

# Priorities of the Research Grants Program of the Pan American Health Organization 1995-1998

The management of knowledge, considered as the process that promotes the generation, collection, evaluation, dissemination, and utilization of knowledge in the field of health, is one of the essential technical cooperation strategies used to identify, analyze, and respond to the principal health problems in the Region. The framework of this strategy includes the Research Grants Program (RGP), whose fundamental objective is to promote research as a means of contributing new knowledge to the enhancement, reorientation, and ongoing adaptation of technical cooperation in the health field.

The Grants Program will give preference to research in the areas identified as being of a priority nature in the PAHO/WHO Strategic and Programmatic Orientations for the 1995-1998 quadrennium and those enunciated in the WHO Ninth General Program of Work covering the period 1996-2001. This general framework established six priority areas of research for the RGP:

- Health and development
- Health systems and services
- Health promotion and protection
- Health and environment
- Disease prevention and control

A series of research lines and subjects has been established for each priority area with a view to orienting the Region's scientific community on matters of special short-term interest for the development of technical cooperation in health. As may be observed in the description that follows, preference will be given to analytical-explanatory research on a population-based level and which seeks to further explore inequities in health situation and their determining factors, as well as to study the forms of health care that are provided to different social groups.

## Health and Development

One of the principal characteristics of the new development model at the world level is the accelerated incorporation of the advances achieved in scientific and technical knowledge. This phenomenon points to gradual reduction of possible contradictions between the social and economic dimensions of development since the social areas, particularly as regards health and education, have come to be recognized as investments and not as generators of expenditures since they help to create healthy and well-qualified human resources capable of

producing and of mastering scientific and technical knowledge. The concept of health finds in the new paradigm an objective basis for change, coming to be understood as the full achievement of the bio-psycho-social potential of individuals and population groups.

These views notwithstanding, the implementation of the economic and social changes demanded by the new models of development, especially in Latin America and the Caribbean, will not come about without conflict and contradictions. In the initial stage, the strengthening of market mechanisms and changes in the role of the State may tend to be exclusionary, even accentuating the pre-existing inequities. The document "Health, Social Equity, and Changing Production Patterns," prepared by PAHO/WHO and the Economic Commission for Latin America and the Caribbean (ECLAC), examines this situation thoroughly and sets forth proposals for research and action which will contribute to achieving equity and health for all in the medium and long term.

The foregoing points to a great need for studies and research that will shed light on the dynamics of the relationship between health and development, such as how development processes relate to inequities in health, sectoral reforms, the new role of the State, democratization processes, and new forms of organization and participation of civil society in the management of health. In view of these requirements, the subject area **Health and Development** in the grants program includes the following priority lines of research:

### *1. Inequities in health and their manifestations in social groups: Economic, social, cultural, ethnic, and gender factors*

- Analysis of the trends of inequities in health, their causal relations, and their manifestations in various social groups. Priority will be given to studies dealing with the health situations of socially marginalized groups or groups that suffer economic and social discrimination and subordination, such as ethnic groups, women, underemployed workers, children and adolescents at risk, and unprotected elderly people.

### *2. Intersectoral relations and health: Public policies and development plans and their relationship to health*

- Studies on development plans and projects and their implications for, or effects on, the health of various population groups. Special attention will be

given to research that analyzes the impact of initiatives such as the Regional Plan for Investment in the Environment and Health (PIAS), to projects on changing production patterns and economic reconversion, free trade agreements, and agreements on socioeconomic integration among countries of the Region.

### ***3. Sectoral reforms in health in the context of state reforms and the implementation of development models***

- Research projects that analyze—either from a historical or current perspective and with an emphasis on macroanalysis—the political, legal, ethical, financial, organizational, and administrative dimensions of the health reform processes.

### ***4. Policies and regulatory measures on human resources for health***

- Analytical studies of policies and regulations concerning development of human resources, of employment and hiring policies, labor markets, and work processes in the health area.
- Studies on professional practice of health careers and the dynamics of corporations.
- Analyses of undergraduate and graduate training policies.
- Analyses of management of teaching quality.
- Analyses of regulation of educational processes in health.

### ***5. Scientific development and technological processes in health***

- Analytical studies of scientific production in health and its trends.
- Research on the processes for development and regulation of health technology, particularly on policies concerning technological development and on the supply, utilization, and impact of health technology.

## **Health Systems and Services**

The health systems and services of the countries of the Region of the Americas have undergone significant changes during the last decade. A characteristic common to practically all of them has been the replacement of the preponderant role of the State in organizing, financing, and delivery of services, giving rise in this new stage to forms of organization of the sector that are influenced by the market economy. Among these forms of organization are institutional and financial pluralism,

the search for competitiveness, the use of systems for control and recovery of costs, and an emphasis on efficiency and quality, to mention but a few of the principal trends of change.

