INTRODUCTION

In a time of increased accountability measures and volatility of educational policy, public and legislative bodies have become increasingly focused on student achievement as reported in statewide standardized test scores. Having all students take the same standardized test is like saying that we have “standardized” children and that we all expect them to learn in the same ways and exhibit this learning in the same way—through these standardized assessments. What these “one-size-fits-all” assessments fail to take into consideration, however, are the varied backgrounds of our students. Many factors play an important part in a student’s academic success, like special needs or environmental factors; this study focused on students’ socioeconomic status and how this affects student achievement. This paper discusses the implications of this research on current and future teacher preparation programs in higher education at the undergraduate level.

STANDARDIZED TESTING

Popularity in standardized testing has risen dramatically after the publication of A Nation at Risk: The Imperative for Educational Reform by the Reagan administration in 1983; this report portrayed the American educational system as a failing entity and proposed that its only way to redemption was through stricter accountability measures (i.e., increased standardized testing) (“Is the Use of Standardized Tests Improving Education in America?,” n.d.). The use of standardized testing has become controversial as these tests have become “high-stakes” for students and school faculty and administrators. Why do legislators and the general public care about standardized test scores? Numbers are the easiest data to analyze, and “educational attainment is well recognized as a powerful predictor of experiences in later life,” policymakers and the public assume that standardized testing data provide accurate reflections of student achievement (Brooks-Gunn & Duncan, 1997, p. 61). However, as the push for increased accountability through standardized assessment gained momentum it left many students falling through the cracks; standardized tests do not take the varying experiences of our students into consideration when it comes to test results, and as a result, achievement gaps became the norm for many subgroups but most noticeably for our economically disadvantaged children. Additionally, the recent downturn in our nation’s economy has resulted in a greater income gap between our schools’ wealthy and disadvantaged children: “...the Great Recession wreaked havoc among working-class families’ employment. This has led to greater residential segregation and homogenously poor neighborhoods, leading to a higher concentration of poor students in certain schools” (Neuman, 2013, p. 18). The time frame that our nation experienced the Great Recession coincided with No Child Left Behind’s deadline of having all children test as proficient in math and reading (according to standardized tests) by 2014; our nation did not meet this benchmark.

This paper provides a history of the standardized testing and accountability movement, the curriculum standards attached to the accountability movement, and the attempted shift to common core. Student poverty and its impact on student achievement the focus of this paper. Recognizing the impact of poverty on student achievement as measured by standardized tests the authors question the explicit practices of teacher preparation programs in preparing teacher candidates to work with students of poverty.
There are perspectives in favor of standardized assessments, in general, standardized tests are inclusive and non-discriminatory because everyone has to take them, regardless of race, gender, or ability. These tests can provide an indication of students’ ability on a variety of topics while identifying areas of strengths and weaknesses, and they can also be a useful tool for assessing the schools themselves (Brown & Hattie, 2012, p. 289). Moreover, high advocates of standardized assessments argue that these tests make certain that schools and faculty members are held accountable to taxpayers for their instruction and that many parents and teachers approve of these tests (Is the Use of Standardized Tests Improving Education in America?, n.d.).

