Introduction

Recent trends offer insights into the health behaviors of the American population. Changes in lifestyle, increasing obesity rates and shifts in the social framework of families and communities have all contributed to troubling outcomes that relate directly to shifts in nutrition and food choices. How do communities and the institutions serving them counter these negative health outcomes and meet the changing needs of the American population?

Scientists and health practitioners have long understood the connections between diet and health, even when research is slow to confirm findings. But more consumers today also understand that high-fat diets can result in obesity, that high levels of cholesterol contribute to chronic heart conditions and that excessive alcohol use can deteriorate organ function.

Less is known about the linkage between how food is produced and health outcomes. Yet, food production plays an important role in the food, diet and health continuum.

Agriculture and food production determine what and where foods are produced for a population, and thus impact food choices and diet behaviors. At the same time, the population’s food choices affect food production decisions made by farmers. If consumers shift toward organic or environmentally friendly foods, for example, farmers must use the appropriate production inputs and processes to meet those needs and remain competitive.

If consumers use the same common sense to select food sources as with other diet factors, better diet and nutrition and improved health outcomes are possible. The following is not an exhaustive list of all possible programs and theories in food, diet and health. However, it does represent some of the most promising thinking and practices in using food and diet to create better health outcomes.

Current Food, Diet and Health Programming Areas

The following are descriptions of five of the program areas currently applied at the local, state and national levels. They represent only a fragment of the total programming in the areas of food, diet and health, but offer good insight into current program trends.

School Garden Programs

A number of school garden programs have developed across the country, which target the impressionable minds of children during periods of growth and development before many lifelong habits are formed. When fully applied to a child’s curriculum and integrated into the family learning experience, the school garden offers valuable entrée into the decision-making and lifestyle choices of the child and surrounding environments.

While many school garden programs have been developed in warmer climates with longer growing seasons, even northern communities in states such as Iowa and in New England have begun to implement programs with the appropriate adaptations.

One of the most recognizable programs is the Edible Schoolyard, a school garden program that incorporates growing fresh produce on school grounds with the integration of school curriculum and other strategies, such as districtwide food policy and farm-to-school education. The program operates in the Berkeley School District in California and was encouraged by a local chef and supported with resources and technical assistance from the Center for Ecoliteracy. Dr. Michael Murphy of Harvard University is evaluating the Edible Schoolyard and has documented encouraging results with further study underway.

Dr. Murphy is also involved in evaluating other school-based food programs, such as farm-to-school and diet and exercise programs. He is one of six evaluators of various school yard garden programs across California. He has concluded from his work that children in school yard garden programs have more ecological knowledge and commitment to the environment than those not introduced to such programs.

Other successful program examples include Growing in the Garden in Iowa and Pyramid Gardening in Georgia. Both programs include a basic school ground garden where children prepare, plant, tend and pick the produce. Some school programs also have integrated lesson plans around food preparation and the development of recipe books, so children can see how fresh, healthy food can be prepared and enjoyed.

Farm-To-School Programs

Farm-to-school programs link local farms and their products with school systems. The goal is to assure farmers an outlet for their products and to provide fresh products to students and others utilizing school food services. Many schools have implemented salad bars as part of this strategy, while some schools have utilized this as an opportunity to educate students regarding farming careers and food production services.
California has been fertile ground for farm-to-school programs, given the year-round growing season in much of the state and progressive thinking among much of the population. The Center for Food and Justice at Occidental College in California has provided direction and technical assistance to many schools working to implement farm-to-school programs. A national farm-to-school network is also forming to build upon the experiences of various programs and implement farm-to-school in a variety of climates.

Where year-round farm agreements are not possible, the farm-to-school program is adapted to best serve both farmers and schools. For instance, in the Northeast, growing seasons do not fully correspond to school calendars. So agreements with farmers allow fresh produce delivery to schools during the months produce is available. Schools then supplement their menus in the remaining months from other sources.

The farm-to-school programming area is still very young in many regions, and structures are still being formed and adapted. In the New Jersey area, for example, bringing farm-fresh produce to summer food programs was a challenge. Difficulties in determining food transportation within the school district created increased expenses that neither the farmers nor school district could afford. Dr. Michael Hamm, Ph.D., C.S. Mott Distinguished Professor of Sustainable Agriculture at Michigan State University, says work is underway to try this program again next summer.

