-issued e-mail address. Students tend to access these accounts less frequently if they are not their primary e-mail addresses.

Use of the online format varied among these students, with approximately 36 percent taking only one course during this time period. However, a significant proportion (30 percent) took four or more courses during the same time period, with 20 percent of respondents being strictly online students who had never taken a traditional class. These students could be truly distant or they could reside locally, but they opted to take all their classes online. These findings echo previous results, which found that the principal consumers of online graduate courses at UB use a combination of online and traditional formats to complete their degrees (Wilson-Gentry, et al., 2006).

Students responding to the survey were predominantly female (62.9 percent), which is reflective of the overall MPA student population at UB. However, only 36 percent of respondents were minority students. This figure is slightly below

the average for the university as a whole (38 percent), and the MPA program in particular (65 percent). Respondents also tended to be between the ages of 26 and 30 (29.4 percent), with approximately 81 percent at age 40 or below, which is representative of the MPA program.

STUDENT-STUDENT TRANSACTIONAL PRESENCE

Fulford and Zhang (1993) indicated that there were two important dimensions of interaction in the distance-learning environment. One is the personal interaction that a student has with the professor. However, they found that an equally important level of interaction is overall classroom interaction, which includes interaction with peers. Most of the MPA students responding to the survey had some contact with their peers (84.7 percent), with 50.5 percent reporting that they had this contact at least once per week. Students who had taken both traditional and online classes were then asked a follow-up question to compare the amount of contact in both formats. When questioned on whether the amount of contact with peers was different than that for a traditional class, more than 57 percent indicated that the amount of peer contact was either somewhat less or much less than they had experienced in traditional classes.

However, the amount of contact is not necessarily highly correlated with the value of contact. In regards to students' satisfaction with the contact they had with their classmates, most students reported that they were either somewhat (25.3 percent) or very satisfied (32.2 percent) with the contact they had with their peers. However, a large proportion (31 percent) also indicated that they were neutral concerning the contact that they had with their peers.

Next, a hypothesis concerning satisfaction with student-student transactional presence was tested. To test the hypotheses that women and minority students may have different needs for "connectedness," or preferences for communal learning styles, a series of Chi-Square analyses were conducted. Although the Chi-Square analysis of the relationship between gender and satisfaction with peer contact did not yield a statistically significant result (p = 0.217), there is some evidence that the women surveyed were less satisfied with the student-student transactional presence than the men were in online courses. As shown in Table 1, men were more likely to be very satisfied (37.5 percent) with the contact they had with classmates, while women only expressed high degrees of satisfaction 29 percent of the time. Conversely, women were more likely to indicate that they were either not very satisfied or not at all satisfied (14.5 percent), when compared to the men (6.3 percent). *(See Table 1.)*

Part of the reason for this finding may stem from the motivation for using an online format. Analysis of the reasons why students took their first online class indicates that women were much more likely to see the online class as a

Satisfaction of Contact	Ger	Total	
with Classmates	Male	Female	
Not at All Satisfied	2 6.3%	2 3.6%	4
Not Very Satisfied	0 0.0%	6 10.9%	6
Neutral	12 37.5%	15 27.3%	27
Somewhat Satisfied	6 18.8%	16 29.1%	22
Very Satisfied	12 37.5%	16 29.1%	28
Total	32	55	87

Table 1.Satisfaction of Peer Contact by Gender for Online Classes

Note: Chi-Square = 5.773, df = 4, p = 0.217

The Chi-Square statistic was utilized for all data to determine statistical significance. The Gamma statistic was used to measure the strength of associations in Tables 3 and 4, because the dependent variable was ordinal. The Lambda statistic was used to measure the strength of associations in Tables 5 and 6, because the dependent variable was nominal.

convenience (34.5 percent) or had scheduling conflicts with the traditional course section (18.2 percent). Men were more likely to indicate that they look the online class because they were true distance students (24.2 percent) or had scheduling conflicts (24.2 percent). These results suggest that many men took the online format as a first choice, and women focused more on the convenience aspect of online education.

Data in Table 2 suggest that there is no significant difference (p = 0.932) in satisfaction with peer contact based on ethnicity. As a matter of fact, African-American students were more likely to express high degrees of satisfaction with peer contact (36 percent) than their white counterparts (31.1 percent). Although the other minority groups (Asian and White Hispanic) in this study tended to express lower levels of satisfaction with peer contact, this finding should be tempered by the fact that there are relatively few respondents from other ethnic groups. (See Table 2.)

