

TEACHERS' CONCEPTIONS TOWARD TYPE OF ASSESSMENT: GRADE LEVEL AND
STATE TESTED CONTENT AREA

By

Jamie L. Neibling

Submitted to the graduate degree program in Education and the Graduate Faculty of the
University of Kansas in partial fulfillment of the requirements for the degree of Master of
Science in Education.

Chairperson, Meagan M. Patterson, Ph.D.

Neal Kingston, Ph.D.

Bruce Frey, Ph.D.

Date Defended: April 14, 2014

The Thesis Committee for Jamie L. Neibling
certifies that this is the approved version of the following thesis:

TEACHERS' CONCEPTIONS TOWARD TYPE OF ASSESSMENT

Chairperson, Meagan M. Patterson, Ph.D.

Date Approved: April 21, 2014

Abstract

This quantitative study utilized an online survey to explore secondary teachers' (grades 6-12) conceptions toward assessment, specifically focusing on differences among teachers who teach in a state tested area and those that do not teach in a state tested content area. This study also explored teachers' conceptions toward assessments that are given as a part of the regular classroom routine and those assessments given as a result of state mandates. Repeated measures analyses of variance results indicate that teachers have stronger agreement for the four conceptions of assessment (improvement of teaching and learning, student accountability, teacher and school accountability, assessment is relevant) as they relate to the assessments that take place in their classrooms as opposed to those that are mandated by the state. Correlations among conceptions indicate that teachers do not view these assessments equally; classroom assessment is seen as being distinct from state assessment. Additionally, the study reveals that teachers have a distinct view of the purposes of classroom assessments and state assessments. No overall grade level differences were found between middle school and high school teachers and their conceptions of assessment. No overall differences were found between teachers teaching in a state tested content area and those that did not. Findings did reveal that high school teachers teaching in a state-tested content area held a stronger endorsement for the conception of assessment for classroom assessments for the purpose of improving teaching and learning than their colleagues teaching in a non-state tested content area. Implications for future topics of study are discussed.

Table of Contents

Abstract	iii
Table of Contents	iv
Introduction	1
Literature Review	4
Conclusion	23
Methodology	25
Results	29
Discussion	36
Limitations	40
Implications for Future Study	42
References	44
Appendices	51

Teachers' Conceptions Toward Type of Assessment:

Grade Level and State Tested Content Area

Introduction

In this era of educational accountability, assessment policies and practices are at the top of every educational leader's priority list. With the upcoming 2014-2015 school year, states and schools participating in the Smarter Balanced Assessment Consortium (SBAC) and Partnership for Assessment of Readiness for College and Careers (PARCC) will be expected to participate in a new series of educational assessments designed to gauge student readiness for college and post-high school careers (Smarter Balanced Assessment Consortium, 2012; Partnership for Assessment of Readiness for College and Careers, 2013). Educational leaders at the state levels are closely watching students' scores on state assessments and making policy decisions to help ensure progress toward meeting the goals established by the SBAC and PARCC.

With increasing pressure from leaders at the state level, district superintendents and school principals are also closely watching students' scores and taking steps to ensure that their students will be prepared for the new assessments that will soon be administered. In many districts, assessment plans have been created to gauge student achievement toward district and state goals through the use of various assessment tools, including formative and summative assessments, at the district and/or school level. Many of these assessments are created by district personnel and delivered to classroom teachers for administration, in addition to the assessments that the classroom teacher already has in place.

Classroom teachers administering these assessments often have strong beliefs and attitudes toward these national, state, local, and classroom assessment practices. These attitudes

are often tied to their personal conceptions toward assessment, which are shaped by their educational and life experiences (Pratt, 1992). These conceptions are one contributing factor toward the development of teachers' philosophies of teaching, which in turn can shape their instructional practices, management practices, and assessment practices (Thompson, 1992).

Teachers' assessment practices are typically driven by the adopted local, state, and/or national standards for the content area in which they teach. While teacher and school assessment practices and policies are closely examined, nationally the standards and assessments have been developed for only two content areas: English Language Arts and Mathematics (National Governors Association Center for Best Practices & Council of Chief State School Officers, 2010). In science, the Next Generation Science Standards (NGSS) have been developed, but there is not a national assessment available in this content area (Next Generation Science Standards, 2013). Other subjects, such as social studies, health, and the fine arts do not yet have a nationally accepted set of standards and do not have a state assessment such as what has been created in English Language Arts and Mathematics. This difference has the potential to create differing viewpoints and conceptions toward the purpose and value of assessments depending on whether a teacher teaches in a state tested content area or not. Although studies have identified differences in the way that educators view their content area standards, no known studies have explored differences in conceptions among teachers teaching in state tested content areas and those who do not teach in a state tested content area (Black & Wiliam, 1998).

In addition to the state and national assessments, classroom teachers use formative assessments as a regular practice of gathering and recording information and evidence to gauge student progress toward achievement of content area standards (Lambert & Lines, 2000).

Teachers use a variety of assessment methods to gather this data, including observations,

homework assignments, quizzes, tests, and portfolios. Many of these assessments are individually teacher-created, teacher-given, and teacher-graded. Other assessments are provided to the teacher by the district or the state, created by assessment companies or small groups of individuals within a school district and graded by machines or paid scorers. As a result of these two different types of assessments, teachers may develop differing conceptions toward the purpose and value of each type of assessment. The topic of teachers' conceptions toward assessment has been studied from various perspectives and by multiple researchers (Brown, 2002; Cizek, Fitzgerald, & Rachor, 1996; Davis & Neitzel, 2011; Sikka, Nath, & Cohen, 2007; Thompson, 1992), but no known studies have evaluated differences in conceptions based on the type of assessment being conducted.

The purpose of this study was to explore teachers' conceptions toward assessment, specifically focusing on differences among teachers who teach in a state tested area and those that do not teach in a state tested content area. This study also explored teachers' conceptions toward assessments that are given as a part of the regular classroom routine and those assessments given as a result of state mandates.

This study addressed the following three research questions:

1. Do secondary (grades 6-12) teachers' conceptions toward assessment vary between state assessments and classroom assessments?
2. Do teachers' conceptions toward assessment vary between those that teach in a high stakes state tested content area and those that do not?
3. Do teachers' conceptions toward assessment vary between middle school (grades 6-8) and high school (grades 9-12) teachers?

Literature Review

Airasian & Russell (2008) define assessment as “the process of collecting, synthesizing, and interpreting information in order to make a decision” (p. 9). Similarly, Lambert & Lines (2000) define it as “the process of gathering, interpreting, recording and using information about pupils’ responses to educational tasks” (p. 4).

Purposes of Assessment

Although assessment might be defined in a similar manner across the literature, its purposes in the educational realm are as varied as the number of stakeholders involved in the educational process. Some purposes of assessment described in the literature include: motivating learning, identifying learning difficulties, setting of state and national standards, identifying and providing instructional resources and programs, monitoring and evaluating teachers, providing feedback, assigning a grade to students, providing guidance for future educational and employment decisions, and providing quality assurance within the school system (Airasian & Russell, 2008; Lambert & Lines, 2000; Newstead, 2003; Newton, 2007; Rust, 2002).

These assessment functions are used by individuals and groups across the educational community for a variety of purposes (Airasian & Russell, 2008; Nagy, 2000). National and state policy makers use assessments to set state and national standards, to formulate policies, to track student achievement, or to comply with educational mandates such as the No Child Left Behind Act. School administrators use assessments to monitor classroom teachers, to identify instructional needs and programs, and to monitor student achievement over a period of time. Teachers use assessment information to monitor student progress, to monitor and adjust classroom instruction, to motivate students, to identify students with special needs, to improve

their teaching, and to provide feedback to students about what they know and do not know.

Parents and students use assessments to monitor academic progress, to judge teacher quality, to evaluate the students' strengths and weaknesses, and to make educational and career decisions (Airasian & Russell, 2008).

Types of Assessments

Assessments can be grouped into three general types: official, summative, and formative (Airasian, 2001). Official assessments are typically those used by states to determine whether students and schools are meeting state and/or national standards. Official assessments may also be used by school districts in the form of benchmark or interim exams to gauge student progress toward standards assessed on standardized exams.

Summative assessments are given periodically to determine what students know and do not know at a given point in time (Garrison & Ehringhaus, 2007). Summative assessments often take the form of end-of-unit or chapter tests, end-of-term or semester exams, but can also serve a dual purpose with official assessments in the form of interim or benchmark exams, state assessments, and standardized national assessments.

Formative assessments are typically a part of the ongoing instructional process and enable teachers to promote student learning through the process of identifying a student's current level of learning and adapting instruction to help the student reach the desired learning goal (Black & Wiliam, 2004; Frey & Schmitt, 2010; Heritage, 2007). Formative assessments take a variety of forms, including observations, questioning strategies, discussion, self and peer assessments, graphic organizers, writing assignments, classroom quizzes and tests, homework, and projects (Black & Wiliam, 1998; Dirksen, 2011; Garrison & Ehringhaus, 2007). Formative

and summative assessments usually take place within the classroom and are sometimes referred to collectively as classroom assessments.

Brookhart's (2005) research poses the idea that the purpose and uses of classroom assessments vary significantly from the purpose and uses of external assessments; therefore, the theories of assessment that have developed from the context of large-scale, external assessments do not necessarily apply in the same way to classroom assessments. She describes the need for the development of a classroom assessment theory of measurement that would address the unique characteristics of the classroom assessment environment. A comparison between external and classroom assessments is summarized in Table 1.

