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AGENCY FOR INTERNATIONAL DEVELOPMENT

WASHINGTON, D.C. 20523

PROJECT PAPER

REGIONAL: ASEAN Human Resources Development
(398-0287)

March 3, 1987

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ASEAN HUMAN RESOURCES DEVELOPMENT (398-0287)

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AGENCY FOR INTERNATIONAL DEVELOPMENT PROJECT DATA SHEET	1. TRANSACTION CODE <input type="checkbox"/> A = Add <input type="checkbox"/> C = Change <input type="checkbox"/> D = Delete	Amendment Number _____ DOCUMENT CODE 3
2. COUNTRY/ENTITY ASEAN Regional	3. PROJECT NUMBER 398-0287	
4. BUREAU/OFFICE ASIA/NEAR EAST	5. PROJECT TITLE (maximum 40 characters) ASEAN HUMAN RESOURCES DEVELOPMENT	
6. PROJECT ASSISTANCE COMPLETION DATE (PACD) MM DD YY 12 3 19 83	7. ESTIMATED DATE OF OBLIGATION (Under 'B' below, enter 1, 2, 3, or 4) A. Initial FY 87 B. Quarter <input type="checkbox"/> C. Final FY 91	

8. COSTS (\$000 OR EQUIVALENT \$1 =)

A. FUNDING SOURCE	FIRST FY 87			LIFE OF PROJECT		
	B. FX	C. L/C	D. Total	E. FX	F. L/C	G. Total
AID Appropriated Total						
(Grant)	(2450)	()	(2450)	()	()	(14,000)
(Loan)	()	()	()	()	()	()
Other						
U.S.						
Host Country		1400	1400			6,000
Other Donor(s)						
TOTALS	2450	1400	3850			20,000

9. SCHEDULE OF AID FUNDING (\$000)

A. APPROPRIATION	B. PRIMARY PURPOSE CODE	C. PRIMARY TECH. CODE		D. OBLIGATIONS TO DATE		E. AMOUNT APPROVED THIS ACTION		F. LIFE OF PROJECT	
		1. Grant	2. Loan	1. Grant	2. Loan	1. Grant	2. Loan	1. Grant	2. Loan
(1) ARDN	S-100	070				1200		6,000	
(2) PH	S-500	560						3,400	
(3) EHR	S-600	700				1250		3,600	
(4) SDA	S-700	870						1,000	
TOTALS						2450		14,000	

10. SECONDARY TECHNICAL CODES (maximum 6 codes of 3 positions each) 960 710 550	11. SECONDARY PURPOSE CODE
12. SPECIAL CONCERNS CODES (maximum 7 codes of 4 positions each) A. Code R/AG TECH TRNG B. Amount 2500 2500 9000	

13. PROJECT PURPOSE (maximum 480 characters)

To expand human resource development and training opportunities in priority sectors; and to strengthen institutional capacity in the ASEAN region for HRD activities.

14. SCHEDULED EVALUATIONS Interim MM YY MM YY Final MM YY 0 8 8 9 0 6 9 2	15. SOURCE/ORIGIN OF GOODS AND SERVICES <input type="checkbox"/> 000 <input type="checkbox"/> 941 <input type="checkbox"/> Local <input type="checkbox"/> Other (Specify) _____
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16. AMENDMENTS/NATURE OF CHANGE PROPOSED (This is page 1 of a _____ page PP Amendment)

17. APPROVED BY	Signature Bruce Blackman	18. DATE DOCUMENT RECEIVED IN AID/W, OR FOR AID/W DOCUMENTS, DATE OF DISTRIBUTION! MM DD YY
	Title AID/ASEAN Regional Development Officer	Date Signed MM DD YY 10 13 10 13 8 7

Revised by ANE/PD
on 4/3/87.

AGENCY FOR INTERNATIONAL DEVELOPMENT
WASHINGTON, D.C. 20523

PROJECT AUTHORIZATION

ASIA AND NEAR EAST
REGIONAL

ASEAN Human Resources
Development Project
No. 398-0287

1. Pursuant to Sections 103, 104, 105, and 106 of the Foreign Assistance Act, as amended, I hereby authorize the ASEAN Human Resources Development Project (the "Project") on behalf of the Association of South East Asian Nations (ASEAN) countries of Brunei Darussalam, Indonesia, Malaysia, Philippines, Singapore, and Thailand, involving planned obligations of not to exceed \$14,000,000 in grant funds over a five-year period from the date of authorization, subject to the availability of funds in accordance with A.I.D. OYB/allotment process, to help finance foreign exchange and local currency costs for the Project. The planned life of the project is seven years beginning 1 January 1987.

2. The Project will promote cooperation among ASEAN countries and provide assistance required to improve food plant protection and quarantine services, strengthen agricultural policy and planning capabilities, improve primary health and nutrition services, and expand the number of post-graduate technical experts in the region.

3. The Project Agreement(s), which may be negotiated and executed by the Officer(s) to whom such authority is delegated in accordance with A.I.D. regulations and Delegations of Authority, shall be subject to the following essential terms and conditions as A.I.D. may deem appropriate.

Source and Origin of Goods and Services. Goods and services, except for ocean shipping, financed by A.I.D. under the Project, shall have their source and origin in the United States or the ASEAN countries (Brunei Darussalam, Indonesia, Malaysia, Philippines, Thailand, and Singapore) except as A.I.D. may otherwise agree in writing. Ocean shipping financed

by A.I.D. under the Project shall, except as A.I.D. may otherwise agree in writing, be financed only on flag vessels of the United States.



Julia Chang Bloch
Assistant Administrator
Bureau for Near East and Asia

4/12/87

Date

Clearances:

ANE/PD:PBloom

ANE/EA:HKaufman

ANE/DP:BSidman

ANE/TR:BTurner

GC/ANE:JSilverstone

RLA/Manila:BMiller

ms

(draft)

(draft)

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(draft)

(draft)

(Manila 10138)

ANE/PD/EA:JSilverstone *J*dr:04/07/87:79663:Doc 1287o

AGENCY FOR INTERNATIONAL DEVELOPMENT
WASHINGTON, D.C. 20523

4 20
APR 7 1987

ACTION MEMORANDUM FOR THE ASSISTANT ADMINISTRATOR, BUREAU FOR
ASIA AND NEAR EAST

FROM: ANE/PD, Peter Bloom
SUBJECT: ASIA AND NEAR EAST REGIONAL - ASEAN Human Resources
Development Project (398-0287)

Action: We request that you authorize the Association of
Southeast Asian Nations (ASEAN) Human Resources Development (HRD)
Project in the amount of \$14.0 million grant funding.

Discussion: The HRD project continues the A.I.D. strategy of
supporting existing or emerging regional institutions and builds
on training, research and information dissemination activities of
previous ASEAN projects: The Plant Quarantine Centre and
Training Institute (PLANTI) in Malaysia; the Agricultural
Development Planning Centre (ADPC) in Thailand; the Scholarship
Program for Applied Tropical Medicine and Public Health (TROPMED)
in Thailand and elsewhere; and the Asian Institute of Technology
(AIT) Scholarship and Research Program in Thailand.

Evaluations of the Phase I activities indicate that regional
training conducted under earlier phases has been successful, less
costly than U. S. training and appropriate to regional needs.
Findings also indicate that improved regional networking and
increased financial support of ASEAN member countries are
necessary for the long-term sustainability of PLANTI and ADPC.
TROPMED and AIT have effectively made the transition from fully
donor-funded training facilities to institutions primarily
sustained by participating governments and scholarship fees. By
project end, PLANTI and ADPC should be operating on similar
bases.

The HRD Project will train approximately 1,988 ASEAN
participants: 306 at the Master's level at regional
institutions; 6 at the Master's level in the United States; 266
at the Diploma level at regional institutions; and 1,356 in
short-term training at ASEAN sites. An additional 744 nationals
will benefit from seminars, workshops and conferences focusing on
agriculture, health and other development technologies and
sectoral policy reform issues.

On the institutional level, the project will strengthen PLANTI
and ADPC to serve as regional centers and advance the regional
responsiveness of the TROPMED network and AIT to changing human
and technical resource needs.

Policy: The HRD Project supports A.I.D.'s four pillars--institutional development, technology transfer, private sector and policy reform. TROPED project activities also encourage increased attention to Agency sector objectives on child survival through seminars.

Bureau Review: The Bureau found the HRD Project sound and raised two issues and three concerns. Issues were (a) whether there would be sufficient funds for the HRD Project within likely ASEAN program levels; and (b) whether we can obtain greater host country contributions to core costs to assure continuity of activities after our support ends.

In regard to (a), the decision was that the Regional Development Officer (RDO) should address choices among projects in the next Annual Budget Submission, viewing the FY 1987 ASEAN Approved Assistance Program Level of \$3.8 million as a maximum figure for the next five years. If funds are obligated as scheduled in the HRD Project Paper, only about \$0.5 to \$0.8 million would remain each year for other projects. This funding limitation will require scaling down other elements of the ASEAN program.

As for (b), the Review noted that the last U. S.-ASEAN Dialogue requested ASEAN to address the problem of sustaining project-supported activities after A.I.D. assistance ends. Also noted was that some project implementing organizations are actively seeking and finding increased support from other donors. The decision was that pending the 1988 Dialogue response, the ASEAN RDO and A.I.D./Washington should continue encouraging ASEAN to increase their support for project activities.

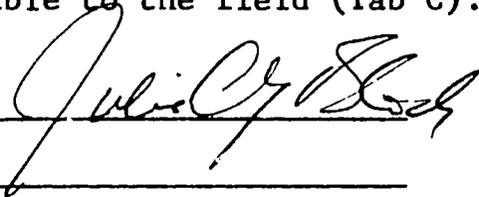
Also mentioned were three concerns: (a) There is a need to support institutional development beyond five years for PLANTI and ADPC to ensure the development of viable institutions. The project's provision of a cumulative total of ten years of assistance each to PLANTI and ADPC for institutional development is expected to be sufficient for viability. (b) The ASEAN RDO will process the renewal or extension of the PASA arrangement with USDA for quarantine expertise during project implementation as provided in Handbook 12, Chapter 1B. (c) The FY 1988 Congressional Presentation does not include health funds budgeted in the project paper. With the competition for health funds for child survival uses in the Bureau, there may be some difficulty in meeting the FY 1988 level requested.

Waiver: We are requesting your approval to waive the requirement that ASEAN pay for the international travel costs for participants attending regional training programs financed under the project. The waiver is justified on the basis of current ASEAN practices. We are instructing the ASEAN RDO to seek

agreement from the cooperating ASEAN countries to begin paying for international travel costs by mid-term project review to be scheduled at the completion of the second project year.

Justification to Congress: A Congressional Notification is being prepared for submission to Congress.

Recommendation: That you sign the attached Project Authorization (Tab A), thereby authorizing the ASEAN Human Resources Development Project in the amount of \$14.0 million in grant funding; approve the attached waiver (Tab B) of financing participant international travel costs; and sign the attached cable to the field (Tab C).

Approved 
Disapproved _____
Date APR 13

Attachments:

- A. Project Authorization
- B. Waiver - Participant International Travel
- C. Cable to ASEAN/Manila.
- D. Project Paper

Clearances:

DAA/ANE:JNorris	_____
ANE/PD:RVenezia	_____
ANE/PD/EA:JTennant	_____
ANE/PD/EA:JNussbaum	_____
ANE/EA:HKaufman	_____
ANE/TR:BTurner/HFreeman	_____
ANE/DP:BSidman/ASilver	_____
GC/ANE:JSilverstone	_____
ST/IT:DTerrell	_____


(draft)
(draft)
(draft)
(draft)
(draft)
(draft)

cc: PPC/PB:RHechtman
FM/PAFD:EOwens
ASEAN Liaison Officer, Manila

ANE/PD/EA:JDu Rettemjdr:3/31/87:Doc 12760

✓

AGENCY FOR INTERNATIONAL DEVELOPMENT
WASHINGTON, D.C. 20523

Waiver Number: ANE/87/G16/398-0287

ACTION MEMORANDUM FOR THE ASSISTANT ADMINISTRATOR, BUREAU FOR
ASIA AND NEAR EAST

FROM: ANE/PD, Peter Bloom

SUBJECT: ASIA AND NEAR EAST REGIONAL - ASEAN Human Resources
Development Project (398-0287)

Action: Your approval is requested to waive the requirement that ASEAN pay for the international travel costs for participants attending regional training programs financed under the regional ASEAN Human Resources Development (HRD) Project.

Authority: Handbook 10, Chapter 15, provides for waivers of the requirement that cooperating countries pay international travel costs for participants where justified. In previous projects, a waiver has been granted for ASEAN Regional Projects. The ASEAN Regional program differs from bilateral programs in that the cooperating entity is not a nation, but a regional system with a Secretariat and no legal ability to tax member countries. A Memorandum of Agreement signed between the U. S. Government and ASEAN serves as the mechanism for providing assistance. Funds are then obligated by agreements with individual regional institutions or cooperating host governments in countries where regional institutions are located.

At the May 1986 U. S.-ASEAN Dialogue, the United States requested ASEAN to address the issue of increased ASEAN contributions for operating costs for development projects. International travel costs for training could possibly be an item that ASEAN member countries would agree to fund in the future. Until this issue is resolved, however, no precedent exists for requiring member countries to provide such contributions.

Discussion and Justification: The HRD Project provides assistance to train an estimated 2,000 ASEAN nations at regional institutions offering technical training in priority fields. Nearly all participants will attend short- or long-term training programs at institutions in Indonesia, Malaysia, the Philippines, Singapore or Thailand. The project

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includes a number of follow-on HRD activities previously funded under separate projects. Under previous training components, ASEAN member countries contributed salaries, in-country travel and administrative costs, but did not finance international travel. A similar pattern of ASEAN member country contributions is recommended for this project. Total international travel costs for training are an estimated \$800,000.

Recommendation: That you waive the requirement that ASEAN pay for the international travel costs for participants attending regional training programs financed under the regional ASEAN HRD Project.

Approved *Julia Clyburn*
Disapproved _____
Date 4/12/87

Clearances:

DAA/ANE:JNorris _____
ANE/PD:RVenezia (draft)
ANE/PD/EA:JTennant (draft)
ANE/EA:HKaufman (draft)
GC/ANE:JSilverstone (draft)
ANE/TR:BTurner (draft)
ANE/TR:HFreeman (draft)
ST/IT:DTerrell (draft)

cc: ASEAN/Regional/Manila
ANE/PD/PCS:GWarshaw
ANE/PD File
Project Officer's Chron

ANE/PD/EA:JDu Retta: *JDR* jdr:04/07/87:Doc 1277o

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AID/ANE/PD/EA:JRNUSSBAUM/JDU RETTE
04/03/87 78227 DOC 12570
AID/AA/ANE:JCBLOCH

DAA/ANE:JNORRIS	ANE/TR:BTURNER {DRAFT}
ANE/PD:PBL00M	ANE/DP:BSIDMAN:ASILVER {DRAFT}
ANE/TR:HFREEMAN {DRAFT}	ANE/EA:HKAUFMAN {DRAFT}
GC/ANE:JSILVERSTONE {DRAFT}	ANE/PD:RVENEZIA:JTENNANT {DRAFT}

PRIORITY MANILA

AIDAC FOR ASEAN RDO BLACKMAN

E.O. 12356: N/A

TAGS: N/A

SUBJECT: ASEAN HUMAN RESOURCES DEVELOPMENT PROJECT
{HRD} {398-0287}: ANPAC REVIEW OF PROJECT PAPER AND
ASEAN PROGRAM REVIEW

JCB
JD
JN
PE

1. AA/ANE HAS AUTHORIZED HRD PROJECT. TEXT OF
AUTHORIZATION WILL FOLLOW SEPTTEL. ANPAC REVIEW REPORTED
BELOW. ANNUAL BUDGET SUBMISSION {ABS} SHOULD INDICATE
HOW LIMITED LIKELY FUTURE YEAR RESOURCES SHOULD BE
SPREAD AMONG ALL ASEAN PROJECTS.

2. ANPAC {ASIA-NEAR EAST PROJECT ADVISORY COMMITTEE}
APPROVED PP MARCH 20 AFTER BRIEFING ON ASEAN-U.S.
RELATIONS BY DAS EAP WILLIAM PIEZ AND REVIEW OF ASEAN
PROGRAM STATUS AND LIKELY FUNDING LEVELS.

3. ANPAC DISCUSSED THESE ISSUES:

- A. WHAT IS THE JUSTIFICATION FOR THE ASEAN PROGRAM
LEVEL?

- B. WILL THERE BE SUFFICIENT FUNDS FOR THE HRD
PROJECT WITHIN LIKELY ASEAN PROGRAM LEVELS?

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- C. CAN WE OBTAIN GREATER SUPPORT FOR OUR PROJECTS FROM THE ASEAN COUNTRIES?

- D. IS THE ASEAN PROGRAM TOO SCATTERED AND INADEQUATELY FOCUSED?

4. DAA/ANE NORRIS FOUND THE HRD PROJECT SOUND. HOWEVER, AT THE 3.8 MILLION DOLLAR FY 1987 OYB LEVEL FOR THE NEXT FIVE YEARS, ONLY ABOUT DOLS 500-800 THOUSAND WOULD BE LEFT EACH YEAR FOR ALL OTHER ASEAN PROJECTS. THE ASEAN APPROVED ASSISTANCE PROGRAM LEVELS SHOULD BE SEEN AS A MAXIMUM FIGURE DURING THE FIVE-YEAR TIME FRAME.

THE CHOICE IS BETWEEN "SHARING THE MISERY" AMONG ALL ASEAN PROJECTS OR ELIMINATING SOME ACTIVITIES AND FULLY FUNDING OTHERS. SOME ACTIVITIES ARE ALREADY AT VERY LOW LEVELS WHICH CANNOT BE CUT FURTHER.

WE CONCLUDED THAT RDO SHOULD ADDRESS CHOICES AMONG PROJECTS IN NEXT ABS. ALTHOUGH DRIVEN BY BUDGETS, THIS EXERCISE SHOULD MOVE THE PROGRAM IN THE DIRECTION OF NARROWING THE TECHNICAL AREAS THE PROGRAM COVERS.

5. RDO BLACKMAN REPORTED HIS EFFORTS TO INCREASE ASEAN SUPPORT FOR OUR PROJECTS SINCE THE LAST DIALOGUE. HE NOTED THAT SOME PROJECT IMPLEMENTING ORGANIZATIONS WERE SEEKING AND FINDING INCREASED SUPPORT FROM OTHER DONORS. PENDING THE NEXT (EARLY 1988) DIALOGUE, BOTH WASHINGTON AND FIELD CONTACTS WITH ASEAN SHOULD EMPHASIZE NEED TO PROVIDE RISING ASEAN SUPPORT FOR PROJECTS SO THAT THEY WILL NOT TERMINATE WITH THE END OF AID FUNDING.

6. WE HAVE APPROVED THE WAIVER FOR INTERNATIONAL TRAVEL COSTS OF PARTICIPANTS ON THE CONDITION THAT THE ASEAN RDO ACTIVELY SEEK AGREEMENT FROM THE COOPERATING ASEAN COUNTRIES TO BEGIN PAYING THESE COSTS BY THE MID-TERM PROJECT REVIEW, SCHEDULED AT THE COMPLETION OF THE SECOND PROJECT YEAR. IT SHOULD BE NOTED, HOWEVER, THAT MEETING TRAVEL COSTS WILL NOT BE SUFFICIENT TO SATISFY OUR CONCERN FOR INCREASED ASEAN FINANCIAL SUPPORT FOR PROJECTS.

7. THE FY 1988 CONGRESSIONAL PRESENTATION DOES NOT INCLUDE HEALTH FUNDS BUDGETED FOR FY 1988 IN THE PROJECT PAPER. WITH THE COMPETITION FOR HEALTH FUNDS FOR CHILD SURVIVAL USES IN THE BUREAU, THERE MAY BE SOME DIFFICULTY IN MEETING THE FY 1988 LEVEL REQUESTED.

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B. FOR CONGRESSIONAL NOTIFICATION PREPARATION, PLEASE
ADVISE ANE/PD OF DEOBLIGATION/REOBLIGATION LEVEL AND
VERIFY FUNCTIONAL ACCOUNT LEVELS. 44

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ASEAN HUMAN RESOURCES DEVELOPMENT (398-0287)

I. PROJECT SUMMARY AND RECOMMENDATIONS

A. Recommendations. Rapid change in the economies of the Association of Southeast Asian Nations (ASEAN)* generates a constant need to upgrade and prepare human resources for technological adaptation and development. In turn, variance in the character of technological change creates demand for deliberate policies and means to expand training and research opportunities. Recognition of skills training as a sound path for technical adjustment is the basis of ASEAN's request for US assistance with human resources development (HRD).

Authorization of \$14.0 million in grant funds to ASEAN is recommended to conduct priority HRD and related institutional improvement activities.** The grant will provide: \$4.0 million to better the quality of plant protection and quarantine services in the region; \$1.75 million to strengthen agricultural policy and planning capacities within ASEAN; \$3.0 million to improve the region's primary health and nutrition services; \$3.4 million to expand the post-graduate pool of engineers, managers, planners and scientists trained in agriculture and rural development, applied engineering, natural resources development, irrigation, computer applications and other technical topics; and \$1.85 million in contingency funding to support the above efforts with audit, evaluation and specialized design/coordination services as well as inflation coverage.

B. Summary Project Description. The primary goal of the project is to accelerate the transfer, adaptation and development of technology in selected areas that contribute to regional economic productivity. The project seeks to increase the human and institutional resource capacities of the ASEAN region in the key sectors named above, i.e. plant protection and quarantine, agricultural economics and planning, primary health, agricultural engineering, rural development and other priority development areas. By increasing human and institutional capacities, this project will strengthen ASEAN-wide networks devoted to regional cooperation for socio-economic development.

The project will train approximately 1,988 ASEAN participants: 360 at the Master's Degree level at regional institutions; 6 at the Master's Degree level in the US; 266 at the Diploma level at regional institutions; and 1,356 in short-term training at ASEAN sites. Moreover, some 744 nationals will benefit from seminars, workshops and conferences focusing on agriculture, health and

*ASEAN is comprised of six countries: Brunei Darussalam, Indonesia, Malaysia, the Philippines, Singapore and Thailand.

**Of the \$14.0 million, some \$13.35 million represents authorization of new funds, while an estimated \$650,000 comes from the deobligation/reobligation of funds previously authorized.

other development technologies. By project end, participants will be using acquired technical skills in their respective countries. Since many of them will be instructors from national institutions, or serve similar roles in member countries upon return, their transfer and diffusion of skills will multiply the economic and technical effects in the region as a whole.

On institutional levels the project will strengthen the ASEAN Plant Quarantine Center and Training Institute (PLANTI) in Malaysia and the ASEAN Agriculture Development Planning Center (ADPC) in Thailand to serve as regional plant protection and agriculture planning and research centers, respectively. The project will also advance the regional responsiveness of the ASEAN university network for Applied Tropical Medicine and Public Health (TROPMED) and the Asian Institute of Technology (AIT). It will sharpen the capacities of these and other institutions* to respond to changing human and technical resource needs in the region over time. Scholarship support for participants at these centers will facilitate information dissemination and sharing, thus increasing the cohesion of ASEAN's technical networks.

C. Summary Findings. The project is based on the pillars of AID policy. Its design is particularly strong with respect to institutional strengthening and technology development. As an HRD effort, the project is also consistent with the private sector, policy reform and child survival elements of Agency direction. See Part IIC below for further details about the project's fit with AID priorities.

No policy or operational issues appear as obstacles to successful implementation. The project is designed to fit logically within the ASEAN/AID Development Cooperation Program, yet it also reflects earlier State Department interest in a broader ASEAN-Pacific HRD Program. Discussions may continue along Foreign Ministry lines during the implementation period. Accordingly, project design is structured to enable the Agency to respond to an amplified or renewed HRD initiative.

The project is ready for implementation. Implementing institutions are completing successful Phase I efforts and have actively participated in detailed design work. They are fully prepared to enter Phase II operations in mid-1987.

D. PID Review Concerns. The ANPAC reviewed the Project Identification Document on April 8, 1986, and raised several issues (see Annex A). These issues and how the project is designed to deal with them is outlined in Part IIC and immediately below.

1. Program Budget Constraint. In response to downward pressure on Agency budgets, the level of funding planned for this HRD project has been reduced by 24% from the PID level.

*It is planned the Institute of Southeast Asian Studies (ISEAS) and other regional entities will be added to the HRD project in the near to medium term.

2. Operating Costs. The issue of funding source for recurring costs in the development program was raised at the 7th ASEAN-US Dialogue in May of 1986. ASEAN was requested to address this issue at the 8th Dialogue (which is tentatively scheduled for early 1988). Project obligating agreements with ASEAN, PLANTI and ADPC will require institutional finance plans by year 3 of the project. See Part VI of the paper.

3. Host Country Training. Concern was expressed about the ratio of ASEAN participants receiving AID-funded training in their own countries. This concern is generally resolved by the ASEAN practice of allocating available training slots in equal shares (sixths) to each member country. Allocation of training slots will be regularly monitored during implementation to help maximize regional cooperation.

4. Fund Accounts. Funding accounts proposed under the project are in accord with ANPAC recommendations. See Project Paper Facesheet.

II. PROJECT SETTING

A. Problem. The ASEAN economies are undergoing rapid (albeit uneven) change as members strive to use their natural and capital resources productively. Nearby nations such as South Korea and Taiwan demonstrate productivity potentials among the newly industrialized countries. Macro-economic statistics show significant shifts occurring in production structures and thus in the character of the labor force needed to advance development efforts in ASEAN. Taken together, the challenges of change -- keeping pace with technological and economic conditions, dealing with dislocations created by technical innovation, providing productive employment opportunities for a labor force expanding by 2-3 percent annually -- require steady investment in human capital. ASEAN member countries see a constant need to address human resource constraints in the evolving economic environment they face and have requested AID assistance to increase opportunities for technical training, research and information dissemination in the region.

Constraints to more rapid technological innovation and diffusion among ASEAN countries include limitations in capital, technology and institutional capacity.

1. Capital. Capital scarcity limits investment in physical infrastructure, including facility construction, equipment procurement and communication network development. Such investments are large-scale and usually better suited for private initiatives or national development programs. This project addresses the problem of access to capital for HRD that responds to production changes resulting from economic fluctuations and shifting employment patterns. Recent slowdowns in economic growth have challenged ASEAN countries even more to provide the skilled human capital needed for continued technological innovation.

2. Technology. The lack of skilled and knowledgeable people to adapt and operate new means of production limits technological innovation for economic growth. The project emphasizes the development of skills needed to apply technology for productive purposes.

3. Institutional capacity. The ASEAN region has fostered the development of advanced, research-oriented educational institutions which contribute to economic growth. Greater productivity is possible with an instructional system responsive, in appropriately specialized ways, to employment demands for trained graduates. The project will improve the match between technical skills needed and available in the region by encouraging increased institutional linkages, applied research and curriculum development at selected regional institutions.

B. ASEAN-US Development Cooperation. Since the first ASEAN-US Economic Dialogue in 1977, cooperative efforts have increased, with AID serving as the principal vehicle for US assistance to ASEAN. The AID/ASEAN Regional Office in Manila works with ASEAN officials and committees around the region to design, develop and implement the assistance program.

With an initial \$105,000 grant in 1979 to prepare projects, AID grant assistance had grown to \$34.5 million and ten projects promoting regional cooperation by the end of 1986. Three principal objectives guide the ASEAN regional program: (i) strengthening regional institutional capabilities; (ii) facilitating technical exchange; and (iii) enhancing the private sector's role in development. Priority sectors for assistance include agriculture and natural resources, energy, health and small/medium scale business. HRD continues to be a key element in the development cooperation as does information exchange and dissemination.

This project continues the AID strategy of supporting existing or emerging regional institutions and expertise for program implementation. It supports training and institutional development appropriate to the technological needs of the diverse ASEAN nations in the agriculture, health and nutrition and other service sectors that employ the majority of the labor force of the region. It also builds on activities of five previous ASEAN projects: the Plant Quarantine Centre and Training Institute (PLANTI); the Agriculture Development Planning Centre (ADPC); the Scholarship Program for Applied Tropical Medicine and Public Health (TROPMED); the Asian Institute for Technology (AIT) Scholarship and Research Program; and the Institute of Southeast Asian Studies (ISEAS). In addition, the project provides limited support for special short-term HRD activities meeting agreed criteria. ASEAN requested support for such activities at the May 1986 ASEAN-US Dialogue and the US agreed to provide it as part of the HRD project.

C. Relationship to AID Policy and Strategy. The project supports AID's four principal policy emphases of institutional development, technology transfer, private sector and policy reform. Project activities contribute also to the achievement of AID sectoral objectives on child survival.

1. Institutional development. The project provides assistance for institutional improvement, training, regional seminars and information dissemination in order to strengthen the ASEAN network in addressing regional development issues.

Agricultural components are particularly strong in institutional development. One is continuing the development of PLANTI to promote and support a regional network of plant quarantine services. This activity consolidates Phase I efforts in applied research, information dissemination and the training of nationals from each ASEAN country in the inspection of commodities and the prevention of plant pest entry across international borders. A second agricultural institution building effort is the continued development of ADPC to train agricultural planners from ASEAN countries and provide the base for agricultural policy cooperation. Of particular importance is the potential for future regional economic cooperation in the export of agricultural commodities. By project end, it is expected that PLANTI and ADPC will have the capacities to continue training and regional coordination activities without AID operating cost support.

Institutional improvements will also be sought in the project's more mature agencies, namely TROPMED and AIT. Both will be strengthened in their capacities to adjust and respond to changing regional requirements for HRD.

In addition to these institutional development efforts, the project supports Agency participant training policy by providing advanced technical skill training for selected agricultural, engineering, health and nutrition professionals from public and private institutions in ASEAN countries. Training focuses on technologies appropriate to participating countries and provides opportunities for collaborating on a regional basis in technical problem solving. Upon return these professionals will serve in key technical, training and administrative roles in strengthening agricultural and health organizations in their own countries.

2. Technological development. All components of the project contribute to the development of technologies through training and applied research activities. ADPC develops agricultural and applied planning skills and conducts research on planning models. PLANTI develops and encourages the adoption of techniques for crop protection, safe and effective pest control and food irradiation. AIT trainees adopt and develop improved techniques in the areas of agriculture and food processing, water resources, soil sciences, transportation systems, and rural and urban planning. TROPMED is training participants in various improved health technologies--immunization techniques, oral rehydration therapy, vaccine production, parasitology, tropical disease control, etc. TROPMED institutions have primary responsibilities for research in tropical medicine in addition to training functions.

3. Private sector. The project will encourage training of participants from the private sector in ASEAN member countries. PLANTI provides training for private companies conducting fumigation operations to ensure effective and efficient pest elimination procedures. As opportunities in the private sector expand, returned participants increasingly seek positions in private agricultural, commercial or health endeavors. According to a 1984 tracer study of AID-sponsored participants trained at AIT, 12 percent of previously trained graduates are employed in the private sector. Increasing numbers of medical doctors and other health personnel trained under the TROPMED activity serve in private sector positions. ADPC's planning and research training efforts serve the region's essentially private agriculture sector.

4. Policy reform. Although the project does not pursue policy reform objectives directly, several regional institutions are being strengthened to provide advice for regional policymaking on macro and sectoral issues. For example, PLANTI is becoming equipped to play a key role in coordinating regional policymaking in environmental issues associated with pesticide use and food protection and inspection of commodities for export trade. ADPC is expected to increasingly serve a role in the collection and analysis of regional agricultural data for regional economic policy formulation, cooperation and trade.

5. Child survival strategy. The project supports training and thesis research activities related to Agency child survival guidelines in conjunction with activities in public health and tropical medicine. Most TROPMED training financed under the project emphasizes the importance of immunization service delivery and the diagnosis, prevention and treatment of diarrheal and tropical diseases affecting children age five and under. Beside training, TROPMED centers conduct research on such topics as the use of local solutions (rice water) for oral rehydration therapy, immunization technology development, local nutritional supplements for children and vaccine development for malaria. Proposed future research includes the development of techniques to prevent and control nutrition diseases and deficiencies (Faculty of Medicine, University of Indonesia); improved maternal and child care through family planning, parasite control and nutritional promotion (Institute of Public Health, University of the Philippines); and improved service delivery in tropical pediatrics (Faculty of Tropical Medicine, Mahidol University). TROPMED faculty members work with Master's Degree participants to carry out research on these and related topics.

D. Other Donor Assistance. The other major donors to ASEAN -- the European Economic Community (EEC), Japan, Australia, New Zealand and Canada -- provide varying assistance for conferences, seminars, training, and institutional development activities. AID assistance provided under this project will finance discrete institutional development or training activities that complement other donor-funded efforts within the region.

AID has been the founding and only external donor supporting PLANTI to date. But the German Technical Agency (GTZ) has recently earmarked support for a research activity on the resistance of stored product insects to common fumigants and residue levels in ASEAN export commodities. PLANTI is also preparing a proposed activity in integrated pest management of fruit flies for submission to GTZ.

While AID has been principal donor for ADPC, the Food and Agricultural Organization (FAO) provides the Center with limited grant funds to develop case studies and training activities. The Host Governments of Malaysia and Thailand contribute to the support of PLANTI and ADPC, respectively.

AIT receives cash grants and in-kind assistance from some 20 other bilateral donors (including three ASEAN members -- Indonesia, the Philippines and Thailand), various multilateral and regional donor organizations as well as

private businesses and foundations. Cash grants are provided for scholarships, research efforts, continuing education activities, capital grants/building, equipment and other items. In-kind contributions include equipment and secondment of faculty members. Scholarship assistance from various donors makes up 75 percent of the total AIT operating budget. AID finances only scholarships, providing less than 11 percent of the total scholarship funding.

Four ASEAN member countries -- Indonesia, Malaysia, the Philippines and Thailand -- split the costs of operating expenses for the SEAMEO-TROPED Coordinating Office. AID and other donors provide special funds that have been approximating \$850-900,000 annually for TROPED regional training and research scholarships, seminars and conferences and personnel exchanges. AID finances only Master's Degree and short-term technical training scholarships for ASEAN member participants, with ASEAN host governments and (to a more limited extent) other donors supporting capital and operating costs at the participating institutions. Australia, Canada and the Netherlands also provide a limited number of scholarships for public health activities and for doctoral and other discrete training.