Concerns regarding standardized testing include placing too much emphasis upon scores, student testing anxiety, “teaching to the test,” creating cheating concerns, and socioeconomic and cultural bias (Brown & Hattie, 2012; Olson, 1999). Part of the concern regarding standardized testing comes from concern that there is too much emphasis placed upon them, leading to cheating concerns about student testing anxiety, “teaching to the test,” skewed test results, and possible cheating concerns (Olson, 1999, Brown & Hattie, 2012, p. 289). Because these tests are considered “high-stakes,” poor student performance can lead to negative consequences for students and teachers alike; to protect both the test-takers and test administrators, “…just as students need an environment of psychological safety to make effective use of assessment, so too do teachers and school leaders need protection from negative consequences” (Brown & Hattie, 2012, p. 289). Some argue that the more important these tests become “in terms of being the basis for promoting or retaining students, for funding or closing down schools—the more that anxiety is likely to rise. Anxiety, fear and anxiety are legitimate” and that because it ultimately “drives good teachers and principals out of the profession” (Kohn, 2000, p. 3; Renzulli, 2013, p. 1). Because the stakes of these tests are so high, test anxiety is now a common ailment amongst students across the nation; the Stanford-9 standardized exam, for example, even comes with instructions as to what actions the test administrator must take if a student vomits on a test booklet (Phillips & Wong, 2010). This adds to the public sentiment that these tests are inflicting serious harm to children, both academically and emotionally, and these assessments do not result in improved cognition (Horn, 2003; Popham, 2001). Furthermore, despite the avalanche of funds allocated to standardized testing, there exists a great deal of evidence that standardized tests do not improve student learning or promote meaningful learning (Brooks-Gunn & Duncan, 1997; Wittig, 2012). Be¬ cause these examinations are designed to assess what is easily measured, they are inherently incapable of assessing what cannot be measured. These tests cannot ascertain “initiative, creativity, imagination, conceptual thinking, curiosity, effort, irony, judgment, curiosity, good will, ethical reflection, or a host of other valuable dispositions and attributes” (Kohn, 2000, para. 45). This supports one of Albert Einstein’s most famous assertions: “Not everything that counts can be counted, and not everything that can be counted counts.”

### SOCIOECONOMIC STATUS AND STUDENT ACHIEVEMENT

With regards to this study, socioeconomic status is viewed as a lens through which one measures achievement. Correlational studies show a strong relationship between high poverty and poor academic performance (Sinir, 2005; White, 1982; White et al., 1993). This correlation begins at the beginning of a child’s academic career, and even before, in some cases. Pavloski stated that poverty is more influential to academic performance than even gestational exposure to cocaine (2014). In every state in the nation the economically disadvantaged subgroup never outperforms other nonlabeled students regardless of the grade level or subject area, supporting that the variable with the strongest correlation to student performance is socioeconomic status; correlations between SES and student achievement frequently range from 0.100 to 0.800 (Tienken, 2010; White, 2010). In a meta-analysis of research regarding achievement and socioeconomic status, Ne¬ fin found that the correlation between these two variables increased throughout the levels of schooling, climaxing in the middle school, and plateauing at the high school level (2005). This is also illustrated in the additional study on student achievement and SES at the middle level as crucial as “the [cognitive] effects of wealth [...are] indirect and must accrue over time” (Williams, 2012, p. 34).

Accountability measures were put into place to ensure a decline in achievement gaps between low income and higher income students; No Child Left Behind legislated a goal of 100 percent of students, regardless of identify¬ ing factors, at proficient levels by 2014. However, a 2008 study forecast “nearly 100% failure” of California schools to meet these accountability measures; the study cited that the reason for this projected failure would be due to the poor results from limited English proficiency students and high poverty students “(Is the Use of Standardized Tests Improving Education in America?, n.d.). Perhaps most important is not what is being assessed but rather what is not being assessed, as what we measure is both invalid and misleading because student achieve¬ ment depends on multiple factors that cannot be readily assessed, like ability, behavior, and socioeconomic status (Brooks-Gunn & Duncan, 1997; Wittig, 2012). Be¬ cause these examinations are designed to assess what is easily measured, they are inherently incapable of assessing what cannot be measured. These tests cannot ascertain “initiative, creativity, imagination, conceptual thinking, curiosity, effort, irony, judgment, curiosity, good will, ethical reflection, or a host of other valuable dispositions and attributes” (Kohn, 2000, para. 45). This supports one of Albert Einstein’s most famous assertions: “Not everything that counts can be counted, and not everything that can be counted counts.”

### ACADEMIC STANDARDS

After the implementation of No Child Left Behind, state standards (and standardized assessments aligned to these standards) became the norm to meet accountability mea¬ sures of this legislation. However, there was a common argu¬ ment that states could not compare data to one another because each state’s expectations was different from one another; hence came the impetus for the Common Core Standards. This is a national set of standards that are meant to grow in response to the implementation of Common Core standards. While a proponent of the common core standards, Wiggins (1991) asserted that a school has standards when it has “students and high poverty students” (Is the Use of Standardized Tests Improving Education in America?, n.d.).

