AMERICAN INSTITUTES FOR RESEARCH

# Study of the Incidence Adjustment in the Special Education Funding Model

## Final Report

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# EXECUTIVE SUMMARY

This is the Final Report for the *Study of the Incidence Adjustment in the Special Education Funding Model*, which the American Institutes for Research (AIR) conducted for the California Department of Education. This study is a follow-up to a prior study of the incidence of disabilities across California (Parrish, et al., 1998), in which AIR evaluated whether funding for Special Education Local Plan Areas (SELPAs) under the census-based funding formula (Assembly Bill [AB] 602, Chapter 854, Statutes of 1997) should be adjusted to account for differing incidences of disabilities among SELPAs. It was considered important to attempt to identify variations in the incidence of special education severity or high cost students across SELPAs, because under census-based formulas, two SELPAs with the same overall average daily attendance are generally treated the same for funding purposes.[1] Concerns were raised about how fair this was if it could be shown that special education "severity" differed significantly across SELPAs.

In the previous study, AIR found that severe and/or high cost students were not randomly distributed throughout the state. In other words, SELPAs experienced significant differences in special education severity that were greater than chance alone. Accordingly, AIR created a "severity service multiplier" for each SELPA in the state based on the services received by its special education students. These multipliers identified SELPAs with responsibilities for disproportionate numbers of severe and/or high cost students in comparison to the statewide average. A supplemental funding allowance was proposed for SELPAs based on their severity service multiplier in relation to their overall AB 602 average daily attendance funded rate and other factors. These multipliers were incorporated into the AB 602 funding model by SB 1564 (Chapter 330, Statutes of 1998). This legislation required that the funding model be adjusted for severity through 2002-03, at which time a new study would be conducted to review the incidence multiplier and the necessity of continuing to adjust for severity.

The primary focus of the current study is to re-evaluate the incidence of severe disabilities across the state, review the severity service multipliers, and recommend whether and how the severity adjustment should be continued. In order to address these objectives, the research team replicated and updated the primary analyses from the previous study, and also conducted alternative analyses.

In order to understand the changes that have occurred since the study in 1998, the research team assessed changes in the special education population and service patterns, using data from the California Special Education Management Information System (CASEMIS). Although the school-aged special education population increased by 12 percent from 1996 to 2002, there were wide variations by category of disability. For instance, students with Autism increased from representing .8 percent of the total special education population in 1996 to 2.7 percent in 2002, an increase of nearly 240 percent. We also found that as a group the SELPAs not identified as

[1] Under California's census-based funding approach, other factors may cause inter-SELPA special education funding variations. However, without an adjustment of the type proposed in this report, variations in severity, or degree of high cost students, would not be explicitly be among them.

serving a disproportionate number of severe students in the 1998 study have seen above average increases in disabilities that are generally considered severe, such as Autism, Multiple Disability, and Emotional Disturbance. While the overall number of students in Special Day Classes and Resource Specialist Programs increased by 18 and 10 percent, respectively, these placements were fairly steady as a proportion of the total special education population. These findings suggest that while some placements have remained constant statewide, changes in disabilities may indicate shifts in "severity" since the 1998 study.

Given these demographic changes, we once again examined whether "severity" appears to be randomly distributed by testing two different models of severity based on low incidence disabilities and high cost students. Low incidence disabilities are known to occur at low rates across the population and generally require more intensive services. The California Education Code defines low incidence disabilities to include the following disabling conditions: hearing impairments, vision impairments, and severe orthopedic impairments, or any combination thereof. High cost students were identified as those whose total service costs are substantially (e.g., equal to or greater than two standard deviations) above average for the typical special education student in California. Once again, we concluded that the distribution of severity across SELPAs is not random. However we define severity—whether on the basis of low incidence disabilities or measures of above average cost independent of disability category—the observed variability across California's 115 SELPAs was found to be much greater than would be expected by chance alone.

The number and types of services received by a student are an indication of the needs of the population and were determined to be the best available proxy for severity. It can be inferred that, on average, more severe needs are related to more intensive services. Because CASEMIS provides detailed information regarding the number and types of special education services received by each child in special education in the state, it served as the primary data source for this study.

Through the use of CASEMIS, we were able to identify severe students by assigning standardized costs to each delineated service. These cost estimates per service were derived by multiplying the statewide number of providers for each service by a standardized salary, which was then divided by the count of students receiving each service as recorded in CASEMIS. Thus, while CASEMIS is not designed to provide cost information, it contains data regarding the number and mix of services received by each special education student statewide, and therefore served as the primary source of information from which the cost estimates were derived. The research team and Stakeholder Committee spent considerable time discussing the most appropriate derivation of these cost estimates as well as appropriate linkages between them and the service information found in CASEMIS. The resulting cost estimates per service were then summed for each student to generate an overall cost of the special education services received. Students with total costs at or above two standard deviations from the average special education student were considered to be high cost.

These individual high cost profiles were summed to the SELPA of residence to estimate its total for high cost students. Using methods similar to those established in the earlier study (Parrish et al., 1998), we identified SELPAs whose net costs exceeded the statewide average. To do so, we

estimated what the cost would be if a SELPA was serving high cost students at the statewide average percentage and at the average cost per high cost student. This estimate was then subtracted from the SELPAs' net high costs to determine SELPAs with excess high costs. This identifies SELPAs with costs greater than they would be if they had the statewide average of high cost students. Severity service multipliers were then developed, which are based on the relationship between the excess high costs by SELPA and the estimated revenues at the statewide target rate. Based on these specifications, if a SELPA is not shown to have excess high costs, the multiplier is set at 1.0. SELPAs with multipliers above 1.0 received severity funds unless they already generate revenues greater than the excess high costs. Under this recommended model, 38 SELPAs show a severity service multiplier greater than 1.0, and 30 of those are eligible to receive adjustment funds.

Although the approach used in the current study is very similar to that used in 1998, there are some significant differences in the results. This is due to changing student populations, as shown in Chapter 2; changes in CASEMIS reporting and some of the assumptions underlying the construction of the severity service model, as described in Chapter 4; and differences between the severity adjustment calculations used in the two years of the study, as described in Chapter 5.

An important research question posed for this study is, "Are the data accurate and sufficiently reliable to be used in a funding formula?" Because of this question, and because of the critical nature of CASEMIS to this study and the resulting severity adjustment used by the state, considerable attention is paid to issues related to CASEMIS in this report. CASEMIS has demonstrated considerable power and versatility through its use as the primary data source for the prior as well as the current study. It has served, and is expected to continue to serve, as the primary source of information driving the distribution of potentially over $100 million per year in special education severity funding to SELPAs across the state. For this reason, the report examines CASEMIS in detail and includes recommendations as to how the power of CASEMIS to provide vital policy information to the state could be even further enhanced. Although some of these recommendations may have substantial cost implications, others could be implemented for very little cost and would significantly strengthen CASEMIS as a resource for policy analysis.

In summary, the primary recommendation from this study is that the revised severity service model presented in this report be used as the basis for subsequent severity adjustments to the state's special education funding formula. Using updated multipliers, the statewide severity adjustment fund is projected at $103.2 million. As mentioned, 38 SELPAs have a positive severity multiplier, of which 30 are eligible to receive adjustments under the revised model. We recommend that the state gradually phase-out SELPAs that have been receiving adjustment funds for the prior five years and provide full and immediate funding to SELPAs identified as responsible for a disproportionate number of high cost students. As the supplemental funds will support immediate needs, we believe that SELPAs should be provided with their funds as soon as reasonable to offset their high cost students. Although there is added cost to the state for a phase-out for SELPAs no longer eligible to receive funds under the revised model, it is believed that time will be needed to adjust to these reductions in revenue. With a two-year phase-out, overall estimated cost in the first year of implementation would be $115.3 million—$103.2 for the revised multipliers and $12.1 million for the phase-out process. As the state has already

invested nearly $80.6 million in the severity fund in 2002-03, the marginal cost for implementing the revised multipliers with a two-year phase-out would be $34.7 million in the first year.

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# CHAPTER 1: INTRODUCTION

## Historical Context

The Poochigian and Davis Special Education Reform Act of 1997 (Assembly Bill [AB] 602, Chapter 854, Statutes of 1997) changed California's special education funding from a resource-based to a census-based approach. The census-based approach distributes funds to Special Education Local Plan Areas (SELPAs) based on a fixed amount according to the number of students in average daily attendance (ADA). The prior system established by the California Master Plan for Special Education provided funding based on units of placement. The long-term intention of the change was to provide comparable special education funding to SELPAs with comparable enrollment.

The California Council for Exceptional Children (CEC) newsletter described the passage of AB 602 as "perhaps the most revolutionary legislative action in the history of California special education."[2] This sweeping change raised important questions about variation in the degree of special education "severity" across the state. Under census-based formulas, two SELPAs with the same overall average daily attendance are generally treated the same for funding purposes. Concerns were raised about how fair this was if it could be shown that special education "severity" differed significantly across SELPAs.

Thus, this landmark legislation also specified that further study was needed in two areas: variability in the incidence of students with disabilities across the state who are significantly above average in cost and "severity," and issues related to funding the state's nonpublic schools. Both sets of questions were addressed through contracts awarded by the California Department of Education (CDE) to the American Institutes for Research (AIR), the results of which are presented in the reports *Special Education: Study of Incidence of Disabilities Final Report* (1998), and *Special Education: Nonpublic School and Nonpublic Agency Study* (1998). This is the Final Report for the *Study of the Incidence Adjustment in the Special Education Funding Model*, a study to update findings from the initial incidence study.

## Previous Incidence Study

In the previous study of the incidence of disabilities across California (Parrish, Kaleba, Gerber, & McLaughlin, 1998), AIR evaluated whether funding for SELPAs under the census approach should be adjusted to account for differing incidences of disabilities among SELPAs. AIR found that severe and/or high cost students were not randomly distributed throughout the state. These findings were consistent and clear, regardless of the definition of severity used. Accordingly, AIR created a "severity service multiplier" for each SELPA in the state based on the services received by the special education students residing in their attendance areas. This allowed AIR to

[2] Kennedy, S. (1997, Fall). CSF/CEC support helps pass revolutionary reform measure. *CSF/CEC Journal, Fall 1997,* 4-5, 20.

identify SELPAs with responsibilities for disproportionate numbers of severe and/or high cost students in comparison to the statewide average. A supplemental funding allowance was proposed for SELPAs based on their severity service multiplier in relation to their overall AB 602 ADA funded rate and other factors.

These severity multipliers were incorporated into the AB 602 funding model by SB 1564 (Chapter 330, Statutes of 1998). Of the 115 SELPAs across the state, 44 qualified for an incidence multiplier, 34 of which actually received severity funding, known as the Special Disabilities Adjustments. The legislation required that the funding model be adjusted for severity through 2002-03, at which time a new study must be completed to review the incidence multipliers and the necessity of continuing to adjust for severity in the funding model.

A Request for Proposals (RFP) for this follow-up study was released on October 2002, to which AIR responded and was awarded a contract. Work for the project began on February 6, 2003, and the Interim Report was submitted on April 22, 2003. The Draft Final Report was submitted on August 4, 2003.

## Research Questions

Exhibit 1-1 presents the study's research questions, as specified in the RFP, as well as the corresponding methods and the location of these issues in the report.

## Exhibit 1-1. Research Question/Approach Crosswalk

| Research Questions | Approach | Location in Report |
|---|---|---|
| 1. What "true" differences, if any, exist among SELPAs in the incidence and mix of disabilities (severity and type)? In this context, "true" differences mean differences that are the result of underlying population differences, not reporting differences or differing program designs or cost structures. | Develop one or more operational definitions of severe and/or high cost students. | **Chapters 3 & 5** |
| | Thoroughly review proposed alternative definitions with stakeholders. | **Chapter 1** |
| | Examine variations in "low incidence" disability categories. | **Chapter 3** |
| | Examine variations in the incidence of "high cost" students by examining the intensity of services received and "costing" these services. | **Chapters 3 & 4** |
| | Search for exogenous measures that might be expected to correlate with the "true" incidence of disability (such as poverty or incidence of disability reported at birth). | **Chapter 1** |
| 2. What effect do the population differences have on the expected mix of services that must be provided and the expected costs of providing those services? | Develop a uniform set of procedures for measuring variations in services received by students across the state, and how variation in services translates into relative costs to SELPAs. | **Chapters 4 & 5** |
| 3. Are differences in the populations and the resulting differences in services and costs significant enough from a public policy perspective to justify adjustments in a funding formula? | Determine whether the differences in the population and the resulting differences in services and costs between SELPAs are statistically significant and of sufficient economic magnitude to justify adjustments in the funding formula. | **Chapters 3 & 5** |
| 4. Are the data accurate and sufficiently reliable to be used in a funding formula? | This addressed through a longitudinal analysis of service patterns. | **Chapters 6 & 8** |
| 5. Are there alternative proxy measures that are independent of reporting by schools that would provide an accurate indicator of the level of expected disability? | Examine explore other databases, such as Census Mapping, to search for alternative indicators of incidence by type and severity. | **Chapter 1** |
| 6. What alternative methodologies are available for adjusting the funding formula to account for the observed differences, consistent with the goals of AB 602 (for example: simplification, programmatic flexibility, and elimination of inappropriate fiscal incentives for identifying students as needing special education or for placing students in particular programs)? What is the most fair and feasible method among the alternatives considered? | Explore alternative methods for adjusting the funding formula, revisiting the alternatives examined in the previous study, as well as new possibilities that may be revealed through the examination of exogenous data and through discussions with our Stakeholder Committee. | **Chapter 7** |
| | Discuss with stakeholders what is most fair and feasible. | **Chapter 8** |
| 7. What are the effects of the adjustment methodology and the particular incidence multiplier factors used on SELPA funding levels in the existing model? | Longitudinal review of special education fiscal records on SELPA revenues. | **Chapter 2** |
| | Examine change in the intensity of services, identification of disabilities, and resource patterns across SELPAs over time. | **Chapter 2** |
| 8. What specific changes are warranted in the funding model to accommodate a funding adjustment to reflect differences in the level of disabilities? What are the relevant factors that should be incorporated? What is the estimated cost of implementing the recommended changes? | This is answered as a result of measuring the variability of severe disabilities across the state, and reviewing and revising the severity service model. | **Chapters 5 & 8** |

# Overview of Approach

The primary focus of this study is to re-evaluate the incidence of severe disabilities across the state, review the severity service multipliers, and recommend whether and how the Special Disabilities Adjustments should be continued. In order to address these objectives, the research team replicated and updated the primary analyses from the previous study, as well as conducted alternative analyses.

### *Severity Analysis and Adjustment*

The research team first replicated and updated the primary analyses from the previous study (Parrish et al., 1998), and conducted a statewide analysis of the variability of incidence of severity. We constructed and tested two different models of severity by examining the distribution of low incidence disabilities and high cost students. Our analyses, described in Chapter 3, show that however we define the incidence of severity, the observed variability across California's SELPAs is much greater than would be expected by chance alone.

The research team calculated a cost for every special education student in the state based on services received, as reported by the 2002 California Special Education Management Information System (CASEMIS), in alignment with 2001-02 personnel and salary data (2002-03 personnel data were not available at the time of analysis). Personnel categories were aligned with services, and a staff-student ratio was derived based on the services received. These ratios, along with the average statewide personnel compensation cost, were used to calculate a cost per service. In addition, standard multipliers were used to uniformly apply non-personnel and administrative costs. The methodology for estimating costs is described in detail in Chapter 4.

Using these estimates, we identified the number of high cost students in each SELPA and generated the total cost of high cost students in each SELPA. SELPAs with excess high costs were determined by subtracting the average statewide cost of serving high cost students from individual SELPAs' net high cost. The research team also examined each SELPA's state special education revenues in relation to what the revenues would be at the statewide AB 602 target rate. Incidence multipliers for each SELPA were then calculated by dividing the SELPA's excess high cost by the estimated revenue at the statewide target rate. SELPAs that received incidence multipliers above 1.0 were eligible to receive severity adjustment funds, depending upon the revenues generated by their AB 602 rate. Chapter 5 describes the steps of this model and provides statewide and SELPA level results.

### *Examine Current Severity Adjustment*

In order to understand the changes that have occurred since the previous study in 1998, we also examined the existing Special Disabilities Adjustments and SELPA funding levels from 1998 to 2002. This included tracking supplemental funds that SELPAs have received due to the severity service multipliers in the current model as well as total special education funding. We also believed it was important to assess changes in the special education population and intensity of service levels

that may have occurred since the implementation of the severity funds. In the prior final report, we suggested that the state may wish to audit SELPAs that appear to be disproportionately increasing services, using the year prior to the severity adjustments as a baseline. While we considered it unlikely that a SELPA would intensify certain services in order to increase its severity service multiplier, we examined the service patterns across SELPAs based on 1996, 1999, and 2002 CASEMIS data. We have also analyzed the rates of identification of disabilities over time to determine what changes occurred during the review period.

### *Alternative Proxy Measures*

One inherent drawback of the severity service model is that it relies upon data about a population of students that SELPAs have already identified as having disabilities. Therefore, reporting differences due to varying identification practices among SELPAs cannot be entirely avoided. Examining CASEMIS data alone, it is difficult to disentangle exogenous factors (i.e., measures that are outside the identifying agency's locus of control) from those that are endogenous (i.e., those within local control).

Accordingly, we explored the feasibility of alternative proxy measures for severity. We first examined the Census Mapping Database to search for alternative indicators of incidence by type and severity. Through the National Center for Education Statistics (NCES), data available through the 2000 U.S. Census are converted to be applicable to school district boundaries. The Census Mapping Database provides information on certain disabilities for various age groups, and we extracted data on children ages 5-15. However, members of the Stakeholder Committee established for this study (see below) looked at a sample of districts across their SELPAs and believed the data were inaccurate. Therefore, this measurement was dropped. We also examined the possibility of analyzing birth certificate data, as recorded by doctors, which would indicate abnormal medical conditions at birth that might result in a disability. However, the stakeholders discussed the possibility of using these data and uniformly expressed their belief of that the data are unreliable for determining severity, particularly as many disabilities are not identified at birth.

### *Alternative Models*

CASEMIS, the primary database used for this study, is a powerful tool with a wealth of information. However, we encountered numerous challenges in analyzing and utilizing these data (e.g., inability to clearly determine a primary placement and confusion between services), which raised questions about the reliability and accuracy of the data for the purpose of this study. For these reasons, we also explored and developed three possible alternative approaches to the severity service model. One approach utilized poverty as an alternative proxy measure for disability. However, the stakeholders judged this model unsuitable for identifying high cost special education students. The research team produced two additional cost models: the disability-based model and the CASEMIS-based disability model. The disability-based model assigned an average expenditure for each primary disability category, irrespective of services received, based on national data from the Special Education Expenditure Project (SEEP), 1999-2000. The CASEMIS-based disability cost model uses CASEMIS data to derive an average cost per disability by placement, plus any additional costs of designated instructional services (DIS). A single placement cost was associated with preschool students, with the cost of DIS added to the placement cost. Students in nonpublic

schools were assigned a fixed amount, irrespective of their disability category. An overview and results of these simulations are presented in Chapter 6.

### *State-Level Advisory Group*

As required in the Request for Proposals, the research team met with a state-level Advisory Group to provide updates on the project on a regular basis. This group consisted of staff from the three interested agencies in this project and was assembled by Carol Bingham. The members of this group were: Carol Bingham (the Project Monitor) and Kimberly McDaniel of the CDE, Paul Warren of the Legislative Analyst Office, and Heather Carlson and Dan Troy of the Department of Finance. The research team met with this group on February 24, April 7, and June 12, as well as corresponded via e-mail and phone as needed.

### *Stakeholder Committee*

To provide expert input on all aspects of the project, AIR assembled a Stakeholder Committee that included representatives from various educational agencies at the state and local levels. This group assisted the study team in identification of relevant issues and in gathering necessary information, and provided expert guidance that was crucial to many important decisions made throughout the study. Members included the following people and respective agencies:

- Mark Allen, Director of Fresno SELPA
- Larry Belkin, Chief of Special Education Services, Orange County Department of Education
- Carol Bingham, Manager, Budget Management and Fiscal Systems Analysis Office, California Department of Education Fiscal and Administrative Services Division
- J. Sarge Kennedy, Assistant Superintendent, Student Programs and SELPA Operations, Tehama County Department of Education
- Jack Lucas, SELPA Director, East San Gabriel Valley SELPA
- Kimberly McDaniel, Education Programs Consultant, California Department of Education Special Education Division
- Kay McElrath, Budget Supervisor, San Diego Unified School District
- Mark Shrager, Deputy Budget Director, Los Angeles Unified School District
- Julie Williams, Staff Services Analyst, California Department of Education Special Education Fiscal Services

The Stakeholder Committee met in Sacramento four times during the project, on March 11, April 7, April 29, and June 12. In addition, conference calls were conducted on June 27, July 1, July 3, and July 17. The minutes for each of the meetings and conference calls were submitted to the CDE in the monthly reports.

## Overview of Report

The remainder of this report is organized in seven chapters that address the research questions posed for this study. Chapter 2 provides an analysis of change over time in SELPA revenues as well as changes in the identification of disabilities and service provision patterns. Chapter 3 addresses the variations in the incidence of severe and/or high cost students across California. Chapter 4 describes the severity service model approach, delineating the process of identifying and calculating the costs of special education placements and services. Chapter 5 describes in detail the severity service model and the steps taken to derive adjustment multipliers using the cost estimates in Chapter 4. Chapter 6 provides a discussion of some of the advantages and disadvantages of using CASEMIS data for the purpose of the severity adjustment. Chapter 7 provides descriptions of three approaches developed as potential alternatives to the severity service model. Chapter 8 presents the study team's recommended approach, implementation options, and suggests several ways in which CASEMIS might be strengthened for these types of cost and other policy applications.

# CHAPTER 2: CHANGE OVER TIME

## Introduction

In order to understand the changes in California's special education population that have occurred since the previous study in 1998, the research team conducted several longitudinal analyses. The study team examined the effects of the previous study's adjustment methodology on SELPA revenues, as well as changes in the identification of disabilities and service provision patterns between 1996 (two years prior to the implementation of the AB602 and adjustment funds) and 2002. This chapter presents the results from these analyses.

Many of the exhibits in this chapter delineate between SELPA groups. The 115 SELPAs across the state have been further divided into three groups according to the severity multipliers developed in the 1998 study. A multiplier above 1.0 indicates that the SELPA was responsible for a disproportionate number of high cost students and was therefore eligible for the Special Disabilities Adjustments (SDA) funds. Based on the previous study's approach, 44 SELPAs had severity multipliers above 1.0, although 10 eligible SELPAs generated AB 602 revenues in excess of the statewide average that canceled out the costs of serving high cost students and therefore did not receive a funding adjustment (see Appendix A). Thus, 34 SELPAs received severity funds, 10 SELPAs had a multiplier above 1.0 but no severity funds, and 71 SELPAs did not qualify for an adjustment multiplier. Exhibit 2-1 presents these SELPA groups.

**Exhibit 2-1. SELPA Groups According to the 1998 Severity Multipliers**

| SELPA Group | Number of SELPAs |
|---|---|
| All SELPAs | 115 |
| No adjustment or multiplier | 71 |
| Adjustment and multiplier | 34 |
| Multiplier, no adjustment | 10 |

The purpose for grouping SELPAs in such a manner is to determine what changes occurred over time in disability identification and service provision in SELPAs that were considered severe in the 1998 study (i.e., the 44 SELPAs that received a severity multiplier) and SELPAs that were not considered severe (71 SELPAs). How have these groups changed over time and in relation to each other? This question is addressed in the second and third sections of this chapter.

This chapter is organized into three sections. The first section provides a fiscal analysis of SELPA SDA funding data. The second section examines changes in the special education population statewide and by SELPA group. An analysis of special education placements and services across the six years is presented in the third section. Trends in the number of students in nonpublic schools and preschool students are also included.

## Analysis of the Special Disabilities Adjustment

The team was charged with answering the research question, "What are the effects of the adjustment methodology and the particular incidence multiplier factors used on SELPA funding levels in the existing model?" This question refers to the severity adjustment methodology developed in the prior 1998 study and the corresponding multiplier factors that were subsequently incorporated into the funding formula (SB 1564, Chapter 330, Statutes of 1998). The research team sought to understand how the funding model and the severity funds–known as the Special Disabilities Adjustment (SDA)–have impacted SELPA revenues over time.

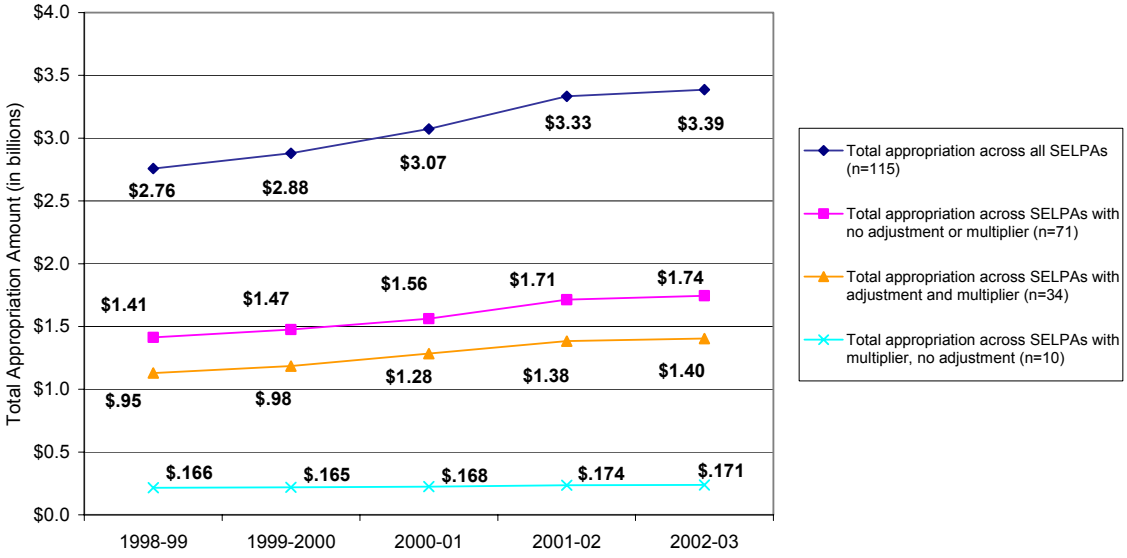
To do so, we analyzed SDA data for years 1998-99 through 2002-03 obtained from the California Department of Education (CDE). These data provide the special education appropriation amounts for all SELPAs across the state,[3] entitlement amounts for the SDA, and actual SDA amounts appropriated for the 34 SELPAs receiving an adjustment. For the purposes of this analysis, only a portion of the total special education appropriation is included: the Chapter 854, Statutes of 1997 (AB 602) Base, Federal IDEA Part B K-12 funds, Local Special Education Property Taxes, Cost of Living Adjustment (COLA), Equalization, Growth, and SDA funds.[4] All figures in the following graphs have been adjusted to 2002-03 dollars, according to the Cost of Living Adjustment (COLA).

[3] For the purposes of this study, the fiscal analysis does not include data for the L.A. Court Schools SELPA.

[4] For the purposes of this analysis, the following appropriation amounts are excluded: Program Specialist/Regionalized Services, Low Incidence Materials & Equipment, Nonpublic Schools/Licensed Children's Institutions, Nonpublic Schools Extraordinary Cost Pool, and for 2002-03, Adjustment for Necessary Small SELPAs with Declining Enrollment.

Exhibit 2-2 shows the total special education appropriation across SELPAs, adjusted to 2002-03 dollars. The appropriation is shown across all SELPAs in the state, SELPAs without an adjustment multiplier, SELPAs with a multiplier value above 1.0 in the 1998 study but no adjustment funds, and SELPAs receiving adjustment funds. The statewide appropriation exhibited increasing annual growth from 1998-99 onwards and leveled off in 2001-02. In 2002-03, the statewide special education appropriation stood at $3.4 billion, up from $2.8 billion in 1998-99.

**Exhibit 2-2. Total Special Education Appropriation*, Adjusted to 2002-03 Dollars, 1998-99 to 2002-03 (in Billions of Dollars)**




* This Appropriation includes AB 602 Base, COLA, Equalization, Growth, SDA, Federal IDEA Part B K-12 Funds, and Local Special Education Property Taxes.

Exhibit 2-3 shows the SDA entitlement and appropriation amounts across the 34 SELPAs that received an adjustment. The SDA appropriation increased by over 100 percent between 1998-99 and 1999-2000 ($17.5 to $35.5 million), and by about 114 percent the subsequent year ($35.5 to $75.9 million). Following these jumps, the SDA increased only slightly by about 3 percent in the two following years. It is important to put these escalations in the context of the SELPAs' entitlement to adjustment funds. While the increases in the appropriation appear dramatic in the first two years, the adjustments were gradually phased in, and SELPAs were not fully funded until 2000-01. The SDA entitlement, in contrast, decreased slightly from 1998-99 to 2000-01, and then rose only slightly in the following years.

**Exhibit 2-3. Special Disabilities Adjustment Appropriation and Entitlement Amounts, Adjusted to 2002-03 Dollars, 1998-99 to 2002-03 (in Millions of Dollars)**

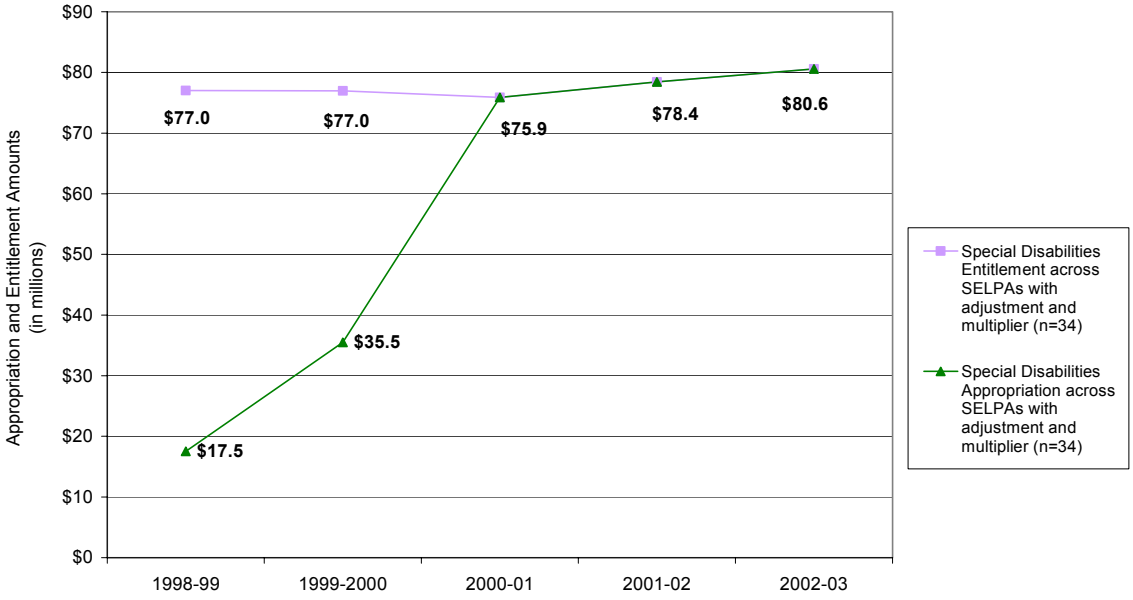
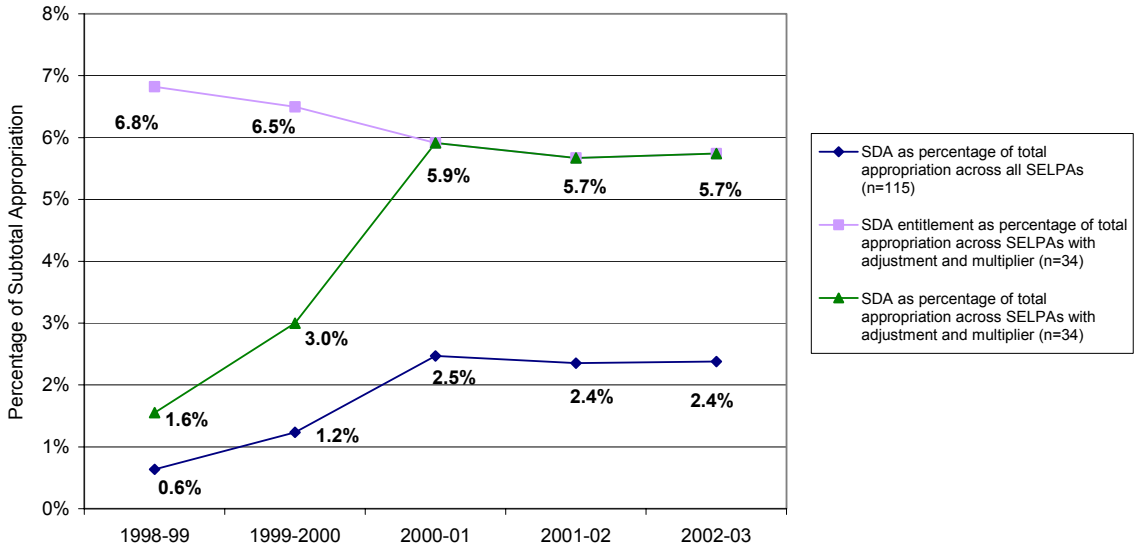


Exhibit 2-4 shows the SDA entitlement and appropriation as a percentage of the total special education appropriation. The SDA entitlement as a percentage of the total appropriation decreased the first four years and remained steady after 2001-02. Across all years of analysis, the entitlement hovered between 6 and 7 percent of the special education appropriation in SELPAs receiving the adjustment. The SDA appropriation is shown in two respects: as a percentage of the appropriation across the SELPAs receiving the adjustment and as a percentage of the appropriation across all SELPAs in the state. As shown, the percentage of SDA appropriation increased rapidly from 1998-99 to 2000-01, when it reached the entitlement level, and then showed only slight changes in the following two years. While the SDA comprised only a small proportion (2.4 percent) of the statewide special education funding in 2002-03, it contributed to almost 6 percent of the funding levels of SELPAs receiving the adjustment.

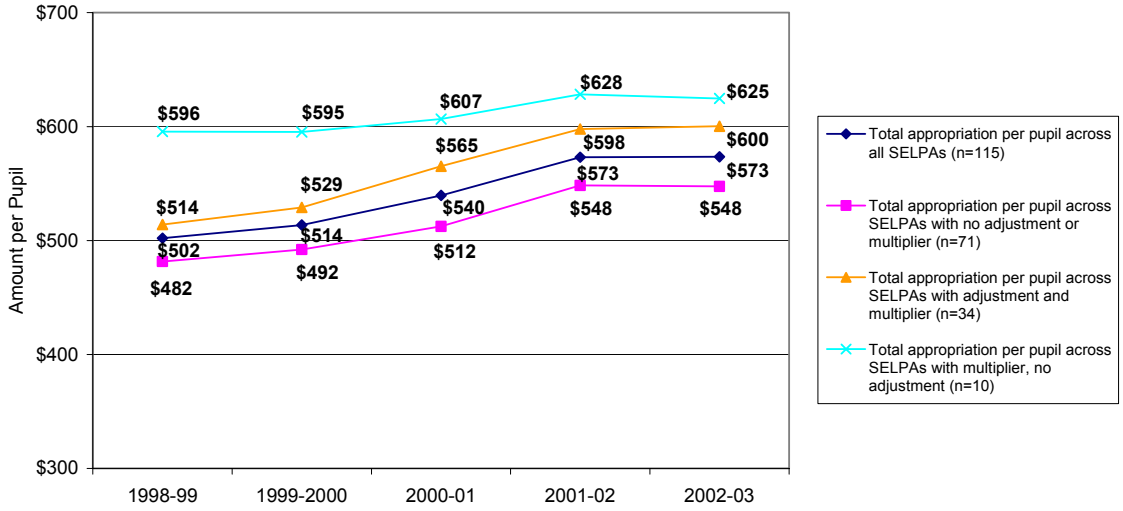
**Exhibit 2-4. Special Disabilities Adjustment Appropriation and Entitlement as Percentage of Total Special Education Appropriation*, 1998-99 to 2002-03**




* This Appropriation includes AB 602 Base, COLA, Equalization, Growth, SDA, Federal IDEA Part B K-12 Funds, and Local Special Education Property Taxes.

Exhibit 2-5 shows the total special education appropriation per average daily attendance (ADA) for 1998-99 to 2002-03. Across all SELPA groupings, the amount per pupil increased each year up to 2001-02, and then leveled off.. The average total appropriation per pupil among SELPAs receiving an adjustment is about 7 to 10 percent higher than among those without multipliers across the years shown.

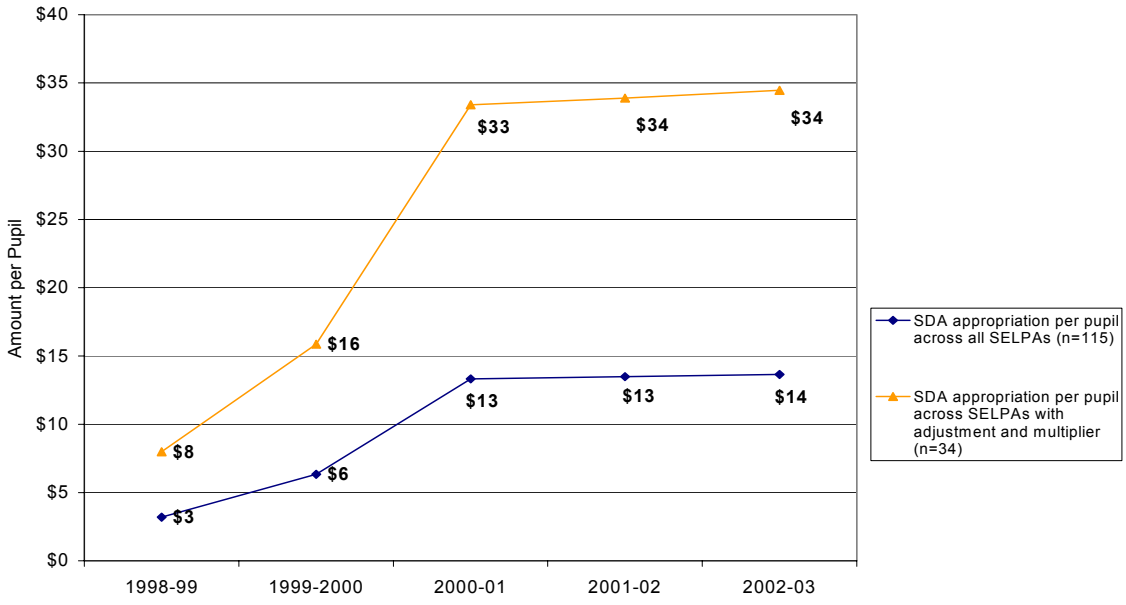
**Exhibit 2-5. Total Special Education Appropriation* per Pupil, Based on Average Daily Attendance, Adjusted to 2002-03 Dollars, 1998-99 to 2002-03**




* This Appropriation includes AB 602 Base, COLA, Equalization, Growth, SDA, Federal IDEA Part B K-12 Funds, and Local Special Education Property Taxes.

While the previous exhibit looks at the total special education appropriation, Exhibit 2-6 shows the SDA appropriation per ADA across the years, inflated to 2002-03 dollars. These amounts increased by about 100 percent from 1998-99 to 1999-2000, and by about 110 percent the following year. Following these large climbs, the SDA amount per ADA leveled off and increased by about 1 percent each year. In SELPAs receiving the adjustment, the SDA in 2002-03 is almost 6 percent of the total appropriation per ADA shown in Exhibit 2-4 (or $34 of $600). In 2002-03, among the SELPAs receiving the adjustment, the SDA amount per ADA ranges from $.20 to $134.

**Exhibit 2-6. Special Disabilities Adjustment Appropriation per Pupil, Based on Average Daily Attendance (ADA), Adjusted to 2002-03 Dollars, 1998-99 to 2002-03**




These exhibits show that the SDA comprises a small percentage of the total appropriation for special education—less than 2.5 percent in 2002-03. The increase in SDA over time appears substantial, but that is due to SELPAs receiving the total amount of their entitlement after being underfunded for two years. While the average severity funding per ADA appears to be a small investment, SELPAs received between $18,000 and $25 million in supplemental funding in 2002-03 to offset the costs of serving high cost students.

## Analysis of Special Education Disability Categories

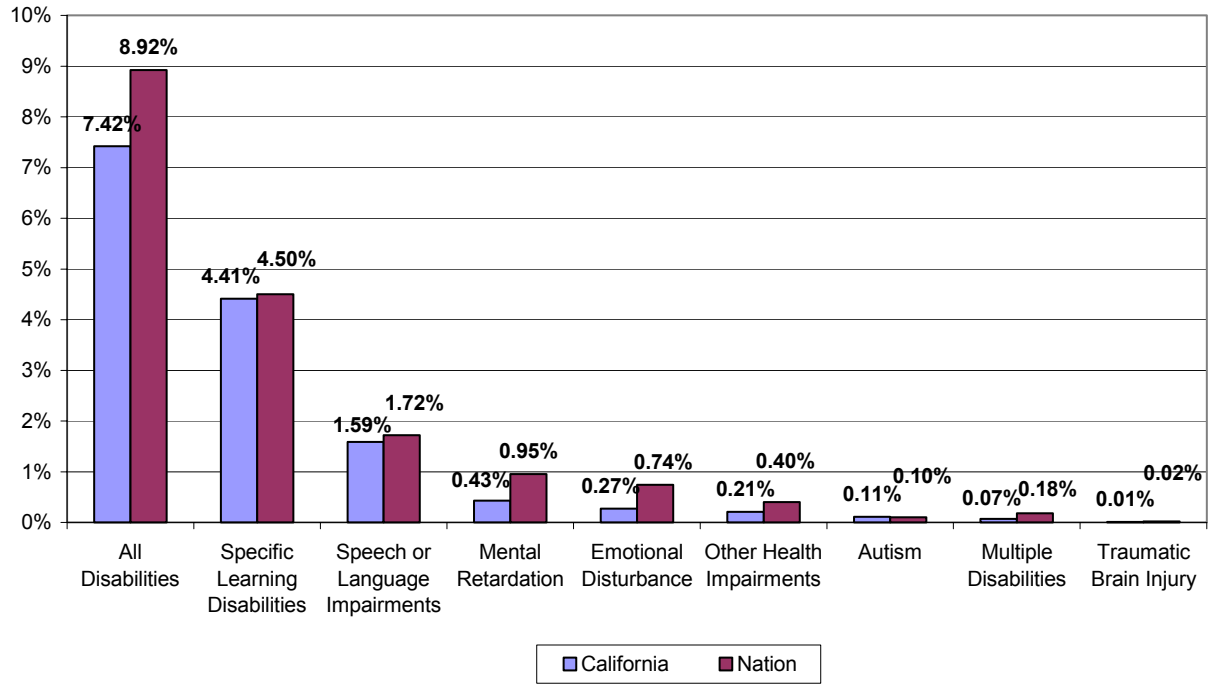
This section of the chapter looks at the counts of special education students by disability category using three separate data sources. The first analysis uses federal data,[5] which allow for a comparison between California and the nation. We look at differences in the disability counts in 1999-2000, the most recent year of data available, as well as the change in the proportions over time. The second data source is California Special Education Management Information System (CASEMIS), which gives a more detailed look at the special education population in California.[6] We conducted various types of analyses using the CASEMIS data, including examining the counts and proportions in each disability category for all SELPAs and also by SELPA groups according to whether the SELPAs were considered "severe" in the previous study and received severity adjustments (as described in the introduction to this chapter). These analyses allow us to observe the changes that have occurred since AB 602 and the severity funding approach of 1998, and how the SELPA groups have changed over time in the types of disabilities identified. Finally, we use data on low incidence disabilities obtained from the CDE to see changes in the counts of low incidence disabilities over the years in relation to average daily attendance (ADA).[7]

[5] *The 20th-23rd Annual Reports to Congress on the Implementation of the Individuals with Disabilities Act.*
[6] 1996, 1999, and 2002 CASEMIS (December version).
[7] AB 602 ADA data and Low Incidence data obtained from the Special Education Fiscal Services, California Department of Education.

## *California and the Nation: Federal Data*

The following analysis uses federal data to compare the percentage of the resident population with disabilities in California and the nation in 1999-2000. The disabilities are presented in two groups in order to display the trends more clearly. The first group of disabilities, as shown in Exhibit 2-7, includes those that have not been classified by the California Education Code as low incidence.[8] California has a slightly lower percentage than the nation in every disability category. The category that exhibits the largest difference in proportionate terms is Emotional Disturbance, which makes up 0.27 percent of the population in California and 0.74 percent of the nation's population. For all the disabilities combined, California's proportion is 1.5 percent lower than the national proportion (7.42 versus 8.92 percent. See Exhibit 2-9 for total special education enrollment in California and the nation).

