

Comparison Between NAEP and State Reading Assessment Results: 2003

Volume 2

Research and Development Report



Comparison Between NAEP and State Reading Assessment Results: 2003

Volume 2

Research and Development Report

January 2008

Don McLaughlin
Victor Bandeira de Mello
Charles Blankenship
Kassandra Chaney
Phil Esra
Hiro Hikawa
Daniela Rojas
Paul William
Michael Wolman
American Institutes for Research

Taslima Rahman
Project Officer
National Center for Education Statistics

U.S. Department of Education

Margaret Spellings
Secretary

Institute of Education Sciences

Grover J. Whitehurst
Director

National Center for Education Statistics

Mark Schneider
Commissioner

The National Center for Education Statistics (NCES) is the primary federal entity for collecting, analyzing, and reporting data related to education in the United States and other nations. It fulfills a congressional mandate to collect, collate, analyze, and report full and complete statistics on the condition of education in the United States; conduct and publish reports and specialized analyses of the meaning and significance of such statistics; assist state and local education agencies in improving their statistical systems; and review and report on education activities in foreign countries.

NCES activities are designed to address high-priority education data needs; provide consistent, reliable, complete, and accurate indicators of education status and trends; and report timely, useful, and high-quality data to the U.S. Department of Education, the Congress, the states, other education policymakers, practitioners, data users, and the general public. Unless specifically noted, all information contained herein is in the public domain.

We strive to make our products available in a variety of formats and in language that is appropriate to a variety of audiences. You, as our customer, are the best judge of our success in communicating information effectively. If you have any comments or suggestions about this or any other NCES product or report, we would like to hear from you. Please direct your comments to

National Center for Education Statistics
Institute of Education Sciences
U.S. Department of Education
1990 K Street NW
Washington, DC 20006-5651-

January 2008

The NCES World Wide Web Home Page address is <http://nces.ed.gov>.

The NCES World Wide Web Electronic Catalog is <http://nces.ed.gov/pubsearch>.

Suggested Citation

McLaughlin, D.H., Bandeira de Mello, V., Blankenship, C., Chaney, K., Esra, P., Hikawa, H., Rojas, D., William, P., and Wolman, M. (2008). *Comparison Between NAEP and State Reading Assessment Results: 2003* (NCES 2008-474). National Center for Education Statistics, Institute of Education Sciences, U.S. Department of Education. Washington, DC.

For ordering information on this report, write to

U.S. Department of Education
ED Pubs
P.O. Box 1398
Jessup, MD 20794-1398

or call toll free 1-877-4ED-Pubs or order online at <http://www.edpubs.org>.

Content Contact

Taslima Rahman
(202) 502-7316
taslima.rahman@ed.gov



Contents

	Page
Explanation of State Profiles.....	D-1
Alabama	D-13
Alaska	D-25
Arizona.....	D-29
Arkansas.....	D-37
California	D-49
Colorado.....	D-59
Connecticut.....	D-63
Delaware	D-77
District of Columbia	D-89
Florida.....	D-95
Georgia	D-105
Hawaii.....	D-113
Idaho.....	D-121
Illinois.....	D-127
Indiana.....	D-143
Iowa.....	D-151
Kansas.....	D-155
Kentucky	D-161

	Page
Louisiana	D-171
Maine	D-181
Maryland	D-185
Massachusetts.....	D-189
Michigan	D-195
Minnesota	D-199
Mississippi.....	D-203
Missouri	D-213
Montana.....	D-221
Nebraska	D-225
Nevada	D-229
New Hampshire	D-239
New Jersey	D-243
New Mexico	D-253
New York.....	D-261
North Carolina	D-277
North Dakota	D-289
Ohio.....	D-293
Oklahoma	D-299
Oregon	D-303
Pennsylvania.....	D-307
Rhode Island.....	D-319
South Carolina	D-325
South Dakota	D-335
Tennessee.....	D-341



	Page
Texas.....	D-353
Utah.....	D-365
Vermont.....	D-369
Virginia.....	D-375
Washington.....	D-381
West Virginia.....	D-385
Wisconsin.....	D-393
Wyoming.....	D-399

D

Explanation of State Profiles

The relations between the National Assessment of Educational Progress (NAEP) results and individual state assessment results vary from state to state. Individual state profiles in this section display the comparisons for each state. Each state profile has up to 19 elements, depending on the availability of school-level state assessment information in the National Longitudinal School-level State Assessment Score Database (NLSLSASD). They include:

- a summary description of the state assessment data;
- an overview of the results displayed in the profile;
- a display of the state’s achievement standard thresholds on the NAEP achievement distribution in the state;
- the correlations between NAEP and state assessment school achievement;
- the percentages of students with disabilities or English language learners;
- a comparison of NAEP and state assessment achievement changes;
- state-reported percentages of students meeting standards;
- comparisons of NAEP and state assessment achievement gaps, and
- comparisons of NAEP and state assessment achievement gap changes.

These are described below, in the context of the example profile displayed on the following pages.

Element 1

Brief description of the state assessment data

The description is based primarily on information provided on the state education agency website, as it applies to the data used in this comparison report (school-level scores on reading and mathematics assessments). The information included in the descriptions include test(s) used, grades tested, subgroup data availability, availability of data across years, and data suppression information, as well as any information which would be required for understanding the results presented in the profile.

Element 2

Brief textual summary of statistically significant differences between NAEP and state assessment scores.

The summary provides a brief overview of the results being displayed in the profile. It includes the number of schools in each grade which are being used for the comparison, a textual explanation of the standards comparison graphs (element 3), a brief explanation of the changes in achievement (element 6), and a summary of significant results for each gap type (Black-White, Hispanic-White, and poverty–elements 8-19).¹ The summary serves to highlight the information presented in the graphs and tables.

1. The poverty gap in achievement refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

Figure D1. Elements 1 and 2 of the state profile

D State X

1 State X administers exams in grades 4 and 8 in English language arts and mathematics. Scores are available for Hispanic, Black, and economically disadvantaged students; however, note that the percentage of disadvantaged students represented is below two-thirds of the population in Grade 4 (65%). State X uses three achievement levels for reporting purposes: *needs help*, *meets expectations*, and *exceeds expectations*. The total population assessment scores based on 4 or fewer students are suppressed; disaggregated data suppression rules vary from school to school.

2 **Summary of Comparisons**
The results of comparisons between NAEP and state assessment results, which for 2003 are based on 169 schools in grade 4 and 181 schools in grade 8, are shown graphically on the following pages. A brief summary of the results follows:¹

- **Standards.** The state's primary grade 4 reading performance standard (*meets*) is close to the NAEP basic level. The state's primary grade 8 reading performance standard (*meets*) is between the NAEP basic and proficient levels.
- **Trends.** There were no significant differences between grades 4 and 8 NAEP and state assessment gains in percent meeting standards between 2002 and 2003.
- **Gaps.** Overall, the Black-White gap in grades 4 and 8 in percent meeting the state's standard in reading in 2003 was greater when measured by NAEP compared to the state assessment. Overall, there were no significant differences between NAEP and the state assessment in measurement of the Hispanic-White and poverty gaps in reading in grades 4 and 8 in 2003.

1. All statements of differences are based on statistical tests at the 5% significance level. However, these results must be considered in the context of the available data. NAEP and state assessments may employ different test items, testing accommodations, and scoring methods; and they may involve different students in each school, at different times of the year, with different motivational characteristics. At the present time, in spite of controlling for effects of school sampling, differences in standards, and NAEP exclusion rates, we cannot identify specific reasons for differences between NAEP and state assessment results.

Element 3

Position of standards in the achievement distribution

The position of the state's achievement standard thresholds on the NAEP achievement distribution in the state are based on mapping the percentages achieving state standards reported for schools participating in NAEP with the distribution of NAEP grade 4 or grade 8 performance in those schools.² In some cases, the state's standard is for an adjacent grade. In those cases, the assumption is made that the percentage of students meeting the state's standard for one grade would be approximately the same as the percentage meeting a standard the state might set for the next grade. The distributions are displayed for all states with available percentages achieving standards in NAEP schools.

Because Alabama, Tennessee, and Utah data files available for this report do not include percentages of students meeting standards, the state profiles for these states, unlike the other states, are based on the median percentile rank in each school, not the percentages meeting state standards. Therefore, no state standard thresholds are placed on the NAEP scale.

Element 4

Correlations of NAEP and state assessment school achievement

Based on schools participating in NAEP, this table displays correlations of percentages reported as meeting state standards with NAEP percentages of achievement meeting the estimated state standard in the same schools. For this display, NAEP has been rescored to estimate the percentages of students above the state's cutpoints indicated in element 3.

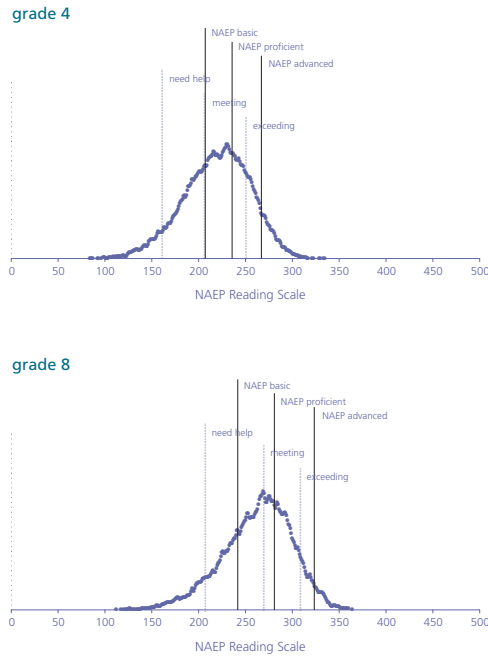
In states with multiple standards, one standard was identified for this report as the primary standard. In nearly every case, this is the standard that is used for reporting adequate yearly progress to the federal government. For Alabama, Tennessee, and Utah, the correlations are for median percentile ranks.

2. The figure plots the relative frequency of the NAEP plausible values in the state. Since the numerical values on the vertical axis (i.e., the relative frequencies, or more accurately, approximate probability densities) are solely a function of the fineness of the categorization of the continuous scale on the horizontal axis, it is neither meaningful nor appropriate to display numerical values for the vertical axis.

Figure D2. Elements 3 and 4 of the state profile

Achievement

Figure 1. Distribution of grades 4 and 8 NAEP reading achievement scores: 2003



3

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Table 1. School-level correlations between NAEP and state assessment of percentages of students achieving state's reading standards: 2003

Standard	Grade 4		Grade 8	
	Correlation	Standard error	Correlation	Standard error
Need Help	0.66	0.023	0.69	0.025
Meeting	0.83	0.003	0.80	0.015
Exceeding	0.74	0.021	0.53	0.047

4

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

D-2
 •
 • National Assessment of Educational Progress
 •



Element 5

Percentages of students identified with disabilities or as English language learners

Because measurement of trends in achievement can be affected by changes in the percentages of students with disabilities (SD) or English language learners (ELL), through their exclusion from testing or access to testing accommodations, information about these percentages are presented for NAEP assessments in 1998, 2002, and 2003. The percentages are presented separately for (1) English language learners (but not with a disability), (2) students with disabilities (who are not English language learners), and (3) English language learners who also have a disability. The percentages of students identified with disabilities or as English language learners who participated in NAEP without accommodations are not included in the table.

The percentages of students excluded from NAEP participation are based on the total student population. For example, if 10 percent of students have a disability and 40 percent of those with a disability are excluded, that means that 4 percent of the total student population is excluded. The use of full population estimates in this report is intended to minimize the effects of NAEP exclusions on the results of changes in achievement. Similarly, the percentages of students accommodated by NAEP are based on the total student population. In the example above, if 50 percent of the included SD/ELL students were accommodated, that would mean that accommodations were provided for 50 percent of the included 6 percent, or 3 percent of the total population.

Element 6

Comparison of NAEP and state assessment changes in achievement, based on NAEP schools

Achievement changes are presented as percentages meeting the states' standards in NAEP schools for state assessment results (lighter line) and for NAEP results (darker line). The standards are equated in the first year of analysis, forcing the percentages to match in the first year by definition. Differences between NAEP and state assessment achievement changes are revealed at the second point in time. Single asterisks on the charts indicate statistically significant differences between NAEP and state assessment changes for 1998-2002 or 2002-2003. Double asterisks indicate statistically significant differences between NAEP and assessment changes for the interval 1998-2003.

Comparisons of changes in achievement are available only for states in which comparable state scores are reported across years. Many states changed tests or changed standards between 1998 and 2003, and although data were available for the different tests, it is impossible to construct meaningful comparisons of NAEP and state assessment trends from them.

Element 7

State reported percentages meeting standard

The changes in achievement presented in element 6 are based on the NAEP sample of schools, weighted to represent the state. In most states, these trends can be compared to reports issued by state education agencies on their websites. These are shown in

element 7. Ideally, the percentages in the table of state-reported achievement should match the state assessment trends based on the NAEP sample of schools. However, in some cases state assessment scores were not available for all NAEP schools. This occurs, for example, when state assessment scores are for an adjacent grade and some NAEP schools do not include the grade tested, or when they have not been reported by the state.³

Figure D3. Elements 5, 6, and 7 of the state profile

STATE X

D

5

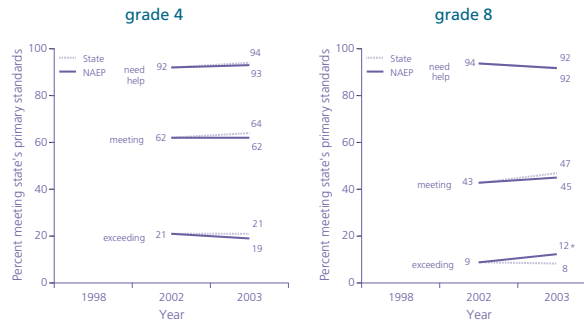
Table 2. Percentages of English language learners and students with disabilities identified, excluded, and accommodated in the NAEP reading assessments, by grade: 1998, 2002, and 2003

Students	Grade 4			Grade 8		
	1998	2002	2003	1998	2002	2003
Identified	14.3	17.6	19.2	15.5	20.0	18.6
English language learner	4.8	3.9	5.4	5.2	4.8	3.8
Student with disability	9.1	11.8	12.3	9.8	13.7	13.2
Both	0.3	1.9	1.5	0.5	1.6	1.5
Excluded	7.4	8.2	8.0	7.6	9.4	6.6
English language learner	3.5	2.0	2.9	3.6	1.8	1.6
Student with disability	3.7	4.9	4.5	3.5	6.6	4.5
Both	0.2	1.3	0.6	0.4	1.0	0.6
Accommodated	4.2	6.1	8.4	3.9	7.1	9.4
English language learner	0.0	0.8	1.2	0.0	1.2	1.2
Student with disability	4.2	4.9	6.5	3.9	5.5	7.4
Both	0.0	0.3	0.8	0.0	0.4	0.7

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessments.

6

Figure 2. Comparison of NAEP and state assessment achievement changes in percent meeting reading standards, by grade: 1998, 2002, and 2003



* NAEP and state assessment 2002-2003 changes are significantly different ($p < .05$).

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

7

Table 3. Percentage meeting grades 4 and 8 reading standards as reported by state: 1998, 2002, and 2003

Level	1998	2002	2003
Grade 4	—	62.0	64.0
Grade 8	—	44.0	45.0

— Not available.

SOURCE: State education agency website.

3. The state-reported percentages were retrieved from state education agencies' websites in July 2004.

Element 8

Comparison of NAEP and state assessment of the Black-White grade 4 achievement gap

Three graphs and a table on the third page of the profile pertain to measurement of an achievement gap in grade 4 in 2003. The graphs show comparisons of the gap as measured in NAEP schools (a) by state assessment and (b) by NAEP. In states in which at least 10 percent of public school membership is Black, the first achievement gap presented is the Black-White gap.⁴

The two graphs at the top of the page are population profiles of the achievement of Black and White students as indicated by state assessment results (lighter lines) and NAEP results (darker lines). Both graphs represent percentages meeting the primary state standard in the same sample of schools.⁵

Interpretation of the population profiles is as follows: imagine the students in a subpopulation (e.g., White students) lined up along the horizontal axis, sorted from those in the lowest scoring segments of the subpopulation at the left to the highest scoring segments of the subpopulation at the right. The graph shows the percentage of students in each student's school achieving the standard. For example, at the median (50th percentile) of the White student population, White students are in schools in which about 70 percent of the White students are achieving the standard (the dashed line on the following graph), as measured by both NAEP and the state assessment. By comparison, at the median (50th percentile) of the Black student population in the state, Black students are in schools in which about 46 percent of the Black students are achieving the standard (the solid line on the same graph).

The population gap profile in the lower left portion of the page displays the difference between the Black and White population profiles (i.e., the White profile is subtracted from the Black profile). The lighter line refers to state assessment of the gap; the darker line refers to NAEP assessment of the gap. The space between those two lines represents the difference between NAEP and state assessment of the gap. In this graph, it appears that both assessments, but especially NAEP, find the gap to be somewhat larger in comparing the lower halves of the subpopulations than in comparing the upper halves.

The table at the lower right summarizes the average differences in gaps and indicates whether the NAEP-State gap difference is significantly different from zero.⁶ Positive numbers indicate that the state assessment found the gap to be larger, negative numbers the opposite. For example, in comparing the lower halves of the subpopulations, NAEP found the gap to be 10.4 percent larger (i.e., the gap between

4. At least 10 NAEP schools with sufficient numbers of minority students were required for constructing a comparison.

5. For Alabama, Tennessee, and Utah, states for which state reports of percentages meeting standards were unavailable, comparisons are based on median percentile scores.

6. The significance was determined by a Student's *t*. However, it is important to examine the values of a Student's *t* before reaching conclusions about gap differences, because in the cases of small samples, large variations in percentages meeting standards can occur by chance.

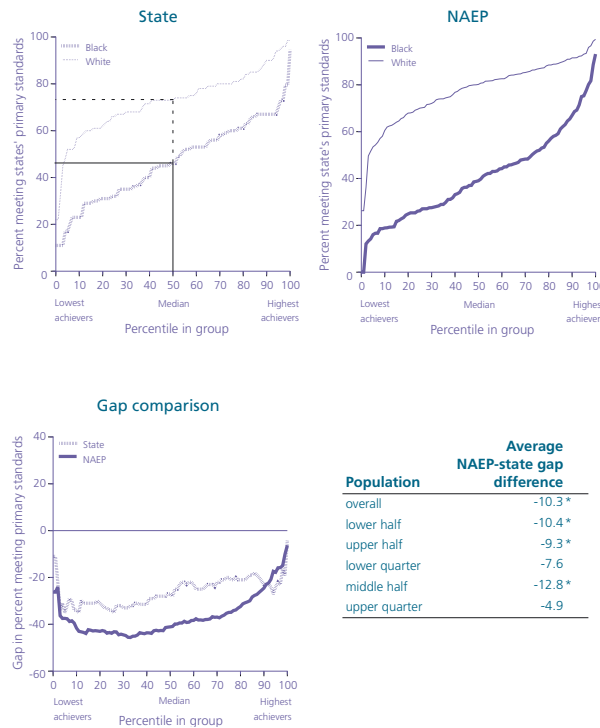
the percentages of Black and White students meeting the standard was 10.4 percent greater when the NAEP measurements were compared than when the state assessment scores were compared.) These differences are *statistically significant* for this gap comparison.

Figure D4. Element 8 of the state profile



Black-White Gap

Figure 3. Comparison of NAEP and state assessment Black-White achievement gaps in percent meeting grade 4 reading standards: 2003



8

* NAEP-State gap difference significantly different from zero (p<.05).

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSASD) 2004.

Element 9

Comparison of NAEP and state assessment changes of the Black-White grade 4 achievement gap

Corresponding profiles of gap changes from 2002 to 2003 are displayed on the following page. The two graphs at the top of the page display gap profiles like the one on the lower left of the previous page. Thicker lines indicate 2003 gaps, and thinner lines indicate 2002 gaps.

The graph at the lower left displays improvement in the gap by subtracting the 2002 figures from the 2003 figures. In this case, the state assessment appears to have found more improvement than NAEP in the upper half of the subpopulations. However, the table at the lower right indicates that this difference between NAEP and state assessment results may be random.

Elements 10-19

Other gap profiles

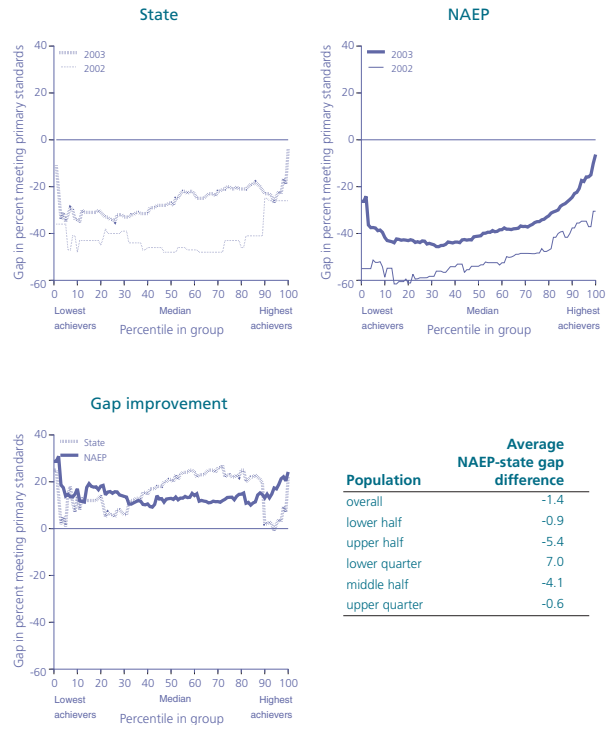
Gap profiles in the same form as element 8 are also included for grade 8 and for the Hispanic-White gap and the poverty gap where more than 10 percent of the students are in the subpopulation and sufficient data are available. All gap profiles are based on percentages of students in schools meeting achievement standards, and for small schools, these percentages are subject to large random variations. Therefore, results from schools where very small numbers of minority students are enrolled and participate in the assessment are suppressed and are not represented in the population profiles. The *suppression threshold* for state assessment scores varies from state to state; however, in analyzing NAEP data, we omitted school-level percentages based on one or two students.

Figure D5. Element 9 of the state profile

STATE X **D**

9

Figure 4. Comparison of NAEP and state assessment Black-White gap changes in percent meeting grade 4 reading standards: 2002 and 2003



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Comparison between NAEP and State Reading Assessment Results: 2003 **D-5**

D

Alabama

Alabama administers the Stanford Achievement Test, Tenth Edition (SAT-10) in grades 3-8 in reading and mathematics. Scores are available for Black and economically disadvantaged students. Alabama does not use multiple achievement levels for reporting purposes on the SAT-9/SAT-10; instead, it reports exam results in percentiles. Before 2003, when the SAT-10 was implemented, students took the SAT-9. School-level assessment scores based on 10 or fewer students are suppressed.

Summary of Comparisons

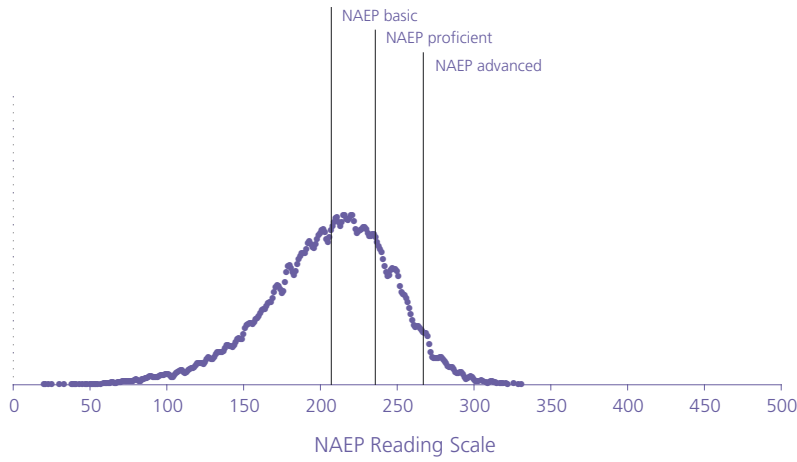
The results of comparisons between NAEP and state assessment results, which for 2003 are based on 106 schools in grade 4 and 100 schools in grade 8, are shown graphically on the following pages. A brief summary of the results follows:¹

- **Standards.** There are not enough data to compare state standards to NAEP for grade 4 or grade 8.
- **Trends.** There were no significant differences between grades 4 and 8 NAEP and state assessment gains in average percentile rank between 2002 and 2003.
- **Gaps.** Overall, there were no significant differences between NAEP and the state assessment in measurement of the Black-White and poverty gaps in reading in grades 4 and 8 in 2003. There were insufficient data for comparing the NAEP and state assessment measurement of the Hispanic-White gap in reading in grades 4 and 8 in 2003.

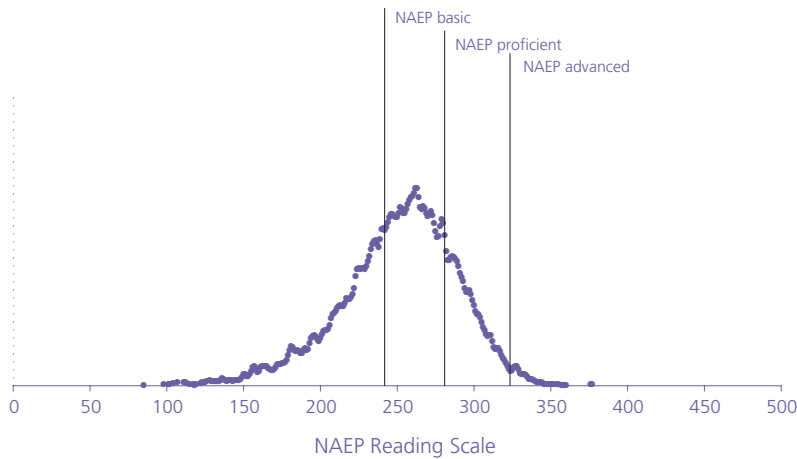
1. All statements of differences are based on statistical tests at the 5% significance level. However, these results must be considered in the context of the available data. NAEP and state assessments may employ different test items, testing accommodations, and scoring methods; and they may involve different students in each school, at different times of the year, with different motivational characteristics. At the present time, in spite of controlling for effects of school sampling, differences in standards, and NAEP exclusion rates, we cannot identify specific reasons for differences between NAEP and state assessment results.