Some schools have completed evaluations of their farm-to-school efforts with positive results. Evaluations include those completed for Santa Monica, Calif., (see www.uepi.oxy.edu/projects/cfj/resources/index.htm for full evaluation) and Berkeley.

**Food Systems in School Curriculum**

While many of the school garden and farm-to-school programs mentioned earlier incorporate information from farms and production into the overall curriculum, food systems in the school curriculum are also considered a separate area. Curriculums have been developed and implemented at a very local level (one school) to a broad teaching level (through higher education institutions), and content varies widely.

Teachers College at Columbia University, under the direction of Isobel Contento, Ph.D., is developing a comprehensive curriculum integrating the study of farming, food systems and the impact of food on health and the environment into school lessons. The curriculum is being developed and tested under academic structure and will be offered to schools nationwide, as well as introduced to students enrolled in teacher education at Columbia University. The curriculum also integrates parent education, with the understanding that what is learned at school must be applied at home to be fully effective.

Nonprofit organizations also have developed comprehensive school curriculums about farm and agriculture. Project Food, Land and People has developed such a curriculum, which emphasizes agricultural and environmental awareness, critical thinking and problem-solving skills, cooperative attitudes and appreciation for cultural differences. “Resources for Learning,” as it is known, contains 55 lessons and has been published in Spanish and English. To date, 23 states have districts that utilize this curriculum, and Pennsylvania has mandated the curriculum for the entire state.

Other curriculums developed have been smaller in scale but also focus on the integration of farm and food production with health and nutrition, using structured lessons and hands-on experiences to support the lessons. Many of the school garden programs are linked with curriculum or are an integral part of such programming. Programs that link the garden with the curriculum are designed so that either component can come first with an understanding of the value of adding the other component. Local curriculum examples include Planting Gardens, Growing Minds in the Knox County Schools in Tennessee, and the Growing in the Garden K-3 curriculum developed through Iowa State University Extension. Both of these latter programs include garden experiences.

Charter schools may provide another area for exploration of food, diet and health issues. Some charter schools may already have a focus on agriculture and natural sciences, thus lending themselves to an audience already interested in segments of this field. Charter schools may also have fewer bureaucratic challenges to implementing food, diet and health curriculums versus public schools, due to differing administrative styles. Charter schools are limited in the segment of the population they reach, however, so success would have to be measured against the effectiveness of reaching a broad population.
Alternative school environments within the public school system offer a small but unique opportunity to integrate the fields of health and food. In a very unique way, the Catherine Ferguson Academy of the Detroit Public School system integrates its own working farm on-site into the math and science curriculum, while at the same time targeting its school classes and services to pregnant and parenting middle school and high school students. With 350 young women enrolled in the school and 170 registered children, this school offers urban residents insight into farming and food issues while meeting some of the core health needs of this high-risk population.

Community Food Assessments

Community Food Assessments (CFAs) are processes by which a community can investigate the needs and resources of an area, and then work collaboratively to determine what programs and policies are needed to reduce food insufficiency among a population. The assessments are intended to be fully inclusive and collaborative processes, with the key being to engage more than just the usual partners in food, nutrition and hunger from a community. True collaboration, and the true success of a CFA, is determined when new partners come to the table to offer their resources and address a broader concern that may or may not directly affect their own day-to-day operations.

CFAs are relatively new, though collaboration within a community is not. Bringing hunger and food insufficiency issues to the attention of the broader community is critical to the success of convening the resources necessary to address local food issues. A few communities have conducted full CFAs, although more communities are at the development stage and are learning about collaboration across boundaries.

The Community Food Security Coalition (CFSC) has developed a guidebook to assist communities in conducting a CFA, which also references the few known CFAs in the United States. Teams that included academics and other professionals, and sometimes drawing on significant resources, conducted most of the assessments listed in the guide, including assessments for Los Angeles, Milwaukee, Madison, Austin, Berkeley and Sacramento. No information for CFAs that have been conducted by grassroots networks or less formal assessments are available and may vary in their comprehensiveness and stage of completion.

Including Food Production Information as Part of Nutrition Education to Various Populations

Nutrition education varies greatly within targeted audiences and within the knowledge shared, including the level of information on food production presented and how that food production impacts food and diet decisions. Nutrition education was once almost exclusively limited to nutritional content and isolated to discussions of diet, but more nutrition education services are now recognizing the importance of understanding the source of healthy food in changing behaviors long-term.