Table 1

Comparison of External and Classroom Assessments

Criteria	External Assessments	Classroom Assessments
Context	Context is a “source of irrelevant variance” because the aim is to generalize results across contexts (Brookhart, 2005)	The psychological and social context of classroom assessment has an effect on the assessment (including the language used, the tasks, and the expectations)
Assessment Items and Tasks (Questions, Assignments, Problems)	Content items and tasks are independent of one another; knowledge in one section of the test does not build and connect to items and tasks in another section of the test	Items and tasks are connected to the classroom experience; assessment and instruction are integrated
Sample Sizes	Rely on large sample sizes to make generalizations	Classroom sample sizes are small
Purpose	Summative	Primarily Formative
Student Feedback	Experienced as external to “school”	Experienced as part of the classroom environment and connected to the learning experience
Content and/or Objectives	Broad range of content, includes topics commonly taught in many schools, can cover one or more years of instruction in a subject	Narrow range of content that is specific to classroom instruction; developed by the teacher; usually one unit or chapter of instruction in a subject
Item Types	Primarily multiple choice, some performance events	Various
Item Selection	Many items written and screened, piloted with group of students and best items chosen for test	Teacher chooses or writes items as needed
Scoring of Assessment	Machine and Scorers	Teacher
Reporting of Scores	Percentile rank, grade equivalent scores, mastery level	Number correct, percent correct

Note: Developed from the work of Airasian, 2008 and Brookhart, 2005.

Educators use a combination of official, formative, and summative assessments throughout the year to make instructional decisions, however, not all types of assessment hold the same instructional value for all stakeholders. Official assessments, such as the annual end-of-year state or national exams, are often considered to be “high stakes” assessments, not because of the test itself, but because of the consequences that are assigned to the results of the test. The same test might even have differing levels of value for those involved in the examination process. For example, an annual state-mandated exam may be a low stakes venture for students because there are not any consequences to the student for their performance. The same exam may be a medium-to high-stakes venture for teachers and schools depending on the consequences assigned for schools that do not meet the minimum required state standards for student achievement or growth (Braden, 2007). In the same way, a student might view a classroom unit assessment as a high-stakes exam because of its immediate impact on the semester report card, while the same exam may be a low-stakes assessment for a director of assessment since the exam does not apply in the same way to all students within the district/state. As a result of this, stakeholders often have differing viewpoints about the usefulness of the data from various assessments (Braden, 2007; Nagy, 2000). At the center of the discussion regarding the usefulness of the various types of assessment are the classroom teachers who are responsible for creating, assessing, and reporting student outcomes to the various parties interested in student achievement.

Conceptions

With the emphasis on monitoring, improving, and reporting on student achievement, the creation, use, and implementation of assessments have become a routine element in every educator’s classroom lesson plan. However, even with the systemic use of formative and

summative assessments within schools today, there are noticeable differences among teachers' assessment practices, conceptions, and perspectives (Cizek et al., 1996; Sikka et al., 2007).

Conceptions have been defined as “the specific meanings attached to phenomena which then mediate our response to situations involving those phenomena” (Pratt, 1992). Individuals form conceptions as a result of their varying experiences with life and the beliefs that they then associate with those experiences. These abstract representations of life experience become the lens through which all other events, people, and phenomena are perceived (Pratt, 1992). These conceptions can be dynamic in nature, changing and restructuring, as the individual reflects on their experiences and how they measure up with their beliefs (Thompson, 1992). Therefore, educators' conceptions, the meanings and beliefs that they attach to various forms of assessment of assessment, develop from their personal experiences with assessments, both as a student and as a teacher.

Understanding the meanings and beliefs that teachers attach to assessment is an important component of educational research since evidence strongly suggests that teachers' conceptions and practices of assessment, teaching, and learning are influenced by their personal values and beliefs (Cizek et al., 1996; Pratt, 1992; Thompson, 1992). A teacher's conceptions about “a particular educational issue may include beliefs connected to attitudes about the nature of society, the community, race, and even family. These connections create the values that guide one's life, develop and maintain other attitudes, interpret information, and determine behavior” (Pajares, 1992, p. 319).

Pratt's (1992) research on conceptions of teaching analyzed three interdependent aspects of conception: actions, intentions, and beliefs. His work identified five overarching ideas

regarding teachers' conceptions of teaching: 1) learners experience all aspects (beliefs, intentions, and actions) of a teacher's conceptions of learning; 2) conceptions of teaching represent beliefs about what should be and the means to that end; 3) teachers' conceptions are not mutually exclusive and many held multiple (though not all) of the conceptions identified in Pratt's work; 4) conceptions of teaching are dynamic and changing with experiences that either "confirm or challenge the present thinking and beliefs" (p. 218); and 5) specific instructional methods and techniques do not necessarily correlate with conceptions of teaching.

Interestingly, Pratt did identify one teaching function that revealed an individual's dominant conception of teaching: evaluation and assessment of learners. "The forms, focus, and process of evaluation revealed more about teachers' beliefs and intentions than any other single role, responsibility, or function. It provided a window on what they believed about knowledge, learning, and the purposes of education in their context" (1992, p. 218).

The study of teachers' conceptions toward assessment is important because evidence indicates that teachers' conceptions of teaching, learning, and assessment influence how teachers teach, which then influence how and what students learn (Pajares, 1992; Thompson, 1992). Cizek et al. (1996) found that many teachers seemed to have "individual assessment policies that reflected their own individualistic values and beliefs about teaching" and that they considered and incorporated several objective and subjective factors when assigning grades and creating assessments (p. 159).

Kahn (2000) found that high school English teachers expressed goals for their students "to analyze and interpret", "to think critically", and "to evaluate what they read", yet the assessments that the teachers created did not always place these goals as the focus of assessment

of their students' learning. She found that the teachers used a majority (50%-65% of total class points) of traditional multiple-choice tests that focused on recall of information, vocabulary, and basic concepts. On one assessment, there were more open-ended, higher level thinking, constructed-response type items. When teachers were asked about the differences in this assessment from previous assessments, teachers responded that they included the constructed-response type items to "fulfill district-level objectives", not necessarily recognizing that these items also reflected their stated goals for students (p. 277). Kahn concluded "that teachers' assessment practices may reveal conceptions of teaching and learning that are inconsistent with their stated goals and objectives" and that their assessments may be "influenced strongly by concerns about maintaining student attention, cooperation, and classroom control" (p. 286).

Thompson (1992) concluded that it is from within this complex web of values, beliefs, views, preferences, and practices that teachers develop their philosophy of teaching, learning, and assessment, whether logically developed and articulated or not, that guides the instructional decision-making within their classrooms. The challenge for researchers has been to unravel this complex web to reveal the individualized and personal framework that teachers use to guide the teaching and learning that takes place in their classrooms.

Conceptions of Assessment

In his 2002 study, Brown sought to make conceptions, "the organizing framework by which an individual understands, responds to, and interacts with a phenomenon", more explicit and visible for the purpose of being able to understand and address teachers' conceptions, especially for the purpose of being able to bring about change in conceptions when necessary. Brown (2002) conducted surveys with pre-service teachers as well as practicing primary and

secondary teachers. From the results of his surveys, he sought to identify general descriptors of teacher conceptions and to produce a measurement instrument that could provide a theoretically valid mapping of teachers' conceptions of assessment. Brown (2002) identified the four main conceptions of assessment through a series of studies with teachers in New Zealand. He explored teachers' conceptions about learning, curriculum, teaching, efficacy, assessment practices, and assessment literacy training. From the studies, he identified assessment, learning, and teaching conceptions found in the open-ended comments by the teachers that he was able to group into categories and sub-categories. He proposed four main purposes for assessment identified by teachers and consistent with the research literature: improvement of teaching and learning, making students accountable for learning, accountability of schools and teachers, and a fourth conception that assessment is irrelevant to the work of teachers and students.

Brown then used structural equation modeling (SEM) to determine the nature of the structure of teachers' conceptions of assessment. This led to the creation of the *Conceptions of Assessment-III (CoA-III)*, a 50-item inventory. Later, Brown used confirmatory analysis to determine whether an abridged (27-item model) version would measure the same conceptual framework as the original 50-item model. After selecting the strongest statements related to each factor, they were reanalyzed and Brown's results indicated that the abridged version noted "good fit characteristics" (p. 169) and the factors had "very similar direction and values" (p. 169) as the original CoA-III scale developed in 2002 (Brown, 2006). The validity of the abridged instrument was established in a series of studies with New Zealand elementary educators with acceptable psychometric characteristics ($\chi_{311}^2=841.02$; RMSEA = .057; TLI = .87, $p=.10$). The coefficient alpha scales reliabilities for each conception are as follows: 1) improvement of teaching and learning ($\alpha = .85$), 2) student accountability ($\alpha = .66$), 3) teacher and school

accountability ($\alpha = .79$), 4) irrelevant ($\alpha = .76$). The inventory has since been used in research in several other countries, including the United States and with teachers at the elementary, middle, and high school levels (Brown, 2006; Brown, 2011; Calveric, 2010; Remesal, 2010).

Conception #1: Improvement of teaching and learning. In the first of Brown's conceptions of assessment, improvement of learning and teaching, he proposed that "the purpose for assessing students' knowledge, skill, performance, or understanding is to generate accurate information that leads to valid changes in teaching practice or student learning such that improvement in student achievement can be facilitated" (2002, p. 32). However, he also identified two caveats that must be taken into consideration for this premise to hold true for educators: (a) students' achievement can be demonstrated through assessment results, and (b) assessments yield reliable and valid data that are necessary for accurately determining student performance (Black & Wiliam, 1998; Brown, 2002).

Davis and Neitzel (2011) identified several reasons for classroom assessment in their research that aligned with Brown's first conception of assessment: improving learning and teaching. They interviewed and observed middle grades teachers to uncover their beliefs about the forms and functions of classroom assessment and reported that "most of the assessment purposes our teachers described were designed to inform the teachers themselves" with four purposes dominating their discussions: to evaluate and inform instruction, to identify students for remediation, to evaluate student learning and level of attainment of concept understanding, and to gauge student investment (Davis & Neitzel, 2001, p. 208). In addition, these teachers also identified feedback, both evaluative and descriptive, as another purpose for assessment as it related to students since it contains information and strategies that can be used to improve future performance and increased ownership of learning.

