



ISSN: 1545-679X

Information Systems Education Journal

Volume 8, Number 65

<http://isedj.org/8/65/>

August 4, 2010

In this issue:

Discovering Adjunct Communication Methods Outside the Classroom: An Exploratory Study

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Recommended Citation: Serapiglia, Woratschek, and Louch (2010). Discovering Adjunct Communication Methods Outside the Classroom: An Exploratory Study. *Information Systems Education Journal*, 8 (65). <http://isedj.org/8/65/>. ISSN: 1545-679X. (A preliminary version appears in *The Proceedings of ISECON 2009*: §2345. ISSN: 1542-7382.)

This issue is on the Internet at <http://isedj.org/8/65/>

The **Information Systems Education Journal** (ISEDJ) is a peer-reviewed academic journal published by the Education Special Interest Group (EDSIG) of the Association of Information Technology Professionals (AITP, Chicago, Illinois). • ISSN: 1545-679X. • First issue: 8 Sep 2003. • Title: Information Systems Education Journal. Variants: IS Education Journal; ISEDJ. • Physical format: online. • Publishing frequency: irregular; as each article is approved, it is published immediately and constitutes a complete separate issue of the current volume. • Single issue price: free. • Subscription address: subscribe@isedj.org. • Subscription price: free. • Electronic access: <http://isedj.org/> • Contact person: Don Colton (editor@isedj.org)

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Discovering Adjunct Communication Methods Outside the Classroom: An Exploratory Study

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Abstract

The continued rise of reliance on adjunct professors as a source of direct on ground instruction has led to a shift and reduction of the opportunities for the student to interact with their teachers. Student expectations and environments have also shifted to include a demand of more interaction outside of the classroom. The proliferation of modern technology available for communication has provided many new avenues for this interaction to take place. It is necessary for adjunct faculty and institutions to explore and leverage these new channels of communication to provide opportunities for timely and valuable exchanges between instructor and student.

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1. INTRODUCTION

The use of adjunct faculty has been growing in colleges and universities over the past 30 years. One count has shown that adjunct faculty comprise some 46% of college and university teachers overall and 65% of non-tenure teaching positions (Euban, 2006).

The reasons colleges and university use adjunct faculty are as diverse as the institutions themselves. Most commonly they are hired to teach courses that must be offered even though the department does not have adequate staff to do so. As part time employees, adjuncts are a relatively cheap and flexible alternative to fill this gap. Other reasons for the use of adjuncts include the

filling of the load for permanent faculty who have either retired or resigned and have not been replaced, or providing release time for senior faculty to conduct their research (Wickun, & Stanley, 2002).

For those that fill the role of adjunct, time and resources can become stretched to the extreme. It is not unusual to find these individuals teaching at multiple schools on multiple days and carrying class loads over double those of full time faculty. (Finder, 2007)

This increased reliance on adjunct faculty has placed an increasing strain on the communication channel between faculty and students. The lack of permanent office

space, the transient nature of the adjuncts physical presence on a campus, and the lack of any requirements for office hours or alternative methods of contact driven from the institutional level has led to a decreasing amount of interaction between students and their teachers at a time when technology advances should be increasing these opportunities.

Adjunct faculty members can face many more challenges in communicating with their students than full time professors do. With a greater likelihood of teaching at variable times throughout a day, adjunct faculty can be faced with teaching a more diverse student population. Not only do they have to deal with the traditional aged student, but, they also must deal with the adult learner, or the transitional student. In addition to this problem, there is the mobile nature of adjunct faculty leading to decreased availability. It is not uncommon to see an adjunct teaching at multiple schools on the same day (June, 2009). When all this is coupled with varying adoption rates of technology that differ between full-time and part-time faculty as well as to the student population itself, a communication gap begins to widen.

The general populace has witnessed an explosion of communications technology within the past decade. With the increase in capability, capacity, mobility, and reliability of a multitude of technology based options for the exchange of messages, many students, young and old, are expecting to be able to communicate inside their education world much the same way they do outside of it. Unfortunately educational institutions have been slow to respond to this expectation. While much time, effort, and money has been spent on technology inside the classrooms and in online classrooms, the channels for communicating outside of the classroom have remained stagnant. Most schools place no requirement on their instructors to utilize any technology other than the school E-mail system. Others go so far as to require virtual office hours be held through Instant Messaging. With new technologies and methods appearing seemingly constantly, it is very difficult for an institution to force any instructors to learn new products when the institutions themselves are noncommittal to any singular technology.

The purpose of this study is to begin an exploration into the communication tools currently used by adjunct professors in communicating with their students outside of the classroom at a mid-sized university in Western Pennsylvania.

2. LITERATURE REVIEW

The following is a review of various journal articles and studies related to variables associated with this problem: adjunct faculty, Net Generation or Millennial students, and adult learners.

Adjunct Faculty

There are many colleges and universities which have programs to support and encourage the adoption of technology for full-time instructors. Many include ongoing Continuing Education Units, and "clock hours" for attending seminars geared towards professional development. It is very difficult to find any such programs geared exclusively to adjunct faculty. Rather, what is seen is simply the attempt to encourage the adjunct faculty to participate in the same programs offered to the full-time faculty rather than require their participation. These separate standards are just the beginning of the differences between the two teacher groups.