Simple inclusion of food production information may serve as a link to improving health outcomes. For instance, educating a population on the differences between fresh vegetables and processed or canned vegetables can impact how they prepare foods. If individuals understand where foods come from and how to use them, this may reduce at least one barrier to accessing fresh products. While there are many factors that impact health outcomes, nutrition education that includes information on food production can assist individuals in improving their diet and positively affecting their health.

Local programs have taken different directions to include food production in nutrition education. A number of Web-based education models have integrated food systems with nutrition education as well. One Web site, www.agri-culturehealth.com, educates users about the benefits of production, marketing and regional food consumption. The site is targeted toward any audience, from consumer to professional to farmer. Specific pages target segments of agriculture and health, including women’s health. The women’s health page, for example, focuses on reducing risk factors of chronic diseases affecting women through their lifecycle. All of the pages connect to other pages within the site, underscoring the connection of food production to health information.

In another example, alternative crop brochures created consumer demand for high-value crops. Dr. Carol Miles, Ph.D., now an agricultural systems specialist with Washington State University’s Vancouver Research & Extension Unit in Vancouver, Wash., developed brochures, recipe cards, fact sheets, articles, and press releases educating both growers and consumers on use, preparation, and nutritional value, which were distributed across the community. The materials also were adapted for the Web site, http://agsyst.wsu.edu/altcropbroc.htm, along with pictures.
La Cocina Saludable and its Interactive Multi-Media (IMM) program developed a bilingual nutrition education program that has assisted people with limited resources who are interested in making changes to improve health and well-being of self and family. The program is intended to reach people otherwise not targeted in a more convenient manner (the organized program), and serves as an entrée to other nutrition and food programs. The Web site, www.cahs.colostate.edu/fshn/extension/index.htm, has been launched to offer information to reach even more people.

**Review of Federal Food Programs and Policies**

Federal food programs offer a critical safety net to millions of children and families who are hungry or near hungry. The programs provide some, but not all, of the nutritional needs of those struggling to meet food, safety and shelter needs and are mostly targeted toward low-income populations. Without these safety net programs, it is doubtful that all families would be able to find the necessary resources to feed themselves. Descriptions below provide background on the history and utilization of each federal food program, and include recommendations for policy action that will bring these programs to more people or better serve the populations for which they were intended.

Federal food programs assist at-risk populations that range from severely food-insecure to those who are marginally food-insecure or food-secure with the risk of becoming food-insecure. The federal government has developed measurement tools that determine the level of food insecurity. In addition, the government measures the level of hunger, which has prompted some groups to adopt the term “near hungry” to further describe food insecurity of individuals and families. The terms refer to a continuum of food insecurity from the point where families always have the ability to acquire enough nutritious and safe foods for a healthy lifestyle, to experiences of reduced food intake among adults and sometimes children. All of these terms help programs better target their resources.

Most of these programs are funded with federal dollars, with a few programs requiring limited state or private dollars to cover a portion of administrative costs. Most of the programs have long records of success and have been positively evaluated by USDA and others. All are managed under the watchful eyes of Congress, which funds the programs, and federal and state agencies that oversee their implementation.

While these federal programs have extensive and successful histories, their focus has mostly been on the distribution of foods to meet the diet and nutrition needs of the hungry or near hungry. Some programs have made direct efforts to incorporate fresh farm products, such as the Women, Infants and Children (WIC) Farmers’ Market Nutrition Program. Other programs need attention and advocacy to open more doors to the distribution of fresh produce.

**Food Stamp Program**

The Food Stamp Program (FSP) was originally implemented from 1939 through 1943, revised in 1961 and implemented nationwide in 1974. In 1977, FSP was restructured to include the goal of “alleviating hunger and malnutrition by permitting low-income households to obtain a more nutritious diet through normal channels of trade.”

FSP participation today has increased the nutritional value of a low-income household food supply by 20-40 percent. The program had an average monthly participation in fiscal year 2000 of 17.2 million individuals, with almost all households having gross income below the federal poverty level (FPL). Contrary to some public perceptions, 71 percent of those receiving food stamps have participated for less than two years, and half of new participants stay in FSP no more than six months. The program maintains a long financial and non-financial verification process to confirm eligibility.

