Evaluation of Academic Achievement at Nine Paideia Schools

October 7, 2008

Eric L. Robinson, Ph.D.
Associate Professor, Department of Educational Psychology
Baylor University

Table of Contents

Evaluation of Academic Achievement at Nine Paideia Schools

In order to assess the effectiveness of the Paideia Model, an independent evaluation was completed. According to the Paideia web-page (www.paideia.org), there are four reform areas that this model attempts to effect; 1) student motivation, 2) teacher development, 3) student achievement, and 4) school culture. The purpose of this evaluation is to evaluate the effectiveness of student achievement.

Methodology

The following information describes the subjects, instruments, and procedures of the evaluation.

Subjects

Nine schools that met the criteria (i.e., designed for school-wide change across at least one entire level of schooling; designed to improve teaching and learning in multiple academic subjects, involve all students, and meet the comprehensiveness criterion) were selected by Dr. Terry Roberts, Director of the National Paideia Center. The nine schools, along with the year Paideia began school-wide implementation, are listed below in Chart 1

Chart 1: Schools, grade-level, and implementation year of the Paideia Model.

School/State	Grades	Implementation Year
Asheville Middle School/North Carolina	6-8	2002
Chattanooga School for Arts & Sciences/Tennessee	1-12	1993
Classical Studies Magnet/Connecticut	6-12	2005
Meadowfield Elementary/South Carolina	K-5	2005
Park Lodge Elementary School/Washington	K-6	1998
Providence Spring Elementary/North Carolina	K-5	2002
Pueblo School for the Art and Sciences/Colorado	K-12	1993
Greater Hartford Classical Magnet/Connecticut	6-12	2004
Moreno Valley High School/New Mexico	9-12	2001

It is important to note that, due to the variability of student numbers, demographic information including total number of subjects, gender, and ethnicity will be presented with each set of results.

Procedures

In general, the evaluation data were gathered on each of the nine schools using a data-warehouse created by each state's educational agency. For example, data collected for Asheville (NC) Middle School and Providence Spring (NC) Elementary came from the "*ncpublicschools.org"* website, while the information from Pueblo School for the Art and Sciences came from multiple web-pages including, "www.cde.state.co.us/cdeassess/documents.html." The use of each state's

educational data was chosen for several important reasons. First, when individual states evaluate the academic progress of its students, they typically use their state-created achievement tests, with the results reported at the school, district, and statewide level. In addition, these scores are used to make key educational decisions, including future state funding. It is also important to note that, due to the increased emphasis on state-created tests of achievement, many school districts in the U.S. do not administer a national achievement test (i.e., Iowa Test of Basic Skills, California Achievement Test). Therefore, in an attempt to provide continuity to the evaluation for all nine schools, each of which had a differing number of years of Paideia program implementation, school- and grade-level results of each state-wide test was chosen as the evaluation instrument. There are several limitations of note when using a school-wide data set, including the restricted statistical analyses that can be conducted, and a lack of information on individual differences. The web-pages used to gather data on each school can be found in Appendix A.

Instruments

The instruments used to evaluate the Paideia Model varied across schools, states, and year of implementation. In general, the instruments consisted of academic achievement tests created by each state specifically to evaluate academic growth in the subject areas of reading, mathematics, and language. The reliability and validity of each state test was difficult, if not impossible, to determine. This is due to little information released on the tests as well as the fact that many states appear to revise their tests every several years. In general, most state-wide tests appear to be criterion-referenced.

Results

The results will be provided in the order the schools are listed in Chart 1. It is important to read each school report closely since the data available varied between schools and state data bases. There was an attempt by the evaluator to provide the best comparison group possible with each set of data.

ASHEVILLE MIDDLE SCHOOL

The following introductory information was gathered from Asheville Middle School (AMS) home web-page. Asheville Middle School is a public, urban middle school for students in grades 6 to 8. The school was constructed in 1967 as a new facility replacing Stephens Lee High School, an aging school serving the black community. Upon the completion of the new facility the school was named South French Broad High School. When integration occurred in the community within the next few years, the school became a junior high. In 1991, the facility became a middle school serving Asheville City Schools and has been fully accredited by the Southern Association of Colleges and Schools since that time. Asheville Middle School began integrating the Paideia Model in 2002.
The data below begin with a demographic comparison (see Table 1) between Asheville Middle School, the Asheville City Schools District, and the state of North Carolina for 2007.

Table 1: Demographics for 2007

	Male	Female	White	Black	Hispanic	Multi-Racial	Economically Disadvantaged
Asheville Middle School	N/A	N/A	48.8	38.8	5.5	5.5	47.4
Asheville City Schools District *	N/A	N/A	50.0	43.5	5.1	N/A	46.2
North Carolina State*	N/A	N/A	55.8	31.3	9.3	N/A	44.3

N/A = Data not available; * = 2006 Data

As seen in Table 1, the demographics of students at Asheville Middle School (AMS) are similar to their district peers in the Asheville City Schools District in that both have approximately one-half of their students described as White and about 5% described as Hispanic. Asheville City Schools reported having 43.5% of its students described as Black, which is higher than AMS (38.8%); both of which are higher than the state (31.3%). With regard to economic disadvantage, which is defined by the percentage of students eligible for the free or reduced lunch program, AMS reported the highest percentage (47.4) followed closely by the Asheville District (46.2%) with the state of North Carolina reporting 44.3%. Table 2 displays the percentage of students, grouped by gender, ethnicity, and other factors who passed the End of Grade (EOG) Composite Test for 2006-2007.

Table 2: Percentage of students, grouped by gender, ethnicity,
and other factors who passed the
End of Grade Composite Test for 2006-2007: READING and MATH

	Male	Female	White	Black	Hispanic	Multi-Racial	E.D.	L.E.P.
Asheville Middle School	76.4	68.0	90.8	49.6	61.8	79.4	51.6	58.3
Asheville City Schools District	72.9	69.5	91.0	48.6	69.6	66.7	55.7	51.3
North Carolina State	62.7	65.2	75.9	43.5	52.5	64.7	48.5	38.3

E.D. = Economically Disadvantaged; N.E.D.= Not Economically Disadvantaged; L.E.P = Limited English Proficiency

The data below compare the results from the "End of Grade" (EOG) test scores in the year 2005-2006 and 2006-2007. The EOG is a state-constructed achievement test that evaluates students in grades 3-8. The information is presented by grade (6, 7, and 8) in reading and mathematics.

Reading

Table 3: Percentage of students that passed the End of Grade Composite Test: READING 6th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Asheville Middle School	83.0	84.9	+1.9
Asheville City Schools District	82.2	82.4	+0.2
North Carolina Statewide	81.5	82.5	+1.0

As seen in Table 3 above, 84.9% of the 6th graders at Asheville Middle School (AMS) passed the End of Grade (EOG) test in the 2006-2007 academic year, which was a slight (1.9%) improvement over the 2005-2006 year. In addition, the pass rate for 6th graders at AMS was 2.5% higher (84.9 - 82.4 = 2.5) when compared to the Asheville City School District and state of North Carolina.

Table 4: Percentage of students that passed the End of Grade Composite Test: READING 7th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Asheville Middle School	92.2	88.0	-4.2
Asheville City Schools District	87.8	89.1	+1.3
North Carolina Statewide	86.4	86.3	-0.1

Table 4 indicates that 88% of the 7th graders at AMS passed the EOG reading test in 2006-2007, which is about 4 percentage points lower than the 2005-2006 academic year (92.2 - 88 = 4.2). When compared to the city school district and state of North Carolina, the percentage of students that passed the test is about equal. While about 1% more students in the city district passed when compared to AMS (89.1 – 88 = 1.1), approximately 2% more students at AMS passed the test when compared to the N.C. average (88 - 86.3 = 1.7).

Table 5: Percentage of students that passed the End of Grade Composite Test: READING 8th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Asheville Middle School	88.9	91.5	+2.6

Asheville City Schools District	86.6	91.2	+4.6
North Carolina Statewide	86.9	87.9	+1.0

Table 5 reveals that 91.5% of 8th graders at AMS passed the EOG reading test at the end of the 2006-2007 academic year, which was 2.6% more than passed in 2005-2006. The 2006-2007 results from AMS were consistent with the results within the Asheville City School District (91.5 v. 91.2) and about 3.6% higher than the N.C. state results (91.5 – 87.9 = 3.6).

Math

Table 6: Percentage of students that passed the End of Grade Composite Test: MATH 6th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Asheville Middle School	61.6	73.4	+11.8
Asheville City Schools District	61.0	70.1	+9.1
North Carolina Statewide	61.9	64.6	+2.7

The results in Table 6 above indicate that approximately 6 out of 10 (61.6%) of the AMS 6th graders in 2005-2006 passed the End of Grade (EOG) Test, which was highly consistent with the local district (61.0%) and state (61.9%). Interestingly, the results from 2006-2007 indicated that a higher percentage of students at the school, district, and state level passed the EOG, with a much higher percentage at AMS. Specifically, 73.4% of 6th graders at AMS passed the EOG math test, which was about 11.8% higher than the previous year. Stated differently, a much higher percentage of 6th graders passed the EOG math test (11.8%) than the previous year, especially when compared to the percent-change at the state level (2.7%).

Table 7: Percentage of students that passed the End of Grade Composite Test: MATH 7th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Asheville Middle School	69.8	76.1	+6.3
Asheville City Schools District	64.5	73.2	+8.7
North Carolina Statewide	61.8	63.5	+1.7

The results found in Table 7 revealed that a higher percentage of 7th grade students at AMS pass the EOG Math Test than their peers within the Asheville City Schools District, and statewide. Specifically, approximately 7 out of 10 (69.8%) of 7th graders in 2005-2006 from AMS passed the EOG Test, which was about 5 percentage points higher than the district (64.5%) and 8 percentage points higher than the state (61.8%). Comparing 2005-2006 to 2006-2007, a higher percentage of students at AMS continued to outperform their district and state peers. As seen in Table 7, approximately 76% of the 7th graders at AMS passed the EOG, compared to 73% and 63.5% at the district and state levels respectively. The percent change between the two academic years indicated solid improvement at AMS with 6.3% more students passing the EOG Test, compared to 8.7% at the district level and only 1.7% at the state level.

Table 8: Percentage of students that passed the End of Grade Composite Test: MATH
8th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Asheville Middle School	68.4	76.9	+8.5
Asheville City Schools District	60.9	71.2	+10.3
North Carolina Statewide	60.7	65.1	+4.4

The results in Table 8 are similar to Table 7 in that a higher percentage of 8th graders at AMS passed the EOG Math Test in both academic years when compared to their district and state peers. For the 2005-2006 academic year, 68.4% of the students at AMS passed the EOG Test compared to 60.9 in the district and 60.7 in the state of North Carolina. Improvement was seen across all three levels from 2005-2006 to 2006-2007, with almost 77% of the AMS students passing the EOG Test, which was 5.7% higher than the local district (76.9 - 71.2 = 5.7), and 11.8 percent higher than the state level (76.9 – 65.1 = 11.8). Similar to Table 7, the Asheville City Schools District showed the highest percent change between academic years with an increase of 10.3%, followed by 8.5% at AMS and 4.4% across the state.

Summary:

Based on the EOG Tests for students in the academic years of 2005-2006 and 2006-2007, a higher percentage of students pass the reading test when compared to the test of mathematics. This is consistent across grades 6-8 and across the school level (Asheville Middle School: AMS), district level (Asheville City Schools) and state (North Carolina). In general, 80-90% of students in grades 6-8 passed the EOG Reading Test, compared to approximately 65-76% of these students passing the EOG Math Test.

Analyzing the results by comparing the school (AMS), district (Asheville City), and state (N.C.) levels, it was evident that a higher percentage of students in grades 6-8 at AMS passed *both* reading and math EOG Tests when compared to the district and state. It is important to note that the percent differences in reading between AMS and the Asheville City Schools District were

small (often 1-2%), as well as between AMS and the state (1-4%). The differences in mathematics were more pronounced, especially when comparing AMS to the state of N.C. Across grades 6 through 8, about 3-5% *more* students at AMS passed the math EOG than their local peers; this percentage increased by 9-12% difference between students at AMS and the state of N.C. For example, 76.1% of 7th graders at AMS passed the EOG Math Test in 2006-2007 compared to only 63.5% at the state level; a difference of 12.6%.

CHATTANOOGA SCHOOL FOR ARTS AND SCIENCES

The Chattanooga (TN) School for the Arts and Sciences (CSAS) is a public school serving 1,150 students in grades K-12. The CSAS opened as a middle school in 1986, and has expanded across all school grades since this time. The CSAS began implementing the Paideia Model in 1993.

Table 9: Percentage of students, grouped by gender, ethnicity, and other factors for 2007: Grades K-12

	Male	Female	White	Black	Hispanic	E.D.
Chattanooga School for Arts and Sciences	47.2	52.8	55.9	39.5	1.7	20.6
Hamilton County	51.4	48.6	61.0	33.0	4.1	55.1
Tennessee	51.5	48.5	68.8	24.8	4.65	54.7

E.D. = Economically Disadvantaged

The data in Table 9 provides demographic information about the Chattanooga School for Arts and Sciences (CSAS), their local county (Hamilton), and the state of Tennessee. As can been viewed, the CSAS has slightly higher ratio of females to males (53:47) compared to the approximate ratio in Hamilton County and the state (48:52). Regarding ethnicity, the CSAS has a lower percentage of students described as White (56%) when compared to the county (61%) and state (69%). The difference seems to be in the percentage of students described as Black, where the CSAS has over 39% compared to Hamilton County at 33% and the state of Tennessee at just under 25%. The overall percentage of students described as Hispanic is relatively low across the three levels, with the lowest in the CSAS (1.7%) compared to the county (4.1%) and state (4.65%). A final demographic comparison indicates that approximately 1 in 5 children (20.6%) in the CSAS are described as "Economically Disadvantaged" compared to slightly more than 1 in 2 children in Hamilton County (55.1%) and the state of Tennessee (54.7%).

The data below compare the results from the *Tennessee Comprehensive Assessment Program (TCAP)* test scores in the year 2006 and 2007. The TCAP is a state-constructed achievement test that evaluates students in grades 3-8 and test students in grades 3 through 8 in reading/language arts and math, and in grades 5 and 8 in writing. The information is presented by grade (K-8, 9-12) in reading/language arts plus writing and mathematics. These data were taken from the Tennessee state education webpage which can be found in Appendix A.