Lauren Dotson & Virginia Foley

Middle Grades Student Achievement and Poverty Levels: Implications for Teacher Preparation

Journal of Learning in Higher Education

Fall 2016 (Volume 12 Issue 2)
on Innovation: Why One National Curriculum is Bad for America, 2013). In Tienken’s (2011) research on the growing body of evidence supporting the Common Core standards, he discovered a lack of empirical evidence supporting these standards; this assertion was based on the 2010 Benchmarking for Success report, which was also written by the same group that created the standards. Of the 138 references used in this report, Tienken asserted that many of them are repetitive sources and that only four could be considered truly empirical studies directly related to national standards and student achievement (2011). The standards themselves are also a source for dispute. College professors who have reviewed the standards at length argue that they are overly worded and leave much open to interpretation, much like this English Language Arts standard: “A student will develop a view of the characters and the audience or reader (e.g., created through the use of dramatic irony) creating such effects as suspense or humor” (Schmoker & Graff, 2011, p. 2). Other issues surrounding the standards themselves vary. Complaints expressed about English Language Arts are that they focus more on metacognition than content, they are too focused on informational texts (at least 50% of texts in grades 6–12 must be informational), and they convey vague expectations and reading lists (Carmichael et al., 2010; Luebke, 2013). Frustrations regarding mathematics standards include an avoidance of standard algorithms, fractions, and basic arithmetic skills, vague expectations for when to use a calculator, and the introduction of concepts before they are taught. As a result, the introduction of concepts before they are taught is across the general population of students, it only follows that these assessments will hurt students with disabilities, economic disadvantages, and limited English proficiency even more (Ravitch, 2013). Given the fact that many states are opting out of paper-and-pencil assessments in the areas of reading and mathematics (percentage of students labeled as proficient) on standardized assessments (Mathis, 2010).

In this study the level of socioeconomic status of the students was determined. In this study the level of socioeconomic status of the students was determined. The independent variables, and the dependent variable is academic achievement as indicated by proficiency levels (percent of students labeled as proficient) on standardized assessments in the areas of reading and mathematics in the middle grades (grades 6–8). A paired sample t test was performed to compare proficiency averages between the 2012 and 2013 academic years on reading and math, which addressed research questions 1 and 2. A one-way analysis of variance (ANOVA) was performed to determine if a significant difference exists between economi- cally disadvantaged students on proficiency levels and standar- dized assessments in 2012 and 2013, which addressed research question 3. The Statistical Program for the Social Sciences (SPSS) was used to analyze data, all of which were analyzed at the .05 level of significance.

Is there a significant difference between 2012 and 2013 academic achievement scores on mathematics standardized tests for middle grades students? 

HO1: There is no significant difference between 2012 and 2013 academic achievement scores on the reading standardized tests for middle grades students. 

Figure 1

Means of mathematics scores in middle grades students compared by academic year

Research Question 2

Is there a significant difference between 2012 and 2013 academic achievement scores on mathematics standardized tests for middle grades students?

HO2: There is no significant difference between 2012 and 2013 academic achievement scores on the mathematics standardized tests for middle grades students.
A paired-samples t test was conducted to evaluate whether a significant difference exists between academic achievement proficiency scores on reading standardized tests for middle grades students between 2012 and 2013. Reading achievement scores were significantly lower in 2013 than in 2012. The results indicated that the mean proficiency score ($M = 70.80$, $SD = 12.65$) was significantly greater in 2012 than in 2013 ($M = 43.36$, $SD = 14.89$, $t(1088) = 76.86, p < .001$. Therefore, the null hypothesis was rejected because test scores were significantly higher in 2012 than in 2013. The standardized effect size index, $d$, was 2.30, which is a large effect. The 95% confidence interval for the mean difference between the 2 years’ scores was 26.63 to 28.04. A plot comparing the means of these scores is shown in Figure 14.

**Research Question 3**

Is there a significant difference between proficiency levels in both reading and mathematics standardized tests when compared by the schools’ economic levels in 2012 and 2013 for middle grades students?

**HO1a:** There is no significant difference between proficiency levels in both reading and mathematics standardized tests when compared by the schools’ economic levels in 2012 for middle grades students.