This process has taken place in a context in which governments and societies as a whole have gradually acquired awareness and have come to demand and seek concrete responses to old problems, such as the coverage deficit and the lack of equity in access to the health services on the part of large population groups.

Support in this area will be given to research that is based on a commitment to this process of change. Such research should be devoted to studying **health systems and health services**, their components, and their interrelationships with a view to providing insights that will permit them to be reoriented or reorganized so that the premises of equity, efficiency, and effectiveness may become reality in the shortest possible time. Some priority lines of research are:

#### ***1. Equity, coverage, and quality of the health systems and services by types of population and specific social groups***

- Analyses of the segmentation of the services offered by type of user and studies on the accessibility, acceptability, and utilization of the various health services by population group, establishing their relationship with technical, administrative, financial, sociocultural, and gender barriers.

#### ***2. Organization and financing modalities of health systems and services and the incorporation of technologies and inputs in the context of sectoral reforms***

- Studies on new means of organizing and financing the health services which have arisen as part of the processes of reform, establishing comparative analyses in terms of efficiency, productivity, and costs of different health care models.
- Studies that analyze the incorporation and adaptation of technologies into the health services, both for diagnosis and treatment of health problems.

#### ***3. Decentralization of the health systems and services, social participation and the development of local systems.***

- Studies of the political and technical-administrative processes in the decentralization of health services and the transfer of authority to local levels.

- Analysis of social participation and of methods of health education in the decentralization processes and in the expansion of mechanisms and democratic forms of health management at the local level.

#### **4. Management of human resources within the framework of health systems and services**

- Studies that document and analyze innovations in the management of human resources and the organization of work, aimed at increasing the productivity and quality of services.
- Development of models and methodologies for the management of human resources that can be applied, validated, and evaluated in concrete contexts.
- Research that seeks to analyze and explain the relationships between the models of personnel management, organization of work, and continuing education, among others, with regard to the productivity and quality of the health services.

### **Health Promotion and Protection**

The concepts of health promotion currently being formulated, which gained great impetus from the Ottawa Charter of 1986 and the Declaration of Bogotá in 1993, have made it possible to gradually overcome the approach restricted to modifying risk factors in the behavior of individuals by means of health education. A broader concept is thus promoted that includes the previous concept and also links social and political actions with a view to promoting conditions and lifestyles conducive to individual and collective well-being within a given cultural context. Health promotion stresses the close relationship between well-being and development, placing individual and social participation and the need for linkage with other sectors and civil society at the central core of the strategy to create healthy living conditions.

Accordingly, two main thrusts may be identified for orienting research on health promotion that are mutually dependent: The generation of knowledge that makes it possible to understand the causes of individual behavior and to orient actions for its modification; and the generation of knowledge that provides a basis for actions aimed at modifying living conditions which determine individual and collective well-being.

The research lines and subjects which follow from the above are:

#### **1. Analysis of living conditions and behaviors related to health promotion and protection of population**

#### **groups, taking into account social, ethnic, cultural, and gender factors**

- Analytical and evaluative research on knowledge, attitudes, and practices of the general population, and of specific groups, with regard to health promotion and protection. This includes, *inter alia*, lifestyles, food and nutrition practices, and the organization and knowledge of the population regarding individual, family, and collective health.

#### **2. Growth and psychosocial development**

- Studies on maternal nutrition, prevention of low birthweight, and the social, legal, economic, and cultural barriers to breast-feeding.
- Research on the effects of perinatal stimulation and factors protective of development (resiliency).
- Research on social and gender differences in the formation of identity, self-esteem, and sexuality as part of healthy development.
- Studies that analyze the role of the family, school, and peer influence in growth and psychosocial development.

#### **3. Evaluation of health promotion and protection interventions**

- Operational research aimed at evaluating at the field level the cost-effectiveness of interventions to promote and protect the health of the population, in general, or among particular social or risk groups.
- Studies that evaluate the theory and practice of social communication for health promotion.

#### **4. Violence and health**

- Studies of the particular dynamics of the various forms of violence and their relationship to living conditions and health, such as urban violence, gender violence, violence against children, and violence against specific social groups.
- Research that seeks to analyze and evaluate the effectiveness of interventions to prevent and control violence.
- Studies on the costs and impact of violence on the health systems and services.

### **Health and Environment**

In recent years, environmental policy has assumed particular importance in the Region, and environment-related events and institutions have multiplied. There is a growing awareness that economic, energy, agricultural,

and industrial policies should be formulated with a view to ensuring that development is sustainable from an economic, social, and ecologic standpoint. This implies the need to take into account environmental costs in the production of goods and services, as well as the economic costs associated with the control of environmental pollution and the treatment of diseases caused by deterioration in the quality of the environment.

Nevertheless, in most cities of the Region insufficient attention has been paid to the environmental management measures required for the provision of safe drinking water, protection of public spaces, safe disposal of waste, and preservation of air and water quality. With respect to the sanitation infrastructure, the level of investment during the 1980s was meager, leading to considerable gaps in coverage and to deterioration of the quality of existing services.