**Exhibit 2-7. Percentage of Resident Population Ages 6-21 with Disabilities Not Categorized as "Low Incidence," California and the Nation, 1999-2000[1]**

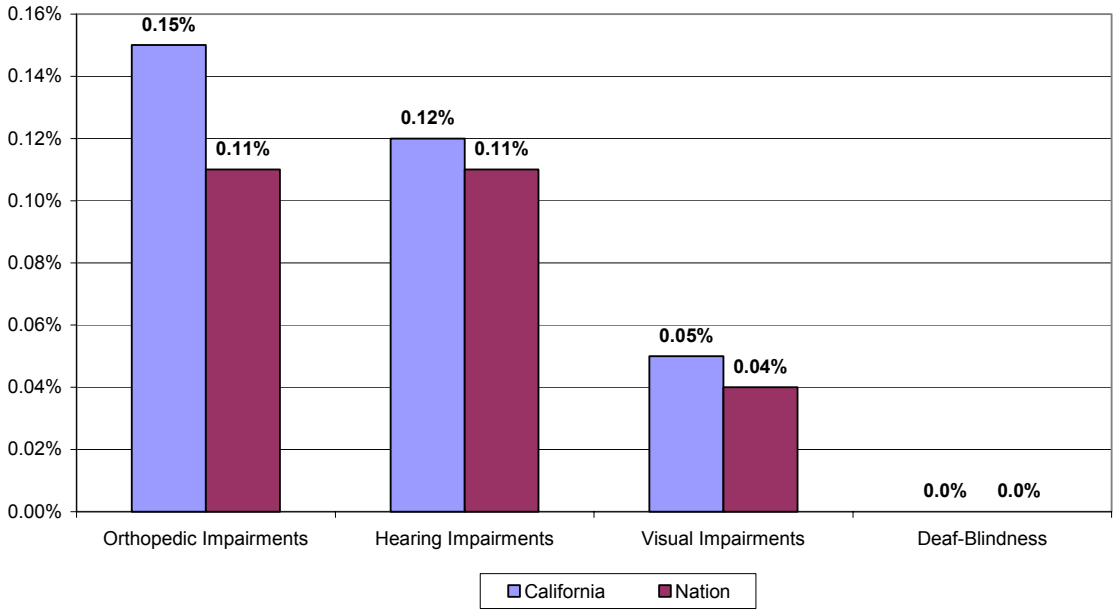



Sources: *The 20th-23rd Annual Reports to Congress on the Implementation of the Individuals with Disabilities Education Act.*

[8] California Education Code (56026.5.) defines low incidence disabilities to include the following severe disabling conditions: hearing impairments, vision impairments, and severe orthopedic impairments, or any combination thereof.

The percentage of students with disabilities that are classified as low incidence (California Education Code 56026.5) in California and the nation in 1999-2000 are presented in Exhibit 2-8. In contrast to the prior exhibit, California has a slightly higher percentage of the population with low incidence disabilities for all of the categories, except Deaf-Blindness. However, these differences in low incidence disabilities are small, with the Orthopedic Impairment category showing the largest difference of only 0.04 percent.

**Exhibit 2-8. Percentage of the Resident Population Ages 6-21 with "Low Incidence" Disabilities, California and the Nation, 1999-2000***




Sources: *The 20th-23rd Annual Reports to Congress on the Implementation of the Individuals with Disabilities Education Act.*

* California Education Code (56026.5.) defines low incidence disabilities to include the following severe disabling conditions: hearing impairments, vision impairments, and severe orthopedic impairments, or any combination thereof.

Exhibit 2-9 and 2-10 compare special education enrollment over time in California and the nation by looking at changes in the total count of disabilities and changes in disabilities as a percentage of total special education enrollment. Although we see that the increases in total special education enrollment in California and the nation are similar (10.2 percent and 8.5 percent respectively), the percentage changes in the disability proportions are often different. For example, between 1996 to 1999, the proportion of the special education population in the Mental Retardation category *increased* by 4.2 percent in California, in comparison to a *decrease* of 4.6 percent across the nation. Another difference is the *increase* of Emotional Disturbance by 3.2 percent in California, while the same disability category *decreased* at the national level by 3.1 percent. In other instances where the direction of the change is the same, the magnitude of the change is very different at the state and national level. For instance, the Other Health Impairment category increased as a proportion of the population in the nation by over twice the change that was seen in California (45.6 versus 15.8 percent). As apparent in Exhibit 2-10, the changes in California's population in terms of special education students are often different in direction and magnitude than the changes at the national level.

**Exhibit 2-9. Percentage Change Over Time in Special Education Enrollment, California and the Nation, 1996-97 to 1999-2000**

| | 1996 | 1999 | % Change from 1996 to 1999 |
|---|---|---|---|
| California | 528,273 | 582,324 | 10.2% |
| Nation | 5,224,328 | 5,666,415 | 8.5% |

Sources: *The 20th-23rd Annual Reports to Congress on the Implementation of the Individuals with Disabilities Education Act.*

**Exhibit 2-10. Percentage Change in Disabilities as a Proportion of the Total Special Education Population, California and the Nation, 1996-97 to 1999-2000**

| Disability category | % Change from 1996 to 1999, California | % Change from 1996 to 1999, Nation |
|---|---|---|
| Mental Retardation | 4.2% | -4.6% |
| Hearing Impairments | -2.3% | -3.9% |
| Speech or Language Impairment | -0.7% | -4.5% |
| Visual Impairment | -7.1% | -5.2% |
| Emotional Disturbance | 3.2% | -3.1% |
| Orthopedic Impairment | -3.2% | -1.0% |
| Other Health Impairment | 15.8% | 45.6% |
| Specific Learning Disability | -1.8% | -1.2% |
| Deaf-Blindness | -14.4% | 33.7% |
| Multiple Disabilities | -4.5% | 4.5% |
| Autism | 94.2% | 76.9% |
| Traumatic Brain Injury | 33.5% | 23.2% |

Sources: *The 20th-23rd Annual Reports to Congress on the Implementation of the Individuals with Disabilities Education Act.*

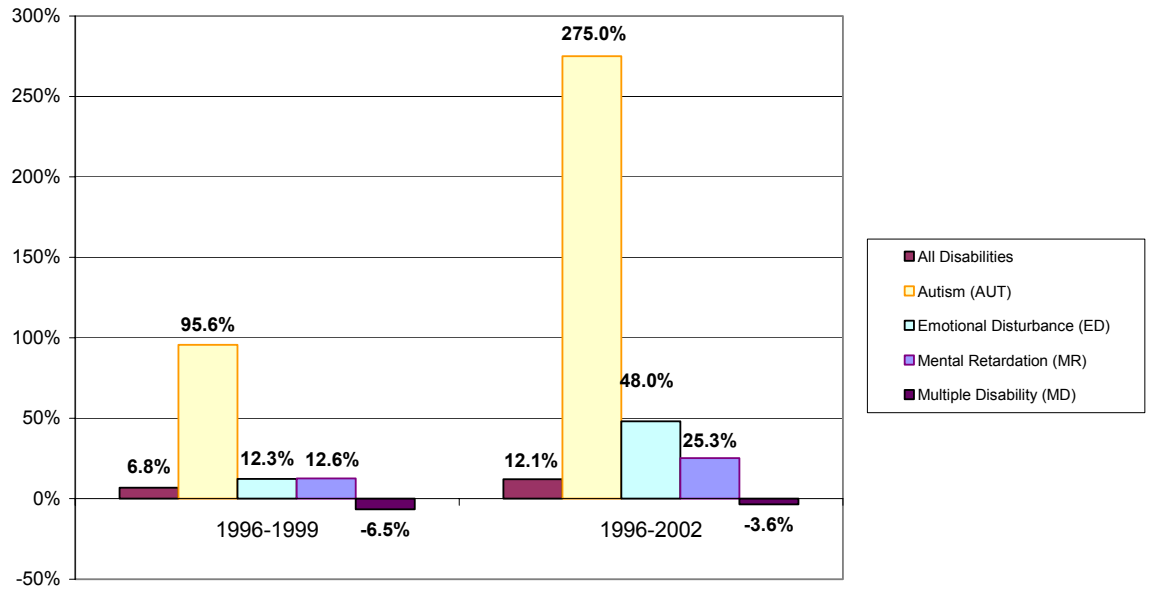
## *Changes by Disability Category: CASEMIS*

### Statewide

While the previous exhibits show that California and the nation had similar proportions of the resident population with disabilities in 1999-2000, this section uses CASEMIS data to take a closer look at the special education population in California.[9] Counts by disability are presented in Appendix B. Disabilities that are not categorized as "low incidence" are shown first, and have been divided into two groups (Group A and B) in order to display their trends more clearly.

Exhibits 2-11 and 2-12 present the percentage change over time in the number of students in each category. The percentage change of all disabilities combined (including "low incidence" disabilities) is included in Exhibit 2-11 to allow for a comparison between the changes seen in individual disability categories and the overall average. We can see that the average percentage change in total disability counts in California is reasonably low and steady (6.8 percent increase from 1996 to 1999 and 12.1 percent increase from 1996 to 2002). However, many individual disability counts show much greater volatility and growth than the overall percentage change.

**Exhibit 2-11. Percentage Change in the Number of Students with Disabilities Not Categorized as "Low Incidence" in all SELPAs, 1996 to 1999 and 1996 to 2002, Group A**



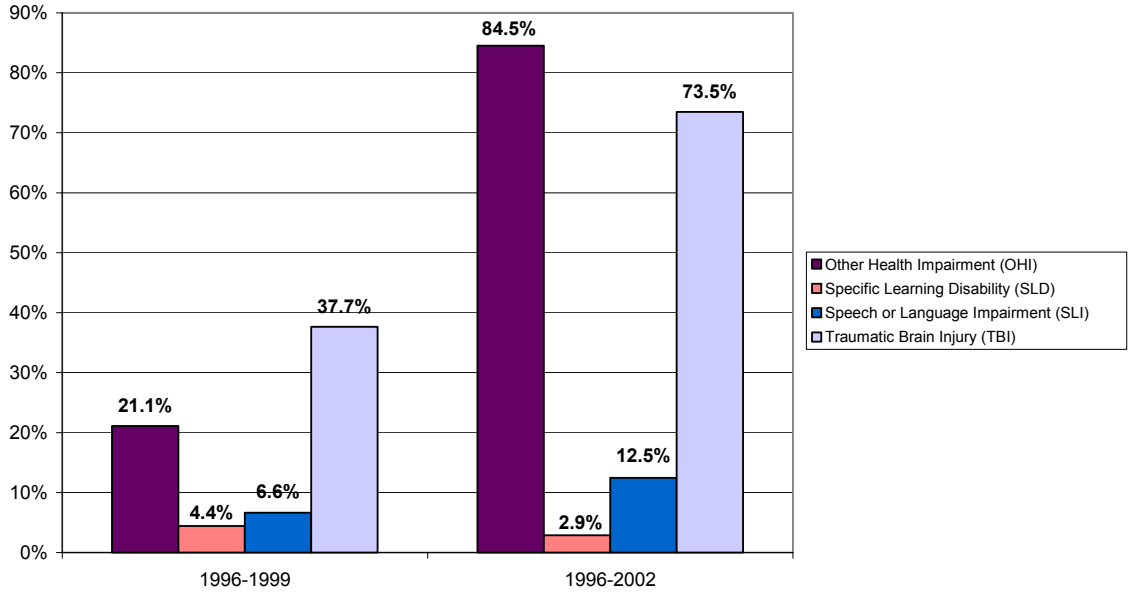

The most dramatic change by disability category is Autism, which grew by 95.6 percent from 1996 to 1999 and by 275.0 percent from 1996 to 2002. This striking growth rate indicates that the number of students that are being identified as autistic has been nearly doubling every three years. Another disability in this exhibit to show large growth is Emotional Disturbance, which increased by 48

[9] The counts of students by disability include students ages 6-22 and excludes the LA County Court SELPA, California State Special Schools, California Youth Authority, California Department of Developmental Services, private and parochial schools students, and NPS students.

percent from 1996 to 2002. Multiple Disability is unusual in that it is the only category to have a decrease in the number of students over the years.

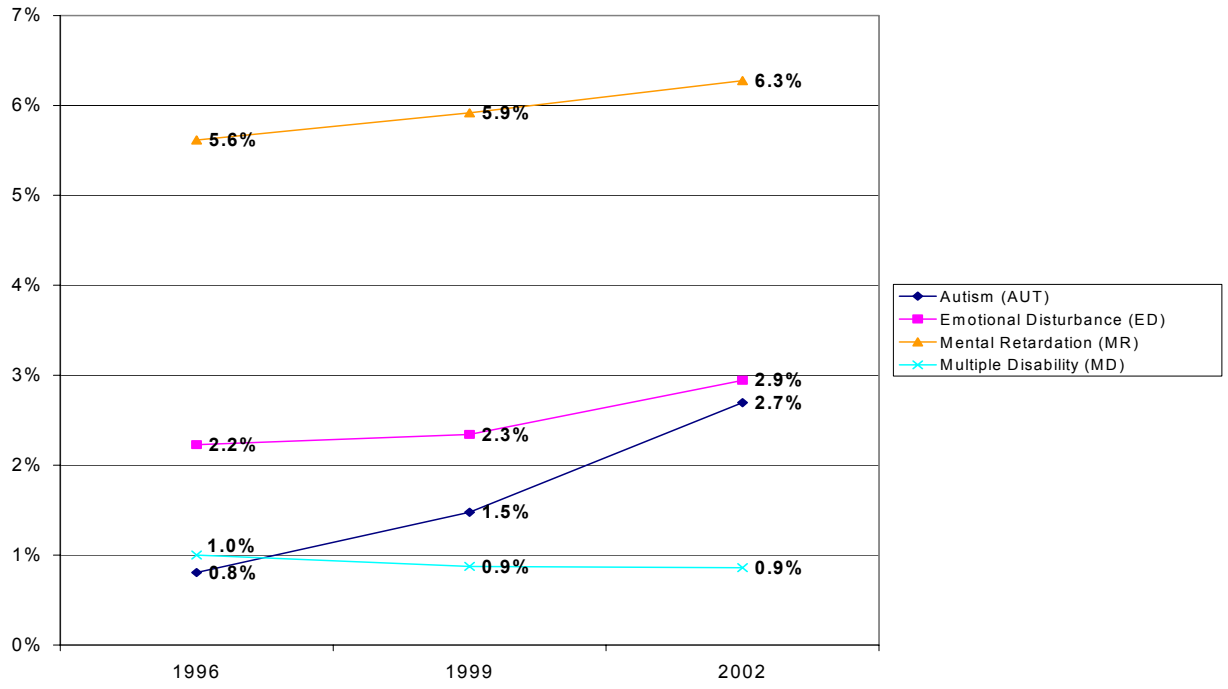
The most notable percentage growth in the second group of disabilities (shown in Exhibit 2-12) is seen in the number of students with Other Health Impairments (OHI), a relatively broad-based disability category. The counts of OHI grew by 21.1 percent from 1996 to 1999 and by 84.5 percent from 1996 to 2002, which is much larger than the average percentage change seen in all disability categories combined. The growth in OHI, along with other select disability categories that exhibit large statewide growth, is explored later in this section to show trends between SELPA groups. Another category to exhibit a large increase was Traumatic Brain Injury; however, no firm conclusions can be drawn from this increase due to the small number of students in this category (818 students in 1996 to 1,126 in 2002). Specific Learning Disability (SLD) showed a slightly less than average growth of 4.4 percent from 1996 to 1999 and then continued to grow at a slower rate of 2.9 percent from 1996 to 2002.

**Exhibit 2-12. Percentage Change in the Number of Students with Disabilities Not Categorized as "Low Incidence" in all SELPAs, 1996 to 1999 and 1996 to 2002, Group B**



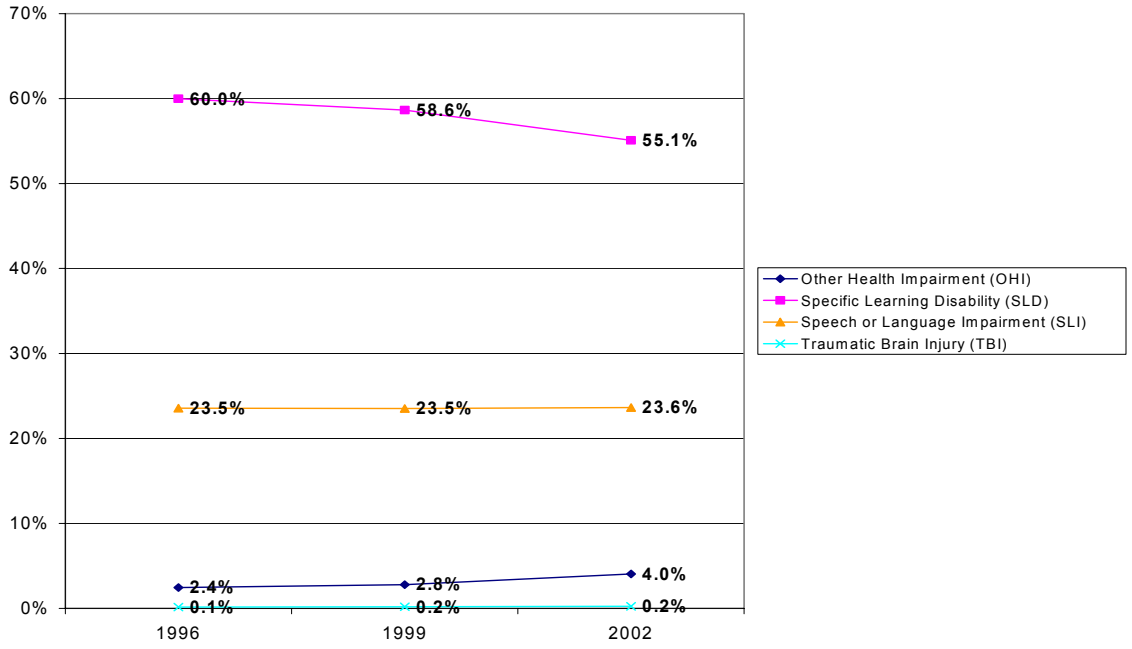
In order to better understand the percentage changes in the number of students, Exhibit 2-13 and 2-14 control for overall enrollment growth by presenting each disability category as a percentage of the total special education population in California in 1996, 1999, and 2002. The proportion of Autism jumped from 0.8 percent to 2.7 percent of the total population – an increase of nearly 238 percent. The large percentage growth (25.3 percent) that was previously seen in the counts of Mental Retardation (MR) is not as dramatic when taken as a percentage of the total special education population. From 1996 to 2002, the proportion of MR grew by only 12.5 percent. Emotional Disturbance, however, still exhibits large growth, going from 2.2 percent to 2.9 percent of the population, a growth of approximately 32 percent. Multiple Disability is still unusual in that the proportions slightly decrease from 1996 to 2000.

**Exhibit 2-13. Students with Disabilities Not Categorized as Low Incidence as a Percentage of the Total Special Education Population Ages 6-22, Group A**



The second group of disabilities is presented in Exhibit 2-14 and once again, we see a large increase in Other Health Impairments. This category represented 2.4 percent of the special education population in 1996, but then jumped to 4.0 percent in 2002 – an increase of 67 percent. Although Specific Learning Disabilities (SLD) makes up the majority of the special education population, this category has been declining proportionately since 1996 (60.0 percent in 1996 and 55.1 percent in 2002). This decline is in spite of the slight percentage growth in the number of SLD students that we saw in Exhibit 2-12, which suggests that the number of SLD students is not growing as fast as the total special education population.

**Exhibit 2-14. Students with Disabilities Not Categorized as Low Incidence as a Percentage of the Total Special Education Population Ages 6-22, Group B**



The following two exhibits present the changes over time in disabilities that are categorized as low incidence. In Exhibit 2-15, we see that growth in the number of students with these disabilities is a fairly steady increase from 1996 to 1999 and 1996 to 2002 in most categories. The only unusual trend is in the Deaf-Blindness category, which dropped by 10 percent from 1996 to 1999 and then rose to 10.7 percent in 2002. The volatility is potentially due to the low counts in this category; in 1996, there were only 150 students with Deaf-Blindness, which declined to 135 in 1999 and increased to 166 in 2002. The changes since 1996 are only of 15 and and 16 students (in 1999 and 2002, respectively), making it difficult to reach any substantial conclusions regarding such a small population.

**Exhibit 2-15. Percentage Change in the Number of Students with Low Incidence Disabilities from 1996 to 1999 and 1996 to 2002 in All SELPAs**

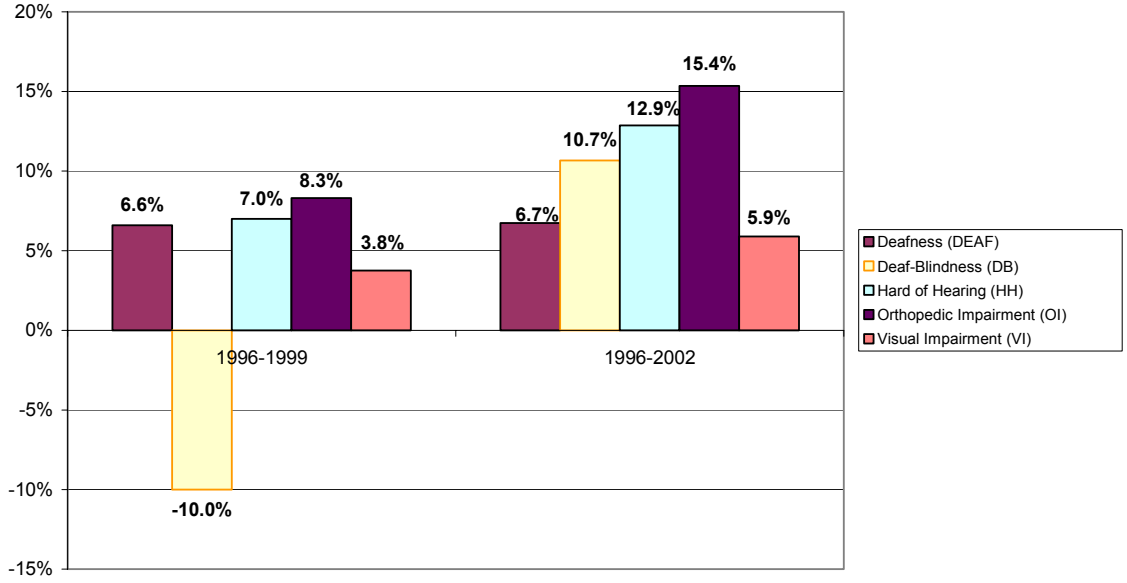
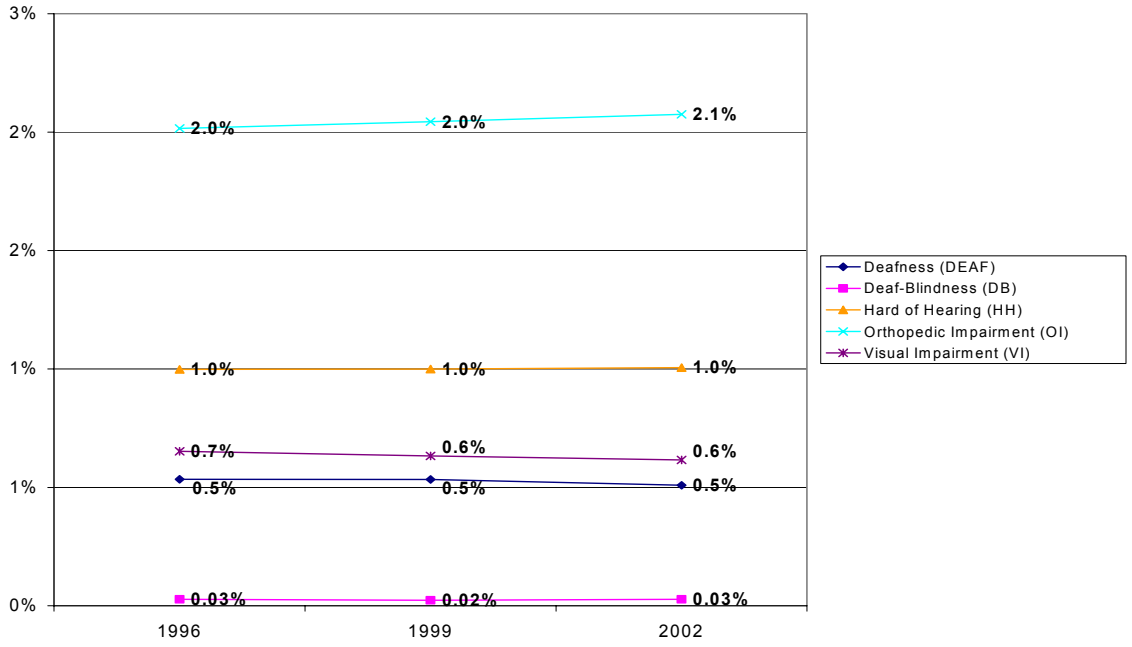


Exhibit 2-16 shows that the proportions of the low incidence disabilities as a percentage of the total population are very stable and consistent over the years. Three categories showed no change from 1996 to 2002, and only Orthopedic Impairment saw a slight increase from 2.0 percent of the special education population to 2.1 percent. This is in stark contrast to the proportional growth seen in many of the disabilities that are not categorized as low incidence. These trends indicate that the number of students with low incidence disabilities is growing at approximately the same rate as the total special education population, since the proportions do not seem to be changing.

**Exhibit 2-16. Students with Low Incidence Disabilities as a Percentage of the Total Special Education Population Ages 6-22**

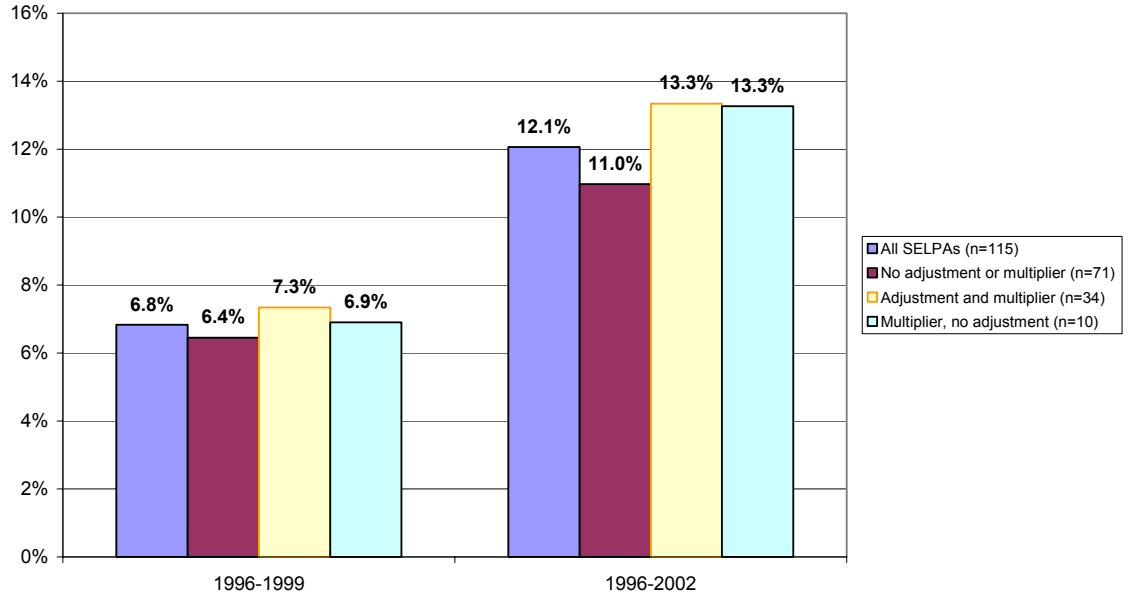


## By SELPA Group

The exhibits in this section look at the changes over time in disability categories by multiplier grouping.[10] The three groups used for these analyses are those shown in Exhibit 2-1: SELPAs that did not have a multiplier in 1998 severity service model, i.e., were not shown to be "severe" (n=71); SELPAs that had a severity multiplier and received adjustment funds (n=34); and SELPAs that had a multiplier, but received no funding adjustment (n=10). Each graph also includes the statewide percentage change across all SELPAs (n=115). This type of analysis is useful in determining how "severe" SELPAs have changed in relation to others in terms of the disability counts reported over the years. We first look at differences in the overall disability counts between the groups and then single out the individual disability categories that exhibited dramatic growth across all SELPAs, and/or those that are considered expensive disability categories (See Appendix H).[11] The counts and percentage changes for each disability category are shown in Appendix B.

Exhibit 2-17 presents the percentage change in the number of students with disabilities by SELPA group. SELPAs that were considered severe in the previous study tend to have a slightly higher percentage change than the statewide average, although overall, the percentage increases across the groups are fairly similar. For the remainder of this section, we will turn our focus to changes over time between SELPA groups in selected disabilities.

**Exhibit 2-17. Percentage Change in the Number of Students with All Disabilities from 1996 to 1999 and 1996 to 2002, by SELPA Group**

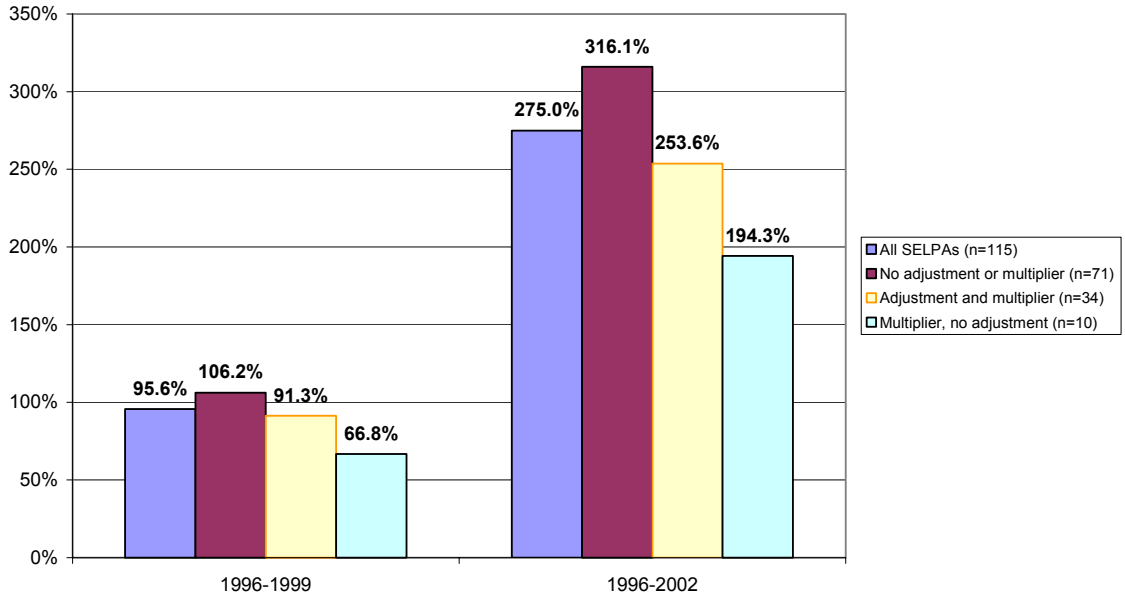



[10] Analysis was conducted by SELPA of residence.

[11] National expenditure estimates by disability category are derived from the Special Education Expenditure Project (Chambers, Shkolnik & Pérez 2003). Cost estimates by disability category werealso derived using CASEMIS data. See Appendix I for these estimates.

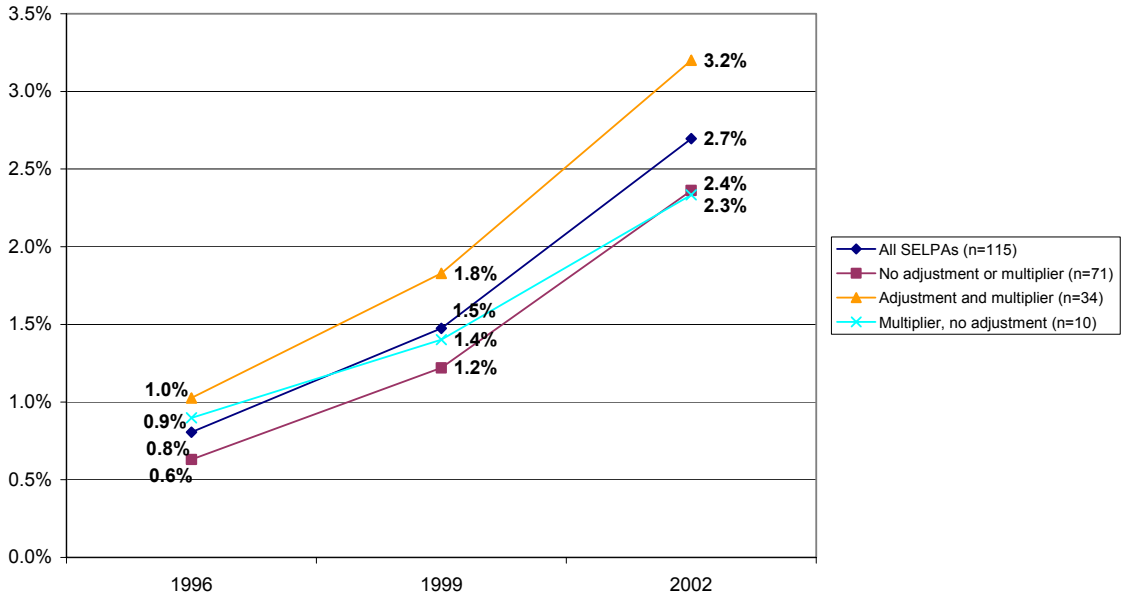
Exhibit 2-18 shows the percentage change in the number of students with Autism, a disability category that displayed the greatest percentage increase in the number of students identified and in proportion to the total special education population. Furthermore, according to cost estimates by disability type (see Appendix H), Autism and Multiple Disability (which is shown in Exhibits 2-20 and 2-21) are two of the more expensive disability categories. All three groups of SELPAs show extraordinary growth in the number of students with Autism in 1999 and 2002. The group that had the greatest growth in this disability category was the group that did not have a multiplier. These SELPAs went from 1,842 students in 1996 to 3,798 in 1999 (106.2 percent increase) and then to 7,664 students in 2002 (316.1 percent increase). As Autism is generally a more involved disability, this suggests that SELPAs that were not considered "severe" in the 1998 study now may have more severe students in relation to the other groups.

**Exhibit 2-18. Percentage Change in the Number of Students with Autism from 1996 to1999 and 1996 to 2002, by SELPA Group**



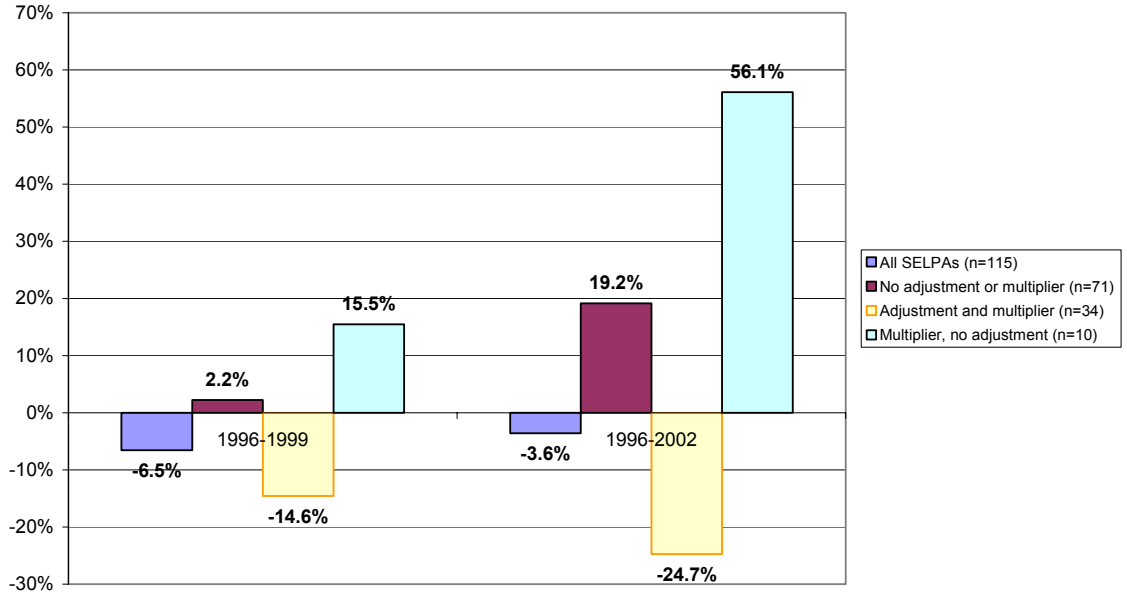
It is useful to put these large percentage changes in the number of students with Autism into the context of growth in the total special education population. We see in Exhibit 2-19 that all SELPAs show large increases in the proportions of Autism, indicating that the number of students with Autism is growing much faster than the overall special education population. The SELPAs with the highest proportion of students with Autism are those that were considered severe in the previous study and received adjustments. However, the growth over the years in proportions was similar across all SELPAs.

**Exhibit 2-19. Autism as a Percentage of the Total Special Education Population Ages 6-22, by SELPA Group**



Another disability category that is considered an expensive disability category and showed unusual overall change in the previous exhibits is Multiple Disability (MD). Exhibit 2-20 shows the percentage change in this category statewide and for each of the SELPA groups. Statewide, SELPAs show a decrease in MD of 6.5 percent from 1996 to 1999 and a slightly slower decrease of 3.6 percent from 1996 to 2002. It is the only disability category to show a statewide decline in percentage. However, as with the prior exhibit, it appears that SELPAs that were not designated as severe in the prior study may be experiencing changes in the relative severity of their special education population. This group had an increase of over 19 percent from 1996 to 2002, whereas SELPAs with the adjustment exhibited decreases (-14.6 percent in 1999 and -24.7 percent in 2002) that are far greater than the statewide decline. The smallest group of SELPAs, those that had a multiplier but did not receive an adjustment, showed growth far above the overall average (15.5 percent in 1999 and 56.1 percent in 2002).

**Exhibit 2-20. Percentage Change in the Number of Students with Multiple Disability from 1996 to 1999 and 1996 to 2002, by SELPA Group**



Once again, it is useful to account for changes in the total special education population when looking at percentage change in MD. We see that the SELPAs that received a severity multiplier and adjustment funds had a very high proportion of students with MD in 1996, but this proportion decreased significantly in 1999, when it dropped from 1.4 to 1.1 percent, and again in 2002, when it dropped to 0.9 percent. In contrast, SELPAs that did not receive adjustment funds experienced the opposite trend; students with MD increased slightly as a percentage of the total special education population. In 2002, SELPAs with the severity adjustment funds still had a higher percentage of MD students than the statewide average, but the gaps between their proportion and the other SELPA groups have been greatly reduced.

**Exhibit 2-21. Multiple Disability as a Percentage of the Total Special Education Population Ages 6-22, by SELPA Group**

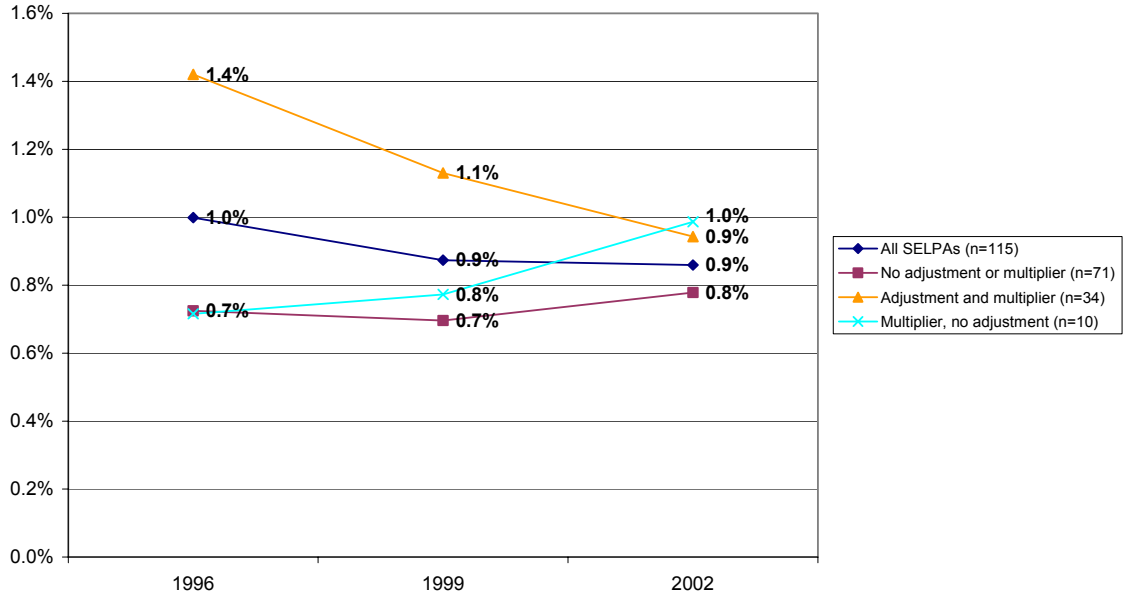
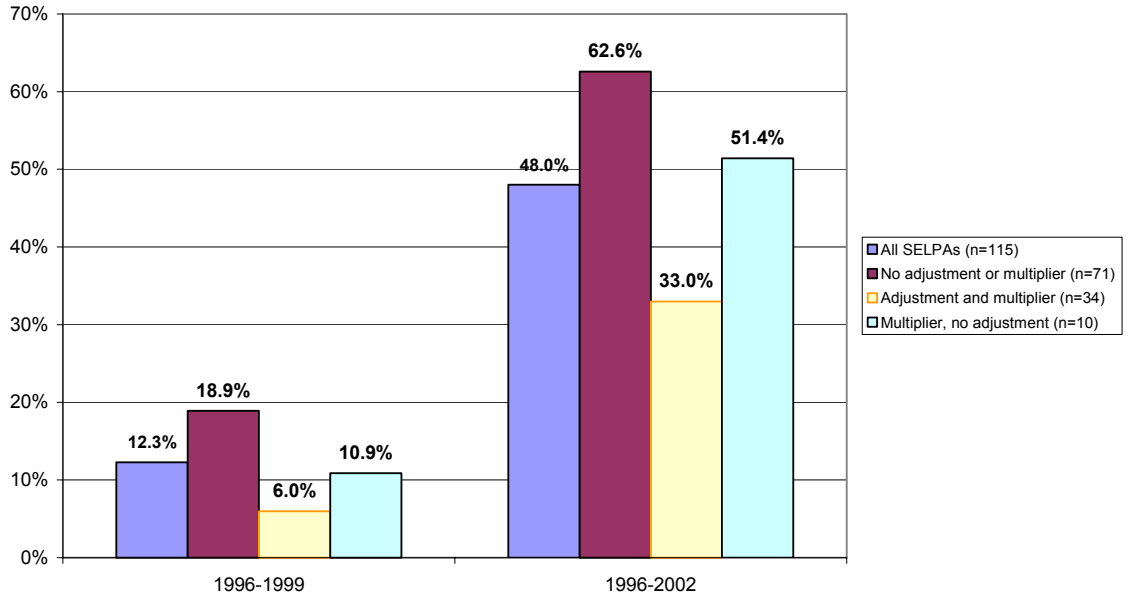


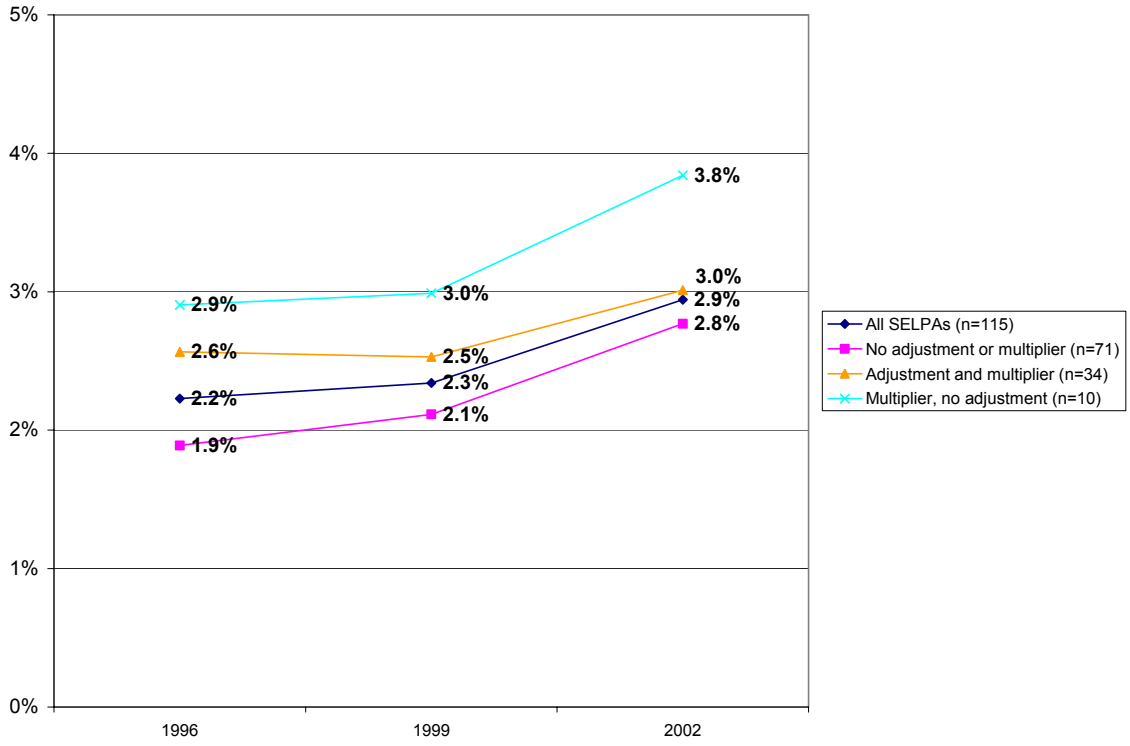
Exhibit 2-22 presents the percentage change in Emotional Disturbance (ED) for each of the SELPA groups. We see that the statewide increase in ED from 1996 to 1999 is fairly normal at 12.3 percent, but an unusually large increase in the counts of ED students occurs from 1996 to 2002, with a 48 percent increase. Every SELPA group demonstrates this similar pattern of having reasonable growth in 1999 and escalating in 2002. As was the case with Multiple Disabilities, the group that shows the smallest increase over the years is the SELPA group that had a multiplier and received adjustment funds. While national data put this disability in the middle expenditure range (see Appendix H), stakeholders have asserted that ED is one of the more expensive disabilities, due to more selective criteria in California. The fact that the "non severe" SELPAs had the greatest increase (62.6 percent from 1996 to 2002) suggests that their demographics, and hence severity, have changed in the five years since the adjustment funds were first implemented.

