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Assessment Literacy for Teacher Candidates: A Focused Approach

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Abstract

The assessment of student learning has always been an integral element of the craft of teaching; however, contemporary demands for demonstrable student growth and teacher accountability have heightened the importance of this domain of professional responsibility. Additionally, there is evidence that many novice and experienced teachers tend to be relatively weaker in this domain as compared to other areas of professional practice, such as instructional planning, instructional delivery, and classroom management. This article describes an approach to developing the assessment literacy of teacher candidates in a nationally accredited, public university. A definition of assessment literacy and a conceptual framework for the foundational knowledge and skills of assessment literacy are presented and explained within the context of a focused, one-credit course for pre-service general education teachers. Evidence of impact is provided, as are limitations and cautions. The article concludes with grounded insights into the need to develop the assessment literacy of teacher candidates.

Keywords: assessment literacy, teacher candidates, teacher preparation

Assessment Literacy for Teacher Candidates: A Focused Approach

The assessment of student learning has always been part of the craft of teaching. Consider, for example, the Socratic method: It is one of our oldest instructional models, and it can be characterized simply as teaching through questioning. In modern parlance, the Socratic method is the use of assessment *for* learning. The teacher poses a question to determine the present understanding of her student, and then engages the student in a series of questions and answers with the intent of leading the student to a new understanding of the topic at hand.

In the contemporary education context, assessment has taken on new roles beyond progressing student learning. The passage of *No Child Left Behind* in 2001 established federal expectations for the assessment of student learning by each of the states as an accountability measure. More recently, states such as Virginia have enacted standards that require the demonstration of student progress as a significant component of teachers' evaluations (Virginia Board of Education, 2011). These movements have placed increasing importance on the role of assessment for purposes of evaluation—that is, the measuring of student learning in order to render judgments of the effectiveness or value of instructional efforts.

The Socratic method and current teacher evaluation standards represent two ends of what we might consider the spectrum of assessment. At one end is the use of assessment as an instructional strategy, and at the other end is the use of assessment as a means for holding educators accountable. In between these sits a more classic view of assessment, which has been defined as the creation and use of a technique or instrument to gather relevant and dependable information about the nature and degree of a student's acquisition of intended knowledge and skills (Gareis & Grant, 2008). Conventionally, such assessment practices in the classroom might take the form of quizzes, unit tests, and formal assignments. They might also take the form of standardized diagnostic assessments such as Phenomenological Awareness Literacy Screening (PALS) or teacher-made pre-assessments. Teacher-directed assessment practices also include the use of techniques such as personal whiteboards, exit cards, thumbs-up/thumbs-

down, student conferences, and even watching facial expressions. This spectrum of classroom-based, teacher-directed assessment practices represents the means by which a teacher gathers relevant and dependable information about the nature and degree of student learning so that she can then draw inferences, make decisions, communicate with others, and take instructional actions.

Taken together, the use of assessment *for* learning (e.g., the Socratic method), the use of external standardized assessments (e.g., state assessments), and the use of a variety of assessments in the classroom by teachers (e.g., thumb-up/thumbs down and unit tests) represent the domain of assessment as a set of professional competencies. The assessment domain has been conceptualized by government bodies and professional associations, and there is broad consensus on the competencies that constitute the domain. A sample comparison is presented in Table 1, and it includes the Commonwealth of Virginia’s Uniform Performance Standards, the Council of Chief State Schools Officers’ Interstate New Teacher Support and Assessment Consortium (InTASC) standards, and the National Board for Professional Teaching Standards (NBPTS).

Table 1

Sample Standards for the Domain of Assessment as Articulated at the State and National Levels

Virginia Uniform Performance Standards (Virginia Board of Education, 2011, p. 7)	Interstate New Teacher Support and Assessment Consortium (2011, p. 9)	National Board for Professional Teaching Standards (1989)
“The teacher systematically gathers, analyzes, and uses all relevant data to measure student academic progress, guide instructional content and delivery methods, and provide timely feedback to both students and parents throughout the school year.”	“The teacher understands and uses multiple methods of assessment to engage learners in their own growth, to monitor learner progress, and to guide the teacher’s and learner’s decision making.”	“NBCTs know how to assess the progress of individual students as well as the class as a whole.” “They use multiple methods for measuring student growth and understanding, and they can clearly explain student performance to parents.”

Although Table 1 presents a limited sample, it is evident that there is common agreement about what constitutes the domain of assessment for classroom teachers.

The Importance of Assessment in Teaching and Learning

What is also becoming evident is that the use of assessment practices by classroom teachers can

have powerful effects in terms of student learning. This conclusion gained great attention in 1999 with the publication of the work of the Assessment Reform Group (ARG) out of the United Kingdom. The ARG researchers found that improving teachers' classroom-based assessment practices could have an impact on student learning equivalent to a year of instruction. This finding generated considerable interest among researchers, practitioners, and policy makers, alike. The seminal publication of the ARG marked the beginning of more than a decade of focused attention on such related topics as classroom assessment, formative assessment, and assessment *for* learning.

More recently, a number of scholarly works have been published with the intent of synthesizing the bodies of research and scholarship related to teachers' assessment practices (e.g., Andrade & Cizek, 2010; McMillan, 2013). A review of these works makes evident a few key themes. First, there is a strong theoretical foundation supporting the role that effective classroom assessment practices can play in the learning and achievement of students. Second, there is a significant need for empirical research to bolster this theoretical position. And, third, while the field of educational testing and measurement has become more sophisticated and robust during the past half century, our understanding of the effectiveness of specific assessment practices for pre-service and in-service teachers is still relatively nascent.

Assessment as a Relative Weakness

While classroom assessment is evidently important to teaching and learning, it is also a relative weakness among many teachers. Research from more than 20 years ago bears this out (Stiggins & Conklin, 1992). Despite this long awareness, the evidence that teachers continue to be ill-prepared in the domain of assessment persists to the present day. For example, ten years ago, an empirical study of in-service teachers in Virginia found that assessment was the least adequately documented domain of teaching responsibility among the sample (Tucker, Stronge, & Gareis, 2003). In an anecdotal accounting of the state of public education in the U.S. in the popular book *Results Now* by Mike Schmoker (2006), the author observed that it was "apparent that student assessment was surprisingly rare and haphazard.

Students would spend days, even weeks, on activities without being assessed” (p. 86). That same year, an empirical study of novice teachers concluded that assessment was the weakest competency among first-year teachers (Good, McCaslin, Tsang, et al., 2006). In 2013, a review to the state of teacher preparation for classroom assessment in the *Journal of Teacher Education* concluded that “despite assessment education efforts, beginning teachers continue to feel unprepared to assess student learning” (DeLuca & Bellara, 2013, p. 357).

In summary, there is evidence that teachers’ assessment practices in the classroom can have a significant impact on student learning, but we have not had a clear understanding of what those assessment practices should necessarily be nor have we done a particularly good job of preparing teachers to engage in these practices as in-service teachers.

Current Standards for *Assessment Literacy*

Given the need for teachers to develop competencies related to the use of assessment in the classroom, there have been recent calls to define and to develop teachers’ *assessment literacy*. Although there is not currently a universally agreed upon definition of the term, *assessment literacy* can be defined as the creation and use of the spectrum of assessment techniques and instruments as part of the teaching-and-learning process. Another way to understand the term is by way of analogy. *Literacy* refers to one’s ability read, write, and orally communicate in order to get along in the world. Similarly, *assessment literacy* refers to a teacher’s ability to create and use assessment practices in order to progress student learning in the classroom.

One of the early uses of the term *assessment literacy* was by Rick Stiggins in a 1991 article in *Phi Delta Kappan*. More recently, the term has been used by the Council for the Accreditation of Educator Preparation (CAEP) to describe the essential knowledge and skills in the domain of assessment of which novice teachers must demonstrate mastery prior to completion of their professional preparation. In a report by the firm Measured Progress commissioned by CAEP, the authors concluded

that the preparation of teachers in assessment literacy historically has been “incomplete and superficial” (Kahl, Hofman, & Bryant, 2013, p. 3). Hence, the report recommends that teacher educators “flesh out the domain of assessment literacy into a coherent and comprehensive set of objectives and learning targets to provide specificity need for designing effective curricula, instructional materials, practica, and formative and summative performance measures” (Kahl, Hofman, & Bryant, 2013, p. 3). To that end, the authors present a conceptual framework for assessment literacy that focuses on three broad domains of competency for teachers and educational leaders. These three domains are (1) types of measures, (2) quality of measures, and (3) results and their uses. Additionally, the framework posits that these domains must be relevantly and accurately applied to three levels of assessments, namely formative assessment practices in the classroom, summative assessments in the classroom, and external standardized assessments used by teachers and school leaders alike (Kahl, Hofman, & Bryant, 2013).

More specifically, the CAEP report on assessment literacy states, “Teachers must be able to create/select and effectively use classroom assessments for a variety of purposes” (Kahl, Hofman, & Bryant, 2013, p. 5). Doing so requires specific knowledge, such as an understanding of the purposes and limits of item and assessment types (i.e., select-response, constructed-response, and performance tasks), as well as practical conceptualizations of the principles of validity and reliability as they apply to teacher-made assessments. According to the CAEP report, assessment literacy also demands that teachers have mastery of certain skills, such as being able to unpack standards both for content elements and for clarity of the target cognitive level. Assessment literacy also requires practiced skill in ensuring the technical adequacy of classroom-based assessments in terms of construct alignment, and assessment literacy requires that teachers be able to use data to inform instruction, including providing accurate, relevant, and constructive feedback to students in order to progress their learning.

One Current Approach to Developing Assessment Literacy

In this section, we describe one current approach to developing assessment literacy within the context of a state-approved, nationally accredited preparation program for elementary and secondary

teacher candidates. We make no claims that the approach is transferable to all settings, nor do we suggest that it is necessarily the best or only way to prepare novice teachers. However, we are confident (and we have some evidence) that the approach has both theoretical merit and actual impact on improving teachers' knowledge and skills in the domain of assessment literacy. We will touch on these points as we present an overview of our approach.

Before describing the approach, it is important to provide some background and then some context. Regarding background, the approach presented here was developed out of work that we have undertaken with in-service teachers beginning ten years ago and continuing to the present. Specifically, a number of our K-12 partners in the field recognized the relative weakness of their teachers in the domain of assessment and brought us in to assist. Our work with in-service teachers began on a very small scale, collaborating with an interdisciplinary team of three middle school teachers and their principal (Holler, Gareis, Martin, Clouser, & Miller, 2008). It has since grown into a refined model of professional development that we have undertaken with literally hundreds of teachers in schools, whole school divisions, state agencies, national conferences, and even international settings.

Regarding the context of our approach to the preparation of teacher candidates, it is important to note that a core piece of the assessment literacy competencies are currently addressed within a one-credit course, which meets five times for a total of 12.5 contact hours. Currently in the Commonwealth of Virginia, teacher preparation programs at the baccalaureate level are capped in terms of the number of education credit hours that may comprise the program. Consequently, very intentional decisions about what is taught and how it is taught must be made, and every choice to add to the program necessarily results in a decision to subtract something else. While our program had a long-held practice of integrating assessment competencies into instructional methods courses, we had recognized that classroom assessment was a relative weakness in our program. Thus, we developed a course on classroom-based assessment, but had to limit it to the one credit that we could extract from an already full curriculum for professional preparation. As a one-credit course (and as a professional development

series for in-service teachers), our approach had to be very tightly focused on what we believe are the core competencies (*not* the comprehensive competencies) of assessment literacy.

Conceptual Framework of the Approach

The conceptual framework of our approach to assessment literacy is driven by our definition of *assessment literacy*:

A teacher's knowledge, skills, and wherewithal to construct and use relevant and dependable assessment instruments and techniques as part of the teaching process in order to progress students' learning.

Similar to the conceptual framework of assessment literacy posited by the CAEP report, our conceptual framework also focuses on a limited number of high-leverage concepts and skills, which can be broadly outlined as follows:

1. Unpacking curricular objectives for students, with particular focus on targeted cognitive behaviors
2. Creating and using a table of specifications to guide the construction of an assessment
3. Using a table of specifications to critique and improve current assessments
4. Creating and using select-response items (including "technology-enhanced items") and constructed-response items
5. Using a table of specifications to conceptualize a unit assessment plan, with particular focus on the role of performance-based assessments to tap important objectives at the highest cognitive levels
6. Using a table of specifications to analyze student learning in order to communicate the nature and degree of learning to others (including providing constructive feedback to students), to make instructional decisions (in the near- and long-term), and to critique and improve teacher-made assessments for future use.

