

**STRENGTHENING OF INLAND FISHERIES INFORMATION SYSTEMS
IN THE LOWER MEKONG BASIN (BASINWIDE)**

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PROJECT SUMMARY

1. INTRODUCTION

The inland fisheries of the Mekong River basin represent a vital resource with significant economic value. Current production of fish from the region is estimated at possibly one million tons annually with a national monetary value of around US \$750,000,000. Of this total, only about 10% arises from aquaculture, the remainder is produced by an extremely diverse and complex capture fishery operating in one of the world's most productive aquatic ecosystems. In order to sustain these production levels, better informed policy decisions are required. The need to have data and information on various aspects of the capture fishery and aquaculture in the region is being recognized. Improved fishery statistics and information systems will monitor the trends in the fishery and promote improved management of the resource.

The present inland fishery statistical systems for the riparian countries of the lower Mekong River basin are extremely poor, except for Thailand, and has not been useful for the sound management of the resources either on a national or regional (basin-wide) basis. The purpose of the current project is to rectify this situation. A basin-wide fishery statistics and information system will be developed based on the concept of capacity strengthening in each riparian country. National statistical systems will be fortified, primarily through training programmes and the inputs of improved methodologies, appropriate computer software programmes and necessary computer hardware. The data collection and storage systems developed will be enhanced by training in data analysis and the presentation of results to, and consideration by, appropriate decision makers. The objective is to make each country self-sufficient in these respects and the priority will be sustainability of the system. Regional management programmes will be strengthened by improved regional statistics and information systems.

The lack of reliable statistical data for the inland fisheries of the Lower Mekong Basin was raised during the Review of the Fisheries Sector in the Lower Mekong Basin in 1991-92. The review concluded that "Improvement of the basic data must therefore have a high priority for all agents interested in the development of the sector". This review was endorsed during the 1994 Regional Workshop on Fishery Information and Statistics in Asia, partly in response to the issues raised in Agenda 21 of The United Nations Conference on Environment and Development (UNCED) and The Study of International Fisheries Research (World Bank et al).

The project benefits from considerable inputs into the area of data collection and analysis, training and infrastructure development, undertaken by previous and on-going programmes, in particular those associated with the Mekong River Commission Fisheries Management and Development Co-operation Programme.

The current project will draw upon the experiences, methods and progress of these other initiatives and will concentrate on how to develop a sustainable statistics and information system after these other projects have been completed. To a large extent, this project forms a climax of achievement under the regional fisheries programme, the objective of which is to promote "sustainable use of the economic and nutritional potential of the inland aquatic resources of the lower Mekong basin".

External inputs shall be about US \$2,384,120 over a three-year period. Major inputs include technical assistance, short-term consultancies, computer software and hardware. The project has a very heavy institutional capacity strengthening commitment through training. The considerable degree of prior inputs into this technical area will significantly enhance the prospects of success of the project.

2. REQUIREMENTS

Needs for statistical data

- a) managing appropriate revenue generating activities
- b) monitoring trends in the fishery
- c) monitoring the state of the environment
- d) developing and implementing appropriate management policies
- e) basin-wide management considerations

Basic requirements for data analysis and information systems

- a) appropriate data collection,
- b) safe and effective data storage systems,
- c) effective and efficient analyses of the data that relate to the goals and functions of the statistical data system
- d) dissemination of the results and/or implications of these results to the necessary users of the information so generated
- e) feedback mechanisms from the end users to the collectors, compilers and analyzers of the data
- f) detailed records of fish production included

Fishery data required

- a) records of fish production in the required detail
- b) export and import data for fishery products both by region (Province etc.) and nationally

Basic approaches to data collection

A necessary data collection system will normally involve three basic activities:

- a) a large scale and intensive survey of the fishery to establish the characteristics of the fishery and the importance of the fishery including its status in the national economy.
- b) current (monitoring) programmes for selected aspects of the fishery, useful for indicating trends and other features of the fishery,
- c) less frequent follow-up surveys or census activities

3. PROJECT OBJECTIVES

The Development Objective of the project is identical to the immediate objective of the Mekong Fisheries Programme:

Sustainable use of the economic and nutritional potential of the inland aquatic resources of the lower Mekong basin.