**Exhibit 2-22. Percentage Change in the Number of Students with Emotional Disturbance from 1996 to1999 and 1996 to 2002, by SELPA Group**



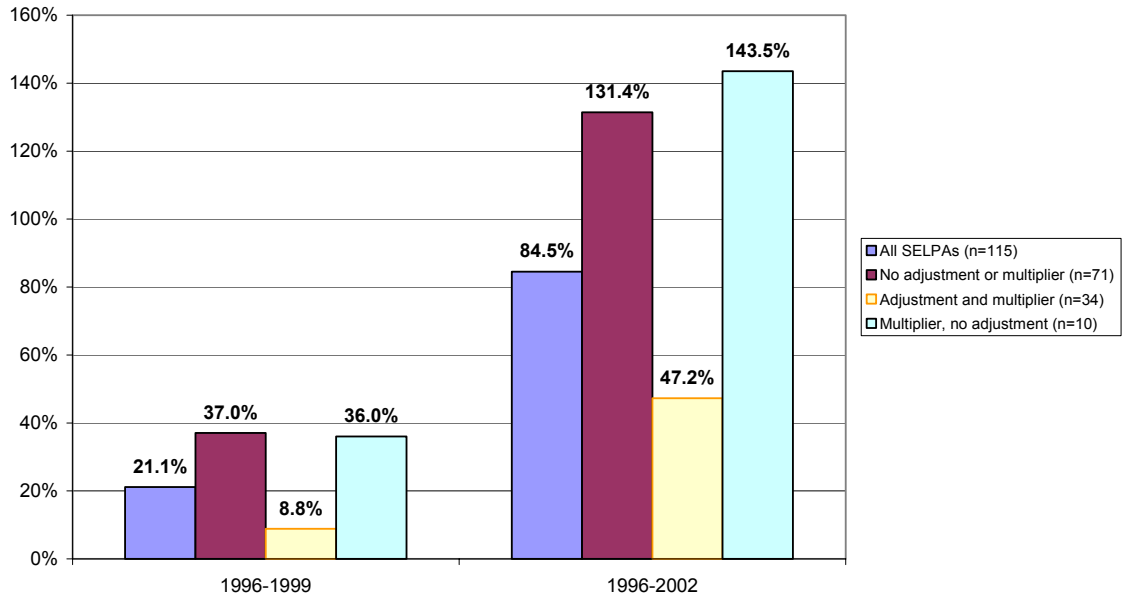
The trend of changing demographics and severity in "non severe" SELPAs can still be seen in the representation of ED in the total special education population. Exhibit 2-23 shows that the SELPAs that did not receive adjustment funds identified a greater proportion of students as ED in 1999 and 2002 than was seen in 1996. Furthermore, the gap between the SELPAs that received adjustment funds and those that did not have a multiplier has diminished over the years. In 1996, there was a 37 percent difference between the two groups, and in 2002, this gap had narrowed to 7 percent.

**Exhibit 2-23. Emotional Disturbance as a Percentage of the Total Special Education Population Ages 6-22, by SELPA Group**



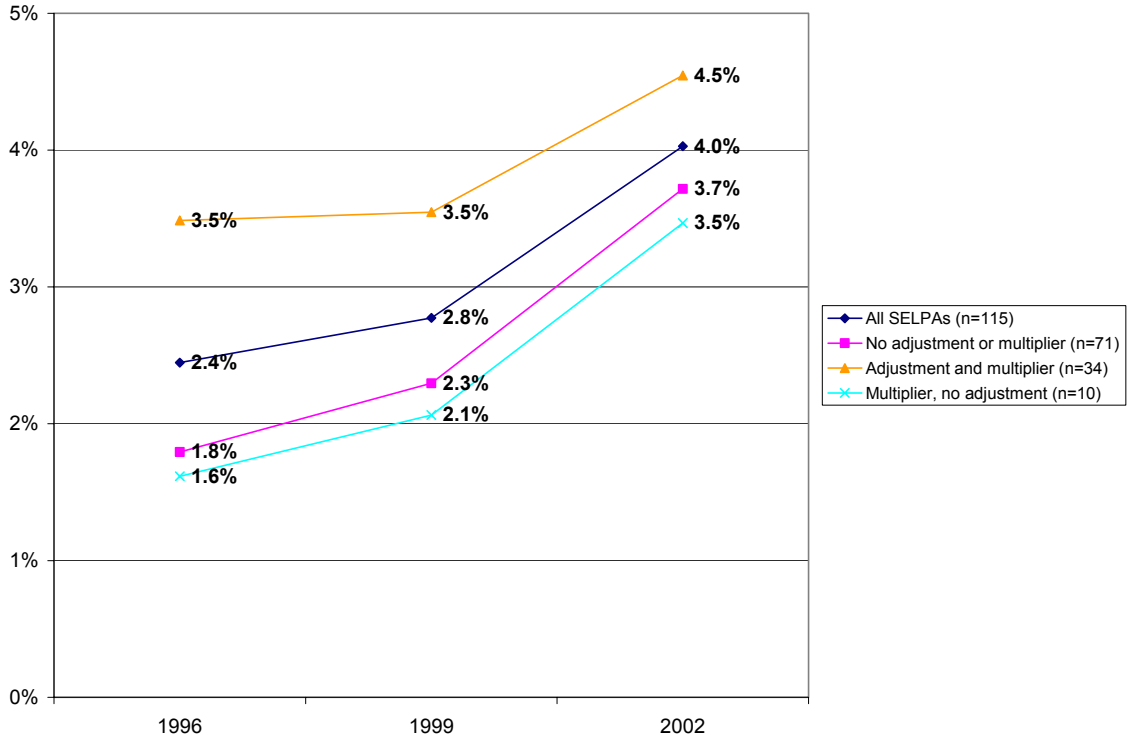
Other Health Impairment (OHI) showed a large statewide increase of 21.1 percent from 1996 to 1999, and then skyrocketed by 84.5 percent from 1996 to 2002. Exhibit 2-24 shows that although this trend to some extent is evident in all of the SELPA groups, it is largest in the two groups of SELPAs that did not receive severity adjustment funds. SELPAs that had no severity multiplier grew from only 5,217 students with OHI in 1996 to 12,071 students in 2002, a growth of 131.4 percent. This dramatic growth was also seen in the SELPAs that had a multiplier but did not receive an adjustment, where the growth was 143.5 percent. SELPAs that received adjustments had the lowest increase in OHI (47.2 percent from 1996 to 2002). It raises the question as to whether they have been more selective in identifying these students, which are generally not expensive students according to estimates provided in Appendix H.

**Exhibit 2-24. Percentage Change in the Number of Students with Other Health Impairment from 1996 to 1999 and 1996 to 2002, by SELPA Group**




Although the SELPAs that received adjustment funds showed the smallest percentage increase in OHI in comparison to the SELPAs that did not receive adjustment funds, Exhibit 2-25 shows us that this same group of SELPAs (those considered "severe") already had a large percentage of OHI students in their special education population (3.5 percent in 1996) in comparison to a statewide average of 2.4 percent. The other two groups of SELPAs had a proportion of OHI students in 1996 that was much lower (1.6 percent in the SELPAs that had a multiplier and no adjustments, and 1.8 percent in those that did not have a multiplier). In 1996, SELPAs that received the adjustment funds had nearly twice the proportion of OHI students in their special education population than that seen in SELPAs without the adjustment funds. This gap in the proportions of OHI decreased significantly in 1999 and 2002, due to the faster increase seen in "non severe" SELPAs.

**Exhibit 2-25. Other Health Impairment as a Percentage of the Total Special Education Population Ages 6-22, by SELPA Group**



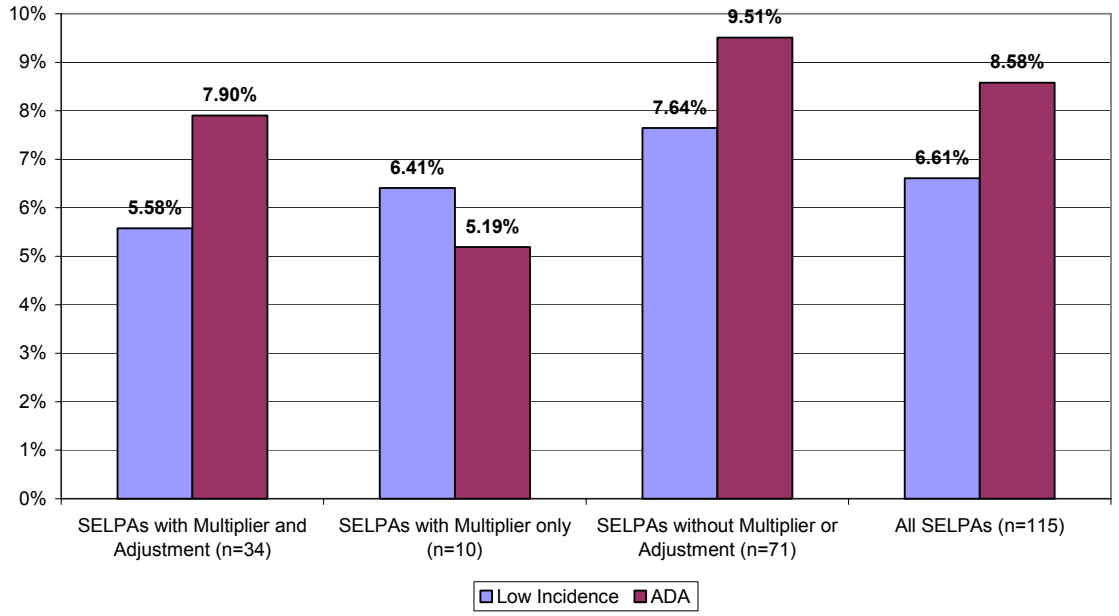

Reviewing the exhibits in this section, we see a tendency for the group of SELPAs that received severity adjustment funds to exhibit smaller percentage increases in disability categories generally considered high cost than the SELPAs that were not considered severe in the prior study. In fact, a look at the percentage increases in the counts of all the disability categories (Appendix B) reveals that SELPAs with the adjustment show a lower percentage increase in all but *one* disability category: Specific Learning Disability, which from 1996 to 2002 showed an 8.7 percent increase in SELPAs with adjustment compared to a decline of 0.7 percent in SELPAs without the multiplier. By contrast, SELPAs that were not identified as severe in the 1998 study show above average increases in number of students with disabilities that are generally considered severe: Autism, Multiple Disability, and Emotional Disturbance.

Although the SELPAs with an adjustment exhibited smaller increases in most individual disability categories, this same group of SELPAs had a higher percentage increase in its total special education population than other SELPA groups from 1996 to 2002, as shown in Exhibit 2-17. This increase seems to be attributed to the increase in SLD and the large number of students that are in this category. Because the counts of all other disabilities grew at a slower pace in comparison to SELPAs without the multiplier, the difference between these two groups in the proportions represented by certain high cost disabilities is closing.

## *Analysis of Low Incidence Students and Average Daily Attendance: CDE Data*

This final section of the disability analyses uses data obtained from the CDE[12] to compare the percentage change in low incidence disabilities and average daily attendance (ADA) statewide and in the three SELPA groups from 1997 to 2001. The data are derived from the counts of low incidence disabilities reported to the state by SELPAs in order to qualify for Low Incidence Funding.[13] Similar to prior exhibits, the SELPAs have been grouped according to those receiving severity adjustment, those with a multiplier only, and those with neither.

**Exhibit 2-26: Overall Percentage Change in Low Incidence Disabilities and ADA, by SELPA Group, 1997 to 2001**




*Sources: AB602 ADA and Low Incidence Data file obtained from the Special Education Fiscal Services, California Department of Education

SELPAs that received severity adjustment funds show the smallest increase (5.58 percent) in low incidence counts from 1999 to 2001, whereas SELPAs that were not considered severe in the previous study exhibit the largest increase (7.64 percent). The count of students with low incidence disabilities in SELPAs that were considered severe but did not generate severity adjustments increased at a slightly lower rate than the statewide average.

While the number of students with low incidence disabilities have increased in all SELPA groups since 1997, it is useful to put this change into the context of changes in the total student population. With the exception of the multiplier only SELPA group, the increase in ADA is greater than the increase in low incidence disabilities by approximately 2 percent. This suggests that low incidence

[12] This data source is different than CASEMIS.

[13] California Education Code Section 56836.22 provides for funds to purchase specialized books, materials, and equipment as required under the individualized education program (IEP) for each pupil with low incidence disabilities as defined in Section 56026.5 ("hearing impairments, vision impairments, severe orthopedic impairments, or any combination thereof").

disabilities as a percentage of ADA is actually decreasing for both the SELPA group that received the severity adjustment funds and the group that did not have had a multiplier.

The only group to show a slower increase in ADA compared to the increase in low incidence is the group of SELPAs that only had a multiplier, but did not receive adjustment funds. This could be reflective of the fact that that group only consists of 10 SELPAs, which may not be large enough to reflect general tendencies.

## Analysis of Special Education Placements and Services

In addition to changes in the population by disability, it is of interest to examine how the population itself is being served. In short, what changes, if any, in service provision have occurred since the prior study? The following set of exhibits shows the percentage change in the number of special education students in various special education placements, by SELPA grouping, over three years (1996 to 1999) and six years (1996 to 2002). These data reflect the way the service data were used in the cost analysis (described in Chapter 4). Specifically, to avoid duplicating costs of multiple placement services, students were assigned a primary placement in 2002. Likewise, students in these analyses have been counted in only one placement in 2002 to avoid duplicity. This was not necessary for 1996 and 1999, as primary placement was recorded in CASEMIS. Furthermore, all analyses have been conducted by SELPA of residence.

The exhibits in this section should be treated with caution, as there are differences between the 1996, 1999, and 2002 CASEMIS and trends seen here may be the product of database structure variations and possible changes in reporting practices (see Chapter 6 for further details).[14] In particular, services were recorded differently across the years being studied. For instance, Resource Specialist Programs and Special Day Classes were captured as primary placements in the 1996 CASEMIS structure, whereas as of 2001, they are recorded as a service variable. The additional number of services able to be recorded in CASEMIS (from four services in 1996 to eight services in 1999) could also result in increased counts. Students may have been receiving these services, but because of reporting limitations on the number of services, they may not have been accounted for in 1996. Furthermore, the severity adjustment based on services may have created an incentive for SELPAs to report more accurately the number of services received by each special education student.

Three placements (although they are now recorded as "services") are presented in this section: Special Day Class (SDC), Resource Specialist Programs (RSP), and Regular Class with Accommodation. The Special Day Inclusion Services (SDIS) placement is not included in the analyses, as this category first became available in 2001.[15] SDC includes Special Day Classes in integrated and segregated facilities, and in 2002, RSP includes both Resource Specialist and Resource School-Based Services. Although the Designated Instructional Services (DIS) categories

[14] 2002 CASEMIS data from a large SELPA were revised after errors were found in coding. Service data in this report reflect the revised data.

[15] Note that the creation of this reporting category may have affected the counts of students who would otherwise be reported in other placements such as SDC, potentially reflecting reporting difference rather than a change in service provision. Please refer to Chapter 6 of this report for an examination of the potential mismatches between service categories in CASEMIS.

are not considered as placements, but rather reflect a variety of related services, we examined students who received only DIS and no placement services. Definitions of these service placements are presented in Appendix D.

Exhibit 2-27 provides the percentage change in the number of special education students in Special Day Class (SDC) placements. The average increase statewide was 11.3 percent between 1996 and 1999 and 17.7 percent between 1996 and 2002. The percentage of SDC placements increased across the SELPA groups between 1996 and 1999, as well as between 1996 and 2002. While all groups had similar increases from 1996 to 1999 (between 10 and 12 percent), there were prominent differences in the percentage change over the six-year period. SELPAs receiving the adjustment show the greatest increase in SDC students (20.7 percent from 1996 to 2002), whereas SELPAs with only the multiplier had a mere 6 percent difference. Note that the increases in SDC placements may also be attributable to the removal of the primary placement variable in 2001, allowing multiple placements to be designated rather than just one.

**Exhibit 2-27. Percentage Change in the Number of Special Education Students in Special Day Class Placements, from 1996 to 1999 and 1996 to 2002, by SELPA Group**

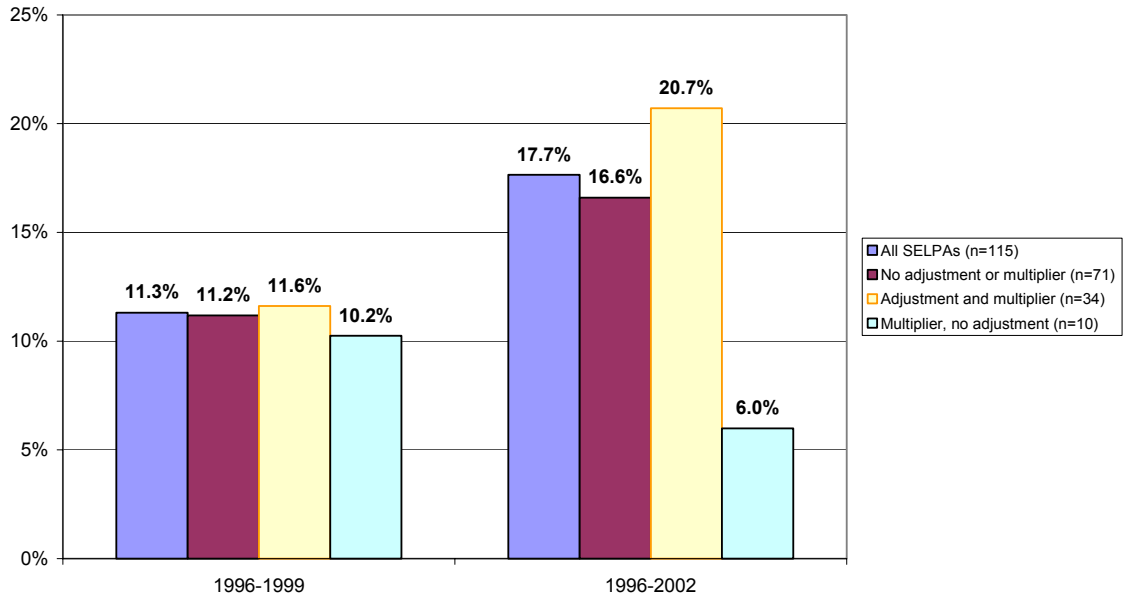


Exhibit 2-28 presents the percentage of the total school-aged (ages 6-22) special education population in SDC placements from 1996 to 2002, by SELPA group. SDC placements comprise a substantial percentage of the total school-aged special education population, and this percentage has remained fairly constant statewide. Approximately 30 percent of the statewide special education population is in this placement for the years of study. SELPAs with adjustment funds show a slightly larger percentage of students in this placement (35.2 percent in 2002) than do the other SELPA groups. Although Exhibit 2-27 shows a 21 percent increase in the number of students in this placement between 1996 and 2002 for this group, the exhibit below shows that the proportion of the total population only increased by 6 percent. The SELPAs with multipliers but no severity funds show the lowest percentage in 2002, with 27.8 percent of the special education population in SDC, a decrease of 6 percent from 1996.

**Exhibit 2-28. Percentage of the Total Special Education Population Ages 6-22 in Special Day Class Placements, by SELPA Group**

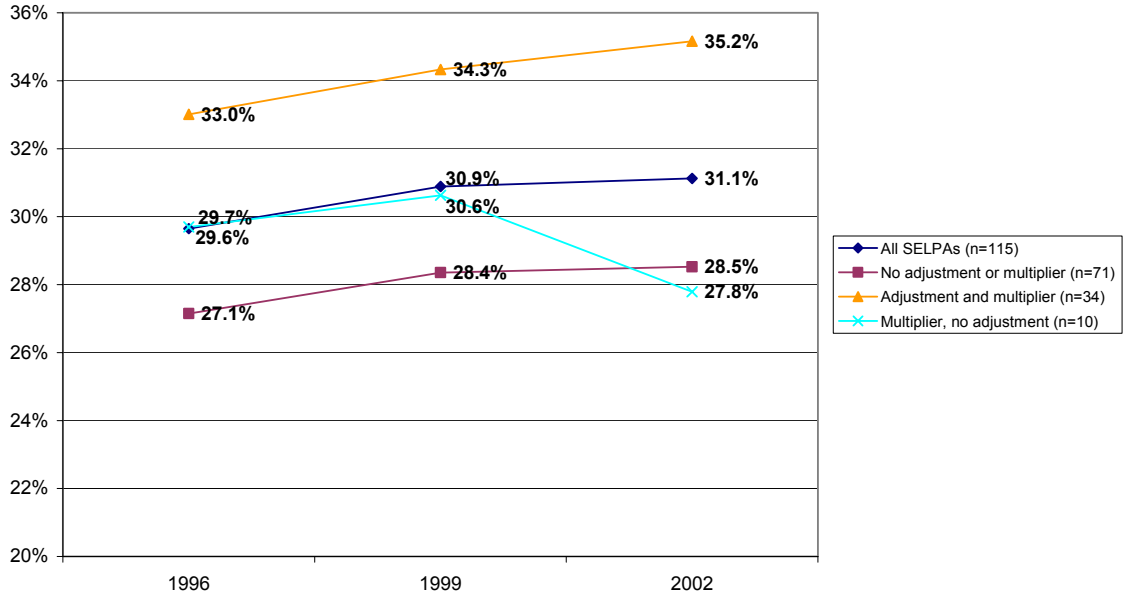
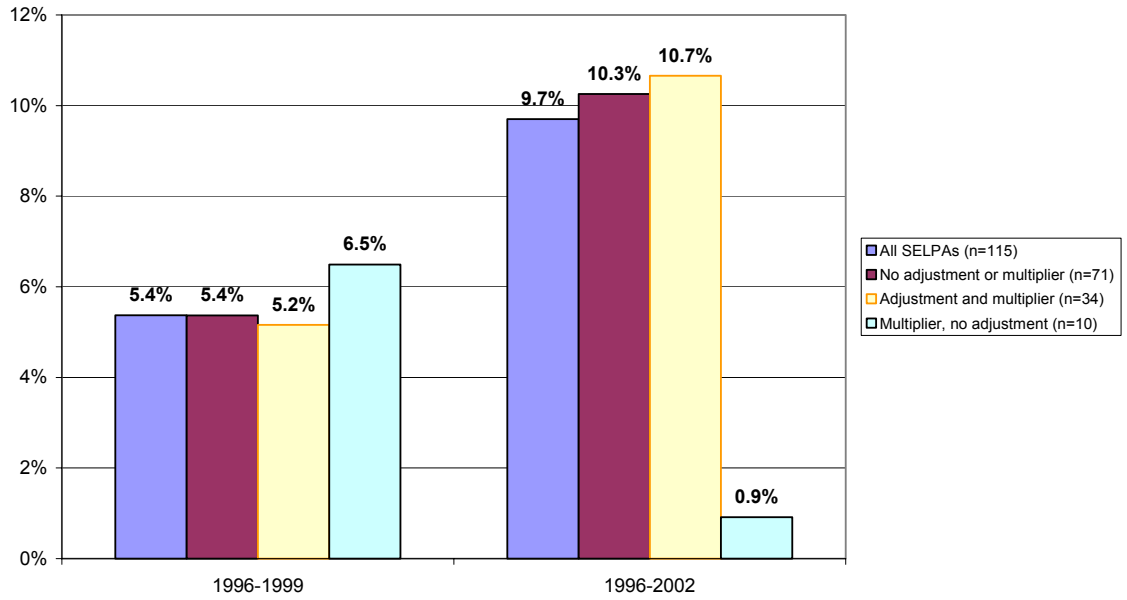


Exhibit 2-29 shows the percentage change in the number of special education students in Resource Specialist Programs (RSP).[16] Between 1996 and 1999, all SELPA groups increased the number of RSP students by 5 to 7 percent. While all SELPA groups continued to see an increase in the number of RSP students, the growth from 1996 to 2002 in SELPAs with a multiplier only was less than one percent. Due to the small number of SELPAs in this group, however, this trend should be treated with caution. The average increase across all SELPAs over six years is 9.7 percent.

**Exhibit 2-29. Percentage Change in Number of Special Education Students in Resource Specialist Programs, from 1996 to 1999 and 1996 to 2002, by SELPA Group**




[16] Both the Resource Specialist Program (RSP) and Resource School-based (RSB) Programs are included in the 2002 counts, due to ambiguity between the two categories.

Exhibit 2-30 shows the proportion of total school-aged special education population in RSP from 1996 to 2002, by SELPA group. RSP placements comprise a little less than half of the special education population, with the statewide average at 46.6 percent in 2002. This placement has declined as a percentage of the population statewide and across two groups. SELPAs that were not identified as severe in 1998 show a slightly higher percentage of RSP students than the statewide average. On the other hand, SELPAs that had multipliers but no adjustment show a dramatic drop from 50.3 percent in 1996 to 45.0 percent in 2002. SELPAs that were identified as severe in 1998 and received funding were lower than the statewide average across all years.

**Exhibit 2-30. Percentage of Total Special Education Population Ages 6-22 in Resource Specialist Programs, by SELPA Group**

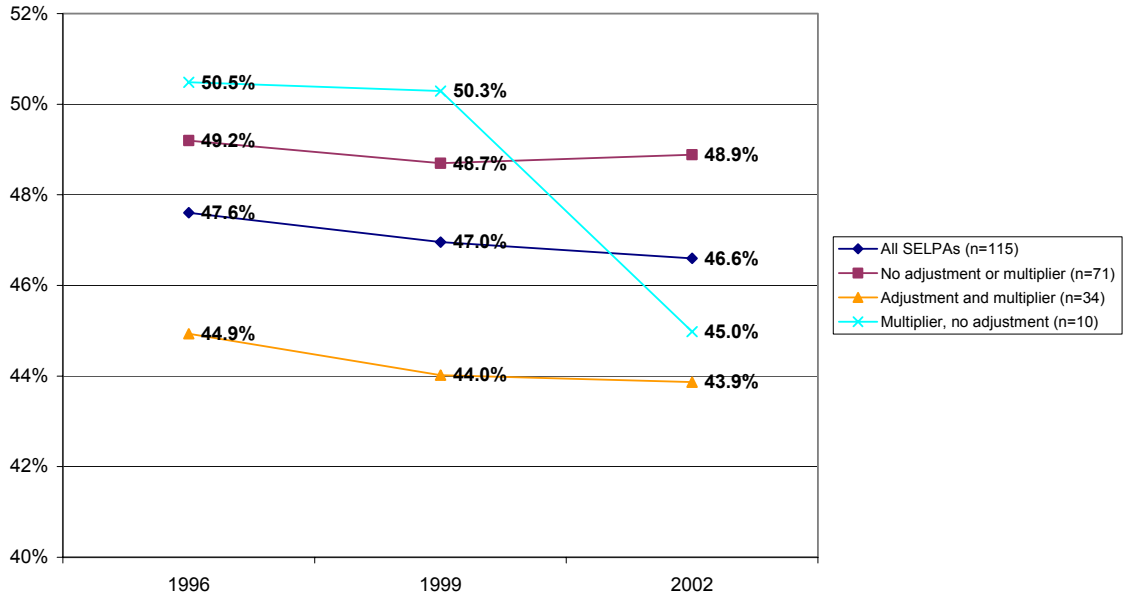
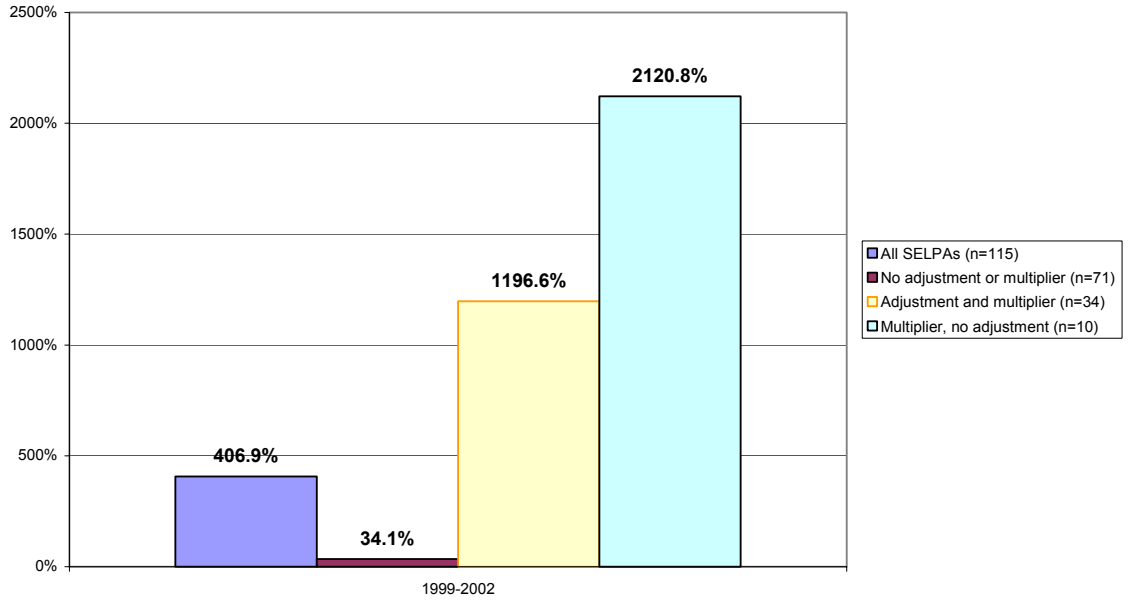


Exhibit 2-31 shows the percentage change in the number of special education students in the placement category, Regular Class with Accommodation, from 1999 to 2002, by SELPA grouping.[17] The number of students in this placement increased across all SELPA groups, with two groups showing a dramatic increase. SELPAs with a multiplier but no severity adjustment showed an increase of over two thousand percent, and SELPAs with a severity adjustment increased by almost twelve hundred percent. By contrast, SELPAs without a severity multiplier exhibited a small increase of about 34 percent. The percentages in this exhibit should be read with caution, however, as the number of students in this placement is small (1,129 in 1999 and 5,723 in 2002). Furthermore, this is not a highly used service code, as only 14 and 63 SELPAs reported it in 1999 and 2002, respectively.

**Exhibit 2-31. Percentage Change in the Number of Special Education Students in Regular Class with Accommodation, 1999 to 2002, by SELPA Group**




[17] Data for the 1996-97 school year are not available for this service. In 1999, this service was labeled, "general education program or regular education setting." The research team assumed this to be the same as the Regular Class with Accommodation service variable in the 2002 CASEMIS.

Exhibit 2-32 shows the percentage of the total school-aged special education population placed in Regular Classes with Accommodation in 1999 and 2002. Although placements have increased across all the SELPA groups during the three years, this placement comprises a very small percentage of the population, regardless of SELPA group. Indeed, the average percentage of students in this placement statewide was less than 1 percent in 2002. While Exhibit 2-31 shows an increase of over a thousand percent in number of these students among SELPAs that received severity funds in the previous study, these placements increased as a proportion of the special education population from 1996 to 2002 by only 16 percent (.1 percent in 1999 to 1.7 percent in 2002).

**Exhibit 2-32. Percentage of Total Special Education Population Ages 6-22 in Regular Class with Accommodation Placements, by SELPA Group**

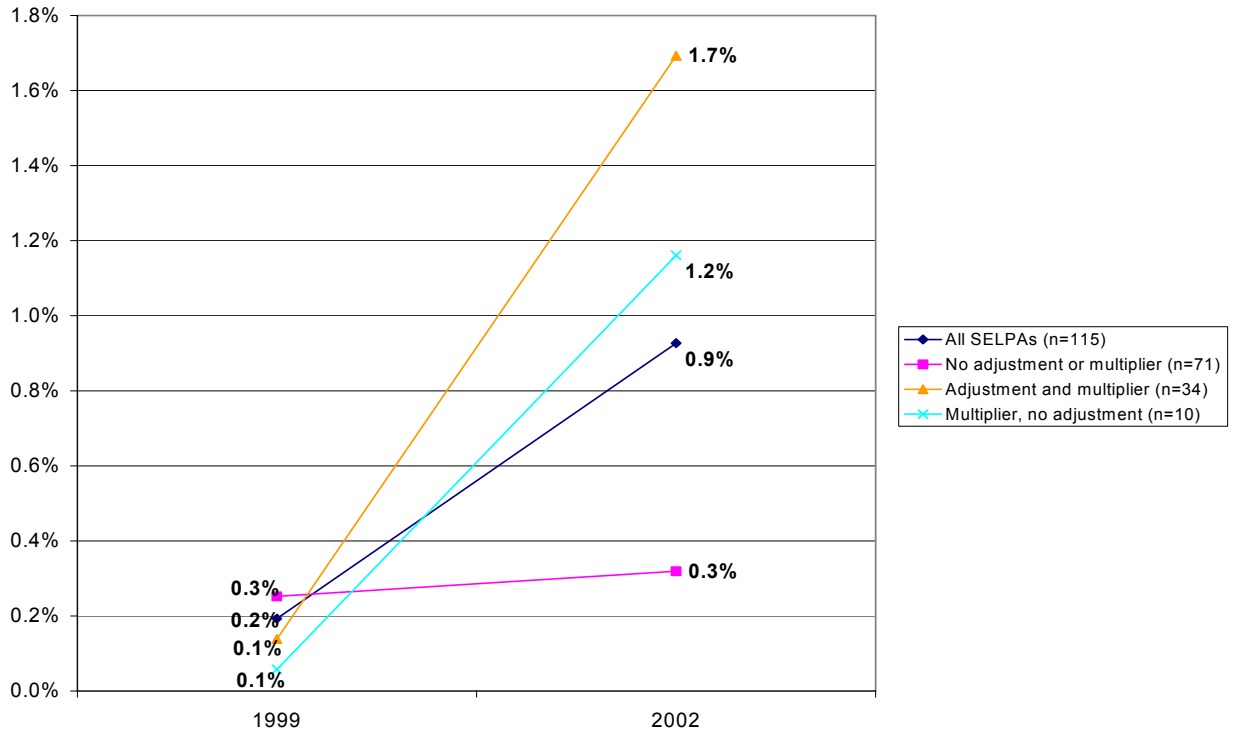
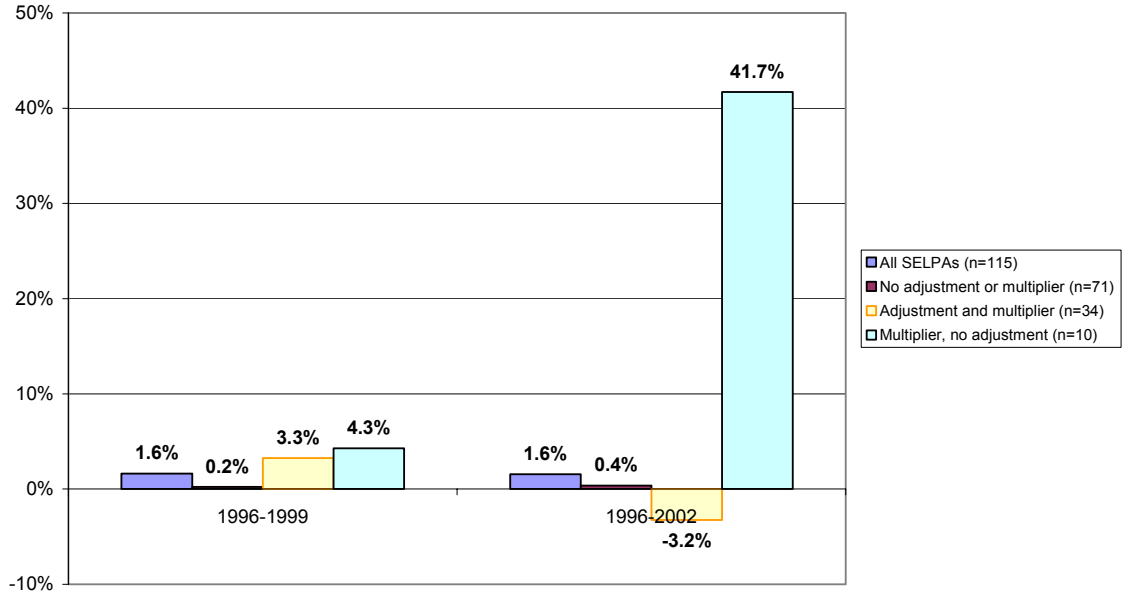


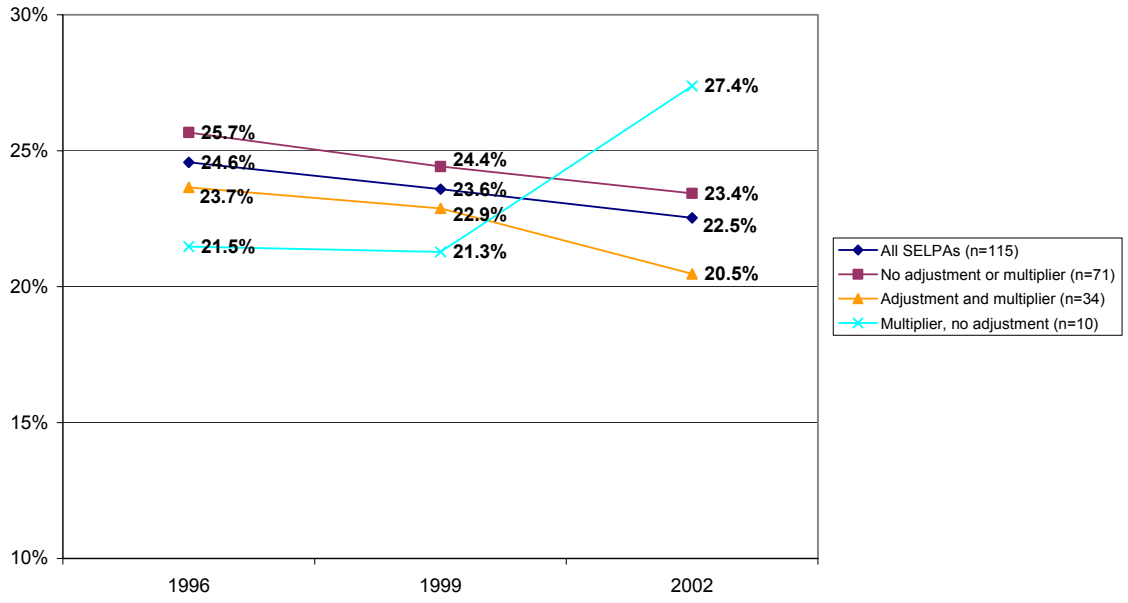
Exhibit 2-33 shows the percentage change in the number of special education students, ages 3-22, receiving Designated Instructional Services (DIS) only. In other words, these are students whose only service is a related service (see Exhibit 2-35 for a full listing of DIS). As shown, the number of students receiving DIS only increased across all SELPA groups between 1996 and 1999 by only a small amount (between 0.2 and 5 percent). In contrast, between 1996 and 2002, SELPAs with a multiplier but no adjustment had a notable increase of 41.7 percent in the number of students receiving DIS only. However, due to its small number of SELPAs—and hence small special education population—this group may be more susceptible to change. SELPAs with a severity adjustment showed a decrease of 3.2 percent in the number of students receiving DIS only from 1996 to 2002.

**Exhibit 2-33. Percentage Change in the Number of Special Education Students in Receiving Designated Instructional Services (DIS) Only, from 1996 to 1999 and 1996 to 2002, by SELPA Group**



As a percentage of the total special education population ages 3-22, students receiving only related services comprise less than a quarter of all special education students statewide. As Exhibit 2-34 shows, the proportion of special education students decreased between 1996 and 1999 across all groups. While other groups continued to drop between 1999 and 2002, only the SELPAs with the multiplier and no adjustment saw an increase in the proportions. As the counts of students increased by nearly 42 percent in this SELPA group (Exhibit 2-33) from 1996 to 2002, the proportion of students receiving only DIS also increased by over 27 percent.

**Exhibit 2-34. Percentage of Total Special Education Population Ages 3-22 Receiving Designated Instructional Services (DIS) Only, by SELPA Group**




Interesting comparisons across SELPA groups can also be made from the previous exhibits. Among SELPAs that were not considered severe in 1998 (i.e., without an adjustment multiplier), the number of students in SDC and RSP placements increased over six years by about 17 and 11 percent, respectively, which is close to the statewide average. This group had a lower than average proportion of their special education population in SDC and a higher than average proportion in RSP across all years. Overall, the SELPAs that are not considered severe show changes similar to or lower than the statewide average across all four services examined, suggesting that this group has not substantially altered service provision to special education students since the passage of AB 602.

In regard to SELPAs that were designated as severe in the prior study and received adjustments, this group shows the largest increase in SDC placements (21 percent) in comparison to a statewide average of 17.8 percent. Taking into account the growth in the special education population, the overall proportion of students in this placement has increased slightly since 1996, two years prior to the altering of the special education funding formula. From 1996 to 2002, these SELPAs had above average proportions of special education students in SDC, as well as below average percentages in RSP which decreased slightly over the years. These trends suggest that the percentages of students in placements and services have remained fairly steady statewide under the AB 602 funding and

severity adjustment, although larger differences may exist at the individual SELPA level (some of which are discussed in Chapter 6).

Exhibit 2-35 shows the number and percentage change of students in various special education placements and receiving Designated Instructional Services (DIS) in 1996, 1999, and 2002.[18] While the total population (ages 3-22) and the school-aged (ages 6-22) population of special education students in public schools grew by about 11 and 12 percent, respectively, from 1996 to 2002, both large increases and declines are seen across placements and services. The greatest growth in placements occurred among students in Special Day Classes in public separate facilities, which increased over 62 percent, from 6,266 to 10,171 students. Among special education services, transition services show the greatest growth, which increased over one thousand percent from 1996 to 2002, from 257 to 3,692 students. Another marked increase occurred among students receiving behavior management services. The number of students receiving this service increased about 630 percent from 1996 to 2002. Students receiving recreation services show the largest decline in counts, about 78 percent from 1996 to 2002, and reader services decreased by 53 percent. However, these students represent a very small proportion of the overall special education population, as shown in Exhibit 2-36.

Exhibit 2-36 shows the percentages of the total population receiving each placement and service, and the change over time. Students in Special Day Classes in public separate facilities had the greatest increase across placements as a proportion of the total special education population, with a 45 percent growth. Although some DIS services showed tremendous percentage growth from 1996 to 2002, these are very small proportions of the total special education population.

Several special education services show marked declines across the years of study as a percentage of the total special education population. The only placement to show a decline, students in Resource Specialist Programs decreased from 47.6 percent of the school-aged special education population in 1996 to 43.7 percent in 2002. However, this may attributed to the new service code "Resource Services (School-Based)" which comprised 3 percent of the special education population in 2002.

These figures, however, must be treated with care as they may not necessarily reflect real changes in the number of students receiving services or true changes in service provision. Rather, the differences between the years may be the product of database structure variations and possible changes in reporting practices, as mentioned at the beginning of this section. See Chapter 6 for further details on the differences between the CASEMIS database versions used in this study.

[18] Although the numbers in the graph are rounded to one decimal place, the percentages were calculated using the original (not rounded) numbers.

**Exhibit 2-35. Special Education Students Receiving Special Education Services in 1996, 1999, and 2002[19]**

| | 1996 | 1999 | 2002 | % Change from 1996 to 1999 | % Change from 1996 to 2002 |
|---|---|---|---|---|---|
| **Placements (Ages 6-22)** | | | | | |
| Regular Class with Accommodation | n/a | 1142 | 5,723 | n/a | n/a |
| Resource Services (School-Based) | n/a | n/a | 17,722 | n/a | n/a |
| Resource Specialist Program | 260,628 | 278,515 | 268,192 | 6.9% | 2.9% |
| Special Day Inclusion Services | n/a | n/a | 4,499 | n/a | n/a |
| Special Day Class in Public Integrated Facility | 156,046 | 188,768 | 180,791 | 21.0% | 15.9% |
| Special Day Class in Public Separate Facility | 6,266 | 5,919 | 10,171 | -5.5% | 62.3% |
| **TOTAL Public School-aged SE Population (Ages 6-22)** | **547,494** | **584,890** | **613,561** | **6.8%** | **12.1%** |
| **Designated Instructional Services (Ages 3-22)** | | | | | |
| Language and speech | 245,369 | 249,149 | 263,014 | 1.5% | 7.2% |
| Home and hospital | 2,591 | 2,403 | 2,520 | -7.3% | -2.7% |
| Adapted physical education | 46,538 | 46,737 | 44,559 | 0.4% | -4.3% |
| Audilogical service | 5,883 | 6,014 | 5,025 | 2.2% | -14.6% |
| Individual counseling | 7,381 | 10,296 | 12,826 | 39.5% | 73.8% |
| Group counseling | 3,690 | 4,054 | 3,977 | 9.9% | 7.8% |
| Guidance services | 1,324 | 1,393 | 1,211 | 5.2% | -8.5% |
| Occupational therapy | 5,886 | 12,823 | 26,533 | 117.9% | 350.8% |
| Physical therapy | 1,735 | 2,981 | 4,666 | 71.8% | 168.9% |
| Orientation and mobility | 1,737 | 2,355 | 2,250 | 35.6% | 29.5% |
| Parent counseling | 4,938 | 4,018 | 2,956 | -18.6% | -40.1% |
| Social work service | 629 | 664 | 679 | 5.6% | 7.9% |
| Vocational education training | 12,183 | 13,421 | 8,565 | 10.2% | -29.7% |
| Recreation services | 1,110 | 1,183 | 249 | 6.6% | -77.6% |
| Individual and group instruction | 10,479 | 10,487 | 15,671 | 0.1% | 49.5% |
| Vision services | 3,952 | 4,551 | 5,046 | 15.2% | 27.7% |
| Specialized driver training | 186 | 159 | 158 | -14.5% | -15.1% |
| Psychological services | 5,768 | 5,912 | 7,946 | 2.5% | 37.8% |
| Specialized services for low incidence disabilities | 2,242 | 2,343 | 2,269 | 4.5% | 1.2% |
| Health and nursing - specialized | 3,247 | 3,584 | 3,095 | 10.4% | -4.7% |
| Health and nursing - other | 4,124 | 3,581 | 3,143 | -13.2% | -23.8% |
| Interpreter services | 710 | 684 | 1,005 | -3.7% | 41.5% |
| Education technology services | 344 | 616 | 519 | 79.1% | 50.9% |
| Behavior management services | 448 | 1,077 | 3,270 | 140.4% | 629.9% |
| Assistive services | 2,420 | 2,643 | 1,613 | 9.2% | -33.3% |
| Braille transcription | 127 | 73 | 118 | -42.5% | -7.1% |
| Reader services | 66 | 14 | 31 | -78.8% | -53.0% |
| Note taking services | 139 | 100 | 146 | -28.1% | 5.0% |
| Transition services | 257 | 274 | 3,692 | 6.6% | 1336.6% |
| Vocational counseling | 1,054 | 1,044 | 2,030 | -0.9% | 92.6% |
| Deaf and Hard of Hearing services | 840 | 1,650 | 4,386 | 96.4% | 422.1% |
| Transportation | n/a | 5,306 | 43,820 | n/a | n/a |
| Other special education services | n/a | 1,160 | 4,977 | n/a | n/a |
| **TOTAL Public SE Population (Ages 3-22)** | **587,577** | **622,241** | **650,939** | **5.9%** | **10.8%** |

[19] Source: CASEMIS December 1996, 1999, and 2002.

