TEACHERS' PERSPECTIVES ABOUT CLASSROOM DYNAMICS SHAPE BY
STANDARDIZED TESTING IN K-12 CLASSROOMS OF INDIANA:
A NARRATIVE STUDY

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ABSTRACT

DISSERTATION: Teachers’ Perspectives about Classroom Dynamics Shaped by High-Stakes Testing in K-12 Classrooms of Indiana: A Narrative Study

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While there have been many studies conducted on the use of standardized high-stakes tests (Popham, 1999; Ravich, 2010, 2013, 2014; Taubman, 2009; Zhao, 2009, 2012), little research has been conducted on the necessary pedagogical changes these tests have compelled classroom teachers to make. Consequently, this study explored seven K-12 public school teachers' perspectives about the classroom dynamics as they were shaped by standardized high-stakes testing in their K-12 schools in Indiana. This study found that teachers’ lesson preparation, classroom pedagogy, student activities, and student-teacher relationships have been altered at all grade levels since the introduction of mandatory, standardized high-stakes tests. Through a series of interviews with educators who started teaching before mandated testing, and who continue to teach in today’s testing environment, it was concluded that for these teachers standardized tests by themselves are not the issue, but rather the amount of testing and the manner in which the test scores are used to assess schools and the teachers within their systems.
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CHAPTER I: INTRODUCTION

All schools for miles and miles around
Must take a special test
To see who’s learning such and such - -
To see which school’s the best.
If our small school does not do well,
Then it will be torn down,
And you will have to go to school
In dreary Flobbertown (Seuss, Prelutsky, & Smith, 1998, p. 21).

Dr. Seuss drafted these lines for a book eventually titled Hooray for Diffendoofer Day! more than two decades before mandatory standardized high-stakes tests were introduced to school systems across the United States. For Seuss, this storyline became a source of prolonged frustration that prevented him from completing the book before he died. It was only through the determination and dedication of his editor and two of his peers that the story finally came to press in 1998 (Seuss, Prelutsky, & Smith, 1998).

Ironically, the frustrations Seuss experienced with the writing of this story foreshadowed the difficulties many of today’s teachers have experienced since the introduction of standardized high-stakes testing (Indiana Department of Education, 2015c).

Since the inception of education systems in the United States, teachers and students have been held accountable for their educational progress through various assessment practices. As early as the 1800s, when education was based in the home, parents tested their children through the use of common sense and hands-on applications (Ravitch, 1995; Urban & Wagoner, 2009). If the child completed the given task(s) with
adequate success, he or she passed and progressed to the next task. These simple tests provided parents with the knowledge of how prepared their children were to survive in the world and contribute to the family’s needs.

As time progressed, education was taken out of the home and placed in the hands of teachers who tested the students through public examination. This not only provided proof of student learning, but also teacher competence – a necessity if the instructor hoped to keep his or her position. It also provided the community with the knowledge of how each individual, regardless of age, could contribute to society (Urban & Wagoner, 2009).

This concept of assessment has not changed much over the decades of educational reform, and with the signing and implementation of the No Child Left Behind Act in 2002, the importance placed on the results of these tests intensified to the point where tests now not only determine student progress and teacher competence, but also individual school and school district success or failure. For each of these there are both rewards and consequences, most tied to financial compensation – or denial of - from state and federal agencies (U.S. Department of Education, 2016d).

Today, standardized tests provide data that indicate the crisis American schools are putatively facing according to education reformers, especially as we compete with students from around the world (Berliner & Biddle, 1996; Zhao, 2009). As a result, the National Governors’ Association and the Council of Chief State School Officers established common core competency standards for each grade level and content area of K-12 schools, which are tested by standardized high-stakes tests produced by large testing conglomerates approved by the respective government agencies. State adoption of
these standards was ‘voluntary’ but strongly encouraged with financial enticements from the federal government. Because so much is at stake based on the test results, a number of education scholars maintain accountability has become the ‘taskmaster’ for what teachers teach and possibly how they conduct their day-to-day classroom agendas. And with the driving force of technology, testing for accountability has acquired the potential to become ubiquitous and all-consuming (Berliner & Biddle, 1996; Herman & Golan, 1993; Madaus & Russell, 2010; Ravitch, 2010, 2013, 2014; Taubman, 2009; Zhao, 2009).

Indiana, as well as most of the 50 states, took this accountability seriously and devised a plan, based on federal guidelines, for school districts, schools, and teachers who did not meet the standards expected by the state. The plan was implemented over a five-year period and was based on scores from the Statewide Testing for Educational Progress-Plus (ISTEP+) at the K-8 levels and the End of Course Assessment (ECA) in the 10th grade year. During the first two years of the accountability plan, schools were expected to align their curriculum and instruction with state and federal requirements and provide necessary services (e.g. remediation classes, additional resources or teacher assistants, summer school) for low social economics status (SES) students, special education students, and other subgroups (ELL, minorities, etc.) that exhibited difficulties in learning. This alignment presumed to better prepare these subgroups with the knowledge needed to raise their tests scores. These groups were monitored to make sure they achieved pre-determined annual goals, known as Adequate Yearly Progress (AYP). Schools whose subgroups did not meet AYP began the process of corrective actions in years three through five and beyond (Indiana Department of Education, 2011b). Pressure from these corrective actions was felt at all levels, trickling from the top down as district
education boards, administrators, and teachers attempted to improve their schools’ test scores to meet AYP and prevent takeover by the state.

School year 2011-12 saw a change in this system when the state was faced with enforcing the sanctions on a hundred of more failing schools (Stokes, 2001). And although Indiana was successful in restructuring its failing schools, the resources for state takeover were not feasible. As a result, school accountability was changed to a grading system that included standardized test scores without subgroups, but added other factors such as types of courses offered, special teacher certification, attendance rates and graduation rates (high school only). This system also allowed parents open school choice: families did not have to live in a failing school district to move their children to another school. This system also failed, since the ISTEP+, a major factor in state-assigned school grades, posed problems of equity between pencil-paper versions and computerized versions since the testing windows are earlier for pencil-paper than those of computerized tests. These testing windows penalized schools without technology by cutting short the teaching time before the test, because pencil-paper test scores take longer to grade and therefore need to be submitted earlier (Indiana Department of Education, 2016).

Recently, another layer of accountability was added: merit pay for teachers, using standardized high-stakes test scores as a major factor in evaluation (Youngs, 2013), adding substantial personal pressure to an already pressurized environment. In addition, the traditional pay scale with increments for years of experience, level of degree, as well as accumulation of professional growth points was eliminated.

According to Herman and Golan (1993) and Thomas (2005), as more and more mandated standards and standardized high-stakes tests are imposed on classroom teachers
in order to ‘guarantee’ improvement in student learning, the dynamics of the classroom have changed dramatically in K-12 public schools. According to their findings, these changes are the result of the pressure placed on teachers to produce continually improving data or potentially risk losing their jobs and closing their schools.

**Purpose of the Study**

Since 1996, Indiana’s assessment and accountability system has been in place for all public K-12 schools through the implementation of a number of standardized tests. These have changed over the years to comply with state and federal expectations and mandates, especially *No Child Left Behind*, which was passed in 2002. At the heart of the Indiana assessment is the *Indiana Statewide Testing for Educational Progress-Plus* (ISTEP+) exam given in grades 3 through 8.

The purpose of the *Indiana Statewide Testing for Educational Progress-Plus* (ISTEP+) program is to measure student achievement in the subject areas of English/language arts, mathematics, science, and social studies. In particular, ISTEP+ reports student achievement levels according to the Indiana Academic Standards that were adopted by the Indiana State Board of Education (Indiana Department of Education, 2011c).

In addition to these elementary exams, the *End of Course Assessment* (ECA) is given in Algebra 1 and English/language arts at the completion of grade 10. These exams determine if a student will graduate with a high school diploma. These tests also measure to what extent students have mastered Indiana’s Academic Standards (Indiana Department of Education, 2011a).
With the implementation of these exams, came the expectation that academic achievement would improve by creating higher expectations for the students through a substantial set of common basic skills that are expected to be taught to all students in a comparatively short time. Add to these expectations the pressure of teacher evaluation and job security based on test results, and there is cause for concern that the importance of testing overshadows and possibly even diminishes the process of education. Taylor, Shepard, Kinner, and Rosenthal (2003) maintained that “... emphasis on assessments (even good ones) might narrow the curriculum and encourage teachers to teach to the test” (p. 2).

Whatever is believed about standardized high-stakes testing, it is obvious that teachers and their classroom practices are expected to be an important variable in determining to a large degree the success of educational reform on student learning. In order to achieve a better understanding of these major reforms, it is important to examine the practices of classroom teachers today and gather their perspectives on any changes that have occurred over the years.

The purpose of this study was to explore teachers' perspectives about the classroom dynamics shaped by standardized high-stakes testing in the K-12 educational system in Indiana. By conducting this study, I sought to understand the meaning teachers made of their teaching experiences and any changes in the classroom dynamics since the advent of standardized high-stakes testing. Further, the research specific focus was on the teachers' preparation time, teaching strategies, and teacher-student interactions, which, in turn, defined the classroom dynamics.
Through interviews with seven K-12 teachers from four school districts, I gained insight into teachers’ perspectives on classroom dynamics as they relate to mandatory standardized high-stakes tests. This study was guided by the following research questions:

1. What are the teachers’ experiences with the current classroom dynamics?
2. What are the teachers’ perspectives about the role and influence that mandatory, standardized high-stakes testing may have on their classroom dynamics?

Using the following sub-questions for research, answers to the larger concern were explored:

1. Have teachers’ pedagogical approaches changed over the last twenty years? If so, how and why?
2. If the student classroom activities have changed in focus, in what ways?
3. Have teacher-student relationships changed? If so, in what ways?

Significance of the Study

Much speculation has been made on the influence of standardized high-stakes tests on classroom dynamics (e.g. Horn & Wilburn, 2013; Ravitch, 2010; Taubman, 2009) but little empirical research has been conducted. Scholars such as Herman and Golan (1993) and Au (2009) investigated how standardized high-stakes tests have influenced the direction of curriculum and teachers’ reactions to these curricula changes; but little connection has been made between these curricular changes and how the teaching/learning process is affected. This study provides a better understanding of teachers’ experiences about teaching and learning that focuses on mandatory testing as it relates to traditional education before mandatory test preparation and adds to the
knowledge base of how classroom dynamics have been affected for both teachers and students. In addition, the findings of this study may guide teachers to reflect on their teaching practices in a way that will improve their teaching strategies and therefore their students’ learning in the future.

Theoretical Perspective and Method

Consistent with the epistemological assumptions of social constructionism, this study employs hermeneutics as the theoretical perspective and narrative approach as the method. This theoretical perspective is the art of text interpretation developed from Biblical studies and transferred to the study of human practices, human events, and human situations. It includes both verbal and nonverbal communication as well as semiotics, presuppositions, and pre-understandings (Crotty, 2012). Recognizing the influence of context and of cultural influences, the hermeneutic perspective acknowledges limitations of the scientific method for the interpretation of language. Rather than approaching a text to master it and uncover meaning as an object, the inquirer seeks to engage in dialogue with the text, willing to be changed by it in the process of seeking understanding. Squire (2013) noted that the hermeneutic perspective is the predominate one in current social science narrative research.

Because education falls within the realm of social science and also deals with human perspectives, hermeneutic theory guided me toward a narrative approach in which stories gathered from participants and my own storied experiences connected with each other. The very definition of this type of inquiry provides justification for its selection. Creswell (2014), citing Riessman (2008), defined narrative research or narrative inquiry or narrative approach (the terminology varies by scholar) as “a design of inquiry from the
humanities in which the researcher studies the lives of individuals and asks one or more individuals to provide stories about their lives.” (p. 13). Clandinin and Connelly (2000) add to this definition that this information [stories] is then often retold or re-storied by the researcher into a narrative chronology. Often, in the end, the narrative combines views from the participant’s life with those of the researcher’s life in a “collaborative narrative” (Creswell, 2014, p. 14).

Connelly and Clandinin (1990) provided further support for the selection of narrative method for this study. They began by citing the theory “that humans are storytelling organisms who, individually and socially, lead storied lives. Thus, the study of narrative is the study of the ways humans experience the world” (p. 2). They continue by noting education is both the construction and reconstruction of personal and social stories; teachers and students are storytellers and characters in their own and others’ stories. Thus, using narrative inquiry in educational research seems a natural connection. However, narrative inquiry can be seen as both phenomenon and method. In order to maintain a distinction between the two, Connelly and Clandinin called the phenomenon “story” and the inquiry “narrative.” In other words, it can be said that people by nature lead storied lives and tell stories about their experiences (phenomenon), whereas narrative researchers describe such lives, collect and tell stories about them, and write narratives of experience (inquiry). These two distinct facets of narrative inquiry merge during the research and become a collaboration involving mutual storytelling and re-storying as the research proceeds. Therefore, the researcher becomes a participant in his own research process.
Researcher Positionality

In this narrative inquiry, my role was gatherer of participant stories related to the phenomenon. And yet, I have my own story, too. As a teacher of 42 years at the secondary level, I experienced, and continue to experience, changes in classroom dynamics that occurred because of standardized high-stakes testing. I have worked with my peers and contributed to the restructuring of the language arts curriculum, especially for 10th graders who must pass the End of Course Assessment (ECA) to qualify for graduation. I have felt the pressure to ‘teach to the test’ in order to raise the scores to meet AYP, and I have experienced ethical inner conflict as I tried to preserve and find time to teach academic content not included on the test but regarded as relevant for students’ future success.

This close relationship to the phenomenon of this study would be considered a disadvantage in many types of research studies. However, Connelly and Clandinin (1990) suggested another way of understanding this “negotiation of entry” into the field situation as an ethical matter is to see it as a “shared narrative unity” (p. 3) They pointed out that teacher participants have often been made to feel “less than equal” to their research counterparts and have long been “silenced through being used as objects of study” (p. 4). Feeling less than empowered to tell their stories becomes a dilemma. Therefore, narrative researchers need to be able to establish feelings of equality, caring, and connectedness in order that “their shared stories become a connection that bridges the gap” between them (Clandinin & Connelly, 2000, p. 88). For this reason, and with the overall narrative goal of a “collaborative inquiry” (Creswell, 2014, p. 14), my positionality is an advantage in this study.
Assumptions

Like all types of inquiry, narrative inquiry presents certain assumptions that undergird the research. According to Connelly and Clandinin (1990), narrative inquiry, like other qualitative methods of inquiry, relies on assumptive criteria other than that of quantitative research. But since the language of these assumptions is still in the development stage, for now the positivist assumptions have been adopted with modifications. Bruner (1986), Clandinin (2007), and Smith (1983), advocated that narrative inquiry currently embraces four important assumptions:

- **Reliability** – This is usually based on the use of numbers as data giving the concept being studied a more object-like existence with no fundamental meaning. This works well with the scientific method of research, but not with qualitative methods that study the metaphoric quality of language as it relates to the story being told, rather than the measurement by number of feeling, thinking, and accuracy. Thus, narrative inquiry embraces the connectedness and coherence of an extended discourse filled with exposition, argumentation, and description.

- **Objectivity** – Intertwined with reliability, objectivity assumes there is no relationship between the researcher and the ‘thing’ being researched. But this type of assumption denies the feeling of human connectedness and growth. The fundamental difference between scientific objectivity and narrative objectivity is the relational process that involves caring for, curiosity, interest, passion, and change.

- **Generalizability** – This has traditionally meant the ability to expand the findings beyond the sampling and find universal laws that can be used to predict works
well with the scientific method. But where humans and behavior are concerned
the narrative inquirer understands the complexity of individuals and their cultures
and uses this knowledge as a basis to explore relationships and interactions with
other humans, rather than lump them into large categories.

- **Validity** – The positivists search for the ‘true belief’ that can be numerically
  expressed through a study. These data are usually obtained through the
  manipulation of some part of the study in order to make predictions. What
distinguishes this from the narrative stance is the desire to understand the human
world, rather than control or manipulate it. (Clandinin, 2007).

Using these narrative assumptions allowed for a broader and more humanistic
approach to interpretation of the collected stories and a way to represent the social
context in which they were told.

**Definition of Relevant Terms**

- **Accountability** - Accountability in teaching and learning means assuring that
each student develops as near as possible to his full potential the knowledge,
skills, and interpersonal behaviors that the community and the school accept as

- **AYP – Adequate Yearly Progress** is a measurement defined by the United
  States federal *No Child Left Behind Act* that allows the U.S. Department of
  Education for the purpose of determining how every public school and school
district in the country is performing academically according to results on
standardized tests, and at the secondary level also takes into consideration
graduation rates, attendance percentages, and dropout rates., which were
converted to percentages based on school size (Indiana Department of Education, 2013). As of 2016 AYP has now been renamed Annual Performance Report (APR) and the factors considered now combine AYP and school’s state-assigned grade, but are still used in the same way (Indiana Department of Education, 2016).

- **Classroom Dynamics** - Classroom dynamics, as it is referenced in this study, involves the interaction between students and teachers in a classroom community. Good classroom dynamics set up a positive classroom atmosphere where students feel comfortable, safe, and excited about learning and communicating with other students and with the teacher. These dynamics also engage everybody in the classroom in academic content as well as social interaction. This study will explore teachers’ perspectives about these classroom dynamics as shaped by standardized high-stakes testing, focusing specifically on the teachers’ experiences in relation to teachers' preparation time, teaching strategies, and teacher-student interactions.

- **ECA – End of Course Assessment** is the standardized high-stakes test given to high school students in Indiana at the end of grade 10. Algebra 1 and English/language arts are the focus. This exam is norm-based and must be passed in order to qualify for a high school diploma (Indiana Department of Education, 2011a).

- **Standardized high-stakes tests** - According to Madaus (1988) a test is high-stakes when its results are used to make important decisions that affect students, teachers, administrators, communities, schools and districts. Orfield and Wald
(2000) added to this definition that a standardized high-stakes test “links a score on one set of standardized tests to grade promotion, high school graduation and, in some cases, teacher and principal salaries and tenure decisions” (p. 38).

- **Horizontal Alignment** - Horizontal alignment, also known as curriculum mapping, occurs as teachers work in grade-level groups to map the content of the taught curriculum and identify the standards they are addressing in each instructional segment or unit. Furthermore, the teachers describe learning activities that illustrate how they teach and explain how they assess students’ mastery of standards. This accentuates each teacher's creativity and innovation and promotes the sharing of excellent instructional strategies and effective resources (Burns, 2001).

- **ISTEP+** - *Indiana Statewide Testing for Educational Progress-Plus* is the standardized high-stakes exam given to students in Indiana schools in grades 3 through 8. Mathematics and English/language arts are the focus, but in designated grades science and social studies are also tested. Unlike the ECA exam, students are not denied promotions if they fail, but success and failure rates on this test are part of the school accountability formula and grading system (Indiana Department of Education, 2013).

- **Standardized Test** – A standardized test is an assessment where as many things as possible about the test are kept ‘standard’ – the same for everyone. Same questions, the same time limit, same instructions, same scoring, etc. They are generally norm-referenced, meaning each student’s scores are compared to the scores of other test takers (U.S. Department of Education, 2016d).
Summary

Chapter One has provided background information on the beginnings of standardized high-stakes tests and their purposes. Through this brief historical account it is evident the purpose of standardized high-stakes tests has not changed much over time, but the importance now placed on these exams has created a tension in the educational community for teachers, administrators, schools, and school districts. As a result of *No Child Left Behind*, these exams became high-stakes evaluation tools no longer used solely to measure the progress of student learning, but also to rate the competence of teachers and the worth of schools and school districts. Although several modifications have been made to these evaluation systems, standardized high-stakes tests remained an essential part of these criteria.

I proposed to explore teachers’ perspectives about classroom dynamics as shaped by standardized high-stakes testing. This study focused specifically on the classroom dynamics in relation to teachers' preparation time, teaching strategies, and teacher-student interactions as they related to the introduction of standardized high-stakes tests. Working with the assumptions present in narrative inquiry, I sought to understand the meaning teachers made of their classroom experiences by collecting their stories and linking them to my own experiences.

Chapter One also provided definitions for many of the common terms used throughout the dissertation so confusion can be avoided. Further, it explained my position as a narrative researcher-participant with many years of classroom experience at the secondary level and how my own story was linked with those of my participants.
CHAPTER II: REVIEW OF LITERATURE

As stated in Chapter One, the purpose of this study was to explore K-12 public school teachers' perspectives about the classroom dynamics as they are shaped by standardized high-stakes testing in the K-12 educational system in Indiana. Through this research I sought to understand the meaning teachers made of their instructional experiences in the classroom since standardized high-stakes testing was introduced in schools in 1996. I specifically focused on the teachers' experiences in relation to preparation time, teaching strategies, and teacher-student interactions, which, in the context of this research, defined the classroom dynamics.

The purpose of this chapter is to provide the historical and current context for this study as provided by the scholarly literature. In this chapter I briefly discuss the early history of testing, it's development and evolution, and some of the reasons as to why it has been, and continues to be, considered a necessary function of education. I also examine some of the current policies and the implications and expectations these policies hold for students, teachers, and school systems throughout the United States.

In order to understand all these facets of educational testing, it is first necessary to establish a common definition of standardized testing and its purpose. For many, this term indicates any exam that is administered by using a ‘fill-in-the-bubble’ computerized scan sheet. And although many standardized tests do follow this format, there is much more attached to the definition. According to W. James Popham (2005), former president of the American Educational Research Association, a standardized test is “any test that’s administered, scored, and interpreted in a standard, predetermined manner” (p. 2). The ‘predetermined manner’ spoken of refers to cut off scores or preconceived norms
established as passing criteria before the test is administered. The purpose: the United States Department of Education states, “... testing is a normal and expected way of assessing what students have learned” (U.S. Department of Education, 2016a). In other words, students are held accountable for their educational progress. However, this also implies teachers are held responsible for this progress through instructional methods. Based on this definition and the purpose of testing explained by the U.S. Department of Education, let us begin the examination of the evolution of the testing phenomenon.

**Early Education**

Since the inception of education systems in the United States, teachers and students have been held accountable for their educational progress through various assessment practices. As early as the 1800s, when education was based in the home, parents would test their children through the use of common sense and hands-on applications (Ravitch, 1995; Urban & Wagoner, 2009). If the child could complete the given task(s) with adequate success, he or she passed the ‘exam’ and could progress to the next task. These simple tests provided parents with the knowledge of how prepared their children were to survive in the world and contribute to the family’s needs.

As time progressed, education was taken out of the home and placed in the hands of a competent\(^1\) instructor who tested the students through public examination. This not only provided accountability for student learning, but also teacher competence—a necessity if the instructor hoped to keep his or her position. It also provided the community with the knowledge of how each individual, regardless of age, could contribute to society (Urban & Waggoner, 2009).

