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REVIEW OF PROGRESS
STUDIES IN FACILITATING LEARNING (*Project # 931-1109*)
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Summary

In September 1977, the Academy for Educational Development was contracted by the Office of Education, Bureau for Science and Technology, U.S. Agency for International Development, to undertake a series of activities designed to capitalize on the educational potential of communications technologies and to encourage their use in AID-sponsored development programs. The **Studies in Facilitating Learning (SFL)** contract, divided into four components of Planning Studies, Seminars, Information Series, and Cost Options Studies, has to date completed the following activities:

Planning Studies

Nineteen communications planning activities were supported in North Yemen, the Sudan, Peru, Lesotho, Liberia, Indonesia, the Philippines, Senegal, Jamaica, Tunisia, Nigeria, the Dominican Republic, Zimbabwe, and Botswana.

Three major communications projects were developed in the Sudan, Peru, and Liberia.

Four additional projects are now being planned in the Philippines, Senegal, Indonesia, and Botswana.

Seminars

Eleven communication seminars, five in Africa, three in the Caribbean, one in the Middle East, one in India, and one in the South Pacific, have been supported by the SFL contract.

The seminars have averaged 40 participants, for an approximate total of 440 policy-makers and planners. The average seminar length is 10 days.

Information Series

Two 16mm films, Radio Mathematics in Nicaragua and A Way to Bridge the Distance, and two, 3/4" color videotapes, A New Voice in the Village and Masagana 99: Promoting a Miracle, have been produced.

Six thousand brochures in English, French, Spanish, and Arabic were produced to accompany the films and videotapes.

Three hundred requests have been received for the films and videotapes. Forty requests were from AID/Washington or AID Missions.

Cost Options Studies

Eight analytical activities were conducted, including satellite studies in North Yemen and Indonesia and a methodology for planning development communication systems.

SECTION I

INTRODUCTION

In September 1977, following a competitive procurement process, the Academy for Educational Development was awarded Contract No. AID/ta-C-1473 by the Office of Education within AID's Bureau for Science and Technology (then the Office of Education and Human Resources, Bureau for Technical Assistance, later the Development Support Bureau). The purpose of the contract, entitled Studies in Facilitating Learning, was to capitalize on the potential of communications and educational technologies and to encourage their use in AID projects, in accordance with the Agency's mandate that the largest possible segment of the world's rural poor be reached directly by AID-sponsored development services.

The products and services called for under Studies in Facilitating Learning (SFL) were to be made available to those individuals responsible for planning and designing projects, both in the AID Missions and in AID/Washington. In order to accomplish this, ST/ED envisioned a comprehensive contract which would provide information and services to AID staff primarily and, secondarily, to those counterparts with whom they worked. The Academy was asked to undertake a series of four related activities, directed to AID staff in the field and in Washington. These included:

- Carrying out, in concert with AID personnel, planning and feasibility studies to determine the role which communications might play in specific country programs and projects.
- Mobilizing information seminars to create, on the one hand, or further develop, on the other, awareness of the potential role of communications in extending the effects of AID's development programs.
- Producing a series of films, videotapes, and accompanying print materials to disseminate and transfer information on the application of communications technologies to specific development programs.
- Developing preliminary cost models of several alternative communications systems.

It was intended by ST/ED that these four activities would be entirely complementary, with each reinforcing the impact of the others. By vesting responsibility for all of them in one contractor, it was hoped that (1) continuity of approach and quality among products would be maintained, (2) that rapid responses to AID requests, as well as quick mobilization of people and materials, would be ensured, and (3) that AID's routine management responsibilities would be minimized. An institutional history, coupled with ongoing contractual responsibilities, would also provide for the monitoring of results over time. In this way, lessons learned from past experiences could contribute

to the evolution of more effective methods of planning for the use of communications technologies in development programs.

This report is organized into three sections. The first describes the services and products delivered under the contract; the second presents evidence of the successful integration of the components in support of field projects; and the third summarizes the lessons learned through this work and the improvements in methodology which have been identified as a result.

SECTION II

ACTIVITIES CARRIED OUT UNDER

STUDIES IN FACILITATING LEARNING

The four components of Studies in Facilitating Learning, as included in Contract No. AID/ra-C-1473, are Project Planning, Seminars, Information Series, and Cost Option Studies.

A. COMMUNICATIONS PLANNING AND DESIGN STUDIES

This first component of SFL consists of studies designed to assist AID and developing countries in analyzing the role of communications in solving development problems and in planning appropriate strategies for the application of new technologies in a specific development context. In carrying out this component, the Academy identified and recruited the most qualified experts in the field of development communication from U.S. and developing country institutions, including the University of Guyana, the University of the Philippines, the University of Massachusetts, Cornell University, Stanford University, Harvard University, Florida State University, Indiana University, and the University of Wisconsin. Management of this component has been the responsibility of Peter Boynton, an Academy staff member based in Washington, D.C. A subcontract with Stanford University made possible the involvement of that institution and its resources in a number of the initial planning and design activities carried out under this component. A complete list of staff and consultants who contributed to this work is contained in Appendix A.

These planning studies frequently proceeded from work completed under another component of SFL, and often incorporated yet a third part of the contract. For example, a film showing resulted in a request for an information seminar, which in turn led to a request for a planning team to address a particular issue. The two to four major planning or feasibility studies called for in the original contract were increased to six by amendment to the contract in July 1980. The number of these studies actually carried out, sometimes in conjunction with other SFL components, now totals eight. Other studies of shorter duration to analyze the role of communications in development have been increased in number from six to fifteen. The first planning study was completed in 1979, following preparations which began the year before.

Each study is prepared to meet specific needs as determined by AID. Under the procedure spelled out in the contract, AID specifies the location and the nature of the development problem to be addressed and the Academy responds with a proposal which represents the way in which the study will be carried out--in terms of methodology, staff, and cost.

Each study is a result of close cooperation between Academy staff and AID representatives in Washington and in the field. Before the field investigation begins, each study team consults with AID staff and USAID Mission representatives to arrive at precise specifications for the study. When the field investigation is complete, a draft of the study is prepared before the team departs, if possible; if not, the conclusions are fully discussed with Mission staff and host country representatives.

1. Planning Studies

These "major" studies support the design of AID projects. Each is based on an analysis of the developing country context and resources as well as the overall AID country strategy for identifying and addressing priority problems. The contract specifies that each study will encompass the elements specified in AID Handbook 3, Project Assistance, Chapters 4 and 6. In addition, other planning elements are to be developed in detail:

- Each study will identify the important human resource needs or requirements in development projects--either current or planned--to which communications technologies can be applied.
- Each study will propose a strategy for applying appropriate instructional methods, educational technology, and communications media delivery systems to meet the needs identified and a design for testing the proposed strategy.

The following studies have been carried out under the Studies in Facilitating Learning contract.

- Options Analysis and Recommendations for a Communications Satellite Demonstration in North Yemen and Related Activities (January 1979)

Purpose: To prepare a series of options with costs for a satellite demonstration in North Yemen.

Background: A request to AID following an SFL seminar, from North Yemen government officials for technical assistance to determine the feasibility of using satellite communications to meet rural development needs.

Summary: The study presents three options for a demonstration of two-way audio communications using small earth stations with the INTELSAT satellite. Recommendations for training and a review of the potential of a telephone access audiotape library in Yemen are included.

Outcome: The cost of the proposed options exceeded available funding and the project was shelved.

- Communications Support for Primary Health Care Projects: Sudan (May 1979)

Purpose: To prepare the communications support section of the Project Paper proposing a primary health care project in the Sudan.

Background: A request from AID to supplement the health planning resources of a consulting firm with the Academy's resources in communications planning.

Summary: This study consists of Part V and Annex H of the AID primary health care project document. The health care situation in the Sudan is assessed and the proposed communications system is described. Broadcast radio and two-way radio applications are proposed.

Outcome: The project was funded and a broadcast radio pilot project in southern Sudan was included.

● The Rural Communications Services Pilot Project in Peru (December 1979)

Purpose: To contribute to the design of an AID project to test and demonstrate the potential of communications technologies, including satellites, for extending and improving agriculture, health, and education services in rural areas.

Background: The Academy was requested to help develop an AID proposal to establish a rural satellite communications project to operate in conjunction with a major AID agricultural development project in Peru.

Summary: This contribution to the design of the rural communications services pilot project in Peru describes the proposed rural communications network and its application to the fields of health, education, and agriculture. It contains an evaluation plan for the project and an analysis of the technical and social factors involved in planning the network.

Outcome: The project was funded by the Bureau for Latin America and the Caribbean, Office of Development Resources. It is currently in progress.

Two-way Radio for Rural Health Delivery in Lesotho (January 1980)

Purpose: To present plans and considerations for a two-way communications component in a rural health delivery project in Lesotho.

Background: The study was commissioned by AID in response to a request from the USAID-sponsored MEDEX rural health delivery project.

Summary: The report summarizes the existing high-frequency radio facilities for health communications in Lesotho, including applications, organizational structure, and maintenance procedures. Three plans are then proposed for providing two-way radio service to all hospitals and clinics.

Outcome: USAID did not fund the two-way radio project. MEDEX reports that other funding may be forthcoming.

- Liberia Rural Information System Project Planning Study (March 1980)

Purpose: To assist a joint USAID and Liberian project committee in preparing a project paper for a radio-based rural information system.

Background: This study was requested by USAID, on behalf of the Liberian project committee, following a preliminary seminar held in 1977 and Liberian participation in a later seminar in Jamaica.

Summary: The study presents the major portions of the project paper: characteristics of the Liberian Rural Communications Network, its functions, and responsibilities; technical, engineering economic, and social soundness analyses; equipment recommendations, building and site requirements; project design summary.

Outcome: USAID/Liberia funded this project.

- Indonesia Satellite Pilot Project: Preliminary Planning Study (March 1980)

Purpose: To develop a preliminary plan for a satellite pilot project designed to support the curriculum exchange and administrative activities of the Eastern Islands University Association in Indonesia.

Background: AID request in response to Indonesian interest in participating in the AID Rural Satellite Program.

Summary: This study in the form of an aide memoire describes a preliminary network and proposes plans for its further development.

Outcome: Work continues under the AID rural satellite applications management contract.

● Aide Memoire: A Rural AID Satellite Project in the Philippines (June 1980)

Purpose: To develop a proposal for a satellite pilot project in support of a development project in Panay, Philippines.

Background: An AID request to provide a team for the detailed planning of a pilot project in the Philippines under the AID Rural Satellite Program.

Summary: The aide memoire provides background material pertinent to development of the proposal, describes the resources available, and outlines the project structure.

