# Ten Ways to Incorporate Technology Into a TESOL Teacher Preparation Program

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#### **Abstract**

A comprehensive approach for integrating technology into a TESOL teacher preparation program is described. Ten specific ways to assure constructivist technology use in teacher education are highlighted. These techniques have been synthesized into a compact model with three pillars: (a) electronic assessment system (e-portfolios for individual assessment and program evaluation), (b) teacher candidates' technology-based course assignments and performances, and (c) Web-based instruction and communication. The authors claim that within this three-pronged model flexibility of implementation is key to success for preservice and in-service teachers.

Our classes should not be merely lights and bells and whistles. As instructors, we must not succumb to the march of new technology...without clearly understanding what is needed and then how to use it. (Libby, 2006, p. 2)

The research agenda of the organization Teachers of English to Speakers of Other Languages (TESOL, 2004) highlighted three priorities related to the teacher practices for English language learners (ELLs), which may be applicable to other students from nonmainstream backgrounds. These three major areas are (a) "research that approaches English language learning as a system that requires planning, coordination of human and material resources, and continuous assessment on either a macro- or microlevel" (¶ 17), (b) "research that views English language learning as a process of individual change—built on cognition, the linguistic environment, exposure conditions, goals for the future, and perceptions of self-agency" (¶ 22), and (c) "research on English language learning as a sociopolitical activity." (¶ 26). Within the first priority, four subcategories were also identified, including (a) standards used to inform instruction and assessment, (b) the impact of teacher cognition on language learning, (c) using technology to facilitate instruction, and (d) impact of assessment on teachers and learners.

Not surprisingly, research suggestions related to technology are represented extensively throughout the document addressing either how to use technology to facilitate instruction or how to use technology to examine how learners store and retrieve information. More specifically, the *TESOL Research Agenda* stated that

It is now commonly accepted that technical literacy is both a means and an end for language learning. Computers provide learners with linguistic input as well as opportunities for language practice in ways that change their competence; at the same time, greater access globally to technologically mediated communication provides many learners with real and immediate motivation. Incorporating technology into a system of language learning, however, requires a significant commitment. More research is needed that can serve as a guide for how, when, and to what degree technology should be incorporated into given contexts. (Priorities for Research on English Language Learning Section, § 6)

Concerns about how to best teach the ELL and students from culturally diverse backgrounds have long been the focus of research studies, as well as teacher preparation resources (August & Hakuta, 1998; Cummins, 2001; Echevarria, Vogt, & Short, 2007; Ovando, Collier, & Combs, 2003; Thomas & Collier, 2002). Some studies have attempted to show a correlation between the use of technology by either teachers or students and subsequent student achievement (Egbert, Paulus, & Nakamichi, 2002; Verdugo & Belmonte, 2007), whereas other publications have described practical usage of technology in the English-as-a-second-language/bilingual classroom (Lacina, 2005; Richard, 2005).

However, few published resources specifically focus on the integration of technology in teacher preparation programs for teachers of English to speakers of other languages (also TESOL; Kassen, Lavine, Murphy-Judy, & Peters, 2007; Meskill, Mossop, DiAngelo, & Pasquale, 2002). The purpose of this article is to share our experiences with technology integration in the context of a standards-based TESOL teacher preparation program and to provide a possible model for the integration of technology into any teacher education program. The description of our experiences will include 10 ways technology is systematically incorporated into our preservice/in-service teacher preparation program, including the responsible use of computers as a tool for learning. Our model, built on these experiences, allows for a flexible combination of techniques and resources.

#### **Technology in Education**

Modern technology, the use of computers and the Internet, has become an integral part of everyday life. Youngsters of today—rightfully called the Y Generation or the Net Generation by Tapscott (1998)—have grown up on computers in a fully digital world. They search the Internet for information before they ride or walk over to the library; they create their own virtual profiles on MySpace; they view or post favorite videoclips on YouTube; they blog and chat online; they text and send photos via iPhones and Blackberries; they download music and videos onto iPods; they play virtual games; even the youngest ones can now attend to virtual pets on WebKinz or Shining Stars. Teachers of the 21st century, whether they are babyboomers or Generation X-ers, need to be prepared to educate this generation.