As may be apparent from this outline of key competencies, we view the creation and use of a *table of specifications* (TOS) as a critically important skill in the practical development and employment of assessment in the classroom. Yet the introduction of TOSs to teacher candidates is not new. The use of TOSs has been around since the advent of the first standardized assessments in the early 1900s. However, our experience suggests that this tool has typically not been put into the hands of teachers in a way that provides much utility. Our experience is reflected in the relative lack of emphasis that TOSs have in the published resources typically used in the preparation of new teachers. We recently undertook a content analysis of a convenience sample of 52 books on assessment. Of those, fewer than half (48%) mentioned “tables of specifications” (or equivalent terms such as “test blueprint”). What’s more, of those that did include some discussion of TOSs, the average number of pages within these books that was devoted to such discussion was approximately one percent. Clearly, TOSs are known about, but their practical or core value is just as clearly untapped.

What also may be apparent from our enumerated outline of key competencies of assessment literacy above is that the use of a TOS *to create an assessment* is only one of four practical uses that we believe a TOS can have. The other uses are *to critique and improve an existing assessment*; *to create a unit assessment plan* (that is, conceptualizing complementary assessments necessary to assess all of the objectives in a given unit, since a single assessment is not typically adequate); and *to analyze student learning*. In our content analysis of assessment books, we found that 88% mentioned the first and most common use of a TOS—creating an assessment. However, only 8% mentioned (much less described or demonstrated) how to critique and improve an existing assessment; only 20% mentioned using a TOS to conceptualize a unit assessment plan; and only 4% mentioned using a TOS to analyze student learning. This last finding is particularly troubling, because assessment in and of itself is a worthless activity. It is only the *use* of assessment results that can progress student learning. Since our aim is to prepare novice teachers who are ready to meet the inherent challenges of teaching real students on the first day of their

career, we believe our focus on developing a practical but grounded skill set in the creation and use of assessments is essential.

Two Essential Understandings of Assessment Literacy

While our approach is framed by the practical uses of a TOS, we are also very intentional about weaving two essential understandings throughout our work with teacher candidates. We use the image of “weaving” purposefully because our approach involves introducing these two elements and then returning to and emphasizing them repeatedly throughout the course. These two essential understandings are (1) operationally defining *validity* and *reliability* in very practical terms and (2) understanding the central importance of *alignment* among curriculum, instruction, and assessment. We briefly explain these here, although we recognize that our discussion is not adequate to the multifaceted elements of each of these essential understandings.

The principles of validity and reliability are staples of any assessment course, and they are typically introduced early in the study of assessment. What’s more, we have yet to meet a teacher candidate who did not know these terms *before* beginning their teacher preparation coursework. However, we have also noticed a strong trend among pre-service (and in-service!) teachers, which is that most are unable to clearly differentiate between validity and reliability much less apply these core assessment principles to the creation and use of assessments in the classroom. For this reason, we take the perspective that validity and reliability are practical steps to which a teacher attends when designing, using, and then analyzing the results of assessments. By way of illustration, consider the concept of *reliability*, which is typically defined as *the consistency of results on an assessment*. When this concept is introduced in many assessment courses, explanations about standard error, reliability coefficients, and the like are often made. While such topics are, indeed, concepts and considerations related to reliability, we believe they have little practical utility for a classroom teacher. Therefore, we define reliability differently:

Reliability is the degree to which a student's results on an assessment are not unduly influenced by chance, systematic error, bias, or cheating.

Conceptually, our definition is the same as any conventional definition of reliability. What is different is the directionality that it implies. Our approach is to have teachers think in practical terms about what steps they can take in the creation, administration, grading, and use of assessments to control the inevitable presence of random chance, systematic error, their own biases (or the biases of commercial publishers), and student cheating. When a teacher has some confidence that these influences are reasonably controlled, then she can have greater confidence that a given student's results are indicative of their actual learning, which, in a nutshell, is what we mean by *reliability*.

A second essential understanding woven throughout our conceptualization of assessment literacy is the principle of alignment, namely alignment among curriculum, instruction, and assessment. Returning to the enumerated outline of our conceptual framework, the first "step" in creating and using assessments is to "unpack" the curricular objectives of a unit of instruction. The process of unpacking curriculum requires considerable subject-area expertise on the part of a teacher, as one must accurately identify the content of the intended learning as well as the targeted cognitive level of performance. (Additionally, one must consider developmental appropriateness and also understand the position of the particular set of objectives with the vertical and horizontal articulation of the K-12 curriculum.) Having teacher candidates master the complex skill of unpacking curricular objectives for content and cognitive level of demand is a key step in developing assessment literacy, but, in doing so, an essential understanding begins to emerge. That understanding is that if the intended learning outcomes for students (i.e., *curriculum*) involves a given set of content with which students are engaging at particular cognitive levels, then an assessment of students learning should not only address that same content but should also have students doing so at the intended cognitive levels. When we work with teacher candidates (as well as in our work with in-service teachers), we repeatedly highlight each time their discussions of assessment lead to discussions of curriculum, which, in our experience, inevitably lead to

considerations of instruction, too. In short, we emphasize the essential understanding that curriculum, instruction, and assessment are simply different manifestations of the same thing. A helpful analogy is the three states of matter: liquid, solid, and gas—the same thing, but in three different forms.

Throughout our work with teacher candidates, the “elements” of intended content and targeted cognitive level of demand of the objectives are what must remain the same regardless of whether we are considering what we intended students to learn (i.e., *curriculum*), how we’re going to help them learn it (i.e., *instruction*), or how we’re going to determine the nature and degree of their learning (i.e., *assessment*).

Evidence of Impact

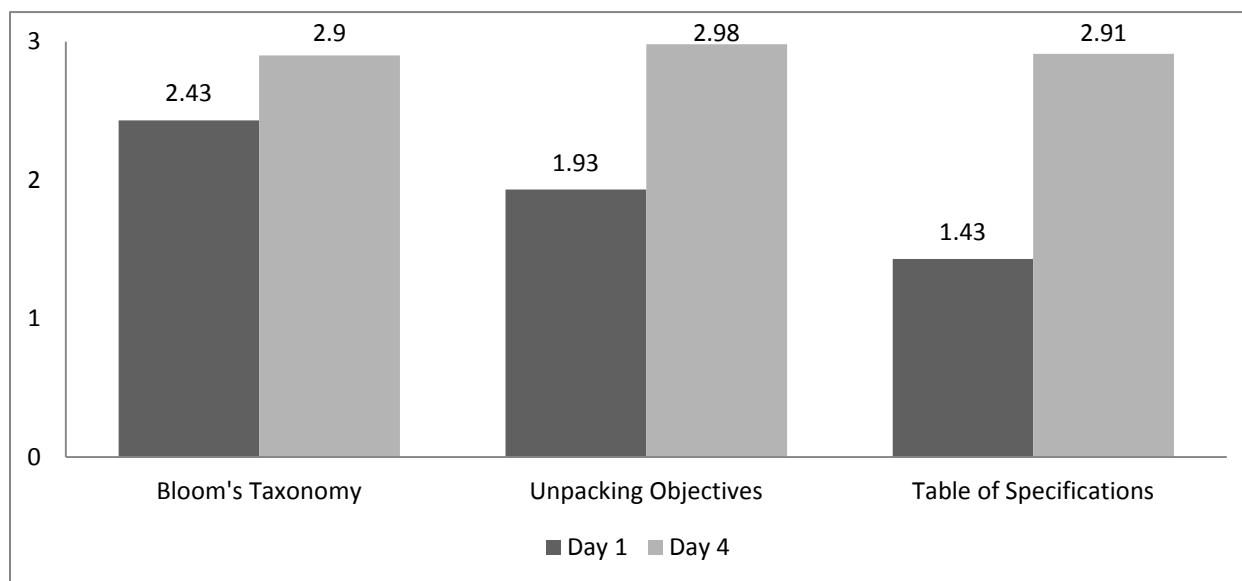
Weaving these essential understandings throughout our work with teacher candidates in developing their understanding and application of these four practical uses of a TOS represents the core set of knowledge and skills that we believe comprise assessment literacy. As previously explained, this currently occurs within our program within the structure of a one-credit course comprised of a total of only five class meetings over a five-week period. Due to the short duration of the course, every class meeting and assignment is designed with the intent of maximizing the leverage it provides in developing the assessment literacy of teacher candidates. For example, teacher candidates complete a series of scaffolded exercises, such as unpacking objectives, creating a table of specifications, critiquing an extant assessment, and creating various item types and justifying their validity and reliability in practical terms. Through these and other exercises, teacher candidates apply and extend their knowledge and skills of assessment literacy. In addition, we strongly believe that as instructors it is our responsibility to model these knowledge and skills and to share our thinking in developing assessments for the course and providing feedback.

One way that we have monitored the impact of the course design on candidates’ development is through self-reporting. Figure 1 presents one such sample from a cohort of undergraduate and graduate-level initial teacher preparation candidates in our secondary education programs in the spring of 2013.

On the first and fourth days of the course, candidates were asked to rate whether they *own*, *know*, or were *unsure* of each of three key concepts related to our conceptual framework of assessment literacy. (See the operational definitions of the three levels beneath Figure 1.) As depicted in Figure 1, these self ratings were converted to a 3-point numeric scale, and self-reported evidence of teacher candidates' learning is evident. Within this sample, teacher candidates had some sense that they already "owned" Bloom's taxonomy prior to instruction in the assessment class (anecdotally reporting that they were introduced to it in a previous educational psychology course); they "knew" about unpacking objectives; and they were "unsure" about a table of specifications. By the end of the fourth day of the course, teacher candidates indicated strong ownership of each of these key concepts.

Figure 1

Mean of Teacher Candidates' Self-reported Understanding of Key Concepts (n=42)



3-point self-report scale:

- 3 = I "own" this concept and could provide a clear explanation and examples to someone else.
- 2 = I "know" with concept, meaning that I am familiar with it, but could provide only a limited explanation.
- 1 = I am "unsure" about what this means and could not confidently provide an explanation or illustration to someone else.

Figure 1 represents only one cohort, but we have collected similar data with previous cohorts, elementary teacher candidates, and even from in-service teachers when we lead similarly structured professional development initiatives. The pattern depicted in Figure 1 is consistent with every group of

pre-service and in-service teachers with whom we have worked, which suggests to us a clear impact on teachers' understanding of these key concepts.

Strengthening teachers' understandings is necessary but not sufficient in developing their assessment literacy, since, by definition, assessment literacy must be applied. In our work with teacher candidates, there are two culminating assignments that they must acceptably complete in order to pass the course. First, candidates create a paper-pencil unit assessment using the principles and processes they have practiced through in-class activities and follow-up exercises. The central tool that they use is the table of specifications, which serves as the means through which essential elements such as validity and reliability are attended to in practical ways. Additionally, the original assessment must be accompanied by a narrative explanation of the purposes, structure, validity, and potential reliability of the assessment. Of course, we use an aligned rubric to evaluate teacher candidates' products, and they must meet or exceed expectations as operationally defined on the rubric. Through this culminating assignment, we have evidence that teachers are able to construct valid and reliable classroom-based assessments.

The second culminating assignment in the course is for teacher candidates to administer their original assessment in the field. Then, guided by four focused prompts, teacher candidates (1) analyze student results in the aggregate and draw inferences about student learning, (2) analyze the learning of two or more individual students and draw inferences about their learning, (3) make instructional decisions about what to do in the near term and what to do in the long term based upon the inferences they have drawn, and (4) critique the evidence of the validity and reliability of their assessment and revise the assessment accordingly for future use. This second culminating assignment represents a significant indicator of a teacher candidates' assessment literacy, for through this process, they are making use of student results on an assessment for purposes of progressing the students' learning. Similar to the assessment creation assignment, the assessment analysis assignment is graded using an aligned rubric, and teacher candidates are required to meet or exceed expectations in order to pass the

course. Since the course is required in order to complete the teacher preparation program, we ensure that each graduate is able to demonstrate the ability to analyze and use assessment results. In short, they are able to use assessment *for* learning (Earl, 2003).

Implications for Improving the Assessment Literacy of Novice Teachers

In 2008, Rick Stiggins published a white paper titled *Assessment Manifesto: A Call for the Development of Balanced Assessment Systems*. In it he made this clarion call:

I issue this assessment manifesto because I believe that we have reached a tipping point in the evolution of our schools when we must fundamentally reevaluate, redefine, and redesign assessment's role in the development of effective schools. The work to be done is so crucial as to require urgent pedagogical, social, and political action. (p. 2)

Stiggins went on to make three key points: (1) We must always be clear about our purposes when assessing student learning; (2) assessment should always be used to inform instructional decision making and, in turn, student learning; and (3) the current era of accountability has co-opted and misused "assessment," necessitating a reclamation of effective classroom-based assessment practices by teachers.