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\(^1\) According to Urban and Waggoner (2009) a competent instructor was any person who had completed a high school education. In a very few cases higher education at a college may have been pursued.
Industrial Age

When the United States entered the Industrial Age and the Industrial Revolution, the focus on testing began to change dramatically. According to Adams (2006), in 1779 Thomas Jefferson proposed a two-track system known as “the laboring and the learned.” (p. 62). This tracking system determined who was best suited to continue to higher education and who was to be trained for the work force. Although there was no exam to be taken to determine to which of these two tracks a student would be assigned, assessment for accountability was conducted through teacher observation of students in the classroom and oral examination (Bowles, Samuel, & Gintis, 1976; Sass, 2005). This was the beginning of the two-tier educational plan that has endured in many of today’s schools.

Recognizing the discontent of the public and universities with the use of oral exams for college admission, Horace Mann, in the 1800s, introduced his vision of education reform by proposing education become the vehicle for social advancement, enabling all citizens to live educated lives – manager and worker alike. In order to initiate this concept, Mann persuaded the Boston schools to allow him to introduce a standardized test in place of oral exams to gain “objective information about the quality of teaching and learning in urban schools, monitor quality of instruction, and compare schools and teachers within each school” (Gallagher, 2003, p. 85). These tests indicated differences in students’ knowledge; so additional testing was used in order to obtain further data that would assist in making better judgments about student advancement. Considered both objective and comprehensive, Mann’s success with these exams [achievement tests] proved so effective, many schools across the country adopted them to
assess the learning of their own students (Scott, 2004). However, the use of these exams still did not address the issue of a common curriculum among high schools, making it difficult for colleges and universities to compare the abilities and college/university readiness of students coming from various regions of the country (Urban & Wagoner, 2009).

**Committee of Ten**

Faced with an untidy educational world of discrepancies in high school curriculum of public schools as well as private academies, in 1893 the National Education Association (NEA) convened a committee to deal with these inequities brought about by the increasing numbers of students electing to attend high school. This committee known as the Committee of Ten proposed a four-track plan based on the interests of the students rather than their academic ability (Pinar, Reynolds, Slattery, & Taubman, 2008). It was the Committee’s theory that all students should be educated similarly, regardless of their future plans of college or workforce. Any one of these study plans would prepare students for their respective futures. However, nothing in this plan called for exams or assessments to determine whether students had achieved the goals of their chosen courses, giving colleges and universities no information as to the readiness of incoming students. As a result, the report from the Committee of Ten became extremely controversial and was eventually abandoned for a system of accountability that demanded common assessments of student academic progress and capability (Urban & Waggoner, 2009).
College Entrance and the Army

Building on this concept of testing students for academic ability, it was not long before colleges and universities began to administer admissions tests to those applying for entrance. This movement by the universities began the proliferation of testing by multiple organizations including public school systems in order to assess the progress and/or intelligence of their clientele (Sass, 2005). One of the most frequently used tests was the IQ exam invented by Alfred Binet in 1905, later translated and adapted for the United States by Lewis Terman of Stanford University (Salkind, 2006).

World War I made a significant impact on the use of standardized tests (Finneran, 2002). The United States’ army needed a quick method of identifying potential officers. Robert Yerkes, a Harvard professor at the time who was intrigued by the IQ test of Binet, convinced the army to let him test two million recruits for this purpose. Using the Alpha and Beta Army Tests, this was the first time mass testing was conducted and results collected (Giordano, 2005). The military claimed to have such great success, the test was soon introduced to the public schools to determine which students were or were not college/university material (Urban & Wagoner, 2009).

Two other prominent figures worked with Yerkes implementing these intelligence tests to army recruits: Edward Lee Thorndike and Carl B. Brigham. Thorndike advocated the use of intelligence tests at higher levels of education; he believed that it was a waste of resources to provide higher education to everyone. He felt America would be best served by identifying those who were gifted and cultivate their intelligence for the progress of the nation, a sentiment that would be supported in the 1900s by G. Stanley Hall in his concept of adolescence and research of gifted and talented children (Pinar,
Reynolds, Slattery, & Taubman, 2008). Thorndike created a revised version of the Alpha test after WWI, which Columbia University mandated in 1919 for admission and which was available to other selective institutions of higher learning (Saretzky, 1982). However, it was Carl C. Brigham, whose research in intelligence earned him a position on the College Board, where he fathered the SAT. This exam presented a new concept in assessment and accountability for the College Boards. Whereas the older tests were written, curriculum-based examinations designed to assess learning in high school college preparatory classes, the SAT was a multiple-choice instrument that could quickly score students’ general ability or aptitude for learning. This test was standardized in a way high school grades were not, making it somewhat more reliable and less expensive to administer to large numbers of students (Atkinson & Geiser, 2009). The SAT was first administered to high school students in 1926. By 1934, with the support of James Conant, then President of Harvard, the SAT became the benchmark of accountability used to select students for scholarships to Harvard. A year later the SAT became a requirement for all candidates at Harvard (Edwards, 2006).

**Aiken Commission and the Eight-Year Study**

At the same time Brigham was introducing the SAT to universities, another group of educational reformers were creating the Aiken Commission. This Commission would become known for the Eight-Year Study. The purpose of this Commission was two-fold: to find a way 1) to encourage reconstruction [of curriculum] in the secondary school and 2) to serve high school youth more effectively. These purposes emerged from the need to create a better relationship between high schools and colleges/universities and more accountability in identifying good candidates for higher education. The issue of
overlooking capable students, especially those from less privileged and rural backgrounds, became the focus. From this perspective, standardized testing seemed a good possibility since the assumption was made it could test students equally without regard to family background.

Early in the formation of the Aikin Commission, Ralph Tyler was asked to join this group of educational reformers. According to Kridel and Bullough (2007), Tyler was a practical thinker who perceived the Aikin Commission as just another research project and another set of particular problems to address. Tyler was neither interested in reconstructing secondary education nor determining how high schools could serve youth more effectively. His role with this Commission was to visit the 29 sites scattered across the United States and give advice to resolve educational problems. Tyler saw these resolutions as situational: what worked at one site did not necessarily work at another. He disliked predefined programs and predetermined solutions; he much preferred simplicity and common sense. According to Tyler “the role of testing [is] not . . . a way to sort and select students but instead . . . a way to examine educational means and ends, a view of measurement that would ultimately evolve into program evaluation, appraisal, and assessment” (Kridel & Bullough, 2007, p. 91). It seems as though Tyler had insight into the future of educational testing, which the Aikin Commission chose to ignore. (Kridel & Bullough, 2007).

When the Aiken Commission became the Eight-Year Study, the powers of the Carnegie Foundation and the General Education Board loomed over the committee meetings and influenced much of the conceptual leanings of its members. These two gigantic fiscal benefactors each manipulated the committee members associated with
them through other funded affiliates. Between the Carnegie Foundation and the General Education Board four testing services were funded. Each of these four testing services contended its tests were the answer to the college admissions dilemma. It would be years later before the maneuverings of these services would be resolved through the formation of the Educational Testing Service (ETS). Meanwhile, the original purpose of the Aiken Commission was ignored and the focus became big business in the guise of accountability. Despite attempts by the Aiken Commission’s members to regain the original focus, the topic of testing and its purpose continued to obstruct their progress (Kridel & Bullough, 2007). Finally, member Herbert Smith declared the annual use of tests “makes them more likely to warp instruction” (as cited in Kridel & Bullough, 2007, p. 55), a concern that has surfaced in today’s education. The Commission’s voices were finally heard and standardized testing, at least for a while, was quelled.

**Standardized Testing Expands**

This sabbatical was short lived. By 1935 a “standards” movement in the United States began to emerge as a solution to the public’s demand for scholastic accountability. This demand urged schools to set and enforce common teaching standards for each grade level, and standardized tests could seemingly assess the success of learning these standards quickly and easily (Giordano, 2005).

With the development and demand of more and more standardized testing by colleges, universities, and even public high schools, the need for a governing organization to oversee these exams became a perceived necessity. Answering this need a not-for-profit organization called the Educational Testing Service (ETS) was created in 1948. In January 1948 the new testing agency opened for business in Princeton, with a
branch office in Berkley, California. The hope was to convince the University of California to adopt the SAT as a requirement for admission. As stated in the SAT history found on the ETS website, this testing initiative eventually came to fruition in 1960. Today the ETS remains one of the world's largest private nonprofit educational testing and assessment organizations, and is still located just outside Princeton. It continues to provide tests to over 3 million students each year, constantly revising the questions and format to meet the ever-changing perceived needs of the college and university admission boards (Clarke, Madaus, Horn, and Ramos, 2001; Giordano, 2007; Nairn, 1980).

The launching of Sputnik by the Soviet Union in 1957 served as the catalyst for yet another extensive testing program. According to several politicians, including President Dwight D. Eisenhower, Vice-President Nixon and Senator John F. Kennedy (D), Sputnik demonstrated the terrible deficiency in reading, writing, and mathematical skills in the United States compared to those of the Soviet Union. Authors like Arthur Trace underscored this problem with his book What Ivan Knows That Johnny Doesn’t (1961) outlining the deficiencies of the American education system (Urban & Wagoner, 2009). As a result of so much criticism, Congress passed the National Defense Education Act (NDEA) in 1958, which provided college loans to students majoring in mathematics, science, and foreign language to become instructors in the K-12 public schools. The hope was this program would produce teachers who would instruct students who could surpass our international competitors in academia (U.S. Department of Education, 2016c). Curricula in science and mathematics were reorganized, followed closely by changes in history and social sciences. Furthermore, the financial support for this program made it possible for states to utilize large scale
standardized testing programs to measure and ensure the successes for these new courses. (Heubert & Hauser, 1999).

With the demand for more and more testing, it was no coincidence that a second major testing agency formed in 1959—American College Testing or ACT. Originally launched by University of Iowa professor E.F. Lindquist, the ACT focused on practical knowledge rather than cognitive reasoning. It was considered a groundbreaking assessment that both helped students make better decisions for themselves and enabled institutions to improve student success. Unlike the SAT, the ACT does not just focus on college readiness, although that is part of what it tests. However, it also claims to encourage lifelong learning both in school and the workplace. It offers testing to assess learning and training in programs other than college that can be used in careers throughout life. Given these additional types of assessments, the ACT has become a rival to the SAT and is used in place of the SAT by institutions and organizations of all types (Atkinson & Geiser, 2009). ETS and the College Board acknowledge on their website the disparities between the ACT and SAT and are currently in the process of restructuring the SAT to conform more closely to the standards-based ACT format (Atkinson & Geiser, 2008; College Board, 2015).

Passing the National Defense Education Act opened the door for a plethora of further legislations focusing on the improvement of education in the United States. In 1965 the Elementary and Secondary Education Act made federal aid available to disadvantaged children through a Title 1 program (U.S. Department of Education, 2016b). “The purpose of this title is to ensure that all children have a fair, equal, and significant opportunity to obtain a high-quality education and reach, at a minimum,
proficiency on challenging State academic achievement standards and state academic assessments” (U.S. Department of Education, 2016e). This purpose was accomplished by placing the onus on school districts, individual schools, and classroom teachers to provide appropriate and necessary resources, instruction, and other school wide programs to improve the education to students from poverty, children with limited English proficiency, children with disabilities, and migratory and Native American Indian children. The goal was to close the achievement gap between high- and low-performing students and especially the gap between minority students and non-minority students (Cuban, 1993). Again, the measure of success was numerical data from a standardized test created by some agency outside the educational realm.

The following year, 1966, saw the authorization of the National Assessment of Educational Progress (NAEP) Act. Also known as “The Nation’s Report Card,” this piece of legislation “is the only nationally representative and continuing assessment of what American students know and can perform in various academic subjects. Since 1969, assessments have been conducted periodically in reading, mathematics, science, writing, history, civics, geography, and the arts” (U.S. Department of Education, 2016b). Though not the original intent of, nor ever a consideration of purpose by the NAEP, (Ferrara and Thornton, 1988) the data from these exams would eventually be used to compare educational progress between states and/or school districts. Long-term trends could also be assessed so that changes could be made that will continuously improve American education (U.S. Department of Education, 2016b). This document would become the foundation of the No Child Left Behind Act of 2002.
From 1966 to 1983 standardized testing became a norm in almost every school in the United States. Many states adopted some sort of minimum competency exam at the high school level, while others continued to test at various levels throughout the K-12 schools. In 1976 a Gallop poll indicated that the majority of Americans polled, approximately 2 to 1 believed standardized tests were correctly assessing student performance. This included citizens from all segments of the population in all areas of the nation (Giordano, 2005).

A Nation at Risk

In 1983, under the Presidency of Ronald Regan, the report *A Nation at Risk* was released advocating more major school reforms based on continually decreasing test scores on international tests by United States students (Giordano, 2005). In summary this report declared, "the educational foundations of our society are presently being eroded by a rising tide of mediocrity that threatens our very future as a Nation and a people" (U.S. Department of Education, 1983). Further, coming on the heels of national economic woes during the Carter administration, the report concluded these poor test scores jeopardized the national economy and ultimately military security (Giordano, 2005). Addressing once again the need for change in high school curriculum to ‘fix the problem,’ this report was organized around four major curricular aspects: content, expectations, time, and schooling. The recommendations for each of these are as follows:

- **Content**: Students seeking a high school diploma must have a foundation of the “five new basics.” These included four years of English, three in mathematics, three in science, three in social studies, and one-half credit in computer science.
Two credits in foreign language were also recommended to college-bound students.

- **Expectations**: The commission recommended all schools K-16 adopt more rigorous and measurable standards and create higher expectations for student performance and conduct.

- **Time**: Schools were to devote more time to teaching the new basics, which might take the form of a longer school day, a longer school year, or a more efficient use of the existing school day.

- **Schooling**: This recommendation was aimed at improving teacher quality. The suggested changes included higher standards for teacher-preparation programs, teacher salaries that were professionally competitive and based on performance, 11-month contracts for teachers allowing more time for curriculum and professional development, and a list of incentives designed to keep teachers in the profession longer and motivate them to constantly improve (U.S. Department of Education, 1983).

Although none of these specifically mention testing, every aspect of these recommendations points toward some type of assessment and/or accountability to ensure progress is being made. Implementing standardized tests that could provide data quickly and easily and could be used for comparative purposes seemed to be the best way to accomplish this.

*A Nation at Risk* drew much attention and intense criticism from many, stating the crisis outlined in the report was manufactured for the purpose of politicians gaining public support for educational reforms. Furthermore, Berliner and Biddle, authors of *The
Manufactured Crisis (1995), asserted that it was just one more example of how politicians used a poorly written report to misdirect reform efforts. Nonetheless, the report had a strong impact on American education. It led to comprehensive school reform efforts, became the catalyst of the academic-standards movement, drew attention to educational policy, and led to a major focus on school accountability (Weiss, 2003). And accountability implied testing at every level.

According to Giordano (2005) the next several years experienced an explosion of mandatory testing, especially with the Committee for Economic Development urging alliances between educators and business people who were concerned with students’ failing scores. Educators were asked to recognize that in order for students in their classrooms to become employable, they needed to possess problem-solving skills, a command of the English language, self-discipline, and the ability to acquire and apply new knowledge. The Committee encouraged state Departments of Education to set standards, monitor the progress, and to be ready to intervene if schools failed to perform. By the end of 1987, 33 states implemented some form of minimum competency testing as a means of requiring accountability and monitoring achievement of the set standards (Heubert & Hauser, 1999).

Educational reforms continued to proliferate during the Clinton administration when the President challenged the nation in his State of the Union address of 1997 to undertake

\[ \ldots \text{a national crusade for education standards} - \text{not federal government standards, but national standards, representing what all our students must know to succeed in the knowledge economy of the twenty-first century.} \ldots \text{Every state} \]
should adopt high national standards, and by 1999, every state should test [emphasis added] every fourth-grader in reading and every eighth-grader in mathematics to make sure these standards are met. . . They can help us to end social promotion. For no child should move from grade school to junior high, or junior high to high school until he or she is ready (Clinton, 1997).

And so the wheels of big business and politics rolled through the education system, without consulting educators about their concerns and perspectives on the new mandates, which now became the teachers’ problems to implement and be held accountable for.

No Child Left Behind

In 2002, education felt possibly the largest impact on teaching in the history of the United States. President George W. Bush signed into law the No Child Left Behind (NCLB) Act. Predominantly based on the National Assessment of Educational Progress (NAEP) Act of 1966, NCLB claimed to ensure the neediest children were not left behind in failing schools. The new law increased accountability for states, requiring them to set up curriculum standards, and mandated testing of all students in grades 3-8. Schools were required to report adequate yearly progress (AYP) or face restructuring measures to get them in alignment with state standards. It gave parents of students who attended low performing schools more choices of public schools their children could attend. States were allowed more flexibility in the use of federal funding, and a greater emphasis was placed on reading (NCLB Executive Summary, 2004). Not only were these demands outlined for schools and school districts, but also implications for teacher/administrator accountability, merit pay, and job security became part of the consequences. Mandatory standardized testing took on a whole new level of power and control and, according to
Herman and Golan (1993), changed the architecture of the education system radically and the landscape of the K-12 classroom significantly.

The signing of NCLB has just passed its 10th anniversary and according to Cavazos, (2016) and Ravitch, (2014), in those 10 years a plethora of changes have occurred in K-12 schools all over the United States. But these changes have not come about without disagreements and verbal battles as to the validity of the testing program and the reasonableness of the expectations of NCLB. These conflicts will be further discussed in a later part of this chapter. For now, it is enough to say that standardized testing has been a part of educational history since the beginning of formalized schooling, and it doesn’t seem it will disappear or diminish in importance any time soon.

**Standardized Testing in The Education System Today**

The release of *A Nation at Risk* in 1983 under President Ronald Regan prompted the beginning of one of the largest educational reform movements the United States has ever experienced. Because the schools were blamed for the economic recession of the early 1980s, neoliberal policies emerged as drivers of education reform to make schools ‘markets’ rather than social institutions. Accountability became the buzzword of the era and with it came standardized high-stakes testing; the underpinning of the education system as we experience it today (Hursh, 2007).

The cry for accountability became even louder in the 1990s as American students’ scores on the PISA international tests appeared to rank only mediocre compared to our economic competitors of China, Japan, Hong Kong, and Canada (Programme for International Student Assessment (PISA) Snapshot, 2012). According to these data the United States’ education system was not performing well in the competitive world of
academics. And this was not a new pattern. Scores from previous PISA tests given in 2003 and 2006 indicated that the United States not only performed poorly, but also was “standing still while more focused nations move[d] rapidly ahead” (Darling-Hammond, 2010, p. 9). Naturally, the finger of blame was pointed at the schools and the classroom teachers and their incompetence at teaching our students well. This resulted in a ramping up of accountability through more standardized tests. But this time they became high-stakes (Hursh, 2007).

However, according to scholars such as Berliner and Glass (2014), in reality, the U.S. education system is not in crisis. Rather, this is one of the educational myths that have propagated over the years as a result of misinterpreted data. The United States may not be number one on these international tests, but it is not because our students are lacking. Berliner and Glass proposed other factors such as percentage of child poverty, inequity of test materials because of translation, more diversity of cultures within the United States, and unfamiliar mathematics calculation methods are among the many reasons the United States scores lower. Furthermore, countries whose scores are above those of the United States usually test only their brightest students since education for everyone is not mandatory. Nonetheless, mandates for improving education were outlined in the No Child Left Behind Act of 2002, and the consequences resulting from failure to meet the new standards were explicitly outlined. Testing became the focus of the classroom and the test scores became the impetus for educators.

Madaus (1988) defined a test as high-stakes when its results are used to make important decisions that affect students, teachers, administrators, communities, schools
and districts. Orfield and Wald (2000) added to this definition that a high-stakes test “links a score on one set of standardized tests to grade promotion, high school graduation and, in some cases, teacher and principal salaries and tenure decisions” (p. 38). As part of the accountability movement, these test results are reported to the public (McNeil, 2000) as a way of ensuring taxpayers’ money is being well spent (Madaus & Russell, 2010/2011). Hursh (2007) noted that when significant decisions like those mentioned above are made based on test scores and then released to the public, the educational paradigm will inevitably be restructured so it produces the best results possible, even to the detriment of student learning.

As the entry level of the education structure, the K-12 classrooms frequently receive the blame for the majority of educational deficiencies. So it was no surprise that in the long line of school reform plans came President George W. Bush’s No Child Left Behind Act of 2002. According to Diane Ravitch (2010), who was invited to attend the initial unveiling of Bush’s school reform policy, the original plan outlined four principles:

1) every child should be tested every year in grades three through eight, using state tests, not a national test;

2) decisions about how to reform schools would be made by the states, not by Washington;

3) low-performing schools would get help to improve; and

4) students stuck in persistently dangerous or failing schools would be able to transfer to other schools (p. 94).
This newly conceived version of the *Elementary and Secondary Education Act of 1965*—now NCLB—would number 1100 pages of documentation when it was finalized. Under ordinary circumstances there would have been much debate between political parties about the expansion of federal power over local schools and the emphasis on testing. However, with the terrorist attacks of September 11th, Congress was eager to show its unity and so passed the bill into law with little discussion or conflict. Some speculate that given the timeline of the terrorist attacks, proposal of the bill, and its passage, that few members of Congress even bothered to read the bill in its entirety (Ravitch, 2010).

Looking back, it seems NCLB was an imminent reform movement even without the terrorist attacks. Many states had already implemented reforms that included mandatory testing in their schools and local and state politicians were in agreement that testing for accountability was the only way to achieve better schools (Ravitch, 2010).

The types of tests already in use were a product of the 1980s when the emphasis was the traditional inputs, such as credit hours and seat time (time spent in class). Based on these inputs, requirements for the high school diploma provided no useful information about what students had studied or what they actually knew (Wiggins, 1989). Thus, the emphasis on results or outcomes was introduced in the 1990s (Education Commission of the States, 1995). Outcomes-based education (OBE) was more in line with the quality movement in business and manufacturing where the belief was “the best way for individuals . . . to get where they’re going is first to determine where they are and where they want to be” (Education Commission of the States, 1995, para. 2), then plan backwards to determine the best way to get from point A to point B. Supporters of this constructivist approach to teaching and testing accepted the fact there were multiple ways
to achieve the same goal. The difficulty came in determining who would decide what the goals would be and how students would be held accountable for achieving them (Education Commission of the States, 1995).

Drawing from this aspect of the constructivist paradigm, NCLB set forth the parameters for public education, more complex than its initial presentation. Its accountability plan contains many facets including the following:

1) All states were expected to choose their own tests, adopt three performance levels (such as basic, proficient, and advanced), and decide for themselves how to define “proficiency.”

2) All public schools receiving federal funding were required to test all students in grades three through eight annually and one in high school in reading and mathematics and to disaggregate their scores by race, ethnicity, low-income status, disability status and limited English proficiency. Disaggregation would ensure that every group’s progress was monitored, not hidden in an overall score.

3) All states were required to establish timelines showing how 100 percent of their students would reach proficiency in reading and mathematics by the 2013-2014 school year.

4) All schools and school districts were expected to make “adequate yearly progress” (AYP) for every subgroup toward the goal of 100 percent proficiency by 2013-2014.

