

U N C L A S S I

AGENCY FOR INTERNATIONAL DEVELOPMENT

Washington, D. C. 20523

PROJECT PAPER

JORDAN: Agricultural Marketing
Development (278-0274)

May 15, 1988

U N C L A S S I F I E D

JORDAN

AGRICULTURAL MARKETING DEVELOPMENT PROJECT

PROJECT PAPER

278-0274

a

PROJECT DATA SHEET

1. TRANSACTION CODE

A = Add
 C = Change
 D = Delete

Amendment Number _____

DOCUMENT CODE

3

2. COUNTRY/ENTITY

Jordan

3. PROJECT NUMBER

278-0274

4. BUREAU/OFFICE

Asia Near East

03

5. PROJECT TITLE (maximum 40 characters)

Agricultural Marketing Development

6. PROJECT ASSISTANCE COMPLETION DATE (PACD)

MM DD YY
 09 30 93

7. ESTIMATED DATE OF OBLIGATION
 (Under 'B.' below, enter 1, 2, 3, or 4)

A. Initial FY 88

B. Quarter 4

C. Final FY 90

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

FUNDING SOURCE	FIRST FY			LIFE OF PROJECT		
	B. FX	C. L/C	D. Total	E. FX	F. L/C	G. Total
AID Appropriated Total						
(Jordan)	(1.5)	(0.2)	(1.7)	(4.3)	(0.7)	(5.0)
Other						
U.S.						
Host Country		1.56	1.56		8.27	8.27
Other Donor(s)						
TOTALS	2.0	1.76	3.26	4.3	8.97	13.270

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)	123	011		-0-	-0-	2.5		5.0	
(2)									
(3)									
(4)									
TOTALS						2.5		5.0	-0-

10. SECONDARY TECHNICAL CODES (maximum 6 codes of 3 positions each)

023 021 029

11. SECONDARY PURPOSE CODE

12. SPECIAL CONCERNS CODES (maximum 7 codes of 4 positions each)

A. Code

B. Amount

13. PROJECT PURPOSE (maximum 480 characters)

To improve marketing efficiency by establishing an institutional and policy framework which will allow Jordanian farmers and businessmen to exploit profitable marketing opportunities, domestically, in the Gulf, and in the EEC.

14. SCHEDULED EVALUATIONS

Interim MM YY MM YY Final MM YY
 05 90 05 91 07 93

15. SOURCE/ORIGIN OF GOODS AND SERVICES

000 941 Local Other (Specify)

16. AMENDMENTS/NATURE OF CHANGE PROPOSED (This is page 1 of a _____ page PP Amendment)

The financing methods to be used in this project are in conformity with AID's Policy Statements on Financial and Administrative Management and USAID's comprehensive general assessment.

Amal Khatib
 Controller

17. APPROVED BY

Signature Lewis P. Reade
 Title Director
 USAID/Jordan

Date Signed MM DD YY
 05 15 88

18. DATE DOCUMENT RECEIVED IN AID/W, OR FOR AID/W DOCUMENTS, DATE OF DISTRIBUTION

MM DD YY

LIST OF ACRONYMS

ACWM	Amman Central Wholesale Market
ADF	Agricultural Development Fund
AID/W	Agency For International Development/Washington
AMAC	Agricultural Marketing Analysis Component
AMAF	Agricultural Marketing Analysis Fund
AMD	Agricultural Marketing Development
AMIS	Agricultural Marketing Improvement Strategies
AMO	Agricultural Marketing Organization
AMPCO	Agricultural Marketing and Processing Co.
AMRF	Agricultural Marketing and Research Fund
APAP	Agricultural Policy Analysis Project
CP	Conditions Precedent
CY	Current Year
DOS	Department of Statistics
DRC	Domestic Resource Cost
EEC	European Economic Community
ESF	Economic Support Fund
FAA	Foreign Assistance Act
FAO	Food and Agriculture Organization
FY	Fiscal Year
GDP	Gross Domestic Product
GOJ	Government of Jordan
GTZ	German Technology Assistance Agency
IQC	Indefinite Quantity Contracts
JHADP	Jordan Highland Agriculture Development Project
JNADP	Jordan National Agriculture Development Project
JVASP	Jordan Valley Agriculture Services Project
L-T	Long-Term
MOA	Ministry of Agriculture
NCARTT	National Center for Agricultural Research & Technology Transfer
OYB	Operating Year Budget
PETRA	Private Enterprise Technical Resource Assistance Project
PID	Project Identification Document
PIO/P	Project Implementation Order/Personnel
PIO/T	Project Implementation Order/Training
PIS	Project Information System
PSA	Procurement Service Agent
S-T	Short-Term
S&T	Science and Technology
TA	Technical Assistance
TDY	Temporary Duty
USAID	United States Agency for International Development

JORDAN AGRICULTURAL MARKETING DEVELOPMENT
PROJECT (278-0274)

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Reports:

1. Agricultural Policies Affecting Production and Marketing of Fruits and Vegetables in Jordan, Abt Associates Inc., January 1988.
2. Institutional Analysis of the Jordan Agricultural Marketing Organization, Richard W. Schermerhorn, August 1987
3. Recommendations for Private Sector Fruit and Vegetable Export Marketing Training, Richard W. Schermerhorn, August 1987
4. Rapid Marketing Appraisal of the Marketing of Four Vegetable Crops in Jordan, R.W. Schermerhorn, G.R. King et al, July 1988 (Draft)

All reports are available at USAID/Jordan Mission

PROJECT PAPER
278-02/4

JORDAN AGRICULTURAL MARKETING DEVELOPMENT PROJECT

1. Project Summary and Recommendations

A. Grantee: The Government of the Hashemite Kingdom of Jordan (GOJ).

B. Implementing Agency: The Agricultural Marketing Organization (AMO), with the Ministry of Agriculture (MOA) serving as coordinating agency.

C. Amount: Not to exceed US Dollars 5,000,000 to be authorized as a grant.

D. Total Project Cost: The total project cost is estimated at US Dollars 13,270,000 of which the GOJ will contribute US Dollars 8,270,000 over the life of project.

E. Project Goal and Purpose:

Goal: To increase productivity and incomes of Jordanian fruit and vegetable farmers.

Purpose: To improve marketing efficiency by establishing an institutional and policy framework that allows and encourages Jordanian farmers and entrepreneurs to exploit profitable opportunities in both domestic and foreign markets.

F. Summary Project Description:

Jordan's exports of fruits and vegetables to the Gulf Region, its biggest market, are in decline; new markets are difficult to penetrate; and increased production due to continuing technological improvements has resulted in surpluses that domestic consumption cannot absorb. Both foreign exchange earnings and farmers' incomes have decreased alarmingly in recent years. While external factors have contributed to this situation, a basic cause of this simultaneous fall in exports and rise in surpluses of fruits and vegetables is an inefficient marketing system. Specifically,

(a) The market fails to send timely and relevant price signals to producers, consumers, and other economic agents. National resources are thus misallocated, export opportunities are lost, and domestic surpluses mount.

(b) No domestic marketing information system exists nor is reliable information concerning foreign markets available.

Farmers operate on the basis of inadequate information as to what to grow, where to sell, and how to get the best prices; exporters are unaware of new markets or how to gain sustained access to those markets.

(c) Appropriate grades and standards do not exist, resulting in an erosion of Jordan's exports by competitors who better meet consumer preferences concerning quality of produce. Locally, the absence of grades and standards is complicated by government regulation of retail prices (see below) that act as disincentive for farmers to produce higher quality crops, which could yield higher farm incomes.

(d) The Amman Central Wholesale Market (ACWM), through which more than 80 percent of all fruits and vegetables are marketed, is overcrowded and allegedly controlled by cartels. Waste and spoilage diminish farm gate prices, reduce efficiency, and ultimately contribute to the decline in exports. The allegations of price collusion if true, deprive farmers of higher incomes while overcharging consumers.

(e) Contributing to market inefficiency is a policy environment which may impede the operation of free market forces and discourages private sector initiative. For example, to the extent that better quality implies higher production costs the GOJ retail price controls discourage farmers from producing better quality fruits and vegetables. Also, Government restrictions on the amount of land that can be planted with certain crops restricts efficient operation of the market. Moreover, the GOJ subsidizes low-value production e.g., tomatoes, discouraging diversification into higher-value crops. Finally, parastatal interventions may preempt private investment and create monopoly influences which reduce Jordan's competitiveness in exporting fruits and vegetables.

The Agricultural Marketing Development (AMD) Project is designed to improve the efficiency of the marketing system for Jordanian fruits and vegetables. The project will develop an institutional and policy framework that allows and encourages farmers and entrepreneurs to better identify and exploit profitable opportunities in domestic and foreign markets. Improved marketing efficiency will result in higher farmer incomes, better quality and greater variety of produce, increased exports, and a more efficient allocation of limited national resources e.g., arable land and water.

The institutional focus of the project will be on the Agricultural Marketing Organization (AMO), which will have primary responsibility for AMD project implementation. AMO is a newly-established semi-autonomous parastatal under the Ministry of Agriculture (MOA) and has a mandate to promote greater participation of the private sector in a broad range of agricultural activities and to advise on agricultural marketing policy. Although it has a number of competent and experienced professional personnel, it will need technical assistance, training, and commodity support if it is to carry out its program effectively.

One of Jordan's major concerns is to increase private sector exports. Accordingly, AMO will conduct demand analyses of imports into neighboring, Gulf, and EEC markets to identify those fruits and vegetables which Jordan could profitably produce and export. The analysis will compare costs of production, transportation, and selling of current imports in these markets with similar costs for Jordanian producers and exporters. AMO researchers will also gather information on prices, quantities, quality and hygienic standards, and other import requirements. Profitable opportunities identified, AMO will then pass this information directly to interested producers and exporters. AMO will also coordinate with MOA research and extension personnel to organize larger, national production programs to meet these export possibilities.

To increase private sector participation in the domestic market, and make that participation more efficient, AMO will establish a marketing information system. This system will gather, analyze, and disseminate a wide range of information needed by farmers, wholesalers, retailers, consumers, exporters, entrepreneurs and others to make sound economic decisions. AMO will disseminate this information daily, both in the major wholesale markets and nationally through the media. This system will result in a better allocation of resources, increased farmer incomes, and better marketing efficiency.

AMO will also introduce a system of grades and standards for fruits and vegetables. This system, which to operate effectively requires retail price deregulation, will apply initially to export markets and should stimulate increased exports, raise farmer incomes and ultimately, better quality produce should become available in the local markets, at fairer prices to consumers.

AMO will undertake extension activities (e.g., training, demonstrations, information campaigns, and observation tours) to encourage wider private sector involvement in production, grading, packing and storage, transportation, and processing. Much of this extension work will be preceded by specialized applied research and experimentation to determine feasibility and cost effective approaches. Increased private sector participation in these enterprises will stimulate the local economy, create employment, raise rural incomes, and increase economic efficiency. Extension activities will also focus on developing domestic demand for new crop varieties (e.g., through home economics-type information programs).

To help create an appropriate policy environment, the AMD project will build upon the successful January 1988 Aqaba policy planning workshop experience. This USAID-funded workshop brought together for the first time a diverse group of government, parastatal, university, and private sector representatives to discuss certain policy issues (e.g., price regulation, cropping patterns, and competitiveness in the wholesale market) which consultant experts identified as constraints as detailed in a major report.^{1/} Workshop participants reached consensus on the importance of these issues and identified additional studies. Policy-related recommendations of these studies shall be vetted with concerned Jordanian institutions as part of a consensus building process possibly leading to cabinet level consideration.

Since AMO has the official mandate to advise the government on marketing policy it will undertake policy-related analysis. AMO is now working closely with workshop task groups in developing policy recommendations and as appropriate will also conduct, direct, and manage the necessary analysis.

A policy review and planning process will be supported by the project. Outside consultants will identify policy issues for discussion at the workshop, review the work of earlier task forces, assess progress in terms of improving the review and planning process. Workshop participants will discuss the new issues and take appropriate actions on consultants' recommendations. With this policy review and planning process in place, the project expects to achieve significant marketing improvements during the life of project.

^{1/} Abt Associates Inc., 1988. Agricultural Policies Affecting Production and Marketing of Fruits and Vegetables in Jordan.

In summary, major components of the project include (a) a strengthened institutional capacity within AMO to promote increased private sector involvement in all phases of fruit and vegetable production, marketing, and exporting; (b) support for marketing operations by providing through a number of institutional mechanisms the appropriate short term technical assistance to resolve specific marketing bottlenecks; and (c) a rigorous policy review and planning process for achieving needed agricultural marketing improvements. The essence of this process is a series of annual agricultural policy planning workshops that will establish policy discussion agendas, guide the development of studies and "consensus-backed" recommendations, for consideration by appropriate decision-makers.

AID inputs will consist primarily of long and short-term technical assistance to AMO. A significant input will be the USAID contribution to the Agricultural Marketing Analysis Fund to support (i) policy analysis performed by short-term expatriate consultants; (ii) policy planning workshops and seminars; and (iii) AMO studies on marketing and policy issues. The AID contribution will also support the Market Research and Development Fund to provide technical support for marketing operations and experimental postharvest activities. In addition, the project will extend short and long-term training and commodity support to AMO.

- G. Recommendations: USAID/Jordan has reviewed the Agricultural Marketing Development Project and finds it to be technically, financially, economically, socially, and administratively sound. Therefore, the project is recommended for FY 88 approval and obligation of funds.

PROJECT AUTHORIZATION

Name of Country: Hashemite Kingdom of Jordan

Name of Project: Agricultural Marketing Development

Number of Project: 278-0274

1. Pursuant to Section 531 of the Foreign Assistance Act of 1961, as amended, I hereby authorize the Agricultural Marketing Development Project for Jordan involving planned obligations of not to exceed \$5,000,000 in grant funds over a five year period, subject to the availability of funds in accordance with the A.I.D. OYB/allotment process, to help in financing foreign exchange and local currency costs for the project. The planned life of the project is five years from the date of initial obligation.
2. The project consists of the establishment of an institutional and policy framework which will improve agricultural marketing efficiency and allow Jordanian farmers and businessmen to exploit profitable domestic and foreign marketing opportunities.
3. The Project Agreement which may be negotiated and executed by the officer to whom such authority is delegated in accordance with AID regulations and Delegations of Authority shall be subject to the following essential terms and covenants and major conditions, together with such other terms and conditions as AID may deem appropriate.

(A) Source and Origin of Commodities, Nationality of Services

Commodities financed under the AID grant shall have their source and origin in Jordan or in the United States except as AID may otherwise agree in writing. Except for ocean shipping, the suppliers of commodities or services financed under the AID grant shall have Jordan or the United States as their place of nationality, except as AID may otherwise agree in writing. Ocean shipping financed under the AID grant shall, except as AID may otherwise agree in writing, be financed on flag vessel only of the United States.

(B) Conditions Precedent.