In a qualitative study of nine adjunct professors, Ritter (2007) found that separation was the major concern amongst adjuncts. Separation isolated the adjunct faculty from university and faculty support and thus led to isolation. Isolation, then, was named the major cause of the challenges the adjunct professors faced. This isolation also affected technology and communication with their students.

The isolation from other faculty members and university support also resulted in difficulties concerning technology. Obtaining computer accounts, using BlackBoard to communicate with their classes and learning to provide quality online instruction were the major concerns. One adjunct said "I have faced a few challenges in the role of adjunct professor more related to technology. Since I teach an online course, I've found that some students are not as technologically literate as others. I have also experienced situations where student are not proficient in using BlackBoard." (Ritter, 2007)

Student Diversity

Traditional Aged Learners

Many high school students enter their collegiate careers today well versed in a variety of communication technologies --e-mail, cell phone, blogs, instant messaging (IM), podcast, text messaging or social networks such as Facebook, MySpace, or Twitter. The 'millennials' as they have been named, those born between 1982 and 2001, come to the halls of higher education with a different way of learning, a different attitude toward what is important to learn, a different way of being motivated to learn, and a different way of communicating. Saulnier (2007, p. 4) argues that "while very adept at multitasking and the use of technology, many of today's students struggle to understand course texts, written instructions and assignments. He further states that "Frequent communications from course instructors and an engaged academic advisor are among the keys to maintaining student initiative and effort" (Saulnier, 2007, p. 5). To meet the needs of these students and to bridge the gap of understanding, we need to understand them so that we can construct environments and experiences in higher education that foster both learning and communication.

Saulnier (2007) describes some of the major characteristics of the Millennials as follows:

- 1) They are pragmatic and want useful content,
- 2) They expect action, and that includes learning in an active environment,
- 3) They are peer-network oriented,
- 4) Respecting the power of relationships is critical to their motivation,
- 5) They need structure, direction, and praise, and
- 6) They are achievement oriented.

Sometimes the Millennials are called the "Trophy Generation", or "Trophy Kids." This term reflects a philosophy where "no one loses, " and everyone gets a "thanks for participating" award/trophy. It has given many of the Millennials a sense of entitlement.

Any educator who has been in the higher education undergraduate classroom in the past few years can attest to the fact that the priority many students give to their educa-

tion is very different from the student of 20 years ago. Work, family, and personal needs take up so much of their time, that classes and assignments have become 'just another thing to add to the list.' Because they have been raised in a world of convenience and consumption, a collegiate education for many of the Millennials becomes a commodity that can be bought. If they don't like University X's major offerings, class times, class delivery methods, location of campus, etc., they simply move on until they find what they do like.

Raised in a digital age, one would expect the Millennials to be very technologically literate and savvy and indeed they are. Junco and Mastrodicasa (2007) surveyed 7,705 college students in the US and found the following characteristics:

- 1) 97% own a computer,
- 2) 97% have downloaded music and other media using peer-to-peer file sharing,
- 3) 94% own a cell phone,
- 4) 76% use instant messaging and social networking sites,
- 5) 75% have a Facebook account,
- 6) 60% own some type of portable music and/or video device such as an iPod,
- 7) 49% regularly download music and other media using peer-to-peer file sharing,
- 8) 34% use websites as their primary source of news,
- 9) 28% author a blog,
- 10) 44% read blogs, and
- 11) 15% of IM users are logged on 24 hours a day/7 days a week

Oblinger (2003) details Jason Frand's ten attributes of students who have grown up with technology. Two of these 10 directly address learning. The first is: "Doing is more important than knowing." The ultimate goal is no longer knowledge. The half-life of information is so short so results and actions are more important than the accumulation of facts. Second is: "Learning more closely resembles Nintendo than logic." Games such as Nintendo demonstrate a trial-and-error approach to solving problems. Losing is actually important because the fastest way

to master a game is losing and losing represents learning.

Marilla Svinicki (2004), Professor of Educational Psychology at Texas Tech University and Chair of the Program in Learning, Cognition and Instruction, states that in regard to learning today's students need help to:

- 1) Decrease their focus on memorization,
- 2) Increase their self-regulation strategies,
- 3) Increasing and focus their own motivation
- 4) Recognize the need to transfer learning from the classroom to the real world.

So how should a faculty member communicate with the traditionally aged student and ultimately have learning happen? In a 2007 blog titled "casting out nines," Robert Talbert, a tenured faculty member of Franklin College posed the question "What's the best electronic medium for professor/student interaction?" Talbert was really asking three questions:

- 1) If he had to send information to his students in a quick and reliable way, what would be the best medium/media to do this?
- 2) What is the functionality for this medium/media in regard to course management software?
- 3) Do students appreciate professors using IM, texting, Facebook, etc. for class purposes?

In the relatively few response posts to his blog, no clear answers emerged.