Outcome: Work continues under the AID rural satellite applications management contract.

● Accelerated Impact Project, Rural Satellite Communications, USAID Senegal (September 1980)

Purpose: To develop the project design for an accelerated impact project as the first phase of a proposed rural satellite communications project in Senegal.

Background: The project is a collaborative science and technology activity of the Secretariat d'Etat a la Recherche Scientifique et Technique and USAID.

Summary: The study describes a system designed to demonstrate the significant impact of satellite technology on rural communities. System configuration was selected for its ability to demonstrate a variety of applications simultaneously at minimum cost. The study describes the architecture of the system with emphasis on engineering system design, external interfaces, and services provided.

Outcome: Project currently under review as one of the sites for an AID rural satellite pilot project.

The last three satellite studies contributed to the development of a major AID-sponsored satellite initiative, funded under a separate contract.

2. Studies of Communication in Development Sectors

These "minor" studies analyze the role of communications in development. They fall into the following general categories:

- Analyses of communications practices and infrastructure in a particular development sector, e.g., health, agriculture, rural development, education, nutrition.
- Analyses of the communications sector in particular countries, e.g., development orientation and planning priorities of the national communications infrastructure.

The studies which were performed under these two broad categories are summarized in this section.

- Planning Assistance to the University of the West Indies

Following the AID-sponsored satellite communications demonstration for the University of the West Indies in 1978, the Academy defined the feasibility issues which the university should address in its proposed study on potential applications of satellite communications in extending university services and in administrative support. Following this assignment, the university was awarded a grant by AID to conduct the feasibility study.

- MEDEX Two-way Radio Communications in Guyana

Since 1978, the Academy has assisted USAID/Guyana and the Ministry of Health in planning and implementing a two-way radio system which provides administrative and technical support to rural health extension workers. The recently concluded pilot phase of the MEDEX project was the result of extensive pre-project planning under this contract: a study of the components of the health sector in Guyana and an analysis of the communications requirements of the proposed pilot project and alternative communication needs. Plans are currently under way to expand the pilot phase of the project into a broader medical communications network which will serve rural extension workers throughout the country.

- Educational Technology Center in Indonesia

In July 1978, the Academy, under another contract, sent a team of consultants to Indonesia to assist USAID/Jakarta and the Government of Indonesia in developing a project paper for a National Center for Communication Technology in Education and Culture. Following that assignment, the SFL contract supported Academy participation in the review of the project paper by AID/Washington. The national center has subsequently become a major new resource towards the effective extension of educational opportunities to a broad and previously unserved spectrum of Indonesia's population.

- Agricultural Communications in Africa

In September 1978, at the request of ST/ED, Anna Casey-Stahmer from the Academy attended a conference of AID agricultural officers held in Ibadan, Nigeria. The conference was organized to discuss AID's new agricultural policy and to inform the participants of the project development services available to them under this contract.

- Tunisian "Dr. Hakim" Project

In March 1979, the Academy conducted a seminar in Hammamet, Tunisia, to plan the second phase of the "Dr. Hakim" radio nutrition education project. The seminar was organized to recommend to the local administering agency--the National Institute of Nutrition--specific plans and activities to achieve the goals of the project's second phase. In the week that followed the seminar, the Academy's representatives prepared a proposal which incorporated the work and recommendations of the seminar's participants. The proposal was later submitted to the Tunisian Ministry of Health and international donors for approval and funding. Subsequent funding was received to continue the "Dr. Hakim" project.

- Project Assistance in the Dominican Republic

At the request of ST/ED, in September 1979, the Academy analyzed the communications and administrative needs of a project to disseminate agricultural information to rural women in the Dominican Republic. The project--the pilot site of the AID-sponsored Educational Media for the Integration of Women--was in its initial planning stage. The services of a communications planner were needed to analyze the communications requirements of the project, develop technical and administrative guidelines for further project planning activities, and recommend appropriate administrative linkages and cooperation. At the conclusion of this assignment, a strategy was proposed for applying appropriate instructional methods and communications delivery systems to meet the informational objectives of the project.

- Satellite Project Management

In December 1979, the Academy prepared the Satellite Project Management Paper, which reported and analyzed past experiences in managing satellite applications programs. The study was undertaken to provide AID with information for consideration in developing project designs for satellite-based communication systems in developing countries.

- Two-way Communications for Health Care Delivery

Growing interest in using communications systems for delivering health services prompted this compilation of case studies on telemedicine projects in developed and developing countries. The report presents case studies of projects in Asia, Africa, the Caribbean, Central America, South America, South Pacific, United States, Canada, and Australia. The format for the presentation provides a description of the project, technical data, target area of the project, participants, sponsoring agencies, and resources. This report was the keystone of a seminar on the applications of two-way radio for health care sponsored by the National Academy of Sciences in June 1980, and represents a major contribution to the role of communication in health care delivery.

- Health Communications

In March 1981, the Academy was asked to provide technical assistance in development communication to the American Public Health Association which, under contract with the Bureau for Science and Technology, Office of Health, was in the process of preparing an issues paper on communications in health and nutrition services. Written and verbal contributions were provided for use in preparing the paper in its first and second drafts.

- Educational Communications Planning in Zimbabwe

In April 1981, the Academy attended a conference of educational professionals to discuss the role of communications in development and to help identify potential areas for AID program or project support in educational communications.

- Center for Development Communication in Botswana

In June 1981, the Academy, at the request of USAID/Botswana, participated in a planning activity to determine appropriate efforts to increase the number of trained radio and other communications personnel and to assess the initial interest among development ministries and agencies for the development of a Center for Development Communication that would support various development goals. As a result of this initial planning activity, a proposal was submitted to USAID/Botswana to bring together representatives from development ministries and agencies to plan the design and implementation of the Center for Development Communication.

B. SEMINARS IN COMMUNICATION FOR DEVELOPMENT

The second component of the Studies in Facilitating Learning project called for ten seminar cycles to be planned and conducted in response to the growing interest in using communications to help achieve development goals. In fact, the Academy conducted 11 seminars in five regions of the world. The seminars, designed to meet AID requirements and intended to inform USAID staff

and host government decision-makers of the role that communications play in development projects, are described in the contract as follows:

The more specific purpose of each seminar will vary along a continuum according to the needs and characteristics of country site. At one end of this continuum is the information-oriented seminar; its function is to inform and arouse interest about various applications of educational technology. At the other end of the continuum is the implementation-oriented seminar; its function is to catalyze thinking and planning which might result in a project.

The information seminar reviews current and past experiences in using communications in development projects in all sectors. It is usually brief, lasting from two to three days, and the participants include USAID staff and host-government decisionmakers. Films, videotapes, and other materials produced under the Information Series are used as part of the presentations. The information seminars focus on a state-of-the-art overview of development communication and introduce concepts relating to systematic planning for the use of communications strategies which will help achieve development goals.

The implementation seminar is designed to promote in-depth discussion of particular programs among planners, project managers, and communications specialists, and to provide specific planning assistance in the field or in Washington. This may take from four days to two weeks, depending on the degree of interest in the applications under discussion, the extent to which the seminar is used for training, and the stage in the planning process at the time the seminar is held. The seminar presents conceptual material similar to that offered in the information seminar plus specific development models for various sectors, whether agriculture, health, or education.

Under the management of Allan Kulakow, with assistance from staff and consultants noted in Appendix A, the following seminars have been held in accordance with the terms of the SFL contract:

1. Information Seminars

a. Regional Meeting on Human Resources Development of the
Comite Permanent Inter-Etats de Lutte contre la Secheresse
dans le Sahel (CILSS)

In March 1978, the Academy offered a seminar to provide an overview of development communication for regional CILSS participants. The participants in the seminar represented six of the eight Sahel countries, AID, UNESCO, FAO, the Swiss development agency, and consultants to CILSS for health and nutrition. As a result of the seminar, a special Commission on Mass Communications and Rural Development was established to plan and review regional development communication activities. (40 participants)

b. AID Regional Agricultural Officers Conference

In September 1978, the Academy provided an overview of development communication for USAID agricultural officers working in Africa. The purpose of the seminar was to inform participants of the role that communications play in disseminating agricultural information. (40 participants)

c. Yemen Telecommunications Seminar

In December 1978, USAID requested the Academy to conduct a seminar in the Yemen Arab Republic to bring Yemeni ministries and directorates together to discuss existing plans for a national communications system. The focus of the seminar was the increasing importance of communications satellite systems in achieving national development goals; Yemen will be covered by the ARABSAT satellite to become operational in 1989. As a result, Yemeni government officials requested technical assistance from USAID, and the Academy prepared a planning study, Options Analysis and Recommendations for a Communications Satellite Demonstration in North Yemen, under the Planning and Cost Options Studies components of the SFL contract. (40 participants)

d. Conference on Research for Decisionmaking in Educational Media

In December 1980, ST/ED requested that the Academy fund under the seminar component of the SFL contract the travel of four participants to the Conference on Research for Decisionmaking in Educational Media in Ahmadabad, India. The conference was attended by decision-makers and planners from 19 countries; SFL contract funding made possible participation from Peru, the United States, Senegal, and Jamaica.

2. Implementation Seminars

a. Seminar in Radio Education, Caribbean Region

The Academy conducted a seminar in Ocho Rios, Jamaica, in 1978, to help develop a regional experimental radio education project for the Caribbean. Participants included representatives from Antigua, Barbados, Jamaica, and St. Vincent. As requested by AID, the seminar was intended to review experiences relevant to the participating islands in the use of radio for educational purposes. An illustrative project design was prepared by each country during the seminar, and regional communications support services were discussed. (20 participants)

b. Jamaica Radio Nutrition Education Seminar

In June 1978, the Academy organized a seminar in Jamaica on media-based nutrition education campaigns, in support of the National Nutrition Education Campaign financed by the World Bank. The seminar was a contribution by USAID/Jamaica to the improvement and expansion of a national campaign which focused primarily on conventional advertising strategies: billboards, posters, and public service and newspaper announcements.

The seminar participants developed specific action plans for their parishes, stressing the critical role of personal, face-to-face communication, and its integration with a media campaign. (60 participants)

c. Tunisian Seminar on Nutrition Education and Communication

At the request of the Tunisian USAID Mission and the National Institute of Nutrition, the Academy was asked to conduct a seminar to review Phase I of the "Dr. Hakim" project and to determine the directions and strate-

gies for Phase II. Of particular importance was the decision on the part of the government to use television in Phase II.