Prior to the first disbursement under the Grant, or to the issuance by AID of documentation pursuant to which disbursement will be made, the Borrower/Grantee will, except as AID may otherwise agree in writing, furnish to AID in form and substance satisfactory to AID:

- (i) An opinion of counsel acceptable to AID that this Agreement has been duly authorized and/or ratified by, and executed on behalf of the Grantee, and that it constitutes a valid and legally binding obligation of the Grantee in accordance with all of its terms;
- (ii) A statement of the name of the person holding or acting in the office of the Grantee specified in Section 7.2, and of any additional representative together with a specimen signature of each person specified in such statement.



Lewis P. Reade
USAID Director

5/15/88

Date

11. A. AGRICULTURE SECTOR OVERVIEW:

In Jordan, agriculture represents approximately 7.0 percent of Gross Domestic Product (GDP) and employs roughly 7.6 percent of the domestic labor force. The more rapid growth in non-agricultural sectors, particularly since 1973, has resulted in a relative decline in agriculture's share of GDP, which is consistent with Jordan's entry into advanced developed economy status. This decline in agriculture's economic importance has resulted in a growing balance-of-trade food deficit, which was US\$312 million in 1986. The major areas of domestic production deficiencies are in cereals, pulses, red meats, and dairy products; Jordan lacks a strong comparative advantage in producing these commodities. Most of Jordan's food exports are in fruits and vegetables, where Jordan does have a comparative advantage.

Jordan is a small country with only 55,000 farming households and extremely limited agricultural resources. Less than ten percent of the total land area of 9.3 million hectares is arable. Most of the land depends upon highly variable seasonal rainfall, and at least one failure of the primary winter wheat crop can be anticipated every five or six years. In high rainfall areas (above 400mm), farmers use residual groundwater to cultivate unirrigated summer vegetables between successive wheat crops. Fruit trees are generally cultivated on hilly lands unsuitable for wheat.

Irrigated land, which comprises only about 45,000 hectares, is divided equally between the rainfed highlands and the Jordan Valley. Most of the irrigated lands in the highlands get water from springs, wells, or seasonal streams. In the Jordan Valley, the GOJ has developed an extensive irrigation system which serves about eighty percent of the cultivated land there; areas without access to these facilities rely upon wells for irrigation. Jordan Valley climatological conditions allow cultivation of fruits and vegetables during the winter, with harvest occurring 2-3 months before similar fruits and vegetables grown in the highlands.

About thirty percent of the cultivated land in the Jordan Valley is characterized by high-tech farming, i.e., drip irrigation, plastic greenhouses, high-yielding varieties, and agro-chemicals. In certain parts of the highlands where irrigation is available high-tech cultivation of vegetables under plastic also occurs. The area under plastic in the highlands has been growing rapidly and now exceeds the total hectares under greenhouses in the Jordan Valley.

B. PROJECT RATIONALE AND PROBLEM STATEMENT

Within the constraints noted above, Jordan has good agricultural potential. The large investments in irrigation and other productive infrastructure in the Jordan Valley have already begun to yield high returns. Fruit and vegetable production has increased by more than 35 percent since 1980. Technologies introduced and tested in the Jordan Valley have spread rapidly to irrigated areas in the rainfed highlands and production has soared there as well. Indeed, Jordan is now facing so-called second generation problems because of these advances in productivity. Fruit and vegetable production has far out-stripped domestic consumption, and it is projected that Jordan will continue to have an exportable surplus for many years. Exports of fruits and vegetables, however, have not been increasing apace with increases in domestic production. In fact, Jordan's exports to the Gulf States, its largest market, have declined by thirty percent since 1983. This is due partly to increased price and quality competition by Turkey, Cyprus, and Greece in this regional market and partly to increased domestic production and protectionism by Saudi Arabia, Kuwait, and other Gulf States.

A fundamental reason for over-production of fruits and vegetables and declining exports is market inefficiency. In general, the marketing system fails to send timely price signals to producers, wholesalers, and exporters, enabling them to respond appropriately to profitable opportunities. An effective agricultural marketing information system is needed. Further, the country's major wholesale market is characterized by overcrowding, limited competition among relatively few buyers, and a regressive fee structure. In addition, there is no system of grades and standards for commodities or packaging, neither for domestic nor export markets.

Moreover, the policy environment is not fully supportive of private sector initiatives. For example, the GOJ regulates the prices of two dozen or more basic fruits and vegetables; sets limits on the amount of land that can be devoted to cultivation of major traditional vegetables; restricts private sector importation of certain agricultural produce; subsidizes irrigation; sets floor prices on certain commodities (i.e., tomatoes) which encourages production despite current surpluses. Believing that the marketing surplus is due to the decline in exports, government has been reluctant to acknowledge the role of domestic policies in perpetuating surpluses and export losses. Increasingly, these policies are being questioned.

In recent USAID-funded studies, for example, marketing problems were traced to GOJ policies.^{1/} Significantly, these studies conclude that increasing exports itself will not resolve current domestic market inefficiencies. In short, market and pricing policy change will be needed as well as development of supporting market infrastructure and institutional services.

C. PROJECT GOAL AND PURPOSE

The goal of the Agricultural Marketing Development (AMD) Project is to increase productivity and household incomes of fruit and vegetable farmers in Jordan.

The purpose of the project is to improve marketing efficiency by establishing an institutional and policy framework that allows and encourages Jordanian farmers and entrepreneurs to exploit profitable opportunities in domestic and foreign markets.

D. PROJECT COMPONENTS

1. Project Components and Activities:

The project consists of three major components: (a) a strengthened institutional capacity of the Agricultural Marketing Organization (AMO) to carry out its mandated program, namely, to promote the private sector in all aspects of fruit and vegetable production, processing, marketing, and exporting; (b) support marketing operations by providing and/or arranging appropriate technical assistance and other support, e.g., grades and standards, consumer information; analysis of distribution systems, experiments in post harvest activities and (c) a viable policy review and planning process for establishing policy discussion agendas, conducting policy-related analysis, guiding the development of recommendations, and submitting these recommendations to appropriate policy makers for consideration and action.

Major project activities include:

^{1/} Tech International, 1988, Jordan Valley Impact Assessment.
Ronco, 1987, Jordan Agrobusiness Subsector Assessment.
Abt Associates, op. cit.

- (a) AMO will conduct import demand analyses of neighboring, Gulf, and EEC countries to identify those fruits and vegetables that might be produced and exported profitably by Jordanians. AMO will also gather information on prices, quantities, grades and standards, and importing requirements and procedures. This export market intelligence will be disseminated to farmers, exporters, and other entrepreneurs for exploiting these opportunities.
- (b) AMO will also develop a domestic marketing information system to provide farmers, consumers, and other economic agents with timely and critical information regarding prices, quantities, quality and other relevant factors in the domestic market. This information will be collected and analyzed daily, displayed in major wholesale markets, and disseminated via radio or other media throughout the country.
- (c) In addition, AMO will establish a system of grades and standards for domestic and foreign markets. This will improve the overall quality of Jordanian fruits and vegetables in the local market and further Jordan's access to foreign markets.
- (d) AMO will organize voluntary associations of producers, processors, exporters, and other entrepreneurs in order to facilitate expanded private sector participation in a wide range of agricultural activities. These associations will be the focus of training and information dissemination.
- (e) AMO will undertake a wide range of extension activities to promote improvements in grading, pre-cooling, packaging, transportation, storage, wholesaling, retailing, and exporting of fruits and vegetables. In some cases this will be in conjunction with MOA extension workers, especially in dealing directly with farmers; in other cases, AMO extension personnel will be fully responsible for this work. This extension work will also include home-economics activities aimed at introducing to consumers new varieties of fruits and vegetables.
- (f) As part of its promotion of the private sector, AMO will also conduct pilot experiments in (i) privatizing government-owned processing, grading and packing facilities; and (ii) seeking alternatives to the current whole marketing system by establishing farmers' markets and organizing producers to sell directly to institutions (e.g., hospitals, hotels, wholesalers, and large retailers). These experiments will be done in cooperation with relevant government organizations (e.g., AMPCO and the Municipality of Amman).
- (g) The project will also increase the institutional capability of AMO to undertake, coordinate, and manage research and analysis on major policy issues and to formulate appropriate policy recommendations. It is likely that AMO will conduct most of these studies itself but, when appropriate, will also subcontract with universities, consulting firms, and private researchers.

- (h) Finally, the AMD Project will sponsor up to five policy planning workshops similar to the 1988 Aqaba Policy Planning Workshop. Workshop participants will identify major policy issues requiring further study and analysis. Task groups, working with AMO, will monitor and guide these studies, formulate policy recommendations, and submit these to appropriate policy makers for consideration and action.

2. Major Project Inputs

(A) AID Inputs:

Since AMO is a relatively new organization, it will require a relatively large amount of technical assistance, training, and commodity support if it is to carry out its program satisfactorily. AID will contribute up to US\$5.0 million in grant funds (ESF) to support the project, of which US\$2.2 million of the AID contribution will provide technical advisory services to AMO and GOJ policy decision-makers. Approximately, US\$0.8 million of total project funds will be used to support the Agricultural Marketing Analysis Fund (AMAF), which will finance marketing and policy-related analysis, studies, policy planning workshops, and seminars. The AID contribution will also help finance the Market Research and Development Fund to support market trails and postharvest experiments. The project will also fund long and short-term training of AMO personnel and will provide computers, vehicles, and other equipment to facilitate AMO operations in collecting market information and promoting improved grades and standards. The following paragraphs describe AID's inputs in detail.

(1) Technical Assistance. A substantial portion of AID's contribution will finance both long and short term technical assistance. This is estimated to cost US\$2.2 million. Long term technical assistance, consisting of 7 person-years of consultant services, to include (a) long term chief-of-party institutional development specialist for 4 years, (b) marketing technology and management advisor (export demand analysis and extension) for 1.5 years, and (c) marketing support services specialist (information, grades and standards) for 1.5 years. Short-term consultants totalling up to 4.5 person years will provide a wide range of technical services in fields such as post-harvest technology, marketing extension, consumer extension services, agrobusiness, processing, grades and standards, packaging and containers, export promotion, transport and storage. Consultants will provide technical assistance either directly or indirectly to AMO. (See Attachment F. for detailed technical assistance Scopes of Work).

(2) Training. AID will finance U.S. degree training for 1 PhD (three years) and 8 MS (two years) students. Some MS training may occur at the University of Jordan rather than in the US. AID will also fund short-term in-country training for AMO and the private sector in a variety of activities aimed at either improving AMO's institutional capability or promoting the private sector's participation in marketing.

(3) Equipment. Equipment and vehicles are slated for AMO, although some small equipment support is planned for the private sector producers and exporters association (e.g., telex machines). Six vehicles are planned for AMO, as well as several desk-top computers and computer accessories. The project will also purchase equipment that will be used in conjunction with the agricultural marketing information system (e.g., electronic bulletin boards for the ACWM). The project will also purchase some office equipment and miscellaneous equipment (e.g., portable generators, cameras, and tape recorders) as well as some demonstration units, e.g., grades and standards equipment.

(4) Agricultural Marketing Analysis Fund (AMAF). The AMAF will be used for several purposes. First, it will "buy-in" to two AID S&T centrally-funded projects: the Agricultural Policy Analysis Project (APAP) and the Agricultural Marketing Improvement Strategies (AMIS) Project. The project will use the APAP to obtain technical assistance for institutionalizing the policy planning process. APAP consultants will review the policy planning process, conduct policy studies, and participate in policy planning workshops.

The AMIS Project will provide specialized technical services to AMO in conducting long-term studies and policy experimentation. AMIS supplied TA will supplement TA from the long-term technical assistance team. For example, AMIS can access technical services from the University of Idaho's Post-Harvest Institute for Perishables for specialized assistance in reducing post-harvest losses, introducing pre-cooling, and conducting rapid reconnaissance studies of the marketing system. Such specialized TA would not likely be found in a small agricultural marketing consulting firm.

Second, the AMAF will finance local costs involved in conducting policy planning workshops (e.g., transportation, board and lodging, and conference facilities for participants). Five annual workshops are planned. Finally, the AMAF will finance special studies that are needed by workshop Task Groups to formulate policy recommendations. This will generally be for extraordinary research that might not be covered under AMO's current operating budget.

(5) Market Research and Development Fund will help identify profitable opportunities in foreign markets, AMO should visit these countries to assess current market demand for imports and gather information regarding quantities required, quality, hygienic standards, etc. AMO researchers will first have to be trained to perform this research. Hands-on training in the export market is planned and demonstration of post-harvest technology may necessitate purchase of equipment; finalizing contracts between Jordanian producers and new EEC or Gulf importers might depend upon a special visit to the foreign market; or redesign of stall space in the ACWM might require hiring the services of an architect. Thus the fund will provide technical support for resolving specific marketing bottlenecks and finance experimental postharvest techniques and, possibly, trial shipments.

(6) Evaluation. The project will finance an interim and a final evaluation arrangements. The Mission may utilize TDY assistance of qualified AID officers from USAIDs or AID/Washington to head an inhouse evaluation team for the interim evaluation; and will contract technical services through a contract with a private firm for the final evaluation; the firm would provide a team leader and one other evaluator to work with a locally hired Jordanian consultant and a small team of GOJ and USAID/Jordan officials.

(7). Other Direct Costs and Contingency. Other Direct Costs is combined with Contingency as a separate budget line item. Other Direct Costs will finance project activities for which there is as yet neither specificity nor cost estimates.

The contingency budget line item of the AID contribution covers unforeseen project needs, and will give priority to unforeseen short term technical assistance requirements.

(B) GOJ Inputs

The GOJ will contribute the equivalent of US\$8.27 million to the project. This will consist of approximately US\$7.3 million for personnel and other operating expenses for AMO; US\$.500 million for Market Research and Development, US\$.250 million as a contribution to the Agricultural Marketing Analysis Fund; and US\$.120 million for training of AMO officials.

(1) Personnel related costs and operational support. From the perspective of the GOJ, the Project is aimed at the institutional development of the Agricultural Marketing Organization. GOJ inputs consist largely of in-kind contributions of personnel, and related AMO operational support costs. The project considers AMO's entire personnel and operating costs as a contribution to the project (see additional discussion under Cost Analysis, Section III).

(2) Market Research and Development. The GOJ contribution to this activity will enable AMO researchers to travel with foreign counterparts to EEC, Gulf Region, and Far Eastern markets to conduct operational analyses and related studies. Funding will cover travel, per diems, and research expenses. Most of this research will occur during the first three years of the project, when consultants are available to conduct hands-on training and major market demand analysis is undertaken and completed. In a limited number of cases, trial shipments may also be jointly funded.

(3) Agricultural Marketing Analysis Fund (AMAF). This is the GOJ's counterpart to the Agricultural Marketing Analysis Fund (AMAF) described above. The GOJ contribution will cover local marketing and policy-related research costs. These funds will be deposited in a special fund, because AMO will not know for certain until the annual policy planning workshop occurs what studies will be required; and it is doubtful that AMO will have a regular budget for such unspecified studies and activities. Workshop topics will be determined by AMO in consultation with the MOA and become part of the policy analysis agenda.