One question that arose was whether students who took traditional classes in the MPA program would be less satisfied with the amount of peer contact in the online environment than students who took all of their courses online. Because former students have the exposure to a more communal learning environment, they may be less satisfied with their peer contact in the online environment. No statistically significant relationship was found when satisfaction with peer contact was analyzed according to whether a participant was either a fully online student, or one who had taken some traditional classes (Chi-Square = 1.045, df = 4, p = 0.903).

324 Journal of Public Affairs Education

PROFESSOR-STUDENT TRANSACTIONAL PRESENCE

According to Shin (2002), debate exists on whether pedagogy in the online setting should differ from the more traditional classroom setting. While some argue that learning in the online environment should be reflective and self-directed, others suggest that it is the sense of availability of the faculty and the resultant interaction that enhance student success (Shin, 2002; Fulford & Zhang, 1993).

The majority of online students (55.2 percent) had contact with their professors at least once per week, while a small proportion (6.9 percent) indicated that they have contact more than once a week with their professors. A follow-up question was then asked of students who had taken classes in both online and traditional formats at UB. This question asked them to compare the two formats in terms of contact with the professor. Responses to this question indicate that nearly 55 percent of these students felt that they had at least the same level of contact with their professors, with one-third reporting that they had somewhat more contact (21.1 percent) or much more contact (11.3 percent) in the online class than they did in a more traditional classroom setting.

These findings may be a function of the formats for both traditional and online courses at UB. Traditional courses are offered once a week in a 2.5-hour format. Online courses at UB encourage frequent interaction and feedback for the students, because faculty members are encouraged to use periodic assessment activities such as threaded discussions or essays, in lieu of examinations. Data indicate that students feel they receive at least as much, if not more, feedback from a professor in an online course than one held in a more traditional setting. Approximately 60 percent of the students in online classes indicated that they

Table 2.

	Race					Total
	White, Non-Hispanic	African- American	White, Hispanic	Asian	Other	
Not at All	2	1	0	0	1	4
Satisfied	4.4%	4.0%	0.0%	0.0%	16.7%	4.9%
Not Very	4	1	0	0	1	6
Satisfied	8.9%	4.0%	0.0%	0.0%	16.7%	7.3%
Neutral	14	8	0	3	1	26
	31.1%	32.0%	0.0%	60.0%	16.7%	31.7%
Somewhat	11	6	0	1	2	20
Satisfied	24.4%	24.0%	0.0%	20.0%	33.3%	24.4%
Very	14	9	1	1	1	26
Satisfied	31.1%	36.0%	100%	20.0%	16.7%	31.7%
Total	45	25	1	5	6	82

Satisfaction	of Peer	Contact	by	Ethnicity
--------------	---------	---------	----	-----------

Note: Chi-Square = 8.50, df = 16, p = 0.932

were either somewhat or very satisfied with the amount of contact they had with the online class professor. There were no statistically significant differences between men and women in the amount of satisfaction on this item (p = 0.593). Both men and women reported high degrees of satisfaction as their modal values. However, men were more likely than women to indicate that they were either not at all or not very satisfied with the degree of contact with their online professor. There also were no statistically significant differences in satisfaction levels for contact with the professor when analyzed by ethnicity (p = 0.592). However, African-American students (52 percent) were more likely than their white, non-Hispanic counterparts (36.2 percent) to indicate that they were very satisfied with the degree of contact with their professors.

Finally, an analysis was conducted to see if students who took traditional classes in the MPA program would be less satisfied with the amount of professor contact in the online environment than students who took all of their courses online. One could argue that students who are fully online would have different expectations of contact with professors. No statistically significant relationship was found when satisfaction with professor contact was analyzed by whether a student was a fully online student (Chi-Square = 3.003, df = 4, p = 0.557).

DIMENSIONS OF TRANSACTIONAL PRESENCE

Shin (2002) notes that transactional presence in the digital classroom transcends mere interaction. In her words, transactional presence is "the degree to which a distance student perceives the availability of, and connectedness with, teachers [and] peer students ... while interaction is viewed as an activity which may result in a high degree of transactional presence" (Shin, 2002, p. 132). To investigate these dimensions, the first set of analyses involved a series of tests to see whether satisfaction with student-teacher and student-peer relationships was influenced by the level of interaction. A second series of tests then investigated whether preference for the online format was influenced more by the amount of contact or by satisfaction with the contact.