**Exhibit 2-36. Percentage of the Total Special Education Population Receiving Special Education Services in 1996, 1999, and 2002[20]**

| | % of Population Receiving Service in 1996 | % of Population Receiving Service in 1999 | % of Population Receiving Service in 2002 | % Change between 1996 and 1999 | % Change between 1996 and 2002 |
|---|---|---|---|---|---|
| **Placements (Ages 6-22)** | | | | | |
| Regular Class with Accommodation | n/a | 0.2% | 0.9% | n/a | n/a |
| Resource Services (School-Based) | n/a | n/a | 2.9% | n/a | n/a |
| Resource Specialist Program | 47.6% | 47.6% | 43.7% | 0.0% | -8.2% |
| Special Day Inclusion Services | n/a | n/a | 0.7% | n/a | n/a |
| Special Day Class in Public Integrated Facility | 28.5% | 32.3% | 29.5% | 13.2% | 3.4% |
| Special Day Class in Public Separate Facility | 1.1% | 1.0% | 1.7% | -11.6% | 44.8% |
| **Designated Instructional Services (Ages 3-22)** | | | | | |
| Language and speech | 41.8% | 40.0% | 40.4% | -4.1% | -3.2% |
| Home and hospital | 0.4% | 0.4% | 0.4% | -12.4% | -12.2% |
| Adapted physical education | 7.9% | 7.5% | 6.8% | -5.2% | -13.6% |
| Audiological service | 1.0% | 1.0% | 0.8% | -3.5% | -22.9% |
| Individual counseling | 1.3% | 1.7% | 2.0% | 31.7% | 56.9% |
| Group counseling | 0.6% | 0.7% | 0.6% | 3.7% | -2.7% |
| Guidance services | 0.2% | 0.2% | 0.2% | -0.6% | -17.4% |
| Occupational therapy | 1.0% | 2.1% | 4.1% | 105.7% | 306.9% |
| Physical therapy | 0.3% | 0.5% | 0.7% | 62.2% | 142.8% |
| Orientation and mobility | 0.3% | 0.4% | 0.3% | 28.0% | 16.9% |
| Parent counseling | 0.8% | 0.6% | 0.5% | -23.2% | -46.0% |
| Social work service | 0.1% | 0.1% | 0.1% | -0.3% | -2.6% |
| Vocational education training | 2.1% | 2.2% | 1.3% | 4.0% | -36.5% |
| Recreation services | 0.2% | 0.2% | 0.0% | 0.6% | -79.8% |
| Individual and group instruction | 1.8% | 1.7% | 2.4% | -5.5% | 35.0% |
| Vision services | 0.7% | 0.7% | 0.8% | 8.7% | 15.3% |
| Specialized driver training | 0.0% | 0.0% | 0.0% | -19.3% | -23.3% |
| Psychological services | 1.0% | 1.0% | 1.2% | -3.2% | 24.4% |
| Specialized services for low incidence disabilities | 0.4% | 0.4% | 0.3% | -1.3% | -8.6% |
| Health and nursing - specialized | 0.6% | 0.6% | 0.5% | 4.2% | -14.0% |
| Health and nursing - other | 0.7% | 0.6% | 0.5% | -18.0% | -31.2% |
| Interpreter services | 0.1% | 0.1% | 0.2% | -9.0% | 27.8% |
| Education technology services | 0.1% | 0.1% | 0.1% | 69.1% | 36.2% |
| Behavior management services | 0.1% | 0.2% | 0.5% | 127.0% | 558.9% |
| Assistive services | 0.4% | 0.4% | 0.2% | 3.1% | -39.8% |
| Braille transcription | 0.0% | 0.0% | 0.0% | -45.7% | -16.1% |
| Reader services | 0.0% | 0.0% | 0.0% | -80.0% | -57.6% |
| Note taking services | 0.0% | 0.0% | 0.0% | -32.1% | -5.2% |
| Transition services | 0.0% | 0.0% | 0.6% | 0.7% | 1196.7% |
| Vocational counseling | 0.2% | 0.2% | 0.3% | -6.5% | 73.9% |
| Deaf and Hard of Hearing services | 0.1% | 0.3% | 0.7% | 85.5% | 371.3% |
| Transportation | n/a | 0.9% | 6.7% | n/a | n/a |
| Other special education services | n/a | 0.2% | 0.8% | n/a | n/a |

[20] Source: CASEMIS December 1996, 1999, and 2002.

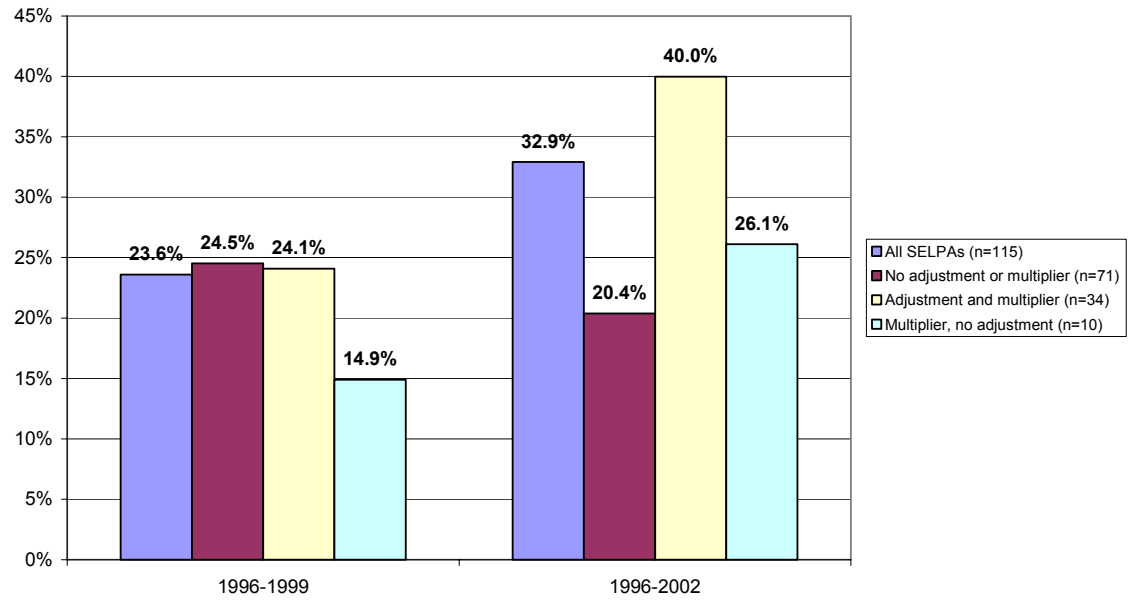
# Nonpublic School Students

This section shows the change in special education students attending nonpublic schools (NPS) from 1996 to 1999, and from 1996 to 2002, by SELPA grouping. The counts can be found in Appendix C. This analysis includes nonpublic day school and nonpublic residential school students, ages 3-22. Note that this section excludes students in nonpublic out-of-state schools, as counts for this placement are only available in the 2002 CASEMIS. It also excludes school-age children residing in licensed children's institutions, foster family homes, or residential facilities.

As shown in Exhibit 2-37, the percentage change of NPS students between 1996 and 1999 is smallest among the SELPAs with a positive multiplier and no adjustment, with a 14.9 percent increase. This is below the state average, as well as below the increases observed in SELPAs with the adjustment and SELPAs without a multiplier (23.6, 24.1 and 24.5 percent, respectively).

From 1996 to 2002, SELPAs with the adjustment showed the highest increase in the total count of nonpublic school students. This increase of 40 percent is above the statewide average percentage change of approximately 33 percent. SELPAs with no adjustment or multiplier have a lowest percent change, increasing by only 20.4 percent.

**Exhibit 2-37. Percentage Change in Total Number of Nonpublic School Students* from 1996 to 1999 and 1996 to 2002, by SELPA group**

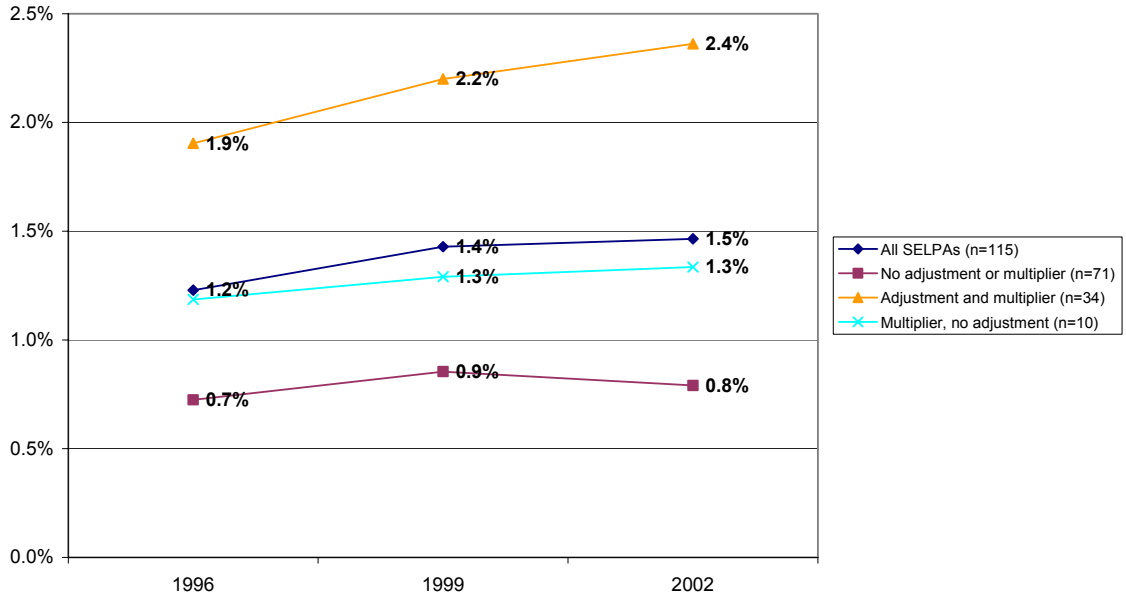



*Includes only day and residential in-state placements, as out-of-state placements were not recorded across all years.

Although NPS placements comprise a small percentage of the total special education population, it is worthy to note that this percentage has increased fairly substantially since 1996. As shown in Exhibit 2-38, this population has risen from 1.2 to 1.5 percent of the statewide special education population across the years of study. Similar to the prior exhibit, SELPAs that were not designated

as severe in 1998 appear to be serving fewer students in NPS in comparison to the "severe" SELPAs.

**Exhibit 2-38. Percentage of the Total Special Education Population Ages 3-22 in NPS, by SELPA Group***

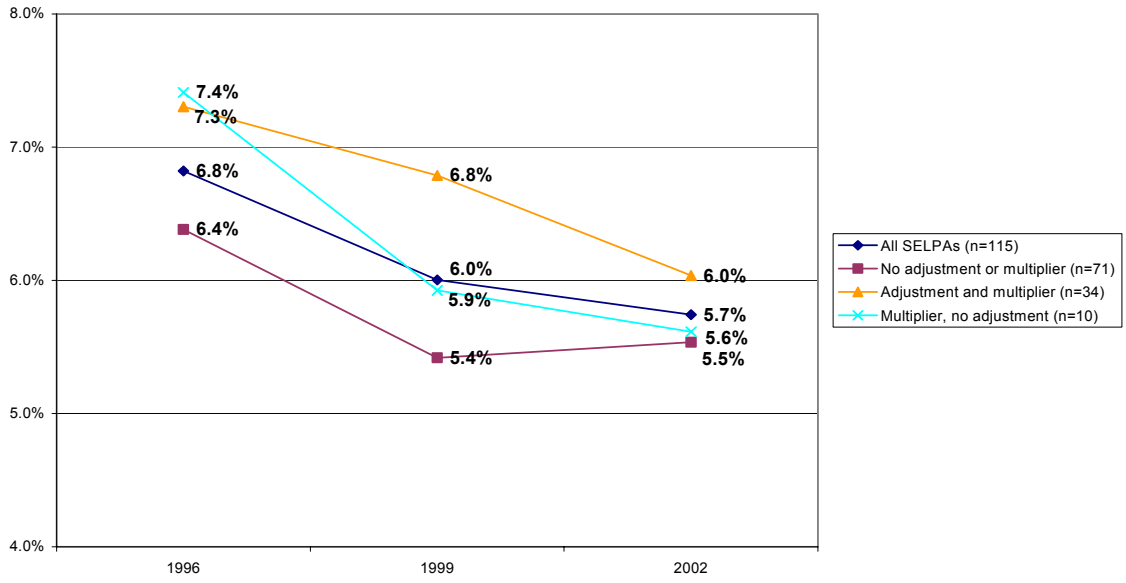



*Includes only day and residential in-state placements, as out-of-state placements were not recorded across all years.

## Preschool Students

Exhibit 2-39 compares the number of preschool special education students as a percentage of the total public school special education population, ages 3-22. The counts of preschool students across the years can be found in Appendix C. All SELPA groups show a decline in the proportion of preschool students from 1996 to 2002. This downward trend indicates that the number of preschool students is not growing as fast as the total special education population (the preschool population decreased by 5.7 percent while the total special education population increased by 10.8 percent). It is not clear whether the decline is a genuine drop in the number of preschool students needing services, a result of SELPA identification processes and service provision, or a product of coding practices in CASEMIS.

**Exhibit 2-40. Preschool Students as a Percentage of the Total Public School Special Education Population, Ages 3-22**




## Summary

What effect, if any, did the special disabilities adjustment (SDA) have on SELPAs across California, in terms of revenues, the identification of disabilities, and service provision patterns? Our findings show that the SDA comprises a small percentage of the total appropriation for special education, at about 2.4 percent in 2002-03. However, individual SELPAs received between $18,000 and $25 million in supplemental funding in this same year—important adjustments in offsetting the added expense of high cost students.

Have service provisions and identification rates changed since the implementation of the AB 602 and severity adjustment? Between 1996 and 2002, we see a tendency for the group of SELPAs with a multiplier in 1998 to exhibit smaller percentage increases in high cost (e.g., Autism, Multiple

Disability, and Emotional Disturbance) and low incidence disability categories than the SELPAs not considered severe. In fact, SELPAs with the severity adjustment show a higher percentage increase in Specific Learning Disability, a generally lower cost disability, than the SELPAs that were not identified as severe in the prior study. Because the severity adjustments are based on services received and not disability category, these shifts in identification appear independent of the model.

Trends in statewide service provision patterns appear fairly steady statewide under the current funding approach. The statewide proportions of students in these placements have seen only gradual increases (SDC) or slight declines (i.e., RSP, RCA, DIS only). While SELPAs with multipliers show the largest increase in the number of SDC students, the overall proportion of the special education population in SDC has increased marginally since 1996 from 29.7 to 31.2 percent.

Since AB 602 and the addition of the severity adjustment, the state has experienced increases in the counts and percentage of the total special education population in nonpublic school placements. While SELPAs with the multiplier, as a group, show the largest increase in number of NPS students (40 percent), the statewide percentage of special education students in NPS has increased slightly from 1.2 percent to 1.5 percent over the six-year period.

The number of preschool students across the state has decreased as a percentage of the total special education population since 1996. However, we cannot determine whether this is a reflection of a drop in the actual number of preschool students needing services or a result in the change of identification processes and service provision, or reporting practices.

In sum, it does not appear that the severity adjustment has significantly affected disability identification rates or service provision patterns statewide or for groups of SELPAs.

# CHAPTER 3: SEVERITY ANALYSIS AND INCIDENCE OF SEVERE/HIGH COST STUDENTS

Is the incidence of students with severe disabilities across California greater than might be expected by chance alone and, if so, is this variation significant? These are the research questions addressed by the analyses in this chapter. As these analyses are designed to replicate those of the prior study (Parrish et al., 1998), much of the narrative draws from the 1998 report.

Several important premises appear to underlie these questions. A first premise is that observed rates of *identification* and *service* of students in special education may differ significantly from true *incidence* of disability. Second, they appear to assume that *severity* of disability, if known precisely, is related in some systematic way to the *cost* of disability (i.e., the general level of resources needed to provide appropriate educational programs). Further, they suggest that disabilities considered "severe" are subject to less error in identification, i.e., – rates of identification are equal to *true* incidence rates – and that, once identified, students with severe disabilities will require educational programs of somewhat similar cost. The initial problem with creating a straightforward analysis to answer these questions arises from the fact that while all of these assumptions may be valid, they have not been fully tested, and therefore may be false.

This chapter first discusses the concepts and terminology used to describe variability of incidence, and then offers statistical analyses of the variability of incidence for both low incidence and high cost students. After considering alternatives, the approaches outlined in this chapter, although subject to possible weaknesses in the assumptions listed above, were considered best given the present knowledge base and available data.

## *Testing Statistical Significance of Variability*

Given that each SELPA operates independently to identify students, do we observe variations in incidence rates across the SELPAs that are greater than would be expected by chance alone? For example, statewide incidence for the five categories we used in our low incidence category model (see Exhibit 3-1) is .47 percent. If only random factors related to place of birth and residence, for instance, influenced this rate for each SELPA, we would expect to observe variations by SELPA of only plus or minus a few hundredths of a percent.

A statistical test for determining how likely it is that variations in proportions under different definitions of severity occur by chance is called a chi-square. Essentially, as the difference between each SELPA's incidence rate and the state average becomes larger, the test statistic (chi-square) indicates an increasingly small likelihood that these differences have occurred by chance.

## *Modeling Severity*

In our analyses, we first approach the issue of variability of incidence of severity by constructing and testing two different explicit models of "severity." In the first phase of analysis, we group low incidence disability categories as a first approximation to describing a population with "severe"

disabilities. In the second phase, we develop an approach of standardizing the resources allocated to individual students for the purpose of identifying and comparing the incidence levels of "high cost" students across SELPAs (this approach is described in Chapter 4).

## *Low Incidence Category Model*

Using the California Special Education Management Information System (CASEMIS) data , we began with a simple model of severity using five categories of disability – Hard of Hearing, Deaf, Deaf-Blind, Visually Impaired, and Orthopedically Impaired.[21] We calculated these disabilities as the average of the proportions of low incidence students in each SELPA. The proportions consisted of the counts of low incidence students divided by the SELPA's average daily attendance (ADA).

As a group, these disabilities have been treated as "low incidence" disabilities by the state, and consist of sensory and physical deficiencies that can be characterized by precise medically-oriented measurements (e.g., degree of auditory and visual acuity, range of motion, tonicity, gross developmental milestones). These disabilities are known to occur at low rates in the population and they appeal, we suspect, to the lay person's notion that they are somehow more readily, less ambiguously identified across regions and personnel than other categories of disability. In a second model, we added Autism, which is considered by many to be a "severe" disability. Together, these comprised our two models of low incidence categories of severity.

We then applied the chi-square test of equal proportions to data for the 2002-03 school year for 115 SELPAs of residence (excluding LA court and state-operated schools). We further adjusted our incidence estimate by removing school-aged students attending nonpublic schools and residing in licensed children institutions, foster family homes, or residential facilities. These students are removed from the analysis because it is known that their residential placements are non-random, and the current funding formula for these students reimburses SELPAs 100 percent of the cost for their placements.

The preliminary analysis yielded test statistics which suggest that variation is far greater than could be expected by chance differences alone in SELPA incidence rates, using these low incidence categories and the low incidence categories plus Autism (see Exhibit 3-1). Using the chi-square test, it seems that the SELPAs do vary in the incidence of children with severe disabilities residing within their boundaries, and that we cannot account for these variations by random influences alone.

As can be seen in Exhibit 3-1, the average of the proportion of all students in each SELPA identified in 2002 in five or six (including Autism) low incidence categories, respectively, equaled .47 percent and .57 percent. If variations across the 115 typical SELPAs were due to random factors alone, observed incidence rates for these two models of severity would vary only by hundredths of a percentage point. In fact, however, the actual incidence rates range from zero percent to .97 percent for the low incidence category and from zero percent to 1.26 percent for the low incidence plus Autism category. For the first category, the SELPA with the largest proportion of low incidence students residing within its boundaries has an incidence rate that is about *ten times* higher than the rate of the SELPA with the smallest proportion of its students in low incidence categories. In

[21] California Education Code (56026.5.) defines low incidence disabilities to include the following severe disabling conditions: hearing impairments, vision impairments, and severe orthopedic impairments, or any combination thereof.

addition, for the Low Incidence Plus Autism category, the largest proportion of low incidence students is over *twelve times* higher compared to the lowest proportion of low incidence students.

**Exhibit 3-1. Chi-Square Results for the Low Incidence Category Model[1]**

| Model of Severity | Total Number of Students | Mean % | Standard Deviation | Chi Square |
|---|---|---|---|---|
| Low Incidence Only [2] | 28,822 | .47% | .15% | 1,009.9 |
| Low Incidence + Autism | 49,823 | .57% | .16% | 2,373.9 |

[1]Excludes LA court and state schools, and school-aged students residing in LCIs, FFHs, or residential facilities and attending NPS.
[2] Includes Hard of Hearing, Deaf, Deaf-Blind, Visually Impaired, and Orthopedically Impaired
*For samples of this size (df = 114), chi-square test statistics greater than 166 have probabilities less than .001

## *The High Cost Student Model*

Because the services that students with disabilities receive is a proxy measure of the perceived severity of educational needs, we created a second model of severity related to differential allocations of resources. In this model, we used 2002-03 data from CASEMIS, the Special Education Personnel Data Report, and other sources to estimate a standard dollar value of the actual resource allocations made for each of more than 640,000 special education students in the state. This cost estimate procedure is described in Chapter 4.

These estimates allowed us to determine the state average value of educational resources allocated to students with disabilities and when these allocations might be perceived as substantially (e.g., equal to or greater than two standard deviation) above average for typical special education students in California. From these data, we then characterized SELPAs according to the proportion of their high cost students. As with the low incidence model, we excluded school-aged students attending nonpublic schools and residing in licensed children institutions, foster family homes, or residential facilities and conducted the chi-square test for the 115 SELPAs of residence. The SELPA with the lowest incidence of severity by this definition had .05 percent of students, while the SELPA with highest incidence had 1.27 percent of its ADA as high cost students. Again, the highest and lowest SELPA differed by a factor greater than 12. When subjected to the same analysis described above, the results were substantially the same – far greater ($p < .001$) variability than could reasonably be expected by chance variations alone (see Exhibit 3-2).

**Exhibit 3-2 Chi-Square Results for the High Cost Student Model[1]**

| Model of Severity | Total Number of Students | Mean % | Standard Deviation | Chi Square |
|---|---|---|---|---|
| High Cost (% ADA) | 35,894 | 0.52% | 0.23% | 1,531.2 |

[1]Excludes LA court and state schools, and school-aged students residing in LCIs, FFHs, or residential facilities and attending NPS.
*For samples of this size (df = 114), chi-square test statistics greater than 166 have probabilities less than .001

## *Summary*

These analyses show that whether we define incidence of severity on the basis of low incidence categories of disability or measures of above average cost, the observed variability across California's 115 SELPAs is much greater than would be expected by chance alone.

# CHAPTER 4: SEVERITY SERVICE MODEL

## Overview of the service model approach

In this chapter, we describe the process of identifying and calculating the costs of special education placements and services. The sources of information in developing this service model include the California Special Education Management Information System (CASEMIS, December 2002), the Special Education Personnel Data Report for 2001-02, and the J-90 2001-02 certified staff salary files.

For each special education student in California, CASEMIS shows the primary category of disability, the services received, SELPA of service and residence, and a host of demographic information such as age, sex, race, and residential status. The Special Education Personnel Data Report provides information on the number of teachers, administrators, aides, and other certificated staff providing special education services. For the purposes of this study, costs per service were estimated using the 2002 CASEMIS counts of special education students receiving services aligned with 2001-02 personnel and salary data, as 2002-03 data were not available at the time of analysis. The cost estimates derived through this process represent 2001-02 dollars and are inflated by the Cost of Living Adjustment (COLA) for 2002-03 for use in the severity service model adjustment simulation presented in Chapter 5.

All preschool and school age students were included in the cost analysis with the following exceptions:[22]

(1) Students enrolled in exempted SELPAs, ages 0-22 (3,407 students):
    LA County Court Schools
    California State Special Schools
    California Youth Authority
    California Department of Developmental Services
(2) Private and parochial school students, ages 3-22 (1,585)
(3) Students who attend an NPS and whose residential status is a licensed children's institution, foster family home, or residential facility (4,015 students)
(4) Public school students who have no special education services (67 students)
(5) Public school students whose only service is "respite care" (3 students)

The 2002 CASEMIS contained 675,332 student records. A total of 14,645 students (including 5,568 students graded as Infant) were excluded from the cost analysis due to the exceptions listed above.

Using CASEMIS and the state's data report for statewide counts of special education staff, personnel categories were aligned with services, and a staff-student ratio was derived based on the

[22] This required the exclusion of children ages birth to two from CASEMIS. These exclusions were done on the basis of the "grade" variable (i.e., Infant). Students who were ungraded or in Grades 12+/transition were included in these cost analyses.

services received (see Exhibit 4-1 for crosswalk of personnel and services). These ratios, along with average statewide personnel compensation of $59,092 (obtained from the 2001-02 J-90 certified staff salary files), were used to calculate a cost per service. Exhibit 4-2 provides cost estimates for the following service categories: 1) *Preschool* (PRE), 2) *Resource Specialist Program* (RSP), 3) *Special Day Inclusion Services* (SDIS), 4) *Special Day Class*, (SDC), referring to Special Day Classes in public integrated facilities or public separate facilities, 5) *Designated Instructional Services* (DIS), and 6) *Nonpublic School* (NPS). While CASEMIS has additional service variables, such as Regular Class with Accommodation (RCA) and Resource School-Based Services (RSB), in developing the service model these services have been combined with the group of students receiving RSP for reasons described below. See Appendix D for definitions of these settings.

**Exhibit 4-1. Crosswalk Between Special Education Services and Special Education Personnel, 2001**

| SERVICES | SPECIAL EDUCATION PERSONNEL | Total Teachers |
|---|---|---|
| **Placement Services** | | |
| Preschool | Preschool Program Teachers for students ages 3-5[1] | 2,045.5 |
| Resource Specialist Program, Ages K-22 (includes students in Regular Class with Accommodation, Resource School-based Program, and certain SDIS students) | Resource specialists for students ages K-22[1] | 12,282.7 |
| Special Day Inclusion Services, Ages K-22 | Other certified teachers for students ages K-22[1] | 1,179.27 |
| Special Day Class in Public Integrated/Separate Facility, Ages K-22 | Special Day Class Instructor/Teacher for students ages K-22[1] | 17,830.3 |
| **Designated Instructional Services: Preschool through Age 22** | | |
| Adapted Physical Education | Adapted Physical Education and Recreation Specialist | 1,066.0 |
| Recreational services | Adapted Physical Education and Recreation Specialist | 1,066.0 |
| Audiological services | Audiologist | 88.0 |
| Interpreter services | Interpreter *(Last study assigned Classified DIS Provider)* | 794.9 |
| Occupational therapy | Occupational Therapist | 619.9 |
| Physical therapy | Physical Therapist | 89.9 |
| Language and speech | Speech Pathologist | 5,023.2 |
| Social work services | School Social Worker and Counselor | 1,033.2 |
| Guidance Services | School Social Worker and Counselor | 1,033.2 |
| Group counseling | School Social Worker and Counselor, 20% of Psychologists | 1,766 |
| Individual counseling | School Social Worker and Counselor, 20% of Psychologists | 1,766 |
| Parent counseling | School Social Worker and Counselor, 20% of Psychologists | 1,766 |
| Psychological services | School Social Worker and Counselor, 20% of Psychologists | 1,766 |
| Vocational education training | Vocational Education Specialist | 364.4 |
| Vocational counseling | Vocational Education Specialist *(Last study assigned Work-Study Coordinator)* | 364.4 |
| Transition services | Work-Study Coordinator | 49.4 |
| Home and hospital[3] | Other Professional Staff[2] | 2,157.4 |
| Vision services[4] | Other Professional Staff[2] | 2,157.4 |
| Specialized driver training[4] | Other Professional Staff[2] | 2,157.4 |
| Specialized services for low incidence disabilities[4] | Other Professional Staff[2] | 2,157.4 |
| Health and nursing- specialized physical health care services[4] | Other Professional Staff[2] | 2,157.4 |
| Health and nursing - other services[5] | Other Professional Staff[2] | 2,157.4 |
| Education technology services[5] | Other Professional Staff[2] | 2,157.4 |
| Behavior management services[5] | Other Professional Staff[2] | 2,157.4 |
| Assistive services[5] | Other Professional Staff[2] | 2,157.4 |
| Braille transcription[5] | Other Professional Staff[2] | 2,157.4 |
| Reader services[5] | Other Professional Staff[2] | 2,157.4 |
| Note taking services[5] | Other Professional Staff[2] | 2,157.4 |
| Deaf and Hard of Hearing services[4] | Other Professional Staff[2] | 2,157.4 |
| Individual and small group instruction | Other Professional Staff *(Last study assigned Resource Specialist)*[2] | 2,157.4 |
| Orientation and mobility | Other Professional Staff *(Last study assigned Mobility Specialist. Not included in the 2001-02 report)*[2] | 2,157.4 |
| Transportation | *n/a* | |
| Other special education services | *n/a* | |

[1]In addition to teachers, special education aides have been allocated to these services when calculating costs. For SDC and SDIS, differential class sizes and/or aide ratios by disability were used to calculate costs. See Appendix F for class sizes, aide ratios, and numbers of staff by service type generated by the ratios.

[2]"Other Professional Staff" aggregates the eight rehabilitation counselors in the 2001-02 Special Education Personnel Data Report.

[3]Home and/or Hospital Instructors were not included in the 2001-02 Special Education Personnel Data Report, therefore, home and hospital services were reassigned to "Other Professional Staff."

[4]These services were provided by the following categories in the previous study: "Other Certified DIS provider," "Other Licensed Personnel," "Other Diagnostic Staff," and "Other Professional Staff." Because the current Special Education Personnel Data Report no longer reports on the first three personnel categories, these services were reassigned to "Other Professional Staff."

[5]These services were provided by a "Classified DIS Provider" in the previous study. Because the current Special Education Personnel Data Report no longer reports on this personnel category, these services were reassigned to "Other Professional Staff."

**Exhibit 4-2. Estimated Average Standard Cost Per Student by Special Education Service, 2001-02 Dollars[1]**

| Service Category | Service Type | Total Number of Students 2002* | Total Number of Staff | Salaries and Benefits | Instructional Cost** | Cost Including Admin** |
|---|---|---|---|---|---|---|
| (A) | (B) | (C) | (D) | (E) | (F) | (G) |
| **Ages 3-5** | | | | | | |
| PRE | | 37,378 | 6,735 | $6,998 | $7,317 | $7,936 |
| **Ages 6-22** | | | | | | |
| RSP | Includes students receiving Resource Specialist Services, School-Based Resource Services, Regular Class with Accommodation, and certain categories of SDIS students. | 294,255 | 22,160 | $3,566 | $3,729 | $4,044 |
| SDIS | All disabilities, except for Hard of Hearing, Specific Learning Disability, Speech/Language Impairment, and Other Health Impairment. | 2,368 | 2,596 | $35,909 | $37,550 | $40,723 |
| | Hard of Hearing | 49 | 27 | $20,909 | $21,865 | $23,712 |
| SDC | Mental Retardation | 33,807 | 8,801 | $10,496 | $10,976 | $11,904 |
| | Hard of Hearing | 2,253 | 891 | $15,221 | $15,916 | $17,261 |
| | Deafness | 2,615 | 1,034 | $15,221 | $15,916 | $17,261 |
| | Speech/Language Impairment | 13,386 | 2,279 | $7,347 | $7,683 | $8,332 |
| | Visual Impairment | 1,808 | 886 | $19,174 | $20,050 | $21,745 |
| | Emotional Disturbance | 11,857 | 3,859 | $13,121 | $13,720 | $14,880 |
| | Orthopedic Impairment | 8,480 | 3,353 | $15,221 | $15,916 | $17,261 |
| | Other Health Impairment | 6,941 | 1,418 | $8,816 | $9,219 | $9,998 |
| | Specific Learning Disability | 93,164 | 11,517 | $5,947 | $6,219 | $6,744 |
| | Deaf-Blindness | 112 | 118 | $40,588 | $42,443 | $46,030 |
| | Multiple Disability | 4,269 | 2,223 | $20,993 | $21,952 | $23,807 |
| | Autism | 11,328 | 10,202 | $31,495 | $32,934 | $35,717 |
| | Traumatic Brain Injury | 779 | 406 | $20,993 | $21,952 | $23,807 |
| **Ages 3-22** | | | | | | |
| DIS | Language and speech | 263,014 | 5,023 | $1,162 | $1,216 | $1,318 |
| | Home and hospital | 44,196 | 2,157 | $5,082 | $5,314 | $5,764 |
| | Adapted physical education | 44,808 | 1,066 | $1,406 | $1,470 | $1,594 |
| | Audiological services | 5,025 | 88 | $1,056 | $1,104 | $1,197 |
| | Individual counseling | 29,595 | 1,766 | $4,171 | $4,362 | $4,731 |
| | Group counseling | 29,595 | 1,766 | $4,171 | $4,362 | $4,731 |
| | Guidance services | 29,595 | 1,033 | $2,269 | $2,373 | $2,573 |
| | Occupational therapy | 26,533 | 620 | $1,505 | $1,574 | $1,707 |
| | Physical therapy | 4,666 | 90 | $1,242 | $1,299 | $1,409 |

[1]The cost estimates in this exhibit reflect 2001-02 dollars. For the severity service adjustment simulation in Chapter 5, these estimates were inflated to 2002-03 using the Cost of Living Adjustment (2.0 percent).
*The counts of students presented in this column do not necessarily represent the number of students actually receiving the specific service, as students were often grouped with students receiving other services. See Exhibit 4-1 for the service groupings and Exhibit 2-35 for counts of students receiving each service in 2002-03.
** "Instructional Cost" component reflects the salary and benefits amount multiplied by 1.0457, to account for non-personnel costs in providing services. The "Cost Including Administration" is the instructional cost multiplied by 1.0845, to account for administrative costs. These multipliers are discussed in Appendix E.

**Exhibit 4-2. Estimated Average Standard Cost Per Student by Special Education Service, 2001-02 Dollars[1] (Continued)**

| Service Category | Service Type | Total Number of Students 2002* | Total Number of Staff | Salaries and Benefits | Instructional Cost** | Cost Including Admin** |
|---|---|---|---|---|---|---|
| (A) | (B) | (C) | (D) | (E) | (F) | (G) |
| | Orientation and mobility | 44,196 | 2,157 | $3,465 | $3,623 | $3,930 |
| | Parent counseling | 29,595 | 1,766 | $4,171 | $4,362 | $4,731 |
| | Social work services | 29,595 | 1,033 | $2,269 | $2,373 | $2,573 |
| | Vocational education training | 10,595 | 364 | $2,030 | $2,123 | $2,302 |
| | Recreation services | 44,808 | 1,066 | $1,406 | $1,470 | $1,594 |
| | Individual /small group instruction | 44,196 | 2,157 | $2,310 | $2416 | $2,620 |
| | Vision services | 44,196 | 2,157 | $3,465 | $3,623 | $3,930 |
| | Specialized driver training | 44,196 | 2,157 | $231 | $242 | $262 |
| | Psychological services | 29,595 | 1,766 | $4,171 | $4,362 | $4,731 |
| | Specialized services for low incidence disabilities | 44,196 | 2,157 | $3,465 | $3,623 | $3,930 |
| | Health and nursing - specialized | 44,196 | 2,157 | $6,930 | $7,247 | $7,859 |
| | Health and nursing - other | 44,196 | 2,157 | $924 | $966 | $1,048 |
| | Interpreter services | 1,005 | 795 | $23,731 | $24,816 | $26,913 |
| | Education technology/Assistive services | 44,196 | 2,157 | $693 | $1,055 | $1,145 |
| | Behavior management services | 44,196 | 2,157 | $1,155 | $1,208 | $1,310 |
| | Braille transcription | 44,196 | 2,157 | $1,155 | $1,759 | $1,908 |
| | Reader services | 44,196 | 2,157 | $1,156 | $1,209 | $1,311 |
| | Note taking services | 44,196 | 2,157 | $1,155 | $1,208 | $1,310 |
| | Transition services | 3,692 | 49 | $784 | $820 | $889 |
| | Vocational counseling | 10,595 | 364 | $2,030 | $2,123 | $2,302 |
| | Deaf and Hard of Hearing services | 44,196 | 2,157 | $3,465 | $3,623 | $3,930 |
| | Transportation | 43,820 | n/a | n/a | n/a | $4,650 |
| | Other special education services | 4,977 | n/a | $581 | $608 | $659 |
| NPS In-State (ages 3-22) | | 9,547 | | | | $30,000 |
| NPS Out-of-State (ages 3-22) | | 289 | | | | $35,000 |

[1]The cost estimates in this exhibit reflect 2001-02 dollars. For the severity service adjustment simulation in Chapter 5, these estimates were inflated to 2002-03 using the Cost of Living Adjustment (2.0 percent).
*The counts of students presented in this column do not necessarily represent the number of students actually receiving the specific service, as students were often grouped with students receiving other services. See Exhibit 4-1 for the service groupings and Exhibit 2-35 for counts of students receiving each service in 2002-03.
** "Instructional Cost" component reflects the salary and benefits amount multiplied by 1.0457, to account for non-personnel costs in providing services. The "Cost Including Administration" is the instructional cost multiplied by 1.0845, to account for administrative costs. These multipliers are discussed in Appendix E.

## *Reassignment of Students*

The cost analysis rests on numerous assumptions developed during discussions with the Stakeholder Committee. For example, students in General Education Classroom with Accommodation (RCA) and in Resource School-based Programs (RSB) were grouped with the count of students in Resource Specialist Program (RSP) to determine their costs. Ambiguity in the CASEMIS codes made it difficult for the study team and stakeholders to determine how the services and personnel providing them differed among the three settings.

Furthermore, the Stakeholder Committee indicated that Special Day Inclusion Services (SDIS) were intensive inclusive services provided to severely disabled students in the general education classroom. Accordingly, SDIS students with less severe disabilities—Specific Learning Disabilities (SLD), Speech/Language Impairment (SLI), and Other Health Impairment (OHI)—were reassigned to the group of students receiving Resource Specialist Program (RSP) services. This is not to say that SDIS students with SLD, SLI, or OHI are receiving RSP services, but for the purposes of assigning costs to these students, it was determined that the best basis for making a cost determination was to treat them as RSP students.

CASEMIS now allows students to be recorded as receiving various placement services. While CASEMIS recorded a student's primary placement until 2001, beyond this CASEMIS provides no such distinction. For instance, a student could be coded as receiving both RSP and Special Day Classes (SDC) services, or both SDC and SDIS services, and so forth. For cost analysis purposes, however, it is important to determine a primary placement and not attribute the full cost estimates of all placement services, which would make students appear inordinately costly. Thus, to avoid double counting in constructing student-level cost estimates, the default service placement was SDC in cases of overlap between SDC and other services. Default placements in other instances of possible double counting of primary placement were SDIS, and then RSP. In other words, an SDC and SDIS student was counted as receiving SDC only. If a student received RSP and SDIS services, the student was counted as receiving SDIS only. Students in the RSP group were counted only once, regardless of whether they were coded as receiving multiple services (RSP, RSB, and/or RCA). Students who were recorded as attending public schools and had a service code of "SDC in nonpublic school (NPS)" were recoded as attending NPS schools, and therefore not included in the SDC counts. These decision rules regarding multiply classified students were substantiated by the Stakeholder Committee.

Because the personnel data provide counts of SDC, RSP, and other certified teachers serving students from kindergarten through age 22, these placement counts reflect public school students only and excluded children in the preschool grade. Instead, public school preschoolers were assigned costs based on the number of preschool teacher personnel and aides. After reassigning and combining students in certain placements, and accounting for multiple placements, we derived costs per service using these revised counts and student-staff ratios, as described below.

## *Per Pupil Cost for Special Day Class (SDC)*

A standardized cost per student in an SDC was calculated using class sizes and teacher-aide ratios updated from the previous study and further refined to reflect changes in student and staff numbers (Appendix F).[23] The numbers of students by disability receiving SDC were divided by the class size for each disability category.[24] The results—the number of SDC teachers—were multiplied by the statewide standardized teacher salary ($59,092) in 2001-02. The class sizes were designed to be appropriate for each disability category, as determined by the Stakeholder Committee, and to generate a total number of SDC teachers that reflected the actual number of SDC teachers in the state in 2001-02. The number of teachers were then multiplied by the teacher-aide ratios to determine number of aides for each disability category. The number of aides was multiplied by a standardized aide salary and benefits amount of $30,000 (See Appendix E). The total cost of teachers and aides was divided by the number of SDC students in that disability category to arrive at a per student cost. The total number of staff (Column D in Exhibit 4-2) for SDC represents both teachers and aides, and the "Salary with Benefits" amount reflects the costs of both personnel.

It is important to note that the average revenue limit for each SELPA was deducted from the cost of SDC students as well as from NPS students. The revenue limit is a specific combination of state and local property taxes that a school district may receive per average daily attendance for its general education program. *This is a change from the prior study, and emphasizes the marginal, rather than the total, cost of all special education students.* An average revenue limit was calculated separately for each SELPA of residence, weighting for school district type.[25] While the base revenue limit for each individual SELPA was used as a deduction, the average revenue limit across all SELPAs was $4,721. The cost estimates presented in Exhibit 4-2 reflect SDC and NPS estimates *prior* to deducting the revenue limits.

## *Per Pupil Cost for Special Day Inclusion Service (SDIS)*

Likewise, the estimated cost per student receiving SDIS includes the costs for both teachers and aides. To calculate the aide cost, we were advised by the Stakeholder Committee to use a student-aide ratio of 1:1 for all disabilities except for Hard of Hearing, Specific Learning Disability, Speech/Language Impairment, and Other Health Impairment. Children who were Hard of Hearing were allocated a half-time aide. However, students receiving SDIS who also received interpreter services were not allocated an instructional aide (this affected 5 students who were Hard of Hearing and 8 who were Deaf). As mentioned, students receiving SDIS with high incidence conditions, i.e. Specific Learning Disabilities, Speech/Language Impairments, and Other Health Impairments, were reassigned to the group of students receiving RSP. The Stakeholder Committee indicated that the personnel category "other certified teachers" often provide support to general education teachers and modify the curriculum for SDIS students. A 10:1 student-teacher ratio was used to determine the number of teachers providing SDIS support, and that number was multiplied by the standardized

[23] These class sizes and aide ratios are not implied standards, but are merely ratios used for best allocating total state staff available for the purpose of cost estimates.
[24] As mentioned, students with public school codes and coded as receiving "SDC in NPS" were treated as NPS students and not included in the SDC cost estimates.
[25] The base revenue limits for each district for 2001-02 were provided by the Fiscal and Administrative Services Division, California Department of Education.

teacher compensation of $59,092. This amount was divided by the number of SDIS students and added to the aide cost, to arrive at a per pupil cost of $20,909 for Hard of Hearing students and $35,909 for all other disabilities. Columns D and E in Exhibit 4-2 represent the combined number of and compensation for both teachers and aides.

While there are 1,179 teachers in the "other certified teacher" category, the 10:1 ratio generated only 242 teachers serving SDIS students. The compensation for the remaining number of other certified teachers was applied across the RSP group, resulting in $188 per pupil. This amount was added to the cost of RSP teachers and aides serving students in the RSP group, as described below.

As SDC and SDIS personnel ratios were not developed for Established Medical Disability (EMD), a category that applies to 3-5 year olds, 62 SDC or SDIS students with EMD were instead assigned a preschool cost.