(4) Training. In accordance with USAID/Jordan policy, the GOJ will provide international transportation for long-term and short-term training sponsored under the project. The GOJ is also expected to fund certain other local training, both for AMO staff (e.g., English language training) and for private sector groups (e.g., seminars, workshops, demonstrations, and marketing extension).

3. Project Implementation

Most of the technical assistance, training, and commodity support provided by the project will be directed toward AMO, with the objective of increasing their institutional capacity to carry out their mandate. AMO will undertake several activities to make the marketing system more efficient and to promote increased private sector participation in marketing fields (e.g., production, selling, exporting, processing). AMO will encourage this wider participation through information programs (e.g., export intelligence and domestic marketing information), extension (e.g., demonstrations and field days), and specialized training (e.g., seminars, workshops, and observation tours). AMO will also take the lead in convincing the GOJ to privatize, at least on a trial basis, some of its processing facilities in the Jordan Valley; and to allow establishing farmers' markets and other means of direct marketing.

Concurrent with its work on improving marketing efficiency and promoting private sector participation, AMO will assist in establishing the marketing policy review and planning process. This process will identify policies that need modification. Before recommendations for policy change can be formulated, research and analysis must be conducted to justify the need for change and to set forth policy alternatives. AMO will be responsible for these studies and will assist workshop task groups to formulate the policy recommendations. In some cases the GOJ might request AMO to carry out limited or experimental marketing arrangements (e.g., deregulation of prices on only a few commodities) until it is convinced that full-scale change is justified.

We expect at the end of project to have a more market-oriented policy environment and wider private sector participation. This will result in greater market efficiency, a better allocation of agricultural sector resources and ultimately yielding increased exports, and higher farmers' incomes.

111. CCST ESTIMATE AND FINANCIAL PLAN

This analysis examines from a financial perspective the project's resource requirements and addresses the financial concerns implicit in the project's objectives. Section A, Budgetary Analysis, describes AID and GOJ project inputs, provides budget detail, and specifies underlying budget assumptions. Section B deals with the financial implementation of project activities, including planned contracting methods and audit/internal control requirements. Finally, Section C analyzes the project's budget implications for the GOJ/AMO.

A. Budgetary Analysis:

This section examines and quantifies the inputs which are described in more detail in other sections of the paper. The budget has been prepared according to Handbook 111 and AID/W guidance. The total project cost is US\$13.27 million, with AID financing of US\$5.0 million and GOJ contributions of US\$8.27 million, as shown in the summary budget (Table 1).

1. AID Inputs

AID financed inputs total \$5 million in grant funds (ESF) over the estimated five year life of project. Summary and detailed budget tables (Tables 1 and 2) indicate AID funded project components. USAID has determined that the initial FY 88 obligation will consist of a grant of \$2.5 million. The Financial Implementation Plan (Table 3) indicates that approximately \$2.5 million of AID funding will be expended by the end of FY 90. Remaining funding of \$2.5 million should be provided by about 3rd quarter of the FY 90. The following paragraphs describe AID financing by traditional cost components in more detail.

(a) Technical Assistance. A substantial portion of AID's contribution will finance technical assistance. Total technical assistance, consisting of 11.5 person-years of long-term and short-term consultant services, is estimated to cost \$2.210 million. This covers a chief of party for 4 years, and two other long-term consultants for 1.5 years each. Short-term consultants (totalling 4.5 person years) will provide a wide range of technical services. Long-term consultants are budgeted at \$200,000 per year and short-term consultants at \$180,000 per person year. These figures include overheads and fees.

(b) Training. AID will finance 1 PhD degree training (three years) in the US at a cost of \$68,000; and 8 MS degrees (two years each) in the US at \$45,000 per degree. To the extent that MS training occurs at the University of Jordan rather than in the US, there will be either a cost savings or more AMO personnel can be sent for training; the preference is for the latter alternative. AID will also fund short-term in-country training for AMO and the private sector in a variety of activities. US\$127,000 is budgeted for short-term training.

(c) Equipment. Identified equipment costs are \$.500 million. This consists of \$108,000 for 6 vehicles; \$75,000 for computers and computer accessories; \$100,000 for equipment to be used in conjunction with the agricultural marketing information system; \$40,000 for office equipment; \$100,000 for demonstration units of various types, and \$77,000 for miscellaneous equipment.

(d) Agricultural Marketing Analysis Fund (AMAF). US\$0.8 million is budgeted for this item. The AMAF will be used for several purposes. First, it will "buy-in" to two AID S&T centrally-funded projects: the Agricultural Policy Analysis Project (APAP) and the Agricultural Marketing Improvement Strategies (AMIS) Project. The estimated cost of the "buy-in" is \$500,000. The project will use the APAP to obtain technical assistance for institutionalizing the policy planning process. Past experience indicates that these policy studies and consulting services will cost approximately \$300,000 over the course of the project.

The AMIS Project will provide specialized technical services to AMO to assist in conducting long-term studies and experimentation in policy reform, supplementing TA from the long-term technical assistance team. The project budgets \$200,000 over the life of the project for AMIS services.

Second, the AMAF will finance local costs involved in conducting the policy planning workshops (e.g., transportation, board and lodging, and conference facilities for participants). Past experience shows that these local costs are about \$20,000 per workshop; this will be about \$100,000 for five workshops over the life of the project.

Finally, the AMAF will finance special studies that are needed by workshop Task Groups to formulate policy reform recommendations. This will generally be for extraordinary research that might not be covered under AMO's current operating budget. The project is budgeting \$200,000 for these studies over the life of project.

(e) Market Research and Development Fund. To identify profitable opportunities in foreign markets, AMO must visit these countries to assess current market demand for imports and gather marketing information. Hands-on training in the export market is planned. In addition, the fund will support operational activities of an experimental nature e.g., trial shipments and innovative postharvest techniques. To better carry out technical support; "hand on" training and logistical analysis, on a timely basis, AID is budgeting \$455,000.

(f) Evaluation. The project will finance an interim and a final evaluation at a cost of \$100,000 (see Section VIII). Cost estimates are based on (1) obtaining the TDY assistance of qualified AID officers from USAIDs or AID/Washington to head an inhouse evaluation team for the interim evaluation; and (2) acquiring technical services through a contract with a private firm for the final evaluation; the firm would provide a team leader and one other evaluator to work with a locally hired Jordanian consultant and a small team of GOJ and USAID/Jordan officials.

(g). Other Direct Costs and Contingency. The Project Budget combines Other Direct Costs with Contingency. Other Direct Costs covers the unspecified short term technical assistance, equipment, training, and local consultancy needs of the project. These will be more clearly identified after the long-term technical assistance team arrives. Contingency was calculated at approximately 7.5 percent of total direct costs. As stated earlier, no calculation was made for inflation. Allocation from contingency will be on priority basis as stated above.

2. GOJ Inputs

(a) Personnel related costs and operational support. The Project is aimed at the institutional development of the Agricultural Marketing Organization, and thus GOJ inputs consist largely of in-kind contributions of personnel, and related AMO operational support costs. The Dinar equivalent of US\$7.3 million is budgeted for personnel and operating expenses at AMO. In calculating the AMO contribution to the project, the entire AMO personnel and operating costs budget was included (see additional discussion under Budget Implications, Sub-section C of this Section.).

The \$7.3 million was calculated by taking the current personnel and operating expenses for 1988 of US\$1.050 million and increasing this by 10 percent for each of the five years of project life; and then distributing over the five year life of project an additional \$1.37 million, which AMO estimates will be necessary to pay customs duties on imported equipment; and support the project's consultants (e.g., office space, fuel, drivers, and office supplies). Of this amount, \$370,000 is for costs that AMO will incur during the remaining few months of CY 1988; these funds will come from AMO's current budget, as well as from extraordinary additional CY 1988 releases from the Ministry of Finance. Being a new and expanding organization, AMO can reasonably anticipate the 10 percent increases in its personnel and operating budget during the life of project.

(b) Market Research and Development. To enable AMO researchers to travel with foreign counterparts to EEC, gulf region, and Far Eastern markets to conduct demand analyses and related studies, the GOJ will commit the dinar equivalent of US\$500,000. These funds will cover travel, per diems, and research expenses. These funds will be spent during the first three years of the project, when consultants are available to conduct hands-on training and the major demand analysis work should be undertaken and completed. To ensure timely availability of funds, USAID will require that they be deposited annually in a sub-account of the AMAF or in a special fund administered by the Central Bank.

(c) Agricultural Marketing Analysis Fund (AMAF). This is the GOJ's counterpart to the Agricultural Marketing Analysis Fund (AMAF) described above. The GOJ will contribute \$250,000 to the AMAF. Most of this will cover local marketing and policy-related studies. These funds will be deposited in a special fund because AMO will not know for certain until the annual policy planning workshop occurs what studies will be required; and it is doubtful that AMO will have a regular budget for such unspecified studies. Without an accessible source of funds, AMO will be unable to fulfill its responsibilities. The GOJ will make its contributions to this fund during the first three years of project implementation, although expenditures from the fund will occur over the five year life of project.

(d) Training. In accordance with USAID/Jordan policy, the GOJ will provide international transportation for training outside of Jordan; since trainees are presumed to be counterparts assigned to the project, salary and other costs for trainee time are included under personnel costs. Under the project, US\$40,000 is estimated as the cost of all international travel related to long-term and short-term training sponsored. The GOJ is also expected to fund certain other local training, both for AMO staff (e.g., English language training) and for private sector groups (e.g., seminars, workshops, demonstrations, and marketing extension). The estimate for these costs over the life of project is \$80,000.

B. Project Financial Implementation:

This section describes planned implementation methods and input timing to achieve project objectives. During project design the Mission has sought ways to expedite project implementation, especially by reducing the time between project authorization and contracting. The Mission has also used funding from other sources to undertake certain critical pre-project activities. Using its own budget resources, the GOJ has also supported pre-project implementation.

1. Project Implementation Methods:

(a) Expedited Implementation Phase.

Using both PETRA and TSFS Funding, as well as support from the JHAD Project, the Mission has undertaken several activities which constitute expedited implementation. These included a Prices and Incentives Study, a Policy Planning Workshop, a Rapid Reconnaissance of the Marketing System for Fruits and Vegetables, and a Private Sector Training and Observation Tour of four EEC markets. The total cost of this expedited implementation has been approximately \$450,000.

AMO has also performed preparatory pre-project implementation work which will benefit the project. This included: short-term training at the University of Jordan in marketing; preliminary reconnaissance of the market system for fruits and vegetables; a survey of packaging and containers used in fruits and vegetable marketing; and English language training for AMO personnel. The cost of this GOJ expedited implementation probably exceeded \$100,000. These costs have not been included in estimating the GOJ's total contribution to the project.

The Mission plans to contract with a minority-owned business under Section 8(a) of the Small Business Administration Legislation. The Mission will be able to contract directly with such a firm without going through normal competitive advertising and bidding, process. The firms we are reviewing are well qualified to provide the technical assistance required under the project, and USAID is confident that they will do an outstanding job. An AID direct contract through the Small Business Administration with an 8(a) firm will be signed soon after project funds are authorized. The project has budgeted US\$2.7 million for these technical services.

In addition, USAID has already discussed with AID/W officers the types of services required through the AID S&T centrally-funded APAP and AMIS projects and is now preparing preliminary Scopes of Work. APAP consultants conducted last Fall's Prices and Incentives Study and the Aqaba Policy Planning Workshop; AMIS consultants have been working on the Rapid Reconnaissance Study of the Fruits and Vegetables Marketing System and were also involved in the Aqaba Workshop. USAID is confident that they also will do an outstanding job. The mission will issue PIO/Ts for the services accessible through these two projects as soon as funds are authorized. The project has budgeted \$500,000 for this "buy-in".

(b) Main Project Implementation Phase.

(1) Institutional Contracts. As discussed above, the Mission has already identified a number of potential 8(a) firms that will be considered for the main institutional contract for the project. The firms implementing the APAP and AMIS projects have already been selected by AID/Washington.

(2) Commodity Procurement. Vehicles are the only item that the Mission will purchase from the U.S. We plan to contract directly for these from a U.S. dealer in order to expedite arrival of vehicles for the long-term consultants. U.S. Commodity costs are estimated at \$108,000.

(3) Training The Mission will request AID/W International Training Office to contract with Partners to handle participant training planned under the project. We estimate this to be about \$473,000 for long-term training. For short-term training, we will issue PIO/Ps directly to AID/W for contracting with the training institution (e.g., USDA, US universities). The project budgets \$127,000 for short-term training over the course of the project.

(4) Evaluation. The project has scheduled an Interim and Final Evaluation. The project will fund up to two consultants for the final evaluation through an AID direct contract with an appropriate institution. In accordance with Mission policy, this effort will be contracted through a minority business firm.

(5) **Agricultural Marketing Analysis Fund (AMAF)**. This Fund will facilitate GOJ budgeting of policy planning workshops, policy-related analysis, special studies and assessments, and other activities which cannot at this time be specified as to exact costs. The GOJ will contribute the dinar equivalent of \$250,000 over the first three years of project. USAID's contribution of \$800,000 over the life of the project will cover the cost of the AID/W S&T "buy-in" (\$500,000); local costs in conducting the annual policy planning workshops (\$100,000); and special studies and experimentation needed to facilitate policy reform (\$200,000). Since the "buy-in" will be handled by USAID through a PIO/T to AID/W, USAID thus will only contribute \$300,000 directly to the fund. USAID will make annual \$20,000 deposits to the fund to cover the cost of annual policy planning workshops. During the first and second years, we are budgeting \$200,000 to cover studies and experimentation; these funds will be issued as quarterly advances based upon projected cash needs.

2. GOJ Inputs:

GOJ project inputs will be provided through the routine budget process. The GOJ operates on a calendar year basis, with budget requests submitted as of July for the following year. AMO is preparing a budget request for 1989 based upon additional requirements under the project. AMO will receive a separate budget allocation for agreed costs under the project. For costs incurred during the remainder of CY 1988, AMO will have to seek an extraordinary budget allotment from the Ministry of Finance and/or manipulate the remaining funds in the current CY budget. We have estimated this contribution to the project for CY 1988 at \$370,000.

The GOJ contribution to the Agricultural Marketing Research Fund, their counterpart to USAID's Agricultural Marketing Analysis Fund (AMAF), is included as part of the AMO regular budget. In order to "protect" its funding of Export Market Demand Analysis, AMO will include this activity as a "sub-fund" under the Agricultural Marketing Research Fund.

3. Financial Implementation Plan and Assumptions:

The financial implementation detailed in Table 3 shows anticipated expenditures over the life of the project. The financial plan is based on the assumptions given below.