A one-way analysis of variance (ANOVA) was performed to determine whether significant differences existed between students’ proficiency levels in reading and mathematics standardized tests when compared by the schools’ economic levels for middle grades students on the 2012 North Carolina state report card. The factor variable, the socioeconomic descriptor of the student population, included four levels: 1%-40% economically disadvantaged, 41%-60% economically disadvantaged, 61%-80% economically disadvantaged, and 81%-100% economically disadvantaged. The dependent variable was the percentage of economically disadvantaged students passing both the reading and mathematics end of grade test for 2012 in each of these SES levels. The ANOVA was significant, $F(3,359) = 57.99, p < .001$. Therefore, the null hypothesis was rejected. The strength of the relationship between economically disadvantaged proficiency levels and the four socioeconomic levels as assessed by $h^2$ was medium (.33).

Because the overall $F$ test was significant, post hoc multiple comparisons were conducted to evaluate pairwise differences among the means of the four groups. A Dunnett C procedure was selected for the multiple comparisons because equal variances were not assumed. There were significant differences between the means of students passing both the reading and math standardized assessments at every socioeconomic level. Schools with more students on free or reduced cost lunch scored significantly lower than schools with fewer students on free or reduced cost lunch. Schools with 1%-40% of students receiving free or reduced cost lunch scored significantly higher than schools with 41%-60% of students receiving free or reduced cost lunch, and the 41%-60% socioeconomic bracket scored significantly higher than schools with 61%-80% of the student population receiving free or reduced cost lunch. Likewise, schools in the 61%-80% socioeconomic bracket scored significantly higher than schools with 81%-100% of the student population receiving free or reduced cost lunch. The circles on the box plots denote outliers that are farther than 3 interquartile ranges (and closer than 3 interquartile ranges), and the stars on the box plots denote outliers that are farther than 1.5 interquartile ranges. The numbers next to the circles and star indicate the case number of the outlier. The 95% confidence intervals for the pairwise differences, as well as the means and standard deviations for the four socioeconomic levels, are reported in Table 13, and a box plot comparing the means between the groups is reported in Figure 15.

**HO1b:** There is no significant difference between proficiency levels in both reading and mathematics standardized tests when compared by the schools’ economic levels in 2013 for middle grades students.

A one-way analysis of variance (ANOVA) was performed to determine whether significant differences existed between students’ proficiency levels in reading and mathematics standardized tests when compared by the schools’ economic levels for all middle grades students on the 2013 North Carolina state report card. The factor variable, the socioeconomic descriptor of the student population, included four levels: 1%-40% economically disadvantaged, 41%-60% economically disadvantaged, 61%-80% economically disadvantaged, and 81%-100% economically disadvantaged. The dependent variable was the percentage of economically disadvantaged students passing both the reading and mathematics end of grade test for 2013 in each of these SES levels. The ANOVA was significant, $F(3,359) = 50.78, p < .001$. Therefore, the null hypothesis was rejected. The strength of the relationship between economically disadvantaged proficiency levels and the four socioeconomic levels as assessed by $h^2$ was medium (.30).

Because the overall $F$ test was significant, post hoc multiple comparisons were conducted to evaluate pairwise differences among the means of the three groups. A Dunnett C procedure was selected for the multiple comparisons because equal variances were not assumed. There were significant differences between the means of economically disadvantaged students passing both the reading and math standardized assessments at every socioeconomic level. Schools with more students on free/reduced cost lunch scored significantly lower than schools with fewer students on free or reduced cost lunch. Schools with 1%-40% of students receiving free or reduced cost lunch scored significantly higher than schools with 61%-80% of the student population receiving free or reduced cost lunch. Likewise, schools in the 61%-80% socioeconomic bracket scored significantly higher than schools with 81%-100% of the student population receiving free or reduced cost lunch. Therefore, the null hypothesis was rejected because the difference between the 2 years’ scores was 26.63 to 28.04. A plot comparing the means of these scores is shown in Figure 14.

