Healthy Children Ready to Learn


Healthy, active, and well-nourished children and youths are more likely to attend school and are more prepared and motivated to learn. Yet an alarming number of students in California are overweight, unfit, or both. These children and youth are developing serious health problems now and face dire consequences in the future.

This document addresses issues surrounding student nutrition, physical activity and fitness, and the recommendations from The Superintendent's Task Force on Childhood Obesity, Type 2 Diabetes, and Cardiovascular Disease. It is consistent with the recommendations of other groups in the state that have recently deliberated on these topics.

A comprehensive approach as outlined below describes the California Department of Education's (CDE) perspectives and plans to ensure that students are healthy and ready to learn.

Specifically, the CDE has established four goals:

- Support high-quality instructional programs in health education and physical education that provide students with the skills, knowledge, and confidence to develop and maintain active, healthy lifestyles.
- Implement nutrition standards for all food and beverages sold on campus.
- Increase participation in school meal programs so that no child goes hungry.
- Create a school environment that supports the health of students.

Background

The number of overweight children in California and the nation has reached epidemic levels. In the United States, the proportion of young people who are overweight has tripled since 1980. According to the CDE's analysis of the 2004 FITNESSGRAM data, over 32 percent of youths are overweight and close to 74 percent are unfit. Today's children and youths are less active, consume more fat and sweetened beverages, and eat fewer healthy foods, especially fruits and vegetables, than their predecessors. Alarmingly, only 51 percent of today's children and youths eat even one serving of a fruit or vegetable each day.
Overweight children and youths are developing serious health problems now and are facing worse health problems in the future. The Surgeon General states that children who have an unhealthy diet and low levels of physical activity are at a greater risk of developing chronic health problems, including type 2 diabetes, high blood pressure, asthma, and heart disease.6

The economic burden of overweight children is high. The Centers for Disease Control and Prevention (CDC) reports that in one two-year period, U.S. taxpayers spent $127 million on hospital costs associated with caring for overweight children and adolescents.7 California paid nearly $25 billion in health care costs and lost productivity in 2000 due to overweight, obesity, and physical inactivity.8

**Goal One: Support High Quality Instructional Programs in Health Education and Physical Education That Provide Students with the Skills, Knowledge, and Confidence to Develop and Maintain Active, Healthy Lifestyles.**

**Health Education Standards and State-Adopted Instructional Materials**

One component of coordinated school health, health education (which includes nutrition education), is an effective way for students to develop knowledge and skills needed to avoid health risks and enhance health and academic achievement. Quality school health education described in the *Health Framework for California Public Schools, Kindergarten through Grade Twelve* includes a documented, planned, and sequential curriculum for students in kindergarten through high school that addresses the physical, mental, emotional, and social dimensions of health.9 The *Health Framework* provides a foundation for curriculum and instruction and describes the scope and sequence of knowledge and skills that students need to master. The new state-adopted health textbooks are aligned with the *Health Framework* and are a valuable resource for classroom instruction.

It is important to develop and adopt health education standards in order to be consistent with other curriculum areas. Content standards for health education will help improve student learning by providing school districts with fundamental tools for developing health education curriculum and improve student assessment. Standards also will provide guidance for professional preparation and the continuing education of teachers. The standards would be incorporated in the next version of the *Health Framework* and applied to the subsequent textbook adoption.

**Physical Education**

Children and youths do not naturally develop the knowledge, skills, and confidence they need to be physically active; they must be taught. California schools should provide instruction in physical education in a way that effectively provides each and every student with the opportunity to learn meaningful course content and receive appropriate instruction. The CDE must promote physical education as an instructional priority for California schools.
California schools have a responsibility to focus resources on instructing students in physical education. High-quality physical education instruction:

- Contributes to good health by providing vigorous physical activity that counteracts major risk factors of heart disease; improves muscular strength, flexibility, and endurance; and increases bone density
- Develops fundamental and advanced motor skills
- Improves students' self-confidence, self-esteem, and self-control
- Provides opportunities for increased levels of physical fitness, which is associated with higher achievement in both reading and mathematics \(^{10,11}\)

Schools simply must concentrate attention on physical education instruction to provide students with necessary skills and knowledge to be physically active throughout their lifetime. Too few students are receiving quality physical education experiences. The challenge we face is to ensure that every school, and every teacher charged with teaching physical education, is empowered with the vision and knowledge base to improve student learning experiences and, ultimately, student achievement in physical education.

