



United States  
Department of  
Agriculture

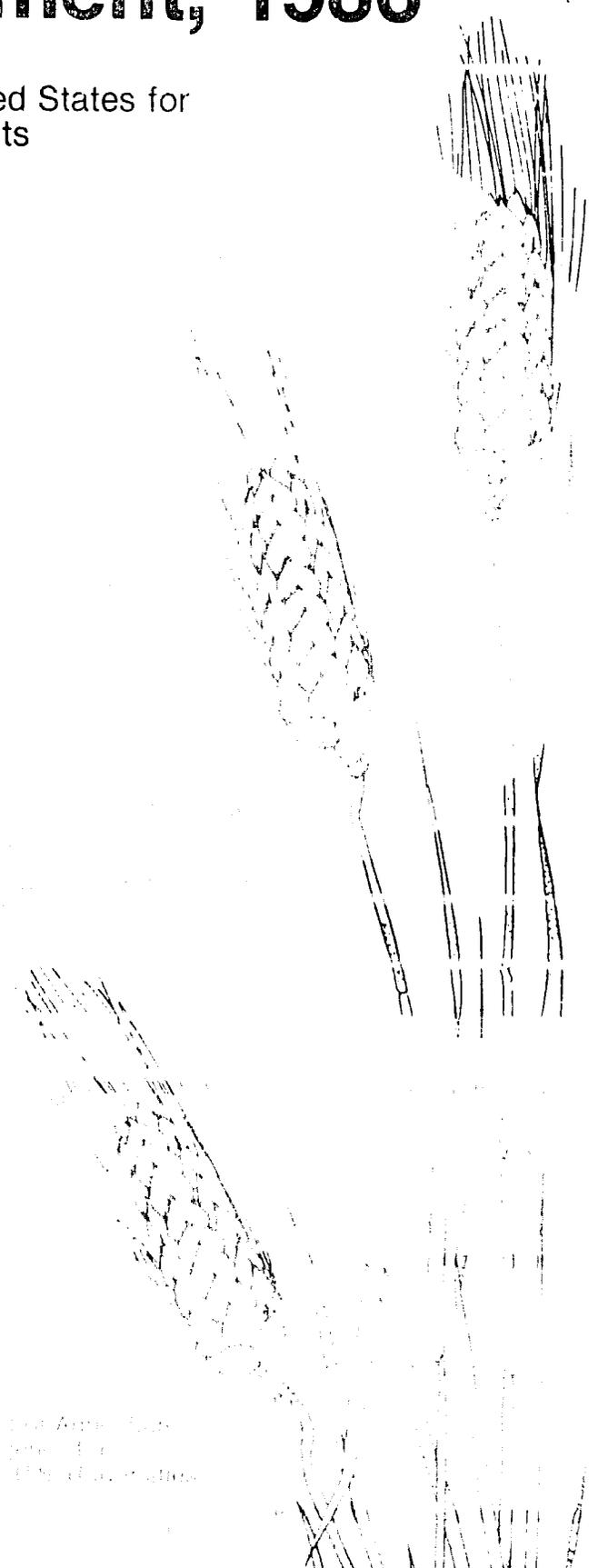
Office of  
International  
Cooperation and  
Development

Washington,  
D.C.  
20250

# Catalog of Courses in Agriculture and Rural Development, 1986

Programs in the United States for  
Foreign Agriculturalists

Co-funded by the U.S. Department of Agriculture  
in cooperation with the U.S. Agency for  
International Development and USAID/USAID/USAID





Dear Colleague:

In 1986, the U.S. Department of Agriculture (USDA) will again be offering developing nations some 50 courses in agriculture and rural development, as outlined in this catalog. Courses cover a broad range of subject matter, from technical agricultural fields to management, communication, and trainer development. They range from 2-13 weeks in length and include a mix of practical experience, field observation, and classroom activity. Trainees gain new knowledge and practical skills. Courses are highly interactive so participants can share ideas with each other. Judging by feedback we receive from past trainees and their sponsors, these programs are playing an important training role around the world. We hope they will be useful to you.

The costs for the 1986 courses have been listed as estimated costs. We will provide supplementary information on exact costs and course locations as soon as it becomes available from our cooperators. USDA does not have funding available and, therefore, cannot provide sponsorship to participants who attend these courses. We suggest that you contact the U.S. Agency for International Development, the Food and Agriculture Organization of the United Nations, the World Bank, your host government, or similar organizations for funding.

Courses conducted overseas are becoming increasingly popular and are cost effective. These courses focus on specific country needs and can be conducted in the local language. If you are interested in having any of the courses listed in this catalog presented in your country, or if you would like to have a new course designed, we would be happy to discuss this option with you.

These course offerings are part of a broad training service offered by USDA. For over 30 years, USDA has been assisting developing nations with academic placement, on-the-job training, observational tours, and a variety of other training programs in the United States. Last fiscal year, USDA assisted with U.S. training for 2,009 people from 101 countries, about half for academic programs and half for technical, nonacademic training. In addition, 570 people were trained in courses conducted in other nations. Further details on the types of training services available can be found on pages 4 and 5.

USDA stands ready to help developing nations utilize the various U.S. resources for training programs--USDA agencies, universities, agribusiness companies, private agricultural organizations, farmers, and others. If we can be of service, either through these courses or through individually tailored academic or technical program activities, please let me know (address on page 9). I also welcome your suggestions regarding our programs so that we can be of better service to you.

Sincerely,

Valdis E. Mezainis  
Director, International Training Division



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September 1985

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## CAPABILITIES OF THE INTERNATIONAL TRAINING DIVISION

### Programming or Arranging Training in the United States

Program specialists in the International Training Division (ITD) annually arrange and supervise training programs in the United States for some 2,000 foreign agriculturalists from developing nations. These programs cover a wide range of technical, scientific, and administrative areas. They include Ph.D. research programs, short-term specialized technical programs, and practical work in agencies or on farms. In arranging these programs, ITD calls upon the entire U.S. agricultural community and thus has the capacity to tailor programs to individuals or groups in almost all fields in agriculture and rural development. The support provided by ITD's program specialists includes program development, placement in universities or other organizations, program monitoring, payment of bills and allowances, and administrative arrangements.

### Specialized Courses in the United States

In response to needs identified in the developing world, ITD conducts and coordinates over 50 specialized courses in the United States each year. Participants develop skills they can apply to pressing country problems through varied training topics ranging from such technical areas as irrigation, seed improvement, and grain storage to managerial and policy areas such as project implementation and small farmer credit. Courses are conducted by experienced professionals and employ training methods that facilitate interaction among participants and help them develop practical skills. (See course descriptions elsewhere in this catalog for additional information.)

### Training Programs Conducted in Developing Countries

ITD offers specialized training programs upon request to sponsoring organizations overseas. Such programs include either established courses or specifically developed new courses as appropriate. This is an expanding dimension of ITD's activities. Overseas courses are cost-effective and give specialized training to selected groups with the least disruption to ongoing programs. Courses or programs 2 weeks to several months long have been prepared for staff levels ranging from operating technicians to deputy secretaries in ministries of agriculture. Overseas training has included programs in irrigation, swine production, project analysis, credit administration, marketing, communications, management of agricultural organizations, and trainer development. Recently, programs have been conducted in Jamaica, Kenya, Guyana, Cameroon, Lesotho, Nepal, Pakistan, Paraguay, Peru, Portugal, Indonesia, Tanzania, Zaire, Zimbabwe, and other nations.

### Managing Training Projects Overseas

Improving training resources and institutions in developing nations is critically important to agricultural development. As a key contribution to this area, U.S. staff can serve as managers, advisors, or trainers in the planning, development, and implementation of in-country training projects. ITD has been responsible for managing or advising on several large training projects overseas. Such projects are located currently in Tanzania, Indonesia and Portugal.

### Short-Term Experts

ITD provides professionals for short-term assistance in training and manpower surveys as well as planning integrated training programs. Such assistance in both managerial and technical areas includes design of training projects in Tanzania, assessment of human resource needs in the agricultural sector in Portugal, and development of short course training programs in Guyana.

### Strengthening Agricultural Organizations

In recent years, ITD has focused many of its resources on developing capability to strengthen agricultural organizations. Recognizing that managerial or technical competence is only one factor contributing to organizational effectiveness, ITD has undertaken projects that also strengthen other qualities. These include information, fiscal, and incentive systems; organizational structure; methods for setting goals and objectives; and staffing patterns, staff development, and retention. ITD can undertake such projects in a wide variety of agricultural organizations and has done so in countries such as Jamaica, Lesotho, and Bangladesh.

### Programs To Develop Trainers

Developing skilled trainers in a variety of technical and management areas is another important activity of the International Training Division. In specific instances, individuals or groups from key foreign ministries have been trained as trainers. They, in turn, have conducted successful low-cost programs in their own ministries. To increase the effectiveness of its programs, ITD includes the learning of training skills as a secondary objective in many of its technical and management courses.

### Research Opportunities in the United States

In cooperation with USDA Agricultural Research Service laboratories, ITD offers a program that allows foreign scientists to join their colleagues in research projects of mutual interest. This program helps scientists in the developing world to maintain their research skills at a high level and at the same time contribute to their field of specialization.

## GENERAL COURSE INFORMATION

### PARTICIPANTS

Courses are open to the staffs of agricultural and rural development institutions and organizations in developing countries. In their own countries, participants may fill such diverse roles as technicians, scientists, trainers, administrators, and policymakers. They may have varied subject matter backgrounds and wide ranges of experience in development positions.

### PHILOSOPHY AND DESIGN

The design of each course represents a belief that training situations should provide participants with sound technical knowledge and the opportunity to test and practice new skills and knowledge in practical situations. Thus, all courses offer a mixture of technical instruction, exercises, practice, and field observations.

Experienced professional staff will find the courses stimulating and challenging because they focus on issues affecting developing countries. Participants are encouraged to identify specific personal objectives within the course objectives, share their home country situations, and apply course resources to the realities they face at home. The courses will help them do so through small group work, relevant case studies and examples, illustrative field trips, and ongoing evaluations of the training offered. All course instructors have international experience and are selected for their knowledge of specific subject areas and their skill in facilitating adult learning.

Each course is designed for a specific level of academic knowledge and professional experience. Target audiences are indicated in the individual course descriptions. Participants should have the ability to participate fully in classes, exercises, and projects conducted in English. Where simultaneous translation is available, it is indicated in the course description. Cost estimates for translators will be furnished upon request.

### LOCATION

Courses conducted by USDA staff are held in a training center in the Washington, D.C., metropolitan area. Courses coordinated by USDA but conducted by a U.S. university are typically presented at that university.

### COURSE SEQUENCE

The schedule has been designed so that many of the courses can be taken in sequence. In addition, special sections of TC 110-19, "Communication Skills for Development Professionals," can often be scheduled to follow enrollment in other short courses. Future schedules will approximate the 1986 calendar to help with long-term planning.

**FUNDING AND FINANCIAL ARRANGEMENTS** Funding is arranged according to the sponsoring organization as follows:

- AID participants - Project Implementation Order for Participants (PIO/P) documentation is required.
- FAO fellowships - FAO Fellowship documentation is required.
- Other sponsors - The World Bank, country governments, and other sponsors should make checks payable to USDA/OICD for the training fees and pay maintenance allowance directly to participants. See individual course descriptions for complete information.

