Toward a Taxonomy of Technical Cooperation in Health

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The transfer of resources from one country to another through bilateral or multilateral assistance programs, while not a new phenomenon, achieved really spectacular proportions after World War II (1). Most of the aid transferred in the 1950s consisted of capital flows, but it soon became clear that for organizational reasons it was useful to distinguish between financial assistance (whether in the nature of grants or concessional loans) and technical assistance (which was normally nonreimbursable and consisted mainly of transferred skills and knowledge).

In the postwar period it was felt that much of this aid should be directed at development and channeled through multilateral institutions such as the United Nations, which developed various entities to carry out this function. The financial entities, such as the International Bank for Reconstruction and Development and International Development Agency, focused mainly on financial assistance, while specialized agencies such as the World Health Organization concentrated on technical assistance.

There was broad general agreement on what constituted technical assistance. A 1965 review of the subject (2) provided the following definition:

Technical assistance implies the transfer of knowledge and skills in the very broadest sense. It can vary from professional advice in an engineering project, such as the building of a hydroelectric plant, to assistance in the development of operations like the preparation of a national development plan or the organization of a national tax structure. The methods most commonly adopted are threefold: the sending out of expert advisers assigned to specific tasks; the arrangement of fellowship awards for students or other trainees to travel abroad for instruction; and the provision of demonstration equipment for pilot projects.

The same review also stated that "the efforts of the emerging countries to fulfill their share of the responsibilities of development has been recognized by the United Nations, in that the term underdeveloped countries has been dropped in favor of the term developing countries;
and the whole operation has been re-named technical cooperation.”

There was implicit acceptance of the idea that technical cooperation was really another name for technical assistance. However, there have been some noteworthy variations in the general perception of “the many splendored thing” that is technical cooperation (3). For example, it was said in the 1960s that the French emphasized teachers, the British operational personnel, and the Americans high-level advisers. Such variations have also cropped up in the numerous agencies that assist countries (4); and it is likewise true that certain activities commonly included under the rubric of technical cooperation may not pertain to the health sector. Therefore, it seems appropriate to examine two major international health institutions, the World Health Organization (WHO) and the Pan American Health Organization (PAHO), in order to clarify concepts and practices relating to the technical cooperation they provide.

TECHNICAL COOPERATION AND WHO

It is now a basic part of WHO’s credo that technical cooperation with and among countries is essential for achievement of the goal of Health For All by the year 2000, and it may be helpful to trace the development of that thinking.

As set forth in Chapter II of the WHO Constitution, the first of WHO’s constitutional functions relates to its role as a coordinating agency for international health, and the fourth function requires that WHO provide technical assistance to Member Governments (5). This assistance, particularly to developing countries, was framed in a WHO resolution adopted in 1975 which recalled “the increasing coordinating role played by WHO in furnishing technical assistance to countries” and described the kinds of ways this assistance was given. These included, inter alia, assistance in establishing and strengthening national public health systems, in training, in developing effective methods of disease prevention or control, and in drawing up recommendations for establishing norms and standards (6).

The Sixth General Program of Work for WHO (1978–1983) describes the Organization’s coordinating role and the technical collaboration it should offer (7).

In the report of the Executive Board Working Group on the “Organizational study of WHO’s role at the country level, particularly the role of the WHO representatives,” which was presented in 1977 (8), the new approach is defined as one of technical cooperation, and there is a description of the evolution from the concept of technical aid or assistance to the concept of cooperation. The aid or assistance concept was felt to imply a donor/recipient relationship without reciprocity. It was postulated in the report that the countries had “expressed increasing political desire to replace technical assistance . . . by a new concept of technical cooperation wherein Member States make use of their Organization to define and achieve their social and health policy directives.” WHO’s role in technical cooperation was to collaborate with the countries in ensuring their own health development.

Thus, when the Seventh General Program of Work for WHO (1984–1989) was prepared, coordination and technical cooperation were the two general approaches to be emphasized (9). Technical cooperation was seen to imply “joint action of Member States cooperating among themselves and with WHO to achieve their common goal . . . in particular Health For All by the year 2000.” Four interlinked types of technical cooperation were seen to form an organic whole.
First, there was technical cooperation between WHO and its Member States, which used WHO to "define and achieve their social and health policy objectives." Second, there was technical cooperation among developing countries, which has been described in numerous official documents of the UN organizations (in health it implies the countries defining their needs and resources and cooperating one with the other to exchange and transfer resources to each other's mutual benefit). Third, there was technical cooperation among developed countries, which took the form of intercountry activities carried out under the aegis of WHO at minimal cost to the organization. Finally, the Program described the technical cooperation between developed and developing countries.