The Academy's team of consultants consisted of nutrition educators, anthropologists, a television producer, communication theorists and practitioners, and Tunisian experts--all with experience in the application of communications media and educational processes to social development, nutrition and health education, and behavioral change.

The seminar produced conclusions and recommendations for Phase II of "Dr. Hakim," and resulted in a draft proposal by the Director of Nutrition Education of the National Institute of Nutrition, which was based on the recommendations produced at the seminar. One important outcome of the seminar was the opportunity for Tunisian government representatives to meet for the first time to discuss mutual support for nutrition education in the country. (40 participants)

d. Jamaican Radio Rural Development Project

As part of the development of the AID-funded rural integrated development project in the Pindar River region of Jamaica, the Academy in cooperation with the Jamaican Broadcasting Corporation offered a two-phase seminar in June 1979 to plan the radio component of the project and to train extension workers for its effective implementation. The purpose of the first phase was to inform a broad interministerial audience about the Jamaican Broadcasting Corporation project and to make this audience aware of specific examples of the successful application of communications to development. During the second phase, extension agents were introduced to the development communication aspects of the rural development project. Approximately 42 persons attended each phase of the seminar.

e. University of the South Pacific Seminar

In May 1980, the Academy organized a seminar for the Extension Services of the University of the South Pacific, in Suva, Fiji, to plan outreach programs for the AID-supported satellite project. The seminar was coordinated with the annual meeting of the directors of the University's extension centers throughout the Pacific region. Other participants included representatives of the international organizations using the satellite (ILO, WHO, UNFPA, YWCA, ITU); two Fulbright advisors working on the project; and other resource people concerned with development in the South Pacific. The purpose of the seminar was to assist the staff and Extension Center directors in developing new program ideas and plans for outreach activities as projected and required in the AID funding agreement. The seminar produced conclusions and recommendations in administration, staffing, and programming designed to meet the projected requirements. (40 participants)

f. Sahel Regional Radio Seminar

The Academy planned and conducted a seminar in Bamako, Mali, to prepare a proposal for a regional development communication resource within the Institut du Sahel. The seminar was based on AID-supported work over the preceding three years in response to requests from the Comite Permanent Inter-etats de Lutte contre la Secheresse dans le Sahel (CILSS) for assistance in

developing proposals for communications projects and on the results of a radio and television survey of the Sahel conducted in 1979. The seminar was attended by representatives from the Cape Verde Islands, The Gambia, Mali, Niger, Mauritania, Senegal, and Upper Volta, as well as FAO and USAID. The delegates to the seminar adopted a proposal which established a service unit in the Institut to coordinate all development communication activities of the CILSS, and a development communication unit to provide consultants, organize training workshops, and establish a clearinghouse for materials and information on development communication. FAO is seeking funding for the project. (30 participants)

g. Multimedia Environmental Sanitation Project Seminar

In November 1980, at the request of USAID/Botswana, the Academy conducted a seminar to plan the community education component of the USAID-funded environmental sanitation project in two Botswana provinces. Approximately 30 provincial health representatives attended the seminar. The agenda was planned to permit information about the role of communications in community education and mobilization to be drawn from case studies. The Academy's resource experts presented these case studies, highlighting the key elements which were most relevant to the Botswana project. Participants in the seminar then developed plans for implementing the campaign in the two provinces. (30 participants)

C. INFORMATION SERIES

This component of the SFL project was designed to disseminate information about innovations in development communication and to promote the transfer of approaches through the use of films, videotapes, and print materials documenting the use of communications technologies in development programs. The work to produce a series of information packages was managed by Jill Merrick of the Academy's staff, with production assistance from several subcontractors under her supervision. A complete list of subcontractors, staff, and consultants involved in this component is contained in Appendix A.

Under the terms of the contract, the Academy produced two 16mm color films and two videotapes, each in English, Spanish, French, and Arabic. In addition, a film on the Basic Village Education project, produced under another ST/ED contract, was translated and reproduced. For convenience, the films produced under SFL were transferred to videotape, and multiple copies of both formats, film and videotape, were made. The numbers of copies produced in each language are presented in Appendix B, along with a distribution list.

The responsibility for maintenance and distribution of these films and videotapes rests with the Clearinghouse on Development Communication, which is supported by ST/ED (formerly DS/ED) and operated by the Academy. Since distribution began in 1980, the Academy has responded to more than 300 requests for the films and videotapes, with each request involving at least two viewings. Of these requests, 40 were from AID/Washington or AID Missions, with 15 coming from Africa, 7 from Asia, 5 from Latin America, and 2 from the Caribbean. The average audience is 30 viewers, although at times it has numbered 400.

1. Films

- Radio Mathematics in Nicaragua. Filmed on location, this film documents an important AID research and development project which used radio to present basic arithmetic skills to rural children in the classroom, using innovative educational techniques. Scenes of radio mathematics lessons illustrate how curriculum and lesson plans were developed and how classroom teachers supported the program. Discussions of the project's staff and training requirements, cost factors, and evaluation show the potential of this model for use in other countries facing similar problems of poor-quality instruction in rural areas.

- A Way to Bridge the Distance. Filmed on location in Alaska, Guatemala, Tanzania, and the Philippines, this film explores four different strategies for delivering critical health information to remote areas: two-way radio, mass media campaigns, satellite-linked diagnostic assistance, and social marketing. The project cases illustrate how communications media are used to support and to educate rural health workers and to motivate villagers to change their behaviors. The film illustrates four fundamental requirements for effective use of communications technologies for development:
 - strong government commitment;
 - systematic planning based on needs and resources;
 - audience-testing of messages during program development; and
 - ongoing evaluation and use of findings to improve programs.

The two films, Radio Mathematics in Nicaragua and A Way to Bridge the Distance, have won Golden Eagle awards, given by the Council on International Nontheatrical Events (CINE), a program sponsored by the United States International Communication Agency (USICA). The awards recognize outstanding achievement in American non-commercial filmmaking, and mark productions as suitable for showing abroad as examples of American craftsmanship in this area.

Twenty copies were made in English of each of these films, along with multiple copies in French, Spanish, and Arabic.

2. Videotapes

The SFL contract also called for the production of two videotapes:

- A New Voice in the Village explores mass communication techniques to support nutrition education in a developing country. It uses as an example the Tunisia-based "Dr. Hakim" mass media project designed to improve infant nutri-

tion practices. Project personnel candidly discuss their experience in designing effective messages and in winning the support of their colleagues, who were often reluctant to test an innovative approach.

- Masagana 99: Promoting a Miracle. Begun in 1972, the Masagana 99 project was designed to increase rice production in the Philippines. The videotape explores the four parts of the project: researching new rice technologies; introducing a "no collateral" loan program for participating farmers; training farm extension workers; and systematically using mass media such as radio and print to inform the public about the program. The videotape focuses on the communication component of the project--especially the use of radio in farm extension programs. It describes how advertising techniques were interwoven with existing extension strategies to build public support for the program.

Masagana 99: Promoting a Miracle was accepted for entry into the international video festival, Video Roma '80, which was jointly sponsored by the Corporation for Public Broadcasting and the City of Rome Arts Council.

Each videotape was translated in French, Spanish, and Arabic.

3. Print Materials

A series of booklets and brochures has been developed to accompany the films and videotapes. An example of each is presented in Appendix B. They are intended to serve as guides to the information presented in the audiovisual material; they are not research papers or exhaustive treatments of the projects. Thus far, the following have been produced:

- Basic Village Education: 1,000 copies each in English, Arabic, French, and Spanish.
- Radio Mathematics: 1,000 copies each in English, Arabic, French, and Spanish.
- A New Voice in the Village: 500 copies each in French, Spanish, and Arabic; 1,000 copies in English.

The English and foreign-language versions of Masagana 99 are in production. The final brochure, A Way to Bridge the Distance, will be written and translated shortly.

4. Use of Information Series Products

These films, videotapes, and print materials have been used in a variety of ways to promote ST/ED's work in development communication. Under the terms of the contract, they have supported the other components of Studies in Facilitating Learning, particularly the seminars and planning activities. In addition, they have been used by a number of academic institutions, delineated in Figure II-1, as course materials in their communications programs.

FIGURE II-1
INSTITUTIONS USING SFL INFORMATION SERIES PRODUCTS
AS PART OF COMMUNICATIONS CURRICULUM

<u>RADIO MATHEMATICS</u> <u>IN</u> <u>N. CARAGUA</u>	<u>A WAY TO BRIDGE</u> <u>THE DISTANCE</u>	<u>COMMUNICATIONS FOR</u> <u>CHANGE</u>	<u>MASAGANA 99:</u> <u>PROMOTING A</u> <u>MIRACLE</u>	<u>A NEW VOICE IN</u> <u>THE VILLAGE</u>
Stanford University	Cornell University	Indiana University	Stanford	University of Wisconsin
University of Pennsylvania	East-West Communications Institute	University of Pennsylvania	Virginia Polytechnic Institute	Indiana University
Cornell University	Florida State University	Florida State University	Indiana University	Northwestern University
American University	Indiana University	East-West Communications Institute	Michigan State University	Cornell University
Florida State University	American University	American University	Northwestern University	Michigan State University
East-West Communications Institute	University of Toledo	Concordia University, Montreal	East-West Communications Institute	Stanford University
University of Western Ontario	Virginia Polytechnic Institute	University of South Pacific	Cornell University	East-West Communications Institute
Indiana University	University of Washington		University of Pennsylvania	University of Pennsylvania
University of South Pacific	University of Western Ontario		Florida State University	Florida State University
	University of South Pacific		University of South Pacific	University of South Pacific

AID has emphasized the utility of this application, as it improves the quality of training by introducing recent real-life examples.

The films and videotapes have also been presented at a number of international conferences and seminars, frequently at the request of ST/ED. They serve to inform a worldwide audience of decision-makers and program managers about AID's work in development communication, while acquainting these individuals with the potential benefits of using communications in their own programs. Following are several examples highlighting the use of the Information Series products; a fuller description of their use is contained in Appendix B.

Radio Mathematics in Nicaragua is shown often by Stanford University, the contractor of the project, to promote new applications of the instructional use of radio and to disseminate knowledge about the project. In Washington the film is shown frequently at the request of ST/ED for visitors interested in the project's innovative approach to teaching. Missions have requested the film to support their programs, including those in Kenya, Ecuador, Sri Lanka, Nicaragua, Botswana, and Guatemala.

Communication for Change, the Basic Village Education film, has been requested for screening by USAID Missions in Botswana and Zimbabwe as well as by the Ecuador Literacy Project, the AID-sponsored Rural Satellite Program, and several colleges and universities in this country.

