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EXECUTIVE SUMMARIES OF EVALUATIONS CONDUCTED IN ASIA IN THE FISCAL YEAR 1984

Office of Development Planning
Asia and Near East Bureau
Agency for International Development
Washington, D.C.

PREFACE

In keeping with A.I.D.'s emphasis on using evaluation findings to improve project planning and implementation, the Asia and Near East Bureau has prepared this collection of executive summaries of evaluations conducted for the Bureau in Asia during fiscal year 1984 (October 1, 1983 to September 30, 1984).

This collection provides both a record of Bureau evaluation accomplishments as well as concise, easily accessible information on the outcome or current status of specific projects. It is anticipated that this volume will be a valuable reference both for A.I.D. project designers in the field and project reviewers in Washington, as well as contractors and developing country personnel with whom A.I.D. is working.

Evaluations of 59 projects are summarized here, along with 6 "special studies" and 3 Project Assistance Completion Reports. The actual number of evaluations conducted for A.I.D. in Asia in FY 84 was, in all likelihood, somewhat higher than the number of evaluations summarized in this volume. This is because some reports have not been received by the cut-off date for the publication of this report.

This volume of executive summaries was written and compiled by Philip M. Brandt who also wrote the FY 82 Volume of this report and is now under contract to USAID/Dhaka. In order to maximize the opportunity to derive "Lessons Learned" from this valuable reservoir of project experience, the writer was required to include in each summary, if possible, a section entitled "Project Design and Policy Implications." This required many interpretive judgements concerning the often incomplete information presented in the actual evaluation reports. Using the resources available to him, including the FY 81, 82 and 83 editions of executive summaries, some first-hand knowledge and experience, and in some cases the Project Paper itself, each summary represents a mix of observations and comments of the original evaluators and the current writer's own interpretive analysis.

Copies of the evaluations and studies summarized here can be obtained from the Asia and Near East Bureau, Office of Development Planning or from CDIE/DIU, A.I.D.'s Center for Development Information and Utilization.

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EVALUATION OF ASEAN REGIONAL PROGRAM

PROBLEM & OVERVIEW: The Association of South East Asian Nations (ASEAN) is a regional organization formed in 1967 by the governments of Indonesia, Malaysia, the Philippines, Singapore, and Thailand. Brunei joined ASEAN in January 1984. ASEAN was created to promote regional cooperation. The individual member countries are of substantial importance to the United States, and it was perceived to be in the U.S. interest to promote their viability and economic growth, their trade with the West, their growing investment opportunities, and their humanitarian treatment of refugees. Three of the five countries have on-going A.I.D. bilateral programs. Supplementing these with regional development efforts offers a potential cost-effective means to deal with some of the development problems of the individual member countries.

U.S. ASSISTANCE U.S. assistance to the ASEAN Regional Program (#498-0258, 498-0272, and 498-0277) began in FY 1979 (April 26, 1979). Funds are budgeted through 1989. No termination date is mentioned. Its purpose is to respond to ASEAN member requests for specific development projects that promote regional cooperation to improve institutional capability and regional character of institutions located in the region. Emphasis is on transfer of technology, promoting private enterprise, and developing alternative sources of energy. A.I.D.'s initial assistance consisted of a $105,000 grant to finance the preparation and design of several projects. Actual obligations through 1983 are about $17 million. Project commitments are planned to reach $5 million annually in FY 1985.

Two projects were started in 1979: the Asian Institute of Technology (AIT) Scholarships program and the Institute of Southeast Asian Studies Economic Research Program. Three more projects began in early 1981. Two of these, the Agriculture Development and Planning Center and the Plant Quarantine Project, were to establish new institutions for training and research. The third provided technical and financial assistance for technology transfer in energy. Two projects were started in 1982. The first was another scholarship program oriented toward tropical medicine and public health. The second was another energy project involving a coal utilization seminar, research in energy conservation for buildings, and research in alternative energy technology for water pumping. In FY 1983, a watershed project was started that will develop a center for research and technology exchange. In February 1984, the Small and Medium Business Improvement Project was started to provide assistance for technical and management training and to undertake research to identify key problems and develop new strategies to assist businesses in the region.

PURPOSE OF EVALUATION: This is the first overall assessment of the program administration and achievements since the inception of the program. This evaluation was conducted by a two-member team which interviewed key U.S. and ASEAN member government officials in each country and visited project sites. The evaluation concentrated on issues of program management and development impact.

Since its role in the organization has still not been defined, Brunei is not considered a part of ASEAN for the purposes of this evaluation.

FINDINGS:

1. Some projects have required considerable time and effort from all parties to start up because the project design and approval process is complicated due to procedures used in both A.I.D. and ASEAN. ASEAN does not have an operational secretariat to conduct business. Most of the work is done by committees at semi-annual meetings and decision making is delayed.

2. ASEAN project implementation management has been good. A.I.D. project implementation management suffers from too few people making decisions from too far away. Project managers have been of high quality and have performed well. Steering committees for the on-going projects have generally functioned in an efficient manner. A.I.D.'s management role is concentrated in Washington. However, the projects have had relatively few problems.

3. A.I.D. and USAID directors did not express support for expansion. They perceive the regional program to be a potential drain on their bilateral resources. The management needs for an expanded program are beyond the capability of currently allocated personnel resources. The ASEAN system remains too disjointed to allow for an expanded, yet cost-effective A.I.D.-ASEAN program.

4. Many, but not all, of the A.I.D.-ASEAN projects contribute significantly to promotion of regional cooperation. The benefits of many of the projects appear to be shared among the member countries. Thailand has hosted the most projects and has received the most benefit. Indonesia and the Philippines have benefited more than Singapore and Malaysia. A.I.D. is helping, but not leading, the move toward more regional cooperation through ASEAN. Much of the spontaneous cooperation is occurring in the private sector, but this is not attributable to A.I.D.

5. A.I.D. support for ASEAN institution-building objectives shows considerable success under current project operations. The potential for continued, viable operations lies with the ability to secure a broad donor base. The ASEAN countries do not appear ready to support regional institutions financially, with exception of the host country.

6. The training activities in the program have, in general, provided a high quality of education at a lower cost than can be obtained in the U.S. The subjects have been appropriate to A.I.D. development priorities, and the people trained have almost all stayed in the region. Tracer studies show that these people hold positions that generally allow them to use their skills effectively.

7. Technology exchange through information sharing has not yet become an important part of the program. It will become so when the second energy project finishes and the Small and Medium Business Improvement (SMBI) and watershed projects start up.

8. Direct development impact on the private sector is most likely to occur through the AIT scholarships program as many of the graduates are expected to move into the private sector after they finish their government service obligation. In the SMBI project, the TECHNONET training program will provide some direct impact. The two energy projects will also provide direct technology transfer although they are not important components of the program. The other projects do not have a private sector orientation, and the impact is indirect at best.

PROJECT DESIGN & POLICY IMPLICATIONS: The ASEAN program has political value, but it is implemented with a development orientation (grants-in-aid) and development assistance criteria are used. Loan funding of the ASEAN program does not appear to be feasible at present as the ASEAN countries would be unwilling to accept joint liability, especially for non-commercial activities. If the program was funded with Economic Support Fund (ESF) dollars, it would still be for projects with a development intent. However, ESF funding would eliminate the mandate to use development assistance criteria and the development impact could be reduced. The development impact of the ASEAN program, in terms of A.I.D.'s priority beneficiaries, is largely indirect due to the nature of regional assistance. The benefit of regional projects is to provide assistance in ways that are not cost-effective for each country individually to develop and maintain on national levels. The regional activities are mainly to develop the institutions, human resources, and technology that, in turn, can be applied directly to the target beneficiaries. The program provides economies of scale and a sharing of resources for development that bilateral programs cannot offer. The value of having this program for the three countries with bilateral programs is strong enough to offset the amount of program resources that necessarily go to the two countries that do not qualify for bilateral assistance.

RECOMMENDATIONS:

1. The ASEAN program should not be expected to have a direct impact on A.I.D.'s target population. Some projects may accomplish this, but most will help the ASEAN member countries to improve their capability to implement field-level development projects. The linkages between the program activities and the eventual desired impact should be as clear as possible.

2. Future regional projects oriented toward institutional development should be linked to existing national institutions and should focus on promoting regional cooperation through development of information networks, seminars, regional centers, and other joint activities. Regional projects should provide benefits that cannot be obtained in a bilateral program. For training, there is an economic benefit from sharing institutional capabilities among the countries, rather than each country trying to develop its own high quality capability in every field.

3. The ability to exist without A.I.D. support should be a more explicit part of the project plan. A.I.D. should work closely with other donors to help develop a broader donor base for important regional institutions. All A.I.D.-ASEAN institution-building projects should have counterpart funding related to each country's participation including travel costs for participant training. The program should continue to use development assistance criteria for project selection and development assistance grant funds until a means of using loan funds on a regional, joint-liability basis can be found.

4. A basket project approach should be considered as a substitute for project development support and to provide resources, flexibility and a capability for more timely response to ASEAN initiatives to the ASEAN liaison officer (ALO) for project development. Until the ASEAN system is improved and a permanent secretariat is available to work effectively with A.I.D. program management, the A.I.D. program should be maintained at the current $5 million per year level.

5. Proposed ASEAN projects should be more related to USAID projects so that missions will have more interest in supporting them. A.I.D. should provide project criteria to ASEAN that will set parameters on the types of projects that will be acceptable, in terms of both substance and development strategy. Projects should be structured to work as independently as possible from the ASEAN bureaucracy. Each project should include technical assistance for project monitoring.

6. Responsibility for operational decisions during project implementation should be delegated to the ALO. Important policy decisions should remain in Washington. The ALO should draw on technical assistance, to the extent possible, from the USAID missions without direct involvement of Washington. The missions should be encouraged by ASIA/AA to support the regional program. At meetings of the ASEAN region mission directors, the ALO should report on the status of existing and planned ASEAN projects. Representatives of the embassies in Malaysia, Singapore, and Brunei should also be invited to attend.

This evaluation was conducted for A.I.D. by Joseph S. Toner of Development Associates, Inc. and Alan D. Roth of Development Alternatives, Inc. The report is dated March, 1984.

RICE HUSK ENERGY PROJECT PHASE II FINAL STATUS REPORT - BANGLADESH

PROBLEM & OVERVIEW: In Bangladesh, as in many developing countries, the adoption of appropriate technology depends often on the transfer and adaptation of specific mechanical devices to the local environment. This problem often proves difficult to surmount particularly in that it may be costly and it demands the attention of technical specialists as well as program generalists. In this project, the goal was to demonstrate that the husk waste from the rice milling process could be used to power a simple low compression engine (the Stirling engine) which could then be linked to a traditional steel hulled rice milling device. Ultimately, if such a technical process could be shown as feasible, the way would be open to revolutionize the lives of the millions of farmers and small-scale agro-industries throughout Bangladesh who now depend on scarce non-renewable energy sources to provide milled rice for eating and marketing purposes. An essential feature of this modernizaton of rice milling is to carry out husk removal and bran removal in different machines to provide for better separation of husk and bran as this improves the quality of the finished rice and reduces the energy requirement of the milling operation.

U.S. ASSISTANCE: This project is funded under a PVO Co-financing grant arrangement (#388-0045-07) between USAID/Bangladesh and the Kumudini Welfare Trust of Bengal, an Asia Foundation-sponsored Bangladeshi PVO. It was originally organized into three, one-year phases, although it has been extended on several occasions. The total funding level is $1,082,000. The Project Activities Completion Date (PACD) is now June, 1985. The principal technical assistance is provided by the firm of Sunpower, Inc. of Ohio. The project's purpose is to develop a commerically viable engine fueled by rice husks, a waste product, with sufficient power to operate a 5 h.p. engine. The goal is to use existing technologies and upgrade local technical skills in order to manufacture a product that will be in demand in the local market. During Phase I, the project demonstrated that a husk consumption rate of 18 kilograms per hour resulted in an output of 32 kilograms per hour. In Phase II, the project intended to demonstrate that the Stirling power unit could be manufactured in Bangladesh using locally available materials and engineering skills and to demonstrate that the level of skill needed to operate the unit is consistent with that available in a typical rural rice mill. In addition, the project was to provide estimates of production costs for intermediate models of the engine and to evaluate the potential use of the unit as an alternative rice milling system in which husk and bran removal are carried out in separate operations.

PURPOSE OF EVALUATION: This report summarizes the project's achievement of the principal objectives of Phase II activities and discusses the status of pre-conditions integral to the commencement of Phase III.

FINDINGS:

1. The locally made Stirling power unit was operated for the first time on November 21, 1983. With the exception of the hot end, all of the components of the intermediate model were made locally. Every component of the engine has been modified in design either to adapt it to local production methods or to solve problems which emerged from the testing of the prototype. A special brazing furnace has been designed. When it is setup, the final steps in fabricating the hot end can be carried out.

2. The operation of the Stirling engine is well within the skills available in rural Bangladesh. A small rice mill, operated by a Stirling engine (foreign manufactured), has been in production since Phase I. This mill is operated by four unskilled, uneducated rural women and managed by a fifth, educated woman.

3. The projected selling price of the locally manufactued Stirling engine will be equivalent to $768. The target set for the project engine was 150% of the cost of a comparable diesel engine. Currently, a comparable diesel engine (5 hp) is about $500. The weight of the locally manufactured engine is 315 kilograms whereas the weight of the prototype is 145 kilograms. Since the adaptation of the engine to locally available conditions required changing from aluminum to cast iron components, the increase in weight is unavoidable and is partially reponsible for the increased cost since iron is sold by weight in Bangladesh. However, as subsequent design improvements and changes in the manufacturing process occur significant reduction in weight and, thus, in ultimate cost are anticipated.

4. Three different rice hulling systems have been evaluated: disc, rubber roll, and centrifugal. Because of certain disadvantages with the disc and roll methods, the centrifugal method has been choosen for testing with the Stirling engine. Manufacturers have been identified. In Phase III, this method will be tested at the project's workshop in Narayanganj.

PROJECT DESIGN & POLICY ANALYSIS: The project has accomplished much and has overcome many technical difficulties particularly with respect to the local production of the Stirling engine. A technical project of this type is expected to have many unforseen problems and the fact that most of them have been resolved is a tribute to the quality of the technical assistance and to the perserverance and innovativeness of the sponsoring agency. Although it is unavoidable that the specialized production capabilities needed for the first generation of locally produced engines will be limited to a few local engineering firms, it is encumbent upon the sponsoring agency to adopt measures which will ensure that these capabilities are dispersed to other urban areas with manufacturing workshops throughout the country. This issue is particularly important with respect to the question of maintenance and repair of the engine. At the moment, the project includes only three workshop personnel on a full-time basis with others being loaned to the project on a need basis. While the widespread diffusion of the relevant manufacturing techniques will help to ensure that the Stirling engine is enthusiastically received and widely adopted, lessons learned in other environments where appropriate technology has been introduced indicate that without attention to the long-term use and viability of innovative machinery, such technology can easily remain obscure. Thus the cost of the transfer of technology, as well as the potential benefits to the intended users, are wasted. In a broader sense, this project had intended to demonstrate a method of using waste materials to produce an energy efficient tool compatible with the needs of the culture. Unfortunately, the results of the preceding years of effort will not be widely applicable in Bangladesh where, in recent years, the growing population has been forced to consume even rice husks as a source of fuel to meet its daily household requirements.

RECOMMENDATIONS:

1. Phase III activities should be authorized. In particular, activities that call for the testing of a series of engines in order to arrive at the final design and production costs should be undertaken. Performance levels for commercially available units should be set and tested for appropriateness.

2. USAID and Asia Foundation representatives should initiate discussions for a follow-on project that will address the specific concerns regarding dissemination of engineering capabilities and the establishment of repair and maintenance facilities mentioned in the foregoing section.

This evaluation was written by representatives of the Sunpower Inc., The Asia Foundation and USAID's Office of Project Development and Engineering. It is dated December, 1983.

THE DEVELOPMENT IMPACT OF TITLE II FOOD FOR WORK ROADS IN RURAL BANGLADESH

PROBLEM & OVERVIEW: Bangladesh, with nearly 100 million people living in an area of about 55,000 square miles, is the most densely populated country in the world. The terrain is flat and interlaced with an intricate system of rivers and tidal channels which serve as regional boundaries and major transportation routes. Agriculture employs nearly 80 percent of the labor force and accounts for more than half of the GDP. Severe structural problems, including excessive rural unemployment and primitive, inefficient transportation and communication networks, continue to exacerbate the divisions between the rich and the poor, condition and limit access to regional markets for local agricultural surplus and to health and educational facilities, and create conditions highly vulnerable to natural disasters. The Government of Bangladesh's (BDG) development efforts include a large, internationally supported effort to provide the poor with food in exchange for their labor in the construction of roads and road embankments. The major international participants in this program include the United Nations under the World Food Programme and USAID under its Food For Work (FFW) program.

U.S. ASSISTANCE: The Food for Work Project, implemented by CARE under the auspices of the BDG's Ministry of Food, began in 1975 and provides payment in food grains for labor on earthwork structures. Since 1975, 750,000 metric tons of wheat have been distributed under this program in eight annual work seasons. The FY 1984 budget is approximately $19.5 million. Currently, more than 2000 earthwork (road and road embankment) projects are being implemented. The primary goal of the FFW project has been short-term employment generation and the provision of nutritional and income supplements during periods of critical need. A secondary goal has been the upgrading and improvement of rural infrastructures.

PURPOSE OF EVALUATION: This study represents the first major assessment of the degree to which the project is meeting its secondary goal. Previous studies have assessed the degree to which the project is meeting its primary goal. The specific objectives include: (1) assessing the development impact of FFW road and road embankment projects; (2) identifying the significant determinants of positive development impact; (3) specifying those determinants which may be controlled as functions of design, selection and management of FFW road projects; and (4) recommending criteria for design and implementation of projects which may result in positive development impact and which may be incorporated into local (thana) level planning documents. Interviews with over 900 respondents were held in 35 randomly selected project sites (Site 1 = 1980 CARE roads; Site 2 = 1982 CARE roads; Site 3 = proposed 1984 CARE roads). The major constraints of this study included dealing with respondents inherently biased in favor of the project and identifying suitable comparison sites not previously reconstructed under the FFW program.

FINDINGS:

1. The positive development impact of FFW roads in Bangladesh is likely to be greatly enhanced by altering only a few key selection and implementation factors. Seventy percent of the FFW roads selected using development related criteria had above average or high development impact scores compared with 26% of the FFW roads selected solely based upon need for major repair. The selection of the road because of its proximity to educational, health, or commercial services and the presence of electricity constitute the two most powerful predictors of positive development impact. Projects with the highest estimated development impact overall tended to be those: (a) constructed earlier, (b) with fewer unbridged gaps, (c) recently maintained, (d) selected based on development-related criteria, (e) near electric lines, (f) in low distress areas, and (g) in areas with doash (mixed) rather than sandy soil.

2. The FFW roads and road embankments continue to be used primarily as footpaths. No four-wheeled motorized vehicle was observed on any of the 52 roads sampled. In high distress areas (low-lying areas with muddy soil), bullock cart traffic is a leading cause of serious road damage. Those roads reconstructed under FFW in 1980 and 1982 were found to be in much better condition and more heavily travelled than those proposed for 1984. Sixty-five percent of 1980 roads and 39 percent of 1982 roads were passable at least halfway by rickshaw while only 12 percent of 1984 roads were passable. The superior condition of older FFW roads is largely due to more recent maintenance.

3. Local maintenance is an important and cost-beneficial factor in strengthening the rural road infrastructure. Simple road maintenance can be performed at a cost of less than $150 per mile and is sufficient to preserve the surface condition of a road for a period of four to five years. After this, major reconstruction is again necessary. The reconstruction cost is between $5000 and $6000 per mile.

4. Six development impact criteria are consistently supported from the data of this study: improved local communications in terms of reduced travel times and transport costs; increased use of new farm technology; increased commercial activity; increased access to health services; increased use of family planning services; and increased primary school attendance. Some evidence was also found to link the project to improved flood control, increased use of health services, and increased use of the road by women.

5. The FFW project appears to have exacerbated the already severe income-land distribution problem. Little or no evidence was found to indicate FFW impact on crop mix, crop production, or farm prices.

PROJECT DESIGN & POLICY IMPLICATIONS: The Food for Work Project appears to be meeting its secondary goal of stimulating economic and social development of the villagers living in the area of influence around each road, including both small and large farmers and both men and women. Local maintenance patterns appear to validate the hypothesis that there is a time lag of a least three years until the majority of the development impact of a FFW road takes place. (The study found that over two-thirds of the 1980 sites have been maintained within the last year as compared to less than one-half of the 1982 sites and less than one-fifth of the comparison sites.) Reductions in transportation costs and travel times and increased commercial activity, including dramatic increases in both the quantity and the prices of jute sold, are important beneficial effects of road reconstruction although the study is limited by not knowing what happened to the prices of other goods at study sites from 1980 to 1983. Road construction has led to increased use of fertilizer and better seeds by local farmers although improved agricultural extension outreach does not appear to be the critical linkage between FFW road improvement and increased use of new farm technology.

The adverse effects of road construction include a shift in land distribution from the middle categories of land ownership towards the extreme categories (less than one-half acre and more than five acres). This pattern is consistent with studies of rural road projects in developing countries. Larger farmers may be increasing their landholding near FFW roads at the expense of marginal farmers. Since these shifts in land holding occur at the union level, encompassing more than the area of influence around a given project site, further study of this important relationship is needed before a definite conclusion may be drawn.

RECOMMENDATIONS:

1. Expand emphasis on the construction of bridges and culverts on roads recently proposed for reconstruction as well as on roads reconstructed in earlier years.

2. Target projects to unions with adequate maintenance funds or where agreement for local maintenance can be obtained in advance.

3. Assign preference to proposed projects based on development-related criteria such as proximity to schools, clinics, and businesses.

4. Construct semi-pucca roads in high distress thanas with high concentrations of sandy soil and bullock cart traffic.

5. Coordinate the selection of project sites with other rural infrastructure development programs, particularly the rural electrification, irrigation, and family planning programs.

The material for this report was gathered in September and October, 1983. The principal investigators were Mr. Jonathan D. Hodgdon, Dr. James T. Riordan, Mr. Samiruz Zaman and Mr. Robert Sharick, all of whom acted as Consultants for ABT Associates, Inc.

A PRELIMINARY RECONNAISSANCE SURVEY OF THE BANGLADESH SYSTEM OF HIGHER EDUCATION IN AGRICULTURE AND AGRICULTURAL MANPOWER SITUATION

PROBLEM & OVERVIEW: Agricultural production dominates the Bangladesh Gross Domestic Product (GDP) and is the most important employer of labor in the economy with more than 75% of the total labor force engaged in this sector and more than 85% of the population living in rural areas. The performance of agriculture since 1973 has been relatively good by historical standards, but it is still inadequate to meet the demand generated by rapid population growth and modest increases in real per capita GDP. The average farm size is about 3.5 acres, although there is considerable variation among geographic districts. A relatively high proportion of rural families own little or no land. Of the estimated 8.5 million rural households, about 15% own no land at all and about 35% own only their homesteads and 0.5 acres or less of arable land. The effective output of research, extension and other development programs to help Bangladesh farmers increase their agricultural production must be accelerated even to maintain the present level of production.

U.S. ASSISTANCE: When Bangladesh became independent in 1972, USAID assisted in the establishment of the Bangladesh Agricultural University (BAU) and in the early development of this institution through a long-term contract with Texas A&M University. Since then, USAID's support has continued at a more modest level, including research grants channeled through the Bangladesh Agricultural Research Council (BARC). Grant funding committed by A.I.D., the World Bank, and the BDG to BARC has been over $1.4 million since 1980. The World Bank has also provided extensive assistance primarily for construction. BAU was first established in 1961-62 and known at that time as the East Pakistan Agricultural University. The present Bangladesh agricultural higher education system is comprised of Bangladesh Agricultural University (BAU) at Mymensing, Bangladesh Agricultural Institute at Dhaka, and Potuakhali Krishi College at Dumki. The Bangladesh College of Agricultural Sciences (BCAS) is currently being established at Joydebpur. [Editor's note: No funding amount for the Texas A&M support is given in this report.]

PURPOSE OF EVALUATION: The original purpose was to develop a Scope of Work for a major study of Bangladesh's present stock of and the projected demand for agriculturally trained manpower through 1995. Another purpose was to develop a preliminary strategy for an in-depth assessment of the present system of agricultural education in relation to its capacity for meeting projected demand and determining priority needs for assistance in agricultural education required to satisfy the greatest possible proportion of that demand. The objective was modified at the request of USAID/Dhaka so that the findings and conclusions concentrate on identification of major policy constraints and assessment of potential receptivity to reformulation of educational policy. Information was obtained through interviews with officers of the Government of Bangladesh (GOB) institutions and ministries, administrators and staff of BAU and other institutions offering university level training in agriculture, representatives of other donor agencies, and USAID staff. The evaluator also examined reports and official documents and conducted limited inspection of available physical facilities.

FINDINGS:

1. The present Bangladesh agricultural higher education system is comprised of three institutions which are linked academically. BAU establishes curricula for all, administers all examinations and awards all degrees. Since its founding, it has awarded a total of 4,383 Bachelors, 1,262 Masters and 4 Ph.D. degrees. The system projects an annual output of about 500 B.Sc. graduates. A fourth institution, BCAS, is expected to admit its first students in the 1983-84 academic year. Academic links between BAU and BCAS have not yet been finally determined and the future of the fourth campus is uncertain due to funding constraints. The most appropriate roles of and linkages among the different institutions in areas other than teaching have not been clearly established and are often perceived quite differently by each.

2. The BAU policies and procedures are adequate for administration, management, student admissions, staff selection, staff workloads, establishment of faculties and departments, development of curricula, academic calendar, and student performance. However, they are not always rigorously followed. Planning, development

and conduct of programs of all institutions is done largely on an ad hoc basis without clear knowledge of the extent and nature of employment opportunities or types of graduates and advanced degree holders needed.

3. The following six points summarize general constraints and deficiencies that presently characterize the system:

-Staff time available for graduate student research, supervision, staff research, and extension and related activities is seriously limited by lack of funds and overloads on staff time;

-Class loads appear to be excessive and it is not possible for students in different faculties to take courses together, a situation which adds to the teaching load of staff;

-There is a serious lack of teaching aids, audiovisual equipment, adequate textbooks and high quality class notes (particularly in Bengali language), and libraries at all institutions are highly inadequate;

-Training is too strongly oriented toward theory and teachers use examples from other countries rather than from Bangladesh in lectures;

-Classes are seriously and frequently disrupted by student strikes, boycotts, etc., which force teachers to accelerate their lectures and administrators to extend the academic year;

-Major constraints in the resource base appear to be funds with which to provide field experience to students, provide sufficient faculty positions to allow staff time for research and extension involvements, and to support comprehensive ongoing research.

4. Advanced degree programs in agriculture need both qualitative and quantitative strengthening. Pressure is increasing to provide more advanced degree training in-country to ensure that it will be relevant to Bangladesh agriculture and its needs. There is general agreement that BCAS should ultimately become exclusively a center for advanced degree training.

5. The current demand for graduates is not quantifiable. BAU decreased its annual intake of new students from more than 700 to about 500 due to problems encountered by graduates in securing employment. The Bangladesh Agricultural Institute, on the other hand, reported that its graduates are securing employment without difficulty. A major cause of unemployment among BAU graduates may be an imbalance in the proportions of students in the various faculties. According to a 1981 employment survey of BAU graduates, 18.5% were unemployed in contrast to just over 8% in 1970. The rate of unemployment was highest in the Faculty of Fisheries at 74%, followed by 37% in Animal Husbandry, 23.5% in Agricultural Economics, 4% in Agriculture, 3% in Agricultural Engineering and 0% in Veterinary Science. Staff need feedback from employers that specifies the nature of training that would meet their requirements and the mix of disciplines desired.

6. There is support in both BAU and DEM for developing more productive linkages and relationships between themselves. A Draft Memorandum of Understanding between BAU and the Directorate of Extension and Management (DEM), Ministry of Agriculture would permit the University to assume direct responsibility for development, administration, and backstopping support of all extension programs in all or a large part of Mymensing District.

POLICY IMPLICATIONS: The Bangladesh system of higher education for agriculture has made significant progress since its establishment. The need now exists to strengthen the system to improve the quality of higher education in agriculture and to make it more relevant and sensitive to the needs of the country. Any major program for strengthening higher education in agriculture should be oriented toward strengthening of the entire system, rather than being focused on individual institutions or components within the system. Planning and implementation of a successful program for significantly strengthening the system will require strong leadership, willingness to innovate and commitment to action.

RECOMMENDATIONS:

1. USAID should make a firm commitment to long term (10 years at the minimum) support of the strengthening and further development of the Bangladesh agricultural higher education system and should focus on strengthening the system as a whole. USAID assistance should be channeled through some GOB entity that is concerned equally with all system functions--teaching, research, extension and training.

2. USAID should provide support for an in-depth assessment of policy issues, resource base, present areas of strength and weakness, and assistance needed to enable the system to meet the needs for trained people. A draft Scope of Work for the entire study is attached (in the original report). The results of the above assessment should be used to design the ten year program of assistance.

This evaluation was conducted in September and October, 1983 by Howard E. Ray, Ph.D. and Senior Program Officer for the Academy for Educational Development under contract no. ASB-0249-C-00-3076-00.

FY-1983 EVALUATION OF THE BANGLADESH TITLE III FOOD FOR DEVELOPMENT PROGRAM

PROBLEM & OVERVIEW: The purpose of the Title III program is to enable the Government of Bangladesh (BDG) to set foodgrain procurement prices at levels high enough to encourage farmers to invest in high yielding varieties of crops and related technologies. The direct result of shifting from traditional to modern methods of cultivation will be more production which is needed to meet the periodic food deficits and, ultimately, to ensure self-sufficiency in food to a large and rapidly growing population. In addition, the Title III program enables the BDG to purchase foodgrains at a procurement price necessary to maintain profitable farm prices. This process involves certain price control mechanisms designed to lessen the impact of traditional market middlemen who buy up large stocks during seasonal gluts and release these reserves into the market at periods when they may accrue maximum profits.

U.S. ASSISTANCE: The first Food for Development program for Bangladesh was signed on August 2, 1978 and authorized a total of 1,169,000 metric tons (MT) of wheat and 26,000 MT of soybean oil worth $220.5. Actual shipments amounted to 1,174,000 MT of wheat and 25,000 MT of soybean oil worth $191.4 million. The second multi-year program was signed on March 8, 1982 and authorized $192 million for the fiscal years 1982-84 for the purchase of wheat, rice, soybean oil and cotton. The second Title III agreement employs the concept of a flexible commodity mix and incorporates a new provision to encourage private sector development. It has seven distinct components.

PURPOSE OF EVALUATION: This evaluation covers the BDG fiscal year 1983 (7/ 1982 - 6/1983). It is intended to meet the requirements of the PL-480 Title III Food For Development Program Agreement for an annual program evaluation. The evaluation analyzed progress made during the period and discussed the constraints to maximum program effectiveness which have surfaced. It also developed recommendations for program improvements.

FINDINGS:

1. Total Public Foodgrain Distribution System (PFDS) offtakes remain about the same level as in FY 77/78 despite a population increase over the same period of about 18 percent. Total PFDS, therefore, has declined substantially as a percentage of total food requirements. However, due to a serious drought in FY 82 followed by another in FY 83 in the Aman season which depleted foodgrain stock levels while keeping prices high, stock levels remained low (845,000 MT or less) throughout FY 83, although they were forecasted to build to the one million MT level by December 1983.

2. For over one year now, the ration price for rice has been maintained about equal to the procurement price for rice and the ration price of wheat has been maintained above the procurement price for wheat. The increased ration prices of these two commodities to levels above their procurement price was reported in last year's evaluation.

3. In April 1983, the BDG began to issue ration wheat directly to atta crushers and wheat millers. This policy shift is a direct result of a recommendation in last year's evaluation. However, resale by atta crushers was not restricted to ration card holders.

4. BDG performance in setting procurement prices well ahead of the planting season has fulfilled the terms of the Title III Agreement. It has been timely in terms of inducing farmers to adopt HYV technology and has contributed substantially toward increased food crop production.

5. Total procurement was only 189,000 long tons of rice and wheat as compared to 298,000 long tons in FY-82 which was also a year of limited procurement. This is because market prices for rice and wheat stayed above procurement prices throughout the year.

6. Open Market Sales (OMS) for the first time ever exceeded Modified Rationing offtakes in October 1982. OMS initial prices increased in mid-November 1982 to maintain an appropriate relationship with procurement prices. Since that time, market conditions have not warranted extensive use of OMS.

7. The BDG complied with the Title III Agreement condition requiring removal of the 12,500 spindle limitation on new spinning mills. To date, 21 out of 56 textile faciliites, representing about 40% of the industry's installed capacity, have been returned to private ownership.

8. It appears that Title III allocations of raw cotton to Bangladesh could double to 60,000 bales per year without upsetting either the Usual Marketing Requirement or domestic production.

9. It appears that the country will continue to require the importation of at least 100,000 MT of refined vegetable oil. Public sector funding for further refinery expansion is not available and the private sector is constrained by several factors. Competition from lower priced and lower quality imported refined palm oil is putting price pressure on U.S. soy oil. Were there not a price constraint, U.S. soy oil would do well.

10. Partly because of A.I.D. emphasis on the importance of the private sector, the BDG has continued its program of divestiture of vegoil refineries.

PROEJCT DESIGN & POLICY IMPLICATIONS: As was reported in an earlier evaluation, ration prices have continued to exceed procurement prices, implying the elimination of the subsidy on ration prices except for transportation, storage and administrative costs. The continued progress along with a continued U.S. emphasis on increasing ration prices even further are indicators that overall U.S. policy is being given close consideration by BDG. Similarly, BDG's implementation of current Title III requirements to set foodgrain procurement prices at HYV production incentive levels and to purchase foodgrains at the procurement price when necessary to maintain farm prices are also good indicators of adherence to policy objectives. Open Market Sales of foodgrains have also continued to occur when necessary and the BDG has been successful in achieving the goal of maintaining a seasonal price spread of 20 percent. The BDG has also implemented other key recommendations of the previous evaluation including allowing the private sector to establish cotton spinning mills with over 12,500 spindles. The BDG has also recently begun to consider allowing the private sector to import grain under the wage earners' scheme. This is likely to be a major policy breakthrough and has the potential to substantially liberalize grain trade. This continued excellent progress on policy and related issues permits the formulation of a progressive set of recommendations related to program objectives.

RECOMMENDATIONS:

1. Continuation of an adequate sized Title III program will require a substantial shift into non-foodgrain commodities, a shift for which both A.I.D. and the BDG should begin to prepare. As Title III foodgrains become less important and Bangladesh approaches self-sufficiency, the role of vegoil and cotton will increase. Pricing mechanisms to put U.S. oil and cotton on an equal footing must be explored and developed.

2. The BDG should begin exploring alternative sales programs to the existing ration system for selling its older, short shelf-life stocks at times when OMS is not needed.

3. Ration prices should be increased to at least 5 percent and preferably 10 percent above the procurement price. The BDG should analyze its overhead costs to determine the extent of the remaining subsidy on rationed food. Rice should be eliminated from Statutory Rationing.

4. The BDG should consider allowing private dealers the option of directly importing wheat.

5. One solution to the non-competitiveness of U.S. soy oil might be to adopt an Economic Border Price for Crude, Degummed Soy Oil to equalize U.S. and other imports of similar grades and categories prior to sales by BDG to private oil processors.

This evaluation was drafted by Vivikka Molldrem, A.I.D./Washington (Asia/BI) and Paul Wenger, A.I.D./Washington (FVA/FFP/I) based on their visit to Bangladesh in September 1983. It was revised by Dr. Roger Montgomery, Office of Food and Agriculture, USAID/Dhaka

INTERNAL EVALUATION OF THE TECHNICAL RESOURCES PROJECT - BANGLADESH

PROBLEM & OVERVIEW: The goal of the Technical Resources Project (TRP: #388-0027) is to increase the Bangladesh Government's (BDG) ability to respond to development problems by providing technical assistance and training. It is the outgrowth of three earlier projects which attempted to give USAID and the BDG some flexibility to pursue technical assistance activities and training in areas related to overall program objectives but not directly covered by existing projects. Its antecedents include the Development Services and Training Grant, the Project Studies Grant, and the Project Development Grant.

U.S. ASSISTANCE: The TRP began in 1978. Initially funded at $5.4 million, it was amended in 1982 and its funding was increased by $5.6 to $11 million. The Project Activities Completion Date (PACD) was extended to February 1985. The project's purposes include improving the BDG's capabilities in the areas of policy research, project development, management, and evaluation, particularly in the areas of agriculture, rural development, energy, and women's development programs. In addition, the TRP enables the USAID Mission to respond rapidly to requirements for short-term technical assistance and other activities related to project development and implementation.

PURPOSE OF EVALUATION: The purpose of this evaluation is to examine the TRP at the output-to-purpose level and to assess its usefulness to USAID in the context of the Mission's overall development program. This evaluation examines the question of focus and seeks to answer whether TRP is a random collection of peripheral activities (targets of opportunity) or a coherent project in support of the bilateral program. The TRP was evaluated in October 1980 and July 1982. Major problems with its training component were noted in the 1982 evaluation.

FINDINGS:

1. The TRP is a key funding source for the Mission's overall training program. In 1983, more than 80 percent of all persons receiving USAID-funded training were supported by the TRP, including 450 women. As of December 31, 1983, a total of 647 persons had received training under the project. However, neither the general nor the women's training component has been thoroughly evaluated for its impact on job performance. The BDG's role in development, monitoring, and evaluating TRP training is very limited and there appears to be no desire on the part of BDG to take a more active stance.

2. The Food and Fertilizer Planning and Monitoring Secretariat (FFPMS) ($450,000) is working well and provides useful support to the BDG and USAID agriculture strategy. It was designed to assist the BDG to develop a rational food policy.

3. The Farm Level Survey & Economic Analysis sub-project ($112,000) has accomplished some useful activities. It was designed to assist the Bangladesh Rice Research Institute (BRRI) set research priorities, formulate input supply and price policy guidelines. The cost and return studies have been helpful to economists at the Mission.

4. The Low Pressure Buried Pipe Irrigation sub-project ($140,000) was completed at a high pilot system cost after much delay. This provided funds for purchase of pipe and fittings to support research by an FAO/Rural Development Academy team in Bogra. Although the system extended command area coverage significantly and permitted greater control of available water, cheaper, less sophisticated shallow tubewell systems have become popular and widespread in Bangladesh.

5. The Computer Software Library sub-project ($25,000) has met with implementation delays and suffered from intermittent and ineffective supervision by USAID supervisors. It was designed to provide software to the BUET/Computer Center.

6. The External Resources Division (ERD), Ministry of Finance, Monitoring and Coordination Cell sub-project ($56,000) has had few accomplishments and many problems. Its purpose was to create capability within the ERD to keep accurate P.L. 480 accounts, especially Title III currency use offset, to prepare and submit timely reports, and to monitor Title III sub-projects.

7. The Command Area Development sub-project ($200,000) suffered from early inadequate administrative backup, frequent transfers of staff, and little official encouragement. It was designed to assist in training of upazila staff in improved water management extension services. More recently, significant improvement in motivation and performance of upazila officers has been noted. Two hundred persons received training under this activity.

8. The Energy Studies sub-project ($800,000) initially contracted for four studies. It was designed to permit the Dhaka University Center for Policy Research (CPR) combine specific outputs related to Mission energy concerns with the creation of a flexible mechanism to utilize local professional skills. All activities were cancelled when CPR's misuse of resources became evident.

9. The Federal Reserve Bank of New York Assistance to the Bangladesh Bank sub-project ($20,000) improved the working relationship between USAID and the Central Bank and the knowledge base upon which the Rural Finance Project was designed. It was designed to strengthen institutional capability of the BDG's Central Bank. Charles Lucas of the Federal Reserve Bank provided six weeks of consultancy services.

10. Few initiatives with TRP funds have have been undertaken in recent years. A pipeline of over $3 million in unearmarked funds remains, and the Mission has not obligated new funds for the TRP since FY 1982.

PROJECT DESIGN & POLICY IMPLICATIONS: The wide array of sub-projects reflects the potential of the TRP to respond flexibly to Mission needs. At the same time, it indicates lack of focus. None of the sub-projects is inconsistent with official project purposes, and all appear to be worthwhile activities. Yet successful implementation requires intensive USAID staff attention. Given the existing magnitude of the USAID project portfolio and shrinking staffing levels, the Mission may be well advised to concentrate its management resources on a smaller number of TRP sub-projects, each with a clear and direct relationship to USAID's program goals as delineated in the CDSS.

RECOMMENDATIONS:

1. USAID should seek a new counterpart agency or hire a contractor to manage the training component since the ERD will not play an active part.

2. The technical assistance component should be revitalized and new activities with special emphasis on pilot activities that may lead to new A.I.D.-financed projects should be selected providing they have a clear and demonstrable link to USAID's strategic program goals.

3. USAID should attempt to learn more about the impact of management training on job performance in BDG organizations. If necessary, USAID should consider contracting with an expert to evaluate the impact of management training on public job performance.

4. USAID should not pursue a major amendment to the TRP to open eligibility for TRP general component training to the private sector.

This evaluation is based primarily on the observations of the previous TRP Project Officer who managed the project from July 1981 to November 1983 but also includes some observations of the Program Office and the Technical Divisions. The evaluation of the training component is based on observations and reports by the Training Officer and two local hire consultants during the six month period June-December 1983. [Note: the names of the consultants are not provided in the report. One of them, however, is a Bangladeshi with a Ph.D. in Education. The other is an American with "training experience in several developing countries."]

PROJECT EVALUATION SUMMARY OF THE MAHARASHTRA IRRIGATION TECHNOLOGY AND MANAGEMENT PROJECT - INDIA

PRROBLEM & OVERVIEW: The Government of India (GOI) in attempting to improve agriculture production throughout the country has embarked upon a strategy of engaging in bi- and multi-lateral funding arrangements for constructing irrigation infrastructure and facilities. The GOI works with State Governments in identifying suitable areas and in approaching interested donors to develop feasibility and implementation plans, and acts as a guarantor and signator of all loans and grants obtained for this purpose.

U.S. ASSISTANCE: The Maharashtra Irrigation Technology and Management Project (#386-0481) is a five-year, $93 million irrigation sector project to improve institutional capability and provide support for the planning, construction, operation and management of 13 new prototype irrigation systems. A.I.D.'s contribution is $47 million. The project also funds short-term training of technical personnel involved in the design, construction and operation of medium irrigation systems. The $44 million loan value of the project (Loan #386-T-232) is intended to finance two-thirds of planning, design and construction costs. The grant component is $3 million which is intended to cover technical assistance, training, field studies and research. Each of 13 systems will require a minimum of seven years to complete and none will be fully operational by the Project Assistance Completion Date (PACD) of March 31, 1987. However, the Project Paper identifies 13 activities and tasks which are to have been achieved by the PACD.

PURPOSE OF EVALUATION: This was the first annual implementation review of this project. The purpose was to assess progress made against planned activities, identify constraints to progress, and suggest remedial actions to the Government of Maharashtra (GOM) Irrigation Division (ID) and the GOI. The review was jointly conducted with GOM/ID officials in November, 1983. Ten sub-projects were visited by USAID staff and the status of the other three was discussed with project officials. Physical and financial progress data was collected from project officers during site visits. The USAID review was conducted in collaboration with GOM/ID officers on the basis of the "Annual Implementation Review Report" issued by the Central Water Commission (CWC) of GOM in September, 1983.

FINDINGS:

1. Two sub-projects had been appraised by CWC against the target of eight that were to have been performed by June, 1983. The delay is attributed to the extra effort required to meet the GOI improved design criteria and the additional USAID sub-project approval criteria.

2. Four socio-economic baseline studies reports have been completed. A program of special studies has been defined and initiated; however, due to the late arrival of the U.S. Resident Water Management Specialist/Project Coordinator, the special studies and training program has been delayed by one year.

3. Two workshops on irrigation and drainage planning were held by USAID staff and three officers completed training in the U.S. The absence of the Resident Specialist has resulted in fewer than scheduled workshops.

4. Only 8400 hectares of topographic surveys have been completed as of November, 1983 against a target of 38,000 hectares. Detailed planning of distribution systems for only 1,770 hectares has been completed against a target of 15,000 hectares. Pre-irrigation soil surveys for all 13 sub-projects have been completed and part of the data required for detailed soil surveys has been collected although this has not yet been published.

5. No disbursement against the loan has been made as neither of the sub-project approvals has been formally received by CWC. GOM has incurred expenditures of Rs. 79.5 million of which Rs. 47 million is eligible for reimbursement after CWC appraisal and approval. $71,550 was disbursed from grant funds including a $60,480 advance to GOM for in-country training and special studies.

6. The loan funds allocated in 1983-84 and those proposed for 1984-85 are inadequate. The budgets provided or proposed are less than required in terms of revised GOM priorities for sub-projects which will result in heavier expenditures during the initial years of the project than had been planned. The shortfall is expected to be approximately Rs. 243 million by March 1985.

7. Staffing positions in 42 sub-divisions have been filled against a target of 49 sub-divisions for the 1983-84 period. Although the original target has been met, the staffing of 42 sub-divisions is insufficient to meet the revised, increased budget requirement that is reflected in the revised priorities as described above.

PROJECT DESIGN & POLICY IMPLICATIONS: The project calls for the development and application of new concepts of planning, design, construction and operation of surface irrigation systems of which the central element of the new approach "will be the end user, the farmer, and his needs and the importance of involving him actively at every stage of the building process, from initial planning through construction to operation and maintenance". Although farmers are to be actively involved, how this is to be accomplished is not specified in the Project Paper nor discussed in the first implementation review. In addition, in achieving the project's physical goals, "the most appropriate U.S. and Indian irrigation technology will be drawn on in the design and operation of these prototypes." The status of this technology is not addressed in this review nor is any of the 13 conditions that are to be achieved by the project at the PACD. Thus the review is more indicative of the traditional way of measuring project achievement, i.e., through physical and financial spending progress, and perhaps less concerned with the involvement of the intended beneficiaries and the transfer of appropriate technology than is desirable in a situation advocating the introduction of new concepts.

The project has already experienced serious delays in staffing and appointment of foreign expertise. Major revisions have changed important aspects of design criteria and sub-project completion priorities. The project is behind schedule in spending and needs major revisions to allocations proposed for subsequent years.

RECOMMENDATIONS:

1. The project needs a complete overhaul with appropriate attention paid to the explicit determination of its major purpose.

2. The GOM should increase the rate at which sub-projects are appraised and approved so as to use available credit.

3. The GOM should act quickly to fill Junior Engineer vacancies which exist in 7 authorized sub-divisions, sanction positions for an additional 38 sub-divisions and deploy additional staff for command area survey and mapping requirements. The GOM should expedite appointments of officers to authorized U.S. training opportunities as provided under the grant agreement.

4. Planning and design of distribution systems should be accelerated and topographical survey requirements should be completed quickly by deploying more staff.

5. Five additional training workshops for field officers should be planned so that a minimum of 140 officials may be trained by March, 1985.

6. USAID should take steps to expedite the arrival of the Resident Coordinator/Water Management Specialist so as to speed up the special studies and training effort.

7. The GOM should reassess its financial requirements in view of the change in construction priorities and take steps to ensure that sufficient funds will be available on a timely basis.

This report was prepared in November, 1983 by staff of USAID/New Delhi with the participation of B.N. Maheshwari, Project Officer and John R. Westley, Program Officer/USAID as well as GOM officials.

MID-TERM EVALUATION OF THE MADHYA PRADESH SOCIAL FORESTRY PROJECT - INDIA

PROBLEM & OVERVIEW: India faces severe shortages of wood and fodder due to over use of land by people and livestock. In Madhya Pradesh, India's largest and one of its poorest states, 26 out of 45 districts have wood/fodder shortages. It is estimated that 39 districts will be deficient by the year 2000. A central aspect of the problem which is addressed by this project, is the deforestation of community and government land which formerly supplied fuel, fodder and small timbers for villages. There is need for an effective management system to establish and maintain tree and fodder plantations on common land near villages and to enlist popular participation in, and responsibility for, that effort. Similarly, there is need for more tree planting on private lands to meet overall wood demand.

U.S. ASSISTANCE: The goal of the five and one half year Madhya Pradesh Social Forestry Project (#386-0475), which commenced in September, 1981, is to increase the supply of firewood, fodder, fruit and small timbers at the village level on a sustained basis. The project's authorized cost is $50 million of which USAID's contribution is a $24 million loan and a $1 million grant. Other goals are to increase rural employment and to reduce deforestation in Madhya Pradesh. The purpose is to create the institutional capacity within the government and in the community so that villagers manage both community and private lands for increased production of wood and fodder. To achieve this, the project is developing a Social Forestry Directorate (SFD) within the Madhya Pradesh Forest Department. The Directorate will ultimately consist of about 3000 persons including more than 1500 extension agents with units for training, research, monitoring and evaluation. The SFD's principal program is to establish community plantations, averaging 50-70 hectares each on 63,450 hectares of common land in 29 districts. This is to be accomplished by assisting local panchayats to develop a long-term capacity to manage them for sustained yield and to distribute the produce equitably among their constituents. The SDF is to turn over responsibility for management of the plantations to the panchayats after five years. The project also focuses on the needs of the poor and the involvement of women.

PURPOSE OF EVALUATION: This review assesses the SFD's experience to date in establishing community and other plantations and in developing its staff and organization. The 10-member USAID/GOI/GOMP team met with SFD and Madhya Pradesh Forest Department officials, other officials from the Panchayat Department, Agriculture Department, and the Forest Division of the GOI, and representatives of the World Bank, Ford Foundation, and Delhi University. Thirty-five villages were visited during a six-day period. The team met with SFD field staff, extension workers, panchayat members and villagers. It inspected plantings on community woodlots, private lands, roadside plantations, and nurseries. It held meetings with faculty, staff and students at the principal SFD training facility in Shivpuri.

FINDINGS:

1. The program is operating in 16 districts with about 1336 of 1777 sanctioned positions (75%) filled. The project's target was to be in 15 districts by this time. There was over a year's delay in beginning the project. Recruitment of women has been modest: two of 162 appointed officers are women, and 26 of 567 extension agent appointments have been women. Many of the staff are yet to be trained in the particular requirements of social forestry. There are problems related to staff quality.

2. One hundred seventy six community, roadside and experimental plantations have been established on 11,792 hectares. This is slightly below the 1983 target of 12,075 hectares. About 4.7 million person days of labor have been generated to date in establishing community plantations. Panchayats have cooperated and requests to participate exceed the number currently planned. The general quality of plantations is good although supporting nurseries need improvement. Five hundred forty two government and private nurseries are in operation. There is growing demand within Madhya Pradesh from private persons and institutions at all levels for trees. Roadside tree plantings are expensive and other agencies are doing this.

3. Sixty-six of 176 management plans (38%) have been prepared. (A ten-year management plan specifies the terms under which the panchayats will manage the plantations.) Panchayats generally see the program as a government effort and are not ready at this stage to take on long-term management and distribution systems. It is too early to gauge how effectively the panchayats will manage the plantations. Senior forestry official consider that future management and oversight is the responsibility of block level government. Thus the basic view of community management common to government personnel is inconsistent with the concept of community management embodied in the project design.

4. The SFD training curriculum emphasizes management techniques whereas the focus of the project is on extension. The project paper assumed, incorrectly, that current forest department staff with skills and experience would be made available. In fact, the staff appointed had no extension skills. The appointment of staff took over one year contributing substantially to the delay in implementation.

5. Overall, expenditures are about 40% behind levels envisioned in the Project Paper. Wage costs have risen and unanticipated construction costs increases, due to inflation, have occurred both of which have adversely affected the project's initial budget. The Project Paper assumed that labor would be available at prevailing wage levels when it was written. The GOMP's one and one half year delay in granting operational approval to the project coupled with its decision to double the minimum wage rate for agricultural labor sixteen months after the Project Agreement was signed are adverse factors.