Regarding communication, e-mail is reported as the most frequently used application of the Internet and an important aspect of the communication process within higher education (Willis, 2005). Yet, no study has looked to programmatically assess the outcome of its use on the higher education process (Duran, et. al., 2005). Chimi & LaMacchia (2007) gave a variety of reasons why instructors generally use e-mail to communicate with students. These included:

- 1) Respond to individual student concerns,
- 2) Provide an alternative for electronic tools such as Blackboard or WebCT,
- 3) Deliver important general announcements,

4) Promote understanding of course material,

- 5) Promote class attendance, and
- 6) Communicate assignment details.

They found that some of the reasons students e-mail professors are:

- 1) Seek timely clarification of assignments and course material,
- 2) Avoid language and personality requirements involved in verbal communication,
- 3) Promote personal convenience, and
- 4) Support poor study habits. (Why study when you can buy time, ask a question of-line, and put off the work?)

Sheer and Fung (2007) conducted a study of 408 undergraduate students which examined professor-student email communication, interpersonal relationship, and teaching evaluation. Their findings include:

- 1) Academic task was the most frequent e-mail topic between professor and student and social-relationship less frequent,
- 2) Professors e-mailed students more frequently than the opposite,
- 3) Professors and students exhibited a higher degree of reciprocity for social-relationship communication than for task e-mails,
- 4) E-mail communication contributed positively to both the teaching evaluation and the professor-student relationship, and
- 5) The most significant predictors for both the professor-student relationship and the teaching evaluation were a) professor e-mail helpfulness, b) reply promptness, and c) e-mail frequency for social-relationship.

Adult Learners

Adult learners bring to the classroom their own set of characteristics. Among these are that they are:

- 1) Problem centered,
- 2) Seeking education solutions to where they are compared to where they want to be in life,
- 3) Results oriented,
- 4) Self-directed,

- 5) Often skeptical about new information, preferring to try it out before accepting it,
- 6) Seeking an education that relates or applies directly to their perceived needs, and
- 7) Responsible for their own learning (RIT Online Learning).

As with the traditionally aged students, these learners also have multiple obligations to work, home, and school.

Some studies regarding the adult learners' attitude toward technology and the use of technology focus on "IT Issues." Cordes (2009) argues that like any full-time student, adult learners can access the campus physically or virtually from home, work, or while mobile. If the adult learner is virtual, he points out that the computing resources available especially to low-income students many not meet college/university recommended requirements for hardware, software, and connections. Add to this the problem of no control over the speed or reliability of off-campus Internet services and the myriad of mobile devices that could potentially be used by the adult learners and you have the potential for no communication to occur.

Johnson (2007) claims that computer-based learning involves learning both the system of content delivery and the content itself. Therefore, many adult learners are stymied and frustrated by the learning system due to lack of prior experience with technology and assistance from the course instructor.

Other studies look at the communication methods used by the adult learner as they participate in a class or training environment. Phol et. al (2006) used ECODESIGN, an e-learning system, to teach sustainable product design to adult learners. Many members of the specific target group that used this software were not computer literate in advanced forms of electronic communication. The researchers found that communication was vital between participants and between participants and trainers. E-mail, chat, and a discussion forum were the primary means of communication. The discussion forum was accepted by almost everybody in the group, but chats were criticized by almost everybody.

Tekinarslan (2004) studied adult learners participating in The Ohio University Master of

Business Administration Without Boundaries Program (OU MBAWB). The learning environment in this program was classified as a project-based distributed. He found that the learners interacted and communicated with their fellow teammates, classmates, and faculty members using e-mail, electronic databases on the OU Intranet, and chat rooms. The learners communicated and interacted over the OU databases mostly because the faculty encouraged such. Also, the learners used e-mail and telephone as were needed to communicate individually with faculty members, teammates, and classmates.

Grant et al. (2006) evaluated the delivery of the same course in a distance format from two groups of students, one group of full-time students, the other part-time. They found that the part-time students were older, more experienced with distant learning, less likely to engage in online chat than the full-time students, and as likely to use e-mail as the full-time students. In evaluation the course, both sets of students gave their highest ratings to the use of Discussion Boards for communication with the professor and most students rated private e-mail as an effective communications tool.

3. METHODOLOGY

The investigation into current technologies in use by adjunct faculty was quantitative in nature and utilized a survey as the research methodology to gather information from current adjunct faculty of a single academic institution.

Robert Morris University, a private suburban school has a student population of approximately 5,000 Undergraduate and Graduate students that represent 29 states and 36 foreign countries. Approximately 1,000 of those students are resident, living on campus. For the academic year including Fall 2008, Spring 2009, and Summer 2009 Robert Morris University had 394 unique personnel designated as "part time" faculty.

A survey was developed to gather information in four significant areas: adjunct demographics; communication technologies in use; reasons for not using technologies; and opinions on effectiveness of technologies (See Appendix A).

The survey was designed and administered through a web service, ESurveyPro.com. The

survey was evaluated for time and clarity through administration to four test subjects.

E-mail invitations were sent to all 394 individuals as determined through their inclusion within Robert Morris University's electronic distribution lists for Part Time Faculty during each respective academic session. The invitations were sent June 15th, 2009 with one follow up reminder sent one week later on June 22, 2009. At the completion of two weeks, 75 surveys had been returned through the web collection service. 66 surveys were complete, with 9 reported as incomplete. Incomplete surveys were retained for results on questions that were answered as there was no contingency between sections of the survey.