At Molloy College, we are dedicated to preparing a new cohort of teachers who utilize technology in a meaningful, constructivist manner to facilitate English language learning, as well as content area materials using digital resources. Some teacher candidates first have to overcome their own fear of technology or "digital anxiety" (Tapscott, 1998).

Others are anxious to learn the tricks of the trade and become technologically savvy; while others yet—often coming into the field of education from the business world—quickly transfer their advanced computer skills to the educational context.

We do not view technology and the use of computers within or outside the classroom as a fad or a cure-all. We strongly believe that our teacher candidates—and all future teachers—need to be trained in constructivist approaches to technology. They need to have hands-on experiences with technological tools that advance their own studies and educational and professional goals, as well as develop skills to be able to design appropriate learning activities for their students. Multiple perspectives, realistic and authentic tasks, activities and environments, self-analysis and reflection, experiential learning, and collaborative and cooperative learning are some of the themes associated with constructivist teaching and learning that we are relating to our discussion of how technology is incorporated in our teacher education programs (Murphy, 1997).

The faculty makes a concerted effort to model such activities in teacher education courses. We also engage our course participants in meaning-making, constructivist learning experiences so they can transfer the skills, knowledge, and dispositions they gain through their own studies into their current or future classrooms. For example, teacher candidates in the action research course, with the guidance of their instructor and after engaging in course assignments and class discussions, explore and develop research questions and then design a research study that incorporates technology and provides opportunities for students to use technology in authentic contexts. During and after the implementation of their action research projects they reflect on their experiences and construct their own knowledge about what technology worked or did not work in their classrooms and how it could be best used in real-life teaching contexts. Data are analyzed using various computer programs, and findings are presented using PowerPoint.

In today's standards-driven milieu, we frequently look to the standards for teachers established by national professional organizations such as the *National Educational Technology Standards* (NETS) for Teachers created by the International Society for Technology in Education (ISTE, 2000). These categories provide a framework for linking performance indicators within the Profiles for Technology Literate Students to the standards. Teachers can use these standards and profiles as guidelines for planning technology-based activities in which students achieve success in learning, communication, and life skills. These standards address the following six areas:

- 1. Teachers demonstrate a sound understanding of technology operations and concepts.
- 2. Teachers plan and design effective learning environments and experiences supported by technology.
- 3. Teachers implement curriculum plans that include methods and strategies for applying technology to maximize student learning.
- 4. Teachers apply technology to facilitate a variety of effective assessment and evaluation strategies.
- 5. Teachers use technology to enhance their productivity and professional practice.
- 6. Teachers understand the social, ethical, legal, and human issues surrounding the use of technology in PK-12 schools and apply those principles in practice.

#### What Are Our Teacher Candidates Expected to Do?

We have integrated a carefully designed technology component into each of our 100+ undergraduate and graduate education course outlines, including all TESOL-related courses. All undergraduate and graduate education content methodology courses require

teacher candidates to adapt their lesson plans to meet the needs of special learners. Given the proximity of our campus to communities with large populations of ELLs, our teacher candidates often participate in field placements in these areas that provide hands-on experiences and opportunities to learn about their linguistic requirements. These experiences prove that content area lessons and related activities must be adapted to meet their special needs. Software and translation Web sites are frequently the technology tools of choice as lesson adaptations are considered. Brainpop (<a href="http://brainpop.com/">http://brainpop.com/</a>), a Web site that includes video clips related to a plethora of content area topics, is now available in Spanish, and teacher candidates have reported that it has been useful for both remediation and enrichment with native Spanish-speaking ELLs.

The technology requirement for each course is aligned with course content, New York State Learning Standards, and The Interstate New Teacher Assessment and Support Consortium teacher preparation standards (Council of Chief State School Officers, 1992). For example, a course designed to explore English language arts methodology for English language learners has the following technology statement in its syllabus:

Technology will be highlighted in this course in the following ways:

- 1. Websites related to cultural and linguistic diversity will be accessed as sources of information for lesson plans, teaching strategies, differentiated instruction, and curricular material development.
- 2. Translation websites will be utilized in the preparation of materials adapted to the first languages of ELLs.
- 3. Electronic journal articles may be used for various assignments.
- 4. Computer software adapted to the special academic needs of ELLs will be presented and evaluated in class.