PROJECT DESIGN AND POLICY IMPLICATIONS: Overall, the current project design appears to have a number of critical deficiencies in it and without immediate attention to rectifying these, the project will not achieve its major purposes of building local management capacity and equitable distribution of benefits, both of which are critical policy objectives.

The success of this project hinges on how effectively the panchayats can be encouraged to take on tasks new to their traditional role. The panchayat is an institution that is in many ways unprepared for taking on the functions envisaged in this project, i.e., control over a real asset and productive and equitable management of that asset. The capacity of the panchayat to handle the question of equity is unproven and problematic. The institutional tool for achieving these objectives is the management plan, yet the panchayats consist of elected members who serve without pay and staff. A serious question exists whether the panchayats, which are usually dominated by the economic elites of the community, can and will handle the project in such a way that the poor benefit. In fact, there was little evidence found in the visits conducted by the evaluation teams that panchayat leaders either know the general guidelines for distribution of benefits or feel themselves bound by them. It is clearly important to prepare management plans in advance of establishing plantations so as to have time for discussions between the panchayat members, the villagers and the SFD. However, there is little evidence that the panchayats conceive of management of common lands as ultimately their responsibility. As well, senior SFD officials have also expressed the opinion that future management and oversight on an ongoing basis would have to be carried out by block level government officials. This pattern of thinking typifies the traditional relationship between the institutions of government at the village and district levels and usually results in the imposition of bureaucratic will on the elected village leadership thereby undermining the people's participation in the program.

Inconsistencies between current project outputs and output levels anticipated in the Project Paper are due largely to a lack of a realistic implementation plan. This is reflected in the Project Paper. For example, no time was allowed for training of field extension workers primarily because the Project Paper assumed, incorrectly, that skilled and experienced foresters with extension backgrounds who were highly motivated to work in social forestry already existed. Similarly, no time was scheduled for GOMP to approve a budget for the project although, ultimately, it is the state government which must carry the burden of financing the SFD. The major lesson learned from this project so far is that without realistic assessment of major sociological and cultural factors and existing institutional capabilities and capacities, efforts at effecting change in the development context using the project intervention model are likely to be disappointing and wasteful of resources.

RECOMMENDATIONS:

1. USAID and the GOI should amend the project purpose to emphasize the importance of building local management capacity at the community level. A revised budget of Rs. 550 million should be approved by USAID and GOMP. Planning for the second phase should begin in late 1984.

2. The project should increase emphasis on community management and related coursework at the Shivpuri Training Institute. This task should involve filling vacant faculty positions, providing extension training to all faculty, developing detailed syllabi which specify content, length of training and actual hours of instruction, and developing village-level programs to train community leaders in both management and basic forestry skills. In-service training for extension workers and mechanisms for obtaining feedback on extension training needs are also program requirements.

3. The project should conduct social science surveys in selected villages to verify and assess how distribution of benefits within each panchayat is being handled, to provide baseline data on the socio-economic composition of each village to be included in the management plan, and to establish a system of regular reviews to assess the quality of training, extension and the extent of popular participation.

4. The State's Land Development Act should be amended to insure that the SFD and panchayats have legal management authority over community woodlots including regulatory power.

5. Efforts to recruit women at all levels should be increased and programs initiated that will facilitate the recruitment, training and retention of women as extension agents.

This evaluation was conducted between October 23 and November 19, 1983 by a 10-member joint evaluation team comprised of AID/W representatives Susan Pharr and Thomas Arndt, USAID/India staffmembers among whom were Harold E. Fisher and John R Westley, an independent Indian consultant, and two members of the Social Forestry Directorate Management and Evaluation Unit whose names are not mentioned in the evaluation report.

EVALUATION OF P.L. 480 TITLE II SCHOOL FEEDING PROGRAM IN INDIA

PROBLEM & OVERVIEW: The goal of commodity assistance for school feeding is to encourage recipient countries to provide food to primary school children to improve school attendance among the poorest children of the society and to improve their health, vigor, learning capability, and nutritional status. A further objective is to assist in the establishment of school feeding as a permanent institution totally supported by indigenous resources. The U.S. has been donating food commodities to India since the early 1950's primarily through registered, private voluntary organizations (PVO) such as CARE. For India, Title II resources are an important complement to overall U.S. development assistance strategy aimed primarily at improving the long-term balance between population and food resources. The Government of India's (GOI) support for school feeding represents a major national effort. It believes that school feeding increases primary school attendance and, thereby, literacy rates and that increased female literacy, in particular, is critical in reducing population growth.

U.S. ASSISTANCE: School feeding programs have been a major feature of U.S. assistance to India since the early 1950's. Title II activities continued at substantial levels after the suspension of Development Assistance loans and grants to India in FY 1972. CARE and the Catholic Relief Service (CRS) are the two U.S. PVOs administering school feeding programs, called Mid-Day Meals (MDM), in India. CARE distributes food nationwide to the MDM program and covers 6.5 million beneficiaries at a commodity cost of $26.5 million. Upon resumption of Development Assistance in FY 1978, A.I.D. decided to review the effectiveness of various components of the Title II programs. Based on a report by the Community Systems Foundations (CSF) hired to carry out this study, USAID/India initiated an effort to upgrade Title II Maternal and Child Health and Food-for-Work programs and to conduct a quantitative assessment of the impact of school feeding activities. In FY 1982, CARE/India agreed to begin a 50 percent reduction in its school feeding beneficiary levels phased over five years. Upon completion of this phasedown in FY 1986, the estimated program level will be $21.5 million covering 4.75 million beneficiaries, as compared to the FY 1981 program of $46 million covering over 9 million beneficiaries.

PURPOSE OF EVALUATION: In 1980, a review of the school feeding program's impact was undertaken at the request of USAID and the GOI by Richard Shortlidge of A.I.D./Washington's Education Office. Shortlidge's report presented three options for conducting a rigorous, systematic evaluation of the school feeding program. In keeping with Shortlidge's recommendations and in order to provide a basis for decisions concerning the period after FY 1986, USAID contracted with the National Council for Education, Research and Training (NCERT), a semi-autonomous institution under the Ministry of Education, to conduct a quantitative assessment of the impact of school feeding programs on primary school enrollment and retention rates. Based on NCERT's data and analysis, USAID also conducted additional statistical analyses. This paper reports on the results of these analyses.

FINDINGS:

1. Districts with school feeding programs had higher enrollment rates than districts with none in 1973 and 1978. School feeding programs in most districts were introduced between 1962 and 1965. The differences in enrollment rates of school and non-school feeding districts may reflect the cumulative impact of the program.

2. Female student enrollment was significantly higher in districts with school feeding programs than in non-program districts. This indicates a consistent and positive relationship between school feeding intensity and change in enrollment rates of girls. In the 45 districts with no school feeding programs, the percent change in enrollment rate for females was less than for all students; in school feeding program districts, the percent increase in female student enrollment rates was much higher than for all students. This trend is also applicable to the enrollment of Scheduled Caste and Tribal girls.

3. A positive relationship between school feeding and student retention rates is observed in NCERT's block level analysis. Means of retention rates were higher for school feeding blocks in two states than for non-school feeding blocks.

PROJECT DESIGN & POLICY IMPLICATIONS: The evaluation indicates that CARE's school feeding program has been effectively targeted on the poorer districts and likely served an important non-nutritional objective. The findings suggest that the availability of free meals encourages families to send their children to school, although the effect of this program on keeping children in school remains unknown. A positive impact of school feeding programs on enrollment can make an important contribution to literacy particularly for girls. The implications for both fertility and mortality reduction one to two generations in the future are clear, given the established relationship in development literature between literacy and future income levels, birth rates and infant mortality. The data also reveal that during the period surveyed, the intensity of student coverage in CARE school feeding programs declined on a district basis. The reason was that as student population expanded, food available to CARE for school feeding did not and also because CARE chose not to concentrate its food in fewer districts. The decline in intensity on a district basis raises the question of how to allocate food to obtain the maximum impact on enrollment and retention rates taking into account cost per unit of food delivered. Overall, the program is becoming more physically dispersed but perhaps is achieving higher impact on the intended target group. It is not clear how these evaluation results will affect the CARE Title II-supported school feeding programs in India. The policy choices that must be made will only be partially informed by the data presented in this report. They must also take cognizance of the GOI's capacity to absorb additional school feeding food requirements, the management implications for CARE state-level operations of a phasedown in school feeding in India, availability of Title II resources worldwide, and competing demand for commodity and budget support by the expanding MCH program in India.

RECOMMENDATIONS:

1. CARE and USAID should make an effort to bring their respective planning horizons closer together so that A.I.D.'s longer range strategic concerns and CARE's shorter range and operational requirements work synergistically rather than at cross-purposes.

2. A.I.D./W may want to consider investing in a rigorous systematic evaluation of global school feeding program impact on non-nutritional objectives as a first step to achieving the above recommendation.

3. School feeding should not be oriented toward nutritional rehabilitation.

4. It may be possible to assess the degree to which P.L. 480-supported school feeding programs have contributed to fertility and mortality reduction by evaluating, for example, the impact of the program on adults who attended schools that had school feeding programs two decades ago. Such a study would be feasible in India. If a relationship is found to exist, it will be worth asking whether school feeding interventions are at least as cost-effective, if not more so, than conventional family planning and primary health care projects.

This analysis was conducted by staff of USAID/India in March 1984.

REPORT ON THE EVALUATION OF THE OILSEED GROWERS' COOPERATIVE PROJECT - INDIA

PROBLEM & OVERVIEW: Demand for edible oils in India has far outstripped domestic production in recent years. More than one million metric tons of oil will be imported in 1982-83. Yet this will barely maintain per capita consumption at fifty percent of nutritional requirements. At the request of the Government of India (GOI), the National Dairy Development Board (NDDB) developed a project proposal entitled "Restructuring Edible Oil and Oilseed Production and Marketing." This was approved by the GOI in September 1978.

U.S. ASSISTANCE: The Oilseed Growers' Cooperative Project (OGCP), Operations Program Grant (OPG) #386-2144, was established under a memorandum of agreement between NDDB and the Cooperative League of the U.S.A. (CLUSA). The OGCP, which began operation in June 1979, is a seven-year project designed to generate funds for investment in production enhancement, applied research, marketing systems, manpower development, and acquisition/erection of oilseed processing plants. Funding is through revenues generated from commercial sales in India of 160,000 metric tons of soybean oil provided under the U.S. Food For Peace (P.L. 480 Title II) Program. The estimated funding derived from sales is $110,132,300. The commodities are provided under a transfer authorization negotiated between the USAID and CLUSA. As the cooperating sponsor, CLUSA is reponsible for procurement and transfer of the donated oil to NDDB. The project's purpose is to establish an integrated oilseed and vegetable oil production, processing and marketing system within a cooperative structure controlled by farmers. There are five project objectives. The project involves eight production districts, four in Gujarat, and one each in Madhya Pradesh, Tamil Nadu, Karnataka and Andhra Pradesh.

PURPOSE OF EVALUATION: The purpose is assess the project progress and prepare detailed plans of future actions supporting project objectives. The initial CLUSA Multiyear Operation Plan (MYOP: 1978-85) stipulated that an evaluation would take place in the context of the Project Evaluation Summary. As well as the overall purpose, the evaluation team was to analyze the relationship of external factors and provision of inputs to the achievement of objectives and to determine whether achievement of end-of-project objectives would be possible by the end of Phase I. The evaluation team consisted of six experts of multi-disciplinary backgrounds. The team reviewed project documentation, visited project sites and interviewed various project and government officals. The project was last evaluated in 1981.

FINDINGS:

1. Due to constraints imposed by external factors, it is unlikely that project goals, as stated in the Multiyear Operating Plan, will be achieved by the Project Activities Completion Date (PACD). The MYOP envisaged that seven state federations would be organized simultaneously during 1979-80 and receive different forms of financing over the seven-year life-of-project. However, only two federations can be said to have completed three years of operations at this time. Project performance has been impressive, however, considering the external and internal factors which have affected it.

2. It is not possible to assess the impact of the production enhancement programs on increases in yield over the short time these activities have been operational. In Gujarat, the state government has not allocated land for the planned agronomic center. In Madhya Pradesh, it appears the technology is in hand and the research and extension staff in place to make rapid progress in increasing production. Implementation in Tamil Nadu has been slow because of prolonged drought.

3. Project planning by NDDB and the State Federation is good. Although the GOI has endorsed the Cooperative Development Program, there is a problem with the cumbersome procedures required to obtain licenses to establish and operate processing plants.

4. In terms of installing crushing capacity, the achievement to date amounts to 277,200 tons, or 64 percent of the target. Solvent extraction for this time period is at 90 percent of target. The additional storage capacity so far established equals 65,340 tons. An annual production capacity of 24,750 tons of Vanaspati has been accomplished. The program to establish transport systems to handle bulk oil and oilseed shipments is on schedule. The Cooperative Union of Canada-financed facilities, which will add to the CLUSA/A.I.D. project capacity, are making good progress.

5. Intermittent plant operations, due to power problems, have led to operating inefficiencies such as high hexane losses in solvent plants. Current oilseed handling procedures, all manual operations, are uneconomical as well.

6. Levels of procurement have been below target and the currently budgeted revolving fund for procurement is inadequate. No procurement or sale of commercially imported oils has been conducted yet. Procurement pricing policies, although varied, have been aggressive. They generally pay above market prices. Low procurement achievement is due to several factors.

7. Sales have been below target because of delays and interruptions in receipt of donated oils, although prices received for donated oil have been above projections. Funds generated for financing project activities become available only in 1980-81. Prices received for project-produced products have been higher than projected, although marketing margins appear to be tighter than originally expected. Demand for oilcakes is weak.

8. Large scale buffer stocking of edible oils is no longer a viable option. GOI now performs this function. The objective of the "localized" buffer stocking is unclear. Studies have shown that variability and uncertainty in yields are more powerful constraints on investment than is variability in price.

9. Numerous state and national government policies influence the marketing of oils and have an effect on project marketing activities. Occasional state government movement restrictions and requirements to sell through the public distribution system pose a threat to profitable oil marketing. The GOI opposes blending of oils which the project advocates. Weak domestic demand for protein meals also represents a major marketing problem.

10. Misunderstandings over the A.I.D. Inspector General's audit rights in India developed between NODB/OVOW, CLUSA, and USAID which resulted in the slowing down of expenditures on expansion activity.

11. Long and short-term financial planning is weak. There is limited budgeting performed before a fiscal year begins, little monitoring of expenditures during the year, and no long-term projections of costs and revenues.

PROJECT DESIGN & POLICY IMPLICATIONS: The evaluation validates the basic design elements. The project has created a foundation for an ambitious and sophisticated, integrated infrastructure of oilseeds and vegetable oil production, processing and marketing within a cooperative framework controlled by farmer-producers. The general lesson learned early in this project was that if the cooperative is to provide the intended service to the farmers, it is necessary to acquire or create and operate all elements of the processing component economically and on a competitive basis. Probably the most important of lessons learned has been that planning for the establishment of complex organizations and systems cannot be perfect. Original plans and estimates must be subject to adjustment as changes in the original assumptions are encountered.

RECOMMENDATIONS:

1. The life of the project should be extended by four years, through 1989-90, and a further commitment of 37,000 MTs of refined soybean oil is needed to ensure project funding through the extended period.

2. Reclassification of the OGCP budget into developmental, operational and capital categories is mandatory. Flexibility should be accorded within each of these purposes.

4. NDDB and state oilseed growers' cooperative federations need technical assistance to strengthen financial planning, management and analysis of information and data.

5. Production enhancement should be focussed on yield stabilization in rainfed areas.

This evaluation was conducted in May and June, 1983 by a joint NDDB-CLUSA-GOI-USAID six-member team recruited by CLUSA including individuals with backgrounds in Agronomy, Oilseed Processing Technology, Oilseed Marketing Economy, Financial Management, Cooperative Grower Services Extension, and General Management. [Ed. note: The names of the evaluators are not mentioned in the report.]

EVALUATION OF THE P.L. 480 TITLE II FOOD FOR WORK PROGRAM - INDIA

PROBLEM & OVERVIEW: The P.L. 480 Food for Work Program (FFW) was initiated in India in response to the Bihar famine of 1967. The program was expanded throughout India during the famine years of 1972-73. At the outset, P.L. 480 Title II FFW programs were conducted by three U.S. voluntary agencies: Catholic Relief Services (CRS), Church World Service/Lutheran World Relief (CWS/LWR), and CARE. There are two other programs in India that operate as FFW programs. One is the National Rural Employment Program (NREP) of the Government of India (GOI). The other is sponsored by the World Food Program (WFP). Neither the NREP or WFP program, both of which are large-scale public works programs, are comparable to the CRS FFW program which is characterized by small private and community-based projects.

U.S. ASSISTANCE: CRS operates in India primarily through the Catholic Church diocesan structure, and a variety of Indian voluntary and quasi-governmental agencies. For the U.S. fiscal year 1982, the latest year for which complete figures are available, CRS programmed 79,716 metric tons of P.L. 480 Title II commodities for FFW. These were chiefly bulgur wheat and soybean oil and were valued at $17,117,000. The program was designed to reach 535,000 recipients. For fiscal year 1984, CRS is expected to reach 366,000 recipients with 54,534 metric tons of bulgar wheat and oil valued at U.S. $10,676,000. CARE discontinued its program in 1978. The CWS/LWR program was discontinued in 1981.

PURPOSE OF EVALUATION: The CRS program is the only P.L. 480 Title II FFW program covered under this evaluation. In 1979, Community Systems Foundation (CSF) conducted an interim evaluation of the Title II program and made recommendations for future monitoring and evaluation. As a follow-on, USAID/India determined that a quantitative assessment of the FFW program should be done to document the most important results from the major project types and to provide a basis for efforts to improve FFW in India. Practical Concepts Incorporated (PCI) was asked to develop an evaluation plan. Using PCI's plan as a basic guide, eleven evaluation studies were undertaken by USAID in 1981 with the collaboration of CRS. These studies were completed in December, 1983.

FINDINGS:

1. The asset study findings reveal that the CRS/India FFW program is having a positve effect on development in rural India. Economic indicators relating to beneficiary income and agricultural output show marked improvements. Total cropped area per beneficiary increased between 11% and 32%; irrigated area increased between 26% and 100%. Agricultural output increases range from 40% and 131%. Sixty-eight percent of the beneficiaries were small and marginal farmers.

2. The recipient profile study findings show that the program is providing employment opportunities to the rural poor. FFW is providing about 71 days of employment per recipient per year or about 21% of a household's annual employment. FFW is also providing about 72% increase in household income. Most recipients were found to be landless agricultural and non-agricultural laborers (64%); 28% were small and marginal farmers; 8% were small traders or service workers; 78% were members of Scheduled Tribes, Castes and other "backward" classes. Nevertheless, the average recipient household is still below the official GOI poverty line.

3. Statistically insignificant nutritional effects between children of active recipients (parents working on FFW projects at the time of interview and eating FFW commodities) and inactive children were observed. Overall, inactive children were found to be somewhat better off: 5% were found to be normally nourished against 4% of the active children; 51% of inactive children suffered from moderate malnutrition against 52% of the active children; 5% of the inactive children suffered from severe malnutrition against 9% of the active.

PROJECT DESIGN & POLICY IMPLICATIONS: The fact that most of the assets built under CRS/India's FFW program are individual, privately owned agricultural projects is a major program strength. There appears to be a strong relationship between direct ownership and effective use of the asset. The Catholic Church diocesan

structure provides CRS (and USAID) a decentralized and highly personalized system through which to administer FFW. The sincere dedication of diocesan representatives to help their fellow men appears to make the CRS program effective in reaching remote rural areas and serving the GOI's target groups or truly needy, i.e., those officially referred to by GOI as "the weaker sections" of Indian society. It also provides a non-political, private representation that is effective in excluding the influence of local political, pecuniary, and bureaucractic interests from the project management process. In future studies, an attempt should be made to learn from experience. This would help resolve concern among some food-aid critics about dependency on FFW, as well as provide insights into how repeated experiences may contribute to reduced migration and improved family stability. Current studies could not determine if FFW contributions were one-time or yearly repeated experiences.

RECOMMENDATIONS:

1. The CRS FFW program should have a monitoring and evaluation system that would provide an on-going indication of program performance so that program managers and other interested audiences are able to reflect on the worth of the program as a whole rather than looking on it as a fragmented ad hoc endeavor whose parts appear to provide no meaningful development impact when viewed individually.

2. It would be advisable to employ the Nutrition Monitoring Bureau of the National Institute of Nutrition for future studies in India. The current attempt to obtain weight and height measures of children was hampered by inexperienced data collectors and supervisors. Accurate data would have enhanced the recipient profile studies by demonstrating what, if any, nutritional impact FFW may be having on recipients households.

3. Future surveys should include case studies designed to complement in a qualitative manner surveys such as these that are designed to capture only quantitative aspects.

This evaluation was conducted by John Paul Chudy of USAID/India in March, 1984.

THE IMPLEMENTATION OF A PLANNING, MONITORING AND EVALUATION SYSTEM FOR P.L. 480 TITLE II FOOD FOR WORK PROGRAMS IN INDIA

PROBLEM & OVERVIEW: Please read the text for this section under the summary entitled: "EVALUATION OF THE P.L. 480 TITLE II FOOD FOR WORK PROGRAM - INDIA."

U.S. ASSISTANCE: Please read the text for this Section under the summary entitled: "EVALUATION OF THE P.L. 480 TITLE II FOOD FOR WORK PROGRAM - INDIA."

PURPOSE OF EVALUATION: This report provides documentation of the formulation of an implementation plan for the Food For Work program in India. A team of two advisors from Community Systems Foundation (CSF) worked with representatives of CRS and USAID to: (a) make recommendations to CRS on guidelines for full implementation of the Planning, Monitoring and Evaluations System; and (b) make recommendations to CRS for streamlining FFW commodity accounting procedures. The planning, monitoring and evaluation system described in this report builds upon several prior steps which include: (1) the P.L. Title II Evaluation of FFW in India completed in March, 1984 (particularly 11 studies on program impact and recipient profiles contained therein); (2) the efforts of a joint USAID, CRS and CSF team which in July 1983 formulated a preliminary design for this system and field tested some of its components; (3) a series of workshops on the system held in the fall of 1983 which obtained feedback on the system design; and (4) a substantial field testing of the instruments and protocol derived from these workshops undertaken in early 1984.

FINDINGS:

1. The level of detail required on the existing Form 6 (measurements, dimensions, man-days and capital input by 17 project types) is unrealistic. Each year the consignees must submit an Annual Estimate of Requirements (AER) for the coming fiscal year on Form 5 for the regular programs and Form 6 for FFW. The consignee's estimates must be made well before there is any firm knowledge of the man-days that will be available or the projects that will be proposed. In practice, the consignee applies for projects that approximate the total days of work that will probably be available. The process is inherently imprecise but seems to work out in practice because there are more project applications than resources available to carry them out.

2. The present CRS system of monitoring commodities from their arrival at four different port cities to their arrival at consignees' godowns works well. The amount of losses that occur represents a very small portion of commodity tonnage or man-days expended. This type of monitoring focuses primarily on the process rather than on attainment of program goals. CRS is employing widely accepted management practices in its commodity and recipient accounting.

3. Currently, evaluation of FFW activities and achievements is being done informally through casual conversation at all levels in the administration and through the use of accounting methodologies such as periodic reports and reply-by-endorsement. These are not very effective ways to choose the best projects for achieving the underlying program objectives.

4. There is a general and felt need at all levels of CRS for streamlining the administrative load. The administrative system can be streamlined without structural change by modifying procedures. However, achieving procedural modifications will require giving people at lower management levels responsibility for decision-making that they do not currently possess.

PROJECT DESIGN & POLICY IMPLICATIONS: In the planning, monitoring and evaluation phase, decentralized decision-making is essential. The consignee and project holders are in the best position to understand local circumstances and to judge whether or not a given project will yield the desired developmental benefits. Yet the tight management style in CRS is not well suited to the evaluation task. Therefore, it is desirable to combine the two management styles so that decentralized decision-making, which characterizes the evaluation and planning phases, and strictly controlled reporting and response mechanisms, being used in monitoring stock levels, may both be utilized to the advantage of the program.

RECOMMENDATIONS:

1. Overall, the acceptance of a greatly enlarged evaluation component is recommended. This component should have the potential to improve program performance in achieving developmental objectives.

2. However, it is also recommended that this evaluation component not be an additional burden on the present management process as the style of management is not well suited to the evaluation task. Instead, existing planning documents (Forms 6, 10,11) should be revised, the timing of reports (Form B1) from consignee to zonal office should be quarterly, and the progress/completion report (Form 12) should be submitted at the end of each project or semi-annually for continuing projects. The summary statement of progress/completion (Form 13) should be aggregated by project type and reported semi-annually.

3. The Evaluation Team recommends that full implementation of the Planning, Monitoring and Evaluation System (PM&E) begin by October 1, 1984, and that an individual within CRS who can coordinate and help implement the system country-wide be identified and assigned.

This report was written by John D. Nystuen, Ph.D. and William D. Drake, Ph.D., both of Community Systems Foundation. Their consultancy to CRS was carried out over a year although this report was finalized in the last week of April and the first three weeks of May 1984.

REPORT OF MID-TERM EVALUATION OF INTEGRATED RURAL HEALTH AND POPULATION PROJECT - INDIA

PROBLEM & OVERVIEW. Two of the major concerns of the Government of India (GOI) are the country's high fertility and high infant and child mortality rates. Through the Ministry of Health and Family Welfare (MOH/FW), the GOI is attempting to provide better access to basic health and family planning services . The crude birth rate is about 36 per thousand which implies about 26 million births per year and, when coupled with a crude death rate of 15 per thousand, results in a net annual population increase of about 15 million. Infant mortality (estimated at 122 per 1000 live births in 1983) varies considerably among regions, but it is especially high among the rural poor; deaths among children under age five account for an estimated 55 percent of all deaths.

U.S. ASSISTANCE. The Integrated Rural Health and Population Project (IRHP: #386-0468) is a five-year, $67 million undertaking to which USAID's contribution totals $40 million. It began in August 1980 and is scheduled to end September 30, 1985. IRHP supports the GOI's effort to reduce fertility and infant/child mortality and is the main component of the Model Health Plan for accelerated implementation of rural health and family planning services in 14 districts in 5 states. (The project paper originally specified 13 districts; however, one district in Maharashtra, Osmanabad, was divided in two in 1982.) There are two major purposes: 1) to improve access to health and family planning services; and 2) to improve and expand services and support systems. The project goals are the achievement of a 15% decline in the infant mortality rate, a 20% decline in mortality among children in the 1-4 year age group, and a significant decline in the crude birth rate. Analysis of fertility, infant and child mortality data enabled GOI and USAID to identify 12 key family planning and health problems which are the focus of the project's efforts.

PURPOSE OF EVALUATION. The project agreement stipulates that an Annual Review is to be held to assess current progress in each of the major areas which the project addresses. The first Annual Review covered the period through March 31, 1982. This report found that after a very slow start, substantial momentum had been achieved in the construction and training components of the project while essential data collection had just begun. However, the planned baseline survey, management and communications needs assessments, and the staffing of technical/managerial positions in various technical cells had not yet been accomplished. As a result the expected expansion and improvement of service and support systems had hardly begun.

This evaluation again reviewed progress in all components and surveyed a variety of technical and managerial problems experienced in project implementation. In particular, the mid-term evaluation was expected to produce recommendations for changes in ongoing project operations and project outputs, and to provide guidance for USAID in beginning assessment of the feasibility of extending or expanding the project. The evaluation methodology included a review of project history and documents, briefing by the staffs of USAID/Delhi and the various GOI MOH/FW officers involved in the project, and field visits to all of the states and districts covered by the project as well as to key institutions involved in the implementation of various project components. The team employed direct observation, interviews and short questionnaires.

FINDINGS.

1. The IRHP is contributing significantly to increased quantity and availability of services. The new facilities, additional workers trained and posted, the and increased availability of drugs and equipment reflect progress toward the quantitative objectives of the project. However, the visible improvements are unevenly distributed, a large number of sanctioned posts remain to be filled, and there is considerable variation in project achievement from state to state. Progress towards the objectives of the project reflects progress toward the quantitative objectives rather than substantial changes in service content or quality.

2. There is ample albeit unmeasurable evidence that overall family planning performance has improved in the project areas. Access to services at the village level has increased, thereby contributing to desired increases in the percentage of acceptors who use non-permanent methods. There is renewed emphasis on IUD contraception, while oral contraceptives still have limited acceptance as workers are concerned about possible side-effects. Emphasis on family planning targets continues to overshadow emphasis on health targets.

3. Measuring the impact of the project, its effects on the twelve key health problems and three overall goals, will be difficult because it is unlikely that there will be major changes in the outcome measures by the end of the project period. Conclusions from the baseline survey will only become available in the third year of the project. Baseline data for project districts is not available for all of the key health problems, birth rates and mortality rates.

4. Considerable progress has been made by all five states in construction. Maharashtra and Himachal Pradesh have generally met the targets for construction starts and buildings are at various stages of completion as of September 30, 1983. In Gujarat, Haryana and the Punjab, construction starts are behind project schedules particularly in terms of the larger and more expensive buildings. However, there exists a discrepancy between the number of facilities proposed to be constructed in the Project Agreement and those planned by the states. Construction costs have risen from 50 to 100% in all states since signing of the Project Agreement. It appears no longer possible to complete the construction of all buildings within the original budget.

5. It is apparent that the central and state governments have given more priority to the expansion of the rural health system than to improving its management 0. Progress in improved and expanded management support has been very slow. The Management Needs Assessment, to have been completed by year one, has not yet been completed in any state. A Management Information System, to have been developed and implemented by year three, has not been implemented. Many of the technical cells that were to have been established at State and District levels have not been sanctioned or staffed. Coordination needs improvement. State Project Directors are frequently unaware of project administrative procedures and management guidelines.

6. The Training Needs Assessment found significant shortcomings in the competencies of the village, subcenter and PHC personnel, i.e., Dais, Community Health Guides, Health Workers, Health Assistants. Medical Officers at the PHC level in general tend to retain their clinical orientation and their rudimentary understanding, lack of understanding and appreciation of PHC concepts represents one of the most formidable and intractable challenges to the project. The series of Training Modules (five completed; three more near completion), now being developed at the Regional Health and Family Welfare Training Centers (RHFWTC), should address this problem at the CHG and Dai levels.

7. The MPW and CHG schemes have had positive impact on the states' health care programs. Upward mobility has brought some increased vitality. Some states are already experimenting with additional promotional training programs such as Maharashtra's "step-ladder" training program for female HWs. Little opportunity for promotional training and career advancement exists, however.

8. The concept of "competency-based training" is being more directly related to the training programs through the TNA and CNA processes. The team felt that increased coordination between service and training had resulted from the RHFWTC's involvement and that their role, particularly in team development training should be encouraged. However, HW (female) basic training is not yet competency-based, ANM schools continue to train students for hospital work, and their instructors are more clinically than community oriented. Likewise, training schools are poorly equipped without sufficient models, charts, books and training manuals, teachers are not always available and transportation to take students to the fields is lacking.

9. The quality of supervisory training needs attention. The training of supervisors has been oriented to a hierarchical style of supervision consisting more of inspection and fault finding than guidance and in-service training. There are shortcomings in the application of a team training concept with appropriate linkages between the various members of the health team. The Medical Officer, considered captain of the health team at the PHC level, too often lacks the training and orientation for this important role. Many are recent graduates without significant clinical experience and lack understanding of the PHC concept.

10. The Communication Needs Assessment (CNA), which has been a major IEC activity over the past year, has taken longer than anticipated to start and to complete. This has resulted in two critical consequences: (a) there has been a delay in designing innovative communication strategies; and (b) the design of modules for in-service training has been undertaken as a separate activity of the National Institute of Health and Family Welfare without the benefit of relevant information the CNA was to have generated.

11. The progress of and funding for the National Task Force on Communication for Health and Family Welfare and the associated area projects have been uneven. Although the Task Force has developed a series of communications training modules for the Block Extension Educators (BEES), it has been largely inactive because funding and technical assistance to carry out the long term plans have not been fully available. The large number of vacant IEC positions at the district and block levels leaves serious gaps.

12. There has been a serious delay in the initiation of suitable operations research. Part of this delay is because the research cells called for by the project are not operational in any of the five states. Another problem may be that the identification of appropriate projects at the state or district level requires assistance from experienced persons outside the project areas.

PROJECT DESIGN AND POLICY IMPLICATIONS. Overall, the evaluation findings are positive with respect to the conceptual framework of the project although the findings of this review substantiate those of the prior annual review in the identification of weaknesses in the project design and in the implementation process. Delays in following the implementation schedule set forth in the project paper and confusion over objectives seriously lessen the likelihood of achieving project goals within the authorized time frame. The needs assessment in training, communication and management appears to have at least two major and very different objectives. One is to indicate problem areas in which project support is needed to improve and expand current activities. In this context, the needs assessments were planned to be completed by the end of the first project year. A second, although less explicit, objective is to involve health and family welfare personnel at all levels in the longer term process of improving services and redirecting them toward key problems and population groups. Delays in achieving the first objective may have occurred in part because of the efforts to achieve the second. These delays have serious implications for the achievement of project goals.

Explicit clarification of all the objectives of the needs assessments might have made it possible to develop alternative ways of collecting baseline data, thereby avoiding the present situation. In particular, the delay in completing the baseline survey and needs assessment has prevented many improvements in training and service delivery from being undertaken, improvements which no doubt would make desirable further adjustments and refinements in the implementation process before the desired "steady state" is reached. Future projects may benefit from completion of preliminary data collection and analysis before project implementation begins.

The absence of adequate technical staff at state and district levels has also contributed to the delays in project implementation. Creation of posts for technical staff at these levels is also called for in the project design and is essential to the improvement of the quality of health and family planning services. However, few of these posts have yet been created. The main reasons appear to be bureaucratic delays, lack of attention to the technical needs of the project, and the necessity for the states to assume responsibility for continued maintenance of these posts after the project ends. The evaluation team concluded that anticipation of these problems when the project was designed might have helped the GOI the states and USAID develop solutions much earlier.

Finally, the absence of a plan for a post-project survey to assess the impact of the project needs to be addressed. Plans for future A.I.D. activity in this field, including possible replication or expansion, hinge upon the findings of such an assessment regarding, for example, impact on project goals, impact on service delivery, and cost-effectiveness.

RECOMMENDATIONS

NOTE: The evaluation report contains more than 60 recommendations covering the various aspects of the project. The major recommendations are summarized below:

1. Many IEC, research and monitoring functions need the attention and involvement of the PHC staff and their clientele to achieve decentralization and to increase community participation vital to the success of the project. The community and PHC-level staff should be actively involved in planning, implementing and monitoring health and family welfare activities in their areas.

2. Resolution of the key issues which are delaying financial disbursements for construction costs should be concluded as soon as possible in order to facilitate joint GOI-USAID planning to meet the remaining construction requirements and in order to shift the focus of the project toward its qualitative aspects.

3. Every effort should be made to simplify and shorten the process of baseline data collection and completion of needs assessments. GOI, USAID and project staff should place highest priority on completing these activities. Evaluation studies should be coordinated with those being undertaken in other area projects by other Indian institutions to facilitate better understanding of local situations and their training and communication implications.

4. A management information system is urgently required. It is recommended that the GOI immediately establish a task force to be charged with analyzing the existing or currently proposed MISs. By May 1, 1984, the task group should propose one or more practical systems for adoption by the project states. The states should be directed to adopt an impact-based MIS by no later than December, 1984.

5. Consideration should be given within the next 18 months to whether the final evaluation of the project should be delayed until a year after the end of the five-year project period. Certain changes in project design, such as time-phased implementation, state-wide implementation, and intensive block implementation, should also be considered.

6. Careful reconsideration of the methods for setting targets is necessary. The methods for establishing targets now in use should be reviewed as they do not appear to be demographically or statistically sound, especially at local levels.

7. Increased support and use of central, regional and state training institutions should be encouraged and supported for the remainder of the project.

8. The GOI should undertake a comprehensive analysis of the costs of the Model Plan perhaps with the assistance of an appropriate management organization.

This evaluation was conducted by Dr. Donald H. Minkler, Team Leader, Ms. Anne Barnes, Dr. Maybelle Arole, Mr. P.E. Balakrishnan, Dr. Margaret Mangain, Dr. Michael O'Byrne, Dr. James Palmore, Dr. Jerry Russell, and Dr. Inderjit Walia. The evaluation was conducted between October 31 and November 25, 1983. [Ed. note: The professional affiliations of the members is not stated in the Evaluation Report.]

MID-TERM EVALUATION REPORT OF THE APPLIED AGRICULTURAL RESEARCH PROJECT - INDONESIA

PROBLEM & OVERVIEW: Indonesia is the world's fifth largest nation and eighty percent of its population live in rural areas. Agriculture is the largest economic sector, contributing 66 percent of all non-petroleum exports and 35 percent of GDP. Indonesia's third five year plan (Repelita) stresses agricultural development to increase production and work opportunities and distribute income more equitably. The government is investing heavily in agricultural research as part of its development strategy.

U.S. ASSISTANCE: The Applied Agricultural Research Project (AARP) is intended to assist Indonesia's Agency for Agricultural Research and Development (AARD) in expanding and improving agricultural research. Nineteen donors are contributing to AARD which oversees research done by 27 institutions and absorbs 12 percent of the Ministry of Agriculture's (MOA) budget. An A.I.D. loan (#497-0302) of $18.9 million was approved to finance foreign exchange costs of short term training, vehicles, equipment and commodities, and some local currency costs of construction. A $6.5 million grant was approved to finance technical assistance. The Government of Indonesia's (GOI) contribution include $17.5 million to finance a portion of the construction and training costs as well as hiring additional personnel. Loan and grant funds were originally designed for a seven-year project. The project was approved for five, however, and designers and implementors anticipated approval of an extension period at the appropriate time. The sector goal addressed by this project is "increased agricultural production of five commodity groups.." The project purpose is "to expand and improve agricultural research to address agro-climatic factors peculiar to Kalimantan, Sulawesi, Maluku, Bali, West Timor and West Java."

PURPOSE OF EVALUATION: This is a mid-term assessment of progress against these end-of-project status conditions: (1) research is being performed at research facilities and farms in designated geographic areas; (2) research findings are being published and disseminated to farmers; (3) research staff are developing links to the country's institutions of higher education; (4) close communications are being maintained with international research centers; and (5) research strategies and priorities are being set through consultation and coordination with provincial planning boards, extension services, etc. The evaluation team reviewed AARD documents, interviewed administrators and scientists (including expatriate consultants), and visited field sites.

FINDINGS:

1. The Project is two years behind schedule in all of its component parts--technical assistance, construction, equipment procurement, and short-term training. Appropriate reductions in scope were apparently not made at the beginning when a five-year, rather than a seven-year, project period was authorized.

2. AARP is experiencing the same kinds of stress as that of AARD which is attributable to rapid growth and a large number of commitments. Key indicators include being two years behind schedule, difficulty in locating qualified participants for foreign training, the difficulty some research centers experience utilizing technical assistance, and the problem of local rupiah financing attributable, in part, to the world-wide recession and depressed prices for key export commodities. Management and coordination need strengthening. Planning and implementation functions are neglected due to lack of full-time staff. Policy issues exist which affect the intended scope and direction of project activities.

3. After three years of the five-year project, only 11% of USAID loan funds and 35% of USAID grant funds have been expended. Procedural delays, ambiguities and gaps in the Project Paper, and conflicting signals derived from organizational and policy changes within the AARD system are problems identified by the Evaluation Team.

4. The Project is currently operating with little more than one half of the technical assistance expertise planned. The Contractor has supplied 14 long-term experts (52 person years are called for) and only four of the planned 24 person months of short-term consultancies have been expended. Delays in construction and equipment procurement caused by AARP policy and organizational changes have curtailed the Contractor's ability to move forward on long-term personnel assignments.

5. A key problem is that AARP lacks staff experienced in building research facilities of the magnitude envisioned in this project. Fifteen structures have been constructed and turned over, all at Bogor, site of the Central Research Institute for Food Crops. Three more are under construction. [Note: 400 buildings and other structures are to be constructed at 19 different sites according to the Project Paper.] Land ownership certification has been obtained for seven building sites and 11 others are in the certification process. A master contract for Architectural and Design work was signed in 1980 and contracts for each of the three regions were signed in September 1983. Designs have been completed and approved for nine structures and are in process for two more. Tendering of actual construction contracts is well-advanced.

6. Only a small portion of the farm development program, entirely funded by the GOI, has been started. Although the Project Paper implies that all land needed for the sites was already owned by the government, in fact, AARD has had to spend time and money to secure land.

7. No procurement of the $5.5 million worth of equipment and materials called for has occurred although a Procurement Services Agent has been identified and approved by A.I.D. USAID has directly handled the procurement of 71 vehicles; however, the overall target of 109 vehicles may not be achieved.

8. Seventy participants have completed about 117 person-months of overseas training. Plans have been approved for 294 additional person-months. The pace of the overseas program has slowed down because qualified candidates are hard to identify. The pace of the in-country training program has not been as good due to limited facilities and staff.

PROJECT DESIGN & POLICY IMPLICATIONS: The lesson learned is that it was a mistake to design a project of this scope, complexity, and size and yet limit it to five years of life. Conversely, if five years is a maximum time frame, then the project should have been scaled down either in its design phase or early in its implementation. It should be stressed, however, that if a way can be found to solve the procurement impasse, and if AARD and USAID can soon reach agreement on how best to proceed in solving other problems discussed, then, other things being equal, an extension of the project is both appropriate and desirable. The evaluation team has concluded that ample scope exists for highly productive collaboration between AARD and USAID in addressing future needs of Indonesia's agricultural research system and is convinced that lessons learned from AARP, and other current research oriented cooperative endeavors, will help in formulating an effective continuing program of support to this crucially important area.

RECOMMENDATIONS:

The evaluation team made 49 specific recommendations as well as offering general guidelines for developing an Action Plan to cover the final years of the project. The following items are important elements in the agenda proposed for immediate action:

1. The project's construction program should be scaled down as the likelihood of its successful completion is extremely remote. A change in cost-sharing ration for construction is recommended. A more desirable ratio would be 35% GOI and 65% USAID.

2. If the present impasse between GOI and USAID concerning procurement cannot be quickly resolved, and if no feasible alternative solution to the procurement problem can be found, the GOI and USAID should reconsider the project's purpose and viability and reach a decision on whether to continue or terminate the project.

3. AARD and the Technical Assistance Coordinator should develop an Annual Work Plan for the remaining life of the project.

4. A series of workshops to better identify research activities and manpower requirements of rice crop based and/or industrial crop based farming systems for specific agro-climatic zones should be planned and convened.

5. The Data Base Unit within the AARD Secretariat needs strengthening in order to assist AARD in managing personnel, finance and programs as well as monitoring programs critical to the effective operation of AARD.

The Evaluation Team members included Paul J. Stangel, Ph.D., Deputy Managing Director of the International Fertilizer Development Center; Prabowo Tjitropranoto, Ph.D., Director of the National Library for Agricultural Sciences; Douglas R. Pickett, Agricultural Development Officer, Asia Bureau/Technical Resources Division, AID/W; and Kevin A. Rushing, Project Officer/Agronomy, Office of Agricultural Development, USAID/Indonesia.

A STUDY OF THE INDONESIAN LEGAL AID ASSISTANCE PROGRAM

PROBLEM & OVERVIEW: During the first two decades of independence, few attempts were made to establish legal aid activities in Indonesia. Since the advent of the New Order, however, there has been a slow but steady growth of legal aid establishments and an increasing interest among legal professionals in the legal needs of the poor. This resulted in a fledgling legal aid movement during the 1970s. In 1967, the Padjadjaran University of Law Faculty's consultation bureau was reorganized into a legal aid organization for the poor, incorporating classroom training for students on the legal needs of the poor. In April 1971, the Indonesian Association of Advocates (PERADIN) established the first private institute of legal aid, the Lembaga Bantuan Hukum (LBH) of Jakarta. In January 1978, President Soeharto emphasized the importance of equal opportunity for access to justice. In November, a group of Jakarta legal aid supporters held a legal aid conference with Ford Foundation assistance at which a proposal for legal aid activities was ratified. This proposal included plans for upgrading legal aid skills, developing skills for recognizing and addressing the legal needs of the rural and urban poor, research on the legal needs of the poor, support for struggling legal aid bureaus, and increasing collection of legal documents and works on human rights and social justice. The Institute of Criminology (LK-UI) of the University of Indonesia at Jakarta was designated as the information clearing house for the legal aid movement as a whole. However the Government of Indonesia (GOI) Department of Justice opposed any institutional aid for legal assistance and, hence, financial support had to be sought from outside sources.

U.S. ASSISTANCE: To demonstrate its support for human rights and social justice activities in Indonesia, the Carter Administration deemed The Asia Foundation (TAF) as the appropriate non-governmental organization through which USAID/Indonesia could funnel aid to fulfill this goal. In December 1978, TAF proposed "The Indonesian Legal Aid Assistance Program." (PPBHI). The underlying goals involved strengthening government and popular commitments to the rule of law, recognition of fundamental human rights and social justice, and generation of institutions capable of guaranteeing these. A total budget of $419,393 (GA 79-15) was initially approved for Phase I (mid-1979 to late 1981), although later USAID increased its commitment to $508,279. Although A.I.D. approval was delayed by more than one year, TAF used its own resources to begin Phase I activities. The project funded institutions and sub-projects through an umbrella organization managed by staff from the LK-UI, LBH/Jakarta, and the Legal Documentation Center (PDH) located at the University of Indonesia at Jakarta. PPBHI was an intermediary receiving and redisbursing TAF funds for projects carried out primarily by other groups.

Phase II, presented to USAID in December 1980, was a plan to extend and expand certain aspects of the Phase I program through May 1983. USAID/Indonesia supported the Phase II request but lacked funds; thus TAF had to appeal directly to A.I.D. At this point, due to the Reagan administration's policies, the Phase II proposal was rewritten to de-emphasize legal aid and to strengthen the development of the Indonesian legal infrastructure. There was a major shift in sub-projects to emphasize development of regional and national training and research centers. USAID funds ($191,000) for Phase II did not become available until June 1982 and TAF had to again allocate its own resources in the interim.

PURPOSE OF EVALUATION: TAF decided to evaluate the PPBHI program from its inception to the end of 1983 in order to determine whether the December 31, 1983 termination date should be extended or the program terminated at that point. This evaluation considered the accomplishments of completed projects, primarily under Phase I, and inquired into the present status of incomplete projects. Given the time (20 days) available for this study, individual projects received only brief consideration. TAF documents (proposals, status reports, correspondence, and financial reports) were reviewed as were other documents such as study center and legal aid bureau descriptions, course and seminar outlines, and case reports. PPBHI staff, legal aid organization staff, deans and faculty members of major law schools were interviewed. An examination of expenditures for project categories was completed, but no consideration of the appropriateness of expenditures for individual projects was attempted.

FINDINGS:

1. Most of TAF funds earmarked for Phase I PPHBI activities had been disbursed and expended by late 1982. However, $31,831 remained undisbursed in May 1983. In Phase II, whereas some 40% of the funding period had expired at the time of this study, only 8% of the funds had been expended.

2. Phase I accomplishments are substantial and include: 1) assembly and placement of 58 core collections of books relevant to legal aid services; (2) production and distribution of 5000 microfiche prints of 60,000 national laws and regulations; (3) completion of two collections of laws, criminology and police practices and criminal law and social aspects; (4) expansion of a LBH apprenticeship program to permit 30 lawyers and staff of regional legal aid organizations to attend three-month courses at LBH/Jakarta; (5) the conducting of two legal aid and needs of the poor courses, one for journalists and editors and one for recent law graduates; (6) PPBHI-supported clinical training programs in four law faculties; (7) six research studies on the legal needs of the poor, four by PPBHI and two by LK-UI; (8) financial assistance to 30 fledgling legal aid organizations; (9) nine projects started with established organizations to undertake expanded or experimental types of legal aid services; and (10) compilation of two legal textbooks on human rights and the legal problems of the poor and the development of a self-help manual for legal aid groups.

3. A major purpose of the core collections was to serve as a model permitting other organizations to compile and send similar collections on a larger scale. There has been little such response to date and it is difficult to determine what impact the collections might be having on those libraries which did receive them.

4. Due to technical and financial constraints, it was impossible to prepare the number of microfiche copies originally planned (27 copies of 5000 prints) for distribution to law faculties and other central facilities in all 27 provinces. Instead, a smaller set of 1300 prints is being prepared and is expected to be distributed by early 1984 under Phase II funding.

5. LK-UI began publishing a bimonthly bulletin called BAHANA (acronym for Legal Aid, Human Rights, and Criminal Law) in mid-1979. This publication is continuing under Phase II funding.

6. The major ongoing activities of Phase II are: (1) support to Law Faculty of the University of Airlangga in Surabaya for a course entitled Clinical Legal Education; (2) presentation of a two-week course designed to familiarize judges, lawyers, prosecutors and educators with the details of the new Criminal Procedure Code (KUHAP) enacted in 1981; (3) completion of a new, practically oriented case book on criminal procedures code to be used in conjunction with the LK-UI course on the new Criminal Procedure Code; (4) support for the development of special training materials and courses to increase the ability of graduate lawyers to successfully address the needs of the urban and rural poor through legal aid at the Faculty of Law, Airlangga University; (5) production of three films, one of which concerns prison life in Indonesia, another which focuses on the new Criminal Procedure Code, and the third which follows a case through the Indonesian Labo Dispute Settlement Board; (6) production of a simple guide-book describing legal procedures for rural villagers and of brochures, in the form of comic-strip type discussion, describing common legal problems of the poor.

7. Four research projects are being carried out with PPBHI Phase II funding. Three concern the legal needs of the poor and the fourth is concerned with criminal trials.

8. Continuing efforts are being made to publish special legal reference works. Two books were published in December 1983. A checklist of all Indonesian legal periodicals since Independence has been drafted. A subject list of central government publications is being published based on the indexing of 30,000 regulations since 1977. An index to BAHANA covering issues between 1978 and 1982 has been published. Continuing efforts are being made to make core collections available to university libraries and other requesting institutions. An effort has been started to index and catalog all Supreme Court decisions.

PROJECT DESIGN & POLICY IMPLICATIONS: Impressive regional centers of legal competence are emerging in part due to Phase I activities, but Phase II seems not to have continued this development. It appears that it may have been at least in part the shift of PPBHI goals away from the original focus on legal aid that undercut its utility, so apparent in Phase I, as a central coordinating body for the legal aid movement.

PPBHI Phase I can be said to have contributed significantly to legal aid development objectives and to the quality of legal aid services in the early stages.

In Phase II, the imposition of a variety of factors on the situation has resulted in considerable delay in funding, in implementing new projects and in completing some projects started under Phase I. The most important of these was the long delay in USAID approval of Phase II activities which had a profound and negative effect on the progress of Phase II. The delay, through most of 1981 and 1982, resulted in a critical loss of momentum and many of the principal figures became involved in other legal activities. The PPBHI Coordinator, who had been instrumental in the conceptualization and the organization of both PPBHI and the projects, was one of the casualties. The lesson learned in this instance is obviously political: foreign aid projects which are entirely politically motivated will be subjected to change depending upon the prevailing philosophical views. Simply stated, new priorities replace old ones.

Perhaps the most useful lesson was that the major shift in the nature of the program that developed with the change of U.S. administrations-toward direct legal infrastructural development-was not viewed as a negative change by the key figures in the PPBHI. In their view, support for the legal aid movement had always been intended to foster legal development and reform. The Phase II objectives, which were more politically acceptable to the incoming U.S. administration, allowed PPBHI principals to further their original goals.

RECOMMENDATIONS:

1. A more nationally-based umbrella institution is needed with stronger inputs from organizations outside Jakarta and perhaps outside the island of Java as well.

2. TAF should allow a final six-month extension of its funding under INDO-2070, i.e., to June 30, 1984.

3. Strong consideration should be given to direct aid for legal centers primarily within universities.

This report was written in December 1983 by William S. Cole, Ph.D. No professional affiliation is stated.