We agree, and, as we reflect on our respective roles as teacher educators, we would add these final thoughts to clarify our sense for our role. First, assessment should not be considered an after-thought of instruction, a necessary evil, or something that is done in order to put a grade in the grade book. In other words, there are innumerable *misuses* of assessment in classrooms. Since much of what teacher candidates know about assessment is based upon their own experiences as students, we sometimes have to undo the previous learning that has occurred with many of our candidates. To reiterate an earlier essential understanding at which we aim, assessment must ultimately be made integral to instruction. A second thought is that a great deal is already known about assessment as a field of research and scholarship. However, collectively, we have not done a particularly good job heretofore of translating this body of knowledge into practices that work for novice teachers. As teacher educators, we believe this is one of the great challenges that is before us, and, as we undertake this, we must always

ensure that the principles, tools, and strategies that we aim to develop in our teacher candidates are not only appropriate and technically adequate, but also feasible and, ultimately, useful to the process of teaching and learning (Joint Committee on Standards for Educational Evaluation, 2003). Third, to reiterate a point from the introduction to this article, the approach that we have described is couched within a one-credit course. Such a short duration is not wholly adequate to the development of assessment literacy, in our judgments. Were we to expand the course by two credits, we would strengthen the attention given to item construction, performance-based assessment practices, grading practices, and analyzing results of curriculum-based standardized assessments (such as the Standards of Learning tests). Finally, we saw in ourselves many years ago that our own assessment literacy was lacking, and we took it upon ourselves to change that through action research, empirical research, collaboration, and application to our own practice. For many of us in teacher education, assessment literacy is, indeed, a relative weakness. Therefore, it is incumbent upon us to develop our own competencies in this domain so that we are able to model and teach best practices to current and future teachers.

References

- Andrade, H., & Cizek, G. (Eds.) (2010). *Handbook of formative assessment*. New York: Routledge.
- Assessment Reform Group. (1999). *Assessment for learning: Beyond the black box*. Cambridge: Cambridge University.
- Council of Chief State School Officers. (2011). *InTASC model core teaching standards: A resource for state dialogue*. Washington, DC: Author.
- DeLuca, C., & Bellara, A. (2013). The current state of assessment education: Aligning policy, standards, and teacher education curriculum. *Journal of Teacher Education* 64(4), 356-372.
- Earl, L. 2003. *Assessment as learning: Using classroom assessment to maximize student learning*. Thousand Oaks, CA: Corwin Press.
- Gareis, C. R., & Grant, L. W. (2008). *Teacher-made assessments: How to connect curriculum, instruction, and student learning*. Larchmont, NY: Eye on Education.
- Good, T. L., McCaslin, M., Tsang, H. Y., Zhang, J., Wiley, C. R. H., Bozack, A. R., et al. (2006). How well do 1st-year teachers teach: Does type of preparation make a difference? *Journal of Teacher Education* 57 (4), 410-430.
- Holler, E. W., Gareis, C. R., Martin, J., Clouser, A., & Miller, S. (2008, September). Teacher-made assessments: Getting them right. *Principal Leadership*, 9(1), 60-64.
- Joint Committee on Standards for Educational Evaluation. (2003). *The student evaluation standards: How to improve evaluation of students*. Thousand Oaks, CA: Corwin.
- Joint Committee on Standards for Educational Evaluation. In development. *Classroom assessment standards: Sound assessment practices for PK-12 teachers*.
- Kahl, S. R., Hofman, P., & Bryant, S. (2013). *Assessment literacy standards and performance measures for teacher candidates and practicing teachers*. Prepared for the Council for the Accreditation of Educator Preparation. Dover, NH: Measured Progress.

- McMillan, J. H. (Ed.). (2013). *SAGE handbook of research on classroom assessment*. Los Angeles, CA: SAGE.
- National Board for Professional Teaching Standards. (1989). *What teachers should know and be able to do*. Arlington, VA: Author. [Retrieved from <http://www.nbpts.org/responsible-student-learning>].
- No Child Left Behind (NCLB) Act of 2001, Pub. L. No. 107-110, § 115, Stat. 1425 (2002).
- Schmoker, M. (2006). *Results now: How we can achieve unprecedented improvements in teaching and learning*. Alexandria, VA: Association for Supervision and Curriculum Development.
- Stiggins, R. (2008). *Assessment manifesto: A call for the development of balanced assessment systems*. Portland, OR: ETS Assessment Training Institute.
- Stiggins, R. J., & Conklin, N. F. (1992). *In teachers' hands: Investigating the practices of classroom assessment*. Washington, DC: National Academy Press.
- Stiggins, R.J. (1991). Assessment literacy. *Phi Delta Kappan*, 72(7), 534-539.
- Tucker, P. D., Stronge, J. H., Gareis, C. R., & Beers, C. S. (2003). The efficacy of portfolios for teacher evaluation and professional development: Do they make a difference? *Educational Administration Quarterly* 39 (5), 572-602.
- Virginia Board of Education. (2011). *Guidelines for uniform performance standards and evaluation criteria for teachers*. Richmond, VA: Author.

Tablet Technology in Teacher Preparation: A Case Study – The Nook Initiative

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Abstract

Regent University's Special Education and Reading Specialist Programs introduced the Nook Initiative fall 2013. This paper discusses the implementation, the need for integrated tablet technology in teacher preparation, initial outcomes of the study, and offers suggestions for practice. A second tablet pilot program introducing the iPad mini in the Career Switcher Program at Regent is also discussed.

Key Words: Tablet Technology, Nook, Teacher Preparation

Overview

As fall semester 2013 commenced, the Special Education and Reading Specialist Programs at Regent University introduced the Nook Initiative. For a one time nominal fee, all new students (entering the Special Education or Reading Specialist Masters' Programs) were registered for the Nook Initiative. As part of this program, students received a Nook HD tablet, a cover, the extra two-year warranty, and access codes to all but three texts they would be using throughout their 18 - 24 month programs. Not only would the students use the Nook for their personal studies throughout the program, but each class contained a "Nook/tablet Assignment" intended to provide experiences to advance technological knowledge and skills in the content areas while expanding the use of tablet technology in the K12 setting. Most new students were excited about this venture! All students were required to participate and the program opened with an on-campus Nook Orientation presented by Barnes & Noble which was also recorded for later viewing on Blackboard (BB) for those students who could not attend.

Background of Nook Initiative

The Nook Initiative has been germinating for nearly five years as several professors, internship supervisors, and educational leaders observed a need for more integrated use of tablet technology in teacher preparation. Comments regarding the lack of consistent use of new technology in K12 classrooms from students in the Special Education and Reading Specialist Programs, from educational leaders in schools as well as at state and national levels, and from field observations led to further investigation of the literature.

An informal poll of current students and program applicants regarding their thoughts on using tablets and/or e-readers for their texts while in teacher preparation programs was conducted. These students and potential students were asked their thoughts about using a tablet (iPad, Nook, Kindle, etc.) for their own texts and for assignments in their classes to enhance instruction and expand their use of tablet technology for instruction and assessment in the K12 setting. While some voiced misgivings,

most were very much in favor of having all their texts available electronically throughout their entire program. There was no consensus on which electronic format was preferred. Some liked iPad, others preferred android/windows tablets, some really loved their Kindle while others loved Nook.

All of this information led Dr. Hope Jordan and Dr. Elizabeth Hunter to do further investigation into which device should be required or whether there should be a “bring your own device option.” One problem is that texts are often offered in one format or another (not available on all devices) and with regard to doing K12 tablet assignments in each class, it was decided that it was important to have the class and the instructors all on the same page/device. After extensive investigation of all options and considering the device itself, the cost, and access to in-person technical support – (not just online or 800 number support) it was decided that for this initiative – the Nook HD Tablet would be the best option. Dr. Jordan first nurtured the support of the Dean of the School of Education (Dr. Gail Derrick) and then went through the process of getting the support of the appropriate leadership at the university level to put the Nook Initiative in place. With the administration’s approval, procedures were established and plans were made to launch the Nook Initiative.

Need for tablets in Teacher Preparation

Tablet technology is just emerging. Schools at the K12 level have just started using tablets (iPad, Nook, android, etc.) in the last few years. The use of tablets in schools is sporadic as school divisions find the funds and decide which tablets to purchase. The results of the studies on the effectiveness of tablets in the K12 setting are just developing. Though there is a growing body of literature regarding tablets in the classroom, there is little research on the use of tablet technology in teacher preparation. In fact, the authors of this paper could not find any documented initiatives requiring and assessing teacher candidates’ integration of tablet technology throughout their programs.

With regard to technology in general, Lytle (2012) reported a study by Dell that compared

technology use in high schools in the United States, Germany and China. Only 29% of U.S. students, compared to 53% of the Chinese students reported technology use integrated throughout the curriculum in their schools. While 21st century students in the U.S. are digital natives, teachers are not using technology to enhance their instruction nearly as much as Chinese teachers. Lytle suggests that part of the problem might be a need for more intentional technological training in our teacher preparation programs. Though teachers are often able to use the technology (and often do for their personal or administrative purposes), they are less familiar with specifically how to best (beyond just games or internet searches) integrate technology into instruction and assessment.

While the Regent team was getting the Nook Initiative in place, The National Center for Education Information, NCEI, (Feistritz, 2011) was compiling the *Profile of Teachers in the U.S. 2011 report*. This report provides several pieces of information that convey insight to our current teaching population. Since our Regent team was noting a need for more well-prepared teachers (with regard to the use of technology in the classroom), we wondered if the average age of the current teacher population might play a role in this situation. This report shows that nearly 1/3 (31%) of our current teaching population in 2011 was over fifty years old. Though this is reflective of those already teaching (not as likely enrolled in teacher preparation programs), this still may shed some insight into what leaders and university supervisors see as a group lacking the skills to properly use technology to enhance instruction and assessment. Teachers who are more than fifty years old have most likely been teaching for a long time. Also – our Special Education and Reading Specialist Programs are both offered at the master’s level and consist of a portion of experienced teachers who come back to school and enroll in a master’s degree program.

The question is, might there be a tendency to do what you have always done, teach in a more traditional manner and use less technology, for those who have been teaching for a very long time? Experienced teachers are often assigned as cooperating teachers for student teachers. This may provide

a partial explanation for what our supervisors and master's level students report as a minimal use of technology in the many classrooms. Our student teachers complete their field experience and then enter the field having more traditional experiences during their teacher preparation program and report minimal use of technology in many classrooms.

The reasons for sporadic use of technology in general and of tablet technology specifically to enhance instruction and assessment in the K12 setting are complicated. Zhao and Bryant, from the University of Georgia, asked whether integration of technology training alone would lead to higher levels of technology integration (Zhao & Bryant, 2006). They took a qualitative look at the state mandated technology training in Georgia. Their study concluded that integrated technology training positively affected participants' attitudes toward using technology for instructional purposes. They suggested such integrated training should continue as new teachers enter the field and also include support specific to grade levels and subject areas. Thus follow-up support in the field is also needed. The Regent Nook initiative provides integrated activities throughout the program, across grade levels, and content areas. However, once student teaching concludes and students graduate, follow-up support through the university ends and must be provided at the individual school level.

Katrina Schwartz (Mind/Shift, 2013) asks whether tomorrow's teachers are prepared to use innovative technology. She points to a Project Tomorrow report that suggests principals are looking for new teachers to bring creative ideas about technology to create differentiated instruction. However, she notes that student-teachers report simple management technology as the emphasis not specific preparation with regard to use of technology for instruction and assessment during their teacher preparation. She suggests, as the Regent University faculty found, that part of the problem is incoming teachers are entering school divisions that lag behind the times. That, combined with student teachers who use technology in their own lives and have had little experience with specifically how to use that same technology to enhance instruction and assessment in their k12 classrooms creates a larger problem.

However, some reports indicate that aspiring teachers (many who grew up natives of this technology) may be much more likely to use the technology as they teach.

Mishra & Koehler from Michigan State University (2006) present a conceptual framework called Technological Pedagogical Content Knowledge (TPCK). They indicate that introducing technology separate from the content and pedagogy compartmentalizes the technology and does not allow for integration. They argue that there is a need to investigate the relationship between technology and teaching. They contend that technology knowledge cannot be addressed, as it often is in teacher preparation programs, separate from the content and pedagogy. Thus, their model of 3 overlapping circles (Venn Diagram) result in technology, pedagogy and content knowledge being interrelated. They suggest that TPCK requires an understanding of the relationship of these three, resulting in teachers who know how to use technology integrated in the content to solve instructional problems for students. This may result in a flipping of the content driven curriculum model to a model that at times might be technology driven where the focus is content through technology.