**Recognizing that schools have varying levels of performance and readiness for change, the CDE will:**

- Support legislation that calls for the development and adoption of standards for health education.
- Urge school districts to utilize the new state-adopted health textbooks in their health education programs.
- Provide statewide focus and leadership in the implementation of standards-based physical education instruction.
- Develop models for urban schools that provide sufficient space for physical education instruction and physical activity programs.
- Provide training modules for administration of the California physical fitness test (FITNESSGRAM).
- Work within existing programs, and with the Legislature and Governor, to support professional development in physical education for teachers and school administrators.

**Goal Two: Implement Nutrition Standards for Food and Beverages Served or Sold on Campus.**

Data reveal that the vast majority of children fail to sufficiently limit their daily intake of saturated fat, total fat, and sodium and fail to consume the recommended daily intake of fiber or servings of milk. The data also show that, on a given day, teenagers drink more soda and fruit drinks than milk and that teen males average more than three servings of soda and fruit drinks a day. Each additional serving of sugar-sweetened drinks increases the body mass index (BMI) and the frequency of obesity; consumption of sugar-sweetened drinks is associated with obesity in children. \(^{12}\)
Our school environment must support proper nutrition and promotion of healthful eating habits. In addition, schools must ensure that the food and beverages served or sold model the nutrition and health messages taught in the classroom. To do this, schools must strengthen and enforce nutrition standards for all food and beverages served or sold at schools, including school meals, à la carte sales, vending machines, and fundraisers.

To facilitate the implementation of nutrition standards, the CDE will:

- Support legislation to expand to high schools the current prohibition against soda being sold or served during the school day.
- Support implementation of current law (Senate Bill 19, Escutia, Chapter 912, Statutes of 2001), which calls for statewide standards for food and beverages on school campuses, and wisely recognize that districts will need funding to implement these standards.
- Establish an advisory group to develop implementation strategies for improving the nutritional quality of foods and beverages served or sold on school campuses. Standards are set by the United States Department of Agriculture for school meals sold as part of the National School Lunch, School Breakfast, and Summer Food Service programs; however, not all schools consistently meet these standards, and the standards do not apply to items sold outside of reimbursable meals.

Goal Three: Increase Participation in School Meal Programs So No Child Goes Hungry.

Hunger and fear about having adequate food (food insecurity) affect more than 30 million people each year in the United States. In California, almost two million children come from homes that may be experiencing food insecurity. Yet, at the same time, health experts declare obesity to be an epidemic. Food insecurity may result in weight gain because:

- Low-income families may stretch their food dollars by purchasing lower-cost food, with higher levels of calories per dollar, to ward off hunger.
- Chronic ups and downs in food availability can cause people to eat more, when food is available, than they normally would. Over time, this cycle can result in weight gain.
- Physiological changes may occur to help the body conserve energy when diets are periodically inadequate. The body can adapt to food shortages by reducing metabolic rate and increasing the efficiency of fat storage, leading to obesity in times of food insecurity.

Participation in the school breakfast, lunch, and/or summer meal programs can break this connection between hunger and obesity. A recent study by researchers at the University of North Carolina and the University of Tennessee shows that participation in the child nutrition programs can reduce childhood obesity: girls in food-insecure households had a significantly lower risk of being overweight if they participated in these programs.
Closer to home, only 39 percent of children who eat a free or reduced-priced lunch in California also eat a school breakfast -- meaning that more than one million children in California may miss out on a nutritious start to their school day.15 Addressing this challenge, a Los Angeles collaborative of 100 different community agencies launched a campaign in March 2004 advocating the regular consumption of a healthy breakfast as the frontline approach to addressing the country's childhood obesity epidemic. A recent assessment of the campaign results shows that parents are more aware of the school breakfast program, and area schools are serving more breakfasts.16

Schools that offer breakfast programs see increases in students' grades and improvements in classroom behaviors.17-19 Similarly, through a separate survey, high-performing secondary schools in California had larger percentages of students who ate breakfast than low-performing schools on the day of the survey.20 From offering breakfast in the classroom to ensuring that bus schedules allow students to eat before classes commence, many schools committed to academic excellence are successfully demonstrating the various ways to ensure that students start the day with a healthy breakfast -- ready to learn.