The project will contribute to the fulfillment of the Development Objective through the Immediate Project Objective, which is:

Improved and basin-wide compatible inland fisheries data for the lower Mekong basin available for the riparian Governments and the MRC, for fisheries management, planning and policy formulation purposes.

4. OUTPUTS

In order to achieve the Immediate Objective, the following outputs are required:

- (1) *A database on national Mekong basin capture and culture fisheries established and maintained in each of the riparian countries.*
- (2) *A regional database on Lower Mekong basin capture and culture fisheries established and maintained.*
- (3) *National institutions responsible for inland capture and culture fisheries data collection, storage, processing, analysis interpretation and dissemination strengthened.*

5. STRATEGY

The project should begin in a timely fashion that will allow maximization of the benefits on the experiences from previous MRC Fisheries Projects (particularly the Management of the Freshwater Capture Fisheries of Cambodia, and the Assessment of Mekong Fisheries - Fish Migration and Spawning and Impact of Water Management). Such a strategy will help both maximize the efficiency of technical assistance inputs of the recommended project and help increase the benefits of these other initiatives.

Taking into account the financial situation of the various riparian countries, the shortage of skilled manpower, and the difficulties encountered in mobilization, the project will balance the need for statistical information against the costs and operational constraints encountered. Therefore, the aim will be the design and establishment of a sustainable set-up at the lowest operational cost possible. It is essential that the riparian countries can sustain the programme from their own resources at the end of the project, the single most important factor. The statistical systems developed will have to be compatible with statistical systems in operation, or being developed, for other sectors of fisheries, particularly in Thailand and Vietnam where production from the Mekong basin represents only a minority of total national production. The system will also, as far as possible, be compatible between the four riparian countries, thus enhancing the ability to analyse data on a basin-wide approach. The systems should also be compatible with international fishery statistics. The project will cooperate actively with existing projects or new initiatives covering these areas including those dealing with associated statistical and information systems (e.g., for agriculture) in each riparian country and on a basin-wide basis.

Training is the main component, and will include routine data collection, sampling surveys, and data processing, analyses and interpretation and the dissemination of information to the appropriate quarters. This will be backed-up with the supply of modest amounts of computer hardware and appropriate software programmes.

The project, which is planned for a period of 36 months, forms an integral part of the MRC Programme for Fisheries Management and Development Co-operation, which was recommended by the representatives of the riparian line agencies for fisheries at the Second Regional Seminar on Fisheries Management and Development Co-operation in the Lower Mekong basin in Bangkok, 15-16 August 1996. As part of the Programme it is coordinated with a number of MRC fisheries research and management projects. It is planned, under the Programme Component for Strengthening of Fisheries Institutions, which has the long-term Objective of "National fisheries institutions meeting the needs for fisheries sector planning, research and management, and supporting a sustainable development of the fisheries sector also through a basin-wide co-operation".

The project has further been included under the SIFR Strategy for establishment of fisheries information systems in Asia (SIFR 1995). It falls well within the mandate of the Mekong River Commission as a basin-wide project contributing to the coordinated development of the shared natural resources of the Mekong basin.

PROJECT IDENTIFICATION

Project Title : Strengthening inland Information Systems in the Mekong Basin (basin-wide)

Country or Region : Cambodia, Lao PDR, Thailand and Viet Nam

Sector : Fisheries

Duration : 36 months

Starting Date : End of 1998 (tentatively)

Project Main Office : Thailand

National Inputs : USD 219,000 (in kind)

External Contribution : USD2,348,120

Status : Project Document Appraised; seeking funding

Project Description : The Project aims on establishing a common system for collection, processing, analysis and application of fisheries data adopted and in use in the four countries of the lower Mekong basin. The outputs include compatible and sustainable fisheries statistics and information systems in each riparian country enabling a basin-wide management approach. Information systems components, including system design, sampling procedures, computer hardware and software systems and capacity for data analyses and information dissemination will be strengthened. The inputs comprise technical assistance: Long-term: 36 m-m; short-term: 30 m-m; riparian support staff: 120 m-m. Computer hardware and software, office equipment, training, surveys, transportation.