E. Lessons Learned. See Annex B hereto for a summary of findings/recommendations from external evaluations of Phase I assistance to PLANTI, ADPC, TROPED and AIT. The impact from HRD investments such as training and institutional development comes in the long term. Thus, the Phase I evaluations primarily suggest tentative effects rather than measure impact. With this limitation in mind, however, the evaluations indicate that regional training conducted under earlier phases has been successful, less costly than US training and appropriate to regional needs. Continued attention and monitoring is required with respect to nomination, selection and coordination processes among ASEAN member countries. This will help ensure the timely selection of qualified candidates.

The evaluations also noted that improved regional networking and increased financial support of ASEAN member countries is required if ADPC and PLANTI are to be sustained over the longer term. In this light, AIT and TROPED have effectively made the transition from emergent and fully donor-funded training facilities to institutions that are sustained by the participating government contributions and scholarship fees. Selected additional comments from the previous project evaluations follow.

1. PLANTI. The 1985 evaluation of PLANTI suggests that longer time span than five years is needed to establish a regional institution. Although remarkable progress was made in establishing the facility and training activities, more work on course refinement -- e.g., making training more practical and suited to the needs of regional member countries -- and developing regional coordination and financial support are required.

2. ADPC. The 1985 evaluation found the training component has been successful and cost-effective. Planning and research components require greater specificity and focus. Also noted is the need for a longer time span

to develop a new institution effectively, especially an institution serving a regional role. More efforts are required to increase the participation of regional members and/or other donors in the financial and overall support of the institution.

3. TROPMED. The 1985 evaluation affirms that this regional network of health education and research institutions provides cost-effective training appropriate to regional health delivery systems and medical needs. Past participants serve in higher or more technical positions as teachers or administrators in their respective countries. A special strength of the TROPMED network is its fuller financial and in-kind support by the ASEAN member countries.

4. AIT. Evaluated formally in 1982, AIT continues to review its offerings and conduct tracer studies of alumni on a regular basis. AIT was established with AID funding in 1959 and has developed into an independently financed institution providing cost-effective long and short term graduate training for Asians, including ASEAN participants. Tracer studies of AIT graduates from 1961-84 indicate minimal "brain drain" from the region (3.47 percent), and show movement of alumni to more responsible positions, increased private sector employment of graduates as well as alumni-reports on the usefulness of training, particularly in the agricultural, engineering and computer applications areas.

III. PROJECT DESCRIPTION

A. Goal and Purpose. The project goal is to accelerate the transfer, adaptation and development of technology in selected areas that contribute to regional economic productivity. Principal purpose of the project is increase the human and institutional resource capacities of the ASEAN region in plant protection and quarantine, agricultural economics and planning, health, agricultural engineering, rural development and other priority development areas. By increasing human resource and institutional capacities on a regional basis, the project contributes to the development of ASEAN-wide networks devoted to regional cooperation for socio-economic development.

B. Outputs and End-of-Project Status. The project will train an estimated 1,988 ASEAN participants: 360 at the Master's Degree level at regional institutions; 6 at the Master's Degree level in the US; 266 at the Diploma level at regional institutions; and 1,356 in short-term training at regional institutions. In addition, project-assisted regional institutions will involve an estimated 744 ASEAN nationals in regional seminars/workshops/conferences focusing on agriculture, health or other development technologies for adoption at the national or regional level. By project end, participants and seminar attendees will be using acquired technical skills in their respective countries. Since many of the participants will be instructors from national institutions, or serve similar training roles in member countries upon return, their transfer and diffusion of skills will multiply the technical and economic change effects in the region as a whole. Thesis research of Master's Degree participants studying at ASEAN institutions focuses on national or regional problems, increasing the appropriateness and utility of training.

The project will also strengthen ADPC and PLANTI to serve as regional agriculture planning and plant quarantine training and research centers, respectively. Beside new and improved training courses addressing regional needs, these institutions are expected to undertake an estimated 15 research studies and disseminate various agricultural and plant quarantine information and publications to ASEAN member countries. By project end, it is anticipated that these two institutions will have developed alternative sources of support to continue regional activities without AID assistance for recurring costs.

Moreover, the project will impact favorably on the institutional development of AIT and TROPMED. It will sharpen their response capacities to changing human and technical resource needs over time. Scholarship support for participants at these institutions will facilitate information dissemination and sharing, thus increasing the cohesion of technical networks, which constitute an informal but appropriate and workable form of regional organization.

Specific objectives, activity descriptions, financial plans, analyses and administrative arrangements for each component are presented below.

C. PROJECT COMPONENTS

1. ASEAN PLANT QUARANTINE CENTER AND TRAINING INSTITUTE - PHASE II

A) Background. Agriculture and agribusiness are mainstays in the economy and welfare of the ASEAN region. One of the foremost barriers to increased production is ineffective crop protection practice. Crop and forest pest losses are estimated to range from 25 to 35 percent in ASEAN countries. Through improved pest management practices, such losses can be reduced.

To strengthen ASEAN region plant quarantine (PQ) services, AID entered into an agreement in 1980 to establish the ASEAN Plant Quarantine Center and Training Institute (PLANTI) at Kebangsaan University, near Kuala Lumpur, Malaysia. Construction of the PLANTI complex began in March 1982, 18 months after the signing of the Project Grant Agreement between the Government of Malaysia (GOM) and the US. PLANTI has quickly become a highly effective institution for PQ training, research and extension-type activities in the ASEAN region.

The institute occupies 20 acres of land adjacent to the Malaysian Agricultural Research and Development Institute (MARDI). Facilities consist of an administration and laboratory building (each having a total floor area of 34,000 sq. ft.) which include administrative offices, lecture halls, audio-visual room, library and separate laboratories for plant pathology, entomology, microbiology, virology, nematology and general research rooms. Supporting farm facilities include an office, storage areas, three insectories, three greenhouses and a soil sterilization building. Six hostels with a central dining hall accommodate 60 students. A guest house is also available for guests or lecturers.

Phase I assistance was financed by \$5.4 million AID grant and a commitment from the GOM for the equivalent of US \$2.7 million. Actual GOM contributions are estimated at some \$4.0 million to date or \$1.3 million more than committed.

PLANTI has made remarkable progress and exceeded its initial training objectives, largely through the efforts of a motivated Director and staff and ASEAN member countries. Training completed through 1986 includes: Master's Degree 5; Diploma (10 months) 33; Certificate 55; and short-term training (1 to 3 weeks), 649, for a total of 742 participants.

In addition to training courses, PLANTI actively organizes technical meetings and promotes a regional information network. Joint meetings among PLANTI and ASEAN PQ experts are held at regular intervals to standardize regional practices and exchange ideas for a more cohesive PQ service region-wide. Technical meetings are held three times yearly in the capital cities of the ASEAN countries and at PLANTI. To date, 14 meetings have been convened. (See Annex C-2 for listing of topics.)

PLANTI has directed its research efforts during Phase I toward solving PQ problems. The focus is to develop methods of identifying and eliminating pests. PQ information has been actively disseminated to member countries through three types of publications:

(i.) Planti News. Begun in 1982 and published three times yearly, the newsletter provides updated information on plant pests, disease prevention and training.

(ii.) Pest Data Sheets clearly identify the serious pests and diseases in the region including Khapra beetle, South American Leaf Blight of Rubber, Cadang-Cadang diseases of Coconut and the Swollen shoot of Cocoa to name a few.

(iii.) Exotic Plant Quarantine Pests and Procedures for Introduction of Plant Material. A PLANTI textbook compiles the most current information available. The format is easy to follow and is useful as a reference for field practitioners.

B) Rationale. ASEAN member countries (except Singapore and Brunei) produce and export a large variety and volume of agricultural products. Pest infestation causes serious hardship for those employed in agriculture, representing almost 50% of the official labor force in Indonesia, Malaysia, the Philippines and Thailand. Economic loss from pestilence is disproportionately borne by those least able to withstand it, namely small operators.

The need for improved identification, prevention and reduction of pests is recognized by ASEAN governments. Member countries are committed to continue developing effective PQ activities. In the past six years, regional PQ staff has increased from 474 to 846 full-time employees, (a 78 percent increase). This increase has come with an increasing workload: the number of quarantine entry points has increased by 39 percent; and the issuance of phytosanitary

certificates within the region has gone up by 58 percent (See Annex C-1). Aircraft and passenger arrivals have increased significantly during the same period.

PLANTI endeavors to provide relevant training for both existing and recently added PQ personnel. Some 47% of the region's professional staff have undertaken either long-term (degree or one-year diploma course) or medium-term (22-week certificate) training. A significantly larger percentage (81 percent) have attended one or more of the subject-specific short courses (about 3 weeks). Phase II training activities are designed to reach the remaining 53 percent of the professional staff and significantly increase training opportunities for technical personnel. (Annex C-2 provides more detailed information on Phase I and II training activities.)

C) Description. The purpose of Phase II assistance to PLANTI is to improve the quality of basic PQ services in the region. Intermediate objectives are to (1) strengthen PLANTI's capacity to offer relevant training and do applied research; (2) further develop PLANTI as a clearinghouse for information on PQ issues affecting the ASEAN region; (3) assist member nations meet the phytosanitary requirements of their commercial partners and thus facilitate international trade; and (4) assist in the formulation of diagnostic procedures for detecting and identifying exotic pests and diseases and in developing contingency plans for containment and eradication should pest establishment occur.

AID and ASEAN will assist with this effort through providing the inputs outlined below.

1) Training

a. Master's Degree training for 12 participants (6 in the US; 6 in ASEAN institutions) in scientific, PQ-related fields where critical shortages exist.

b. Diploma training (10 months) in basic PQ practices and procedures for 30 PQ officers who hold Bachelor's Degrees in agriculture or the equivalent.

c. Certificate training of 22 weeks in basic PQ practices and procedures for 80 PQ officials who do not have B.S. level degrees, but hold diploma or certificate credentials.

d. Short courses of 2-4 weeks on specific PQ subjects for some 800 participants. Past courses have covered such subjects as (1) fumigation for private and government sectors, (2) cargo inspection and treatment, (3) pest detection techniques, (4) training for trainers, etc. (A detailed listing of all short courses provided to date is contained in Annex C-2.)

e. One-month study tours in the US and ASEAN member countries for 54 senior PQ officials to observe and receive on-the-job training on PQ practices/procedures being employed in the US and other ASEAN countries.

f. US observation/study tours for four PLANTI staff to observe and learn about recent development in PQ research and improved practices.

g. Senior fellowships of six months for 6 scientists to conduct in-depth research on selected priority PQ problems.

h. Support for up to 200 PQ officers to attend one-week meetings on selected technical subjects. Past subjects have ranged from standardization of PQ Treatment for Export and Import of Planting Materials, Development of Regional Emergency Action Programs to reviewing PQ Legislation & Documentation.

i. Support for three major PQ conferences for up to 50 PLANTI and ASEAN PQ experts (150 total) to standardize practices and procedures and exchange ideas to improve PQ services on a region-wide basis.

j. Up to \$40,000 to support the costs for PLANTI staff and senior ASEAN PQ officials to attend overseas (non-ASEAN) conferences on major PQ issues.

The total estimated cost of above training activities is \$2.1 million. Annex C-3 contains supporting cost estimates and the expected country distribution of the training.

Trainees for PLANTI's HRD activities are initially selected by the PQ chiefs in participating countries. The nominations are then submitted to the head of the department/bureau for further review/approval. Nominees names are then submitted to PLANTI for final processing. Selection criteria include (a) Bachelor's Degree in agriculture or science, or a Diploma or Certificate in agriculture; (b) position in PQ enforcement duties; and (c) position providing technical backstop services. PLANTI training is also open to individuals from the private sector involved in pest control and plant sanitation activities.

PLANTI uses a multi-media approach to disseminate information on its training activities. Training calendars appear in the PLANTI News, together with brief descriptions of the courses, eligibility guidelines and requirements for prospective participants. Annual course lists and applications are provided to FAO and ASEAN-COFAF. Press and broadcast releases/coverages are also used to create awareness of PQ courses.

2) Technical Assistance. Support is planned for 102 person weeks of short-term TA and up to two person years of long-term TA. Short-term TA is to assist PLANTI staff in curriculum and course development and to help ASEAN members resolve country-specific technical problems. A detailed listing of technical skills required, their timing and duration is provided in Annex C-3.

In response to an evaluation report recommendation, the project will also fund longer-term services of an experienced PQ officer to help augment the practical and applied dimensions of PLANTI training activities. An illustrative workscope for this position is provided in Annex C-3. The total estimated cost for both short and long term TA is \$425,000. See Annex C-3 for supporting detail.

3) Commodities. Commodities will be provided to enhance and expand PLANTI's training, research and information dissemination capabilities. The types of commodities needed are shown below:

<u>Item</u>	<u>Estimated Cost</u>
Laboratory Equipment	\$ 85,000
Reference Materials	40,000
Training & Audio Visual	30,000
Office Equipment	25,000
Others	20,000
	<u>\$200,000</u>

Annex C-3 contains a more detailed list of commodity requirements and costs.

4) Staff Support. Support for salary and allowance is to be provided for up to but not exceeding the positions eligible for funding under Phase I. The total cost is estimated at \$1.150 million for the four-year period as shown in Annex C-3.

5) Information Dissemination. The Phase II effort is designed to further strengthen the regional information network. Priority concerns are to increase applied research on critical problems and develop greater response capacity among PQ member countries. Print publications will be the primary mode, using PLANTI Pest Data Bulletins and the in-depth coverage sections in the PLANTI Newsletter.

D) Financial Plan. The total cost of this project component is estimated at \$6.12 million, without allowance for contingencies or inflation. The planned AID financing is \$4.0 million, and that from host country Malaysia and other ASEAN member countries is \$2.12 million.

As shown above, major AID contributions will cover the costs of: US and in-country training, estimated at \$2.1 million (52.5%), selected PLANTI staff at \$1.15 million (29%) and technical assistance at \$425,000 (11%). Other elements of the AID contribution are: commodities at \$200,000 and information dissemination at \$125,000 (7.5%).

The participating countries will provide the estimated equivalent of \$2.12 million of which \$1.79 million is expected to be in the form of cash contributions, with \$330,000 expected as in-kind contributions. Cash contributions include: staff support for non-technical personnel at \$1.42 million; operation and maintenance costs for the PLANTI center at \$100,000; construction of an additional wing on the PLANTI administration and training building at \$135,000; and local commodities and office/training supplies at \$135,000. In-kind contributions include the costs of participant salaries while in training and pre-departure costs incurred before commencement of training. A summary of the anticipated Financial Plan for this project component is presented below.

PLANTI
Component Financial Plan
(US\$ 000)

<u>Use of Funds</u>	<u>Source of Funds</u>		<u>TOTAL</u>
	<u>AID</u>	<u>ASEAN</u>	
1. Training	2,100	330	2,430
2. Technical Assistance	425		425
3. Capital Items			
a. Commodities	200	135	335
b. Construction		135	135
4. Operating Items			
a. Staff	1,150	1,420*	2,570
b. Other		100	100
5. Info Dissemination	125		125
Total	<u>4,000</u>	<u>2,120</u>	<u>6,120</u>

Annex C-2 contains supporting cost estimate data by source and use of funds.

E) Technical Analysis. PQ is designed to prevent or delay the entry of exotic pests into new areas and prevent their spread within countries or regions. This is accomplished by legislative authority, laws and rules which control the entry of high risk commodities, and through inspection and treatment of agricultural commodities by a trained inspection force.

To fully appreciate the role of PQ it is necessary to understand the concept of pest exclusion and the biological phenomenon which makes it practical. A species may be introduced into a new region many times but its establishment is normally prevented by environmental resistance (ER) factors. When conditions are conducive, a bridge-head may be established, but its further spread depends on these same factors and the species' biotic potential (BP). This is the species' inherent ability to survive and multiply. The interplay of these diametrically opposing forces (BP and ER) result in a probability of establishment. The number of times a species is introduced increases the probability of an establishment. PQ procedures reduce the number of times a pest may be introduced and the probability of establishment. The chance invader which avoids the PQ shield is hopefully destroyed by ER factors. (See Annex C-4).

PQ efforts around the world are based on these assumptions and have proven that "an ounce of prevention is worth a pound of cure". In determining the need and justification for a PQ intervention, however, three factors must be

*Represents the \$ amount of M\$4,650,000 which was included in the Malaysian Five-Year Development Plan (1986-1990) for support of PLANTI. Annual budget appropriations are subject to review and approval within the annual GOM budget process.

weighed. These are (1) the stake to be protected, (2) the recurring cost of the program and (3) the available resources in manpower and funding. The stake must justify the cost of the program and the resources to implement it must be available.

There can be little doubt that ASEAN's agriculture, which provides food and fiber for 295 million people, and makes a substantial contribution to the region's gross product and foreign exchange, is a stake worth protecting from the inroads of exotic pests and diseases. The success of effective PQ activity depends on a skilled and experienced inspection force, who in turn rely on the essential activities of PLANTI-training, research and information dissemination.

Phase II (1987-1991) of the PLANTI component will advance in the same general manner as Phase I. The validity of this approach is strongly supported by findings of the 1985 project evaluation and the follow-up tracer studies of the project trainees. Further, as indicated in Economic Analysis Section, this component has a low relative cost of training.

F) Administrative Analysis. Like Phase I, this project component will be implemented by the ASEAN Plant Quarantine Center and Institute at Serdang, Selangor, Malaysia. PLANTI is a regional institute whose primary financial support is from the GOM and, as such, it is subject to internal national regulations. However, it is also subject to administrative control by the ASEAN Committee on Food, Agriculture and Forestry (COFAF).

PLANTI is governed by a Board of Directors composed of one member from each of the ASEAN countries, plus the Director of PLANTI. The Board's primary responsibilities are in the following areas:

- 1) Approval of salary scales, appointments, promotions, filling vacancies and service conditions.
- 2) To determine rates of per diem for trainees and experts from ASEAN countries attending courses, workshops, conferences and seminars in Malaysia.
- 3) To provide guidance in curricula development and to oversee selection and final approval of students who wish to enroll in PLANTI.

PLANTI now has approximately 60 full-time professional, sub-professional and administrative staff. The professional PLANTI staff are mostly PhD's with limited practical experience in PQ. Staff is well qualified in respective specialties of entomology, nematology, plant pathology, weed science and are familiar with the equipment with which they work and various laboratory techniques. In the past, there has been very little turnover in the professional staff. They are mostly Malaysians but there is currently one Indonesian and one Filipino. Annex C-5 provides an organizational chart of PLANTI, including its relationship to COFAF.

2. ASEAN AGRICULTURAL DEVELOPMENT PLANNING CENTER - PHASE II

A) Background. The ASEAN Agricultural Development Planning Center (ADPC) was established at Kasetsart University, Bangkok, Thailand in 1980. It was created in response to (1) a regional shortage of trained personnel in agricultural economics and development planning and (2) a recognized need for stronger planning to enhance agricultural performance in the ASEAN region particularly in overcoming common agricultural development problems among the nations. The initial phase of the project, as amended (1980-86), was financed by a \$3.0 million grant from AID with counterpart contributions from the Royal Thai Government (RTG) of \$1.0 million. To date, the project has:

- 1) Provided English-language Master's degree training in Agricultural Economics for 41 regional participants. An additional 9 degrees were financed by bilateral AID programs or other sources.
- 2) Provided short-term training (3 to 6 months) for 125 participants in (a) agricultural planning strategies and methodologies, and (b) project formulation, monitoring and evaluation.
- 3) Provided short-term training (1 to 2 weeks) for 50 senior-level participants on special planning methodologies and strategies.
- 4) Completed 4 benchmark studies of agricultural production in member countries, 4 special studies at the request of the ASEAN COFAF, 7 market studies on specific crops and the development of ASEAN and national-level planning models.
- 5) Beginning in 1984, ADPC produced and published an annual ASEAN Statistical Yearbook on Food, Agriculture and Forestry.

A project evaluation was conducted in 1985 and concluded that (i) the training component had been highly successful and cost effective, (ii) the research and planning efforts were moderately successful, and (iii) it was too early to determine if the project was making a significant impact on development planning. It recommended that the project be continued, with Phase II incorporating the evaluation's recommendations.

B) Rationale. In relative terms, ASEAN countries invest heavily in their agricultural sectors. The lack of trained agricultural planning staff, however, has often resulted in less than optimal use of scarce resources. The training to be provided under the ADPC component will continue to address this problem. The number trained to date at the masters' level is far less than required to adequately address policy and planning issues at the levels of need including in-country regional planning, national-level planning and planning within the ASEAN region as a whole. The ASEAN countries have a common need for cadres of well-trained planning officers. Furthermore, the "mid-career" short-term training offered by ADPC is one of a few such activities that can be used to train lower-level line personnel in "state-of-the-art" planning techniques in a cost-effective manner.

C) Description. In the longer term, this project component aims to help increase agricultural productivity and production within the region. Its purpose is to strengthen the capacity of ASEAN member countries to formulate more effective policy and undertake better agricultural planning. Selected agricultural planners will be trained to assist with current planning weaknesses. At the same time, ADPC will be further developed in its capacity to serve ASEAN country needs on a continuing basis in the face of changing agricultural conditions. The following activities will be undertaken over the four-year period of Phase II.

1) Training

a. Master's Degree (Technical Group or TG) Training in Agricultural Economics for an estimated 36 participants. This course is designed for upper-level technical staff who are responsible for planning, research and/or policy analysis in the fields of food, agriculture or forestry. Candidates are required to be between the ages of 25-40; hold a B.S. degree in Economics, Agricultural Economics or Statistics; and have at least two years of experience in agricultural development. The total length of the degree program is 27 months, including a three month in a refresher course in economic theory, mathematics, statistics, applied economics and English.

b. Two short-term training activities - the three-month Micro Group (MG) for senior planners and the ten-day Special Group (SG) training for senior officials and research leaders. Phase II assistance to ADPC will train approximately 96 mid-level staff under the MG course and 36 senior-level staff under the SG course. The MG activity is a three-month intensive training effort in project planning, formulation, implementation, monitoring and evaluation. The first one and a half months are devoted to class lectures, case studies and workshops. The second half emphasizes supervised field practice in monitoring and evaluation and the preparation of project proposals under supervision by invited experts and ADPC staff. Two MG sessions per year are planned involving two participants per member country.

The SG training activity exposes senior government officials and research leaders of national food, agriculture and forestry agencies in ASEAN to systematic analytical approaches for agricultural development planning. Country institutions are increasingly aware that development planning becomes more complex as the whole economy expands. This ADPC training provides an opportunity for senior agricultural planners, researchers, and policy makers in the ASEAN countries to share their experiences and to keep abreast of recent developments in planning tools and approaches. ADPC will conduct three 10-day seminar cum workshops to focus on a selected topic relating to agricultural development planning or on a set of specific analytical tools and techniques in planning, for a group of 12 senior agricultural planners, policy makers or research leaders from the ASEAN member countries.

Annex D-1 further describes each of the three training efforts noted above. The table below summarizes the number of people to be trained by activity and year.

Number of Participants by Training Course
(May 1987 - June 1991)

	<u>1</u> <u>87/88</u>	<u>2</u> <u>88/89</u>	<u>3</u> <u>89/90</u>	<u>4</u> <u>90/91</u>	Total
Degree Training					
TG	12	12	12		36
Non-degree Training					
MG	24	24	24	24	96
SG		12	12	12	36
Total	<u>36</u>	<u>48</u>	<u>48</u>	<u>36</u>	<u>168</u>

2) Support for selected research and data collection activities.

a. Two in-depth comparative studies and analysis for both food and feed crops, including such topics as comparative costs of production, trade barriers (tariffs, taxes, etc.), incentives/subsidies, price policies and marketing issues. The following crop groups are of special interest: (i) rice, corn/maize, and other cereal crops; and (ii) sugar cane, soybean, cassava and other feed crops.

b. Specific studies of agricultural policy issues as identified and requested by the ASEAN COFAF during the implementation period.

c. Statistical data collection required for the publication of two additional ASEAN Statistical Yearbooks.

Further descriptive and budgetary data on the research and data collection activity is provided in Annexes D-1 and D-2.

3) Institutional Support Costs. These are commodity, salary and operating cost items.

a. Commodity support including office supplies and training equipment.

b. Salary support of 13 professional and semi-professional staff.

c. Selected operating and maintenance costs including transportation and communication, insurance and maintenance and repair.

D) Financial Plan. The total cost of this project component is estimated at \$2.325 million without allowances for contingencies or inflation. The planned AID financing is \$1.75 million and that from host country Thailand and other ASEAN member countries is \$575,000. As noted, major AID contributions will cover the costs of training estimated at \$818,000 (47 percent) and selected staff support at ADPC estimated at \$532,000 (30 percent). Other elements of

the AID contribution are research and planning at \$150,000, operations and maintenance costs at \$200,000 and commodities at \$50,000.

Participating countries are expected to provide the equivalent of \$575,000 to cover: rent for offices and training facilities at \$285,000; computer services at \$8,000; utilities at \$70,000; support staff at \$36,000; and other services in kind at \$176,000. A detailed breakout of both ASEAN and AID inputs and cost estimates is provided in Annex D-2. The expected Financial Plan for this project component is presented below.

ADPC
Component Financial Plan
(US\$ 000)

<u>Use of Funds</u>	<u>Source of Funds</u>		<u>Total</u>
	<u>AID</u>	<u>ASEAN</u>	
1. Training	820		820
2. Research & Planning	150		150
3. Institutional Support			
a. Commodities & Equipment	50		50
b. Salaries	530	212	742
c. O & M	<u>200</u>	<u>363</u>	<u>563</u>
Total	<u>1,750</u>	<u>575</u>	<u>2,325</u>

During Phase I (1980-86), ADPC also received \$40,000 from the FAO for conducting a short-term training activity and for preparing country specific case studies. The FAO has committed an additional \$20,000 to date for similar activities, and may provide as much as \$60,000 over the next four years. Other donors and bilateral USAIDs funded a total of nine M.S. Degree efforts under Phase I. There will likely be similar cases in the future.

E) Technical Analysis. The continued strong demand for advanced English language training by the four most populous ASEAN member countries is indicative of ADPC's regional utility. Annex D-1 provides detailed breakouts by type of training and country, showing that the primary beneficiaries have been Indonesia (58), Malaysia (37), Philippines (57) and Thailand (62). That there has been no participation by Brunei Darussalam to date and only minimal participation by Singapore is a reflection of the nature and state of their economic development.

The training provided under this component is unique in that it brings together the present and future agricultural policymakers of the ASEAN region for training in economics and planning within a common unifying framework. They will be thus be better able to cooperate in future regional problem solving, using a common language (English), common definitions and common

analytical approaches. This collaboration will be important with respect to important aims such as the reduction of regional trade restrictions and the development of regional marketing strategies with non-member countries or other regional economic blocks. As to the research and planning activity, the comparative cost, production and marketing studies planned are crucial to decisions and actions that would further cooperation in food and feed products within the region. Preparation of the annual ASEAN Statistical Yearbook helps provide policymakers with a series of standard measures.

Accomplishments under Phase I, together with the findings of the evaluation, provide conclusive evidence about the utility of planned Phase II training, although its magnitude is somewhat less than that undertaken during Phase I. Similarly, activities under the research and planning element build upon activities undertaken during Phase I and are generally of a lesser magnitude (i.e. three statistical handbooks were produced under Phase I while only two are proposed under Phase II). Research activities will be more focused, as recommended by the evaluation.

From the training standpoint, costs under this component are about 30 percent of US training costs. They are generally competitive with training to be conducted under other project components (see Economic Analysis).

F) Administrative Analysis. This component will be implemented by the ASEAN ADPC, located on the campus of Kasetsart University in Bangkok, Thailand. As noted, the center was established in 1980 with funding from the RTG and AID. RTG funds have been used primarily for the construction of dormitory facilities and a cafeteria and the renovation of an existing building for use as an administrative and training center.

The ADPC reports to the ASEAN COFAF through a Board of Planners (BOP) composed of one representative from each of the six member countries, with the Director of ADPC acting as the Ex-Officio Secretary to the BOP. The COFAF is one of five permanent committees under the Council of ASEAN Economic Ministers.

ADPC staff is composed of 23 persons, 15 of which are administrative and 8 of which are the professional staff who comprise the training, agricultural data collection and research and planning professionals. Charts depicting the relationships of COFAF, the BOP and the ADPC are shown in Annex D-3 as is a more in-depth discussion of ADPC's organization.

Two additional key institutions are the School of Agricultural Economics at Kasetsart University and the RTG Ministry of Agriculture (MOA). Kasetsart approves admission of participants, provides the required teaching staff for the Master's Degree course and grants the M.S. degree. MOA provides counterpart funding for certain staff positions and other operating expenses. It initially provided funds for the construction and renovation of ADPC facilities and has subsequently provided counterpart funding annually in the range of Baht 500,000 (\$20,000).

Two institutional issues require in-depth treatment before and during the mid-term evaluation. The first relates, as noted, to the absence of an ASEAN policy on sustaining ADPC and other centers (such as PLANTI) when donor assistance is terminated. The ADPC and PLANTI directors are acutely aware of this issue, but state that action must emanate from higher levels of the ASEAN organization. Effort to focus attention on the issue at the Economic Dialogue is in process. While this is an ASEAN-wide problem, it is raised as an ongoing issue with respect to both ADPC and PLANTI.

Another issue regards the proposal by Kasetsart University to develop a separate English language M.S. Degree program in Agricultural Economics, apart from that being carried out under ADPC. This proposal is still in a conceptual stage, and its progress will be monitored. What seems certain at this point is that an English Agricultural Economics M.S. program with a regional focus/responsibility will probably continue at Kasetsart in one form or another.

3. HEALTH AND NUTRITION (TROPMED) - PHASE II

A) Background. The SEAMEO Tropical Medicine and Public Health Project (TROPMED) is a cooperative network of training institutions in the region. Since its inception in 1967, TROPMED has worked to promote regional cooperation in the prevention, control and eradication of endemic tropical and communicable diseases through teaching and research. TROPMED members have drawn on their particular institutional strengths and interests to develop special Master's and diploma-level courses in public and preventive health. With a small central office at Mahidol University in Bangkok, TROPMED supports member institutions with special field activities, research training grants, faculty exchange, seminars, educational scholarships as well as in the production and distribution of scientific journals.

The US supported the early organization of SEAMEO-TROPMED and provided substantial assistance in capitalizing all four regional centres in Indonesia, Malaysia, Philippines and Thailand. With steady progress in institutional development, there was less need for direct capital assistance or operating cost support. Accordingly, scholarship assistance was initiated under the ASEAN-US program in 1981.

TROPMED received an initial \$2.5 million AID grant for 500 scholarships to be allocated at the rate of 100 per year to ASEAN nationals. Regional courses -- leading to either a diploma or Master's degree -- focus on applied health skills with English as the language of instruction. To date, (Academic Year 85/6), 517 persons have completed their respective training efforts, with 258 receiving diplomas and 259 receiving Master's Degrees. (See Annex E-2, for distribution of graduates by country, gender and field of study.)

An additional grant of \$700,000 was made in October 1986 to fund 100 more scholarships, extend the PACD to October 1987 and serve as bridge funding into Phase II assistance -- as recommended by the April 1985 evaluation. The main findings of the evaluation were that: (i) TROPMED training courses are 60%

less costly than comparable US training; (ii) ASEAN nations effectively use the TROPED regional network to address national health priorities for HRD; and (iii) tracer study responses indicate that scholarship recipients have returned to their home countries, are gainfully employed, and find the training to have a highly beneficial effect on their job performance. Taking these findings into account, Phase II assistance is designed to address the remaining manpower gaps in the sector.

B) Rationale. ASEAN is committed to help its member countries improve their living standards, recognizing health and nutrition as significant contributors to quality of life. Technical cooperation in a regional framework encourages collaborative efforts to address common problems in the sector. When well designed and managed, it can be more effective than a country by country approach, given the commonality of diseases in the tropical environment.

Infant mortality rates in the region remain high, while shortened life expectancy and disease-caused chronic debilitation are costly and pose a serious obstacle to further economic development. National statistics throughout the region reveal an increasing diversity of health needs with both communicable and chronic diseases highly prevalent among the vulnerable younger age groups. Furthermore, the systems providing health care are becoming more complex, responding to consumer demand for higher quality care. The training of health personnel thus remains important to each of the ASEAN countries as a strategy to keep pace with new technologies, increase access to health services, and reduce infant, child mortality rates.

C) Description

1) Training

(A) Plan. The Phase II plan includes both short-term technical training in 4 diploma courses and longer term academic training in 10 Master's courses. Initially, scholarship support will continue for courses now offered under Phase I. An illustrative training plan includes the following breakdown of scholarships for each institution.

<u>Institutions</u>	<u>Training Plan</u>		<u>Total</u>
	<u>Diploma</u>	<u>Type of Course</u> <u>M.S. Degree</u>	
Institute of Med. Research (Malaysia)	112	24	136
Mahidol University (Thailand)	60	64	124
University of Indonesia	64	12	76
University of the Philippines	-0-	100	100
University of Singapore	-0-	48	48
Total	<u>236</u>	<u>248</u>	<u>484</u>

The diploma courses offer in-depth laboratory and field experience. Government promotion policies in the region generally recognize the diploma

certification towards advancement but do not guarantee higher positions upon graduation. In tracer studies, students report that the training is highly relevant to their jobs, enabling them to better execute their assigned responsibilities. To encourage excellence in the diploma courses, top students are invited to continue studies towards the Master's degree with ASEAN scholarship support.

Master's level training varies in length from nine months to two years, depending on thesis or research requirement. Field trips, research papers, and group projects are often used to ground the student in fundamentals of public health practice and laboratory research. The smaller classroom size and individual project requirements encourage close contact between faculty and students. Thesis work is directed to applied research, offering ASEAN students an opportunity to choose topics relevant to their jobs. Examples of recent thesis topics include studies on antibody responses to immunization, clinical effects of antimalarials and immunological responses to malaria, as well as diagnostic techniques for diarrheal diseases.

(B) Implementation. The scholarship distribution plan allows for approximately equal numbers of diploma and Master's degree slots for member countries. Women can and do receive equal participation in scholarship opportunities. More than 50 percent of the scholarships offered under Phase I were awarded to women. A similar pattern of merit-based award is fully expected in Phase II.

The Governing Body of TROPMED is responsible for decisions on equitable distribution of scholarships. To date, Thailand, Philippines, and Indonesia nationals have received 85% of the scholarships available with AID funds. Scholarship slots have been made available to each TROPMED/National Centre in approximately equal proportion. It is anticipated that institutional equity will be maintained while opportunities will remain more widely available to ASEAN countries with the most critical manpower gaps. In no case will host country students exceed 25 percent of the scholarship recipients at any institution over the four-year implementation period. This stipulation is consistent with the project's regional cooperation objectives.