5) Any school that did not make AYP for every subgroup would be labeled a school in need of improvement. This would initiate a series of increasingly
severe sanctions through the fifth consecutive year of testing at which point schools or school districts would be required to “restructure.”

6) Schools that were required to restructure had five options:

a. convert to a charter school;

b. replace the principal and staff;

c. relinquish control to private management;

d. turn over control to the state; or

e. any other proposed major restructuring of the school’s governance.

7) NCLB required all states to participate in the federal National Assessment of Educational Progress (NAEP), which tested reading and mathematics in grades four and eight in every state every other year (U.S. Department of Education, 2016d).

According to Diane Ravitch (2010) this accountability plan, although well outlined, had several flaws, the worst of which is the ‘magic’ date where all students must be proficient in reading and mathematics. This included students with special needs, students with limited English or English as a second language, the homeless who lack advantages of society, and students who have every advantage but are not interested in school. ALL of these students were to be proficient, as indicated by one standardized high-stakes test, by the 2013-2014 school year. And if they were not, their schools and teachers would suffer the consequences.

Another issue was the term ‘proficiency.’ This term has been used by many testing agencies throughout history to mean a very high level of academic achievement. In the past, students labeled as proficient have fully mastered the standards of his or her grade. Today, however, most educators and policy makers interpret ‘proficiency’ to mean
‘minimal competency’ or meeting only the basic competency level of a given grade (Ravitch, 2010). Needless to say, there is a huge difference between these two definitions; a difference that can greatly affect the percentage of students passing the tests. If proficiency is to be what is measured by these standardized tests, the definition needs to be clarified and standardized also so everyone is working toward the same goal.

Adequate yearly progress (AYP) created another barrier for schools to deal with. The goal of AYP is to ensure that all students, in every student group (subgroup), achieved the levels of proficiency set forth by the government by the year 2014. These proficiencies are determined by standardized test performance, number of students participating in testing, and attendance/graduation targets for the overall student population (Indiana Department of Education, 2013). To better comprehend the emerging problems of AYP, it is necessary to understand specifically how it is determined. Since 2002, students in all public high schools across the country have been required to participate in a state high-stakes test that eventually determines a student’s graduation. Each state government sets a proficiency bar that all its schools and school districts must achieve if they are to be considered passing. Using Indiana as an example, the first year of testing (2001-2002) required 58.8% of a school’s students to pass the English/language arts portion of the Indiana Statewide Testing for Educational Progress Plus (ISTEP+) and 57.1% to pass the mathematics portion of the test. Every three years the percentage was raised, moving to 65.8% English/language arts and 64.3% in mathematics at the end of 2006-07; and 72.6% English/language arts and 71.5% in mathematics in 2009-2010. At this point Indiana changed its testing system so that the bar was raised every year beginning in school year 2010-2011 making the scores 79.5%
English/language arts and 78.7% mathematics. In successive years it continued to rapidly rise hoping 100% was reached in both English and mathematics in the school year 2013-2014 (Indiana Department of Education, 2011c), a goal that has not been met even as school year 2015-2016 has been completed. In addition to meeting these statistics, schools must meet the minimum testing participation numbers based on school enrollment, and high schools must verify that their attendance and graduation rates have improved. These targets are calculated with a formula based on the number of students enrolled, number of students considered special populations, and the number of students on a full diploma track (National Coalition for Parent Involvement in Education, 2014). Although this system seems to utilize a variety of aspects to determine whether a school has made adequate yearly progress, the expectations made AYP inequitable, undemocratic, and therefore virtually impossible to attain (Ravitch, 2010).

Yet another flaw was the restructuring process. To date there is no evidence that a failing school can be turned around by using any of the restructuring procedures outlined in NCLB. Ravitch (2010) stated, “It seems the only guaranteed strategy is to change the student population, replacing low-performing students with higher-performing students” (p. 105). This sometimes happens if a failing school is closed and reopened under a new name, new theme, and new students. But most of the time low-performing students are dispersed to other schools where they are absorbed into the general population and treated as if they don’t exist. “In other words, there is no statistical reason to suspect that any one of the federal restructuring options is more effective than another in helping schools make AYP” [italics in original] (Ravitch, 2010, p. 105). As of this writing, several states have now been allowed to opt out of AYP because of its improbable results.
But each state that opts out does so under a year-by-year re-evaluation process for progress by the United States Department of Education (U.S. Department of Education, 2016d).

**Criticisms of NCLB and High-Stakes Tests**

The flaws and failures of NCLB, so far, have shown that education is a more complex structure than the government appears to believe, and simply mandating tests to show progress and educational accountability will neither increase the intelligence of students nor the effectiveness of teachers and administrators. Educators and education proponents have argued this numerous times. W. James Popham (1999) provided multiple reasons to support this sentiment.

First, Popham (1999) argued there is almost certain to be a significant mismatch between what is taught and what is tested. Testing companies who provide the major standardized tests used across the nation are challenged with creating exams that fit a wide diversity of curricula: a one-size-fits-all type of test. These test items are drawn from educational objectives or content standards perceived to be important to all classrooms of a specific grade level. However, each state, and sometime local governments or school districts, set their own standards based on teacher curricular preferences and student clientele, making it impossible to build a standardized test to fit every situation. So in many cases test items are not aligned with the curriculum. A study conducted at Michigan State University in 1983 reported that 50-80 percent of what was measured on five nationally standardized achievement tests was never properly addressed in the textbooks used in the classrooms. As Michigan State researchers put it, “The proportion of topics presented on a standardized test that received more than cursory
treatment in each textbook [reviewed] was never higher than 50 percent” (Michigan State University report p. 509 as quoted in Popham, 1999). This percentage, no doubt, has increased in recent years with the introduction of Common Core State Standards, but the task of providing a one-size-fits-all test remains an impossibility as long as states, local governments, and school districts have any control over their curricula. So the disparity between what is taught and what is tested persists.

The second reason Popham (1999) gave as to why standardized tests are not good indicators of educational quality is that these tests are to provide meaningful comparisons among students by using only a small collection of test items. Test items that best do the job of spreading out the scores, and therefore creating a bell-shaped curve, are those that about half the testers answer correctly. Items that are answered correctly by large numbers of students do not help in spreading out the scores. So questions that are answered correctly by 80 percent or more students will be thrown out of the pool of questions to be placed on the test. As a result, the vast majority of items placed on standardized achievement tests are middle difficulty items. The items students score well on are those covering content teachers feel important and spend significant time to teach, but those items are eliminated from the tests. So ironically, the better job teachers do in teaching what they perceive to be important knowledge and/or skills, the less likely this content will appear on a standardized achievement test. Popham’s conclusion, “To evaluate teachers’ instructional effectiveness by using assessment tools that deliberately avoid important content is fundamentally foolish” (p. 11-12).

Popham’s (1999) final argument against using standardized tests to evaluate educational quality is that student performance is influenced by three contributing
factors: 1) what’s taught in school, 2) a student’s native intellectual ability, and 3) a student’s out of school learning. Looking more closely at these factors sheds light on yet another dimension of learning and testing, part of which teachers have no control over.

What is taught at school can certainly be tested in some way on a standardized test. But what about the multiple content areas learned outside the school but not covered by these exams? If standardized tests measured only what is taught in school, the results might be more accurate than they currently are, for all students would be measured on an equal basis. However, there are hidden items in these tests that also affect their outcomes. One of these is a student’s native ability to learn. Some children, from birth, find it more difficult to learn, many because of a genetic learning disability. In some cases students struggle with verbal or quantitative tasks but have high aptitudes in interpersonal intelligence. But these latter skills are not on the test and therefore are not taken into account when determining educational quality (Popham, 1999). The same might be said of talents in the arts or skills in cooking or woodworking. So to base evaluation of schools and teachers on standardized tests only, seems a bit skewed toward the learning of mathematics, science, English, and social studies.

The most frustrating items found on a standardized test are those based on what students learn outside the classroom. This learning is directly associated to socioeconomic status. A student whose family has the means to expose him or her to ‘stimulus-rich environments’ certainly has an advantage over the student whose family struggles to make ends meet and put food on the table. A particular question from a 6th grade science test illustrates this point:
This item first tells students what an attribute of a fruit is (namely, that it has seeds). Then the student must identify what ‘is not a fruit’ by selecting the option without seeds. The choices: A) orange, B) pumpkin, C) apple, D) celery. As any child who has encountered celery knows, celery is a seed-free plant. The right answer, then, for those who have coped with celery’s strings but never its seeds, is clearly choice D.

But what if when you were a youngster, your folks didn’t have the money to buy celery at the store? What if your circumstances simply did not give you the chance to have meaningful interactions with celery stalks by the time you hit 6th grade (Popham, 1999, p. 14).

This may seem like a nonsensical example, but apply it to other situations where low-income children are deprived of out-of-classroom experiences because they lack the funds, and then equate it to their success on standardized tests. This same principle may also apply to students from non-white cultures or students whose first language is not English. They may not have assimilated well enough to be able to answer test questions correctly (Popham, 1999).

Considering these three arguments, Popham questioned whether it seemed fair to judge teachers’ and schools’ performance on standardized tests. If a teacher or school is faced with students who struggle to learn and then test poorly, is the teacher or school a poor one? Likewise, is a teacher or school fantastic if the students are intelligent and come from higher income families and therefore pass tests with above average scores? The answer to both of these is ‘not necessarily.’ Thus, evaluation of educational quality
by standardized test scores only, seems not only unfair and misleading (Popham, 1999) but also inequitable and undemocratic (Ravitch, 2010).

Scholar Alfie Kohn (2000) joined the criticisms of Popham (1999) and Ravitch (2010) when he proclaimed, “Standardized testing has swelled and mutated, like a creature in one of those old horror movies, to the point that it now threatens to swallow our schools whole” (p. 1). He followed this statement with a list of eight facts about education and [testing’s] negative effects.

Fact 1: Our children are tested to an extent that is unprecedented in our history and unparalleled anywhere else in the world. Never before in American history have tests played such a prominent role in education. They are used to measure our intelligence, predict our success, and determine our futures. American schools begin this indoctrination as early as the first grade; continue through high school, and into higher education. In comparison to international standards, few countries use these types of tests earlier than high school and seldom are their tests multiple-choice.

Fact 2: Non-instructional factors explain most of the variance among test scores when schools of districts are compared. Stated simply, this fact indicates that test scores are strongly tied to factors outside the school such as number of parents living at home, parents’ educational background, poverty rate, and type of community. A study of mathematics results on the 1992 National Assessment of Educational Progress indicated 89 percent of the differences in state scores were determined by these factors (Kohn, p. 1).

Fact 3: Norm-referenced tests were never intended to measure the quality of learning or teaching. This fact coincides with Popham’s (1999) explanation of how test
items are chosen for standardized tests. Kohn (2000) concludes that these tests were intended to rank, not rate, “to spread out the scores, not gauge the quality of a given student or school” (p.1).

Fact 4: Standardized-test scores often measure superficial thinking. Kohn’s explanation of this fact is based on the thinking process used to take an exam. According to a study published in The Journal of Educational Psychology, elementary school students were considered ‘actively’ engaged in learning when they were questioning themselves while they read and tried to connect their reading to their own experiences. ‘Superficially’ engaged was the term given to those who copied answers, guessed, or just skipped the parts they felt were hard. Test results on the CTBS² and MAT³ showed the superficial students scoring higher than those who learned to think on a deeper level. The conclusion: standardized tests appear to test a shallower approach to learning.

Fact 5: Virtually all specialists condemn the practice of giving standardized tests to children younger than 8 or 9 years old. Kohn clarifies ‘virtually’ here to cover himself, but to date he hasn’t found a reputable scholar in the field of early-childhood education who endorses such testing of young children. Yet in the United States by the age of 8 or 9 most students have already been exposed to 4-5 years of testing in the school systems for purposes of IQ, academic progress, or learning disabilities. What is the American rush to gather data on our students?

Fact 6: Virtually all relevant experts and organizations condemn the practice of basing important decisions, such as graduation or promotion, on the results of a single test. Ravitch (2014) and Taubman (2009) agree that students and teachers are more than a

² California Test of Basic Skills
³ Miller Analogies Test
number: they have individual human qualities that cannot be tested by filling in the bubbles. Au (2009) stated, “Indeed, high-stakes tests hold so much power because their results are tied to rewards and sanctions that deeply affects the lives of students, teachers, principals, and communities (negative for low performers, and positive for high-performers)” (p. 90). These scholars and Kohn’s ‘relevant experts’ all posit that important decisions should not be made based on one test, yet the emphasis on testing for the very purposes mentioned here seems to be escalating across the nation every year. Because these tests hold such ‘power,’ the existence of remedial classes at several levels is a common practice in school districts across Indiana. These courses are created to provide additional preparation to those students who need to pass an exam that determines an important decision: IREAD dictates promotion to the 4th grade; ECA determines high school graduation and diploma; PSAT and Accuplacer control who is eligible for government scholarship assistance. These are obviously major milestones in education that are being determined by the scores of one test. Study participants feel a constant pressure from administration to ensure students score well on these high-stakes tests.

Fact 7: The time, energy, and money that are being devoted to preparing students for standardized tests have come from somewhere. Because of the massive budget cuts schools everywhere are experiencing, programs are being excluded from the curriculum. They are “eliminating programs in the arts, recess for young children, electives for high schoolers, class meetings, and even such aspects as discussion of current events and use of literature in early grades” (Kohn, 2000, p.2) since these won’t be on the test. However, these activities help promote social and moral learning as well as broaden the scope of knowledge in students. But producing high scores on tests has become so crucial for the
evaluation of education these programs have been cut so the money can be used toward test preparation time and resources.

Fact 8: Many educators are leaving the field because of what is being done to schools in the name of ‘accountability’ and ‘tougher standards.’ Finding good teachers is hard; finding good teachers willing to endure the new accountability and standards imposed by federal and state governments is harder. Teaching is a calling not a profession, but unless one can actually teach what is important for future success instead of what’s on the test, the incentive to stay in education is waning. It is not the mediocre teachers who are leaving but rather “the very best educators, frustrated by the difficulty of doing high-quality teaching in the current climate” (p.2).

Standardized testing is obviously not a new concept to education, as history has demonstrated; but what have we learned about the prospects of high-stakes accountability as a constructive force in improving education? Jonathan Supovitz (2009) speculated on an answer to this question by making the following observations:

- High-stakes testing does motivate educators, but responses are often superficial. Teachers fear for their jobs because of high-stakes tests. As a result, curriculum has become narrower and children are given more test preparation activities that limit the number of complex skills and habits to compete in a global economy.

- Test-based accountability fosters alignment of the central components of the educational system. Many believe these tests and standards are being aligned to the curriculum. The truth is the curriculum is being aligned to the test content.

- High-stakes testing regimes provide system level data, but not useful classroom level information. Although general inferences can be made from test data
concerning schools or districts, the data provided by these tests is useless in the individual classrooms because of the long feedback cycle, lack of connection to the curriculum, and lack of disaggregation of individual student data.

- Test-based accountability is an appealing political strategy that effectively conveys public accountability. The current trend of politicians and businesses to make educational polity makes statistical data easy to read and to demonstrate to the public how their tax dollars are being used. Unfortunately, the data are being misinterpreted, misused, and therefore miscommunicated (p. 221-222).


Impact on Classroom Instruction

So how have all these aspects of standardized testing impacted the teaching and learning in the K-12 classroom according to the scholarly literature? One major area of impact has been the curricula. As teachers have relinquished their control of curriculum to the state standards, it has become narrower, more academic, and less aimed at developing a well-rounded student. Madaus (1988) found “the taught curriculum eventually matches the content of the exam in each setting that gives a high-stakes test” (p. 93). Because of these curricular changes, teachers’ instructional planning has changed to conform to the content of the tests, while excluding or ignoring other important educational needs (Madaus & Russell 2010/2011).
In addition to curricular changes, standardized high-stakes testing imposes a limit to the time teachers have for instruction, the types of instructional resources used, and the types of assignments given to the students (Thomas, 2005). Everything about instruction seems to be aimed toward helping students perform well on the tests, not on helping students learn to their potential. And definitely not to preparing students for the future – unless they plan to bubble in Scantron sheets the rest of their lives.

Even though standardized tests have been prominent in education for many decades, not until the last 20 years have these tests become so high-stakes as to determine the restructuring of the function of teachers and students in the classroom. The pressures of accountability through testing drive schools and teachers to modify their behavior in ways that will increase test scores (Darling-Hammond & Wise, 1985; Madaus, 1988). These modifications include curricular and instructional practices, which in turn cause adjustments in student learning strategies and goals (Corbett & Wilson, 1988). Both of these modifications pose a challenge to the validity of test results and changes in the teaching/learning practices (Frederiksen & Collins, 1989).

Just how radically these changes are affecting the K-12 classroom dynamics of teaching and learning in terms of teachers’ pedagogy, lesson preparation, and student-teacher relationships is in the early stages of discovery. Taubman (2009) declares,

We have arrived at a moment when students and teachers are subjected to a curriculum driven by disconnected multiple-choice questions or essay prompts that must be answered in a set amount of time and that have little if any relationship to problems, interests, or speculations that we might
associate with thinking, erudition, creativity, or curriculum animated by and responding to the flux of a classroom (p. 17).

Many of the education scholars mentioned above have addressed the effects of standardized high-stakes testing on classroom dynamics, but little empirical research is currently available – though constantly emerging - that provides specific responses from classroom teachers. In a study by Herman and Golan (1993), many of the aforementioned issues were stated in their findings. However, the findings and conclusions were the result of a 117-question survey rather than direct conversations with teachers. Thomas’s (2005) study, although conducted through interviews, was limited to only three teachers in a small, rural community. This is not to imply that the findings of either of these studies are trivial, but much has changed in educational standardized high-stakes testing since these studies were conducted. It is my goal to gain further insight into the dynamics of the K-12 classroom to establish whether the teachers in this study have experienced changes in their pedagogy, lesson planning, and the relationships with their students since the introduction of high-stakes testing in their schools.

Summary

This chapter has focused on the historical evolution of testing in the United States and its ever-changing means of providing accountability for students, teachers, and schools. It has related some of the reasons why testing has been, and continues to be, considered a necessary function of education. A major portion of this chapter has focused on the current policies that make testing high-stakes, the intention behind their inception, and the implications and expectations these current policies hold for public K-12
educators throughout the United States. Also addressed are the criticisms of *No Child Left Behind* and the standardized high-stakes testing movement it encourages.

The final section of this chapter summarized scholarly literature emphasizing the possible impact standardized high-stakes testing has on the dynamics of K-12 classrooms in terms of teachers’ instructional methods, lesson preparation, and the relationships between students and teachers. However, this literature comes from the perspective of educational experts outside the K-12 classroom, not the teachers in the classrooms who must adhere to the mandates of the state and local governments. This study provides a new perspective: one from teachers, who – along with students - are affected the most by the educational reforms that include standardized high-stakes tests, yet have the least input concerning these mandates.
CHAPTER III: METHODOLOGY

As stated in Chapter One, the purpose of this study was to explore K-12 public school teachers’ perspectives about the classroom dynamics as they may be shaped by standardized high-stakes testing in the K-12 educational systems in Indiana. By conducting this research, I sought to understand the meaning that the teachers made of their teaching experiences in regard to classroom dynamics in the years since standardized high-stakes testing was instituted, specifically since 1996, the year Indiana initiated standardized high-stakes tests. Further, I specifically focused on the teachers’ experiences in relation to teachers’ preparation time, teaching strategies, and teacher-student interactions, which, in the context of this research, defined the classroom dynamics. Therefore, the main research questions are the following:

1. What are the teachers’ experiences with the current classroom dynamics?
2. What are the teachers’ perspectives about role and influence that mandatory, high-stakes, standardized testing may have on their classroom dynamics?

Using the following sub-questions for research, answers to the larger concern were explored:

1. Have teachers’ pedagogical approaches changed over the last twenty years? If so, how and why?
2. If the student classroom activities have changed in focus, in what ways?
3. Have teacher-student relationships changed? If so, in what ways?

The study of the effects of standardized high-stakes testing on student learning has received much attention since the inception of No Child Left Behind in 2002 (U.S. Department of Education, 2002); the effects of these tests are being scrutinized even
more with the introduction of the Common Core State Standards (CCSS). These ‘effects,’ measured by quantitative methods of standardized tests, regard students, teachers, and schools as statistical data for comparative purposes. However, CCSS and the associated tests are still emerging in the educational community, so there is little research on the recent changes to classroom dynamics resulting from standardized high-stakes tests as perceived by the teachers. This qualitative study proposed to initiate the dialogue that provided a better understanding of the influence of mandatory standardized high-stakes tests on the classroom dynamics as illustrated through the stories of teachers.

**Epistemological Stance**

Drawing from the qualitative research scholarship of Savin-Baden and Major (2013), this study is based on a social constructionist paradigm. Citing Berger and Luckman (1966), Savin-Baden and Major (2013) describe this epistemology as suggesting, “that individuals construct reality with each other, that knowledge is relational and that it may be uncovered by examining interactions and meaning making between and among individuals” (p. 38). They also cautioned this approach should not be confused with constructivism, which suggests that individuals create their own realities through their experiences.

Social constructionism sets forth a pluralistic position, suggesting that the understanding of truths is constructed through interactions of individuals and their reflections on shared experiences (Savin-Baden & Major, 2013). Because the educational process is one of shared experiences between students and teachers, the constructed truths are continually changing as the shared experiences are exposed and developed. This continual changing becomes recursive as the participants reflect on the constructed truths,
share further experiences, and construct ‘new truths’ based on these additional experiences.

Social constructionism includes more than the cognitive conceptions of the world: it includes the phenomena of emotions that can only gain meaning through social settings and interactions with others. Additionally, constructionists contend that reality is not solely created from external interactions but that signs and symbols also play an important role in constructing truths (Savin-Baden & Major, 2013). These elements of social constructionism all play an important role in education where cognitive ability is combined with emotional stimulation through shared experiences, signs, and symbols to produce “expressive outcomes” (Eisner, 2002, p. 118), the product-intended or not-of human interactions. According to Eisner,

the appraisals we make as a result of activities we engage in are clearly complex and highly rational employing a wide range of criteria that, although not explicit, operate in our judgments. . . . There must be room in school for activities that promise to be fruitful, even though the teacher might not be able to say what specifically the students will learn or experience (p. 119).

In other words, “there is no single legitimate way to formulate educational aims” (p. 120).

How teachers achieve and interpret these expressive outcomes was central to this study as the participants considered their classroom preparations and proceedings and their interactions with students, reflected on the constructed truths of the current classroom, and re-constructed new truths to improve classroom instruction in light of mandatory standardized high-stakes tests.
Theoretical Perspective

Consistent with the epistemological assumptions of social constructionism, this study employed hermeneutics as the theoretical perspective and narrative approach as the method. This theoretical perspective – initiated as philosophical hermeneutics by Martin Heidegger and further developed by Hans-Georg Gadamer – is the art of text interpretation developed from Biblical studies and transferred to the study of human practices, human events, and human situations. It includes both verbal and nonverbal communication as well as semiotics, presuppositions, and pre-understandings (Crotty, 2012). Recognizing the influence of context and of cultural influences, the hermeneutic perspective acknowledges limitations of the scientific method for the interpretation of language. Rather than approaching a text to master it and uncover meaning as an object, the inquirer seeks to engage in dialogue with the text, willing to be changed by it in the process of seeking understanding. Squire (2013) noted that the hermeneutic perspective is the predominate one in current social science narrative research.