## *Per Pupil Cost for Resource Specialist Program (RSP)*

As discussed above, the number of students in RSP also includes RCA, RSB, and certain SDIS students. The cost per student in this group was determined as the number of RSP teachers multiplied by the standardized teacher compensation. A 1:0.7 teacher-aide ratio was used, and the resulting number of aides was multiplied by the standardized aide compensation of $30,000. The results of these calculations were summed and divided by the number of students in the generic RSP group. As mentioned above, students in this group also received a cost of $188 for services provided by "other certified teachers." As with SDC and SDIS, 22,160 (Column D in Exhibit 4-2) represents all personnel types serving these students, and $3,566 (Column E) represents the per student cost of teachers (both RSP and "other certified teachers") and aides.

## *Per Pupil Cost for Preschool*

For preschool, we divided the salaries and benefits of all preschool teachers in the state by the total count of public school students graded as preschool (37,378), regardless of whether they were recorded as receiving specific placement services, such as SDC, or RSP. In addition to this teacher cost, a 1:2.3 teacher-aide ratio was used to estimate the low cost. The cost per preschool student, $6,998, reflects the salaries and benefits of both the teachers and aides.

## *Per Pupil Cost for Designated Instructional Services (DIS)*

Using adapted physical education (APE) as an example, we generated a count of the total number of students receiving APE services statewide from CASEMIS, and compared it to the total number of adapted PE instructors and recreational therapists (1,066) across the state, derived from the Special Education Personnel Data Report. The ratio of children receiving services to the number of personnel was then multiplied by the statewide standardized teacher salary and benefit amount of $59,092. The resulting value was the estimated cost of salary and benefits for one student receiving APE services. This approach was applied to all Designated Instructional Services (DIS) in CASEMIS. The counts of students receiving DIS included students in preschool through age 22.

Estimated personnel salaries and benefits for DIS staff were further refined based on data from a recent national study on special education expenditures (Chambers et al., 2003; see Appendix E).

We multiplied J-90 average compensation by multipliers as derived from national data reflect specialists' salaries relation to the average teacher salary. Based on these data, multipliers were applied as follows: audiologists (1.02), speech pathologists (1.03), physical and occupational therapists (1.09), counselors and social workers (1.1), and school psychologists (1.3).

Per discussions with the Stakeholder Committee, 20 percent of the counts of psychologists were combined with the number of social workers and counselors when calculating the costs of psychological services and group, individual, and parent counseling. Stakeholders asserted that psychologists also provided these services (although not in a full-time capacity) to special education students and therefore the costs should reflect these personnel.

A similar approach to deriving average service costs was employed in the 1998 precursor to this study. However, it is important to note that variations exist between the 1998 alignment of services and personnel and the present crosswalk. For example, home and/or hospital instructors are no longer reported separately in the personnel report. Therefore, we aggregated students receiving these services with the group of students receiving services provided by "Other Professional Staff" (as determined by the study team and verified by the stakeholders). Please see the footnotes in Exhibit 4-1 for further clarification. Such reworking of the crosswalk has an impact on the cost per service, and accordingly, caution should be used in comparing the 1998 cost estimates to those generated in this analysis.

Moreover, it was deemed inaccurate to apply the same cost to all services provided for by "Other Professional Staff," given the variety of services included in this group. Fifteen services were aligned with "Other Professional Staff," as there was no clear alignment with other available personnel categories. These services ranged from note taking to technology to health services. If these services were treated equally, $2,885 would be applied to a student receiving any of these services whether it be home and hospital instruction or specialized driving training. With input from the Stakeholder Committee, these services were weighted to differentiate between what they considered to be more and less expensive services (see Appendix G). As a check, the total salary and benefit amount generated by the weights could not exceed the total compensation for the statewide count of "Other Professional Staff." Educational Technology and Assistive Services were combined into a single group, as it was not clear how these two categories differed.

As it was unclear which category of staff best aligned with students coded as receiving "other special education services," we were advised by our Stakeholder Committee to use half of the most common and one of the lowest designated instructional service salary and benefits amount, which was for language and speech services. This resulted in a cost of $581 per student designated as receiving "other special education services." Additionally, a flat cost of $4,650 per student was applied to students receiving special transportation services.[26]

[26] The transportation figure of $4,650 was obtained from the 1999-2000 Special Education Expenditures Project (SEEP), a national study on special education expenditures, adjusted to 2001-02 dollars. See Chambers, Parrish, & Lam (2002).

## *Non-Personnel and Administrative Multipliers*

In addition to calculating standardized personnel costs for each special education service, standard multipliers were used to uniformly apply non-personnel and administrative costs. [27] Using a 1.0457 multiplier, non-personnel costs were added to the salary and benefits amount (Column E in Exhibit 4-2) to equal the full instructional cost (Column F). Two exceptions to this were the Educational Technology/Assistive Services and Braille Transcription. As these services are known to have high equipment costs, the non-personnel multiplier was increased by 50 percent to 1.52285 at the recommendation of the stakeholders.

Administrative costs were then added to the instructional costs, using a 1.0845 multiplier. Both of these multipliers, derived from recent national data from the Special Education Expenditure Project, were uniformly applied across all services (except NPS settings) and SELPAs. Consistent with the standardized approach, students receiving speech in rural SELPAs would show the same standardized service cost estimate as that applied to students in urban SELPAs. The total estimates for each service, reflecting personnel, non-personnel, and administrative costs, are shown in Column G of Exhibit 4-2.

## *Students in Nonpublic Schools*

There are three groups of NPS students:[28]

- In-State NPS: Students ages 3-22 who attend a nonpublic school (NPS) in the state
- Out-of-State NPS: Students ages 3-22 who attend an NPS outside of California
- LCI/NPS: School-aged students who reside in a licensed children's institution (LCI), family foster home (FFH), or residential facility and attend an NPS in the state

A flat amount of $30,000 was used for in-state NPS students and $35,000 for out-of-state NPS students.[29] In the 1998 study, the research team was able to calculate a standard cost for NPS students by using the J-50 Special Education Entitlement Forms, which are no longer maintained. The team and the Stakeholder Committee for this study derived figures from this study by examining other data sources, such as the stakeholders' own records of NPS expenditures, the Annual NPS/LCI Appropriation for 2001-02, and national data from the Special Education Expenditure Project (SEEP).

All school-aged students attending an in-state NPS and residing in an LCI, FFH, or residential facility are excluded from current analysis. School districts or county offices of education may claim reimbursement from the state for students attending NPS and residing in LCIs or FFHs. There are exceptions to this reimbursement, such as students with Serious Emotional Disturbance who are placed in LCIs by County Mental Health (e.g., "AB 3632" placements). Also not eligible are students placed in LCIs whose parents live in the district where the student in placed and who are

[27] These multipliers were derived from national data from the Special Education Expenditure Project (Chambers et al., 2002). See Appendix E for more details.
[28] These NPS groups include students who had public school codes yet were recorded as receiving SDC in NPS.
[29] These figures represent the 2001-02 cost estimates; they are inflated to 2002-03 dollars in the severity service adjustment model.

responsible for the student's educational rights. However, CASEMIS variables do not specify the placing agency, nor do they identify parents who retain educational rights. As the best approximation of this group, the team excluded *all school-aged* students who reside in an LCI, FFH, or residential facility and attend an in-state NPS (4,015 students). Preschool and out-of-state LCI/NPS students are generally not eligible for reimbursement, and therefore these students were assigned the cost estimates applied to in-state and out-of-state NPS placements. Comparing the 2002 CASEMIS data to the draft file of the 2002-03 state reimbursement for NPS/LCI children, we found that the CASEMIS counts by district of school-aged LCI/FFH/residential students are somewhat similar to the ADA of LCI/NPS students for whom districts received reimbursement. We also found similar results when comparing the 2001 CASEMIS to the 2001-02 state reimbursement file.

As with the Special Day Class, the research team deducted the average revenue limit for each SELPA from the cost of NPS students to estimate the marginal special education cost.

## Examples of Cost Profiles

The research team used the estimated standardized costs for special education services to calculate the total cost of services for each child in CASEMIS, adjusted to 2002-03 dollars. In the severity service simulation discussed in the following chapter, these costs were assigned to the SELPA of residence. However, as another SELPA may actually provide the specified services, the study team and stakeholders gave considerable consideration as to whether the simulations in this report should be based on the SELPA of service or the SELPA of residence. The final decision was based on several factors. First, the SELPA of residence has the fiscal responsibility for each student, and when a different SELPA provides services to the child, it has the right to be fully reimbursed by the SELPA of residence. Perhaps the most compelling argument, however, is that under a SELPA of service approach, when counties choose to cluster their highest need students in a single SELPA, this SELPA will likely appear much more impacted than any of the SELPAs in counties that do not choose this strategy, thus creating a fiscal incentive for this practice. The real question relates to how students with disabilities are distributed throughout the state and whether the students residing in one area are of unusually high severity in relation to others. If yes, the funding should go to the SELPA responsible for the provision of service. If other SELPAs choose to serve these students, they have the option (and the right) to seek full reimbursement from the sending SELPAs of residence.

Accordingly, cost profiles were calculated for each special education student, representing the total cost of special education services. For public school students, the total cost was the sum of all services that a student received, with the exception of multiple instructional settings. For instance, a student receiving SDIS, SDC, and two related services (DIS) would generate costs for SDC and the two related services.

As mentioned, $30,600 was applied to students attending in-state NPS, and $35,700 for out-of-state NPS students.[30] These costs for NPS students are intended to reflect both the tuition and related services.

[30] The estimates shown in Exhibit 4-2 have been adjusted to 2002-03 dollars in this section.

Exhibit 4-3 illustrates the individualized service cost estimates for five sample students drawn from the CASEMIS file and reflects the 2002-03 inflated amounts that are used in the severity service model described in Chapter 5. Although SELPAs can record up to eight services per student, in the interests of space, the exhibit includes up to four. Even with this cap, it still demonstrates a range of individual estimated costs. Student A receives three related services: "Speech/Language," "Group Counseling," and "Occupational therapy." Because the student does not receive RSP, SDC, or NPS services, he does not incur those costs. Therefore, the total estimated cost profile for this student is only the sum of expenses for the DIS services, which is $7,911.

On the other hand, Student B receives SDIS and the service cost for Orthopedic Impairment, the student's disability, is $41,538. With the addition of the DIS, the total special education spending for this student is $46,250. Student C is served in an SDC. As shown in Exhibit 4-2, the service cost is associated with the student's disability category. Student C is Deaf, thus his SDC cost is $17,606. A general education component—based on the average revenue limit of the SELPA in which the student resides—was subtracted from the SDC cost. The total cost profile is the sum of the costs of SDC and the DIS services received. Both Student B and C are regarded as "high cost students" as their total cost exceeds the cutoff point of $20,443, as determined by the research team and Stakeholder Committee (see chapter 5).

Student D receives both RCA and RSP. For the purposes of estimating costs, both types of services were treated the same and students receiving both services were assigned a single cost. Since this student does not receive additional services, the student cost equals RCA or RSP cost of $4,125. Although Student E receives SDC services, he is assigned the cost of preschool ($8,095) as he is in the preschool grade. It should be noted that Exhibit 4-3 represents examples of public school students. For NPS students, as mentioned above, the cost is a fixed value regardless of the student's setting and services. A general education component was subtracted from NPS costs in the same manner it was subtracted from the SDS costs.

**Exhibit 4-3. Sample of Five Students and Individual Service Cost Estimates, Adjusted to 2002-03 Dollars**

| Student | Disability | Service 1 | Service 2 | Service 3 | Service 4 | Total Cost |
|---|---|---|---|---|---|---|
| A | Speech/ Language | Language and Speech ($1,345) | Group Counseling ($4,825) | Occupational therapy ($1,741) | - | $7,911 |
| B | Orthopedic Impairment | Special Day Inclusion Services ($41,538) | Occupation al therapy ($1,741) | Adapted Physical Education ($1,626) | Language and Speech ($1,345) | $46,250 |
| C | Deafness | Special Day Class in Public Integrated Facility ($17,606) minus revenue limit ($4,792) | Interpreter services ($27,451) | Individual Counseling ($4,825) | Language and Speech ($1,345) | $46,435 |
| D | Specific Learning Disability | Regular Class with Accommodations ($4,125) | Resource Specialist ($4,125) | - | - | $4,125 |
| E | Orthopedic Impairment | Special Day Class in Public Integrated Facility[1] ($17,606) | Language and Speech ($1,345) | Adapted Physical Education ($1,626) | Health and Nursing – Specialized ($8,017) | $19,083[1] |

Note: Costs of services appear in parentheses under service names.
[1] This is a preschool student, thus his cost is based on the cost for preschool setting ($8,095) and not the cost for a Special Day Class for that disability category.

Based on these types of cost profiles, the research team calculated a total estimated cost of services for each SELPA, as well as an average cost per student by SELPA. The following chapter explains how these estimates and other factors were used in calculating the severity adjustments.

# CHAPTER 5: SEVERITY SERVICE ADJUSTMENT

The approach used to calculate the severity service adjustment was first developed by Parrish et al. (1998) and refined in this study. It focuses specifically on the population of high cost students in each SELPA. As described in Chapter 4 of this report, each special education student has a cost profile, which is the total standardized cost for all special education services that student receives. The cost estimates presented in Exhibit 4-2 have been inflated to 2002-03 dollars for the purpose of estimating each student's cost profile and calculating the severity service adjustments.

We then calculated the statewide average cost per special education student, and measured the dispersion of these costs based on standard deviations from the mean (or average). Based on the standardized approach, the average cost per special education student is $6,419, and the standard deviation is $7,012. Students with cost profiles at or above the statewide average cost per special education student plus two standard deviations ($20,443) were determined to be high cost, in accordance with numerous discussions with the Stakeholder Committee. These individual high cost profiles were then summed by SELPA of residence.

Two ceilings were established in this model. In the first, a ceiling of $60,000 was used as the maximum allowable *amount* when calculating individual high cost students. This amount was determined to be a reasonable maximum in discussions with the stakeholders to mitigate against one or two very high cost students distorting the SELPA total. The threshold at which SELPAs become eligible for the NPS Extraordinary Cost Pool Fund was $61,971 in 2002-03, and thus the $60,000 ceiling for the severity adjustments was believed appropriate. Costs beyond $60,000 per student were deducted from the total for each SELPA.

The second ceiling was established regarding the *number* of high cost students allowed. The statewide average percentage of high cost students plus two standard deviations was used as the ceiling for the percentage of high cost students allowed in each SELPA. This ceiling was derived to place some reasonable limit on the number of high cost students credited to any one SELPA. The number of high cost students *exceeding* this ceiling in a SELPA was multiplied by the average amount for a high cost student in that SELPA, with the sum being deducted from the SELPA's total. The amount remaining after these two ceilings were applied constitutes the SELPA's net high cost student amount.

The severity service model is based on how SELPAs' net costs relate to the statewide average. The study team determined what the total high cost amount would be if each SELPA was serving students at the statewide average. The total statewide cost of serving high cost students was divided by the number of high cost students in the state to determine the average amount for a high cost student. This average amount was multiplied by the number of high cost students there would be if each SELPA was serving students at the statewide average incidence rate. The estimated cost of serving high cost students at the statewide incidence rate was subtracted from the SELPA's net high cost, to determine SELPAs with excess high costs. In other words, this identifies SELPAs that have costs greater than if they had the statewide average of high cost students.

This alone, however, does not qualify a SELPA for severity funds. The team also looked at the SELPAs' special education revenues in relation to what the revenues would be if the SELPAs were at the statewide AB 602 target rate. Each SELPA's revenue was calculated by multiplying its base AB 602 rate by its ADA. Then the revenue generated at the statewide target rate was subtracted from the actual revenues to determine excess revenues. These excess revenues were then compared to the excess costs derived above.

The incidence multiplier itself is calculated by dividing the excess high cost by the estimated revenue at the statewide target rate. If a SELPA does not have excess high costs, the multiplier is set at 1.0. Because SELPAs may have revenues that exceed the statewide average (i.e., excess revenues), a multiplier greater than 1.0 does not necessary generate funds as indicated below:

- If there were no excess high costs, the SELPA does not generate severity service funds.
- If the excess revenue is greater than the excess high cost, the SELPA does not generate severity service funds.
- If the excess cost is greater than the excess revenue, the excess revenue was deducted from the excess high cost, and the remainder is the severity service fund amount.
- If there were no excess revenues, the SELPA would be eligible to receive severity service funds for the full amount of the excess costs.

These analyses produce a statewide estimate of special education for preschool and school-aged children of $4.2 billion when deducting SELPAs' revenue limits from the costs of Special Day Class and nonpublic schools. The estimated cost to the state for implementing the revised incidence multipliers, without respect to phase-in, is approximately $103.2 million in the first year (implementation options are discussed in Chapter 8). Exhibit 5-1 provides the summary information for the severity adjustment model, while Exhibit 5-2 presents SELPA-level results.

**Exhibit 5-1. Summary of Severity Service Adjustment Model**

| | |
|---|---|
| Estimated total special education spending, not deducting SELPAs' revenue limits from SDC and NPS costs | $5,211,337,936 |
| Estimated total special education spending, deducting SELPAs' revenue limits from SDC and NPS costs | $4,240,467,047 |
| Average special education cost per student | $6,419 |
| Standard deviation | $7,012 |
| High cost student (average + 2 standard deviations) | $20,443 |
| State average percentage of high cost students | 0.61% |
| Standard deviation of state average | 0.25% |
| High cost percentage ceiling | 1.11% |
| Number of high cost students | 35,894 |
| Average special education cost per high cost student | $30,542 |
| Standard deviation of average high cost student | $7,422 |
| Lowest cost of high cost students | $20,451 |
| Highest cost of high cost students | $86,681 |
| High cost ceiling | $60,000 |
| **Number of SELPAs with multiplier** | **38** |
| **Number of SELPAs to receive adjustment** | **30** |
| **Total severity service adjustment** | **$103,225,996** |

It should be noted that the simulations above exclude all students for whom districts currently receive 100 percent reimbursement for their special education costs.[31] These are school-aged students residing in licensed children's institutions (LCI) or foster family homes (FFH), who receive their special education services from an in-state nonpublic agency or school. However, the state is currently examining a proposal to provide a more uniform base of funding for LCI and FFH children, irrespective of where, and from whom, they receive special education services.[32] If these provisions were adopted, the state would provide funds based on the count of all LCI/FFH students independent of the type or the location of the services provided (e.g. public vs. nonpublic schools). Consequently, 8,922 students—of whom 940 were considered "high cost"—currently included in the severity service analysis would be excluded under this approach. In a simulation that removed all students residing in an LCI, FFH, or residential facility, the total severity supplement decreased from $103.2 million to $100.5 million. Thirty-eight SELPAs would have positive severity multiplier, of which 29 would receive a severity supplement (see Appendix A for the multipliers).

[31] As a best approximation of this population using CASEMIS data, the study team excluded all school-aged students whose residential status was an LCI, FFH, or residential facility and whose school code was an in-state NPS.

[32] The *Study of the Policies, Procedures, and Practices Affecting the Education of Children Residing in Group Homes* (Parrish, et al., 2003) can be found at http://www.cde.ca.gov/fasdiv/fiscalpolicy/polprorft.htm

The components of the severity service model in Exhibit 5-2 are described more fully below.

**Col. A** presents the SELPA name.
**Col. B** is the SELPA current base state AB 602 allocation for 2002-03.
**Col. C** is the number of all students with cost profiles at or above $20,443 (i.e., high cost students).
**Col. D** represents the number of students that exceeds the maximum for high cost students. This is calculated using the following steps.

- Derive the statewide average percentage of high cost students (0.61%), and based on the variations in this percentage across SELPAs, derive a measure of the standard deviation of this distribution (0.25%). The statewide percentage plus two standard deviations was used as a ceiling on the allowable percentage of high cost students (1.11%). The statewide average percentage (0.61%) differs from the mean (0.52%) used in the chi-square analysis test for high cost students (Exhibit 3-2). The second mean represents the average of the proportions of high cost students in each SELPA, whereas the mean used in the severity service model is the number of high cost students statewide divided by total ADA statewide.
- Multiply the allowed rate (1.11%) by the SELPA's ADA to determine allowed number of high cost students. Subtract the allowed amount of high cost students from the actual amount of high cost students to determine the number of students exceeding the maximum. This number appears in Column D.

**Col. E** shows what would be the number of high cost students in a SELPA if its proportion of the ADA was equal to the state average proportion. This column was calculated by multiplying the state average proportion (0.61%) by the SELPAs' ADA (Column F).
**Col. F** presents the 2002-03 ADA based on the AB 602 report.
**Col. G** is the percentage of high cost students by SELPA as a percentage of total ADA (Column C divided by Column F).
**Col. H** is the total cost for all high cost students within a SELPA.
**Col. I** represents the deduction based on the maximum allowable amount to be calculated for an individual high cost student, which was $60,000. The difference between this ceiling and the actual standardized cost estimates for these students was calculated for each SELPA and is shown in Column I.
**Col. J** is the total estimated cost of the number of students that exceeds the maximum rate for high cost students in each SELPA (Column J = Column D * the average cost per high cost student in each SELPA). It is used to determine each SELPA's deduction if in excess of the allowable ceiling high cost incidence rate.
**Col. K** is the total net amount for high cost students by SELPA after the deduction are applied (Column K = Column H – (Column I + Column J)).
**Col. L** shows an estimate of what the total high cost student amount would be if the SELPA were serving students at the state average. This is calculated using the following steps:

- Determine the state average high cost student amount ($30,542) by dividing the statewide high cost total ($1,096,277,136 from Column H) by the statewide high cost student count of 35,894 from Column C.
- Multiply the state average high cost student cost by the number of high cost students in a SELPA at the statewide average incidence rate(Column L = Column E * $30,542).

**Col. M** shows an estimate of total revenues per SELPA by multiplying each SELPA's current base state allocation (Column B) by its ADA count (Column F).

**Col. N** shows what these revenues would be at the target rate per ADA ($525) by multiplying this amount by the ADA count in Column F.

**Col. O** is the excess high cost student amount. This is the difference between what the SELPA is providing to high cost students in relation to what they would be providing at the statewide average (Column O = Column K – Column L). This value only appears in Column O when positive (i.e. Column K is greater than Column L), to indicate high cost student amounts in excess of the statewide average.

It should be noted that when Column K is compared to Column L, the deductions from Column K (i.e. I and J) have not been applied to Column L. For this reason, the excess high cost student amount shown in Column O somewhat underestimates the full excess costs for this population of students. The deductions shown in Columns I and J are designed to allow excess costs beyond the specified ceiling to be borne at the SELPA level, reducing any future fiscal incentives to provide high cost services.

**Col. P** is the excess revenues over the state average (Column M - Column N). It is shown only when positive (i.e. when there are excess revenues over the state average).

**Col. Q** represents the severity supplement for each SELPA. It is calculated as the amount left from excess high costs after any excess revenues beyond the state average have been fully counted (Column Q = Column O – Column P).

**Col. R** is the Incidence Multiplier. It is calculated by dividing Column O, excess high cost, by Column N, estimated total revenue at the state average, *plus one*. If supplemental high costs are not shown in Column O, this multiplier is set at 1.0.

**Col. S** represents the supplement per ADA. It is calculated by multiplying the incidence multiplier (Column R) by the statewide target rate per ADA of $525. Column S represents the amount per ADA above the target rate per ADA a SELPA is eligible to receive. Some of these funds are included in the SELPAs' base rate (Column P) and the balance in their severity supplement (Column Q).

**Col. T** Using the incidence multiplier, it is possible to calculate the growth ADA rate for each SELPA, adjusting for the incidence of disabilities, consistent with the language of SB 1564, Section 17. Future growth ADA rate per SELPA is calculated by multiplying the Incidence Multiplier (Column R) by the state target AB 602 rate of $525.

**Exhibit 5-2. Severity Service Adjustments by SELPA, 2002-03**

| A | B | C | D | E | F | G | H | I | J | K |
|---|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Current base state alloc | # of high cost students | # of students over % ceiling | # of high cost students at state avg | 02-03 ADA | % high cost students of ADA | Total cost of high cost students | Deduction 1: Total SELPA cost of students over max $ | Deduction 2: Total SELPA cost of students over % ceiling | Total NET SELPA cost |
| Anaheim CESD | 528 | 84 | 0 | 130 | 21,398 | 0.39% | $2,720,720 | $0 | $0 | $2,720,720 |
| Antelope Valley (Palmdale USD) | 528 | 206 | 0 | 447 | 73,608 | 0.28% | $6,360,074 | $0 | $0 | $6,360,074 |
| Bakersfield CESD | 528 | 109 | 0 | 160 | 26,378 | 0.41% | $3,150,933 | $0 | $0 | $3,150,933 |
| Butte COE | 595 | 133 | 0 | 194 | 31,995 | 0.42% | $4,460,283 | $0 | $0 | $4,460,283 |
| Clovis USD | 528 | 119 | 0 | 194 | 31,886 | 0.37% | $3,582,505 | $0 | $0 | $3,582,505 |
| Colusa COE | 528 | 31 | 0 | 25 | 4,187 | 0.74% | $1,386,923 | $0 | $0 | $1,386,923 |
| Contra Costa (Acalanes UHSD) | 592 | 475 | 0 | 538 | 88,453 | 0.54% | $14,144,699 | $0 | $0 | $14,144,699 |
| Corona-Norco USD | 528 | 200 | 0 | 242 | 39,830 | 0.50% | $6,244,020 | $446 | $0 | $6,243,574 |
| Desert/Mountain (San Bernardino COE) | 528 | 310 | 0 | 489 | 80,417 | 0.39% | $8,865,810 | $0 | $0 | $8,865,810 |
| East County (San Diego COE) | 528 | 628 | 0 | 467 | 76,867 | 0.82% | $19,126,277 | $822 | $0 | $19,125,455 |
| East Valley (San Bernardino COE) | 528 | 327 | 0 | 516 | 84,925 | 0.39% | $8,588,823 | $0 | $0 | $8,588,823 |
| El Dorado COE | 528 | 82 | 0 | 139 | 22,869 | 0.36% | $2,654,507 | $0 | $0 | $2,654,507 |
| Elk Grove USD | 550 | 386 | 0 | 304 | 49,939 | 0.77% | $12,914,410 | $0 | $0 | $12,914,410 |

| | L | M | N | O | P | Q | R | S | T |
|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Est total high cost amt at state avg | Est total revenues | Est total revenues at state avg | Excess high cost amt | Excess revenues over state avg | Severity supplement | Incidence multiplier | Supplement per ADA | Future growth ADA rate |
| Anaheim CESD | $3,972,561 | $11,298,228 | $11,234,034 | | $64,194 | | 1 | | $525 |
| Antelope Valley (Palmdale USD) | $13,665,292 | $38,865,003 | $38,644,179 | | $220,824 | | 1 | | $525 |
| Bakersfield CESD | $4,897,059 | $13,927,563 | $13,848,429 | | $79,134 | | 1 | | $525 |
| Butte COE | $5,939,790 | $19,036,799 | $16,797,176 | | $2,239,623 | | 1 | | $525 |
| Clovis USD | $5,919,682 | $16,835,972 | $16,740,313 | | $95,659 | | 1 | | $525 |
| Colusa COE | $777,350 | $2,210,836 | $2,198,275 | $609,572 | $12,562 | $597,011 | 1.2773 | $146 | $671 |
| Contra Costa (Acalanes UHSD) | $16,421,342 | $52,364,413 | $46,438,035 | | $5,926,378 | | 1 | | $525 |
| Corona-Norco USD | $7,394,336 | $21,029,987 | $20,910,498 | | $119,489 | | 1 | | $525 |
| Desert/Mountain (San Bernardino COE) | $14,929,426 | $42,460,287 | $42,219,035 | | $241,252 | | 1 | | $525 |
| East County (San Diego COE) | $14,270,404 | $40,585,982 | $40,355,380 | $4,855,052 | $230,602 | $4,624,450 | 1.1203 | $63 | $588 |
| East Valley (San Bernardino COE) | $15,766,318 | $44,840,463 | $44,585,688 | | $254,775 | | 1 | | $525 |
| El Dorado COE | $4,245,618 | $12,074,821 | $12,006,215 | | $68,607 | | 1 | | $525 |
| Elk Grove USD | $9,271,115 | $27,466,324 | $26,217,854 | $3,643,295 | $1,248,469 | $2,394,826 | 1.139 | $73 | $598 |

**Exhibit 5-2. Severity Service Adjustments by SELPA, 2002-03 (Continued)**

| A | B | C | D | E | F | G | H | I | J | K |
|---|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Current base state alloc | # of high cost students | # of students over % celiing | # of high cost students at state avg | 02-03 ADA | % high cost students of ADA | Total cost of high cost students | Deduction 1: Total SELPA cost of students over max $ | Deduction 2: Total SELPA cost of students over % ceiling | Total NET SELPA cost |
| Fontana USD | 528 | 121 | 0 | 227 | 37,419 | 0.32% | $3,379,443 | $0 | $0 | $3,379,443 |
| Foothill (Glendale USD ) | 528 | 374 | 0 | 296 | 48,686 | 0.77% | $12,507,702 | $49,421 | $0 | $12,458,281 |
| Fresno COE | 528 | 318 | 0 | 417 | 68,629 | 0.46% | $10,244,214 | $0 | $0 | $10,244,214 |
| Fresno USD | 528 | 558 | 0 | 466 | 76,656 | 0.73% | $18,122,095 | $0 | $0 | $18,122,095 |
| Garden Grove USD | 528 | 34 | 0 | 292 | 48,033 | 0.07% | $1,328,461 | $0 | $0 | $1,328,461 |
| Glenn COE | 639 | 56 | 0 | 35 | 5,740 | 0.98% | $2,517,993 | $0 | $0 | $2,517,993 |
| Greater Anaheim | 528 | 274 | 0 | 349 | 57,442 | 0.48% | $8,954,875 | $0 | $0 | $8,954,875 |
| Humboldt/Del Norte (Humboldt COE) | 528 | 92 | 0 | 146 | 24,049 | 0.38% | $3,055,750 | $0 | $0 | $3,055,750 |
| Imperial COE | 528 | 136 | 0 | 200 | 32,847 | 0.41% | $4,646,379 | $0 | $0 | $4,646,379 |
| Inyo COE | 543 | 11 | 0 | 19 | 3,156 | 0.35% | $352,693 | $0 | $0 | $352,693 |
| Irvine USD | 528 | 199 | 0 | 147 | 24,126 | 0.82% | $6,661,378 | $0 | $0 | $6,661,378 |
| Kern COE | 528 | 258 | 0 | 557 | 91,651 | 0.28% | $8,396,468 | $0 | $0 | $8,396,468 |
| Kern High SD | 528 | 71 | 0 | 170 | 27,949 | 0.25% | $2,198,230 | $0 | $0 | $2,198,230 |

| | L | M | N | O | P | Q | R | S | T |
|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Est total high cost amt at state avg | Est total revenues | Est total revenues at state avg | Excess high cost amt | Excess revenues over state avg | Severity supplement | Incidence multiplier | Supplement per ADA | Future growth ADA rate |
| Fontana USD | $6,946,805 | $19,757,179 | $19,644,923 | | $112,257 | | 1 | | $525 |
| Foothill (Glendale USD ) | $9,038,449 | $25,705,955 | $25,559,898 | $3,419,832 | $146,057 | $3,273,775 | 1.1338 | $70 | $595 |
| Fresno COE | $12,741,022 | $36,236,318 | $36,030,430 | | $205,888 | | 1 | | $525 |
| Fresno USD | $14,231,220 | $40,474,542 | $40,244,573 | $3,890,875 | $229,969 | $3,660,906 | 1.0967 | $51 | $576 |
| Garden Grove USD | $8,917,315 | $25,361,440 | $25,217,341 | | $144,099 | | 1 | | $525 |
| Glenn COE | $1,065,616 | $3,667,815 | $3,013,463 | $1,452,377 | $654,352 | $798,025 | 1.482 | $253 | $778 |
| Greater Anaheim | $10,664,141 | $30,329,529 | $30,157,202 | | $172,327 | | 1 | | $525 |
| Humboldt/Del Norte (Humboldt COE) | $4,464,750 | $12,698,046 | $12,625,898 | | $72,148 | | 1 | | $525 |
| Imperial COE | $6,098,117 | $17,343,454 | $17,244,911 | | $98,542 | | 1 | | $525 |
| Inyo COE | $585,912 | $1,713,713 | $1,656,905 | | $56,808 | | 1 | | $525 |
| Irvine USD | $4,478,981 | $12,738,523 | $12,666,145 | $2,182,397 | $72,378 | $2,110,019 | 1.1723 | $90 | $615 |
| Kern COE | $17,014,992 | $48,391,776 | $48,116,822 | | $274,953 | | 1 | | $525 |
| Kern High SD | $5,188,683 | $14,756,961 | $14,673,115 | | $83,846 | | 1 | | $525 |

**Exhibit 5-2. Severity Service Adjustments by SELPA, 2002-03 (Continued)**

| A | B | C | D | E | F | G | H | I | J | K |
|---|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Current base state alloc | # of high cost students | # of students over % ceiling | # of high cost students at state avg | 02-03 ADA | % high cost students of ADA | Total cost of high cost students | Deduction 1: Total SELPA cost of students over max $ | Deduction 2: Total SELPA cost of students over % ceiling | Total NET SELPA cost |
| Kings COE | 528 | 52 | 0 | 151 | 24,844 | 0.21% | $1,683,799 | $0 | $0 | $1,683,799 |
| LACOE: Downey-Montebello | 528 | 185 | 0 | 344 | 56,587 | 0.33% | $5,703,840 | $0 | $0 | $5,703,840 |
| LACOE: East San Gabriel | 528 | 453 | 0 | 868 | 142,729 | 0.32% | $13,261,765 | $0 | $0 | $13,261,765 |
| LACOE: Mid-Cities | 528 | 439 | 0 | 494 | 81,343 | 0.54% | $12,009,418 | $0 | $0 | $12,009,418 |
| LACOE: Puente Hills | 528 | 241 | 0 | 260 | 42,786 | 0.56% | $7,618,251 | $0 | $0 | $7,618,251 |
| LACOE: Santa Clarita | 528 | 262 | 0 | 268 | 44,157 | 0.59% | $7,933,184 | $858 | $0 | $7,932,325 |
| LACOE: Southwest | 530 | 667 | 0 | 629 | 103,436 | 0.64% | $20,991,201 | $0 | $0 | $20,991,201 |
| LACOE: West San Gabriel | 528 | 561 | 0 | 621 | 102,114 | 0.55% | $16,725,156 | $0 | $0 | $16,725,156 |
| Lake COE | 544 | 47 | 0 | 58 | 9,572 | 0.49% | $1,493,125 | $0 | $0 | $1,493,125 |
| Lake Tahoe USD/Alpine | 528 | 22 | 0 | 31 | 5,075 | 0.43% | $889,938 | $0 | $0 | $889,938 |
| Lassen COE | 793 | 14 | 0 | 37 | 6,009 | 0.23% | $376,147 | $0 | $0 | $376,147 |
| Lodi USD | 528 | 111 | 0 | 165 | 27,114 | 0.41% | $3,023,763 | $0 | $0 | $3,023,763 |
| Long Beach USD | 528 | 508 | 0 | 563 | 92,596 | 0.55% | $15,881,726 | $0 | $0 | $15,881,726 |

| | L | M | N | O | P | Q | R | S | T |
|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Est total high cost amt at state avg | Est total revenues | Est total revenues at state avg | Excess high cost amt | Excess revenues over state avg | Severity supplement | Incidence multiplier | Supplement per ADA | Future growth ADA rate |
| Kings COE | $4,612,280 | $13,117,632 | $13,043,100 | | $74,532 | | 1 | | $525 |
| LACOE: Downey-Montebello | $10,505,364 | $29,877,957 | $29,708,196 | | $169,761 | | 1 | | $525 |
| LACOE: East San Gabriel | $26,497,595 | $75,360,933 | $74,932,746 | | $428,187 | | 1 | | $525 |
| LACOE: Mid-Cities | $15,101,318 | $42,949,157 | $42,705,128 | | $244,029 | | 1 | | $525 |
| LACOE: Puente Hills | $7,943,137 | $22,590,813 | $22,462,456 | | $128,357 | | 1 | | $525 |
| LACOE: Santa Clarita | $8,197,711 | $23,314,838 | $23,182,367 | | $132,471 | | 1 | | $525 |
| LACOE: Southwest | $19,202,944 | $54,821,329 | $54,304,147 | $1,788,257 | $517,182 | $1,271,075 | 1.0329 | $17 | $542 |
| LACOE: West San Gabriel | $18,957,352 | $53,915,976 | $53,609,635 | | $306,341 | | 1 | | $525 |
| Lake COE | $1,777,050 | $5,207,201 | $5,025,332 | | $181,869 | | 1 | | $525 |
| Lake Tahoe USD/Alpine | $942,178 | $2,679,616 | $2,664,391 | | $15,225 | | 1 | | $525 |
| Lassen COE | $1,115,511 | $4,764,891 | $3,154,562 | | $1,610,329 | | 1 | | $525 |
| Lodi USD | $5,033,703 | $14,316,187 | $14,234,845 | | $81,342 | | 1 | | $525 |
| Long Beach USD | $17,190,433 | $48,890,741 | $48,612,953 | | $277,788 | | 1 | | $525 |

**Exhibit 5-2. Severity Service Adjustments by SELPA, 2002-03 (Continued)**

| A | B | C | D | E | F | G | H | I | J | K |
|---|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Current base state alloc | # of high cost students | # of students over % ceiling | # of high cost students at state avg | 02-03 ADA | % high cost students of ADA | Total cost of high cost students | Deduction 1: Total SELPA cost of students over max $ | Deduction 2: Total SELPA cost of students over % ceiling | Total NET SELPA cost |
| Los Angeles USD | 589 | 8838 | 1,189 | 4216 | 693,604 | 1.27% | $257,887,324 | $4,357 | $35,031,224 | $222,851,743 |
| Madera/Mariposa (Madera COE) | 528 | 43 | 0 | 166 | 27,250 | 0.16% | $1,208,759 | $0 | $0 | $1,208,759 |
| Marin COE | 777 | 197 | 0 | 167 | 27,518 | 0.72% | $5,585,828 | $0 | $0 | $5,585,828 |
| Mendocino COE | 863 | 114 | 0 | 84 | 13,841 | 0.82% | $4,414,660 | $25,679 | $0 | $4,388,981 |
| Merced COE | 544 | 200 | 0 | 309 | 50,834 | 0.39% | $5,684,108 | $0 | $0 | $5,684,108 |
| Mid-Alameda County (Castro Valley USD) | 528 | 366 | 0 | 304 | 49,976 | 0.73% | $11,098,580 | $0 | $0 | $11,098,580 |
| Mission Valley (Fremont USD) | 528 | 257 | 0 | 307 | 50,471 | 0.51% | $7,600,331 | $0 | $0 | $7,600,331 |
| Modesto City Schools | 528 | 124 | 0 | 194 | 31,979 | 0.39% | $3,554,316 | $0 | $0 | $3,554,316 |
| Modoc COE | 973 | 6 | 0 | 13 | 2,063 | 0.29% | $169,069 | $0 | $0 | $169,069 |
| Mono COE | 686 | 8 | 0 | 13 | 2,175 | 0.37% | $277,549 | $0 | $0 | $277,549 |
| Monterey COE | 528 | 170 | 0 | 420 | 69,110 | 0.25% | $5,031,805 | $0 | $0 | $5,031,805 |
| Moreno Valley USD | 539 | 177 | 0 | 196 | 32,196 | 0.55% | $5,061,672 | $0 | $0 | $5,061,672 |
| Morongo USD | 538 | 61 | 0 | 53 | 8,742 | 0.70% | $1,696,483 | $0 | $0 | $1,696,483 |

| | L | M | N | O | P | Q | R | S | T |
|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Est total high cost amt at state avg | Est total revenues | Est total revenues at state avg | Excess high cost amt | Excess revenues over state avg | Severity supplement | Incidence multiplier | Supplement per ADA | Future growth ADA rate |
| Los Angeles USD | $128,767,302 | $408,532,650 | $364,142,006 | $94,084,441 | $44,390,644 | $49,693,797 | 1.2584 | $136 | $661 |
| Madera/Mariposa (Madera COE) | $5,058,923 | $14,387,916 | $14,306,166 | | $81,750 | | 1 | | $525 |
| Marin COE | $5,108,757 | $21,381,696 | $14,447,092 | $477,071 | $6,934,604 | | 1.033 | $17 | $542 |
| Mendocino COE | $2,569,547 | $11,944,645 | $7,266,441 | $1,819,433 | $4,678,204 | | 1.2504 | $131 | $656 |
| Merced COE | $9,437,399 | $27,653,946 | $26,688,092 | | $965,855 | | 1 | | $525 |
| Mid-Alameda County (Castro Valley USD) | $9,278,071 | $26,387,455 | $26,237,526 | $1,820,509 | $149,929 | $1,670,580 | 1.0694 | $36 | $561 |
| Mission Valley (Fremont USD) | $9,369,840 | $26,648,450 | $26,497,039 | | $151,412 | | 1 | | $525 |
| Modesto City Schools | $5,936,847 | $16,884,791 | $16,788,854 | | $95,936 | | 1 | | $525 |
| Modoc COE | $383,032 | $2,007,494 | $1,083,180 | | $924,314 | | 1 | | $525 |
| Mono COE | $403,740 | $1,491,872 | $1,141,739 | | $350,133 | | 1 | | $525 |
| Monterey COE | $12,830,304 | $36,490,244 | $36,282,913 | | $207,331 | | 1 | | $525 |
| Moreno Valley USD | $5,977,100 | $17,353,423 | $16,902,685 | | $450,738 | | 1 | | $525 |
| Morongo USD | $1,622,918 | $4,703,105 | $4,589,461 | $73,566 | $113,644 | | 1.016 | $8 | $533 |

**Exhibit 5-2. Severity Service Adjustments by SELPA, 2002-03 (Continued)**

| A | B | C | D | E | F | G | H | I | J | K |
|---|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Current base state alloc | # of high cost students | # of students over % ceiling | # of high cost students at state avg | 02-03 ADA | % high cost students of ADA | Total cost of high cost students | Deduction 1: Total SELPA cost of students over max $ | Deduction 2: Total SELPA cost of students over % ceiling | Total NET SELPA cost |
| Mt. Diablo USD | 567 | 233 | 0 | 214 | 35,192 | 0.66% | $6,958,544 | $0 | $0 | $6,958,544 |
| Napa COE | 567 | 112 | 0 | 113 | 18,592 | 0.60% | $3,147,815 | $0 | $0 | $3,147,815 |
| Newport-Mesa USD | 528 | 167 | 0 | 129 | 21,238 | 0.79% | $5,254,364 | $0 | $0 | $5,254,364 |
| North Coastal (San Diego COE) | 528 | 651 | 0 | 640 | 105,250 | 0.62% | $19,856,131 | $0 | $0 | $19,856,131 |
| North Inland (San Diego COE) | 528 | 211 | 0 | 263 | 43,185 | 0.49% | $6,908,950 | $0 | $0 | $6,908,950 |
| North Orange (Orange COE) | 528 | 228 | 0 | 316 | 52,064 | 0.44% | $6,878,705 | $0 | $0 | $6,878,705 |
| North Region (Alameda City USD) | 584 | 266 | 0 | 152 | 25,060 | 1.06% | $9,721,400 | $20,592 | $0 | $9,700,808 |
| North Santa Cruz (Santa Cruz COE) | 609 | 104 | 0 | 115 | 18,880 | 0.55% | $3,145,021 | $0 | $0 | $3,145,021 |
| Northeast Orange (Placentia-Yorba Linda USD) | 528 | 199 | 0 | 190 | 31,265 | 0.64% | $6,027,649 | $0 | $0 | $6,027,649 |
| Norwalk-La Mirada/ABC | 528 | 259 | 0 | 270 | 44,355 | 0.58% | $7,564,313 | $0 | $0 | $7,564,313 |
| Oakland City USD | 572 | 434 | 0 | 297 | 48,822 | 0.89% | $13,356,079 | $0 | $0 | $13,356,079 |
| Orange USD | 528 | 198 | 0 | 183 | 30,091 | 0.66% | $5,825,065 | $0 | $0 | $5,825,065 |
| Pajaro Valley USD | 560 | 45 | 0 | 111 | 18,309 | 0.25% | $1,522,072 | $0 | $0 | $1,522,072 |

| | L | M | N | O | P | Q | R | S | T |
|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Est total high cost amt at state avg | Est total revenues | Est total revenues at state avg | Excess high cost amt | Excess revenues over state avg | Severity supplement | Incidence multiplier | Supplement per ADA | Future growth ADA rate |
| Mt. Diablo USD | $6,533,442 | $19,954,045 | $18,475,968 | $425,102 | $1,478,077 | | 1.023 | $12 | $537 |
| Napa COE | $3,451,591 | $10,541,641 | $9,760,779 | | $780,862 | | 1 | | $525 |
| Newport-Mesa USD | $3,942,898 | $11,213,865 | $11,150,150 | $1,311,466 | $63,715 | $1,247,751 | 1.1176 | $62 | $587 |
| North Coastal (San Diego COE) | $19,539,540 | $55,571,757 | $55,256,009 | $316,591 | $315,749 | $843 | 1.0057 | $3 | $528 |
| North Inland (San Diego COE) | $8,017,315 | $22,801,780 | $22,672,225 | | $129,556 | | 1 | | $525 |
| North Orange (Orange COE) | $9,665,715 | $27,489,940 | $27,333,747 | | $156,193 | | 1 | | $525 |
| North Region (Alameda City USD) | $4,652,419 | $14,635,163 | $13,156,610 | $5,048,389 | $1,478,552 | $3,569,837 | 1.3837 | $201 | $726 |
| North Santa Cruz (Santa Cruz COE) | $3,505,114 | $11,498,078 | $9,912,137 | | $1,585,942 | | 1 | | $525 |
| Northeast Orange (Placentia-Yorba Linda USD) | $5,804,293 | $16,507,799 | $16,414,004 | $223,356 | $93,794 | $129,561 | 1.0136 | $7 | $532 |
| Norwalk-La Mirada/ABC | $8,234,494 | $23,419,451 | $23,286,386 | | $133,065 | | 1 | | $525 |
| Oakland City USD | $9,063,765 | $27,926,115 | $25,631,487 | $4,292,314 | $2,294,628 | $1,997,686 | 1.1675 | $88 | $613 |
| Orange USD | $5,586,409 | $15,888,122 | $15,797,849 | $238,656 | $90,273 | $148,382 | 1.0151 | $8 | $533 |
| Pajaro Valley USD | $3,399,070 | $10,253,074 | $9,612,257 | | $640,817 | | 1 | | $525 |