Guidelines for the selection of qualified candidates, established previously by the Governing Body, will continue in force. The principal concerns are to (i) maintain the academic standards of each institution and (ii) match the candidate's background and work-related skill needs to the courses offered.

In addition to course-specific requirements, criteria for selection include:

- (i) English language capability as measured by TOEFL testing;
- (ii) Age ceiling of 35 and in no case more than 45;
- (iii) Ministry approval or endorsement and bonding to return to their country after training is completed;
- (iv) Priority for applicants from outside the capital cities; and
- (v) Responding to requests for training in areas of national priority or need.

Course announcements will be circulated to faculty colleagues in both public and private educational institutions, Ministry of Health, Ministry of Education, and the Economic Development Authorities (in the case of the Philippines). Each institution's TROPMED Coordinator and selection committee will review and rank candidates for approval by both the Ministry of Foreign Affairs on behalf of ASEAN as well as the Ministry of Education on behalf of SEAMEO. Working collaboratively, the TROPMED Central Office has been successful in obtaining timely approvals for scholarship awardees, and it is anticipated that this process will continue.

TROPMED may soon request ASEAN governments to propose two qualified candidates for each slot, allowing each receiving institution further flexibility in selecting appropriate candidates. Private sector applicants are eligible for scholarship awards.

2) Regional Seminars. Information dissemination through the TROPMED network, for curriculum development and other technical purposes, is an objective of the Phase II effort. While there is consensus among TROPMED institutions that more systematic information dissemination is key to the continued network strengthening, competing time demands on both faculty and administrators constrain attention to this need.

Phase II assistance will support the dissemination of new materials on childhood diseases. The emphasis of existing courses is on strategies to address mortality patterns and health problems of the region. It is expected that three seminars will be designed and conducted during Phase II. Seminar topics will address issues in implementing low technology intervention strategies such as ORT in the treatment of diarrheal diseases, and vaccine technology breakthroughs in the prevention of early childhood deaths (such as malaria). The regional seminar format will be used to convey and update knowledge in areas such as new techniques for the diagnosis of childhood diseases and local adaptations of ORT using a rice water base as substrate for absorption of electrolytes. An illustrative list of TROPMED's planned regional seminars appears in Annex E-6. Selection of seminar topics for project support will be made early in Phase II.

Seminar outputs will be used in ongoing regional courses. Drawing on the expertise of regional researchers and educators, from both public and private institutions, the seminars will help assure a systematic infusion of child survival materials in existing public health and tropical medicine courses. Moreover, the meetings will encourage common theme strategies for HRD and child survival initiatives in the region. Component funding will support the pre-seminar planning, logistics and resource persons.

The training scholarships and regional seminars are the primary project activities. Additional capital or operating support is neither requested nor planned.

D) Financial Plan. The total cost of this project component is estimated at \$4,450,000, without allowances for contingencies and inflation. The proposed AID contribution is \$3.0 million, while the ASEAN member countries are expected to provide in-kind contributions of \$1.45 million. The AID contribution will cover the total cost of 484 scholarships, whose costs are estimated at \$2.9 million, and three regional seminars the cost of which is estimated at \$100,000.

ASEAN inputs to the component will include the salaries of TROPMED scholars while attending regional courses and a portion of the TROPMED Central Office operating budget supported by ASEAN government contributions and devoted to the implementation of component activities. Local costs are estimated at \$1.45 million in local currency equivalent or one-third of the total estimated cost.

Funds will flow through the existing system, with USAID releasing funds directly to TROPMED on a cost-reimbursement basis. The system has proven workable, providing adequate control and ease in administration.

Projections of the current rate of disbursements indicate that Phase I funds will be fully expended by the October 1987 PACD or before, perhaps as early as July 1987. The 1986 bridge-funding is expected to support scholarships through the end of the 1985/87 academic year, although Phase II funding could be appropriately obligated in FY 1987 to facilitate TROPMED commitments for the 1987/88 academic year.

Based on planning with TROPMED, it is anticipated that project resources will be allocated to this component as follows.

TROPMED
Component Financial Plan
(US\$000)

<u>Use of Funds</u>	(U.S. \$000)		<u>TOTAL</u>
	<u>Source of Funds</u>		
	<u>AID</u>	<u>ASEAN</u>	
1. Scholarships (484)			
a. Diploma (236)	1,080		1,080
b. Masters (248)	1,820		1,820
2. Regional Seminars	100		100
3. Operating/Support Costs	_____	1,450	1,450
	<u>3,000</u>	<u>1,450</u>	<u>4,450</u>

See Annexes E-3, E-4 and E-5 for supporting cost estimates and bases of the Financial Plan. Annex E-6 contains a projection of component expenditures by fiscal year.

Other donor contributions are limited in scope though appropriate to institutional needs. For example, the Netherlands is supporting a long-term Nutritionist adviser to assist the University of Indonesia, Faculty of Medicine program. Additional scholarship support has also become available for the diploma course, with AID funding serving as a catalyst for Netherlands support. In the other ASEAN countries, the Islamic Foundation for Science and Technology Development supports scholarships for regional courses in Indonesia and Malaysia. The University of the Philippines' College of Public Health is expanding into a more field-oriented curriculum as a direct result of GTZ assistance.

In addition to foreign donor assistance, the ASEAN governments also contribute to TROPMED. Thailand, notably, offers operating support as well as endowment contributions to strengthen regional cooperation efforts of TROPMED. The Governments of Indonesia and Philippines provide endowment and scholarship funds for regional courses.

Overall budget support to SEAMEO-TROPMED depends on three main sources of funding. The basic, annual operating expenses of TROPMED are shared by Indonesia, Malaysia, Philippines and Thailand. More substantial contributions are made by host countries to support their own participating TROPMED institution including capital and operating funds. External donors include Australia, Canada, France, Germany, Netherlands, as well as the US in scholarships for regional training courses, seminars, and faculty exchange.

The administrative costs of SEAMEO-TROPMED have remained notably low. In 1981/2 the operating costs represented 16 percent of the special external donor funds budget. This percentage was subsequently reduced to the current level of 12 percent.

The budget is based on 121 scholarships per year over the four-year life-of-project or a total of 484 scholarships. Approximately half or 236 are expected to be for six-month diploma training. Exchange rate fluctuations will be monitored during the project to assure that adequate funds are provided to both participants and institutions. Savings that result from local currency devaluations will be applied to additional scholarship slots.

E) Technical Analyses. A technical review of this component reveals that the approach is sound, following a well-tested and straight-forward design plan. A regional approach to public health and tropical medicine training makes sense in the context of common disease problems.

The training is appropriate to the region's increasing demand for more highly trained health workers. Competition for course scholarships is increasing. The courses generally provide basic technical training to develop laboratory

and management skills. As Indonesia, the Philippines and Thailand promote in-country vaccine development, and pharmaceutical companies look to the Pacific Basin for new trade markets, there will be increasing opportunities to use the advanced laboratory and research training. Furthermore, expanding public health efforts in these countries are demanding greater numbers of trained health managers.

Because of the variety of courses offered under TROPMED, each country's changing priorities can be accommodated by both short and long term opportunities. Courses such as the MPH program sound duplicative in title across institutions. In fact, though, they offer different learning modules in selected areas and use different entrance criteria.

F) Administrative Analysis. ASEAN Committee on Social Development and ASEAN Sub-Committee on Health and Nutrition monitor and review overall project progress. Executing responsibilities, however, remain with SEAMEO-TROPMED under the management of its director. The SEAMES (SEAMEO Secretariat) group coordinates closely with TROPMED on financial and fiscal administration.

The Governing Body, with a high-level representative from each of the participating institutions, will continue to be responsible for the distribution of scholarships as well as the resolution of issues that arise during implementation. In consultation with member countries and the AID/ASEAN Regional Office, the Governing Body will select the priority themes for seminar workshops and determine reasonable budgets. Prior experience with the Governing Body and TROPMED network firmly establishes the feasibility of Phase II assistance.

This component, as the others, is supported by a detailed proposal submitted to AID and endorsed by ASEAN technical groups. The training focus is consistent with and supports national health plan priorities.

TROPMED coordinates support to each participating institution, directing its efforts to share the unique resources of each institution. To illustrate, the Institute of Medical Research in Kuala Lumpur has steadily developed from a British Commonwealth research unit to a vaccine production center. It now has comparative advantage in monoclonal antibody production and vaccine clinical trials (most recently with malaria vaccines). In Thailand, Mahidol University and its affiliated Tropical Disease Hospital offers unique opportunities for clinical training and research observation. For rural public health studies, the University of the Philippines provides field work experience in local level primary health care. The scholarship approach facilitates regional use of these specialized institutional resources.

4. ASIAN INSTITUTE OF TECHNOLOGY (AIT) - PHASE II

A) Background. The Asian Institute of Technology (AIT) was chartered in 1967 by the Royal Thai Government (RTG) as an independent educational institution with international status. The Institute provides graduate training for engineers, scientists and planners and thus serves as an important contributor to the achievement of ASEAN's development goals.

AIT's core program is undertaken through nine academic Divisions: Agricultural and Food Engineering, Computer Science, Energy Technology, Environmental Engineering, Geotechnical and Transportation Engineering, Human Settlements Development, Industrial Engineering and Management, Structural Engineering and Construction and Water Resources Engineering. Beside the 20-month Master's degree, these Divisions offer eight month diploma training for those who cannot complete the Master's or who cannot be released from their positions for the longer period. There are also special short-term activities, responding to specific needs expressed by the ASEAN countries, offered at the following Centers: Asian Disaster Preparedness, Asian Regional Remote Sensing Training (ARRSTC), Library and Regional Documentation, Regional Computer (PCAD) and Continuing Education (CEC). The latter holds short courses and seminars dealing with Asian development priorities. (See Annex F-1 for a summary description of each of the above Divisions and Centers.)

In 1979, AIT was awarded one of the first US-ASEAN project grants allocating US\$3.125 million for 250 scholarships with 10 Master's degree scholarships to be awarded every year over a five-year period to students from each of the (then) five ASEAN countries. In 1984, due to increasing costs for individual scholarships, AID approved an amendment increasing the life-of-project funding to US \$4.125 million and extending the PACD to July 1987.

In 1982, an evaluation of the project was undertaken. The evaluation concluded that overall the project was successful in (i) providing the kinds of training required by participating countries, (ii) enhancing the effective use of trained personnel within the region, (iii) promoting research applicable to the region and (iv) providing support to the regional institution ideally suited to meeting these objectives. The evaluators recommended, and the ASEAN Standing Committee adopted, the option of scholarship funds being used for short-term training as well as degree training.

As of late 1986, 299 ASEAN nationals had received US-ASEAN scholarships. Of these, 21 are currently enrolled, 137 received their Master's degree, 6 completed the AIT diploma program, 74 received certificates from either the PCAD or ARRSTC, 45 attended special short courses offered by CEC and 16 either withdrew or were dismissed from their course. (See Annex F-1 for a Summary of US-ASEAN Scholarship Holders from January 1980-September 1986.)

B) Rationale. While a region-wide manpower assessment has not been undertaken, evidence of continued demand for AIT training has been compiled from a variety of sources. These include: 1) the previously mentioned US-ASEAN project tracer study; 2) a subsequent tracer study of all AIT graduates for the 1961-1984 period; 3) an internal AIT review of the relevance of academic programs; 4) continued requests from the ASEAN governments for scholarships; and (5) continued financial support from bilateral and other donors. Moreover, national development plans in the region call for more inputs to science and technology as a strategy to increase productivity and self-reliance. The ASEAN proposal for a second phase of scholarships at AIT reflects a recognition of the need for expanded technical training opportunities.

While US support for AIT is relatively small - amounting to 10.67 percent of all donations in 1985 - the assistance operates in a catalytic way by helping attract and maintain other donor support as well as by encouraging regional cooperation in higher education among the ASEAN nations.

C) Description

1) Training

(A) Plan. The Phase II plan includes both short term training courses and longer term Master's degree courses. AIT will be working with each member country to determine priority needs on an annual basis. Available short-term courses include the one-term training efforts at PCAD and ARRSTC as well as the three to six-week training activities conducted by the CEC in such areas as geotechnical and transportation engineering, on-farm water management, design of small scale irrigation systems, and project management, among others. Increased capability of these centers to respond to specific ASEAN problems will be encouraged as an institutional output of Phase II.

The following table provides an illustrative training plan for Phase II:

<u>Type of Training</u>	<u>Training Plan</u>				
	<u>Year 1</u>	<u>Year 2</u>	<u>Year 3</u>	<u>Year 4</u>	<u>Total</u>
Master's Degree Training	15	20	20	15	70
Short Term Training					
PCAD/ARRSTC Certificate	68	46	46	68	228
CEC Special Courses	29	29	29	29	116
Total Participants	112	95	95	112	414

A research award has been included as an integral component of Master's degree work. Students select an appropriate research topic with their AIT advisor, travel to their home country between semesters for data collection under the direction of an AIT designated preceptor (usually an AIT alumni) and then return to AIT to defend their thesis work. The experience is judged to be both useful in learning and relevant to later on-the-job applications.

(B) Specially Designed Activities. In addition to the above training plan for Phase II, there will be increased use of Institute and CEC facilities and capacity to organize/conduct short-term special training activities. Illustrative of the type of special courses envisioned are three specific activities for regional participation that were submitted to the 7th ASEAN-US Dialogue by ASEAN technical committees. These are: (1) a seminar on Computerization of Tax Administration Operations for senior level officials from each ASEAN member country; (2) a Marine Pollution Training activity on strategies to combat oil spills; and (3) courses for ASEAN participants on the management, control, transportation and disposition of Hazardous Materials.

Such activities are consistent with ASEAN/AID strategy emphases on technical exchange in key development areas and on responding to natural resource and environmental issues/difficulties.

These courses along with other activity proposals will flow up through the ASEAN Committee System for review and selection. Course details -- length, number and level of participants and number and type of consultants to be contracted by the CEC -- will be determined by AIT, the ASEAN working groups and the ASEAN Regional Office. The budget provides for 150 person months of such training. See Annex F-1 for the eligibility criteria of short-term special courses for AID project assistance.

(C) Implementation. To be eligible for admission to Master's degree study, a candidate must:

- (i) Hold a bachelor's degree in an appropriate field of study from an institution of recognized standing;
- (ii) Have undergraduate grades significantly above average;
- (iii) Possess an acceptable level of English proficiency;
- (iv) Have satisfactory physical and mental health to pursue academic studies at the graduate level; and
- (v) Meet the individual Division's specific academic requirements.

There are no uniform requirements for admission to certificate or other non-degree, short term activities. Selection criteria are contained in the particular nomination/acceptance procedure being followed.

The selection process under Phase I of the US-ASEAN project will be used for the Master's Degree program under Phase II. Scholarships will be announced in each country with applicants from either the private, university or public sectors eligible to apply. Designated coordinators in each country review applicants and forward their names to the Admissions Committee of AIT for final selection.

AIT has actively lobbied for more timely submission of scholarship candidates and more efficient use of available scholarship slots. Several proposals are under consideration by ASEAN. Further developments in the effort to increase the number of qualified nominees, particularly from the private sector, will be monitored closely. See Administrative Analysis for more detailed discussion.

D) Financial Plan. The total cost of this project component is estimated at \$4.55 million without allowances for contingencies or inflation. The proposed AID contribution is \$3.4 million, while ASEAN countries are expected to provide in-kind contributions estimated at \$1.15 million.

The AID contribution is expected to cover the costs of 70 Master's Degree training slots, 228 PCAD/ARDSTC training slots, 116 CEC Special Activity slots plus 150 person months of short-term specially designed training activities, the bulk of which is expected to be administered by CEC. ASEAN inputs to the project will include the salaries of the participants while in training, 15 percent of the RTG waiver of AIT taxes and 15 percent of the crown land rental value. (Fifteen percent is the estimated portion of AIT students funded under the Phase II scholarship component.)

Based on the above planning, it is expected that project resources will be allocated to this component as shown in the Financial Plan below.

<u>Use of Funds</u>	<u>AIT</u>		<u>Total</u>
	<u>Component Financial Plan</u>		
	<u>(US\$000)</u>		
	<u>Source of Funds</u>		
	<u>AID</u>	<u>ASEAN</u>	
1. Scholarships (M.S. & Short-term)	2,600		2,600
2. Research Grants (M.S.)	360		360
3. Special Courses	440		440
4. Participant Salaries		720	720
5. In-Kind Items		430	430
TOTAL	<u>3,400</u>	<u>1,150</u>	<u>4,550</u>

See Annex F-2 for supporting cost estimates and detailed bases of the Financial Plan. It also includes the projection of component expenditures over the implementation period.

The scholarship budget is based on 36 scholarships per year (6 per participating country) each covering a 20 month period. Over a four year period, the total is 144 scholarships. An anticipated increase in the allowance and book grants in year 4 (1990) is included, though initially these are set at lower levels than under Phase I; AIT and AID desire to bring these grants into conformity with prevailing institutional practices. Research is shown as a separate line item for Master's thesis work. As with books and allowances, cost of this item will also be monitored and lowered as appropriate to insure that awards are only provided to participants whose research is country-specific and requires travel. The incentive for cost-consciousness here is that funds not used/needed for books, allowances or research are available for additional training.

The project allocates \$440,000 for the special design and conduct of courses required by ASEAN member countries. As described under types of training in Section (1B) above, the CEC will work with ASEAN technical committees for specific training proposed by ASEAN technical committees and endorsed by previous ASEAN-US Dialogue sessions. Average cost estimates are some \$2925 per person month for CEC courses.

While the total amount of scholarship funds available to each country is based on their annual allocation of Master's degree scholarships, AIT has worked out an equivalency standard to equitably allocate short term trainee slots depending on the type and length of course. It is as follows:

- (1) On an average basis of \$4,500 per trainee for the PCAD and ARRSTC, AIT can substitute/train approximately, 4.5 trainees for the cost of one Master's degree.
- (2) On an average basis of \$700 per person week for the courses at the CEC, AIT can train nearly 4.9 trainees for 6 weeks or 9.8 trainees for 3 weeks at the cost of one Master's degree.

Operationally, these substitution ratios reflect how AIT will allocate slots in response to varied scholarship training preferences expressed by the ASEAN countries. Improved AIT capacity to meet diverse demands is expected to be an important form of institutional development in the implementation period.

Other Donors. Overall donor contributions to the Institute come in the form of grants for scholarships which cover about 75 percent of annual operating costs, sponsored research, continuing education activities, campus development, equipment purchase, operating costs, secondment of faculty and senior administrative and research staff, local funds and the AIT Endowment Fund. (See Annex F-2 for other AIT financial data.)

Contributions from the US have decreased from an average of 15.05 percent in the 1959/60-1984/85 period to 10.67 percent for 1984/85 while contributions from international organizations and from business, foundations, private and others have increased. Also of interest is that the distribution of AIT's expenditures on academic activities has increased from 49.50 percent in 1980-81 to 54.11 per cent in 1984-85, while expenditures on administrative services have decreased from 24.43 per cent to 20.41 per cent for the same periods.

E. Technical Analysis.

1) Demand for Training. Both the demand for and the use of AIT training have been assessed in a variety of ways. In February 1984, a tracer study was conducted for the ASEAN-US Project. The study was aimed at tracking the progress of the 93 participants who completed the 20-month master's degree program. The study found that 88 percent were working in their home country and 6 percent in Asian countries. Only 6 percent were working/studying outside Asia and most were expected to return. Regarding type of employment,

45.5 percent were working in government agencies, 42.5 percent in universities or research institutions and 12 percent in the private sector. Feedback from participants who had returned to home countries revealed that in almost all cases, they were given more responsible positions, reflecting their improved competence and were assigned to projects needing their skills in research, policy formulation and supervision of expenditures.

The emphases of study for these participants were based on priority technical fields identified by the ASEAN countries. In particular, Indonesian, Filipino and Thai grantees pursued their studies primarily in the Agricultural and Food Engineering and Water Resources Engineering Divisions. The Malaysians preferred a range of short courses, including On Farm Water Management, Design of Small Scale Irrigation Systems, Ferrocement, Project Management and Computer Applications. Singaporeans heavily availed themselves of the PCAD program.

Every two to three years, AIT conducts a tracer study of all its alumni to review the effectiveness and relevance of its program and to assess the region's emerging technological needs. Its latest study for the 1961-84 period recorded the career advancement of 1,152 (out of 3,286) alumni. It revealed that only 3.5 percent of the graduates were employed outside Asia. The majority of the respondents were occupying middle management positions while 26 percent held senior positions. Research and development was the most frequently cited type of professional activity, followed closely by management and production, construction and design and, to a lesser extent, by consultancy and teaching. The private sector has been drawing some 27.4 percent of AIT's graduates. Overall, AIT training was considered very useful in preparing graduates for both their first and current jobs. Computer applications ranked highest as the field of study they would want to study more in depth if they returned to AIT, with agricultural machinery and management as the fields perceived most important to development.

In preparing its academic plan for 1986-1989, AIT convened a Working Party composed of alumni, former faculty members, donor governments and selected Asian experts to review its academic program. Essentially, the task was to determine (1) whether programs of similar quality exist elsewhere in Asia and (2) the relevance of the program to Asia. The Working Party found that there were few programs of similar quality and this was particularly true for aquaculture, basic human settlement planning, energy technology, rural development planning and transportation systems. Rated high on relevance to Asia were agricultural machinery and management, agricultural soil and water engineering, computer application technology, energy technology, irrigation engineering, rural development planning, water and waste-water engineering and water resources development. Nine possible new areas of study were suggested with land development and conservation and marine resource development rated above the others.

Finally, the annual enrollments by country and field of study are an indication of the training areas considered most relevant to national development. In the case of the US-ASEAN project, letters are sent each year

by AIT to the ASEAN countries requesting their priority training needs. This assures a constant flow of demand data to the Institute, challenging it to develop new curricula and courses to meet the demand. By supporting AIT's efforts to respond to constantly evolving ASEAN HRD needs, greater institutional response capacity is anticipated as an output from Phase II.

2) Development of New Offerings. To maintain its competitive edge vis-a-vis other higher education institutions in the ASEAN region, while responding to new or changing scientific and technological requirements, AIT must continuously review its offerings with a view to revising programs or initiating new ones. For example, the Institute's new Agriculture Systems Study, offered by the Division of Agricultural Food Engineering, focuses on crop/livestock/fish integration in rainfed areas. A Joint Irrigation and Drainage Activity to start in 1987 emphasizes the conveyance and control of water in canal networks as well as the control and use of water at the farm level. Also, the Asian Disaster Preparedness Center has been established to help Asian countries strengthen their disaster management systems through short courses/workshops, action-oriented studies and planning services, technical programs and consultancies.

The CEC conducts short courses, workshops and other activities which reflect the development priorities of the region. Among CEC's course offering in 1985, the greatest demand was for short-term training in agricultural and water resources development, covering on-farm water management, problem soils, municipal water supply, groundwater development and operational hydrology. CEC courses in rural development during 1985 were of two main types, namely people-centered and infrastructure-oriented. An example of the former was a course on the role of rural women. Examples of the latter included activities in rural water supply and sanitation, and road construction and maintenance. Management training for both the public and private sectors included such activities as project management training for public works engineers and seminars on computer applications in business management. In response to an increasing demand for training in energy technology, CEC conducted courses in various aspects of harnessing solar energy, mini-hydropower schemes and energy and environment statistics for macroplanning. These continuing education activities range from contracted tailor-made training courses to advertised international workshops and seminars. Annex F-3 includes a list of CEC offerings planned for 1987.

3) Regionalism. In every respect AIT is truly a regional institution serving Asia, including ASEAN. For the September 1986 term, there were 646 students coming from 23 countries with 11 countries, including four ASEAN countries, sending 15 or more. In the same period, there were 101 faculty members (not all fulltime or permanent) also representing 23 countries. Finally, in 1985 AIT received 65 percent of its financial support from 21 bilateral donors with seven donor governments, beside the United States, providing 3 percent or more.

Another aspect of AIT's regional role is manifested in its linkages with national institutions in Asia. These linkages are either through formal agreements with academic institutions or through the establishment of (or membership in) subject-specific networks.

4) Private Sector. In 1984-85, twenty six organizations, representing either the private sector or foundations created with support of the private sector to solicit funds for AIT, contributed 22.95 percent of the donations received for that period. This was a substantial increase from the 11.35 percent contributed in 1982 and more than double the amount contributed by AID under the ASEAN-US Scholarship Project. Most of the donations are for scholarships for their employees, although some funding was directed to research.

Although overall 27.4 percent of AIT's alumni are serving in the private sector, only 12 percent of the graduates under the ASEAN-US Scholarship Project are in the private sector, and most of these were public service employees at the time of receiving their scholarship. This is to be expected since in Phase I each of the ASEAN governments only received the equivalent of 10 Master's degree scholarships per year. Phase II it is expected, particularly for those governments choosing more short-term training, that a greater effort will be made to involve the private sector.

F) Administrative Analysis. AIT is well organized and administered. Responsibility for its policy direction rests with the Board of Trustees, which consists of more than 40 members from Asia, Europe and North America and includes university presidents, ambassadors, government ministers and secretaries, corporation vice presidents and managing directors and distinguished professors. Since more than 75 percent of its financial support comes from tuition and fees, primarily funded by donors, AIT knows it must maintain high quality offerings relevant to the Asian region to assure continued support.

As of September 1986, 87 of the 101 faculty members were holding the Ph.D. degree. The faculty is internationally represented, coming from 23 countries with the largest number coming from Thailand, India, U.K. and Japan in that order (See Annex F-4.) Faculty salaries are competitive compared to higher education institutions in the region; e.g., \$22,500 average annual salary, including benefits, for an AIT associate professor. Considerably less is paid to professors at national universities in ASEAN. (An exception is the National University of Singapore.) Thus, quality staff can be attracted.

For every student who is admitted to the Master's course, approximately six have applied. The application/admission ratio for ASEAN-US students is not as high and varies, with some countries openly advertising and then submitting names of two or more candidates for each scholarship offered and other governments not advertising and submitting only one candidate for AIT to accept or reject. For Phase II, it is proposed that at least two candidates be proposed for each available Master's Degree scholarship, to help assure quality participation. One measure of the quality of the AIT performance is the apparent ease with which graduates earning Master's degrees are admitted to PhD programs in the United States, European countries and even at Tokyo University.

AIT undertakes a wide range of sponsored research projects for various development offices and government agencies and funds research projects

proposed by faculty members. Students carry out thesis research to fulfill academic requirements. Laboratories in the academic divisions and the extensive facilities and services of the academic centers advance AIT's research capabilities. To disseminate research information, AIT publishes Research Summaries, an annual presentation of project abstracts completed or in progress, and grouped by academic division. AIT emphasizes that research undertaken by students and faculty is primarily directed towards the solution of problems encountered in Asia, thereby preparing students to participate in the development processes of their own countries.

D. Consolidated Financial Plan. The total estimated cost of this project is \$20 million, including a contingency and inflation factor of 13%. The proposed US contribution is \$14 million (70%), while that of the member ASEAN countries is \$6 million (30%).

Major uses of the planned US funding are for long and short-term scholarship training of approximately \$9 million, support for selected training staff at PLANTI and ADPC of approximately \$1.7 million, research and planning of approximately \$.5 million, technical assistance of some \$.425 million and a contingency and inflation factor of \$1.85 million. The remaining \$575,000 covers expenditures for commodities, operations and maintenance and information dissemination.

Although the General Counsel's Office has considered that regional training projects are excluded from the provisions of Section 110 (a) of the FAA of 1961 (see Lecee/Spencer Memorandum of 2/20/80), ASEAN member countries will provide approximately 30% of overall project costs from cash or in-kind contributions. The primary uses of these contributions include an estimated \$2.5 million of local currency for the in-kind support for scholarship training (mostly in the form of participant salaries and allowances while in training), cash and in-kind support of approximately \$1.6 million for support of the training staffs at PLANTI and ADPC, and operation and maintenance costs of approximately \$.45 million. The remaining \$1.4 million will cover such items as construction of additional training facilities at PLANTI (\$.135 million), commodities and equipment (\$.135 million), contingency and inflation (\$.7 million) and other costs of \$.46 million.

Recurrent project costs are estimated at approximately \$4.0 million (20% of total project costs) of which approximately \$1.9 million (47%) would be funded from the U.S. contribution and 53% from cash and in-kind contributions from the ASEAN member countries. Training costs of approximately \$11.5 million represent 57% of total estimated project costs and are comprised of the actual costs of training, student support costs of approximately \$350 per month (depending on location of training) and the costs of international travel for training located outside the member-country. Approximately 70% of the training activities involve international travel.

As planned, the project will finance the activities of each project component for a period of approximately four-years beginning on or about July 1, 1987. However, the proposed life-of-project period is being established for five

years in order to allow sufficient time for year 4 participants to complete their training prior to the PACD of June 30, 1992. Also, the project authorization is requesting authority for retroactive financing for eligible training efforts initiated at AIT on or after January 1, 1987, but prior to the date of project authorization. This authority for retroactive reimbursement is needed because "new start" funding for ASEAN participants under Phase I ran out on December 31, 1986. Delaying the entry of new trainees until the actual date of project authorization would cause this tranche of trainees to fall out of synchronization with AIT's academic year and produce an undesirable discontinuity in the development cooperation program.

The project will also make funding available for private sector audits of the project components. Given the geographical dispersion of project sites and activities, and the limited number of AID/ASEAN Regional Office staff, such an audit approach will help provide oversight and control with implementing institutions not now subject to external audit. It is anticipated that such audit services would be acquired from an accounting firm meeting the Gray Amendment requirements.

The 13% provision for contingency and inflation -- which includes funding for annual audits, periodic evaluation, special short-term technical services, etc. -- is based on the total estimated project cost. The bulk of contingency funds have been programmed in year 3 through year 5. Likewise, a compound inflation factor has been used to cover anticipated cost increases in the out-years of the project.

Local currency costs will be disbursed to the grant recipients on a reimbursement basis, unless other methods are subsequently approved by Project Implementation Letter. Disbursements for foreign exchange costs will be in accordance with the following procedures:

Disbursement Procedures

<u>Item</u>	<u>Method of Implementation</u>	<u>Payment Method</u>
1. Technical Assistance	Extension of PASA (PLANTI), PSC or Purchase Order	Direct Payment
2. U.S. Participant Training	PIO/Ps	Credit Transfers (Master Disbursing Account)
3. Off-Shore Commodities	PIO/Cs with PSA	Direct Letter of Commitment
4. Local Commodities	Off-Shelf by grantee	Direct payment or reimbursement

Based on the component descriptions and budgets set forth above, it is anticipated that AID and ASEAN resources will be allocated to the HRD project approximately as follows:

<u>Use of Funds</u>	<u>Project Consolidated Financial Plan^{1/}</u>		<u>Total</u>
	<u>Source of Funds</u>		
	<u>AID</u>	<u>ASEAN</u>	
Scholarship & Training	8,960	2,500	11,460
Research & Planning	500		500
Technical Assistance	430		430
Commodities & Equipment	250	140	390
Staff Support	1,680	1,630	3,310
Construction		140	140
Operations and Maintenance	200	460	660
Information Dissemination	130		130
Other		430	430
Sub-Total	12,150	5,300	17,450
Contingency & Inflation 13% ^{2/}	1,850	700	2,550
Total	<u>14,000</u>	<u>6,000</u>	<u>20,000</u>

Annex H contains further financial data. Included is the consolidated projection of expenditures and the expected project obligation schedule.

^{1/}All figures rounded to closest \$10,000.

^{2/}Includes \$200,000 estimated for Evaluation and Audits.

IV. PROJECT ADMINISTRATION

A. Implementation Schedule. The precise timetable for implementation of each project component will be determined by annual training and work plans prepared by executing institutions. Used effectively during Phase I, detailed, time-phased plans include a listing of candidates for each training activity, research topics, refined budget data and related information. It is anticipated that each of the separate grant agreements for Phase II will be negotiated and signed before or during the first quarter of FY 88. (See expected obligation Schedule in Annex H.) The special short-term technical training is expected to be coordinated largely by the Asian Institute of Technology in response to ASEAN and AID-endorsed requests on an annual basis. Annual institutional plans will be the primary mechanism to firm up activities, funding requirements and monitor project progress. An illustrative outline of implementation over the project period follows.

1. First Year. After project funding is authorized, it is planned on overall a Memorandum of Understanding will be signed with ASEAN. This will be followed by the negotiation of grant agreements with PLANTI, ADPC, TROPED and AIT. During the start-up period, these institutions will be working with country coordinators and through affiliates to plan implementation of discrete sub-project activities, i.e. selection of scholarship recipients for training in the 1987/88 academic year, identification of workshop topics and sites, determining research and planning priorities, etc. It is planned the USDA PASA will be extended under Phase II assistance to PLANTI and that the long-term PQ advisor will be recruited. In addition: (i) a Procurement Services Agent will be contracted to facilitate offshore commodity procurement for PLANTI and ADPC; and (ii) an accounting firm to perform periodic audit services will be identified. These contracting actions are expected to advance Agency Gray Amendment objectives.

2. Second and Third Years. Both short and longer term training will be well underway in the US and the region. Information dissemination activities will be intensified with both workshop/conferences as well as publications planned. Research data collection and initial analysis will be in process. Design of the ISEAS component and grant agreement negotiation will be concluded during the period, as will commodity procurements planned under the project. In the third year, a mid-term evaluation will be undertaken to assess progress in achieving output targets and institutional development objectives. See Annex I for Evaluation Plan.

3. Fourth and Fifth Years. The final two years of the project will focus on the completion of longer term training and information dissemination work. PLANTI and ADPC will be firming up plans to diversify the funding bases for their regional activities. The end-of-project evaluation will be undertaken.

B. Administration and Monitoring Arrangements. Through its structure of Technical Committees, ASEAN has formally identified and endorsed each of the HRD project components. Additional activities arising during the project period are special short-term technical training in selected development areas. They will conform to overall project guidelines and will be largely if not fully administered by AIT. See Annex F-2 for procedures and criteria.

As under Phase I operations with implementing agencies, the coordination and monitoring of project activities will be accomplished through: (i) institutional work plans and budgets; (ii) the direction of component coordinators and governing bodies; (iii) progress reports accompanying requests for disbursement and reimbursement; (iv) periodic audit reports, and (v) regular project liaison meetings and issue resolution. Project management responsibility is with the ASEAN Regional Office (ARO) based in Manila, with support from legal, controller, and contracts staff in the region.*

C. Procurement Plan. It is planned that the procurement of services and commodities for this project will be accomplished with the following actions.