Training Fee. Cost totals for each course vary according to the items included as training expenses by each sponsoring organization. All training fees include course costs (such as staff, materials, and field trips) and administrative support (such as course enrollment procedures, health insurance, logistical arrangements, and assistance with relevant appointments and personal needs). In addition, orientation to the United States and to the Department of Agriculture is provided for all AID and FAO participants by the Washington International Center and USDA.

Specifically, training fees by sponsor are as follows:

- AID-sponsored participants: Course costs, Resources Support Services Agreement (RSSA) fee, course coordination fee, insurance, orientation at Washington International Center and professional society membership. Books and book shipment allowance will be issued with maintenance checks.
- FAO-sponsored participants: Course costs, administrative fee, course coordination fee and orientation at Washington International Center.
- Other participants: Administrative fee, course coordination fee, insurance, orientation at Washington International Center, and a professional society membership. An allowance for books and book shipment amounting to \$110 is included in the maintenance allowance paid directly to participants by the sponsor.

ALL CHECKS SHOULD BE MADE PAYABLE TO  
USDA/OICD.

Maintenance Allowance. The maintenance allowance for food, housing, and incidentals is calculated at \$60 per day for the first month and for field trips away from the training site. Washington-based courses continue for the duration of the course at \$60 a day due to the high costs of living in the area. The allowance at other sites is reduced to \$30/day after the first month. Governments and organizations that have their own policies with regard to maintenance allowances are encouraged to follow these policies.

Participants in senior-level courses 140-1, "Agricultural Policy;" 140-14, "Organization Development;" and 140-17, "Management and the Role of Women in Development" should be informed that the AID maintenance allowance has been established at \$60 a day, with no increase anticipated. While this amount is adequate to cover basic expenses, it may necessitate sharing a hotel room to stay within the \$60. Sponsors who wish to provide for single rooms for participants should provide additional maintenance allowance. AID missions that wish to request exceptional per diem for a participant should cable the person's name and rank at least 1 month in advance for AID/Washington approval.

#### ARRIVAL DATE AND ORIENTATION

Arrival date (call forward date) is scheduled 5 to 8 days prior to the actual course date to allow time for orientation and administrative processing. Both participants and instructors strongly agree that this lead time plays a critical role in the participants' readiness to begin an intensive course. During orientation, participants examine U.S. culture and customs, familiarize themselves with transportation, arrange permanent housing, and generally "settle in." Financial arrangements, visa problems, and other administrative matters are handled at this time. In addition, instructors often conduct individual interviews with participants to ensure that courses meet their needs.

When USDA is notified of scheduled arrival time in Washington, D.C, participants will be met at the airport by volunteers from the Washington International Center (WIC). WIC staff will assist with transportation and hotel arrangements at that time. Participants who need directions upon arrival in Washington may contact WIC at telephone number 332-1025 or OICD at 447-4711. Participants who arrive directly at the training site will be given an orientation there.

#### TRAVEL AND AIRLINE TICKETS

Training sites and orientation requirements have not been finalized. You will be notified by January 1, 1986 of these sites and what routing to use for reservations and ticketing. Pay close attention to the instructions. Several states have cities with the same or similar names. As an example, there is Fayetteville, North Carolina and Fayetteville, Arkansas.

## ENROLLMENT

Telex or write to reserve space for course candidates. For most courses, enrollment is on a "space available" basis. No application form is required to enroll in our courses. We require only that sponsors indicate which courses participants want to attend and send funding documents or payment, English language proficiency scores, and biographical information at least 2 months before the course starting date so that administrative processing can be completed prior to participants' arrival. Refer to course descriptions for information on any home-country data or materials that participants should bring for use during the course. In all cases, we suggest that participants bring information to help explain their organization and job responsibilities.

Telex or write to:

Valdis E. Mezainis  
Director, International Training Division  
Room 4118 - Auditors' Building  
Office of International Cooperation and Development (OICD)  
United States Department of Agriculture  
Washington, D.C. 20250  
USA

Telex address: AGRI/WASH 64334, Mezainis, OICD

## COURSE DESCRIPTIONS

### COMMUNICATIONS AND MEDIA STRATEGIES FOR AGRICULTURE AND RURAL DEVELOPMENT (USDA) TC 110-3

## TENTATIVE DATES AND DURATION

6 weeks: June 23 - August 1, 1986. Participants should arrive in Washington, D.C., on June 15 for course orientation and administrative procedures.

## TARGET AUDIENCE

Agricultural, nutrition, and livestock information specialists and others involved directly in the operation of nonformal education and outreach programs in agriculture and rural development. Designed for those needing a solid grounding in basic communications skills and knowledge. Not appropriate for those with a master's or doctoral degree in Communications.

## OBJECTIVES AND CONTENT

Participants will develop the knowledge and skills to: (1) analyze rural audiences and their problems, (2) develop measurable communications objectives, (3) select appropriate media, and (4) plan and develop multimedia communications projects for selected audiences.

This course focuses on analysis and planning of more effective rural communications systems in developing countries. Participants work in groups to design, and to produce significant portions of, multimedia communications projects for rural audiences. Participants receive training in the practical aspects of communications theory, audience analysis, media selection, message design, production, and evaluation. Each participant has the opportunity to increase production skills in one or two media during a 2-week field trip. Throughout the course, the emphasis is upon the resources and needs of the developing countries.

## OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined. To help focus on the situation and needs of individual participants, we request that participants bring samples of information materials from their organizations.

## ESTIMATED COSTS

- AID participants: Total of \$5,977 includes \$3,303 for training fee and associated costs and \$2,674 for maintenance allowance, books, and book shipment.
- UN/FAO participants: Total of \$5,667 includes \$3,103 for training fee and associated costs and \$2,564 for maintenance allowance.
- All other participants: Total of \$5,977 includes \$3,303 for training fee and associated costs payable to USDA, and \$2,674 for maintenance allowance, books, and book shipment payable directly to the participant.

## TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

## OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English and Spanish.

DEVELOPMENT AND OPERATION OF AGRICULTURAL EXTENSION PROGRAMS  
(USDA) TC 110-5

TENTATIVE DATES AND DURATION

- 9 weeks: Section I. Location not known -- June 9 - August 8, 1986. Participants should arrive in Washington, D.C., on June 1 for course orientation and administrative procedures.
- 10 weeks: Section II. Location not known -- September 1 - November 7, 1986. Participants should arrive in Washington, D.C., on August 24 for course orientation and administrative procedures.

TARGET AUDIENCE

Staff responsible for extension activities or other nonformal education programs.

OBJECTIVES AND CONTENT

Participants will develop the knowledge and skills to: (1) understand the role of extension in overall agricultural and rural development, (2) use extension techniques to transfer latest research findings to rural families, and (3) understand programs of other government and private groups, and the complementary roles played with extension. This course covers the roles of extension, research, and teaching in agricultural development and the roles of subject matter specialists, administrators, county agents, and various other extension staff and the methods they use to perform those roles. Other major topics include principles of administration and supervision, program planning and evaluation; and the interrelationships among extension, soil conservation, credit, and other agricultural programs. The course will emphasize how extension complements and is complemented by these programs. In addition, communication principles and methods and leadership theories will be examined. Two or 3 weeks of the program will be practical on-the-job experience with agents at the county level (2 participants per county). Conducted in English by the University of Missouri and the University of Wisconsin.

ESTIMATED COSTS

Section I

- AID participants: Total of \$7,479 includes \$4,049 for training fee and associated costs and \$3,430 for maintenance allowance, books, and book shipment.
- UN/FAO participants: Total of \$7,144 includes \$3,824 for training fee and associated costs and \$3,320 for maintenance allowance.
- All other participants: Total of \$7,479 includes \$4,049 for training fee and associated costs payable to USDA, and \$3,430 for maintenance allowance, books, and book shipment payable directly to the participant.

Section II

- AID participants: Total of \$8,483 includes \$4,415 for training fee and associated costs and \$4,068 for maintenance allowance, books, and book shipment.
- UN/FAO participants: Total of \$8,148 includes \$4,190 for training fee and associated costs and \$3,958 for maintenance allowance.
- All other participants: Total of \$8,483 includes \$4,415 for training fee and associated costs payable to USDA, and \$4,068 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English and Spanish.

APPLICATION AND DIFFUSION OF AGRICULTURAL RESEARCH  
RESULTS TO THE COMMUNITY LEVEL  
(USDA) TC 110-14

TENTATIVE DATES AND DURATION

6 weeks: May 26 - July 4, 1986. Participants should arrive in Washington, D.C., on May 18 for course orientation and administrative procedures.

TARGET AUDIENCE

Senior personnel responsible for research, policymaking, planning, and implementing outreach programs for small-scale farmers.

OBJECTIVES AND CONTENT

Participants will develop the knowledge and skills to: (1) diagnose their homecountry situations using social science theory and research findings, (2) select methods for disseminating agricultural research results from the laboratory to the community, and (3) plan the adoption of research findings in relation to the roles of researchers in institutions, extension and field workers, and target population groups. The course will focus on the planning, implementation, and evaluation of programs aimed at large-scale use of research knowledge to increase food production and improve marketing. The emphasis will be on social science theories about disseminating information and the use and diffusion of knowledge; how research is used in the farm sector; an examination of the roles of policy and administration, technicians and disseminators, farmers, and local organizations; and a review of communications and citizen participation in outreach programs.

The course uses case studies from developing nations extensively. Participants' own skills will be reviewed.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined. Participant's own skills will be reviewed.

ESTIMATED COSTS

AID participants: Total of \$5,762 includes \$3,209 for training fee and associated costs and \$2,553 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,452 includes \$3,009 for training fee and associated costs and \$2,443 for maintenance allowance.

All other participants: Total of \$5,762 includes \$3,209 for training fee and associated costs payable to USDA, and \$2,553 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English only.

TRAINING OF TRAINERS FOR AGRICULTURE AND RURAL DEVELOPMENT  
(USDA) TC 110-15

DATES AND DURATION

8 weeks: July 8 - August 30, 1985. Participants should arrive in Washington, D.C., on July 3 for course orientation and administrative procedures.

TARGET AUDIENCE

Trainers, instructors, and managers of training who work at in-service training programs, farmer training centers, training institutes, and outreach programs concerned with agriculture, livestock, home economics, nutrition, and integrated rural development.

OBJECTIVES

Participants will develop knowledge and skills to: (1) apply basic principles of adult education, (2) develop skills in assessing training needs and designing and implementing training sessions and programs, (3) become familiar with a wide range of training methodologies, (4) identify and demonstrate linkages between training skills and individual areas of specialization, (5) adapt training methods and strategies to existing conditions and needs in each individual's country, and (6) develop skills in managing training programs.

CONTENTS

This course focuses on the theory and practice of adult education. Emphasis will be on the identification of individual and group training needs and designing, delivering, and managing training programs responsive to these needs. Major topics will include establishing training goals, organizing the training inputs, transferring learning to reality situations, and improving training institutions. Participants will become aware of various learning styles and the use of appropriate training strategies to effectively respond to these different styles. Through micro training experiences, participants will develop or enhance their skills in several training methodologies including lecturing, case studies, simulations, and role playing. As a result of the micro training participants often develop training designs, outlines, and materials which they can use in their home countries.

OTHER INFORMATION

Conducted in English by USDA, university faculty, and consultants. Simultaneous interpretation is not available.

COST

AID participants: Total of \$8,411 includes \$4,701 for training fee and associated costs and \$3,710 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$8,101 includes \$4,501 for training fee and associated costs and \$3,600 for maintenance allowance.