Mishra & Kohler (2006) assert that this integration of technology requires teacher training to go beyond just skill with software and hardware to integrating that technology directly into the pedagogy and content. Teachers need to leave teacher preparation programs with a deeper understanding of the specific application of technology and pedagogy in the content in order to intentionally enhance instruction and assessment. This training needs to be integrated and continually updated given the rapid rate of changes with regard to technology. It is important to provide teacher training that offers teacher candidates the opportunity to solve real educational problems through the use of technology. Teacher candidates should learn by doing real tasks and using technology in real classroom situations.

A PBS LearningMedia study by VeraQuest (2013) reveals several important concepts regarding technology in general and tablet technology specifically. 7 of 10 teachers indicate that technology allows them to do much more in their classes and enhances both communication and motivation.

Teachers believe that technology allows them to reinforce and expand content, motivate learning and differentiate based on learning styles. The VereQuest Survey (2013) noted that the availability of tablets has risen from 20% to 35% in the last year, which was the greatest increase in any single type of technology during that year. Yet only 50% of these teachers feel comfortable experimenting with new technology. However, those teachers who use tablets find them beneficial for teaching through the use of applications, access to websites, and the access to e-books and texts. 33% of these same teachers also note that if they had access to grants funds, they would purchase tablets for each child.

Tablets have only become more prominent in the recent past (especially the last 5 years) with the popularization of iPad, iPad mini, Nook, Kindle and various other tablets for personal use. This popularization comes with the opportunity to use such technology to enhance instruction and assessment. The portable nature of tablets allows the easy access to technology in K12 classrooms. Individualization and small group work can be enhanced through the use of tablets and these devices can also be connected to Smart Boards and other projectors for use with large groups. Tablets are becoming less expensive, so the cost of bringing this technology to the classroom is also attractive. 21st century learners are motivated by the use of technology and tablets are a perfect tool in the classroom.

As Hedge posits (2012), tablets are mobile, they remove the barrier between the screen and the students, save paper, support digital conversations, allow both teachers and students to work anywhere, and can replace many types of technology. However, since this technology is so new, there is little research on the impact of tablets in the K12 setting and even less on the use of tablets in teacher preparation programs. However there is some early research emerging that does show the positive impact tablets can have on instruction. *Tablets for Technology* (2013) report such benefits as: enhanced student engagement and learning, decreased student behavior problems, and increased creation of spontaneous teacher and student resources in UK secondary schools.

There is some indication that universities like Concordia University Nebraska and Saint Leo are

starting to integrate tablet technology into their education classes. Concordia reports that in fall 2014 their students will be using the iPad throughout their education classes. Their professors are currently designing their courses to include the use of iPads (Concordia, 2014). St. Leo University (Dean's Report 2014) reports using a program in which student teachers are provided Digital Backpacks and tablet technology training through a grant starting in 2012. Though there are few universities reporting the use of tablet technology in teacher preparation programs there is some indication that this is a growing trend.

As the Regent University professors were unable to find ,U.S. models of teacher preparation programs that integrated tablet technology directly into K12 content to enhance instruction and assessment throughout the program. There is some research to indicate the success of tablets to include iPads and other tablets. Much of this research is very recent, was done with very small groups, is more in the form of action-research, or was done outside the U.S.

Explicit Nook Applications in K12

Maegan Murray, Digital Sales Lead for a local Barnes and Noble provided the following comments regarding some of what K12 teachers can expect to do with a Nook in their classrooms. In her position at Barnes and Noble, Maegan played a key role in training the teacher candidates in the Regent programs both in how to use the Nook to enhance their studies and in how to use them in the K12 setting. The following is a broad overview explaining some of the positive applications our pre-service teachers are finding as they use the Nook in our program. Maegan shared the following:

Tablet technology in the classroom is more abundant than ever, and it benefits teachers to know which devices can cater to their needs. Among the current lineup of tablet offerings, Nook by Barnes & Noble proves itself time and again with its capabilities crafted to help teachers in the classroom. With so many devices to consider, it is difficult to spot the differences. However, the

Nook has many standout qualities.

Nook was created with children in mind. In order to use Nook in the classroom teachers must be able to create an experience appropriate for all ages. Barnes & Noble designed Nook to be able to be divided up into six users. Each user is created by one master account. This enables the teacher to create five different users appropriate for students in their classroom. Such information as age, name, and gender, help Nook to tailor the content to the appropriate grade level. The teacher can also enable and disable any features that they do not want the students to access, such as internet, email and applications. This is an exceptional feature that most tablets simply cannot do. Nook is unique in allowing the teacher to use the device for his/her own pleasure under the adult user, but still allowing the ability to hand the device to the students for school work.

Nook also comes with other features that can help streamline a lesson in the classroom. The device comes with Bluetooth capabilities built in. This allows one to wirelessly attach accessories to the Nook for easier movement and use. For example, a speaker could be sitting on the desk and the Nook could be in a teacher's hand many feet away, but the speaker will still play whatever audio is being transmitted. Nook can also be plugged into devices such as a television or projector via an HDMI cable. In this case, whatever is seen on the device's screen would be shown on the television screen or projected onto the wall. When teaching to a larger group it is better to be able to display material as large as possible. This is made possible with a special attachment sold separately at Barnes and Noble.

Another unique feature of Nook is its content. Barnes & Noble enables each user to shop for books, magazines, newspapers, applications, movies, and more through their button labeled "Shop" on the home screen. In addition to the world's largest collection of digital books through the Nook shop, the Nook allows a secondary application and content store, as well: The Google Play Store. This option opens up the device to any content sold by Google, which means that the Nook can support anything available on android devices as well. This includes applications such as Blackboard, which are still

available on the Nook, even though Barnes & Noble doesn't offer it in its app store. It is just as quick and easy to download it from the Google Play Store on the device. There are no other tablets out there that will allow you access to both companies' content.

Tablet devices are being seen more and more in today's educational system. Using a personalized device allows the teacher to tailor the lesson to each individual. This can be done most effectively with educational applications. Barnes & Noble has worked hard to create content that fosters learning. The Nook shop carries many titles that are interactive. These eBooks have been created as either "Read and Play" or "Read and Record." Once the title is purchased, the reader can choose how he or she wants to read. The eBook can be read alone, read with audio following along, or read and recorded, to be played back later. The microphone on the Nook picks up the reader's voice as they read along with the eBook. This tailors the experience for different kinds of learners. Allowing the eBook to be read with audio helps the reader to hear how the words should sound. Then having the reader record themselves reading helps them to hear how *they* sound.

One of the most unique aspects of using the Nook tablet in the classroom is the free training and support provided by Barnes & Noble. Because Barnes & Noble is a physical store (not just a virtual one), local Nook Specialists provide free classes and troubleshooting for all of the Nook devices. During the life of the device Barnes & Noble is there seven days a week to answer questions, provide support, and help find solutions. In some cases off site meetings have been arranged to provide specific training for institutional needs. Whether it is in person, over the phone, or by email, Barnes & Noble is able to give each customer the attention they deserve.

The Study – Pre-test Post-test Survey

In order to assess student growth in their level of skills, knowledge of tablet technology, and application ability, each student was given the Pre-nook survey as they enter the Nook Initiative at

Regent. This survey is intended to assess their level of familiarity with Nooks and/or tablet devices as they enter the program. Interim Mini Surveys are completed through the program to assess student impressions of their own growth and address questions or problems. A Post-Nook Survey will be administered at the completion of the program.

Spring 2014 semester commenced with 120 students registered in the Nook Initiative as part of the Special Education and Reading Specialist programs at Regent University. Most of these students are seeking teacher licensure in one or both areas. As measured on a survey prior to entering the program, 66% have never used a Nook and 93% have not used a Nook instructionally (more for personal reading). However, 56% considered themselves either strong or very strong with regard to their skills on another tablet, and 58% of these tablet users do not use their tablet for instruction. The students in these teacher preparation programs seem to be reflective of the general population of teachers who are becoming more skilled with using tablets personally but are not yet using them instructionally in their own classrooms.

At the completion of the first semester those 89 students who started in the fall were asked to voluntarily complete an interim survey. This survey was only 5 questions long and the goal of the survey was to get a sense of how the students felt they were doing early on in the program with regard to using the Nook. Though most had only taken an average of 2 classes to this point, 75% of the respondents (50) indicated that they are learning to use tablet technology through their Nook Assignments in the program. 50% indicated they are using all types of technology more in their classrooms as a result of using the Nook in their own program. It must be noted that of the 50% who indicated they were not using more technology – some are still pre-service teachers and not yet in a classroom but noted they feel they will be using tablets and technology more when they do get to the classroom. There was a group who have always been using technology and did not feel they increased use at this time. There were many anecdotal comments about how surprised Regent students were by the vast number of instructional applications on Nook (and other tablets) that they were not aware of

prior to the program. Overall, there was a very positive response to this program early on and the gains Regent students feel they are making that will improve their K12 instruction.

At this point (mid-2nd semester), data indicates that the Nook Initiative (tablet technology in teacher licensure) is having a positive impact on pre-service and current teachers going back for their master's degrees with regard to the use of technology in the K12 setting. Another quick check will be run following the spring semester (and every semester until the students graduate). At the close of the program, a Post-Nook Survey will be given in order to glean the impact of the use of Nooks (tablet technology) on teachers and their use in the K12 setting.

iPad – Career Switchers

While two teacher preparation programs at Regent started the Nook Initiative, the Career Switcher Program (directed by Dr. Mervyn Wighting) started a similar pilot initiative with tablet technology using the iPad mini. Like the Nook Initiative the use of iPad mini in the career switcher program includes the integration of tablet technology throughout the course work. This enhances instruction and assessment through use of tablet technology in the K12 setting using the iPad mini rather than the Nook.

The Career Switcher program is a program which results in teacher licensure. It does not result in a Master's Degree (as the Special Education and Reading Specialist Programs). As such it is a shorter program with fewer classes so the use of tablet technology directly in content is less intense. Another difference between the Nook Initiative and the iPad program is that the students purchase the iPad mini alone. Their package does not come with immediate access to all their texts. Students can download texts to their iPad as they choose (optional).

Both programs are designed to intentionally integrate table technology into the K12 setting and enhance the use of technology in instruction and assessment with the K12 population. The program

chairs for Career Switcher and Special Education/Reading Specialist will do further analysis of the program outcomes in 2015 to assess the efficacy of each tablet in teacher preparation programs. Dr. Wighting shared the following regarding the status of the Career Switcher program's work with iPad mini. Dr. Wighting shares:

In the fall of 2013 Regent University started to issue each new Career Switcher student with an iPad mini. This was achieved by sending every new student a gift voucher to be exchanged for an iPad at a local Apple Store. This system of issuing the device works easily and has not caused any problems at either end. It was found that while some students were already familiar with Apple technology others have never used it so all students attend a full day session on campus to learn how to use iPads in the classroom. This session is taught by practicing technology teachers from a local school division, and they bring with them a wealth of hands-on and up to date techniques. All instructors in the Career Switcher program have introduced assignments that require their students to use the iPad. For example, assignments require them to identify teaching applications that they then share with all other students in order to build up a database of apps that will be useful to them when they get hired as teachers. The current students in Level I of the program were surveyed recently (n=45) in order to obtain feedback on their use of the iPad and their thoughts on how to use it in the classroom once they are hired. The data show that the majority of them use the iPad to access their downloaded course textbooks, as well as researching online for course assignments. The survey also showed that they are acquiring a large number of subject specific applications that can be used in the classroom during their first teaching position.

The benefits of introducing this technology into the program are already very apparent. The program director visited a local high school recently (without prior notice) to find that the Level II Career Switcher (now hired as a teacher) was using iPads to teach a civics class in the 11th

grade. All the juniors were using an iPad belonging to their school and following directions from the teacher they were accessing the websites of the state's Congress as a resource to design their own mock bill of legislation. The mobility of the iPad allowed them to work easily at their own desk, and also to move into small groups to work collaboratively where some students were retrieving data while others were creating their bill in a Word document.

The piloting of the iPad in Regent's Career Switcher program is going well, and it is planned to continue the initiative. This is particularly important as more and more school divisions are expecting their faculty to be comfortable with tablet technology and to use it regularly in classroom instruction.

Conclusions and Recommendations

Though this project is still in the initial stages, literature and observations in the field indicate both an upswing in the use of tablet technology and a need to better prepare teachers to use this technology in their K12 classes. This is true across the board for teacher preparation programs and is especially true in programs that require specific skill and differentiated teaching to meet the needs of struggling learners like those in special education and reading programs.