*However, project management responsibility for Phase II assistance to ADPC will be with USAID/Thailand where it has been for Phase I.

1. As noted, extension of the existing PASA agreement with USDA is planned to help access and provide continuing specialized technical assistance to PLANTI.
2. A project-funded contract with a Procurement Services Agent (PSA) to procure off-shore commodities for PLANTI and ADPC. ARO performs field management of the procurements with support from regional logistics staff.
3. The remaining off-shelf procurements for both PLANTI and ADPC will be undertaken by the grantees in conformance with AID procurement regulations. ARO will monitor these procurements closely, with payment on a direct or reimbursement basis.
4. A project-funded contract with an accounting firm to provide periodic audit services. The ARO will manage this contract in close coordination with regional controller staff.

Publication of newsletters, workshop proceedings, and training advertisements will be completed through local contract arrangements. All of the grantee institutions have considerable experience in this area and have demonstrated cost-conscious administration.

It is noted that the project will rely extensively on the management experience of these regional institutions to oversee implementation of the planned activities. This strategy is consistent with ASEAN-US Development Cooperation efforts to work collaboratively with existing regional entities to promote sustainable organizational growth and HRD that is responsive to a dynamic economic environment.

D. Evaluation Plan. See Annex I.

V. PROJECT ANALYSES

A. Economic Analysis

Part III above contains component-specific analyses of technical, institutional, administrative and related aspects. Following are economic, social and environmental analyses covering the project altogether.

1. Specific changes resulting from the project. Under the proposed project, about 2,000 participants will receive training, the bulk of it (75 percent) of a short term "technical" nature. Training to be provided is in direct support of the ASEAN-US goal to accelerate the transfer, adaptation and development of technology in selected areas that contribute to regional economic productivity.

The economic impact -- that is, the rate of return on investment -- is designed to go far beyond the scope of the project itself, by focusing on constraint identification and alleviation, primarily through academic training and short-term technical training in areas of key regional concern. This impact, if it were to be objectively measured, would need to consider the marginal increase in return of the sum total of development activities related to the training in question, a task well beyond the scope of this analysis.

At the end of the project, about 2,000 participants will have upgraded their skills and will have become more productive as a result. The incremental outputs of their combined efforts into the development process will have a significant multiplier impact, far beyond the estimated \$14.0 million and \$6.0 million inputs of the US and ASEAN, respectively.

2. Cost effectiveness. Because this project is concerned with building regional cooperation and regional institutional capabilities as well as with providing training opportunities needed by the region, it places greater priority upon training within the region than in the US. Also, approximately 75 percent of the training is short term. The following chart compares the costs of training at the participating ASEAN institutions compared to US training to indicate the cost savings resulting from this alternative:

Comparison of Training Costs by Person Months

<u>Type of Training</u>	<u>U.S.</u>	<u>ADPC</u>	<u>PLANTI</u>	<u>AIT</u>	<u>TROPED</u>
Degree/Diploma	1,800	515	500	1,000	550
Short-Term	3,500	945	575	3,000	670

It should be noted that the only situation approaching US training costs, although still lower, is AIT short term training. This is for engineering training, using laboratories and equipment and often drawing on staff expertise from outside the region.

The only alternative to at least part of the project -- i.e., the long-term training component -- is to provide technical assistance in lieu of training. Since most of the long-term training to be financed is to obviate the need for expensive technical assistance and to strengthen regional institutions, this alternative is inappropriate. Technical assistance calculated at even \$100,000 per annum per person would be equivalent to training approximately nine persons to the Master's degree level at ASEAN regional institutions, each of whom could provide some 25 or more years of service after training. (Figures are based on an average monthly cost for a student at the four participating ASEAN institutions.)

3. Cost/benefit. A World Bank study in 1980 found that the returns from investment in higher education in developing countries are greater than for investments in physical infrastructure (an average in 11 developing countries of 14.9 percent compared to 12.8 percent for physical infrastructure projects). Rates of return to agriculture research and extension in developing countries run for the most part in the range of 40 to 60 percent. Other studies estimating economic effects of training on earnings and on labor productivity are overwhelmingly positive.

More specific to this project is the example of the PQ services being developed under the assistance provided to PLANTI. The economic benefits of PQ activities are difficult to assess since precluded pest entry shows no

direct financial benefits. However, potential costs can be estimated, including: (a) the costs of pest depredation in countries where it does occur; and (b) the negative economic impact when pests are present on commodities and either are prohibited by other countries or require treatment.

The economic impact may also be measured by a pest risk evaluation, including assessment of these factors: (a) the probability of the pest surviving in the new environment (fraught with unforeseen factors that can cause a minor pest in one country to be a serious one elsewhere); (b) ecological range of host and pest; (c) predicted control cost including cost of pesticide and application if necessary; (d) possibility of eradication or limiting spread (difficult and seldom successful); (e) implication of quarantine or other measures necessary to make commodities acceptable; and (f) environmental impact from pesticide residues on food.

The economic loss to ASEAN economies from significant damage to crops such as rubber, oil palm, cocoa, sugar cane, rice, and coconut could be considerable. The greater number of pests of major economic importance prevented from entry or even delayed, the greater the potential economic benefit. PLANTI is designed to assist ASEAN PQ services to achieve this objective.

B. Social Soundness Analysis

1. Socio-cultural context. ASEAN member countries have traditionally valued education or training as a means of learning new skills and technologies. The project supports these traditions and provides ASEAN member countries with opportunities for training and the development of regional institutions that address common health and agricultural development concerns using English as a common language. Previous projects indicate that this approach is appropriate and successful to furthering the ASEAN goals of collaboration for strengthening perceived political, economic and social ties.

2. Beneficiaries. The direct beneficiaries of the project will be the nearly 2,000 participants from the ASEAN countries who will receive technical training at one of the regional institutions or in the US. Based on tracer studies of AIT graduates and follow-up of TROPED participants over a 10-year time frame, it is anticipated that upon return participants funded under this project will be given more responsible positions over time and receive increased benefits and opportunities to use their skills productively.

Large numbers of ASEAN nationals will benefit indirectly from the application of acquired technical skills by returned participants employed in various institutions serving the public or private sector. Most trainees will return to public sector technical positions in agricultural planning or public health organizations and will be responsible for the improvement of rural economic life and health services for the population as a whole. A large number of participants will come from and return to training or research institutions, where they can transfer technical information and innovations to even larger numbers of ASEAN nationals or undertake research benefiting the population as a whole.

The private sector will also benefit from improved technical skills in health and agricultural fields. Examples from previous projects are illustrative: (a) an increasing number of former AIT graduates are taking jobs in the private sector; (b) many TROPMED graduates serve in private health-related pursuits; and (c) PLANTI-trained private sector fumigators help insure effective use of pesticides and protection of the environment. The project will strongly encourage even greater private sector involvement in training activities.

The institutionalization of PQ services throughout the region can benefit ASEAN nationals by increasing the likelihood of pest free food production and quality export commodities. Heavy pest infestation of estate crops such as rubber, palm oil, copra, sugar and forest products or subsistence crops such as rice, cassava, fruits and vegetables could limit production gains and, thus, food and cash benefits for planters, estate workers and small farmers.

3. Participation of women. As indicated below, previous projects show a 27 percent female participation rate in training activities. Female participation is greatest in health fields where women are more likely to be employed in greater numbers in the region. PLANTI and AIT have had lower female participation rates overall, probably reflecting the lesser likelihood of women available in a number of the countries for training in engineering or advanced agricultural specialties.

Male/Female Participation
in Training Phase I Projects

<u>Institution</u>	<u>MASTER'S DEGREE</u>		<u>DIPLOMA</u>		<u>SHORT-TERM TRAINING</u>		<u>TOTALS</u>		<u>%</u>
	<u>M</u>	<u>F</u>	<u>M</u>	<u>F</u>	<u>M</u>	<u>F</u>	<u>M&F</u>	<u>F</u>	
PLANTI	4	2	27	5	521	85	644	92	14
ADPC	27	14			119	56	216	70	32
TROPMED	119	83	81	126			409	209	51
AIT	<u>120</u>	<u>33</u>	<u>3</u>	<u>1</u>	<u>106</u>	<u>17</u>	<u>280</u>	<u>51</u>	<u>18</u>
<u>TOTALS</u>	<u>270</u>	<u>132</u>	<u>111</u>	<u>132</u>	<u>746</u>	<u>158</u>	<u>1549</u>	<u>422</u>	<u>27</u>

It is anticipated that as economies grow in the region and women move into technical positions in increasing numbers, more women will be available for training funded under this project. Regional institutions will be encouraged to attract more women candidates by the inclusion of language in project sub-agreements to this effect.

4. Participation of ASEAN nationals in project development. ASEAN region officials, representatives from regional institutions as well as member country representatives have actively participated in the development of this project. PLANTI, ADPC, TROPED and AIT submitted proposals which form the basis of project activities. During project paper preparation, the design team visited each institution to collect information, resolve issues and finalize activities. The level of commitment observed to address development problems through regional training and research activities augurs well for the implementation and continuation of project activities.

5. Brain drain. Based on evaluations of previous projects and tracer studies of graduates, participants are expected to return to and continue working in their own countries. The training to be financed addresses ASEAN member country needs, is conducted in the regional setting, is for limited periods of time, and thus is less likely to result in non-return of participants.

C. Environmental Analysis. No environmental assessment is required, according to AID's revised Environmental Procedures, 22 CFR Part 216.2 (c)(2). This is because the project consists of analyses, training, information transfer and the like (see Annex I).

VI. PROJECT CONDITIONS, COVENANTS AND NEGOTIATING STATUS

The project has been collaboratively developed with regional institutions that have successfully implemented Phase I efforts with AID assistance. These institutions are judged fully prepared to move into Phase II operations in mid-1987.

Negotiation of the overall Memorandum of Understanding (MOU) with ASEAN will follow authorization of project finance. After MOU signature, grant agreements will be negotiated and signed with executing institutions. These obligating documents will express the responsibilities of the parties during implementation. Several duties are anticipated for negotiation/placement in the MOU and/or grant agreement annexes. Constituting best effort commitments, these responsibilities include:

A. ASEAN and participating member countries will seek to begin financing the international travel (roundtrip airfares for scholarship recipients) in year 3 of the project.

B. ASEAN and the respective host countries will undertake to develop institutional plans for the continued financing of recurrent costs for PLANTI (Malaysia) and ADPC (Thailand) when AID funding of such costs is phased out at project end. Such plans will be developed before the end of year 3 of the project.

C. ASEAN and the implementing institutions will request member countries, where appropriate, to nominate at least two candidates for each available position.

D. ASEAN and the implementing institutions will strongly encourage member countries to nominate candidates from the private sector for available scholarships.

E. ASEAN and the implementing institutions will strongly encourage member countries to nominate women candidates for available scholarships.

F. ASEAN and the implementing institutions will periodically inform AID of all donor contributions received.

ACT: AID-6 INFO: AMB DCM AA ECON ADB CHERON/11/88

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AIDAC RDO BLACKMAN

E.O. 12356: N/A
TAGS: N/A
SUBJECT: ASEAN HUMAN RESOURCES DEVELOPMENT (HRD)
PROJECT (398-0287); PID APPROVAL CABLE

REFERENCE: PROJECT IDENTIFICATION DOCUMENT (PID)

1. THE ASIA AND NEAR EAST PROJECT ADVISORY COMMITTEE (ANPAC) REVIEWED THE PID FOR THE ASEAN ERD PROJECT ON APRIL 8, 1986. MR. J NORRIS, DAA/ANE, CHAIRED THE MEETING. DECISION WAS TO APPROVE THE PID AND HAVE MR. BLACKMAN, THE REGIONAL DEVELOPMENT OFFICER (RDO) FOR ASEAN, PREPARE AND SUBMIT FOR AUTHORIZATION TO AID/W A PROJECT PAPER SUPPLEMENT FOR THE ASEAN HEALTH SCHOLARSHIPS (TROPMED) PROJECT SEPARATE FROM THE PROPOSED ERD PROJECT. DISCUSSION ON PREPARATION OF ERD PROJECT PAPER AND HEALTH SCHOLARSHIP SUPPLEMENT FOLLOWS.

2. PROGRAM MORTGAGE IN UMBRELLA PROJECT: THE ASEAN PROGRAM IS BUDGETED AT DOLLARS 3.3 MILLION IN FY-86 CONSIDERABLY BELOW THE FY-85 LEVEL OF DOLS 4.3 MILLION. LEVELS FOR FY-87 AND BEYOND ARE UNCLEAR DUE TO THE PROJECTED IMPACT OF GRAMM-RUDMAN ON THE BUDGET. TENTATIVELY, DOLS 3.8 MILLION IS BUDGETED FOR FY-87. DAA/ANE IS ASKING THAT RDO DETERMINE THE FINAL LIFE OF

PROJECT FUNDING LEVEL (INCLUDING THE CONTINUATION OF THE TROPMED HEALTH SCHOLARSHIPS) AFTER THE UPCOMING US/ASEAN DIALOGUE IN THE CONTEXT OF THESE REALISTIC BUDGET CONSIDERATIONS. ANPAC DID NOT SEE ANY PROBLEM IN PRINCIPLE WITH PROPOSED ERD PROJECT (I.E. UMBRELLA TRAINING CONCEPT), BUT GIVEN LEVEL OF OYB, PROJECT FUNDING LEVEL MUST BE VERY CAREFULLY ANALYZED, ESPECIALLY IN LIGHT OF US/ASEAN DIALOGUE LED BY SINGAPORE THIS YEAR AND THE POSSIBLE NEED TO CONSIDER FUNDING OF OTHER NEW PROJECTS WHICH MAY RESULT FROM THE DIALOGUE. RDO WILL HAVE TO CONSIDER THE TRADE-OFFS FOR PROPOSED PROJECT IF OTHER NEW ASEAN PROJECTS ARE TO BE SERIOUSLY CONSIDERED. NEW PROJECTS COULD MEAN STOPPING OR PARING DOWN THE HRD ACTIVITY.

3. OPERATING COSTS: THE PROJECT PROPOSES THAT AID FUNDS CONTINUE TO FINANCE RECURRING COSTS OF PLANT AND

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FY-85 OBLIGATION AND THAT PP WILL BE READY FOR REVIEW
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OBLIGATION, WE WILL NEED INFORMATION FOR CN ON ASEAN
HEALTH SCHOLARSHIPS AMENDMENT. ARMACOST

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STAB 130563/02

SUMMARY OF ASEAN PROJECT EVALUATION
FINDINGS AND RECOMMENDATIONS
AS ADDRESSED BY PROJECT DESIGN TEAM

I. PLANTI

Located in Kuala Lumpur, the ASEAN Plant Quarantine Centre and Training Institute project was initiated in 1980 and evaluated five years later in February 1985. The final report praised the Institute for efficiency in establishing its facilities and training activities. In addition, the principal findings were that:

1. Research policy guidelines should be developed to assure that research studies are relevant to quarantine training and current operations of the ASEAN Plant Quarantine (PQ) Services.
 - * The project design team emphasized this issue in discussions with PLANTI officials and developed criteria for use in project implementation.
2. Staffing salaries should be brought up to international standards.
 - * The ASEAN Regional Committee, COFAF must address this issue.
3. PLANTI should work to diversify its funding base. It is noted that the Government of Malaysia's contribution of land and construction materials amounted to approximately \$5.5 million, thus in excess of its commitment by \$0.8 million.
 - * This subject needs to be addressed at the next US-ASEAN Dialogue to ensure that PLANTI will have financial support from other sources nation beneficiaries. The project encourages PLANTI to prepare for phased-down support from A.I.D. by project end.
4. PLANTI can provide basic training packages for in-country training and thus extend its support to the ASEAN National PQ Services. The provision of training aids and trained instructors will speed the development of basic skills in the region and help enable PLANTI to focus on more advanced training needs.
 - * PLANTI has already embarked on this approach with its training for trainer course and plans to prepare identification kits and course materials to supplement training at PLANTI.

*Indicates project design team comment, action, etc.

5. The basic inspector training courses should be more practically oriented to operational demands of the job. PLANTI should use its network of graduates along with the PQ staff of ASEAN member countries to reliably identify training topics.
- * PLANTI has noted comments made by both consultants and students to this effect and has reoriented courses accordingly. Recent students have recognized improvements.
6. More direct input from ASEAN PQ service members should be used in the Board of Director decision-making.
- * This recommendation can be addressed by Board members by referring agenda items to national plant quarantine officials for comment.
7. Priority areas for future institutional development are (i) to strengthen the Board of Directors as a policy making group, particularly in establishing research and training program guidelines; (ii) to clarify respective areas of PLANTI, COFAF, and ASEAN PQ Services respective areas of responsibility and strengthen lines of communication; (iii) to position PLANTI as a regional institute with international status.
- * These suggestions have been noted and better communications between Board members and Plant Quarantine officials and COFAF are being developed. Attaining international institution status will require time. PLANTI has already attained regional status, however.

II. APDC

The Agricultural Development Planning Center, based in Thailand on the campus of Kasetsart university is associated with the ASEAN Technical Committee on Food, Agriculture and Forestry. The current project was initiated in 1981 and evaluated by a joint US-ASEAN team in 1985. Major findings and recommendations are summarized below:

1. The training component has been successful and cost effective. Its success can be attributed to the applicability of the short-term training provided on project formulation, monitoring and evaluation. High quality instruction in the M.S. program was provided by Kasetsart University. Planned training objectives were met or exceeded in most instances. The ADPC should continue its present arrangements with KU and contribute to an expanded M.S. program in agricultural and resource economics.
- * The new project component continues the existing arrangements with Kasetsart University for the M.S. Program in Agricultural and Resource Economics as recommended.

2. The research and planning component was moderately successful. Some of the research output was of questionable quality and utility, although there were a small number of technically competent studies produced for the COFAF. The focus of the Center's research should be on discrete, relevant and definable policy issues as identified by COFAF or other appropriate ASEAN entities.
 - * The research and planning element of the project has been tightly focused on specific items and issues per the evaluation recommendation.
3. The visibility and prestige of the Center should be enhanced. The ADPC is still trying to establish its position in ASEAN and to attract the outside resources which will be necessary for its long run viability as an ASEAN center. Competitively recruiting and adequately compensating a highly respected international senior staff would be an initial step in this direction.
 - * Recruitment of highly respected international senior staff is hampered by lack of project funding, both by AID and the RTG. Present staff, however, are performing well.
4. The nomination/selection process for long term M.S. trainees should be strengthened by tightening entrance requirements and broadening the pool of potential candidates. Provision should be made to remedy English language deficiencies among selected candidates prior to their training.
 - * Entrance requirements for the ADPC M.S. Degree Program are the same as those used for the regular Kasetsart University Program. English language training has been incorporated into the three-month refresher program will be continued in selected cases thereafter as needed.
5. The policy-making function of the Board of Planners (BOP) should be further supported and thus allow operational functions to proceed under the direction of the ADPC director and his staff.
 - * The design team did not perceive that the ADPC Director required more authority to operate his program effectively.
6. The director should be charged with making sure that existing administrative and policies manuals for ADPC are consistent with USAID, host country and ASEAN (ASEAN Secretariat) rules and regulations.

A requirement for assuring that ADPC administrative and policy manuals are consistent with AID, ASEAN and host country rules and regulations will be included in the grant agreement, and subsequent review will be included in the scope of work of the project mid-term evaluation team.

III. TROPMED

The ASEAN Health Scholarships project began in 1980 to support longer term academic training and applied technical training through the SEAMEO-TROPMED regional network of tropical medicine education institutions. A joint evaluation was conducted in April 1985. The more important findings and recommendations follow.

1. The ASEAN Governing Body efficiently carried out their responsibility to oversee the distribution of scholarships. Their commitment to sustain regional cooperation over more narrow national and institutional loyalties played a significant role in achieving project objectives.
 - * The ASEAN Governing Body will continue to oversee the implementation of the Phase II project.
2. Project staff similarly encouraged institutional linkages beyond those of the project scope as part of their commitment to the development of strong institutions in the region.
 - * Efforts are continuing with success in initiating new community-based projects to further strengthen institutional linkages within the region.
3. The ASEAN scholarships provide cost-effective training to the region's health workers. Comparative estimates for US training indicate that ASEAN training at least 60% less costly.
 - * Scholarship costs remain reasonable under the direction of cost-conscious project managers.
4. The SEAMEO-TROPMED consortium continues to offer quality training that is relevant to the region's health research and health delivery systems.
 - * The new curriculum development project activity will encourage efforts to update course materials and maintain their relevance.
5. The training is meeting a strong demand, with the applicant pool increasing. Course alumni are employed in their country of origin, generally in higher or more technical positions, serving as teachers and administrators.
 - * With no indication of waning demand, a Phase II project was endorsed at the Seventh US-ASEAN Dialogue. The mid-project evaluation will review status of continuing course demand.

6. Important elements are in place to support a Phase II of the ASEAN project. Improving health and nutrition status remains a high priority throughout the ASEAN region. The SEAMEO-TROPMED Fourth Five Year Development plan identifies their priority needs in research and training. AID/ASEAN can further assist the National Centres to expand their capacities and accelerate technology transfer.
 - * The project responds to the ASEAN proposal for a continuation of TROPMED support to expand the number and upgrade the quality of health workers in the region.
7. Consideration should be given to simplifying the nomination and approval process for the scholarships. The Ministries of Foreign Affairs in each country generally do not have systems in place to expedite review of the scholarship nominees. Some delays could be eliminated with an abbreviated approval process.
 - * The ASEAN Committee on Social Development along with the ASEAN Secretariat must formally address this issue and achieve consensus prior to effecting any changes in the role of the MFA's.

IV. AIT

In 1979, AIT was awarded one of the first ASEAN-US project grants in support of study scholarships. A joint mid-project evaluation was conducted in May, 1982. Highlights are listed below.

1. ASEAN support has demonstrated success and thus with continuing evidence of need, should be continued.
 - * The project responds to ASEAN's proposal for continuation of the training program.
2. The regional scholarship mechanism is a cost effective mode of managing project support.
3. The effectiveness of USAID assistance can be enhanced with more flexibility in the types of training that can be financed under the ASEAN-US grant.
 - * AIT has already developed short-term training programs for Malaysia and other member countries as requested. Such training programs will be continued with project assistance.
4. A more expeditious means to allocate scholarships among the participating ASEAN countries should be explored, along with methods of establishing scholarship allocations according to changing country needs.

- * AIT has resolved this issue by permitting member countries to use their allocations for special designed short-term training.
- 5. The impact of AIT training is best assessed at the national level by those agencies with returning graduates.
- * AIT has worked with national level agencies to conduct periodic tracer studies of graduates.

DETAIL OF PROJECT'S PLANT QUARANTINE COMPONENT

This Annex contains back-up and supporting materials (Sub-Annexes) for the PQ Component. Sub-Annexes include:

- C-1 PLANTI and PQ Staffing and Requirements
 - a. PLANTI Professional Staff
 - b. ASEAN PQ Staffing
 - c. ASEAN PQ Entry Points
 - d. Phytosanitary Certificates Issued

- C-2 Training/Technical Activity Detail
 - a. PLANTI Training Plan and Criteria for Student Selection
 - b. PLANTI Short Courses, Phase I
 - c. PLANTI Course Calendar 1986
 - d. PLANTI Phase II Proposed Research Topics
 - e. PLANTI Phase I Short-term Consultants
 - f. PLANTI Technical Meetings

- C-3 Detail of Cost Estimates
 - a. Staff Support Cost Summary
 - b. Training Plan and Cost Summary
 - c. Technical Assistance Needs and Cost Summary
 - d. PQ Specialist Workscope
 - e. Commodity Cost Summary
 - f. ASEAN Contributions - Cost Summary
 - g. Projection of Expenditures by Fiscal Year

- C-4 Technical Analysis Detail
 - a. Biological Bases for PQ
 - b. Threat of Exotic Pests
 - c. Techniques for Pest Detection (Bulk File)
 - d. Pest Interception (Bulk File)
 - e. Pest Risk Evaluation (Bulk File)
 - f. Plant Quarantine Actions (Bulk File)

- C-5 PLANTI Organizational Structure

PLANTI BULK ANNEXES

1. A Review of the Plant Quarantine Programs of the Countries of Southeast Asia (ASEAN) USAID/ASEAN, p. 162, K. L. Maehler
2. Post-Evaluation Report on the Training Courses of the ASEAN Plant Quarantine Center and Training Institute (PLANTI) 1981, 1982, 1983, p. 43, Margaret Ho Poh Yeok.
3. Report of the Evaluation Committee for the ASEAN Plant Quarantine Center and Training Institute (PLANTI)
4. PLANTI 5 Year Report 1981-1985

PLANTI PROFESSIONAL STAFF
(end of 1986)

<u>Country</u>	<u>PLANTI Professional Staff</u>
Malaysia	K. G. Singh, Ph.D., KMN Director
Indonesia	Soetikno S. Sastroutomo, D.Sc. Weed Scientist
Malaysia	Nathan Ganapathi, Ph.D. Plant Pathologist
Malaysia	Lim Loon Gher, Ph.D. Seed Pathologist
Malaysia	Chan Kwok Chor, Ph.D. Plant Pathologist
Malaysia	Mohd. Azmi Abdui Rahim, M.S. Nematologist/Entomologist
Malaysia	Maria Christina Stephenson, M.Sc. Seed Technologist
Philippines	Paul L. Manalo, M.S. Documentation Officer
Malaysia	Margaret Ho Poh Yeok, B.A. (Hons.) Administrative & Procurement Officer

ASEAN PLANT QUARANTINE ENTRY POINTS

	<u>AIR</u>	<u>LAND</u>	<u>SEA</u>	<u>POST OFFICE</u>	<u>TOTAL</u>
<u>INDONESIA</u>					
1980	15	-	25	24	64
1986	15	-	41	24	80
<u>MALAYSIA</u>					
1980	3	7	5	3	18
1986	10	14	17	5	46
<u>PHILIPPINES</u>					
1980	3	-	24	7	34
1986	5	-	24	14	43
<u>THAILAND</u>					
1980	4	9	9	1	23
1986	<u>5</u>	<u>9</u>	<u>9</u>	<u>1</u>	<u>24</u>
<u>TOTALS</u>					
1980	25	16	63	35	139
1986	35	23	91	44	193

Note: Figures show a 39% increase in entry ports.

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PHYTOSANITARY CERTIFICATES ISSUED

<u>COUNTRY</u>	<u>1983</u>	<u>1984</u>	<u>1985</u>
Indonesia	13,500	15,000	16,500
Malaysia	4,000	4,800	5,700
Philippines	14,500	15,000	15,500
Singapore	23,000	25,000	27,000
Thailand	<u>28,040</u>	<u>33,648</u>	<u>33,800</u>
Total	83,040	93,448	98,500

Note: Phytosanitary Certificates reflect the total number of agricultural commodity shipments inspected and certified as apparently free from injurious pests. This function of PQ Services facilitates the movement of agricultural commodities in international trade with significant impact on GNPs.

PLANT CRITERIA FOR STUDENT SELECTION

TRAINING

Title/Type of Training	Duration	No. of Trainees 1981-1986	Proposed No. of Trainees 1987-1991	Criteria for Selection
I. Masters Degree US Academic Inbit . ASEAN Academic	2 1/2 years 2 1/2 years	2 4	6 6	<ul style="list-style-type: none"> • Bachelor's degree in agriculture or equivalent • Satisfactory transcript of records • Bonafide government officer directly involved in PQ work • Satisfactory recommendations from employer • Sound mind and healthy body • Able to read, write and speak English
II. Diploma in Plant Quarantine	10 1/2 months	32	30	<ul style="list-style-type: none"> • Bachelor's degree in agriculture or equivalent • Satisfactory transcript of records • Bonafide government officers directly involved in PQ work or related pursuits • Satisfactory recommendations from employer • Sound mind and healthy body • Able to read, write and speak English • Must have obtained at least a grade of 75% during the first five months, during which time the course is simultaneously conducted with the certificate course.
III. Certificate in Plant Quarantine	22 weeks	56	80	<ul style="list-style-type: none"> • Diploma or Certificate credentials or equivalent academic qualifications in agriculture or related field • Satisfactory recommendations from employer • Bonafide government officer involved in PQ work or related pursuits • Sound mind and healthy body • Able to read, write and speak English (N.B.: A Diploma participant who does not meet the grade requirement automatically gets into the Certificate Course).
IV. Short courses and Workshops	4 weeks	555	800	<ul style="list-style-type: none"> • Adequate academic credentials in agriculture or related field • Involved in PQ or plant protection work related to the nature/type of short course/workshop in attendance • Satisfactory recommendations from employer • Sound mind and healthy body • Able to read, write and speak English
V. Study course/ On-the-job training ASEAN - US	4 weeks	33 (1) (12) (10)	54 36 18	<ul style="list-style-type: none"> • Senior line officers from the PQ service of ASEAN • Satisfactory recommendations by employer
VI. Senior Fellowship		1	6	<ul style="list-style-type: none"> • MS or Ph.D degree in agriculture or related field • Extensive background in research work • Research proposal must be approved by the PLANTI Director

PLANTI PHASE I, SHORT COURSES

<u>1981</u>	<u>Course</u>	<u>Participants</u>
May 12-17	General Plant Quarantine	23
<u>1982</u>		
Aug 4-21	Post Detection Techniques	14
Oct 6-23	Fumigation	18
<u>1983</u>		
Aug 1-6	Khapra Beetle Identification	18
Aug 8-27	Bacteriological Techniques	17
Sept 19-26	Nematode Identification	15
Oct 17-30	Weeds in Plant Quarantine	14
<u>1984</u>		
Jan 4-18	Procedures for Importation of Germ Plasm	14
Mar 5-25	Identification of Fruit Flies & Symptoms of Damage	9
May 7-29	Seedborne Diseases	16
Aug 1-29	Stored Product Pests and Treatment	14
Oct 1-21	Containerized Cargo Inspection and Treatment	15
Oct 29-Nov 17	Plant and Stored Product Mites	15
Nov 19-Dec 14	Nematodes of Plant Quarantine Importance	12
<u>1985</u>		
Jan 22-24	Fumigation for Private Government Sector	13
Mar 4-23	Quarantine Treatments for Living Plant Material	17
May 6-25	Weeds of Plant Quarantine Importance	15
July 8-27	Pests of Timber	15
Aug 1-30	Training for Trainers	18
Sept 2-25	Nematodes of Agricultural Importance	19
Oct 1-2	Cocoa Pests	20
Oct 7-27	Khapra Beetle and Other Stored Product Pests	18
Oct 14-26	Maintenance of Spraying Equipment and Application	17
TOTAL		366

PLANTI Calendar/1986

LONG AND MEDIUM TERM COURSES

Diploma in Plant Quarantine

Duration : 1 February — 20 November 1986

Venue : PLANTI

Certificate in Plant Quarantine

Duration : 1 February — 5 July 1986

Venue : PLANTI

SHORT COURSES AND WORKSHOPS

TITLE	VENUE	DURATION
Workshop on Plant Quarantine Information Materials	PLANTI	12—28 Feb
SALB and Other Diseases of Rubber*	PLANTI	7—15 Apr
Quarantine Treatments for Plants	PLANTI	19 May — 7 June
Inspection and Screening Techniques	PLANTI	14 July — 2 Aug
Nematodes in Seeds and Bulbs	PLANTI	4—23 Aug
Container Inspection and Clearance	PLANTI	1—10 Sept
KB and Other Stored Product Pests	PLANTI	1—20 Sept
Seedborne Diseases	PLANTI	6—25 Oct
Techniques for Detecting Viruses	PLANTI	6—25 Oct
Interception of Weeds and Sampling Techniques	PLANTI	3—22 Nov
Detection and Classification of Fungi in Plant Consignments	PLANTI	3—22 Nov
Human Resource Management in Plant Quarantine	PLANTI	24—29 Nov
Fumigation for Operators	PLANTI	1—13 Dec
Workshop on Irradiation as a Quarantine Treatment*	PLANTI	Last Quarter

OTHERS

PQ Expo '86	PLANTI	8 Oct
Symposium on Plant Quarantine and Phytosanitary Barriers to Trade in the ASEAN	PPPL (UPM), Serdang, Selangor, Malaysia.	9—10 Dec

*Conducted in cooperation with other agencies.

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PLANTI

The ASEAN Plant Quarantine Centre and Training Institute provides a focal point and coordinating mechanism for improving plant quarantine technology in the ASEAN Region through training, research, consultancy, information exchange, and as reference centre. It aims to harmonise plant quarantine activities and enhance further cooperation in plant quarantine and plant protection.

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Short notes or articles of plant quarantine interest should be submitted to:

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Post Bag 200, UPM Post
Serdang, Selangor
Malaysia

PLANTI PHASE II PROPOSED RESEARCH TOPICS

Weed Seed

Weeds of Economic Importance and Their Control

Seed borne Diseases of Vegetables and Cover Crops

Treatment Schedules for Vegetable Seeds and Tropical Fruits

Mites on Economic Plants

Virus Diseases of Orchids

Method of Indexing and Detecting Viruses

Post-entry Quarantine on Cocoa and Other Plants

Seed Treatments

Post Harvest Diseases of Fruits

Wood boring Insects and Detection Methods

PLANTI CONSULTANTS

<u>Consultant</u>	<u>Consultancy Areas</u>	<u>Duration</u>	<u>Countries Covered</u>
Joseph Messineo	Container inspection and clearance	15 Jan - 2 Apr 1982	Philippines & Indonesia
Lernar Chilson	Malaysian PQ	15 Jan - 28 Feb 1982	Malaysia
Robert R. Hashimoto	Fumigation	3 Oct - 30 Nov 1983	ASEAN
Walter J. Kaiser	Postentry PQ	22 Jan - 14 Mar 1983	ASEAN
David McCullough	Container inspection and clearance	22 Mar - 28 Apr 1983	ASEAN
N. W. Schaad	Seedborne bacterial diseases	7 May - 13 June 1984	ASEAN
Arthur K. Burditt	Toxicology	6 Jan - 14 Feb 1985	ASEAN
Kenneth L. Maehler	PQ Entomology	1 Apr - 6 May 1985	ASEAN
Norman Schaad	Serology	15 Sept- 19 Oct 1986	ASEAN
John H. O'Bannon	Nematology	15 Sept- 27 Oct 1986	ASEAN
Kenneth L. Maehler	HRD Project Development	16 Oct - 20 Nov 1986	ASEAN

ASEAN PLANTI TECHNICAL MEETINGS/1981-1986

1. Meeting on Standardization of Plant Quarantine Treatment Export and Import of Planting Materials, 21-23 July 1981, Malaysia
2. Meeting on Standardization of Plant Quarantine Documents, 28-30 April 1982/Philippines.
3. ASEAN PLANTI Meeting on Standardization on Plant Quarantine Legislation, 25-27 August 1982/Indonesia.
4. ASEAN PLANTI Meeting on Implementation Procedures for Plant Quarantine Documents, 28-30 April 1982/Philippines.
5. ASEAN PLANTI Meeting on Emergency Action Programme of Some Crops, 4-6 July 1984/Philippines.
6. ASEAN PLANTI Meeting on Weeds of Plant Quarantine Importance to ASEAN, 12-14 September 1984/Indonesia.
7. ASEAN PLANTI Meeting on Plant Quarantine Treatments, 25-27 July 1984/Malaysia.
8. ASEAN PLANTI Meeting on Emergency Action Programme of Some Crops, 16-18 April 1985.
9. ASEAN PLANTI Meeting on Seed-Borne Diseases in the ASEAN and Seed Health Testing, 15-17 October 1985/Thailand.
10. ASEAN PLANTI Meeting on Weeds of Plant Quarantine Importance, 19-21 July 1985/Philippines.
11. ASEAN PLANTI Meeting on Procedures for Container Inspection, 18-20 November 1985/Philippines.
12. ASEAN PLANTI Meeting on Plant Quarantine Treatment, 19-21 March 1986 - PLANTI.
13. ASEAN PLANTI Meeting to Review PQ Legislation and Documents, 23-25 July 1986/Sabah.
14. ASEAN PLANTI Meeting on Nematodes in the Movement of Plant Materials, 29 September to 1 October 1986/Indonesia.