Increased participation in school meal programs means not only healthier choices for more of our children, but increased federal funding for our schools as well. For example, if all children eligible for free and reduced-priced meals participated in the school meal programs, California schools would receive approximately $812 million in additional federal funding every year ($375 million for lunch and $437 million for breakfast).21

This underutilization of federal meal programs can also be found in California's summer and after-school snack programs. More schools and community organizations are needed to provide these meals and snacks. Start-up and expansion grants are available through the CDE for summer and breakfast programs. Additionally, Congress selected California this year as the only state to pilot an after-school snack program, enabling community organizations to join with schools in providing nutritious snacks and receive federal funds to assist in covering the costs.

Ensuring Student Access to Healthy Foods

We are all committed to leaving no child behind. Given how hunger interferes with learning, we must work together to provide federally funded, nutritious meals and snacks to California's children. Full access to healthy meals and snacks means that:

- No child is hungry at school.
- Food choices offered enhance student health and, therefore, support academic success.
- Students do not feel stigmatized for participating in the school lunch program.
- Foods are offered in ways that appeal to students.

Local decisions can improve meal access. In elementary schools, scheduling recess before lunch can make all the difference in how well children eat. Schools that have
switched to providing recess prior to lunch find that students will eat more of their lunch, waste less food, and return to class more ready to learn.22

School food service directors are expected to pay for food, labor, marketing, and adequate equipment within funding available in the cafeteria account. Labor costs, including worker's compensation, have increased significantly over the last ten years, as have the costs of our expectations that schools provide healthy and appealing meals. Yet, while the consumer price index and the federal funding have increased by 28 percent between 1990 and 2000, state funding for school meals decreased 13 percent.

Creating Solutions with Technology

In order for students to access healthful school meals, schools must remove real and perceived barriers. Computerized point-of-sale (POS) systems are popular and offer an effective means of reducing the stigma of free lunch and shortening the lunch queue. All students are allowed to use a "debit card" (containing a balance of prepayments or subsidies for meals), enter their personal identification number, and obtain a meal more seamlessly. Such systems eliminate the possibility of identifying students based on their eligibility for meal subsidies, erasing the stigma of getting free meals as a barrier to accessing school breakfast or lunch. Many districts report increased overall meal participation after implementing such systems, which can increase district revenue substantially. However, implementing a POS system requires a significant initial investment, which can be a barrier for many cash-strapped schools.

Computerized nutrient analysis software is another example of technology's contribution to improving food quality and student access to healthy meals. Schools can market the healthfulness of meals offered only when they have accurate information on the nutrient content of foods and beverages. Analyzing nutrient content is done most efficiently using computerized programs. However, the costs of software, hardware, and staff time for system setup and maintenance are prohibitive for some schools.

So that all children are ready for the academic day and that no child goes hungry, the CDE will commit to improving student access to school and summer meals and snacks by:

- Working with the Governor, Legislature and State Board of Education to obtain increased funding for school meals
- Seeking special funding to assist schools with procuring needed technology, such as POS systems and nutrient analysis software
- Working with the State Board of Education, the Governor, and school, city, and county officials to underscore the importance of expanding school and summer meal and snack programs

Goal Four: Create a School Environment that Supports the Health of Students.
There is a need to create an environment that supports the health of students with comprehensive local school board policies to address health education, physical education, physical activity, and nutrition standards for all food and beverages served or sold on campus. These policies should apply to curriculum, instruction, and practices in the classroom and the non-instructional opportunities that schools have throughout the school day to guide and influence student behaviors. These policies should be developed within the context of coordinated school health and should be developed through a school health council. According to the American Cancer Society, a school health council is an advisory group of individuals who represent the school and segments of the community. A school health council could include school staff, students, parents, administrators, health care professionals, and other community members.23 The school health council should reflect the ethnic and cultural diversity of the school community. Once established, schools can address the physical environment to identify where changes can be made to further support the health and fitness of all students.

This coordinated approach is described in the Health Framework for California Public Schools, Kindergarten Through Grade Twelve. 9 Districts that successfully implement the coordinated school health model designate a staff person to be the school health coordinator. Coordinated school health is a powerful and effective way of reinforcing healthy behaviors and empowering students with the knowledge, skills, and abilities to help them make smart choices in life.