At this point, the Regent study shows a positive impact on teacher skills with regard to using the Nook as tablet technology in the K12 setting. Regent University School of Education will continue using the Nook in the Special Education and Reading Specialist Programs as well as the iPad mini in Career Switcher Program to intentionally integrate tablet technology in teacher preparation programs. Data will be gathered in both programs in order to assess the impact on teacher preparation with the intent to enhance instruction and assessment for improved outcomes with K12 learners. This program is one small step toward classrooms that meet the needs of 21st century digital learners and we are looking forward to further analysis of these outcomes over the next 2 years.

References

- Concordia University. (2014). Concordia integrates iPad tablets into teacher education program classes. *News and events*. Retrieved from <http://www.cune.edu/about/news/archive/general-news/concordia-integrates-ipad-tablets-into-teacher-education-program/>
- Dean's Report (2014). Preparing Technologically Competent Teachers. Saint Leo University 2014 Dean's Report.
- Schwartz, K. (2013). Are teachers of tomorrow prepared to use innovative tech?. *Mind/Shift*. Retrieved from <http://blogs.kqed.org/mindshift/2013/02/are-teachers-of-tomorrow-prepared-to-use-innovative-tech/>
- Zhao, Y., & Bryant, F. L. (2006). Can teacher technology integration training alone lead to high levels of technology integration? A qualitative look at teachers' technology integration after state mandated technology training, (Georgia State University) *Electronic Journal for the Integration of Technology in Education*, Vol. 5. Retrieved from <http://www.docin.com/p-332050657.html>
- Feistritzer, C. E. (2011). Profile of Teachers in the U.S. 2011. *National Center for Education Information*. Retrieved from www.edweek.org/media/pot2011final-blog.pdf
- Lytle, R. (2012). Teacher training needed to meet technology needs in classrooms, *U.S. News College Compass*. Retrieved from <http://www.usnews.com/education/high-schools/articles/2012/09/20teacher-training>
- Mishra, P., & Koehler, M. J. (2006). Technological pedagogical content knowledge: A framework for teacher knowledge, *Michigan State University, Teachers College Record*. Volume 108, Number 6. Pp. 1017-1054. Retrieved from <http://www.tcrecord.org/Content.asp?ContentID=12516>
- Research Proving the Benefits to Tablets in Education (2013). *Tablets for Education*. Retrieved from <http://www.tabletsforschools.org.uk/research-proving-the-benefits-of-tablets-in-education/>
- VereQuest, Inc. (January 15-20, 2013). Teacher Technology Usage a PPT. *PBS Learning Media*. Retrieved from www.authorstream.com/Presentation/spongebob09-1466128-educational

The Teaching Philosophy: An Opportunity to Guide Practice or an Exercise in Futility?

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Abstract

This conceptual essay explores the role a teaching philosophy plays in the experiences of K-12 classroom teachers who are firmly established in a school context. We draw on our experiences as in-service teacher educators and K-12 teachers to examine the extent to which teachers make decisions that are grounded in a well-thought out and clearly articulated belief system about teaching and learning. We argue that there are often tensions and disconnections between teachers' fundamental beliefs about teaching and learning and the realities of current mandates and imposed expectations.

Keywords: teacher professional development, teaching philosophy

The Teaching Philosophy: An Opportunity to Guide Practice or an Exercise in Futility?

The majority of pre-service teachers do not complete their teacher training without first writing a Teaching Philosophy Statement. This assignment affords new teachers the opportunity to articulate their beliefs and understandings about effective teaching and learning by including descriptive examples of how they teach and by providing theory and research-based justifications for why they make particular pedagogical decisions. While the final product is useful for job applications and interviews, it is the reflective process used to create the document that is expected to serve the teacher well in guiding their day-to-day work in the classroom. In fact, Goodyear and Allchin (1998) contend that this statement is a living document that should be used throughout one's teaching career to drive and to continually reassess teaching goals. They state:

In preparing a statement of teaching philosophy, [teachers] assess and examine themselves to articulate the goals they wish to achieve in teaching. . . . A clear vision of a teaching philosophy provides stability, continuity, and long-term guidance. . . . A well-defined philosophy can help them remain focused on their teaching goals and to appreciate the personal and professional rewards of teaching (Goodyear & Allchin, 1998, pp. 106–7).

As in-service teacher educators and K-12 teachers, we wondered about the role a teaching philosophy plays in the experiences of K-12 classroom teachers who are firmly established in a school context. The little research that has been conducted in this area is inconclusive. Some studies show that teachers' beliefs and practices are not in alignment (Polly & Hannafin, 2011; Wilcox-Herzog, 2002), whereas other evidence suggests that teachers' beliefs and practices are concordant (Tsai, 2008). Ultimately, the relationship between teachers' beliefs and practices is complex and, as Basturkmen (2012) found in a review of the research related to the work of language teachers, is mediated by

contexts and constraints. Therefore we wondered whether, once in the classroom, teachers experienced any tensions or disconnections between their fundamental beliefs about teaching and learning and the realities of current mandates and imposed expectations.

Our Context and Experiences

Author 1 and Author 2 teach in a Master's Degree program that is designed to develop in-service teachers' capacities to engage in critical pedagogy and critical literacy, school-based and community-based inquiry, collaboration, teacher leadership and continuous improvement. The teaching philosophies of the faculty in this program are strongly rooted in social change, humanistic and progressive approaches, though the concern in exploring the teachers' philosophies was not to measure the extent to which they conformed to the program ideals. Rather, the purpose was to understand the extent to which teachers make decisions that are grounded in a well-thought out and clearly articulated belief system about teaching and learning.

From July 2011 through July 2013 the faculty worked with 41 graduate students who were enrolled in this cohort-based program and who had been teaching in K-12 settings for anywhere from 2-20 years. As part of their focus on teacher leadership, the teachers read *Awakening the Sleeping Giant: Helping Teachers Develop as Leaders* by Katzenmeyer and Moller (2009). Time was spent reflecting on what it means to be a teacher leader, examining assumptions about leadership, and developing the skills to lead from within the classroom. Katzenmeyer and Moller (2009) suggest a development model for teacher leadership that begins with teachers doing a personal assessment to better understand themselves in relation to others as both teachers and leaders. Part of this personal assessment is to examine their belief systems about teaching and learning by completing a Philosophy of Education Inventory (PEI) developed by Lorraine Zinn (1999). This inventory contains 15 sentence stems with five phrases to

complete each stem. Each of the five phrases represents one of five educational philosophies: Behavioral, Comprehensive, Progressive, Humanistic, and Social Change. Using a Likert scale, teachers indicate the extent to which they agree with each of the phrases on a scale from 1 (strongly disagree) to 7 (strongly agree). Responses are then coded and added to reveal a total score for each of the philosophies.

The teachers completed the PEI after one year of the two-year program. In debriefing the activity, it became clear that many of the teachers' scores did not place them squarely in one or even two of the five philosophies; the majority of them had relatively high scores in multiple categories. Very few disagreed (especially strongly disagreed) with any of the statements. For example, under the sentence stem "The primary purpose of education is:" the five phrases to complete the stem were:

1. To facilitate the personal growth and development of each student.
2. To increase students' awareness of the need for significant change in our culture and society, and to help them contribute to such change.
3. To teach a broad range of content, concepts, and principles that will prepare students for learning throughout life.
4. To increase students' problem-solving skills and ability to fully participate in the society in which they live.
5. To develop students' competency and mastery of specific knowledge and skills, so they can meet certain standards or expectations.

Some teachers strongly agreed with all five of these statements. This puzzled us since the underlying assumptions within some of the philosophies are quite contradictory; within a Behavioral philosophy of education, the purpose of education is "to promote skill development and behavioral change; ensure compliance with standards and societal expectations," while the purpose within a Humanistic

philosophy is “to enhance personal growth and development; to facilitate self-actualization” (Katzenmeyer & Moller, 2009, p. 184). How was it that our teachers equally connected with both of these philosophies?

We began to develop several potential hypotheses based on what we were seeing. Perhaps the survey was not particularly valid; was it truly measuring teachers’ beliefs about teaching and learning or was it actually measuring teachers’ practical survival strategies for navigating the standards movement that left them with very little autonomy to teach what they believed? Did our teachers mix their responses, sometimes answering in reference to their personally held beliefs and sometimes responding on the basis of this survival practice? Do our varying results illustrate discordance between a teacher’s philosophy and practice? Were the teachers trying to please us by responding in a way they thought we expected based on our program’s content? Do teachers tend to take a both/and rather than an either/or approach to maintain a macro philosophy that attempts to take into account the wide-ranging and comprehensive expectations of education writ large? Evidence suggests that individuals are especially likely to respond in a socially desirable way when the subject of the survey is considered important by the surrounding culture (Helmes & Holden, 2002).

Perhaps the survey was not reliable: were the statements so general that responses were overly contingent on the teachers’ choice of context (e.g., “During reading instruction I would take this particular approach, but during math instruction I would take a different approach”)? Bos, Mathers, Dickson, Podhajski, and Chard (2001) also found that teachers endorsed a wide array of differing philosophies when using a Likert scale.

We decided to dig deeper and asked the teachers to write a teaching philosophy narrative as part of their final portfolio for the program. We hoped this would obviate the concerns raised by the use of

the Likert scale and wondered whether describing and elaborating their beliefs would produce a more focused, coherent philosophy of education. This is where Author 3 and Author 4, two graduate research assistants joined the research team. They are both embedded in school contexts, one as a high school math teacher and the other as an elementary school resource teacher. They read through the teaching philosophy narratives and analyzed them using the five philosophies identified by Zinn in the PEI survey as etic codes. Consistent with the survey results, the narratives seem to indicate that individual teachers embraced more than one established philosophy. Many teachers appeared to strongly affiliate with at least three of the five philosophies in their teaching philosophy narratives and in their survey responses, contrary to Zinn's contention that "most educators have a clear primary philosophical orientation, or else they share two that are stronger than others" (as cited in Katzenmeyer & Moller, 2009, p. 183). Zinn explains that typical combinations include philosophies that are closer together on the continuum such as progressive and humanistic and that combinations like behavioral and humanistic are unlikely. Even so, many of our teachers seemed to embrace contradictory philosophies.

For example, Samantha used phrases such as, "My initial teaching method was and has been for a few years, lecture, model/demonstrate, and practice. The student objectives are posted as each topic changes as well as the year-long objectives by strand" and "students need structure, confinements, boundaries, and consequences." These statements suggest that Samantha believes very much in the behavioral philosophy, which expects all students to reach the same mastery level for the same standard on the same assessment without differentiation; this philosophy is also reflected in her high behavioral inventory score. Throughout the teaching philosophy narrative, Samantha indicated that she relies on direct instruction and then practice to convey knowledge. Later in the narrative, however, she discussed using project-based assessments and allowing students to convey mastery in different ways. These strategies are consistent with a more progressive education philosophy (and her high progressive score

on the inventory mirrored these progressive statements in her narrative), despite the seeming contradictions between a progressive and a behavioral philosophical stance.

Suzy stated at least one strong belief in *each* of the five philosophies with the progressive and humanistic philosophies seeming to prevail. The progressive and humanistic philosophies are close to one another within the spectrum and it is not uncommon that educators' beliefs overlap two philosophies that share some of the same tenets. However, the additional statements endorsing behavioral and comprehensive beliefs in the philosophy narrative suggest potential contradictions in practice.

When we noticed these disconnects in their philosophy narratives, we asked the teachers to respond in writing to the following prompt as additional feedback:

One of the purposes of writing your teaching philosophy is as a means for professional growth since it requires you to give examples of how you enact your philosophy, thus requiring you to consider the degree to which your teaching is congruent with your beliefs. As you engaged in developing this section of your portfolio, did you find total congruence between your beliefs and your practices, or were there disconnects? How do you know if your practices and philosophies/beliefs are congruent? In what ways do you struggle to make that happen? If there were disconnects, what do you attribute those to?

This additional feedback afforded teachers an opportunity to reflect on some of these contradictions, as exemplified by Sheri, Claire, Suzy, Hannah, and Aubrey. Sheri explained that the disconnects come from having the desire to teach in a certain way but lacking the professional knowledge to teach in that way. The narrative implies that she identifies mainly with the progressive and humanistic philosophies. Although her philosophy supports student choice, individualism, and student-centered learning, Sheri said that "implementing student-centered learning and incorporating a culturally relevant framework are two methods in which I am getting used to". Aside from Sheri, who

wishes to gain more professional knowledge to work towards a more progressive and humanistic teaching practice, the majority of the teachers cited obstacles such as time, curricular and testing mandates, and the demands placed on educators as reasons why their beliefs and practices are not congruent.