<u>Reading/Language Arts plus Writing</u>

Table 10: Percentage of students that achieved proficiency and/or advanced on the Tennessee Comprehensive Assessment Program:
READING/LANGUAGE ARTS PLUS WRITING
K-8th Grade

Level of Assessment	2006	2007	% Change
Chattanooga School for Arts and Sciences	97.0	99.0	+2.0
Hamilton County	87.0	90.0	+3.0
Tennessee Statewide	88.0	90.0	+2.0

Table 11: Percentage of students that achieved proficiency and/or advanced on the Tennessee Comprehensive Assessment Program:
READING/LANGUAGE ARTS PLUS WRITING
9th-12th Grade

Level of Assessment	2006	2007	% Change
Chattanooga School for Arts and Sciences	98.0	98.0	0.0
Hamilton County	92.0	92.0	0.0
Tennessee Statewide	91.0	91.0	0.0

The results from Tables 10 and 11 reveal that almost all of the students at the CSAS pass the TCAP Reading/Language Arts plus Writing Test. For the academic year ending in the spring of 2007, approximately 99% of the K-8 (see Table 10) and 98% of the 9th-12th (see Table 11) graders at the CSAS passed the TCAP. When compared to their local district and state peers, about 6-9% more students passed the TCAP. For example, about 90% of the K-8 students in Hamilton County and statewide passed the TCAP Reading/Language Arts plus Writing Test, which is 9% lower than the K-8 students at the CSAS (99%). Tables 10 and 11 also reveal very little change in the percentage of students passing the TCAP between the 2006 and 2007 academic year, with a range of 2-3% increase across the three levels (school, district, and state) in K-8, and a 0% change for 9-12th grade students across the three levels. One reason for the small-to-no change is based on the "ceiling effect" which occurs when scores are at-or-near their highest (99% maximum), there is a very limited range of improvement possible.

Math

Table 12: Percentage of students that achieved proficiency and/or advanced on the Tennessee Comprehensive Assessment Program: MATH
K-8th Grade

Level of Assessment	2006	2007	% Change
Chattanooga School for Arts and Sciences	98.0	100	+2.0
Hamilton County	87.0	88.0	+1.0
Tennessee Statewide	89.0	90.0	+1.0

Table 13: Percentage of students that achieved proficiency and/or advanced on the Tennessee Comprehensive Assessment Program:
MATH
9th- 12th Grade

Level of Assessment	2006	2007	% Change
Chattanooga School for Arts and Sciences	98.0	97.0	-1.0
Hamilton County	77.0	76.0	-1.0
Tennessee Statewide	83.0	85.0	+2.0

The results of the TCAP scores in mathematics were consistent with the findings for Reading/Language Arts. As noted in Tables 12 and 13, almost all students (K-12) at the CSAS passed the TCAP. In fact, for the academic year of 2007, 100% of the K-8 students passed the TCAP math test – a highly rare occurrence. In addition, 97% of the 9-12th graders at the CSAS passed the TCAP Math test in 2007 (see Table 13).

Contrasting the TCAP math results from the CSAS with Hamilton County and the state of Tennessee reveals a more noticeable difference, when compared to reading. Specifically, at the K-8 grade level, the results indicate a difference of 10-12% between the CSAS (100% pass rate) and Hamilton County (88% pass rate) and Tennessee (90% pass rate). This difference is more pronounced at the high school level, as there was about a 21 percent-change difference between the 2007 results at CSAS and Hamilton County (97 – 76 = 21) and an 11 percent-change between the CSAS and the state (97 – 85 = 11). Similar to the results in reading/language arts, the percent-change difference between academic year 2006 and 2007 was minimal, which is often due to the ceiling effect.

Summary:

Overall, a high percentage (at least 90%) of students in grades K-12 across the state of Tennessee passed the *Tennessee Comprehensive Assessment Program (TCAP)* test in Reading/Language Arts plus Writing for the academic years of 2006 and 2007. Specific to the Chattanooga School for Arts and Sciences (CSAS), almost all students (98-99%) in grades K-12 passed the TCAP reading test, which was about a 6-9% positive difference between the school and Hamilton County, and the state of Tennessee (see Tables 10 and 11).

There was more variability between the CSAS, Hamilton County, and the state of Tennessee on the TCAP Mathematics Test. While the percentage of K-12th graders at the CSAS that passed the TCAP was consistent with the reading (98-100%), the K-8 results from Hamilton County (88% of the students passed) and Tennessee (90% of the students passed) were noticeably lower. This difference was more pronounced at the high school level, as again, approximately 97% of the 9-12 graders at the CSAS passed the TCAP across the 2006 and 2007 academic years, only about 76% and 84% of the students passed in Hamilton County and the state of Tennessee respectively.

CLASSICAL STUDIES ACADEMY

The following information was gathered from the Classical Studies Academy homepage. The Classical Studies Academy, located in Bridgeport, CT provides students the opportunity to experience a traditional education in a creative and challenging environment with an emphasis on academic excellence. The mission of Classical Studies Academy is to prepare students to become lifelong learners through the development of essential skills in literacy and mathematics, as well as fostering an appreciation and understanding of global history, social studies, science, and the arts. This foundation, combined with character education, service learning, and leadership development, will empower students to make significant contributions to the future of society and democracy. Classical Studies Academy implemented the Paideia Model since it opened in 2005.

The data below begin with a demographic comparison (see Table 14) between Classical Studies Academy, the Bridgeport District, and the state of Connecticut for 2006.

Table 14: Demographics for 2006

	Male	Female	White	Black	Hispanic	E.D.
Classical Studies Academy	49.4	50.6	10.3	46.7	34.5	88.7
Bridgeport District	51.4	48.6	9.6	42.4	44.8	93.5
Connecticut Statewide	51.5	48.5	67.0	13.7	15.4	26.6

E.D. = Economically Disadvantaged

As can be seen in Table 14, there is very little gender differences between Classical Studies, Bridgeport District, and the state of Connecticut, with Classical Studies Academy reporting a slightly higher percentage (50.6) of females than Bridgeport (48.6) and the state (48.5). Interestingly, the ethnic differences are similar between the school and district; both of which are vastly different than the state. Whereas the Classical Studies Academy reported that 10% of their student population in 2006 was identified as White, 67% of students statewide were described as White. In contrast, 46.7% of the students at Classical Studies were described as Black, which is slightly higher than at the local Bridgeport District level (42.4%), but much higher than the state demographics (13.7%). As noted above, the Hispanic population was much higher at the school level (34.5%) and district (44.8%), than at the state (15.4%). Of more importance, though, is the significant difference between the levels regarding economic disadvantage. As seen above, 88.7% of the students at Classical Studies Academy were described as economically disadvantaged, which is slightly lower than the Bridgeport District at 93.5%, yet much higher than the state of Connecticut at only 26.6%.

The data below compare the results from the *Connecticut Mastery Test (CMT)* test scores in the years 2006, 2007, and 2008. The CMT is a state-constructed achievement test that evaluates students in grades 3-8. The information is presented by grade (3, 4, 5, and 6) in reading, mathematics, and writing.

Reading

Table 15: Percentage of students that passed the Connecticut Mastery Test at/above proficiency: READING
3rd Grade

Level of Assessment	2006	2007	2008	% Change*
Classical Studies Academy	39.7	54.7	40.4	+0.7
Bridgeport District	42.0	39.0	39.4	-2.6
Connecticut Statewide	69.2	69.3	68.4	-0.8

*% change is the difference between the results from 2006 and 2008. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 15 describes the results of the Connecticut Mastery Test (CMT) in reading for 3rd grade students across the academic years of 2006 through 2008. As noted, there was variability between the three years for students at Classical Studies Academy, while scores at the district (Bridgeport) and state (Connecticut) levels were relatively stable. Overall, the results reveal that approximately the same percentage (about 40%) of 3rd graders pass the CMT that attend Classical Academy as at Bridgeport District, both of which is 28% lower than statewide (see 2008 data: 68.4 – 40.4 = 28). One should note that more than half (54.7%) of students that were 3rd graders at Classical in 2007 passed the CMT, which was much higher percentage than 2006 or 2008 at Classical or across the three years at Bridgeport.

Table 16: Percentage of students that passed the Connecticut Mastery Test at/above proficiency: READING
4th Grade

Level of Assessment	2006	2007	2008	% Change
Classical Studies Academy	47.4	40.7	37.3	-10.1
Bridgeport District	40.1	41.2	39.9	-0.2
Connecticut Statewide	71.8	70.6	69.7	-2.1

*% change is the difference between the results from 2006 and 2008. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

As noted in Table 16, the percentage of 4th graders that passed the CMT at Classical Studies Academy was similar to those at Bridgeport and much lower than at the state level. In 2006, about 47% of the 4th grade students at Classical passed the reading test, which was about 7 percentage points higher than the Bridgeport District (40.1%), but approximately 25 percentage points lower than the state of Connecticut (71.8 – 47.4 = 24.4). In 2007, the percentage of students that passed the reading test at Classical dropped about 7 points (47.4 – 40.7 = 6.7), and was relatively equal to the local district (41.2) and about 30 percentage points lower than the state (70.6). All three levels showed a slight decrease in the percentage of students that passed the CMT reading test in 2008, which kept the percentage differences between Classical, Bridgeport, and the state relatively similar, with a much higher percentage passing at the state level.

Table 17: Percentage of students that passed the Connecticut Mastery Test at/above proficiency: READING
5th Grade

Level of Assessment	2006	2007	2008	% Change
Classical Studies Academy	55.6	55.2	52.8	-2.8
Bridgeport District	43.1	41.4	41.5	-1.6
Connecticut Statewide	72.8	73.4	74.0	+1.2

*% change is the difference between the results from 2006 and 2008. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 17 reveals the results on the CMT reading test for 5th graders across three academic years. This table shows that a significantly higher percentage of 5th grade students at Classical Studies pass the reading test when compared to their Bridgeport peers. Specifically, between 11 and 12 percent more 5th graders at Classical passed the CMT when compared to the local district. This finding was consistent across the three academic years (2006, 2007, and 2008). In addition, the percentage of students that passed the reading test at the state level was consistently in the lower 70's (between 72.8 and 74.0).

Table 18: Percentage of students that passed the Connecticut Mastery Test at/above proficiency: READING
6th Grade

Level of Assessment	2006	2007	2008	% Change
Classical Studies Academy	60.7	62.5	71.2	+10.5
Bridgeport District	49.3	48.4	50.1	+0.8
Connecticut Statewide	75.4	75.7	77.6	+2.2

*% change is the difference between the results from 2006 and 2008. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 18 reveals that a much higher percentage of 6th graders that attended Classical Studies Academy passed the CMT reading test when compared to their Bridgeport District peers. In addition, the positive percent-change between the 6th graders at Classical in 2006 and those in 2008 of 10.5 indicates a tremendous growth pattern. Specifically, in 2006, about 60% of the 6th graders at Classical passed the CMT reading test, which were about 11 percentage points higher than their local peers (49.3) and approximately 15 percentage points lower than the state (75.4). By 2008, roughly 71% of the 6th graders at Classical Studies passed the reading test, which was about 21 percentage points higher than their Bridgeport peers and only about 6 percentage points lower than their state peers.

Math

Table 19: Percentage of students that passed the Connecticut Mastery Test at/above proficiency: MATH
3rd Grade

Level of Assessment	2006	2007	2008	% Change
Classical Studies Academy	56.9	69.8	63.5	+6.6
Bridgeport District	56.1	53.3	54.6	-1.5
Connecticut Statewide	78.3	80.1	80.7	+2.4

*% change is the difference between the results from 2006 and 2008. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Regarding Table 19 above, the results indicate a noticeably higher percentage of 3rd graders at the Classical Studies Academy passed the CMT math test when compared to their Bridgeport district peers, especially in 2007 and 2008. Specifically, there was a 16.5 percentage point difference (69.8 - 53.3 = 16.5) in 2007 between the Classical Studies 3rd graders and the Bridgeport 3rd graders. This percentage difference dropped to about 9 points for 2008 (63.5 - 54.6 = 8.9), but is still noteworthy. As can be seen, about 8 out of 10 of the 3rd graders at the state level passed the CMT math test across the three academic years.

Table 20: Percentage of students that passed the Connecticut Mastery Test at/above proficiency: MATH
4th Grade

Level of Assessment	2006	2007	2008	% Change
Classical Studies Academy	53.4	54.2	36.5	-16.9
Bridgeport District	50.4	54.4	55.6	+5.2
Connecticut Statewide	80.3	80.9	81.5	+1.2

*% change is the difference between the results from 2006 and 2008. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 20 reveals that about the same percentage of 4th graders at Classical Studies as the Bridgeport District passed the CMT math test in 2006 and 2007, but there was a significant drop for the Classical Studies students in 2008. Specifically, slightly more than half (50.4 – 54.4%) of 4th graders at both the school (Classical) and district (Bridgeport) passed the math test in 2006 and 2007, yet while this percentage increased slightly for the Bridgeport district in 2008 (55.6%), it dropped by about 17 percentage points at Classical. Consistent with 3rd graders, as noted in Table 19, slightly more than 8 out of 10 of 4th graders statewide passed the CMT math test.

Table 21: Percentage of students that passed the Connecticut Mastery Test at/above proficiency:
MATH
5th Grade

Level of Assessment	2006	2007	2008	% Change
Classical Studies Academy	50.9	63.8	53.7	+2.8
Bridgeport District	61.0	57.4	57.5	-3.5
Connecticut Statewide	80.8	82.5	83.1	+2.3

*% change is the difference between the results from 2006 and 2008. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 21 reveals some variability of performance at the Classical Studies Academy across the three academic years. About one-half of the 5th graders at Classical passed the CMT math test in 2006, which was about 11 percentage points lower than the district. This difference almost reversed itself in 2007 when about 64% of the 5th graders at Classical passed while only 57% passed at Bridgeport; a difference of 6.4% in favor of Classical. While the percentage of students that passed the math test remained unchanged for the 5th graders in 2007 and 2008 at the district level (57%), there was a significant drop of 10% at Classical (63.8 - 53.7 = 10.1) during this time. Finally, consistent with 3rd and 4th graders, slightly more than 8 out of 10 of 5th graders statewide passed the CMT math test.

Table 22: Percentage of students that passed the Connecticut Mastery Test at/above proficiency:
MATH
6th Grade

Level of Assessment	2006	2007	2008	% Change
Classical Studies Academy	76.8	73.2	86.8	+10.0
Bridgeport District	58.9	64.0	63.8	+4.9
Connecticut Statewide	79.8	82.7	84.3	+4.5

*% change is the difference between the results from 2006 and 2008. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 22 reveals that about the same percentage of 6th graders at the Classical Studies Academy performed as well as at the *state level* on the CMT math test. As seen above, slightly more than three-quarters of 6th graders at Classical and statewide (76.8 and 79.8) in 2006 passed the CMT math test, which was about 18 percentage points higher than Bridgeport (58.9%). By 2008, a higher percentage of students at Classical (86.8) passed the math test than at both the district level (63.8) *and state level* (84.3%). These data are interesting when one considers the significant differences in socio-economic differences (as defined by percentage of economically disadvantaged students).