More careful analysis of these four categories shows that in reality there are only two forms—technical cooperation to the various Member States by WHO, and technical cooperation among the Member States—that are stimulated and facilitated by WHO. The Eighth General Program of Work (1990-1995) has the same emphases as the seventh. In presenting the various programs it describes the technical cooperation activities which the Organization will carry out in consonance with the main thrusts of the program, but these vary from program to program and nowhere is there a systematization of these activities (10).

TECHNICAL COOPERATION AND PAHO

The Role of the Pan American Sanitary Bureau

From its inception, the Pan American Sanitary Bureau focused strongly on cooperation. The First General International Sanitary Convention of 1902 called on countries to cooperate in investigating any outbreak of pestilential disease. It also assigned the fledgling Pan American Sanitary Bureau responsibility for collecting information on sanitary conditions in the hemisphere and for promoting and protecting the health of the countries involved by offering aid and the benefits of its experience (11).

Initially, the major concern was coordination of quarantine procedures designed to prevent the spread of cholera, plague, smallpox, and yellow fever. But as time passed the Bureau's activities gradually expanded to address its Member Countries' needs in other public health fields, such as that of environmental health.

The XII Pan American Sanitary Conference held in 1947 at Caracas marked a watershed (12). In essence, the conference recommended broadening the Bureau's activities to include "establishment of eradication and demonstration projects for the control of communicable diseases, public health organization and administration, and studies and research with practical application in the field of medicine and public health." These activities were characterized as constituting technical assistance to the Organization's Member Countries.

Recent Trends

The 1970s saw a growing tendency to regard PAHO's role vis-à-vis its Member Governments as being strongly linked to technical cooperation. According to PAHO's Program and Budget for 1977, the first factor to be considered in defining the Program is "that technical cooperation to Member Governments be provided upon request and with the consent of the governments concerned" (13). This document grouped technical cooperation activities to be undertaken by PAHO into a number of different categories. From a conceptual standpoint these categories were useful; but there is no ev-
idence that they became any sort of framework for organizing or evaluating PAHO’s work.

Many of PAHO’s later documents, including the Health for All by the Year 2000 Strategies (14) and Plan of Action (15), point out the importance of technical cooperation as the Organization’s principal tool, but do not define it any further. Thus, technical cooperation appears to be accepted as the prime means by which PAHO collaborates with its Member Countries, but no attempt has been made to define more precisely and clearly what PAHO accepts as constituting that technical cooperation.

A TAXONOMY OF TECHNICAL COOPERATION

From PAHO’s standpoint, it is worthwhile to set forth a taxonomy of what we call technical cooperation, especially since the term is not self-defining. This is of some importance for several reasons. First, simply because it is a health organization, PAHO has an orientation different from that of most other multilateral technical cooperation agencies, and so it is well for it to define the particular elements included in the technical cooperation it provides. Second, if in fact technical cooperation is the main thing PAHO provides, then all staff members should be familiar with its makeup in order to be clear about the components of their work. Finally, any technical cooperation agency must be able to describe what it does and to show the emphasis it gives to one program focus or another through nonbudgetary mechanisms; hence, classifying PAHO’s work according to the elements of its technical cooperation permits a much sharper appreciation of the directional thrust of the work being carried out.

By way of developing a technical cooperation taxonomy, some years ago the activities carried out in one of PAHO’s technical areas were analyzed and grouped into six broad categories—categories that have been defined as the strategic approaches of technical cooperation. These strategic approaches have come to provide the framework for planning, programming, and evaluation as required by the American Region Programming and Evaluation System (AMPES), PAHO’s central management mechanism for short-term and medium-term programming of technical cooperation. Their refinement and use over the past five years has shown that they provide a valid way of organizing the activities of an organization such as PAHO that provides technical cooperation in the field of health.

The aim here is not to describe new activities to be carried out by PAHO. Rather, the aim is to attempt classification and systematization of activities in order to facilitate the execution of technical cooperation.

The six strategic approaches of technical cooperation cited above are (a) resource mobilization; (b) dissemination of information; (c) training; (d) development of norms, plans, and policies; (e) promotion of research; and (f) provision of direct technical consultation.

Resource Mobilization

Traditionally, resource mobilization in PAHO’s sphere of work has been perceived as mobilization of external financial resources for the health sector. The most exhaustive analysis of this on a global scale was carried out in 1981 by Howard, who reported on resource mobilization trends and the prospects for mobilizing those external resources that the health sector would need to achieve Health For All (16).