Jones and Egley's (2006) work uncovered teachers' perceptions of high-stakes testing and their effect on teaching and learning. The researchers surveyed more than 700 teachers about their beliefs about their state's high stakes testing program. Almost all of the teachers surveyed (97%) said that their students would learn the same amount or more in reading without the administration of the state's high stakes test. Only 6% of the teachers cited positive effects of the high stakes testing on teaching and learning, while 46% cited negative effects of the testing, both for students and teachers. Only 17% of teachers judged the high stakes reading test to be more than "accurate to some degree" in assessing students' skills and knowledge. Jones and Egley concluded that because teachers claimed that high stakes test scores were not accurate or useful in assessing students, the data was not helping them to improve their instruction or increase student achievement (2006). This helps to explain why 80% of the teachers participating in the study felt that the high stakes testing program was not taking their state's public schools in the right direction for teaching and learning.

Conception #2: Student accountability. The second conception of assessment is that it serves to make students accountable for their own learning through their performance on assessments. Harris and Brown (2009) identify the practices of assigning grades or scores to student work, judging student performance according to specific criteria, and using data to make decisions regarding student placement, retention or graduation as examples of how assessment is used in this fashion. Teachers also frequently gather information about students through various assessment practices, interpret that information based on objective (curriculum standards) or subjective (other students' performance) indicators, and report on students' achievement, attitude, and effort (McMillan, 2001). These reports, which may take the form of grades, written

comments, or verbal feedback, make students accountable for their learning outcomes to themselves, their parents, and society.

Kahn (2000) identifies additional reasons for making students accountable through assessment, including ensuring student motivation, effort, and attention to learning class material, rewarding cooperation, and penalizing those students who are inattentive, uncooperative, lazy, or unmotivated. The teachers in Davis and Neitzel's (2011) study identified grading practices as a way of holding students accountable for the quality and timeliness of their work-to reward or punish academic effort. Many students are often motivated to do well on classroom and state assessments for the purpose of maintaining a strong grade point average (GPA) in the hopes of attaining scholarship money to help fund their post-secondary education. Some states tie performance on high school End of Course (EOC) exams to course credit, as a component of the course grade, or as a contributing factor toward graduation eligibility (Domaleski, 2011).

Conception #3: Teacher and school accountability. The third conception of assessment, accountability of teachers and schools, reflects the importance that society places on student achievement results. This has been seen at the national level with No Child Left Behind Act of 2001 (NCLB) and more recently in the Race to the Top Initiative that encourages states to adopt standards and assessments that prepare students to succeed and compete in the global economy, recruit, develop, reward, and maintain high quality educators, and turn around low achieving schools (NCLB, 2002; United States Department of Education, 2009). It is seen at the local level each year as school districts report to their stakeholders the school and student outcomes on the state achievement tests.

The consequences of accountability for teachers and schools can be positive or negative, but tend to be high rather than low stakes. Consequences may result in the form of merit pay for teachers whose students increased achievement (positive, high-stakes), state takeover of schools (negative, high stakes), or the publishing of test scores in local newspapers that leads to comparisons among schools and districts (positive/negative, high stakes) (Au, 2007; Brown, 2002; Firestone, Mayrowetz, & Fairman, 1998).

Teachers in Davis and Neitzel's (2011) study reflected the thought that "externally imposed assessment practices are intended to ensure teacher accountability" (p. 210). They also acknowledged that many of their classroom assessments served to inform parents and principals about student progress and to prepare students (thus satisfying the district administrators) for the state-mandated testing as additional accountability functions of classroom assessment.

The teachers in Jones and Egley's (2004) study voiced a finding about accountability that has not received as much attention in the literature up to this point. None of the teachers in their survey reported that they were against accountability, leading the researchers to conclude that teachers understand the importance of accountability in their profession. However, they found that while teachers were in favor of accountability or believed that accountability was necessary, they were not in favor of the current means (high stakes, state mandated assessment) by which students and teachers were being held accountable (p. 23).

Conception #4: Assessment is irrelevant. The premise behind the fourth conception of assessment is that assessment, typically understood as the formal, organized process of evaluating student achievement, should be rejected because it is invalid, irrelevant, and negatively affects teachers, students, curriculum and teaching. While some research is showing

positive educational effects from external, high-stakes testing (Au, 2007; Cizek, 2001), other sources are finding that high-stakes testing for the purpose of school accountability is having negative consequences on curriculum, teachers, teaching, and student learning (Au, 2007; Black & Wiliam, 2004; Firestone et al., 1998). Some of the negative consequences include: a narrowing of content to tested subjects, to the detriment or exclusion of non-tested subjects, content being taught in isolation, restriction of imaginative research-type lessons, restricted student involvement and enjoyment, an emphasis on teacher-centered instruction to cover the breadth of test-required information, and a decrease in the variety of professional development offered for educators.

In teacher interviews conducted by Harris and Brown (2009), many negative attitudes toward assessment were seen especially when teachers did not believe that the assessments were effective and when they did not understand how the assessments would improve teaching and learning. In an earlier work, Brown (2004) concluded, “Teachers’ knowledge of students based on long relationship and their understanding of curriculum and pedagogy preclude the need to carry out any kind of assessment beyond the intuitive in-the-head process that occurs automatically as teachers interact with students”. Cizek et al. (1996) observed the comments of teachers suggesting that “a teacher’s informal assessment of a student based on many observations would usually be more accurate than the data resulting from a lesser number of more formal assessments or on any formal assessment”.

Jones and Egley (2004) found that many teachers perceive high stakes assessments to not take into account what is important for a well-rounded education and what will provide students with the knowledge and skills required to help them be successful in today’s society. This study also found that some educators perceive high stakes assessment to be a “political football” in

which politicians were perceived as making their own decisions for personal gain or to achieve other political purposes and not at all relevant to the growth and learning of students. "...[S]ome teachers see the political motives for the testing as incongruent with their personal view of education that centers around doing what is best for the children" (Jones & Egley, 2004, p. 22)

Classroom Assessments vs. State Assessments

Stiggins and Conklin (1992) have noted that the classroom assessment environment is relevant to teachers' conceptions of assessment since the perceptions of teachers toward assessment are linked to the meaning and use of the information it provides them. They found that teachers with negative perceptions toward standardized assessments viewed the assessments as "unrelated to instructional goals...there are too few items and the tests do not assess critical thinking", thus failing to provide needed diagnostic information (p. 49). Teachers in Airasian's (2001) work also commented on the content of the test: "The [standardized] tests are inappropriate for my class because our curriculum doesn't cover some of the test content. The test is so short and the content so general that one gets only a superficial view of how well pupils have learned from my instruction" (p. 340).

Aydeniz and Southerland (2012) found that science teachers' views toward the role of standardized testing were influenced by their beliefs about what they felt was important for students to learn in science. Those teachers who believed students should learn vast amounts of scientific knowledge were more supportive of standardized testing than those who valued the process of developing scientific inquiry and critical thinking skills (p. 251).

Cizek et al. (1996) noted that teachers also make distinctions between the purpose and uses of classroom and external assessments: "To measure these students properly, the teachers do

not put an overreliance on standard tests. They also include observations to help in developing a more accurate picture of the student and to get a better understanding of the student's abilities. This approach certainly benefits the student and provides a more conclusive evaluation of the student's academic performance" (1996, p. 170). Frey and Schmitt (2010) point out that teachers are "becoming increasingly aware of the need to focus on alternative means of assessing students... that validly measure important classroom objectives and use assessment to promote learning" (p. 108). Airasian (2008) acknowledges the conceptual challenge that many teachers face: that the external assessments are not designed to meet the needs of the classroom teacher, but that the assessments do contribute to the overall quality of the school system, which indirectly affects the student's education.

Tested Content Areas vs. Non-Tested Content Areas

With the federal and state emphasis primarily on student achievement in English Language Arts and Mathematics, other content areas in the United States have not received the same amount of attention and, as a result, many of those content areas do not have the same state mandated high-stakes testing expectations or even high-stakes tests themselves.

Teachers who teach in a non-tested content area often find themselves strongly encouraged to support the literacy standards that are so prominent in the English Language Arts. This leads those teachers to provide more of an emphasis in reading comprehension and writing, which can take time away from the development of conceptual understanding in their own content area (Aydeniz & Southerland, 2012).

In addition, teachers' perception of subject disciplines themselves tended to create differences in the conceptions and teaching practices of teachers. Black and Wiliam (2004)

noted that “the subject disciplines create strong differences in both the mindsets of the teachers and the conduct of learning in their classes” (p. 37). The pair found that teachers of math and science tended to view their subject matter as clearly defined with objectively defined goals that would allow for all students to reach a common goal of understanding the specific learning targets.

In contrast, Black and Wiliam (2004) found that teachers of writing viewed achievement as a “horizon” of different goals that could be achieved at different times by individual students. With such a difference in perceptions regarding teaching practices among content areas, it therefore stands to reason that the purpose and use of assessments would also differ among content areas.

This study sought to explore the idea that there are differences in teacher conceptions toward assessment based on whether that teacher teaches in a state tested content area or not. Since there is no known research in this area, this study was completed for the purpose of providing initial exploration into this area.