Local School Wellness Policy

Schools are central in providing students the skills, social support, and environmental reinforcements they need to develop and practice healthy eating and physical activity behaviors. Creating a healthy school environment begins with a strong, comprehensive district policy that promotes the health and wellness of students. The Child Nutrition and WIC Reauthorization Act of 2004 (PL 108-265) requires local school districts to adopt and implement wellness policies by the beginning of the 2006 school year that must include:

- Goals for nutrition education and physical activity that promote student wellness in a manner that the school district determines is appropriate
- Nutrition guidelines for all food sold on campus during the day in efforts to promote health and reduce childhood obesity
- Assurance that nutrition guidelines for school meals will not be less restrictive than federal policy
- A plan for measuring the effectiveness of the wellness policy, including the designation of at least one person to oversee the activities and ensure that schools comply with the local wellness policy
- Inclusion of parents/guardians, school food service professionals, school board members, and others in the development of the policy
Applied to California, over 1,000 school districts will need to work together with their communities, many for the first time, to develop policies on nutrition education, physical activity programs, and the kinds of foods they offer to students.

**To accelerate and improve these policies for the benefit of students and their families, the CDE will:**

- Work with an array of school, nutrition, and physical activity organizations to support districts in adopting and implementing wellness policies, hopefully in advance of the 2006 deadline.
- Collaborate with school and nutrition organizations to provide districts technical assistance in identifying, promoting, and supporting exemplary nutrition and physical activity policies and practices that have been developed and successfully implemented through measures such as the Superintendent's Challenge and SB 199's Linking Education, Activity, and Food (LEAF) grants.
- Support legislation that will require districts to ensure that their local wellness policies and compliance activities incorporate nutrition requirements currently contained in state law and regulation.
- Encourage schools to address all eight areas of coordinated school health (health education, physical education, nutrition services, parent and community involvement, health services, health promotion for staff, safe and healthy school environment, and psychological and counseling services) in the local policy, applied throughout the school campus and school day. The policy should be developed collaboratively with individuals, including (in addition to the groups specified by federal law) students, school nurses and other health professionals, health educators, physical educators, and community members.

**Parent/Guardian Education**

We face a crisis in student health and fitness, and it is incumbent upon parents/guardians, schools, and child care programs to work together as partners in addressing student health behaviors. Parents are teachers, too. Accordingly, we must educate parents about the importance of appropriate eating practices and physical activity. Schools and child care programs must be sensitive to cultural differences and preferences in addressing this need. Equipped with this knowledge, parents will be able to help their children develop healthy, lifelong habits and strengthen academic achievement.

**To reinforce parent/guardian education, the CDE will:**

- Encourage districts to provide parents/guardians with information about how good nutrition and healthy levels of physical activity can help energize students and support their success in school. The CDE will partner with statewide, regional, and county leaders, agencies, and networks to disseminate information about available programs and best and emerging practices in nutrition and physical activity.
• Support family and community connections with child nutrition, school nutrition, physical education, and physical activity programs in the context of coordinated school health, such as:
  o Model parent/guardian education programs in physical activity and nutrition
  o Models of successful school/community collaborations in nutrition and physical activity programs
  o Resource guides to connect families with available community efforts to improve nutrition and physical activity

Marketing Healthful Lifestyle Choices

With billions of dollars spent annually on advertising to children, schools are challenged to successfully convey nutrition and physical activity messages to students that are consistent with public health guidelines. The growing epidemic of childhood obesity has brought renewed attention to the role that food and beverage advertising and marketing play in negatively influencing the eating habits of youths. The food, beverage, and restaurant industries recognize children as a major market force because of their spending power, purchasing influence, and anticipated brand loyalty as adult consumers. Children under 14 years of age purchase $24 billion in products and influence $190 billion in family purchases each year. Children are being exposed to increasing amounts of marketing and advertising, with $15 billion spent marketing to children in the United States in 2002, which is twice the amount spent in 1992.

The World Health Organization concluded in 2003 that the extensive marketing to children of fast food and high-calorie, nutrient-poor food and beverages is a probable causal factor for the accelerating global trend in weight gain and obesity.

To support the concept of marketing healthy lifestyle choices in schools, the CDE will:

• Encourage the elimination of advertising on campus except when it promotes the consumption of nutritious meals and snacks that reflect current nutrition standards and promotes physical activity.