Howard pointed out that health accounted for no more than 8%-10% of all development assistance and that the
"major factor for increasing health flows is the success with which recipients are able to define their own needs, formulate proposals, and obtain the approval of national planning commissions (or equivalent authorities) for submission of such proposals to donors." It was felt that donors would welcome the intervention of the World Health Organization in assisting countries to develop this capacity for formulating and presenting national health requirements.

PAHO was convinced of the appropriateness of this approach to technical cooperation. Accordingly, it established a special office for resource mobilization that was later merged with its external coordination office. However, it has also accepted that the mobilization of external resources cannot be the responsibility of a single part of the Organization, and that every unit and every professional must be constantly alert to the possibilities for assisting countries in mobilizing the external resources needed to complement the national resources required for program execution.

PAHO has succeeded in mobilizing multilateral financial resources—as reflected by the growth of extrabudgetary projects executed by the Organization to a point where this source of funding has surpassed funding provided by the regular budget.

Even so, as PAHO's present Director has stressed repeatedly, it is at least as important, perhaps more important, to focus on mobilization of national resources. PAHO's managerial strategy for optimal use of the Organization's resources has cited a fundamental need "to promote and support a mobilization of national will and national resources" (17).

These national resources can be grouped into six basic categories—financial, physical, human, informational, political, and institutional—each of which bears some examination.

**Financial resources.** While reference has already been made to mobilizing external financial resources, it is obvious that by far the largest volume of financial resources applied to health in any given country is national in origin. The activities carried out by PAHO in this area include helping the health sector to attract nonhealth resources into the health sector or to refine the use of nonhealth resources so that they contribute to health sector priorities. PAHO also promotes activities directed at making more efficient use of the health sector's financial resources so as to create greater program coverage; and it promotes activities aimed at attaining a more appropriate articulation or "fit" of the various funds being applied to a particular program, whatever their source.

**Physical resources.** These include facilities, equipment, and buildings that are unused or being used for nonhealth purposes and that might be mobilized for health sector use.

**Human resources.** Human resource mobilization is an especially critical part of promoting technical cooperation among countries. In this area PAHO seeks to assist countries in identifying the human resources to be applied in support of other countries' programs.

In addition, PAHO's regional and subregional centers have been highly successful at mobilizing young professionals in an organized way that assists them with their work and also orients them so that upon returning to their own countries from a given center they form a constituency through which the work
and influence of the center can be spread widely.

**Informational resources.** In this area there is invariably a need to mobilize and focus the national health sector’s data generation and data management capabilities. Equally important, there is a need to mobilize the national media, to generate and use information that favors the health sector and draws public attention to its activities.

**Political resources.** As an intergovernmental organization, PAHO is unusually well positioned to mobilize political support for health actions. Experience has shown that if proposals are well-conceived and well-presented it is possible to generate political support. The success of subregional health initiatives to date is a clear demonstration of the Organization’s ability to mobilize political resources.

It is true that such mobilization of political resources may require a coordinated effort by the Organization as a whole that is often beyond the capacity of any single staff member or technical unit. However, this does not diminish the need for each staff member to be continually aware of the importance of political resource mobilization as a facet of technical cooperation.

**Institutional resources.** Traditionally, these have been comprised of universities and other national centers with a potential for becoming engaged in health programs. In general, the most powerful way of mobilizing such institutions is to promote the formation of networks that may become involved in a collaborative way with research and training.

PAHO activities carried out under this rubric of institutional resource mobilization are many and varied. Among other things, they include the participation of PAHO staff members at conferences and scientific meetings. Such participation is not and should not be directed mainly at staff development; instead, it should serve as a vehicle mobilizing scientific interest and support and channeling it toward priority programs for which PAHO is providing technical cooperation.

**Dissemination of Information**

The technical cooperation activities that PAHO carries out in this area include generation and transmission of information to the Member Countries. At its simplest this involves distributing material that will be useful in program delivery (e.g., manuals, guides, the results of bibliographic searches, etc.). However, in this modern age, a technical cooperation agency’s responsibility is much wider, and PAHO has begun to embark on a more aggressive use of information as a major tool of technical cooperation. This involves planning information needs, establishing transmission formats, targeting information to appropriate users, and monitoring the information’s use.

