Implementation of the Code of Conduct for Responsible Fisheries in the Marine Fisheries Sector

Purwito Martowardoyo


1. Introduction

The adoption of the Code of Conduct for Responsible Fisheries (CCRF) in 1995 marked the new era for the fisheries sector in the context of sustainable development. Failures in coastal overfishing and habitat degradation in many parts of the world contributed to the holdings of various regional and global meetings and workshops leading to the birth of CCRF.

The Code provides principle and international standards of behavior for responsible practices with a view to ensuring the effective conservation, management, and development of living aquatic resources, with the respect for the ecosystems and biodiversity. Among the 10 objectives listed in the Code, two are foremost important and relevant to the present workshop: (1) it establishes principles and criteria for the elaboration and implementation of national policies for responsible conservation of fisheries resources and fisheries management and development, and (2) serves as an instrument of reference to help States to establish or to improve the legal and institutional framework required for the exercise of responsible fisheries and in the formulation and implementation of appropriate measures.

The CCRF advocates responsible manner in the development and management of the aquaculture and in the capture fisheries sector. The Code addresses both sectors, it spans from the harvesting, processing to the marketing and trade of the fishery products. As the fisheries sector does not stand alone, it is a source of potential impact to other sectors while others, at the same time, could also adversely impact the fishery sector: the Code addresses this kind of interrelation and promotes the integration of fisheries into coastal area management. To facilitate better understanding of the Code, FAO developed various guidelines elaborating main articles in the Code. These include guidelines on fishing operations, on fisheries management and on inland fisheries to name a few. In response to the needs of developing countries, FAO also had developed interregional programs that were distributed to donor agencies following the endorsement of the Code for financial support. So far only Bolivia that has responded to the proposed programs by providing assistance in the form of project entitled "Provision of Scientific Advice to Fisheries Management" and "Strengthening of Monitoring, Control and Surveillance."

Volume 3 Number 3 April 2003

435
not specifically addressing the proposed international progress, a number of developed countries also facilitated the implementation of the Code through provision of technical and financial support for the holding of various discussions and workshops leading to the development and completion of various guidelines of the Code.

In the implementation of the Code, a number of countries have put their efforts and facilitated the translation of the Code to local languages, organized public awareness campaign through a series of seminars and workshops. A regional fisheries organization in Southeast Asia (i.e. SEAFDEC – Southeast Asia Fisheries Development Center) has also provided assistance in organizing regional meeting to address regionalization of the Code. In the meantime FAO has been invited to promote the implementation of the Code and present the report to the bi-annual meeting of FAO Committee on Fisheries (COFI). Review of the implementation of the Code in Bangladesh has been reported to the last COFI meeting in 2001 is integrated in Doublmine’s paper presented at this workshop.

The complexity of the fisheries sector and coupled with inadequate capacity of the individual countries in applying the concept of sustainable development constitute to the present situation of COSE implementation in the region. The governance system also plays a significant role in the implementation of the Code in the individual countries.

The present paper addresses the implementation of the Code in the context of developing countries and with reference to marine fisheries sector. It is in this context that status and trend of the marine fisheries sector in the developing countries in the South and Southeast Asia is presented here as a background information for the subsequent discussion concerning issues and problems confronting the implementation of the Code.

2. A short note on the status and trend of marine fisheries in the South and Southeast Asian region

In the following context, the paper presents the status and trend

Journal of Southeastern Asian and \n
Figure 1. Trend of marine catches for coastal developing countries in the South and Southeast Asia

<table>
<thead>
<tr>
<th>Country</th>
<th>Year</th>
<th>Catch (tonnes)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Australia</td>
<td>2020</td>
<td>200000</td>
</tr>
<tr>
<td>Brazil</td>
<td>2020</td>
<td>150000</td>
</tr>
<tr>
<td>Indonesia</td>
<td>2020</td>
<td>120000</td>
</tr>
<tr>
<td>Japan</td>
<td>2020</td>
<td>100000</td>
</tr>
<tr>
<td>Malaysia</td>
<td>2020</td>
<td>90000</td>
</tr>
<tr>
<td>Philippines</td>
<td>2020</td>
<td>80000</td>
</tr>
<tr>
<td>Singapore</td>
<td>2020</td>
<td>70000</td>
</tr>
<tr>
<td>Thailand</td>
<td>2020</td>
<td>60000</td>
</tr>
<tr>
<td>Vietnam</td>
<td>2020</td>
<td>50000</td>
</tr>
</tbody>
</table>