THE FINAL REPORT OF THE ASIA FOUNDATION'S GRANT TO YAYASAN INDONESIA SEJAHTERA

PROBLEM & OVERVIEW: The growing interest in using the private sector for achieving community participation has led to a proliferation of indigenous non-governmental organizations (NGOs). Many of these are single-purpose or single-sector. As their activities expand, there is a need to provide their fledgling management and administrative capacities with advice concerning the management of resources and to develop communication channels with governmental agencies responsible for monitoring and coordinating their activities. The Yayasan Indonesia Sejahtera (YIS) was created for this purpose.

U.S. ASSISTANCE: YIS received three-year core funding from The Asia Foundation (TAF) under Project #Indo-0086 for the period 1980-1983. Funding was derived from TAF's Operations Program Grant (OPG) from USAID/Jakarta. The principal objective of the TAF grant was to enable YIS to continue to strengthen its institutional capabilities and broaden its activities.

PURPOSE OF EVALUATION: This summary is based on the final report from YIS to TAF and includes a site visit report by an independent consultant.

FINDINGS:

1. YIS has decided to function through a project management system and to charge fees for its consulting services. The system to be implemented will be designed in collaboration with the Jakarta Institute for the Development and Education of Management (LPPM).

2. YIS has taken measures to improve its depth of human resources. These include sending staff to workshops and seminars both in-country and abroad, consulting with a financial expert, setting up a library, and establishing written personnel management procedures. These measures address identified weaknesses in processing and orientation of staff, their supervision and their professional development.

3. YIS has implemented systematic approaches to planning including baseline studies that precede implementation efforts. The organization has built upon its earlier trial-and-error experiences and now sets clear, realistic goals. Process evaluation methodologies, which were the outcome of the YIS monitoring system, have been supplemented by "impact" evaluation methodologies, concepts which were a direct result of two seminars, one in Bali in early 1980 and one in Central Java in October 1980.

4. Requests for consulting services have increased and expanded to include training programs for community development workers associated with local government and NGO projects. New publications and other communication materials such as slide-sound productions are also a growing source of income. YIS was involved in developing the conceptual basis of the monthly baby weighing program adopted by the Ministry of Health as well as the BKKBN.

5. Program coverage has been extended geographically and in terms of activities. Emphasis has shifted from general community development issues to increasing opportunities for employment, income generation, village credit schemes for handicraft production and rearing of livestock, and the introduction of the "arisan" or capital loan used to start a business. Coverage has been extended to East Kalimantan, South Sulawesi and North Sumatra.

6. Relationships with national level government organizations and international development agencies have progressed. YIS is collaborating on different projects with the Ministry of Health, the BKKBN, the World Bank and the OECD.

PROJECT DESIGN & POLICY IMPLICATIONS: YIS has improved many previously identified weaknesses and has began to mature as an institution through systematizing its approach to program management, building on its experience and lessons learned, and by expanding its scope of activities. It has also broadened its human resource inventory. The experiences and lessons learned in the development phase of the organization should also be useful for other non-governmental organizations. For example, YIS has learned that staff working in a flexible atmosphere tend to be more creative and innovative and that greater staff involvement and coordination in a systematized approach to overall planning of the organization's goals and objectives furthers this process. YIS has also learned that clear, written, standardized procedures for personnel management, including recruitment, orientation and supervision criteria, are critical to the development of a viable, dynamic organization. In its development of programs, YIS has increased its involvement in a variety of activities other than health and related problems. This is a result of lessons learned that entry into new areas should be based on the perception of the target group as to what would be most beneficial to the community. YIS' conceptual and management models of "comprehensive" community development should attract the attention of national-level decision-makers and be applied nation-wide. Its new approach to self-sufficiency --the development and marketing of communication materials-- has helped YIS to cover 30 to 35 percent of its 1980-1983 overhead costs.

RECOMMENDATIONS:

It is imperative for YIS to identify and develop possible new sources of income beyond consulting services and the production of communication materials so as to permit continued development of its organization and its programs.

This report was prepared by Dr. Lukas Hendrata, Director of YIS, with staff assistance and is dated July 21, 1983. The site visit report was written by Mary Zurbuchen in June 1983. Her professional affiliation is not stated.

PROJECT ASSISTANCE COMPLETION REPORT OF THE ACEH ROAD BETTERMENT PROJECT - INDONESIA

PROBLEM & OVERVIEW: Promoting and sustaining agricultural development in the Aceh region is viewed in part as a function of improving existing roads and creating new road links from agricultural areas to potential markets. The need to train inexperienced Indonesian general contractors in road building is also recognized.

U.S. ASSISTANCE: The ACEH Road Betterment Project (0497-0241) consisted of a $3 million loan for technical assistance for design, construction supervision, and training, and a $7.3 million loan for the procurement of construction services and commodities over a seven-year period beginning in 1975. The project was designed to assist the Government of Indonesia (GOI) build 96 kilometers of new road between Tapaktuan and Kruengluas (Section I), to improve 117 kilometers between Kruengluas and Sidikalang (Section II), and to improve 105 kilometers of existing road between Kutacane and Blangkejeren (Section III). The project purpose was to promote agricultural development in the Aceh region by improving existing roads and creating new road links from agricultural areas to potential markets. Funding for construction activities was terminated on May 31, 1982.

PURPOSE OF EVALUATION: This is the Project Assistance Completion Report. Since a baseline survey was not performed, it is impossible to quantify improvements in agricultural productivity or assess the promotional effect on agricultural development that may be attributable to the road betterment project in a methodologically acceptable manner.

FINDINGS:

1. The actual outputs at the Terminal Disbursement Date were 101 kilometers of completed roadway between Sidikalang and Tapaktuan and 25 kilometers of completed road between Kutacane and Blangkejeren. However, the GOI, using its own funds, completed the final 80 kilometers between Blankejeren and Kutacane and is in the process of completing the final 112 kilometers of road between Sidikalang and Tapaktuan.

2. The total cost of the project has escalated from an estimated $20.653 million to $51.38 million. A.I.D. participation was fixed at $10.3 million; thus the GOI contribution increased to $41.08 million.

3. All commodity procurement planned in the original project was completed. Technical assistance provided under Host Country contracts with Louis Berger and with RMI providing equipment maintenance expertise was cut off at the time that construction funding was withdrawn by USAID, on May 31, 1982.

4. The A.I.D.-funded attempt at training and upgrading Bina Marga (Road Dept.) personnel resulted in only one adequately trained Resident Engineer and three partially trained engineers on the field office staff. Contributing factors were the remoteness of the area, lack of skilled personnel, low wages and insufficient funding.

5. Approximately $642,000 had to be deobligated because of contractors' inability to complete sections of road construction on time.

PROJECT DESIGN & POLICY IMPLICATIONS: While the initially planned project outputs were not met by the project's terminal disbursement date, the resolve of the GOI to complete the project as originally planned with its own resources is indicative of the fungibility of resources in a project of sufficient importance to the economic development plans of the Host Country. Although it is impossible to quantity improvements in agricultural productivity or development, one only has to make the journey from one end of the project to the other to see a marked increase in the construction of new homes, commercial enterprises and farm structures. The daily increases in cars, buses and trucks carrying passengers, commodities and farm produce is also a visual affirmation of the effectiveness of the project in meeting the stated purpose.

In the lessons learned category, it proved extremely difficult and time consuming to make road construction contractors out of building construction contractors. Although the evolvement of two first class highway contractors took seven years, it is a positive result of this effort that they are successfully continuing road construction in other areas without expatriate supervision or technical assistance. For A.I.D., the lesson learned is that a conventional F.A.R. agreement, based on completion of sub-projects or elements which are "self sustaining units," was not a satisfactory method of disbursing loan funds for this type of project as the first three years were spent on gearing-up and mobilizing resources and no units were produced. This meant that although the GOI was three years into its construction budget, no loan funds were available to facilitate the work. The project disbursement method had to be revised to a fixed percentage payment tied to GOI payment of contractor invoices.

RECOMMENDATIONS:

The project disbursement method in this type of project should be revised to allow a fixed percentage payment (reimbursement) tied to GOI payment of contractor invoices.

The Project Assistance Completion Report was prepared on March 29, 1983 by R.E. Davis, Project Officer, USAID/Jakarta.

JAGORAWI HIGHWAY PROJECT ASSISTANCE COMPLETION REPORT - INDONESIA

PROBLEM & OVERVIEW: The sustained economic development of the area between Jakarta and Bogor has been hampered by the congested use of the single existing highway. In order to remove this constraint and to decrease vehicle operating costs, a new 50 kilometer, four lane divided highway linking the two cities was planned.

U.S. ASSISTANCE: The Jagorawi Highway project (#497-0223) called for a $26 million contribution from USAID and a $39 million contribution from the Government of Indonesia (GOI) over a seven-year period ending December 31, 1982. Construction costs were borne by the GOI. USAID assistance consisted of $4 million loan for technical assistance in design and for supervision of construction and a $22 million loan for commodity procurement. The project's purpose was to increase income of the transportation sector in the Jakarta-Bogor area by decreasing vehicle operating costs, alleviating congestion and decreasing wasted transport time.

PURPOSE OF EVALUATION: The project was designed to increase income of the transportation sector in the Jakarta-Bogor area. However, an actual evaluation mechanism which would measure economic benefits was purposely omitted because the "before and after" test was considered fallacious. Instead, the criteria used were provided by a "with or without" test applied at the onset of the project and based on vehicle operating costs at that time, i.e., with the opening of the road, traffic congestion on the old road was alleviated and travel time was halved. As a result, the success of the road can only be judged based on the those criteria.

FINDINGS:

1. Fifty kilometers of paved, four lane, divided highway with full access control plus sufficient maintenance and traffic control equipment were completed and installed. The GOI cost escalated from an estimated $44.7 million to $65 million. The GOI contribution increased to $39 million to cover these costs as the A.I.D. contribution was fixed at $26 million.

2. In the past three years, the number of vehicles using the new road has exceeded the 30-year projection. In fact, usage on both roads has increased to the point where once again the old road is considered congested.

3. Travel time both ways has been cut in half. Trucks and buses make up roughly 16% of the traffic. Passenger time saving benefits are approximately 50% greater than originally calculated.

4. A plan for the operation and maintenance of the Jagorawi road was submitted by Bina Marga, the Department of Roads. This was then updated and refined by the Consulting Engineers. Frequent trips over the road by USAID Engineers has produced visual evidence that a satisfactory operation and maintenance program is being carried out.

PROJECT DESIGN & POLICY IMPLICATIONS: The successful completion of Stage I of this project in June, 1979 resulted in an agreement between USAID and GOI to use excess loan funds (about $500,000) to complete Stage II. These were committed for the design and construction supervision of an additional two lanes from Bogor to Ciawi as well as a 2.5 km spur at Gadog. The actual construction contract was negotiated with the 18-party Indonesian Consortium of Construction Industries. On December 31, 1982, the Project Terminal Disbursement Date, fully 3 and 1/2 years after Stage I was completed, Stage II was only 13% complete. The lesson learned here is that the advantages of trying to spend every last dollar under an amended project agreement when original project objectives have already been met should be weighed carefully. As well, it was found that a large consortium of contractors is unwieldy and difficult to deal with, especially when fiscal and management responsibilities of the participating firms are ill-defined.

RECOMMENDATIONS:

1. An evaluation process should have been built into the project to assure that progress was as reported, and to review project effectiveness in attaining its purpose.

2. A final impact evaluation should be conducted to determine the contribution of the project toward overall goals.

This Project Assistance Completion Report was prepared on April 11, 1983 by R.E. Davies, Project Officer, USAID/Jakarta.

FINAL REPORT OF THE DEPARTMENT OF TRANSMIGRATION PROJECT LUWU - SOUTH SULAWESI INDONESIA

PROBLEM & OVERVIEW: Kabupaten Luwu is a 17,791 square kilometer area northeast of the city of Ujung Pandang in the province of South Sulawesi on the island of Sulawesi. The economy is primarily agriculture with rice being the principal crop. Arable land in 1980 was about 132,400 hectares. The amount of undeveloped land with economic potential is estimated to be 787,000 hectares. In the 1930's, the northern portion of the Kabupaten or the North Luwu Plain was designated as an area to which migrants could move from the more populous islands of Indonesia. Work was begun in that period on construction of roads, clearing land for agriculture, and irrigation systems. World War II and subsequent political problems interrupted and delayed these development activities. New efforts toward development of the region were started in the mid-1970's. Between 1970 and 1981, 42,744 persons arrived from other islands and the population was growing at a rate of 4.8 percent per year. This high rate reflects in part the unmeasured but significant amount of government sponsored and spontaneous immigration during that period.

U.S. ASSISTANCE: The Luwu Area and Transmigration Development Project is an eight-year, multisectoral, integrated rural development project, the first to be completed in Indonesia. The Project Agreement was signed on October 23, 1975. The project's goal is to improve the conditions of the rural poor in Luwu by making their activities, basically small farming, more productive, thereby increasing their incomes. Involved is an effort to coordinate the planning and implementation of rural development sub-projects under the jurisdiction of the Ministries of Transmigration, Public Works, Agriculture and Trade and Cooperatives. The principal activities undertaken include: 1) upgrading 176 kilometers of main trunk road and 1,317 meters of bridges through Kabupaten from Palopoto Malili; 2) rehabilitation, extension of and/or establishment of an operations and maintenance program for Bone Bone and Kalaena irrigation systems; 3) establishment of four pilot Farm Service Complexes [Farm Cooperative Centers (FCC) and Rural Extension Centers (REC)]; 4) creation of a project organization supported by training and foreign technical assistance; and 5) transmigration of 1,200 families (later reduced to 700) to farm the newly irrigated areas over a four-year period. Total funds expended: Rps. 31.7 billion. USAID provided $18,287,000 including $4.8 million or 42% of the Luwu irrigation programs; $1.1 million, or 45%, of the farm service center activity; $8.2 million, or 33%, of the road betterment subproject; and $550,000, or 42%, of the project management costs. Total foreign exchange costs: $7,758,000. The Netherlands government has participated through the grant financing of a team of irrigation advisors to assist the Directorate of Water Resources Development with the design of irrigation systems. The U.N.D.P. was providing technical assistance and training to the Directorate General of Transmigration for the overall Indonesian Transmigration Program.

PURPOSE OF EVALUATION: This report constitutes the final report to USAID and the GOI from Checchi and Company and Daniel, Mann, Johnson & Mendenhall, two firms who contracted by means of a joint venture to provide technical advisory services for implementation of the project.

FINDINGS:

1. The Palopo-Malili Highway was completed by December 1983 at a cost of Rps. 16,766,000 of which $7,823,000 came from the USAID loan. Travel time is less than three hours. A major lesson learned is that more attention should be paid to the quality of the design, in the case of major construction, prior to letting the construction contracts. Expatriate engineers were not brought in until after the Luwu road contracts were signed. Only then did it become known that the road design was unusable. Another lesson learned is that the project plan must be very carefully laid out and coordination between the host and the donor must be close and thorough to ensure a complete understanding about what is to be done. Although the road design started in 1974, the Road Department did not finally decide the highway cross section or surface specifications until 1979, many months after construction contracts had been signed.

2. Nearly 100 percent of the Bone Bone and Kalaena systems have been constructed at a total cost of Rps. 8.8 million, but only 77 percent of the areas are currently under irrigation. Initially inaccurate and inadequate soil survey information and failure to build into the irrigation system design key information such as that

pertaining to types of soils prevalent in the area have caused many delays and changes during construction. Faulty design and construction of irrigation structures and poor water management have been major problems as well. By the end of 1983, 6,722 hectares in Galaena and 1,758 hectares in Bone Bone are to be under irrigation. A study entitled "Hydrology and Water Resources for Kabupaten Luwu" was completed by the technical advisory group. Of the USAID loan, $3,254,000 was spent on the irrigation subproject.

3. Surveys done in 1982 and 1983 showed that the percentage of newly irrigable area actually planted amounted to 58 percent and 63 percent respectively. A number of technical, financial, administrative, and operational factors, as well as land ownership patterns have been suggested that may account for this underutilization.

4. Sales of input supplies by the Farm Cooperatives Centers (FCC) have surpassed the final annual target by 176 percent and the marketing system has reached 80 percent of the target. Three FCCs are in operation. A fourth, in South Luwu, is 30 percent completed. A total of Rps. 1,375,000 was expended on FCCs. Of the USAID loan, $731,000 was expended on this component.

5. The RECs have now completed their extension activities and have participated in extension programs outside of the Project Luwu framework, most notably in the Lappo Ase program. Because of an extremely high response to livestock inoculation programs, the RECs have already attained 233 percent of their goal for extension contacts with 22,428 farmers. The major lesson learned has been that a meaningful degree of coordinated agricultural extension service can be achieved even without a workable organizational structure mandated by provincial and national authorities.

6. Most of the effective coordination among the five Ministries' agencies and staff took place at the project location in Palopo through monthly coordination meetings held with all subproject managers. One local coordination difficulty was that between the project offices in Luwu and the regular service offices of the government in the Kabupaten. Communication between the project site and Jakarta has also proven to be difficult at times. However, it is at the national and provincial levels where coordination has been most obviously lacking.

7. In terms of Goal Achievement Progress, eight measures of annual average growth rate were developed by the Management and Technical Assistance Consultants and used in previous annual reports. Statistics presented in their report support the thesis that both the Gross Domestic Product and the Net Food Farm Income Per Capita in Kabupaten Luwu are on a general upward trend since the start of Project Luwu in 1977. This trend was arrested as the impact of the world-wide recession reached Luwu in 1982-83. However, the GDP Per Capita reached $312 which is more than triple the $96 found in the benchmark year (1975-76). It is also significant that the percentage retained in Luwu increased from 50 percent to 59 percent.

PROJECT DESIGN & POLICY IMPLICATIONS: In terms of the major project components, there are several aspects which demand attention. (1) Overall programs for road maintenance and for irrigation maintenance have not been established. The main issue facing operation and maintenance of the primary and secondary canals is that of proper equipment maintenance. Water flow in the canals is still not controlled technically to ensure equal distribution throughout the entire system, and collection of water user fees to help support the maintenance costs has not been initiated. (2) With regard to the FCCs, although the concept has proven to be quite effective, unfortunately, the basic organizational structure and the method of evaluation of a cooperative organization is basically contrary to government policy. The participation of the Directorate General of Cooperatives has been minimal and the FCCs have no legal status within Indonesia. This indefinite status is probably the most critical issue facing them at this time. (3) The future of the RECs is in doubt due to a combination of uncertainty regarding follow-on funding sources and questions regarding their future management. No organization structure or permanent funding source has been identified to date. (4) A long term coordination difficulty at the local level is that between project offices in Luwu and the regular service offices of the government in the kabupaten. Methods must be found to include local service offices more closely in project implementation with funding and training built into these solutions. The service offices are left with the responsibility to continue the program, yet they tend to be peripheral to actual project implementation. (5) Finally, increased funding will be required in the future to ensure a properly

operating Bappeda planning office which can attract and hold skilled personnel now that the project office will be closed. The major lesson learned, as illustrated by the foregoing points, is that while a "Project" is a development convention created for the convenience of donors and cooperating host governments, it is, in fact, merely an index to a development continuum, a way of earmarking time and funds, and does not obviate the critical need to "think beyond" the project's horizon nor to deal with "spill over effects" regardless of their positive or negative characterization.

RECOMMENDATIONS:

1. National Project guidance committees at the Directorate General level should meet at least once a year to discuss the project, long-term maintenance issues, and the implications of the project on development programs in other areas of Indonesia.

2. A workshop should be held in Palopo to discuss the future operation of the four RECs following the termination of Project Luwu.

3. A PUSKUD Kabupaten Luwu should be formed to assume the management of the FCCs following Project Luwu.

4. The irrigation sub-project should place a greater emphasis on operations and maintenance requirements. Intensive training of water users associations is needed to ensure that water is distributed throughout each of the systems in the most equitable way. Better inspection of irrigation construction is needed at regular intervals to ensure conformance with design specifications.

This report was conducted by staff of Messrs. CHECCHI and Company and Daniel, Mann, Johnson and Mendenhall and is dated December 1983.

PROCESS REVIEW OF THE COMPREHENSIVE HEALTH IMPROVEMENT PROGRAM - PROVINCE SPECIFIC - INDONESIA

PROBLEM & OVERVIEW: During the 1970s, the Government of Indonesia (GOI) made impressive strides in improving the health infrastructure of the country. The health policy of the country is comprehensive and is considered by some to be a model among developing countries. Primary health care plays an important role and all major components of a complete health program are included in planning documents. Despite these efforts, the health status of the population, especially in the rural areas, has remained considerably below the standards desired by the government. Only 20 percent of the population uses the health centers. Thus, while the quantity of health services has increased in terms of manpower and facilities, the GOI has become increasingly concerned that the quality has not kept pace. Upgrading the health services is, therefore, a major thrust of Repelita IV (4th Five Year Plan). Two of the significant changes in the approach to rural health care being discussed are integration and decentralization.

U.S. ASSISTANCE: The Comprehensive Health Improvement Program - Province Specific (CHIPPS) is an initial, somewhat revolutionary effort by the GOI to improve the provincial health staff's capacity to identify and solve their special needs. Its operates in three Provinces: D.I. Aceh, Sumatera Barat, and Nusa Tenggara Timur, all of which are Outer Islands. The project has two basic components: manpower development and health systems development and delivery activities. CHIPPS is a five-year project (100% loan but later changed to 33% grant) agreement which was signed September 30, 1981. Little project activity could begin, however, until the loan funds were put into the GOI's approved budget (DIP) for 1982-83 in April 1982. [Note: No project purpose or goal is mentioned in the evaluation document. The project number is not mentioned and no funding level is specified.]

PURPOSE OF EVALUATION: Primary attention in this process review is on the health service development component. The evaluation assesses project experience to date, identifies the lessons learned in the initial efforts and recommends a refined strategy for addressing obstacles that continue to affect implementation. The review focuses on the management of the provincial and central Project Implementation Units (PIU), and central concerns which revolve around project implementation dynamics, including the administrative structure of the PIUs and existing procedures related to their management selection, design, funding, implementation, and evaluation of sub-project activities. A team of eight including representatives from the Ministry of Health (DepKes), and Yayasan Indonesia Sejahtera (YIS), led by an American contractor, carried out field visits, discussions and interviews with project related personnel and reviews of project related documents.

FINDINGS:

1. Implementation was delayed by over one year due to serious problems regarding the timing for the project's startup, source and nature (loan or grant) of project funding, and by lack of understanding/agreement among the host agency (DepKes), BAPPENAS (National Planning Board), and the GOI's Office of Budget and Planning (DIP). These problems delayed the selection and arrival of the long-term technical assistance advisory team (LTC). Thus the project is just beginning its second year of funding and is even younger if the arrival/positioning of the LTCs is considered.

2. The PIU in Sumatera Barat has not functioned with any degree of regularity or effectiveness during the first two years of the project. The LTC has not yet arrived. Most activities to date have involved training of medical students and nurses in community health.

3. The PIU in D.I. Aceh has rarely met and the Provincial health personnel are not oriented to the objectives of the project. However, the Project Director has developed a new idea for reducing the size and increasing the effectiveness of the PIU. The LTC is in place and through his efforts, including the holding of a 10-day epidemiology and management workshop, traditional attitudes are beginning to change. Training activities are well underway. Project activities are hampered by the lack of vehicles. The DUP/DIP budget process is also an obstacle to project activities as is illustrated by delays in authorizing the Nutrition Survey.

4. The PIU in Nusa Tenggara Timur (NTT) is not functioning and the project is managed by the Primary Health Care Division of Depkes. The nutrition staff and the health education staff have little knowledge about CHIPPS. The Project Director is still under going training. The LTC arrived only in late February 1984. Implementation is further hampered by widely dispersed project sites on four islands and non-arrival of project vehicles. However, this province has achieved some degree of flexibility in budgeting. There is no medical faculty in the province, but nurses' training has started and their field training is occurring with CHIPPS support. Community involvement has considerable history and support from the governor's wife.

PROJECT DESIGN & POLICY IMPLICATIONS: The implementation of the CHIPPS concept requires considerable time. It is a "process" project that depends on the education and involvement of officials on the benefits of the problem-solving approach which the project advocates. Thus, it is unrealistic to expect significant progress after such a limited period of operation. Implementation of the concept is actively underway in one province and only beginning in the other two. Principal problems include the difficulty of reorienting officials and staff and the non-functioning of the PIUs at both provincial and central government level. Insufficient attention is paid to follow-up of process factors and the lack of process indicators by which to measure performance is confusing. There is no log-frame or clear project reporting procedure, and the rigidity of the existing planning process hampers innovative solutions and problem-solving efforts.

With the benefit of hindsight, it is clear that the project should have started as grant-funded. The original policy decision for loan funding forced CHIPPS to operate in an environment that offered little, if any, flexibility in order to implement its objectives which call for maximum flexibility. Consideration must be given to project objectives when determining whether it should be fully loan, partially loan, or fully grant-funded. Process projects should be given priority consideration for grant funding so that they have greater opportunity to carry out innovative activities and programs by which to demonstrate the value of new approaches and structures. A second concern involves the BAPPEDA structure (Regional Planning Board). If the health sector is going to decentralize effectively, the local planning authorities must be capable of responding. However, they currently do not have the technical capacity to fulfill this role. Unless steps are taken in the near future to strengthen their technical capabilities in the health sector, the CHIPPS process is very likely to outpace their capacity to respond.

RECOMMENDATIONS:

1. A long-term Indonesian consultant should be identified/appointed to monitor the process issues.

2. A number of process indicators that will help focus project orientation and activities and permit monitoring and evaluation should be finalized and incorporated into the program.

3. An informal committee of three senior officials from DepKes and BAPPENAS and three health-related professions from non-Indonesian government organizations should be formed to respond to the process feedback and plan strategies for problem-solving.

4. PIUs should be formed at both provincial and Pusat levels and should meet according to a set schedule.

5. One kabupaten in each province should be made a model for the CHIPPS approach.

6. Epidemiology and Management Workshops should be conducted in Sumatera Barat and N.T.T. as soon as possible.

7. An outside team should review the process in one year to determine what progress has been made on these recommendations and identify existing process issues and concerns.

This evaluation was conducted in May, 1984 by: Dr. David F. Pyle, Senior Associate, JSI; Drs. Pong Tengko and dr. Indyati Erlan, Planning Bureau, Depkes; dr. Roedjito, CDC, Depkes; dr. Bimo and dr. Mona Lisa Hitalia-Prawire, Yayasan Indonesia Sejahtera; dr. Benny Kawengian, Inspection General's Office, Depkes; and dr. Rusjda, Binkesmas, Depkes.

ASSESSMENT/REDESIGN OF THE CATHOLIC RELIEF SERVICES P.L. 480 TITLE II PROGRAM IN INDONESIA

PROBLEM & OVERVIEW: The Government of Indonesia (GOI) recognizes malnutrition as a serious national problem. Several studies, including a USAID document Background Information for USAID/Indonesia, Indonesia Nutrition Strategy - January 1983, examine the seriousness and extent of malnutrition among children ranging from 6 months to 6 years of age. Sixty-nine percent suffer from severe malnutrition and a total of 89 percent suffer from malnutrition ranging from severe to mild. Low levels of food consumption are a major contribution to the high prevalence of protein/calorie malnutrition (PCM) in children which is one of the most widespread and important forms of malnutrition.

U.S. ASSISTANCE: The Food for Work and Food and Nutrition programs of Catholic Relief Services (CRS), and the counterpart organizations through which CRS implements its program, support GOI activities designed to improve nutrition levels of the poor. CRS began operating in Indonesia in 1957. During 1982, CRS food and medical assistance was over 16,000 metric tons of commodities reaching approximately 250,000 recipients in 15 of Indonesia's 27 provinces, or 95% of all recipients of Title II food commodities in Indonesia. The total value of all CRS assistance in 1981 exceeded U.S. $9 million. Of this amount, $5,619,915 was P.L. 480 Title II commodities (14,906 metric tons of foodgrains and vegetable oils). Government counterparts for CRS are the Departments of Health, Social Affairs, Home Affairs, and Transmigration. Church World Service (CWS) also handles Title II foods. CRS's FY 1984 program has an approved level of 203,500 recipients and CWS's, 11,475.

PURPOSE OF EVALUATION: The purposes of this assessment/redesign are two: (1) to assess the on-going Title II activities from program content and management perspectives and gauge the likelihood of achieving objectives; and (2) to prepare a revised plan of action for the next three years. This plan was to include recommendations regarding commodity and funding levels, a program strategy to achieve these objectives, and a monitoring and evaluation system. The FFW program had not been evaluated previously in terms of its development impact

FINDINGS:

1. At present, there is no national program framework for Title II activities. CRS imposed a uniform operating and monitoring system on the counterparts (CRS Title II Operations Manual) which is designed to assure that the foods reach the intended recipients and is primarily concerned with commodity accountability.

2. CRS is a sponsoring agency and supports the activities of a number of non-governmental organizations called counterparts, six at present, plus the Department of Transmigration, GOI. There are important differences in the relationship CRS has with each local implementing counterpart organization. Activities essential to determining program achievements have to be agreed to and carried out by the counterparts. Actual programming of food commodities is left to the discretion of the counterparts. CRS is primarily concerned with monitoring and auditing rights and the submission of periodic reports.

3. CRS began the process of creating a more uniform approach for the Food for Nutrition Program (FNP) by organizing two seminars which included all the counterparts to discuss program redesign. These seminars resulted in the decision to implement a FNP approach with seven basic components. No similar discussion has taken place on the Food For Work (FFW) program.

4. The CRS headquarter's staff needs to significantly upgrade its ability to provide technical support to the counterpart programs, and, in particular, to add technical planning and advisory skills to its logistics/accountability components. Although CRS and the counterparts have trained 115 staff members, they are preoccupied with problems of logistics and accountability. Little attention is paid to the qualitative aspects of their programs.

5. Coherent program management has not been possible for the past few years. Funding levels for CRS and its counterparts are dependent on volume of food supplied and type of recipient. Counterparts receive much higher contributions from recipients for FNP rations than they do from villages or local government for FFW projects. CRS and the counterparts first expected the Title II program to be phased out and then were required to shift a substantial portion of their recipients from FNP to FFW at a time when they were trying to upgrade the FNP.

6. The impact of FFW projects on villages, workers and the workers' families cannot be determined precisely in the absence of baseline information on projects. Generally, impact appears to be favorable as is noted in the case studies. Most FFW projects usually benefit the poor in non-specific ways as they add to the rural infrastructure. However, communities incur substantial costs in carrying out projects. The lack of a system to identify specific, collective and substantial benefits expected from projects, and to monitor and evaluate projects to determine that these are achieved, is a serious problem.

7. The FNP suffered from a lack of clearly defined program goals, although changes have been made over the past year. In April 1983, the counterparts and CRS articulated a program with specific components of recipient commitment, targeting, food distribution, a growth surveillance system, training, nutrition education and income generation. Counterparts began FNP with a highly welfare oriented approach, emphasizing food distribution as an incentive for participation in nutrition programs rather than the technical aspects of the program. Accountability was emphasized in the past few years when the counterparts expected imminent phase-out of supplies.

8. The major difficulty with assessing impact of the FNP was due to the vagueness of the program's purpose. In addition, there is an inherent difficulty in using growth surveillance data collected for educational and administrative purposes for statistical analysis.

PROJECT DESIGN & POLICY IMPLICATIONS: The Food and Nutrition Program contains elements found to be correlated with improvements in nutrition status in evaluations of Title II programs in other countries. The Food for Work Program also shows favorable impact indicators. The lack of a system to identify specific, collective and substantial benefits is a serious design flaw. However, CRS is not an executing agency which could participate in the preparation of the design, agree on the outlines of an implementation strategy, and proceed to implement an USAID-approved plan. CRS is is a sponsor for a variety of local non-governmental organizations, called counterparts, who have differing objectives, cost positions, and local and governmental operating environments. For any multi-year program plan to succeed in achieving its objectives, it must be developed in conjunction with these organizations.

RECOMMENDATIONS:

1. A national program framework should be created for the CRS and counterpart activities. Overall program goals and purposes should be defined for both FNP and FFW. There was not sufficient time provided to reach agreement on the objectives between CRS and the counterparts, essential for the accomplishment of the redesign element, during this assessment/redesign mission

2. The team recommends that 1984 be treated as a transition year during which a multi-year plan is prepared for the ensuing five years. It also recommends that the overall budget for the Title II program be maintained at the FY 1984 funding level through FY 1989.

3. The overemphasis on food accountability, both in terms of personnel and systems, should be addressed primarily through staff reorganization and training at both CRS headquarters and counterpart levels. A FFW advisor position should be established complemented by a technical consultant.

4. Three principal issues involving the FFW program should be resolved before the objectives of the program can be agreed to and plans made for the future operation of the program: (1) the mode of labor organization; (2) maximizing FFW benefits to the poor; (3) increasing resources for programs in the Outer Islands.

5. Both the goal and the purpose of the FNP program need to be defined in terms of components of the program as well as in terms of improvements in nutritional status. [Note: The evaluation team prepared revised goal and purpose statements for the program and indicators of purpose achievement.]

The evaluation took place in October 1983. The team consisted of Judy C. Bryson, Team Leader; William S. Cole, Ph.D.; Mary P. Johnston; and Alma Q. Kern. The evaluation was conducted for USAID/Jakarta by the International Science and Technology Institute, Inc. under contract no. PDC-0000-I-05-3083-00.

CREDIT TO INDONESIAN ENTREPRENEURS: AN ASSESSMENT OF THE BADAN KREDIT KECAMATAN PROGRAM

PROBLEM & OVERVIEW: Indonesia (GOI) has a variety of credit programs designed to aid petty traders and small-scale entrepreneurs. Many of these were launched in the early 1970's after a period of political instability in order to directly channel funds to rural entrepreneurs. Loans through these programs ranged from Rp. 3,500 ($5) up to Rp. 500 million ($750,000) for medium-scale industries. The nominal interest rate for most all programs was about 1 percent per month. Since the average inflation rate between 1972 and 1980 was 20 percent, this low interest rate caused the decapitalization of all credit programs except that of the Badan Kredit Kecamatan (BKK). The BKK, started by the governor of Central Java in 1970, was founded on several key distinguishing elements designed to avoid those that were generally held responsible for the failure of sibling models. The BKK program is composed of 486 BKK each of which is an independent sub-district credit institution that is locally administered and financially autonomous, although subject to instructions and guidelines from the provincial government.

U.S. ASSISTANCE: The BKK's objective is to provide small, short-term loans to rural families, primarily for off-farm productive purposes. It is designed to service Central Java's rural poor, for whom credit is both limited and expensive. The primary goal of the BKK program is to supply capital through a convenient mechanism that charges a reasonable interest rate but still earns a profit. The BKK program was capitalized in 1972 with a Rp. 200 million ($476,190) loan from the Central Java Provincial Government. As of July 1982, the BKK had made over 2.7 million loans, totaling Rp. 36.9 billion (U.S. $55.1 million), and had accumulated Rp. 792 million ($1.2 million) in savings primarily through the forced savings component.

Foreign technical assistance and capital injections to the BKK program are being applied as part of the Provincial Development Program (PDP). A.I.D. support to the PDP involves two different sets of bilateral grants (#497-0264, #497-0276) and loans (#497-T-047, #497-T-058) totaling $32.8 million. The PACD for PDP-II is May, 1985. Other donors contributed $15.33 million and the GOI, $39.33 million. PDP is currently operating in five provinces in Central Java: Demak, Kudus, Jepara, Rembang, and Pati. The PDP granted about Rp 327 million ($500,000) to establish a revolving fund within the Bank Pembangunan Daerah Jawa Tengah (BPD, the Central Java Provincial Development Bank) for the 65 BKK in the PDP area. PDP has also provided technical and financial assistance to assist in the rehabilitation of failed or weak BKKs and for expansion and diversification of successful BKKs.

PURPOSE OF EVALUATION: This evaluation of the BKK program is the third of four field studies to test methods to evaluate the impact of small-scale enterprise development projects. Field work for this study was conducted during six weeks in Indonesia. The BPK, Badan Perencanaan Pembangunan Daerah (BAPPEDA, the Regional Development Planning Body), A.I.D. (Jakarta and Washington), and the Central Java Enterprise Development Project planning team all participated in planning, implementing, and funding the evaluation. Its objectives were to analyze the administrative and financial operations of the program and to assess its income, employment, and social impact on BKK clients and their communities, and to offer recommendations for future program development.

FINDINGS:

1. The PDP has contributed to the development of the successful BKK model. The PDP grant enables the BPD to relend BKK principal repayments, thereby allowing BKK to grow faster and provide a continuous source of income to cover BPD costs. PDP technical assistance has helped to develop a classification system to stratify BKK by the overall magnitude and viability of their lending operations. This has allowed the BPD to assign credit ceilings based upon a BKK's economic soundness. This classification system is now applied to the entire BKK program. PDP technical assistance and capital infusions were responsible for decreasing the number of BKK ranked as Class V in the PDP area from 26 to 7 within three years. [Note: About one-third of all BKK are either operating at very low levels or have closed.]

2. As a whole, the BKK program is on sound financial footing. Indicators of BKK financial structure and viability are: (1) productive use of assets with over 90% held in outstanding loans; (2) 2.6% average loan portfolio turnover in 1981; (3) 6% delinquency rate (if loans delinquent more than 6 months, currently about 14% of all loans outstanding, are written off); (4) profits of Rp. 693 million ($ 1.08 million) in 1981-a 24% return on the average 1981 loan portfolio (7% if all subsidies are removed); (5) current monthly effective interest rates of between 5.6% and 10.8%; (6) a 55% compounded annual equity growth rate; and (7) a 0.56 debt to equity ratio.

3. Most local BKK staff appear to be well trained and efficient. In 1981, they made an average of over 200 loans per employee at a cost of about 13% of the value of these loans. 1,200 employees disbursed about 270,000 loans totaling Rp. 7.7 billion ($12 million) at an operating cost of about Rp. 1 billion ($1.6 million).

4. The only major current discrepancy between the policy and the procedures of the BKK exists in its savings program. Although borrowers theoretically have full access to their savings once their loan has been repaid, some BKK obstruct withdrawals to maintain higher lending levels.

5. BKK loans have promoted the expansion of most borrowers' businesses. Petty trading is the primary activity (over 50% of total borrowers) and farming, the secondary. In addition to improving on-going activities, about one-fourth of BKK clients have begun new economic activities. Almost all clients use their loans as working capital to buy raw materials for production, or goods for resale. BKK client success has had more backward linkages and income multipliers, whereas effects of forward linkages and consumer surplus have been minimal.

6. The BKK client profile indicators are very encouraging. (1) 60% are women; (2) over 60% of rural clients and about 45% of urban borrowers either have received no schooling or have not completed primary school; (3) most borrowers live in the same village where their BKK office is located; (4) more than one-third have borrowed from other credit sources; (5) over 40% have savings accounts outside their BKK in addition to their BKK savings; (6) the average BKK loan is about Rp. 60,000 ($90) for the same and Rp. 34,000 ($50) for the entire program including Class V BKK; and (7) the average borrower has quadrupled his/her loan size within four years and received over 13 loans.

7. BKK loans have had a positive, although moderate, effect on employment. Underemployment has been reduced, as over 60% of BKK borrowers now spend more time on their business. Moreover, 17% have hired new full and/or part-time workers. The average sampled BKK client created 0.3 new full-time jobs and 0.4 new part-time jobs.

PROJECT DESIGN & POLICY IMPLICATIONS: The BKK program has contributed significantly to village and area development in Central Java, but it is still a long way from fully servicing the province's demand for rural off-farm credit. In terms of community coverage, the BKK program is large when compared with similar credit programs. However, there is still a large unmet demand for credit in rural Central Java, not only in the province's villages not yet covered by the BKK program but also in those villages where there are active BKK. The BKK's short-term target is to establish one BKK post for every two villages. Under this assumption, the existing 1,300 BKK village posts now cover 2,600 villages. This represents only 30% coverage of the 8500 villages in Central Java. Survey results indicate that each village may require its own BKK post to deliver the effective service and convenience desired by BKK borrowers.

BPD supervision of the BKK program, although well executed, has two shortcomings whose importance will increase as the program grows. The BKK unit at BPD headquarters is thinly staffed for a multi-billion rupiah, widely dispersed credit program leaving the program vulnerable to the performance and availability of a few individuals. Moreover, the BPD itself is highly centralized and is reticent to delegate significant authority to its BKK supervision unit which, in turn, is reluctant to delegate authority to its field supervisors. Overcentralization has sometimes impaired the speed and relevance of BPD responses to BKK program needs and contributes to the underutilization of highly qualified personnel.

The BKK program has had its most significant community impact in areas where the district commissioner views the program as a vehicle for district-wide development, rather than simply as a collection of sub-district credit organizations. Lack of consistent financial and administrative district support has damaged several BKK.

RECOMMENDATIONS:

1. The program should continue to receive external technical assistance through PDP or a subsequent A.I.D. project.

2. The practice of forced retention of savings should be terminated before any voluntary savings program is attempted.

3. Additional problems that government officials will need to address for further development and institutionalization of the BKK program are: (1) revival of Class V BKK; (2) diversification and expansion of BKK loan portfolio; and (3) attraction, training, and retention of high caliber personnel.

This evaluation was contracted by A.I.D. to Development Alternatives, INC. (DAI). The field evaluation was performed by Susan Goldmark and Jay Rosengard in November-December 1982. They were assisted in background research on credit programs in Indonesia by Nancy Straughan.

MID-PROJECT EVALUATION OF THE WESTERN UNIVERSITIES AGRICULTURAL EDUCATION PROJECT - INDONESIA

PROBLEM & OVERVIEW: Indonesia, although possessing a variety of mineral and petroleum resources, is primarily an agrarian society with the majority of the population dependent upon agriculture for their living. With an increasing population, the pressure on arable land to provide the food for the nation's millions grows exponentially although the amount of available arable land decreases. As a result, more sophisticated technologies and methodologies are required to improve agriculture productivity.

U.S. ASSISTANCE: The Western Universities Agricultural Education Project (WUAE - #497-0297) is a five-year Title XII institution-building project designed to strengthen the faculties of agriculture and related disciplines in 11 institutions and to foster the creation of inter-university networks to improve teaching, research, and public service. The member institutions include the Association of Western Universities (BKS-B) located in Sumatra and West Kalimantan. Project activities began in July 1981 and are implemented in part by the University of Kentucky. Major inputs are: (1) advanced degree training in Indonesia (105 S_2 and 40 S_2 degrees) and in the U.S. (53 staff members for M.S. and 14 for Ph.D. degrees); (2) technical assistance (including long-term professional faculty, International Education Specialists and English language trainers); (3) commodities including books for libraries and equipment for laboratories and farms ($660,000 in USAID loan funds; $625,000 equivalent from the Government of Indonesia); and (4) a $1 million fund to promote inter-university collaboration, short courses and networks.

PURPOSE OF EVALUATION: The purpose was three-fold: (1) to review project implementation to determine whether the basic goals and objectives were being met; (2) to recommend changes for the remainder of the project period; and (3) to make recommendations for consideration in planning a Phase II project. The evaluation was collaborative involving three U.S. members and two representatives from the Ministry of Education of Indonesia (DGHE). The entire team worked for three weeks in Indonesia. Major documents reviewed included the Project Paper, Minutes of the Policy Steering Committee meetings, Annual Evaluations and Workplans, Status Reports on TEFL activities and reports of activities of various education specialists. Seven institutions were visited and interviews were held with government officials, faculty, advisory team members and returned participants. Two U.S. team members later visited the University of Kentucky campus and interviewed faculty members, Deans, former advisory team participants and Indonesian participants.

FINDINGS:

1. There are currently 33 M.S. participants studying in the U.S. and there are 10 participants who have completed M.S. degrees and returned to Indonesia. Five more completed M.S. degrees and started Ph.D. programs. Four students returned to Indonesia without degrees. Currently eight doctoral participants are studying in the U.S.

2. The numbers of in-country WUAE participants from the BKS-B institutions in 1982 and 1983 were 109 at the M.S. level and 14 at the Ph.D. level. While in-country M.S. training is on target, it appears that Ph.D. training will fall short.

3. A total of eight short courses had been held as of December 1983 and 188 individuals had been trained against a project target of 17 courses.

4. A total of 168 of the proposed 250 staff members have taken intensive English language training.

5. A total of four senior faculty members, four International Education Specialists, and seven English Teaching Aides are serving as technical advisors and staff to the project and affiliated institutions. In addition, 15 short-term personnel have provided approximately one month each of technical assistance in different areas. Five English Teaching Aides completed one-year assignments and returned to the U.S. One long-term staff position is under recruitment as is one English Teaching Aide and two International Education Specialists.

6. $350,000 of USAID loan funds have been spent on library resources. This includes 600 different titles and 10,875 volumes. So far the GOI has not provided support in these areas.

7. The project has not yet addressed directly the issue of public service and of increasing the number of extension-type publications. It has sponsored short courses in extension methodology for university staff but not for other civil servants. However, the GOI is establishing public service institutes at each university.

PROJECT DESIGN & POLICY IMPLICATIONS: It is apparent that the task of adequately preparing students in English language and basic sciences, although anticipated in the project design, is greater than was originally envisaged or planned, and experience has shown that training periods for M.S. and Ph.D. degrees exceeds the time originally allocated. The placement of a large number of students at one University, while providing support and building cohesion among students, also has a detrimental effect on their English language capabilities. A principal weakness found in candidate screening procedures and criteria, particularly in a project with as many institutions involved in selecting candidates as this one, is the difficulty in obtaining complete and accurate information about nominees. Without an effective external review and selection process, there is the likelihood that some well qualified candidates may never surface and that some less qualified ones will take their place. Finally, the return on the participant trainee investment may well be minimized as a result of inadequate basic support once the training process is completed, particularly in the areas of equipment, library materials, laboratories, and operating budgets. Although called for as part of the GOI contribution, these have not always been available.

RECOMMENDATIONS:

1. Support should continue to be provided to the participant trainee program at both the M.S. and Ph.D. levels using currently available resources. The remaining commodity funds should be shifted to support additional trainees. Immediate planning for a Phase II project should begin.

2. In planning a Phase II, A.I.D. should actively coordinate its strategies for the BKS-B institutions with those of other major donors. The bulk of A.I.D. resources in any follow-on project should go to staff development through training both in-country and abroad. Increased emphasis should be placed on the basic sciences as a foundation for a strong agriculture curriculum.

3. A.I.D. should reconsider its strategy of assisting an entire consortium. While a Phase II project might support special activities for all 11 institutions at a modest level, consideration should be given to concentrating major resources in order to maximize impact and to create a critical mass of scholars.

4. Provision should be made by the GOI for sufficient financial resources to adequately address equipment, instrumentation and laboratory needs.

This evaluation was performed by a team of experts which included Dr. C. Jean Weideman, Team Leader and Chief of the Institutional and Human Resources Division, Board for International Food and Agriculture Development, A.I.D./Washington; Dr. Cameron Bonner, WUAE Project Officer, Dr. Timothy Mahoney, Evaluation Officer from USAID/Jakarata; Dr. B.C. Jensen, Utah State University; Dr. Achmad Baihaki, Director of Research, Padjadharan University; and Dr. Moerjanto, Director of Research and Dean of Animal Sciences, Syiah Kuala University. The evaluation was completed in April 1984.

TOWARD THE DEVELOPMENT OF AN EVALUATION DESIGN FOR THE KB-GIZI FAMILY PLANNING/NUTRITION PROGRAM IN INDONESIA

PROBLEM & OVERVIEW: The model program in which the KB-GIZI program operates is the Family Nutrition Improvement Program (UPGK), a multi-sectoral program implemented primarily by the Ministry of Health and the National Family Planning Coordinating Board (BKKBN). The goal of the program is to improve nutritional status of preschool-aged children and pregnant and lactating women. Currently, nutrition services, as implemented by BKKBN, are introduced only after a family planning acceptor rate of some specified proportion has been realized in a village.

U.S. ASSISTANCE: The Integrated Family Planning-Nutrition Program (KB-GIZI TERPADU) is a multi-year project (#489-0249) for which both USAID and the Government of Indonesia (GOI) have committed funds. The UPGK program is to reach 34,000 villages in 25 provinces during the PELITA III (Third Five-Year Plan). The KB-GIZI program is to reach 22,249 villages by 1984 when PELITA III concludes. To achieve the goal of improving nutritional status of preschool children and pregnant and lactating mothers, a system of nutritional surveillance, referral and community-level follow-up is used. The follow-up involves interventions including the use of oral rehydration solutions, iron and vitamin A supplements, education in nutrition and home gardening. [Note: The consultants' report does not include information on project start/end dates or funding levels and arrangements.]

PURPOSE OF EVALUATION: This document responds to a USAID/Jakarta request for a short prospectus on developing an evaluation component for the KG-GIZI Program. In developing this report, the team participated in a three-day technical meeting with members of the BKKBN, made field trips to Bali and Surabaya, and met with USAID/Jakarta officials.

FINDINGS:

1. There is considerable evidence that good outcome measures, those that directly relate to the goals of the program, have been collected. There is also evidence that field protocol varies from desa to desa and from banjar to banjar. Therefore, by selecting only "good" data, a bias is introduced into the sample.

2. For nutritional status of children there exist weight-for-age data presently collected at the desa or banjar level. To a varying degree, KMS cards record immunization histories and infectious disease histories as well as weight gain/weight loss graphic records.

3. Two aspects of the KB-GIZI program must be explicitly recognized in the formulation of any analysis: (1) Most of the important variable relations can be only partially explained by a linear model. (2) The program has been administered in many variations.

PROJECT DESIGN & POLICY IMPLICATIONS: Technical assistance must be responsive to the perceived needs and desires of the host country counterparts. For this reason it is strongly recommended that the effort to evaluate the KB-GIZI program become the primary responsibility of Indonesian research and academic institutions. In the design phase, BKKBN should assist in identifying and orienting such institutions. In this phase, and in all subsequent work, the role of the contractor/consultant should be limited to the provision of technical assistance to improve the quality of work. In many instances, comprehensive evaluations of large-scale projects using complex experimental designs are difficult to carry out, very expensive and subject to the pitfalls and drawbacks common to differing social settings. It is virtually impossible to eliminate all potential competing explanations for the observed changes in both the treatment and the control groups and implausible to assume that the two groups were identically matched and remained matched throughout the experiment.

RECOMMENDATIONS:

1. The approach recommended by the evaluation team is to conduct a series of small scale evaluative research efforts, with each effort addressing salient points. The evaluation report suggests several possible study areas: (1) research to refine design parameters; (2) small-scale evaluation studies; and (3) methodological studies to improve evaluation technique. Since the indicator weight gain/loss is central to the Indonesian monitoring system, it is suggested that this indicator be studied in addition to nutritional status as measured by weight-for-age.

2. The report emphasizes the importance of ensuring that there exists a common knowledge base for all research facilities which will be participating in the KB-GIZI family planning/nutrition program evaluation. The team outlines 12 major research tasks the team considers essential to the formulation of an overall research program. Task #3 calls for the identification and selection of research areas and organizations. Task #4 calls for the development of initial research designs and field instruments.

This assessment was conducted for USAID/Jakarta by William D. Drake, Ph.D. and President of Community Systems Foundation (CSF); David E. Sahn, Ph.D. and Vice President of CSF; and Robert J. Timmons, Ph.D. also of CSF. Although the writing of this report took place in December 1983, it is based on observations and research conducted in November-December 1982 and June 1983.

FINAL REPORT ON THE EVALUATION OF THE PUSPETA PROJECT - INDONESIA

PROBLEM & OVERVIEW: It is the Government of Indonesia's (GOI) intention to provide a larger role in the Indonesian economy for cooperatives as a means to achieve Five-Year Plan objectives. The history of the cooperative movement has been political and is rooted in pre-independence times. Following independence, the growth of cooperatives was rapid, but in the 1960's, many became sources of communist influence and thousands were subsequently disbanded. In the 1970's, a new model cooperative, the KUD, was introduced with a primary focus on rice marketing. In 1973, the GOI linked these organizations to its efforts to increase rice production and used the KUDs to distribute seed, fertilizer and insecticides. During this period, thousands of KUDs were organized and financed either at no cost or with low cost loans, most of which were never repaid. In 1978, the cooperative development authority was transferred and upgraded to ministerial level and the GOI has placed further emphasis and effort since then into their development as a means of ensuring a higher level of economic well being for the rural people.