4. RESULTS

Results for this survey were tabulated through the ESurveyPro.com website. The number of respondents for each question varies as there were no restrictions placed forcing an answer to be given. Results are thus presented as number of responses out of number of respondents per question and a percentage for comparison purposes.

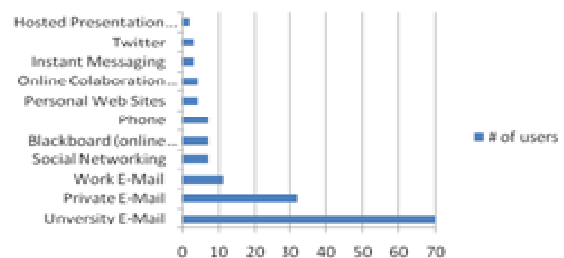
Demographics:

Questions 1 through 9 were designed to gather demographic information. In question #1, the overwhelming majority of the respondents to the survey, 34 out of 71 (47.89%) reported an age of over 50. With the second most populated choice being 46-50 (11/58, 15.49%), only 20/71 (28%) fell within the under 40 years age range. In question #2, 66.2% (47/71) replied that they had a Masters degree as their highest earned level of education with the balance (24/71) made up of Doctoral level degrees. These adjuncts report to have a sizeable level of experience, in Question #3 65.71% (46/70) report having taught for over 6 semesters, only 5 (7.14%) report to have taught only 1 semester. Question 4 expanded Question #3 to specify the number of classes. As with Question #3, 41 reported teaching 6 or more classes (58.57%), while only 6 (8.57%) reported teaching only one class. In another large majority, Question #5 showed that 49 of 71 (69.01%) had been teaching for over 6 years, only 15/71 (21.12%) reported teaching 3 years or less. In Question #6, nearly 50% (34/70) pro-

vided that they taught only at University X, 20/57 (28.57%) taught at one other institution. Questions #7 inquired about online teaching experience, with 48/71 (67.61%) disclosing that they had never taught a course entirely online. A greater share in Question #8, 45 out of 70 (64.29%), disclosed that they did not have a job outside of education. Finally, 37 out of 69 respondents answered that they did not have a phone capable of receiving e-mail.

In Questions #10 and #11, respondents were asked if they held regular office hours and if so, how many students per class contacted them during those hours. For holding office hours, 29/69 (42%) held them, while the majority 40/69 (58%) did not. For attendance, or use of that time, 5/46 (10.8%) reported only 1 in attendance, 8/46 (17.4%) reported 2 in attendance, while 29/46 (63%) reported that no students attended an office hour session.

Figure 1: Technologies in Use



Technologies In Use:

Question 12 of the survey asked which technologies the respondent had utilized and shared with their students. Nine technologies were listed, and an allowance was made for write in answers. More than one answer was allowed. Each respondent to this question included University E-mail as a method of out of class communication, 70/70 (100%). Second in popularity was a personal E-mail address, 32/70 (45.7%), and third was a work related E-mail address 11/70 (15.7%). Outside of E-mail, three technologies tied, Social Networking sites (Facebook/MySpace), and two write in choices: University X's online classroom environment and Telephone with 7/70 users (10%) each. Online collaboration sites, such as Google Docs, and Personal web Sites fell in next at 4/70 responses (5.7%). Two technologies garnered three responses each, Instant Messaging, and Twitter (4.3%), Online presenta-

tion services, such as Go To Meeting, finished out the polling with 2 marks (Figure 1).

Details of each of the nine listed technologies from Question 12 highlighted if the communication method had been shared, utilized and if it had improved communication. Outside of E-mail, and especially University E-mail, none of the technologies had great use. A handful did receive positive returns on their ability to improve communication outside of the classroom. Online collaborations services tallied 8 responses of use, with all 8 reporting improved interactions. Eight respondents also reported utilizing some form of hosted presentation service, with 6 reporting improved interactions. Seven professors have shared a personal web site address with students. Four of those who shared personal web site addresses felt it improved interactions with their students.

A second group of technologies emerged. These technologies had larger numbers of those that used, but did not share the addresses with their students. The Instant Messaging category had 18 reported users, but only 2 had shared their address with students. Neither reported that it improved interactions. The Social Network Website category reported 30 that had a presence on Facebook or MySpace. Only 7 had shared this address with their students, with 5 reporting that it improved interactions. The Twitter category included 8 that had accounts, with 3 having shared the address and only 2 that felt it improved interactions.

Reasons Not In Use:

A very clear trend developed in the responses as to why adjuncts had not shared or utilized the technologies. Three reasons were the leading choices for each technology. The leader amongst these three was the worry over privacy concerns. This was followed by the desire to funnel communications through a different channel. The last two popular choices were split depending on the technology. The ability to archive, or keep record of the communication was a concern, as was the simple fact that many admitted they were unsure how to utilize the technology in question. Open responses to the technologies included several answers that highlight some ignorance in how certain technologies worked. One such response to

the Instant Messaging category related, "Who would pay for this account? Kids love to text, but why should I purchase this technology for just students when I am adjunct?" This person did not understand that Cell Phone Texting is not the same as Instant Messaging (IM), and that IM is a free service.

