Workshops in Latin America: User-friendly Aquaculture Investment and Management Tool for Small- and Medium-scale Farmers

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As part of the programme "Regional and National Workshops on Aquaculture Planning at the Farm Level in Africa and Latin America", two workshops were recently conducted in Paraguay (March 2-4, 2010) and Costa Rica (March 15-17, 2010). The goal of the workshops was to conduct field evaluations of the "User-friendly Aquaculture Investment and Management Tool" developed by the Aquaculture Service (FIRA) of the FAO Fisheries and Aquaculture Department.

The above "Tool" is an interactive, user-friendly model designed within Excel which enables users to conduct a complete financial analysis of a proposed or already-functioning aquaculture operation. The "Tool" was designed in such a way that it requires no previous knowledge of economic concepts or advanced skills in the use of spreadsheets. When used properly, the "Tool" may provide valuable assistance to small- and medium-scale aquaculture producers for improving the financial management of their operations.

Briefly, it consists of a series of linked worksheets within a spreadsheet file. The first four worksheets ask from the user input data on production and economic characteristics of the aquaculture operation, including size of the farm, number of ponds, stocking densities, food conversion ratios (FCRs), survival rates, price of fingerlings and feeds, selling price, etc. The model also requires an estimate of the investment required to build the facility, including construction of grow-out units (e.g. ponds) and purchase of land and machinery. Based on the information provided, the last four worksheets of the model will produce a series of standard financial forms (enterprise budget, income statement, balance sheet and cash flow budget) that may be used to compile a business plan and support an agriculture loan application for the operation. The "Tool" also offers customized advice to the user based on the results of the analysis.

This "Tool" was initially designed for the analysis of pond-based aquaculture, but further models will be developed to cover cage aquaculture and hatcheries.

The "Tool", developed in 2009, has been subjected to a series of field evaluations in a number of countries. During 2009, training workshops were conducted in Cameroon, Madagascar, Senegal, Sierra Leone, and Zambia. The participants in each country included aquaculture producers, government officials with responsibilities in aquaculture development, members of academia and representatives from local NGOs and the agricultural banking sector.

Paraguay and Costa Rica were selected as the field-testing countries in Latin America. The workshop in Paraguay was jointly organized with the Department of Aquaculture, Ministry of Agriculture and Livestock and took place at the computing facilities of the National University of Asunción. The workshop was attended by 36 participants. The workshop in Costa Rica was jointly organized with the Institute of Fisheries and Aquaculture (INCOPESCA) and was held at the Hotel Clarion Amón Plaza in San José. Twenty-nine participants attended the workshop.

In general terms, the "Tool" was very well received in each of the countries where it was presented. Participants rapidly learned how to interact with the "Tool" in an effective manner and realized the many ways the model could help them improve the management of their operations. Participants provided useful comments and suggestions that will be used to improve various aspects of the "Tool". Based on these modifications, a final version will be released and posted (in English, French and Spanish) on the FAO Fisheries and Aquaculture Department website during the second semester of 2010. For further information, please contact the above authors via e-mail.