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Independent Evaluation of the California High School Exit Examination: 2010 Evaluation Report

Volume 1

D.E. (Sunny) Becker, Lauress L. Wise, and Christa Watters (Editors)

Prepared for: **California Department of Education**
Sacramento, CA

Prepared under: **Contract #00-07**

October 27, 2010

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INDEPENDENT EVALUATION OF THE CAHSEE: 2010 EVALUATION REPORT

Executive Summary

In 1999, the California legislature established the requirement that, beginning with the Class of 2004, students pass a graduation examination in English-language arts (ELA) and mathematics (SB-2X, written into Chapter 9 of the California *Education Code [EC]* as sections 60850–60859). In July 2003, after the completion of the 2002–03 California High School Exit Examination (CAHSEE) testing, the State Board of Education (SBE) voted to defer the CAHSEE requirement to the Class of 2006.

The legislation establishing the CAHSEE requirement also called for an independent evaluation of the impact of this requirement and of the quality of the CAHSEE tests. The Human Resources Research Organization (HumRRO) has served as the independent evaluator of the CAHSEE since January 2000. Over the past 10 years, a wide range of information has been gathered, analyzed, and reported by HumRRO as part of the independent evaluation of the CAHSEE. Copies of our annual and biennial evaluation reports may be found on the California Department of Education (CDE) CAHSEE Independent Evaluation Reports Web page at: http://www.cde.ca.gov/ta/tg/hs/evaluations.asp.

This annual report covers analyses of test results and other evaluation activities conducted through September 2010. Evaluation activities, findings from these activities, and recommendations based on these findings are summarized here. As in previous years, the evaluation includes analysis of test quality, test results, student perspectives, and an investigation of indicators of student achievement and success outside the CAHSEE program. One new activity this year was an analysis of recommendations from the panel appointed in response to Assembly Bill (AB) 2040. The AB 2040 Panel made findings and recommendations regarding options for alternative means for students with disabilities to demonstrate the same level of mastery of the content required for passage on the CAHSEE. More detailed information on each activity is provided in the full report under the following topics:

- 2009–10 test results, including review of test quality and analyses of passing rates (Chapter 2)
- Analysis of student questionnaire responses (Chapter 3)
- Examination of other indicators of student achievement and success (Chapter 4)
- Analysis of AB 2040 Panel recommendations (Chapter 5)

The final chapter (Chapter 6) of this annual report includes both a summary of key findings from each of these activities and a number of general policy recommendations for further improving the CAHSEE and its use. Following are the major findings as of September 2010, after 10 years of evaluations.

CAHSEE Test Quality is Good

In prior years, HumRRO reviewed the alignment of CAHSEE test forms to the blueprints specifying the content standards to be assessed. Good alignment provides the key evidence for the validity of the interpretation of the CAHSEE test scores as an indicator of mastery of the required content. Results indicate that CAHSEE test forms assess the target content standards fairly and fully and, with minor exceptions, measure the depth of knowledge specified in the content standards. This year, we continued analyses of the accuracy with which the essay portion of the ELA test was scored and found acceptable accuracy similar to that observed in prior years. Two-thirds of the time, two independent scorers assigned the exact same score for each essay. Independent scores differed by more than one point less than one percent of the time. We also found that the test forms used in different administrations were of comparable difficulty as indicated by consistency in the raw-to-scale score tables resulting from test form equating.

Test Scores Have Been Improving

Among many arguments for instituting the CAHSEE is the belief that this requirement would lead schools to improve the effectiveness of instruction in the content judged important for success after high school and lead students to work harder to master this content. Figure ES.1 shows that mastery of the CAHSEE content, as indicated by scores from the initial testing of grade ten students, has improved over the past seven years. The percent of students passing both parts on the first try has increased steadily from 64.3 percent in 2004 to 71.5 percent in 2010.

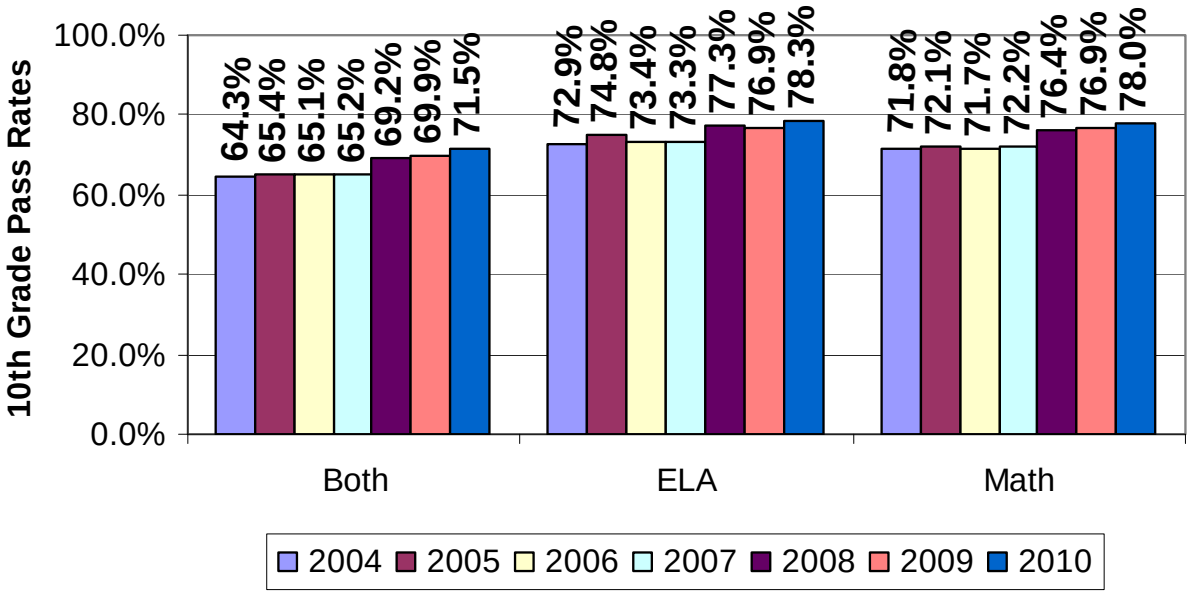


Figure ES.1. Trends in grade ten CAHSEE passing rates. (Reproduction of Figure 2.1)

One particular problem addressed by the CAHSEE requirement is student participation in elective high school mathematics courses. When the CAHSEE requirement was first passed, school districts established graduation requirements and some districts did not require students to take specific mathematics courses to receive a high school diploma. A statewide requirement that students take Algebra I was added shortly thereafter. Since the CAHSEE requirement was implemented for the Class of 2006, the percentage of grade ten students who have already taken Algebra I and are taking even higher level mathematics courses has increased steadily and dramatically, from 56 percent for the Class of 2006 to 72 percent for the Class of 2010 (Table 2.33).

Increases in the grade ten passing rates indicate improved effectiveness of instruction prior to the point at which students take the CAHSEE for the first time. There is also evidence for improved remediation for students who do not initially pass the CAHSEE. The calculation of cumulative pass rates beyond grade ten is a difficult and controversial process, particularly given assumptions that must be made with an incomplete set of data. For example, when a student does not pass the CAHSEE in grade ten and does not retest in grade eleven, he or she may have dropped out or may have moved out of the state and continued high school elsewhere. Similarly, the test data available to HumRRO cannot identify when a student passes the CAHSEE in grade ten and then moves out of state. While the assumptions are subject to debate, HumRRO has retained consistent assumptions over time to facilitate interpretation of trends. Recognizing some difficulty in tracking students across grade levels, HumRRO estimates that cumulative passing rates for grade twelve general education students have increased from 91.2 percent for the Class of 2006 to 94.4 percent for the Class of 2010 (Table 2.18).

One final indication of the impact of the CAHSEE requirement on student achievement is the significant number of students not passing the CAHSEE by the end of grade twelve who continue to work to pass in a fifth or subsequent year of high school. Roughly 30,000 general education students and 16,000 students in special education who were first-time seniors in 2009 had not met the CAHSEE requirement by June 2009 (Table 2.47). Of these, nearly 14,000 general education students and about 5,500 special education students took the CAHSEE at least once this year. About one-third of the general education students, but only just over a tenth of the special education students who took the CAHSEE in their fifth year of high school completed the requirement. While there is no comparable data on fifth-year seniors prior to the CAHSEE requirement, the number now continuing to work to meet the new requirement is quite significant.

Significant Gaps in Passing Rates Persist

While performance on the CAHSEE has increased for key demographic groups, significant gaps in CAHSEE passing rates persist. Figure ES.2 shows grade ten passing rate trends for Hispanic, African American, economically disadvantaged (ED) students, English learners (ELs), and students in special education (SE). Initial passing rates for

minority and low income students have increased but are still 10–15 percentage points below overall passing rates. Initial passing rates for ELs have been relatively flat, with less than a third of these students meeting the CAHSEE requirement in grade ten. Almost by definition these students will have great difficulty passing at least the ELA portion of the CAHSEE until they achieve proficiency in English and are no longer classified as ELs. Trends for ELs are better captured by trends in scores on the California English Language Development Test (CELDT) reported elsewhere (see http://www.cde.ca.gov/nr/ne/yr10/yr10rel56.asp). [Note: the preceding Web address is no longer valid.] Finally, while there has been some improvement for students in special education, less than one quarter of these students met the CAHSEE requirement in grade ten.

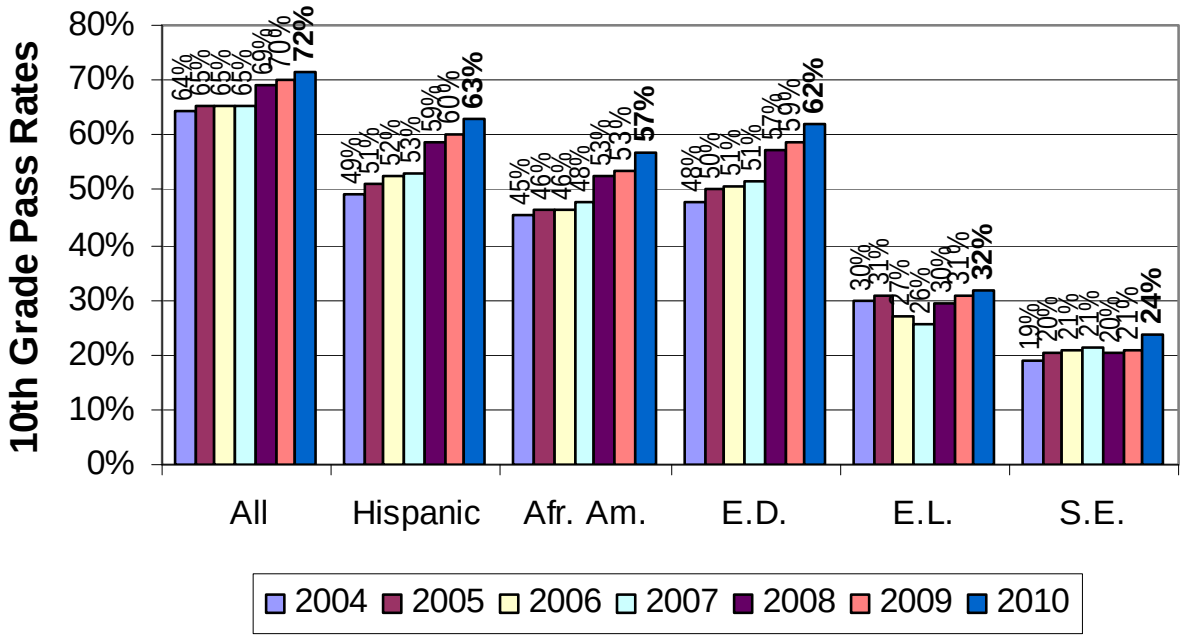


Figure ES.2. Trends in overall grade ten passing rates for selected groups (Reproduction of Figure 2.2)

Students Report Getting More Help and Working Harder

As part of the independent evaluation, students complete a brief questionnaire after each part of the CAHSEE. The questions are designed to identify different ways that students are affected by the CAHSEE requirement. Responses to several questions suggest that increases in student CAHSEE scores result from a combination of increased help and increased effort. For example, 39 percent of grade ten students said that a teacher spent time in class helping them get ready to take the CAHSEE ELA test and 26 percent said a teacher spent time helping them get ready to take the CAHSEE mathematics test (Table 3.2). In addition, the percentage of grade ten students saying they used the ELA Study Guide increased from 19 percent in 2009 to

29 percent in 2010, and the percentage saying they used the Mathematics Study Guide increased from 13 percent to 22 percent (Table 3.4).

Teachers have increasingly focused coursework on the skills tested by the CAHSEE. About 95 percent of all grade ten students said most or all of the topics on the ELA test were covered in their courses, up from 92 percent of grade ten students in 2005. For mathematics, the percentage saying most or all of the topics were covered in their courses rose from 90 to 93 percent over the same period (Table 3.18). The rigor of related courses has also increased. The percentage of grade ten students saying that the questions on the CAHSEE were more difficult than questions encountered in their course work dropped from 18 percent in 2005 to 12 percent in 2010 for ELA and from 22 percent in 2005 to 17 percent in 2010 for the mathematics test (Table 3.22).

Responses to some of the questions suggest that students are working harder to learn required material because of the CAHSEE. Of all grade ten students, 41 percent say they are working harder in their courses to meet the CAHSEE requirement (Table 3.26). While 84 percent of all grade ten students expect to graduate from high school on time, another 10 percent said they expect to graduate but may need additional coursework beyond their senior year (Table 3.8). When grade twelve students who had still not passed the CAHSEE were asked what they would do if they did not pass this time, only 3 percent said they would give up trying to get a diploma (Table 3.40). The rest were willing to keep trying through additional courses, community college programs, or the GED program. More detail on student questionnaire responses is provided in Chapter 3 of the full report.

More Students are Continuing to Grade Twelve, but Somewhat Fewer Graduate on Time

We examined trends in other academic indicators to see if there might be changes that could be associated with the implementation of the CAHSEE requirement, beginning with the Class of 2006. Details of the indicators analyzed and findings from these analyses are reported in Chapter 4 and summarized here. One constant phenomenon, not unique to California, is that fall enrollment counts decline from a peak in Grade 9 to smaller and smaller numbers in grades ten through twelve. Figures ES.3 and ES.4 show declines in fall enrollment from grade ten one year to grade eleven the next and similarly from grade eleven to grade twelve. Since the CAHSEE requirement went into effect there has been a significant decrease in these declines, meaning more students are continuing on from one grade to the next.

Changes in procedures for identifying students who drop out of school make comparisons of dropout rates over an extended period of time impossible. We can see, however, that while the overall four-year dropout rate was 19 percent for the Class of 2008, the comparable dropout rate was nearly 33 percent for African American (Table 4.3)[1].

[1] Note that fall 2009 enrollment data were not yet available from CALPADS and so are not included in these analyses.

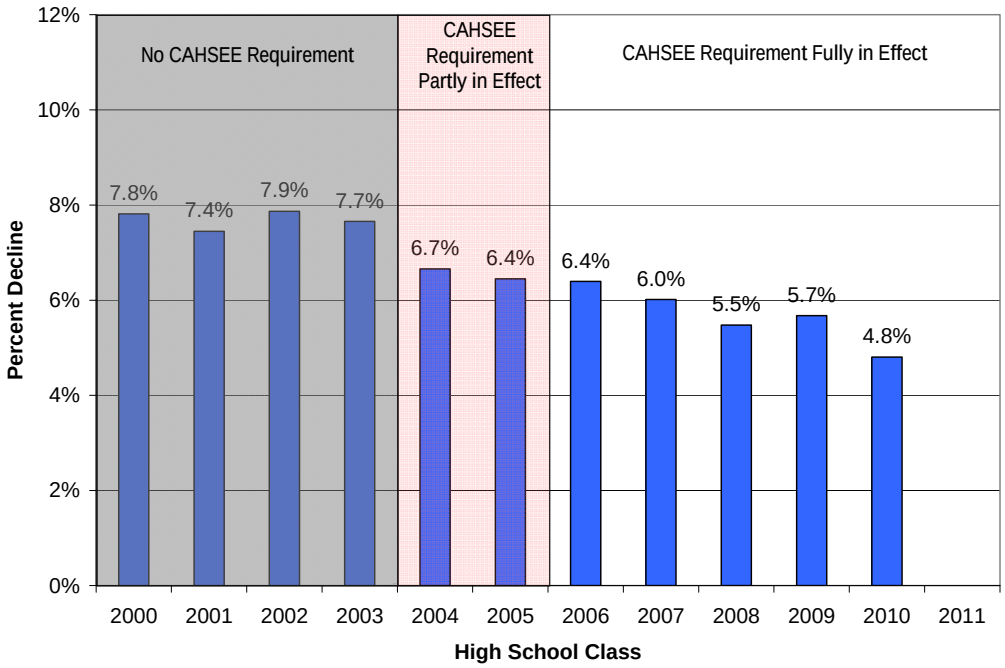


Figure ES.3. Enrollment declines from grades ten to eleven by high school class. (Reproduction of Figure 4.2)

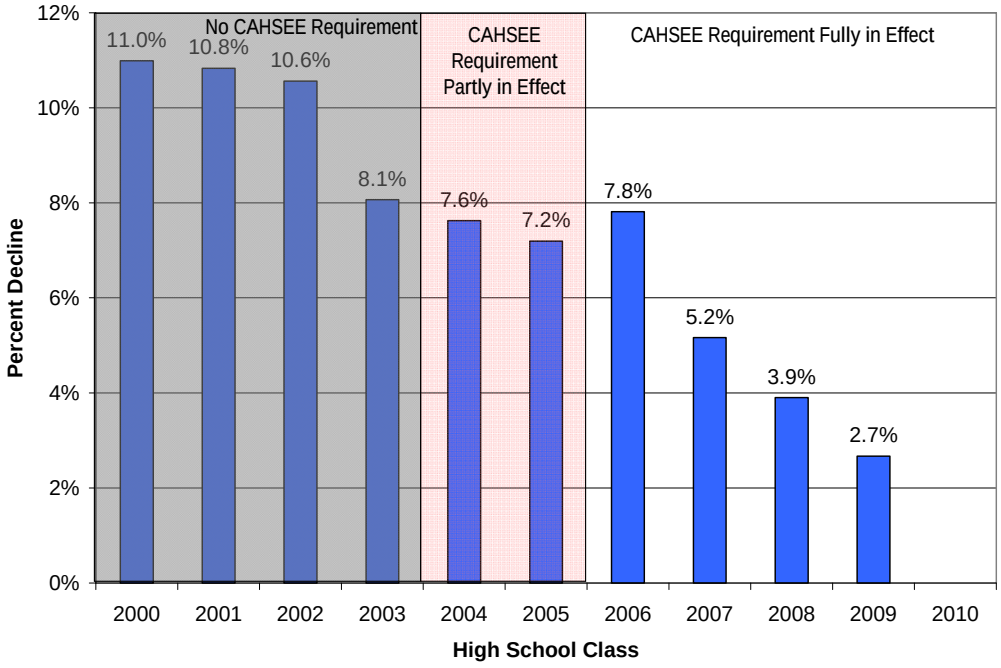
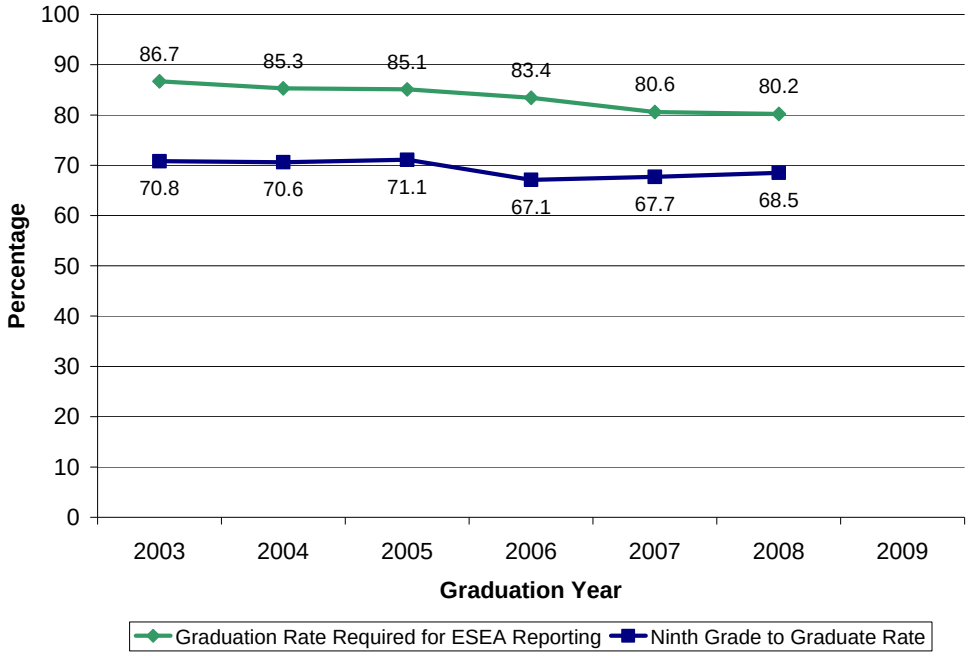


Figure ES.4. Enrollment declines from grades eleven to twelve by high school class. (Reproduction of Figure 4.3)

While more students are continuing to stay in school, the percentage graduating on time has dropped since the CAHSEE requirement took effect for the Class of 2006. Figure ES.5 shows as much as a 4 percent decline in four-year graduation rates starting with the Class of 2006. While this rate has since recovered somewhat, it is still significantly below the pre-2006 rate.



Source: CDE DataQuest. http://data1.cde.ca.gov/dataquest (accessed July 20, 2010).

Figure ES.5. Trends in two graduation rates. (Reproduction of Figure 4.4)

Students are Taking and Passing Advanced Courses

One concern with the CAHSEE requirement was that it might lead to a focus on more basic courses at the expense of advanced coursework. Among other indicators we have tracked, the percentage of students taking and passing Advanced Placement (AP) tests has been an important check of this concern. In fact, participation in AP courses has increased both before and after the CAHSEE requirement took effect as shown in Figure ES.6. The numbers of students passing these tests as a percentage of all grade twelve or all grade eleven and twelve students has also increased as shown in Figure ES.7.

Participation in the SAT college entrance examination decreased slightly in the 2007–08 school year. Mean SAT scores increased, but the percentage of students earning a combined score of 1500 or better declined slightly. Both participation and success on the ACT—which had only about one-fifth of the participation among California students that the SAT program did—increased.

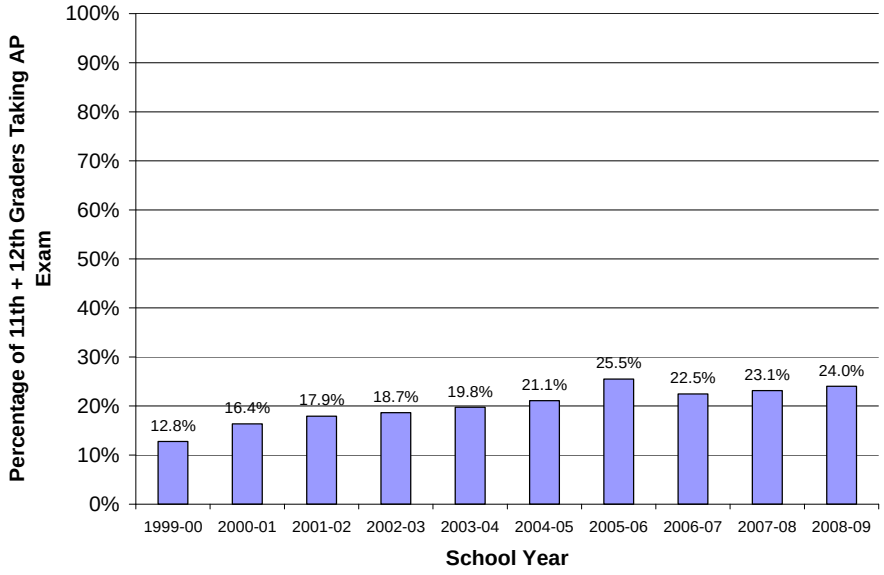


Figure ES.6. AP participation rates over time. (Reproduction of Figure 4.8)

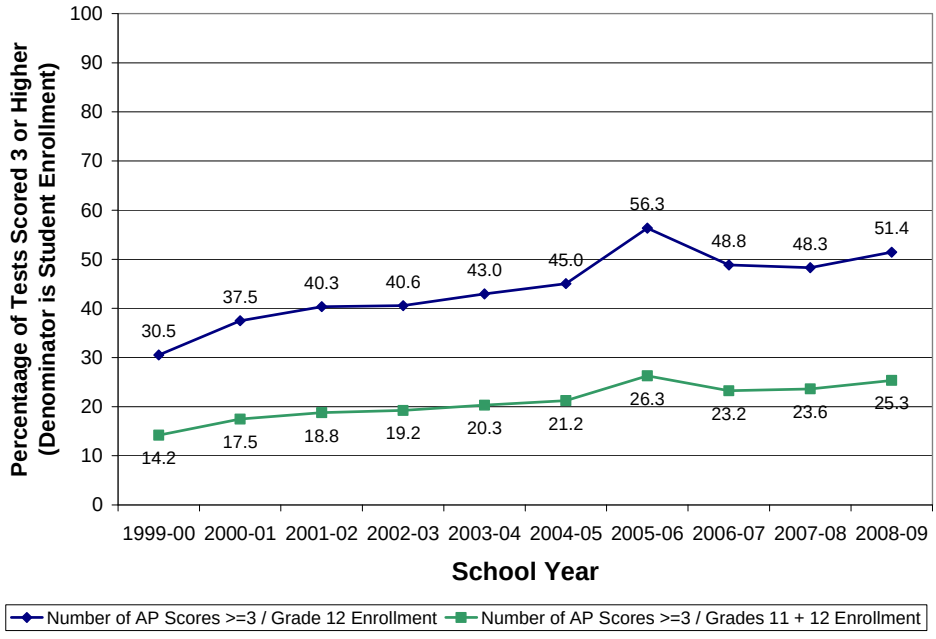


Figure ES.7. AP pass rates over time (i.e., number of AP examination scores >=3 as a percentage of student enrollment). (Reproduction of Figure 4.9)

AB 2040 Panel Recommendations May Be Feasible; Further Work is Needed to Implement Them Uniformly and Within Available Funding Levels

HumRRO was asked to analyze recommendations of the AB 2040 Panel for alternative ways that students with disabilities who are unable to pass the CAHSEE might demonstrate mastery of the skills required by the CAHSEE. The panel proposed a two-tier system for students who met eligibility criteria. The first tier consisted of looking at scores on other tests, most taken under lower-stakes conditions, measuring similar skills. These include the California Standards Tests, the California Modified Assessments, and possibly community college placement tests. Students who did not demonstrate mastery through other test scores would enter a second tier, involving the collection and evaluation of student work samples. We used available test score data on students with disabilities in the classes of 2008 and 2009 to analyze Tier One options. For Tier Two, we collected feedback from school and district personnel on options for eligibility, administration, type and amount of evidence, scoring, and uniformity across districts. Details on the AB 2040 Panel recommendations and our analyses of these recommendations are provided in Chapter 5 and summarized briefly here.

Results from our analyses suggest that the Tier One Screen would be a feasible process. Further, if only CST and CMA scores are considered, this process could be automated and performed by CDE rather than requiring school personnel to fill out and judge individual student worksheets. It was not clear, at this time, how uniformity could be imposed on the use of community college placement scores as part of the Tier One Screen. Such scores are not available for many or most students and even if available, are often not available until late in their senior year—perhaps too late to exercise the option to conduct the extensive effort required for Tier Two. If reliable information on course grades becomes available through CALPADS, grades could be included in an automated Tier One Screen. Otherwise, if the decision were made to include grades, input at the local level would be required. As many as 19,000 students might participate in the Tier One Screen each year; however it is likely that fewer than 100 students per year would meet the CAHSEE requirement this way.

A number of key policy decisions would need to be made to go beyond the exploratory analyses of a possible Tier One screen reported here. Decisions are needed regarding the following:

- Comparability, specifically which CST or CMA scores to include, and, if grades are also included, which courses should be considered.
- The equivalency of scores on a Tier One worksheet and CAHSEE passing levels.

Feedback from school and district special education experts suggest the Tier Two screen might be also feasible, but HumRRO and the Panel agree that a test development contractor would be needed to develop more specific criteria for work sample requirements. Depending on the work sample criteria, the time requirements for special education teachers and students might be a considerable burden. Consideration

might be given to reducing eligibility for Tier Two (e.g., from 20,000 down to 4,000 students) to target teacher time to the most eligible students. Perhaps a test development contractor would recommend a reduced number of work samples, even fewer than the "streamlined" option evaluated here, thus reducing time requirements for collection and scoring of evidence. Responses to the open-ended questions indicate support for an alternative means, but also continuing concerns about the comparability of results across the state if scoring is done at the local level.

If judged feasible, development of the alternative means should include a pilot test before a system such as the proposed Performance Validation Process becomes operational. A pilot test would:

- Provide an opportunity to collect a variety of actual student work samples to help fine-tune Tier Two criteria for the number and types of work samples
- Identify aspects of operations that are critical to success (e.g., record keeping of checklists, timeline for eligibility screening, evidence collection, scoring, etc.)
- Allow smaller scale effort to test out procedures, choose rangefinders, and establish passing criteria for hand-scored student evidence
- Provide data that can be extrapolated to better estimate costs and time for full scale implementation

A pilot test could also explore further screening criteria to reduce the burden on both students and school and district staff to create and evaluate extensive work samples. For example, a minimum grade point average might be used, not as evidence of mastery of the knowledge and skills required by the CAHSEE, but as a criterion for eligibility for the Tier Two screen. Similarly, a minimum CAHSEE score (below the passing level) might be set as a criterion for eligibility for Tier Two screening.

Recommendations

As in past years, HumRRO offers a number of recommendations for improving the CAHSEE and its use based on findings from the evaluation. The first four recommendations concern improvement to the examination itself and also to data systems that support analysis and interpretation of CAHSEE results.

Based on our analyses over the past several years, we conclude that the CAHSEE is a reasonably accurate measure of mastery of the required ELA and mathematics content. That said, we thoroughly analyzed the alternative means recommended by the AB 2040 Panel for students with disabilities to meet the CAHSEE requirement. Based on our results and those from a targeted study of students with disabilities who had difficulty passing the CAHSEE (American Institutes for Research, 2010), it seems clear that there are a small number of students who have mastered the required skill, but cannot pass the CAHSEE. At the same time, we found considerable concern about the fairness and the cost of the evaluation of student work samples

proposed as Tier Two of the alternative means. To resolve the tension in these findings, we offer our first recommendation.

> ***Recommendation 1:*** *A pilot study is needed to try out specific criteria for meeting the CAHSEE requirement using an approach similar to that recommended by the AB 2040 Panel. The study should address the feasibility of collecting and scoring the required work samples. The study should also explore ways to ensure uniform application of criteria for demonstrating equivalent mastery of the knowledge and skills required for passing the CAHSEE.*

This recommendation was also made by the State Superintendent of Public Instruction. The pilot should evaluate alternative tests that might be used in the Tier One screen along with ways of identifying minimum performance levels on these tests that are comparable to passing the CAHSEE. The study must also address ways of (a) limiting the collection of work samples to those students likely to have the required skills, (b) collecting the information efficiently, and (c) scoring the resulting work samples rigorously and uniformly across the state. Although not required by current statute, consideration should also be given to extending the alternative means to other students who have particular difficulty taking tests, even though they are not identified as having specific disabilities requiring participation in special education programs.

A second recommendation for improving the CAHSEE itself stems from our observation of some difficulties with the distribution of test booklets, particularly special booklets required for some accommodations.

> ***Recommendation 2:*** *The CDE should work with its CAHSEE contractor to improve the system used by districts for ordering regular and special needs versions of the CAHSEE.*

It is difficult to forecast exactly which students will participate in each administration. Districts should be discouraged from allowing grade eleven and twelve students to participate in consecutive administrations, since results from the first administration are generally not available at the time materials for the second administration are shipped. We observed a number of students who appeared to pass in the October administration and yet had booklets and, in some cases completed booklets, from the next administration. In addition, schools and districts need to ensure an adequate number of special test versions (e.g., large print or Braille) to meet student needs.

Our third recommendation concerns the statewide data systems that support analysis and interpretation of CAHSEE results.

> ***Recommendation 3:*** *California should ensure that statewide student data systems are as accurate and up-to-date as possible.*

CDE is responsible for an extremely large and geographically dispersed educational system. With such size and diversity come many challenges, and an effective data system is crucial to understanding, monitoring, and improving the effectiveness of our educational systems. The California Longitudinal Pupil Achievement Data System (CALPADS) includes a comprehensive design for the collection and integration of student data. Budget limitations and other constraints have slowed the full implementation of this system, including key quality assurance components. We found, for example, the exit information collected on high school students in 2008 was coded differently by some districts and that, in an effort to obtain more accurate information, data from 2009 has been significantly delayed and was not available for our analyses this year. We were thus not able to identify students who left high school having completed all requirements except the CAHSEE.

At the core of CALPADS is a system for assigning and using statewide student identifiers (SSIDs). This makes it possible to match CAHSEE results for students who transfer to different schools and also to link CAHSEE results to other student information. Since the introduction of SSIDs in 2006, the rate of missing or erroneous information has decreased. However, we still find at least 0.5 percent of the initial CAHSEE records are missing SSIDs, have different SSIDs for the same student, or have the same SSID for different students. As CALPADS matures, it will be important to build into the system processes for monitoring and improving the accuracy and completeness of all student data. Although 0.5 percent appears to be a low error rate, in California's system of over 6 million K–12 students this could represent 3,000 students with missing or erroneous SSIDs.

Our fourth recommendation calls for a review of the content and rigor of the CAHSEE requirement.

> ***Recommendation 4:*** *Collect post-high school outcome information for students who have taken the CAHSEE and use this information in reviewing the content and rigor of the CAHSEE requirements.*

It has now been ten years since the High School Exit Examination Panel recommended the knowledge and skills that students should master to earn a high school diploma. In August of this year, the SBE voted to adopt the Common Core Standards for elementary, middle, and high school student achievement. These standards were designed to lead to mastery of key college and work readiness skills by the end of grade twelve. It is reasonable to review the CAHSEE requirements in comparison to these new readiness standards. While the intended meaning of a high school diploma is still very much a policy issue, we can now collect and examine empirical data on the relationship between skill levels and post-high school outcomes.

Consider two examples, among many. Students who do not pass the CAHSEE have the option of participating in community college programs to help them pass. These programs may be supported by intensive instruction funds. The utilization and efficacy of these programs should be assessed. Also, students who do pass the

CAHSEE may nonetheless be required to take remedial courses in college. Information about these outcomes would inform discussions of the appropriateness of the current CAHSEE content requirements and passing score.

Our remaining recommendations concern ways of increasing the effectiveness and impact of the CAHSEE requirement. Both initial grade ten scores and grade twelve cumulative passing rates have increased over the past five years, but further improvements are needed for all students to be college and work ready upon graduation from high school. In addition, many minority and economically disadvantaged students, English learners, and students with disabilities have been significantly less successful in meeting the CAHSEE requirement. We begin by repeating two recommendations from our 2009 Annual Report.

Recommendation 5: *California education leaders and educators should encourage students who do not pass in four years to continue to master CAHSEE skills and work to improve effectiveness of fifth-year programs.*

Research shows that attaining a high school diploma is associated with positive life outcomes including higher income and subsequent achievements such as completing military enlistment contracts. We have seen evidence that some struggling students persist in seeking a high school diploma after their graduating class. We recommend that California educators communicate the importance of a high school diploma to students and educate them on the opportunities to master CAHSEE skills after the regular high school years. At the same time, the effectiveness of fifth-year programs should be monitored and improved upon. A study of effective schools might yield best practices that could be shared with the wider education community.

Recommendation 6**:** *New interventions should be targeted at earlier grades, using test scores to identify students who have fallen behind their classmates and are at risk of failing to meet the CAHSEE requirement.*

State policy has focused on interventions for students who do not initially pass the CAHSEE, including funding for a remedial grade twelve program and provisions for students to continue for a fifth or even sixth year of high school. Last year's analyses of longitudinal data indicate that grade seven assessment results can be used to identify students who may need additional help to pass the CAHSEE. It would be useful to study initially low-achieving students who are able to catch up and pass the CAHSEE by the time they reach grade ten. We should study the people, psychological and learning climates, and programs that helped them to do so. It might then be possible to extend this help to more of the students who have fallen behind and need to catch up in time to benefit fully from the high school curriculum.

Another recommendation concerns identification and dissemination of programs that are effective in helping students master the CAHSEE requirements, particularly students in groups that currently have the most difficulty in meeting the CAHSEE requirement.

Recommendation 7: *Study schools that are doing a better job in helping all and particular groups of students to meet the CAHSEE requirement. Identify approaches and programs that might be effectively adopted in other schools.*

We see variety across schools and districts in CAHSEE pass rates and in gaps in passing rates for minority, economically disadvantaged students, English learners, and students with disabilities. A careful study of higher performing schools could identify programs that are effective in helping students who have fallen behind in academic achievement to catch up and meet the CAHSEE requirement by the end of high school. Programs that are effective for particular groups, such as helping English learners learn English or providing students with specific disabilities better access to general education instruction are also needed to reduce gaps in passing rates for these groups. Detailed study is needed to determine what makes these programs successful and how they might be adopted in other districts and schools.

This year we also note an increasing concern that the state's dire economic development may make continued improvement in CAHSEE results difficult and might even make it difficult to sustain improvements already achieved. This leads to our final recommendation.

Recommendation 8: *California should study the impact of fiscal constraints on systems to help students master the skills required by the CAHSEE.*

California, like many states, has been struggling financially, resulting in cutbacks, furloughs, and an eye toward cost savings. The effects of reductions in and reallocation of funding may have implications for student success in the future, including loss of effective teachers and increases in class size. In particular, reductions in remediation offerings could reverse progress made in recent years. We recommend that programmatic changes resulting from fiscal constraints be carefully monitored, evaluated, and adjusted if necessary.

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Chapter 1: Introduction

D. E. (Sunny) Becker and Lauress L. Wise

High School Exit Examinations

Eighteen states had exit examinations in place in 2002, and another six states, including California, were phasing in exit examinations but not yet withholding diplomas (CEP, 2002). By 2009, 26 states were withholding diplomas from students based on their exit examination performance. Of those 26 states, 22 provide alternate pathways to graduation for students with disabilities; 2 offer alternatives for English language learners, and 19 states provide alternate pathways for general education students. These pathways vary from state to state and include the SAT (formerly Scholastic Aptitude Test), portfolios, modified standardized tests, and compensatory models in which low test scores can be compensated for by additional coursework (CEP, 2009).

History of California High School Exit Examination

In 1999, the California state legislature enacted the requirement that, beginning with the Class of 2004, students pass a graduation examination in English-language arts (ELA) and mathematics (Senate Bill (SB)-2X, written into the California *Education Code (EC)* as Chapter 9, sections 60850–60859). This requirement was modified in 2002 through the passage of Assembly Bill (AB) 1609. The revised legislation gave the State Board of Education (SBE) authority to postpone the California High School Exit Examination (CAHSEE) requirement, based in part on the results of a study that examined the extent to which both test development and standards-based instruction met standards for this type of examination (Wise et al., 2003a). In July 2003, after completion of the 2002–03 CAHSEE testing, the SBE voted to defer the CAHSEE requirement to the Class of 2006 and it has remained in effect ever since.

The requirement for students with disabilities, however, has varied over time. In 2002, a lawsuit (Kidd et al. vs. O'Connell et al., formerly referred to as the Chapman case) was filed on behalf of students with disabilities. While the suit was pending, the parties agreed that students with disabilities in the classes of 2006 and 2007 could receive a diploma even if they did not pass the CAHSEE, as long as they met all other district and state requirements. Many of these students continued to take the CAHSEE despite the dispensation. A final settlement was reached in March 2008 reinstating the requirement that students with disabilities pass the CAHSEE and requiring the California Department of Education (CDE) to conduct a study of students with disabilities who are unable to pass. On September 30, 2008 the legislature enacted AB 2040, establishing *EC* sections 60852.1 and 60852.2, which require an advisory panel be established to develop findings and recommendations for alternative means to the CAHSEE for eligible students with disabilities. In 2009 the AB 2040 Panel, an advisory panel of educators and others with experience in assessment or in working with students with disabilities, developed recommendations that addressed the

components of the AB 2040 statute requirements, including the definition of eligible students, specific options, scoring, uniformity, cost, and level of administration.

Independent Evaluation of the CAHSEE

The original legislation mandating the requirements for the graduation examination specified an independent evaluation of the CAHSEE. The CDE awarded the evaluation contract to the Human Resources Research Organization (HumRRO). The original contract period operated from 1999 through 2004; a second contract was awarded to HumRRO to continue the evaluation through 2007, and a third contract was awarded to continue the evaluation through 2010.

Throughout these contracts, HumRRO's evaluation has investigated two key questions:

1. What has been the impact of the CAHSEE requirement on student achievement, including achievement gaps; graduation rates; post-graduation plans and activities; and curriculum and instruction?

2. What is the quality of the tests themselves and how could they be improved?

HumRRO's efforts have focused on analyses of data from tryouts of test questions and from the annual administrations of the CAHSEE. Reports have included analysis of trends in pupil performance, retention, graduation, dropout, and college attendance rates, although no direct causal relationship between the CAHSEE and these various outcomes is assumed. The legislation also specified that evaluation reporting would include recommendations to improve the quality, fairness, validity, and reliability of the examination. The legislation required an initial evaluation report in June 2000 and biennial reports to the Governor, the Legislature, the SBE, and the CDE in February of even-numbered years.

In addition to the legislatively mandated biennial evaluation reports, the contracts for the evaluation required an annual report of evaluation activities. The present report meets the contract requirement for a report of activities and findings during the 2009–10 evaluation. This report adds to results and recommendations included in prior evaluation reports (Wise, Hoffman, & Harris, 2000; Wise, Harris, Sipes, Hoffman, & Ford, 2000a; Wise, Sipes, George, Ford, & Harris, 2001; Wise et al., 2002b; Wise et al., 2003; Wise et al., 2004a; Wise et al., 2004b; Wise et al., 2005; Wise et al., 2006; Becker & Watters, 2007; Becker, Wise, & Watters, 2008; Becker, Wise, & Watters, 2009, Volumes 1 and 2; Becker, Wise, & Watters, 2010). All of these reports are available on the CDE Web site at http://www.cde.ca.gov/ta/tg/hs/evaluations.asp. In addition, this report comprises findings from HumRRO's evaluation of the AB 2040 Panel's recommendations for alternative means to the CAHSEE for eligible students with disabilities.

Other states are facing similar challenges and issues. The Center for Education Policy (CEP) has been reporting on high school graduation tests across the country

since 2002. Recent reports have focused on trends in gaps in pass rates (Zabala and Minnici, 2008), transitions toward end-of-course examinations (Zabala, Minnici, McMurrer, & Briggs, 2008), issues for English Language Learners (Minnici, Zabala, & Bartley, 2007), issues for students with disabilities (Zabala, 2008), alternate pathways (Zhang, 2009), and conflicts between state policy and school practice (Zhang, 2009).

Organization and Contents of 2010 Annual CAHSEE Evaluation Report

The 2010 Annual CAHSEE Evaluation Report covers activities performed in the independent evaluation from October 1, 2009 through September 30, 2010. It covers results from CAHSEE administrations during the 2009–10 school year as well as an evaluation of the AB 2040 Panel's recommendations.

Chapter 2 analyzes results from the 2009–10 CAHSEE administrations, reporting results for grade twelve students in the Class of 2010 and comparing their passing rates to those of grade twelve students in the classes of 2006, 2007, 2008, and 2009. In addition, we report passing rates for grade ten students in the Class of 2012 in comparison to passing rates for grade ten students in previous classes, and passing rates and score gains for grade eleven students in the Class of 2011 who did not meet the CAHSEE requirements during their sophomore year. This chapter also analyzes the persistence and progress of students from the classes of 2006 through 2009 who did not meet the CAHSEE requirement in time to graduate with their classes.

Chapter 3 investigates the challenges and impacts of the CAHSEE program from the student perspective. Brief questionnaires were administered to students upon completion of each CAHSEE test. Analyses include comparisons of current year responses to response patterns in previous years, as well as comparisons among distinct groups of students (e.g., students who passed the CAHSEE versus those who did not).

Chapter 4 presents trends in educational achievement and perseverance through analyses of data on year-by-year high school enrollment trends, graduation and dropout rates, college preparation, and Advanced Placement (AP) test achievement. While these do not directly reflect effects of the CAHSEE, trends over time can be informative in assessing shifts in student achievement. These analyses draw on publicly available data from external sources such as the CDE's DataQuest, which provides access to the California Basic Educational Data System (CBEDS), and the California Postsecondary Education Commission (CPEC).

Chapter 5 describes the procedures and findings from a special one-time study. In 2010 the CDE requested that HumRRO, as part of its independent evaluation of the CAHSEE, conduct an analysis of the AB 2040 Panel's recommended CAHSEE Performance Validation Process (PVP), a two-tier alternative means process of meeting the CAHSEE requirement for eligible students with disabilities. The goal of the analysis was to collect information about (a) the feasibility of the proposed alternative means and (b) how the level of academic achievement demonstrated by those alternative means

compares to the level of academic achievement in the content standards required for passage of the CAHSEE.

Finally, Chapter 6 presents our findings and recommendations based on the data analyses and results presented in previous chapters.

Summary of Year 10 Evaluation Activities (September 2009)

In this section, we summarize the findings and recommendations from our most recent (September 2009) annual report to provide a context for the current study. We reported key findings in several areas:

Test Quality

- Overall the alignment was judged to be good, although we identified a few specific areas where the depth of knowledge required by the test questions or the clarity of their coverage of targeted standards might be improved.

- We analyzed the consistency with which the CAHSEE essays were scored and found results generally comparable to the immediately prior year and somewhat improved in comparison to previous years.

- We also examined the accuracy of pass-fail decisions based on test scores. Accuracy levels were comparable to results from a similar analysis of a 2007 test form and judged to be acceptable.

- We observed an administration of the CAHSEE in a school with a substantial number of English learners and no significant problems were encountered.

Passing Rates

- Passing rates for students in grade twelve in the Class of 2009 was 90.6 percent, only slightly higher than the corresponding cumulative passing rate for the Class of 2008 last year (90.4 percent). At the same time, cumulative passing rates for grade 12 students with disabilities increased much more significantly, more than 2 percentage points, from 54.5 percent to 56.6 percent.

- Cumulative passing rates for students in grade eleven in the Class of 2010 increased just over a percentage point compared to grade eleven passing rates for the Class of 2009 at the end of grade eleven (from 81.7 percent to 82.9 percent). This was a significant increase and should lead to a continued reduction in the number of seniors who are denied diplomas next year due to the CAHSEE requirement.

- About 69.9 percent of students in grade ten completed the CAHSEE requirement in 2009 compared to 69.2 percent in 2008, reflecting a continued improvement

over earlier years. Grade ten passing rates increased for all demographic groups except for Native American and Pacific Islanders.[2]

- The gap in mathematics course levels widened. More grade ten students had taken (or were taking) geometry or even more advanced mathematics courses. At the same time, the percentage of grade ten students who reported not yet taking Algebra I increased significantly, by about 10 percent.

- Many students from the classes of 2006, 2007, and 2008 who had not passed the CAHSEE continued to test.

Further Analyses of Class of 2008 Students Who Did Not Pass

- CAHSEE and CALPADS exit code information is largely, but not entirely, consistent.

- Relatively few students (about 1 percent) were denied diplomas because of the CAHSEE requirement alone.

- Nearly half of the Class of 2008 students who met all graduation requirements except the CAHSEE continued to try to pass the CAHSEE in 2009.

- Over half of the students in the Class of 2008 who dropped out, left California public education, or failed to graduate for other reasons had already met the CAHSEE requirement.

- The percentage of students coded as receiving a regular high school diploma varied across different demographic groups.

Early Identification of Students Who May Have Difficulty With the CAHSEE Requirement

- Students who may need additional help to pass the CAHSEE were clearly identified in grade seven Standardized Testing and Reporting (STAR) Program California Standards Test (CST) assessment results.

Further Analyses of Results for Students with Disabilities

- About one-quarter of the students receiving special education services require more intensive assistance. These students participate in regular instruction less than 20 percent of the time and only about 10 percent of them pass the CAHSEE during the grade ten.

[2] Throughout this report we use the historical racial/ethnic category names used throughout this evaluation report series. We will convert to updated category names per federal guidelines in the 2011 report cycle: Black or African American. American Indian or Alaska Native, Asian, Filipino, Hispanic or Latino, Native Hawaiian or Pacific Islander. White, and Two or More Races.

- Another quarter of the students we analyzed received other combinations of services and showed mixed results on the CAHSEE.

Testing Accommodations and Modification

- The rate at which students with disabilities received testing accommodations and modifications increased slightly for grade ten students from 2006 to 2009 and increased much more dramatically for grade twelve students.

Score Gains for Grade Eleven and Twelve Students

- Test results for grade eleven and twelve students showed a significant difference between 2006 and 2009. Score gains from grade ten to grade eleven and also from grade eleven to grade twelve were much higher in 2009, signaling a significant improvement in the effectiveness of remedial programs.

Student Perspectives on the CAHSEE

- A higher percentage of grade ten students reported receiving increased help preparing to take the CAHSEE, increased awareness of the importance of the CAHSEE, increased exposure to test topics and questions in their course, and increased intention to stay in school and try to pass again if they did not pass this time.

- African American and Hispanic grade ten students were the ethnic categories most likely to report that the CAHSEE was very important. However, these students, along with American Indian/Alaskan Natives, were the least likely to believe that they would graduate on time and were the most likely to report they would probably not receive a high school diploma.

- Among students with other (non-ethnic) risk factors, English learners were most likely to report that CAHSEE was very important. Students with disabilities and English learners were more likely to take special classes to prepare for the tests than were non-English learners.

- Students with disabilities and English learners were less likely to report that test items and the difficulty of items were similar to what they experienced in their courses.

- Economically disadvantaged (ED) students were less likely than those who were not ED to expect to earn a diploma with the rest of their class. They also were more likely to state that CAHSEE topics were not covered in class and that the items were unfamiliar and more difficult that those they had seen in their course or other tests.

Impact of the CAHSEE Requirement on Instruction

- Approximately three-fourths of schools operated with all or nearly all credentialed teachers in 2009, an increase from 2005.
- Math department heads reported a decrease, compared to 2005, in the percentage of teachers at their schools with more than 5 years of experience.
- Teachers indicated that low student motivation, a lack of prerequisite knowledge, poor attendance, and behavior problems were the leading limitations to course effectiveness.
- The most common suggestion provided by teachers of students with disabilities (SWD) and English learners (EL) for improving students' passing rates was to have more instructional materials available.
- Many teachers were unsure how many of their students had achieved at least *basic* on last year's STAR CST. More teachers of SWD and EL students reported that they had no students or only a few students who had achieved at the basic level compared to ELA or math teachers.
- More than two-thirds of the responding sample of principals, department heads, and teachers reported using the CAHSEE to make changes in the schools' instruction and assessment, and to make overall improvements to the school.

Trends in Other Outcomes

- Official dropout rate calculations indicated that both single-year and four-year dropout rates decreased between 2007 and 2008, overall and for all ethnic categories. However, both dropout metrics revealed that African American students dropped out at a substantially higher rate than every other group, including disadvantaged groups such as EL and SWDs.
- The graduation rate as a percentage of grade nine students increased slightly in 2007 and 2008 while the Elementary and Secondary Education Act (ESEA) rate, which uses the number of graduates plus identified dropouts from grades nine through twelve as its denominator, merely slowed its decline. Just over two-thirds (68.5 percent) of students who entered ninth grade in the fall of 2004 graduated four years later.
- Review of disaggregated ninth-grade-to-graduation rates revealed that only the African American graduation rate declined in 2008 from its 2007 level, widening the gap with other racial/ethnic groups. Graduation rates varied widely, from 54.6 percent among African American students to 92 percent for Asian students.

- Participation in the SAT college entrance examination decreased slightly in the 2007–08 school year. Mean SAT scores increased, but the percentage of students earning a combined score of 1500 or better declined slightly. Both participation and success on the ACT—which had only about a fifth of the participation among California students that the SAT program did —increased.

- Two of California's statewide university systems, the University of California and the California State University, have developed a list of courses known as "A–G courses" that are required for incoming freshmen. One-third of Class of 2008 graduates completed the A–G courses. Rates varied widely among racial/ethnic groups.

- Participation in Advanced Placement examinations increased in 2008, but measures of success on the AP yielded mixed trends.

The Year 9 evaluation report also included several recommendations:

Recommendation 1: California should seek ways to encourage students who do not pass in four years to continue their studies for one or more additional years. The paths of students who do continue should be studied to identify programs that help them succeed.

Recommendation 2: New interventions should be targeted at earlier grades, using test scores to identify students who have fallen behind their classmates and are at risk of failing to meet the CAHSEE requirement.

Recommendation 3: In these tight financial times, districts may need particular help and direction to attract and retain teachers who are experienced and well qualified in the subjects that they teach. District and school efforts to increase coordination across grade levels and between general and special instructional programs should be encouraged and supported.

Recommendation 4: Districts, schools, and individualized education program (IEP) teams should make all possible efforts to provide access to the general curriculum to students with disabilities so that these students can obtain the skills needed to pass the CAHSEE.

Recommendation 5: Curricular goals, possibly including a fifth year of high school, should be studied for English learners who enter U.S. schools during high school. California schools should also find further ways to help English learners who enter U.S. schools prior to high school but continue to have difficulty learning English.

Recommendation 6: The state and districts need to support additional study of non-academic factors that may limit some students' ability to meet

the CAHSEE requirement. Procedures that are effective in overcoming psychological barriers should be identified and disseminated.

Recommendation 7: California schools and districts should find ways to increase graduation rates for low-income and minority students.

Recommendation 8: The SBE should initiate a new review of the CAHSEE content requirements. The SBE should allow at least three years for implementation of changes to the CAHSEE test specifications, including development and field testing of new questions and test forms based on the revised specifications.

Chapter 2: Results from the 2009–10 Administrations

Lauress L. Wise

Introduction

The legislation establishing the CAHSEE called for the first operational forms of the examination to be administered in spring 2001 to grade nine students in the Class of 2004. At the first administration grade nine students could volunteer, but were not required, to take both portions of the examination. Students who did not pass the examination in that administration were required to take the examination as grade ten students in spring 2002. Preliminary results from the CAHSEE spring 2001 and 2002 administrations were reported in the 2001 and 2002 evaluation reports (Wise et al., June 2001; Wise et al., June 2002b). Results from the 2001 administration were reported more fully in the first of the biennial evaluation reports to the Legislature, the Governor, the State Board of Education (SBE), and the California Department of Education (CDE) (Wise et al., Jan. 2002a).

The CAHSEE was administered six more times from July 2002 through May 2003 to students in the Class of 2004 who had not yet passed one or both parts. In addition, students from the Class of 2005 were required to take the CAHSEE for the first time as grade ten students in March or May of 2003. Analyses of results from these administrations were reported in the 2003 evaluation report (Wise, et al., Sep. 2003) and in the second biennial evaluation report (Wise et al., 2004).

Subsequent to the 2002–03 administrations, the requirement to pass the CAHSEE was deferred to the Class of 2006. In the 2003–04 school year, the CAHSEE was modified slightly and administered in spring 2004 to all grade ten students in the Class of 2006. Results from the 2004 administrations were reported in Chapter 2 of the 2004 evaluation report (Wise, et al., Sep. 2004).

The 2004–05 administrations included both grade ten students in the Class of 2007 taking the CAHSEE for the first time and grade eleven students in the Class of 2006 who had not passed the CAHSEE as grade ten students. The grade eleven students took the CAHSEE one or more times in September and November 2004, or February, March, and May 2005. The grade ten students participated in the February, March, or May 2005 administrations. In addition, a small number of adult education students took the CAHSEE during the 2004–05 school year. Analyses of results from the 2004–05 administrations were reported in Chapter 3 of the 2005 evaluation report (Wise, et al., Sep. 2005).

The 2005–06 CAHSEE administrations included grade ten students in the Class of 2008, grade eleven students in the Class of 2007, and grade twelve students in the Class of 2006. Except for students in special education programs who could meet the CAHSEE requirement in other ways, grade twelve students who still had not passed the CAHSEE by the end of the 2005–06 test year were denied diplomas. Analyses of

results from the 2005–06 administrations were reported in Chapter 2 of the 2006 evaluation report (Wise, et al., Sep. 2006).

The 2006–07 CAHSEE administrations were more complex still. Three separate classes of high school students, 2007 through 2009, as well as many students from the Class of 2006 who had not passed the CAHSEE by the end of their senior year, took the tests. Essentially, all Grade ten students in the Class of 2009 were tested for the first time in February, March, or May of 2007. Grade eleven students in the Class of 2008 who had not yet passed the CAHSEE had multiple opportunities to take the CAHSEE in the July, October, November, or December 2006 administrations and in the February, March, or May 2007 administrations. Grade twelve students in the Class of 2007 who still needed to pass the CAHSEE had as many as three opportunities to take the CAHSEE during these same administrations. In addition, many students from the Class of 2006 continued to take the CAHSEE, either as students repeating grade twelve or as adult education students. Analyses of results from the 2006–07 administrations were reported in the 2007 evaluation report (Becker and Watters, 2007).

In 2002, a lawsuit (Kidd et al. vs. O'Connell et al., formerly referred to as the Chapman case) was filed on behalf of students with disabilities. While the suit was pending, the parties agreed that students with disabilities in the classes of 2006 and 2007 could receive a diploma even if they did not pass the CAHSEE, as long as they met all other district and state requirements, although many of these students continued to take the CAHSEE. A final settlement was reached in March 2008 reinstating the requirement that students with disabilities pass the CAHSEE and requiring the Department to conduct a study of students with disabilities who are unable to pass. Analyses of results from the 2007–08 and 2008–09 CAHSEE administrations, including passing rates for students with disabilities in the Classes of 2008 and 2009 were reported in our 2008 and 2009 annual reports (Becker and Watters, 2008; Becker and Watters, 2009). All of these reports are available on the CDE Web site at http://www.cde.ca.gov/ta/tg/hs/evaluations.asp.

Analyses of results from the 2009–10 CAHSEE administrations are organized around four main issues.

1. How many first-time grade twelve students in the Class of 2010 who had not passed the CAHSEE were able to pass in their senior year, and how many did not meet the CAHSEE requirement by June 2010? How did these numbers compare to the results for the classes of 2006 through 2009?

2. How did performance improve for grade eleven students in the Class of 2011 who had not yet passed the CAHSEE and what can we expect for those who have not yet passed by the end of grade eleven? Also, how did improved performance for grade eleven students in the Class of 2010 compare to improvements seen in our previous analyses for grade eleven students in the classes of 2006 through 2010?

3. How did this year's results for grade ten students in the Class of 2012 compare to results for the classes of 2006 through 2011 when those students took the CAHSEE for the first time as grade ten students in 2004 through 2009 respectively?

4. How many students from the classes of 2006 through 2009 who had not met the CAHSEE requirement continued to try to pass the CAHSEE? How many of them passed?

Our analyses answer each of these questions for students in specific demographic categories defined by gender, race/ethnicity, economic disadvantage, and English-learner or special education status. Results for adult education (AE) students are reported briefly, but are not the primary policy focus of these analyses except for adult education students who were previously in the Classes of 2006 through 2009.

Test Result Data

Two sources of data were used to analyze CAHSEE test results. First, following each test administration, we received item-analysis files from the testing contractor, Educational Testing Service (ETS). These data were analyzed and documented in brief reports with cumulative results through each separate administration. These data files contain test item and student questionnaire responses for each student who took the CAHSEE, but do not include corrections to demographic information and may exclude a small number of students whose test results were not processed in time to be included in these files.

The second source was a complete, end-of-year detail file, also supplied by ETS. This file contains preliminary, but not final, corrections to demographic information and included records for additional students not included on the item analysis files. The detail file does not, however, contain responses to individual test questions or to the student questionnaire.

Table 2.1 shows the number of answer-document records in the files received from ETS for each of the 2009–10 CAHSEE administrations[3]. For this report, data from the July 2009 through May 2010 administrations are included. For each CAHSEE test, Table 2.1 also shows the number of answer documents and the number of documents with passing scores, by administration and grade (high school class). The July 2009 CAHSEE administration included grade twelve students and students in AE. The October through December 2009 administrations also included grade eleven students. Tenth grade students were included in the February, March, and May administrations, along with grade eleven and twelve students, and AE students who are still trying to pass. Cumulative passing rates are estimated in this report for current seniors (Class of 2010), juniors (Class of 2011), and sophomores (Class of 2012), as well as students who were previously in the Classes of 2006 through 2009. Passing rates for students in

[3] Note that the data analyzed here are preliminary results prior to review and correction of demographic information by schools and districts.

AE programs are not analyzed further except for those students who were previously in the Classes of 2006 through 2009.

Merging records across and within test administrations was necessary because many students, particularly grade eleven and twelve students, have participated in more than one administration during 2008–09 and a few students used two different answer sheets during the same administration. We also had to merge test results from the 2008–09 administrations with results from prior years to identify students who passed different parts in different test years.