In addition to the physical dissemination of information, PAHO has a fundamental responsibility for establishing the systems through which it will assemble the information needed for its own activities, and also for advising Member Countries about their information needs. PAHO’s technical programs have much in common in this area. Nevertheless, certain programs (especially those where promotion of lifestyle change is a key activity) have generally been more aware of the need to structure this strategic approach to the Organization's technical cooperation.
Training

This has traditionally been a major pillar of multilateral organizations’ technical cooperation programs. Tickner, in his analysis of technical cooperation, asserts that “technical cooperation is by nature a training operation” (2). His view is that since the essence of cooperation is transferring know-how to nationals, then almost everything that is done can be considered training of one sort or another.

However, considering training as one of the strategic approaches of technical cooperation, it may be seen that PAHO’s role is to assist rather than replace national institutions. PAHO identifies gaps, stimulates local training, and helps to provide training materials. PAHO does indeed take responsibility for some training, as is particularly evident at the Organization’s regional and subregional centers. Nevertheless, the aim must always be to transfer the training to national institutions.

On occasion PAHO staff members will act as primary instructors for courses, but this should occur infrequently and ideally should complement the national inputs. Even in regional or subregional courses, the PAHO staff should complement local expertise whenever possible.

PAHO also provides fellowships for training abroad. This is an expensive training method, particularly when the training takes place in one of the metropolitan centers of the developed world. The current tendency is to have more training done nationally or subregionally, an option that makes it possible to train more people and retain a focus on local problems.

Development of Norms, Plans, and Policies

PAHO’s staff assists the Member Governments in developing policies, plans, and norms that provide the basis for most public health programs. These policies, plans, and norms are central to the process of local programming and to development of local health systems. The norms developed may relate to specific program interventions (e.g., in the area of disease treatment) or may deal with overall program management and operation. In many instances PAHO staff members are responsible for producing guidelines that assist with the preparation of national plans and norms, while on other occasions PAHO produces draft plans and norms that are adapted to local use.

Research Promotion

The primary responsibility for stimulating research rests with PAHO’s technical programs. This responsibility is discharged by identifying research needs, encouraging research workers to conduct research in a particular area, and providing advice about the preparation of research protocols. Some of the research promoted may be funded by PAHO, through either its regular programs or a special research grants program administered by its Research Coordination Unit.

PAHO also promotes research that may be funded by other agencies. Its role in the World Health Organization’s Special Programs provides a good example of how PAHO works with national researchers to get their proposals funded.

Finally, while PAHO focuses predominantly on research promotion that encourages research by others, some research is actually done by PAHO staff members, particularly at the regional and subregional centers.

Direct Technical Consultancy

PAHO staff members spend part of their time giving advice about matters in
their own areas of special competence directly to Member Governments. Among other things this is important for the staff member, because it shows that his or her skills can be applied to some specific problem in the country. It also demonstrates that PAHO staff members do not act simply as intermediaries or brokers who bring together problems and non-PAHO consultants contracted to address those problems.

DATA ANALYSIS

There is good reason to believe that establishing a taxonomy of technical cooperation such as the foregoing enhances PAHO’s planning, programming, and evaluation system, facilitates comparison of different programs, and provides a better appreciation of the thrust of the Organization’s program and work. In this context, it recently became possible to automate the American Region Programming and Evaluation System (AMPES) so that data could be recovered on the expenditures programmed for each of the strategic technical cooperation approaches cited above.

Table 1 shows 1990 budget data for one of PAHO’s main areas of activity (Health Programs Development), subdivided according to that area’s specific programs and the six aforementioned strategic approaches of technical cooperation. These data permit one to appreciate the analytical possibilities.

Of course, there are some limitations on the specific data presented that need to be pointed out. First, the figures shown do not include staff salaries, which account for 65% of PAHO’s budget. Second, these data were derived from the Organization’s annual program and budget. Therefore, they represent funds allocated rather than expenditures made on actual activities carried out. (Plans in progress will permit the automated system to capture data on actual expenditures in the future.) In this vein, because the data reflect regular budget Table 1. PAHO’s consolidated 1990 budget in the area of Health Programs Development, by specific technical programs and strategic approaches or “foci” of technical cooperation (values in US$).