5. DISCUSSION

The purpose of this study was to perform a preliminary inquiry into what methods of communication are being employed currently by adjunct faculty. It is recognized that there is much more information to be gathered in this area before proper recommendations can be made to champion any particular technology or approach over another.

Several areas exist for further study that would help to clarify the environments and trends. A second study should include a breakdown of subject matter the adjunct teaches to help illustrate trends for disciplines, departments, or schools under the university as a whole. The timing of the survey should also be altered to be more conducive to a time when more adjuncts are in an active session. While 75 responses were gathered from 394 invitations, only 38 adjuncts were actively teaching at the time of the survey.

It is also important to note that Robert Morris University does not have any distinct organizational structure to their adjunct population. There is no mandate from the school in the form of technology other than the issuance of a University e-mail address. Each department manages their own pool of adjuncts separately. A comparison should be undertaken between the population of Robert Morris University and another institution that does mandate a second form of communication, such as Instant Messaging.

Another suggested approach for study would be quasi-experimental in nature. A scenario can be developed to include the incorporation of a new communication technology and strategy in the same class over multiple sections. Situations exist where a single adjunct may teach three sections of the same class. This scenario could be leveraged to utilize only university e-mail in one section and e-mail with Instant Messaging in another. Student satisfaction levels could then be gauged

at the end of the course and compared between the two scenarios.

From the results, it appears that current adjuncts are worried most by security, privacy, and management of multiple channels. For security and privacy concerns, much of the fears could be allayed with simple education and training. Ignorance of the features might be the deterring factor. For instance, on first glance Instant Messaging "conversations" appear ephemeral, disappearing when logging out and back in. Most common IM clients do contain an archiving feature that can hold these strings for reference with just a simple click. Most clients also include the ability to encrypt, which would quickly alleviate most security concerns. The management of multiple channels of communication is an individual, personal, task. Any of these technologies inherently offer the choice to turn it off. Allowing the channel to be open during limited windows of time can be utilized to allow for "virtual office hours" and enable some level of control to the teacher on when they can be contacted.

As stated in the introduction and literature review about Adjunct Faculty, unfortunately, the main roadblock to adoption of various communications techniques and technologies by may simply be time. Of the reasons provided for not using the several technologies in the survey, a commonality is that they all could be overcome with the application of time. The time to spend in learning the technology, time to spend in becoming familiar and comfortable with the technology, time to spend in organizing the implantation of the technology into their lives in and out of the classroom. Too many adjuncts feel that their time is already stretched to the maximum, and that there is no more room for anything new. It is here where a strong mandate by the University, department head, or even accreditation organization could be used to set the lead and require ongoing training and exploration of new tools and methods.

6. REFERENCES

- Chimi, C.J., LaMacchia, C. (2007). Student/Professor E-Mail Dynamics: An Initial Investigation. Decision Science Institute Southwest Region Proceedings. San Diego, CA, March 13-17, 2007, pp. 344-349.
- Cordes, S. (2009). Adult Learners: How IT Can Support "New" Students. *Educause Quarterly*. Volume 21, Number 1.
- Duran, R. L., Kelly, & L. Keaten, J. A. (2005). College Faculty Use and Perceptions of Electronic Mail to Communicate with Students. *Communication Quarterly*, 53, 2, 156-176.
- Euban, D. (2006, June 16) Legal contingencies for contingent professors. *The Chronicle of Higher Education*, pp. B8 – B10.
- Finder, Alan (2007, November 20) Decline of the Tenure Track Raises Concerns. *The New York Times*.
<http://www.nytimes.com/2007/11/20/education/20adjunct.html?pagewanted=1&r=1>
Retrieved July 5th, 2009
- Grant, K.A., Prescod, F. and Ho, H. (2006). Students Reactions to Online Course Delivery- a Contrast Between Fulltime and Part-time Students. *Information Systems Education Journal*, 4 (40).
<http://isedj.org/4/40/>. ISSN: 1545-679X. (Also appears in *The Proceedings of ISECON 2005*: §2345. ISSN: 1542-7382.)
- Johnson, M. (2007) Adult Learners and Technology: How to Deliver Effective Instruction and Overcome Barriers to Learning.
<http://ic.sjsu.edu/mjportfolio/found/AdultLearnersAndTechnology.pdf>
- Junco, R., Mastrodicasa, J. (2007). *Connecting to the NET.Generation: What Higher Education Professionals Need to Know About Today's Students*. National Association of Student Personnel Administrators (NASPA).
- June, A. W. (2009, October 18). *Love of Teaching Draws Adjuncts to the Classroom Despite Low Pay*. Retrieved October 27, 2009, from The Chronicle of Higher Education: <http://chronicle.com/article/Love-of-Teaching-Draws/48845/>.
- Oblinger, Diana. Boomers & Gen-Xers Millennials Understanding the New Students. *Educause*, July/August 2003, pps. 37-47.
- Polh, M., Rester, M., Judmaier, P., Reichl, F., Jerlich, J., Obermuller, E., Stockelmayr, K. (2006). Designing Communication and Cooperation Processes for Adult Learners.