All other participants: Total of \$8,411 includes \$4,701 for training fee and associated costs payable to USDA, and \$3,710 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English and Spanish.

AGRICULTURAL RESEARCH METHODOLOGY  
(USDA) TC 110-17

TENTATIVE DATES AND DURATION

7 weeks: June 2 - July 18, 1986. Participants should arrive in Washington, D.C., on May 25 for course orientation and administrative procedures.

TARGET AUDIENCE

Staff with an intermediate level statistical background who are or will be designing and carrying out agricultural research programs, including research related to agronomy, rural sociology, economics, forestry, plant pathology, horticulture, and animal science.

OBJECTIVES AND CONTENT

Participants will: (1) increase their ability to plan and conduct research giving consideration to potential users of research results and their needs; (2) learn research methodology, including data collection and analysis, with emphasis on applied research; (3) develop an understanding of the links between research and extension so they can use research results as a basis for action; and (4) observe field and laboratory procedures practiced by experiment station scientists.

This course covers general analytical methods and statistical techniques, includes an introduction to statistics, probability; binomial, multinomial, hypergeometric, and poisson probability functions; continuous random variables and the normal distribution; sampling and experimental design, estimating population parameters, hypothesis testing; one-way, two-way, and factorial analyses of variance; covariance analysis, correlation regression procedure, and lattice experiment. Specific applications are made to various subject areas, with a significant proportion of time devoted to practical "hands on" field experience. Computer applications will be included as appropriate. Includes one-on-one consultation with experiment station statisticians to develop specific expertise applicable to home countries.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$5,637 includes \$2,899 for training fee and associated costs and \$2,738 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,327 includes \$2,699 for training fee and associated costs and \$2,628 for maintenance allowance.

All other participants: Total of \$5,637 includes \$2,899 for training fee and associated costs payable to USDA, and \$2,628 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English and Spanish.

COMMUNICATIONS PLANNING AND STRATEGY  
(USDA) TC 110-18

TENTATIVE DATES AND DURATION

3 weeks: July 14 - August 1, 1986. Participants should arrive in Washington, D.C., on July 6 for course orientation and administrative procedures.

TARGET AUDIENCE

Program managers of any technical specialty who plan programs and projects related to agriculture and rural development. The course is especially designed for people who are not communications specialists (e.g., agronomists, livestock specialists, program administrators). Heads of communications programs could also benefit from the course, but operational level communications specialists would benefit more from TC 110-3, "Communications and Media Strategies for Agriculture and Rural Development."

OBJECTIVES AND CONTENT

Participants will develop knowledge and skills for planning communication and nonformal educational components as part of their program activities. The course will use case studies, the participants' own experiences, and material presented by faculty to deal with such problems as: how to develop appropriate communications strategies for different groups based on sectoral policies and available media, how to mobilize resources for communication programs, how to deal with the problems of backup and support for paraprofessionals, promoting community participation, and coordinating communication components in a decentralized service delivery system, and how to measure costs and results of communication activities. As a major project of the course, each participant will develop a communication plan and strategy appropriate to his/her own country situation.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$4,337 includes \$2,310 for training fee and associated costs and \$2,027 for maintenance allowance, books, and book shipment.  
UN/FAO participants: Total of \$4,027 includes \$2,110 for training fee and associated costs and \$1,917 for maintenance allowance.  
All other participants: Total of \$4,337 includes \$2,310 for training fee and associated costs payable to USDA, and \$2,027 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available in English for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations.

COMMUNICATION AND MANAGEMENT SKILLS FOR  
REENTRY AND INTRODUCING CHANGE  
(USDA) TC 110-19

TENTATIVE DATES AND DURATION

2 weeks: December 25, 1985 - January 4, 1987.

TARGET AUDIENCE

Mid-level technical or professional personnel who are undertaking academic or technical training in agriculture and related fields. Designed primarily to complement enrollment in other USDA courses or long-term programs. Additional dates can be scheduled on request to follow other USDA courses.

OBJECTIVES AND CONTENT

Participants will: (1) improve their understanding of basic communication and management processes relevant to their work and responsibilities, (2) plan for adaptation and use of their primary training, (3) develop strategies for introducing change in training, and (4) learn skills for working more effectively with family members and coworkers and others in their home communities and organizations.

The program focuses upon: (1) the communication process--perception, meaning, inference, feedback, overload, noise, stereotyping, message fidelity, receiver orientation, empathy, and listening--and how this process is used in interrelating people, information, projects, and organizations; (2) developing and maintaining effective working relationships with coworkers, supervisors, subordinates, and foreign counterparts; (3) the role of communication and management abilities in social change; and (4) strategies for reentry with particular reference to perceptions and expectations of family and coworkers, problems of overenthusiasm and haste, motivation and leadership, and sharing observations and suggestions by former participants.

OTHER INFORMATION

Conducted in English by university faculty and consultants.

ESTIMATED COSTS

AID participants: Total of \$1,813 includes \$1,093 for training fee and associated costs and \$720 for maintenance allowance.

UN/FAO participants: Total \$1,638 includes \$918 for training fee and associated costs and \$720 for maintenance allowance.

All other participants: Total \$1,813 includes \$1,093 for training fee and associated costs payable to USDA, and \$720 for maintenance allowance, payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, French, Portuguese, and Spanish.

IRRIGATION PROBLEMS AND PRACTICES  
(USDA) TC 120-1

TENTATIVE DATES AND DURATION

8 weeks: June 16 - August 8, 1986. Participants should arrive in Washington, D.C., on June 8 for course orientation and administrative procedures.

TARGET AUDIENCE

Irrigation practitioners with an educational background at the bachelor's or master's level in agronomy or agricultural engineering.

OBJECTIVES AND CONTENT

Participants will: (1) gain knowledge and practical experience in onfarm water management and crop production, (2) develop skills to plan, design, establish, and maintain new irrigation systems in their home countries.

For the first 5 weeks, the course is conducted primarily on the Colorado State University campus and includes lectures, field and laboratory practice, field training at the agronomy experiment station farm, and seminars centered on participant presentations of irrigation problems in their home countries. Topics covered include basic soils, soil-water-plant relationships, land leveling, irrigation methods and practices, administration and distribution of water, water law, water quality, salinity, drainage problems and remedies, economics and sociology of irrigation, and extension methods. The last 3 weeks of the course consist of field visits to irrigation programs and projects, including a rice production area.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$7,612 includes \$4,445 for training fee and associated costs and \$3,167 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$7,302 includes \$4,245 for training fee and associated costs and \$3,057 for maintenance allowance.

All other participants: Total of \$7,612 includes \$4,445 for training fee and associated costs payable to USDA, and \$3,167 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

TC 120-14 "Assessment and Improvement of Onfarm Irrigation Systems" is a similar course specifically designed for overseas presentation.

SOIL TESTING AND FERTILIZER MANAGEMENT  
(USDA) TC 120-5

TENTATIVE DATES AND DURATION

8 weeks: June 9 - August 1, 1986. Participants should arrive in Washington, D.C., on June 1 for course orientation and administrative procedures.

TARGET AUDIENCE

Agronomists or soil scientists with the equivalent of a bachelor of science degree who are involved in soil testing, soil fertility research, or fertilizer recommendation programs.

OBJECTIVES AND CONTENT

Participants will develop knowledge and skills to: (1) conduct soil sampling and analyses for nutrient needs, (2) plan and conduct fertility research in field experiments, (3) interpret results of soil analyses and field research for use in making fertilizer recommendations, and (4) develop a soil testing and fertilizer recommendation program for different crops and soil conditions.

This course focuses on classroom, laboratory, and field training in practical soil fertility management. Topics include soil sampling, analysis by different procedures based on soil characteristics, and use of fertilizers and lime for correcting nutrient deficiencies identified by soil tests. Laboratory experience with different procedures and equipment will be provided. Training will include information on soil classification as it affects fertility management. Field trips to experiment stations on different soil types and to other soil testing laboratories in Alabama and adjacent states will be arranged.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$7,315 includes \$4,375 for training fee and associated costs and \$2,940 for maintenance allowance, books, and book shipment.  
UN/FAO participants: Total of \$7,005 includes \$4,175 for training fee and associated costs and \$2,830 for maintenance allowance.  
All other participants: Total of \$7,315 includes \$4,375 for training fee and associated costs payable to USDA, and \$2,940 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English only.

TECHNICAL AND ECONOMIC ASPECTS OF SOYBEAN PRODUCTION  
(USDA) TC 120-6

TENTATIVE DATES AND DURATION

12 weeks: May 19 - August 8, 1986. Participants should arrive in Washington, D.C., on May 11 for course orientation and administrative procedures.

TARGET AUDIENCE

Agronomists with the equivalent of a bachelor of science degree who are involved in soybean research, production, or extension programs.

OBJECTIVES AND CONTENT

Participants will: (1) learn the technical and economic principles and practices of soybean production; (2) study the research, educational, and regulatory functions that support soybean production; and (3) consider expanding the production and use of soybeans in their own countries to alleviate the protein and calorie deficiencies in human diets.

Course topics include the characteristics of the soybean plant and its adaptability to different environments, soybean breeding and selection of varieties for varying conditions, cultural practices to improve soybean yields, seedbed preparation, time and rate of planting, inoculants and their use in nitrogen fixation; insect, disease, and weed control; and harvesting and storage for food, feed, and seed uses. All participants will conduct an individual field or library research project. This course is a unique opportunity for participants to study the U.S. soybean industry. Field trips are arranged to visit production areas and organizations that support the industry. Local trips are planned, as well as a 1-week midwest tour of businesses and organizations that furnish supplies and services to producers. Near the end of the course, 2 weeks are spent visiting prominent soybean scientists and their research facilities in the southeastern United States.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$9,370 includes \$5,505 for training fee and associated costs and \$3,865 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$9,035 includes \$5,280 for training fee and associated costs and \$3,755 for maintenance allowance.

All other participants: Total of \$9,370 includes \$5,505 for training fee and associated costs payable to USDA, and \$3,865 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English and Spanish.

SOYBEAN PROCESSING FOR FOOD USES  
(USDA) TC 120-7

TENTATIVE DATES AND DURATION

7 weeks: May 19 - July 4, 1986. Participants should arrive in Washington, D.C., on May 11 for course orientation and administrative procedures.

TARGET AUDIENCE

Food scientists, processors, and nutritionists with the equivalent of a bachelor of science degree who are interested in exploiting the potential of the soybean and expanding its use for human food.

OBJECTIVES AND CONTENT

Participants will: (1) identify processes involved in the use of soybeans and soybean products for human food, (2) study processing of whole soybeans, and (3) develop skills to use soybeans as an improved source of protein and calories in home countries.

This course teaches the principles of preparing human foods from soybeans. Emphasis is placed on the wide assortment of food products that can be made from the whole bean using its high protein and calorie content. Topics include an overview of the International Soybean Program, soybean production in developing countries, human nutritional requirements, functional properties of protein in food, quality control, management practices, problems in harvesting and handling raw soybeans, the use of soy protein and flour as an additive, and production and processing economics. In addition, there is extensive laboratory work, several local visits, and a 1-week field trip to midwest soybean companies to provide participants with practical "hands-on" experience.

The course examines industrial processes for converting soybeans into human food, as well as preparation methods based on small-scale home and village technology.