<u>Action</u>	<u>Date</u>
Grant Agreement Signed	30 July 1988
Initial CPs met	15 August 1988
Institutional Contract Signed	01 Sept. 1988
Initial "buy-in" with AID S&T APAP and AMIS Projects	15 Sept. 1988
Commodity Procurement Contract Signed	15 Sept. 1988
Agricultural Mrktg. Analysis Fund capitalized(GOJ)	15 Jan. 1989

4. Relationship of Financing Methods to AID Policy:

The implementation/financing methods described above are generally in conformance with the AID Payment Verification Policy Guidelines. Because the Mission has chosen to utilize a Section 8(a) firm for the institutional contract, a direct AID contract, and not a Host Country Contract, with the selected firm is appropriate. Precise funding mechanisms for the Agricultural Marketing Analysis Component are not finalized but should consist of direct quarterly contributions to the fund; these contributions will be liquidated by appropriate receipts and other documentation.

AID financing and Implementation Methods are summarized below.

Implementation Methods in Base Year Costs \$(000)	Amount
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Technical Assistance:

Direct Contract with 8(a) Firm	\$2,210
"Buy-in" with AID S&T APAP and AMIS Projects	500

Training:

Participant Training - USAID will issue PIO/Ps to AID/W	468
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Commodity Procurement:

USAID direct contract with dealers or Aid direct contract with PSA (Bank Letter of Commitment)	108
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Evaluation:

AID Direct contract or IQC	100
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<u>Agricultural Marketing Analysis Component</u>	300
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Implementation arrangement with MOA (Direct payment)	
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5. Audit and Control Requirements.

(a) Audit

USAID has evaluated the potential risks and assessed its vulnerability given its methods of payment in accordance with Policy Statement #16, as outlined in State 263872 of 5 September 1984 and has concluded that plans for special audit coverage do not at this time appear to be warranted. Accordingly, project funds have not been set aside for this purpose. Should an unanticipated critical need for an audit emerge during project implementation, USAID will use the guidelines contained in State 263872 to request assistance.

(b) Internal Control

Internal control concerns in the AMD project are minimized in that AID resources are used primarily to obtain specific services, commodities and training. Only the GOJ provides funds for operational activities. The exception is the AMAC, for which internal control requirements will be considered carefully prior to specific agreement on procedures.

Proper use and safeguarding of project commodities is also an internal control concern. Project monitoring will ensure that equipment is entered in GOJ inventories and used appropriately. To ensure that full benefit is obtained from investments in equipment, the project will also monitor maintenance and servicing. The GOJ has pledged to make the necessary arrangements to ensure proper physical control and maintenance of vehicles, office equipment, and commodities.

C. Budget Implications For the GOJ

1. Recurrent Costs

The detailed GOJ budget (Table 3) reflects the institution building emphasis of the project. Because strengthened research and private sector promotion capability within the AMO represents a project objective, recurrent costs are an appropriate in-kind project contribution. GOJ Project financing consists of recurrent costs of \$1.3 million in base year terms; in-kind contributions of \$10,000 for trainee transportation costs; and actual cash costs of \$270,000 for the Agricultural Marketing Analysis Fund, training, research, and commodities.

Recurrent costs under the Project represent personnel and operational support (operating expenses) of AMO. A total of 115 personnel will be required at a cost of \$1.05 million. Additional new hiring is planned to cover shortfalls in specialized technical expertise, as well as expansion of AMO activities. Projected annual increments in personnel and operating costs should cover these increases.

In calculating GOJ contributions to the AMD Project, the entire AMO personnel and operating cost budget was included. Obviously, all 115 AMO personnel and their corresponding operational cost support will not be involved full-time with the project, but it is difficult to determine what would be the full-time personnel equivalents attributable to the project. Without the project, we project that AMO's personnel and operating costs would be \$1.3 million. Over the life of the project, the GOJ will actually incur only \$1.3 million in additional personnel and operating costs because of the project. Rather than attempt arbitrarily to calculate a figure, we have decided to include the entire \$7.3 million as the GOJ contribution. While this injects some unrealism in our calculations, it nevertheless underscores the importance we attach to effective operation of the AMO if marketing efficiency is to be improved. A further implication is that without the project's technical assistance, training, and commodity support, AMO will not be able to fulfill its mandate satisfactorily.

Given overall GOJ resources, the recurrent cost burden of the Project is not great. Nevertheless, funding these costs is extremely important to project success and achievement of long-term objectives. First, there will be a continuing need for hiring and retaining technically qualified staff; second, the GOJ must finance the

operational expenses of project initiated activities (e.g., export market demand analysis); and finally the GOJ must make periodic contributions to the AMRF. The government must continue to give relative priority to AMO and its operations and be willing to provide a significant increase in its resource level once the project terminates. The Project Agreement should incorporate specific covenants to address these concerns.

2. Financial Management Implications of the Project for the GOJ

AMO will implement the AMD Project, which will represent an operational subsection of the AMO and be subject to general AMO/GOJ financial procedures, except to the extent that special authorities are granted.

The GOJ uses a centralized accounting and disbursement system. GOJ financing is planned around a calendar year budget cycle. Budget submissions are prepared and forwarded to the Office of the Budget in July for the following year. Operating budgets are broken down by department and cost category, with a separate budget section indicating approved positions. The budget is divided into two major components: current costs and capital expenditures.

Current costs represent normal costs associated with direct operations. The capital budget specifies projects and activities usually of a capital intensive nature. Contract personnel, however, including laborers, and others specifically associated with an approved project, are funded from this budget, rather than the current account. The overall budget is finalized through negotiation and an authorized budget level is provided in time for the new year. AMO would then be entitled to draw funds from its budget allocations.

GOJ budget and disbursement processes have significance for project implementation. The project will have to monitor operating expenses and other expenditures that are part of the GOJ contribution to ensure that they are specified within proper budget cycles and defended if necessary from later reductions. AMO's status as an independent unit with a separate and defined budget will facilitate this planning and monitoring.

The Agriculture Marketing Analysis Fund (AMAF)--the GOJ counterpart to USAID's AMAF--will be used to finance research, experiments, and demonstration efforts within and outside of the GOJ. The funding source for this is the AMO capital expenditure budget. Administration of the AMRF will be handled by the Agricultural Credit Corporation, following the same procedures established for the Agricultural Development Fund (ADF) under the HAD Project. Administration of the ADF has been smooth, and no problems are anticipated under similar procedures for the AMRF.

To ensure proper planning, monitoring, and control of project resources, (AID and GOJ financed), AMO will establish a financial section (accountant/budget specialist and clerical support) within the Office of the Director to provide overall budgeting and maintain the necessary financial records. This will enable the AMO Project Director to ascertain the resources available, plan financially, coordinate fund encumbrances under project financing and review disbursements. This financial function is also necessary to monitor and control costs under the AMAF and the Export Market Demand Research Fund, and to account for commodities supplied by AID.

TABLE 1

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AGRICULTURAL MARKETING DEVELOPMENT PROJECT

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SUMMARY BUDGET (\$000s)

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	<u>USAID</u>	<u>GOJ</u>	<u>TOTAL</u>
Technical Assistance	2,210	-	2,210
Training	600	120	720
Agricultural Marketing Analysis Fund	800	250	1,050
Equipment/Commodities	500	100	600
Personnel & Operating Costs	-	7,300	7,300
Market Research and Dev. Fund	455	500	955
Evaluation	100	-	100
Other Direct Costs & Contingency @ 7.5 percent	335		335
 TOTALS	<u>5,000</u> =====	<u>8,270</u> =====	<u>13,270</u> =====

TABLE 1a
USAID* FOREIGN EXCHANGE AND LOCAL CURRENCY COSTS
(\$000s)

<u>ITEM</u>	<u>Foreign Exchange</u>	<u>Local Currency</u>	<u>Total</u>
Technical Assistance	2,210	-	2,210
Training	525	75	600
Equipment	400	100	500
Ag Mrkt Analysis Fund	400	400	800
Mrkt Research & Dev.	355	100	455
Evaluation	80	20	100
Other Direct Costs and contingency	200	135	335
 TOTALS	 ----- 4,170 -----	 ----- 830 -----	 ----- 5,000 -----

TABLE 2

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DETAILED BUDGET
US CONTRIBUTION (\$000s)

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Technical Assistance

Long-term - 7 person years @ 200,000/yr	1,400
short-term - 4.5 person years @ 180,000/yr	810
Sub-Total	2,210

Training

1 Ph.D. degree @ \$ 68,000/degree	68
Long-term - 8 MS degree @ \$45,000/degree	405
Short-term	127
Sub-Total	600

Equipment

Demonstration Units	100
Vehicles - 6 @ \$18,000	108
Computers, printers, & accessories	75
Information Dissemination Equip.	100
Office equipment (telex, fax, etc.)	40
Miscellaneous	77
Sub-Total	500

Agricultural Mrktg. Analysis Fund	800
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Market Research & Development	455
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Evaluation	100
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Other Direct Costs and Contingency @ 7.5 percent	335
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TOTAL	\$5,000
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TABLE 3

AGRICULTURAL MARKETING DEVELOPMENT PROJECT
FINANCIAL DISBURSEMENT PLAN (\$000s)

	CY	1988	1989	1990	1991	1992	1993
<u>AID CONTRIBUTION</u>							
Technical Assistance	2,210	100	645	660	400	305	100
Training	600	40	100	160	135	115	50
Ag. Market Analysis Fund	800	50	200	175	150	125	100
Equipment	500	60	230	130	80	-	-
Market Research & Dev. Evaluation	455	55	140	130	120	10	-
Other Direct Costs and Contingency @ 7.5%	100	-	-	-	50	-	50
	335		60	50	50	75	100
Total AID Contribution	5,000	305	1,375	1,305	985	630	400
<u>GOJ Contribution</u>							
Personnel & Operating Expenses	7,300	300	1,300	1,325	1,400	1,450	1,525
Training	120	20	25	30	25	20	-
Ag. Market Research	250		100	100	50	-	-
Market Research & Dev. Equipment	500	50	130	100	100	50	70
	100		50	50			
Total GOJ Contribution	8,270	370	1,605	1,605	1,575	1,520	1,595
Total Project Disbursements	13,270	675	2,980	2,910	2,560	2,150	1,995

IV. IMPLEMENTATION PLAN

A. Project Entities.

Following is a brief discussion of the major project participants and their responsibilities. More detailed descriptions of their roles and responsibilities are found in the Administrative and Technical Analyses sections of this Project Paper.

The Grantee is the Government of Jordan, represented by the Ministry of Planning (MOP). The MOP is the government's representative on all AID bilateral projects and is responsible for overall donor and program coordination. The MOP is expected to authorize legal representatives from implementing agencies of this project to facilitate project implementation.

The Agriculture Marketing Organization (AMO), a semi autonomous organization under the Ministry of Agriculture (MOA), will have overall implementing responsibility for the project. AMO will be responsible for a wide range of marketing and market-related activities, from promotion of the private sector to introducing grades and standards and information systems. The Minister of Agriculture is the chairman of the Board of Directors of AMO and thus exercises supervisory control over AMO's operations.

MOA researchers and extension personnel at the National Center for Agricultural Research and Technology Transfer (NCARTT) and its satellite regional agricultural service centers throughout the country will assist in developing and extending fruit and vegetable technologies which will result in increased exports and improved marketing efficiencies. These activities will be coordinated and facilitated through the Jordan National Agricultural Development (JNAD) Project 1/ and the long-term technical assistance team working on that project.

The Agricultural Marketing and Processing Company (AMPCO), an autonomous parastatal commercial trading organization, will also participate in the project, although its role will be limited to export promotion and processing. The Minister of Agriculture is a member of the AMPCO Board of Directors and thus can assist in coordinating AMPCO activities with the project.

AID, the principal donor, will monitor this project in accordance with its responsibilities and regulations. The Monitoring and Evaluation sections of this Project Paper discuss these responsibilities in more detail.

B. Implementation Schedule.

The schedule presented below lists the project's major activities and approximate implementation deadlines. Adherence to this schedule should result in achievement of the project's purpose and objectives by the PACD.

1. Formally the Jordan Highland Agricultural Development Project.

IMPLEMENTATION SCHEDULE

YEAR/QUARTER	
FY88/2nd 3rd	Pre-Project Implementation Policy Planning Workshop Pre-Project Market Reconnaissance Study Pre-Project Marketing Training and EEC Observation Tours
4th	8(a) Set-aside Contractor selected PP completed and approved; funds authorized Pro Ag Signed Vehicles ordered Long-term TA contract signed
FY89/1st	Establish Ag Marketing Analysis Component Conditions precedent met Contractors fielded (3 long-term TA) Buy-in to S&T AMIS and APAP projects completed Short-term training in English for AMO Local computer purchased. Computer training begun Equipment ordered Studies on ACWM, Wholesale-retail sector, etc. begun Follow-up study on Prices & Incentives policy issues Formal organization of Ag. Marketing Association
2nd	Privatization of processing facilities feasibility study Vehicles arrive 2nd Ag. Policy Planning Workshop - begin establishing Market Intelligence System Predictive crop surveys undertaken
3rd	Experimentation in price deregulation on fruits and vegetables Demand analysis studies of EEC begins 2nd marketing training and EEC observation tours Arrival of short-term grades and studies TA
4th	Long-term MS training in US for AMO (1st group) 2nd Prices and Incentives Policy Issues Study Demand Analysis of Gulf Region begins 3rd Training and Observation Tours to EEC 1st marketing training and observation tours to Gulf Region.
FY90/1st	Initiation of domestic marketing information system Domestic Market information system in full operation Arrival of first S-T advisors and consultants experimental dismantlement of cropping pattern

2nd	2nd policy planning workshop Assignment of follow-up research to AMO 4th training/observation tour to EEC market Export Market Intelligence System in place Experimental privatization of processing/packing/grading facilities in Jordan Valley.
3rd	Long-term MS training in US for AMO Long-term PhD. training in US for AMO (2nd group) Introduction of experimental direct selling by producers to institutions, wholesalers, and retailers Introduction of farmers' markets in and around Amman Evaluation of experimental deregulation of prices Obligation of 2nd tranche of AMD Project Funds
4th	3rd Prices and Incentives Policy Issues Study
FY91/1st	
2nd	3rd Policy Planning Workshop Assignment of follow-up research to AMO Departure of L-T Agricultural Intelligence and Agricultural Information Specialists
3rd	Long-term MS training in US AMO (3rd group) 2nd training/observation tour to Gulf Mid-term project evaluation
4th	Completion of long-term MS training in US for AMO - (1st group) 4th Prices and Incentives Policy Issues Study Evaluation of experimental privatization of facilities Evaluation of experimental direct selling & Farmers Markets
FY92/1st	
2nd	4th Policy Planning Workshop Assignment of follow-up research to AMO Departure of L-T COP
3rd	
4th	Completion of long-term MS training in US for AMO - (2nd group) 5th Prices and Incentives Policy Issues Study

FY93/1st

- | | |
|-----|--|
| 2nd | 5th Policy Planning Workshop
Assignment of follow-up research to AMO |
| 3rd | End-of-Project Evaluation |
| 4th | Completion of long-term MS training AMO (3rd group)
Completion of long-term PhD. training in US for AMO |

C. Contracting Plan

Given the magnitude and variety of inputs required for this project, the Mission will use several AID approved contracting modes. The following major contract arrangements are planned.

