

PROJECT PROPOSAL

Cotton Production Prospects for the Next Decade

CFC/ICAC 01

PROJECT APPRAISAL BY THE MANAGING DIRECTOR

TITLE OF THE PROJECT:	Cotton Production Prospects for the Next Decade (CFC/ICAC 01)
SPONSORING ICB:	The International Cotton Advisory Committee (ICAC)
DURATION:	Two Years
LOCATION:	Brazil, China, Egypt, India, Mexico, Pakistan and Tanzania
NATURE:	Study on Productivity and Quality Improvement and Environmental Protection
TOTAL COST:	SDR 651,799 ¹ (USD 885,416) (six hundred fifty one thousand seven hundred and ninety nine SDRs)
CFC FINANCING:	SDR 445,927 (USD 605,756) (four hundred forty five thousand nine hundred and twenty seven SDRs)
CO-FINANCING:	SDR 202,835 (USD 275,536) (two hundred two thousand eight hundred and thirty five SDRs)
COUNTERPART CONTRIB.:	SDR 3,037 (Three thousand and thirty seven SDRs) from sponsoring ICB
EXECUTING AGENCY:	The World Bank
STARTING DATE:	July 1, 1992

¹ Exchange rate at March 13, 1992: 1 SDR = USD 1.35842

I. PROJECT BACKGROUND AND DESCRIPTION

A. The context within which the project has been formulated:

1. As a major cash crop for smallholders, as a major source of employment for farmers and workers in the textile and apparel industries, and as a major foreign exchange earner from exports of cotton and cotton products and byproducts, cotton has a vital multi-sectoral role in the economies of many developing countries. Cotton seed oil is the second most important vegetable oil after soybeans as a source of protein for human consumption and animal feed. Although the performance of the cotton industry varies from country to country, the general trend around the world is thought to be one of experiencing a number of strategic problems. In the last decade, the competitiveness of cotton vis-à-vis synthetic fibres and the profitability of cotton industry, even in those countries where the industry had shown dynamic development in recent years, have suffered a decline. The strategic problems facing the industry include rising costs of inputs, declining yield and quality due to weaknesses in varietal maintenance and water salinity and water logging problems in irrigated plantations, decline in the real price of cotton, comparatively increased returns from competing crops and food crops, and growing environmental concerns, particularly among donors, on the excessive reliance on the use of chemical pesticides and the resulting environmental damage. Given the vital role the cotton industry plays in the economic development of many developing countries, timely adjustment is considered necessary. To this end, the project envisages case studies to be made on the cotton industries of Brazil, China, Egypt, India, Mexico, Pakistan and Tanzania. Each of these countries face different strategic problems which may provide insight into the problems and lead to technical or institutional innovations that could enhance the competitiveness and profitability of cotton production and processing which could be streamlined into future investments.

B. The Objectives of the Project:

2. The project sets as an objective the examination of the strategic problems facing the target countries and outlining the opportunities for promising prospects. The study will focus on government policies influencing patterns of development and the adoption of technology, farm-level productivity and the efficiency and effectiveness of processing and marketing operations. In this regard, case studies of technical and institutional innovations which had impact on the competitiveness and profitability of cotton production and processing is foreseen.

C. Brief project activities and outputs:

3. Country studies will be undertaken by domestic research organizations with the assistance of international consultants, as needed. Study coordinator and international consultants will visit the target countries to follow-up implementation of the study, the

study will be synthesized in one report and the final version will be published. Workshop and seminar are envisaged to review the findings.

D. The immediate beneficiaries of the project - countries and target groups:

4. The immediate beneficiaries of the project are the target countries. Ultimately, the target countries will benefit from the follow-up actions including new investments and from improved cotton production technologies and policy and management innovations to be adopted in the short-, medium- and long-term which could result in reducing unit cost of production of cotton and enhance efficiency and competitiveness. Global environmental benefits could also accrue from the judicious use of pesticides.

E. Other potential beneficiaries:

5. The results of the study will be widely disseminated and benefits will trickle down to other cotton producing countries.