Because this study depended on the texts gathered from interviews with the participants, a hermeneutic perspective is appropriate for acknowledging the researcher’s role in interpreting and making meaning from the resulting stories of teachers’ realities about classroom dynamics. This perspective required the researcher to scrutinize not only the verbal communications from the interviews, but also the nonverbal signs and symbols of body language that contributed to the understanding of the realities (Savin-Baden & Major, 2013).
Design of Study

The emergence of qualitative research was the answer to intense criticism of quantitative research by Eisner (1971) and Hamilton (1976) who dealt with the humanities rather than the hard sciences. Both these men argued that quantitative evaluation was too much like ‘scientific management’ to use when dealing with human beings. Hamilton further contended that quantitative studies lacked the ability to evaluate the important aspects of education because they were difficult to measure; interests of the evaluator and curriculum developer could conflict when data must be reduced to numbers; results of quantitative evaluation tend to favor administration and researcher rather than teacher practicality; unplanned consequences are ignored in favor of expected outcomes; and consensus is unlikely to be reached concerning curricular goals. Qualitative research, on the other hand, is based on ethnography, case studies, in-depth interviews, and participant observation, rather than scientific theory (Pinar, Reynolds, Slattery, & Taubman, 2008). Because researchers in the humanities work with human subjects and rely on text and images for their data, these social phenomena are examined holistically through an interpretive lens (Creswell, 2014). Education is one area, especially, where Eisner (2002) emphasized, “the model of natural sciences on which much educational research is based is probably inappropriate for most the problems and aims of teaching, learning, and curriculum” (p. 363). Furthermore, qualitative methods of research do not depend on the defending or refuting of a hypothesis as quantitative

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4 This is an industrial reference to observing and measuring industrial outcomes and productivity quantitatively, introduced by Frederick Taylor (1856-1915) who specialized in time efficiency and productivity. Later, education reformers tried to integrate these same principles into schools to improve productivity of the students. (Eisner, 2002; Pinar, Reynolds, Slattery, & Taubman, 2008).
research does; qualitative methods allow the research to fluctuate in a natural direction. This type of research is therefore more appropriate when working with human subjects who are not static objects. And it gives the researcher permission and flexibility to deviate to some extent from the original intent of the study. Relying on the qualitative models put forth by Savin-Baden and Major (2013) and Creswell, (2014), this study employed the qualitative research method of narrative inquiry to learn about teaching and learning in the classroom. This method provided the latitude needed to pursue the information sought through the study.

**Narrative Research/Inquiry/Approach**

Riessman (2008) as cited in Creswell (2014) defined narrative research or narrative inquiry or narrative approach (the terminology varies by scholar) as “a design of inquiry from the humanities in which the researcher studies the lives of individuals and asks one or more individuals to provide stories about their lives” (p. 13). Clandinin and Connelly (2000) add to this definition that this information [stories] is then often retold or re-storied by the researcher into a narrative chronology. Often, in the end, the narrative combines views from the participant’s life with those of the researcher’s life in a collaborative narrative (Creswell, 2014). Savin-Baden and Major (2013) trace this type of research to the work of scholars such as Dewey (1938), Geertz (1973), and Bruner (1986, 2002, 2004). Dewey suggested that life is education and emphasized the human capacity to reconstruct experiences and make meaning out of them. Geertz argued that narratives are stories about ourselves and are a major component of almost all cultures. Bruner posited that ‘to narrate’ derives from both the ‘telling’ and ‘knowing in some particular way’ and the two aspects are tangled beyond sorting. Bruner (1986) further suggested
that narrative knowledge is created and constructed through the stories of lived experiences and their meanings. All these definitions are similar with the storytelling of experiences as the focal point. But in the scholarship on narrative research, Creswell (2014), Savin-Baden and Major (2013), and Pinar (2008) all referred to Clandinin and Connelly as the founders and leading proponents of narrative research. Therefore, from the many variations of existing narrative approaches, I chose to use narrative inquiry as defined by Clandinin and Connelly (Clandinin & Connelly, 1987, 1988, 1989, 1990, 1999, 2000; Clandinin D. J., & Huber, J., et al 2006; Clandinin, 2007; Xu & Connelly, 2010).

**Narrative Language**

Connelly and Clandinin (1990) stated that one theory of research holds “that humans are storytelling organisms who, individually and socially, lead storied lives. Thus, the study of narrative is the study of the ways humans experience the world” (p. 2). Education is both the construction and reconstruction of personal and social stories; teachers and students are storytellers and characters in their own and others’ stories. Thus, using narrative inquiry in educational research seems a natural connection. However, narrative inquiry can be seen as both phenomenon and method. In order to maintain a distinction between the two, Clandinin and Connelly called the phenomenon “story” and the inquiry “narrative.” In other words, it can be said that people by nature lead storied lives and tell stories about their experiences (phenomenon), whereas narrative researchers describe such lives, collect and tell stories about them, and write narratives of experience (inquiry). These two distinct facets of narrative inquiry merge during the research and become a collaboration involving mutual storytelling and re-
storying as the research proceeds. Therefore, the researcher becomes a participant in his own research process.

Narrative inquiry uses field texts as a means of collecting stories for the narrative. This term, *field texts*, is preferred to *data* because the word *field* implies a place where the record is collected whereas *data* carry an abstract sense independent of place. The term *texts* conveys a complex quality, and *data* have unitary qualities. In addition, *data* tend to carry a fixed idea of the record, whereas *field texts* is open to whatever might bear on the life space (Xu & Connelly, 2010).

According to Clandinin and Connelly (2000), field texts (data) in narrative inquiry can be collected in many forms. Among these are the following:

1. **Field Notes of Shared Experience** – participant observation in a shared practical setting where notes of detailed description are made

2. **Interviews** – conducted between researcher and participant; transcripts are made; meetings are made available for future discussion

3. **Journals** – these are made by the participants usually as part of an ongoing data collection

4. **Story Telling** – stories told by participants that describe their work and explain their actions

5. **Letter Writing** – communications between researcher and participant that contain an ongoing dialogue of the research

6. **Autobiographical/Biographical Writing** – personal life stories that help explain how experiences shaped interests in teaching

7. **Other Data** – documents such as class plans and newsletters.
Because narrative inquiry is relatively new to the research realm, it is still being developed as a method of inquiry. Like other qualitative methods, narrative inquiry relies on criteria other than validity, reliability, and generalization, as they have been defined in the quantitative realm. The exact language of narrative is still in the development stages, so it is important not to assume that language and criteria of other types of inquiry work for narrative. As a researcher, using this narrative approach brought unique challenges, but it also created a personal rapport between the participants and myself that allowed me to make more meaning of their perspectives of standardized high-stakes testing as related to classroom dynamics.

Gathering stories from the teacher participants in this study enabled the researcher to gain understanding about the educational environment these teachers have experienced since the introduction of standardized high-stakes tests in Indiana in 1996 and the ensuing decades. Because the participants have been compelled to participate in educational reforms, with little or no involvement in the process of determining them (Cuban, 1993; Ingersoll, 2003; Madaus & Russell, 2010/11; Popham, 1999), the stories were plentiful, rich with data, and grounded in the many years of experience these teachers possess. Furthermore, since these participants have lived these experiences, their expertise in teaching and learning made narrative a strong choice for inquiry method (Connelly & Clandinin, 1990).

Methodological Cautions

No method of research is without weaknesses. Clandinin and Connelly (1990, 2000) warn again the risks, dangers, and abuses of using narrative inquiry. Because narrative inquiry is personal and interpersonal, the researcher must be careful not to lapse
into believing that the data collected are the only existent reality. Clandinin and Connelly (2000) advise, “To dismiss the criticism that narrative inquiry is overly personal and interpersonal is to risk the danger of narcissism and solipsism” (p. 181).

A second danger is what Clandinin and Connelly (2000) referred to as the ‘Hollywood plot.’ When this happens data have been censured and manipulated so that everything works out well in the end. To avoid this danger, the researcher must be aware of not only what is told in the stories, but also what is not told: the unheard story. In this case the researcher needs to be careful not to misinterpret the field texts for the sake of complying with any preconceived findings in this study.

However, the biggest pitfall in using narrative inquiry is the multiple ‘I’ (Connelly & Clandinin, 1990). “The ‘I’ can speak as researcher, teacher, man or woman, commentator, research participant, narrative critic and theory builder” (p. 9). Each of these perspectives offers a unique lens from which to interpret the findings, and the researcher needs to determine which ‘I’ is the dominant voice. To accomplish this, narrative researchers must become both the storywriters and critics of these stories. To do so means to be aware of all perspectives of the field texts: to be able to glean from the texts the believable essential information while continuously questioning the findings.

So, while narrative research in education provides strengths through lived experiences and expertise from the participants, it must be acknowledged that misinterpretation of field texts and ‘I’ perspectives are potential weaknesses to be aware of and continually work against in this method.
Participant Selection and Description

The participants for this research were purposefully selected from a homogeneous sampling derived from lists obtained from district superintendents of teachers who met my criteria (Creswell, 2008; Maxwell, 2005; Savin-Baden & Major, 2013). Snowball sampling (Given & Morgan, 2008) was also used in this study, especially when the lists of eligible teachers did not produce enough participants for each grade level. This technique of sampling uses a small pool of initial informants to nominate, through their social networks, other participants who meet the eligibility criteria and could potentially contribute to a specific study. Although this process tends to lengthen the time needed to locate participants and gain consent, the recommendations of peers by peers lends itself to obtaining names of potential participants more quickly than returning to the administrators of the districts.

The goals of these types of selections were to provide a population that represented the heart of the study, captured heterogeneity within that population, examined stories critical to the theories undergirding the study, and established comparisons that clarified the reasons for differences between setting or individuals (Savin-Badin & Major, 2013). Participants consisted of certified classroom teachers in grades K-12 in selected public schools in northern Indiana (See Table 1) and needed to meet the following criteria:

1. Hold a valid teaching license in the state of Indiana.
2. Began teaching in the public K-12 school setting in Indiana before 1996 when mandatory standardized high-stakes testing was initiated in the state of Indiana.
3. Have not taken a hiatus from teaching for more than 2 consecutive years.
4. Are currently teaching (or retired within the last year) in/from a public K-12 school classroom in Indiana.

5. Have been involved with teaching for and/or administering one of the mandatory standardized high-stakes tests for the grade level they teach.

However, each school’s demographics differed in enrollment numbers, percentage of ethnic subgroups, and percentage of students eligible for free and reduced lunch (see Appendix A). These demographic classifications are commonly acknowledged as major influences on standardized high-stakes test scores (Indiana Department of Education, 2011b). Therefore, collecting stories from schools with varying demographics provided a broader spectrum of experiences.

Table 1

<table>
<thead>
<tr>
<th>Name</th>
<th>Grade Level(s)</th>
<th>School Dist.</th>
<th>Subjects</th>
</tr>
</thead>
<tbody>
<tr>
<td>Donna</td>
<td>K-2, 4, 5</td>
<td>Nesta</td>
<td>math, ELA</td>
</tr>
<tr>
<td>Lois</td>
<td>2, 3</td>
<td>Olympia</td>
<td>math, ELA</td>
</tr>
<tr>
<td>Stewart*</td>
<td>4, 6</td>
<td>Olympia</td>
<td>math, ELA</td>
</tr>
<tr>
<td>Lynn*</td>
<td>6, 7, 8</td>
<td>Yankeeburg</td>
<td>math</td>
</tr>
<tr>
<td>Karen</td>
<td>11, 12</td>
<td>Dagmont</td>
<td>English</td>
</tr>
<tr>
<td>Mary</td>
<td>8, 10, 11, 12</td>
<td>Nesta</td>
<td>English</td>
</tr>
<tr>
<td>Shelby</td>
<td>10, 11, 12</td>
<td>Nesta</td>
<td>English</td>
</tr>
</tbody>
</table>

Note: *Indicates now teaching in a position created as a result of low or failing test scores.

In a qualitative study of this type, Savin-Badin and Major (2013) and Creswell (2014) suggested the number of participants needed for a valid study is dependent on what is to be accomplished. Research tradition defines the number of participants for some studies while sampling type dictates the number of participants for other inquiries. These authors also posited that sometimes the number of participants is determined by
how many people possess the characteristics of the criteria. This was the case for my inquiry. Because many teacher-participants who have been in the classroom since 1996 or earlier are now nearing the end of their careers, finding a spectrum of participants who met my criteria became somewhat problematic. Nevertheless, two participants were acquired from the elementary level (grades K-3), two from the intermediate/middle level (grades 4-8), and three were obtained from the high school level (grades 9-12). As a researcher-participant, I brought the total of participants to eight. Superintendents of several schools provided a list of teachers in their districts who met the criteria stated above. From these lists, I chose participants to represent each of the grade levels. More than three in each level were initially chosen, but not necessarily contacted, to ensure equal representation of the grade levels should some teachers elect not to participate. By purposefully choosing teachers from all levels and diverse schools, the findings covered a broader spectrum of classroom dynamics. Savin-Baden and Major (2013) further suggest that time can be a factor in the chosen number of participants. This was a consideration for this study as finding time to interview teachers during the busy school year was difficult for them and me. As a result, the participants do represent K-12 classrooms, but tend to be skewed toward the high school level and the subject of English.

Field Texts (Data Collection)

Using a set of interview questions as my guideline, each of the participants was asked to share his or her stories about classroom experiences with the researcher through an unstructured interview of approximately one hour. These unstructured interviews allowed the dialogue to follow a more natural conversational flow rather than rigid question and answer format (Connelly & Clandinin, 1990; Creswell, 2008). Furthermore,
these conversational interviews allowed teachers to tell their stories and share their perspectives of standardized high-stakes tests and testing of their own classroom experiences as they applied to pedagogical approaches to teaching, student classroom instructional activities, and relationships between students and teachers. Using an interview protocol proposed by Creswell, initial questions (see Appendix B) were integrated into the conversations concerning their perspectives of these tests on teaching the tested content areas. Information gathered from these commonly asked questions was used to draw general conclusions as well as to create a springboard toward more specific inquiry. Some questions varied depending on the grade level taught because of the structure of teaching assignments (e.g. elementary teachers frequently teach all subjects while high school instructors teach only what they are licensed to teach.)

In accordance with Creswell (2008) and Connelly and Clandinin (1990), all interviews were digitally recorded with the signed consent (see Appendix C) of each participant and then transcribed in a timely manner for analysis by the researcher. As suggested by Connelly and Clandinin arrangements were made to conduct these interviews at the convenience of the participant and in an environment chosen by the participant where there were minimal distractions and both researcher and teacher were comfortable conversing. This allowed for more honest and spontaneous responses.

Field Text (Data) Analysis

Once all participants were interviewed and the verbatim transcriptions made, I began the final analysis of the narratives using Leggo’s (2008) framework known as RITES, a method of interpreting narrative. This framework consists of the following steps:
1. **Read** – The researcher reads the whole narrative to gain a general sense of the story.


3. **Thematize** – The researcher reads the narrative again with a focus on a theme, and spells out the parts of the story, which relate to the theme.

4. **Expand** – The researcher expands on the theme by reflectively and imaginatively drawing connection and proposing meanings.

5. **Summarize** – The researcher summarizes the theme in a general statement or two in order to indicate clearly what is learned from the narrative.

Portions of Anderson’s (1997) system of thematic content analysis (TCA) were employed to augment the analysis. Although multiple copies of transcripts were not made for the analysis as Anderson prescribes, and highlighting was replaced with colored sticky notes, the steps of labeling by color-coding, grouping, and determining what information was missing were beneficial in organizing the content of the seven interview transcripts. This recursive process provided the themes and categories from which the findings were drawn. In order to ensure quality and criteria, I carefully considered the following aspects suggested by Creswell (2008) and Clandinin (2007):

- The story is authentic.
- The story is ‘real.’
- It is clear who owns the story.
- Decisions have been made in advance as to how stories are analyzed and managed.
• Participants’ voices are heard, not lost in the re-storying.

The final findings were written in narrative format, carefully following Clandinin and Connelly’s method of summary writing, and continually working to avoid the dangers and abuses that come with narrative inquiry. These would include the multiple “I” speakers that needed to be addressed, appropriate use of field texts (data), and being careful not to interpret information in a way that met a preconceived position instead of its real meaning. The final study provided enough information to answer the research questions posed in the rationale.

**Strategies to Ensure Quality**

Quantitative research with its controlled trials and scientific methods of obtaining results is still the benchmark of the research world, making it difficult to argue that qualitative research possesses the same rigor and ability to generalize as quantitative research. Many researchers feel qualitative inquiry contains much researcher bias, which prevents the findings from being accurate and valid. This might become the case if the qualitative researcher fails to provide strategies that will ensure the quality of the study. Lincoln and Guba (1985) and Creswell (2014) suggest there are several strategies to choose from to ensure quality of a qualitative inquiry. Among these are thematic triangulation, member checking, rich and thick descriptions, clarification of bias, the presence of discrepant information, peer debriefing, and using an external auditor. The researcher need not use all of these strategies, but employing two or three that best suit the type of study being conducted will ensure the quality of the research. For this study, in addition to adhering to the cautions of avoiding narrative-specific weaknesses, I chose to use member checking, peer debriefing, and dense description of context and findings.
Member checking entails checking with the participants for feedback to verify the interpretations of the researcher (Creswell, 2014). Each of my interview participants were asked to confirm or question the thematic interpretations of their interview answers to make sure their voice, not mine, was being heard. Peer debriefing was a second technique chosen to ensure a quality study. This technique of quality assurance included an ‘outside expert’ to review the research and question or offer suggestions about the findings (Lincoln & Guba, 1985). Working with two of my colleagues, who are also doctoral candidates, provided me the benefit of their research expertise to clarify my thematic findings and verify them against the field texts that were collected. Each peer was given unmarked copies of three of the transcripts, asked to peruse them and identify at least three emerging themes. Once this was completed we had informal conversations about why they chose the themes they did: what evidence was there to support their choices? Only then did I divulge my own findings, which produced further discussion in some cases. Because I frequently collaborate with these two peers in our teaching assignments, working together in this capacity created an environment of mutual understanding and cooperation that helped me scrutinize and re-evaluate my findings. The final means of ensuring quality in this study was to include dense descriptions of context to convey findings. Creswell and Lincoln and Guba all posited that providing detailed descriptions or multiple perspectives about a theme makes the argument for research quality even more persuasive.

**Ethical Considerations**

In order to ensure this study follows the standards of ethical research these procedures as suggested by Shank (2006) and Creswell (2014) were followed:
• An Institutional Review Board document was filed with Ball State University for approval.

• Participation in this research was strictly voluntary and participants were made aware that their answers would not be given to their administrators or in any way affect their employment.

• Participants were asked to sign a consent form that outlines the details of the study and how the information was used. Their names and the names of their schools/school districts were kept confidential and anonymous in the final report. Only the researcher knew the identity of these teachers in case there arose a need for further conversations for clarification or additional information. All transcriptions and information gathered through the interviews were kept secured in a locked file cabinet at the researcher’s home and will be destroyed within two (2) years (see Appendix C).

Summary

In this chapter I provided a detailed account of the philosophical underpinnings of this inquiry and the way it was designed and conducted. I began with an explanation of the epistemology of social constructionism and the interpretive framework of hermeneutics with a narrative inquiry method. Then the specifics of the study’s design and implementation were discussed and the manner in which the data were gathered through teacher interviews. These collected stories were then analyzed using methods of thematic interpretation. Finally, I described the quality criteria and ethical considerations used throughout this study. In the next chapter I present the findings of this inquiry and discuss the description and analysis of the field texts (data).
CHAPTER IV: PRESENTATION OF THE FINDINGS

The purpose of this study was to explore the teachers' perspectives about the classroom dynamics shaped by standardized high-stakes testing in the K-12 educational systems in Indiana. By conducting this study, I sought to understand the meaning that the teachers made of their teaching experiences and changes in the classroom dynamics since the advent of standardized high-stakes testing. Further, the research specific focus is on the teachers' preparation time, teaching strategies, and teacher-student interactions, which, in turn, define the classroom dynamics. Through interviews with seven K-12 teachers from four school districts, I gathered stories, which provide insight into teachers’ perspectives on classroom dynamics as they relate to mandatory standardized high-stakes tests. My interviews were guided by the following research questions:

1. What are the teachers’ experiences with the current classroom dynamics?
2. What are the teachers’ perspectives about role and influence that mandatory, high-stakes, standardized testing may have on their classroom dynamics?

To further understand these perspectives about classroom teaching, the following subquestions were used as the bases of the interviews:

1. Have teachers’ pedagogical approaches changed over the last twenty years? If so, how and why?
2. If the student classroom activities have changed in focus, in what ways?
3. Have teacher-student relationships changed? If so, in what ways?

In this chapter I first describe the participants in the study. Then I provide a description of data and an overview of the stories collected through the interviews. The emerging themes of pedagogy, curriculum, goals and outcomes, interactions with students, testing,
and accountability are interwoven in these stories as the participants responded to the interview questions. In addition, testing, stress, and accountability are addressed from further perspectives in later sections as related, significant subjects that emerged as interviews were conducted. Finally, I expand upon the themes (Leggo, 2008) and discuss their significance.

**Demographic Descriptions of Participants**

The teachers who participated in the interviews are long-term teachers, having been in the classroom since 1996 or earlier. This gave them the advantage of comparing classroom teaching before mandatory standardized high-stakes testing to the classroom of today where testing is ubiquitous. In order to provide thick description and the inclusion of a variety of teacher voices, teachers from four districts were chosen, each with a varying student demographic (see Appendix A). Additionally, teachers were chosen from three levels of education – elementary school, middle/intermediate school, and high school – so the data would be representative of all levels of public K-12 classrooms.

Teachers consisted of two from elementary grades, two from middle/intermediate school grades, and four from high school grades, including myself (see Table 1). The focus was on mathematics and English language arts, the two prominent content areas tested at all grade levels. While the number of participants was small, according to Clandinin, et al (2006) and Clandinin (2007), the number is significant enough to collect the narrative stories needed to obtain legitimate data.

While I hoped to include an equal number of mathematics and English language arts teachers at the middle/intermediate and high school level, participants tend to be skewed more toward the English language arts. However, between the two elementary
teachers, grades 2 through 6 had been taught at some point in their careers, and two of the
teachers interviewed, one elementary and one middle school, no longer taught in a
traditional classroom, but were assigned recently to teach remediation classes for students
whose test scores are low or failing.