U.S. ASSISTANCE: On June 30, 1976, A.I.D. entered into a three year, $249,489 Grant Agreement (#ASIA-G-1180) with the Cooperative League of the U.S.A. (CLUSA) under which CLUSA was to establish a sound cooperative development program in Indonesia. The original project agreement was subsequently modified, the funding level increased and the Project Activities Completion Date (PACD) extended 15 different times. On July 21, 1981, A.I.D./W issued a Transfer Authority for the transfer of 5,785 tons of P.L. 480 wheat to CLUSA for use in Indonesia. CLUSA sold this commodity to BULOG, the GOI's purchasing and distribution agent for agricultural products, for $1,313,898. These funds were deposited in a special account to be used in support of an expanded project called the "Integrated Rural Food Systems Development through Village Cooperatives." PUSPETA, an acronym for PUSAT PELAYANAN PETANI (Farmers' Service Center), is a CLUSA innovation and operates as an autonomous pre-secondary cooperative integrated with the primary cooperatives (KUDs). The objectives of the project are to strengthen, reorganize and revitalize village cooperatives by use of a cooperative federation in Kabupaten Klaten (Provincial villages). The PUSPETA concept is that the secondary cooperative is a catalyst for "bottom up" development of the KUD. CLUSA, in addition to providing financial and commodity support, acts as a consultant and advisor to the project. CLUSA personnel costs are provided under an OPG.

PURPOSE OF EVALUATION: The purpose is to assess the development of PUSPETA Klaten, the degree to which the project purposes have been achieved, and the impact of PUSPETA and its activities on farmer beneficiaries. The evaluation was conducted by a four-member team which held discussions with GOI officials in Jakarta followed by field trips to study project operations and conduct interviews with PUSPETA staff.

FINDINGS:

1. The practical difficulties of establishing a dairy industry based on modern feed technology and dairy management in an area where farmers had little or no previous experience in dairying was underestimated. Much time and energy of the management staff has been devoted to solving technical and cost problems. However, progress has been substantial particularly in the research and training areas, and these activities are beginning to show promising results.

2. The milk marketing activity has become a major activity representing 10% of PUSPETA's total volume of business. Farmers are now receiving 20% more per liter of milk than they were before the PUSPETA program began.

3. PUSPETA Klaten began an egg marketing activity and in September, 1983 and in November contracted with a wholesaler to deliver 12 tons of eggs per week.

4. In 1983, PUSETA introduced a credit program for farmers who grow cloves which has enabled participating farmers to realize up to Rp. 1,000 per kg. more for their crop. While generally very successful, some of the very small clove producers did not participate.

5. Farmers' groups were organized to produce certified rice seed according to instructions and under supervision of PUSPETA staff and BPPSB (the seed certification and control organization). The program provided a profitable incentive to the farmers and produced 643,455 kgs. of high quality seed to help fill the large provincial deficit.

6. PUSPETA recently arranged with a manufacturer and exporter to produce embroidered garments. Under this arrangement, 30 young women between the ages of 14 and 22 were selected and trained for embroidering. They are paid on piece-work basis. This activity has become very popular.

7. PUSPETA has found opportunities to provide business services to low income laborers and small or landless farmers. One such activity is a program of providing working capital to groups of families making tiles. These are small scale, labor intensive operations requiring working capital for materials and fuel.

PROJECT DESIGN & POLICY IMPLICATIONS: The Evaluation Team concluded that PUSPETA Klaten has demonstrated the validity of the concept of an autonomous secondary cooperative at the Kabupaten level. It has illustrated the importance of organizing groups with common interests for productive business activities, and the importance of good management and working capital to provide the marketing and credit support required for those business ventures to succeed. However, the Team does not believe that PUSPETA Klaten is yet well enough established to serve as a model to be replicated. It has not been as successful as planned in organizing the KUDs to provide broad, democratic participation for a "bottom up" development. Legal and cultural constraints may set limits on how much can be done and how quickly but the team believes PUSPETA can do more than it is doing within these limitations. The Project Paper was unrealistic in its expectations that the very ambitious objectives could be achieved within the three-year life of the project. This is an institution building project involving important social and organizational changes which cannot be accomplished quickly, although the project has made substantial progress, particularly in the last year toward meeting those objectives.

RECOMMENDATIONS:

1. The Team recommends that the terminal data for remaining P.L. 480 funds be extended to the end of December 1985, and that the advisory and consultancy assistance from CLUSA should be continued through 1985 to give PUSPETA staff more time to refine its administrative structure and introduce recommended management information systems.

2. The Team feels that PUSPETA must obtain written support for its plan for reorganization from the Director General of Cooperatives.

3. PUSPETA should start a training program in various aspects of cooperative management for the Ketua Kelompok that it has established.

4. PUSPETA should speed up its plan to increase the number of UD representatives in its Board of Directors.

5. PUSPETA management should conduct regular surveys at the village level to collect data concerning the programs that each KUD in the region would like to develop and use this data to plan activities followed by discussion of planned activities with representatives of the KUDs and Kelompoks.

This evaluation was conducted by Dr. Amin Aziz, Dr. Russell O. Olsen, Dr. Loekman Soetrisno, and Dr. Herman Taufik. It took place between January 19 and February 15, 1984. [Ed. note: The Evaluation Report does not mention the professional affiliations of the evaluators.]

EVALUATION REPORT OF THE IMPROVEMENT AND EXPANSION OF SERVICES PROJECT FOR VISUALLY HANDICAPPED CHILDREN AND ADULTS -INDONESIA

PROBLEM & OVERVIEW: For many years, the Government of Indonesia (GOI) has demonstrated a commitment to meeting the educational needs of visually handicapped persons. However, even though residential schools for the blind, rehabilitation centers and training programs for special education teachers were in existence, less than one percent of the estimated 1.5 million visually handicapped persons were being served. About 80% of the visually handicapped population live in rural areas while facilities for the visually handicapped are in a few major cities only. In 1977, the GOI reassessed the status of services to the visually handicapped in view of its policy of universal education for all primary school-aged children, the need for alternatives to costly residential schools, and the psychological benefits to visually handicapped children living with their families in their own communities.

U.S. ASSISTANCE: In 1978 the GOI, through the Ministry of Education and Culture's Office of Educational Cultural Research and Development (BALITBANG DIKBUD), signed an agreement with Helen Keller International (HKI) for technical assistance to improve and expand services to the visually handicapped. The agreement authorized a pilot project consisting of four components: (1) Integrated Education for primary school-aged children; (2) Orientation and Mobility Training; (3) Parent Counseling; (4) Non-formal Education. The project's major goal was to demonstrate that visually handicapped children of average intelligence can function successfully in regular primary schools. The project was partly funded by an A.I.D. Grant. [Ed. note: The evaluation report contains no information regarding the project's number, amount of funding, or the start/end dates.]

PURPOSE OF EVALUATION: The evaluation was undertaken at the request of BALITBANG DIKBUD, USAID and HKI with the purposes of determining whether the technical assistance of HKI had achieved the goals and objectives stated in the grant proposals to A.I.D. and the GOI; whether Integrated Education and Non-Formal Education for visually handicapped persons should be included in the established system of general education for replication throughout Indonesia; and what types of improvement are necessary for further development in the areas of administration, implementation and financing. Two components, Integrated Education and Non-formal Education, were the main focus of this evaluation as both the Orientation Mobility and the Parent Counseling components were evaluated in 1981 and 1982 respectively. A team of thirteen participated in the evaluation exercise. The administration of questionnaires and interviews were the two major methodologies used.

FINDINGS:

1. Two hundred and four visually handicapped children have been been integrated into 83 primary schools in four provinces four years after the first programs were initiated. Visually handicapped children can function successfully in regular primary schools with the support of a special education teacher.

2. The cost of educating one visually handicapped child in a local primary school in 1982-83 was Rp. 282,760 (U.S.$28) compared to Rp. 730,620 (U.S.$73) in a government residential school.

3. The pilot non-formal education effort demonstrates that the community-based approach can be a low-cost alternative to traditionally segregated, residential rehabilitation centers. Forty-two field workers and 11 supervisors have trained 233 clients in the first two sites. The cost per client-month has been approximately Rp. 4000.

4. The Orientation and Mobility (O&M) project was officially institutionalized at the Institute for Training in Education Sciences, Bandung in 1981. To date 100 persons have received training. O&M is now part of the established curriculum in 35 residential schools and 17 rehabilitation centers in 15 provinces and integrated programs in 4 provinces.

PROJECT DESIGN & POLICY IMPLICATIONS: The major conclusion of the GOI/HKI evaluation was that both the community-based Integrated Education and the Non-formal Education projects have proven to be applicable to the

existing education system and feasible for replication. The Ministry of Education is drafting a ministerial decree which will establish Integrated Education as part of the National Policy on Community Development. While policy makers have agreed that HKI has made a vital contribution to the development of educational services in Indonesia, several administrative issues and responsibilities on the national and regional level need to be resolved for effective expansion.

RECOMMENDATIONS:

1. The administration of Integrated Education would be improved if official guidelines were devised and disseminated to regional and sub-district offices as well as principals of schools with integrated education programs.

2. Improvements should be made to coordinate the activities with the Department of Social Affairs and the Directorate for Primary Education to facilitate referrals of clients for vocational training or primary education.

3. A system of apprenticeship to local craftsmen should be established and the non-formal training course should be expanded to include vocational training given by local skilled craftsmen.

4. The cooperation and support of the private sector should be sought especially for capital to start enterprises by blind clients and improve current income-generating groups as well as encourage the formation of additional ones.

This evaluation was conducted between August and October 1983 by the following: (1) Mrs. Mahar Mardjono, Team Leader; (2) Professor Dr. C. Semiawan, Mr. F. Pangemanan and Drs. Soejadi of the Department of Research and Development; (3) Mrs. S.A. Bratanata, Drs. K. Suryatmana and Mr. Wesna of the Sub-Directorate for Special Education; (4) Mrs. A.H. Nasution and Mrs. Oyong of the Indonesian National Council for Social Welfare; (5) the Assistant to the Director of the Department of Community Education; (6) Mr. Stephen Hadley of USAID/Jakarta; and (7) F.W. Wiesenfeld and J. Kirk Horton of HKI.

A FINAL EVALUATION OF THE TRAIL SUSPENSION BRIDGE PROJECT - NEPAL

PROBLEM & OVERVIEW. Nepal's hill regions between the Indian plain or Terai and the Tibetan plateau are extremely complicated geophysically. Much of Nepal's population is situated in remote, mountainous areas accessible only by thousands of foot trails. There are countless drainages in these hilly and mountainous locations that funnel water from the plentiful monsoons into rivulets, creeks, streams and major river systems. The combination of various mountain ranges and river systems makes communication and travel for the majority of the hill population extremely difficult and constrains socio-economic development. Building a modern transportation network of motorable roads is not always practical because of the immense cost and complicated engineering involved and because Nepal's economy may not be able to support such an extensive network. One feasible solution is building improved, all-weather foot trails and bridges. Building bridges that span the major and intermediate-sized rivers in the hills is of particular importance because the monsoon rains often isolate villagers from markets, healthcare facilities and schools. Improved access can help the rural poor improve their socio-economic situation.

U.S. ASSISTANCE. USAID has provided assistance to the Government of Nepal (HMG) since 1958 for the construction of 23 suspension bridges. The current three-year grant agreement (#367-0119) was signed in August, 1979 for $4,799,000 of which $3 million was A.I.D.'s contribution to be used to finance the procurement, fabrication and transport costs of materials to construct 24 to 36 trail bridges throughout Nepal. In addition to bridge construction, it financed: (1) the development of a map of all national trails and bridges; (2) a study of boatmen displaced by bridge construction, alternative employment opportunities for them, and short and long-term vocational training programs; and (3) the development and incorporation into the Suspension Bridge Division (SBD/Department of Roads) of formal criteria to be used in the selection of bridge sites. This project was carried out in coordination with the Swiss Association for Technical Assistance (SATA) and the U.S. Peace Corps and relied on both for engineering inputs. The Project Activities Completion Date (PACD) was extended to December 1983 with no additional funds.

PURPOSE OF EVALUATION. The main objective was to determine the extent to which the project's goals and purposes have been achieved. In particular, to what extent the lives of people living in the bridge site areas have been affected, whether bridge site selection criteria are actually used to assure judicious selection of construction sites, whether fiscal procedures developed during the course of the project contribute to its smooth running, whether the ability to plan, budget, construct and maintain bridges has been sufficiently institutionalized within the SBD to assure its efficient functioning without technical assistance from donors, and whether the lack of some of the planned inputs has hindered project success. The evaluation report was also to present documentation and recommendations that would be useful to HMG in planning future bridge construction and in seeking other donor assistance for such construction. USAID involvement in this activity has been evaluated on two previous occasions by outside consultants, once in 1977 and again in 1980. This evaluation faced two constraints in its execution: 1) the SBD did not record information properly; and 2) the evaluation took place during the monsoon period which limited site visits to only three easily accessible bridges. Therefore, much of the analysis and conclusions is based on qualitative information and impressions obtained through interviews with SBD officials. It is acknowledged that the bridges actually visited may not be representative of all bridges constructed.

FINDINGS.

1. Forty-one bridges were planned, designed and under construction with 22 completed at the time of this evaluation and another 19 scheduled for completion by the PACD. Maximum positive impact is achieved when bridges are constructed on major and medium rivers located on the major trail networks. Of the three bridges visited in this evaluation, one spans the Kokaha, a minor river which connects two eastern hill districts, Sunsari and Dhankuta; a second is situated in Syangja district on the Andhi Khola, a medium river and replaces an existing bridge; and a third spans the Trisuli, a major river unfordable throughout the year, at Benighat, and connects the districts of Gorkha and Dading.

2. An estimated 113,294 people have been influenced by the construction of the three bridges. Only the qualitative economic impact of the utility of these bridges could be assessed because of the short time allowed for the evaluation and because all three bridges had only recently been completed. Displacement of 42 households of traditional ferrymen is reported at Benighat. The sub-component of the project to study displaced tradesmen was dropped in 1981 after USAID found the contractor unable to complete the study.

3. The technical capability of the SBD has improved with the appointment of additional technical manpower and is now adequate to complete 40-45 bridges per year. SATA initiated in-country training which has been more effective in upgrading staff capabilities than training provided outside the country. However, project planning within the SBD is deficient and administrative, fiscal and store management problems exist which impede its efficient functioning.

4. There is no preventive bridge maintenance program. Current bridge maintenance activities are ad hoc and carried out only in emergency situations. Periodic inspection is desirable and necessary but the problem of supplying technical manpower and funding is complex. The SBD has recently begun an effort to record the conditions of SBD-constructed bridges every three years.

5. The current reimbursement system of obtaining project funds is not practical as the SBD lacks access to working capital. SBD fiscal management has improved with the addition of new accounting staff and relative improvement in the promptness with which accounts from construction sites are submitted.

6. Deletion of the "National Trail Classification Map and Study" has set back the institutionalization of judicious site selection procedures. Attempts to introduce a system of objective site selection for evaluating bridge requests have not been very successful. The USAID proposed criteria do not incorporate national needs and priorities and their use may not ensure judicious site selection.

7. The termination of USAID support and the gradual withdrawal of SATA participation may create a funding problem for SBD. Although it appears that little technical support will be necessary for SBD in the future, the institutional capability of SBD is not fully developed. The extent to which HMG is prepared to meet the demand and financial requirements for new bridge construction is unclear.

PROJECT DESIGN & POLICY IMPLICATIONS. The project's original design appears to have been comprehensive and to have incorporated a strategy that would have achieved several of the key A.I.D. development objectives particularly those which address the problems of providing benefits to the rural poor and institutionalizing development activities. Clearly the construction of all-weather bridges, such as the one at Benighat, serves the needs of the rural poor by improving access to markets, educational institutions and healthcare facilities. However, the project appears to have fallen short of its objectives with respect to institution building despite some effort on the part of USAID and HMG. Specifically, in the issue of site selection and ranking criteria, the evaluation team feels that the SBD lacked the necessary will and commitment to meet the A.I.D. pre-condition for the release of funds. SATA was reluctant to introduce the concept of criteria for selection forcefully to the SBD, and the extent to which the SBD was ready to adopt selection criteria was misjudged, an observation that is strengthened from a review of a project extension memorandum dated April 5, 1982. More generally, there is a conceptual drawback associated with the issue in that the implied and ultimate objective was to institutionalize the process for all bridge site selection to be constructed under the SBD, not just to construct the subset of bridges funded by USAID under this project. USAID, too, was overly concerned with building bridges and lax in the enforcement of site selection criteria.

USAID's unilateral decision to abandon the trail classification map project again displays a conflict between institutionalization needs and development expediency. USAID had expected to get the map completed by an independent contractor from the U.S. Dept. of Agriculture's Forest Service. However, the cartographic expert, who visited Nepal for two weeks, estimated the project's cost would be far in excess of the project's budget. Based on his recommendation, USAID officially deleted it in August 1980. Funds reserved for the mapping project were allocated to the bridge construction program. The capability of preparing such a map through

the cooperation of existing government agencies or the possibility of getting it prepared by a local private consultant were never explored.

Another shortcoming in planned vs. actual inputs which reflects on the success of the project in achieving its broader goal of enhancing the quality of life is the study of displaced tradesmen, dropped after expending 25% of its budget. The importance of retaining this activity is particularly underscored since the evaluation documents at least one group negatively affected by the project.

Finally, the fact that there is currently no preventive bridge maintenance program in the SBD underscores the observation that this project appears to be more closely aligned to the traditional "showcase" style of development assistance rather than the approach A.I.D. has adopted under its "New Directions" policy. While SATA appears to have played an effective role in building the technical capability of the SBD and in improving the quality of bridge construction, USAID's approach appears to have been fundamentally one of keeping its hands off the project except to ensure that the transfer of funds is smooth and the system of reimbursement easier. A major lesson learned in this project is that in the absence of strong commitment to implementing policy through project design, project monitoring consists of a problem-solving approach for the purpose of expediting physical objectives such as construction.

RECOMMENDATIONS.

1. An effective preventive maintenance system for all bridges constructed by the SBD should be designed and implemented immediately.

2. The SBD should be upgraded into a Department and given authority for planning, implementation and improvement functions as well as construction activities. The SBD should be made responsible for construction of bridges located on the "major" (regional access) and "main" trails only and a precise definition of these should be established.

3. A National Trail and Bridge Network mapping should be undertaken. A master plan for the gradual improvement of the trail and bridge system in the country should be prepared from such a map. A medium term planning methodology should be introduced in the SBD so that various activities such as survey, design, fabrication, transportation and erection can be planned well in advance.

4. The current method of soliciting a prioritized list of bridge requests from the District Assemblies should be continued. This will involve popular participation in demand generation and lighten the workload of the SBD screening personnel. A coordination committee drawn from the SBD and the Ministry of Panchayat and Local Development should review bridge requests prior to each fiscal year and select only the two top priorities from each district for survey (and construction) purposes.

5. The total annual budget of the SBD should be appropriated to the five Development Regions in line with the national priority. This would indicate the approximate number of bridges that could be constructed within each region. HMG should either increase its allocation for bridge building substantially or seek alternate sources of foreign assistance.

6. A scientific accounting system which gives exact costs incurred in each bridge construction should be introduced within the SBD. Administrative and fiscal management processes should be improved within the SBD. In future assistance projects, a fixed, "revolving fund system" is recommended which has elements of both the advance and reimbursement system.

This evaluation was conducted during August, September and October, 1983 by the following associates of East Consult, Ltd.: D.P. Ojha, Team Leader, D.R. Dahal, P.C. Joshi, N. Khanal, U. Acharya, and D. Devkota. The final evaluation report was published in December, 1983.

REPORT OF AN ENGINEERING REVIEW OF THE LANDSLIDE AND SOIL STABILIZATION PROJECT OF THE FAR WESTERN HILLS ROAD - NEPAL

PROBLEM & OVERVIEW: Nepal's hill regions between the Indian plain or Terai and the Tibetan plateau are extremely complicated geophysically. Much of Nepal's population is situated in remote, mountainous areas that are accessible only by the thousands of locally made and maintained foot trails. There are countless drainages in these hilly and mountainous locations that funnel water from the plentiful monsoons into rivulets, creeks, streams and major river systems. The combination of various mountain ranges and river systems running in counter directions makes communication and travel for the majority of the hill population extremely difficult and constrains socio-economic development. Building a modern transportation network of motorable roads is impractical because of the immense cost and complicated engineering involved and because Nepal's economy will not be able to support such an extensive network. The solution to this problem is the development of a skeletal nationwide road system which connects major north-south drainages and ecozones with the East-West highway which runs parallel to the India-Nepal border. Improved transportation networks, such as the Dhangarhi to Dadeldhura highway in the extreme western part of Nepal, can help the rural poor improve their socio-economic situation.

U.S. ASSISTANCE: A.I.D. Project #367-0138 financed the construction of the 135-kilometer road connecting Dhangarhi, the headquarters of Kailali district, with Dadeldhura, the headquarters of Dadeldhura district. It is the first to be constructed, operated and maintained entirely by Nepali engineers and contractors. Although the initial construction was completed in 1979, a follow-on project (#367-0138) was undertaken designed to carry out environmental protection activities. This was designed to correct environmental degradation and to stabilize the soil and prevent landslides in the areas within the road alignment so that the road might be passable all year. This project was completed in July, 1982 at a total cost of Rs. 36,580,933 of which USAID's contribution was Rs. 27,746,135.

PURPOSE OF EVALUATION: The purpose of this evaluation was to review the construction done under the Landslide and Soil Stabilization Project (LSS) to determine whether it was successful. One obstacle to the task was to distinguish damage caused by the very intense storm of mid-September 1983, which clearly exceeded design parameters, from that which had not been totally repaired or removed from earlier, more normal monsoon storms. Thus the present team's judgment may not have been completely correct on occasion. In evaluating the LSS designs, reference was frequently made to two earlier reports by Eugene Kojan (1978) and Tej Mathur (1979), although some difficulty in identifying specific sites occurred. Kojan's recommendations were stated in general terms for individual sites and broader areas. Mathur modified these to some extent and translated those generalities into site specific work items tabulated in his report. Additional modifications were made later by road engineers and endorsed by USAID. Most of those were made necessary by budget constraints.

FINDINGS:

1. The engineering works prescribed by Kojan and Mathur were generally built as designed and to a high level of workmanship. Mathur signed all of the plan sheets seen by the evaluation team, indicating his acceptance of the design work done in each case. The works have performed to or beyond the design requirements in all cases.

2. There is no surviving record of any systematic monitoring of pilot slope stabilization works. However, the overall success of LSS works suggests that any results would have been generally positive. All slope stabilization works were completed in the prescribed three working seasons.

3. Alternative locations, proposed by Kojan, were considered and some survey work was completed. However, it was concluded that the cost was not likely to be justified by the savings over the existing route and none of the relocations was built. To date, this decision appears to have been supported by events.

4. Outsloping of the road's surface wherever feasible would improve the surface drainage, especially since there are far too few culverts. However, outsloping probably would be detrimental in the areas of unstable sandy soils and, if the 40 km/hr design speed is ever to be achieved, superelevation of the curves will force inside drainage in many places.

5. Maintenance, particularly during the monsoon, is done to some extent, although not as regularly and systematically as would be desired as it is the single, most important item toward keeping the road in service. Continued maintenance will be necessary to preserve the investment in these facilities.

6. Kojan and Mathur were somewhat unrealistic in specifying items such as rock bolts, plastic membranes, horizontally drilled drains and sophisticated blasting techniques which are not readily available in Nepal.

7. There is no orderly system for planning equipment purchases or for paying for them other than by line item in the current budget. Given the lead time required for delivery of a major item, the lack of budget carryover authority beyond the end of the fiscal year is a major handicap.

8. The list of equipment on inventory includes 106 pieces of various kinds built by at least 30 different makers in six nations. Thirty-two are in working order, fifty are awaiting repair parts, twenty-three are beyond repair, and one is idle for lack of work. Most are more than ten years old, cannabilized, and at the end of their economical service life. There is a substantial inventory of parts which appears to be well organized and cataloged. However, thirty-three percent of the items are for equipment no longer located at Godavari, the main storage yard.

PROJECT DESIGN & POLICY ANALYSIS: It is evident that both Kojan and Mathur, and also the present evaluator in an earlier visit to Nepal, tended to underestimate the ability of the Department of Roads and Nepali Contractors' personnel to execute quality work and to understand what does work in the Nepali environment. The amount of plan preparation and review done for LSS is exceptional. At the same time, however, there is a reluctance on the part of the Department of Roads to acquire unfamiliar technology, even that which is not excessively expensive and which has a very high probable benefit. Although several Nepali engineers visited India to investigate blasting techniques, there appears to have been no follow-up technology transfer and Department of Roads engineers seem to feel that India does very little road work in the hill country and, thus, has little to offer Nepal in terms of hill country training or experience. More importantly, the present situation with regard to maintenance planning is inadequate. Much improvement is necessary if the road is to be a useful, all weather facility. Some government policies will have to change and an overall maintenance ethic must be created where none now exists. The Department of Roads must develop a series of maintenance objectives based on government policy and on an economic analysis of maintenance cost, user cost, and the capital cost of improvements such as pavement, with some recognition of political considerations.

RECOMMENDATIONS:

1. It is strongly recommended that the Department of Roads determine the appropriate maintenance objectives and state these as a matter of official policy.

2. The paved or lined ditches technique should be abandoned primarily because they must be hand cleared. Outsloping should be initiated where appropriate and a steady improvement program aimed at achieving a cross culvert interval of 100 meters should be initiated using maintenance personnel. Where inside ditches are mandated, they should be designed for machine maintenance for speed and economy.

3. An effectively trained maintenance crew should patrol the road regularly and systematically during the monsoon period to clean culvert inlets and perform other maintenance tasks.

4. The Department of Roads should seek to establish some form of revolving fund to provide for efficient repair and replacement of equipment, purchase required equipment as rapidly as possible, and procure and maintain a generous inventory of spare parts.

5. The Department of Roads should consider sending some maintenance specialists to the U.S. to study all aspects of maintenance operations and management in rural county organizations especially in mountainous areas.

6. The Department of Roads should commence the budget process two or three years in advance so that long range planning may be systematically undertaken. Headquarters review of small purchases should be eliminated. The Chief Mechanical Engineer should be given authority to purchase parts up to at least Rs. 50,000. Spending authority for emergency items should be delegated to the Zonal or District Engineer.

This report, dated November 1983, was researched and written by Martin Everitt, Geotechnical and Materials Engineer. [Ed. note: No professional affiliation of the chief evaluator is mentioned. The date of the evaluation report is not stated.]

SOCIO-ECONOMIC IMPACT OF THE DHANGARHI TO DADELDHURA FAR WESTERN HILLS ROAD - NEPAL

PROBLEM & OVERVIEW: [Please see the Executive Summary entitled "Report of an Engineering Review of the Landslide and Soil Stabilization Project of the Far Western Hills Roads." (pg. 65)]

U.S. ASSISTANCE: [Please see this section of the Executive Summary referred to in the preceding section.]

PURPOSE OF EVALUATION: This evaluation assesses the socio-economic impact of the Far Western Hills Road project. In particular, this evaluation addresses the question of how and to what extent the quality of the lives of the people in the area have been influenced by this road and whether the fiscal procedures developed during the project contribute to the more efficient implementation of its major activities. The three-person evaluation team collected data from government offices in Kathmandu and from the field through interviews with people living and travelling along the road as well as local merchants, teachers, farmers and political leaders residing in the major markets and villages in the area.

FINDINGS:

1. Prices of essential commodities imported by the hill population, including salt, kerosene and sugar, have dropped and the prices received for exported goods, chiefly ghee (clarified butter) and pine pitch (used in the production of turpentine), have increased. Seasonal price differentials on imports have narrowed considerably.

2. There has been an impressive increase in the area devoted to the production of major foodgrain crops including paddy (rice), wheat and potatoes. This is partially attributable to the increased capability of the Mahakali Integrated Rural Development Project to distribute improved varieties of high-yielding seed, fertilizers and pesticides. In general, however, agricultural productivity has stagnated and even declined due to the large population increase particularly in the terai or flatland areas that border India as the small farmers in the hills, whose farms are inefficient, have moved south seeking larger plots. This has resulted in more rapid depletion of forest resources in the terai areas.

3. The growth of industries, particularly in the hilly areas serviced by the road, is negligible. There are currently about 210 agro-based industries mostly in Dhangarhi. A turpentine factory is under construction at Dhangarhi.

4. The pattern of off-season employment has changed since the road construction began. The practice of seasonal migration from the hills to the terai and to India for employment has decreased. The Asian Development Bank financed construction of two feeder roads (Dadeldhura-Baitadi and Bhatkanda-Doti) has permitted the follow-on employment of those whose employment ended with the completion of the main road. Others are employed in the maintenance of the main road. The average daily wage is between Rs. 15 and 20 which is sufficient for subsistence purposes. The old porterage system has collapsed with the opening of the road which has meant the displacement of some traditional laborers.

5. Statistics indicate greater enrollment of both girls and boys in local schools, although the increment in boys is far more than for girls. However, the effect of the road itself on the use of education facilities is limited since the cost of transportation is high. The increased enrollment, as well as the increased number of dropouts particularly among girls, may be attributable to the general climate of change in expectations that the development of the road has caused. There have been requests for the building of schools along the road's corridor.

6. More people are using the government and private hospitals and clinics. The prices of medicines are more competitive and the availability of more kinds of medicines is notable. The attitudes about family planning do not seem to have gained appreciably. There is still a strong preference for sons and the adoption of family planning methods has not been substantial, although there are cases of people using contraceptives and records indicate more surgical sterilizations are performed, particularly vasectomies.

7. The new financial procedure, initiated on a trial basis in May 1980, has contributed positively to the efficient operation of the Landslide and Soil Stabilization Project. Funds now reach the project's field office in about a week, two at the maximum.

PROJECT DESIGN & POLICY ANALYSIS: It is obvious that the road has become important to the social and economic development of the people in the area which it serves. People depend on the road. The development of feeder roads which permit access to other remote areas adjacent to the road will further affect overall development of the region. There has been, however, an excessive time lag between completion of the road and development of other job opportunities in the Western Hills. Other government agencies, for example the Ministry of Agriculture and the Ministry of Industry, should have been involved in the program planning that took place when the road project was first contemplated. An interdisciplinary, multisectoral approach is essential when planning major interventions of this type. The issues of population migration, of increased expectations among the rural poor, of the need for additional employment opportunities, and of the need to ensure that environmental deterioration is monitored and that its prevention is planned for are all too obvious. The central problem is to ensure that effective institutional and management structures accompany the development processes brought about by the road. In this regard, there has been an over-emphasis on technical solutions, i.e., building and maintaining the road, and a lack of attention to social and institutional factors in the project design. The lack of an efficient marketing system, for example, has hindered expansion of agriculture into high value crops especially in the far western area. Finally, the need to keep the road operational year-round to protect consumers from shortages, sustain rural income and permit the orderly operation of industrial enterprises is of paramount importance.

RECOMMENDATIONS:

1. The appropriate government agencies should give priority in program planning to areas opened by roads to strengthen service delivery and support systems. The availability of southbound cargoes, for example, would reduce haulage costs and promote the growth of interdependency between the two ecozones (hills and terai).

2. The connection of the East-West highway to the Western Hills Road should be given high priority. This will accelerate and facilitate the expansion of agriculture into high value crops.

3. The Western Hills Road must be kept operational year-round and the Department of Roads should be provided with adequate funds and technical resources to accomplish this task.

This report, dated November 1983, was researched and written by Tek B. Thapa, Assistant Economist, Planning Division, Department of Agriculture, His Majesty's Government of Nepal; Mr. Martin Everitt and Mr. Paul Winkelaar. Winkelaar is a Soil Scientist attached to the Wasatch National Forest, Salt Lake City, Utah. [Ed. note: Everitt's professional affiliation is not mentioned.]

EVALUATION OF REVEGETATION, SLOPE PLANTINGS, AND SOIL STABILIZATION EFFORTS ON THE FAR WESTERN HILLS ROAD - NEPAL

PROBLEM & OVERVIEW: [Please see the Executive Summary entitled "Report of an Engineering Review of the Landslide and Soil Stabilization Project of the Far Western Hills Road." (pg. 65)]

U.S. ASSISTANCE: [Please see the Executive Summary referred to in the preceding section.]

PURPOSE OF EVALUATION: This report represents the observations of one member of the evaluation team which considered the whole question of landslide and soil stabilization of the Far Western Hills Road undertaken in USAID Project #367-0138. It focuses on the soils, geology and landscape features of the road between Godavari and Dadeldhura. The numerous landslides, especially in zone #4, were field-checked, and the soils described and evaluated in each of the four zones through which the road passes. The soils were evaluated for agronomic purposes according to the latest soil taxonomy, although they have not been correlated. The four zones encountered are landscape units having a reasonable degree of homogeneity for most practical purposes.

FINDINGS:

1. Zone #1 is located between kilometers 44 and 60. Sandstone is the major rock formation. The tentative classification of this soil is SC-clayey sands, sand-clay mixtures. SC soils are slightly acid and plastic with fair cohesive properties but are subject to rutting if used as subgrade material. The major vegetation is Sal and Rhododendron. Slopes are in the 40 to 60 percent range. No serious landslide problems exist except at km 33 where interbedded shale may require regular maintenance. The major problem is overgrazing on soil that shows extensive gullying and surface erosion (mudflow).

2. Zone #2 consists of deep colluvial deposits along the ridgeline-- schist, sandstone and quartzite. The tentative soil classification is CL-inorganic clays of low to medium plasticity, gravelly sandy or silty lean clays over SM. The soils are strongly acid and of low to medium plasticity which is stable and cements well to support nearly vertical cutbanks. Slopes range from 25 to 45 percent. The major vegetation is Chhir pine and Sal with an understory of grass.

3. Zone #3 is an intermixed area of fine-grained schist and granitic gneiss exhibiting excessive foliation. The soil is classified as SM-silty sands, sand silt mixtures, and GP-poorly graded gravels and gravel sand mixes. It is strongly acid and slightly plastic with fair cohesive properties. As subgrade material in roads, it is dusty when dry, becoming slippery when wet. This zone has the second highest incidence of landslides most of which occur in areas where the schist overlies the highly foliated, partly decomposed, unstable granitic gneiss. Most upper slopes exceed 90 percent with lower slopes ranging up to 60 percent. The major vegetation is Baanjh and Chhir pine.

4. Zone #4 consists mostly of decomposed granite classified as GP. It is strongly acid, non-plastic and exhibits very little cohesion. Slopes exceed 90 percent throughout most of this zone and the most severe landslides occur in this unit. Landslips are also numerous. The slides generally occur in the decomposed granite inclusions within the schist. The major vegetation is Chhir pine on the south and east slopes with patches of Baanjh on the more northerly slopes.

5. A total of 67,000 plants were reported as having been planted at various sites along the road according to one of the nurserymen interviewed. No count of individual species was available. No planting sites were mapped. No record is available as to the amount purchased or prices of various seeds.

6. Of the 15 species of plants attempted, only four showed success, of which Utis and Ritha, both local plant species, showed the greatest vigor followed by Acacia deabata and kalki phul. Species that failed were from outside their altitude range for the most part. One of these, Bamboesa had been transplanted from the forest

where it grows in damp places in thick topsoil to dry south facing slopes favored by Chhir pine. Grass seedings had not been attempted.

7. Natural vigorous revegatation of Chhir pine on steep, bare slopes was evident on many cut and fill slopes. Most Utis plantings on steep slopes had been destroyed by landslides. The most successful Utis plantings were those on top of the gabion structures along with the Ritha plantings. Utis trees' roots will severely damage the gabion structures as they reach maturity.

PROJECT DESIGN & POLICY IMPLICATIONS: [Please see the Executive Summary entitled "Report of an Engineering Review of the Landslide and Soil Stabilization Project of the Far Western Hills Road."]

RECOMMENDATIONS:

1. All Utis plants growing on top of the gabion structures should be girdled or cut off. No attempt should be made to rip them out as this could damage the structures. Future Utis and Ritha plantings should be planted on the steep slopes behind the gabions and other structures.

2. Either rely on natural revegetation of Chhir pine or transplant them from the forest on the south and east slopes of zone 4 along with topsoil to assure the presence of mycorrhiza in the soil.

3. Plantings of grass species should be attempted on the advice of local expertise, although clover should not be planted in any grass mix.

4. Retaining structures should be built prior to plantings to assure that the soil is stabilized and will not be disturbed. Plants should not be placed along berms where movement of goats can be expected.

5. An appropriately skilled individual should be selected and trained by the Department of Roads to collect local information and coordinate the protection of plantings with Panchayat officials. Accurate records concerning planting should be kept.

This report, dated November 1983, was researched and written by Paul Winkelaar, Soil Scientist attached to the Wasatch National Forest, Salt Lake City, Utah.

MID-TERM EVALUATION REPORT OF THE AGRICULTURAL RESOURCES INVENTORY PROJECT - NEPAL

PROBLEM & OVERVIEW: USAID'S remote sensing projects worldwide have been designed to assist developing countries in the development and assimilation of a new technology for gathering resource information for development planning and monitoring. This type of technology is seen as being applicable across a wide range of development sectors, including agriculture, forestry, hydrology, mineral exploration, etc. As such, remote sensing is not a response to a particular development problem, but a powerful new data tool providing information applicable to a wide range of development sectors on a recurrent and frequent basis which is otherwise not available, or obtainable only at high cost.

U.S. ASSISTANCE: The Agricultural Resources Inventory Project (ARIP: Project #367-0134) is a five-year effort to establish an effective remote sensing center to provide current information on the quantity and quality of water and land resources so as to allow for informed land-use decisions. In order to establish a National Remote Sensing Center (NRSC) in Nepal, the ARIP was designed with four primary components: 1) the establishment of a photographic/cartographic laboratory; 2) the formation of an image interpretation laboratory; 3) the conducting of an extensive training program; and 4) the application of remote sensing technologies to specific functions and localities in support of HMG/N development projects in Nepal. The project began in January 1981, with a total USAID commitment of $2,400,000.

PURPOSE OF EVALUATION: This evaluation assesses the progress of the four components, and reviews the linkages between the NRSC and international remote sensing agencies. In addition, the evaluation looks at the role of the NRSC Advisory Committee and its effectiveness in guiding the activities of the NRSC. In conducting this evaluation, the three-person evaluation team interviewed HMG, USAID and other individuals and reviewed documents including the Project Paper (PP), progress and financial reports and technical papers.

FINDINGS:

1. Although progress has been made towards the provision of a permanent facility for the NRSC, occupancy of the new building is far behind schedule. The NRSC will eventually have four times the space envisioned by the original PP.

2. The majority of the equipment called for in the original PP has been procured. However, the equipment is underutilized and some of it has not been set up due to lack of space. In addition some equipment not called for has been purchased including an Apple Computer and a Georeceiver.

3. Seven of the nine components of the training program have been addressed, and in-country training has been effective in reaching HMG personnel and agencies. However, the participant training program is two years behind schedule. Delays are attributable to postponement of the project's starting date and HMG personnel requirements.

4. Dissemination of remote sensing data has been hampered by the relative newness of remote sensing technology to HMG/N user agencies and delays in project startup. This has resulted in a project focused more on establishment than on developing user linkages.

5. The NRSC has developed contacts and working linkages with remote sensing organizations and receiving stations in other countries and with international agencies. However, there has been difficulty in obtaining data from the Indian/Hyderabad receiving station.

6. The NRSC Advisory Committee has met infrequently and the composition of the committee has changed with each meeting. As such, no real guidance has been offered by the committee to the NRSC. This has led to minimal feedback between the NRSC and user agencies.

PROJECT DESIGN & POLICY IMPLICATIONS: The project is not in need of modification; however, it requires a change in emphasis from establishment to operations including an emphasis on users, user linkages and user related projects. There is an obvious divergence between the project title and the work plan of the Center. There is a strong perception within HMG that the NRSC is a component of the Forest and Soil Conservation Ministry. However, the adoption of watersheds as units of study does not conform to HMG needs particularly in that less emphasis is being placed on evaluation of land and agricultural resources. This has limited inter-agency coordination and cooperation. At the same time, projects conducted within the NRSC have been influenced by the Center's host organization and do not reflect the inter-sectoral composition of the Advisory Committee. Agriculture is a priority area and HMG/N has adopted a policy emphasizing the agricultural sector, conservation of natural resources and development of water resources.

An important lesson learned so far is that a consistent push by the funding agency may be necessary to keep project momentum going, particularly in moving from establishment to operations phases. Equally important, but more specific for this project, is the need to clarify the role of the new institution or technology as it emerges into useful existence. Some form of dialogue between agencies competing for the use of the new resource must take place under the authority of a neutral body so that various constituencies, from one or another of the competitors, are prevented from monopolizing the utility of the technology.

RECOMMENDATIONS:

1. The NRSC should be located under the National Planning Commission in order to put it more in touch with planners and to provide for greater inter-agency access, and the Advisory Committee should be replaced by a Coordinating Committee composed of either representatives of planning units of relevant ministries or of department heads. This committee would be responsible for determining and evaluating the NRSC's annual work plan.

2. USAID should continue its support of the NRSC by providing technical and management assistance to the NRSC, support for pilot projects particularly in those related to USAID development projects, and continued funding of up-to-date Landsat data and aerial photography.

3. The operational phase of the project should focus on: (1) the continued build-up of an effective user center; (2) an upgraded awareness and outreach program; and (3) the initiation of pilot projects.

4. Institutional linkages should be established to facilitate the acquisition of remote sensing data from Hyderabad.

5. NRSC should consider a survey of in-country trainees in order to ascertain the extent of the application of learned skills within the trainee's user agency.

6. HMG/N should not now pursue additional procurement of computers or computerized GIS equipment. It should first use its current equipment more effectively, evaluate HMG requirements and, when this is done, compare equipment options and costs, and investigate additional supportive infrastructure. Steps must be taken to ensure that the new facility is completed as soon as possible.

This evaluation was conducted by Dr. Gary E. Johnson, AIT/Thailand; Dr. Harka Gurung, Independent Consultant/Nepal; and Dr. Matthew Willard, Resources Development Associates, Inc./CA. It took place between March 10 and March 23, 1984.

INTEGRATED CEREALS PROJECT EVALUATION REPORT - NEPAL

PROBLEM & OVERVIEW: In spite of national efforts to develop the agricultural sector over the past two decades, Nepal's agricultural productivity has remained relatively stagnant. Agriculture accounts for approximately 60% of the GDP and employs more than 90% of the population of 15 million. While agricultural production has been increasing at approximately 1.6% per annum, population growth rate is about 2.6%. Although farm size is small with limited scope for expansion, particularly in the food-deficit hills where the majority of the population resides, Nepal has been self sufficient in food production to date. Agricultural exports, primarily from local surpluses grown along the terai or flat lands paralleling the Indian border, have long been a major source of foreign exchange, although in recent years exports have declined.

Various factors contributing to poor agricultural sector performance have been identified. Among these are adverse weather, difficult communications (especially in the hills), declining soil fertility, low consumption of inputs such as fertilizer, and organizational and institutional problems which seriously limit overall effectiveness of development program efforts. In addition, shifts in policy, changes in institutional structure, and turnovers in the top positions in the Ministry and Department of Agriculture (DOA) have been frequent. Meanwhile, external assistance levels have expanded dramatically placing increasing demands on limited resources of skilled manpower.

U.S. ASSISTANCE: U.S. support to agriculture development in Nepal has a thirty-year history. The Integrated Cereal Project's (ICP) immediate predecessor was the Food Grain Technology Project which contributed to strengthening of adaptive research and extension activities, particularly in the terai region, with emphasis on commodity improvement programs for wheat, rice and maize. The initial ICP (\$367-0114) Agreement was signed in FY 1975 with the final obligation due in 1982 and the final input delivery due in FY 1984. Program funding consisted of \$7,970,000 of bilateral grant money, \$2,133,000 (equivalent) in P.L.-480 money (Indian Rupees), and a host country contribution of \$3,479,000. The project purpose was to strengthen the Government of Nepal's (HMG) capacity: (1) to generate improved production technology for the major food grain crops and related cropping systems; and (2) to transfer that technology to Nepali farmers in such a way that it is readily adopted. Specifically, ICP continued support for the major commodity programs and initiated a cropping systems program (CSP). The geographic focus shifted to the hills. The major project components included training, technical assistance, construction and equipment procurement for the three major commodity programs and the CSP.

PURPOSE OF EVALUATION: This is the first comprehensive external evaluation of the project. In addition to assessing progress and suggesting measures to improve its effectiveness, the evaluation looked beyond the Project Activities Completion Date (PACD) to examine ways of more fully realizing ICP's potential. The project has been subject to four previous internal reviews including a mid-term evaluation carried out in 1979. Particular areas of focus in this evaluation included: (1) assessing the pilot project production campaigns; (2) assessing how well production information for extension workers and farmers is packaged and disseminated; (3) assessing the use of production minikits for the three major crops; (4) identifying factors constraining increased crop production; (5) reviewing the cropping systems work; (6) assessing whether project construction, training and commodity procurement have contributed effectively toward meeting the objectives of the project; and (7) identifying problem areas. The evaluation team was interdisciplinary in representation. The team conducted a review of pertinent documents, and members made numerous site visits to district level offices, research farms and farm trial locations where interviews were held and observations recorded over a six-week period.

FINDINGS:

1. ICP has successfully strengthened the three major commodity programs and initiated cropping systems research activities in the CSP of the Agronomy Division. It has also been instrumental in strengthening the capacity of the research system to screen and select improved technologies developed elsewhere for rice, maize and wheat. However, a major increase in Nepal's agricultural productivity is possible only if there are real improvements in input delivery systems for seed and fertilizer, credit facilities and extension services.

2. ICP's contribution to improving agricultural research capacity and research extension linkages has been hindered by the absence of an effective system of research management at the Ministry and DOA levels as well as by frequent changes in leadership and policy. Efforts by stations to produce foundation seed are diverting resources from research programs.

3. Although CSP has focused its efforts in the hills, in the medium term most of the benefits are likely to be centered in the terai. CSP has identified and tested a number of promising technologies suitable for the hills that may double net income per hectare and increase grain production significantly. However, recommended practices and much of the available technology are applicable to better endowed areas in terms of soil conditions, water availability and input delivery systems. Besides, all three major commodity stations are located in the terai.

4. The Pilot Production Program (PPP) was initiated in 1981 and has been successful in several locations in mobilizing extension and input delivery services, assisting in overcoming the reluctance of farmers to risk adopting new technologies, and extending these improved practices to farmers using a "block" approach. The minikit program, although not without problems, has a continuing role to play in the promotion of improved varieties and fertilizer use.

5. ICP has completed most of the construction activities satisfactorily, although none of the three seed processing units at the major commodity stations is currently in operation. The provision of training and acquisition of equipment has enhanced research capacities, but serious problems exist including examples of inappropriate equipment and lack of trained staff to operate and maintain equipment. The seed component continues to be a source of difficulty.

6. There are insufficient socio-economists in DOA and the few that are at post are not generally doing work that utilizes their training. The three major commodity programs all need socio-economists as members of multidisciplinary teams for research, planning and evaluation. Socio-economists are generally not interested in working for DOA because of unattractive career and training prospects.

PROJECT DESIGN & POLICY IMPLICATIONS: It is likely that the generation of improved technology, especially for the hills, and the transfer to farmers will not be fully realized at the conclusion of ICP in mid-1984. ICP has strengthened two links, the three major commodity programs and CSP, in a longer chain that contains many weak links. ICP designers may have overestimated the strengths of the other links in the agricultural development chain, i.e., extension services, input delivery, credit, marketing and transport, but also underestimated the difficulties of institutionalizing a program as revolutionary as CSP. CSP is unlikely to survive in its present form beyond the conclusion of ICP without additional inputs. In addition, all components of the research system, including the discipline programs and CSP, require further strengthening if Nepal is to have additional ability to generate technology and deal with the range of second generation issues. The utility of ICP has also been hindered by the lack of an effective management system in DOA capable of setting priorities and overseeing programs for research and extension.

Overall, the lessons illustrated by this project may be interpreted differently by different key players. Projects designed as "one-shot" panaceas or to develop the key "critical mass," with a goal of effecting a major change throughout a complex set of environments, tend to overstate vital complementary links and to underestimate the complexity of institutionalization. There is often a forced process, a programmatic response to a development need expediently brought forward to achieve "funded" status and monitored accordingly. At the conclusion of projects such as this, invariably attention is drawn to those "over" and "under" estimations to which the lack of "project goal fulfillment" is ultimately traced. Risk-taking is not alien to A.I.D., by any means. However, a project can only be as sound as the support upon which it depends.

RECOMMENDATIONS:

1. Assuming that HMG intends that CSP survive and grow, immediate attention should be given to institutionalizing cropping systems research. Specific measures which should be taken include a policy statement on CSR by the Ministry, formation of a Farming Systems Advisory Committee, elevation of the CSP to a status comparable to other major commodity improvement programs, widespread adoption and utilization of CSP results and methodologies, and using remaining resources to mount an internship program with training support and enhanced staffing.

2. HMG efforts to improve input delivery systems, credit facilities, and extension services should be selectively pursued and supported. Development projects should make greater use of the technologies and methodologies developed and tested by the commodity programs, including the CSP and PPP. Support for the minikit program should continue. The commodity programs should not produce foundation seed but concentrate on increasing supplies of promising varieties.

3. The commodity programs and discipline divisions should be strengthened to improve the ability of the research system to generate new technologies and deal with second generation issues. Each major commodity program should be provided with at least one socio-economist and the position and status of socio-economists within the agricultural research establishment and DOA should be generally improved with the services of existing socio-economists more effectively used.

This evaluation was conducted in January-February, 1983, and the report was written by Dr. Elon H. Gilbert, Team Leader and Agricultural Economist, Dr. Russell D. Freed, Agronomist, and Dr. Kailash N. Pyakuryal, Rural Sociologist, all of whom were consultants for the International Science and Technology Institute, Inc. (ISTI). The evaluation was contracted with ISTI under PDC-1406-I-00-2085-00.

A REVIEW STUDY OF THE NONFORMAL EDUCATION PROGRAM - NEPAL

PROBLEM & OVERVIEW: The government of Nepal (HMG) has recognized illiteracy as a key problem and obstacle to achieving desired developmental goals. About 95% of Nepal's 15 million people are illiterate and illiteracy is higher among women than men. Nepal began its first literacy program in 1956. Since then, a number of approaches have evolved aimed at educating those beyond the purview of the formal educational system. During the National Education System Plan (1971-76), adult education programs were made more functional and relevant to the needs of the rural population by giving them a non-formal orientation. In 1977, the Research Centre for Educational Innovation and Development (CERID) experimented with two types of programs. One of these, the multi-message approach, was found to be more effective. As a result, the Ministry of Education and Culture (MOEC) adopted and adapted its approach to adult education accordingly.

U.S. ASSISTANCE: In 1978, CERID, with MOEC approval and financial and technical support from World Education/USA, launched a three-year pilot project (#498-0251) on Integrated Non-Formal Education (NFE) in six of Nepal's 75 districts. The total cost of this project was $421,067. USAID's contribution was $339,627. The pilot program derived its funding from a USAID/Nepal grant to World Education International (WEI) through the mechanism of the Private Voluntary Organization (PVO) Co-financing Operations Program Grant (OPG). Its purpose was to raise the awareness of adult villagers to ways of improving their economic and social conditions. After this pilot program was completed (September 15, 1981), the project was adopted by the MOEC and expanded. Since 1981, the materials and methodology of the pilot program have been tested among widely representative rural groups.