Some students used more than one answer document in the same CAHSEE administration (usually one for the English-language arts [ELA] test and one for the mathematics test), resulting in multiple test records on the ETS files for the same student. In addition, many students participated in more than one administration this year. We matched answer documents within and across the 2009–10 administrations to avoid counting the same student more than once. Table 2.2 shows the resulting estimates of the number of different students participating in one or more of the 2009–10 CAHSEE administrations and the numbers and percentages of these students passing each of the two tests. Note that the number of students passing each test was somewhat fewer after merging the 2009–10 administration data. The primary reason is that nearly 1,500 seniors took and passed the ELA tests in both the October and November administrations and over 1,900 seniors took and passed the mathematics test in both of these same administrations. It appears that the administrations may have been scheduled too closely together, so that students did not receive results from the October administration before deciding to take the examination again in November. There were a few additional discrepancies between Table 2.1 and Table 2.2 because some other students appear to have passed the same test more than once and because some students changed grades during the school year. We corrected grade codes for a small number of students who had more than one answer document and had missing or inconsistent grade codes across different answer documents.

Table 2.1. Number of 2009–10 CAHSEE Answer Documents and Number with Passing Scores by Administration and Grade

Test Date	Grade[1]	Total Answer Sheets	Blank Answer Sheets	ELA		Math	
				Number Taking[2]	Number Passing	Number Taking[2]	Number Passing
Jul-09	11	0	0	0	0	0	0
	12	24,157	5,928	11,983	2,333	11,842	3,460
	Adult Education	4,038	295	2,291	751	2,495	1,027
	Total	28,195	6,223	14,274	3,084	14,337	4,487
Oct-09	11	25,830	2,868	17,087	6,498	17,150	6,152
	12	41,582	5,417	25,118	7,017	25,350	6,962
	Adult Education	3,405	174	2,076	801	2,213	702
	Total	70,817	8,459	44,281	14,316	44,713	13,816
Nov-09	11	107,552	9,479	73,827	30,110	72,611	29,887
	12	59,898	8,027	36,101	10,326	36,731	11,951
	Adult Education	6,381	425	3,975	1,482	3,970	1,402
	Total	173,831	17,931	113,903	41,918	113,312	43,240
Dec-09	11	791	152	406	167	418	162
	12	3,843	985	1,807	398	1,652	366
	Adult Education	1,084	11	649	274	671	242
	Total	5,718	1,148	2,862	839	2,741	770
Feb-10	10	136,151	7,327	125,777	103,650	126,025	100,676
	11	32,142	4,227	20,445	6,837	20,009	5,470
	12	45,069	7,694	25,495	6,734	24,836	5,418
	Adult Education	5,390	465	3,125	1,340	3,404	1,197
	Missing/Invalid[3]	335	8	321	275	321	274
	Total	219,087	19,721	175,163	118,836	174,595	113,035
Mar-10	10	368,154	16,019	344,490	275,657	345,209	278,030
	11	47,729	4,570	31,478	9,554	30,514	8,851
	12	32,504	5,477	18,492	3,651	17,835	3,802
	Adult Education	6,429	300	3,979	1,687	4,326	1,618
	Total	454,816	26,366	398,439	290,549	397,884	292,301
May-10	10	17,409	4,046	9,703	5,515	9,072	4,791
	11	25,204	3,782	15,269	4,730	14,768	3,858
	12	29,392	6,070	15,332	2,975	15,593	2,867
	Adult Education	4,831	361	2,730	1,217	3,080	1,012
	Total	76,836	14,259	43,034	14,437	42,513	12,528
Total All Records		1,029,300	94,107	791,956	483,979	790,095	480,177

[1] 10th grade students are in the Class of 2012, 11th grade students are in the Class of 2011, and 12th grade students are in the Class of 2010.

[2] Students who took a test with a modification are included in the counts of the number of students taking each test but not counted as having passed. Note that in DataQuest these students are not counted as having taken the test.

[3] Missing or invalid grade codes were found on the preliminary file for the February 2010 administration.

Table 2.2. Counts of Unique Students and Passing Rates by Grade Level in the 2009–10 CAHSEE Administrations

Count[1]	Grade			Adult Educa-tion	Missing Grade	Total
	10	11	12			
Total Unique Students	498,187	153,166	105,249	21,117	315	778,034
Blank Answer Documents[2]	15,689	9,428	12,015	1,079	4	38,215
Number Taking ELA	476,733	111,438	61,323	13,368	311	663,173
Number Passing ELA	383,896	57,951	30,631	7,119	270	479,867
Percent Passing ELA	80.5%	52.0%	50.0%	53.3%	86.8%	72.4%
Number Taking Math	476,925	106,471	60,202	14,341	311	658,250
Number Passing Math	382,593	54,525	31,065	6,747	266	475,196
Percent Passing Math	80.2%	51.2%	51.6%	47.0%	85.5%	72.2%

[1] Counts of students passing by grade level differ from those in Table 2.1 because of corrections to inconsistent grade codes across answer documents for the same student and because a number of students appear to have passed the same test more than once. Counts of students taking each test *include* students who took the test with a modification.

[2] Both blank and non-blank answer documents were found for some students. These students were not counted as having blank answer documents in Table 2.2, resulting in slightly lower counts of blank answer documents in comparison to Table 2.1.

We matched the 2009–10 CAHSEE test data to test results from the 2005–06, 2006–07, 2007–08, and 2008–09 CAHSEE administrations. We found matches for 82 percent of the current grade eleven students, 85 percent of the current grade twelve students, and 56 percent of the students currently enrolled in AE programs. Some of the unmatched grade eleven and twelve students were students new to the state. Still others may have been students who had tested previously, but because of differences in the coding of identifying information we were unable to find the matching records.

Table 2.3 shows the relationship of the high school class based on the grade reported last year during 2008–09 testing to the high school class and grade indicated in the 2009–10 test records for students with matching prior-year records. Nearly three-quarters (71 percent) of the Class of 2010 (grade twelve students) testing this year were in the Class of 2010 (grade eleven students) the year before (58,211 of the 81,516 current grade twelve students matched to last year's records). A substantial number (15,282) of students shown as grade twelve students this year were first-time grade twelve students last year (Class of 2009). Many others among this year's examinees were from even earlier high school classes. When grade eleven students and AE students are also included, the count shows 1,419 students who were originally in the Class of 2006, 2,167 who were originally in the Class of 2007, 5,812 who were in the Class of 2008, and 18,968 who were in the Class of 2009.

Table 2.3. Number of 2009–10 Examinees (Excluding Blank Answer Documents) Matched to Prior-Year Records by Current and Prior High School Class

Grade and High School Class in 2008–2009	Grade and High School Class in 2009–2010 School Year					
	Grade 10 (Class of 2012[1])	Grade 11 (Class of 2011)	Grade 12 (Class of 2010[2])	Adult Education	Missing or Invalid	Total Matched
Grade 9 (Class of 2012[1])	475,801	0	0	0	0	475,801
Grade 10 (Class of 2011)	5,518	114,303	3,644	295	0	123,760
Grade 11 (Class of 2010)	592	4,172	58,211	740	0	63,715
Grade 12 (Class of 2009)	126	460	15,282	3,100		18,968
Grade 12 in 2007–08 (Class of 2008)	69	149	3,109	2,494		5,821
Grade 12 in 2006–07 (Class of 2007)	43	40	753	1,331		2,167
Grade 12 in 2005–06 (Class of 2006)	79	39	374	927		1,419
Adult Education	74	81	143	2,208	0	2,506
Missing or Invalid			0	0	0	0
Total Matched	482,302	119,244	81,516	11,095	0	694,157

[1] Current 10th graders not matched to 2008–09 CAHSEE records were assumed to have been in the Class of 2012 last year as well as this year.

[2] Current 12th graders include students previously in the Classes of 2006 through 2009 as well as the Class of 2010.

Note: Shaded cells indicate normal grade progression. Normal progression for 12th grade students who did not pass is either to repeat 12th grade or to enter adult education.

It is important to note that some students were retained in or skipped a grade and thus moved to a different high school class between the 2008–09 and 2009–10 school years. If students who changed to a different class had previously passed only one of the CAHSEE tests, they had to be removed from the prior counts of students passing that test for their original class and added to the corresponding counts for their new class. For this reason, counts of students in a given class who had passed either the ELA or mathematics test in previous years were subject to change. Counts of students who passed both tests did not change, since these students did not participate in further

CAHSEE testing. Some of the students previously meeting the CAHSEE requirement might have changed to a different high school class, but we would have no way of knowing this. We also deleted a few records for students who appeared to be taking a CAHSEE test even though they had already been counted as meeting the CAHSEE requirement.

We corrected all of the CAHSEE records with missing or inconsistent gender or race/ethnicity codes from the 2009–10 CAHSEE administrations. For records with missing or inconsistent gender codes, we assigned the gender most common to their first name. In a very few cases, their first name was not shared with 10 or more others, so we selected a gender code randomly. For records with missing or inconsistent race/ethnicity codes, we assigned the race/ethnicity code with the highest frequency for their first or last name, whichever one had a higher frequency among a single racial/ethnic group. We also corrected inconsistent first and last names by selecting the most frequent first or last name among different names found for a given student. Name corrections did not affect statistical analyses directly but did have some impact on efforts to match student records across administrations and years.

The information in Table 2.4 is significant because students who repeat or skip grades have changed from one high school graduating class to another high school class. For example, repeat grade ten students were in the Class of 2010 last year but are now in the Class of 2011. Many of the results in the tables that follow show changes to passing rate estimates in our 2009 evaluation report due to recalculations reflecting migration of students to a different high school class.

Computing Passing Rates

A key issue in computing and reporting passing rates for the CAHSEE is what to use as the denominator. The two main choices are (a) the number of students who took each test and (b) the number of students subject to the CAHSEE requirement. In this report, as in our prior reports, we have opted for the latter, reporting the proportion of all students in the target populations who have passed. However, the number of students in the target populations fluctuates with daily enrollment changes. Table 2.4 compares fall enrollment counts (reported by DataQuest), enrollment counts from the STAR tests that occurred closer in time to the CAHSEE testing dates, and record counts from the CAHSEE. The CAHSEE is now also being used for grade ten accountability under the federal Elementary and Secondary Education Act (ESEA) requirements. Essentially all students must be tested to meet ESEA participation requirements, so the CAHSEE counts appear to be reasonably complete. We used total CAHSEE record counts in computing grade ten passing rates for this report. STAR reports include the number of students tested in different demographic groups, but do not include separate enrollment counts for these groups.

*Table 2.4. Tenth Grade Enrollment Estimates from California Basic Education Data System (CBEDS), STAR, and CAHSEE**

Source	2002–03	2003–04	2004–05	2005–06	2006–07	2007–08	2008–09	2009–10
Fall enrollment (CBEDS)	471,726	490,465	497,203	515,791	517,873	513,707	509,157	Not yet Avail.
STAR reported enrollment	457,181	475,205	482,164	502,616	500,655	495,912	495,705	497,959
STAR students tested (10th Grade ELA)	427,454	452,242	462,795	482,781	481,950	478,582	479,510	482,334
CAHSEE examinees**	425,066	459,199	470,891	505,045	502,106	493,559	496,688	498,187
Percent of fall enrollment	90.1%	93.6%	94.7%	97.9%	97.0%	96.1%	97.6%	Not yet Avail.

* Note: CBEDS and STAR data were retrieved online through CDE's Dataquest facility at http://dq.cde.ca.gov/dataquest.
**Note. CAHSEE student counts, after merges to remove duplication, were used in computing passing rates. Students with blank answer documents are included in the 10th grade counts.

The denominators used in computing passing rates for grade eleven and twelve students were adjusted to reflect students who moved between high school classes, transferred out of state, or dropped out. The denominator used was the number of students in the class who had passed the CAHSEE in prior years plus the number still taking the CAHSEE during 2009–10. Some of the students who passed in prior years may also have changed classes or dropped out, but were not in our data files because they did not take the CAHSEE again. In the future, the California Longitudinal Pupil Achievement Data System (CALPADS) will provide better data on students who do not participate in further CAHSEE testing, including both those who have passed the CAHSEE and those who have not.

We recognize that excluding students who dropped out before grade twelve from the computation of passing rates may overstate student success in meeting the CAHSEE requirement. There is no way of knowing, however, how many of the students who dropped out might have passed the CAHSEE had they kept trying. The high rate of high school dropouts is a serious and costly problem (Alliance for Excellence, 2007) that is somewhat beyond the scope of the present evaluation. While there is no evidence that the CAHSEE has led to increased dropout rates prior to grade twelve, there is some evidence (described in Chapter 4) that the CAHSEE requirement has prevented or delayed some between one and four percent of seniors from graduating.

The denominators used in computing passing rates for the classes of 2006 through 2009 were unchanged from the numbers estimated during their original senior year. For these classes, we report the number of students not continuing to take the CAHSEE separately, but retain them in the denominator.

Analyses of Test Scores

HumRRO conducted a number of activities to evaluate statistical characteristics of the test scores, including reviewing results from form equating, analyzing the consistency of essay scores generated by independent readers, and observing a CAHSEE administration. More detailed information about the CAHSEE test forms may be found in technical documentation provided by ETS (see www.ets.org/cahsee).

Equating the 2009–10 Test Forms

After each test administration, ETS analyzes item response patterns to determine the exact difficulty of each test question and then equates scores from the new administration to scores from prior test administrations[4]. The result of this equating is a conversion table showing the scale score reported for each number-correct (raw) score. The equated scale scores for a given number-correct score vary slightly across test forms, reflecting slight differences in the difficulty of achieving the number-correct score on each of the test forms. In 2007, HumRRO independently replicated ETS' equating analyses for one administration (Wise & Rui, 2007) and found exact agreement. Given this confirmation of the equating process, it was not deemed necessary to repeat independent equating checks for each subsequent administration. We did, however, examine the resulting score conversion tables for each administration to assess the degree of consistency across different test forms. Tables 2.6 and 2.7 show the raw-to-scale score conversions used for each of the 2009–10 test forms.

For mathematics, a student guessing at random will average 20 correct responses corresponding to scale scores ranging from 304 to 310. Guessing is less of an issue with the ELA test because of the substantial weight given to the essay. The number of correct items needed to reach a score of 350 and pass varies from 41 to 44 for mathematics. The number of correct answers needed to reach a score of 380 and be judged proficient for accountability purposes varies from 57 to 59 for mathematics.

[4] Equating is necessary to compensate for minor differences in difficulty in the forms used in different CAHSEE administrations.

Table 2.5. Raw-to-Scale Score Conversions for the 2009–10 ELA Tests

Raw Score	Scale Score							Raw Score	Scale Score						
	Jul 09	Oct 09	Nov 09	Dec 09	Feb 10	Mar 10	May 10		Jul 09	Oct 09	Nov 09	Dec 09	Feb 10	Mar 10	May 10
0-15	275	275	275	275	275	275	275	51	341	340	343	338	342	340	345
16	275	275	275	275	275	275	277	52	343	342	344	340	344	342	346
17	275	275	275	275	275	275	279	53	345	344	346	342	346	344	348
18	**276**	**276**	**277**	**275**	**276**	**276**	**281**	54	347	346	348	344	348	346	350
19	278	278	279	277	278	278	283	55	349	349	350	346	350	348	352
20	280	280	281	279	281	280	285	56	351	351	352	348	352	350	354
21	282	282	284	281	283	282	287	57	353	353	355	350	355	352	356
22	284	284	286	283	285	284	289	58	355	355	357	352	357	354	358
23	286	286	288	285	287	286	291	59	357	357	359	354	359	357	360
24	288	288	290	287	289	288	293	60	359	359	361	356	361	359	362
25	290	290	292	289	291	290	295	61	361	361	363	358	363	361	364
26	292	292	294	291	293	292	297	62	364	364	365	360	366	363	367
27	294	294	296	293	295	294	299	63	366	366	367	363	368	366	369
28	296	296	298	294	297	296	301	64	368	368	370	365	370	368	371
29	298	298	300	296	299	298	303	65	370	371	372	367	373	370	373
30	300	300	302	298	301	299	305	66	373	373	374	370	375	373	376
31	302	302	304	300	303	301	307	67	375	376	377	372	378	376	378
32	304	303	306	302	305	303	309	68	378	378	379	374	381	378	380
33	306	305	308	304	307	305	311	69	381	381	382	377	383	381	383
34	308	307	310	306	309	307	313	70	383	384	384	380	386	384	385
35	310	309	312	307	310	309	315	71	386	386	387	382	389	387	388
36	311	311	313	309	312	311	316	72	389	389	390	385	392	390	391
37	313	313	315	311	314	313	318	73	392	392	393	388	395	393	394
38	315	315	317	313	316	315	320	74	395	396	396	391	398	396	397
39	317	317	319	315	318	317	322	75	398	399	399	394	402	400	400
40	319	319	321	317	320	318	324	76	402	402	402	398	405	403	403
41	321	321	323	319	322	320	326	77	406	406	406	401	409	407	407
42	323	323	325	321	324	322	328	78	409	410	410	405	413	411	411
43	325	325	327	322	326	324	330	79	414	414	414	409	418	416	415
44	327	327	329	324	328	326	331	80	418	419	418	414	422	421	419
45	329	329	331	326	330	328	333	81	423	423	423	419	427	426	424
46	331	330	333	328	332	330	335	82	428	429	428	424	433	432	429
47	333	332	335	330	334	332	337	83	434	434	433	430	439	438	434
48	335	334	337	332	336	334	339	84	440	441	439	437	445	446	441
49	337	336	339	334	338	336	341	85	447	448	446	444	450	450	448
50	339	338	341	336	340	338	343	86-90	450	450	450	450	450	450	450

Note. Shaded numbers reflect minimum scores for passing the diploma requirement (the first [blue]) shaded number in each column) and for proficiency as used in school accountability (the second [yellow] shaded number); bold underlined scale scores indicate expected scores from guessing alone (chance).

Table 2.7. Raw-to-Scale Score Conversions for the 2009–10 Mathematics Tests

Raw Score	Scale Score							Raw Score	Scale Score						
	Jul 09	Oct 09	Nov 09	Dec 09	Feb 10	Mar 10	May 10		Jul 09	Oct 09	Nov 09	Dec 09	Feb 10	Mar 10	May 10
0-8	275	275	275	275	275	275	275	43	355	351	352	349	348	352	350
9	276	275	275	275	275	275	275	44	356	353	354	351	350	354	351
10	280	277	279	.	275	279	277	45	358	355	356	352	352	356	353
11	284	281	283	280	.	282	280	46	360	356	358	354	354	358	355
12	288	284	286	.	282	286	284	47	362	358	359	356	356	360	357
13	291	288	290	286	285	289	287	48	364	360	361	358	358	361	359
14	294	291	293	289	288	292	290	49	365	362	363	360	359	363	360
15	297	294	296	292	291	295	293	50	367	364	365	362	361	365	362
16	300	297	298	295	294	298	296	51	369	366	367	364	363	367	364
17	303	299	301	298	297	300	298	52	371	368	369	365	365	369	366
18	305	302	304	300	299	303	301	53	373	370	371	367	367	371	368
19	308	304	306	303	302	305	303	54	375	372	373	369	369	373	370
20	**310**	**307**	**308**	**305**	**304**	**308**	**306**	55	377	374	375	371	371	375	372
21	312	309	311	307	306	310	308	56	379	376	377	373	373	377	374
22	315	311	313	309	309	312	310	57	381	378	379	376	375	379	376
23	317	313	315	312	311	315	312	58	384	380	381	378	378	382	378
24	319	315	317	314	313	317	314	59	386	382	383	380	380	384	381
25	321	318	319	316	315	319	316	60	388	385	385	382	382	386	383
26	323	320	321	318	317	321	318	61	391	387	388	384	384	389	385
27	325	322	323	320	319	323	320	62	393	389	390	387	387	391	388
28	327	324	325	322	321	325	322	63	396	392	393	389	389	394	390
29	329	325	327	324	323	327	324	64	398	394	395	392	392	396	393
30	331	327	329	326	325	329	326	65	401	397	398	395	395	399	396
31	333	329	331	327	327	330	328	66	404	400	401	398	398	402	399
32	335	331	333	329	329	332	330	67	407	403	404	401	401	405	402
33	336	333	335	331	330	334	332	68	410	406	407	404	404	408	405
34	338	335	336	333	332	336	334	69	414	410	410	407	408	412	408
35	340	337	338	335	334	338	335	70	417	414	414	411	411	416	412
36	342	338	340	336	336	340	337	71	422	418	418	415	415	420	416
37	344	340	342	338	338	341	339	72	426	422	422	420	420	424	421
38	346	342	344	340	340	343	341	73	431	427	427	424	425	429	426
39	347	344	345	342	341	345	343	74	437	433	433	430	430	435	431
40	349	346	347	344	343	347	344	75	443	439	439	437	437	442	438
41	351	347	349	345	345	349	346	76	450	447	447	444	445	450	446
42	353	349	351	347	347	350	348	77-80	450	450	450	450	450	450	450

Note. Shaded numbers reflect minimum scores for passing the diploma requirement (the first [blue] shaded number in each column) and for proficiency as used in school accountability (the second [yellow] shaded number); underlined scale scores indicate expected scores from guessing alone (chance).

Consistency in Scoring the Essays

Here we once again analyzed the degree of consistency in the scoring of student essays for all the CAHSEE administrations from 2000 to 2010. Prior to the 2003–04 school year each student taking the ELA test was required to write two essays, the first involving analysis of an associated text and the second in response to a freestanding question that did not involve text processing. Beginning in 2004, the ELA test was shortened and students were required to write only one essay. In the 2004–05 test year the type of essay prompt varied across administrations. In the 2005–06 through 2009–10 testing years, stand-alone prompts were used in each administration.

As in prior years, each essay was graded by at least two different raters using a four-point rubric that indicated the essay response characteristics required for each score level. Four was the highest score; a score of zero was assigned to responses that were off-topic, illegible, or left blank. Since the scoring rubrics vary from question to question and different questions were asked in different administrations, we monitored the level of agreement between independent raters for the question used with each administration. Table 2.8 shows, for the 2009–10 test forms and for test forms from prior years: (a) how often (what percent of the time) there was exact agreement, (b) how often there was a difference of just one score point, and (c) how often there was a difference of more than one score point. Whenever there was an initial difference of more than one score point, the essay was read again by a third, more experienced reader and, if necessary, a fourth so that all operational scores resulted from two raters who agreed to within a single score point.

This year, we again analyzed scoring consistency separately for grade ten, eleven, and twelve students. While the questions and the scoring process were identical for these groups, the quality of the papers they produced was not. Tenth grade students generated many more essays rated as 3 or 4 in comparison to grade eleven and twelve students, all of whom had not passed when they were in grade ten. The greater range of scores increases the possibility that raters may disagree by more than one point leading to lower agreement rates for the grade ten essays.

Overall, the frequency of significant disagreements (more than one score point) was about the same in 2009–10 as it was in 2008–09 at each grade level. The exact agreement rate for grade ten dropped very slightly from 66.9 to 66.6 percent. The exact agreement rate for grade eleven also dropped very slightly from 77.4 to 77.1 percent, but the agreement rate for grade twelve rose a bit more significantly, from 79.5 to 80.0 percent. In all cases, the agreement rates remained substantially higher than the rates for the 2005–06 CAHSEE administrations. Previously, we suggested targets of at least 70 percent exact agreement with no more than 0.5 percent disagreement by more than one score point. ETS did not quite meet these targets in the 2009–10 testing year at the grade ten level, but overall results were improved slightly and were quite acceptable. Still, ETS may wish to review their scorer training and monitoring processes to see if further improvements are possible.

Table 2.8. Scoring Consistency for Student Essays

Admin.	10th Grade Percent Exact Agreement	10th Grade Percent +/- 1 Score Point	10th Grade Percent > 1 Score Point	11th Grade Percent Exact Agreement	11th Grade Percent +/- 1 Score Point	11th Grade Percent > 1 Score Point	12th Grade Percent Exact Agreement	12th Grade Percent +/- 1 Score Point	12th Grade Percent > 1 Score Point
All 2004–05	66.5	32.6	0.9	70.3	28.8	0.9	-	-	-
All 2005–06	66.9	32.4	0.7	73.5	26.1	0.4	73.6	26.0	0.4
All 2006–07	69.9	29.7	0.4	77.4	22.5	0.2	77.7	22.0	0.3
All 2007–08	67.2	31.9	0.9	76.8	22.8	0.4	77.9	21.7	0.4
All 2008–09	66.9	32.3	0.8	77.4	22.3	0.3	79.5	20.2	0.3
July 2009	n/a	n/a	n/a	n/a	n/a	n/a	82.0	17.9	0.1
October 2009	n/a	n/a	n/a	79.8	20.1	0.1	81.7	18.2	0.1
November 2009	n/a	n/a	n/a	75.5	24.2	0.3	77.8	21.9	0.3
December 2009	n/a	n/a	n/a	77.0	22.5	0.5	83.6	16.4	0.1
February 20010	65.3	33.7	1	77.2	22.6	0.3	78.7	21.0	0.3
March 2010	66.9	32.4	0.7	80.0	19.8	0.2	81.7	18.2	0.2
May 2010	71.0	28.4	0.6	75.6	24.1	0.3	80.8	19.0	0.2
All 2009–10	66.6	32.6	0.8	77.1	22.7	0.2	80.0	19.8	0.2

Tables 2.9 and 2.10 provide more detailed information on scores assigned by each of the two independent raters for grade ten students in the 2009–09 administrations and in the 2009–10 administrations respectively. There was perfect agreement on the essays judged to be unscorable (score level 0). There was generally good agreement on essays assigned to score levels 1 through 3. If the first reader assigned a score at one of these levels, the second reader was most likely to assign the same score. Agreement at the highest level was lower than at other levels. If the first reader assigned a score of 4, the second reader was most likely to assign a score of 3. Nearly all of the serious (more than 1 point) disagreements involved one rater assigning a score of 2 and the other a score of 4. The average ratings were 2.5 for both years and the pattern of disagreement between independent raters was very similar.

Table 2.9. Percentage of 10th Grade Essays Assigned Each Score Level by Each Rater in the February Through May 2009 Administrations

	Second Rater				
First Rater	0	1	2	3	4
0	**1.20**	0.00	0.00	0.00	0.00
1	0.00	**1.15**	0.76	0.01	0.00
2	0.00	0.74	**33.99**	11.72	0.35
3	0.00	0.01	11.72	**28.05**	3.63
4	0.00	0.00	0.39	3.72	**2.54**
Average score from first rater					2.5
Average score from second rater					2.5
Percent Exact Agreement (sum of diagonal elements)					66.9
Percent with differences greater than one point					0.8

Note. Bolded numbers indicate perfect agreement between the two raters.

Table 2.10. Percentage of 10th Grade Essays Assigned Each Score Level by Each Rater in the February Through May 2010 Administrations

	Second Rater				
First Rater	0	1	2	3	4
0	**1.01**	0.00	0.00	0.00	0.00
1	0.00	**1.21**	0.77	0.01	0.00
2	0.00	0.75	**36.52**	12.19	0.38
3	0.00	0.01	12.13	**25.31**	3.43
4	0.00	0.00	0.39	3.35	**2.53**
Average score from first rater					2.5
Average score from second rater					2.5
Percent Exact Agreement (sum of diagonal elements)					66.6
Percent with differences greater than one point					0.8

Note. Bolded numbers indicate perfect agreement between the two raters.

Test Administration

HumRRO observed the ELA session and collected information about the mathematics session of the May 2010 test administration at a Central Coast California high school. Key findings from our observation included:

- **Participation**. Table 2.11 shows the number of students in each grade scheduled to take or repeat the ELA and mathematics test and the number of students who did not show up to test ("No-shows"). Of the 46 grade twelve students taking the test, 7 students had satisfied all other graduation requirements and needed only to pass one or both CAHSEE subject areas to earn a diploma. Twenty-five students needed to pass only ELA, 13 needed to pass only mathematics, and 8 needed to pass both ELA and mathematics. Of the grade twelve students taking the ELA, 10 had IEPs and 31 were English language learners. Of the grade twelve students taking mathematics, 12 had IEPs and 16 were English language learners.

Table 2.11. Number of Students Scheduled Versus Present for ELA and Mathematics Test

Test	Gr. 10		Gr. 11		Gr. 12		Total Number Scheduled	Total No-shows
	Number of students scheduled	No-shows	Number of students scheduled	No-shows	Number of students scheduled	No - shows		
ELA	12	6	106	20	33	7	151	33
Mathematics	18	5	76	19	21	5	115	29

- **Materials.** Testing materials arrived the Friday before testing and were inventoried the day before testing. One large print ELA test booklet requested by the Test Coordinator was not with the shipment, and the student with disabilities needing this test was instead given the test orally.

- **Security.** Test materials were stored in a secure, locked location with access restricted to the Test Coordinator (an assistant principal) and the other school administrators (principal, three other assistant principals, and the school office manager). All staff working with the test materials, including school faculty and substitute teachers, signed the Test Security Affidavit. During the 10-minute test administration break, students remained in the testing room and the Testing Coordinator brought snacks to the room for them.

- **Training.** The Test Coordinator and his assistant attended a district-level training prior to the October 2009 CAHSEE administration. The Test Coordinator conducted a half-hour training of proctors just prior to the test administration in October 2009, reviewing with them the district information and the test administration steps he listed on a Proctor Checklist. The May 2010 proctors were chosen for their prior experience administering the CAHSEE and were given a printed schedule and the Proctor Checklist. The ETS video was not shown, and the Test Coordinator was not aware of this video.

- **Communication with Students.** Two weeks before the May 2010 testing, the Test Coordinator posted in several places around the school a list of students needing to take the test along with their testing room number. School counselors sent reminder notices to all testing students and met individually with each grade twelve student who had not yet passed one or both subject areas. The Test Coordinator scheduled all grade twelve students who had not passed the test(s) they took in November 2009 (though many had taken the March 2010 test) for the May administration. The Test Coordinator received the March 2010 results from his district the day before the May administration; he personally informed seniors who passed that they did not need to take the test again after all. All students were notified about CAHSEE testing in their classrooms over the morning video announcements the day of the test. All certificated teachers were informed about the students who would be testing. Information about the CAHSEE and school testing dates was also posted on the school website.

- **Administration.** The school library and six classrooms were used as testing rooms. The observed testing classroom was adequate in terms of size, ventilation, and furnishings. No outside visitors were allowed in the testing rooms, other than the HumRRO observer. The Test Coordinator assigned a special education teacher who spoke Spanish to proctor the observed group, which consisted solely of students with disabilities; many of the observed students were also English-language learners. Regarding timing of the test sessions, the proctor read aloud the ELA Session 2 directions after the break and told students to complete Session 2 first before going back to finish Session 1. Several students were given extra time for the ELA test.

- **Accommodations.** EL students who needed the read-aloud in English accommodation tested in a small group in a separate room. The student with disabilities who was to have had a large print test booklet accommodation was instead assigned a proctor to read aloud the test questions because the booklet was not included with the school's test materials.

- **Student Motivation.** For the most part, students approached the tests seriously and appeared to be concentrating on their work and quietly responding to CAHSEE questions. The observed testing room included many EL students who were given glossaries, but they did not appear to be using them. One student appeared to be sleeping, but seemed engaged in the test after the snack was served.

The Test Coordinator indicated that pre-printed labels are purchased for the March administration at this school but not for the May administration, requiring students to bubble in the information. He suggested one area where improvements to the examiner script could be made:

- **The Directions for Administration Manual** included almost identical language in the read-aloud instructions for filling in the Local Student ID Number and Student School ID. Some students therefore incorrectly recorded their local number in both places of the answer document.

The Test Coordinator also indicated to the observer some areas of frustration in preparing for the CAHSEE administration and expressed concern about the lack of advance information and support from his district office:

- It takes about two weeks for the Test Coordinator to arrange for the logistics of testing. The lack of accurate and current data about which students have not yet passed each section of the test means he needs to make plans on outdated information. He then must adjust his plans when he receives district information at the last minute (e.g., had to notify senior students who had passed the March 2010 administration and therefore didn't need to test again, had to adjust his testing rooms).

- The district uses its data (rather than the Test Coordinator's school-level counts) to place the order with ETS for testing materials, yet the district data often is not up-to-date. For example, for this administration more than ten grade eleven students who had recently transferred to his school were not accounted for in the materials sent by the district. When there are discrepancies between school and district inventory counts, the Test Coordinator believes the school is being unfairly blamed.

- Testing materials arrive so close to the actual testing date that errors in inventory may not always be corrected in time (e.g., the missing large print booklet).

- The district recently began using "E School Plus" software that this Test Coordinator finds cumbersome and time-consuming to use. He and his assistant spend much time analyzing data they are given from the district, because it is not in usable form. He would prefer being given data that is already filtered and ready for him to act on, rather than just output from a query.

The Test Coordinator also noted several procedures followed in his district with regard to the CAHSEE requirement:

- Letters about the CAHSEE requirement are mailed to all students' homes from the district.

- Counselors meet with each student and his/her parents to inform them that the student needs to pass both CAHSEE tests to satisfy the state's diploma requirements and to be able to participate in the end-of-year June graduation ceremony.

- Grade twelve students who did not achieve passing results on the CAHSEE prior to graduation but did pass the May administration would be able to participate in a special graduation ceremony held in the summer. Grade twelve students who did not pass the May administration would be able to take the test again in July.

Overall, the CAHSEE test administration was conducted in accordance with standard procedures, and no significant problems were observed. Test security was maintained, and all students completed testing without incident, with the exception of the one special education student who was not provided with the requested large-print accommodation. In the future, ETS may want to review instructions for filling in the Local Student ID Number and the Student School ID to clarify the distinction between these two fields on the student answer sheet. In addition, to reduce the burden of testing on school personnel and increase the efficiency of scheduling students for testing, it might be worthwhile to investigate how to improve support from the district office.

Test Results

Class of 2010 – This Year's Seniors Struggle to Meet Graduation Deadline

HumRRO worked with CDE to analyze test results for seniors after each of the 2009–10 administrations. Unlike students in the Classes of 2008 and 2009, students with disabilities in the Class of 2010 received an exemption from the CAHSEE requirements while a panel of experts and the SBE considered alternative ways that they might demonstrate mastery of the CAHSEE requirements (see Chapter 5). Because students with disability received exemptions in some years (2006, 2007, and 2010) and not others (2008 and 2009), the different tables are needed for comparison of this year's results to those of prior years. We provide tables that include and tables that exclude students with disabilities from all demographic categories. Results for students with disabilities shown on the last line of each table are identical across the two types of tables.

Tables 2.12 through 2.17 show cumulative passing rates for students in the Class of 2010, this year's first-time seniors. In the primary tables, students with disabilities are excluded from all rows except the last row, due to the exemption currently reinstated for these students. To avoid duplication, students who had been seniors in 2006, 2007, 2008, or 2009 were included in the counts for the classes of 2006 through 2009 (Tables 2.35 through 2.52 below) and excluded from the counts in Tables 2.12 through 2.17. We also provide an alternative to each table where students with disabilities are included in all rows, allowing for direct comparison to prior-year results in some cases.

In computing the estimates shown in these tables, adjustments were made to previous estimates of the numbers who had passed each part in prior years.

- We removed students who appeared to shift from the Class of 2010 to a different high school class, because they were retained in grade eleven between the 2008–09 and 2009–10 school years or, in a few cases, dropped back to grade ten.

- We added in a few students who joined the target class because of grade skipping (from grade ten in the 2008–09 school year to grade twelve in the 2009–10 school year). We did not, however, add students from the Class of 2009 who were retained in grade twelve. These students are included in the tables below for the Classes of 2006 through 2009. **Adding students moving into the Class of 2010 may have increased the number of students in the class who had passed one but not both parts of the CAHSEE by May 2009.**

- Finally, we removed students from the classes of 2010 and 2011 who had not passed both parts, but were not matched to a test record from the July 2009–May 2010 administrations. We also included a small number of grade twelve students who participated in the 2009–10 administrations but could not be

matched to any prior records. Most of these students were most likely new to the state, although some were students who could not be matched to their prior records because of coding errors in key student identifiers.

The most important values in the tables that follow, we believe, are the estimates of the numbers of students who have not yet passed either or both parts of the CAHSEE. The percentages shown are subject to some debate due to differences of opinion as to the appropriate denominator (the base for computing the percentages). For example, students who passed the CAHSEE, but subsequently left the state or dropped out are included in the denominator, since we have no basis for estimating the number of such students. Students who are still trying to pass the CAHSEE are also included in the denominator.

Table 2.12. Estimated Number and Percentage of Students in the Class of 2010[1] Passing Both Parts of the CAHSEE Through May 2010, Excluding Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Passed	Not Passed	Not Tested[2]	Passed	Not Yet Passed	Percent Pass
All Students	389,222	72,542	31,002	25,142	16,398	420,224	25,142	94.4%
Females	198,022	34,260	15,564	11,749	6,947	213,586	11,749	94.8%
Males	191,200	38,282	15,438	13,393	9,451	206,638	13,393	93.9%
Native American	3,146	574	227	162	185	3,373	162	95.4%
Asian	41,131	3,753	2,027	1,159	567	43,158	1,159	97.4%
Pacific Islander	2,756	506	212	147	147	2,968	147	95.3%
Filipino	13,134	973	540	261	172	13,674	261	98.1%
Hispanic	164,920	46,530	19,009	17,210	10,311	183,929	17,210	91.4%
African American	25,972	9,167	3,561	3,441	2,165	29,533	3,441	89.6%
White, non-Hispanic	138,035	11,039	5,426	2,762	2,851	143,461	2,762	98.1%
Economically Disadvantaged	159,675	45,786	18,751	16,982	10,053	178,426	16,982	91.3%
English Learner	38,586	29,326	11,346	11,736	6,244	49,932	11,736	81.0%
Reclassified Fluent English	79,688	5,144	3,086	1,261	797	82,774	1,261	98.5%
Special Education	14,345	29,082	4,138	16,170	8,774	18,483	16,170	53.3%

[1] Current grade twelve students who also tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007), 2007–08 (Class of 2008), or 2008–09 (Class of 2009) are ***excluded*** from this table. Current grade twelve students who tested as grade ten students last year have been moved into counts for the Class of 2010 and are included here along with students who tested as grade eleven students last year. Students in special education programs are ***excluded*** from all rows except the last row.

[2] Students who have not passed and are not continuing to try to pass have been dropped from the cumulative totals.

Explanation of table contents: The next several tables except for 18 and 25 are formatted the same as Table 2.12 above. Line 1 shows that by May of 2009, 389,222 students now in the Class of 2010 who were not in special education classes had passed the CAHSEE and 72,542 had not. So far this year, 31,002 of the students who had not passed by May 2009 completed the CAHSEE requirement. Another 25,142 of these students took the CAHSEE, but have not yet passed both parts. An estimated 16,398 Class of 2010 students who had not passed by May 2009 did not participate in any of the 2009–10 administrations. Overall, we estimate that 420,224 general education students in the Class of 2010 have now passed the CAHSEE, which is 94.4 percent of the general education students in the Class of 2010 after adjusting for students moving into and out of this class.

For the Class of 2010, approximately 20,000 special education students and 56,000 general education students took the CAHSEE during the 2009–10 school year. Over half (55 percent) of the general education students and approximately 20 percent of the students in special education completed their CAHSEE requirement. This leaves just over 25,000 general education students and about 16,000 special education students in the Class of 2010 who are continuing to try to meet the CAHSEE requirement but have not yet done so.

Table 2.13. Estimated Number and Percentage of Students in the Class of 2010[1] Passing Both CAHSEE Tests Through May 2010, Including Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Passed	Not Passed	Not Tested[2]	Passed	Not Yet Passed	Percent Pass
All Students	403,567	101,624	35,140	41,312	25,172	438,707	41,312	91.4%
Females	202,413	44,734	17,126	17,672	9,936	219,539	17,672	92.6%
Males	201,154	56,890	18,014	23,640	15,236	219,168	23,640	90.3%
Native American	3,313	828	248	281	299	3,561	281	92.7%
Asian	41,763	4,734	2,263	1,665	806	44,026	1,665	96.4%
Pacific Islander	2,824	647	235	215	197	3,059	215	93.4%
Filipino	13,324	1,261	578	385	298	13,902	385	97.3%
Hispanic	170,135	62,765	21,474	26,659	14,632	191,609	26,659	87.8%
African American	27,127	13,596	3,972	6,007	3,617	31,099	6,007	83.8%
White, non-Hispanic	144,947	17,793	6,370	6,100	5,323	151,317	6,100	96.1%
Economically Disadvantaged	165,389	63,894	21,325	27,492	15,077	186,714	27,492	87.2%
English Learner	40,593	39,676	13,182	17,846	8,648	53,775	17,846	75.1%
Reclassified Fluent English	80,873	6,166	3,316	1,775	1,075	84,189	1,775	97.9%
Special Education	14,345	29,082	4,138	16,170	8,774	18,483	16,170	53.3%

[1] Current grade twelve students who also tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007), 2007–08 (Class of 2008), or 2008–09 (Class of 2009) are ***excluded*** from this table. Current grade twelve students who tested as grade ten students last year have been moved into counts for the Class of 2010 and are included here along with students who tested as grade eleven students last year. Students in special education programs are ***included*** in all rows.

[2] Students who have not passed and are not continuing to try to pass have been dropped from the cumulative totals.

Table 2.14. Estimated Number and Percentage of Students in the Class of 2010[1] Passing the CAHSEE ELA Test Through May 2010, Excluding Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Passed	Not Passed	Not Tested[2]	Passed	Not Passed	Percent Pass
All Students	405,590	56,174	23,767	16,009	16,398	429,357	16,009	96.4%
Females	208,105	24,177	10,804	6,426	6,947	218,909	6,426	97.1%
Males	197,485	31,997	12,963	9,583	9,451	210,448	9,583	95.6%
Native American	3,245	475	204	86	185	3,449	86	97.6%
Asian	41,431	3,453	1,881	1,005	567	43,312	1,005	97.7%
Pacific Islander	2,830	432	177	108	147	3,007	108	96.5%
Filipino	13,316	791	436	183	172	13,752	183	98.7%
Hispanic	175,677	35,773	14,221	11,241	10,311	189,898	11,241	94.4%
African American	28,495	6,644	2,620	1,859	2,165	31,115	1,859	94.4%
White, non-Hispanic	140,468	8,606	4,228	1,527	2,851	144,696	1,527	99.0%
Economically Disadvantaged	169,942	35,519	14,206	11,260	10,053	184,148	11,260	94.2%
English Learner	42,864	25,048	9,796	9,008	6,244	52,660	9,008	85.4%
Reclassified Fluent English	82,081	2,751	1,473	481	797	83,554	481	99.4%
Special Education	18,045	25,382	4,384	12,224	8,774	22,429	12,224	64.7%

[1] Current grade twelve students who also tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007), 2007–08 (Class of 2008), or 2008–09 (Class of 2009) are ***excluded*** from this table. Current grade twelve students who tested as grade ten students last year have been moved into counts for the Class of 2010 and are included here along with students who tested as grade eleven students last year. Students in special education programs are ***excluded*** from all rows except the last row.

[2] Students who have not passed and are not continuing to try to pass have been dropped from the cumulative totals.

Table 2.15. Estimated Number and Percentage of Students in the Class of 2010[1] Passing the CAHSEE ELA Test Through May 2010, Including Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Passed	Not Passed	Not Tested[2]	Passed	Not Passed	Percent Pass
All Students	423,635	81,556	28,151	28,233	25,172	451,786	28,233	94.1%
Females	214,157	32,990	12,499	10,555	9,936	226,656	10,555	95.6%
Males	209,478	48,566	15,652	17,678	15,236	225,130	17,678	92.7%
Native American	3,448	693	232	162	299	3,680	162	95.8%
Asian	42,121	4,376	2,123	1,447	806	44,244	1,447	96.8%
Pacific Islander	2,910	561	199	165	197	3,109	165	95.0%
Filipino	13,530	1,055	475	282	298	14,005	282	98.0%
Hispanic	182,702	50,198	16,840	18,726	14,632	199,542	18,726	91.4%
African American	30,221	10,502	3,123	3,762	3,617	33,344	3,762	89.9%
White, non-Hispanic	148,569	14,171	5,159	3,689	5,323	153,728	3,689	97.7%
Economically Disadvantaged	177,612	51,671	16,986	19,608	15,077	194,598	19,608	90.8%
English Learner	45,649	34,620	11,739	14,233	8,648	57,388	14,233	80.1%
Reclassified Fluent English	83,508	3,531	1,662	794	1,075	85,170	794	99.1%
Special Education	18,045	25,382	4,384	12,224	8,774	22,429	12,224	64.7%

[1] Current grade twelve students who also tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007), 2007–08 (Class of 2008), or 2008–09 (Class of 2009) are ***excluded*** from this table. Current grade twelve students who tested as grade ten students last year have been moved into counts for the Class of 2010 and are included here along with students who tested as grade eleven students last year. Students in special education programs are ***included*** in all rows.

[2] Students who have not passed and are not continuing to try to pass have been dropped from the cumulative totals.

Table 2.16. Estimated Number and Percentage of Students in the Class of 2010[1] Passing the CAHSEE Mathematics Test Through May 2010, Excluding Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Passed	Not Passed	Not Tested[2]	Passed	Not Passed	Percent Pass
All Students	403,070	58,694	24,659	17,637	16,398	427,729	17,637	96.0%
Females	203,330	28,952	13,047	8,958	6,947	216,377	8,958	96.0%
Males	199,740	29,742	11,612	8,679	9,451	211,352	8,679	96.1%
Native American	3,208	512	197	130	185	3,405	130	96.3%
Asian	42,655	2,229	1,297	365	567	43,952	365	99.2%
Pacific Islander	2,843	419	177	95	147	3,020	95	97.0%
Filipino	13,357	750	420	158	172	13,777	158	98.9%
Hispanic	174,428	37,022	14,737	11,974	10,311	189,165	11,974	94.0%
African American	26,998	8,141	3,117	2,859	2,165	30,115	2,859	91.3%
White, non-Hispanic	139,453	9,621	4,714	2,056	2,851	144,167	2,056	98.6%
Economically Disadvantaged	169,771	35,690	14,057	11,580	10,053	183,828	11,580	94.1%
English Learner	46,942	20,970	7,873	6,853	6,244	54,815	6,853	88.9%
Reclassified Fluent English	80,688	4,144	2,353	994	797	83,041	994	98.8%
Special Education	18,078	25,349	4,028	12,547	8,774	22,106	12,547	63.8%

[1] Current grade twelve students who also tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007), 2007–08 (Class of 2008), or 2008–09 (Class of 2009) are ***excluded*** from this table. Current grade twelve students who tested as grade ten students last year have been moved into counts for the Class of 2010 and are included here along with students who tested as grade eleven students last year. Students in special education programs are ***excluded*** from all rows except the last row.

[2] Students who have not passed and are not continuing to try to pass have been dropped from the cumulative totals.

Table 2.17. Estimated Number and Percentage of Students in the Class of 2010[1] Passing the CAHSEE Mathematics Test Through May 2010, Including Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Passed	Not Passed	Not Tested[2]	Passed	Not Passed	Percent Pass
All Students	421,148	84,043	28,687	30,184	25,172	449,835	30,184	93.7%
Females	208,890	38,257	14,525	13,796	9,936	223,415	13,796	94.2%
Males	212,258	45,786	14,162	16,388	15,236	226,420	16,388	93.3%
Native American	3,389	752	221	232	299	3,610	232	94.0%
Asian	43,557	2,940	1,488	646	806	45,045	646	98.6%
Pacific Islander	2,928	543	194	152	197	3,122	152	95.4%
Filipino	13,589	996	456	242	298	14,045	242	98.3%
Hispanic	181,998	50,902	17,147	19,123	14,632	199,145	19,123	91.2%
African American	28,461	12,262	3,583	5,062	3,617	32,044	5,062	86.4%
White, non-Hispanic	147,092	15,648	5,598	4,727	5,323	152,690	4,727	97.0%
Economically Disadvantaged	178,003	51,280	16,576	19,627	15,077	194,579	19,627	90.8%
English Learner	50,862	29,407	9,593	11,166	8,648	60,455	11,166	84.4%
Reclassified Fluent English	82,054	4,985	2,533	1,377	1,075	84,587	1,377	98.4%
Special Education	18,078	25,349	4,028	12,547	8,774	22,106	12,547	63.8%

[1] Current grade twelve students who also tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007), 2007–08 (Class of 2008), or 2008–09 (Class of 2009) are ***excluded*** from this table. Current grade twelve students who tested as grade ten students last year have been moved into counts for the Class of 2010 and are included here along with students who tested as grade eleven students last year. Students in special education programs are ***included*** in all rows.

[2] Students who have not passed and are not continuing to try to pass have been dropped from the cumulative totals.

Table 2.18 provides a comparison of CAHSEE passing rates for this year's seniors to passing rates for seniors in 2006 through 2009 as of May of their senior year. Passing rates have increased significantly for all groups except for students in special education. It is not clear whether the lower passing rates for students in special education indicate reduced effort to help students master the CAHSEE standards or if students have less motivation to demonstrate mastery due to the temporary exemption for these students.

Table 2.18. Comparison of Estimated Percentages of Students Meeting the CAHSEE Requirement for the Classes of 2006–10 Through May of Their Senior Year, Excluding Students with Disabilities[1]

Group[1]	Passed Both Parts of the CAHSEE				
	Class of 2006	Class of 2007	Class of 2008	Class of 2009	Class of 2010
All Students	91.2%	93.3%	93.6%	93.4%	94.4%
Females	91.6%	93.6%	94.1%	93.9%	94.8%
Males	90.7%	92.9%	93.2%	92.9%	93.9%
Native American	--[2]	--[2]	93.6%	94.6%	95.4%
Asian	95.3%	96.3%	96.5%	96.2%	97.4%
Pacific Islander	--[3]	--[3]	--[3]	93.1%	95.3%
Filipino	--[3]	--[3]	--[3]	97.2%	98.1%
Hispanic	85.5%	88.6%	89.9%	89.9%	91.4%
African American	83.7%	88.4%	87.2%	87.5%	89.6%
White, non-Hispanic	97.3%	98.4%	98.2%	97.9%	98.1%
Economically Disadvantaged	85.7%	88.3%	89.8%	89.5%	91.3%
English Learner	76.0%	77.1%	78.6%	78.4%	81.0%
Reclassified Fluent English	--[3]	--[3]	--[3]	98.1%	98.5%
Special Education[4]	47.8%	48.8%	54.5%	56.6%	53.3%

[1] Note grade twelve students who also tested as grade twelve students in the previous year are ***excluded*** from this table as are students in special education programs (except in the last row).

[2] Passing rates for Native Americans (Native American) were not previously computed in analyses of results for the Classes of 2006 and 2007.

[3] Passing rates for Pacific Islanders and Filipinos and also for students reclassified as fluent English were not previously computed in analyses of results for the Classes of 2006, 2007, and 2008.

[4] Students in special education in the Classes of 2008 and 2009 were required to pass the CAHSEE to receive a diploma. An exemption was available to students in special education in 2006, 2007, and now again in 2010.

Class of 2011 — Improvement for Students Who Retested in Grade Eleven

We analyzed the number of grade eleven students (Class of 2011) who passed each part of the CAHSEE and the number completing the requirement to pass both parts and added these to the corresponding numbers for last year's grade ten students. Students shown as grade eleven students in the 2007–08 CAHSEE administrations included some students who were repeating grade eleven, thus moving from the Class of 2010 cohort last year to the Class of 2011 cohort. This year's grade eleven students also included some students new to the state and other students who were grade nine students in 2009. Students who repeated grade ten in 2009–10 were dropped from the Class of 2011 cohort as were students who did not pass in 2009 and failed to test at all during the 2009–10 school year. As shown in Table 2.3 earlier in this chapter, over 5,500 students appear to be repeating grade ten in 2009–10, moving out of the Class of 2011[5]. This still leaves a small but significant number of students who have either left public education in California or simply skipped taking the CAHSEE in their junior year.

Tables 2.19 through 2.24 show cumulative passing rates for students in the Class of 2011 (this year's juniors). In the primary tables, students with disabilities are excluded from all rows except the last due to the exemption currently reinstated for these students. To avoid duplication, students who had been seniors in 2006, 2007, 2008, or 2009 were included in the counts for the Classes of 2006 through 2009 (2.35 through 2.52 below) and excluded from the counts in Tables 2.12 through 2.17. We also provide an alternative to each table where students with disabilities are included in all rows, allowing for direct comparison to prior-year results in some cases.

[5] It is likely that we are slightly underestimating the number of students repeating 10th grade because differences in coding student information prevented us from identifying all of the students who tested as 10th graders in both 2008 and 2009.

Table 2.19. Estimated Number and Percentage of Students in the Class of 2011[1] Passing Both CAHSEE Tests Through May 2010, Excluding Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Passed	Not Passed	Not Tested[2]	Passed	Not Yet Passed	Percent Pass
All Students	335,351	127,703	58,293	52,249	17,161	393,644	52,249	88.3%
Females	171,428	60,897	28,857	24,499	7,541	200,285	24,499	89.1%
Males	163,923	66,806	29,436	27,750	9,620	193,359	27,750	87.4%
Native American	2,507	1,106	518	369	219	3,025	369	89.1%
Asian	37,730	6,310	3,467	2,267	576	41,197	2,267	94.8%
Pacific Islander	2,287	925	458	357	110	2,745	357	88.5%
Filipino	12,252	1,969	1,203	621	145	13,455	621	95.6%
Hispanic	138,272	81,003	34,793	35,630	10,580	173,065	35,630	82.9%
African American	20,554	14,880	5,796	6,720	2,364	26,350	6,720	79.7%
White, non-Hispanic	121,749	21,510	12,058	6,285	3,167	133,807	6,285	95.5%
Economically Disadvantaged	138,997	81,285	34,446	36,359	10,480	173,443	36,359	82.7%
English Learner	23,800	44,057	14,926	23,228	5,903	38,726	23,228	62.5%
Reclassified Fluent English	74,365	15,159	9,986	3,977	1,196	84,351	3,977	95.5%
Special Education	9,460	41,702	6,724	26,479	8,499	16,184	26,479	37.9%

[1] Current grade eleven students who also tested as 12th graders in 2005–06 (Class of 2006), 2006–07 (Class of 2007), 2007–08 (Class of 2008), or 2008–09 (Class of 2009) are ***excluded*** from this table. Current grade eleven students who tested as grade eleven students last year have been moved into counts for the Class of 2011 and are included here along with students who tested as grade ten students last year. Students in special education programs are ***excluded*** from all rows except the last row.

[2] Students who have not passed and are not continuing to try to pass have been dropped from the cumulative totals.

More than 33,000 Class of 2011 students in special education and over 110,000 general education students took the CAHSEE this year. Roughly 53 percent of the general education students and about 20 percent of the students in special education who took the test this year completed the CAHSEE requirement. There remain more than 52,000 general education students and more than 26,000 special education students in the Class of 2011 who continued to try to meet the CAHSEE requirement but have not yet been successful. Note, however, that some of these special education students may have met the requirement through a local waiver.

Table 2.20. Estimated Number and Percentage of Students in the Class of 2011[1] Passing Both CAHSEE Tests Through May 2010, Including Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Passed	Not Passed	Not Tested[2]	Passed	Not Yet Passed	Percent Pass
All Students	344,811	169,405	65,017	78,728	25,660	409,828	78,728	83.9%
Females	174,370	75,834	31,304	34,053	10,477	205,674	34,053	85.8%
Males	170,441	93,571	33,713	44,675	15,183	204,154	44,675	82.0%
Native American	2,625	1,522	581	619	322	3,206	619	83.8%
Asian	38,260	7,935	3,896	3,123	916	42,156	3,123	93.1%
Pacific Islander	2,338	1,140	492	485	163	2,830	485	85.4%
Filipino	12,384	2,425	1,300	851	274	13,684	851	94.1%
Hispanic	141,352	104,092	38,326	51,039	14,727	179,678	51,039	77.9%
African American	21,222	20,794	6,431	10,707	3,656	27,653	10,707	72.1%
White, non-Hispanic	126,630	31,497	13,991	11,904	5,602	140,621	11,904	92.2%
Economically Disadvantaged	142,459	107,576	38,210	53,772	15,594	180,669	53,772	77.1%
English Learner	24,775	59,530	17,425	33,705	8,400	42,200	33,705	55.6%
Reclassified Fluent English	75,311	16,742	10,441	4,819	1,482	85,752	4,819	94.7%
Special Education	9,460	41,702	6,724	26,479	8,499	16,184	26,479	37.9%

[1] Current grade eleven students who also tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007), 2007–08 (Class of 2008), or 2008–09 (Class of 2009) are ***excluded*** from this table. Current grade eleven students who tested as grade eleven students last year have been moved into counts for the Class of 2011 and are included here along with students who tested as grade ten students last year. Students in special education programs are ***included*** in all rows.

[2] Students who have not passed and are not continuing to try to pass have been dropped from the cumulative totals.

Table 2.21. Estimated Number and Percentage of Students in the Class of 2011[1] Passing the CAHSEE ELA Test Through May 2010, Excluding Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Passed	Not Passed	Not Tested[2]	Passed	Not Passed	Percent Pass
All Students	361,127	101,927	49,887	34,879	17,161	411,014	34,879	92.2%
Females	187,343	44,982	23,402	14,039	7,541	210,745	14,039	93.8%
Males	173,784	56,945	26,485	20,840	9,620	200,269	20,840	90.6%
Native American	2,715	898	462	217	219	3,177	217	93.6%
Asian	38,276	5,764	3,192	1,996	576	41,468	1,996	95.4%
Pacific Islander	2,437	775	420	245	110	2,857	245	92.1%
Filipino	12,587	1,634	1,044	445	145	13,631	445	96.8%
Hispanic	154,469	64,806	29,829	24,397	10,580	184,298	24,397	88.3%
African American	24,073	11,361	5,074	3,923	2,364	29,147	3,923	88.1%
White, non-Hispanic	126,570	16,689	9,866	3,656	3,167	136,436	3,656	97.4%
Economically Disadvantaged	154,666	65,616	29,948	25,188	10,480	184,614	25,188	88.0%
English Learner	28,456	39,401	14,984	18,514	5,903	43,440	18,514	70.1%
Reclassified Fluent English	79,477	10,047	7,067	1,784	1,196	86,544	1,784	98.0%
Special Education	13,744	37,418	7,853	21,066	8,499	21,597	21,066	50.6%

[1] Current grade eleven students who also tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007), 2007–08 (Class of 2008), or 2008–09 (Class of 2009) are ***excluded*** from this table. Current grade eleven students who tested as grade eleven students last year have been moved into counts for the Class of 2011 and are included here along with students who tested as grade ten students last year. Students in special education programs are ***excluded*** from all rows except the last row.

[2] Students who have not passed and are not continuing to try to pass have been dropped from the cumulative totals.

Table 2.22. Estimated Number and Percentage of Students in the Class of 2011[1] Passing the CAHSEE ELA Test Through May 2010, Including Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Passed	Not Passed	Not Tested[2]	Passed	Not Passed	Percent Pass
All Students	374,871	139,345	57,740	55,945	25,660	432,611	55,945	88.5%
Females	192,249	57,955	26,336	21,142	10,477	218,585	21,142	91.2%
Males	182,622	81,390	31,404	34,803	15,183	214,026	34,803	86.0%
Native American	2,893	1,254	528	404	322	3,421	404	89.4%
Asian	38,894	7,301	3,633	2,752	916	42,527	2,752	93.9%
Pacific Islander	2,503	975	464	348	163	2,967	348	89.5%
Filipino	12,769	2,040	1,151	615	274	13,920	615	95.8%
Hispanic	159,449	85,995	34,087	37,181	14,727	193,536	37,181	83.9%
African American	25,348	16,668	5,926	7,086	3,656	31,274	7,086	81.5%
White, non-Hispanic	133,015	25,112	11,951	7,559	5,602	144,966	7,559	95.0%
Economically Disadvantaged	160,225	89,810	34,465	39,751	15,594	194,690	39,751	83.0%
English Learner	30,223	54,082	17,943	27,739	8,400	48,166	27,739	63.5%
	80,746	11,307	7,510	2,315	1,482	88,256	2,315	97.4%
Special Education	13,744	37,418	7,853	21,066	8,499	21,597	21,066	50.6%

[1] Current grade eleven students who also tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007), 2007–08 (Class of 2008), or 2008–09 (Class of 2009) are ***excluded*** from this table. Current grade eleven students who tested as grade eleven students last year have been moved into counts for the Class of 2011 and are included here along with students who tested as grade ten students last year. Students in special education programs are ***included*** in all rows.

[2] Students who have not passed and are not continuing to try to pass have been dropped from the cumulative totals.

Table 2.23. Estimated Number and Percentage of Students in the Class of 2011[1] Passing the CAHSEE Mathematics Test Through May 2010, Excluding Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Passed	Not Passed	Not Tested[2]	Passed	Not Passed	Percent Pass
All Students	361,546	101,508	47,689	36,658	17,161	409,235	36,658	91.8%
Females	181,370	50,955	24,559	18,855	7,541	205,929	18,855	91.6%
Males	180,176	50,553	23,130	17,803	9,620	203,306	17,803	91.9%
Native American	2,635	978	473	286	219	3,108	286	91.6%
Asian	40,153	3,887	2,502	809	576	42,655	809	98.1%
Pacific Islander	2,498	714	353	251	110	2,851	251	91.9%
Filipino	12,797	1,424	894	385	145	13,691	385	97.3%
Hispanic	155,503	63,772	28,231	24,961	10,580	183,734	24,961	88.0%
African American	22,583	12,851	5,017	5,470	2,364	27,600	5,470	83.5%
White, non-Hispanic	125,377	17,882	10,219	4,496	3,167	135,596	4,496	96.8%
Economically Disadvantaged	157,350	62,932	27,376	25,076	10,480	184,726	25,076	88.0%
English Learner	35,168	32,689	12,389	14,397	5,903	47,557	14,397	76.8%
Reclassified Fluent English	78,512	11,012	6,911	2,905	1,196	85,423	2,905	96.7%
Special Education	14,536	36,626	7,118	21,009	8,499	21,654	21,009	50.8%

[1] Current grade eleven students who also tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007), 2007–08 (Class of 2008), or 2008–09 (Class of 2009) are ***excluded*** from this table. Current grade eleven students who tested as grade eleven students last year have been moved into counts for the Class of 2011 and are included here along with students who tested as grade ten students last year. Students in special education programs are ***excluded*** from all rows except the last row.