As may be seen in Tables 3 and 4, overall satisfaction in contact with both professors and classmates is strongly influenced by the amount of contact that students have with each group. Both of these relationships are significant at the 0.05 level. Gamma tests of the nature of the relationship also suggest fairly strong, positive relationships between the satisfaction with contact and the amount of contact. Among peer-to-peer contacts, the gamma value is 0.398. In the case of the professor-student relationship, the correlation is even stronger, with a gamma value of 0.508. It appears the amount of interaction is a critical — but not the sole — determinant of student satisfaction levels with contact. *(See Tables 3 and 4.)*

Staying Connected: MPA Student Perceptions of Transactional Presence

Our final tests revolved around whether overall satisfaction with the online format was dependent on the amount of interaction with the professor, or on satisfaction with the quality of that interaction. Data from a question about whether a student would recommend the online format to another student was then cross-tabulated against the amount of interaction, and the quality of that interaction, with both peers and the professor.

Table 3.

Satisfaction of Contact with Classmates, by Amount of Contact w/Classmates

Satisfaction	Amount of Contact with Classmates					
of Contact with Classmates	No Contact	Once in a While but Less Than Once Per Week	At Least Once Per Week	More Than Once Per Week		
Not at All	2	1	0	0	3	
Satisfied	16.7%	3.4%	0.0%	0.0%	3.6%	
Not Very	2	2	1	1	6	
Satisfied	16.7%	4.0%	3.6%	7.1%	7.2%	
Neutral	4	12	9	0	25	
	33.3%	41.4%	32.1%	0.0%	30.1%	
Somewhat	1	10	9	2	22	
Satisfied	8.3%	34.5%	32.1%	14.3%	26.5%	
Very	3	4	9	11	27	
Satisfied	25.0%	13.8%	32.1%	78.6%	32.5%	
Total	12	29	28	14	83	
	100%	100%	100%	100%	100%	

Note: Chi-Square = 30.473, df = 12, p = 0.002

Table 4.

Satisfaction of Contact with Professor, by Amount of Contact with Professor

Satisfaction	Amount of Contact with Professor					
of Contact with Professor	No Contact	Once in a While but Less Than Once Per Week	At Least Once Per Week	More Than Once Per Week		
Not at All	1	9	3	0	13	
Satisfied	33.3%	25.0%	7.1%	0.0%	14.9%	
Not Very	0	5	3	0	8	
Satisfied	0.0%	13.9%	7.1%	0.0%	9.2%	
Neutral	2	6	3	1	12	
	66.7%	16.7%	7.1%	16.7%	13.8%	
Somewhat	0	6	13	0	19	
Satisfied	0.0%	16.7%	31.0%	0.0%	21.8%	
Very	0	10	20	5	35	
Satisfied	0.0%	27.8%	47.6%	83.3%	40.2%	
Total	3	36	42	6	87	
	100%	100%	100%	100%	100%	

Note: Chi-Square = 25.22, df = 12, p = 0.014

Recommend	Satisfaction of Contact With Professor					Total
Online to Others	Not at All Not very Neutral Somewhat Very					
Yes	6	6	12	16	35	75
	46.2%	85.7%	100%	84.2%	100%	87.2%
No	7	1	0	3	0	11
	53.8%	14.3%	0.0%	15.8%	0.0%	12.8%
Total	13	7	12	19	35	86
	100%	100%	100%	100%	100%	100%

Table 5.Recommend Online Format, by Satisfaction of Contact with Professor

Note: Chi-Square = 26.70, df = 4, p = 0.000

Table 6.

Recommend Online Format, by Satisfaction of Contact with Classmates

Recommend	Satisfaction of Contact With Classmates					Total
Online to Others	Not at All Satisfied	Not Very Satisfied	Neutral	Somewhat Satisfied	Very Satisfied	
Yes	1	3	22	21	27	74
	33.3%	50.0%	81.5%	100%	100%	88.1%
No	2	3	5	0	0	10
	66.7%	50.0%	18.5%	0.0%	0.0%	11.9%
Total	3	6	27	21	27	84
	100%	100%	100%	100%	100%	100%

Note: Chi-Square = 24.49, df = 4, p = 0.000

In neither case was the amount of interaction sufficient for students to recommend that another student take the online format. However, as can been seen in Tables 5 and 6, the quality of the contact exerted a high degree of influence on whether students would recommend this format to other students. Use of the Lambda statistic, as a measure of association, found that the relationship between recommending the format and satisfaction with contact was slightly stronger for the relationship among students (Lambda = 0.100) than for student relationships with faculty (Lambda = 0.091). (See Tables 5 and 6.)