PURPOSE OF EVALUATION: First and second cycles of classes, each of six months' duration, have been conducted in five and six districts respectively in the years 1982 and 1983 and an evaluation of what has been achieved during the program's lifespan was deemed appropriate. The major purposes of this study are: (1) to make a qualitative assessment of the program's literacy methodology; (2) to determine whether materials are appropriate; (3) to examine the appropriateness of staff selection and training; (4) to examine the interaction between the Non-Formal Education (NFE) program and the MOEC's Functional Literacy Program; (5) to assess the extent to which women have participated; and (6) to assess the climate and the possibilities for institutionalizing the project within the MOEC. Two districts were selected as sites for this study, Sindhuli and Baglung. The evaluation consisted of reviewing relevant documentation, interviewing staff and participants at both central and field levels, and observing classroom situations.

FINDINGS:

1. In general, the methodology used is appropriate for accomplishing the program's objectives. A participatory approach, employing key words and thematic pictures, is used. Most classroom work involves demonstration, drill, small group work and games. Those interviewed stressed such positive aspects as the relevance of program content to rural life situation and in raising the consciousness of the participants in such areas as family planning.

2. The content of the literacy primers was found to be consistent with the needs and problems of the participants. Participants specifically mentioned the functional content of the course as useful to them. However, there has been a delay in the publication of the last two volumes of the four-volume literacy package.

3. Both on-the-job training for specialists and supervisors as well as the training program for the facilitators were found appropriate and effective. More specialized training is desirable for specialists, however, and the facilitators felt that the one-week duration of their training was insufficient. The ratio of supervisors to specialists (1:20) is considered too high.

4. Interaction between the NFE program and the Functional Literacy Program was found to be almost negligible.

5. Women comprised 48 percent of the total participants in the 1983 cycles. Women participants interviewed mentioned that the presence of female facilitators encouraged their participation.

6. In interviews, central level policy and administrative personnel expressed serious commitment toward the eventual institutionalization of the NFE system. However a strong cadre of professional staff is required who could further refine training and supervisory mechanisms as well as develop a cost-efficient logistical plan for wider implementation. Current staff have not been provided with permanent status.

7. Among the shortcomings or problems noted, the following were most prevalent: (1) delays in receiving literacy materials at some locations; (2) inadequate lighting arrangements in classrooms; (3) delays in releasing funds (renumerations to facilitators); and (4) insufficient funds to cover the purchase of fuel for lamps or for transportation of materials. The infrequency of supervision, mentioned above, was also noted by those interviewed.

PROJECT DESIGN & POLICY IMPLICATIONS: In the final analysis, it is the policy and commitment on the part of the MOEC that will affect the eventual institutionalization of the NFE program. Whereas central level policy makers and administrative personnel have evinced strong verbal support for the NFE program, this support must be followed up with specific action so that institutionalization becomes a reality. The major actions needed include the development of a strong, permanent NFE cadre at the center, the clarification of the role of district level personnel with regard to the operation and management of NFE programs, the establishment of a formative evaluation mechanism so as to facilitate the evolution of a relevant and effective program, and the formal launching of the NFE program as an integral part of the regular adult education program of the MOEC. The lesson learned appears to be derived from a "new technology" project which has had initial success in achieving support from a traditional government ministry. However, genuine strong verbal support is not always difficult to muster. The final test, barring additional project intervention, will be whether action speaks louder than words.

RECOMMENDATIONS:

1. Top priority should be given to the timely production and distribution of project materials.

2. Literacy materials and training methodology should be refined and improved so as to reflect the different topographical and cultural contexts of Nepal.

3. External technical assistance should be continued to complete the development of the NFE program particularly in the areas of training, supervision and evaluation.

4. Arrangements for long-term training of NFE specialists should be considered in order to prepare them to assume leadership and management roles in a fully developed program context.

5. Budget and logistical requirements for the efficient implementation of the NFE program should be provided.

6. NFE staff should be accorded permanent status and the NFE program should be officially inaugurated as a integral part of the MOEC.

This evaluation was conducted by the Language Culture Training and Research Centre of Kathmandu, Nepal. The principal investigator was Bhoj Raj Marhatta.

THE MAGAZINE SHOW: NONFORMAL SEGMENT OF THE RADIO EDUCATION TEACHERS TRAINING BROADCAST - NEPAL

PROBLEM & OVERVIEW. His Majesty's Government (HMG) has made a major commitment to providing free universal primary education. This has created a heavy demand for trained primary school teachers. As of 1981, however, only about 36 percent of primary school teachers had received any formal training. The Institute of Education at Tribhuwan University was providing training to about 900 teachers a year but there was need for a more cost-effective approach for training greater numbers of teachers, especially in the rural areas.

U.S. ASSISTANCE. The Radio Education Teacher Training Project (RTT I: #367-0123) was a joint HMG/USAID effort begun in 1978 and completed on March 31, 1984. Total funding was $4,522,446 of which USAID's contribution was $3,635,000. The project's purpose was to provide a cost effective means of training primary school teachers who had neither passed their School Leaving Certificate (SLC) exam nor received any other teacher training and, in the process, to create the capacity to provide in-service rural teacher training through radio broadcasts. The goal of the project was to improve the skills of in-service, primary school teachers thereby improving the quality of education received by children in remote and rural areas. Southern Illinois University provided technical assistance for the first phase. The broadcast year beginning August 29, 1983 was the third full year of operation.

The Magazine Show is a 20-minute interlude between the two, 20-minute formal education sections of the RETT broadcast hour and is designed to serve as a break for the enrolled teachers. It consists of dialogues on various topics of development interest, cultural notes, music, and the Teacher's Corner, a time in which questions which have been sent in by enrolled teachers are answered over the air.

PURPOSE OF EVALUATION. The purpose of this study was to test USAID/Nepal's hypothesis that the Magazine Show has a far wider listening audience than just those teachers who are enrolled in the RETT upgrading course. If this could be demonstrated, then the Magazine Show would stand as a potentially powerful, non-formal educational tool for rural development. The objectives of this study were: (1) to determine who listens to the Magazine Show broadcasts and why; (2) what benefits do listeners perceive they obtain by listening; and (3) how the Show can be improved in the second phase of the project. A secondary objective was to conduct a survey on the availability of radios in rural areas of Nepal where the study took place. The evaluation team first analyzed 48 scripts of The Magazine Show used in the 1982-83 broadcast year and prepared interview schedules. The team then conducted a field survey in two districts in which 16 enrolled teachers, 72 unenrolled teachers and 207 general public listeners were interviewed. Among the teachers, six were women of whom only one was enrolled.

FINDINGS

1. The Magazine Show is listened to by 42% of roughly half of the population who are radio listeners. A quarter of those 42% are daily listeners. Fifty-eight percent of the teachers not enrolled in RETT do listen to the show. However, the show has low name recognition even among the teachers who have been enrolled in the RETT course. The Show is not even recognized as a separate entity by the teachers enrolled in the RETT course nor do many of them recognize the name.

2. There are problems in the quality of broadcast reception in the field: a constant humming or whining noise is heard on the 60-meter band on which the program is transmitted. There have been frequent interruptions in the broadcast due to technical difficulties.

3. The scripts for the program vary greatly in quality. Children's Stories and Women's Education are markedly more effective than Population Education and Resource Conservation. The scripts are much better at introducing the topics and the main points than they are at making conclusions or practical recommendations.

4. Both the language used and the concepts introduced are too sophisticated for much of the rural audience, or even the teachers, to be able to understand.

5. The distribution, collection and redistribution of project radios and self-instructional materials are administrative problems that prove difficult for the District Education Offices to manage.

PROJECT DESIGN AND POLICY IMPLICATIONS. The Magazine Show gets more air time--20 minutes x 6 days a week at prime time--than other, better known programs. With no staff of its own, however, the Show's scripts are written by outsiders which contributes to the inconsistency in their quality. Thus the Show suffers from an unclear sense of direction and a lack of leadership or purpose as the RETT Project staff's main responsibilities lie with the formal part of the broadcast. Although it is an ideal position to become a popular, useful educational program, there is serious doubt that it (or any other development oriented educational program on Radio Nepal) is yet effective as an educational tool. The Magazine Show can and should take the lead in effective, innovative educational programming, thereby creating the model for other programs to follow.

RECOMMENDATIONS.

1. The name and the identity of the Magazine Show should be cultivated by introducing some innovations and a livelier format. Taped field interviews with teachers and community people ought to be included in the program.

2. The possibility of transmitting the RETT/Magazine Show on either 41-meter or 31-meter bands should be explored. The cause of the interruptions in program transmission should be discovered and corrected.

3. Show scripts should be routinely field tested. Unnecessary literary words should be eliminated from the scripts. Academic concepts and generalizations should be avoided. More emphasis should be given to concrete examples to which villagers can relate and can translate into action.

4. Radio sets should be sold to enrolled teachers at cost on an installment basis. This would simplify administrative procedures, reduce costs to the project and be an attractive opportunity for teachers to acquire quality radios of their own. Self-instructional materials should be given, not loaned, to the teachers.

5. All levels and aspects of the Magazine Show should be coordinated and produced by the RETT staff itself. This will require additional staff. Additional office space should be provided to RETT staff for this purpose.

This evaluation was performed by Dhan B. Gurung and Dwight R. Holmes in November, 1983. [Ed. note: The professional affiliations of the evaluators are not given in their report.]

MID-TERM EVALUATION OF THE COMMUNITY-BASED INTEGRATED RURAL DEVELOPMENT PROJECT IMPLEMENTED BY SAVE THE CHILDREN FEDERATION (U.S.) - NEPAL

PROBLEM & OVERVIEW: Establishing a successful community-based, integrated rural health and development program throughout Nepal is a fundamental component of His Majesty's Government of Nepal's (HMG) broad development strategy. Various ministries, including Panchayat, Agriculture and Health, have directed nationwide efforts at accomplishing this objective through various sector programs. Private sector initiatives, however, have been few and those that have been undertaken must be legitimized through the Social Services National Coordination Council (SSNCC). The SSNCC is a quasi-governmental agency chaired by Her Majesty the Queen and composed of important HMG secretaries, representatives from indigenous groups and local chapters of international private voluntary organizations (PVOs) such as Save the Children Federation (SCF). Their programs are intended to provide alternative models of delivering essential health, population control and rural development services to the underserved population. Flexibility of delivery approach and innovativeness of program content are considered the main assets of such programs.

U.S. ASSISTANCE: USAID/Nepal and SCF signed a three-year grant agreement (#367-0144) effective from August, 1981 to August, 1984 totaling $518,882 of which $342,882 is provided by USAID under the PVO co-financing OPG project. Under this grant agreement, SCF, working with the Community Services Co-ordinating subcommittee of the SSNCC and the Pokhara Lions Club, is to establish Village Health Care Programs in four Panchayats. Through this program effort, it is expected that Nepali staff of SCF, village leaders and community members will develop "their potential in program leadership, project planning, implementation and evaluation within the rural areas" and that "the concepts of community and village leadership, participation and responsibility for self-help in socio-economic improvement will be introduced and developed." Ways and means of replicating successful elements of the SCF program in other areas of Nepal are also to be determined. Improved "health and overall well-being of an estimated 30,000 to 45,000 Nepalese" is the expected output at the end of the five year program effort. A two-year extension of the project in which up to seven more panchayats might be brought into the program is one option open to USAID and SCF in the event that the initial program effort is satisfactory.

PURPOSE OF EVALUATION: This evaluation is concerned with the SCF program effort in one of the project's primary impact areas, Deurali Panchayat. The two issues examined are: (1) whether SCF has been able to develop a community-based institutional framework within which the Deurali community can successfully carry on the project after SCF's departure; and (2) assessing the impact the project has had in actually delivering services. The evaluation methodology included interviewing 78 heads of households selected using a stratified sampling procedure, participant observation, informal discussions with villagers and reviewing official statistics and relevant documents. This project was first evaluated by USAID in 1982 under the name of "Save the Children Federation's Community Based Integrated Rural Health Development Program."

FINDINGS:

1. There is evidence that the project has laid an institutional foundation in which the whole community is involved. The philosophical and methodological approach used by SCF is known as Community-Based Integrated Rural Development (CBIRD). The main vehicle of community participation is the Village Development Committee, or VDC, composed of nine members representing all 9 wards in a panchayat.

2. The projects implemented by SCF include: improved springs (8) and water taps (22); a new health clinic; a community health leader and female health volunteer outreach program; a community medical shop; family planning motivation; Day Care Centers (6); teacher training; training in building/installing smokeless chulos (stoves); school construction; and adult literacy classes.

3. Sixty percent of survey respondents said that they had participated in deciding on the projects implemented by SCF in their community.

4. Fifty-five percent said that the projects for which they had made a demand were actually implemented. Forty-five percent said they had made attempts to introduce new projects. However, when the survey responses

were broken down by caste, over 70% of the respondents from the "professional classes" (low caste status) and the Darais or tailor caste had made little or no attempt to implement new projects.

5. Sixty-four percent responded affirmatively when asked whether they had participated in SCF projects. This participation has consisted primarily of local labor especially for projects which add infrastructure.

6. Eighty-two percent of the respondents said they had derived personal benefits from the projects: medical treatment (32), drinking water (27), day care (23), and school (21).

7. Community-based structures need to be established or strengthened for all sectoral projects: drinking water, health facilities, and Day Care Centers. While 82% of the respondents did not think any of the projects had failed, 58% expressed that there was a room for improvement in some of the projects. Although some community-based structures exist now, others should be established. More attention needs to be placed on project maintenance, and some confusion exists as to which party, the Village Development Committee or the local Panchayat, is responsible for maintenance activities.

PROJECT DESIGN & POLICY IMPLICATIONS: According to the survey, a substantial majority of the respondents approve of the SCF projects and express their belief in their capacity to continue the development process after termination of SCF support. The project has directly and beneficially impacted on the lives of women through its focus on improving water supplies and access to drinking water, through the establishment of Day Care Centers, by placing emphasis on improving health services for women, and providing adult literacy classes which women attend. Enrollment is over 60 percent women. In other areas of developmental concern, such as altering the caste system, affecting the overall fertility rate, or directly benefitting the poorer population, the project has had less measurable success. However, the co-mingling of children from high and low castes in Day Care Centers is one of the more visible results of a process that should help break down caste consciousness. Likewise, the improved access to health care for the poor and the popularity of family planning services, made possible by the establishment of the health clinic, and the improved access to education through the building of schools are also examples of institution building that impact beneficially on the poor in particular. The implementation of physical construction projects has resulted in increased employment opportunities for chronically underemployed or unemployed persons. The SCF practice of using local masons, carpenters and other skilled tradesmen has been beneficial to indigenous tradesmen and has reduced reliance on the introduction of external technology in a situation where an appropriate technological base does not exist to support the long term use of the imported variety. True, these efforts are of a one-time, short-term nature and the development of an industrial basis for economic growth cannot be immediately accomplished in this manner. More profound development efforts in the areas of agriculture, income-generation and marketing are obviously required in order to impact more importantly on the fundamental economic base of the community. In this area, the SCF project has just started to focus its resources in a more systematic, concentrated approach.

In a larger programmatic context, the SCF Project philosophical and methodological approaches are in apparent conflict with that of other USAID-funded programs in the area, namely the Resource Conservation and Utilization Project (RCUP) which is vastly more comprehensive, extensive and costly than SCF's. These differences in approach and resource inputs demand careful analysis and coordination, particularly in the newer SCF project areas which lie within the RCUP's geographic area. In a developmental context, the SCF project is a "Model" approach, i.e., it focuses the efforts and funds of an outside donor agency on a specific locale. The donor agency's personnel have access to governmental agencies and personnel, communication systems and funding sources not normally available to villagers or village institutions. SCF project staff are committed to the administration of project resources and activities in a locale-specific context unlike government programs that are more broadly based. The current evaluation discusses only briefly these advantages in terms of the relative successes of the SCF project. In fact, the actual measure of the SCF project's effectiveness may not be assessed realistically until several years after all project personnel have left the area and entrusted the continuation of the CBIRD philosophy and methodology to locally trained leaders.

RECOMMENDATIONS:

1. The involvement of the villagers in infrastructural project maintenance work should be increased particularly in establishing an institutional responsibility as well as foundation for this aspect.

2. SCF should pay increasing attention to income generating activities and the encouragement of private entrepreneurship.

3. SCF should commence additional agricultural development measures, e.g., emphasize multi-cropping in Khet land, introduce high yield maize seeds, develop cash crops, experiment with better methods of composting, provide vocational training to local blacksmiths for implement production, initiate better grain and seed storage practices and facility development, and encourage improved animal husbandry practices.

4. SCF should explore various ways and means of improving villagers' access to credit for agricultural purposes such as production loans.

5. The SCF Country Director and his counterpart in the SSNCC should initiate high-level discussions, either directly or through USAID, with regard to coordinating some of the specific projects planned by both agencies in those areas where both projects are operating. In addition, there is a need to establish some form of accommodation or compromise between the apparently differing philosophies of rural development particularly with regard to payments made to workers on development projects.

This evaluation was performed in April and May, 1984 by N-F Development Consultants. The principal investigators were Nanda R. Shrestha, Ph.D., Badri N. Kayastha, Ph.D., Paul F. Kaplan, Ph.D., and Hari Bakta Pradhan. [Ed. note: The professional affiliation of the principal evaluators is not specified in the evaluation report.]

*The present evaluation uses the designation "STC" to refer to The Save the Children Federation although the designation "SCF" is normally used as was the case in the first evaluation. For consistency, this summary uses the "SCF" designation.

REVIEW OF FARMER-MANAGED IRRIGATION IN NEPAL

PROBLEM & OVERVIEW: In most places in the hills of Nepal, and to a somewhat lesser extent in the Terai, wherever there is a reasonable potential for developing irrigation, farmers have already made some effort to irrigate part of these command areas. Recent estimates suggest that farmer-operated irrigation systems provide 93% of the irrigation in the hills and 74% in the Terai. Some of these systems date to hundreds of years and were built under the direction of petty Rajas (kings); others are more recent and have been developed entirely by local initiative and resources. Wherever there is some existing irrigation, there is also an organization to carry out the primary tasks of an irrigation system.

PURPOSE OF EVALUATION: This study aims at investigating the nature of the indigenous organizations which govern the allocation of water, the maintenance and further development of existing systems as well as the socio-political systems which exist to plan water use, organize labor, mobilize other resources and to resolve conflict over water use rights. It is intended that the findings from this study be used to guide the development of both extensive and intensive irrigation development projects.

FINDINGS:

1. Groups of farmers work together to develop their water resources. Often they hire other villagers who are skilled in cutting canals and tunnels through hard rock. Until very recently, all materials used were from the local community. Now cement and steel or plastic pipe are commonly imported.

2. Two basic principles of water allocation have been observed. The most common is to divide the water in proportion to the area of land irrigated by each farmer in the command area. Another is by selling shares in the system to members. In this scheme, no relationship between land ownership and water ownership is made.

3. Three methods of distributing the water equitably for monsoon rice cultivation have been observed. One method is through the use of saachos, or horizontal weirs made from a log with two or more notches of equal depth but varying widths cut into the top. Another common method is by timed rotation. A third method is by contract where the members of the organization pay one or more persons to deliver the water to all the fields.

4. Most organizations hold a meeting to address maintenance needs before the critical period which is just prior to and during the monsoon season. Maintenance is generally done by members themselves. Some organizations contract this work. During the monsoon period, members patrol the system for early detection of problems. In emergencies, most organizations require all members to work irrespective of the number of shares owned or the size of the land-holding irrigated.

5. Conflict is resolved usually by fining the member or non-member who is found to have stolen water or is absent from work during his turn. Sometimes the guilty party is physically punished. Generally one will be denied water at his next turn. One organization exacted a public confession from the guilty party.

6. Most improvements have been done by raising resources from among the members. Money has been raised to give contracts to persons skilled at cutting canals and digging tunnels. Over one half of the observed systems received some assistance from the government.

7. To mobilize resources, members are usually required to contribute labor and cash according to their land area which is served. Another basis for resource mobilization is in proportion to the productivity of the irrigated land. Most organizations keep written records of members' attendance at work and levy fines against those who shirk.

8. Agricultural productivity is the best measure by which to evaluate the effectiveness of these systems. In most of the systems observed, triple-cropping is practiced with cropping intensities of nearly 300%. Average yields from sample crop cuts in four mid-hill systems have ranged from 3 to 3.5 metric tons per hectacre for paddy and 2 to 2.5 for wheat.

PROJECT DESIGN & POLICY IMPLICATIONS: Several important points emerge from the study of farmer-managed irrigation systems and from the review of Nepal's experience in irrigation development:

1. There is existing local experience with water management and irrigated agriculture because in most locations where there is irrigation potential farmers have already developed the water and land resources to some extent. This existing organization and infrastructure should provide the starting point for a users group.

2. Farmer-managed irrigation systems are effective in managing the water resources to achieve improved agricultural production. The organizations are capable of timely delivery of water, allocation and distribution of water, labor mobilization for maintenance, resource mobilization including cash to pay for materials, supervision for carrying out construction and identification of most serious problems in the physical structure, and the setting of priorities as to what should be done first.

3. Farmers use an incremental approach in irrigation development which allows accumulated knowledge and experience of each undertaking to be used in the next improvement or expansion. In this way, there is a minimal disturbance of the existing irrigation system and work can be fitted to slack periods.

4. Water allocation by purchased shares provides financial incentives for efficient water management and for expanding the land area served. Allocation in proportion to area irrigated contains no incentive for efficient management nor a mechanism for expanding the area irrigated as the supply is increased.

5. When farmers "own" the farmer-managed system, they take full responsibility for its operation. The farmers in these systems have both the incentives and means to enforce compliance with rules formulated for efficient and equitable operation of the system.

This study was conducted by Edward D. Martin and Robert Yoder. [Ed. note: The report does not contain information about their qualifications, affiliations and the funding source for the study.] The study was presented at the Water Management Issues Seminar held in Kathmandu, Nepal between July 31 and August 2, 1983.

STRENGTHENING AGRICULTURAL RESEARCH IN PAKISTAN

PROBLEM & OVERVIEW: Agriculture is the largest single sector of the Pakistan economy, accounting for 32% of the GDP and employing 55% of the nation's labor force. It earns 80% of the country's foreign exchange and provides sustenance to over 70% of the population of 90 million which is increasing at the rate of 3% per annum. In its Fifth Five Year Plan (1978-79 to 1982-83), a major objective of Pakistan was to achieve a 6% per annum growth rate in agriculture, which would permit increases in per capita consumption and increased earnings of foreign exchange while keeping pace with population growth. Allocations of funds for agricultural research were increased and major changes were made in the organization and management of research at the federal level. However, growth averaged about 4% per year over the five year period. This was due more to increases in cultivated acreage than in yields per acre, which remained far below their productive potential.

The inadequacy of the Pakistan agricultural research system to support a high rate of growth in agriculture has long been recognized. At the time of India's independence (1947), the very substantial agricultural research system of India was left largely in India. Not one of the national institutes was located in territories which constituted Pakistan.

U.S. ASSISTANCE: Beginning in 1969, A.I.D. entered into a series of Project Agreements (#391-0296, Loan #391-T-156, Grant #391-17-110-296) with the Government of Pakistan (GOP) for strengthening GOP's agricultural research system. The target of the initial funding was the Punjab Agricultural University at Faisalabad followed, in 1974, by support to the Pakistan Agricultural Research Council (PARC). Although the official starting date was 1969, no significant activities were undertaken until the 1974 grant. The purpose of this grant was, and remains, "to establish a functioning centrally coordinated program of agricultural research for major agricultural commodities which effectively translates policy guidelines into specific research projects with achievable results." Several problems arose early in implementation. Project reviews in 1976 and 1977 led to a redesign of the project in 1978, giving higher priority to building an institutional base which could eventually support a comprehensive research program. In 1979, the project was suspended due to disruptions in Pakistan-American relations. It was again amended in April, 1982 and extended for another three years with funds added to complete construction of the National Agricultural Research Center (NARC). The 1982 agreement increased the Rupee component by Rs. 29,700,000. Total USAID funds available since 1969 amount to $6.2 million in development loan funds, $4,792,000 in dollar grants and Rs. 155,200,000 in Mondale rupee grants. The other major donor is the Government of Australia ($800,000). Pakistan counterpart funds total Rs. 129 million.

PURPOSE OF EVALUATION: The purpose is to assess the impact of the project on strengthening the research capability of the Pakistan agricultural research system. The Scope of Work describes six general areas and eight social science areas of inquiry. A six-member, multidisciplinary team was engaged. This team examined relevant documents, conducted field visits, and held interviews with GOP and USAID personnel and staff from several agricultural research institutes and universities.

FINDINGS:

1. At NARC, the training and conference center is essentially complete and in operation although it appears inadequate in light of future needs. The Farm Service Center has been remodeled and improved. Facilities have been developed for the plant genetic resources unit and for coordinating units of several national research programs. Progress has been made on land shaping and development of the irrigation system for that portion of the 1395 acre site scheduled to have permanent irrigation. Overall, 113 acres have been precision leveled, 3.1 miles of irrigation channels, 4.2 miles of drainage channels and 15 miles of road have been built.

2. National Coordinated Programs (NCP) have been instituted in nine areas. Coordinated programs farthest advanced are: (1) wheat, barley and triticale; (2) maize, sorghum and millet; (3) rice; and (4) oilseeds. The results of the wheat NCP have been impressive and production has now risen to more than twelve million tons since 1978 when total production fell below eight million tons due to a serious rust epidemic.

3. No farming systems studies have yet been initiated by NARC although one seminar on Farming Systems Research was held this past year. A number of PARC's current efforts in relation to farming systems work can be traced to this workshop. NARC is inadequately staffed in agricultural economics and other social sciences needed to support an adequate farming system research program. There is a continuing, serious shortage of economists in the PARC system, and recruitment of sociologists and anthropologists is lagging. A PARC Farming Systems Coordinator has not yet been appointed, and PARC is without a council member for Social Sciences.

4. The project has made some progress in developing stronger links with extension. Field trials are being carried out by most research institutions on farmers' lands. PARC is involved in production maximization campaigns for major crops and has initiated travelling seminars under the national coordinated programs.

5. Manpower development has taken place primarily through training abroad for advanced degrees. One hundred and five participants have been sent abroad for advanced degrees or for short-term, non-degree training. Of these, 78 have returned to Pakistan and, with few exceptions, are employed in their sponsoring institutions in areas for which they were trained. Response to opportunities for advanced degree training in Pakistan has been slow reflecting a general concern that local degrees have little value.

6. Post graduate training in Pakistan needs strengthening. While the agricultural universities have some competent staff, several disciplines are not well staffed, lack facilities, equipment and research funds, particularly at the M. Sc. and Ph.D. levels. The staffing of NARC is especially weak in the areas of horticulture, agricultural economics and other social sciences, entomology/integrated pest management, dryland soil management and weed control.

7. Research planning within PARC is still at the evolutionary stage. In 1980-81, PARC introduced the Coordinated Agricultural Research Planning Systems of Pakistan (CAREPLANS) and a Planning Unit, including a Director of Planning and a small support staff, was established. This unit needs more resources and strengthening of its analytical capabilities.

8. Delays and uncertainties in the release of funds by the Ministry of Finance to PARC adversely affect operations of NARC and PARC-funded projects. Fair salary scales and good opportunities for advancement and responsibility as well as adequate facilities and support services are policy issues that must be addressed in order to create an environment of incentives in which well-trained Pakistani scientists can conduct professionally satisfying research.

PROJECT DESIGN & POLICY IMPLICATIONS: The initial Project Agreement focused on PARC as the responsible counterpart agency and detailed a specific but ambitious program for strengthening the national system for which PARC was inadequately organized and staffed to complete. Thus, although the project began officially in 1969, it was not until the 1976 and 1977 reviews that the major problems contributing to the disappointing progress were acknowledged. The 1978 project redesign initiated changes which helped the project survive subsequent disruptions in 1979 and 1980. The 1982 amendment appears to have assured its successful conclusion through the provision of more funding. An excellent facility for national, centralized research and training is being constructed. An improved system of national coordination for organizing and managing research, fundamental to the effective mobilization of scientific resources for solving agricultural production problems, is now emerging at the center. It will need further support to maintain the momentum and to strengthen its administration and management. However, the history of the project illustrates the importance of undertaking institution-building projects of this kind with patience and flexibility. It should be kept in mind that NARC is a national institution and primarily a support and service organization for the provincial research entities. The station cannot fulfill its primary service function if it is competing with or duplicating work that can be done in the provinces. NARC should be accomplishing, and be recognized for doing, research of a more sophisticated and basic nature than is normally accomplished in the provinces. Perhaps the most important lesson learned has been that in the development of institutions, time, patience, perseverance and flexibility are vital elements. The decision to stay with it, but to modify and redesign to adjust to a very dynamic situation has been, and will continue to be, the key to success of this project. A decade is not a long time in such a development process and A.I.D. should be prepared to allow at least that much time for satisfactory progress to emerge.

RECOMMENDATIONS:

1. In order for NARC to fulfill its role as a national center of excellence, the administrative structure should be strengthened in the following ways:

- an organizational chart should be adopted in which lines of responsibility will determine the kinds of competence needed in the major posts of the organization;
- the current "acting" status of the individual in the position of Director General should be made permanent;
- staffing of the horticulture, agricultural economics and other social sciences, entomology/integrated pest management, dryland soil management and weed control sections should be upgraded as soon as possible;
- subsequent USAID assistance should concentrate on development activities;
- PARC should review the lines of communication from PARC through project coordinators and directors to projects at institutes and universities, especially in communicating budgetary changes and should insist that each level develop plans for areas to be changed or modified in the event of budgetary increases or decreases contingent on the annual budgeting process outcome;
- PARC should seek firm assurances by the Ministry of Finance for the regular release of government funds on a quarterly basis and should consider adopting the financial management improvements recommended by the World Bank;
- PARC should explore possibilities of increased use of staff of research institutes and universities where PARC-funded projects are located thereby reducing the need for releasing project employees in times of budget restrictions and providing more opportunities for university staff members to obtain research experience.

2. PARC should assign high priority to the selection and appointment of a Farming Systems Coordinator and a Member from the Social Sciences discipline in order to provide the support and direction needed for an improved outreach program and to assist in establishing the farming systems research program.

This evaluation was conducted and prepared in October, 1983 by six-person team which included: Keith M. Byergo, Agronomist/Agricultural Development Administration; Ralph W. Cummings, Sr., Agricultural Research Administrator; Victor S. Doherty, Anthropologist; William H. Hansen, Social Anthropologist; Thomas K. Martindale, Financial Analyst; and Russel O. Olson, Agricultural Economist/Agricultural Development Administration.

EVALUATION OF THE FEASIBILITY OF USING VOLUNTEER COLLABORATORS FOR MALARIA CASE DETECTION AND TREATMENT IN THE MALARIA CONTROL PROGRAM - PAKISTAN

PROBLEM & OVERVIEW: Previous external reviews of the Pakistan Malaria Control Program (MCP) have identified the need for strengthening and broadening surveillance activities. Until recently, such efforts have relied almost totally on Active Case Detection (ACD) in which the malaria worker obtains bloodsmears from persons with symptoms suggestive of malaria. Recommendations have also included the establishment of an effective Passive Case Detection (PCD) system in which a surveillance post is set up in a specific area and persons with symptoms suggestive of malaria are encouraged to visit the post for a diagnostic bloodsmear.

U.S. ASSISTANCE: The U.S. assisted the Government of Pakistan (GOP) from 1975 to 1981 in a multilateral effort to reduce the incidence of malaria to an annual parasite incidence (API) equal to no more than 500 positive cases per one million population. Currently, U.S. assistance is being provided to the GOP for malaria control under a grant agreement entitled Malaria Control II (\$391-0472) signed on May 19, 1982. The grant consists of \$41 million of bilateral funds and the equivalent of \$39,699,904 in host country counterpart funds. Other participants are WHO and the Japanese government. The scheduled Project Activity Completion Date (PACD) is September 30, 1987.

The Committee on Malaria Surveillance of the Directorate of Malaria Control (DOMC), GOP, recently began a new program methodology for malaria surveillance in four districts of Pakistan using the concept of a network of Volunteer Collaborators developed in Latin America. These volunteers are trained by malaria workers to take thick bloodsmears and administer a presumptive treatment for malaria to febrile patients.

PURPOSE OF EVALUATION: This evaluation's purpose was to determine the feasibility of using Volunteer Collaborators (VC) for malaria case detection and treatment. Three of the four DOMC project districts were visited -Lahore/Punjab, Bannu/Northwest Frontier Provinces (NWFP), Larkana/Sind. Individuals including health officials, staff, supervisors, and some VC already trained and functioning were interviewed. Previous external evaluations were conducted in May 1983 (Part I) and September 1983 (Part II).

FINDINGS:

1. The selection of VC has been limited to school teachers and unqualified dispensers of health care such as hakims, quacks, etc. Several female school teachers have been selected and trained in Larkana District although the great majority are male.

2. The training new VC have received is not of very high quality, although none was lacking in enthusiasm or willingness to learn and improve. The majority of those VC interviewed does not have a thorough understanding of their duties, is unaware of the correct presumptive dosage of chloroquine, and is not proficient in making bloodsmears. Many lacked materials needed to carry out their duties.

3. Certain cultural obstacles and personnel management problems must be more effectively addressed in the Project Design if the VC Network in Pakistan is to be successful. The purdah system makes it difficult to identify women to serve as VC or to convince them to make use of the VC. Low morale among malaria control program personnel is a common problem, as is lack of discipline and a sense of responsibility. Lack of adequate transportation is a chronic problem particularly for supervisors.

PROJECT DESIGN & POLICY IMPLICATIONS: It is clear that a network of VC for Passive Case Detection can be established and made to function effectively in Pakistan. Aside from certain obstacles related to technical aspects and the structure of such a program, policy initiatives which address existing preconceived, negative attitudes on the part of some MCP officials and staff about volunteer workers and the concept of PCD are critical to future program success. The feeling exists among many medical officers and technicians in general health services that malaria is not their responsibility. Thus they may be reluctant to participate fully in a nationwide PCD network. The lessons learned from the Latin American experience should be applied to the

Pakistan project. Specifically, it should be recognized that to achieve an effective PCD system requires considerable time and until the Passive Care Detection System becomes more efficient, the Malaria Control Program should not be discontinued. Furthermore, the introduction of a new system, the PCD, is unlikely to be effective unless the existing malaria control cadres are re-oriented and made aware of their expected relationships and responsibilities with the new cadres. Finally, the introduction of a new system requires flexibility in adapting programmatic needs to the environment and innovative leadership to solve unexpected problems. The project design should permit and encourage both.

RECOMMENDATIONS:

1. The number of VC in each existing project area should be increased to 40 or 50 to allow a fair evaluation of the pilot VC network and yet not be so many that adequate supervision will be a problem.

2. Both the ACD and PCD programs should be combined so that Malaria Supervisors are responsible for both and the two activities complement each other.

3. Standardized guidelines should be established for the selection, training and supervision of VC during the Pilot Project.

4. Classroom and on-the-job training should be provided to all MCP workers assigned to the Pilot Project in the methods to be used in the selection, training and supervision of VC.

5. Incentives (other than cash) should be provided to VC to encourage their long-term, enthusiastic participation. Examples might include such ideas as diplomas, identification cards, preferential treatment at government health facilities, etc.

6. Incentives should be provided to MCP workers assigned to the Pilot Project and work codes for MCP workers should be more strictly enforced.

This evaluation was conducted and written by Dr. Trenton K. Ruebush II between April 29 and May 19, 1984. [Editor's note: the professional affiliation of Dr. Ruebush is not mentioned in his report.]

EVALUATION OF THE NATIONAL ORAL REHYDRATION PROGRAM - PAKISTAN

PROBLEM & OVERVIEW: Diarrheal disease continues to be one of the major health problems for Pakistan's estimated 94 million people and especially for the 17 million Pakistani children less than 5 years of age. Diarrhea and respiratory diseases are probably the two leading causes of death in children less than five years old and prevalence surveys indicate that children in this age group have 4 to 6 episodes of diarrhea per year. The mortality rate for children less than five years of age is 29 per 1000 live births. By assuming that 40% of these deaths are caused by diarrhea, a total of 200,000 children die each year in Pakistan from this cause. The impact of diarrheal disease is also indirectly reflected by the incidence of malnutrition. The rates for malnutrition are 2 to 3 times higher in rural areas as compared to urban.

U.S. ASSISTANCE: No direct U.S. assistance is currently received. The Ministry of Health and Social Welfare (MOHSW) instituted a Diarrheal Disease Control Program in 1982 emphasizing the use of oral rehydration salts (ORS) as part of a three-phase Accelerated Health Program (AHP). The use of ORS actually began in Pakistan in 1971 and UNICEF supplies began arriving in 1975. Under the AHP, the oral rehydration activities (production and distribution) have been assigned to the National Institute of Health (NIH) and the Health Education Cell of the Basic Health Services Unit (education and promotion).

PURPOSE OF EVALUATION: At the request of the Government of Pakistan (GOP), A.I.D. sponsored a consultant team from the PRITECH Project to review the current Pakistani Oral Rehydration Therapy (ORT) Program and to recommend ways of rapidly expanding the use of ORT in Pakistan. The team members were asked to review six areas of the ORT Program: (1) constraints preventing ORS use; (2) actions required to achieve widespread use; (3) private sector potential; (4) distribution and marketing; (5) assessment of production and distribution capacity; and (6) the surveillance system.

Information on the ORT Program was obtained through visits to urban and rural health facilities in 3 provinces. Interviews were conducted with pharmaceutical, media and marketing professionals, as well as with government and private health care providers and consumers.

FINDINGS:

1. The major constraints preventing ORS use at present appear to be: (a) lack of full-time management of the ORS campaign; (b) limited promotional and public education activities; and (c) inadequate surveillance. The primary target population is unaware of the benefits of ORS. Existing health care facilities serve only a small percentage (17% by some estimates) of the population. The lack of information is the single most significant constraint preventing ORS use.

2. At the present time, the health education system is poorly equipped to carry out a mass promotion campaign for ORS. No educational program is now in place to instruct mothers on how much ORS to give, how to administer ORS during vomiting, or how to determine when a child requires medical attention. The orientation and training of medical officers has at this point not been sufficient to ensure their support for a mass campaign for ORS. There remain difficult problems in recruiting female paramedics who have been given the task of educating mothers in ORT at Rural and Basic Healthcare Units and in training Community Health Workers within the villages. Among the current cadre of health educators, which numbers 25, only six have a professional degree or diploma in health education.

3. There are between 20 to 25 million one litre packets available in the private sector and 5 million one-half litre packets in the public sector. NIH production during the first four months of 1984 was 700,000 one-half liter packets. Plans have been made to introduce double shift production at NIH. Estimated costs are Rs. .546 per 1/2 litre packet and Rs. .853 per one litre packet.

4. Currently, five companies are producing ORS with an estimated output of 25 to 30 million one liter packets in 1984. One other company plans to start production in mid-1984. Four companies are using the WHO-recommended ORS formula and one is using a different formula. Eight companies have been licensed to

produce ORS. One other application is under consideration. One company has applied to import ORS. Four other companies have expressed interest in manufacturing ORS but have not made application for license.

5. ORS is widely available in Pakistan, particularly in drug stores in cities and villages. ORS is also distributed from provincial depots in Quetta, Peshawar, Karachi and Lahore. Distribution is nation-wide rather than regional. The general pattern of distribution of drugs in the private sector is through independent wholesalers. One international company had contracts with 24 wholesalers throughout the country. A major local company listed 17 cities in which wholesalers had been appointed.

6. The epidemiologic surveillance system outlined in the Pakistan National Control of Diarrheal Disease (CDD) Program document is not functioning at this time. The surveillance system in place cannot now provide the timely data required for effective management of the program. The major deficiencies include a lack of a uniform definition of diarrhea, incomplete data collection and recording, inaccurate recording and tabulation of data, significant under-reporting of deaths, lack of a mechanism to identify epidemics, and lack of feedback for data collectors.

PROJECT DESIGN & POLICY IMPLICATIONS: Specific policy actions which should be taken to ensure the uniform implementation of both public and private sector aspects of the ORT program include: (1) giving priority to the establishment of a Federal Drug Inspectorate; (2) licensing only firms which use the WHO-recommended ORS composition; (3) reviewing existing licenses with special reference to labeling and dosage instruction; (4) authorizing only packaging which includes illustrations on the preparation and use of ORS; (5) standardization of the quality of active ingredients of the ORS formula; and (6) instituting a program of product sampling from different parts of the country at various periods after manufacture.

RECOMMENDATIONS:

1. It is recommended that Pakistan adopt a two-phase strategy as is outlined in the GOP's National Diarrheal Disease Control Programme, i.e., develop a comprehensive health communication program to promote widespread use of existing ORT packets and implement a market research program to determine how a home-made sugar and salt solution could be added to the program in Phase II.

2. It is recommended that the health education program adopt an aggressive marketing strategy by contracting local advertising and marketing firms to assist NIH implement communication activities.

3. It is recommended that traditional healers be incorporated into the ORT program perhaps initially through a number of short-term training or orientation seminars.

4. It is recommended that an ORS curriculum guide be developed and made mandatory in medical colleges and that financial support to ORT training at the Mayo Hospital Program in Lahore and the School of Public Health Nursing in Peshawar be continued. Activities similar to those at the Mayo Hospital should be established at Peshawar and Karachi. Training should focus more on practical, hands-on experience and on using competency-based instruction with verifiable outcomes. A systematic evaluation of the training program should be instituted which specifically measures the skills of the trainees.

5. It is recommended that research projects be considered in four areas: (1) operational research in mass media techniques; (2) operational research in surveillance and reporting techniques; (3) a comparative study of efficacy of anti-diarrheal agents and placebos to treat diarrhea, and (4) a study of the infectious agents which cause diarrhea in urban and rural Pakistan.

This evaluation was conducted for PRITECH by the following consultants: William Hewitt, Maurice Imhoof, William Smith and John Snyder during the period April 29 to May 20, 1984. Note that this Summary was prepared from a DRAFT REPORT not yet reviewed by PRITECH or A.I.D.

REPORT OF THE IMPACT EVALUATION OF THE AGRICULTURAL RESEARCH DEVELOPMENT PROJECT II - PHILIPPINES

PROBLEM & OVERVIEW: Increasing food production to meet the needs of a growing population is critical for the economic development of the Philippines. Land-use intensification is necessary in view of the very limited area of new land that can be brought under cultivation. Small farmers, both owners and tenants, form the base of Philippines agriculture. They can only contribute to the development of a national economy which is still overwhelmingly agricultural if they can increase productivity. Research in agriculture is central to agricultural growth and in the past has made a substantial contribution to growth. However, its impact has been limited by administrative fragmentation and its over-centralization in the Manila and Los Banos geographic areas.

U.S. ASSISTANCE: A five-year project loan agreement (#492-0286/492-T-055), signed on July 16, 1979, provided U.S. $10 million for the period FY 1979 through FY 1984. The Government of the Philippines' (GOP) contribution was the equivalent in Pesos to U.S.$32.1 million. The project was designed to strengthen research capability at eight research centers particularly on key commodities produced by small farmers. Four of the centers involved work on regionally important commodities but also have national mandates to do basic development work for commodities which are of national importance. One center is a single-commodity station, and the other three are regional centers. In addition, the project was designed to strengthen the Philippines Council for Agriculture and Resources Research and Development (PCARRD) capacity to plan and manane research. The goal of the project has been Philippine national self-sufficiency in key agricultural commodities suitable for production. A sub-goal has been to increase productivity and income of small farmers. The project purpose has been to increase national and regional agricultural research activities carried out on key commodities produced by small farmers. This project is USAID's second agricultural research loan to the Philippines.

PURPOSE OF EVALUATION: The evaluation investigates the impact on production, yields and income, especially of small farmers, of the PCARRD loan. It also investigates the effects on consumers. Since it was judged too early to see much impact of research after five years, with the agreement of A.I.D., the time horizon was extended to include the first loan or a total period of nine years. It was felt that even nine years was a short time to determine the effective impact of the type of capital investment in research represented by this project. The methodology used involved interviews with scientists of PCARRD institutions, data collection and questionnaires administered to farmers in the impact areas. The lack of data for an economic impact evaluation was an important constraint in this evaluation. To a lesser extent, the lack of social data was also a constraint.

FINDINGS:

1. The project has already had positive impact on small farmers. The major impact has been in corn, rice, tobacco, and rubber production. The introduction of downy mildew-resistant varieties of corn, and the discovery of a chemical method of seed treatment has resulted in the virtual elimination of the disease and is partly responsible for an 8% increase in yields. Research on corn borer pests has reduced the health hazard associated with traditional methods of control (by reducing the number of applications of pesticides), and has reduced the negative ecological impact of corn borer control programs. Other data indicate that tobacco farmers in Marcos, a baseline study area, were able to increase their yield per hectare about 80% due to increased inputs and a complete shift from older varieties to the best yielding, high quality, Virginia variety. In the next five years there will be also be a significant impact on sweet potato productivity.

2. Closer links have been forged with farmers and scientists are learning from growers. A corn producer in Mindanao developed the practice of detasseling corn to control the corn borer and made this known to scientists at a PCARRD-Southern Mindanao Agricultural Research Center (SMARC) sponsored symposium. PCARRD provided a grant to a scientist to verify this method and the result is a technique validated and operational in the Maisagana corn production improvement campaign.

3. PCARRD was a key institution in coordinating the application and wider dissemination of the KABSAKA PACKAGE, a program of hybrid rice seed and pre-emergence herbicides aimed at making two rice crops per year the norm in rainfed areas where agro-climatic conditions are suitable but where a single rainfed rice crop has been the rule so far.

4. What is probably the strongest and most sophisticated farmers' organization, the Federation of Outstanding Tobacco Farmers of the Philippines, was developed by The Philippines Tobacco Research and Training Center (PTRTC). PTRTC was established in 1977 in collaboration with PCARRD and the Philippine Virginia Tobacco Authority (PVTA), This organization is a direct outcome of a PTRTC training program for extension staff and for farmers. With assistance from PTRTC, the organization has become an important representative of farmers in making decisions such as the floor prices of tobacco and which varieties can be grown.

5. PCARRD/Philippine Institute of Development Studies studies concerning the discriminatory nature of government policies in the agricultural sector have had considerable impact on emerging government policy. This was confirmed in interviews with Philippine economists and policy makers and with economists in the IMF, USAID and other donors. The government has announced that it is breaking up the sugarcane and coconut monopolies. There has been a reduction of tariff protection. Interest rates are more flexible. The peso has recently been devaluated. Such policy changes add directly to the income of poor farmers through higher prices paid for their commodities and to the income of laborers through greater employment in the export sector.

6. No institution has been collecting and analyzing data to indicate the impact of new technology as was supposed to occur according to the Project Paper. Even where accomplishments to date have been the greatest, as with tobacco, data are not available.

PROJECT DESIGN & POLICY IMPLICATIONS: PCARRD has emerged as the leading institution with the scientific capacity to recognize potentially important technology and with the national stature to coordinate research, extension, and training to capitalize on this technology to solve pressing national problems. In this sense, the project purpose has been fulfilled. Concentrating support to specific institutions while allowing PCARRD and the institutions to decide on the use of the funds as they saw fit was a critical element in the project's success. The other element crucial to the success of this project was decentralization without which there would be less technology for small farmers and less interaction between scientists and small farmers. In terms of lessons learned, it is evident that when decentralization is planned and actually implemented, it can work effectively and help achieve intended goals. Research and pilot programs have focused on high value, labor intensive crops and on producer organizations for crops, such as mushrooms and vegetables, which are contributing to increased income and improved living standards of small farmers and laborers. Changes in Philippine government policies on agricultural policy, especially sugar and coconuts and exchange rates, are due, in part, to economics research financed by PCARRD and the Philippine Institute for Development Studies. In this sense, the sub-goal of the project (increased productivity and income of small farmers) has been fulfilled, and both purpose and sub-goal work together towards achievement of the overall goal.

On the other hand, the failure to implement the original evaluation scheme, including the impact assessment component, has frustrated efforts to assess the success of the project and has detracted from disseminating success stories in order to mobilize political and financial support.

RECOMMENDATIONS:

1. A.I.D should consider further loans which provide general support to PCARRD and to its regional institutions. Areas of specific need are those of problem-oriented basic research, more attention to description of the situations of different groups so as to help improve ongoing efforts to tailor research programs to their needs, and research on regional priorities.

2. PCARRD and most regional institutions need to devote more resources to mobilizing political support.

3. The role of social scientists should be strengthened to include the capacity to point out the direction in which rural society is moving and to help set basic and applied research priorities. Social scientists should be associated on research teams with physical and biological scientists from the beginning of the technology development process, not just from the stage of field application.

4. PCARRD needs to consider the long-term effects on itself and on its member institutions of its allocation of research resources. There is a fundamental choice of strategies to be made. This is essentially a choice between applied or basic research or a mix of both, with the latter being a more favorable approach. At present PCARRD's funds from the GOP are being reduced. The A.I.D. grant is ending. New foreign resources which will be available are earmarked for advanced applied research. These include the Rainfed Resources Project of A.I.D. and the Agricultural Support Services Project of the World Bank. Both the availability of money and the current economic crisis facing the Philippines are tilting a program already characterized by heavy emphasis on applied research programs more toward the applied side. The evaluation team feels this is a potentially dangerous trend as basic research, when it is working on practical problems, can have very high payoffs.

5. A.I.D. should consider continued support to PCARRD in the area of basic research at least until the Philippines is through its current economic crisis.

This evaluation was conducted during February and March 1984 by V.S. Doherty, Anthropologist and Research Affiliate, Yale University, and Carl E. Pray, Agricultural Economist, University of Minnesota.

REPORT OF THE EXTERNAL EVALUATION OF THE AGRICULTURAL RESEARCH DEVELOPMENT PROJECT II - PHILIPPINES

PROBLEM & OVERVIEW: Increasing food production to meet the needs of a growing population is critical for the economic development of the Philippines. Land-use intensification is necessary in view of the very limited area of new land that available for cultivation. Small farmers, both owners and tenants, form the base of The Philippines' agriculture. They can only contribute to the development of a national economy which is still overwhelmingly agricultural if they can increase productivity. Research in agriculture is central to agricultural growth and, in the past, has made a substantial contribution to growth. However, its impact has been limited by administrative fragmentation and its over-centralization in the Manila and Los Banos geographic areas.

U.S. ASSISTANCE: A five-year project loan agreement (#492-0286/492-T-055), signed on July 16, 1979, provided U.S. $10 million for the period FY 1979 through FY 1984. The Government of the Philippines' (GOP) contribution was the equivalent in Pesos to U.S.$32.1 million. The project was designed to strengthen research capability at eight research centers particularly on key commodities produced by small farmers. Four of the centers involved work on regionally important commodities but also have national mandates to do basic development work for commodities which are of national importance. One center is a single-commodity station, and the other three are regional centers. In addition, the project was designed to strengthen the Philippines Council for Agriculture and Resources Research and Development (PCARRD) capacity to plan and manage research. This project is USAID's second agricultural research loan to the Philippines.

PURPOSE OF EVALUATION: The main purpose of this evaluation was to assess the project and PCARRD as an instrument for national development in terms of: (1) effectiveness of Project II implementation; (2) overall performance in research capability development (including infrastructure, manpower, and equipment); (3) program orientation and output; and (4) organizational and operational set-up for generation and utilization of research results. The evaluation was conducted by a team of 11 experts from the U.S. and the Philippines. In 21 working days, this team conducted visits to representative research stations, spoke with researchers, administrators, policy makers and research clientele, and conducted a review of documents and available data. An impact evaluation was conducted by a separate evaluation team.

FINDINGS:

1. Agricultural research Development Projects I and II provided the equivalent of $20 million in new infrastructure. As of December 31, 1983, with six months remaining in the project, 58% of total infrastructure in Project II was completed, 30% ongoing, and only 12% in the pipeline to be implemented. PCARRD monitors infrastructure development status closely and is aware of problem cases.

2. $4,400,000 million worth of equipment and library materials has accrued to agricultural research centers and to the PCARRD Secretariat. Eight-four percent of equipment has been procured as of December 31, 1983.

3. Fifty-six percent of the 820 participant-grant recipients for training in Project II have graduated. Twenty percent are continuing. Two-thirds of degrees awarded occurred outside the Manila/Los Banos area. One hundred ninety-five international training grants were awarded including nine Ph.D.s and 73 travel grants.