The 2002 Farm Bill partially restored FSP benefits to legal immigrants. It restored food stamp eligibility to qualified aliens who are otherwise eligible and who: (1) are receiving disability benefits regardless of date of entry, effective federal fiscal year 2003 (current law requires them to have been in the country on Aug. 22, 1996); (2) are under 18 regardless of date of entry, effective federal fiscal year 2004 and beyond (current law limits eligibility to children who were in the country on Aug. 22, 1996); or (3) have lived in the United States continuously for five years as a qualified alien beginning on date of entry, effective April 2003.
The 2002 Farm Bill also addressed transitional food stamps for families moving from welfare. Effective Oct. 1, 2002, states may extend from the current three months to up to five months the period of time households may receive transitional food stamp benefits when they lose Temporary Assistance to Needy Families (TANF) cash assistance. Benefits would be equal to the amount received by the household prior to the termination of TANF with adjustments in income for the loss of TANF and, at state option, information from another program in which the household participates. A household would not be eligible for the extension if it was losing TANF cash assistance because of sanction, was disqualified from the FSP, or is in a category of households designated by the state as ineligible for transitional benefits. Households may apply for recertification during the transitional period with benefits determined according to current circumstances. The provision also extends through the end of the transitional period the length of time households can be certified for benefits (currently limited to 12 months for most households).

Yet to be highlighted as part of the FSP are ongoing efforts to integrate widespread nutrition education into food stamp distribution and to enhance the utilization of local farm products. Some states, such as Colorado, have utilized TANF funds to provide nutrition education, but barriers regarding cash spending and state fund matching have made this effort more difficult. Similarly, the purchase of local, fresh produce with food stamps can offer opportunities to improve the health of both families and local farms.

While the FSP has been successful in increasing the nutritional value of households, many households still experience hunger. The USDA's September 2000 food security survey found that food insecurity was sufficiently severe in some 255,000 households where one or more children were hungry on one or more days during the year because the household lacked money for enough food. The number of children living in these households was 562,000. An Urban Institute report also found that 33 percent of former welfare recipients have to skip or cut back meals due to lack of food. Food stamps do not meet the needs of all hungry households.

National School Lunch Program

The National School Lunch Program (NSLP) was established with the National School Lunch Act in 1946. In 1998, Congress expanded the program to include reimbursement for snacks in after-school programs, covering children through age 18.

More than 97,700 public and nonprofit private schools and residential childcare institutions participate in NSLP, feeding nearly 27 million children each day. NSLP is an entitlement program, meaning that all children eligible for free or reduced-price lunches will receive such services. In fiscal year 2000, $5.56 billion was spent on NSLP.

Recent efforts have been made to link NSLP to fresh produce, local farmers and other local food sources. While other foods come from commodities and “bonus foods,” which consist of market surpluses of government-subsidized foods, they are available only as markets allow. The 2002 Farm Bill included a provision requiring the Secretary of Agriculture to encourage institutions participating in the school lunch and breakfast programs to purchase locally produced foods, to the maximum extent practicable; advise institutions of the locally produced food policy; and provide startup grants to up to 200 institutions to defray initial costs of equipment, materials, storage facilities and similar costs. It authorizes $400,000 a year for each of the fiscal years 2003-2007.

The 2002 Farm Bill also established a Fruit and Vegetable Pilot Program. The provision requires the Secretary to make free fresh and dried fruits and fresh vegetables available to students in 25 schools in each of four states and students in schools on one Indian reservation in the 2002-2003 school year.

Also, to encourage schools and institutions to buy specialty crops, the 2002 Farm Bill mandated that the Secretary make a minimum of $200 million per year available to schools and institutions to purchase additional fruits, vegetables and other specialty crops.

National School Breakfast Program

The National School Breakfast Program was first established through the Children Nutrition Act of 1966 in areas where children had long bus rides to school and many mothers were in the workforce. The program was authorized permanently in 1975. Total federal cost for the program in fiscal year 2000 was $7.8 billion, which covered 7.6 million children in the 71,180 schools participating in the program.
A per-meal cash reimbursement to public and nonprofit private schools and residential childcare sites is provided as an entitlement, similar to NSLP. School boards must apply to the state education agency to institute the program. More than 74.5 percent of schools that serve the lunch program participate in the breakfast program. The breakfast provides one-quarter or more of the Recommended Daily Allowance (RDA) of key nutrients.

Research has linked breakfast program participation and educational attainment. Reports show increased standardized test scores for participants compared to low-income children not in the school breakfast program, along with a decrease in tardiness and absenteeism.