In addition to this comprehensive approach to technology integration into all of our teacher education programs, there are 10 unique ways we assure constructivist technology use in the TESOL program.

#### Ten Approaches to Technology Integration

#### **Electronic Portfolio Assessment System**

Electronic portfolios have become common in institutions of higher education that aspire to earn national accreditation and need to collect data analytically in an electronic assessment system. Some e-portfolio companies include Chalk and Wire (<a href="http://www.chalkandwire.com">http://www.chalkandwire.com</a>), LiveText (<a href="http://college.livetext.com">http://college.livetext.com</a>), and Foliotek (<a href="http://www.foliotek.com">http://www.foliotek.com</a>). At Molloy College e-portfolios are more than "higher education's new 'got to have it' tool—the show-and-tell platform of the millennium" (Kohn & Hibbitts, 2004, p. 7). As each candidate collects and uploads benchmark performances to a specially designated Web page of the Chalk and Wire Web site, course professors assess the work online utilizing comprehensive, analytic rubrics.

Thus, our professional education unit is able to analyze each dimension of each rubric for areas of strength and weakness, and our students may also elect to archive and expand their e-portfolios into personal/ professional Web spaces (Kohn & Hibbitts, 2004). In regard to the latter, teacher candidates are given the opportunity to self-analyze and reflect on their academic growth as they select pieces to include in their e-portfolios that represent who they are as individuals and as professionals entering the field of teaching.

#### PowerPoint Presentations, SmartBoard Technology, and Desktop Publishing

In all TESOL teacher preparation courses, both instructors and course participants frequently use PowerPoint presentations and SmartBoard technology either to present course content or student work. These tools allow for interesting and engaging classroom presentations. For example, in a course titled Teaching English Language Learners, teacher candidates are required to observe or interview an English-as-second language (ESL) teacher or program coordinator. When they report back to the class on the findings of these observations/interviews, they are expected to prepare multisensory presentations such as PowerPoint, preferably also using SmartBoard technology. In other cases, teacher candidates create their own brochures on ESL program field interviews by using desktop publishing software. Their findings are shared with classmates during oral presentations, and printed materials are distributed.

Teacher candidates have reported that these materials are extremely useful as they learn how various school districts organize and deliver services to ELLs. In addition to discussing the student population and the observed/interviewed teachers' instructional approaches and methodologies, they discuss the kinds of materials used and the ways instructional technology is utilized in the local school districts.

Course participants frequently report on the use of software programs such as Rosetta Stone (2006), the Living Book Series, or CD-Rom Dictionaries. Through this course, teacher candidates construct their own knowledge of how technology is used in various school districts as a medium to teach language and content effectively to ELLs. In addition, they utilize the kind of technology that they decide is the best tool to convey this information to their instructor and peers.

### **Hybrid Course on Cultural Diversity**

"Web-based education uses the Internet and communication technologies, ranging from the Internet as a research tool to taking online classes .... Hybrid or blended courses are those that combine online components with traditional, face-to-face components" (Tallent-Runnels et al., 2006, p. 94). The course, Meeting the Needs of Culturally Diverse Students in the Inclusive Classroom, is a cornerstone experience in the TESOL program. It is designed to offer a comprehensive theoretical and practical overview of multicultural education. Since the course is also a core requirement in all other graduate education programs, we offer it in every semester, including both summer sessions, and have experimented with the hybrid version of it since 2004. The following is a representative sample of typical Web-based assignments that students need to tackle first on their own and then collaboratively discussing as part of their online participation.

There has been a tremendous amount of discussion about educational equity and equitable and inequitable classrooms. Everyone talks about it, but few say what it is. Your task this week is to explore the following: What is an equitable classroom? How can you tell whether a classroom is equitable? Visit the Mid-Atlantic Equity Center's website <a href="http://www.maec.org/tadocs/eqclass.html">http://www.maec.org/tadocs/eqclass.html</a> and review the checklist posted there. Based on what you have found on this website, in the Nieto (2008) text book or any other web-based or print resources you wish to consult, synthesize what educational equity is in your own words. Post your response on the Discussion Board. Make sure you read at least two classmates' responses and comment on their understanding of what educational equity is.