STAFF SUPPORT COST SUMMARY
US Funded Positions

Position/Category	Number of Persons	(M\$000) Salary & Allow. (1986)	(US\$000) Salary & Allow. (1986)	Phase I Salary and Allowance				Total
				Year 1	Year 2	Year 3 (US\$000)	Year 4	
A. Professional								
(1) On Board	9	319	123	131				
(2) Vacant	3	-		36				
				167	179	191	204	741
B. Laboratory Staff	13	117	45	48	51	54	58	211
C. Farm Staff	2	29	11	12	13	13	14	52
D. Admin. Staff	4	81	31	33	35	38	40	146
T o t a l	31	546	210	260	278	296	16	1,150

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Training Plan and Cost Summary

Category	Duration	Location	Cost per Program \$ US	Distribution 1/						Total #	Total Program Cost
				B	I	M	P	S	T		
M.S. Degree	2.5 yr.	U.S.	50,000	1	1	1	1	1	1	6	300,000
M.S. Degree	2.5 yr.	ASEAN	15,000	1	1	1	1	1	1	6	90,000
Diploma	10 mos.	PLANTI	5,750 ^{2/}	5	5	5	5	5	5	30	172,500
Certificate	6 mos.	PLANTI	3,500 ^{2/}	8	16	16	160	80	160	80	280,000
Short-Courses	1 mo.	PLANTI	750	80	160	160	160	160	80	800	600,000
Study-Tours	1 mo.	ASEAN	3,400	6	6	6	6	6	6	36	122,400
Study-Tours	1 mo.	U.S.	5,000	3	3	3	3	3	3	18	90,000
PLANTI Staff	1 mo.	U.S.	6,000							4	24,000
Technical Meetings	1 week	ASEAN	1,200	40	40	40	20	40	20	200	240,000
Senior Fellowships	6 mo.	Malaysia	3,750							6	22,500
Conferences	1 week	ASEAN	800			(3 x 50)				150	120,000
Overseas Conference				2	2	2	2	2	2	12	39,600
T O T A L									1348	\$2,100,000	

1/ B = Brunei Darussalam
 I = Indonesia
 M = Malaysia
 P = Philippines
 S = Singapore
 T = Thailand

2/ Based on a cost factor of M\$ 1,379 per mo. (US\$ 530) plus R.T. travel costs for Non-Malaysian students

Technical Assistance Needs and Cost Summary
(\$ 000)

Category of Consultants	Duration in week	Year #1 Cost	Year #2 Cost	Year #3 Cost	Year #4 Cost	Total
Pathology (Palms)	8	24				24
Seed Technology	6	18				18
Serology	8	24				24
Bacteriology	6		18			18
Fumigation	6		18			18
Treatment Methods	8		24			18
Nematology	6			18		18
Toxicology	5			18		18
Weed Specialist	6			18		18
Acariology	6				18	18
Entomology	6				18	18
Pathology (Cacao)	6				18	18
General Legislation	6			18		18
Mycology	6			18		18
Post Entry Quarantine	6	18				18
Quarantine Info. & Communication	6		18			18
Plant Quarantine Operations	52	60	59			119
T O T A L	154	144	137	90	54	425

PLANT QUARANTINE SPECIALIST
WORKSCOPE

LOCATION OF POSITION: ASEAN PLANTI, Malaysia

ASSIGNMENT: One year

SALARY: Negotiable

EDUCATIONAL REQUIREMENT: MS degree, in Entomology, Plant Pathology, Nematology or Botany, with additional graduate work desirable. Previous supervisory experience at port of entry, with at least 10 years experience in plant quarantine.

Having a familiarity with the plant quarantine operations involved in the clearance of ships, aircraft and vehicles and their baggage, cargo and stores; also inspection and treatment of propagative material and post-entry practices; also ship and cargo fumigations and commodity treatments of fruit, vegetable, grains and other agricultural items. Be able to demonstrate all types of equipment used in plant quarantine work at ports of entry or in the laboratory.

Be conversant with the rules and regulations involved in the issuance of phytosanitary certificates. Be familiar with pest interception techniques. Have had experience in preparation of training material and in training of trainers and plant quarantine officers. The ability to plan, coordinate and motivate is important. Experience in developing countries highly desirable.

JOB REQUIREMENTS: Serving on the PLANTI staff and organizing and presenting plant quarantine lectures and working with other staff members to assure all aspects of plant quarantine philosophy and operations are included in lecture material. Act as a consultant to PLANTI staff on technical plant quarantine operations.

Projection of Expenditures by Fiscal Year
(\$ 000)

Category	YEAR #1 (1987-1988)		YEAR #2 (1988-1989)		YEAR #3 (1989-1990)		YEAR #4 (1990-1991)		Total	
	AID	OTHER	AID	OTHER	AID	OTHER	AID	OTHER	AID	OTHER
1. Capital Budget										
a. Construction		135								135
b. Commodities & Equipment	30	35	110	35	35	35	25	30	200	135
2. Operating Costs										
a. Staff	260	300	278	350	296	380	316	390	1,150	1,420
b. Other		25		25		25		25		100
3. Training	588	92	562	88	520	82	430	68	2,100	330
a. U.S.	(102)	(16)	(162)	(25)	(120)	(19)	(30)	(5)	(414)	(65)
b. Other	(486)	(76)	(400)	(63)	(400)	(63)	(400)	(63)	(1,686)	(265)
4. Technical Asst.	215		75		85		50		425	
5. Information Dissemination	30		35		30		30		125	
T O T A L	1,123	587	1,060	498	966	522	851	513	4,000	2,120

ASEAN Contributions-Cost Summary(\$000)^{1/}Phase I (1981-1986)

Building and Facilities	2,620
Operating Costs	<u>650</u>
Total Phase	3,270

Phase II (1987-1991)

Building and Facilities	135 ^{2/}
Operating Costs	1,650 ^{2/}
Salary and Allowances for Trainees	<u>330</u>
	2,115

^{1/} Converted at current exchange rate of M\$2.6 = US\$1^{2/} PLANTI support included in GOM Five-Year Development Plan

THE BIOLOGICAL BASIS FOR PLANT QUARANTINE

PQ philosophy is based on the biological phenomenon that a multiplicity of factors tend to prevent a successful establishment of an exotic species into an area though it may be introduced numerous times. These factors may be referred to as environmental resistance (ER). They include climate, seasons, temperature extremes, appropriate niches or shelter, predators, parasites, competing species, and the inherent limitation of the species to survive and adapt. Any one of these factors may prevent a successful establishment and, concerted, they pose a great deterrent to species from one area becoming established in another. However, when they are optimal a bridge-head may be established. Whether the species can exploit this foci and spread further depends on these factors and biotic potential (BP).

The "BP" of a species is its inherent ability to survive and increase in numbers. It includes number of eggs laid or young produced, how many survive, the length and number of generations, the sex ratio, the facility with which the sex find each other to mate, the adult longevity and their habits and host specificity. Usually nature provides if the expected survival rate from young to adult is low, more immature forms will be produced and visa versa. Thus a species may have a high or low BP but the oscillation of its population depends also on the ER. The "ER" lid keeps the "BP" pot from boiling over.

These diametrically opposing forces result in a "probability of establishment factor" (FX) which PQ takes advantage of and is in fact the basic reason Plant Quarantine can be successful though it can never be 100%. Thus a formula can be devised:

$$\frac{T}{PQ} \times \frac{BP}{ER} = PX$$

Where: T = Times of introduction
 PQ = Times of interception
 BP = Biotic potential
 ER = Environmental resistance
 and PX = Probability of Establishment Factor

Any factor in the equation affects PX. While we can do little to alter BP or ER, we can change the T/PQ part of the equation. PQ's basic thrust is to reduce the number of times a species may be introduced. This can be accomplished in a number of ways. An effective PQ effort attempts to intercept those pests that may be introduced. Succinctly put, the bottom line is PQ can prevent or delay the establishment of a pest species because it relies on mathematic probabilities of establishment and the biological phenomena that prevent most introductions from becoming successful establishments.

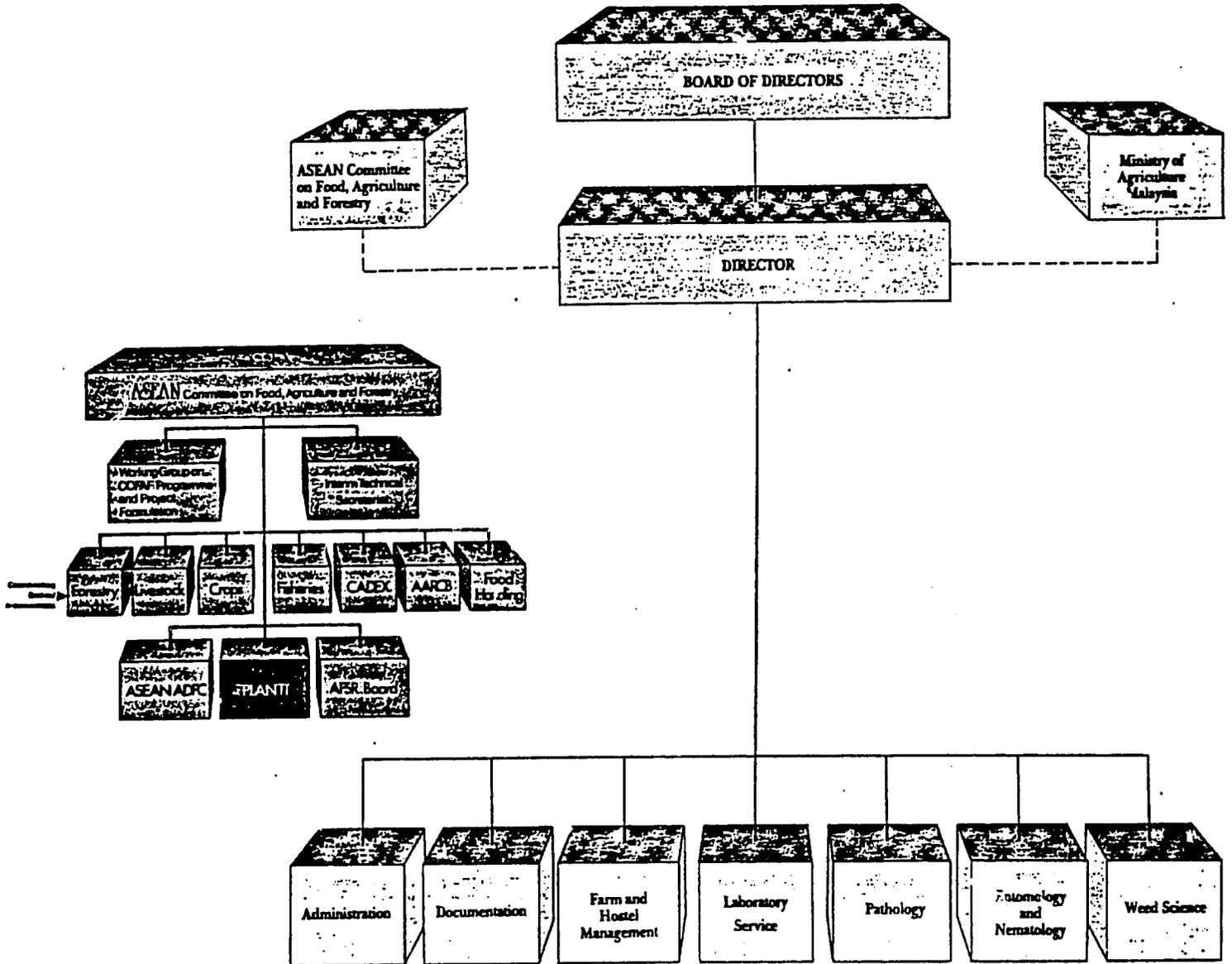
THE THREAT OF EXOTIC PESTS

All over the world species of plants and animals live in environments that suit their needs. There may be other comparable areas they have not reached because of some geographic barrier, an ocean, mountain range, desert or even lack of continuity of host material. These endemic species usually live in a more or less check and balance situations with other organisms.

Over millions of years many species have extended their range thru natural spread; ambulatory movement, flying, wind, water, and hitch-hiking on other animals. However, man and his commerce has greatly accelerated this movement. Ships, their cargo, baggage, stores, garbage and ballast; aircraft stores, cargo, baggage, garbage, international mail, vehicles crossing, and their boarders and even pedestrians with their personal effects all contribute to the dissemination of organism throughout the world and many of them have conflicted with man's endeavors. Classic examples are rabbits and cacti (*Opuntia*) introduced into Australia; Lantana, the toad (*Bufo marinus*) introduced into Hawaii and numerous insects including the Japanese beetle, the gypsy moth, the Hessian fly, the European cornborer and Dutch Elm beetle introduced into the United States; the Colorado potato beetle introduced into Europe and cosmopolitan storage pests that have become ubiquitous.

However, some of man's introductions have proved most beneficial e.g. in ASEAN rubber (*Hevea brasiliensis*) from Brazil and oil palm *Elaeis Guineensis* from Africa. On the other hand introduced weeds have become serious problems world wide. Obviously, it is wise to take safeguards to prevent pests moving in man's commerce. This, Plant Quarantine attempts to do with prohibitions, safeguards, inspections, treatments and post-entry procedures.

PLANTI ORGANIZATIONAL STRUCTURE



DETAIL OF PROJECT'S ADPC COMPONENT

This Annex contains back-up and supporting materials (Sub-Annexes) for the ADPC Component. Sub-Annexes include:

- D-1 Training/Technical Activity Detail
 - a. Consolidated Training Summary - Phase I (1980-86)
 - b. Description of M.S. Degree (Technical Group) Program
 - c. Description of Non-Degree (Micro-Group) Program
 - d. Description of Non-Degree (Special-Group) Program
 - e. Description of Research and Planning Activity

- D-2 Detail of Cost Estimates
 - a. Summary of Component Cost Estimates by Year
 - b. Training Budget, 1987-1991
 - c. Cost Components - Technical Group Training Program
 - d. Cost Components - Micro Group Training Program
 - e. Cost Components - Special Group Training Program
 - f. Budget for Commodities and Equipment
 - g. Budget for Operations and Maintenance
 - h. Budget for Salary and Allowances
 - i. Member Country Contributions
 - j. Project of Expenditures by Fiscal Year

- D-3 Organizational Detail
 - a. Duties and Responsibilities of ADPC Sections
 - b. Organizational Chart - ASEAN/COFAF
 - c. Organizational Chart - COFAF/ADPC
 - d. Organizational Chart - ADPC

ADPC Bulk Annexes

- 1. Evaluation Report on ADPC, 1985
- 2. Asian Statistical Yearbook, 1978-1984
- 3. Directory of ADPC Participants, 1981-1984

ADPC - CONSOLIDATED TRAINING SUMMARY
PHASE I (1980-86)

Category of Training	Indonesia			Malaysia			Philippines			Singapore			Thailand			Total		
	M ^{1/}	F ^{2/}	T	M	F	T	M	F	T	M	F	T	M	F	T	M	F	T
Technical Group - M.S. Degree	10	2	12				9	5	14				8	7	15	27	14	41
Micro Group (3 months)	19	15	34	16	6	22	16	18	34				30	5	35	81	44	125
Special Group & other Short Term (1 to 2 wks.)	9	3	12	13	2	15	5	4	9	2		2	9	3	12	38	12	50
TOTAL	38	20	58	29	8	37	30	27	57	2		2	47	15	62	152	70	216

1/ M = Male

2/ F = Female

Degree Training Program
The Technician Group (TG) Training Program (M.S. Ag Econ)

A. Purpose

To train technical personnel of the ASEAN countries, who would be responsible for the planning, research and/or policy analysis in the field of food, agriculture and forestry in their respective countries.

To increase the number of trained personnel in the respective national food, agriculture and forestry planning offices of the ASEAN member countries.

B. Participant's Qualifications

1. A B.S. degree in Economics, Agricultural Economics, Agriculture, Statistics, or academic programs in agricultural development.
2. Experience in the field of agricultural development for at least 2 years.
3. Age between 25-40.
4. Familiarity with current and potential agricultural situation in their home countries.
5. Good English proficiency.

Applicants are required to provide preferably the scores of the Test of English as a Foreign Language (TOEFL) or an attested certificate of English language proficiency from a governmental or professional technical courses and appropriate tests.

5. Good health condition

Participants will be required to provide a health certificate showing that he or she is in good health and is able to study and travel.

C. Admission Procedures

1. The ASEAN ADPC sends out the TG admission notification to the Board of Planners and interested government institutions and organizations in member countries.

2. Members of the Board of Planners in the respective countries nominate applicants who will be under the ASEAN ADPC's TG program support. Interested government institutions and organizations nominate their applicants for the ASEAN ADPC's support through their respective country's Board of Planners member. However, in the case of institutions or agencies who may wish to send participants (who will be supported by their agency or outside sources) to join the training program, they may directly send their nominations to the ASEAN ADPC for consideration.

3. The nominated applicants are required to send their bio-data, transcript and TOEFL scores or an attested certificate of English proficiency to the ASEAN ADPC, not later than November 30.

4. The ASEAN ADPC forwards all necessary documents of the applicants to the Graduate School Committee of the Department of Agricultural and Resource Economics, Kasetsart University, for pre-screening by December 15 of the relevant year.

5. The Department of Agricultural and Resource Economics notifies the ASEAN ADPC of its pre-screening results by December 31.

6. Admission of prospective screened applicants will be decided by the ad hoc committee which is composed of concerned officials from the ASEAN ADPC and the Department of Agricultural and Resource Economics.

7. Upon being admitted, the applicants will be required to take the refresher course which is scheduled to start on March 1 until May.

8. The applicants, upon finishing the refresher course, shall formally apply for an official admission to the Graduate School, Kasetsart University. Applicants are required to take an oral examination before being granted admission to the Graduate School.

D. Training Courses and Schedule (Bulk File)

E. Group and Period

TG5	March 1987 - May 1989
TG6	March 1988 - May 1990
TG7	March 1989 - May 1991

F. Training Provisions

An individual participant will receive the following allowances:

a) One economy-class round-trip ticket for non-Thai participants from home country to Bangkok to enroll in the program and from Bangkok to home country after the completion or termination of the program will be shouldered by the ASEAN ADPC.

b) One economy-class round-trip, tickets (Bangkok-home country's Capital-Bangkok) will be provided for participants who would collect data from their home country for their thesis.

(c) Stipend or monthly allowance	US\$ 300/month
(d) Book allowance	US\$175/semester US\$115/summer
(e) Tuition fee	US\$100/semester (approx.)
(f) Thesis grant	US\$700
(g) Homeward shipment allowance	US\$220

Non-Degree Training:
The Micro Group (MG) Training Program

A. Purpose: 1) To train ASEAN government personnel in the formulation of agricultural project planning strategies and methodologies; and 2) to develop skills and techniques in project formulation, monitoring and evaluation.

B. Participant's Qualifications

1) A two-person group among the following combinations: a representative of the national food, agriculture, and forestry planning office; a representative of the regional (in-country) food, agriculture, and forestry planning office; a representative of implementing agencies in pilot areas of other relating agencies.

2) A B.S. degree in Economics, Agricultural Economics, Agriculture, Statistics or academic programs in agricultural development.

3) Experience in the field of food, agriculture, and forestry development in their home countries for at least 2 years.

4) Good English proficiency: Participants will be required to provide an attested certificate of proficiency from a government or professional institute confirming fluency sufficient to enable them to undertake technical courses and appropriate texts.

5) Good health condition. Participants will be required to provide a health certificate showing that he or she is in good health and is able to study and travel.

C. Admission Procedures

1. The ASEAN ADPC sends out the MG Program admission notification to the Board of Planners and interested government institutions and organizations in the member countries.

2. Members of the Board of Planners in respective countries nominate the allocated number of applicants who will be under the ASEAN ADPC MG Program support.

3. Interested government institutions and organizations may also nominate their applicants to join the program under their agency's support.

4. Applicants are required to submit their bio-data and academic transcripts to the ASEAN ADPC for evaluation.

5. The ASEAN ADPC notifies those concerned of action taken on admission/acceptance of participants.

D. Course Structure

1) Introduction: The role of agriculture in rural and national development, perspective of agricultural planning in ASEAN member countries and their agricultural and socio-economic pattern, key issues in agricultural development planning, regional and national planning of agricultural projects and programs, and basic concepts in agricultural resource economics.

2) Project Identification and Environment: Source of project ideas, identification of project at macro and micro levels, constraints in development, i.e. natural, economic, social and political climate.

3) Project Preparation and Appraisal: Project formulation procedure, project appraisal technique, economic and financial analysis, and sensitivity analysis.

4) Project Management System and Organization Design: Principles of management concepts and functions, management and organizational behavior, project management techniques, organizational structure, organizational concepts of project management, and prominent issues concerning project organization.

5) Project Monitoring and Evaluation: Methodology in project monitoring, ex-post evaluation and the linkages with on-going monitoring, usefulness of evaluation studies as a basis for assessing the performance of the project management, and basic statistics and agricultural data collection for project monitoring and evaluation.

6) Case Studies: Case studies of project appraisal of major agricultural development projects, i.e. irrigation project, livestock project, forestry project, etc.

7) Workshop: Workshop on project implementation, project monitoring and evaluation, and logical framework planning.

8) Field Observation: Visiting various agricultural development project sites which will be used as case studies for discussion and exercises of project monitoring and evaluation.

9) Supervised Field Practice: Preparing a project proposal by collecting primary data and information at the project area under close supervision of group advisors.

E. Training Methodology

Methodologies employed in training include class lecture, case studies, group exercises, syndicate discussion, special lecture by outstanding experts, workshops and study visits to farms and agricultural development projects. Specialists and consultants from outside will be invited or recruited to contribute in areas where they have particular interest and expertise, and also to provide supervision and guidance as advisor to the participants.

F. Group and Training Schedule

MG 9: June - September 1987; MG 10: January - April 1988;
MG 11: June - September 1988; MG 12: January - April 1989;
MG 13: June - September 1989; MG 14: January - April 1990;
MG 15: June - September 1990; MG 16: January - April 1991.

G. Training Provisions: 1) International travel: round-trip, economy-class air ticket will be provided for every non-Thai participants; 2) Monthly subsistence allowance at US\$ 300/month for 3 months; and 3) Travel per diem at Baht 300/day during official study tours; and 4) Health insurance.

Non-Degree Training
The Special Group (SG) Training Program

A. Background: The implementation of the program is based on an increasing awareness of the importance of agriculture in most ASEAN national economies, and on the fact that the process of agricultural development planning has become more complicated as the whole economy expands. Experience of many countries has proven that new planning tools and approaches can lead to better planning guidelines and policy formulation. The ASEAN ADPC, by its function and objective, provides an important opportunity for senior agricultural planners, researchers, and policy makers of ASEAN countries to share their interest and experiences as well as to keep abreast of recent development in agricultural planning.

B. Purposes: 1) To expose senior government officials or research leaders of national food, agricultural and forestry development planning agencies in ASEAN, to analytical tools and approaches in agricultural development planning; 2) to strengthen analytical expertise and planning capability of government officials who are taking or will take the lead in national/regional food, agriculture and forestry development planning; and 3) To provide opportunities for national senior officers, policy makers and research leaders in food, agriculture and forestry development planning of ASEAN member countries to exchange ideas and knowledge which are useful in the formulation of both national and regional agricultural policy.

C. Participant Qualifications: A senior government official, policy maker, or research leader of an ASEAN member country who has major responsibilities in the national food, agriculture and forestry development planning.

D. Admission Requirement: 1) Two participants from each ASEAN member country will be invited to join one of the SG workshops arranged by the ASEAN ADPC; and 2) The nomination of participants should reach the ASEAN ADPC not later than 45 days before the commencement of each SG programme.

E. Training Activities: 1) A ten-day seminar cum workshop to focus on a selected topic, or a set of analytical tools and techniques with actual case studies to examine agricultural development planning at the national and regional level; 2) A two-day field-trip will be arranged to view first-hand selected agricultural development project areas; 3) A case study employing the selected analytical tools and techniques learned during the seminar will be commissioned as a follow-on activity by the participants.

F. Schedule of Workshop: One workshop will be organized during November or December each year.

G. Participation Requirements: An individual SG participant can join more than one group depending upon his/her special interest, and personnel development policy of the respective member countries of ASEAN. National participants are required to prepare and present for discussion in the workshop an overview of a topic relevant to the development experience in their home country. Selective, occasional papers on agricultural development planning at both national and multinational levels by local or foreign experts are also invited for presentation in the workshop.

H. Training Provisions: 1) One round-trip economy class, air ticket for non-resident participants; and 2) Per diem/daily allowance of US\$ 50 per day per participant.

Research and Planning Activity

The research and planning activity will support analysis of specific issues and problems in agricultural development planning and policy in the ASEAN. Consistent with the recommendations made in the recent ADPC evaluation report, the research and planning activities will focus on the policy and analysis needs of the ASEAN Committee on Food, Agriculture, and Forestry as areas of common concern to the member nations of ASEAN. The objectives of research and planning component are to promote better understanding of ASEAN agriculture and enhance cooperation in agriculture and economic development within the region. The output of research and planning activities will be the exchange of knowledge and experience among ASEAN member countries, and will also be used as inputs to regional (ASEAN) as well as national (in-country) planning and policy formulation.

The process of identifying discrete and definable issues for study, takes into account each member country's views and suggestions. ASEAN ADPC served as coordinator in soliciting suggestions and reviewing the results. The common issues selected as research/study topics focus on research to enhance the market oriented approach of future cooperation in ASEAN. Thus, ASEAN ADPC plans to undertake the following research/planning studies:

1. Comparative advantage studies within ASEAN. These studies will analyze and compare costs of production, trade barriers (e.g. protection rates, tariffs and taxes), incentives (e.g., subsidies of agricultural inputs); and analyze sector-specific market information systems of the following crops: a) Rice, corn/maize, and other cereal crops; and b) sugar cane, soybean, cassava and other feed crops.
2. The conduct and/or implementation of at most two specific research/study topics (as assigned by higher ASEAN bodies) concerning agricultural planning and policy issues of concern to COFAF as identified later in the course of the ASEAN ADPC's project life.
3. The collection, compilation and consolidation of selected agricultural statistical data and information within ASEAN including its publication and dissemination; and the collection and documentation of other basic data needed for agricultural planning and policy analysis.

In the conduct of the research and planning activities, two approaches will be employed:

1. The research/study topics which are of concern to COFAF (as assigned by higher ASEAN bodies) will be contracted out to well-established and recognized researchers in ASEAN, consistent with the recommendation made in the ADPC evaluation report. The ASEAN ADPC will be responsible for the conduct of research and will assure that the research contracts are competitively awarded and completed in a timely manner and with quality results.

Four Year Budget for Operations and Maintenance Costs
((\$000))

<u>Item</u>	<u>1</u>	<u>2</u>	<u>3</u>	<u>4</u>	<u>Total</u>
1. Meetings, Travel & Per Diem	12	12	12	12	48
2. Communications and P.O.L.	15.5	15.5	15.5	15.5	62
3. Insurance	4	4	4	4	16
4. Maintenance and Repair	18	18	18	18	72
5. Miscellaneous	.5	.5	.5	.5	<u>2</u>
					200

2. The other research and planning activities enumerated above, will focus on issues of national importance and will be closely supervised by ASEAN ADPC. The ASEAN ADPC will be responsible for preparing research/study protocol guidelines to assure uniformity in data collection and ease the comparison of findings across ASEAN countries. The collection, compilation and country-level analysis of data and information will be done by country-level researchers. The rationale behind the preparation of country-level analysis within each country is (i) promote close linkages between ASEAN ADPC and the member countries; (ii) provide a better understanding of common problems and issues facing ASEAN agriculture; and (iii) enhance cooperation in overcoming common barriers to further agricultural and economic development.

The institutional mechanism will be to establish:

a) A senior research staff within the research and planning unit of the agriculture department/ministry of each member country. The selection will be made by ASEAN ADPC in close consultation with the head of the research/planning unit concerned to act as "leader" of a research/study team. Responsibilities include the country-level data collection, and analysis, and preparation of a research report. Two additional persons will be on the country-level research team and drawn from (i) the faculty of agricultural economics/economics of a well-recognized government/state college or university within the country whose expertise is in line with the subject of the research activity, (ii) any senior staff in a relevant statistical/research agency.

b) The research/study protocols will indicate the rationale, objectives, time frame, data requirements, method of analysis, expected output, report format, etc. They will be prepared by ASEAN ADPC in consultation with the member countries concerned. The protocols will also be reviewed by those involved in the research/study. The review process shall be done in a form of "consultative meeting" to be attended by the respective country's leader of the research/study team (or any member of the team who possess the expertise on the particular subject under consideration), ASEAN ADPC staff and some invited experts.

c) The ASEAN ADPC will coordinate closely with the member countries to assure consistency in research work and timely completion of the report.

d) After the country-level research results/and or reports are completed, these will be presented and discussed among country representatives. The ASEAN ADPC will prepare a finalized edition of research results reflecting the ASEAN-wide effort.

Table 1 Budgetary Requirements for Research and Planning Component
('000 US Dollars)

Activity/Item	Year				Total
	1	2	3	4	
1. Comparative advantage studies; and price & market information analysis and review of the following two groups of crops:					
1.1 <u>On rice, corn/maize, and other cereals:</u>					
a) Preparation of and consultation on the study outline and other guidelines for study implementation among in-country research team representatives, ADPC staff and selected experts	4.5	-	-	-	4.5
b) Support costs in the collection and analysis of data and information and the preparation of in-country research report by in-country research teams	8.0	15.75	-	-	23.75
c) Research results presentation and discussion by in-country research team representatives, ADPC staff and invited experts	-	5.5	-	-	5.5
d) Research report synthesization, editing, and reproduction	-	-	2.0	-	2.0
e) Staff travel in the selection of and coordination with in-country research teams in the member countries	3.0	-	-	-	3.0
<u>Sub-total</u>	<u>15.5</u>	<u>21.25</u>	<u>2.0</u>	<u>-</u>	<u>38.75</u>

Table 1 (continuation). Budgetary Requirements for Research and Planning Component.
('000 US Dollars)

Activity/Item	Year				Total
	1	2	3	4	
1.2 <u>On sugar cane, soybean and cassava; and other feed crops:</u>					
a) Preparation of and consultation on the study outline and other guidelines for study implementation among in-country research team representatives, ADPC staff and selected experts	-	4.5	-	-	4.5
b) Support costs in the collection and analysis of data and information and the preparation of in-country research report by in-country research teams	-	8.0	15.75	-	23.75
c) Research results presentation and discussion by in-country research team representatives, ADPC staff and invited experts	-	-	5.5	-	5.5
d) Research report synthesization, editing, and reproduction	-	-	-	2.0	2.0
e) Staff travel in the selection of and coordination with in-country research teams in the member countries	-	3.0	-	-	3.0
<u>Sub-total</u>	-	<u>15.5</u>	<u>21.25</u>	<u>2.0</u>	<u>38.75</u>

Table 1 (continuation). Budgetary Requirements for Research and Planning Component
('000 US Dollars)

Activity/Item	Year				Total
	1	2	3	4	
2. <u>Implementation and conduct of planning and policy studies of concern to COFAF</u>	-	<u>15.0</u>	<u>15.0</u>	<u>10.0</u>	<u>40.0</u> ^{a/}
3. <u>Collection, compilation and consolidation of selected agricultural statistical data and information including its publication and dissemination:</u>					
a) Collection and compilation costs	3.0	3.0	3.0	3.0	12.0
b) Follow-up/consultation with in-country data collection units/travel costs	-	6.0		6.0	12.0
c) Publication, distribution & other related costs	-	4.0	-	4.0	8.0
d) Acquisition of statistical references and other materials	-	0.25	-	0.25	0.5
Sub-total	<u>3.0</u>	<u>13.25</u>	<u>3.0</u>	<u>13.25</u>	<u>32.5</u>
T O T A L (Research & Planning Component)	<u>18.5</u>	<u>65.0</u>	<u>41.25</u>	<u>25.25</u>	<u>150.0</u>

^{a/}The timing in the use of funds would depend on the year in which the research/study assignments are given by COFAF or other higher ASEAN bodies.

df

SUMMARY OF COMPONENT COST ESTIMATES

\$

Item	YEAR 1			YEAR 2			YEAR 3			YEAR 4			FOUR YEARS			Grand Total
	USA	ASEAN		USA	ASEAN		USA	ASEAN		USA	ASEAN		USA	ASEAN		
		Host country (RTG)	Non-Host country (in kind)		Host country (RTG)	Non-Host country (in kind)		Host country (RTG)	Non-Host country (in kind)		Host country (RTG)	Non-Host country (in kind)		Host country (RTG)	Non-Host country (in kind)	
Training	145,400			250,018			257,638			164,933			817,989			817,989
Commodities	9,200			9,200			9,200			9,200			36,800			36,800
Equipments	13,200												13,200			13,200
Operation & Maintenance	50,000	17,600 ^{1/}		50,000	17,600		50,000	17,600		50,000	17,600		200,000	70,400		270,400
Salaries	133,000	9,000 ^{3/}	31,520 ^{5/}	133,000	9,000	31,520	133,000	9,000	31,520	133,000	9,000	31,520	532,000	36,000	126,080	694,080
Research & Planning	18,500	12,200 ^{4/}		65,000	12,200		41,250			25,250			150,000	48,800		150,000
Total	369,300	111,612	31,520	507,218	111,612	31,520	491,088	111,612	31,520	382,383	111,612	31,520	1,749,989	446,448	126,080	2,322,517

- Note
- ^{1/} US\$17,600 for utility see p.29 in PP (Project Proposal)
 - ^{2/} US\$72,812 included office space US\$70,892/year and computer services for office space computation using (a) total office space (b) 1,024 m² (c) rent 150 baht/month per m² and (d) exchange rate US\$ 1 = 26 baht.
 - ^{3/} US\$9,000 for salaries of 6 staff and janitors and 3 guards.
 - ^{4/} US\$12,200 in kind included consultancy services of Chairman of the BOP 6,600 and service of RTG concerned offices see p.29 in PP.
 - ^{5/} see table 6 on p.29 in PP.