Figure 1. Distribution of grades 4 and 8 NAEP reading achievement scores: 2003

Grade 4



Grade 8



NOTE: State does not use multiple achievement levels for reporting; it reports exam results in percentiles.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates.

Table 1. School-level correlations between NAEP and state assessment of percentages of students achieving state’s reading standards: 2003

Standard	Grade 4		Grade 8	
	Correlation	Standard error	Correlation	Standard error
Percentile Rank	0.79	0.015	0.81	0.021

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.



Table 2. Percentages of English language learners and students with disabilities identified, excluded, and accommodated in the NAEP reading assessments, by grade: 1998, 2002, and 2003

Students	Grade 4			Grade 8		
	1998	2002	2003	1998	2002	2003
Identified	12.9	14.3	12.2	12.1	14.3	13.6
English language learner	0.3	0.9	0.6	0.2	0.5	1.0
Student with disability	12.6	13.0	11.3	11.8	13.6	12.3
Both	0.0	0.4	0.4	0.1	0.2	0.3
Excluded	8.5	2.6	2.1	6.4	2.2	2.9
English language learner	0.3	0.2	0.2	0.2	0.2	0.5
Student with disability	8.2	2.2	1.8	6.2	2.0	2.3
Both	0.0	0.2	0.2	0.1	#	0.1
Accommodated	1.3	2.5	2.7	0.5	0.9	1.7
English language learner	0.1	0.0	0.0	0.0	0.0	0.0
Student with disability	1.3	2.4	2.6	0.5	0.9	1.6
Both	0.0	#	0.1	0.0	0.0	0.1

Estimate rounds to zero.

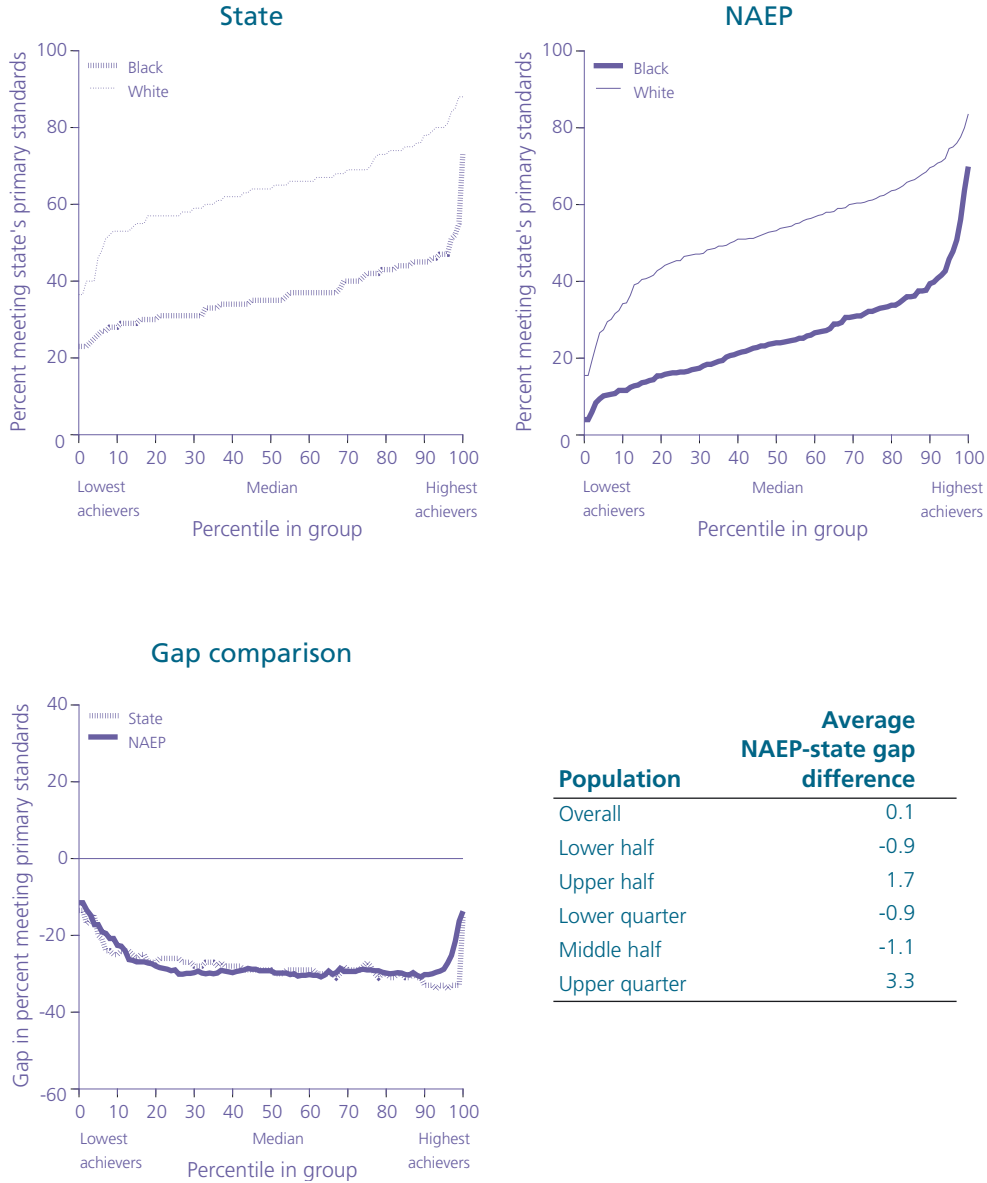
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessments.

Figure 2. Comparison of NAEP and state assessment achievement changes in percent meeting reading standards, by grade: 1998, 2002, and 2003



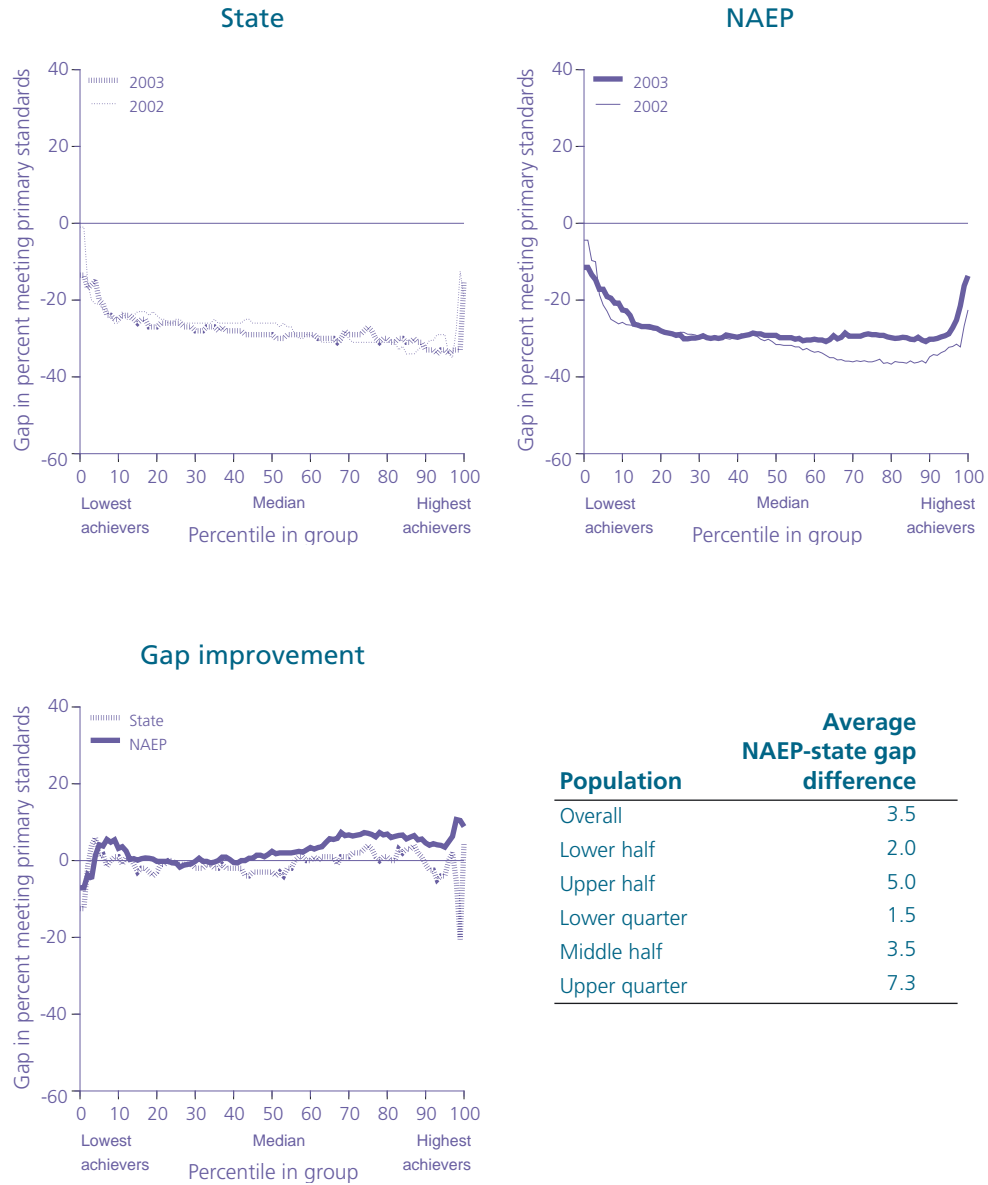
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 3. Comparison of NAEP and state assessment Black-White achievement gaps in percent meeting grade 4 reading standards: 2003



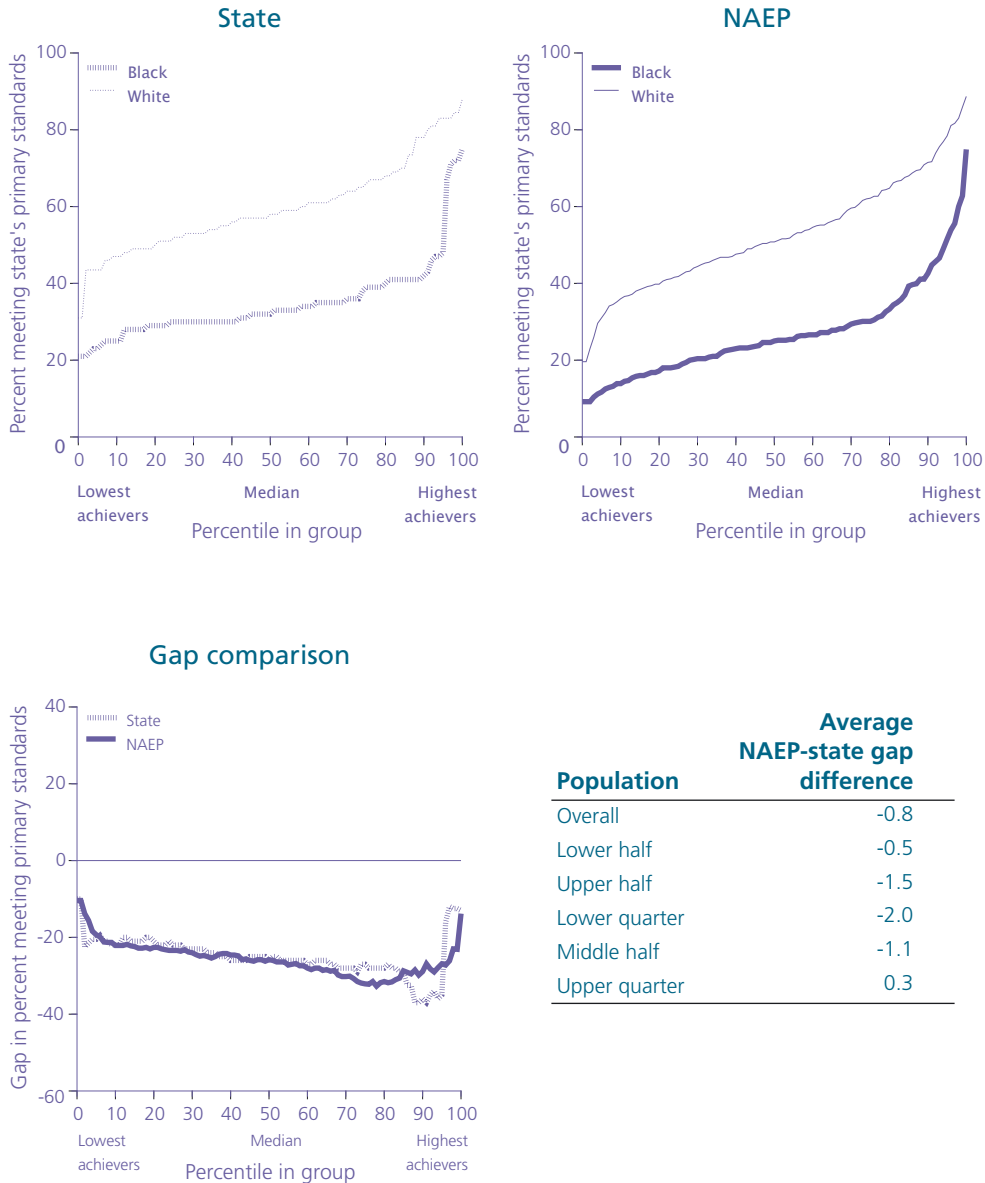
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 4. Comparison of NAEP and state assessment Black-White gap changes in percent meeting grade 4 reading standards: 2002 and 2003



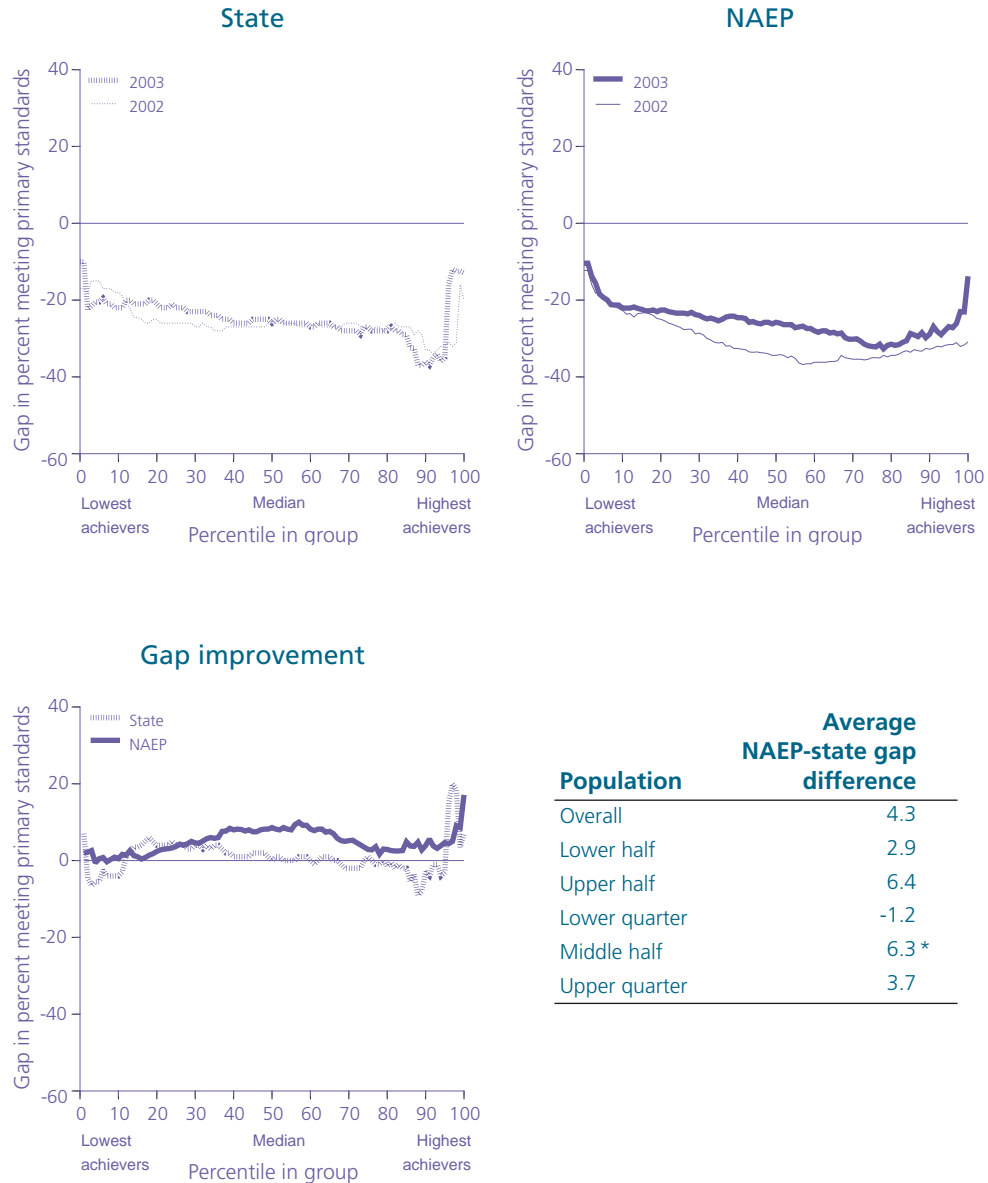
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 5. Comparison of NAEP and state assessment Black-White achievement gaps in percent meeting grade 8 reading standards: 2003



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

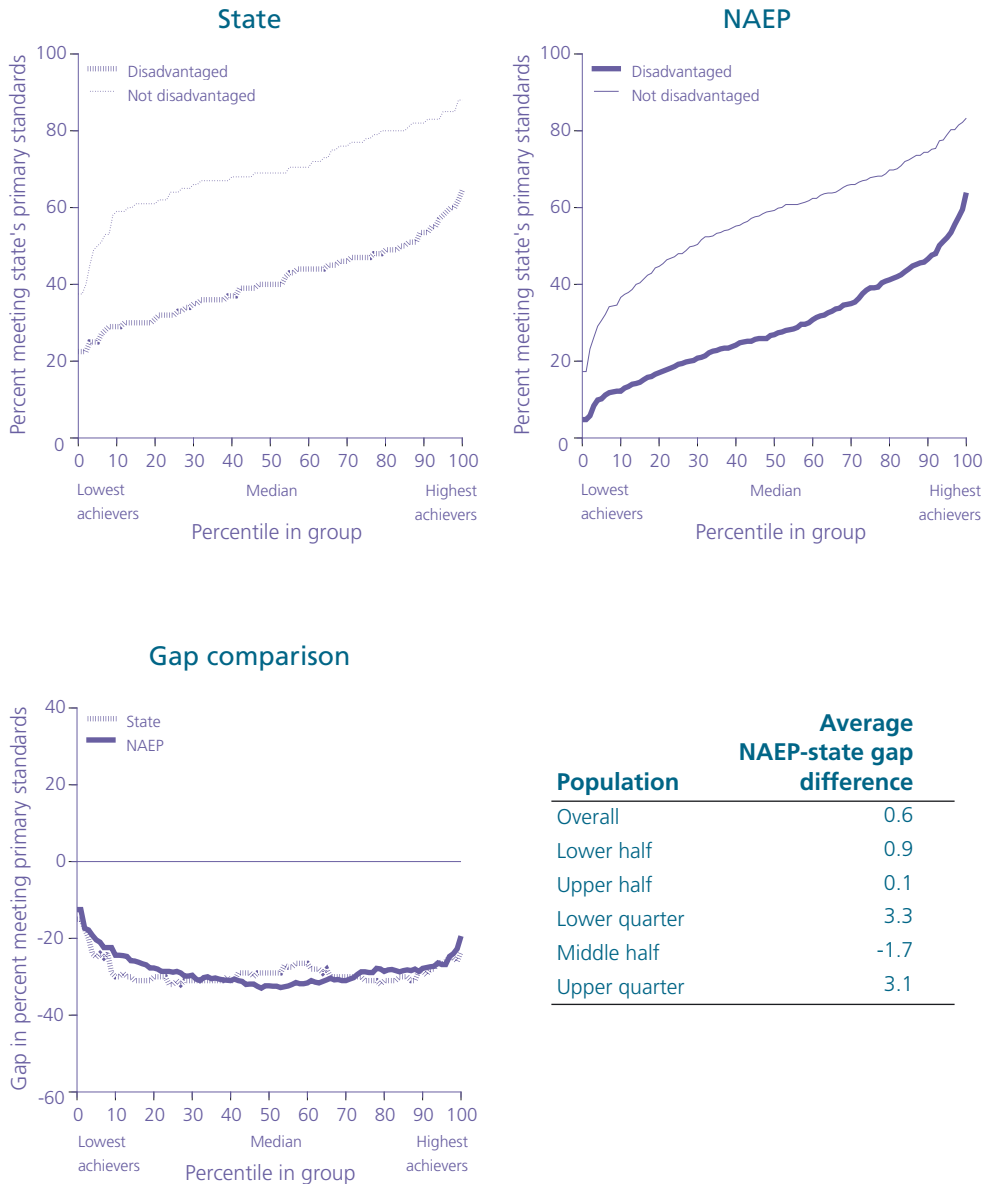
Figure 6. Comparison of NAEP and state assessment Black-White gap changes in percent meeting grade 8 reading standards: 2002 and 2003



* NAEP-State gap difference significantly different from zero ($p < .05$).

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 7. Comparison of NAEP and state assessment poverty achievement gaps in percent meeting grade 4 reading standards: 2003

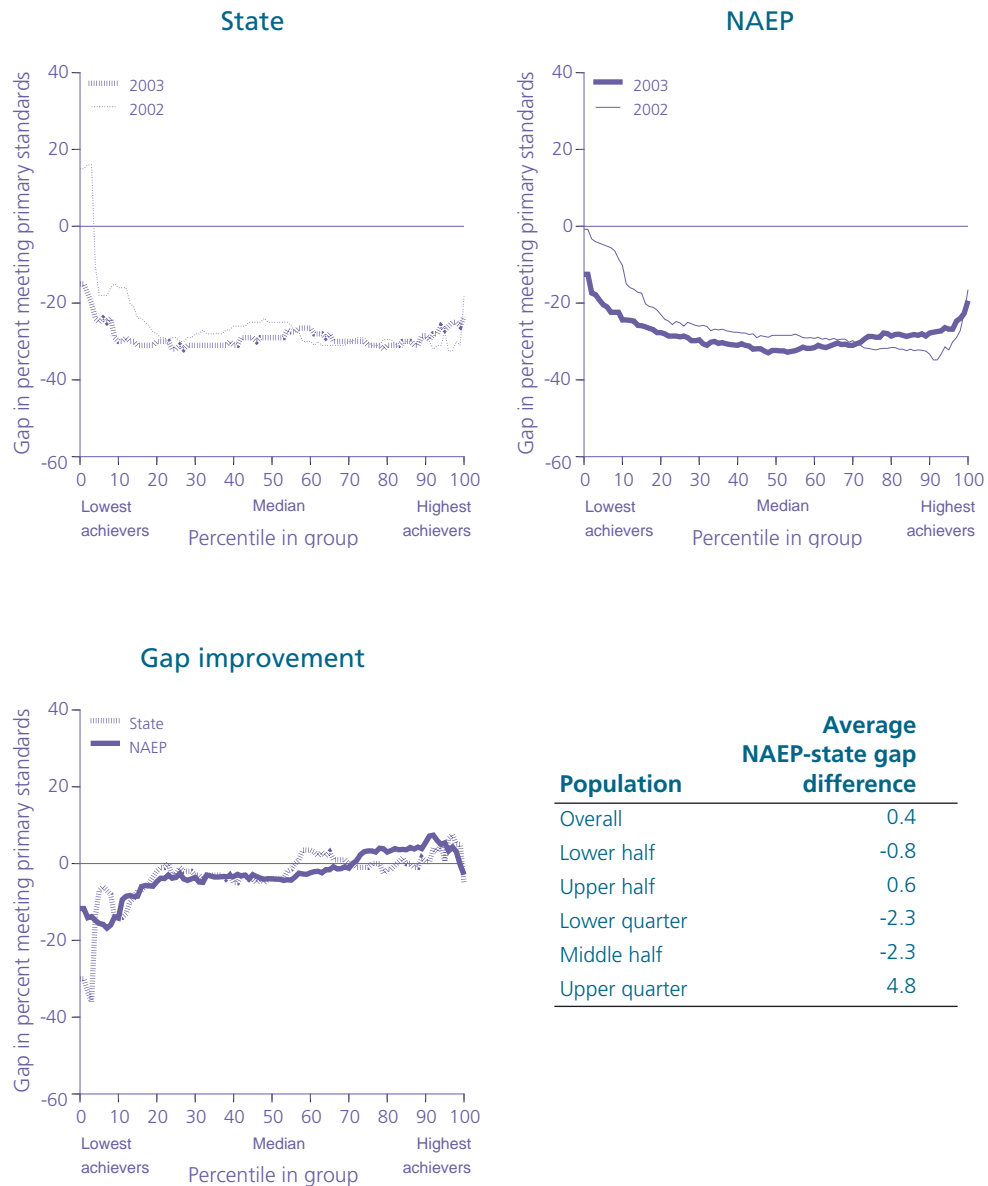


NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.