By synthesizing their own interpretations of topics and sharing them with their peers, as well as commenting on their peers' interpretations of the same topics, teacher candidates experience multiple perspectives of concepts and content.

### **Web-Based Assignments in Traditional Courses**

Web-based assignments require teacher candidates to research and evaluate assigned Web sites and select those they find most useful for the classroom. The Evaluation of a Web site assignment requires teacher candidates to evaluate assigned Web sites before they teach their students to do the same. Evaluating Web sites helps students develop the critical thinking skills they need to determine the accuracy and authenticity of Web sites they may encounter. One assignment is taken from Kathy Schrock's (n.d.) *Critical Evaluation of a Website: Secondary School Level.* Using the evaluation form, individually or in groups, teacher candidates evaluate and then rank assigned websites based on listed criteria. They focus on three parts: (a) technical and visual aspects of the page, (b) content, and (c) authority.

In addition, teacher candidates are also encouraged to use various Web sites that they find useful as resources in their course assignments. Some of the most popular Web sites, among teacher candidates are listed in <u>Appendix A</u>.

Written lesson plans are also required to incorporate the use of technology, and teacher candidates frequently use lesson plan Web sites as they begin to design their content area lessons. Remediation and enrichment activities are prime candidates for using Web sites and software designed for these purposes. Web sites such as "Bare Bones 101: A Basic Tutorial on Searching the Web"

(http://www.sc.edu/beaufort/library/pages/bones/bones.shtml) are introduced to the teacher candidates so they can use them with ELLs of all ages. The site provides search strategies and offers information about subject directories and search engines.

#### Video Final Exam

In a course called Second Language Acquisition: Theory and Practice, teacher candidates are provided with both theoretical and practical experiences related to working with ELLs. Since the course involves a tutoring project and firsthand experience in working with an ELL during the semester, the final exam is a nontraditional assessment in which teacher candidates critique and analyze a video clip of an actual ESL class. This type of assessment provides them the opportunity to meld what they have learned about second language acquisition theory and practical experience gained from participating in the ELL tutoring project. Videos are made available for course participants from the college's media center. Videoclips that allow viewers to take a look inside actual classrooms are also online at various educational Web sites, including Reading Rockets (<a href="http://www.readingrockets.org/podcasts/classroom">http://www.readingrockets.org/podcasts/classroom</a>). The following sample final exam has been successfully used in this course:

After watching a 15-20 minute video excerpt of a TESOL professional working with English Language Learners, comment on the teaching-learning process from the vantage point of second language acquisition theory and practice. Relate what you see to theoretical and practical aspects of second language learning and teaching.

The benefits of using videos for preservice teacher education have been confirmed by several sources that promote experiential learning. Stempleski and Tomalin stated,

"Using a video sequence in class is the next best thing to experiencing the sequence in real life..." (as quoted in Ebsworth, Feknous, Loyet, & Zimmerman, 2004, p. 146). Using video as a final exam in a TESOL teacher education program was designed to capitalize on the benefits of using the video as a medium to prepare ESL teachers. Integrating video technology requires teacher candidates to engage in critical observation and analysis of actual instruction. In so doing, they reflect on their own beliefs about second language acquisition theory and practice. They are also encouraged to construct meaning of the experiences observed. Teacher candidates acquire conceptual and foundational knowledge, as well as dispositions to enhance multiple intelligences, learning styles, and cultural diversity (Rodriguez & Pelaez, 2002). The primary principles of constructivist theory are applied by the teacher candidates as they assimilate their new content knowledge with their prior knowledge. Similarly, student learners take part in the construction of new knowledge as they combine their new language with their native language understandings.