[2] Students who have not passed and are not continuing to try to pass have been dropped from the cumulative totals.

Table 2.24. Estimated Number and Percentage of Students in the Class of 2011[1] Passing the CAHSEE Mathematics Test Through May 2010, Including Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Passed	Not Passed	Not Tested[2]	Passed	Not Passed	Percent Pass
All Students	376,082	138,134	54,807	57,667	25,660	430,889	57,667	88.2%
Females	185,774	64,430	27,175	26,778	10,477	212,949	26,778	88.8%
Males	190,308	73,704	27,632	30,889	15,183	217,940	30,889	87.6%
Native American	2,796	1,351	549	480	322	3,345	480	87.5%
Asian	41,157	5,038	2,853	1,269	916	44,010	1,269	97.2%
Pacific Islander	2,575	903	383	357	163	2,958	357	89.2%
Filipino	12,991	1,818	990	554	274	13,981	554	96.2%
Hispanic	161,503	83,941	32,233	36,981	14,727	193,736	36,981	84.0%
African American	23,613	18,403	5,753	8,994	3,656	29,366	8,994	76.6%
White, non-Hispanic	131,447	26,680	12,046	9,032	5,602	143,493	9,032	94.1%
Economically Disadvantaged	164,053	85,982	31,625	38,763	15,594	195,678	38,763	83.5%
English Learner	38,603	45,702	15,261	22,041	8,400	53,864	22,041	71.0%
Reclassified Fluent English	79,739	12,314	7,279	3,553	1,482	87,018	3,553	96.1%
Special Education	14,536	36,626	7,118	21,009	8,499	21,654	21,009	50.8%

[1] Current grade eleven students who also tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007), 2007–08 (Class of 2008), or 2008–09 (Class of 2009) are ***excluded*** from this table. Current grade eleven students who tested as grade eleven students last year have been moved into counts for the Class of 2011 and are included here along with students who tested as grade ten students last year. Students in special education programs are ***included*** in all rows.

[2] Students who have not passed and are not continuing to try to pass have been dropped from the cumulative totals.

Table 2.25 provides a comparison of passing rates for this year's juniors with students in the Classes of 2009 and 2010 at this same point in their junior year. Overall passing rates have continued to improve for all groups except students in special education. It is possible that the efforts to help students with disabilities have not increased due to the current exemption for these students.

Table 2.25. Comparison of Estimated Passing Rates for the Classes of 2009–11 Through May of Their Junior Year, Including Students with Disabilities1

Group	Passed ELA			Passed Mathematics			Passed Both		
	Class of 2009	Class of 2010	Class of 2011	Class of 2009	Class of 2010	Class of 2011	Class of 2009	Class of 2010	Class of 2011
All Students	87.7%	88.2%	88.5%	86.5%	87.2%	88.2%	81.7%	82.9%	83.9%
Females	90.6%	90.7%	91.2%	87.1%	87.9%	88.8%	83.7%	84.7%	85.8%
Males	84.9%	85.8%	86.0%	86.0%	86.6%	87.6%	79.8%	81.2%	82.0%
Native American	86.7%	89.1%	89.4%	83.5%	85.9%	87.5%	79.4%	82.7%	83.8%
Asian	92.7%	93.4%	93.9%	96.7%	97.0%	97.2%	91.6%	92.5%	93.1%
Pacific Islander	87.4%	89.2%	89.5%	86.6%	89.2%	89.2%	81.0%	85.0%	85.4%
Filipino	94.9%	94.7%	95.8%	94.8%	95.0%	96.2%	92.4%	92.6%	94.1%
Hispanic	82.1%	82.8%	83.9%	81.0%	82.2%	84.0%	74.1%	76.1%	77.9%
African American	80.0%	81.6%	81.5%	72.8%	75.4%	76.6%	68.1%	71.0%	72.1%
White, non-Hispanic	95.1%	95.1%	95.0%	93.7%	93.6%	94.1%	91.7%	91.9%	92.2%
Economically Disadvantaged	80.7%	81.9%	83.0%	80.0%	81.7%	83.5%	72.7%	75.1%	77.1%
English Learner	61.4%	61.5%	63.5%	68.3%	68.7%	71.0%	51.9%	53.1%	55.6%
Reclassified Fluent English	97.1%	97.2%	97.4%	94.9%	95.4%	96.1%	93.2%	94.0%	94.7%
Special Education	52.1%	52.2%	50.6%	47.7%	48.2%	50.8%	39.2%	37.9%	37.9%

[1] Students who also tested as grade twelve students in previous years are ***excluded*** from this table. Students in special education programs are included in each demographic category as appropriate and in results for all students.

Initial Results for the Class of 2012

A major charge for the independent evaluation was to analyze and report performance on the CAHSEE for all students and for specific demographic groups, including economically disadvantaged students, English learners (EL), and students with disabilities (characterized as “exceptional needs students” in the legislation). Table 2.26 shows the grade ten CAHSEE completion rates (passing both parts) for the classes of 2006 through 2011. Tables 2.25 and 2.26 show passing rates for each test separately.

Passing rates for the grade ten students testing prior to 2004 are not exactly comparable to current grade ten passing rates as changes to the tests were introduced in 2004 when the examination was restarted for the Class of 2006. Also, some students in the Class of 2004 took the CAHSEE voluntarily in 2001 as grade nine students. Since 2003 (the Class of 2005), the grade ten results are based on a census testing of all students. Tables 2.27 through 2.29 show comparative grade ten overall and ELA and mathematics passing rates respectively, beginning with the Class of 2006.

Tables 2.26 through 2.28 show cumulative passing rates for this year's sophomores, the Class of 2012. Students with disabilities are ***included*** in all rows. A small number of students who tested as grade ten students this year were repeating grade ten. Some of these students passed one or both parts of the CAHSEE previously. Schools may not have been clear whether these students were required to take the CAHSEE again to meet grade ten participation requirements for school-level accountability, even if they had previously passed. As shown in Table 2.26, about 4,500 students who were repeating grade ten had previously passed the CAHSEE. Approximately 3,600 grade ten students did not take the CAHSEE this year, but had answer sheets with codes indicating that they had previously passed both parts. Another 900 or so students took the CAHSEE again this year, even though they were coded as having already passed both parts in a previous test administration.

Table 2.26. Estimated Number and Percentage of Students in the Class of 2012 Passing Both CAHSEE Tests Through May 2010, Including Students with Disabilities

	By May 2009		July 2009–May 2010			Cumulative Total		
Group[1]	Passed[2]	Not Yet Passed	Passed	Not Passed	Not Tested	Passed	Not Passed	Percent Pass
All Students	4,437	493,305	351,461	141,844	0	355,898	141,844	71.5%
Females	1,896	240,626	178,171	62,455	0	180,067	62,455	74.2%
Males	2,541	252,679	173,290	79,389	0	175,831	79,389	68.9%
Native American	12	5,249	3,599	1,650	0	3,611	1,650	68.6%
Asian	102	45,568	40,080	5,488	0	40,182	5,488	88.0%
Pacific Islander	20	3,532	2,466	1,066	0	2,486	1,066	70.0%
Filipino	38	14,381	12,467	1,914	0	12,505	1,914	86.7%
Hispanic	3,080	242,107	151,034	91,073	0	154,114	91,073	62.9%
African American	407	38,336	21,527	16,809	0	21,934	16,809	56.6%
White, non-Hispanic	778	144,132	120,288	23,844	0	121,066	23,844	83.5%
Economically Disadvantaged	2,913	257,650	158,216	99,434	0	161,129	99,434	61.8%
English Learner	518	76,753	23,834	52,919	0	24,352	52,919	31.5%
Reclassified Fluent English	1,115	96,780	82,585	14,195	0	83,700	14,195	85.5%
Special Education	192	54,012	12,749	41,263	0	12,941	41,263	23.9%

[1] Students in special education programs are ***included*** in all rows.

[2] Students who repeated 10th grade may have passed one or both CAHSEE tests in prior years.

Table 2.27. Estimated Number and Percentage of Students in the Class of 2012 Passing the CAHSEE ELA Test Through May 2010, Including Students with Disabilities

Group[1]	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed[2]	Not Yet Passed	Passed	Not Passed	Not Tested	Passed	Not Passed	Percent Pass
All Students	6,329	491,413	383,570	96,612	11,231	389,899	107,843	78.3%
Females	2,904	239,618	196,810	38,117	4,691	199,714	42,808	82.3%
Males	3,425	251,795	186,760	58,495	6,540	190,185	65,035	74.5%
Native American	18	5,243	4,017	1,060	166	4,035	1,226	76.7%
Asian	131	45,539	40,785	4,243	511	40,916	4,754	89.6%
Pacific Islander	29	3,523	2,735	722	66	2,764	788	77.8%
Filipino	49	14,370	12,970	1,230	170	13,019	1,400	90.3%
Hispanic	4,402	240,785	170,393	64,332	6,060	174,795	70,392	71.3%
African American	667	38,076	25,697	10,991	1,388	26,364	12,379	68.0%
White, non-Hispanic	1,033	143,877	126,973	14,034	2,870	128,006	16,904	88.3%
Economically Disadvantaged	4,206	256,357	178,534	70,943	6,880	182,740	77,823	70.1%
English Learner	864	76,407	30,322	43,100	2,985	31,186	46,085	40.4%
Reclassified Fluent English	1,491	96,404	88,023	7,545	836	89,514	8,381	91.4%
Special Education	370	53,834	18,121	30,885	4,828	18,491	35,713	34.1%

[1] Students in special education programs are ***included*** in all rows.

[2] Students who repeated 10th grade may have passed one or both CAHSEE tests in prior years.

Table 2.28. Estimated Number and Percentage of Students in the Class of 2012 Passing the CAHSEE Mathematics Tests Through May 2010, Including Students with Disabilities

Group[1]	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed[2]	Not Yet Passed	Passed	Not Passed	Not Tested	Passed	Not Passed	Percent Pass
All Students	5,678	492,064	382,434	98,359	11,271	388,112	109,630	78.0%
Females	2,291	240,231	189,333	46,176	4,722	191,624	50,898	79.0%
Males	3,387	251,833	193,101	52,183	6,549	196,488	58,732	77.0%
Native American	13	5,248	3,899	1,183	166	3,912	1,349	74.4%
Asian	147	45,523	42,505	2,507	511	42,652	3,018	93.4%
Pacific Islander	24	3,528	2,722	740	66	2,746	806	77.3%
Filipino	52	14,367	12,960	1,235	172	13,012	1,407	90.2%
Hispanic	4,006	241,181	171,174	63,920	6,087	175,180	70,007	71.4%
African American	513	38,230	23,803	13,030	1,397	24,316	14,427	62.8%
White, non-Hispanic	923	143,987	125,371	15,744	2,872	126,294	18,616	87.2%
Economically Disadvantaged	3,815	256,748	180,590	69,257	6,901	184,405	76,158	70.8%
English Learner	901	76,370	37,486	35,897	2,987	38,387	38,884	49.7%
Reclassified Fluent English	1,355	96,540	86,433	9,269	838	87,788	10,107	89.7%
Special Education	291	53,913	18,502	30,581	4,830	18,793	35,411	34.7%

[1] Students in special education programs are ***included*** in all rows.

[2] Students who repeated 10th grade may have passed one or both CAHSEE tests in prior years.

Tables 2.29 through 2.31 show how current passing rates for students in the Class of 2012 compare to end-of-year passing rates for students in prior high school classes[6]. Students with disabilities are ***included*** in all rows. Results indicate that slow but very steady progress is being made in increasing initial CAHSEE passing rates. The demographic category for which passing rates has shown little increase is White. More significant increases for Hispanic and African American students indicate some success in closing achievement gaps.

[6] In prior years, 10th grade results were not analyzed after each administration. Only end-of-year passing rates are available for comparison.

Table 2.29. Class of 2012 10th Grade Passing Rates Compared to Passing Rates for Prior Classes, Including Students with Disabilities

Group[1]	Percent Passing Both Parts of the CAHSEE						
	Class of 2006	Class of 2007	Class of 2008	Class of 2009	Class of 2010	Class of 2011	Class of 2012
All students	64.3%	65.4%	65.1%	65.2%	69.2%	69.9%	71.5%
Females	67.1%	68.1%	67.9%	68.0%	71.8%	72.4%	74.2%
Males	61.7%	62.8%	62.4%	62.5%	66.8%	67.4%	68.9%
Native American	59.9%	59.6%	61.0%	61.6%	66.0%	64.8%	68.6%
Asian	81.5%	82.5%	82.5%	83.2%	85.8%	86.1%	88.0%
Pacific Islander	60.4%	63.4%	62.9%	63.3%	69.7%	68.9%	70.0%
Filipino	80.8%	81.3%	81.3%	82.4%	84.5%	85.1%	86.7%
Hispanic	49.0%	51.1%	52.4%	52.9%	58.5%	60.1%	62.9%
African American	45.3%	46.4%	46.3%	47.8%	52.5%	53.3%	56.6%
White (not Hispanic)	80.7%	81.4%	80.5%	80.5%	83.4%	83.2%	83.5%
Economically disadvantaged	47.7%	50.1%	50.8%	51.4%	57.2%	58.8%	61.8%
English Learners	29.6%	30.8%	27.0%	25.6%	29.5%	30.6%	31.5%
Reclassified fluent English	76.3%	78.6%	78.1%	77.9%	83.3%	84.1%	85.5%
Special education students	18.8%	20.2%	20.9%	21.1%	20.2%	21.1%	23.9%

[1] Students in special education programs are ***included*** in all rows.

Table 2.30. Class of 2012 10th Grade ELA Passing Rates Compared to Passing Rates for Prior Classes, Including Students with Disabilities

Group[1]	Percent Passing CAHSEE ELA						
	Class of 2006	Class of 2007	Class of 2008	Class of 2009	Class of 2010	Class of 2011	Class of 2012
All students	72.9%	74.8%	73.4%	73.3%	77.3%	76.9%	78.3%
Females	77.4%	79.5%	78.1%	78.0%	81.6%	81.0%	82.3%
Males	68.7%	70.2%	69.0%	68.8%	73.3%	73.1%	74.5%
Native American	70.9%	70.8%	71.6%	71.4%	80.1%	74.1%	76.7%
Asian	84.1%	85.2%	85.0%	85.2%	87.5%	87.7%	89.6%
Pacific Islander	69.3%	73.5%	72.3%	72.5%	78.9%	75.3%	77.8%
Filipino	86.3%	87.3%	86.7%	87.0%	87.0%	88.5%	90.3%
Hispanic	59.8%	63.2%	62.8%	63.2%	66.7%	68.8%	71.3%
African American	60.1%	62.1%	60.6%	61.5%	66.2%	65.7%	68.0%
White (not Hispanic)	87.0%	88.0%	86.4%	86.1%	89.9%	88.2%	88.3%
Economically disadvantaged	58.1%	61.8%	61.1%	61.4%	63.6%	67.3%	70.1%
English Learners	38.0%	41.3%	35.8%	34.2%	39.8%	39.0%	40.4%
Reclassified fluent English	85.2%	87.9%	86.5%	86.3%	86.8%	90.3%	91.4%
Special education students	28.8%	31.5%	31.6%	30.7%	31.8%	32.0%	34.1%

[1] Students in special education programs are ***included*** in all rows.

Table 2.31. Class of 2012 10th Grade Mathematics Passing Rates Compared to Passing Rates for Prior Classes, Including Students with Disabilities

Group[1]	Percent Passing CAHSEE Mathematics						
	Class of 2006	Class of 2007	Class of 2008	Class of 2009	Class of 2010	Class of 2011	Class of 2012
All students	71.8%	72.1%	71.7%	72.2%	76.4%	76.9%	78.0%
Females	72.8%	73.1%	72.8%	73.0%	77.1%	77.7%	79.0%
Males	70.8%	71.3%	70.7%	71.4%	75.8%	76.2%	77.0%
Native American	66.3%	66.3%	67.1%	67.6%	78.1%	70.8%	74.4%
Asian	90.5%	90.9%	90.0%	91.0%	92.9%	93.1%	93.4%
Pacific Islander	69.5%	70.4%	69.9%	71.3%	78.4%	77.2%	77.3%
Filipino	86.0%	85.8%	85.6%	87.0%	87.1%	90.1%	90.2%
Hispanic	59.2%	60.2%	61.5%	62.3%	66.1%	69.5%	71.4%
African American	51.9%	52.5%	52.3%	54.0%	59.2%	60.2%	62.8%
White (not Hispanic)	85.0%	85.4%	84.1%	84.4%	88.3%	86.8%	87.2%
Economically disadvantaged	58.6%	59.9%	60.4%	61.3%	63.7%	68.8%	70.8%
English Learners	47.6%	47.0%	44.3%	43.9%	49.1%	50.0%	49.7%
Reclassified fluent English	81.9%	83.4%	82.9%	83.1%	84.2%	88.9%	89.7%
Special education students	27.8%	28.6%	28.4%	29.1%	29.9%	30.3%	34.7%

[1] Students in special education programs are ***included*** in all rows.

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Figure 2.1 shows the trend in grade ten passing rates for the CAHSEE as a whole and for the ELA and mathematics tests separately. Figure 2.2 displays trends in the overall grade ten passing rates for demographic groups that have had particular difficulties in passing the CAHSEE. As shown in Figure 2.2, overall grade ten passing rates increased again in 2010 from 70 percent in 209 to 72 percent in 2010. The overall passing rate for grade ten students was nearly 8 points higher in 2010 compared to the initial grade ten passing rate in 2004 (72 percent compared to 64 percent). Initial passing rates increased most dramatically for Hispanic students (from 49 percent to 63 percent) and African American students (from 45 percent to 57 percent). Passing rates increased slightly for English learners (from 30 percent to 32 percent) and more significantly for students in special education (from 19 percent to 24 percent).

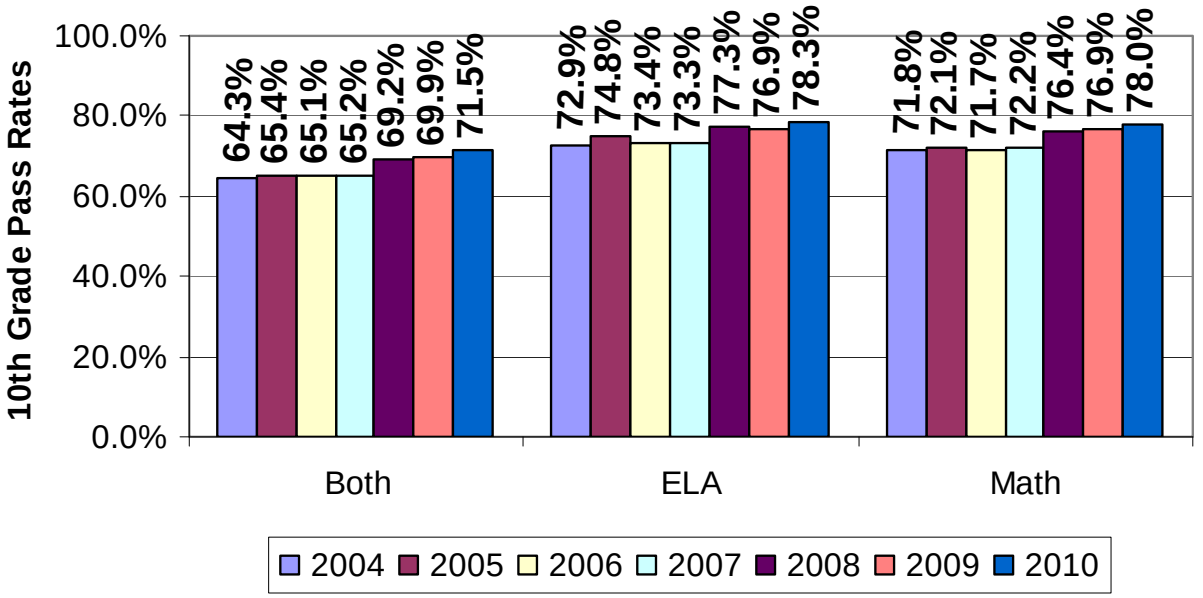

Figure 2.1. Trends in 10th grade CAHSEE passing rates.

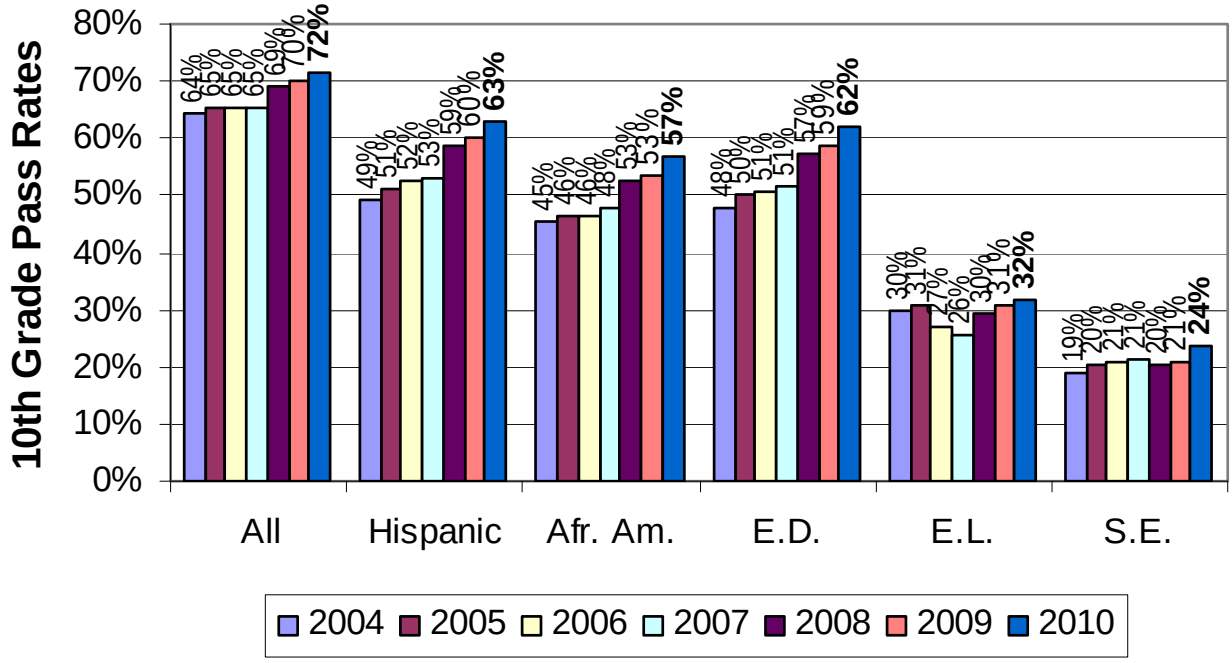

Figure 2.2. Trends in overall 10th grade passing rates for selected groups.

Note: ED = Economically disadvantaged, EL = English Learner, SE = students in special education.

Analysis of Results by Mathematics Courses Taken

From the outset, the level of mathematics achievement required for high school graduation has been a key policy issue. When the CAHSEE requirement was established in 1999, students were not required to take Algebra I to earn a diploma, so including Algebra questions on the CAHSEE mathematics test reflected recognition of the importance of mathematics for success after high school.

As in prior years, we analyzed passing rates on the mathematics part of the CAHSEE for students who had completed different high school math courses. Table 2.32 shows the distribution of the highest level of mathematics course completed by the end of grade ten for students in the Class of 2012 compared to students in the classes of 2006 through 2011. In 2009 and 2010 there was a significant increase in students taking Algebra I and a corresponding decrease in the numbers of students whose highest course was Pre-Algebra. This anomalous trend was reversed in students of the Class of 2012. It may be that the students or even some teachers were unclear about what constituted an Algebra I course and that a stricter interpretation was introduced this year. Apart from the apparent confusion between Pre-Algebra and Algebra I (or the first year of Integrated Mathematics), the trend is quite positive. Significantly more students are taking Geometry or the second year of Integrated Mathematics (39 percent, up from 31 percent) or courses beyond Geometry (30 percent, up from 21 percent) in grade ten compared to earlier years.

Table 2.32. Distribution of 10th Grade Students by Highest Math Course Taken

	Class of 2006	Class of 2007	Class of 2008	Class of 2009	Class of 2010	Class of 2011	Class of 2012
General Math	2.6%	2.0%	1.9%	0.9%	0.0%	1.2%	1.1%
Pre-Algebra	11.1%	9.9%	11.7%	3.1%	2.2%	8.7%	8.3%
Algebra I/Int. Math I	27.5%	24.9%	18.9%	28.3%	27.7%	18.3%	17.2%
Geometry/Int. Math II	31.0%	31.7%	34.3%	33.6%	36.9%	38.5%	38.6%
Algebra II/Int. Math III	18.4%	17.9%	20.4%	21.3%	23.4%	25.4%	26.3%
Advanced Math	2.2%	2.5%	2.7%	2.8%	3.1%	3.4%	3.8%
None/Missing	7.2%	10.1%	10.3%	10.0%	6.6%	4.6%	4.6%
No. of Students	450,928	470,891	502,874	502,501	474,351	458,777	461,663

* Note: Column percents may not add to 100 percent due to rounding.

Table 2.33 shows the percentage of students in key demographic groups who have taken courses beyond Algebra I (meets expectation at Grade 10) when students with missing information are excluded. Students following the expected curriculum would be taking at least geometry by grade ten. Students who took Algebra I in grade eight could be taking Algebra II in grade ten. More than two-thirds of the grade ten students had taken or were taking mathematics courses beyond Algebra I. Nearly 90 percent of Asian students were taking courses beyond Algebra I. The percentage of students in special education taking courses beyond Algebra I increased significantly (from 34 percent to 37 percent), but their rate is still very low compared to students in other demographic groups.

Table 2.33. Trends in Mathematics Courses Taken by Demographic Group

Group[1]	Percentage of 10th Graders Taking Mathematics Courses Beyond Algebra I						
	Class of 2006	Class of 2007	Class of 2008	Class of 2009	Class of 2010	Class of 2011	Class of 2012
All Students	55.6%	59.6%	64.0%	64.2%	68.0%	70.4%	72.0%
Females	59.1%	62.9%	67.1%	67.6%	71.1%	73.3%	74.8%
Males	52.2%	56.5%	61.0%	60.9%	65.0%	67.6%	69.2%
Native American	--[2]	--[2]	--[2]	50.1%	55.6%	57.0%	61.4%
Asian	80.6%	83.8%	85.1%	85.0%	87.9%	88.9%	89.4%
Pacific Islander	--[2]	--[2]	--[2]	62.0%	67.5%	70.7%	70.2%
Filipino	--[2]	--[2]	--[2]	79.7%	82.1%	84.4%	85.1%
Hispanic	43.4%	49.2%	56.3%	56.3%	60.8%	64.1%	66.4%
African American	48.6%	53.4%	58.4%	59.2%	63.4%	64.9%	66.6%
White (not Hispanic)	63.1%	65.8%	68.8%	69.3%	72.5%	74.6%	76.0%
Econ. Disadvantaged	44.9%	51.1%	57.2%	57.3%	61.7%	64.6%	66.6%
English Learners	36.8%	42.8%	46.1%	43.3%	48.3%	52.3%	53.5%
Reclassified Fluent	--[2]	--[2]	--[2]	76.7%	78.7%	80.5%	81.7%
Special Education	19.0%	24.3%	33.3%	31.7%	33.9%	36.8%	41.7%

[1] Students whose highest mathematics course was unknown were excluded from this table.
[2] Students in a few specific demographic groups were not analyzed separately prior to 2009.

For all groups, the percentage taking courses beyond Algebra I continued to increase this year. However, the percentage of economically disadvantaged and minority students taking courses beyond Algebra I continued to lag behind that of white and Asian students. For example, the percentage of Black or African-American students taking courses beyond Algebra I this year (67 percent) was about the same as the percentage of white students taking courses beyond Algebra I four years ago.

Table 2.34 shows the CAHSEE mathematics passing rates for students at each course level. Passing rates dropped somewhat for students who had only taken Algebra I, dropped slightly for students whose highest course was Geometry, and increased somewhat for students taking courses beyond Geometry. Differences among these three levels were dramatic. About 98 percent of the students taking courses beyond Geometry passed the CAHSEE mathematics test on their first try compared to 85 percent of the students who were taking Geometry and only 59 percent of the students who had not taken courses beyond Algebra I.

Table 2.34. Tenth Grade Mathematics Passing Rates by Class and Highest Math Course Taken

Highest Math Course Taken	Class of 2006	Class of 2007	Class of 2008	Class of 2009	Class of 2010	Class of 2011	Class of 2012
Algebra I/Int. Math I	58.1%	57.5%	53.5%	59.0%	61.1%	58.3%	59.0%
Geometry/Int. Math II	87.2%	85.2%	81.3%	84.2%	85.3%	84.9%	85.0%
Algebra II/Int. Math III	95.3%	96.0%	91.9%	95.4%	96.0%	98.8%	96.0%
Advanced Math	99.4%	99.5%	96.4%	98.9%	99.2%	99.7%	98.6%
None/Missing	50.0%	41.2%	49.0%	35.4%	48.9%	64.6%	64.9%
No. of Students	414,903	450,928	470,891	502,501	474,351	458,777	461.663

Class of 2006—Some Students Still Continuing to Try to Pass the CAHSEE

Tables 2.35 through 2.37 show the number of students originally in the Class of 2006 (seniors in spring 2006) who continued to take the CAHSEE this year and the number now estimated to have passed the CAHSEE through May 2009. We are continuing to report students in special education programs separately but exclude them from the other student groups, including the counts for all students, since these students may have graduated without passing the CAHSEE due to the exemption in effect at that time. It is possible that a few more students originally from the Class of 2006 tested again this year but could not be matched to earlier records because of differences in coding identifying information.

This year, more than 1,200 general education students and more than 75 special education students from the Class of 2006 have taken the CAHSEE with 417 of the general education students and 13 of the special education students completing the CAHSEE requirement. At the same time, we found no 2009–10 CAHSEE records for roughly 31,000 other general education students and slightly fewer than 14,000 special education students in the Class of 2006 who had not passed the CAHSEE. We hypothesize that these students have either left the state, given up on earning a high school diploma, or are pursuing other educational options such as a General Education Development (GED) credential or attending community college.

Table 2.35 Estimated Number and Percentage of Students in the Class of 2006[1] Passing Both Portions of the CAHSEE Through May 2010

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Passed	Not Passed	Percent Pass
All Students	404,355	32,234	418	831	30,985	404,773	31,816	92.7%
Females	203,634	15,120	196	450	14,474	203,830	14,924	93.2%
Males	200,487	17,114	222	381	16,511	200,709	16,892	92.2%
Asian	42,131	1,678	20	49	1,609	42,151	1,658	96.2%
Hispanic	148,566	20,849	298	590	19,961	148,864	20,551	87.9%
African American	28,835	4,783	53	113	4,617	28,888	4,730	85.9%
White, non-Hispanic	160,765	3,983	37	64	3,882	160,802	3,946	97.6%
Economically Disadvantaged	142,387	17,189	113	187	16,889	142,500	17,076	89.3%
English Learner	55,936	13,322	142	331	12,849	56,078	13,180	81.0%
Special Education	19,296	14,080	11	74	13,995	19,307	14,069	57.8%

[1] Many students in special education programs who had not passed the CAHSEE by the end of the 12th grade were allowed an exemption from the CAHSEE requirement and so were ***excluded*** from all rows of the table except for the last row.

Table 2.36. Estimated Number and Percentage of Students in the Class of 2006[1] Passing the CAHSEE ELA Test Through May 2010

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Passed	Not Passed	Percent Pass
All Students	416,144	21,681	272	462	20,947	416,416	21,409	95.1%
Females	210,441	9,195	120	205	8,870	210,561	9,075	95.9%
Males	205,492	12,486	152	257	12,077	205,644	12,334	94.3%
Asian	42,395	1,383	17	41	1,325	42,412	1,366	96.9%
Hispanic	155,365	14,538	202	340	13,996	155,567	14,336	91.6%
African American	31,036	2,888	25	41	2,822	31,061	2,863	91.6%
White, non-Hispanic	161,594	2,278	22	31	2,225	161,616	2,256	98.6%
Economically Disadvantaged	148,866	12,120	83	114	11,923	148,949	12,037	92.5%
English Learner	59,094	10,580	115	244	10,221	59,209	10,465	85.0%
Special Education	24,049	11,022	19	49	10,954	24,068	11,003	68.6%

[1] Many students in special education programs who had not passed the CAHSEE by the end of the 12th grade were allowed an exemption from the CAHSEE requirement and so were ***excluded*** from all rows of the table except for the last row.

Table 2.37. Estimated Number and Percentage of Students in the Class of 2006[1] Passing the CAHSEE Mathematics Test Through May 2010

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Passed	Not Passed	Percent Pass
All Students	413,973	23,198	298	564	22,336	414,271	22,900	94.8%
Females	207,436	11,222	148	332	10,742	207,584	11,074	94.9%
Males	206,322	11,976	150	232	11,594	206,472	11,826	94.6%
Asian	43,175	740	8	13	719	43,183	732	98.3%
Hispanic	155,078	14,773	210	390	14,173	155,288	14,563	91.4%
African American	29,553	4,021	46	101	3,874	29,599	3,975	88.2%
White, non-Hispanic	161,641	2,982	27	50	2,905	161,668	2,955	98.2%
Economically Disadvantaged	149,037	12,142	89	123	11,930	149,126	12,053	92.5%
English Learner	62,023	8,160	71	163	7,926	62,094	8,089	88.5%
Special Education[1]	22,389	11,845	7	58	11,780	22,396	11,838	65.4%

[1] Many students in special education programs who had not passed the CAHSEE by the end of the 12th grade were allowed an exemption from the CAHSEE requirement and so were ***excluded*** from all rows of the table except for the last row.

Class of 2007—Many Students Continued to Try to Pass the CAHSEE Five Years Past Their Original Graduation Date

Tables 2.38 through 2.40 show estimated cumulative passing rates for the Class of 2007 after including results from the May 2010 CAHSEE administration. To avoid duplication, we have excluded students who were counted above as in the Class of 2006, even though many of those students were also in grade twelve in 2007. Thus, the definition of the Class of 2007 used here is students who were first-time grade twelve students in spring 2007. As with the Class of 2006, we have **excluded** students in special education programs from the counts, except for the last row in each table, since many of these students were exempted from the CAHSEE requirement.

Table 2.38. Estimated Number and Percentage of Students in the Class of 2007[1] Passing Both CAHSEE Tests Through May 2010

	By May 2009		July 2009–May 2010			Cumulative Total		
Group	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Passed	Not Passed	Percent Pass
All Students	411,785	31,071	686	1,468	28,917	412,471	30,385	93.1%
Females	207,641	14,367	361	854	13,152	208,002	14,006	93.7%
Males	203,194	16,704	325	614	15,765	203,519	16,379	92.6%
Asian	42,058	1,665	49	81	1,535	42,107	1,616	96.3%
Hispanic	153,270	19,698	458	1,010	18,230	153,728	19,240	88.9%
African American	30,381	4,735	90	207	4,438	30,471	4,645	86.8%
White, non-Hispanic	159,173	4,116	69	131	3,916	159,242	4,047	97.5%
Economically Disadvantaged	151,658	16,760	175	361	16,224	151,833	16,585	90.2%
English Learner	55,562	12,701	237	662	11,802	55,799	12,464	81.7%
Special Education	18,109	19,657	33	172	19,452	18,142	19,624	48.0%

[1] Many students in special education programs who had not passed the CAHSEE by the end of the 12th grade were allowed an exemption from the CAHSEE requirement and so were ***excluded*** from all rows of the table except for the last row.

So far this year, more than 2,000 general education students and more than 200 special education students in the Class of 2007 who had not passed the CAHSEE by May of 2009 continued to try to meet the CAHSEE requirement, more than three years after their scheduled graduation. Table 2.38 shows 93.1 percent of the students counted as being in the Class of 2007 have now passed the CAHSEE. This is higher than the 92.7 percent passing rate for the Class of 2006 shown in Table 2.35. The two rates are not exactly comparable, however, because repeat grade twelve students were included in the Class of 2006 counts and not in the Class of 2007 counts.

Table 2.39. Estimated Number and Percentage of Students in the Class of 2007[1] Passing the CAHSEE ELA Test Through May 2010

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Passed	Not Passed	Percent Pass
All Students	425,162	21,472	437	822	20,213	425,599	21,035	95.3%
Females	215,394	8,733	201	435	8,097	215,595	8,532	96.2%
Males	208,573	12,739	236	387	12,116	208,809	12,503	94.4%
Asian	42,352	1,462	43	64	1,355	42,395	1,419	96.8%
Hispanic	160,988	14,015	287	589	13,139	161,275	13,728	92.2%
African American	32,928	2,860	45	93	2,722	32,973	2,815	92.1%
White, non-Hispanic	161,084	2,549	45	52	2,452	161,129	2,504	98.5%
Economically Disadvantaged	159,465	12,099	102	230	11,767	159,567	11,997	93.0%
English Learner	59,972	10,433	199	482	9,752	60,171	10,234	85.5%
Special Education	22,884	15,369	30	126	15,213	22,914	15,339	59.9%

[1] Many students in special education programs who had not passed the CAHSEE by the end of the 12th grade were allowed an exemption from the CAHSEE requirement and so were ***excluded*** from all rows of the table except for the last row.

Table 2.40. Estimated Number and Percentage of Students in the Class of 2007[1] Passing the CAHSEE Mathematics Test Through May 2010

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed*	Pass	Not Pass	Not Tested	Passed	Not Passed	Percent Pass
All Students	423,356	22,782	466	979	21,337	423,822	22,316	95.0%
Females	212,665	11,172	256	610	10,306	212,921	10,916	95.1%
Males	210,082	11,610	210	369	11,031	210,292	11,400	94.9%
Asian	43,477	682	15	22	645	43,492	667	98.5%
Hispanic	161,244	14,089	321	653	13,115	161,565	13,768	92.1%
African American	31,143	4,087	74	180	3,833	31,217	4,013	88.6%
White, non-Hispanic	160,124	3,301	51	98	3,152	160,175	3,250	98.0%
Economically Disadvantaged	160,052	11,851	128	234	11,489	160,180	11,723	93.2%
English Learner	63,397	7,524	116	330	7,078	63,513	7,408	89.6%
Special Education	21,286	16,818	22	131	16,665	21,308	16,796	55.9%

[1] Many students in special education programs who had not passed the CAHSEE by the end of the 12th grade were allowed an exemption from the CAHSEE requirement and so were ***excluded*** from all rows of the table except for the last row.

Class of 2008—Students Continued to Take the CAHSEE in Their Sixth Year of High School

Tables 2.41 through 2.46 show estimated cumulative passing rates for the Class of 2008 after including results from the 2009–10 CAHSEE administrations through May 2010. To avoid duplication, we have excluded students who were counted above as in the Class of 2006 or the Class of 2007, even though many of those students were also in grade twelve again in 2008. As with the Class of 2007, the definition of the Class of 2008 used here is students who were first-time grade twelve students in spring 2008. Unlike results for the classes of 2006 and 2007, students in special education were no longer exempted from the CAHSEE requirement in 2008. For consistency with other classes, we continue to report results separately for students in special education and *exclude* these students from counts for other categories. We do, however, also provide alternative tables that include students with disabilities in all rows to provide comparison with some prior year results for these students. Also note that we have remerged data from prior years based on corrected information so that counts of students passing and not passing as of May 2009 differ slightly from the corresponding counts in our 2009 Annual Report.

Inspection of Table 2.41 reveals that more than 4,800 general education students and more than 1,300 special education students in the Class of 2008 who had not passed the CAHSEE by May 2009 continued to try to pass the CAHSEE this year. So far, more than 1,300 of these general education students and approximately 100 of the special education students have now passed, bringing the total passing rates to 94.0 percent for general education students and 59.3 percent for students in special education programs. The cumulative passing rate for the Class of 2008 (94.0 percent) is already higher than the current passing rates for the Class of 2007 (93.1 percent) and the Class of 2006 (92.7 percent).

Table 2.41. Estimated Number and Percentage of Students in the Class of 2008[1] Passing Both CAHSEE Tests Through May 2010, Excluding Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Current Passed	Not Passed	Percent Pass
All Students	416,287	27,964	1,343	3,574	23,047	417,630	26,621	94.0%
Females	212,636	12,829	680	1,900	10,249	213,316	12,149	94.6%
Males	203,651	15,135	663	1,674	12,798	204,314	14,472	93.4%
Native American	3,517	196	4	13	179	3,521	192	94.8%
Asian	42,127	1,339	81	198	1,060	42,208	1,258	97.1%
Pacific Islander	2,930	207	7	20	180	2,937	200	93.6%
Filipino	13,795	335	11	48	276	13,806	324	97.7%
Hispanic	167,430	18,341	930	2,465	14,946	168,360	17,411	90.6%
African American	30,469	4,214	163	512	3,539	30,632	4,051	88.3%
White, non-Hispanic	155,855	3,197	147	318	2,732	156,002	3,050	98.1%
Economically Disadvantaged	158,750	14,932	436	1,262	13,234	159,186	14,496	91.7%
English Learner	49,708	12,387	543	1,663	10,181	50,251	11,844	80.9%
Reclassified Fluent English	68,308	1,334	95	162	1,077	68,403	1,239	98.2%
Special Education	21,852	15,172	108	1,209	13,855	21,960	15,064	59.3%

[1] Students who tested as grade twelve students in 2005–06 (Class of 2006) or 2006–07 (Class of 2007) are ***excluded*** from this table. Class of 2008 students in special education programs are ***excluded*** from all rows except the last row for consistency with other tables.

Table 2.42. Estimated Number and Percentage of Students in the Class of 2008[1] Passing Both CAHSEE Tests Through May 2010, Including Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Current Passed	Not Passed	Percent Pass
All Students	438,139	43,136	1,451	4,783	36,902	439,590	41,685	91.3%
Females	219,949	18,153	718	2,360	15,075	220,667	17,435	92.7%
Males	218,190	24,983	733	2,423	21,827	218,923	24,250	90.0%
Native American	3,771	338	6	20	312	3,777	332	91.9%
Asian	43,113	1,756	90	227	1,439	43,203	1,666	96.3%
Pacific Islander	3,044	302	7	23	272	3,051	295	91.2%
Filipino	14,111	455	11	61	383	14,122	444	97.0%
Hispanic	175,540	26,147	991	3,197	21,959	176,531	25,156	87.5%
African American	32,552	7,109	174	705	6,230	32,726	6,935	82.5%
White, non-Hispanic	165,798	6,816	172	550	6,094	165,970	6,644	96.2%
Economically Disadvantaged	167,128	23,411	481	1,832	21,098	167,609	22,930	88.0%
English Learner	52,813	16,845	579	2,119	14,147	53,392	16,266	76.6%
Reclassified Fluent English	69,962	1,854	99	202	1,553	70,061	1,755	97.6%
Special Education	21,852	15,172	108	1,209	13,855	21,960	15,064	59.3%

[1] Students who tested as grade twelve students in 2005–06 (Class of 2006) or 2006–07 (Class of 2007) are ***excluded*** from this table. Class of 2008 students in special education programs are ***included*** in all rows.

Table 2.43. Estimated Number and Percentage of Students in the Class of 2008[1] Passing the CAHSEE ELA Test Through May 2010, Excluding Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Current Passed	Not Passed	Percent Pass
All Students	426,108	18,143	870	2,066	15,207	426,978	17,273	96.1%
Females	218,276	7,189	394	971	5,824	218,670	6,795	97.0%
Males	207,832	10,954	476	1,095	9,383	208,308	10,478	95.2%
Native American	3,621	92	4	5	83	3,625	88	97.6%
Asian	42,288	1,178	73	183	922	42,361	1,105	97.5%
Pacific Islander	2,998	139	6	13	120	3,004	133	95.8%
Filipino	13,898	232	10	33	189	13,908	222	98.4%
Hispanic	173,397	12,374	597	1,458	10,319	173,994	11,777	93.7%
African American	32,332	2,351	99	218	2,034	32,431	2,252	93.5%
White, non-Hispanic	157,346	1,706	81	156	1,469	157,427	1,625	99.0%
Economically Disadvantaged	163,378	10,304	301	759	9,244	163,679	10,003	94.2%
English Learner	52,249	9,846	445	1,231	8,170	52,694	9,401	84.9%
Reclassified Fluent English	69,111	531	32	44	455	69,143	499	99.3%
Special Education	26,157	10,867	103	866	9,898	26,260	10,764	70.9%

[1] Students who tested as grade twelve students in 2005–06 (Class of 2006) or 2006–07 (Class of 2007) are ***excluded*** from this table. Class of 2008 students in special education programs are ***excluded*** from all rows except the last for consistency with other tables.

Table 2.44. Estimated Number and Percentage of Students in the Class of 2008[1] Passing the CAHSEE ELA Test Through May 2010, Including Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Current Passed	Not Passed	Percent Pass
All Students	452,265	29,010	973	2,932	25,105	453,238	28,037	94.2%
Females	227,507	10,595	432	1,268	8,895	227,939	10,163	95.7%
Males	224,758	18,415	541	1,664	16,210	225,299	17,874	92.6%
Native American	3,913	196	5	11	180	3,918	191	95.4%
Asian	43,354	1,515	79	209	1,227	43,433	1,436	96.8%
Pacific Islander	3,132	214	6	15	193	3,138	208	93.8%
Filipino	14,248	318	10	44	264	14,258	308	97.9%
Hispanic	183,401	18,286	657	2,009	15,620	184,058	17,629	91.3%
African American	35,226	4,435	110	355	3,970	35,336	4,325	89.1%
White, non-Hispanic	168,700	3,914	106	289	3,519	168,806	3,808	97.8%
Economically Disadvantaged	173,755	16,784	350	1,194	15,240	174,105	16,434	91.4%
English Learner	56,146	13,512	480	1,596	11,436	56,626	13,032	81.3%
Reclassified Fluent English	70,974	842	35	70	737	71,009	807	98.9%
Special Education	26,157	10,867	103	866	9,898	26,260	10,764	70.9%

[1] Students who tested as grade twelve students in 2005–06 (Class of 2006) or 2006–07 (Class of 2007) are ***excluded*** from this table. Class of 2008 students in special education programs are ***included*** in all rows.

Table 2.45. Estimated Number and Percentage of Students in the Class of 2008[1] Passing the CAHSEE Mathematics Test Through May 2010, Excluding Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Current Passed	Not Passed	Percent Pass
All Students	424,099	20,152	925	2,358	16,869	425,024	19,227	95.7%
Females	215,582	9,883	499	1,353	8,031	216,081	9,384	95.8%
Males	208,517	10,269	426	1,005	8,838	208,943	9,843	95.5%
Native American	3,542	171	3	9	159	3,545	168	95.5%
Asian	42,987	479	24	56	399	43,011	455	99.0%
Pacific Islander	2,989	148	5	14	129	2,994	143	95.4%
Filipino	13,904	226	7	25	194	13,911	219	98.5%
Hispanic	172,827	12,944	649	1,588	10,707	173,476	12,295	93.4%
African American	31,122	3,561	126	431	3,004	31,248	3,435	90.1%
White, non-Hispanic	156,533	2,519	111	235	2,173	156,644	2,408	98.5%
Economically Disadvantaged	163,250	10,432	304	794	9,334	163,554	10,128	94.2%
English Learner	54,783	7,312	275	849	6,188	55,058	7,037	88.7%
Reclassified Fluent English	68,580	1,062	78	130	854	68,658	984	98.6%
Special Education	24,844	12,180	112	858	11,210	24,956	12,068	67.4%

[1] Students who tested as grade twelve students in 2005–06 (Class of 2006) or 2006–07 (Class of 2007) are ***excluded*** from this table. Class of 2008 students in special education programs are ***excluded*** from all rows except the last for consistency with other tables.

Table 2.46. Estimated Number and Percentage of Students in the Class of 2008[1] Passing the CAHSEE Mathematics Test Through May 2010, Including Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Current Passed	Not Passed	Percent Pass
All Students	448,943	32,332	1,037	3,216	28,079	449,980	31,295	93.5%
Females	223,701	14,401	536	1,707	12,158	224,237	13,865	94.2%
Males	225,242	17,931	501	1,509	15,921	225,743	17,430	92.8%
Native American	3,830	279	5	13	261	3,835	274	93.3%
Asian	44,117	752	30	72	650	44,147	722	98.4%
Pacific Islander	3,138	208	5	16	187	3,143	203	93.9%
Filipino	14,243	323	8	31	284	14,251	315	97.8%
Hispanic	182,571	19,116	715	2,091	16,310	183,286	18,401	90.9%
African American	33,616	6,045	141	580	5,324	33,757	5,904	85.1%
White, non-Hispanic	167,172	5,442	133	413	4,896	167,305	5,309	96.9%
Economically Disadvantaged	173,314	17,225	358	1,189	15,678	173,672	16,867	91.1%
English Learner	58,960	10,698	307	1,150	9,241	59,267	10,391	85.1%
Reclassified Fluent English	70,359	1,457	80	152	1,225	70,439	1,377	98.1%
Special Education	24,844	12,180	112	858	11,210	24,956	12,068	67.4%

[1] Students who tested as grade twelve students in 2005–06 (Class of 2006) or 2006–07 (Class of 2007) are ***excluded*** from this table. Class of 2008 students in special education programs are ***included*** in all rows.

Class of 2009—A Substantial Number of Last Year's Seniors Continued to Take the CAHSEE

Tables 2.47 through 2.52 show estimated cumulative passing rates for the Class of 2009 after including results from the May 2010 CAHSEE administration. **To avoid duplication, we have excluded students who were counted above as in the Class of 2006, the Class of 2007, or the Class of 2008 even though many of those students were also in grade twelve again in 2009.** As with the Class of 2008, the definition of the Class of 2009 used here is students who were first-time grade twelve students in spring 2009. Unlike those in the classes of 2006 and 2007, students in special education were not exempted from the CAHSEE requirement in 2009. For consistency with other classes, we continue to report results separately for students in special education and *exclude* these students from counts for other categories. We do, however, also provide alternative tables that include students with disabilities in all rows to provide comparison with some prior year results for these students.

Table 2.47. Estimated Number and Percentage of Students in the Class of 2009[1] Passing Both CAHSEE Tests Through May 2010, Excluding Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Current Passed	Not Passed	Percent Pass
All Students	417,296	30,104	4,516	9,359	16,229	421,812	25,588	94.3%
Females	212,857	14,164	2,294	4,866	7,004	215,151	11,870	94.8%
Males	204,439	15,940	2,222	4,493	9,225	206,661	13,718	93.8%
Native American	3,370	176	20	40	116	3,390	156	95.6%
Asian	42,426	1,614	315	573	726	42,741	1,299	97.1%
Pacific Islander	2,940	204	25	43	136	2,965	179	94.3%
Filipino	13,924	364	67	109	188	13,991	297	97.9%
Hispanic	175,327	20,156	3,000	6,519	10,637	178,327	17,156	91.2%
African American	29,819	4,281	558	1,297	2,426	30,377	3,723	89.1%
White, non-Hispanic	149,304	3,309	531	778	2,000	149,835	2,778	98.2%
Economically Disadvantaged	166,731	18,080	2,582	5,301	10,197	169,313	15,498	91.6%
English Learner	50,016	13,806	2,030	4,796	6,980	52,046	11,776	81.5%
Reclassified Fluent English	75,924	1,630	341	490	799	76,265	1,289	98.3%
Special Education	21,177	16,077	646	4,943	10,488	21,823	15,431	58.6%

[1] Students who tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007) or 2007–08 (Class of 2008) are ***excluded*** from this table. Class of 2009 students in special education programs are ***excluded*** from all rows except the last for consistency with other tables.

As shown in Table 2.47, nearly 14,000 general education students and more than 5,500 special education students in the Class of 2009 who had not passed the CAHSEE by the end of their senior year last spring continued to try to pass the CAHSEE this year. So far, more than 4,500 additional general education students and 640 additional special education students have now passed, bringing the total passing rates to 94.3 percent for general education students and 58.6 percent for students in special education programs.

Table 2.48. Estimated Number and Percentage of Students in the Class of 2009[1] Passing Both CAHSEE Tests Through May 2010, Including Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Current Passed	Not Passed	Percent Pass
All Students	438,473	46,181	5,162	14,302	26,717	443,635	41,019	91.5%
Females	220,021	19,855	2,503	6,676	10,676	222,524	17,352	92.8%
Males	218,452	26,326	2,659	7,626	16,041	221,111	23,667	90.3%
Native American	3,612	299	22	64	213	3,634	277	92.9%
Asian	43,387	2,099	364	742	993	43,751	1,735	96.2%
Pacific Islander	3,026	296	28	65	203	3,054	268	91.9%
Filipino	14,251	501	70	149	282	14,321	431	97.1%
Hispanic	183,422	28,889	3,365	9,455	16,069	186,787	25,524	88.0%
African American	31,837	7,227	668	2,208	4,351	32,505	6,559	83.2%
White, non-Hispanic	158,734	6,870	645	1,619	4,606	159,379	6,225	96.2%
Economically Disadvantaged	175,385	27,749	2,976	8,279	16,494	178,361	24,773	87.8%
English Learner	53,245	19,190	2,299	6,764	10,127	55,544	16,891	76.7%
Reclassified Fluent English	77,640	2,134	366	611	1,157	78,006	1,768	97.8%
Special Education	21,177	16,077	646	4,943	10,488	21,823	15,431	58.6%

[1] Students who tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007) or 2007–08 (Class of 2008) are ***excluded*** from this table. Class of 2009 students in special education programs are ***included*** in all rows.

Table 2.49. Estimated Number and Percentage of Students in the Class of 2009[1] Passing the CAHSEE ELA Test Through May 2010, Excluding Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Current Passed	Not Passed	Percent Pass
All Students	428,144	19,256	2,782	5,740	10,734	430,926	16,474	96.3%
Females	219,157	7,864	1,252	2,615	3,997	220,409	6,612	97.1%
Males	208,987	11,392	1,530	3,125	6,737	210,517	9,862	95.5%
Native American	3,448	98	14	22	62	3,462	84	97.6%
Asian	42,639	1,401	273	514	614	42,912	1,128	97.4%
Pacific Islander	3,015	129	19	23	87	3,034	110	96.5%
Filipino	14,030	258	45	79	134	14,075	213	98.5%
Hispanic	182,094	13,389	1,860	4,126	7,403	183,954	11,529	94.1%
African American	31,802	2,298	287	606	1,405	32,089	2,011	94.1%
White, non-Hispanic	150,930	1,683	284	370	1,029	151,214	1,399	99.1%
Economically Disadvantaged	172,576	12,235	1,655	3,433	7,147	174,231	10,580	94.3%
English Learner	52,869	10,953	1,607	3,662	5,684	54,476	9,346	85.4%
Reclassified Fluent English	76,935	619	118	152	349	77,053	501	99.4%
Special Education	25,621	11,633	711	3,577	7,345	26,332	10,922	70.7%

[1] Students who tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007) or 2007–08 (Class of 2008) are ***excluded*** from this table. Class of 2009 students in special education programs are ***excluded*** from all rows except the last for consistency with other tables.

Table 2.50. Estimated Number and Percentage of Students in the Class of 2009[1] Passing the CAHSEE ELA Test Through May 2010, Including Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Current Passed	Not Passed	Percent Pass
All Students	453,765	30,889	3,493	9,317	18,079	457,258	27,396	94.3%
Females	228,229	11,647	1,484	3,855	6,308	229,713	10,163	95.8%
Males	225,536	19,242	2,009	5,462	11,771	227,545	17,233	93.0%
Native American	3,730	181	17	37	127	3,747	164	95.8%
Asian	43,664	1,822	318	670	834	43,982	1,504	96.7%
Pacific Islander	3,124	198	22	39	137	3,146	176	94.7%
Filipino	14,394	358	50	110	198	14,444	308	97.9%
Hispanic	192,282	20,029	2,273	6,327	11,429	194,555	17,756	91.6%
African American	34,677	4,387	417	1,222	2,748	35,094	3,970	89.8%
White, non-Hispanic	161,690	3,914	396	912	2,606	162,086	3,518	97.9%
Economically Disadvantaged	183,497	19,637	2,089	5,711	11,837	185,586	17,548	91.4%
English Learner	57,020	15,415	1,920	5,292	8,203	58,940	13,495	81.4%
Reclassified Fluent English	78,843	931	134	223	574	78,977	797	99.0%
Special Education	25,621	11,633	711	3,577	7,345	26,332	10,922	70.7%

[1] Students who tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007) or 2007–08 (Class of 2008) are ***excluded*** from this table. Class of 2009 students in special education programs are ***included*** in all rows.

Table 2.51. Estimated Number and Percentage of Students in the Class of 2009[1] Passing the CAHSEE Mathematics Test Through May 2010, Excluding Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Current Passed	Not Passed	Percent Pass
All Students	426,098	21,302	3,200	5,919	12,183	429,298	18,102	96.0%
Females	216,313	10,708	1,764	3,354	5,590	218,077	8,944	96.1%
Males	209,785	10,594	1,436	2,565	6,593	211,221	9,158	95.8%
Native American	3,401	145	15	31	99	3,416	130	96.3%
Asian	43,490	550	91	146	313	43,581	459	99.0%
Pacific Islander	2,996	148	19	30	99	3,015	129	95.9%
Filipino	14,060	228	40	58	130	14,100	188	98.7%
Hispanic	181,415	14,068	2,208	4,012	7,848	183,623	11,860	93.9%
African American	30,476	3,624	454	1,071	2,099	30,930	3,170	90.7%
White, non-Hispanic	150,074	2,539	373	571	1,595	150,447	2,166	98.6%
Economically Disadvantaged	172,422	12,389	1,803	3,169	7,417	174,225	10,586	94.3%
English Learner	55,836	7,986	1,175	2,326	4,485	57,011	6,811	89.3%
Reclassified Fluent English	76,248	1,306	277	399	630	76,525	1,029	98.7%
Special Education	24,656	12,598	639	3,556	8,403	25,295	11,959	67.9%

[1] Students who tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007) or 2007–08 (Class of 2008) are ***excluded*** from this table. Class of 2009 students in special education programs are ***excluded*** from all rows except the last for consistency with other tables.

Table 2.52. Estimated Number and Percentage of Students in the Class of 2009[1] Passing the CAHSEE Mathematics Test Through May 2010, Including Students with Disabilities

Group	By May 2009		July 2009–May 2010			Cumulative Total		
	Passed	Not Yet Passed	Pass	Not Pass	Not Tested	Current Passed	Not Passed	Percent Pass
All Students	450,754	33,900	3,839	9,475	20,586	454,593	30,061	93.8%
Females	224,510	15,366	1,975	4,711	8,680	226,485	13,391	94.4%
Males	226,244	18,534	1,864	4,764	11,906	228,108	16,670	93.2%
Native American	3,667	244	18	50	176	3,685	226	94.2%
Asian	44,680	806	111	218	477	44,791	695	98.5%
Pacific Islander	3,107	215	25	40	150	3,132	190	94.3%
Filipino	14,421	331	43	83	205	14,464	288	98.0%
Hispanic	191,539	20,772	2,580	6,086	12,106	194,119	18,192	91.4%
African American	32,915	6,149	579	1,813	3,757	33,494	5,570	85.7%
White, non-Hispanic	160,221	5,383	483	1,185	3,715	160,704	4,900	97.0%
Economically Disadvantaged	183,178	19,956	2,207	5,268	12,481	185,385	17,749	91.3%
English Learner	60,588	11,847	1,419	3,578	6,850	62,007	10,428	85.6%
Reclassified Fluent English	78,091	1,683	297	485	901	78,388	1,386	98.3%
Special Education	24,656	12,598	639	3,556	8,403	25,295	11,959	67.9%

[1] Students who tested as grade twelve students in 2005–06 (Class of 2006), 2006–07 (Class of 2007) or 2007–08 (Class of 2008) are ***excluded*** from this table. Class of 2009 students in special education programs are ***included*** in all rows.

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Summary of Test Results

CAHSEE test results show significant increases in mastery of targeted skills since the implementation of the CAHSEE requirement. As shown in Table 2.18, overall passing rates for seniors have increased steadily from 91 percent for the Class of 2006 to 95 percent for this year's Class of 2010. Similarly, overall passing rates for grade ten students taking the CAHSEE for the first time have increased steadily from 72 percent for the Class of 2006 (tested in 2004) to 78 percent for the Class of 2012 tested this year. As shown in Table 2.31, initial passing rates have increased significantly for all demographic groups including, most dramatically, students with disabilities, whose initial passing rates increased from 28 percent to 35 percent. That said, it should also be noted that passing rates for students with disabilities are still unacceptably low and that passing rates for English learners are also low and have increased only modestly since the CAHSEE requirement went into effect. Passing rates for economically disadvantaged and minority student also continue to be significant lower than passing rates for white and Asian students at all grade levels.

Another encouraging finding is the large number of students who continue to try to pass the CAHSEE after their originally scheduled graduation date. Of students in the Class of 2009 who did not complete the CAHSEE requirement by the end of their senior year, nearly half of the general education students and over 5,000 of the special education students took the CAHSEE one or more times this year. Also about 20 percent of the students in the Class of 2008 who had not yet passed the CAHSEE continued to try to pass it this year.

One other significant trend since the implementation of the CAHSEE requirement has been the proportion of students taking more advanced mathematics courses in high school. As shown in Table 2.33, the percentage of students taking math courses beyond Algebra I by grade ten has increased from 56 percent for the Class of 2006 to 72 percent for this year's grade ten students in the Class of 2012. All demographic groups showed significant increases in the percentage of students taking more advanced courses, including very significant gains of from 19 percent to 42 percent for students in special education. Here too, however, significant gaps exist. Analyses show that fewer students with disabilities, English learners, economically disadvantaged students, and minority students are taking advanced mathematics courses by grade ten.