Throughout the teaching philosophy narrative, Claire identifies primarily with the humanistic philosophy with some statements suggesting endorsement of a social change philosophy as well. She indicates that she would like to foster individual student growth in the classroom and help students to determine how they can advocate for themselves, each other, and society. Claire wrote:

I think I do still see some disconnects in my philosophy in my teaching, and believe it's largely due to the demands placed upon us, and my hesitations to go against the expectations and 'rules' from my superiors. As I become more of a teacher leader and understand just how to go about making change I feel I will push back more against the things that do not match with my philosophy and will integrate more things that do match.

Although stating at least one belief in each of the five philosophies, Suzy identifies mainly with the progressive and humanistic philosophies. She explained the disconnects of philosophy and practice:

Reconciling beliefs and teaching practice is a constant struggle for teachers, mainly due to time constraints and pressures from those who have more power. Sometimes the resources are not available to follow through on great ideas that make beliefs more consistent with practice. Closing the door and doing what is best for my students is a belief but may not always be possible, especially during an evaluation year. But I know that I will persist with a new confidence as a more reflective, informed, and cultural teacher leader to match my beliefs to my practice.

Hannah identifies most with the progressive philosophy with a touch of humanistic:

The biggest disconnect is wanting to run with topics my students show interest in, such as the solar system or dinosaurs. Unfortunately, because of the demands of quarterly testing and the state standards, I have to fit in what I am expected to teach in order for the students to do well on their assessments. I am so short on time each day to do what is required, let alone to have my students explore topics that are off the SOLs.

Aubrey articulated beliefs related to four of the five philosophies and explained possible disconnects with her practice:

The disconnects I found was that my perfect teaching situation does not really have the possibility to happen due to the lack of time in the school day and the lack of time we have to spend on each standard. There are also so many tests to be taken throughout the year it is hard to focus on a given standard for longer than a week. Therefore, you will always have students that struggle with a topic. The program has changed my way of thinking from focusing on the negatives I cannot change to looking for the positive things. The negatives I can change and have the ability to change will fade in time as long as I keep an open mind and search for solutions.

The teaching philosophy narratives and teachers' explanations of disconnects between beliefs and practice demonstrate that educators are struggling with the bureaucratic structure of schools and the policy regulations placed upon them and their students. Once inside the system, it seems that many educators are either forced to abandon their education philosophy or take on several different belief systems, despite possible contradictions. As a result, teaching philosophies are not being used as they were intended – to set goals and guide practice.

Emerging Questions and Theories

Because of the results of the inventory and the analysis of the narrative data, the four of us are starting to question even more the impact of the current culture of public education on both new and experienced classroom teachers. With the heightened focus on standards and accountability based on student test scores, teachers find themselves on the receiving end of mandates and scripted curriculum.

Such demands have changed curricular and instructional practices. The curriculum has narrowed to create more time for instruction in the tested subjects (Dee, Jacob, & Schwartz, 2013; Hamilton, 2007; Pace, 2011), and teachers regularly forgo content instruction to make time for teaching test taking skills (McNeil, 2000; Musoleno & White, 2010). In order to maximize test passing rates, teachers also find themselves focusing more of their effort on students in the academic middle, leaving advanced students to fend for themselves and deserting the lowest students who do not seem to have a chance of passing the tests (Hamilton, 2007). The use of pedagogical methods is also affected. Although teachers recognize the value of student centered teaching, they find they use more teacher-focused, direct instruction in preparation for state tests (Au, 2011; Faulkner & Cook, 2006).

High-stakes testing creates philosophical conflicts for teachers when they have to use instructional methods that are different from their own personal teaching philosophy. Many teachers struggle to maintain their own pedagogical beliefs under the pressure of testing and accountability (Patchen & Crawford, 2011; Gunzenhauser, 2003). Shapiro and Thompson (2008) argue that NCLB and constructivism are “poles apart philosophically, theoretically, and in educational practice.” In fact, Zull (2002) uses evidence from neuroscience to argue that “deep learning” is dependent on more constructivist approaches. Drawing on the work of Kolb (1984), he describes a learning cycle that depends on experience followed by reflecting, developing abstractions, testing those abstractions, and

finally circling back to concrete experiences (Zull, 2002, p. 17).

How then does a constructivist teacher manage the discordance between her beliefs and the current educational environment? Do teachers simply accommodate themselves and their philosophies to the demands of state mandates? Do they negotiate, sneaking in their own pedagogical approaches whenever time allows? Or do they rebel and follow their own methods regardless of state expectations? (Eisenbach, 2012) Have our teachers developed a flexible “toolkit” of philosophies, accessing the appropriate methodology to match the instructional exigencies of the moment?

How can teacher educators best help teachers to build their knowledge and skills to navigate this terrain? If we support teachers to be autonomous professionals who are strongly grounded in a research-based philosophy of education, do they struggle in these prescriptive, disempowering environments or do they use their well articulated and supported beliefs to empower themselves to do what they believe is right for children? Or is it actually better for them to be chameleon-like, being able to morph into whatever the school system demands in that moment? Ultimately then what is the point of the “Teaching Philosophy Statement?” Is it just a futile exercise that means very little once teachers become a part of the system?

At this point, we are motivated to explore these questions further. We recognize the limitations of using inventories and open-ended questions and plan to add teacher interviews and observations to our data collection in order to better understand the ways that teachers connect their teaching philosophies to their practice as well as the ways they articulate the disconnects they encounter. We believe that this additional information gathered systematically from teachers will help to inform the educational community and will help us, as teacher educators and K-12 teachers, to revisit our own teaching goals and practices.

References

- Au, W. (2011). Teaching under the new Taylorism: High-stakes testing and the standardization of the 21st century curriculum. *Journal of Curriculum Studies*, 43(1), 25-45.
- Basturkmen, H. (2012). Review of research into the correspondence between language teachers' stated beliefs and practices. *System*, 40(2), 282-295.
- Bos, C., Mather, N., Dickson, S., Podhajski, B., & Chard, D. (2001). Perceptions and knowledge of preservice and inservice educators about early reading instruction. *Annals of Dyslexia*, 51, 97–120.
- Dee, T.S., Jacob, B. & Schwartz, N.L. (2013). The effects of NCLB on school resources and practices. *Educational Evaluation and Policy Analysis*, 35(2), 252-279.
- Eisenbach, B. (2012). Teacher belief and practice in a scripted curriculum. *The Clearing House*, 85, 153-156.
- Faulkner, S. A., & Cook, C. M. (2006). Testing vs. teaching: the perceived impact of assessment demands on middle grades instructional practices. *Research in Middle Level Education Online*, 29, 1-13.
- Goodyear, G. E., & Allchin, D. (1998). Statement of teaching philosophy. *To Improve the Academy*, 17, 103-22. Stillwater, OK: New Forums Press.
- Gunzenhauser, M. G. (2003). High-stakes testing and the default philosophy of education. *Theory into Practice*, 42, 51-58.
- Hamilton, L. S. (2007). *Standards-based accountability under No Child Left Behind: experiences of teachers and administrators in three states*. [EBSCO eBook version] Santa Monica: Rand Corporation.
- Sponsored by the National Science Foundation. Retrieved from <http://eds.b.ebscohost.com>

- Helmes, E., & Holden, R. R. (2002). The construct of social desirability: One or two dimensions? *Personality and Individual Differences, 34*, 1015–1023.
- Katzenmeyer, M., & Moller, G. (2009) *Awakening the sleeping giant: Helping teachers develop as leaders* (3rd ed.). Thousand Oaks, CA: Corwin.
- Kolb, D.A. (1984). *Experiential learning: Experience as the source of learning and development*. Eaglewood Cliffs, NJ: Prentice Hall.
- McNeil, L. M. (2000). Creating new inequalities: Contradictions of reform. *Phi Delta Kappan, 81*(1), 728-734.
- Musoleno, R.R., & White, G.P. (2010). Influences of high-stakes testing on middle school mission and practice. *Research in Middle Level Education, 34*(3), 1-10.
- Pace, J.L. (2011). The complex and unequal impact of high stakes accountability on untested social studies. *Theory & Research in Social Education, 39*(1), 32-60.
- Patchen, T., & Crawford, T. (2011). From gardeners to tour guides: The epistemological struggle revealed in teacher-generated metaphors of teaching. *Journal of Teacher Education 62*, 286-298.
- Polly, D., & Hannafin, M.J. (2011). Examining how learner-centered professional development influences teachers' espoused and enacted practices. *The Journal of Educational Research, 104*(2), 120- 130.
- Shapiro, A., Thompson, A. S. (2008). Why band-aids don't work: Analyzing an evaluating No Child Left Behind (NCLB) in light of constructivist philosophy, theory, and practice. *Forum on Public Policy Online. 2008*(2). Retrieved from Freely Accessible Social Science Journals on April 19, 2014.

Tsai, C. (2007). Teachers' scientific epistemological views: The coherence with instruction and students' views. *Science Education, 91*, 222-243.

Wilcox-Herzog, A.(2002). Is there a link between teachers' beliefs and behaviors? *Early Education and Development, 13*, 81-106.

Zinn, L. M. (1999). *Philosophy of Education Inventory*. Quincy, IL: Lifelong Learning Options.

Zull, J.E. (2002). *The art of changing the brain: Enriching the practice of teaching by exploring the biology of learning*. Sterling, VA: Stylus.

Building Relationships within Extended Field Placements in Elementary Education

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Abstract

Researchers, using qualitative methodology, investigated whether an extended model for organizing fieldwork could potentially elevate the skills, knowledge, and dispositions of Elementary (prek-6) teacher candidates in this study. Questionnaires, focus group interviews, and observations from the pre-service and veteran teachers provided data on the perceived benefits and drawbacks of remaining with the same teacher. Results indicate that the importance of relationships, time in the field with the same teacher and classroom, and high quality modeling from the veteran teachers are essential for a successful field experience. The findings of this study offer insights into the field experience and student teaching components of teacher education: illuminating the role of extended time in fostering relationships and providing more teaching opportunities for teacher candidates.

Building Relationships within Extended Field Placements in Elementary Education

With the heavy emphasis on standards, accountability and outcomes placed on public schools, teachers, and students, teacher education programs continually evaluate what is considered best practice in preparing future teachers. Accrediting bodies such as the National Council for Accreditation of Teacher Education (NCATE) have called for additional emphasis on not only the amount of time teacher candidates spend in clinical or field experiences, but the connection that is made between practice, academic content, and professional coursework (NCATE, 2010). Some suggest that a new paradigm for preparing teachers, one that includes academic, practitioner, and community expertise, is needed (Zeichner, 2010). In addition to content and pedagogical knowledge, teacher educators must also work to develop skills of collaboration within their teacher candidates, an important skill in the workforce and classroom (Liliane & Colette, 2009). What teacher educators cannot ignore are the developmental phases that occur as teacher candidates grow from students to teachers. Teacher education programs must address issues of professional identity, contextual acclimation, and knowledge development.

Field experiences have been used extensively as a method for integrating theory and practice to equip teacher candidates with the knowledge and skills necessary to meet the demands of the profession. Unfortunately, these same field experiences that are recognized as critical in the preparation of teachers have also been criticized for lacking cohesiveness, appearing disjointed, and missing curricular definition, (Graham, 2006; Feiman-Nemser, 2001a; NCATE, 2001). Examining the specific needs of teacher candidates while extending and enhancing field experiences to help meet these unique needs, provided the foundation for this study. This study explored the perceived benefits and drawbacks for teacher candidates who stay with the same teacher for their field experience and student teaching. The questions we investigated were: What would the perceptions about this redesign for field experiences and student teaching be? What strengths would teacher candidates and cooperating teachers experience? What drawbacks would they encounter?

Literature review

The following review focuses on two areas of existing research in the field of teacher education; the significance of field experiences and the impact of extending those experiences. This review helped to inform our

question, select appropriate methods of investigation, and develop our conceptual framework (appendix).