---

**Table 1 95% Confidence Intervals of Pairwise Differences in Mean Proficiency Scores in Reading and Mathematics Standardized Tests of Middle Grades Students Among Different Levels of Socioeconomic Status**

<table>
<thead>
<tr>
<th>SES Level</th>
<th>N</th>
<th>M</th>
<th>SD</th>
<th>1%-40% ED</th>
<th>41%-60% ED</th>
<th>61%-80% ED</th>
<th>81%-100% ED</th>
</tr>
</thead>
<tbody>
<tr>
<td>1%-40% ED</td>
<td>64</td>
<td>66.27</td>
<td>10.43</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>41%-60% ED</td>
<td>121</td>
<td>57.97</td>
<td>8.86</td>
<td>[4.36, 12.23]*</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>61%-80% ED</td>
<td>133</td>
<td>53.47</td>
<td>9.32</td>
<td>[8.77, 16.84]*</td>
<td>[1.66, 7.34]*</td>
<td></td>
<td></td>
</tr>
<tr>
<td>81%-100% ED</td>
<td>45</td>
<td>44.08</td>
<td>9.43</td>
<td>[7.18, 27.36]*</td>
<td>[9.76, 18.17]*</td>
<td>[5.16, 13.77]*</td>
<td></td>
</tr>
</tbody>
</table>

*Significant at the .05 level
prove that the Common Core curriculum caused lower test scores. Furthermore, it is often anticipated that test scores are lower the year a new curriculum is implement- ed, so the findings of this research are consistent with this expectation. It is this researcher’s recommendation that this study be replicated longitudinally over the course of 5 years (a normal curriculum cycle) to determine whether standardized test scores continue to be significantly lower with the Common Core curriculum than with the previous North Carolina Standard Course of Study. Five-year trend evidence would provide appropriate evi- dence for the effects of the Common Core curriculum on high poverty students.

Additionally, those in control of the educational system must not continue to ignore the host of research that warns against using only standardized testing as the only means of measuring the quality and effectiveness of schools and student achievement. Kohn (2000) reminded the public that Piaget warned schools not to rely heavily upon standardized test scores and grades, as they do not serve as predictors for future success in the adult work- place. Popham (2001) argued that educators must also accept blame for placing too much emphasis on standard- ized testing because teachers and principals did not take a more aggressive stance against testing when the ac- countability movement gained momentum. Furthermore, Wiggins (2012) pointed out that there are always outli- ers regarding standardized testing trends. There are some high poverty schools that score much higher than schools of similar demographics, and occasionally, there are low poverty schools that do not score as well as other wealthy schools. It is crucial that researchers study the high pover- ty outliers—that is, those schools that outperform schools with similar demographics, in order to determine which measures or programs educational leaders ascribe to the school’s academic success.

One such outlier, Grassy Fork School in eastern Tennes- see, became acclaimed for its academic turnaround be- cause of its focus on differentiated instruction, differenti- ated (and quality) professional development, and attitude in its school leaders that changed the culture and climate in the school (Thomas, 2009). As a result, this school went from nearly being taken over by the state department of education to an example of the rest of high poverty schools to strive to follow. Educators and policymakers must stop be- ing tolerant and accepting of the link socioeconomic sta- tus and student achievement by referring to it as a truth of our system (Wiggins, 2012).

Lastly, but perhaps most importantly, schools cannot ef- fectively improve student academic achievement without dealing with one of the most critical issues in our schools today: student poverty. Just as a doctor cannot treat a pa- tient’s symptoms without attacking the infection, teachers cannot improve academic achievement in students with- out addressing the underlying economic issues that affect the student and family. Schools in high poverty areas al- ready have difficulty in hiring and retaining high quality teachers due to the inherent difficulty in these positions and cycle of low expectations and poor performance (Pot- ter 2013). When the deck is already stacked against high poverty schools and students, high quality instruction is paramount.