Middle School vs. High School

A small number of researchers have studied the differences between elementary schools and middle schools, including differences in grading and differences in teachers’ conceptions toward assessment (Randall & Engelhard, 2009; Remesal, 2007). There are several reasons to expect differences between elementary and secondary (middle and high school) teachers. In a traditional elementary school (grades K-5), students are assigned to one academic teacher for the bulk of the day. This teacher teaches all the core school subjects such as math, science, social studies, and English language arts. Students in elementary school may see other teachers for

classes such as art, music, or physical education, but typically remain together as a full class throughout the course of the school day. In a traditional middle school (grades 6-8) and/or high school (grades 9-12), students move from one class to another, typically spending between 45 minutes and 90 minutes in each class. Students learn from teachers who specialize in a specific content area (English, history, math, science, art, music, health). Students might share some of the same teachers, but they most often do not travel together as a whole group, in contrast to the elementary school structure. In light of these significant differences between elementary and middle school structures, this study will focus on the conceptions of middle school and high school teachers who share similar school structures.

In their 1992 study of teachers' assessment practices, Stiggins and Conklin found that there were grade level differences in the purpose of assessment, the type of assessments used, and the concern about the quality of assessments. They found that assessment in the elementary grades tended to be more formative, while assessment in the secondary grades tended to be summative. Teachers at the higher grade levels also reported using their own assessments more often than those created by textbook publishers. The researchers posited that this could be due to the need for teachers to tailor their assessments to suit their unique classroom objectives. Teachers' concern about the quality of assessments also increased with grade level, a possible reflection on the increased value of assessments (and grades assigned to them) as a measure of student achievement and progress at the higher grade levels.

More recently, McMillan and Lawson (2001) investigated whether the grade level a teacher taught had an impact on grading practices and assessment. The results of their survey of more than 200 teachers from almost sixty secondary schools (grades 6-12) did not show any significant difference between teachers at different grade levels, although the factors that were

used to assign grades were varied. Liu's (2008) work in examining differences in teachers' perceptions of grading practices indicated that middle school and high school teachers did not differ significantly in their perceptions of grading practices, nor in the factors associated with formal achievement.

Although studies have been done that highlight the differences in practices between elementary and middle schools and differences between grading practices at the middle and high school level (Liu, 2008; Randall & Engelhard, 2009; Remesal, 2007; Stiggins & Conklin, 1992), very little is known about the differences in conceptions between middle school and high school teachers. This study sought to identify differences between middle school and high school teachers' conceptions toward assessment.

Conclusion

In our current assessment-driven educational environment, there are multiple stakeholders and multiple purposes for the data generated by assessments. Educational leaders at the district and state levels are interested in external, standardized assessments from the perspective of complying with state and/or federal mandates and formulating policies to increase the achievement of students. Administrators and building leaders use external, standardized assessment data as well as classroom summative assessments to monitor teacher effectiveness and student achievement. Teachers use external, standardized assessments along with classroom formative and summative assessments to improve and adjust instruction, to provide feedback to students, parents and administrators, and to increase student achievement in their content areas.

Teachers' conceptions about assessment are pivotal toward understanding their beliefs and intentions about knowledge, learning, and the function of education (Pratt, 1992). It is from these beliefs that teachers make determinations about content, instructional practices, grading practices, the type and use of classroom assessments, the use of feedback for students, and many other instructional decisions. Gavin Brown (2002) identified four overarching conceptions of teacher assessment: 1) assessment improves teaching and learning, 2) assessment holds students accountably, 3) assessment holds teachers and schools accountable, 4) assessment is irrelevant to the work of teachers. Understanding teachers' conceptions toward assessment is a key component to designing professional development experiences that can help shape, challenge, and clarify teachers' classroom assessment practices.

The current literature regarding the types of assessments used by teachers is vast, detailing differences between classroom and external assessments, differences between formative

and summative assessments, and describing how instructional practices are shaped by beliefs about assessments (Airasian, 2001; Black & Wiliam, 1998; Brookhart, 2005; Garrison & Ehringhaus, 2007; Heritage, 2007). The research related to differences in conceptions of assessment based on whether a teacher teaches in a state tested content area or non-state tested content area is extremely limited, although there are some studies that identify differences in how teachers from different content areas perceive assessment in general (Aydeniz & Southerland, 2012; Black & Wiliam, 2004). There are several studies that have examined differences in teacher conceptions from elementary to middle school, but very little discussion is available in the research to discuss whether there are differences from middle school to high school (Randall & Engelhard, 2009; Remesal, 2007).

Methodology

Interest in the beliefs and conceptions of teachers began in the early 1990s with research focusing on the classroom practices of teachers, including instructional strategies and assessment and grading practices (Cizek et al., 1996; Pajares, 1992; Pratt, 1992; Thompson, 1992). With the implementation of the No Child Left Behind legislation in the early 2000s, assessment of students became a national priority and interest in how teachers viewed assessment and their assessment practices became a focus for researchers (Black & Wiliam, 1998; Brookhart, 2005; Brown, 2002; McMillan, 2001). Recent research has focused on the varying purposes of assessment and how teachers view those purposes (Davis & Neitzel, 2011; Harris & Brown, 2009).

Even with the current research that is taking place, questions remain about teacher conceptions toward assessment. This study aimed to explore the following questions:

1. Do secondary (grades 6-12) teachers' conceptions toward assessment vary between state assessments and classroom assessments?
2. Do teachers' conceptions toward assessment vary between those that teach in a state tested content area and those that do not?
3. Do teachers' conceptions toward assessment vary between middle school (grades 6-8) and high school (grades 9-12) teachers?

Procedure

Research Approval. Prior to the start of this research project, the proposed study was submitted to the University of Kansas Human Subjects Committee-Lawrence (HSCL) for approval and compliance with International Review Board (IRB) policies. Once the proposal

was formally approved by the HSCL and prior to beginning data collection, a Request to Conduct Research form was submitted to the cooperating school district's Director of Research, Evaluation & Accountability. Once school district approval was granted, the invitation and link to participate in the survey was emailed to the target population.

Recruitment and Participants. Participants were recruited from a large, diverse urban-suburban K-12 school district in a Midwestern state. An email of introduction and invitation to participate in the study was sent by the researcher to certified teaching staff in each of the five middle schools and four high schools in the district (Appendix A). Participants that chose to participate in the survey indicated their agreement that "completion of the survey indicates consent to take part in the study" (Appendix B). The target population for this study was certified teachers that are currently teaching in grades six through twelve. A total of 179 teachers responded to the survey, for a response rate of approximately 38%.

Forty-one participants' data were removed from the overall results due to partial survey completion. Nine participants' data were removed from the overall results due to teachers indicating teaching in both grades 6-8 and grades 9-12 and one participant's data was removed from the overall results due to teaching in two content areas, one which is state tested and one which was not. This resulted in a final sample of 128 participants. Of the final included sample, eighty-six teachers (67%) indicated teaching at the middle school level (grades 6-8) and 42 (33%) at the high school level (grades 9-12). Seventy-three teachers (57%) indicated teaching in a state tested content area, while fifty-five teachers (43%) indicated teaching in a non-state tested content area.

Participants were asked to provide additional demographic information, including age, years of teaching experience, and level of education earned (see Appendix C). Ninety-two females (72%) and 36 males (28%) completed the survey. Participants ranged in age from 24 to 68 years of age, with age 42 being both the mean and median age. Their experience ranged from one year to forty years of teaching, with a mean of 14.7 years and a median of 14 years of teaching experience. Fifty-four teachers (42%) indicated 1-10 years of experience, 40 teachers (31%) indicated 11-20 years of experience, and 34 teachers (27%) indicated more than 21 years of teaching experience. Twenty-one teachers (16%) reported having earned a Bachelor's degree, 88 teachers (69%) reported having earned a Master's degree, and 19 teachers (15%) reported having earned a Specialist or Doctorate degree.

Measures. The quantitative design of this study included an online survey of participants that was administered through Qualtrics, an online survey platform (<http://qualtrics.com>). Participants were asked to complete a 27-item survey to measure their beliefs about assessment. Participants were asked to complete the survey twice, once reporting their attitudes toward state tested content area assessments and once reporting their attitudes about classroom assessments. The measures were counterbalanced so half of the participants addressed state assessments first and the other half of participants addressed classroom assessments first.

The instrument adapted for use in this study was the *Conceptions of Assessment Abridged Survey* (CoA-III A, Brown, 2006), with permission to use the instrument granted by the author, Gavin Brown. The inventory is designed to elicit teacher self-ratings for four conceptions of assessment (assessment improves learning, assessment holds students accountable, assessment holds teachers and schools accountable, and assessment is irrelevant). Some adaptations were made to the original instrument for purposes of this study. The original instrument contained a

positively-slanted agreement rating scale with two negative options (mostly disagree, strongly disagree) and four positive options (slightly, moderately, mostly, and strongly agree) (Brown, 2011). The adapted instrument contains a Likert-type scale with a range of five items (strongly disagree, disagree, neither agree nor disagree, agree, strongly agree). The adapted instrument's items relating to the irrelevance conception were changed to be positively worded over concerns about the measurement properties of negatively worded items. For purposes of data analysis and discussion of results, the fourth conception was changed to be worded positively (assessment is relevant) to maintain consistency with the positively worded survey items and the other positively worded conceptions. The adapted instrument can be found in Appendix D. A list of survey items identified by conception can be found in Appendix E.

Analyses. The research questions were tested with a series of 2 x 2 x 2 repeated measures analysis of variance. The analysis of variance included two between-subject factors: school level (middle versus high) and content area (state tested versus non-state tested) and one within-subjects factor: type of assessment (classroom versus state). Separate analyses of variance were conducted for each of the four conceptions. When the analysis of variance indicated a significant interaction, additional analysis of variance tests were run to analyze the interactions.

Results

The purpose of this study was to explore secondary teachers' (grades 6-12) conceptions toward assessment, specifically focusing on differences among teachers who teach in a state tested area and those that do not teach in a state tested content area. This study also explored teachers' conceptions toward assessments that are given as a part of the regular classroom routine and those assessments given as a result of state mandates. In addition, this study sought to explore any differences between teachers who teach at the middle school level (grades 6-8) and those who teach at the high school level (grades 9-12).