1. Technical Assistance and training.

As discussed earlier, USAID proposes an AID direct contract with a Minority-owned Business Firm (under Section 8(a) of the Small Business Administration Act) for the technical services and training required under the project. We are very familiar with the work of several capable 8(a) firms from which we will make a selection; we are confident that the selected firm will be able to handle most of the technical services which the project requires. We also plan to obtain technical services available through two AID/W S&T-funded projects, the Agricultural Policy Analysis Project (APAP) and the Agricultural Marketing Improvement Strategies (AMIS) Project. APAP will provide assistance in policy research and reform. AMIS will provide assistance in specialized areas requiring long-term assessment, diagnosis, and experimental intervention (e.g. price deregulation, information systems, and organizing retail and wholesale trade associations). We have already had discussions with representatives from the two S&T projects in regard to coordination between the technical assistance efforts. All parties agree that coordination is necessary and that it can be achieved under the project. The 8(a) firm's chief-of-party will have overall responsibility for coordination among all technical assistance inputs. If additional technical assistance is required, it will have 1st priority on budget contingency funds.

2. Commodity Procurement.

USAID plans to contract directly for the U.S.-manufactured vehicles needed by the project. Other procurement will probably be undertaken locally. In the event that other U.S.-manufactured items are required, the Mission may use a Procurement Service Agent (PSA). The PSA will be under direct AID contract. We will probably use a Section 8(a) set-aside or other minority firm for obtaining the PSA's services. We have had good experience with 8(a) PSA firms and will select from among those we have used before.

3. Project Evaluation

USAID will use a separate direct AID contract for the final project evaluation. It is Mission policy that Section 8(a) or other minority firms are candidates for this activity. We will let this contract on the basis of competitive bidding among a short-list of 8(a) firms. The selected firm will be expected to subcontract with Jordanian consultants in the evaluation.

V. MONITORING PLAN

The AMD project has several "built-in" monitoring arrangements to assist USAID and GOJ stay abreast of progress and developments. Since much of this monitoring and information gathering contributes directly to project interim and final evaluations, it is more fully described in Section VIII, Evaluation Arrangements, of this Project Paper. Traditional AID, Contractor, and GOJ monitoring responsibilities and plans are described below.

A. USAID/Jordan

The Mission will monitor project implementation on a continuous basis and will assign a project officer from the Office of Agriculture and Rural Development for this purpose. In addition, the Mission Controller, Regional Economic Advisor, and the Regional Legal Advisor will be available to monitor, backstop, and support the project. Finally, the project will be subject to the Mission's Quarterly Project Implementation Reviews, will be included in the Mission's new Project Information System (PIS), and will be closely monitored by the Mission's Projects Development Office.

B. Contractor Chief-of-Party Responsibilities and Reporting Requirements

Long and short term U.S. technical assistance will be provided through a contract with an 8(a) private consulting firm. Contractors will be self-supporting and will perform required services in accordance with annual work plans and short-term scopes of work approved by both USAID and AMO.

The contractor will: (a) submit periodic progress reports as determined by USAID; (b) submit all required financial reports to the USAID project officer as provided for in the terms of the technical assistance contract; (c) fulfill all reporting obligations to AMO as called for in the negotiated contract; (d) arrange and deliver to USAID and AMO all required evaluations; (e) furnish reports and information as required under the Mission's PIS; and (f) participate as a member of the Mission's Private Sector Advisory Group of Contractors and Counterparts.

In addition to the long-term technical assistance described above, the project will obtain technical assistance through two AID/S&T Agriculture centrally-funded projects. These will be primarily in the field of policy research and policy reform (see description under Technical Analysis Section), but will include short-term technical assistance of a specialized nature not available from the long-term U.S. contractor team.

AID/S&T TA will review annually the progress made in institutionalizing this policy reform process and will present this review in an annual workshop for high-level policy decision-makers and opinion leaders who are participating in this process. USAID and GOJ project officials will use these reviews as a management tool for monitoring project implementation.

AMO will provide AID with (a) an annual report concerning progress and problems of implementing the project and (b) financial reports, as required, e.g., an annual financial report of MOA/AMO contributions, a bi-annual report on contract research expenditures, and annual in-country training reports.

VI. PROJECT ANALYSES

A. TECHNICAL ANALYSIS

This analysis examines the technical feasibility of project interventions. Specifically, it assesses the feasibility of establishing an institutional and policy framework which will make the marketing system more efficient and allow Jordanian farmers and business persons to exploit profitable marketing opportunities, both domestically and in foreign markets.

1. Institutional Framework.

The institutional framework that the project will develop primarily concerns AMO and its capability of (a) promoting private sector participation in agriculture and marketing; and (b) supporting the policy review and reform process described below. A more detailed analysis of AMO's capability is found in the Institutional Analysis (p. 49). This section will describe the general makeup of this institutional framework and assess the feasibility of sustaining it.

A. Private Sector Promotion

The AMD project will promote an expanded role for the private sector in producing, marketing, processing, packaging, and exporting. The project envisions that this promotion will occur under four broad activities: (1) promotion and training; (2) export marketing intelligence; (3) domestic marketing information; (4) and grades and standards. Each of these is discussed below.

1. Promotion and training.

AMO has already begun assisting private producers and exporters gain access to European Economic Community (EEC) markets. Under pre-implementation funding from PETRA and the JHADP, AMO has trained and sent small groups of farmers and exporters on observation tours to EEC markets (i.e., Paris, London, Amsterdam, and Frankfurt). The objective of the tours was for producers and exporters to experience first-hand the entire export process, from port of entry, through customs, wholesalers, and retailers, to the consumer.

Each touring group has become the in-country Jordanian experts on exporting to the country they visited. They exchange their information and knowledge with the groups who have visited other EEC countries. AMO has organized the four tour groups into an informal association of producers and exporters; several dozen other producers and exporters are also members. The objective of the association is to promote the interests of its members, especially to increase their exports to EEC and other markets. As a result of the tours, several exporters and producers have signed contracts with EEC importers for the export of Jordanian fruits and vegetables.

The association also functions as an advocacy group vis-a-vis the government, especially in regard to changing those policies which restrict the private sector's role in export marketing and other agricultural activities (e.g., processing). The association is achieving some success in obtaining more preferential transport fares from Royal Jordanian, the Kingdom's national airline.

Because of the success achieved in this marketing training and promotion of EEC exports, AMO will begin analogous activities for producers and exporters to the Gulf and Far East markets.

AMO will also conduct extension and training programs to promote an expanded role for the private sector in other marketing-related fields, e.g., packaging, transportation, and processing. While the training format will depend upon the activity and the most appropriate means of achieving the objective, these programs are likely to use outside consultants and observation tours.

Finally, AMO will be active in promoting the leasing and possibly eventual privatization of government-owned processing, grading, and packing facilities in the Jordan Valley. Several of these facilities are under-utilized; others operate at a significant loss. AMO will encourage leasing and divestiture of these facilities to the private sector, either through outright sale or long-term leasing, on an experimental basis. AMO will bring in technical assistance to undertake feasibility studies of this proposed divestiture; and to advise the private sector on management and operation of these facilities once divestiture occurs.

2. Export Market Intelligence and Extension.

To reduce its present surplus of traditional agricultural crops and to increase its exports, Jordan must diversify its production into non-traditional crops -- the so-called exotics (e.g., avocado, asparagus, broccoli, cauliflower, mango, and kiwi).

Given its location and favorable climatological conditions (especially the sub-tropical climate of the Jordan Valley), Jordan has a comparative advantage in producing these non-traditional crops. Before embarking upon nationwide production campaigns for these crops, however, it will be necessary to undertake export demand analysis in the target EEC and Gulf markets. In a formalistic sense, this analysis will identify what fruits and vegetables are now being imported in these markets, from which countries, and in what quantities. The analysis will also estimate near-term and long-term demand trends for each imported commodity. Rough estimates will also be made of the costs of production of competitors (some crops may be heavily subsidized) and these should be compared with estimates of Jordanian costs of production, export, and transportation to determine whether Jordan might be competitive in these markets.

Once the analysis has identified potential market niches, crops will be prioritized into those that can be produced and exported immediately and those for which additional research is required. For the former group, AMO and MOA extension personnel can immediately start production campaigns to get farmers to grow these identified crops. In these campaigns, AMO will emphasize growing the proper varieties and adhering to specific quality, taste, hygienic, and other requirements. Wholesalers and exporters will also be made aware of these requirements, as well as those for grading, packaging, and shipping. AMO and AMPCO will also assist exporters in establishing contacts with importers and in following proper procedures and regulations for exporting to these countries.

For some crops identified as potentially exportable, additional research will be required to determine whether they can be grown successfully in Jordan and what are their real costs of production.^{1/} To accomplish this, AMO will work closely with MOA research and extension personnel in carrying out on-farm research and demonstrations on the feasibility and profitability of growing these crops. If found feasible, these fruits and vegetables too will become the subject of national production campaigns to encourage farmers to grow these crops. Similarly, AMO will extend appropriate assistance to exporters and other businessmen.

^{1/} This analysis would take into account production availabilities from the West Bank/Gaza which meet or could meet in the near future export standards and minimum quantity requirements.

In a practical sense, increased exports to certain markets, though limited, can be achieved much more rapidly than indicated in the above discussion. Through informal discussions with major importers and wholesalers in these target export markets, AMO researchers can discover what commodities are currently in high demand, what is the time frame for this demand, what are the estimates of quantities, and what are the requirements (grades, standards, hygiene, etc). For example, two or three importers might indicate that they each need 400 kilos of grade A long-stem broccoli a week for the next several months. AMO would pass this information to certain producers and exporters who would move immediately to answer the export market's demands. It is likely that some of these early entrepreneurs would be from the association of producers and exporters which AMO has already organized in conjunction with the EEC training and observation tours. These initial respondents to the export market's needs will also serve as effective role models for others who might be interested in exploiting these opportunities. In contrast, the more formal MOA export-oriented production program described above would encourage medium and long-term production and exports and would be directed toward farmers who are more risk-averse.

Much of AMO's market intelligence gathering efforts will be aimed at stimulating crop diversification to address import needs in particular countries. Diversification should not only lead to increased exports but should reduce the excess production of traditional fruits and vegetables. Some of this new, diversified production will find its way onto the domestic market. In fact AMO will encourage domestic consumption of these products through home economics-type promotion campaigns which will introduce the product and educate consumers on how it can be prepared and used in the household. Good experience in this regard has been gained in some of the crop diversification undertaken in the Jordan Valley Agricultural Services Project. Fennel, broccoli, and cauliflower, for example, were introduced and widely accepted by Jordan consumers under this project.

3. Domestic Marketing Information

The project will assist AMO establish a domestic marketing information system, which will gather, analyze, and disseminate information on domestic prices, quantities, and grades and standards for a wide range of fruits and vegetables. AMO will collect this information in the ACWM and other regional wholesale markets on a daily basis; retail prices will also be monitored. AMO will enter this information on computers, analyze it, and disseminate it immediately through daily newspapers, radio/TV broadcasts, and other media sources. In each major wholesale market, AMO will install and operate commodity price bulletin boards (electronic for ACWM, manual for other markets) to report publicly on prices, quantities, and qualities of fruits and vegetables sold in the market.

The objective of the domestic marketing information system is to supply farmers, consumers, and other economic agents with timely information for making decisions about what, when, how, and where to sell or purchase agricultural produce. At the very least, provision of this information will make marketing more competitive by establishing an alternative information channel to the one currently controlled by commission agents.

For longer-term information needs of producers, exporters, and others, AMO will also gather information on future production through small-scale farmer surveys, primarily in the Jordan Valley but also in the highlands. These surveys will solicit information on the crops and quantities that farmers plan to cultivate. AMO will disseminate this information to farmers and others for their future decision-making. Based upon this information a forecasted price range could be estimated reflecting likely supply and demand conditions at harvest time. This forecasted price would help the farmer judge next season's market conditions for his crops and he may revise his own cropping mix accordingly. A simple predictive system such as this would be a significant improvement over the near-total lack of information farmers now receive.^{1/} The project expects that the successful development, testing, and implementation of such a system will eventually substitute for the government's cropping pattern system.

4. Grades and Standards.

A System of grades and standards is required if Jordan is to improve the quality of its produce and gain access to foreign markets. Grades and standards are also necessary to improve the efficiency of the domestic marketing system for fruits and vegetables (e.g., reduce loss and wastage). While international standards must be adhered to by individual producers and exporters, domestic grades and standards are dependent upon deregulation of retail price ceilings, without which farmers have little incentive to grow better quality fruits and vegetables. Price deregulation thus is a prerequisite for a full range of grades and standards.

In the meantime, production for foreign markets will itself introduce the notion of grades and standards to a small segment of producers and exporters. Some of this produce will find its way into the domestic market. Being of higher quality (export or near-export standard), this should command a higher price and begin to alert local consumers of such quality differentiation.

Moreover, an incipient system of grades and standards is already operative. Most retailers, for example, illegally sell better quality produce "under the counter" for higher prices to favored customers. With unregulated prices, higher prices for better quality produce will become an accepted norm. In addition, AMO is already implementing an incipient system of grades and standards by prohibiting farmers to bring to the ACWM produce which does not meet minimum standards.

^{1/} Current information received by farmers consists primarily of the previous day's high and low retail prices as set by the government; and information passed on by commission agents.

Lower quality produce is currently sold at an artificially higher price than it would normally command without the reference retail price system of upper and lower level prices. Without regulation, this lower quality produce will sell only at lower prices. In time a simple but effective three-tier grading system should emerge: high or export quality, medium grade, and low quality, with appropriate prices established by supply and demand for each grade. By reporting prices and quantities of fruits and vegetables in terms of these three grades, the project's marketing information system will encourage and support broad acceptance of this simple grading system by producers, wholesalers, retailers, and consumers.

AMO will work with exporters to increase adherence to export grades and standards and will undertake information campaigns to make farmers, merchants, and consumers aware of this system of grades and standards.

2. Policy Review Framework

For the most part, the technical feasibility of establishing a policy framework for reaching consensus on policy agendas, guiding and directing policy-related research, and formulating policy recommendations for consideration and approval by appropriate decision makers. This process was demonstrated in the pre-project implementation activities which culminated in the January 1988 Policy Planning Workshop in Aqaba. This process will be reiterated annually during the five year life-of-project. To ensure adequate financial support for this mechanism, the project will establish an Agricultural Marketing Research Fund with a capitalization of US\$1.05 million from joint USAID/GOJ contributions.

In brief, the process begins with a policy-oriented study to identify and assess distortions in the pricing and marketing system. These distortions are often the result of inappropriate government policies in light of changing external factors e.g., increased competition from Turkey and rising protectionism in the Gulf countries. Outside researchers from the AID/W S&T Agricultural Marketing Improvement Strategies (AMIS) Project and the Agricultural Policy Analysis Project (APAP) will isolate two or three policy issues for specific analysis. The consultants will distribute a report of their findings to influential government, parastatal, academic, and private sector individuals for review.