Providing an appropriate and safe interview environment was important in this
study. As suggested by Connelly and Clandinin (1990) arrangements were made to
conduct these interviews at the convenience of the interviewee and in a neutral
environment with minimal distractions where both researcher and teacher were
comfortable conversing. This allowed for more honest and spontaneous responses, and
eliminated the fear of being over heard by an administrator or peer who might create an
awkward situation. Interestingly enough, most felt comfortable being interviewed in their
offices during a preparation period or in their classroom after school hours. None seemed
to hesitate answering any of the questions posed to them and several gave unsolicited
opinions on testing in general.

Table 1

<table>
<thead>
<tr>
<th>Name</th>
<th>Grade Level(s)</th>
<th>School Dist.</th>
<th>Subjects</th>
</tr>
</thead>
<tbody>
<tr>
<td>Donna</td>
<td>K-2, 4, 5</td>
<td>Nesta</td>
<td>math, ELA</td>
</tr>
<tr>
<td>Lois</td>
<td>2, 3</td>
<td>Olympia</td>
<td>math, ELA</td>
</tr>
<tr>
<td>Stewart*</td>
<td>4, 6</td>
<td>Olympia</td>
<td>math, ELA</td>
</tr>
<tr>
<td>Lynn*</td>
<td>6, 7, 8</td>
<td>Yankeeburg</td>
<td>math</td>
</tr>
<tr>
<td>Karen</td>
<td>11, 12</td>
<td>Dagmont</td>
<td>English</td>
</tr>
<tr>
<td>Mary</td>
<td>8, 10, 11, 12</td>
<td>Nesta</td>
<td>English</td>
</tr>
<tr>
<td>Shelby</td>
<td>10, 11, 12</td>
<td>Nesta</td>
<td>English</td>
</tr>
</tbody>
</table>

**Note:** *Indicates now teaching in a position created as a result of low or failing test scores.*
Data Description: Overview of Stories

Names of all participants and schools are pseudonyms. The data collected are in the form of stories told by the participants as to how they perceive standardized tests as a whole and as an ever-present aspect of classroom education today. To further understand these perceptions about classroom teaching, the following sub-questions were used to guide the interviews:

1. Have teachers’ pedagogical approaches changed over the last twenty years? If so, how and why?
2. If the student classroom activities have changed in focus, in what ways?
3. Have teacher-student relationships changed? If so, in what ways?

The data are presented here in context and organization of these sub-questions.

Have teachers’ pedagogical approaches changed over the last twenty years? If so, how and why?

Pedagogy can have multiple meanings depending on the context of its use. For the purposes of these interviews, I used the definition from Mortimore (1999), who defined pedagogy as “any conscious activity by one person designed to enhance learning of another” (p.3). This would include teacher lesson preparation, instructional activities, and teaching strategies.

Based on this definition, I began each interview by asking teachers to describe their current process for planning a lesson. Every teacher responded almost identically by saying they started by looking at the [Common Core State] Standards expected to be covered for their particular grade level and content area. These standards are academic skills-based expectations for students at each and every grade level that is currently tested through standardized high-stakes testing at some point during the year. Since there are a
plethora of standards to be taught at each grade level and content area, some teachers referred to looking at the power standards. In the way these teachers are using the term, power standards are considered the broader, more general categories that are set forth for each grade level and content area under which are numerous sub-standards to be met. In conjunction with the units of instruction, these standards (or power standards) are divided and assigned to the various units of study where they can be taught effectively. Mary stated, “We’ve created assignments that address those standards. We continue to teach units, but they’re driven by our power standards . . . These [are] the standards that are tested and are the most needed for students to be successful on the test.” Likewise, Lois affirmed,

... you first have to see what the standards are for your grade level and that particular subject, topic. And from there ... we do a lot of pre-assessing, pretesting so that you can see where the kids’ skills lie, what their needs are, what their weaknesses, strengths are so you know what portion of that standard really needs to be focused on . . .

The teachers at the middle and upper levels prepare in much the same way as Shelby indicated, “I look at [the] unit of study and look at the standards that we are focusing on. And then I prepare . . . the daily activities . . .” which for a high school English teacher usually include reading, discussion, and writing. For Shelby, and her fellow teacher Mary, the process of lesson planning becomes more complex since Nesta High School was labeled as a failing school when school ratings first began. This failure to meet the Indiana State Adequate Yearly Progress (AYP) requirements forced the implementation of TAP, a lesson creation-evaluation program that supplies multiple extensive rubrics for
lesson planning and implementing those lesson plans. So in addition to connecting the Common Core State Standards (CCSS) to lesson plans, Shelby and Mary had the expectations of the TAP program that needed to be fulfilled.

As a result of a standards-driven curriculum, several teachers indicated their schools used curriculum maps as an aid in keeping teachers of the same grade level/content area horizontally aligned. Stewart from Olympia Intermediate School related the following story as he described his school’s process of creating a curriculum map.

*Our task was to make a curriculum calendar and it really was based on what we were going to be tested on, what the students were going to be tested on the ISTEP test, and on the state curriculum. So it was the state standards, but we had to decide when we were going to teach those things [standards] and we also had to make sure we had covered pretty much everything by the time we took ISTEP.*

Lynn from Yankeeburg Middle School concurred with this procedure by stating, “*We as a mathematics department sat down and decided our scope and sequence based on what the state has told us will be on the first [and second] ISTEP and what will be tested overall.*” Lois from Olympia Elementary School also agreed, “*We have a curriculum map that has the standards on it and we mapped out 3-week periods where this is the standard and this is what we’re going to cover during this amount of time.*”

In structuring these curriculum maps, most of the participants remarked that the rigor of the curriculum expectations seems to have shifted so that what is now being expected of 3rd graders used to be taught in fifth grade, while sixth graders are now doing the work previously introduced in eighth grade and so on. And although the curriculum
maps keep them on the same schedule, none of the teachers indicated they must be on exactly the same page at the same time with their course-alike peers – the ‘cookie-cutter model.’ However, they did state that they were expected to stay within three to four lessons of each other.

Once the current process of lesson planning was established, each teacher was asked if this process had changed over the years. Every teacher admitted that their process of planning lessons for the day and for units throughout the year had changed. Donna, a seasoned teacher from Nesta Elementary School, remembered relying heavily on the textbook teachers’ manual in her early years of teaching. She would look at the content and the prescribed activities and from there pretty much taught in whatever manner worked for that lesson. With a sigh, Donna admitted,

> Ok, we use[d the] teachers’ manual probably more than we should have. For a long time it was pretty much the manuals. Now I know when I plan, personally, I [don’t] even spend much time with what the teachers’ manual said. I would look at content.

Donna also recalled teachers had the freedom to teach what they felt was important - which came down to what they liked to teach - and relied on personal teaching style to create lessons for all the content areas. Reflecting, Donna stated,

> This is sort of unheard of in education today because we did have so much flexibility. I thought that it really worked, because I felt in those days we changed things a lot more based on what we saw and how the kids were responding.

> Whether they were understanding it or not.
Karen recalled her beginning five years were spent mastering the content. 

“It was very much driven by the book, the play, the story, the poem, with not much emphasis on specific skills. [Now we] definitely focus on the skills. That’s been a huge transformation.” Likewise, Mary told this story, “. . . teachers used to go in and do what they like[d] doing. We had a teacher when I first started teaching at Nesta that loved poetry, so she had a 6-week unit on poetry . . . We don’t do that anymore.” Lois spoke of another change in lesson planning,

There is definitely more emphasis now on . . . the data. [That] part of it has really changed as far as you gotta do pretesting, you gotta see where the kids are, you gotta use that data from all of the assessments that you give and using that data more to guide your instruction . . . It’s got to be written down . . . Now it’s more strict, refined or structured.

Most attributed these changes to the introduction of common standards that are now required to be taught in preparation for standardized high-stakes testing.

Data and collaboration were key terms that were referenced in every interview. The flexibility Donna spoke of has been replaced by the priority of the use of student data and the expectation that teachers will collaborate with each other to decipher the data and proceed to write lessons that will improve the data in whatever areas are weak. Lois refers to this process by stating, [“We have] collaboration with other teachers as far as how are we all meeting this standard, meeting these goals, what are our results of our data.” Most of the interviewees referred to PLCs (Professional Learning Communities), team meetings, or common prep periods where they meet with their colleagues to collaborate on how to improve student learning and thus student test scores.
Linked to this student data analysis and collaboration are curriculum changes. According to teachers at the elementary and middle/intermediate school levels, science and social studies have taken a back seat to reading and mathematics. Art, music, computer classes, and PE seem to have all but disappeared in some schools. Steward commented in a disgruntled voice, “The year that I went back to fourth grade for one year, we stopped teaching social studies and science . . . completely so we could focus on reading and mathematics.” He added with a sarcastic laugh and tone, “If we’ve had any fluff, we’ve cut that out so we can just keep hammering away on these high-stakes skills.”

Donna concurred the same exclusion took place at Nesta Elementary. Answering my question about curriculum changes Donna stated, “I think I will have to say that mathematics and language arts are the two biggies. Science is making a big come back. Social studies, history is still taught but I don’t think it’s big at least in the elementary school . . . There is more emphasis on the reading.” Both these school districts also report recess time had been altered so more time can be spent in the classroom teaching for the test. Commenting on this classroom dynamic cut, Stewart explained,

*Recesses have been pared way down. We have a half hour at lunch and they take about 15 minutes to eat and then go out for 15 minutes. It used to be 20 minutes [in the morning] and almost 45 minutes for lunch and recess. But in junior high they have no recess.*

High schools have not been exempt from data and collaboration, although mathematics and English teachers have been more the focus than other content areas. Mary and Shelby both attested to the emphasis on test data collection and the expectation of collaboration between course-alike teachers to restructure lessons and curriculum so
every teacher is teaching the same scope and sequence using the standards as the guide to
develop each unit. These two teachers work at a school that has implemented the TAP
system to assist covering the standards through lesson planning and instruction. This
extensive rubric is the focus of Nesta’s professional development time for course-alike
teachers. During this time, Shelby explained,

[I] look at that unit of study and look at the standards that we are focusing on.
Then I prepare the daily activities, which generally include reading
discussion and writing. Once I kind of look at that general overview then I
specifically look at our TAP rubric and how that lesson fits into that rubric.

Mary described the same process of collaborating with teachers using data as the starting
point and proceeding to lesson planning with the TAP rubric.

Karen, on the other hand, described her collaboration differently. Dagmont High
School was chosen as one of the recipients of a National Mathematics, Science, and
English (NMSE) Grant funded by EXXON through the University of Notre Dame. So in
addition to collaborating with her AP peers at the high school, Karen also collaborates
with teachers from several other high schools across the state. Laughing at the following
response, Karen explained,

We go to Indy and we do just like you would do with the exam, grading – we’re
grading hundreds of exams. Last weekend we did an all day session. Then we also
spend an entire week in the summer in Indy workshopping, which is good stuff.
And then a fall conference. [Then] they calibrate us.’”

Karen’s participation in this NMSE program adds a whole new level to utilizing data and
collaboration for planning lessons and teaching strategies.
Curriculum cuts have been experienced at the high school level also. To the chagrin of literature teachers, several novels that were once the backbone of high school literature have been ‘dumped’ to make room for the non-fiction selections mandated as preparation for the high-stakes tests. Karen recalled, “I used to do a whole Hell unit which was a little bit of Paradise Lost and Dante’s Inferno and No Exit and The Great Divorce and Baudelaire . . . I loved it and it’s like well that has no place on the exam.” Additional works of literature that Karen has dumped include Their Eyes Are Watching God and Grapes of Wrath, because they simply do not fit into the testing structure.

Although Mary and Shelby gave no specific titles, both sounded disappointed that fiction works had been replaced by non-fiction readings because that is what the test called for.

Further deletions from the curriculum include drama and creative writing. Karen’s voice lamented these losses,

You know we used to take something to the stage. We used to do this creative ‘ok you’re going to imitate this and do that.’ . . . And there’s a lot of times I feel, oh man, some of the fun stuff I’ve had to give up . . . You know it’s not going to be measured . . . on the test.

Shelby and Mary both expressed disappointment at the deletion of creative writing in their classes.

Fun and creative learning activities like these that taught students the life skills of public speaking and personal expression have disappeared because there is “no time or place” in the curriculum: they are not tested. As an English teacher and theater director I have experienced these changes in curriculum as the theater and Public Speaking classes I teach have come and gone depending on the master schedule. If a course is needed to
fill a slot for students, these classes are offered. If there is no need, there is no class. The focus is constantly to utilize data and collaboration as a tool for more successful teaching, in other words, higher scores.

Curriculum restructuring through data and collaboration brings about pedagogical changes in teaching strategies. None of the teacher participants lecture anymore and few use the drill and skill activities so common to education in the past. Most have shifted to student-centered, group work where critical thinking skills become the norm. With the introduction of technology into the classroom, instructors now incorporate computers, iPads, iPods, cell phones and whiteboards into classroom instruction in ways that make students work together to discover answers rather than regurgitate information from a text. Donna explained that even for her K-2 students, “I want them to be thinking, not guessing . . . I want them to be problem solvers.” Lynn spoke of the lessons she planned that allow her students to work in small groups and take multiple attempts at solving mathematics problems. High school English teachers Karen, Mary, Shelby, and I have all restructured our classroom instruction to include more lessons that call for critical thinking and problem solving. Examples of these changed activities from all levels will be discussed as the next research question is considered.

**If the student classroom activities have changed in focus, in what ways?**

Curriculum restructuring calls for changes in teaching techniques as well as content. The day of the straight lines of desks all facing the front of the room with students taking notes while the teacher lectures exists only at a bare minimum and only when absolutely necessary. For many of the teachers I interviewed, their classrooms are now organized in small groups of desks – pods – or some other configuration that allows
students to move freely between desks and groups. This rearrangement of the classroom accommodates new learning techniques that are student-centered and collaborative and provide periods of movement to replace the stricken recess time. Donna, realizing recesses have gradually disappeared, builds movement into her lesson time. She remarked,

*I got to the point where I just gave my kids a 10-minute restroom break so they could get up and socialize and get out the heebie-jeebies and then get back to work. And I still think it’s a necessary part of the day . . . This is where we come back to teaching technique in knowing that the children don’t have recess, teachers try to plan their lessons so there are more opportunities for getting up and moving.*

Stewart and Lois both used a pair and share technique to get their students thinking and talking to each other to solve problems. Stewart described this technique with laughter because he admits he was not comfortable with it at first. He said,

*It’s a little bit different in language arts than in mathematics, but there’s a method we call pair and share and the students are set up in either small groups, their desks are in small groups of four or six . . . or in what I call double rows so that I can at any time say I want you to turn to your partner and ask them this or tell them this or, you know, this person will go first, this person will go second.*

Lois described this technique similarly, but added her students were sometimes asked to move to another pod to share. Lois also explained, “*We do a lot more partner work because when you get in a group you can still lose one. I think it forces that one who is not included or the lower student to have to be involved.*” For Lois this type of student
collaboration is a technique she uses frequently. Stewart and Lois both agreed this technique not only gets the students to listen more carefully, but also makes learning active rather than passive.

Power teaching, as Lois called it (or what used to be called rote learning) has become popular at the elementary level. This technique, also known as call and response, is used to quickly teach vocabulary and concepts. Lois provided this example:

*The teacher has words and/or pictures on cards that are held up throughout this exercise.*

*Teacher:* “*Area.*”

*Class:* “*Area*”

*Teacher:* “*The space inside a shape.*”

*Class:* “*The space inside a shape.*”

*Discussion follows and then the teacher proceeds to the next word.*

Lynn uses small groups in her middle school classroom for students to work together on mathematics problems. This is her story:

*I do them [students] in partners so they’re like-ability partners and [they] go up and get a problem and they have to mark them. They get a clear board so they can write over the top with dry erase. And then they come and show me and if they’re right they go get the next one, which might be a little bit harder. But if they’re wrong, they have to go back and have a conversation about it.*

With this technique of teaching, Lynn witnessed her students having conversations to solve problems, learning from each other and from their mistakes.
Lynn also used manipulatives to introduce new mathematics concepts rather than trying to explain a new algorithm in its abstract form. Of this process Lynn explained,

*I often get manipulatives of some sort in their hands, or a way for them to make an abstract idea more concrete. For example, when we’re learning how to multiply fractions, they find a fraction of a fraction using Fraction Islands, which is a geo board and it uses the area model of a fraction. So they find a fraction of a fraction. And then I say, ‘Hey you know what? Finding a fraction of a fraction is the same as multiplying two fractions.’ And then they realize that ‘of’ means multiply.*

Many of Lynn’s teaching strategies were pedagogically constructionist, allowing her students to discover mathematical mechanisms rather than listening to a teacher’s explanation. Once discovered, discussion followed. Lynn asserted that her planning changes came as a result of her coaching position as she taught teachers how to plan more effectively; but she also admitted she wants her students to have seen every type of question/problem that the ISTEP+ test will pose before the test is administered so her students will not panic looking at something they’ve never seen. Lois concurred with this method of instruction in her 3rd grade classroom where she prepares her students for the ISTEP+ and IREAD.

Reading, reading, and more reading is a ubiquitous theme at all grade levels and in all content areas. The focus on literacy has been the catalyst for many curricular changes and teaching techniques, especially for English language arts. This begins as early as kindergarten when, according to Donna, students are asked to point to words as the teacher reads them aloud. Our conversation follows:
Donna: There’s even a reading component in the kindergarten [tests].

Interviewer: Are they read to?

Donna: No, they read. Yeah! At the beginning with the reading it’s really very basic; it’s pattern books. The teacher, which is called ‘print concepts’ we read and there is some repetition, but we’re watching things like are they doing the left to right? Can they point to words when we read them and then can they follow a pattern? Do they know things like capital letters, punctuation, or things like that?

Donna also shared her experiences with the kindergarten mathematics exam:

The mathematics . . . it’s counting from 1 to 100, how far can you go, the missing number – the kids have three numbers 1, ____, 3 – but it’s kind of interesting because when you get into the teens or much higher it might be the first number, the last one, but what is the missing number.

By 3rd grade students are expected to pass the IREAD test demonstrating they are reading at 3rd grade level and are ready to advance to the fourth grade. If they do not pass, they must either attend summer school and take the test at the end of the course, or repeat 3rd grade and attempt to pass the test again at the end of the school year. Lois states rather discouragingly, “We are learning to read, not reading to learn.”

This emphasis on reading continues through the middle and upper levels as well. Grades 6, 7, and 8 all take the ISTEP+ exam. This state mandated exam tests mathematics and English language arts. Both require reading comprehension and inferencing to complete successfully. However, at these grade levels there are no consequences for failure, other than remediation the following school year. Lynn confirmed this when I asked, “Are there consequences if they don’t pass?” Her response,
“Not at this level. Only the IREAD has a consequence.” At the high school, however, students encounter a graduation exam given at the end of the 10th grade year. Again this exam tests mathematics and English language arts, both requiring literacy. If a student fails the designated exam at the end of the 10th grade, he or she must retake the exam – up to five more attempts are allowed – in order to earn a diploma. If the student still fails the exam, there is a waiver process but the requirements are difficult to meet. Thus the ability to read, comprehend and infer has become the mantra of every teacher in public education. Consequently, this theme emerged in every interview conducted.

Having served as a member of the committee responsible for Indiana’s standardized test and its cutoff scores, Mary says she understands the importance of being able to read closely and critically in order to be successful on the test. Mary uses this process in her high school English classes as she creates ways for students to interact with the text:

Text is really, really important to me and looking at text closely, making meaning of text. And so I think they [students] have to work with that. So the activities I plan are ways that students either individually - often in groups – look at text. I also track their discussion or work with text. But it is always based in the text so I have a lot of small group work. I also have homework assignments. I never, ever assign reading without activities that go with reading. I don’t think kids read deeply enough or slowly enough. And so every assignment has them doing something where they interact with the text. It could be a double entry journal; it

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5 Currently the Indiana graduation exam is in flux. The graduating class of 2016 needs to pass the End of Course Assessment (ECA); the class of 2017 will need to pass the revamped ISTEP; the graduating class of 2018 and beyond will be given a new test that is still being created.
could be just responses to texts; it could be pulling our significant quotes, or following a theme . . . or motif through the text.

For Mary writing is secondary – necessary, but always based on the reading skills that must be cultivated first. “It’s a reading test. And really the writing is inconsequential.”

To this end, high school English teacher Karen uses both small group and whole group techniques when she parses out the meaning of pieces of literature. Karen begins with a short lecture and discussion on the topic to be studied that class. Small groups are then assigned short segments of a piece of literature and given 15-20 minutes to discuss, analyze, and interpret their assignment. She then brings the whole class back together and each group shares what they have discovered. Members of other groups could join in to add to the discussion or question what had been shared. She said of this teaching style, “I like to lead them in inductively. I am not a deductive sage on stage – hear this and now plug it in.” However, none of this unit planning is random. Karen carefully scaffolds her lessons so that one lesson built on a previous lesson until the entire unit has been created, taught, and learned in a logical order. One of the stories she shared with me relates to teaching John Donne’s “The Flea” in terms of metaphysical poetry. To her class, “This is metaphysical poetry. You come up with a recipe. You tell me what should go in there.” With this technique, Karen created an environment where students must critically think and problem-solve through collaboration. She allowed them to discover the ‘rules’ of the poetry structure through inductive inquiry. Of course, individual assessment was also a part of her lessons, but only after students had the chance to ‘practice’ the standards skill as a group. Through this technique of teaching, Karen prepared her students for the high-
stakes tests for graduation and Advanced Placement (AP) exams that determined advance college credit.

Shelby takes another approach to teaching in her classroom, because she feels both reading and writing are important skills to learn. She strategically plans the content and direction of her lesson then begins with a short You Tube video or movie that sparks the discussion. Although she sometimes lectures to her classes, these short lectures grow from the students’ questions and comments. “It’s more inquiry-based and more focused on what the kids need rather than what I think they need. Now they’re asking questions and we’re having group discussions.” In this way she coaches and steers them to her predetermined destination. Note taking is an integral and mandatory activity. Every unit ends with a major writing assignment, which is taught through modeling. The first essay is started with teacher assistance and step-by-step instructions; the second essay is started together as a class and then completed by the student; the third essay is totally student composed, with teacher editing as needed. In this way Shelby is able to teach both reading and writing standards in a way that connects the two.

‘Exit tickets’ are a common technique among teachers at all levels. These are short exercises teachers ask students to complete in the last 2-3 minutes of class, or segment of class, that will indicate to the teacher whether the student has comprehended the lesson for the day. The teacher can quickly peruse these – no grading required – to acquire feedback to prepare for the next lesson. Every one of the teachers interviewed used some type of exit ticket at the end of a lesson or class period as a checkpoint for learning. As an English teacher this is a technique I frequently use both during class and
at the end to determine whether my students have grasped the concept of the lesson or whether I need to re-teach during their next class period.