Reliability. Table 2 contains the reliability statistics for the conceptions of assessment subscales as well as analyzed by type of assessment. When the reliability of the items within each conception subscale was tested, alpha values ranged from .48-.93. The lowest overall reliability score was observed in the student accountability conception ($\alpha=.48$). An analysis of the items was conducted to see if dropping an individual item would improve reliability, but the results did not produce a significant improvement in the reliability of the subscales.

Table 2
Reliability Statistics for Conceptions

Conception of Assessment	Classroom α	State α	Combined α
Improvement of Teaching and Learning	.93	.89	.88
Student Accountability	.40	.52	.48
Teacher and School Accountability	.83	.84	.75
Assessment is Relevant	.86	.82	.93

Subscale correlations. To examine whether the conceptions of assessment subscales were related to one another, a Pearson Correlation analysis was conducted (see Table 3).

Table 3
Correlations of Assessment Conceptions Subscales

	Classroom Improvement of Teaching & Learning	Classroom Student Accountability	Classroom Teacher and School Accountability	Classroom Assessment is Relevant	State Improvement of Teaching & Learning	State Student Accountability	State Teacher and School Accountability	State Assessment is Relevant
Classroom Improvement of Teaching & Learning	—							
Classroom Student Accountability	.66**	—						
Classroom Teacher and School Accountability	.65**	.47**	—					
Classroom Assessment is Relevant	.91**	.65**	.70**	—				
State Improvement of Teaching & Learning	.05	.15	.06	.05	—			
State Student Accountability	.12	.15	-.08	.09	.45**	—		
State Teacher and School Accountability	.14	.21*	.17	.13	.69**	.33**	—	
State Assessment is Relevant	.05	.10	.01	.06	.82**	.52**	.62**	—

** Correlation is significant at the $p < .01$ level (2-tailed)

* Correlation is significant at the $p < .05$ level (2-tailed)

Descriptive statistics. The results reported in Tables 4-7 reveal the descriptive statistics of the mean and standard deviations of the conceptions of assessment based on the type of assessment (state, classroom), grade level (middle school, high school), and content area (tested area, non-tested area).

Table 4
Descriptive Statistics for Assessment Type

Conception of Assessment	Combined		Classroom Assessments		State Assessments	
	M	SD	M	SD	M	SD
Improvement of Teaching and Learning	3.16	.48	3.88	.62	2.44	.70
Student Accountability	3.47	.51	3.68	.59	3.26	.76
Teacher and School Accountability	2.72	.66	3.21	.89	2.24	.84
Assessment is Relevant	3.24	.46	3.80	.61	2.67	.66

Table 5
Descriptive Statistics for Content Area and Assessment Type

Conception of Assessment	State Tested Content Area		Non-State Tested Content Area		Classroom Assessments Tested		Classroom Assessments Non-Tested		State Assessments Tested		State Assessments Non-Tested	
	M	SD	M	SD	M	SD	M	SD	M	SD	M	SD
Improvement of Teaching and Learning	3.16	.47	3.16	.51	3.91	.64	3.85	.62	2.41	.67	2.47	.75
Student Accountability	3.49	.53	3.44	.49	3.68	.62	3.68	.54	3.31	.79	3.19	.72
Teacher and School Accountability	2.77	.67	2.65	.64	3.26	.92	3.13	.84	2.28	.87	2.18	.80
Assessment is Relevant	3.25	.44	3.21	.49	3.80	.62	3.80	.59	2.70	.66	2.62	.66

Table 6
Descriptive Statistics for Grade Level and Assessment Type

Conception of Assessment	Middle School		High School		Classroom Assessments			State Assessments				
	M	SD	M	SD	Middle School	High School	Middle School	Middle School	High School			
Improvement of Teaching and Learning	3.20	.46	3.07	.53	3.92	.60	3.81	.69	2.49	.68	2.33	.74
Student Accountability	3.45	.49	3.51	.57	3.67	.56	3.70	.65	3.22	.75	3.33	.79
Teacher and School Accountability	2.78	.66	2.60	.64	3.31	.91	3.00	.81	2.26	.88	2.19	.77
Assessment is Relevant	3.27	.45	3.15	.48	3.85	.58	3.70	.65	2.70	.67	2.60	.63

Table 7
Descriptive Statistics for Assessment Type, Content Area, and Grade Level

Conception of Assessment	Classroom Assessments						State Assessments									
	MS Tested Area	MS Tested Area	MS Non-Tested Area	MS Non-Tested Area	HS Tested Area	HS Tested Area	HS Non-Tested Area	HS Non-Tested Area	MS Tested Area	MS Tested Area	MS Non-Tested Area	MS Non-Tested Area	HS Tested Area	HS Tested Area	HS Non-Tested Area	HS Non-Tested Area
Improvement of Teaching and Learning	3.90	.54	3.94	.69	3.93	.88	3.71	.49	2.52	.64	2.44	.75	2.10	.65	2.52	.77
Student Accountability	3.69	.55	3.66	.57	3.67	.81	3.72	.50	3.26	.81	3.16	.65	3.44	.75	3.23	.83
Teacher and School Accountability	3.33	.92	3.27	.91	3.09	.94	2.93	.69	2.32	.89	2.16	.85	2.18	.80	2.20	.75
Assessment is Relevant	3.84	.52	3.88	.68	3.71	.85	3.69	.44	2.76	.65	2.61	.70	2.56	.66	2.63	.63

Analysis of counterbalancing measures. The measures for this survey were counterbalanced so half of the participants addressed state assessments first and the other half of participants addressed classroom assessments first. Results of independent samples t-tests indicate that the order in which teachers answered questions about assessment had no significant effect on their responses.

Correlation of subscales. To examine the correlations among the conceptions and between the conceptions regarding classroom and state assessments, a Pearson correlation analysis was conducted. There were strong, positive correlations among the four factors associated with classroom assessments. The correlation between the conception for classroom assessment for the improvement of teaching and learning and classroom assessment is relevant had the strongest correlation, $r(127) = .91, p < .01$. The weakest correlation among the four factors associated with classroom assessments was between the conception of classroom assessment for student accountability and classroom assessment for school accountability, $r(127) = .47, p < .01$.

There were also strong, positive correlations among the four factors associated with state assessments. The correlation between the conception for state assessment for the improvement of teaching and learning and state assessment is relevant had the strongest correlation, $r(127) = .82, p < .01$. The weakest correlation was between the conception of state assessment for student accountability and state assessment for school accountability, $r(127) = .33, p < .01$.

There were not any strong correlations between the factors associated with classroom assessments and the factors associated with state assessments. However, there was a weak

positive correlation found between the conception for classroom student accountability and state school accountability, $r(127) = .21, p < .05$.

Improvement of teaching and learning. To examine teachers' conceptions of classroom and state assessments as a method for the improvement of teaching and learning, a 2 (grade level: middle school, high school) x 2 (content area: state tested, non-state tested) x 2 (assessment type: classroom, state) repeated measures analysis of variance was conducted, with the last factor as a within-subjects variable. Results indicated a main effect of the conception of assessment for the improvement of teaching and learning factor, $F(1,124) = 289.41, p < .001$, with a stronger endorsement of the conception for classroom than state assessments (see Table 4 for means). Results indicated no significant interaction of the improvement of teaching and learning factor with either grade level or content area. Results did indicate a significant three-way interaction between the teaching and learning factor, grade level and content area, $F(1,124) = 4.75, p = .03$.

In order to further examine this three-way interaction, separate repeated measures analyses of variance were conducted by grade level. Results of these follow-up analyses indicated a significant conception of improvement of teaching and learning by content area interaction among high school teachers, $F(1,124) = 4.83, p = .03$, with teachers in a tested content area showing a larger gap in their endorsement of this conception for classroom than state assessments as compared to teachers in a non-tested area (see Table 7 for means). No significant interaction was found for middle school teachers.

Student accountability. To examine teachers' conceptions of classroom and state assessments as a method for student accountability, a 2 (grade level: middle school, high school)

x 2 (content area: state tested, non-state tested) x 2 (assessment type: classroom, state) repeated measures analysis of variance was conducted, with the last factor as a within-subjects variable. Results indicated a main effect of the conception of assessment for the purpose of student accountability, $F(1,124) = 23.19$, $p < .001$, with a stronger endorsement of the conception for classroom than state assessments (see Table 4 for means). Results indicated no significant interaction of the student accountability factor with either grade level or content area.

Teacher and school accountability. To examine teachers' conceptions of classroom and state assessments as a method for teacher and school accountability, a 2 (grade level: middle school, high school) x 2 (content area: state tested, non-state tested) x 2 (assessment type: classroom, state) repeated measures analysis of variance was conducted, with the last factor as a within-subjects variable. Results indicated a main effect of the conception of assessment for the purpose of teacher and school accountability, $F(1,124) = 77.65$, $p < .001$, with a stronger endorsement of the conception for classroom than state assessments (see Table 4 for means). Results indicated no significant interaction of the teacher and school accountability factor with either grade level or content area.

Assessment is relevant. To examine teachers' conceptions of classroom and state assessments as relevant, a 2 (grade level: middle school, high school) x 2 (content area: state tested, non-state tested) x 2 (assessment type: classroom, state) repeated measures analysis of variance was conducted, with the last factor as a within-subjects variable. Results indicated a main effect of the conception of assessment as relevant, $F(1,124) = 186.35$, $p < .001$, with a stronger endorsement of the conception for classroom than state assessments (see Table 4 for means). Results indicated no significant interaction of the assessment as relevant factor with either grade level or content area.

Discussion

Question 1: Do secondary (grades 6-12) teachers' conceptions toward assessment vary between state assessments and classroom assessments?