4. PCARRD-funded research outside of the Manila/Los Banos area increased 9% between 1981 and 1982 and 18% between 1982 and 1983. It is currently 50%. Funds dispersed rose from 11 percent in 1981 to 40 percent in 1983, dropping a point from 1982.

5. Total GOP budgetary support to agriculture and resources research has grown from Pesos eighty-three million in 1973 to nearly Pesos two hundred eighty one million in 1983.

6. There is a need to continue to support and develop the capacity of PCARRD in coordinating research to contribute to national development goals. An important component of this support is achieving control of

research funding allocation decisions. At the present time, the Office of Budget and Management/GOP responds to PCARRD recommendations, although in some institutions, PCARRD has little influence over or even knowledge of research allocations or activities. The establishment of the Regional Integrated Agricultural Research System (RIARS) presents an opportunity for greater research coordination at the regional level. While some usefully functioning examples of consortia exist, there are many which have not yet become effective.

7. Most researchers requested re-evaluation of PCARRD national, regional, and cooperating station commodity assignments. This consensus re-emphasizes the first recommendation of the August 1983 Performance Evaluation of PCARRD Research Centers/Consortia. PCARRD is aware of this situation and, although desirous of moving toward a new system, cannot suddenly cease funding for one particular commodity. Recommended allocations in the CORPLAN 1984-88 more closely approximate those appropriate to the new system.

8. There exists a critical need to assess, plan and re-evaluate manpower requirements throughout the PCARRD network. Skills which need further development among the PCARRD research network include planning research, organizing action-cum-research projects, preparing budgets for projects and centers, monitoring, evaluating performance, and developing management information systems.

9. Field-verified research results are disseminated through several mediums. These include the Philippines Recommends series, the Technoguide series, Radio Farm News broadcasts, the Technology series, the PCARRD MONITOR, and the Scientific Literature Service. There is substantial research activity in farmers' fields where interaction and feedback processes are used for training purposes.

PROJECT DESIGN & POLICY IMPLICATIONS: Almost all researchers interviewed expressed the viewpoint that the present system is the result of a significant, positive change brought about by this project, and that it is responding to national development objectives as well as providing financial and professional incentives for excellence. There is a spillover strengthening effect on peripheral academic institutions as well. However, the political and social environment of the national research system is in transition and financial crisis. The productivity of The Philippines' agriculture is critical to efforts to manage the present crisis in the long term. It follows that the role of research, including socio-economic research, is equally, if not more, critical to increasing agricultural and natural resources sector productivity. There is a need to cultivate a supportive clientele, primarily among the users of research findings, who will actively assist in obtaining funding for PCARRD programs. If PCARRD is to have effective influence to direct research to priority needs, a larger portion of GOP financial support for research must be provided to PCARRD for allocation. For PCARRD the major lesson learned is that it must define both its basic and its applied research goals in such a way as to strike a balance of programs and allocations that reflects both long-term research needs and objectives and the more immediate pressures for measures that give relatively quick results to problems which stem from the current economic crisis. The current success of PCARRD is based partly on its predecessors' inabilities to conduct and disseminate cogent research on a timely basis to the appropriate audiences. Thus for PCARRD to consolidate its successes and marshall the support it needs for the future, it must take the lead in organizing comprehensive national commodity research and development programs.

RECOMMENDATIONS:

1. USAID should be requested to extend the Project Activities Completion Date to December 31, 1984 and immediate action should be taken to complete construction and procurement of equipment for all research facilities.

2. PCARRD should take steps to increase its total budget allocation from the GOP as is envisioned in the NEDA Five Year Development Plan.

3. PCARRD should assist the regional consortia to initiate and make reviews of commodity assignments at all levels with the intent of better matching current needs and goals with research and development capabilities. At the same time, efforts should be made to improve the centers' capacities to maintain and promote regional institutional cooperation among themselves.

4. PCARRD should review and clarify its system of setting research priorities and programs with the objective of developing a simpler, more obvious allocation system which corresponds to national development objectives and takes into consideration regional needs and potentials.

5. PCARRD should give greater priority to manpower development through an aggressive action-oriented program which includes the use of innovative schemes and institutional assistance to members of the research network. Improving research leadership and management capabilities are important priorities in this respect.

This evaluation was conducted in January 1984 by a team composed of Fernando A. Bernardo, President of Visayas State College of Agriculture, Baybay, Leyte; Gelia Castillo, Professor of Rural Sociology, University of the Philippines at Los Banos; Ralph Cummings, Jr., Team Leader and Agricultural Economist, Directorate of Food and Agriculture, S&T/A.I.D.; Charles Larson, Professor Emeritus, State University of New York; Satiago Obien, Director, Philippines Tobacco Research and Training Center; Rafael Rodriquiz, Associate, and Emanuel Soriano, Managing Director, Emanuel V. Soriano and Associates; and Larry Zuidema, Associate Director, International Agricultural Programs, Cornell University.

SMALL FARMER SYSTEMS II - PHILIPPINES

PROBLEM & OVERVIEW: The KAISA (kalipunan ng mga ISA) is the umbrella organization of the Federation of Integrated Services Associations (ISA) at the provincial level in the Philippines. The Farm Systems Development Corporation (FSDC) is attempting to develop sixty-five ISAs found throughout the country into self-managed and self-reliant rural organizations primarily through focusing resources and administrative powers through the KAISA. The federation of the community-based ISAs into provincial-level KAISAs is the second of three stages envisioned by FSDC to develop small farmers into a desired self-reliant status. The first stage was the organization of small farmers into ISAs. The third stage is the organization of the different KAISAs into a national confederation of KAISAs.

U.S. ASSISTANCE: USAID is assisting the Government of the Philippines (GOP) through a Project Agreement (#492-0334) that provides capital for two kinds of loans to the FSDC for administration: (1) the institutional development loan, or IDL, which is used to partially finance the training of KAISA officers, general managers and staff and to defray expenses for the operation of the organization; and (2) the enterprise development loan, or EDL, which is used to provide initial capital for income-generating projects. The goal of the KAISA is to enhance the institutional and financial viability of the ISAs. The purpose of the KAISA is to serve as a vehicle through which the various ISAs can be developed into self-managed and self-reliant rural organizations. The organization of KAISA started in late 1980. However, neither the actual project start date nor the Project Activities Completion Date (PACD) are mentioned in this report. Of the twenty-eight KAISA already engaged in enterprises, six received some financial support from USAID in integrated rice processing endeavors. The amount of USAID's contribution is not stated in the evaluation report.

PURPOSE OF EVALUATION: The general purpose of this evaluation is to assess the status of institutional and enterprise development of the KAISA focusing specifically on the KAISA's capacity to assume greater levels of self-management and self-reliance and to provide needed services to member ISAs. The evaluation also analyzed the development and management of KAISA enterprises including their operational and financial performance and the projection of the KAISA's future from the viewpoints of the KAISA personnel and members, FSDC officials and local leaders. Seven KAISAs, 24 ISAs and 4 FSDC Area Officers covering these KAISAs were included in this study.

FINDINGS:

1. The capacity of the KAISAs to assume greater levels of self-management and self-reliance, and to mobilize resources independently of FSDC is only a long-term potential. Important interrelated factors presently contributing to their slow maturation include: (1) extremely low levels of KAISA equity generated directly from ISA members; (2) inadequate involvement of KAISA Board of Directors in policy and planning; (3) the "soft-sell" approach adopted by FSDC towards the IDL, (4) the KAISAs ineffectiveness in providing institutional and extension services that member ISAs perceive are better than those provided by existing private or government sources; (5) the generally poor operational and financial performance of KAISA enterprises due to lack of ISA support.

2. The low level and slow build-up of KAISA equity suggests that the benefits from KAISA institutional and extension services and enterprises have not yet been perceived by the ISA farmers as significantly better than those already available elsewhere. FSDC and the KAISA have apparently not attached much importance to equity build-up as data are not readily available and equity build-up programs are absent in all KAISAs.

3. The complementary aspects of KAISA capital and KAISA organizational capacity to achieve economies of scale have not been generally recognized by KAISA Boards of Directors. Board of Director involvement in planning and policy-making has been limited. This is partly due to low levels of KAISA equity and, hence, managerial control and partly to lack of appropriate management training. Within the sample of KAISAs studied, two enterprise models have been identified, each associated with different levels of Board of Directors participation.

4. Institutional Development Loans are granted on excessively liberal terms which serve as a disincentive to equity build-up. Such favorable IDL terms may adversely affect KAISA management's attitude toward repaying EDLs as well since, on paper, EDL loan terms are much stiffer.

5. Three of the seven KAISAs studied have assisted their ISA members in securing production credit from institutional credit services. A major obstacle to securing more credit is the reluctance of rural banks to lend to small farmers because of massive loan repayment problems suffered in the past.

6. ISA members are generally satisfied with the training services provided by the Institutional Officers; however, several training programs have not achieved their goals. The most important factor contributing to the non-adoption of technological packages appears to be the lack of training and experience on the part of the Institutional Officers to match ISA needs with the most beneficial technology.

7. All KAISA enterprises suffer from serious operational and financial problems and have experienced generally poor financial performance. These problems are the result of several interrelated factors including FSDC staff inexperience, unrealistic marketing feasibility studies and analyses of pricing strategies of competitors, and poor management.

PROJECT DESIGN & POLICY IMPLICATIONS: The challenge to the KAISA management is to develop and implement policies that support the expansion of ISA linkage projects by securing better prices than are obtainable by ISAs alone, and by improving access to institutional credit through economies of scale, superior bargaining skills and quality management. If these KAISA services to member ISAs are to prosper, equity must be generated and retained as working capital, segregated from all FSDC loan amortization payments. So far and in a general sense, KAISA equity build-up policies are not as well developed for KAISA growth as they are for ISA growth. The FSDC and the KAISA management have to adopt better policy attitudes, re-examine their priorities, improve their organizational and management capabilities, and achieve significant progress in solving identified problem areas before the KAISAs can achieve the major goal of enhancing the institutional and financial viability of the ISAs. There is evidence which suggests that the intermediate goals may be better realized at the ISA level than at the KAISA level in which case the purpose of Stage II, wherein KAISA assumes the role of FSDC, should be reconsidered. It is also evident that those KAISA which are building KAISA-ISA partnerships in identifying and undertaking enterprises are more likely to achieve the overall goal than are those KAISA which focus resources narrowly on the capital intensive, integrated enterprises that heretofore have received more emphasis from the FSDC. A major lesson emerging from this project is that project designers and monitors need to build in and to maintain a critical flexibility with regard to the timing and introduction of planned new stages.

RECOMMENDATIONS:

1. FSDC and KAISA management should promote KAISA equity growth by enforcing more explicit loan terms and adopting a more forthright approach to loan management including establishing policies regarding the accumulation and deposition of stock and patronage dividends, basing enterprise projects on member ISA's needs and priorities, and initiating specific strategies that increase and stabilize farmers' productivity and incomes.

2. Services to member ISAs should be improved through providing specialized training to Institutional Officers, more effective experimentation, demonstration and coordination practices with relevant companies, government agencies and universities, and through better communication and dissemination measures particularly for technical information.

3. FSDC and KAISA should establish a monitoring and evaluation system to assess the effectiveness of KAISA services and KAISA should provide marketing assistance services as well as production support services.

4. Initiatives in improving farmers' access to institutional credit should be intensified and production credit-marketing tie-up arrangements should be pursued.

5. To promote the active involvement of Boards of Directors, training should be provided on KAISA organization and enterprise planning and management, particularly bottom-up planning in which issues and problems related to organization and enterprises are discussed at the ISA member level.

6. Funding for new enterprises should be contingent on improving the organizational and managerial capabilities of the FSDC central and area offices. The focus of the Management Development Plan should be on improving the management information system and on developing competencies and skills in agricultural economics and agribusiness project development and management.

This evaluation was conducted during the period October 24 through December 7, 1983 by Gerald C. Wheelock, Alabama A & M University, Team Leader; Lydia Martinez, USAID/ORAD; and Cesar Mercado and Severino Vergara of the University of the Philippines. The final report is dated April, 1984.

EVALUATING THE HEALTH AND ECONOMIC IMPACTS OF THE PHILIPPINES PROVINCIAL WATER PROJECT

PROBLEM & OVERVIEW: For many residents of urban areas in The Philippines, a common problem affecting their well-being and productiveness is access to safe drinking water. In order to develop and make available potable water, the government must develop the institutional basis and ensure that staff have the technical capabilities to extend such service to the urban populations. Attaining these goals involves replacing old, unreliable water systems with new wells, treatment plants, storage reservoirs, pumping and distribution systems, and administrative and support facilities.

U.S. ASSISTANCE: The Provincial Water Project (A.I.D.DLC /P-2020) was designed to expand and improve existing water systems in five provincial cities and to foster the development of the Local Water Utilities Administration. The project loan agreement between the GOP and USAID was signed on May 23, 1974. The urban localities selected included Bacolod (Negros Occidental), Cagayan de Oro (Mindinao), Davao City (Mindinao), San Pablo (Luzon), and Tacloban City (Leyte). The immediate beneficiaries of the project were to be residents of those communities. USAID estimated that the percent of the population with access to potable water would increase from about 30% to 50% of the households using existing water systems by the end of the first phase (1982). Health and economic benefits were expected to result from the project.

PURPOSE OF EVALUATION: This is the Follow-up Survey, the final of three survey rounds in evaluation of The Philippines Provincial Water Project. This study was designed to measure the short-term project effects such as changes in water quality, water availability and water use and the longer-term impact on health and economic well-being. In keeping with the evaluation design, this study takes place in the same cities wherein the baseline study was performed, i.e., Bacolod and Cagayan de Oro. The key indicators of health used were incidence of diarrhea and nutritional status (normal or malnourished) of young children. For malnutrition, four-category and two-category distributions were also used. The key economic impact indicators involved economic activities of households. Numerous "intermediate" variables such as water use, hygienic practices, and access to sanitary facilities were also measured. In both cities, the surveys were conducted in areas served by the water systems (experimental areas) as well as in areas which would not be served (control areas).

FINDINGS:

1. There are no clear indications of significant positive health impact resulting from the project in the two cities. After controlling for income and migration in both cities, there are at best marginal indications of positive health impacts. Provision of improved water service to higher economic status households which have access to good sanitary facilities can result in health improvement. Provision of "safe" water to the lower status households is not sufficient, of itself, to bring about health improvements.

2. On the basis of the experimental-control group comparison, there are indications of positive project effects on health. However, these effects are not statistically significant and cannot, except for the improved system water quality, be directly attributed to the project. Assumptions supported by the study data include that water improvements effect health status through a series of events involving increased use of sanitary facilities, safer water handling practices, and better hygienic practices which reduce the level of local environmental pollution.

3. At the end of the evaluation period, very little change in the percent of children suffering from some degree of malnutrition is evident. The Follow-up Survey found that 61 percent of children in Cagayan de Oro and 65 percent in Bacolod were malnourished under the 90 percent weight-for-age definition of malnutrition using The Philippines standard, and 60 and 62 percent respectively using the U.S. standard.

4. There appears to have been a project related increase in household gardening for in-home consumption in both cities. In one city, the amount of water fetched by the household was cut in half in the project area, while the amount fetched in those areas beyond the project's boundaries nearly doubled. The time saved in

fetching water for household use may or may not result in economic benefits. No other economic impact is evident.

5. This study has shown that an examination of intermediate variables could have been misleading because they can change in the desired directions while impact indicators do not improve to the same extent. Certain variables, such as the occurrence of diarrhea, have been found to have an "indirect" association with nutrition as well as a "direct" association.

PROJECT DESIGN & POLICY IMPLICATIONS: Five years may not be sufficient time for health impacts to mature if only because behavioral changes may not appear that quickly. This may be true even when all elements of the population are exposed to the experimental variable for the entire study period. In the case of this study, many people were using city water only for a short time, i.e., not exposed to the intervention for the full five years. If a study is designed to measure long-term health impacts, there may be no quick or inexpensive alternative to a long-term study of this type.

In an impact study lasting over five years, the quasi-experimental design is certain to deteriorate over the life of the experiment due to migration and other external factors. The use of a "control" group in an experiment of this type is not practical.

In measuring changes in nutritional status, it is important to use a variety of standards, since health impacts may come in the form of shifts from one level of malnourishment to another.

RECOMMENDATIONS:

1. Future studies should measure dietary intake, and other related variables which could have a significant impact on health in greater detail.

2. Safe water in the city water system pipe may not remain safe after it is handled and stored by untrained household members. Therefore, education in proper water handling, storage and sanitation along with improved sanitary facilities area also necessary before health impacts can be realized.

3. A further analysis could concentrate on measuring the total effect of both direct and indirect variables on health.

4. A further analysis could concentrate on the extent to which certain levels of sanitary facilities and various other intermediate variables need to change in order to bring about desired nutritional changes.

5. The interim monitoring survey results could be combined with the before and after surveys and further analyzed by examining actual cohorts of children incorporated into the before-after analysis.

This evaluation was conducted by the Research and Evaluation Division, Local Water Utilities Administration of the Philippines and the U.S. Bureau of the Census, International Statistical Programs Center. The report is dated October, 1983. The names and professional affiliations of the evaluators are not noted in the report.

INTRODUCING IRRIGATED PRODUCTION TO SMALL FARMERS: A COMPARATIVE EVALUATION OF THREE SMALL FARMER IRRIGATION PROJECTS IN THE BICOL REGION OF THE PHILIPPINES

PROBLEM & OVERVIEW: A primary development strategy of the Government of the Republic of the Philippines (GOP) is increasing agricultural production and improving the income of the rural poor through a variety of programs such as rural electrification, provincial development assistance and rural roads. Since 1974, a major element in those programs has been support for the GOP's Integrated Area Development (IAD) program in the Bicol River Basin of Southern Luzon. This area is characterized by extensive rural poverty, high population growth, and vulnerability to natural disasters, but it is also endowed with natural resources that provide the potential for economic growth and development.

U.S. ASSISTANCE: Within the Bicol River Basin Development Program (BRBDP), one of the principal investments made by the GOP and USAID has been in irrigation systems serving small farmers. Three IAD projects based on irrigation have been identified, designed and developed through the Program Office of the BRBDP, which has received technical assistance, training and other support as part of the USAID assistance program. The three irrigation projects, which were initiated between 1975 and 1980, are at various stages of implementation: (1) Libmanan-Cabusao Project (#492-0275) funded at Pesos 87.67 million; (2) Bula-Minalabac Land Consolidation Project (# 492-0310) funded at Pesos 69.02 million; and (3) Rinconada/Buhi-Lalo Project (#492-0289) funded at Pesos 90.61 million. The USAID contributions are Pesos 27.91 million, 22.5 million, and 40.2 million respectively. Initially, about 9000 hectares are to be brought under irrigation when all three are completed. [Editor's note: Dollar figures are not given, although a standard exchange rate conversion is used to adjust for devaluation between 1975 and 1983. In the 1981 Executive Summary of the Rinconada/Buhi-Lalo Project, an A.I.D. loan of $5 million is mentioned.]

PURPOSE OF EVALUATION: The focus of this comparative evaluation is on how these and similar investments can yield sustainable benefits, drawing lessons and making recommendations useful for decision-making. Two objectives are stated: (1) to do a comparative analysis of the three projects which highlights issues and alternatives for internal project decision-making and for future policy, program and project formulation; (2) to assess the progress of each project and to make recommendations, specific and general, on what actions are needed to increase the likelihood that the benefits generated by these investments will continue after external assistance is withdrawn. Field observations, discussions with project and BRBDPD staff, and comparative analyses based on experience drawn from other countries' projects were used to prepare this report.

FINDINGS:

1. The Libmanan-Cabusao Project has officially been completed; however, further work remains before the irrigation system is fully operational as designed and much remains to be done to establish a viable farmer-operated organizational structure. Delays in completion were due mainly to the extra work required because of extensive typhoon damage and the lack of a coherent institutional development strategy at the outset. The lead agency for implementing the project is the National Irrigation Authority (NIA).

2. The Bula-Minalabac Project is significantly behind in its physical construction schedule due to delays in funding releases and some difficulties with contractor performance. Results in the institutional development component have fulfilled earlier projections with significant involvement and investments by the farmers in the area. The lead agency for implementing this project is the Ministry of Agrarian Reform (MAR).

3. The Rinconada/Buhi-Lalo Project is slightly ahead of schedule for the physical development components. In its earlier stages, this priority delayed concentration by the Project Management Office (PMO) on the institutional development aspects. The two are now receiving equal attention and emphasis. The lead agency for implementing the irrigation component is the NIA. The lead agency for implementing the agro-forestry and watershed development component around Lake Buhi is the Bureau of Forestry Development (BFD).

4. None of the projects has data readily available indicating whether irrigation fees charged to farmers cover the operations and maintenance costs of the irrigation systems at their current stage of development. Of the three, the Bula-Minalabac Project shows the highest potential for covering costs with both a high fee structure and an impressive payment rate, voluntary labor for system maintenance, and income from other sources to help fund the farmer organizations.

5. In terms of the water management practices recommended as part of the technology package, none of the systems has established the type of operations plan needed to ensure timely and equitable delivery of water to all parcels. In the absence of such a plan, on-farm water management practices appear to vary widely within each system. Some farmers use water in fairly close conformity with recommendations; others either apply excessive amounts or fail to obtain enough.

6. Although a major focus of all three projects has been the organization and development of the capacities of the Irrigators Associations (IAs), institutional development and integration with the physical installation of the irrigation system appears to be the weakest aspect of the three projects. Participation is notably high in Bula-Minalabac. Rinconada appears to have potential for higher participation but this is restricted by the by-laws of the IAs. Serious problems occurred in the Libmanan-Cabusao Project in part because institutional development activities were ignored in the early stages.

7. The placement of management responsibility in each project with a lead agency appears to work satisfactorily if bolstered by integration and coordination mechanisms such as the Composite Management Group of the Bicol River Basin Development Coordination Committee, and if monitoring is done by the BRBDP Program Office. The projects reflect an increased capacity for management and coordination, as well as increased private sector involvement in local development.

PROJECT DESIGN & POLICY IMPLICATIONS: The equitable distribution of water is the major unsolved problem on all three projects. The evaluation team believes that this is because operational plans are not complete or fully implemented. The designs called for plans staged so that delivery would be employed within rotation areas and that continuous delivery would be maintained to the area. Rotation plans have not yet been developed although progress is being made. The relative strength of the IA is an important factor in obtaining compliance with water scheduling and rotation plans when they are put in operation. Different strategies were employed in planning and design of the three projects with varying results. A key factor appears to be the level of farmer involvement in decision-making at all stages of project development. In the Bula-Minalabac Project, farmers were involved from the start and this has resulted in high payment rates of irrigation fees, excellent maintenance, and the initiation of other social and commercial investments. In the other projects, a "consultation model" was employed in the early stages: farmers were informed of planned activities and had a chance to voice their opinions, but this took place after critical design decisions had already been made. The consultation was intended to gain farmers' acceptance of the new irrigation project rather than to involve them directly in the planning process. In accordance with the criteria identified in the evaluation for generating sustainable benefits, the Bula-Minalabac Project and, to a lesser extent, the Rinconada Project appear to have the greatest chances for success. Technically and institutionally, there are serious problems in the Libmanan-Cabusao Project which, if not addressed immediately, may result in the loss of the investment. In overall terms, while a technology package exists, there are serious institutional and organizational constraints that must be removed before the package can be used effectively by farmers throughout each of the systems. The process of establishing a mature water supply system requires time--a minimum of five years and perhaps more after the completion of the physical system. A period of testing and development should be built into each project. Further planning and additional resources will be needed to bring these projects to maturity. It is instructive that although both the Libmanan-Cabusao and Bula-Minalabac projects started with pilot schemes, neither pilot scheme had much influence on the project design due to the pressures of the government and the donor for rapidly initiating a larger-scale investment.

RECOMMENDATIONS:

1. The technical management of all three systems requires specialized skills that farmers cannot be expected to acquire. It is proposed that the lead agencies establish technical management units for each system with longer term expertise and training requirements identified.

2. Better information on water availability, water supply, and drainage flows is needed for technical operations. This is especially important for the two pump projects where effective management can reduce water losses and can increase efficiency. In the Rinconada Project, in particular, there are questions about long-term water availability which indicate the need for a monitoring system.

3. Activities which concern and directly benefit farmers should be carried out through a consolidated organization. At the policy level, there is a need to adopt a policy and approach for integrating farmer organizations. In the case of IAs, such a policy would increase cooperation and may lead to other ventures that increase revenues for the IAs.

4. There is a need for each project to provide five-year and twenty-year budget estimates for review by BRBDPO and other agencies. This will allow a reasonable determination of the costs of operations and maintenance as well as partial amortization. With these budgets, the financial reporting systems should be modified for monitoring and correction purposes. Such a framework would facilitate negotiations with the IAs regarding fees.

5. A major bottleneck to improving the productivity of the systems is the availability of credit due to farmer failures to repay loans received prior to the initiation of the projects. An arrangement should be made to restructure these loans.

6. In the absence of a system for analyzing the data collected under the three projects that can be used to evaluate effects and impact, there is a need to revise the reporting requirements of the three projects in a way so as to provide better information for analysis and decision-making.

This document was prepared by a joint GOP-A.I.D. team which conducted an evaluation from August to September 1983. [Ed. note: The names, qualifications and affiliations of the evaluators were not stated in the evaluation report.]

REPORT OF A PROCESS EVALUATION OF THE BICOL INTEGRATED HEALTH, NUTRITION AND POPULATION PROJECT - PHILIPPINES

PROBLEM & OVERVIEW: The problem is to demonstrate an effective approach to the delivery of health and related services through an integrated, comprehensive, and multi-sectoral effort to depressed barangays in selected areas of The Philippines. Between 1951 and 1981, the U.S. Government, through A.I.D., has obligated approximately $132.7 million towards helping the Government of the Philippines (GOP) increase agricultural production, the incomes of rural poor, and better the socio-economic and health conditions of the rural population through a wide variety of programs.

U.S. ASSISTANCE: Since 1974, a major emphasis among those programs has been support for a GOP integrated area development (IAD) program in the Bicol River Basin in Southern Luzon, an area characterized by extensive rural poverty despite abundant resources. To date, USAID has obligated $28.4 million for five separate loan projects and two technical assistance grants in the Bicol River Basin. The Bicol Integrated Health, Nutrition, and Population Project's (BIHNPP) total estimated cost is $7.8 million, with $2.5 million being financed under an A.I.D. loan (#492-0319). The project's four objectives are: (1) an economical and sustainable delivery system for providing rural barangays with effective health, nutrition and population services; (2) improved sanitary environment and household water supplies for rural barangays; (3) increased local government financial support of health, nutrition, and population programs; and (4) increased participation of barangay workers and residents in health, nutrition and population programs.

PURPOSE OF EVALUATION: The purposes of this first process evaluation were: (1) to measure project outputs against planned targets; (2) to identify major constraints and problems affecting planned project implementation; and (3) to recommend solutions. The scope of the evaluation was limited to: (1) Barangay Health Aide (BHA) Functions; (2) Environmental Sanitation Infrastructure (ESI) Component; (3) Local Government Support; (4) Community Participation; (5) Other Line Agency Coordination; (6) Project Management Office (PMO); and (7) Financial Management. The approach used was longitudinal extending from the barangay level to the central offices in Manila. The methodology included personal interviews based on questionnaires, site visits and reviews of records. Fourteen barangays (a 10% sample) were chosen at random for close examination.

FINDINGS:

1. The overall performance of the BHAs meets the objectives for which they were trained. The BHA appears to be accepted by the community and is an effective agent for the improvement of local health conditions. However, there is a perceptual difference among project document and respondents as to the major role of the BHA --whether the BHA approach is that of a health service provider or a health facilitator/educator.

2. The overall training of the BHAs was satisfactory. All 400 of the planned BHAs were recruited and trained. There is a need to strengthen feedback systems to ensure that retraining programs are properly focused. Training in the areas of community organization, communications skills and communicable disease control need strengthening.

3. The supervision of the BHAs ranges from good to adequate. A key factor in the successful supervisory efforts appears to be the weekly meetings held at most Rural Health Units with the BHAs on Saturday mornings.

4. There appears to be good local support for the BHAs at all levels of local government. However, there is little evidence that other line agencies are participating in this "integrated" project. Regional Directors of some of the agencies are only vaguely familiar with the project. Provincial level officers are even less knowledgeable. The only existing coordinating mechanism (the PMCC) is at the regional level and has not met regularly.

5. The majority of local government officials claim they will have difficulty in absorbing their share of the cost of BHA stipends. Despite the fact that all local government units signed memoranda of agreement to pay their share of the stipend upon project support phase out, most have not made adequate budgetary provisions to

date. Some even profess unawareness of this obligation. Nevertheless, they indicated a willingness to try. To complicate matters, the Project Management Office (PMO) unilaterally reduced its support for BHA monthly stipends to 50% percent. The project documents are contradictory in terms of when this action should have taken place.

6. The environmental sanitation component (ESI) is seriously behind schedule. As a result, project expenditures are behind schedule. The two major reasons for this delay are lack of personnel at the PMO to direct the ESI program and the slow release of funds from the Office of Budget Management. The PMO does not have sufficient staff to properly implement the project and has no overall plan of action. All key technical and administrative staff are regular Ministry of Health employees who have been designated to fill PMO positions in addition to their normal work requirements.

7. The PMO does not appear to be complying with the A.I.D. loan provisions that funding for barangay water systems shall be carried out under a lending arrangement. Barangay cooperative associations were to be formed to own, operate, and maintain the water facilities and a revolving fund was to be established to repay the loan for materials. This is not being done. Instead, the PMO appears to be supplying materials strictly on a grant basis.

PROJECT DESIGN & POLICY IMPLICATIONS: The project as designed appears to have been effective in placing change agents in the targeted locales. Although barangay residents are viewed as "very happy" to have the BHAs in their communities, there is an important confusion in their role that limits their effectiveness in terms of the overall concept of the intervention sponsored by the project. Specifically, if the intention is that the BHA help barangay residents determine health-related problems and solutions in a bottom up fashion, then the BHAs are not adequately trained. Presently the BHA is filling more the role of a provider of services who solicits the assistance of the residents in implementation rather than guiding the people to identify and solve their own health-related problems. The BHAs themselves have noted that their skills in engendering community participation and in communication are generally inadequate. The overall content of the training curriculum supports this finding as well. A major lesson learned is that overall, project implementation should conform to the concepts and provisions of the Project Paper, Loan Agreement, and Project Implementation Plan. If conditions change, or if there are apparent contradictions in these documents, these issues should be resolved by referring them to the Project Management Coordinating Committee (PMCC) and/or USAID for early clarification. Other factors impeding optimum implementation of the project include insufficient staff at the PMO, and a general lack of interagency coordination and integration among the sixteen involved government agencies. The structure set up to facilitate this integration, the PMCC, has not fulfilled its planned function in this regard. Another lesson learned is that for a project in which the successful implementation depends on effective cooperation among different government agencies, a sustained effort must be made at appropriate policy and decision-making levels to ensure that the amount and degree of cooperation anticipated are achieved over the life of the project. In sum, there is conclusive evidence which confirms the viability of the BHA intervention, and there is strong support for the BHA at the local government level. However, the long-term success of the project is endangered by inadequacies at the management (program and financial), administrative and coordination levels both regionally and nationally.

RECOMMENDATIONS:

1. A project manager and an assistant project manager for ESI should be either hired or detailed to the project on a full-time basis.

2. The project should continue to pay the full BHA stipends for three years after deployment and 50 percent thereafter until the Project Assistance Completion Date (PACD).

3. The originally planned interagency task force at the regional level and the other coordinating committees called for in the original project documents at the provincial, municipal and barangay levels, including the PMCC, should be activated or re-activated.

4. The project budget should be revised to adjust to the current project expenditure situation and the impact of inflation. A formal amendment of the Loan Agreement with respect to financing of community water systems should be made. USAID, PMO, and OBM should meet as soon as possible and regularly thereafter to analyze and discuss financial and administrative management issues. Further A.I.D. funds should not be disbursed until his has been done.

5. The role of the BHA should be clarified, the effect of prior residency on BHA effectiveness should be reviewed, and appropriate adjusts should be made.

6. The PACD should be extended by one year only if the above conditions are met.

This evaluation was co-chaired by Lorenzo B. Ballecer, Program Director of the Bicol River Basin Development Program and Restituo C. Daquinsi, M.D., Director, Ministry of Health, Region V and Project Director. The 14-member team was advised by Santiago Casis, M.D., Project Implementation Consultant, BIHNPP. The evaluation report is dated May 1987.

PROCESS EVALUATION REPORT OF THE FARMING SYSTEMS DEVELOPMENT PROJECT - EASTERN VISAYAS, PHILIPPINES

PROBLEM & OVERVIEW: For many years, the focus of agricultural development efforts has been rice farmers cultivating irrigated ricefields. Although this focus has brought the country to self-sufficiency, there is a growing recognition that much development potential lies with the small rainfed and upland farmers who comprise the majority of the Philippines' farming population.

U.S. ASSISTANCE: The Farming Systems Development Project of the Eastern Visayas (FSDP-EV) is being implemented on the islands of Leyte and Samar by the Ministry of Agriculture of the Government of the Philippines (MOA-GOP) and the Visayas State College of Agriculture (ViSCA). USAID is assisting this effort with a $1.4 million grant and a $1.6 million loan (#492-0356). The GOP contribution is $2.813 million. The project's goal is to improve the livelihood of small farmers in selected rainfed areas. The purposes are: (1) to establish a proven mechanism for adapting rainfed agricultural technologies to the resource conditions; and (2) to disseminate such technologies as are found appropriate. The project has a planned five-year life span and began in mid-1982. Technical assistance is provided by Cornell University in the form of 96 person-months of long- and short-term consultants and participant training.

PURPOSE OF EVALUATION: The evaluation sought to assess the processes by which the project was being implemented including project participants' understanding of the concepts of farming systems research. Data collection was by means of semi-structured interviews and discussions combined with direct observation. The evaluation team visited all six offices of the site research teams and 14 villages where research was ongoing. The evaluation was not viewed as an A.I.D. evaluation. The USAID Project Officer was only a member of the team. USAID played a role in drafting the scope of work and a concept paper which identified several of the major issues of the evaluation.

FINDINGS:

1. The project has substantial accomplishments in the past two years considering the difficulties normally encountered during the initial phase of implementation of an activity with multiagency involvement. The project's research activities are behind the planned implementation schedule. The delay is largely due to a recent drought affecting the research sites. The planning and completion of the back-up research is also delayed. This delay is attributed to a change in the role of the ViSCA Technical Team.

2. The modifications to existing technologies being tried are relevant to the needs of the intended beneficiaries. However, the introduction of more than one or two major modifications at the same time to the existing farming systems may not be advisable since it is tantamount to a total change in the farming system in the area.

3. Many of the critical decisions have been made without reference to farmers' needs, despite a genuine belief and sincerity on the part of project personnel that farmers were participating in the project. Members of the project staff seem not to fully comprehend the dynamics of the existing farming systems. Site teams, in several instances, seem to have an inadequate understanding of the reasons for the conduct of field trials and to lack a grasp of the concept of farming systems research. There are indications that internalization of farming systems research concepts and practices among staff needs to be strengthened by more training.

4. Many of the major changes in the existing farming systems being proposed by project personnel are based on "shelf technology" that did not perform nearly so well in farmers' fields as it was expected to or even as well as traditional practices. In many cases, these new technologies did not produce an economic return equivalent to traditional practices, although they greatly increased the risk exposure of the farmers.

5. The present livestock activities of the project and some of the cropping patterns being tested suggest a misconception that the purpose of the project is to introduce a new livestock system to replace, rather than modify, the existing one. The farmer-cooperators have the impression that research sites are for demonstration, rather than experimental, purposes.

6. The present relationships between the FSDP-EV and other agencies/organizations in the area are informal. There is no linkage between the project implementation activities and the MOA extension delivery system or the regional agricultural development and planning activities. The present relationship between the MOA and ViSCA is built on former ad-hoc linkages, although it may be adequate for this project.

7. Cornell University has generally met the requirements of the project in its role of provider of technical assistance and administrator of the degree and non-degree training programs. However, research site staff report that they have never been consulted in the assignment of short-term project consultants.

8. In 1983, actual project funds released reached 95 percent of those available; in 1982, only 71 percent of available funds were released. Delayed release of funds in the project's first year constituted an obstacle to implementation.

9. The present organizational structure has been effective for the administrative and logistical needs of the project. However, some problems were observed with regard to responsibility for technical research decisions, implementation of research after decisions had been made, and supervision at the site level research.

PROJECT DESIGN & POLICY IMPLICATIONS: While recognizing that the overall project design and structure is adequate to accomplish the project's goals and purposes, there are several flaws at both the conceptual and functional levels which may endanger the achievement of the desired outputs. As these have been detailed in the "Findings" section it is unnecessary to repeat them here. Most importantly, little consideration has been given to the integration of project functions into existing MOA programs when the project terminates. Current efforts to relate FSDP-EV with existing MOA research and extension activities are very inadequate. To a certain extent, this reflects the bias of a project of this nature: it is based primarily in the academic strata and is research oriented. These biases seem to conceal the intended nature of the project: the concept that the various crop and livestock trials represent experiments to test and to compare different approaches under farm conditions rather than to demonstrate "shelf technology" or that which has already been proven and needs only to be adopted.

RECOMMENDATIONS:

1. Researchers at the site level should give much more attention to the existing system and ensure that individual farmers play a key role in decisions concerning research in their fields, limit the number of proposed changes in the farming system, and minimize use of purchased inputs in their recommended changes until their use is proven profitable and feasible.

2. Project management should design and implement a comprehensive training program to communicate a revised approach to all project participants including cooperating farmers.

3. Project management should work with Cornell University to expand and better define Cornell's role and recommunicate this role to all project personnel.

4. Project management should work with the regional MOA authorities to establish an agricultural policy unit and to strengthen the linkages between research and extension.

The evaluation was conducted during the months of November and December 1983 by Agapito Tauro, Assistant Regional Director of Crops in the Region VIII Ministry of Agriculture Office; Emiliana Bernardo, the Director of Research and Extension at ViSCA, Rebecca Barbusa, a representative of the Regional Farmers' Federation; James Beebe, the USAID Project Officer; and Jose Mazo, Chief of the Coordination Division for the Region VIII Office of the National Economic and Development Authority.

EVALUATION REPORT OF THE SATELLITE COMMUNICATION PROGRAM OF THE UNIVERSITY OF THE SOUTH PACIFIC

PROBLEM & OVERVIEW: The South Pacific regional program area comprises 10 island nations scattered over 5.6 million square miles of ocean. These nations are characterized by diverse geographic, demographic and economic factors and together contain a population of over 1.5 million. Yet many familiar development problems are common to each of the ten recipient countries covered by the South Pacific Regional Development Office (SPRDO) of A.I.D. which is located in Suva, Fiji. To meet development objectives, A.I.D. has sought ways to implement key sectoral strategies, strengthen key institutions and improve key services which will affect positively aid recipients in the region.

U.S. ASSISTANCE: The University of the South Pacific (USP), a regional institution, has been using NASA's experimental ATS-1 satellite since the early 1970's to reach students and other clients in the member countries. In two grants, provided in 1978 and 1982, USAID contributed $905,000 to a $2.5 million project (#879-0254) aimed at upgrading the system. The first grant (#492-1510) was for $805,000; the second, (#879-2010) for $100,000. The chief project inputs included earth stations, conferencing equipment, computers, video and radio studies, and experimental slow-scan and facsimile equipment. Renovations to buildings, staff training and technical assistance were also provided. The purpose of the grants was to assist the USP in testing communication technologies in order to determine which ones would most appropriately meet its long-term communication requirements.

PURPOSE OF EVALUATION: The evaluation was to assess the impact of USAID's two grants on the extension and outreach activities of USP. The evaluation was conducted by a three-person team and the report is based on visits to and discussions with USP and government officials in the Solomon, Vanuatu, Western Samoan, Tonga and Fiji Islands.

FINDINGS:

1. The USP has been allocated approximately 4 hours daily on the ATS-1. In 1983, 367 hours were used of which about 50 percent was for tutorial programs. Other major uses included 23 hours for Extension services; 20 hours for continuing education; 20 hours for FAO Root Crop information; 42 hours for staff meetings; and 50 hours for point-to-point messages. Lesser uses included 6 hours for Agricultural Liaison Officers; 8 hours for IMR/ARU; 6 hours for the Bible Society; 3 hours for the ASPESA conference; and three hours for nutrition education.

2. The use of NASA's ATS-6 satellite, which was capable of TV transmission, did not materialize. The satellite had to be taken out of operation. This left USP with TV studios whose purpose and function had to be redefined.

3. Although, the tutorials covered 29 subject areas, student attendance was erratic and varied widely from center to center. There are two possible explanations for this. One is that the study materials have to be designed for self-instruction. The other is that many students live too far from the extension centers to participate in either satellite or local tutorials.

4. The computer system has been operating since September 1983 with very few technical problems. At the Suva and Alafua Campuses, it is being used for word processing and record keeping. It is not being used at the Extension Centers because the staff does not have the skills. No programmatic use of the facsimile or slow-scan equipment has been reported.

5. No significant training activities have been undertaken, either for the USP Center directors, for tutorial staff, or for others who could have planned and implemented outreach programs. One satellite operator workshop was held in 1983. One radio workshop was held for USP Center Directors.

6. Shortly after the A.I.D. grant was received, USP Extension Services underwent a series of changes and experienced a decrease in staff allocated to the project. Only in 1983 has the satellite project had vigorous leadership.

PROJECT DESIGN & POLICY IMPLICATIONS: The project has enabled USP to increase substantially the number of students who can be served by extension courses, supported in research activities and provided with continuing education. However, much more can be derived from the inputs than has been the case so far. To be effective in outreach and in providing broad support to development programs and institutions in the South Pacific, the project will need significant involvement and support from the appropriate Institutes of USP. There is a critical need for overall leadership and coordination. The project will need additional resources, particularly in the areas of technical assistance and additional staff, some of which must be located at the Centers. The specific tasks for such additional support will include planning, promotion and implementation of educational, outreach and agricultural support activities.

RECOMMENDATIONS:

1. USAID/Suva should discuss with USP about providing funding for training as well as materials to ensure that the return from the initial grant investment is maximized.

2. USAID/Suva, A.I.D./W, and the S.& T. Rural Satellite Program should fund a communications policy study for the South Pacific. A.I.D. should initiate discussions with other donors to coordinate all donor resources and ensure that public service is integrated into donor-provided services.

This evaluation was conducted by Robert Schenkkan, A.I.D./Washington; Anna Stahmer, the Academy for Educational Development, Washington, D.C.; and Mostyn Habu, Interim Director, College for Higher Education, Solomon Islands.

ANNUAL EVALUATION REPORT OF THE FIJI YMCA RURAL AND VOCATIONAL TRAINING WORK PROGRAM

PROJECT PURPOSE & SUMMARY: An A.I.D. Operational Program Grant (OPG: 679-0251-G-00-1006-00) provides $44,986 to the National Board of the YMCA, Chicago, over a three-year period commencing August 17, 1981 to cover costs of a rural work and vocational training project directed by the Fiji YMCA. The activities supported by this A.I.D. grant are part of a larger program begun in 1971 with total program costs estimated at $597,569 of which $200,000 represents in-kind contributions from YMCA clubs. Other participants in the program have been Canada (Vancouver YMCA and CIDA), CORSO (Council for Relief Services Overseas) of New Zealand; ICCO of the Netherlands; the Fiji Government; the New Zealand YMCA and the Fiji YMCA. This grant supports the work of rural workers in Koro Island, Wainibuka and Laselevu, and vocational training in sewing machine and chain-saw repair.

PROJECT STATUS:

1. At the time of this evaluation, about $26,000 had been expended. Although the project was originally scheduled to be completed by August 16, 1984, at the current rate of expenditure, it could be extended, at no cost, for one year or more.

2. Club membership and club incomes have been negatively affected by external forces in recent months. Hurricane Oscar destroyed farms and homes. It takes three years of cultivation to realize a product from some of the cash crops, and it takes a large proportion of a farmer's income to rebuild his house.

3. There is a drive underway to increase the number of clubs which has risen to 73 from a low of 67. There are now 15 paid rural workers and 4 volunteers. There were 19 paid at the peak before Hurricane Oscar.

BASIS & PURPOSE OF EVALUATION: This is the third Annual Evaluation of the project and is mandated by the Terms and Conditions of A.I.D.'s grant to National Board of the YMCA.

FINDINGS:

1. The program is thriving with 71 villages being served, 4 Volunteer Leaders active, 15 rural workers on the payroll and 4 vocational schools in operation. In 1982, 28 courses provided 57 weeks of training; in 1983, 29 courses provided 55 weeks of training.

2. An absence of internal communication, faulty communication, or simply misunderstanding concerning the uses to which the YMCA/A.I.D. grant could be put are chiefly responsible for the lack of more outstanding results. Fiji YMCA leadership is thin. Its Board of Directors does not play a strong, supportive and/or interventionist role. Management controls are weak. Fiscal and financial reporting is inadequate.

3. Some consultation between the important donors is needed, particularly in sorting out what the present donors will do in the future. Despite the shrinking Canadian contribution, the dominant role seems to be Canadian.

PROJECT DESIGN & POLICY IMPLICATIONS: The project is a good one and can be even better. However, there are macro-design constraints that need attention. The project's multi-donor funding structure is problematical in two ways. Expectations of other resources have not materialized. Private donors are not responsive. Commitments on the part of the Fiji Government have not materialized. The CIDA contribution and the Vancouver YMCA contributions are declining. This shrinking resource base is worrisome to the Fiji YMCA and may cause A.I.D. to have second thoughts particularly if it is asked to assume more of the funding requirements. At the same time, available resources have not been fully used. Some of the grant funds, for example, could have been directed toward improving the management capabilities of the Fiji YMCA, such as purchasing a typewriter, file cabinets and other office supplies needed for effective management, or for extending supervisory activities through more frequent travel to the project sites. Much of the reason for these deficiencies

appears to be ignorance on the part of Fiji YMCA leadership about authorized use of available funds. Lack of understanding, clear statement and direction on the part of the important donors about the use to which funds can be put is also partly responsible for the current state of affairs. There was considerable feeling that the Fiji YMCA should seek registration as an indigenous voluntary agency with A.I.D.'s South Pacific Regional Development Office (SPRDO). However, the Fiji YMCA does not appear to have the administrative capacity to manage a grant and, until that gap is filled, a supportive intermediary is in order.

RECOMMENDATIONS:

1. The Fiji YMCA should start giving thought to its requirement for an additional grant.

2. The current grant should be extended until all remaining funds are expended.

3. Some form of formal consultation among the project's important donors should take place, particularly with regard to the future of funding support to both the Fiji YMCA and the project.

4. Fiji YMCA leadership should meet with the A.I.D. SPRDO officials to learn about and discuss grant administration.

This evaluation was conducted by John A. Ulinski, Jr. during February and March, 1984. Neither the professional affiliation or qualifications of the evaluator are mentioned in this report.

EVALUATION REPORT OF THE ACCELERATED IMPACT PROGRAM OF THE SOUTH PACIFIC REGIONAL DEVELOPMENT OFFICE/USAID -SUVA, FIJI

PROBLEM & OVERVIEW: The South Pacific regional program area comprises 10 island nations scattered over about 5.6 million square miles of ocean. These nations are characterized by diverse geographic, demographic and economic factors. Together they have a population of about 1.5 million. It is not cost effective for A.I.D. to maintain separate country offices in each of the ten recipient countries and A.I.D. staff alone cannot oversee the many diverse projects which A.I.D. supports. It is also not always desirable to provide grant and loan assistance to these nations solely on a bilateral basis. Thus a need for a more flexible funding mechanism was identified.

U.S. ASSISTANCE: The Accelerated Impact Program (AIP) (#879-0256) was started in FY 1979 and has funded more than 300 self-help community development projects totaling more than $1.26 million and reaching over 200,000 beneficiaries. AIP-funded activities differ from the usual A.I.D.-funded programs in that they consist of many small-scale, self-help community development projects initiated at the community level and often administered through the Peace Corps or U.S. private and voluntary organizations (PVOs). The overall purpose of the AIP is to encourage and support self-help efforts at the local community level without regard to the comprehensive or sectoral strategies of bilateral assistance. The maximum funding level per project is $25,000 although most grants range from $4,000 to $8,000. Projects must be completed within six months of authorization of funds. The South Pacific Regional Development Office (SPRDO) administers the AIP.

PURPOSE OF EVALUATION: The main purpose was to assess the suitability and effectiveness of the AIP with particular focus on Fiji, Tonga and Western Samoa. The evaluation team's assessment involved visiting approximately 10 percent of all AIP projects, 29 sites in all.

FINDINGS:

1. Of the twenty-nine projects visited, most were judged as outstanding examples of self-help efforts for villagers. Many of them were sponsored by PCVs. The benefits from these added directly to the quality of life, social organization, and transportation capability of the beneficiaries. A few projects, such as community centers and poultry raising activities, are marginal examples.

2. The majority of projects have gone to Fiji. A major reason for this is that the SPRDO is located in Fiji. Fiji also has more PCV's compared to other countries under SPRDO. During FY 1984, SPRDO directed that more effort be made to encourage more AIP proposals from other countries.

3. Documentation requirements and procedures, including those pertaining to fiscal record-keeping and accounting practices, are well detailed, clear and easily understood, and the paperwork is simple. None of the host officials with whom the evaluation team spoke mentioned problems in this area. The speed which funds are made available after receipt/approval of project proposals is a major attribute of the AIP.

4. The focus of the AIP has changed slightly over the years. A renewed emphasis on small business development and income generating schemes in rural areas is evident. The major characteristic of an AIP grant is still that it requires a substantial input from the recipients themselves.

5. Since AIP's inception in the South Pacific, it has proved to be a significant example of A.I.D.-Peace Corps cooperation. There is a delicate balance between the Peace Corps becoming a funding source and the Peace Corps' traditional role. Peace Corps Directors carefully review all AIP proposals submitted by PCVs before forwarding them to SPRDO.

5. AIP has made a significant impact in the fishing industries of the recipient countries through the transfer of fish aggregation devices technology to the region, increased fuel efficiency and safety of small fishing boats. Infrastructure has also improved through the construction of bridges, sea and river walls, schools and community centers.

PROJECT DESIGN & POLICY IMPLICATIONS: The AIP was designed primarily to extend limited assistance directly to local communities. In essence it is a mechanism for bypassing the cumbersome bilateral assistance agreement. Although the design has undergone some changes, the basic concept remains intact. After six years of operation, the project design has demonstrated its utility and effectiveness. The gains attributable to the AIP funds may appear small when viewed in the national development context, but they are extremely important to the community and responsive to what the people asked for. The large number of people they have benefited has engendered considerable friendship and goodwill for the U.S. There have been some minor problems, such as fiscal record keeping at the rural level. Fiscal mismanagement, rather than fraud, appears to be at the root of this problem. Fortunately, there is a double check mechanism to help prevent this from occurring. SPRDO's priority on income generating projects appears to be the right thrust for this program. Income derived from the sale of increased fish and food production may best be supported through assistance which provides the required tools of the trade. Improvement of the transportation infrastructure can have a direct bearing on income generating projects in that it facilitates the movement of goods to appropriate markets. Overall, the cooperation provided by the host governments has been excellent.

RECOMMENDATIONS:

1. The present focus of the AIP should be continued, particularly support to projects that reflect the desire of the requesting community.

2. The six-months time frame for project completion should start when the community receives its funds, not when the agreement is signed.

3. Any proposal for a community hall should be carefully screened to insure that it is not desired simply for prestige value. Projects requesting support for poultry activities should not be approved until the potential and suitability of this type of project can be evaluated by an expert in poultry management.

[Ed. note: The evaluation report did not contain the names of the individuals who conducted the exercise nor the dates over which the evaluation took place.]