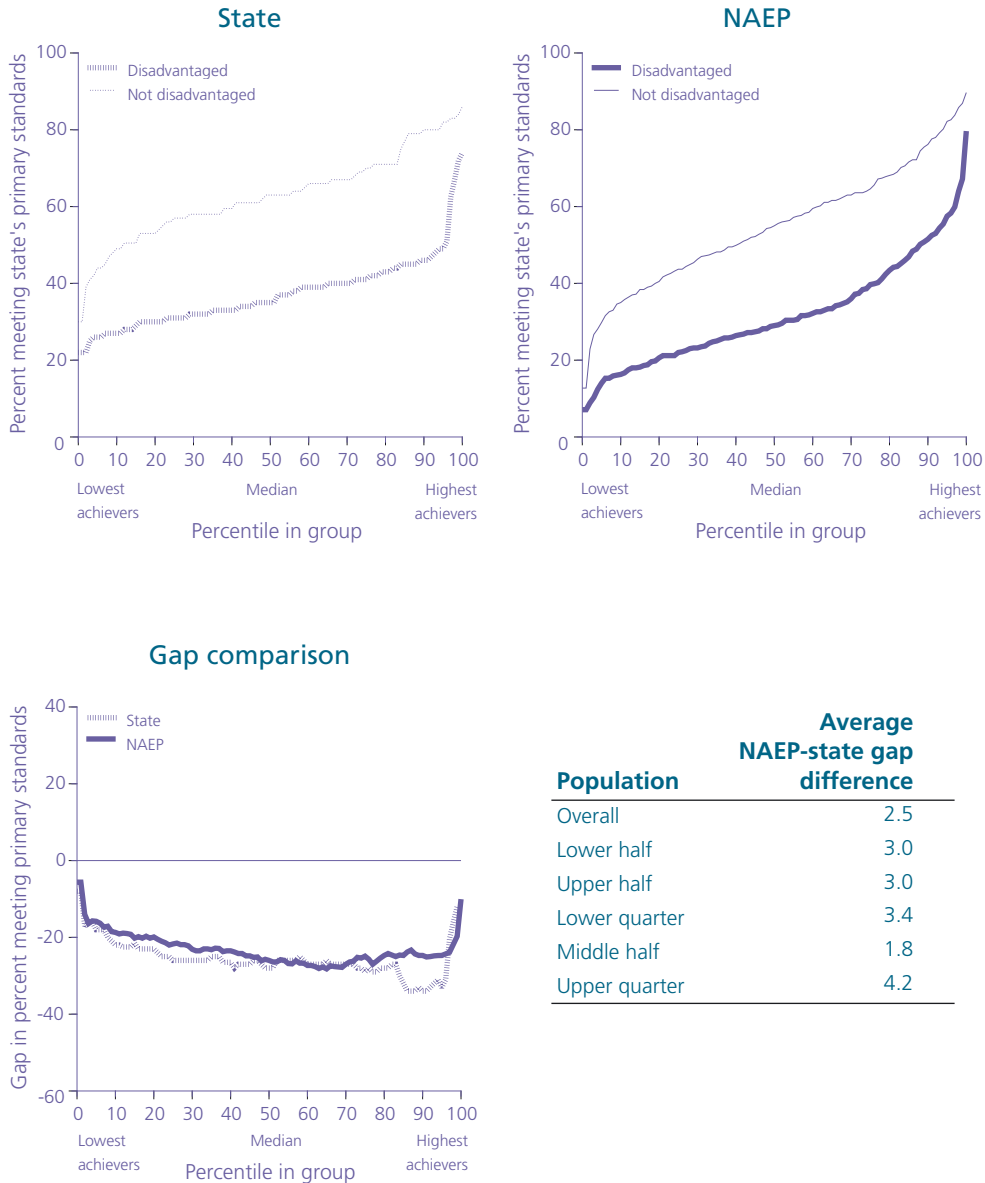
Figure 8. Comparison of NAEP and state assessment poverty gap changes in percent meeting grade 4 reading standards: 2002 and 2003



NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 9. Comparison of NAEP and state assessment poverty achievement gaps in percent meeting grade 8 reading standards: 2003

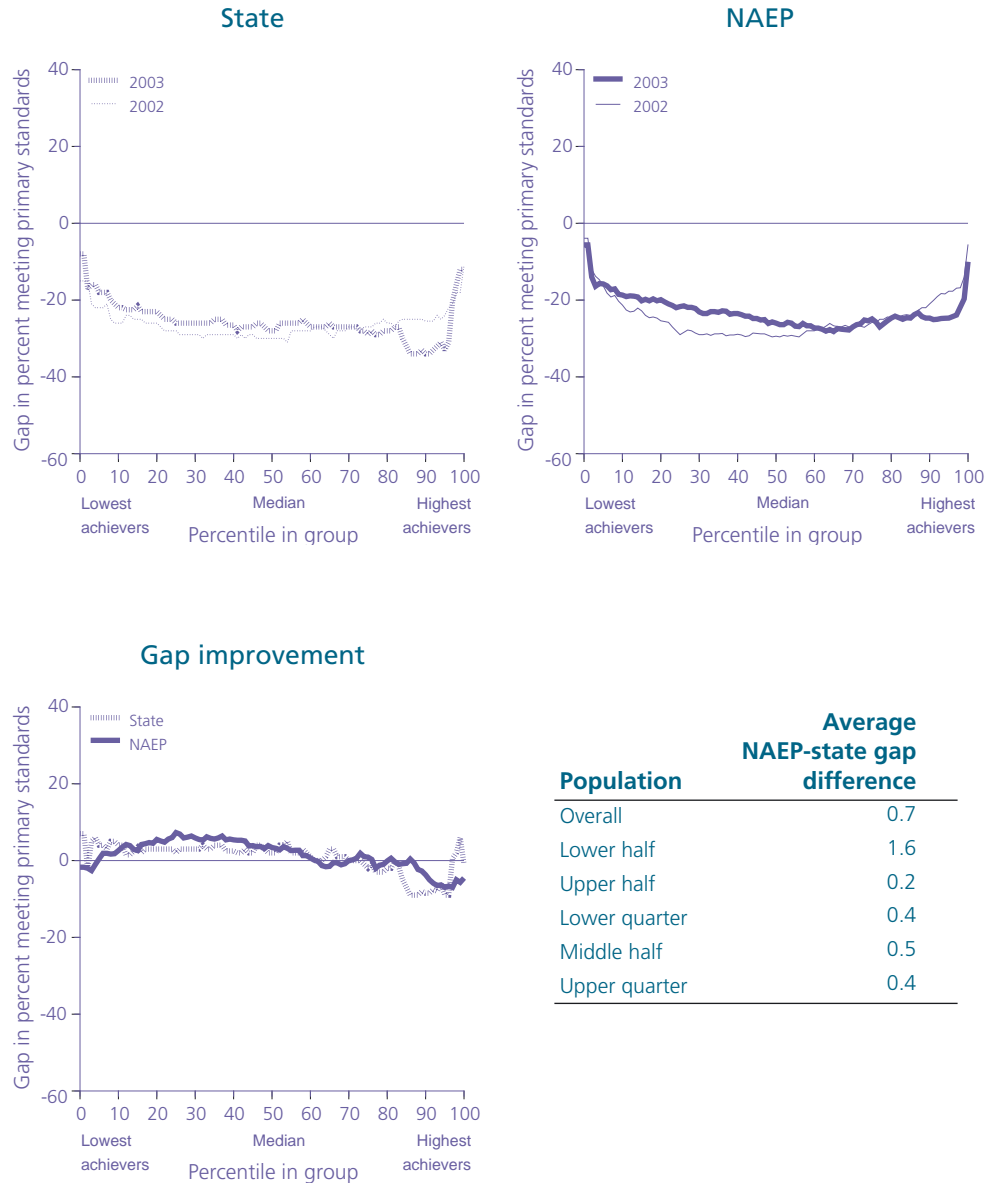


NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.



Figure 10. Comparison of NAEP and state assessment poverty gap changes in percent meeting grade 8 reading standards: 2002 and 2003



NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

D

Alaska

Alaska administers the Alaska Benchmark Examinations and the California Achievement Tests, Sixth Edition Survey (CAT/6). The Benchmark exams test students in grade 8 in reading and mathematics; the CAT/6 tests students in grade 4 in reading and mathematics. Scores are available for Black students, but there are too few students in this subgroup to provide a reliable comparison. Alaska uses four achievement levels for reporting purposes on the Benchmark exams: *not proficient*, *below proficient*, *proficient*, and *advanced*. However, in 2003, data were available for only one level: *proficient*. The CAT/6 results are reported on only two levels: *not proficient* and *proficient*. Trend graphs are not included because Alaska did not participate in State NAEP prior to 2003. School-level assessment scores based on 5 or fewer students are suppressed.

Summary of Comparisons

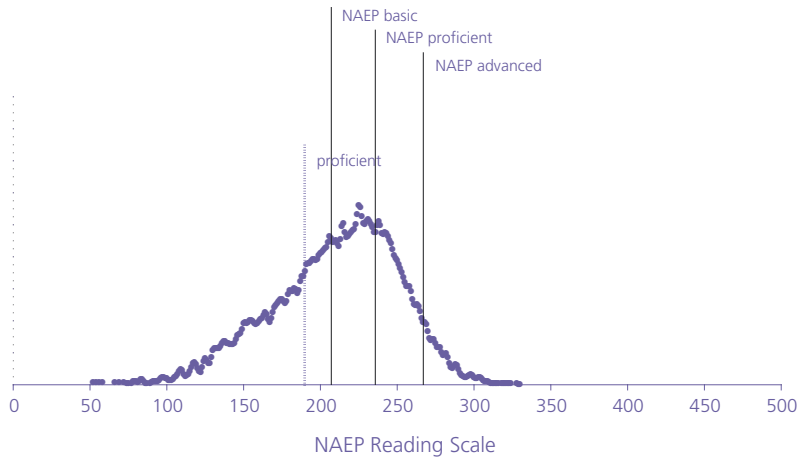
The results of comparisons between NAEP and state assessment results, which for 2003 are based on 103 schools in grade 4 and 51 schools in grade 8, are shown graphically on the following pages. A brief summary of the results follows:¹

- **Standards.** The state's primary grade 4 reading performance standard (*proficient*) is below the NAEP basic level. The state's primary grade 8 reading performance standard (*proficient*) is close to the NAEP basic level.
- **Trends.** No comparisons were possible for grades 4 and 8.
- **Gaps.** There were insufficient data for comparing the NAEP and state assessment measurement of the Black-White, Hispanic-White, and poverty gaps in reading in grades 4 and 8 in 2003.

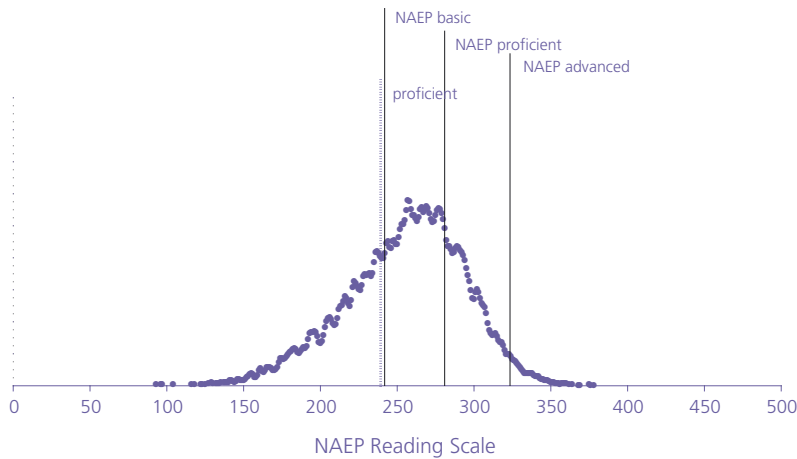
1. All statements of differences are based on statistical tests at the 5% significance level. However, these results must be considered in the context of the available data. NAEP and state assessments may employ different test items, testing accommodations, and scoring methods; and they may involve different students in each school, at different times of the year, with different motivational characteristics. At the present time, in spite of controlling for effects of school sampling, differences in standards, and NAEP exclusion rates, we cannot identify specific reasons for differences between NAEP and state assessment results.

Figure 1. Distribution of grades 4 and 8 NAEP reading achievement scores: 2003

Grade 4



Grade 8



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Table 1. School-level correlations between NAEP and state assessment of percentages of students achieving state’s reading standards: 2003

Standard	Grade 4		Grade 8	
	Correlation	Standard error	Correlation	Standard error
Proficient	0.85	0.015	0.73	0.042

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.



Table 2. Percentages of English language learners and students with disabilities identified, excluded, and accommodated in the NAEP reading assessments, by grade: 1998, 2002, and 2003

Students	Grade 4			Grade 8		
	1998	2002	2003	1998	2002	2003
Identified	—	—	29.2	—	—	24.7
English language learner	—	—	13.3	—	—	10.0
Student with disability	—	—	11.9	—	—	11.7
Both	—	—	4.1	—	—	3.0
Excluded	—	—	2.6	—	—	2.1
English language learner	—	—	0.4	—	—	0.1
Student with disability	—	—	1.6	—	—	1.6
Both	—	—	0.6	—	—	0.4
Accommodated	—	—	6.9	—	—	7.1
English language learner	—	—	0.3	—	—	0.3
Student with disability	—	—	5.4	—	—	6.1
Both	—	—	1.2	—	—	0.8

— Not available.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessments.

D

Arizona

The state administers Arizona's Instrument to Measure Standards (AIMS) in grades 3, 5, and 8 in reading and mathematics. Scores are available for Hispanic and Black students, but there are too few Black students to provide a reliable comparison. Arizona uses four achievement levels for reporting purposes: *falls far below the standard*, *approaches the standard*, *meets the standard*, and *exceeds the standard*. School-level assessment scores based on 10 or fewer students are suppressed.

Summary of Comparisons

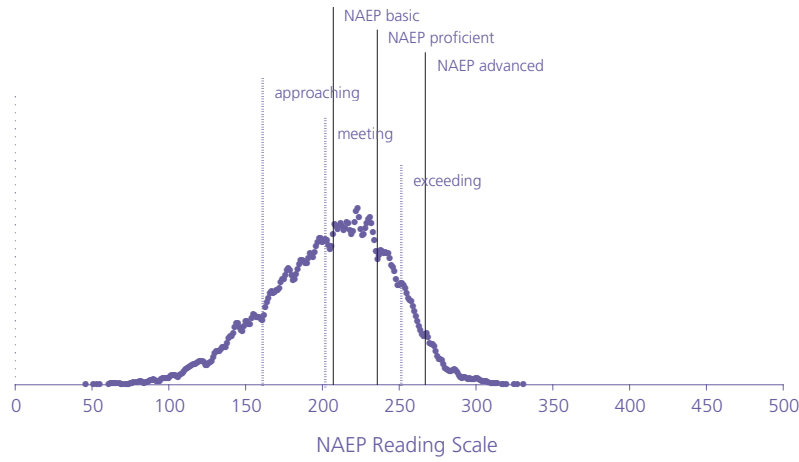
The results of comparisons between NAEP and state assessment results, which for 2003 are based on 99 schools in grade 5 and 105 schools in grade 8, are shown graphically on the following pages. A brief summary of the results follows:¹

- **Standards.** The state's primary grade 5 reading performance standard (*meeting*) is below the NAEP basic level. The state's primary grade 8 reading performance standard (*meeting*) is between the NAEP basic and proficient levels.
- **Trends.** There were no significant differences between grades 4 and 8 NAEP and state assessment gains in percent meeting the standards between 2002 and 2003.
- **Gaps.** There were insufficient data for comparing the NAEP and state assessment measurement of the Black-White and poverty gaps in reading in grades 5 and 8 in 2003. Overall, the Hispanic-White gap in grade 5 in percent meeting the state's standard in reading in 2003 was greater when measured by NAEP compared to the state assessment. Overall, there were no significant differences between NAEP and the state assessment in measurement of the Hispanic-White gap in reading in grade 8 in 2003.

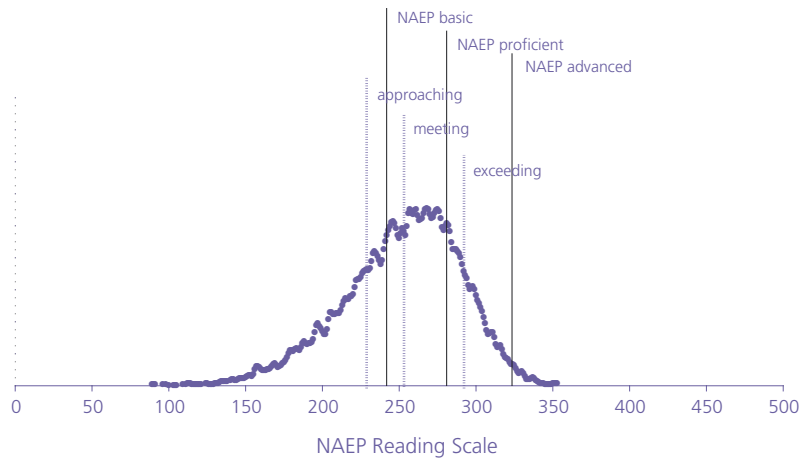
1. All statements of differences are based on statistical tests at the 5% significance level. However, these results must be considered in the context of the available data. NAEP and state assessments may employ different test items, testing accommodations, and scoring methods; and they may involve different students in each school, at different times of the year, with different motivational characteristics. At the present time, in spite of controlling for effects of school sampling, differences in standards, and NAEP exclusion rates, we cannot identify specific reasons for differences between NAEP and state assessment results.

Figure 1. Distribution of grades 4 and 8 NAEP reading achievement scores: 2003

Grade 4 (state 5th grade standards)



Grade 8



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Table 1. School-level correlations between NAEP and state assessment of percentages of students achieving state’s reading standards: 2003

Standard	Grade 5		Grade 8	
	Correlation	Standard error	Correlation	Standard error
Approaching	0.71	0.012	0.79	0.025
Meeting	0.84	0.004	0.80	0.009
Exceeding	0.68	0.039	0.74	0.014

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

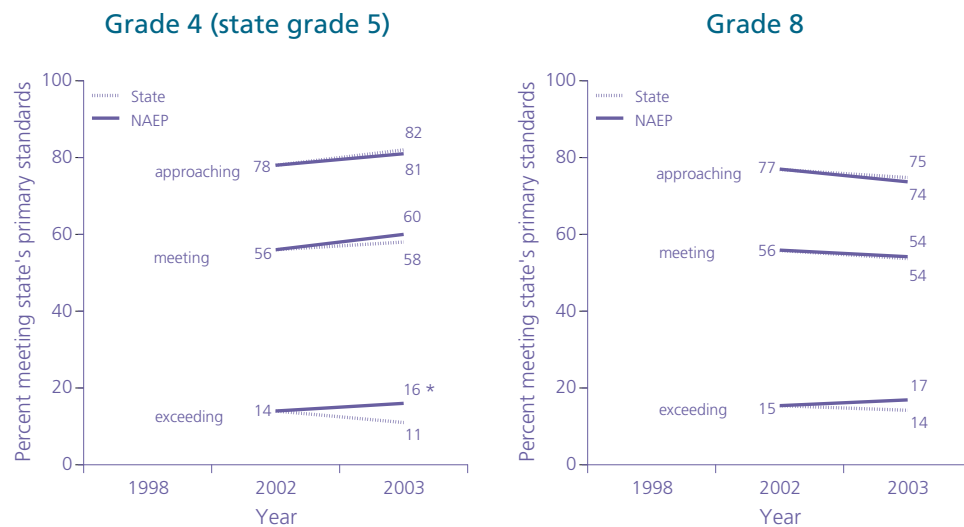


Table 2. Percentages of English language learners and students with disabilities identified, excluded, and accommodated in the NAEP reading assessments, by grade: 1998, 2002, and 2003

Students	Grade 4			Grade 8		
	1998	2002	2003	1998	2002	2003
Identified	21.9	28.5	28.0	17.1	21.3	25.1
English language learner	12.2	17.1	16.9	8.2	10.3	12.6
Student with disability	8.0	7.9	7.4	7.7	8.5	8.3
Both	1.6	3.5	3.6	1.2	2.6	4.2
Excluded	10.3	7.8	7.4	5.4	5.1	6.4
English language learner	5.5	3.2	2.5	2.0	1.4	1.7
Student with disability	3.9	2.9	3.2	2.7	2.6	2.8
Both	0.9	1.7	1.7	0.7	1.1	1.9
Accommodated	1.4	2.6	2.2	1.3	1.9	3.4
English language learner	0.8	0.6	0.5	0.2	0.2	0.7
Student with disability	0.6	1.7	1.3	1.0	1.4	2.2
Both	0.1	0.4	0.3	0.1	0.3	0.5

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessments.

Figure 2. Comparison of NAEP and state assessment achievement changes in percent meeting reading standards, by grade: 1998, 2002, and 2003



* NAEP and state assessment 2002-2003 changes are significantly different ($p < .05$).

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

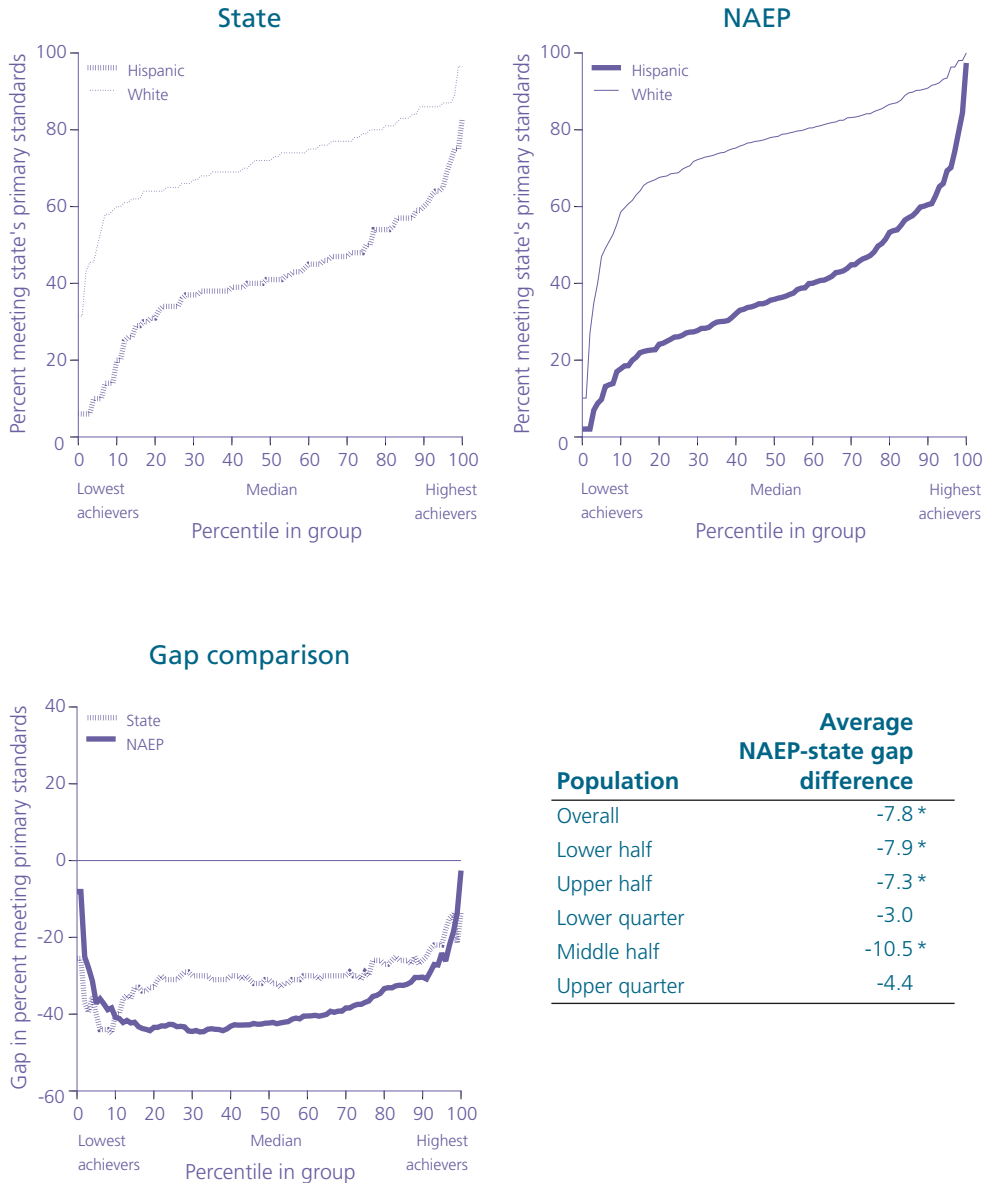
Table 3. Percentage meeting grades 5 and 8 reading standards as reported by state: 1998, 2002, and 2003

Level	1998	2002	2003
Grade 5	—	59.0	57.0
Grade 8	—	56.0	55.0

— Not available.

SOURCE: Arizona Department of Education retrieved from <http://www.ade.state.az.us/profile/publicview/>.

Figure 3. Comparison of NAEP and state assessment Hispanic-White gaps in percent meeting grade 4 reading standards: 2003

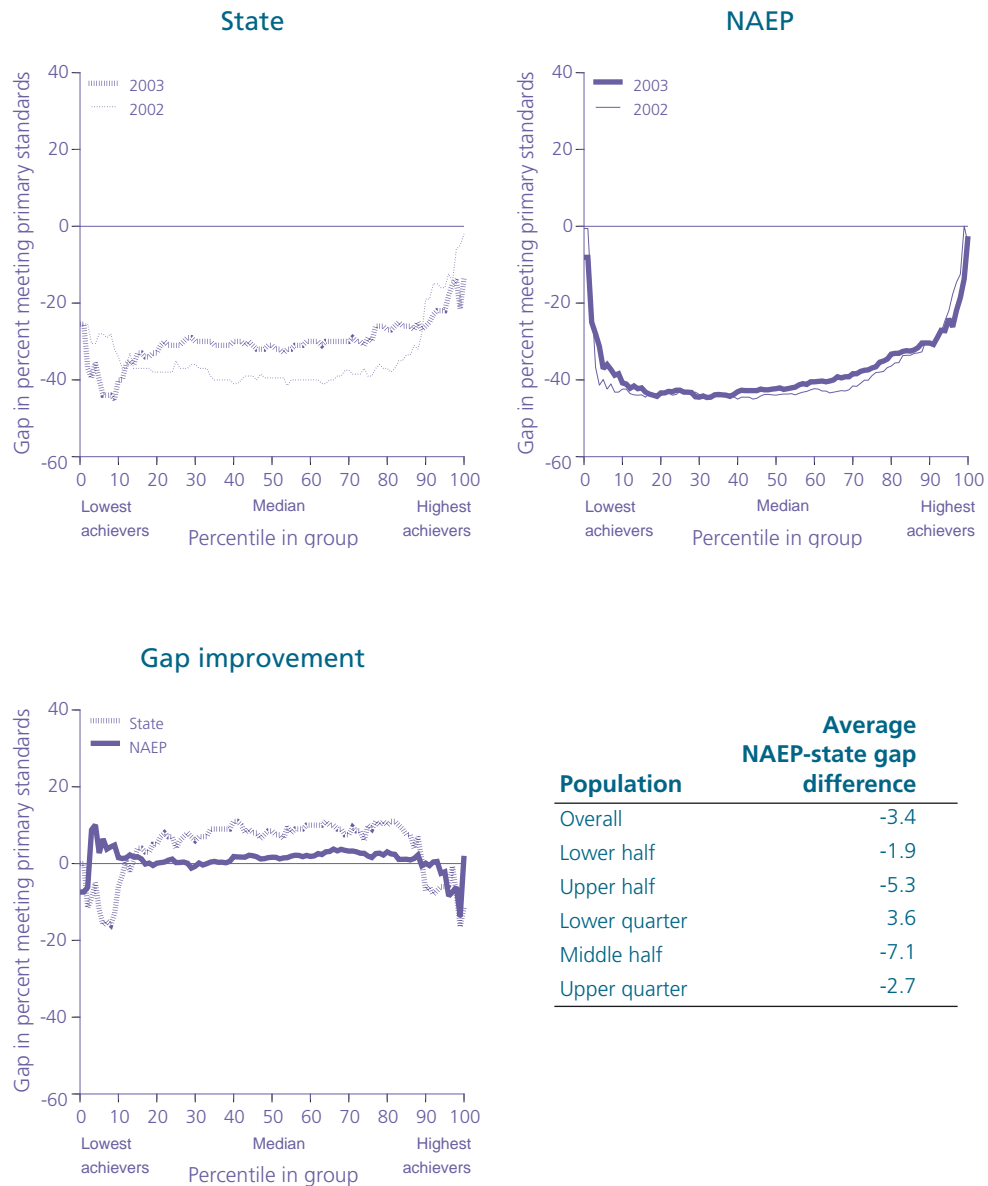


* NAEP-State gap difference significantly different from zero ($p < .05$).