#### Linguistic Research Paper on the Language of Television

In an introductory theoretical course on linguistics, our TESOL teacher candidates are expected to complete a field assignment that entails a comprehensive linguistic analysis of a 5-minute long videotaped and transcribed segment of a selected television program. In this assignment candidates are expected to meet the following course objectives: (a) use the terminology employed in linguistics appropriately, (b) examine the way languages are structured and used, (c) explain observations about the English language using linguistic categories and principles (Parker & Riley, 2005), (d) practice the basic skills of linguistic analysis through independent field work, and (e) apply linguistic concepts and knowledge to the ESL classroom. The purposes of this assignment also include raising awareness about the varieties of English that surround the TV viewer and sensitizing the teacher candidates to the complexity of the task confronting ELLs who watch television.

The task involves the following steps: (a) videotaping a TV program that depicts a family situation, (b) transcribing approximately 5 minutes of the show, (c) analyzing the tape-recorded sample for nonstandard English in the areas of phonology, morphology, syntax, semantics, pragmatics, and language variation, and (d) discussing the findings in light of the task ELLs face when they watch American television. The task is authentic and requires teacher candidates to reflect on the complex issue of comprehension facing ELLs in the real world. The ultimate goal is for teacher candidates to decide whether (a) TV is a good source of input for learning English, (b) watching TV can interfere with or complement what is being taught in the classroom, (c) TV can be used as an input source in light of the variety of English used in the classroom.

## **New York State ESOL Content Specialty Test Preparation**

In order to be certified as an English for speakers of other languages (ESOL) teacher in New York State, teacher candidates need to pass a series of certification exams. The first two exams—LAST (Liberal Arts and Science Test) and ATS-W (Assessment of Teaching Skills-Written) are required of all teacher candidates regardless of certification area. The third test is unique to each certification, so those seeking ESOL positions in New York need to pass the Content Specialty Test in ESOL. No published resource is available except for the sample tests and guidelines available on the New York State Education Department Web site (2003).

Many of our required or recommended texts have companion Web sites that double as test preparation resources. Borich's (2007) *Effective Teaching Methods* (http://wps.prenhall.com/chet\_borich\_effective\_6/) and Pence and Justice's (2008)

Language Development: From Theory to Practice (<a href="http://wps.prenhall.com/chet\_pence\_language\_1/">http://wps.prenhall.com/chet\_pence\_language\_1/</a>) both have such online support Web sites. Another excellent resource is the companion Web site to Henn-Reinke and Chesner's (2006) Developing Voice Through the Language Arts (<a href="http://www.sagepub.com/dvtlastudy/">http://www.sagepub.com/dvtlastudy/</a>). The multiple-choice questions present a self-directed practice opportunity to our candidates, since the Web sites offer the correct answers as well as thorough explanations. They also provide an opportunity for our candidates to collaborate on test preparation and practice together the skills necessary to succeed on the teacher preparation exams.

#### **Tape-Recorded Tutoring**

The ELL tutoring project in the course titled Second Language Acquisition: Theory and Practice requires teacher candidates to meet with an ELL for a minimum of 8 hours. They must identify the communicative needs and goals of their students and design activities to help them meet those goals. Using a combination of strategies, teacher candidates must tape record sessions and analyze what happened during the sessions. Digital voice recording is also encouraged and used by many course participants. Teacher candidates keep a journal of their activities, as well as their students' responses and progress. In their journals, they reflect upon what worked, what did not work, and why. They then submit the reflective journal in two parts; the first half after 4 hours of tutoring at midsemester, and the second half after the completion of the tutoring project, but no later than 2 weeks before the end of the semester.

Requiring teacher candidates to record the tutoring sessions and complete a postanalysis ( $\frac{\text{Appendix B}}{\text{B}}$ ) prepares them to become reflective practitioners. They reflect on the activities and strategies that they utilized with their tutees and examine their efficacy. Reflection enables teacher candidates to gain a deeper understanding of their instruction and plan for future practice. Honigsfeld and Schiering (2004) have documented that when teachers have the opportunity to reflect on their teaching practices, they develop (a) a better understanding of the teaching process, (b) stronger pedagogical skills, and (c) improved attitudes toward the teaching-learning process and their diverse students .