Chapter 3: Student Questionnaire Responses

Rebecca L. Norman Dvorak

HumRRO designed a student questionnaire that was administered to all students at the end of the CAHSEE ELA and mathematics tests. The questionnaire included 16 items. We designed 14 of the items to investigate multiple topics including how students (a) prepared for the CAHSEE, (b) made graduation and post-high school plans, (c) felt about course content and instruction coverage, and (d) put effort into the CAHSEE. The remaining two questions were included to aid in matching students for longitudinal study purposes. The questionnaire has been administered since 2001; we made significant changes in 2005 and minor changes in more recent years. This study is based on student response data from 2005 through 2010. First we examine grade ten student responses, followed by a selection of responses for 2010 grade twelve students who took the CAHSEE. Questionnaires were administered after the ELA CAHSEE and after the mathematics CAHSEE. Results in this chapter are provided for each.

Grade Ten Student Questionnaire Respondents

Table 3.1 displays passing rates and demographic characteristics of the grade ten students who completed the CAHSEE ELA and mathematics tests in 2010. Most of the students (80 percent passed the ELA and mathematics CAHSEE. Hispanics made up approximately half of the grade ten population (49.1 percent). Whites were the next largest group (29.5 percent) followed by Asian (9.1 percent), African Americans (7.9 percent), Filipino (3 percent), American Indian or Alaskan Native (0.8 percent), and Pacific Islander (7.6 percent). Just over 8 percent of the students had disabilities and slightly more than 15 percent were English learners. Approximately half (48.1 percent) of the students were labeled economically disadvantaged.

Table 3.1. Demographic Characteristics of 2010 Student Questionnaire Respondents (10th Graders in 2010)

Variable		**ELA** (n = 478,373)	**Math** (n = 478,753)
Pass	No	19.6	19.7
	Yes	80.4	80.3
Gender	Female	49.0	49.0
	Male	51.1	51.0
Ethnicity	American Indian or Alaskan Native	1.1	1.1
	Asian	9.1	9.1
	Pacific Islander	0.7	0.7
	Filipino	3.0	3.0
	Hispanic	49.1	49.1
	African American	7.6	7.7
	White	29.5	29.4
Disability (SWD)	No	91.7	91.7
	Yes	8.3	8.3
English Learner (EL)	No	84.7	84.7
	Yes	15.4	15.3
Economically Disadvantaged (ED)	No	51.2	51.1
	Yes	48.1	48.1

Comparisons on Student Perspective

We analyzed the trends and changes in students' perceptions after they took the CAHSEE mathematics and ELA tests by comparing:

- grade ten student responses from 2005 to 2010.
- grade ten student responses in 2010 by passing categories (whether they passed both tests, only ELA, only mathematics, or neither test).
- 2010 grade ten responses by key demographic characteristics (gender, ethnicity, disability status, English learner status, economic disadvantage status).
- 2010 grade twelve responses in 2008 and 2010 by those who passed in 2010 and those who did not.

The first part of this chapter presents the results of the first two sets of analyses—comparing student responses across years and by passing category. The results are organized by topic and question, and the response data is displayed using both tables and bar graphs. Two survey questions (#s 2 and 8) were new in 2009 and therefore have only two years of data to compare.

The second part of this chapter presents the results from the third set of analyses listed above, those comparing student responses by key demographic characteristics. A summary of findings is provided by topic.

Lastly, we present and discuss a selection of responses of 2010 grade twelve students who are still attempting to pass the CAHSEE.

Findings from 2010 Grade Ten Student Responses

Test Preparation

Question 1: How did you prepare for this test?

After taking the ELA and mathematics tests in 2010, slightly more students than in previous years reported that they had prepared by practicing questions similar to those on the CAHSEE. A slight increase in the number of students taking the ELA reported having taken a special course during the regular school day to prepare; among those taking the mathematics test, there was a slight increase in those who reported having taken a special course after school. The percentage of students who claimed they did not do anything in addition to coursework to prepare decreased slightly from previous years (see Table 3.2).

Table 3.2. Question 1: How Did You Prepare for This Test? (Mark All That Apply) (10th Graders' Responses From 2005–2010)

After ELA	Percentage					
	2005	2006	2007	2008	2009	2010
A. A teacher or counselor told me about the purpose and importance of the test.	29.1	30.9	34.4	35.6	37.0	36.6
B. I practiced on questions similar to those on the test.	31.1	32.4	33.8	33.6	32.0	35.3
C. A teacher spent time in class helping me to get ready to take the test.	40.5	40.3	36.4	37.1	37.9	38.5
D. I took a special class during the regular school day that covered the topics on the CAHSEE.	n/a	n/a	5.1	5.7	6.4	6.6
E. I took a special class after school or during the summer that covered the topics on the CAHSEE.	n/a	n/a	3.1	3.0	3.3	3.3
F. I did not do anything in addition to regular course work to prepare for this test.	29.6	29.3	20.6	29.9	29.5	27.7
After Mathematics	**Percentage**					
	2005	**2006**	**2007**	**2008**	**2009**	**2010**
A. A teacher or counselor told me about the purpose and importance of the test.	26.7	28.2	31.6	32.3	34.5	34.4
B. I practiced on questions similar to those on the test.	31.3	32.6	33.25	33.2	33.2	36.2
C. A teacher spent time in class helping me to get ready to take the test.	26.5	26.3	24.27	24.6	25.3	26.2
D. I took a special class during the regular school day that covered the topics on the CAHSEE.	n/a	n/a	4.48	4.9	5.7	5.7
E. I took a special class after school or during the summer that covered the topics on the CAHSEE.	n/a	n/a	2.84	2.7	3.0	3.1
F. I did not do anything in addition to regular course work to prepare for this test.	37.7	37.2	37.3	36.9	35.7	34.1

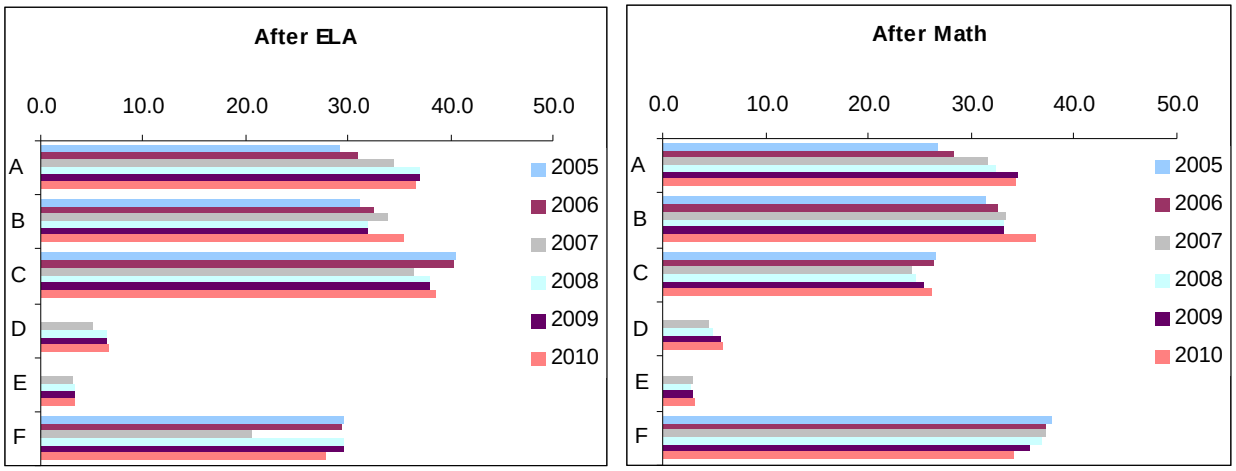

Figure 3.1. Test preparation by 10th graders over the years as reported by students after CAHSEE ELA and mathematics tests, in percentages.

As shown in Table 3.3, students who passed both tests were most likely to report that their teachers or counselors emphasized the importance of the test. Additionally, more students who passed both CAHSEE tests were likely to report having received help from teachers during class time to help prepare. Students who passed both tests

were also the most likely to report that they did not do anything in addition to regular coursework to prepare for the CAHSEE.

Table 3.3. Question 1: How Did You Prepare for This Test (Mark All That Apply) (Percentages of 10th Graders' Responses in 2010 by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Tests Passed, After Math			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. A teacher or counselor told me about the purpose and importance of the test.	38.1	31.5	33.8	32.1	35.3	30.8	33.1	32.1
B. I practiced on questions similar to those on the test.	37.7	32.5	31.6	24.7	37.6	34.1	38.7	28.6
C. A teacher spent time in class helping me to get ready to take the test.	40.8	34.0	36.3	28.9	26.5	24.7	29.8	24.1
D. I took a special class during the regular school day that covered the topics on the CAHSEE	5.5	9.4	10.3	9.5	4.9	8.2	8.9	7.8
E. I took a special class after school or during the summer that covered the topics on the CAHSEE	3.0	3.7	4.8	4.5	2.9	3.5	4.3	3.8
F. I did not do anything in addition to regular course work to prepare for this test.	30.4	21.6	18.6	18.3	38.0	26.9	19.9	20.4

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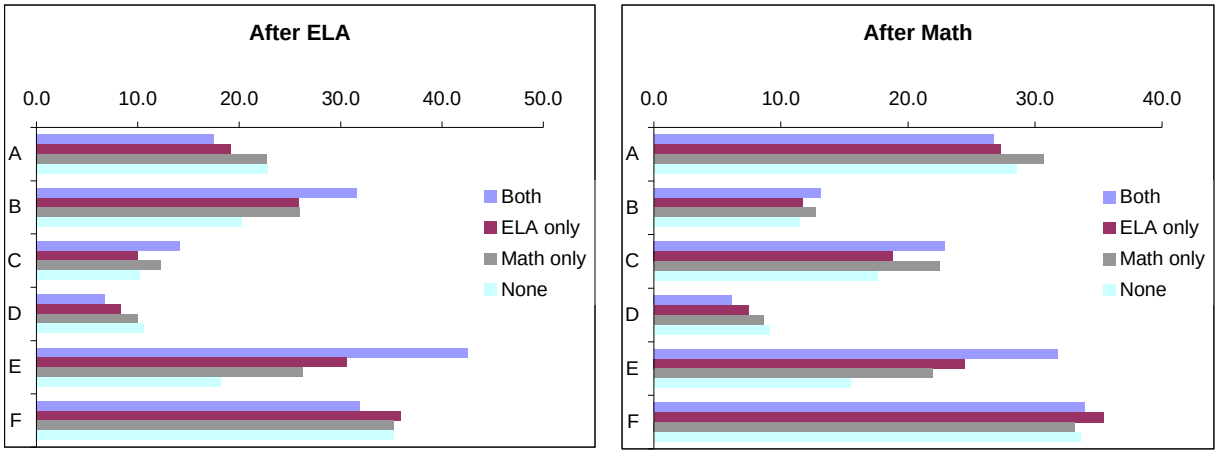


Figure 3.2. Test preparation of students as reported after taking CAHSEE ELA and math tests by tests passed in 2010, in percentages.

Question 2: What materials did you use to prepare for this test?

In 2010, more students reported using the ELA and math student guides to prepare for the CAHSEE than in 2009. There was a slight drop in the usage of textbooks, the CAHSEE Web site, released test questions, and other resources during this same time period (see Table 3.4). This question was a new addition to in 2009; therefore, comparisons could be made across only two years.

Table 3.4. Question 2: What Materials Did You Use to Prepare for This Test? (Mark All That Apply) (10th Graders' Responses, 2009–2010)

After ELA	Percentage 2009	2010
A. Textbooks	20.0	18.7
B. ELA Student Guide (blue and gold booklet)	19.2	29.4
C. Mathematics Student Guide (green and gold booklet)	8.1	13.3
D. CAHSEE Web Site	8.5	7.5
E. Released (sample) test questions	39.8	37.7
F. Other resources	37.7	32.9
After Mathematics	**Percentage 2009**	**2010**
A. Textbooks	28.9	27.2
B. ELA Student Guide (blue and gold booklet)	9.6	12.8
C. Mathematics Student Guide (green and gold booklet)	12.6	21.9
D. CAHSEE Web Site	7.5	6.8
E. Released (sample) test questions	29.8	28.6
F. Other resources	38.7	34.0

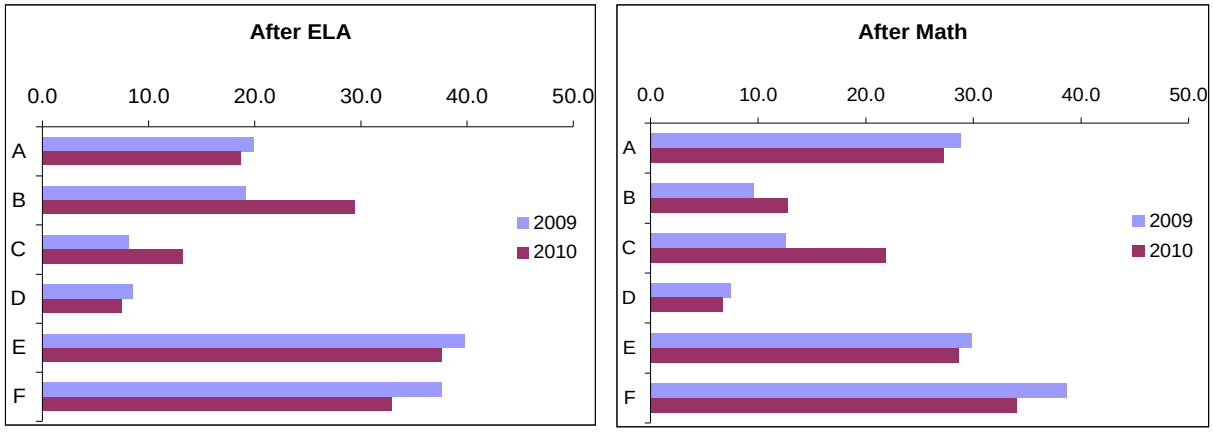


Figure 3.3. Students report materials used to prepare for CAHSEE ELA and mathematics tests in 2009 and 2010, in percentages.

Students who passed both tests were most likely to have used released (sample) test questions and the ELA and mathematics student guides to prepare for the CAHSEE, while those who did not pass either test were least likely to have used them. As shown in Table 3.5, the CAHSEE Web site was not used for test preparation by most students, and those who passed both tests were the least likely to use it.

Table 3.5. Question 2: What Materials Did You Use to Prepare for This Test? (Mark All That Apply) (Percentages of 10th Graders' Responses in 2010 by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Tests Passed, After Mathematics			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. Textbooks	17.6	19.2	22.7	22.8	26.7	27.3	30.7	28.6
B. ELA Student Guide (blue and gold booklet)	31.6	25.9	26.0	20.2	13.1	11.7	12.8	11.5
C. Mathematics Student Guide (green and gold booklet)	14.2	10.0	12.3	10.2	22.9	18.8	22.5	17.6
D. CAHSEE Web Site	6.7	8.3	10.1	10.6	6.1	7.5	8.7	9.1
E. Released (sample) test questions	42.6	30.7	26.2	18.2	31.8	24.5	22.0	15.5
F. Other resources	31.9	35.9	35.2	35.3	34.0	35.4	33.2	33.6

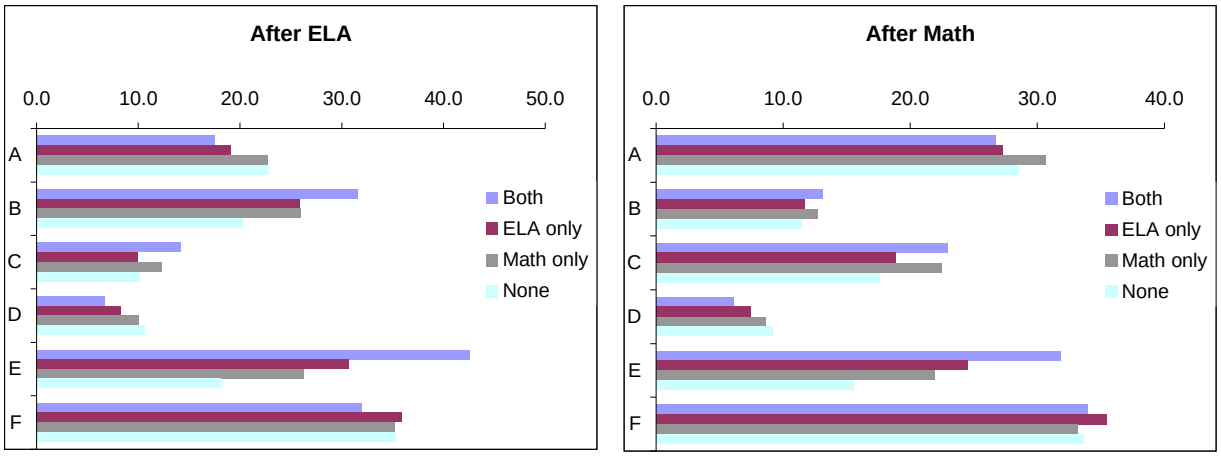


Figure 3.4. Materials used by 10th grade students, by percentage, as reported after taking ELA and mathematics tests in 2010

Importance of the Tests

Question 3: How important is this test for you?

The percentage of grade ten students who reported that the CAHSEE was "very important" peaked in 2006, corresponding to the first year that passing the CAHSEE was required for graduation. This number dropped in 2007 and has stayed relatively stable since. Beginning in 2006 there has been a slight increase in the percentage of students who reported that the CAHSEE was not important (see Table 3.6).

Table 3.6. Question 3: How Important Is This Test for You? (10th Graders' Responses, 2005–2010)

After ELA	Percentage					
	2005	2006	2007	2008	2009	2010
A. Very important	75.5	90.2	78.4	78.9	80.6	79.8
B. Somewhat important	20.2	6.9	18.1	17.7	15.6	16.2
C. Not important	4.4	2.9	3.5	3.3	3.8	3.9
After Mathematics	**Percentage**					
	2005	2006	2007	2008	2009	2010
A. Very important	74.8	89.9	78.5	79.0	80.1	79.4
B. Somewhat important	20.6	7.3	17.8	17.4	15.6	16.2
C. Not important	4.6	2.9	3.7	3.7	4.3	4.4

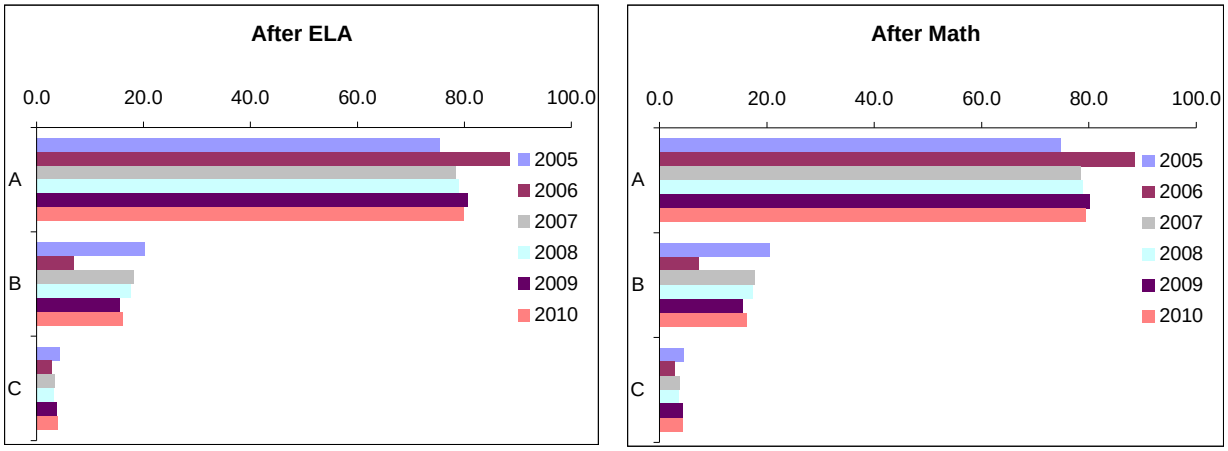


Figure 3.5. Evaluation of degree of importance of CAHSEE tests by 10th graders from, 2005–2010, in percentages.

Most students, regardless of tests passed, perceived the CAHSEE to be very important. Students who passed only one test (either ELA or mathematics) were most likely to report that the CAHSEE was 'very important' and least likely to report that it was 'not important.' The highest percentage responding that the test was "not important" came from among those who did not pass either test. Those who passed both tests were the least likely to perceive the test as 'very important' (see Table 3.7).

Table 3.7. Question 3: How Important Is This Test for You? (Percentages of 10th Graders' Responses by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Tests Passed, After Mathematics			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. Very important	78.7	87.8	85.3	80.8	78.4	85.4	85.7	79.9
B. Somewhat important	17.3	10.3	11.8	14.3	17.1	12.0	11.3	15.0
C. Not important	4.0	2.0	2.9	4.9	4.5	2.7	2.9	5.1

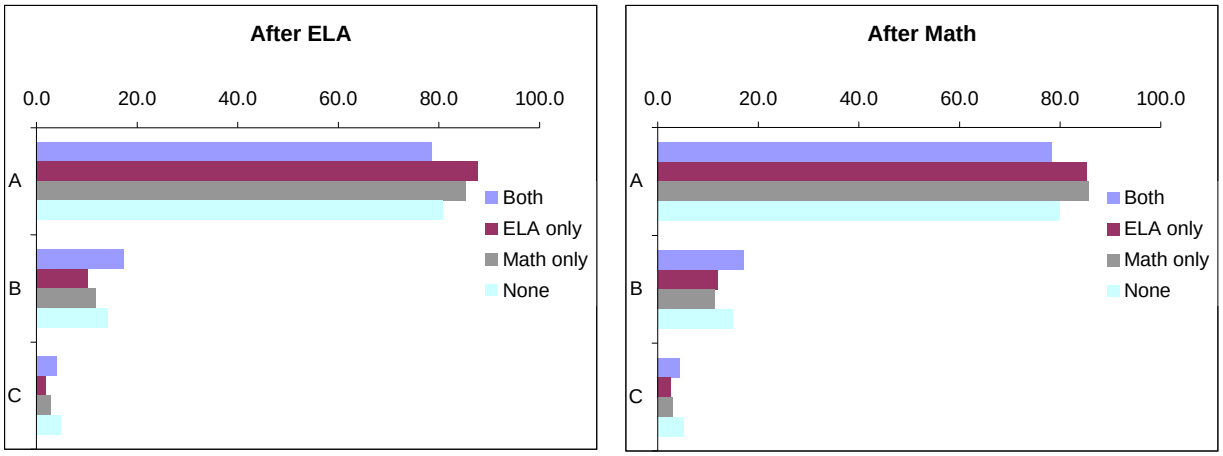


Figure 3.6. 10th Graders' evaluations of importance of the CAHSEE by tests passed in 2010, in percentages.

Graduation Expectations and Post-High School Plans

Question 4: Do you think you will receive a high school diploma?

Question 4 was revised for the 2009 CAHSEE administration, providing only two years of data to compare. Table 3.8 reveals little to no change in grade ten student expectations towards receiving a high school diploma between 2009 and 2010. The majority, approximately 84 percent (responding after both ELA and mathematics tests), do expect to earn their diploma with the rest of their class or earlier. Just over 1 percent of grade ten students said they expect to take the GED or CHSPE instead of receiving a high school diploma.

Table 3.8. Question 4: Do You Think You Will Receive a High School Diploma? (10th Graders' Responses in 2009–2010)

After ELA	Percentage 2009	2010
A. Yes, with the rest of my class (or earlier).	84.4	84.3
B. Yes, but I will likely have to take classes after my original graduation date.	9.9	10.2
C. Yes, but I will pursue a diploma in Adult Education.	2.5	2.4
D. No, I probably will not receive a high school diploma.	2.1	2.0
E. No, I plan to take the GED.	0.7	0.7
F. No, I plan to take the CHSPE.	0.4	0.4

After Mathematics	Percentage 2009	2010
A. Yes, with the rest of my class (or earlier).	84.0	83.9
B. Yes, but I will likely have to take classes after my original graduation date.	10.1	10.3
C. Yes, but I will pursue a diploma in Adult Education.	2.3	2.3
D. No, I probably will not receive a high school diploma.	2.4	2.4
E. No, I plan to take the GED.	0.8	0.8
F. No, I plan to take the CHSPE.	0.5	0.5

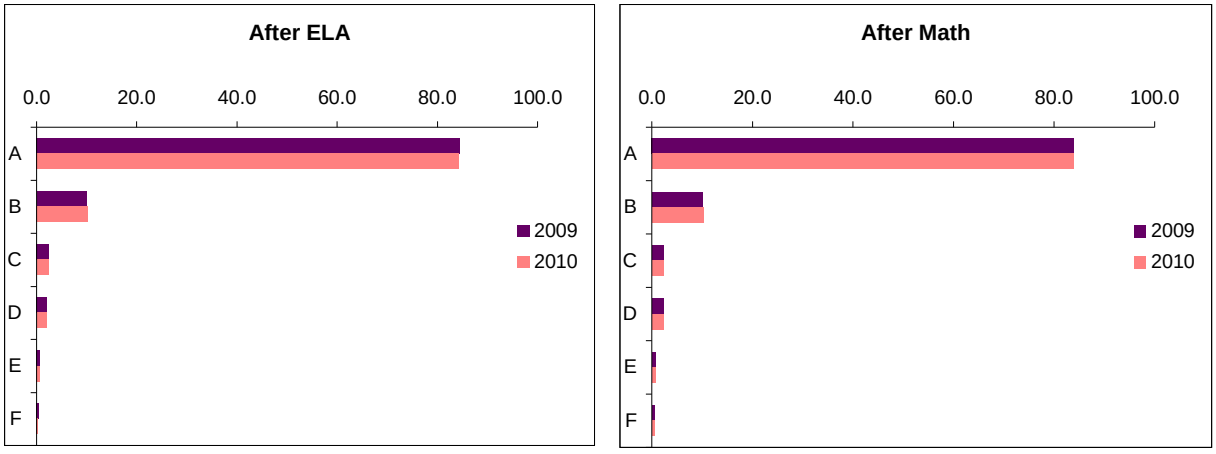


Figure 3.7. Comparison of 10th Graders' expectation of receiving a high school diploma, by percentage, after taking ELA and mathematics tests in 2009 and 2010.

As shown in Table 3.9, the majority of all groups of students believed that they would receive a high school diploma with the rest of their class or earlier. However, there were large differences in the number reporting that they would do so depending on whether students passed one or both tests. Over 90 percent of students who passed both tests believed that they would receive their diplomas with their class, while just over half of those who passed neither test believed that they would. Approximately 25 percent of students who did not pass either test believed that they would need extra time to earn their diploma.

Table 3.9. Question 4: Do You Think You Will Receive a High School Diploma? (Percentages of 10th Graders' Responses in 2010 by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Tests Passed, After Mathematics			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. Yes, with the rest of my class (or earlier).	91.4	71.8	70.5	55.2	90.8	70.6	71.4	55.8
B. Yes, but I will likely have to take classes after my original graduation date.	6.1	20.4	19.5	25.0	6.2	20.8	19.0	24.5
C. Yes, but I will pursue a diploma in Adult Education.	1.3	3.5	4.3	7.7	1.3	3.2	3.8	7.0
D. No, I probably will not receive a high school diploma.	0.7	3.0	4.1	8.3	1.0	3.7	4.3	9.0
E. No, I plan to take the GED.	0.3	1.0	1.1	2.6	0.4	1.2	1.0	2.5
F. No, I plan to take the CHSPE.	0.2	0.3	0.5	1.3	0.4	0.5	0.6	1.2

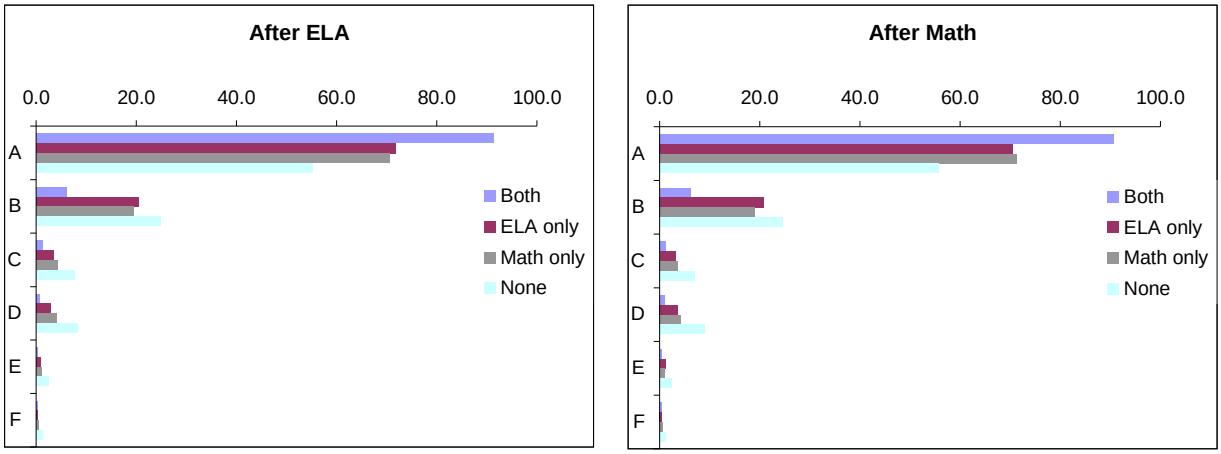


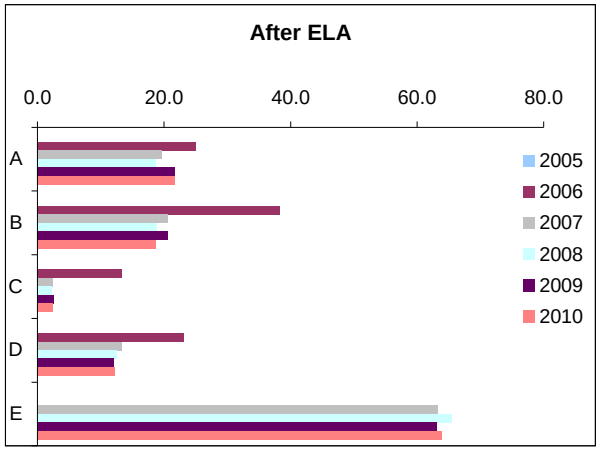
Figure 3.8. Comparison of 10th graders' expectation of receiving a diploma by tests passed in 2010, in percentages.

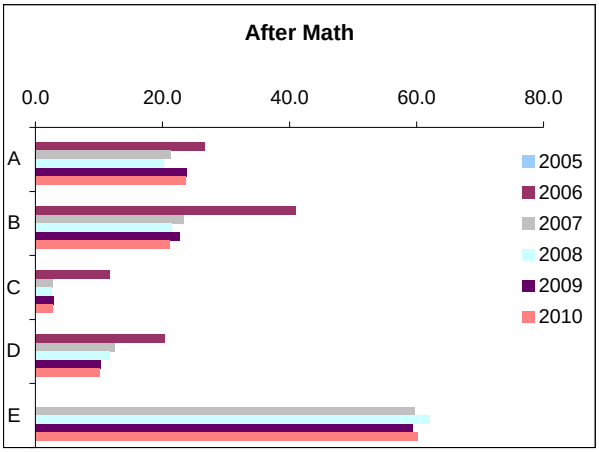
Question 5: What might prevent you from obtaining a high school diploma?

In 2006 there was a peak in the number of students who believed that not passing the CAHSEE might prevent them from obtaining a high school diploma. As mentioned previously, this was the first year that the CAHSEE was a graduation requirement. Aside from this, students have been fairly consistent in their beliefs in what might prevent them from earning a diploma (see Table 3.10). After both ELA and mathematics, not passing required courses is the most common reason cited, followed closely by not passing the CAHSEE. A slight wording change, noted below, was made to the 2009 and 2010 questionnaires.

Table 3.10. Question 5: What Might Prevent You From Receiving a High School Diploma? (Mark All That Apply) (10th Graders' Responses From 2005–2010)*

After ELA	Percentage					
	2005	2006	2007	2008	2009	2010
A. I may not pass all the required courses.	n/a	25.1	19.7	18.8	21.8	21.7
B. I may not pass the CAHSEE exam.	n/a	38.4	20.6	18.9	20.6	18.7
C. I may drop out before the end of 12th grade.	n/a	13.3	2.5	2.3	2.6	2.5
D. I may not meet some other graduation requirement.	n/a	23.2	13.4	12.6	12.2	12.2
E. I am confident I will receive a high school diploma.	n/a	n/a	63.3	65.6	63.1	63.9
After Mathematics	**Percentage**					
	2005	**2006**	**2007**	**2008**	**2009**	**2010**
A. I may not pass all the required courses.	n/a	26.7	21.4	20.3	23.8	23.6
B. I may not pass the CAHSEE exam.	n/a	41.1	23.3	21.4	22.8	21.1
C. I may drop out before the end of 12th grade.	n/a	11.8	2.8	2.6	2.9	2.8
D. I may not meet some other graduation requirement.	n/a	20.4	12.6	11.8	10.3	10.2
E. I am confident I will receive a high school diploma.	n/a	n/a	59.8	62.2	59.4	60.3





*In 2009 the wording of question 5 was changed from 'what might prevent you from graduating high school' to 'what might prevent you from receiving a high school diploma.'

Figure 3.9. 10th graders' reasons why they might not graduate with their class, as reported from 2005 through 2010, in percentages.

The majority of grade ten students who passed both tests reported they were confident they would earn a diploma. Less than 30 percent (29.9% after ELA and 23.9 percent after mathematics) of grade ten students who did not pass either test felt confident that they would earn a high school diploma. Not passing the CAHSEE was found to be more of a concern for grade ten students than not passing the required courses for all students who did not pass at least one test (see Table 3.11). For those who passed both tests, not passing all required courses was the most common concern.

Table 3.11. Question 5: What Might Prevent You From Receiving a High School Diploma? (Mark All That Apply) (Percentages of 10th Graders' Responses by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Tests Passed, After Mathematics			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. I may not pass all the required courses.	18.5	35.0	31.0	29.8	20.2	37.5	33.9	31.7
B. I may not pass the CAHSEE exam.	12.9	31.7	36.7	39.4	15.0	39.2	36.2	41.4
C. I may drop out before the end of 12th grade	1.6	2.8	4.8	6.6	2.0	3.3	4.8	6.5
D. I may not meet some other graduation requirement.	11.0	19.6	16.1	13.8	9.2	15.0	13.7	11.8
E. I am confident I will receive a high school diploma.	73.5	40.8	38.2	29.9	70.1	33.9	35.9	26.9

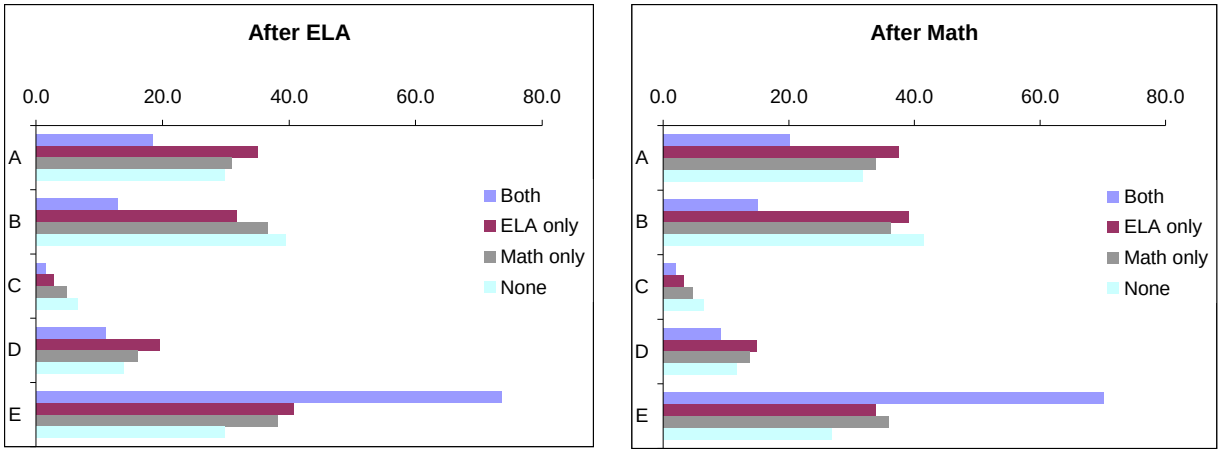


Figure 3.10. Reasons for 10th graders reporting possibly not receiving a diploma on time, by tests passed in 2010, in percentages.

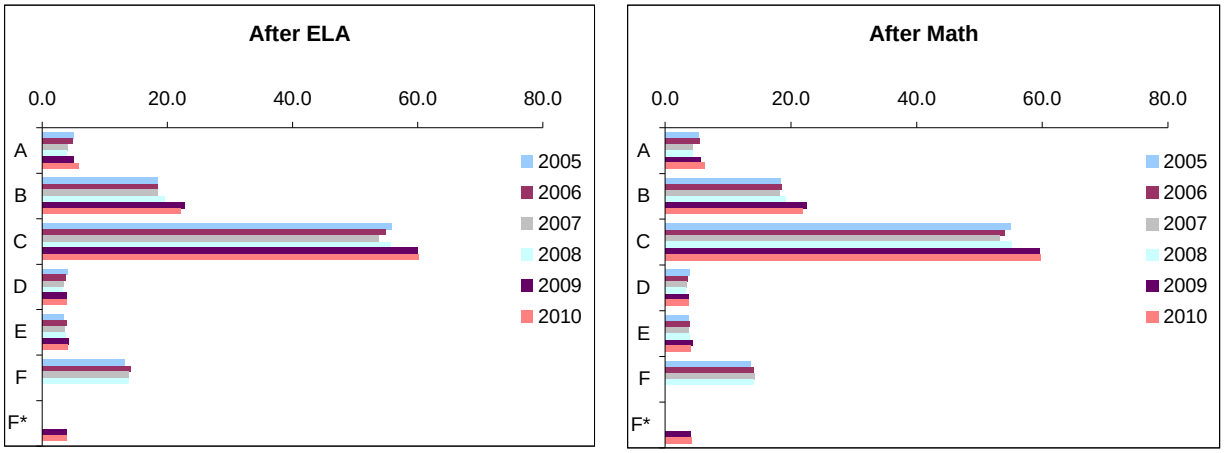
Question 6: What do you think you will do after high school?

The response option "F" for Question 6 was modified in 2009 as shown in Table 3.12. This change influenced how students responded to the question. Because fewer

students chose option "F" with the new wording, there was an increase in every other category for 2009 and 2010; thus, the results cannot be compared directly to those of previous years. In 2010 a slightly higher percentage of students said they planned to join the military after high school.

Table 3.12. Question 6: What Do You Think You Will Do After High School? (10th Graders' Responses From 2005–2010)

After ELA	Percentage					
	2005	2006	2007	2008	2009	2010
A. I will join the military.	5.0	4.9	4.1	3.9	5.0	5.8
B. I will go to a community college.	18.4	18.5	18.5	19.6	22.8	22.1
C. I will go to a 4-year college or university.	55.9	54.8	53.8	55.7	60.0	60.1
D. I will go to a vocational, technical, or trade school.	4.0	3.7	3.5	3.4	4.0	3.9
E. I will work full-time.	3.5	3.9	3.6	3.7	4.3	4.1
F. I really don't know what I will do after high school.	13.2	14.2	13.8	13.8	n/a	n/a
F.* Do something else (besides school, work, or the military)	n/a	n/a	n/a	n/a	3.9	4.0
After Mathematics	**Percentage**					
	2005	**2006**	**2007**	**2008**	**2009**	**2010**
A. I will join the military.	5.4	5.5	4.4	4.3	5.6	6.3
B. I will go to a community college.	18.3	18.6	18.2	19.3	22.5	21.9
C. I will go to a 4-year college or university.	55.0	54.1	53.2	55.1	59.6	59.7
D. I will go to a vocational, technical, or trade school.	4.0	3.6	3.4	3.3	3.8	3.7
E. I will work full-time.	3.7	4.0	3.8	3.8	4.4	4.2
F. I really don't know what I will do after high school.	13.6	14.1	14.2	14.2	n/a	n/a
F.* Do something else (besides school, work, or the military)	n/a	n/a	n/a	n/a	4.1	4.2



* Option 'F' was revised in 2009.

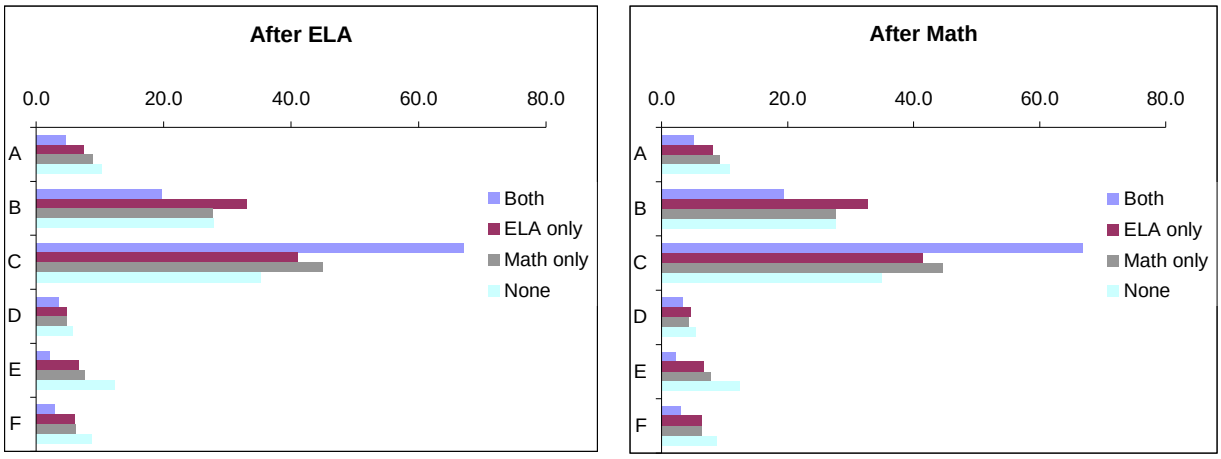
Figure 3.11. 10th graders estimate of what they will do after high school, by percentage from 2005 - 2010, after taking ELA and mathematics tests.

Students who passed both tests were most likely to report they would attend a four-year college or university after high school. These students were also the least

likely to report that they planned to join the military—those who passed neither test were the most likely to do so. Those who did not pass either test were also more likely than others to report they would work full-time or do something besides go to school, work, or join the military after high school (see Table 3.13).

Table 3.13. Question 6: What Do You Think You Will Do After High School? (Percentages of 10th Graders' Responses by Tests Passed)

Response Choice	Tests Passed (After ELA)				Tests Passed, After Math			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. I will join the military.	4.6	7.4	8.9	10.4	5.1	8.1	9.3	10.9
B. I will go to a community college.	19.8	33.1	27.7	27.8	19.4	32.7	27.7	27.7
C. I will go to a 4-year college or university.	67.1	41.1	44.9	35.2	66.8	41.5	44.7	35.0
D. I will go to a vocational, technical, or trade school.	3.5	4.9	4.8	5.7	3.3	4.6	4.4	5.4
E. I will work full-time.	2.2	6.7	7.6	12.3	2.3	6.8	7.7	12.3
F. Do something else (besides school, work, or the military)	2.8	6.1	6.1	8.7	3.1	6.4	6.3	8.7



*Option 'F' was revised in 2009.

Figure 3.12. 10th graders' estimate of what they will do after high school by tests passed in 2010, in percentages.

Question 7: How sure are you about what you will do after high school?

In 2010, as in previous years, the majority (over 90 percent) of students were at least somewhat sure about their post high school plans. (See Table 3.14.) A slightly higher percentage of students in 2010 reported not being sure compared to 2009; however this percentage was still lower than all previous years before 2009.

Table 3.14. Question 7: How Sure Are You About What You Will Do After High School? (10th Graders' Responses 2005–2010)

After ELA	Percentage					
	2005	2006	2007	2008	2009	2010
A. Very sure	43.4	40.3	41.06	40.7	44.4	43.9
B. Somewhat sure	44.2	47.4	46.84	47.5	46.5	46.8
C. Not sure at all	12.4	12.2	12.01	11.8	9.1	9.4
After Mathematics	**Percentage**					
	2005	**2006**	**2007**	**2008**	**2009**	**2010**
A. Very sure	44.4	41.7	42.2	41.9	45.27	44.8
B. Somewhat sure	42.9	46.3	45.45	46.1	45.66	45.8
C. Not sure at all	12.7	12.1	12.21	12.0	9.07	9.4

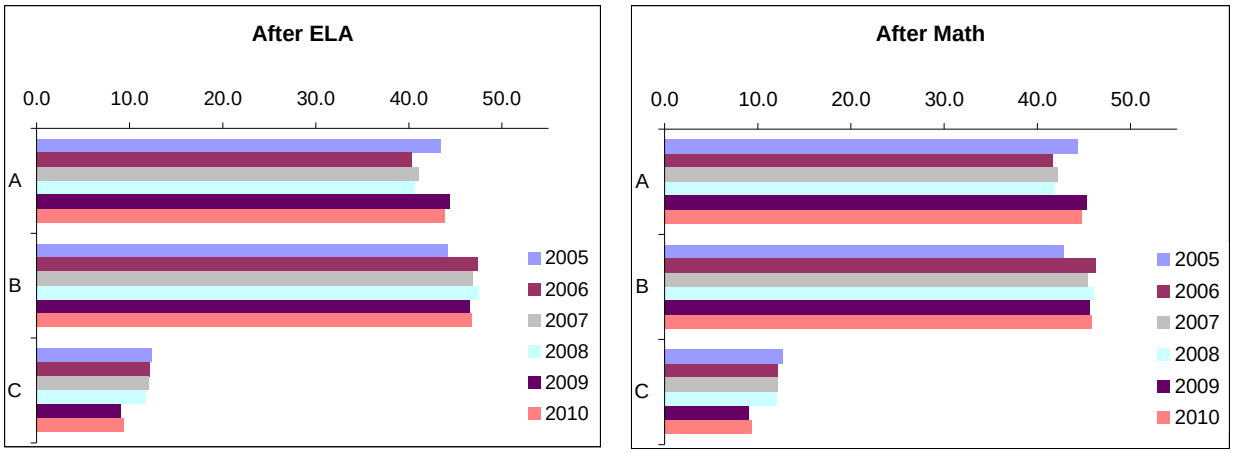


Figure 3.13. 10th graders' report of degree of certainty about their future after high school, 2005–2010, in percentages.

Students reported fairly similar levels of certainty about their post-high school plans regardless of whether they passed both or one test, or did not pass either test. Those who did not pass either test were slightly more likely to be ”very sure” or ”not at all sure” than those who had passed at least one test (see Table 3.15).

Table 3.15. Question 7: How Sure Are You About What You Will Do After High School? (Percentages of 10th Graders' Responses by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Tests Passed, After Math			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. Very sure	43.6	43.3	44.9	46.1	44.4	43.9	45.1	47.2
B. Somewhat sure	47.2	48.1	46.3	42.8	46.4	47.2	46.0	41.7
C. Not sure at all	9.1	8.6	8.9	11.2	9.2	8.9	8.9	11.2

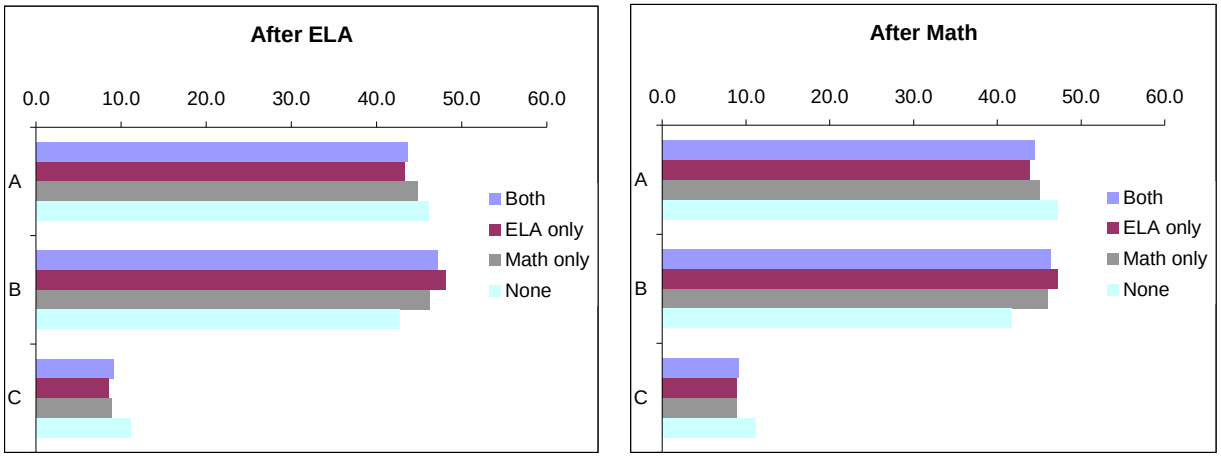


Figure 3.14. 10th Graders' degree of certainty about post high school plans by tests passed in 2010, in percentages.

Test Performance and Influencing Factors

Question 8: The main reasons I did not do as well on this test as I could have are:

Due to changes on the student survey in 2009, there are only two years of comparable data for question 8. Table 3.16 shows that there was very little difference in the percentage of students who claimed that they did as well as they could and for the different reasons for not doing so in 2009 and 2010. Less than 2 percent of grade ten students felt that there was inadequate time to complete the test, and less than 5 percent reported unfavorable conditions in the testing room. The most common reason given for not doing as well as they could have was nervousness.

Table 3.16. Question 8: The Main Reasons I Did Not Do as Well on This Test as I Could Have (Mark All That Apply) (10th Graders' Responses From 2009–2010)

After ELA	Percentage 2009	2010
A. I did as well as I could.	86.7	87.3
B. I was too nervous to do as well as I could.	9.0	8.6
C. I was not motivated to do well.	4.2	4.1
D. I did not have time to do as well as I could.	1.5	1.3
E. Conditions in the testing room made it difficult to concentrate.	4.7	4.3
F. There were other reasons why I did not do as well as I could.	4.6	4.1

After Mathematics	Percentage 2009	2010
A. I did as well as I could.	86.4	86.3
B. I was too nervous to do as well as I could.	9.3	9.3
C. I was not motivated to do well.	3.9	3.9
D. I did not have time to do as well as I could.	1.3	1.2
E. Conditions in the testing room made it difficult to concentrate.	3.6	3.4
F. There were other reasons why I did not do as well as I could.	5.3	5.0

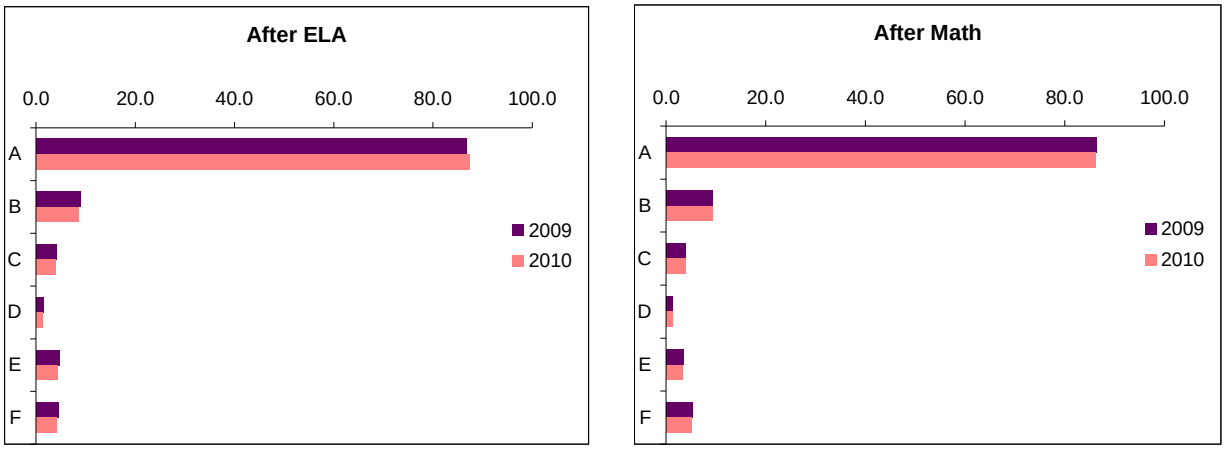


Figure 3.15. Reasons why 10th graders did or did not do as well as they could on ELA and mathematics tests in 2009 and 2010, in percentages.

Table 3.17 reveals that more than 90 percent of grade ten students who passed both tests, compared to approximately 69 percent of those who passed neither test, reported that they did as well as they could on the CAHSEE ELA and mathematics tests. Those students who passed only one test were more likely to be nervous that they did not pass after taking the test. Students who did not pass either test were most

likely to report not having enough time to finish and problems with conditions in the testing room.

Table 3.17. Question 8: The Main Reasons I Did Not Do as Well on This Test as I Could Have Are (Mark All That Apply) (Percentages of 10th Graders' Responses by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Tests Passed, After Math			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. I did as well as I could.	91.2	88.4	75.0	68.8	90.5	77.3	81.3	68.3
B. I was too nervous to do as well as I could.	6.1	9.0	18.7	18.8	6.7	15.2	15.3	19.5
C. I was not motivated to do well.	3.4	3.6	6.2	7.3	3.1	5.7	4.9	7.4
D. I did not have time to do as well as I could.	0.9	1.3	2.6	3.7	0.8	1.6	1.9	3.6
E. Conditions in the testing room made it difficult to concentrate.	4.3	3.7	4.2	4.7	3.3	3.5	2.8	4.1
F. There were other reasons why I did not do as well as I could.	3.8	3.4	5.9	5.8	4.4	9.4	4.1	6.8

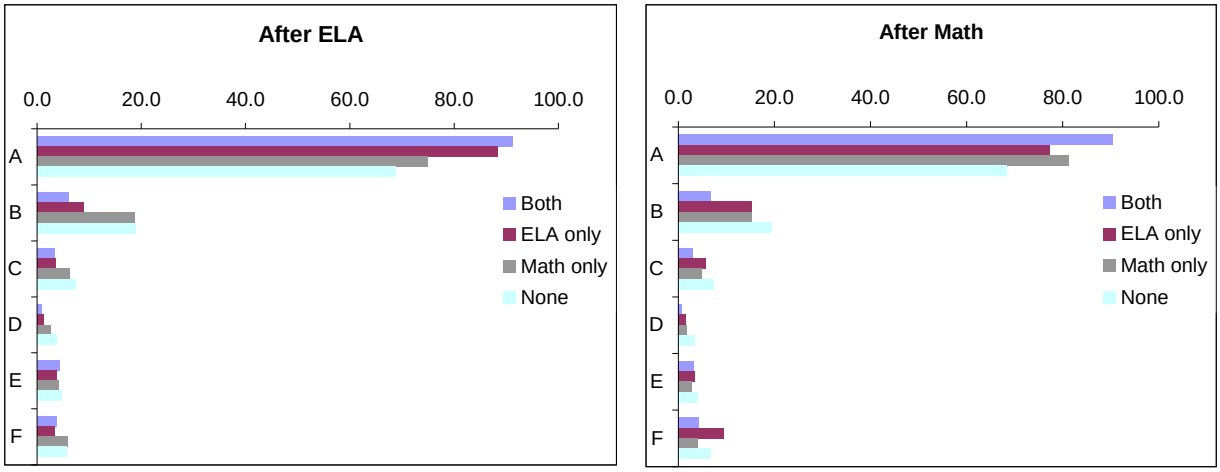


Figure 3.16. Reasons given by 10th graders for not doing as well as they could on the CAHSEE by tests passed in 2010, in percentages.

Content and Instruction Coverage

Question 9: Were the topics on the test covered in courses you have taken?

Table 3.18 shows a positive trend from 2005 to 2010 in the percentage of students who reported that all or most of the CAHSEE topics were covered in their courses. This was true for students responding after both the mathematics and the ELA

tests, though a slightly higher percentage of students reported after they took the mathematics test that many topics were not covered.

Table 3.18. Question 9: Were the Topics on the Test Covered in Courses You Have Taken? (10th Graders' Responses, 2005–2010)

After ELA	Percentage					
	2005	2006	2007	2008	2009	2010
A. Yes, all of them. B. Most, but not all of them (two-thirds or more were covered).	92.2	93.3	93.7	93.9	94.2	95.1
C. Many topics on the test were not covered in my courses (less than two-thirds were covered).	7.7	6.7	6.25	6.1	5.8	4.9
After Mathematics	**Percentage**					
	2005	**2006**	**2007**	**2008**	**2009**	**2010**
A. Yes, all of them. B. Most, but not all of them (two-thirds or more were covered).	88.9	90.6	91.53	92.3	92.4	92.7
C. Many topics on the test were not covered in my courses (less than two-thirds were covered).	11.1	9.4	8.36	7.7	7.6	7.4

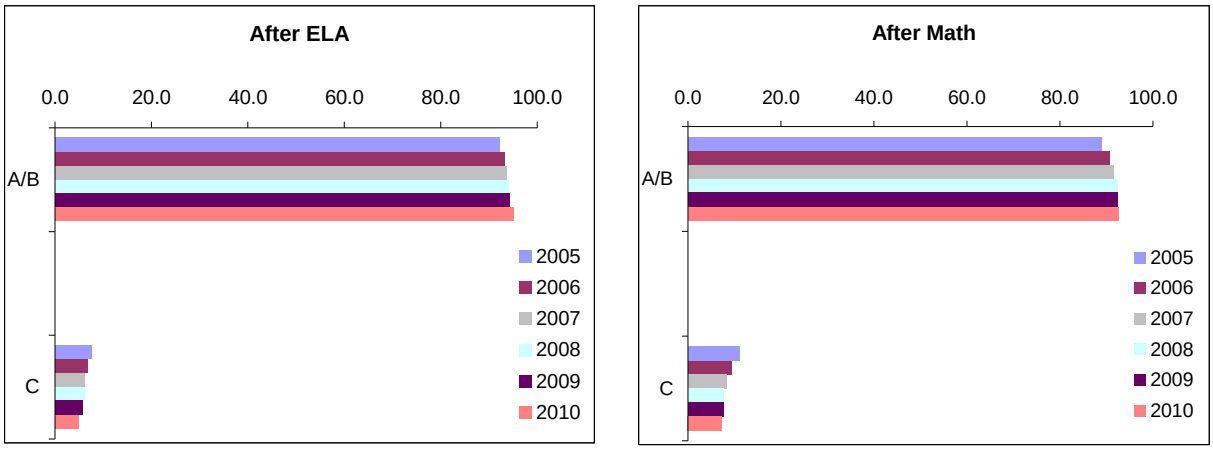


Figure 3.17. 10th graders opinions, 2005–2010, of whether all materials tested were covered in the courses they took, in percentages.

Table 3.19 reveals that students who did not pass either test were the most likely to report that topics on the CAHSEE were not covered in their courses. Also, students who passed only one test were more likely to report that the topics were not covered than those who passed both. However, the majority of all categories of passing students claimed that at least most of the topics were covered during their courses.

Table 3.19. Question 9: Were the Topics on the Test Covered in Courses You Have Taken? (Percentages of 10th Graders' Responses by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Tests Passed, After Math			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. Yes, all of them.	66.3	48.6	38.1	34.5	58.8	29.4	36.7	28.4
B. Most, but not all of them (two-thirds or more were covered).	30.8	45.5	52.1	51.5	36.2	55.6	53.7	55.3
C. Many topics on the test were not covered in my courses (less than two-thirds were covered).	2.9	6.0	9.9	14.0	5.0	15.0	9.6	16.3

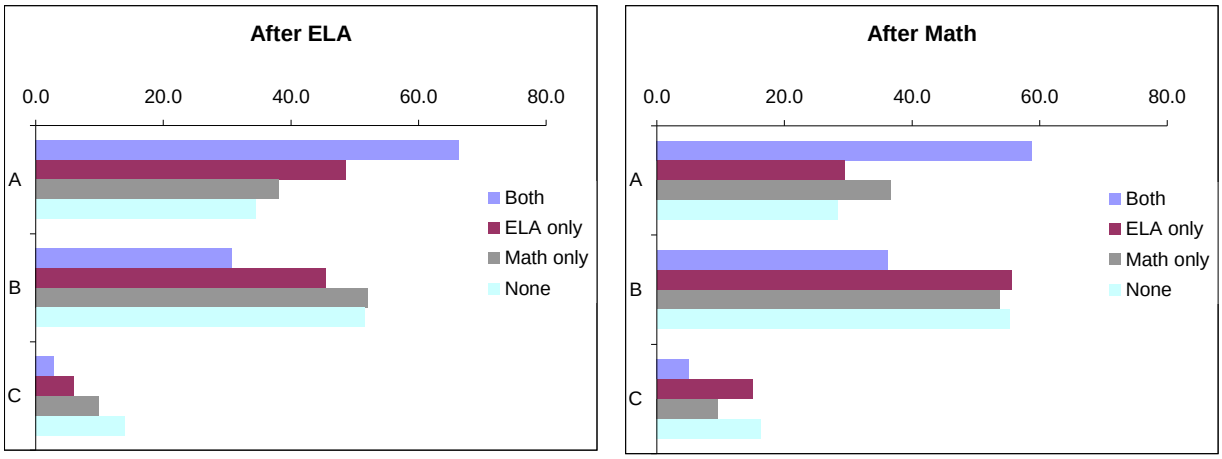


Figure 3.18. Responses of 10th graders as to whether topics tested on CAHSEE ELA and mathematics tests were covered in the courses they took, by tests passed in 2010, in percentages.

In 2010 more students than in previous years reported that all questions on the CAHSEE were similar to questions that they encountered in class after taking both ELA and mathematics. Only 10.1 percent of students passing the ELA test and 11.9 percent of students who had passed mathematics claimed that many of the questions were different from anything they had seen before (see Table 3.20).