CONCLUSION

With regard to student perceptions, our research supports the "no significant difference" claims about online and traditional teaching mediums — that MPA students perceive no difference in faculty contact and peer contact. In addition, this research found that, contrary to previous studies, neither ethnicity nor gender appears to play a prominent role in whether students are satisfied about the contact that they have either with each other, or with the professor. However, the study affirms the concept of Shin (2002) — that transactional presence is more than just the amount of interaction. Students have to be satisfied with the

quality of that interaction as well. While frequent interaction is an important component of quality, it is not the sole determinant of quality. Following the lead of Fulford and Zhang (1993), we also have found that, while students find that a personal relationship with a professor is important to overall satisfaction, overall interaction in the distance setting with peers is equally important.

References

- Ahern, T.C., & Repman, J. (1994). The effects of technology on online education. Journal of Research on Computing in Education, 26(4), 537-546.
- Allen, E.I., & Seaman, J. (2005). Growing by degrees: Online education in the U.S., 2005. The Sloan Consortium. Needham. MA: Olin & Babson Colleges, Babson Survey Research Group. Retrieved May 15, 2009, from http://www.sloan-c.org/resources/growing_by_degrees.pdf.
- Allen, E.I., & Seaman, J. (2007). Online nation: Five years of growth in online learning. The Sloan Consortium. Needham. MA: Olin & Babson Colleges, Babson Survey Research Group. Retrieved May 15, 2009, from http://www.sloan-c.org/publications/survey/pdf/online_nation.pdf.
- Barth, T.J. (2004). Teaching PA online: Reflections of a skeptic. International Journal of Administration, 27(6), 439-455.
- Blustain, H., Goldstein, P., & Lozier, G. (1999). Assessing the new competitive landscape. In R.N. Katz & Associates (Eds.), *Dancing with the devil*. San Francisco: Jossey-Bass.
- Boverie, P., Nagel, L., McGee, M., & Garcia, S. (1997, April 16-19). Learning styles, emotional intelligence and social presence as predictors of distance education student satisfaction. Paper presented at the 8th National Conference on College Teaching and Learning, Jacksonville, FL.
- Brown, G., & Wack, M. (1999). The difference frenzy and matching buckshot with buckshot. *The Technology Source*. Retrieved May 27, 2009, from http://www.technologysource.org/article/320/.
- Campbell, H.E. (2006). Cheating, public administration education, and online courses: An essay and call to arms. *Journal of Public Affairs Education*, 12(1), 33-47.
- Cartwright, P. (1994). Distance learning: A different time, and different place. Change, 26, 30-33.
- Cohen, S., Eimicke, W., Kamlet, M., & Pearson, R. (1998). The information resource management program: A case study in distance education. *Journal of Public Affairs Education, 4*(3), 179-192.
- Denhardt, R.B. (2001). The big questions of public administration education. *Public Administration Review*, 61(5), 526-534.
- Ebdon, C. (1999). Teaching public finance administration online: A case study. *Journal of Public Affairs Education*, 5(3), 237-246.
- Fulford, C.P. & Zhang, S. (1993). Perceptions of interaction: The critical predictor in distance education. American Journal of Distance Education, 7(3), 8-21.
- Gunawardena, C.N. & Zittle, F.J. (1997). Social presence as a predictor of satisfaction within a computer-mediated conferencing environment. *American Journal of Distance Education*, 11(3), 8-26.
- Hackman, M.Z. & Walker, K. (1990). Instructional communication in the televised classroom: The effects of system design and teacher immediacy on student learning and satisfaction. *Communication Education*, 39, 196-206.
- Hiltz, R.S. (1994). *The virtual classroom: Learning without limits via computer networks.* Norwood: Ablex Publishing.
- Institute for Higher Education Policy. (1999). What's the difference?: A review of contemporary research on the effectiveness of distance learning in higher education. R.A. Phipps & J. Merisotis (Eds). Washington, DC: American Federation of Teachers and the National Education Association.