MID-TERM EVALUATION REPORT OF THE SOUTH PACIFIC REGION AGRICULTURAL DEVELOPMENT PROJECT

PROBLEM & OVERVIEW: The South Pacific regional program area comprises 10 island nations scattered over about 5.6 million square miles. These nations are characterized by diverse geographic, demographic and economic factors and together have a population of about 1.5 million. Yet many familiar development problems are common to each of the ten recipient countries covered by the South Pacific Regional Development Office (SPRDO) located in Suva, Fiji. To meet development objectives, A.I.D. has sought ways to implement key sectoral strategies, strengthen key institutions and improve key services which will impact positively on all A.I.D. recipients in the region.

U.S. ASSISTANCE: The South Pacific Region Agricultural Development Project (SPRAD: #498-067; Grant #492-1710) is a five-year effort which started in 1980. Its authorized funding is $5.64 million. Its overall goal is to promote agricultural productivity and further socio-economic development for the rural people of the South Pacific Region. Its specific purpose is to strengthen the capacity and resources of the University of the South Pacific, School of Agriculture, Institute for Research, Extension and Training in Agriculture (USP/SOA-IRETA) in agricultural research, education, and extension. The grant was made to the USP with the University of Hawaii at Manoa (UHM) and Cornell University (CU) serving as Contractor and Sub-contractor respectively. Major project activities included construction of faculty housing for SPRAD technical assistants; provision of short-term consultants and participant training opportunities, workshops, and conferences; procurement of equipment and supplies; and establishment of a regional network of Agricultural Liaison Officers (ALOs).

PURPOSE OF EVALUATION: The general purpose of the mid-term evaluation was to determine the degree to which the SPRAD project was achieving its purpose, whether it should be extended after the completion of its present five-year term, and if so, what recommendations could be made for its improvement. A three-person team conducted the evaluation. The team reviewed documents, made site visits to Western Samoa, Fiji, Tonga, and the Solomon Islands, interviewed government and school officials, teachers and students, and debriefed USAID, USP, UHM and CU officials prior to submitting a draft report.

FINDINGS:

1. A total of seven SPRAD Technical Assistants (TA) have been assigned to the project of whom four have completed their tours of duty. Support by the UHM and CU SPRAD Project Officers and by the Principal Investigators has been excellent. Frequent contact among these individuals has made it possible to give attention to problems when they arise.

2. A major problem has been the difference of opinion between what USP expected the TAs to do and that called for in the the SPRAD Project Paper. USP officials expected the Project Team to help meet all of the Alafua Campus teaching needs first and carry out research and extension objectives time permitting. This was contrary to the terms of the Project Paper. In sum, the amount of time SPRAD TAs have devoted to teaching on-campus courses has far exceeded the combined total of time spent on research and extension.

3. Taking the total productivity of the SPRAD Team from the inception of the project, its achievements in education are commendable; in extension, fair; and in research, not good. With regard to extension, productivity should have been higher; however, the project is on the right track and productivity in the next few years should be greater. With regard to research, there are numerous constraints that continue to hinder effective research efforts. To begin with, a clear concept of what constitutes "regional" research must be stated since this is an avowed aim of IRETA.

4. A network of Agriculture Liaison Officers (ALOs) has been established in the Cook Islands, Fiji, Niue, Solomon Islands, Tonga and Vanuatu. An ALO is to be hired soon for Western Samoa. The concept of an ALO network was well received among clients visited.

5. SPRAD TAs have fostered sound relationships with many other appropriate agencies, units and persons throughout the region. Among these are the UN FAO Root Crops Project, the Ministries of Agriculture and Education in the South Pacific, the EEC, the West German (GTZ) program in crop protection, the Australian Universities International Development Program, and the Wageningen (Netherlands) Agricultural University. One of the important connections not yet satisfactorily developed is that with UHM.

6. It will be difficult for USP to continue to increase significantly its financial commitment to its Alafua Campus. USP spent about US $1.1 million in 1983 including pro-rated overhead costs for USP/SOA-IRETA. This year, its budget has been severely restricted.

PROJECT DESIGN & POLICY IMPLICATIONS: The SPRAD Project is contributing to the USAID sector goal of promoting agricultural productivity and furthering socio-economic development. The work of USP/Alafua is contributing to this achievement. However, no specific methodology for measuring the project's progress toward this goal was observed. The statements of SPRAD purpose, End-of-Project Status, and Project Outputs are more appropriate for a fifteen-year project. Still, the project has made reasonable progress in achieving its institution building goals particularly since they are not the kind amenable to quick or instant attainment. The evaluation team concluded that there is no better vehicle available today for continuing to contribute to the South Pacific's needs in the area of agricultural research, education and extension than through continued institutional development of the USP/SOA-IRETA.

RECOMMENDATIONS:

1. The SPRAD Project should be extended another five years.

2. USAID/SPRDO should explore/set-up means of monitoring the rate at which funds under the Grant and under the Contract are being expended and the degree to which USP is meeting its commitments to the project.

3. USP and SPRAD should analyze the Alafua Program, both SOA and IRETA, and decide how to allocate scarce resources to discharging Alafua's function of research, education and extension as expressed in terms of both full-time equivalents of manpower and of finance.

4. USP and UHM/CU should develop a clear understanding of how the cost of needed research is to be borne and how the work assignments of the TAs can be administered to considerably increase the amount of time allocated to research and extension.

This evaluation was conducted during a six-week period in April and May 1984 by Dr. Frederick K.T. Tom, Ph.D., Emeritus Dean, College of Agriculture, University of Hawaii at Hilo, who acted as the Team Leader, and the following: Tomasi Simiki, Director of Agriculture, Fisheries, and Forests of Tonga; and James L. Walker, Ph.D., Research Networks Specialist/Agronomist and Soil Scientist, Office of Agriculture Management Staff, Bureau for Science and Technology, A.I.D.

FINAL EVALUATION OF THE SMALL PROJECTS DISASTER ASSISTANCE PROGRAM IN THE FIJI ISLANDS

PROBLEM & OVERVIEW: On March 1 and 2, 1983, cyclone "Oscar" struck Fiji. Most damage was done in the Western Division off Viti Levu. Government estimates were that 4,733 housing units were destroyed and 4,526 damaged. Of these, 36% were in the Western Division.

U.S. ASSISTANCE: USAID's South Pacific Regional Development Office (SPRDO) requested The Foundation for the Peoples of the South Pacific (FSP) to prepare a disaster assistance program. This program was approved on June 23, 1983 under Project FSP/FIJI Grant # 879-0251-G SS-3016-000. It was to be completed in one year. An initial grant of $72,000 was authorized for small project assistance. Another $50,0000 was authorized in May 1984. The aim of the program was to provide financial and technical assistance quickly to villages and groups to enable them to proceed in their reconstruction and rehabilitation efforts. Projects required the approval of the Commissioner of the Western Division of the Government of Fiji, FSP/New York and SPRDO.

PURPOSE OF EVALUATION: The A.I.D. grant agreement with FSP stipulated that FSP should evaluate the effectiveness of the program in terms of its major purpose which was to provide quick, effective assistance for the reconstruction and rehabilitation of cyclone damaged-infrastructure to eligible groups, registered organizations and rural villages. One person from FSP conducted the evaluation and made site visits to most of the approved project sites. On many of these visits, he was accompanied by local government officials.

FINDINGS:

1. Thirty projects were funded under the two grants and 453 kitchens, 94 toilets, 56 showers and 6 community centers were reconstructed or rebuilt in 31 villages. Only one project was rejected.

2. An estimated 9,725 people benefited from the entire program (1st and 2nd grant allocations) at an average per capita cost of $12 each. A total of 6,625 people benefited at an average per capita cost of U.S. $10.85 under the first grant.

3. The program was carried out in a professional manner. It was very successful in organizing the villagers. It maintained and strengthened its partnership with the Government and other organizations. There was no case of material loss through misappropriation or theft.

4. There was a long delay before the second grant funding arrived. This meant that materials were still being delivered as late as August 1984, well after the official end of the project.

PROJECT DESIGN & POLICY IMPLICATIONS: Two major reasons for the success of the program are the excellent relations between USAID and the Fiji Government and between FSP and the Fiji Government, and the quick response that the A.I.D.-International Private Voluntary Organization funding mechanism permits. Several key individuals were also responsible for this success. The government official most actively involved in the FSP program was the District Officer of Sigatoka who proved to be a tireless and dedicated worker as well as an excellent administrator. FSP was able to field an experienced Country Director quickly to prepare the project proposal. It was able to hire quickly a qualified Project Director who had previous Peace Corps experience in the Solomon Islands building village water supplies. Additional technical assistance was made available by the Peace Corps through the services of an in-place Volunteer. A few months after project approval, FSP appointed an experienced Country Director and was able to shift the technically qualified original Director to the field where his skills could further project objectives in other ways. FSP also negotiated a UNDP Grant to promote women's programs in Fiji and was able to tie this to the Oscar program. These factors also played an important part in the success of the project. The major lesson learned is that of the flexibility and responsiveness of the PVO mechanism to handle, in an efficient manner, activities which otherwise would without doubt take much longer to implement and, thus, not meet the needs of the intended beneficiaries appropriately.

RECOMMENDATIONS: (Note: No recommendations were made.)

This evaluation was conducted in September 1984 by Robert P. Hosie, Chief Evaluator of The Foundation for the Peoples of the South Pacific, Inc.

REVIEW OF THE SOUTH PACIFIC COMMISSION'S TUNA AND BILLFISH ASSESSMENT PROGRAM

OVERVIEW: In 1977, a four-year, multidonor-backed Skipjack Survey and Assessment Program was established which has been considered one of the most comprehensive and successful fish tagging programs conducted to date and has enabled marine biologists and fisheries experts to estimate that the standing stock of skipjack tuna at 3 million metric tons. Before termination of this program, in September 1981, a follow-up program, the Tuna and Billfish Assessment Program (TBAP), was conceived and recommended by the South Pacific Fisheries meeting to the South Pacific Commission (SPC) for funding support. The focus of this new program was on the assessment of tuna species, other than skipjack, and the several species of billfish.

U.S. ASSISTANCE: The original Skipjack Survey and Assessment Program was supported by A.I.D. as well as the governments of Australia, New Zealand, France, U.K. and Japan. The current TBAP effort also receives A.I.D. support under Project # 879-0002. Other donors are Australia, New Zealand and France. It commenced on October 1, 1981, and a decision was made in 1983 to extend it for two more years. The key objective of the TBAP is to develop a tuna statistical base which will be incorporated into the SPC's computer system. [Ed. note: no funding level is stated nor is the original PACD mentioned.]

PURPOSE OF EVALUATION: A technical review of the SPC TBAP was requested by A.I.D.'s South Pacific Regional Development Office (SPRDO).

FINDINGS:

1. Of the two original purposes for which the statistical information was to be used, one has been achieved; the other not. However, an outstanding job has been done in developing a regional statistical program. Substantial efforts have been made toward: (1) development of a statistical system; (2) theoretical and planning aspects of a major tagging program to address the interaction problem; (3) completion of several skipjack tuna reports; and (4) conducting limited field work.

2. The first original purpose, which has been completed, called for the incorporation and use by member countries of statistical information obtained through access agreements with distant-water fishing nations.

3. The second original purpose, which has not been completed, was to conduct stock assessment studies of the various tuna and billfish species. An inability to obtain detailed catch and effort statistics from distant-water fishing nations has hampered progress on this aspect. Achievement of the second purpose will require full cooperation of the distant-water fishing nations. This is because the results are totally dependent upon tags being returned with adequate data. Presently there is no assurance that these requirements will be made available to SPC.

PROJECT DESIGN & POLICY IMPLICATIONS: Some personality conflict developed between the Secretary-General of SPC and the Program Administrator. This has resulted in the resignation of the latter at a crucial time, i.e., the beginning of the two-year extension. There are other key staff vacancies that also need to be filled. Part of the problem is the temporary nature of the program and low salary base for the Senior Scientists. Part is due to the uncertainty of program funding beyond the two year extension. Another aspect of the problem is the role currently played in program administration and management by the Secretary General, SPC. Much of the success of the earlier Skipjack tagging program is attributable to the strong leadership and administration of the former Program Coordinator. In his absence and unless these problems can be solved, there is considerable reason to predict detrimental effects to the program. One lesson learned in this project is not to allow any one individual to dominate the project's leadership and management. It is also important to carefully delineate the duties of the individual(s) responsible for administration and management from those charged with broader policy and project oversight responsibilities and to provide some insulation for the management personnel from inappropriate interference in management and administration by the latter.

RECOMMENDATIONS:

1. The program should continue to maintain the statistical system even if it is restricted to providing services to member countries who have access agreements with distant-water fishing nations.

2. A treaty structure may be required to provide the mechanism for collection and access to the detailed catch and effort data needed for stock assessment analyses.

3. The program staff should complete the theoretical and planning work of the tagging project to determine the interaction among fisheries and resources.

This review was conducted at the program headquarters of SPC in Noumea, New Caledonia by Richard S. Shomsura during August 1984.

EVALUATION OF THE FIJI NONFORMAL EDUCATION FOR DEVELOPMENT PROGRAM

PROBLEM & OVERVIEW: The Fiji Non-formal Education for Development Project, in the Province of Kadavu, was prompted by Hurricane Meli which caused extensive damage to dwellings, businesses and other infrastructure on the island in 1979.

U.S. ASSISTANCE: The Asia Foundation (TAF), in collaboration with the Methodist Church in Fiji and with funding under A.I.D. Grant #879-0251-G-00-1003-00, carried out a two and one-half year program to train students in specific skills and to improve very specific aspects of village life in areas identified by the villagers themselves as needing improvements. TAF involvement in the project began in October 1981 and was completed in June 1984. About U.S. $120,000 in grant funds were expended.

PURPOSE OF EVALUATION: In May and June 1984, an evaluation of this project was undertaken by the Project Manager. During this period visits to project sites were made, often in conjunction with representatives of USAID's South Pacific Regional Development Office (SPRDO), the Methodist Church in Fiji, and the Kadavu Provincial Council.

FINDINGS:

1. The program involved 20 self-help projects, 12 primary school projects, and 13 secondary school projects. Of the self-help projects, six were unfinished at the time of evaluation and four were still waiting for materials to arrive. Two others were considered failures.

2. Non-formal Education programs were established at 10 Kadavu schools. School committees were involved as well as principals and an effort was made to concentrate on imparting vocational training in only one skill, especially at primary schools. Vocational training programs include home economics, woodworking, animal husbandry and motor mechanics.

3. Self-help projects were initiated among local co-op organizations in 27 villages. These were directed at improving the physical, social and economic qualify of life. Examples include water supply systems, meeting halls, fishing boats, chainsaw-type sawmills, and co-operative stores.

4. The major problem has been logistics of procurement and shipping. Kadavu has a road network reaching only 10 of its 82 villages. In 72 villages, cargo can only be received by sea which, around Kadavu, is made difficult by many reefs and habitual bad weather. Of the six projects unfinished at the time of this evaluation, four were still waiting for materials to be shipped four to eight months after ordering.

5. Another hurricane in 1983 has reduced considerably the accomplishments and impact of the project. Some villages lost as much as 80% of their houses and farms.

PROJECT DESIGN & POLICY IMPLICATIONS: The most successful programs seem to be those involving a teacher, parent, or local government field officer who is willing to give time as a trainer. The best programs also bring in income which not only permits physical maintenance of the facilities and equipment but sustains student interest, especially among parents. The problem of receiving supplies on a more timely basis could be partly alleviated by stationing a liaison person in Suva to check on the status/availability of boats, notify the supplier of loading and maintain visual contact with purchased items. More emphasis and resources devoted to training would have made some of the project's activities more effective, such as by teaching long-line fishing outside the reef or sewing of fashionable clothing. Finally more emphasis could have been put on finding outside markets for products of income generating activities as a means of achieving self-sufficiency for non-formal education programs.

At the macro-level, the major sponsors and donors of the project - the Fiji Government, The Asia Foundation, The Kadavu Provincial Council and the Methodist Church in Fiji - although perhaps an unlikely oversight group, became deeply and yet cooperatively involved in one way or another during the period of the grant. The involvement and intentions of TAF and, indirectly, the U.S. government, became known and appreciated down to the grassroots level. Understanding and coordination among them was developed and, as a direct result, funds and resources allocated to and required by the project were directed to it. Duplication, competition and wastage were largely avoided. The overall exercise has given the parties a type of practical training program which will be of great value to the rural development effort of the Fiji government, the Methodist Church in Fiji and future intermediary activities that TAF or others seek to carry out.

However, the overall scale of development assistance in Kadavu is insufficient to counteract difficulties, notably a hurricane, a decline in shipping services and government public work projects, and the general economic condition of the country. The amount spent for self-help projects in this project was greater than the total available from all other sources for this type of small-scale development. The financial aid to non-formal education and training programs was virtually the only aid of its type in Kadavu with the exception of government funds for non-formal education teachers' salaries.

RECOMMENDATIONS:

1. Priority should be given to improving access to shipping, especially shipping to/from Suva. This may be done through a system of smaller boats or a ship owned and operated by the Kedavu Co-op Association or Provincial government.

2. Fishing industries should be encouraged.

3. A follow-up survey of secondary students involved in the Non-formal Education courses should be conducted.

This evaluation took place in May 1984. [Ed. note: The evaluation report does not contain the name of the principal evaluator.]

EVALUATION OF THE TONGA COOPERATIVE FEDERATION PROJECT

PROBLEM & OVERVIEW: The Tonga Cooperative Federation (TCF) was organized in November 1977 to serve 60 or more primary cooperative societies selling consumer goods to members and non-members. It was intended to operate as a wholesale supplier of consumer goods for the societies, giving them some economic advantages due to scale of purchase. By the end of September, 1980, TCF had trade debts of T$89,000, T$27,000 cash in the bank and T$23,000 in over-valued stock. Accounts receivable were considered uncollectable. In fact, TCF was bankrupt and ready to be closed by the Cooperative Registrar's office. Because of incompetent management, TCF had failed to generate a sufficient mark-up on goods and sufficient volume of business to be a viable organization. The primary societies were also having some problems because of the failure of TCF, though they continued to operated. It was felt that TCF's problems could be corrected.

U.S. ASSISTANCE: The effort to rescue the Tonga Cooperative Federation started in June 1980 with a request from the Cooperative Registrar for the Kingdom of Tonga to Agricultural Cooperative Development International (ACDI). After more than a year of discussion, examination of records and problems, and negotiations, ACDI and USAID signed a two-year project agreement dated September 30, 1981. Phase I started in January 1982. The purpose of this project was to build TCF into a sound and viable cooperative organization capable of serving its members. A Phase II proposal has been made and is waiting USAID approval at the time of this evaluation. [Ed. note: The evaluation report does not mention the A.I.D. project number, the type of grant to ACDI, or the funding arrangement and commitment level.]

PURPOSE OF EVALUATION: The present evaluation covers accomplishments during Phase I. The ACDI-USAID agreement stipulates that project evaluation is a primary responsibility of the grantee (ACDI). The evaluation method and schedule used are based on the "logical framework" system. A mid-term evaluation was done in February 1983.

FINDINGS:

1. Financial goals either have been met or exceeded except for gross margins, and this has significantly improved since the project began. Gross sales at the end of the project were nearly five times more than projected. As a commercial enterprise, TCF is a financial success.

2. An accounting and information system has been installed and personnel trained in its use; however, a Tongan chief accountant and a head bookkeeper are still to be recruited. It has not been possible to hire a Tongan suitable for training for the chief accountant position. The Board of Director's reluctance to offer an adequate salary for this position has been an obstacle. The present chief accountant is an expatriate.

3. Post project expectations, especially the one calling for TCF to be managed by a Tongan at the end of two years, have not been met. Good progress has been made on other goals, however, such as "sound financial position," "member support," "public confidence," "self-supporting," and "competitive supplier." A Tongan with potential to be trained as a general manager was hired in October 1983. Another 12 to 18 months of technical assistance will be required to train him to the necessary level and provide the relevant experience needed to manage the consumer wholesale operations.

4. A critical problem at this time is how to improve the ratio of member to non-member business. About 20 percent of the merchandise sold by the wholesale store is purchased by member societies, but more than half the merchandise in their shops is purchased by non-members.

5. The fish marketing operation is losing money. This is because of the low volume of fish being offered to the Federation for sale, about one ton a month. Estimates indicate that 2 to 2 and 1/2 tons are needed to break even.

6. Vanilla marketed by the TCF has been highly successful. Quality has been improved and good prices have been obtained for member producers. Although not a money-maker for TCF, no losses have resulted and much good will has been created.

7. Handicraft marketing is progressing. Gross sales rose from T$12,410 in 1982 to T$58,092 in 1983.

PROJECT DESIGN & POLICY IMPLICATIONS: Certain events significantly changed the project's character over the first two years and have affected the original post-project expectations. For example, when the planning goals were exceeded, original expectations may no longer be valid indicators of achievements. For instance, anticipated gross sales upon completion of Phase I were T$450,000. This figure was exceeded in the first year by T$91,000 and by T$1,770,000 the next. Management requirements for a $500,000 business are not the same as for a $2,250,000 business. The goal of being totally self-supporting at the end of two years may no longer be valid.

The implication at the outset of this project was that it would be extended beyond the original two years. Although such an expectation was not certain to be fulfilled, the anticipation of it has affected priorities. As a result, it is likely that sounder decisions have been made and better results achieved.

In the original project planning, vanilla and fish marketing were given scant attention and handicrafts marketing was not even mentioned. These are now important TCF services. Since they were not originally considered, no base line data or goals were established. This makes it difficult to evaluate goal accomplishment and impact. It also affects the validity of original post-project expectations.

RECOMMENDATIONS:

1. Efforts to increase gross profit to 9 percent or higher should be continued.

2. The search to locate a Tongan candidate for the chief accountant's position should be intensified.

3. The training of the Tongan candidate for general manager should continue and consideration should be given to sending him to the U.S. for a short-term course in management.

4. Certain suggested actions to improve the member to non-member ratio should be tried including improving delivery services to member societies, improving and intensifying salesmanship and public relations efforts, and developing management contracts with selected society stores.

5. The services of a fish marketing expert should be obtained to assist in preparing a long-range development plan.

This evaluation was conducted in January,, 1984 by Joe K. Savage, a consultant to Agricultural Cooperative Development International.

EVALUATION OF THE INTERNATIONAL HUMAN ASSISTANCE PROGRAMS' COOK ISLANDS INTEGRATED RURAL DEVELOPMENT PROJECT

PROBLEM & OVERVIEW: The fifteen Cook Islands - thirteen of which are inhabited by about 18,000 people - constitute a total land area of 240 square kilometers scattered over 2.2 million square kilometers of sea. The largest island (65 square kilometers), Rarotonga, is also the center of government and contains about half the total population of the country. The economy of the Cooks is largely agricultural, including fishing, and subsistence. Tourism has become an increasingly important industry and source of foreign exchange. Some mother-of-pearl is also collected, mostly for export. A major source of revenue is the remittance of overseas Cook Islanders, mainly in New Zealand. The negative side of this is the decline in population, due to emigration which causes a serious loss of skilled workers who are among the most economically productive elements of the population. This impedes economic development as well as provides cause for social problems.

U.S. ASSISTANCE: In September 1980, A.I.D. approved a grant (#492-1704) in the amount of $363,498 to the International Human Assistance Programs (IHAP) for a three-year project. The terms of the grant called for an IHAP contribution of $19,000 and a Cook Islands Government (CIG) contribution, either in cash or in kind, of approximately $101,600. The project was formulated in response to a CIG request for assistance in the areas of training, health care delivery, copra production and stimulation of small-scale, income-generating projects. The goal was to reduce unemployment, increase family incomes and improve the basic health of the citizens.

Sometime after the project was authorized, the CIG began preparation of its First Development Plan which was approved in December 1982, although not published until 1984. Because the IHAP project did not have the benefit of the guidance of the First Development Plan, the project was viewed by concerned officials as having an experimental character. However, the project as a whole was consistent with the philosophy and approach of the Development Plan and supportive of the principal development objectives. It supported development goals by undertaking five (later reduced to four) specific target activities in its implementation strategy: (1) training; (2) public health; (3) agriculture; and (4) miscellaneous rural development. Each sub-project request, once developed to the point that it meets the IHAP Project Manager's approval, is submitted to A.I.D.'s South Pacific Regional Office (SPRDO) for approval. Originally, IHAP's New York office also had to review and provide approval. This was dropped later.

PURPOSE OF EVALUATION: This evaluation attempts to match actual interventions under each of the four headings against two assessments: (1) prior to each intervention, was there sufficient justification that the area of intervention might possibly lead to the solution of problems on a wider scale than that of the intervention itself? and (2) following the termination of each intervention, were the results analyzed in sufficient depth to confirm the original justification?

The evaluation was conducted in mid-1984. Information was obtained through a review of project documents, interviews with high government officials and with the IHAP Project Manager and staff. Visits were made to twenty of the of thirty activity sites on the islands of Mauke, Mitiaro and Atiu as well as Rarotonga.

FINDINGS:

1. Shortly after the grant was authorized, the CIG abolished both the Tumu Korero school and the vocational training program for juvenile delinquents. The provision of technical assistance to this institution was one of the original project objectives. Accordingly, the related components of the project were deactivated.

2. A review of the justifications for the 20 pilot-type interventions examined shows that most were satisfactory. However, the first evaluation test can be applied to the 20 separate interventions only with the understanding that the rationale for each intervention applies to a narrow objective, not to larger, more sophisticated developmental objectives. Two exceptions were noted.

3. Applying the second evaluation test to these 20 separate interventions, it appears that among them, two in particular hold promise for a larger, more sophisticated intervention in the future. Using the second test is as difficult as applying the first owing in part to the narrowly focused rationale in which each intervention began its life.

4. IHAP, at the request of the Ministry of Agriculture, furnished the islanders of Rakahanga with lantern nets for the development of spat (oyster eggs), an essential step in the cultivation of pearls and pearl shells. This contribution helped demonstrate the excellent potential for oyster pearl and shell cultivation in the islands of Rakahanga and Manihiki and provided strong support for mounting a program for the development of coastal fisheries with pearl and shell cultivation as a major component.

5. IHAP-assisted a Peace Corps project which demonstrated the use of solar energy panels and a simple, effective, locally produced fish drying oven. This device had immediate utility and considerable value to a coastal fisheries development program.

PROJECT DESIGN & POLICY IMPLICATIONS: While the actual activities implemented under the four headings appear to be consistent with CIG long-term development goal of encouraging income generating enterprises and increasing employment opportunities so as to make continued residence in the islands more attractive and arrest the trend to emigrate, this connection is not central to the project. It is the experimental and pilot nature of these activities which is central. The selection of a particular intervention is based on requests to the IHAP Project Manager by Island Councils or by Ministry officials stationed in particular islands. The Project Manager then develops a rationale for the request. In one sense, these rationales represent an analysis; however, due to the wide range of requests, their small monetary value, and the limited funds available to hire experts, these rationales are necessarily narrowly formulated, addressing a small aspect of what might be, or not be, a larger developmental problem. In formulating these requests and rationales, IHAP keeps the CIG's Department of Planning informed, but central government approval is not required for approval. The opting out of the Department of Planning in the review process may also be said to contribute to the narrowness of these rationales since, theoretically at least, the Department could be viewing each request in terms of the larger development program. The slippage from broad, in-depth analyses to narrowly focused rationales suggests that the operational goal of the project -to undertake pilot and experimental interventions with a view to ascertaining the wisdom of larger interventions in the future- was probably too ambitious. A more realistic goal, reflecting the necessarily narrow focus of sub-project requests, would have been to achieve quick, one-time small interventions with the modest view of showing a presence in the Cook Islands.

RECOMMENDATIONS:

1. It is recommended not to extend the Integrated Rural Development Project unless there is a clear understanding that the objective of such an extension would be modest and similar to, for example, A.I.D.'s Accelerated Impact Program.

2. It is recommended that IHAP, in keeping with the nature of the IRD project, pursue possibilities in coastal fishing, including shellfish, and that in developing an extension to its Agricultural Diversification Project, it include a fisheries component.

3. It is recommended that for future projects, IHAP should be cautious about taking on projects in which insufficient resources are made available to accomplish the stated goal. Similarly, based on its experience with solar lighting on Mitiario and water systems on Aitutaki and Rarotonga, no pilot intervention should be undertaken without first making provision for meeting recurrent costs.

4. Based on IHAP's experience with the construction of the Atiu market and the Avarua fish market, no community-type intervention should be undertaken without first soliciting and receiving active community participation in its formulation.

This evaluation was conducted by Leonard Maynard, a Consultant to IHAP.

EVALUATION OF THE INTERNATIONAL HUMAN ASSISTANCE PROGRAMS' COOK ISLANDS AGRICULTURAL DIVERSIFICATION PROJECT

PROBLEM & OVERVIEW: [Please see this section in the preceeding Executive Summary, entitled "EVALUATION OF THE INTERNATIONAL HUMAN ASSISTANCE PROGRAMS' COOK ISLANDS INTEGRATED RURAL DEVELOPMENT PROJECT" found on page 127.]

U.S. ASSISTANCE: In May 1981, A.I.D. approved Grant #879-0251-G-00-1001 entitled "Cook Islands Agricultural Diversification Project" (ADP) in the amount of $165,800 to the International Human Assistance Programs (IHAP) for a three-year project. The terms of the grant called for an IHAP contribution of $8,171 and a Cook Islands Government (CIG) contribution (Ministry of Agriculture), either in cash or in kind, of approximately $404,337. The original Grant Agreement was amended on July 30, 1983 and the A.I.D. grant was increased to $355,156. The original project life was also extended to over four years, May 1981 to September 30, 1985.

The goals of this project include the promotion of economic development and the arresting and reversal of emigration of Cook Islanders to New Zealand. The project's purpose is to assist in the diversification and expansion of agricultural production for purposes of improving subsistence, developing import substitution, increasing cash sales, expanding exports, and generating cash incomes. These purposes are consistent with the development goals and strategy of the Cook Islands First Development Plan 1982-1985.

PURPOSE OF EVALUATION: The evaluation's purposes were: (1) to determine the extent to which project targets had been achieved; (2) to gauge the effectiveness of the project in contributing to the achievement of economic and social development of the Islands; (3) to identify unplanned results and assess their implications; (4) to ascertain reasons for successes or failures of given activities; (5) to determine if the project design is appropriate for continuation; and (6) to recommend future actions. The evaluation was conducted in mid-1984 and information was developed through a review of documents, interviews with CIG officials and IHAP staff, and by direct observation through project site visits.

FINDINGS:

1. All major components of the project are being effectively implemented and are on schedule. Of the seven project components, almost all had been completed from a technical standpoint at the time of this evaluation.

2. In some components, there are sufficient funds remaining that could be reprogrammed to accommodate supporting elements for several activities that had not been identified in the original project plan. These extra funds are mostly derived from the elimination of the greenhouse construction, radio program and land preparation for coffee planting.

PROJECT DESIGN & POLICY IMPLICATIONS: It is much too early to give a statistical assessment of the impact that the project has had on economic development and decelerating emigration. However, it should set the stage for increased production and, hence, overall economic growth. To a large extent, a favorable outcome in regard to development will depend on the ability of CIG to give priority to the further development of the institutional basis of the program. Special emphasis on the training of farmers and MOA personnel is essential. A favorable outcome will also depend on the ability of CIG to cover recurrent costs. Although CIG is aware of the need for such a shift in the carrying of recurrent cost burdens, the actual implementation will not come easily. Attention should be given now to the process of developing the means to assist CIG in this difficult task. Among the current conditions which might favor this goal are the present constructive attitude of the government, the small farm population, and the impact that the project has had across a wide spectrum of island agriculture.

The prospects for a positive impact on the emigration issue are less optimistic. Deceleration of emigration is a long-term goal and given the economic growth of New Zealand, over which the Cook Islands has no control, it should not in any event be looked upon as a goal which donor interventions are likely to help achieve. The project, therefore, should be redesigned to reflect a more modest and realistic goal.

RECOMMENDATIONS:

1. Planning should be initiated as soon as possible to address the issues of institutionalization, recurrent costs, and critical areas (processing, storage, marketing, transport) not covered by the present project.

2. Unspent funds in certain components should be reprogrammed to support newly identified sub-activities. For example, remaining money in the coffee production component should be used to train farmers in newly-planted coffee acreage and on older acreage on Atiu, Mangaia, Mauke and Mitiaro Islands. Funds allocated to greenhouse construction should be used to procure additional nursery equipment. Unobligated consultancy funds, and the money earmarked for the agricultural radio program, should be used to engage short-term experts in food preservation, livestock processing and poultry feed production.

3. A modest interest rate should be charged by the revolving fund for copra drying facilities.

4. IHAP should as soon as possible fulfill its funding obligation ($8,171) to the project and should initiate negotiations with the Cook Islands government and A.I.D. regarding implementing recommendations #1 and 3.

This evaluation was conducted in mid-1984 by Leonard Maynard, a Consultant appointed by IHAP.

PROBLEM & OVERVIEW: This project addresses the need to develop methodologies regarding land preparation, farm and field layout, field channel design and water delivery procedures which result in increased production per unit of water and which may be used in new irrigation projects and rehabilitation of older ones.

U.S. ASSISTANCE: The On-farm Water Management Project (#383-0048) Grant Agreement was signed on August 31, 1977. AID technical assistance was completed in September 1982, but the Project Activities Completion Date (PACD) was extended to March 1983 to allow for completion of two procurement actions. The USAID contribution amounted to $800,000 and the GSL contribution, $273,000. Its specific objectives included development of land preparation and farm irrigation techniques, of techniques for scheduling and controlling water within the field channel system, of design criteria and operational procedures to permit rice to be grown with upland crops and an understanding of the extension, institutional and administrative requirements to extend technologies to farmers in irrigated areas of Sri Lanka. The original Project Agreement was amended in early 1980 and included the following list of activities: (1) methods of land preparation, land leveling, and irrigation; (2) crop, soil and water management; (3) demonstration and training activities and special studies; and (4) a water balance study of the distribution network serving the test area. Specifically, the project consists of an experimental farm of about 50 acres and an adjacent demonstration area occupied by small farmers in the Kalawewa area.

PURPOSE OF EVALUATION: This is the Project Assistance Completion Report. Two evaluations were held at the approach of the PACD. A final evaluation was conducted in July 1982. Prior to this, a mid-term evaluation was conducted in October-November 1981.

FINDINGS:

1. Completion of scheduled activities ranges from 90% in the case of land preparation and leveling, to 70% in crops, soil and water management, to 50% in methods of irrigation and water balance study, to 20% in demonstration and training, to 10% in the case of structures and water measurement. Fifteen special projects were initiated of which 8 reports have been received.

2. $634,000 was actually spent against the grant total of $800,000. Government (GSL) inputs exceeded the planned budget by 225%.

3. Overall, the research progress was hampered by lack of personnel, i.e., staff who were not assigned as called for in the Project Agreement. Less than one half of the planned GSL personnel were assigned. Data collection and delay in the submission of seasonal reports is another factor accounting for the slow progress made by this project.

4. Progress on the water balance study has been slow. The primary objective of this study is to determine problems of high water tables, drainage and salinity that may develop with prolonged irrigation of upland soils. The results of this study are integral to achieving the higher level of the project's purpose: the adoption of research results.

5. There has been no evidence that farmers have adopted the major recommendations of the project concerning graded terraces with furrow irrigation. Little emphasis was placed on field channel design and water delivery procedures, despite the recommendation of the mid-term evaluation. The Project's Steering Committee dropped this recommendation in favor of an evaluation of the performance of existing structures throughout Sri Lanka.

PROJECT DESIGN & POLICY IMPLICATIONS: A major lesson learned with respect to the impact of a research project is that the potential benefits of research are unlikely to be shared among the intended beneficiaries unless outreach programs are carried out. This project pointed out the difficulties of managing the cultivation of upland crops and flooded rice in alternate seasons in level basins. The initial research begun in this

project needs to be followed by more extensive work on land leveling, cropping systems, water balance and drainage studies. The Sri Lankan farmer's preference for growing flooded rice for at least one season is well established. To expect farmers to give up their traditional rice cultivation system is unreasonable unless a viable alternative which provides adequate security and incentives can be demonstrated. Without this effort, the project is unlikely to have measurable impact.

More serious in terms of policy is the conclusion that the GSL has made an inadequate commitment to the project. Specifically, the GSL has not met its commitment to train, equip and organize methods of irrigation other than the traditional basin system. Recommendations from the first evaluation point to what appeared then to be a lack of staff and lack of commitment from the GSL. The second evaluation, which focused on the continuation of research work at Kalankuttiya, contained eight recommendations on which little has been done since termination of A.I.D. support. The lack of progress since termination substantiates the conclusion about the lack of GSL commitment. The important lesson learned here is that it is critical to the achievement of the project goal to maintain a on-going dialogue between USAID Project Officers and the host country representatives regarding periodic analysis of end-of-project status indicators and levels of host country commitment. An on-going dialogue may allow pressure to be applied at more critical junctures than after annual or other periodically scheduled reviews and to ascertain whether recommendations have been validated and/or implemented. Similarly, as problems due to staffing inadequacies become pronounced, and as it becomes increasingly apparent that adequate staff will not be committed as previously agreed, consideration should be given to narrowing the scope and sharpening the objectives of the project. Another lesson learned is that it may well be desirable to attach conditions to the initial grant/loan agreement which must be carried out after the PACD and which are monitored by USAID staff for compliance.

RECOMMENDATIONS:

1. A.I.D. should continue to monitor the progress of the project to ensure that recently, as well as previously purchased commodities, are used to meet the objectives of the project.

2. An independent special research project is needed to solve problems relating to the water distribution for upland crops under schemes that also supply water for flooded rice cultivation. Research needs to be undertaken to discover what institutional and legal changes are needed and what allotment sizes are required to make cultivation of upland crops attractive for the farmers.

3. With respect to the lessons learned from this project, care should be taken to see that future research is handled by the appropriate operating agency and that the research is not duplicative of what some other agency may be already doing. It may be more logical to provide additional financial and manpower help to the agency already involved rather than setting up an independent project competing for scarce available manpower.

4. The research area at Kalankuttiya should be expanded from a field channel to a distributary-sized unit to generate and provide additional information for wider replication in Mahaweli and other areas of the country.

This report was compiled and prepared from the "On-Farm Water Management Research Project at Kalankuttiya" authored by A.T. Corey and K. Lyvers, and the "On-Farm Water Management Project - Sri Lanka, Final Evaluation Report" by A.R. Robinson and H.P.M. Gunasena. USAID/Colombo staff were also involved in the preparation of this report which is dated January 25, 1984.

PROJECT EVALUATION SUMMARY OF THE AGRICULTURAL EDUCATION DEVELOPMENT PROJECT - SRI LANKA

PROBLEM & OVERVIEW: A 1977 study predicted that Sri Lanka's demand for high level agriculturally trained manpower would far exceed the capacity of the University system to produce this manpower. At the time of project design, the Faculty of Agriculture at Peradeniya was the only agricultural degree-granting institution in Sri Lanka, and the Post Graduate Institute of Agriculture was the only institution offering postgraduate training in agriculture. The combined annual output of Agricultural B.Sc. graduates from the three currently existing faculties of agriculture is expected to exceed 180 by 1985-86, and to reach 200 about two years later.

U.S. ASSISTANCE: The Agricultural Education Development Project (#383-0049) is designed to meet the increased demand for high level agriculturally trained manpower. The Project Grant Agreement was signed on August 31, 1978. It provided for a grant of $6 million which was amended, in March 1982, to $7.5 million. The Government of Sri Lanka's (GSL) contribution was to be $5.4 million. The Project Activity Completion Date (PACD) is September 30, 1985. The project's purpose is to double the annual number of indigenously trained B.Sc. graduates and triple the annual number of indigenously trained post-graduates by 1987. The project's goal is to assist agricultural development by increasing domestic food production, expanding employment opportunities, and improving the small farmers' standard of living. The U.S. contribution consists of commodity procurement and technical assistance.

PURPOSE OF EVALUATION: This evaluation was to assess the accomplishments to date, and to identify any mid-course corrections in project design or implementation that might improve project effectiveness and efficiency. The methodology included a review of all major project documents, administration of questionnaires, and inspection visits to on- and off-campus facilities.

FINDINGS:

1. Three Ph.D. and one M.S. candidates have completed training and 33 Ph.D. and one M.S. candidates are in training against a target of 38 Ph.D.s. Training completion schedules have been delayed due to problems in participant selection, policy and timing of start-up activities. Total academic staff may be 4 to 5 percent fewer than projected in the original Project Paper due to GSL budgetary constraints.

2. Ninety percent of the equipment and 30 percent of the library books and periodicals targeted have been procured. Outreach program equipment has been procured and the organization of outreach programs is in preliminary stages.

3. Construction is about 40% completed. The number of buildings completed, under construction, or currently planned equals or exceeds the Grant Agreement projections in all categories. However, the completion schedule for construction as described in the Grant Agreement proved unrealistic and completion is not expected until 1986.

4. Technical Assistance is basically on schedule although minor adjustments in the ratio of long- to short-term assignments were made. The technical assistance has been appropriate to the assignments and has provided in-country Ph.D. research supervision and associated curriculum, research and outreach assistance.

5. The Post Graduate Institute of Agriculture has had to limit enrollment to about 25 students per year because many staff are training abroad. As the staff members return, it is expected to increase and reach the 75 students per year target by 1985.

PROJECT DESIGN & POLICY IMPLICATIONS: The GSL has changed its policies regarding undergraduate training since the time of project design and two additional agricultural faculties have been established, one at Ruhunu University and another at Batticaloa University. One more is planned for Jaffna. The large investment required to build, equip and staff the new facilities has increased appreciably the cost to the GSL of

training agricultural graduates. The diversion of funds for the development of these new faculties has reduced the level of resources available to the Post Graduate Institute of Agriculture (PGIA) for proceeding with its own development. However, it is anticipated that the three faculties will admit between 250-275 students by 1985, well above planned targets. By 1987-88, the annual B.Sc. graduates will reach the 200-student target.

In terms of Lessons Learned, the report notes that it is important to design into a project verifiable outputs since without them assessing a project's progress is difficult. The report also notes that in cases where training programs diminish staff in a given department, i.e., staff go abroad for training, expectations must be lowered in terms of the output expected from the department during staff absences and actions must be taken to compensate for temporary staff shortage.

RECOMMENDATIONS:

1. The PACD for training should be extended through December 1986 to allow all Ph.D. candidates to complete their programs.

2. One additional junior staff member should be admitted for M.S. level training provided such training can be completed by the 1986 PACD and that sufficient funds are available in the present budget.

3. The project should be implemented according to the modified plan except that in-country technical assistance activities should be adjusted to coincide with the return of trainees. Recruitment of technical assistance personnel should be limited to staff of U.S. institutions.

4. A comprehensive study should be made of Sri Lanka's future needs for development of higher education in agriculture including a reassessment of present and future demand for agricultural graduates and post-graduates.

5. More attention should be paid to the identification, involvement and recognition of local Sri Lankan advisors of Ph.D. research.

6. An evaluator with international experience in agriculture education projects but with no prior experience with the Agricultural Education Development Project should be included in future evaluation teams.

This evaluation was conducted in November 1983 by J.P.M. Gunasena, Dean of the Faculty of Agriculture; M.W. Thenabadu, Acting Director, PGIA; S. Pinnaduwage, Head of the Department of Agricultu al Economics and Extension; J.W. Bonner, Assistant Agricultural Development Officer, USAID/Sri Lanka; and H.E. Ray, Chief of Party, Agriculture Education Development Incorporated. This report is dated December 7, 1983.

PROJECT EVALUATION SUMMARY OF THE PADDY STORAGE AND PROCESSING PROJECT - SRI LANKA

PROBLEM & OVERVIEW: A rice rationing system, dating from World War II, has been the major mechanism by which successive Sri Lankan governments have provided the total population with a minimum supply of rice. Rice was distributed through a large network of cooperative societies and was provided free-of-charge or at a subsidized price. The responsibility for administering this program lay with the Food Commissioner of the Ministry of Food and Cooperatives. In order to supply rice to the system, the government purchased domestically produced rice directly from growers. Over the years, this has developed into a major commercial activity, although the private sector has not been actively encouraged in the area of rice marketing. In 1971, the Paddy Marketing Board (PMB) was created for the purpose of purchasing paddy, ensuring its proper storage, handing its conversion to polished rice, and delivering the rice to the Food Commission for inclusion in the rice rationing system. This system has been criticized as inefficient and time consuming.

U.S. ASSISTANCE: The Paddy Storage and Processing Project (#383-T-0041) was conceived in 1976. The Project Agreement, signed on February 2, 1978, provided a loan of $5.4 million, subsequently revised to $4.775 million. The Project Activity Completion Date (PACD) is June 30, 1984. The project is designed to increase the efficiency of paddy procurement, storage and processing, and to increase the capacity for paddy storage and processing. Project inputs include 3,000 moisture meters, construction of seven milling and storage complexes, provision of ten milling machines for the development of the private sector, technical assistance, and training of 60 persons on short-term and three for long-term (M.S.) programs.

PURPOSE OF EVALUATION: A series of rapid adjustments in policy since 1977 has had major impact on the original project purpose. This evaluation intended to provide recommendations and an action plan for the expeditious conclusion of ongoing activities and disposition of commodities not yet used. It was also to conduct a review of the status of project implementation and provide recommendations for further Government of Sri Lanka (GSL) institutional and private sector development in grain marketing. The evaluation was conducted by two groups consisting of: (1) in-country personnel headed by an Additional Secretary to the Ministry of Agricultural Development and Research; and (2) two expatriate consultants who critiqued the in-country team's report and provided recommendations for the development of post-harvest activities in the grain sector. The methodology included a review of all major project documents and reports, interviews and site visits.

FINDINGS:

1. About 1,000 moisture meters have been sold; 2,000 remain in the godowns. With the emergence of the participation of the private sector in paddy procurement, the demand for moisture meters has declined. The private sector does not use moisture meters in procurement.

2. Construction work in six (of seven planned) complexes has been completed. Two complexes have been commissioned and two others are to be commissioned in late 1984.

3. Of the ten one-ton-per-hour rice mills provided, seven have been sold to the private sector. This translates to an increase in private sector milling capacity of 33,600 tons per year. Three others were reallocated for use by the PMB, two of which have been commissioned.

4. PMB storage capacity has been increased by 30,000 metric tons against a target of 35,000; milling capacity by 72,000 tons per year against a target of 67,200; and parboiling capacity by 57,600 tons per year against a target of 67,200.

5. Technical assistance, provided through a contract with Louisiana State University, was completed in December, 1981. Subsequently, the services of an Indian consultant were procured for training operators of the new PMB milling complexes.

6. The training plan was completed with 57 participants receiving short-term training and two receiving long-term training.

7. As of April, 1984, $4.7 million had been expended under the project. All project inputs were not achieved as scheduled due to changing economic conditions within the country which have stimulated the establishment of private mills and private trade. This trend has resulted in inadequate budget support from the GSL and slow turnover of moisture meters.

PROJECT DESIGN AND POLICY IMPLICATIONS: Two major policy actions by the incoming administration in 1977 have affected this project. The first was the liberalization of the economy by reducing the restriction on internal and external trade. This encouraged the private sector to increase its participation in the purchasing and processing of paddy as well as the marketing of rice. The second factor was the replacement of the subsidized rice ration system by a food stamp system in 1979. Due to this action, consumers began purchasing rice on the open market and deliveries by the Food Commission to cooperative societies declined substantially, drastically reducing the Food Commission requirements from the Paddy Marketing Board. This increased demand forced up the price of rice which resulted in an increase of the open market farmgate price of paddy. The impact of these conditions has been to cause the PMB to react slowly to marketing trends (support/purchase prices) and delay construction of the facilities required for the seven two-ton mills. Since 1980, the open market farmgate price of paddy has remained above the government purchase price, although the latter has been increased from Rs. 40 per bushel in 1980 to the current level of Rs. 62.50 per bushel. Whereas the PMB had purchased about 30% of paddy production in the past, the percentage has declined to 9.9, 5.7, 2.9, and 12.3 percent respectively from 1980, 1981, 1982 and 1983.

RECOMMENDATIONS:

1. A report will be prepared identifying PMB requirements of moisture meters and the number available for disposal.

2. A plan is to be developed which identifies and transfers equipment of the seventh rice milling complex to the Mahaweli Authority.

3. A report is to be made containing detailed recommendations to rectify the operational defects in the project-funded rice milling complexes.

4. A report is to be prepared containing detailed technical assistance and training requirements for PMB.

5. A report is to be prepared on the performance of the Rice Processing Research & Development Board concerning its institutional alignment.

6. A report is to be prepared which assesses the technical assistance needed to set up a Food Technology Research Unit.

7. A set of concept papers for production, price stabilization and buffer stock management is to be prepared and submitted to the National Planning Division of the Ministry of Finance and Planning for inclusion in the National Agricultural Strategy exercise.

This Summary is based on the PES signed by Frank D. Correl dated Aug. 30, 1984. The Evaluation Report was written by two expatriates, Dr. Roe Borsdorf and Donald Anderson, was not available at the time of this exercise. Members of the in-country team were Mr. N.V.K.K. Weragoda, Secretary, Ministry of Agricultural Development and Research; Mr. Dixon Nilaweera, Addl. Secretary, Ministry of Agricultural Development and Research; Mr. D.M.B. Marapone, Chairman, Paddy Marketing Board; Mr. Mike Korin, Chief, ARD/USAID; and Mr. Tissa de Soysa, Project Officer, USAID.

SCHOOL FEEDING: EFFECTS ON ENROLLMENT, ATTENDANCE, AND DROP-OUT IN SRI LANKA

PROBLEM & OVERVIEW: In Sri Lanka there is a large school-aged population suffering from various degrees of undernutrition. In 1973, a survey of school aged-children, undertaken by CARE and the Ministry of Education (MOE), found 40% of the children surveyed to be malnourished. In 1979, another similar survey by the same agencies found 50% of the children suffering from chronic undernutrition. The Government of Sri Lanka (GSL) has been involved in some form of school feeding since 1931.

U.S. ASSISTANCE: The largest donor nutrition program is that supported by the U.S., the P.L. 480 Title II Program. This effort began in 1956 with the School Feeding Program administered by CARE. It then evolved into the School Biscuit Program. In 1973, CARE expanded its involvement under P.L. 480 Title II to include the distribution of a weaning food. The cost of U.S. commodity contributions in 1981 was $1,684,254 for the School Feeding Program alone.

PURPOSE OF EVALUATION: This evaluation attempts to test the proposition that school feeding is a positive incentive for school attendance. Regarding the relationship between school feeding, attendance and enrollment, the primary hypothesis is that the provision of a snack or a meal during the school day contributes to both enrollment and attendance. However, it is widely recognized that many other factors influence enrollment and attendance including historical, cultural and familial incentives to enroll and stay in school unique to Sri Lanka among South Asian nations. The evaluation team designed a special survey in which 112 schools' records were sampled throughout 1980. Fifty-nine of these had participated in feeding programs. The schools were drawn from twenty-one regions in 19 of the 24 administrative districts of Sri Lanka. Simultaneously, the evaluation team worked with CARE/Sri Lanka staff to design a second, independent survey covering 25 schools in two districts of Sri Lanka over a three-year period. Twenty-one of these had participated in the school feeding program.

FINDINGS:

1. Overall, the data suggest that enrollment and attendance in the lower grades is enhanced by school feeding but that the shortrun decision to attend school on a particular day or in a given month is not related to school feeding.

2. Attendance in non-feeding schools was higher than in feeding schools for every month in 1980. Moreover, in the data collected by CARE, there is no relationship between attendance and the presence or absence of feeding in the schools.

3. Drop-out rates throughout the elementary school grades in feeding schools are somewhat lower than the rates in non-feeding schools. Using the CARE data, a positive relationship between school feeding and enrollment in the elementary grades is also indicated.

4. In both the sixth and seventh grades, the drop-out rates are higher in the feeding schools than in the non-feeding schools. In the CARE data, losses in enrollment between the fifth and sixth grades are lower in the feeding schools than in the non-feeding schools.