Writing

Table 23: Percentage of students that passed the Connecticut Mastery Test at/above proficiency: WRITING
3rd Grade

Level of Assessment	2006	2007	2008	% Change
Classical Studies Academy	69.0	62.3	73.1	+4.1
Bridgeport District	62.7	61.8	60.4	-2.3
Connecticut Statewide	81.7	82.4	82.9	+1.2

*% change is the difference between the results from 2006 and 2008. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 23 provides the results of 3rd graders on the CMT Writing test across the three academic years of 2006, 2007, and 2008. As can be seen, the percentage of students passing the writing test were stable at the district (Bridgeport) and state (Connecticut) level, while variable at the school (Classical Studies Academy) level. Comparing 3rd graders at Classical with their Bridgeport district peers, it is evident that a higher percentage of 3rd grade students at Classical passed the writing test. In 2006, 69% of the students at Classical passed the writing test compared to 62.7% of the district students; a percentage difference of 6.3. This percentage difference dropped to 0.5 in 2007 (62.3-61.8=0.5), but increased to more than 12% in 2008 (73.1-60.4=12.7). In addition, Table 23 indicates that about 8 out of 10 students in 3rd grade at the state level passed the CMT writing test, while about 7 out of 10 of the students at Classical passed in 2008.

Table 24: Percentage of students that passed the Connecticut Mastery Test at/above proficiency: WRITING
4th Grade

Level of Assessment	2006	2007	2008	% Change
Classical Studies Academy	79.6	66.1	46.2	-33.4
Bridgeport District	66.0	65.2	64.3	-1.7
Connecticut Statewide	84.2	84.1	84.8	+0.6

*% change is the difference between the results from 2006 and 2008. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The results in Table 24 shows consistent performance for 4th graders on the CMT writing test for the Bridgeport District and statewide students, yet a significant drop for students at Classical across the three academic years. Specifically, about 65% of the Bridgeport students and 84% of the students statewide passed the CMT writing test for 2006, 2007, and 2008. At Classical, though, the percentage of students that passed dropped from an impressive percentage of 79.6 in 2006 (a percentage similar to the state level), to 66% in 2007 and only 46% in 2008; a drop of more than 33 percentage points from 2006 to 2008.

Table 25: Percentage of students that passed the Connecticut Mastery Test at/above proficiency: WRITING
5th Grade

Level of Assessment	2006	2007	2008	% Change
Classical Studies Academy	89.1	75.9	79.6	-9.5
Bridgeport District	67.0	64.5	65.4	-1.6
Connecticut Statewide	85.3	85.7	85.7	+0.4

*% change is the difference between the results from 2006 and 2008. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

In general, Table 25 reveals that the percentage of 5th grade students that passed the CMT writing test at Classical was well above their district peers and similar to their state peers. In 2006, 89% of the 5th graders at Classical Studies passed the writing test, which was about 4 percentage points higher than their state peers – a rare event when comparing the socio-economic differences, as defined by the economic disadvantage disparity between the two levels (see Table 14). This percentage difference reversed itself in 2007 where about a 10 percentage point higher level passed at the state when compared to Classical. This difference was reduced to approximately 6 points in 2008 (85.7 - 79.6 = 6.1). A noteworthy and positive difference between the percentage of students at the Classical and the Bridgeport district level was seen across the three academic years.

Table 26: Percentage of students that passed the Connecticut Mastery Test at/above proficiency: WRITING
6th Grade

Level of Assessment	2006	2007	2008	% Change
Classical Studies Academy	82.1	75.0	84.9	+2.8
Bridgeport District	66.7	68.6	66.3	-0.4
Connecticut Statewide	82.7	83.8	82.9	+0.2

*% change is the difference between the results from 2006 and 2008. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The results from Table 26 indicate that 6th graders at Classical Studies Academy performed much better than their district peers and very similar to their state-wide peers. Specifically, 82.1% of the 6th graders at Classical passed the CMT writing test in 2006, which was almost identical to their state peers and well above (15 percentage points) their district peers. In 2007, about 75% of the 6th graders at Classical passed the writing test, which was about 7 percentage points lower than the previous year, but still above the district. By 2008, about 85% of the 6th graders at Classical passed the writing test which was about 18 percentage points higher than at the Bridgeport District level and 2 percentage points higher than their state-peers.

Summary:

In general, it is important to note the ethnic and socioeconomic differences between the Classical Studies Academy, Bridgeport District, and the state of Connecticut. As seen in Table 14, about

67% of the students statewide are described as White, compared to about 10% at Classical and 9% in Bridgeport. Consequently, both Classical (47%) and Bridgeport (42%) reported a higher percentage of students described as Black when compared to the state (14%). In addition, Classical (34%) and Bridgeport (45%) reported a much higher percentage of students described as Hispanic than at the state level (15%). More importantly, though, is the significant difference between socioeconomic status, as defined by the "economic disadvantage" standing, at the school, district, and state level. Amazingly, the percentage of students reported to receive free or reduced lunch was almost 89% at Classical Studies Academy and 93% in Bridgeport – this compared to only 26.6% at the state level. Therefore, it might be a better to view the results in the context of comparing students at Classical to their peers at Bridgeport rather than the state level.

Overall, students at the Classical Studies Academy performed as well, better, or much better than their district peers on the *Connecticut Mastery Test (CMT)* in the areas of reading, mathematics, and writing. Specific to reading, students in the lower grades (3 and 4) at Classical performed similar to their district peers and well below their state-wide peers in Connecticut, but showed a sizeable increase in percentage of students that passed the reading test in 5th and 6th grade compared to their district peers. This increase also brought them closer to their state peers. It is important to note, though, that even with the increase in percentage passing the test 5th and 6th grade, the students at Classical were still well behind their state peers.

It is difficult to summarize the results in math across the three levels because of the variability at the Classical Studies Academy. It was evident that about 80% of the state-peers and 50-60% of the students of the Bridgeport-district-peers passed the CMT math test in grades 3 through 6. This was evident across the academic years of 2006 through 2008. Specific to students at the Classical Studies Academy, 50 to 60% of students in grades 3 and 5 passed the CMT test across the three academic years – similar to their Bridgeport peers. In 4th grade, about 55% of students at Classical passed the math test in 2006 and 2007, yet only 36.5% passed in 2008. On the other end of the spectrum, 6th graders at Classical performed much better than their district peers (70 to 80% pass rate compared to 50 to 60%) and as well or better than their state peers (2008 data: 86.8% pass rate at Classical compared to 84.3% at the state – see Table 22).

The results in writing virtually parallel those in math in that the CMT scores were stable at the district and state level and variable at Classical. For grades 3 and 5, about 10 percentage points more students at Classical passed the writing test than those at Bridgeport. As expected, students at the state level continued to outperform 3rd and 5th graders at Classical and Bridgeport, with the gap slowly closing between the school and state. Consistent with mathematics, the 4th graders in 2008 at Classical had difficulty with the CMT writing test, which led to a significant (33%) drop from 2006 (see Table 24). Also similar to the pattern in mathematics, the 6th graders at Classical consistently outperformed their district peers and equaled or exceeded their state-wide peers by 2008. As seen in Table 26, about 85% of the 6th graders at Classical passed the writing test, which was about 19 percentage points higher than their district peers, and 2 percentage points higher than their state peers.

MEADOWFIELD (SC) ELEMENTARY

The following information was gathered from Meadowfield Elementary School (MES) homepage. Meadowfield Elementary School is an urban elementary (K-5) school located in the capitol city of Columbia, SC. According to the school's homepage, Meadowfield's vision is one in which intellectual and social characteristics flourish within an active, democratic, learning community; and a passion for lifelong learning evolves. The mission of Meadowfield Elementary School is to prepare and equip students to excel academically; accept responsibility for their actions; demonstrate positive character traits; contribute meaningfully to society; and become confident, lifelong learners. Meadowfield is a diverse home and community partnership, united by commitment to rigorous academic engagement, and led by highly-qualified staff who are supported by necessary resources. Meadowfield Elementary implemented the Paideia Model when it opened in 2005.

The data below begin with a demographic comparison (see Table 27) between Meadowfield Elementary, the local (Richland 1) School District, and the state of South Carolina for 2006. These data were found at the state education webpage found in Appendix A.

Table 27: Demographics for 2006

Level	Male	Female	White	Black	Hispanic	E.D.
Meadowfield Elementary	53.0	47.0	21.4	74.8	2.5	57.9
Richland 1 School District	50.0	49.5	17.9	78.6	2.0	61.8
South Carolina State	51.0	48.6	53.9	40.2	4.0	51.6

E.D. = Economically Disadvantaged

Demographic data provided in Table 27 above reveals that Meadowfield Elementary has a slightly higher ratio of males to females (53:47) when compared to the local district (50:50) and state (51:49). There is a significant difference between the percentages of students described as White that attend Meadowfield and Richland School District 1 when compared to the state of South Carolina. The state reported approximately 54% of its students as White, compared to only 21.4% of Meadowfield students and 17.9% of the school district. This difference is contrasted with the percentage of students described as Black, which across the state of S.C. is about 40% compared to about 74.8% at Meadowfield Elementary, and 78.6% in Richland 1. The percentage of students described as Hispanic is relatively low and consistent between Meadowfield (2.5%) and Richland 1 (2.0%), both slightly lower than the state (4.0%). A final demographic data point addresses students described as Economically Disadvantaged. The data revealed about 58% of Meadowfield students met the state criteria for this category, which is slightly lower than the local district (61.8%), but about 6.3% higher than the state of S.C (57.9 – 51.6 = 6.3).

The data below compare the results from the *Palmetto Achievement Challenges Test (PACT)* test scores in the year 2005-2006 and 2006-2007. The PACT is a state-constructed achievement test that evaluates students in grades 3-8. The information is presented by grade (3, 4, and 5) in English/language arts and mathematics. The information below was taken from the South Carolina State Education webpage found in Appendix A.

English/Language Arts

Table 28: Percentage of students that passed the Palmetto Achievement Challenges Test:
ENGLISH/LANGUAGE ARTS
3rd Grade

Level of Assessment	2005-2006	2006-2007	% Change
Meadowfield Elementary	77.3	84.5	+7.2
Richland 1 School District	80.2	81.6	+1.4
South Carolina Statewide	86.4	85.8	-0.6

The results seen in Table 28 indicate that 84.5% of 3rd graders at Meadowfield Elementary School passed the English/Language Arts portion of the Palmetto Achievement Challenges Test (PACT) in the 2006-2007 academic year. Compared to the local school district (Richland 1), a higher percentage (2.9) of Meadowfield 3rd graders passed the English/Language Arts test. Statewide, 85.8% of the 3rd graders passed the PACT English/Language Arts test in 2006-2007, which is slightly (1.3%) higher than Meadowfield.

Analyzing the data across academic years reveals that students at Meadowfield showed a marked improvement in their PACT scores from 2005-2006 to 2006-2007. An overall increase of 7.2% is noticeably higher than Richland 1 (+1.4%) and much better than the state average, which actually dropped (-0.6%). In summary, it appears that based on the two most recent years of data, that 3rd graders at Meadowfield have passed their district peers and caught up to their state peers in the percentage of students passing the PACT English/Language Arts Test.

Table 29: Percentage of students that passed the Palmetto Achievement Challenges Test:
ENGLISH/LANGUAGE ARTS
4th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Meadowfield Elementary	78.5	81.4	+2.9
Richland 1 School District	76.5	78.9	+2.4
South Carolina Statewide	81.8	82.7	+0.9

Information provided in Table 29 revealed that 81.4% of 4th graders at Meadowfield Elementary passed the PACT English/Language Arts Test in the 2006-2007 academic year. This pass percentage of 81.4 is 2.5 percentage points higher than the local district (81.4 – 78.9 = 2.5) and 1.3 percentage points lower than the state average (82.7 – 81.4 = 1.3).

Similar to the 3rd graders (see Table 28), Meadowfield Elementary has closed the gap between the percentage of their 4th graders that passed the PACT English/Language Arts Test and their state peers. While the S.C. statewide scores improved 0.9 percentage points between the 2006 and 2007 academic year, the Meadowfield scores improved 2.9 percentage points and the district improved 2.4 percentage points.

Table 30: Percentage of students that passed the Palmetto Achievement Challenges Test: ENGLISH/LANGUAGE ARTS
5th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Meadowfield Elementary	63.6	70.9	+7.3
Richland 1 School District	73.0	70.8	-2.2
South Carolina Statewide	79.8	77.2	-2.6

Results for 5th graders who took the PACT English/Language Arts Test in 2006 and 2007 revealed noticeable improvement for students at Meadowfield and a decline in success at the district and state level. As seen in Table 30, about 71% of Meadowfield students passed the PACT in 2006-2007 which is virtually identical to the results at the district level (70.8%) and over 6 points below the state (77.2 – 70.9 = 6.3). Comparing academic years revealed that approximately 7% more 5th graders at Meadowfield passed the Reading/Language Arts Test in 2007 than 2006 (70.9 – 63.6 = 7.3), which is interesting since the percentage of students that passed the test at the district and state level actually dropped. A percent change of -2.2 at the district level and -2.6 at the state level resulted in the 5th graders in the 2007 academic year at Meadowfield gaining almost 10 percentage points on the state average (7.3 + 2.6 = 9.9).

Math

Table 31: Percentage of students that passed the Palmetto Achievement Challenges Test: MATH
3rd Grade

Level of Assessment	2005-2006	2006-2007	% Change
Meadowfield Elementary	72.7	75.8	+3.1
Richland 1 School District	65.7	65.1	-0.6
South Carolina Statewide	80.9	78.4	-2.5

Results in Table 31 show that 75.8% of the 3rd graders in the 2006-2007 academic year passed the PACT Math Test, which was a percent-change improvement of +3.1 from the previous year (75.8 – 72.7 = 3.1). Further, it appears that a significantly higher percentage of 3rd grade students at Meadowfield passed the math test in both academic years when compared to their Richland 1 School District peers. Specifically, 75.8% of the 3rd graders at Meadowfield passed the test in 2006-2007 while only 65.1% of their district peers passed. This difference of 10.7 percentage points (75.8 – 65.1 = 10.7) is noteworthy. In addition, the 3rd graders at Meadowfield reduced the gap between their pass rate and the pass rate at the state level, although a lower percentage of Meadowfield students passed. Specifically, 78.4% of 3rd graders at the state level passed the PACT Math Test in 2006-2007 compared to 75.8% of the students at Meadowfield (a difference of 2.6 in favor of the state); yet, there was a positive percent-change at Meadowfield between the two academic years of +3.1, while there was a drop in the percentage of student that passed at the state level of -2.5.

Table 32: Percentage of students that passed the Palmetto Achievement Challenges Test: MATH 4th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Meadowfield Elementary	79.7	72.1	-7.6
Richland 1 School District	68.4	69.0	+0.6
South Carolina Statewide	78.4	78.1	-0.3

The results in Table 32 indicate that 72.1% of 4th graders at Meadowfield passed the PACT Math Test in 2006-2007, which was a noticeable decline from the previous year when 79.7% of the 4th graders passed the test. This -7.6% difference (79.7 – 72.1 = 7.6) is interesting in that the difference between the two academic years at the district (+0.6) and state (-0.3) were almost unchanged. In general, the results illustrate that a slightly higher percentage of 4th graders at Meadowfield passed the PACT when compared to Richland 1 (72.1 – 69.0 = 3.1; 79.7 – 68.4 = 11.3). The differences were more noticeable at the state level, though, where the 2005-2006 academic year revealed that a slightly larger percentage of Meadowfield students passed the test when compared to the state (79.7 – 78.4 = 1.3), yet a large difference occurred between the two levels in 2006-2007 as a higher percentage of statewide students (78.1) passed the test compared to Meadowfield (72.1) – a 6 point difference.