II. PROJECT JUSTIFICATION

A. Relevance of the envisaged project activities to the needs of the commodity:

6. The project activities are relevant to the needs of the commodity in as much as it aims at innovative means of enhancing the competitiveness of the commodity and introducing new technologies and processes that reduce cost and enhance efficiency. The project will eventually have global impact on the commodity when the results of the study are widely applied.

B. Developmental impact of the project in socio-economic context:

7. Given the multi-sectoral nature of the cotton industry, as a major cash crop of smallholders, a valuable foreign exchange earner for the producing countries, as an important source of human and animal nutrition as well as provider of urban and rural employment, improvements in the production and processing of the cotton industry will have significant socio-economic development impact.

C. Feasibility of the project - economic and technical:

8. The project has been appraised by an external consultant and the conclusion of the consultant is that the project has three strong points which justify implementation. Firstly, the project has the potential of presenting in an accessible form "a comprehensive survey of state of the art information and trends for the nineties on the supply side of the cotton industry which is useful as a background and guidance for policy decisions by four groups of actors, namely the donor community, the public sector, the private sector and the scientific community. Secondly, the organization of the study is well thought out with distinct separate roles for in-country specialists, the World Bank staff, external consultants and ICAC. Thirdly, the issues of sustainability of production, need for skilled manpower, effects of substitution and quality assurance have been adequately covered by the project.

The consultant also considered the project to have some weak points and recommended the following:

- "(i) To reduce the risk of ending up with a study which is too general to be of use to policy and decision makers, the ICAC and World Bank should formulate a comprehensive list of concrete strategic production problems that will have to be solved during the nineties and a set of research questions and activities which can generate the information needed for strategic decision making; a detailed table of contents for the final study report, a workplan for follow-up activities to propagate the results of the study;
- (ii) The final selection of the case study countries should be made on the basis of considerations regarding information needed for the research priorities. The study should in one way or another also analyze the experiences and ongoing research and development activities in: the USA, Uzbekistan and Kazakhstan in the C.I.S., French West-Africa and Zimbabwe in Southern Africa.
- (iii) Given the expected difficulties of collecting data from national experts in Tanzania, it is recommended to drop Tanzania from the case study list. Alternatively the WB staff could cover Tanzania through a review of existing reports prepared for the World Bank and for the Dutch government. The resources that would thus become available can then be reallocated to include Uzbekistan as a case study. This state is undoubtedly of more strategic importance for coming to grips with the production prospects and challenges for the nineties.
- (iv) The importance of cotton seed for planting and oil milling is not adequately covered in the project proposal. Both from the breeding point of view and from sector financial viability point of view, the oil extraction rate (milling propensities) are of significant importance. This should be given due attention in the study.
- (v) Strategic decisions are taken not only on the basis of technical but also on financial appraisal of the prospects of the investments. Therefore, it is essential that at least a working hypothesis on world market price developments is made, and that this hypothesis is used to assess in the synthesis report the challenges in the nineties for financial viability in the case study countries, and in the rest of the producing regions. In this respect, an effort should be made to assess the development in the average unit production costs in the USA (FOB east coast), during the nineties and to use this figure

as the main working hypothesis for the development in the average world market price facing the other producing countries in the nineties.

- (vi) To avoid a conflict of competence between the WB staff appointed as principal co-ordinators (2) and the external study co-ordinator, the terms of reference for the principal co-ordinators and for the study co-ordinator are prepared before the start of the study."

To the above comments and recommendations, the sponsoring ICB has given the following response:

"The Appraisal Report prepared by the Netherlands Economic Institute is an excellent document which will make a significant contribution to the development of the project, particularly during the first phase, involving the selection of the principal coordinators and the preparation of the coordinator, consultant and Country Terms of Reference.