In the past three decades (see Figure 1A), the trend of marine catches for coastal developing countries in the South and Southeast Asia has shown an increase from approximately 50000 to 150000 tonnes in 2020, although the decrease did not show a clear impact to the trend of the overall catch (see Figure 1B).
In terms of export, the trend indicated a significant increase from US$ 0.6 billion in 1976 to US$ 9 billion in 1999 or an increase of more than 15 times. The trend is slightly more than two decades with a slight decline started in 1997 due to the economic crisis hampering some countries in Southeast Asia (Figure 2). This trend, of course, includes the export from the aquaculture sector. Despite the impressive increase of catch in the marine sector and the associated export products generated from countries in the South and Southeast Asia region, problems of overfishing still persist. The open access policy in the fisheries sector that still occurred in the region contributed to the problem. Various management measures have been introduced by countries in the region in various forms such as licensing, biotechnical zoning for fishing gear operation, closed season and closed zone, and catch size limit for net fishing, yet the measures had not been able to curb overfishing. The situation has exacerbated with the emerging conflict between various fisheries. The legitimate question is, then, why it so happened? Though the answer may not be that simple, naturally it is the staff of the Department of Fisheries of national government, fishing industry and fishers who are most knowledgeable about the problem in a given country. The Code could facilitate some thought to find the answers to these questions and some of those issues of reference are presented in the following section.

Figure 2. Trend of export from the fisheries sector in the coastal developing countries in South and Southeast Asia.

3. Important issues relevant to the region

As capture fisheries sector is characterized by an exploitative nature, one of the most important elements of the Code that directly addresses the impact of the exploitation falls within the scope of fisheries management, which the present paper focuses on. In fact, other articles of the Code such as precautionary approach, fishing operation, integration of fisheries into coastal area management, post-harvest practices, and trade and also fisheries research are all closely related to fisheries management.

Managing fisheries where the target resources keep moving and at the same time exploitation are also not in a constant position, it certainly poses a great challenge. Though the general concept of fisheries management is available in the literatures, the implementation of fisheries management depends to a large extent on the characteristics of the fisheries and the resources being exploited and also on the stakeholders, but more importantly it also relates to the ability of the concerned management facilitation in
deal with the sector. The need for establishing fisheries management institutions in this region seems to be high as reflected in the results of the workshop on CORF in India recently (Yadav, 2001) during which time one of the monitoring plans of western Claims stressed that every coastal State and Union Territory should consider setting up a Resources Management Wing in the Department of Fisheries.

A决胜 task for the work of any management institution is the development of management plans where during the process the representatives of stakeholders should be able to sit together with government agencies concerned to work together to formulate the plan. Through the development of fisheries management plans one would expect to see in the plan what the resources are exploited, status of the exploitation, management measures in place, status of the monitoring and surveillance of rules and regulations, just to name a few (see Box 1). FAO through a project funded by Norway was able to introduce the concept of developing fisheries management plans for the small-pelagic fisheries of the west coast of Malaysia, the saline fisheries of the Gulf of Thailand, and the anchovy fisheries of the Gulf of Tainan, through a series of training workshops organized in the respective countries (FISHCODE 1999a, b, 2000a, b; 2001a, b). Staff of the Department of Fisheries of Malaysia quickly adopted the concept and had expanded the initiative to other fisheries, especially those of the east coast of peninsular Malaysia (Linn, personal communication). Two important features of fisheries management plans are, first, that the management plans are regularly reviewed through a regular schedule for updating them, it is not static, and secondly, developing a management plan requires thorough and in-depth discussions where very often some sort of trade-offs are required to come to an agreed consensus. Thus one would expect that it could be painful during the process. The forum serves, however, the negotiating process to accommodate differing views to come up with an agreed consensus.

In tropical developing countries of South and Southeast Asia, the small-scale fisheries sector is an important component. However, experience of countries in the management of small-scale fisheries is generally limited, in the disinterest of the management of small-scale fisheries, very often people refer to a good success of traditional management or community-based management (but has been practiced in some developing countries such as in Sri Lanka, Indonesia and in some small island states in the South Pacific. The Code of Conduct recognizes and respects the traditional management practices that exist in the region, and as long as it is not contrary to the sustainability principle of the Code. A successful story of the community-based management in Japan that has existed for years has inspired leaders in the developing world. The legislative support and the strong tradition of the Japanese culture had contributed to the success of the system.

Some countries have embarked efforts in terms of restructuring legal instruments aiming to devolution of authority (initiating management) from central government to the local level. As an example, Philippines, with the enactment of the Local Government Code of 1991 and supported by the Fisheries Code of 1998, had even introduced resources management projects funded by the Asian Development Bank (ADB) and Japan Bank for International Cooperation (JBIC) through which co-management approach that encourages working cooperation between government and the community has been promoted. So far the project covers eighteen basins around the country (BFAR, 2001). As fisheries is the most important sector in the coastal area, the awareness among coastal fisheries have been enhanced through the project activities and the efforts had led to better participation of the community in the management of coastal fisheries. A similar type of project has been recently developed in Indonesia and Sri Lanka under the ADB assistance. Experience and lessons learned will be generated from the above projects in the respective countries which will be useful as an effort to strengthen the management of small-scale fisheries in the tropics. The current UNDP project in Bangladesh (BDG/1992/ 017) addresses relevant issues in the coastal fisheries in an effort to strengthen the community participation in the management.