Table 33: Percentage of students that passed the Palmetto Achievement Challenges Test: MATH 5th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Meadowfield Elementary	52.5	60.5	+8.0
Richland 1 School District	65.0	65.9	+0.9
South Carolina Statewide	75.9	77.7	+1.8

Table 33 illustrates the results of 5th grade students' performance on the PACT Math Test at Meadowfield. As can be seen for the academic year of 2006-2007, a much lower percentage of 5th graders at Meadowfield (60.5) passed the math test when compared to their district (65.9) and state peers (77.7). This difference was more pronounced during the 2005-2006 academic year when just over half (52.5%) of the Meadowfield students passed the math test compared to slightly more than three-fourths (75.9%) of their state peers and 65% of their local district peers. On the positive side, the percent-change between the two academic years revealed a +8.0 percent increase in the pass rate at Meadowfield compared to +0.9 and +1.8 percent increase at the local and state level respectively. Stated differently, a much smaller percentage of 5th grade students at Meadowfield pass the PACT Math Test when compared to their local and state peers, but they made significant strides to catch up between the 2005-2006 and 2006-2007 academic years.

Summary:

Overall, a higher percentage of students across grades 3 through 5 and across the school (Meadowfield Elementary), district (Richland School District 1), and state (S.C.) passed the *Palmetto Achievement Challenges Test (PACT)* in English/Language Arts than Mathematics. A

range of approximately 70-85% of students passed the English/Language Arts Test as compared to approximately 52-80% of the students passed the Math Test when analyzing the data across all levels and both academic years.

Within this context, the 3rd and 4th grade students at Meadowfield improved their performance on the English/Language Arts Test between 2006-2007 and 2006-2007 academic years to a level that exceeded their local district peers and was almost equal to their state peers. The results at 5th grade revealed the largest increase between academic years for students at Meadowfield (+7.3%), which allowed them to catch up to their district peers, but still behind their statewide peers.

Regarding mathematics, students in 3rd and 5th grade showed noticeable improvement in the pass percentage between 2005-2006 and 2006-2007 (+3.1 and +8.0 respectively), yet showed a large drop between the two academic years for 4th graders (-7.6). The increase in 3rd grade put the percentage of students at Meadowfield about 10 percentage points higher than their local district peers and approximately 3 percentage points lower than their state peers. The drop in percentage of 4th grade students passing the math test between academic years revealed that Meadowfield students were still slightly (3 percentage points) higher than their Richland 1 School District peers, but below (6 percentage points) their South Carolina peers. Finally, the large increase in percent change (+8.0) for the 5th graders at Meadowfield reduced the gap between their district and state peers, but they are still about 5 percentage points behind Richland School District 1, and 17 percentage points behind their state peers.

PARK LODGE (WA) ELEMENTARY SCHOOL

Park Lodge Elementary School is located in Lakewood, WA and is part of the Clover Park School District which is within the Puget Sound Educational Service District. Park Lodge is a K-6 school that was established in 1997. The Paideia Model was introduced the fall of 1998, which was in Park Lodge's second year. Therefore, Park Lodge has been a Paideia school for 9 years.

Table 34: Demographics for 2007-2008*

	Male	Female	White	Black	Hispanic	Asian A	Free/R.L.
Park Lodge Elementary	50.3	49.7	49.2	15.6	11.7	8.9	52.9
Clover District	51.6	48.4	47.2	19.8	16.5	7.3	57.9
State of Washington	51.6	48.4	65.8	5.7	14.6	8.1	38.0

Free or R.L. = Free or Reduced Lunch

*Note: Ethnicity data add up to approximately 85% as opposed to 100%. This data were taken from the state webpage found in Appendix A.

The data above (see Table 34) describes the demographic comparison between Park Lodge Elementary, the Clover District, and state of Washington. As can be seen, the male-female ratio is relatively consistent across the school, district, and state level. With regard to ethnicity, both Park Lodge (49.2) and Clover School District (47.2) have just under half of their school students described as White, which is much lower than the at the state level (65.8). The difference appears to be due to the higher percentage of students described as Black. While the state reported 5.7% of its students as Black, Park Lodge reported 15.6% and Clover District reported 19.8%. The population described as Hispanic was somewhat lower at Park Lodge (11.7%) as opposed to the state (14.6%) and Clover District (16.5%). In addition, the Asian American population was consistent across the three levels. Finally, an estimate of socio-economic status is established through the number of students that qualify for free or reduced lunch. As seen above, both Park Lodge (52.9%) and the Clover District (57.9%) have a much higher percentage of students that qualified for free or reduced lunch than the state average (38%). In summary, based on the demographic data above, Park Lodge and the local Clover School District have a lower percentage of students described as White, a higher percentage of students described as Black, and a much higher percentage of students that qualified for free or reduced lunch when compared to the state.

The data below compare the results from the *Washington Assessment of Student Learning (WASL)* test scores in the years 2005-2006, 2006-2007, and 2007-2008. The WASL is a state-constructed achievement test that evaluates students in grades 3-8 and 10. The information is presented by grade (3, 4, and 5) in reading and mathematics as well as grade 4 for writing. In order to provide some comparisons, data are provided for Park Lodge Elementary School, the Clover School District, and statewide. The data are presented as percentage (%) of students that passed the WASL across the three years followed by the percent change (% Change) across the three years. The percent change provides a trend over the three-year period from 2005-2006 through 2007-2008. For example, if 75% of 3rd grade students passed the WASL in 2005-2006 and 80% passed in 2007-2008, the percent change would be +5.0.

Reading

Table 35: Percentage of students that passed the Washington Assessment of Student Learning (WASL) Test: READING
3rd Grade

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change
Park Lodge Elementary	76.1	64.8	59.4	-16.7
Clover School District	59.3	61.2	57.6	-1.7
Washington Statewide	68.3	70.9	70.4	+2.1

As seen above in Table 35, 3rd graders at Park Lodge Elementary performed noticeably better than their Clover School District and Washington state peers in 2005-2006, but trended downward over the next two academic years to where they are currently performing similarly to their district peers and below their statewide peers in 2007-2008. Specifically, 76.5% of the 3rd graders at Park Lodge passed the WASL Reading test in the 2005-2006 academic year, which was 16.8 percentage points higher than their Clover District peers (76.1 – 59.3 = 16.8) and 7.8 percentage points higher than the statewide performance (76.1 – 68.3 = 7.8). Over the next two academic years, the statewide performance revealed small increases (68.3% pass rate in 2005-2006 to 70.4 pass rate in 2007-2008), while the Clover District showed some fluctuation between 2005-2006 and 2007-2008. Park Lodge, on the other hand, showed a noticeable decline in the percentage of 3rd graders that passed the WASL Reading test, dropping 11.3 percentage points from 2005-2006 to 2006-2007 (76.1 – 64.8 = 11.3). This was followed by another drop in the percentage of 3rd graders that passed the test in 2007-2008, which led to an overall percent change of -16.7 across the three academic years (76.1 – 59.4 = 16.7).

Table 36: Percentage of students that passed the Washington Assessment of Student Learning (WASL) Test: READING
4th Grade

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change
Park Lodge Elementary	68.3	68.1	75.5	+7.2
Clover School District	69.6	65.5	61.2	-8.4
Washington Statewide	81.2	76.6	72.3	-8.9

Overall, it appears that 4th graders at Park Lodge Elementary School have increased the percentage of students that passed the WASL Reading test over the past three years. This improvement comes during a time when both the Clover District and statewide performance displayed a drop in the percentage of students that passed the test. Specifically, 75.5% of the 4th graders at Park Lodge passed the WASL Reading test in the 2007-2008 academic year, compared to 68.3% in 2005-2006 (a percent change increase of 7.2), while their district peers showed an 8.4 *decrease* in the percentage of students passing the WASL (69.6 – 61.2 = 8.4). The declining trend was also found at the state level where 81.2% passed the WASL in 2005-2006, and only 72.3% in 2007-2008; a percent change decrease of 8.9.

Table 37: Percentage of students that passed the Washington Assessment of Student Learning (WASL) Test: READING
5th Grade

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change
Park Lodge Elementary	69.8	69.8	69.4	-0.4
Clover School District	65.8	61.1	61.3	-4.5
Washington Statewide	76.3	71.9	75.3	-1.0

The results of the WASL Reading test for 5th graders, found in Table 37, revealed consistent performance across the school (Park Lodge) and state (Washington), and a slight decrease at the district (Clover) level. As seen above, about 69% of the 5th graders at Park Lodge passed the reading test across the three academic years. This performance is approximately 8 percentage points higher than their peers at Clover School District (69.4 – 61.3 = 8.1), and about 6 percentage points lower than their state-peers (75.3 – 69.4 = 5.9).

Math

Table 38: Percentage of students that passed the Washington Assessment of Student Learning (WASL) Test: MATH
3rd Grade

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change
Park Lodge Elementary	58.7	63.0	63.8	+5.1
Clover School District	50.5	57.6	54.0	+3.5
Washington Statewide	64.2	69.6	68.3	+4.1

The results from the 3rd graders' performance on the WASL Math test reveal positive trends across the school, district, and state level, with the performance at Park Lodge being somewhat better than Clover District, and slightly worse than 3rd graders at the state level. Specifically, 63.8% of the 3rd graders at Park Lodge passed the math test during the 2007-2008 academic year, which is a 5.1 percent increase over the performance of the 3rd graders that took the WASL in 2005-2006 (63.8 – 58.7 = 5.1). In addition, a higher percentage of students at Park Lodge, at a rate of 8-9% each year, passed the math test compared to the Clover School District. On the other hand, a higher percentage of 3rd graders at the state level, at a rate of 5-6% each year, passed the math test compared to the Park Lodge students.

Table 39: Percentage of students that passed the Washington Assessment of Student Learning (WASL) Test: MATH
4th Grade

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change
Park Lodge Elementary	43.3	57.4	53.1	+9.8
Clover School District	41.8	43.4	31.8	-10.0
Washington Statewide	58.9	58.1	53.4	-5.5

Table 39 reveals that 4th graders at Park Lodge made significant improvements over the three year period. This improvement is more impressive when one factors in the fact that there was a noticeable decrease in the percentage of 4th graders that passed the math test at the district and state level. During the 2007-2008 academic year, 53.1% of the 4th graders at Park Lodge passed the WASL Math test, which is 9.8% more than passed the test in 2005-2006 (53.1 – 43.3 = 9.8). During the same time frame (2007-2008), only 31.8% of the students in the Clover District passed the math test, which is a 10 percentage point decrease when compared to 2005-2006. Furthermore, the difference between the performance of students at Park Lodge and Clover District was significantly different over the three year period. In 2005-2006, the percent difference between Park Lodge and Clover was 1.5% (43.3 – 41.8 = 1.5) in favor of Park Lodge, yet, when comparing the 2007-2008 academic year, this difference increased to 21.3% (53.1 – 31.8 = 21.3). When comparing school and state data, it appears that the Park Lodge 4th graders caught up to the Washington state with respect to overall performance on the WASL Math test. In 2006-2006, there was a 15.6 percent difference in favor of the state when comparing Park Lodge and the state (58.9 – 43.4 = 15.6), yet this difference was reduced to 0.3% by 2007-2008 (53.4 – 53.1 = 0.3).

Table 40: Percentage of students that passed the Washington Assessment of Student Learning (WASL) Test: MATH
5th Grade

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change
Park Lodge Elementary	41.3	52.3	55.1	+13.8
Clover School District	40.4	46.9	43.8	+3.4
Washington Statewide	55.8	59.5	61.0	+5.2

The results for 5th graders, as seen in Table 40, are similar to the findings for 4th graders in that students at Park Lodge showed a more noticeable improvement across the three years when compared to the district and state level. Unlike the results for 4th graders, the trend for 5th graders across the school, district, and state were positive. Specifically, a positive percent change of 13.8 occurred for 5th graders between the 2005-2006 and 2007-2008 academic year (55.1 – 41.3 = 13.8). The 55.1% pass rate for Park Lodge students in 2007-2008 was 11.3% more than the pass rate at the Clover District (55.1 – 43.8 = 11.3), and about 6% less than the state level (61 – 55.1 = 5.9).

Writing

Table 41: Percentage of students that passed the Washington Assessment of Student Learning (WASL) Test: Writing
4th Grade

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change
Park Lodge Elementary	49.2	57.4	59.2	+10.0
Clover School District	47.2	47.1	49.5	+2.3
Washington Statewide	60.4	60.2	62.1	+1.7

The findings of the WASL Writing test reveals that 4th graders at Park Lodge Elementary showed noticeable improvements across the three years, and this improvement was at a much higher percent change than at the district or state level. There were 59.2% of the 4th graders at Park Lodge that passed the writing test in 2007-2008, compared to 49.2% in 2005-2006; a percent change of +10.0. During this time frame, 4th graders at the Clover District showed a +2.3 percent change, but actually fell further behind their Park Lodge peers by almost 10 percentage points (59.2 – 49.5 = 9.7). During this same time frame, Park Lodge closed the gap between its 4th graders and those at the state level. In 2005-2006, a percent difference of 11.2 existed between the pass-rate at Park Lodge and the state (60.4 – 49.2 = 11.2), yet this difference was reduced significantly by 2007-2008 when the difference was 2.9% (62.1 – 59.2 = 2.9).

Summary:

Regarding demographics, it is evident that both Park Lodge Elementary and the local Clover School District serve a much higher percentage of students on free and reduced lunch than is typical across the state of Washington. In general, a higher (and often much higher) percentage of Park Lodge students in grades 3 through 5 passed the WASL Reading, and WASL Math test when compared to their Clover School District peers. This finding was also true for the Park Lodge 4th graders on the WASL Writing test.

When compared to the state level, the results fluctuated based on the grade and subject. A significantly lower percentage of 3rd graders at Park Lodge passed the WASL Reading than their state peers, while a higher percentage of Park Lodge 4th graders passed. The trend reversed itself for 5th graders in that a lower percentage of these students passed the reading test when compared to the state level.

The fluctuating trend was also found when comparing the results on the WASL Math test. A higher percentage of 3rd and 5th graders at the state level passed the math test when compared to the Park Lodge students, while there was no noticeable difference between the results at the 4th grade level.

Finally, with the exception of 3rd grade reading, the performance across the three years of data revealed a solid and positive trend line for students at Park Lodge. In other words, to the exclusion of the reading results for 3rd graders, there were a higher percentage of students passing the reading, math, and writing WASL tests at Park Lodge between the 2005-2006 and 2007-2008 academic years than there was at the district and state level.