NOTE: State assessment data used are for grade 5.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

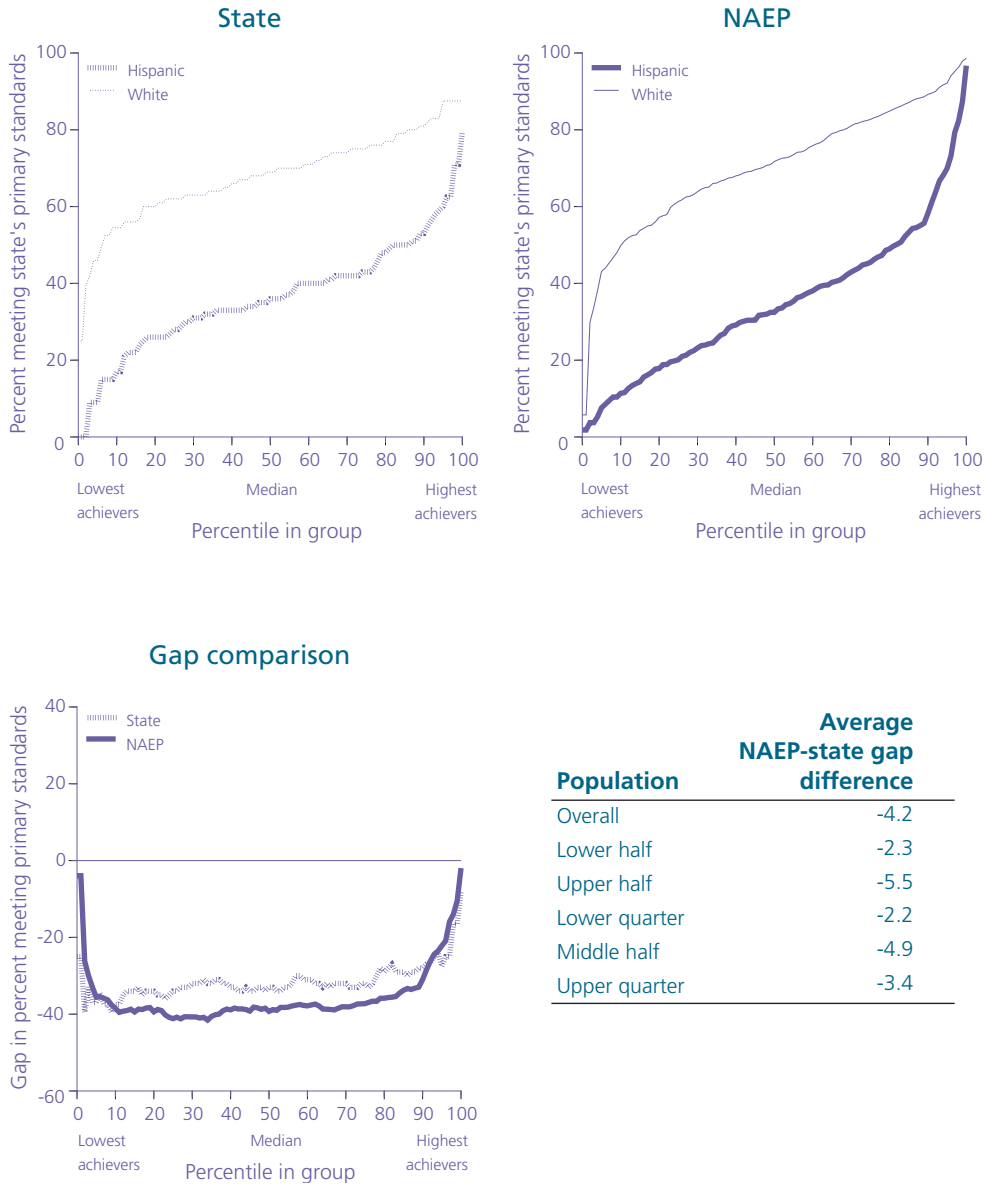
Figure 4. Comparison of NAEP and state assessment Hispanic-White gap changes in percent meeting grade 4 reading standards: 2002 and 2003



NOTE: State assessment data used are for grade 5.

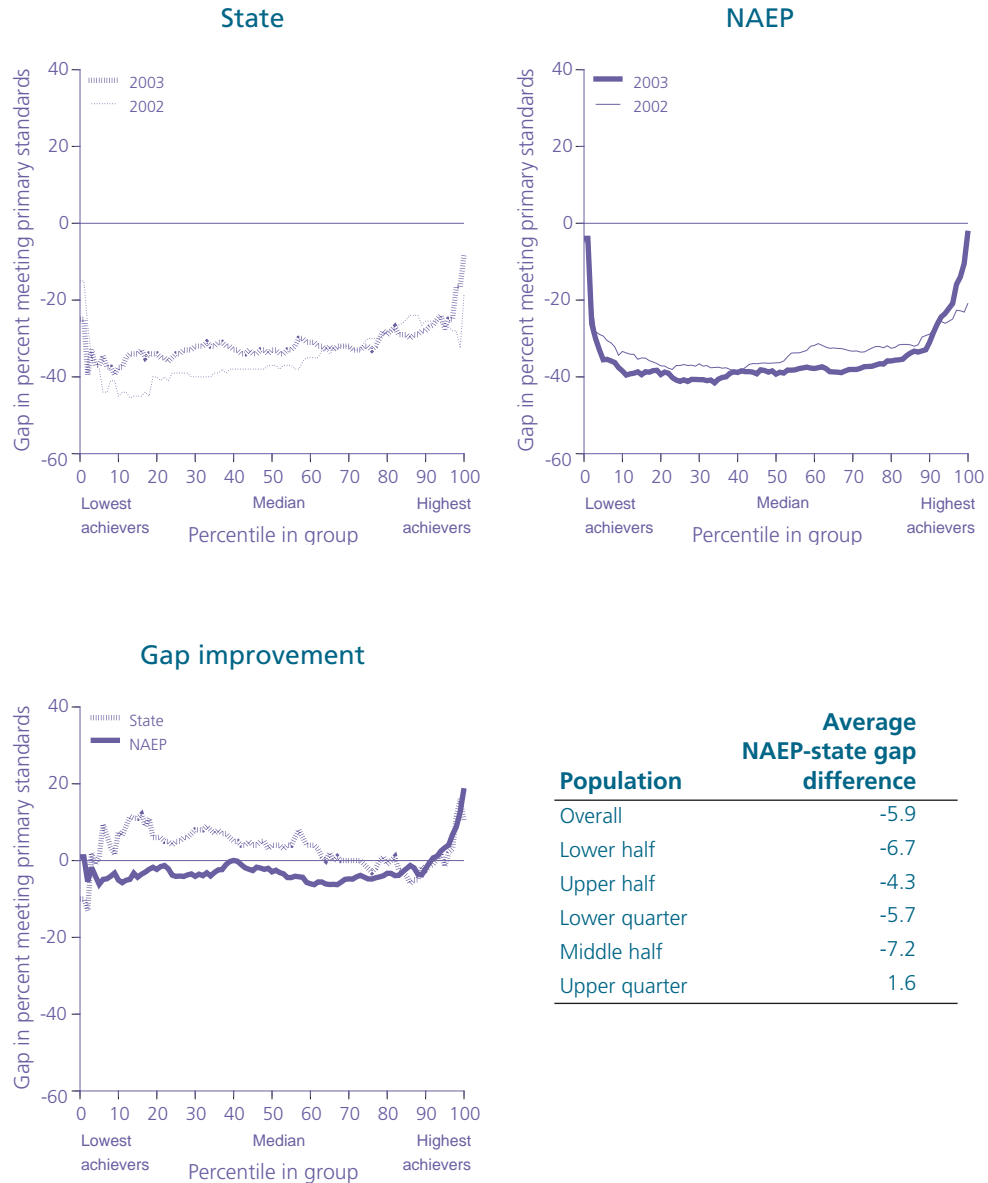
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 5. Comparison of NAEP and state assessment Hispanic-White gaps in percent meeting grade 8 reading standards: 2003



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 6. Comparison of NAEP and state assessment Hispanic-White gap changes in percent meeting grade 8 reading standards: 2002 and 2003



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

D

Arkansas

Through the Arkansas Comprehensive Testing, Assessment and Accountability Program (ACTAAP), the state administers Benchmark Exams in grades 4 and 8 in reading and mathematics. Scores are available for Black and economically disadvantaged students in grades 4 and 8 and for Hispanic students in grade 8, but there are too few Hispanic students to provide a reliable comparison. Arkansas uses four achievement levels for reporting purposes: *below basic*, *basic*, *proficient*, and *advanced*. School-level assessment scores based on 9 or fewer students are suppressed.

Summary of Comparisons

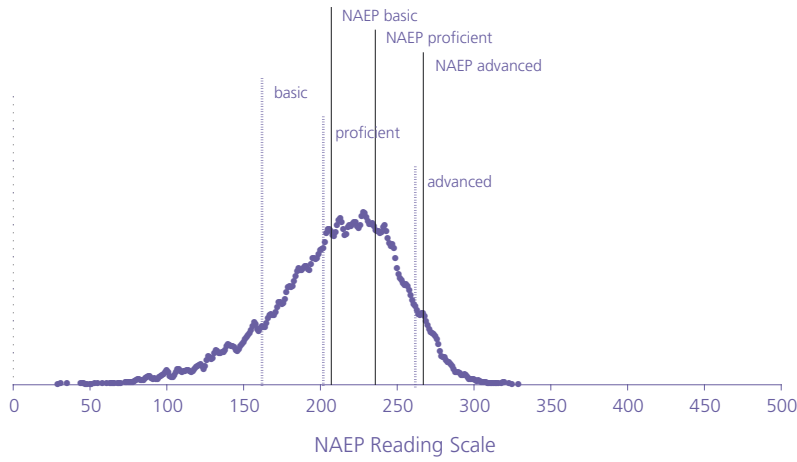
The results of comparisons between NAEP and state assessment results, which for 2003 are based on 117 schools in grade 4 and 101 schools in grade 8, are shown graphically on the following pages. A brief summary of the results follows:¹

- **Standards.** The state's primary grade 4 reading performance standard (*proficient*) is below the NAEP basic level. The state's primary grade 8 reading performance standard (*proficient*) is between the NAEP basic and proficient levels.
- **Trends.** Between 2002 and 2003, the NAEP grades 4 and 8 gains in percent proficient are less than the state assessment gains.
- **Gaps.** Overall, the Black-White gap in grade 4 in percent meeting the state's standard in reading in 2003 was greater when measured by NAEP compared to the state assessment. Overall, there were no significant differences between NAEP and the state assessment in measurement of the Black-White gap in reading in grade 8 in 2003. There were insufficient data for comparing the NAEP and state assessment measurement of the Hispanic-White gap in reading in grades 4 and 8 in 2003. Overall, there were no significant differences between NAEP and the state assessment in measurement of the poverty gap in reading in grade 4 in 2003. Overall, the poverty gap in grade 8 in percent meeting the state's standard in reading in 2003 was smaller when measured by NAEP compared to the state assessment.

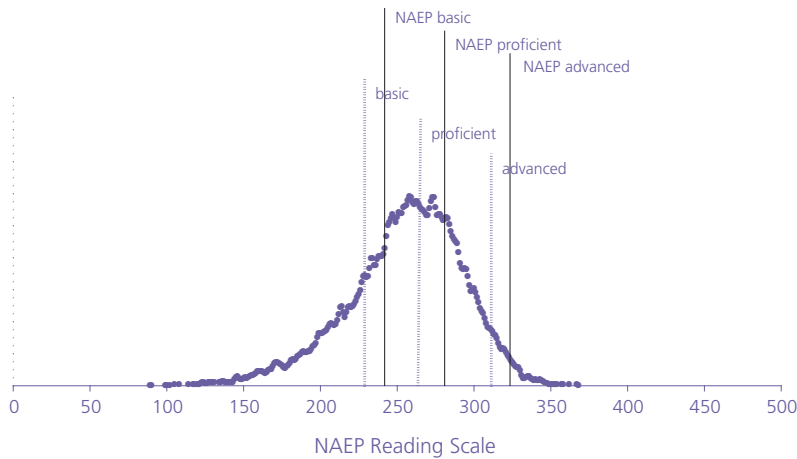
1. All statements of differences are based on statistical tests at the 5% significance level. However, these results must be considered in the context of the available data. NAEP and state assessments may employ different test items, testing accommodations, and scoring methods; and they may involve different students in each school, at different times of the year, with different motivational characteristics. At the present time, in spite of controlling for effects of school sampling, differences in standards, and NAEP exclusion rates, we cannot identify specific reasons for differences between NAEP and state assessment results.

Figure 1. Distribution of grades 4 and 8 NAEP reading achievement scores: 2003

Grade 4



Grade 8



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Table 1. School-level correlations between NAEP and state assessment of percentages of students achieving state’s reading standards: 2003

Standard	Grade 4		Grade 8	
	Correlation	Standard error	Correlation	Standard error
Basic	0.74	0.022	0.72	0.030
Proficient	0.76	0.018	0.63	0.020
Advanced	0.54	0.095	0.41	0.066

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

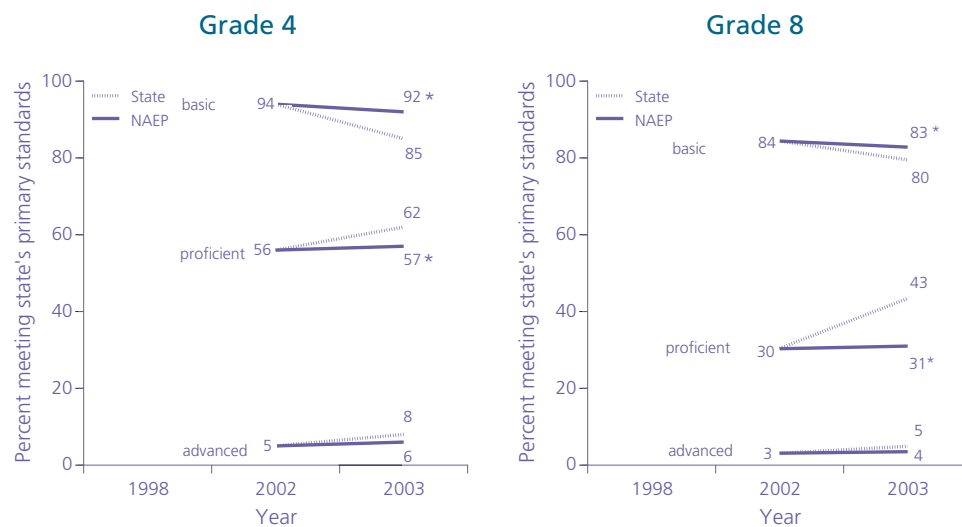


Table 2. Percentages of English language learners and students with disabilities identified, excluded, and accommodated in the NAEP reading assessments, by grade: 1998, 2002, and 2003

Students	Grade 4			Grade 8		
	1998	2002	2003	1998	2002	2003
Identified	10.9	14.3	15.8	11.5	15.1	15.8
English language learner	1.2	2.6	2.7	1.1	1.7	1.9
Student with disability	9.7	11.0	12.0	10.2	13.0	13.4
Both	0.0	0.7	1.1	0.2	0.4	0.6
Excluded	4.8	4.5	5.6	5.2	4.9	5.0
English language learner	0.7	0.4	0.8	0.7	0.5	0.9
Student with disability	4.1	3.9	4.4	4.4	4.3	3.7
Both	0.0	0.3	0.4	0.0	0.1	0.3
Accommodated	1.6	2.1	2.9	1.2	1.6	3.9
English language learner	0.0	0.0	0.0	0.2	0.0	0.2
Student with disability	1.6	2.0	2.9	0.8	1.6	3.7
Both	0.0	0.1	0.0	0.2	0.0	0.1

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessments.

Figure 2. Comparison of NAEP and state assessment achievement changes in percent meeting reading standards, by grade: 1998, 2002, and 2003



* NAEP and state assessment 2002-2003 changes are significantly different ($p < .05$).

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

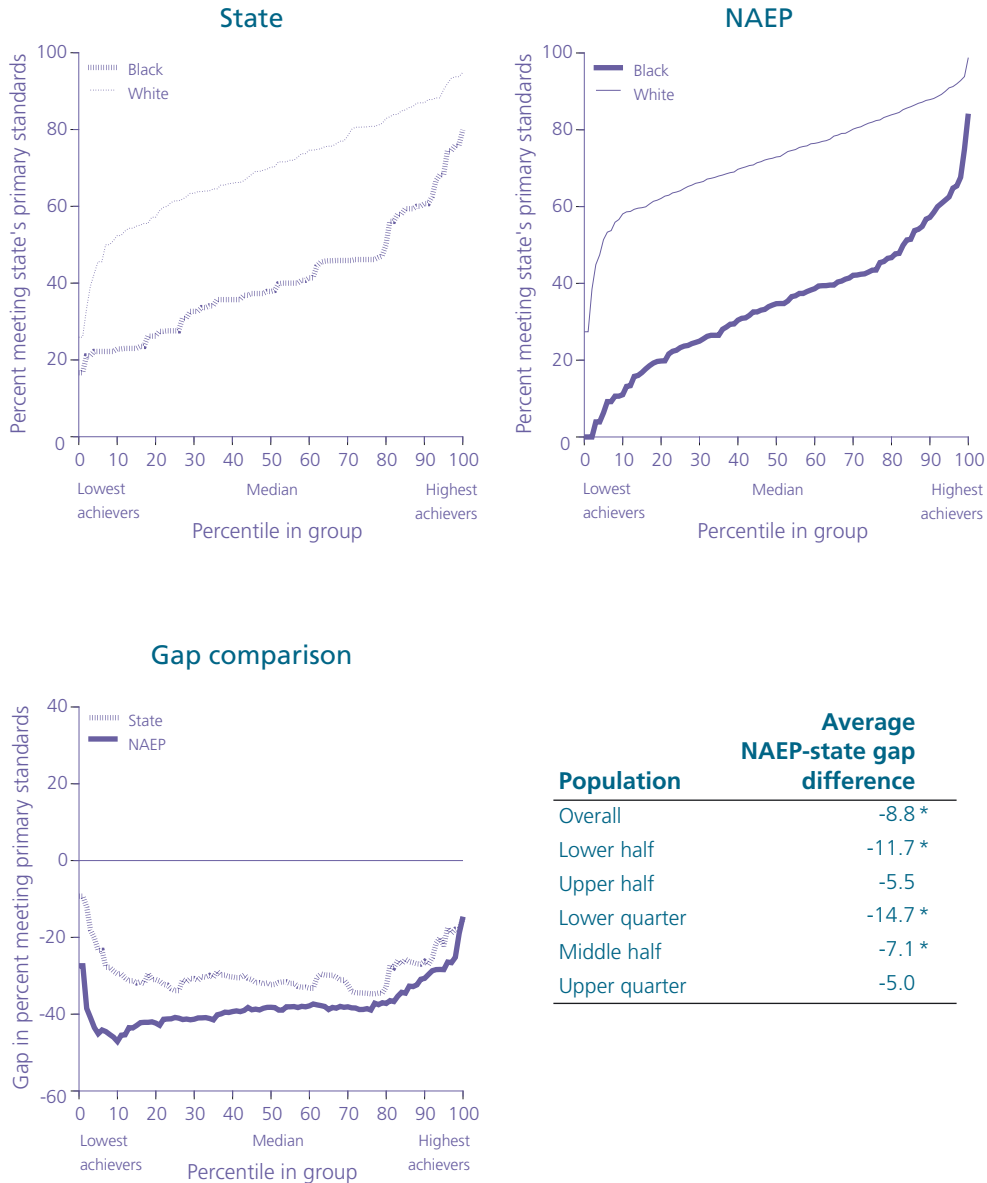
Table 3. Percentage meeting grades 4 and 8 reading standards as reported by state: 1998, 2002, and 2003

Level	1998	2002	2003
Grade 4	—	57.0	61.0
Grade 8	—	32.0	41.0

— Not available.

SOURCE: Arkansas School Information Site retrieved from <http://www.as-is.org/reportcard/>.

Figure 3. Comparison of NAEP and state assessment Black-White achievement gaps in percent meeting grade 4 reading standards: 2003

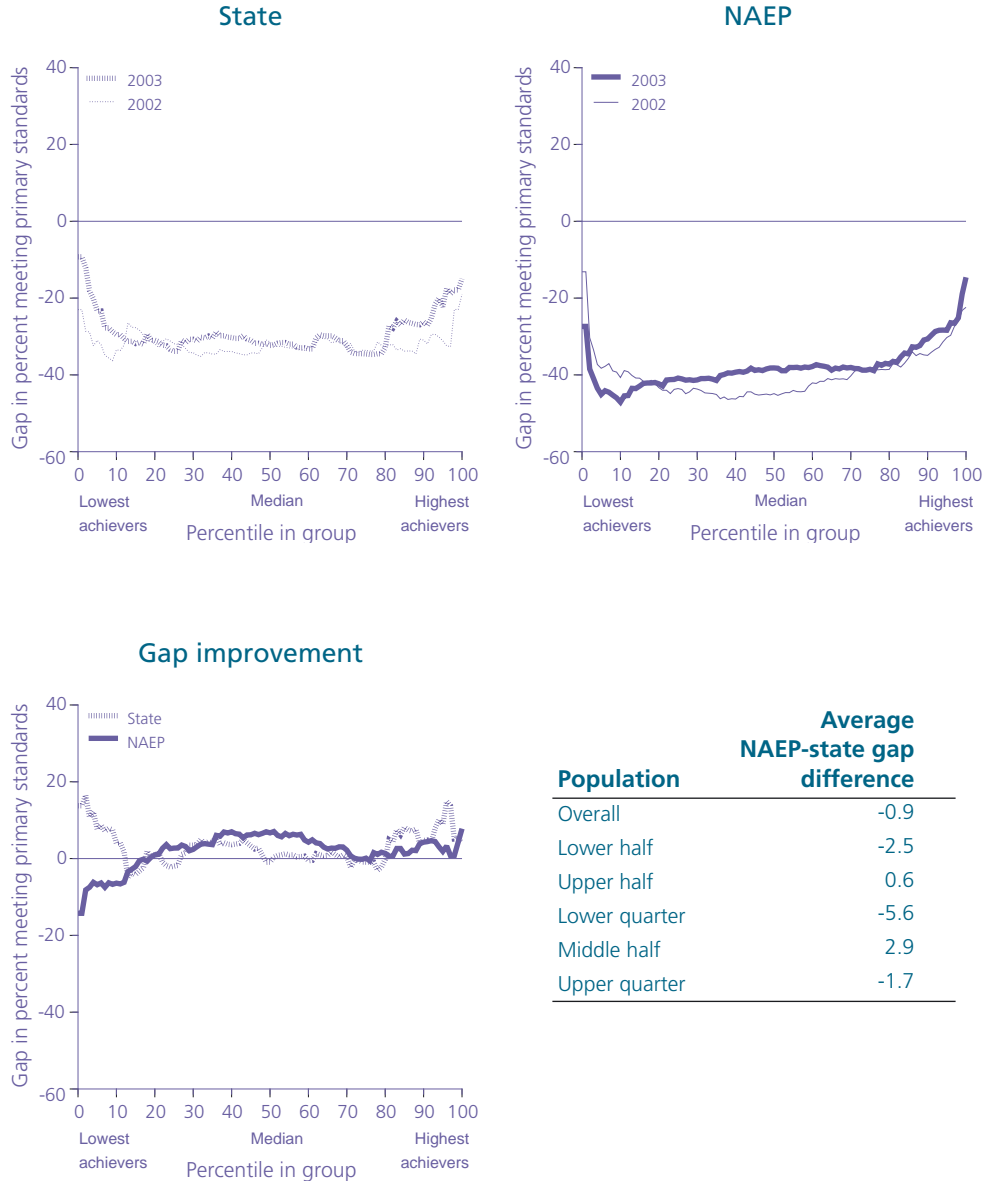


* NAEP-State gap difference significantly different from zero ($p < .05$).