The findings from this study indicate that there is a difference in the conceptions held by teachers based on whether the assessment is classroom based or mandated by the state. The overall means for each conception at the classroom level was greater than the means for the same conception at the state level meaning that teachers indicated a stronger agreement for the conceptions as they relate to the assessments that take place in their classrooms as opposed to those that are mandated by the state.

There are also strong correlations among the factors associated with classroom assessment and strong correlations among the factors associated with state assessment, but there are no significant correlations between the factors associated with classroom and state assessments. These correlations indicate that teachers do not view assessments equally; classroom assessment is seen as being distinct from state assessment.

In general, teachers tended to endorse the conceptions of assessment for improving teaching learning and assessment is relevant when considering classroom assessments. When considering state assessments, teachers tended to endorse the conception of student accountability most strongly. This reveals that teachers may have a distinct view of the purposes of classroom assessments and state assessments.

Teachers agreed that their classroom assessments served the purpose of both improving their teaching and the learning of their students as well as holding students accountable for their learning better than state assessments. This finding aligns with what researchers have noted

about classroom feedback: teachers prefer to use ongoing, frequent formative classroom assessment to guide their instruction and provide feedback to students as opposed to one-time, state summative assessments that do not provide timely feedback to guide instruction (Airasian, 2001; Black & Wiliam, 1998; Brookhart, 2005; Frey & Schmitt, 2010; Jones & Egley, 2006; Kahn, 2000; McMillan, 2001). Researchers have also found that teachers use classroom assessment practices to ensure motivation, effort and attention, to reward and/or penalize students for classroom behavior, and to hold students accountable for the quality and timeliness of their work (Kahn, 2000; Davis & Neitzel, 2011).

One finding of interest was that the means for the student accountability conception are more similar between classroom assessments and state assessments than were the means for the other three conceptions. This reveals that teachers do differentiate between the purposes of assessment for student accountability for classroom assessment and state assessments. The correlation between classroom student accountability and state school accountability also indicates that teachers may view their classroom assessments as a way to hold students accountable for their progress toward achievement on state assessments that are indicative of a school's performance. In the research literature, it has been noted that teachers reflect the thought that "externally imposed assessment practices are intended to ensure teacher accountability (Davis & Neitzel, 2011, p. 210); however, the same teachers acknowledged that many of their classroom assessments also serve to inform parents and principals of student progress toward the state-mandated testing goals. This seems to support the findings of the teacher conceptions of this study.

It was not surprising to note that teachers more strongly endorsed the conception that assessments are relevant at the classroom level than at the state level. Researchers have found

that teachers tend to have more negative views toward assessments that are not seen as effective or linked to the improvement of teaching and learning, a view that many teachers hold to be true of state mandated assessments (Airasian, 2001; Harris & Brown, 2009; Jones & Egley, 2004; Stiggins & Conklin, 1992). In addition, researchers have identified high-stakes testing, such as state mandated assessments, with negative outcomes on curriculum, teaching, teachers, and student learning (Au, 2007; Black & Wiliam, 2004; Firestone, et al., 1998).

Question 2: Do teachers' conceptions toward assessment vary between those that teach in a state tested content area and those that do not?

The findings from this study indicate that there is no significant difference in the conceptions held by teachers toward classroom and state assessments based on whether that teacher teaches in a state tested content area or a non-state tested content area. However, a significant interaction effect was observed.

A three-way interaction was discovered that showed a greater agreement for the conception of assessment for the purpose of improving teaching and learning among high school teachers teaching in a state tested content area for classroom assessments as compared to high school teachers teaching in a non-tested content area. The high school teachers teaching in a state tested area showed a larger gap in this conception for classroom than state assessments, indicating that these teachers felt that their classroom assessments were better suited for providing feedback for teaching and learning than the state assessments when compared to their colleagues who did not teach in a state tested content area. Again, this finding seems to support the findings in the research literature: teachers prefer to use ongoing, frequent formative classroom assessment to guide their instruction and provide feedback to students as opposed to

one-time, state summative assessments that do not provide timely feedback to guide instruction (Airasian, 2001; Black & Wiliam, 1998; Brookhart, 2005; Jones & Egley, 2006; Kahn, 2000; McMillan, 2001).

It is interesting to note that there were no significant effects found at the middle school level for any of the conceptions. A closer look at the means in Table 7 reveal very little difference (and in some cases, no mean difference at all) between the state tested content areas and the non-tested areas. These results seem to indicate that, in general, teachers conceptions about classroom and state assessments do not vary across content areas, whether state mandated testing occurs or not.

Question 3: Do teachers' conceptions toward assessment vary between middle school (grades 6-8) and high school (grades 9-12) teachers?

The findings from this study did not find any significant differences between middle school and high school teachers and their conceptions of classroom and state assessments. Although the research literature has not examined teachers' conceptions of assessment toward classroom and state assessments across the grade levels to the same extent that grading practices, perceptions of grading practices, and the factors associated with formal achievement have received, the findings of this study are consistent with the research that does not indicate significant differences in assessment between middle school and high school teachers (Liu, 2008; Randall & Engelhard, 2009; Remesal, 2007; Stiggins & Conklin, 1992).

Limitations

This study was conducted in a large, diverse urban-suburban school district in a large city in the Midwest. Since only one school district was included in this study, the threat to external validity is high. As a result, the findings of this study may not be generalizable to other teachers in other school districts in other parts of the country. Future studies on this topic would need to be conducted in additional school districts in urban, suburban, and rural school districts.

The results of this study were based on an online survey taken by teachers self-reporting on their assessment beliefs. Since there was not random sampling, there is an additional threat to the external validity of this study. The sample could be biased with only those most interested in the topic of assessment choosing to respond to the survey.

Another limitation of the study was the reliability statistic of the conception for student accountability subscale. The coefficient alpha reliabilities of this conception was well below the reliabilities of the other conceptions (see coefficient alpha values in Table 2). One possible reason for the low reliability score of the student accountability conception is the fact that there were only six items in the survey that corresponded to that subscale and high reliabilities can be difficult to attain with such a small number of items. In the validation of the *Conceptions of Assessment Abridged Survey (CoA-III A)*, the reliabilities were found to be in the acceptable range for the student accountability conception, although the coefficient alpha reliabilities were lower for this conception than for the other conceptions (Brown, 2006).

The items corresponding to the conception of teacher and school accountability also present an additional limitation. Each of the items on the *CoA-III A* that correspond to this conception were worded to include only the term “school”, with no mention of the term

“teacher”. In terms of this study, the conception would have been better worded as school accountability, rather than ‘teacher and school accountability’, since there was no consideration of the role of the teacher in the items as phrased.

Implications for Future Study

The examination of teachers' assessment practices has been a popular topic since the implementation of large-scale assessments. There is a wealth of information available in the research literature on the topic, but there are still some unanswered questions and areas for additional study regarding teachers' beliefs and conceptions toward assessment.

More and more assessments are being used for the purpose of teacher and school accountability and teachers in this study indicated a relatively high level of agreement for the conception of assessment in this area. Future studies could further examine the role of classroom, interim/benchmark, and state assessments in a school district's overall assessment plan and the ways in which teachers' conceptions vary toward each these. There is also the question as to the extent that teachers believe these various types of assessment hold students, teachers, and schools accountable.

With the limitation of the wording of the conception regarding teacher and school accountability, a new question is raised about the conceptions of teacher and school accountability. With the current discussions regarding teacher merit pay and value-added measures of teacher performance, future studies could examine teachers' conceptions toward assessment for the purpose of school accountability compared to assessment for the purpose of teacher accountability.

Additional studies could also examine the conceptions of assessment as they relate to the use of classroom assessments. Within classroom assessments, there are additional levels of assessment (diagnostic, formative, summative) that are used by teachers on a much more frequent and ongoing basis. Teachers are also implementing alternative methods of classroom

assessments, such as portfolios, problem-based learning, and other forms of authentic assessment. Studies could examine teachers' conceptions toward these types of assessments and the instructional practices that take place as a result of these conceptions.

References

- Airasian, P.W. (2001). *Classroom assessment: Concepts and applications* (4th ed.). New York, NY: McGraw-Hill.
- Airasian, P.W., & Russell, M.K. (2008). *Classroom assessment: Concepts and applications* (6th ed.). New York, NY: McGraw-Hill.
- Au, W. (2007). High-stakes testing and curricular control: A qualitative metasynthesis. *Educational Researcher*, 36(5), 258-267. Retrieved from <http://www.jstor.org/stable/30137912>
- Aydeniz, M., & Southerland, S.A. (2012). A national survey of middle and high school science teachers' responses to standardized testing: Is science being devalued in schools? *Journal of Science Teacher Education*, 23, 233-257. doi:10.1007/s 10972-012-9266-3
- Black, P., & Wiliam, D. (1998). Inside the black box: Raising standards through classroom assessment. *The Phi Delta Kappan*, 80(2), 139-144, 146-148. Retrieved from <http://www.jstor.org/stable/20439383>
- Black, P., & Wiliam, D. (2004). The formative purpose: Assessment must first promote learning. *The Yearbook of the National Society for the Study of Education*, 103(2), 20-50.
- Braden, J. (2007). Using data from high-stakes testing in program planning and evaluation. *Journal of Applied School Psychology*, 23(2), 129-150.
- Brookhart, S.M. (2005). Developing measurement theory for classroom assessment purposes and uses. *Educational Measurement: Issues and Practice*, 22(4), 5-12.
doi:10.1111/j.1745-3992.2003.tb00139.x