A Way to Bridge the Distance was screened at the University of the South Pacific seminar and at the Botswana environmental sanitation planning conference sponsored under SFL. It was the initial presentation of the Third World health communications program at the WHO-sponsored Munich conference on health education by radio and television. As a result of this screening, members of the conference requested the film for viewing in their countries.

A New Voice in the Village was first used by Dr. Anthony Meyer of ST/ED at a seminar for some 30 AID nutrition officers, sponsored by the AID Office of Nutrition. The tape has since been requested by Northwestern University, the Annenberg School of Communication at the University of Pennsylvania, Indiana University, and the University of Wisconsin, among others.

Masagana 99: Promoting a Miracle was used as a focal case study in an agriculture and communication workshop in Jamaica in 1979, carried out under the seminar component of SFL. Liberian participants, impressed with the project, included ideas from the film in planning a subsequent AID-sponsored project which will use mass media to encourage rural development. It was also screened in November 1980 at the SFL conference in Botswana, to plan the USAID-funded Botswana environmental sanitation project. Masagana 99 was shown on national television in the Philippines; and it was selected to represent Philippine innovation in agriculture at the UNTAD conference in Manila. The Ministry of Agriculture in the Philippines has incorporated the videotape into its training program for extension workers.

D. COMMUNICATIONS SYSTEMS COST OPTIONS

This fourth component of the SFL contract calls for developing preliminary telecommunications systems configurations and calculating their costs to help

individual countries or regional groups identify cost-effective ways of increasing social service delivery systems. The countries are selected by AID, based on consideration of the country's intention to extend basic telecommunication services to rural areas and underserved groups or expand its own capacity to provide social service broadcasting in education, agriculture, nutrition, or health.

Under the direction of Dr. Heather Hudson, this component had three elements, as described in the SFL contract: defining a methodology; conducting analyses by country or region to test it; and providing on-call consulting services as required in this area.

The work in all three areas proceeded from the premise that the application of telecommunications to development requires an understanding not only of development needs but also of how telecommunications can be used--taking into consideration technical constraints, system costs, and options for integrating technologies with other services. Studies were required to determine the technical requirements for specific applications, the technology options for providing these services, and the capital and operating costs of the communications systems. For example, in the Sudan the planning task involved designing a communication system to support a rural primary health care delivery project. The result was a plan for a two-way, high-frequency radio system. In Indonesia, the requirement was for an educational radio system to replace distribution of audio cassettes. Several options were examined, with a satellite delivery system using Indonesia's PALAPA system found to be the most cost-effective.

At a more general level, a set of tools and procedures was developed under this component which together could be called a methodology for planning development communication systems. This methodology was developed by the Academy under a subcontract with EDUTEL and applied to case studies in North Yemen and the Philippines.

1. Element I: Development of Communication Planning Methodology (1978)

The purpose of this element was to develop a methodology for planning systems which would provide telecommunications services in support of development goals. This methodology was to be designed for use by AID officials who had no experience in telecommunications planning. It was intended to provide an overview of the approaches and information required to plan effective rural communications systems--a general guide to communications planning which could then be applied to specific country and project contexts.

The study includes an iterative approach methodology which outlines technical alternatives, formulation of objectives, and design tools. It provides a section on technical alternatives including satellites and a variety of terrestrial technologies including radio, open wire, and cable. It concludes with a section on planning guidelines for communications networks using typical developing country sites.

A preliminary application of the methodology was carried out for Bolivia using data available in the United States. Subsequently, these planning tools were applied in the Yemen and Indonesia case studies.

2. Element II: Studies of Particular Countries

Two studies were carried out under this element:

a. Use of Small Aperture Earth Stations in Yemen: Applications and Design Considerations for the ARABSAT System (1978)

As a result of an AIDSAT demonstration using ATS-6 in Yemen and a subsequent seminar under SFL, the government of North Yemen indicated interest in obtaining U.S. assistance to determine whether satellite communications should be considered as a means of improving Yemen's domestic rural communications. The timing was particularly appropriate as the ARABSAT satellite system was being planned, thus offering an opportunity to assist Yemen in defining its communication requirements and influencing the ARABSAT design. North Yemen was selected to be the first satellite planning case study under the EDUTEL subcontract for which the planning methodology developed as the first major product was to be applied.

The study examined Yemen's geography, population distribution, and rural communication requirements and proposed a system using satellite capacity which would meet Yemen's rural development needs. The report included an analysis of small earth station technology appropriate for Yemen, identified satellite design characteristics which should be incorporated in the ARABSAT system, and developed a comprehensive satellite-based rural telecommunications system for Yemen.

b. Case Study of Alternative Systems for Distribution of Educational Radio in Indonesia (1980)

The second case study completed under Element II of this component also involved applications of the communications planning methodology developed in Element I. The study resulted from USAID interest in helping Indonesia apply its domestic satellite system (PALAPA) to national development goals.

Estimates of cost options were developed for the delivery of educational programs throughout Indonesia by satellite and other forms of telecommunications. The study examined technical facilities, comparative costs, and trade-offs for each option. It also investigated the question of technical facilities required and estimated costs for an audio conferencing network.

3. Element III: Technical Support

Several activities were completed under this element:

a. Planning Documents in Support of USAID SYNCOM IV (1977-78)

In 1977 and 1978, USAID participated in a U.S. government activity involving the possibility of using a Hughes communication satellite, SYNCOM IV, for public service and/or international development use. An analysis of this proposal examined SYNCOM IV technical parameters; sample lease specifications; earth station cost matrix; elevation angles from various developing country locations; and procurement cost estimates for South American earth stations.

b. Draft Recommendations for USAID to Present to the U.S. WARC Delegation (January 1979)

This memorandum, prepared to inform the Department of State about AID recommendations for inclusion in the U.S. position for the World Administrative Radio Conference (WARC), was used in preparing a study for AID on U.S. and Third World development communication requirements to be taken into consideration at the WARC.

c. Modular Power Sources for Remote Earth Terminals (December 1977)

This memo presents the factors that must be considered in the design of remotely located telecommunication station power sources and conditions.

d. Photovoltaic Conversion of Solar Energy and Its Prospects for Developing Countries (March 1978)

This report assesses the present state of the art of photovoltaic conversion (PVS) with emphasis on its potential for application in developing countries.

e. Conceptual Framework for Preparation and Review of USAID Rural Satellite Project

This memorandum was to provide a framework for the conceptualization of AID's program to test the use of satellite communications to reach remote rural areas with critical development information. The memorandum included comments on the need for local involvement in the design of the project and in the selection, procurement, and installation of the hardware.

SECTION III

RESULTS OF THE STUDIES IN FACILITATING LEARNING PROGRAM

The impact of the Studies in Facilitating Learning program can be measured in terms of how the four project components were integrated to provide useful information and effective services to USAID Bureaus and Missions, and how many communications-related activities were planned and implemented as a result.

For several years prior to 1977, the Academy worked with ST/ED sponsorship to promote the effective use of communications technologies in development programs. The potential of these technologies to expand program outreach was examined and documented, as increasing evidence was gathered through actual field experience. The award of the SFL contract allowed the Academy, on behalf of ST/ED, to respond to the growing interest among AID Missions and developing countries in exploring how communications technologies could contribute to development. It also provided a vehicle through which the various ST/ED-supported entities within the Academy, such as the Clearinghouse on Development Communication, could collaborate in support of ST/ED goals.

Thus, the work performed under SFL should be reviewed not in terms of four isolated activities; rather, it was a comprehensive campaign, offering information and services, to promote a way in which the effectiveness of AID's programs might be enhanced. The integrated approach spelled out in the SFL contract ensured that the seminars would provide material for the design of information products; in addition, they would serve as catalysts for project planning studies or analyses of communications in particular development sectors. As information products became available, they were used to generate and focus discussion in seminars; they became important tools for informing the primary audience about development communication, encouraging requests for seminars and project planning missions. Planning studies have led to requests for seminars and workshops to continue a process begun by the visit of the planning team or to provide an opportunity for project participants to work out implementation details with help from technical specialists. Telecommunications costs and system studies were conducted in countries where applications planning was in process, i.e., planning on how to make the best use of communications infrastructure for development purposes.

There are several examples of projects which were designed and implemented following the delivery of products or services under SFL. In several instances, different components of the contract were involved over time.

A. LIBERIA

Like many other countries, Liberia realized during the 1970s that, despite increased efforts and larger budget allocations, it simply was not possible to train and support enough fieldworkers, extension agents, teachers, nurses, and other development workers to reach all of the people in rural areas with essential information and services in health, agriculture, nutrition, and education.

In the fall of 1977, participants from the Liberian ministries of education, health, and agriculture as well as local governments and other development-related ministries, attended a seminar on communication in development,

conducted by the Academy and AID and the Liberian Ministry of Information and Cultural Affairs, to study the systematic use of communications in development, discuss case studies on the use of communications in other developing countries, and engage in communication planning exercises.

In May 1979, a team of senior-level personnel from the Liberian development ministries, accompanied by an education and human resources officer from USAID/Liberia, participated in an SFL seminar in Jamaica, convened to review the use of radio in rural development programs. The team then visited Guatemala to observe the Basic Village Education Project. On their return to Liberia, members of the team formed a permanent working group, the task force on communications. Concurrently, a rural development task force was established which presented a comprehensive plan for decentralization, including development councils, committees, and action groups, from the national level to the local village level.

The task force, following discussions with USAID/Liberia, drew up the design for a rural information system in Liberia, using regional broadcast facilities. A Project Identification Document (PID) was completed. Following this step in December 1979, the Academy received a request from USAID/Liberia to provide technical assistance in developing the second stage of the project design cycle--the Project Paper (PP). In response, the Academy, under the SFL contract, organized a four-member team of communication planners to assist USAID/Liberia and the Liberian counterparts in preparing the technical design for the Rural Information System Project. The team was accompanied by a representative of ST/ED. In February 1980, the team's work began.

During this phase of the project, the specialists in radio communications hardware and software, communications planning, and nonformal education materials undertook a comprehensive analysis of the technical and operational feasibility of the project. The work of the team was concluded in March 1980. Suggestions with regard to administrative arrangements, techniques of program design, and the methods to be employed for project evaluation were incorporated into the design of the Project Paper. At this point, the Project Paper entered the internal AID review, approval, and funding process. The project emerged in the form of a Request for Proposal for Technical Assistance.