Supporting Health Through School Facilities and Practices

Just as we design our classrooms to promote effective teaching, so must we design and renovate our schools to promote good health. However, while we want schools to provide our children nutritious and appealing meals, nowhere is our collective neglect of the importance of school health and nutrition so evident as in the dismal state of school cafeterias, kitchens, and areas for physical activity.
As student enrollment has exploded, we recognized the critical role that facilities play by providing additional resources to districts for class size reduction as well as bond money for new and expanded schools. Unfortunately, cafeterias, kitchens, and areas for physical activity were left behind.

As a result, many schools lack the type or size of kitchen needed to prepare an adequate number of nutritious meals and have turned instead to bringing in fast and/or highly processed food or other commercial operations to serve meals to their students. Many cafeterias and play areas also have been converted to classroom space. Physical activity needs include:

- Open areas suitable for safe play and participation in physical activity during non-instructional time, as well as physical education classes
- Storage facilities for student-owned equipment (bicycles, skates) that provide opportunity for active commuting to and from school

We must recognize the critical role that adequate facilities play in promoting good nutrition and physical activity the same way we marshaled resources to address the need for new and improved classrooms. School cafeterias must create a welcoming atmosphere; kitchens must have adequate space and equipment for preparation of healthy meals; and points of sale must allow for quick entrance and exit. We must provide schools the resources necessary to design and build adequate facilities that support healthy meals, physical education, and physical activity.

To assist schools in providing necessary facilities for good nutrition and appropriate physical activity, the CDE will:

- Work with the Legislature and the State Allocation Board to focus on newly constructed and/or renovated schools to ensure that plans for such schools include appropriate lunchroom facilities and environments that support physical activity.

School Culture and Student Health

A school's culture can play a powerful role in influencing students' participation in physical activity and the food choices they make both at school and at home. Our schools must consciously examine the culture created in their classrooms and on their campuses and note the messages sent to our students. Unspoken messages that are often communicated to students include those centered around physical activity used as punishment, unhealthy foods served as rewards, noninstructional physical activity opportunities eliminated for remediation instruction, and physical education instruction time used for administrative tasks, such as photographs and special programs.

To promote positive, health-conscious school cultures, the CDE will:

- Disseminate best and promising practices related to physical activity and nutrition in the school culture
• Disseminate evaluation tools that schools can use to evaluate their school culture in relation to physical activity and nutrition
• Support policy development and recognition programs that reward schools for developing a school culture that values, promotes, and rewards appropriate practices in student health and physical activity

Ensuring Adequate Professional Development

The role of school food service directors and staff to contain costs and maintain quality while operating within an educational organization is quite demanding. The challenges they face are many, including, but not limited to, establishing nutrition policies, complying with rigorous food safety and menu planning regulations, planning facilities, preparing nutritious foods with limited resources, and managing the logistics of serving many students in a short timeframe. In addition, they must be aware of trends in nutrition, food service management, and food distribution.

Currently, limited financial support exists for professional development and training for child nutrition directors. Given the challenges faced in the management of child nutrition programs and school food service operations, we must work together to provide ongoing professional development that will ensure the success of those who provide nutrition services to California's children.

Concern with overweight and obesity among children has increased over the last few years, thereby increasing the need for the CDE to provide additional nutrition education and training to local child nutrition program sponsors. At the same time, support for nutrition education and training declined from over $600,000 to less than $70,000 between school fiscal years 2002-03 and 2004-05, a reduction of $530,000, or 88 percent.

School food service directors and staff cannot create a healthy school environment on their own. The entire school community must support better health, nutrition, and fitness of students. Therefore, it is important that districts provide comprehensive professional development for child nutrition staff, classroom teachers, physical educators, health educators, and school nurses so that a common base is established and all are working together toward achieving a healthy school environment. Resources are also needed to support the professional development of a healthy school environment team.

To promote adequate professional development, the CDE will:

• Support comprehensive professional development for child nutrition staff, teachers, physical educators, health educators, and school nurses toward a healthy school environment.
• Work with the Governor and the Legislature to require and fund professional development for food service staff.

Conclusion
The issues and strategies identified in this paper signify a fresh start toward addressing a statewide epidemic of childhood overweight, poor fitness, and inadequate physical activity. This crisis did not develop overnight, and meeting its challenges will require a comprehensive response. To ensure that California’s children grow up to be healthy, active, and productive members of our society, schools and child care agencies must provide an environment and culture to develop healthy habits and practices.

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