FOUR-YEAR TRAINING BUDGET, 1987-1991

\$

Item	Year	1	2	3	4	Total
		(Jun.+May) 87+88	(Jun+May) 88+89	(Jun+May) 89+90	(Jun+May) 90+91	
1. <u>Training</u>		<u>145,400</u>	<u>250,018</u>	<u>257,638</u>	<u>164,933</u>	<u>817,989</u>
TG 5 (Aug. 87+Oct. 89)		57,260	79,088	29,445	+	165,793
TG 6 (Mar. 88+May. 90)		21,040	63,260	81,493	+	165,793
TG 7 (Mar. 89+May 91)		+	24,230	63,260	81,493	168,983
MG 10 (June 87+Sept 87)		33,550	+	+	+	33,550
MG 11 (Jan. 88+Apr. 88)		33,550	+	+	+	33,550
MG 12 (June 88+Sept 88)		+	33,550	+	+	33,550
MG 13 (Jan. 89+Apr. 89)		+	33,550	+	+	33,550
MG 14 (June 89+Sept 89)		+	+	33,550	+	33,550
MG 15 (Jan. 90+Apr. 90)		+	+	33,550	+	33,550
MG 16 (June 90+Sept 90)		+	+	+	33,550	33,550
Mg 17 (Jan 91+Apr 91)		+	+	+	33,550	33,550
Special Group Training Program +			16,340	16,340	16,340	49,020

Estimated Cost Per TG Program
(12 Participants for 27 months)

Items	US\$ Total
- Travel for Introduction of 1 Training Program	3,190
- International Ticket	12,040
- Monthly Allowance (\$300x12parsx27months)	97,200
- Book Allowance (\$175x12parsx4semesters + \$115x12parsx2summers)	11,160
- Health Insurance Premium (\$100x12parsx3years)	3,600
- Tuition & Instructional Fees	27,473
- Overhead Cost (\$10x12parsx16months)	1,920
- Visa Extension (\$15x10parsx3times)	450
- Thesis Grant (\$700x12thesis)	8,400
- Commencement Exercise	450
- Academic Seminar (\$150x6times)	900
- Homeward Shipment (\$220x10pars)	2,200
T o t a l	168,983

Estimated Cost Per MG Program
(12 participants for 3 months)

	US\$
Items	Total
- International Travel (\$580x10non-Thais)	5,800
- Monthly Allowance (\$300/par/month x12parsx3months)	10,800
- Group and Project Preparation Advisors (\$15x30hrsx3advisors)	1,350
- Instructional Fees	3,240
- Field Trip	
- Per Diem (\$15x12parsx13days)	2,340
- Transportation and other arrangement expenditures	5,980
- Grant for Project Proposal Preparation (\$550x3groups)	1,650
- Document and Supplies	900
- Health Insurance Premium (\$100x12pars)	1,200
- Commencement Exercise	290
Total	33,550

Estimated Cost per SG Program
(12 participants for 10 days)

	US\$
Items	Total
1) International Travel:	
non-residence participants	5,800
2) Travel Per diem	
a) 12 participants (\$50/day/par x10daysx12pars)	6,000
b) Senior staff (\$40/dayx4daysx2staff)	320
c) Junior staff (\$25/dayx4daysx2staff)	200
3) Document and Supplies	600
4) Trip Arrangement (\$280/dayx4days)	1,120
5) Report Writing Grant	2,000
(\$500/3person-groupx4groups)	
6) Commencement Exercise	300
Total	16,340

Four-Year Budget for Commodities and Equipment

US\$						
Year	1	2	3	4	Total	
	(Jun-May)	(Jun-May)	(Jun-May)	(Jun-May)		
Item	87-88	88-89	89-90	90-91		
2. Commodities	<u>9,200</u>	<u>9,200</u>	<u>9,200</u>	<u>9,200</u>	<u>36,800</u>	
+ Library Supplies & Materials (Subscription of newspaper, periodical and publication; purchasing of text-book; reproduction of articles of articles, book-shelves library cards)	3,200	3,200	3,200	3,200	12,800	
Computer Supplies	3,000	3,000	3,000	3,000	12,000	
Office Supplies (Stationery & Reproduction)	3,000	3,000	3,000	3,000	12,000	
3. Equipment	<u>13,200</u>				<u>13,200</u>	
+ Typewriter \$1,200x2	2,400				2,400	
+ Wireless microphone & Portable amplifier set	1,400				1,400	
+ Mini-conference table & Chair	700				700	
+ White-board \$140x2	280				280	
+ Drinking-water cooler stand and purifier \$500x2	1,000				1,000	
+ Computer hard-disk	2,000				2,000	
+ Projection Screen	180				180	
+ Conferent Room Sound system	3,440				3,440	
+ Computer printer	1,800				1,800	

Four-Year Budget for Salary and Allowances

US \$

Item	Year	1	2	3	4	TOTAL
		(Jun-May) 87-88	(Jun-May) 88-89	(Jun-May) 89-90	(Jun-May) 90-91	
5. Salaries & Allowance		133,000	133,000	133,000	133,000	532,000
- Director	2,200/month	26,400	26,400	26,400	26,400	105,600
- Senior staff	1,400/month	16,800	16,800	16,800	16,800	67,200
- Senior staff	1,400/month	16,800	16,800	16,800	16,800	67,200
- Economist	700/month	8,400	8,400	8,400	8,400	33,600
- Computer programmer	500/month	6,000	6,000	6,000	6,000	24,000
- Accountant	500/month	6,000	6,000	6,000	6,000	24,000
- Secretary	500/month	6,000	6,000	6,000	6,000	24,000
- General ad./disbursement	400/month	4,800	4,800	4,800	4,800	19,200
- Training Aides	400/monthx2	9,600	9,600	9,600	9,600	38,400
- Research Aide	400/month	4,800	4,800	4,800	4,800	19,200
- Clerk/Typists	250/monthx2	6,000	6,000	6,000	6,000	24,000
Allowances		21,400	21,400	21,400	21,400	85,600

TABLE III
Projection of Expenditures by Fiscal Year
 (\$000)

<u>Category</u>	<u>Year 1</u>		<u>Year 2</u>		<u>Year 3</u>		<u>Year 4</u>		<u>Total</u>	
	<u>AID</u>	<u>Other</u>	<u>AID</u>	<u>Other</u>	<u>AID</u>	<u>Other</u>	<u>AID</u>	<u>Other</u>	<u>AID</u>	<u>Other</u>
Training	145	-	250	-	260	-	165	-	820	-
Commodities & Equipment	23	-	8	-	7	-	12	-	50	-
O & M	50	90	50	90	50	91	50	91	200	364
Salaries	132	52	132	52	133	53	133	53	530	210
Research & Planning	20	-	65	-	40	-	25	-	150	-
TOTAL	<u>370</u>	<u>142</u>	<u>505</u>	<u>142</u>	<u>490</u>	<u>143</u>	<u>385</u>	<u>143</u>	<u>1750</u>	<u>570</u>

Note: Funds for contingency, inflation, evaluation, audit and consultants are being provided on a project wide basis and are not included in the component budget figures.

Four-Year Budget of ASEAN Contribution; 1987-1991

US\$					
Year	1	2	3	4	Total
Item	(Jun.-May) 87-88	(Jun.-May) 88-89	(Jun.-May) 89-90	(Jun.-May) 90-91	
<u>Host Country (RTG)</u>	<u>111,612</u>	<u>111,612</u>	<u>111,612</u>	<u>111,612</u>	<u>446,448</u>
1. Office Space	70,892	70,892	70,892	70,892	283,568
2. Computer Service	1,920	1,920	1,920	1,920	7,680
3. Electric & Water Supply	17,600	17,600	17,600	17,600	70,400
4. Supporting Staff	9,000	9,000	9,000	9,000	36,000
5. Consultancy Services of Chairman (In kind)	6,600	6,600	6,600	6,600	26,400
6. Service of RTG concerned officers (In kind)	5,600	5,600	5,600	5,600	22,400
<u>Non-host Country (In kind)</u>	<u>31,520</u>	<u>31,520</u>	<u>31,520</u>	<u>31,520</u>	<u>126,080</u>
7. Consultancy Services of BOP	11,000	11,000	11,000	11,000	44,000
8. Services of ASEAN concerned officers	20,520	20,520	20,520	20,520	82,080
Total	143,132	143,132	143,132	143,132	572,528

Training Staff. The main duties of the Training Staff are to coordinate with the academic as well as other staff of applied institutions in Thailand towards the development of training curricula, and to arrange for the services of the teaching staff, participate in instructional activities and assist trainees and meeting participants in their official needs. They shall also be responsible for the monitoring of academic progress of participants and in guiding the participants' own planning and policy analysis research projects. The training component staff consisting of one senior staff and two training assistants to arrange and conduct the scheduled courses along with the assistance of a number of specialized teachers, demonstrators and visiting lecturers.

Agricultural Data Collection System Staff. The main duties of the staff are to collect data on food, agriculture and forestry of ASEAN through the contact persons in the member countries; to check, verify, process, update, etc., the data received to ensure maximum reliability, comprehensiveness, relevance, timeliness and uniformity of the data collected. They shall collect missing data, improve the form of presentation of existing data, improve the efficiency in processing with special reference to computerization and extension of data coverage and responsibility for publishing of the ASEAN Yearbook on food, agriculture and forestry. The component staff consisting of one senior staff and one statistical assistant to engage in data collecting, collating, storage, retrieval and dissemination (in the form of publications) activities.

Research and Planning Staff. The main duties of the research planning staff are to conduct and/or implement specific research assignments given by the ASEAN COFAF and other higher ASEAN bodies; to conduct a periodic review of the field of agricultural development studies; and to assist in teaching and advisory services. They shall also assist in formulating research proposals in areas related to agricultural development planning and policy analysis/issues for consideration by outside institutions funding assistance and to implement the same in accordance with the terms and reference of the research proposal.

ORGANIZATION OF THE ASEAN ADPC (PHASE II)

The ASEAN ADPC Board of Planners. The Board shall be composed of one representative from each of the member-countries, and the Director of the ASEAN ADPC would act as the Ex-Officio Secretary to the BOP. The BOP member shall preferably come from the agricultural policy and planning bureau of office (or its equivalent) of the member country concerned. The functions of the Board are to: plan and manage on a continuing basis the various activities to be undertaken by the Centre; approve and oversee the disbursement of project funds; and keep the ASEAN COFAF informed of project development and to seek COFAF policy guidance in case of need.

Director. To run the office in Thailand, the Director of the ASEAN ADPC shall be a Thai national and shall be responsible inter alia for the execution and administration of the work program. In discharging his executive and administrative functions he shall be guided by the ASEAN ADPC Board of Planners. In implementing the work activities, he shall coordinate with the competent authorities of participating countries and other regional or international organizations concerned. In addition, he shall direct all project activities. To the extent that his time permits, he also participate in training, research, planning advisory and other functions of the Centre.

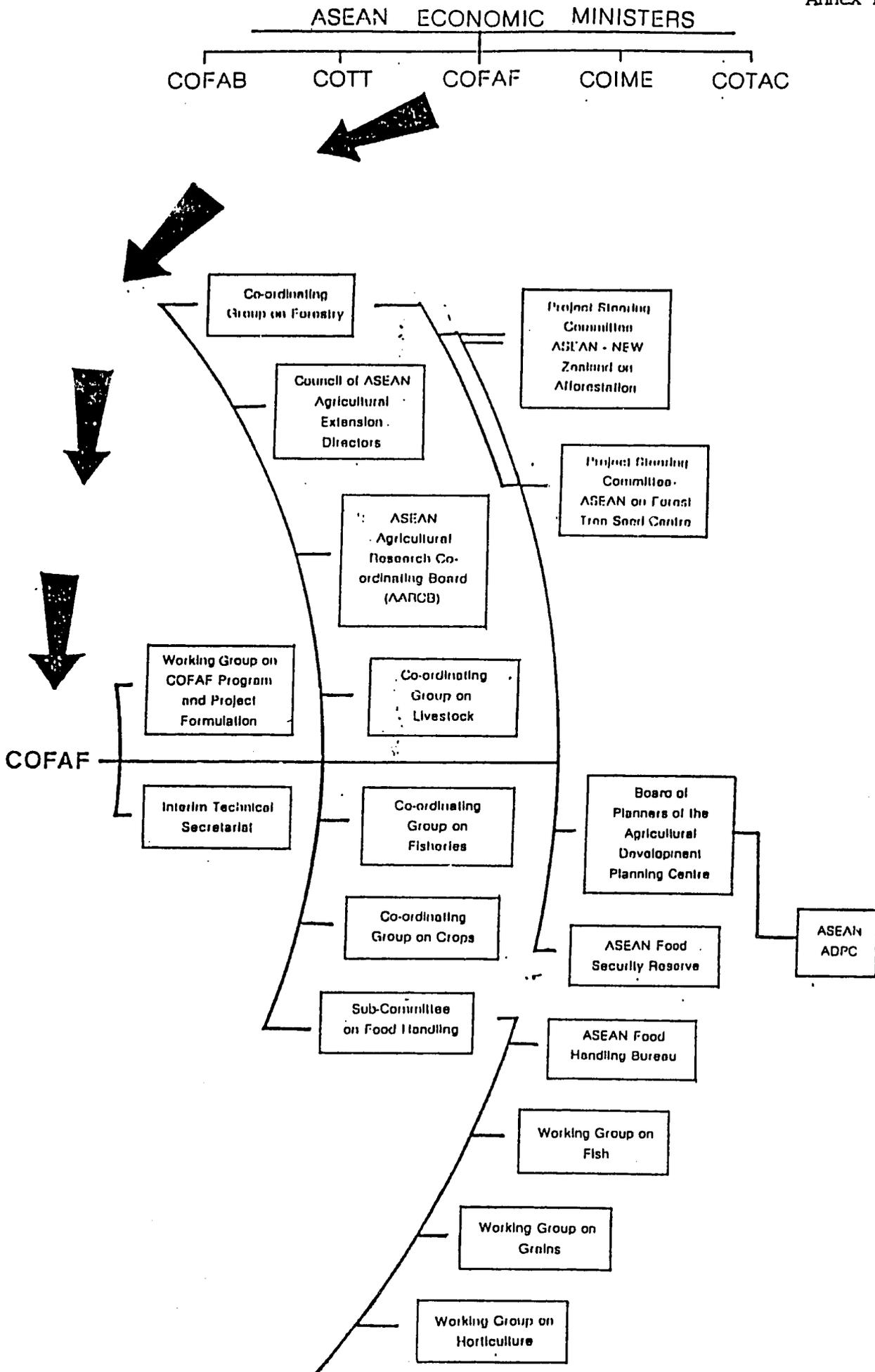
Administrative staff (Support Services). The main duties of the administrative staff are to carry out the work of providing administrative support; supervision over and maintenances of equipment, storage, and other property of the Centre; arrange for travel and use of registry facilities; and arrangement of classrooms, seminar rooms, cafeteria and accommodation for the participants in the Centre's activities and amenities for other visitors. Part of the support services, which is directly under the Director, shall include the computer support which consists of the computer facilities and staff.

Fifteen (15) administrative support personnel are needed to enable the smooth running of the Centre and its program. The detailed composition of administrative staff is:

Position	Number
A. Administration and Management	
Director	1
B. Support Staff	
Computer Programmer	1
Secretary	1
Accountant	1
General Disbursing Officer	1
Office Clerks	2
Drivers*	3
Janitors*	3
Guards*	3

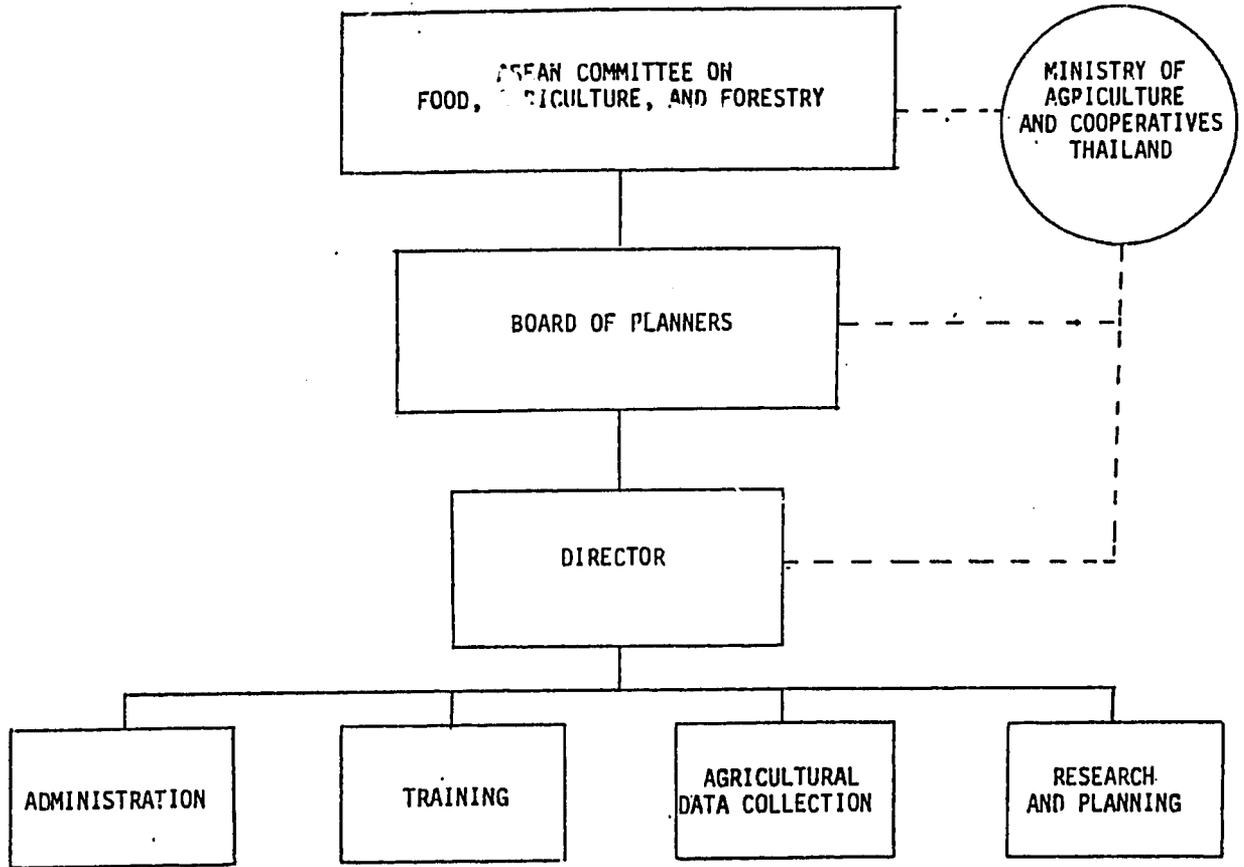
*Staff Salaries supported by the Royal Thai Government.

Organizational Structure of COFAF



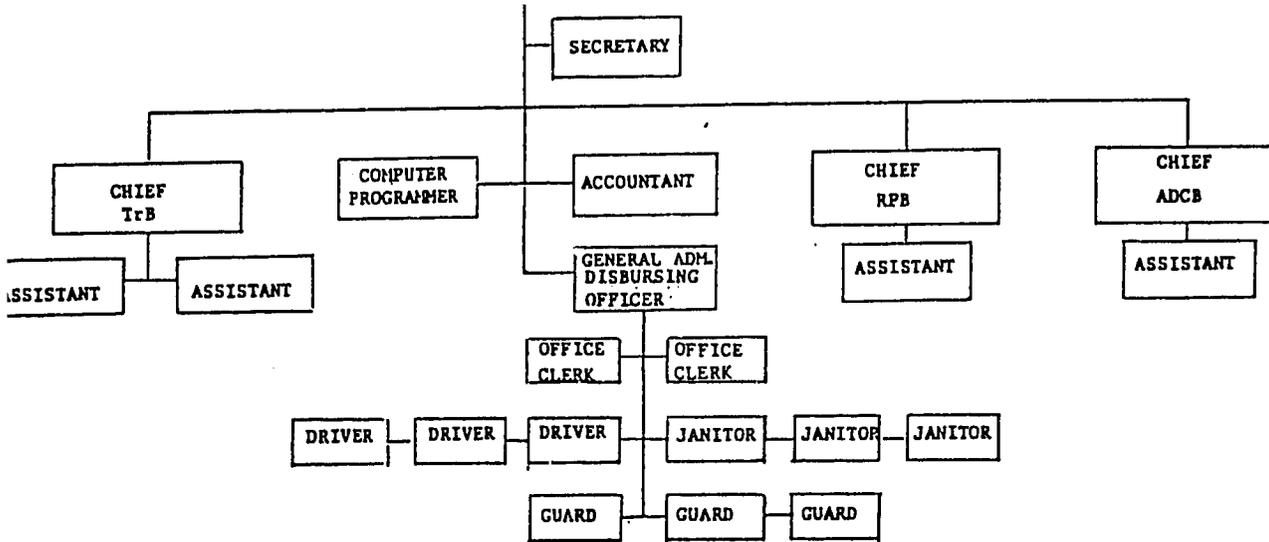
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ASEAN ADPC ORGANIZATIONAL STRUCTURE



ASEAN
ADPC

ORGANIZATIONAL CHART OF ASEAN ADPC



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Detail of Health/Nutrition Component

This Annex includes back-up and supporting materials (Sub-Annexes) for the TROPMED Component. Sub-Annexes include:

- E-1 TROPMED National Centres and Regional Courses
- E-2 Number of Trainees by Institution, by Country, and by Sex 1981/82 to 1984/5
- E-3 Worksheet of Estimated ASEAN Contributions
- E-4 Budget for ASEAN/TROPMED Courses, 1987/8 - 1990/91
- E-5 Scholarship Cost Breakdown by Course
- E-6 Projection of Expenditure by Fiscal Year
- E-7 Illustrative List of Regional Seminar Topics.

Bulk Annexes

1. Evaluation of ASEAN Scholarships for Tropical Medicine and Public Health Project.
2. Proposal for Phase II - TROPMED
3. Proposed Fourth Five Year Plan of TROPMED July 1985-June 1990
4. Syllabus of Courses
5. National Health Plans

Indonesia
Philippines
Malaysia

TROPMED National Centres and Regional Courses

1. TROPMED National Centre of Indonesia: The Faculty of Medicine at the University of Indonesia (UIFM) is the feeder faculty for medical education in the country, accepting 150 new students each year. Government operating support amounted to \$46,000 in 1985. Consulting and research are important sources of institutional support. UIFM works on projects with WHO - Tropical Diseases Research Program, IDRC, and JOICFP.

Nutrition is one of the 5 major thrusts of the GOI's health program, and efforts are underway to establish Departments of Nutrition in all 24 Faculties of Medicine across the country. Medical school curriculum require over 300 hours of nutrition, as do nursing curriculum.

The UIFM in Jakarta offers two regional courses (i) 6 month course leading to Diploma of Applied Nutrition (D.A. Nutr); and (ii) 2 year course for M.S. in Applied Nutrition. Three buildings were built in the 1970's for the TROPMED Nutrition Centre, with lecture and seminar rooms, laboratory facilities to accommodate 40 students, facilities for animal experimentation, library with audiovisual facilities and a museum for tropical medicine and nutrition. The full facilities of UIFM are available to students for research studies on nutritional diseases and nutritional disorders, in connection with parasitology, biochemistry, microbiology, ophthalmology, dermatology, and pediatrics. In 1985/6, UIFM received \$29,000 for 12 students in the regional courses.

2. TROPMED National Centre of Malaysia: Institute of Medical Research (IMR) was started by the British in 1900 as a regional institution to undertake diagnosis and provide analysis and research on tropical disease throughout the Asian region, IMR has become a primary research and communicable disease control center for Malaysia and the region. Specific functions include: (a) biomedical research; (b) diagnostic services; (c) production of vaccines and biologicals; (d) short-term applied training; and (e) consultative services.

IMR hosts the World Health Organization (WHO) Inter-Regional Program Office and the WHO Regional Centre for Research and Training in Tropical Medicine. Other international linkages include those with SEAMEO-TROPMED; Walter Reed Army Services; SEAMIC (Japanese Information Services); ASEAN; IFSTAD (Islamic Foundation for Science and Technology Development); Universities in Europe, Australia, Britain and Japan; IDRC (Canada); and JOICFP (Japanese Family Planning).

IMR has buildings dating from 1900 which house 28 divisions of research and services (e.g., bacteriology, cytology, filariasis research, laboratory animal resources, malaria research, medical ecology, nutrition parasitology, rural health research, virus research, serology and immunology); four schools; two foreign research units (including U.S. Army/Walter Reed); a biomedical museum, library and administration office.

The current budget of IMR totals about US\$4,608,000 of which about 5 per cent comes from non-Malaysian Government sources. U.S. funding in 1985 included \$230,752 (US Army/Walter Reed) and an estimated \$60,000 for scholarships. IMR budget comes from President's Office budget (Science

Advisor) rather than the Ministry of Health. In spite of the recent economic turndown and budget cuts in many ministries, IMR budget is projected to remain at a stable level.

IMR's main function is research. However, two six-month diploma courses are offered as part of its regional effort: (i) Diploma Applied Parasitology and Entomology (DAPE); and (ii) Diploma in Medical Microbiology. Also offered is a 2 year course for M.S. in Medical Microbiology, Applied Parasitology and Entomology.

3. TROPMED National Centre of the Philippines. The newly named College of Public Health, University of the Philippines is housed in an annex with lecture rooms and laboratories. The Institute has 7 Departments (Epidemiology and Biostatistics, Medical Microbiology, Parasitology, Nutrition, Public Health Administration, Community Health and Environmental and Occupational Health), library and documentation centre. Accommodation for students is available near the campus. Research facilities are available for studies on schistosomiasis, paragonimiasis, leptospirosis, ascariasis, and other soil-transmitted helminthiasis, microbial diseases, nutrition, rural health, etc. The TROPMED National Centre of the Philippines also serves as Reference Centre for Statistical Analysis of research data.

Three regional courses are offered by TROPMED/Philippines: (a) 12 month course for Master of Public Health (MPH); (ii) 2 year course for M.S. in Public Health; and (iii) 10 month course leading to Master of Occupational Health.

4. TROPMED National Centre of Thailand: The Faculty of Tropical Medicine, Mahidol University, Bangkok. The Faculty buildings now consist of one 5-storey administrative building, one 9-storey building for the Bangkok School of Tropical Medicine, and teaching and research laboratories, and one 150-bed hospital building. The Faculty has 10 Departments -Tropical Medicine, Protozoology, Helminthology, Medical Entomology, Tropical Hygiene, Tropical Nutrition and Food Science, Microbiology and Immunology, Tropical Radioisotopes, Tropical Pediatrics, Clinical Tropical Medicine and Hospital for Tropical Diseases) with research laboratories, the Bangkok School of Tropical Medicine, Insectaries, Animal Houses, Museum and Reference Centre with audiovisual facilities and Library. Accommodation is provided for nurses and resident doctors. Facilities are available for research and clinical work on malaria, filariasis, schistosomiasis, paragonimiasis, soil-transmitted helminthiasis, tropical pediatrics, diarrheas and other tropical diseases of public health importance.

Four regional courses are offered: (i) 6 month Course leading to Diploma in Tropical Medicine and Hygiene; (ii) 2 year course for M.S. in Clinical Tropical Medicine ; (iii) 10 month course for MPH in Urban Health; and (iv) 12 month course for M.S. in Clinical Tropical Medicine.

5. National University of Singapore. Department of Social Medicine and Public Health: The Department is now located in new premises within the National University Hospital. According to the 1985/6 annual report, the Department plays a crucial role in training the country's Designated Factory Doctors as well as in developing computing techniques for health programs and medical teaching programs.

Starting in 1982/83, two regional courses have been offered: (i) 9 month course leading to M.S. in Public Health; and (ii) 9 month course leading to M.S. in Occupational Medicine. These M. Sc. courses attracted students from Bangladesh, Hong Kong, Pakistan, Portugal, Tonga as well as from ASEAN countries. Special Community Medicine Rounds were introduced into the program this year.

Table 1
Number of Trainees by Institution, by Country and By Sex
1981/82 to 1984/5

Institution/ Location	Course		Brunei		Indonesia		Malaysia		Philippines		Singapore		Thailand		Total	
			F	M	F	M	F	M	F	M	F	M	F	M	F	M
UIFM, Jkta.	Dipl. in Appl. Nutn.	6 mos.	-	-	13	4	9	5	10	-	-	-	11	3	43	12
	MSc. in Appl. Nutn.	2 yrs.	-	-	7	3	-	2	-	-	-	-	4	1	11	6
IMR KL, Malaysia	Diploma in Appl. Parasit. & Entom.	6 mos.	-	-	3	3	3	1	7	4	-	-	10	5	23	13
	Dipl. in Med. Microbio.	6 mos.	-	-	4	9	7	2	14	-	-	-	10	4	35	15
" w/ Univ. Sains	MSc. in Appl. Parasit. & Entom.	2 yrs.	-	-	-	-	-	-	-	-	-	-	1		1st grad 1986	
" w/ Univ. Kebangsaan	MSc. in Med. Microbiology	2 yrs.	-	-	-	-	1	-	1	-	-	-	-	-	2	-
Inst. of Publ. Hlth.,UP.,Mla.	M P H	12 mos.	-	-	-	15	6	6	11	1	-	-	9	8	26	30
"	M. of Occ. Hlth	10 mos.	-	-	1	6	-	-	5	3	-	-	2	-	8	9
"	MScPH	2 yrs.	-	-	-	4	-	2	6	-	-	-	4	-	10	6
Dept. of Soc. Med. & Pub. Hlth., NUS	MScPH	9 mos.	-	-	-	2	2	5	-	-	-	-	1	3	3	10
"	MSc Occ. Hlth.	9 mos.	-	-	-	2	-	-	-	1	1	3	-	5	1	11
Fac. of Trop. Med. MU, Bkk.	Dipl. in Trop./ Hygiene	6 mos.	-	-	5	20	-	6	17	5	-	-	3	10	25	41
"	MScTropmed	2 yrs.	-	-	-	6	-	-	7	2	-	-	5	-	12	8
"	MScClinical Trop.	12 mos.	-	-	1	1	-	1	2	2	-	-	1	4	4	8
"	M P H	10 mos.	-	-	2	19	-	-	3	2	-	-	1	10	6	31
TOTALS					36	94	28	30	83	20	1	3	61	53	209	200

Worksheet of Estimated Governments Contributions

- A. Approximate salary TROPMED scholars received from their respective governments while attending ASEAN-TROPMED Courses in the Region.

	<u>Monthly</u>
Indonesia	US\$ 50
Malaysia	US\$ 570
Philippines	US\$ 130
Singapore	US\$ 570
Thailand	US\$ 200

1. Average monthly salary is $\$1520 - 5 = \$304/\text{month}$.
 2. Average number of months/course = 9.57
 3. $9.57 \text{ months} \times \text{US}\$304 = \text{US}\$2900/\text{scholar}$
 4. Estimate number of ASEAN-TROPMED scholars per year = 100
 5. Projected salary paid by member countries per year = \$290,000
or \$1,160,000 over the four year LOP.
- B. TROPMED Central office annual operating funds collected from active member countries is US\$104,000. Approximately 70% of the office's effort is involved with ASEAN-US Scholarship Project with an estimated dollar cost of US\$72,800 each year. Over LOP these combined contributions = US\$291,200.
- C. Total ASEAN government contribution in support of ASEAN Health Scholarships Project is estimated to be US\$1,451,200 or about 33% of combined US-ASEAN contributions.

Table 2
Budget for ASEAN-TROPED Courses
1987/1988 - 1990/1991

Following is a tentative and illustrative distribution of Phase 2 scholarships based on: TROPED planning data and budget for ASEAN-TROPED Courses; assessed demand and institutional capacity budget for ASEAN-TROPED Courses:

	No. of Scholarships	US\$ Value per Scholar per year	US\$ Total
I-01 D.A. Nuti, Jakarta 6-month	16	4,777	76,432
I-02 M.Sc. A. Nuti, Jakarta 2-year	3	7,412	22,236
M-01 D.A.P. & E., Kuala Lumpur 6-month	15	4,477	67,155
M-02 D.MM, Kuala Lumpur 6-month	13	4,477	58,201
M-03 M.Sc. (Para/Entomo/Miers),K.L. 2-year	6	7,322	43,932
P-01 M.P.H. Rural Health, Manila 12-month	15	7,899	118,485
P-02 M.S. Pub. Hlth., Manila 2-year	5	7,706	38,530
P-03 M.O.H., Manila 10-month	5	6,579	32,895
S-01 M.Sc. Pub. Hlth/Occ. Med. /02 4-month - Singapore	12	7,500	90,000
T-01 D.T.M. & H Bangkok 6-month	15	4,575	68,625
T-02 M.Sc. Trop. Med., Bangkok	5	7,415	37,075
T-03 M.P.H. Urban Hlth 10-month	8	6,385	51,080
T-05 M. Clin. Trop. Med, Bangkok 12-month	3	7,755	23,265
Total per year	121 scholarships	US\$727,911 per year	

Total scholars = 121 scholarships x 4 years = 484 scholars

Total scholarship requirement for years = US\$727,911 x 4 = US\$2,911,644

Note: The scholarship value of the courses conducted in Indonesia is cut by 30% and of the courses conducted in the Philippines is cut by 20% due to the devaluation of respective local currencies.