These opinion leaders later will meet in a two or three day workshop where the identified issues are thoroughly reviewed and discussed. The objective of the workshop is to reach consensus on the importance of the issues and their inclusion in a policy agenda; to identify additional research that is needed before policy reform recommendations can be drafted; to form task forces to guide and monitor the research and recommendation processes; and finally to submit these recommendations possibly through the Minister of Agriculture to Cabinet for review and approval. The flow chart on the following page diagrams this process.

Participants in the Aqaba Policy Planning Workshop organized themselves into task groups to address the three main policy issues chosen as the workshop's policy agenda, viz., (a) price deregulation, (b) cropping patterns, and (c) competition in the ACWM. The task groups have developed action plans and are now positioning the resources necessary to undertake additional research and to formulate draft policy recommendations. The sections below discuss each of these policy issues in greater detail and assess the feasibility of achieving policy change over the next few years.

a. Deregulation of Fruit and Vegetable Prices.

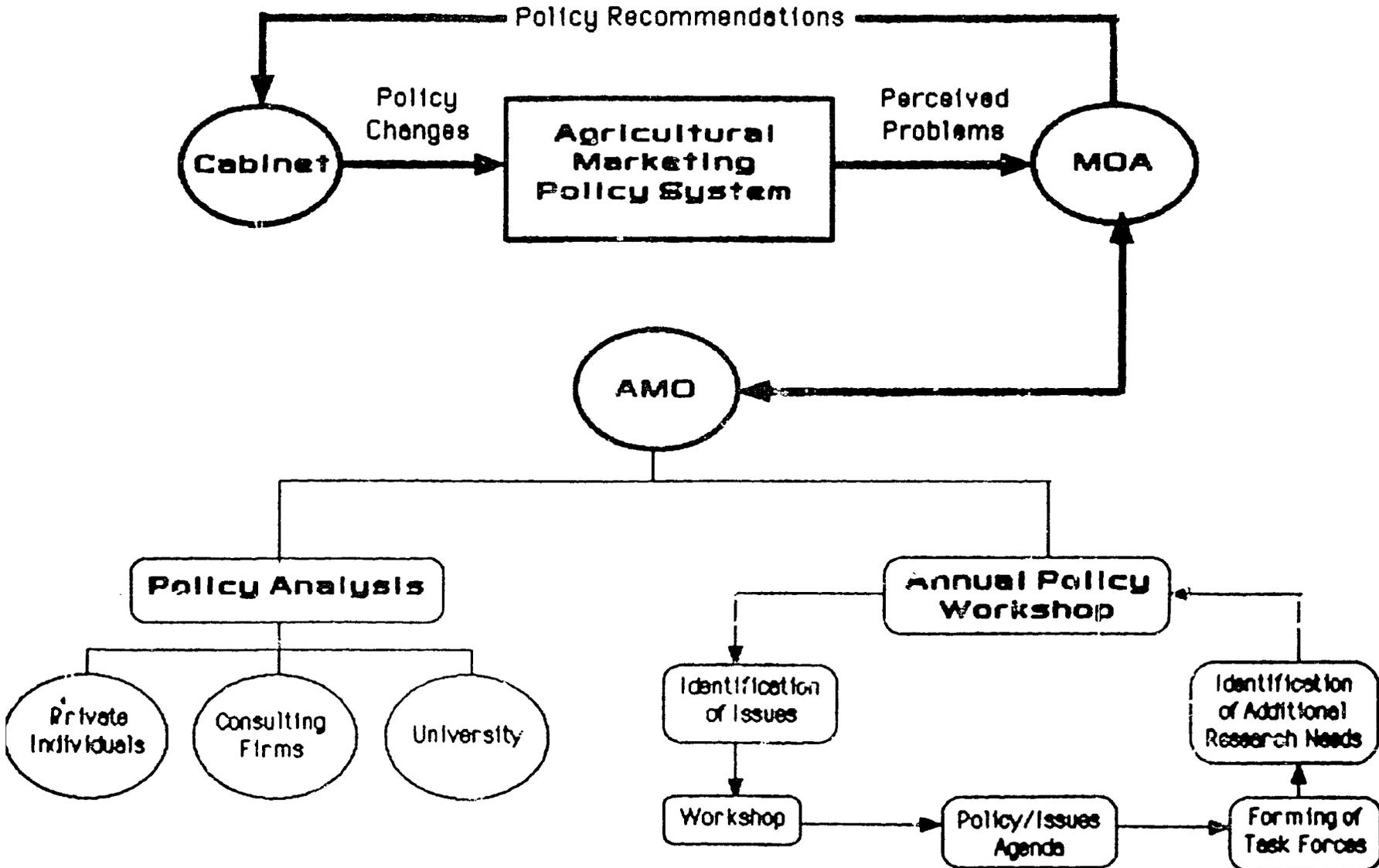
The government regulates retail prices, with a fixed high and low, based upon a somewhat arbitrary mark up of previous day's auction prices from the ACWM. As such, farmers have no incentive to produce top quality produce, either for domestic or foreign markets. The regulation of prices appears to be biased against the farmer because it restricts competition between buyers and sellers of higher quality produce. Further, the regulation of prices is discriminatory against lower income families, who are paying more than they should for poor quality produce, while higher income families obtain higher quality produce for prices that are lower than they would be without price ceilings.

The government recognizes that price regulation is not the best solution to low farmgate prices and in fact temporarily suspended regulation for a few months in 1986. Before the forces of supply and demand could reach equilibrium, however, the government became alarmed at what it perceived to be rapidly rising retail prices and declining farmgate prices and reinstated price regulation. The experiment lasted less than 3 months.

Most officials involved with the aborted deregulation now agree that the experiment was too short to allow market forces to work themselves out; and that the experiment was hastily conceived without adequate thought as to how long it should run, what would be meaningful indicators of success or failure, and so forth. Many of these officials would now like to see another experiment, one that is more controlled and scientific in nature. The Aqaba workshop participants also endorse this thinking.

Under the project, AMO will be responsible for managing an experiment in price deregulation for several fruits and vegetables. If this controlled experiment proves successful, AMO will submit a recommendation through MOA to Cabinet for price deregulation of all fruits and vegetables. This experiment will be initiated during the first year of the project.

**Agricultural Marketing Development Project
Schematic Drawing of the Policy Reform Process**



b. Elimination of the cropping pattern

In order to reduce overproduction, the government currently limits the amount of a farmer's land that can be cultivated for certain crops. While this policy in the short term has reduced somewhat the amount of overproduction, this could probably have been accomplished more efficiently through an adequate information system using sample surveys of farmers' production intentions so farmers could gauge for themselves what crops and in what quantities to produce. A pernicious result of the cropping pattern however is that the government uses extension agents to enforce the system and this undermines the extension worker's effectiveness. Farmers do not view the extension agent as source of technological information but rather as someone to be avoided.

The Minister of Agriculture concurs with this assessment of the cropping pattern system and appears willing to substitute an information system for it if one were already developed and readily implementable. The project will attempt to develop such a system during the first 18 months of project implementation. Establishment of this system will be part of a larger agricultural marketing information system developed under the project (see below), which will deal with collecting and dissemination of information on daily agricultural prices, quantities, and qualities in the central wholesale markets, as well as with marketing information pertaining to export markets. The Ministry of Agriculture, Department of Statistics, and Radio Jordan, among other entities, will be involved in this effort. The JNAD Project has already established the foundation for such coordination between MOA and the media.

c. Improved Competition in ACWM

As mentioned above AMO is participating in a reconnaissance study of the ACWM. According to conventional wisdom there is collusion, cheating, and price fixing in the market, and many farmers are indebted to the ACWM commission agents and thus must sell their crops to them at low prices. While such allegations are commonplace, they are unsubstantiated. The reconnaissance study should at last permit an accurate assessment of the situation. If the study finds that competition is limited, AMO can recommend several steps for improving the situation. The first is to prohibit commission agents from acting as wholesalers/exporters, since buying on their own account is obviously against the best interests of the farmer on whose behalf they are supposed to be selling. Another remedy would be to limit the time period during which auctions can occur. This would result in the presence of more buyers at every sale and would serve to maintain higher prices for the farmer. A third remedy might be to increase the number of stalls in the market to allow for more commission agents and other buyers. In addition, modifications in space allocation or rents based upon stall location within the market would result in more competition.

Not all of these solutions, of course, are immediately implementable. Reallocation of stall space, for example, might take more than a year, but prohibition against combining the roles of commission agent and wholesaler/exporter and compression of the auction time might be accomplished fairly rapidly. AMO will study the situation and recommend the best solutions. In some cases, AMO will undertake limited, experimental reforms before recommending final solutions.

Another attractive solution would be to assist some producers to bypass the ACWM altogether by selling directly to institutions, wholesalers, or large retail shops. This is not done now because large buyers do not have confidence that they can obtain needed produce in desired quantities; they thus rely upon middlemen in the ACWM. But if producers were organized and entered into long term contracts with these buyers, the arrangement would be mutually beneficial. AMO will attempt to facilitate such arrangements between selected buyers and organized producers. AMO will also experiment with establishing farmers' markets in Amman, where farmers could bring their produce for sale directly to consumers and others who would buy at the market.

B. Financial Analysis

This section summarizes the more detailed financial analyses contained in the Economic Analysis section of this paper.

In general, the major project beneficiaries (i.e., producers, exporters, and entrepreneurs) should have sufficiently high financial incentives and suitably timed cash flows that they will be able and willing to participate in the project. For producers, switching from low-value traditional crops to higher value export crops should result in significant increases in returns, in some cases as high as 100 percent. Exporters of these same crops can expect somewhat similar increases in returns. In switching from traditional to export crops, producers and exporters must follow the grading and quality standards and other requirements imposed by the importing markets. This will usually entail greater care, and hence higher costs, in harvesting, cooling, packing, storage and transportation. These additional costs, which should not be prohibitive even for small farmers, can be easily offset by the higher margins obtained on higher-value export crops.

The financial feasibility of certain new technologies or business undertakings (e.g., automated field grading, specialized packaging, processing, pre-cooling, and the use of shrink wrap) has yet to be demonstrated in Jordan. As part of its mandate to promote private sector participation in all phases of fruits and vegetables production, processing, and marketing, the Agricultural Marketing Organization (AMO) will conduct experiments and research to ascertain the appropriateness and financial feasibility of these innovations. If they are profitable, AMO will undertake extension activities (i.e., demonstrations, information campaigns, and training) to encourage farmers, entrepreneurs, and others to adopt them.

In order to convince people to adopt these innovations, AMO will strive to achieve returns of at least 30 percent over current crop production, processing, and marketing methods. Recent research seems to indicate that 30 percent is the minimal increase that must be obtained to get farmers to accept new methods.

C. ECONOMIC ANALYSIS

Introduction

The Agricultural Marketing Development (AMD) Project is economically feasible and should benefit farmers, consumers, and business persons, as well as improve national income. Jordan currently faces tremendous surpluses in the production of traditional fruits and vegetables. Although domestic consumers will continue to be Jordan's largest market, it will be necessary to increase exports, either in the Gulf region or in new markets such as the EEC, if the country is to narrow its supply-demand gap. Jordan has a comparative advantage in horticulture, and thus any increase in production and exports of fruits and vegetables makes sound economic sense. The AMD project builds upon this economic advantage by promoting diversified agricultural production and increased exports.

1. Projections of Supply & Demand for Fruits and Vegetables.

According to Ministry of Agriculture estimates, Jordan in 1986 produced 1.1 million tons of vegetables, citrus, and other fruit. Of this total, 390 thousand tons or 35 percent were exported. Domestic consumption (with no allowance for waste) stood at 809 thousand tons, including 79 thousand tons of imported fruits and vegetables.

In the next five years some 132,000 dunums, representing some 58 percent of the current total irrigated area in the Jordan Valley, are either to be converted from surface irrigation to pressurized irrigation or newly brought under irrigation. The conversion from surface to pressurized irrigation systems is assumed to double yields. Based on past trends, vegetable yields are projected to increase by 4% annually. Regression analysis of fruit yields over the past twelve years reveals little growth; consequently, fruit yields are projected to remain at current levels. Assuming the above, plus a slight shift from historical observed crop allocations, total fruit and vegetable production should increase to 1.6 million tons, equivalent to a 6 percent annual increase. Based on average 1986 Amman wholesale prices, this production is valued at JD 217 million.

Growth in domestic demand for fruits and vegetables is governed by the rate of increase in population (i.e., the number of consumers), levels of economic activity, and elasticity of demand for fruits and vegetables with rising income. In their recent study of Jordan Agricultural Policies Abt Associates developed two alternative scenarios to evaluate the probable growth in domestic demand. The high value scenario assumes annual GNP growth of 5.8 percent, a population growth rate of 3.8

percent, and an income elasticity of .65 for fruits and vegetables. The low value scenario assumes annual GDP growth of 4.1 percent (which in fact has been unattainable over the last several years), population growth of 3.1 percent, and an income elasticity of .25 for vegetables and .35 for fruits. These alternative projections of domestic demand and residual exportable surplus are shown in the table below.

SUPPLY & DEMAND PROJECTIONS
(JD Millions, at 1986 prices)

	DEMAND		SUPPLY	EXPORTABLE SURPLUS	
	High	Low		High	Low
1987	114.9	114.9	151.4	36.5	36.5
1992	164.7	135.6	217.0	52.3	81.4

Under the high value scenario, the exportable surplus constitutes 24 percent of the value of total production, the same proportion as currently. Under the low value scenario, domestic demand grows more slowly, and the surplus available for export is larger, equivalent to 38 percent of the value of total production. Based on these projections, it is clear that domestic consumers will continue to comprise the principal market for Jordanian fruit and vegetable producers, but the volumes available for export will also increase.

Projections of supply and demand developed on the basis of Department of Statistics agricultural production and trade data reach similar conclusions. On the basis of these projections, Tech International in its Jordan Valley Impact Assessment suggests that the horticultural supply-demand gap could be closed over the next eight years, provided exports are maintained at current levels. Nonetheless, the report's authors caution that ultimate success in Jordan Valley agriculture is inextricably linked to Jordan's ability to consolidate and possibly expand its external markets.

2. Jordan's Comparative Advantage in Fruits and Vegetables.

Jordan enjoys a comparative advantage in horticulture production, as clearly demonstrated in the above cited policy study by Abt Associates. The Abt consultants developed a domestic resource cost (DRC) analysis for tomatoes, eggplant, squash, cucumber, potatoes, and onions, using production cost data from crop budgets developed by the Arab Organization for Agricultural Development, the Jordan Valley Agricultural Services Project, and the German Technical Assistance Agency (GTZ). Abt adjusted the financial prices in these crop budgets to economic prices by valuing water at its economic cost and by removing import taxes from chemical and other input prices; for the border price, Abt used as the five year weighted average f.o.b. export price of the lowest priced regional competitor as shown in FAO data.