- Brown, G.T.L., Lake, R. & Matters, G. (2011). Queensland teachers' conceptions of assessment: The impact of policy priorities on teacher attitudes. *Teaching and Teacher Education*, 27, 210-220. doi:10.1016/j.tate.2010.08.003
- Brown, G.T.L. (2007). *Conceptions of Assessment (CoA III Abridged)*. The University of Auckland, New Zealand.
- Brown, G.T.L. (2006). Teachers' conceptions of assessment: Validation of an abridged version. *Psychological Reports*, 99, 166-170. doi:10.2466/PR0.99.1.166-170
- Brown, G.T.L. (2004). Teachers' conceptions of assessment: Implications for policy and professional development. *Assessment in Education*, 11(3), 301-318. doi:10.1080/0969594042000304609
- Brown, G.T.L. (2002). *Teachers' conceptions of assessment*. (Unpublished doctoral dissertation). University of Auckland, Auckland, NZ. Retrieved from <http://auckland.academia.edu/GavinBrown/Papers>
- Calveric, S.B. (2010). Elementary teachers' assessment beliefs and practices. (Unpublished doctoral dissertation). Virginia Commonwealth University, Richmond, VA. Retrieved from https://digarchive.library.vcu.edu/bitstream/handle/10156/3210/Calveric_Sarah_PHD.pdf.pdf
- Cizek, G.J. (2001). More unintended consequences of high-stakes testing. *Educational Measurement: Issues and Practice*, 20(4), 19-27. doi:10.1111/j.1745-3992.2001.tb00072.x

- Cizek, G.J., Fitzgerald, S.M. & Rachor, R.E. (1996). Teachers' assessment practices: Preparation, isolation, and the kitchen sink. *Educational Assessment, 3*(2), 159-179.
- Davis, D.S., & Neitzel, C. (2011). A self-regulated learning perspective on middle grades classroom assessment. *The Journal of Educational Research, 104*(3), 202-215. Retrieved from <http://dx.doi.org/10.1080/00220671003690148>
- Dirksen, D.J. (2011). Hitting the reset button: Using formative assessment to guide instruction. *Phi Delta Kappan, 92*(7), 26-31. Retrieved from <http://www.jstor.org/stable/25822834>
- Domaleski, C. (2011). *State end of course testing programs: A policy brief*. Retrieved from http://www.ccsso.org/Documents/2011/State_End-of-Course_Testing_Programs_2011.pdf
- Firestone, W.A, Mayrowetz, D. & Fairman, J. (1998). Performance-based assessment and instructional change: The effects of testing in Maine and Maryland. *Educational Evaluation and Policy Analysis, 20*(2), 95-113. Retrieved from <http://www.jstor.org/stable/1164376>
- Frey, B.B., & Schmitt, V.L. (2010). Teachers' classroom assessment practices. *Middle Grades Research Journal, 5*(3).
- Garrison, C., & Ehringhaus, M. (2006). Formative and summative assessments in the classroom. *School Connections, 18*(2). Retrieved from <http://www.amle.org>
- Harris, L.R., & Brown, G.T.L. (2009). The complexity of teachers' conceptions of assessment: Tensions between the needs of schools and students. *Assessment in Education: Principles, Policy & Practice, 16*(3), 365-381.

- Heritage, M. (2007). Formative assessment: What do teachers need to know and do? *The Phi Delta Kappan*, 89(2), 140-145. Retrieved from <http://www.jstor.org/stable/20442432>
- Jones, B.D., & Egley, R.J. (2004). Voices from the frontlines: Teachers' perceptions of high-stakes testing. *Education Policy Analysis Archives*, 12(39). Retrieved from <http://epaa.asu.edu/v12n39>
- Jones, B.D., & Egley, R.J. (2006). Looking through different lenses: Teachers' and administrators' views of accountability. *The Phi Delta Kappan*, 87(10), 767-771. Retrieved from <http://www.jstor.org/stable/20442154>.
- Kahn, E.A. (2000). A case study of assessment in a grade 10 English course. *The Journal of Educational Research*, 93(5), 276-286. Retrieved from <http://www.jstor.org/stable/27542277>
- Lambert, D., & Lines, D. (2000). *Understanding assessment: Purposes, perceptions practice*. New York, NY: RoutledgeFalmer.
- Liu, X. (2008). Measuring teachers' perceptions of grading practices: Does school level make a difference? *NERA Conference Proceedings 2008*. Paper 4. Retrieved from http://digitalcommons.unconn.edu/nera_2008/4
- McMillan, J.H. (2001). Secondary teachers' classroom assessment and grading practices. *Educational Measurement: Issues and Practice*, 20(1), 20-32. Retrieved from [doi:10.1111/j.1745-3992.2001.tb00055.x](https://doi.org/10.1111/j.1745-3992.2001.tb00055.x)
- McMillan, J.H., & Lawson, S.R. (2001). Secondary science teachers' classroom assessment and grading practices. *Metropolitan Educational Research Consortium*. Richmond, VA.

- Nagy, P. (2000). The three roles of assessment: Gatekeeping, accountability, and instructional diagnosis. *Canadian Journal of Education*, 25(4), 262-279. Retrieved from <http://www.jstor.org/stable/1585850>
- National Governors Association Center for Best Practices, Council of Chief State School Officers (2010). *Common Core State Standards*. Washington, D.C.: National Governors Association Center for Best Practices, Council of Chief State School Officers. Retrieved from <http://www.corestandards.org>
- Newstead, S. (2003). The purposes of assessment. *Psychology Learning and Teaching*, 3(2), 97-101. Retrieved from http://www.wwwwords.co.uk.www2.lib.ku.edu:2048/pdf/validate.asp?j=plat&vol=3&issue=2&year=2003&article=3_Newstead_PLAT_3_2_web
- Newton, P.E. (2007). Clarifying the purposes of educational assessment. *Assessment in Education*, 14(2), 149-170. Retrieved from <http://www.tandfonline.com/doi/abs/10.1080/09695940701478321>
- Next Generation Science Standards (2013). Washington, D.C.: Achieve, Inc. Retrieved from <http://www.nextgenscience.org>
- No Child Left Behind (NCLB) Act of 2001, Pub. L. No. 107-110, § 115, Stat. 1425 (2002).
- Pajares, M. F. (1992). Teachers' beliefs and educational research: Cleaning up a messy construct. *Review of Educational Research*, 62(3), 307-332. Retrieved from <http://www.jstor.org/stable/1170741>
- Partnership for Assessment of Readiness for College and Careers (2013). *About PARCC*. Washington, D.C.: Achieve, Inc. Retrieved from <http://www.parcconline.org>

- Pratt, D.D. (1992). Conceptions of teaching. *Adult education quarterly*, 42(4), 203-220.
- Randall, J., & Engelhard, G. (2009). Differences between teachers' grading practices in elementary and middle schools. *The Journal of Educational Research*, 102(3), 175-185. Retrieved from <http://www.tandfonline.com/doi/abs/10.3200/JOER.102.3.175-186#.UjEAGxZRpUQ>
- Remesal, A. (2007). Educational reform and primary and secondary teachers' conceptions of assessment: the Spanish instance, building upon Black and Wiliam (2005). *The Curriculum Journal*, 18(1), 27-38. Retrieved from doi 10.1080/09585170701292133
- Remesal, A. (2010). Primary and secondary teachers' conceptions of assessment: A qualitative study. *Teaching and Teacher Education*, 27, 472-482. Retrieved from doi:10.1016/j.tate.2010.09.017
- Rust, C. (2002). Purposes and principles of assessment. Oxford Centre for Staff and Learning Development. Retrieved from http://www.brookes.ac.uk/services/ocslld/resources/briefing_papers/p_p_assessment.pdf
- Sikka, A., Nath, J.L., & Cohen, M.D. (2007). Practicing teachers' beliefs and uses of assessment. *International Journal of Case Method Research & Application*, 19(3), 239-253. Retrieved from http://www.wacra.org/PublicDomain/IJCRA%20xixi_iii_pg239-253_Sikka-Nath-Cohen.pdf
- Smarter Balanced Assessment Consortium (2012). *Smarter Balanced Assessment Consortium*. Retrieved from <http://www.smarterbalanced.org>

Stiggins, R.J., & Conklin, N.F. (1992). *In teachers' hands: Investigating the practices of classroom assessment*. Albany, NY: State University of New York.

Thompson, A.G. (1992). Teachers' beliefs and conceptions: A synthesis of the research. In D.A. Grouws (Ed.). *Handbook of research on mathematics teaching and learning* (pp. 127-146). New York, NY: Macmillan.

United States Department of Education. (2009). *Race to the Top Program Executive Summary*. Washington, D.C.: U.S. Department of Education.

Appendix A

Email Recruitment Letter

Dear Colleague:

As part of the requirements of the University of Kansas' Educational Psychology and Research master's program, I am conducting research for the purpose of analyzing secondary teachers' beliefs related to classroom assessments and state assessments. It is anticipated that teachers representing all nine of the North Kansas City middle and high schools will participate in this research study.

I extend an invitation to participate in this anonymous online survey, which should only take 15-20 minutes of your time. Your participation in this study is entirely voluntary and you may discontinue your involvement at any time. The promise of strict confidentiality is assured in both the collection and reporting of the data. Any findings associated with this study will be presented in such a way that no individual data will be identifiable. By completing this online survey, you are consenting to participate in this study and giving me permission to publish collected data in my thesis, in peer-reviewed journals, and at professional conferences. If you have any questions regarding your rights in participating in this study, please contact the Human Subjects Committee-Lawrence (HSCL).

To participate in the survey:

Step 1 – Follow the survey link included in the email.

Step 2 – Read the information statement and acknowledge your consent to participate in the study.

Step 3 – Complete the survey.

It is my hope that the results from this study will provide insight into the conceptions that teachers hold about classroom and state assessments. This information could lead to more effective training surrounding the use of assessments and ways in which classroom teachers use assessment data to drive instructional decisions. If you have any questions about this study, please contact me or my faculty advisor.

