### Special Report: Food and Nutrition Surveillance

### **Food and Nutrition Surveillance Systems**

Food and nutrition surveillance is a continuous process of collecting, processing, analyzing, interpreting, and utilizing data about the food supply and nutrition of populations. Since this information can come from a variety of sources, a food and nutrition surveillance system (FNSS) must involve an orderly collaboration between the information systems of different sectors.

Although FNSS do not follow a single model and each country must design a system based on local conditions and resource availability, these systems have the common purposes of identifying population groups currently at risk and of permitting the impact of changes in social and economic conditions to be monitored as an early warning of approaching food crises. A standard methodology for such systems cannot be expected, since countries will use different indicators of nutritional status and access to food, in keeping with their own needs, situation, and resources. Indicators range from anthropometric data and measures of food consumption to trends in food prices and crop yields, and can reflect

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current nutritional status or future tendencies.

#### **FNSS IN THE AMERICAS**

The countries of the Americas have been working for almost two decades with the Pan American Health Organization and other international agencies to identify priorities for the distribution of the increasingly scarce resources with which to fight malnutrition. Since the 1970s, many countries in the Americas have developed nutritional surveillance programs.

The FNSS that have developed in the Americas are varied in their objectives, organization, operations, and production of information. While many are technically sound, not all have been able to ensure that the information they provide is regularly employed in decision making. The FNSS are frequently conceived, planned, and operated strictly by the nutrition technical units of the health sector. In some cases, the highest national or sectoral decision makers do not know of the existence of the systems or do not appreciate their usefulness. Furthermore, technical persons outside the field of nutrition sometimes believe it is futile to measure malnutrition when there is a lack of resources or political will to attack the problem.

PÂHO's Food and Nutrition Program

carried out a review of the FNSS in the countries of the Region by means of questionnaires that were distributed at the beginning of 1988. The study was completed in August of that year. Twenty-five countries responded, among which seven (Colombia, Costa Rica, Cuba, Grenada, Guatemala, St. Kitts and Nevis, and Venezuela) have multisectoral FNSS. With the exception of Grenada, whose system is headquartered in the Ministry of Agriculture, they are located in some department of the Ministry of Health. Only two of those countries, Colombia and Venezuela, have specific budgets allocated for the FNSS. In at least 14 countries, a single-sector nutrition surveillance unit exists in the Ministry of Health, but in only three (Argentina, Bolivia, and Nicaragua) is it budgeted.

Given the broad, multisectoral nature of the information they deal with, it is doubtful that the FNSS can-or shouldbe established as identifiable, discrete, and separately budgeted administrative units with the sole purpose of collecting and analyzing all data pertaining to food and nutrition. FNSS conceived in that way could easily become bureaucratic entities that duplicate work done by other agencies.

The present challenge is to find mechanisms to achieve the most effective possible use of information generated by the FNSS in policy development, national and sectoral planning, and program administration. The users of information must be able to interact efficiently with those who generate it so that they can identify the most relevant social and economic indicators and the conditions that affect food supply and nutritional status.

#### CONFERENCE ON FOOD AND NUTRITION SURVEILLANCE

From 5 to 9 September 1988 an International Conference on Food and Nutrition Surveillance in the Americas was held in Mexico City. Organized by the Pan American Health Organization through its Food and Nutrition Program, the conference was sponsored by the United Nations Children's Fund (UNICEF), the Food and Agriculture Organization of the United Nations (FAO), and the Salvador Zubirán National Institute of Nutrition (INNSZ) of Mexico. Other support was received from the Secretariat of Health of Mexico, the Nutrition Subcommittee of the United Nations Administrative Coordination Committee, the United States Agency for International Development (AID), the Action Committee for the Economic and Social Development of Central America (CADESCA), and the Cartagena Accord Council.

The objectives of the Conference were to promote better understanding of the function of food and nutrition surveillance systems (FNSS), to outline strategies to broaden coverage and increase utilization of these systems in decision making, and to identify resources for the initiation or strengthening of the systems, including personnel training, technical cooperation, and operations research activities. A special invitation to the Conference was extended to representatives of international technical assistance organizations and nongovernmental organizations and to officials at all levels whose decisions affect the organization, operation, and use of FNSS.

During the five plenary sessions, representatives of Argentina, Bolivia, Chile, Colombia, Costa Rica, Cuba, Ecuador, Mexico, United States of America, Uruguay, and Venezuela presented their national experiences in operating FNSS, as did representatives of the Caribbean Food and Nutrition Institute (see the report on page 457 of this issue), Institute of Nutrition of Central America and Panama, and the Food Security Program of CADESCA. These officials described the objectives and modes of operation of various systems, including their costs and financing, and the procedures for the generation, interpretation, and dissemination of data. They also presented examples of the use of information coming from FNSS in making specific decisions that directly or indirectly affect the nutritional status of vulnerable population groups (see the case study from the United States on page 460). It was evident that such information provides a good foundation for formulating recommendations on policy, planning, program evaluation and supervision, and response to possible emergency food situations.

The FAO/WHO/UNICEF Interagency Program on Food and Nutrition Surveillance, initiated in 1986, was also described. Its function is to promote the establishment and strengthening of food and nutrition surveillance systems through technical and financial assistance to governments. Ways of coordinating the activities of national and regional systems with the world system were discussed.

#### Recommendations

The following recommendations of the International Conference on Food and Nutrition Surveillance in the Americas were based on consolidation of the reports presented by its four working groups.