The Liberian Rural Informational System Project illustrates the project planning process from the conceptualization of an idea to its implementation. It is also an example of how the provision of different kinds of technical planning services during each stage of the project design cycle contributes to developing and refining a comprehensive rural development communication project. By providing information materials and such services as seminars and a planning team, an idea to introduce information services to the underserved rural populace of Liberia was translated into a workable and locally defined approach to achieve integrated rural development. From the initiation of the idea, through the Project Identification Document and Project Paper, to the issuance of a Request for Proposal, such services played a key role in reinforcing each other and contributing to the planning activities of the Liberians themselves.

B. OTHER CASE STUDIES

There are several other examples of the contribution of Studies in Facilitating Learning to the development of programs which use communications technologies to reach their objectives.

- In Guyana, a prototype two-way radio system was developed by an Academy planning team under SFL. Reaching ten remote sites, the system design considered hardware, administrative and instructional uses of the system, and evaluation methodology. The evaluation was continued under a contract between USAID/Guyana and the Academy. Currently, the system is being expanded to accommodate 35 sites, under a contract between the Mission and the MEDEX program at the University of Hawaii.
- In Yemen, a seminar to promote discussion about the potential applications of satellite-based communication systems to rural development prompted a request for planning assistance under SFL; and a more in-depth treatment of system configurations and related costs was produced under the cost options component.
- In Jamaica, a seminar promoting the use of radio to encourage rural development resulted in the planning and implementation of a program using the facilities and resources of the Jamaican Broadcasting Corporation to augment agriculture extension services.
- In Indonesia, planning and information services through SFL encouraged examination of ways in which the national satellite system, PALAPA, could be most effectively used for development purposes. Design work continues under the AID Rural Satellite Program.

As noted in Section II, other examples of continuation of work initiated under SFL are provided by Botswana, and the communications component of the environmental sanitation program there; the University of the West Indies, and its work to extend educational outreach and improve administrative services using satellite-based technology; and the Sudan, and the primary health care program now under way there.

The work under SFL has resulted in a number of communications programs that are now being planned or are already in progress. In addition, a worldwide community of decision-makers and planners at both the policy and implementation levels has been reached with information and, at their own request, services which relate to planning for the application of communication to development. The effects of these information materials and the planning assistance can only be measured over time, in terms of how many projects become operational and how effective they are in delivering social services in new and innovative ways. As development resources continue to dwindle and demand for services increases throughout the world, more cost-effective delivery mechanisms will continue to be investigated. The burgeoning potential of communications, as examined and publicized under Studies in Facilitating Learning, remains ripe for exploration.

C. GENERAL OBSERVATIONS OF THE STUDIES IN FACILITATING LEARNING PROGRAM

The Studies in Facilitating Learning program began with the basic assumption that communications technologies can make an important contribution to development. This is particularly true if one undertakes a comprehensive plan systematically applied to communications planning and implementation. To understand the SFL program, one must understand the basic components underlying this systematic approach to communications:

- Needs assessment and determination of audience characteristics.
What do target populations have to say about their own living conditions? How can planners capitalize on what they already know? How do they learn new information and practices? What is the best way to gather this information?
- Determination of content priorities and measurable objectives.
What information must be communicated at once? What are people saying about their priorities? How can desired outcomes be stated in such a way that program managers will know whether or not the intended purposes have been achieved?
- Survey of other message sources and analysis of context.
What are the different ways in which people get information? What is the influence of community leaders, friends, and relatives? How can conflict be avoided among sources of information?
- Media and format decisions.
What other channels of communication are available? Which are most appropriate? What is the role of, say, radio? What about folk art, singers, actors, dancers, and other forms of entertainment? What is known about people's preferences? Do they like lectures? interviews? radio novels?
- Program writing, pre-testing, and production.
How often should the same message be delivered to the rural audience? How can planners find out if the audience will comprehend a series of programs? What production techniques are appropriate to particular messages?
- Delivery, reception, and utilization.
If radio is used, will the broadcast signals be clear and free from interference? Can people be expected to listen in groups and to take part in discussion after the programs? How can group listening, discussion, and action be stimulated? How can monitors or animators be motivated to work with organized groups?

Evaluation, feedback, and system modification.

How does one know if selected communication strategies are working? How are the appropriate kinds of information gathered from the audience? What steps must be taken to modify communication activities?

The overall goal of the SFL program was not just the introduction of new communications hardware, but the spread of awareness about and adaptation of systematic communications planning to the practical needs of development. Two firm measures of success were essential to the SFL program:

- Increase in the size of the constituency for communications planning.
- Increase in the number of actual programs applying communications planning during the course of the project.

The Summary of this report suggests that on both counts the SFL program was effective.

The following observations stem primarily from these achievements. SFL was not after all an experimental project designed to compare one communications system with another, nor even to test the basic feasibility of systematic communications planning. The purpose of SFL was to disseminate an idea, diffuse an approach to planning, and promote widespread practical application of the concept. We learned that the integration of information programs, seminars, project planning resources, and long-term studies were effective in defining and supporting that special audience most likely to apply development communication strategies.

2. What Aspects of Communications do People Care about?

Communication affects the lives of all of us, from affluent consumers weighing the merits of videodisc against video cassette to rural farmers deciding between a radio with Double A or Size D batteries. The elements of communications technologies are so ubiquitous that frequently many go totally unperceived. However, ask a minister of health if he or she needs a radio design expert, or a minister of agriculture how satellites can improve fertilizer use, or an AID education officer if radio can teach mathematics, and the constituency for applied communications may well dissolve into a series of quizzical expressions. Selling an idea, an approach to using communication tools, is often a much more complicated problem than later selling the entire system. One important observation from the SFL program is simply that people are much more attracted to the innovative aspects of communications than to the systematic planning approach.

A second observation is that the first one does not always prove true. During the course of the SFL program, the constituency for communications technologies has grown in both size and sophistication. Many countries can now point with pride to one or another application of communication to development. But increased contact and experience have generated skepticism along with sophistication. The SFL seminars brought together practitioners who had gone beyond the first blush of enthusiasm and were now seeking answers to the difficult questions of continuity, audience fatigue, and dwindling resources. Tanzanians spoke of the difficulty in regularly conducting another

"Man is Health" or "Food is Life" campaign. They were earnestly searching for simple, more practical applications of communication to development. In Tunisia, the first excitement of Dr. Hakim's national media success was overshadowed by the need to diffuse more complex information and the imperative to continually generate audience appeal. Clearly, a second, third, and fourth generation of problems and challenges are developing among communication's growing constituency. There now exists a constituency which is bright and tough-minded, and it is fair to say that SFL contributed to this phenomena.

The third observation is that most development planners, whether seasoned or not, continue to see communications as a means to an end--a tool to promote agriculture, education, nutrition, primary health care, energy conservation, or responsible family planning. And in most cases, they are more interested in the goal than in the communications tool used to achieve it. SFL participants wanted to know how to reach more isolated people, how to promote a new project, how to reduce the costs of field extension workers, and how to generate more public support for their programs. Few expressed the need to use radio or television or satellites. This observation leads us to a second category of questions. How can we best persuade this broad audience that communications can be a useful development tool?

2. How to Persuade Those That Care and, Maybe, Those That Do Not?

a. First Distinguish Which is Which

Perhaps the most critical lesson reiterated during the SFL program was the importance of knowing whom you were talking to, what their interests were, and how communications might help them get their job done. A single approach was simply not applicable to all audiences. To convince experienced practitioners, the approach had to be practical, hardheaded, and cognizant of the limitations as well as the contributions of communications. For the novice, it was first necessary to be positive and sometimes sanguine about the benefits of communication. Interestingly, the basis for conversation in both cases was the technical content of the program to be developed and not the needs or the limitations of the communications hardware.

b. Know the Technical Language of Your Audience

Simply put, in discussing communications with a nutritionist, you need to know almost as much about nutrition as you do about communications. SFL began with a reasonable, but, in retrospect, facile assumption that most development professionals were able to draw relevant conclusions from experiences in sectors different from their own. The agronomist could learn about communication from experiences in health; the physician from experiences in education; the demographer from experiences in farm extension. This simply proved untrue. Each specialist wanted to hear about experiences in his or her own specialty and discounted the experiences in other fields as irrelevant or unintelligible. Understanding specific sectoral issues, then, became a major requirement for discussing communication.

While it was necessary to talk the same sectoral language, it was also critical to place advice in a specific geographical, social, and economic context. People wanted to know that the idea would work in their country, and again they were reluctant to draw much solace from experiences in other hemi-

spheres or even from neighboring countries. The tendency was to focus on differences rather than similarities. The principal task of SFL staff was to draw parallels, make bridges, and pose questions which led to a local solution and concrete projects. SFL tailored the experiences to specific situations and promoted sectoral foci for information, seminar, and planning components. A Way to Bridge the Distance is simply referred to by most viewers as "the health film," a fact indicating that they see its significance in a sectoral context. The Tunisian seminar, for example, was organized not around radio issues but around radio for nutrition education.

c. Match Ideas with Resources

If the goal was to stimulate greater use of communication in existing programs, then an effective approach was to match ideas with resources. Projects resulted most often when participants were able to identify personnel, money, and time to support new ideas.

It is our feeling, based on the SFL program experience, that no amount of exposure, training, or targeting is going to produce a project when resources do not exist to support it. Experience demonstrates that while communication is practical, it is also big business--it requires top-level commitment, serious discussion, and often the reallocation of scarce resources. The best programs resulted from situations in which both resources and relevant needs concided. Programs like those in Indonesia, Jamaica, Swaziland, and Peru all demonstrated this confluence of interests. But Liberia is perhaps the best example of how resources, needs, and information come together to produce a major new development communication initiative. Through a four-year effort of seminars, external visits, and planning workshops, the best experience in development communication was linked with AID and Liberian resources. The formal seminars were important, but equally important were the informal visits and discussions which transformed the formal experience into concrete plans supported with real resource commitment. SFL personnel often provided a key link between AID mission support, ministry approval, and participant planning. The ability to place communication needs in an administrative, financial, and resources context was essential to the overall success of the SFL program.

d. Intervene at a Variety of Levels

Finally, SFL clearly demonstrated the soundness of integrated information, planning, and training activities. Neither the seminars, the information products, nor the planning missions alone would have achieved the range of success attributable to the combination of services. The variety of services allowed SFL personnel to intervene at all levels, providing examples of applied communications, as well as planning major programs and even training local personnel. Most importantly, they provided a comprehensive and integrated approach for the diffusion of practical and tailored development communication alternatives.