PROJECT DESIGN & POLICY IMPLICATIONS: School feeding, while important, should be viewed as a relatively minor determinant of school attendance and/or enrollment. This study was quantitative by design but in many cases there is plausible evidence of the existence of alternative explanations for the results other than the central one. Certainly, the cultural emphasis on education in Sri Lanka mitigates against school feeding being a large determinant of attendance and enrollment. Seasonal variation within a year, climatic variation between years, and variation among geographic region are especially important factors for inclusion in any research design. Migration patterns which vary by region and by age of child present yet another set of factors. Fluctuations in attendance may be another useful measure of the effects of feeding which should be calibrated in future studies.

RECOMMENDATIONS:

The evaluation team recommends that a series of small-scale, narrowly defined studies be undertaken with the objective of detecting any possibility that school feeding contributes to the nutrition and/or education of school children.

This evaluation was conducted by Roy I. Miller, Ph.D. and William D. Drake, Ph.D. of Community Systems Foundation. A preliminary draft was prepared in September, 1982. This report was submitted on October 31, 1983.

MID-PROJECT EVALUATION OF THE NATIONAL INSTITUTE FOR HEALTH SCIENCES PROJECT - SRI LANKA

PROBLEM & OVERVIEW: The Government of Sri Lanka (GSL) is attempting to improve the health status of its largely rural population through the implementation of a Primary Health Care (PHC) plan. Execution of the plan requires the development and application of a national health manpower utilization plan and the training of a sufficient number of qualified personnel. The National Institute of Health Sciences (NIHS) at Kalutara is charged with training personnel to implement the plan, coordinating all PHC training, performing relevant health services research, and advising the Ministry of Health (MOH) on health manpower policy issues.

U.S. ASSISTANCE: USAID is participating with three other donors and the GSL in a four-year program whose purpose is to increase the capacity of the NIHS to train health care workers who are needed to improve health delivery services and environmental sanitation efforts according to the GSL's health manpower development scheme. The program goal is to combine preventive public health staff with the curative staff on three levels to achieve a national public (community) health service that is preventive-oriented. The USAID Grant agreement, #382-0062, signed on August 29, 1980, provided $2.2 million over four years. This money was to used for the preparation of a master plan for the NIHS expansion, for architectural and engineering designs for the buildings to be constructed ($173,000), for construction of several buildings including an auditorium, a library, lecture and seminar halls, an audio-visual laboratory, demonstration and lab rooms and a cafeteria ($630,000), and for paying the cost of utilities and related equipment ($405,000). Other donor funding consists of $770,000 from UNICEF, $500,000 from UNDP, $310,000 from WHO and the equivalent of $1,220,000 from the GSL. The Project Activity Completion Date (PACD) is August 31, 1984.

PURPOSE OF EVALUATION: The Project Agreement between the GSL and USAID stipulates that a mid-term evaluation take place to provide A.I.D. with an assessment of the progress of the construction program conducted at the NIHS. USAID/Colombo also requested an assessment of the administration and program of NIHS in order to ascertain both the advisability of a project extension and the possibilities for other assistance. The evaluation team consisted of one A.I.D./W staff person, MOH officials, NIHS staff and students, and health workers in the field.

FINDINGS:

1. Construction of A.I.D.-financed facilities has not yet started although the master plan, architectural and engineering designs have been completed and approved. The tender for construction has been advertised (as of January 31, 1984). Overall, only four residences have been constructed with UNICEF funds and hostels are still under construction.

2. Although NIHS has provided a considerable amount of training during the period under review, the administration of training programs at NIHS is adversely affected by a number of constraints. These include an overburdened and poorly regulated training calendar; irregular faculty communication; the absence of clear direction or support for coordinating mechanisms, training priorities, and research from the MOH; and lack of space.

3. Curriculum revisions have been completed for each of four basic training courses; teaching and learning materials have been collected in the library. However, implementation of curriculum changes has been impeded by problems of recruitment, confusion about job descriptions, and lack of educational technology. Library materials are largely in English. There are no course specific teaching and learning packages, and no texts or references for students personal libraries.

4. Faculty development has progressed well with 90% or more of the faculty receiving some training specifically in academic preparation. However, staff need further training in teaching techniques and research methods.

5. All donors feel the GSL contribution seems to be shrinking as MOH funding, in real terms, has been doing since 1977. The team was unable to clarify the status of the GSL contribution although MOH officials noted that there have been budgetary cutbacks. The major donors have noted that some of their funds, earmarked for

other purposes, had been diverted to support the short-term training activities which the GSL had originally agreed to fund.

PROJECT DESIGN & POLICY IMPLICATIONS: Although NIHS provides probably the best training in public health, largely because of the well developed practice zone, the role of NIHS in shaping health manpower policy and in coordinating training programs for PHC in other institutions is minimal at best. The major way open to NIHS to influence the MOH's efforts to shift policy emphasis from curative to preventive is through training Medical Officers of Health, Public Health Nurses and Public Health Inspectors, since there are severe shortages of these personnel. NIHS is the primary supplier of three categories of workers (Medical Officers of Health, Public Health Nurses and Public Health Inspectors) in the MOH primary health care system and is one of several suppliers of two other categories (Family Health Workers, Assistant Medical Practitioners). While the MOH/GSL seems to be committed to continuing both Family Health Worker and Auxiliary Medical Practitioner training, a practice which effectively uses NIHS's orientation to public health, NIHS is at a disadvantage because of shortages of qualified faculty, books and other materials, laboratory facilities, clinical facilities and living quarters--all inputs which this project, in its larger concept, is scheduled to provide. The MOH should further clarify the PHC delivery, reporting, referral, team member roles and supervisory duties of all classes of personnel, but particularly the Family Health Workers. In a programmatic context, a better sense of priority among the objectives of the PHC program is needed in order to further attainment of the overall goal. In this regard, it may draw from the lessons learned in other countries where efforts are underway to introduce a preventive concept into a traditionally curative health care system, for example India. In a more critical context, a reassessment of funding capabilities and commitments, particularly of the GSL, should be a common priority among the donors. The lesson to be learned here may be that it is better to act quickly to deal with the symptoms of what may become a major problem before the problem develops to a critical state.

RECOMMENDATIONS:

1. The implementation of revised curricula for all categories of PHC personnel should be emphasized. Teacher and student manuals based on career and course objectives should be developed for each course.

2. A practical and feasible annual training calendar should be established with the MOH and other health training institutions. Refresher courses for all categories of personnel should be offered regularly. Few deviations from this approved calendar should be permitted without additional allocation of resources.

3. Promotional prospects and opportunities for personnel from within ranks should be emphasized rather than recruiting new personnel as supervisors.

4. The field practice area should be developed as a teaching and research laboratory and should be expanded to include other districts as well.

5. Donors should foster policy discussions designed to assist the GSL develop an effective health manpower policy since there is a national need for such a policy that goes beyond the MOH. Reactivating the National Committee on Health Manpower is an appropriate suggestion to put to the GSL in this regard.

This evaluation was conducted between October 24 and November 19, 1983 by Dr. Raymond B. Isely, Team Leader and Associate Director, Water & Sanitation for Health Project; Dr. Zebulon C. Taintor, Research Professor of Psychiatry, New York University; and Ms. Sharon Pines, Program Analyst, ASIA/DP - Evaluation Division, A.I.D./W. The final report is dated May, 1984.

EVALUATION OF DEVELOPMENT SERVICES AND TRAINING PROJECT - SRI LANKA

PROBLEM & OVERVIEW: The Development Services and Training Project (DST) had its origins in 1976 discussions about an Agricultural Development Services and Training project. The justification for the project was the need to improve the number, quality and diversity of degree-holding agricultural specialists in Sri Lanka in order that agricultural development could be accelerated. The focus of this original project concept was participant training and a few consultancies. As the conversations with the Government of Sri Lanka (GSL) continued, the scope of the project was broadened first to extend beyond agriculture and then to include other activities.

U.S. ASSISTANCE: The Development Services and Training Project (#383-0044) is a seven-year project with a current Project Assistance Completion Date (PACD) of August 31, 1985. Originally authorized at $2.6 million, it has been amended twice to expand coverage, increase its size, and extend its life. Its total estimated cost is now $6.5 million. As of June 30, 1984 commitments had reached $5.4 million. Its purposes are: (1) to provide a sound basis for long-term rural development; and (2) to strengthen GSL institutional capabilities to carry out a development program.

PURPOSE OF EVALUATION: The DST is six years old and this is the first structured evaluation of the project. The statement of work and the approach of the evaluation team recognize that the project has two disparate elements: participant training and a group of 32 "sub-project" activities. The objective of this evaluation is to provide an analysis of the current project's strengths and weaknesses to assist the Mission in designing and managing a follow-on project. The evaluation methodology included a review of the files, interviews with officials and representatives in the USAID Mission, the GSL and the private sector, and site visits.

FINDINGS:

1. Participant training programs have substantially exceeded programmed levels in terms of numbers and cost. This has been completely unplanned. For the period 1979-1981, commitments exceeded planned targets by 306% in terms of the number of participants (101 vs. 36) and 335% in terms of funding ($784,000 vs. $234,000). For the period 1982-1985, commitments again exceeded planned targets by 147% (as of June 1, 1984) in terms of the number of participants (146 vs. 99) and 135% in terms of funding ($1,053,000 vs. $780,000).

2. In terms of benefits to the persons trained, the results are very positive. For example, three of the returnees have been promoted as a direct result of the training. Thirteen others who have been promoted stated that their training was a factor in their promotions. However, no follow up of returnees has taken place. Only five percent of the 49 returned participants interviewed had had any type of contact with USAID since their return.

3. The 32 separate activities which constitute the non-participant component of the project are extremely heterogeneous. They include intermediate technology projects, large and small special studies, a wide range of consultancies, three institution building sub-projects, workshops, conferences, and in-country training. The only commonality is that they were supported with DST funds.

4. Of the sample of 14 sub-projects examined by the evaluation team, all but one was in keeping with one or both of the overall purposes of the project. Only five were directly related to the current A.I.D. program in Sri Lanka. Five were not well planned. Two were failures. Three were partial successes. Eight were successful.

5. There were identifiable factors common among those four sub-projects found most successful. These included a direct relationship to the current A.I.D. program, host government involvement and interest, good advance planning, defined outputs and a schedule of implementation, and follow-up by the Mission.

6. The sub-projects have created a definite workload problem for the Mission despite the fact that in 50 percent of the cases, follow-up has been absent or inadequate.

PROJECT DESIGN & POLICY IMPLEMENTATION: Overall, the project has been successful although the original project purposes are too broad to be useful for management evaluation, or overall project planning. Planning of the subordinate elements has been inadequate although this has improved recently. There are no activity criteria that can be used to decide whether a proposed activity should be approved. Similarly, there are only a few outputs identified in the original Project Paper and, except for participant training, they were not achieved. With no clear criteria, and no projected outputs, there was obviously no implementation plan. Even the participant training program lacked an overall plan or deliberate focus. However, the participant training has certainly produced results that exceed its costs. Similarly, a majority of the sub-projects have achieved their objectives and seem worth the financial cost. Obviously, a major project managed under these criteria and conditions demands a great deal of attention to detail, more so than staff resources at the Mission are designed to handle. Any successor project should be planned taking into account the major lessons concerning project purpose and goal setting, planning, expected outputs, implementation schedules, monitoring requirements, and evaluation criteria. Still, the major lesson here may be that even poorly planned projects can be generally successful although the impact of this success cannot be necessarily assigned to any one sector of the overall A.I.D. program.

RECOMMENDATIONS:

1. The Mission should consider a much more carefully planned successor project that would include both participant training and sub-project activities.

2. Such a follow-on project should concentrate almost all of its sub-project activities on areas directly related to the existing A.I.D. program and its objectives. Specific criteria for sub-projects should be established.

3. The Mission should institute a careful program of follow-up for returned participants and consider increasing the training office staff to accomplish this.

This evaluation was conducted by a three-person team which included two representatives of the International Science and Technology Institute, Inc. The personnel were William R. Thomas, 3rd, Team Leader, Richard J. Stanley, Energy and Environment Specialist, and M. Aloyse Doyle, a participant training specialist. It was carried out under the general supervision of Christina H. Schoux, USAID Project Officer. It took place between June 2 and July 3, 1984 in Sri Lanka.

PROJECT COMPLETION REPORT OF THE SEED DEVELOPMENT I PROJECT - THAILAND

PROBLEM & OVERVIEW: The development of a national, public sector seed program represents an essential long-term investment in agriculture, particularly in a developing country such as Thailand. Prior to 1976, Thailand had no formally coordinated program to research, produce, market and provide a sustained, high quality source of seed to the nation's farming population. At the time the Project Proposal for Seed Development I was prepared, there was no interest in the private sector in investing in seed production and processing.

U.S. ASSISTANCE: The Thailand Seed Development Project (#493-0270) was a jointly financed project between the Royal Thai Government (RTG), represented by the Ministry of Agriculture and Cooperatives (MOAC), and USAID. The project had a six and one-half year lifespan, from January 1976 to September 1982. Total USAID financial commitment consisted of a Loan (#493-T-017) of $3,683,691 and a Grant (#493-106-T) of $3,898,781. RTG-provided resources include an "in-kind" cost estimate of $3,981,300. Three implementing agencies of the MOAC were assigned to carry out project activities: the Department of Agricultural Extension (DOAE); the Department of Agriculture (DA); and the Marketing Organization for Farmers (MOF). Project operations involved five major activities: (1) foundation seed production; (2) seed multiplication; (3) seed processing; (4) seed distribution; and (5) inoculum production. Under the project, foundation seed developed by the DA was sold on credit to the DOAE for multiplication purposes. Multiplication activities were conducted by contract growers under DOAE supervision. Multiplied seed meeting established standards was purchased from the grower at a guaranteed price and processed at project financed centers by the DOAE. The MOF was to have the responsibility for distribution and sales of the processed seed. Inoculant was produced by the DA. Sales of inoculant and seed were on either a credit or a cash basis.

PURPOSE OF EVALUATION: This is a Project Completion Report. The project was evaluated on several occasions during its duration. A 1978 Evaluation Team noted a lack of adequate management on the part of USAID and RTG as one of the key factors which resulted in the delay in project implementation. In 1980, a Redesign Team was employed to cope with the more difficult design flaws. A final evaluation was performed in 1983. This report noted the following major problems: (1) the lack of a disposal program to handle waste materials and cull seeds; (2) ineffective marketing and distribution of processed seed; (3) underpricing of seed; and (4) rapid expansion of the seed program.

FINDINGS:

1. In the DOAE program, 5,896 metric tons of seed of six crops were produced in FY 1982 as compared to 173 metric tons produced at the start in FY 1976. Seed production targets were revised downward during the life of the project from 8,650 to 4,550 metric tons.

2. Farmer demand for most varieties of improved seed has improved. For example, in FY 1980, all 1300 metric tons of the Seed Division's corn seed were distributed two months before planting. The fact that direct counter sales at the Seed Centers are increasing indicates growing farmer confidence in project produced seed.

3. About 3,600 contract farm families, organized in seed producing groups, are receiving technical supervision, advice, and guaranteed market prices/improved income as compared to only 200 at the start of the project.

4. A Seed Division with a competent technical staff of 250 has been created within the DOAE; four modern Seed Processing Centers were established at Chainat, Korat, Phitsanulok, and Lampang.

5. The project trained six persons at the Master's degree level in Seed Technology. Eight other persons attended a three-month intensive seed technology short course in the U.S. (MSU).

6. About sixty percent of project produced seed is used as intended for designated special RTG projects in emergency situations; about 40% is sold outright to small farmers.

7. Rhizobium inoculant production has exceeded 20 tons per year (1982 figure) as compared to 3 tons per year at project initiation. With a major educational effort, demand could exceed the estimated 200-ton capacity of the plant.

8. Interest among other donors to support the Thai seed industry has been generated to the extent that when all current projects are completed, the Seed Division will have 22 centers throughout the country. The Japanese International Cooperation Agency (JICA) has financed the establishment of a fifth seed center. The EEC and the Organization for Economic Cooperation Fund have agreed to establish 15 new processing facilities.

9. As a result of this project, two private seed companies have been established, i.e., investments in seed facilities have been made and contract production with farmers established. Two other companies are constructing seed facilities.

PROJECT DESIGN & POLICY IMPLICATIONS: The Seed Development Project is considered to have achieved its purpose which is "to cause the use of improved seed by Thai farmers with the expected result being an increase in the productivity and income of Thai farmers." Its accomplishments have been noticed by other international organizations and experts, notably FAO which is looking at Thailand as a base for regional training and workshops. The establishment of the Seed Division and Seed Centers has greatly improved the capability of the Ministry of Agriculture and Cooperatives to recommend crop production shifts resulting from changes in climatic and economic conditions. However, some design flaws were detected and some changes were made throughout the course of the project. Most significant among the flaws was the lack of a realistic planning horizon given that at the time the Loan Agreement was signed, there was not even officially a Seed Division. Most significant among the changes was the actual role played by the MOF versus what the original project design envisioned for it. The major role anticipated for the MOF did not occur. Instead, the MOF participated as one of the primary agencies involved in the seed production system while the DOAE retained responsibility for major components such as multiplication of foundation seed, management of the Working Capital Account, processing, marketing, and distribution of multiplied seed. In addition, there is a potential problem with effective distribution of seed currently being produced at Seed Centers. This is to be addressed in the follow on "Seed Development II Project."

RECOMMENDATIONS: Most specific recommendations are mentioned as concrete applications in the follow-on project. For example:

1. A Seed Promotion/Marketing Section is to be created for each Seed Center. Each Section is to work with field extension staff to plan seed needs one year in advance.

2. The DOAE Seed Division headquarters is to implement a similar section to deal continuously with other agencies such as MOF, Office of Accelerated Rural Development, Social Welfare Department, Crop Promotion Division, and the Cooperative Federation to establish and project their seed requirements in coordination with the Seed Division's production.

This report was prepared by staff of the USAID/Thailand Mission.

MID-TERM EVALUATION OF THE POPULATION PLANNING PROJECT II - THAILAND

PROBLEM & OVERVIEW: The Royal Thai Government's (RTG) National Family Planning Program (NFPP) was established 14 years ago in recognition of the adverse effect of rapid population growth on social and economic development objectives. The NFPP is under the direction of the Permanent Secretary for Health and the members of the NFPP Committee are appointed by the Minister of Health. The Ministry of Public Health (MOPH) plays the most central role in the NFPP by providing family planning services through its nationwide delivery system of hospitals and health centers. The family planning activities within the MOPH are under the direction of the Family Health Division (FHD) of the Department of Health. In 1984, the network of MOPH-operated rural health facilities included 73 Provincial Health Offices, 89 Provincial Hospitals and 8 MCH sub-centers; 470 District Community Hospitals, 611 District Health Offices; and 7,169 Tambol Health Centers. A number of private organizations are also involved in the national program. These include Planned Parenthood of Thailand (PPAT), Population and Community Development Association, (PDA), Thai Association for Voluntary Sterilization (TAVS), and the Association for Strengthening Information in Support of the NFPP (ASIN).

U.S. ASSISTANCE: The Population Planning Project (PPP) II (#493-0325) represents USAID's bilateral support for the fifth Economic and Social Development Plan (1982-86) PPP II and has both grant and loan components. The grant component is $8.7 million with $5.4 earmarked through FY 1984. The loan component is $18.2 million with $13.5 earmarked through FY 1984. The RTG contribution is equivalent to $46 million. Other donors include Japan, Canada, Germany, and the UNFPA as well as eight A.I.D.-funded population intermediaries. During PPP I (1979-81), USAID's bilateral contributions included approximately $7 million which financed parts of five NFPP components: (1) the expanded sterilization program; (2) contraceptive services; (3) training and supervision; (4) information, education and communication; and (5) research and evaluation. PPP II support essentially continues financing of these components for another five years. It should be noted that due to some delay in initiating PPP II and in expending funds in 1982, FY 1983 is considered to be the first project year, thereby extending the five-year project through FY 1987.

PURPOSE OF EVALUATION: The scope of work calls for the the review and assessment of performance to date of all PPP II financed activities including: (1) manpower development and training; (2) information, education and communication (IEC); (3) Voluntary Surgical Contraception (VSC) and IUD services; (4) contraceptive and related medical supplies; and (5) program operations and biomedical research. The Evaluation Team was specifically directed to assess the demographic impact of the NFPP, to ascertain reasons for low contraceptive continuation rate, and to assess the current and potential future contribution of other external donors to the NFPP including A.I.D. intermediary organizations. The project was last evaluated by an outside team in 1981.

FINDINGS:

1. Manpower development and supervision:

(a) The planning and evaluation sections of provincial health offices are understaffed and often filled with underqualified staff. Current staffing patterns are inadequate to perform and/or coordinate and supervise program planning, including the planning of training activities that could improve the rationalization and development of resources and services throughout a province. There is a concomitant need, at both district and tambol levels, to upgrade and standardize procedures for planning resource use and service delivery.

(b) Auxiliary midwives (AM) need training in the delivery of injectable contraceptives. Follow-up training to AMs in IUD insertion needs strengthening. Training AMs, who are mostly youthful women, to perform vasectomies appears to be inappropriate.

2. Information, Education and Communication.

(a) Comprehensive analysis of the motivational strategies and IEC materials used in USAID-supported activities was not possible during this evaluation. Many IEC mass media materials that promote various campaigns for different service delivery, e.g., vasectomy, are still in prototype form.

(b) Vasectomy mass media materials appear to be effective. Two radio spots, developed under this project, were in the top ten radio commercials of 1983 according to an advertising industry contest.

(c) The demand for services has been accelerated by the multisectoral IEC campaign mounted in response to the Ministry of Interior's commitment of support to family planning through the cooperation of the governors and district officers. A mobile van which offers vasectomy and laparocator sterilization services at the village level (featuring satisfied clients) while providing IEC about all family planning methods has proven very effective in Pattalung Province.

3. VSC and IUD Services:

(a) Female sterilization represents the highest percentage of users (age 15-49) in every region. Vasectomy acceptors in the first four months of 1984 are nearly double the level for the same period of 1983. VSC is being accepted at a younger age than in previous surveys.

(b) IUD performance is hampered by the uneven implementation of MOPH policy permitting trained AMs and Nurse Midwives (NM) to insert devices and by the scarcity of IUD insertion kits.

4. Contraceptives and related supplies:

(a) A one and one-half year supply of contraceptives is being maintained in the system. When the new system is fully operational, stock-on-hand at all levels may be reducible to one year or less.

(b) A new commodity management system is being installed with the assistance of CDC. It is first being implemented, on a pilot basis, in four districts and appears to be well designed. It is scheduled to be implemented throughout the country by the end of 1984. A micro-computer and related equipment and software were acquired as part of the new commodity management system.

5. Low contraceptive continuation rates.

(a) Firm conclusions on reasons affecting low continuation rates cannot be made because of insufficient current data.

(b) Pill continuation rates seem to be lower than those of the previous NFPP surveys (1977 and 1981).

(c) The 12-month 75% continuation rate for IUDs is identical to the 1971 NFPP survey.

(d) There is much diversity in the continuation rates for injectables. Lack of supply, mode of service delivery and client education are factors which were observed in the 1981 survey and are still evident. The Research and Evaluation unit is studying factors affecting injectable continuation use.

6. Program, operations and biomedical research:

(a) There is a high priority need for information to improve the planning, coordination, management and evaluation of FHD activities. It is unclear whether a training management focal point that guides and plans the overall FHD manpower development and supervision components exists. A review of the existing training and supervision system is needed as is a systematic, comprehensive evaluation system.

(b) There is a broad and significant need for MIS to support FP program planning, management and evaluation at all levels of the service delivery system.

(c) The evaluation team did not examine the biomedical research projects being undertaken on behalf of the NFPP. USAID does not directly support biomedical research in family planning.

(d) The study of the Norplant subdermal contraceptive, being conducted in four locations, is not yet completed. Very preliminary results indicate promising results with a high (79% at one year) continuation rate.

7. Review mix of contraceptives offered and identify weaknesses in current delivery practices:

(a) Target setting: actual performance compared to targets varies widely. Further rationalization and use of performance targets is needed.

(b) Prevalence rates: prevalence rates appear to be much higher in areas served by health centers having more than one female health worker.

(c) IUD insertion: permitting AMs and NMs to insert IUDs and extending IUD services to rural and remote areas increases the numbers of IUD acceptors. However, extending such services to the sub-district level has not yet been achieved to the extent expected due to current MOPH reluctance to implement approved policy.

(d) Expanded media coverage: district hospital mobile education/motivation campaigns and the support provided by the MOI through the Provincial Governors have contributed to increased demand as has the involvement of private sector NGOs.

8. Determine if the NFPP is meeting its targets as proposed in the 5th Plan (1982-86) and in the Project Log Frame:

(a) Sector Goal: the current estimated growth rate is 1.6% which is down by .2% from the estimated 1981 level. If present momentum is sustained, it will be reduced to at least 1.5% by 1986.

(b) Objectively verifiable indicators: from 1982 to April 1984, the number of new acceptors of all methods was 2,594,898 against a target for this period of 2,320,000. The total number of reported active users is estimated as 7.4 million against a target of 4.2 million. Revised estimates for 1984-86 are 12.3 million. The CBR has declined from approximately 27/1,000 in 1981 to 21/1,000. Prevalence now exceeds 60% of married women of reproductive ages (MWRA) compared with an estimated 59.2% in 1981.

(c) Project Purpose (analyzed in the content of End-of-Project conditions): all indicator levels, e.g., service delivery outlets for all methods, couples of reproductive age practicing contraception, voluntary sterilization acceptors, training/use of non-physicians, are on target or have already been achieved. There are problems in the areas of management information, program research and evaluation.

9. Identify the needs and nature of any special emphasis programs required to reach potential acceptors in different geographic regions, of different age groups or among different ethnic groups:

(a) Family health care for the Hill Tribes;

(b) A special set of initiatives for the Northeast.

10. Assess the current and potential future contribution of other external donors to the NFPP in terms of resources needed to meet demographic targets proposed for the 6th Five Year Plan:

(a) A target growth rate of 1.2% will require a prevalence rate exceeding 70% at a time when the MWRA will increase by 30%. This will require major resource increases, beyond the capability of the RTG if past performance is an accurate indicator.

(b) USAID bilateral, A.I.D. intermediary and other donor support will be required during the 6th Plan period.

PROJECT DESIGN & POLICY IMPLICATIONS: Overall, the NFPP is a mature, innovative, and successful program which, assuming its present momentum is maintained, is certain to exceed its Fifth Development Plan target of a 1.5% population growth rate. As the scope and extent of the NFPP continues to expand and decentralization progresses, there will be a need for increasing clarity in policy guidelines, more timely and accurate feedback from the field on the impact of implementation, and increased attention to policy adjustment and refinement. The evaluation team noted certain weaknesses in policy linkage between the central level and provincial levels, and wide variations among provinces in both the interpretation and application of Family Planning policy guidelines issued by both MOPH and MOI. Rejection of central policy by some administrators, (e.g., failure to use trained AMs to provide IUD services) suggests a need for more rigorous monitoring, education and enforcement of policy guidelines. This may require shifting emphasis to the concept of "standards setting" for certain areas lagging in implementation. While some officials expressed satisfaction with the amount of time and attention devoted to policy formulation, others felt that it was too ad hoc and/or infrequent, that too little initiative and time were being devoted to it; that the service delivery system was too often running ahead of policy formulation; that there was some "catching up" to do; and that policy guidelines needed to be more complete and supported by improved dissemination and education.

RECOMMENDATIONS:

1. MOPH policy permitting trained AMs and NMs to insert IUDs and administer DMPA injections should be implemented. Formal machinery should be established to insure appropriate inputs and substantive dialogue from technical staffs of both the MOPH and MOI and coordination of policy implementation at technical levels both centrally and provincially.

2. Additional resources and technical support should be directed towards expanding the availability and access to IUD, DMPA, and VSC services particularly in the Northeastern Provinces and among the Hilltribes, slum dwellers and factory workers' populations.

3. Consideration should be given to providing family planning training to Nurse Aides assigned to Health Centers in provinces that have demonstrated capability for IUD training.

4. The development of a comprehensive and systematic training, evaluation and monitoring system keyed to provincial-level manpower needs assessments and training plans should be undertaken.

5. Consideration should be given to the addition of a Sub-Committee on Population Policy to assist the National Family Planning Committee in review, analysis and updating of Ministries' policies and strategies in support of the achievement of the target growth rate.

6. Continued USAID participation in a follow-on PP III should be weighed against provision of population assistance through EPD II supplemented by centrally-funded projects. If it appears that the EPD II priorities of the RTG will not permit a sufficient level of bilateral support for population/family planning, a new project should be considered.

This evaluation was conducted during the period of July 18 to July 20, 1984 by a joint Thai/U.S. Team consisting of: Dr. D. Muangman, Department of Public Health and Family Planning of Mahidol University who acted as Team Leader; Mr. K. Chobchuenchom, Health Planner, NESDB; Mr. R. Griffin, MBA, a private consultant; Mr. V. Kanchanasuk, Health Planner, NESDB; Ms. L. Knauff, a private consultant nominated by A.I.D.; Dr. D. Minkler who acted as Co-Team Leader; Mr. E. Petrich, affiliation and credentials not stated; Dr. Y. Porapakkham, Department of Biostatistics and Family Planning at Mahidol University; Dr. P. Prasartkul, Demographer, IPSR, Mahidol University; Mr. P. Soontornpipit DTEC; and Mrs. S. Thanyaphon, also associated with DTEC.

MID-TERM EVALUATION OF THE DECENTRALIZED DEVELOPMENT MANAGEMENT PROJECT - THAILAND

PROBLEM & OVERVIEW: The Royal Thai Government (RTG) has made a number of development grants available to local government units (tambols) under its rural development programs. The administration and use of these funds has been characterized by inefficiency and under utilization.

U.S. ASSISTANCE: The Decentralized Development Management Project (DDMP) (#493-0315) is designed to test new approaches to identifying and funding rural development projects. It is a five-year project which began in August 31, 1981. Its cost is estimated at $24.6 million, $10.6 million of which is provided by USAID in the form of loan ($7.5 million) and grant ($3.1 million) funds. The implementing agency is the Rural Employment Generation Project (REGP). The specific project objective is to strengthen and accelerate the RTG system of decentralized development by (1) strengthening local capacities to identify, design, implement, and manage development activities; and (2) providing capital to expand local development grants to the Tambon (village) Councils in the project area. The project sites include 97 tambols located in ten amphoes (districts) in five Northeastern changwats (provinces). The project is assisted by a 17-person, joint Thai-American contract technical assistance team (TAT) that works at all levels of the project.

PURPOSE OF EVALUATION: The purpose of this evaluation is to provide an independent assessment of the project's learning system methodology and the extent to which it is functioning to strengthen the role of the tambon in local development. It is also to assess the status of long-term decentralization and institution-building objectives, recommend future actions to fulfill these objectives, and document important lessons learned. The evaluation team reviewed contracts and agreements relevant to the project, as well as documentation, field reports and Working Group minutes. The team also interviewed officials of the RTG and USAID, contract personnel, and tambon council members. Two previous in-house evaluations were conducted in November, 1982 and October, 1983.

FINDINGS:

1. The contract technical assistance team (TAT) effectiveness was impaired resulting in its attaining the expected level of efficiency only in the months just preceeding this evaluation. Early in the life of the contract, there were serious problems in orienting key members. These problems led to the early departure of the Thai team leader, in April 1983, and the organizational advisor in September 1983. Contracts were written at a level of generality which left individual obligations unclear. There appears to be a lack of contract supervision.

2. Although the program is innovative in its structuring of a feedback system, basic problems which plague it are linked to differences in perceptions of project intent. These differences are symbolized by inconsistency between Thai and English versions of the project's name.

3. Flow measures designed to reflect degrees of goal and objective attainment are deficient. Agreement on goals is lacking. Indicators of project performance are at a global, non-measurable level, not at the operationally concrete, verifiable level.

4. A system of greater interdependency between tambols and central government seems to be developing. There is evidence that tambols are increasing their capacity to plan and implement more projects. This is offset by increased demands upon the central government for technical and financial support. A major local level constraint on undertaking relatively large construction projects has been removed by the placement of ARD technicians at the district level.

5. The effectiveness of the National Working Group (NWG) has been limited because of misunderstanding regarding its functions and overall purpose. Time constraints and bureaucratic focus are compounding factors. Paperwork is bottlenecked as communications flow from the TAT to the NWG through the inadequately staffed REGP.

6. The desired commingling of USAID and Rural Employment Generation Program (REGP) funds is not occurring. Because of inherent A.I.D. and RTG disbursement practices, funds are mostly distinguishable at the tambon level.

7. Plans to institutionalize the "learning laboratory" approach through the use of local resource institutions have not materialized. The system has begun to function according to the learning laboratory approach only since the first quarter of 1984. Chief among the obstacles to making the concept operational is the considerable difference of interpretation as to the project's purpose and the role of the TAT.

8. Despite policy initiatives to merge the REGP and Rural Poverty Program in two years, little substantive progress has been made in terms of specifying how this is to be accomplished in practice. A major problem is how to reconcile two programs that are fundamentally at odds in many respects. DDMP has been so clearly linked to the REGP that any decision about its future must be taken within the broader perspective of policy developments relating to the REGP.

PROJECT DESIGN & POLICY IMPLICATIONS: The evaluation team feels that there are serious conceptual, organizational and contractual problems confronting this project which, if not resolved, will prevent the project from attaining its intended purpose. Whereas the intent of the project in USAID's mind is reflected in the English title, the Thai title reflects the aims of the RTG: "To develop efficiency of the Tambol and Amphoe in Planning." There has also been a subtle change in the stated project purpose (Project Paper vs. LOP Workplan) which is also indicative of existing conceptual differences. Nevertheless, the one common element bridging the two perceptions is a perceived need to strengthen the capacity of the tambon to plan and implement rural infrastructure projects. The organizational problem is illustrated by the relationship between the TAT and overall project framework. One chart places the TAT under the REGP secretariat. A subsequent chart, found in the evaluation team's briefing book, places the TAT in a completely different relationship. There appear to be varying views of the degree to which the TAT functions as an advisory body or performs an operational staff function. The contractual arrangements do not provide guidelines for measuring achievements, effective mechanisms for coordination, or a means for resolving conflicts. The major lesson learned with respect to these problems is that an institutionalized two-way communication mechanism between host agency and donor representatives is a must. Otherwise, the entire project process, from its initial concept, to agreement on project goals, through the identification and resolution of design flaws and the establishment or revalidation of performance indicators, and throughout the "grayer areas" of interpretation of implementation strategy, cannot be efficiently or easily accomplished. In this case, despite design flaws, evidence was found that the project was beginning to produce some quantifiable results. Given the positive elements, the team believes the project has merit provided certain actions are taken to rectify the flaws. However, it is cautioned that DDMP end-of-project findings are unlikely to be utilized if they require substantial cross-ministry cooperation and coordination or additional RTG funding.

RECOMMENDATIONS:

1. The differences in conceptual understanding should be frankly and fully discussed and both the purpose and the objectives of the project clarified. This evaluation report should be used to initiate such a process. A consensus among key personnel as to the true purpose and objectives is critical.

2. A revised LOP Workplan that is congruent with the agreed project purpose and objectives and that includes verifiable indicators for measuring the progress toward achieving these objectives should be developed.

3. Quarterly reporting by the TAT using the verifiable indicators as measurements of progress toward achieving project objectives should be implemented.

4. A.I.D. should take steps to ensure that USAID funds are not distinguishable from RTG funds, if the intent of the Project is to comingle funds.

5. DDMP should be relieved from strict adherence to REGP project guidelines.

This evaluation was conducted between May 24 and July 12, 1984 by Gerald Sentell, Team Leader, of Tennessee Associates, Inc.; James Dawson, USAID/Philippines; Suchitra Punyaratabhandhu, National Institute of Development Administration/Thailand; Chinda Suetrong, National Institute of Development Administration; and Gary Suwannarat, Integrated Development Systems Co., Ltd.

AN EVALUATION OF THE EMERGING PROBLEMS OF DEVELOPMENT PROJECT - THAILAND

PROBLEM & OVERVIEW: A mechanism has been needed for some time to respond rapidly and in a more efficient and systematic manner to newly recognized priority development areas for which clear Royal Thai Government (RTG) policies and programs do not exist. This need is especially critical at the pre-project analytical stages, whether in the form of technical assistance or training.

U.S. ASSISTANCE: The Emerging Problems of Development Project (EPD) is a $5.2 million incremental grant covering the period August 26, 1980 through June 30, 1985. It is a follow-on to the Transfer of Technology and Management Skills Project (TTMS) and is designed to support and improve RTG policy development, program planning, and pre-project analysis in areas most urgent to the solution of national problems. EPD has two mutually supportive components: technical assistance and training. The grant is administered by the Department of Technical and Economic Cooperation (DTEC), Office of the Prime Minister.

PURPOSE OF EVALUATION: This mid-term evaluation is focused on DTEC's administration of the EPD in the areas of manpower and efficiency concerns, and the identification of potential additions to the present staff to accommodate an increased level of spending under a contemplated EPD II. Special attention was given to examination of problem identification, project implementation, and project impact on national development policy. This was accomplished by interviews with all project personnel and with personnel of selected sub-project implementing agencies, and by studying DTEC files pertaining to EPD.

FINDINGS:

1. EPD sub-project impact must be analyzed by varying degrees. Some have been completed, others are in progress, still others have finished one or two phases and are entering a third, and a number are in planning, rather than implementation, stages.

2. Several important EPD recommendations have resulted in their adoption as policies and/or action. These include: (1) a comprehensive reassessment of Bangkok's transport and development objectives; (2) establishment of noise and air pollution emission standards and criteria and monitoring stations; (3) a crop forecasting system for agricultural planning; (4) a course in project proposal preparation for Ministry of Agriculture staff; (5) formation of a working group and advisory committee for promotion of five-year development plans; (6) the establishment of an Information Center to disseminate ideas to students, government officials and donor agencies.

3. Several activities are currently in progress. These include the following: (1) improving the effectiveness of the community development training system; (2) setting up a coordinating center for the development of the eastern seaboard; (3) studying and proposing steps for the establishment of agricultural marketing centers; (4) conducting an LPG utilization study to be used as a guideline for setting energy prices; (5) formulating an exploration plan for marine phosphates; (6) studying the present tax administration system and identifying areas amenable to computerization to strengthen the system or alleviate weaknesses and problems.

4. That there is no fixed system for gathering data or measuring the impact of the various sub-projects after receipt of their final reports is perhaps the weakest point in the project at this time. Although some evaluations and suggestions for follow-up have been produced, none were specifically designed to measure the impact of EDP sub-projects, that is to ascertain what happens to ideas generated under EPD once final reports have been submitted.

5. In terms of manpower and staffing, 27 persons in 3 divisions are spending the equivalent of 8.64 person years on the project per year, excluding the time spent by the Director-General and his Deputy or the Procurement and Tax Clearance Division. At USAID, currently 15-20 percent of a Project Officer's time is being spent in addition to 90 percent for an Administrative Assistant. A training follow-up system had been planned but not yet implemented due to a current manpower shortage.

6. A proposal for the total restructuring of DTEC is under consideration by the Civil Service Commission. DTEC is promoting a national network which has proved to be effective and culturally appropriate. No major delays in the tasks performed by DTEC have occurred that are attributable to the system established by DTEC.

7. There are several areas of difference between USAID and DTEC which are potential impediments to project administration. These include: (1) USAID's requirement for a detailed budget which is unrealistic given the flexibility required by the project; (2) USAID audits which are fiscal rather than comprehensive; (3) USAID procurement requirements which are frequently too strict; (4) unfamiliarity on the part of many Thai and American representatives with the details of bilateral agreements.

PROJECT DESIGN & POLICY IMPLICATIONS: A sample investigation of a few projects demonstrates EPD's success in fulfilling its objectives of identifying emerging problems and affecting the development of revised national policy. EPD has demonstrated that USAID's trust in the capability of the central government agencies is warranted and can pave the way for dynamic cooperation in the future. One of the best lessons learned from the EPD experience is that it is imperative for donors to give credit to RTG officials for carrying out complex administrative procedures with very limited physical and financial resources. A.I.D.'s hypothesis, beginning in the TTMS project and becoming more clearly defined with the EPD project, that the RTG is capable of implementing and administering projects born of its own initiative is being substantiated. The underlying attitude of confidence toward DTEC and RTG administration of EPD may well prove to be a milestone in U.S.-Thai relations and in international development.

RECOMMENDATIONS:

1. NESDB should play a greater role in the problem identification phase of EPD, particularly in the clarification of its guidelines for the national five-year plans.

2. A more timely, efficient means of identifying consultants and training institutions should be considered such as the headquartering of one or two officials at the Thai Embassy in Washington, D.C.

3. USAID should modify its EPD financial requirement from an annual budget to a monthly or quarterly rolling system.

4. DTEC should prepare a set of guidelines to assist in the writing of proposals and scopes of work prepared by line agencies and contractors. It should also prepare an orientation handbook that clearly identifies which forms and documentation are required.

5. DTEC should design a quarterly report format listing minimum criteria for quality, type of relevant information, and scope of quarterly progress reports produced by consultants.

6. USAID and DTEC should coordinate their MIS service to obtain timely and systematic retrieval of required information.

7. Participant training conditions should emphasize training for Civil Service personnel at levels 3 and 4 who are required to return to their former positions.

8. USAID should consider adopting a comprehensive or performance-based auditing system to assist in project monitoring and evaluation.

9. DTEC anticipates that a follow-on project would include large sub-projects but also need to maintain essential flexibility with smaller sub-projects. It is recommended that preparations for enhanced analytical and administrative capacity begin immediately.

This evaluation was performed by Dr. James R. Chamberlain. Dr. Chamberlain's report is dated December, 1983. The author's professional affiliation is not mentioned in his report.

AGRICULTURAL PLANNING PROJECT EVALUATION - THAILAND

PROBLEM & OVERVIEW: The Royal Thai Government (RTG) has a substantial investment in the development of the agricultural sector. This effort has been assisted by bi- and and multilateral donors. The lead agency of the RTG in this effort has been the Ministry of Agriculture and Cooperatives (MOAC). As part of the overall effort to improve agriculture productivity, strengthening the MOAC agencies responsible for planning and policy formulation is critical.

U.S. ASSISTANCE: The Agricultural Planning Project (APP 0493-0317), is financed under a grant agreement between the RTG's Department of Technical and Economic Cooperation (DTEC) and USAID/Bangkok dated December 12, 1980. A.I.D.'s contribution is $3.2 million. RTG's counterpart funding is $1 million. The final input delivery is scheduled for October 31, 1985. There are no other major donors. The purpose of APP is to strengthen the capabilities of the Office of Agricultural Economics (OAE), the principal agency in the MOAC, to carry out policy planning. Problem identification, data management and integrated project preparation are also key functions of OAE. Key indicators/conditions of project success include: (1) evidence that the capacity for effective planning and policy analysis management has been institutionalized within the OAE; (2) a system of cooperation between OAE and MOAC line departments has been established; (3) a significant level of effort is evident within OAE in terms of analysis, planning, reporting, and project evaluation relating to policies/projects to benefit low-income farm households; and (4) the OAE system for collecting and processing production, consumption, price, and marketing estimates and socio-economic data relative to the rural sector has been improved. Since July 1982, an advisory team consisting of three long-term and 11 short-term advisors from Iowa State University has provided technical assistance.

PURPOSE OF EVALUATION: This mid-term evaluation gauged the effectiveness of the project in generating information needed for policy formulation and the role of the advisory team in furthering this process. The evaluation team's Terms of Reference posed nine specific questions. The first five dealt with an assessment of the APP's achievements to date. The last four addressed the implications for the future. The advisory team had been working with the OAE for two years at the time of the evaluation. The evaluation team spent two person-months reviewing files, reports and other documents, and conducting interviews with long-term staff of the advisory team, and with RTG and USAID officials. No previous evaluation or review has been conducted.

FINDINGS:

1. The project's direct impact on the institutional capabilities of the OAE for planning and policy formulation appear to be more modest than envisioned in the Project Paper. The project has had a favorable impact on the Center for Agricultural Statistics in the OAE. However, there is little evidence that important changes directly attributable to the APP occurred in the OAE organization or allocation of budget and personnel resources.

2. The lack of impact of the advisory team and the team leader on policy formulation was partly due to the selection of team members. Little capability was provided for examining the appropriate role and purpose of the OAE in policy formulation and the responsibility of that agency to provide economic research data support for policy analysis. Regarding the Terms of Reference for each of the individual consultants on the advisory team, the evidence is that only 50 percent of what was asked for has been accomplished to date.

3. The area sampling frame (ASF) component is progressing very satisfactorily. 2,600 sampling areas have been identified and stratified to permit substantial improvements in sampling. A 700-area sample is on schedule. Additional staff have been assigned. The long-term effect that an ASF data gathering system will have on overall analysis and planning within the MOAC is potentially significant. This part of the project has received the full support of OAE. It is also the only anticipated project output likely to be fully achieved by the PACD.

4. A major problem is the inability of the staff to get data processed and make it available for analysis. Although the advisory team took initiative in trying to solve this problem by leasing two computer terminals, these leases may be terminated without notice.

5. Both the RTG and USAID have provided appropriate resource support for the APP. DTEC has met its contractual commitments in terms of providing local currency to the project as stipulated in the grant agreement. DAE has provided facilities, staff, cooperation and budget support to the APP.

PROJECT DESIGN & POLICY IMPLICATIONS: The evaluation team feels that the lack of influence of the APP on resource allocation and operations of the DAE was partly a function of the project design and specifications of consultants. The lesson learned here is to avoid overselling projects in their design stages. The ultimate goal and some of the project purposes seem to be much too ambitious for the general scope of the APP. A second lesson learned is to match consultants with the primary objectives to be pursued. Although a primary focus was to provide information for policy decision making, very few if any of the consultants had much of that type of experience. Unduly restrictive or ambitious Terms of References for individual team members should also be avoided. The contractor should be made responsible and accountable for individual and overall project performance. Otherwise, overly close control by A.I.D. on the approval of individuals serving under the contract and on their specific assignments makes A.I.D., as well as the contractor, responsible for any shortcomings in performance. Finally, a better reporting mechanism for the contractor to A.I.D. is essential. Monitoring of a project must be done in such a way that reports are generated which are both substantive and indicative of project performance. In this project, a report at an early stage on what policy instruments DAE can influence and how they might have an impact on low-income rural households might have been useful. It could have provided useful information and perhaps encouraged the advisory team to shift its emphasis. USAID would have benefited by discovering at an early stage in the project whether some of the project's purposes were obtainable.

RECOMMENDATIONS:

1. Consideration should be given for the duration of the project to examining the role of the DAE in policy formulation and its relations to other agencies, both in and out of MOAC, that have a responsibility for setting the policy agenda and for analyzing those policies which affect Thai food and agriculture production.

2. An agenda should be established for data collection, research, and analysis that is geared to the needs for information on which to base high priority policy decisions.

This evaluation was conducted during May and June, 1984 by Sopin Tongpan, Ph.D., Faculty of Economics and Business Administration, Kasertsart University; and James Fay, Ph.D., Vice-president of Robert R. Nathan Associates, Inc.

REPORT OF THE REVIEW TEAM FOR THE COLOMBO PLAN STAFF COLLEGE FOR TECHNICIAN EDUCATION - SINGAPORE

OVERVIEW: U.S. support for the Colombo Plan Staff College (CPSC) dates to 1969 when a delegate to the Third Colloquium on Intra-Regional Technician Training helped to gain support for the concept of a regional technician teacher training center. That support has continued to the present through full participation in formula-based funding as well as through additional contributions of various kinds throughout the history of CPSC. U.S. contributions are through A.I.D. Currently, U.S. foreign assistance policy does not give priority to technician education, although A.I.D. is reviewing its posture in this area. The A.I.D. contribution to CPSC is small and, therefore, receives little attention. CPSC contributions tend not to fit in with normal A.I.D. programs, making it difficult to lobby effectively for additional support among U.S. officials. [Ed. note: The Report does not provide any information on previous or current A.I.D. funding or technical support either for CPSC or for the Review Team.]

PURPOSE OF EVALUATION: The evaluation assignment called for an analysis of the need for continuation of the Colombo Plan Staff College (CPSC), and for the future direction regarding its role, functions, objectives and purposes, resources, and internal structure. The review team solicited information through a questionnaire to which 130 key professionals responded to 145 variables. In addition, senior government officials both in regional and non-regional member countries, and past participants were interviewed.

A.I.D.'s interest in this review is keen and has been supportive. A.I.D. anticipates that the report may be a major input to its thinking about future support to CPSC. A.I.D. is interested in knowing if CPSC's rationale for existence is in harmony with the needs of the region, and whether CPSC's institutional makeup is appropriate to the tasks it undertakes.

FINDINGS:

1. Nearly all key professionals and senior government officials affirmed that the CPSC has an important role to play over the next five to ten years in assisting their countries in the development of technician education.

2. The role of CPSC as a "broker of expertise" was strongly supported by a large majority of senior officials and key professionals.

3. The range of suggested functions for CPSC to fulfill proposed in near unanimity by respondents according to mutual priority ranking includes: (1) staff development; (2) curriculum development; (3) teaching-learning systems; (4) developing technician education; (5) information services; (6) advising and consulting; and (7) research and development.

4. Near unanimity exists within both regional and non-regional member countries that future objectives for CPSC should be: (1) to increase the efficiency and effectiveness of technician education; (2) to improve the planning and decision-making processes that shape technician education; and (3) to support change and development in technician education within the region.

5. The level of autonomy afforded the Governing Board and CPSC Director was generally thought to be at an appropriate level to achieve proper accountability.

6. Many policymakers questioned the flexibility of the present governing structure. They felt it important to determine more clearly and precisely the relationship among the Consultative Committee, the Colombo PLan Bureau, and the CPSC.

7. A large majority of key professionals emphasized the importance of establishing more effective functional linkages between CPSC, policymakers and key professionals. However, considerable amount of turnover exists within the Board of Governors and member government representatives which makes continuity difficult.

8. The review team was unable to obtain many precise responses from respondents on the question of how future funding to CPSC should be arranged.

POLICY IMPLICATIONS: Most countries participating in the review did not differ significantly from the group as a whole with respect to their judgments on the need for and value of the programs detailed for fulfilling part of the role and functions of CPSC. A high degree of agreement characterizes the functional linkage of the CPSC with regional countries in relation to support for future programs. Five countries can be identified as expressing a significantly stronger or significantly weaker support for the programs of CPSC. The Philippines and Thailand tended to display a greater strength of support for the work of CPSC while Singapore, Korea and Indonesia indicated a lesser degree of support than the region as a whole. Considering the heterogeneity of the region, it is surprising that such a degree of unanimity was recorded for the future potential of CPSC. It is probable that the divergence, while small, results from the particular stage of development of technician education within the country. With respect to the function of CPSC conducting both in-college and in-country courses, most countries stated that the present course offerings were all valuable and effective. Those that expressed reservations did so on the grounds that courses tended to be repetitive and that they needed to be changed and adapted to the changing needs of the region. However, an analysis of these courses did not substantiate such claims. In fact there appears to be significant changes in the courses as new needs are expressed by regional countries and by the senior officials at conferences.

RECOMMENDATIONS:

1. Program and fiscal policy for CPSC can be strengthened by improving links between the Governing Board and member countries representatives by supplying more detailed information about CPSC programs, giving prior notice when input to the Board is desired, and by using technician education experts on matters pertaining to CPSC governance.

2. A larger and more focused CPSC program planning and development capacity and capability can be achieved by focusing the Director's activities on building professional leadership through active participation in teaching, research, and consultancy and by holding annual meetings of the Panel of Advisors to review CPSC programs.

3. CPSC should broaden and strengthen its leadership capacity through building functional links with other organizations and agencies.

4. CPSC should continue its programs of staff development, curriculum development, and the development of teaching-learning systems at the current level, but expand its applied research, advisory and consultancy, and information services.

5. CPSC should continue to be a small institution with some increased capacity and with an increased dependence upon resources that accrue from cost-sharing partnerships with member countries, international agencies, and other organizations. CPSC's faculty capacity should be gradually increased from twenty to thirty.

[Ed. note: The preceeding materials were summarized from Chapters V and VI of the Review Team's report. No indication was given in those Chapters as to the composition of the Review Team or the qualifications of its members.]