#### Message Board

The Molloy College intranet information portal includes both a chatroom and a message board for instructional purposes. The message board has gained increasing popularity among faculty and students, alike, to communicate online about course assignments, to clarify course requirements, and to share important resources to supplement face-to-face classes. We have found that the most successful message boards incorporate the characteristics of authentic learning tasks, such as student interaction for the purposes of "sharing their thoughts, relating their ideas to past experiences, collaborating with their peers, actively constructing their own meaning, and incorporating the diverse perspectives of others" (Woo, Herrington, Agostinho, & Reeves, 2007, p. 38).

#### **Action Research With Technology Integration**

The purpose of our two-semester-long action research course is the development of a proposal for classroom action research and the implementation of the project. Course participants are expected to reflect on their classroom practice, evaluate existing professional literature and research, develop action research questions, and then design and implement a practical investigation. We share Edge's (2002) to-the-point summary of the ultimate purpose of conducting action research: "Do not just believe it. Experience

it. What is the point of simply knowing it? Do it" (p. 9). We define the long-range course outcomes for teachers as becoming career-long learners, using action research to inform instruction and, thereby, to develop "best practice" strategies and activities.

In the TESOL program, the focus of the action research needs to be on language and literacy development; however, topics may include collaborative learning, differentiated instruction, learning styles, multiple intelligences, technology, or any other issue related to current research and practice in the teaching-learning process. The use of technology for a variety of purposes is considered essential in the development, implementation, and presentation of the research. Candidates conduct literature searches, develop a thesis paper, analyze their data using various computer programs, and present their findings using PowerPoint. Recently, we have seen an emergence of thesis topics directly focusing on technology, including (a) technology integration and ELLs' literacy skills, (b) podcasting to enhance oral language proficiency, (c) the use of television to enhance vocabulary development, and (d) film and second language literacy text.

Beyond these 10 approaches, additional implementations of technology also characterize our program. All division-wide, program-specific, or course-related announcements are made through the email system. Depending on the course content, some faculty members frequently take advantage of the college's subscription to TurnItIn (<a href="http://www.turnitin.com/">http://www.turnitin.com/</a>), a Web-based plagiarism prevention tool. Others create blogs or wikis for their courses. Coursework often requires the use of online journals or supplemental online sites related to the assigned textbook, such as mylabschool.com. We have noted that teacher candidates tend use these resources more frequently than traditional printed materials based on reference pages of their assignments.

#### **Model for Technology Integration**

The techniques described above can be synthesized into a compact model with three pillars: (a) electronic assessment system (e-portfolios for individual assessment and program evaluation), (b) teacher candidates' technology-based course assignments and performances, and (c) Web-based instruction and communication. Within this three-pronged model, flexibility of implementation is key to success and empowerment for preservice and in-service teachers. The increased reliance on technology in schools is a given, whether it be communication with the administration, the collection of data, or the use of technology to improve test scores. It is the responsibility of teacher preparation programs to prepare candidates with the latest technological tools of the profession.

Helping our teacher candidates become proficient in using technology in a constructivist way in all of their academic endeavors is woven throughout our programs. We provide opportunities for constructivist teaching and learning through authentic, real-life tasks and situations. Experiential learning with and through technology is emphasized in all of our courses. In addition, we continuously implement the *National Educational Technology Standards for Teachers*. The Division of Education has a dedicated computer lab with a staff that provides individual assistance to teacher candidates when needed.

Among the first requirements of all of our programs is a course aimed at providing teachers with the technology tools needed for successful lesson planning. At the undergraduate level, teacher candidates take a course titled Instructional Technology for Teachers, and at the graduate level they take Advanced Technology for Inclusive Classroom Teachers or Advanced Instructional Technology, a course taken by those who demonstrate mastery of the skills learned in the basic courses.

Technology offers our TESOL teacher candidates a medium by which they can enrich and transform language learning and teaching for their ELLs. It can be a bridge that connects the current knowledge of diverse students and the knowledge we want them to acquire. What best describes this approach is often labeled as constructivist learning, which was summarized by Grace (1999) as one that is "continual, effortless, independent of reward and punishment, never forgotten, inhibited by testing, and dependent on the growth of the learner." Smith (as quoted in Grace) claimed that, on the other hand, learning is often viewed as "occasional, hard work, dependent on reward and punishment, easily forgotten, ensured by testing, and dependent on memorization" (p. 50).