- Irizarry, R. (2002). Self-efficacy and motivation effects on online psychology student retention. USDLA Journal, 16, 55-64.
- Kirkup, G. & von Prummer, C. (1990). Support and connectedness: The needs of women distanceeducation students. *Journal of Distance Education*, 5, 9-31.
- Lahart, K., & Mendez-Grant, M. (1997, November/December). Programming for the invisible student the distance learner. *Campus Activities Programming*, 70-73.
- Leavitt, W.M., & Richman, R.S. (1997). The high-tech MPA: Distance learning technology and graduate public administration education. *Journal of Public Affairs Education*, 3(1), 13-27.
- Mingus, M.S. (1999). Toward understanding the culture of internet-mediated learning. *Journal of Public Affairs Education*, 5(3), 225-235.
- Moore, M.G. (1997). Theory of transactional distance. In D. Keegan (Ed.), *Theoretical principles of distance education*, 22-38. New York: Routledge.
- National Association of Schools of Public Affairs and Administration (NASPAA). (n.d). *Online courses and degrees.* Retrieved May 15, 2009, from http://www.naspaa.org/students/clearinghouse/ clearinghouse.asp.
- NASPAA. (1997). Standards for Professional Masters Degree Programs in Public Affairs, Policy and Administration. *Commission on Peer Review and Accreditation (COPRA).*
- NASPAA. (2008, January). *Commission on Peer Review and Accreditation (COPRA)*. Retrieved May 11, 2009, from http://www.naspaa.org/accreditation/document/OFFICIAL_DOCUMENTS_ 2008_standards_only.pdf.
- O'Malley, J., & McGraw, H. (1999). Student perceptions of distance education, online learning, and the traditional classroom. *Online Journal of Distance Education Administration*, 2(4). Retrieved May 11, 2009, from http://www.westga.edu/~distance/ojdla/winter24/omalley24.html.
- Oravec, J. (1996). Virtual individuals, virtual groups: Human dimensions of groupware and computer networking. New York: Cambridge University Press.
- Rahm, D., & Reed, B.J. (1997). Going remote: The use of distance learning, the World Wide Web, and the Internet in graduate programs of public affairs education. *Public Productivity and Management Review*, 20(4), 459-474.
- Rahm, D., Reed, B.J. & Rydl, T.L. (1999). Internet-mediated learning in public affairs programs: Issues and complications. *Journal of Public Affairs Education*, 5(3), 213-223.
- Rivero, V. (1998). Mortarboards without bricks. Converge, 1(2), 40-42.
- Rovai, A.P., & Gallien, L.B. (2005). Learning and sense of community: A comparative analysis of African-American and Caucasian online graduate students. *The Journal of Negro Education*, 74, 53-62.
- Rumble, G. (1986). The planning and management of distance education. New York: St. Martin's Press.
- Russell, T.L. (1999). *The no significant difference phenomenon*. Chapel Hill, NC: Office of Instructional Telecommunications, North Carolina State University.
- Sewart, D. (1993). Student support systems in distance education. Open Learning, 8(3), 3-12.
- Schuhmann, R.A., McGreggor Cawley, V., Green, R.T., & Schenker, A. (2000). The MPA and distance education: A story as a tool of engagement. *Public Administration & Management: An Interactive Journal*, 5(4), 190-213.
- Shin, N. (2002). Beyond interaction: The relational construct of 'transactional presence.' Open Learning, 17(2), 121-137.
- Shin, N. (2003). Transactional presence as a critical predictor of success in distance learning. *Distance Education*, 24(1), 69-86.
- Stowers, G.N.L. (1999). Computer conferencing in the public affairs classroom. *Journal of Public Affairs Education*, 5(1), 57-66.

- Stowers, G.N.L. (1995). Getting left behind? Gender differences in computer mediated communications. *Public Productivity and Management Review*, 19(2), 143-159.
- Tait, A. (1996). Conversation and community: Student support in open and distance learning. In R. Mills & A. Tait (Eds.), Supporting the learner in open and distance learning (pp. 59-72). London: Pitman.
- Vonderwell, S. (2003). An examination of asynchronous communication experiences and perspectives of students in an online course: A case study. *The Internet and Higher Education, 6*, 77-90.
- Williams, E. (1978). Teleconferencing: Social and psychological factors. *Journal of Communication*, 28, 125-131.
- Wilson, D.L. (1996, February 2). Brown U. offers on-line tutorials instead of lectures. *The Chronicle of Higher Education*, A19.
- Wilson, T., & Whitelock, D. (1998). Monitoring the online behavior of distance learning students. Journal of Computer Assisted Learning, 14, 91-99.
- Wilson-Gentry, L., Gerlowski, D., Pritchett, M., Ross, T., & Martin, D. (2006). *Final Report: Graduate online education and student outcomes success.* Baltimore: University of Baltimore.

Lorenda A. Naylor is an assistant professor in the School of Public Affairs at the University of Baltimore. She has published in the *Review of Public Personnel Administration*, the *Journal on Comparative Asian Development*, and the *Maternal and Child Health Journal*.

Laura A. Wilson is a professor, and the executive director and division chair in the School of Public Affairs at the University of Baltimore. She also is a research associate with the Schaefer Center for Public Policy at the University of Baltimore. She co-authored (with Robert Stoker) *When Work is Not Enough.* Wilson has published in *Public Administration Review* and *Social Sciences Quarterly.*