Some researchers suggest introducing socioeconomic inte- gration by busing, much like what was implemented dur- ing the Civil Rights movement, to bring in better teachers and enhance parent engagement. A 2010 meta-analysis suggested that students in socioeconomically integrated schools performed better in mathematics achievement testing than nonintegrated schools (2013). It is impor- tant to note that because poverty is an issue that exists outside the control of our schools, “... no policy improves ‘socioeconomic status’ directly... good policy is based on an understanding of causal relationships between family background and children outcomes, as well as cost-effec- tiveness” (Duncan & Magnuson, 2005, p. 35). However, there are several ways schools can positively impact our high poverty students to address issues that stem from a low socioeconomic level:

- Provide access to high quality, experienced teach- ers;
- Provide access to school resources (both at school and at home);
- Maintain high expectations and high quality cur- riculum;
- Provide parent education and assistance from social services;
- Facilitate community services provided to families through the school (i.e., free dental clinics, parent education workshops, food pantry for families, etc.);
- Focus on early education programs (like Pre-Kin- dergarten/Head Start programs) and interventions for all at-risk students;
- Provide specialized training and high quality pro- fessional development for faculty and staff in best practices for high poverty students;
- Focus on the school becoming a community of learners;
- Improve parent involvement;
- Improve relationships between school and com- munity;
- Increase school funding from local, state, and federal agencies;
- Offer summer enrichment and summer school programs; and
- Maintain for small school and class size (Brooks- Gunn & Duncan, 1997; Jensen, 2009; Muijs, Har- ris, Chapman, Stoll, & Russ, 2009; Reardon, 2013; Sirin, 2005).

While this list is not all-inclusive, it provides a beneficial starting point for schools that have a large population of high poverty students. However, improving academic achievement in the high poverty school is often an uphill battle.

Sadly, the founder of the Educational Testing Service, Henry Chauncey, has been quoted as saying “if there is anything in heredity (such as tall parents having tall chil- dren), one would expect children of high socioeconomic group parents to have more ability than children of low socioeconomic group parents” (“No Child Left Behind?”). In other words, according to the architect behind a multi-billion dollar standardized testing company, pub- lic schools are now a Darwinian model of survival of the fittest—or perhaps the richest. If this is the mantra behind standardized testing and accountability in our country, our schools, and therefore our nation’s future, are in dire straits.

Table 2

<table>
<thead>
<tr>
<th>SES Level</th>
<th>N</th>
<th>M</th>
<th>SD</th>
<th>1%-40% ED</th>
<th>41%-60% ED</th>
<th>61%-80% ED</th>
</tr>
</thead>
<tbody>
<tr>
<td>SES Group</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1%-40% ED</td>
<td>62</td>
<td>25.37</td>
<td>10.60</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>41%-60% ED</td>
<td>121</td>
<td>17.83</td>
<td>4.98</td>
<td>[3.79, 11.29]</td>
<td></td>
<td></td>
</tr>
<tr>
<td>61%-80% ED</td>
<td>126</td>
<td>15.04</td>
<td>6.34</td>
<td>[6.48, 14.17]</td>
<td>[0.90, 4.67]</td>
<td></td>
</tr>
<tr>
<td>81%-100% ED</td>
<td>54</td>
<td>11.04</td>
<td>4.79</td>
<td>[10.38, 18.29]</td>
<td>[7.40, 18.88]</td>
<td>[1.74, 6.28]</td>
</tr>
</tbody>
</table>

*Significant at the .05 level

Figure 4.

2013 Proficiency levels of middle grades students according to socioeconomic group.

**DISCUSSION AND IMPLICATIONS FOR FUTURE RESEARCH AND PRACTICE**

After analyzing these data, it becomes apparent that stu- dent socioeconomic status and academic achievement continue to be negatively correlated, supporting earlier research by Sirin (2005) and White (1982); that is, the higher the poverty level within a school, the lower the academic achievement based on standardized test scores. However, the question still remains regarding the relation- ship between the new Common Core curriculum and standardized test scores. Although test scores with the new curriculum were significantly lower in 2013 than in 2012, correlation does not equal causation. One cannot prove that the Common Core curriculum caused lower test scores. Furthermore, it is often anticipated that test scores are lower the year a new curriculum is implement- ed, so the findings of this research are consistent with this expectation. It is this researcher’s recommendation that this study be replicated longitudinally over the course of 5 years (a normal curriculum cycle) to determine whether standardized test scores continue to be significantly lower with the Common Core curriculum than with the previous North Carolina Standard Course of Study. Five-year trend evidence would provide appropriate evi- dence for the effects of the Common Core curriculum on high poverty students.