Significance of Field Experiences

Practical, field-based experiences can help fulfill the needs of teacher candidates. Capraro, Capraro, and Helfeldt (2010) define field experiences “...as a variety of early and systematic P-12 classroom-based opportunities in which teacher candidates (TCs) may observe, assist, tutor, instruct, and/or conduct research” (p.131). Many believe that fieldwork better prepares teacher candidates for the profession they have chosen (Berliner, 1985; Darling-Hammond & Young, 2002; Lantham & Voight, 2007; Singh, 2006). Teacher candidates often remark on the benefits they received from their fieldwork. The classroom experience strengthens their confidence, allows them to practice skills they will use in their classrooms, familiarizes them with curriculum planning, and provides experience guiding student behavior (Anderson & Graebell, 1990; Howey & Zimpher, 1996; Kragler & Nierenberg, 1999). Fieldwork can offer the opportunities to adopt a teacher persona – figure out who one is as a teacher – and acclimate the teacher candidate to the ecological side of education. Kosnik and Beck (2003) describe the opportunities to learn the school culture and become involved in school-wide activities that promote an ecological understanding of the profession. Through fieldwork, the workings of a school beyond what an elementary student sees can become apparent to the teacher candidate.

Extending Field Experiences

This study extends the literature in several ways. Earlier studies have looked at teaching with a peer (Bullough et al., 2003), alternative short-term field placements (Author, 2008; Purdy & Gibson, 2008), and paired teaching placements (Smith, 2008). It is evident that increasing or modifying the field experience component has taken hold in education reform in many countries yet the typical design has changed little in the last 35 years (Bullough et al., 2003). There is little research however, on extending the field experience (Graham, 2006). One such study by Ewart & Straw (2005) found that teacher candidates who were placed in one setting for seven months garnered several benefits. Teacher candidates in this study were able to develop their own teaching style, integrate into the school culture, and foster relationships with their cooperating teachers that allowed for honest conversations about teaching. If it is accepted that teacher candidates grapple with issues of professional identity,

ecological acculturation, and knowledge and skill development, then remaining with a cooperating teacher for an extended period may provide opportunities for growth in these areas.

Methods

We framed our study using the following questions: What would the perceptions about this redesign for field experiences and student teaching be? What strengths would teacher candidates and cooperating teachers experience? What drawbacks would they encounter?

These questions helped to guide both our data collection and analysis from over 63 teacher candidates and their cooperating teachers.

Context

This study took place at a state university located in the Mid-Atlantic region of the United States with a long-standing history of excellence in teacher education. The College of Education at our university is accredited by the National Council for the Accreditation of Teacher Education (NCATE). Teacher Candidates in the five year program earn a Master of Arts degree in teaching and apply for licensure to teach in preschool through sixth grade. By the time our teacher candidates enter student teaching during their fifth year, they have completed three field placements. The participants for this study included three groups of pre-service teacher candidates and their cooperating teachers. The study began in August of 2007 when the three groups spent one full day a week in a field experience and ended in early March of 2008 when they completed their first eight-week student teaching experience.

Group 1: Partnership for Realizing Improvement in Science and Math (PRISM). Sixteen teacher candidates self-selected to participate in the PRISM grant. The focus of the grant was on using robotics and GPS/GIS technology to enhance the teaching of science and math content in grades four, five, and six. Cooperating teachers working with the teacher candidates in this group were selected by school division administrators to participate in the PRISM grant. Four of the cooperating teachers were from a high-needs city school, six were from a different city school division, and another six teachers were from a rural school division. All of the selected cooperating teachers agreed to continue to supervise the teacher candidates for their first eight-

week student teaching placement.

Group 2 – Professional Development School (PDS) Model. Eight teacher candidates were randomly selected to work with cooperating teachers in a small city school division where the College of Education was investigating the creation of a professional development school model. Like the PRISM group, all of the selected teachers agreed to continue to supervise the teacher candidates for the first eight-week student teaching experience.

Group 3 – Traditional Model. The remaining 39 teacher candidates received field placements using traditional methods across the University's diverse service area. These teacher candidates were with one teacher and school for the full-day field experience and a different teacher and school for their first eight-week student teaching experience.

The College of Education's Education Support Center (ESC) selected the cooperating teachers for the traditional model. In this traditional model, the ESC asked principals to notify teachers of the opportunity to have a student for the one-day a week field experience or a student teacher. The ESC worked to ensure the broadest possible grade level placements across the program and student teaching experience. Cooperating teachers, through collaboration with the ESC, could earn part-time appointments as clinical faculty at our university upon completion of a developed training program.

Research Design

The process of designing a qualitative study does not start with the methods, but with the question and theoretical lens of the researcher (Creswell, 2007; Erickson, 1986; Mills, 2007). Using a qualitative approach in our research design, we sought to interpret why certain things happened rather than quantifying our findings (Eisner, 1991; Erickson, 1986; Falk & Blumenreich, 2005). Instead of viewing teachers and teacher candidates as research subjects, we honored their interpretations (Walsh, Tobin, & Graue, 1993). We collected data through interviews, observations, questionnaires, and small focus groups. Triangulation of these methods allowed us to present a plausible and credible account (Eisner, 1991; Hubbard & Power, 2003; Mills, 2007).

All 63 teacher candidates completed a questionnaire in the beginning of their field experience and at the

conclusion of their first student teaching placement. Because we were looking at possible changes over time, we needed to be able to compare early and later responses. Cooperating teachers of the PRISM and PDS model also received an initial questionnaire, and we received a return rate of 100 percent. We coded the records to preserve confidentiality, assigning a number to each returned questionnaire. The completed questionnaires helped us to focus and define our next steps of data collection, which included focus groups with both teacher candidates and cooperating teachers. Because experience strongly influences a teacher's beliefs and opinions, focus group questions were designed to be open ended in order to tap into the years of experience each particular teacher had working with teacher candidates. For both groups, the focus groups took the form of a conversation rather than a structured interview. Kvale (1996) argues that a benefit of the conversational interview is its ability to capture the "multitude of subjects' views of a theme and to picture a manifold and controversial human world" (p. 7). By participating in the focus groups, the cooperating teachers and pre-service teacher candidates helped clarify information from prior conversations, observations, and questionnaire responses. We also used email to facilitate interviews of cooperating teachers and pre-service teacher candidates who were located out of the area and unable to attend the focus group sessions.

Data Analysis

Analysis of qualitative data needs to be on going and thorough (Eisner, 1991, Mills, 2007; Hubbard & Power, 2003). The transcribed focus group interviews and open-ended questionnaire responses involved the use of content analysis (Krippendorft, 2004; Patton, 1990) to systematically search large amounts of text and refine those into smaller units or codes. The use of the constant comparative method (Glaser & Strauss, 1967; Lincoln & Guba, 1985) required reading and re-reading of the entire data set to look for emerging patterns and themes. Member checks were used once initial themes developed to address the issues of credibility and to ensure that our coding represented our participants' perspectives and made sense (Faulk and Blumenreick, 2005; Lincoln & Guba, 1985; Mills, 2007). Questionnaire responses were organized by coding the responses from which themes surfaced. When no new themes emerged and significant patterns of data became evident, data analysis was complete. The following three themes emerged (a) the importance of building relationships; (b) the ability to

teach more and observe less when placed with the same teacher and classroom for the extended time period; and (c) teacher candidates' ability to differentiate instruction due to increased understanding of the curriculum and students in the extended placement.

Findings and Discussion

The most significant benefits of the extended time in the same classroom allowed for the following positive outcomes:

- building relationships between students, teachers, families, schools, and teacher candidates,
- increasing teaching time and reducing time observing and transitioning,
- differentiating instruction due to increased understanding of the curriculum and students in the extended placement

Although the findings were overwhelmingly positive, one potential negative outcome surfaced. Cooperating teachers and teacher candidates expressed concern over having an extended field placement if personality clashes arose between the two parties. Each of the findings supported our conceptual framework, although the most salient of these was that of building relationships (both positive and negative). For this reason we have focused our discussion on the theme of building relationships and its implications for teacher education programs.

Building relationships

From the cooperating teachers' point of view, the benefits of staying with the same teacher for the one-day a week field experience and student teaching far outweighed the disadvantages, particularly in regards to the relationships they established. These relationships allowed the dyad to develop a professional dialogue where ideas were shared, confidence gained, and growth of the teacher candidates enhanced. As one third grade cooperating teacher put it, "I think it's easier to work together full-time when you've already gotten to know each other's styles in the field experience. For the children, there is continuity- the student teacher comes in already knowing their homes and a little bit about them" (*third grade teacher, 2-27-08*). Another teacher remarked, "We have developed a cooperative relationship so we will work together seamlessly in the classroom this year" (*fourth*

grade teacher, 2-27-08).

Many of the cooperating teachers talked about their ability to shape the development of the teacher candidates. “I want the opportunity to guide and support a new teacher that would be on her own soon” (*Teacher #6, 2-27*). Another remarked, “When I was student teaching, I had a horrible experience. I vowed that when I became established, I would try to make student teaching an excellent experience for the new teacher” (*Teacher #16, 2-27*).

All 26 teacher candidates who stayed in the extended placement valued the relationships that developed. They recognized the value the extended time afforded them.

I had a great experience. My teacher did many of the things I’ve learned about here [in the elementary education program]. She was very open to me (*Teacher candidate, 4th grade, 4-18*).

Staying in the same placement allowed me to develop stronger relationships with my students as well as my cooperating teacher (*Teacher candidate, 2nd grade, 4-18*).

I really appreciated being able to work as colleagues with teachers. It gave me more confidence about working with professionals (*Teacher candidate, 5th grade, 4-18*).

I thought the relationships I developed with my students, the school, and my teachers were invaluable. That never happened in my second student teaching placement. I missed the ‘family’ I had at my old school. (*Teacher candidate, 2nd grade, 4-18-08*)

For the teacher candidates, the relationships they developed with their teachers and students were a driving force behind their perception of success in this new model. However, the one drawback mentioned by a few cooperating teachers and teacher candidates involved the potential for personality conflicts. Three of the cooperating teachers noted that personality conflicts might be a serious drawback. One cooperating teacher noted, “If it was *not* a good experience in field experience it creates a long time with one classroom” (*cooperating teacher, 2-27-08*). The teacher candidates also raised the potential of personality conflicts, both in the initial and final questionnaires. This conflict did occur in two instances. To their credit, these teacher candidates worked hard

to see the positives in their placements. They met with us regularly to discuss their concerns and strategized ways to overcome the difficulties. They were able to turn the situation into a learning experience.

Discussion and Implications

The findings of this study offer insights into the field experience and student teaching components of teacher education: illuminating the role of extended time in fostering relationships and providing more teaching opportunities for teacher candidates. The power of building relationships was the most important finding. The idea of cooperating teachers and teacher candidates remaining together through a field experience and the first eight-week block of student teaching for a total of eight months helped address two developmental issues of teacher candidates: professional identity and contextual acclimation. Extended time allowed personal connections to be made professional to professional. Liliane and Colette (2009) have reported that this relationship can lead to shared knowledge as the cooperating teacher and teacher candidate assume various roles within the dyad. Discussion can allow the partnership to co-construct their knowledge of good teaching. These discussions and relationships can help the teacher candidates explore their professional identity. Teacher candidates exhibit a tendency to be “me” focused while participating in field experiences. Kagan (1992) concluded that initially teacher candidates are more cognizant of their own personal needs than they are with the needs of the children they are teaching. Through conversations and strong relationships with their cooperating teachers, teacher candidates can gain a stronger sense of who they are as teachers. Once they establish a professional identity, they can be more focused on the needs of the children and their learning.

The concept of building relationships transcended the teacher-candidate dyad, though. Kosnik and Beck (2003) discuss the value of understanding the school culture and participating in school-wide events with children and families. With the extended time at one placement, teacher candidates were afforded these opportunities to develop more in-depth relationships. Doing so provided candidates with a context for their teaching. While contexts vary across schools, regions, and countries, all teachers need to be cognizant of how their particular context shapes teaching and learning. The nuances of context are harder to discern in relatively short placements.

In addition, cooperating teachers believed the extended time in the classroom allowed the candidates to

develop stronger relationships with the students. For the children, they knew this “other adult” in the classroom. The only difference was now the teacher candidate was there every day, not just once a week. The period of adjustment was non-existent in January; that had taken place in August. Children had an existing relationship with the teacher candidate that continued to strengthen as the teacher candidate was there every day. These findings support the research on successful field experiences in Graham (2006) and the importance of affective engagement with teaching and learning.

If it is perceived that deeper relationships form and stronger skills develop in an extended placement model, then the implications for teacher education programs are clear. First, teacher education programs must design mechanisms so that the relationships to be developed are representative of the goals and ideals of the program. Extended time alone will not necessarily improve the abilities of the teacher candidates (Capraro et al., 2010). Extended time will only continue the status quo unless teacher education programs are explicit in the types of relationships to be developed. Teacher education personnel must ensure that the cooperating teachers they choose reflect the disposition, skills, and knowledge that teacher candidates should develop (Ewert & Straw, 2005). Cooperating teachers must be aware and accepting of the roles they are expected to assume. Without this alignment between expectations of the teacher education program and the cooperating teacher, positive outcomes cannot be guaranteed. To help ensure this alignment O’Brian, Stoner, Appel, and House (2007) concluded “...training for both the cooperating teacher and preservice teacher is necessary” (p. 273).