The recommendations made are noted and are clearly of prime importance. Specifically:

- (i) A draft "questionnaire" was prepared and put to the test in a recent study conducted by GTZ/KfW Appraisal Mission on a cotton study in Egypt. This will provide the basis for the compilation of the list of strategic production problems and for future research. At this stage it would be unwise to restrict the contents of the final report unduly without knowing what is likely to come from country studies. The present proposals for follow-up activities to propagate the results of the study are contained in Objective 2 on page 9 of the Project Proposal. These proposals will be reviewed during the initial phase of the project taking into account the Bank capabilities for information dissemination.
- (ii) The original proposal submitted to the CFFC contained only four study countries, the USA, China, India and Egypt. There was some criticism over the inclusion of the USA as any study in this country would be to collect information only and would not lead to investment. There was also a recommendation that the scope of the study should be expanded to six countries and that it should include a less developed country with smaller production. The USA was dropped and Pakistan and Mexico were brought in with Tanzania as the smaller producer. Subsequently, Brazil was added as a representative of South America. The World Bank project staff will play a key role in collecting, reviewing and analyzing data relevant to the study priority questions. This will include a review of relevant publications and other information from Bank sources including the USA, French West Africa, Zimbabwe, Uzbekistan/Kazakhstan/CIS etc. The important contributions of the IRCT not only in West Africa but also in Latin America, the Middle East and South East Asia, particularly in plant breeding, will take an important contribution to the study.
- (iii) The recommendation of conducting the study of Tanzania in the form of a review of existing reports and substituting Uzbekistan in the detailed study would require careful consideration.
- (iv) The quality and genetic purity of planting seed is one of the key components of cotton production and has become a limiting factor in many countries. This will be a major component of the study. The point made in this recommendation regarding seed utilization and oil extraction is well taken. The utilization of surplus seed, ginnery waste

and cotton stalks is mentioned under (f) Product Development and Marketing on page 6 of the proposal. The importance of cottonseed as a source of oil and protein and the utilization of these products in the study countries requires emphasis.

- (v) The emphasis in the study has been on technical rather than economic aspects of cotton production but the recommended hypothesis on world market price developments should be taken into account, using Bank and other resources.
- (vi) The terms of reference for the principal coordinators and external study coordinator will be prepared at the time of appointment in the first phase of the study."

D. Sustainability and expected result at the end of the project including property rights:

9. The findings of the project will be published and disseminated as widely as possible. However, the follow-up of the project's findings will depend to what extent policy reforms are undertaken and investments are mobilized from the private and public sectors.

E. Conformity with CFC policies and guidelines:

10. The project's objective of reducing unit costs of production and hence promoting the competitiveness of the commodity, adoption of new technologies and prevention of environmental deterioration as well as increasing the incomes of rural and urban families engaged in the industry is consistent with the policies and priority guidelines of the Fund.

F. Environmental impact:

11. As has been referred to earlier, one of the objectives of the project is to reduce environmental pollution by inappropriate application of pesticides. Among the subjects of the study are the problems of salinity and waterlogging associated with irrigation, the results of which could contribute to improving ecological deterioration.

G. Risk factors:

12. No major risk factors are anticipated. However, delays could happen due to problems associated with recruitment of consultants, simultaneous submission of country reports as well as inadequate coverage of report as per terms of reference.

III. PROJECT MANAGEMENT, SUPERVISION AND EVALUATION

13. The project is to be executed by the World Bank. This is believed to provide the Fund with valuable experience in collaborating with the World Bank. The Project Executing Agency being also the co-financier of the project, it would be an opportunity to start a collaborative venture between the two financing organizations. The International Cotton Advisory Committee (ICAC) will be the Supervisory Body.

IV. THE PROJECT BUDGET

14. The project's total cost is given to be SDR 651,799 (six hundred fifty one thousand seven hundred and ninety nine SDRs). Of this total, the Common Fund is expected to finance the equivalent of SDR 445,927 (four hundred forty five thousand nine hundred twenty seven SDRs), and the balance of SDR 202,835 (two hundred and two thousand eight hundred and thirty five SDRs) is to be co-financed by the World Bank and the equivalent of SDR 3,037 (three thousand and thirty seven SDRs) will be the counterpart contribution by the International Cotton Advisory Committee, the sponsoring ICB.