Table 3
Scholarship Cost Breakdown

		Tuition	Book	Lab/Supplies	Thesis	Health Insurance	Allowance	International Travel	Total
Indonesia	I-01 6 mos.	Rp. 1,381,250 (\$ 840)	\$100	\$ 500	Rp.325,000 (\$ 200)	Rp.81,250 (\$ 50)	Rp.3,900,000 (\$ 2,400)	\$ 687	US\$ 4,777
	I-02 2 yrs.	Rp. 2,730,000 (\$1,680)	\$100	\$ 240	Rp.325,000 (\$ 200)	Rp.81,250 (\$ 50)	Rp.7,800,000 (\$ 4,800)	\$ 342	US\$ 7,412*
Malaysia	M-01 6 mos.	M\$ 3,000 (\$1,200)	\$100	\$ 500	M\$ 375 (\$ 150)	M\$ 125 (\$ 50)	M\$ 5,100 (\$ 2,040)	\$ 437	US\$ 4,477
	M-02 6 mos.	M\$ 3,000 (\$1,200)	\$100	\$ 500	M\$ 375 (\$ 150)	M\$ 125 (\$ 50)	M\$ 5,100 (\$ 2,040)	\$ 437	US\$ 4,477
	M-03 2 yrs.	M\$ 5,000 (\$2,000)	\$100	\$ 640	M\$ 500 (\$ 200)	M\$ 125 (\$ 50)	M\$ 10,200 (\$ 4,080)	\$ 252	US\$ 7,322*
Philippines	P-01 12mos.	P 38,400 (\$1,920)	\$100	\$ 240	-	P 1,000 (\$ 50)	P 96,000 (\$ 4,800)	\$ 789	US\$ 7,899
	P-02 2 yrs.	P 38,400 (\$1,920)	\$100	\$ 240	P 4,000 (\$ 450)	P 1,000 (\$ 50)	P 96,000 (\$ 4,800)	\$ 396	US\$ 7,706*
	P-03 10mos.	P 28,800 (\$1,440)	\$100	\$ 200	-	P 1,000 (\$ 50)	P 80,000 (\$ 4,000)	\$ 789	US\$ 6,579
Singapore	S-01 9 mos.	S\$ 3,510 (\$1,800)	\$100	\$ 200	S\$ 390 (\$ 200)	S\$ 195 (\$ 100)	S\$ 8,775 (\$ 4,500)	\$ 600	US\$ 7,500
	S-02 9 mos.	S\$ 3,510 (\$1,800)	\$100	\$ 200	S\$ 390 (\$ 200)	S\$ 195 (\$ 100)	S\$ 8,775 (\$ 4,500)	\$ 600	US\$ 7,500
Thailand	T-01 6 mos.	B 31,200 (\$1,200)	\$100	\$ 500	-	B 1,300 (\$ 50)	B 53,040 (\$ 2,040)	\$ 685	US\$ 4,575
	T-02 2 yrs.	B 52,000 (\$2,000)	\$100	\$ 640	B 5,200 (\$ 200)	B 1,300 (\$ 50)	B 106,080 (\$ 4,080)	\$ 345	US\$ 7,415*
	T-03 10mos.	B 46,800 (\$1,800)	\$100	\$ 200	B 3,900 (\$ 150)	B 1,300 (\$ 50)	B 88,400 (\$ 3,400)	\$ 685	US\$ 6,385
	T-05 1 yr.	B 52,000 (\$2,000)	\$100	\$ 640	B 5,200 (\$ 200)	B 1,300 (\$ 50)	B 106,080 (\$ 4,080)	\$ 685	US\$ 7,755

Rupiah 16.25 = US\$ 1 P 20.00 = US\$ 1
S\$ 1.95 = US\$ 1 B 26.00 = US\$ 1
M\$ 2.50 = US\$ 1

*Multiply each figure across x 2 to get total cost of Masters Scholarship.

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Projection of Expenditure by Fiscal Year
(\$000)

Budget Items	Planned Budget for 1987/8 US\$	Planned Budget for 1988/9 US\$	Planned Budget for 1989/90 US\$	Planned Budget for 1990/91 US\$	Total
A. Scholarship					
Tuition	180,000	180,000	180,000	180,000	720,000
Lab/Supplies	50,000	50,000	50,000	50,000	200,000
Allowance	387,500	387,500	387,500	387,500	1,550,000
Book	12,000	12,000	12,000	12,000	48,000
Health Insurance	6,000	6,000	6,000	6,000	24,000
Thesis	16,000	16,000	16,000	16,000	64,000
Travel	73,500	73,500	73,500	73,500	300,000
Sub-Total	728,000	728,000	728,000	728,000	2,900,000
B. Seminar/Workshops					
		33,500	33,500	33,000	100,000
Grand Total	<u>728,000</u>	<u>761,000</u>	<u>761,000</u>	<u>761,000</u>	<u>3,000,000</u>

List of TROPMED Projected Seminars and Conferences
FY 1985/1986 to FY 1989/1990

July 1985 - June 1986	28th Seminar	- Seminar on Infectious and Parasitic Diseases of the Hepato-Biliary System in Asian Region.
	Technical Meeting	- Advanced Knowledge in DHF in Southeast Asia.
July 1986 - June 1987	29th Seminar	- Seminar on Social and Economic Research in Tropical Diseases in Southeast Asia.
	Technical Meeting	- Vaccines for Tropical Diseases of Public Health Importance in Southeast Asia (Cholera, DHF, Jap. encephalitis, malaria, etc.
July 1987 - June 1988	30th Seminar	- Seminar on Tropical Diseases Occurring in connection with Construction of Dams.
	Technical Meeting	- <u>Anopheles</u> Population Genetics as Malaria Vectors in Southeast Asia.
July 1988 - June 1989	31st Seminar	- Seminar on Malnutrition and Nutritional Diseases in Rural and Urban Communities in Southeast Asia.
	Technical Meeting	- Japanese encephalitis causing Public Health Problems in Southeast Asia.
July 1989 - June 1990	32nd Seminar	- Seminar on Primary Health Care Practice for Better Standard of Living of Rural Communities and Urban Poor Sectors in Southeast Asia.
	Technical Meeting	- Advanced knowledge in Malaria in Southeast Asia.

DETAIL OF AIT COMPONENT

This Annex contains back-up and supporting materials for the AIT Component. Annexes include:

F-1 Training Activity Detail

- a. Programs of the AIT
- b. Summary of ASEAN-US Scholarship Holders - Phase I
- c. Distribution of Master's Degree Graduates and Students with ASEAN-US Scholarships - Phase I
- d. Distribution of Participants to ST Training Programs - Phase I
- e. Criteria of Short-term Special Design Training

F-2 Cost Estimates Detail

- a. Cost Breakdown of ASEAN-US Scholarship
- b. Annual In-Kind Contributions
- c. Comparison Master's Scholarship Cost to Short-term Training Cost
- d. Projected Expenditures by Fiscal Year

F-3 Technical Analysis Detail

- a. Overall Student Enrollment by Nationality
- b. Enrollment by Gender by Division - Phase I and Distribution of ASEAN-US Scholarship Holders - Phase I
- c. Number of Faculty Members by Nationality
- d. Listing of 1987-88 CEC Offerings

F-4 Administrative Analysis Detail

- a. Donor Contributions and AIT Financial Data
- b. AIT'S Linkages with National Institutions
- c. Proposal for Establishment of a Graduate Business School (Bulk File)

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PROGRAMS OF THE ASIAN
INSTITUTE OF TECHNOLOGY

ACADEMIC PROGRAMS. 9 academic divisions offer Doctoral, Master's and Diploma programs as follows:

1) Agricultural and Food Engineering: Training in agricultural soil and water engineering, farm machinery and management, post-harvest technology, aquaculture and integrated agricultural systems aims at the development/dissemination of technology to increase food production, and improve food processing and preservation; 2) Computer Science: The program concentrates on user-oriented education and applications for Asia. For example, software and information systems have been developed for water resources analysis, farm mechanization, meteorological message switching, the study of nutrition against socio-economic background and other applications; 3) Energy Technology: Courses and research concentrate on applied engineering techniques to exploit renewable energy resources, and on energy planning and economics to develop effective energy strategies and policies. The 3 areas of specialization are solar energy, bio-mass energy and energy planning/economics; 4) Environmental Engineering: The program specializes in water supply and waste-water engineering and environmental technology and management. Students follow initially common courses in environmental unit operations, environmental quality management, environmental chemistry and laboratory, and others; 5) Geotechnical and Transportation Engineering: In geotechnical engineering, the two fields of study are soil engineering, and exploration and engineering geology. In transportation engineering and transportation, the two areas of specialization are transportation engineering and systems. The consolidation of geotechnical and transportation activities prevents overlapping of related fields; 6) Human Settlements Development: Designed to provide especially educated manpower in human settlements planning, development, management and education, the program specializes in two fields of study -- urban planning, land and housing development; and rural and rural-regional development planning; 7) Industrial Engineering and Management: Multi-disciplinary instruction is provided in the fields of operations research, statistics, economics and system dynamics. The emphasis is on developing analytical skills and technical competence to prepare students for management and decision support positions in industry and in the public sector; 8) Structural Engineering and Construction: By emphasizing the latest technologies in the fields of structural analysis, construction materials, design of structural elements and systems, methods of construction, and project management, the program provides advanced knowledge of structural engineering and construction; 9) Water Resources Engineering: The program emphasizes hydraulic and coastal engineering, irrigation and drainage engineering, and water resources development. Core courses include engineering fluid mechanics, flow in open channels, applied tropical hydrology and ordinary differential equations.

RESEARCH PROGRAMS

Energy Research Park: An original feature of the Energy Technology Division, the park is an open field laboratory, which allows students to operate equipment using new and renewable sources of energy, and to conduct applied energy research activities. The park is a unique demonstration facility which shows a wide range of devices in operation, especially those related to solar, bio-mass and wind energy. Research activities include the measurement and characterization of the performance of flat plate and concentrating solar collectors and photovoltaic devices. Applications of solar energy to drying and refrigeration and the preparation and combustion of bio-mass fuels are studied.

Library and Regional Documentation Center: The library has approximately 170,000 volumes of books, bound journals, technical reports, theses, conference proceedings, etc., mainly on engineering subjects, of which about 60,000 books acquired after 1971 are in BOOKCAT, an online computerized data based. The library currently subscribes to 1,000 serial titles from Europe, North America, Asia and Australia. There are four specialized information centers, as follows: Asia Information Center for Geotechnical Engineering (AGE!); International Ferrocement Information Center (IFIC); Renewable Energy Resources Information Center (RERIC); and Environmental Sanitation Information Center (ENSIC)

These have sizable individual computerized databases which provide an enquiry service as well as publications to some 1,500 subscribers from 256 countries.

The LRDC's databases may now be accessed online by interested customers in Thailand. Being a member of the International Database Access and Remote Computing Service (IDAR) of Thailand, LRDC has access, through TYMNET and TELENET, to international computerized databases, such as DIALOG and ESA. Such access facilitates research projects at the Institute and enables AIT's participation in world wide teleconferencing.

Regional Experimental Center: The center provides 10,500 sq.m. of covered space for laboratory and pilot projects, which range from scale model investigations of water structures to wastewater treatment studies and the utilization of agricultural residues for fish culture.

Regional Computer Center: Latest facilities at RCC include a new IBM mainframe computer - the 3083 processor complex with a 16-megabyte main memory - and other new generation IBM ancillary equipment, including 3380 disc storage units, six 5080 color graphics workstations and the 6670 information distributor (laser printer).

There are also two Norsk Data super mini-computers - the ND 530/CX and ND 570/CX - together with several data base packages, fourth generation languages and a new CHILL compiler.

These new advanced computers which are installed in the Division of Computer Science, along with the 3083 and 3031 IBM mainframes at RCC and over 100 personal computers distributed on campus, represent the full range of computer power currently available at AIT for education and research.

Regional Research and Development Center: To promote project research, RRDC undertakes fund raising and the marketing of the research potential of the Institute. RRDC focusses on identifying and soliciting research projects in region for placement in the Institute's academic divisions and centers.

SPECIAL PROGRAMS: Special short-term programs leading to the award of certificates are provided mostly as mid-career training for engineers and other professionals from both the government and private sectors. These programs are undertaken by the following centers.

Asian Disaster Preparedness Center: ADPC has been established to assist Asian countries in strengthening their disaster management systems. It offers short courses/workshops, conducts action-oriented studies and offers services in support of national programs. ADPC also undertakes planning services, technical programs and consultancies.

Asian Regional Remote Sensing Training Center: ARRSTC's intensive short course of about four months concentrates on the study, mapping, and inventorying of natural resources using remotely sensed data. Extended programs are expected to be established later. Visual and digital analysis equipment and laboratory facilities are located at RCC. These include micro-computer image processing systems used with the IBM 3083 mainframe. A complete photographic laboratory which will complement the digital analysis facilities is anticipated.

Continuing Education Center: CEC programs are in the form of short courses, seminars, workshops and conferences, dealing with topics that reflect the development priorities of Asia. These include agricultural and water resources management, rural development, management training and energy technology, to name a few.

CEC activities range from contracted, tailor-made training programs to advertised international workshops and seminars.

Library and Regional Documentation Center: On request, LRDC organizes study tours, specialized training workshops and in-service training. Annually during the summer it conducts a three-month training course, covering basic principles of manual and computer applications in libraries and new techniques in information handling. Training is provided by the International Ferrocement Information Center (IFIC) on the design and fabrication of ferrocement structures.

Regional Computer Center: RCC's Programs in Computer Applications Development (PCAD) provides practical instruction in the use of the computer as part of the problem-solving process in government, education, science, technology, industry and management.

Eight PCAD programs are offered by the center, the duration of each varying from several weeks to a few months.

SUMMARY OF ASEAN-US SCHOLARSHIP HOLDERS FROM JANUARY 1980 - SEPTEMBER 1986

	BRUNEI	INDONESIA	MALAYSIA	PHILIPPINES	SINGAPORE	THAILAND	TOTAL
NUMBER OF CURRENT STUDENTS-September 1986							
September 1986 Intake			10				10
May 1986 Intake	2						2
January 1986 Intake	1			3			4
September 1985 Intake	1						1
May 1985 Intake				3			3
On Extension						1	1
Sub-Total	0	4	10	6	0	1	21
NUMBER OF AWARDEES COMPLETING PROGRAM-August 1986							
Master's Degree	31	5	36		6	59	137
Diploma Program	4	2					6
PCAD/ARRSTC/Certificate	4	14			51	5	74
Special Courses		44			1		45
Sub-Total	0	39	55	36	58	64	262
NUMBER OF AWARDEES DISMISSED/WITHDRAWING							
Left in September 1985	2						2
Left in April 1985	1						1
Left in December 1982				1			1
Left in February 1982			1				1
Left in August 1981	1			1	1		3
Left in April 1981	1						1
Left in December 1980	1			2			3
Left in August 1980	1	1		1			3
Left in April 1980				1			1
Sub-Total	0	7	2	6	1	0	16
GRAND TOTAL	0	50	77	48	59	65	299

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Table 2
Distribution of Master's Degree Graduates and Students
with US-ASEAN Scholarships

(By Field of Study and By Country)

DIVISION	INDONESIA	MALAYSIA	PHILIPPINES	SINGAPORE	THAILAND	TOTAL
Agricultural & Fod Eng.	11		8		18	37
Computer Science	1		5	4	4	14
Energy Technology	3		2		7	12
Environmental Eng.	4	1	5		6	16
Geotech. & Transportation Eng.	6	5	3	1	6	21
Human Settlements Development	2	1	9		8	20
Industrial Eng. & Management	2		2		1	5
Structural Eng. & Construction			2		2	4
Water Resources Eng.	6	3	6	1	8	24
T O T A L	35	10	42	6	60	153

Table 3
Distribution of Participants
to Short-Term Training Programs

(By Program and By Country)

PROGRAM	INDONESIA	MALAYSIA	PHILIPPINES	SINGAPORE	THAILAND	TOTAL
REGULAR PROGRAMS =====						
PCAD	3	13+5		52	5	77
Remote Sensing	1					1
SPECIAL COURSES =====						
Geotech. & Transportation Eng.				1		1
On Farm Water Management		12+2				14
Ferrocement		22				22
Design of Small Scale Irrigation Systems		10				10
Project Management		8				8
T O T A L	4	64	0	52	5	125

Criteria of Short-term Special Design Training

Up to \$440,000 is initially allocated to AIT for priority short-term training proposals that arise during the implementation period (beyond the three proposals -- concerning computerized tax administration, combatting oil spills, hazardous material management -- from the 6th and 7th Dialogues). Following are illustrative criteria expected to be used in screening and establishing the eligibility of training proposals.

1) Proposal is endorsed by an ASEAN Technical Committee and presented to US through official ASEAN-US Dialogue meetings or more informal ASEAN-US liaison meetings.

2) Sectors of concentration are agriculture, natural resources and the environment, energy, health and nutrition, small/medium scale business and such other special developmental areas (e.g. critical issues in public administration) as may be agreed.

3) Training benefits ASEAN region and supports national development priorities in sectors of concentration.

4) Recipients come from no fewer than 3 ASEAN nations and represent institutions within a regional network working on common-theme development problems in sectors of concentration.

5) Training is short-term (30 days or less), costs less than \$50,000, is open to private sector participants with equal opportunity for women.

Again, AIT's Continuing Education Center (CEC) is expected to help plan, organize and host the bulk of this short-term, special design training. See Sub-Annex F-3-d for a listing of CEC offerings in 1987-88. Such offerings are representative of the types of short-term training activity envisaged.

Table 4
Average Value of a US-ASEAN Scholarship

	<u>1987-1989</u>	<u>1989-1990</u>
	(current value)	(with anticipated increase)
	<u>US\$</u>	<u>US\$</u>
A. SCHOLARSHIP		
Tuition and Fees* (\$2,700 per term x 5 terms)	13,500	13,500
Bursary (\$135 per month x 20 months) (\$150 per month x 20 months)	2,700	3,000
Accommodations (\$ 40 per month x 20 months)	800	800
Book Grant	400	450
Travel	600	600
	-----	-----
T o t a l	18,000	18,350
B. RESEARCH		
	2,500	2,500
	-----	-----
GRAND TOTAL	20,500	20,850

*Tuition and Fees are fixed by the Board of Trustees and reviewed and revised periodically -- normally every three to four years.

Table 5

Estimated Annual In-Kind Contributions

1. Member country contributions are \$720,000 and include salaries at an estimated \$5,000 for each Master's equivalent (based on RTG salary of \$250 per month for a middle-management official).		
a.	\$250 per month x 20 months	= \$ 5,000
b.	Six scholarships per country per year	= <u> x 6</u>
	Total country contribution per study period	= \$30,000
c.	Six countries x four years x \$30,000	= \$720,000
2. <u>RTG Tax Reimbursement</u>		
a.	Figuring US-ASEAN students as representing 15 per cent of total enrollment and the RTG annual tax reimbursement at \$670,000, this "In-Kind" contribution = \$100,000 (\$670,000 x .15)	
b.	Four Years x \$100,000	= 400,000
3. <u>Land Rental</u>		
a.	Based on current rental rates for nearby land = US\$52,800 x .15	= 7,900
b.	Four Years x \$7,900	= <u>39,600</u>
	Total	<u>\$1,159,600</u>

*Item 1 applies to all ASEAN countries; Items 2 and 3 to Thailand only.

Illustrative Scholarship Mix for AIT
Masters and Short-Term Training

	<u>Masters (2 years)</u> <u>with Research Grant</u> <u>\$20,500/Scholar</u>	<u>Masters (2 years)</u> <u>Without Research Grant</u> <u>\$18,000/Scholar</u>	<u>PCAD</u> <u>(1 term)</u> <u>\$4,500/Scholar</u>	<u>CEC</u> <u>(3 to 6 weeks)</u> <u>\$3,000/Scholar</u>
<u>Option A</u>				
Number	55	15	250	120
Cost (\$000)	1,130	270	1,125	360
<u>Option B</u>				
Number	30	85	100	100
Cost (\$000)	615	1,535	450	300
<u>Option C</u>				
Number	15	60	250	130
Cost (\$000)	308	1,080	1,125	390
<u>Option D</u>				
Number	0	75	200	220
Cost (\$000)	-	1,350	900	660

Summary Table

	<u>OPTION</u> <u>A</u>	<u>OPTION</u> <u>B</u>	<u>OPTION</u> <u>C</u>	<u>OPTION</u> <u>D</u>
TOTAL BENEFICIARIES:				
NO. MASTERS	70	115	75	75
NO. SHORT-TERM	370	200	380	420
TOTAL COST (\$000)				
MASTERS	1,400	2,150	1,390	1,350
SHORT-TERM	1,485	750	1,515	1,560
RESEARCH SUB-COMPONENT	137.5	75	37.5	-

AIT Component
Projection of Expenditures by Fiscal Year¹/
(\$000)

<u>Budget Items</u>	Year 1 FY 1987/1988		Year 2 FY 1988/1989		Year 3 FY 1989/1990		Year 4		Total	
	<u>AID</u>	<u>ASEAN</u>	<u>AID</u>	<u>ASEAN</u>	<u>AID</u>	<u>ASEAN</u>	<u>AID</u>	<u>ASEAN</u>	<u>AID</u>	<u>ASEAN</u>
1. Scholarships	650		650		650		650		2,600	
2. Research	90		90		90		90		360	
3. Special Courses	110		110		110		110		440	
4. Student Salaries		180		180		180		180		720
5. Land Rental		7.5		7.5		7.5		7.5		30
6. Tax Waivers		<u>100</u>		<u>100</u>		<u>100</u>		<u>100</u>		<u>400</u>
Total	<u>850</u>	<u>287.5</u>	<u>850</u>	<u>287.5</u>	<u>850</u>	<u>287.5</u>	<u>859</u>	<u>287.5</u>	<u>3,400</u>	<u>1,150</u>

The above expenditure schedule is based on 36 Master's Degrees, or their equivalent in certificate or short courses, per year for each project year. Since this is a follow-on Phase II activity, there is no start up time involved and AIT will be able to use as much funding in FY 87 as in previous years. The increase in FY 90 is based on anticipated cost increases in allowances and books.

Table 7
OVERALL STUDENT ENROLLMENT BY NATIONALITY
 (As of September 1986)

<u>NATIONALITY</u>	<u>TOTAL</u>
Bangladesh	32
Burma	11
Brunei	2
Republic of China (Taiwan)	64
Ethiopia	1
Fed. Rep. of Germany	1
Honduras	1
Hongkong	12
India	37
Indonesia	17
Iran	1
Japan	3
Korea	9
Malaysia	46
Nepal	44
Philippines	70
Pakistan	51
Peoples Republic of China	39
Singapore	3
Sri Lanka	49
Thailand	136
United States of America	1
Vietnam	11
	<u>646</u>

Table 8
Enrollment by Gender By Division
(As of September 1986 Term)

DIVISION	Master's		Doctoral		Diploma	
	Male	Female	Male	Female	Male	Female
Agricultural & Food Eng.	46	6	4			
Computer Science	23	11	1	1		
Energy Technology	33	7	4	1		
Environmental Eng.	57	13	5	2		
Geotech. & Trans. Eng.	80	4	6			
Human Settlements Devt.	50	26			1	
Industrial Eng. & Mgt.	49	6	1			
Structural Eng. & Const.	67	3	3			
Water Resources Eng.	60	3	4			
T O T A L	465	79	28	4	1	0

Table 9
Distribution of US-ASEAN Scholarship Holders
(By Division and Sex)

DIVISION	Master's		Diploma		Training	
	Male	Female	Male	Female	Male	Female
Agricultural & Food Eng.	30	7	2	1		
Computer Science	8	6	1			
Energy Technology	8	4				
Environmental Eng.	10	6				
Geotech. & Trans. Eng.	21				1	
Human Settlements Devt.	12	8				
Industrial Eng. & Mgt.	3	2				
Structural Eng. & Const.	4					
Water Resources Eng.	24					
P C A D					60	17
Remote Sensing					1	
Design of Small Scale Irrigation System					10	
Ferrocement					22	
On Farm Water Management					12	
T O T A L	120	33	3	1	106	17

Table 10
Number of Faculty Members by Nationality

(As of September 1986)

NATIONALITY	Direct Hire		Seconded		TOTAL
	Full Time	Visiting	Full Time	Visiting	
1. American	1	2			3
2. Australian			4		4
3. Belgian			3	1	4
4. British	3		5	1	9
5. Canadian	2	1			3
6. Chinese (ROC)		1	1	1	3
7. Danish			3		3
8. Dutch				1	1
9. Filipino	3				3
10. French			3	1	4
11. German			5		5
12. Indian	8	3		5	16
13. Italian			1		1
14. Japanese			8		8
15. Korean				1	1
16. Malaysian	1				1
17. New Zealand	1				1
18. Norwegian				2	2
19. Pakistani	1				1
20. Sri Lanka	4			1	5
21. Swiss			2		2
22. Thai	17	1			18
23. Vietnamese	1	2			3
T o t a l	42	10	35	14	101

RETENTION RATE OF FACULTY

The seconded faculty usually stays from 2 to 10 years depending on the policy of the seconding government e.g., Japan pulls out its faculty every two years while Germany allows its faculty to stay longer, one has been at AIT for 10 years. The direct hire faculty members are considered permanent though they are employed on a contractual basis. The usual length of contract of professors is four years while that of assistant professor is two years.

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ASIAN INSTITUTE OF TECHNOLOGY
Continuing Education Center

Program of Training Courses 1987 - 88

CODE	TITLE	DATE	FEE*
	AGRICULTURE AND WATER RESOURCES PROGRAM		
AWR 01	Planning & Design of Small Scale Irrigation Systems	8 June - 31 July 87	\$3000
AWR 02	On-Farm Water Management	7 Sep - 17 Oct 87	\$2250
AWR 03	Microcomputer Applications in Water Management	26 Oct - 19 Dec 87	\$3000
AWR 04	Management of Rainfed Agriculture	2 Mar - 4 Apr 87	\$2000
AWR 05	Groundwater Modelling	6 Apr - 2 May 87	\$1600
AWR 06	Groundwater Resource Evaluation and Management	1 Mar - 10 Apr 87	\$2250
AWR 07	Management of Problem Soils in Agriculture	12 Jan - 7 Mar 88	\$3000
AWR 08	Integrated Farm System Management	3 May - 12 Jun 88	\$2250
AWR 09	Low-Cost Aquaculture Development	5 Jul - 14 Aug 88	\$2250
AWR 10	Rehabilitation of Large Scale Irrigation Systems	27 Sep - 18 Dec 88	\$4500
AWR 101	Module I : Planning & Design	27 Sep - 23 Oct 88	\$1600
AWR 102	Module II : Water Management	25 Oct - 20 Nov 88	\$1600
AWR 103	Module III: Monitoring & Evaluation	22 Nov - 18 Dec 88	\$1600

* Fee includes tuition fee, cost of training materials and transportation cost for scheduled study trips.

CODE	TITLE	DATE	FEE*
	ENVIRONMENTAL MANAGEMENT AND TECHNOLOGY PROGRAM		
EMT 01	Environmental Impact Assessment and Review	2 - 28 February 87	\$1600
EMT 02	Natural Resources Planning and Management	6 Jul - 19 Sep 87	\$4000
EMT 021	Module I : Socio-Economic- Environmental Development Planning	6 - 25 July 87	\$1200
EMT 022	Module II : Regional Planning for Land and Water Resources Development	27 Jul - 29 Aug 87	\$2000
EMT 023	Module III: Management of Per- turbed Ecosystems	31 Aug - 19 Sep 87	\$1200
EMT 03	Environmental Monitoring and Information Systems	2 - 28 November 87	\$1600
EMT 031	Module I : Environmental Monitor- ing & Information Systems	18 - 30 January 88	\$800
EMT 032	Module II : Air Pollution Control	1 - 20 February 88	\$1200
EMT 033	Module III: Water Pollution Control	22 Feb - 13 Mar 88	\$1200
EMT 034	Module IV : Solid Waste Management	15 Mar - 3 Apr 88	\$1200
EMT 04	Comprehensive Environmental Management for Asian Metropolitan Cities	18 Jan - 3 Apr 88	\$4000
EMT 05	Toxic and Hazardous Wastes Management	5 - 24 July 88	\$1500

* Fee includes tuition fee, cost of training materials and transportation cost for scheduled study trips.

CODE	TITLE	DATE	FEE*
	MANAGEMENT AND INDUSTRY PROGRAM		
MI 01	Project Management	7 Sep - 17 Oct 87	\$2400
MI 02	Industrial Project Feasibility	31 Aug - 25 Sep 87	\$1600
MI 03	Information Systems Analysis and Design	6 - 25 July 87	\$1200
MI 04	Productivity Improvement for Industries	21 Sep - 9 Oct 87	\$1200
MI 05	Total Quality Control for Industries	23 Nov - 4 Dec 87	\$ 800
MI 06	Maintenance Management for Industries	5 - 16 October 87	\$ 800
MI 07	Energy Conservation in Industry	26 Jan - 7 Feb 87	\$ 800
MI 08	Entrepreneurial Development for Small Scale Industries	12 Oct - 7 Nov 87	\$1600
MI 09	Project Monitoring & Evaluation	18 Jan - 13 Feb 88	\$1800
MI 10	Small Business Management	22 Feb - 11 Mar 88	\$1200

* Fee includes tuition fee, cost of training materials and transportation cost for scheduled study trips.

CODE	TITLE	DATE	FEE*
	RURAL DEVELOPMENT PROGRAM		
RD 01	Managing Rural Development	16 Nov - 19 Dec 87	\$2000
RD 02	Computer-Assisted Regional Planning	1 Jun - 4 Jul 87	\$2000
RD 03	Rural Physical Infrastructure Development	3 Aug - 17 Oct 87	\$4000
RD 031	Module I : Planning and Management	3 - 15 August 87	\$ 800
RD 032	Module II : Water Supply and Sanitation	17 Aug - 5 Sept 87	\$1200
RD 033	Module III: Road Construction and Maintenance	7 - 26 September 87	\$1200
RD 034	Module IV : Rural Energy Technologies	28 Sep - 17 Oct 87	\$1200
RD 04	Agribusiness Development and Extension (For Extension Officers)	12 Jan - 21 Mar 87	\$4000

* Fee includes tuition fee, cost of training materials and transportation cost for scheduled study trips.

CODE	TITLE	DATE	FEE
	EDUCATIONAL DEVELOPMENT PROGRAM		
ED 01	Second Asian School in Computer Science: "Advances in Algorithm Design and Program Development"	7 - 18 December 87	\$800
ED 02	Computer Applications in Research and Development for Developing Countries	20 Apr - 1 May 87	\$800
ED 03	Management of Training Centers	2 Mar - 11 Apr 87	\$2250
ED 04	Academic Institutional Planning and Management	2 - 28 August 87	\$1800

* Fee includes tuition fee, cost of training materials and transportation cost for scheduled study trips.