A second implication for teacher education programs is the need for programs to anticipate the potential drawback of personality conflicts between teacher candidates and cooperating teachers. This has major implications for program decisions. Teacher educators have a reactive and/or proactive alternative for this. Reactively, a mechanism must exist that allows resolution of such problems. O’Brian et al. (2007) suggested “...targeted support from university personnel... (p. 274)” as a means for resolving difficult dyads. It could be a supervisory system that operates as a third party to mediate problems, or a safety net system that removes a teacher candidate from a problematic situation. Some *out* must be available if a solution cannot be found. Most teacher preparation programs already have a process for reassigning teacher candidates if the need arises. More importantly, the issue of *fit* could be mediated with appropriate mentoring as suggested by Wang and Odell

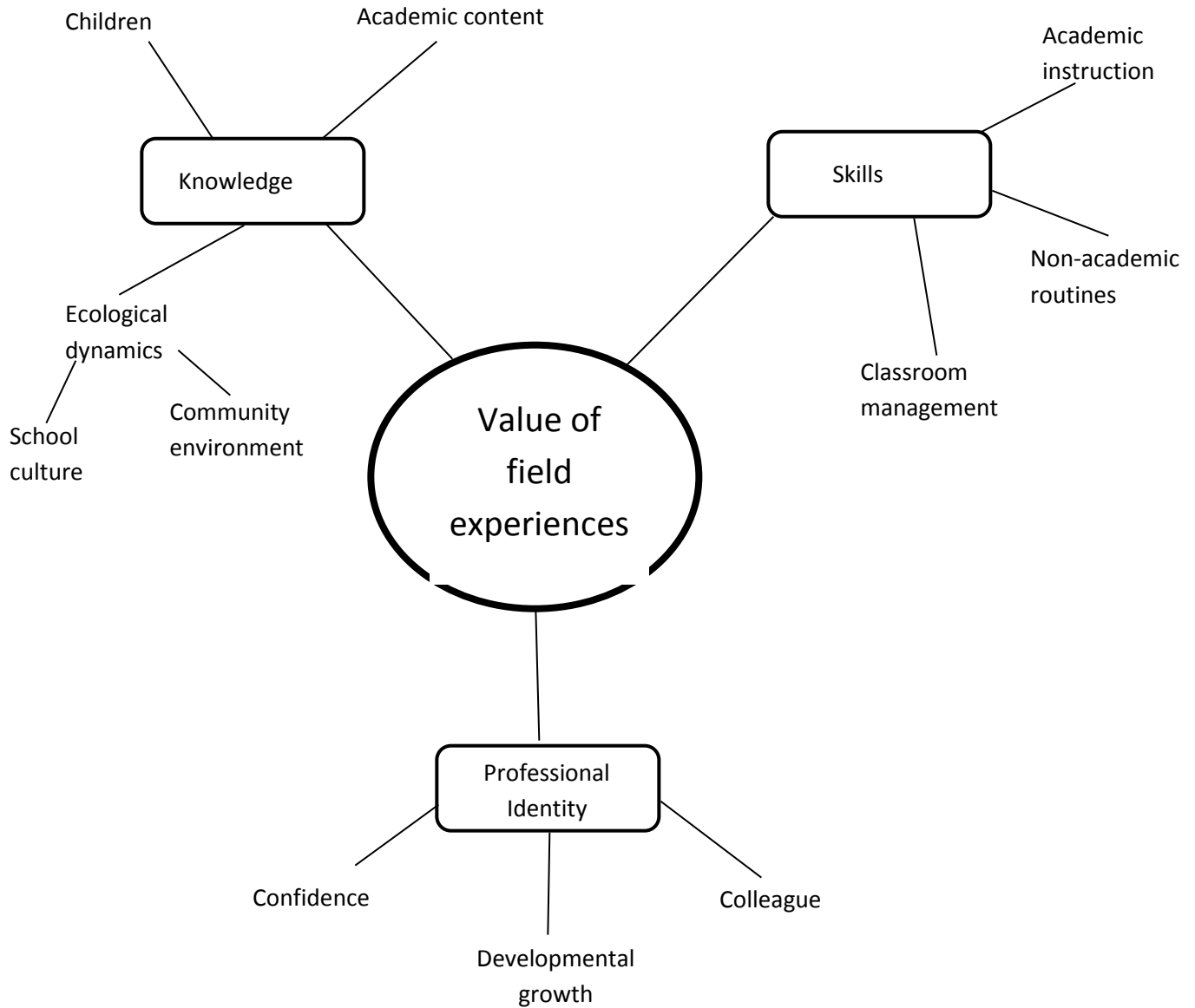
(2008). “The quality of beginning teachers’ initial beliefs and practices shape the quality of their learning when collaborative relationships among peers are encouraged and mentoring relationships are developed” (Wang & Odell, 2008, p. 147). Teacher education programs must ensure that cooperating teachers have these collaborative and mentoring skills.

Rather than relying on a reactive approach, teacher education program could act proactively to avoid issues of personality clashes. Individuals who know both the teacher candidates and the cooperating teachers should be involved in the process of matching the two for placement. Parker, Fazio, Volante, and Cherubini (2008) cite the importance of building on-going relationships among teacher candidates, school personnel, and faculty. They stress the need for “faculty counsellors” who become liaisons among stakeholders to maintain and sustain partnerships (p. 45). By knowing the personalities, one can decide the best mix for who will stretch whom in an atmosphere of professionalism. This is difficult to accomplish when placements are made where neither the teacher candidate nor cooperating teacher are known by the placement personnel making the decisions. As suggested by Graham (2006) using a more collaborative approach would allow the university to assist in the selection and matching process to alleviate this concern. This would also foster the development of professional relationships in which discussions of professional practice promote growth for both the cooperating teacher and the teacher candidate.

Overwhelmingly, cooperating teachers and teacher candidates stated that the benefits of the continued relationship developed in the initial field experience through student teaching far outweighed the drawbacks. This is consistent with the idea that teacher training is a continuum, rather than composed of isolated stages (Wang & Odell, 2008). The challenges faced in this study mirror those revealed in the literature on redesigning teacher education: How do we immerse learning to teach in the practice of teaching (Ball & Forzani, 2009; Dangel, Dooley, Swars, Truscott, Smith, & Williams, 2009; Darling-Hammond, 2010; Zeichner, 1984, 2010)?

As a result of the findings within this study, our elementary education program has made changes in its field placements. Teacher candidates in their graduate year now spend two days a week in a field placement instead of one. When they move into student teaching, they remain with the cooperating teacher with whom they

had practicum for one of their two eight-week blocks. The only time this does not happen is when a teacher candidate elects to student teach outside the local area where the university is located. Teacher candidates and cooperating teachers continue to praise this model of field experiences.



Value of Field Experiences Conceptual Framework

References

- Ball D.L. & Forzani, F.M. (2009). The work of teaching and the challenge for teacher education. *Journal of Teacher Education*, 60, 497-511.
- Berliner, D. (1985). Laboratory settings and the study of teacher education. *Journal of Teacher Education*, 36. 2-8. doi:10.1177/002248718503600601
- Bullough, R., Young, J., Birrell, J., Clark, D.C., Egan, M.W., Erickson, L., Frankovich, M., Brunetti, J., & Welling, M. (2003). Teaching with a peer: a comparison of two models of student teaching. *Teaching and Teacher Education*, 19(1), 57-73.
- Capraro, M., Capraro, R., & Helfeldt, J. (2010). Do differing types of field experiences make a difference in teacher candidates' perceived level of competence? *Teacher Education Quarterly*, 37(1), 131-154. Retrieved from <http://www.teqjournal.org>
- Dangel, J., Dooley, C.M, Swars, S.L., Truscott, D., Smith, S.Z. & Williams, B. (2009). Professional development schools: A study of change from the university perspective. *Action in Teacher Research*, 30(4), 3-17.
- Darling-Hammond, L. (2010). Teacher education and the American future. *Journal of Teacher Education*, 61, 35-47.
- Eisner, E. (1991). *The enlightened eye: What makes a study qualitative?* New York: Macmillan.
- Erickson, F. (1986). Qualitative methods in research on teaching. In M.C. Wittrock (Ed.). *Handbook of research on teaching* (3rd ed., pp. 119-161). New York: Macmillan.
- Ewart, G. & Straw, S.B. (2005). A seven-month practicum: Collaborating teacher's response. *Canadian Journal of Education*, 28(1&2), 185-202. Retrieved from <http://www.csse.ca>
- Feiman-Nemser, S. (2001a). From preparation to practice: Designing a curriculum to strengthen and sustain teaching. *Teachers College Record*, 103(6), 23-25. Retrieved from <http://www.tcrecord.org>

- Fuller, F. (1969). Concerns of teachers: A developmental conceptualization. *American Educational Research Journal*, 6(2), 207-226. Retrieved from <http://www.sagepub.com>
- Glaser, B. & Strauss, A. (1967). *The discovery of grounded theory*. Chicago, IL: Aldine.
- Graham, B. (2006). Conditions for successful field experiences: Perceptions of cooperating teachers. *Teaching and Teacher Education*, 22(8), 1118-1129. Retrieved from <http://www.elsevier.com>
- Hubbard, R. & Power, B. (2003). *The art of classroom inquiry*. Portsmouth, NH: Heinemann.
- Ingersoll, R.M. & Smith, T.M. (2004). Do teacher induction and mentoring matter? *NASSP Bulletin*, 88, 28-40. Retrieved from <http://bul.sagepub.com>
- Kagan, D. (1992). Professional growth among pre-service and beginning teachers. *Review of Educational Research*, 62(2), 129-169. Retrieved from <http://www.aera.net>
- Kosnik, C. & Beck, C. (2003). The internship component of a teacher education program: Opportunities for learning. *The Teacher Educator*, 39(1), 18-33. doi: 10.1080/08878730309555327
- Krippendorft, K. (2004). *Content analysis: An introduction to its methodology*. (2nd ed.). Thousand Oaks, CA: Sage.
- Kvale, S. (1996). *Interviews: An introduction to qualitative research interviewing*. Thousand Oaks, CA: Sage.
- Liliane, P. & Colette, G. (2009). Analysis of the dynamic of the sharing knowledge between cooperating teacher and teacher-in-training: The partners' respective roles. *US-China Education Review*, 6(6), 71-80. Retrieved from <http://davidpublishing.org>
- Mills, G. (2007). *Action research: A guide for the teacher researcher*. (3rd ed.). Upper Saddle River, N.J.: Merrill Prentice Hall.
- National Council for Accreditation of Teacher Education (NCATE). (2010). *Transforming teacher education through clinical practice: A national strategy to prepare effective teachers*. Washington, DC: Author.

- O'Brian, M., Stoner, J., Appel, K. & House, J.J. (2007). The first field experience: Perspectives of preservice and cooperating teachers. *Teacher Education and Special Education, 30*, 264-275. doi: 10.1177/088840640703000406
- Parker, D. C., Fazio, X., Volante, L. & Cherubini, L. (2008). Relationship matters: Negotiating and maintaining partnerships in a unique teacher education program. *Action in Teacher Education, 30*, 39-53.
- Purdy, N. & Gibson, K. (2008). Alternative placements in initial teacher education: An evaluation. *Teaching and Teacher Education, 24*(8), 2076-2086.
- Smith, E. (2008). Raising standards in American schools? Problems with improving teacher quality. *Teaching and Teacher Education, 24*(3), 610-622.
- Veenman, S. (1984). Perceived problems of beginning teachers. *Review of Educational Research, 54*(2), 143-178. doi:10.2307/1170301
- Vonk, J.H.C. (1995). *Conceptualizing novice teachers' professional development: A base for supervisory interventions*. Paper presented at the Annual meeting of the American Educational research Association. San Francisco, CA.
- Wang, J. & Odell, S. (2003). Learning to teach toward standards-based writing instruction: Experiences of two preservice teachers and two mentors in an urban multicultural classroom. *Elementary School Journal, 104*(2), 147-175. Retrieved from <http://www.journals.uchicago.edu/>
- Zeichner, K.M. (1984). *The ecology of field experience: Toward an understanding of the role of field experiences in teacher development*. Paper presented at the Annual Meeting of the Association of Teacher Educators, New Orleans, LA.
- Zeichner, K.M. (2010). Rethinking the connections between campus courses and field experiences in college and university based teacher education. *Journal of Teacher Education, 61* 89-99.

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