4. Implementation of the Code

In an effort to have better knowledge and understanding of the
COFF, many countries have translated the Code into the local language. Translation of the Code to the local languages is only an earlier step of the process in promoting better understanding of the Code. Building awareness of the Code through training of fisheries officers will normally span during the working career of the officer. An important and effective step in public awareness is through the inclusion of the Code in the curriculum of education institution. Through this effort the young generation who would serve in the future fisheries sector has then become familiar with the principle of sustainability of the Code. It is gratifying to note that some universities in the region has started the inclusion of the COFF into the courses offered in the Faculty of Fisheries and the Faculty of Law. University of the Philippines in Visayas has included the Code into the course in the College of Fisheries, namely in the Institute of Fisheries Policy and Development Studies, while such an effort has been initiated in the Faculty of Law of the University of Padang in Indonesia.

---

**Box 1. Fishery Management Plan – possible contents**

1. Description of the fishery
   - Area
   - Species
   - Fishing methods
   - Socio-economic information

2. Jurisdiction
   - Governments and their agencies with roles in the fishery
   - Formals/informal agreements between governments on fishery management
   - Roles of all responsible agencies

3. Objectives of fisheries management
   - Biological
   - Social

---

**Journal: IJIL**

- Economic
- Operational management
  - Access arrangements including licensing and non-licensed access
  - Input/output controls
  - Pricing policy/license costs
- Research and stock assessment
  - Current research and stock assessment program
  - Ongoing data collection
  - Socio-economic studies
  - Environmental issues
  - Implications for management
- Monitoring, control and surveillance
  - Regulations/roles to be enforced
  - Description of existing capacity
  - Ongoing data collection
- Consultation with stakeholders and extension
  - Stakeholders
  - Consultation process
  - Provision of information
- Post-harvest sector
  - Description of post-harvest sector
  - Management implications
- Review of the Plan
  - How and when will the plan be reviewed
  - Who has responsibility for the plan and its review

Source: [FD/FIS/P (1999)]
Although the Code is voluntary in nature, certain part of the Code is taken into international law. Recently, some countries have taken into account some articles in the Code and use them at a basis for the improvement of the national law. The development of management plan has even been accommodated in the new law for some countries. The Code presents simple and clear articles for which further elaboration is accommodated in the associated guidelines which will now FAO has successfully produced eight guidelines or six. It is columes impossible to discuss thoroughly the Code in two-day workshop owing to the extensive coverage of the Code. The concept of training for trainer and inclusion of the Code or parts of it in the curricula of education institution is certainly worth emphasizing.

In an effort to do a quick check-up for the implementation of the Code we might track it by comparing the statement in the articles of the Code into narrative form as advocated by Caddy (1996). For example: Article 7.1.1 says: "States should take measures to prevent or eliminate excessive fishing capacity and should ensure that levels of fishing effort are commensurate with the sustainable use of fishery resources as a means of ensuring the effectiveness of conservation and management measures." An interrogative form of the statement could be of the following: "Has the State taken any measures to prevent or eliminate excessive fishing capacity...? Have the measures been monitored and reviewed regularly, etc.?" Developing such a question to the original articles of the Code helps one to know exactly the measure of the implementation in a given country. Caddy (1996) further suggested by combining this method with scaling scheme, it enables one to rank priorities to be taken in the implementation of the Code. This simple method provides an incentive for policy makers in making a quick check for the implementation of the Code in their own country.

5. Precautionary approach and indicator of sustainability

The objective of sustainable development in fisheries is to ensure exploitation of the fishery resources for the benefit of the present as well as the future generation. The challenges in the tropical developing countries normally stem from: the complexity of the fisheries (multi species and mixed gear fisheries that generates challenges in collection of statistics and stock assessment), inadequate capacity building in terms of trained personnel and some drawback in the legal and institutional framework. In response to these challenges some countries have moved forward by making necessary adjustments in facilitate effort and initiatives towards achieving sustainable development. The Philippines, under the financing assistance from the ADB, has embarked coastal resources management project to spearhead and strengthens the decentralization process of fisheries management to the local level. By involving fisheries community in the management, it makes them own the resources and thus increases their responsibility for the management. It could also reduce the cost of management as the fisheries will also become involved in the monitoring, control and surveillance.