- (Proceedings of the 10th IACEE World Conference on Continuing Engineering Education (WCCEE) April 19-21, 2006, Vienna University of Technology, Vienna, Austria.
- Saulnier, B.M. (2007). "Child is Father to the Man": Social Software in the IS 2007 Curriculum? *Information Systems Education Journal*, 5 (37), <http://isedj.org/5/37/>. ISSN: 1545-679X. (A preliminary version appears in *The proceedings of ISECON 2007*: 2534. ISSN: §1542-7382.
- Sheer, V.C. and Fung, T.K. (2007). Can Email Communication Enhance Professor-Student Relationship and Student Evaluation of Professor?: Some Empirical Evidence. *Journal of Educational Computer Research*. Volume 37, Number 3, pp. 289-306.
- Svinicki, Marilla (2004). *Learning and Motivation in the Postsecondary Classroom*. Boston: Anker Publishing.
- RIT Online Learning,
http://online.rit.edu/faculty/teaching_strat
- [egies/adult_learners.cfm](http://www.egies/adult_learners.cfm) Retrieved June 20, 2009.
- Ritter, C. (2007). The Challenges and Rewards of Adjunct Professors Who Teach in Educational Leadership Programs. <http://cnx.org/content/ml14560/latest> Retrieved June, 20, 2009.
- Tekinarslan, E. (2004). Project-based Distributed Learning and Adult Learners. *Turkish Online Journal of Distance Education – TOJDE*, April, 2004, ISSN:1302-6488, Volume 5, Number 2.
- Wickun, E.G., and Stanley, R.E. (2002). *The Role of Adjunct Faculty in Higher Education*. <http://mtprof.msun.edu/Win2000/Wickun.html> Retrieved June 20, 2009.
- Willis, D. (2005). E-Mail and Communication. *Encyclopedia of Information Science and Technology*. Vol. 2. (pp. 1024-1029). UK: Idea Group Reference.

APPENDIX A:

Survey Questions (*possible responses in italics*)

Page 1. Personal background

1. Please indicate your age group: *20-25; 26-30; 31-35; 36-40; 41-45; 46-50; over 50*
2. What is the highest degree you have earned to date: *Masters; Doctorate*
3. How many sessions (semesters) have you taught for University X: *1; 2; 3; 4; 5; 6 or more*
4. How many classes have you taught for University X: *1; 2; 3; 4; 5; 6 or more*
5. Overall, how many years of teaching experience do you have: *1; 2; 3; 4; 5; 6 or more*
6. How many other institutions do you teach at: *0; 1; 2; 3; 4 or more*
7. Have you taught an entirely online course: *Yes; No*
8. Are you currently employed in private industry outside of the Education field: *Yes; No*
9. Do you own a cell phone capable of receiving e-mail: *Yes; No*

Page 2. General interactions

10. Do you hold set regular office hours: *Yes; No*
11. If you have set office hours, approximately how many students per class contact you during those set office hours: *1; 2; 3; 4; 5; 6 or more*
12. Of the following list of forms of communication, please check any that you are required to have an account, or presence, in and share with your students. (School can be one other than RMU. Please check all that apply.) *In-person office hours; University e-mail; Personal e-mail (Gmail, Hotmail, Yahoo, etc.); Work e-mail; Instant messaging (AOL, Yahoo, ICQ, etc.); Social Network Site (Facebook, MySpace, etc.); Twitter; Personal Web Site; Online Presentation Service (Go to Meeting, etc.); Online Collaboration Service (Google Docs, etc.); Other (Please Specify)*

Page 3. Method 1 - University E-Mail

13. Do you use your University X issued e-mail address: *Yes; No*
14. Have you shared this address with your students: *Yes; No*
15. If you have shared this address, have any of your students communicated with you through that address: *Yes; No*
16. If you have shared this address, how has contact through this method improved interaction between you and the student: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

Page 4. Method 2 - Private E-Mail

17. Do you have a private e-mail address (G-mail, Hotmail, Yahoo, AOL, etc.): *Yes; No*
18. Have you shared this address with your students: *Yes; No*
19. If you have shared this address, have any of your students communicated with you through that address: *Yes; No*
20. If you have shared this address, how has contact through this method improved interaction between you and the student: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*
21. If you have not shared this address with your students, please check any reasons why you have not: (check all that may apply): *Personal privacy concerns; School policy disallows this;*

Control/funnel student communication through other channel; Concerns about archiving and keeping record of contact; Copyright/restricted materials distribution concern; Security concerns; Unaware technology existed; Unsure of how to use this technology

Page 5. Method 3 - Work E-Mail

22. Do you have a outside work e-mail address: *Yes; No*

23. Have you shared this address with your students: *Yes; No*

24. If you have shared this address, have any of your students communicated with you through that address: *Yes; No*

25. If you have shared this address, how has contact through this method improved interaction between you and the student: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

26. If you have not shared this address with your students, please check reasons why you have not: (check all that may apply): *Personal privacy concerns; School policy disallows this; Control/funnel student communication through other channel; Concerns about archiving and keeping record of contact; Copyright/restricted materials distribution concern; Security concerns; Unaware technology existed; Unsure of how to use this technology*

Page 6. Method 4- Instant Messaging

27. Do you have an Instant Messaging account (AOL, Yahoo, ICQ, etc): *Yes; No*

28. Have you shared this address with your students: *Yes;*

29. If you have shared this address, have any of your students communicated with you through that address: *Yes; No*

30. If you have shared this address, how has contact through this method improved interaction between you and the student: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