Technology integration should not be done just on occasion, nor is it meant to be hard work that can be easily forgotten. We expect teacher candidates not to use technology for the sake of simply using it, but rather to engage in critical analysis and reflection to identify which modes of technology most complement their teaching and student learning outcomes. Through analysis and reflection we can learn how technology can be used effectively in a TESOL preparation program.

#### References

August, D., & Hakuta, K. (Eds.). (1998). *Educating language-minority children*. Washington, DC: National Academy Press.

Borich, G. D. (2007). *Effective teaching methods: Research based practice* (6th ed.). Upper Saddle River, NJ: Pearson.

Council of Chief State School Officers. (1992). *Recommendations for improving assessment and monitoring of students with Limited English Proficiency*. Author: Washington D.C.

Cummins, J. (2001). Instructional conditions for trilingual development. *International Journal of Bilingual Education and Bilingualism*, 4(1), 61-75.

Ebsworth, M. E., Feknous, B., Loyet, D., & Zimmerman, S. (2004, April). Tape it yourself: Videotapes for teacher education. *ELT Journal*, *58*(2), 145-154.

Echevarria, J., Vogt, M., & Short, D. J. (2007). *Making content comprehensible for English Learners: The SIOP model* (3rd ed.). Boston: Allyn and Bacon.

Edge, J. (Ed.). (2001). Action research. Alexandria, VA: TESOL.

Egbert, J., Paulus, T. M., & Nakamichi, Y. (2002). The impact of CALL instruction on classroom computer use: A foundation for rethinking technology in teacher education. *Language Learning and Technology*, *6*(3), 108-126.

Grace, M. (1999). When students create curriculum. *Educational Leadership*, *57*(3), 50-52.

Henn-Reinke, K., & Chesner (2006). *Developing voice through the language arts.* Thousand Oaks, CA: Sage.

Honigsfeld, A., & Schiering, M. (2004). Diverse approaches to the diversity of learning styles in teacher education. *Educational Psychology*, 24, 487-507.

International Society for Technology in Education. (2000). *Educational technology standards and performance indicators for all teachers.* Retrieved from <a href="http://www.iste.org/Content/NavigationMenu/NETS/ForTeachers/2000Standards/NETS">http://www.iste.org/Content/NavigationMenu/NETS/ForTeachers/2000Standards/NETS for Teachers 2000.ht</a>

Kassen, M. A., Lavine, R. Z., Murphy-Judy, K., & Peters, M. (Eds.). (2007). *Preparing and developing technology-proficient L2 teachers*. San Marcos, TX: The Computer Assisted Language Instruction Consortium.

Kohn, E. R., & Hibbitts, B. J. (2004). Beyond the electronic portfolio: A lifetime personal web space. *Educause Quarterly*, *27*(4), 7-10.

Lacina, J. (2005). Promoting language acquisitions: Technology and English language learners. *Childhood Education*, *81*, 113-115.

Meskill, C., Mossop, J., DiAngelo, S., & Pasquale, R. K. (2002). Expert and novice teachers talking technology: Precepts, concepts, and misconcepts. *Language Learning and Technology*, *6*(3), 46-57.

Murphy, E. (1997). *Characteristics of constructivist learning and teaching*. Retrieved from the Memorial University of Newfoundland Web site: <a href="http://www.stemnet.nf.ca/~elmurphy/emurphy/cle3.html">http://www.stemnet.nf.ca/~elmurphy/emurphy/cle3.html</a>

New York State Education Department. (2003). *New York State teacher certification examination preparation guide: English to speakers of other languages (ESOL)*. Retrieved from http://www.nystce.nesinc.com/PDFs/NY\_fld022\_prepguide.pdf

Ovando, C.J., Collier, V.P., & Combs, M.C. (2003). *Bilingual and ESL classrooms: Teaching in multicultural contexts* (3rd ed.). New York: McGraw-Hill.

Parker, F., & Riley, K. (2005). *Linguistics for non-linguists* (4th ed.). Boston: Allyn and Bacon.

Pence, K. L., & Justice, L. M. (2008). *Language development: From theory to practice*. Upper Saddle River, NJ: Pearson.