Appendix A

Principal Academy Staff, Subcontractor Staff, and Consultants

By Contract Component

PRINCIPAL ACADEMY STAFF, SUBCONTRACTOR STAFF, AND CONSULTANTS

BY CONTRACT COMPONENT *

I. INFORMATION SERIES

<u>Academy Staff</u>	<u>Hearst Metrotone</u>	<u>Thirtyfive-Sixteen</u>	<u>User, Inc.</u>
Jill Merrick	Charles Shutt	Frank Maniglia	Vincent Durago
William A. Smith	John May	Robert Denny	
		Georg Voellmer	

<u>Consultants</u>	<u>Translators</u>	<u>Narrators</u>
Chapman Mott	Lili Packer	Ruby Dee
Sara Munger	Marie-Claire Bart	Diana Campillo
Barbara Searle	Saud Jallad	
Mary Lou Reker		
Patricia Mathews		
Arlene Horowitz		
Barbara Sutton		

II. COMMUNICATIONS PLANNING AND DESIGN STUDIES

<u>Academy Staff</u>	<u>Stanford University</u>	<u>Consultants</u>	<u>Frost Communi- cations, Inc.</u>
Peter L. Boynton	Dennis R. Foote	Edwir. Wallace	Edward G. Frost
Anna Casey-Stahmer		Stanley Burns	
Douglas Goldschmidt		Bonnie Caine	
		Michel Guite	
		Kenneth DeWire	
		Gerard Kenney	
		Richard Burke	
		David Wilson	
		Robert M. Morgan	
		Bela Mody	
		Joseph Child	
		Will DeHart	
		Judy Roberts	
		Victor Forsythe	

* Individuals are listed once only, under the component on which they primarily worked.

III. COMMUNICATIONS SYSTEMS COST OPTIONS

Academy Staff

Heather Hudson

EDUTEL

Albert Horley
James Janky
Hugh Paul

IV. SEMINARS IN COMMUNICATION FOR DEVELOPMENT

Academy Staff

Allan Kulakow

Consultants

Janet Alexander
Royal Colle
Anthony Dodds
Saud Jallad
T. El Amouri
Marion Zeitlin
Emile McAnany
David Freyss
Gordon Straub
Klaus Galda
Lawrence Meiller
Vicente de Jesus
Hilda Kokohirwa
George Bostick
Barbara Searle
Jeanne Bisilliat

Appendix B

1. Activities By Contract Component
2. Product Samples

Activities by Contract Component

I. INFORMATION SERIES

The Academy has received numerous requests from AID missions worldwide for the use of films and videotapes produced under the Information Series of the Studies in Facilitating Learning contract. The following constitutes a partial listing of these requests:

- USAID/Peru requested the Spanish-language videotape of Radio Mathematics for mission viewing.
- USAID/Jakarta requested that the English-language film version of Radio Mathematics be delivered to the document center of the Indonesian Institute of Science for screening by the national television authority for possible broadcast.
- USAID/Tunisia requested the French-language videotape of New Voice in the Village for permanent loan.
- USAID/Nicaragua loaned the Spanish-language videotape of Communication for Change for use in a seminar in Ecuador.
- USAID/Philippines borrowed the English-language videotape Communication for Change for mission use.
- USAID/New Delhi requested a copy of the English-language film A Way to Bridge the Distance for showing to the Ministry of Health in India.
- USAID/Haiti requested a copy of the French-language Radio Mathematics film to be shown to the agriculture mission.
- USAID/Egypt requested both the English and Arabic videotapes of A New Voice in the Village for a health project in Egypt.
- USAID/Morocco requested a French videotape of New Voice in the Village for showing at the mission.
- USAID/Abidjan requested an English videotape of New Voice in the Village for mission presentation.
- The director of the USAID/Ecuador mission requested the Spanish videotape of Radio Mathematics for mission use.
- USAID/Guatemala requested a Spanish videotape of Radio Mathematics for screening.
- USAID/Botswana requested the English videotape of Radio Mathematics for screening.

- USAID/Sri Lanka asked for a English-language film of Radio Mathematics for mission use.
- USAID/Nicaragua requested a Spanish-language film of Radio Mathematics for use by the Ministry of Education.
- USAID/Mali requested French versions of the videotapes for New Voice in the Village, Masagana 99, and the film Communication for Change for a nonformal rural education campaign.
- USAID/Jordan requested English-language videotapes of New Voice in the Village and A Way to Bridge the Distance in order to prepare a project paper.
- Radio Mathematics in Nicaragua was shown at the University of the South Pacific seminar conducted under SFL in Suva, Fiji, for representatives of the university, ILO, WHO, UNFPA, YWCA, ITU, and other resource people concerned with development in that area.
- The French version of Radio Mathematics in Nicaragua was shown at another SFL seminar in Bamako, Mali, in connection with devising a proposal for using development communication on a regional basis in the Sahel.
- The Agence de Cooperation Culturelle et Technique in Paris purchased a copy of the French Radio Mathematics in Nicaragua.
- The Sudan Gezira Board in Barakat, Sudan, used Radio Mathematics in Nicaragua in a training program for school teachers.
- A Way to Bridge the Distance has been requested by the AID Office of Public Affairs, Gabarone Health Services Development Project; AID's Near East Bureau, Office of Technical Support; National Academy of Sciences; an AID-sponsored conference on two-way radio for health; and the USAID Missions in Senegal, Guatemala, Tanzania, and the Philippines. Most recently, it has supported project planning for the AID Rural Satellite Program in Peru, Senegal, and the Philippines.
- Masagana 99: Promoting a Miracle was used by AID's Office of Agriculture within the Development Support Bureau; the Near East Bureau; and USAID/Philippines. Other requests for it have come from the Appalachian Community Services Network, Stanford University's Institute for Communication Research, and the World Bank. It has been shown to 60 agricultural information specialists from around the world at three six-week Department of Agriculture workshops on development and communications.

	<u>PRODUCTS</u>				
	<u>Radio Mathematics in Nicaragua</u>	<u>A Way to Bridge the Distance</u>	<u>Communication for Change (Basic Vil- lage Education)*</u>	<u>A New Voice in the Village</u>	<u>Masagana 99</u>
Produced 16mm, color film in English	x	x	n/a		
Number of copies of English film made	20	20	n/a		
Translated film into French number of copies made	5	20	5		
Translated film into Spanish number of copies made	10	20	10		
Translated film into Arabic number of copies made	5	10	5		
Transferred film to videotape/ English, number of copies made	8	8	n/a		
Transferred film to videotape/ French, number of copies made	8	8	n/a		
Transferred film to videotape/ Spanish, number of copies made	8	8	n/a		
Transferred film to videotape/ Arabic, number of copies made	8	8	n/a		

* The original Communication for Change film was produced under another contract. The products noted, however, were provided under the Information Series component of the Studies in Facilitating Learning contract.

PRODUCTS

	<u>Radio Mathematics in Nicaragua</u>	<u>A Way to Bridge the Distance</u>	<u>Communication for Change (Basic Vil- lage Education)</u>	<u>A New Voice in the Village</u>	<u>Masagana 99</u>
Produced color videotape in English				x	x
Number of copies of English videotape made				8	8
Translated videotape into French, number of copies made				8	8
Translated videotape into Spanish, number of copies made				8	8
Translated videotape into Arabic, number of copies made				8	8
Produced print brochure in English, number of copies made	1,000	**	1,000	1,000	**
Translated print brochure into French, number of copies made	1,000	**	1,000	500	**
Translated print brochure into Spanish, number of copies made	1,000	**	1,000	500	**
Translated print brochure into Arabic, number of copies made	1,000	**	1,000	500	**

** In preparation

II. COMMUNICATIONS PLANNING

AND DESIGN STUDIES

(Through June 1981)

Under this component of the Studies in Facilitating Learning contract, divided into Project Planning Studies and Studies of Communications in Development Sectors, a total of 19 activities were carried out as follows:

Project Planning Studies

- Options Analysis and Recommendations for a Communications Satellite Demonstration in North Yemen and Related Activities, January 1979.
- Communications Support for Primary Health Care Projects: Sudan, May 1979.
- The Rural Communications Services Pilot Project in Peru, December 1979.
- Two-Way Radio for Rural Health Delivery in Lesotho, January 1980.
- Liberia Rural Information System Project Planning Study, March 1980.
- Indonesia Satellite Pilot Project: Preliminary Planning Study, March 1980.
- Aide Memoire: A Rural AID Satellite Project in the Philippines, July 1980.
- Accelerated Impact Project, Rural Satellite Communications, USAID Senegal, September 1980.

Studies of Communications in Development Sectors

- Planning Assistance to the University of the West Indies, June 1978.
- Educational Technology Center, Indonesia, July 1978.
- Agricultural Communications in Africa, September 1978.

- Tunisian Dr. Hakim Project, March 1979.
- MEDEX Two-Way Radio Communications in Guyana, May 1979.
- Project Assistance in the Dominican Republic, September 1979.
- Satellite Project Management, December 1979.
- Two-Way Communications for Health Care Delivery, May 1980.
- Health Communications, April 1981.
- Educational Communications Planning, Zimbabwe, April 1981.
- Center for Development Communication, Botswana, June 1981.

III. COMMUNICATIONS SYSTEMS COST OPTIONS

(Through December 1980)

Under this component of the contract, divided into Methodological Development, Studies of Particular Countries, and Technical Support, a total of eight activities were carried out as follows:

Methodological Development

- Communications Planning Methodology, 1978.

Studies of Particular Countries

- Use of Small Aperture Earth Stations in Yemen: Applications and Design Considerations for the ARABSAT System, 1978.
- Case Study of Alternative Systems for Distribution of Educational Radio in Indonesia, 1980.

Technical Support

- Modular Power Sources for Remote Earth Terminals, 1977.
- Planning Documents in Support of USAID SYNCOM IV PROPOSAL, 1977-1978.
- Photovoltaic Conversion of Solar Energy and Its Prospects for Developing Countries, 1978.
- Draft Recommendations for USAID to Present to the U.S. WARC Delegation, 1979.
- Conceptual Framework for Preparation and Review of USAID Rural Satellite Project.

IV. SEMINARS IN INTERNATIONAL DEVELOPMENT

Under this component of the contract, the Academy has conducted or participated in the following seminars and conferences--five in Africa, three in the Caribbean, one in the Middle East, one in India, and one in Fiji at the University of the South Pacific--for a total of eleven:

- Regional Meeting on Human Resources Development of the Comité Permanent Interetats de Lutte contre la Secheresse dans le Sahel (CILSS), March 1978.
- Seminar in Radio Education, Caribbean Region, March 1978.
- Jamaica Radio Nutrition Education Seminar, June 1978.
- AID Regional Agricultural Officers Conference, September 1978.*
- Yemen Telecommunications Seminar, December 1978.
- Tunisian Seminar on Nutrition Education and Communication, February 1979.
- Jamaican Radio Rural Development Project, June 1979.
- University of the South Pacific Seminar, May 1980.
- Sahel Regional Rural Radio Seminar, October 1980.
- Multimedia Environmental Sanitation Project Seminar, November 1980.
- Conference on Research for Decisionmaking in Educational Media, December 1980.*

* Attendance to conference supported by the Studies in Facilitating Learning Contract.