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

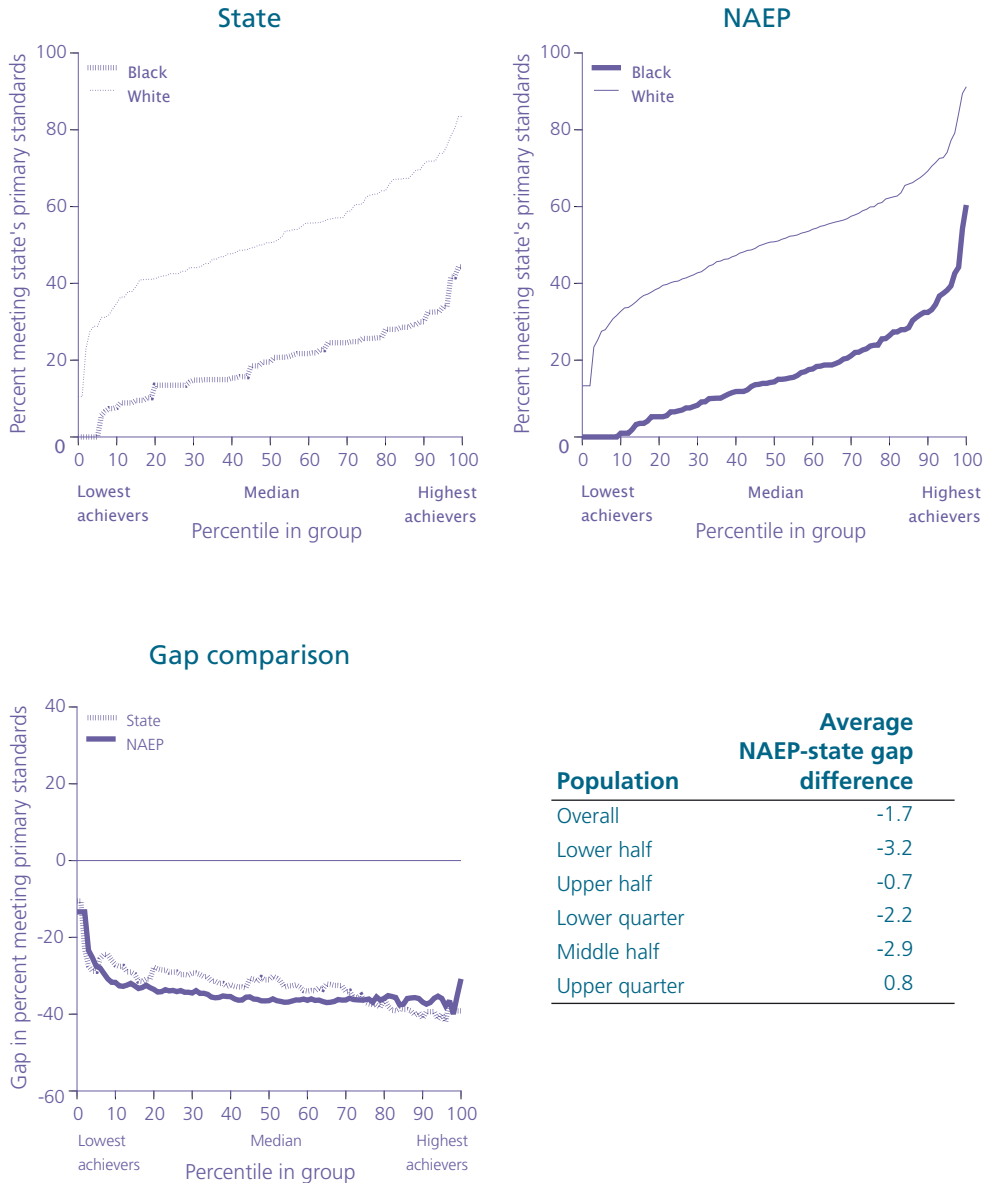


Figure 4. Comparison of NAEP and state assessment Black-White gap changes in percent meeting grade 4 reading standards: 2002 and 2003



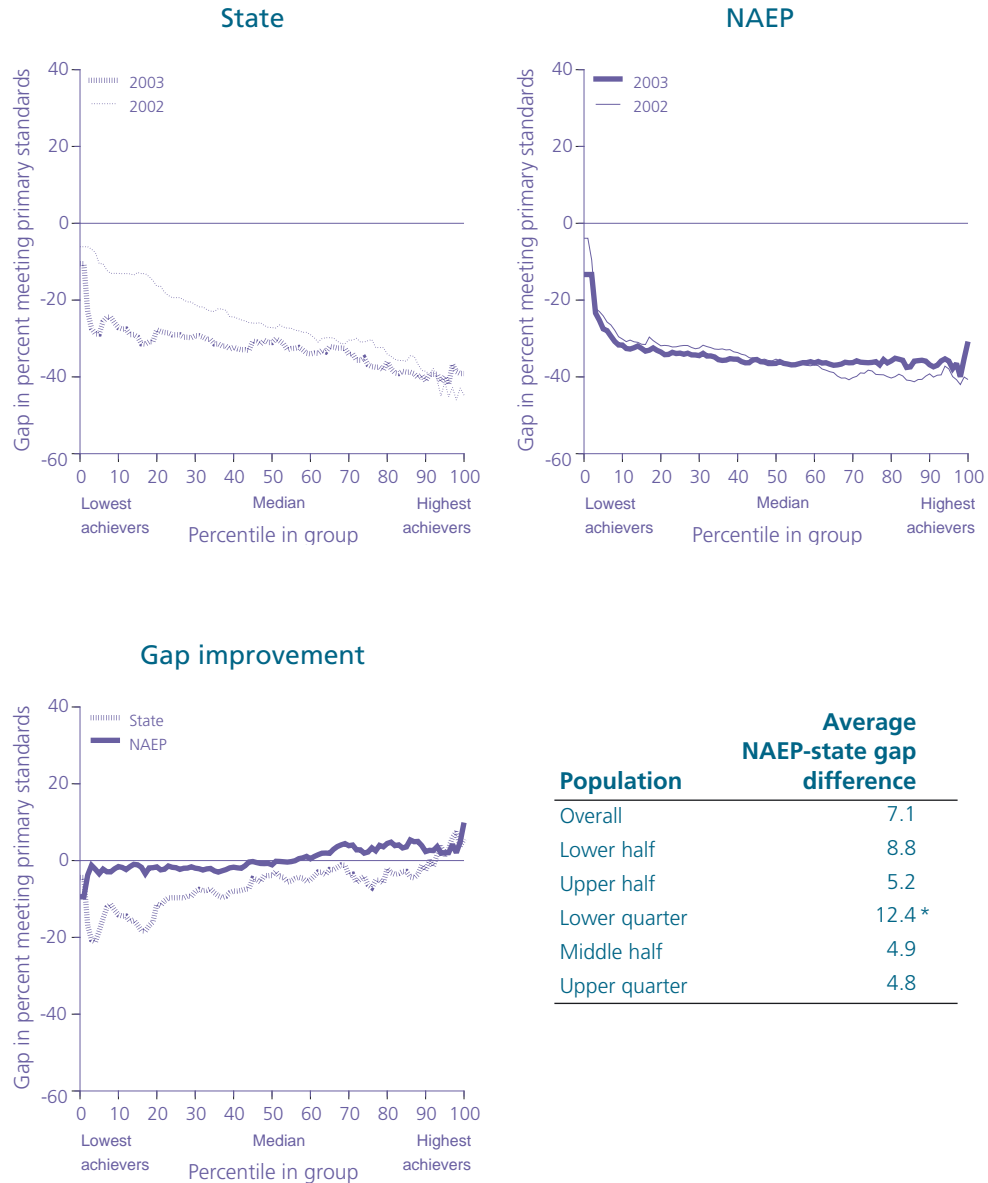
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 5. Comparison of NAEP and state assessment Black-White achievement gaps in percent meeting grade 8 reading standards: 2003



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

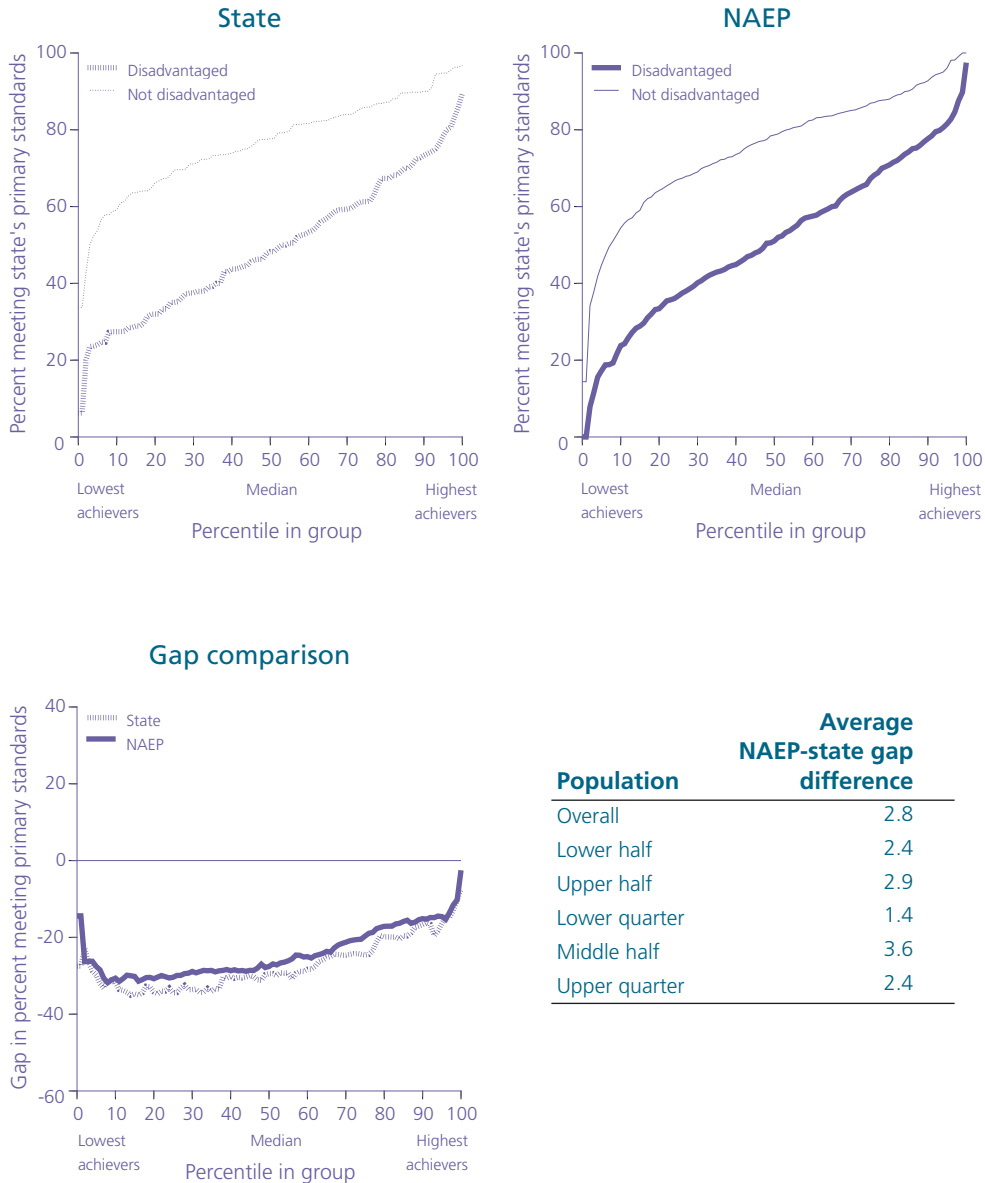
Figure 6. Comparison of NAEP and state assessment Black-White gap changes in percent meeting grade 8 reading standards: 2002 and 2003



* NAEP-State gap difference significantly different from zero ($p < .05$).

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

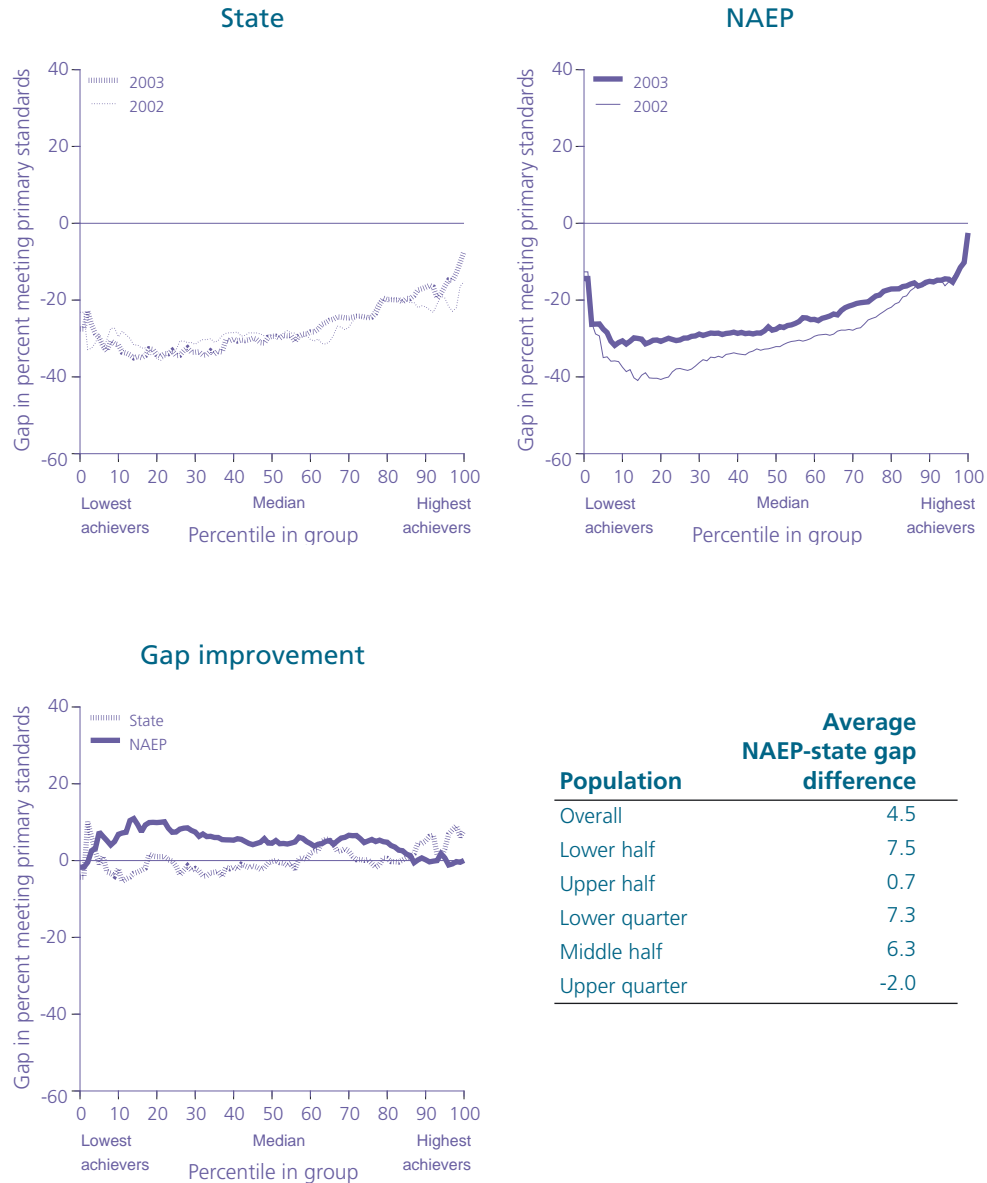
Figure 7. Comparison of NAEP and state assessment poverty achievement gaps in percent meeting grade 4 reading standards: 2003



NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

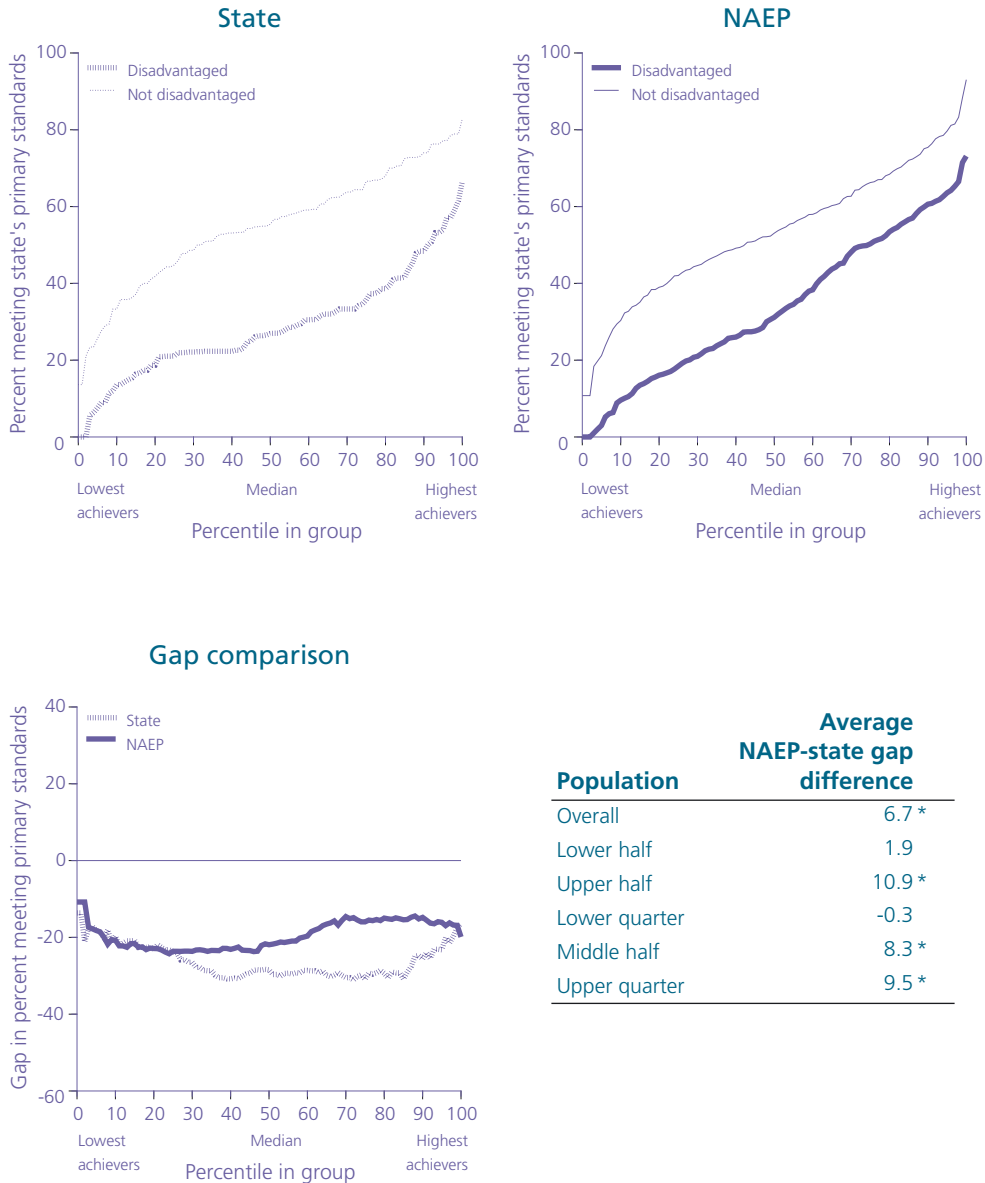
Figure 8. Comparison of NAEP and state assessment poverty gap changes in percent meeting grade 4 reading standards: 2002 and 2003



NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 9. Comparison of NAEP and state assessment poverty achievement gaps in percent meeting grade 8 reading standards: 2003



* NAEP–State gap difference significantly different from zero ($p < .05$).

NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.



Figure 10. Comparison of NAEP and state assessment poverty gap changes in percent meeting grade 8 reading standards: 2002 and 2003



NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

D

California

Through the Standardized Testing and Reporting (STAR) Program, the state administers two exams: the California Standards Tests (CST) and the California Achievement Tests, Sixth Edition Survey (CAT/6). The CST tests students in grades 2-11 in English language arts and grades 2-7 in mathematics; the CAT/6 tests students in grades 2-11 in both reading and mathematics. Scores are available for Hispanic, Black and economically disadvantaged students, but there are too few Black students to provide a reliable comparison. California uses five achievement levels for reporting purposes on the CST: *far below basic*, *below basic*, *basic*, *proficient*, and *advanced*. The CAT/6 results are reported as the percent at or above the 25th, 50th, and 75th percentiles. Before 2003, when the CAT/6 was implemented, the Stanford Achievement Test, Ninth Edition (SAT-9) was California's norm-referenced test. Trends are reported using SAT-9 results from 1998 and 2002 only, since the 2003 CAT/6 scores are not comparable. School-level assessment scores based on 10 or fewer students are suppressed.

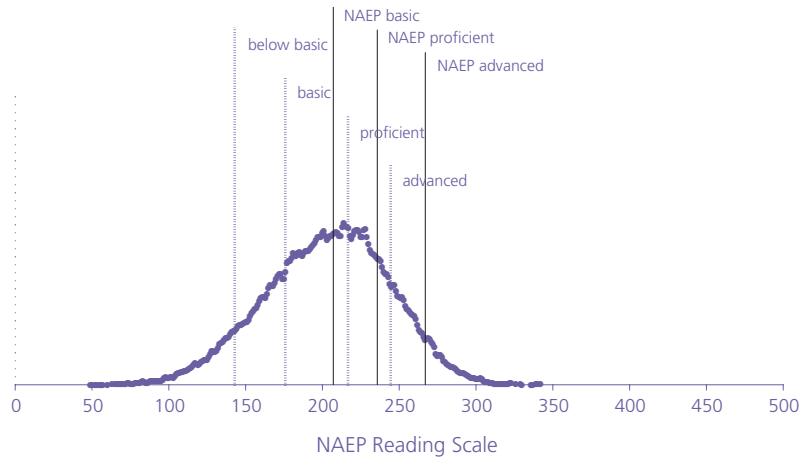
Summary of Comparisons

The results of comparisons between NAEP and state assessment results, which for 2003 are based on 216 schools in grade 4 and 180 schools in grade 7, are shown graphically on the following pages. A brief summary of the results follows:

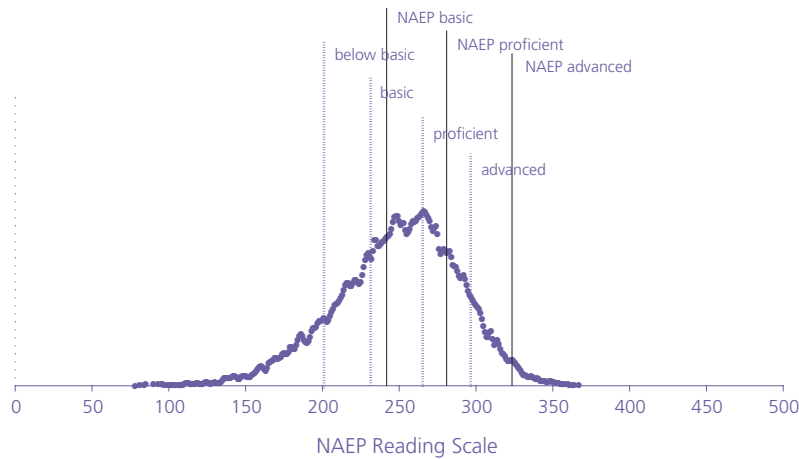
- **Standards.** The state's primary grade 4 reading performance standard (*proficient*) is between the NAEP basic and proficient levels. This is also true for grade 7.
- **Trends.** There were no significant differences between grade 4 NAEP and state assessment gains in percent at or above the 50th percentile between 1998 and 2002. Between 1998 and 2002, the state assessment gains in grade 7 in percent at or above the 50th percentile are greater than NAEP's.
- **Gaps.** There were insufficient data for comparing the NAEP and state assessment measurement of the Black-White gap in reading in grades 4 and 7 in 2003. Overall, there were no significant differences between NAEP and the state assessment in measurement of the Hispanic-White gap in reading in grades 4 and 7 in 2003. Overall, there were no significant differences between NAEP and the state assessment in measurement of the poverty gap in reading in grade 4 in 2003. The change in the poverty gap in grade 4 between 2002 and 2003 was more positive (greater reduction) when measured by NAEP, when compared to the state assessment. Overall, the gap in grade 7 in percent meeting the state's standard in reading in 2003 was smaller when measured by NAEP compared to the state assessment.

Figure 1. Distribution of grades 4 and 8 NAEP reading achievement scores: 2003

Grade 4



Grade 8 (state 7th grade standards)



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Table 1. School-level correlations between NAEP and state assessment of percentages of students achieving state’s reading standards: 2003

Standard	Grade 4		Grade 7	
	Correlation	Standard error	Correlation	Standard error
Below Basic	0.60	0.027	0.58	0.020
Basic	0.82	0.012	0.75	0.021
Proficient	0.87	0.012	0.79	0.018
Advanced	0.86	0.021	0.68	0.035

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.