While a larger percentage of free or reduced-price school lunch participants take part in the breakfast program, wide variations exist among states. According to the Food Research and Action Center, if all states had the participation rates of the best three states (Arkansas, Kentucky and West Virginia), an estimated two million more children would be fed and $320 million in federal funds would be infused into school programs.

The inclusion of fresh local produce is equally as important for breakfast as the NSLP and other nutrition programs. As noted in the previous section on the NSLP, the 2002 Farm Bill included a provision requiring the Secretary of Agriculture to encourage institutions participating in SBP to purchase locally produced foods and provided for startup grants for fiscal years 2003-2007.

Summer Food Service Program for Children
Congress created the Summer Food Service Program for Children (SFSP) in 1968, an entitlement program administered by USDA Food and Nutrition Services. The program is often linked with educational, developmental or recreational activities.

In the summer of 1999, SFSP served more than 2.1 million children. Approximately 14 percent of low-income children who receive free or reduced-price school lunch receive the SFSP. Total federal cost for this program in fiscal year 1999 was $252 million.

Eligibility is determined by the site, based on enrollment and geography. A site is enrollment-eligible if 50 percent of children enrolled can be documented to qualify for free or reduced-price school meals (determined at 185 percent of FPL or below), in addition to the disabled. Geographical eligibility is determined when a program is located in an area where 50 percent of children qualify for free or reduced-price lunch.

Federal bureaucracy for SFSP was recently reduced through rule changes, and difficulties in implementing various summer food programs for children have been addressed. Among other issues, changes now allow food to be transported on buses, and schools can count the operating costs of transporting kids to feeding sites. Efforts are underway to encourage better utilization of small-resource farmers and to add variety to local programs.

In 1996, Congress cut reimbursement rates for SFSP, making it more difficult for programs to cover costs. Apart from increasing reimbursement rates again, the other way to increase funding for these programs is to remove the “wall” between operating and administrative costs and allow funding for one to cover shortfalls in the other. If the “wall” is removed, full funding can assist programs to cover costs as needs change without placing programs at risk. Fourteen pilot sites are testing this option by pooling resources to cover costs, although the pilot program does not cover private nonprofit organizations unless they are linked or sponsored by a school or public agency. The pilot ends in September 2003 and will be evaluated by USDA Food and Nutrition Services.

Inclusion of fresh local produce in summer food programs is equally as important as for NSLP and other nutrition programs, and many of the same policy challenges apply. In addition, summer food programs have both direct nutritional benefits and social benefits. Summer food programs help maintain nutrition behaviors between school years, as well as serve as incentives to bring children into organized programs.

Special Supplemental Food Program for Women, Infants, and Children (WIC)
The WIC program was piloted in 1972 and authorized nationwide in 1974. WIC provides nutritious food, nutrition education and access to health care services to qualified people. The program is administered federally by USDA Food and Nutrition Services and is implemented at state and local levels through social services agencies.
WIC is fully federally funded but is not an entitlement program. WIC is also limited to the annual appropriations of Congress and therefore is at risk of reduction during an economic downturn or other financially tight situation. The total WIC appropriation for fiscal year 2002 is $4.387 billion, up from $4.032 billion in 2000.

USDA data shows that for fiscal year 2001, approximately 7.31 million people on average participated in the program each month. Of that number, nearly 3.6 million were children, more than 1.92 million were infants and nearly 1.78 million were women. About 47 percent of babies born in the United States are reached by WIC, which is nearly all of those considered eligible. Approximately 81 percent of eligible pregnant women and children are reached, based on income data and other eligibility requirements.

Since WIC is not an entitlement program, a prioritization system has been developed to target those at highest risk first. To be eligible, a participant must: 1) be a pregnant, postpartum, or breastfeeding woman, or infant or child under 5 years old; 2) have income below 185 percent of the FPL; 3) be certified by a WIC professional to be nutritionally at-risk; or 4) be nutritionally at-risk receiving food stamps, TANF or Medicaid.

WIC’s benefits are well-documented for the program’s preventive value. Estimates show that for every dollar spent on WIC, between $1.77 and $3.13 in Medicaid spending is saved for newborns and mothers. Other social, developmental and health benefits further reinforce its value. WIC can increase prenatal care utilization, decrease the number of low-birth-weight babies and fetal mortality, reduce anemia and enhance the nutritional quality of diets for participants. The program recognizes its important role in linking to the broader nutrition and health of participants, and has implemented a five-site pilot effort to promote WIC as a vital link to community health and nutrition services.