Table 3.20. Question 10: Were Any of the Questions on the Test Different From the Types of Questions or Answer Options You Have Encountered in Class? (10th Graders' Responses 2005–2010)

After ELA	Percentage					
	2005	2006	2007	2008	2009	2010
A. Yes, many were different from anything I had seen before.	9.3	11.9	11.37	11.3	11.1	10.1
B. Yes, a few were different from anything I had seen before.	49.5	48.9	47.84	49.0	45.1	43.5
C. No, all were similar to ones used in my classes.	41.2	39.1	40.73	39.7	43.8	46.4
After Mathematics	**Percentage**					
	2005	**2006**	**2007**	**2008**	**2009**	**2010**
A. Yes, many were different from anything I had seen before.	14.4	13.5	12.62	11.7	12.4	11.9
B. Yes, a few were different from anything I had seen before.	51.0	49.2	47.22	45.7	44.9	44.4
C. No, all were similar to ones used in my classes.	34.7	37.3	40.07	42.7	42.7	43.6

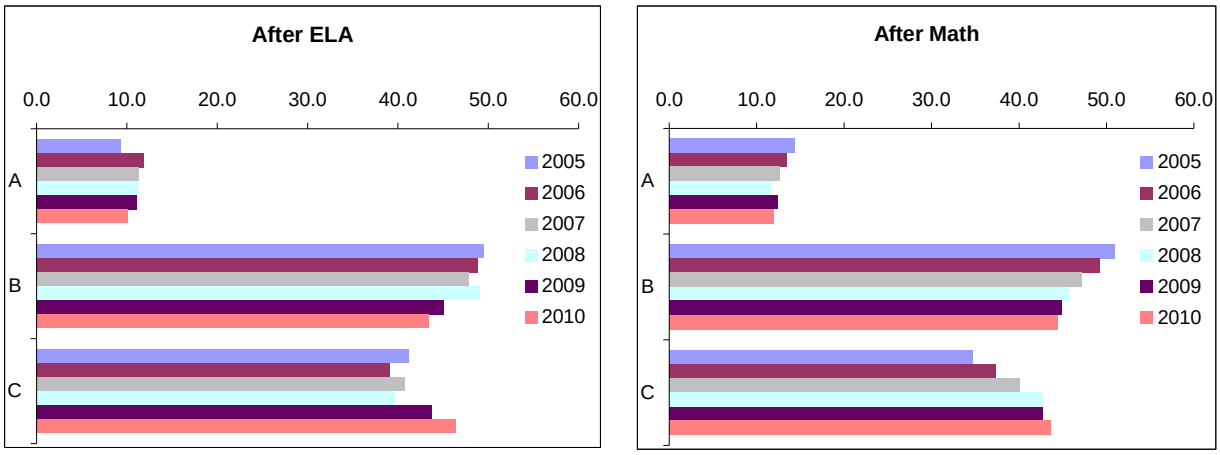


Figure 3.19. Percentage of 10th graders from 2005 – 2010 who said questions were the same or different from those encountered in class tests, in percentages.

Table 3.21 shows that slightly more than half of the students who passed both tests reported that all of the questions on the CAHSEE tests were similar to ones used in their classes. This percentage was much lower for those who did not pass either test or who passed only one. Most of the students who did not pass at least one test reported that a few questions were different than they had seen before.

Table 3.21. Question 10: Were Any of the Questions on the Test Different From the Types of Questions or Answer Options You Have Encountered in Class? (Percentages of 10th Graders' Responses by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Pass After Math			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. Yes, many were different from anything I had seen before.	7.0	11.4	19.0	24.6	8.5	19.2	17.4	26.6
B. Yes, a few were different from anything I had seen before.	40.3	51.1	57.0	52.7	40.8	56.4	57.2	53.4
C. No, all were similar to ones used in my classes	52.8	37.6	24.0	22.6	50.7	24.4	25.4	20.0

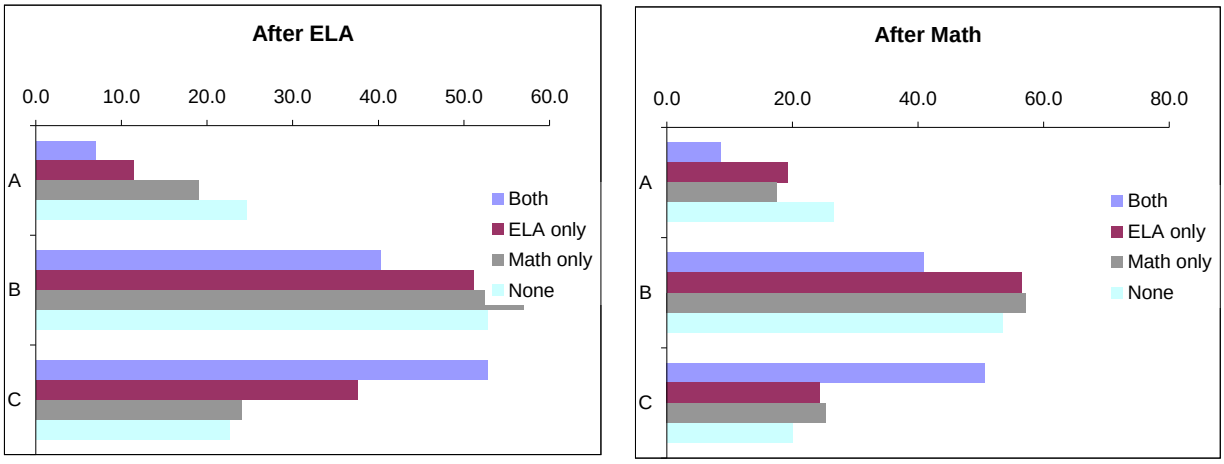


Figure 3.20. Responses of 10th graders regarding difference or similarity of CAHSEE tests to tests encountered in classroom, by tests passed in 2010, in percentages.

Question 11: Were the questions on this test more difficult than questions you were given in classroom tests or homework assignments?

Table 3.22 provides a summary of the percentage of students who felt test items were more difficult, the same, or easier than those they had encountered in class. Percentages for options B and C are combined because questions on the CAHSEE are intended to be either equally difficult or less difficult than those encountered in class. There has been a general positive trend in the percentage of students who felt that the test questions were equally as difficult as or easier than what they had encountered on classroom tests or homework. This was true for students responding after they took both the ELA and mathematics CAHSEE examinations.

Table 3.22. Question 11: Were the Questions on This Test More Difficult Than Questions You Were Given in Classroom Tests or Homework Assignments? (10th Graders' Responses, 2005–2010)

After ELA	Percentage					
	2005	2006	2007	2008	2009	2010
A. Yes, the test questions were generally more difficult than the questions I encountered in my course work.	17.5	16.3	16.5	16.6	14.1	12.3
B. The test questions were generally about as difficult as the questions I encountered in my course work.	82.5	83.7	83.5	83.4	85.9	87.7
C. The test questions were generally easier than the questions I encountered in my course work.						
After Mathematics	**Percentage**					
	2005	**2006**	**2007**	**2008**	**2009**	**2010**
A. Yes, the test questions were generally more difficult than the questions I encountered in my course work.	22.3	20.8	19.2	17.8	17.6	16.9
B. The test questions were generally about as difficult as the questions I encountered in my course work.	77.7	79.2	80.7	82.2	82.4	83.1
C. The test questions were generally easier than the questions I encountered in my course work.						

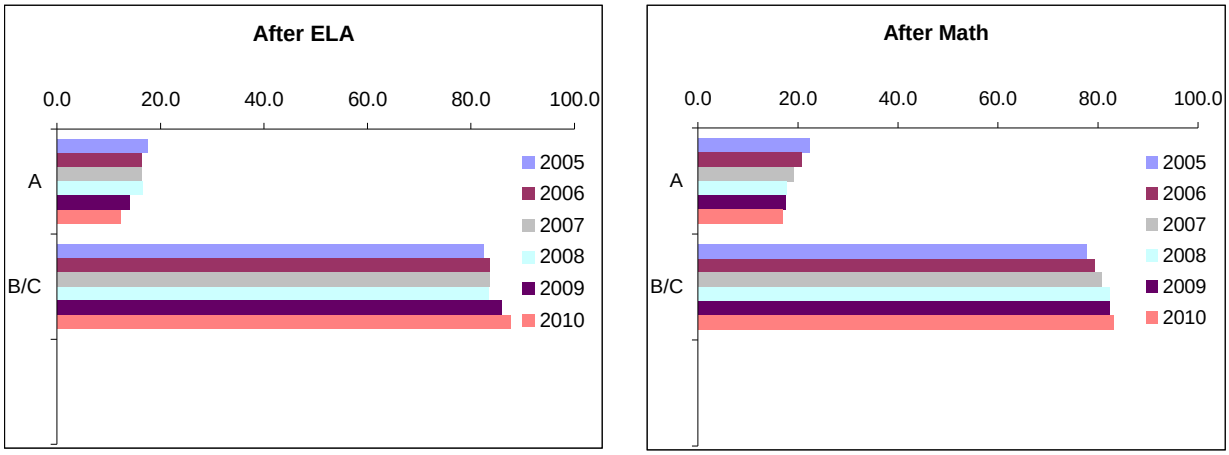


Figure 3.21. Percentage of 10th graders 2005–2010 who found the CAHSEE test questions more difficult, the same as, or less difficult than those encountered in course work (b and c combined in chart).

A greater percentage of students who passed both tests than of those who passed only one or none felt that the questions on the CAHSEE were easier than those they encountered in classroom tests or homework. Of grade ten students responding after taking the mathematics test, 37.3 percent of students who did not pass either test reported that the test questions were generally more difficult. Likewise, 31.1 percent of those responding after taking the ELA and who did not pass either also felt the CAHSEE test questions were more difficult. (see Table 3.23).

Table 3.23. Question 11: Were the Questions on This Test More Difficult Than Questions You Were Given in Classroom Tests or Homework Assignments? (Percentages of 10th Graders' Responses by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Pass After Math			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. Yes, the test questions were generally more difficult than the questions I encountered in my course work.	8.0	14.8	27.1	31.1	11.6	32.6	25.0	37.3
B. The test questions were generally about as difficult as the questions I encountered in my course work.	50.1	57.2	55.5	48.7	47.2	54.2	55.5	47.0
C. The test questions were generally easier than the questions I encountered in my course work.	42.0	28.0	17.4	20.2	41.3	13.2	19.6	15.8

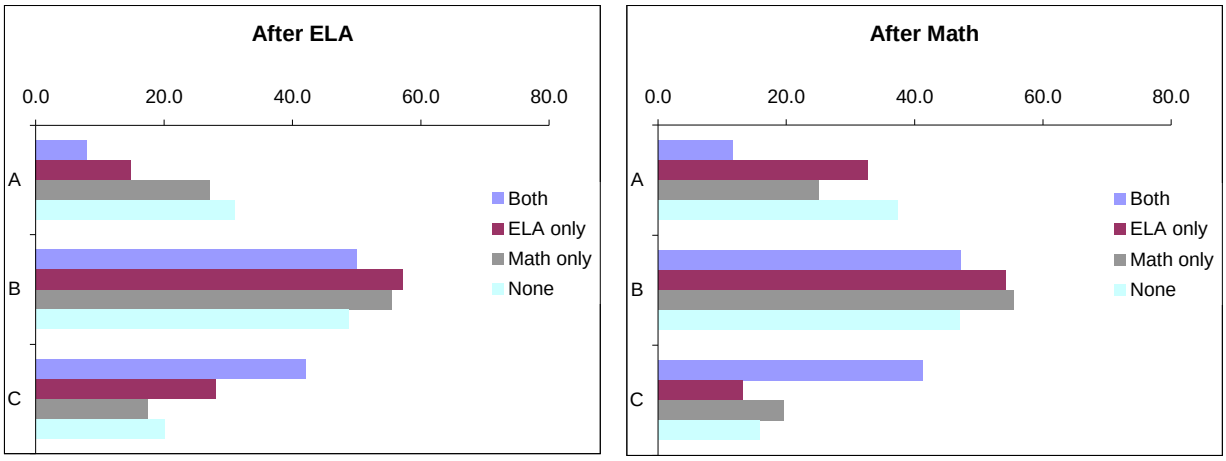


Figure 3.22. Percent of 10th graders who thought the CAHSEE test questions were more difficult, the same, or less difficult than those encountered in the classroom or homework assignments, by tests passed in 2010.

Question 12: If some topics on the test were difficult for you, was it because:

Similar to previous years, in 2010 the most common reason that students reported having difficulty with the CAHSEE was forgetting things that they were taught. The reasons reported for difficulty have been fairly stable over the six years of this survey (see Table 3.24).

Table 3.24. Question 12: If Some Topics on the Test Were Difficult for You, Was It Because: (10th Graders' Responses, 2005–2010)

After ELA	Percentage					
	2005	2006	2007	2008	2009	2010
A. I did not take courses that covered these topics.	8.2	7.6	7.2	7.2	7.3	6.6
B. I had trouble with these topics when they were covered in courses I took.	18.1	17.5	17.2	17.3	17.7	17.6
C. I have forgotten things I was taught about these topics.	37.9	37.8	41.6	42.5	39.0	40.2
D. None of the topics was difficult for me.	35.8	37.1	33.3	33.0	35.9	35.6
After Mathematics	**Percentage**					
	2005	**2006**	**2007**	**2008**	**2009**	**2010**
A. I did not take courses that covered these topics.	13.5	12.6	10.8	9.5	10.6	9.9
B. I had trouble with these topics when they were covered in courses I took.	22.6	23.8	21.9	22.8	24.1	23.9
C. I have forgotten things I was taught about these topics.	44.7	43.8	45.0	46.1	44.2	44.2
D. None of the topics was difficult for me.	19.2	19.8	20.8	21.7	21.2	21.9

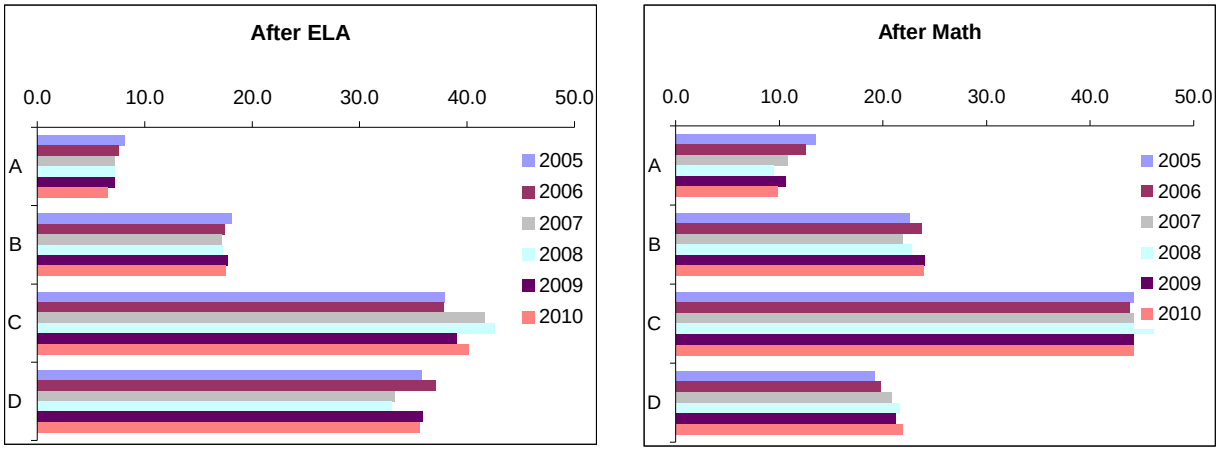


Figure 3.23. Reasons given by 10th graders (2005–2010) as to whether and why they found the CAHSEE test questions difficult, in percentages.

In 2010 students who passed neither test or only passed one were more likely to report that they did not take courses that covered the topics on the CAHSEE. The most common response for difficulty, regardless of tests passed, was having forgotten things that they had been taught (see Table 3.25).

Table 3.25. Question 12: If Some Topics on the Test Were Difficult for You, Was It Because: (Percentages of 10th Graders' Responses by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Pass After Math			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. I did not take courses that covered these topics.	4.3	8.0	13.5	16.4	7.2	13.5	15.4	20.2
B. I had trouble with these topics when they were covered in courses I took.	14.2	22.9	29.6	29.7	20.0	29.6	31.9	35.4
C. I have forgotten things I was taught about these topics.	40.3	43.5	41.4	36.9	46.7	41.4	40.5	34.1
D. None of the topics was difficult for me.	41.1	25.6	15.4	16.9	26.1	15.4	12.2	10.3

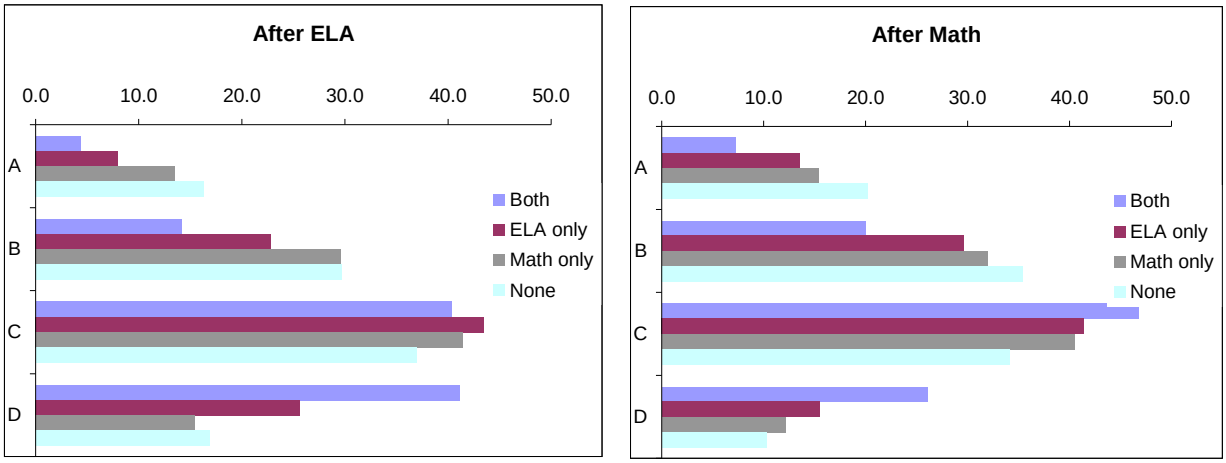


Figure 3.24. Reasons given by 10th graders 2005–2010 for whether and why they found test questions difficult, in percentages, by tests passed in 2010.

Effort Put Into the CAHSEE

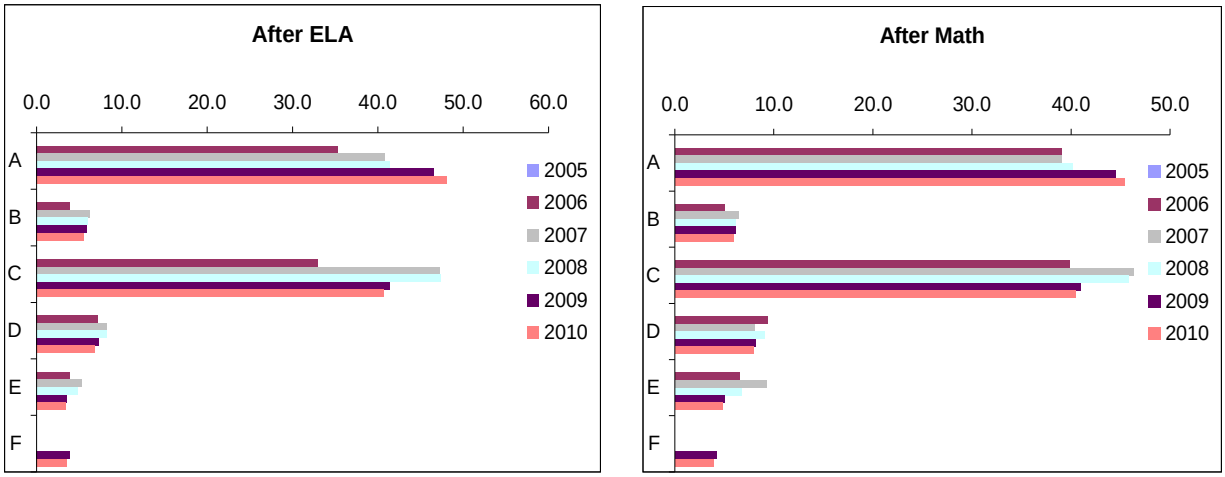
Question 13: Have you worked or will you work harder to learn the English-language arts or mathematics skills tested by the CAHSEE?

Over the years the percentage of students who have indicated that they do not have to work harder to learn the skills to pass the CAHSEE has slightly increased. A smaller percentage of students in 2010 reported participating in extra activities to pass the CAHSEE. Option 'F' (Table 3.26) was an addition to the questionnaire in 2009; therefore comparisons to years prior to this may not be valid.

Table 3.26. Question 13: Have You Worked or Will You Work Harder to Learn the English-Language Arts or Mathematics Skills Tested by the CAHSEE? (Mark All That Apply) (10th Graders' Responses, 2005–2010)

After ELA	Percentage					
	2005	2006	2007	2008	2009	2010
A. I do not have to work any harder to meet the CAHSEE requirement.	n/a	35.3	40.8	41.4	46.6	48.1
B. I am taking additional courses.	n/a	3.9	6.2	6.1	5.9	5.5
C. I am working harder in the courses I am taking.	n/a	33.0	47.3	47.3	41.4	40.7
D. I am getting help outside of the classroom.	n/a	7.2	8.3	8.2	7.3	6.8
E. I am repeating a course to learn the material better.	n/a	3.9	5.3	4.9	3.6	3.4
F.* I will stay in school an additional year to learn the required material.	n/a	n/a	n/a	n/a	3.9	3.5

After Mathematics	Percentage					
	2005	2006	2007	2008	2009	2010
A. I do not have to work any harder to meet the CAHSEE requirement.	n/a	39.1	39.0	40.2	44.5	45.5
B. I am taking additional courses.	n/a	5.0	6.5	6.2	6.2	5.9
C. I am working harder in the courses I am taking.	n/a	39.9	46.3	45.8	41.0	40.5
D. I am getting help outside of the classroom.	n/a	9.4	8.0	9.0	8.1	7.9
E. I am repeating a course to learn the material better.	n/a	6.5	9.3	6.8	5.0	4.8
F.* I will stay in school an additional year to learn the required material.	n/a	n/a	n/a	n/a	4.2	3.9



** Option F added in 2009.*

Figure 3.25. Percentage of 10th graders 2005–2010 who said they have worked or will work harder, and in what ways, to meet the CAHSEE requirement.

As shown in Table 3.27, students who passed only one test were more likely than other students to report that they were working harder in the courses they were taking to learn the skills required by the CAHSEE. Those who passed both tests reported most frequently not having to work any harder to meet the CAHSEE

requirement. More than 10 percent of students who did not pass either test said that they would stay in high school an extra year to learn the skills to pass the CAHSEE.

Table 3.27. Question 13: Have You Worked or Will You Work Harder to Learn the English-Language Arts or Mathematics Skills Tested by the CAHSEE? (Mark All That Apply) (Percentages of 10th Graders' Responses in 2010 by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Pass After Math			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. I do not have to work any harder to meet the CAHSEE requirement.	57.0	26.5	21.2	17.3	54.7	16.6	23.1	15.6
B. I am taking additional courses.	3.7	8.2	11.2	12.7	4.0	9.4	11.0	13.0
C. I am working harder in the courses I am taking.	38.2	53.3	50.8	44.7	37.7	56.3	49.5	44.9
D. I am getting help outside of the classroom.	5.1	10.8	12.1	12.9	6.2	13.0	12.0	13.1
E. I am repeating a course to learn the material better.	2.0	5.3	7.3	9.1	3.2	10.2	7.4	10.3
F. I will stay in school an additional year to learn the required material.	1.6	5.2	8.8	12.0	2.1	6.2	8.2	10.3

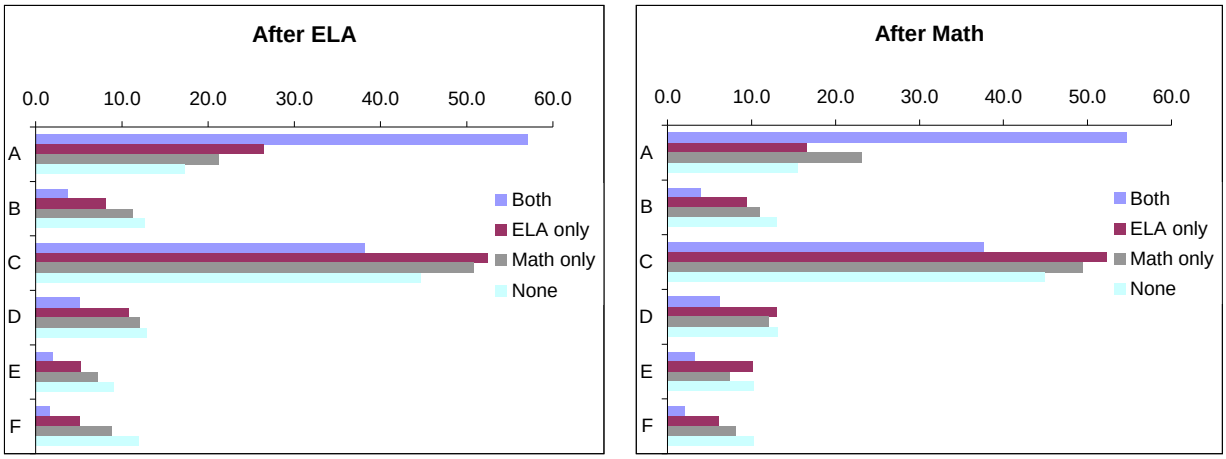


Figure 3.26. Percentage of 10th graders, by tests passed in 2010, who said they had or had not worked harder or will work harder in the future to pass the CAHSEE skills test(s).

Question 14: If you do not pass the CAHSEE in this administration, what are you most likely to do?

Table 3.28 shows that the majority of students (77.4% of ELA test takers and 78.5% of math test takers) intend to stay in school and try to pass the CAHSEE again if they did not pass during this administration. The percentages of students who report that they will seek help outside the classroom or that they will seek alternatives to

earning a diploma have remained similar over the past six years. Only about 1 percent of the students indicated that they would give up trying to get a diploma.

Table 3.28. Question 14: If You Do Not Pass the CAHSEE in This Administration, What Are You Most Likely to Do? (Mark the Most Likely Option) (10th Graders' Responses, 2005–2010)

After ELA	Percentage					
	2005	2006	2007	2008	2009	2010
A. I will stay in school and try again to pass the CAHSEE.	n/a	n/a	68.2	75.8	77.3	77.4
B. I will take courses at a community college and try again to pass CAHSEE.	n/a	n/a	5.0	5.3	5.2	5.2
C. I will participate in some other type of program that will help me to pass the CAHSEE.	n/a	n/a	9.4	10.4	9.3	9.4
D. I will try to get a GED certificate.	n/a	n/a	1.8	1.9	1.7	1.6
E. I will give up trying to get a diploma altogether.	n/a	n/a	1.1	1.2	1.1	1.1
F. I really do not know what I will do.	n/a	n/a	5.4	5.4	5.4	5.4
After Mathematics	**Percentage**					
	2005	**2006**	**2007**	**2008**	**2009**	**2010**
A. I will stay in school and try again to pass the CAHSEE.	n/a	n/a	70.7	77.2	78.6	78.5
B. I will take courses at a community college and try again to pass CAHSEE.	n/a	n/a	4.9	5.2	5.3	5.3
C. I will participate in some other type of program that will help me to pass the CAHSEE.	n/a	n/a	8.2	8.7	7.4	7.5
D. I will try to get a GED certificate.	n/a	n/a	1.8	1.9	1.7	1.6
E. I will give up trying to get a diploma altogether.	n/a	n/a	1.3	1.4	1.3	1.3
F. I really do not know what I will do.	n/a	n/a	5.8	5.7	5.8	5.8

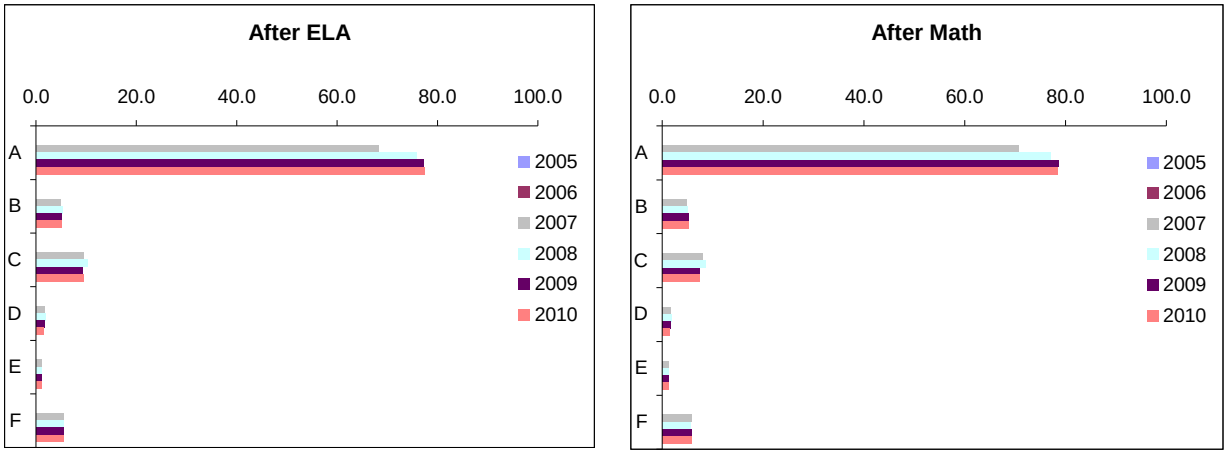


Figure 3.27. Most likely planned courses of action for 10th graders if they do not pass the CAHSEE by the time they complete high school, by year, in percentages.

In 2010, the majority of grade ten students, regardless of how many tests they passed, reported they would stay in school and try again to pass the CAHSEE if they

did not do so in this administration. Those who did not pass at least one test were most likely to claim they would take courses at a community college in order to pass the CAHSEE. These students also were most likely to report they would participate in some other type of program to help them pass. Only a very small percentage of students reported that they will give up trying to get a diploma altogether and those who passed both tests were the least likely to state this (see Table 3.29).

Table 3.29. Question 14: If You Do Not Pass the CAHSEE in This Administration, What Are You Most Likely to Do? (Mark the Most Likely Option) (Percentages of 10th Graders' Responses by Pass or Not Pass)

Response Choice	Tests Passed, After ELA				Pass After Math			
	Both Tests	ELA Only	Math Only	None	Both Tests	ELA Only	Math Only	None
A. I will stay in school and try again to pass the CAHSEE.	81.7	71.8	68.7	58.7	82.6	72.2	71.7	60.1
B. I will take courses at a community college and try again to pass CAHSEE.	3.9	6.9	7.3	10.9	4.0	7.8	7.4	11.0
C. I will participate in some other type of program that will help me to pass the CAHSEE.	8.0	12.2	13.6	14.5	6.1	10.4	11.1	12.8
D. I will try to get a GED certificate.	0.8	2.4	2.8	5.2	0.9	2.6	2.5	5.0
E. I will give up trying to get a diploma altogether.	0.7	0.9	1.5	2.9	1.0	1.1	1.5	2.9
F. I really do not know what I will do.	4.9	5.8	6.1	7.6	5.4	5.9	5.8	8.2

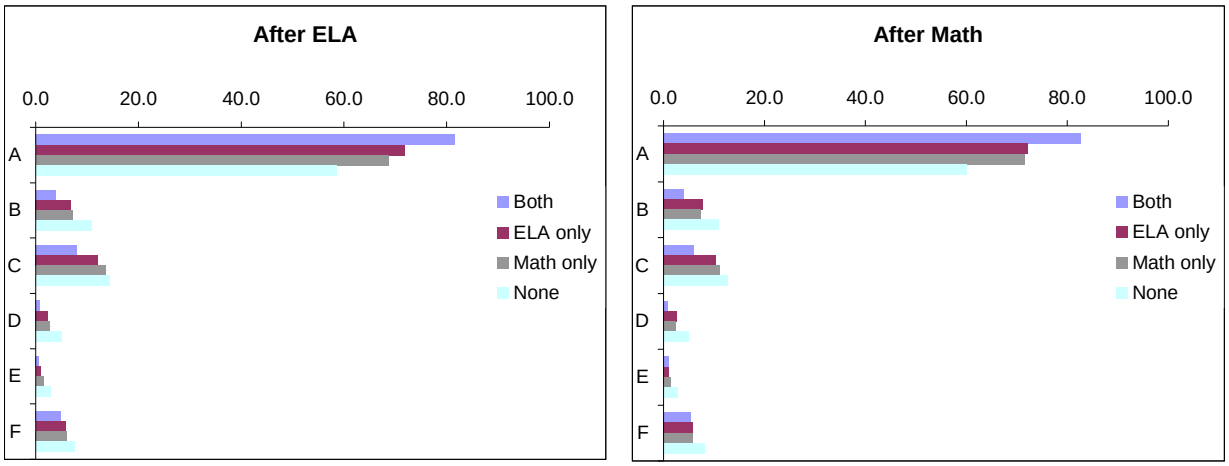


Figure 3.28. Most likely planned courses of action for 10th graders if they do not pass the CAHSEE by the time they complete high school, by tests passed in 2010, in percentages.

Comparisons of Grade Ten Student Responses in 2010 by Demographic Characteristics

We compared student questionnaire responses on four demographic variables: gender, ethnicity, students with disability (SWD), English learner (EL) status, and economic status (based on National School Lunch Program membership). Overall, the response differences by these four variables were very similar for ELA and mathematics questionnaires; therefore they will be discussed together. The questionnaire results from students who took the ELA test are presented in Table 3.30 and the questionnaire results from those who took the mathematics test are presented in Table 3.31.

Test Preparation (Table 3.30 and Table 3.31, Questions 1–2)

- Those who are not classified as economically disadvantaged, those who are White, Asian, and male are most likely to report that they did nothing extra to prepare for the CAHSEE.
- Females were more likely than males, and those labeled as economically disadvantaged more likely than those who were not, to use released (sample) items to prepare for the CAHSEE.

Importance of the Tests (Table 3.30 and Table 3.31, Question 3)

- Females more frequently than males believed that the CAHSEE was very important; those were labeled economically disadvantaged thought it more important that those who were not; and Hispanic and African Americans were most likely to state that the CAHSEE was very important.

Graduation from High School and Post High School Plans (Table 3.30 and Table 3.31, Questions 4–7)

- The majority of all students expected to graduate on time. A smaller percentage of the following categories than the general population believed that they would graduate on time: fewer males than females; fewer African American, American Indian/Alaskan Native, and Hispanic students than other ethnicities; and fewer SWD, EL, and economically disadvantaged.
- The students who most often reported concern about the CAHSEE preventing them from graduating were Hispanics, EL, SWD, and economically disadvantaged.
- More females than males expected to attend a four-year college or university. Asians were more likely than any other ethnicity to plan to attend a four-year college or university. American Indian/Alaskan Natives were the least likely of all ethnicities to report that they would seek a four-year degree.

- Native Americans and Hispanics were most likely to report that they would work full time following high school compared to other ethnicities. SWD, EL, and economically disadvantaged were more likely to expect to go straight to work than the full population.

Test Performance and Influencing Factors (Table 3.30 and Table 3.31, Question 8)

- The majority of all students, regardless of classification, reported that they did as well as they could on the CAHSEE.

- EL students most frequently reported being too nervous to do as well as they could.

Content and Instruction Coverage (Table 3.30 and Table 3.31, Questions 9–12)

- Females, Asian, Filipino, and White students, and those who were not economically disadvantaged were most likely to report that all of the CAHSEE questions were similar to those that they had seen before.

- A higher percentage of SWD than any other group reported that CAHSEE test items were more difficult than those that they had seen before. More African Americans than other ethnicities reported they found difficult items.

Effort Put Into the CAHSEE (Table 3.30 and Table 3.31, Questions 13–14)

- Females more often than males, Pacific Islanders and Hispanics more often than other ethnicities, and EL and economically disadvantaged students reported that they worked harder in their classes in order to pass the CAHSEE.

- Most students of all categories reported that they would stay in school and try again if they passed the CAHSEE. Only a very small percentage responded that they would give up altogether—however, a larger percentage of SWD than any other group reported that they would give up.

Table 3.30. Percentages of 10th Grade Students' Responses in 2010 by Gender, Ethnicity, Disability, English Learner Status, and Economic Disadvantage—After Taking CAHSEE ELA Examination

After Taking CAHSEE ELA Exam (Percentage of Student Responses in 10th grade)	Gender		Ethnicity									ED	
	F	M	Am Indian/ AK Native	Asian	Pacific	Filipino	Hispanic	African Am	White	SWD	EL	Yes	No
1. How did you prepare for this test? (Mark all that apply.)													
A. A teacher or counselor told me about the purpose and importance of the test.	38.9	34.4	34.9	35.4	37.3	43.3	37.6	33.3	35.6	32.3	34.6	37.9	35.5
B. I practiced on questions similar to those on the test.	39.9	30.8	33.3	31.0	36.1	38.9	38.3	35.7	31.3	28.1	32.0	38.4	32.6
C. A teacher spent time in class helping me to get ready to take the test.	42.1	34.9	37.1	31.7	40.8	42.0	41.3	38.6	35.6	32.6	36.4	41.3	36.0
D. I took a special class during the regular school day that covered the topics on the CAHSEE.	6.7	6.4	6.3	2.8	5.9	3.7	8.8	8.7	3.8	8.8	10.4	9.0	4.3
E. I took a special class after school or during the summer that covered the topics on the CAHSEE.	3.4	3.2	2.1	2.1	2.7	2.0	4.6	4.4	1.4	4.6	5.3	4.7	2.1
F. I did not do anything in addition to regular course work to prepare for this test.	24.0	31.4	31.5	41.0	25.9	27.4	20.2	21.8	37.6	22.2	15.2	20.4	34.5
2. What materials did you use to prepare for this test: (Mark all that apply.)													
A. Textbooks	17.6	19.7	20.0	15.6	17.6	16.9	19.2	18.3	19.0	20.1	21.9	19.3	18.0
B. ELA Student Guide (blue and gold booklet)	31.7	27.1	27.3	30.7	31.7	33.7	29.5	29.3	28.3	22.6	26.0	29.6	29.3
C. Mathematics Student Guide (green and gold booklet)	14.4	12.1	13.2	12.7	13.4	13.7	13.7	13.1	12.6	11.6	11.8	13.7	12.8
D. CAHSEE Web site	7.8	7.2	6.7	6.8	7.5	7.6	8.2	10.9	5.7	10.4	10.7	8.6	6.4
E. Released (sample) test questions	41.4	34.0	36.2	34.2	35.7	41.5	39.3	33.2	36.9	23.5	26.7	38.8	36.7
F. Other Resources	31.5	34.3	35.3	33.7	36.1	32.4	32.1	31.8	34.2	37.1	32.5	32.5	33.2
3. How important is this test to you?													
A. Very important	84.2	75.6	76.4	64.9	82.6	80.2	87.0	85.1	71.3	78.6	88.3	86.4	73.8
B. Somewhat important	13.7	18.8	19.3	27.3	14.4	17.1	10.9	11.5	22.7	16.3	9.4	11.3	20.8
C. Not important	2.2	5.6	4.3	7.9	3.1	2.7	2.1	3.2	6.0	5.2	2.3	2.3	5.4
4. Will you receive a high school diploma?													
A. Yes, with the rest of my class (or earlier).	87.5	81.2	81.4	91.6	85.2	90.5	80.0	81.8	89.3	68.0	67.0	80.1	88.4
B. Yes, but I will likely have to take classes after my original graduation date.	8.6	11.8	11.9	5.3	10.1	6.8	13.3	11.5	6.5	17.7	20.5	13.2	7.3
C. Yes, but I will pursue a diploma in Adult Education.	1.7	3.1	2.9	1.6	2.3	1.5	2.8	2.9	1.9	5.7	5.0	2.8	2.0
D. No, I probably will not receive a high school diploma.	1.5	2.5	1.9	1.1	1.6	0.7	2.7	2.2	1.1	5.4	5.7	2.7	1.3
E. No, I plan to take the GED.	0.4	1.0	1.2	0.3	0.5	0.3	0.8	1.0	0.7	2.0	1.2	0.8	0.6
F. No, I plan to take the CHSPE.	0.2	0.5	0.7	0.3	0.4	0.1	0.3	0.6	0.5	1.2	0.6	0.4	0.4

After Taking CAHSEE ELA Exam (Percentage of Student Responses in 10th grade)	Gender		Ethnicity									ED	
	F	M	Am Indian/ AK Native	Asian	Pacific	Filipino	Hispanic	African Am	White	SWD	EL	Yes	No
5. What might prevent you from receiving a high school diploma? (Mark all that apply.)													
A. I may not pass all the required courses.	20.0	23.4	24.5	13.0	23.8	19.0	26.5	20.7	16.9	26.0	28.6	25.9	17.7
B. I may not pass the CAHSEE exam.	19.4	18.0	18.0	12.5	19.1	15.2	24.3	20.3	11.2	36.4	37.0	24.6	13.1
C. I may drop out before the end of 12th grade.	1.7	3.3	3.0	1.9	3.0	1.3	2.8	3.0	2.1	5.0	4.9	3.0	2.0
D. I may not meet some other graduation requirement.	10.7	13.7	15.0	9.0	14.7	14.2	14.4	11.8	9.4	14.7	13.8	14.6	10.1
E. I am confident I will receive a high school diploma.	68.0	59.9	61.7	77.4	61.5	71.3	55.1	60.8	74.5	40.3	39.0	55.5	71.9
6. What do you think you will do after high school?													
A. I will join the military.	2.3	9.2	8.8	2.4	7.2	5.4	6.1	5.2	6.5	10.0	7.0	6.4	5.2
B. I will go to a community college.	23.2	21.1	25.6	10.5	23.1	18.1	25.2	17.6	22.4	29.7	26.9	23.8	20.5
C. I will go to a 4-year college or university.	66.4	53.9	48.9	82.6	59.8	70.5	54.4	65.7	60.0	38.0	46.9	55.7	64.4
D. I will go to a vocational, technical, or trade school.	3.0	4.9	5.4	1.9	2.9	2.4	4.2	4.3	4.2	5.9	4.3	4.2	3.7
E. I will work full-time.	2.7	5.4	5.0	1.0	3.3	1.2	5.6	3.5	3.0	8.5	9.0	5.4	2.8
F. Do something else (besides school, work, or the military).	2.4	5.5	6.3	1.6	3.7	2.5	4.5	3.8	4.0	7.9	5.9	4.5	3.4
7. How sure are you about what you will do after high school?													
A. Very sure	46.7	41.0	42.2	43.1	44.1	38.0	42.9	54.6	43.7	45.8	45.2	43.5	44.2
B. Somewhat sure	45.7	47.9	46.4	46.0	46.2	52.0	48.6	38.9	45.3	43.2	45.9	47.9	45.8
C. Not sure at all	7.6	11.1	11.4	10.9	9.7	10.0	8.4	6.6	11.0	11.0	9.0	8.6	10.0
8. How well did you do on this test? (Mark all that apply):													
A. I did as well as I could.	90.3	84.4	87.6	86.5	87.3	90.7	85.5	86.9	90.2	76.3	75.3	85.4	89.2
B. I was too nervous to do as well as I could.	8.5	8.6	7.3	7.2	8.8	7.3	11.1	7.6	5.2	14.3	18.9	10.8	6.5
C. I was not motivated to do well.	2.7	5.4	4.3	5.3	4.6	3.8	3.9	4.4	3.9	5.9	5.2	4.1	4.0
D. I did not have time to do as well as I could.	0.8	1.9	1.6	1.3	1.4	1.1	1.4	1.7	1.1	3.1	2.5	1.5	1.2
E. Conditions in the testing room made it difficult to concentrate.	4.2	4.4	4.9	5.3	3.9	4.8	3.9	3.7	4.8	4.7	4.1	4.1	4.4
F. There were other reasons why I did not do as well as I could.	3.7	4.6	5.2	5.4	5.5	4.5	4.0	3.4	4.1	5.5	4.6	4.3	4.0
9. Were the topics on the test covered in courses you have taken?													
A. Yes, all of them.	64.0	55.2	59.5	64.3	58.8	65.2	55.3	54.0	66.2	40.9	39.4	54.0	64.9
B. Most, but not all of them (two-thirds or more were covered).	32.6	38.5	35.8	31.1	36.2	32.0	39.3	39.5	29.9	47.5	50.6	40.2	31.1
C. Many topics on the test were not covered in my courses (less than two-thirds were covered).	3.5	6.3	4.8	4.6	5.0	2.8	5.4	6.5	3.9	11.7	10.1	5.8	4.0

After Taking CAHSEE ELA Exam (Percentage of Student Responses in 10th grade)	Gender		Ethnicity							ED			
	F	M	Am Indian/ AK Native	Asian	Pacific	Filipino	Hispanic	African Am	White	SWD	EL	Yes	No
10. Were any of the questions on the test different from the types of questions or answer options you have encountered in your homework assignments or classroom tests?													
A. Yes, many were different from anything I had seen before.	7.1	13.1	9.8	10.5	10.0	7.9	11.1	12.6	8.1	21.3	19.8	11.7	8.6
B. Yes, a few were different from anything I had seen before.	39.5	47.4	43.2	41.2	45.4	42.9	47.5	43.5	37.3	51.1	55.5	47.8	39.4
C. No, all were similar to ones used in my classes.	53.4	39.5	47.0	48.3	44.7	49.2	41.4	43.9	54.6	27.6	24.7	40.6	52.0
11. Were the questions on this test more difficult than questions you were given in classroom tests or homework assignments?													
A. Yes, the test questions were generally more difficult than the questions I encountered in my course work.	9.2	15.4	12.0	9.6	11.9	7.8	14.7	14.9	9.1	26.7	27.1	15.4	9.4
B. The test questions were generally about as difficult as the questions I encountered in my course work.	51.4	50.1	51.1	37.7	51.7	48.5	57.2	48.7	44.6	49.3	54.9	56.3	45.5
C. The test questions were generally easier than the questions I encountered in my course work.	39.4	34.5	36.4	52.7	36.4	43.7	28.1	36.4	46.4	24.0	18.0	28.3	45.1
12. If some topics on the test were difficult for you, was it because:													
A. I did not take courses that covered these topics.	4.8	8.4	6.8	6.7	6.4	4.5	7.6	8.2	4.8	13.9	14.2	7.9	5.3
B. I had trouble with these topics when they were covered in courses I took.	16.4	18.8	17.4	12.5	18.6	14.5	21.2	18.0	13.4	26.8	28.1	21.0	14.4
C. I have forgotten things I was taught about these topics.	42.9	37.6	38.2	38.1	41.4	43.1	44.3	37.3	34.4	35.5	42.3	43.3	37.4
D. None of the topics was difficult for me.	36.0	35.3	37.7	42.8	33.6	37.9	27.0	36.6	47.4	23.9	15.4	27.8	43.0
13. Have you worked or will you work harder to learn the English language arts skills tested by the CAHSEE? (Mark all that apply.)													
A. I do not have to work any harder to meet the CAHSEE requirement.	46.8	49.4	49.3	59.9	40.4	51.3	37.3	42.1	63.8	27.2	19.5	37.9	57.8
B. I am taking additional courses.	4.5	6.6	5.6	3.6	6.5	3.7	6.9	7.2	3.6	10.9	10.7	7.0	4.2
C. I am working harder in the courses I am taking.	43.9	37.5	38.8	35.5	47.4	45.7	47.0	42.4	30.6	44.3	51.7	46.6	35.1
D. I am getting help outside of the classroom.	6.9	6.8	8.2	5.6	8.9	5.5	7.8	9.7	4.9	12.1	11.1	8.2	5.6
E. I am repeating a course to learn the material better.	3.2	3.6	3.8	1.8	4.3	1.8	4.5	3.7	2.2	6.4	7.3	4.4	2.4
F. I will stay in school an additional year to learn the required material.	3.5	3.6	3.2	1.9	3.5	1.7	5.0	3.7	1.7	8.5	10.0	5.0	2.1
14. If you do not pass the CAHSEE in this administration, what are you most likely to do? (Mark the most likely option.)													
A. I will stay in school and try again to pass the CAHSEE.	77.6	77.2	77.1	81.1	77.5	82.6	74.9	73.1	80.7	63.9	66.7	74.7	79.9
B. I will take courses at a community college and try again to pass CAHSEE.	5.0	5.3	4.7	4.5	6.1	4.7	5.5	7.4	4.5	9.2	7.7	5.6	4.8
C. I will participate in some other type of program that will help me to pass the CAHSEE.	11.1	7.8	7.8	6.5	8.4	7.2	12.0	11.1	6.2	11.7	15.3	11.7	7.4
D. I will try to get a GED certificate.	1.0	2.1	2.4	0.8	1.7	0.7	1.8	2.4	1.4	4.2	2.8	1.9	1.3
E. I will give up trying to get a diploma altogether.	0.5	1.6	1.5	1.0	1.2	0.6	1.0	1.3	1.1	2.6	1.6	1.1	1.0
F. I really do not know what I will do.	4.8	5.9	6.5	6.1	5.2	4.3	4.9	4.7	6.2	8.5	5.9	5.1	5.6

Table 3.31. Percentages of 10th Grade Students' Responses in 2010 by Gender, Ethnicity, Disability, English Learner Status, and Economic Disadvantage – After Taking CAHSEE Mathematics Examination

After Taking CAHSEE MATH Exam (Percentage of Student Responses in 10th grade)	Gender		Ethnicity							ED			
	F	M	Am Indian/ Alaskan Native	Asian	Pacific	Filipino	Hispanic	African Am	White	SWD	EL	Yes	No
1. How did you prepare for this test? (Mark all that apply.)													
A. A teacher or counselor told me about the purpose and importance of the test.	35.9	32.8	33.4	30.7	35.8	39.6	35.8	33.0	32.9	33.0	33.3	36.1	32.7
B. I practiced on questions similar to those on the test.	41.1	31.4	33.1	28.6	37.9	39.5	41.2	36.4	29.9	31.4	37.4	41.0	31.9
C. A teacher spent time in class helping me to get ready to take the test.	28.5	23.9	25.5	16.9	28.4	26.4	30.3	28.3	21.6	26.3	28.7	30.4	22.3
D I took a special class during the regular school day that covered the topics on the CAHSEE.	6.0	5.5	5.6	2.3	5.4	31.4	7.5	8.1	3.5	7.7	8.2	7.7	3.9
E. I took a special class after school or during the summer that covered the topics on the CAHSEE.	3.3	2.9	2.3	1.9	2.9	1.8	4.2	4.1	1.6	4.0	4.5	4.3	2.0
F. I did not do anything in addition to regular course work to prepare for this test.	31.0	37.2	37.7	51.1	32.5	35.5	25.1	26.6	45.6	23.9	18.4	25.2	42.4
2. What materials did you use to prepare for this test: (Mark all that apply.)													
A. Textbooks	26.4	28.1	28.8	24.3	27.1	26.6	27.5	25.6	28.2	26.5	29.4	27.4	27.0
B. ELA Student Guide (blue and gold booklet)	12.3	13.2	12.3	12.0	14.3	12.7	12.8	14.6	12.4	12.9	11.8	13.0	12.6
C. Mathematics Student Guide (green and gold booklet)	24.4	19.4	20.5	21.5	23.8	24.8	22.9	21.8	19.8	18.9	22.0	23.1	20.8
D. CAHSEE Web site	7.0	6.5	6.7	6.2	7.1	7.0	7.3	10.0	5.1	9.1	9.1	7.8	5.7
E. Released (sample) test questions	31.9	25.4	27.2	23.6	26.9	30.0	31.5	26.0	25.9	19.3	21.8	31.1	26.4
F. Other Resources	33.1	34.9	35.7	37.5	36.5	33.8	32.2	31.6	36.5	35.8	31.4	32.7	35.2
3. How important is this test to you?													
A. Very important	84.1	74.7	75.2	64.4	81.9	79.4	86.5	84.5	70.9	77.9	87.7	85.8	73.4
B. Somewhat important	13.6	18.9	19.9	26.6	14.6	17.5	11.1	11.8	22.5	16.5	9.8	11.5	20.5
C. Not important	2.4	6.4	5.0	8.9	3.5	3.2	2.4	3.7	6.6	5.6	2.5	2.7	6.0
4. Will you receive a high school diploma?													
A. Yes, with the rest of my class (or earlier).	87.2	80.5	80.2	91.3	84.7	89.9	79.8	81.2	88.4	68.5	67.6	80.0	87.7
B. Yes, but I will likely have to take classes after my original graduation date.	8.7	11.9	11.9	5.1	10.0	7.0	13.3	11.9	6.7	17.4	20.1	13.1	7.5
C. Yes, but I will pursue a diploma in Adult Education.	1.5	3.0	2.8	1.5	2.2	1.3	2.6	2.8	1.9	5.0	4.4	2.6	1.9
D. No, I probably will not receive a high school diploma.	1.8	2.9	3.0	1.4	2.1	1.1	3.1	2.5	1.5	5.9	6.2	3.1	1.7
E. No, I plan to take the GED.	0.5	1.0	1.5	0.3	0.8	0.4	0.8	1.1	0.8	2.0	1.1	0.8	0.7
F. No, I plan to take the CHSPE.	0.3	0.7	0.8	0.4	0.3	0.2	0.4	0.6	0.7	1.2	0.5	0.4	0.5

After Taking CAHSEE MATH Exam (Percentage of Student Responses in 10th grade)	Gender		Ethnicity							ED			
	F	M	Am Indian/ Alaskan Native	Asian	Pacific	Filipino	Hispanic	African Am	White	SWD	EL	Yes	No
5. What might prevent you from receiving a high school diploma? (Mark all that apply.)													
A. I may not pass all the required courses.	21.7	25.4	26.8	14.6	25.7	20.9	28.7	22.1	18.4	27.8	31.1	28.0	19.5
B. I may not pass the CAHSEE exam.	22.8	19.5	20.8	13.2	22.1	17.4	27.0	23.1	13.4	38.8	38.6	27.1	15.5
C. I may drop out before the end of 12th grade.	1.8	3.7	3.8	2.2	2.6	1.7	3.0	3.2	2.6	5.1	4.8	3.1	2.5
D. I may not meet some other graduation requirement.	9.0	11.5	12.6	7.9	11.6	11.8	12.0	9.7	7.9	12.1	11.6	12.2	8.4
E. I am confident I will receive a high school diploma.	64.0	56.5	57.2	74.8	58.2	67.6	51.2	57.0	71.2	36.7	35.6	51.7	68.4
6. What do you think you will do after high school?													
A. I will join the military.	2.6	10.0	9.9	2.9	7.6	5.8	6.5	5.9	7.1	10.7	7.4	6.8	5.8
B. I will go to a community college.	23.0	20.8	25.2	10.3	22.4	17.7	25.0	17.5	22.0	29.5	26.9	23.6	20.3
C. I will go to a 4-year college or university.	66.2	53.2	48.3	82.1	59.7	70.3	54.1	64.9	59.6	37.6	46.5	55.5	63.8
D. I will go to a vocational, technical, or trade school.	2.7	4.7	5.5	1.6	2.8	2.4	4.0	4.1	4.0	5.7	4.1	4.0	3.5
E. I will work full-time.	2.8	5.5	5.3	1.1	3.2	1.3	5.7	3.6	3.0	8.7	9.1	5.5	2.9
F. Do something else (besides school, work, or the military).	2.7	5.8	6.5	2.1	4.3	2.6	4.7	4.0	4.3	8.0	6.1	4.7	3.7
7. How sure are you about what you will do after high school?													
A. Very sure	47.5	42.1	43.0	44.0	45.6	39.4	44.0	55.4	44.3	46.8	46.5	44.5	45.1
B. Somewhat sure	45.0	46.6	46.1	45.1	43.7	50.8	47.6	37.7	44.5	41.7	44.6	46.8	44.9
C. Not sure at all	7.5	11.3	10.9	10.9	10.7	9.8	8.4	6.9	11.1	11.5	8.9	8.7	10.0
8. How well did you do on this test? (Mark all that apply):													
A. I did as well as I could.	88.4	84.2	84.2	89.3	85.9	90.5	84.4	84.4	88.6	75.5	76.8	84.7	87.8
B. I was too nervous to do as well as I could.	9.8	8.9	9.1	5.8	10.7	7.5	11.9	9.2	6.2	15.0	18.2	11.4	7.4
C. I was not motivated to do well.	2.8	5.0	5.1	4.5	4.3	3.7	3.8	4.5	3.8	6.1	4.9	3.9	3.9
D. I did not have time to do as well as I could.	0.7	1.8	1.5	1.0	1.6	0.8	1.3	1.8	1.2	3.1	2.0	1.3	1.1
E. Conditions in the testing room made it difficult to concentrate.	3.3	3.4	4.3	3.6	2.7	3.5	3.0	3.2	3.9	4.0	3.1	3.2	3.5
F. There were other reasons why I did not do as well as I could.	5.1	4.9	6.7	4.3	5.5	4.9	5.1	4.8	5.1	6.5	5.0	5.1	4.9
9. Were the topics on the test covered in courses you have taken?													
A. Yes, all of them.	53.4	50.2	47.6	68.2	50.0	60.3	46.0	43.2	57.9	31.3	34.5	46.0	57.4
B. Most, but not all of them (two-thirds or more were covered).	40.8	41.0	42.3	27.2	42.4	35.4	46.2	46.5	35.2	53.0	54.5	45.9	36.1
C. Many topics on the test were not covered in my courses (less than two-thirds were covered).	5.8	8.9	10.1	4.6	7.6	4.3	7.8	10.3	6.9	15.7	10.9	8.1	6.6

After Taking CAHSEE MATH Exam (Percentage of Student Responses in 10th grade)	Gender		Ethnicity									ED	
	F	M	Am Indian/ Alaskan Native	Asian	Pacific	Filipino	Hispanic	African Am	White	SWD	EL	Yes	No
10. Were any of the questions on the test different from the types of questions or answer options you have encountered in your homework assignments or classroom tests?													
A. Yes, many were different from anything I had seen before.	9.1	14.8	13.0	9.3	12.1	9.4	13.0	15.7	10.3	25.0	19.8	13.4	10.5
B. Yes, a few were different from anything I had seen before.	43.3	45.6	46.4	33.2	46.5	40.6	46.7	47.2	38.6	52.4	56.2	49.3	39.8
C. No, all were similar to ones used in my classes.	47.7	39.6	40.6	57.5	41.4	50.0	37.3	37.1	51.1	22.6	24.0	37.2	49.8
11. Were the questions on this test more difficult than questions you were given in classroom tests or homework assignments?													
A. Yes, the test questions were generally more difficult than the questions I encountered in my course work.	15.1	18.6	18.9	9.1	17.1	10.5	19.7	22.3	13.9	35.0	29.1	19.9	13.9
B. The test questions were generally about as difficult as the questions I encountered in my course work.	50.7	45.7	49.9	31.4	50.8	45.5	55.1	48.6	41.8	46.1	53.7	53.8	42.9
C. The test questions were generally easier than the questions I encountered in my course work.	34.2	35.7	31.2	59.6	32.1	44.1	25.2	29.0	44.3	18.9	17.2	26.2	43.3
12. If some topics on the test were difficult for you, was it because:													
A. I did not take courses that covered these topics.	7.5	12.2	11.9	6.6	9.7	6.5	10.7	12.5	9.2	20.2	16.3	11.0	8.7
B. I had trouble with these topics when they were covered in courses I took.	25.9	22.2	24.9	12.1	24.8	18.4	28.7	27.7	19.6	30.7	32.4	27.9	20.3
C. I have forgotten things I was taught about these topics.	48.6	39.9	42.5	42.2	45.9	50.5	45.9	41.4	42.0	35.6	41.3	45.1	43.4
D. None of the topics was difficult for me.	18.1	25.7	20.8	39.1	19.6	24.6	14.8	18.5	29.2	13.5	10.0	16.0	27.5
13. Have you worked or will you work harder to learn the mathematics skills tested by the CAHSEE? (Mark all that apply.)													
A. I do not have to work any harder to meet the CAHSEE requirement.	41.8	49.0	44.0	63.5	37.5	51.0	34.5	37.0	60.1	24.8	19.6	35.4	55.0
B I am taking additional courses.	4.9	7.0	6.8	3.5	7.2	3.8	7.1	8.1	4.2	11.2	10.4	7.2	4.6
C. I am working harder in the courses I am taking.	45.2	35.8	38.8	30.1	46.6	43.0	47.3	43.8	31.1	44.7	50.7	46.6	34.8
D. I am getting help outside of the classroom.	8.7	7.1	9.4	5.7	10.2	6.4	8.9	11.2	6.2	12.2	11.4	9.0	6.8
E. I am repeating a course to learn the material better.	5.2	4.5	6.7	2.2	5.8	2.9	6.1	5.1	3.6	7.7	8.2	5.8	3.9
F. I will stay in school an additional year to learn the required material.	3.9	3.9	3.4	2.2	3.9	2.0	5.3	4.1	2.3	8.9	9.9	5.4	2.6
14. If you do not pass the CAHSEE in this administration, what are you most likely to do? (Mark the most likely option.)													
A. I will stay in school and try again to pass the CAHSEE.	79.6	77.4	76.7	80.5	77.4	83.0	77.3	74.2	80.4	65.4	69.5	77.0	79.9
B. I will take courses at a community college and try again to pass CAHSEE.	5.1	5.5	5.2	4.6	6.6	4.7	5.5	7.7	4.6	9.4	7.8	5.6	5.0
C. I will participate in some other type of program that will help me to pass the CAHSEE.	8.5	6.5	6.3	5.4	8.2	6.0	9.3	9.5	5.0	9.8	12.5	9.3	5.9
D. I will try to get a GED certificate.	1.1	2.2	3.0	0.8	1.6	0.9	1.7	2.3	1.6	4.2	2.5	1.8	1.5
E. I will give up trying to get a diploma altogether.	0.6	1.9	1.7	1.4	1.0	0.6	1.1	1.4	1.6	2.6	1.7	1.2	1.4
F. I really do not know what I will do.	5.1	6.5	7.1	7.4	5.2	4.8	5.1	4.9	6.8	8.7	6.1	5.3	6.3

Additional Analyses of 10th Grade Responses

We pursued further analyses to explore content and instruction coverage by ethnicity broken out by passing categories. As previously discussed, Asian and White students were more likely than African Americans and Hispanic students to report that they had covered similar topics, seen similar types of items, and that questions they had seen were easier than those to which they had been exposed during their regular coursework. We compared and analyzed the responses of African American, Asian, Hispanic, and White grade ten students on three survey questions summarized in Tables 3.32 and 3.33.