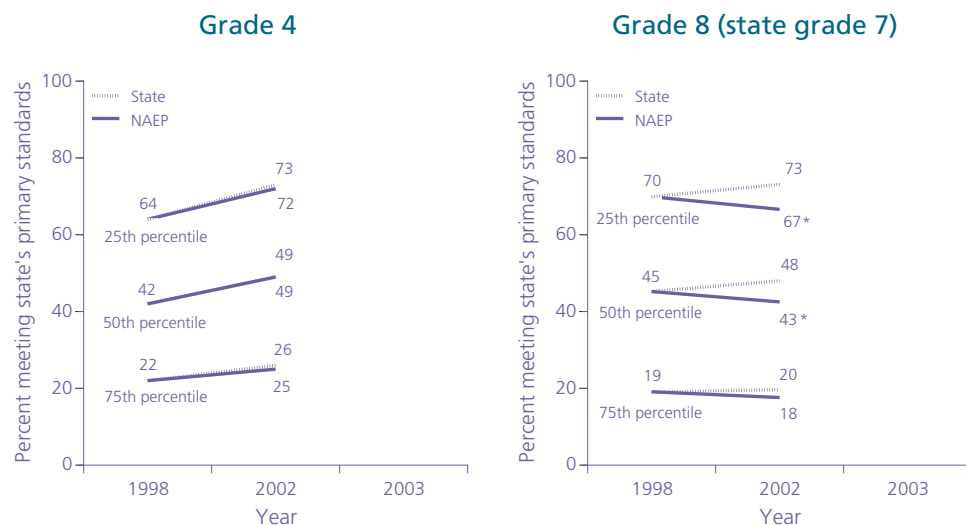
Table 2. Percentages of English language learners and students with disabilities identified, excluded, and accommodated in the NAEP reading assessments, by grade: 1998, 2002, and 2003

Students	Grade 4			Grade 8		
	1998	2002	2003	1998	2002	2003
Identified	30.5	33.9	37.6	23.3	26.4	28.3
English language learner	24.7	26.6	27.4	15.0	16.4	16.9
Student with disability	4.7	4.5	5.3	5.7	6.2	7.5
Both	1.1	2.8	4.9	2.6	3.8	3.9
Excluded	14.4	5.1	5.4	4.4	3.7	3.7
English language learner	10.9	2.2	2.8	2.3	1.2	1.2
Student with disability	2.6	1.7	1.3	1.3	1.7	1.6
Both	0.8	1.2	1.2	0.9	0.8	0.9
Accommodated	1.4	1.1	2.3	1.3	2.0	2.5
English language learner	0.9	#	0.5	0.5	0.2	0.1
Student with disability	0.5	0.6	1.1	0.7	1.3	1.5
Both	#	0.4	0.7	0.2	0.5	0.9

Estimate rounds to zero.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessments.

Figure 2. Comparison of NAEP and state assessment achievement changes in percent meeting reading standards, by grade: 1998, 2002, and 2003



* NAEP and state assessment 1998-2002 changes are significantly different ($p < .05$).

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

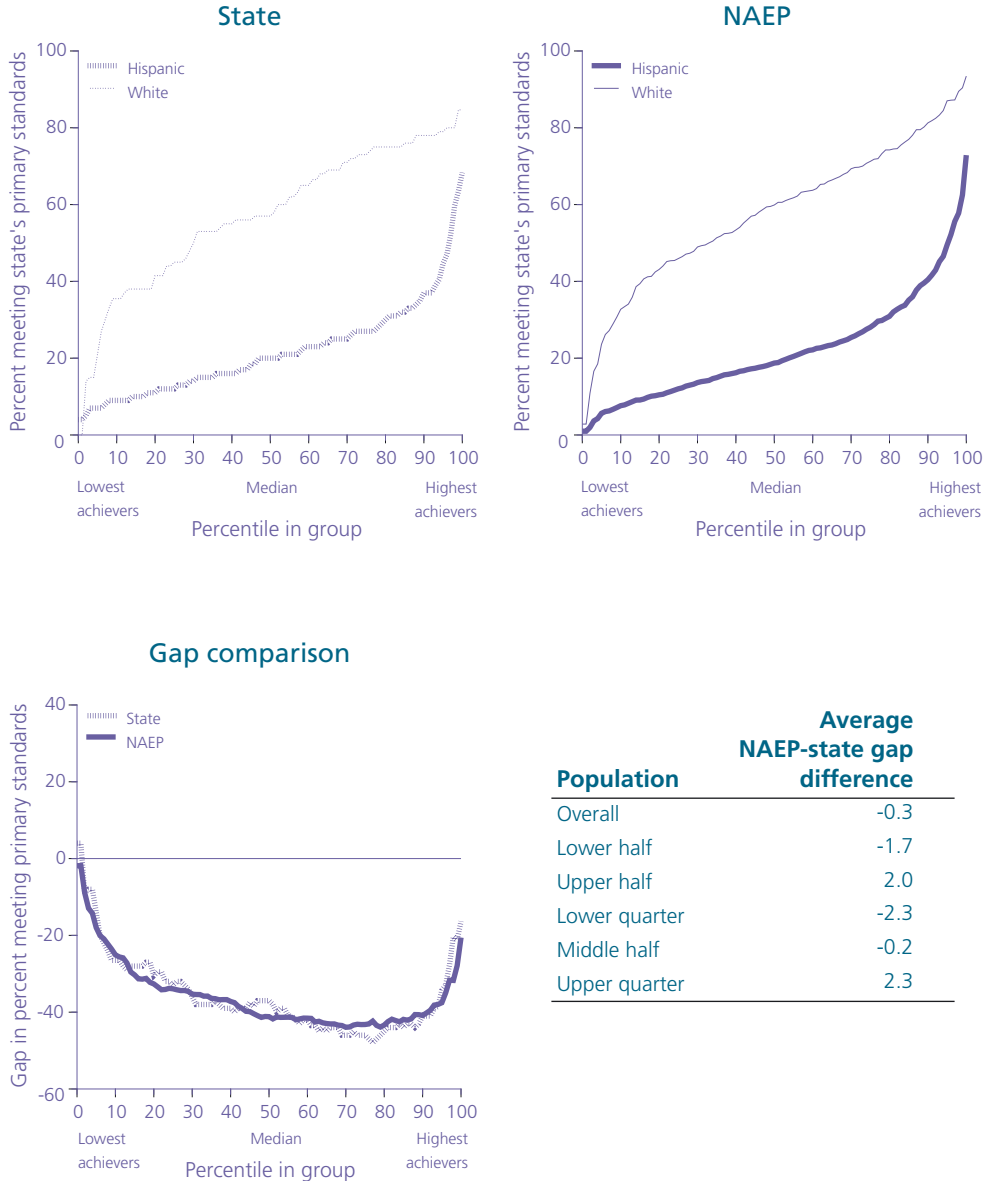
Table 3. Percentage meeting grades 4 and 7 reading standards as reported by state: 1998, 2002, and 2003

Level	1998	2002	2003
Grade 4	40.0	49.0	—
Grade 7	46.0	49.0	—

— Not available.

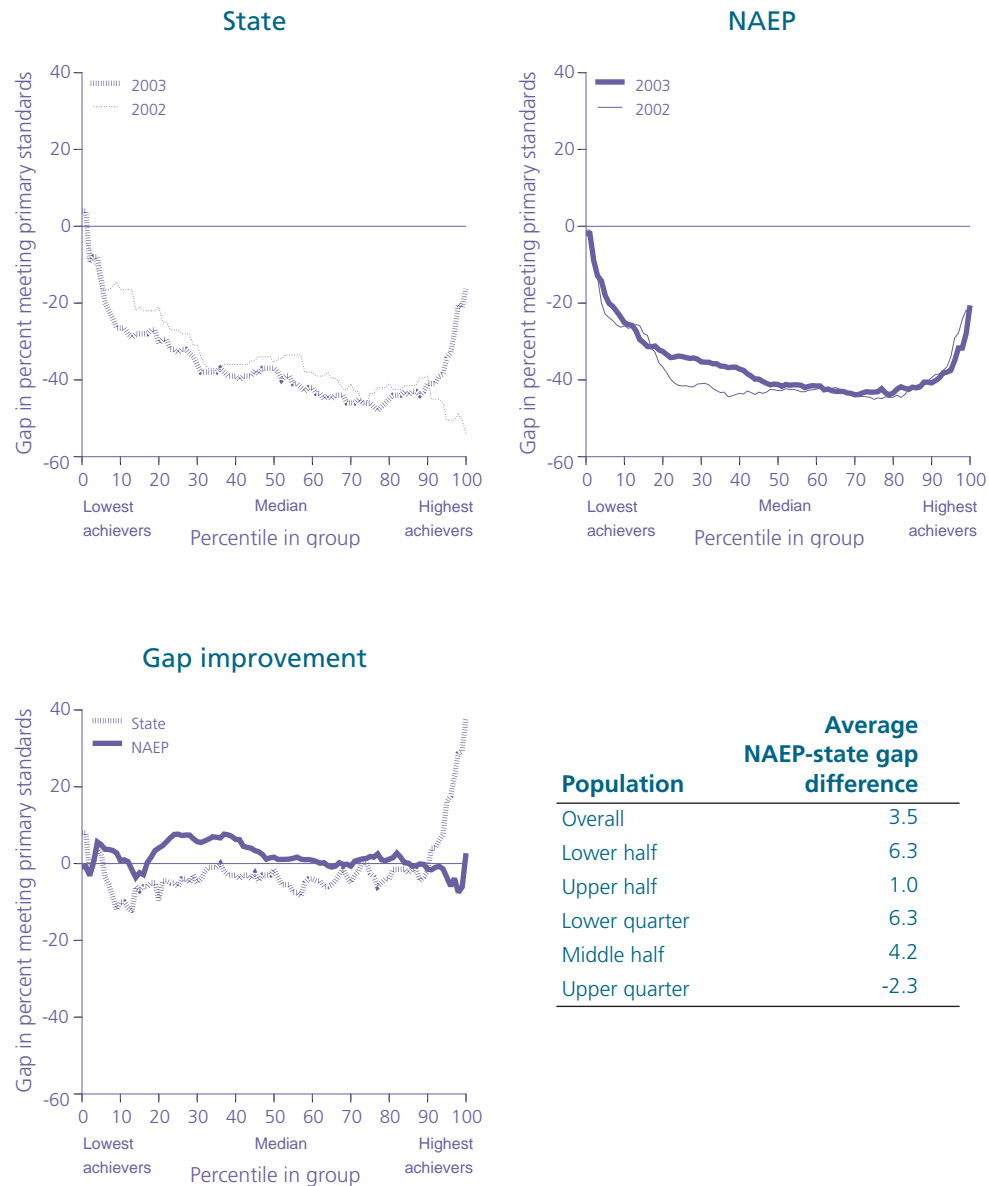
SOURCE: Standardized Testing and Reporting (STAR) Results retrieved from <http://star.cde.ca.gov>.

Figure 3. Comparison of NAEP and state assessment Hispanic-White gaps in percent meeting grade 4 reading standards: 2003



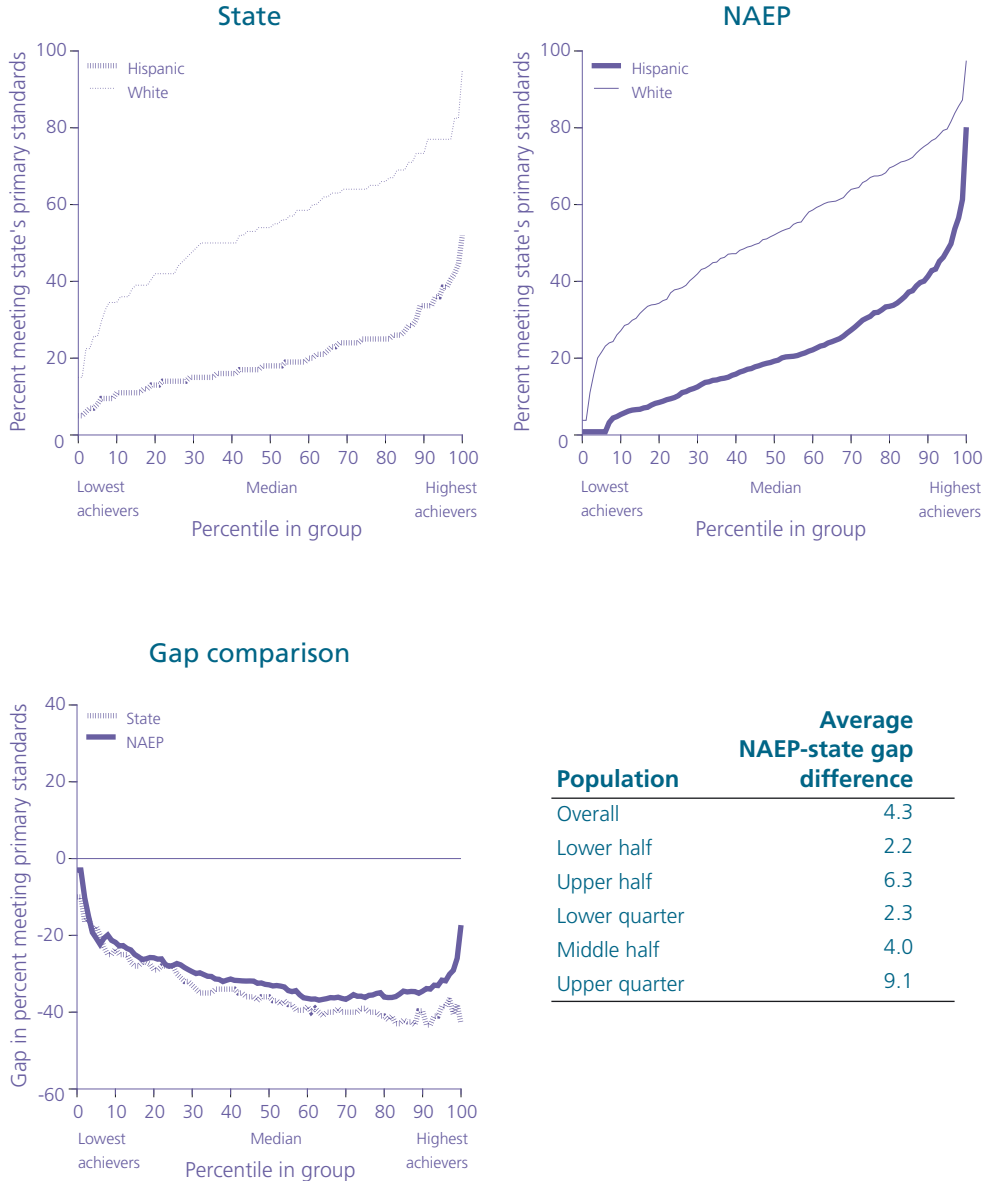
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 4. Comparison of NAEP and state assessment Hispanic-White gap changes in percent meeting grade 4 reading standards: 2002 and 2003



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 5. Comparison of NAEP and state assessment Hispanic-White gaps in percent meeting grade 8 reading standards: 2003

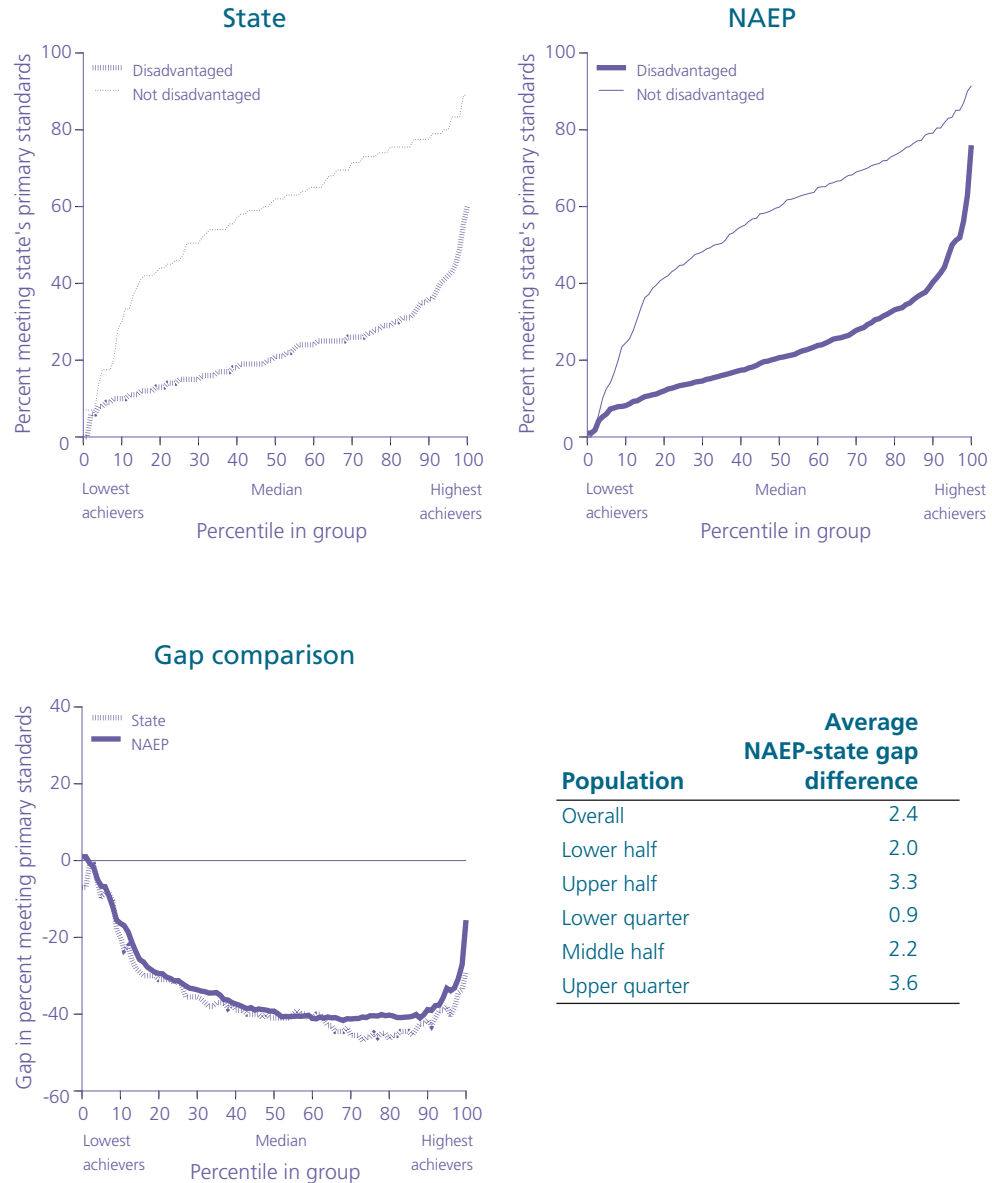


NOTE: State assessment data used are for grade 7.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.



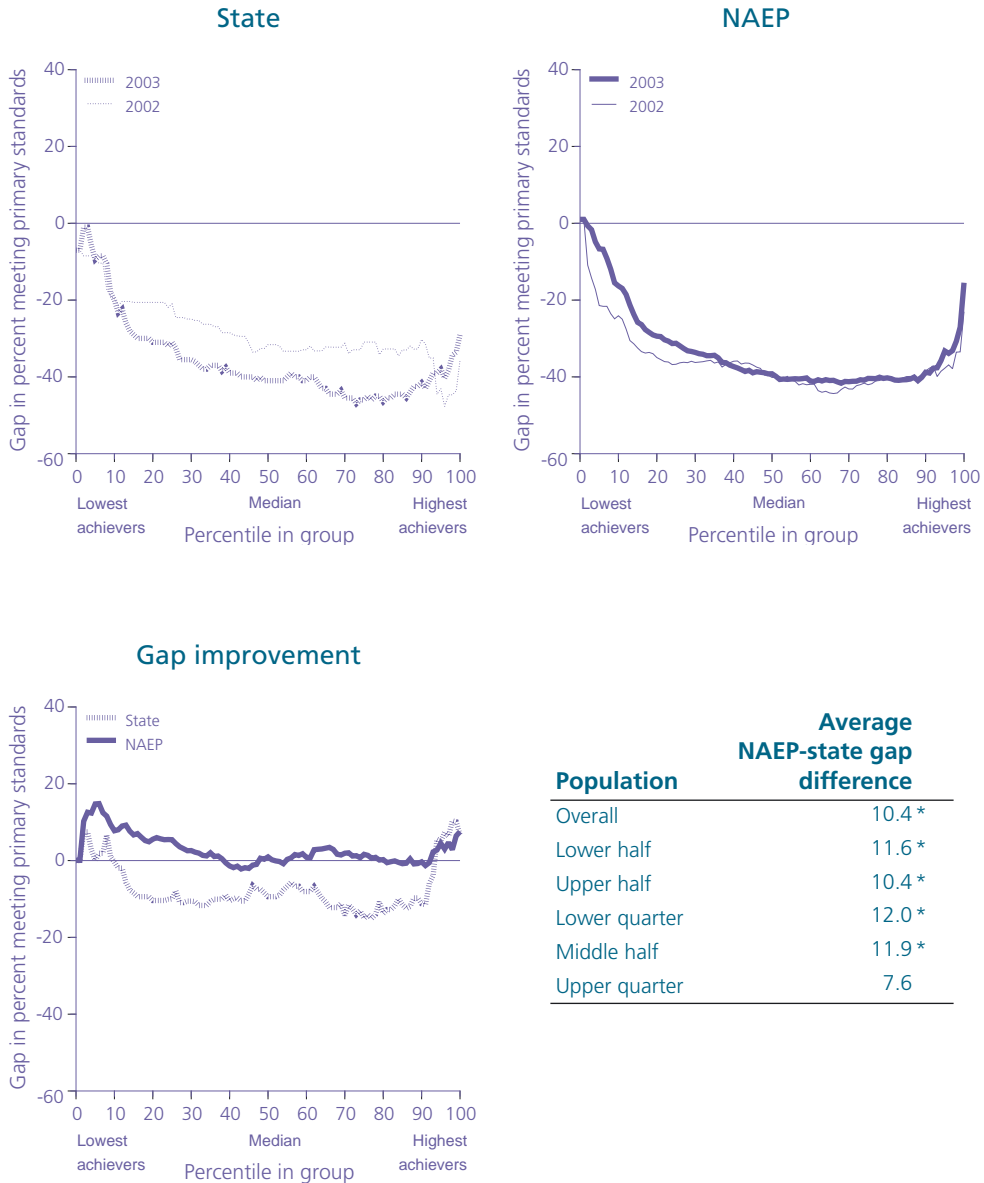
Figure 6. Comparison of NAEP and state assessment poverty achievement gaps in percent meeting grade 4 reading standards: 2003



NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 7. Comparison of NAEP and state assessment poverty gap changes in percent meeting grade 4 reading standards: 2002 and 2003



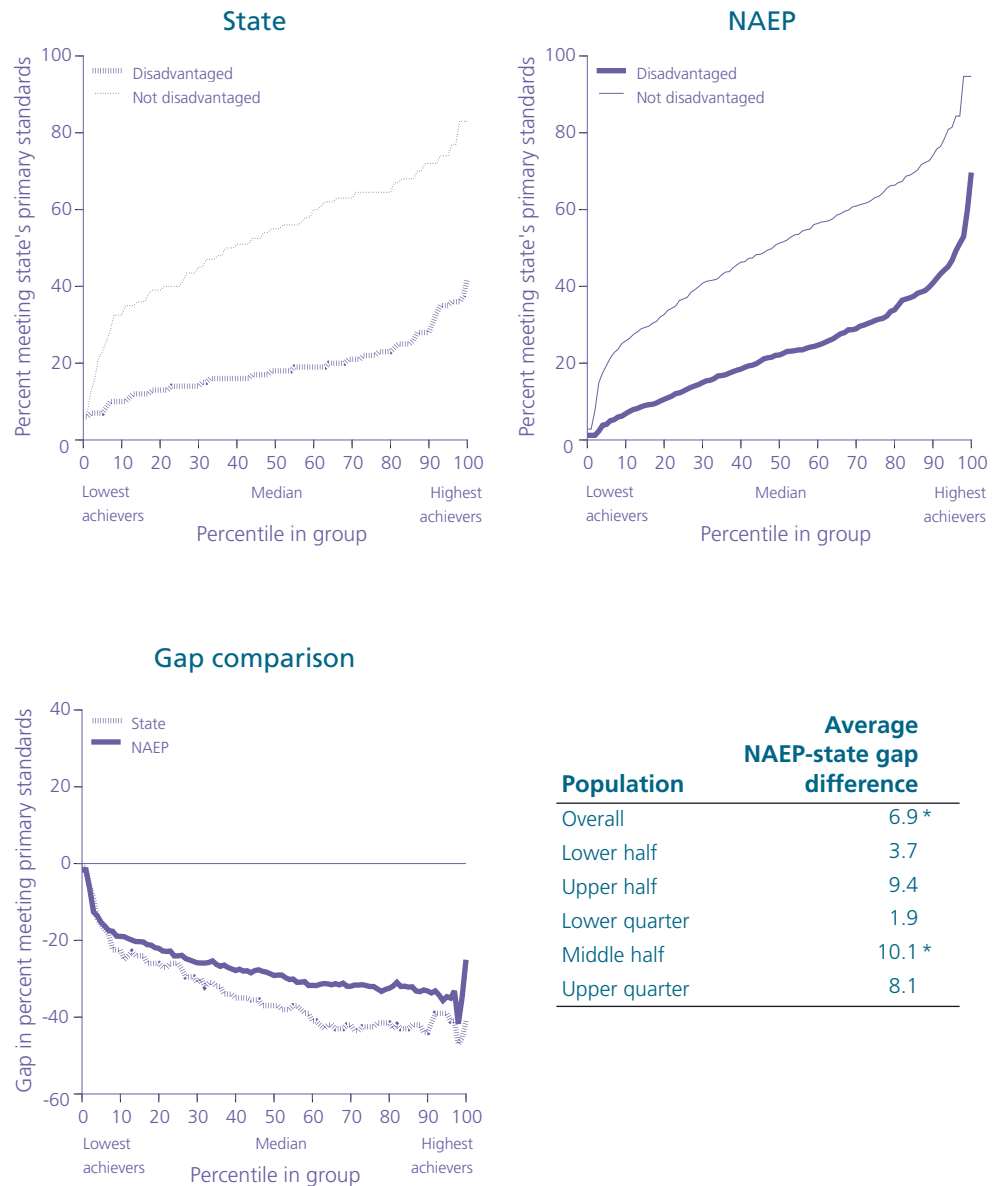
* NAEP–State gap difference significantly different from zero ($p < .05$).

NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.



Figure 8. Comparison of NAEP and state assessment poverty achievement gaps in percent meeting grade 8 reading standards: 2003



* NAEP–State gap difference significantly different from zero ($p < .05$).

NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch. State assessment data used are for grade 7.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

D

Colorado

Through the Colorado Student Assessment Program (CSAP), the state administers exams in grades 4 and 8 in reading and grades 5 and 8 in mathematics. The scores available for this report do not include any breakdowns by race/ethnicity or poverty status. Colorado uses four achievement levels for reporting purposes: *unsatisfactory*, *partially proficient*, *proficient*, and *advanced*. Colorado did not participate in State NAEP prior to 2003; therefore, trend graphs are not included. School-level assessment scores based on 15 or fewer students are suppressed.