The DRC ratios obtained on the basis of these data were all below 1, indicating that Jordan enjoys a comparative advantage in the production of these representative vegetables. Given this advantage, interventions which support further production and exports make good economic sense.

3. Economic Benefits from the AMD Project

Fundamentally, the AMD project is aimed at improving farmer income through diversification. The AMD project promotes diversification in several ways: (1) by producing non-traditional, high value crops and varieties; (2) in timing production to meet consumer demands when supplies are seasonally low and prices accordingly higher; (3) by producing for different markets, both domestic and export; (4) by marketing different qualities with commensurate price and return differentials; and (5) through multi-cropping to spread risk and optimize farmer returns. More detail on this diversification is given below.

The project will improve the flow and quality of domestic and export market information so that producers will be alerted to profit opportunities in producing non-traditional crops and new varieties rather than market-saturated traditional crops. On average over the period 1974-1985, the four main vegetables of tomatoes, eggplants, squash, and cucumber were planted on 55 percent of land devoted to horticultural production. In addition to gaining higher returns from non-traditional crops, some shift away from the four main vegetables is expected to lend some firming to prices for these vegetables, enhancing returns to farmers who continue growing them.

Better market information should also allow farmers to produce for times of the year when prices are high because of low market supplies. Farmers would gain from higher prices, while consumers would benefit from greater availability of fruit and vegetables during off-seasons. The scope for such diversification is very large. To take but one example, in 1987, the wholesale price for sweet pepper ranged from a low of JD 60-70 per ton in November and December to a high in excess of JD 200 per ton in January through March.

Diversification to export markets will be facilitated by market analyses of import demand for fruit and vegetables in neighboring countries, the Gulf, and the EEC and dissemination of that market intelligence to farmers. The project will also promote diversification to alternative domestic markets by broadcasting information on price, quantity and quality trends from the Amman, Irbid, Zarqa, and other regional wholesale markets, and encouraging use of alternative market channels, such as farmer markets. Farmers can thus take advantage of arbitrage opportunities that may arise among the differing market outlets. In addition, through this enhanced market competition, consumers will benefit as prices become more equal across markets.

The project will help the market develop easily recognizable quality differentiations with commensurate differences in prices. This will furnish low income consumers access to lower quality produce at a lower price, potentially increasing demand and farmer income from sales to this consumer segment. Equally, consumers willing to pay for quality produce will now have opportunity to purchase such produce, thereby increasing benefits to consumers. Moreover, farmers and market agents will be given adequate incentive to produce and sell for this higher quality market, with corresponding higher returns for farmers. The development of better quality fruits and vegetables will also serve to strengthen Jordan's competitive position in regional markets and increase export revenues.

Farmers examine alternative opportunities not only in relation to the level of return from a single crop but also in relation to the entire usage of land, labor requirements, and risk. Thus while new crops or production at different times may not in themselves guarantee higher returns, informing farmers of alternative opportunities allows them to spread the risk of crop failure or low market prices over a wider range of possibilities. Equally, better market information may allow the farmer to use his land and labor resources more intensively for returns closer to the optimal.

Overall, the project will enhance market competition, which in turn improves the efficiency of the domestic marketing system and reduces marketing costs and wastage. Reduced costs should result in (a) lower prices to domestic consumers; (b) increased domestic demand for fruits and vegetables; and (c) higher revenues for farmers. This assumes a price elasticity of demand of unity or greater, which is usually the case for fruit and vegetable demand in the Middle East; demand for traditional crops, however, is saturated and currently inelastic. Further production of these traditional items and the consequent drop in prices would depress farmer incomes. The opposite would be true for other kinds of fruit and vegetables. Lower marketing costs should also enhance the competitive position of suppliers of Jordanian fruit and vegetables in export markets.

Reliable crop production data for non-traditional, high value crops is not available, and hence, firm estimates of project cost-benefit from promotion of such crops cannot be developed. However, as outlined above, the project aims at achieving higher farmer income and greater consumer utility through more than simple diversification to new high value crops. To illustrate the range of economic return to the project, the following assumptions have been made:

1. the project, through the various types of diversification and improved market efficiency outlined above, will by year 1992 (year four of the project) result in some increase in the average fruit and vegetable price received by farmers;
2. volumes produced in 1992 and 1993 will be the same as those projected in the Abt Associates study; and
3. the price increase would last for two years only.

If the increase was only 1.12 percent of the weighted average 1986 Amman wholesale market price of JD 133.2/ton, the project's internal rate of return would be 15 percent.

4. AID/W PP Design Concerns: Economic Analysis.

During review of the Agricultural Marketing Development PID, AID/W found that additional analyses on new higher value, non-traditional crops would be necessary at the PP design level to assess both supply (agronomic) and demand (both domestic and foreign) potential. Furthermore, AID/W stated that the PP should include an implementation schedule that would provide for testing these supply and demand projections in early stages of the project.

On the supply or agronomic side, the just completed Jordan Valley Agricultural Services Project has demonstrated the potential for a variety of new crops. Specifically, the project identified, introduced, and demonstrated a variety of alternative vegetable crops including fennel, lima bean, red cabbage, kohlrabi, broccoli, Chinese cabbage, and lettuce. In addition, experimentation and demonstrations were conducted for alternative fruits including guava, papaya, improved dates, avocado, and low-chill peaches and nectarines. The project was sufficiently confident of the agronomic potential of some of these that extension fact sheets were prepared and distributed to farmers describing site selection and soil requirements, recommended varieties, propagation, timing and methods of field planting, irrigation, fertilizer, and pesticide requirements, weeding and/or pruning, and harvest techniques

and timing. Factsheets were prepared for: fennel, asparagus, broccoli, sweet potatoes, guava, low-chill peaches and nectarines, papaya, mango, avocado, and strawberry. By making operational the Deir Alla applied agricultural research and extension station in the Jordan Valley, the JVASP has assured a continuing capability to identify, experiment, and demonstrate new vegetable and fruit crops as well as different varieties of such crops. In sum, the agronomic potential for alternative non-traditional fruits and vegetable crops has been demonstrated and capabilities are in place to identify and demonstrate additional alternatives and varieties.

With respect to demand for high value, non-traditional crops, the project schedules for early completion an intensive demand analysis of neighboring, Gulf, and EEC countries to identify fruits and vegetables that might be produced and exported profitably by Jordanians. Unmet domestic demand for high value non-traditional crops is substantial. Of the new crops introduced under the JVASP, fennel, red cabbage, Chinese cabbage, broccoli, kohlrabi, strawberries, and to a far lesser extent, celery, have been successfully marketed commercially in the past three-four years. Prices received for some of the newer crops indicate a very high consumer willingness to pay; in 1987 average monthly wholesale prices for strawberries ranged from a low of some \$3/kg. to \$6/kg. While reliable data on returns gained from cultivation of new, non-traditional crops is generally not available, farmer surveys in 1987 were conducted for some eleven field grown vegetables, including strawberries. This survey revealed that cultivation of mallow yielded the highest gross margin at JD 7,230/ha., while strawberries furnished the second highest at JD 4,590/ha.

The recent rapid growth in sales of green peas, a vegetable new to the Jordanian diet, is an example of potential domestic demand for new crops. In 1980, green peas were available at the Amman Wholesale Market only two months -- April and May -- and only 142 metric tons were sold. By 1987, green peas were first delivered to the Amman Wholesale Market in January and last deliveries extended into June, a six month as opposed to the initial two month marketing period. Moreover, by 1987 the volume sold had expanded by six fold to nearly 1,000 metric tons and the wholesale market value of these sales had increased from some \$70,000 to over \$500,000.

5. Policy Determination 15. Assistance to Support Agricultural Export Development, and various Statutory Requirements.

The AMD Project is designed primarily to improve the marketing system of fruits and vegetables by establishing an institutional and policy environment that will allow Jordanian farmers and businessmen to exploit profitable marketing opportunities. The emphasis of the project will be on improving domestic marketing efficiency by carefully testing and introducing institutional and policy change. The project does not focus directly on the production of any particular agricultural commodity, though of course there may be an impact on food self-reliance and international trade as a result of improvements in domestic marketing.

The project will attempt through its export market demand analysis component to identify market niches which Jordan might profitably exploit. Enhancement of export prospects of certain commodities, however, should not adversely affect U.S. exports. In the Gulf region, for example, which is Jordan's major export market, the U.S. now has only a minor presence. Jordan will continue to export mainly traditional fruits and vegetables to the Gulf and these are different than those commodities the U.S. is currently exporting there. Much of the focus in the Gulf will be on identifying ways in which Jordan can regain its lost market share through improvements in quality, packaging, and varieties, as well as lowering costs of production to be more competitive. In the EEC, Jordan's market share is currently negligible, with only limited prospects of expansion. Most of Jordan's exports to the EEC either would be different from U.S. exports or, because of the Jordan Valley's sub-tropical climate, would be entering the market at a different time.

USAID will carefully monitor the identification of export niches for Jordanian products under the project and will discourage production of commodities which adversely affect U.S. exports. Jordan currently does not export fruits and vegetables to the U.S., nor are there any significant plans to begin doing so.

D. SOCIAL SOUNDNESS ANALYSIS

1. BENEFICIARIES.

The AMD Project's primary beneficiaries are the kingdom's 20,000 fruit and vegetable farmers, who should see their household incomes increase by at least 30 percent over the life of the project.^{1/} Other beneficiaries will include approximately 2,000 wholesalers, exporters, and entrepreneurs who should receive increased profits through expanded business opportunities. Finally, consumers should find both increased quality and a wider variety of fruits and vegetables at various prices appropriate to their respective income levels and tastes.

2. SOCIO-CULTURAL FEASIBILITY.

Jordan's fruit and vegetable farmers have demonstrated consistently over the last 20 years that they are market-oriented and will respond rationally to timely and appropriate incentives regarding the quantity and quality of produce. What has been lacking of late, and what this project will attempt to establish, is a policy and institutional framework which will allow farmers and entrepreneurs to take advantage of profitable domestic and export marketing opportunities. Wider private sector participation should result ultimately in increased marketing efficiency.

There are few if any socio-cultural constraints inhibiting the responsiveness of Jordanian farmers and entrepreneurs to profitable opportunities. This is amply demonstrated by the rapid adoption of drip irrigation and plasticulture by Jordanian farmers during the early 1980s; and the equally rapid acceptance and use of agrochemicals and other modern inputs.

Today's marketing problems result largely because farmers do not receive appropriate and timely price signals, for either the domestic or export markets. Absence of price signals has resulted in a large overproduction of traditional fruits and vegetables. Farmers continue to produce these crops because they lack reliable information about potential markets for non-traditional crops that are not in surplus.

Current prices inadequately reflect supply and demand because they are regulated by the government. Further complicating this picture is the government's buying of certain crops (e.g., tomatoes) at fixed or floor prices, which encourages farmers to continue growing these crops. A final distortion in the system is the government's cropping pattern system which is used to regulate the amount of land that can be devoted to producing a certain crop. The cropping pattern not only artificially restricts production and farmers' choices, but results in a misallocation of resources. Once distortions are removed and price signals flow freely, Jordanian farmers and entrepreneurs will respond to take advantage of profitable business opportunities, just as they did in the past. This return to a freer, market-driven agricultural economy should usher in a new era of growth and development for Jordanian agriculture.

1/. The 1986 National Housing Survey estimates that 40 percent of rural households in Jordan earn \$4,500 per year or less.

3. SPREAD EFFECTS.

(a) Replication.

The AMD project is a national project, with no pilot area. All farmers and all business people should theoretically have more or less equal opportunity to benefit. Acceptance and responsiveness, however, will likely be gradual. At the individual level, farmers should emulate those cultivators who have already benefitted through appropriate responsiveness to market and price signals. Similarly, wholesalers and exporters should also follow the lead of those who benefit from the new market environment.

At the institutional level, the AMD project will focus on improving the efficiency of agricultural marketing by improving the policy and institutional environment. The policy planning process or mechanism to be institutionalized under the project could serve as an effective model for other Ministries or sectors. These ministries could all benefit by adopting this planning process in order to improve the policy environment and facilitate achievement of ministry objectives.

(b) Sustainability.

The key to sustaining the AMD project is the effectiveness and viability of the policy planning workshop process. This mechanism formulates the policy agenda, guides and directs required policy-related research and studies, and submits recommendations regarding policy through the MOA to Cabinet for approval. There is general consensus that the policy environment needs improvement. Disagreement exists in regard to what aspects of the environment are most critical and have top priority.

4. PROJECT IMPACT.

The general socio-economic impact of the AMD project is positive. Farmers today face low prices because of overproduction. The project will promote more profitable responses (e.g., diversification) to economic conditions. All farmers will benefit from this. Additional costs incurred in diversifying current fruit and vegetable production should be minimal; if production loans are required they are readily available through existing government agricultural credit programs which are geared to small farmers.

Even those who continue to grow traditional fruits and vegetables and do not diversify should benefit from the project. First, all farmers should benefit to some degree from deregulation of prices and the establishment of a simple grading system with appropriate prices for each grade. This should result in increased total farm income. Second, diversification promoted by the project should result in diminishing the present overproduction problems, which in the long run should bring about a modest firming of prices for these commodities. Finally, by making the overall marketing system for fruits and vegetables more efficient, marketing costs and margins should decrease significantly. Some of these reductions should find their way back to the farmer in terms of higher farm-gate prices, thus increasing total household income.

There are no clearly identifiable farming groups whose socio-economic position would be diminished as a direct result of the project, with the possible exception of a few farmers who already have begun to diversify, have managed to identify a market, and are making a good profit due to their early exploitation of the market. These few farmers will see their pioneering profits reduced as competition increases. But other market opportunities, with equally high profits for early risk takers, should also present themselves.

Some commission agents, wholesalers, and other middlemen operating in the market place allegedly have been engaging in unfair competition (e.g., auction price fixing, collusion, and cheating). Research is

ongoing to determine the nature and degree of competition in the ACWM and other markets. Regardless of the findings, the project will seek policy and regulatory reform which results in expanded and sustained competition in these and other markets. Consequently, if there has been unfair competition, those involved will find their economic advantages undermined by the project as increased competition occurs; if the research finds that competition has not been unfair, certain middlemen and exporters will nevertheless still find their margins under pressure due to the increased competition the project will encourage. These business persons will either have to become accustomed to lower profits or find additional ways to compete (e.g., by offering a wider, better range of marketing and non-marketing services).

Consumers should benefit overall from the project's promotion of retail price deregulation. By allowing prices to be determined freely by market forces, increased variety and quality of produce in the market should result. Analysis shows that low-income households currently pay more for low quality produce than they would under a free market situation; the minimal floor price keeps prices for these lower quality items artificially high. The reverse of this situation is that high income families obtain produce for lower prices than they would under a free market system; in this case, price ceilings keep the prices of better quality produce lower than it should be. With price deregulation, lower income families, if they desire, will be able to purchase lower quality fruits and vegetables for appropriately lower prices than today; similarly, higher income families will have available higher quality produce at correspondingly higher prices. The point, of course, is that in a free market system, consumers can buy whatever quality produce they desire for the best price that they can get.