In this priority area, special emphasis will be placed on research that contributes to formulating and evaluating healthy environmental policies, to analyzing the effects of environmental pollutants on human health, and to developing and evaluating methodologies and technologies for the control of pollutants and the prevention of risks. For these purposes, the following priority lines of research have been established:

#### **1. Development of policies and initiatives on health, environment, and development**

- Analytical studies that guide the formulation and evaluation of environmental policies.
- Studies that contribute to developing regulatory and legal frameworks for the prevention and control of environmental risks that have adverse effects on public health.

#### **2. Assessment of effects of water and air pollutants and of special waste and of their control measures on human health**

- Field studies of pollution of sources of water supply for human consumption.
- Development of appropriate methodologies for the control of chemical and biological contamination.
- Assessment of health risks caused by air pollutants and in water destined for human consumption: epidemiologic and toxicologic studies.
- Development and evaluation of technologies for measurement, control, and removal of pollutants from drinking water and from the air.

- Development of evaluation methodologies and field trials for the assessment of human health risks derived from exposure to special wastes.

- Development and evaluation of interventions and simple technologies for reduction and elimination of risks to human health caused by special wastes.

- Epidemiologic studies of the effects of atmospheric contaminants in cities, on the health of specific population groups, particularly children, elderly people, and asthmatics.

- Studies on the feasibility, cost-effectiveness, efficiency, and effectiveness of measures to control air pollutants; and studies on the exposure levels experienced by specific population groups.

#### **3. Assessment of the effects of risks in the workplace on workers' health**

- evaluation of the risks in the workplace and their effects on workers' health, mainly from exposure to agricultural chemicals, metals, and solvents, and from unfavorable ergonomic and occupational conditions.

- Development and evaluation of interventions for the prevention and control of risks.

### **Disease Prevention and Control**

All the countries of the Region of the Americas have experienced variations in the socioeconomic and demographic profiles of their populations and in the health problems they face. Changes in the age distribution of the population and increases in life expectancy at birth have largely been the result of change in the reproductive patterns of the population and the reduction of infant mortality through control of infectious diseases in the early years of life. As the population ages and concentrates in urban areas, chronic and degenerative diseases, particularly vascular diseases and cancer, become major causes of morbidity and mortality. The manner in which these types of diseases coexist and the characteristics of their epidemiological behavior have very specific features in the Region, defying attempts to classify or separate them into "diseases of poverty" and "diseases of affluence."

Accordingly, it is necessary to understand the specificity, complexity, and determining factors of morbidity and mortality in the countries of the Region, and differentials by social group, with a view to generating new knowledge for the prevention and control of the diseases most significant for public health. There is also an ur-

gent need to develop and evaluate intervention methods and techniques for preventing and controlling these diseases. These needs also form the basic core of priority research activities in this subject area. More specifically, the principal lines and subjects of research are as follows:

***1. Basic epidemiologic and socioeconomic studies for the development and evaluation of disease prevention and control interventions***

- Sociocultural, environmental, and epidemiologic studies of the behavior of diseases of public health interest in the Region, geared to the development of intervention models for their prevention and control, and based on the specific characteristics of these diseases in various social groups and geographic contexts.
- Design and evaluation of these models, particularly those that include social participation strategies, as well as studies of the cost-effectiveness of various forms of intervention.

***2. Development and testing of new methods and techniques for disease prevention and control***

- Development, testing, and evaluation of methods applicable at the field level, for detection of communicable and non-communicable diseases of public health importance, particularly through the use of new biotechnology techniques such as monoclonal antibodies, PCR, and peptides synthesis.
- Development of vaccines included in SIREVA (dengue, typhoid fever, pneumococcal pneumonia,

and group B meningococcal meningitis) and improvement of DTP through projects that utilize or develop conjugation techniques, purification of proteins, antigen delivery systems, and methods for typing microorganisms.

- Studies and analyses of promising compounds derived from natural plant extracts for the development of drugs through the use of modern biological testing techniques.

***3. Development and evaluation of models for inclusion of disease prevention and control in the health services***

- Studies on the problem-solving capacity of the services for prevention and control of diseases of public health importance.

- Analysis and evaluation of models to integrate the vertical prevention and control programs into the health services at the various levels of care.

Researchers interested in presenting proposals within the framework of the priorities of the RGP should request the Manual on Policies, Standards, and Procedures of the Research Grants Program, document PAHO/HDP/HDR/94.6, from the PAHO/WHO Representative Offices in the countries or from PAHO Headquarters. The manual contains the standards regulating the presentation and approval of proposals, as well as guidelines and application forms.

**Source:** Division of Health and Development, Program on Research and Technological Development in Health (HDP/HDR), PAHO.