Summary of Comparisons

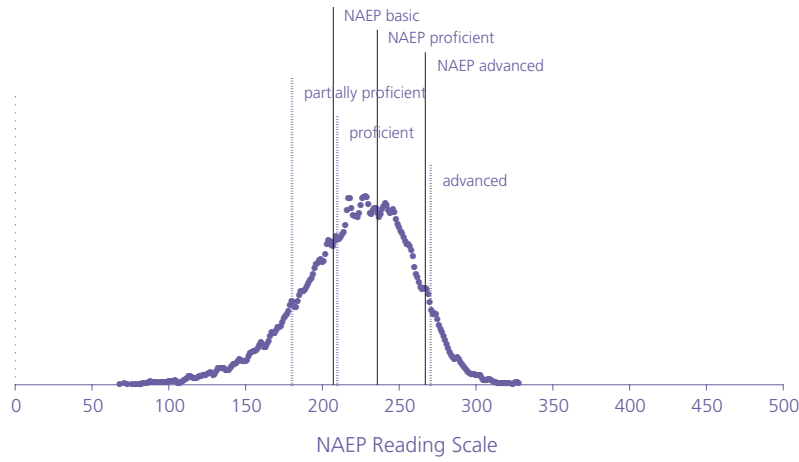
The results of comparisons between NAEP and state assessment results, which for 2003 are based on 115 schools in grade 4 and 104 schools in grade 8, are shown graphically on the following pages. A brief summary of the results follows:¹

- **Standards.** The state's primary grade 4 reading performance standard (*partially proficient*) is below the NAEP basic level. This is also true for grade 8.
- **Trends.** No comparisons were possible for grades 4 and 8.
- **Gaps.** There were insufficient data for comparing the NAEP and state assessment measurement of the Black-White, Hispanic-White, and poverty gaps in reading in grades 4 and 8 in 2003.

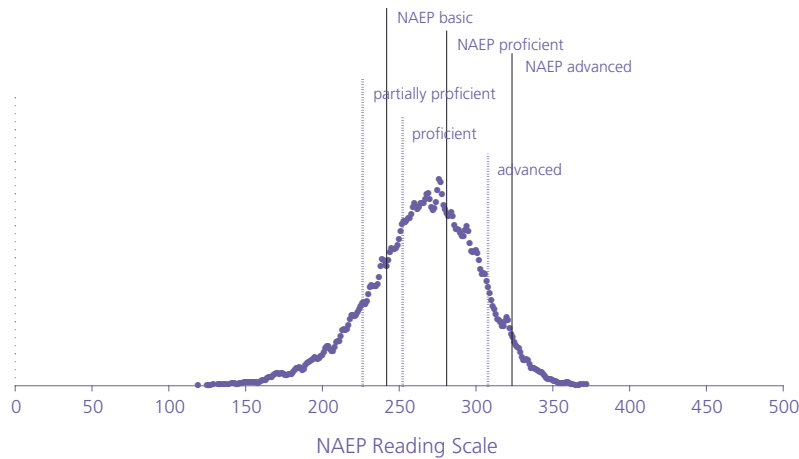
1. All statements of differences are based on statistical tests at the 5% significance level. However, these results must be considered in the context of the available data. NAEP and state assessments may employ different test items, testing accommodations, and scoring methods; and they may involve different students in each school, at different times of the year, with different motivational characteristics. At the present time, in spite of controlling for effects of school sampling, differences in standards, and NAEP exclusion rates, we cannot identify specific reasons for differences between NAEP and state assessment results.

Figure 1. Distribution of grades 4 and 8 NAEP reading achievement scores: 2003

Grade 4



Grade 8



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Table 1. School-level correlations between NAEP and state assessment of percentages of students achieving state’s reading standards: 2003

Standard	Grade 4		Grade 8	
	Correlation	Standard error	Correlation	Standard error
Partially Proficient	0.85	0.033	0.78	0.016
Proficient	0.85	0.020	0.82	0.024
Advanced	0.65	0.041	0.78	0.045

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.



Table 2. Percentages of English language learners and students with disabilities identified, excluded, and accommodated in the NAEP reading assessments, by grade: 1998, 2002, and 2003

Students	Grade 4			Grade 8		
	1998	2002	2003	1998	2002	2003
Identified	14.8	—	18.4	13.8	—	14.6
English language learner	4.5	—	7.3	4.2	—	4.3
Student with disability	10.0	—	9.1	9.2	—	9.3
Both	0.4	—	2.0	0.4	—	1.0
Excluded	5.6	—	3.4	3.7	—	3.3
English language learner	2.9	—	1.3	1.1	—	1.4
Student with disability	2.4	—	1.6	2.5	—	1.5
Both	0.3	—	0.6	0.2	—	0.4
Accommodated	2.1	—	8.2	2.4	—	5.7
English language learner	0.1	—	2.2	0.5	—	0.6
Student with disability	2.0	—	5.2	1.9	—	4.7
Both	#	—	0.8	0.0	—	0.4

— Not available.

Estimate rounds to zero.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessments.

D

Connecticut

The state administers the Connecticut Mastery Test (CMT) in grades 4 and 8 in reading and mathematics. Scores are available for Hispanic, Black, and economically disadvantaged students; however, note that the percentage of Black and Hispanic students represented is below two-thirds of the population in Grade 4 (56% and 60% respectively). The CMT was administered from 1998-2002 using four achievement levels for reporting purposes: *below basic*, *basic*, *proficient*, and *goal*. Results for 2003 have been reported with one additional level: *advanced*. The data included for 1998 have only percent at or above goal, so the trend graph displays the other levels for 2002 and 2003 only. The trend graph does not include the *advanced* level added in 2003. School-level assessment scores based on 19 or fewer students are suppressed.

Summary of Comparisons

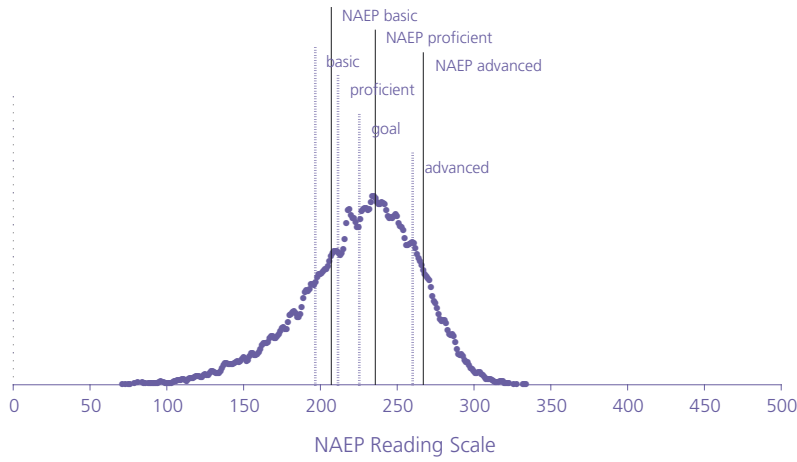
The results of comparisons between NAEP and state assessment results, which for 2003 are based on 108 schools in grade 4 and 102 schools in grade 8, are shown graphically on the following pages. A brief summary of the results follows:¹

- **Standards.** The state's primary grade 4 reading performance standard (*goal*) is between the NAEP basic and proficient levels. This is also true for grade 8.
- **Trends.** There were no significant differences between grade 4 NAEP and state assessment gains in percent at or above the goal between 1998 and 2003. Between 1998 and 2003, NAEP reported declines in grade 8 in percent at or above the goal, which the state did not.
- **Gaps.** Overall, there were no significant differences between NAEP and the state assessment in measurement of the Black-White, Hispanic-White, and poverty gaps in reading in grades 4 and 8 in 2003.

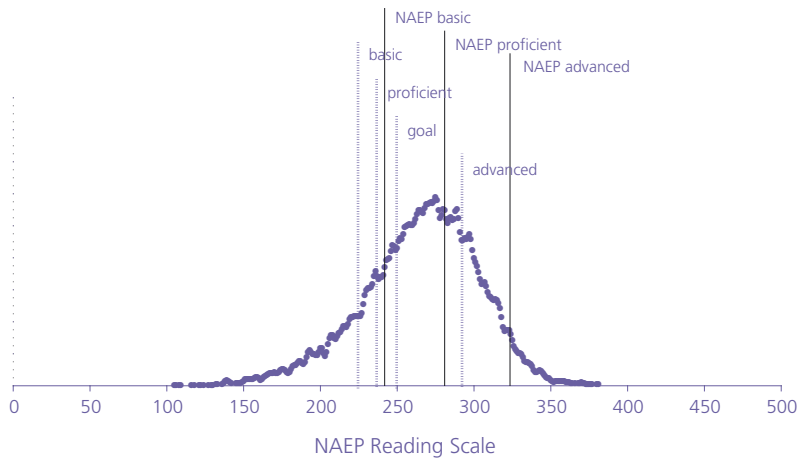
1. All statements of differences are based on statistical tests at the 5% significance level. However, these results must be considered in the context of the available data. NAEP and state assessments may employ different test items, testing accommodations, and scoring methods; and they may involve different students in each school, at different times of the year, with different motivational characteristics. At the present time, in spite of controlling for effects of school sampling, differences in standards, and NAEP exclusion rates, we cannot identify specific reasons for differences between NAEP and state assessment results.

Figure 1. Distribution of grades 4 and 8 NAEP reading achievement scores: 2003

Grade 4



Grade 8



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Table 1. School-level correlations between NAEP and state assessment of percentages of students achieving state’s reading standards: 2003

Standard	Grade 4		Grade 8	
	Correlation	Standard error	Correlation	Standard error
Basic	0.91	0.011	0.81	0.022
Proficient	0.92	0.005	0.82	0.013
Goal	0.92	0.005	0.84	0.016
Advanced	0.82	0.020	0.78	0.031

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

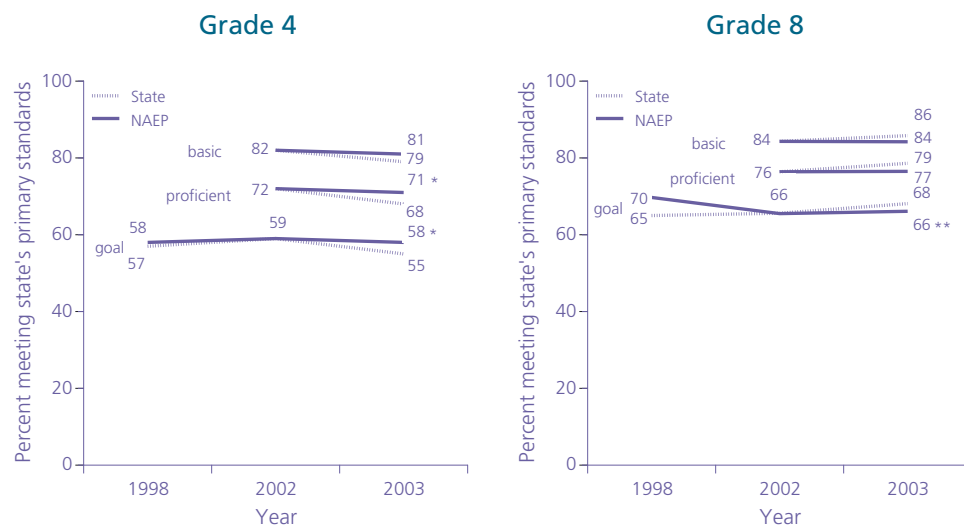


Table 2. Percentages of English language learners and students with disabilities identified, excluded, and accommodated in the NAEP reading assessments, by grade: 1998, 2002, and 2003

Students	Grade 4			Grade 8		
	1998	2002	2003	1998	2002	2003
Identified	18.2	16.2	14.7	15.0	16.5	15.7
English language learner	4.3	3.1	2.4	1.9	2.0	1.8
Student with disability	13.2	12.4	11.5	12.7	13.4	13.1
Both	0.7	0.8	0.8	0.4	1.1	0.8
Excluded	10.1	4.9	4.5	5.7	4.3	3.6
English language learner	3.1	1.2	1.0	1.1	0.9	0.5
Student with disability	6.4	3.3	3.1	4.4	2.6	2.6
Both	0.7	0.5	0.5	0.2	0.8	0.6
Accommodated	3.2	6.2	6.3	2.3	6.0	6.7
English language learner	0.1	0.4	0.6	0.3	0.2	0.6
Student with disability	3.2	5.7	5.6	2.1	5.5	6.0
Both	0.0	0.1	0.1	0.0	0.3	0.1

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessments.

Figure 2. Comparison of NAEP and state assessment achievement changes in percent meeting reading standards, by grade: 1998, 2002, and 2003



* NAEP and state assessment 2002-2003 changes are significantly different ($p < .05$).

** NAEP and state assessment 1998-2003 changes are significantly different ($p < .05$).

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 1998, 2002, and 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

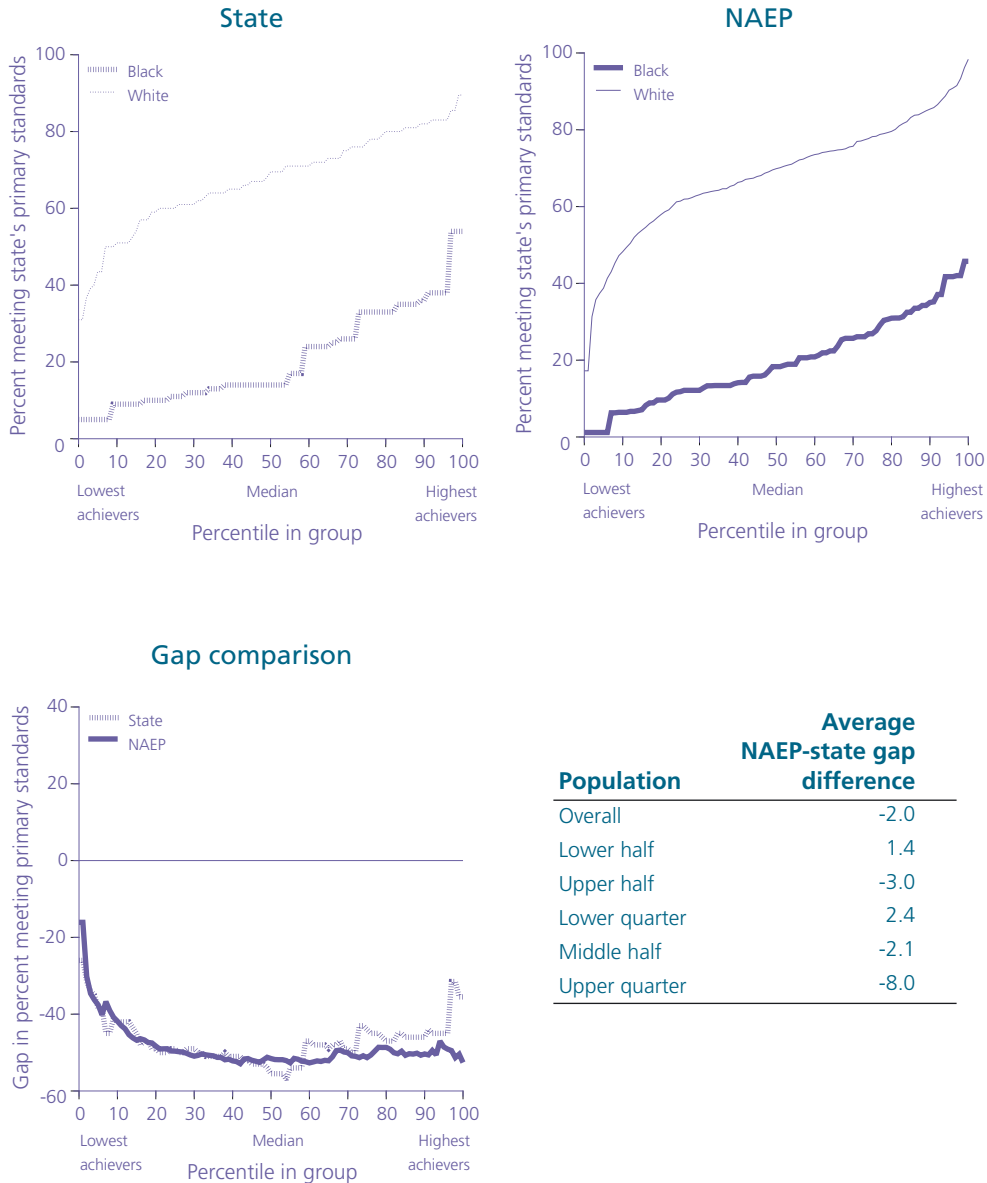
Table 3. Percentage meeting grades 4 and 8 reading standards as reported by state: 1998, 2002, and 2003

Level	1998	2002	2003
Grade 4	—	57.9	55.9
Grade 8	—	66.3	68.1

— Not available.

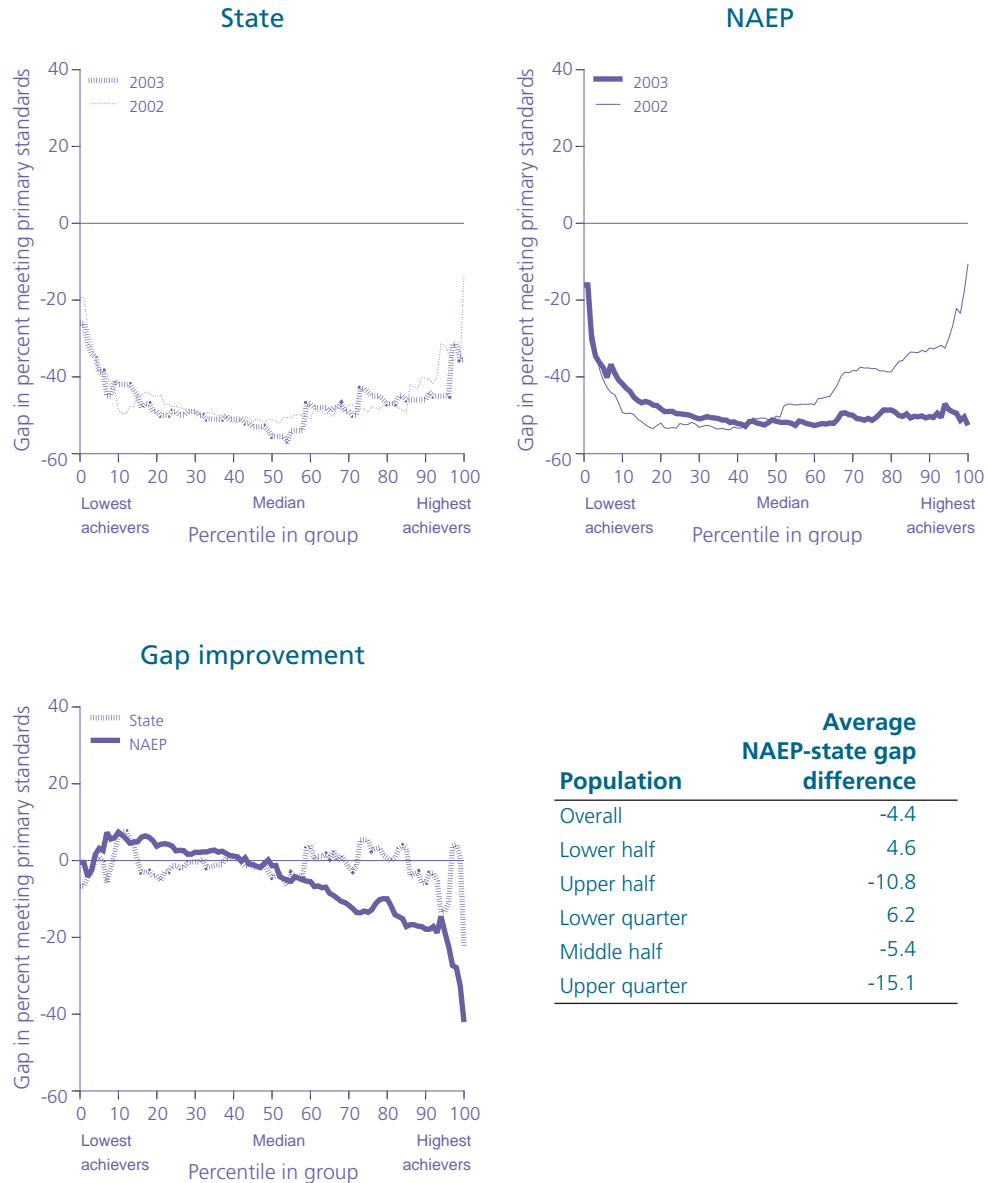
SOURCE: Connecticut State Dept. of Education retrieved from <http://www.sde.ct.gov/sde/site/default.asp>.

Figure 3. Comparison of NAEP and state assessment Black-White achievement gaps in percent meeting grade 4 reading standards: 2003



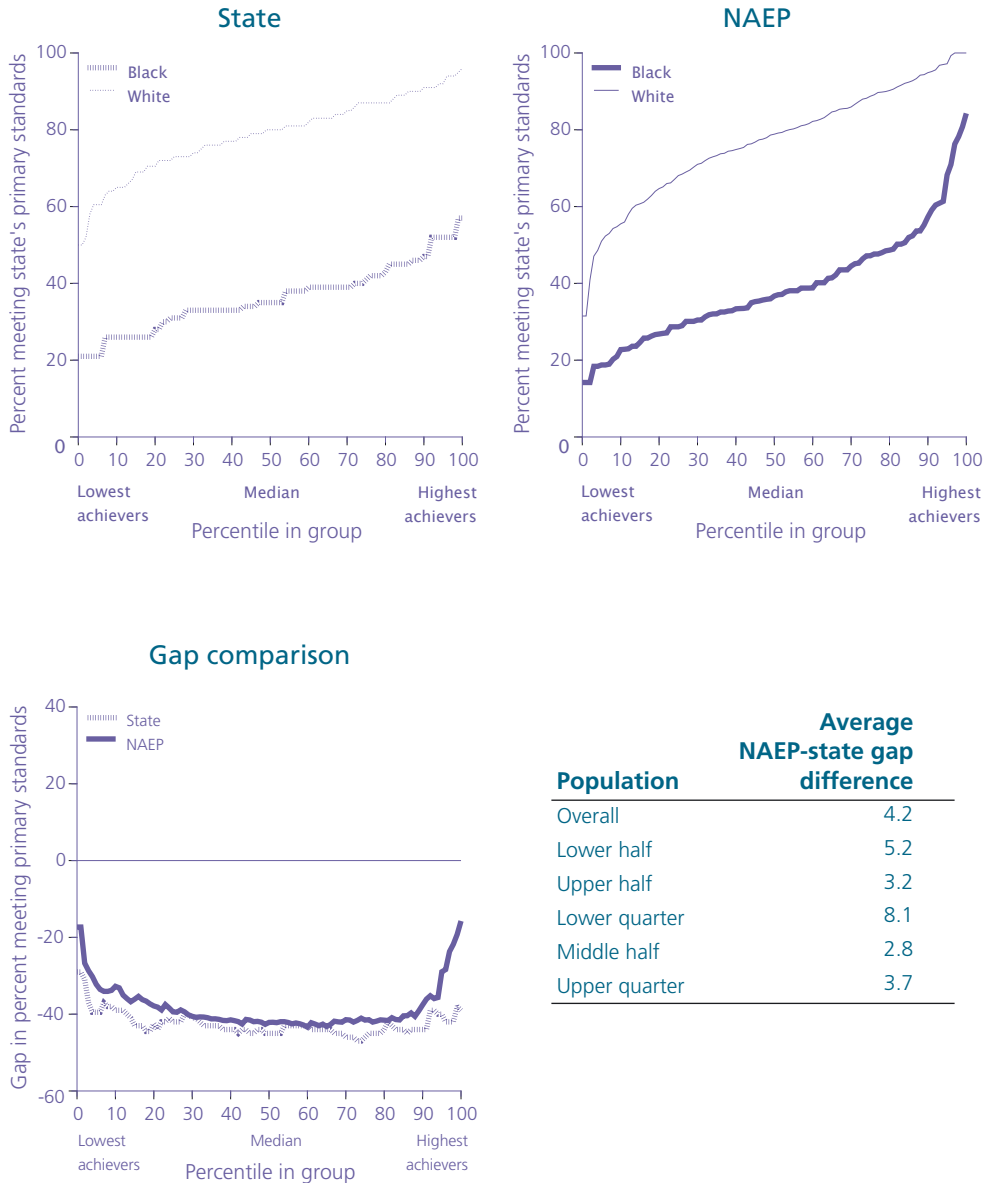
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 4. Comparison of NAEP and state assessment Black-White gap changes in percent meeting grade 4 reading standards: 2002 and 2003