**Exhibit 5-2. Severity Service Adjustments by SELPA, 2002-03 (Continued)**

| A | B | C | D | E | F | G | H | I | J | K |
|---|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Current base state alloc | # of high cost students | # of students over % ceiling | # of high cost students at state avg | 02-03 ADA | % high cost students of ADA | Total cost of high cost students | Deduction 1: Total SELPA cost of students over max $ | Deduction 2: Total SELPA cost of students over % ceiling | Total NET SELPA cost |
| Pasadena USD | 546 | 149 | 0 | 137 | 22,463 | 0.66% | $4,807,691 | $0 | $0 | $4,807,691 |
| Placer/Nevada (Placer COE) | 528 | 353 | 0 | 434 | 71,440 | 0.49% | $12,719,001 | $2,667 | $0 | $12,716,334 |
| Plumas USD | 528 | 9 | 0 | 18 | 3,038 | 0.30% | $302,632 | $14,417 | $0 | $288,215 |
| Poway CUSD | 528 | 219 | 0 | 192 | 31,511 | 0.69% | $6,809,975 | $0 | $0 | $6,809,975 |
| Riverside COE | 528 | 1027 | 0 | 1334 | 219,411 | 0.47% | $31,218,716 | $0 | $0 | $31,218,716 |
| Riverside USD | 528 | 188 | 0 | 236 | 38,847 | 0.48% | $5,394,972 | $0 | $0 | $5,394,972 |
| Sacramento COE | 528 | 428 | 0 | 430 | 70,778 | 0.60% | $12,496,272 | $0 | $0 | $12,496,272 |
| Sacramento CUSD | 528 | 607 | 58 | 303 | 49,784 | 1.22% | $17,623,496 | $0 | $1,689,480 | $15,934,016 |
| San Benito COE | 528 | 19 | 0 | 67 | 11,094 | 0.17% | $579,137 | $0 | $0 | $579,137 |
| San Bernardino CUSD | 528 | 368 | 0 | 315 | 51,817 | 0.71% | $10,322,286 | $0 | $0 | $10,322,286 |
| San Diego CUSD | 591 | 1076 | 0 | 804 | 132,276 | 0.81% | $34,659,415 | $27,802 | $0 | $34,631,613 |
| San Francisco COE/USD | 701 | 250 | 0 | 342 | 56,312 | 0.44% | $6,451,551 | $0 | $0 | $6,451,551 |
| San Joaquin COE | 528 | 138 | 0 | 339 | 55,834 | 0.25% | $4,135,795 | $0 | $0 | $4,135,795 |

| | L | M | N | O | P | Q | R | S | T |
|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Est total high cost amt at state avg | Est total revenues | Est total revenues at state avg | Excess high cost amt | Excess revenues over state avg | Severity supplement | Incidence multiplier | Supplement per ADA | Future growth ADA rate |
| Pasadena USD | $4,170,187 | $12,264,618 | $11,792,902 | $637,505 | $471,716 | $165,789 | 1.0541 | $28 | $553 |
| Placer/Nevada (Placer COE) | $13,262,770 | $37,720,204 | $37,505,885 | | $214,319 | | 1 | | $525 |
| Plumas USD | $564,059 | $1,604,222 | $1,595,108 | | $9,115 | | 1 | | $525 |
| Poway CUSD | $5,849,976 | $16,637,724 | $16,543,191 | $959,999 | $94,533 | $865,466 | 1.058 | $30 | $555 |
| Riverside COE | $40,733,520 | $115,848,855 | $115,190,623 | | $658,232 | | 1 | | $525 |
| Riverside USD | $7,212,006 | $20,511,427 | $20,394,885 | | $116,542 | | 1 | | $525 |
| Sacramento COE | $13,139,877 | $37,370,689 | $37,158,356 | | $212,333 | | 1 | | $525 |
| Sacramento CUSD | $9,242,438 | $26,286,110 | $26,136,758 | $6,691,578 | $149,353 | $6,542,225 | 1.256 | $134 | $659 |
| San Benito COE | $2,059,658 | $5,857,806 | $5,824,523 | | $33,283 | | 1 | | $525 |
| San Bernardino CUSD | $9,619,739 | $27,359,181 | $27,203,731 | $702,547 | $155,450 | $547,097 | 1.0258 | $14 | $539 |
| San Diego CUSD | $24,557,026 | $78,175,222 | $69,444,995 | $10,074,588 | $8,730,228 | $1,344,360 | 1.1451 | $76 | $601 |
| San Francisco COE/USD | $10,454,301 | $39,474,705 | $29,563,795 | | $9,910,910 | | 1 | | $525 |
| San Joaquin COE | $10,365,534 | $29,480,273 | $29,312,771 | | $167,502 | | 1 | | $525 |

**Exhibit 5-2. Severity Service Adjustments by SELPA, 2002-03 (Continued)**

| A | B | C | D | E | F | G | H | I | J | K |
|---|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Current base state alloc | # of high cost students | # of students over % ceiling | # of high cost students at state avg | 02-03 ADA | % high cost students of ADA | Total cost of high cost students | Deduction 1: Total SELPA cost of students over max $ | Deduction 2: Total SELPA cost of students over % ceiling | Total NET SELPA cost |
| San Juan USD | 531 | 239 | 0 | 305 | 50,111 | 0.48% | $6,962,119 | $0 | $0 | $6,962,119 |
| San Luis Obispo COE | 528 | 85 | 0 | 211 | 34,766 | 0.24% | $2,684,974 | $0 | $0 | $2,684,974 |
| San Mateo COE | 579 | 408 | 0 | 517 | 85,080 | 0.48% | $12,622,231 | $541 | $0 | $12,621,690 |
| Santa Ana USD | 528 | 232 | 0 | 363 | 59,754 | 0.39% | $7,337,037 | $0 | $0 | $7,337,037 |
| Santa Barbara (Goleta ESD) | 528 | 186 | 0 | 388 | 63,752 | 0.29% | $5,962,861 | $0 | $0 | $5,962,861 |
| Santa Clara I | 548 | 109 | 0 | 127 | 20,865 | 0.52% | $3,138,673 | $0 | $0 | $3,138,673 |
| Santa Clara II | 528 | 157 | 0 | 184 | 30,301 | 0.52% | $4,928,390 | $0 | $0 | $4,928,390 |
| Santa Clara III | 697 | 168 | 0 | 212 | 34,832 | 0.48% | $5,042,834 | $0 | $0 | $5,042,834 |
| Santa Clara IV | 528 | 90 | 0 | 190 | 31,293 | 0.29% | $2,699,733 | $0 | $0 | $2,699,733 |
| Santa Clara V (Mt. Pleasant ESD) | 534 | 386 | 0 | 559 | 91,940 | 0.42% | $12,086,912 | $0 | $0 | $12,086,912 |
| Santa Clara VI (Mt. Pleasant ESD) | 528 | 61 | 0 | 107 | 17,572 | 0.35% | $1,851,293 | $0 | $0 | $1,851,293 |
| Santa Clara VII | 552 | 72 | 0 | 79 | 13,025 | 0.55% | $2,248,037 | $0 | $0 | $2,248,037 |
| Shasta COE | 571 | 110 | 0 | 172 | 28,283 | 0.39% | $3,372,413 | $0 | $0 | $3,372,413 |

| | L | M | N | O | P | Q | R | S | T |
|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Est total high cost amt at state avg | Est total revenues | Est total revenues at state avg | Excess high cost amt | Excess revenues over state avg | Severity supplement | Incidence multiplier | Supplement per ADA | Future growth ADA rate |
| San Juan USD | $9,303,026 | $26,608,760 | $26,308,097 | | $300,664 | | 1 | | $525 |
| San Luis Obispo COE | $6,454,296 | $18,356,448 | $18,252,150 | | $104,298 | | 1 | | $525 |
| San Mateo COE | $15,795,114 | $49,261,453 | $44,667,121 | | $4,594,332 | | 1 | | $525 |
| Santa Ana USD | $11,093,351 | $31,550,233 | $31,370,971 | | $179,263 | | 1 | | $525 |
| Santa Barbara (Goleta ESD) | $11,835,484 | $33,660,908 | $33,469,653 | | $191,255 | | 1 | | $525 |
| Santa Clara I | $3,873,615 | $11,434,124 | $10,954,225 | | $479,899 | | 1 | | $525 |
| Santa Clara II | $5,625,431 | $15,999,102 | $15,908,198 | | $90,904 | | 1 | | $525 |
| Santa Clara III | $6,466,610 | $24,278,134 | $18,286,973 | | $5,991,161 | | 1 | | $525 |
| Santa Clara IV | $5,809,534 | $16,522,704 | $16,428,825 | | $93,879 | | 1 | | $525 |
| Santa Clara V (Mt. Pleasant ESD) | $17,068,688 | $49,096,131 | $48,268,668 | | $827,463 | | 1 | | $525 |
| Santa Clara VI (Mt. Pleasant ESD) | $3,262,200 | $9,277,916 | $9,225,200 | | $52,715 | | 1 | | $525 |
| Santa Clara VII | $2,418,170 | $7,190,048 | $6,838,361 | | $351,687 | | 1 | | $525 |
| Shasta COE | $5,250,675 | $16,149,427 | $14,848,423 | | $1,301,005 | | 1 | | $525 |

**Exhibit 5-2. Severity Service Adjustments by SELPA, 2002-03 (Continued)**

| A | B | C | D | E | F | G | H | I | J | K |
|---|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Current base state alloc | # of high cost students | # of students over % ceiling | # of high cost students at state avg | 02-03 ADA | % high cost students of ADA | Total cost of high cost students | Deduction 1: Total SELPA cost of students over max $ | Deduction 2: Total SELPA cost of students over % ceiling | Total NET SELPA cost |
| Sierra COE | 536 | 1 | 0 | 4 | 681 | 0.15% | $43,886 | $0 | $0 | $43,886 |
| Siskiyou COE | 685 | 14 | 0 | 39 | 6,402 | 0.22% | $421,122 | $0 | $0 | $421,122 |
| Solano COE | 528 | 259 | 0 | 303 | 49,865 | 0.52% | $7,911,765 | $0 | $0 | $7,911,765 |
| Sonoma COE | 611 | 422 | 0 | 420 | 69,113 | 0.61% | $13,783,487 | $0 | $0 | $13,783,487 |
| South County (San Diego COE) | 528 | 494 | 0 | 526 | 86,523 | 0.57% | $14,701,871 | $5,434 | $0 | $14,696,437 |
| South Orange (Orange COE) | 528 | 472 | 0 | 505 | 83,085 | 0.57% | $15,463,976 | $0 | $0 | $15,463,976 |
| Stanislaus COE | 528 | 366 | 0 | 398 | 65,517 | 0.56% | $11,174,432 | $10,295 | $0 | $11,164,137 |
| Stockton CUSD | 528 | 174 | 0 | 219 | 36,065 | 0.48% | $4,794,159 | $0 | $0 | $4,794,159 |
| Sutter COE | 528 | 82 | 0 | 95 | 15,637 | 0.52% | $2,684,750 | $0 | $0 | $2,684,750 |
| Tehama COE | 581 | 88 | 0 | 63 | 10,342 | 0.85% | $3,517,126 | $0 | $0 | $3,517,126 |
| Tri-Cities (Beverly Hills USD) | 545 | 185 | 0 | 144 | 23,683 | 0.78% | $5,156,002 | $0 | $0 | $5,156,002 |
| Tri-County (Tuolumne COE) | 567 | 120 | 0 | 111 | 18,334 | 0.65% | $3,645,285 | $4,026 | $0 | $3,641,259 |
| Tri-Valley (Pleasanton USD) | 528 | 203 | 0 | 196 | 32,200 | 0.63% | $7,032,621 | $0 | $0 | $7,032,621 |

| | L | M | N | O | P | Q | R | S | T |
|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Est total high cost amt at state avg | Est total revenues | Est total revenues at state avg | Excess high cost amt | Excess revenues over state avg | Severity supplement | Incidence multiplier | Supplement per ADA | Future growth ADA rate |
| Sierra COE | $126,385 | $364,893 | $357,404 | | $7,488 | | 1 | | $525 |
| Siskiyou COE | $1,188,523 | $4,385,349 | $3,361,034 | | $1,024,315 | | 1 | | $525 |
| Solano COE | $9,257,375 | $26,328,593 | $26,178,999 | | $149,594 | | 1 | | $525 |
| Sonoma COE | $12,830,804 | $42,228,043 | $36,284,325 | $952,684 | $5,943,718 | | 1.0263 | $14 | $539 |
| South County (San Diego COE) | $16,063,014 | $45,684,287 | $45,424,717 | | $259,570 | | 1 | | $525 |
| South Orange (Orange COE) | $15,424,615 | $43,868,637 | $43,619,384 | $39,361 | $249,254 | | 1.0009 | $0 | $525 |
| Stanislaus COE | $12,163,223 | $34,593,018 | $34,396,467 | | $196,551 | | 1 | | $525 |
| Stockton CUSD | $6,695,393 | $19,042,146 | $18,933,952 | | $108,194 | | 1 | | $525 |
| Sutter COE | $2,902,970 | $8,256,241 | $8,209,331 | | $46,910 | | 1 | | $525 |
| Tehama COE | $1,919,907 | $6,008,446 | $5,429,319 | $1,597,219 | $579,127 | $1,018,092 | 1.2942 | $154 | $679 |
| Tri-Cities (Beverly Hills USD) | $4,396,791 | $12,907,382 | $12,433,717 | $759,211 | $473,665 | $285,546 | 1.0611 | $32 | $557 |
| Tri-County (Tuolumne COE) | $3,403,751 | $10,395,531 | $9,625,492 | $237,508 | $770,039 | | 1.0247 | $13 | $538 |
| Tri-Valley (Pleasanton USD) | $5,977,952 | $17,001,695 | $16,905,095 | $1,054,669 | $96,601 | $958,068 | 1.0624 | $33 | $558 |

**Exhibit 5-2. Severity Service Adjustments by SELPA, 2002-03 (Continued)**

| A | B | C | D | E | F | G | H | I | J | K |
|---|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Current base state alloc | # of high cost students | # of students over % ceiling | # of high cost students at state avg | 02-03 ADA | % high cost students of ADA | Total cost of high cost students | Deduction 1: Total SELPA cost of students over max $ | Deduction 2: Total SELPA cost of students over % ceiling | Total NET SELPA cost |
| Trinity COE | 841 | 1 | 0 | 12 | 1,966 | 0.05% | $32,567 | $0 | $0 | $32,567 |
| Tulare COE | 528 | 82 | 0 | 508 | 83,514 | 0.10% | $2,383,953 | $0 | $0 | $2,383,953 |
| Tustin USD | 528 | 119 | 0 | 108 | 17,838 | 0.67% | $3,707,571 | $0 | $0 | $3,707,571 |
| Vallejo CUSD | 528 | 195 | 0 | 120 | 19,733 | 0.99% | $6,256,470 | $0 | $0 | $6,256,470 |
| Ventura COE | 528 | 891 | 0 | 903 | 148,535 | 0.60% | $28,971,535 | $12,551 | $0 | $28,958,985 |
| West Contra Costa USD | 610 | 299 | 0 | 198 | 32,588 | 0.92% | $9,669,415 | $0 | $0 | $9,669,415 |
| West End (San Bernardino COE) | 528 | 402 | 0 | 728 | 119,820 | 0.34% | $11,737,493 | $0 | $0 | $11,737,493 |
| West Orange (Huntington Beach UHSD) | 571 | 295 | 0 | 281 | 46,295 | 0.64% | $9,383,653 | $0 | $0 | $9,383,653 |
| Whittier Area (Whittier UHSD) | 528 | 558 | 0 | 308 | 50,725 | 1.10% | $18,114,196 | $12,048 | $0 | $18,102,149 |
| Yolo COE | 528 | 170 | 0 | 167 | 27,425 | 0.62% | $6,287,960 | $0 | $0 | $6,287,960 |
| Yuba COE | 528 | 46 | 0 | 82 | 13,462 | 0.34% | $1,349,824 | $0 | $0 | $1,349,824 |
| **Statewide Totals** | | **35,894** | **1,248** | **35,894** | **5,905,086** | **0.61%** | **$1,096,277,136** | | | **$1,059,364,476** |

| | L | M | N | O | P | Q | R | S | T |
|---|---|---|---|---|---|---|---|---|---|
| SELPA name | Est total high cost amt at state avg | Est total revenues | Est total revenues at state avg | Excess high cost amt | Excess revenues over state avg | Severity supplement | Incidence multiplier | Supplement per ADA | Future growth ADA rate |
| Trinity COE | $364,995 | $1,653,440 | $1,032,171 | | $621,269 | | 1 | | $525 |
| Tulare COE | $15,504,272 | $44,095,186 | $43,844,645 | | $250,541 | | 1 | | $525 |
| Tustin USD | $3,311,657 | $9,418,575 | $9,365,060 | $395,914 | $53,515 | $342,400 | 1.0423 | $22 | $547 |
| Vallejo CUSD | $3,663,450 | $10,419,098 | $10,359,899 | $2,593,019 | $59,199 | $2,533,820 | 1.2503 | $131 | $656 |
| Ventura COE | $27,575,514 | $78,426,607 | $77,981,001 | $1,383,470 | $445,606 | $937,865 | 1.0177 | $9 | $534 |
| West Contra Costa USD | $6,049,880 | $19,878,448 | $17,108,501 | $3,619,535 | $2,769,948 | $849,588 | 1.2116 | $111 | $636 |
| West End (San Bernardino COE) | $22,244,449 | $63,264,701 | $62,905,243 | | $359,459 | | 1 | | $525 |
| West Orange (Huntington Beach UHSD) | $8,594,589 | $26,434,257 | $24,304,702 | $789,064 | $2,129,555 | | 1.0325 | $17 | $542 |
| Whittier Area (Whittier UHSD) | $9,417,091 | $26,782,837 | $26,630,662 | $8,685,057 | $152,175 | $8,532,882 | 1.3261 | $171 | $696 |
| Yolo COE | $5,091,410 | $14,480,310 | $14,398,036 | $1,196,550 | $82,274 | $1,114,276 | 1.0831 | $44 | $569 |
| Yuba COE | $2,499,126 | $7,107,683 | $7,067,298 | | $40,385 | | 1 | | $525 |
| **Statewide Totals** | **$1,096,277,136** | | **$3,100,170,224** | | | **$103,225,996** | | | |

## *Differences between 1998 and 2002 Severity Service Adjustment Approach*

Although the overall approach used in the current study is very similar to that used in 1998, there are some important differences in the results as shown in Exhibits 5-3 and 5-4. This is due to changing student populations, as shown in Chapter 2; changes in CASEMIS reporting and some of the assumptions underlying the construction of the severity service model, as described in Chapter 4; and differences between the severity adjustment calculations used in the two years of the study. The most important of this last set of changes is described below.

*Criteria for High Cost Students.* To be considered a high cost student in the 1998 study, a student had to have a cost profile of at least $11,904, which was the average cost per special education student ($6,417) plus one standard deviation ($5,487). For the current study, the stakeholders and research team believed that the severity adjustments should target the more "severe" student population, and accordingly, more selective criteria were established. Students with cost profiles at or above the statewide average cost per student plus *two* standard deviations were regarded as high cost students. The stakeholders unanimously believed that a more rigorous definition of "high cost" would be more appropriate in identifying SELPAs with disproportionate numbers of severe students.

*Change in the Maximum Allowed Amount Per Student.* In the 1998 approach, the maximum allowed amount per high cost student was $36,000 based on a natural break point observed in the distribution of high cost students. Based on discussions with the stakeholders, it was determined that given the more selective criteria for high cost students in the current study, a higher ceiling of $60,000 was more appropriate.

*Change in Percentage Ceiling and Deduction Amount.* In both the 1998 and 2002 severity adjustment approach, we set a limit as to the maximum allowed proportion of high cost students in a SELPA. In 1998, the statewide average proportion of high cost students (1.23 percent of the ADA) plus one standard deviation (.40 percent) was used as a ceiling for the allowable percentage of high cost students. As a result, the number of high cost students in a SELPA exceeding 1.63 percent of the SELPA's ADA was deducted from the SELPA's total cost of serving high cost students. In 2002, the percentage ceiling was changed to *two* standard deviations above the statewide average proportion of high cost students. When we compared the percentage of high cost students deducted in the current study to the 1998 study, we found that the use of a single standard deviation substantially increased the number of high cost students deducted as a result of this ceiling. In 1998, 3.22 percent of the total high cost students were deducted through the application of this ceiling. In 2002, if we continue to use a single standard deviation as the basis for determining the maximum allowed proportion of high cost students in a SELPA, 9.29 percent of the total high cost students would be deducted – over three times the 1998 percentage. We therefore raised the ceiling to two standard deviations above the mean, hence deducting 3.48 percent of the total high cost students. As outlined in the steps above, the statewide mean of high cost students is 0.61 percent of the statewide ADA and the standard

deviation is 0.25 percent, thus the ceiling for maximum allowed high cost students in a SELPA is 1.11 percent of its ADA.

In addition to raising the percentage ceiling of allowed students, we also changed the cost associated with students who are deducted when SELPAs exceed this threshold. In 1998, the number of students over the ceiling in each SELPA was multiplied by the lowest cost for a high cost student, and this amount was then deducted from the SELPA's total high cost estimate. However, upon further reflection, we considered this approach to underestimate the appropriate cost to be deducted. This was corrected by applying the *average* cost assigned to high cost students for each SELPA. This average cost by SELPA was calculated for the range between the high cost cutoff and the high cost ceiling ($60,000 per student). Consequently, we deduct higher dollar amounts from the SELPAs' estimated expenditures for the purposes of calculating the severity supplement.

## *A Comparison of High Cost Students in the 1998 and Current Study*

Exhibits 5-3 and 5-4 present a comparison of the characteristics of high cost students in the 1998 study to those in the current study. The population of high cost students in 2002 is nearly half the size of the 1998 population, primarily due to the higher cutoff. Public school-aged students remained the largest cohort of high cost students, but the proportions represented by preschool and nonpublic schools (NPS) have changed between the two studies. The percentage of high cost preschool students dropped from 9.8 percent in 1998 to 1.2 percent in 2002. The reason for this shift lies in the different methodology for estimating costs. In 1998, 3-5 year old students were included in the counts of school-aged students in calculating placement costs, such as Special Day Classes (SDC). In the 2002 approach, preschool students were separated from the school-aged group and aligned with preschool teachers with distinct aide ratios. As a result, the standardized cost for preschool in 2002 is lower than many of the SDC cost estimates, which preschool students might have been assigned if the 1998 approach was followed. Hence, there are 433 high cost preschool students in 2002 compared to 6,465 preschool students in 1998 – a decrease of over 93 percent.

The count of high cost students in nonpublic schools (NPS) has increased by over a quarter between the 1998 study and the current one and proportionally, this group has increased by 130 percent. NPS students received a cost of $30,600 for in-state schools and $35,700 for out-of-state schools, which automatically defined them as "high cost" students (i.e., above the cutoff of $20,443), even with the revenue limit deductions. The increase in the number of high cost students who are served in NPS is expected given the total increase in NPS students in the state, as described in Chapter 2.

**Exhibit 5-3. Characteristics of the High Cost Population, 1998 and 2002**

| | 1998 | % of the Total High Cost Population | 2002 | % of the Total High Cost Population | % Change in Counts | % Change as a Proportion of the Total High Cost Population |
|---|---|---|---|---|---|---|
| Public School-Aged Students | 51,979 | 78.4% | 25,625 | 71.4% | -50.7% | -8.9% |
| Students in Public Preschools | 6,465 | 9.8% | 433 | 1.2% | -93.3% | -87.7% |
| Students in Nonpublic Schools | 7,860 | 11.9% | 9,836 | 27.4% | 25.1% | 130.3% |
| Total number of high cost students | 66,304 | - | 35,894 | - | -45.9% | - |

Exhibit 5-4 shows the disability categories and placements of high cost public school-aged students in the two studies. In 1998, Mental Retardation was most represented at 19.3 percent, followed by Emotional Disturbance (17.5 percent) and Orthopedic Impairments (16.5 percent). In 2002, Autism dominated, making up nearly 50 percent of the high cost school-aged population, while Multiple Disability and Orthopedic Impairment followed with approximately 14 and 13 percent, respectively. In both studies, public school students in SDC made up the majority of the high cost population. Students receiving SDIS, a service category that did not exist in 1998, represented almost 10 percent of the high cost population in 2002.

**Exhibit 5-4. Characteristics of High Cost Public School-Aged Students, 1998 and 2002**

| | 1998 | % of the Total Public School-Aged High Cost Students | 2002 | % of the Total Public School-Aged High Cost Students | % Change as a Proportion of High Cost Public School Aged Students |
|---|---|---|---|---|---|
| Students in Special Day Classes (integrated or separated public facilities) | 44,190 | 66.6% | 22,106 | 86.3% | 29.5% |
| Students in a Resource Specialist Program | 2,775 | 4.2% | 147[33] | 0.6% | -86.3% |
| Students in a Special Day Inclusion Services | - | - | 2,417 | 9.4% | |
| Mental Retardation (MR) | 10,032 | 19.3% | 1,242 | 4.8% | -74.9% |
| Hard of Hearing (HH) | 3,410 | 6.6% | 601 | 2.3% | -64.5% |
| Deafness (DEAF) | 2,731 | 5.3% | 952 | 3.7% | -29.9% |
| Speech/Language Impairment (SLI) | 1,522 | 2.9% | 75 | 0.3% | -89.9% |
| Visual Impairment (VI) | 2,918 | 5.6% | 1,600 | 6.2% | 11.5% |
| Emotional Disturbance (ED) | 9,112 | 17.5% | 1,054 | 4.1% | -76.5% |
| Orthopedic Impairment (OI) | 8,598 | 16.5% | 3,250 | 12.7% | -23.1% |
| Other Health Impairment (OHI) | 1,702 | 3.3% | 166 | 0.6% | -80.4% |
| Established Medical Disability (EMD) | - | - | 1 | 0.0% | - |
| Specific Learning Disability (SLD) | 2470 | 4.8% | 173 | 0.7% | -85.9% |
| Deaf-Blindness (DB) | 127 | 0.2% | 117 | 0.5% | 128.3% |
| Multiple Disability (MD) | 4965 | 9.6% | 3,594 | 14.0% | 46.1% |
| Autism (AUT) | 3,921 | 7.5% | 12,214 | 47.7% | 535.5% |
| Traumatic Brain Injury (TBI) | 471 | 0.9% | 586 | 2.29% | 154.09% |

[33] In 2002, this count represents students receiving a Resource Specialist Program or Resource Services (School-Based).

## *Explaining Differences in the 1998 and 2002 Severity Service Multipliers*

Over the five years since the prior study in 1998, changes in the patterns of "severity" would be expected. If the 1998 patterns were simply replicated in 2002, the methodology would indeed be considered questionable given the many changes in the state incidence, in CASEMIS, in the study specifications, and in the district enrollment patterns and practice. Given these many changes, an overall comparison of the 1998 versus 2002 multipliers shows relatively high stability. For example, 70 percent of the SELPAs retain their status based on the 1998 multipliers as implemented by the state. This includes 24 SELPAs showing a positive severity index during both periods, as well as 57 SELPAs consistently not showing one. Of the SELPAs showing change between these two periods, 14 move from a neutral position to showing a positive severity index, while 20 SELPAs move in the opposite direction.

The principal reason for the more substantial move of positive indices to a neutral position (20 cases) than the move in the opposite direction (14 cases) is the higher severity threshold considered appropriate by the Stakeholder Committee for this study, as compared to what was used previously (i.e. two standard deviations above the mean in 2002, as opposed to one standard deviation in 1998). The impact of this change as well as other changes in the model and in the special education population are discussed further below.

### Changes in Service Model Specifications

In the 1998 study, a high cost student was defined as one with total special education costs at or above one standard deviation from the statewide average. In 1998, the mean student cost was $6,417, and the standard deviation was $5,487, with the high cost cutoff being $11,904. In 2002, the mean student cost was $6,419, and the standard deviation was $7,012. Following the stakeholders' guidance, the study team used two standard deviations in establishing the cutoff in the current study in order to target the more severe population. Hence, students at or above $20,443 were considered high cost in the 2002 model. As a result of this higher threshold, SELPAs that had relatively low severity multipliers were affected.

If the 1998 study had employed the same criteria, the high cost cutoff would have been $17,391 (the 1998 mean plus two standard deviations). By looking at the proportion of students assigned a cost between $11,904 and $17,391, it is possible to assess the effect of the change in the cutoff on individual SELPAs. The most striking example was a SELPA in which 90 percent of the high cost students in 1998 had a cost profile below the cutoff of $17,391. According this distribution of student costs, this SELPA would not have generated a severity supplement in 1998.

In addition to a higher threshold, cost estimates for some services in the revised model are lower than the 1998 estimates, particularly services aligned with "other professional staff." For example, the standardized cost for Health/Nursing-Other, Education Technology/Assistive, Behavior Management, Braille Transcription, Reader and Note Taking Services decreased from

$6,974 in 1998 to estimates ranging from $1,168 to $1,946 in 2002.[34] This change in costs affects two particular SELPAs which were among the top users of these services, thereby influencing their severity multipliers.

Another change in estimating costs was the deduction of each SELPA's revenue limit from the costs of students in Special Day Classes (SDC) and nonpublic schools. Revenue limits were not deducted in the prior study, and it was done in the current study to account for marginal costs of SDC and NPS students.[35]

### Changes in the Special Education Population and Services

Changes in the characteristics of the student population and the services provided are also factors in the differences between the 1998 and 2002 multipliers. As noted in Chapter 2, SELPAs that had multipliers and generated severity adjustment funds in 1998 showed a lower percentage increase in the counts of all disability categories except Specific Learning Disability in comparison to the group of SELPAs that did not have a positive multiplier in the 1998 model. SELPAs that were not identified as severe in the 1998 study had above averages increases in disabilities that are generally considered severe: Autism, Multiple Disability and Emotional Disturbance. Because of this faster increase, the gaps that existed in the disability proportions between the SELPAs with and without the multiplier in 1998 are decreasing.

The number of students with Autism in California increased by 275 percent between 1996 and 2002. The large increase in rates of Autism in the last five years is reflected in the characteristics of the high cost students. Autistic school-age students in public schools made up 8 percent and 48 percent of the high cost population in 1998 and 2002, respectively. This disability, which is associated with relatively expensive services (see Appendix H), impacted the state average for student cost, and consequently the selection criteria for high cost students. SELPAs that have not seen an increase in rates of Autism or have below state average increases had fewer high cost students. As the multipliers are driven by services, it is not the identification of students as autistic per se that created this phenomenon, but rather the fact that these students are receiving intensive services. According to CASEMIS, the number of autistic students in one SELPA has not changed since 1996, and in another SELPA, the number of autistic students increased by 92 percent, a change substantially smaller than the state average. These SELPAs have fewer autistic high cost students as well as fewer high cost students in general than other SELPAs, thereby changing their severity multiplier status. Furthermore, identification rates of other disabilities between 1996 and 2002 have also impacted severity multipliers. For example, one SELPA shows either decreases or below average increases in counts of students with Emotional Disturbance, Mental Retardation, Autism, Multiple Disability, Traumatic Brain Injury and with low incidence disabilities (i.e. Deafness, Orthopedic Impairment, and Visual Impairment)— all of which are associated with relatively intensive services. While this SELPA produced a positive multiplier in

[34] These cost differences are due to the fact that differential weights were applied to these services in 2002. The Stakeholders established weights to more accurately reflect the costs of services aligned with "other professional staff." Furthermore, if these services were treated equally, the standardized cost ($3,285) would still be lower than the 1998 figure, as the number of students receiving services aligned with these personnel increased from 8,575 to 37,038 and the personnel increased only marginally from 2,091 to 2,157.

[35] If the revenue limits had not been deducted from the SDC and NPS cost estimates in this study, one SELPA would have retained its neutral 1998 multiplier, as opposed to having a positive 2002 severity index.

1998, it did not do so in 2002, likely due to the lower numbers of "severe" students who generally require more intensive service.

All of the SELPAs that generated a severity supplement in 1998 but do not currently generate a severity supplement showed a decline in the number of SDC students with a cost exceeding one standard deviation beyond the 2002 average cost. In other words, even if the high cost threshold in 2002 were lower (i.e. one standard deviation instead of two), some of these SELPAs would still see a change in their status. The most notable change was observed in a SELPA which had 93 percent fewer SDC students exceeding one standard deviation beyond the 2002 average cost. As discussed further in Chapter 6, most of the autistic students in this SELPA were coded as receiving only Designated Instructional Services, with no indication of them as being placed in a Special Day Class or receiving Special Day Inclusion Services or Resource Services, thus raising questions about their primary placement. As we could not guess what every SELPA meant to code, costs were assigned according to the services specified. However, in this case, and in other cases, the coding seems somewhat counter-intuitive for this population and quite different than the service patterns predominantly seen for children with Autism throughout the state.

# CHAPTER 6: DATA ISSUES

An important research question posed for this study is, "Are the data accurate and sufficiently reliable to be used in a funding formula?" Because of this question, and because of the critical nature of the California Special Education Management Information System (CASEMIS) data to this study, this chapter is focused on ways in which CASEMIS might be enhanced for future applications of this type. CASEMIS provides a wealth of information regarding the number and mix of services received by special education students across the state. This base of information is vital to the types of cost analyses that underlie this study. However, we encountered some significant challenges in analyzing and utilizing the 2002 CASEMIS. For this reason, and because of the research question cited above, this chapter delineates some of these challenges, while Chapter 8 contains specific recommendations on how to modify CASEMIS for this purpose and other policy analyses.

We realize that CASEMIS was not designed to meet the purposes of this study. At the same time, we consider the application of CASEMIS presented in this report to illustrate its considerable potential for state policy analysis and formulation purposes. We also realize that any time a management information system such as CASEMIS is applied to a use other than originally intended, issues are bound to arise. With these ideas in mind, it is our hope that this chapter will not be seen as a criticism of CASEMIS, but rather as a depiction of some of the challenges that arose when attempting to more fully employ the vast potential of CASEMIS across a broader array of policy applications. Our purpose is to follow this discussion with specific recommendations. Although some of these recommendations may have substantial cost implications, others could be implemented for very little cost, and we believe all would significantly strengthen CASEMIS as a statewide resource, while not affecting the central purpose of CASEMIS, which is to meet federal and state reporting requirements.

We have not performed a detailed analysis of the state and local costs associated with implementing our recommendations. Such an analysis would need to be performed before the recommendations could be implemented. In considering the possible merits of these proposed investments, we believe the state should consider potential gains in CASEMIS as a policy analysis tool in relation to the marginal cost of improving what is already a very substantial investment for the state in continuing and maintaining this database. As CASEMIS served as the primary source of information for a formula used to allocate up to $70 million in state funds in each of the past five years, and is proposed for continued use in this regard, some additional investment to increase its suitability for this, and other policy relevant purposes, may be warranted.

The approach taken in this study identifies high cost special education students based on standardized cost estimates for educational services. Costs per student and per SELPA were derived primarily from the student and service description data in CASEMIS. We recognize that CASEMIS was not designed for this purpose, and therefore in some ways it is not fully compatible for this use, nor can we expect it to become so. However, some important changes in the structure of CASEMIS over the past five years have complicated the use of CASEMIS within

the context of this project. Specifically, CASEMIS has deleted placement coding to reflect recent federal law that defines special education as a set of services rather than as a placement. To perform the study, however, we had to make assumptions regarding the core set of services provided to each child, and this became much more complicated without explicit data on placement.

That is not to say that the changes to CASEMIS were inappropriate or should not have been made. The real question, from our point of view, is whether further work is needed in regard to the successful implementation of these changes. This work might include steps to further identify issues regarding service definition and taking steps to provide greater clarity, as well as possibly retaining some of the strengths of the old system, e.g. by clearly and uniformly specifying that the primary service should be reported first.

These changes, and the reporting issues that we believe have ensued from them, were sufficient to cause the Stakeholder Committee established for this study to advise careful consideration of possible alternative bases for the severity funding adjustment. However, after applying some adjustments to 2002 CASEMIS data, the study team determined that CASEMIS still provides the best basis for a state special education severity adjustment. This chapter describes some of the challenges emanating from the changes made by CDE that are reflected in the 2002 CASEMIS. In addition, the alternative models that were considered are described in the second half of this chapter.

## *Challenges in Using the CASEMIS Data*

An important issue in relation to assessing the reliability of CASEMIS as a vital source of data underlying the proposed funding adjustment is the extent to which observed differences in the services recorded across districts reflect true differences in service provision, as opposed to differences in variable interpretation and coding practices. That is, if the service patterns across two districts appear quite different, it is crucial to the integrity of the funding adjustments to be able to separate differences emanating from coding practices, as opposed to true differences in the services being provided. Severity funding should be driven by true differences in service practices, which we believe to be the best proxy measure of variations in the severity of the population, and should not be driven by differences in coding practices.

With these ideas in mind, examples of concern about our ability to make these distinctions raised by the study team and the stakeholders were patterns in the data that seemed inconsistent with previous years' reports in CASEMIS (e.g. dramatic changes in reporting by a SELPA from one year to the next), reporting patterns very inconsistent with those seen statewide, or which seemed counter-intuitive to the study team. We believe that several major changes in the CASEMIS codes in 2001 may have resulted in coding problems at the local level.

First, beginning with the 2001 CASEMIS, the primary placement of a student is no longer a separate variable, as mentioned above. The primary placement variable and the Designated Instructional Services (DIS) variable were merged into a single variable incorporating all special education services. Thus, instead of one primary placement per student, the new file structure allows recording multiple services with no clearly identified primary placement. Although one section of the CASEMIS instructions (2002-03 CASEMIS User's Manual, Chapter 3, page 3-23)

directs districts to list the primary service first among the services listed, our stakeholders questioned the extent to which this practice was uniformly followed.

Second, despite separate definitions for two new service categories, Regular Class with Accommodations and Special Day Inclusion Services, we believe the distinctions between these two options were not clear to those in the field. Third, distinctions between another new service category, Resource Services (School-Based), and the long standing Resource Specialist Program were also unclear. Furthermore, nonpublic school was no longer recorded both as a placement and as a school type but as a school type only, while a new service category, Special Day Class in a Nonpublic School (SDC in NPS), was added.

These changes appear to have resulted in coding problems that may account for some of the changes in reporting patterns observed among some SELPAs since 2001. Each SELPA collects and analyzes all special education student data from its districts. The SELPA also provides technical assistance and support to coordinate all CASEMIS functions. Therefore, the degree of consistency in data reporting appears to vary from SELPA to SELPA according to local interpretations of the data. Below, we list several examples of problems with the data that created challenges for this study.

### Distinction between Special Day Inclusion Services and Regular Class with Accommodations

Based on guidance from the Stakeholder Committee, the standardized cost applied to Special Day Inclusion Services (SDIS) in our model was $41,538 for all categories of disability except for Hard of Hearing, which received a cost of $24,187.[36] In contrast, the standardized cost for Regular Class with Accommodations (RCA) was determined to be $4,125. Therefore, the distinction between these two types of service is directly relevant to the identification of "high cost" students. As described in Chapter 5, all students with a total student cost above $20,443 were considered "high cost," and accordingly, SDIS met that threshold.

While students receiving both types of services may be considered as "fully included" in the general education classroom, the level of the special education professional and aide support was thought by the stakeholders to significantly vary between the two. The statewide trend is to place the less severely disabled students into RCA and more severe cases in SDIS. Thus, the majority of students in RCA are shown to have either Speech/Language Impairment or Specific Learning Disability as their primary category of disability, categories generally associated with less intense educational services. Conversely, Autism and Mental Retardation—categories of disability generally associated with more intensive services—constitute less than one percent each of the student population in RCA. SDIS is the opposite, with Autism and Mental Retardation representing almost one-fifth of the students in SDIS. Students with Specific Learning Disabilities are more likely to be placed in RCA than in SDIS. However, a few SELPAs show very different coding patterns. For example, between 60 and 80 percent of the SDIS students in three SELPAs were students with Specific Learning Disabilities. Since this

[36] As described in Chapter 4, students with Specific Learning Disability, Speech/Language Impairment, and Other Health Impairment who were coded as receiving SDIS services were removed from the SDIS population and given the cost of RSP services. The RSP cohort also includes students receiving Resource Specialist Program, Resource (School-Based), and Regular Class with Accommodation services.

coding pattern seems very different than what is generally observed statewide, there was a reason to suspect that in some SELPAs, students receiving RCA services were coded as receiving SDIS. When we discussed this issue with the stakeholders, they suggested assigning SDIS students with Specific Learning Disability, Speech and Language Impairment, or Other Health Impairment a cost equal to that of RCA.

### Distinction between Special Day Class and Special Day Inclusion Services

Four SELPAs show a remarkable drop in the number of students in Special Day Class (SDC) placements between 1999 and 2002. Given that the same SELPAs were the top users of Special Day Inclusion Services (SDIS) in 2002, it is possible that the same students that were once coded as in SDC are now coded as in SDIS. For example, one SELPA was very close to the state average proportion of SDC students in 1999 (29 percent compared to a state average of 30.6 percent). However in 2002, it had almost no SDC students (0.16 percent compared to a state average of 31.2 percent). At the same time, a relatively high proportion of special education students in this SELPA were receiving SDIS in 2002 (29 percent compared to a state average of less than one percent). According to input from the SELPA director, there were no significant changes in service provision since 1999, and therefore the differences observed in CASEMIS were a result of definition interpretation and coding. Similar trends were observed in two smaller SELPAs as well. According to the administrator of one of these, the changes observed were genuine, and reflect efforts to place students in more inclusionary settings.

In contrast, the dramatic changes in CASEMIS data for a very large SELPA were explained by SELPA administrators as a disparity between services defined by CASEMIS and service definitions used by the SELPA in its own database. This SELPA showed a drop from 40 percent of its special education population in SDC in 1999 to less than one-half a percent in 2001 and in 2002. This same SELPA was shown to be one of the top users of the SDIS code in 2001, the first year the code was added as a service variable, with 25 percent of its special education population shown as receiving SDIS. Upon inquiry by the study team, the SELPA responded that such a change had not in fact occurred and that these data were reported to CDE in error. Because this disparity was so prominent, this SELPA resubmitted its CASEMIS data to the study team with the appropriate alignment between CASEMIS and SELPA definitions. These revised data place this SELPA at the low-end for SDIS (0.39 percent) and back into a range (44 percent) for SDC more in alignment with statewide practice.

As this large SELPA represents a significant proportion of the total special education population in California, this step was essential to correct a major disparity from actual special education practice in the database used for this project. This one-time deviation from the norm—allowing the SELPA to resubmit its data to the study team—was not financially beneficial to this SELPA with regards to the severity supplement, and therefore the study team does not consider this a dangerous precedent. However, it is important to note, that allowing individual SELPAs to resubmit their data following findings of irregularities in their reporting should *not* be taken as a solution in the long run, particularly when the resubmission might affect policy and funding decisions. CASEMIS has a data submission process that includes SELPA certification of the accuracy of the data and timelines for submitting data revisions when necessary. Compliance with this process is essential to ensure data integrity.

### Multiple Placements

As different combinations of service settings exist in the 2002 CASEMIS, we encountered problems with associating a primary placement cost to students who receive multiple services that might be considered a primary placement. For example, 0.36 percent of all special education students receive both SDC and SDIS. According to the CASEMIS definition, SDC is provided "when the nature or severity of the disability precludes their participation in the regular school program for a majority of a school day" (2002-03 CASEMIS User's Manual, Appendix G, page G-7). Based on this, it could be interpreted that receiving both SDC and SDIS services is contradictory. Yet, we do not want to dismiss completely the possibility of such a combination. Variations by student characteristics and subject matter may exist. With the absence of additional information, however, it is impossible to tell for certain the extent to which the observed coding is a reliable depiction of reality. Thus, for the purposes of the cost analysis, following the stakeholders' suggestions, a primary placement was selected for each student, by the criteria described in Chapter 4.

### Inconsistencies in Student Counts

There is also a concern wherever two variables indicating the same thing show vastly different results. For example, 9.1 percent of cases in which the service code for a student indicated Special Day Class in a Nonpublic School (SDC in NPS), contained a school type variable showing the student as being enrolled in a public school.Whether the student is in a public school or nonpublic school has a major impact on inferred costs: NPS students receive a standardized cost of $30,600, in comparison to the cost of SDC that ranges from $6,752 to $42,563. Re-coding students with conflicting codes as NPS would identify them as "high cost," whereas treating them as receiving SDC in public schools would not necessarily identify them as "high cost."

Sixty-nine of the 115 SELPAs are affected by the re-assignment of these students as NPS students. One SELPA in particular, with 430 students so coded, was affected the most. Input from this SELPA confirmed that the students coded as enrolled in a public school and served in a SDC in NPS were actually nonpublic school students, and that there was an error in the SELPA's coding of school type. Following this input, and the stakeholders' recommendations, we recoded the school type from public to NPS for all the students placed in a SDC in NPS.