Participants will also attend the annual conference of the Institute of Food Technologists.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$6,434 includes \$3,599 for training fee and associated costs and \$2,835 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$6,124 includes \$3,599 for training fee and associated costs and \$2,725 for maintenance allowance.

All other participants: Total of \$6,434 includes \$3,599 for training fee and associated costs payable to USDA, and \$2,835 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English and Spanish.

RESOURCE DEVELOPMENT OF WATERSHED LANDS  
(USDA) TC 120-8

TENTATIVE DATES AND DURATION

6 weeks: June 9 - July 18, 1986. Participants should arrive in Washington, D.C., on June 1 for course orientation and administrative procedures.

TARGET AUDIENCE

For mid-level technicians and professionals engaged in the management and development of watershed lands in developing nations. For individuals with a bachelor of science or master of science in forestry or agriculture, or who work with water resources.

OBJECTIVES AND CONTENT

Participants will acquire the knowledge and skills necessary for the effective development, use, and management of water resources to increase food and fiber production. Watershed lands are habitable areas which do not include agricultural, urban, or reserve areas. Because production from these lands is linked with water, the course deals with the fundamentals of hydrology, including hydrologic measurement and predictive methods. The course presentation is supplemented by practical problems and demonstrations. Since most of the difficulties in developing the multiple products of watershed lands are social and economic, the course emphasizes those aspects of development. Other major areas include range assessment and management, soil and water conservation techniques, and natural resource economics and management.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$6,036 includes \$3,429 for training fee and associated costs and \$2,607 for maintenance allowance, books, and book shipment.  
UN/FAO participants: Total of \$5,726 includes \$3,229 for training fee and associated costs and \$2,497 for maintenance allowance.  
All other participants: Total of \$6,036 includes \$3,429 for training fee and associated costs payable to USDA, and \$2,607 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, Arabic, French, and Spanish.

LAND USE PLANNING IN NATURAL RESOURCE MANAGEMENT  
(USDA) TC 120-10

TENTATIVE DATES AND DURATION

6 weeks: May 19 - June 27, 1986. Participants should arrive in Washington, D.C., on May 11 for course orientation and administrative procedures.

TARGET AUDIENCE

Land use and regional planners, officials who establish or administer planning programs at the State or national level, and resource specialists whose duties include working on land use planning teams.

OBJECTIVES AND CONTENT

Participants will be able to: (1) define, analyze, and evaluate land use planning in the context of natural resource policy and management; (2) explain and give examples of principles, assumptions, and methods useful in developing objectives, gathering and analyzing data, and developing and evaluating land use alternatives; and (3) better understand the techniques used to analyze the social and economic impacts of alternative land uses. Participants will study the land use planning process including the challenge of effectively working on an interdisciplinary planning team. The course will emphasize the importance of and techniques used in understanding the social, cultural, physical, and biological environments in the land area for which a plan is developed. Participants should bring a case study from their home country on a potential or existing land use situation which they wish to work on during the course. Field trips will examine local and regional areas facing a variety of land use planning problems.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$7,027 includes \$4,127 for training fee and associated costs and \$2,900 for maintenance allowance, books, and book shipment.  
UN/FAO participants: Total of \$6,717 includes \$3,927 for training fee and associated costs and \$2,790 for maintenance allowance.  
All other participants: Total of \$7,027 includes \$4,127 for training fee and associated costs payable to USDA, and \$2,900 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English and Spanish.

ASSESSMENT AND IMPROVEMENT OF ONFARM IRRIGATION SYSTEMS  
(USDA) TC 120-14

DATES AND DURATION

4 weeks: Presented overseas only. Dates arranged with sponsor.

TARGET AUDIENCE

Agriculturalists such as engineers, agronomists, or extension specialists working directly with onfarm irrigation systems.

OBJECTIVES

Participants will develop knowledge and practical skills to: (1) examine farm irrigation practices and identify physical constraints and socioeconomic problems faced by farmers growing irrigated crops, (2) use field measurement techniques to evaluate the efficiency of water control and water use, (3) plan efficient irrigation practices for specific crops grown on particular soils to maximize yields and quality, and (4) evaluate irrigation methods and develop practical and economical improvements.

CONTENT

Specific topics covered during the course include: the relationship of efficient water use to farm water management, field surveys, general principles of flow measurement; movement, retention, and use of water; methods to determine soil moisture content, consumptive use of water and peak period use rates; surface irrigation methods, including field evaluation of such methods and factors important to the efficient operation of each method; and technological changes and institutional modifications to improve water quantity and quality as well as water management. Frequent field visits provide practical experience in collecting data, evaluating water management problems on farms, and planning improvements.

OTHER INFORMATION

Conducted by USDA in collaboration with university personnel and consultants.

COST

The cost of the course is approximately \$50,000. The budget covers instruction for about 25 participants and includes all course materials, salaries, and round trip air fare for course instructors and miscellaneous expenses. Costs are negotiated directly with the sponsor.

OVERSEAS AVAILABILITY

Course is designed exclusively for overseas presentation. Available in English, French, Spanish, and Arabic. A similar course designed for U.S. presentation is TC 120-1, Irrigation Problems and Practices.

WATER MANAGEMENT AND RUNOFF FARMING METHODS FOR SMALL SCALE AGRICULTURE  
(USDA) TC 120-25

TENTATIVE DATES AND DURATION

4 weeks: July 14 - August 8, 1986. Participants should arrive in Washington, D.C., on July 9 for course orientation and administrative procedures.

TARGET AUDIENCE

Agricultural personnel with a bachelor of science, master of science, or doctorate in plant sciences, soils, agricultural engineering, or range management; and other personnel interested in small scale water management and runoff farming.

OBJECTIVES AND CONTENT

To provide participants with the knowledge and skills necessary for the effective design, development, operation, and maintenance of small scale water management and runoff farming facilities that can increase agricultural production in arid and semiarid areas. Major topics to be included are the hydrology of runoff farming/water harvesting, small-scale water management technology, soil and topographic considerations, crop selection, design criteria, and the operation and maintenance of small-scale facilities.

The course will include lectures, laboratory exercises, group discussions, practical field experience, problem solving, and observation field trips.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$4,629 includes \$2,546 for training fee and associated costs and \$2,083 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$4,344 includes \$2,371 for training fee and associated costs and \$1,973 for maintenance allowance.

All other participants: Total of \$4,629 includes \$2,546 for training fee and associated costs payable to USDA, and \$2,083 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English and Spanish.

SEED IMPROVEMENT  
(USDA) TC 130-3

TENTATIVE DATES AND DURATION

9 weeks: June 2 - August 1, 1986. Participants should arrive in Washington, D.C., on May 25 for course orientation and administrative procedures.

TARGET AUDIENCE

Agricultural ministry and other staff involved in the establishment, development, or promotion of improved seeds.

OBJECTIVES AND CONTENT

Participants will: (1) develop knowledge and skills needed to establish or develop a seed improvement program in their home country or state, (2) learn to assume greater responsibility and leadership in promoting the use of good seeds by farmers, and (3) practice methods, procedures, and skills to teach and train others in seed improvement. This course focuses on the role of seed technology in agricultural development. Participants will study the organization and implementation of a seed technology program including improved seed, its production, and use. In addition, attention will be given to the various educational, research, and other organizations that produce seed and promote adoption of improved varieties. Emphasis will be on the role of the land-grant university system; and classroom, laboratory, and field tours will be used in that phase of the course. Participants will learn methods and problems of storing, handling, and distributing improved seed through visits to commercial seed companies. They will also learn to develop education and extension programs in their home countries. The first 5 weeks are intensive instruction at the university and the last 4 weeks are devoted to field tours. Participants are encouraged to concentrate on the problems of their home countries.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$8,432 includes \$4,755 for training fee and associated costs and \$3,677 for maintenance allowance, books, and book shipment.  
UN/FAO participants: Total of \$8,097 includes \$4,530 for training fee and associated costs and \$3,567 for maintenance allowance.  
All other participants: Total of \$8,432 includes \$4,755 for training fee and associated costs payable to USDA, and \$3,677 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Not available for overseas presentation.

RANGE MANAGEMENT AND FORAGE PRODUCTION  
(USDA) TC 130-4

TENTATIVE DATES AND DURATION

9 weeks: May 26 - July 25, 1986. Participants should arrive in Washington, D.C. on May 18 for course orientation and administrative procedures.

TARGET AUDIENCE

Range and livestock officers, extension specialists, teachers and professors, technicians, and farmers.

OBJECTIVES AND CONTENT

Upon completion of the course, participants will be able to: (1) develop systems for range inventories and delineating range sites, (2) select appropriate range inventory and sampling procedures for specific range areas, (3) evaluate and relate the different components of range ecosystems, (4) plan efficient improvements for various range settings, (5) plan and evaluate grazing management schemes for various purposes, and (6) consider and implement range management plans in situations where there are competing and complementary land uses.

The course provides participants with a framework for range development and planning, emphasizing extensive range production. Topics include identification of vegetation types; range site classification; remote sensing, mapping, and range surveys; determination of range carrying capacity, use patterns, and forage utilization; reseeding for improved and increased production; control of undesirable vegetation, water development, range research and education; and the reproductive physiology of domestic livestock. Field trips illustrate the variety of range production systems, both intensive and extensive, needed in differing climates.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$7,671 includes \$3,963 for training fee and associated costs and \$3,708 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$7,336 includes \$3,738 for training fee and associated costs and \$3,598 for maintenance allowance.

All other participants: Total of \$7,671 includes \$3,963 for training fee and associated costs, payable to USDA, and \$3,708 for maintenance allowance, books, and book shipment, payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, Arabic, and French.

PLANT QUARANTINE  
(USDA) TC 130-5

TENTATIVE DATES AND DURATION

8 weeks: August 4 - September 26, 1986. Participants should arrive in Washington, D.C., on July 30 for course orientation and administrative procedures.

TARGET AUDIENCE

Technicians who work with government, advisory, and regulatory activities in plant and animal protection by regulating and monitoring imports and conducting quarantines. Candidates should have knowledge of entomology, plant pathology, and administrative and practical functions relating to plant quarantine.

OBJECTIVES AND CONTENT

Participants will: (1) study the need for plant and animal inspection work on a national basis, and the fundamental concepts of plant pest control and enforcement; (2) learn port inspection techniques, regulations and procedures involving animal byproducts, fumigation and other treatment procedures; and (3) develop skills in identifying insects, plant diseases, nematodes, snails, and mites. Course topics include identifying different pests and understanding the vehicles or hosts which transport them; studying and performing treatments at ports of entry including fumigation and other treatment; learning basic quarantine procedures, such as restrictive orders, regulations, and administration; and reviewing and discussing with U.S. inspectors and officials various ways to improve quarantine procedures in their home countries. The course is similar to the training required of U.S. entomologists before they become inspection officers. Visits will be made to a university and private company laboratories to become familiar with the latest detection and treatment methods.

OTHER INFORMATION

Conducted in English by USDA personnel from the Animal and Plant Health Inspection Service. Simultaneous interpretation is not available.

ESTIMATED COSTS

AID participants: Total of \$7,365 includes \$3,495 for training fee and associated costs and \$3,870 for maintenance allowance, books, and book shipment.  
UN/FAO participants: Total of \$7,055 includes \$3,295 for training fee and associated costs and \$3,760 for maintenance allowance.  
All other participants: Total of \$7,365 includes \$3,495 for training fee and associated costs payable to USDA, and \$3,870 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, Spanish and French.