Because of the complexity of the small-scale fisheries one should not expect to collect all information and wait until the information becomes complete to undertake a management action. Management plan need to be developed on the basis of available information and precautionary principle should be taken into account in the management process. Quantitative analysis for the resources could be less extensive than in the industrial fisheries, but on the other hand one would expect the precautionary approach to be accommodated much earlier in the process of management. Co-management and community-based management would be the better approach for the small-scale fisheries.

Sustainable development in fisheries undermines various aspects, namely, the resources and the environment, economics and sociology. To measure whether a fishery is sustainable or not, various efforts have been made by fisheries experts to develop certain parameters relating to the above aspects. Along this line a Technical Consultation was organized by the fisheries experts in Sydney in 1999 that led to the development of guidelines on indicators for sustainable development of multispecies capture fisheries.
6. Emerging challenges in the years to come

Fish and fisheries products from South and Southeast Asia has been exported to other parts of the world. Shrimp and tuna are the main commodities exported especially to Europe, Japan and the USA. Other species groups, such as groupers, snapper, are also exported to selected countries in Asia, such as Singapore and Hong Kong (FR China).

In response to the need for better quality and safety of fish products and to fulfill the hygienic standard, a number of countries in the region have enhanced their post-harvest facilities and implemented responsible practice of handling, processing and marketing. In an effort to reduce waste and minimize negative impact on the environment, development of fishing technology needs to reduce such potential impact. Some countries even use the eco-labeled as a means to contribute to reducing such impact.

"Dolphin-safe" label attached to any canned tuna is an example of such an effort by the importing country. Initiatives on eco-labeling have intensified with the adoption of the CCBP as an effort to reduce negative impact of irresponsible fishing. A private sector initiative has emerged to develop a certification scheme for the export product that relates to the status of sustainability of the fisheries. The label will be given to those export product originating from the well-managed fishery. Without the label the fish will not enter the importing countries participating in the scheme.

The potential usefulness of eco-labelling schemes to create market-based incentives for environmentally friendly products and production process was internationally recognised at UNCED. At the Rio Conferences, governments agreed to "encourage expansion of environmental labelling and other environmentally related product information programs designed to assist consumers to make informed choices". Some countries and industry groups, however, have expressed concerns that eco-labelling schemes in importing countries add another layer of constraints and competitive challenges. For developing countries that are exporting to developed countries, these are concerns that eco-labelling schemes are an attempt to disguise protection of domestic industries, restrict market access and erode national competitiveness for those less able to meet or afford foreign labeling and certification standards.

The key objective of eco-labelling scheme in fisheries is to promote sustainable fisheries. Unless the process of developing eco-labelling is transparent, concern will still remain. An eco-labelling issue in fisheries is relatively new. FAO has published a document to provide a general overview of product certification and eco-labelling for fisheries sustainability (FAO Fisheries Technical paper No. 422 by Wemenale et al., 2001). The document brings together information on the theoretical foundation, institutional aspects, relationship with international instruments including trade law, and current experience on product certification and eco-labelling applied to fish and fisheries products. It provides up-to-date information on these complex subject matters to FAO subscribers and other interested in them.

**Box 2. Main indicators for Fisheries Management**

<table>
<thead>
<tr>
<th>Indicator</th>
<th>Possible analytical categories</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Number of vessels</td>
<td>(sector, area, fleet)</td>
</tr>
<tr>
<td>2. HP and/or GT</td>
<td>(sector, area, fleet)</td>
</tr>
<tr>
<td>3. Types and amount of gear</td>
<td>(sector, area, fleet)</td>
</tr>
<tr>
<td>4. Average age of fleet</td>
<td>(sector, area, fleet)</td>
</tr>
</tbody>
</table>
Harvesting/resource indicators
1. Landings (sector, area, fleet, fishery)
2. Fishing time (total and per boat) (fleet, fishery)
3. CPUE (sector, area, fishery)
4. RIPE²
5. Biota data collected (sector, fishery)
6. Catch composition (sector, area, fishery)
7. Number of species (sector, area, fishery)
8. Fleet mobility (e.g. number of zone fished)
9. Average fish size (sector, fishery/species)
10. Size of species or % of species in catch (sector, fishery/area)
11. Possible some indicators for - habitat - water quality

Economic and social indicators
1. Value of landings (sector, area, fleet, fishery)
2. Export (O/V) (sector, species)
3. Import (O/V) (sector, area)
4. Per capita consumption (sector, area)
5. Investment (number of new boats) (sector, area, fleet)
6. Number of vessels (sector, area, fleet)
7. Employment (primary/secondary)
8. Profitability (e.g. operational margin) (sector, area)
9. Cost per trip (fleet, area)

Note:
¹ Sector is defined for the fishing sector as a whole e.g. small-scale, inshore, island and commercial fisheries, etc.
² RIPE: if using CPUE, catch composition and index of relative value per species or commonal category
Source: Anonymous (2001)

REFERENCES