PROVIDENCE SPRING (NC) ELEMENTARY

The following introductory information was gathered from the Providence Spring (NC) Elementary homepage. Providence Spring Elementary is a Kindergarten to 5th grade school serving neighborhoods in the South Learning Community in Charlotte, North Carolina. The school currently utilizes the Paideia model.

The data below begin with a demographic comparison (see Table 42) between Providence Spring Elementary, the Charlotte-Mecklenburg School District, and the state of North Carolina for 2007. Table 43 displays the percentage of students, grouped by gender, ethnicity, and other factors who passed the End of Grade (EOG) Composite Test for 2006-2007.

Table 42: Demographics for 2007

	Male	Female	White	Black	Hispanic	Multi-Racial	L.E.P.	S.W.D.
Providence Spring Elementary	49.9	50.1	85.7	3.9	2.8	2.0	2.6	8.1
Charlotte-Mecklenburg School District	50.7	49.3	34.9	42.7	14.4	3.1	14.9	10.6
North Carolina State	*	*	55.8	31.3	9.3	*	*	*

L.E.P = Limited English Proficiency; S.W.D. = Students with Disabilities; * = Data not available

As noted in Table 42, the ethnic differences between Providence Spring Elementary and its peer district (Charlotte Mecklenburg) are noticeable. As seen above, 85.7% of the students at Providence Spring were described as White, compared to 34.9% in Charlotte and 55.8% in the state. Consequently, only 3.9% of the students at Providence Spring were described as Black, compared to 42.7% in Charlotte-Mecklenburg and 31.3% in the state. Finally, Charlotte (14.4%) and the state (9.3%) reported a higher percentage of students described as Hispanic than Providence Spring (2.8%).

Table 43: Percentage of students, grouped by gender, ethnicity, and other factors who passed the End of Grade Composite Test for 2006-2007: READING and MATH

	Male	Female	White	Black	Hispanic	Multi-Racial	E.D.	N.E.D.	L.E.P.	S.W.D.
Providence Spring Elementary	>95	>95	>95	93.3	76.9	>95	88.9	>95	N/A	82.8
Charlotte-Mecklenburg School District	60.9	64.8	85.4	46.0	52.2	67.1	45.1	79.8	30.9	29.3
North Carolina State	62.7	65.2	75.9	43.5	52.5	64.7	48.5	77.2	38.3	33.7

E.D. = Economically Disadvantaged; N.E.D.= Not Economically Disadvantaged; L.E.P = Limited English Proficiency; S.W.D. = Students with Disabilities; N/A = 5 or fewer students

The data below compare the results from the "End of Grade" (EOG) test scores in the year 2005-2006 and 2006-2007. The EOG is a state-constructed achievement test that evaluates students in grades 3-8. The information is presented by grade (3, 4, and 5) in reading and mathematics.

Reading

Table 44: Percentage of students that passed the End of Grade Composite Test: READING
3rd Grade

Level of Assessment	2005-2006	2006-2007	% Change
Providence Spring Elementary	>95	>95	0.0
Charlotte-Mecklenburg District	84.0	81.5	-2.5
North Carolina Statewide	82.9	81.8	-1.1

Table 45: Percentage of students that passed the End of Grade Composite Test: READING
4th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Providence Spring Elementary	>95	>95	0.0
Charlotte-Mecklenburg District	83.4	85.1	+1.7
North Carolina Statewide	83.4	85.2	+1.8

Table 46: Percentage of students that passed the End of Grade Composite Test: READING
5th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Providence Spring Elementary	>95	>95	0.0
Charlotte-Mecklenburg District	87.9	89.1	+1.2
North Carolina Statewide	88.4	89.3	+0.9

In general, the data in Tables 44, 45, and 46 (see above) indicate that a high percentage (greater than 95%) of the 3rd, 4th, and 5th grade students at Providence Spring Elementary school pass the End of Grade test in reading. These results are consistent across two academic years (2005-2006 and 2006-2007) as well as across all three grades. Data that are this consistent across multiple grades and academic years provides strong evidence of successful reading programs. Further, in comparison to the local district a noticeable percentage of 3rd through 5th graders at Providence Spring consistently outperformed their local district (Charlotte-Mecklenburg) and state (North Carolina) peers. Specifically, at least 13% more 3rd graders at Providence Spring passed the EOG test than did students in the district and state (>95 – 81.5 = 13.5). A 10 percentage point difference was also noted for 4th graders (>95 – 85.1 = 10), while a smaller but impressive difference of approximately 6 percentage points was noted in 5th grade (>95 – 89.1 = 5.9).

Mathematics

Table 47: Percentage of students that passed the End of Grade Composite Test: MATH 3rd Grade

Level of Assessment	2005-2006	2006-2007	% Change
Providence Spring Elementary	>95	>95	0.0
Charlotte-Mecklenburg District	69.7	70.1	+0.4
North Carolina Statewide	67.8	70.8	+3.0

Table 48: Percentage of students that passed the End of Grade Composite Test: MATH 4th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Providence Spring Elementary	>95	93.4	-1.6
Charlotte-Mecklenburg District	66.9	68.3	+1.4
North Carolina Statewide	65.0	67.7	+2.7

Table 49: Percentage of students that passed the End of Grade Composite Test: MATH 5th Grade

Level of Assessment	2005-2006	2006-2007	% Change
Providence Spring Elementary	>95	>95	0.0
Charlotte-Mecklenburg District	67.4	68.6	+1.2
North Carolina Statewide	63.1	66.7	+3.6

Consistent with reading, and reported in Tables 47, 48, and 49 above, Providence Spring Elementary school students in grades 3-5 performed extremely well on the End of Grade (EOG) test in mathematics. Specifically, more than 95% of students in 3rd and 5th grade passed the test, while 93.4% of the 4th grade students passed. More impressive, though, is when the Providence Spring students are compared to their district (Charlotte-Mecklenburg) and state (North Carolina) peers. Approximately 70% of students in the district and state passed the EOG compared to over 95% of the students at Providence Spring. This large (26%) gap was also found in 4th grade (95 -68.6 = 26.4) at the district level, as well as at the state (28%) level (95 – 66.7 = 28.3).

Summary:

In general, at or more than 95% of the 3rd, 4th, and 5th grade students at Providence Spring Elementary school passed the reading and mathematics portion of the End of Grade test during both 2005-2006 and 2006-2007 school year. In addition, a much larger percentage of the

Providence Spring Elementary students passed the EOG test when compared to their district and state peers. In reading, the difference across the three grades was about 13% in 3rd grade (>95 – 81.5 = 13.5) to about 6% in 5th grade (>95-89.1 = 5.9). The difference between Providence Spring Elementary students and their district and state peers was more pronounced in mathematics. The difference in EOG results ranged from about 25% in 3rd grade (>95-70.1 = 24.9) to approximately 28% in 5th grade (>95-66.7=28.3).

PUEBLO SCHOOL FOR THE ARTS AND SCIENCES

The following information was obtained from the Pueblo School for the Arts and Sciences (PSAS) homepage. The Pueblo School for the Arts and Sciences, located in Pueblo, CO, has as its vision to be an exemplary educational community which teaches skills and provides opportunities, inspiring respectful, creative, competent, productive, and lifelong learners. The Pueblo School for Arts and Sciences believes that "the best education for the best is the best education for all". See Appendix A for web-pages related to PSAS data.

The data below begin with a demographic comparison (see Table 50) between Pueblo School for the Art and Sciences, the Pueblo City District, and the state of Colorado for 2007.

Table 50: Demographics, grouped by gender, ethnicity, and other factors for 2007

	Male	Female	White	Black	Hispanic	E.D.
Pueblo School for the Arts and Sciences	45.7	54.3	40.4	3.3	53.5	67.3
Pueblo City District	51.8	48.2	34.2	2.7	61.1	66.9
Colorado State	51.3	48.7	62.0	6.0	27.5	33.9

E.D. = Economically Disadvantaged

Table 50 above compares demographic information between Pueblo School for the Arts & Sciences (PSAS) with their local district (Pueblo City) and the state of Colorado. As can be seen the gender differences are insignificant between the district and state, while PSAS showed about a 6% higher ratio of female-to-male students. Comparing ethnicity between the three levels reveals that about 62% of the students in Colorado are described as White, which is about 20% higher than PSAS (40.4%) and 26% higher than Pueblo City District (34.2%). While the population described as Black is low across all three levels, a significant difference is found with the Hispanic population. Whereas 27.5% of the students across the state of Colorado were described as Hispanic, over 53% of students at PSAS and more than 61% of the students in Pueblo City District were described as Hispanic. Finally, and possibly of most importance, the percentage of students described as "economically disadvantaged" is much higher at PSAS (67.3%) and Pueblo City District (66.9%) than across the state (33.9%).

The data below compare the results from the *Colorado Student Assessment Program (CSAP)* test scores in the years 2005, 2006, and 2007. The CSAP is a state-constructed achievement test that evaluates students in grades 3-10. The information is presented by grade (3, 4, 5, 6, 7, and 8) in reading, mathematics, and writing. The webpage where the data were collected can be found in Appendix A under Pueblo School for the Arts and Sciences

Reading

Table 51: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: READING
3rd Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	82.0	74.0	75.0	-7.0
Pueblo City District	83.0	78.0	79.0	-4.0
Colorado Statewide	71.0	70.0	71.0	0.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The results in Table 51 indicate that, from 2005 through 2007, the 3rd graders at Pueblo School for the Arts and Sciences (PSAS) performed better than their Colorado state peers and similar to their Pueblo City District peers on the *Colorado Student Assessment Program (CSAP)*. Specifically, approximately 75-82% of the 3rd graders at PSAS passed the CSAP in 2005, 2006, and 2007. For comparison, about 78-83% of the 3rd graders in the Pueblo City District peers passed the CSAP, which is about an 8-12 percentage point difference with the statewide data which revealed about a 70% pass rate.

Table 52: Percentage of students that scored proficient and advance on the Colorado Student Assessment Program: READING
4th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	62.0	75.0	56.0	-6.0
Pueblo City District	69.0	73.0	66.0	-3.0
Colorado Statewide	64.0	68.0	64.0	0.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

In general, 4th graders across the school, district, and state level showed variability in their performance over the three academic years, with all three levels showing a higher percentage of passing students in 2006 than in 2005 or 2007. This difference was greatest as PSAS, where 62% of the 4th graders passed the CSAP reading test in 2005, yet 75% (+13 percentage points) passed in 2006. Interestingly, only 56% passed in 2007, which is a -19 percentage point difference between 2006, and a -6 percentage point difference between 2005. The 4th graders at Pueblo City District revealed a similar pattern to PSAS but with less variability. As seen above, between 66 and 73% of the 4th graders in Pueblo City District passed the CSAP reading test, with 2006 being the year in which the highest percentage passed. This pattern describes the state-wide results also in that between 64 and 68% passed across the three academic years, with the highest percentage (68) passing in 2006.

Table 53: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: READING
5th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	61.0	72.0	63.0	+2.0
Pueblo City District	69.0	72.0	69.0	0.0
Colorado Statewide	69.0	70.0	69.0	0.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 53 reveals that 5th graders at PSAS performed as well as their district peers and better than their state peers in 2006, but slightly worse than both levels in 2005 and 2007. The percentage of 5th graders that passed the CSAP reading test at Pueblo City and the state of Colorado were almost identical (between 69 and 72%), while students at PSAS scored about 8 percentage points lower in 2005 (69 – 61 = 8), equal to both groups in 2006, and about 6 points lower in 2007 (69 – 63 = 6).

Table 54: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: READING
6th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	74.0	81.0	80.0	+6.0
Pueblo City District	60.0	64.0	63.0	+3.0
Colorado Statewide	67.0	69.0	70.0	+3.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 54 reveals that a significantly higher percentage of 6th graders at PSAS passed the CSAP reading test when compared to their district and state peers. As seen above, about 80% of 6th graders at PSAS passed the reading test in 2006 and 2007, which is about 17 percentage points higher than their peers in the Pueblo City District (80 – 63 = 17), and approximately 11 percentage points higher than their peers at the state level (81 – 69 = 12; 80 – 70 = 10).

Table 55: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: READING
7th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	42.0	68.0	64.0	+22.0
Pueblo City District	52.0	55.0	52.0	0.0
Colorado Statewide	64.0	64.0	65.0	+1.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 55 shows a tremendous increase (+22%) in the percentage of 7th graders at PSAS that passed the CSAP reading test across the three academic years. The pass rate of 42% for the 7th grade students at PSAS in 2005 was 10 percentage points lower than their district peers, and 22 percentage points lower than their state peers (52 – 42 = 10; 64 – 42 = 22). Yet, by 2006 and continuing into 2007, the 7th graders at PSAS well exceeded their district peers and were equal to of their state peers. Specifically, about 68% of the 7th graders at PSAS passed the reading test in 2006, which were 13 percentage points higher than their district peers and 4 percentage points higher than their state peers. The results in 2007 were almost identical when comparing the school (64% pass rate) to the district (52% pass rate), and virtually equal (65% pass rate) with the state.

Table 56: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: READING
8th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	68.0	57.0	65.0	-3.0
Pueblo City District	55.0	55.0	52.0	-3.0
Colorado Statewide	64.0	66.0	63.0	-1.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The results for 8th graders, found in Table 56, reveal that there are minimal differences between the pass rates for students at PSAS and their state peers, both of which are noticeably higher than their Pueblo City District peers. As seen above, with the exception of 2006 (where the results for PSAS students and Pueblo City were similar and below the state), a slightly higher percentage of 8th graders at PSAS passed the CSAP reading test when compared to the state, and a noticeably higher percentage passed when compared to the local district.

Mathematics

Table 57: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: MATH
3rd Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	74.0	60.0	88.0	+14.0
Pueblo City District	81.0	76.0	71.0	-10.0
Colorado Statewide	68.0	71.0	68.0	0.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

As seen in Table 57, a significantly higher percentage of 3rd graders at PSAS in 2005 and 2007 scored at or above proficient on the CSAP math test when compared to the Pueblo City District and statewide. The results from 2006 were reversed in that a noticeably lower percentage of students at PSAS passed the math test when compared to their district and state peers. Specifically, in 2005, approximately 74% of the 3rd graders at PSAS scored at or above proficient, while this number dropped to 60% in 2006. By 2007, 88% of the 3rd graders at PSAS passed the CSAP test, which was 16 percentage points higher than the local district (88 - 71 = 16) and 20 percentage points higher than the state (88 – 68 = 20).

Table 58: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: MATH
4th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	68.0	70.0	62.0	-6.0
Pueblo City District	77.0	76.0	65.0	-12.0
Colorado Statewide	66.0	69.0	71.0	+5.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The results for 4th graders revealed that students at PSAS passed the CSAP at a similar rate as their state peers in 2005 and 2006, which was slightly below their district peers. Specifically, 68% of 4th graders in 2005 and 70% of 4th graders in 2006 passed the CSAP math test which was comparable to the state level of 66% and 69% respectively, and 6 to 9% lower than the 4th graders at Pueblo City (77 – 68 = 9). For 2007, 62% of the PSAS students passed the test, which was a decline of 8 percentage points from 2006 (70 – 62 = 8), but actually closer to their district peers' 65% pass rate for 2007. This was because there was an 11 percentage point decline from 2006 to 2007 at the district level. It should be noted that the pass rate at the state level improved

slightly over the three academic years, which led to having a moderately higher pass rate in 2007 when compared to PSAS and Pueblo City.