APPLICATION AND INQUIRIES CAN BE DIRECTED TO:

Director
Continuing Education Center
ASIAN INSTITUTE OF TECHNOLOGY
G.P.O. Box 2754 Bangkok, Thailand
Cable : AIT BANGKOK
Telex : 84276 AIT TH
Tel. : (02) 5290100 - 13
Ext. 2136

DONORS TO AIT
1984 - 1985

GOVERNMENTS	21
INTERNATIONAL ORGANIZATIONS	10
NATIONAL GOVERNMENT AGENCIES	21
FOUNDATIONS	7
BUSINESS FIRMS	19

	78

SUMMARY OF DONATIONS RECEIVED
IN
CASH AND KIND
FY 1984-85

CONTRIBUTION CASH & KIND
(%)

GOVERNMENTS:

AUSTRALIA	4.58
BELGIUM	0.39
CANADA	4.40
CHINA, REPUBLIC OF	2.57
DENMARK	1.47
FRANCE	5.74
GERMANY, FEDERAL REPUBLIC OF	8.38
INDIA	0.34
INDONESIA	1.07
ITALY	0.14
JAPAN	7.74
KOREA, REPUBLIC OF	0.62
NETHERLANDS	2.87
NEW ZEALAND	0.33
NORWAY	1.18
PHILIPPINES	0.13
SRI LANKA	0.03
SWITZERLAND	0.70
THAILAND	10.98
UNITED KINGDOM	1.04
UNITED STATES OF AMERICA	<u>10.67</u>
SUB-TOTAL	65.37

CONTRIBUTION CASH & KIND
(%)

INTERNATIONAL ORGANIZATIONS:

ASIAN DEVELOPMENT BANK	0.28
COMMISSION OF EUROPEAN COMMUNITIES	3.36
ECONOMIC & SOCIAL COMMISSION FOR ASIA & THE PACIFIC	1.04
MEKONG SECRETARIAT	0.02
INTERNATIONAL CENTER FOR THEORETICAL PHYSICS	0.01
UNITED NATIONS DEVELOPMENT PROGRAM	0.26
UNITED NATIONS EDUCATIONAL SCIENTIFIC & CULTURAL ORGANIZATION	0.11
WORLD HEALTH ORGANIZATION	0.18
WORLD METEOROLOGICAL ORGANIZATION	0.68
WORLD BANK	<u>0.14</u>
SUB-TOTAL	6.08

CONTRIBUTION CASH & KIND
(%)

NATIONAL GOVERNMENT AGENCIES:

BANGLADESH AGRIL. RES. COUNCIL - BANGLADESH	0.07
INTERNATIONAL DEVELOPMENT RES. CENTER - CANADA	0.99
PETRA CHRISTIAN UNIVERSITY - INDONESIA	0.10
UNIVERSITY OF NORTH SUMATRA - INDONESIA	0.16
INST. TEKNOLOGI, MARA - MALAYSIA	0.01
BANGKOK METROPOLITAN ADMINISTRATION - THAILAND	0.06
BANK OF AGRIL. & COOPERATIVE - THAILAND	0.02
BANK OF THAILAND - THAILAND	0.01
DEPARTMENT OF MINERAL RESOURCES - THAILAND	0.73
DEPT. OF TECHNICAL & ECONOMIC COOPERATION - THAILAND	0.15
FINE ARTS DEPARTMENT - THAILAND	0.02
NATIONAL ECONOMIC & SOCIAL DEVELOPMENT BOARD - THAILAND	1.80
NATIONAL ENERGY ADMINISTRATION - THAILAND	0.04
MINISTRY OF EDUCATION - THAILAND	0.05
PRIME MINISTER'S OFFICE - THAILAND	0.01
ROYAL IRRIGATION DEPARTMENT - THAILAND	0.28
ROYAL THAI AIRFORCE - THAILAND	0.06
SUPREME COMMAND HEADQUARTERS - THAILAND	0.01
THE ELECTRICITY GENERATING AUTHORITY OF THAILAND	0.20
UNIVERSITY OF STIRLING - UNITED KINGDOM	<u>0.05</u>
SUB-TOTAL	5.60

CONTRIBUTION CASH & KIND
(%)

BUSINESS, FOUNDATIONS, PRIVATE & OTHERS:

KOCKS CONSULT GMBH - GERMANY FED. REP.	0.01
MARDEN FAMILY - HONG KONG	0.11
KAWASAKI STEEL CORP. - JAPAN	0.02
JAPAN SOCIETY OF CIVIL ENGINEERS - JAPAN	0.08
NEPAL RASTRA BANK - NEPAL	0.03
NORSK DATA CO. - NORWAY	0.62
BES ENGINEERING CORP. - R.O.C.	0.10
CHINA TECHNICAL CONSULTANTS, INC. - R.O.C.	0.09
TAIWAN POWER COMPANY - R.O.C.	0.20
MOTOR COLUMBUS CONSULTANT ENGINEERING - SWITZERLAND	0.02
A.R. GROUP CONSULT. CO., LTD. - THAILAND	0.19
FOREMOST DAIRIES CO. (BANGKOK) - THAILAND	0.01
ITAL-THAI INTERNATIONAL HOTEL CO., LTD. - THAILAND	0.02
POLYTECHNOLOGY CO., LTD. - THAILAND	0.01
REGIONAL ENGINEERING CONSULTANTS CO., LTD - THAILAND	0.01
SIAM CEMENT CO., LTD. - THAILAND	0.13
SIAM CITY CEMENT CO., LTD. - THAILAND	0.01
TEAM CONSULTING ENGINEER CO. - THAILAND	0.06
SHELL INTERNATIONAL PETROLEUM CORP. - U.K.	0.29
ACADEMIC FOR EDUC. DEVELOPMENT, INC. - U.S.A.	0.14
KEIDANREN - JAPAN	0.42
LEE FOUNDATION - SINGAPORE	0.27
ROCKEFELLER FOUNDATION - U.S.A.	0.09
AGRICULTURAL DEVELOPMENT COUNCIL - U.S.A.	0.10
AIT FOUNDATION INC./IBM-AFE - U.S.A.	19.68
AIT UK APPEAL FUND/SHELL INT. PETROLEUM - U.K.	<u>0.24</u>
SUB-TOTAL	22.95
T O T A L	100.00%

TOTAL CONTRIBUTION
CASH AND KIND
1984 - 1985

	<u>CASH</u>	<u>IN-KIND</u>	<u>TOTAL</u>
SCHOLARSHIPS	124,548,000	--	124,548,000
RESEARCH PROJECTS	47,375,000	--	47,375,000
CONTINUING EDU. PROGRAMS	22,629,000	--	22,629,000
CAPITAL COST & BUILDING	11,254,000	--	11,254,000
EQUIPMENT & BOOKS	17,149,000	95,683,000	112,832,000
ENDOWMENTS	3,279,000	--	3,279,000
OPERATIONAL COSTS	15,208,000	--	15,208,000
FACULTY AND STAFF SUPPORT	7,147,000	32,839,000	39,986,000
LOCAL FUNDS AND OTHERS	31,513,000	--	31,513,000
	-----	-----	-----
BATH	280,102,000	128,522,000	408,624,000
EQUIVALENT TO	US\$ 10,490,711	US\$ 4,813,558	US\$ 15,304,269

AIT's LINKAGES WITH NATIONAL INSTITUTIONS

The relationships of AIT with institutions in the region fall under two general categories: (a) formal agreement with academic organizations and b) membership in subject-specific networks. Examples of the first are its formal agreement with the Beijing Agricultural Engineering University (BAEU) in the People's Republic of China, Korea Advance Institute of Science and Technology (KAIST) in Korea, and the Southeast Asia Regional Center for Graduate Study and Research in Agriculture (SEARCA) in the Philippines.

1. Beijing Agricultural Engineering University

This agreement states that the students with Bachelor's degree from BAU can apply for admission at AIT and compete for the scholarships that are available. "Internal scholarships are awarded on rank order of academic merit with the expectation that a reasonable number will be awarded to applicants from PRC." It will also make possible the enrollment of BAEU faculty in the AIT's external doctoral, the master's and the doctoral programs and their participation in intensive short courses. The two institutions will also develop a plan for academic exchanges in teaching and research.

2. Korea Advanced Institute of Science and Technology

AIT and KAIST agree to give temporary appoints to staff of both organizations in their respective institutions, to conduct mutually agreed-upon short-term project, technical training and joint study and research activities, and to exchange technical information

3. Southeast Asia Regional Center for Graduate Study and Research in Agriculture

This encourages collaboration between the two institutions in the following areas, among others: agribusiness, viability testing, water resources management, post-production systems, rural development planning, farming systems, information systems and institutional development and technical cooperation. The collaboration will be in the form of inter-consultation in the development and implementation of specific programs and projects, mobilization of expertise, handling of scientific information, and provision of opportunities for the staff of both organizations to participate in scholarships, workshops and conferences related to the concerns of both parties.

AIT has taken lead role in the establishment of networks in the following areas: ferrocement, rural and regional development planning, and farming systems. The last two are being done in collaboration with the Institute of Social Studies of the Netherlands and the Food and Agriculture Organization (FAO).

1. Ferrocement Information Network

This was established to have a more systematic strategy of distribution of ferrocement information in the regional levels in the different countries of Asia and Africa. The members are institutions from developing countries which have a civil engineering or architecture program or have undertaken extension work for rural areas using ferrocement and have a faculty member active on ferrocement research and development. Some member institutions are the following: University of the Philippines, University of Roorkee in India, the National University of Singapore, Institut Teknologi Bandung, Indonesia, and Universiti Pertanian Malaysia.

2. The Rural and Regional Development Network

This network aims to link and strengthen various Asian centres working in the fields of rural and regional development planning. The centres/institutions engaged in research, training and advisory work in various fields of rural and regional development planning and a number of international organizations: e.g. FAO, ESCAP, ILO, UNDP etc. are members.

3. The Farming Systems Development in Asia

The network brings together the farming systems development groups/institutions working towards the development of integrated farming systems in the rainfed areas of Asia. The current members which serve as lead centres in their country are the following: Khon Kaen University of Thailand, Department of Animal Production and Health of Sri Lanka, Philippine Council for Agriculture and Resources Research and Development (PCAARD), Zhejiang Agricultural University of the People's Republic of China and an institution, not yet designated, in Indonesia. Other members are as follows: Farming Research Institute of Thailand; Post-graduate Institute of Agriculture, University of Peradeniya of Sri Lanka; Farming Systems and Soil Research Institute of the University of the Philippines, and Bureau of Rural Energy and Environmental Protection of China.

PROJECT DESIGN SUMMARY
LOGICAL FRAME WORK

Annex G

Project Title & Number: Human Resources Development Project 398-0287

NARRATIVE SUMMARY	OBJECTIVE VERIFIABLE INDICATORS	MEANS OF VERIFICATION	IMPORTANT ASSUMPTIONS																																																
<p>Program or Sector Goal: The broader objective which this project contributes: (A-1)</p> <p>To accelerate the transfer, adaptation and development of technology in selected areas to contribute to regional economic productivity.</p>	<p>Measures of Goal Achievement: (A-2)</p> <p>ASEAN member countries' increased use of improved technology in plant quarantine, agricultural planning, health and other priority areas to increase economic development.</p>	<p>(A-3)</p> <p>Follow-up on trained participants Follow-up with ASEAN member countries on adoption/transfer of specific technology National Statistics National policies, standards, procedures (e.g., plant quarantine areas)</p>	<p>Assumptions for achieving goal targets: (A-4)</p> <p>ASEAN member countries policies continue to support regional cooperation and adoption/development of appropriate technology.</p>																																																
<p>Project Purpose: (B-1)</p> <p>To increase the human resources capacity in the ASEAN Region in Plant Quarantine, Agricultural Engineering, and other priority development areas. To strengthen ASEAN regional institutional capacity, particularly for plant quarantine and agricultural planning HRD activities</p>	<p>Conditions that will indicate purpose has been achieved: End-of-Project status. (B-2)</p> <p>Trained human resources utilizing high-demand skills effectively in ASEAN countries Training/Research institutions addressing regional concerns and capable of continuing activities without AID support for recurring costs (PLANTI and ADPC)</p>	<p>(B-3)</p> <p>Monitoring/evaluation findings Tracer Studies Periodic Visits to reg'l institutions to review progress Institutional documents Feedback from ASEAN member countries, committees</p>	<p>Assumptions for achieving purpose: (B-4)</p> <p>ASEAN member countries continue to participate in regional organization network Trained nationals return to respective countries and work in targeted development field Institutions receive substantial ASEAN member or other donor support to cover recurring costs</p>																																																
<p>Project Outputs: (C-1)</p> <p>Trained participants in various sectors regional/conferences/workshops Strengthened training/research institutions Research studies Improved dissemination of technical information/publications on regional issues Newly developed or improved training courses Strengthened regional networks</p>	<p>Magnitude of outputs: (C-2)</p> <table border="1"> <thead> <tr> <th></th> <th>PLANTI</th> <th>ADPC</th> <th>TROPED</th> <th>AIT</th> <th>TOTALS</th> </tr> </thead> <tbody> <tr> <td>Master's Degree:</td> <td></td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td> ASEAN</td> <td>6</td> <td>36</td> <td>248</td> <td>70</td> <td>360</td> </tr> <tr> <td> U.S.</td> <td>6</td> <td></td> <td></td> <td></td> <td>6</td> </tr> <tr> <td>Diploma-ASEAN</td> <td>30</td> <td></td> <td>236</td> <td></td> <td>266</td> </tr> <tr> <td>ST Trg.-ASEAN</td> <td>916</td> <td>96</td> <td></td> <td>344</td> <td>1356</td> </tr> <tr> <td>Totals</td> <td>958</td> <td>132</td> <td>484</td> <td>414</td> <td>1988</td> </tr> </tbody> </table> <p>-744 attendees at reg'l seminars/workshops/conferences -2 strengthened training/research institutes -15 research studies (PLANTI, 10; ADPC, 5) - 6 senior research fellowships -increased documentation and dissemination of info/publications</p>		PLANTI	ADPC	TROPED	AIT	TOTALS	Master's Degree:						ASEAN	6	36	248	70	360	U.S.	6				6	Diploma-ASEAN	30		236		266	ST Trg.-ASEAN	916	96		344	1356	Totals	958	132	484	414	1988	<p>(C-3)</p> <p>Evaluations Quarterly/Periodic Reports from individual institutions Reports/Feedback from bilateral USAID offices as appropriate. Documentation/research studies reviews. Feedback from ASEAN member countries, committees.</p>	<p>Assumptions for achieving outputs (C-4)</p> <p>Sufficient numbers of candidates are available for all courses. Countries nominate qualified candidates in a timely manner. Member countries continue cooperate in training, research and other endeavors.</p>						
	PLANTI	ADPC	TROPED	AIT	TOTALS																																														
Master's Degree:																																																			
ASEAN	6	36	248	70	360																																														
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ST Trg.-ASEAN	916	96		344	1356																																														
Totals	958	132	484	414	1988																																														
<p>Project Inputs: (D-1)</p> <p>AID - Scholarship and training grants, research and planning support. US and ASEAN technical assistance, expanded information dissemination, institutional development, evaluation, and contingencies. ASEAN - operating and support costs, in-kind contributions, tax exemptions to regional institutions, office space faculty salaries.</p>	<p>Implementation Target (Type and Quantity) (D-2)</p> <table border="1"> <thead> <tr> <th></th> <th>AID</th> <th>ASEAN</th> <th>TOTAL</th> </tr> </thead> <tbody> <tr> <td>Schlrshp/Tng</td> <td>8,960</td> <td>2,500</td> <td>11,460</td> </tr> <tr> <td>Res/Plng</td> <td>500</td> <td></td> <td>500</td> </tr> <tr> <td>TA</td> <td>430</td> <td></td> <td>430</td> </tr> <tr> <td>Commod/Equipmt</td> <td>250</td> <td>140</td> <td>390</td> </tr> <tr> <td>Staff Support</td> <td>1,680</td> <td>1,630</td> <td>3,310</td> </tr> <tr> <td>O&M</td> <td>200</td> <td>460</td> <td>660</td> </tr> <tr> <td>Info Dissem</td> <td>130</td> <td></td> <td>130</td> </tr> <tr> <td>Other</td> <td></td> <td>430</td> <td>430</td> </tr> <tr> <td>Sub-Total</td> <td>12,150</td> <td>5,300</td> <td>17,450</td> </tr> <tr> <td>Contingency & Infl. 13%₂</td> <td>1,850</td> <td>700</td> <td>2,550</td> </tr> <tr> <td>Total</td> <td>14,000</td> <td>6,000</td> <td>20,000</td> </tr> </tbody> </table>		AID	ASEAN	TOTAL	Schlrshp/Tng	8,960	2,500	11,460	Res/Plng	500		500	TA	430		430	Commod/Equipmt	250	140	390	Staff Support	1,680	1,630	3,310	O&M	200	460	660	Info Dissem	130		130	Other		430	430	Sub-Total	12,150	5,300	17,450	Contingency & Infl. 13% ₂	1,850	700	2,550	Total	14,000	6,000	20,000	<p>(D-3)</p> <p>Review of agreements, obligating and other related documents Contracts Audits</p>	<p>Assumptions for providing inputs: (D-4)</p> <p>Funding is available from various sources.</p>
	AID	ASEAN	TOTAL																																																
Schlrshp/Tng	8,960	2,500	11,460																																																
Res/Plng	500		500																																																
TA	430		430																																																
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Total	14,000	6,000	20,000																																																

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Financial Plan Detail

This Annex consists of two tables as shown below.

Table 1
Consolidated Projection of Expenditures by Fiscal Year^{1/}
(\$000)

Project Component	Year #1		Year #2		Year #3		Year #4		Year #5		Total	
	AID ^{2/}	ASEAN	AID	ASEAN	AID	ASEAN	AID	ASEAN	AID	ASEAN ^{3/}	AID	ASEAN
PLANTI	1,120	590	1,060	500	970	520	640	380	210	180	4,000	2,120
ADPC	370	150	510	150	490	140	380	140	-	-	1,750	580
AIT	850	290	850	290	850	290	640	210	210	70	3,400	1,150
TROPMED	720	360	760	360	760	360	570	280	190	90	3,000	1,450
Sub-Total	3,060	1,390	3,180	1,300	3,070	1,310	2,230	1,010	610	290	12,150	5,300
Contingency & Inflation 13%	75	25	175	75	400	125	500	300	700	275	1,850	700
T o t a l	3,135	1,415	3,355	1,375	3,470	1,435	2,730	1,210	1,310	565	14,000	6,000

^{1/}All figures rounded to nearest \$10,000; based on Grantee estimates.

^{2/}Year #1 begins July 1, 1987

^{3/}Cost of Year #4 Training Programs extending into Year #5

Table 2
Project Obligation Schedule
(\$000)

Project Component	Authorization Level	1987	1988	1989	1990	1991
PLANTI	4,000 ^{4/}	850	1,250	950	950	
ADPC	1,750	280	470	500	500	
AIT	3,400	1,250	750	750	650	
TROPMED	3,000	-	800	1,000	1,200	
Sub-Total	12,150	2,380	3,270	3,200	3,300	
Contingency & Inflation	1,850	70	180	400	500	700
Total	14,000	2,450	3,450	3,600	3,800	700

^{4/}Includes an estimated \$550,000 in funds reobligated from Phase I.

Detail of Project Administration and Analysis

This Annex contains the following Sub-Annexes relative to Project Administration and Analysis:

- I-1 Waiver for Financing International Travel Costs for Participants
- I-2 Evaluation Plan
- I-3 Initial Environmental Examination (Categorical Exclusion)

Evaluation Plan

A. Mid-Project Evaluation. A formal, joint evaluation will be scheduled following the completion of Year Two of the Project. Terms of reference for the evaluation team are provided below:

1. Staffing - The mid-project evaluation team should be composed of the following US members:

Project Development Officer AID/W or USAID/Manila	4 weeks
Education/HRD Specialist AID/W or Contract	4 weeks
Plant Quarantine Specialist Contract	2 weeks
Trop Med Specialist Contract	2 weeks
Engineering Educator Contract	2 weeks
Agricultural Economic Specialist AID/W or USAID Mission(s)	2 weeks

As is customary, ASEAN will participate in the evaluation and have its own members to the team.

2. Scope of Work - At least two members of the team should visit each sub-project site. It is planned that each participating institution will be prepare its own internal evaluation for discussion with the evaluation team. This document should include:

- a) Perceived benefits (outputs) of project to date, using the Phase II project paper as the basis for benchmarks; e.g. target vs. actual participants trained or in training;
- b) Implementation progress (inputs/process); e.g. degree to which (1) appropriate participant nominations have been made within agreed timeframes, (2) participating governments are increasing their financial support to the ASEAN institutions, and (3) the ASEAN dialogue has provided the flexibility for the project to adapt to changing conditions; also, trends in costs and cost control mechanisms will be examined;
- (c) Self-assessment of institutional performance; e.g., quality and relevance of training, research and information dissemination activities; constraints and how they have been resolved.

The evaluation team will review the internal evaluations; fill in any missing or incomplete information; analyze the current status and anticipated future progress toward the attainment of the project purpose and end-of-project status; and recommend actions to be taken by USAID, participating ASEAN governments and institutions and the ASEAN Dialogue, including any revisions to be made to project activities or financing for the remaining life of the project.

B. End-of-Project Evaluation. The final evaluation, while addressing project inputs and outputs, should focus on the achievement of the project purpose and its overall impact in promoting regional cooperation and strengthening regional institutions in order to meet the economic and technical demands of the region.

C. Specific Issues for Mid-Project Evaluation Review.

- Extent to which ADPC and PLANTI have increased donor and ASEAN financed support.
- Extent to which ADPC and PLANTI have established and improved training programs.
- Review of participant selections: quality, number of candidates, numbers of women and private sector participants.
- Review training undertaken - costs, effectiveness, etc.
- Review TROPED courses for quality, overlap, improvement, etc.
- Information from follow-up questionnaires or interviews with returned participants for relevance of training, appropriateness of position, etc.
- Extent of role as regional institution -- e.g., documentation center, coordination of regulation formulation, cooperative research efforts, etc.
- Institutional management.

INITIAL ENVIRONMENTAL EXAMINATION
OR
CATEGORICAL EXCLUSION

Project Country: ASEAN Regional

Project Title : ASEAN Human Resources Development (398-0287)

Funding : FY (s) 1987 - 1991 \$ 14,000,000

IEE Prepared by: ANE/AR: Bruce Blackman

Environmental Action Recommended:

Positive Determination _____
Negative Determination xxxx

Categorical Exclusion:

This activity meets the criteria for Categorical Exclusion in accordance with Section 216.2 (c) (2) because the proposed activities are specifically excluded as: (i) an educational, training and technical assistance project; (ii) controlled experimentation such as plant quarantine research that is confined to small areas and carefully monitored; (iii) analyses, studies, academic and research meetings typically to encourage information dissemination; and (iv) development planning studies and projects that are inherently non-polluting. No major construction efforts or procurement of pesticides is anticipated. The ASEAN Regional Office will be responsible to monitor and advise AID/Washington on any changes in the environmental impact described here as the project is implemented.

Concurrence:
Bureau Environmental Officer

APPROVED _____ X
DISAPPROVED _____
DATE _____

Clearance: Stephen F. Intra
ANE/PD/ENV, Environmental
Coordinator

DATE March 10, 1987

PROJECT CHECKLIST

Listed below are statutory criteria applicable to projects. This section is divided into two parts. Part A. includes criteria applicable to all projects. Part B. applies to projects funded from specific sources only:
 B.1. applies to all projects funded with Development Assistance loans, and
 B.3. applies to projects funded from ESF.

CROSS REFERENCES: IS COUNTRY CHECKLIST UP TO DATE? HAS STANDARD ITEM CHECKLIST BEEN REVIEWED FOR THIS PROJECT? N.A.
 Yes

A. GENERAL CRITERIA FOR PROJECT

- | | |
|---|--|
| <p>1. <u>FY 1987 Continuing Resolution Sec. 523; FAA Sec. 634A.</u>

Describe how authorizing and appropriations committees of Senate and House have been or will be notified concerning the project.</p> | <p>1. Congressional Notification will be submitted in FY 87.</p> |
| <p>2. <u>FAA Sec. 611(a)(1)</u> Prior to obligation in excess of \$500,000 will there be (a) engineering, financial or other plans necessary to carry out the assistance and (b) a reasonably firm estimate of the cost to the U.S. of the assistance?</p> | <p>2. (a) Yes

(b) Yes</p> |
| <p>3. <u>FAA Sec. 611(a)(2)</u>. If further legislative action is required within recipient country, what is basis for reasonable expectation that such action will be completed in time to permit orderly accomplishment of purpose of the assistance?</p> | <p>3. N.A.</p> |

4. FAA Sec. 611(b); FY 1987 Continuing Resolution Sec. 501. If for water or water-related land resource construction, has project met the principles, standards, and procedures established pursuant to the Water Resources Planning Act (42 U.S.C. 1962, et seq.)? (See AID Handbook 3 for new guidelines.)
4. N.A.
5. FAA Sec. 611(e). If project is capital assistance (e.g., assistance for it will exceed \$1 million, has Mission Director certified and Regional Assistant Administrator taken into consideration the country's capability effectively to maintain and utilize the project?
5. N.A.
6. FAA SEC. 209. Is project susceptible to execution as part of regional or multilateral project? If so, why is project not so executed? Information and conclusion whether assistance will encourage regional development programs.
6. This is an ASEAN Project design to promote regional cooperation and development.
7. FAA Sec. 601(a). Information and conclusions whether projects will encourage efforts of the country to:
- (a) increase the flow of international trade; (b) foster private initiative and competition; (c) encourage development and use of cooperatives, and credit unions, and savings and loan associations; (d) discourage
7. (a) N.A.
 (b) Yes. See p. 5.
 (c) N.A.
 (d) N.A.
 (e) Yes. See p. 5.
 (f) N.A.

monopolistic practices; (e) improve technical efficiency of industry, agriculture and commerce; and (f) strengthen free labor unions.

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| 8. | <u>FAA Sec. 601(b)</u> . Information and conclusions on how project will encourage U.S. private trade and investment abroad and encourage private U.S. participation in foreign assistance programs (including use of private trade channels and the service of U.S. private enterprise). | 8. N.A. |
| 9. | <u>FAA Sec. 612(b), 636(h); FY 1987 Continuing Resolution Sec. 507</u> . Describe steps taken to assure that, to the maximum extent possible, the country is contributing local currencies to meet the cost of contractual and other services, and foreign currencies owned by the U.S. are utilized in lieu of dollars. | 9. See p. 36. Foreign currencies owned by the U.S. are not available to this project. |
| 10. | <u>FAA Sec. 612(d)</u> . Does the U.S. own excess foreign currency of the country and, if so, what arrangements have been made for its release? | 10. N.A. |
| 11. | <u>FAA Sec. 601(e)</u> . Will the project utilize competitive selection procedures for the awarding of contracts, except where applicable procurement rules allow otherwise? | 11. Yes |
| 12. | <u>FY 1987 Continuing Resolution Sec. 522</u> . If assistance is for the production of any commodity for export, is the | 12. N.A. |

commodity likely to be in surplus on world markets at the time the resulting productive, and is such assistance likely to cause substantial injury to U.S. producers of the same, similar or competing commodity?

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| <p>13. <u>FAA 118(c) and (d)</u>. Does the project comply with the environmental procedures set forth in AID Regulation 16. Does the project or program take into consideration the problem of the destruction of tropical forests?</p> | <p>13. Meets Regulation 16 for categorical exclusion. See Annex I-3.</p> |
| <p>14. <u>FAA 121(d)</u>. If a Sahel Project, has a determination been made that the host government has an adequate system for accounting for and controlling receipt and expenditure of project funds (dollars or local currency generated therefrom)?</p> | <p>14. N.A.</p> |
| <p>15. <u>FY 1987 Continuing Resolution Sec. 532</u>. Is disbursement of the assistance conditioned solely on the basis of the policies of any multilateral institution?</p> | <p>15. No</p> |
| <p>16. <u>ISDCA of 1985 Sec. 315</u>. For development assistance projects, how much of the funds will be available only for activities of economically and socially disadvantaged enterprises, historically black colleges and universities, and private and voluntary organizations which are controlled by individuals who are black</p> | <p>16. See p. 37.</p> |

Americans, Hispanic Americans, or Native Americans, or who are economically or socially disadvantaged (including woman)?

B. FUNDING CRITERIA FOR PROJECT

1. Development Assistance Project Criteria

- a. FAA Sec. 102(a), 111, 113, 281(a). Extend to which activity will (a) effectively involve the poor in development, by extending access to economy at local level, increasing labor-intensive production and the use of appropriate technology spreading investment from cities to small towns and rural areas, and insuring wide participation of the poor in the benefits of development on a sustained basis, using the appropriate U.S. institutions; (b) help develop cooperatives, especially by technical assistance, to assist rural and urban poor to help themselves toward better life, and otherwise encourage democratic private and local governmental institutions; (c) support the self-help efforts of developing countries; (d) promote the participation of women in the national

1. (a) Training in the use of appropriate technologies should contribute to these aspects See p.p. 42-43.

(b) and (c) Both government and private sector organizations will be assisted in improving institutional capability to deliver quality services and and related development functions.

(d) See p. 43.

(e) This is a regional program under the auspices ASEAN. See p. 44.

economies of developing countries and the improvement of women's status; (e) utilize and encourage regional cooperation by developing countries?

- b. FAA Sec. 103, 103A, 104 105, 106. Does the project fit the criteria for the type of funds (functional account) being used? b. Yes
- c. FAA Sec. 107. Is emphasis on use of appropriate technology (relatively smaller, cost-saving, labor-using technologies that are generally most appropriate for the small farms, small businesses, and small incomes of the poor)? c. No
- d. FAA Sec. 110(a). Will the recipient country provide at least 25% of the costs of the program, project, or activity with respect to which the assistance is to be furnished (or is the latter cost-sharing requirement being waived for a "relatively least developed country")? d. N.A. but see p. 36.
- e. FAA Sec. 122(b). Does the activity give reasonable promise of contributing to the development of economic resources, or to the increase of productive capacities and self-sustaining economic growth? e. Yes. See pp. 40-42.

f. FAA Sec. 128(b). If the activity attempts to increase the institutional capabilities of private organizations or the government of the country, or if it attempt to stimulate scientific and technological research, has it been designed and will it be monitored to ensure that the ultimate beneficiaries are the poor majority?

f. No, but see pp. 42-43.

g. FAA Sec. 281(b). Describe extent to which program recognizes the particular needs, desires, and capacities of the people of the country; utilizes the resources to encourage institutional development; and supports civil education and training in skills required for effective participation in governmental process essential to self-government.

g. The project is based on initiatives of the governments of the region acting through their regional organization, and is intended to support the use and development of the intellectual resources of the region. See pp. 43-45.

2. Development Assistance Project Criteria (Loans Only)

2. N.A.

a. FAA Sec. 122(b). Information and conclusion on capacity of the country to repay the loan, at a reasonable rate of interest.

b. FAA Sec. 620(d). If assistance is for any productive enterprise which will compete with U.S.

enterprises, is there an agreement by the recipient country to prevent export to the U.S. of more than 20% of the enterprise's annual production during the life of the loan?

3. Economic Support Fund Project Criteria

3. N.A

- a. FAA Sec. 531(a). Will this assistance promote economic and political stability? To the maximum extent feasible, is this assistance consistent with the policy directions, purposes, and programs of part I of the FAA?
- b. FAA Sec. 531(c). Will assistance under this chapter be used for military, or paramilitary activities?
- c. ISDCA of 1985 Sec. 207. Will ESF funds be used to finance the construction of, or the operation or maintenance of, or the supplying of fuel for, a nuclear facility? If so, has the President certified that such country is a party to the Treaty on the Non-Proliferation of Nuclear Weapons or the Treaty for the Prohibition of Nuclear Weapons in Latin America (the "Treaty of Tlatelolco"), cooperates fully with the IAEA, and pursues nonproliferation policies consistent with those of the United States?

- d. FAA Sec. 609. If commodities are to be granted so that sale proceeds will accrue to the recipient country, have Special Account (counterpart) arrangements been made?

3M (3) - STANDARD ITEM CHECKLIST

Listed below are the statutory items which normally will be covered routinely in those provisions of an assistance agreement dealing with its implementation, or covered in the agreement by imposing limits on certain uses of funds.

These items are arranged under the general headings of (A) Procurement, (B) Construction, and (C) Other Restrictions.

A. Procurement

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| 1. | <u>FAA Sec. 602.</u> Are there arrangements to permit U.S. small business to participate equitably in the furnishing of commodities and services financed? | 1. Yes, as provided in A.I.D. directives. See pp. 39-40. |
| 2. | FAA Sec. 604(a). Will all procurement be from the U.S. except as otherwise determine by the President or under delegation from him? | 2. Yes, as provided in A.I.D. directives. |
| 3. | <u>FAA Sec. 604(d).</u> If the cooperating country discriminate against marine insurance companies authorized to do business in the U.S., will commodities be insured in the United States against marine risk with such a company? | 3. N.A. |

4. FAA Sec. 604(e); ISDCA of 1980 Sec. 705(a). If offshore procurement of agricultural commodity or product is to be financed, is there provision against such procurement when the domestic price of such commodity is less than parity? (Exception where commodity financed could not reasonably be procured in U.S.).
4. No such procurement will be financed.
5. FAA Sec. 604(g). Will construction or engineering services be procured from firms of countries which receive direct economic assistance under the FAA and which are otherwise eligible under Code 941, but which have attained a competitive capability in international markets in one of these areas? Do these countries permit United States firms to compete for construction or engineering services financed from assistance programs of these countries?
5. N.A.
6. FAA Sec. 603. Is the shipping excluded from compliance with requirement in section 901(b) of the Merchant Marine Act of 1936, as amended, that at least 50 per centum of the gross tonnage of commodities (computed separately for dry bulk carriers, dry cargo liners, and tankers) financed shall be transported on privately owned U.S. flag commercial vessels to the extent such vessels are available at fair and reasonable rates?
6. No.

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| 7. | <u>FAA Sec. 621.</u> If technical assistance is financed, will such assistance be furnished by private enterprise on a contract basis to the fullest extent practicable? If the facilities of other Federal agencies will be utilized, are they particularly suitable, not competitive with private enterprise, and made available without undue interference with domestic programs? | 7. See pp. 39-40. A PASA will be executed with USDA to provide plant quarantine expertise for which USDA is particularly well suited. |
| 8. | <u>International Air Transportation Fair Competitive Practice Act, 1974.</u> If air transportation of persons or property is financed on grant basis, will U.S. carriers be used to the extent such service is available? | 8. Yes |
| 9. | <u>FY 1987 Continuing Resolution Sec. 504.</u> If the U.S. Government is a party to a contract for procurement, does the contract contain a provision authorizing termination of such contract for the convenience of the United States? | 9. Any such contract will contain such provision, as provided in A.I.D. directives. See pp. 39-40. |

B. Construction

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| 1. | <u>FAA Sec. 601(d).</u> If capital (e.g., construction) project, will U.S. engineering and professional services be used? | 1. N.A. |
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| 2. | <u>FAA Sec. 611(c)</u> . If contracts for construction are to be financed, will they be let on a competitive basis to maximum extent practicable? | 2. N.A. |
| 3. | <u>FAA Sec. 620 (k)</u> . If for construction of productive enterprise, will aggregate value of assistance to be furnished by the U.S. not exceed \$100 million (except for productive enterprises in Egypt that were described in the CP)? | 3. N.A. |

C. Other Restrictions

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| 1. | <u>FAA Sec. 122(b)</u> . If development loan, is interest rate at least 2% per annum during grace period and at least 3% per annum thereafter? | 1. N.A |
| 2. | <u>FAA Sec. 301(d)</u> . If fund is established solely by U.S. contributions and administered by an international organization, does Comptroller General have audit rights? | 2. N.A. |
| 3. | <u>FAA Sec. 620(h)</u> . Do arrangements exist to insure that United States foreign aid is not used in a manner which, contrary to the best interests of the United States, promotes or assists the foreign aid projects or activities of the Communist-bloc countries? | 3. Yes. See p. 39. |
| 4. | Will arrangements preclude use of financing: | 4. |

- a. FAA Sec. 104(f); FY 1987 Continuing Resolution Sec. 540. (1) To pay for performance of abortions as a method of family planning or to motivate or coerce persons to practice abortions; (2) to pay for performance of involuntary sterilization as method of family planning, or to coerce or provide financial incentive to any person to undergo sterilization; (3) to pay for any biomedical research which relates, in whole or part, to methods or the performance of abortions or involuntary sterilizations as a means of family planning; (4) to lobby for abortion? a. Yes
- b. FAA Sec. 488. To reimburse persons, in the form of cash payments, whose illicit drug crops are eradicated? b. Yes
- c. FAA Sec. 620(g). To compensate owners for expropriated nationalized property?
- d. FAA Sec. 660. To provide training or advice or provide any financial support for police, prisons, or other law enforcement forces, except for narcotics programs? d. Yes

- e. FAA Sec. 662. For CIA activities? e. Yes
- f. FAA Sec. 636(i). For purchase, sale, long-term lease, exchange or guaranty of the sale of motor vehicles manufactured outside U.S., unless a waiver is obtained? f. Yes
- g. FY 1987 Continuing Resolutions, Sec. 503. To pay pensions, annuities, retirement pay, or adjusted services compensation for military personnel? g. Yes
- h. FY 1987 Continuing Resolution, Sec. 505. To pay U.N. assessments, arrearages or dues? h. Yes
- i. FY 1987 Continuing Resolution, Sec. 506. To finance the export of nuclear equipment, fuel, or technology? i. Yes
- j. FY 1987 Continuing Resolution, Sec. 510. To finance the export of nuclear equipment, fuel, or technology? j. Yes
- k. FY 1987 Continuing Resolution, Sec. 511. For the purpost of aiding the efforts of the government of such country to repress the legitimate rights of the population of such country contrary to the Universal Declaration of Human Rights? k. Yes

1. FY 1987 Continuing Resolution, Sec. 516
To be used for publicity or propaganda purposes within U.S. not authorized by Congress?

1. Yes

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