WIC Farmers’ Market Nutrition Program (FMNP) and Seniors Farmers’ Market Nutrition Program (SFMNP)

The WIC FMNP began in 1992 to provide additional coupons to WIC participants to purchase fresh produce at participating farmers’ markets. FMNP increases awareness of local produce and introduces many participants to a form of local marketing and purchasing not previously familiar to them. While not all states participate, evaluations show positive results and reactions from both WIC participants and farmers.

The program is administered by USDA Food and Nutrition Services but requires a 30 percent match by the state, or public or private funds. Matching funds can be for similar programs, which enables a state to use federal funds to implement the farmers’ market program and the state match to serve the elderly or those ineligible for WIC.

Similar to other nutrition programs, FMNP allows Indian tribes to receive program funds to administer in their Native American communities. Federal funds are mandated and are part of WIC appropriations, although the amount is not. In fiscal year 2001, $20 million was earmarked for FMNP, compared to $15 million in fiscal years 1999 and 2000. In fiscal year 2002, $15 million in Community Credit Corporation (CCC) funds has been earmarked for this program.

Regulations provide direction for state and local programs. Eligible foods include fresh fruits and vegetables and edible herbs, which are locally grown and unprocessed. Cider, juices, honey, maple syrup, seeds, nuts, eggs, meat, cheese, seafood, flowers, ornamental produce and foods grown outside the United States are not allowed. Farmers must be trained in the procedures, agree to be monitored, display signs, accept coupons within the dates at the current price or less, and assure that coupons are redeemed only for eligible foods. Coupon value per recipient, per year, must be between $10 and $20, and cash change may not be provided for purchases less than the coupon. Nutrition education is also required.

Participation in FMNP has been impressive. Approximately 1.9 million people received coupons in fiscal year 2000, and $17.5 million in coupons was redeemed. A total of 12,897 farmers and 1,622 farmers’ markets were authorized to accept FMNP coupons in the District of Columbia, Guam, 35 states and four Indian Tribal Organizations.

More recently, the Seniors Farmers’ Market Nutrition Pilot Program (SFMNPP) was established by the CCC. The program made grants to states and Indian Tribal Organizations to provide coupons to low-income seniors that could be exchanged for eligible food at farmers’ markets, roadside stands and community-supported agriculture programs. As part of the program, $15 million was granted in 2001 to 31 states and five Indian Tribal Organizations, with an estimated 370,000 seniors expected to be reached.
The 2002 Farm Bill removed the “pilot” from the Seniors Farmers’ Market Nutrition Pilot Program name and legislated the use of $15 million in CCC funds for each of federal fiscal years 2003 through 2007 to carry out and expand the Seniors Farmers’ Market Nutrition Program (SFMNP).

Child and Adult Care Food Program
The Child and Adult Care Food Program (CACFP) was established in 1968 and is an entitlement program that provides subsidies to care providers for nutritious meals. The program is legislated through the broader farm bill.

In fiscal year 2000, total federal cost of CACFP was $1.6 billion, with different reimbursement rates applying to the various services (children’s meals or snacks versus adult meals and snacks). As with most federal programs, and especially those with long track records, the program was evaluated by USDA to show benefits and positive results.

To be eligible, a sponsor must be a licensed or approved care provider or public or nonprofit private school providing organized childcare programs, including after-school programs for children up to age 12. States have the option of enforcing immigration restrictions, which can cause problems for families who want to find safe and healthy environments for their children but are afraid of possible action by the government due to their immigration status. In 1998, the Child Nutrition Reauthorization Act moved homeless food programs into the CACFP, which means it is no longer a freestanding program. The two programs now share the same oversight and administration.

The Emergency Food Assistance Program (TEFAP)
First authorized in 1981, TEFAP was designed to distribute surplus commodities as the Temporary Emergency Food Assistance Program. In 1988, the Hunger Prevention Act required USDA to purchase added commodities for low-income and emergency feeding organizations. The 1990 Farm Bill renamed the program to its current name.

TEFAP provides USDA commodities to states, which in turn distribute the food through local emergency food providers. Foods vary by region and market conditions. In fiscal year 1997, an estimated 3.8 million households were served through this program. More than 117 million pounds of food were distributed, worth more than $140 million. Total federal expenditures in fiscal year 1997 were $179.3 million.