### Irregularities in Services Coding

Data reported on special education students may, in some case, be incomplete. For example, 97 percent of the students with Autism in one SELPA are coded as only receiving individual services with no indication of being placed in a special day class or receiving SDIS. Similarly, 84 and 41 percent of the public school-age students with Autism in two other SELPAs are shown to receive only individual services. It is difficult to determine the reliability of these data given that in 1999 only 2.3 percent of the public school-age students with Autism in one of these SELPAs and none of the students in the other received individual services only. The majority of the students with Autism in these two SELPAs were placed either in SDC or RSP in 1999. In 2002, 95 percent of autistic students statewide showed services of SDC, RSP, or SDIS (i.e., 68.5 in SDC, 18.2 in RSP, and 4.7 percent in SDIS). Since these two SELPAs seem to deviate both from

the observed state norm and from their own coding practices as seen in CASEMIS 1999, it seems likely that a primary service for some students may have been omitted.

## Summary

One of the research questions posed for this study was, "Are the data accurate and sufficiently reliable to be used in a funding formula of this type?" As described in this chapter, the research team encountered numerous challenges in interpreting the service data from the 2002 CASEMIS for the study. These challenges were substantially greater than those incurred in our earlier study for the state in 1998. Despite these challenges, however, the model developed using CASEMIS data had fewer disadvantages than several alternatives we considered, as described in the next chapter. .

# CHAPTER 7: ALTERNATIVE MODELS

Three models were developed as possible alternatives to our service model. As is true of the recommended model, these alternatives rely on existing data, instead of requiring new data collection.[31] Alternatives 1 and 2 base the severity supplement calculations on primary category of disability, which has the advantage of being less affected by the issues regarding CASEMIS service data, as described in Chapter 6. Alternative 3 is based on the poverty level of each SELPA, which has the advantage of being completely outside SELPA control. The advantages and disadvantages of the models in relation to the recommended approach are summarized below.

## Alternative 1: SEEP-Based Disability Expenditure Model

Under this approach, expenditures by disability category are based on national data from the Special Education Expenditure Project (SEEP), 1999-2000 (Chambers, Shkolnik, & Perez, 2003). Based on these data, a dollar figure was assigned to every primary disability category. This figure reflects the average spending on a student with a certain category of disability, including all personnel, non-personnel, and, administrative support. These expenditures were applied to all school-aged public-school students by the primary disability category that was recorded in the 2002 CASEMIS. For NPS and preschool students, separate spending estimates were assigned.

Since disability is the only factor determining the identity of the high cost students, the "high cost" cutoff was based on both the distribution of expenditures and the nature of the student's disability. In addition, due to the low variations in the student cost, no ceilings were applied under this model, thus including all high cost students in the severity supplement calculations. However, revenues generated by the AB 602 were taken into account in the same manner as they are in the original model. There are two main advantages to this approach: a) the estimates assigned to each student are based on an independent dataset, and therefore b) the estimates are not affected by CASEMIS data on service mix..

The shortcomings of this model are directly related to its advantages. First, the dollar figures were based on a national study, and may not be as reflective of special education spending in California as a CASEMIS-based estimate, as presented below. Due to differences in prevalence of certain disabilities among the states, in addition to variability in special education practices, disabilities that are associated with higher costs in California had a relatively lower costs according to the SEEP data, thus placing students with disabilities such as Emotional Disturbance, Mental Retardation, Orthopedic Impairment, and Traumatic Brain Injury below the threshold for high cost. Furthermore, these figures may not reliably reflect special education expenditures in future years.

[31] An exception to this statement is the inability to repeat Alternative Model 1 in future years without a new phase of national data collection.

Second, this model does not overcome data issues in school type coding. For example, this model relies on the accuracy of CASEMIS counts of NPS. However, as discussed in the prior chapter, this variable may be recorded inaccurately.

A last shortcoming of this model results from the direct association between possible future funding and student's category of disability. This approach may provide incentives for SELPAs to over-identify disabilities associated with higher cost.

### Alternative 2: CASEMIS-Based Disability Cost Model

Following the same logic as in the SEEP-based disability cost model, the cost per student was applied by primary category of disability, having separate costs for preschool and NPS students. However, this model differs mainly from the SEEP-based model by using actual Designated Instructional Service (DIS) data, and by utilizing an average based on CASEMIS placement data by disability type. Furthermore, a revenue limit was calculated for each SELPA, taking into account the school district types and the average daily attendance per SELPA. This average revenue limit was then subtracted from the cost for SDC and NPS to estimate the marginal special education costs for these students.

A total cost was calculated for each student, based on the average disability cost and the total cost for designated instructional services that the student receives. Under this approach, we identified high cost students using the same approach as in the original model; all students whose cost was equal to or higher than the average student cost plus two standard deviations from the mean were regarded as high cost. The same methodology used in the prior study was employed. Namely, two ceilings were applied for each SELPA: a maximum special education cost per student, and a maximum number of high cost students. These ceilings are not applied in Alternative 1.

The main concern about this model is the criteria used to apply the average student placement cost. Due to irregularities observed in placement coding, it was hard to make a reliable distinction between students who received only DIS related services, and students who were also in a placement (e.g., SDC, RSP). Moreover, we were concerned that applying one placement average cost to all students with the same disability flattens true differences in student costs. Finally, like the SEEP-based disability cost model, this model might create incentives to over- or under-identify certain categories of disability due to the association between disability and the standardized costs assigned to students.

### Alternative 3: Poverty Model

There is consensus among researchers and practitioners in regard to the disproportionate representation of children from diverse backgrounds in special education. One of the findings of the prior study (Parrish et al, 1998) was the relationship between rate of "low incidence" disabilities and socio-demographic factors such as poverty, ethnic background and English proficiency. Of these variables, poverty seems to be the variable that explains most of the variability among ethnic minority students, or students with low English proficiency (Serwatka et al., 1995; Wagner, 1995). In line with these findings, and the stakeholders' recommendations, we explored the possibility of an alternative cost model based on the percentage of students in poverty within each SELPA.

Rates of students participating in the free and reduced lunch program and rates of recipients in the California Work Opportunity and Responsibility to Kids (CalWORKS) are two representative indicators of the school districts poverty level. Under this approach, a cutoff based on the sum of these two poverty indicators was calculated, and SELPAs exceeding this cutoff would be regarded as eligible for severity funds. The distribution of the severity fund would be based on the relative poverty level and the size of each SELPA, thereby reflecting the SELPAs' needs.

Three major disadvantages were associated with this model. First, there are questions about the link between poverty and category of disability. For example, when looking at the relationship between CASEMIS disability counts for 2002 and indicators of poverty (latest data released by CDE are for 2001), we found no correlation for most types of disabilities. While one of the strongest associations was between Mental Retardation and being a CalWORKS recipient ($r = 0.45$, $p < .0001$), a negative correlation was found between Autism and being a CalWORKS recipient ($r = -0.27$, $p<.01$). It was also the expressed sentiment of the Stakeholder Committee that poverty is not a reliable indicator of *severe disabilities*. Second, there has been some criticism on the reliability of participation in a free/ reduced lunch and CalWORKS as poverty indicators. Free/reduced lunch program may be better associated with socio-economic status of elementary school students than the status of secondary school students. Due to the stigma attached to this program, older students are believed to be able to opt out. The time period of eligibility for the CalWORKS program is limited to five years, hence serving as an under-estimate of the true poverty rates. A third drawback of using poverty as a basis for assigning special education severity supplement is the limitations associated with utilizing this information in cost formulas. The determination of the total severity funds to be divided among SELPAs would be arbitrary, i.e. without the types of rationale used for justifying the total funding estimates associated with the other alternatives.

In sum, we explored three alternatives to the current severity service approach. None of the alternative approaches seemed to be more appropriate or fair than the original approach developed in 1998 and refined in the current study. While the initial approach has reliability concerns associated with CASEMIS, as described above, the other models provide little improvement in this regard and have other important limitations as well.

# CHAPTER 8: DISCUSSION & RECOMMENDATIONS

## Recommended Severity Adjustment Approach

It is our recommendation that the severity adjustments established in the 1998 study be updated according to the multipliers shown in Exhibit 5-2. Despite some of the challenges noted in this report, CASEMIS provides comprehensive, statewide data on special education students in California and the services they receive. For this reason, we believe it should continue as the foundation on which the severity adjustments are based. Other sources and proxy measures were investigated, as Chapter 7 briefly describes. In one test simulation, national expenditure data by disability category drawn from the Special Education Expenditure Project (SEEP) were used in place of CASEMIS-derived costs to identify SELPAs serving a disproportionate number of high cost students. However, this was not pursued further, as these national SEEP data are not as reflective of California as the CASEMIS based cost estimates in the severity service model. In addition, SEEP data (Chambers et al., 2003) show that there is large variation *within* many disability categories.

An alternative to this approach, using average cost by disability data calculated from CASEMIS, contains many of these same inherent weaknesses associated with the SEEP-based approach by category of disability. To assign an average cost by primary disability category under-estimates students with intensive needs, and over-estimates those in the same category of disability with fewer needs. Poverty was also explored as an alternative basis for making severity funding adjustments. However, there was a consensus among the stakeholders that the link between poverty and high cost students was not strong enough to warrant basing these funding adjustments on this alternative.

The number and intensity of the services received by a student are an indication of the needs of the population, and we believe they are the best available proxy for severity. It can be inferred that, on average, more severe needs are related to more intensive services. For the purpose of this study, the best available means to identify severe students was to assign standardized costs for each service received and to sum them as an estimate of the overall cost per student, as described in Chapter 4.

The research team and Stakeholder Committee took careful steps to ensure that the costs associated with each service were reflective of the needs of the students receiving them. For instance, differential SDC class sizes and aide ratios were established by disability category, which assumed that classes for students with Speech/Language Impairments did not need as much aide support as classes for students with Autism. As the stakeholders defined SDIS as being costly intensive services for very involved students, SDIS students with generally less severe disabilities such as Specific Learning Disability, Speech/Language Impairment, and Other

Health Impairment, were reassigned to the group receiving RSP, RSB, or Regular Class with Accommodation.

In another step, differential costs were established with the stakeholders' guidance for the array of special education services provided by "other professional staff." This is a refinement of the 1998 model, which assigned the same cost to all services despite obvious differences between them. Moreover, we assigned a primary placement cost based on specific rules recommended by the stakeholders; this was not an issue in the 1998 study.

We believe the methodology presented in Chapter 4 for generating cost estimates per service is sound and sensitive to differences between types of services. It is these cost estimates that drive the recommended severity adjustments presented in Chapter 5. While possible enhancements to CASEMIS that would increase its utility for policy applications of this type are raised later in this chapter, these data are clearly the best available on services provided to all special education students in the state. The farther we move from the data SELPAs actually support, the greater the concerns about subjectivity entering into the resulting severity index.

The model by which the severity adjustments are determined for each SELPA is fair, feasible, and appropriate for the same reasons as in 1998. The approach is fair in that it is driven by services received, rather than by SELPA expenditure files or disability categories which are not necessarily an accurate reflection of student severity. Second, the feasibility of this approach is seen in the fact that we were able to replicate the 1998 model, although changes in the database structure required modifications and refinements. However, changes in CASEMIS are to be expected, as it is a dynamic tool that reflects changes in service provision. We anticipate that some of the data issues in the 2002 CASEMIS will be clarified over time, as SELPAs become more familiar with the new service codes and as the state provides additional guidance.

A third advantage to this approach is that it minimizes incentives to inappropriately identify, label, or place special education students in an attempt to increase funding. The multipliers are measured against the state average special education cost per student and per "high cost" student. If the SELPAs overall were to increase service delivery, the statewide mean would also change, mitigating the effect of moderate of uniform, modest changes in delivery. Although sweeping changes by individual SELPAs could move them into the range of qualifying for severity funds, as they would actually have to pay for added services, the hope of recouping some portion of these costs at some point in the future is unlikely to provide a real fiscal incentive to add services.

Consideration should also be given to whether the state will appropriate funding for all students in licensed children's institutions (LCI) or foster family homes (FFH), regardless of whether the educational services they are receiving are publicly or privately provided. Presently, school districts or county offices of education may claim reimbursement from the state for students attending NPS and residing in LCIs or FFHs. If the state provides a more uniform base of funding for LCI or FFH students independent of the type or provider of services (e.g. public vs. nonpublic schools), these students would not be included in the severity service model. A simulation excluding LCI, FFH, and residential facility students resulted in a severity adjustment

fund of $100.5 million, with 38 SELPAs generating multipliers (please see Column C in Appendix A for the multipliers under this approach).

## Implementation of Severity Adjustments

It is important to consider not only SELPAs that receive funding under the new approach, but also how to transition SELPAs that have been receiving adjustment funds but are no longer eligible according to the updated 2002 multipliers. We recommend that the state gradually phase-out SELPAs that have been receiving adjustment funds for the prior five years and provide full and immediate funding to SELPAs identified as serving a disproportionate number of high cost students in the revised model. We believe that SELPAs should be provided with their funds as soon as reasonable to offset the costs of their high cost students. These SELPAs have been identified as serving a disproportionate number of high cost students, and the model shows that they had costs in 2002-03 that exceeded revenues generated at their AB 602 base rates. The supplemental funds will be providing support for immediate needs. Although there is added cost to the state to phase-out the prior multipliers, SELPAs that are no longer eligible to receive funds under the revised model need time to adjust to the reduction in revenues, and therefore a phase-out of these SELPAs is most appropriate.

While the research team strongly recommends a gradual phase-out and immediate funding for the revised multipliers, the phase-out could take place over a two- or three-year period as described below. A three-year phase-out might be considered more appropriate as the severity funding based on the 1998 multipliers was actually phased-in over a three-year period. The amounts presented below do not reflect inflation. Because the severity funds are already in place (nearly $80.6 million was appropriated in 2002-03), the marginal cost to the state for each of these options is also provided. Appendix I provides SELPA-level funding amounts for these two implementation options.

**Two-Year Phase-Out:** In the first year of the two-year phase-out option, SELPAs that have been receiving adjustments under the 1998 model and are no longer eligible under the revised 2002 multipliers will receive half of the 2002-03 supplement to which they were entitled. In the second year of implementation, SELPAs that do not generate funds under the revised multipliers will not receive any of their former severity adjustments. SELPAs that receive funds under the 2002 approach will receive the full amount of the severity funds in the first year.

**Exhibit 7-1. Two-Year Phase-Out Implementation Option, No Inflation Reflected**

| | |
|---|---|
| **First Year, 2003-04** | |
| Revised Multipliers Cost | $103,225,996 |
| Phase-Out Cost | $12,058,896 |
| **Total Cost** | **$115,284,893** |
| *Marginal Cost* | *$34,694,996* |
| **Second Year, 2004-05** | |
| Revised Multipliers Cost | $103,225,996 |
| Phase-Out Cost | $0 |
| **Total Cost** | **$103,225,996** |
| *Marginal Cost* | *$22,636,100* |

**Three-Year Phase-Out:** In the first year of implementation in the three-year phase-out option, SELPAs that received severity funds under the 1998 approach and no funds under the 2002 approach will receive 66 percent of the funds they were entitled to in 2002-03. In the second year, these SELPAs will receive 33 percent of their prior funds, and in the third year, they will receive none. SELPAs eligible to receive funds under the 2002 multipliers will receive full amount of those funds in the first year of implementation.

**Exhibit 7-2. Three-Year Phase-Out Implementation Option, No Inflation Reflected**

| | |
|---|---|
| **First Year, 2003-04** | |
| Revised Multipliers Cost | $103,225,996 |
| Phase-Out Cost | $15,917,743 |
| **Total Cost** | **$119,143,740** |
| *Marginal Cost* | *$38,553,843* |
| **Second Year, 2004-05** | |
| Revised Multipliers Cost | $103,225,996 |
| Phase-Out Cost | $7,958,872 |
| **Total Cost** | **$111,184,868** |
| *Marginal Cost* | *$30,594,971* |
| **Third Year, 2005-06** | |
| Revised Multipliers Cost | $103,225,996 |
| Phase-Out Cost | $0 |
| **Total Cost** | **$103,225,996** |
| *Marginal Cost* | *$22,636,100* |

## Updating the Severity Service Multipliers

With our recommendation that the 1998 multipliers be updated according to the model presented in Chapter 5, the question arises as to how the state might revise the severity index on a regular basis. In the prior study, it was recommended that the state revisit the index and adjustment in five years—hence, the current study. This initial five-year period was believed appropriate, and one option available to the state is to accept the multipliers recommended in this report and to hold them constant for another five-year period. As an alternative, the state may wish to consider some form of annual update that would be commensurate with each new submission of CASEMIS data. If this could be fairly easily done, the state may wish to consider some form of rolling average index as opposed to some of the more radical changes in funding for some SELPAs, after five years of change, observed in this report.

Although "severity" does not appear to be highly fluctuating, there does appear to be shifts in the five years since the initial multipliers were established. When examining severity as defined by low incidence categories, we find that the proportions of the special education population with low incidence disabilities remain fairly steady. Indeed, even with changes between the 1998 and 2002 service model approach, such as the high cost cut-off, we see that for the majority of the

SELPAs, their severity status remained unchanged: 57 SELPAs continued to have a neutral standing, whereas 24 of the SELPAs maintained a positive severity multiplier. However, 20 SELPAs went from positive to a neutral multiplier, while another 14 showed the opposite trend. Furthermore, even with the group that maintained its positive severity status, wide differences are seen between the 1998 and 2002 multiplier.

In evaluating this degree of change, and considering the relative stability of the index over time, it is also important to keep in mind that one important factor driving this change were subjective judgments made by the Stakeholder Committee. First, they opted to change the criteria for qualifying for high cost (two standard deviations above the mean, as opposed to one), and to change the maximum allowable cost (for the purposes of the model) from $40,000 to $60,000. A fair amount of change in relation to the severity index across SELPAs was due to these changes in judgment, which presumably would not be subject to annual review.

Nevertheless, these changes in severity status may merit more regular updating. While a complete model update (e.g., revising class sizes, cost estimates, etc.) may be too resource-intensive, the state may wish to consider the possibility of applying the cost estimates presented in this report, inflated as necessary, to the counts of students receiving services every year or two years. If the current cost model estimates were simply applied to the updated counts from CASEMIS every year, or every other year, this could be a fairly straightforward process – especially when changes in CASEMIS reporting criteria are held fairly constant. The multipliers would then be updated according to changes in intensity of services, as reported by CASEMIS. Revising the multipliers every two years—as opposed to five years—will be more reflective of changes in service provision and provide funds to SELPAs that see increases in their proportions of high cost students. The recommended modifications presented in the following section would greatly facilitate these regular updates.

Even if more frequent updates were adopted, it is still recommended that the state continue to conduct a more comprehensive evaluation every five years to re-examine the class size ratios and aide allocations. This would provide an opportunity to more fully consider changes in personnel compensation and CASEMIS that have occurred since this study, to reconsider current definitions of "high cost," and to determine the need of continuing the adjustment in light of any other special education funding changes and distribution of severity.

## Recommended Modifications

As the previous chapter has described, the research team encountered challenges in utilizing CASEMIS for the purpose of determining severity adjustments. However, CASEMIS remains a powerful tool with a wealth of information. Few states have a statewide student-level database on special education, and none we are aware of rivals the magnitude of CASEMIS. CASEMIS is very comprehensive and ambitious, representing a considerable investment in time and effort at the state and local levels. Given the magnitude of this investment, and its vast potential, in this section we recommend several ways in which we believe CASEMIS can be more fully used as a policy analysis tool for the state.

*Identify primary placement.* We recognize that special education students may receive services in multiple locations and indeed some may consider the concept of a primary placement to be outdated. However, it is helpful to know which service delivery is used the most for a particular child. As discussed previously, students could be coded as receiving both Resource Specialist Program (RSP) services and Special Day Classes (SDC), or any combination of services up to eight. As percentage time spent in each service is not included in CASEMIS, knowing which is the primary service for a student can be very important for analyses of this type.

For example, when SDC and RSP are provided to a student, it seems likely they would be overlapping rather than two completely separate modes of service. For this reason, it was considered important not to attribute full cost estimates to both of these services, making students receiving both appear inordinately costly. Thus, we were advised by our Stakeholder Committee to infer a primary service in such cases of SDC. A variable indicating the primary placement and/or one which specifies the intensity of each service (e.g., hours per week) would help refine this strategy and would allow for more accurate cost estimates per student. Listing the primary service first, as specified in Chapter 3 of the User's Manual, would also work if this were sufficiently emphasized to ensure that this practice is being uniformly followed.

*Further clarify service definitions.* Evidence was provided in Chapter 6 regarding issues with service category definitions. In 2001, four new services were added to CASEMIS: Regular Class with Accommodation, School-Based Resource Services, Special Day Inclusion Service (SDIS), and SDC in NPS. Both the study team and stakeholders found some services difficult to distinguish from others, such as Resource Specialist Services and School-Based Resource Services. Furthermore, there appeared to be some ambiguity in the definitions of SDIS and Regular Class with Accommodation services. This ambiguity also seemed to be reflected in SELPA reporting practices, as described in Chapter 6. The resulting lack of confidence in SELPAs' ability to distinguish among these placements could have an important effect on cost estimates on which the analyses shown in this report are built.

Individual members of the Stakeholder Committee interpreted the CASEMIS definitions for these services to mean very different things for very different populations of students, which likely reflects the differing interpretations statewide. Accordingly, they assigned very different cost estimates for them. As an example, to provide further clarity, the stakeholders recommended the following clarification be used for SDIS: "A student, who without extensive modifications to the regular curriculum and additional personnel support, would otherwise be educated in a special education setting for the majority of the school day. This additional support may be in the form of a one-to-one classroom aide."

*Distinguish AB 3632 and LCI/FFH students attending NPS.* The state currently provides 100 percent reimbursement to school districts or county offices of education for students residing in licensed children's institutions (LCI) or foster family homes (FFH) and are attending an in-state NPS. However, there are exceptions to this funding. Students with Serious Emotional Disturbance who are placed in LCIs or FFHs by County Mental Health in conjunction with schools are known as "AB 3632" placements (*Government Code* Chapter 26.5, Sections 7570-7588). These "AB 3632" placements, as well as any student placed in LCIs whose parents live in the district where the student is placed and who are responsible for the student's educational

rights (*Education Code* 56156.6), are not eligible for state reimbursement. Lacking a CASEMIS variable that identifies students who are not qualified, the team instead defined those eligible for the state reimbursement as all school-age students who resided in an LCI, FFH, or residential facility and attended an in-state NPS.

The research team has been involved in several studies over the past year for which there was considerable interest in knowing more about these students, i.e. their number, characteristics and locations. A variable distinguishing these students would substantially increase the usefulness of CASEMIS data for these kinds of analyses.

To more accurately calculate severity adjustments, particularly as NPS students directly impact a SELPA's total high cost, it is important to be able to more clearly identify these types of students in CASEMIS. Moreover, this could provide the state with valuable data on the characteristics of these students, the services received, and the SELPAs providing services.

*Identify related services provided by nonpublic agencies (NPAs) and NPSs.* As the state has had a long-standing interest in NPS and NPA services in the state, the addition of one or more variables identifying NPS/NPA services might be considered. For example, in generating cost estimates for students receiving individual services, the research team had to assume that public school personnel were providing these services, as there is no variable in CASEMIS that indicates the agency (e.g., LEA, NPA, NPS) providing the service. As the service cost estimates were derived by dividing the cost of all public providers by all students receiving the service, the average cost was underestimated to the extent that some service providers were private. We recommend that a variable be added for each service recorded that identifies the type of agency providing the service. Not only would this information assist in deriving more accurate service cost estimates, it would also fulfill other data needs of the state by shedding light on the use of NPS and NPA services.

*Uniform coding of NPS.* The state should provide additional guidance on how school types and school identification codes should be reported. The team found approximately 1,200 students for whom their school type indicated "public school," but with a service code of "SDC in NPS." After discussions with stakeholders and contacting other SELPAs about this combination, the school types for these students were changed to NPS. By distinguishing the agency providing services, as recommended above, CASEMIS would allow for the possibility of public school students receiving NPA services.

Furthermore, if the state were to issue, and the SELPAs were to record, consistent school identification codes for NPS in CASEMIS, a wealth of data regarding California NPS and the numbers and types of students served would be available. While separate school identification codes are used for NPS, the same codes are not consistently used for the same NPS by SELPAs throughout the state to allow a reliable sort of the CASEMIS database by NPS school identification code.

*Conducting additional checks of submitted data.* As mentioned in Chapter 6, the research team sometimes found pronounced changes in coding patterns over time at the SELPA level. In an extreme example, one large SELPA showed more than a third of their special education students

in SDC in 1999, which dropped to less than half percent in 2002. The SDC population in two other SELPAs also dropped dramatically from 1999 to 2002 (from 29 to .2 percent, and from 32 to 12 percent, respectively). Due to the addition of new services in 2001, such as Special Day Inclusion Services, it is difficult to determine whether these changes are genuine shifts in service delivery, reflect differing interpretations of the service codes, or are just errors. In the case of the large SELPA above, it turned out to be an error, which may be the most likely explanation when such sweeping changes in service patterns are observed from one year to the next. In another case, it was not an error.

Additional checks may also be needed in the case of seemingly conflicting codes, e.g. students showing an "SDC in NPS" service and with a "public" school type code. Also, although CASEMIS specifically states that the preschool variable applies to students aged 3-5 only, the count of students in CASEMIS within this age group is over four times the size of the group of students graded as preschool. The variable specifying the percentage time spent outside the general education classroom may also be problematic. One SELPA showed all students coded as receiving SDC services as also spending more than 90 percent of their time in the general education classroom, and a number of other SELPAs showed similarly questionable data for this variable. One source of problems seems to be that until 2000-01, this variable requested percentage time the student was mainstreamed (i.e., *in* the regular class), and from then onwards, it requested the percentage of time *outside* the regular class.

## Summary

Even without the recommended enhancements above, we believe that the approach based on service information in CASEMIS continues to be the best available means to identify severe students. The recommendations above would only add strength to this finding. We explored alternative approaches, but ultimately decided that they were not as appropriate for the purpose of identifying severe and/or high cost students. Therefore, we recommend that the state update the severe funding multipliers as presented in this report.

We further recommend that the state gradually phase-out SELPAs that have been receiving the adjustment funds for the prior five years and provide full and immediate funding to those identified as currently serving a disproportionate number of high cost students. As changes were seen in the severity index since the prior study five years ago, the state may wish to more regularly update the multipliers each year or every other year by applying the inflated cost estimates to updated counts of students receiving services, with a more extensive re-evaluation of the model every five years. The modifications to CASEMIS recommended in this chapter could greatly facilitate the updates and evaluation process, while also enhancing CASEMIS as a policy analysis tool for the state.

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# APPENDIX A. INCIDENCE MULTIPLIERS[37]

| SELPA Name | Multipliers 1998 As implemented by SB 1564 | 2002 | 2002 Excluding school-aged LCI, FFH, and residential facility students |
|---|---|---|---|
| | A | B | C |
| Anaheim CESD | 1.000 | 1.000 | 1.000 |
| Antelope Valley (Palmdale USD)* | 1.003 | 1.000 | 1.000 |
| Bakersfield CESD | 1.000 | 1.000 | 1.000 |
| Butte COE | 1.000 | 1.000 | 1.000 |
| Clovis USD | 1.000 | 1.000 | 1.000 |
| Colusa COE | 1.000 | 1.269 | 1.257 |
| Contra Costa (Acalanes UHSD)* | 1.030 | 1.000 | 1.000 |
| Corona-Norco USD | 1.000 | 1.000 | 1.000 |
| Desert/Mountain (San Bernardino COE) | 1.000 | 1.000 | 1.000 |
| East County (San Diego COE) | 1.130 | 1.146 | 1.145 |
| East Valley (San Bernardino COE) | 1.039 | 1.000 | 1.000 |
| El Dorado COE | 1.000 | 1.000 | 1.000 |
| Elk Grove USD | 1.000 | 1.131 | 1.135 |
| Fontana USD | 1.000 | 1.000 | 1.000 |
| Foothill (Glendale USD ) | 1.042 | 1.139 | 1.139 |
| Fresno COE | 1.000 | 1.000 | 1.000 |
| Fresno USD | 1.054 | 1.115 | 1.099 |
| Garden Grove USD | 1.280 | 1.000 | 1.000 |
| Glenn COE | 1.000 | 1.474 | 1.469 |
| Greater Anaheim | 1.000 | 1.000 | 1.000 |
| Humboldt/Del Norte (Humboldt COE) | 1.000 | 1.000 | 1.000 |
| Imperial COE | 1.000 | 1.000 | 1.000 |
| Inyo COE | 1.000 | 1.000 | 1.000 |
| Irvine USD | 1.119 | 1.171 | 1.162 |
| Kern COE | 1.000 | 1.000 | 1.000 |
| Kern High SD | 1.000 | 1.000 | 1.000 |
| Kings COE | 1.000 | 1.000 | 1.000 |
| LACOE: Downey-Montebello | 1.000 | 1.000 | 1.000 |
| LACOE: East San Gabriel | 1.015 | 1.000 | 1.000 |
| LACOE: Mid-Cities | 1.000 | 1.000 | 1.000 |
| LACOE: Puente Hills | 1.022 | 1.000 | 1.000 |
| LACOE: Santa Clarita | 1.000 | 1.000 | 1.000 |
| LACOE: Southwest | 1.050 | 1.033 | 1.034 |
| LACOE: West San Gabriel | 1.000 | 1.000 | 1.000 |

[37] Based on the 1998 multipliers as implemented by the state (Column A), 44 SELPAs had incidence multipliers above 1.0, although 10 eligible SELPAs did not receive an adjustment due to revenues that canceled out the estimated cost of high cost students. These SELPAs are flagged with an asterisk (*). In the current 2002 model (Column B), 38 SELPAs have incidence multipliers above 1.0, 30 of which are eligible for severity funds.

| SELPA Name | Multipliers 1998 As implemented by SB 1564 | 2002 | 2002 Excluding school-aged LCI, FFH, and residential facility students |
|---|---|---|---|
| Lake COE | 1.000 | 1.000 | 1.000 |
| Lake Tahoe USD/Alpine | 1.100 | 1.000 | 1.000 |
| Lassen COE | 1.000 | 1.000 | 1.000 |
| Lodi USD | 1.000 | 1.000 | 1.000 |
| Long Beach USD | 1.000 | 1.000 | 1.000 |
| Los Angeles USD | 1.217 | 1.262 | 1.260 |
| Madera/Mariposa (Madera COE) | 1.000 | 1.000 | 1.000 |
| Marin COE | 1.000 | 1.026 | 1.017 |
| Mendocino COE* | 1.084 | 1.250 | 1.231 |
| Merced COE | 1.145 | 1.000 | 1.000 |
| Mid-Alameda County (Castro Valley USD) | 1.000 | 1.069 | 1.080 |
| Mission Valley (Fremont USD) | 1.012 | 1.000 | 1.000 |
| Modesto City Schools | 1.000 | 1.000 | 1.000 |
| Modoc COE | 1.000 | 1.000 | 1.000 |
| Mono COE | 1.000 | 1.000 | 1.000 |
| Monterey COE | 1.000 | 1.000 | 1.000 |
| Moreno Valley USD* | 1.030 | 1.000 | 1.000 |
| Morongo USD | 1.168 | 1.009 | 1.007 |
| Mt. Diablo USD | 1.222 | 1.036 | 1.035 |
| Napa COE | 1.202 | 1.000 | 1.000 |
| Newport-Mesa USD | 1.025 | 1.113 | 1.070 |
| North Coastal (San Diego COE) | 1.000 | 1.008 | 1.025 |
| North Inland (San Diego COE) | 1.043 | 1.000 | 1.000 |
| North Orange (Orange COE) | 1.000 | 1.000 | 1.000 |
| North Region (Alameda City USD)* | 1.091 | 1.384 | 1.384 |
| North Santa Cruz (Santa Cruz COE) | 1.000 | 1.000 | 1.000 |
| Northeast Orange (Placentia-Yorba Linda USD) | 1.003 | 1.015 | 1.011 |
| Norwalk-La Mirada/ABC | 1.033 | 1.000 | 1.000 |
| Oakland City USD | 1.140 | 1.159 | 1.156 |
| Orange USD | 1.093 | 1.007 | 1.000 |
| Pajaro Valley USD | 1.202 | 1.000 | 1.000 |
| Pasadena USD | 1.291 | 1.044 | 1.046 |
| Placer/Nevada (Placer COE) | 1.000 | 1.000 | 1.000 |
| Plumas USD | 1.000 | 1.000 | 1.000 |
| Poway CUSD | 1.000 | 1.068 | 1.068 |
| Riverside COE | 1.000 | 1.000 | 1.000 |
| Riverside USD | 1.066 | 1.000 | 1.000 |
| Sacramento COE | 1.000 | 1.000 | 1.000 |
| Sacramento CUSD | 1.053 | 1.266 | 1.266 |
| San Benito COE | 1.000 | 1.000 | 1.000 |
| San Bernardino CUSD | 1.000 | 1.015 | 1.023 |
| San Diego CUSD | 1.298 | 1.146 | 1.148 |
| San Francisco COE/USD* | 1.186 | 1.000 | 1.000 |

| SELPA Name | Multipliers 1998 As implemented by SB 1564 | 2002 | 2002 Excluding school-aged LCI, FFH, and residential facility students |
|---|---|---|---|
| San Joaquin COE | 1.000 | 1.000 | 1.000 |
| San Juan USD | 1.000 | 1.000 | 1.000 |
| San Luis Obispo COE | 1.000 | 1.000 | 1.000 |
| San Mateo COE | 1.000 | 1.000 | 1.000 |
| Santa Ana USD | 1.000 | 1.000 | 1.000 |
| Santa Barbara (Goleta ESD) | 1.000 | 1.000 | 1.000 |
| Santa Clara I | 1.000 | 1.000 | 1.000 |
| Santa Clara II | 1.000 | 1.000 | 1.000 |
| Santa Clara III* | 1.216 | 1.000 | 1.000 |
| Santa Clara IV | 1.000 | 1.000 | 1.000 |
| Santa Clara V (Mt. Pleasant ESD) | 1.000 | 1.000 | 1.000 |
| Santa Clara VI (Mt. Pleasant ESD) | 1.000 | 1.000 | 1.000 |
| Santa Clara VII | 1.000 | 1.000 | 1.000 |
| Shasta COE | 1.000 | 1.000 | 1.000 |
| Sierra COE | 1.000 | 1.000 | 1.000 |
| Siskiyou COE* | 1.135 | 1.000 | 1.000 |
| Solano COE | 1.000 | 1.000 | 1.000 |
| Sonoma COE | 1.000 | 1.027 | 1.024 |
| South County (San Diego COE) | 1.078 | 1.000 | 1.000 |
| South Orange (Orange COE) | 1.000 | 1.008 | 1.007 |
| Stanislaus COE | 1.000 | 1.000 | 1.000 |
| Stockton CUSD | 1.000 | 1.000 | 1.000 |
| Sutter COE | 1.000 | 1.000 | 1.000 |
| Tehama COE | 1.000 | 1.286 | 1.251 |
| Tri-Cities (Beverly Hills USD) | 1.169 | 1.051 | 1.052 |
| Tri-County (Tuolumne COE)* | 1.033 | 1.044 | 1.034 |
| Trinity COE | 1.000 | 1.060 | 1.069 |
| Tri-Valley (Pleasanton USD) | 1.000 | 1.000 | 1.000 |
| Tulare COE | 1.000 | 1.000 | 1.000 |
| Tustin USD | 1.000 | 1.043 | 1.031 |
| Vallejo CUSD | 1.192 | 1.281 | 1.269 |
| Ventura COE | 1.000 | 1.013 | 1.008 |
| West Contra Costa USD* | 1.139 | 1.206 | 1.199 |
| West End (San Bernardino COE) | 1.000 | 1.000 | 1.000 |
| West Orange (Huntington Beach UHSD) | 1.157 | 1.029 | 1.033 |
| Whittier Area (Whittier UHSD) | 1.076 | 1.322 | 1.326 |
| Yolo COE | 1.030 | 1.075 | 1.083 |
| Yuba COE | 1.000 | 1.000 | 1.000 |

# APPENDIX B. CASEMIS DISABILITY COUNTS

**Exhibit B-1. CASEMIS Disability Counts**

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Disability** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All Disabilities | 547,494 | 584,890 | 613,561 | 6.8% | 12.1% |
| Autism (AUT) | 4,410 | 8,626 | 16,537 | 95.6% | 275.0% |
| Deafness (DEAF) | 2,924 | 3,117 | 3,121 | 6.6% | 6.7% |
| Deaf-Blindness (DB) | 150 | 135 | 166 | -10.0% | 10.7% |
| Emotional Disturbance (ED) | 12,196 | 13,691 | 18,053 | 12.3% | 48.0% |
| Established Medical Disability (EMD) | - | 4 | 134 | - | - |
| Hard of Hearing (HH) | 5,464 | 5,846 | 6,167 | 7.0% | 12.9% |
| Mental Retardation (MR) | 30,739 | 34,616 | 38,505 | 12.6% | 25.3% |
| Multiple Disability (MD) | 5,468 | 5,110 | 5,270 | -6.5% | -3.6% |
| Orthopedic Impairment (OI) | 11,037 | 11,953 | 12,732 | 8.3% | 15.4% |
| Other Health Impairment (OHI) | 13,396 | 16,222 | 24,719 | 21.1% | 84.5% |
| Specific Learning Disability (SLD) | 328,412 | 342,964 | 337,954 | 4.4% | 2.9% |
| Speech or Language Impairment (SLI) | 128,912 | 137,467 | 145,006 | 6.6% | 12.5% |
| Traumatic Brain Injury (TBI) | 818 | 1,126 | 1,419 | 37.7% | 73.5% |
| Visual Impairment (VI) | 3,568 | 3,702 | 3,778 | 3.8% | 5.9% |

## Exhibit B-2. CASEMIS Disability Counts by SELPA Group

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **All Disabilities** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 547,494 | 584,890 | 613,561 | 6.8% | 12.1% |
| No adjustment or multiplier (n=71) | 292,396 | 311,245 | 324,462 | 6.4% | 11.0% |
| Adjustment and multiplier (n=34) | 216,252 | 232,118 | 245,102 | 7.3% | 13.3% |
| Multiplier, no adjustment (n=10) | 38,846 | 41,527 | 43,997 | 6.9% | 13.3% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Autism (AUT)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 4,410 | 8,626 | 16,537 | 95.6% | 275.0% |
| No adjustment or multiplier (n=71) | 1,842 | 3,798 | 7,664 | 106.2% | 316.1% |
| Adjustment and multiplier (n=34) | 2,219 | 4,246 | 7,846 | 91.3% | 253.6% |
| Multiplier, no adjustment (n=10) | 349 | 582 | 1,027 | 66.8% | 194.3% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Deafness (DEAF)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 2,924 | 3,117 | 3,121 | 6.6% | 6.7% |
| No adjustment or multiplier (n=71) | 1,396 | 1,461 | 1,571 | 4.7% | 12.5% |
| Adjustment and multiplier (n=34) | 1,400 | 1,523 | 1,423 | 8.8% | 1.6% |
| Multiplier, no adjustment (n=10) | 128 | 133 | 127 | 3.9% | -0.8% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Deaf-Blindness (DB)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 150 | 135 | 166 | -10.0% | 10.7% |
| No adjustment or multiplier (n=71) | 70 | 72 | 94 | 2.9% | 34.3% |
| Adjustment and multiplier (n=34) | 66 | 47 | 53 | -28.8% | -19.7% |
| Multiplier, no adjustment (n=10) | 14 | 16 | 19 | 14.3% | 35.7% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Emotional Disturbance (ED)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 12,196 | 13,691 | 18,053 | 12.3% | 48.0% |
| No adjustment or multiplier (n=71) | 5,501 | 6,542 | 8,943 | 18.9% | 62.6% |
| Adjustment and multiplier (n=34) | 5,573 | 5,905 | 7,411 | 6.0% | 33.0% |
| Multiplier, no adjustment (n=10) | 1,122 | 1,244 | 1,699 | 10.9% | 51.4% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Established Medical Disability (EMD)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | - | 4 | 134 | - | - |
| No adjustment or multiplier (n=71) | - | 4 | 39 | - | - |
| Adjustment and multiplier (n=34) | - | 0 | 81 | - | - |
| Multiplier, no adjustment (n=10) | - | 0 | 14 | - | - |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Hard of Hearing (HH)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 5,464 | 5,846 | 6,167 | 7.0% | 12.9% |
| No adjustment or multiplier (n=71) | 2,475 | 2,719 | 3,025 | 9.9% | 22.2% |
| Adjustment and multiplier (n=34) | 2,630 | 2,775 | 2,763 | 5.5% | 5.1% |
| Multiplier, no adjustment (n=10) | 359 | 352 | 379 | -1.9% | 5.6% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Mental Retardation (MR)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 30,739 | 34,616 | 38,505 | 12.6% | 25.3% |
| No adjustment or multiplier (n=71) | 15,695 | 18,036 | 20,828 | 14.9% | 32.7% |
| Adjustment and multiplier (n=34) | 12,875 | 14,227 | 15,104 | 10.5% | 17.3% |
| Multiplier, no adjustment (n=10) | 2,169 | 2,353 | 2,573 | 8.5% | 18.6% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Multiple Disability (MD)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 5,468 | 5,110 | 5,270 | -6.5% | -3.6% |
| No adjustment or multiplier (n=71) | 2,118 | 2,165 | 2,524 | 2.2% | 19.2% |
| Adjustment and multiplier (n=34) | 3,072 | 2,624 | 2,312 | -14.6% | -24.7% |
| Multiplier, no adjustment (n=10) | 278 | 321 | 434 | 15.5% | 56.1% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Orthopedic Impairment (OI)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 11,037 | 11,953 | 12,732 | 8.3% | 15.4% |
| No adjustment or multiplier (n=71) | 5,008 | 5,514 | 6,078 | 10.1% | 21.4% |
| Adjustment and multiplier (n=34) | 5,353 | 5,762 | 5,886 | 7.6% | 10.0% |
| Multiplier, no adjustment (n=10) | 676 | 677 | 768 | 0.1% | 13.6% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Other Health Impairment (OHI)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 13,396 | 16,222 | 24,719 | 21.1% | 84.5% |
| No adjustment or multiplier (n=71) | 5,217 | 7,148 | 12,071 | 37.0% | 131.4% |
| Adjustment and multiplier (n=34) | 7,549 | 8,217 | 11,114 | 8.8% | 47.2% |
| Multiplier, no adjustment (n=10) | 630 | 857 | 1,534 | 36.0% | 143.5% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Specific Learning Disability (SLD)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 328,412 | 342,964 | 337,954 | 4.4% | 2.9% |
| No adjustment or multiplier (n=71) | 176,744 | 182,015 | 175,480 | 3.0% | -0.7% |
| Adjustment and multiplier (n=34) | 127,151 | 135,529 | 138,179 | 6.6% | 8.7% |
| Multiplier, no adjustment (n=10) | 24,517 | 25,420 | 24,295 | 3.7% | -0.9% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Speech or Language Impairment (SLI)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 128,912 | 137,467 | 145,006 | 6.6% | 12.5% |
| No adjustment or multiplier (n=71) | 74,053 | 79,026 | 83,402 | 6.7% | 12.6% |
| Adjustment and multiplier (n=34) | 46,514 | 49,162 | 50,844 | 5.7% | 9.3% |
| Multiplier, no adjustment (n=10) | 8,345 | 9,279 | 10,760 | 11.2% | 28.9% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Traumatic Brain Injury (TBI)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 818 | 1,126 | 1,419 | 37.7% | 73.5% |
| No adjustment or multiplier (n=71) | 445 | 586 | 774 | 31.7% | 73.9% |
| Adjustment and multiplier (n=34) | 340 | 484 | 549 | 42.4% | 61.5% |
| Multiplier, no adjustment (n=10) | 33 | 56 | 96 | 69.7% | 190.9% |

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **Visual Impairment (VI)** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 3,568 | 3,702 | 3,778 | 3.8% | 5.9% |
| No adjustment or multiplier (n=71) | 1,832 | 1,888 | 1,969 | 3.1% | 7.5% |
| Adjustment and multiplier (n=34) | 1,510 | 1,585 | 1,537 | 5.0% | 1.8% |
| Multiplier, no adjustment (n=10) | 226 | 229 | 272 | 1.3% | 20.4% |

# APPENDIX C. PLACEMENT, SERVICES, PRESCHOOL AND NPS

**Exhibit C-1. Placement Data, Ages 6-22**

| | 1996 | | | | 1999 | | | | 2002 | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Placement | All SELPAs (n=115) | SELPAs without multiplier (n=71) | SELPAs with adjustment (n=34) | SELPAs with multiplier only (n=10) | All SELPAs (n=115) | SELPAs without multiplier (n=71) | SELPAs with adjustment (n=34) | SELPAs with multiplier only (n=10) | All SELPAs (n=115) | SELPAs without multiplier (n=71) | SELPAs with adjustment (n=34) | SELPAs with multiplier only (n=10) |
| Regular class with accommodation | n/a | n/a | n/a | n/a | 1,129 | 786 | 319 | 24 | 5,723 | 1,054 | 4,136 | 533 |
| Resource Services (school-based) | n/a | n/a | n/a | n/a | n/a | n/a | n/a | n/a | 17,722 | 9,716 | 3,533 | 4,473 |
| Resource Specialist program | 260,628 | 143,853 | 97,164 | 19,611 | 274,632 | 151,572 | 102,176 | 20,884 | 268,192 | 148,890 | 103,985 | 15,317 |
| Special day inclusion services | n/a | n/a | n/a | n/a | n/a | n/a | n/a | n/a | 4,499 | 2,643 | 1,535 | 321 |
| Special day class in public integrated facility | 156,046 | 76,986 | 67,783 | 11,277 | 175,527 | 86,472 | 76,563 | 12,492 | 180,791 | 88,437 | 80,396 | 11,958 |
| Special day class in public separate facility | 6,266 | 2,396 | 3,611 | 259 | 5,134 | 1,786 | 3,122 | 226 | 10,171 | 4,119 | 5,783 | 269 |
| **Total SE Population (Ages 6-22)** | **547,494** | **292,396** | **216,252** | **38,846** | **584,890** | **311,245** | **232,118** | **41,527** | **613,561** | **324,462** | **245,102** | **43,997** |