INTEGRATED PEST MANAGEMENT (IPM)  
(USDA) TC 130-8

TENTATIVE DATES AND DURATION

6 weeks: June 9 - July 18, 1986. Participants should arrive in Washington, D.C., on June 9 for course orientation and administrative procedures.

TARGET AUDIENCE

Technical staff involved with plant and animal protection programs or insect eradication efforts. This includes scientists researching new techniques or extension entomologists working on single or integrated pest control systems.

OBJECTIVES AND CONTENT

Participants will: (1) review basic principles of agricultural production and various pest programs, (2) learn the concepts involved in an integrated pest management system and its component parts, and (3) learn how to conduct a pest management school. Participants will learn concepts used in an IPM model for the United States and work individually with specialists in either basic research, extension, and/or IPM systems research. They will visit projects in several states that demonstrate parts of the model, and develop a model for their own country. Some of the components include identification of pests, tactics for control, and determination of economic threshold for each pest, and whether it is plant pathogen, nematode, insect, or weed. Interaction of all pests is measured within the context of different water, fertilization, weather, and environmental factors to determine what systems and strategies should be used. The course emphasizes how IPM can better unite basic research with an extension delivery system. The application of IPM principles to small farms will be stressed.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

COST

AID participants: Total of \$6,298 includes \$3,403 for training fee and associated costs and \$2,895 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,988 includes \$3,203 for training fee and associated costs and \$2,785 for maintenance allowance.

All other participants: Total of \$6,298 includes \$3,403 for training fee and associated costs payable to USDA, and \$2,895 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, Spanish and French.

INTENSIVE POULTRY PRODUCTION SYSTEMS  
(USDA) TC 130-9

TENTATIVE DATES AND DURATION

7 weeks: May 19 - July 4, 1986. Participants should arrive in Washington, D.C, on May 11 for course orientation and administrative procedures.

TARGET AUDIENCE

Technical officers, extension specialists, and others directly involved in poultry production programs.

OBJECTIVES AND CONTENT

Participants will: (1) increase their knowledge and skills in poultry breeding, nutrition, and disease prevention and control; and (2) develop an understanding of new and alternative techniques of poultry production management that can improve dietary and economic conditions.

This course focuses on how poultry production can be used to improve diets and increase the income of farm families. Course content includes basic principles of poultry production, including breeding, feeding and nutrition, disease prevention and control, types of incubators, egg handling and storage, rearing and managing broiler and layer birds, and turkey production. Field trips will offer opportunities to analyze both large and small commercial operations.

OTHER INFORMATION

Course is conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$6,473 includes \$3,795 for training fee and associated costs and \$2,678 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$6,163 includes \$3,595 for training fee and associated costs and \$2,568 for maintenance allowance.

All other participants: Total of \$6,473 includes \$3,795 for training fee and associated costs payable to USDA, and \$2,678 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, Spanish, and French.

SMALL RUMINANT PRODUCTION TECHNIQUES  
(USDA) TC 130-10

TENTATIVE DATES AND DURATION

6 weeks: June 16 - July 25, 1986. Participants should arrive in Washington, D.C., on June 8 for course orientation and administrative procedures.

TARGET AUDIENCE

Technical specialists and extension and production personnel who are concerned with the production and management of goat and sheep herds.

OBJECTIVES AND CONTENT

Participants will develop knowledge and skills to: (1) operate and manage sheep and goat production programs, (2) operate and manage grazing and confinement systems, (3) manage and improve rangeland, (4) select and breed sheep and goat herds for improved production, (5) formulate nutritionally sound rations utilizing available home country feeds, (6) diagnose diseases and develop disease prevention and control strategies, and (7) develop and expand markets for animal products.

This course teaches the fundamentals of producing and managing goat and sheep herds for meat, milk, and wool production. It will cover practical knowledge and techniques in the following areas: selection and breeding including visual appraisal and records, calculating rations including range forages and supplementation; disease management techniques, drenching, and parasite control; management techniques such as recordkeeping, data analysis, and water and range development; production and marketing of meat, milk, wool, hides; and reproductive physiology and management. Open grazing and confinement systems and different environmental conditions will be examined in field trips.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$5,771 includes \$3,063 for training fee and associated costs and \$2,708 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,460 includes \$2,862 for training fee and associated costs and \$2,598 for maintenance allowance.

All other participants: Total of \$5,771 includes \$3,062 for training fee and associated costs payable to USDA, and \$2,708 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, Spanish, and French.

VEGETABLE CROP PRODUCTION AND MARKETING  
(USDA) TC 130-11

TENTATIVE DATES AND DURATION

8 weeks: June 30 - August 22, 1986. Participants should arrive in Washington, D.C., on June 22 for course orientation and administrative procedures.

TARGET AUDIENCE

Technical officers, extension specialists, community and rural development specialists, and others directly involved in the production and marketing of vegetable crops.

OBJECTIVES AND CONTENT

This course will increase the participants' knowledge of different vegetable crops, seed improvement, production, handling practices, and other factors that influence produce quality. It will also review methods for distributing vegetable products from the producer to the consumer.

This course provides training in the principles of production, harvesting, and marketing of vegetable crops. Course topics include characteristics of the various types of vegetables and their adaptability to different climates; soil management; varietal screening and selection; cultural practices and conditions affecting vegetable quality; harvesting techniques; product standards and grading; and proper methods for the handling, storage, and shipping of different vegetable crops. The course will also cover marketing principles, labor use, farm machinery, recordkeeping, cooperatives, and risk evaluation.

OTHER INFORMATION

Course is conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$8,075 includes \$4,245 for training fee and associated costs and \$3,830 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$7,765 includes \$4,045 for training fee and associated costs and \$3,720 for maintenance allowance.

All other participants: Total of \$8,075 includes \$4,245 for training fee and associated costs payable to USDA, and \$3,830 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, French, and Spanish.

AGRICULTURAL POLICY SEMINAR  
(USDA) TC 140-1

TENTATIVE DATES AND DURATION

4 weeks: June 16 - July 11, 1986. Participants should arrive in Washington, D.C., on June 8 for course orientation, administrative procedures, and Washington-based portion of the course (June 9-13).

TARGET AUDIENCE

Senior level agricultural policymakers such as Permanent Secretaries, Ministers of Agriculture, Assistant Secretaries, Deputy Ministers, Senior Agricultural Officers, Deputy Chief Agricultural Officers, and senior legislators who deal with agricultural policy.

OBJECTIVES AND CONTENT

Participants will develop the knowledge and skills to: (1) evaluate the policy-making process, (2) identify major national goals with respect to the agricultural sector, (3) resolve goal conflicts, (4) evaluate alternative courses of action to resolve major problems, and (5) select appropriate analytical techniques to provide information for better solutions to policy problems.

The seminar focuses on substantive policy matters and policy determination and implementation. The seminar topics include the role of agricultural policy decisions in social and economic development, how agricultural policies are formulated and implemented, discussions of major policy issues such as food and population issues, marketing issues, land reform, resource conservation policies, price policy for agricultural commodities, tax policy, import-export policies, development and diffusion of new technology, and other issues raised by participants, the interdependence among selected policy issues, and field visits to allow participants to observe how national decisions on agricultural policy are implemented at the local level. Please note that the first week in Washington (June 9-13) includes important visits to agencies within USDA responsible for developing data on which policies are formulated and to the Agriculture Committees of the U.S. Congress, private agricultural research organizations, and lobbying organizations interested in shaping agricultural policies.

OTHER INFORMATION

Conducted in English by USDA and a U.S. university. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

Please refer to Maintenance Allowance information on page 8.

AID participants: Total of \$4,985 includes \$2,835 for training fee and associated costs and \$2,150 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$4,700 includes \$2,660 for training fee and associated costs and \$2,040 for maintenance allowance.

All other participants: Total of \$4,985 includes \$2,835 for training fee and associated costs payable to USDA, and \$2,150 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted on a country or regional basis in English and Spanish.

PROJECT ANALYSIS FOR AGRICULTURE AND RURAL DEVELOPMENT  
(USDA) TC 140-2

TENTATIVE DATES AND DURATION

6 weeks: May 5 - June 13, 1986. Participants should arrive in Washington, D.C., on April 30 for course orientation and administrative procedures.

TARGET AUDIENCE

Staff and technician-level personnel in Ministries of Agriculture, planning boards, and central and agricultural banks who will be involved in the analysis of projects as team members, supervisors, or trainers.

OBJECTIVES AND CONTENT

Participants will develop the knowledge and skills to (1) analyze projects; (2) identify critical factors; (3) estimate benefits and costs; (4) distinguish between financial and economic analysis; (5) estimate financial and economic impacts; (6) identify risks, complications, and methods for their inclusion in the analysis; and (7) present data on alternative projects for comparison.

This course includes the following: a broad overview of project analysis including the role of the project analyst in assembling and presenting meaningful data about projects for use by key decisionmakers; financial analysis including internal rate of return, benefit-cost analysis, discounting, and other measures to estimate the anticipated benefits of projects to specific groups and entities; farm management, including the collection of data at the farm level and the development of representative farm budgets; economic analysis, including consideration of the differences between economic and financial analysis, shadow pricing vs. market prices, and indirect benefits and costs and; refinements such as methods for dealing with uncertainty and inflation, mutually exclusive projects, and intangible costs and benefits. Field trips allow practice in data collection, partial budget analysis, and the economic analysis of an agricultural development project.

OTHER INFORMATION

Conducted in English by USDA in collaboration with consultants. Simultaneous interpretation is available in French and Spanish at additional cost.

ESTIMATED COSTS

AID participants: Total of \$7,557 includes \$4,687 for training fee and associated costs and \$2,870 for maintenance allowance, books, and book shipment.  
UN/FAO participants: Total of \$7,247 includes \$4,487 for training fee and associated costs and \$2,760 for maintenance allowance.  
All other participants: Total of \$7,557 includes \$4,687 for training fee and associated costs payable to USDA, and \$2,870 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available overseas in English, French, and Spanish. Has been conducted fourteen times outside U.S.A.

STRATEGIES FOR DEVELOPING THE AGRICULTURAL SECTOR  
(USDA) TC 140-3

TENTATIVE DATES AND DURATION

6 weeks: June 2 - July 11, 1986. Participants should arrive in Washington, D.C., on May 25 for course orientation and administrative procedures.

TARGET AUDIENCE

Upperclass students studying for a bachelor's degree and graduate students who have potential for guiding agricultural development in their home countries. Participants should have completed undergraduate course work in micro- and macroeconomics.

OBJECTIVES AND CONTENT

Participants will develop an understanding of the theories, status of empirical knowledge, problems, and possibilities in the areas of economic development, growth, and development planning in the less developed countries. Emphasis is placed on gaining knowledge of analytical concepts that will enable participants to perform more effectively as professionals in public agencies involved with economic and agricultural development. The course includes meaning and measurement of economic development, growth, and improvements in welfare; international differences in levels and rates of growth and development; survey of basic theories of development and growth; structural change and role of agriculture; theories of growth and development as related to distinctive features of low-income countries' development and planning; problems of, and programs for, institution building and resource development in their respective countries; country monographs on economic development and country development plans; and field trips to observe agricultural development. Continually updated to include strategies for reaching the poorest of the poor, the course provides an opportunity for technical agriculturalists to study development strategies.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$6,151 includes \$3,604 for training fee and associated costs and \$2,547 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,835 includes \$3,404 for training fee and associated costs and \$2,437 for maintenance allowance.