The differences in exposure to topics and question types between ethnic groups greatly decrease when broken down by whether the students passed the test or not. In some cases the percentages were within one or two percentage points across ethnic groups. However, there were some exceptions. For students who passed both tests, Asian students far more frequently than other groups reported that the questions on the CAHSEE were easier than those they had seen in class, especially among responses collected after the mathematics test. Additionally, Asian students who passed mathematics but not ELA reported most frequently that the questions on the ELA examination were different than what they had seen in course work.

Table 3.32. Percentages of 10th Grade Students' Responses to Course Content and Instruction Questions in 2010 by Race and Passing Category—After Taking CAHSEE ELA Examination.

After ELA	Tests Passed															
	Both				Only ELA				Only Math				None			
	Af. Am.	Asian	Hisp.	White	Af. Am.	Asian	Hisp.	White	Af. Am.	Asian	Hisp.	White	Af. Am.	Asian	Hisp.	White
9. Were the topics on the test covered in courses you have taken?																
A. Yes, all of them.	63.1	67.5	63.6	69.9	47.2	44.9	48.4	50.3	38.5	28.5	38.6	40.4	34.4	34.4	34.6	34.7
B. Most, but not all of them (two-thirds or more were covered).	33.6	29.0	33.5	27.4	46.1	47.3	45.9	43.6	52.0	53.3	52.9	47.4	50.6	48.4	52.1	49.3
C. Many topics on the test were not covered in my courses (less than two-thirds were covered).	3.4	3.4	2.9	2.7	6.7	7.9	5.7	6.1	9.5	18.1	8.6	12.2	15.0	17.2	13.3	16.1
10. Were any of the questions on the test different from the types of questions or answer options you have encountered in your homework assignments or classroom tests?																
A. Yes, many were different from anything I had seen before.	7.5	8.9	6.9	6.5	11.5	14.4	11.1	11.6	17.8	29.6	18.0	19.1	27.2	27.4	24.1	24.6
B. Yes, a few were different from anything I had seen before.	39.8	39.9	43.9	35.6	47.9	55.6	52.6	47.2	53.3	55.5	58.1	54.0	49.7	51.7	54.0	48.5
C. No, all were similar to ones used in my classes.	52.7	51.2	49.2	58.0	40.7	30.0	36.3	41.2	29.0	14.9	23.9	26.9	23.1	20.9	21.9	26.9
11. Were the questions on this test more difficult than questions you were given in classroom tests or homework assignments?																
A. Yes, the test questions were generally more difficult than the questions I encountered in my course work.	8.8	7.1	9.1	6.8	13.8	18.1	15.1	14.6	25.2	40.5	26.2	26.3	31.2	33.2	30.9	31.9
B. The test questions were generally about as difficult as the questions I encountered in my course work.	49.4	36.5	58.8	43.7	52.4	53.4	59.0	55.5	50.4	47.3	57.3	52.8	43.8	49.4	50.0	45.6
C. The test questions were generally easier than the questions I encountered in my course work.	41.8	56.4	32.1	49.5	33.8	28.5	25.9	29.9	24.4	12.2	16.4	20.9	25.1	17.4	19.1	22.5

Table 3.33. Percentages of 10th Grade Students' Responses to Course Content and Instruction Questions in 2010 by Race and Passing Category—After Taking Mathematics Exam

After Math	Tests Passed															
	Both				Only ELA				Only Math				None			
	Af. Am.	Asian	Hisp.	White	Af. Am.	Asian	Hisp.	White	Af. Am.	Asian	Hisp.	White	Af. Am.	Asian	Hisp.	White
9. Were the topics on the test covered in courses you have taken?																
A. Yes, all of them.	51.9	71.9	53.6	62.0	28.5	29.1	30.5	26.8	36.5	34.0	36.7	38.4	27.9	29.4	28.7	27.5
B. Most, but not all of them (two-thirds or more were covered).	41.5	24.5	41.2	32.9	55.3	56.2	56.3	53.3	53.5	53.9	54.8	48.5	54.3	54.4	56.4	50.3
C. Many topics on the test were not covered in my courses (less than two-thirds were covered).	6.6	3.6	5.2	5.1	16.2	14.7	13.3	19.9	10.0	12.1	8.5	13.1	17.8	16.2	15.0	22.3
10. Were any of the questions on the test different from the types of questions or answer options you have encountered in your homework assignments or classroom tests?																
A. Yes, many were different from anything I had seen before.	9.9	7.9	8.7	8.2	20.4	17.9	18.0	22.2	19.0	22.4	16.3	19.1	29.4	26.7	25.5	29.5
B. Yes, a few were different from anything I had seen before.	44.2	30.8	46.3	36.7	53.8	60.2	57.5	54.0	53.8	56.4	58.7	52.3	50.4	54.3	54.6	49.5
C. No, all were similar to ones used in my classes.	45.9	61.3	45.0	55.1	25.8	22.0	24.4	23.9	27.2	21.2	25.0	28.6	20.3	19.0	19.9	21.0
11. Were the questions on this test more difficult than questions you were given in classroom tests or homework assignments?																
A. Yes, the test questions were generally more difficult than the questions I encountered in my course work.	14.9	6.8	13.3	10.7	33.2	33.7	31.5	36.5	26.3	27.3	24.3	27.0	37.4	36.9	36.6	40.8
B. The test questions were generally about as difficult as the questions I encountered in my course work.	49.8	29.5	56.3	41.1	50.5	53.2	56.4	49.2	50.6	49.8	57.7	50.8	43.2	45.9	48.4	42.5
C. The test questions were generally easier than the questions I encountered in my course work.	35.4	63.6	30.5	48.3	16.4	13.2	12.1	14.3	23.1	22.9	18.1	22.2	19.3	17.2	15.0	16.7

Summary of Grade Ten Findings

Comparisons of 10th Grade Students' Responses 2005–2010

Over the past six years student perceptions about the CAHSEE have changed in several positive ways, including changes in test preparation, perception of test importance, coverage of CAHSEE topics in class, and future plans. Specifically, in 2010 an increased percentage of students reported that

- they used the ELA and Mathematics Study Guides to prepare for the CAHSEE.
- they will attend a four-year college or university or join the military.
- CAHSEE topics and questions were covered during their courses, and that the questions were equally or less difficult than those they were exposed to through tests and homework.
- they did not have to work any harder to pass the CAHSEE.

Comparisons of Grade Ten Students' Responses in 2010 by Whether They Passed the Tests

We compared student responses for those who passed both tests, passed only ELA, passed only mathematics, and passed neither. Overall, students who passed both tests reported the most positive perceptions about the CAHSEE and those who passed neither test reported the most negative perceptions.

A higher percentage of students who passed both tests were most likely to report that

- a teacher or counselor told them about the importance of the CAHSEE.
- they used released (sample) items to prepare.
- they do not have to work any harder to pass the CAHSEE.
- they expect to earn a high school diploma with their class (or earlier).
- they plan to attend a four-year college or university after high school.

Among students who passed only one test (either ELA or mathematics), a higher percentage than others reported that

- the CAHSEE is "very important."
- they are working harder in their courses to pass the CAHSEE.

- a reason that they may not earn their diploma is that they may not pass the required courses.
- they plan to attend a community college after high school (after ELA only).
- Higher percentages of students who passed neither test reported that
- they may not receive a high school diploma.
- not passing the CAHSEE may prevent them from earning a high school diploma.
- they did not perform their best on the CAHSEE because they were nervous.

Differences in Grade Ten Students' Responses in 2010 by Key Demographic Characteristics

By Gender. Females were more likely than males to report that they had to work harder to pass the CAHSEE and that the test was very important. They were also most likely to report having used released (sample) items to prepare for the CAHSEE, and most often had plans to attend a four-year college or university after high school. Males were more likely than females to believe that they may drop out of school.

By Ethnicity. Asian, White, and Filipino students generally displayed the most positive results. They were more likely to report exposure to test items and topics in their courses than other ethnicities, and to believe that the test items on the CAHSEE were equally or less difficult than those they had seen before. These students were also most likely to report that they would attend a four-year college or university after high school and that they were confident that they would receive a diploma. Hispanic students were most likely to be concerned that the CAHSEE or required courses would prevent them from earning a high school diploma.

By Disability and English Learner Status. SWD and EL students reported higher levels of unfamiliarity with CAHSEE topics and questions. They also reported higher levels of nervousness while taking the CAHSEE than any other group. A lower percentage of SWD and EL students than among the general population reported that they would stay in school and try again if they did not pass the CAHSEE. Despite the challenges faced, EL students were more likely than other groups to report that they felt that the CAHSEE was very important.

By Economic Disadvantage Status. There were large differences in student responses depending on whether they were economically disadvantaged or not. More students who are economically disadvantaged felt that test items were more difficult than those that they had previously been exposed to. They were also more likely to report that they may not pass the CAHSEE or all of the courses required to graduate.

Economically disadvantaged students were less likely to plan to attend a four-year college or university post-high school.

Overall Summary of Grade Ten Responses

The 2010 student questionnaire results were fairly consistent with previous years, and illustrated overall positive attitudes by grade ten CAHSEE examinees. Most students reported exposure to similar topics and questions in their courses, and the belief that the CAHSEE is important. The majority reported trying their hardest on the examination and said they believed that they would be able to graduate with their class or sooner. However, this survey also highlights particular groups of students who may not be getting adequate preparation for the CAHSEE. SWD and EL students reported at higher levels than other students that test items and topics differed from what they had seen in class, and that the items were more difficult than those they were exposed to on tests and in homework. Schools may need to pay special attention to ensure that the curricula of all students include the material tested by the CAHSEE. Hispanic, African American, and American Indian/Native Alaskan groups also reported higher levels of difficulty with the test content than did the general population. These groups also may need additional attention.

Findings from 2010 Grade Twelve Students

The next section examines a selection of responses to the student questionnaires of 2010 grade twelve students in 2008 when they first took the examination and again in 2010. The questions selected were those pertaining to post-graduation plans and content and instruction coverage. We were interested in how grade twelve students who are still taking the CAHSEE respond differently to these topics towards the end of their education compared to when they were grade ten students. The responses are split by those who passed the CAHSEE in 2010 and those who did not.

Graduation Expectations and Post-High School Plans

The 2010 grade twelve students who had not previously passed the CAHSEE and took it again this year were more likely to believe that the CAHSEE would prevent them from earning a high school diploma in 2010 and less likely to believe that not passing required courses would be the cause of their not graduating than when they took the examination in 2008. In 2010, the grade twelve students who had still not passed the CAHSEE were more likely to report the possibility of dropping out before the end of grade twelve than those who did pass (see Table 3.34).

Table 3.34. Percentages of 12th Graders' Responses after ELA and Mathematics Tests in 2008 and 2010 by Those Who Passed in 2010 and Those Who Did Not.

Question 5. What might prevent you from receiving a high school diploma? (Mark all that apply.)	ELA Questionnaire Responses				Math Questionnaire Responses			
	Students Passing		Students Not Passing		Students Passing		Students Not Passing	
	2008	2010	2008	2010	2008	2010	2008	2010
A. I may not pass all the required courses.	27.1	16.3	23.2	19.5	30.9	16.3	28.2	19.5
B. I may not pass the CAHSEE exam.	40.0	59.1	41.7	56.2	44.0	61.2	45.5	57.7
C. I may drop out before the end of 12th grade.	4.4	2.9	7.0	5.4	4.0	2.7	5.5	4.9
D. I may not meet some other graduation requirement.	13.8	9.0	11.4	8.8	14.4	8.0	13.1	9.0
E. I am confident I will receive a high school diploma.	36.8	28.6	32.6	21.8	32.5	26.0	27.9	20.7

Students who were still taking the CAHSEE as grade twelve students were about half as likely to report that they would attend a four-year university in 2010 as they were two years previous. Those who did not pass in 2010 were less likely than those who did pass in 2010 to report plans to attend college after high school, and were more likely to expect to join the military or work full time.

Table 3.35. Percentages of 12th Graders' Responses in 2008 and 2010 after ELA and Mathematics by Those Who Passed in 2010 and Those Who Did Not.

Question 6. What do you think you will do after high school?*	ELA Questionnaire Responses				Math Questionnaire Responses			
	Students Passing		Students Not Passing		Students Passing		Students Not Passing	
	2008	2010	2008	2010	2008	2010	2008	2010
A. Join the military.	5.7	7.9	7.0	9.8	6.3	7.7	7.4	9.5
B. Go to a community college.	24.5	49.4	22.1	43.1	25.7	51.7	24.8	45.4
C. Go to a 4-year college or university.	38.6	24.7	32.5	20.4	37.9	22.6	31.8	18.9
D. Go to a vocational, technical, or trade school.	3.7	6.2	4.1	6.0	3.5	6.4	4.0	6.8
E. Work full-time.	8.2	8.8	12.6	14.7	7.9	8.3	11.4	13.5

Content and Instruction Coverage

The respondents in 2010 were more likely to report that the topics on the CAHSEE were covered in their courses as grade twelve students than they were as grade ten students in 2008. There was a larger change in percentage for those who passed in 2010 than for those who did not (see Table 3.36).

Table 3.36. Percentages of 12th Graders' Responses in 2008 and 2010 after ELA and Mathematics by Those Who Passed in 2010 and Those Who Did Not.

Question 9. Were the topics on the test covered in courses you have taken?	ELA Questionnaire Responses				Math Questionnaire Responses			
	Students Passing		Students Not Passing		Students Passing		Students Not Passing	
	2008	2010	2008	2010	2008	2010	2008	2010
A. Yes, all of them.	29.9	37.8	30.5	31.4	26.4	30.2	27.0	27.9
B. Most, but not all of them (two-thirds or more were covered).	57.0	51.4	53.1	51.5	58.9	59.1	56.5	54.9
C. Many topics on the test were not covered in my courses (less than two-thirds were covered).	13.0	10.8	16.4	17.1	14.8	10.7	16.6	17.2

Table 3.37 shows that over the two-year period students report gaining classroom exposure to the types of questions seen on the CAHSEE. An increased percentage of students reported that the questions on the CAHSEE were similar to what they had encountered in class. The largest increase from 2008 occurred in post-ELA test responses for grade twelve students who did pass in 2010.

Table 3.37. Percentages of 12th Graders' Responses in 2008 and 2010 after ELA and Mathematics by Those Who Passed in 2010 and Those Who Did Not.

Question 10. Were any of the questions on the test different from the types of questions or answer options you have encountered in your homework assignments or classroom tests?	ELA Questionnaire Responses				Math Questionnaire Responses			
	Students Passing		Students Not Passing		Students Passing		Students Not Passing	
	2008	2010	2008	2010	2008	2010	2008	2010
A. Yes, many were different from anything I had seen before.	24.8	18.3	29.9	26.6	21.3	17.1	27.4	25.5
B. Yes, a few were different from anything I had seen before.	56.9	55.2	52.3	52.0	58.5	59.2	53.5	52.5
C. No, all were similar to ones used in my classes.	18.3	26.5	17.9	21.4	20.3	23.7	19.2	22.0

The grade twelve students were less likely to report in 2010 that questions on the CAHSEE were generally more difficult than those they had seen in class than they had been in 2008. Those who passed the CAHSEE in 2010 most often reported that the CAHSEE questions were easier. However, after the mathematics test, grade twelve students were slightly less likely to report that the questions were easier than coursework questions in 2010 than they had been in 2008 (see Table 3.38).

Table 3.38. Percentages of 12th Graders' Responses in 2008 and 2010 After ELA and Mathematics by Those Who Passed in 2010 and Those Who Did Not.

Question 11. Were the questions on this test more difficult than questions you were given in classroom tests or homework assignments?	ELA Questionnaire Responses				Math Questionnaire Responses			
	Students Passing		Students Not Passing		Students Passing		Students Not Passing	
	2008	2010	2008	2010	2008	2010	2008	2010
A. Yes, the test questions were generally more difficult that the questions I encountered in my course work.	37.0	25.5	39.9	32.9	35.3	29.8	40.1	35.1
B. The test questions were generally about as difficult as the questions I encountered in my course work.	48.3	58.5	43.5	50.0	52.0	59.6	45.4	51.1
C. The questions were generally easier than the questions I encountered in my course work.	14.7	16.0	16.6	17.1	12.7	10.6	14.5	13.9

After the ELA test, more students reported not having taken a course that covered the ELA CAHSEE topics in 2010 than 2008. For those responding after taking the mathematics test, the opposite was true. More students reported that they had trouble with CAHSEE topics when they were covered in courses in 2010 than they did in 2008, but there was a decrease in the percentage of students claiming that they forgot what they learned over the two years (see Table 3.39).

Table 3.39. Percentages of 12th Graders' Responses in 2008 and 2010 After ELA and Mathematics by Those Who Passed in 2010 and Those Who Did Not.

Question 12. If some topics on the test were difficult for you, was it because:	ELA Questionnaire Responses				Math Questionnaire Responses			
	Students Passing		Students Not Passing		Students Passing		Students Not Passing	
	2008	2010	2008	2010	2008	2010	2008	2010
A. I did not take courses that covered these topics.	15.7	16.8	18.1	22.3	17.5	16.0	21.7	18.5
B. I had trouble with these topics when they were covered in courses I took.	29.7	33.3	30.6	34.9	44.8	36.9	41.5	35.6
C. I have forgotten things I was taught about these topics.	41.1	33.0	36.3	29.0	31.7	39.1	28.0	36.1
D. None of the topics was difficult for me.	13.6	17.0	15.1	13.9	6.1	8.0	8.9	9.8

Efforts Put Into the CAHSEE

In 2008, most of the current students reported that they would stay in school and continue to try to pass the CAHSEE. In 2010, students were less likely to report that they would stay in school and try to pass, with less than half of those who did not pass claiming that they would stay at school. Over 20 percent of students who did not pass in

2010 stated that they would take courses at a community college and try again to pass, and about 7 percent of them said they would try to get a GED certificate. Over 10 percent of the grade twelve students who did not pass in 2010 stated that they did not know what they would do if they did not pass (see Table 3.40).

Table 3.40. Percentages of 12th Graders' Responses in 2008 and 2010 After ELA and Mathematics by Those Who Passed in 2010 and Those Who Did Not.

Question 14. If you do not pass the CAHSEE in this administration, what are you most likely to do? (Mark the most likely option.)	ELA Questionnaire Responses				Math Questionnaire Responses			
	Students Passing		Students Not Passing		Students Passing		Students Not Passing	
	2008	2010	2008	2010	2008	2010	2008	2010
A. I will stay in school and try again to pass the CAHSEE.	61.3	57.3	54.1	45.5	65.3	55.7	58.3	45.1
B. I will take courses at a community college and try again to pass the CAHSEE.	9.3	18.4	11.8	21.7	8.8	18.7	10.7	22.1
C. I will participate in some other type of program that will help me to pass the CAHSEE.	15.9	11.4	15.7	12.1	13.7	11.8	13.6	11.5
D. I will try to get a GED certificate.	3.7	4.1	5.9	6.9	3.3	4.2	5.2	7.2
E. I will give up trying to get a diploma all together.	2.2	1.6	3.4	3.2	1.5	1.6	2.7	3.0
F. I really do not know what I will do.	7.6	7.2	9.1	10.5	7.6	7.9	9.5	11.2

Summary of Grade Twelve Student Responses

Students who took the CAHSEE in grade twelve showed an increase in concern that the CAHSEE would prevent them from graduating with the rest of their class compared to their responses two years before. They were slightly less likely than previously to report that they would stay in school and try again if they did not pass during this administration. Despite this, most grade twelve students have plans to continue learning after high school by attending a four-year college, a two-year community college, or a vocational/trade school.

The grade twelve students who were still taking the CAHSEE were less likely to report that the topics and questions were familiar to them than the grade ten students who did pass, but there were slight improvements in 2010 compared to 2008. These results suggest that more work is needed to erase deficits in course coverage for students who do not initially pass the CAHSEE.

Chapter 4: Trends in Educational Achievement and Persistence During the CAHSEE Era

D. E. (Sunny) Becker

Introduction

The CAHSEE examination is used to satisfy both Elementary and Secondary Education Act (ESEA) requirements and high school graduation requirements. As such, it is a high-stakes examination for both students and school staff that could have profound effects on the education system as a whole.

Other chapters in this report address direct characteristics and results of the CAHSEE program. This chapter explores a broader view of the educational milieu in California such as dropout rates, graduation rates, and college preparation. We look at year-by-year trends to reveal changes over time. While we cannot attribute any of the trends cited to CAHSEE alone, the trends reflect the presence of the CAHSEE as a significant determinant of educational policies and practices. To the extent possible we look at trends beginning prior to the introduction of the CAHSEE graduation requirement to the present; however when statistics are not comparable from one year to the next we truncate trend lines to show meaningful comparisons. While the other chapters in this report reflect data through the 2009–10 school year, and in some cases, through September 2010, many of the sources of information in this chapter lag a year behind. For example, graduation and dropout rates in this September 2010 report would ideally reflect trends through the 2008–09 school year.

As in previous annual evaluation reports, we have gathered data from publicly-available sources to inform this chapter. The primary source is the CDE online system. The CDE recently implemented a new data collection system, the California Longitudinal Pupil Achievement Data System (CALPADS), with the potential to expand and improve available data. Due to software problems, some data from the 2009–10 school year were not available in time for this report. Missing data include fall 2009 enrollment counts, which affect most of the calculations in this chapter. As a result, many of the tables and figures in this report contain no more information than appeared in our fall 2009 evaluation report. We have updated these tables and figures to indicate where the new data would appear, if available. Much of the narrative description has been retained intact from the 2009 report.

In the following sections, we look at students who leave high school prematurely, examining them from a number of perspectives, including official California Department of Education (CDE) dropout rates and enrollment trends. We also explore officially reported graduation rates and indicators of achievement by college-bound students such as SAT (formerly Scholastic Aptitude Test) and ACT (formerly American College Testing) participation and scores, as well as shifts in participation and success in Advanced Placement (AP) examinations.

Students Who Leave High School Prematurely

An early and persistent concern regarding the implementation of the CAHSEE requirement was that struggling students would become frustrated and drop out at higher rates. This phenomenon is difficult to measure, however, because the definition of what a "dropout" is and the requisite data underpinnings to clearly identify dropouts are in flux. Dropout tracking has improved markedly over the past two years, but because these systems are new we continue to look at the dropout phenomenon from multiple perspectives. At the same time, support systems for repeat grade twelve students have increased. We provide multiple views here of trends in student persistence through Grade 12. We first present the State of California's official dropout statistics. We then look at enrollment trends for grades 9 through 12 for various student cohorts.

The CDE reports dropout rates publicly on its Web site. Two types of dropout calculations are common: one is based on the number of students who drop out in a given school year; the other is based on the percentage of a cohort of students (e.g., Class of 2009) who drop out over the four years between their class entering the ninth grade and their original graduation date. We look first at single-year dropout rates and then at cumulative four-year dropout rates, both as reported by CDE. At the time of this report the most recent available data reflected the Class of 2008.

Changes to dropout calculations. The introduction of statewide student identifier numbers in 2006–07 made possible more accurate identification of student outcomes once students left a school. New procedures were implemented to identify more accurately the status of students who left a school, and dropout rates are now derived from this student-level data. Due to this change, the dropout rates from 2006–07 onward are not comparable with dropout rates in previous years.

CDE single-year dropout rate. The single-year dropout rate measures the percentage of students enrolled in grades 9–12 who are identified as dropouts in a single school year. The official CDE dropout calculation derives the total number of students who drop out of grades 9–12 as a percentage of the total grade 9–12 enrollment in a single school year. Under the revised reporting procedures described above, the single-year dropout rate in the 2006–07 school year was 5.5 percent, declining slightly to 5.3 percent in the 2007–08 school year.

Table 4.1 disaggregates the single-year dropout rate by race/ethnicity and for economically disadvantaged students, EL students, and students with disabilities. The racial/ethnic groups are listed in descending order by dropout rate for the Class of 2008. The rightmost column indicates the reduction in dropout rate for the two-year period and reveals that the dropout rate for each racial/ethnic group is lower in the Class of 2008 than in the Class of 2007. The overall dropout rate declined by 0.2 percentage points, from 5.5 percent to 5.3 percent. Table 4.1 indicates that the most recent dropout rate for African American students is 9.0 percent—substantially higher than for all other groups, including students struggling with language challenges or disabilities. Rates for Native

American, Hispanic, and Pacific Islander students, as well as economically disadvantaged, English learners, and students with disabilities also exceed the rate for the state as a whole.

Table 4.1. CDE Single-Year Dropout Rates by Demographic Group

Demographic Group	Adjusted Grade 9–12 One-year Dropout Rate			Reduction in Dropout Rate From 2007 to 2008
	Class of 2007	Class of 2008	Class of 2009	
Race/Ethnicity				
African American (not Hispanic)	9.8%	9.0%	N/A	0.8
American Indian/Alaska Native	7.6%	6.6%	N/A	1.0
Multiple/No Response	7.2%	6.1%	N/A	1.1
Hispanic	6.7%	6.0%	N/A	0.7
Pacific Islander	6.7%	5.6%	N/A	1.1
White	3.5%	3.1%	N/A	0.4
Filipino	2.7%	2.2%	N/A	0.5
Asian	2.3%	2.0%	N/A	0.3
Other Demographic Groups				
Economically Disadvantaged	N/A	6.4%	N/A	N/A
LEP*	N/A	6.0%	N/A	N/A
Special Education	N/A	6.9%	N/A	N/A
State Total	5.5%	5.3%	N/A	0.2

Source: California Department of Education (CDE) DataQuest. http://data1.cde.ca.gov/dataquest (accessed July 20, 2010).
* Limited English Proficient for federal reporting includes English learners and fluent-English proficient students that have not yet tested at the proficient or above level for three years on the California Standards Test (CST) English-language arts (ELA) test.

A careful reader might notice that the reduction in the state total dropout rate in Table 4.1 (0.2 percentage point) is smaller than the reduction for any of the subgroups (ranging from 0.3 to 1.1 percentage points). This is an example of Simpson's Paradox, in which the successes of individual groups are not reflected directly when combined. In this case, the growth of membership in groups with higher dropout rates (e.g., Hispanic) affects the state totals disproportionately, and the effect increases over time. The end result is that the combined state totals are constrained and the overall changes are dampened by population shifts.

The single-year dropout rate described in Table 4.1 does not distinguish the point within the high school years at which dropouts were increasing. Table 4.2 shows the number of students dropping out at each grade level for the classes of 2007 and 2008. As seen in previous years, the number of students dropping out during grade twelve far exceeded the dropouts in earlier grades. Cells marked with an asterisk were calculated under the new rules. Because the grade twelve dropouts for the Class of 2007 were calculated under the new rules, it is impossible to distinguish how much of the increase was due to the rule change. A similar spike in dropouts was seen in the same 2006–07 school year for grade eleven students in the Class of 2008. Dropout rates for the Class of 2009 were unavailable at the time this report was written.

Table 4.2. CDE Single-Year Dropout Counts by Grade Level for Classes of 2007 & 2008

Class of	Enrollment Grade 9	Grade 9 Dropouts	Grade 10 Dropouts	Grade 11 Dropouts	Grade 12 Dropouts
2007	526,442	11,578	10,458	12,529	43,209*
2008	549,485	10,447	10,177	15,864*	42,794*
2009	N/A	N/A	N/A	N/A	N/A

Source: CDE DataQuest. http://data1.cde.ca.gov/dataquest. (accessed October 13, 2010).

*Note. * Indicates dropout rate was calculated under new 2006–07 rule*.

CDE cumulative four-year dropout rate and graduation rate. CDE also routinely produces a cumulative four-year dropout rate, which is another common dropout metric. This calculation accounts for students within a class cohort who drop out, over time, at grade nine, ten, eleven, or twelve. This rate more closely reflects what the public and some policy analysts perceive as the meaning of dropping out of high school. Due to their cumulative effect, four-year dropout rates are generally considerably higher than single-year dropout rates.

Our 2007 annual report (Becker and Watters, 2007) reported CDE's published four-year dropout rates, disaggregated by race/ethnicity. The dropout rate is calculated as the number of students in a cohort class who dropped out in grade nine, ten, eleven, or twelve, as a percentage of the ninth grade entering school population. The 2007 report indicated that dropout rates were level from 2003 through 2005 between 12.6 percent and 13 percent, and then increased to 14.8 percent in 2006—the year the CAHSEE requirement took effect.

Table 4.3 shows the CDE four-year dropout rates by race/ethnicity for the classes of 2007 and 2008, ordered by descending rates for the Class of 2008. Dropout rates for the Class of 2009 were unavailable in time for this report. As described earlier, the identification of dropouts changed in the 2006–07 school year, so it is not comparable with previous years. The table indicates that more than a fifth of students in the Class of 2007 (21.1 percent) dropped out over the four years. The rate was reduced by 2.2 percent for the Class of 2008. The rightmost column indicates the reduction in dropout rate and reveals that the dropout rate for each group is lower in the Class of 2008 than in the Class of 2007. The overall dropout rate dropped from 21.1 percent to 18.9 percent. Table 4.1 indicates that the four-year dropout rate for African American students in the Class of 2008 is 32.9 percent—substantially higher than for other groups. Rates for Hispanic, American Indian/Alaskan Native, and Pacific Islander students also exceed the rate for the state as a whole, tripling those of Asians and Filipinos and nearly triple those of white students.

Table 4.3. CDE Four-Year Dropout Rates by Demographic Group

Demographic Group	Four-Year Dropout Percentage			Reduction in Dropout Rate
	Class of 2007	Class of 2008	Class of 2009	
Race/Ethnicity				
African American (not Hispanic)	35.8%	32.9%	N/A	2.9
American Indian	28.1%	24.1%	N/A	4.0
Hispanic	26.7%	23.8%	N/A	2.9
Multiple/No Response	26.8%	23.3%	N/A	3.5
Pacific Islander	24.8%	21.3%	N/A	3.5
White	13.3%	11.7%	N/A	1.6
Filipino	10.6%	8.6%	N/A	2.0
Asian American	9.0%	7.9%	N/A	1.1
Other Demographic Groups				
Economically Disadvantaged	N/A	25.2%	N/A	N/A
LEP*	N/A	23.8%	N/A	N/A
Special Education	N/A	25.3%	N/A	N/A
State Totals	21.1%	18.9%	N/A	2.2

Source: CDE DataQuest. http://data1.cde.ca.gov/dataquest. (accessed August 23, 2010).
* Limited English Proficient for federal reporting includes English learners and fluent-English proficient students that have not yet tested at the proficient or above level for three years on the CST ELA test.

Enrollment Trends

Enrollment counts are documented at the schoolhouse level in the fall of each school year. CDE maintains statewide aggregations of these figures. Since the beginning of this evaluation process, we have tracked enrollment figures by graduation class cohort. Comparing enrollment trend patterns over time serves as an independent indicator of trends in retention or dropout rates. Until California's student-level data tracking matures, we cannot assess trends in the comings and goings of individual students. However, overall enrollment figures provide an indication of the extent to which students in each grade do not proceed to the next grade with the rest of their classmates.

Before investigating the California enrollment trends, we offer a description of two typical enrollment patterns that are commonly seen both within and outside California. One persistent enrollment pattern is a grade none "bubble." That is, in any given year more students are enrolled in grade nine than in either grades eight or ten. One oft-theorized explanation is that some first-time grade nine students fail to earn sufficient credits to achieve grade ten status on time. Therefore in the fall of each year the grade nine population comprises the prior year's grade eight graduates plus a bubble of some number of students who would have been grade ten students, if they were on pace with their classmates. [These students may earn extra credits in the coming year and "catch up" with their classmates, or may drop back to a later graduating class.] At the same time, the grade ten enrollment counts would be suppressed by exclusion of those same students. A second persistent enrollment pattern is a decrease in enrollment (drop-off) each year after grade nine. This decrease is generally considered to include high school dropouts.

The CDE website (http://www.cde.ca.gov/ds/) provides enrollment counts. To present enrollment trends in a manner that is comparable across years despite population growth or declines, we have converted these enrollment counts to percentage decreases. Table 4.4 and Figure 4.1 show the decrease in enrollment from grade nine to ten for several recent years, going back far enough to precede the introduction of the CAHSEE. Fall enrollment counts for 2009 were unavailable in time for this report. The most recent classes are listed first. The Classes of 2004 and 2005 are highlighted as classes subject to "partial implementation" of the CAHSEE (because the requirement was delayed before any diplomas were withheld) and classes from 2006 on are highlighted as classes for which the CAHSEE requirement was "fully in effect." As noted in the 2004 evaluation report (Wise, et al., 2004), the grade ten drop-off rate increased by 0.1 percent for the Class of 2006. It was hypothesized that the increased drop-off rate was primarily due to a larger than usual increase in the number of students classified as grade nine students for more than a year. In the 2004–05 school year, the drop-off rate declined somewhat to 5.6 percent. This was followed by a substantial increase to 6.1 percent in 2005–06, an even more substantial decrease to 5.3 percent in 2006–07, then increases to 5.7 percent and 6.0 percent in subsequent years.

Table 4.4. Enrollment Declines From 9th to 10th Grade by High School Class

School Year	High School Class	10th Grade Enrollment	Prior Year's 9th Grade Enrollment	Decrease	
				Number	Percent
2009–10	2012	N/A	539,167	N/A	N/A
2008–09	2011	*509,157	541,650	*32,493	6.0%
2007–08	2010	513,707	545,040	31,333	5.7%
2006–07	2009	517,873	547,014	29,141	5.3%
2005–06	2008	515,761	549,486	33,725	6.1%
2004–05	2007	497,203	526,442	29,239	5.6%
2003–04	2006	490,465	520,287	29,822	5.7%
2002–03	2005	471,726	499,505	27,779	5.6%
2001–02	2004	459,588	485,910	26,322	5.4%
2000–01	2003	455,134	482,270	27,136	5.6%
1999–00	2002	444,064	468,162	24,098	5.1%
1998–99	2001	433,528	458,650	25,122	5.5%
1997–98	2000	423,865	450,820	26,955	6.0%

Source: CDE DataQuest. http://data1.cde.ca.gov/dataquest. (accessed August 23, 2010).
The * before a number represents an adjustment in data from the 2008 evaluation report due to an updating of the figures used.
The light green horizontal line indicates the demarcation between classes prior to and initially subject to the CAHSEE graduation requirement; the heavy green line indicates the transition to the CAHSEE requirement being fully in effect.

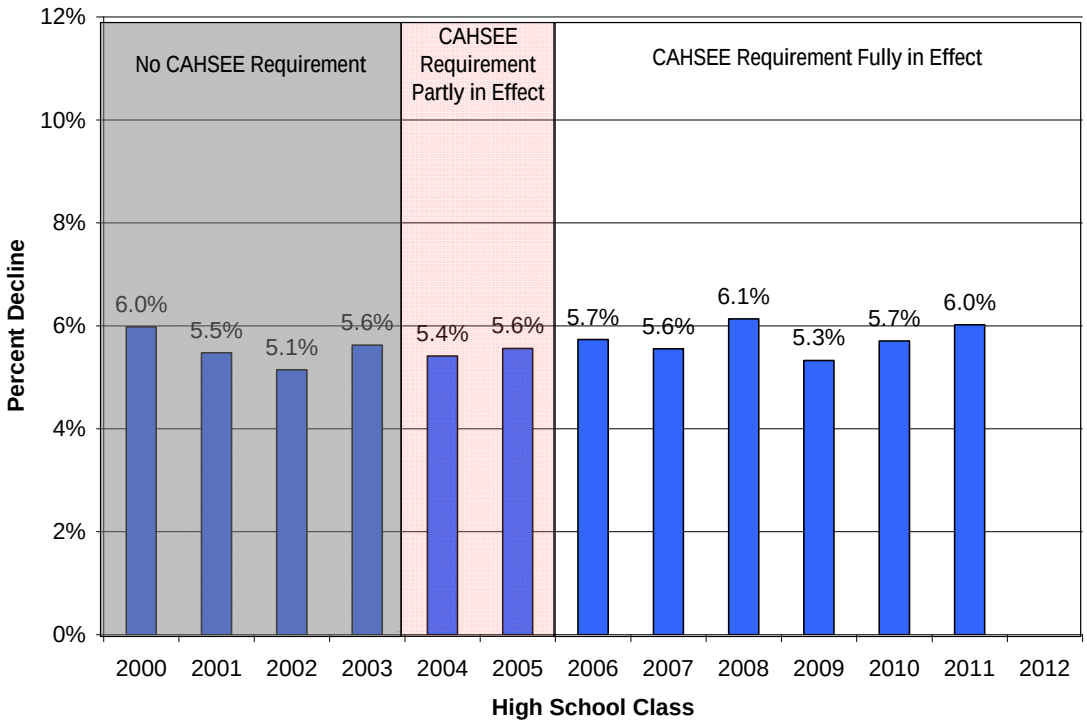


Figure 4.1. Enrollment declines from 9th to 10th grade by high school class.

Table 4.5 and Figure 4.2 show similar information for the drop-off between grade ten and eleven enrollments. Results show that the drop-off rate between grade ten and eleven enrollments declined beginning with the Class of 2004. The rate declined from 5.7 percent to 4.8 percent in 2008–09. Enrollment counts in the fall of 2009 were unavailable in time for this report.

Table 4.5. Enrollment Declines From 10th Grade to 11th Grade

School Year	High School Class	11th Grade Enrollment	Prior Year's 10th Grade Enrollment	Decrease	
				Number	Percent
2009–10	2011	N/A	509,157	N/A	N/A
2008–09	2010	*489,207	513,707	24,500	4.8%
2007–08	2009	488,227	517,873	29,646	5.7%
2006–07	2008	487,522	515,761	28,239	5.5%
2005–06	2007	467,304	497,203	29,899	6.0%
2004–05	2006	459,114	490,465	31,351	6.4%
2003–04	2005	441,316	471,726	30,410	6.4%
2002–03	2004	428,991	459,588	30,597	6.7%
2001–02	2003	420,295	455,134	34,839	7.7%
2000–01	2002	409,119	444,064	34,945	7.9%
1999–00	2001	401,246	433,528	32,282	7.4%
1998–99	2000	390,742	423,865	33,123	7.8%

Source: CDE DataQuest. http://data1.cde.ca.gov/dataquest. (accessed August 23, 2010).
The * before a number represents an adjustment in data from the 2008 evaluation report due to an updating of the figures used.
The light green horizontal line indicates the demarcation between classes prior to and initially subject to the CAHSEE graduation requirement; the heavy green line indicates the transition to the CAHSEE requirement being fully in effect.

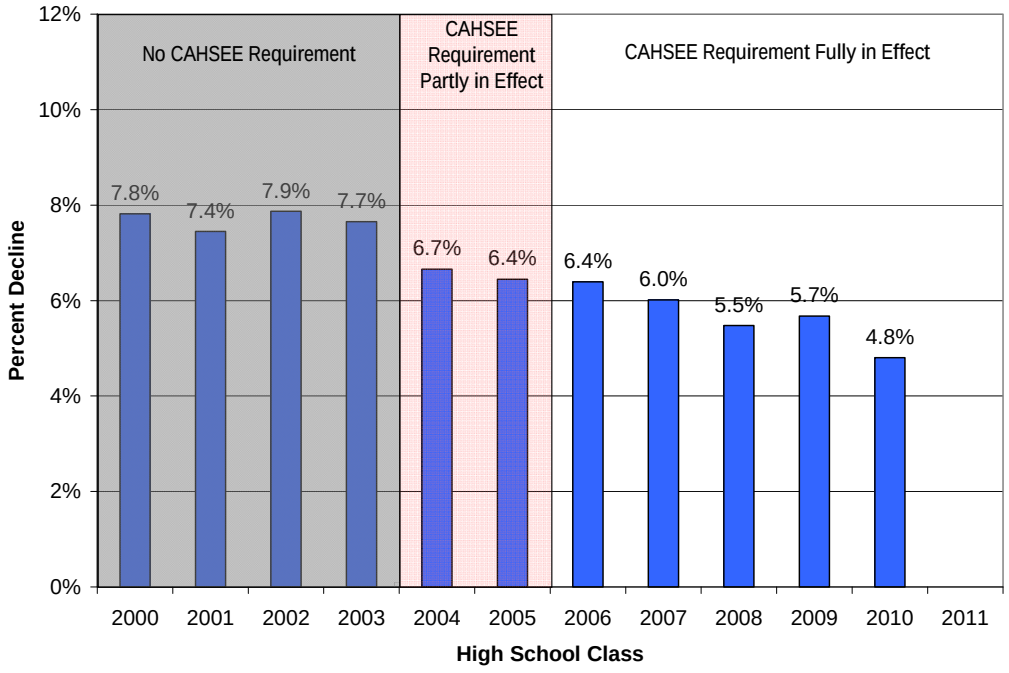


Figure 4.2. Enrollment declines from 10th to 11th grade by high school class.

Table 4.6 and Figure 4.3 show similar information for the drop-off between grade eleven and twelve enrollments. This rate decreased substantially (2.5 percentage points) with the Class of 2003. The reduced drop-off rate continued for subsequent cohorts, with the exception of the Class of 2006. The drop-off rate from grade eleven to grade twelve for the Class of 2009 is markedly lower than for any previous cohort analyzed here. This may in part be due to the continuation of grade twelve students after failing to graduate with their original graduating class. Enrollment counts in the fall of 2009 were unavailable in time for this report.

Table 4.6. Enrollment Declines From 11th Grade to 12th Grade

School Year	High School Class	12th Grade Enrollment	Prior Year's 11th Grade Enrollment	Decrease	
				Number	Percent
2009–10	2010	N/A	489,032	N/A	N/A
2008–09	2009	*476,156	489,227	*13,071	2.7%
2007–08	2008	*468,281	487,493	*19,212	3.9%
2006–07	2007	443,154	467,304	24,150	5.2%
2005–06	2006	423,241	459,114	35,873	7.8%
2004–05	2005	409,568	441,316	31,748	7.2%
2003–04	2004	396,272	428,991	32,719	7.6%
2002–03	2003	386,379	420,295	33,916	8.1%
2001–02	2002	365,907	409,119	43,212	10.6%
2000–01	2001	357,789	401,246	43,457	10.8%
1999–00	2000	347,813	390,742	42,929	11.0%

Source: CDE DataQuest. http://data1.cde.ca.gov/dataquest. (accessed August 23, 2010).
The * before a number represents an adjustment in data from the 2008 evaluation report due to an updating of the figures used.
The light green horizontal line indicates the demarcation between classes prior to and initially subject to the CAHSEE graduation requirement; the heavy green line indicates the transition to the CAHSEE requirement being fully in effect.

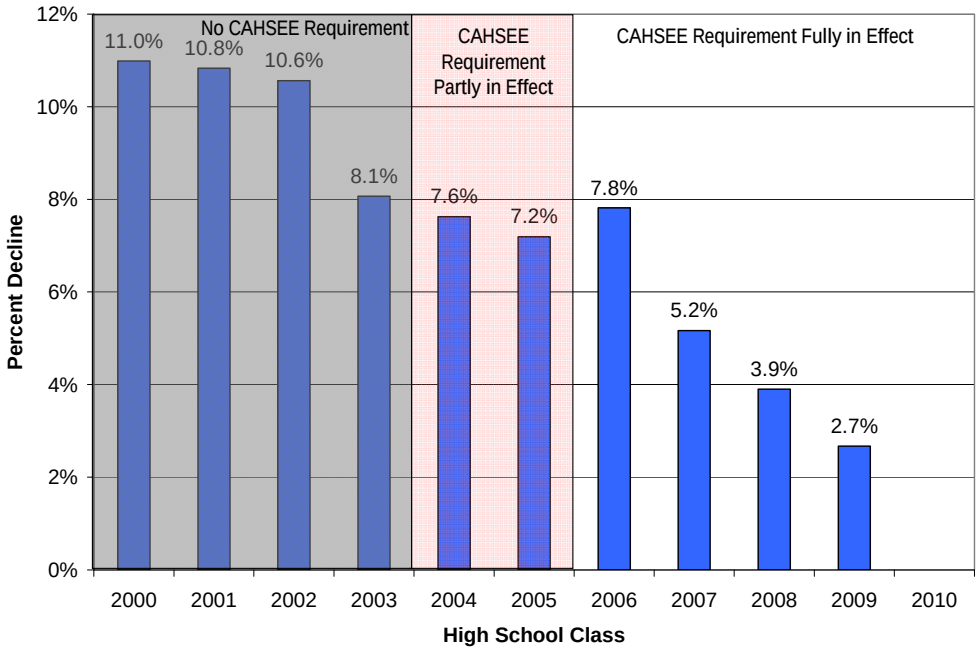


Figure 4.3. Enrollment declines from 11th to 12th grade by high school class.

Students Who Leave High School Prematurely: Summary

We examined single-year and four-year dropout rates among high school students in the classes of 2007 and 2008. We found that the dropout rates, while substantial, declined overall and for every demographic group. However, we found that both the one-year and four-year dropout rates among African American students far exceeded those of every other racial/ethnic group, as well as disadvantaged groups such as economically disadvantaged, LEP, and special education students. As reported in previous annual evaluation reports, we found that the bulk of dropouts occur in Grade 12.

We analyzed enrollment trends by graduation class cohort from the Class of 2000 through the fall 2008 enrollment counts. The fall enrollment numbers for the 2008–09 school year reflect lower grade-by-grade reduction than the previous year with the exception of Grade 10 enrollment.

Graduation Rates

Another indicator that could conceivably be affected by the CAHSEE requirement is the high school graduation rate. CDE publicly reports the graduation rate in two ways. The following descriptions are taken directly from the CDE website.

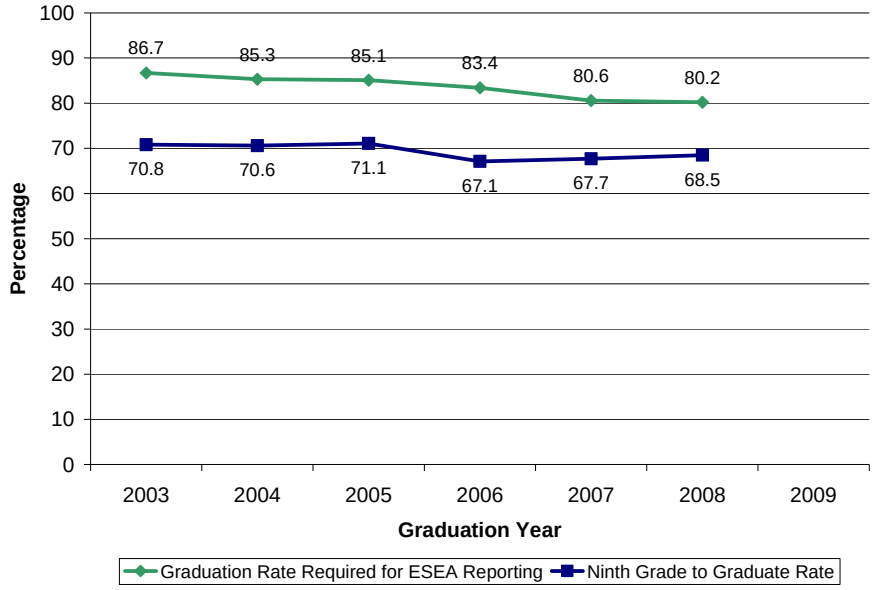
a) ***Ninth Grade to Graduation Rate***: "This rate is calculated using two different types of data, single point-in-time data (enrollment) and year-end cumulative data (graduates). When used at the state level, this calculation provides a reasonable statewide graduation rate estimate. However, application of this calculation at the school-level creates invalid rates for schools with increasing or declining enrollment, or moderate student mobility. Therefore this rate is only calculated at the state level." This rate is calculated as the number of graduates divided by grade nine enrollment from four years prior.

b) ***Graduation Rate required for ESEA Reporting***: "The usage of this rate is the result of [states'] negotiations with the U.S. Department of Education and is required for ESEA reporting. Since this rate is calculated using comparable data (both school-level dropout and graduate counts are cumulative year-end summary data), the rate will never exceed 100 percent even in schools with increasing or declining enrollments. Therefore this rate may be used at the school-level. *This calculation overstates the graduation rate since the difference between 9th grade enrollment and graduates and dropouts is not accounted for."* [Emphasis added.] This rate is calculated by dividing the number of graduates for a given year by the sum of the same number of graduates and dropouts from grades 9 through 12.

As noted in the italicized statement above, the second calculation overstates the graduation rate. We emphasize here the ninth grade to graduation rate, which is perhaps the rate that most closely reflects what the public perceives as a graduation rate. It answers the question: Given an incoming population of grade nine students, how many will graduate on time four years later?

The reader is cautioned that there are a number of types of high school completion that are categorized neither as graduating nor as dropping out, including completing the GED or California High School Proficiency Examination (CHSPE), and enrolling in college or an adult education program.

Overall Graduation Rates. Inspection of Figure 4.4 reveals that both graduation rates dropped in 2006, the first year CAHSEE took effect. The percentage of graduates based on Grade 9 fall enrollment had increased slightly in previous years but dropped by 4.0 percentage points in 2006. This rate recovered somewhat in subsequent years: by 0.6 points in 2007 and another 0.8 points to a rate of 68.5 percent in 2008. The graduation rate used for ESEA reporting, however, declined every year since 2003. After a drop of 1.7 points in 2006 and 2.8 percentage points in 2007 the rate declined at a slower rate of 0.5 percentage points in 2008. Between 2003 and 2008, this graduation rate dropped by 6.5 percentage points. Graduation rates for the Class of 2009 were unavailable at the time of this report.



Source: CDE DataQuest. http://data1.cde.ca.gov/dataquest. (Data retrieved on July 20, 2010).

Figure 4.4. Trends in two graduation rates.

A careful reader may notice that the graduation rate from Grade 9 for a given class (depicted in Figure 4.4) and the four-year dropout rate (reported in Table 4.3) do not total to 100 percent. The Class of 2007 had a 67.7 percent graduation rate and a 21.1 percent four-year dropout rate; the Class of 2008 had a 68.5 percent graduation rate and an 18.9 percent four-year dropout rate. These figures represent gaps of approximately 12 percent and 13 percent. Some of the unaccounted for students may have completed high school without graduating or may have continued on for a second year of grade twelve.

Graduation Rates for Demographic Groups. We next examined graduation rates separately for various demographic groups. ***We note that the CDE Web site***

provides many convenient reports, but disaggregated graduation rates require some digging. To calculate graduation rates for each demographic group, we gathered the relevant enrollment counts and graduation counts and calculated percentages. As a quality control check, we verified that the overall rates match the rates reported by CDE.

Graduation rates for the Class of 2009 were unavailable at the time of this report. Table 4.7 shows the Ninth Grade to Graduation rates by racial/ethnic group. These are presented in order of declining graduation rate for the Class of 2008. Two patterns are notable here. First, the overall graduation rate and the rate for each individual group increased from 2007 to 2008, with the exception of African American students. Second, the graduation rates for three groups of students—African American, Hispanic, and American Indian/Alaska Native students—are substantially lower than the overall graduation rates that are more readily available on the CDE website. The decline in the graduation rate of the lowest group, African Americans, means that the gap between African Americans and every other racial/ethnic group has widened.

Table 4.7. Ninth Grade to Graduation Rates by Race/Ethnicity

Ninth Grade to Graduate Rate	2007	2008	2009	Change in Graduation Rate
Asian	90.0%	92.0%	N/A	2.0
Filipino	85.4%	89.0%	N/A	3.6
White	77.8%	79.1%	N/A	1.3
Pacific Islander	68.2%	71.4%	N/A	3.2
American Indian/Alaska Native	58.3%	62.3%	N/A	4.0
Hispanic	55.7%	58.0%	N/A	2.3
African American (not Hispanic)	55.3%	54.6%	N/A	-0.7
TOTAL	67.7%	68.5%	N/A	0.8

Source: Derived from CDE DataQuest. http://data1.cde.ca.gov/dataquest (accessed July 20, 2010).

We noted earlier that the sum of graduation rates and dropout rates do not account for all students. Table 4.8 combines the graduation rates in Table 4.7 with four-year dropout rates in Table 4.3. The final column, “Rate Not Graduating or Dropping Out,” indicates the percentage of students in each racial/ethnic group not included in the graduation or dropout rates. This percentage varies widely by demographic group, from a low of 0.1 percent of Asian students to 18.2 percent of Hispanic students. See last year’s annual report (Becker, Wise, and Watters, 2009) for a detailed description of exit codes.

Table 4.8. Combined Dropout and Graduation Rates by Race/Ethnicity

Demographic Group	2008 Ninth Grade to Graduation Rate	2008 4-Year Dropout Rate	Sum of Graduates and Dropouts	Rate Not Graduating or Dropping Out
Asian	92.0%	7.9%	99.9%	0.1%
Filipino	89.0%	8.6%	97.6%	2.4%
White	79.1%	11.7%	90.8%	9.2%
Pacific Islander	71.4%	21.3%	92.7%	7.3%
American Indian/Alaska Native	62.3%	24.1%	86.4%	13.6%
Hispanic	58.0%	23.8%	81.8%	18.2%
African American (not Hispanic)	54.6%	32.9%	87.5%	12.5%
TOTAL	68.5%	18.9%	87.4%	12.6%

Source: Table 4.3 and 9.7, this report.

Graduation Rates: Summary

We examined two kinds of graduation rates: the graduation rate based on grade nine enrollment, and the graduation rate required by ESEA, which is based upon the number of graduates in a given year and the number of dropouts associated with that Class from grades 9 through 12. We found that the graduation rate as a percentage of grade nine students increased slightly in 2007 and 2008 while the ESEA rate slowed its decline. Just over two-thirds (68.5 percent) of students who entered ninth grade in the fall of 2004 graduated four years later.

Review of disaggregated 9th-grade-to-graduation rates revealed that only the African American graduation rate declined in 2008 from its 2007 level, widening the gap with other racial/ethnic groups. Graduation rates vary widely, from 54.6 percent among African American students to 92 percent for Asian students.

College Preparation

Indicators of educational quality include the rigor of coursework undertaken in high school as well as the proportion of students intending and prepared to engage in postsecondary education. We turn now to two sets of indicators (other than the CAHSEE) of student preparedness for college.

Percentage of Students Taking College Preparation Courses

One indicator of educational quality is the caliber of coursework completed. Two of California's statewide university systems, the University of California (UC) and the California State University (CSU), have developed a list of courses known as "A–G courses" that are required for incoming freshmen. This list includes 16 units of high school courses, of which at least 7 must be taken in the last two years of high school. In this system, a unit represents a full year (two semesters) of study.

Table 4.9 indicates the percentage of public high school graduates who completed A–G courses over several years. Note that this calculation excludes students

who did not graduate; if this were based, say, on grade 9 enrollment the rates would be considerably lower. At the time of this report data were unavailable for 2008–09; therefore demographic groups are listed in order of percentage in 2007–08. Among graduates, the rate of completing A–G courses varies widely, from 22.5 percent among Hispanic students to 59.2 percent among Asian students. The rate of completion overall, and for every group except American Indian/Alaska Native, declined from 2006–07 to 2007–08. One-third of the Class of 2008 completed the course requirements to enter a UC or CSU school.

Table 4.9. Trends in Percentages of Graduates Completing Minimum Coursework (A–G courses) for Entry into UC or CSU systems

	School Year					
Ethnic Category	2003-04	2004-05	2005-06	2006-07	2007-08	2008-09
Hispanic	21.9%	24.1%	25.6%	25.2%	22.5%	N/A
African American (not Hispanic)	25.2%	25.2%	25.6%	26.5%	23.3%	N/A
American Indian/Alaska Native	22.3%	23.0%	23.6%	23.6%	25.7%	N/A
Pacific Islander	27.2%	27.7%	28.9%	28.1%	27.4%	N/A
Multiple/No Response	26.9%	31.0%	32.7%	35.4%	32.4%	N/A
White	39.6%	40.9%	40.5%	39.5%	39.8%	N/A
Filipino	44.9%	46.6%	45.4%	45.7%	44.8%	N/A
Asian	56.2%	58.7%	60.2%	59.8%	59.2%	N/A
State Total	33.8%	35.2%	36.1%	35.5%	33.9%	N/A

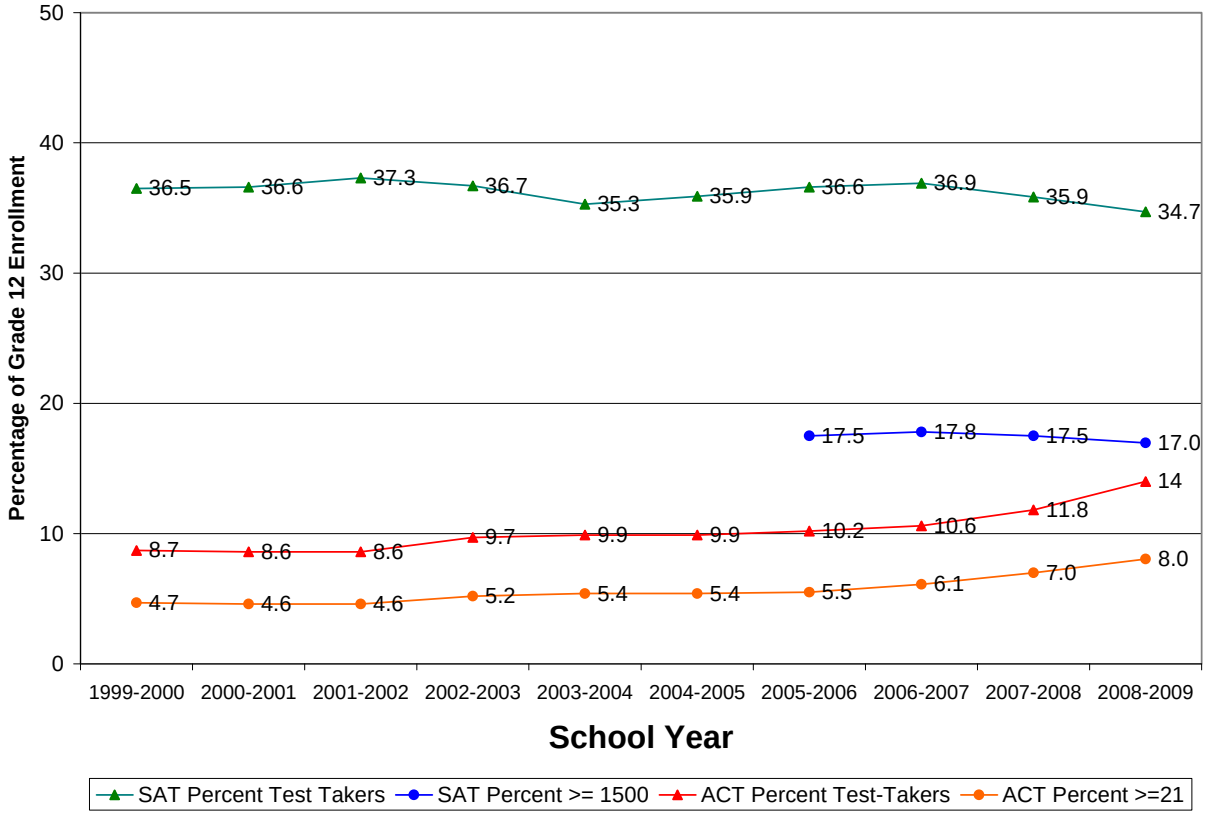
Source: California Postsecondary Education Commission (http://www.cpec.ca.gov). Data retrieved on 07/20/10.

College Entrance Examination Participation and Performance

The level of student aspirations for education beyond high school is reflected in the proportion of students who sit for college entrance examinations. College readiness can also be examined by looking at the performance of students who take such tests. These two factors are confounded, in that higher participation may be related to lower scores overall. For example, if only a small, high performing proportion of a class takes an examination, scores will be high but participation will be low. If a larger proportion of students, who may be lower performing, are encouraged to take the test, the average scores will drop but participation rates will increase. Interpretation of patterns requires care because of this confounding effect. Due to the sources of information on these examinations, some information from the 2008–09 school year is available for this report. We have included the most recent data throughout.

Two college-entrance examination programs are most prevalent in the United States: the SAT and the ACT. Figure 4.5 indicates the percentage of California students participating in these two examination programs. The lines with triangle-shaped markers represent the proportion of each Grade 12 class that took either the SAT or ACT. Approximately 35 percent of the Class of 2009 took the SAT and 14 percent took the ACT. This was a decrease in SAT participation and an increase in ACT participation relative to the previous year, continuing both trends from the previous year.

Figure 4.5 also shows the percentage of students who achieved a particular score on these two examinations, over time. The graph uses the same cut points used for reporting on the CDE Web site. The lines with asterisk pointers reflect the percentage of students ***in the class*** achieving a minimum combined score of 1500 on the SAT or 21 on the ACT, respectively.[7] The percentage of students attaining the designated score on the SAT declined from a peak of 17.8 percent in 2006–07 to a low of 17.0 in 2008–09. Student ACT performance continued its upward trajectory of the last several years to a peak of 8.0 percent of students in 2008–09 reaching an ACT score of at least 21.