## Food and Nutrition Surveillance at the Local Level

Each country must define "local level" for itself, according to existing political and administrative structures. Given the trends toward decentralization of services (and, thus, of information) in Latin America and the Caribbean, the community has an increasingly important role in identifying groups at risk, planning local

interventions, and making decisions. The FNSS in Latin America and the Caribbean should employ a minimum number of simple and reliable indicators related to availability, consumption, and biological utilization of foods. The indicators selected should permit comparisons between communities in a country and with others outside.

Field workers present in the community from the various sectors must be aware of their function as generators and users of information at the local level. It is their responsibility to involve local organizations in the surveillance process. Food and nutrition surveillance activities at the local level should be strengthened by means of additional economic and human resources, and assistance should be lent to local analysis and interpretation of information in order to facilitate decision making in the community.

## Food and Nutrition Surveillance at the Central Level

The information generated by the FNSS is rarely taken into account at the central level in the planning, execution, and evaluation of plans and programs on food, nutrition, and health. Policy makers must become cognizant of the importance of FNSS as mechanisms for supplying information about the nutritional effects of socioeconomic policies. For their part, the FNSS must provide to the central authorities the type of information they need to make decisions and must present it in simple but persuasive language and form.

Methodological and technological cooperation of the different sectors participating in the FNSS is imperative, while at the same time each sector fulfills its specific mandate. Duplication of efforts should be avoided by identifying the type of information that each component of the system provides. FNSS must not function independently of, or parallel to, other information systems that furnish food and nutrition information, but instead must integrate such information. Although the system must be coordinated by health or some other sector, its nature is intersectoral and no single sector should be overemphasized.

# Strategies for the Development of FNSS

The most important problems and restrictions affecting the development of FNSS are scarcity of funds and trained personnel, inadequate infrastructure, deficient processing and quality of data, lack of participation of certain sectors, and underutilization of the information in decision making. The conference examined the strategies that the countries and international cooperation agencies could follow to develop FNSS and made specific recommendations in six areas.

Mobilization of resources. Each country must identify resources for strengthening food and nutrition surveillance, reorienting national resources for support of FNSS, as necessary, and seeking the participation of the private sector. National resources can be complemented and increased by technical and economic cooperation with international organizations, between countries, and with private institutions. The governments should regulate and coordinate collaboration of nongovernmental organizations.

Dissemination of information. The countries should employ various mechanisms for disseminating information generated by the FNSS, such as special bulletins, existing communication media (for example, Archivos Latinoamericanos de Nutrición), and networks (for example, PAHO's Regional Operative Network of

Food and Nutrition Institutions—RORIAN—and the FAO Food and Nutrition Surveillance System Network). The information published should be simple, persuasive, and understandable, and should be disseminated within and outside the country, as well as between international organizations.

Formulation of norms and procedures. Each country should establish and test its own norms and procedures, taking advantage, when possible, of the experiences of other countries. International organizations should publish manuals or general norms that the countries can adapt to their own needs.

Research. The countries should be encouraged to carry out research according to their priorities and to publish the results in Latin America and the Caribbean. International, regional, and bilateral organizations should develop common methodologies and indicators that will ensure that research and evaluation are an intrinsic part of the FNSS. It is indispensable that the governments, international organizations, universities, and other pertinent private institutions cooperate so that research will be carried out efficiently and resources will be rationally allocated.

Technical cooperation. It is essential that international organizations continue to provide assistance to countries that request it, particularly in the fields of training, research, and program evaluation, as well as direct technical assistance addressed to consolidating food and nutrition surveillance programs. The FAO/WHO/UNICEF Food and Nutrition Surveillance Program is an essential source of technical cooperation. There should be increased support from international organizations for bilateral coop-

eration between countries and technical cooperation between institutions within each country, utilizing to the maximum the technical resources of the Region. The international organizations should prepare an inventory of the agencies and institutions that provide technical and financial assistance, as well as guides to help countries to present technical cooperation proposals.

It would be appropriate for the governing bodies of agencies in the United Nations system to approve resolutions in support of food and nutrition surveillance, as did the XXXIII Meeting of the Directing Council of PAHO, which asked the Director, in collaboration with the Member Governments, to give emphasis to technical cooperation in food and nutrition surveillance and other related matters. The Nutrition Subcommittee of the United Nations Administrative Coordination Committee should revise its definition of the scope of food and nutrition surveillance systems.

### Training of Human Resources

Training is needed in all the countries of Latin America and the Caribbean, according to the type of food and nutrition surveillance they carry out. This training should take place in the universities, when feasible. A number of institutions in the Americas now provide such training: Institute of Nutrition and Food Technology (INTA, Chile), University of Valle (Colombia), the Centers for Disease Control and Cornell University (USA), and the Institute of Nutrition of Central America and Panama (INCAP, Guatemala), among others. It is recommended that personnel be trained before data processing equipment is set up; that inservice training, in the form of modules and tutorials, be included in the programs; and that international and bilateral organizations provide assistance to the countries for training personnel in the field of food and nutrition surveillance.

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### Food and Nutrition Surveillance in the English-Speaking Caribbean<sup>1</sup>

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The progress in health and nutrition of young children in the Caribbean in the last 30 years has been remarkable. Major reductions have occurred in mortality among infants and children one to four

years old, mainly due to a decline in mortality from malnutrition, gastroenteritis, and respiratory infections. Evidence indicates that this progress was largely brought about by the extension of basic socioeconomic well-being to broader segments of the population through government and private efforts.

In spite of these gains, malnutrition in young children in the Caribbean, though

<sup>&</sup>lt;sup>1</sup>Condensed from a paper presented at the International Conference on Food and Nutrition Surveillance in the Americas, 5–9 September 1988.

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