5. WOMEN IN DEVELOPMENT

Jordan, because of its modernization, urbanization, and educational development, has fewer cultural biases against women participating in public life outside the home than most other Muslim countries. For example, 78 percent of urban women attend high school and 37 percent attend college (significantly, these rates are the same for males in corresponding age groups). These more educated women are increasingly found in public and private sector employment, especially in the services industry which employs more than 65 percent of the total labor force. Agriculture and marketing, however, are not areas where women are manifesting high participation.

Most women working directly in agriculture are members of farming families who help out during peak labor demand periods, are engaged in backyard gardening or supplementary agricultural activities, or are hired laborers. These women are generally from resource-poor families who if their socio-economic position improved would likely cease to allow their women to do agricultural work. Women are also conspicuously absent from marketing roles (e.g., commission agents, wholesalers, retailers, and exporters). Women in fact often are not even buyers of fruits and vegetables in the market (this is frequently a male task). Some observers contend that this absence of females may account for the poor quality of produce found in the market.

In contrast, women are prominent in the processing industry. The AMPCO tomato processing plant in the Jordan Valley, for example, employs women workers almost exclusively. Many of these women are young, single, and from poorer households. Improvements in marketing efficiency should lead to the establishment of more processing, grading, packaging, and other types of post-harvest enterprises which will provide increased job opportunities for women. The AMD Project will promote the development of these enterprises and will strongly advocate female participation in training programs oriented toward agrobusiness.

E. INSTITUTIONAL ANALYSIS

The Agricultural Marketing Organization (AMO) is the implementing agency for the Agricultural Marketing Development Project. AMO is a newly reorganized, semi-autonomous parastatal under the Ministry of Agriculture (MOA). The Minister of Agriculture is the Chairman of the AMO Board of Directors and thus exercises indirect control over the organization. Other members of the AMO Board include: under-secretaries of the Ministries of Supply, Industry and Trade, Occupied Territories, and Finance; Directors General of the Jordan Cooperative Organization and the Agricultural Credit Corporation; and private sector representatives. The high level of representation on the Board from various ministries should facilitate inter agency cooperation and coordination.

AMO is mandated to undertake the following:

- i. provide analyses and recommendations regarding marketing policies;
- ii. develop and introduce quality control programs and set specifications for products and consumers;
- iii. develop and maintain a market information system for domestic and export markets;
- iv. assist in maintaining and developing export markets; and
- v. conduct studies and research related to all of the above and to disseminate research results through marketing extension activities.

AMO's organizational structure reflects the above functions. There are directorates for Research and Market Information; Marketing Services; Quality Control and Marketing Facilities; Marketing Supervision; Coordination and Public Relations; and Administration and Finance.

The AMO staff consists of approximately 115 employees, including 32 professionals. AMO Directorates are headed by specialized technical staff who have sufficient marketing experience to perform their responsibilities. Many of the subordinate technical staff, however, are new recruits and lack experience and specialized skills. Under the project, technical assistance, short and long-term training, and commodity support will be directed toward improving the capabilities of this technical staff to carry out the AMO mandate. Under separate pre-project funding (Technical Services and Feasibility Studies Project), USAID has sent 29 AMO technicians to a special one month marketing orientation course at the University of Jordan.

AMO is a new organization, having been officially established only in April 1987. Its track record thus is not long enough for a thorough administrative analysis. Nevertheless, based upon our dealings with AMO during the design of the AMD Project, our observations of their work to date, and reports from consultants who have worked with them, we are confident that AMO can satisfactorily fulfill its implementation responsibilities under the AMD Project. In lieu of a more rigorous analysis, the following paragraphs relate the evidence on which we base our opinion of AMO's capabilities.

In September 1987, USAID commissioned Dr. Richard Schermerhorn of the Post-Harvest Institute of Perishables (PIP), University of Idaho, to undertake an institutional analysis of AMO.^{1/} Schermerhorn examined AMO's organizational structure and staffing in terms of both AMO's mandate and the functions required of AMO under the AMD Project. In general, he found that AMO was well-organized and staffed for their mandate and responsibilities under the project. He noted the technical staff's inexperience but believed this can be addressed through project-funded technical assistance and training. Schermerhorn made several recommendations to AMO for improving their organizational structure and these have been adopted. Since this institutional analysis, Schermerhorn has returned to Jordan on two assignments (the Policy Planning Workshop and the Marketing Reconnaissance Study - see below) and thus has had the opportunity to monitor AMO's early institutional development. He feels that AMO is rapidly becoming a professional marketing organization that will be capable of undertaking its responsibilities under the project. He is impressed with the advancements made in only six months. In his words, AMO has evolved from a small group of technicians and a few desks into a coherent organization of professionals with a sense of direction, enthusiasm, and dedication.

1/ Richard Schermerhorn, 1987, Institutional Analysis of the Jordan Agricultural Marketing Organization.

In November 1987 a consultant team from ABT Associates came to Jordan to conduct a study of Jordan's agricultural policies. The team worked closely with several AMO researchers and praised their skill-level and enthusiasm. In January, the ABT Associates team returned for the Agricultural Policy Planning Seminar in Aqaba. AMO representatives again worked closely with the ABT team and participated actively in the workshop discussions. AMO representatives made a good impression on all participants at the workshop, and the role of AMO in policy research was strongly affirmed. An indication of their increasing esteem is that a representative from AMO was placed on each of the Policy Task Groups established at the workshop.

AMO has also been working closely with Sigma One consultants in planning, organizing, and conducting training and EEC market observation tours for private sector producers and exporters. The consultants have been pleased with AMO staff's capabilities and are confident that AMO will be able to conduct such training and tours on their own in the future.

In addition, AMO has been undertaking the preliminary research and preparations for a major rapid reconnaissance of the marketing system for fruits and vegetables. A team from PIP is supervising the study, and reports to date indicate that AMO has performed in a dedicated, highly professional manner.

Finally, AMO has just completed an independent study of all public and private sector concerns involved in packing and container manufacturing. AMO will use the results of this survey to establish standards for container and packaging facilities in Jordan.

While we are confident that AMO can carry out its mandate and fulfill its responsibilities under the project, we believe that any organization can improve its management effectiveness. We had a chance to prove this in our JNAD Project, where we funded management skill training for upper echelon project personnel (Director, Deputy, and Division Heads). As a result of the training these MOA managers work together more closely as a team, have a sense of purpose and esprit de corps, and have become more effective. We intend to emulate this management skill development by bringing back the same consultant to work with AMO management.

F. ENVIRONMENTAL CONSIDERATIONS.

In the Project Identification Document (PID) for this Agricultural Marketing Development Project, USAID's Environmental Office determined that the project qualifies for a categorical exclusion from formal environmental review procedures and that no further environmental impact assessment would be required. AID/W approved this decision for categorical exclusion.

VII. CONDITIONS PRECEDENT AND COVENANTS.

A. Conditions Precedent.

Prior to the first disbursement under the Grant, or to the issuance by AID of documentation pursuant to which disbursement will be made, the Grantee will, except as AID may otherwise agree in writing, furnish to AID in form and substance satisfactory to AID the following:

(a) An opinion of counsel that this Agreement has been duly authorized and/or ratified by, and executed on behalf of the Grantee, and that it constitutes a valid and legally binding obligation of the Grantee in accordance with all of its terms;

(b) A statement of the name of the person holding or acting in the office of the Grantee specified in Section 8.2 of the Project Agreement, and of any additional representative together with a specimen signature of each person specified in such statement.

Disbursement for Technical Assistance, Training and Equipment

Prior to disbursement under the Grant for technical assistance, training and equipment, the Grantee will, except as the parties may otherwise agree in writing, furnish to AID in form and substance satisfactory to AID evidence that the Agricultural Marketing Organization has identified staffing and budgetary resources for the first year of the project.

Disbursement under the Agricultural Marketing Analysis Component (AMAC).

Prior to disbursement under the Grant for AMAC the Grantee will except, as the parties may otherwise agree in writing, furnish to AID in form and substance satisfactory to AID:

(a) Evidence that its counterpart to the AMAC, the Agricultural Marketing Analysis Fund (AMAF) has been duly established and that adequate mechanisms and operating procedures have been developed to utilize and administer the Fund.

(b) Evidence that the GOJ has provided its base year contribution of \$.250 million equivalent in Jordan Dinars to the AMAF.

B. Covenants

The Grantee covenants as follows:

1. That the Agricultural Marketing Organization (AMO) will maintain a technically qualified, full-time Director to interact effectively with Project and donor agency expatriate staff and keep abreast of technological development in the field of agricultural marketing. The AMO Director shall be granted full authority to manage and administer the project.
2. That AMO agrees to place all project-financed vehicles and equipment under the supervision and control of appropriate AMO staff and that these vehicles and equipment will only be used in carrying out Project operations. They may not be transferred or used elsewhere on non-Project related activities without USAID's prior written consent. The AMO agrees that Project vehicles will be made available to Project personnel on a timely basis through the issuance of suitable license plates, by permitting "self drive" by technicians, or by other appropriate arrangements. Operating expenses and maintenance for all project vehicles and equipment will be provided by GOJ.
3. That AMO will reassign returning long-term trainees to positions and at salary levels commensurate with their experience and training and will require terms of employment for a period at least twice the period of their training.
4. That adequate budgetary and manpower resources will be provided in a timely manner for the period of the Project.
5. That the Post-Harvest Laboratory and other facilities of the MOA/NCARTT relevant to achieving the objectives of this project are made available to AMO personnel on a timely basis.

VIII. EVALUATION ARRANGEMENTS

The AMD Project strives in general to enhance market efficiency of fruits and vegetables by improving the institutional and policy environment. Progress toward meeting this goal will be monitored carefully throughout project implementation. Information collected as part of the monitoring process will be accumulated and will serve as focal points for later evaluations. The paragraphs below describe in general these monitoring efforts, the type of information to be gathered, and how the evaluations will be handled.

A specific concern of the project is to reduce Jordan's current surplus and to increase its exports of fruits and vegetables to the Gulf region. The key is to diversify production away from traditional crops and into non-traditional "exotic" crops, for which Jordan has a comparative advantage. Under the project, AMO will conduct demand analyses for each of Jordan's present and potential export markets to determine which fruits and vegetables Jordan could profitably produce and export to these markets.

Progress toward achieving this diversification and resulting increase in exports can be easily monitored during project implementation. Good data are generally available from either MOA or Department of Statistics on varieties and areas for various fruits and vegetables. Taking statistics from the 1987/88 crop year as the base line, progress can be measured from year to year. Similarly, good statistics are available on exports (varieties and volumes) to both the Gulf and EEC markets. In terms of monitoring and evaluation, the project will look for improvements in overall exports to these markets as well as an improved mix, i.e., increased proportions of non-traditional fruits and vegetables to these markets. To measure success in promoting private sector exports, the project will seek increases in exports to EEC markets undertaken by the private sector, with a corresponding decrease in the share exported by AMPCO, the government marketing parastatal. As described earlier, government policy distortions contribute significantly to Jordan's market inefficiency. The AMD project's policy reform component aims to improve this policy environment. Our hypothesis is that if influential government leaders become aware of the negative impact and high costs of certain policies, have sound information regarding alternative policies, and have a clear idea of how to implement policy reform, then they will do so. Our previous experience with the Aqaba Policy Planning Workshop and our ongoing policy dialogue efforts gives us confidence in this premise.

To improve the agricultural marketing policy environment, the AMD Project will replicate the successful Aqaba policy review and planning process. The AMD project plans to hold at least five policy planning workshops to review progress on formulating policy reform recommendations and to update the AMD project policy reform agenda (adding new reform items, deleting those that have been solved or are no longer appropriate). One of the AMD Project's main objectives is to institutionalize this policy planning and reform process in order to improve the policy environment and thus allow farmers and entrepreneurs to take advantage of profitable marketing opportunities.

Consultants conducting the annual studies and workshop will also be required to assess the progress in institutionalizing this process (e.g., agreement on the policy reform agenda, formation of task groups, managing and conducting of policy-related research by AMO, and formulation of policy reform recommendations). They will review their observations and findings with USAID and GOJ project management. Modifications or improvements in the institutionalization of this process will be based upon these annual reviews.

Successful policy reform can be assessed fairly easily. Each year policy issues or problem areas are identified and prepared for discussion at the annual workshop. The workshop will establish the annual policy reform agenda on which it will work over the coming year. At any time progress in policy reform can be assessed by examining the extent to which the policy reform agenda results in actual policy reform. While it is quite likely that full achievement of some policy reform may require one or more years, instances where policy reform agendas fail consistently to result in policy improvements would indicate that the process is not being institutionalized properly. Alerted to this, project management could take necessary steps to get the process back on track.

The PID Approval Cable (State 54545) for this project, requested that the Mission clearly describe the policy agenda and indicate benchmark changes by year. The policy review and planning process discussed above and in other sections of this paper, however, is a rolling process and is not amenable to application of strict benchmarks and time frames. The initial Aqaba workshop established a policy agenda with three priority areas: price deregulation, dismantling of the cropping pattern, and improved competition in the ACWM. During the course of the project new issues will be added to this agenda and old ones deleted.

It is our experience that policy reform is a long-term process, requiring continuous dialogue and persuasion. Actual reform, however, often hinges on personalities, circumstances, and fortune. A good example of such capriciousness is the removal of retail prices for three months in early 1986. Given this situation, the best that can be expected is GOJ commitment to an annually updated policy agenda on which the project will focus its efforts. We will of course try to achieve the desired reform as quickly as possible, but placing time frames or deadlines on this process is unrealistic.

The project will have one interim evaluation and one end-of-project evaluation in the final year. The interim evaluation is scheduled for FY91 and the final evaluation for FY93. The project budget provides \$100,000 in base year costs for these two evaluations.

Evaluation design rests on the understanding that the Agricultural Census, JNADP survey efforts, and additional survey reports by the University of Jordan, DOS, and other organizations will provide most of the baseline information required. Any significant information gaps could be met during early stages of implementation by JHADP or AMO special research studies.

The interim evaluation will focus on implementation problems and make recommendations for mid-course corrections. This evaluation will examine the progress in achieving the project's major outputs: namely, an institutional capability of AMO to promote the private sector, support the policy planning process, and carry out its other marketing responsibilities; and the establishment of a viable policy planning mechanism. The interim evaluation will focus on the objectively verifiable indicators for achieving these outputs and will also assess the contribution of outputs to achieving the project purpose. Progress in this regard can be measured by examining project purpose indicators and the extent of accomplishment as of the mid-term evaluation.

The final evaluation will attempt to determine project impact on marketing efficiency through establishment of an improved institutional and policy framework. This evaluation will place major emphasis on assessing the extent to which the policy review, research, and reform process has been institutionalized. It will also assess the development of AMO's capability to assist and support this process. The final evaluation will build on the findings of the interim evaluation, looking again at achievement of outputs in terms of verifiable indicators and attempting to ascertain project impact on target beneficiaries.

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