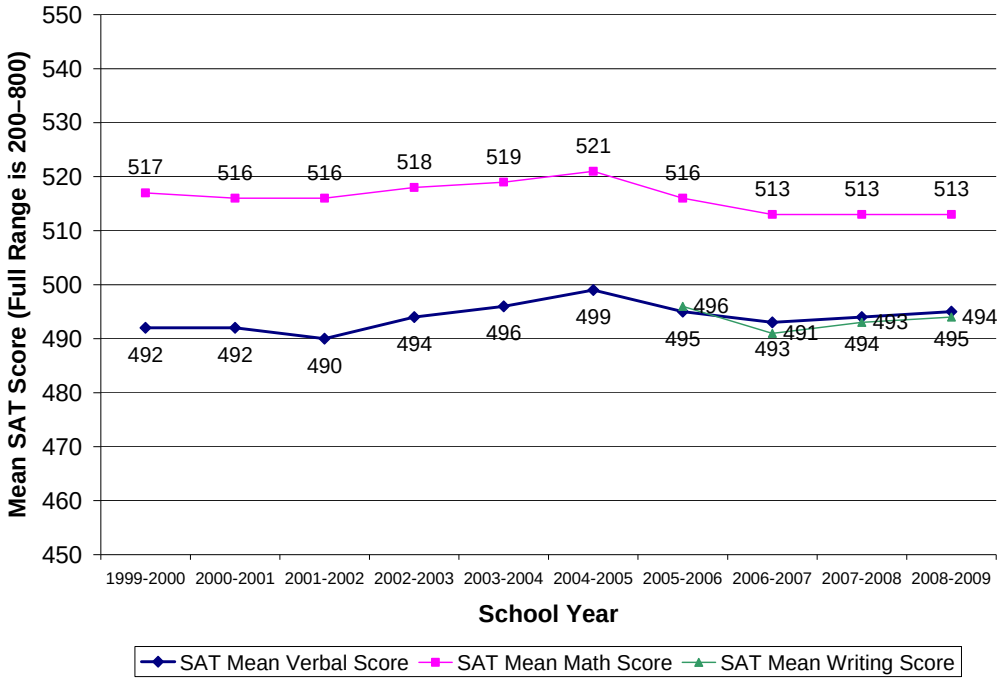
Source: CDE DataQuest. http://data1.cde.ca.gov/dataquest.(accessed August 29, 2010).
Note. Prior to 2005–06 CDE reported the percentage of students achieving a combined SAT Verbal and Mathematics score of 1,000. SAT Writing was introduced in 2006; in 2005–06 CDE changed its reporting to a combined Verbal, Mathematics, and Writing score. The latter metric is reported here.

Figure 4.5. SAT and ACT participation rates and success rates over time.

Another metric to assess success on tests such as the SAT and ACT is to look at mean scores. SAT mathematics, verbal, and writing examinations are each scored on a range of 200–800. Figure 4.6 indicates that mean SAT mathematics and verbal scores generally increased each year between 2001 and 2005, but both verbal and mathematics mean scores dropped in 2006 and 2007 (the CAHSEE went into effect in

[7] The average national scores for Reading, Mathematics, and Writing at the 50th percentile level are approximately 500 each. The national rank for an ACT Composite score of 21 is the 57th percentile.

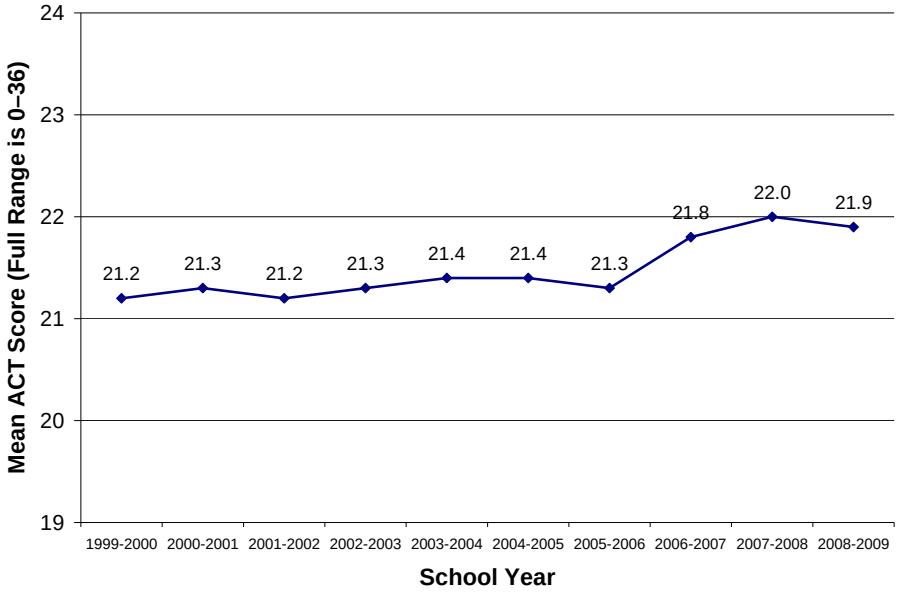
2006). Verbal and writing scores increased in 2008 and 2009 while mathematics scores remained flat. The downward trend in mean scores mimicked a national trend; between 2005 and 2007 the nationwide mean score dropped from 508 to 502 in Critical Reading and from 520 to 515 in Mathematics (see http://professionals.collegeboard.com/profdownload/Total_Group_Report.pdf). SAT writing was introduced in 2006.



Source: CDE DataQuest. http://data1.cde.ca.gov/dataquest. (accessed July 20, 2010).

Figure 4.6. SAT mean math, verbal, and writing scores over time.

Figure 4.7 shows mean scores on the ACT examination over the same period. Scores were highly consistent until 2006–07, when they increased from 21.3 to 21.8. The next two years stayed comparatively flat near this higher level of performance. ACT examinations are scored on a range of 1–36; a smaller range is depicted to make the trends more visible.



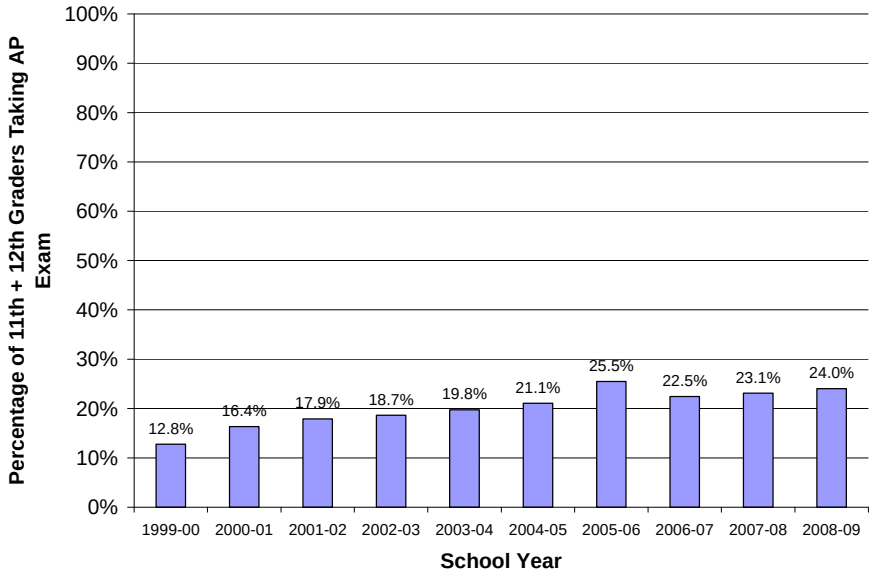
Source: CDE DataQuest. http://data1.cde.ca.gov/dataquest. (accessed July 20, 2010).

Figure 4.7. ACT mean scores over time.

AP Test Achievement

The College Board's Advanced Placement (AP) program comprises a set of college-level courses offered in high school. Students have the option of taking a standardized AP examination after completing the course to earn college credit and/or gain placement in advanced college courses. AP examination participation rates and scores are indicators of the rigor of high school courses as well as of the intentions of students to attend college. The College Board currently offers more than 30 AP courses and examinations, but not all courses are offered at all high schools.

Figure 4.8 displays AP examination participation rates among California students over time. Each bar represents the percentage of juniors and seniors taking at least one AP examination in a given school year. The rates increased for every school year between 1999–2000 and 2005–06, then declined in 2006–07; the rate increased in the next two years from 22.5 percent to 24.0 percent.

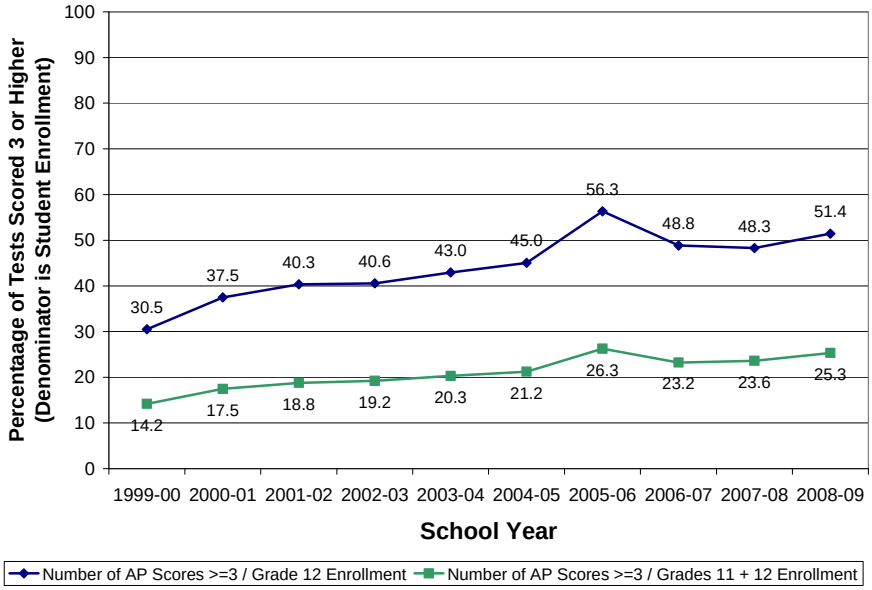


Source: CDE DataQuest. http://data1.cde.ca.gov/dataquest (accessed July 20, 2010).

Figure 4.8. AP participation rates over time.

The CDE Web site also reports AP pass rates over time. These data are summarized in Figure 4.9 but require some explanation. The numerator in each calculation is the number of AP tests on which a score of 3 or greater[8] was earned. The denominator for one line (with diamonds) is Grade 12 enrollments; the denominator on the other line (with squares) is total Grade 11 and Grade 12 enrollment. Note that students who earned a score of 3 or better on multiple AP examinations were counted multiple times in the numerator, but only once in the denominator. Therefore, the rate of 51.4 percent pass rate among grade twelve students in 2008–09 does not indicate that 51.4 percent of high school seniors earned AP credit; in fact, Figure 4.8 indicates that only 25.3 percent of seniors and juniors took one or more AP examinations. However, these rates are useful to assess overall AP impact over time. Inspection of Figure 4.9 reveals that AP pass rates have generally increased over time, with an anomalous peak in the 2005–06 school year.

[8] AP examination scores are on a scale of 1–5. Typically postsecondary institutions grant credit or advanced placement for minimum scores of 3 or 4. A score of 3 is a commonly accepted indicator of success on an AP examination.



Source: CDE DataQuest. http://data1.cde.ca.gov/dataquest (accessed July 20, 2010).

Figure 4.9. AP pass rates over time (i.e., number of AP examination scores >=3 as a percentage of student enrollment).

College Preparation: Summary

Among graduates, the rate of completing A–G courses varies widely, from 22.2 percent among Hispanic students to 59 percent among Asian students. The rate of completion overall, and for every group except American Indian/Alaska Native, declined from 2006–07 to 2007–08. One-third of the Class of 2008 completed the course requirements to enter a UC or CSU school. Data for the Class of 2009 were unavailable for this report.

The percentage of high schools seniors taking the SAT examination decreased in the most recent years available, from 36.9 percent in 2006–07 to 34.7 percent in 2008–09. Over the same time period the percentage of students achieving a score of 1500 or better declined from 17.8 percent to 17.0 percent. On the other hand, the participation and performance of students on the ACT has continued its steady climb over several years. Between 2004–05 and 2008–09, the participation rate increased from 9.9 percent to 14.0 percent and the percentage of students reaching a score of 21 or better rose from 5.4 percent to 8.0 percent.

A given student may take the SAT, the ACT, or both. We cannot determine the overlap between the SAT and ACT examinee groups, but do note that summing the percentages of students taking the two examinations increased steadily from a total of 45.8 percent in 2004–05 to 48.7 percent in 2008–09. This may indicate more students are taking both examinations, or possibly the inclusion of a wider range of students in this important step toward college participation.

Another indicator of the rigor of high school coursework is participation in, and success on, Advanced Placement examinations. The 2008–09 school year brought increased participation and increased achievement on these examinations. The percentage of students earning a score of 3 or higher increased by 1.7 percentage points as a percentage of combined Grade 11 and 12 enrollment and increased by 3.2 percentage points as a percentage of Grade 12 enrollment.

Summary Findings

Data sources outside the CAHSEE program provide indications of the state of education in California. The Class of 2006 was the first required to pass both parts of the CAHSEE to receive a high school diploma, so trends from 2006 through 2009 are of particular import. Unfortunately, much of the data to inform trends through 2009 were unavailable for this report. We report here the most recent data available, including 2009 results for performance on the SAT, ACT, and AP examinations; all other trends are reported through 2008.

One important indicator of the impact of the CAHSEE requirement is whether the proportion of students who leave high school without a diploma changes in some way. Answering this seemingly straightforward question demands a multifaceted answer. California made important improvements in its student-level data systems, facilitating more accurate dropout tallies in 2007. Therefore we report here trends from 2007 to 2008; the reader is referred to previous reports in this series for earlier trends.

First, we note that the 2007 dropout rates were substantially larger than previous rates but we cannot disentangle how much of this change is a real increase in dropouts versus more accurate reporting. We found that official dropout rate calculations indicate that both single-year and four-year dropout rates decreased between 2007 and 2008, overall and for all ethnic categories. However, both dropout metrics revealed that African American students drop out at a substantially higher rate than every other group, including disadvantaged groups such as Limited English Proficient (LEP) and special education students. In addition, American Indian/Alaskan Native, Hispanic, Pacific Islander, economically disadvantaged, LEP, and special education students show notably higher dropout rates than White, Filipino, and Asian students. As reported previously, we found that the bulk of dropouts occur in grade twelve.

As a second look at students leaving high school prematurely, we investigated enrollment trends by grade and over time. While this measure does not directly account for mobility in and out of the state, substantial changes in enrollment declines can be interpreted as an indirect indicator of dropout rates. Enrollment patterns indicate that the drop-off rates of sophomores increased in fall 2009 while the drop-off rate of juniors and seniors declined. This grade twelve phenomenon may be attenuated by the continuation of students in a second senior year.

High school graduation rates can also be measured in multiple ways. We examined two measures: the graduation rate as a percentage of Grade 9 enrollment four years earlier, and the graduation rate required by ESEA, which is based upon the

number of graduates in a given year and the number of dropouts in the relevant grade nine through grade twelve years. We found that the graduation rate as a percentage of grade nine students increased slightly in 2007 and 2008 while the ESEA rate merely slowed its decline. Just over two-thirds (68.5 percent) of students who entered ninth grade in the fall of 2004 graduated four years later.

Review of disaggregated 9th-grade-to-graduation rates revealed that only the African American graduation rate declined in 2008 from its 2007 level, widening the gap with other racial/ethnic groups. Graduation rates vary widely, from 54.6 percent among African American students to 92 percent for Asian students. ***We also note that disaggregated graduation rates are not as readily available on the CDE website as other important educational indicators.***

We also looked at the percentage of students by demographic group who are not accounted for in either the 9th-grade-to-graduation or the four-year dropout rates. We found large differences across racial/ethnic groups, from a low of 0.1 percent for Asian students to a high of 18.2 percent for Hispanic students.

Participation in the SAT College entrance examination, as well as the percentage of students reaching a score of 1500 or higher, continued a two-year decline in the 2008–09 school year, while participation and performance on the ACT increased for the fourth year in a row.

In short, we found that graduation rate trends varied depending on the metric used, either rising slightly or declining less quickly in 2008 relative to 2007. While rates overall are worrisome—just over two-thirds of grade nine students graduated on time in 2008—rates for specific demographic groups are substantially lower. And while dropout rates decreased for the Class of 2008 over the Class of 2007, the rates for African American students are nearly three times the rates for White students, and rates for Hispanic, English learners, and students with disabilities are more than twice the rate for White students, for example. The accuracy of documenting dropout rates has improved due to the new student identification system. While we applaud this increased accuracy, in the short term it limits comparability over time.

One-third of Class of 2008 graduates completed the A–G courses required by the University of California and California State University systems. Rates varied widely among racial/ethnic groups. Participation in Advanced Placement examinations increased in 2009, as did measures of success on the AP. Participation in the most common college entrance examination, the SAT, decreased while ACT participation increased.

Chapter 5: Exploration of Alternative Means for Students with Disabilities to Meet the CAHSEE Requirement

Michele M. Hardoin, Lauress L. Wise, and Wade W. Buckland

Introduction

In 2009 the Assembly Bill (AB) 2040 Panel, an advisory panel of educators and others with experience working with students with disabilities or assessment, developed recommendations for alternative means of meeting the CAHSEE requirement for eligible students with disabilities. The AB 2040 Panel's recommendations addressed the following components of the AB 2040 statute requirements:

- Eligible students
- Specific options
- Scoring
- Uniformity
- Cost
- Level of administration

In 2010 the CDE requested that HumRRO, as part of its independent evaluation of the CAHSEE, conduct an analysis of the Panel's recommended CAHSEE Performance Validation Process (PVP), a two-tier alternative means process. The goal of the analysis was to collect information about (a) the feasibility of the proposed alternative means and (b) how the level of academic achievement demonstrated by those alternative means compares to the level of academic achievement in the content standards required for passage of the CAHSEE.

HumRRO based its independent study on the Panel's documented recommendations[9]. An overview of the recommendations is provided in Appendix A, and particular pages of the Panel's document are referred to in this chapter, including the CAHSEE PVP Process Flow Chart (shown in Figure 5.1), the Tier One and Tier Two Checklists (shown in Figures 5.3 and 5.5), and the model work-sample scoring rubric (shown in Appendix B, p. 38). The reader is advised to review and become oriented to the Panel's recommendations so as to have the necessary context for the results presented in this chapter.

[9] *California High School Exit Examination Assembly Bill 2040 Panel Findings and Recommendations Regarding Options for Alternative Means for Eligible Students with Disabilities*, October 9, 2009

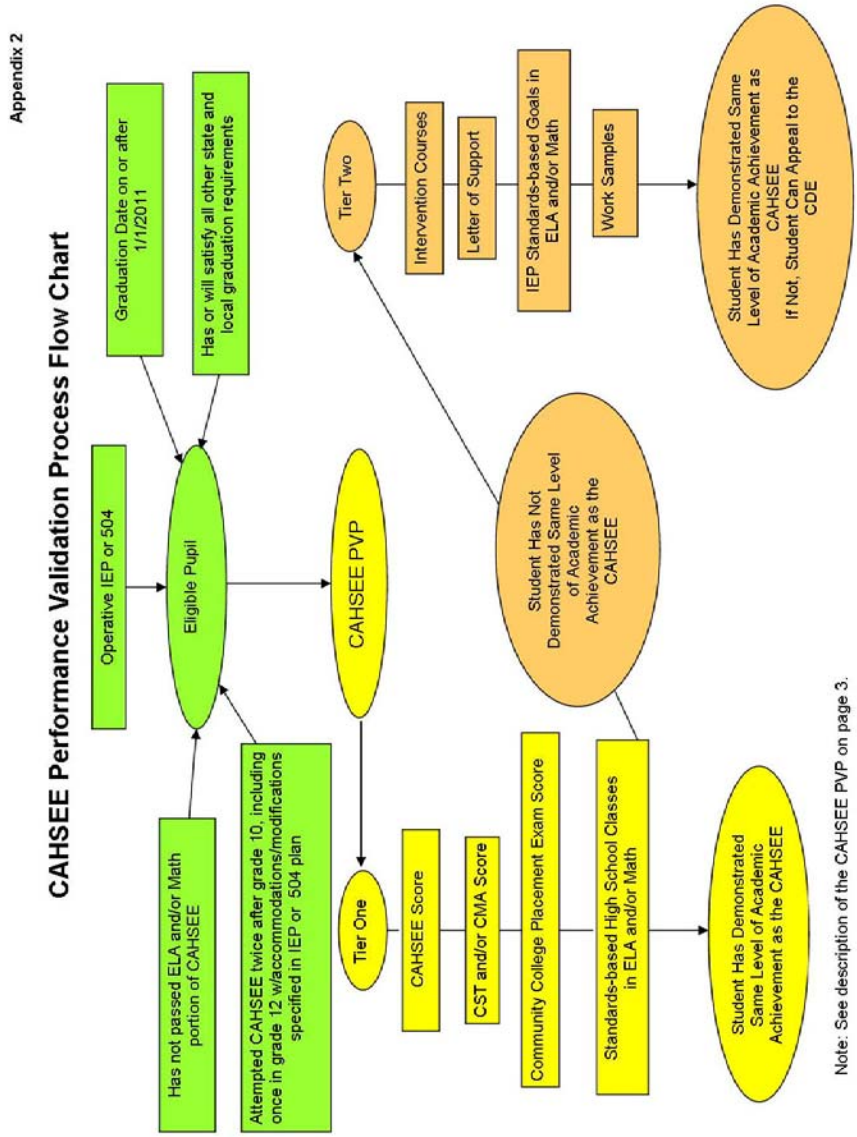


Figure 5.1. Recommended Performance Validation Process Flow Chart.

HumRRO's study of the feasibility and comparability of the Panel's PVP recommendations dealt mainly with the following questions:

- How might the Tier One eligibility and passing criteria be operationally defined, and what estimated numbers of students might be identified as eligible and passing?

- How might the Tier Two evidence criteria and scoring procedures be more operationally defined, and what do school- and district-based educators in the special education arena think about the feasibility and comparability of various components of PVP?

- What might be the costs, in terms of time, to implement the Tier Two recommendations for the estimated number of eligible students?

To analyze the Panel's Tier One recommendation for validating student performance through scores on assessments and grades for English-language arts (ELA) and mathematics courses using a weighted system, HumRRO analyzed data from the high school classes of 2008 and 2009. To analyze the Panel's Tier Two recommendation that student performance be validated through work samples and the collection of other evidence, HumRRO facilitated two focus groups and conducted an online feedback opportunity to gather input from special education experts. The special education experts represented districts and high schools with significant populations of students likely to utilize the proposed CAHSEE alternative means.

This chapter presents the results of the Tier One analysis and the results of the online feedback opportunity, which included questions regarding both Tier One and Tier Two. A copy of HumRRO's Web-based presentations of the proposed Performance Validation Process and the online feedback opportunity questions can be found in appendices B and C, respectively.

Tier One

Students Who Might Be Eligible for the Performance Validation Process

Our analyses of Tier One options were based on students with disabilities in the high school classes of 2008 and 2009. The requirement that California students pass a high school exit examination in order to receive a diploma went into effect with the Class of 2006. Students with disabilities, however, received an exemption from this requirement for two years while issues relating to a pending lawsuit were resolved and while there was further study of alternatives for these students (Senate Bill [SB] 964). After two years of exemptions, students with disabilities in the Class of 2008 and the Class of 2009 were also required to pass both parts of the CAHSEE to receive a diploma. In 2010, students with disabilities were once again exempt from the CAHSEE requirement, pending further study of alternative ways of demonstrating mastery of the skills required for graduation, as specified in AB 2040. Thus 2008 and 2009 were the only two years so far in which students with disabilities were required to pass the CAHSEE.

Figure 5.2 provides information about students with disabilities in the classes of 2008 and 2009 who passed the CAHSEE in grade ten, eleven, or twelve and those who continued to take the CAHSEE in grade twelve but did not pass by the end of their senior year. The box labeled "10th Graders" in the upper center of the figure indicates that 48,140 grade ten students with disabilities took the CAHSEE in 2006 (Class of 2008) and 47,508 grade ten students with disabilities took the CAHSEE in 2007 (Class of 2009). Each year, about 36,000 of these students took the CAHSEE with no accommodations or modifications, another 2,000 took the CAHSEE with one or more allowable accommodations, and over 4,000 took the CAHSEE with a modification. Approximately 5,000 students each year had an answer document that did not yield CAHSEE scores. In most cases, the student was absent or otherwise left the answer document blank. These students are labeled as "Not Tested" in the chart.

The box at the upper right of Figure 5.2 shows the number of grade ten students with disabilities achieving a passing score on both parts of the CAHSEE in 2006 and 2007. About 10,000 of the grade ten students with disabilities who took the CAHSEE without accommodations or modifications achieved a passing score. Approximately 400 of the students receiving accommodations and 800 of the students with modifications achieved a passing score each year. In 2007, we noted a small number of answer documents for repeat grade ten students who appeared to have already passed the CAHSEE.

The number of grade eleven students with disabilities testing and the number passing in 2007 and 2008 are shown in the next row of boxes in Figure 5.2. Similar numbers for grade twelve students in 2008 and 2009 are shown below that.

Not all of the grade eleven students tested in 2007 and 2008 had been tested as grade ten students the year before. As shown in the box at the upper left of Figure 5.2, about 3,000 of the grade eleven students with disabilities tested each year were not matched to any prior CAHSEE records. Many likely transferred from out of state or from private schools and some could not be found due to errors in entering identifying information. Another 1,500 students tested as grade eleven students each year were tested the previous years, but not as grade ten students. Most were repeat grade eleven students who now entered the target high school class. In all, 4,781 of the grade eleven students with disabilities tested in 2007 and 4,202 of those tested in 2008 were new to their respective high school classes.

As shown by the second box on the left side of Figure 5.2, about 6,000 students each year who did not pass the CAHSEE in grade ten were not matched to CAHSEE records for the next year. These would include students who left the state or transferred to a private school as well as students who dropped out. Another 2,000 of the grade ten students not passing were matched to test records the next year, indicating that they were repeating grade ten or, in a very few cases, had skipped to grade twelve, thus leaving the target class.

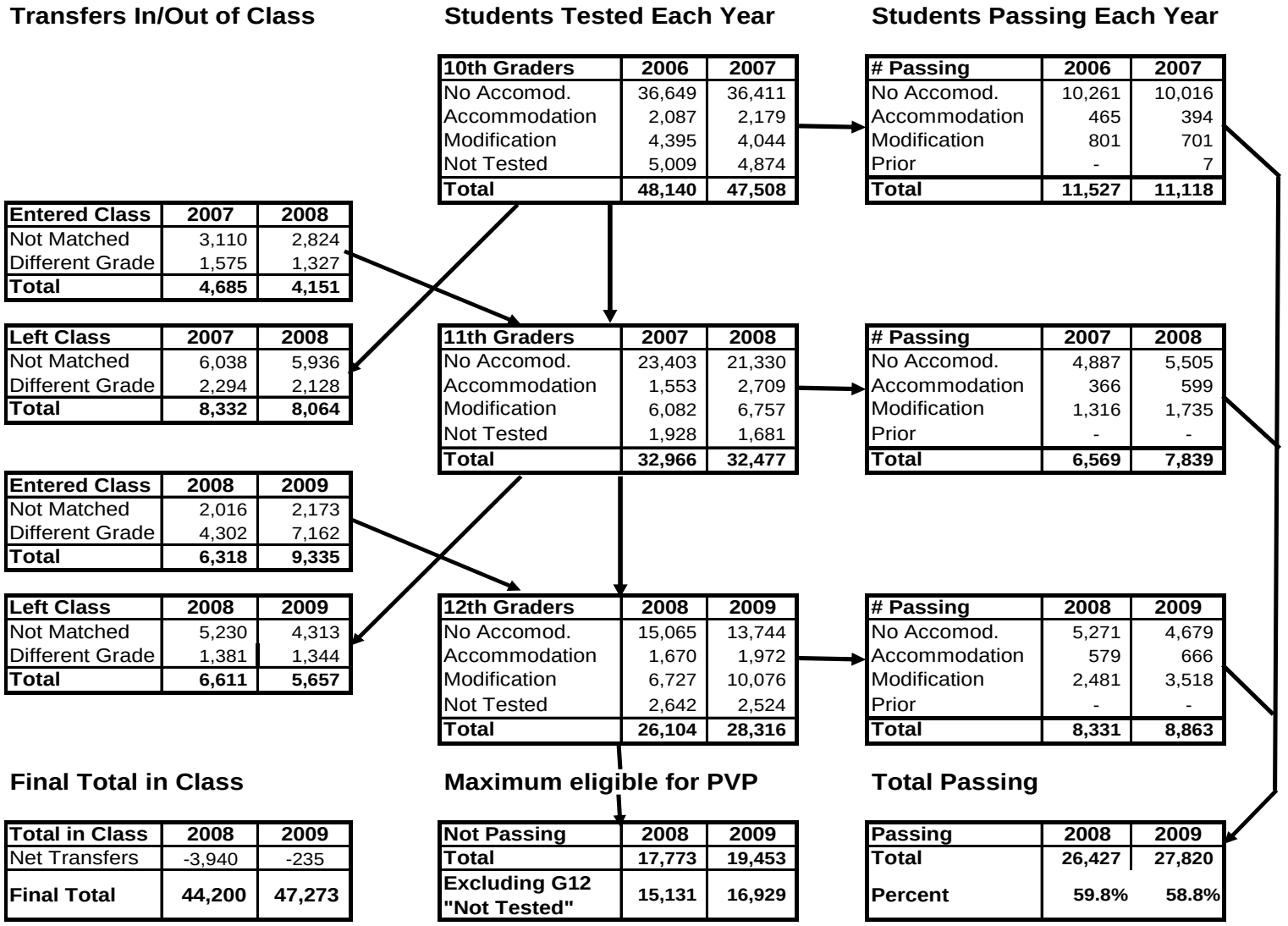


Figure 5.2 CAHSEE results for students with disabilities in the high school classes of 2008 and 2009.

The box at the bottom left of Figure 5.2 indicates that, after counting students with disabilities leaving the Class of 2008 and those entering, the final count was about 4,000 students less than the count of grade ten students in 2006. For the Class of 2009, the final count of 47,273 was very close to the initial count of 47,508. For the Class of 2009, there were about 3,000 more repeat grade twelve students than for the Class of 2008. These were students with disabilities who did not meet the CAHSEE requirement as seniors in 2008, the first year that the requirement applied to these students, and were continuing as grade twelve students in 2009.

Of the approximately 48,000 students with disabilities in each high school class, about 18,000 or 19,000 continued to try to pass the CAHSEE as grade twelve students but failed. The eligibility criteria for the CAHSEE PVP recommended by the AB 2040 panel included (a) having taken the CAHSEE at least twice after grade ten, including at least once in grade twelve; (b) having an IEP or Section 504 plan that included coverage of the knowledge and skills covered by the CAHSEE; and (c) meeting or being expected to meet all other state and local graduation requirements. We did not have information on the last two requirements for individual students. We included all of them in our analyses of possible Tier One screening under the proposed CAHSEE PVP. The fact that they were still taking the CAHSEE as seniors suggested that this was appropriate given their IEPs and that someone thought there was a chance they would meet other graduation requirements.

Table 5.1 shows the demographic distribution of students who might be eligible for the proposed CAHSEE PVP screening. Compared to all students with disabilities, students eligible for Tier One screening were somewhat more likely to be Hispanic or African American and considerably more likely to be English learners or students from economically disadvantaged households.

Table 5.2 compares students who might be eligible for Tier One screening with all students with disabilities in terms of their primary disability code. Nearly 70 percent of the eligible students are classified as having a specific learning disability. The differences between all students with disabilities and CAHSEE PVP-eligible students are minor.

Table 5.1. Demographic Distributions for All Students, All Students With Disabilities, and Students With Disabilities Eligible for Tier One Screening

Group		All Grade 10 Students	Grade 10 Students with Disabilities	Eligible for Tier One in Grade 12
Total Number of Students[1]		*1,008,645*	*95,748*	*37,226*
Gender	Female	48.9%	34.3%	34.5%
	Male	51.1%	65.7%	65.5%
Race	Native American	0.8%	1.1%	0.8%
	Asian	8.7%	3.7%	3.3%
	Pacific Islander	0.7%	0.5%	0.5%
	Filipino	2.8%	1.2%	0.9%
	Hispanic	44.8%	45.1%	54.3%
	African American	8.3%	13.5%	19.2%
	White (not Hispanic)	33.8%	34.7%	20.7%
	Other	0.1%	0.2%	0.2%
Other	English Learner	16.1%	23.4%	32.4%
	Economically Disadvantaged	42.8%	49.8%	59.3%

[1] Counts and percentages are based CAHSEE test records for all students in the high school classes of 2008 and 2009 combined.

Table 5.2. Primary Disability Code Distributions for All Students with Disabilities and Students with Disabilities Eligible for Tier One Screening.

Primary Disability	All Students with Disabilities	Eligible for Tier One
Number of Students[1]	*95,748*	*37,226*
210 Mental Retardation	5.5%	7.7%
220 Hard of Hearing	1.0%	0.9%
230 Deaf	0.6%	0.9%
240 Speech Impairment	5.2%	3.0%
250 Visual Impairment	0.6%	0.3%
260 Emotional Disturbance	7.7%	8.6%
270 Orthopedic Impairment	1.6%	1.2%
280 Other Health Impairment	6.8%	4.4%
290 Specific Learning Disability	67.1%	69.7%
300 Deaf-Blindness	0.0%	0.0%
310 Multiple Disability	0.7%	0.7%
320 Autism	2.7%	2.1%
330 Traumatic Brain Injury	0.5%	0.5%

[1] Counts and percentages are based on all students in the high school classes of 2008 and 2009 combined.

Estimates of Possible Tier One Passing Rates

The first step in the CAHSEE PVP recommended by the AB 2040 panel is a Tier One screen based on other test scores and possibly grades. Figure 5.3 illustrates the

recommended Tier One worksheet. As shown, many details remain to be worked out. For example, which Standardized Testing and Reporting (STAR) Program California Modified Assessment (CMA) or California Standards Test (CST) scores should be included? What community college tests should be used and how should points be assigned to scores from these tests? How much weight should be given to grades and for which classes?

Performance Validation Process *An eligible student with a CAHSEE score of less than 350 enters this process at Tier One. Students entering Tier One but not earning enough points must continue on to Tier Two.*			
TIER ONE – Test Scores (Student may earn a maximum of XX points)			
☐	CMA – ELA:	CMA – Math:	Basic – 1 point Proficient – 2 points Advanced – 3 points
☐	CST – ELA:	CST – Math:	
☐	ELA community college test:	Math community college test:	XX score – 1 point XX score – 2 points XX score – 3 points
☐	ELA High School Classes:	Math High School Classes:	A – XX points B – XX points C – XX points D – XX points

Figure 5.3 Tier One Worksheet recommended by the AB 2040 Panel.

The first question we addressed concerning the proposed Tier One screen was which CST and CMA score(s) should be included in the worksheet. The California content standards covered by the CAHSEE are drawn from grade nine and ten standards (with 2 standards from grade eight) for ELA and from grades six and seven and Algebra I standards for mathematics. There is no one CST or CMA that, by itself, covers content exactly *comparable* to the content covered by the CAHSEE. For our exploratory analyses, we decided to examine an average of scores from several CSTs that, taken together, did cover all of the content included in the CAHSEE assessments. For ELA, we looked grade seven through ten CST scores or comparable CMA scores where they were available. For mathematics, most of the CAHSEE standards taken from grade six were also covered in the grade seven assessment and we did not believe evidence based on a grade six test would be credible. We included the grade seven CST, the Algebra I CST, and the General Mathematics CST, if taken. Figure 5.4 illustrates the Tier One worksheet used in our exploratory analyses.

English-Language Arts			Mathematics		
	Points*			Points*	
Course	CST/CMA	Grades	Course	CST/CMA	Grades
7th Grade ELA 8th Grade ELA 9th Grade ELA 10th Grade ELA			7th Grade Math General Math Algebra I		
Total Points Number of Courses			Total Points Number of Courses		
Average per Course			Average per Course		

* Points

CST/CMA Scores	Course Grades
4 - Advanced	4 - A
3 - Proficient	3 - B
2 - Basic	2 - C
1 - Below Basic	1 - D
0 - Far Below Basic	0 - F

Figure 5.4 Tier One worksheet used in exploratory analyses.

We matched Tier One eligible students from the classes of 2008 and 2009 to CST and CMA scores from 2003 through 2009. Table 5.3 shows the distribution of average points per CST for each of the two high school classes. We found no relevant CST or CMA scores for nearly 20 percent of the eligible students. Nearly all students who were matched had average scores in the Far Below Basic range (under 1.0 points). Note that for the Class of 2008 and the Class of 2009, nearly all of the CSTs for the subjects included here were taken in the 2005–06 school year or earlier. Very few students in these cohorts had CMA scores for the tests included in our analyses. In cases where CMA scores were available, we used performance level information from students' results from the CMA in lieu of the CST.

Table 5.3 Average Worksheet Points from CST and CMA Scores.

Average Worksheet Points	ELA		Math	
	2008	2009	2008	2009
Missing[1]	19.2%	14.9%	21.4%	18.0%
0 - < 1	71.7%	76.1%	65.0%	68.5%
1 - < 2	8.8%	8.7%	13.2%	13.1%
2 - <3	0.3%	0.3%	0.4%	0.3%
3 - < 4	0.1%	0.0%	0.0%	0.0%
4	0.0%	0.0%	0.0%	0.0%
Total	100.0%	100.0%	100.0%	100.0%
Percent 2 or better	0.4%	0.4%	0.4%	0.3%

[1] No relevant CST or CMA scores were found.

The next issue to be clarified was the minimum number of points needed to meet the CAHSEE requirement for each subject. Because of differences in the content covered, it was not possible to identify a worksheet score that was **exactly** equivalent to a CAHSEE passing score. However, the CAHSEE passing scores were set at the Basic performance level. So we set Basic performance levels for each of the CSTs or CMAs through a similar judgmental process. Hence, for the exploratory analyses, we set a minimum worksheet score of 2.0, an average of just barely Basic, as the requirement for passing. For each class and subject, less than .5 percent of the eligible students met this requirement. Note that the vast majority of eligible students were far below this minimum so that minor changes in the minimum score levels from a more precise equivalency study would not change the estimated passing rates appreciably.

Grade information is not yet included in the CALPADS system, so we did not have access to transcripts for individual students. Nor do we know what policy judgment would be made about the weight given to course grades, if any. We explored a second option for the Tier One worksheet, in which grades would be considered, but given substantially less weight than CST and CMA scores. Specifically, we assumed that a grade-point average of C or better would add a half point to the average CST score, allowing students with a CST point average as low as 1.5 to reach the 2.0 minimum.

Feedback received from school and district personnel, described below, suggested that roughly half of the eligible students had grade point averages of C or better. To approximate the difference in results if grades were considered, we estimated that half of the students with CST point scores of 1.5 to 2.0 would have sufficiently good grades to reach the passing level. Again, because most students have CST point averages in the far-below-basic range, minor differences in the course grades considered or the weight given to different grade point levels would be unlikely to lead to major changes in the percentages of students meeting the CAHSEE requirements.

One final consideration is the need to estimate how many of the eligible students still need to pass both parts of the CAHSEE and how many of those students would be likely to do so. Table 5.4 separates the estimated percentage of eligible students who might meet the CAHSEE requirement through a Tier One screen by those needing only to meet the ELA requirement, those needing only to meet the mathematics requirement,

and those needing to meet both requirements. Table 5.4 also shows results separately for those who were very close to passing the CAHSEE (scores of 340 to 349) and for three tiers of students with lower levels of CAHSEE scores (330 to 339, 320 to 329, and below 320).

Table 5.4 Estimated Tier One Passing Rates, Overall and by CAHSEE Score Level

Need to Pass ELA Only		Highest CAHSEE ELA Score				
Basis	Statistic[1]	< 320	320-329	330-339	340-349	All
	Number of Students	1,132	1,068	1,694	2,023	5,917
CST/CMA Only	Number Passing Tier 1	7	4	7	13	31
	Percent Passing Tier 1	0.6%	0.4%	0.4%	0.6%	0.5%
With Grades	Number Passing Tier 1	11	6.5	19	33	69.5
	Percent Passing Tier 1	1.0%	0.6%	1.1%	1.6%	1.2%
Need to Pass Math Only		Highest CAHSEE Math Score				
Basis	Statistic[1]	< 320	320-329	330-339	340-349	All
	Number of Students	159	174	346	6410	7,089
CST/CMA Only	Number Passing Tier 1	0	2	2	31	35
	Percent Passing Tier 1	0.0%	1.1%	0.6%	0.5%	0.5%
With Grades	Number Passing Tier 1	0	2	4.5	62.5	69
	Percent Passing Tier 1	0.0%	1.1%	1.3%	1.0%	1.0%
Need to Pass Both		Lower of the Highest CAHSEE ELA and Math Scores				
Basis	Statistic[1]	< 320	320-329	330-339	340-349	All
	Number of Students	16,075	4,494	2,634	1,074	24,277
CST/CMA Only	Number Passing Tier 1	14	0	0	0	14
	Percent Passing Tier 1	0.1%	0.0%	0.0%	0.0%	0.1%
With Grades	Number Passing Tier 1	20	1.5	2	0	23.5
	Percent Passing Tier 1	0.1%	0.0%	0.1%	0.0%	0.1%
Summary: All Tier One Students		Lower of the Highest CAHSEE ELA and Math Scores				
Basis	Statistic[1]	< 320	320-329	330-339	340-349	All
	Number of Students	17,366	5,736	4,674	9,507	37,283
CST/CMA Only	Number Passing Tier 1	21	6	9	44	80
	Percent Passing Tier 1	0.1%	0.1%	0.2%	0.5%	0.2%
With Grades	Number Passing Tier 1	31	10	25.5	95.5	162
	Percent Passing Tier 1	0.2%	0.2%	0.5%	1.0%	0.4%

[1] Number passing figures are estimates rather than counts and thus not always whole numbers.

As shown in Table 5.4, roughly two-thirds (24,277 of 37,283) of students eligible for screening need to pass both parts of the CAHSEE. Approximately 5,900 students in these two years needed only to pass the ELA portion and about 7,000 needed to pass only the mathematics portion. Two-thirds of these students needing to pass both parts (16,075 of 24,277) did not earn a CAHSEE score of 320 or better on at least one of the

two parts. Because of the large numbers of students needing to pass both parts, the overall passing rate using CSTs alone, 0.2 percent, is only half that of the estimated rate when each part is examined separately. The bottom line is that only 162 students in our two cohorts, or fewer than 100 per year, are estimated to pass the CAHSEE even when grades are taken into account. If grades are not considered, the number of students estimated to meet the CAHSEE through the Tier One screen is only 40 per year.

One final note is that the percentage of students who might pass a Tier One screen was higher for students who were closer to having passed the CAHSEE. Only 0.2 percent of students with CAHSEE scores under 330 (20 points below the passing level) were estimated to pass the Tier One screen, while approximately 1.0 percent of students with scores of 340 or better (within 10 points of passing) were estimated to pass the Tier One screen when high school grades were included.

Tier Two

HumRRO developed and administered an online feedback opportunity in April–May 2010 to collect the opinions of special education experts about the feasibility of the proposed alternative means and how the level of academic achievement demonstrated by those alternative means compares to the level of academic achievement in the content standards required for passage of the CAHSEE.

The AB 2040 Panel recommended that students who did not satisfy the CAHSEE PVP Tier One screen move to Tier Two, where student performance would be validated through work samples and the collection of other evidence. The Panel described the CAHSEE PVP Tier Two processes aligned with the components of the AB 2040 statute requirements and drafted a Tier Two portion of the CAHSEE PVP Checklist, shown in Figure 5.5. The checklist includes four types of evidence that could be used to validate academic performance. For example, evidence that a student has IEP goals that are based on the CAHSEE mathematics blueprint could help a student earn points toward passing the CAHSEE requirement through alternative means.

TIER TWO – Work Samples *Student may earn a maximum of XX points. Student's score will be an average of the score from Tier One and the score from Tier Two. The average score must be in the range of "adequate evidence" to pass.*		
☐	Participation in CAHSEE intervention/remediation. List/describe and include dates (to/from). Provide evidence such as end of year exams, unit tests, and classroom tests.	
	English-language arts	Mathematics
☐	Certification/letter of support (from teacher, employer) addressing student's achievement of specific grade-level standards	Letter of support should include CMA, CST, community college test scores
☐	IEP standards-based goals	Provide evidence that students with IEPs have standards-based goals, based on the CAHSEE blueprints in ELA and/or Math
☐	Work samples demonstrating the same level of achievement as required for passage of the CAHSEE (evaluated by CAHSEE Panel) (e.g., projects, demonstrations, video, that meet specific parameters)	Work samples that have been previously completed by the student in ELA and/or Math Work samples are scored by a rubric (The state of Virginia uses a good rubric model). Score will be determined by a panel review. A test development contractor will determine score values.

Figure 5.5. AB 2040 Panel-recommended Tier Two Checklist, used in the online feedback opportunity.

The online feedback opportunity presented respondents with information about each component of the proposed CAHSEE PVP (Eligible Students, Specific Options, Scoring, Uniformity, Level of Administration), then asked forced-choice and open-ended questions targeted to those components. In some cases the Panel's descriptions of a component (e.g., Scoring) were quite specific, such as giving school districts rather than schools responsibility for scoring the work samples. In other cases the descriptions of a component (e.g., Evidence) were quite general, such as indicating that a test development contractor would develop the criteria for the number of work samples and the types of acceptable evidence. So as to provide a possible frame of reference for considering aspects of collecting and scoring Tier Two work samples, HumRRO developed and presented within the online feedback opportunity supplemental information about possible alternatives for work samples, scoring rubrics, and passing scores.

Recruitment of Participants

To locate and recruit California educators of students most likely to be "PVP eligible," HumRRO used Class of 2008 CAHSEE data to identify 33 districts with the highest numbers of special education students who continued to attempt the CAHSEE in their senior year. Within each of the identified districts, HumRRO further identified from 1–19 schools with at least 25 special education students who continued to attempt the CAHSEE in their senior year. HumRRO contacted the CAHSEE district coordinators at these districts and asked them for nominations to represent their district in the online feedback opportunity. For each district, HumRRO requested at least one district staff nominee knowledgeable about special education programs and one special education teacher nominee from each identified school. District coordinators provided HumRRO with names and contact information for 193 nominees, 52 at the district level and 141 at the school level. Three of the targeted districts did not submit nominees.

Focus Groups

HumRRO convened two Web-based focus groups to test the materials and questions to be used in the online feedback opportunity. Participants for the focus groups were recruited for HumRRO by Special Education Local Program Area (SELPA) Directors and included special education teachers and district level special education coordinators and program specialists. HumRRO sent two read-ahead documents in advance of the focus group sessions to familiarize participants with the proposed CAHSEE PVP:

- An overview of the proposed CAHSEE PVP (similar to Appendix A of this report)
- A graphic flow chart of the proposed CAHSEE PVP (Figure 5.1 of this report)

Focus group participants offered a number of suggestions for clarifying information about the proposed CAHSEE PVP and improving the wording of questions and answer choices, but overall had a positive response to the approach for this aspect of the study. HumRRO revised the online feedback questionnaire and presentation materials in response to suggested changes from the focus group participants, and later invited them to participate further in the online feedback opportunity.

Instrument

HumRRO designed the Web-based program for this study to provide participants with context about the proposed alternative means before posing the feedback questions for each component (e.g., Evidence). Figure 5.6 is a screen shot of the first page of the Evidence section of the online feedback opportunity.

As a respondent began each PVP topic, he or she was prompted to open and read a presentation of material related to the topic before answering the topic's questions. Some presentations included HumRRO's descriptions of possible options and considerations for that topic that were created to glean the educator's opinions of the methods and processes involved with the Panel's recommendations.

The entire set of presentations used in the online feedback opportunity is found in Appendix B.

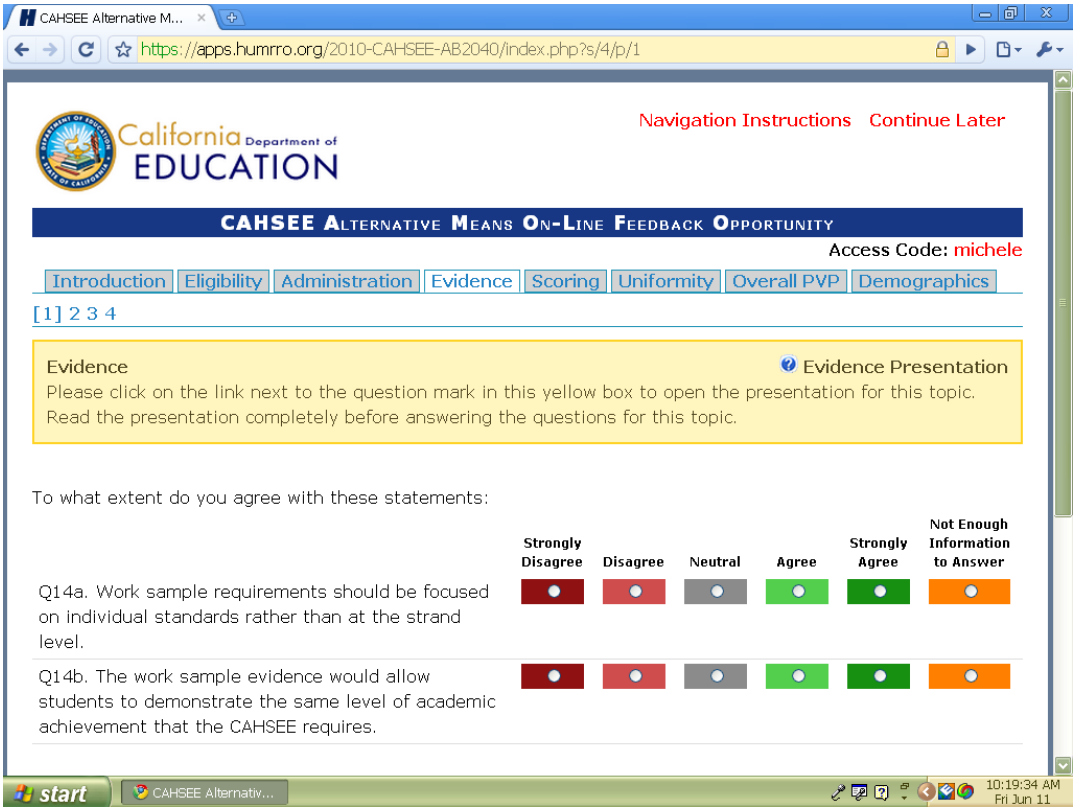


Figure 5.6. Screen shot of online feedback opportunity.

Administration

HumRRO e-mailed to nominees for the online feedback opportunity the link to the Web site along with the same two read-ahead documents that we provided to the focus group participants (overview of AB 2040 recommendations and proposed CAHSEE PVP Flow Chart). We made the site available online to facilitate feedback by participants at a time and location convenient to them, leaving it open for approximately two weeks. Given the need to understand both the recommendations and the other material associated with the AB 2040 Panel's recommendations, completing the 37-item questionnaire required participants to spend a considerable amount of time (approximately 1 hour). The following four types of questions were included.

- "To what extent do you agree with this statement"
- Multiple choice
- Fill in the blank
- Open-ended with a prompt that began, "Do you have any other comments regarding ___."

Summary of Respondent Feedback

Readers interested in a comprehensive list of the responses, organized by respondent group, are referred to appendices D and E. Note that the parentheses after table titles refer the reader to the appropriate sections of the appendix, with the designation Q1, for example, referring to Question 1.

Respondent sample and demographics. Our sample included 113 people, 79 of whom responded in regard to a specific school; the other 34 answered with regard to a specific district. Nominees from all but two of the districts that provided HumRRO with nominee information participated as respondents either at the school or district level. Table 5.5 provides the response rate based on the number of nominated participants and the number of submitted responses. Appendix F lists the school districts and offices of education represented by participants in the focus groups and the online feedback opportunity.

Table 5.5. Response Rate

	Number of Respondents		
	School	District	All
Nominated	141	52	193
Submitted response	79	34	113
Answered at least one open-ended question	54	27	81
Did not access Web-based system	47	14	61
Started but did not complete response	*20*	*6*	*26*
Response Rate	56%	65%	59%

Table 5.6 shows that respondents had varying levels of experience. The majority of respondents in our sample (83.8 percent of school-based educators; 65.6 percent of district-based educators) had "more than four years' experience" in their position.

Table 5.6. Years of Experience in Position (Q35)

Q35. Years Experience in Position	School	District	All
Less than 2 years	5.4%	18.8%	9.4%
2–4 years	10.8%	15.6%	12.3%
More than 4 years	83.8%	65.6%	78.3%
Total[1]	100%	100%	100%
N	74	32	106
Skipped question	5	2	7

1 Totals may not add to 100 percent due to rounding.

Table 5.7 shows the gender breakdown of respondents. As can be seen, over three quarters of both school-based (77.0 percent) and district-based educators (78.1 percent) were female.

Table 5.7. Gender (Q36)

Q36. Gender	School	District	All
Male	23.0%	21.9%	22.6%
Female	77.0%	78.1%	77.4%
Total	100%	100%	100%
N	74	32	106
Skipped question	5	2	7

As seen in Table 5.8, the majority of all respondents (69.9 percent of school-based educators; 74.2 percent of district-based educators) were Caucasian. Of the school-based educator sample, 13.7 percent were Hispanic and 8.2 percent African-American; in the district-based educator sample, 9.7 percent were Hispanic and none were African-American. Native American, Asian/Pacific Islander, and "Other" subgroups accounted for 10.5 percent of all participants. The proportion of educators by ethnicity in our sample is similar to the most recent CDE reports of the proportion of teachers by ethnicity across the state[10].

Table 5.8. Ethnicity (Q37)

Q37. Ethnicity	School	District	All	2004-05 CBEDS Data
Caucasian	69.9%	74.2%	71.2%	72.1%
African American	8.2%	0.0%	5.8%	4.5%
Hispanic	13.7%	9.7%	12.5%	14.5%
Native American	0.0%	6.5%	1.9%	0.6%
Asian/Pacific Islander	4.1%	6.5%	4.8%	4.8%
Other	4.1%	3.2%	3.8%	2.3%
Total[1]	100%	100%	100%	100%
N	73	31	104	306,548
Skipped question	6	3	9	

1 Totals may not add to 100 percent due to rounding.

Respondents' familiarity with CAHSEE standards. Respondents were asked about their familiarity with California's ELA and mathematics content standards; Table 5.9 depicts the responses. For mathematics, about half of all respondents (52.4 percent) indicated they strongly agreed that they were familiar with the CAHSEE standards, while another one-third of all respondents (30.5 percent) indicated they "agree" with the statement. For ELA, slightly less than half of all respondents (46.2 percent) indicated they strongly agreed with the statement that they were familiar with the CAHSEE content standards, while 35.8 percent indicated they agreed with the statement. A small percentage of all respondents indicated that they either disagreed or strongly disagreed with the statement (mathematics: 6.7 percent, ELA: 8.5 percent). The rest of the sample indicated that they were neutral (mathematics: 9.5 percent, ELA:

[10] Educational Demographics Office, California Department of Education. (n.d.). California Basic Educational Data System (CBEDS). In *Number of Teachers by Ethnicity 1981 to 2004*. Retrieved August 10, 2010, from http://www.cde.ca.gov/ds/sd/dr/ethteach/asp. [Note: the preceding Web address is no longer valid.]

8.5 percent). There was no major difference between school and district level responses.

Table 5.9. Extent of Agreement with Statements About Respondent's Familiarity With the Mathematics CAHSEE and ELA CAHSEE Content Standards (Q33)

Q33. To what degree do you agree with this statement: I am familiar with the CAHSEE content standards:	Mathematics			ELA		
	Sch.	Dist.	All	Sch.	Dist.	All
A. Strongly Agree	55.4%	45.2%	52.4%	51.4%	34.4%	46.2%
B. Agree	29.7%	32.3%	30.5%	32.4%	43.8%	35.8%
C. Neutral	8.1%	12.9%	9.5%	6.8%	12.5%	8.5%
D. Disagree	5.4%	3.2%	4.8%	8.1%	3.1%	6.6%
E. Strongly Disagree	1.4%	3.2%	1.9%	1.4%	3.1%	1.9%
F. Not Enough Information to Answer	0.0%	3.2%	1.0%	0.0%	3.1%	0.9%
Total[1]	100%	100%	100%	100%	100%	100%
N	74	31	105	74	32	106
Skipped question	5	3	8	5	2	7

1 Totals may not add to 100 percent due to rounding.

Eligibility

To help the respondents begin to conceptualize the students the questionnaire would be asking about, we asked them to estimate the number of students they thought might be eligible for the proposed CAHSEE PVP (Q3) out of the total number of senior year students in their school or district (Q2), and we calculated the percentages corresponding to their replies. While 22 percent of all respondents indicated that the percentage of students eligible would be less than 4 percent, 15 percent of all respondents indicated that the percentage of students eligible would be over 25 percent. The most commonly estimated range was 4–8 percent. It is important to remember when interpreting these results that the respondents in the sample were included because they have a high rate of students with disabilities, and, as a result, rates of eligibility of a larger sample would likely be lower (see Tier One eligibility for HumRRO's more precise estimates of numbers of students eligible).

We asked the school and district faculty about the feasibility of identifying students eligible for the proposed CAHSEE PVP by the start of the second semester of their senior year. Results, as seen in Table 5.10, show that over 75 percent of all respondents agreed that it was feasible to identify students eligible for PVP by the start of the second semester of their senior year (Q4) and less than one-fifth (18.8 percent) disagreed or strongly disagreed with the notion.

Table 5.10. Extent of Agreement with Statement About Feasibility of Identifying Students Eligible for PVP by the Start of the Second Semester of Their Senior Year (Q4)

Q4. To what extent do you agree with this statement: It would be feasible to identify students eligible for PVP by the start of the second semester of their senior year?	School	District	All
A. Strongly Agree	39.7%	35.3%	38.4%
B. Agree	35.9%	44.1%	38.4%
C. Neutral	3.8%	0.0%	2.7%
D. Disagree	15.4%	14.7%	15.2%
E. Strongly Disagree	3.8%	2.9%	3.6%
F. Not Enough Information to Answer	1.3%	2.9%	1.8%
Total[1]	100%	100%	100%
N	78	34	112
Skipped question	1	0	1

1 Totals may not add to 100 percent due to rounding.

Characteristics of students who may be eligible for PVP. The questionnaire asked about the grades, time spent in regular education, attendance, and English Language Learner (ELL) classification of the students expected to be eligible for the proposed CAHSEE PVP. There was little difference between respondents at the school and district level, and therefore responses are reported here in terms of all respondents. The following four points summarize the data gleaned from the questionnaire regarding characteristics of students who may be eligible for CAHSEE PVP (see Appendix D for a breakdown of school- and district-based responses and tables associated with these data).

- Respondents described students they expected to be eligible for PVP as having lower grades in mathematics and ELA classes than the typical student, but not all of these students were reported as failing or close to failing mathematics and ELA classes (Q5). The PVP-eligible students are best described as average students (earning mostly C grades) in regard to their coursework.

- Respondents expected a large proportion of PVP-eligible students to spend much of their day (more than half their time) outside of regular education classes (Q6).

- While not a problem for most, respondents reported that poor attendance can be a problem for many of the students expected to be eligible for PVP (Q7).

- In line with the diversity of the state, respondents provided a very wide range of estimates of the percentage of students expected to be eligible for PVP who would be classified as English Language Learners (Q8), with the most frequent estimate being 30 percent. (See Table 5.1 for HumRRO's more precise estimate of what percentage of students expected to be eligible for PVP who would be classified as ELL.)

Administration

The questionnaire asked the school and district faculty about the ease of their respective administrative roles collecting and reviewing the proposed CAHSEE PVP evidence. Results, as shown in Table 5.11, show that about one-half of school-level respondents agreed (44 percent) or strongly agreed (5.3 percent) that "School responsibilities for collecting and reviewing PVP evidence could be implemented fairly easily." About one-third of the respondents disagreed (24 percent) or strongly disagreed (9.3 percent) with the statement and 17 percent were neutral.

The questionnaire results, also shown in Table 5.11, indicate that about 49 percent disagreed or strongly disagreed that "District responsibilities for collecting and reviewing PVP evidence could be implemented "fairly easily." About 39 percent of district-level respondents agreed or strongly agreed with the statement and 12 percent either were neutral or did not have enough information to answer the question.

Table 5.11. Extent of Agreement with Statements About Ease of Implementing School and District Responsibilities for PVP (Q10a, Q10b)

Q10. To what extent do you agree with these statements:	a. School responsibilities for collecting and reviewing PVP evidence could be implemented fairly easily.			b. District responsibilities for scoring PVP evidence could be implemented fairly easily.		
	School	District	All	School	District	All
A. Strongly Agree	5.3%	6.1%	5.6%	5.5%	6.1%	5.7%
B. Agree	44.0%	36.4%	41.7%	28.8%	33.3%	30.2%
C. Neutral	17.3%	3.0%	13.0%	23.3%	9.1%	18.9%
D. Disagree	24.0%	39.4%	28.7%	30.1%	36.4%	32.1%
E. Strongly Disagree	9.3%	12.1%	10.2%	8.2%	12.1%	9.4%
F. Not Enough Information to Answer	0.0%	3.0%	0.9%	4.1%	3.0%	3.8%
Total[1]	100%	100%	100%	100%	100%	100%
N	75	33	108	73	33	106
Skipped question	4	1	5	6	1	7

1 Totals may not add to 100 percent due to rounding.

School- and district-level respondents were asked to estimate the number of hours of professional development per year each faculty member would need for PVP training. Many of the respondents, as can be seen in Table 5.12, estimated that the training would take six hours (44.9 percent).