Table 59: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: MATH
5th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	74.0	59.0	61.0	-13.0
Pueblo City District	68.0	70.0	52.0	-16.0
Colorado Statewide	63.0	65.0	65.0	+2.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Results for 5th graders, found in Table 59, reveal that 74% of the PSAS students passed the CSAP math test in 2005, but this percentage dropped noticeably in 2006 (59% pass rate), and stabilized in 2007 (61% pass rate). Compared to the local district, there was an 8 percent positive difference between PSAS and Pueblo City (74 – 68 = 8) in 2005 and a reversal in 2006 where the PSAS pass rate of 59% was 11 percentage points *lower* than Pueblo City at 70%. This difference reversed back in 2007 where the pass rate of 61% for PSAS was 9 percentage points *higher* than the local district at 52%. At the state level, the pass rate for the three academic years was relatively stable at around 65%.

Table 60: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: MATH
6th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	56.0	68.0	62.0	+6.0
Pueblo City District	53.0	49.0	42.0	-11.0
Colorado Statewide	56.0	57.0	60.0	+4.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

For 6th graders, the percentage of students from PSAS that scored at or above proficient was consistently higher than both Pueblo City District and the statewide averages across the three academic years. As noted above in Table 60, the pass rate at PSAS in 2005 of 56% was consistent with the local district and state, yet by 2006, the pass rate jumped 12 percentage points to 68% - much higher than the PSAS peers at Pueblo City (49%) and statewide (57%). In 2007, the pass rate at PSAS of 62% was 20 percentage points higher than at Pueblo City (42%), and slightly higher than the state average of 60%.

Table 61: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: MATH
7th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	21.0	35.0	32.0	+11.0
Pueblo City District	33.0	32.0	50.0	+17.0
Colorado Statewide	46.0	45.0	50.0	+4.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 61 reveals that a relatively low percentage of students at PSAS pass the CSAP math test in the 7th grade when compared to grades 4 through 6 and compared to their state peers; yet, there appears to be a noticeable increase in the percentage of students at the school that passed in 2006 and 2007 when compared to 2005. As can be seen, only 21% of the 7th graders at PSAS passed the math test in 2005, which was well below their district peers (33%) and state peers (46%). There was a significant increase (14%) in the percentage of students at PSAS that passed the math test (35 – 21 = 14) in 2006, which was much closer to their district peers (32%) and only 10 points below their state peers (45%). In 2007, the pass rate of 32% at PSAS was 18 percentage points lower than both Pueblo City and the state of Colorado (both 50%), which was a noticeable improvement for both levels over 2006.

Table 62: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: MATH
8th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	36.0	29.0	13.0	-23.0
Pueblo City District	37.0	25.0	44.0	+7.0
Colorado Statewide	44.0	45.0	46.0	+2.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The results for 8th graders revealed a noticeable decrease in the percentage of students from PSAS that passed the CSAP math test from 2005 to 2007. As seen above, 36% of the 7th graders in 2005 passed the math test, while 29% passed in 2006, and only 13% in 2007. The 13% pass rate for PSAS 7th graders in 2007 was significantly below their peers at the district level (44%) and state level (46%).

Writing

Table 63: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: WRITING
3rd Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	53.0	54.0	63.0	+10.0
Pueblo City District	62.0	52.0	71.0	+9.0
Colorado Statewide	56.0	52.0	54.0	-2.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Based on the data reported in Table 63, the 3rd graders at PSAS have solid and improving passing rates on the CSAP writing test during the years of 2005 through 2007. As seen above, 53% of the PSAS 3rd graders in 2005 scored at or above proficient in writing and this percentage was slightly below the state (56%) and moderately below the district (62%). By 2006, the 3rd graders at PSAS had slightly surpassed their district and state peers in that 54% of these students passed the writing test compared to 52% for Pueblo City and the state of Colorado. In 2007, 3rd graders at PSAS continued to improve in that 63% passed the writing test, which was 9 percentage points higher than the state (54%), but 8 percentage points below the district which jumped from a 52% to a 71% pass rate in 2007.

Table 64: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: WRITING
4th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	54.0	53.0	59.0	+5.0
Pueblo City District	59.0	52.0	45.0	-14.0
Colorado Statewide	52.0	50.0	49.0	-3.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The results for 4th graders, found in Table 64, revealed that the pass rate for students at PSAS ranged from 54% in 2005 to 59% in 2007, which was a 5% increase across the three academic years. While this increase was occurring, there was a decrease in the percentage of 4th grade students at the district and state level that passed the writing test. In 2005, 59% of the 4th graders at Pueblo City District passed the test, which was 5 percentage points higher than PSAS, but by 2007, the pass rate had dropped to 45%, which was 14 percentage points lower than PSAS (59 – 45 = 14). This difference in trends was also found when comparing PSAS to the state in that the

pass rate at the state level was 52% in 2005, which was 2 percentage points below PSAS, yet the state wide pass rate decreased to 49% in 2007, which was 10 percentage points below the local school.

Table 65: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: WRITING
5th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	37.0	62.0	59.0	+22.0
Pueblo City District	56.0	63.0	57.0	+1.0
Colorado Statewide	57.0	59.0	57.0	0.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 65 reveals a remarkable increase in the pass rate percentages for 5th graders at PSAS that took the CSAP writing test. As can be seen, 37% of the PSAS students scored at or above proficient in 2005, which was about 20 percentage points below the district (56%) and state (57%). By 2007, the pass rate of 59% for 5th graders at PSAS was an increase of 22 percentage points from 2005, and also slightly surpassed the district and state pass rates of 57%.

Table 66: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: WRITING
6th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	67.0	61.0	80.0	+13.0
Pueblo City District	52.0	52.0	62.0	+10.0
Colorado Statewide	59.0	59.0	60.0	+1.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 66 above presents the findings for the performance of 6th graders on the CSAP writing test. As can be seen, 67% of the students at PSAS in 2005 passed the writing test, which was well above the district (52%) and state (59%). By 2007, the pass rate on the math test for PSAS students was 80%, which was an increase of 13 percentage points from 2005 and it also increased the difference between the PSAS students and the district by 18 points (80 – 62 = 18) and by 20 points at the state level (80 – 60 = 20).

Table 67: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: WRITING
7th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	36.0	50.0	46.0	+10.0
Pueblo City District	46.0	46.0	46.0	0.0
Colorado Statewide	56.0	56.0	60.0	+4.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The results in Table 67 indicate a 10 percentage point increase in the pass rate for 7th grade students at PSAS between 2005 and 2007. As seen above, 36% of the PSAS students passed the CSAP writing test in 2005, which was significantly below their district (46%) and state (56%) peers. In 2006, the pass rate at PSAS was 50% which was higher than the district (46%) and still below the state (56%). The findings for 2007 showed that 46% of the PSAS 7th graders passed the test, which was the same percent as the district and noticeably lower than the state at 60%.

Table 68: Percentage of students that scored at or above proficient on the Colorado Student Assessment Program: WRITING
8th Grade

Level of Assessment	2005	2006	2007	% Change*
Pueblo School for the Arts and Sciences	59.0	24.0	42.0	-17.0
Pueblo City District	44.0	38.0	58.0	+14.0
Colorado Statewide	51.0	51.0	51.0	0.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The results in Table 68 show that 59% of the 8th graders at PSAS passed the CSAP writing test in 2005, but only 24% in 2006 and 42% in 2007; an overall decrease in percentage of 17 points from 2005 to 2007. In comparison to the local district, a much higher percentage of PSAS students passed the writing test in 2005 (59 – 44 = 15), yet this trend reversed in 2006 and 2007 where a significantly higher percentage of Pueblo City District students passed the writing test than at PSAS (38 – 24 = 14 in 2006; 58 – 42 = 16 in 2007).

Summary

Demographically, the students at Pueblo School for the Arts and Sciences (PSAS), located in Pueblo, CO, seem to be similar to their peers in their local district of Pueblo City, but very different than the general school-age population of Colorado. For example, it was reported in 2007 that approximately 62% of school-age children state-wide are described as White,

compared to only 40% at PSAS and 34% in the Pueblo City District. In contrast, 27.5% of the state-wide school population was described as Hispanic, compared to about 54% at PSAS and 61% in the Pueblo District. The demographic differences are also evident with respect to socio-economic status, as defined by the percentage of students available for free or reduced lunch (described as "economically disadvantaged" in Colorado). Whereas 34% of school-age children are described as economically disadvantaged at the state level, approximately 67% of the students at PSAS and the Pueblo City District meet these criteria. Therefore, it might be reasonable to interpret the results by comparing the students at PSAS with their local district peers in Pueblo City as opposed to the state-wide data.

The data presented compare the results from the *Colorado Student Assessment Program (CSAP)* test scores in the years 2005, 2006, and 2007. The CSAP is a state-constructed achievement test that evaluates students in grades 3-10. The information is presented by grade (3, 4, 5, 6, 7, and 8) in reading, mathematics, and writing.

In reading, there was a general trend where students at PSAS who were in the lower grades (i.e., 3rd through 5th) performed equal or slightly below their Pueblo City District peers with about 60-80% of the students passing the CSAP reading test across the three grades and the three years (2005 through 2007). Beginning in the 6th grade and continuing through 8th grade, though, the performance of students at the PSAS was significantly higher than at the Pueblo City District which equaled or surpassed many of the state-wide pass rates.

With respect to mathematics, there was much variability of performance that appeared to be dependent upon the grade level and academic year. Furthermore, the variability was evident at the school (PSAS) and district (Pueblo City), but not at the state (Colorado). In other words, the pass rates at the state level in math was typically consistent across each grade and across each academic year, while the pass rates at PSAS and Pueblo City fluctuated between grades and within grades based on the academic year. This noted the pass rate for PSAS students in 3rd and 6th grade were noticeably higher than the pass rates in Pueblo City. With respect to 4th and 5th graders, comparisons between school and district are dependent on the grade and academic year, as some years, students at PSAS significantly outperformed their district peers, while other years and grades, the district peers significantly outperformed the PSAS students. Finally, there was a consistent trend in 7th and 8th grade which revealed that the pass rate for students at PSAS was significantly lower than their Pueblo City and state peers.

Regarding the results in writing, there was a solid trend toward students at PSAS improving (often significantly) their pass rate at grades 3rd through 7th with each academic year. For example, the pass rate for 3rd graders at PSAS increased from 53% in 2005 to 63% in 2007, while the pass rate for 6th graders increased from 67% in 2005 to 89% in 2007. This pattern was evident in grades 3, 6, and 8 for Pueblo City District students, while it was unchanged or there was a significant drop in grades 4, 5, 6, and 7. There was no noticeable trend for students at the state level across all grades and academic years as the pass rates were relatively stable. It should be noted that there was a significant and negative trend for PSAS students in 8th grade as the pass rate declined between 2005 and 2007. Overall, the results from the writing test revealed that students at PSAS in grades 3 through 7 improved noticeably between 2005 and 2007 which allowed them to catch or surpass many of their district and state peers by 2007.

GREATER HARTFORD CLASSICAL MAGNET (GHCM)

Greater Hartford Classical Magnet (GHCM) is located in Hartford, CT, and Admission is open to all students in Hartford and the 26 surrounding towns. Students will be selected by means of a random lottery system based on available seats. The Classical Magnet School will offer its students an academic curriculum firmly rooted in a study of the classics and liberal arts. GHCM is for grades 6 to 12 and is free to all students selected through the Hartford Host Magnet lottery process. As of 2008, the enrollment was 586 students. The magnet school opened in 2004 and has been actively participating in the Paideia seminar process since this time.

Since the student-body population is created using the lottery system, demographic comparisons to the local Hartford School District might not be the best comparison group. Therefore, instead of using the local district, the demographics of another magnet school in Hartford, (Hartford Magnet), which also uses the same lottery system, is used for comparison, along with the state of Connecticut.

The data below begin with a demographic comparison (see Table 69) between Greater Hartford Classical Magnet, Hartford Magnet, and the state of Connecticut for 2008.

Table 69: Demographics for 2008

	Male	Female	White	Black	Hispanic	E.D.
Greater Hartford Classical Magnet	45	55	31.8	43	24.3	53.3
Hartford Magnet	47.2	52.8	30.6	31.7	35.7	100
Connecticut Statewide	51.5	48.5	67.0	13.7	15.4	26.6

E.D. = Economically Disadvantaged

As seen in Table 69, the demographics between Greater Hartford Classical Magnet (GHCM), Hartford Magnet, and the state of Connecticut reveal significant differences. While about 67% of the students state-wide report being White, only about 30% from GHCM and Hartford Magnet were described as White. In addition, a larger percentage (43%) of students at GHCM was described as Black when compared to Hartford Magnet (31.7%) and the state (13.7%). Hartford Magnet had 35.7% of its students described as Hispanic which was higher than at GHCM (24.3%) and much higher than the state (15.4%). Potentially the most important demographic, though, is the percentage of students described as “economically disadvantaged” which is defined as those students that qualify for the free or reduced lunch program. As seen above, about one-fourth (26.6%) of the students state-wide qualify for this program, yet more than one-half (53.3%) qualify at GHCM and 100% at Hartford Magnet.

Since GHCM educates students from grades 6 to 12, two different test scores will be provided to compare academic success. For grades 6 to 8, data from the *Connecticut Mastery Test: 4th Generation (CMT-4),* a state-constructed achievement test that evaluates students in grades 3-8, will be used to analyze the results for students in reading, mathematics, and writing.

For grades 9 to 12, the *Connecticut Academic Performance Test, 3rd Generation (CAPT3)* is used to evaluate 10th graders. See Appendix A for the various web-pages that the data were gathered from for GHCM.

Reading

Table 70: Percentage of students at or above proficiency *Connecticut Mastery Test: 4th Generation (CMT -4*)
6th Grade
READING

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change*
Greater Hartford Classical Magnet	71.6	72.9	79.4	+7.8
Hartford Magnet	74.3	68.4	70.9	-3.4
State of Connecticut	75.4	75.7	77.6	+2.2

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The results in Table 70 indicate that the percentage of 6th grade students at Greater Hartford Classical Magnet (GHCM) that scored at or above proficiency was higher than their Hartford Magnet peers and very similar to their state of Connecticut peers. Interestingly, the percentage of students showing success on the CMT-4 at GHCM increased noticeably (+7.8) between the 2005-2006 and 2007-2008 academic years, while the trend at Hartford Magnet was slightly negative (-3.4 between 2005-2006 and 2007-2008), and slightly positive at the state level (+2.2).