The program is focused on commodities and not local produce distribution. States determine participant eligibility and may adjust income criteria based upon state needs. The program is a critical piece to hunger prevention, though it does not seem to affect nutrition behaviors or local food systems beyond serving basic food needs.

Policy Opportunities
The federal government is not the only place where policies affecting food, diet and health can be developed. Local governments and the private sector also are making great strides to better integrate these issues into policies and practices. This section will review some recent policy activities by public and private entities that are bringing a better understanding and appreciation for the interrelationship between food, diet and health.

Food Systems Project
The Food Systems Project is an innovative project developed in the Berkeley Unified School District with the help of the Center for Ecoliteracy, and is a pilot project of the USDA “Farm-To-School Initiative.” The Food Systems Project is designed to support a garden classroom in every school in the district; develop a districtwide food systems-based curriculum, improve food access and nutritional health in the school district child nutrition service, link family farms to schools, tackle food-related public policy, and supply leadership and support to the city food policy council.

The food policy was adopted by the Berkeley Board of Education and is now being fully implemented across the district. Such implementation requires the participation of all school parties, from administration to teachers to food service personnel. Twelve goals and 11 strategies span every facet of operating in the district, including a business plan, curriculum, sustainable agriculture practices, public information, and policy and maintenance. The full policy is available as part of the supporting documents collected for the Food, Diet and Health project of the W.K. Kellogg Foundation.
Using a $1.2 million grant from the USDA Nutrition Network, the Food Systems Project has worked to institutionalize efforts to bring a garden classroom to every school in Berkeley and refine policies that can maintain the work beyond the grant. The project also has used the energy from its work to receive a $300,000 grant from the California Endowment to write a business plan to upgrade school kitchens. A tax assessment passed in the school district in November 2000 has furthered its work.

In addition, teams at every school are developing visions for implementing policies of the food policy council. For example, salad bars now operate at schools, with produce purchased from local organic farmers. The salad bars are acceptable as a School Lunch Program option and are less expensive than other food choices. The project also has funding for curriculum integration at the Martin Luther King, Jr. Middle School for five years, Berkeley High School for three years, and in the elementary schools.

While the Food Systems Project has been primarily focused on the school district, the city council also has a food policy council. Project coordinators are taking their knowledge and working with other communities in the region interested in creating food policy councils and employing successful food policies.

The Food Systems Project, under the direction of former California Assemblyman Tom Bates, also is establishing a new program linking local farmers and their produce to childcare centers connected to the school district. The Farm Fresh Choice project is developing mini farmers’ markets at the centers. All centers targeted are in low-income and high-risk communities. Some funding has been identified, and the project is working to gain commitment on more funding to place a local coordinator in every center, to develop local teams to plan the project and to assure availability of technical support.

Dr. Michael Murphy of Harvard University has been a major force in the Food Systems Project. He is looking at the parental role and home impact of all of these programs.

Vitamin Settlement Funds

An anti-trust settlement with several vitamin manufacturers accused of fixing prices on vitamins and vitamin products will result in 23 states, Puerto Rico and the District of Columbia receiving a portion of the settlement that has been set aside for projects that help consumers who paid too much for vitamins or products that include vitamins. Payments range from $570,000 for Washington, D.C., to $19.961 million for New York. States can give some money to nonprofit groups in the form of grants, with the remainder earmarked for farmers and grocery store owners financially harmed by the price-fixing.

New York officials have already announced they will use their portion of the settlement to provide grants to nonprofit organizations and local governments working to improve the health and nutrition of state residents, as well as for research in nutritional, dietary and agricultural sciences. In Michigan, the Department of Community Health is developing a plan for spending the dollars, though no indication on how this money will be spent is available yet and the final plan must be approved by the state legislature. Other states have not determined where they will spend their funds.

Conclusion

Little reliable information is available to consumers regarding the positive links that can exist between accessing healthful food sources, food production and their own health outcomes.

To improve consumer awareness and understanding of food issues, both public and private organizations are developing and implementing innovative programs to coordinate healthful food production and availability with better diets.

While much work remains to be done to bring focus to this area on regional and national levels, several small-scale projects are already demonstrating the value of such efforts. Together with existing federal food programs, communities and institutions can adapt programming and alter policies to meet the changing needs of the American population.
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