Table 5.12. Estimated Number of Hours of Professional Development per Year per School Faculty Member Needed for PVP Training (Q11)

Q.11 Training time	Q11. About how many hours of professional development per year per school faculty member would be needed for PVP training?		
	School	District	All
A. 2 hours	6.8%	15.2%	9.3%
B. 4 hours	25.7%	21.2%	24.3%
C. 6 hours	50.0%	33.3%	44.9%
D. More than 6 hours	17.6%	30.3%	21.5%
Total[1]	100%	100%	100%
N	75	33	108
Skipped question	4	1	5

1 Totals may not add to 100 percent due to rounding.

The survey asked school- and district-level respondents to estimate the number of professional development hours per year per **district** faculty member needed for PVP training. The range of estimates is shown in Table 5.13. The most common response at the district level was an estimate that the training would take eight hours (37.0 percent).

Table 5.13. Estimated Number of Hours of Professional Development per Year per District Faculty Member Needed for PVP Training (Q12)

Q12. Training time	Q12. About how many hours of professional development per year per district faculty member would be needed for PVP training?		
	School	District	All
A. 4 hours	26.0%	27.3%	26.4%
B. 6 hours	19.2%	27.3%	21.7%
C. 8 hours	37.0%	30.3%	34.9%
D. More than 8 hours	17.8%	15.2%	17.0%
Total[1]	100%	100%	100%
N	73	33	106
Skipped question	6	1	7

1 Totals may not add to 100 percent due to rounding.

Evidence

One aspect of the AB 2040 recommendation that was not fully developed or defined was the nature of work samples and other types of evidence that would be used to validate student performance in Tier Two. The AB 2040 recommendation indicated that a test development contractor would determine specific requirements for work sample submissions, such as the number and type of pieces of acceptable evidence and the minimum number of strands or standards that must be addressed. The questionnaire asked questions to probe the feasibility of Tier Two evidence collection

and to investigate the possible comparability of the proposed work sample evidence to the level of academic achievement required for passage of the CAHSEE.

Respondents were asked whether the work sample evidence should be focused on individual content standards rather than at the strand level. Table 5.14 shows that more than half the respondents (59.4 percent) agreed or strongly agreed that work samples should be focused on individual standards rather than at the strand level; however, 28.3 percent of respondents disagreed or strongly disagreed. More of the district respondents (39.4 percent) than of the school respondents (23.3 percent) disagreed or strongly disagreed.

About two-thirds of the respondents (65.5 percent) agreed or strongly agreed that work samples would allow students to demonstrate the same level of academic achievement that the CAHSEE requires. About one-fifth (19.7 percent) of respondents disagreed or strongly disagreed. More of the school respondents (24.4 percent) than of the district respondents (9.1 percent) disagreed or strongly disagreed.

To achieve comparability to the CAHSEE, work samples would need to be targeted at the level of individual standards. Though targeting work samples at the level of strands instead of individual standards would require fewer work samples to be reviewed and was preferred by some respondents, it would also reduce comparability between the alternative means and the CAHSEE.

Table 5.14. Extent of Agreement with Statements About Work Samples (Q14a, b)

Q14. To what extent do you agree with these statements:	a. Work sample requirements should be focused on individual standards rather than at the strand level.			b. The work sample evidence would allow students to demonstrate the same level of academic achievement that the CAHSEE requires.		
	% of Respondents			% of Respondents		
	School	District	All	School	District	All
A. Strongly Agree	23.3%	6.1%	17.9%	14.9%	15.2%	15.0%
B. Agree	41.1%	42.4%	41.5%	50.0%	51.5%	50.5%
C. Neutral	9.6%	3.0%	7.5%	10.8%	18.0%	13.1%
D. Disagree	21.9%	30.3%	24.5%	20.3%	3.0%	15.0%
E. Strongly Disagree	1.4%	9.1%	3.8%	4.1%	6.1%	4.7%
F. Not Enough Information to Answer	2.7%	9.1%	4.7%	0.0%	6.1%	1.9%
Total[1]	100%	100%	100%	100%	100%	100%
N	73	33	106	74	33	107
Skipped question	6	1	7	5	1	6

1 Totals may not add to 100 percent due to rounding.

Table 5.15 shows the extent of respondents' agreement with statements about the three types of supporting evidence included in the Tier Two worksheet: evidence from CAHSEE intervention/remediation courses; evidence from a letter of support; and evidence of IEPs with standards-based goals, based on the CAHSEE blueprints.

Respondents were asked if each type of supporting evidence is important to include along with work samples to enable students to demonstrate the same level of academic achievement that the CAHSEE requires.

Table 5.15. Extent of Agreement With Statement Regarding Importance of Each Type of PVP Supporting Evidence (Q15a, b, c)

Q15. This type of supporting evidence is an important requirement to include along with the work samples to enable students to demonstrate the same level of academic achievement that the CAHSEE requires.	a. Evidence from CAHSEE intervention/remediation course			b. Evidence from letter of support			c. Evidence from IEPs with standards-based goals, based on the CAHSEE blueprints		
	Sch.	Dist.	All	Sch.	Dist.	All	Sch.	Dist.	All
A. Strongly Agree	37.8%	39.4%	38.3%	16.2%	15.2%	15.9%	23.0%	33.3%	26.2%
B. Agree	48.6%	51.5%	49.5%	47.3%	45.5%	46.7%	45.9%	51.5%	47.7%
C. Neutral	5.4%	9.1%	6.5%	18.9%	18.2%	18.7%	17.6%	9.1%	15%
D. Disagree	6.8%	0.0%	4.7%	14.9%	12.1%	14.0%	10.8%	6.1%	9.3%
E. Strongly Disagree	1.4%	0.0%	0.9%	2.7%	3%	2.8%	1.4%	0.0%	0.9%
F. Not Enough Information to Answer	0.0%	0.0%	0%	0%	6.1%	1.9%	1.4%	0.0%	0.9%
Total[1]	100%	100%	100%	100%	100%	100%	100%	100%	100%
N	74	33	107	74	33	107	74	33	107
Skipped question	5	1	6	5	1	6	5	1	6

1 Totals may not add to 100 percent due to rounding.

CAHSEE intervention/remediation course. Most of the respondents (87.8 percent) agreed or strongly agreed that evidence from CAHSEE intervention/remediation courses is important. About the same proportion of school respondents (37.8 percent) and of district respondents (39.4 percent) strongly agreed. A small portion of respondents (5.6 percent) disagreed or strongly disagreed.

Letter of support. Almost two-thirds of the respondents (62.6 percent) agreed or strongly agreed that it would be important to include a letter of support along with work samples. About the same proportion of school respondents (16.2 percent) and of district respondents (15.2 percent) strongly agreed. Very similar percentages of respondents disagreed or strongly disagreed (16.8 percent). About the same proportion of school respondents (17.6 percent) and district respondents (15.1 percent) disagreed or strongly disagreed. For this item, about 19 percent of all respondents were neutral.

IEPs with standards-based goals based on the CAHSEE blueprints. Almost three-fourths of the respondents (73.9 percent) agreed or strongly agreed that evidence from IEPs with standards-based goals would be important to include along with work samples. More of the district respondents (33.3 percent) than of school respondents (23.0 percent) strongly agreed. Some respondents disagreed or strongly disagreed (10.2 percent); however, none (0 percent) of the district respondents strongly disagreed. About 15 percent of all respondents were neutral.

In the Evidence presentation, to quantify the possible volume of work samples needed to cover all CAHSEE standards for each subject area, HumRRO proposed a "streamlined" option for work samples that would include 50–75 percent as many work samples as CAHSEE multiple-choice items (58 for mathematics, 37 for ELA), and a "full" option that would include the same number of work samples as CAHSEE multiple-choice items (80 for mathematics, 72 for ELA). These options were created by HumRRO to provide some basis for respondents' estimates and were not developed or approved by the AB 2040 Panel. HumRRO asked respondents what quantity of work samples should be required for each subject area and presented them with two forced-choice options (full or streamlined) and an "other (please specify)" option.

Table 5.16 shows the proportion of respondents who selected the streamlined vs. full option quantity of work samples. More than three-fourths of the respondents (77.1 percent) chose streamlined and only 6.7 percent of respondents chose full. Of respondents who chose the "other" option (16.2 percent), the median number of work samples suggested per subject area was 20.

Table 5.16. Suggested Quantity of Work Samples to Be Required by Subject Area (Q16)

Q16. About what quantity of work samples should be required for each subject area?	School	District	All
A. 50–75% as many as the number of CAHSEE items (streamlined option)	79.5%	71.9%	77.1%
B. Same as number of CAHSEE items (full option)	5.5%	9.4%	6.7%
C. Other ___ (specify)	15.1%	18.8%	16.2%
Total[1]	100%	100%	100%
N	73	32	105
Skipped question	6	2	8

(Q16.) Number of work samples specified by those who responded "other"

	School	District	All
Average number of work samples	18.9	18.3	18.69
Median number of work samples	20.0	20.0	20.0
Standard Deviation	15.6	14.7	14.75
N	10	6.0	16

1 Totals may not add to 100 percent due to rounding.

Scoring

To provide a possible frame of reference for considering the task of scoring the Tier Two work samples for the content standards assessed by the CAHSEE, HumRRO presented two possible scoring rubrics in the Scoring presentation of the questionnaire. Both of these rubrics were presented with a zero- to four-point scale ranging from No Evidence to Ample Evidence. The first was a generic rubric like that used in Virginia to score work samples as an alternative means (see Table 5.17). The AB 2040 Panel recommended considering such a rubric.

Table 5.17. Generic Rubric Example

Score	Descriptor	Detailed Score Definition
0	No Evidence	The evidence submitted *does not show any level of individual achievement* for the content standard(s).
1	Little Evidence	The evidence submitted provides a *minimally sufficient demonstration* of the student's knowledge and understanding of the standard(s). The evidence is incomplete and mostly inaccurate, exhibiting only a very basic level of understanding. Overall, the quality of the evidence presented is weak and does not satisfy most of the requirements of the content standard(s).
2	Some Evidence	The evidence submitted provides *only a partially sufficient demonstration* of the student's knowledge and understanding of the standard(s). The evidence may be incomplete or may exhibit major lapses in accuracy. Overall, the quality of the evidence presented does not satisfy many of the requirements of the content standard(s).
3	Adequate Evidence	The evidence submitted provides a *reasonably sufficient demonstration* of the student's knowledge and understanding of the standard(s). Most of the student's work is accurate and correct, but the performance is not consistent and may be incomplete. Overall, the quality of the evidence presented is appropriate and satisfies many of the requirements of the content standard(s).
4	Ample Evidence	The evidence submitted provides a *fully sufficient demonstration* of the student's knowledge and understanding of the standard(s). Minor lapses in accuracy and completeness may occur, but overall the quality of the evidence presented consistently and appropriately satisfies most of the requirements of the content standard(s).

The second was an example of a standard-specific rubric with specific benchmarks. Table 5.18 displays this rubric, which was based on the Hawaii program.[11]

Respondents were first asked to consider use of the model scoring rubric recommended by the AB 2040 Panel along with appropriate scorer training. As shown in Table 5.19, about three-fourths of the respondents (75.4 percent) agreed or strongly agreed that this model rubric could provide for consistent evaluation of any type of student evidence. About the same proportion of school respondents (21.9 percent) and of district respondents (25 percent) strongly agreed; however, some respondents disagreed or strongly disagreed (11.4 percent). More of the school respondents (15.1 percent) than of the district respondents (3.1 percent) disagreed or strongly disagreed.

[11] Although the term used in the questionnaire was "analytic scoring rubric," we use the term "standard-specific rubric" in this report because it is more descriptive of the type of rubric displayed in the questionnaire.

Table 5.18. Standard-Specific Rubric Example

SUBJECT **Strand** Standard	**Standard Text**	**Task or Prompt**	**Ample Evidence** OR X points	**Adequate Evidence** OR X points	**Some Evidence** OR X points	**Little Evidence** OR X points	**No Evidence** OR X points	**Type of Evidence**
MATHEMATICS **Number Sense (NS)** 7NS1.1	Read, write, and compare rational numbers in scientific notation (positive and negative powers of 10) with approximate numbers using scientific notation.	Write the radius of the earth's orbit, 150,000,000,000 meters, in scientific notation.	Writes 1.5×10^{11}	Writes 1.5×10^{9} Or 1.5×10^{12}	Writes 15×10^{10} Or 150×10^{9}	Writes 1.5×10^{-11} Or 150×10^{-9}	Does not write any value with exponents	
ELA **Reading Compre-hension (RC)** 10RC2.4	Synthesize the content from several sources or works by a single author dealing with a single issue; paraphrase the ideas and connect them to other sources and related topics to demonstrate comprehension	Write an accurate summary of the passage in your own words	Correctly describes the focus of the passage	Copies text from the focal parts of the passage	Describes information supported by but not central to the passage	Copies text from random part of the passage	Writes text unrelated to passage	

About three-fourths of the respondents (73.6 percent) agreed or strongly agreed that this model rubric could provide for consistent evaluation of evidence for any standard. About the same proportion of school respondents (20.3 percent) and of district respondents (25 percent) strongly agreed; however, some respondents disagreed or strongly disagreed (11.3 percent). More of the school respondents (13.5 percent) than of the district respondents (6.2 percent) disagreed or strongly disagreed.

Table 5.19. Extent of Agreement with Statements About Using the AB 2040 Panel's Recommended Model Scoring Rubric (0–No Evidence to 4–Ample Evidence) (Q20)

Q20. To what extent do you agree with these statements: With appropriate training, the scorers could use the AB 2040 Panel's recommended model scoring rubric (0–No Evidence to 4–Ample Evidence)	a. … to provide for consistent evaluation of any type of student evidence (e.g., letter of support, work sample).			b. … to provide for consistent evaluation of evidence for any standard.		
	Sch.	Dist.	All	Sch.	Dist.	All
A. Strongly Agree	21.9%	25%	22.9%	20.3%	25.0%	21.7%
B. Agree	49.3%	59.4%	52.5%	51.4%	53.1%	51.9%
C. Neutral	13.7%	3.1%	10.5%	13.5%	3.1%	10.4%
D. Disagree	13.7%	0.0%	9.5%	10.8%	3.1%	8.5%
E. Strongly Disagree	1.4%	3.1%	1.9%	2.7%	3.1%	2.8%
F. Not Enough Information to Answer	0.0%	9.4%	2.9%	1.4%	12.5%	4.7%
Total[1]	100%	100%	100%	100%	100%	100%
N	73	32	105	74	32	106
Skipped question	6	2	8	5	2	7

1 Totals may not add to 100 percent due to rounding.

Next, respondents were asked to consider use of a rubric targeted at the standard level, a standard-specific rubric with specific benchmarks. HumRRO presented examples of work-sample prompts for mathematics and ELA standards assessed in CAHSEE and for each prompt illustrated the types of responses that would earn No Evidence, Little Evidence, and so forth for all points on the rubric. Table 5.20 shows that about three-fourths of the respondents (75.2 percent) agreed or strongly agreed that a standard-specific rubric with specific benchmarks would be needed for consistent evaluation of student evidence. About the same proportion of school respondents (30.1 percent) and of district respondents (34.4 percent) strongly agreed; however, some respondents disagreed or strongly disagreed (9.5 percent). About the same proportion of school respondents (9.6 percent) and district respondents (9.4 percent) disagreed or strongly disagreed.

Table 5.20. Extent of Agreement with Statement About Standard-Specific Rubric With Specific Benchmarks (Q23)

Q23. To what extent do you agree with this statement: Analytic scoring rubrics at the level of individual standards are needed for consistent evaluation of student evidence?	School	District	All
A. Strongly Agree	30.1%	34.4%	31.4%
B. Agree	42.5%	46.9%	43.8%
C. Neutral	15.1%	6.3%	12.4%
D. Disagree	8.2%	6.3%	7.6%
E. Strongly Disagree	1.4%	3.1%	1.9%
F. Not Enough Information to Answer	2.7%	3.1%	2.9%
Total[1]	100%	100%	100%
N	73	32	105
Skipped question	6	2	8

1 Totals may not add to 100 percent due to rounding.

About the same proportion of respondents agreed that the model rubric could provide for consistent evaluation of student evidence as agreed that the standard-specific rubric with specific benchmarks could provide for consistent evaluation.

The AB 2040 Panel recommended that scoring of evidence be done at the district level rather than at the school level. Some focus-group participants raised a concern as to whether teachers should be on scoring panels or not, and HumRRO asked this directly in the questionnaire. As shown in Table 5.21, most of the respondents (84.9 percent) agreed or strongly agreed that teachers should participate in the district PVP scoring panels. More of the school respondents (60.8 percent) than of the district respondents (43.8 percent) strongly agreed. Some respondents disagreed or strongly disagreed (9.4 percent).

Table 5.21. Degree of Agreement With the Statement: Teachers Should Participate on the District PVP Scoring Panels (Q25)

Q25. To what extent do you agree with this statement: Teachers should participate on the district PVP scoring panels?	School	District	All
A. Strongly Agree	60.8%	43.8%	55.7%
B. Agree	27.0%	34.4%	29.2%
C. Neutral	4.1%	6.3%	4.7%
D. Disagree	5.4%	12.5%	7.5%
E. Strongly Disagree	2.7%	0.0%	1.9%
F. Not Enough Information to Answer	0.0%	3.1%	0.9%
Total[1]	100%	100%	100%
N	74	32	106
Skipped question	5	2	7

1 Totals may not add to 100 percent due to rounding.

To help respondents quantify estimates of PVP Tier Two passing rates, and to relate passing PVP to the achievement level required on the CAHSEE, respondents were asked to assume that to pass:

- For mathematics, 55 percent of a student's PVP work samples ("streamlined option") needed to be scored "Adequate Evidence."

- For ELA, 60 percent of a student's PVP work samples ("streamlined option") needed to be scored "Adequate Evidence."

Respondents were asked to think about all the students who would enter the proposed CAHSEE PVP, and then to estimate what percentage of students (in 10 percent increments) would likely demonstrate adequate achievement in mathematics or ELA skills to pass Tier Two. Table 5.22 and Table 5.23 present results for this question for mathematics and ELA, respectively. The tables display the cumulative percentages of respondents' estimates of passing rates. For example, Table 5.22 shows that less than a tenth of all respondents (9.5 percent) estimated 30 percent or less of students eligible for PVP would pass the streamlined Tier Two mathematics section. Table 5.23 shows that a similar percentage of all respondents (13.4 percent) estimated that 30 percent or less of students eligible for PVP would pass the streamlined Tier Two ELA section.

When asked what percentage of students would be likely to pass the full option of Tier Two (larger quantity of work samples than streamlined option), more respondents estimated somewhat lower passing rates. For example, Table 5.22 shows that about one-fourth of all respondents (24 percent) estimated that 30 percent or less of students eligible for PVP would pass the full Tier Two mathematics section. Table 5.23 shows that a similar percentage of all respondents (23.8 percent) estimated that 30 percent or less of students eligible for PVP would pass the full Tier Two ELA section.

Another way to look at respondents' estimates of Tier Two passing rates is by median response. For mathematics, the median response for all respondents for the percentage of students who would pass the Tier Two streamlined version was 70 percent. For ELA, the median response for all respondents for the streamlined option was 60 percent. For both mathematics and ELA, the median response for all respondents for the percentage of students who would pass the Tier Two full version was slightly lower, at 50 percent.

While these estimated passing rates seem very high and may point to a lack of respondent understanding of how the students' work sample evidence would need to align with comparable performance needed to pass the CAHSEE, they may also indicate that respondents believe students with disabilities who have not been successful in passing the CAHSEE have the skills assessed on the CAHSEE and could demonstrate them through an alternative means.

Table 5.22. Estimated Percentage of Students Likely to Demonstrate Adequate Achievement in CAHSEE Math Skills to Pass Tier Two (Q26)

Q26. On the multiple-choice CAHSEE math, a passing score requires about 55% accuracy on the items. Assume that about 55% of a student's PVP math work samples need to be scored "Adequate Evidence" for the student to achieve an overall "Pass" for the Tier Two math. Think about all the students who would enter PVP. About what percentage of those students would likely demonstrate adequate achievement in CAHSEE math skills to pass Tier Two?	a. …streamlined option?			b. …full option?		
	Cumulative % School	Cumulative % District	Cumulative % All	Cumulative % School	Cumulative % District	Cumulative % All
A. 0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
B. 10%	2.7%	0.0%	1.9%	5.6%	6.3%	5.8%
C. 20%	4.1%	6.3%	4.8%	15.3%	15.6%	15.4%
D. 30%	9.6%	9.4%	9.5%	22.2%	28.1%	24.0%
E. 40%	16.4%	18.8%	17.1%	27.8%	37.5%	30.8%
F. 50%	28.8%	31.3%	29.5%	45.8%	40.6%	44.2%
G. 60%	37.0%	40.6%	38.1%	59.7%	56.3%	58.7%
H. 70%	56.2%	56.3%	56.2%	73.6%	59.4%	69.2%
I. 80%	72.6%	65.6%	70.5%	77.8%	65.6%	74.0%
J. 90%	84.9%	68.8%	80%	83.3%	71.9%	79.8%
K. 100%	86.3%	75.0%	82.9%	86.1%	75.0%	82.7%
L. I'm not in a position to answer.	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%
N	73	32	105	72	32	104
Skipped question	6	2	8	7	2	9

Table 5.23. Estimated Percentage of Students Likely to Demonstrate Adequate Achievement in CAHSEE ELA Skills to Pass Tier Two (Q27)

Q26. On the multiple-choice CAHSEE math, a passing score requires about 55% accuracy on the items. Assume that about 55% of a student's PVP math work samples need to be scored "Adequate Evidence" for the student to achieve an overall "Pass" for the Tier Two math. Think about all the students who would enter PVP. About what percentage of those students would likely demonstrate adequate achievement in CAHSEE math skills to pass Tier Two?	a. …streamlined option?			b. …full option?		
	Cumulative % School	Cumulative % District	Cumulative % All	Cumulative % School	Cumulative % District	Cumulative % All
A. 0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
B. 10%	1.4%	0.0%	1.0%	4.1%	6.3%	4.8%
C. 20%	6.9%	9.4%	7.7%	19.2%	9.4%	16.2%
D. 30%	13.7%	12.5%	13.4%	23.3%	25.0%	23.8%
E. 40%	20.5%	18.8%	20.1%	32.9%	34.4%	33.3%
F. 50%	28.7%	21.9%	26.8%	49.3%	43.8%	47.6%
G. 60%	46.5%	37.5%	43.9%	63.0%	56.3%	60.9%
H. 70%	58.8%	53.1%	57.2%	69.8%	59.4%	66.6%
I. 80%	78.0%	65.6%	74.3%	79.4%	65.7%	75.2%
J. 90%	83.5%	68.7%	79.1%	80.8%	72.0%	78.1%
K. 100%	84.9%	75.0%	82.0%	84.9%	75.1%	81.9%
L. I'm not in a position to answer.	100.0%	100.0%	100.1%	100.0%	100.1%	100.0%
N	73	32	105	73	32	105
Skipped question	6	2	8	6	2	8

Uniformity

Respondents were asked several questions to probe whether they agreed that the proposed CAHSEE PVP as described in the presentations could ensure uniformity. As shown in Table 5.24, about three-fourths of all respondents (74.5 percent) agreed or strongly agreed that the types and numbers of required work samples could be adequately defined to ensure uniformity across the state in the evidence collected. More of the school respondents (25.7 percent) than of the district respondents (18.8 percent) strongly agreed. Some respondents disagreed or strongly disagreed (17 percent). More of the school respondents (20.3 percent) than of the district respondents (9.4 percent) disagreed or strongly disagreed.

More than two-thirds of the respondents (69.8 percent) agreed or strongly agreed that procedures and training for scoring could be adequately defined to ensure uniformity across the state in the scoring of evidence. More of the district respondents (81.3 percent) than of the school respondents (64.9 percent) agreed or strongly agreed. However, 17 percent of respondents disagreed or strongly disagreed. More of the

school respondents (20.3 percent) than of the district respondents (9.4 percent) disagreed or strongly disagreed.

Table 5.24. Extent of Agreement with Statements About Ensuring Uniformity in Work Samples and Scoring (Q29)

Q29. To what extent do you agree with these statements:	A. The types and number of required work samples could be adequately defined to ensure uniformity across the state in the evidence collected.			B. Procedures and training for scoring could be adequately defined to ensure uniformity across the state in the scoring of evidence.		
	Sch.	Dist.	All	Sch.	Dist.	All
A. Strongly Agree	25.7%	18.8%	23.6%	25.7%	21.9%	24.5%
B. Agree	45.9%	62.5%	50.9%	39.2%	59.4%	45.3%
C. Neutral	8.1%	9.4%	8.5%	14.9%	9.4%	13.2%
D. Disagree	17.6%	3.1%	13.2%	16.2%	3.1%	12.3%
E. Strongly Disagree	2.7%	6.3%	3.8%	4.1%	6.3%	4.7%
F. Not Enough Information to Answer	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
Total[1]	100%	100%	100%	100%	100%	100%
N	74	32	106	74	32	106
Skipped question	5	2	7	5	2	7

1 Totals may not add to 100 percent due to rounding.

Time and Effort

Since we could not obtain cost information directly from our respondents, we instead asked a number of questions about the time that would be involved in implementing various steps of the Tier Two process.

Respondents were asked to apply the idea of the “streamlined” option to help quantify the time required for students to generate work samples, assuming no existing student work was available to use as Tier Two evidence. We asked respondents to assume that all student work would need to be generated to paint a picture of the worst-case scenario. Response options were in increments of 20 hours (e.g., 0–20 hours), with a write-in option for more than 60 hours. Table 5.25 presents the results to this question.

With respect to mathematics, more than half of all respondents (57.1 percent) chose a response that exceeded 30 hours; the median response was 31–40 hours. For ELA more than half of all respondents (62.8 percent) chose a response that exceeded 30 hours; the median response was 31–40 hours.

Table 5.25. Estimated Amount of Time Required for a Senior Student to Generate All Work Samples (Q17)

Q17. Assume there was no existing student work to select from for use as Tier Two evidence. About what amount of time would be required for a senior student to generate the work samples?	…for math, streamlined option?			…for ELA, streamlined option?		
No. of Hours	Sch.	Dist.	All	Sch.	Dist.	All
A. 0–20 hours	16.2%	16.1%	16.2%	14.9%	12.9%	14.3%
B. 21–30 hours	24.3%	32.3%	26.7%	17.6%	35.5%	22.9%
C. 31–40 hours	20.3%	19.4%	20.0%	21.6%	12.9%	19.0%
D. 41–60 hours	28.4%	12.9%	23.8%	36.5%	16.1%	30.5%
E. More than 60 hours____(specify)	10.8%	19.4%	13.3%	9.5%	22.6%	13.3%
Total[1]	100%	100%	100%	100%	100%	100%
N	74	31	105	74	31	105
Skipped question	5	3	8	5	3	8

(Q17.) No. of Hours, as specified by respondents who chose "More than 60 hours"[2]

	…for math, streamlined option?			…for ELA, streamlined option?		
	School	District	All	School	District	All
Average number of hours	93.3	77.5	89.4	102.5	77.5	94.2
Median number of hours	95.0	77.5	85.0	100.0	77.5	95.0
Standard Deviation	17.2	3.5	16.4	12.6	3.5	16.3
N	6	2	8	4	2	6

1 Totals may not add to 100 percent due to rounding.
2 Not all respondents who chose “More than 60 hours” specified a value

Respondents were asked to apply the idea of the “streamlined” option again, to help quantify the time required for teachers to complete the proposed CAHSEE PVP checklist and prepare evidence for submission for one student. This was not a forced-choice item; respondents typed in their estimated number of hours. As shown in Table 5.26, for mathematics, almost half of all respondents (43.6 percent) estimated it would take a teacher 3–6 hours, with the median school respondent estimate being 5 hours. For English-language arts, as shown in Table 5.27, more than a third of respondents (39.8 percent) estimated it would take a teacher 3–6 hours, with the median school respondent estimate being 5 hours.

Table 5.26. Estimated Amount of Time Required per Student for a Teacher to Complete Checklists and Prepare Evidence for Submission for Math (Q18a)

Q18.a.About what amount of time (per student) would be required for a teacher to complete checklists and prepare evidence for submission?	….for math, streamlined option?			….for math, full option?		
	School	District	All	School	District	All
Average number of hours	9.3	5.2	8.1	12.9	9.7	12.0
Median number of hours	5.0	3.0	4.0	7.0	5.0	6.0
Standard Deviation	11.9	6.6	10.8	14.4	13.0	14.0
N	67	27	94	65	27	92
Skipped question	12	7	19	14	7	21
Q18. About what amount of time (per student) would be required for a teacher to complete checklists and prepare evidence for submission?	….for math, streamlined option?			….for math, full option?		
No. of Hours	School	District	All	School	District	All
1 hour	13.4%	22.2%	16.0%	3.1%	7.4%	4.3%
2 hours	7.5%	25.9%	12.8%	10.8%	14.8%	12.0%
3 or 4 hours	23.9%	18.5%	22.3%	12.3%	18.5%	14.1%
5 or 6 hours	22.4%	18.5%	21.3%	23.1%	29.6%	25.0%
7 or 8 hours	3.0%	0.0%	2.1%	7.7%	3.7%	6.5%
9 or 10 hours	11.9%	3.7%	9.6%	7.7%	3.7%	6.5%
More than 10 hours	17.9%	11.1%	16.0%	35.4%	22.2%	31.5%
Total[1]	100%	100%	100%	100%	100%	100%

1 Totals may not add to 100 percent due to rounding.

Table 5.27. Estimated Amount of Time Required per Student for a Teacher to Complete Checklists and Prepare Evidence for Submission for ELA (Q18b)

Q18b. About what amount of time (per student) would be required for a teacher to complete checklists and prepare evidence for submission?	….for ELA, streamlined option?			….for ELA, full option?		
	School	District	All	School	District	All
Average number of hours	9.9	5.7	8.8	14.0	10.8	13.1
Median number of hours	5.0	3.5	5.0	8.0	6.0	7.0
Standard Deviation	12.3	6.7	11.2	15.1	13.1	14.6
N	67	26	93	65	26	91
Skipped question	12	8	20	14	8	22

Q18. About what amount of time (per student) would be required for a teacher to complete checklists and prepare evidence for submission?	….for ELA, streamlined option?			….for ELA, full option?		
No. of Hours	School	District	All	School	District	All
1 hour	13.4%	19.2%	15.1%	3.1%	3.8%	4.3%
2 hours	6.0%	19.2%	9.7%	10.8%	11.5%	12%
3 or 4 hours	26.9%	19.2%	24.7%	9.2%	15.4%	14.1%
5 or 6 hours	11.9%	23.1%	15.1%	23.1%	26.9%	25%
7 or 8 hours	11.9%	3.8%	9.7%	4.6%	11.5%	6.5%
9 or 10 hours	9.0%	3.8%	7.5%	12.3%	7.7%	6.5%
More than 10 hours	20.9%	11.5%	18.3%	36.9%	23.1%	31.5%
Total[1]	100%	100%	100%	100%	100%	100%

1 Totals may not add to 100 percent due to rounding.

We asked respondents to estimate the time it would take to score work samples, using the streamlined quantity of work samples and assuming initial training had already taken place. Table 5.28 presents respondents' estimates of the amount of time, after initial training, that would be required to review and score one student's work-sample evidence using the AB 2040 Panel's model rubric. For the streamlined option for mathematics, the median time estimate for all respondents was two hours. For the streamlined option for English-language arts, the median time estimate for all respondents was four hours.

Table 5.28. Estimated Amount of Time (per Student, After Initial Training) Required to Review and Score Work Sample Evidence Using the AB 2040 Panel's Recommended Model Scoring Rubric (Q21)

Q21. If you were on a scoring panel, about what amount of time (per student, after initial training) would be required to review and score the work sample evidence using the AB 2040 Panel's recommended model scoring rubric?	….for math, streamlined option			….for ELA, streamlined option		
	Sch.	Dist.	All	Sch.	Dist.	All
Average number of hours	5.5	3.6	4.9	5.9	4.0	5.4
Median number of hours	2.0	3.0	2.0	4.0	3.0	4.0
Standard Deviation	7.9	2.7	6.8	7.5	3.0	6.6
N	70	29	99	70	28	98
Skipped question	9	5	14	9	6	15

We also asked respondents to consider how long it would take to score student work samples using standard-specific rubrics with specific benchmarks, such as the example presented in the Scoring presentation. Table 5.29 presents respondents' estimates of the amount of time, after initial training, that would be required to review and score one student's work-sample evidence using the standard-specific rubrics. For the streamlined option for mathematics, the median time estimate for all respondents was two hours. For the streamlined option for English-language arts, the median time estimate for all respondents was three hours.

Table 5.29. Estimated Amount of Time (per Student, After Initial Training) Required to Review and Score Work Sample Evidence Using Analytic Rubrics (Q24)

Q24. If you were on a scoring panel, about what amount of time (per student, after initial training) would be required to review and score the work sample evidence using analytic rubrics?	….for math, streamlined option			….for ELA, streamlined option		
	Sch.	Dist.	All	Sch.	Dist.	All
Average number of hours	4.1	2.8	3.7	4.8	3.2	4.3
Median number of hours	2.0	2.0	2.0	3.0	2.0	3.0
Standard Deviation	5.7	2.0	4.9	6.2	2.5	5.4
N	67	29	96	67	29	96
Skipped question	12	5	17	12	5	17

To estimate annual costs for Tier Two operations, HumRRO first assumes that cost will be driven primarily by the effort required for each student. Using the respondents' estimates of teacher time to prepare evidence (5 hours per subject per student), of district personnel time to score work samples (5–6 hours per student) we

arrive at a maximum cost, in terms of time, of 15 hours per student. Using the earlier estimate of 20,000 students eligible for Tier One but not passing Tier One requirements, we arrive at total time estimate of 300,000 hours.

This estimate does not include fixed costs such as those associated with training or professional development for teachers and scorers, or with CDE staff time to specify the Tier One and Tier Two details and monitor implementation.

Table 5.30 provides a summary of information related to respondents' estimates of required time for the main procedures needed to implement Tier Two via the streamlined option.

Table 5.30. Summary of Estimated Amounts of Time for PVP Tasks, per Student

	Hours		
Task	Math	ELA	Total
Student produces work samples (Q17)	31–40	31–40	62–80
Teacher completes checklist and prepares evidence for submission (Q18)	5	5	10
District panel reviews and scores work sample evidence using either the generic or standard-specific rubric (Q21 & Q24)	2	3–4	5–6
Total	38–47	39–49	77–96

Summary of Themes in Qualitative Responses

At the end of seven sections of the questionnaire, respondents were asked to offer additional comments about the topic (e.g., Eligibility) they had just been questioned about. Of the 79 school-level respondents, 54 respondents (68 percent) answered at least one of these open-ended questions. Of the 34 district-level respondents, 27 respondents (79 percent) answered at least one of the open-ended questions. The Evidence topic received comments from the most respondents (55), while the Eligibility topic received comments from the fewest respondents (32). The most frequent themes of comments submitted by respondents about each topic are presented here. A complete set of all open comments received is found in Appendix E.

Eligibility. Of the 32 respondents who answered this open-ended item, 25 percent indicated that the second semester of senior year is too late to initiate PVP.

Administration. Of the 51 respondents who answered this open-ended item, 25 percent expressed concern about the amount of time required of Special Education teachers for PVP training and evidence collection.

Evidence. Of the 54 respondents who answered this open-ended item, 52 percent commented about or questioned the work-sample requirements (e.g., concern

that time spent on work samples reduces time for instruction, need to collect work samples before senior year, how could consistency in work samples be assured, where will all the work samples be stored).

Scoring. Of the 34 respondents who answered this open-ended item, 47 percent had concerns about or recommendations to ensure the consistency of scoring (e.g., expect variation across districts, expect variation using a generic rubric, need for much scorer training, and monitoring for consistency).

Uniformity. Of the 37 respondents who answered this open-ended item, 57 percent expressed concerns about the feasibility of uniformity regarding scoring.

General comments regarding alternative means. Of the 46 respondents who answered this open-ended item, 28 percent expressed a preference for a CAHSEE modified assessment instead of the proposed CAHSEE PVP.

Summary of Findings

Results from our analyses suggest that the Tier One screen would be a feasible process. Further, this process could be automated and performed by CDE rather than requiring school personnel to fill out and judge individual student worksheets, if only CST and CMA scores are considered. It was not clear, at this time, how uniformity could be imposed on the use of community college placement scores as part of the Tier One screen. Such scores are not available for many or most students and even if available, often not until late in their senior year. If reliable information on course grades becomes available through CALPADS, grades could be included in an automated Tier One screen. Otherwise, if the decision were made to include grades, input at the local level would be required.

A number of key policy decisions would need to be made to go beyond the exploratory analyses of a possible Tier One screen reported here. Decisions are needed regarding:

- Comparability, specifically which CST or CMA scores to include, and, if grades are also included, which courses should be considered

- The equivalency of scores on a Tier One worksheet and CAHSEE passing levels

Responses from school and district special education experts to the questionnaire suggest the Tier Two Screen might be feasible, but HumRRO and the Panel agree that a test development contractor would be needed to develop more specific criteria for work sample requirements. Depending on what the work sample criteria might be, the time requirements for special education teachers and students might be a considerable burden. Consideration might be given to reducing eligibility for Tier Two (e.g., from 20,000 down to 4,000 students) to target teacher time to the most eligible students. Perhaps a test development contractor would recommend a reduced

number of work samples, even fewer than the “streamlined” option, thus reducing time requirements for collection and scoring of evidence. Responses to the open-ended questions indicate support for an alternative means, but also continuing concerns about the comparability of results across the state if scoring is done at the local level.

If judged feasible, development of the alternative means should include a pilot test before a system such as the proposed CAHSEE PVP becomes operational. A pilot test would be recommended for a number of reasons:

- Provides an opportunity to collect a variety of actual student work samples to help fine-tune Tier Two criteria for the number and types of work samples
- Identifies aspects of operations that are critical to success (e.g., record keeping of checklists, timeline for screening for eligibility, collecting evidence, scoring, etc.)
- Allows smaller scale effort to test out procedures, choose rangefinders, and establish passing criteria for hand scored student evidence
- Provides data that can be extrapolated to better estimate costs and time for full scale implementation

A pilot test could also explore further screening criteria to reduce the burden, on both students and school and district staff, of having to create and evaluate extensive work samples. For example, a minimum grade point average might be used, not as evidence of mastery of the knowledge and skills required by the CAHSEE, but as a criterion for eligibility for the Tier Two screen. Similarly, a minimum CAHSEE score (below the passing level) might be set as a criterion for eligibility for Tier Two screening.

In prior evaluation reports, HumRRO has recommended consideration of alternative criteria for students with disabilities who have difficulty demonstrating competency through standardized tests. Consideration of evidence from work samples, collected over a period of weeks or months rather than just a few hours, appears to be a feasible alternative. However, much work remains to establish the comparability and equivalency of this type of evidence to the current CAHSEE requirement, to ensure uniformity throughout the state, and to keep the generation and evaluation of work samples from becoming prohibitively expensive.

Chapter 6: Findings and Recommendations

D. E. (Sunny) Becker and Lauress L. Wise

Background

As described in Chapter 1, an independent evaluation of the CAHSEE was launched in January 2000 and has continued every year since. The evaluation is required to assess both the impact of the CAHSEE requirement and the quality of the CAHSEE tests. Key 2009–10 evaluation activities included:

- analyses of 2009–10 test results (Chapter 2),
- analyses of student questionnaire responses (Chapter 3),
- examination of other indicators of student achievement and success (Chapter 4), and
- an analysis of AB 2040 recommendations for alternative means for eligible students with disabilities to meet the CAHSEE requirement (Chapter 5).

In this final chapter, we summarize key findings from each of these activities and the conclusions we derived from these findings about the CAHSEE and its impact. We also offer several recommendations for improving the quality and effectiveness of the CAHSEE.

Key Findings

Test Results (Chapter 2)

CAHSEE test results show significant increases in mastery of targeted skills since the implementation of the CAHSEE requirement. As shown in Table 2.18, overall passing rates for seniors have increased steadily from 91 percent for the Class of 2006 to over 94 percent for this year's Class of 2010. Similarly, overall passing rates for grade ten students taking the CAHSEE for the first time have increased steadily from 64 percent for the Class of 2006 (tested in 2004) to 72 percent for the Class of 2012 tested this year. As shown in Table 2.29, initial passing rates have increased significantly for all demographic groups, including students with disabilities, whose initial passing rates increased from 19 percent to 24 percent. That said, it should also be noted that passing rates for students with disabilities are still unacceptably low and that passing rates for English learners are also low and have increased only modestly since the CAHSEE requirement went into effect. Passing rates for economically disadvantaged and minority student also continue to be significant lower than passing rates for white and Asian students at all grade levels.

Another encouraging finding is the large number of students who continue to try to pass the CAHSEE after their originally scheduled graduation date. Of students in the

Class of 2009 who did not complete the CAHSEE requirement by the end of their senior year, nearly half of the general education students and over 5,000 of the special education students took the CAHSEE one or more times this year. Also about 20 percent of the students in the Class of 2008 who had not yet passed the CAHSEE continued to try to pass it this year.

One other significant trend since the implementation of the CAHSEE requirement has been the proportion of students taking more advanced mathematics courses in high school. As shown in Table 2.33, the percentage of students taking math courses beyond Algebra I by the grade ten has increased from 56 percent for the Class of 2006 to 72 percent for this year's grade ten students in the Class of 2012. All demographic groups showed significant increases in the percentage of students taking more advanced courses, including very significant gains of from 19 percent to 42 percent for students in special education. Here too, however, significant gaps exist. Analyses show that fewer students with disabilities, English learners, economically disadvantaged students, and minority students are taking advanced mathematics courses by grade ten.

Student Questionnaire Responses (Chapter 3)

Students completed a brief questionnaire following each part of the CAHSEE. Analyses of responses for grade ten students, where all students were required to participate, indicated several interesting trends.

There were several changes in responses of grade ten students over the past 5 years in test preparation, perception of test importance and coverage of CAHSEE topics in class, and future plans. Specifically, in 2010 an increased percentage of students reported that:

- They used the ELA and Mathematics Study Guides to prepare for the CAHSEE.
- CAHSEE topics and questions were covered during their courses, and the questions were equally or less difficult than those they were exposed to through tests and homework.
- They did not have to work any harder to pass the CAHSEE.
- They will attend a four-year college or university or that they will join the military

The responses of grade ten students differed according to whether they (a) passed both parts of the CAHSEE, (b) passed either mathematics or ELA but not both, or (c) did not pass either part. Please note that these questions were asked before students received their test scores, whereas in our analysis we were able to compare responses in light of actual test performance. Overall, students who passed both tests reported the most positive perceptions about the CAHSEE and those who passed

neither test reported the most negative perceptions. A higher percentage of students who passed both tests reported that:

- A teacher or counselor told them about the importance of the CAHSEE.
- They used released (sample) items to prepare.
- They do not have to work any harder to pass the CAHSEE.
- They expect to earn a high school diploma with their class (or earlier).
- They plan to attend a four-year college or university after high school.

Among students who passed only one test (either ELA or mathematics), a higher percentage reported that:

- The CAHSEE is 'very important'.
- They are working harder in their courses to pass the CAHSEE.
- A reason that they may not earn their diploma is that they may not pass the required courses.
- They plan to attend a community college after high school (after ELA only).

Higher percentages of students who passed neither test reported that:

- They may not receive a high school diploma.
- Not passing the CAHSEE may prevent them from earning a high school diploma.
- They did not perform their best on the CAHSEE because they were nervous.

Some differences in questionnaire responses were observed for different demographic groups. Females were more likely than males to report that they had to work harder to pass the CAHSEE and that the test was very important. They were also more likely to report having used released (sample) items to prepare for the CAHSEE, and more often had plans to attend a four-year college or university after high school. Males were more likely than females to believe that they may drop out of school.

Asian, White, and Filipino students generally displayed the most positive results of the ethnic groups. They were more likely to report exposure to test items and topics in their courses than other ethnicities, and to believe that the test items on the CAHSEE were equally or less difficult than those they had seen before. These students were also

most likely to report that they would attend a four-year college or university after high school and that they were confident that they would receive a diploma. Hispanic students were most likely to be concerned that either the CAHSEE or required courses would prevent them from earning a high school diploma.

Students with disabilities and English learners reported higher levels of unfamiliarity with CAHSEE topics and questions. They also reported higher levels of nervousness while taking the CAHSEE than any other group. A lower percentage of SWD and EL students than the general population reported that they would stay in school and try again if they did not pass the CAHSEE. Despite the challenges faced, EL students were more likely than other groups to report believing that the CAHSEE was very important.

In some instances student responses differed greatly depending on whether they were designated economically disadvantaged or not. Economically disadvantaged students more often felt that test items were more difficult than those that they had previously been exposed to. They were also more likely to report that they might not pass the CAHSEE or all of the courses required to graduate. Economically disadvantaged students were less likely than the general population to plan to attend a four-year college or university post high school.

The 2010 student questionnaire results were fairly consistent with previous years, and illustrate overall positive attitudes by grade ten CAHSEE examinees. Most students reported exposure to similar topics and questions in their courses, and that they believed the CAHSEE is important. The majority also reported trying their hardest on the examination and that they believed they would be able to graduate with their class or sooner. However, this survey also highlights particular groups of students who may not be getting adequate preparation for the CAHSEE. SWD and EL students reported at higher levels than other students that test items and topics were not like what they had seen in class, and that the items were more difficult than those they were exposed to on tests and in homework. Special attention might be required to ensure that all students are being exposed to the material included on the CAHSEE. Additionally, Hispanic, African American, and American Indian/Native Alaskan groups also reported higher levels of difficulty with the test content. These groups may also need additional attention.

We also compared responses of 2010 grade twelve students in 2008 when they first took the examination and again in 2010 on a relevant selection of questionnaire items. Students who took the CAHSEE in grade twelve showed an increase in concern that the CAHSEE would prevent them from graduating with the rest of their class compared to their responses two years before. They were slightly less likely than previously to report that they would stay in school and try again if they did not pass during this administration. Despite this, most grade twelve students have plans to continue learning after high school—to attend a four-year college, two-year community college, or vocational/trade school.

The grade twelve students who were still taking the CAHSEE were less likely to report that the topics and questions were familiar to them than the grade ten students who did pass. Although there were slight improvements in 2010 compared to 2008, these results suggest that many of those who are behind on CAHSEE content in grade ten are not catching up by the time they are grade twelve students.

Trends in Other Outcomes (Chapter 4)

Data sources outside the CAHSEE program provide indications of the state of education in California. The Class of 2006 was the first one required to pass both parts of the CAHSEE in order to receive a high school diploma. Trends beginning with the Class of 2006 are of particular importance as they cover the time since imposition of the CAHSEE requirement.

Our first major finding was that software problems in the CALPADS system rendered official statewide data from the 2009–10 school year unavailable. Thus most of our findings are based on the same data reported in our 2009 annual evaluation report.

One important indicator of the impact of the CAHSEE requirement is whether the proportion of students who leave high school without a diploma changes in some way. Answering this seemingly straightforward question demands a multifaceted answer. California made important improvements in its student-level data systems, facilitating more accurate dropout tallies in 2007. Therefore we report here trends from 2007 to 2008; the reader is referred to previous reports in this evaluation series for earlier trends.

First, we note that the 2007 dropout rates were substantially larger than previous rates but we cannot disentangle how much of this change is a real increase in dropouts versus more accurate reporting. We found that official dropout rate calculations indicate that both single-year and four-year dropout rates decreased between 2007 and 2008, overall and for all ethnic categories. However, both dropout metrics revealed that African American students dropped out at a substantially higher rate than every other group, including disadvantaged groups such as limited English proficiency (LEP) and special education students. In addition, American Indian, Hispanic, Pacific Islander, economically disadvantaged, LEP, and special education students showed notably higher dropout rates than White, Filipino, and Asian students. As reported previously, we found that the bulk of dropouts occurred in Grade 12.

As a second look at students leaving high school prematurely, we investigated enrollment trends by grade and over time. While this measure does not directly account for mobility in and out of the state, substantial changes in enrollment declines can be interpreted as an indirect indicator of dropout rates. Enrollment patterns indicate that the drop-off rates of sophomores increased in fall 2009 while the drop-off rate of juniors and seniors declined. This grade twelve phenomenon may be attenuated by the continuation of students in a second senior year.

High school graduation rates can also be measured in multiple ways. We examined two measures: the graduation rate as a percentage of Grade 9 enrollment four years earlier, and the graduation rate as measured by ESEA requirements. The ESEA rate is based upon the number of graduates in a given year and the number of dropouts in the relevant grade nine through grade twelve years. We found that the graduation rate as a percentage of grade nine students increased slightly in 2007 and 2008 while the ESEA rate merely slowed its decline (Figure 4.4). Just over two-thirds (68.5 percent) of students who entered ninth grade in the fall of 2004 graduated four years later.

Review of disaggregated ninth-grade-to-graduation rates revealed that only the African American graduation rate declined in 2008 from its 2007 level, widening the gap with other racial/ethnic groups (Table 4.7). Graduation rates varied widely, from 54.6 percent among African American students to 92 percent for Asian students. We also note that disaggregated graduation rates are not as readily available on the CDE website as other important educational indicators.

We also looked at the percentage of students, by demographic group, who are not accounted for in either the ninth-grade-to-graduation or the four-year dropout rates. We found large differences across racial/ethnic groups, from a low of 0.1 percent for Asian students to a high of 18.2 percent for Hispanic students (Table 4.8).

Participation in the SAT college entrance examination decreased, as did performance, for a second year in 2008–09 (Figure 4.5). Participation and performance on the ACT continued to increase.

In short, we found that graduation rate trends varied depending on the metric used, either rising slightly or declining less quickly in 2008 relative to 2007. While rates overall are worrisome—just over two-thirds of ninth grade students graduated on time in 2008—graduation rates for specific demographic groups are substantially lower. And while dropout rates decreased for the Class of 2008 compared with the Class of 2007, the rate for African American students was nearly three times the rate for White students, and rates for Hispanic students, ELs, and SWDs were more than twice the rate for White students, for example. The accuracy of documenting dropout rates has improved due to the new student identification system. While we applaud this increased accuracy, in the short term it limits comparability over time.

One-third of Class of 2008 graduates completed the A–G courses required by the UC and CSU university systems (Table 4.9). Rates varied widely among racial/ethnic groups. Participation in Advanced Placement examinations increased in 2009 (Figure 4.8), as did measures of success on the AP (Figure 4.9). Participation in the most common college entrance exam, the SAT, decreased, while mean scores rose slightly; ACT participation and scores both rose (Figures 4.5, 4.6, and 4.7).

Alternative Means for Students with Disabilities (Chapter 5)

Results from our analyses suggest that the Tier One screen would be a feasible process. Further, this process could be automated and performed by CDE rather than requiring school personnel to fill out and judge individual student worksheets, if only CST and CMA scores are considered. It was not clear, at this time, how uniformity could be imposed on the use of community college placement scores as part of the Tier One screen. Such scores are not available for many or most students and even if available, often are not reported until late in their senior year. If reliable information on course grades becomes available through CALPADS, grades could be included in an automated Tier One screen. Otherwise, if the decision were made to include grades, input at the local level would be required.

A number of key policy decisions would need to be made to go beyond the exploratory analyses of a possible Tier One screen reported here. Decisions are needed regarding:

- Comparability; specifically, which CST or CMA scores will be included, and, if grades are also included, which courses should be considered.

- The equivalency of scores on a Tier One worksheet and CAHSEE passing levels.

Responses from school and district special education experts to the questionnaire suggest the Tier Two screen might be feasible, but that a test development contractor would be needed to develop more specific criteria for work sample requirements. Depending on what the work sample criteria might be, the time requirements for special education teachers and students might be a considerable burden. Consideration might be given to reducing eligibility for Tier Two (e.g., from 20,000 down to 4,000 students) to target teacher time to the most eligible students. Perhaps a test development contractor would recommend a reduced number of work samples, even fewer than the “streamlined” option, thus reducing time requirements for collection and scoring of evidence. Responses to the open-ended questions indicate support for an alternative means, but also continuing concerns about the comparability of results across the state if scoring is done at the local level.

If judged feasible, development of the alternative means should include a pilot test before a system such as the proposed Performance Validation Process becomes operational. A pilot test would be recommended for a number of reasons:

- Provides an opportunity to collect a variety of actual student work samples to help fine-tune Tier Two criteria for the number and types of work samples

- Identifies aspects of operations that are critical to success (e.g., record keeping of checklists, timeline for screening for eligibility, collecting evidence, scoring, etc.)

- Allows smaller scale effort to test out procedures, choose rangefinders, and establish passing criteria for hand-scored student evidence

- Provides data that can be extrapolated to better estimate costs and time for full scale implementation

A pilot test could also explore further screening criteria to reduce the burden, on both students and school and district staff, of having to create and evaluate extensive work samples. For example, a minimum grade point average might be used, not as evidence of mastery of the knowledge and skills required by the CAHSEE, but as a criterion for eligibility for the Tier Two screen. Similarly, a minimum CAHSEE score (below the passing level) might be set as a criterion for eligibility for Tier Two screening.

In prior evaluation reports, HumRRO has recommended consideration of alternative criteria for students with disabilities who have difficulty demonstrating competency through standardized tests. Consideration of evidence from work samples, collected over a period of weeks or months rather than just a few hours, appears to be a feasible alternative. However, much work remains to establish the comparability and equivalency of this type of evidence to the current CAHSEE requirement, to ensure uniformity throughout the state, and to keep the generation and evaluation of work samples from becoming prohibitively expensive.

Recommendations

As in past years, we offer a number of recommendations for improving the CAHSEE and its use. The first four recommendations concern improvement to the examination itself and also to data systems that support analysis and interpretation of CAHSEE results.

Based on our analyses over the past several years, we conclude that the CAHSEE is a reasonably accurate measure of mastery of the required ELA and mathematics content. That said, we thoroughly analyzed the alternative means recommended by the AB 2040 panel for students with disabilities to meet the CAHSEE requirement. Based on our results and results from a targeted study of students with disabilities who had difficulty passing the CAHSEE (American Institutes for Research, 2010), it seems clear that there are a small number of students who have mastered the content required for passage on the CAHSEE, but cannot pass the CAHSEE. At the same time, we found considerable concern about the fairness and the cost of the evaluation of student work samples proposed as Tier Two of the alternative means. To resolve the tension in these findings, we offer our first recommendation.

Recommendation 1: *A pilot study is needed to try out specific criteria for meeting the CAHSEE requirement using an approach similar to that recommended by the AB 2040 Panel. The study should address the feasibility of collecting and scoring the required work samples. The study should also*

explore ways to ensure uniform application of criteria for demonstrating equivalent mastery of the knowledge and skills required for passing the CAHSEE.

This recommendation was also made by the State Superintendent of Public Instruction. The pilot should evaluate alternative tests that might be used in the Tier One screen and ways of identifying minimum performance levels on these tests that are comparable to passing the CAHSEE. The study must also address ways of (a) limiting the collection of work samples to those students likely to have the required skills, (b) collecting the information efficiently, and (c) scoring the resulting work samples rigorously and uniformly across the state. Although not required by current statute, consideration should also be given to extending the alternative means to other students who have particular difficulty taking tests, even though they are not identified as having specific disabilities requiring participation in special education programs.

A second recommendation for improving the CAHSEE itself stems from our observation of some difficulties with the distribution of test booklets, particularly special booklets required for some accommodations.

Recommendation 2: *The CDE should work with its CAHSEE contractor to improve the system used by districts for ordering regular and special needs versions of the CAHSEE.*

It is difficult to forecast exactly which students will participate in each administration. Districts should be discouraged from allowing grade eleven and twelve students to participate in consecutive administrations, since results from the first administration are generally not available at the time materials for the second administration are shipped. We observed a number of students who appeared to pass in the October administration and yet had booklets and, in some cases completed booklets, from the next administration. In addition, schools and districts need to ensure an adequate number of special test versions (e.g., large print or Braille) to meet student needs.

Our third recommendation concerns the statewide data systems that support analysis and interpretation of CAHSEE results.

Recommendation 3: *California should ensure that statewide student data systems are as accurate and up-to-date as possible.*

CDE is responsible for an extremely large and geographically dispersed educational system. With such size and diversity come many challenges, and an effective data system is crucial to understanding, monitoring, and improving the effectiveness of our educational systems. The California Longitudinal Pupil Achievement Data System (CALPADS) includes a comprehensive design for the collection and integration of student data. Budget limitations and other constraints have slowed the full implementation of this system, including key

quality assurance components. We found, for example, the exit information collected on high school students in 2008 was coded differently by some districts and that, in an effort to obtain more accurate information, data from 2009 has been significantly delayed and was not available for our analyses this year. We were thus not able to identify students who left high school having completed all requirements except the CAHSEE.

At the core of CALPADS is a system for assigning and using statewide student identifiers (SSIDs). This makes is possible to match CAHSEE results for students who transfer to different schools and also to link CAHSEE results to other student information. Since the introduction of SSIDs in 2006, the rate of missing or erroneous information has decreased. However, we still find at least 0.5 percent of the initial CAHSEE records are missing SSIDs, have different SSIDs for the same student, or have the same SSID for different students. As CALPADS matures, it will be important to build into the system processes for monitoring and improving the accuracy and completeness of all student data.

Our fourth recommendation calls for a review of the content and rigor of the CAHSEE requirement.

> ***Recommendation 4:*** *Collect post-high school outcome information for students who have taken the CASHEE and use this information in reviewing the content and rigor of the CAHSEE requirements.*

It has now been ten years since the High School Exit Examination Panel recommended the knowledge and skills that students should master to earn a high school diploma. In August of this year, the SBE voted to adopt the Common Core Standards for elementary, middle, and high school student achievement. These standards were designed to lead to mastery of key college and work readiness skills by the end of grade twelve. It is reasonable to review the CAHSEE requirements in comparison to these new readiness standards. While the intended meaning of a high school diploma is still very much a policy issue, we can now collect and examine empirical data on the relationship between skill levels and post-high school outcomes.

Consider two examples, among many. Students who do not pass the CAHSEE have the option of participating in community college programs to help them pass. These programs are supported by intensive instruction funds. The utilization and efficacy of these programs should be assessed. Also, students who do pass the CAHSEE may nonetheless be required to take remedial courses in college. Information about these outcomes would inform discussions of the appropriateness of the current CAHSEE requirement.

Our remaining recommendations concern ways of increasing the effectiveness and impact of the CAHSEE requirement. Both initial grade ten scores and grade twelve cumulative passing rates have increased over the past five years, but further improvements are needed for all students to be college and work ready upon graduation

from high school. In addition, many minority and economically disadvantaged students, English learners, and students with disabilities have been significantly less successful in meeting the CAHSEE requirement. We begin by repeating two recommendations from our 2009 Annual Report.

Recommendation 5: *California education leaders and educators should encourage students who do not pass in four years to continue to master CAHSEE skills and work to improve effectiveness of fifth year programs.*

Research shows that attaining a high school diploma is associated with positive life outcomes including higher income and subsequent achievements such as completing military contracts. We have seen evidence that some struggling students persist in seeking a high school diploma after their graduating class. We recommend that California educators communicate the importance of a high school diploma to students and educate them on the opportunities to master CAHSEE skills after the regular high school years. At the same time, the effectiveness of fifth year programs should be monitored and improved upon. A study of effective schools might yield best practices that could be shared with the wider education community.

Recommendation 6**:** *New interventions should be targeted at earlier grades, using test scores to identify students who have fallen behind their classmates and are at risk of failing to meet the CAHSEE requirement.*

State policy has focused on interventions for students who do not initially pass the CAHSEE, including funding for a remedial 12th grade program and provisions for students to continue for a fifth or even sixth year of high school. Last year's analyses of longitudinal data indicate that seventh grade assessment results can be used to identify students who may need additional help to pass the CAHSEE. It would be useful to study initially low-achieving students who are able to catch up and pass the CAHSEE by the time they reach grade ten. We should study the people, psychological and learning climates, and programs that helped them to do so. It might then be possible to extend this help to more of the students who have fallen behind and need to catch up in time to benefit fully from the high school curriculum.

Another recommendation concerns identification and dissemination of programs that are effective in helping students master the CAHSEE requirements, particularly students in groups that currently have the most difficulty in meeting the CASHEE requirement.

Recommendation 7: *Study schools that are doing a better job in helping all and particular groups of students to meet the CAHSEE requirement. Identify approaches and programs that might be effectively adopted in other schools.*

We see variety across schools and districts in CAHSEE pass rates and in gaps in passing rates for minority, economically disadvantaged students, English

learners, and students with disabilities. A careful study of higher performing schools could identify programs that are effective in helping students who have fallen behind in academic achievement to catch up and meet the CAHSEE requirement by the end of high school. Programs that are effective for particular groups, such as helping English learners learn English or providing students with specific disabilities better access to general education instruction are also needed to reduce gaps in passing rates for these groups. Detailed study is needed to determine what makes these programs successful and how they might be adopted in other districts and schools.

This year we also note an increasing concern that the state's dire economic situation may make continued improvement in CAHSEE results difficult and might even make it difficult to sustain improvements already achieved. This leads to our next recommendation.

Recommendation 8: *California should study the impact of fiscal constraints on systems to help students master the skills required by the CAHSEE.*

California, like many states, has been struggling financially, resulting in cutbacks, furloughs, and an eye toward cost savings. The effects of reductions in and reallocation of funding may have implications for student success in the future, including loss of effective teachers and increases in class size. In particular, reductions in remediation offerings could reverse progress made in recent years. We recommend that programmatic changes resulting from fiscal constraints be carefully monitored, evaluated, and adjustments made if necessary.

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