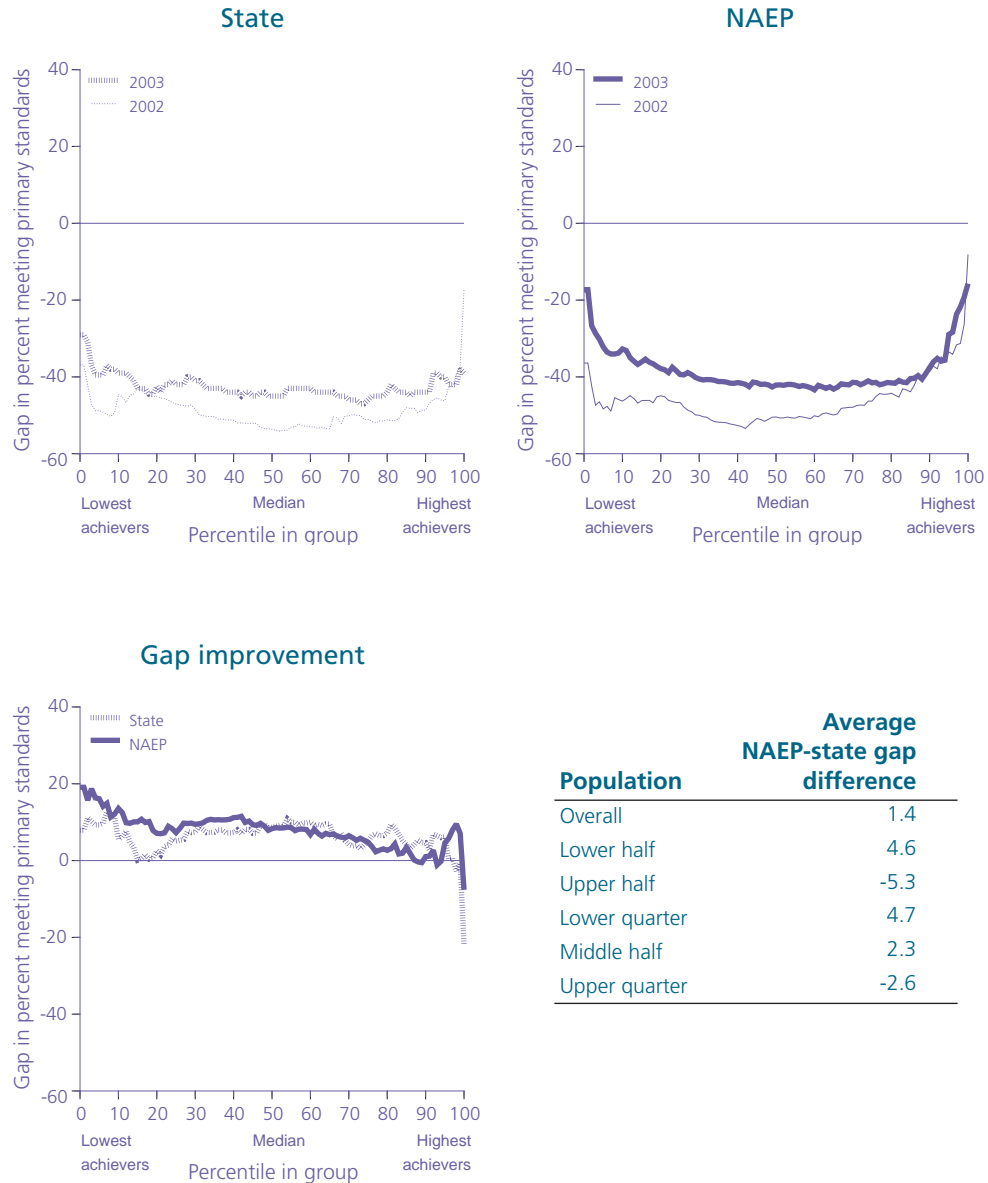
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 5. Comparison of NAEP and state assessment Black-White achievement gaps in percent meeting grade 8 reading standards: 2003



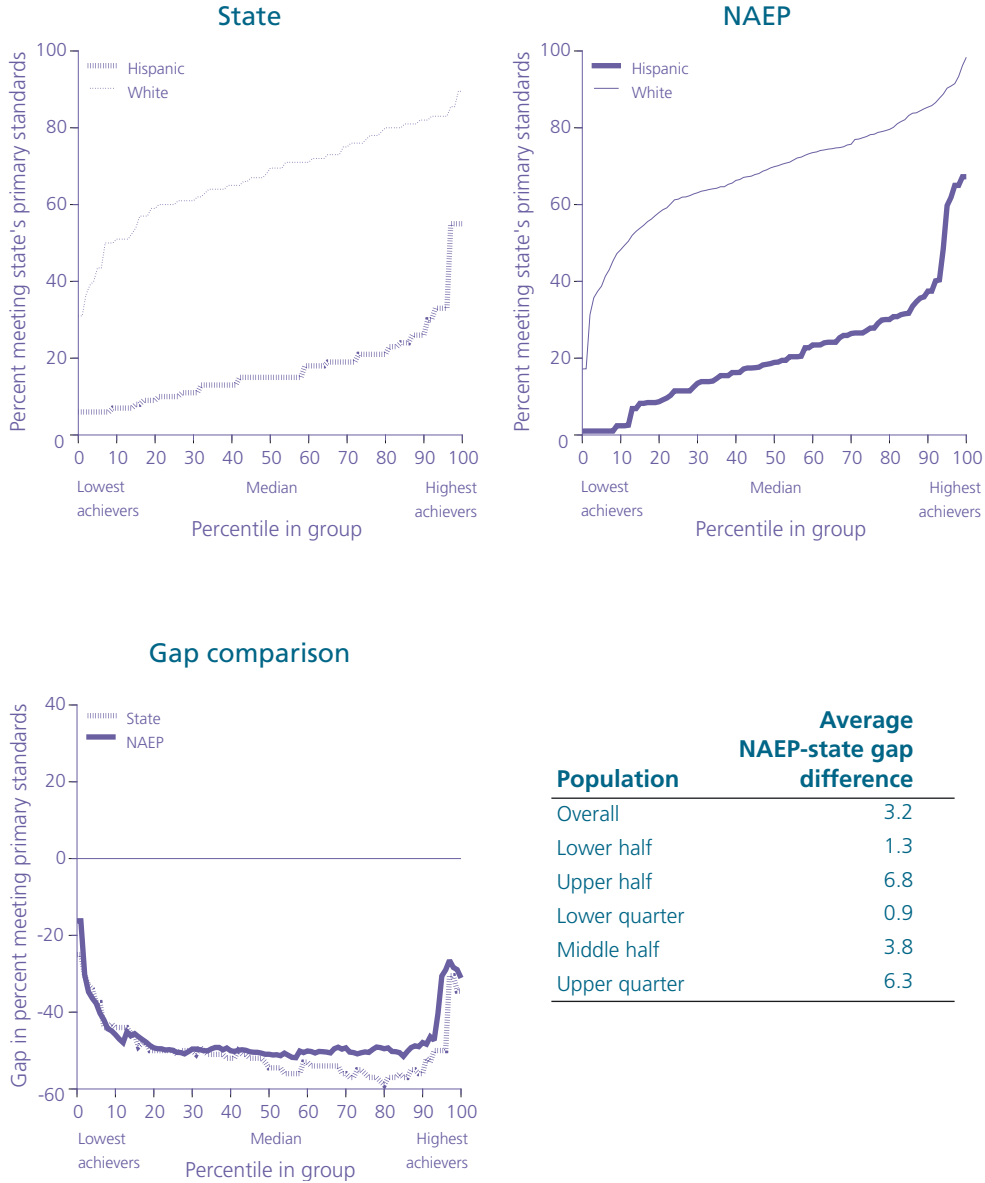
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 6. Comparison of NAEP and state assessment Black-White gap changes in percent meeting grade 8 reading standards: 2002 and 2003



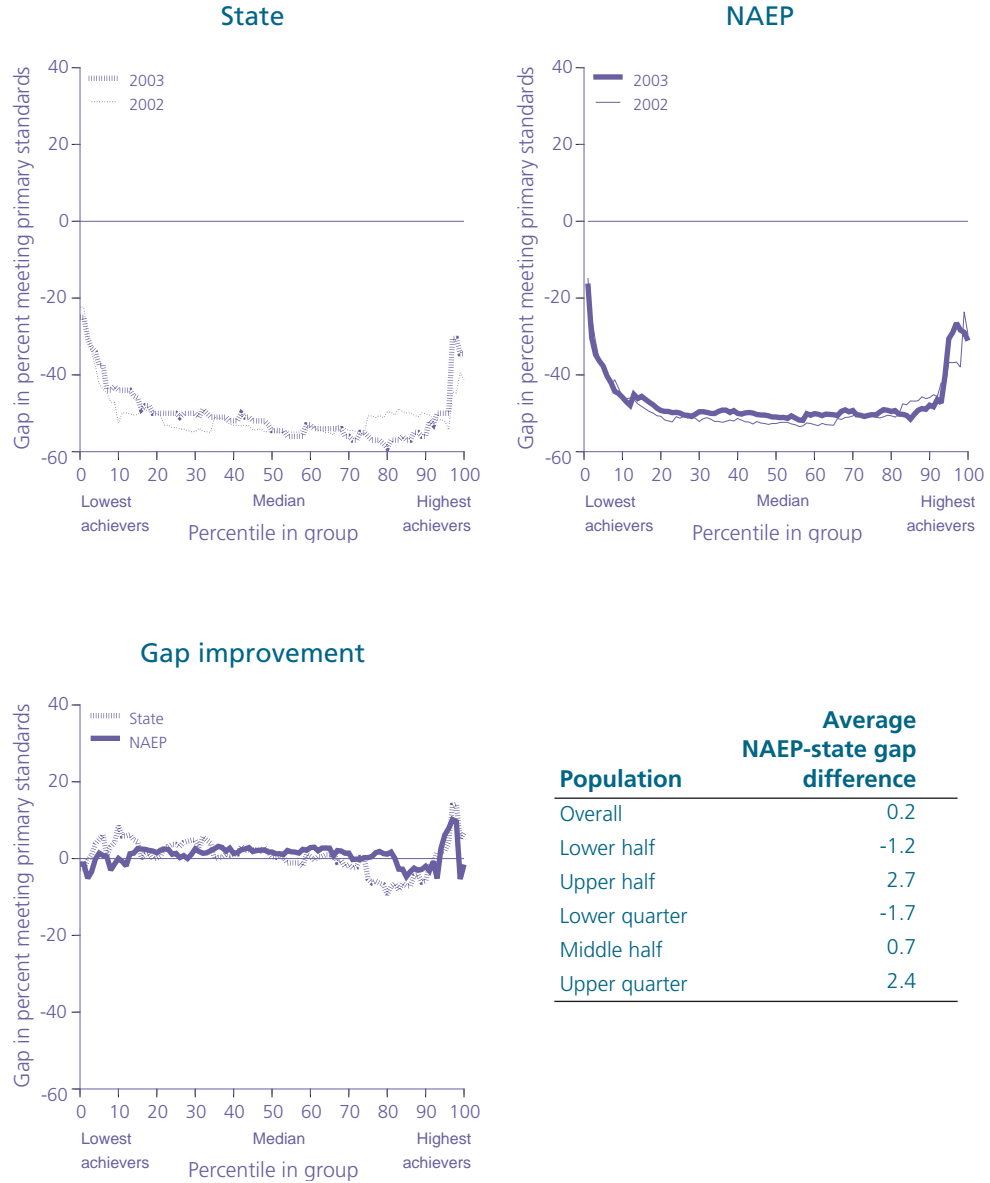
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 7. Comparison of NAEP and state assessment Hispanic-White gaps in percent meeting grade 4 reading standards: 2003



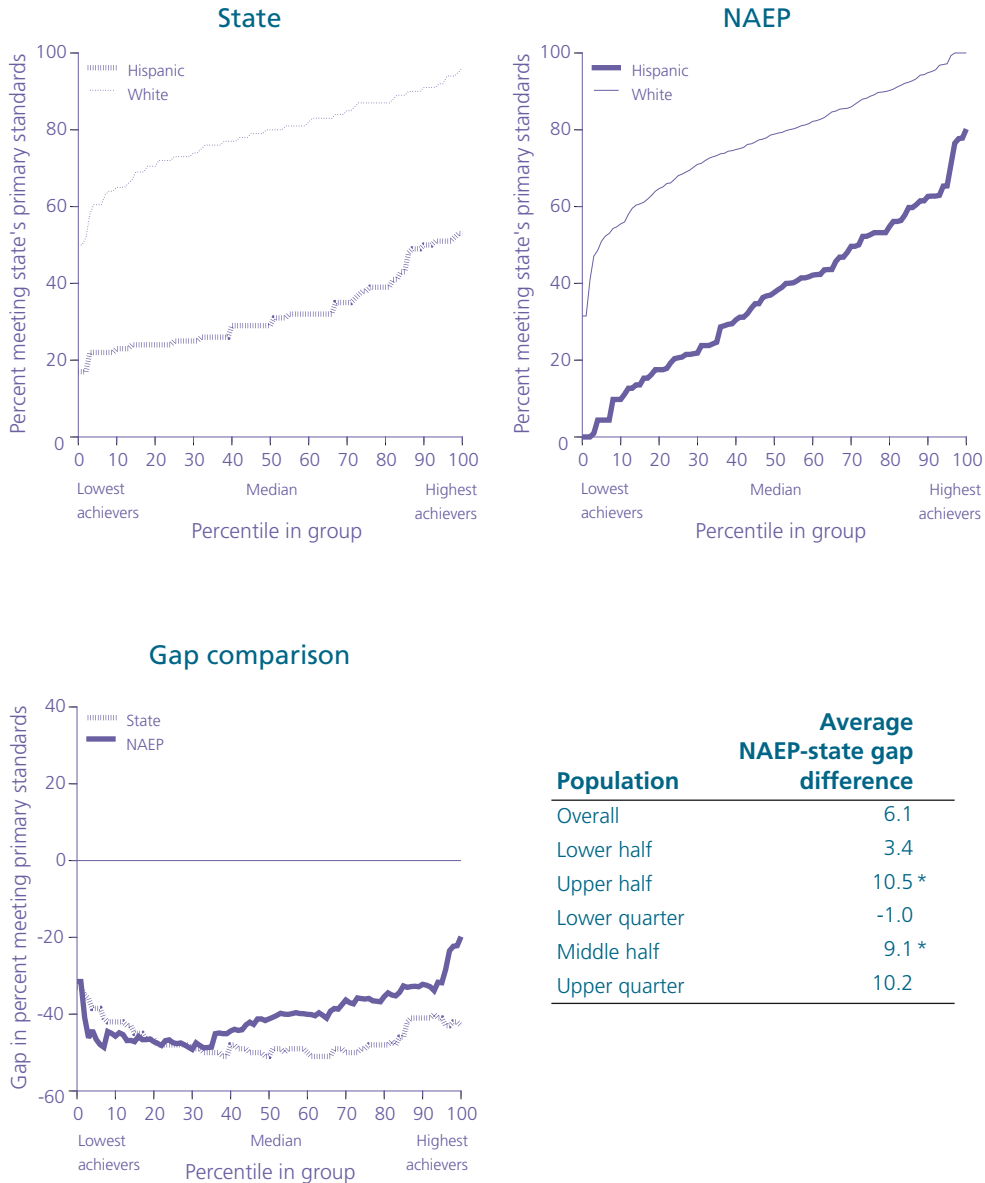
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 8. Comparison of NAEP and state assessment Hispanic-White gap changes in percent meeting grade 4 reading standards: 2002 and 2003



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 9. Comparison of NAEP and state assessment Hispanic-White gaps in percent meeting grade 8 reading standards: 2003

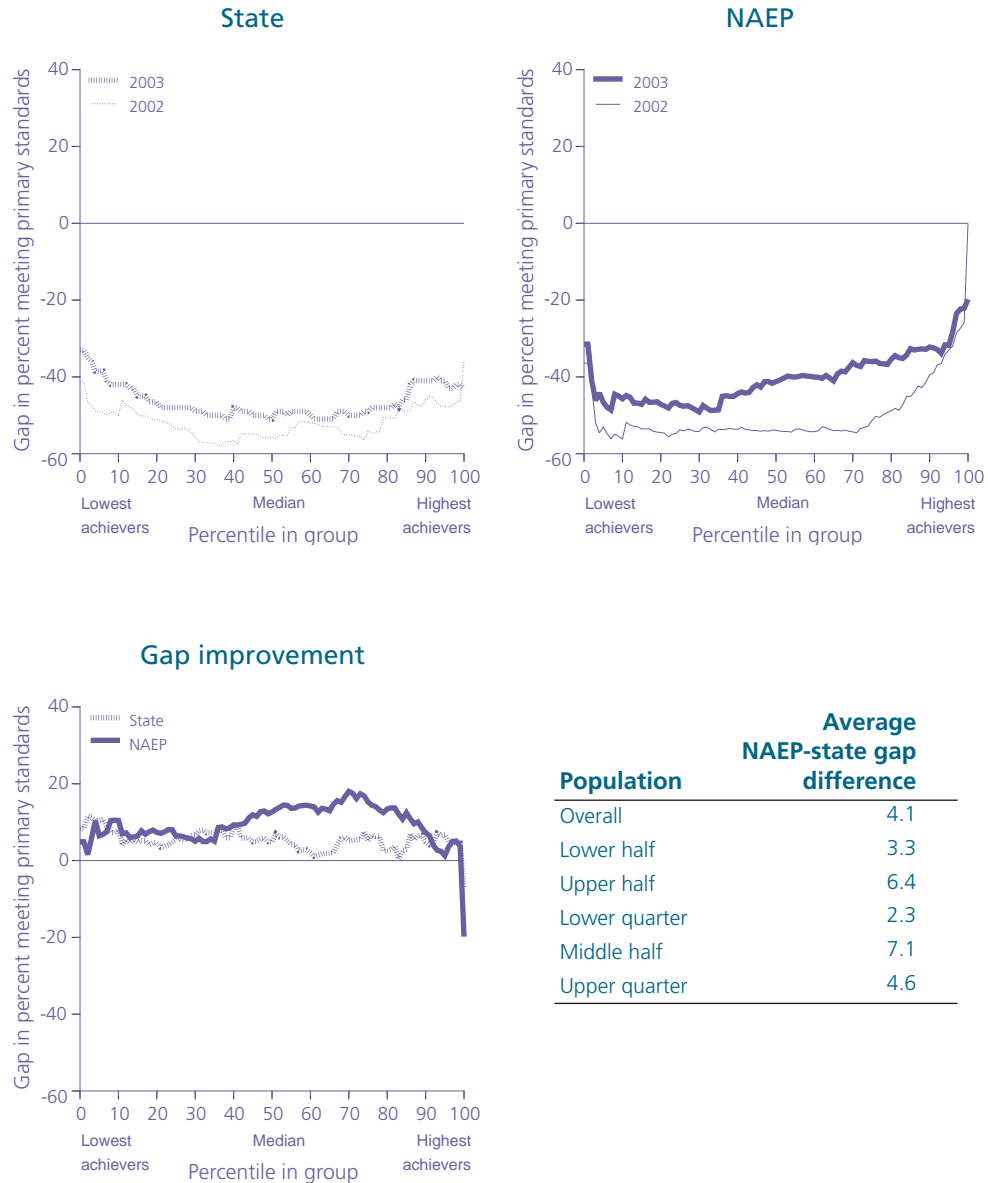


* NAEP-State gap difference significantly different from zero ($p < .05$).

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

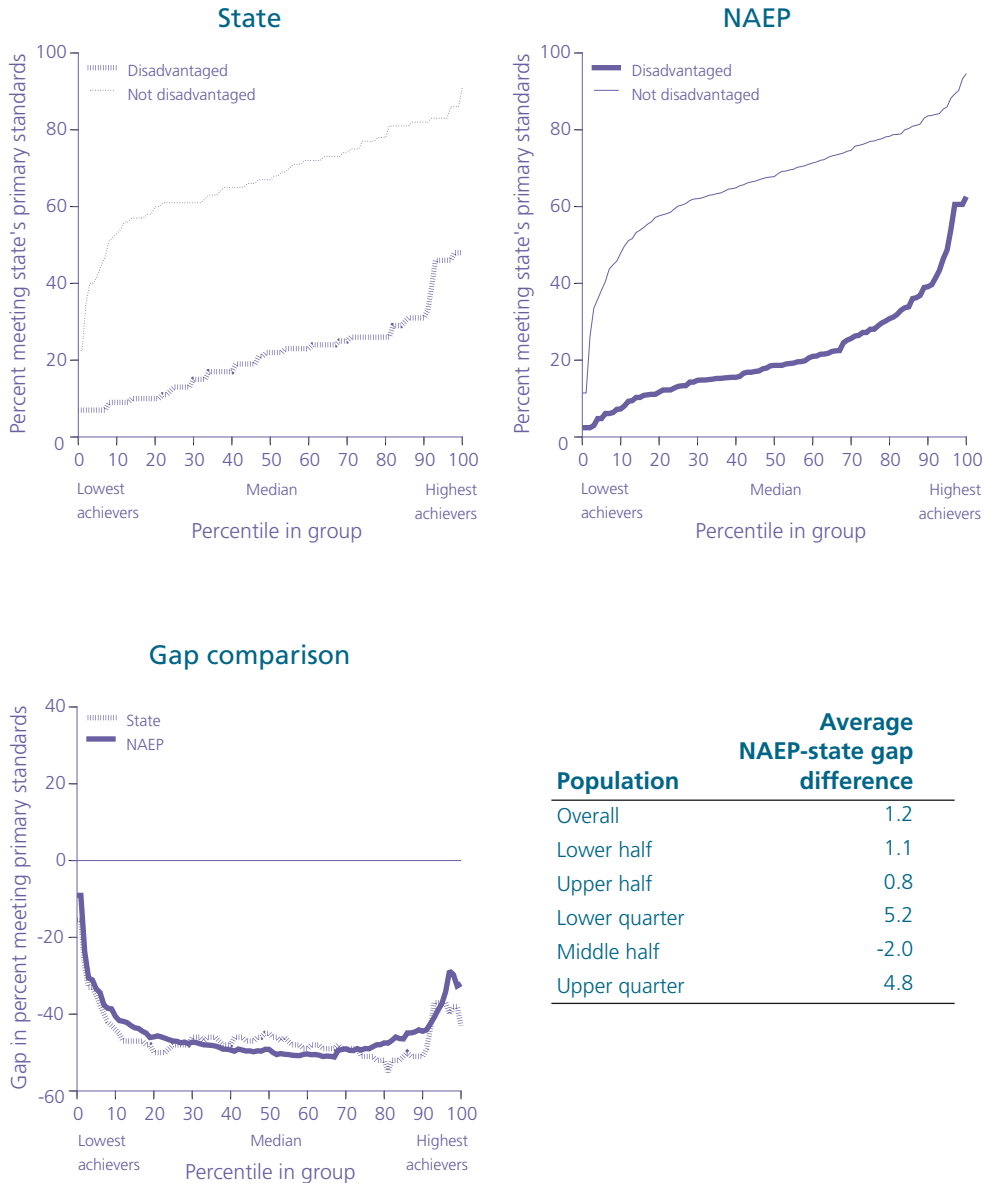


Figure 10. Comparison of NAEP and state assessment Hispanic-White gap changes in percent meeting grade 8 reading standards: 2002 and 2003



SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2002 and 2003 Reading Assessments: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

Figure 11. Comparison of NAEP and state assessment poverty achievement gaps in percent meeting grade 4 reading standards: 2003

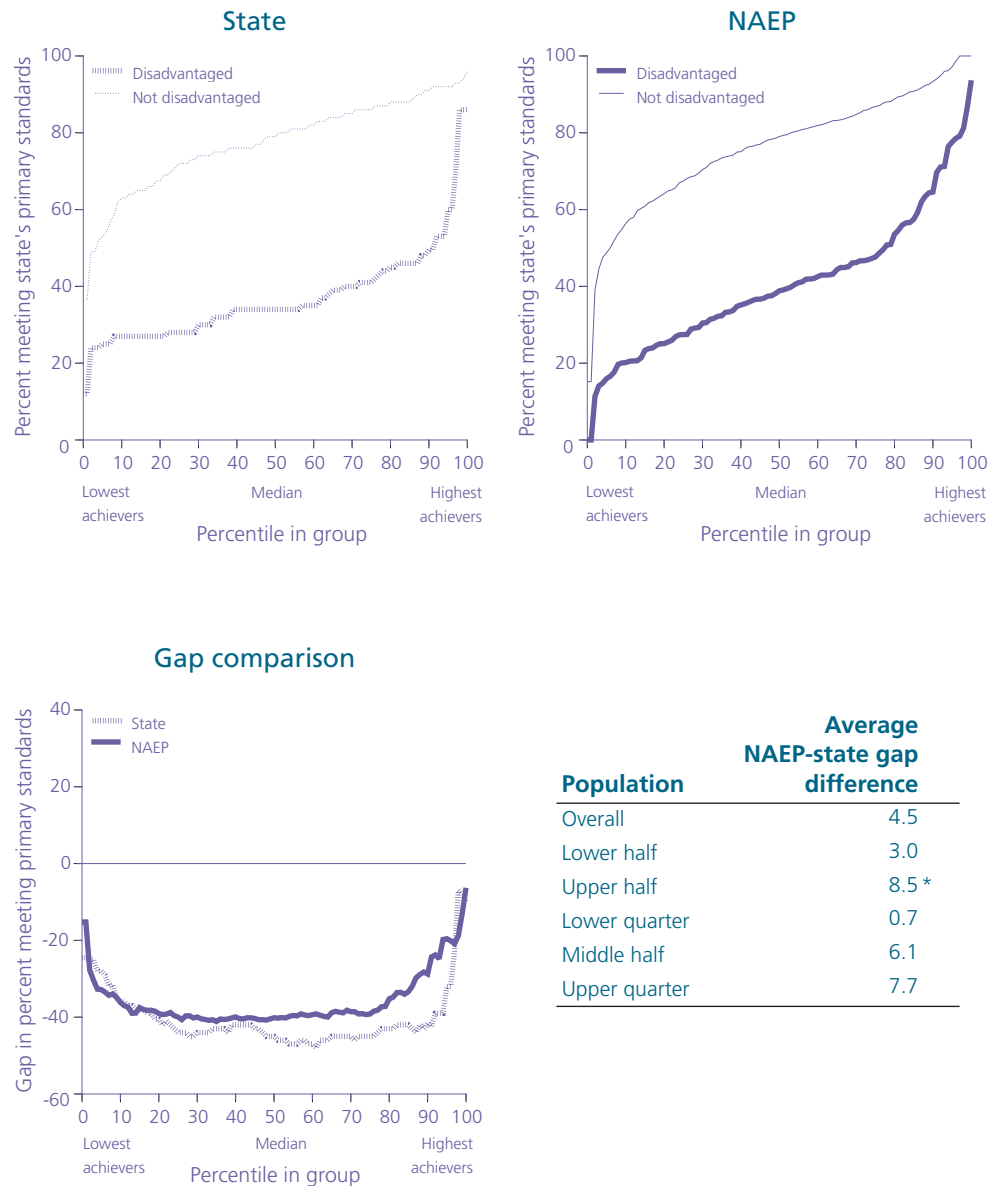


NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.



Figure 12. Comparison of NAEP and state assessment poverty achievement gaps in percent meeting grade 8 reading standards: 2003



* NAEP–State gap difference significantly different from zero ($p < .05$).

NOTE: The poverty gap refers to the difference in achievement between economically disadvantaged students and other students, where disadvantaged students are defined as those eligible for free/reduced-price lunch.

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP), 2003 Reading Assessment: Full population estimates. The National Longitudinal School-Level State Assessment Score Database (NLSLSASD) 2004.