All other participants: Total of \$6,151 includes \$3,604 for training fee and associated costs payable to USDA, and \$2,547 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, French and Spanish.

SMALL FARMER CREDIT POLICY AND ADMINISTRATION  
(USDA) TC 140-8

TENTATIVE DATES AND DURATION

6 weeks: September 8 - October 17, 1986. Participants should arrive in Washington, D.C., on September 3 for course orientation and administrative procedures.

TARGET AUDIENCE

National or regional agricultural credit officials who supervise loans to small farmers and who are expected to play influential roles in the agricultural credit agencies of their government.

OBJECTIVES AND CONTENT

Participants will develop the knowledge and skills to: (1) understand the role of credit programs for small farmers in economic development, (2) implement lending and borrowing principles, (3) evaluate mechanisms which can be used to reduce risks and the heavy administrative costs associated with small farmer credit programs, and (4) weigh alternative policies and the trade-offs that exist among them. Topics include the role of small farmer credit programs in the development of the agricultural sector; discussion of major credit policy issues including supervision, interest rates, distribution channels, savings and the attraction of funds; review of borrowing and lending principles; examination of small farmer production, financial structure, and credit behavior; financial institutions and markets; and administrative techniques for serving small farmers. Field trips include visits to major U.S. agricultural credit institutions to observe and practice administrative techniques used in making loans. Participants exchange ideas on the overall agricultural credit systems in their home countries and learn how small farmer credit fits into their systems.

OTHER INFORMATION

Conducted in English by USDA, university faculty, and consultants. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$6,640 includes \$3,770 for training fee and associated costs and \$2,870 for maintenance allowance, books, and book shipment.  
UN/FAO participants: Total of \$6,330 includes \$3,570 for training fee and associated costs and \$2,760 for maintenance allowance.  
All other participants: Total of \$6,640 includes \$3,770 for training fee and associated costs payable to USDA, and \$2,870 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. The Small Farmer Credit Policy course and the Small Farmer Credit Distribution and Administration course will continue to be available separately in English, French, and Spanish.

ESTABLISHMENT AND MANAGEMENT OF AGRICULTURAL COOPERATIVE ORGANIZATIONS  
(USDA) TC 140-11

TENTATIVE DATES AND DURATION

6 weeks: June 23 - August 1, 1986. Participants should arrive in Washington, D.C., on June 15 for course orientation and administrative procedures.

TARGET AUDIENCE

Staff responsible for initiating, developing, and managing agricultural cooperatives.

OBJECTIVES AND CONTENT

Participants will: (1) learn how to organize and manage cooperatives to give small farmers more leverage in the marketplace; (2) learn how to organize, and instruct others to organize, small-scale producers into more viable production and marketing entities; and (3) practice skills necessary for developing and managing agricultural cooperatives. The course will include: the structure and organization of cooperatives for marketing products, purchasing farm inputs, or group farming; leadership and management functions essential for a viable cooperative organization, the financing of cooperatives; the role of government in the cooperatives movement, including the transitional process from a government program to a self-sustaining cooperative movement; and the consideration of a variety of member-relations activities ranging from the recruitment of members to the vocational and other educational needs of the membership.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$5,091 includes \$2,221 for training fee and associated costs and \$2,870 for maintenance allowance, books, and book shipment.  
UN/FAO participants: Total of \$4,781 includes \$2,021 for training fee and associated costs and \$2,760 for maintenance allowance.  
All other participants: Total of \$5,091 includes \$2,221 for training fee and associated costs payable to USDA, and \$2,870 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, French, and Spanish.

ORGANIZATION AND OPERATION OF RURAL  
ELECTRIC DISTRIBUTION SYSTEMS  
(USDA) TC 140-12

TENTATIVE DATES AND DURATION

5 weeks: May 5 - June 6, 1986. Participants should arrive in Washington, D.C., on April 30 for course orientation and administrative procedures.

TARGET AUDIENCE

Mid- and senior-level administrators responsible for establishing and operating electricity distribution systems in rural areas.

OBJECTIVES AND CONTENT

Participants will develop knowledge and skills to: (1) understand the U.S. rural electrification system, (2) discuss the growth of such systems in their home countries, (3) analyze the development of the Rural Electrification Administration (REA) cooperative system and the farmer's role in that system, (4) apply management and cooperative principles, and (5) develop an effective and efficient rural electrification system appropriate for their home country.

This course is designed to provide a general overview of rural electric systems with the Rural Electrification Administration, USDA, and the National Rural Electric Cooperative Association. Additionally, participants will make field visits to selected cooperatives to study their operations and management. They will visit both small and large cooperatives. Special training is provided in administration, engineering, and finance.

OTHER INFORMATION

Conducted in English by USDA and the Rural Electrification Administration, the National Rural Electric Cooperatives Association, and local cooperatives. Simultaneous interpretation is not available.

ESTIMATED COSTS

AID participants: Total of \$5,374 includes \$2,924 for training fee and associated costs and \$2,450 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,064 includes \$2,724 for training fee and associated costs and \$2,340 for maintenance allowance.

All other participants: Total of \$5,374 includes \$2,924 for training fee and associated costs payable to USDA, and \$2,450 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Not available for overseas presentation.

ORGANIZATIONAL AND MANAGEMENT DEVELOPMENT  
(USDA) TC 140-14

TENTATIVE DATES AND DURATION

6 weeks: May 5 - June 13, 1986. Participants should arrive in Washington, D.C., on April 30 for course orientation and administrative procedures.

TARGET AUDIENCE

Senior level administrators and managers in agriculture or rural development. May include Ministers or Permanent Secretaries, regional or state heads of agriculture, or heads of large projects in organizations. The course is designed for staff with substantial management responsibilities.

OBJECTIVES AND CONTENT

Participants will develop: (1) an understanding of the nature of Organization and Management Development as important tools of management, (2) a better understanding of the individual (both within and outside the organization) as the basic element in the achievement of needed objectives, and (3) approaches, skills, and philosophies useful in working with others in organizations. This course also will: (4) provide an opportunity to practice selective skills in a laboratory environment, (5) encourage a commitment on the part of the participant to experiment with and apply techniques and approaches beyond those conventionally used, and (6) make available significant literature in the field.

The course includes training in (1) organization-development (OD) skills, including problem diagnosis, planning, implementation, and evaluation of change; (2) leadership and communication skills; and (3) group decisionmaking and administrative analysis. Case studies of administrative change in agricultural organizations in developing countries are analyzed. Projects are developed for introducing organizational change in national agencies. Participants visit agricultural organizations and examine different management systems and practices. Training methods include individual and small group exercises, case materials, and an OD simulation exercise. Throughout the seminar, participants apply what they have learned about management systems to their own organizations.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

Please refer to Maintenance Allowance information on page 8.

AID participants: Total of \$6,023 includes \$3,153 for training fee and associated costs and \$2,870 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,713 includes \$2,953 for training fee and associated costs and \$2,760 for maintenance allowance.

All other participants: Total of \$6,023 includes \$3,153 for training fee and associated costs payable to USDA, and \$2,870 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, French, Portuguese, and Spanish.

PROJECT PLANNING FOR AGRICULTURE AND RURAL DEVELOPMENT  
(USDA) TC 140-15

TENTATIVE DATES AND DURATION

5 weeks: March 31 - May 2, 1986. Participants should arrive in Washington, D.C., on March 26 for course orientation and administrative procedures.

TARGET AUDIENCE

Project planners, technical resource personnel, decisionmakers, and others who are or will be involved in the identification, design, and selection of agricultural development projects.

OBJECTIVES AND CONTENT

Participants will develop knowledge and skills to: (1) identify project needs, (2) specify project objectives, (3) develop a viable project proposal, (3) examine alternative project components and implementation strategies, (4) estimate resource needs and project outcomes, and (5) present project proposals to decisionmakers. This course emphasizes the application of planning concepts and techniques in the identification and design of agricultural development projects. It centers on the skills necessary in selecting and preparing project plans which can fulfill the project goals while retaining the flexibility to respond to problems which arise during the implementation stage. Topics include a perspective of products and their role in development, the identification of project needs, use of logical framework analysis, formulating project proposals, network analysis using PERT and CPM, formulating organizational structures considering leadership requirements and interagency coordination problems, consideration of the human dynamics of project planning with particular emphasis on local involvement, and home country applications. Intensive study of ongoing and planned projects is made during a 1-week field trip.

OTHER INFORMATION

Course is conducted in English by USDA. Simultaneous interpretation is not available.

ESTIMATED COSTS

AID participants: Total of \$6,276 includes \$3,826 for training fee and associated costs and \$2,450 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,966 includes \$3,626 for training fee and associated costs and \$2,340 for maintenance allowance.

All other participants: Total of \$6,276 includes \$3,826 for training fee and associated costs payable to USDA, and \$2,450 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, French, and Spanish.

PROJECT IMPLEMENTATION FOR AGRICULTURE AND RURAL DEVELOPMENT  
(USDA) TC 140-16

TENTATIVE DATES AND DURATION

6 weeks: June 16 - July 25, 1986. Participants should arrive in Washington, D.C., on June 11 for course orientation and administrative procedures.

TARGET AUDIENCE

Staff responsible for initiating and managing agricultural development projects.

OBJECTIVES AND CONTENT

Participants will develop knowledge and skills to: (1) activate a project plan, (2) specify and schedule work, (3) clarify authority and responsibility, (4) obtain needed resources, (5) utilize information feedback and control systems, (6) motivate staff and implement control procedures, and (7) terminate projects and hand over responsibilities to existing organizations.

This course treats project implementation from the point at which a project has been planned, analyzed, and funded. It is designed to assist participants in identifying and solving the organizational and technical problems encountered in implementing a project plan. Various management skills and tools are introduced which will assist in building an organization which facilitates information feedback, corrects errors, or eliminates bottlenecks as they occur. The course also covers monitoring, project costs, and evaluating the progress of the project. In addition, emphasis is given to working with farmers and local decisionmakers to help ensure acceptance, participation, and support for the project. Throughout the course, the philosophy prevails that project teams are only temporary and that at some point in the life of a project the operation will be transferred to an existing organization. The field trip emphasizes local involvement in the implementation of projects.

OTHER INFORMATION

Course is conducted in English by USDA. Simultaneous interpretation is not available.

ESTIMATED COSTS

AID participants: Total of \$7,070 includes \$4,200 for training fee and associated costs and \$2,870 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$6,760 includes \$4,000 for training fee and associated costs and \$2,760 for maintenance allowance.

All other participants: Total of \$7,070 includes \$4,200 for training fee and associated costs payable to USDA, and \$2,870 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, French, and Spanish.

MANAGEMENT AND THE ROLE OF WOMEN IN DEVELOPMENT  
(USDA) TC 140-17

TENTATIVE DATES AND DURATION

6 weeks: June 2 - July 11, 1986. Participants should arrive in Washington, D.C. on May 25 for orientation.

TARGET AUDIENCE

Senior women officials with management responsibilities in agriculture, private voluntary organizations, rural development, nutrition, and related areas. Also, women with promotion potential to senior management.

OBJECTIVES AND CONTENT

Participants will develop knowledge and skills to: (1) use executive skills in planning, decisionmaking, and interpersonal communication; (2) anticipate, analyze, and manage special problems that may occur when women are leaders in predominantly male organizations; (3) articulate and provide leadership to help women assume a greater role in development; (4) demonstrate more effective influence/leadership skills; (5) be creative and objective in their leadership positions, and better coordinate the inclusion of other women in organization programs and projects; and (6) implement changes within their organizations, both structurally and procedurally, which use resources more effectively.