<table>
<thead>
<tr>
<th>Specific technical program</th>
<th>Focus 1: Resource mobilization</th>
<th>Focus 2: Information dissemination</th>
<th>Focus 3: Training</th>
<th>Focus 4: Development of norms, plans, and policies</th>
<th>Focus 5: Research promotion</th>
<th>Focus 6: Direct technical consultancy</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Health of the adult</td>
<td>82,500</td>
<td>69,600</td>
<td>91,200</td>
<td>146,700</td>
<td>113,800</td>
<td>34,800</td>
<td>538,600</td>
</tr>
<tr>
<td>Environmental health</td>
<td>98,000</td>
<td>67,000</td>
<td>49,600</td>
<td>118,800</td>
<td>16,800</td>
<td>58,700</td>
<td>408,900</td>
</tr>
<tr>
<td>Maternal and child health</td>
<td>1,145,503</td>
<td>1,112,106</td>
<td>1,558,725</td>
<td>2,442,320</td>
<td>800,680</td>
<td>1,054,200</td>
<td>8,113,534</td>
</tr>
<tr>
<td>Food and nutrition</td>
<td>115,200</td>
<td>2,900</td>
<td>70,700</td>
<td>30,900</td>
<td>13,400</td>
<td>45,100</td>
<td>278,200</td>
</tr>
<tr>
<td>Communicable diseases</td>
<td>176,800</td>
<td>82,400</td>
<td>193,050</td>
<td>125,050</td>
<td>174,828</td>
<td>147,500</td>
<td>899,628</td>
</tr>
<tr>
<td>Veterinary public health</td>
<td>359,900</td>
<td>16,900</td>
<td>47,350</td>
<td>45,250</td>
<td>57,500</td>
<td>18,000</td>
<td>545,200</td>
</tr>
<tr>
<td>Total</td>
<td>1,977,903</td>
<td>1,350,906</td>
<td>2,010,625</td>
<td>2,909,320</td>
<td>1,177,008</td>
<td>1,358,300</td>
<td>10,784,062</td>
</tr>
<tr>
<td>%</td>
<td>18.3</td>
<td>12.5</td>
<td>18.6</td>
<td>27.1</td>
<td>10.9</td>
<td>12.6</td>
<td>100.0</td>
</tr>
</tbody>
</table>

*This total represents 99% of all the funds programmed. One percent of the funds, representing some general program coordination activities, were not assigned to a particular strategic focus.
funds plus those extrabudgetary funds that could be programmed initially at the beginning of the year, they may not include all extrabudgetary funds actually spent.

Figure 1 provides a graphic projection of the percentages shown at the bottom of the table. Among other things, it may be seen that research promotion accounted for 11% of the total funds programmed in the area of Health Programs Development. If this analysis were applied across the Organization, it would be possible to obtain a truer assessment of PAHO’s research support effort. The figure for research which appears in the official budget documents would thus be revealed as only a fraction of PAHO’s true expenditure in this important area.

The largest allocation in the area of Health Programs Development (27%) went for technical cooperation dealing with the development of norms, plans, and policies. The size of this allocation is very proper, reflecting the effort being put into establishing a foundation for action that will remain long after the particular intervention ends.

PAHO’s program priorities for the quadrennium 1987-1990 emphasized the need to assign top priority to strengthening national health infrastructures. It has sometimes been asserted (naively) that PAHO’s commitment to this priority can be assessed by calculating the amounts budgeted in those units and programs that are included in the technical area of Health Services Infrastructure. Figure 1 shows that if one considers only training, information dissemination, and research promotion as contributing to strengthening national health infrastructures, then 42% of the funds included in the technical area of Health Programs Development go to this priority.

Further refinement of the system to
collect expenditure data on the basis of this taxonomy would permit a much clearer demonstration of the attention PAHO pays to the priorities that have been accepted by its Governing Bodies.

CONCLUDING REMARKS

This presentation has focused on the taxonomic arrangement of technical cooperation activities being carried out. It has not discussed the instruments of technical cooperation (including duty travel, supplies and equipment, courses and seminars, grants, etc.). These instruments provide the basis for a different classification in terms of objects of expenditure, one which could be crossed in a matrix fashion with the taxonomic classification of technical cooperation activities to give a more complete appreciation of how, and with what resources, PAHO cooperates with its Member Governments.

Experience over the past five years has demonstrated the internal usefulness of the taxonomy described here. That taxonomy has improved the organization of PAHO's planning and programming, has made it easier to present programs in a coherent manner, and has facilitated preparation of projects. It has also made it easier to talk with other agencies about technical cooperation, and on occasion has facilitated inter-agency program collaboration.

Obviously, there is no single acceptable taxonomy of technical cooperation, and it is possible that some of the approaches used here could be modified or subdivided. (One would need to ensure, of course, that the number of approaches were not increased to such an extent as to jeopardize the purpose of the exercise.)

In general, it appears that development of this kind of analysis, based on empirical study, should help organizations to present their activities in a manner complementary to the traditional program and budget analysis. In this way, it should provide them with another logical framework of evaluation and should enhance their ability to explain to their constituents the functional division of the work being carried out.

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REFERENCES


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