Depending on the availability of technology in the school, some of my participants utilize computers, iPads, iPods, cell phones, and/or whiteboards as an interactive way of teaching. Stewart expressed his discomfort with technology in the classroom by admitting, “We have sets of iPads that you can check out and use for lessons – which I wasn’t quite brave enough to do this last year.” But he added through his laughter, “I was hoping to get into that, and I’m hoping to have a set of iPads to use with these small groups.” Donna’s classroom also has technology, but on a smaller scale – iPods. “We don’t have a classroom set yet, but it’s coming little by little. All the primary classrooms have a little computer lab.” Personally, because my school is a 1-to-1 school I use Google docs as a way for my students to collaborate outside the classroom. They can use a chat room to discuss a topic I’ve given them, write a paper collaboratively, or create a presentation together simultaneously. The history of each document shows me who has contributed what work. Because students can work together outside my classroom through these documents, I can use my classroom time for activities and lessons that cannot be accomplished outside my walls.

These interviews indicate teachers perceive that high-stakes testing has caused significant changes in the way classroom activities are conducted. Classrooms are no longer silent vaults where a droning teacher holds students captive until the lesson is over. In these schools, classrooms are noisy, animated arenas of energetic students who are learning to educate themselves through discovery, critical thinking, and problem solving. The teacher’s role is now that of catalyst and facilitator, not dictator and sage.
Nonetheless, Donna, Stewart, Mary, and Karen all agree that for them part of the fun of teaching has disappeared. Games that teach are frowned upon as frivolous and non-academic and even with the new classroom techniques that are more group-focused, it has to be business all the time.

**Have teacher-student relationships changed? If so, in what ways?**

For many educators teaching includes forming relationships with their students. Finding common ground or student interest becomes a way of opening a door that allows trust and encouragement to flow between the teacher and the student. But cultivating this type of relationship takes time; time that mandatory testing has infringed upon with its weighty accountability on students, teachers, and schools.

As I discussed student-teacher relationships with my teacher participants, many of them stated their ability to make connections with their students had not changed. Most indicated they still feel relationships with students are as important, if not more so, than the content being taught. For Lois, elementary students can be needy. Of her relationships she stated,

> I don’t think that’s changed for me. To me that’s still an important part of teaching . . . They have emotional needs and you’re with them for seven or eight hours a day. The ones that are always hugging you, they need hugs. I’m going to give them hugs. I don’t want them leaving here hating school. And sometimes school is the only place they receive this kind of attention.

Donna feels much the same way, but her relationships with her students extend beyond hugging to understanding their cultural background and its significance to their education. Teaching to a diverse population Donna explained,
I think good teachers really understand that you’re really not going to be able to get through to some students. . . But that personal relationship is a really important part – that trust has to be established before your credibility as a teacher is really established with a child.

Although Shelby admitted she stays away from students’ life ‘drama,’ she takes a part of every Monday morning to converse with her students about their weekend aesthetic experiences and sports and music events.

_I tell my kids I want them to be cultured people and to have a well-rounded life and so every Monday we talk about the aesthetic or cultural experiences they’ve had in the last week. . . They’ll tell me if they went to a concert or if they saw a play, or if they had some ethnic food. . . And then I always ask them about athletic contests. So I get to know a slice of their lives._

Shelby did admit, however, she tends to be more honest, almost blunt, with her students now that testing is mandatory. In the past if a student would tell her he or she was applying to a major university and he or she hadn’t passed the graduation exam, Shelby would nod and smile saying, “Let me know how that works out for you.” Today when she hears these kinds of statements from failing students she is more inclined to tell them they are not going anywhere without a high school diploma. She feels her blatant honesty with students is needed to get them to understand how important these standardized high-stakes tests are, and failing them has major consequences.

Although each of my participants acknowledged there are teachers who become more personally involved in students’ life drama, these participants preferred to remain
distanced from that part of students’ lives, unless they felt the student was in danger or was a danger to him- or herself.

As far as these teachers are concerned, mandatory high-stakes testing has robbed them of some time to spend getting to know their student, but they find other means to accomplish the same end because those relationships are so important to them. Shelby summed up this attitude well when she stated, “I have found that at every level – at every socioeconomic, every level of intelligence – if you treat people with respect, you will generally be treated with respect.” It is this respect-filled relationship toward their students that was exhibited from all the teachers who were interviewed. None abandoned this significant aspect of teaching to allocate more time for teaching to the tests.

Further Findings

The following findings also emerged as significant themes. And although they do not directly correlate with the interview questions, they can be related to the phenomenon being researched. As each of the teacher interviews was conducted, it was inevitable that the standardized high-stakes tests emerged as a topic of focus. Teachers could easily explain the changes that have occurred in their classrooms as a result of mandatory testing, but the conversation always seemed to turn toward their perceptions about the tests themselves. Several significant themes became apparent in these conversations that need to be considered.

**Excessive testing.** Although none of the teachers were opposed to standardized testing in general, most of them expressed the feeling that the amount of mandated testing is out of control. There are so many tests now required for students throughout the year at all grade levels, teachers find themselves teaching to the test, rather than teaching to
produce well-rounded individuals who can be an asset to the global community. Donna, a K-2 teacher, spoke of the pre-tests and post-tests required at the beginning and end of each unit, the former to determine what the students know and the latter to determine what more they have learned.

*If they’re below benchmark [on the pre-test] they’re a ‘red.’ If they’re a ‘red’ the ‘alarm bell’ goes off and they are put in a group with intensive support. And the intensive support is based on what it is they don’t know. There’s ‘yellow’ kids. They’re kind of the borderline, some tests they passed, some they didn’t pass. And then green, they’re great; they’re on level or above. And so our goal is to move them up [by the next test].*

Everything in between is structured specifically to ensure students’ final unit test scores are sufficient to pass the standards the unit covered.

Lois, the 3rd grade teacher, admitted some of her tests are strictly for the sake of practicing how to take a test: the format, vocabulary, and reading directions. She justified this approach, "*Some of taking those tests is just test taking skills.*" And laughed as she added, "*It’s not their knowledge.*" Likewise, teachers at the middle/intermediate and high school levels criticize the battery of tests required takes weeks from their teaching curriculum, from my experience making it almost impossible to teach what needs to be taught to pass the test, let alone the remainder of the curriculum. The 3rd and 10th grades seem to be the hardest hit. In the 3rd grade students are required to test on the ISTEP+, IREAD, Acuity, ISTART, the WIDA if they are ELL students, and in many districts the NWEA three times a year. The 10th grade students must test on the PSAT, NWEA three times during the year, the ECA and/or ISTEP+ (see previous endnote), Acuity,
Accuplacer, and the WIDA if they are ELL students (see Table 2). Students in these two grades find themselves caught in a seemingly never-ending cycle of tests, as one testing window closes only days before another opens. Add to this list, exams for AP, IB, SAT, and retakes of the ECA/ISTEP+ for upper class students and the testing cycle perpetuates.

Yankeeburg High School provided a chart indicating the testing windows for each test throughout the year (see Appendix D). Although it represents only one school district, based on my interviews it seems representative of the schools of the teacher participants.

**Stress, stress, stress: School, teacher, student.**

Donna: “A lot, a lot of pressure on children.”

Lois: “Well you feel that pressure more and you’re really wanting everybody to be accountable, everybody to be doing their job so that your school’s scores are good.”

Stewart: “I think it’s increased the stress of students and teachers alike... and I think it’s a negative stress.”

Lynn: “I felt for a while kids overly stressed about testing because there was so much pressure put on...”

Karen: “It has been tangible – the stress.”

Mary: “There’s been a lot more pressure on teachers. The English department has felt it the most. And no matter what they do in our school, it’s very hard to alleviate that pressure... It is very, very stressful.”

Shelby: “We feel a lot of pressure because we want the kids to do well.”

Every teacher I interviewed, regardless of the grade level taught, used the word “stress” and/or “pressure” when asked what major changes they have observed or experienced themselves within their cohort of teaching peers. These statements are not
unique to the teachers who were interviewed, as I have heard these same concerns more times than I can count in casual conversations with teachers from all over the state of Indiana. And as a teacher myself, I experience the stress and feel the pressure of preparing students to perform well on high-stakes tests.

Looking specifically at teacher stress, Lynn claimed, “Third grade is completely over tested.” I suggest the 10th grade is also over tested. The teachers of these two grades therefore feel much pressure, because they are endlessly tested throughout the year with high-stakes tests that actually have consequences for the students as well as the teachers. The IREAD test in 3rd grade determines promotion to the 4th grade, while the ECA/ISTEP+ scores in the 10th grade determine graduation and the PSAT scores determine National Merit Scholars and federal scholarship funding for students. Again mathematics and English are the basis of the exams, so these teachers are in the frontline of the testing battlefield.

According to Donna, student stress is also tangible. She claims she has seen the joy and excitement of learning disappear from her K-2 students because so much time is used for testing. For them (students), “... it’s [testing] become a way of life. And that’s very, very heartbreaking for those of us who’ve been in teaching for a while.” High school teachers Karen, Mary, and Sue concur that the “fun” has been stripped from learning and replaced with a constant expectation of performing well on some sort of test.

**Accountability.** On a positive note, the majority of teachers interviewed confirmed they liked the accountability imposed by standardized high-stakes tests. Donna recalled from her early career days, “Classrooms were more self-contained. Teachers taught content they were comfortable with and enjoyed teaching. They frequently ‘stole’
ideas and lesson plans from other teachers, sometimes modifying them to fit their own needs.” Some participants felt that before testing there was no accountability to students or administrators for the skills being taught and learned in the classroom. Donna recalled,

*There was a time very early on when we were more self-contained and people were truly ’stealing’ [lessons]. But some of those people retired and are out and there’s no room for that in education any more... There was not the accountability by the administrators for the curriculum like there is now.*

Mary also commented, “*When you’re not tested you can fly under the gun a little bit more. And you can kind of not be as good.*”

The mandate of standardized high-stakes testing has changed this type of teaching/learning. While teachers still have autonomy to teach with their own styles, the use of standards requires them to cover the same content skills. Mary claimed her teaching is more “intentional,” explaining she decides what standard(s) will be covered in each lesson and then prepares activities that accomplish her goal. Mary and Shelby acknowledged their lesson planning has become a “tighter” process through collaboration with other teachers in the same content area. Furthermore, they expressed that these two aspects of intentionality and tightness led to stronger lessons and helped improve the teaching of weaker teachers.

Curriculum mapping, also called horizontal articulation, was common and expected of most participants. These plans of instruction help keep grade/content-alike teachers on track teaching the same standards at approximately the same time. Stewart explained how his grade plotted out their map,
Stewart: It was based on state standards, but we had to decide when we were going to teach those things.

Interviewer: Were you expected to be on page 3 with every other teacher or just on the same concept?

Stewart: I would say the same concept... You needed to be pretty much within five or six lessons of one another, which most of the time we were able to do.

Shelby and Mary reiterated the benefits of the TAP system in helping keep their English department on track, “We look at the unit of study and look at the standards that we are focusing on... And then once we kind of look a that general overview we specifically look at the TAP rubric and how the lesson fits into that rubric.” The rationale is that by using these curriculum maps within a content area/grade level, teachers are held accountable for teaching the same standards to ensure there are no gaps in student learning when it comes to exam time.

Although accountability seemed to be a positive aspect of standardized high-stakes tests among these teachers, the use of the tests scores for other types of accountability was quite the opposite story. All of the teachers agreed that using test scores to determine the effectiveness of a teacher and the status of a school’s or district’s worth was not only unfair, but also inaccurate. Mary, who teaches English at a school with a large ELL population, stated,

We’re held accountable for those low level [performing]... and struggling students... Because you have a needy population you get dinged, you get penalized. I still think tying test scores to school grades and to teachers’ salaries and teachers’ evaluations... I just think it’s wrong.
Furthermore, Lois believes one score does not determine what a student knows or is capable of. She commented,

\[\text{. . . so much rests on one measure. To me that’s not always a good thing when you’re taking one piece of the puzzle and you’re going to try to see the whole picture of the child based on one piece. . . I don’t think you can base a child’s success or failure or a school or teacher or a district on one piece of the puzzle.}\]

These sentiments permeated the conversations I had with all the teachers interviewed and have been expressed to me as a teacher from other educators during school conversations.

**Expansion of Themes**

As Leggo (2008) noted, the next step in thematic analysis is expansion of the themes where the researcher draws connections and proposes meanings of these themes through ‘reflection’ and ‘imagination.’ This analysis of my data began during the process of interviewing. With each different teacher interviewed, I began to see patterns forming in the information collected. As these patterns emerged I created a list that would help me organize the writing of this chapter. The digital recordings made of each interview were transcribed verbatim and crosschecked with the recordings in order to ensure accuracy. Once the transcripts were complete I read through each one, carefully color coding sections that dealt with pedagogy, curriculum, goals and outcomes, interactions with students, testing, and accountability. These became the major themes that emerged.

Throughout the research process, it became evident that mandatory standardized high-stakes tests have made a significant impact on the students, teachers, and schools in this study. In seeking to discover exactly how testing has created such major changes, I found the participants have made strong connections between the specific standards for
their content area(s) and grade level and the pedagogies used in the classroom. These connections resulted in an overarching theme: Standardized tests in themselves are not bad; how they are administered and how the data are used is questionable. To better explain this overarching theme I will develop a set of sub-themes exploring the significance of consequences that occur in the wake of the current testing practices in Indiana. But first I present a review of those practices.

**Current testing practices in Indiana education**

Today’s schools exist in a testing environment. As described above, students begin the testing cycle as early as kindergarten and continue through their high school graduation. Members of the State Board of Education initiated this cycle in an effort to improve the education of Indiana students through standards and high-stakes tests (Indiana Department of Education, 2015c). As a result, a system of standardized high-stakes testing was implemented to assess students at every level and hold teachers accountable, especially those who teach English language arts and mathematics, the two content areas deemed necessary for all students to learn in order to be successful. Based on a list of learning objectives for each content area and grade level, these tests were mandated for all public schools each year during a window of time set by the state.

The state of Indiana, in compliance with federal regulations, requires every public school district to demonstrate improvement each year in several areas including attendance, test scores, types of courses offered, and graduation rate (high school only). The results of these factors determine the grade the district and the individual schools are given, which then reflects the ‘value’ of the education received in the district and at each specific school. This is directly linked to federal and state funding given to the schools in
the future. These grades also create public perspective about districts and schools, which in turn affects student enrollment and again state funding. Thus, administrators find it essential to maintain high standings in as many of the aspects as possible, putting the onus on the teaching staff to produce good test results and as few failures as possible.

**Significance: The Consequences**

The shift of responsibility for high tests scores to the classroom teachers was not without consequences. Teachers would now need to make adjustments in their daily lessons and class activities to fulfill the administrative expectations.

**Changing pedagogy and stress.** Knowing the stakes are high, teachers work to improve the area they can impact most, namely test scores. Although only 20% of the school grade is based on test scores (Indiana Department of Education, 2011b), data must show an overall improvement of the students being tested. This includes special populations of students who have learning disabilities requiring Individual Education Plans (IEPs) or are English Language Learners (ELL). In compliance with the federal Individuals with Disabilities Education Act (IDEA), Article 7 of the Indiana Code requires these populations to be placed in the “least restrictive environment” for their educational needs (Indiana Department of Education, 2015a). Therefore, many of these students are mainstreamed, making classroom teaching a challenge in differentiating instruction to suit the needs of all students and still adequately cover the material students need to learn to be successful on the tests. These significant changes and demands in pedagogy create stress on the teachers.

Stress may be exceptionally high for mathematics and English language arts teachers since these two content areas are the foundation of all standardized high-stakes
test scores. Other content areas may work with students on close reading, reading of non-fiction texts, and mathematical calculations as they apply to their content. But in the end, it is the mathematics and English department teachers who are pressured to produce high test scores from their students. This imbalance of responsibility seems to create more tension and stress on specific content teachers. Mary and Shelby both stated their entire school is supposed to be working toward improving scores, but the reality is the school grade rests on the shoulders of the mathematics and English teachers.

**Changes in student activities and focus.** Today’s students experience much stress as they are squeezed under the pressure of administrators and teachers, as well as their parents, to excel academically. Comments from my own students suggest that every assignment completed must receive a top grade and every missed test question seems to shout ‘failure’ to these students. In many cases I have consoled students who have missed only a couple points on an assignment or exam. “*My parents will not be happy with this grade. They’ll kill me.*” is the most common distraught reason I hear that explains their concerns. And while I doubt their parents would actually commit a criminal act over a grade, the thought of disappointing their parents holds much weight.

Stories from the participants in this study illustrate, likewise, schools have become a place where students jump through the testing hoops in order to progress to the next level whether they have actually learned the material or not. The excitement and joy of learning have all but disappeared from the classroom since there is no time for activities that teach content not tested. Stewart remembered when elementary students learned science through hands-on activities in outdoor classrooms where they studied
insects, trees, birds, gardening, mapping, and cultural events. Shaking his head in
disappointment,

At our building we actually built a nature center in the back – took part of the
playground and converted it to a nature center. And we used to spend a lot of time
with kids out there working building paths and planting things in the garden and
identifying things.

To this he added, “There wouldn’t be any time for that kind of stuff now.” Lois, who
teaches in the same district concurred that today her elementary students are lucky if the
curriculum allows science and social studies to be taught at all. Karen regretted not being
able to “take something to the stage,” while Mary laments, “We don’t have teacher room
for electives [classes]. . . We ha[d] these activities that we like, that were fun, and that
were engaging, but they really didn’t have a lot to do with the standards.” Mary’s
example came from a unit on Lord of the Flies,

We would read Lord of the Flies. Then we. . . kids would all discuss if they were
on an island, what would they [do], which was a cool activity, fun, and it’s
engaging. But it didn’t necessarily work with the text and it didn’t move us ahead.
. . . it didn’t meet the standard.

Some schools have experienced a cut in recess time or it has been eliminated
completely to allow more time to prepare for the tests. Again, Stewart’s reference to this
change,

Recesses have been pared way down. We have a half hour at lunch and they take
about 15 minutes to eat and then go out for 15 minutes. It used to be 20 minutes
In the morning, almost 45 minutes for lunch and recess. But in junior high they have no recess.

This alteration in student activities is questionable given the attention span of young students and the need for movement for physical development.

Test anxiety is also a major concern, even in the early grades. From my testing session of the PSAT for 10th grade, I have witnessed students become physically ill and ask to go to the school nurse shortly before they are to begin the test. Class and school attendance on test days suggests some students possibly avoid attending school on these days, hoping the test will go away and they won’t have to take it. Still others cope with their stress by marking random answers or guessing just to get finished. Lynn recounted an incident of this, “I had a very bright boy who sat in here this morning [test day] for his writing prompt and wrote one sentence. And that’s all he wrote.” When she confronted him about his lack of writing, his response, “Oh I can’t think of anything.” These types of students’ scores are seldom adequate and many times require a test retake of some sort.

Consequently, for these students the stress factor may become compounded.

By the time students reach the 4th grade they have been tested to the point of burn out. Many students become apathetic and ‘test-numb,’ and see no purpose or value in scoring well on any test, like the student Lois described above. Donna adds that every time she announced a test, “You can see the looks on their faces. ‘Are we going to go through this again’? For some of them it’s becoming a way of life.” This becomes a major concern especially at the high school level where students must pass the ECA/ISTEP+ graduation exam to qualify for a diploma and now the PSAT and/or Accuplacer exam to be considered for federal scholarship money.
The importance of high test scores seems to promote cheating among even the brightest students. From my classroom experience I have confronted students multiple times with incidents of copying, plagiarism, and even turning another student’s assignment in for their own. Our conversations were this,

Teacher: Why is this assignment exactly like Johnny’s?

Student: Because we worked together on it.

Teacher: This was in individual assignment, not a group project. So why did you work together?

Student: Well, actually he gave it to me because I didn’t have time last night to complete it (for whatever reason).

Teacher: So I should give you credit for another student’s work?

Student: No, but if I get a zero (or failing grade) my parents will punish me.

Teacher: Then next time do your own work or come talk to me if there’s an issue.

Some of my peers have caught and reported students to our administration who used their cell phones to take pictures of tests and send them to their friends, usually an act of reciprocation for a former test share.

Still another consequence of changing student activity focus is seen in the elimination of classes that encourage expressive and creative arts. Classes in art, music, creative writing, and drama have been all but eliminated in elementary schools, unless the classroom teacher can carve out a small piece of time to spend on these. Stewart says he constantly hears his students say, “We never do anything with art.” This comment is followed by Stewart’s explanation, “We have a period that’s called ‘Explorations’ . . . for a while it was called CAMP because it involved computer, art, and some other things.”
Now we have ‘specials:’ media center, library, phys. ed., music and computer lab.” But they are offered only once every four weeks for 45 minutes. He also recalled, 

_We used to have a fifth/sixth grade musical every year at Christmas and that’s been cut out. We also used to do Readers’ Theater-type things, but we were discouraged from doing too much because they wanted us to keep doing focused reading groups._

Stewart stated with a dejected expression, “We don’t have time.” At middle and upper levels these expressive arts are harder to incorporate since Indiana requires a specific number of courses in mathematics, English, science, and social studies. Many students have no room in their daily schedules to enroll in art, music and drama; and English teachers can’t afford time to teach creative writing. So class offerings in these areas are slowly fading from education. Mary stated, “We’ve moved away from more of the creative kind of process where students wrote creatively. . . kind of the expressive writing and we’ve really narrowed our focus to understanding informative text.” Shelby concurred by adding, “We do much less creative writing, we hardly do projects at all any more, and we show very few movies.” Shelby continued, “It’s all about reading text. . . being able to infer ideas and explain how they did the inferencing.” By eliminating these types of classes, students can focus more on tested content, but at the expense of creating a large gap in a well-rounded education.

**Data: Too little too late.** Certainly all this testing provides a plethora of data for the now expected data-driven teaching process; unfortunately, these data received from the state mandated tests comes too late to be really useful. The majority of these tests are given in the spring, and rightfully so to allow students and teachers to cover the material
and standards tested. However, testing windows do not close until May 6 for ISTEP+ and June 1 for ECA (Indiana Department of Education, 2016), so results cannot possibly be returned much before school recesses for summer. This leaves little or no time for teachers to analyze these data and implement changes that will help instruct the students whose test scores are inadequate. The teachers of the following grade may benefit from these data, but student improvement in the current grade is lost. So although these data that are produced by the standardized high-stakes tests might be extremely useful in improving student learning, little is gained from it because of the time lag between taking tests and receiving results. Additionally, the tests themselves change from year to year in content and format. This alone may not be a problem, but in most cases these changes are not relayed to the teachers until late in the school year. Stewart recalled the changes in the ISTEP+ for 3rd through 5th grades one year. The state of Indiana announced there would be a new ISTEP+ for the spring of 2015, but no information was available to the teachers until two weeks before the testing window opened. At that point it was announced that the test would take between 12-14 hours of student/teacher time to administer. “The governor had a fit and everybody had a fit so they [the state] ended up cutting out the next half of it [the test]. So how valid this is going to be? I have no idea.” Shelby concurred with this sentiment, “We need to have the same test for a number of years so we can actually look at data and figure out what’s going on. . . I don’t know how they think they’re going to show growth or how we can see how we’re doing if they keep changing the tool that we use.”