Product Samples

The Basic Village Education Project: Guatemala

A New Voice In the Village

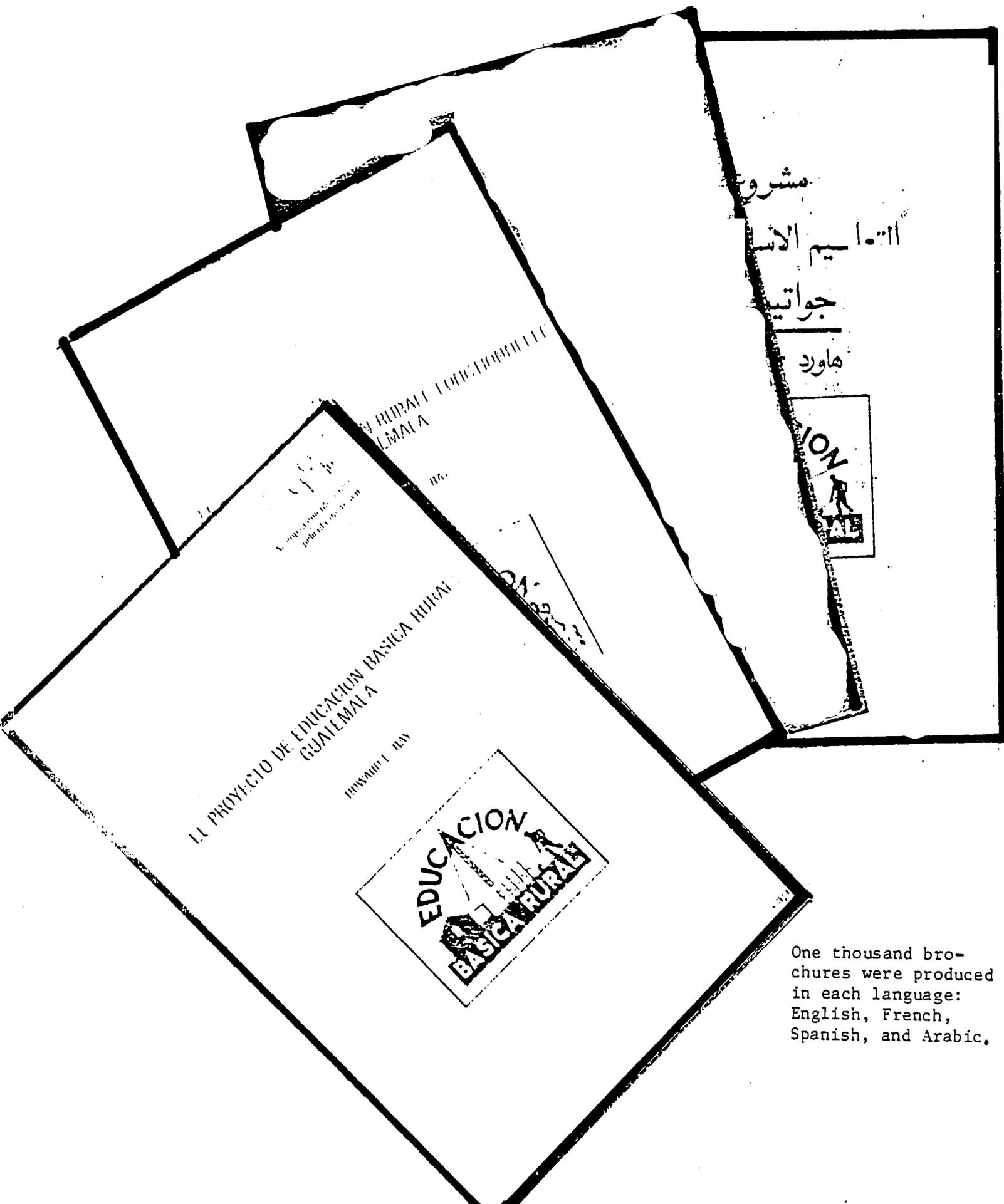
Radio Mathematics in Nicaragua

A Way to Bridge the Distance

Masagana 99: Promoting a Miracle

in English, French, Arabic, and Spanish

Copies of the enclosed materials are available
from the Office of Education, Bureau for Science
and Technology, Agency for International Development.

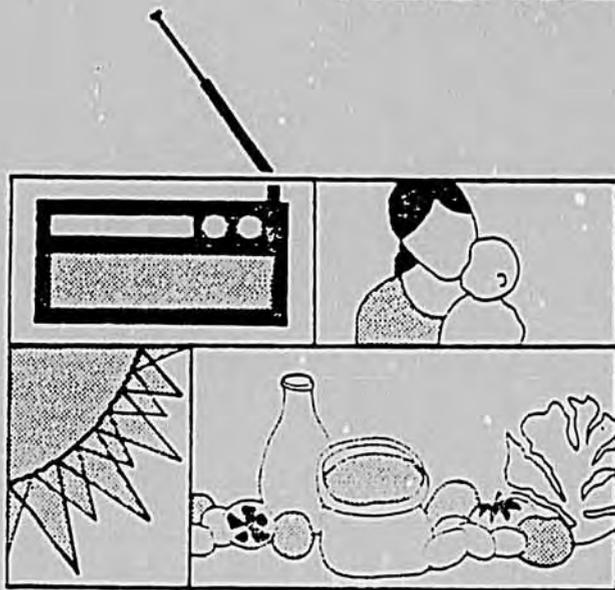


One thousand brochures were produced in each language: English, French, Spanish, and Arabic.



Accompaniment to
a VIDEOTAPE

A NEW VOICE IN THE VILLAGE



AED

ACADEMY FOR EDUCATIONAL DEVELOPMENT

A 3/4" color videotape available in English, French, Spanish, and Arabic from the:
Clearinghouse on Development Communication
1414 22nd Street, N.W.
Washington, D.C. 20037 U.S.A.
Tel. (202)362-1900
Cable: ACADED

A NEW VOICE IN THE VILLAGE

...examines the use of mass communication techniques to support nutrition education in a developing country.

This 3/4" videotape looks at the successful experience of the Dr. Hakim Mass Media Project conducted in Tunisia. New Voice focuses specifically on how the project improved infant nutrition practices. Project personnel candidly discuss their experience in designing effective messages and in winning the support of their often reluctant colleagues in testing this innovative approach.

The message design process is summarized in five steps:

- 1) defining a limited development problem and identifying a specific target audience;
- 2) conducting audience research and involving the target audience in program development;
- 3) pre-testing and revising draft messages under actual listening conditions;
- 4) carefully scheduling broadcasts;
- 5) systematically monitoring and evaluating the program.

A New Voice in the Village was produced by AED for people interested in how mass media and face-to-face instruction can be combined as an effective development tool.

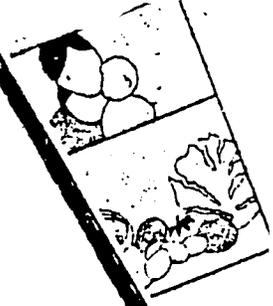
This videotape was produced with support from the Office of Education, Development Support Bureau, U.S. Agency for International Development.

Produced by the Academy for Educational Development, this videotape was translated into French, Spanish, and Arabic. Eight copies of each language -- English, French, Spanish, and Arabic -- were made of the videotapes.

Acompañamiento a
una VIDEOCINTA

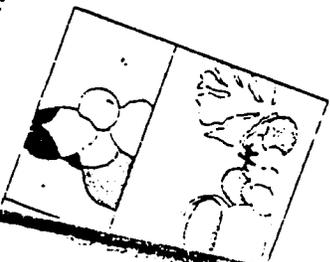
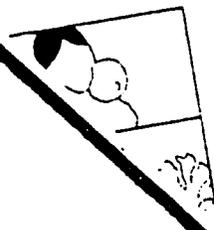
UNA
VOZ
NUEVA
EN
EL
PLEBLO
William

صوت
جليد
في
القرية
وليام. اسميث



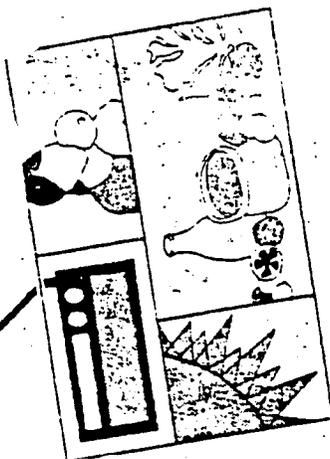
AED
HUMAN DEVELOPMENT

LA
NOUVELLE
VOIX
DU
VILLAGE
William A. Smith



AED

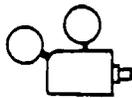
A
NEW
VOICE
IN
THE
VILLAGE
William A. Smith



October, 1978

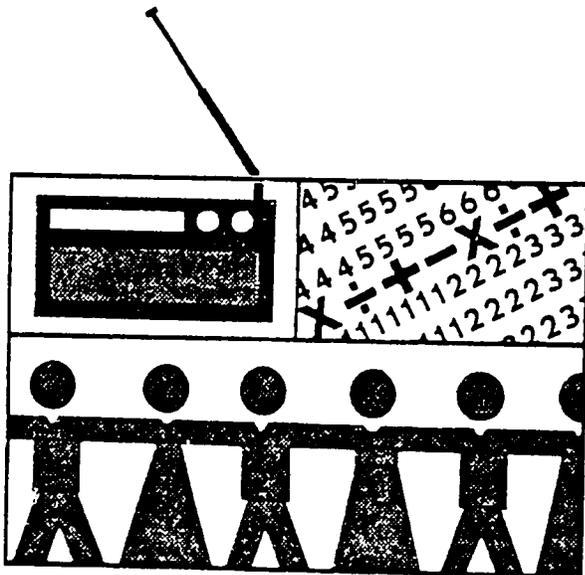
AED
HUMAN DEVELOPMENT

Five hundred
brochures were
produced in each
language: English,
French, Spanish,
and Arabic.



Accompaniment to
a 16mm FILM

RADIO MATHEMATICS IN NICARAGUA



RADIO MATHEMATICS IN NICARAGUA

...explores an innovative project that combined radio and systematic instructional design to teach primary school mathematics in a developing country.