Jamie Neibling
jneiblin@ku.edu
816-213-4900

Dr. Meagan Patterson

mmpatter@ku.edu
785-864-9763HSCL
HSCL@ku.edu
785-864-7429

Thank you for your time and willingness to share your opinions and assessment beliefs.

Appendix B

Information Statement

The Department of Psychology and Research in Education at the University of Kansas supports the practice of protection for human subjects participating in research. The following information is provided for you to decide whether you wish to participate in the present study. You should be aware that even if you agree to participate, you are free to withdraw at any time without penalty.

We are conducting this study to analyze secondary teachers' beliefs related to classroom assessments and state assessments. This will entail your completion of an online survey. Your participation is expected to take approximately 20 minutes to complete. The content of the survey should cause no more discomfort than you would experience in your everyday life.

Although participation may not benefit you directly, we believe that the information obtained from this study will help us gain a better understanding of the conceptions that teachers hold about classroom and state assessments. This information could lead to more effective training surrounding the use of assessments and ways in which classroom teachers use assessment data to drive instructional decisions. Your participation is solicited, although strictly voluntary. Your name will not be associated in any way with the research findings. Any findings associated with this study will be presented in such a way that no individual data will be identifiable.

If you would like additional information concerning this study before or after it is completed, please feel free to contact us by phone or mail.

Completion of the survey indicates your willingness to take part in this study and that you are at least 18 years old. If you have any additional questions about your rights as a research participant, you may call (785) 864-7429 or write the Human Subjects Committee Lawrence Campus (HSCL), University of Kansas, 2385 Irving Hill Road, Lawrence, Kansas 66045-7563, email irb@ku.edu.

Sincerely,

Jamie Neibling
Principal Investigator
Department of Psychology and Research in
Education
Joseph R. Pearson Hall
University of Kansas
Lawrence, KS 66045
jneiblin@ku.edu

Meagan Patterson, Ph.D.
Faculty Advisor
Department of Psychology and Research in
Education
Joseph R. Pearson Hall
University of Kansas
Lawrence, KS 66045
785-864-9763
mmpatter@ku.edu

Appendix C

Demographic Information

This information will be used for analysis purposes only. None of this information will be individually identifiable in the findings of the final study.

A) What is your sex?

- Female
- Male

B) What is your age? _____

C) What is the highest degree you have earned?

- Bachelors
- Masters
- Specialist
- Doctorate

D) For how many years have you taught? _____

E) What grade level(s) do you teach? Mark all that apply.

- 6th
- 7th
- 8th
- 9th
- 10th
- 11th
- 12th

F) In which general content area do you teach? Mark all that apply.

- ELA
- Math
- Science
- Social Studies
- Other (Please list: _____)

G) Do the students in the class (classes) that you teach take an end of the year state assessment?

- YES
- NO

Appendix D

The Conceptions of Assessment III Abridged Survey

(Items modified to meet the needs of this study)

This survey asks about your beliefs and understandings about assessment at the classroom level and at the state level.

In this survey, **state assessments** are defined as those tests that are developed by the state and are administered annually in Communication Arts, Mathematics, and Science at the middle school level and Algebra I, Algebra II, Geometry, English I, English II, Biology, Government, and American History at the high school level.

In this survey, **classroom assessments** are defined as those quizzes, tests, writing assignments, and other assessments that teachers design themselves and administer on a regular basis in their own classrooms.

Please give your rating for each of the following statements based on your opinions about assessment. Indicate how much you actually agree or disagree with each statement. Use the following rating scale and choose the one response that comes closest to describing your opinion.

- Strongly Disagree
- Disagree
- Neither Agree nor Disagree
- Agree
- Strongly Agree

Note that the ratings are ordered from Disagree on the LEFT to Agree on the RIGHT.

(Appendix D continued...)

Conceptions of Assessment	Strongly	Disagree	Neither Agree	Agree	Strongly
	Disagree		nor Disagree		Agree
1. State assessments provide information on how well schools are doing	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. State assessments place students into categories	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. State assessments are a way to determine how much students have learned from teaching	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4. State assessments provide feedback to students about their performance	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5. State assessments are integrated with teaching practice	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6. State assessment results are trustworthy	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
7. State assessments allow teachers to teach in a way that aligns with their beliefs	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
8. Teachers conduct state assessments and make use of the results	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
9. State assessment results should be treated favorably because of their statistical reliability	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
10. State assessments are an accurate indicator of a school's quality	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
11. State assessments involve assigning a grade or level to student work	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
12. State assessments establish what students have learned	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
13. State assessments provide feedback to students about their learning needs	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
14. State assessment information modifies ongoing teaching of students	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
15. State assessment results are consistent	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
16. State assessment is fair to students	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
17. State assessment results are analyzed and acted upon	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
18. Teachers should take into account the reliability and validity in all state assessments	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
19. State assessments are a good way to evaluate a school	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
20. State assessments determine if students meet qualification standards	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
21. State assessments measure students' higher order thinking skills	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

(Appendix D continues...)

(Appendix D continued...)

Conceptions of Assessment	Strongly Disagree					Disagree					Neither Agree nor Disagree					Agree					Strongly Agree				
22. State assessments help students improve their learning	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
23. State assessments allow different students to get different instruction	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
24. State assessment results can be depended on	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
25. State assessments support classroom teaching	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
26. State assessments have a considerable impact on teaching	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
27. State assessments are a precise process	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
28. Classroom assessments provide information on how well schools are doing	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
29. Classroom assessments place students into categories	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
30. Classroom assessments are a way to determine how much students have learned from teaching	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
31. Classroom assessments provide feedback to students about their performance	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
32. Classroom assessments are integrated with teaching practice	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
33. Classroom assessment results are trustworthy	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
34. Classroom assessments allow teachers to teach in a way that aligns with their beliefs	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
35. Teachers conduct classroom assessments and make use of the results	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
36. Classroom assessment results should be treated favorably because of their statistical reliability	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
37. Classroom assessments are an accurate indicator of a school's quality	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
38. Classroom assessments involve assigning a grade or level to student work	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
39. Classroom assessments establish what students have learned	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
40. Classroom assessment provide feedback to students about their learning needs	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
41. Classroom assessment information modifies ongoing teaching of students	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

(Appendix D continues...)

(Appendix D continued...)

Conceptions of Assessment	Strongly	Disagree	Neither Agree	Agree	Strongly
	Disagree	Disagree	nor Disagree	Agree	Agree
42. Classroom assessment results are consistent	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
43. Classroom assessment is fair to students	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
44. Classroom assessment results are analyzed and acted upon	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
45. Teachers should take into account the reliability and validity in all classroom assessments	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
46. Classroom assessments are a good way to evaluate a school	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
47. Classroom assessments determine if students meet qualification standards	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
48. Classroom assessment measures students' higher order thinking skills	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
49. Classroom assessment helps students improve their learning	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
50. Classroom assessment allows different students to get different instruction	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
51. Classroom assessment results can be depended on	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
52. Classroom assessment supports classroom teaching	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
53. Classroom assessments have a considerable impact on teaching	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
54. Classroom assessments are a precise process	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Appendix E

Conceptions of Assessment-III Abridged (CoA-III A) Survey Statements and Factors

Note: Statements adapted for use this study are in italics

Statement	Factor	CoA-III A
Assessment provides information on how well schools are doing	School Accountability	1, 28
Assessment places students into categories	Student Accountability	2, 29
Assessment is a way to determine how much students have learned from teaching	Improvement	3, 30
Assessment provides feedback to students about their performance	Improvement	4, 31
Assessment is integrated with teaching practice	Improvement	5, 32
Assessment results are trustworthy	Improvement	6, 33
Assessment forces teachers to teach in a way against their beliefs	Relevance	7, 34
<i>Assessments allow teachers to teach in a way that aligns with their beliefs</i>		
Teachers conduct assessments but make little use of the results	Relevance	8, 35
<i>Teachers conduct assessments and make use of the results</i>		
Assessment results should be treated cautiously because of measurement error	Relevance	9, 36
<i>Assessment results should be treated favorably because of their statistical reliability</i>		
Assessment is an accurate indicator of a school's quality	School Accountability	10, 37
Assessment is assigning a grade or level to student work	Student Accountability	11, 38
Assessment establishes what students have learned	Improvement	12, 39
Assessment feedbacks to students their learning needs	Improvement	13, 40
Assessment information modifies ongoing teaching of students	Improvement	14, 41
Assessment results are consistent	Improvement	15, 42

(Appendix E continues...)

Statement	Factor	CoA-III A
Assessment is unfair to students	Relevance	16, 43
<i>Assessment is fair to students</i>		
Assessment results are filed & ignored	Relevance	17, 44
<i>Assessment results are analyzed and acted upon</i>		
Teachers should take into account the error and imprecision in all assessment	Relevance	18, 45
<i>Teachers should take into account the reliability and validity in all state assessments</i>		
Assessment is a good way to evaluate a school	School Accountability	19, 46
Assessment determines if students meet qualifications standards	Student Accountability	20, 47
Assessment measures students' higher order thinking skills	Improvement	21, 48
Assessment helps students improve their learning	Improvement	22, 49
Assessment allows different students to get different instruction	Improvement	23, 50
Assessment results can be depended on	Improvement	24, 51
Assessment interferes with teaching	Relevance	25, 52
<i>State assessments support classroom teaching</i>		
Assessment has little impact on teaching	Relevance	26, 53
<i>State assessments have a considerable impact on teaching</i>		
Assessment is an imprecise process	Relevance	27, 54
<i>State assessments are a precise process</i>		

Note: Adapted from Brown, G.T.L. (2006). Teachers' conceptions of assessment: Validation of an abridged version. *Psychological Reports*, 99, 166-170.

(Appendix E continued...)