Interestingly, student consequences for failing most of these tests are non-existent. When asked, sixth grade mathematics teacher Lynn affirmed that the IREAD test given in
the 3rd grade was the only test she was aware of that held any consequences for failure in grades K-6. As a high school teacher, I know from experience there are few consequences for failing state exams at the upper levels, with the exception of the ECA/ISTEP+ exam that is used to determine graduation. There are minor consequences for poor scores on the PSAT: students must take and pass the Accuplacer if they intend to apply for federal scholarship money. But other than these two exams, there are no critical penalties for failing any mandated standardized tests. My participants perceived this as ‘wasted’ class time that could have been spent teaching life skills. It is too much testing for too little gain.

Summary

The purpose of this study was to explore the teachers’ perspectives about the classroom dynamics shaped by standardized high-stakes testing in the K-12 educational systems in Indiana. Through interviews with seven K-12 teachers from four school districts, I gathered stories, which provided insight into teachers’ perspectives on classroom dynamics as they relate to mandatory high-stakes tests. My interviews were guided by the following research questions:

1. What are the teachers’ experiences with the current classroom dynamics?

2. What are the teachers’ perspectives about role and influence that mandatory, high-stakes, standardized testing may have on their classroom dynamics?

To further understand these perspectives about classroom teaching, the following sub-questions were used as the bases of the interviews:

1. Have teachers’ pedagogical approaches changed over the last twenty years? If so, how and why?
2. If the student classroom activities have changed in focus, in what ways?

3. Have teacher-student relationships changed? If so, in what ways?

In this chapter, I provided a description of the demographics of the school districts and the specific schools of my teacher participants as well as the teachers themselves. Then I provided a description of data and an overview of the stories collected through the interviews. The emerging themes were interwoven in the stories of the participants. In addition, testing, stress, and accountability were addressed from further perspectives in later sections as peripheral, yet significant, themes. Finally, I expanded upon the themes, making connections and proposing meanings, and discussed their significance. From the analysis, I established the main theme: Standardized tests may not be bad; how they are administered and how these data are used is questionable. In the descriptive narrative I incorporated stories from experienced classroom educators, who began teaching before standardized high-stakes tests were mandatory and continue to teach in the now test driven environment of education, in order to explain their perspectives and classroom experiences since the implementation of standardized high-stakes testing.

In the next chapter I will discuss the findings of this study in relation to their limitations, their similarity to the theoretical foundation and design of this study, and how they correspond to previous literature on standardized testing. I will also discuss the implications derived from the study’s findings, and make recommendations for the use of this data and concepts for future research.
CHAPTER V: Summary, Discussion, and Conclusions

This chapter culminates and highlights the context of this study. I begin with a summative description of the entire study, examine the findings of the study by discussing their limitations, and place these findings in context with the study’s theoretical framework and the existing literature. To do so, I describe how these data and the findings bridge the gap between previous studies on testing effects in the classroom and the effects of standardized high-stakes tests as seen from the classroom teachers’ perspective. Finally, I suggest how implications from the study may relate to and inform the current changes in classroom pedagogy specific to the state of Indiana.

Summary of the Study

In my own story as a veteran teacher of 42 years, I find the amount of testing mandated in today’s public schools to be excessive, frustrating, and to some extent unnecessary. Several studies have been conducted (Popham, 1999; Ravich, 2010, 2013, 2014; Taubman, 2009; Zhao, 2009, 2012) that discuss the effects, both positive and negative, of standardized testing as a tool of educational measurement. In this study, I sought to explore teachers' perspectives about the classroom dynamics shaped by standardized high-stakes testing in the K-12 educational systems in Indiana.

Through this inquiry, my research questions served as the main focus:
1. What are the teachers’ experiences with the current classroom dynamics?
2. What are the teachers’ perspectives about role and influence that mandatory, standardized high-stakes testing may have on their classroom dynamics?
But in order to obtain more specific information from my participants, I employed three sub-questions to guide my interviews:

1. Have teachers’ pedagogical approaches changed over the last twenty years? If so, how and why?
2. If the student classroom activities have changed in focus, in what ways?
3. Have teacher-student relationships changed? If so, in what ways?

In order to achieve this goal, I designed a hermeneutic study with a narrative inquiry approach that provided stories from veteran teachers detailing their classroom experiences in relation to standardized high-stakes tests. I believed this type of method best complemented the manner in which I collected their stories. Careful examination of these stories disclosed common themes that merged with my own understanding and created “a collaborative narrative” (Connelly & Clandinin, 1990; Creswell, 2014, p. 14).

Stories were collected as I interviewed seven K-12 classroom teachers from four different school districts of varying size and demographic composition. Every interview was conducted for approximately one hour, at a time and place determined by the interviewee. To ensure quality, the transcripts from these interviews were returned to the participants to be member checked and were also peer debriefed. During the course of the interviews, the stories of teachers at all grade levels and content areas demonstrated they had experienced changes in their teaching strategies and taught content. Some teachers had been reassigned to remediation teaching/coaching positions as a result of low test scores. However, most participants expressed that the relationships between their students and themselves had not been affected.
Discussion of the Findings

This section focuses on describing the limitations of the findings, explaining the conclusions of my findings, and connecting these findings to the reviewed literature.

Limitations of the findings. As is true with any type of inquiry, especially those involving the interpretation of others’ stories, researcher bias becomes a potential limitation. Throughout this study my experiences, assumptions, and preconceptions about standardized high-stakes tests have influenced the way the phenomenon of this inquiry was designed, conducted, and analyzed. However, the inclusion of my perspectives toward this inquiry allows the reader to see how my thoughts converged with those of the teachers interviewed and contributed to the analysis of the findings. According to Clandinin and Connelly (2000) narrative researchers need to be able to establish feelings of equality, caring, and connectedness in order that “their shared stories become a connection that bridges the gap” (p. 88) between them and their participants. For this reason, and with the overall narrative goal of a “collaborative inquiry” (Creswell, 2014, p. 14), my positionality is an advantage in this type of study.

Creswell and Miller (2000) explained the ethical importance of building trust between the researcher and the participants as a means of validating findings. Developing this trust between my participants and me was an initial concern as I began my interviews. Initiating this trust, I chose to let the participants choose the time and place for the interview so they would feel comfortable in the environment. In some cases, teachers chose their classrooms after school hours; some chose their offices at the end of the school day; still others met with me at various local libraries in private conference rooms. Regardless of where the participants chose to be interviewed, the body language
and demeanor of each indicated he or she was comfortable in responding to the questions asked and provided extended answers concerning the topic. Even those whose interviews were interrupted by another person showed no signs of anxiety, and no one evaded my questions. However, there still existed the possibility their answers were not totally candid for fear of putting their school or district in a bad light.

The number of teachers interviewed also presented some limitations. First, because not many teachers are still in the classroom that meet the criteria set forth in this study; and second, because time constraints played a factor since many of my perspective participants sponsor extracurricular activities, which consume their out of school hours. Finding even an hour to conduct an interview became impossible in several instances. As a result, the participants do represent all K-12 classroom levels, but tend to be skewed toward the high school level and the subject of English.

The timing of the interviews with some teachers may have created some limitations as these teachers were interviewed either right before a high-stakes testing window was to begin, during a high-stakes testing window, or shortly after the testing window closed. It became obvious from these teachers’ remarks and their voice inflection as they answered my questions that their frustration level was elevated and they felt mentally drained from administering the exams. As a result, their answers, in some cases, may have been more biased than those who were interviewed well outside the testing windows.

Two of the participants had recently been assigned new teaching positions as a result of low test scores in the school. This, too, became a limitation as they attempted to answer my questions based not only on their traditional classroom experiences, but also
on the experiences of their specialized remediation classes. These participants told stories of two types of classes that were so totally different that they provided different perspectives to the interview questions. Describing the difference between his traditional classroom and his remediation class Stewart said, “Basically the strategy will be to use the small guided reading groups that we’ve been doing from kindergarten to sixth grade in our system.” Laughing he added, “We just added it really the last three years in our building [intermediate] but this has been really helping us out.” Lynn concurred that smaller class size is an advantage for teaching. Fewer students gives her time to use small group strategies with her mathematics remediation students that cannot be managed as well in a traditional classroom of 25+ students. Both Stewart and Lynn expressed that their teaching strategies had changed significantly to accommodate these students who did not performed well on the high-stakes tests.

Conclusions from the findings. Several conclusions can be drawn from the stories of my participants about their perceptions of standardized high-stakes testing and the consequential changes they have experienced in classroom dynamics. Most of these perceptions and changes seemed to be centered on the necessity for students to be prepared for their respective exams so test scores reflect sound teaching and learning. But these changes do not come without feelings of frustration, stress, and sometimes discouragement.

Before the introduction of high-stakes tests, education focused on preparing students to become productive members of their families and communities. The expectations, by today’s standards, were fairly low but important if a person was to be successful and respected. As technology increased the ability to travel, communicate, and
conduct business, the world began to ‘shrink’ or “flatten” (Friedman, 2005) opening doors to share cultures, knowledge, and economic means with nations around the world. Competition became the catalyst for the United States, always striving to be #1 in everything.

With the successful launch of Sputnik in 1957 by the Soviet Union, the United States lost its #1 position in science and space exploration. This prompted a reform movement of the American education system that has continued into the 21st century. Along the way, American teachers experienced the Elementary and Secondary Education Act of 1965 and A Nation at Risk Report in 1983. Neither of these seemed to accomplish the rapid rise in standardized test scores that was expected by the government. In 1996, the National Assessment of Educational Progress (NAEP) test was introduced in Indiana (National Center for Educational Statistics, 2015). This exam ushered in an era of mandatory standardized high-stakes testing that became part of Indiana’s educational reform process. The federal No Child Left Behind Act followed in 2001 that supported this type of testing in all American schools. Common Core State Standards set forth by the National Governors’ Association and the Chief State School Officers were introduced in 2009 and schools were encouraged to adopt these as the guidelines for education in all K-12 classrooms. (2011). Today high-stakes testing engulfs the classrooms of the K-12 public schools, altering the classroom dynamics for teachers across the U.S.

Looking at the high-stakes tests themselves, every teacher interviewed in this study found standardized high-stakes tests one of the major frustrations of the education system today. When asked to explain what caused this frustration the answers almost always focused on the number of tests mandated from some administrative level that
students are now engaged in (see Table 2) and the amount of time needed to administer these exams (see Appendix E). Testing windows for many grades and content areas run consecutively from early fall to the end of the school year (see Appendix D).

Table 2
Listing of Exams Administered in K-12 Public Schools

(Blue indicates mandated)

<table>
<thead>
<tr>
<th>Test Name</th>
<th>Abbreviation</th>
<th>Applicable Grades</th>
<th>Purpose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Indiana Statewide Testing for Educational Progress</td>
<td>ISTEP+</td>
<td>3, 4, 5, 6, 7, 8, 10</td>
<td>Summative test for academic progress at the end of each grade. ISTEP is graduation exam for 10th grade (graduating class of 2018)</td>
</tr>
<tr>
<td>Northwest Evaluation Association</td>
<td>NWEA</td>
<td>K-10 (can be used at 11 &amp; 12 but is usually not)</td>
<td>Provides Lexile reading scores to indicate student reading levels</td>
</tr>
<tr>
<td>Illinois Reading Enrichment and Development</td>
<td>IREAD-3</td>
<td>3</td>
<td>Indicates reading level for 3rd graders. Must be passed to be promoted to 4th grade</td>
</tr>
<tr>
<td></td>
<td>ISTART</td>
<td>K-6</td>
<td>Preparation/predictive exam for the ISTEP+/ECA (has been phased out in Indiana in 2015)</td>
</tr>
<tr>
<td>Acuity</td>
<td>Acuity</td>
<td>K-12</td>
<td>Preparation/predictive exam for the ISTEP+/ECA (has been phased out in Indiana in 2015)</td>
</tr>
<tr>
<td>WIDA</td>
<td>WIDA</td>
<td>K-12 (as needed)</td>
<td>English proficiency for students who are classified as English Learners</td>
</tr>
<tr>
<td>Pretest for Scholastic Aptitude Test (SAT)</td>
<td>PSAT</td>
<td>10, 11, 12</td>
<td>Mandated for 10th grade to qualify for National Merit Scholarships</td>
</tr>
<tr>
<td>Accuplacer</td>
<td>Accuplacer</td>
<td>10+</td>
<td>Mandated is PSAT scores are low if students intend to apply for federal funding for college.</td>
</tr>
</tbody>
</table>

Because of the time consumption of classroom hours to prepare for and administer these exams, participants expressed frustration over the inability to cover curriculum that is not tested but necessary to student development. From the comments made by most of the participants during the interviews, this time consumption issue has continued to increase over the past decade as more and more tests are added to the battery. This led many
participants to express that they no longer felt they were teaching, but rather always preparing students to test well.

More testing equals more stress because most teachers are compelled to adjust and change their pedagogical strategies to lockstep with other teachers of the same grade/content area, especially in English and mathematics. These changes are constantly being made through the implementation of collaborative efforts such as Professional Learning Communities (PLCs) or staff development time to ensure that teachers develop these lock-step lessons and the timeline for execution. This process in itself has not been objectionable because it has provided some continuity among course-alike teachers to make sure the same content standards are covered for every student. What seems to be a concern is that this type of teaching does not allow for time to re-teach concepts/standards that students do not master right away. So while one classroom may grasp a concept quickly so the teacher can proceed along the timeline, another may have students who struggle and therefore need extra time. For the teacher of the struggling students the continuum must be temporarily suspended to provide for re-teaching time: the length of which is dependent on student learning, and is therefore totally unpredictable. This important step in learning – re-teaching - now places a classroom out of sync with the others and it may never completely catch up.

Lock-stepping lessons and always ‘teaching to the test’ not only creates awkward situations like the one above, but also stifles the individuality of the teachers themselves. What was once the fun of teaching has been replaced by a regimented curriculum of known test items with little time for field trips, hands-on activities, or student personal growth experiences. These are activities teachers used to be able to plan and execute in
their own way to make learning fun. They instilled a joy of learning, especially at a young age, that teachers hoped would carry students through their entire education. Now all students have to look forward to is an occasional celebration of completing yet another round of tests and maybe a few extra minutes of recess, music, art, or physical education.

Despite all these negative factors, my participants expressed the belief that standardized tests have been a positive influence in a few ways. Although they are not thrilled with lock-step teaching strategies and data analysis, most participants agreed their lesson planning has become “tighter” and their teaching has become “stronger.” Mary’s explanation helps with the interpretation of this perception of lesson planning,

I’m more intentional than I used to be and I don’t know whether that has to do with testing or whether that has to do with experience . . . And I’m not as much hit or miss. And some of my units are more highly planned and organized than they used to be . . . I think I’m much more intentional about ‘in this unit I have to do this.’ These are the outcomes that I want, that I’m looking for. I’m more intentional about the strategies I use.

Speaking of the TAP system used at Shelby’s school to assist in lesson planning for test preparation, she stated, “It’s made me a stronger teacher and it has strengthened [the instruction in our school]. Our weaker teachers have gotten a lot better.” Lessons based on common standards now give teachers a specific goal for each lesson to accomplish, which in turn makes their teaching more effective. As a researcher-participant, I have experienced this shift in teaching style as a result of mandatory content expectations. When specific standards are the focus of a lesson, it is much easier to organize activities
that support the standard rather than hoping students learn that vague ‘something’ from the daily lesson.

Compounding all these aspects of testing is the fact that test scores have now become part of the teacher evaluation process. Teachers who do not produce satisfactory scores or at least show improvement are labeled as ineffective, a label that goes into their teacher portfolio and can affect their paychecks. Is this type of evaluation equitable for the teacher who is just beginning and is still navigating the education system? Or the teacher who has several special needs students with IEPs as opposed to the teacher who has none of these students? Or the teachers who work tirelessly in classrooms with ELL students who can barely speak English yet are expected to take and pass the state mandated high-stakes tests?

Teachers are not the only ones affected by this glut of exams. Many students immersed in an environment of testing from early on seem to have lost the joy of learning. Donna expressed this sentiment when she shared her story of the guilt teachers feel for what they have to do to children,

*We use the word “joy” a lot at [our school], and a lot of time you feel like the joy is coming out and gone out of teaching because we’re so busy teaching to the test that we can’t share that enthusiasm for learning that is there. ‘Ok, get out your little folders for your privacy. Here comes the test.’ You can’t help but not get [depressed] about ‘I have to do this to children.’ . . . Even though you want to make not a big deal of it, you also understand and you can see the looks on their faces – ‘Are we going to go through that again?’ Unfortunately for some of them*
it’s becoming a way of life and they don’t know that joy. And that’s very, very heartbreakingly for those of us who’ve been in teaching for a while.

Some students perceive school as a room where learning takes place in order to pass the test, not to experience the excitement of discovering something new and connecting it to any future knowledge. Ironically, the initial purpose of these tests was to assess student progress. But students have now become so inundated with tests many no longer really care how they perform on them. This produces test scores that are inaccurate, invalid, and therefore useless.

Perhaps Alfie Kohn (2000) was correct when he claimed, “Standardized testing has swelled and mutated, like a creature in one of those old horror movies, to the point that it now threatens to swallow our schools whole” (p.1).

Relation of Findings to the Literature.

As we look back to the inception of NCLB (NCLB Executive Summary, 2004) it seems it was an imminent reform movement for the academic world. Ravitch (2000) stated several states had already put in place reforms that included some type of mandatory testing in their schools. This was at the insistence of the local and state politicians and businesspersons who felt the need for more accountability in the educational realm. However, the testing models adopted by these states were products of the 1980s. Even the outcomes-based education introduced in the 1990s falls short of the educational needs of students in the 21st century (Cuban, 1993; Zhao, 2009, 2012). Both these models are more in line with business and manufacturing where the end product is determined and then the plan of creating it is devised (Education Commission of the States, 1995, para.2). But students are not products that come off the assembly line. They
are individuals who have multiple academic assets that develop at varying speeds, all of which can be productively used in our future society if given a chance to develop. However, this development is hindered by the constant testing of content that can be memorized or mechanically learned (Zhao, 2009, 2012). This premise is exactly what the participants of this study asserted: students are learning to pass the mandated tests rather than expanding their knowledge.

W. James Popham (1999) claimed simply mandating tests to show progress and educational accountability will neither increase the intelligence of students nor the effectiveness of teachers and administrators. He proceeded to support this assertion by providing three strong arguments.

First, there is a mismatch between what is taught and what is tested. Testing companies who provide the major standardized tests used across the nation are challenged with creating exams that fit a wide diversity of curricula: a one-size-fits-all type of test. These test items are drawn from educational objectives or content standards perceived to be important to all classrooms of a specific grade level. Popham (1999) indicated the task of providing a one-size-fits-all test remains an impossibility as long as state and local governments and school districts have any control over their curricula. So the disparity between what is taught and what is tested persists.

The second reason Popham (1999) gave as to why standardized tests are not good indicators of educational quality is that these tests are to provide meaningful comparisons among students by using only a small collection of test items (see also Harris, Smith and Harris, 2011). Test items that best do the job of spreading out the scores, and therefore creating a bell-shaped curve, are those that about half the testers answer correctly. Items
that are answered correctly by large numbers of students do not help in spreading out the scores. So questions that are answered correctly by 80 percent or more students will be thrown out of the pool of questions to be placed on the test. As a result, the vast majority of items placed on standardized high-stakes tests are middle difficulty items. The items students score well on are those covering content teachers feel important and spend significant time to teach, but those items are eliminated from the tests. So ironically, the better job teachers do in teaching what they perceive to be important knowledge and/or skills, the less likely this content will appear on a standardized high-stakes test. Mary concurred with this thinking and provided insight from her time spent on a state committee that determined cut scores for Indiana’s mandated tests.

*Kids do pilot tests. ... and then the pilot tests, the questions are ranked. ... Here’s the question that most kids get right, here’s the next question, down to the question that most kids get wrong. And so we [teachers] go through those... large groups of teachers in different little pods... and we think about our student that is right at 10th grade mathematics/English. They’re just on the cusp. Where do you think they’re going to start to miss those questions? And so we try to make decisions about where that is that our kids who are competent, but barely, would start to be missing... and we turn that in. And then I remember the next morning coming back and they said... you can’t have that many kids pass. It has to be a higher cut score. And so the process began again. I didn’t walk out feeling horrible, but there’s no doubt the round table wasn’t going to let a lot of kids pass.*
At one point Mary emphasized that if a standard was one that teachers spent a lot of time teaching, you could be sure it would not be on the test, verifying exactly what Popham advocated.

Popham’s (1999) final argument against using standardized tests to evaluate educational quality is that student performance is influenced by three contributing factors: 1) what’s taught in school, 2) a student’s native intellectual ability, and 3) a student’s out-of-school learning. If standardized tests measured only what is taught in school, the results might be more accurate than they currently are, for all students would be measured on an equal basis. But the second two of these factors help explain another dimension of learning and testing over which teachers have no control. The innate capability of students comes through genetics, and what a student’s out-of-school experiences teach is generally associated with economic status and cultural background. Neither of these can be changed through classroom instruction, yet both play a significant role in how well students score on the tests. These are issues Donna, Mary, and Shelby struggle with on a daily basis since their schools have a large Hispanic population whose views of schooling sometimes differ from those of the white, middle class American culture. Likewise, every participant indicated the segment of their student population that falls into the free and reduced lunch program creates challenges in test preparation. So what exactly is being tested? And what do these test scores really indicate about teachers’ effectiveness and student assessment?

Alfie Kohn (2000) concurred with both Popham (1999) and Ravitch (2010) in criticizing the current use of standardized tests in classrooms. His list of eight facts about
standardized testing fall in line with the work of other scholars and the stories told by the participants of my study.

Fact 1: Our children are tested to an extent that is unprecedented in our history and unparalleled anywhere else in the world. The history of education necessarily includes the evolution of testing in public schools and the pedagogical changes in classroom instruction resulting from testing expectations. Cuban (1993) confirmed testing has been a consistent facet of education and indicates that through 1990 the testing environment grew exponentially. Ravitch (2010) would agree and would further suggest testing has continued to expand and become out of control. Or as Kohn (2000) expressed, “Testing has... mutated... to the point that it now threatens to swallow our schools whole” (p. 1). This was an overall topic of concern and frustration with all my participants as they struggle to carve out time to actually teach content instead of teaching to the test. So much of the school year is devoted to testing windows of some sort (see Appendix D), that they witness both students and teachers experiencing test burnout.

Fact 2: Non-instructional factors explain most of the variance among test scores when schools of districts are compared. Although this fact was never directly addressed in the interviews, references were made by all but one of the participants that students who qualified for free and reduced lunch – determined by economic status – were more challenging to teach because of lack of support at home, lack of value on education, and lack of positive outside-the-classroom experiences. This is not to imply parents of low SES do not care about their children’s education. In many cases parents are working multiple jobs to make ends meet. Housing may not be adequate to provide quiet places to study and discretionary funds are usually non-existent (Jensen, 2009). Educators cannot
control these factors yet they are some of the main causes of low test scores that count against classroom teachers (Popham, 1990). Therefore, a school whose demographics include large numbers of free and reduced lunch students and/or ELL students really cannot be compared to schools where these demographics are lower or non-existent. It is not apples to apples.