Table 71 Percentage of students at or above proficiency *Connecticut Mastery Test: 4th Generation (CMT -4*)
7th Grade
READING

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change*
Greater Hartford Classical Magnet	62.4	80.4	90.5	+28.1
Hartford Magnet	85.5	68.3	77.6	-7.9
State of Connecticut	76.4	75.5	79.7	-3.3

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The results in Table 71 reveal a significant increase in the percentage of 7th graders at GHCM that scored at or above proficiency on the CMT-4 when compared to their peers. Specifically, only 62.4% of the 7th graders at GHCM "passed" the reading test in 2005-2006, which was well below (23.1 percentage points) their Hartford Magnet peers as well as their state (14 percentage points) peers. Yet, this trend reversed in the 2006-2007 academic year and continued to increase in 2007-2008. As can be seen above, 90.5% of the 7th graders at GHCM scored at or above proficiency in 2007-2008, which is a 12.9% higher percentage than at Hartford Magnet (77.6) and a 10.8% higher percentage than the state level (79.7). Stated in a different form, the increase

between the GHCM 7th graders in reading between 2005-2006 and 2007-2008 was an amazing 28.1% (90.5 – 62.4 = 28.1).

Table 72: Percentage of students at or above proficiency *Connecticut Mastery Test: 4th Generation (CMT -4*)
8th Grade
READING

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change*
Greater Hartford Classical Magnet	60.9	64.4	76.2	+15.3
Hartford Magnet	82.7	84.6	77.0	-5.7
State of Connecticut	76.6	76.4	77.0	+0.4

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Table 72 reveals a steady and strong increase in the percentage of 8th graders at Greater Hartford Classical Magnet (GHCM) that scored at or above proficiency on the CMT-4 reading test. Similar to the results from 7th graders, 2005-2006 revealed that only 60.9% of the GHCM students "passed" the test, yet this percent increased to 76.2 by the 2007-2008 academic-year (an increase of 15.3 percentage points). This significant increase occurred during the same three-year period that their Hartford Magnet peers showed an overall *decline* in the percentage of students that scored proficient or above, and their state peers showed steady results.

Mathematics

Table 73: Percentage of students at or above proficiency *Connecticut Mastery Test: 4th Generation (CMT -4*)
6th Grade
MATHEMATICS

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change*
Greater Hartford Classical Magnet	66.3	74.8	73.8	+7.5
Hartford Magnet	66.7	76.8	82.4	+15.7
State of Connecticut	79.8	82.7	84.3	+4.5

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Information in Table 73 reveals that there was a solid increase in the percentage of 6th graders at Greater Hartford Classical Magnet that scored at or above proficient on the CMT-4 Math test. Further, this increase was similar to their state peers, but not as significant as the increase for their Hartford Magnet peers. As seen above, approximately 66% of the 6th graders at GHCM and Hartford Magnet scored at or above proficient in 2005-2006, which was about 13.5 percentage points lower than their state of Connecticut peers (79.8-66.3 = 13.5). Two years later (2007-2008), 73.8% of the GHCM students performed well on the math test (an increase of 7.5 from 2005-2006) which decreased the difference between Classical Magnet and their state peers from

13.5 to 10.5 (84.3 – 73.8 = 10.5). This improvement for students at GHCM was outdone by the 6th graders at Hartford Magnet, though, in that the percentage increase between 2005-2006 and 2007-2008 of 15.7 (82.4 – 66.7 = 15.7) allowed this school to almost equal the state average.

Table 74: Percentage of students at or above proficiency *Connecticut Mastery Test: 4th Generation (CMT -4*)
MATHEMATICS
7th Grade

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change*
Greater Hartford Classical Magnet	77.8	80.2	84.2	+6.4
Hartford Magnet	83.0	71.8	82.6	-0.4
State of Connecticut	77.8	80.2	82.6	+4.8

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The results of the performance of 7th graders on the CMT-4 math test revealed a solid increase in the percentage of students at GHCM that scored at or above proficiency across the three academic years. Further, this increase almost perfectly paralleled the increase at the state level in that both GHCM and the state had 77.8% of their students perform well on the math test in 2005-2006, and increased to the lower-to-mid 80% by 2007-2008. The results for students at Hartford Magnet fluctuated noticeably between the three academic years, with a high of 83% in 2005-2006 and a low of 71.8% in 2006-2007.

Table 75: Percentage of students at or above proficiency *Connecticut Mastery Test: 4th Generation (CMT -4*)
8th Grade
MATHEMATICS

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change*
Greater Hartford Classical Magnet	60.9	61.1	81.4	+20.5
Hartford Magnet	81.7	84.1	71.9	-9.8
State of Connecticut	78.9	80.8	81.2	+2.3

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The findings in Table 75 reveal that the percentage of 8th graders at Greater Hartford Classical Magnet (GHCM) that scored at or above proficiency on the CMT-4 math test was well below their Hartford Magnet and state peers during 2005-2006 and 2006-2007, but increased significantly in 2007-2008, surpassing both peer groups. Specifically, as seen above, about 60% of the 8th grade students at GHCM scored at or above proficient in 2005-2006 and 2006-2007, which was about 18-24 percentage points lower than their peers at Hartford Magnet and the state of Connecticut. Yet, in the 2007-2008 academic year, 81.4% (an increase of 20.5 percentage points from 2005-2006) of the students at GHCM performed well on the math test, which was almost 10 percentage points higher than their Hartford Magnet peers and equal to their state peers.

Writing

Table76: Percentage of students at or above proficiency *Connecticut Mastery Test: 4th Generation (CMT -4*)
6th Grade
WRITING

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change*
Greater Hartford Classical Magnet	79.5	86.9	89.7	+10.2
Hartford Magnet	85.1	84.7	88.4	+3.3
State of Connecticut	82.7	83.8	82.9	+0.2

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

As seen in Table 76, the percentage of students at GHCM scoring at or above proficiency on the CMT-4 Writing test improved consistently over the three academic years. In addition, a higher percentage of 6th graders at Classical Magnet performed well on the test in the past two academic years than did their peers at Hartford Magnet and the state level. Specifically, 79.5% of the 6th graders at GHCM scored at or above proficiency in 2005-2006, which was a slightly lower percentage than their Hartford Magnet (85.1%) and state (82.1%) peers. In 2006-2007, though, 86.9% of the 6th graders at GHCM scored at or above proficiency, which was slightly higher than at Hartford Magnet (84.7%) and the state (83.8%); a trend that continued in 2007-2008, where 89.7% of the GHCM students performed well compared to 88.4% at Hartford Magnet and 82.9% at the state level.

Table 77: Percentage of students at or above proficiency *Connecticut Mastery Test: 4th Generation (CMT -4*)
7th Grade
WRITING

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change*
Greater Hartford Classical Magnet	74.7	84.8	82.1	+7.4
Hartford Magnet	85.5	84.7	82.7	-2.8
State of Connecticut	80.9	81.1	80.1	-0.8

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

The data in Table 77 reveals that the percentage of 7th graders at Greater Hartford Classical Magnet that scored at or above proficiency improved across the three academic years, ultimately performing as well or slightly better than their Hartford Magnet and state peers by 2007-2008. As seen above, 74.7% of the 7th graders at GHCM scored at or above proficiency on the CMT-4 Writing test in 2005-2006, which was 6-10 percentage points lower than their peers at Hartford Magnet and the state. By 2006-2007, though, the performance of the 7th graders at GHCM improved to 84.8% which was equal to their Hartford Magnet peers and slightly above the state average. This trend continued in 2007-2008 as the same percentage of students at the GHCM and Hartford Magnet "passed" the CMT-4 Writing test, which was a slight percentage higher than at the state level.

Table 78: Percentage of students at or above proficiency *Connecticut Mastery Test: 4th Generation (CMT -4*)
8th Grade
WRITING

Level of Assessment	2005-2006	2006-2007	2007-2008	% Change*
Greater Hartford Classical Magnet	76.2	77.8	85.1	+8.9
Hartford Magnet	91.9	92.0	82.2	-9.7
State of Connecticut	81.9	82.5	82.7	-0.8

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

Similar to the performance of GHCM students in 6th and 7th grade on the CMT-4 Writing test, the 8th graders at Greater Hartford Classical Magnet showed a positive trend in their performance across the three academic years, ultimately equaling or surpassing the percentage of their Hartford Magnet and state peers by 2007-2008. As seen above, 76.2% of the 8th graders at GHCM scored at or above proficiency in 2005-2006, which was about 5 percentage points lower than the state average and 15 percentage points lower than the 8th graders at Hartford Magnet. This trend continued in 2006-2007, but by 2007-2008, the percentage of 8th graders at GHCM that performed well on the CMT-4 Writing test increased to 85.1%, which was about 3 percentage points *higher* than their peers at Hartford Magnet and the state of Connecticut.

Greater Hartford Classical Magnet – High School Performance

The results for 10th graders at Greater Hartford Classical Magnet are compared to several schools; Hartford Public School, Pathways to Technology Magnet, Capital Preparatory Magnet, and the Connecticut state average. Since it is a challenge to compare high school performance on a single test, due to potentially significant differences in demographics (specifically socio-economically), this evaluator chose to provide several comparisons of high schools in Hartford, ranging from Hartford Public to a peer magnet school (Pathways to Technology Magnet) and a preparatory magnet school (Capital Preparatory Magnet).

As noted above, for grades 9 to 12, the *Connecticut Academic Performance Test, 3rd Generation (CAPT3)* is used to evaluate academic performance, specifically for 10th graders in the areas of reading, mathematics, writing, and science. Data were available for 2006-2007 as well as 2007-2008.

Table 79: Percentage of students at or above proficiency *Connecticut Academic Performance Test, 3rd Generation (CAPT3)*
10th Grade
READING ACROSS THE DISCIPLINES

Level of Assessment	2006-2007	2007-2008	% Change
Greater Hartford Classical Magnet	82.9	87.3	+4.4
Pathways to Technology Magnet	52.1	60.2	+8.1
Capital Preparatory	92.9	86.8	-6.1
Hartford Public High School	36.9	35.4	-1.5
State of Connecticut	79.7	82.7	+3.0

As seen in Table 79, the percentage of students at GHCM that performed at or above proficiency on the Connecticut Academic Performance Test, 3rd Edition (CAPT3) increased from 2006-2007 to 2007-2008. Specifically, 87.3% of the 10th graders in 2007-2008 performed well on the CAPT3 reading test, which was 4.4 percentage points higher than the previous year (82.9%). In comparison, the percentage of 10th grade students at GHCM in 2006-2007 who performed at or above proficiency was slightly higher than their state peers (79.7%), well above the Pathways to Technology Magnet peers (52.1%) and Hartford Public High (36.9%), and about 10 percentage points lower than their peers at Capital Preparatory (92.9%). By 2007-2008, though, the percentage of 10th graders from GHCM that "passed" the reading test increased to 87.3% which was a higher percentage than any of the four comparison groups, including Capital Preparatory which dropped 6.1 percentage points to 86.8%.

Table 80: Percentage of students at or above proficiency *Connecticut Academic Performance Test, 3rd Generation (CAPT3)*
10th Grade
MATHEMATICS

Level of Assessment	2006-2007	2007-2008	% Change
Greater Hartford Classical Magnet	57.3	62.0	+4.7
Pathways to Technology Magnet	57.1	72.0	+14.9
Capital Preparatory	81.0	70.3	-10.7
Hartford Public High School	30.0	36.0	+6.0
State of Connecticut	77.3	79.7	+2.4

As seen in Table 80, while the percentage of 10th graders from Greater Hartford Classical Magnet that performed at or above proficiency on the CAPT3 Math test increased 4.7% across the two academic years, this percentage of success was still noticeably below their peers at Pathways to Technology (which increased by 14.9 percentage points from 2006-2007 to 2007 to 2008), Capital Preparatory, and the state average. Specifically, 57.3% of the 10th graders at GHCM performed successfully on the math test in 2006-2007, which was equal to their Pathways to Technology peers (57.1%), but well below their state (77.3%) and Capital Preparatory (81%) peers. By 2007-2008, the percentage that performed at or above proficiency

increased for all of the peer schools except Capital Preparatory, which declined by 10.7 percentage points. This resulted in closing the gap between the students at GHCM and Capital Preparatory, but remaining behind all peers except at Hartford Public.

Table 81: Percentage of students at or above proficiency *Connecticut Academic Performance Test, 3rd Generation (CAPT3)*
10th Grade
WRITING ACROSS THE DISCIPLINES

Level of Assessment	2006-2007	2007-2008	% Change
Greater Hartford Classical Magnet	81.7	92.4	+10.7
Pathways to Technology Magnet	62.9	76.1	+13.2
Capital Preparatory	97.6	92.1	-5.5
Hartford Public High School	36.7	51.6	+14.9
State of Connecticut	82.3	88.2	+5.9

Table 81 reveals that the percentage of students at GHCM that performed at or above proficiency on the CAPT3 Writing test was solid in 2006-2007, but increased significantly in 2007-2008 which resulted in having 92.4% of their students "passed" the test. In addition, this 10.7 percent increase across the two academic years resulted in GHCM equaling the percentage of their peers at Capital Preparatory (92.4% v. 92.1%), and above their state peers (88.2%) and well above their peers at Pathways to Technology (76.1%).

Table 82: Percentage of students at or above proficiency *Connecticut Academic Performance Test, 3rd Generation (CAPT3)*
10th Grade
SCIENCE

Level of Assessment	2006-2007	2007-2008	% Change
Greater Hartford Classical Magnet	64.6	66.7	+2.1
Pathways to Technology Magnet	55.6	58.5	+2.9
Capital Preparatory	81.0	70.3	-10.7
Hartford Public High School	24.5	31.7	+7.2
State of Connecticut	81.4	80.5	-0.9

Performance on the CAPT3 Science test for 10th graders at GHCM indicates a positive growth pattern across the two academic years, which resulted in performing above their Pathways to Technology peers and below their Capital Preparatory and well below their state peers. As seen above, an average of about 65% of the students at GHCM performed at or above proficiency on the science test across both years, which was about 8 percentage points above their peers at Pathways to Technology (approximately 57%), yet below their peers at Capital Preparatory (averaged approximately 76%) and state peers (averaged approximately 81%). It should be noted that the gap between the 10th graders at GHCM and Capital Preparatory was reduced noticeably

between the two academic years as the percent change at GHCM was +2.1% compared to -10.7% at Capital Prep.

Summary

In general, there was a tendency for students in grades 6-8 and 10th who attended Greater Hartford Classical Magnet (GHCM) to perform as well or better than their peers in reading, and for 7th, 8th, and 10th graders in mathematics. In addition, there was a trend for students in grades 6, 7, 8, and 10 to show an increase (often a significant increase) in the percentage of students that performed at or above proficiency across academic years in reading, math, and writing across the academic years. For example, approximately 85% of 8th graders at GHCM performed at or above proficiency on the CMT-4 Writing test in 2007-2008 (see Table 78), which was about 9 percentage points higher than in 2005-2006. This positive trend was not as clearly or consistently observed at the peer schools or at the state level. Using the same grade level as an example, the percentage of students performing mastery of the CMT-4 Writing test at Hartford Magnet actually dropped about 9 percentage points across the three academic years (91.9% in 2005-2006 to 82.2% in 2007-2008), and remained steady at the state level (81.9% in 2005-2006 to 82.7% in 2007-2008).