Filmed on location in Nicaragua, Radio Mathematics discusses how the project succeeded in presenting basic arithmetic skills in a context relevant to rural children. Classroom scenes of Radio Math lessons illustrate how curriculum and lesson plans were developed, and how classroom teachers supported the programs. Discussion of the project's staff and training requirements, cost factors, and evaluation results show the potential of this model for use in other countries facing similar problems of poor quality instruction in rural areas. Children tested in the Radio Math program achieved significantly higher levels of learning than children taught by traditional methods.

AED

ACADEMY FOR EDUCATIONAL DEVELOPMENT

A 16mm film or 3/4" color videotape available in English, French, Spanish, and Arabic from the:
Clearinghouse on Development Communication
1414 22nd Street, N.W.
Washington, D.C. 20037 U.S.A.
Tel. (202)862-1900
Cable: ACADED

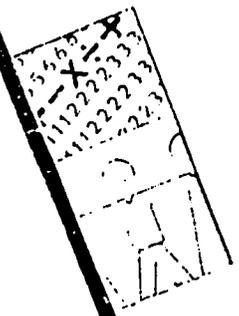
This film was produced by AED, with support from the Office of Education, Development Support Bureau, U.S. Agency for International Development, as part of a series on the use of media in international public service programs.

Produced by the Academy for Educational Development. 20 copies of this film were made in English, five copies in French, ten copies in Spanish, and five copies in Arabic. This film was transferred to videotape. Eight copies of each language -- English, French, Spanish, and Arabic -- were made of the videotape.

LEÇONS
MATHÉMATIQUES
AU
NICARAGUA

تعليم
الرياضيات
عن
طريق
الراديو
في
نيكاراجوا

Barbara W. Searle

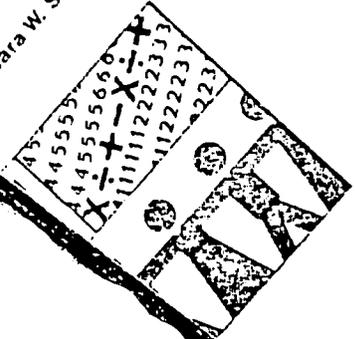


AED

99p
Acompañamiento a una
FOLIA de 16mm

MATEMÁTICAS
POR
RADIO
EN
NICARAGUA

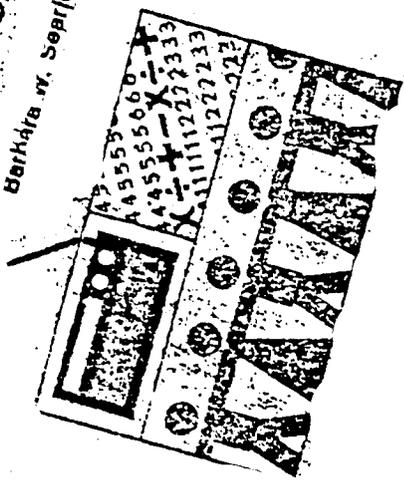
Barbara W. Searle



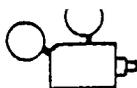
AED

RADIO
MATHEMATICS
IN
NICARAGUA

Barbara W. Searle

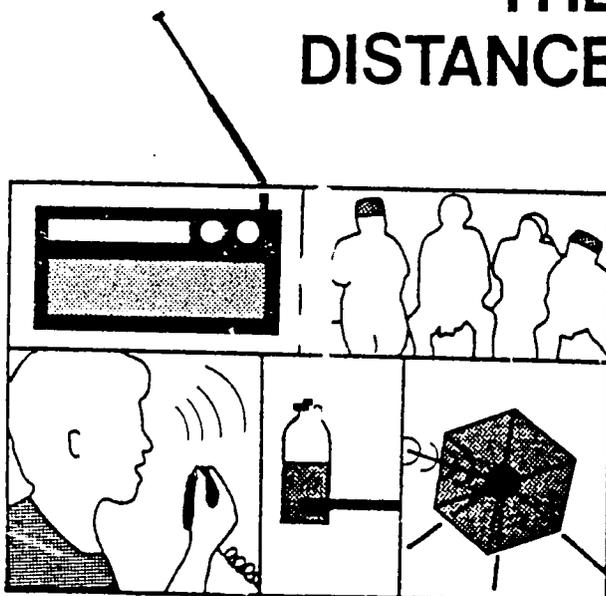


One thousand
brochures in each
language: English,
French, Spanish,
and Arabic.



Accompaniment to
a 16mm FILM

A WAY TO BRIDGE THE DISTANCE



A WAY TO BRIDGE THE DISTANCE

Filmed on location in Alaska, Guatemala, Tanzania, and the Philippines, A Way to Bridge the Distance explores four different strategies for delivering critical health information to rural villages. Two-way radio, mass media campaigns, satellite-linked diagnostic assistance, and social marketing are shown. The project cameos illustrate how communication media are being used to support and educate rural health workers and motivate behavior changes among villages in developing countries.

The film identifies the fundamental requirements for effectively using communication technologies for development:

- * strong government commitment
- * systematic planning based on needs and resources
- * audience testing of messages during program development
- * ongoing evaluation and using these findings to improve programs.

AED

ACADEMY FOR EDUCATIONAL DEVELOPMENT

A 16mm film or 3/4" color videotape available in English, French, Spanish, and Arabic from the:
Clearinghouse on Development Communication
1414 22nd Street, N.W.
Washington, D.C. 20037 U.S.A.
Tel. (202)862-1900
Cable: ACADED

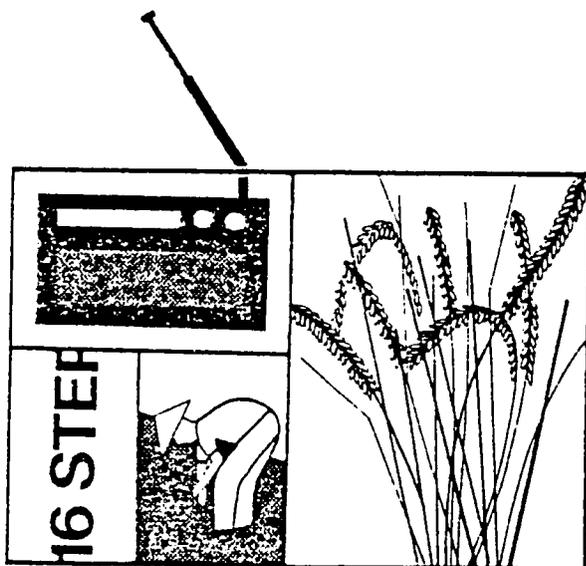
A Way to Bridge the Distance was produced by AED, with support from the Office of Education, Development Support Bureau, U.S. Agency for International Development, as one of a series on the use of media for international public service programs

Produced by the Academy for Educational Development, 20 copies each were made in English, French and Spanish. Ten copies were made in Arabic. This film was transferred to videotape. Eight copies of each language -- English, French, Spanish, and Arabic -- were transferred to videotape.



Accompaniment to
a VIDEOTAPE

MASAGANA 99: PROMOTING A MIRACLE



MASAGANA 99: PROMOTING A MIRACLE

Masagana 99 was a program begun in 1972 to increase rice production in the Philippines. The four-part program included conducting research on new rice technologies; creating a "credit without collateral" loan program for participating farmers; training farm extension workers; and systematically using mass media such as radio, print, and other promotional materials to inform the public about the program.

Masagana 99: Promoting a Miracle focuses on the communication component of the project, especially the radio and farm extension programs. It describes how advertising techniques were interwoven with traditional farm extension strategies to answer farmers' questions on cultivation and to create a national spirit for the program.

This 3/4" color videotape will particularly interest people concerned with how media can be used to link agricultural research with the application of new technologies by rural farmers.

AED

ACADEMY FOR EDUCATIONAL DEVELOPMENT

A 3/4" color videotape available in English, French, Spanish, and Arabic from the:
Clearinghouse on Development Communication
1414 22nd Street, N.W.
Washington, D.C. 20037 U.S.A.
Tel. (202)862-1900
Cable: ACADED

Masagana 99 was produced by AED, with support from the Office of Education, Development Support Bureau, U.S. Agency for International Development, as part of a series on the use of mass media for international public service programs.

Produced by the Academy for Educational Development, this videotape was translated into French, Spanish, and Arabic. Eight copies of each language -- English, French, Spanish, and Arabic -- were made of the videotapes.

Appendix C

Table 1: Estimated Level of Effort by Contract Component

Table 2: Estimated Expenditures by Contract Component :

Table 1

Estimated Level of Effort by Contract Component

(Through 3/31/81)

	<u>Person Months</u> (P/M)	<u>(Percent of Total P/M)</u>
<u>I. Information Series</u>		
Merrick	11.74	
Smith	7.54	
Consultants	2.79	
Management	<u>2.94</u>	
Subtotal	25.01	(19%)
<u>II. Planning Studies</u>		
Boynton	5.59	
Goldschmidt	6.94	
Casey-Stahmer	9.17	
Consultants	10.54	
Management	<u>2.62</u>	
Subtotal	34.86	(27%)
<u>III. Cost and System Studies</u>		
Hudson	20.49	
Management	<u>3.55</u>	
Subtotal	24.04	(18%)
<u>IV. Seminars</u>		
Kulakow	32.32	
Consultants	9.84	
Management	<u>5.57</u>	
Subtotal	47.73	(36%)
TOTAL	131.64	(100%)

Table 2

Estimated Expenditures by Contract Component

(Through 3/31/81)*

	<u>Information Series</u>	<u>Seminars</u>	<u>Planning Studies</u>	<u>Costs and System Studies</u>	<u>Total</u>
Salaries and Wages	82,226	155,796	116,847	77,898	432,767
Employee Benefits	15,687	29,722	22,291	14,861	82,561
Consultant Fees	17,200	32,589	24,442	16,295	90,526
Travel and Transportation	48,651	92,181	69,136	46,090	256,058
Other Direct Costs	25,021	47,409	35,557	23,705	131,692
Equipment	1,568	2,971	2,228	1,485	8,252
Subcontracts	164,231	--	124,655 **	149,539	438,425
Overhead	<u>45,610</u>	<u>86,418</u>	<u>64,813</u>	<u>43,209</u>	<u>240,050</u>
Total	<u>400,194</u>	<u>447,086</u>	<u>459,969</u>	<u>373,082</u>	<u>1,680,331</u>

* Estimate based on allocation of expenditures according to percentage of level of effort represented by each component.

** All Stanford and Florida State subcontract expenditures allocated to Planning Studies.