## Exhibit C-2. Service Data, Ages 3-22

| | 1996 | | | | 1999 | | | | 2002 | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Services | All SELPAs (n=115) | Without multiplier (n=71) | With adjustment (n=34) | Multiplier only (n=10) | All SELPAs (n=115) | Without multiplier (n=71) | With adjustment (n=34) | Multiplier only (n=10) | All SELPAs (n=115) | Without multiplier (n=71) | With adjustment (n=34) | Multiplier only (n=10) |
| Designated Instruction & Services Only | 144,369 | 80,182 | 55,179 | 9,008 | 146,732 | 80,364 | 56,975 | 9,393 | 146,628 | 80,478 | 53,386 | 12,764 |
| Language and speech | 245,369 | 133,783 | 94,396 | 17,190 | 249,149 | 136,774 | 94,110 | 18,265 | 263,014 | 144,698 | 100,302 | 18,014 |
| Home and hospital | 2,591 | 1,338 | 1,087 | 166 | 2,403 | 1,290 | 1,003 | 110 | 2,520 | 1,491 | 881 | 148 |
| Adapted physical education | 46,538 | 17,169 | 27,369 | 2,000 | 46,737 | 18,374 | 26,413 | 1,950 | 44,559 | 19,057 | 23,751 | 1,751 |
| Audilogical service | 5,883 | 1,704 | 3,989 | 190 | 6,014 | 1,773 | 4,093 | 148 | 5,025 | 2,192 | 2,674 | 159 |
| Individual counseling | 7,381 | 2,850 | 3,899 | 632 | 10,296 | 3,174 | 6,421 | 701 | 12,826 | 3,705 | 8,427 | 694 |
| Group counseling | 3,690 | 1,912 | 1,339 | 439 | 4,054 | 1,945 | 1,678 | 431 | 3,977 | 2,132 | 1,520 | 325 |
| Guidance services | 1,324 | 175 | 1,143 | 6 | 1,393 | 231 | 1,155 | 7 | 1,211 | 321 | 883 | 7 |
| Occupational therapy | 5,886 | 2,507 | 2,195 | 1,184 | 12,823 | 5,697 | 5,415 | 1,711 | 26,533 | 12,612 | 11,509 | 2,412 |
| Physical therapy | 1,735 | 583 | 765 | 387 | 2,981 | 1,132 | 1,271 | 578 | 4,666 | 1,957 | 2,118 | 591 |
| Orientation and mobility | 1,737 | 761 | 830 | 146 | 2,355 | 1,080 | 1,079 | 196 | 2,250 | 1,102 | 959 | 189 |
| parent counseling | 4,938 | 166 | 4,704 | 68 | 4,018 | 127 | 3,814 | 77 | 2,956 | 163 | 2,745 | 48 |
| Social work service | 629 | 211 | 293 | 125 | 664 | 417 | 115 | 132 | 679 | 508 | 78 | 93 |
| Vocational education training | 12,183 | 5,120 | 6,835 | 228 | 13,421 | 5,027 | 8,015 | 379 | 8,565 | 3,901 | 4,498 | 166 |
| Recreation services | 1,110 | 176 | 932 | 2 | 1,183 | 186 | 991 | 6 | 249 | 238 | 6 | 5 |
| Individual and group instruction | 10,479 | 3,257 | 6,088 | 1,134 | 10,487 | 3,644 | 5,907 | 936 | 15,671 | 7,854 | 7,254 | 563 |
| Vision services | 3,952 | 1,917 | 1,773 | 262 | 4,551 | 2,287 | 1,907 | 357 | 5,046 | 2,740 | 1,960 | 346 |
| Specialized driver training | 186 | 20 | 166 | 0 | 159 | 11 | 147 | 1 | 158 | 17 | 141 | - |
| Psychological services | 5,768 | 1,953 | 1,781 | 2,034 | 5,912 | 2,000 | 1,910 | 2,002 | 7,946 | 3,002 | 3,028 | 1,916 |
| Specialized services for low incidence disabilities | 2,242 | 804 | 1,250 | 188 | 2,343 | 700 | 1,458 | 185 | 2,269 | 904 | 1,230 | 135 |
| Health and nursing - specialized | 3,247 | 884 | 2,167 | 196 | 3,584 | 963 | 2,350 | 271 | 3,095 | 912 | 1,939 | 244 |
| Health and nursing - other | 4,124 | 1,599 | 2,220 | 305 | 3,581 | 1,534 | 1,820 | 227 | 3,143 | 1,495 | 1,546 | 102 |
| Interpreter services | 710 | 440 | 243 | 27 | 684 | 384 | 266 | 34 | 1,005 | 463 | 518 | 24 |
| Education technology services | 344 | 216 | 118 | 10 | 616 | 242 | 191 | 183 | 519 | 181 | 296 | 42 |
| Behavior management services | 448 | 207 | 194 | 47 | 1,077 | 587 | 369 | 121 | 3,270 | 2,290 | 732 | 248 |
| Assistive services | 2,420 | 526 | 1,574 | 320 | 2,643 | 817 | 1,464 | 362 | 1,613 | 747 | 618 | 248 |
| Braille transcription | 127 | 17 | 109 | 1 | 73 | 24 | 47 | 2 | 118 | 56 | 60 | 2 |
| Reader services | 66 | 13 | 53 | 0 | 14 | 13 | 1 | 0 | 31 | 19 | 12 | 0 |
| Note taking services | 139 | 10 | 123 | 6 | 100 | 8 | 91 | 1 | 146 | 23 | 118 | 5 |
| Transition services | 257 | 43 | 138 | 76 | 274 | 21 | 32 | 221 | 3,692 | 1,820 | 1,746 | 126 |
| Vocational counseling | 1,054 | 584 | 357 | 113 | 1,044 | 535 | 252 | 257 | 2,030 | 1,664 | 259 | 107 |
| Deaf and hard of hearing services | 840 | 495 | 318 | 27 | 1,650 | 1,038 | 530 | 82 | 4,386 | 1,804 | 2,416 | 166 |
| Transportation | 0 | 0 | 0 | 0 | 5,306 | 1,829 | 1,641 | 1,836 | 43,820 | 16,062 | 23,358 | 4,400 |
| Other special education services | 0 | 0 | 0 | 0 | 1,160 | 218 | 920 | 22 | 4,977 | 1,389 | 2,499 | 1,089 |
| **TOTAL SE Population (Ages 3-22)** | **587,577** | **312,331** | **233,291** | **41,955** | **622,241** | **329,079** | **249,020** | **44,142** | **650,939** | **343,475** | **260,850** | **46,614** |

**Exhibit C-3. Preschool Students, by SELPA Group**

| | Counts | | |
|---|---|---|---|
| **SELPA Group** | **1996** | **1999** | **2002** |
| All SELPAs (n=115) | 40,083 | 37,351 | 37,378 |
| No adjustment or multiplier (n=71) | 19,935 | 17,834 | 19,013 |
| Adjustment and multiplier (n=34) | 17,039 | 16,902 | 15,748 |
| Multiplier, no adjustment (n=10) | 3,109 | 2,615 | 2,617 |

**Exhibit C-4. Nonpublic School Students, Ages 3-22, by SELPA Group***

| | Counts | | | Percent Change | |
|---|---|---|---|---|---|
| **SELPA Group** | **1996** | **1999** | **2002** | **1996-1999** | **1996-2002** |
| All SELPAs (n=115) | 7,183 | 8,878 | 9,547 | 23.6% | 32.9% |
| No adjustment or multiplier (n=71) | 2,243 | 2,793 | 2,700 | 24.5% | 20.4% |
| Adjustment and multiplier (n=34) | 4,450 | 5,522 | 6,229 | 24.1% | 40.0% |
| Multiplier, no adjustment (n=10) | 490 | 563 | 618 | 14.9% | 26.1% |

* This excludes students in Nonpublic Residential Schools outside of California

# APPENDIX D. DEFINITIONS OF SERVICE PLACEMENTS

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| **Regular Class with Accommodations:** Student is educated in the general education classroom. Accommodations to the general education curriculum are determined and implemented through collaboration between general and special education personnel. |
| **Resource Services (school-based program):** Services to address student's IEP goals are provided in an integrated resource program including general education and special education program options. |
| **Resource Specialist Program:** Resource Program Specialist Program is a special education service that provides instruction and services to those students whose needs have been identified in an IEP, and are assigned to regular classroom teachers for the majority of a school day. |
| **Special Day Inclusion Services:** Student is educated in the general education classroom. Modifications to the general curriculum are usually required more than 50% of the school day. |
| **Special Day Class in public integrated facility:** is a placement setting that provides intensive instruction and services to pupils when the nature or severity of the disability precludes their participation in the regular school program for a majority of a school day. *(E.C. 56364)* |
| **Special Day Class in public separate facilities:** a placement setting in which disabled children and youth receive special education and related services for a majority of the school day in a public separate facility. |
| **Special Day Class in nonpublic school:** a placement setting in which disabled children and youth receive special education and related services for a majority of the school day in a nonpublic facility. |
| **Language And Speech:** Language and speech services provide remedial intervention for eligible individuals with difficulty understanding or using spoken language. The difficulty may result from problems with articulation (excluding abnormal swallowing patterns, if that is the sole assessed disability); abnormal voice quality, pitch, or loudness; fluency; hearing loss; or the acquisition, comprehension, expression of spoken language. Language deficits or speech patterns resulting from unfamiliarity with the English language and from environmental, economic or cultural factors are not included.<br><br>Services include; specialized instruction and services; monitoring, reviewing, and consultation. They may be direct or indirect including the use of a speech consultant. |

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| **Home And Hospital:** Services delivered in the home or hospital to a student when, for medical reasons (including psychiatric reasons) or any other reasons, the student is unable to attend school. |
| **Adapted Physical Education:** Direct physical education services provided by an adapted physical education specialist to pupils who have needs that cannot be adequately satisfied in other physical education programs as indicated by assessment and evaluation of motor skills performance and other areas of need. It may include individually designed developmental activities, games, sports and rhythms, for strength development and fitness, suited to the capabilities, limitations, and interests of individual students with disabilities who may not safely, successfully or meaningfully engage in unrestricted participation in the vigorous activities of the general or modified physical education program. *(CCR Title 5 Sec. 3051.5).* |
| **Audiological Services:** These services include measurements of acuity, monitoring amplification, and Frequency Modulation system use. Consultation services with teachers, parents or speech pathologists must be identified in the IEP as to reason, frequency and duration of contact; infrequent contact is considered assistance and would not be included. *(CCR Title 5 Sec. 3051.2)* |
| **Individual Counseling:** One-to-one counseling, provided by a qualified individual pursuant to an IEP. Counseling may focus on aspects, such as educational, career, personal; or be with parents or staff members on learning problems or guidance programs for students. Individual counseling is expected to supplement the regular guidance and counseling program. *(34 CFR Sec. 300.24(b)(2),(CCR Title 5 Sec. 3051.9).* |
| **Group Counseling:** Counseling in a group setting, provided by a qualified individual pursuant to an IEP. Group counseling is typically social skills development, but may focus on aspects, such as educational, career, personal; or be with parents or staff members on learning problems or guidance programs for students. IEP-required group counseling is expected to supplement the regular guidance and counseling program. *(34 CFR Sec. 300.24.(b)(2)); CCR Title 5 Sec. 3051.9)* |
| **Guidance Services:** Guidance services include interpersonal, intrapersonal or family interventions, performed in an individual or group setting by a qualified individual pursuant to an IEP. Specific programs include social skills development, self-esteem building, parent training, and assistance to special education students supervised by staff credentialed to serve special education students. These services are expected to supplement the regular guidance and counseling program. *(34 CFR 300.306; CCR Title 5 Sec 3051.9).* |
| **Occupational Therapy:** Occupational Therapy (OT) includes services to improve student's educational performance, postural stability, self-help abilities, sensory processing and organization, environmental adaptation and use of assistive devices, motor planning and coordination, visual perception and integration, social and play abilities, and fine motor abilities.<br><br>Both direct and indirect services may be provided within the classroom, other educational settings or the home; in a group or on an individual basis; and may include therapeutic techniques to develop abilities; adaptations to the student's environment or curriculum; and |

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| consultation and collaboration with other staff and parents. Services are provided, pursuant to an IEP, by a qualified occupational therapist registered with the American Occupational Therapy Certification Board. *(CCR Title 5 Sec. 3051.6, E.C. Part 30 Sec. 56363).* |
| **Physical Therapy:** These services are provided, pursuant to an IEP, by a registered physical therapist, or physical therapist assistant, when assessment shows a discrepancy between gross motor performance and other educational skills. Physical therapy includes, but is not limited to, motor control and coordination, posture and balance, self-help, functional mobility, accessibility and use of assistive devices. Services may be provided within the classroom, other educational settings or in the home; and may occur in groups or individually. These services may include adaptations to the student's environment and curriculum, selected therapeutic techniques and activities, and consultation and collaborative interventions with staff and parents. *(B&PC Ch. 5.7, CCR Title 5 Sec. 3051.6, EC Part 30 Sec. 56363, GC-Interagency Agreements Ch. 26.5 Sec 7575(a)(2)).* |
| **Orientation And Mobility:** Students with identified visual impairments are trained in body awareness and to understand how to move. Students are trained to develop skills to enable them to travel safely and independently around the school and in the community. It may include consultation services to parents regarding their children requiring such services according to an IEP. |
| **Parent Counseling:** Individual or group counseling provided by a qualified individual pursuant to an IEP to assist the parent(s) of special education students in better understanding and meeting their child's needs; may include parenting skills or other pertinent issues. IEP-required parent counseling is expected to supplement the regular guidance and counseling program. *(34 CFR Sec. 300.24(b)(7); CCR Title 5 Sec 3051.11).* |
| **Social Work Services:** Social Work services, provided pursuant to an IEP by a qualified individual, includes, but are not limited to, preparing a social or developmental history of a child with a disability; group and individual counseling with the child and family; working with those problems in a child's living situation (home, school, and community) that affect the child's adjustment in school; and mobilizing school and community resources to enable the child to learn as effectively as possible in his or her educational program. Social work services are expected to supplement the regular guidance and counseling program. *(34 CFR Sec. 300.24(b)(13 ; CCR Title 5 Sec 3051.13).* |
| **Vocational Education Training:** Organized educational programs that are directly related to the preparation of individuals for paid or unpaid employment and may include provision for work experience, job coaching, development and/or placement, and situational assessment. |
| **Recreational Services:** Therapeutic recreation programs assist the student in becoming as independent as possible in leisure activities and recreation programs in schools and community agencies. *(Title V Section 3051.15).* |
| **Individual And Small Group Instruction:** Instruction delivered one-to-one or in a small group as specified in an IEP enabling the individual(s) to participate effectively in the total school program. |

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| **Vision Services:** This is a broad category of services provided to students with visual impairments. It includes assessment of functional vision; curriculum modifications necessary to meet the student's educational needs -- including Braille, large type, aural media; instruction in areas of need; concept development and academic skills; communication skills (including alternative modes of reading and writing); social, emotional, career, vocational, and independent living skills.<br><br>It may include coordination of other personnel providing services to the students (such as transcribers, readers, counselors, orientation & mobility specialists, career/vocational staff, and others) and collaboration with the student's classroom teacher. *(CAC Title 5 Sec. 3030(d), EC 56364.1).* |
| **Specialized Driver Training:** Any specialized or modified instructions needed to supplement the regular driver training program. *(Title V Section 3051.8(a)).* |
| **Psychological Services:** These services, provided by a credentialed or licensed psychologist pursuant to an IEP, include interpreting assessment results to parents and staff in implementing the IEP; obtaining and interpreting information about child behavior and conditions related to learning; planning programs of individual and group counseling and guidance services for children and parents.<br><br>These services may include consulting with other staff in planning school programs to meet the special needs of children as indicated in the IEP. *(CFR Part 300 Sec. 300.24).*<br><br>IEP-required psychological services are expected to supplement the regular guidance and counseling program. *(34 CFR Sec. 300.24); CCR Title 5 Sec 3051.10).* |
| **Specialized Services For Low Incidence Disabilities:** Low incidence services are defined as those provided to the student population of orthopedically impaired (OI), visually impaired (VI), deaf, hard of hearing (HH), or deaf-blind (DB). Typically, services are provided in education settings by an itinerant teacher or the itinerant teacher/specialist. Consultation is provided to the teacher, staff and parents as needed. These services must be clearly written in the student's IEP, including frequency and duration of the services to the student. *(CCR Title 5 Sec. 3051.16 & 3051.18).* |
| **Health And Nursing -- Specialized Physical Health Care Services:** This includes specialized services provided pursuant to an IEP, such as catheterization, gavage feeding, suctioning, nebulizer treatments, blood glucose monitoring, administration of oxygen, plus any other specialized services in an education setting that may be provided by a trained staff member and does not require the direction or supervision of a physician. (*EC 49423.5(b))* |
| **Health And Nursing -- Other Services:** This includes services that are provided to individuals with exceptional needs by a qualified individual pursuant to an IEP when a student has health problems which require nursing intervention beyond basic school health services. Services include managing the health problem, consulting with staff, group and individual counseling, making appropriate referrals and maintaining communication with agencies and health care providers. These services do not include any physician-supervised or specialized health care service. |

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| IEP-required health and nursing services are expected to supplement the regular health services program. *34 CFR 300.306; CCR Title 5 Sec 3051.12).* |
| **Interpreter Services:** Sign language interpretation of spoken language to individuals, whose communication is normally sign language, by a qualified sign language interpreter.<br><br>This includes conveying information through the sign system of the student or consumer and tutoring students regarding class content through the sign system of the student. (*CCR Title 5, Sec. 3051.16)* |
| **Education Technological Services:** Any specialized training or technical support for the incorporation of assistive devices, adapted computer technology or specialized media with the educational programs to improve access for students. |
| **Behavior Management Services:** A systematic implementation of procedures designed to promote lasting, positive changes in the student's behavior resulting in greater access to a variety of community settings, social contacts, public events, and placement in the least restrictive environment. *(Title V Section 3001(d)).* |
| **Assistive Services:** The term includes a functional analysis of the student's needs for assistive technology; selecting, designing, fitting, customizing, or repairing appropriate devices; coordinating services with assistive technology devices; training or technical assistance for students with a disability, the student's family, individuals providing education or rehabilitation services, and employers. *(34 CFR Part 300.6).* |
| **Braille Transcription:** Any transcription services to convert materials from print to Braille. It may include text books, tests, worksheets, or anything necessary for instruction. The transcriber should be qualified in English Braille as well as Nemeth Code (mathematics) and be certified by appropriate agency. |
| **Reader Services:** Any specialized assistance given to the visually impaired student for the purpose of orally reading material the student cannot read independently. This may include, but is not limited to, assistive technology such as a closed circuit TV reader, or peer assigned to read to the student. This does not include instruction in the process of learning how to read. |
| **Note Taking Services:** Any specialized assistance given to the student for the purpose of taking notes when the student is unable to do so independently. This may include, but is not limited to, copies of notes taken by another student, transcription of tape recorded information from a class, or aide designated to take notes. This does not include instruction in the process of learning how to take notes. |
| **Transition Services:** These services may include program coordination, case management and meetings, and crafting linkages between schools and between schools and post-secondary agencies. |

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| **Vocational Counseling:** This includes career counseling to assist student in assessing his/her aptitudes, abilities, and interests in order to make realistic career decisions. *(Title V Section 3051.14).* |
| **Deaf And Hard of Hearing Services:** These services include speech therapy, speech reading, auditory training and/or instruction in the student's mode of communication. Rehabilitative and educational services; adapting curricula, methods, and the learning environment; and special consultation to students, parents, teachers, and other school personnel may also be included. *(Title V Sections 3051.16 and 3051.18).* |

Source: California Special Education Management Information System (CASEMIS), User's Manual, 2002-03 Edition. California Department of Education, Special Education Division.

# APPENDIX E. TEACHERS' SALARIES, AIDES' SALARIES, AND MULTIPLIERS

1. Teacher standardized average salary and benefits figure of $59,092 was estimated based on the weighted mean compensation for the state in 2001-02.[38]

2. Based on recent national special education expenditure data from the Special Education Expenditure Project (SEEP),[39] the team determined how some specialists' compensation looked in relation to the average. These weights were then applied to the average salary and benefits in California ($59,092), when calculating costs per service.

| Personnel | Average SEEP Salary with Benefits (1999-2000) | SEEP Salaries Weight in Relation to Average |
|---|---|---|
| Audiologist | $48,422 | 1.02 |
| Speech/Language Specialist | $48,735 | 1.03 |
| Guidance Counselor | $50,124 | 1.06 |
| Social Worker | $51,101 | 1.1 |
| Physical/Occupational Therapist | $51,679 | 1.1 |
| School Psychologist | $61,516 | 1.30 |
| Average | $47,245 | 1.00 |

3. The figure used for standardized average salary and benefits for special education instructional aides was $30,000. As the state does not collect data on non-certified staff, the research team relied upon the input and other data sources provided by the stakeholders. This figure was determined by the stakeholders to be the best approximation of a full-time special education instructional aide.

4. Non-personnel multiplier for the calculation of "Instructional Costs" and administration multipliers for the calculation of "Cost including Administration" (Exhibit 4-2) were derived from recent national data on special education expenditures.[40] The non-personnel multiplier (1.0457) was calculated as one plus the ratio between non-personnel expenditure ($1,415,365,556) and personnel expenditure expenditures ($30,970,277,569). The administrative multiplier (1.0845) was calculated as one plus the ratio between administration expenditure per student ($683) divided by special education spending per student ($8,080).

[38] Source: The J-90 salary and benefits files for certified staff for the 2001-02 school year, obtained from the California Department of Education.
[39] Source: Chambers, J.G., Shkolnik, J., & Perez, M. (2003). *Total Expenditures for Students with Disabilities: Variation by Disability.* Palo Alto, CA: American Institutes for Research.
[40] Source: Chambers, J.G., Parrish, T., & Harr, J. J. (2002). *What Are We Spending on Special Education Services in the United States, 1999-2000.* Palo Alto, CA: American Institutes for Research.

# APPENDIX F. CLASS SIZE AND AIDE RATIOS[41]

**Exhibit F-1. Class Size and Aide Allocations for Special Day Classes by Disability**

| Disability | Students[1] | Class Size[2] | Teacher FTEs | Aide per Teacher[3] | Aide FTEs |
|---|---|---|---|---|---|
| Mental Retardation (MR) | 33,807 | 11 | 3,121.6 | 1.8 | 5,679.8 |
| Hard of Hearing (HH) | 2,253 | 9 | 260.0 | 2.4 | 630.9 |
| Deafness (DEAF) | 2,615 | 9 | 301.8 | 2.4 | 732.2 |
| Speech/Language Impairment (SLI) | 13,386 | 13 | 1,030.0 | 1.2 | 1,249.4 |
| Visual Impairment (VI) | 1,808 | 6.5 | 278.2 | 2.2 | 607.5 |
| Emotional Disturbance (ED) | 11,857 | 9 | 1,368.5 | 1.8 | 2,490.1 |
| Orthopedic Impairment (OI) | 8,480 | 9 | 978.8 | 2.4 | 2,374.5 |
| Other Health Impairment (OHI) | 6,941 | 11 | 640.9 | 1.2 | 777.4 |
| Specific Learning Disability (SLD) | 93,164 | 13 | 7,68.7 | 0.6 | 4,347.8 |
| Deaf-Blindness (DB) | 112 | 3 | 34.5 | 2.4 | 83.6 |
| Multiple Disability (MD) | 4,269 | 5 | 788.7 | 1.8 | 1,434.4 |
| Autism (AUT) | 11,328 | 6.5 | 1,743.3 | 4.9 | 8,458.5 |
| Traumatic Brain Injury (TBI) | 779 | 5 | 143.9 | 1.8 | 261.8 |
| **Total Staff Generated by Model** | | | **17,858.6** | | **29,127.8** |
| **Total Staff in 2001-02 Special Education Personnel Report** | | | **17,860.3** | | **45,137.9** |
| **Difference** | | | **1.7** | | **16,010.1** |

[1] Source: December 2002 CASEMIS.
[2] Based on class sizes specified by the 2002 Stakeholder Committee. The SDC class sizes specified by the stakeholders have been increased by 8.3 percent in order to generate a count of SDC teachers that is near the actual number of SDC teachers reported in 2001-02. Numbers shown are rounded.
[3] Based on aide allocations specified by the 2002 Stakeholder Committee. Aide ratios have been increased by 21.3 percent and are shown rounded.

[41] These class sizes and aide ratios are not implied standards, but are merely ratios used for best allocating total state staff available for the purpose of cost estimates.

**Exhibit F-2. Aide Allocation for Special Day Inclusion Services (SDIS) by Disability**

| Disability[1] | Number of Students[2] | Aide Per Student[3] | Aide FTEs |
|---|---|---|---|
| Mental Retardation (MR) | 860 | 1 | 860 |
| Deafness (DEAF) | 11 | 1 | 11 |
| Visual Impairment (VI) | 89 | 1 | 89 |
| Emotional Disturbance (ED) | 136 | 1 | 136 |
| Orthopedic Impairment (OI) | 344 | 1 | 344 |
| Deaf-Blindness (DB) | 4 | 1 | 4 |
| Multiple Disability (MD) | 109 | 1 | 109 |
| Autism (AUT) | 784 | 1 | 784 |
| Traumatic Brain Injury (TBI) | 23 | 1 | 23 |
| Hard of Hearing (HH) | 44 | 0.5 | 22 |
| **Total Aides Generated by Ratios** | | | **2,382.0** |

[1] Students who were recorded as receiving SDIS and have a primary disability of specific learning disability, Speech/Language impairment, or other health impairment were not allocated any SDIS aide services.
[2] Source: December 2002 CASEMIS.
[3] As determined by the Stakeholder Group.

**Exhibit F-3. Aide Allocations for All Settings[1]**

| Other Settings | Aide Per Teacher | Aide Per Student | Aide FTEs |
|---|---|---|---|
| Preschool | 2.3* | - | 4,689.5 |
| Resource Specialist Program | 0.73* | - | 8,939.4 |
| Special Day Inclusion Services | - | See above | 2,382.0 |
| Special Day Class | See above* | - | 29,127.8 |
| **Total Aides Generated by Ratios** | | | **45,138.7** |
| **Total Aides in 2001-02 Special Education Personnel Report** | | | **45,137.9** |
| **Difference** | | | **-0.8** |

[1] As determined by the Stakeholder Group.
* Aide allocations specified by the Stakeholder Group for these settings have been increased by 21.92 percent in order to generate a total count of aides that is comparable to the actual count of aides reported in 2001-02.

# APPENDIX G. OTHER PROFESSIONAL STAFF SERVICE WEIGHTS

| Other Professional Staff Services | Stakeholder Weights* |
|---|---|
| Orientation and mobility | 1.5 |
| Home and hospital | 2.2 |
| Individual /small group instruction | 1.0 |
| Vision services | 1.5 |
| Specialized driver training | 0.1 |
| Specialized services for low incidence disabilities | 1.5 |
| Health and nursing - specialized | 3.0 |
| Health and nursing - other | 0.4 |
| Education technology services/ Assistive services** | 0.3 |
| Behavior management services | 0.5 |
| Braille transcription** | 0.5 |
| Reader services | 0.5 |
| Note taking services | 0.5 |
| Deaf and hard of hearing services | 1.5 |

* The Stakeholder Weights were decreased by 19.9 percent, as the total costs generated could not exceed the ceiling of $127.5 million for “other professional staff” salaries and benefits.

** The non-personnel multiplier for these services was increased by 50 percent, in accordance with discussions with the Stakeholder Committee, to account for higher equipment costs.

# APPENDIX H. TOTAL SPECIAL EDUCATION COST ESTIMATES BY DISABILITY CATEGORY, PRESCHOOL, AND NPS, 2002-03

| | SEEP Special Education Expenditure Estimates, inflated to 2002-03 using CPI* | | CASEMIS Cost Estimates, inflated to 2002-03 using California COLA** | |
|---|---|---|---|---|
| | Mean | Standard Deviation | Mean | Standard Deviation |
| Public School-Aged Students by Disability Category | | | | |
| Autism | $16,370 | $1,567 | $29,735 | $12,289 |
| Deaf-Blind | n/a | - | $42,209 | $19,376 |
| Deaf | n/a | - | $22,859 | $12,452 |
| Emotional Disturbance | $10,633 | $1,240 | $11,587 | $5,712 |
| Established Medical Disability | n/a | - | $6,918 | $3,728 |
| Hard of Hearing | n/a | - | $14,202 | $8,840 |
| Hearing Impairment/Deaf | $11,839 | $1,003 | CASEMIS estimates delineate between HH and Deaf | |
| Multiple Disability | $13,396 | $955 | $22,728 | $6,855 |
| Mental Retardation | $12,255 | $607 | $10,727 | $6,015 |
| Other Health Impairment | $9,416 | $862 | $6,062 | $3,065 |
| Orthopedic Impairment | $11,712 | $843 | $17,251 | $8,180 |
| Specific Learning Disability | $5,924 | $276 | $4,064 | $1,540 |
| Speech/Language Impairment | $6,813 | $1,649 | $5,500 | $1,691 |
| Traumatic Brain Injury | $13,402 | $1,588 | $16,246 | $9,714 |
| Visual Impairment/ Blind | $14,840 | $1,888 | $20,456 | $9,968 |
| Preschool | $10,771 | $1,113 | $11,057 | $3,572 |
| Nonpublic School Students | $27,515 | $2,409 | $25,738 | 82.8 |
| NPS out of state | n/a | - | $30,821 | 97.7 |

* 1999-2000 national figures were inflated using the Consumer Price Index, adjusted to the school year 2002-03.
** CASEMIS 2001-02 estimates were inflated to 2002-03 using the California Cost of Living Adjustment (2.0 percent).

Source of the national Special Education Expenditure Project (SEEP) figures: Chambers, J., Shkolnik, J., & Pérez, M. (2003). *Total Expenditures for Students with Disabilities, 1999-2000: Spending Variation by Disability*. Palo Alto, CA: American Institutes for Research. The SEEP estimates represent the total special education expenditure/cost, which includes personnel, non-personnel, and administration.

CASEMIS estimates were derived using December 2002 CASEMIS, 2001-02 special education personnel data report, and 2001-02 J-90 certified salary file. CASEMIS estimates are based on standard costs assigned to special education placements and services, after revenue limits have been deducted from SDC and NPS costs. These estimates reflect personnel, non-personnel, and administration costs.

# APPENDIX I. IMPLEMENTATION OPTIONS

### Exhibit I-1. Severity Adjustments by Implementation Option

| | | Implementation Option 1: Two-Year Phase-Out | | | | Implementation Option 2: Three-year Phase-Out | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | Year ONE | | | Year TWO | Year ONE | | | Year TWO | | | Year THREE |
| | SELPAs Severity Funds in 2002-03 | SELPAs that no longer receive funds will receive half of their 2002-03 entitlement | Immediate and full funding for SELPAs eligible under the revised multipliers | Total Cost | SELPAs that no longer receive funds will not receive funds in 2004-05. SELPAs that receive funds under revised approach receive full funding | SELPAs that no longer receive funds will receive 66% of their 2002-03 entitlement | Immediate and full funding for SELPAs eligible under the revised multipliers | Total Cost | SELPAs that no longer receive funds will receive 33% of their 2002-03 entitlement | Immediate and full funding for SELPAs eligible under the revised multipliers | Total Cost | SELPAs that no longer receive funds will not receive funds in 2004-05. SELPAs that receive funds under revised approach receive full funding |
| SELPA Name | | 2003-04 (no inflation reflected) | 2003-04 (no inflation reflected) | 2003-04 (no inflation reflected) | 2004-05 (no inflation reflected) | 2003-04 (no inflation reflected) | 2003-04 (no inflation reflected) | 2003-04 (no inflation reflected) | 2004-05 (no inflation reflected) | 2004-05 (no inflation reflected) | 2004-05 (no inflation reflected) | 2005-06 (no inflation reflected) |
| **TOTAL** | **$80,589,897** | **$12,058,896** | **$105,655,122** | **$117,714,018** | **$105,655,122** | **$15,917,743** | **$105,655,122** | **$121,572,865** | **$7,958,872** | **$105,655,122** | **$113,613,993** | **$105,655,122** |
| *Marginal Cost* | | | | *$37,124,121* | *$25,065,225* | | | *$40,982,968* | | | *$33,024,097* | *$25,065,225* |
| Anaheim CESD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Antelope Valley (Palmdale USD) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Bakersfield CESD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Butte COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Clovis USD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Colusa COE | $0 | $0 | $579,343 | $579,343 | $579,343 | $0 | $579,343 | $579,343 | $0 | $579,343 | $579,343 | $579,343 |
| Contra Costa (Acalanes UHSD) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Corona-Norco USD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Desert/Mountain (San Bernardino COE) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| East County (San Diego COE) | $4,918,481 | $0 | $5,660,117 | $5,660,117 | $5,660,117 | $0 | $5,660,117 | $5,660,117 | $0 | $5,660,117 | $5,660,117 | $5,660,117 |
| East Valley (San Bernardino COE) | $1,582,918 | $791,459 | $0 | $791,459 | $0 | $1,044,726 | $0 | $1,044,726 | $522,363 | $0 | $522,363 | $0 |
| El Dorado COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Elk Grove USD | $0 | $0 | $2,193,623 | $2,193,623 | $2,193,623 | $0 | $2,193,623 | $2,193,623 | $0 | $2,193,623 | $2,193,623 | $2,193,623 |
| Fontana USD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Foothill (Glendale USD ) | $1,008,382 | $0 | $3,396,811 | $3,396,811 | $3,396,811 | $0 | $3,396,811 | $3,396,811 | $0 | $3,396,811 | $3,396,811 | $3,396,811 |
| Fresno COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Fresno USD | $1,990,714 | $0 | $4,377,640 | $4,377,640 | $4,377,640 | $0 | $4,377,640 | $4,377,640 | $0 | $4,377,640 | $4,377,640 | $4,377,640 |
| Garden Grove USD | $6,422,404 | $3,211,202 | $0 | $3,211,202 | $0 | $4,238,787 | $0 | $4,238,787 | $2,119,393 | $0 | $2,119,393 | $0 |
| Glenn COE | $0 | $0 | $773,469 | $773,469 | $773,469 | $0 | $773,469 | $773,469 | $0 | $773,469 | $773,469 | $773,469 |
| Greater Anaheim | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Humboldt/Del Norte (Humboldt COE) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Imperial COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Inyo COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |

| | | Implementation Option 1: Two-Year Phase-Out | | | | Implementation Option 2: Three-year Phase-Out | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
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| SELPA Name | SELPAs Severity Funds in 2002-03 | 2003-04 (no inflation reflected) | 2003-04 (no inflation reflected) | 2003-04 (no inflation reflected) | 2004-05 (no inflation reflected) | 2003-04 (no inflation reflected) | 2003-04 (no inflation reflected) | 2003-04 (no inflation reflected) | 2004-05 (no inflation reflected) | 2004-05 (no inflation reflected) | 2004-05 (no inflation reflected) | 2005-06 (no inflation reflected) |
| Irvine USD | $1,356,275 | $0 | $2,089,003 | $2,089,003 | $2,089,003 | $0 | $2,089,003 | $2,089,003 | $0 | $2,089,003 | $2,089,003 | $2,089,003 |
| Kern COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Kern High SD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Kings COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| LACOE: Downey-Montebello | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| LACOE: East San Gabriel | $1,073,813 | $536,907 | $0 | $536,907 | $0 | $708,717 | $0 | $708,717 | $354,358 | $0 | $354,358 | $0 |
| LACOE: Mid-Cities | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| LACOE: Puente Hills | $465,312 | $232,656 | $0 | $232,656 | $0 | $307,106 | $0 | $307,106 | $153,553 | $0 | $153,553 | $0 |
| LACOE: Santa Clarita | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| LACOE: Southwest | $1,017,287 | $0 | $1,262,957 | $1,262,957 | $1,262,957 | $0 | $1,262,957 | $1,262,957 | $0 | $1,262,957 | $1,262,957 | $1,262,957 |
| LACOE: West San Gabriel | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Lake COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Lake Tahoe USD/Alpine | $258,472 | $129,236 | $0 | $129,236 | $0 | $170,591 | $0 | $170,591 | $85,296 | $0 | $85,296 | $0 |
| Lassen COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Lodi USD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Long Beach USD | $18,154 | $9,077 | $0 | $9,077 | $0 | $11,982 | $0 | $11,982 | $5,991 | $0 | $5,991 | $0 |
| Los Angeles USD | $25,608,686 | $0 | $51,166,814 | $51,166,814 | $51,166,814 | $0 | $51,166,814 | $51,166,814 | $0 | $51,166,814 | $51,166,814 | $51,166,814 |
| Madera/Mariposa (Madera COE) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Marin COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Mendocino COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Merced COE | $2,230,802 | $1,115,401 | $0 | $1,115,401 | $0 | $1,472,329 | $0 | $1,472,329 | $736,165 | $0 | $736,165 | $0 |
| Mid-Alameda County (Castro Valley USD) | $0 | $0 | $1,662,897 | $1,662,897 | $1,662,897 | $0 | $1,662,897 | $1,662,897 | $0 | $1,662,897 | $1,662,897 | $1,662,897 |
| Mission Valley (Fremont USD) | $278,470 | $139,235 | $0 | $139,235 | $0 | $183,790 | $0 | $183,790 | $91,895 | $0 | $91,895 | $0 |
| Modesto City Schools | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Modoc COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Mono COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Monterey COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Moreno Valley USD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Morongo USD | $548,163 | $274,081 | $0 | $274,081 | $0 | $361,787 | $0 | $361,787 | $180,894 | $0 | $180,894 | $0 |
| Mt. Diablo USD | $2,186,564 | $1,093,282 | $0 | $1,093,282 | $0 | $1,443,132 | $0 | $1,443,132 | $721,566 | $0 | $721,566 | $0 |
| Napa COE | $948,588 | $474,294 | $0 | $474,294 | $0 | $626,068 | $0 | $626,068 | $313,034 | $0 | $313,034 | $0 |

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| SELPA Name | SELPAs Severity Funds in 2002-03 | 2003-04 (no inflation reflected) | 2003-04 (no inflation reflected) | 2003-04 (no inflation reflected) | 2004-05 (no inflation reflected) | 2003-04 (no inflation reflected) | 2003-04 (no inflation reflected) | 2003-04 (no inflation reflected) | 2004-05 (no inflation reflected) | 2004-05 (no inflation reflected) | 2004-05 (no inflation reflected) | 2005-06 (no inflation reflected) |
| Newport-Mesa USD | $63,867 | $0 | $1,195,262 | $1,195,262 | $1,195,262 | $0 | $1,195,262 | $1,195,262 | $0 | $1,195,262 | $1,195,262 | $1,195,262 |
| North Coastal (San Diego COE) | $0 | $0 | $115,559 | $115,559 | $115,559 | $0 | $115,559 | $115,559 | $0 | $115,559 | $115,559 | $115,559 |
| North Inland (San Diego COE) | $874,854 | $437,427 | $0 | $437,427 | $0 | $577,404 | $0 | $577,404 | $288,702 | $0 | $288,702 | $0 |
| North Orange (Orange COE) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| North Region (Alameda City USD) | $0 | $0 | $3,572,581 | $3,572,581 | $3,572,581 | $0 | $3,572,581 | $3,572,581 | $0 | $3,572,581 | $3,572,581 | $3,572,581 |
| North Santa Cruz (Santa Cruz COE) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Northeast Orange (Placentia-Yorba Linda USD) | $48,413 | $0 | $147,761 | $147,761 | $147,761 | $0 | $147,761 | $147,761 | $0 | $147,761 | $147,761 | $147,761 |
| Norwalk-La Mirada/ABC | $705,469 | $352,735 | $0 | $352,735 | $0 | $465,610 | $0 | $465,610 | $232,805 | $0 | $232,805 | $0 |
| Oakland City USD | $730,823 | $0 | $1,791,218 | $1,791,218 | $1,791,218 | $0 | $1,791,218 | $1,791,218 | $0 | $1,791,218 | $1,791,218 | $1,791,218 |
| Orange USD | $1,301,474 | $0 | $24,138 | $24,138 | $24,138 | $0 | $24,138 | $24,138 | $0 | $24,138 | $24,138 | $24,138 |
| Pajaro Valley USD | $1,083,321 | $541,660 | $0 | $541,660 | $0 | $714,992 | $0 | $714,992 | $357,496 | $0 | $357,496 | $0 |
| Pasadena USD | $2,668,954 | $0 | $49,947 | $49,947 | $49,947 | $0 | $49,947 | $49,947 | $0 | $49,947 | $49,947 | $49,947 |
| Placer/Nevada (Placer COE) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Plumas USD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Poway CUSD | $0 | $0 | $1,029,082 | $1,029,082 | $1,029,082 | $0 | $1,029,082 | $1,029,082 | $0 | $1,029,082 | $1,029,082 | $1,029,082 |
| Riverside COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Riverside USD | $1,192,782 | $596,391 | $0 | $596,391 | $0 | $787,236 | $0 | $787,236 | $393,618 | $0 | $393,618 | $0 |
| Sacramento COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Sacramento CUSD | $732,992 | $0 | $6,798,696 | $6,798,696 | $6,798,696 | $0 | $6,798,696 | $6,798,696 | $0 | $6,798,696 | $6,798,696 | $6,798,696 |
| San Benito COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| San Bernardino CUSD | $0 | $0 | $248,447 | $248,447 | $248,447 | $0 | $248,447 | $248,447 | $0 | $248,447 | $248,447 | $248,447 |
| San Diego CUSD | $10,163,256 | $0 | $1,399,150 | $1,399,150 | $1,399,150 | $0 | $1,399,150 | $1,399,150 | $0 | $1,399,150 | $1,399,150 | $1,399,150 |
| San Francisco COE/USD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| San Joaquin COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| San Juan USD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| San Luis Obispo COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| San Mateo COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Santa Ana USD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Santa Barbara (Goleta ESD) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Santa Clara I | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |

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| Santa Clara II | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Santa Clara III | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Santa Clara IV | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Santa Clara V (Mt. Pleasant ESD) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Santa Clara VI (Mt. Pleasant ESD) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Santa Clara VII | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Shasta COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Sierra COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Siskiyou COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Solano COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Sonoma COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| South County (San Diego COE) | $3,154,375 | $1,577,187 | $0 | $1,577,187 | $0 | $2,081,887 | $0 | $2,081,887 | $1,040,944 | $0 | $1,040,944 | $0 |
| South Orange (Orange COE) | $0 | $0 | $79,059 | $79,059 | $79,059 | $0 | $79,059 | $79,059 | $0 | $79,059 | $79,059 | $79,059 |
| Stanislaus COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Stockton CUSD | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Sutter COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Tehama COE | $0 | $0 | $976,067 | $976,067 | $976,067 | $0 | $976,067 | $976,067 | $0 | $976,067 | $976,067 | $976,067 |
| Tri-Cities (Beverly Hills USD) | $1,315,690 | $0 | $160,909 | $160,909 | $160,909 | $0 | $160,909 | $160,909 | $0 | $160,909 | $160,909 | $160,909 |
| Tri-County (Tuolumne COE) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Trinity COE | $0 | $0 | $922,284 | $922,284 | $922,284 | $0 | $922,284 | $922,284 | $0 | $922,284 | $922,284 | $922,284 |
| Tri-Valley (Pleasanton USD) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Tulare COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| Tustin USD | $0 | $0 | $345,914 | $345,914 | $345,914 | $0 | $345,914 | $345,914 | $0 | $345,914 | $345,914 | $345,914 |
| Vallejo CUSD | $1,781,310 | $0 | $2,855,148 | $2,855,148 | $2,855,148 | $0 | $2,855,148 | $2,855,148 | $0 | $2,855,148 | $2,855,148 | $2,855,148 |
| Ventura COE | $0 | $0 | $594,911 | $594,911 | $594,911 | $0 | $594,911 | $594,911 | $0 | $594,911 | $594,911 | $594,911 |
| West Contra Costa USD | $0 | $0 | $758,377 | $758,377 | $758,377 | $0 | $758,377 | $758,377 | $0 | $758,377 | $758,377 | $758,377 |
| West End (San Bernardino COE) | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |
| West Orange (Huntington Beach UHSD) | $1,093,332 | $546,666 | $0 | $546,666 | $0 | $721,599 | $0 | $721,599 | $360,800 | $0 | $360,800 | $0 |
| Whittier Area (Whittier UHSD) | $1,703,874 | $0 | $8,432,970 | $8,432,970 | $8,432,970 | $0 | $8,432,970 | $8,432,970 | $0 | $8,432,970 | $8,432,970 | $8,432,970 |
| Yolo COE | $61,627 | $0 | $994,969 | $994,969 | $994,969 | $0 | $994,969 | $994,969 | $0 | $994,969 | $994,969 | $994,969 |
| Yuba COE | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 | $0 |