31. If you have not shared this address with your students, please check reasons why you have not: (check all that may apply): *Personal privacy concerns; School policy disallows this; Control/funnel student communication through other channel; Concerns about archiving and keeping record of contact; Copyright/restricted materials distribution concern; Security concerns; Unaware technology existed; Unsure of how to use this technology*

32. Would you be interested in exploring this technology more: *Yes; No*

33. How effective do you feel this technology could be in augmenting your communication with your students: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

Page 7. Method 5 - Social Networking Sites

34. Do you have a Social Networking website account (Such as Facebook or MySpace): *Yes; No*

35. Have you shared this address with your students: *Yes; No*

36. If you have shared this address, have any of your students communicated with you through that address: *Yes; No*

37. If you have shared this address, how has contact through this method improved interaction between you and the student: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

38. If you have not shared this address with your students, please check reasons why you have not: (check all that may apply): *Personal privacy concerns; School policy disallows this; Control/funnel student communication through other channel; Concerns about archiving and keeping record of contact; Copyright/restricted materials distribution concern; Security concerns; Unaware technology existed; Unsure of how to use this technology*

39. Would you be interested in exploring this method of communication more: *Yes; No*

40. How effective do you feel this technology can be in augmenting your communication with your students: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

Page 8. Method 6 - Twitter

41. Do you have a Twitter account: *Yes; No*

42. Have you shared this address with your students: *Yes; No*

43. If you have shared this address, have any of your students communicated with you through that address: *Yes; No*

44. If you have shared this address, how has contact through this method improved interaction between you and the student: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

45. If you have not shared this address with your students, please check reasons why you have not: (check all that may apply): *Personal privacy concerns; School policy disallows this; Control/funnel student communication through other channel; Concerns about archiving and keeping record of contact; Copyright/restricted materials distribution concern; Security concerns; Unaware technology existed; Unsure of how to use this technology*

46. Would you be interested in exploring this method of communication more: *Yes; No*

47. How effective do you feel this technology can be in augmenting your communication with your students: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

Page 9. Method 7 - Advanced web site features

48. Do you have a personal web site: *Yes; No*

49. Have you shared this address with your students: *Yes; No*

50. If you have shared this address, how has contact through this method improved interaction between you and the student: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

51. If you have not shared this address with your students, please check reasons why you have not: (check all that may apply): *Personal privacy concerns; School policy disallows this; Control/funnel student communication through other channel; Concerns about archiving and keeping record of contact; Copyright/restricted materials distribution concern; Security concerns; Unaware technology existed; Unsure of how to use this technology*

52. Would you be interested in exploring this method of communication more: *Yes; No*

53. How effective do you feel this technology can be in augmenting your communication with your students: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

Page 10. Method 8 - Hosted presentation services

54. Have you ever utilized online presentation services, such as "Go To Meeting", or "Adobe Connect": *Yes; No*

55. If you have used such technologies, where have you used online presentation services, such as "Go To Meeting" or "Adobe Connect": *Work; School; Both Work and School; Not applicable*

56. If you have utilized this technology, how has contact through this method improved interaction between you and the student: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

57. If you have not utilized this technology with your students, please check reasons why you have not: (check all that may apply): *Personal privacy concerns; School policy disallows this; Control/funnel student communication through other channel; Concerns about archiving and keeping record of contact; Copyright/restricted materials distribution concern; Security concerns; Unaware technology existed; Unsure of how to use this technology*

58. Would you be interested in exploring this method of communication more: *Yes; No*

59. How effective do you feel this technology can be in augmenting your communication with your students: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

Page 11. Method 9 - Online apps

60. Have you ever utilized online collaboration services, such as "Google Docs": *Yes; No*

61. If you have experienced such technology, where have you used online collaboration services such as "Google Docs": *Work; School; Both; Neither*

62. If you have utilized this technology, how has contact through this method improved interaction between you and the student: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

63. If you have not shared this address with your students, please check reasons why you have not: (check all that may apply): *Personal privacy concerns; School policy disallows this; Control/funnel student communication through other channel; Concerns about archiving and keeping record of contact; Copyright/restricted materials distribution concern; Security concerns; Unaware technology existed; Unsure of how to use this technology*

64. Would you be interested in exploring this method of communication more: *Yes; No*

65. How effective do you feel Online collaboration services such as Google Docs can be in augmenting your communication with your students: *1-7 rating (1 low, 4 no change, 7 greatly improved, 8 not applicable)*

Page 12. Most Common

66. What is the form of communication that has been MOST used by your students to contact you outside of the classroom? (Open Text Response)

APPENDIX B: RESULTS

Appendix B-1: Results Technologies 1 through 7

The number of respondents for each question varies as there were no restrictions placed forcing an answer to be given. Results are thus presented as number of responses out of number of respondents per question and a percentage for comparison purposes.