Fact 3: Norm-referenced tests were never intended to measure the quality of learning or teaching. Mary’s experience of setting cut scores for state high-stakes test, illustrates this fact. Test items are chosen in a fashion that will rank students rather than rate the quality of specific students or schools. She explained that the process of setting cut-scores nullifies the measurement of quality teaching since the questions of content teachers spend the most time on are stricken from the tests. Au (2009) would agree.

Fact 4: Standardized test scores often measure superficial thinking. Here Kohn (2000) used the term “superficial” to indicate when a student copied answers, guessed, or just skipped the parts they felt were hard. Because of the way many standardized tests are scored, student who guess or leave answers blank often score higher than those who think more deeply and attempt to answer all questions. Kohn’s conclusion: standardized tests appear to test a shallower approach to learning. Again several of my participants stated they felt students become so test-numb they tend to guess at answers rather than think before they answer. Donna especially affirmed this attitude in her K-2 remediation classroom where if students missed an answer the first time, they just began to guess until they got it right.

Fact 5: Virtually all specialists condemn the practice of giving standardized tests to children younger than 8 or 9 years old. High-stakes testing begins in kindergarten
when children are 5 or 6 years old. Donna confirmed this fact as she described the test prep activities in her K-2 classroom. She stated, “The children are being asked to do things they are not developmentally ready for and they are being tested on them.”

Fact 6: Virtually all relevant experts and organizations condemn the practice of basing important decisions, such as graduation or promotion, on the results of a single test. Ravitch (2014) and Taubman (2009) agreed that students and teachers are more than a number: they have individual human qualities that cannot be tested by filling in the bubbles. Au (2009) stated, “Indeed, high-stakes tests hold so much power because their results are tied to rewards and sanctions that deeply affects the lives of students, teachers, principals, and communities (negative for low performers, and positive for high-performers)” (p. 90). These scholars and Kohn’s ‘relevant experts’ all posit that important decisions should not be made based on one test, yet the emphasis on testing for the very purposes mentioned here seems to be escalating across the nation every year. Because these tests hold such ‘power,’ the existence of remedial classes at several levels is a common practice in school districts across Indiana. These courses are created to provide additional preparation to those students who need to pass an exam that determines an important decision: IREAD dictates promotion to the 4th grade; ECA determines high school graduation and diploma; PSAT and Accuplacer control who is eligible for government scholarship assistance. These are obviously major milestones in education that are being determined by the scores of one test. Study participants feel a constant pressure from administration to ensure students score well on these high-stakes tests. Stewart and Lynn especially confirmed this as their teaching positions have shifted from
traditional classrooms to remediation classrooms where more direct instruction is provided to low performing students.

Fact 7: The time, energy, and money that are being devoted to preparing students for standardized tests have to come from somewhere. Because of the massive budget cuts schools everywhere are experiencing, programs are being excluded from the curriculum. They are “eliminating programs in the arts, recess for young children, electives for high schoolers, class meetings, and even such aspects as discussion of current events and use of literature in early grades” (Kohn, 2000, p.2) since these will not be on the test. However, these activities help promote social and moral learning as well as broaden the scope of knowledge in students (Zhao, 2009). But producing high scores on tests has become so crucial for the evaluation of education these programs have been cut (Spohn, 2010) so the money can be used toward test preparation time and resources. Lois and Stewart both remembered when their classes participated in CAMP, the name given to the period of the day when students enjoyed music, art, health, and computer skills. But even then, only 14 days of the 90-day semester were used to engage students in these programs. Currently, none of these programs exist at their schools because the funding went to test teaching resources and remedial teachers’ salaries.

Fact 8: Many educators are leaving the field because of what is being done to schools in the name of ‘accountability’ and ‘tougher standards.’ The teacher shortage has become a grim reality nationwide. I had the privilege of serving on a Blue Ribbon Commission on the Recruitment and Retention of Teachers for the Indiana State Superintendent of Education (Indiana Department of Education, 2015b). Among other issues discussed was the concern of high-stakes testing: the amount of time it consumes
and the use of scores to determine teacher effectiveness and salary. All the participants in this study reflected this very sentiment; even those who felt standardized tests were not all negative. Stewart stated, “I think... one of the biggest complaints is that we just seemed like we spent so much time testing and retesting that we weren’t able to focus on teaching.” Lynn added,

*Third grade is completely over tested. They have ISTEP this week. Next week some of them have to do pilot ISTEP on the computer; the following week they have IREAD; and then in a couple of weeks they go back to the other ISTEP. Plus we have NWEA in there. So 3rd grade teachers feel like they’re testing all the time.*

From my own experience this is how the 10th grade teachers also feel. The test battery is different, but the testing windows open and close consecutively with little time in between.

Supovitz (2009) summed up what the participants expressed with these points:

- High-stakes testing only motivates educators in a superficial way. They narrow curriculum in order to spend more time in preparing students to test. The narrowing of the curriculum limits the number of complex skills and habits needed to compete in a global community.

- Test-based accountability fosters alignment of the curriculum to what is being tested instead of testing what is needed to educate the whole person.

- High-stakes tests provide data that might be useful to a school district or a school, but little of it is useful to the classroom teacher because receiving feedback takes
too long, tests are not necessarily connected to the curriculum, and there is a lack of disaggregation by individual students.

- Test-based accountability is a political strategy that effectively conveys to the public school accountability through numbers. And numbers cannot define what or who a student or teacher is or knows (pp. 214-215).

**Implications of Continued Testing**

‘Test oriented education’ refers to the factual existence of our nation’s education, of the tendency to simply prepare for tests, aim for the highest test scores, and blindly pursue admission rates [to colleges], while ignoring the real needs of the student and societal development. It pays attention only to a minority of the student population and neglects the majority; it emphasizes knowledge transmission, but neglects moral, physical, aesthetic, and labor education, as well as cultivation of applied abilities and psychological and emotional development; it relies on rote memorization and mechanical skills as the primary approach, which makes learning uninteresting, hinders students from learning actively, prevents them from taking initiatives, and heavily burdens them with [an] excessive amount of course work; it uses test scores as the primary or only criterion to evaluate students, hurting their motivation and impeding their overall development (Chinese Minister of Education as quoted by Zhao, 2012, p. 129).

This quote used by Yong Zhao (2009) suggests that the educational reform currently sweeping the U.S. is driving learning down the wrong road. Having been educated in his early years in the Chinese schools, Zhao related his experience with the rigid Chinese structure of education that propagates students who can produce extremely
high test scores, but at the cost of losing the ability to think creatively, to problem solve, and relate to others. According to Zhao, these three skills are the basis for productive members of society – economically and socially. By stifling these abilities, educators risk not only deadening the school experience for children, but also killing the attributes that make nations globally successful. The U.S. in its efforts to surpass the high scores of China has persisted in the past in mandating more and more high-stakes testing for students in K-12. However, perceptions from my participants indicate this trend seems to be changing as most of them now integrate collaboration and problem solving into many of the lessons prepared for their classes.

NCLB was initiated to ensure no child was left behind. However, with the expectation of high-stakes tests, the exact opposite effect is beginning to appear. According to the National Center for Education Statistics (2015), the high school dropout rate was 7% as of 2013. The number of Hispanic students dropping out was 12%, significantly higher than that of non-Hispanic white (5%) and African-American students (7%). Because there are many intervening factors in obtaining these statistics – student mobility, incentives for local schools to underreport, challenges in tracking transfer students, poor record-keeping and classification discrepancies, and unmonitored homeschooling – the NCES says the actual number of dropouts could be higher still. Clarke, Haney, and Madaus (2000) suggested a large portion of this dropout rate can be connected to high-stakes tests. As mentioned earlier (see Ravitch 2010), it is difficult for students with learning disabilities, different cultural values, and limited English language skills to learn the material presented on the tests, even after shifting pedagogies and classroom activities to meet their needs. Language comprehension can be an issue as well...
as lack of white, middle-class background that so many questions are based on.

Personally I have counseled students who become discouraged after multiple attempts to pass the graduation exam with no success and would rather dropout than face the frustration of taking another exam. Hence, *No Child Left Behind* is leaving more children behind than before its inception (Darling-Hammond, 2010; Ravitch, 2010).

From my perspective as a researcher-participant the most devastating implication of continuing this excessive battery of tests is what has been deleted from education completely. This is not the content areas or recess or even the aesthetic subjects that make appreciating life interesting. It is the teaching of the ‘skills of humanity.’ These are the abstract concepts of integrity, open-mindedness, responsibility, respect, politeness, kindness, sympathy, citizenship, and the like that make us humans as opposed to animals or machines. Teachers must be so focused on teaching to the test that these skills of humanity become something we assume are learned outside the school. Unfortunately, that assumption is often erroneous. As a result, we are creating students who can adequately fill in the bubbles of a Scantron answer sheet, but have little experience in showing empathy toward their peers or superiors (Noddings, 1988, 2007).

The implications of the continuance of high-stakes tests are not favorable for students, teachers or even for our state and nation. These scores cannot define what a person is or what he or she really knows. I am not advocating assessment and accountability be eliminated, but I concur with scholars such as Ravitch, (2014); Taubman, (2009); and Zhao, (2012) that the current amount of testing and the uses of data are not the way to improve education. As the old adage says, “Everybody is a
genius. But if you judge a fish by its ability to climb a tree, it will spend its whole life believing it is stupid.” This is what we’re doing to our students.

**Recommendations for Future Research**

This study on teachers’ perspectives about the classroom dynamics shaped by standardized high-stakes testing in the K-12 educational systems of Indiana was conducted to begin the process of collecting perspectives of classroom teachers as they try to make meaning of the changes in teaching and learning resulting from the current ubiquitous testing environment. And although the findings of this study have presented several common themes and perspectives, it has only scratched the surface of the phenomenon of standardized testing as it relates to classroom dynamics.

**Gathering more perspectives.** With this study the storied experiences of seven teachers were collected. These teachers’ classrooms ranged from the elementary grades through high school so that the full K-12 education system was accounted for. Because the basis of most standardized high-stakes tests is mathematics and English/language arts, the study was confined to these two content areas. And although four school districts and teachers from seven different schools were chosen for these interviews, they still only represent a miniscule portion of the teaching staff of Indiana. So it seems that gathering additional perspectives would be of value for future studies.

Additional perspectives could be collected that represent a broader database in two ways. First, teachers from all districts of Indiana could be studied and their storied experiences collected to see if the same common themes emerge. In doing so, teachers from schools with varying demographics and population than those used in this study could potentially provide perspectives about changing classroom dynamics that so far
have not surfaced. Second, teachers of non-tested content areas could be included in the narratives to explore whether classroom dynamics have changed for them as a result of high-stakes testing. Have they been compelled, like mathematics and English/language arts teachers, to alter their lesson planning to better prepare students for these exams? Have their teaching strategies changed because of the high-stakes expectations, even though their content is not specifically tested? Or have they been unaffected by any of these mandatory tests? These new perspectives would begin to fill the gaps of the findings of this study.

**Effective pedagogical changes.** Throughout this study pedagogical changes in teaching strategies have been one of the main focuses. Each teacher interviewed admitted he or she has changed the way he or she planned his or her lessons and executed the instruction in the classroom. These changes included creating curriculum maps in collaboration with other grade level or course-alike teachers as well as strong connections to the state standards for the grade or content they taught. However, each of these participants has also acknowledged that they ‘teach to the test’ in order to obtain the high scores their administrators expect. This ‘teach to the test’ mentality compels teachers to change their teaching strategies to match those of the tests so that students score well. But do these changes really promote learning?

A future study might include an exploration of these pedagogical changes teachers have experienced in lesson planning and teaching and their effectiveness on learning. Have the changes made a potentially positive impact on students’ learning? Are students learning to think beyond the tests? Or are all these changes simply a means to an end so the public will have a more positive picture of the American education system?
Data collected in the form of stories could provide insights concerning these pedagogical changes that teachers are currently afraid to voice or have yet to see.

**Why so many tests.** A common theme that emerged throughout this study was the number of standardized high-stakes exams given to students as they progress through the K-12 grades. Teachers expressed their support for testing, but not for the amount that currently pervades the classrooms. As the participants have stressed, days of instructional time are lost each year to make time for some kind of mandatory testing.

A study of the types of tests being used and their purposes could contribute to an environment of less testing across all grades. If the current battery of tests is duplicating results, there is no need to double test. If each test is providing different results, possibly the tests could be distributed or re-structured in a way that each grade is tested in only one aspect of learning. This would eliminate the plethora of exams given throughout the entire school year to every grade. A close examination of the test content and purpose could bring potential relief to over-tested students and teachers.

**New means of assessment.** Yet another recommendation for future study involves exploring other methods of assessment. Since standardized high-stakes tests can only produce quantitative data to indicate student growth and teacher effectiveness, a more subjective method of assessment could be found or created that measures progress rather than norms. Human beings are more than numbers and excel in areas that cannot be tested through high-stakes exams.

Although a tremendous undertaking, qualitative research could open the door to multiple perspectives on what is educationally important. From these findings, new
methods of assessment could emerge that evaluate both objective and subjective knowledge of students and teachers.

**Conclusion**

It seems apparent that mandatory high-stakes testing will continue to be a part of educational accountability for schools, teachers, and students in some way or form. But this study has suggested that the experience of giving/taking these tests, has taken its toll on classroom teachers and students alike. And although there have been some benefits to teachers and students because of common standards to be taught, testing still presents multiple concerns and stressors for educators. Teachers have changed or adjusted their teaching strategies to cover the material tested, forfeiting curricula that are just as important to the education of the whole child. Students are being denied many facets of education that are significant to their intellectual growth at the expense of performing well on high-stakes tests. All this because someone decided our students needed to outpace other nations in test scores or we were failures.

I began this dissertation with a quote from Dr. Seuss’s book *Horray for Diffendoofer Day!* Although the book was written long before high-stakes tests were implemented, Dr. Seuss sensed the turmoil that would befall education in the future. As the book proceeds, Flobbertown is described like this,

> It’s miserable in Flobbertown,

> They dress in just one style.

> They sing one song, they never dance,

> They march in single file.

> They do not have a playground,
And they do not have a park.

Their lunches have no taste at all,

Their dogs are scared to bark. (Seuss, Prelutsky, & Smith, 1998).

Yet Seuss provides hope for this school that is faced with being judged by test scores. Seuss’s teacher Miss Bonkers ensures her students they are ready for the test because she has had the time and the freedom to teach them what is most important to know: how to think. This ability to think might well be the key American education seeks, potentially eliminating the necessity for much of the standardized high-stakes testing and the complexities they generate for all concerned.
References


Zhao, Y. (2009). Catching up or leading the way American education in the age of globalization. Alexandria, Va.: ASCD.

## Demographics of Schools Used in Interviews

### Appendix A

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<thead>
<tr>
<th>School Name</th>
<th>Enrollment</th>
<th>% Free/Reduced Lunch</th>
<th>% by Ethnicity</th>
<th>% English Language Learners (ELL)*</th>
<th>State Assigned</th>
<th>School Grade</th>
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**Demographics of Schools Used in Interviews (Cont.)**

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<th>School Name</th>
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<th>% English Language Learners (ELL)*</th>
<th>State Assigned School Grade</th>
<th>School Grade</th>
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</tbody>
</table>

*Due to the transition to the more rigorous Indiana College and Career Ready Standards and a new, more rigorous assessment aligned to these standards, the Indiana General Assembly passed Senate Enrolled Act 200 to hold schools and corporations harmless for the results of the more rigorous assessment. This Hold Harmless approach for Statewide Accountability allowed schools and corporations to receive the better of either the 2013-14 grade or the 2014-15 grade.
Interview Guidelines
Appendix B

GENERAL INFORMATION
Interviewer ____________________________ Date ____________________
Teacher name __________________________ Begin time ________
End time ________
School _______________________________ Grade(s) taught __________
High-stakes tests you’ve administered or prepared students for ________________

- Collected signed copy of the consent form and provided copy
- May I have permission to audiotape this interview

Introduction

✓ Thank the participant for taking the time to do this interview.
✓ Answer any questions the interviewee might have
✓ Explain the interview process and ask permission to audio record

Lesson Preparation

1. Briefly explain/describe the process you currently use to plan your lessons?

2. Has this process of planning changed over the years of your teaching?
   IF YES: In what ways has the process changed?
   To what do you attribute this change?

   IF NO: Why do you think this process has stayed the same?
3. Over your years of teaching has your focus on certain content changed?

   IF YES: What content/curriculum do you focus on now that wasn’t so much the focus earlier in your career? To what do you attribute these changes?

   IF NO: Why do you think the content of your curriculum has remained unchanged?

4. Do you think high-stakes testing has affected the way you plan your lessons? Explain.

   **Teaching Pedagogy**

   Definition: Scholars define pedagogy as teaching methods, including the aims of education and the ways in which such goals may be achieved.

   1. Briefly describe your current teaching method(s)/strategy(ies)?

   2. Do you feel your pedagogies (teaching strategies) have changed throughout the years you’ve been teaching?

      IF YES: How have they changed? Give examples of activities you have included or excluded. To what do you attribute these changes?

      IF NO: Why do you feel your pedagogy has remained the same throughout your teaching career? Give examples.

   3. Do you think high-stakes testing has affected your choice of pedagogies over the past decades? Explain and give examples if possible.

   **Student-Teacher Interaction**

   1. Throughout your teaching career what changes, if any, have you experienced in your relationships with students?

   2. How do you explain these changes, or the lack of changes, in teacher-student interaction?

   3. Since the introduction of high-stakes tests, what activities/content have you eliminated, if any, from your typical school day?

   4. Explain any new activities/content, if any, which have been added to your typical school day since high-stakes tests have been mandated.
1. Because your teaching career has extended from a time when high-stakes tests were basically non-existent to a time when high-stakes tests have become a major educational concern, what changes have you experienced in the way the staff in your building functions?

2. Do you feel these changes have affected your classroom dynamics in any of the three categories discussed in this interview – lesson planning, teaching pedagogy, or student-teacher interactions?

3. Do you feel these changes have been beneficial to students’ learning?

**Wrap-Up**

1. Considering only the testing aspect of the current educational reform movement, ignoring the political struggle, how do you feel high-stakes tests affect education?

2. Is there anything else you would like to add to any of your answers or additional comments you would like to make concerning high-stakes tests?
Appendix C

Adult Consent Form for Social Science Research

Study Title
Teachers’ Perspectives About Classroom Dynamics Shaped by High-Stakes Standardized Testing in K-12 Classrooms of Indiana

Study Purpose and Rationale
The purpose of this study is to explore the teachers’ perspectives about the classroom dynamics shaped by high-stakes standardized testing in the K-12 educational system in Indiana. By conducting this study I seek to understand the meaning that the teachers make of their teaching experiences and changes in the classroom dynamics since the advent of high-stakes standardized testing. Further, the research specific focus is on the teachers’ preparation time, teaching strategies, and teacher-student interactions, which, in turn, define the classroom dynamics.

Inclusion/Exclusion Criteria
Potential participants will consist of certified classroom teachers in grades K-12 in selected public schools in northern Indiana. These teachers will need to meet the following criteria:

1. Hold a valid teaching license in the state of Indiana.
2. Began teaching in the public K-12 school setting in Indiana before 1988 when mandatory testing was initiated in the state of Indiana.
3. Have not taken a hiatus from teaching for more than 2 consecutive years.
4. Are currently teaching (or retired within the last year) in/from a public K-12 school classroom in Indiana.
5. Have been involved with teaching for and administering one of the mandatory high-stakes standardized tests for the grade level they teach.
6. All participants will be 18 years of age and older.

Participation Procedures and Duration
For this study you will be asked to participate in an interview of approximately 2 hours regarding your perspectives on the effects of high-stakes standardized tests on your classroom dynamics. Specifically you will be discussing your preparation time, teaching strategies, and teacher-student interaction.

Audio Tapes
For purposes of accuracy, with your permission, the interviews will be digitally audiotaped. Any names used on the audiotape will be changed to pseudonyms when the tapes are transcribed. The tapes will be stored in a locked filing cabinet in the researcher’s office for 2 years and will then be erased.

Data Confidentiality
All data will be stored as confidential and no individual identifying information will be presented in any publication or presentation related to this study. All data are password protected.

Storage of Data
All data from the interview will be recorded digitally and transferred to a private server under the primary researcher’s password protected account. All files will also be stored on this private server and will be password protected. Paper data will be stored in a locked file cabinet in the researcher’s office for 2 years and will then be shredded. The researcher is the only individual who has access to the data.
Risks
There are no predictable risks involved in this study. You may choose not to answer any question that makes you uncomfortable and you may stop the interview at any time.

Benefits
One benefit from participating in this study is that it may provide a guide for you to reflect on your teaching practices in a way that will improve your teaching strategies and therefore your students’ learning in the future.

Voluntary Participation
Your participation is entirely voluntary and you are free to withdraw your permission or participation at any time for any reason without penalty. Please feel free to ask any questions of the investigator before signing this form and at any time during the study. Participation in this research project will not affect your standing with their school.

IRB Contact Information
For questions about your rights as a research subject, you may contact the following:
Office of Research Integrity
Ball State University
Muncie, IN 47306
765-285-5070
irb@bsu.edu

Consent
I, ________________________, agree to participate in this research project entitled, “Teachers’ Perspectives About Classroom Dynamics Shaped by High-Stakes Standardized Testing in K-12 Classrooms of Indiana.” I have had the study explained to me and my questions have been answered to my satisfaction. I have read the description of this project and give my consent to participate. I understand that I will receive a copy of this informed consent form to keep for future reference.

To the best of my knowledge, I meet the inclusion/exclusion criteria for participation (described on the previous page) in this study.

___________________________________________  ____________
Participant’s Signature  Date

Researcher Contact Information

Principal Investigator
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Phone: 574-536-4648
Email: ellenaugustine288@gmail.com

Faculty Advisor
Dr. Nancy J. Brooks
Educational Studies
Ball State University
Muncie, IN 47306
Phone: 765-285-2721
Email: njbrooks@bsu.edu
## Representative Testing Window Schedule

### Appendix D

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<thead>
<tr>
<th>Test</th>
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<tr>
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<td>9-10</td>
<td>Sept 6-19</td>
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<tr>
<td>Accuplacer Part I</td>
<td>11-12</td>
<td>Oct 3-23</td>
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<td>PSAT</td>
<td>10-11</td>
<td>Oct 19</td>
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<tr>
<td>ECA Retake-English</td>
<td>11-12</td>
<td>Dec 5-16</td>
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<td>ECA - Retake Algebra I</td>
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<td>Final Exams</td>
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<td>WIDA</td>
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<td>Jan 9-Feb 24</td>
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<td>NWEA Test 2</td>
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