Moreno Valley High School (NM)

Moreno Valley High School (MVHS) is located in Angel Fire, New Mexico, is a charter school, which opened in 2002. MVHS, which has about 103 students, is in the Cimarron School District, which has approximately 569 students in grades PK-12, including one other high school (Cimarron High).

The test that used to evaluate academic success for school-aged children in New Mexico is the *Adequate Yearly Progress (AYP)* measure, which represents the annual academic targets in reading and math and other indicators that the state, school districts and schools must reach to be considered on track with the federally mandated goal of 100% proficiency by school year 2013-2014. The AYP is part of New Mexico's response to No Child Left Behind (NCLB), and, beginning in 2007, was administered in grades 3-8, and 11. Prior to 2007, the AYP was administered to 9th graders. Since Moreno Valley High School serves students in grades 9-12, the AYP data are available for 9th and 11th graders. Data were collected using the New Mexico state data web-pages found in Appendix A.

Table 83: Demographics for Moreno Valley High School, Cimarron High School, and the State of New Mexico for 2005-2006

	White	Black	Hispanic	American Indian	E.D.
Moreno Valley High School	84.0	0.0	15.1	0.9	0.0
Cimarron Municipal District	66.0	<1.0	33.0	<1.0	40.0
All New Mexico Charter Schools	41.0	3.0	46.0	10.0	61.0
State of New Mexico	31.1	2.5	54.0	11.1	52.3

E.D. = Economically Disadvantaged

The demographic information provided above compares Moreno Valley High School with their local Cimarron Municipal District, all New Mexico Charter Schools, and the state of New Mexico. As can be seen, there is variability between the Cimarron Municipal District (which encompasses Moreno Valley High School) and the state of Mexico and all New Mexico Charter Schools. Specifically, Moreno Valley has 84% of its population described as White, and 15% as Hispanic. This ethnic account is very different than their peer charter schools across the state in which 41% of this population was described as White and 46% Hispanic. In addition, all New Mexico Charter Schools reported 10% of their population as American Indian, which was similar to the state average (11.1%), and well above the Cimarron Municipal District (<1.0%) and Moreno Valley (0.9%). Regarding economically disadvantaged children, 52.3% of the students in the state qualified for free or reduced lunch, which was a lower percentage than the charter schools (61%), and higher than Cimarron Municipal District (40%). In comparison, 0% of the students at Moreno Valley High School qualified for free or reduced lunch.

Table 84: Percentage of students that achieved proficiency New Mexico Adequate Yearly Progress (AYP) Report:
READING
9th Grade

Level of Assessment	2004-2005	2005-2006	2006-2007	% Change*
Moreno Valley High School	60.5	70.0	76.5	+16.0
Cimarron High School	44.9	55.2	53.7	+8.8
All New Mexico Charter Schools**		36.9		
New Mexico State Schools (All Schools)	42.9	43.4	43.9	+1.0

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

**Data for All New Mexico Charter Schools could be found for 2005-2006 only. This data should be interpreted with caution since there are no other academic years to put this singular point into context. It is provided as a point of review, but will not be discussed in the body of the evaluation.

As seen in Table 84, the 9th graders at Moreno Valley High School that achieved proficiency on the Adequate Yearly Progress (AYP) in reading were well above their peers at Cimarron High School and their state peers across the three academic years. In addition, the achievement gap increased each year as the percent change between 2004-2005 and 2006-2007 was significant for students at Moreno Valley, while the percent change for Cimarron High and the state were much smaller. For example, 60.5% of the 9th graders at Moreno Valley High achieved proficiency on the test in 2004-2005, which was 15.9% higher than at Cimarron High (44.9%) and 17.9% higher than the state level (42.9%). By 2006-2007, 76.5% of the 9th graders at Moreno Valley achieved proficiency which was 16 percentage points higher than the 9th graders in 2004-2005 (76.5 – 60.5 = 16). Further, this level of increase was not found at Cimarron High or the state, which lead to a larger gap by 2006-2007, as 76.5% of the 9th graders at Moreno Valley achieved proficiency, compared to 53.7% at Cimarron High (a difference of 22.8 percentage points) and 43.9% at the state level (a difference of 32.6 percentage points).

Table 85: Percentage of students that achieved proficiency New Mexico Adequate Yearly Progress (AYP) Report:
READING
11th Grade

Level of Assessment	2004-2005	2005-2006	2006-2007	% Change*
Moreno Valley High School	52.6	66.7	81.0	+28.4
Cimarron High School	77.4	59.3	60.0	-17.4
All New Mexico Charter Schools**		48.2		
New Mexico State Schools (All Schools)	56.9	58.0	47.3	-9.6

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

**Data for All New Mexico Charter Schools could be found for 2005-2006 only. This data should be interpreted with caution since there are no other academic years to put this singular point into context. It is provided as a point of review, but will not be discussed in the body of the evaluation.

As seen in Table 85, there was a significant increase in the percentage of 11th graders that achieved proficiency on the AYP reading test at Moreno Valley across the three academic years. In 2004-2005, approximately one-half (52.6%) of the Moreno Valley students achieved proficiency on the test, which was 24.8 percentage points lower than their Cimarron High School peers (77.4 – 52.6 = 24.8), and 4.3 percentage points lower than the state level (56.9 – 52.6 = 4.3). Over the next two academic year, there was a significant and positive trend for 11th graders at Moreno Valley High, while there was a significant and negative trend for students at Cimarron High and at the state level. Thus, by the 2006-2007 academic year, 81% of the 11th graders at Moreno Valley High achieved proficiency on the AYP, which was 21 percentage points higher than their peers at Cimarron High (60%) and 33.7% higher than their state peers (47.3%).

Mathematics

Table 86: Percentage of students that achieved proficiency New Mexico Adequate Yearly Progress (AYP) Report:
MATH
9th Grade

Level of Assessment	2004-2005	2005-2006	2006-2007	% Change*
Moreno Valley High School	42.1	56.7	29.4	-12.7
Cimarron High School	44.4	27.6	56.1	+11.7
All New Mexico Charter Schools**		22.7		
New Mexico State Schools (All Schools)	34.2	32.9	36.6	+2.4

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

**Data for All New Mexico Charter Schools could be found for 2005-2006 only. This data should be interpreted with caution since there are no other academic years to put this singular point into context. It is provided as a point of review, but will not be discussed in the body of the evaluation.

Table 86 provides information on the success rate for 9th graders on the AYP over three academic years. As seen above, there was much variability in performance from year to year at Moreno Valley and Cimarron High, while performance at the state level was more consistent. In the 2004-2005 academic year, 42.1% of the 9th graders at Moreno Valley High School achieved proficiency which was slightly below their peers at Cimarron High (44.4%) and above the state average (34.2%). By 2005-2006, though, there was a significant increase (14.6%) in the percentage of students at Moreno Valley that achieved proficiency (56.7 – 42.1 = 14.6) and a significant decrease (16.8%) at Cimarron High (44.4 – 27.6 = 16.8). This fluctuation lead to having a considerable difference 29.1%) between the two high schools with respect to achieving proficiency (56.7 – 27.6 = 29.1). By 2006-2007, the proficiency rate reversed in that a considerably higher percentage of students at Cimarron High "passed" the AYP (56.1%) while a significantly lower percentage at Moreno Valley performed adequately (29.4%).

Table 87: Percentage of students that achieved proficiency New Mexico Adequate Yearly Progress (AYP) Report:
MATH
11th Grade

Level of Assessment	2004-2005	2005-2006	2006-2007	% Change*
Moreno Valley High School	52.6	46.7	33.3	-19.3
Cimarron High School	48.4	22.2	48.0	-0.4
All New Mexico Charter Schools**		25.2		
New Mexico State Schools (All Schools)	30.3	30.5	31.2	+0.9

*% change is the difference between the results from 2005 and 2007. By using this approach, it allows the reader to view potential trends over a longer period (3 years) of data.

**Data for All New Mexico Charter Schools could be found for 2005-2006 only. This data should be interpreted with caution since there are no other academic years to put this singular point into context. It is provided as a point of review, but will not be discussed in the body of the evaluation.

Table 87 provides information on the percentage of 11th graders that achieved proficiency on the AYP math test across three academic years. As seen above, there was a noticeable and negative trend across the three academic years for students at Moreno Valley High, as 52.6% achieved proficiency in 2004-2005, but only 33.3% achieved proficiency in 2006-2007. In comparison, the percentage of 11th grade students at Cimarron High that achieved proficiency fluctuated between about one-half (48.4% in 2004-2005 and 48% in 2006-2007) to less than one-quarter (22.2% in 2005-2006). Even though there was a substantial decrease in the proficiency rate at Moreno Valley over the three years, the percentage that performed adequately was consistently higher than their state peers.

Summary

Overall, the 9th and 11th grade students at Moreno Valley High School not only performed well on the reading portion of the Adequate Yearly Progress (AYP) Test, but showed substantial improvements across the three academic years. The results were virtually the opposite for these students with regard to their performance in mathematics, though, as there was a significant decrease in the percentage of 9th and 11th graders that achieved proficiency on the AYP math test across the three years.

As seen in the tables above, between 60 and 75% of the 9th graders at Moreno Valley High achieved proficiency on the AYP Reading test between the years of 2004-2005 and 2006-2007, which was well above their peers at Cimarron High School and the state. With respect to the 11th graders at Moreno Valley, 52.6% achieved proficiency in 2004-2005, which was below the percentage at Cimarron High and the state, but by 2006-2007, the achievement percentage for Moreno Valley students had increased to 81%, while the percentage that achieved proficiency at Cimarron and the state of New Mexico decreased significantly.

With respect to mathematics for 9th graders, the percentage of students that achieved proficiency fluctuated substantially between academic years, with students at Moreno Valley performing best during the 2005-2006 year (56.7%) and worst during the 2006-2007 year (29.4%). This level of

performance was also revealed for 11th graders in that the Moreno Valley students performed best in 2004-2005 (52.6%), but dropped over the following two years culminating in only 33.3% achieving proficiency in 2006-2007.

General Summary and Interpretation

An independent evaluation was completed to determine the effectiveness of the Paideia Model, at nine schools that met the following criteria: 1) designed for school-wide change across at least one entire level of schooling; 2) designed to improve teaching and learning in multiple academic subjects, 3) involve all students, and 4) meet the comprehensiveness criterion. The schools were selected by Dr. Terry Roberts, Director of the National Paideia Center, and included two from North Carolina (Asheville Middle and Providence Spring Elementary), two from Connecticut (Classical Studies Magnet and Greater Hartford Classical Magnet), and one each from Washington (Park Lodge Elementary), Tennessee (Chattanooga School for Arts & Sciences: CSAS), Colorado (Pueblo School for the Art and Sciences: PSAS), New Mexico (Moreno Valley High School), and South Carolina (Meadowfield Elementary).

It is important to note that, with the exception of Providence Spring (NC) Elementary and Moreno Valley (NM) Charter High School, and possible exception of the Chattanooga School of Arts and Sciences, all of the schools that implemented Paideia can easily be defined as "at risk." The term "at risk" is often overused and has many definitions, yet the one single criteria for at risk schools tends to be that its students are noticeably behind academically. Other factors that are typically involved in the definition include low socioeconomic status in combination with a different ethnic structure from the average within each state. Regarding this evaluation, all seven of the nine schools meet all or part of the above definition with Classical Studies Magnet, being the most "at risk." Therefore, the National Paideia Center should be commended for focusing its model on schools that are in need of academic assistance.

With this important fact in mind, the results revealed a positive academic impact on all nine schools that incorporated the Paideia Model. The level of positive impact varied across the nine schools, and can best be separated into three categories: exceptional, positive, and variable.

Exceptional Impact

Two of the nine schools (Chattanooga School for the Arts and Sciences and Providence Spring Elementary) best fit the category of "exceptional." The students evaluated in these schools consistently performed at the highest level possible on their respective state achievement tests. In addition, this performance was consistently above their peers in the local districts and state. For example, 97 to 99 percent of the students at Chattanooga scored at or above proficiency across all grades and all academic years studied. This phenomenon was also observed at Providence Spring Elementary as all academic reports revealed that more than 95% of the students scored at or above proficiency, which was often 25 to 30 percent higher than their local district and state peers.

Positive Impact

Two of the nine schools (Asheville Middle School, and Greater Hartford Classical Magnet) fit the category of "positive impact." The students evaluated in these schools consistently showed

noticeably higher academic achievement gains either when compared to school years prior to implementation of the Paidiea Model or when compared to similar districts or state averages.

The results from Asheville Middle School (AMS), for example, revealed that 80 to 88 percent of the students consistently scored at or above proficiency across all grades and all years examined in reading. In addition, a higher percentage of students at AMS performed as well or better than proficiency in mathematics when compared to their local district and state peers. More importantly, there was a very positive trend with respect to the "pass rate" (percentage of students scoring at or above proficiency) in math for students at AMS, which led to significantly higher percentage of their students performing well when compared to the local district and state.

Variable Impact

There were five schools (Classical Magnet, Moreno Valley High School, Park Lodge, and PSAS) that's overall performance is best described as variable. Most of these schools appear to be in low SES areas and were achieving well below their respective state averages in academic achievement. The reason for the "variable impact" label is that the results from these schools fluctuated between grades and subjects. For example, the percentage of 3rd grade students at Classical Magnet (CT) that scored at or above proficiency on the state math test varied based on the academic year. In 2006, 56.9% of the 3rd graders meet the proficiency standard, and this percentage jumped to 69.8% in 2007, but dropped to 63.5% in 2008. In comparison, the 4th graders at Classical revealed the following results in math over the same three year period: 53.4% performed at proficiency in 2006; 54.2% in 2007, and 36.5% in 2008. This fluctuating pattern was observed in the other four schools. It should be noted that there were years where students at the Paideia schools significantly outperformed their local district and state peers, while there were other years where the opposite phenomenon occurred.

Therefore, the impact of Paideia, based on the data available, is difficult to determine. This category should not be interpreted as meaning Paideia has not made an impact on these five schools as the values of the Model (critical thinking, citizenship, etc) lends itself well to pre-adolescent and adolescent students. By offering students, who appear to be academically and potentially behaviorally at-risk, an opportunity to read a short-story that is applicable to their life-situation, learn the skills of how to debate its merits in a civil manner makes intuitive sense that a positive impact has occurred. The data available did not provide an opportunity to note this possibility.

In summary, the overall academic impact of the Paideia Model in the nine schools was remarkable. Achievement scores were consistently as high as the test allowed at two schools across all subjects and years, while high and improving across time in two other schools. Five of the nine schools showed mixed results, with achievement in one core subject improving over time when compared to local-district peers and one subject being slightly behind.