| | Univer- sity E- Mail | Private E-Mail | Work E- Mail | Instant Mes- saging | Social Net- working | Twitter | Per- sonal Web Sites |
|---|---|---|---|---|--|---|---|
| Do you have an account? | Yes 100% (68/68) | Yes 94.03% (63/67) | Yes 70.59% (48/68) | Yes 27.27 (18/66) | Yes 45.45% (30/66) | Yes 12.31% (8/65) | Yes 15.38% (10/65) |
| | | No 5.97% (4/67) | No 29.41% (20/68) | No 72.73% (48/66) | No 54.55% (36/66) | No 87.69% (57/65) | No 84.62% (55/65) |
| Have you shared with students? | 98.53% (67/68) | Yes 49.25% (33/67) | Yes 32.20% (19/59) | Yes 4.76% (2/42) | Yes 16.67% (7/42) | Yes 11.11% (3/27) | Yes 26.92% (7/26) |
| | | No 50.75% (34/67) | No 67.80% (40/59) | No 95.42% (40/42) | No 83.33% (35/42) | No 88.89% (24/27) | No 73.08% (19/26) |
| If shared, have stu- dents used this to com- municate? | Yes - 100% (68/68) | Yes 68.89% (31/45) | Yes 45% (18/40) | Yes 100% (2/2) | Yes 85.71% (6/7) | Yes 100% (3/3) | Not asked |
| | | No 31.11% (14/45) | No 55% (22/40) | | No 14.29% (1/7) | | |
| Has this method improved interac- tions? | Im- proved (values 5,6,7) 88.24% (60/68) | Im- proved (values 5,6,7) 60.42% (29/48) | Im- proved (values 5,6,7) 34.21% (13/38) | No change 50% (1/2) | Improved (values 5,6,7) 50% (5/10) | Im- proved (values 5,6,7) 66.67% (2/3) | Im- proved (values 5,6,7) 57.14% (4/7) |
| | No change (value 4) 8% (6/68) | No change (value 4) 6% (3/68) | No change (value 4)10% (4/38) | Slightly im- proved 50% (1/2) | No change 40% (4/10) | No change (value 4) 33.33% (1/3) | No change (value 4) 42.86% (3/7) |

| | Uni- versity E-Mail | Private E-Mail | Work E- Mail | Instant Messag- ing | Social Net- working | Twitter | Per- sonal Web Sites |
|---|------------------------------------|--|---|---|--|--|--|
| If you have not shared, why not? | Not asked | Privacy 68.97 % (20/29) | Funnel through another channel - 35.48%% (11/31) | Privacy 26.92% (7/26) | Privacy (64.52%) (20/31) | Privacy 33.33% (8/24) | Unsure of how to use 36.84% (7/19) |
| | | Funnel through another channel - 58.62% (17/29) | Privacy 32.26% (10/31) | Funnel through another channel - 23.08% (6/26) | Funnel through another channel - 32.36% (10/31) | Funnel through another channel - 25% (6/24) | Privacy - 31.58% (6/19) |
| Would you like to explore this tech- nology more? | Not asked | Not asked | Not asked | Yes 35.09% (20/57) | Yes 29.09% (16/55) | Yes 29.09% (16/55) | Yes 39.2% (20/51) |
| | | | | No 64.91% (37/57) | No 70.91% (39/55) | No 70.91% (39/55) | No 60.78% (31/51) |
| How ef- fective do you think this me- thod could be? | Not asked | Not asked | Not asked | Improve (values 5,6,7) 47.5% (19/40) | Improve (values 5,6,7) 42.86% (15/35) | Im- prove (values 5,6,7) 33.33% (11/33) | Im- prove (values 5,6,7) 51.52% (17/33) |
| | | | | No change (value 4) 42.5% (17/40) | No change (value 4) 45.71% (16/35) | No change (value 4) 51.52% (17/33) | No change (value 4) 42.42% (14/33) |

APPENDIX B-2: RESULTS TECHNOLOGIES 8 & 9

The number of respondents for each question varies as there were no restrictions placed forcing an answer to be given. Results are thus presented as number of responses out of number of respondents per question and a percentage for comparison purposes.

| | Have you ever Utilized: | Where have you used: | Has this method improved interactions? | If you have not shared, why not? | Would you like to explore this technology more? | How effective do you think this method could be? |
|--------------------------------------|--------------------------------|-----------------------------------|---|---|--|---|
| Hosted Presentation Services | Yes 12.9% (8/62) | Work 12.12% (4/24) | Improved (values 5,6,7) 85.71% (6/7) | Unsure of how to use 58.33% (14/24) | Yes 53.7% (29/54) | Improve (values 5,6,7) 69.44% |
| | No 87.1% (54/62) | Work & School 12.12% (4/24) | Greatly lessened interaction (value 1) 14.29% (1/7) | Funnel through another channel 12.5% (3/24) | No 46.3% (25/54) | No change (value 4) 30.77% (12/39) |
| Online Collaboration Services | Yes 13.85% (9/65) | School 11.11% (3/27) | Improved (values 5,6,7) 80% (8/10) | Unsure of how to use 47.62% (10/21) | Yes 55.56% (30/54) | Improve (values 5,6,7) 68.57% (24/35) |
| | No 86.15% (56/65) | Work & School 18.52% (5/27) | No change (value 4) 10% (1/10) | Unaware of technology 28.57% (6/21) | No 44.44% (24/54) | No change (value 4) 31.43% (11/35) |