Additionally, those in control of the educational system must not continue to ignore the host of research that warns against using only standardized testing as the only means of measuring the quality and effectiveness of schools and student achievement. Kohn (2000) reminded the public that Piaget warned schools not to rely heavily upon standardized test scores and grades, as they do not serve as predictors for future success in the adult work- place. Popham (2001) argued that educators must also accept blame for placing too much emphasis on standard- ized testing because teachers and principals did not take a more aggressive stance against testing when the ac- countability movement gained momentum. Furthermore, Wiggins (2012) pointed out that there are always outli- ers regarding standardized testing trends. There are some high poverty schools that score much higher than schools of similar demographics, and occasionally, there are low poverty schools that do not score as well as other wealthy schools. It is crucial that researchers study the high pover- ty outliers—that is, those schools that outperform schools with similar demographics, in order to determine which measures or programs educational leaders ascribe to the school’s academic success.

One such outlier, Grassy Fork School in eastern Tennes- see, became acclaimed for its academic turnaround be- cause of its focus on differentiated instruction, differenti- ated (and quality) professional development, and attitude in its school leaders that changed the culture and climate in the school (Thomas, 2009). As a result, this school went from nearly being taken over by the state department of education to an example of the rest of high poverty schools to strive to follow. Educators and policymakers must stop be- ing tolerant and accepting of the link socioeconomic sta- tus and student achievement by referring to it as a truth of our system (Wiggins, 2012).

Lastly, but perhaps most importantly, schools cannot ef- fectively improve student academic achievement without dealing with one of the most critical issues in our schools today: student poverty. Just as a doctor cannot treat a pa- tient’s symptoms without attacking the infection, teachers cannot improve academic achievement in students with- out addressing the underlying economic issues that affect the student and family. Schools in high poverty areas al- ready have difficulty in hiring and retaining high quality teachers due to the inherent difficulty in these positions and cycle of low expectations and poor performance (Pot- ter 2013). When the deck is already stacked against high poverty schools and students, high quality instruction is paramount.

Some researchers suggest introducing socioeconomic inte- gration by busing, much like what was implemented dur- ing the Civil Rights movement, to bring in better teachers and enhance parent engagement. A 2010 meta-analysis suggested that students in socioeconomically integrated schools performed better in mathematics achievement testing than nonintegrated schools (2013). It is impor- tant to note that because poverty is an issue that exists outside the control of our schools, “…no policy improves ‘socioeconomic status’ directly... good policy is based on an understanding of causal relationships between family background and children outcomes, as well as cost-effec- tiveness” (Duncan & Magnuson, 2005, p. 35). However, there are several ways schools can positively impact our high poverty students to address issues that stem from a low socioeconomic level:

- Provide access to high quality, experienced teach- ers;
- Provide access to school resources (both at school and at home);
- Maintain high expectations and high quality cur- riculum;
- Provide parent education and assistance from social services;

The Common Core movement, along with what we know as educational research on the effects of poverty on student achievement, has a significant impact on how we are preparing our future teachers as undergraduate stu-
dents at the collegiate level. Schools with high levels of poverty score very low on current measures of effective-ness which are primarily based on standardized tests. Reeves (2000) recognized exceptions to this in his study of 90-90-90 schools: 90% poverty, 98% ethnic minority, and 99% proficient on state assessments. Jenson (2000) identified five key factors in meeting the needs of students from poverty. Jenson used the SHARE acronym: Support of the Whole Child, Hard Data, Accountability, Relationship Building, and Enrichment Mindset.

In addition to recommendations from Reeves and Jenson, Marzano (2004) discussed closing gaps of children from poverty with specific approaches to teaching. And finally, Payne (1996) offered schema to understand the experi-ences and thinking of families in generational poverty. Are these resources being used in teacher preparation?

An informal survey of five teacher preparation programs in the Appalachian area revealed no explicit approach to preparing teacher candidates for teaching students of pov-erty. All five schools rely on the broad diversity statements in each syllabi, field experiences, and the candidate’s final portfolio for evidence of the candidate’s preparation in poverty. All five schools report very low on current measures of effective-ness—one-size-fits-all-curriculum/.


Reardon, S. (2013). The widening income achievement gap. Educational Leadership, (70) 8, 10-16.