Richard, C. (2005). The design of effective ICT-supported learning activities: Exemplary models, changing requirements, and new possibilities. *Language Learning and Technology*, *9*(1), 60-79.

Rodriguez, D., & Pelaez, G. (2000, November) *Reaching TESOL teachers through technology.* Paper presented at the annual meeting of Teachers of English to Speakers of Other Languages, Puerto Rico.

Rosetta Stone. (2006) [Software]. Available from www.rosettastone.com

Shrock, K. (n.d.). *Critical evaluation of a website: Secondary school level*. Retrieved from <a href="http://school.discoveryeducation.com/schrockguide/evalhigh.html">http://school.discoveryeducation.com/schrockguide/evalhigh.html</a>

Tallent-Runnels, M. K., Thomas, J. A., Lan, W. Y., Cooper, S., Ahern, T. C., Shaw, S. M., & Liu, X. (2006). Teaching courses online: A review of the research. *Review of Educational Research*, *76*(1), 93-135.

Tapscott, D. (1998). *Growing up digital: The rise of the net generation*. New York: McGraw-Hill.

Teachers of English to Speakers of Other Languages. (2004). *TESOL research agenda*. Retrieved from <a href="http://www.tesol.org/s\_tesol/seccss.asp?CID=236&DID=1708">http://www.tesol.org/s\_tesol/seccss.asp?CID=236&DID=1708</a>

Thomas, W.P., & Collier, V. P. (2002). *A national study of school effectiveness for language minority students' long-term academic achievement.* Retrieved from the eScholarship Repository Web site: <a href="http://repositories.cdlib.org/crede/finalrpts/1">http://repositories.cdlib.org/crede/finalrpts/1</a> 1 final/

Verdugo, D. R., & Belmonte, I., A. (2007). Using digital stories to improve listening comprehension with Spanish young learners of English. *Language Learning and Technology*, *11*(1), 87-101

Woo, Y., Herrington, J., Agostinho, S., & Reeves, T. C. (2007). Implementing authentic tasks in Web-based learning environments. *Educause Quarterly*, *30*(3), 36-43.

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# Appendix A Favorite Web Sites for Teachers

## 1. Teaching ideas

www.eslcafe.com www.colorincolorado.org www.scholastic.com www.webenglishteacher.com/esl.html

#### 2. Internet translation sites

http://babelfish.yahoo.com www.itools.com

#### 3. Culture-specific information

www.culturalorientation.net/pubs.html www.culturegrams.com

#### 4. Online dictionaries

www.wordcentral.com www.dictionary.reference.com

5. An online source for idioms, sayings, and figures of speech

#### www.clichesite.com/index.asp

6. Lesson plans, classroom resources, teaching tips

www.everythingesl.net www.atozteacherstuff.com www.educationworld.com www.eslpartyland.com

7. Lesson plans, classroom resources, games

http://school.discoveryeducation.com http://puzzlemaker.school.discoveryeducation.com www.eslkidstuff.com www.abcteach.com

# Appendix B Post-Tutoring Project Questions

#### **Tutoring**

- 1) Describe your English Language Learner (age, grade level, skills, and dispositions).
- 2) Describe your tutoring setting (time and place, e.g. library during lunch time 12-1pm; student's home after school 5-6pm).
- 3) What were your student's communicative needs and goals?
- 4) List key activities did you design to meet your student's needs
- 5) How did the student respond to these activities? Be specific.
- 6) What strategies did you utilize to meet your student's needs?
- 7) How did you assess the knowledge and skills your student gained from your tutoring?
- 8) What worked?
- 9) What did not work? Why?
- 10) What would you do differently next time? Suppose your tutoring continued, what would your future tutoring sessions with this student look like?
- 11) Please reflect on the overall tutoring experience. To what extent do you feel that you benefited from the experience, if at all? Explain.

#### Course

- 1) How did the content of our lessons on second language theory and practice (discussions, lecture, group activities and projects, presentations, videos, demonstrations) inform your tutoring experience? Please provide a specific and detailed response.
- 2) What did you learn about second language acquisition from this course?
- 3) What issues were not at all or very briefly addressed that you would like to know more about?
- 4) What would you change about this course (the content or yourself as a learner)?

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