This course includes self-diagnosis of management and interpersonal skills; women in development issues; goal setting; power structures and roles in organizations; problem-solving methodologies; building support networks; negotiation skills, strategies, and tactics; and open-systems planning. Instruction methods are highly individualized and interactive. Participants analyze women-in-development case studies using organization and management principles. Videotape is used extensively for self-assessment purposes. The fourth week of the program will be devoted to on-the-job experience in an area related to the participant's position in the home country.

OTHER INFORMATION

Conducted in English in collaboration with consultants, AID, and international organization staffs. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

Please refer to Maintenance Allowance information on page 8.

AID participants: Total of \$5,813 includes \$3,418 for training fee and associated costs and \$2,395 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,503 includes \$3,218 for training fee and associated costs and \$2,285 for maintenance allowance.

All other participants: Total of \$5,813 includes \$3,418 for training fee and associated costs payable to USDA, and \$2,395 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English and French.

POLICY FORMULATION AND ANALYSIS FOR  
AGRICULTURE AND RURAL DEVELOPMENT  
(USDA) TC 140-19

TENTATIVE DATES AND DURATION

5 weeks: June 2 - July 4, 1986. Participants should arrive in Washington, D.C., on May 28 for orientation and administrative procedures.

TARGET AUDIENCE

Mid-level policy analysts in departments or ministries of agriculture, planning, or related fields who are concerned with agricultural policy analysis and implementation.

OBJECTIVES AND CONTENT

Participants will develop knowledge and skills to: (1) understand policy formulation, which includes determining the unique problems in a particular system; (2) identify alternative policies for the agricultural sector to help solve these problems; (3) apply analytical techniques to evaluate the probable outcomes of alternative policies; and (4) understand the interdependence of policy issues and the external forces that affect policy decisions.

Topics include discussions of national economic goals and the role of agriculture in the attainment of these goals; policy formulation and the role of the policy analyst in that process; the role of data in policy analysis, including types of data needed and procedures for obtaining necessary data; and techniques for analyzing the impact of alternative policies, including function fitting, calculation of elasticity coefficients, resource productivities, and comparative advantages. Analytical techniques are applied to policy issues most relevant to the participants' own countries such as credit, taxation, price marketing, trade, mechanization, population, and land tenure. Additional topics addressed are conflicts among goals, the relative importance of alternative goals and tradeoffs among goals, and the impact of the political environment and resource limitations on priority policy issues.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of 5,375 includes 3,147 for training fee and associated costs and 2,228 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of 5,055 includes 2,947 for training fee and associated costs and 2,108 for maintenance allowance.

All other participants: Total of 5,375 includes 3,147 for training fee and associated costs payable to USDA, and 2,228 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, French, and Spanish.

ECONOMIC FORECASTING FOR AGRICULTURAL  
POLICY AND DECISIONMAKING  
(USDA) TC 140-22

TENTATIVE DATES AND DURATION

6 weeks: June 9 - July 18, 1986. Participants should arrive in Washington, D.C., on June 1 for course orientation and administrative procedures.

TARGET AUDIENCE

Technicians and senior officials in Ministries of Agriculture and Economic Planning in developing countries. Participants should be involved in economic situation and outlook analysis. A bachelor's of science in economics and at least 3 semester hours of credit in statistics are required to enroll in this course.

OBJECTIVES AND CONTENT

Participants will develop the knowledge and skills to: (1) make economic forecasts based on sound logic, (2) use different forecasting techniques, (3) evaluate forecasting accuracy and procedures, and (4) prepare outlook and situation reports.

This course presents forecasting methods for economic phenomena, particularly economic situation and outlook for agricultural prices and products. The effects of international trade on domestic supply and demand are discussed. The role of economic theory and the scientific method are emphasized in developing forecasts for any economic variable. Various forecasting techniques are described and their operational procedures developed in detail. This course stresses the importance of usable presentation of forecasts for either internal or published reports.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$6,342 includes \$3,890 for training fee and associated costs and \$2,452 for maintenance allowance, books, and book shipment.  
UN/FAO participants: Total of \$6,032 includes \$3,690 for training fee and associated costs and \$2,342 for maintenance allowance.  
All other participants: Total of \$6,342 includes \$3,890 for training fee and associated costs payable to USDA, and \$2,452 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English and Spanish.

MANAGEMENT OF GOVERNMENT ORGANIZATIONS IN  
DEVELOPING COUNTRIES  
(USDA) TC 140-23

TENTATIVE DATES AND DURATION

8 weeks: May 19 - July 11, 1986. Participants should arrive in Washington, D.C., on May 14 for course orientation and administrative procedures.

TARGET AUDIENCE

Entry- to mid-level managers of agricultural or rural development organizations.

OBJECTIVES AND CONTENT

Participants will develop: (1) an understanding of basic management concepts, (2) essential management skills, and (3) strategies for using these concepts and skills in their own situations.

This course introduces the participants to basic management concepts and practices and helps them develop skills to manage agricultural and rural development organizations. Emphasis is placed on program management, supervision, work organization, personnel management, office management, administrative management, communication, and control systems. Through major use of case studies, simulations, and role playing, course content is related to participants' training needs and situations they experience at home.

OTHER INFORMATION

Conducted in English by USDA, university faculty, and consultants. Simultaneous interpretation is not available.

ESTIMATED COSTS

AID participants: Total of \$8,792 includes \$5,082 for training fee and associated costs and \$3,710 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$8,482 includes \$4,882 for training fee and associated costs and \$3,600 for maintenance allowance.

All other participants: Total of \$8,792 includes \$5,082 for training fee and associated costs payable to USDA, and \$3,710 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, French, and Spanish.

MANAGEMENT OF AGRICULTURAL RESEARCH  
(USDA) TC 140-24

TENTATIVE DATES AND DURATION

6 weeks: July 28 - September 5, 1986. Participants should arrive in Washington, D.C. on July 23 for course orientation and administrative procedures.

TARGET AUDIENCE

Mid- and senior-level managers of agricultural research institutes at the regional or national level.

OBJECTIVES AND CONTENT

Participants will develop knowledge and skills to: (1) understand the unique context in which agricultural research management occurs, (2) identify and prioritize research programs and projects, (3) maximize the effectiveness of existing personnel, funds and facilities, (4) identify opportunities and methods for intensifying and expanding research efforts, and (5) plan and implement more effective coordination with outreach organizations and farmers for setting research objectives and disseminating research results.

This course emphasizes the uniqueness of agricultural research. Participants will examine the ways agricultural research is organized, funded, and managed in various countries and focus on the problems of research management being experienced in their own countries. Specific topics include: the research environment, the role of agricultural research in the national society and economy, defining research needs and priorities, development of a comprehensive and integrated research plan, effective use of resources, management of scientific and research staff, and use of research results.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$6,814 includes \$3,944 for training fee and associated costs and \$2,870 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$6,504 includes \$3,744 for training fee and associated costs and \$2,760 for maintenance allowance.

All other participants: Total of \$6,814 includes \$3,944 for training fee and associated costs payable to USDA, and \$2,870 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, French, and Spanish.

INITIATING AND MANAGING  
RURAL DEVELOPMENT PROGRAMS  
(USDA) TC 140-25

DATES AND DURATION

8 weeks: September 23 - November 15, 1985. Participants should arrive in Washington, D.C., on September 18 for course orientation and administrative procedures.

TARGET AUDIENCE

Managers or potential managers responsible for designing, initiating, and carrying out integrated rural development programs. Often these programs will consist of several interrelated development projects.

OBJECTIVES

Participants will learn to: (1) understand the relationships between policy, programs, and projects in integrated rural development; (2) improve their knowledge and skill in program design, initiation, and management; (3) develop the skills to manage complex organizational links; and (4) increase their awareness of their own perspectives and strategies for initiating and managing programs.

CONTENT

This multi-disciplinary course on rural development emphasizes: problem solving, decisionmaking, coordination, communication, planning, control, management systems, leadership, action research and data feedback systems, and program/project implementation and management. It looks at the multisectoral focus required for successful management of broad programs and the coordination of various horizontal links within and among the involved sectors to effectively initiate, monitor, and evaluate programs. Simulations, role playing, individual exercises, group exercises, and field excursions are integral parts of the course.

OTHER INFORMATION

Conducted in English by USDA with university faculty and consultants. Simultaneous interpretation is not available.

COST

AID participants: Total of \$8,792 includes \$5,082 for training fee and associated costs and \$3,710 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$8,482 includes \$4,882 for training fee and associated costs and \$3,600 for maintenance allowance.

All other participants: Total of \$8,792 includes \$5,082 for training fee and associated costs payable to USDA, and \$3,710 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, French, and Spanish.

ESTABLISHING DATA BASES AND ANALYTICAL SYSTEMS  
FOR ECONOMIC DECISIONMAKING IN AGRICULTURE  
(USDA) TC 140-26

TENTATIVE DATES AND DURATION

12 weeks: May 26 - August 15, 1986. Participants should arrive in Washington, D.C., on May 18 for course orientation and administrative procedures.

TARGET AUDIENCE

Technicians and planners in Ministries of Agriculture and Ministries of Planning. Applicants must have the equivalent of a bachelor of science degree which includes 6 credit hours or 1 academic year of statistics.

OBJECTIVES AND CONTENT

Participants will develop the knowledge and skills to: (1) use appropriate sampling techniques, (2) select and evaluate variables for sampling, (3) manage a survey, (4) evaluate data collected for economic decisionmaking, and (5) relate the data collected to project evaluation.

This course presents statistical concepts for designing surveys of finite populations including schemes directed toward households, fields, and area frames. The design of data gathering will be viewed as a system and the interaction among component parts will be analyzed. Included will be specification of the processes, planning, and content procedures for a statistical survey, translating objectives into quantifiable variables, field survey work, data processing, and reporting to policymakers. A field trip is planned to observe U.S. agricultural statistics gathering. Participants will use hand-held, programmable calculators (such as the HP 41-CV) to reduce reliance on computer centers. The course fee includes the provision of this equipment.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$8,722 includes \$4,859 for training fee and associated costs and \$3,863 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$8,362 includes \$4,609 for training fee and associated costs and \$3,753 for maintenance allowance.

All other participants: Total of \$8,722 includes \$4,859 for training fee and associated costs payable to USDA, and \$3,863 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations.

EFFECTIVE LIVESTOCK AND CROP  
MANAGEMENT FOR SMALL FARMS  
(USDA) TC 140-28

TENTATIVE DATES AND DURATION

6 weeks: June 9 - July 18, 1986. Participants should arrive in Washington, D.C., on June 1 for course orientation and administrative procedures.

TARGET AUDIENCE

Staff responsible for planning, implementing, and carrying out development programs to increase the production and income levels of small farms in developing nations.

OBJECTIVES AND CONTENT

Participants will develop knowledge and skills to: (1) understand farming systems, (2) improve their ability to assess available resources, and (3) conduct appropriate analyses to determine optimal production systems for small farm agriculture.

Development of small-scale agriculture depends on effectively identifying and managing the optimal use of available resources. Course content focuses on identifying alternative crop and livestock production systems compatible with the resource base and on methods useful in selecting the best system. The course also emphasizes analytical techniques used in farm planning, farm budgeting, cash flow analysis, and evaluation of investment alternatives; and the effects of risk, uncertainty, and farm-household relationships. Consideration is given to the supply of production inputs and product marketing.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$6,014 includes \$3,562 for training fee and associated costs and \$2,452 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,704 includes \$3,362 for training fee and associated costs and \$2,342 for maintenance allowance.

All other participants: Total of \$6,014 includes \$3,562 for training fee and associated costs payable to USDA, and \$2,452 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English, French, and Spanish.

KEYS TO AGRICULTURAL DEVELOPMENT AT THE LOCAL LEVEL  
(USDA) TC 140-32

TENTATIVE DATES AND DURATION

2 weeks: Section I. May 11 - May 24, 1986.  
Section II. May 18 - May 31, 1986.  
Sections III & IV. August 10 - August 23, 1986.  
Section V. August 17 - August 30, 1986.

TARGET AUDIENCE

Academic participants from all agricultural or rural development disciplines. Designed primarily for participants enrolled in ongoing degree programs in the United States.

OBJECTIVES AND CONTENT

Participants will develop the knowledge and skills to: (1) understand the interaction between technical agriculture and socioeconomic development, (2) identify key factors in the development of agriculture, (3) analyze the process of agricultural development in a community, and (4) apply the knowledge to home country development.

This 2-week program enables participants to examine the agricultural development process by identifying and analyzing key social, economic, and political factors; and how they interrelate. It is highly experimental with illustrative field trips, individual and group work, and home country planning. By capitalizing on the diversity of its participants, the course offers a rare opportunity for cross-discipline consultation to adapt course work to home country realities.

OTHER INFORMATION

Conducted in English. Simultaneous interpretation is not available.

ESTIMATED COSTS

AID participants: Total of \$2,028 includes \$1,248 for training fee and associated costs and \$780 for maintenance allowance, books, and book shipment.  
UN/FAO participants: Total of \$1,853 includes \$1,073 for training fee and associated costs and \$780 for maintenance allowance.  
All other participants: Total of \$2,028 includes \$1,248 for training fee and associated costs payable to USDA, and \$780 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Not available for overseas presentation.

BASIC AGRICULTURAL SURVEY STATISTICS AND METHODS  
(USDA) TC 140-33

TENTATIVE DATES AND DURATION

6 weeks: September 15 - October 24, 1986. Participants should arrive in Washington, D.C., on September 10 for course orientation and administrative procedures.

TARGET AUDIENCE

Designed for staff members who will be operating or supervising the data collection activity on a day-to-day basis. Participants should have some familiarity with, or a background in, agricultural or mathematical statistics.

OBJECTIVES AND CONTENT

Participants will develop skills to: (1) develop sampling frames, (2) design surveys, (3) organize data collection staff, (4) design questionnaires, (5) specify data collection methods and procedures, and (6) summarize surveys.

This course will treat agricultural data collection from statistical concepts through frame development, survey design, data collection procedures, data processing, and summarization methodology, so that a participant will get a complete overview of the operation of a data collection system. The course is designed as a hands-on practical approach to data collection in the agricultural environment. Its primary goal is to provide practical applicable principles used around the world for effective data collection.

Sufficient classroom instruction will be provided to allow participants to acquire a basic knowledge of sampling and survey methods in order to select alternatives in establishing survey methodology appropriate to their country programs. The course will cover agricultural forecasting and estimating concepts, sample design and estimators, probability sampling methodology and area frame development, survey organization, data collection methodology, objective measurement for yield and production, quality control, and survey summarization. Participants will visit a USDA/SRS field office and make visits to field to review an existing system in operation.

OTHER INFORMATION

Course will be taught in English by USDA Statistical Reporting Service staff. Simultaneous interpretation is not available, but some language assistance in Spanish and French will be available.

ESTIMATED COSTS

AID participants: Total of \$5,573 includes \$2,703 for training fee and associated costs and \$2,870 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,263 includes \$2,503 for training fee and associated costs and \$2,760 for maintenance allowance.

All other participants: Total of \$5,573 includes \$2,703 for training fee and associated costs payable to USDA, and \$2,870 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations.

GRAIN STORAGE AND MARKETING  
(USDA) TC 150-2

TENTATIVE DATES AND DURATION

7 weeks: June 9 - July 25, 1986. Participants should arrive in Washington, D.C. on June 1 for course orientation and administrative procedures.

TARGET AUDIENCE

Mid-level grain inspectors, grading specialists, marketing specialists, managers of grain handling facilities, quality control agents, and economists responsible for designing marketing systems.

OBJECTIVES AND CONTENT

Participants will increase their knowledge and skills in: (1) fundamentals involved in grain storage, (2) causes and prevention of grain loss, (3) grain inspection and loss assessment, (4) grain movement and storage from production to consumption, (5) management and operation of grain businesses, (6) grain pricing and marketing cost relationships, (7) marketing management, (8) auxiliary market functions, and (9) analytical techniques related to grain marketing.

All participants learn the basic areas of grain structure, grain moisture and its measurement, storage methods and procedures, principles of aeration and drying, introduction to pest control, principles of management and operations, agricultural policy, marketing environments, warehouse management and inventory control, and grain marketing systems. Those specializing in marketing receive additional training in market management, market facilitating operations, transportation planning, storage costs and alternatives, price analysis, forecasting, economic and financial analysis, and transportation and location analysis. Those specializing in storage receive additional training in grain inspection, classification, and loss assessment; moisture measurement; stored-grain insects, molds, and vertebrate pests; grain drying; grain handling equipment and its maintenance, seed handling and storage; and integrated pest management. In addition to lectures, discussions, and laboratory experiences, participants learn through field trips and an 8-day study tour. These include visits to farms, grain handling facilities, equipment manufacturers, warehouses, service and regulatory agencies, research facilities, port facilities, rice markets, boards of trade, grain merchandisers, and cooperatives.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$5,572 includes \$2,669 for training fee and associated costs and \$2,903 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,262 includes \$2,469 for training fee and associated costs and \$2,793 for maintenance allowance.

All other participants: Total of \$5,572 includes \$2,669 for training fee and associated costs payable to USDA, and \$2,903 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations.

DEVELOPING MARKETS FOR AGRICULTURAL PRODUCTS  
(USDA) TC 150-5

TENTATIVE DATES AND DURATION

8 weeks: June 9 - August 1, 1986. Participants should arrive in Washington, D.C., on June 1 for orientation and administrative procedures.

TARGET AUDIENCE

The staff of institutions responsible for domestic or international marketing and academic participants interested in marketing.

OBJECTIVES AND CONTENT

Participants will develop the knowledge and skills to: (1) understand the role of the agricultural sector in economic development, (2) comprehend the role of multinational firms in development and develop a basis for negotiating with multinational firms, (3) calculate and explain financial measures used for industry feasibility analysis, (4) understand export marketing to be able to take a product from their own country and prepare and export that product, and (5) understand the role of international trade in economic development.

This course includes the role of marketing in development, discussion of participants' home-country marketing systems, establishment and improvement of a marketing infrastructure, and the mechanics of international trade such as the conduct of feasibility studies, methods of direct and indirect exporting, shipping documentation, alternative financial arrangement, packaging, and insurance. Techniques of conducting market analyses and evaluations are examined including the economics of establishing grading systems. Field trips are made to small, well-managed marketing projects and enterprises.

OTHER INFORMATION

Course is conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$7,472 includes \$4,370 for training fee and associated costs and \$3,102 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$7,162 includes \$4,170 for training fee and associated costs and \$2,992 for maintenance allowance.

All other participants: Total of \$7,472 includes \$4,370 for training fee and associated costs payable to USDA, and \$3,102 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English and Spanish.

POSTHARVEST LOSS REDUCTION OF PERISHABLE CROPS  
(USDA) TC 150-7

TENTATIVE DATES AND DURATION

5 weeks: September 1 - October 3, 1986. Participants should arrive in Washington, D.C., on August 24 for course orientation and administrative procedures.

TARGET AUDIENCE

Personnel responsible for the establishment of postharvest systems in operation, maintenance and marketing of postharvest systems for fruits, vegetables, and root and tuber crops.

OBJECTIVES AND CONTENT

Participants will improve their ability to: (1) identify the causes and determine measures that reduce postharvest losses; (2) observe methods and techniques that will reduce losses in systems of handling, processing, and marketing; and (3) educate others in postharvest technology.

Topics covered include the chemistry and biochemistry of food deterioration, biology and control of postharvest diseases in stored perishables, methods of drying, simple drying and storage practices, storage and handling of roots and tubers, fruits and vegetables, simple cooling systems, climatic effect, harvesting, transport, packaging, and marketing.

Emphasis is given to fresh and minimally processed foods as it relates to storage and handling practices of developing countries. There will be an observational tour in the Northwest United States which will incorporate all aspects of the postharvest system including harvesting, handling, transport, storage, processing, packaging, and marketing. The marketing studies will include domestic market development and strategies for export market development and its requirements. Participants will be encouraged to present the situations in their own countries for discussion.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined.

ESTIMATED COSTS

AID participants: Total of \$5,631 includes \$3,349 for training fee and associated costs and \$2,282 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$5,321 includes \$3,149 for training fee and associated costs and \$2,172 for maintenance allowance.

All other participants: Total of \$5,631 includes \$3,349 for training fee and associated costs payable to USDA, and \$2,282 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations.

ECOLOGICAL ANALYSIS FOR MANAGEMENT OF  
NATURAL RESOURCE AREAS  
(USDA) TC 170-7

TENTATIVE DATES AND DURATION

4 weeks: July 7 - August 1, 1986. Participants should arrive in Washington, D.C., on June 29 for course orientation and administrative procedures.

TARGET AUDIENCE

Supervisory, administrative, or professional personnel concerned with inventories or management planning of forest resources.

OBJECTIVES AND CONTENT

Participants will: (1) develop a conceptual framework for the application of ecological science to resource management, (2) inventory resources, (3) analyze data used in forest and natural resources management, (4) identify and perform ecological analyses of resource problems, and (5) develop alternative solutions to deforestation and natural resource degradation.

Initial sessions will present concepts of ecological science, resource management, and land use planning. Field trips will demonstrate the best technology currently available to manage water, soil, forest, fish, and wildlife resources. Participants will gain experience in conducting resource inventories, remote sensing, and assessments of air and water quality. Additional field work will provide an opportunity to expand the application of ecological science to rangeland management and to conduct resource inventories, to map resources, and to evaluate habitat quality.

OTHER INFORMATION

Conducted in English. Availability of simultaneous interpretation will be determined. Participants are expected to present a case study of resource management problems or achievements in their home country.

ESTIMATED COSTS

AID participants: Total of \$4,653 includes \$2,418 for training fee and associated costs and \$2,235 for maintenance allowance, books, and book shipment.

UN/FAO participants: Total of \$4,368 includes \$2,243 for training fee and associated costs and \$2,125 for maintenance allowance.

All other participants: Total of \$4,653 includes \$2,418 for training fee and associated costs payable to USDA, and \$2,235 for maintenance allowance, books, and book shipment payable directly to the participant.

TRAVEL

Airline tickets should be provided in accordance with the supplemental instructions that will be sent by January 1, 1986. If for some reason you do not receive this information, participants should be sent to Washington, D.C.

OVERSEAS AVAILABILITY

Available for overseas presentation upon request by AID, the World Bank, FAO, country governments, foundations, and private organizations. Can be conducted in English and Spanish.

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